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December 19, 2007

Mr. Mike Pecullan
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SUBJECT: FINAL REPORT—RADIOLOGICAL FINAL STATUS SURVEY OF THE CURTIS BAY DEPOT, CURTIS BAY, MARYLAND

Dear Mr. Pecullan:

The Oak Ridge Institute for Science and Education (ORISE) is providing the enclosed final status survey report for the Defense Logistics Agency's Defense National Stockpile Center's Curtis Bay Depot in Curtis Bay, Maryland. This report provides the complete documentation of the site's radiological status and support for release of the site without radiological restrictions.

Please contact me at 865.576.5073 or Sarah Roberts at 865.241.8893 should you have any questions.

Sincerely,

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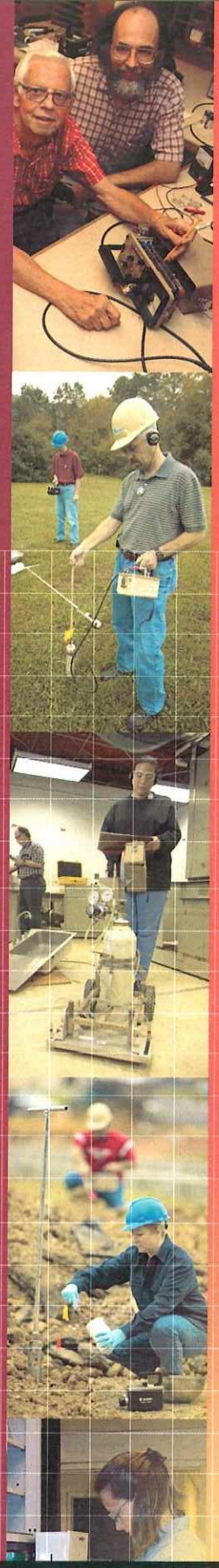

RADIOLOGICAL FINAL STATUS SURVEY OF THE CURTIS BAY DEPOT CURTIS BAY, MARYLAND

REPORT AND APPENDIX A THROUGH C
VOLUME 1 OF 3

T. J. Vitkus

Prepared for the
Defense National Stockpile Center
of the
Defense Logistics Agency

ORISE
Oak Ridge Institute for Science and Education

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RADIOLOGICAL FINAL STATUS SURVEY OF THE CURTIS BAY DEPOT CURTIS BAY, MARYLAND

Prepared by

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Prepared for the

Defense National Stockpile Center
Defense Logistics Agency

FINAL REPORT

OCTOBER 2007

RADIOLOGICAL FINAL STATUS SURVEY
OF THE
CURTIS BAY DEPOT
CURTIS BAY, MARYLAND

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ABBREVIATIONS AND ACRONYMS

ε_i	instrument efficiency
ε_s	surface efficiency
ε_{total}	total efficiency
b_i	number of background counts in the interval
AEC	Atomic Energy Commission
ALARA	as low as reasonable achievable
AOC	area of contamination
BKG	background
CBD	Curtis Bay Depot
COMPASS	Computerization of MARSSIM for Planning and Assessing Site Surveys
cm	centimeter
cm^2	square centimeter
cpm	counts per minute
d'	index of sensitivity
DCGL	derived concentration guideline level
DLA	Defense Logistics Agency
DNSC	Defense National Stockpile Center
DOE	U.S. Department of Energy
dpm/100 cm^2	disintegrations per minute per 100 square centimeters
DQO	data quality objective
FRS	final remediation survey
FSS	final status survey
GPS	global positioning system
GSA	General Services Administration
H_0	null hypothesis
H_A	alternative hypothesis
HSA	historical site assessment
IEAV	Independent Environmental Assessment and Verification Program
ITP	Intercomparison Testing Program
JHA	job hazard analysis
MAPEP	Mixed Analyte Performance Evaluation Program
MDC	minimum detectable concentration
MDCR	minimum detectable count rate
MeV	million electron volts
m	meters
m^2	square meter
mg/cm^2	milligram per square centimeter
min	minute
mm	millimeter
mrem/y	millirem per year
NaI	sodium iodide
NIST	National Institute of Standards and Technology
NORM	naturally occurring radioactive material
NRC	U.S. Nuclear Regulatory Commission
NRIP	NIST Radiochemistry Intercomparison Program

ABBREVIATIONS AND ACRONYMS (cont.)

ORISE	Oak Ridge Institute for Science and Education
ORNL	Oak Ridge National Laboratory
pCi/g	picocuries per gram
s	second
SOR	sum of ratios
TAP	total absorption peak
ThN	thorium nitrate
VSP	Visual Sampling Plan
WEI	World Environmental, Inc.

TABLE OF CONTENTS

1.0 INTRODUCTION 1
1.1 Objectives 1
1.2 Site History 2
1.3 Site Description 4
1.4 Summary of Prior Survey Results 5
1.5 Planned Decontamination Activities 6
2.0 FINAL STATUS SURVEY QUALITY ASSURANCE 6
2.1 Organization and Responsibility 7
2.2 Quality Assurance 8
2.3 Certification Training 8
2.4 Control of Measurement Equipment 9
2.5 Health and Safety 9
3.0 FINAL STATUS SURVEY REQUIREMENTS 9
3.1 Derived Concentration Guideline Levels 10
3.2 Classification of Areas by Contamination Potential 11
3.3 Identification of Survey Units 12
3.3.1 Land Area Survey Unit Identification 12
3.3.2 Pad/Building Survey Unit Identification 13
3.4 Background Reference Area and Materials 13
3.5 Reference System 14
3.6 Survey Design 14
3.6.1 Calculation of Required Number of Measurements 14
3.6.2 Determining Measurement/Sampling Locations 15
4.0 INTEGRATED SURVEY STRATEGY 16
4.1 Surface Scans 16
4.1.1 Class 1 Land Area Survey Units 17
4.1.2 Class 2 and 3 Land Area Survey Units 17
4.1.3 Class 1 Pad/Building Survey Units 17
4.1.4 Class 2 and 3 Pad/Building Survey Units 18
4.2 Soil Sampling and Surface Activity Measurements 19
4.2.1 Class 1 Land Area Survey Units 20

TABLE OF CONTENTS (continued)

4.2.2 Class 2 Land Area Survey Units 20
4.2.3 Class 3 Land Area Survey Units 20
4.2.4 Class 1 Pad/Building Survey Units 20
4.2.5 Class 2 Pad/Building Survey Units 21
4.2.6 Class 3 Pad/Building Survey Units 21
5.0 INSTRUMENTATION AND CALIBRATION 21
5.1 Field Instrumentation 21
5.1.2 Scanning Instrument/Detector Combinations 22
5.1.3 Direct Measurement Instrument/Detector Combinations 23
5.2 Laboratory Instrumentation 24
5.2.1 Gross Alpha/Beta (Removable Activity) 24
5.2.2 Gamma Spectroscopy 24
6.0 DATA REVIEW AND INVESTIGATION THRESHOLDS 25
7.0 DETERMINING COMPLIANCE WITH DCGLS 25
7.1 Land Area Survey Units 26
7.2 Pad/Building Survey Units 27
7.3 Elevated Measurement Comparison 27
8.0 PRE-REMEDIATION AND FSS RESULTS 28
8.1 Pad/Building Surveys: Class 1 29
8.1.1 Class 1 Scoping/Characterization Surface Scans and Surface Activity Levels 29
8.1.2 Class 1 Pad/Building Remediation 31
8.1.3 Class 1 Pad/Building FSS Results 33
8.2 Pad/Building Surveys: Class 2 34
8.2.1 Scoping/Characterization/FSS Surface Scans and Surface Activity Levels 34
8.3 Pad/Building Surveys: Class 3 35
8.3.1 Scoping/Characterization/FSS Surface Scans and Surface Activity Levels 35
8.4 Land area Surveys: Class 1 37
8.4.1 Class 1 Land Area Scoping/Characterization Surface Scans & Sample Results 37
8.4.2 Class 1 Land Area Remediation 38
8.4.3 Class 1 Land Area FSS Surface Scans & Sample Results 42
8.5 Land area Surveys: Class 2 43

TABLE OF CONTENTS (continued)

8.5.1 Class 2 Land Area Scoping/Characterization/FSS Surface Scans & Sample Results.....43
8.6 Land area Surveys: Class 3 45
8.6.1 Class 3 Land Area Scoping/Characterization/FSS Surface Scans & Sample Results.....45
9.0 SUMMARY AND CONCLUSIONS.....47
APPENDIX A: FIGURES
APPENDIX B: TABLES
APPENDIX C: REFERENCES
APPENDIX D: LAND SURVEY UNIT DQOs
APPENDIX E: STRUCTURAL SURVEY UNIT DQOs
APPENDIX F: STRUCTURAL SURVEY UNIT DQAs
APPENDIX G: LAND SURVEY UNIT DQAs

LIST OF FIGURES

Figure 2-1: IEAV Organizational Chart 7

Figure A-1: Curtis Bay Depot, Curtis Bay, Maryland—Plot Plan A-1

Figure A-2: Curtis Bay Depot—Contaminated Buildings and Soil AOCs A-2

Figure A-3: Curtis Bay Depot—FSS Survey Units (#Survey Unit ID) A-3

Figure A-4: Example Instrument Calibration Efficiency Determination A-4

Figure A-5: Building B-911 Walls and Loading Dock—FSS Survey Units and Direct Measurement Locations A-5

Figure A-6: Building B-911 (C1 SU22) Sub-floor Soils—Soil Sampling Locations A-6

Figure A-7: Building B-911 Trusses (C1 SU20)—FSS Survey Unit & Direct Measurement Locations A-7

Figure A-8: Building B-912 Floor (C1 SU22 through 32)—FSS Survey Unit and Direct Measurement Locations A-8

Figure A-9: Building B-912 Walls (C1 SU33 through 40)—FSS Survey Unit and Direct Measurement Locations A-9

Figure A-10: Building B-912 Trusses (C1 SU41)—FSS Survey Unit and Direct Measurement Locations A-10

Figure A-11: Building B-912 Sub-Floor (C2 SU76)—FSS Survey Unit and Soil Sampling Locations . A-11

Figure A-12: Building F-731 Walls and Loading Dock (C1 SU61, C2 SU62 through SU65 and SU124)—FSS Survey Units and Direct Measurement Locations A-12

Figure A-13: Building F-731 Floor (C1 SU50 through 60)—FSS Survey Units and Direct Measurement Locations A-13

Figure A-14: Building F-731 Trusses (C2 SU66)—FSS Survey Unit and Direct Measurement Locations A-14

Figure A-15: Building F-737 Pad and Loading Dock—FSS Survey Units and Direct Measurement Locations A-15

Figure A-16: Building G-723 Pad and Loading Dock (C3 SU79, C2 SU78, C1SU129)—FSS Survey Units and Direct Measurement Locations A-16

Figure A-17: Building 305 (C3 SU127)—FSS Survey Units and Direct Measurement Locations A-17

Figure A-18: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations..... A-18

Figure A-19: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations..... A-19

LIST OF FIGURES (continued)

Figure A-20: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-20

Figure A-21: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations..... A-21

Figure A-22: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-22

Figure A-23: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-23

Figure A-24: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-24

Figure A-25: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-25

Figure A-26: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-26

Figure A-27: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations A-27

Figure A-28: C1 SU1 and SU1b—FSS Gamma Scan Results A-28

Figure A-29: C1 SU2—FSS Gamma Scan Results A-29

Figure A-30: C1 SU3—FSS Gamma Scan Results A-30

Figure A-31: C1 SU4—FSS Gamma Scan Results A-31

Figure A-32: C1 SU5—FSS Gamma Scan Results A-32

Figure A-33: C1 SU6—FSS Gamma Scan Results A-33

Figure A-34: C1 SU7—FSS Gamma Scan Results A-34

Figure A-35: C1 SU8—FSS Gamma Scan Results A-35

Figure A-36: C1 SU9—FSS Gamma Scan Results A-36

Figure A-37: C1 SU10—FSS Gamma Scan Results A-37

Figure A-38: C1 SU11—FSS Gamma Scan Results A-38

Figure A-39: C1 SU12—FSS Gamma Scan Results A-39

Figure A-40: C1 SU13—FSS Gamma Scan Results A-40

Figure A-41: C1 SU14—FSS Gamma Scan Results A-41

Figure A-42: C1 SU15—FSS Gamma Scan Results A-42

Figure A-43: C1 SU16—FSS Gamma Scan Results A-43

Figure A-44: C1 SU17—FSS Gamma Scan Results A-44

Figure A-45: C1 SU19—FSS Gamma Scan Results A-45

Figure A-46: C1 SU20—FSS Gamma Scan Results A-46

Figure A-47: C1 SU23—FSS Gamma Scan Results A-47

LIST OF FIGURES (continued)

Figure A-48: C1 SU24—FSS Gamma Scan Results A-48
Figure A-49: C1 SU1—FSS Soil Sampling Locations A-49
Figure A-50: C1 SU1b—FSS Soil Sampling Locations A-50
Figure A-51: C1 SU2—FSS Soil Sampling Locations A-51
Figure A-52: C1 SU3— FSS Soil Sampling Locations A-52
Figure A-53: C1 SU4— FSS Soil Sampling Locations A-53
Figure A-54: C1 SU5—FSS Soil Sampling Locations A-54
Figure A-55: C1 SU6— FSS Soil Sampling Locations A-55
Figure A-56: C1 SU7—FSS Soil Sampling Locations A-56
Figure A-57: C1 SU8—FSS Soil Sampling Locations A-57
Figure A-58: C1 SU9—FSS Soil Sampling Locations A-58
Figure A-59: C1 SU10—FSS Soil Sampling Locations A-59
Figure A-60: C1 SU11—FSS Soil Sampling Locations A-60
Figure A-61: C1 SU12—FSS Soil Sampling Locations A-61
Figure A-62: C1 SU13—FSS Soil Sampling Locations A-62
Figure A-63: C1 SU14—FSS Soil Sampling Locations A-63
Figure A-64: C1 SU15—FSS Soil Sampling Locations A-64
Figure A-65: C1 SU16—FSS Soil Sampling Locations A-65
Figure A-66: C1 SU17—FSS Soil Sampling Locations A-66
Figure A-67: C1 SU19—FSS Soil Sampling Locations A-67
Figure A-68: C1 SU20—FSS Soil Sampling Locations A-68
Figure A-69: C1 SU21—FSS Soil Sampling Locations A-69
Figure A-70: C1 SU23—FSS Soil Sampling Locations A-70
Figure A-71: C1 SU24—FSS Soil Sampling Locations A-71
Figure A-72: C2 SU1 through 6—FSS Soil Sampling Locations A-72
Figure A-73: C2 SU7 through 11—FSS Soil Sampling Locations A-73
Figure A-74: C2 SU12 through 16—FSS Soil Sampling Locations A-74
Figure A-75: C2 SU17 through 21—FSS Soil Sampling Locations A-75

LIST OF FIGURES (continued)

Figure A-76: C2 SU22 through 24—FSS Soil Sampling Locations A-76

Figure A-77: C2 SU25 through 28—FSS Soil Sampling Locations A-77

Figure A-78: C2 SU29 through 32—FSS Soil Sampling Locations A-78

Figure A-79: C2 SU33 and 34—FSS Soil Sampling Locations A-79

Figure A-80: C2 SU35 through 39—FSS Soil Sampling Locations A-80

Figure A-81: C2 SU40 through 43—FSS Soil Sampling Locations A-81

Figure A-82: C2 SU44 through 48—FSS Soil Sampling Locations A-82

Figure A-83: C2 SU49, 50, and 53—FSS Soil Sampling Locations A-83

Figure A-84: C2 SU51 and 52—FSS Soil Sampling Locations A-84

Figure A-85: C2 SU54 through 57—FSS Soil Sampling Locations A-85

Figure A-86: C2 SU58—FSS Soil Sampling Locations A-86

Figure A-87: C2 SU59—FSS Soil Sampling Locations A-87

Figure A-88: C2 SU60 through 63—FSS Soil Sampling Locations A-88

Figure A-89: C2 SU64 through 68—FSS Soil Sampling Locations A-89

Figure A-90: C2 SU69 through 72—FSS Soil Sampling Locations A-90

Figure A-91: C2 SU73 through 75—FSS Soil Sampling Locations A-91

Figure A-92: Class 2 Land Area Survey Areas—Characterization Report Gamma Scanning Results . A-92

Figure A-93: Class 3 Land Area Survey Units SU1 through SU4—Characterization Report FSS Sampling Locations And Gamma Scanning Results A-93

Figure A-94: Class 3 Land Areas Survey Units SU5 and SU6—Characterization Report and Final Status Survey FSS Sampling Locations and Gamma Scanning Results A-94

LIST OF TABLES

Table 3-1: MARSSIM-Recommended Survey Unit Sizes 12
Table 4-1: MARSSIM-Recommended FSS Survey Scan Coverage 17
Table 8-1: Class 1 B-Line Building Characterization Surface Activity Levels 30
Table 8-2: Class 1 F- and G-Line Building Characterization Surface Activity Levels 31
Table 8-3: Class 1 Pad/Building FSS Summary 33
Table 8-4: Class 2 Pad/Building FSS Summary 34
Table 8-5: Class 3 Pad/Building FSS Summary 36
Table 8-6: Characterization Survey Radionuclide Concentrations 38
Table 8-7: Pictorial of Land Area AOCs 39
Table 8-8: FSS Class 1 Radionuclide Concentrations 43
Table 8-9: FSS Class 2 Radionuclide Concentrations 45
Table 8-10: FSS Class 3 Radionuclide Concentrations 46
Table B-1: Building Information, Curtis Bay Depot, Maryland B-1
Table B-2: Survey Unit Descriptions and Results B-3
Table B-3: Investigation Results B-15
Table B-4: Soil Area Factors B-21
Table B-5: Structural Surface Area Factors B-22
Table B-6: FSS Structural Survey Units and Surface Activity Levels B-23
Table B-7: Phase I Scoping Survey/FSS Surface Activity Levels B-58
Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels B-67
Table B-9: FSS Survey Units and Surface Activity Levels B-78
Table B-10: Class 3 FSS Survey Units Soil Concentrations B-112
Table B-11: Background Reference Area Data B-115

RADIOLOGICAL FINAL STATUS SURVEY
OF THE
CURTIS BAY DEPOT
CURTIS BAY, MARYLAND

1.0 INTRODUCTION

This report provides a detailed discussion of the radiological survey planning, survey implementation, remediation, and the results for these activities supporting the conclusion that radioactive contamination previously identified at the Curtis Bay Depot (CBD) has been reduced to levels such that the site may be released without radiological restrictions.

1.1 OBJECTIVES

The objective of the radiological final status survey (FSS) was to obtain the data necessary to demonstrate compliance with the U.S. Nuclear Regulatory Commission (NRC)-approved site-specific derived concentration guideline levels (DCGLs) for both structural surfaces and outdoor areas (ORISE 2006a and NRC 2007). The DCGLs were modeled such that any residual licensed material would not exceed the NRC's basic dose limit for license termination of 25 millirem per year (mrem/y). Specifically, when the DCGLs are applied to the final status survey and the final survey results show that the DCGLs have been satisfied, the following requirements of 10 CFR 20.1402 are met:

> "**Title 10 CFR 20.1402:** *Radiological criteria for unrestricted use.* A site will be considered acceptable for unrestricted use if the residual radioactivity that is distinguishable from background radiation results in a total effective dose equivalent to an average member of the critical group that does not exceed 25 mrem (0.25 millisieverts) per year, including that from groundwater sources of drinking water, and that the residual radioactivity has been reduced to levels that are as low as reasonably achievable (ALARA). Determination of the levels which are ALARA must take into account consideration of any detriments, such as deaths from transportation accidents, expected to potentially result from decontamination and waste disposal."

The FSS was conducted in accordance with the design inputs provided in the FSS plan (ORISE 2007a). These design inputs were obtained through the performance of a historical site assessment (HSA), scoping surveys, and a detailed characterization survey (ORISE 2005a, 2006b, and c). Furthermore, the survey plans implemented for the scoping and characterization surveys were designed following the process detailed in the plan in order to satisfy the FSS data quality objectives (DQOs) for data quantity and quality, such that some or all of the data generated for those areas of the site with little potential for residual contamination could be used as FSS data (ORISE 2005b, c, and 2006d).

1.2 SITE HISTORY

The land area that is currently the CBD was originally a U.S. Army Depot built in 1918 on 798 acres of farmland. Additional acreage was acquired, increasing the site size to 815 acres. From 1918 to 1954, the site was used as an ordnance depot for receiving, shipping, and storage of ammunition.

In 1946, a National Stockpile program was established as an attempt to mitigate dependence on foreign sources of vital materials during times of national emergencies. In the late 1950s, the Defense National Stockpile Center (DNSC) became a tenant at the CBD and began storing strategic materials (bulk ores, minerals, and metals). Included in the materials stored at the CBD were chromite, ferromanganese, and ferrochrome. Additional stored materials were thorium nitrate (mantle and reactor grades, average 47 percent thorium nitrate (ThN) by weight) in fiber and steel drums, monazite sands, and sodium sulfate—radioactive materials that required a U.S. Atomic Energy Commission (AEC), predecessor to the NRC, source material license (License STC-133).

Since the establishment of the CBD, there have been a number of land transfers that reduced the footprint of the site as well as changes in government agency caretakers. Approximately 37 acres were transferred to the U.S. Army Reserve Command between 1958 and 1966. The remaining 778 acres were excessed to the General Services Administration (GSA) which had assumed accountability for the facility. In 1966, GSA sold CBD land that included the area of an old radioactive burial site to Anne Arundel County for development into an industrial park (Bay Meadows Industrial Park). In 1977, GSA notified NRC of its intention to excess empty warehouses on the site as part of a sale of U.S. Government land and buildings. In 1980, GSA sold approximately 87 acres to Anne Arundel County. This property had contained nine warehouses that

were used to store thorium nitrate. The site was cleaned up and that portion released from the NRC license. The County eventually built a detention center and ball fields on the property. In 1988, National Defense Stockpile responsibility was transferred from the GSA to the Defense Logistics Agency (DLA).

The DNSC of the DLA is now in the process of closing out many of its depots across the country and seeking to remove those facilities from the NRC license. Although there have been a number of building and soil remedial actions at CBD over the past three decades, the NRC license was recently amended to conduct final site cleanup activities at CBD. All current site clean-up work at the CBD was sponsored by the DNSC Thorium Nitrate Stewardship and Disposition Program – Phase 4 – Decontamination & Decommissioning, and additional technical support provided under the Department of Energy (DOE)-Oak Ridge Operations Work for Others Program. The Oak Ridge National Laboratory (ORNL), per DOE Proposal Number # 1872-M171-A1, provided project support and coordination for the various entities involved with the HSA, radiological characterization, and site remediation.

Removal of ThN source material from the site, Phase 3 of the project, was completed in fiscal year 2005, which completed the initial phase of the current cleanup activities. In conjunction with site cleanup, at the request of ORNL, the Oak Ridge Institute for Science and Education (ORISE) performed an HSA of the Curtis Bay Depot as the first step in planning the required site investigations that would lead to the recently completed remediation activities (ORISE 2005a). Additionally, ORISE was tasked to conduct a scoping survey of the site to validate the results of the HSA and to provide information for the complete site characterization survey. Phase 1 of the scoping survey, which addressed most of the structures that could be safely surveyed as well as land areas, was completed in June 2005 (ORISE 2006b). The deconstruction of 24 buildings at the site was completed by a U.S. Army Joint Munitions Command contractor, PIKA International, Inc., on October 14, 2005. ORISE performed a scoping survey of these deconstructed buildings as Phase 2 of the scoping survey during October 2005 (ORISE 2006b). The characterization survey was performed during the period of May 1 through 19, 2006, with additional characterization data gap sampling performed on July 25 and 26, 2006 (ORISE 2006c). These surveys were designed with an integrated, graded approach following the radiological survey guidance and DQO process provided in the *Multi-Agency Radiation Survey and Site Investigation Manual* (MARSSIM) (NRC 2000).

1.3 SITE DESCRIPTION

The CBD site is located approximately one mile south of Baltimore, Maryland in an industrialized area of Anne Arundel County, Maryland. The property currently consists of approximately 483 acres bounded on the north by the Army Reserve Facility and Curtis Creek, on the east by Curtis Creek, on the south by Furnace Creek, and on the west by Back Creek and the Anne Arundel County Facility. A 1,955-foot long dock belonging to the U.S. Army Reserve lies along Curtis Creek; a security fence encloses the facility. Figure A-1 shows the site plot plan.

In general, the CBD terrain is mostly flat to gently hilly with large grassy, open areas, and some lightly wooded areas. A number of roads, mostly asphalt, traverse the site; there are approximately six miles of paved roads. Also noteworthy were the large stockpiles of various ores. Most of the stockpiled materials at CBD were raw ores with no history of licensable quantities of radioactive material. Ores were primarily piled on concrete pads or directly on the ground. Some piles were covered to reduce erosion through weathering and oxidation. Much of the stockpiled material has been sold and transported off site. There are two miles of railroad tracks that cross the site, a stream, and two leach fields—one in use. There are two wetland areas; one located on the southwest portion of the site and the other on the south side of the site. Two former burial areas—for medical supplies and radioactive waste—and ordnance areas were also identified on the south and western sector of the site.

The site contains various structures (buildings and warehouses)—some functional, others in a serious state of disrepair. A few buildings are surrounded by man-made berms of earth, that over the years since their construction have been vegetated with small trees and brush. A number of these buildings/warehouses have been used to store the ThN, generally in containers. There are five different building construction types ranging in size from 10 meters (m) by 30 m to as large as 73 m by 183 m. Building construction is either of a pitched roof with transite or asphalt shingles, concrete floor, and terra cotta block walls; or a flat roof, wooden or concrete floor, and transite or terra cotta block walls. A number of the buildings have been demolished and only the concrete pad remains. Two of the buildings were known to be significantly contaminated, some were identified during the scoping surveys as having small areas of suspect contamination, and others have no known history of radioactive materials use.

The two largest warehouses on the site are designated as Buildings 1021 and 1022 and measure 73 m by 183 m. Building 1021 has no history of radioactive material storage. Building 1022 is known to have formerly stored ThN and a "clean-up action" was noted in historical documentation. The remaining storage buildings, a number of which have stored radioactive materials, are designated according to groupings as A through I Line Buildings. Two additional building lines, J and K Lines, were previously completely demolished. Lastly, Building 821 was a former change house and Building 825 housed machining and carpentry equipment, neither of which have had a history of radioactive material use. Table B-1 provides a summary of the building nomenclature designation, radioactive material use, and original HSA classification.

1.4 SUMMARY OF PRIOR SURVEY RESULTS

The contaminant of concern for the CBD was primarily thorium with the potential for significantly smaller quantities of uranium. All scoping and characterization survey results for the vast majority of the pads/buildings (44 of 50) and land areas (>99%) satisfied the derived concentration guideline levels ($DCGL_W$s) of 400 dpm/100 cm^2 on structures or the soil $DCGL_W$s of 2.9 pCi/g and 2.2 pCi/g for Th-232 and U-238, respectively, and supported either the initial survey classifications or provided sufficient data to revise the classification for final status surveys. However, the scoping and characterization surveys confirmed contamination on surfaces of the following pads/buildings: B-911 (extensive), B-912 (extensive), B-913 (isolated), F-731 (isolated), F-737 (isolated), and G-723 (isolated). In addition to structural surface contamination, there was sub-floor soil contamination, due to migration of material through floor cracks, beneath Building B-911, and also contamination beneath the loading dock. Although not investigated at the time of characterization, there was a potential for sub-floor soil contamination beneath Building B-912 should material have migrated through the expansion joints which were intact. A complete discussion of each contaminated pad/building was provided in the characterization report (ORISE 2006c). Low-level contamination was also determined to be present on the overhead trusses in Buildings B-911 and B-912. The activity levels identified on Class 1 Buildings F-731 and F-737 surfaces were low-level, ranging from 410 to 32,000 dpm/100 cm^2, and were localized. An area of contaminated soil was also identified beneath the F-737 pad. The contamination in Building B-913 was significant but localized to two small areas. The activity measured on the Class 3 structure, G-723, was limited to one location measuring 420 dpm/100 cm^2. Surveys did not identify any indications of residual activity on any of

the remaining pads/buildings or debris piles, with the exception of naturally occurring radioactive material.

Contaminated surface soils were determined to be present over a broad area on the F Line road and at the juncture of the F Line Road with Furnace Creek Road. Contaminated subsurface soil (beginning at approximately one meter below the ground surface) was present within the former radiological waste disposal area. Other isolated areas of contamination (AOCs) were identified next to roadways or associated with current or former buildings. The locations of each of these AOCs, together with the previously discussed contaminated pads/buildings, are shown on Figure A-2.

1.5 DECONTAMINATION ACTIVITIES

A detailed decontamination/remediation plan was prepared and submitted to NRC for review and approval (ORISE 2006e). The information provided in this plan was used to develop the scope of work requirements that were followed by the decontamination and remediation contractor. The requirements of the scope of work were to remove contamination from structures using proven remedial technologies and the excavation of contaminated soils to levels below the $DCGL_W$s (ORNL 2006).

The U.S. Army Joint Munitions Command contractor for the site remediation was World Environmental, Inc (WEI). WEI began remediation of contaminated soils and structures in March 2007 and completed remedial actions and final remediation support surveys in July 2007. There were six pads/buildings and 21 soil AOCs that were identified as contaminated. Contaminated structural surfaces were remediated using a variety of techniques ranging from scabbling to complete structural demolition and disposal. Contaminated soils were excavated. Site remediation resulted in the removal and off-site shipment and disposal of 5,300 tons of soil, concrete, and debris. These activities are further discussed in Sections 8.1.2 and 8.4.2.

2.0 FINAL STATUS SURVEY QUALITY ASSURANCE

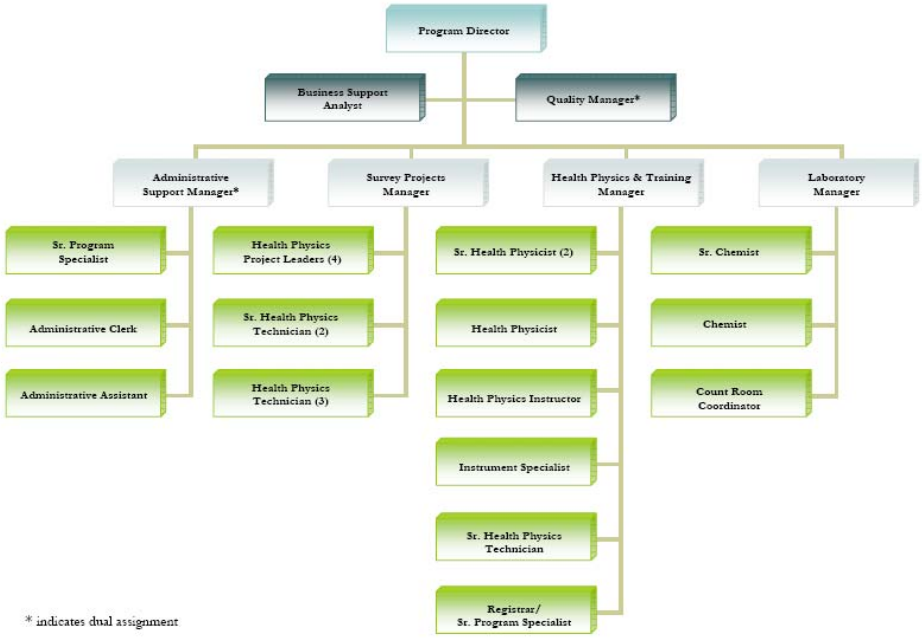
The FSS project responsibilities, training requirements, and quality assurance are described below.

2.1 ORGANIZATION AND RESPONSIBILITY

ORISE conducts radiological survey activities as one of its core competencies through the Independent Environmental Assessment and Verification Program (IEAV**)**. Figure 2-1 represents the generic organizational structure of the IEAV survey staff.

Detailed responsibilities for various staff positions are documented in Position Questionnaires, which have been developed for all employees. Additional detailed information regarding various staff position responsibilities is included in the IEAV Quality Program (ORISE 2007b).

Figure 2-1: IEAV Organizational Chart



The FSS activities were performed under the overall direction of Eric Abelquist, Program Director. Tim Vitkus, Senior Project Leader, was responsible for planning activities, staff direction, and interpretation and reporting of the results.

2.2 QUALITY ASSURANCE

The ORISE Survey Program conducted all field surveys in a manner that assured the quality and accuracy of resulting data and provided auditable documentation of activities. Details of the field quality assurance and quality control procedures are documented in the IEAV Quality Program (ORISE 2007b).

Quality control procedures included:

- Twice daily instrument background and check-source measurements to confirm that equipment operation was within acceptable statistical fluctuations.

- Laboratory participation in the Mixed Analyte Performance Evaluation Program (MAPEP), NIST Radiochemistry Intercomparison Program (NRIP), and Intercomparison Testing Program (ITP) Laboratory Quality Assurance Programs.

- Training and certification of all individuals performing procedures.

- Periodic internal and external audits.

2.3 CERTIFICATION TRAINING

New employee indoctrination and orientation training is conducted to provide new survey staff with basic information about IEAV survey procedures. This initial training is followed by survey and quality assurance procedure training. The training consists of studying all applicable manual procedures, oral instruction, hands-on training, written testing, and demonstration of proficiency. The veteran staff members participate in annual procedure refresher training, and additional training when a procedure is revised or new procedure introduced.

In addition to survey and quality assurance procedure training, field personnel participate in training to satisfy regulatory requirements such Occupational Safety and Health Administration HAZWOPER and DOE radiological worker, site-specific and generic safety, first aid and CPR, transportation, and other related requirements.

2.4 CONTROL OF MEASUREMENT EQUIPMENT

Radiological survey instruments were calibrated in accordance with IEAV Survey Procedures Manual requirements (ORISE 2007c). Procedures included electronic and NIST-traceable source calibration as well as twice daily operational check outs. Additional information on calibration and survey instrumentation is provided in Section 5.1.

2.5 HEALTH AND SAFETY

The project area was evaluated for potential health and safety issues. Additionally, the proposed survey and sampling procedures were evaluated to ensure that any hazards inherent to the procedures themselves were addressed in current job hazard analyses (JHAs). The procedures entailed minimal potential hazards, all of which were addressed in current IEAV JHAs. Personnel also adhered to health and safety requirements provided in the site-specific health and safety plan. Additionally, daily plan-of-the-day meetings were held with all site personnel where specific health and safety topics were discussed.

FSS survey activities were performed in accordance with the ORISE Radiation Protection Plan and radiation work permits as required (ORISE 2005d). Additionally, the identification of potential buried military munitions and explosives of concern was evaluated and appropriate precautions included in the site health and safety plan (ORISE 2006f). Site remediation activities did result in the creation of additional hazards that had not been specified in the site-specific health and safety plan such as the excavations, protruding rebar, and other construction hazards. Identification of previously unaddressed hazards was consistently discussed during the daily meetings prior to performing work.

3.0 FINAL STATUS SURVEY REQUIREMENTS

A specific FSS was planned and conducted for each survey unit or group of similar survey units associated with each of the pads/buildings and outdoor soil areas. The FSS plans were prepared in accordance with the guidance presented in MARSSIM. The plans followed the DQO process and ensured that all pads/buildings and land areas were surveyed with the necessary rigor that corresponded with a given pad/building or land area contamination potential. The DQO process included the following seven steps:

Step 1: State the problem

Step 2: Identify the decisions

Step 3: Identify inputs to the decisions

Step 4: Define the study boundaries

Step 5: Develop a decision rule

Step 6: Specify the decision errors

Step 7: Optimize the survey design

The following sections provide the requirements for the planning phase of the FSS including DCGLs, site classification and survey unit designations, survey planning parameters, instrumentation, measurement and sampling procedures, and the data quality assessments that were implemented.

3.1 DERIVED CONCENTRATION GUIDELINE LEVELS

Th-232 and its associated decay products and U-238 and its associated decay products were identified through process knowledge and characterization survey results as the contaminants of concern. Site-specific $DCGL_W$s for both Th-232 and U-238 on building surfaces and within soils were developed using the RESRAD and RESRAD-BUILD computer codes and were approved by the NRC (ORISE 2006a and NRC 2007). These $DCGL_W$s accounted for all decay products found in secular equilibrium, including, the slight natural contribution from U-235 and its decay products. The above background $DCGL_W$s for structural surfaces were 400 dpm/100 cm^2 for Th-232 and its decay products and 800 dpm/100 cm^2 for U-238 and decay products. The pad/building FSS planning and data quality assessment used only the surface activity $DCGL_W$ for Th-232. Use of only the more restrictive Th-232 surface activity $DCGL_W$, rather than modifying the $DCGL_W$ to also account for any small percentage of natural uranium activity that may have been present, allowed for simplification of the survey process yet provided an overall more conservative approach for determining compliance with remediation criteria. For soil area FSS planning, confirmation that U-238 was present in insignificant concentrations, relative to the Th-232, was achieved by evaluating the Th-232 to U-238 ratios in scoping and characterization survey soil samples. Only those samples containing greater than 5 pCi/g of Th-232 were selected in determining the average net ratio which was approximately 14 to 1. The above background $DCGL_W$s of 2.9 pCi/g for Th-232 and 2.2 pCi/g for U-238 were used for soil survey unit FSS planning and for the data quality assessments.

Therefore, FSS planning and data quality assessment (DQA) for soils included an appropriate application of the unity rule in accordance with the equation:

$$\frac{Conc._{Th-232}}{DCGL_{Th-232}} + \frac{Conc._{U-238}}{DCGL_{U-238}} < 1$$

Lastly, the potential for the concentration of Th-230 from the raw materials into the ThN product was evaluated and the determination made that there was no impact on the Th-232 or U-238 DCGLs, nor need to develop a separate DCGL.

3.2 CLASSIFICATION OF AREAS BY CONTAMINATION POTENTIAL

The CBD site was subdivided into three classes, based on contamination potential, as either Class 1, 2, or 3 in accordance with MARSSIM. A description of each is as follows:

Class 1: Buildings or land areas that have a significant potential for radioactive contamination (based on site operating history) or known contamination (based on previous radiological surveys) that exceeds the expected $DCGL_W$.

Class 2: Buildings or land areas, often contiguous to Class 1 areas, that have a potential for radioactive contamination but at levels less than the expected $DCGL_W$.

Class 3: Remaining buildings and land areas that are expected to contain little or no residual contamination based on site operating history or previous radiological surveys.

Furthermore, pads/buildings and land areas were further subdivided into survey units, which provided the fundamental unit for demonstrating compliance with the DCGLs. Survey unit size restrictions generally followed the recommended size limitations provided in MARSSIM, although some survey units, particularly Class 2 units, exceeded the size limits. This is further discussed below in Section 3.3. With the exception of Class 1 buildings, the scoping and characterization surveys of upper walls and overhead structures for all Class 2 and 3 buildings determined that these surfaces were non-impacted.

3.3 IDENTIFICATION OF SURVEY UNITS

All impacted pads/buildings and land areas were subdivided into Class 1, 2, or 3 survey units. Each survey unit represented a portion of the site with similar contamination potential. Table 3-1 provides the MARSSIM-recommended survey unit areas.

Table 3-1: MARSSIM-Recommended Survey Unit Sizes

Class	Recommended Survey Area	
	Structures	**Land Areas**
1	Up to 100 m^2	Up to 2,000 m^2
2	100 to 1,000 m^2	2,000 to 10,000 m^2
3	No limit	No limit

3.3.1 Land Area Survey Unit Identification

Land area survey units for FSS are identified and illustrated on Figure A-3. There were six Class 3 land area survey units, 76 Class 2 soil area survey units, and 26 Class 1 soil area survey units. The characterization survey for the Class 3 areas was conducted such that the DQOs developed and procedures implemented met FSS requirements. The DQOs implemented are provided in Sections 3.6 and 4.0. The Class 2 land areas survey units were consolidated into 11 planning areas. The characterization data collected from within these areas were used for the DQO inputs for each survey unit within a specific Class 2 planning area. In general, survey unit sizes followed the MARSSIM guidance, with the exception of the Class 2 land areas. A posting plot of the characterization data was prepared and the data carefully evaluated relative to the proposed DCGLs. This evaluation determined that most of the Class 2 land could have been down-graded in classification to Class 3. However, the planning process resulted in the decision to maintain the Class 2 designation, but to allow for larger survey unit sizes that are based on the land area that encompassed the footprint of each pad/building or former building footprint. This resulted in Class 2 survey units up to 20,000 m^2 in area. Table B-2 provides land area survey unit designations, classifications, and areas.

3.3.2 Pad/Building Survey Unit Identification

The original pad/building classifications are presented in Table B-1. Pad/building survey units for FSS are listed in Table B-2. Pads/buildings originally classified as Class 2 or 3 where contamination was identified during the scoping survey were reclassified, or a portion thereof, as Class 1. For the FSS phase, there were six pads/buildings that had at least one associated Class 1 survey unit. Of the remaining 44 pads/buildings, 11 were surveyed during scoping/characterization as Class 2 and 33 as Class 3. The scoping surveys were designed and conducted in such a manner that the results for Class 2 and 3 pads/buildings would meet FSS requirements. The DQOs implemented are provided in Sections 3.6 and 4.0. The characterization and remedial action support data collected from within pad/building areas with Class 1 areas that required remediation were used for the DQO inputs to design the FSS.

3.4 BACKGROUND REFERENCE AREA AND MATERIALS

A background reference area was selected and the soil sampled and analyzed. The data generated were used for comparison with the site soil sample data and for the evaluation of the FSS data in accordance with the Wilcoxon Rank Sum (WRS) statistical test. The background reference area selected shared similar geo-physical properties as the site and had not been impacted by site operations. The map and data for the background reference area were provided in the characterization report (ORISE 2006c). Two notable differences between the site and the background reference area that could not readily be overcome were the background reference area had not been used for ore storage and there were no railroad lines. However, an off-site, non-impacted railroad line was sampled to obtain data for determining the net Th-232 and U-238 concentrations present in samples collected from locations where visible railroad ballast was present.

Structural survey units were evaluated using the non-parametric Sign Test. Construction material-specific backgrounds were determined during scoping surveys in areas of similar construction but without a history of radioactive material use. These construction material-specific measurements were used to correct direct measurements for background contributions, prior to converting data to the DCGL compliance unit of dpm/100 cm^2.

3.5 REFERENCE SYSTEM

FSS measurement and sampling locations were referenced as follows. Direct measurements on structural surfaces were referenced to the X, Y distance from either the southwest corner of a floor/overhead structure or the lower left corner on each wall. Soil sampling locations were referenced to global positioning system (GPS) coordinates obtained using hand-held GPS units. The GPS reference coordinate system used during scoping/characterization phases was WGS 84 latitude/longitude in the Class 3 survey units and NAD 27 UTM Zone 18 for referencing the FSS sampling locations in the Class 2 and 1 survey units.

3.6 SURVEY DESIGN

Structural surfaces were assessed by collecting the required number of gross beta surface activity measurements within each survey unit. The basis for assessing Th-232 surface activity levels via gross beta measurements is provided in Section 5.1.3. The Sign test was applied as the non-parametric statistical test for demonstrating compliance with the $DCGL_W$. Land area compliance with the $DCGL_W$s was demonstrated through the application of the WRS test to soil sample results collected from each survey unit. Both Th-232 and U-238 activity concentrations in soil samples were measured by gamma spectroscopy. These two statistical tests were performed to evaluate the survey unit mean concentration relative to the null hypothesis (H_0). Simply stated, H_0 is that the residual contamination in the survey unit exceeds the release criterion. Provided that the statistical test is satisfied at the desired confidence level, then H_0 is rejected and the alternate hypothesis (H_a), that residual contamination meets the release criterion, is accepted. The data needs for the statistical tests were determined in accordance with the following processes.

3.6.1 Calculation of Required Number of Measurements

The relative shift (Δ/σ) was calculated for each survey unit where:

$$\Delta = DCGL_W - LBGR$$

$DCGL_W$ = the gross or radionuclide specific guideline

LBGR = Lower Bound of the Gray Region; should be established as the estimated mean activity within the survey unit, but may be adjusted to maximize survey design

σ = variability in concentration where:

1) The larger variability between the survey unit, σ_s, and the background reference area, σ_r, is selected for the WRS test and;
2) The survey unit and construction material-specific background count rate errors are propagated for the Sign test.

The DQOs were evaluated for each survey unit or survey area and the decision errors selected. The Type I decision error—the probability of incorrectly rejecting H_0 when it is true—was 0.05 and the Type II error—the probability of incorrectly accepting H_0 when it is false— was either 0.05 or 0.10. Once the above parameters were established, the number of data points required by the statistical test were obtained either from Tables 5.3 (WRS test) or 5.5 (Sign test) in MARSSIM or otherwise generated using either COMPASS or Visual Sampling Plan (VSP) software. The FSS plan provided the tabulated estimated mean and standard deviation for each Class 2 land survey unit planning area and the Class 3 land survey units (ORISE 2007a). These data were determined from scoping and characterization survey data. Remedial action support data supplemented by characterization data were required for determining the FSS data needs for Class 1 soil areas. Appendix D contains the FSS planning DQO output for each group or individual soil survey unit.

For pad/building structural survey units, the mean activity and variability was estimated for Class 2 and 3 structures prior to the implementation of the scoping survey. These tabulated estimates were also provided in the FSS plan and were used to determine the number of direct measurements required to satisfy FSS requirements (ORISE 2007a). Collection of remedial action support data, in conjunction with already acquired scoping/characterization survey data, was required for determining the data needs for Class 1 structural survey units and those Class 2/3 survey units associated with Class 1 remediated areas and addressed during the FSS. Appendix E provides the FSS planning DQO output for each individual structural survey unit or survey unit group.

3.6.2 Determining Measurement/Sampling Locations

Measurement/sampling locations were established in either a random-start/systematic fashion for Class 1 and Class 2 survey units or at randomly generated locations for Class 3 survey units. Random start/systematic determinations followed the MARSSIM recommended guidance using a triangular measurement or sampling pattern to increase the probability of identifying small areas of residual activity. The spacing (L) between data points on a triangular pattern was determined by:

$$L = [(\text{Survey Unit Area})/(0.866 \times \text{number of data points})]^{1/2}$$

The spacing between rows was calculated as: $0.866 \times L$

For soil areas, a unique GPS or X, Y coordinate location was generated for each sample location. For structural survey units a unique X, Y coordinate location was generated for each direct measurement location. For sample locations that were either inaccessible or on a surface structure that had been removed during remediation, the sample was either not collected or replaced by a new randomly generated location.

4.0 INTEGRATED SURVEY STRATEGY

FSS data collected for structural surfaces consisted of gamma and alpha plus beta or beta scans to identify locations of residual contamination as well as direct measurements of beta surface activity. Smear samples, although not used in the final data quality assessment, were collected from both judgmental and approximately 5 to 10% of the systematic/random locations to measure removable alpha and beta surface activity. Final status surveys of open land areas consisted of gamma scans to identify locations of residual contamination and samples of soil that were analyzed for Th-232 and U-238. Table B-2 provides survey unit information for land areas and pads/buildings.

4.1 SURFACE SCANS

Land area gamma radiation surface scans were performed using NaI scintillation detectors. Structures were scanned for gamma radiation using NaI scintillation detectors and also for direct alpha plus beta or beta radiation using gas proportional detectors. Detectors were coupled to ratemeters or ratemeter-scalers with audible indicators. Characterization gamma surface scan data of land areas that did not require remediation were also used as FSS data. These data were collected using a GPS system that enabled real time gamma count rate and position data capture under a subcontract with the Environmental Restoration Group, Inc. Table 4-1 shows the recommended surface scan coverage discussed in MARSSIM. Sections 4.1.1 and 4.1.2 discuss the actual scan coverage which met or exceed the recommended coverages.

Table 4-1: MARSSIM-Recommended FSS Survey Scan Coverage		
Class	**Structures**	**Land Areas**
1	100%	100%
2	10 to 100% floors and lower walls 10 to 50% upper walls and ceilings	10 to 100%
3	Judgmental	Judgmental

4.1.1 Class 1 Land Area Survey Units

All Class 1 land survey areas were scanned 100% during characterization. These areas were subdivided into survey units and scanned 100% following the completion of the remediation. Overburden soil removed from the former radiological waste disposal area was consolidated into a survey unit independent of the underlying land areas and scanned 100%. The FSS gamma scans of the Class 1 survey units were also performed using a GPS system coupled to a ratemeter-scaler and the resultant gamma count rate data logged.

4.1.2 Class 2 and 3 Land Area Survey Units

Class 2 land areas received medium to high density gamma surface scans during the characterization survey. Class 2 scan coverage density began as 100% coverage near roadways, railroads, and around pads/buildings and then was gradually decreased in outlying areas. The overall gamma radiation scan coverage was 50 to 75% of the Class 2 land areas. Class 3 land area survey units received low to medium density gamma scans during characterization. Gamma radiation scans were performed over 30 to 50% of the Class 3 land areas with areas near roads, railroads, and structures receiving the highest coverage. These data were collected and presented in the characterization survey report and also satisfy the FSS requirements (ORISE 2006c). Additional FSS gamma surface scans were performed in those portions of Class 2 or 3 survey units that were contiguous with remediated Class 1 survey units.

4.1.3 Class 1 Pad/Building Survey Units

All Class 1 pad/building surfaces were scanned 100% during characterization. These areas were subdivided into survey units for the FSS and scanned 100% for alpha plus beta or beta radiation

following the completion of the remediation. Figure A-1 shows the location of the site buildings/pads

4.1.4 Class 2 and 3 Pad/Building Survey Units

Figure A-1 shows the location of the site buildings/pads. Pads/building floors and lower walls were scanned for alpha plus beta, or beta, and gamma radiation during either the Phase 1 or 2 scoping surveys. These scans were conducted such that FSS scanning requirements were satisfied in all cases.

Up to 50% of the accessible Phase 1, Class 2 scoping survey structure surfaces were scanned and in the case of Building B-913, 100% of the floor was scanned. Professional judgment was combined with a systematic approach during the Phase 1 scoping surveys to select scan areas that were based upon visual inspections, historical records of spills or cleanups, and findings as the survey progressed. In buildings, upper walls and overhead structures were also scanned with emphasis on horizontal surfaces where residual contamination may have settled and accumulated—when access could be achieved—and if elevated radiation was identified on the floor.

Class 2 survey units within Buildings B-912, B-913, and F-731 were re-scanned over 10 to 50% of the surfaces following remediation of the Class 1 contaminated areas.

Phase 2 scan surveys of the Class 2 deconstructed buildings with concrete floors (F Line) involved scanning up to 100% of the building floor section made accessible by the deconstruction contractor. The amount of the total floor area available for each of these deconstructed buildings ranged from 30 to 60%. The wooden floors were required to be removed and staged in debris piles for all but one (H-711) of the H Line buildings. Scans were conducted on approximately 75% of the accessible floor area of building H-711 and on 10 to 20% of the individual floor planks for the remaining H Line buildings. The floor of building H-715 had degraded to such an extent that it could not be removed intact and in fact had collapsed into the crawl space of the building. Therefore, the number of planks available for scan surveys was minimal. Deconstructed wall debris from the F and H Line buildings were also staged in piles and scanning covered 10 to 50% of the accessible wall debris surfaces.

Up to 25% of the accessible Phase 1, Class 3 surfaces were scanned. Pads/floors and lower walls were judgmentally scanned for alpha plus beta, or beta, and gamma radiation.

Phase 2 scoping survey surface scans of the Class 3 deconstructed buildings with concrete floors (D, E, F and G Lines) involved scanning up to 100% of the building floor section made accessible by the deconstruction contractor. The amount of floor area available for each of these deconstructed buildings ranged from 15 to 40%. The wooden floors were removed and staged in debris piles for I Line buildings and the deconstructed walls also staged in separate debris piles for all deconstructed buildings. Scans were conducted on approximately 10 to 20% of the individual floor planks for the I Line buildings and 10 to 20% of the accessible surfaces in each of the deconstructed wall debris piles.

4.2 SOIL SAMPLING AND SURFACE ACTIVITY MEASUREMENTS

FSS surface soil samples (0 to 0.15 m) were collected from pre-determined random-start/systematic or random locations as applicable. Additional judgmental samples were obtained, as necessary, from locations where scans indicated potential residual contamination or from within remediated areas in those cases where systematic sampling locations did not fall within the remediated portion of a given survey unit. Soil samples were maintained under formal chain-of-custody procedures then analyzed in the IEAV laboratory by gamma spectroscopy and results reported in units of pCi/g. A number of the planned FSS soil samples could not be collected due to inaccessibility issues. In the event an excessive number of samples from a specific survey unit were inaccessible, additional random sample locations were generated.

FSS direct measurements to quantify total beta activity levels were performed at pre-determined random start/systematic or random locations as applicable. In cases where a measurement location was inaccessible or the structure had been physically removed, replacement locations were randomly generated. Additional judgmental samples were obtained, as necessary, from locations where scans indicated potential residual contamination or from within remediated areas if a systematic measurement location did not fall within the remediated potion of a given survey unit. Measurements were made using gas proportional detectors coupled to ratemeter-scalers. Surface activity data were converted to units of dpm/100 cm^2.

The procedures used for calculating the number of and location for samples/measurements that are discussed below were determined in accordance with Sections 3.6.1 and 3.6.2.

4.2.1 Class 1 Land Area Survey Units

The specific DQO inputs for calculating required sample size for FSS soil samples in Class 1 land area survey units were derived from the remedial action support survey sample results and characterization samples. The Class 1 survey units are shown on Figure A-3. Originally, the floor of Building B-911 was considered as a structural survey unit. However, remediation resulted in the removal of the entire floor slab and the sub-floor soil was ultimately classified as a land area survey unit for the FSS. Appendix D provides the specific, detailed DQO reports for each Class 1 survey unit.

4.2.2 Class 2 Land Area Survey Units

As previously discussed, the characterization survey sample results were used for generating the DQO inputs for those survey units that lay within each of the 11 respective planning areas that were provided in the final status survey plan (ORISE 2007a). Survey units are shown on Figure A-3. Appendix D provides the detailed DQO reports for the 11 Class 2 planning areas.

4.2.3 Class 3 Land Area Survey Units

FSS soil sampling of five of the six Class 3 survey units was completed during the characterization survey and the sixth Class 3 survey unit completed during the FSS phase. The planning inputs were developed from scoping survey soil sample results. The sampling locations were determined by randomly generating GPS coordinates within each survey unit. Survey units are shown on Figure A-3 and Appendix D provides the detailed DQO reports.

4.2.4 Class 1 Pad/Building Survey Units

Class 1 structural survey units were associated with Buildings B-911, B-912, B-913, F-731, F-737, and G-723. The DQO inputs were derived from the remedial action support and characterization survey measurement results. The DQO reports for individual or groups of survey units are provided in Appendix E.

4.2.5 Class 2 Pad/Building Survey Units

FSS direct measurements of most Class 2 structural survey units were completed during the scoping survey phase. The DQO mean concentration and variability inputs for determining the number of direct measurements to satisfy FSS requirements were prospectively estimated. The actual data results were retrospectively reviewed to determine the adequacy of the estimated surface activity concentration. The planning and retrospective values were reviewed to ensure adequacy of the original plan with no issues identified, further discussion is provided in Section 8.2. The planning values were originally provided in the FSS plan (ORISE 2007a). Appendix E contains the DQO reports that were generated to illustrate the original planning parameters.

The exception to the above was for those Class 2 survey units that were within the remediated Class 1 structures that. For these survey units, characterization data was used to determine the required measurements. Appendix E also shows these DQO reports.

4.2.6 Class 3 Pad/Building Survey Units

FSS direct measurements for all Class 3 structural survey units were completed during the scoping survey phase. The DQO mean concentration and variability inputs for determining the number of direct measurements to satisfy FSS requirements were prospectively estimated. The actual data results were retrospectively reviewed to determine the adequacy of the estimated surface activity concentration. The planning values were originally provided in FSS plan (ORISE 2007a). Appendix E contains the DQO reports that were generated to illustrate the original planning parameters.

5.0 INSTRUMENTATION AND CALIBRATION

Calibration of all field and laboratory instrumentation was based on standards/sources, traceable to NIST. Specific field and laboratory instrumentation parameters are discussed below.

5.1 FIELD INSTRUMENTATION

The following, or similar, survey instrumentation were used during the FSS.

5.1.2 Scanning Instrument/Detector Combinations

Alpha plus Beta

Ludlum Floor Monitor Model 239-1 combined with Ludlum Ratemeter-Scaler Model 2221 coupled to Ludlum Gas Proportional Detector Model 43-37, Physical Area: 550 cm^2 equipped with a 0.8 mg/cm^2 mylar window (Ludlum Measurements, Inc., Sweetwater, TX), Minimum Detectable Concentration (MDC) = 300 dpm/100 cm^2 Th-232, based on a scanning total efficiency for the Th-232 decay series of approximately 1.50.

Beta

Ludlum Ratemeter-Scaler Model 2221 coupled to Ludlum Gas Proportional Detector Model 43-68, Physical Area: 126 cm^2 equipped with a 3.8 mg/cm^2 Mylar window (Ludlum Measurements, Inc., Sweetwater, TX) MDC = 800 dpm/100 cm^2 Th-232, based on a scanning total efficiency for the beta-only component of the Th-232 decay series of approximately 0.40.

The actual scanning MDC for the instrumentation was compared with required scanning MDC determined at the time of the Class 1 final status survey DQO development. Sample spacing adjustment was not necessary as the actual scan MDC was less than the required scan MDC for each Class 1 survey unit. A review of the area factors presented in Table B-5 demonstrates that a sample spacing of less than 100 m^2 ensured that the required scan MDC was satisfied.

Gamma

Ludlum Pulse Ratemeter Model 12 or Ratemeter-Scaler Model 2221 enabled with RS-232 data collection capabilities (Ludlum Measurements, Inc., Sweetwater, TX) coupled to Victoreen sodium iodide (NaI) Scintillation Detector Model 489-55, Crystal: 3.2 cm x 3.8 cm (Victoreen, Cleveland, OH) or a Ludlum SPA-3 NaI Scintillation Detector Model 44-10, Crystal: 5.1 cm x 5.1 cm (Ludlum Measurements, Inc., Sweetwater, TX). Scanning MDCs = 2.8 or 1.8 pCi/g Th-232 (assumes secular equilibrium with progeny in the decay series) and Scanning MDC = 4.5 or 2.8 pCi/g for U-238 (assumes secular equilibrium with the decay series). Detector/ratemeter or ratemeter-scaler combinations were also coupled to a Trimble GeoXH Receiver and Data Logger (Trimble Navigation Limited, Sunnyvale, CA) when collecting scan data for the Class 1 areas during the FSS or a Trimble Pro-XRS Receiver and Data Logger (Trimble Navigation Limited, Sunnyvale,

CA) for the characterization survey gamma scan data collection. Gamma count rates (in cpm) were captured each second. Positional accuracy was typically within one to five meters.

Based on characterization data demonstrating that U-238 concentrations from licensed material contamination existed as a mixture with Th-232 in virtually every case, a combined scan MDC for the mixture was calculated from the observed fractional amounts. The observed Th-232:U-238 ratio ranged from approximately 10:1 to 20:1. The calculated scan MDC for the 10:1 activity ratio was calculated to be 2.9 pCi/g total activity and was compared with the similarly calculated total activity DCGL of 2.81 pCi/g for the CBD. The actual scanning MDC for the instrumentation was compared with required scanning MDC for Class 1 survey units in the same manner as described above for structure surface scans. The required scan MDC was met for each Class 1 survey unit without the application of the area factors provided in Table B-4. Notes have been included in the DQO reports for Class 1 survey units indicating that although the scan MDC for U-238 in equilibrium with the decay series is approximately 4 pCi/g, the U-238 scan MDC for the elevated measurement comparison was established as 2.9 pCi/g to reflect the gross activity scan MDC.

5.1.3 Direct Measurement Instrument/Detector Combinations

Beta

Ludlum Ratemeter-Scaler Model 2221 coupled to Ludlum Gas Proportional Detector Model 43-68, Physical Area: 126 cm^2 (Ludlum Measurements, Inc., Sweetwater, TX). MDC = 200 dpm/100 cm^2 Th-232, based on the beta-only efficiency of approximately 0.40 to 0.42.

Use of only the more restrictive Th-232 surface activity $DCGL_W$, rather than modifying the $DCGL_W$ to also account for any small percentage of natural uranium activity that could have been present, allowed for simplification of the survey process yet provided an overall more conservative approach for assessing surface activity levels. Therefore, the detectors used for assessing surface activity were calibrated only for the Th-232 decay series. The calibration procedure was in accordance with ISO-7503[1] recommendations. Total beta efficiencies (ε_{total}) were determined for each instrument/detector combination and consisted of the product of the 2π instrument efficiency (ε_i) and surface efficiency (ε_s): $\varepsilon_{total} = \varepsilon_i \times \varepsilon_s$. Beta total efficiencies were determined based on a beta

[1]International Standard. ISO 7503-1, Evaluation of Surface Contamination - Part 1: Beta-emitters (maximum beta energy greater than 0.15 MeV) and alpha-emitters. August 1, 1988.

energy multi-point calibration, development of instrument efficiency to beta energy calibration curves, and the calculation of the weighted efficiency representing the Th-232 decay series. Included in the weighted efficiency was an empirically determined correction for disequilibrium in the decay series that results from Rn-220 loss. A 3.8 mg/cm^2 density thickness Mylar window was used on the beta detectors to block detector response contributions from alpha radiation.

ISO-7503 recommends an ε_s of 0.25 for beta emitters with a maximum energy of less than 0.4 MeV and an ε_s of 0.5 for maximum beta energies greater than 0.4 MeV. Figure A-4 illustrates an example multi-point calibration efficiency determination.

Direct measurement results were reported in units of dpm/100 cm^2.

5.2 LABORATORY INSTRUMENTATION

FSS samples were analyzed in accordance with the ORISE Laboratory Procedures Manual (ORISE 2007d). Soil samples were analyzed by gamma spectroscopy and results reported in units of picocuries per gram (pCi/g). Smear samples were analyzed using a low-background proportional counter and results reported in units of dpm/100 cm^2.

5.2.1 Gross Alpha/Beta (Removable Activity)

Smear samples were analyzed using the following equipment:

Low Background Gas Proportional Counter Model LB-5100-W (Tennelec/Canberra, Meriden, CT). MDCs = 9 dpm/100 cm^2 for alpha and 15 dpm/100 cm^2 for beta with a two-minute count time.

5.2.2 Gamma Spectroscopy

Soil samples were analyzed by gamma spectroscopy using the following equipment:

High Purity Extended Range Intrinsic Detector CANBERRA/Tennelec Model No: ERVDS30-25195 (Canberra, Meriden, CT) used in conjunction with Lead Shield Model G-11 (Nuclear Lead, Oak Ridge, TN) and Multichannel Analyzer DEC ALPHA Workstation (Canberra, Meriden, CT).

High Purity Extended Range Intrinsic Detector Model No. GMX-45200-5 (AMETEK/ORTEC, Oak Ridge, TN) used in conjunction with Lead Shield Model SPG-16-K8 (Nuclear Data) Multichannel Analyzer DEC ALPHA Workstation (Canberra, Meriden, CT).

High-Purity Germanium Detector Model GMX-30-P4, 30% Eff. (AMETEK/ORTEC, Oak Ridge, TN) used in conjunction with Lead Shield Model G-16 (Gamma Products, Palos Hills, IL) and Multichannel Analyzer DEC ALPHA Workstation (Canberra, Meriden, CT).

Gamma Spectroscopy MDC = 0.11 pCi/g for Th-232 (based on the 0.911 MeV photopeak from Ac-228) and 0.70 pCi/g for U-238 (based on the 0.063 MeV photopeak from Th-234) based on a 60-minute count time.

6.0 DATA REVIEW AND INVESTIGATION THRESHOLDS

Data were reviewed to assure that the type, quantity, and quality were consistent with the survey plan and design assumptions. Data standard deviations were compared with the assumptions made in establishing the number of data points. Individual and average data values were compared with guideline values and proper survey area classifications were confirmed. Individual measurements in excess of the guideline level for Class 1 and 2 areas were investigated. For Class 3 survey units, although less conservative than the recommendation provided in MARSSIM, measurements in excess of 75 percent of the guideline for Class 3 areas were investigated. The requirement for increasing the investigation threshold was due to the low DCGLs relative to background. For survey unit investigations, reclassifications, remediations, and/or resurveys, a determination of the cause was initiated and the data conversion and assessment process repeated. Additional information regarding the evaluation of measurement results in excess of the DCGLs is provided in Section 7.3 and specific occurrences are listed in Table B-3 and discussed in the appropriate sub-section of Section 8 of this report.

7.0 DETERMINING COMPLIANCE WITH DCGLS

As discussed in Section 3.1, both soil concentration and surface activity DCGLs were developed with which FSS data were compared. These DCGLs included both the mean concentrations ($DCGL_W$) and also provided for small areas of elevated contamination in excess of the $DCGL_W$, the

$DCGL_{EMC}$. Compliance demonstration with both requirements for each survey unit is discussed below.

7.1 LAND AREA SURVEY UNITS

Land area survey units were evaluated using the Wilcoxon Rank Sum test. Survey unit and background reference area soil sample results collected from the random or random-start/systematic locations were converted to unity in accordance with the equation in Section 3.1. The DCGL in this case is also established as 1. The reference area results were adjusted by adding the DCGL to the unity concentration value. The results for both data sets were then ranked as follows:

- Rank all (survey unit and reference area) measurements in order of increasing size from 1 to N, where N is the total number of pooled measurements.
- If several measurements have the same value, assign them the average ranking of the group of tied measurements.
- Sum the ranks of the adjusted reference area measurements; this value is the test statistic, W_R.
- Compare the value of W_R to the critical value in MARSSIM Table I.4 for the appropriate sample size and decision level.

Prior to applying the test, if the difference between the largest survey unit result and the smallest reference area result was less than the DCGL, the survey unit would always pass a complete application of the WRS test. No further evaluation was necessary as the survey unit would always pass the WRS test and the null hypothesis would be rejected. Otherwise, W_R was calculated. If W_R was greater than the critical value, H_0 was rejected, and the survey unit met the established criteria. If W_R was less than or equal to the critical value, H_0 was not rejected, and the survey unit did not meet the established criteria; investigation, remediation, reclassification, and/or resurvey would have been performed as appropriate. However, application of the WRS resulted in the rejection of the null hypothesis for all survey units.

7.2 PAD/BUILDING SURVEY UNITS

Structural survey units were evaluated using the Sign test. Individual activity values and the average activity value were calculated.

If all values from the random or random-start/systematic locations for a survey unit were less than the guideline level, the survey unit satisfied the criterion and no further evaluation was necessary.

If the average activity value was greater than the guideline, the survey unit would not satisfy the criterion, and further investigation, possible reclassification, remediation, and/or resurvey would have been required. However, the average activity never exceeded the criterion.

If the average activity value was less than the guideline level, but some individual values were greater than the guideline, data evaluation by the Sign test proceeded, as follows:

- List each of the survey unit measurements.
- Subtract each measurement from the guideline level.
- Discard all differences which are "0"; determine a revised sample size.
- Count the number of positive differences; this value is the test statistic, S+.
- Compare the value of S+ to the critical value in MARSSIM Table I.3 for the appropriate sample size and decision level.

When S+ was greater than the critical value, H_0 was rejected, and the survey unit met the established criteria. If S+ had been less than or equal to the critical value, H_0 would not have been rejected, and the survey unit would not have met the established criteria; investigation, remediation, reclassification, and/or resurvey would have been performed, as appropriate.

7.3 ELEVATED MEASUREMENT COMPARISON

Soil sample or direct measurement results that exceeded the $DCGL_W$ were also evaluated for compliance with a $DCGL_{EMC}$. The remediation scope of work required that contamination be reduced to levels below the $DCGL_W$ and WEI performed remedial action support surveys as assurance that this requirement was met (ORNL 2006). However because contamination was

present prior to remediation in Class 1 survey units, the potential existed that isolated locations of residual soil concentrations or surface activity could have been identified during the FSS that exceeded the $DCGL_W$. The statistical tests for demonstrating compliance are such that some samples/measurements may exceed the $DCGL_W$, yet still reject the null hypothesis. Therefore, both the statistically-based and judgmental samples exceeding the $DCGL_W$ by a predetermined threshold were compared with a $DCGL_{EMC}$ that corresponded with the size of a given area of elevated activity—defined as the $DCGL_W$ × Area Factor. The concentration threshold for soil samples from Class 1 survey units that required an EMC comparison was defined as either the Th-232 or U-238 $DCGL_W$ plus the sum of the respective mean background concentration and two standard deviations. For Class 1 surfaces, the corresponding threshold would be the surface activity $DCGL_W$, in terms of counts per minute, plus the sum of the mean construction material-specific background count rate and two standard deviations. Tables B-4 and B-5 provide the area factors for both soil concentrations and surface activity. Area factors were developed using the identical inputs used in generating the site-specific $DCGL_W$s with only the size of the area of contamination changed and for soil, the length parallel to the aquifer flow also must be changed to match the hot spot size. When individual samples/measurements with elevated concentrations were less than the respective $DCGL_{EMC}$ the impact of multiple hot spots on the mean concentration in a survey unit was evaluated. This was performed using equation 8-2 in MARSSIM. Any measurement that exceeded the $DCGL_W$ within a Class 2 or 3 survey unit was investigated as discussed in Section 6.0 and in some cases required reclassification of portions of the survey unit. In most of these cases, railroad ballast, which contains naturally elevated concentrations of U-238 and Th-232, was noted in the samples, and an appropriate railroad ballast background subtracted to obtain the sum-of-ratios value to complete an evaluation.

8.0 PRE-REMEDIATION AND FSS RESULTS

The results of the FSS are provided in the following sections. The information below and in accompanying appendices provides all applicable data and documentation necessary to support the request for removal of the Curtis Bay Depot from the DNSC's NRC license.

8.1 PAD/BUILDING SURVEYS: CLASS 1

The results for the surveys of pads/buildings B-911, B-912, B-913, F-731, F-737, and G-723 are provided below.

8.1.1 Class 1 Scoping/Characterization Surface Scans and Surface Activity Levels

B-911, B-912, and B-913

The characterization gamma radiation scans of Buildings B-911 and B-912 identified that most of the floor areas exhibited generally elevated gamma radiation levels. There were numerous localized hot spots exhibiting count rates ranging from 20,000 to greater than 500,000 counts per minute (cpm) as compared to a general gamma radiation detector background of 3,000 to 4,000 cpm. Additionally, investigative gamma scans were performed along floor cracks and/or expansion joints and the floor wall interface in both buildings. These investigations determined that approximately 200 linear meters in B-911 and 20 linear meters in B-912 were contaminated. Two small isolated contaminated locations were identified on the floor of B-913.

The characterization alpha plus beta/beta-only scans identified significant elevated radiation levels in Buildings B-911 and B-912 that covered most of the floors and confirmed the two isolated locations in B-913. Additionally, contamination was also identified on the lower walls and roof trusses of both B-911 and B-912; as well as a gable vent, the loading dock surface and soils, and the sub-floor soils of B-911. The pre-remediation characterization survey surface activity results are summarized below in Table 8-1.

Table 8-1: Class 1 B-Line Building Characterization Surface Activity Levels		
Buildings		**Removable/Total Beta Activity Range (dpm/100 cm^2)**
B-911 and B-912	,	-6 to 170/ -340 to 620,000
B-913		-2 to 2,900/-220 to 190,000

F-731, F-737, and G-723

Gamma scans of F-731 and F-737 did not identify any locations of elevated direct gamma radiation. Alpha plus beta/beta scans identified localized, above background radiation levels on the floor and lower wall surfaces of Building F-731 and residual isolated locations of contamination on the F-737 pad, including contamination that extended into cracks. Contaminated soil was also detected beneath the Building F-737 pad. Alpha plus beta scans identified one location of probable contamination on the G-723 pad loading dock. The characterization scans of the Building G-723 pad also identified alpha plus beta radiation distinguishable from background on the southern end of the pad, determined to be associated with a humus-like material. A sample of the material was collected, analyzed by gamma spectroscopy and found that it contained elevated, naturally-occurring concentrations of Be-7. Table 8-2 summarizes the surface activity levels prior to remediation.

Table 8-2: Class 1 F- and G-Line Building Characterization Surface Activity Levels		
Pads/Buildings		**Total Beta Activity Range (dpm/100 cm^2)**
F-731 and F-737		-200 to 32,000
G-723		-140 to 490

8.1.2 Class 1 Pad/Building Remediation

The remedial actions that WEI conducted within the contaminated structures are summarized below.

Building B-911

The contaminated lower wall and loading dock surfaces were either scabbled or chiseled to remove contamination. The loading dock was then dismantled to permit access to the soil. The overhead trusses were wiped and vacuumed to remove the loose contamination. The entire concrete floor was cut into sections and removed as waste. The contaminated sub-floor soil and the contaminated soil under the loading dock were excavated.

Building B-912

The contaminated lower walls were either scabbled or sections removed. The overhead trusses were vacuumed and wiped down. The contaminated floor was initially scabbled with limited success, followed by the decision to break-up and remove the floor. The process of removing the floor identified that there were two floor slabs within the building. The top slab was removed and the second slab surveyed and spot-remediated by removing contaminated concrete and expansion joints. Soil associated with contaminated expansion joints and floor/wall interfaces was also removed.

Building B-913

The two small locations of contamination were scabbled and contaminated drums were removed for disposal.

Building F-731

Contaminated floors were vacuumed and spot scabbled. Contaminated walls were spot chiseled.

F-737 Pad

An iterative approach was required to successfully remediate this pad. Initially, the isolated locations of contamination were spot scabbled and the sub-pad contaminated soil excavated. Additional characterization and FRS surveys of the pad itself and soil contamination that abutted the pad identified numerous suspect locations that required demolition of a large portion of the pad to ensure the contaminated structures and sub-pad soils were removed. The additional contamination had migrated into cracks and the soil beneath the pad and also spaces between the loading dock rail line and the pad itself. The underside of the pad required significant evaluation due to what was initially thought to be wide-spread contamination. Visual inspection identified discoloration of the concrete structural supports with elevated beta radiation count rates. Further inspection determined that the discoloration was the result of degradation of a surface coating on the concrete. The undersides of two similarly constructed Class 3 building pads, Pads D-1125 and E-1112, were investigated and the similar degradation of the concrete surface noted. The discolored concrete exhibited a beta radiation construction material background count rate of 800 to 1,000 cpm versus the "typical" concrete background of 300 to 400 cpm. This investigation determined that the underside of the F-737 pad was not contaminated with the exception of one piling immediately beneath the previously discussed crack.

G-723 Pad

The contaminated location on the loading dock was scabbled.

8.1.3 Class 1 Pad/Building FSS Results

As previously discussed, the FSS surveys of these Class 1 structures included 100% alpha plus beta/beta surface scans of the Class 1 survey units associated with each structure. Class 2 survey units associated with these structures received FSS scan coverage generally ranging from 10 to 50%, several Class 2 survey units, such the B-913 floor, were scanned 100%. The one Class 3 survey unit (G-723 pad) was scanned 10%. These scans identified several additional areas of contamination requiring further remediation for B-911, B-912, F-731, and F-737 prior to completing the direct measurement/sampling phase of the FSS. Of the approximately 1300 direct measurements made on these six structures for the FSS, one measurement location exceeded the Th-232 $DCGL_W$ of 400 dpm/100 cm^2. This location measured less than one square meter in size and was located on the B-911 loading dock with activity of 420 dpm/100 cm^2. The associated $DCGL_{EMC}$ for comparison is 64,800 dpm/100 cm^2. For ALARA purposes, this portion of the loading dock was removed and shipped as low-level waste. Table 8-3 summarizes the FSS surface activity results for the six structures with Class 1 survey units. Complete data are provided in Table B-6.

Table 8-3: Class 1 Pad/Building FSS Summary[a]

Pad/Building	Number of Survey Units/ Measurements	Total Beta Activity Range/Average (dpm/100 cm^2)
B-911	10/280	-180 to 420/92
B-912	20/353	-260 to 360/14
B-913	9/140	-490 to 310/29
F-731	18/297	-470 to 380/93
F-737	12/171	-230 to 370/15
G-723	3/47	-120 to 330/19

[a]FSS removable activity levels ranged from 0 to 5 dpm/100 cm^2 for gross alpha and -6 to 16 dpm/100 cm^2 for gross beta. These data are not tabulated in this report and are provided to demonstrate that removable activity levels remained below the default 10% removable fraction.

The complete DQA report for each survey unit for these structures is provided in Appendix F. The DQA reports include individual direct measurement results, both summary and graphical prospective and retrospective FSS planning information, summary statistics, and the Sign Test results when applicable. Figures A-5 through A-16 show the VSP-generated drawings for these

structures with survey units shown and the location of direct measurements. H_0 was rejected for all survey units and H_A accepted, thus demonstrating that the release criteria have been met.

8.2 PAD/BUILDING SURVEYS: CLASS 2

The results for the surveys of pads/buildings A-921, F-734, F-735, F-736, G-721, H-711, H-712, H-713, H-714, H-715, and 1022 are provided below.

8.2.1 Scoping/Characterization/FSS Surface Scans and Surface Activity Levels

Alpha plus beta radiation distinguishable from background was identified at a single location on the north side loading dock of Building 1022. The activity at this location was noted to be associated with a humus-like residue that had concentrated in a low spot, a sample of which was collected. Beta scans of the underlying concrete were negative for elevated direct radiation. Be-7 was also identified via sampling and analysis as the cause of the elevated activity. The discussion of this material and the miscellaneous sample results supporting these conclusions were provided in the characterization report (ORISE 2006c). The scoping survey scans of the remaining Class 2 structures and debris piles did not identify any elevated direct gamma not associated with the terra cotta block or alpha plus beta/beta elevated radiation levels. The data generated were of sufficient quantity and quality to satisfy the FSS requirements. Summary FSS results are provided below in Table 8-4. Complete data are provided in Tables B-7 and B-8.

Table 8-4: Class 2 Pad/Building FSS Summary

Pads/Buildings	Number of Survey Units/ Measurements	Total Beta Activity Range (dpm/100 cm^2)
A-921	1/17	-180 to 230
F-734, F-735, and F-736	3/65	-150 to 140
G-721	1/20	-8 to 220
H-711, H-712, H-713, H-714, and H-715	5/70	-440 to 110
1022	3/38	-210 to 660[a]

[a]Activity at this location was associated with a humus-like residue

The complete DQA report for each survey unit for these structures is provided in Appendix F. The DQA reports include individual direct measurement results, both summary and graphical prospective and retrospective FSS planning information, and summary statistics. Figures A-18 through A-27 contain consolidated maps for these structures with direct measurement locations that were previously presented in the characterization survey report (ORISE 2006c). H_0 was rejected for all survey units and the H_A accepted, thus demonstrating that the release criteria have been met.

8.3 PAD/BUILDING SURVEYS: CLASS 3

The results for the surveys of pads/buildings A-922, C-1131, C-1132, C-1133, C-1134, D-1121, D-1122, D-1123, D-1124, D-1125, E-1111, E-1112, E-1113, E-1114, E-1115, E-1116, F-732, F-733, G-722, G-724, G-725, G-726, I-531, I-631, I-632, I-633, I-634, I-636, I-641, I-634 Igloo, 305, 821, 825, and 1021 are provided below.

8.3.1 Scoping/Characterization/FSS Surface Scans and Surface Activity Levels

The scoping survey alpha plus beta scans identified one location of suspect elevated radiation on the Building D-1125 pad. Therefore, the scans were increased up to 50% coverage during the scoping survey with no additional findings. The characterization surface scans covered 85 to 95% of this pad. The elevated direct alpha plus beta radiation was detected near the eastern edge of the pad in a low spot where the same humus-like material was present that had been noted at other locations on the site; a sample was collected and Be-7 again confirmed. Gamma scans did not identify any elevated direct radiation levels associated with pads/buildings or debris piles, with the exception of the terra cotta block. Beta scans identified one location of elevated direct radiation on a piece of metal within the building G-722 wall debris pile. A sample of the metal was collected for gamma spectroscopy analysis to determine if the observed activity was the result of thorium or deposited radon-222 progeny that has been noted in the past on similar materials. Elevated levels of naturally occurring Pb-210 were identified with no indications of the presence of thorium. The remaining alpha plus beta/beta-only scans did not identify any other locations with radiation levels distinguishable from background.

The data generated were of sufficient quantity and quality to satisfy the FSS requirements. Summary FSS results are provided below in Table 8-5. Complete data are provided in Tables B-7 and B-8.

Table 8-5: Class 3 Pad/Building FSS Summary		
Pads/Buildings	**Number of Survey Units/ Measurements**	**Total Beta Activity Range/Average (dpm/100 cm^2)**
A-922	1/15	-380 to 230/26
C-1131, C-1132, C-1133, C-1134	4/63	-110 to 170/1.5
D-1121, D-1122, D-1123, D-1124, D-1125	5/79	-240 to 370[a]/28
E-1111, E-1112, E-1113, E-1114, E-1115, E-1116	6/94	-250 to 250/29
F-732, F-733	2/29	-240 to 290/50
G-722, G-724, G-725, G-726	4/60	-190 to 510[b]/38
I-531, I-631, I-632, I-633, I-634, I-636, I-641, Igloo	8/120	-320 to 220/-48
305, 821, 825, 1021	4/55	-270 to 270/0

[a]Activity at this location was associated with a humus-like residue.
[b]Activity at this location was due to radon progeny on metal.

Building 305, the former depot administration building, was not surveyed during the scoping/characterization survey phase of this project, but was addressed during the FSS phase and results included independently in this report. Data are provided in Table B-6.

The complete DQA report for each survey unit for these structures is provided in Appendix F. The DQA reports include individual direct measurement results, both summary and graphical prospective and retrospective FSS planning information, and summary statistics. Figure A-17 is the VSP-generated map of Building 305 and Figures A-18 through A-27 provide consolidated maps for the structures with direct measurement locations that were previously presented in the characterization survey report (ORISE 2006c). H_0 was rejected for all survey units and the H_A accepted, thus demonstrating that the release criteria have been met.

8.4 LAND AREA SURVEYS: CLASS 1

The survey results for the Class 1 land areas are described below. The FSS survey unit designations are shown on Figure A-3.

8.4.1 Class 1 Land Area Scoping/Characterization Surface Scans and Sample Results

Scoping survey gamma radiation surface scans concentrated on transport routes across the site and the land areas surrounding buildings that had historically stored licensed material. These scan results were then used to further refine land area classifications for characterization. The scoping survey scans identified areas of elevated direct radiation on the B Line road across from Building B-912, an area adjacent to the Building 821 driveway, an area near the northwest corner of Building F-735, two areas south of Building F-736 on both the north and south sides of the F Line Road/Furnace Creek Road intersection, and an area west of Building G-726 on Furnace Creek Road. All of these areas had been initially classified as Class 2 areas at the time of the scoping survey, but were reclassified as Class 1 for the characterization survey. Scoping survey scans of the former radiological waste burial area surface did not identify any elevated direct gamma radiation. However, gamma scans of the test pits that were dug in the former radiological waste burial area did identify the presence of elevated gamma radiation levels associated with visible debris found within several of the pits. Judgmental soil samples were collected from these locations and contamination identified and presented in the scoping survey report (ORISE 2006b).

The characterization surface scan coverage density expanded from the limited scoping survey coverage and consisted of high density (100%) scan coverage within the Class 1 areas shown on Figure A-3. The characterization survey confirmed the scoping survey areas of concern (AOCs) as well as other, related locations identified in Class 2 areas that were immediately contiguous with the Class 1 survey areas and AOC boundaries. At the completion of characterization, there were 12 land area AOCs noted as shown on Figure A-2.

There were numerous other distinguishable from background locations that were investigated during site characterization. These investigations, including rescanning all and sampling many of the areas, did not result in the addition of any other AOCs, but identified gamma radiation background

variations resulting from the presence of railroad cinders, residual ores, culverts, debris piles, different soil types, or the lack of vegetative cover.

The concentration ranges for Th-232 and U-238 for Class 1 area scoping and characterization survey soil samples are summarized in Table 8-6.

Table 8-6: Characterization Survey Radionuclide Concentrations (pCi/g)

Area	Th-232	U-238	Number of Samples >2.9 net pCi/g Th-232
Class 1 Samples	0.28 to 453	0.10 to 29	25 of 168

The complete scoping/characterization survey results for Class 1 land areas were provided in the characterization survey report (ORISE 2006c).

8.4.2 Class 1 Land Area Remediation

The remedial actions that WEI conducted within the contaminated areas are summarized below. Table 8-7 provides a general pictorial representation of each land area AOC.

Table 8-7: Pictorial of Land Area AOCs		
 AOC 1	 **AOC 2**	 **AOC 3**
 AOCs 4 and 5	 **AOC 6**	 **AOC 7**
 AOC 8	 **AOC 9**	 **AOC 10**
 AOC 11	 **AOC 12**	 **AOC 20**
 AOC 21	 **B-911 Loading Dock Soil**	

AOC 1

AOC 1 consisted of the former radiological waste burial area. Excavation uncovered buried wooden drum lids, metal bands and other miscellaneous debris. The excavation bounds covered an area of approximately 600 m^2 with the depth of the excavation approximately 3 to 4 meters in depth.

AOC 2

AOC 2 was an isolated area located to the west of Patrol Bridge Road and due east of the Building C-1134 and C-1133 pads on the southeast end of the site. Soils were excavated to a depth of approximately 30 cm over an area of approximately 9 m^2.

AOC 3

The area of soil contamination identified near Building F-735 consisted of three areas covering an area of approximately 60 m^2. Soils were excavated to a depth of 0.3 to 1.5 meters.

AOC 4

This 400 m^2 area of contamination was located at the junction of Furnace Creek and F-Line Roads, south of Building F-736. Soils were excavated to approximately 30 cm in depth.

AOC 5

This AOC was directly across the road from AOC 4 and significantly increased in size and scope beyond the original estimated area of 60 m^2 in area; ultimately encompassing a large portion of the F-737 sub-pad and surrounding soils. These soils were remediated and much of the pad structure razed to allow access for investigations and remediation.

AOC 6

AOC 6 was a narrow zone of contamination on both sides of Furnace Creek Road due west of Building G-726. The 150 m^2 area was remediated to depths of 15 to 30 cm.

AOC 7

AOC 7 was a small, isolated location off of the B-Line Road and east of Building B-913 in a lay down/parking area. The area was less than 5 m^2 and successfully remediated.

AOC 8

AOC 8 was identified as a narrow strip on the edge of the B Line road due east of Building B-912. The 20 m^2 area was remediated by excavating soil to a depth of 15 to 30 cm.

AOC 9

AOC 9 was another small area of contamination measuring approximately 5 m^2 in area, located at the edge of the driveway that enters the Building 821/825 complex, and remediated by shallow excavation.

AOC 10

AOC 10 was located adjacent to Building I-632. The approximately 5 m^2 area had contamination extending to 15 cm in depth that was excavated.

AOC 11

AOC 11 was identified as an area less than 10 m^2 in size within the former Building K-611 footprint. Contaminated soil was excavated. During the soil excavation, buried contaminated concrete was found and removed for disposal with the soil.

AOC 12

AOC 12 was located in a thin strip along the northern section of the site on Yard Office Road. The area was approximately 24 m^2 and was remediated by excavating the soil to a depth of 15 to 30 centimeters.

AOC 20

AOC 20 was identified at the southeastern most boundary of Class 3 survey unit C3 SU1 during the FSS activities. Similar to AOCs 6 through 9 and 12, this AOC was along the edge of a road, specifically at the intersection of East Avenue and Yard Office Road. A buried, former rail line also ran through the contaminated area. A second, related area was located several meters to the northeast on the Army Reserve property that borders the site. A new Class 1 survey unit was created for the FSS, C1 SU20. Both contaminated zones were remediated via excavation to depths of 15 to 45 cm.

AOC 21

AOC 21 consisted of a localized strip of contamination on the east edge of Furnace Creek Road near Building H-715. As in the other similar roadside AOCs, the area appeared to be caused by transportation spills. This area was originally in Class 2 survey units C2 SU34 and 33. The FSS sampling results identified contamination slightly above the $DCGL_W$. As a result, a new Class 1 survey unit was created, C1 SU21. The approximately 5 m^2 area was excavated to a depth of 30 centimeters.

Building B-911 Loading Dock

Sub-loading dock soils were identified as contaminated at various locations. Therefore, following surficial decontamination of the loading dock surface, the dock was deconstructed and contaminated soil excavated from the 200 m^2 area.

8.4.3 Class 1 Land Area FSS Surface Scans and Sample Results

The final remediation support survey (FRS) and/or FSS high density gamma surface scans of each of the 26 Class 1 land area survey units (including the B-911 sub-floor soils) identified several small areas of residual contamination that were investigated via judgmental sampling and analysis. Each location that exceeded the DCGLs was noted and additional excavation performed. The areas were then rescanned and post-remedial action judgmental samples collected and analyzed. Additional areas of contamination were identified in the following Class 1 survey units: C1 SU4, C1 SU5, C1 SU10, C1 SU16, C1 SU18, C1 SU23, and C1 SU24.

The initial characterization scan data for the Class 1 areas were provided in the characterization report (ORISE 2006c). FSS gamma surface scan results are shown in Figures A-28 through 48. As with all surface scans, field personnel relied on the audible output of the detector to identify residual contamination. The graphical representations of these data are provided for informational purposes. Survey units C1 SU18 and 21 are not represented in these figures. The proximity of the B-911 loading dock soils (C1 SU18) to the building prevented satellite reception for the GPS unit and for C1 SU21 the GPS unit did not capture the gamma count rate date.

The FSS systematic and judgmental sample results are provided in Table B-9. Summary data are provided below in Table 8-8. The results presented in this table represent 335 final FSS systematic and judgmental samples. Those judgmental sample results from locations that required additional remediation are not included in the summary.

Table 8-8: FSS Class 1 Radionuclide Concentrations Summary Results			
Area	**Th-232 (pCi/g)**	**U-238 (pCi/g)**	**Net SOR**
Class 1 Samples	0.10 to 4.2	0.05 to 2.06	-0.59 to 1.12

The DQA reports for individual Class 1 land area survey units are provided in Appendix F. The DQA reports include individual analytical results, both summary and graphical prospective and retrospective FSS planning information, and summary statistics. Figures A-49 through A-71 contain the maps for these survey units with soil sampling locations. H_0 was rejected for all survey units and the H_A accepted, thus demonstrating that the release criteria have been met. Additionally, individual sample results in excess of the $DCGL_W$ were evaluated relative to an applicable $DCGL_{EMC}$ and MARSSIM Equation 8-2 and these conditions were also met. Investigations performed for these situations and results are presented in Table B-3.

8.5 LAND AREA SURVEYS: CLASS 2

Surface scan and soil sampling results for the 76 Class 2 land area survey units (including the B-912 sub-floor soils) are described below. The initial scoping survey Class 2 areas are shown on Figure A-2. The FSS Class 2 survey units are illustrated on Figure A-3.

8.5.1 Class 2 Land Area Scoping/Characterization/FSS Surface Scans and Sample Results

Scoping survey gamma scans of the land areas that had initially been designated as Class 2 also concentrated on transport routes across the site and the land areas surrounding buildings, or the building footprints if demolished, that had historically stored licensed material. These scans identified numerous locations of elevated gamma radiation considered to be audibly distinguishable

from background. These locations were associated with the railroad tracks—two on the southeast, one to the northeast side, and two on the north of the site—on the edge of Yard Office Road near East Avenue, on East Avenue, and the former K Line. Each area was investigated further during the scoping survey with follow-up surface scans and judgmental sampling.

The characterization surface scan density expanded on the limited scoping survey coverage within all Class 2 areas, to medium density scans (30 to 50%) with additional focus on suspect areas or areas similar from a historical use perspective to suspect areas. The characterization survey also independently identified the suspect areas noted above. Additionally, with the expanded scope of the characterization survey surface scans, other anomalies were identified. These anomalies included small isolated locations on the west side of Patrol Bridge Road and due east of the C-1134 and C-1133 pads, the former Building K-611 footprint, the B Line road east of Building B-913, and on the rail spur bank next to Building I-632. There were numerous other areas that were investigated and determined to be false positives due to the presence of railroad ballast, ores, cinders, debris, and other similar type materials that locally impacted the ambient gamma radiation background. These gamma scan results were provided in the characterization survey report (ORISE 2006c). Figure A-92 contains consolidated figures of the characterization gamma scan results that were originally provided in the characterization report. The gamma scan area coverage and sensitivities met or exceeded FSS data quality requirements.

The above investigated locations that were determined to contain elevated Th-232 or U-238 concentrations that were not associated with railroad ballast or other non-licensed ores that were ubiquitous around the site, were reclassified for the FSS as Class 1 survey units. Additionally, the FSS soil sampling of Class 2 survey units identified one area that required reclassification, the previously discussed AOC 21 (Section 8.4.2).

The FSS systematic and judgmental sample results are provided in Table B-9. Summary data are provided below in Table 8-9. The results presented in this table represent final (after any additional remediation) 791 FSS systematic and judgmental samples.

Table 8-9: FSS Class 2 Radionuclide Concentrations Summary Results			
Area	**Th-232 (pCi/g)**	**U-238 (pCi/g)**	**Net SOR[a]**
Class 2 Samples	0.03 to 3.37	0.01 to 3.60	-0.64 to 1.37

[a]Excludes corrections for railroad ballast backgrounds.

Nine individual soil samples had a net SOR that exceeded unity. Each location was investigated and a cause determined. In most cases, the concentrations were the result of the presence of railroad ballast within the sample. Table B-3 provides the results of these investigations.

The DQA reports for individual Class 2 land area survey units are provided in Appendix F. The DQA reports include individual analytical results, both summary and graphical prospective and retrospective FSS planning information, and summary statistics. Appendix B contains the maps for these survey units with soil sampling locations. H_0 was rejected for all survey units and the H_A accepted, thus demonstrating that the release criteria have been met.

8.6 LAND AREA SURVEYS: CLASS 3

Surface scan and soil sampling results for six Class 1 land area survey units are described below. The initial scoping survey Class 3 areas are shown on Figure A-2. The individual FSS survey units are shown on Figure A-3.

8.6.1 Class 3 Land Area Scoping/Characterization/FSS Surface Scans and Sample Results

Scoping survey gamma scans of the land areas that had initially been designated as Class 3 focused primarily on transport routes and the perimeters of pads/buildings. There were no areas of elevated direct radiation identified.

The subsequent characterization survey significantly expanded the scan coverage and identified several locations of direct gamma radiation distinguishable from background for further investigation. These investigations, which included follow-up gamma scans and judgmental sampling when indicated, identified three anomalies within the Class 3 area designated as Survey Unit 4, one of which was also investigated during the scoping survey and was associated with railroad ballast. The remaining two locations were found within a former tin storage yard. The

investigations of the elevated direct gamma radiation at the first location identified a small rock within the accompanying soil that when segregated was found to be the source of the anomaly. The second location was due to the presence of a large sand pile. The remaining scans and re-investigations identified several additional areas for judgmental sampling. One of these locations, FSS sample # 140 which was collected from the side of a berm in Class 3 survey unit C3 SU3, was found to have a net SOR in excess of unity. The investigation included additional high density gamma scans of the west side of the berm, where the original random FSS sample had been collected, and the collection of two additional judgmental samples. The determination made based on the results of the scans and the evaluation of the judgmental sample results was that the FSS random sample was not indicative of contamination. Rather, the concentrations noted were consistent with background variability of the Th-232 similar to that noted in railroad ballast and the associated U-238 analytical error of the original FSS sample exceeding 50% of the result.

The characterization gamma scan coverage and soil sampling approach satisfied the FSS requirements. The FSS systematic and judgmental sample results are provided in Table B-10. Summary data are provided below in Table 8-10. The results presented in this table represent 64 final FSS systematic and judgmental samples.

Table 8-10: FSS Class 3 Radionuclide Concentrations Summary Results

Area	Th-232 (pCi/g)	U-238 (pCi/g)	Net SOR
Class 3 Samples	0.21 to 1.98	0.12 to 2.60	-0.53 to 1.21

The DQA reports for individual Class 3 land area survey units are provided in Appendix F. The DQA reports include individual analytical results, both summary and graphical prospective and retrospective FSS planning information, and summary statistics. Appendix A contains the maps for these survey units with soil sampling locations. H_0 was rejected for all survey units and the H_A accepted, thus demonstrating that the release criteria have been met.

9.0 SUMMARY AND CONCLUSIONS

ORISE conducted extensive scoping, characterization, and final status surveys of land areas and structures at the DNSC's Curtis Bay Depot located in Curtis Bay, Maryland in multiple phases during 2005, 2006 and 2007. Surveys were designed and implemented in accordance with the guidance provided in MARSSIM for 227 land area and structural survey units.

World Environmental, Inc. successfully remediated contaminated soils, including the removal of all radioactively contaminated buried debris from a former radioactive waste disposal pit. There were six contaminated pads/buildings that required remediation ranging from spot decontamination to removal of large volumes of contaminated structural materials and underlying soils.

The results of the FSS showed that all surface activity levels on structural survey units and residual Th-232 and U-238 concentrations, including the sum-of-ratios, were well below the NRC's basic dose limit of 25 mrem/y plus ALARA. The collective mean sum-of-ratio for the net Th-232 and U-238 concentrations in all FSS soil samples was 0.12 which equates to approximately 3 mrem/y. These results demonstrate that the Curtis Bay Depot in Curtis Bay, Maryland satisfies the requirements for unrestricted release from the DNSC's NRC license.

APPENDIX A:

FIGURES

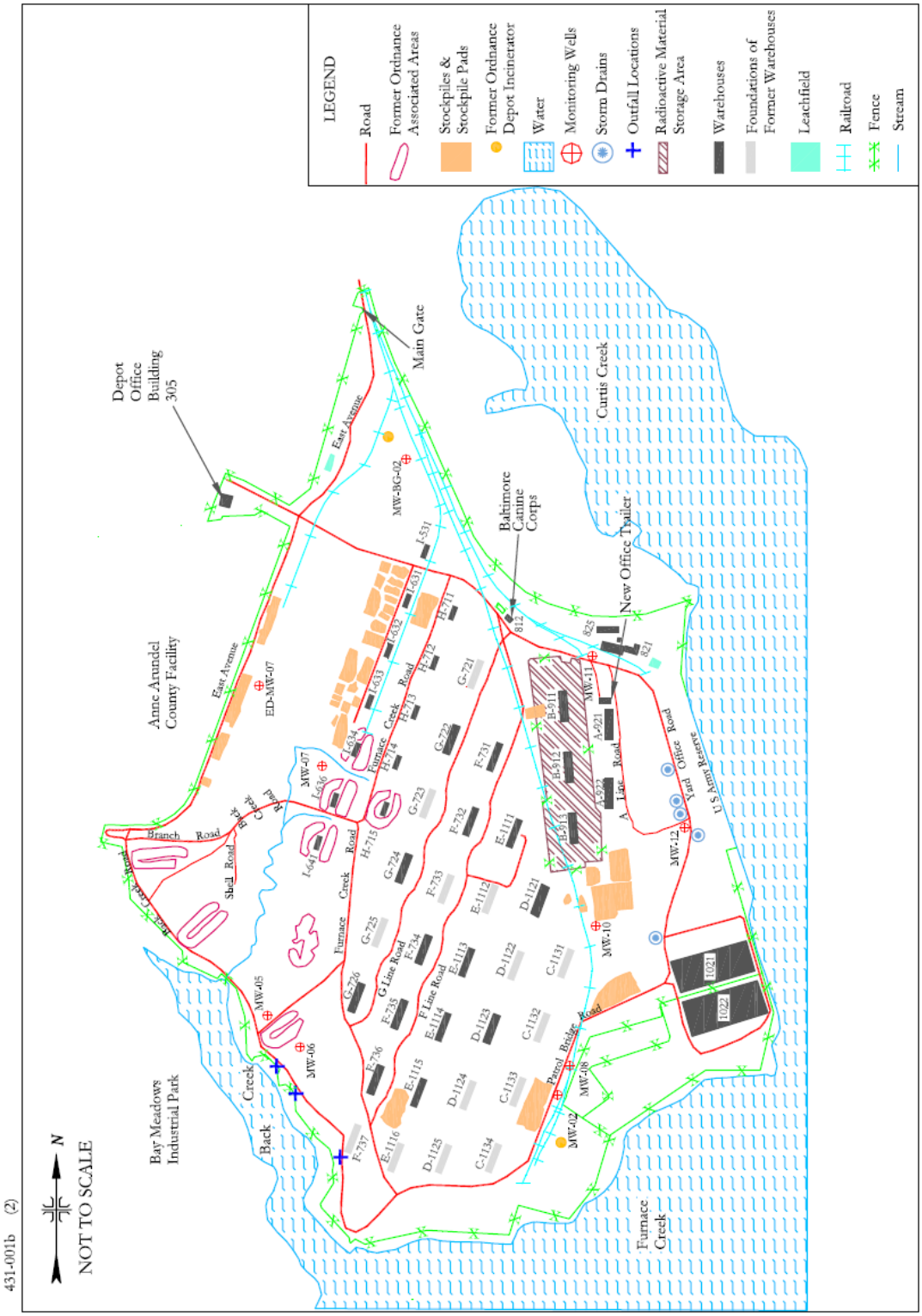


Figure A-1: Curtis Bay Depot, Curtis Bay, Maryland—Plot Plan

Figure A-2: Curtis Bay Depot—Contaminated Buildings and Soil AOCs

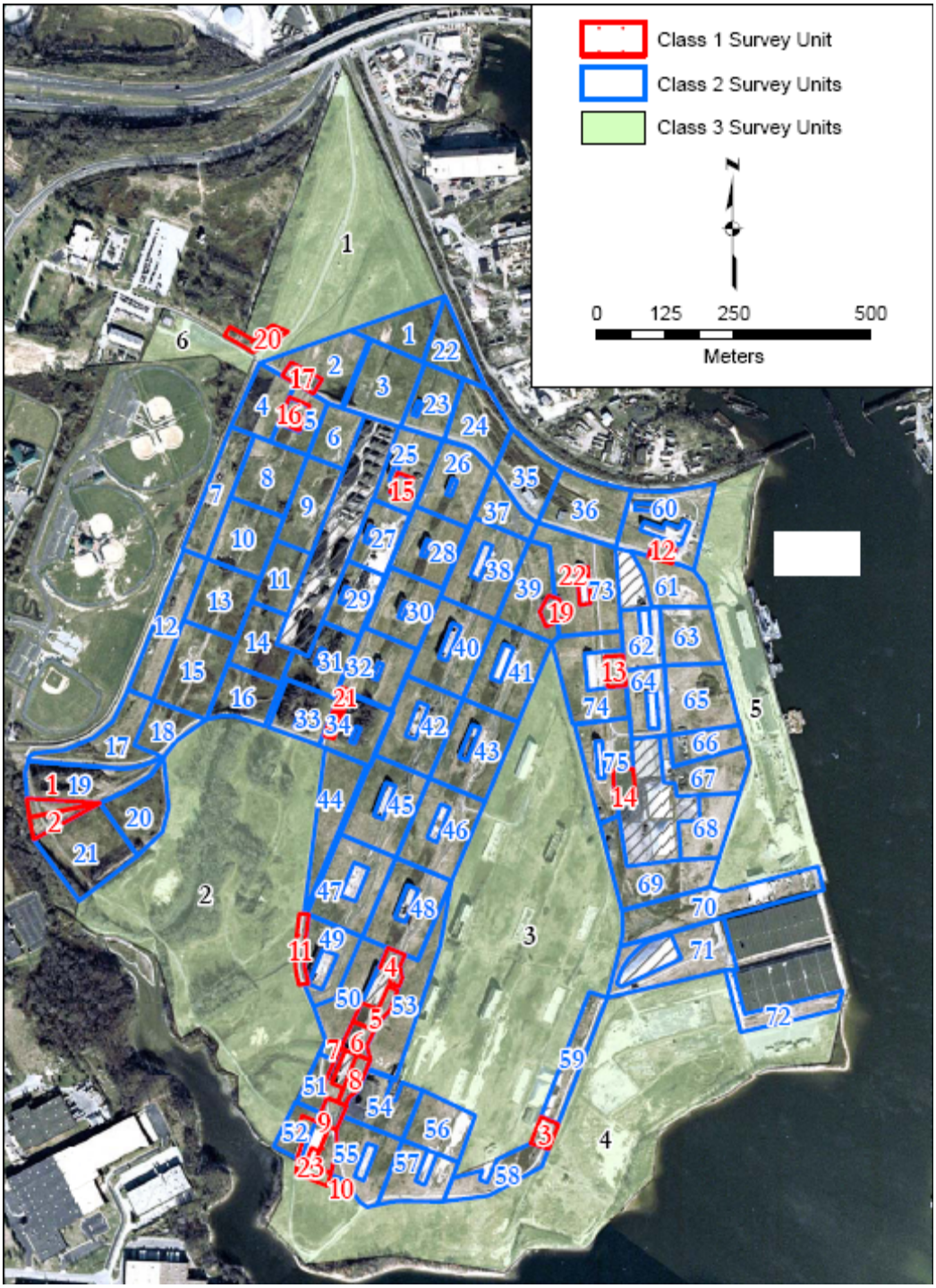


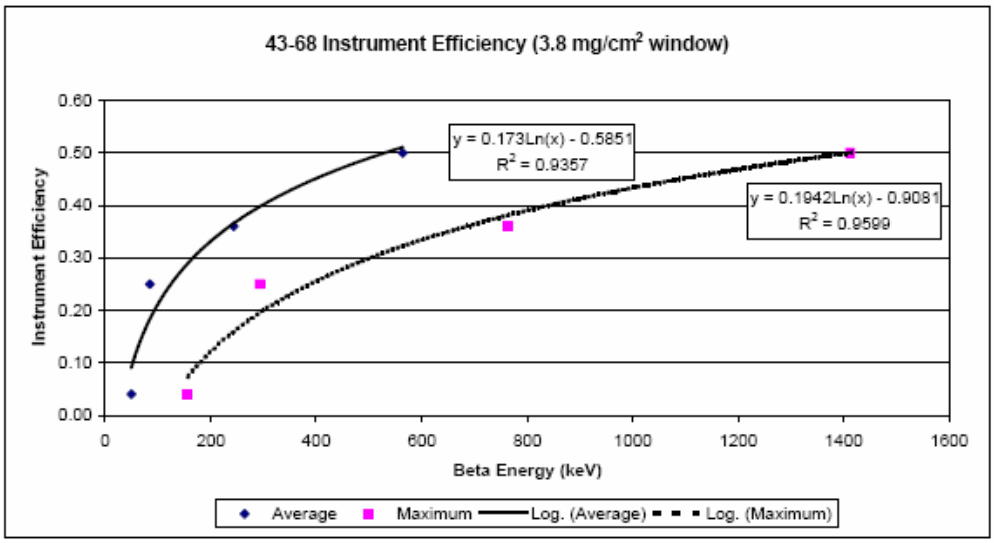
Figure A-3: Curtis Bay Depot—FSS Survey Units (#Survey Unit ID)

Th-232 Decay Series Gas Proportional Detector Calibration Worksheet

Task Number:	431	Curtis Bay Depot Characterization	Data Entry

Instrument:	2221 #16	
Detector:	43-68 #16	(3.8 mg/cm^2 window)
Cal. BKG Avg (cpm):	372	

Calibration Data			
Radionuclide	**Average Beta Energy (keV)[1]**	**Maximum Beta Energy (keV)[1]**	**Instrument Efficiency**
C-14	49.74	156.5	0.04
Tc-99	84.6	293.5	0.25
Tl-204	244.03	763.4	0.36
Sr/Y-90	564.75	1413.05	0.50



Th-232 Decay Series Calculation[2]					
Radionuclide	**Average Beta Energy (keV)[1]**	**Fraction**	**Instrument Efficiency[3]**	**Surface Efficiency**	**Weighted Efficiency**
Th-232	alpha	1	0.00	0.25	0.00
Ra-228	7.2	1	0.00	0.00	0.00
Ac-228	377	0.93	0.44	0.50	0.20
Th-228	alpha	1	0.00	0.25	0.00
Ra-224	alpha	1	0.00	0.25	0.00
Rn-220	alpha	0.75	0.00	0.25	0.00
Po-216	alpha	0.75	0.00	0.25	0.00
Pb-212	102	0.751	0.22	0.25	0.04
Bi-212	770	0.307	0.56	0.50	0.09
Bi-212	alpha	0.27	0.00	0.25	0.00
Po-212	alpha	0.48	0.00	0.25	0.00
Tl-208	557	0.268	0.51	0.50	0.07
				Total Efficiency:	0.40
				Static MDC (dpm/100 cm^2):	184

[1] http://atom.kaeri.re.kr/ton/
[2] Refer to Table 14.2 of *Decommissioning Health Physics: A Handbook for MARSSIM Users*. E W Abelquist, 2001. Fractions adjusted to account for Rn-220 loss.
[3] Calculated using exponential curve shown above for average beta energy

Figure A-4: Example Instrument Calibration Efficiency Determination

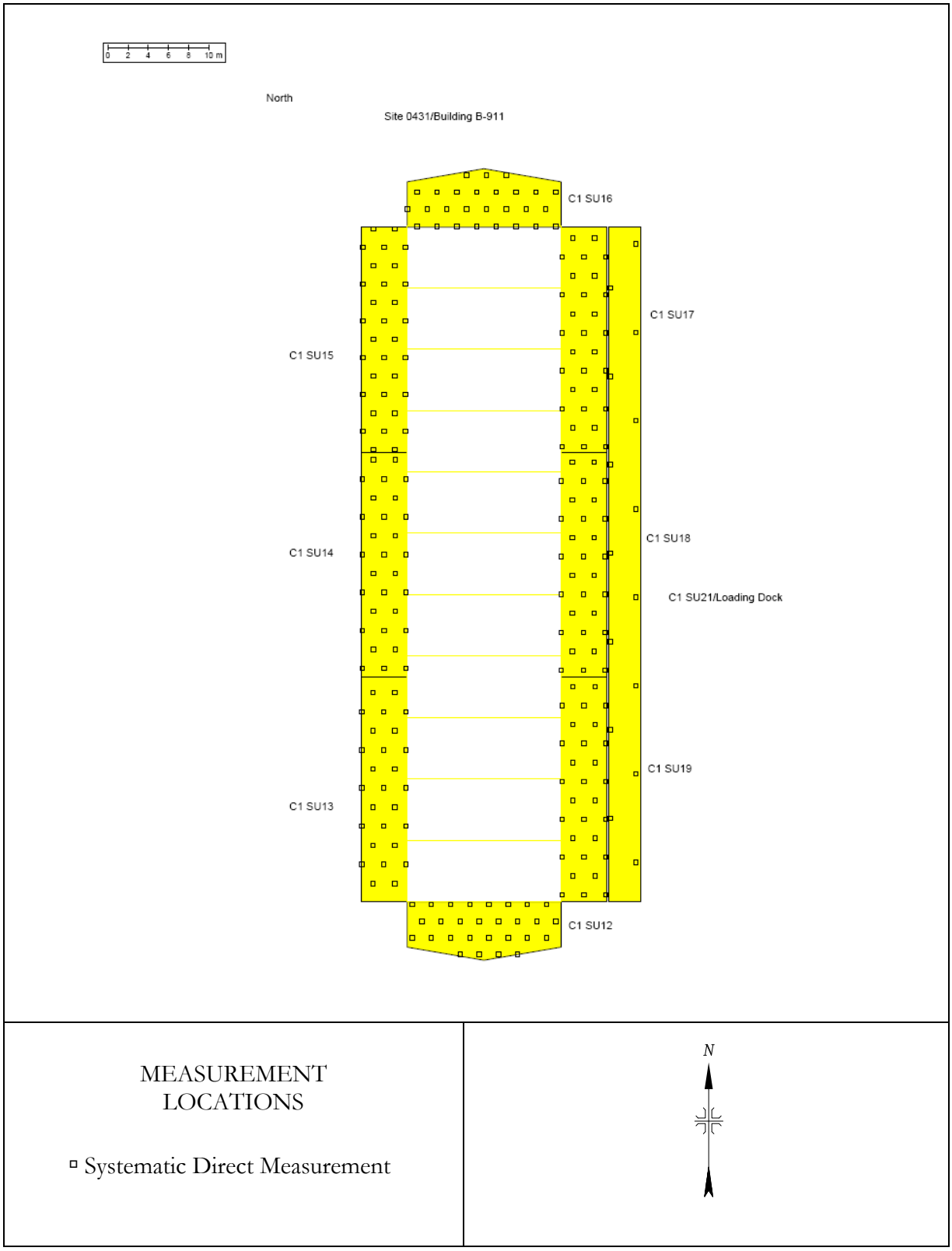
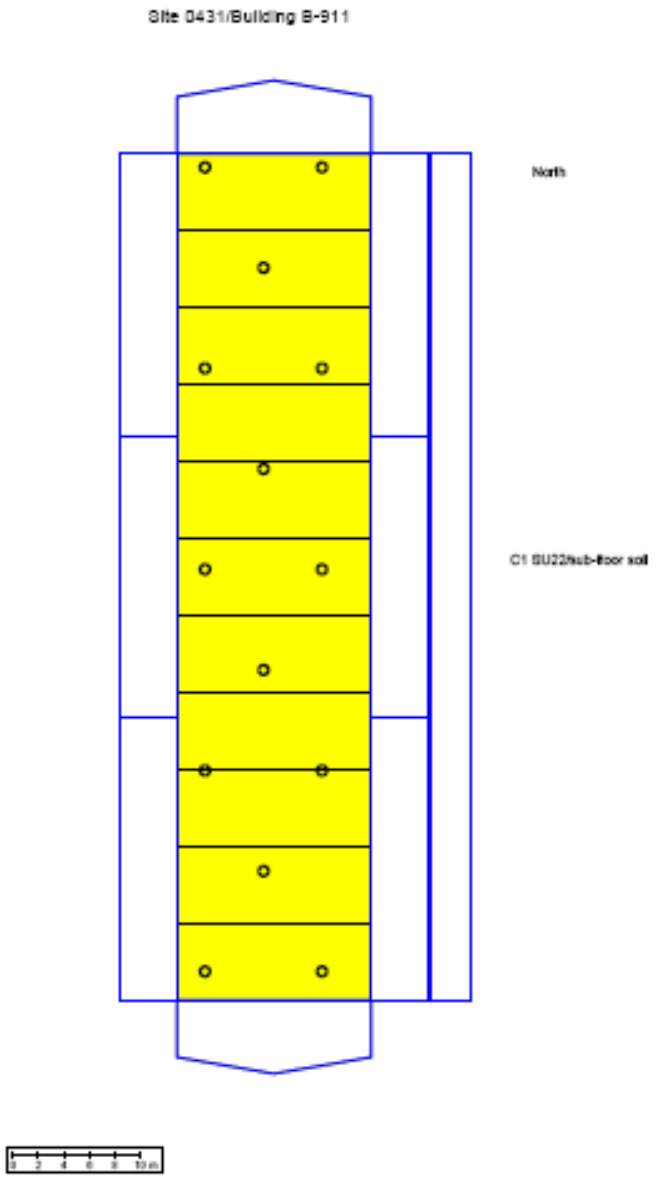


Figure A-5: Building B-911 Walls and Loading Dock—FSS Survey Units and Direct Measurement Locations

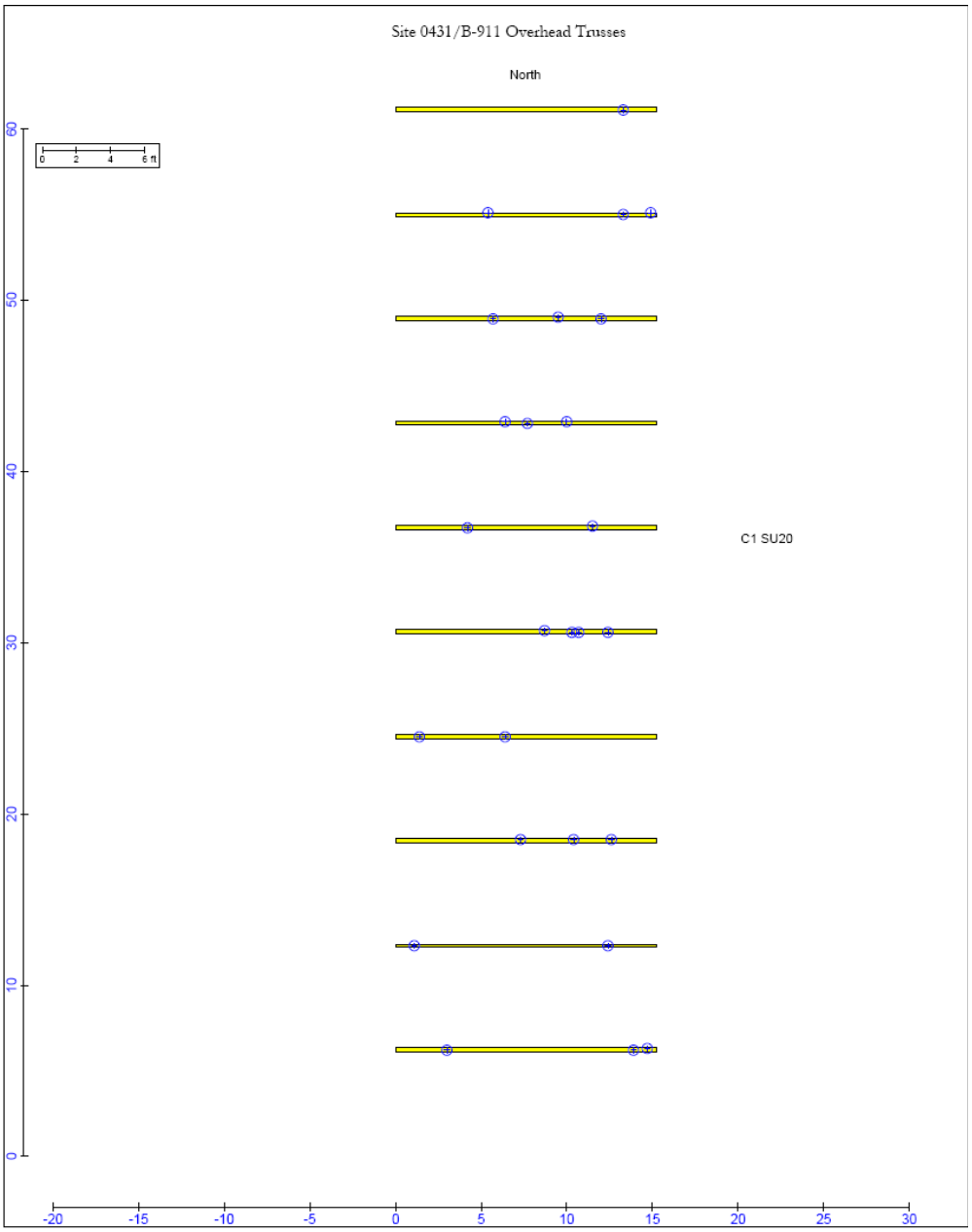


SAMPLING LOCATIONS

o Systematic Soil

N

Figure A-6: Building B-911 (C1 SU22) Sub-floor Soils—Soil Sampling Locations

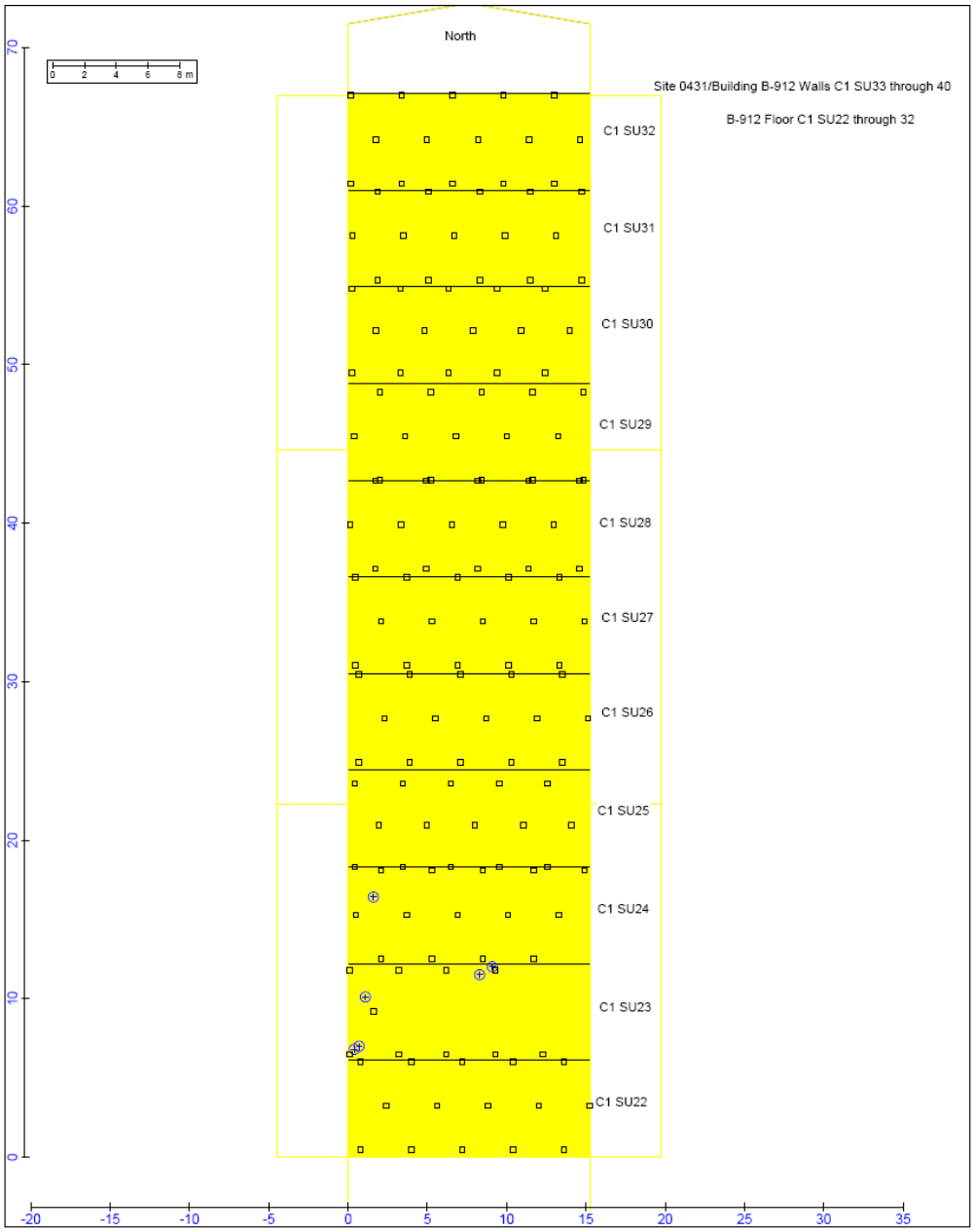


MEASUREMENT LOCATIONS

⊗ Random Direct Measurement

N

Figure A-7: Building B-911 Trusses (C1 SU20)—FSS Survey Unit and Direct Measurement Locations

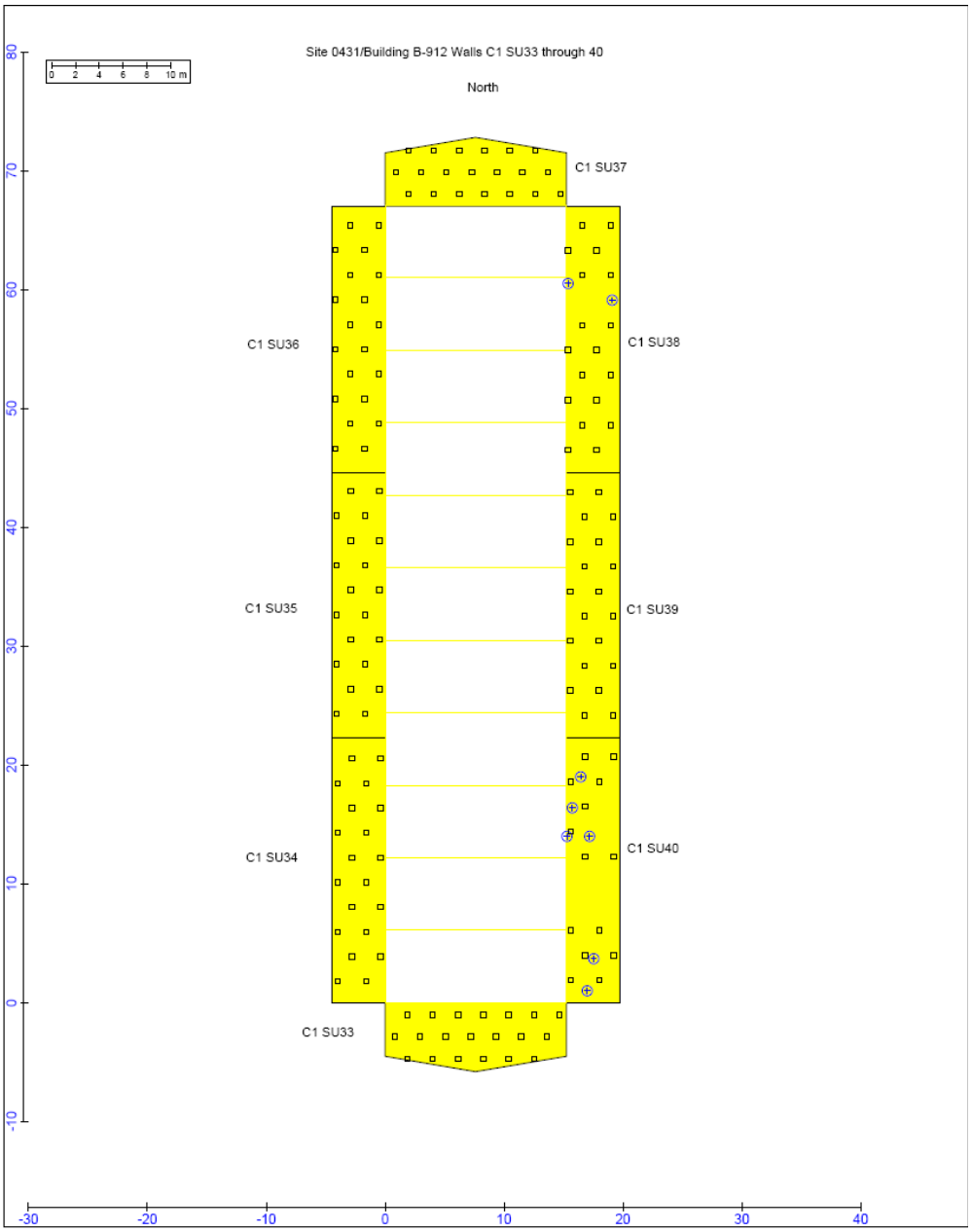


MEASUREMENT LOCATIONS

▫ Systematic Direct Measurement
⊗ Random Direct Measurement

N

Figure A-8: Building B-912 Floor (C1 SU22 through 32)—FSS Survey Units and Direct Measurement Locations

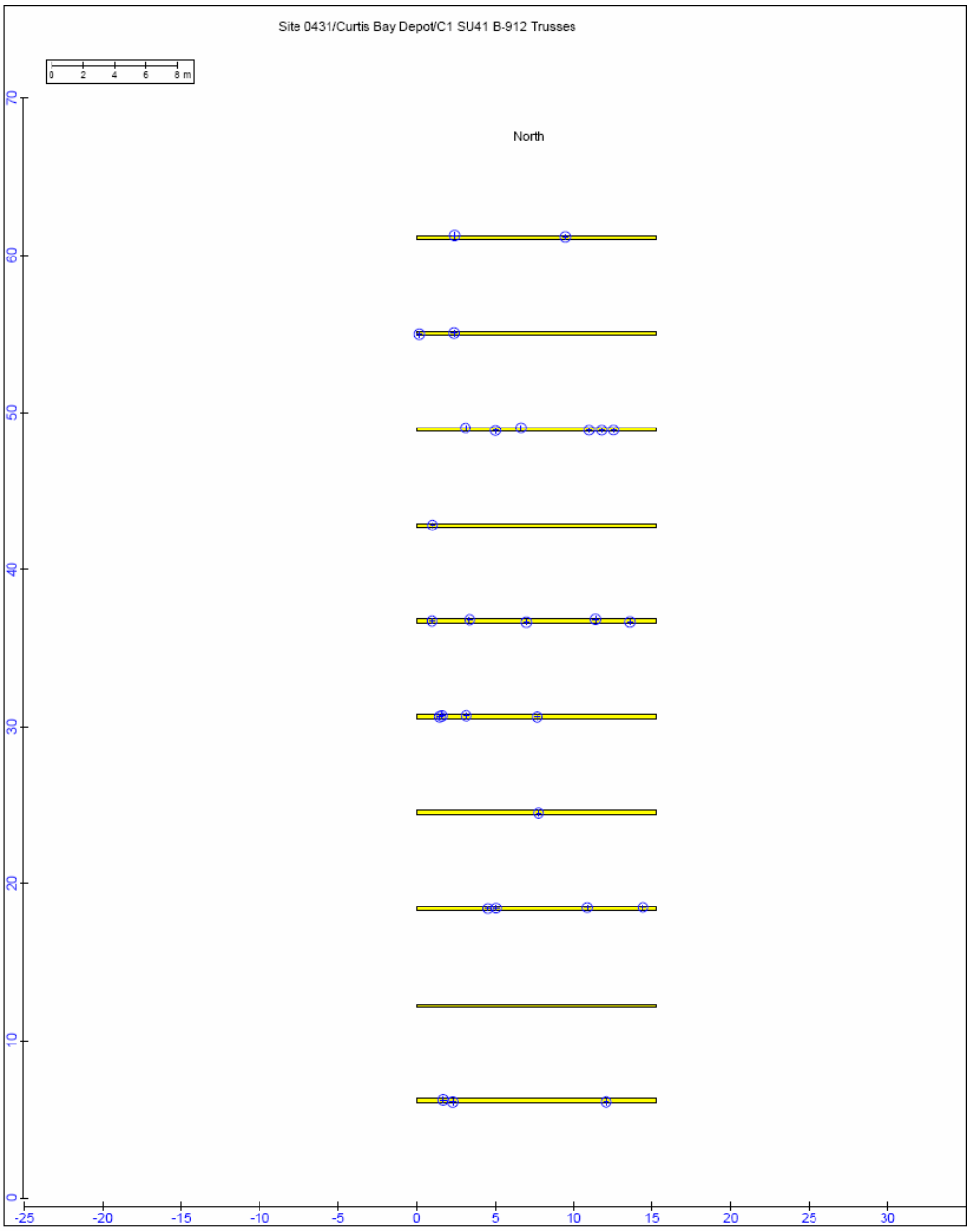


MEASUREMENT LOCATIONS

▫ Systematic Direct Measurement
⊗ Random Direct Measurement

N

Figure A-9: Building B-912 Walls (C1 SU33 through 40)—FSS Survey Units and Direct Measurement Locations

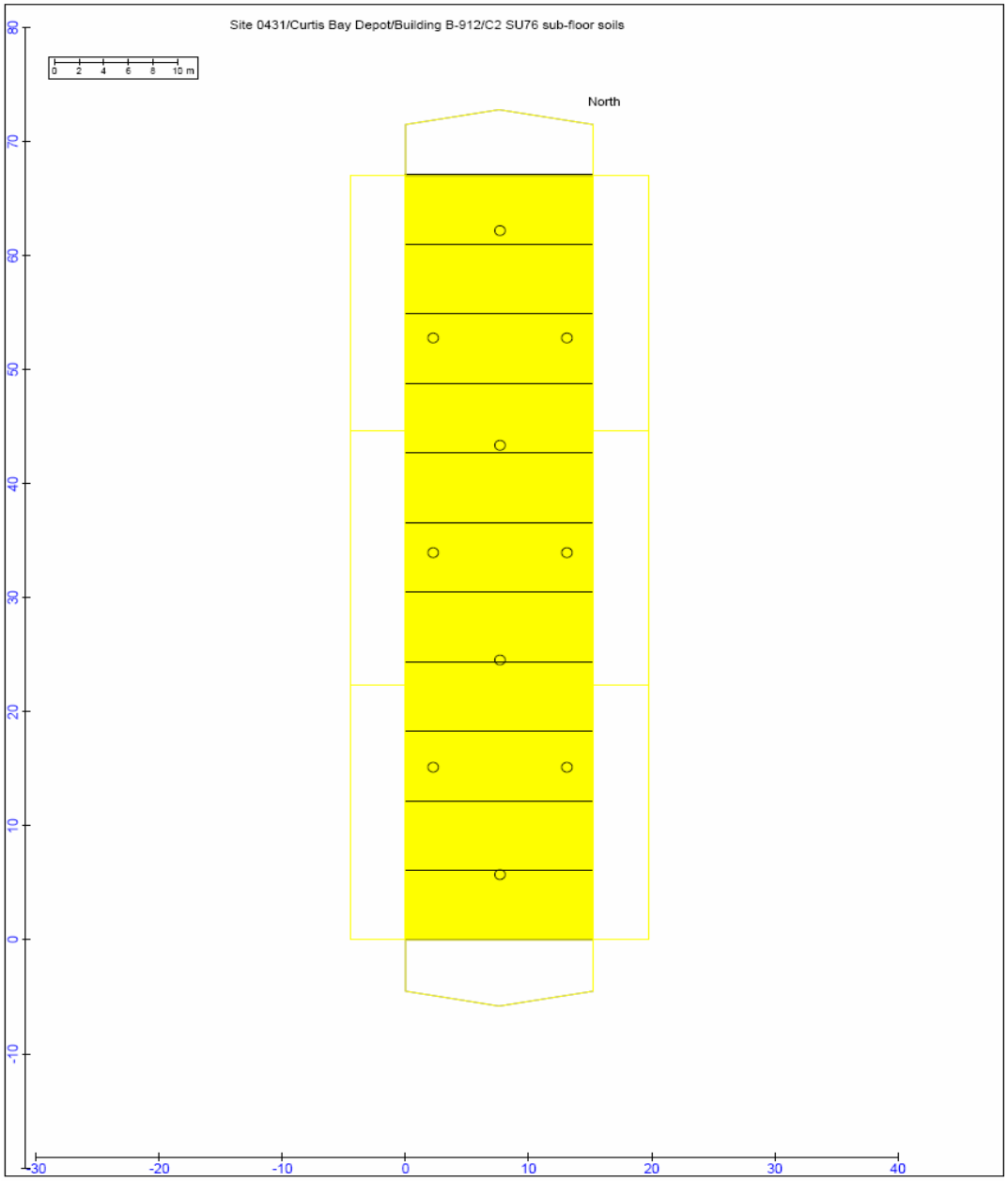


MEASUREMENT LOCATIONS

⊗ Random Direct Measurement

N

Figure A-10: Building B-912 Trusses (C1 SU41)—FSS Survey Unit and Direct Measurement Locations

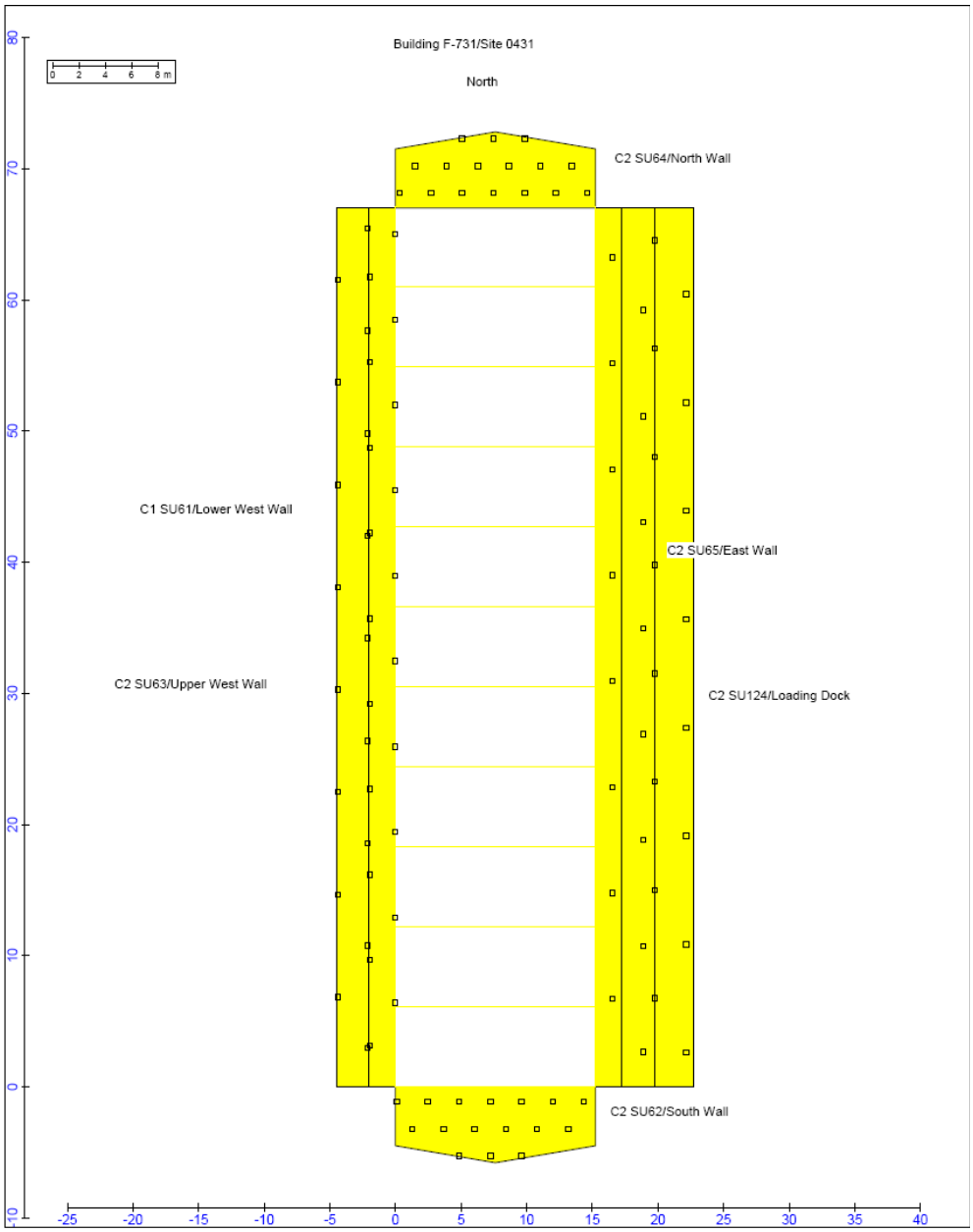


SAMPLING LOCATIONS

o Systematic Soil

N

Figure A-11: Building B-912 Sub-Floor Soil (C2 SU76)—FSS Survey Unit and Soil Sampling Locations

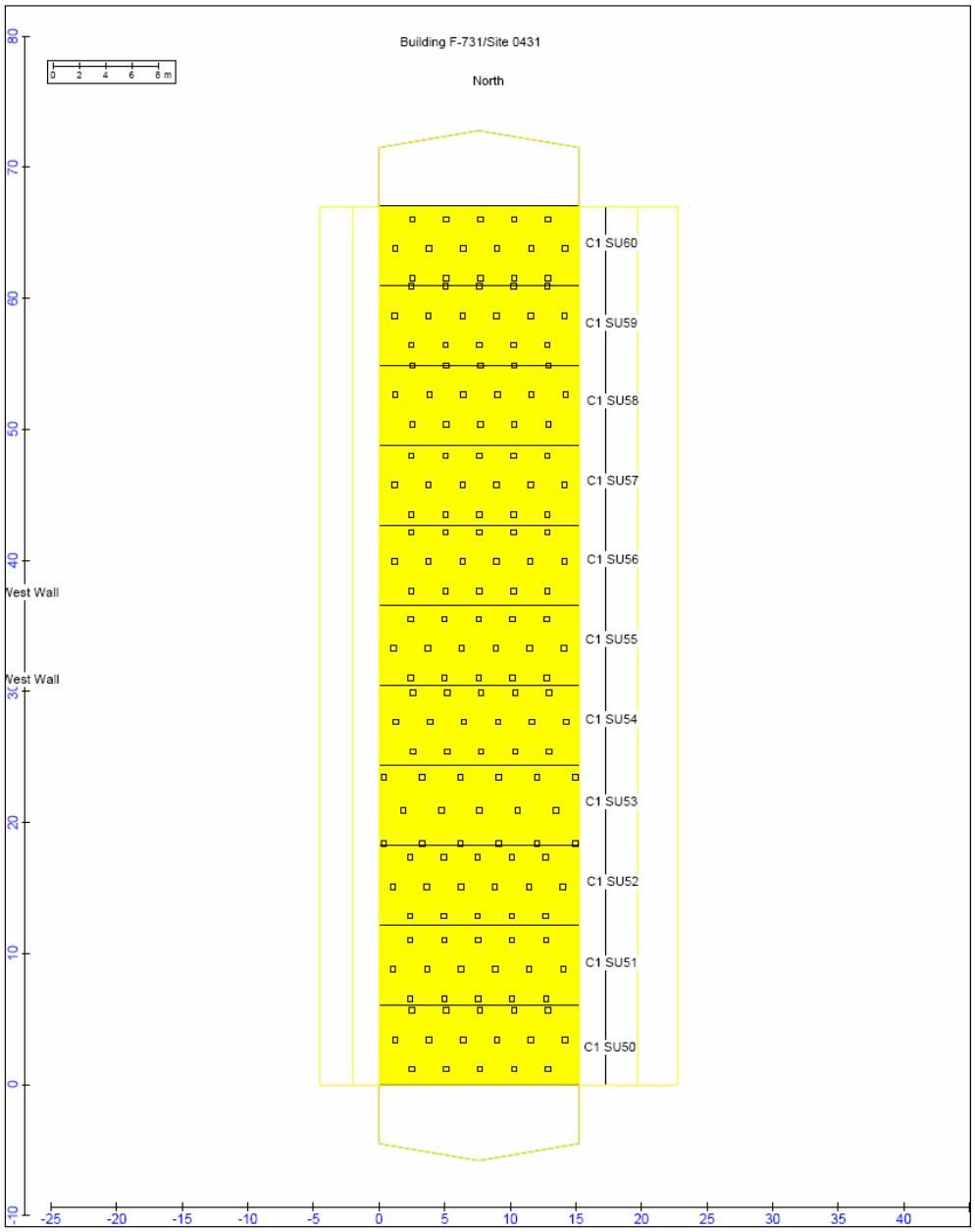


MEASUREMENT LOCATIONS

▫ Systematic Direct Measurement

N

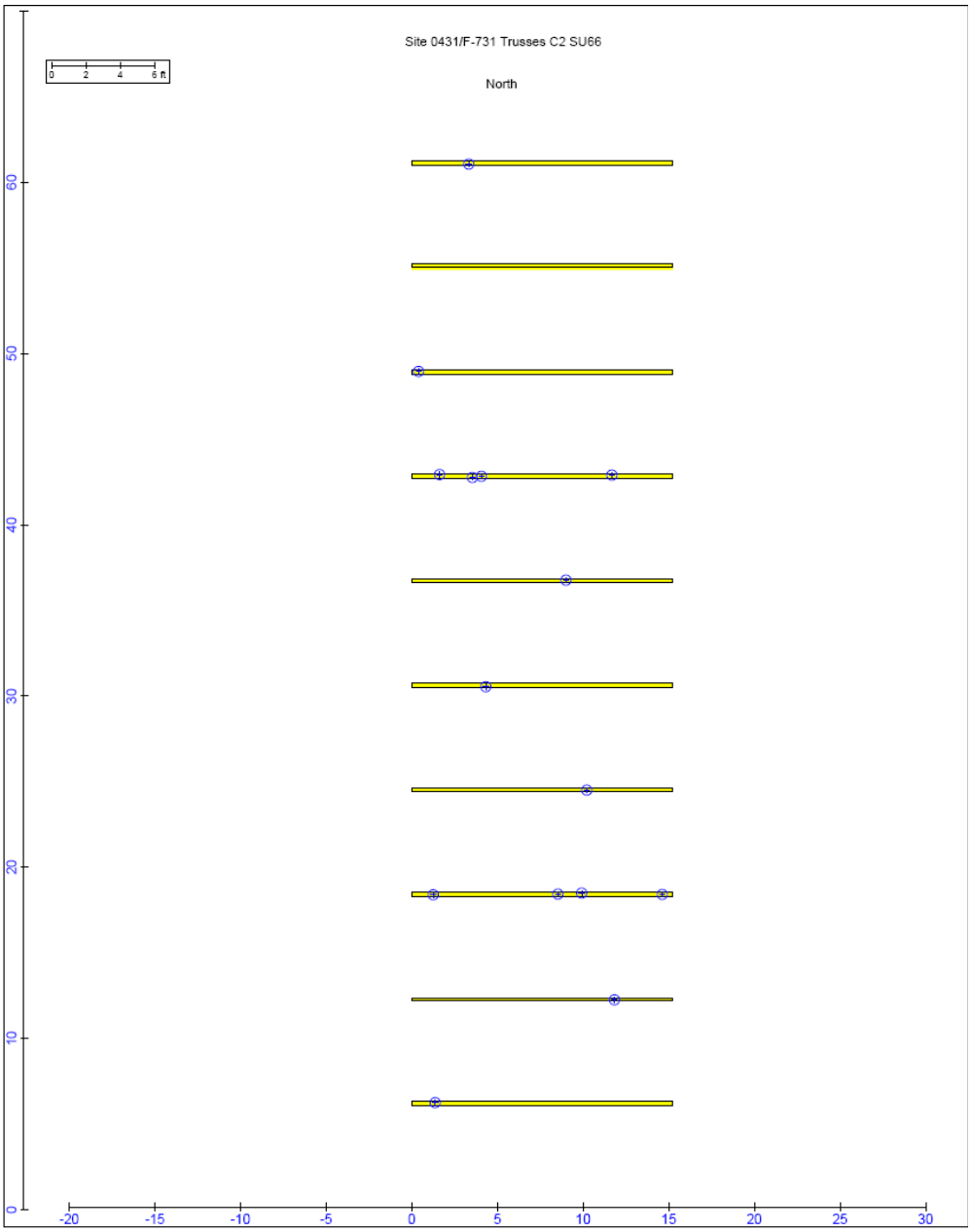
Figure A-12: Building F-731 Walls and Loading Dock (C1 SU61, C2 SU62 through SU65 and SU124)—FSS Survey Units and Direct Measurement Locations



MEASUREMENT LOCATIONS

▫ Systematic Direct Measurement

Figure A-13: Building F-731 Floor (C1 SU50 through 60)—FSS Survey Units and Direct Measurement Locations

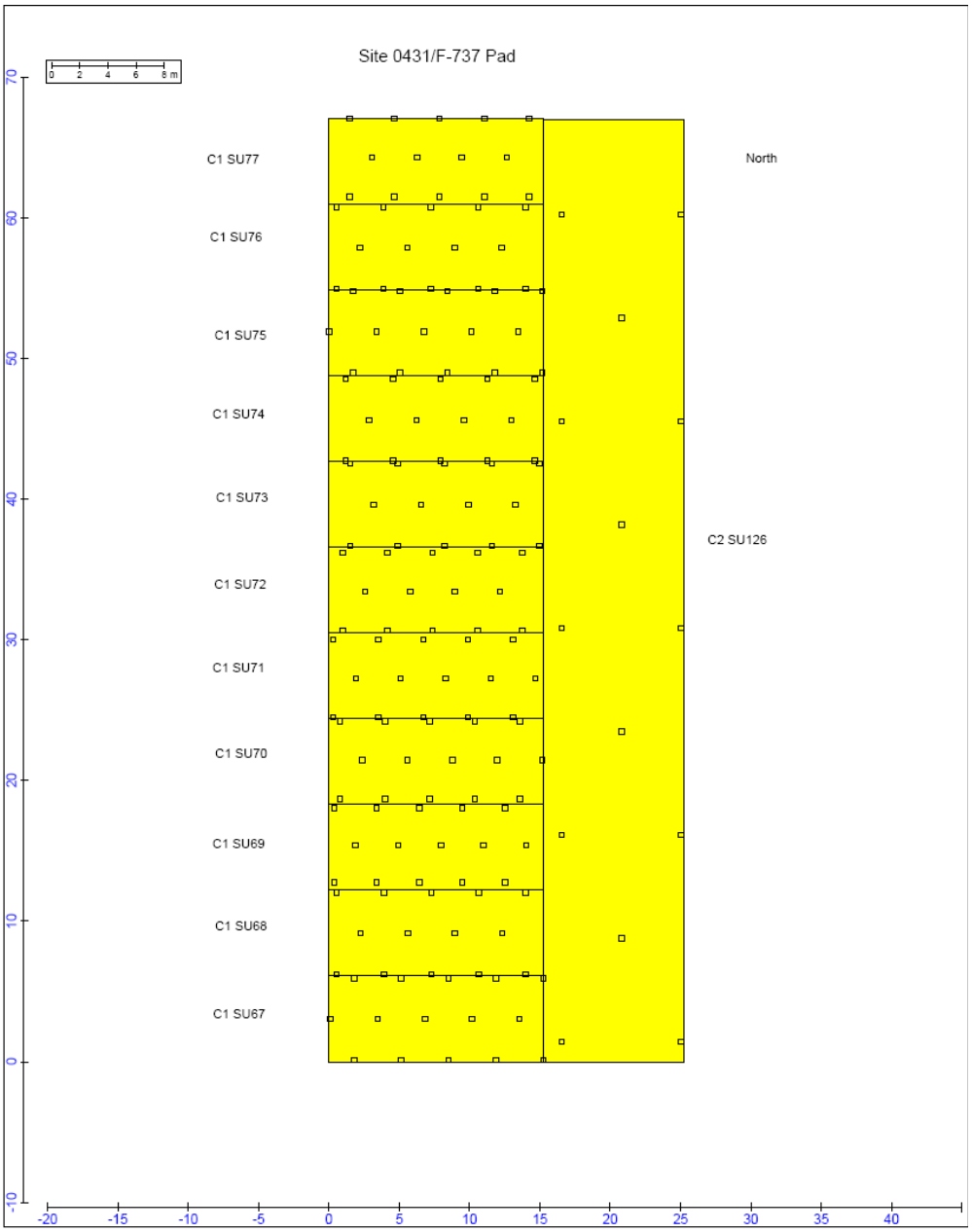


MEASUREMENT LOCATIONS

⊗ Random Direct Measurement

N

Figure A-14: Building F-731 Trusses (C2 SU66)—FSS Survey Unit and Direct Measurement Locations

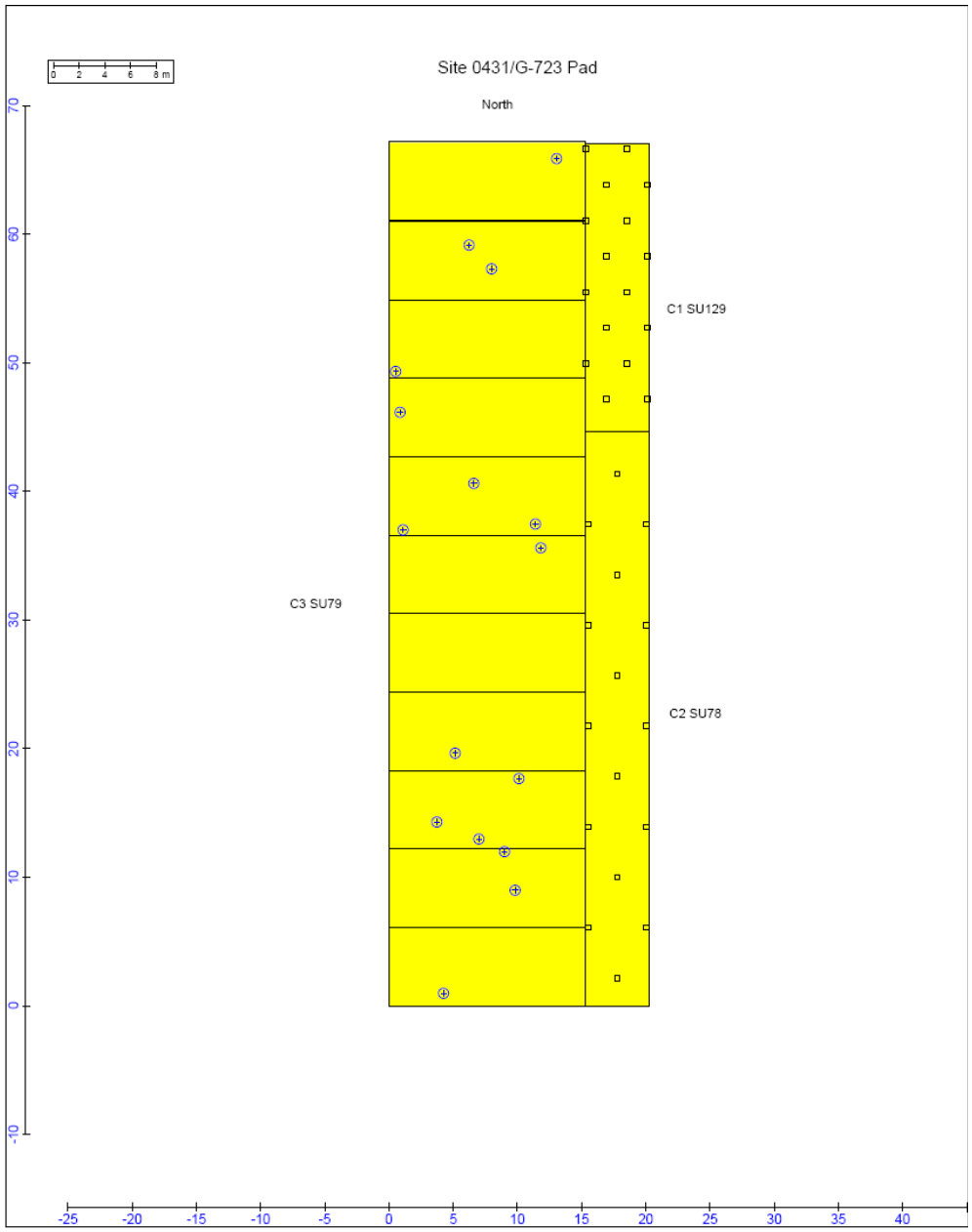


MEASUREMENT LOCATIONS

▫ Systematic Direct Measurement

N

Figure A-15: Building F-737 Pad and Loading Dock (C1 SU67 through 77 and C2 SU126) — FSS Survey Units and Direct Measurement Locations

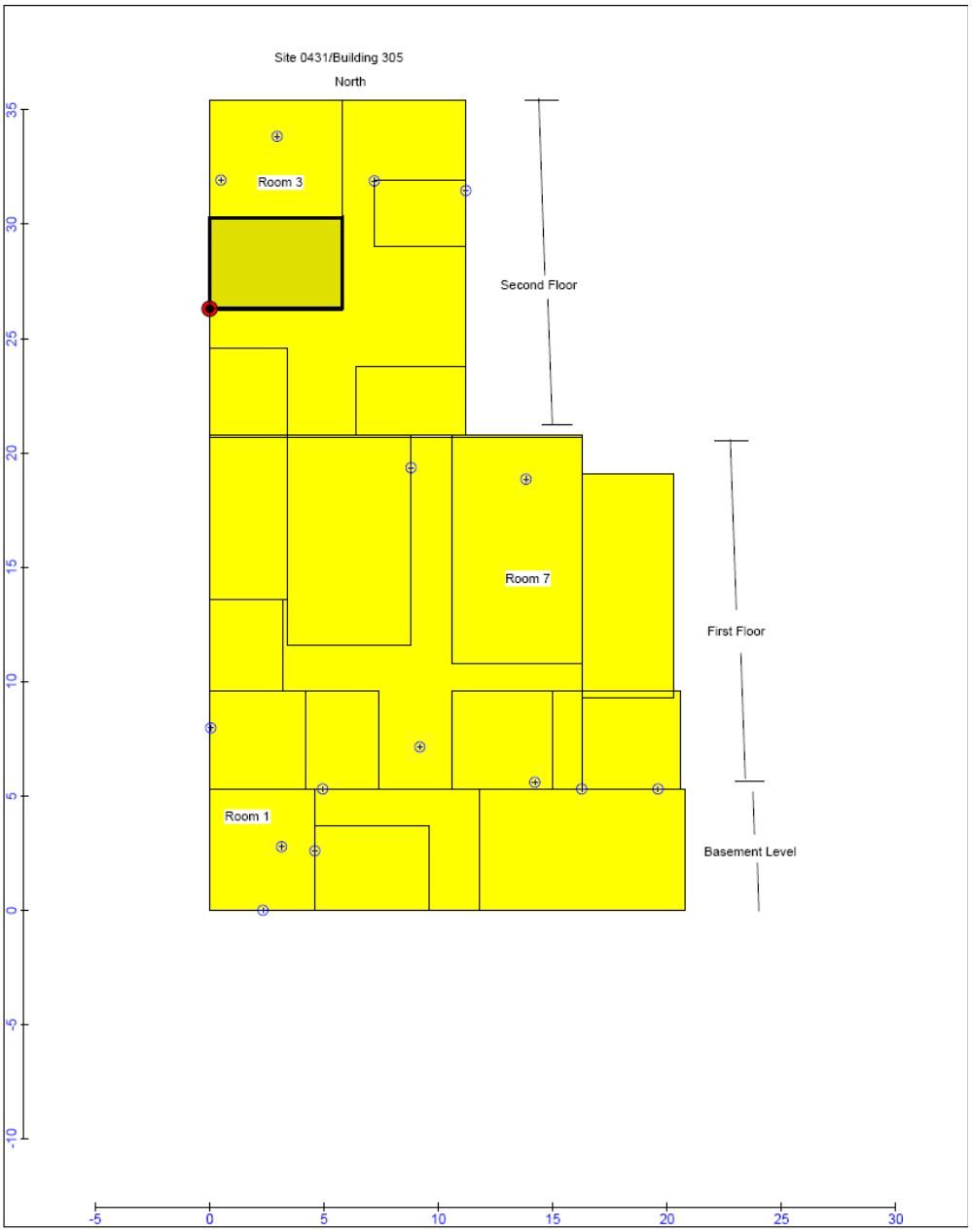


MEASUREMENT LOCATIONS

▫ Systematic Direct Measurement
⊗ Random Direct Measurement

N

Figure A-16: Building G-723 Pad and Loading Dock (C3 SU79, C2 SU78, C1SU129)—FSS Survey Units and Direct Measurement Locations



MEASUREMENT LOCATIONS

⊗ Random Direct Measurement

N

Figure A-17: Building 305 (C3 SU127)—FSS Survey Units and Direct Measurement Locations

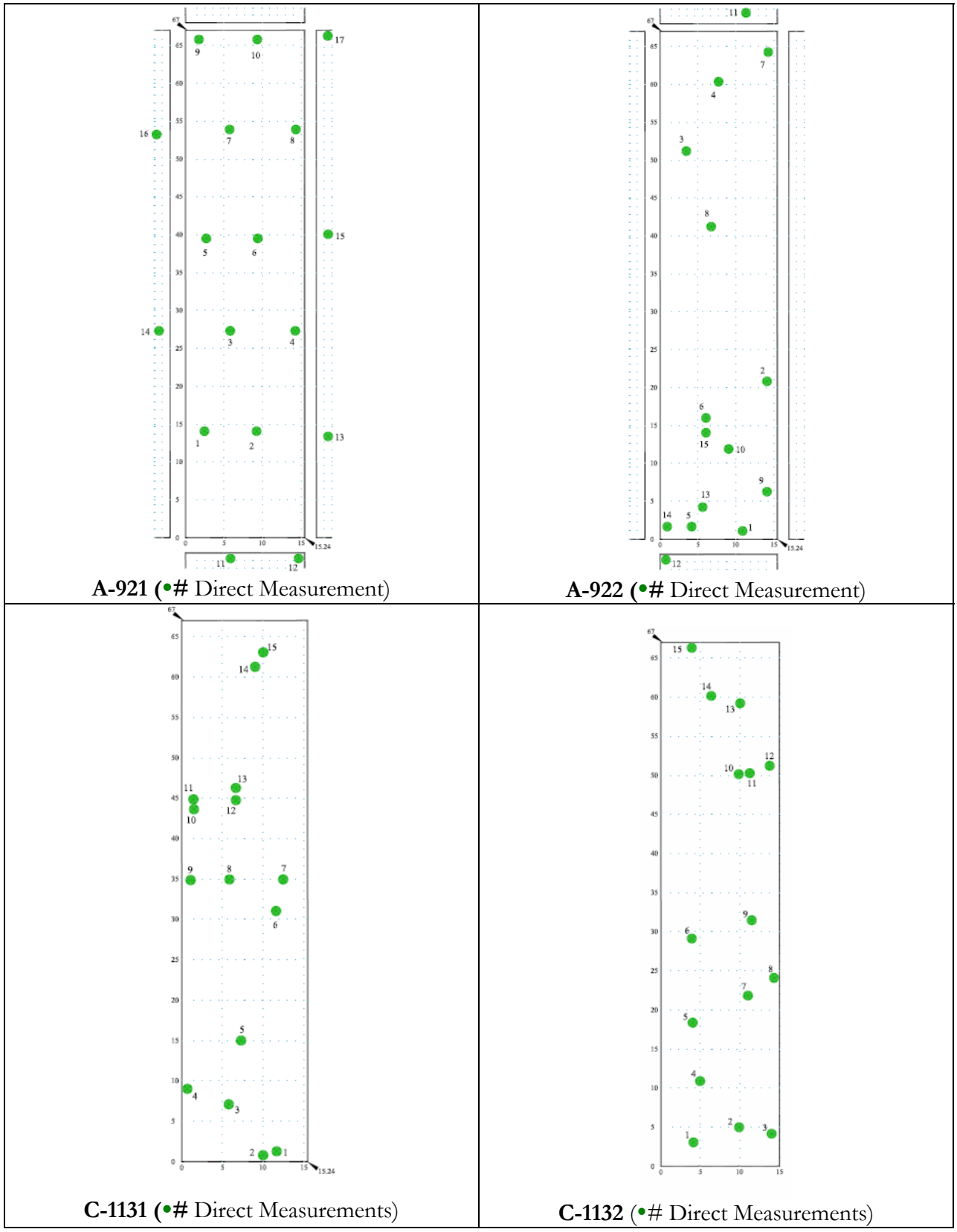
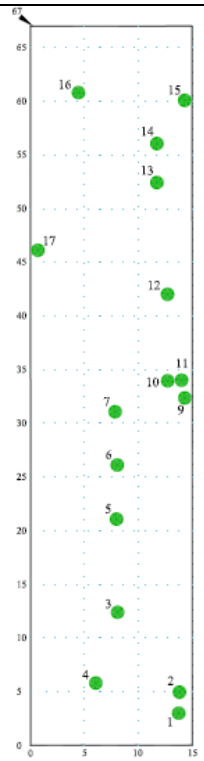
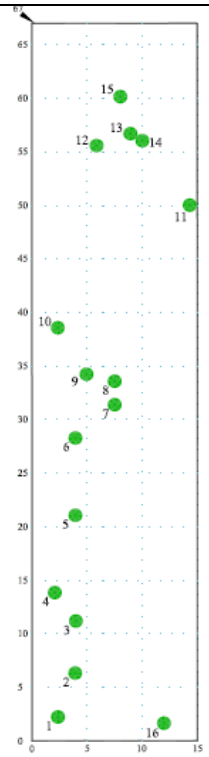


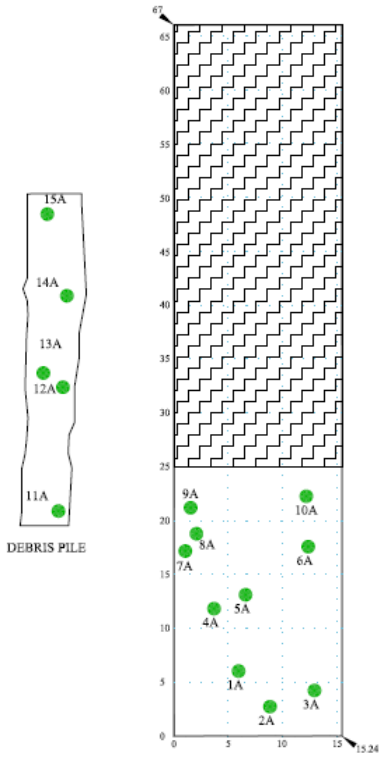
Figure A-18: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



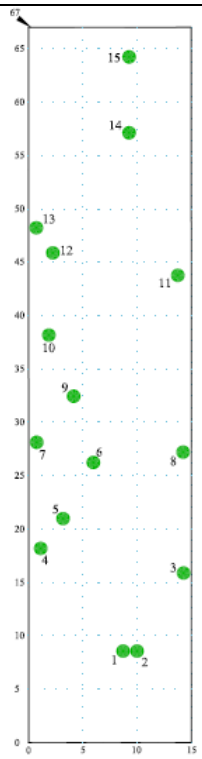
C-1133 (•# Direct Measurements)



C-1134 (•# Direct Measurements)

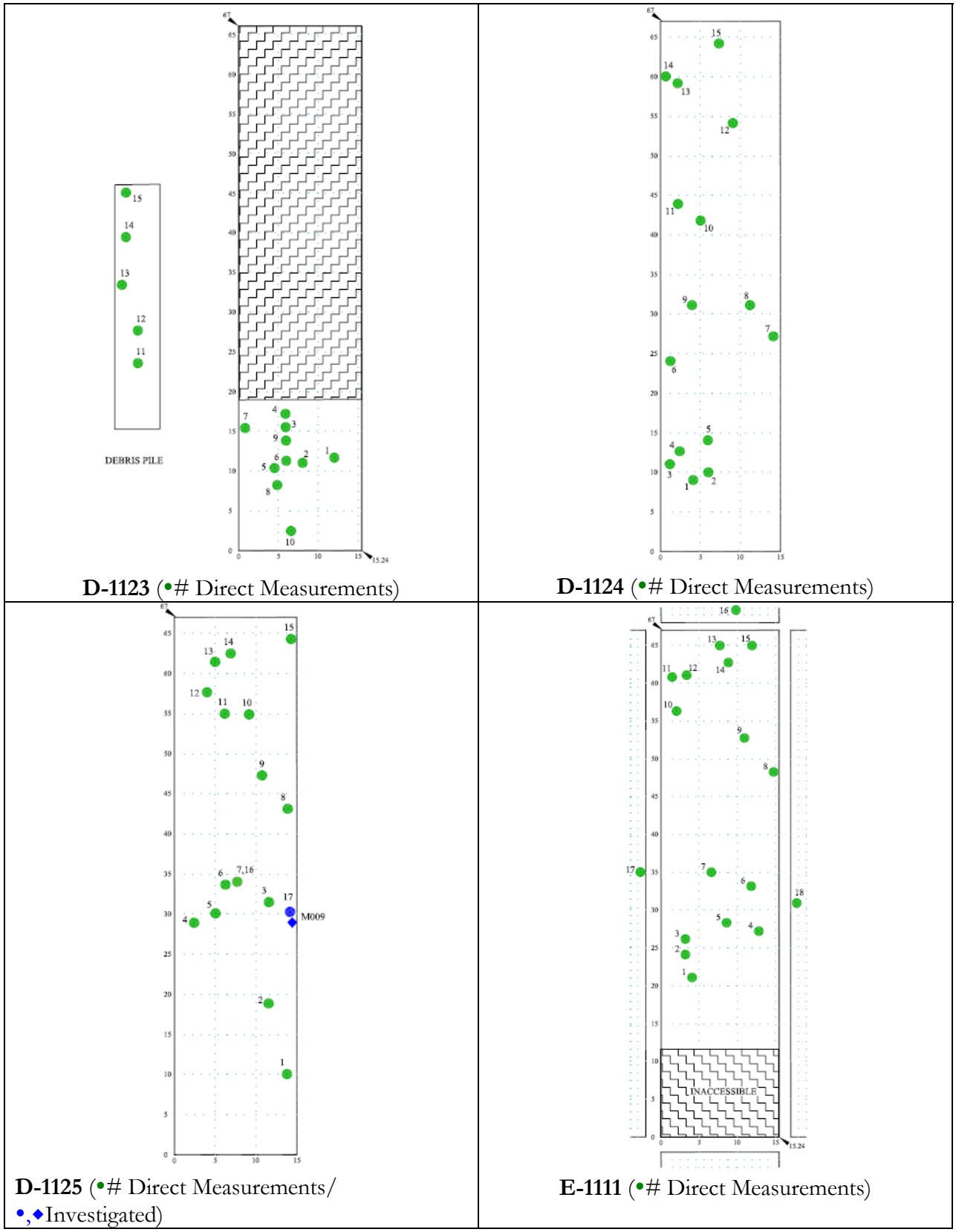


D-1121 (•# Direct Measurements)



D-1122 (•# Direct Measurements)

Figure A-19: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



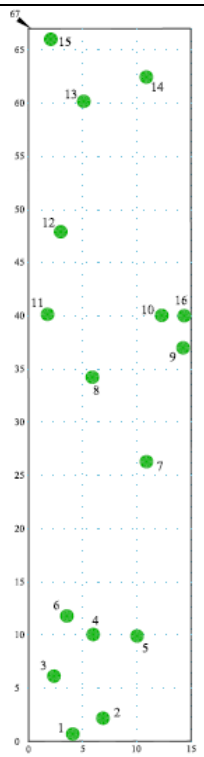
D-1123 (•# Direct Measurements)

D-1124 (•# Direct Measurements)

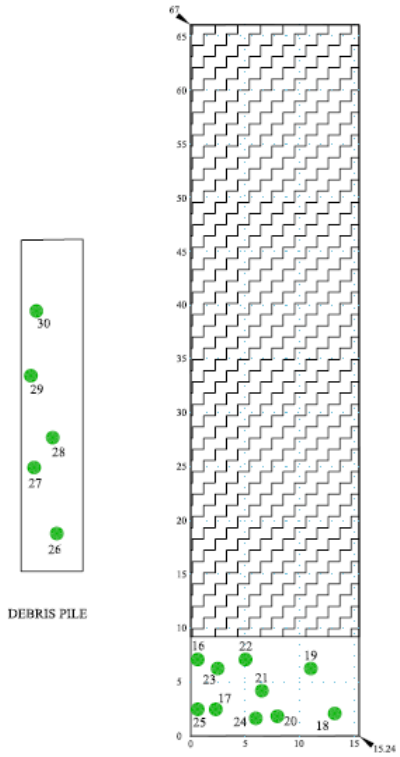
D-1125 (•# Direct Measurements/ •,◆Investigated)

E-1111 (•# Direct Measurements)

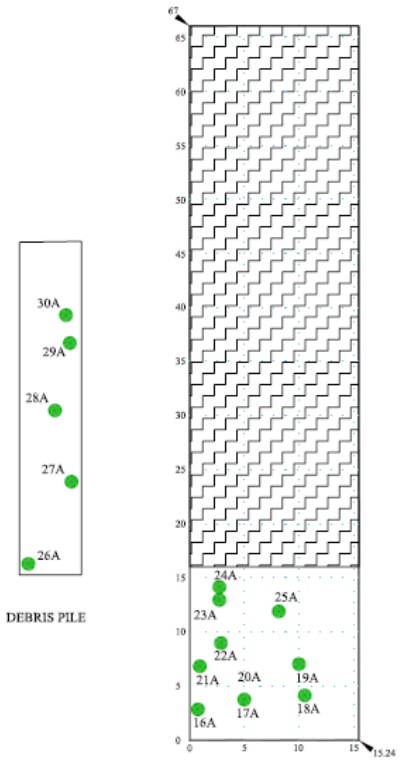
Figure A-20: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



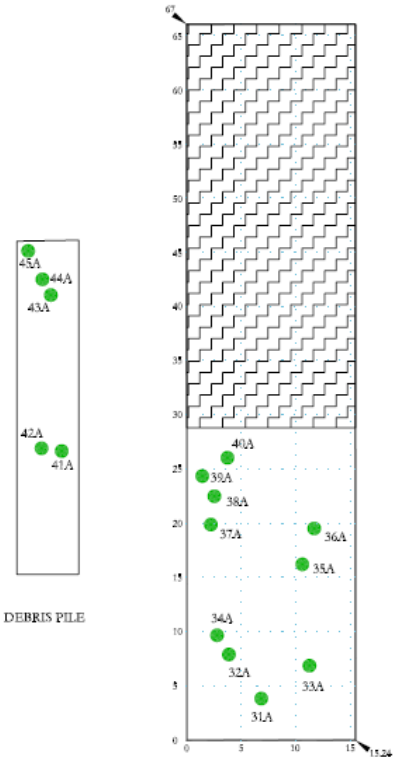
E-1112 (•# Direct Measurements)



E-1113 (•# Direct Measurements)

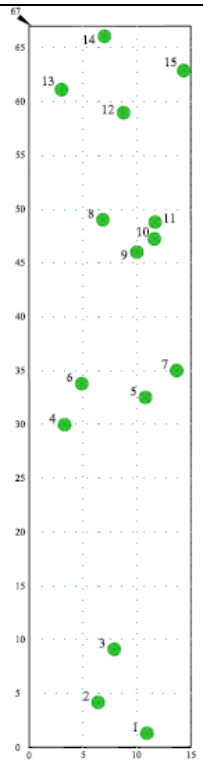


E-1114 (•# Direct Measurements)

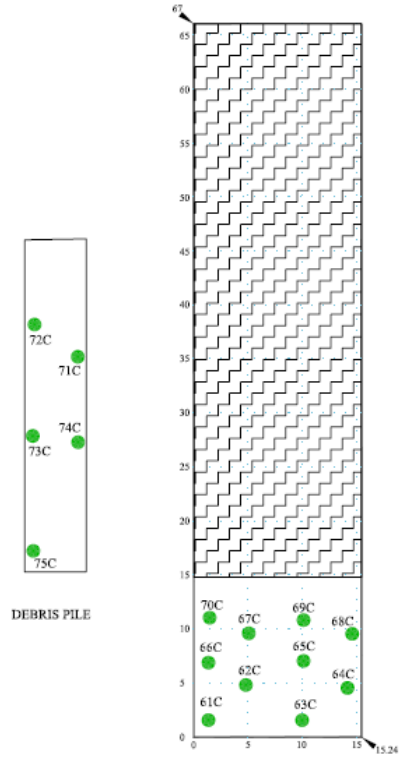


E-1115 (•# Direct Measurements)

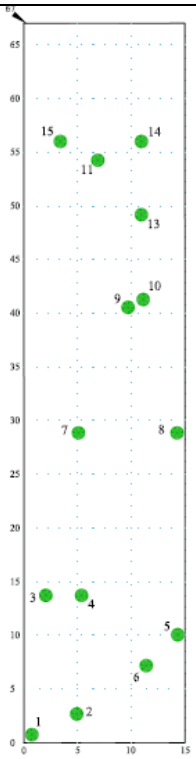
Figure A-21: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



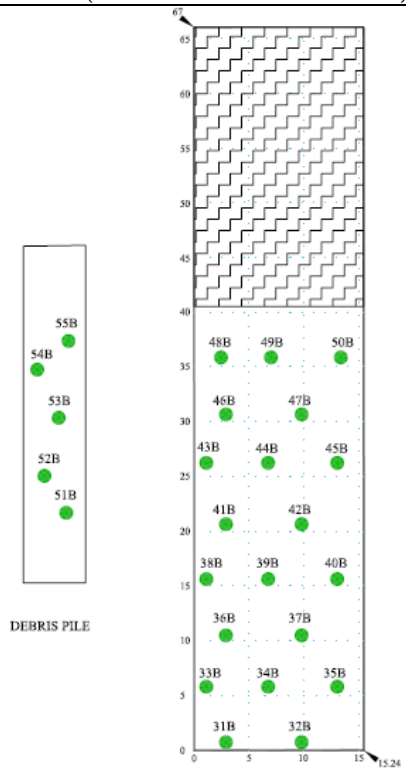
E-1116 (•# Direct Measurements)



F-732 (•# Direct Measurements)



F-733 (•# Direct Measurements)



F-734 (•# Direct Measurements)

Figure A-22: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations

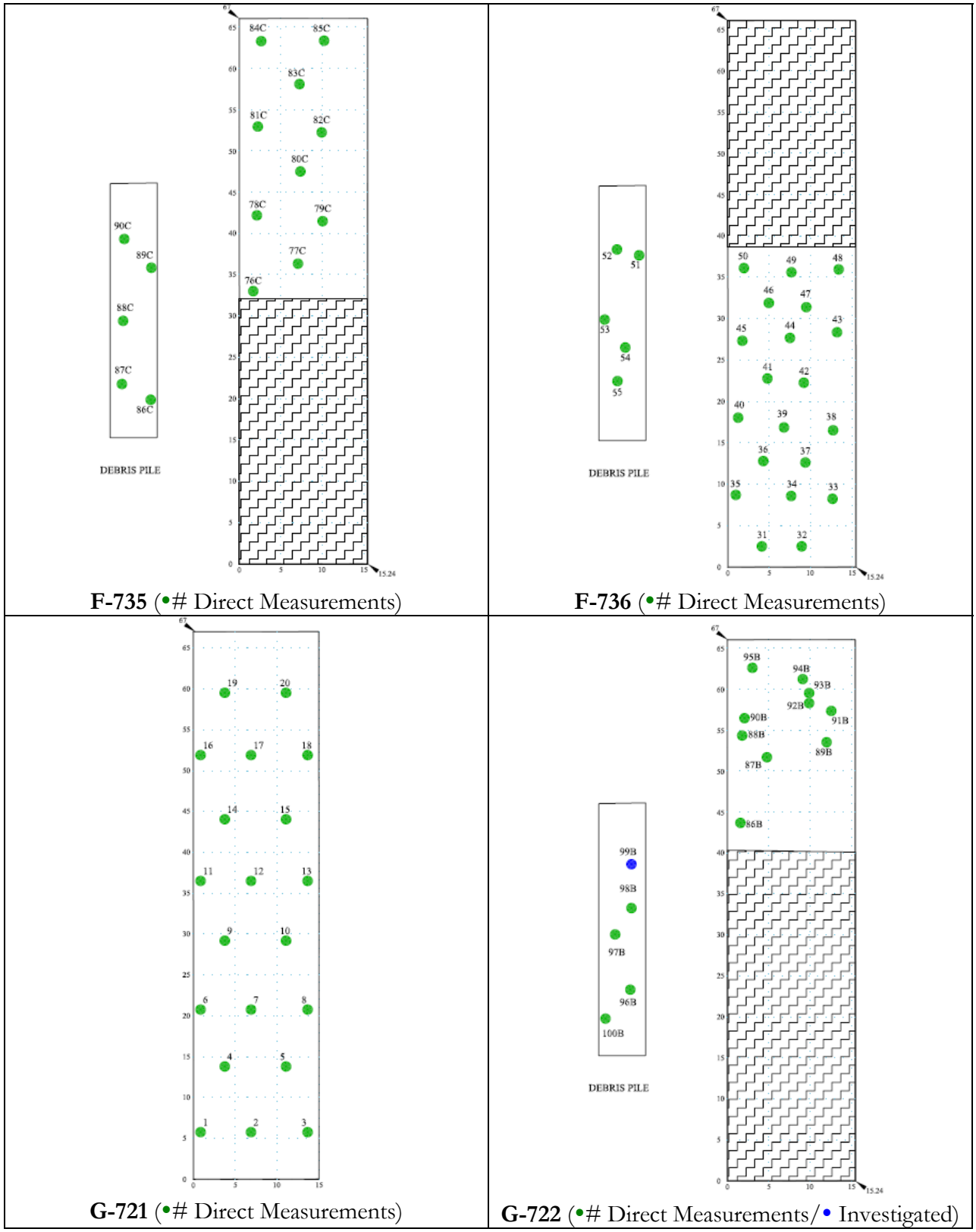
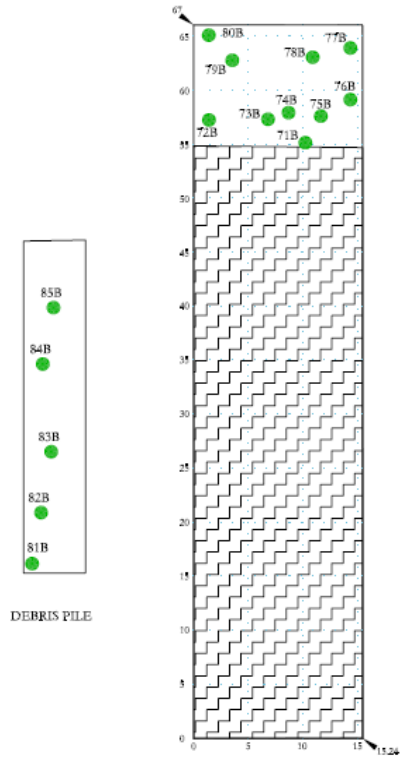
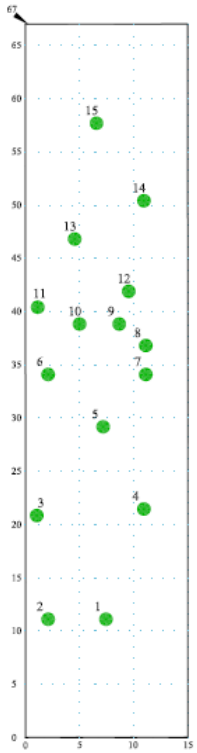


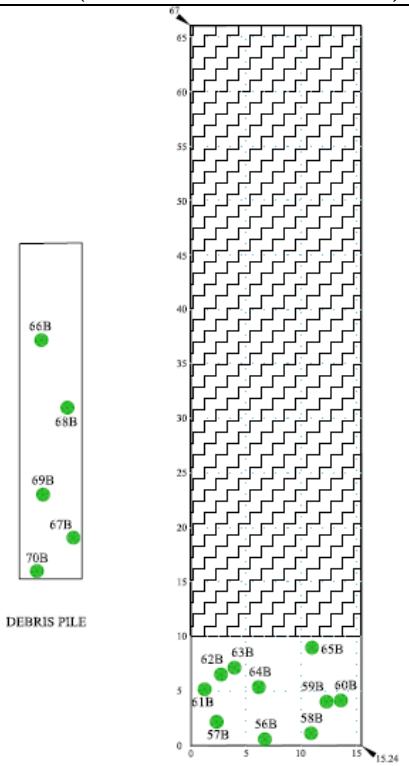
Figure A-23: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



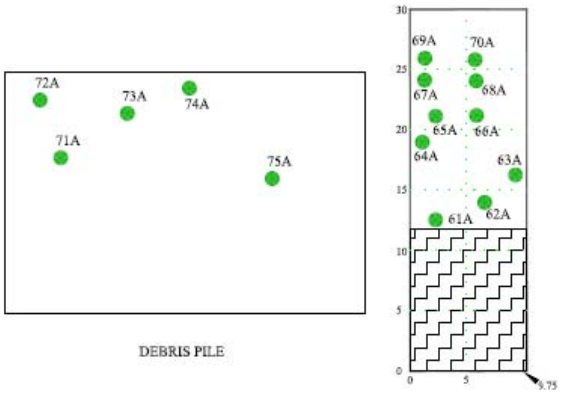
G-724 (•# Direct Measurements)



G-725 (•# Direct Measurements)



G-726 (•# Direct Measurements)



H-711 (•# Direct Measurements)

Figure A-24: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations

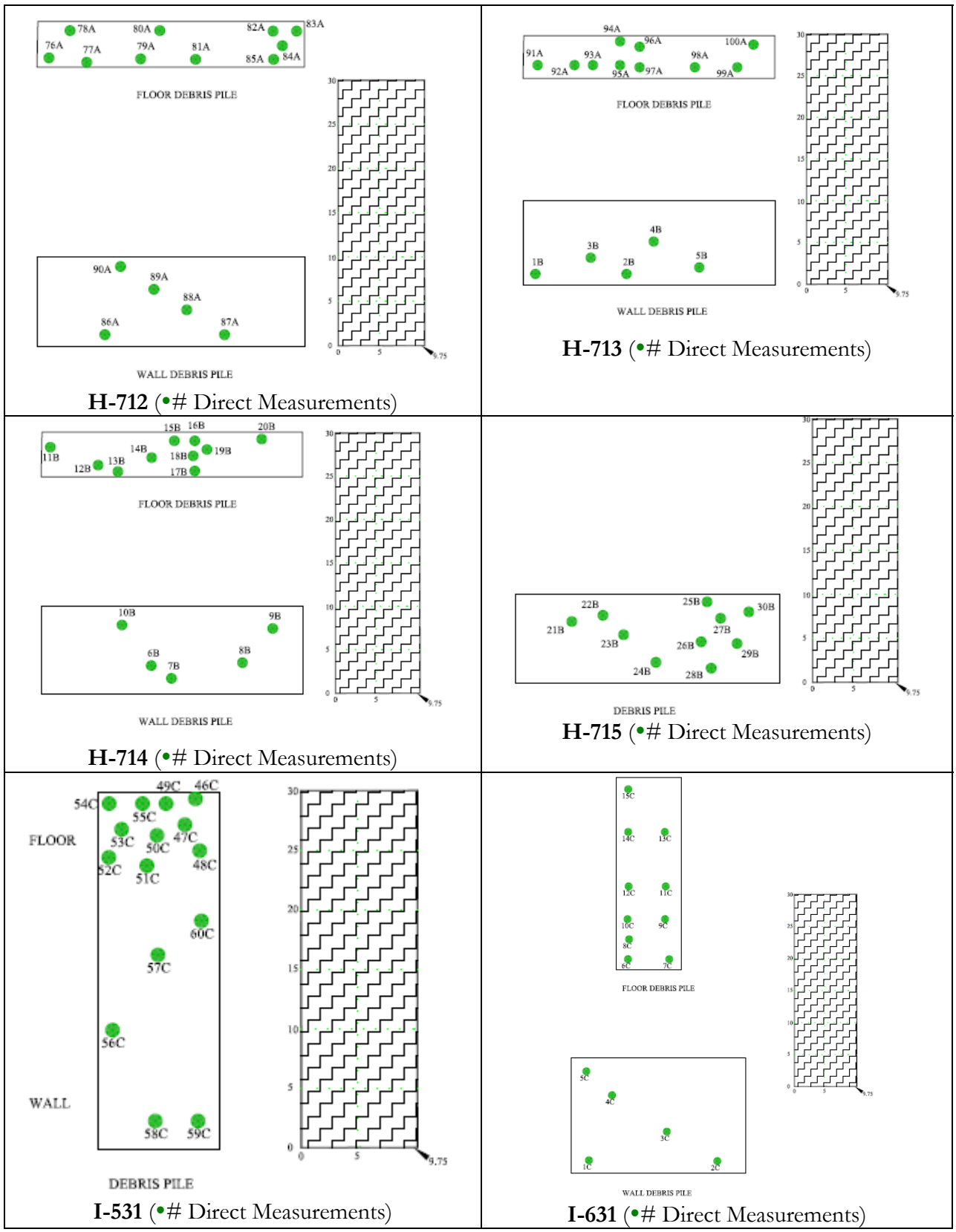
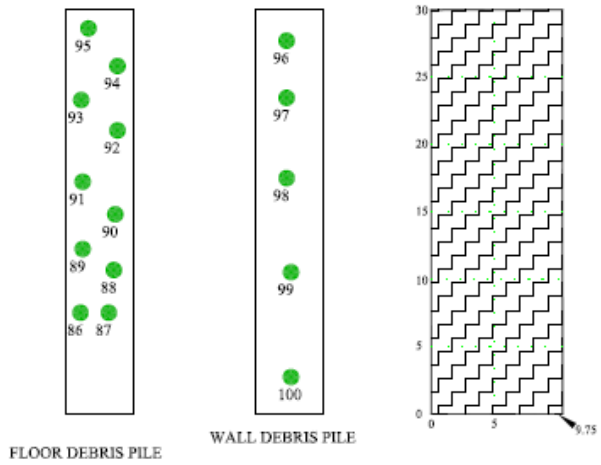
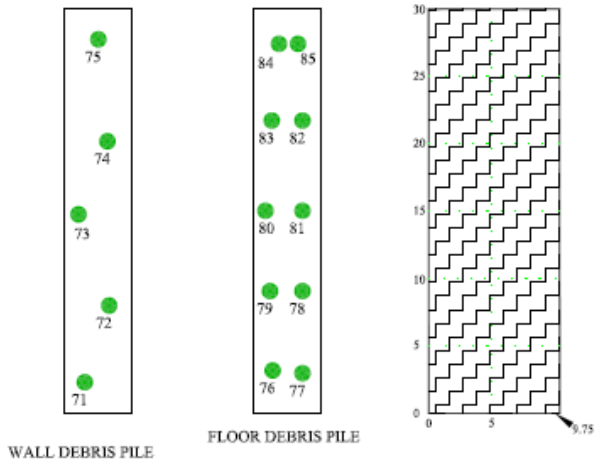


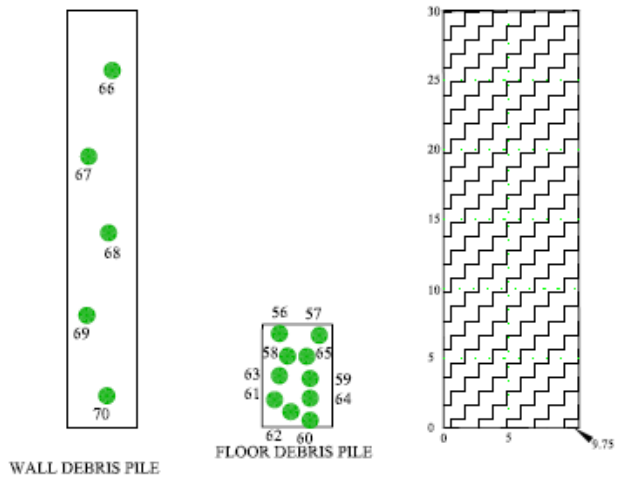
Figure A-25: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



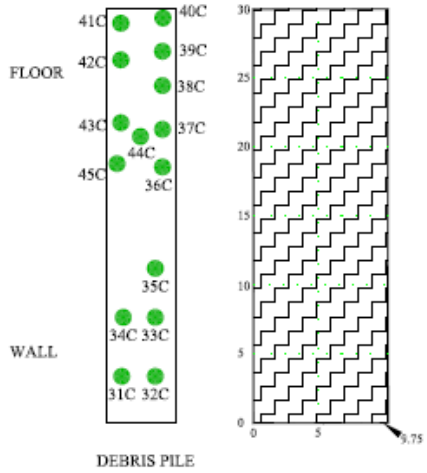
I-632 (•# Direct Measurements)



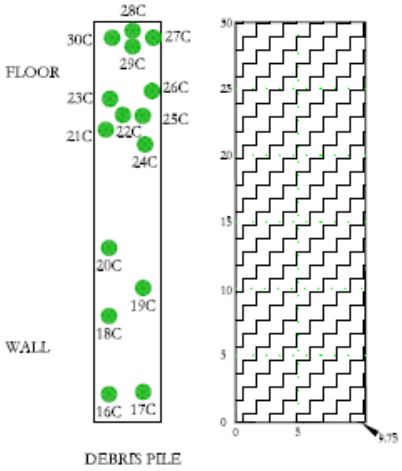
I-633 (•# Direct Measurements)



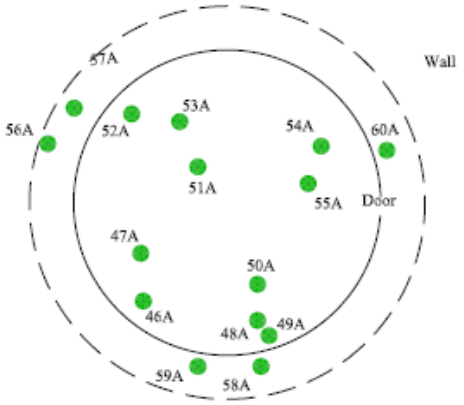
I-634 (•# Direct Measurements)



I-636 (•# Direct Measurements)

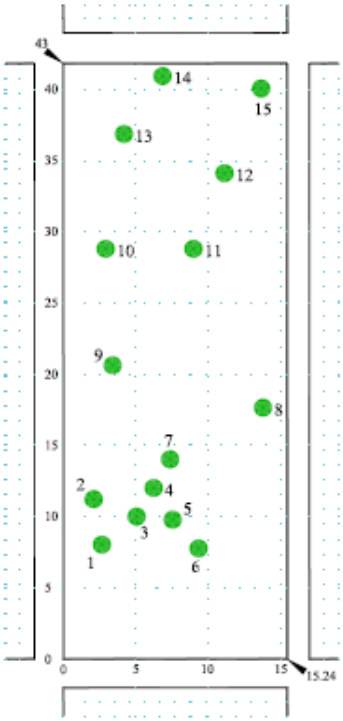


I-641 (•# Direct Measurements)

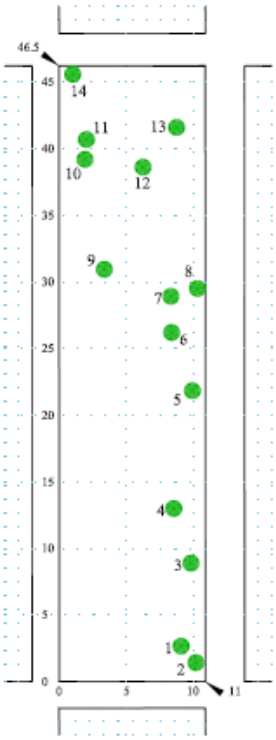


I-641 Igloo (•# Direct Measurements)

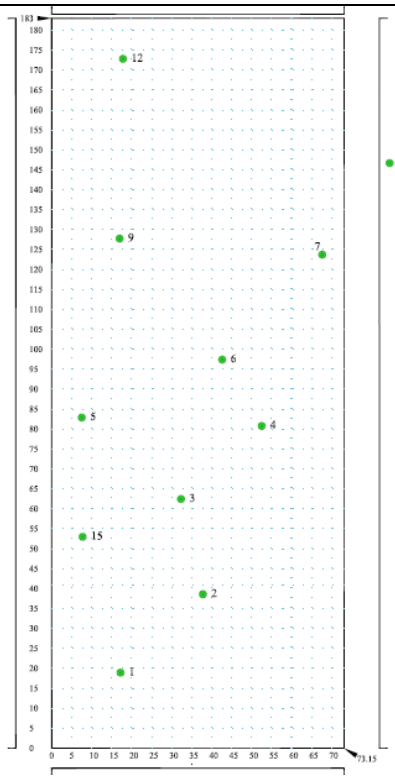
Figure A-26: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations



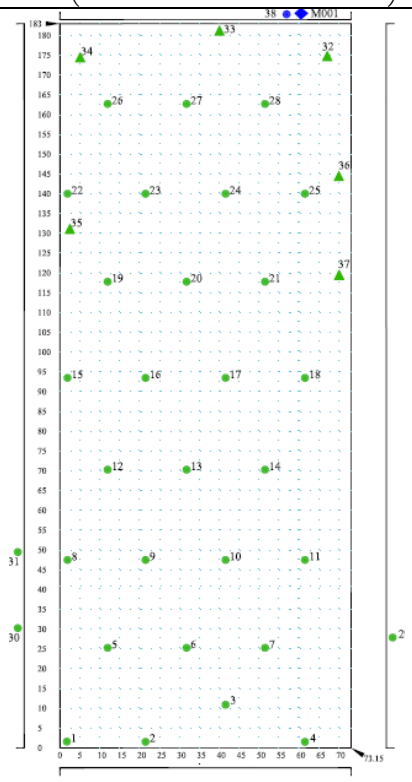
821 (•# Direct Measurements)



825 (•# Direct Measurements)



1021 (•# Direct Measurements)



1022 (•# Direct Measurements/•,◆Investigated)

Figure A-27: Class 2 and 3 Structures—Characterization Report FSS Measurement Locations

Figure A-28: C1 SU1 and SU1b—FSS Gamma Scan Results

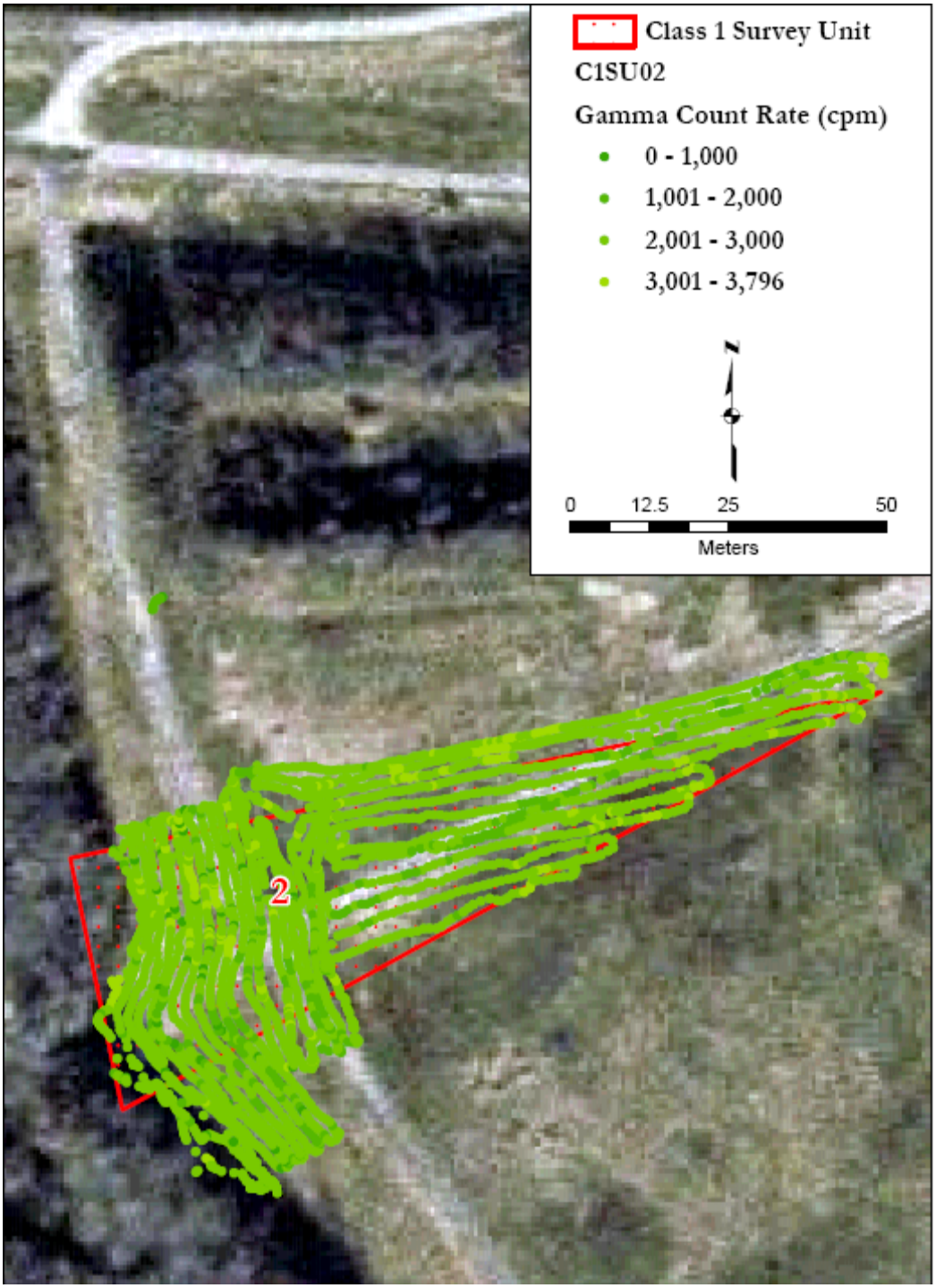


Figure A-29: C1 SU2—FSS Gamma Scan Results

Figure A-30: C1 SU3—FSS Gamma Scan Results

Figure A-31: C1 SU4—FSS Gamma Scan Results

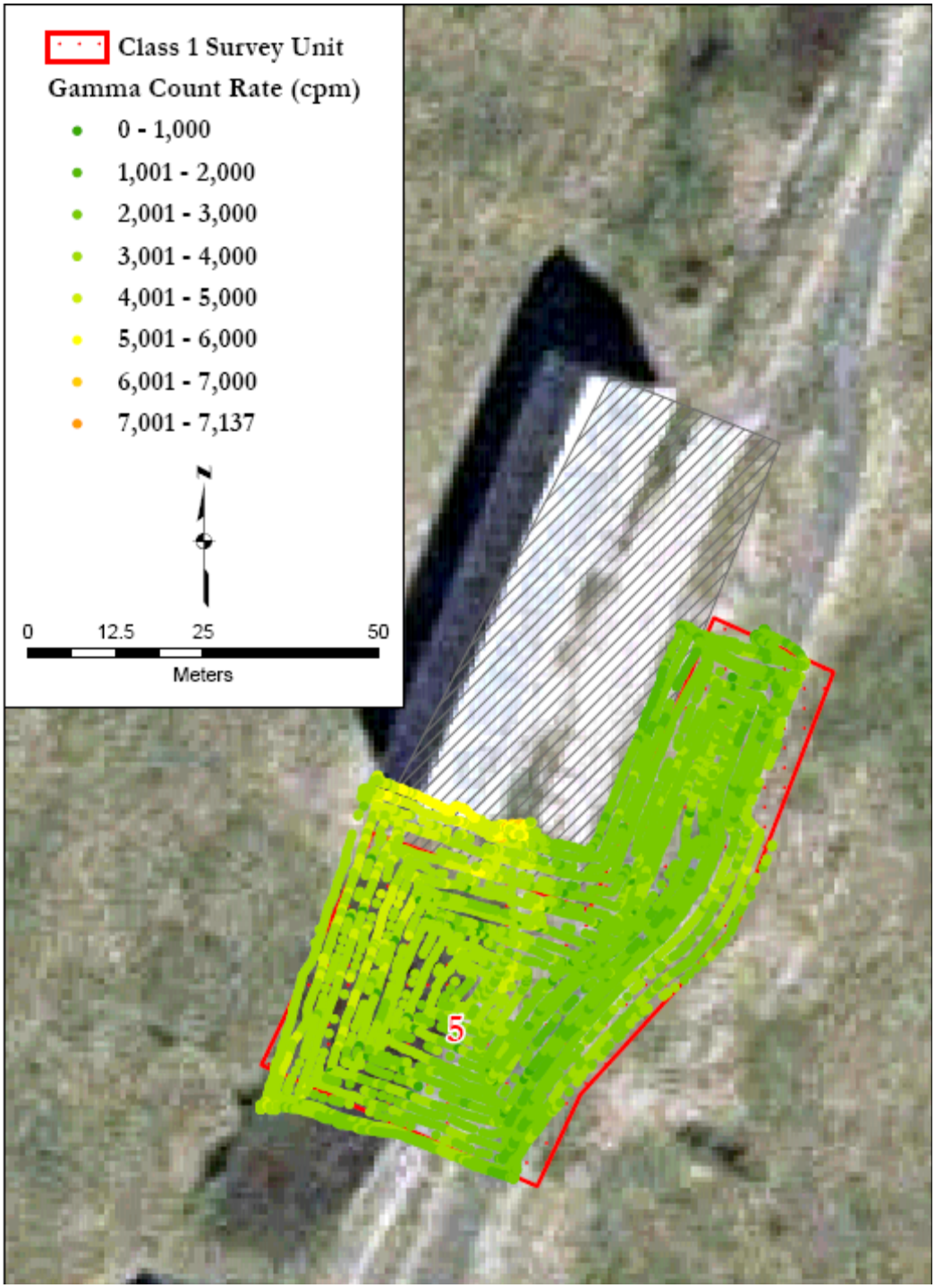


Figure A-32: C1 SU5—FSS Gamma Scan Results

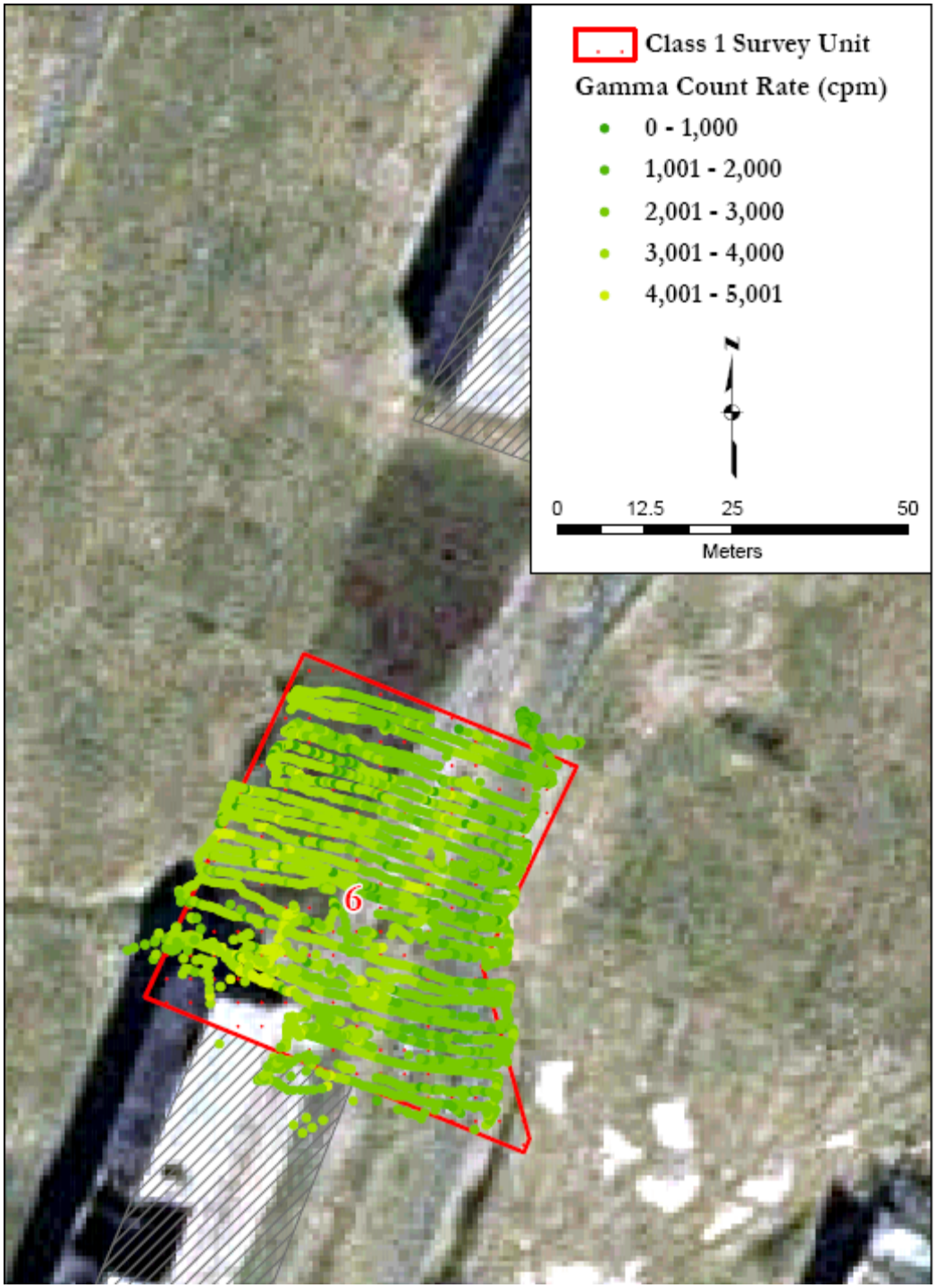


Figure A-33: C1 SU6—FSS Gamma Scan Results

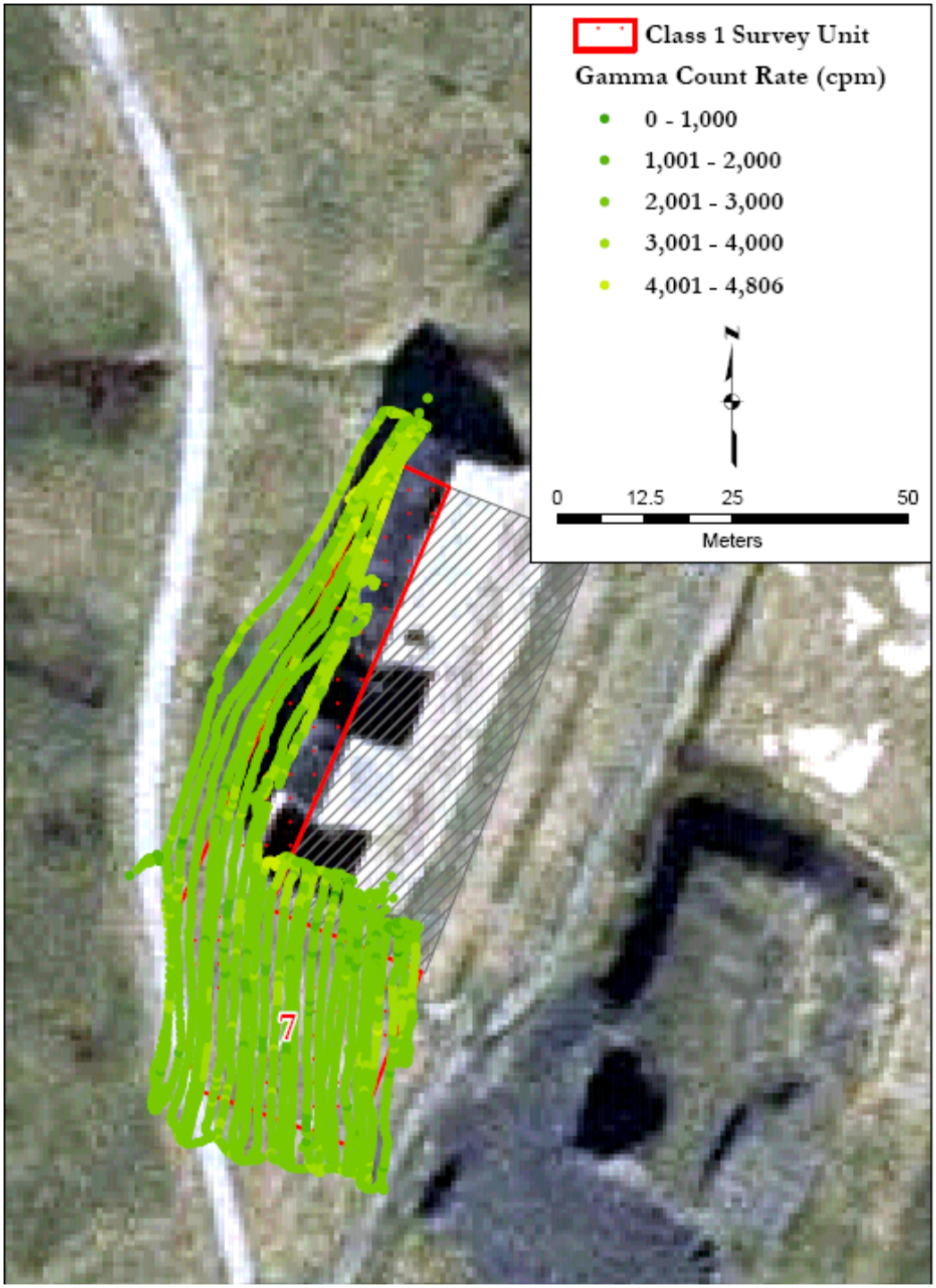


Figure A-34: C1 SU7—FSS Gamma Scan Results

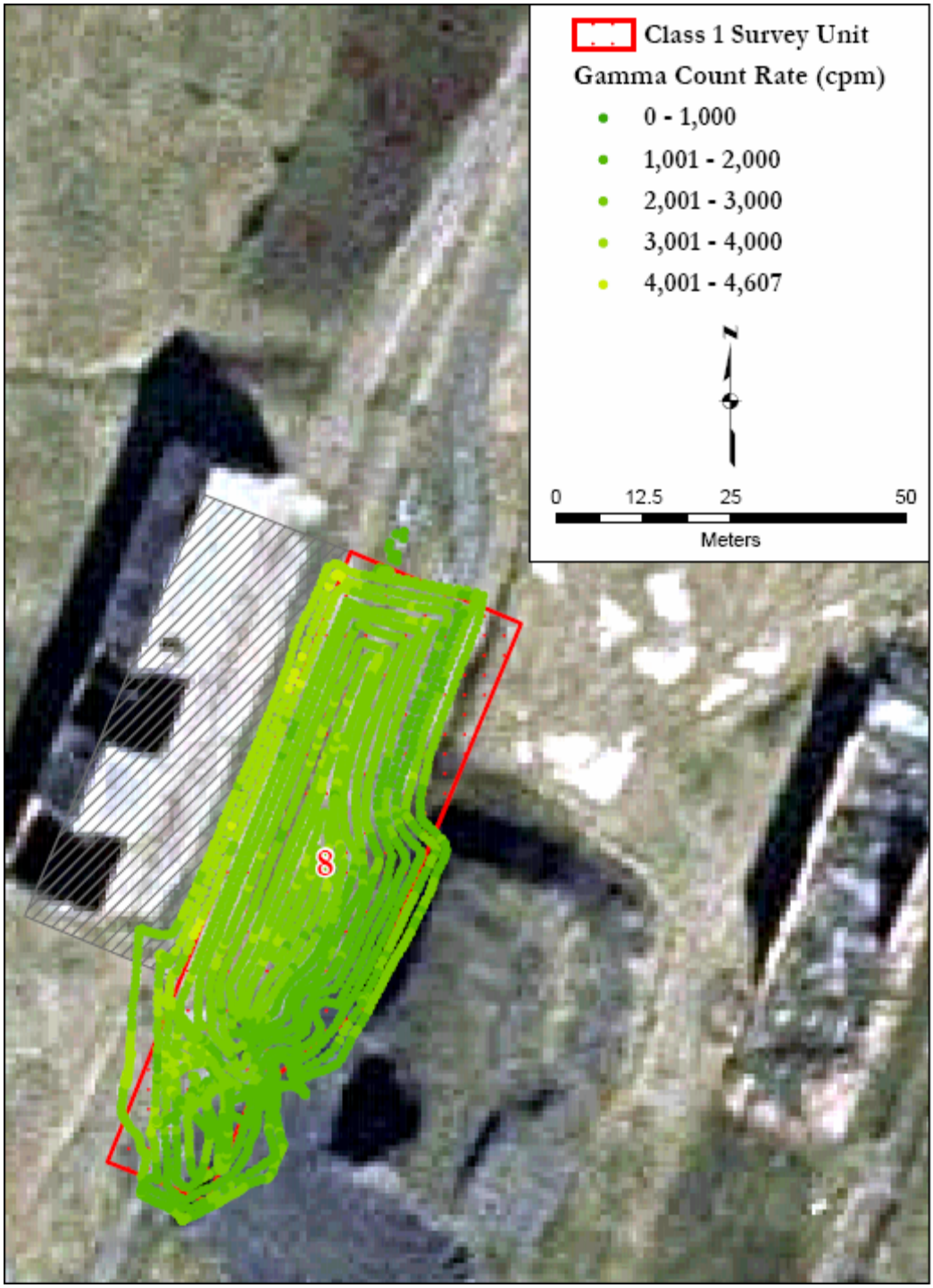


Figure A-35: C1 SU8—FSS Gamma Scan Results

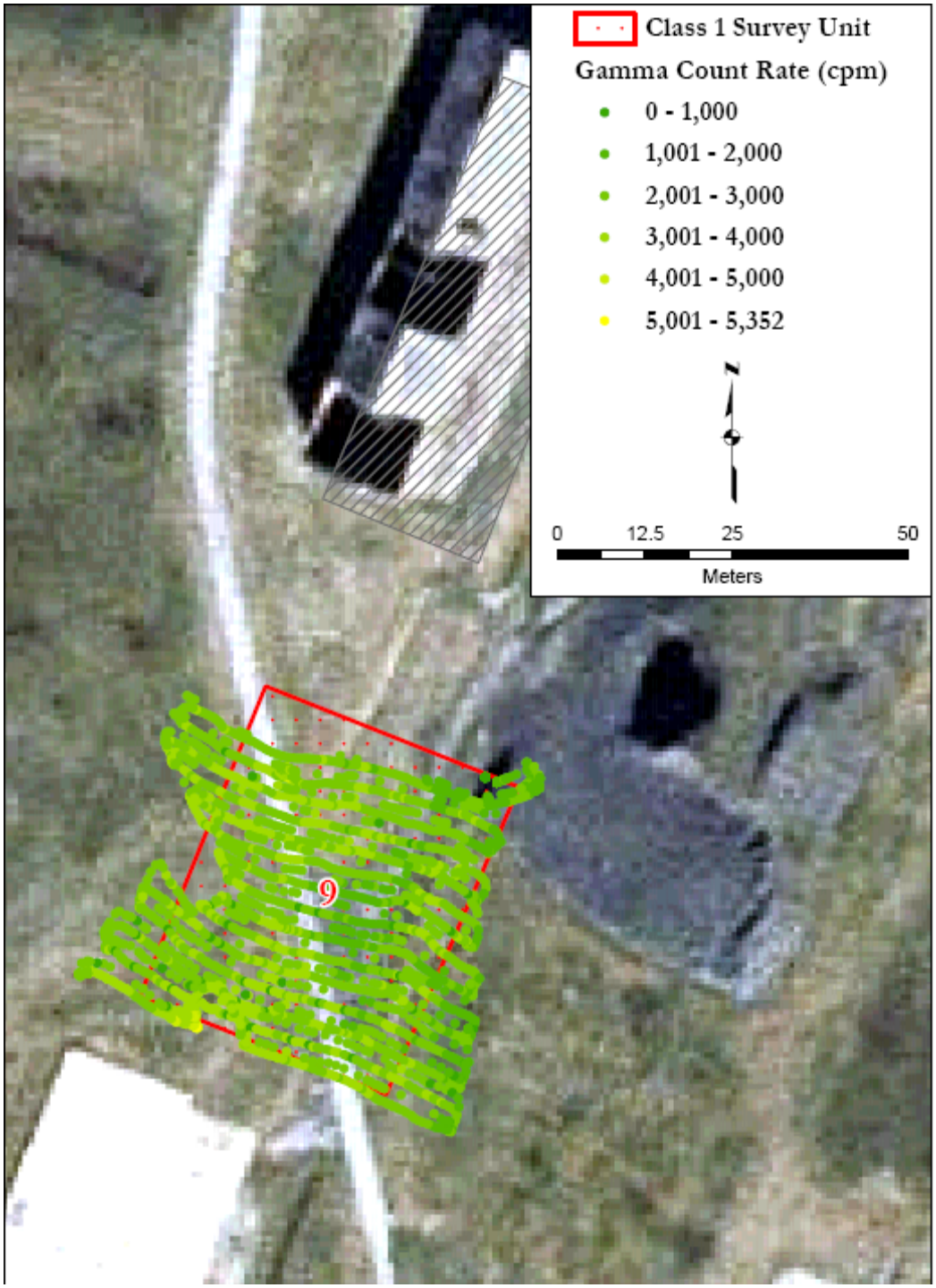


Figure A-36: C1 SU9—FSS Gamma Scan Results

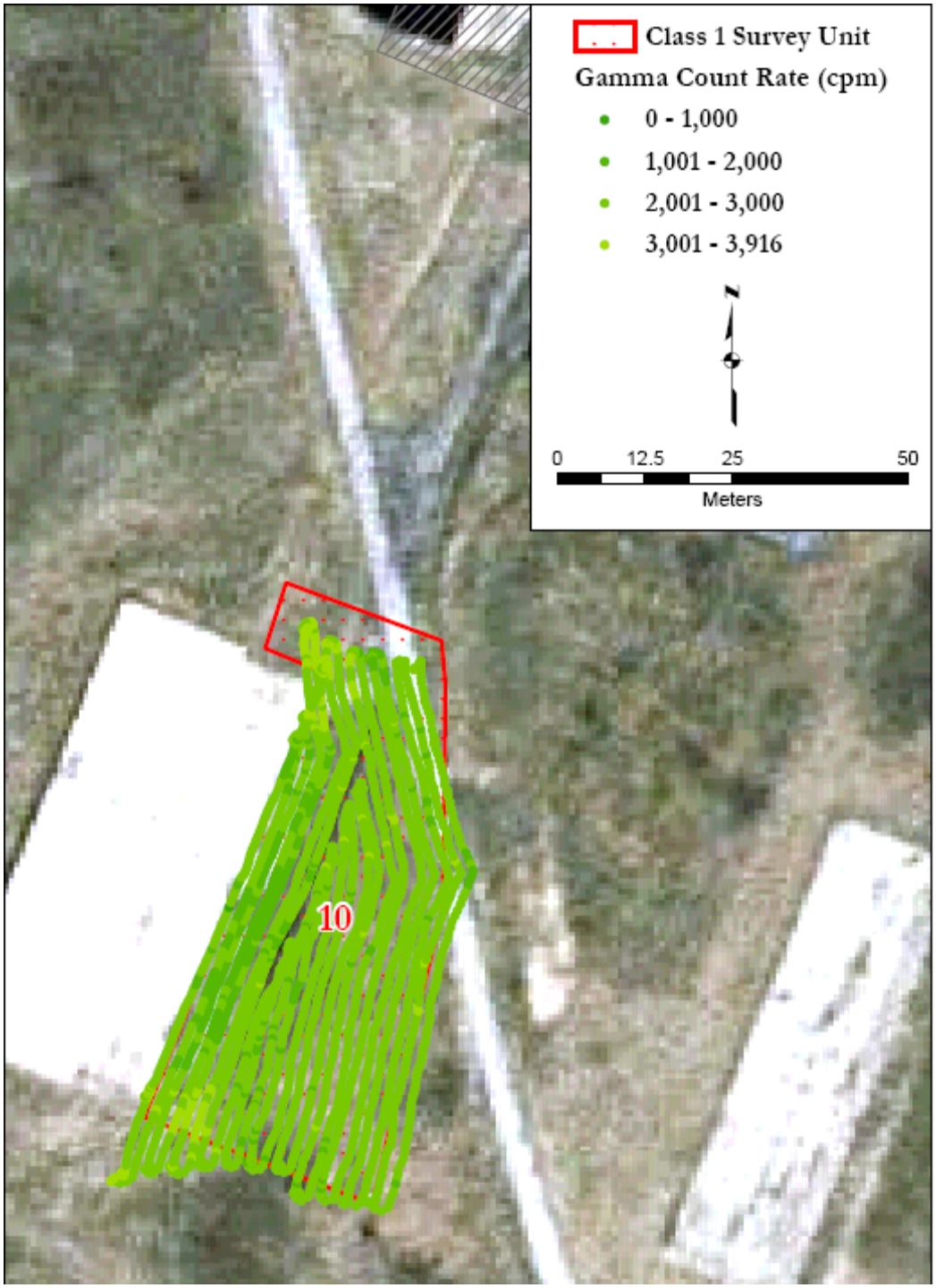


Figure A-37: C1 SU10—FSS Gamma Scan Results

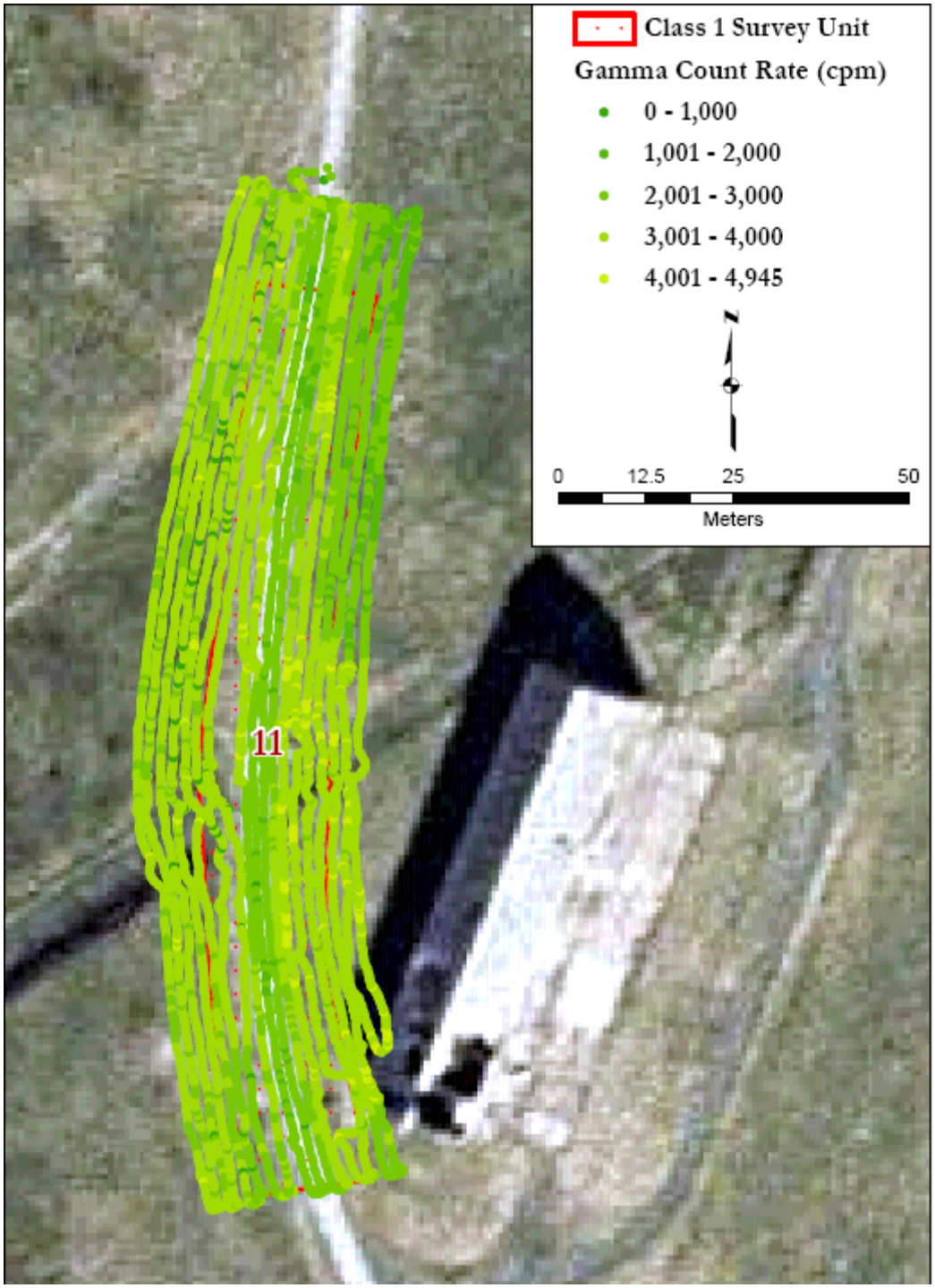


Figure A-38: C1 SU11—FSS Gamma Scan Results

Figure A-39: C1 SU12—FSS Gamma Scan Results

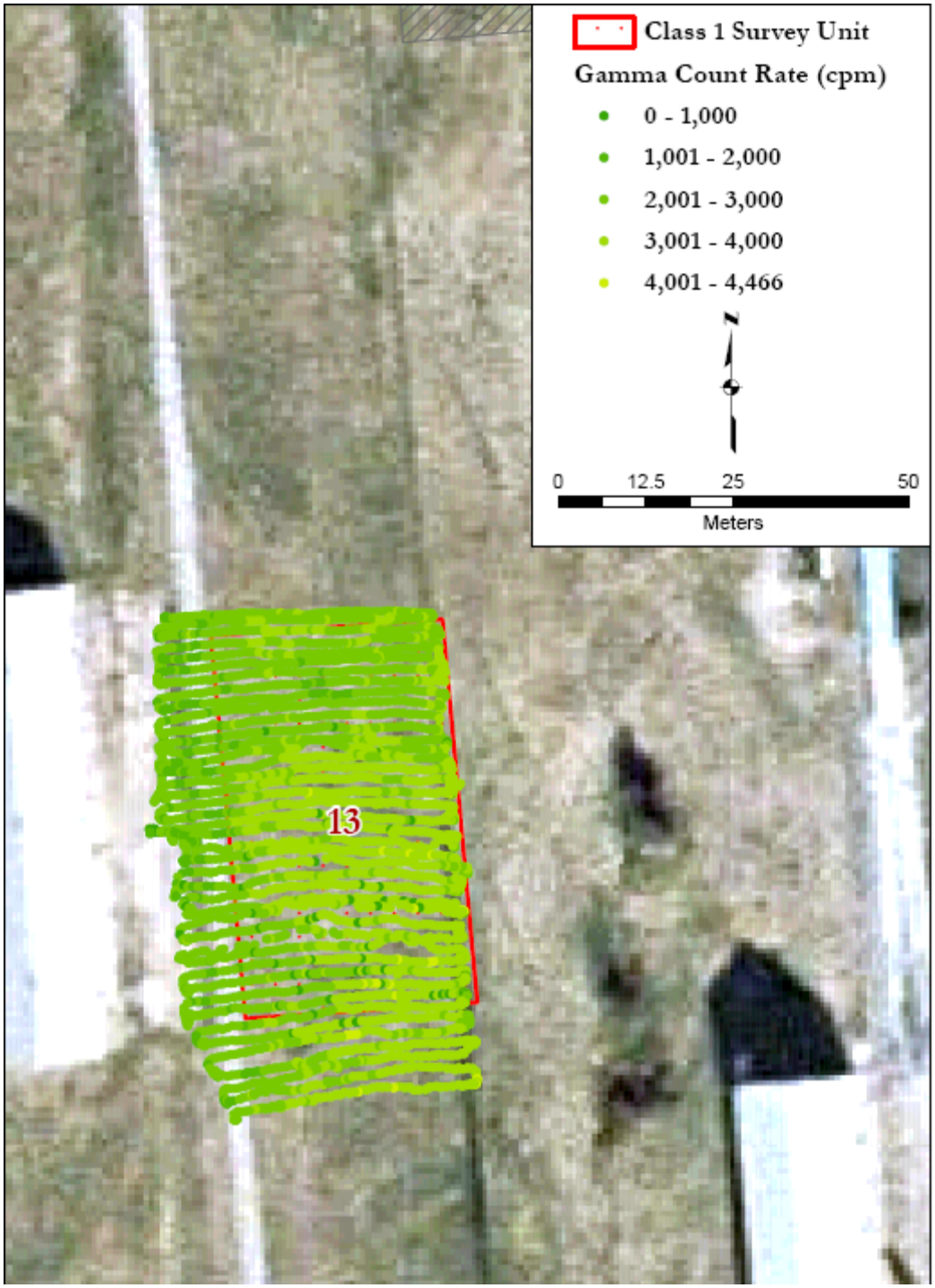


Figure A-40: C1 SU13—FSS Gamma Scan Results

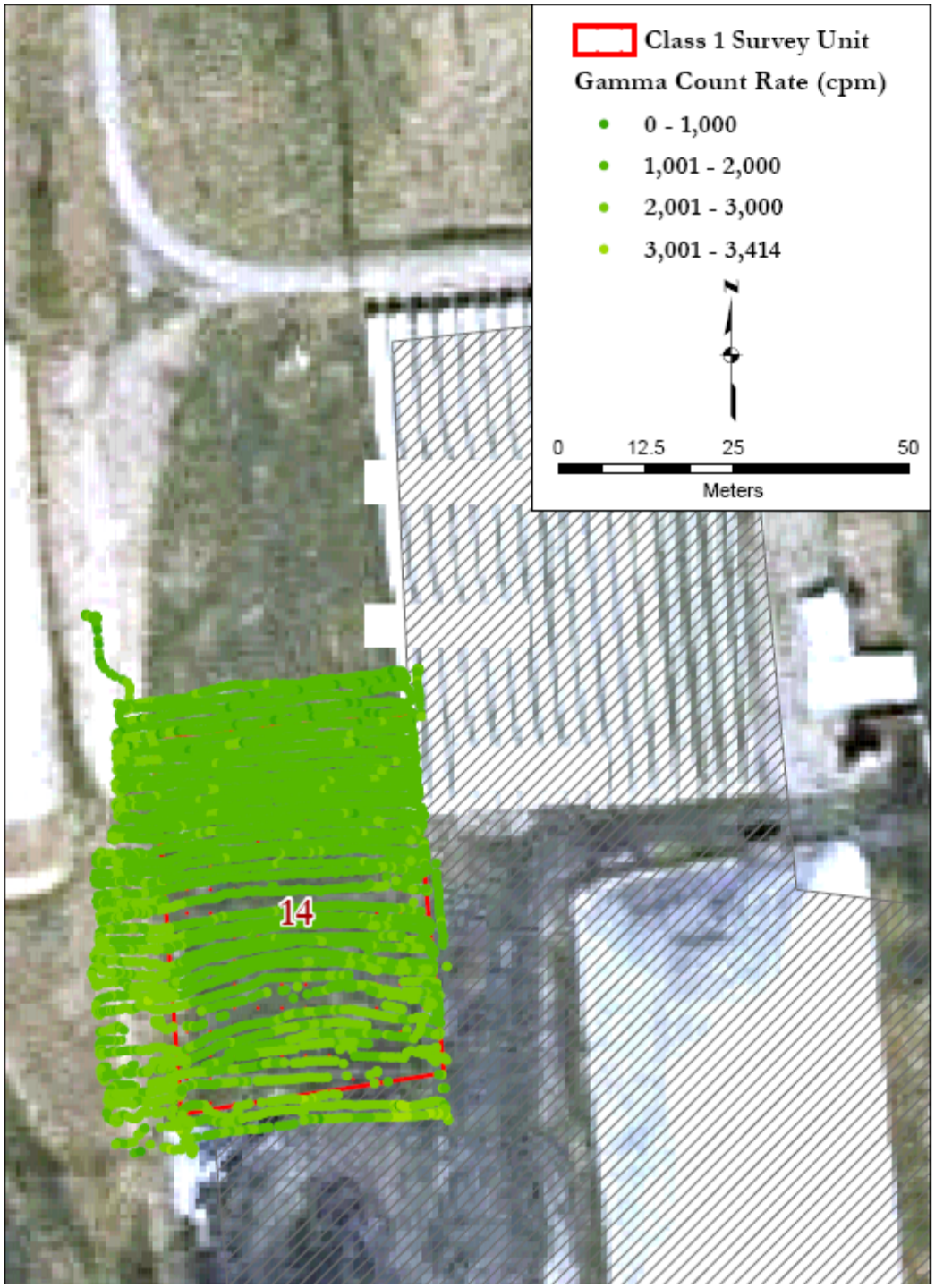


Figure A-41: C1 SU14—FSS Gamma Scan Results

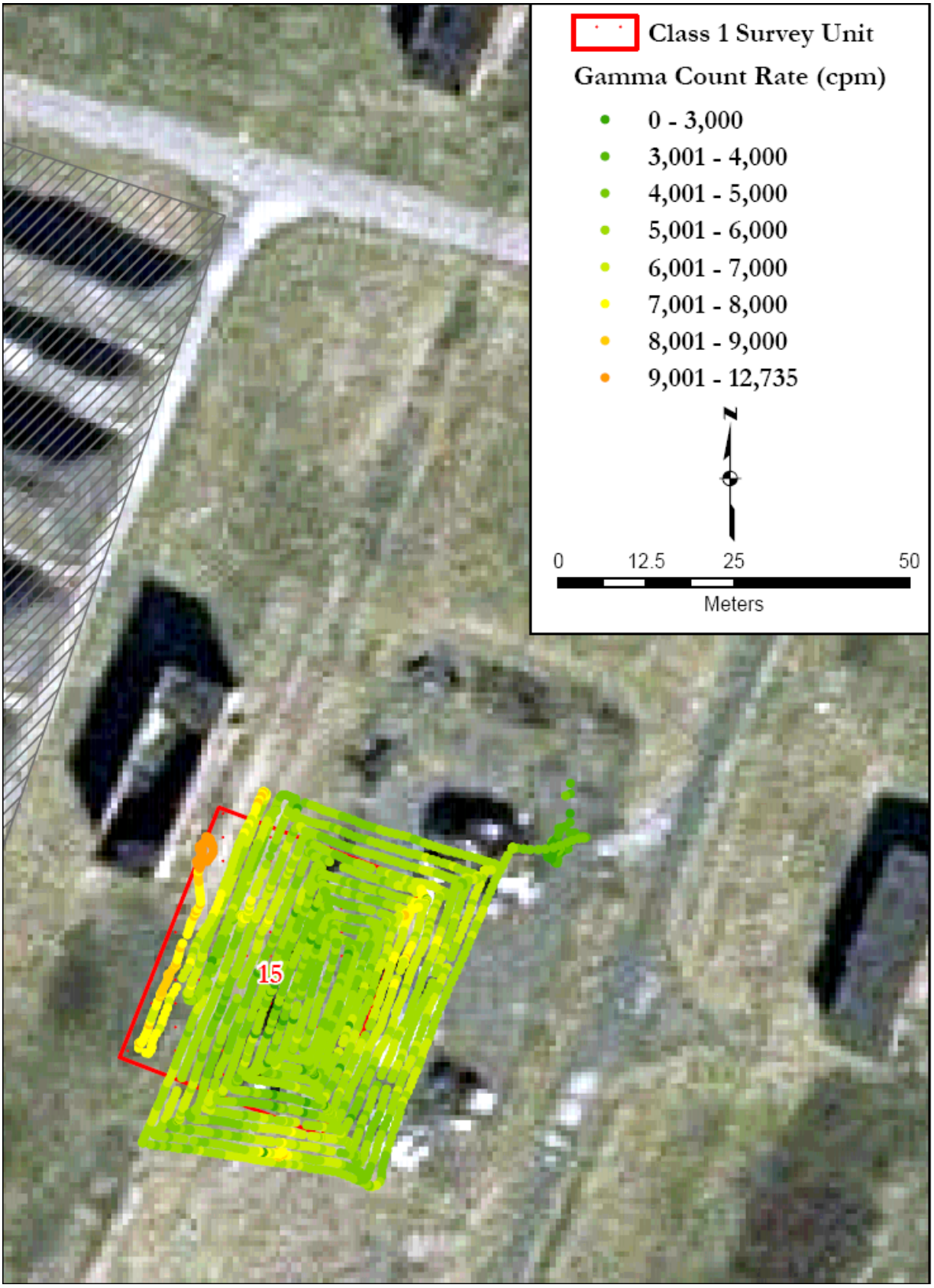


Figure A-42: C1 SU15—FSS Gamma Scan Results

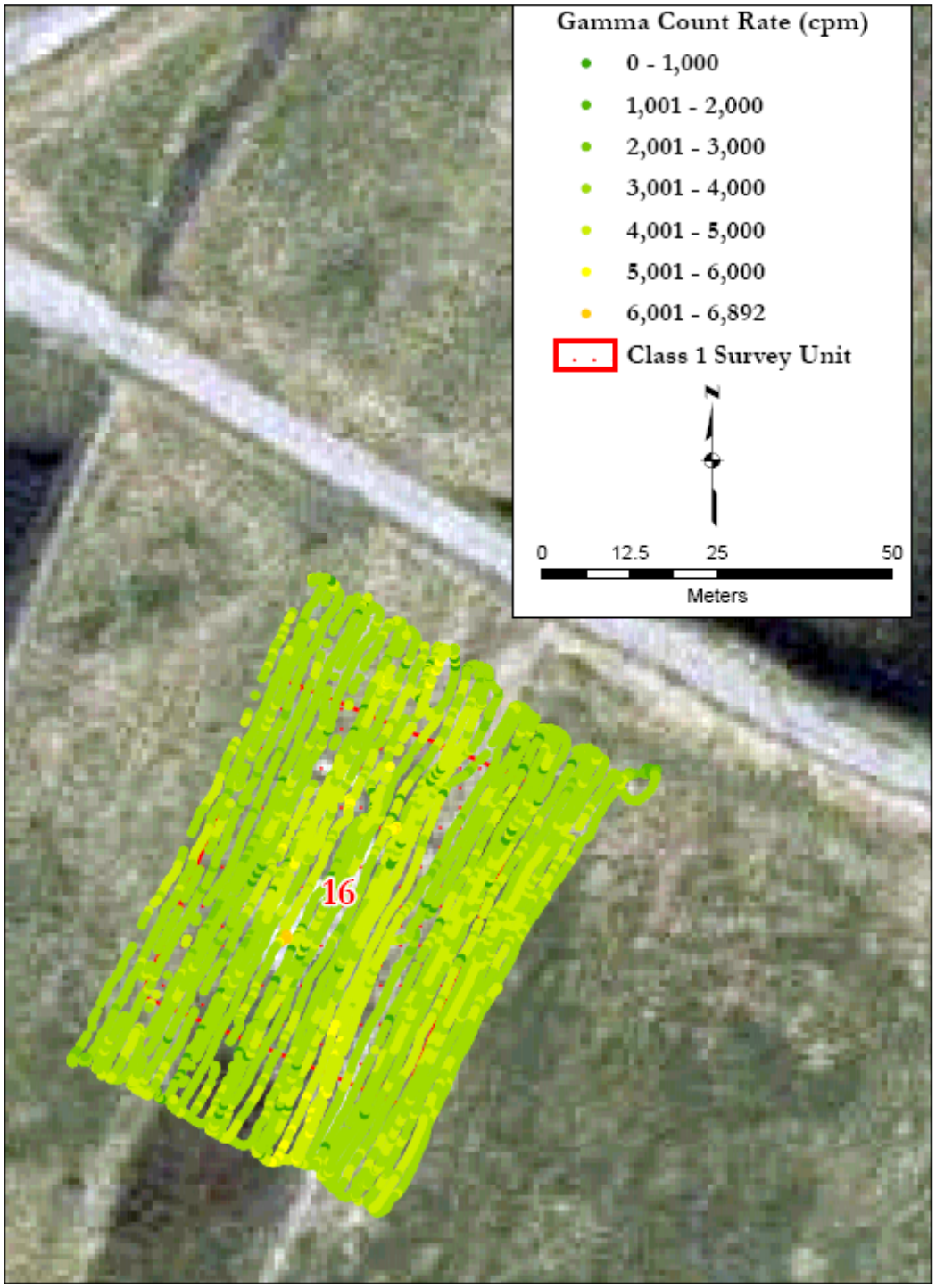


Figure A-43: C1 SU16—FSS Gamma Scan Results

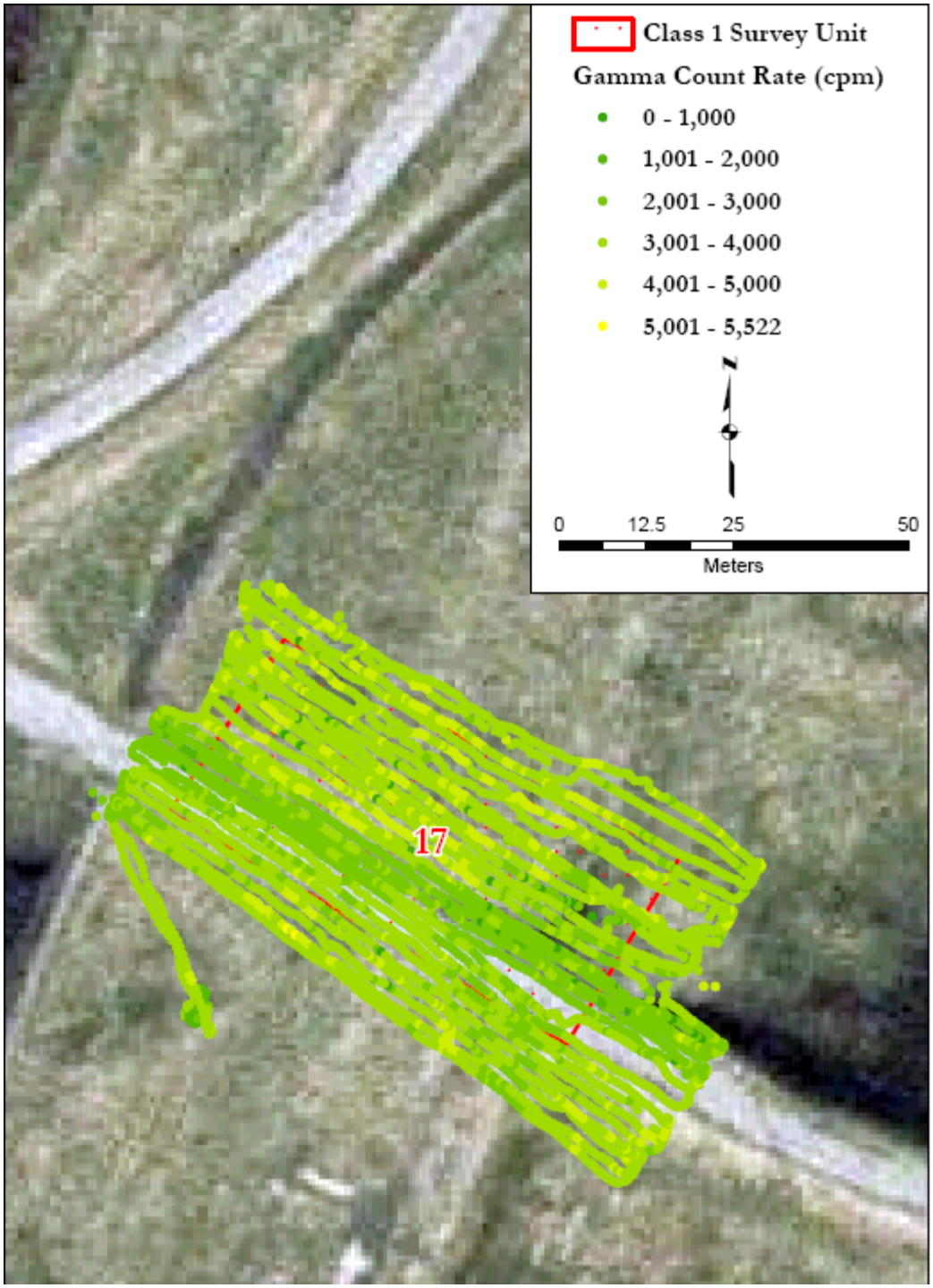


Figure A-44: C1 SU17—FSS Gamma Scan Results

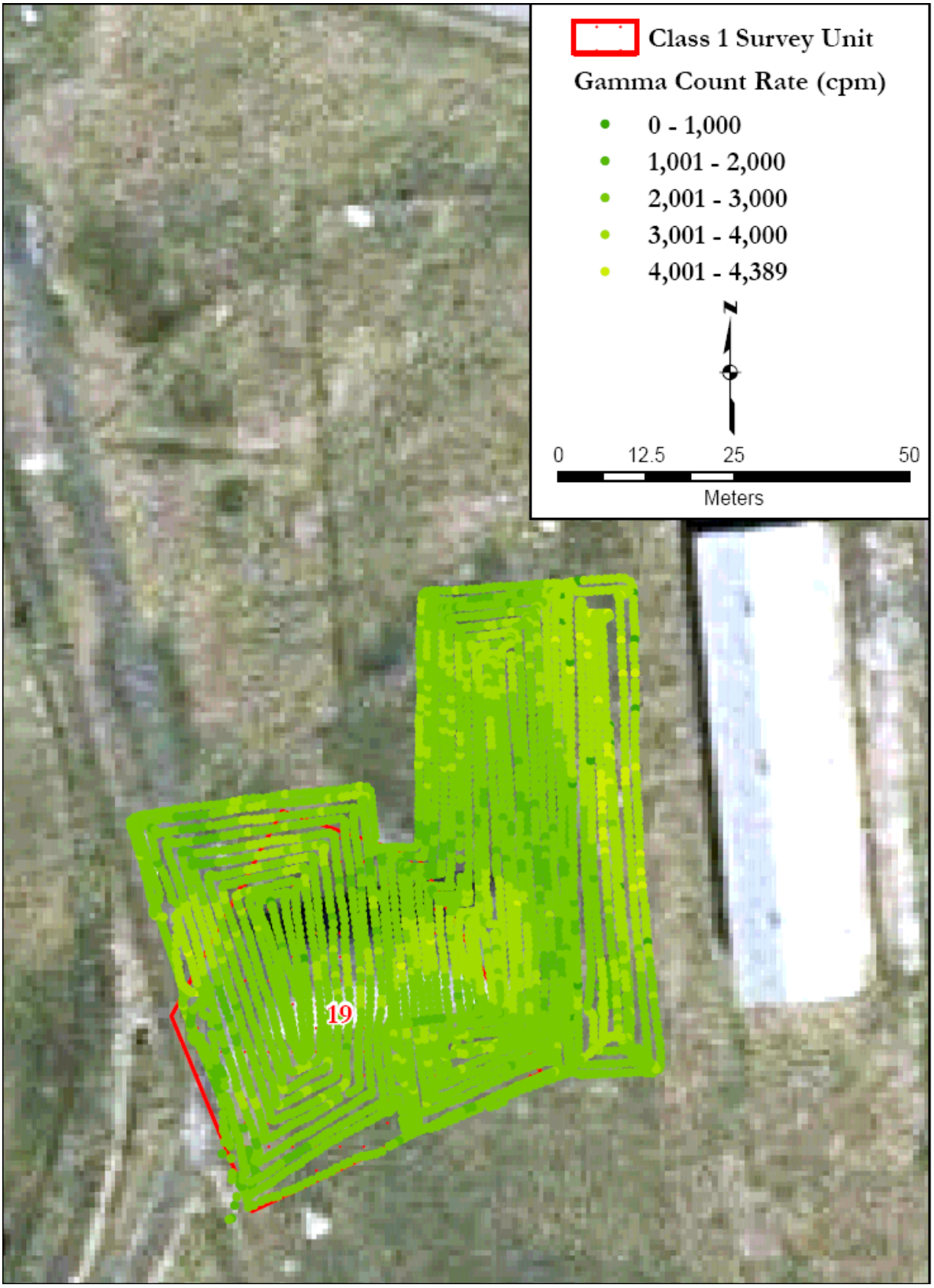


Figure A-45: C1 SU19—FSS Gamma Scan Results

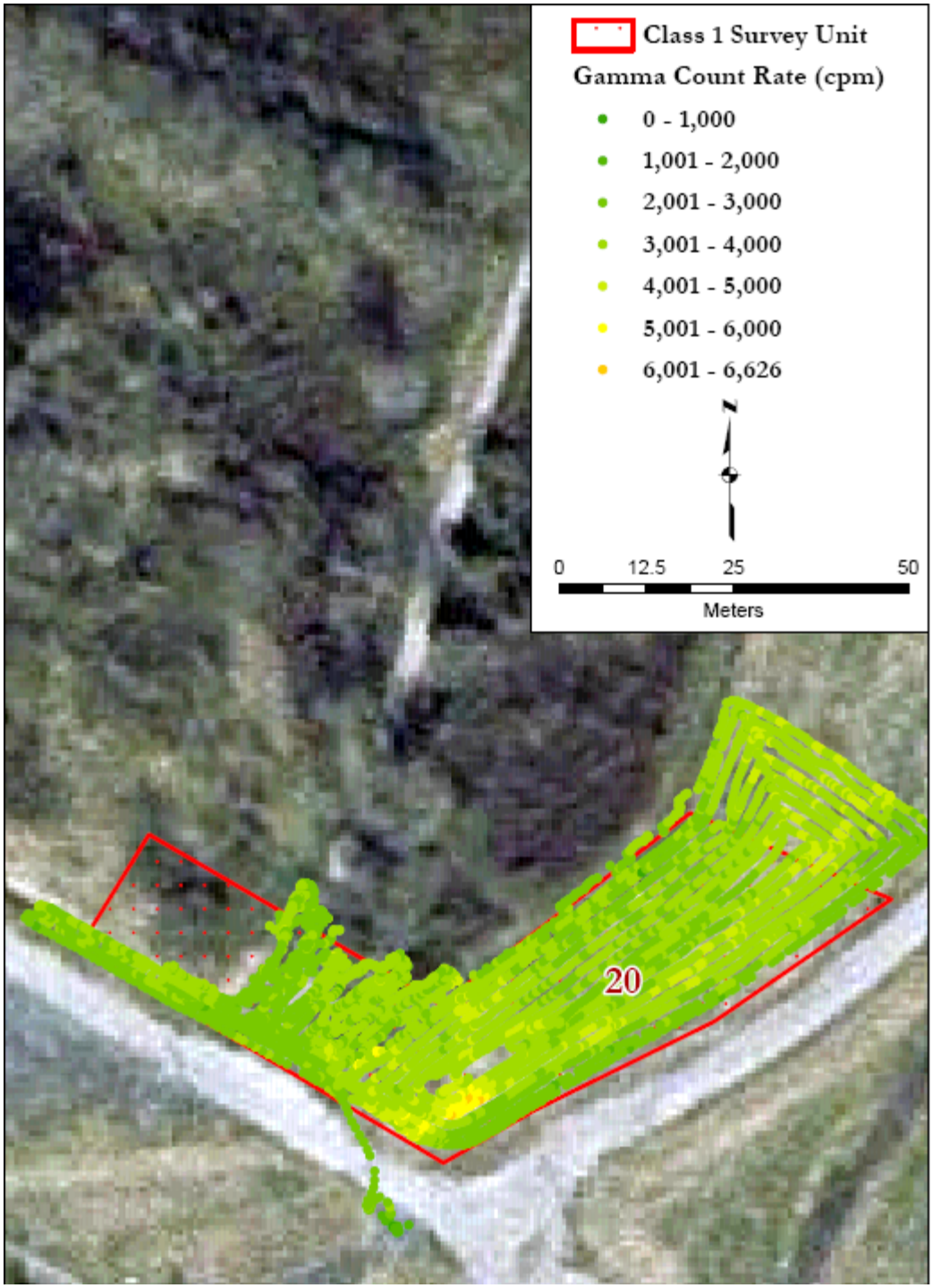


Figure A-46: C1 SU20—FSS Gamma Scan Results

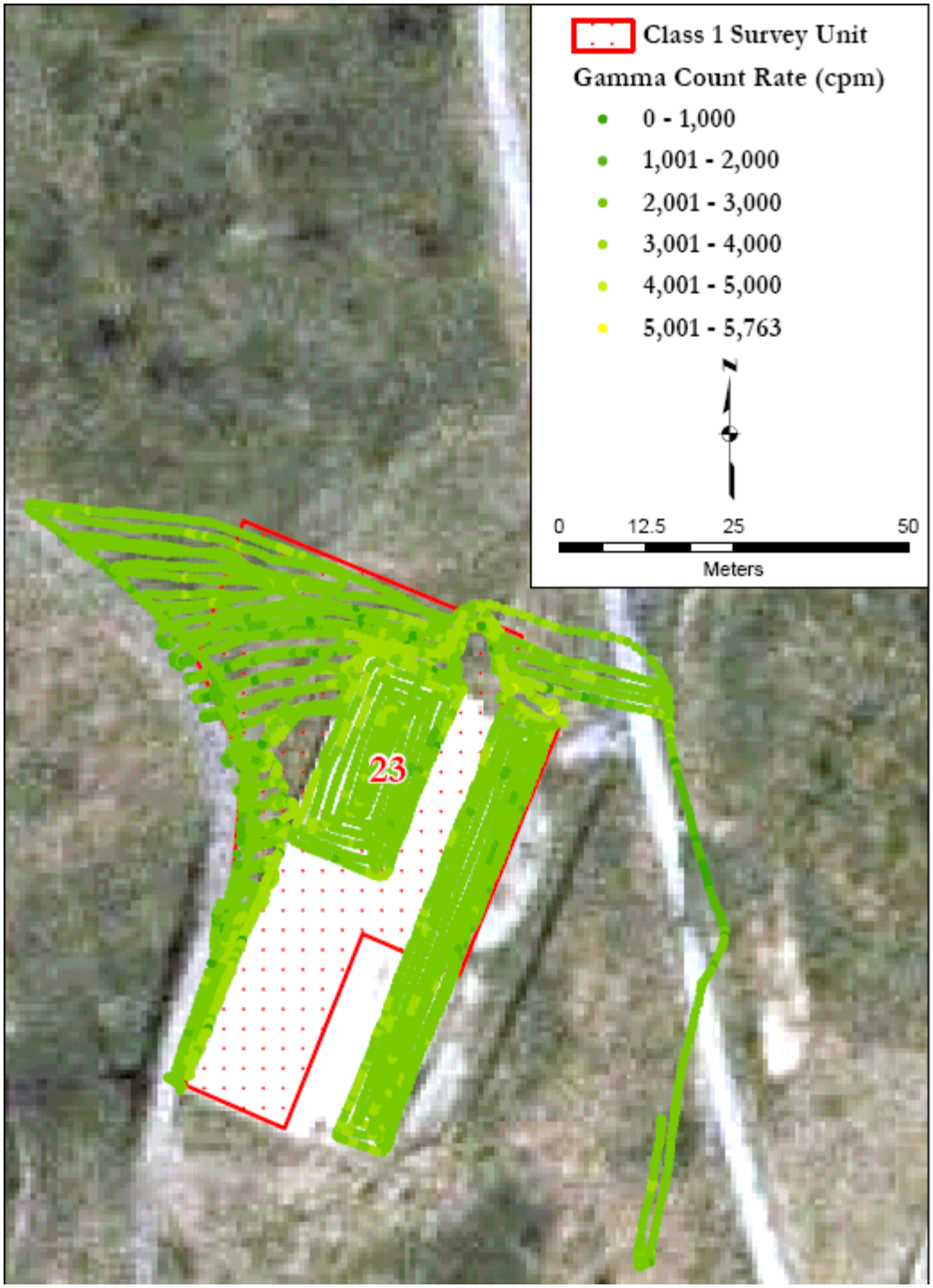


Figure A-47: C1 SU23—FSS Gamma Scan Results

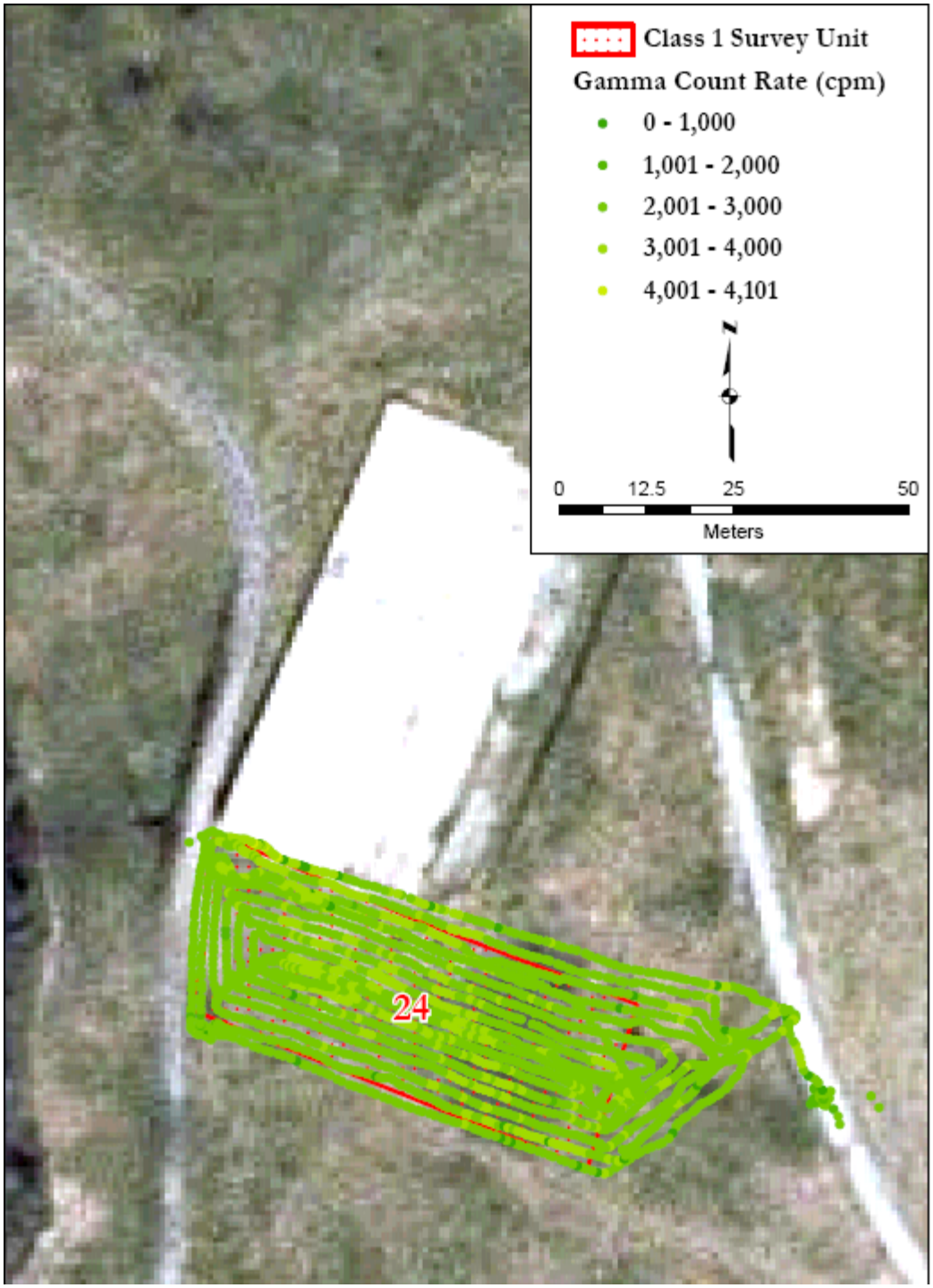


Figure A-48: C1 SU24—FSS Gamma Scan Results

Figure A-49: C1 SU1—FSS Soil Sampling Locations

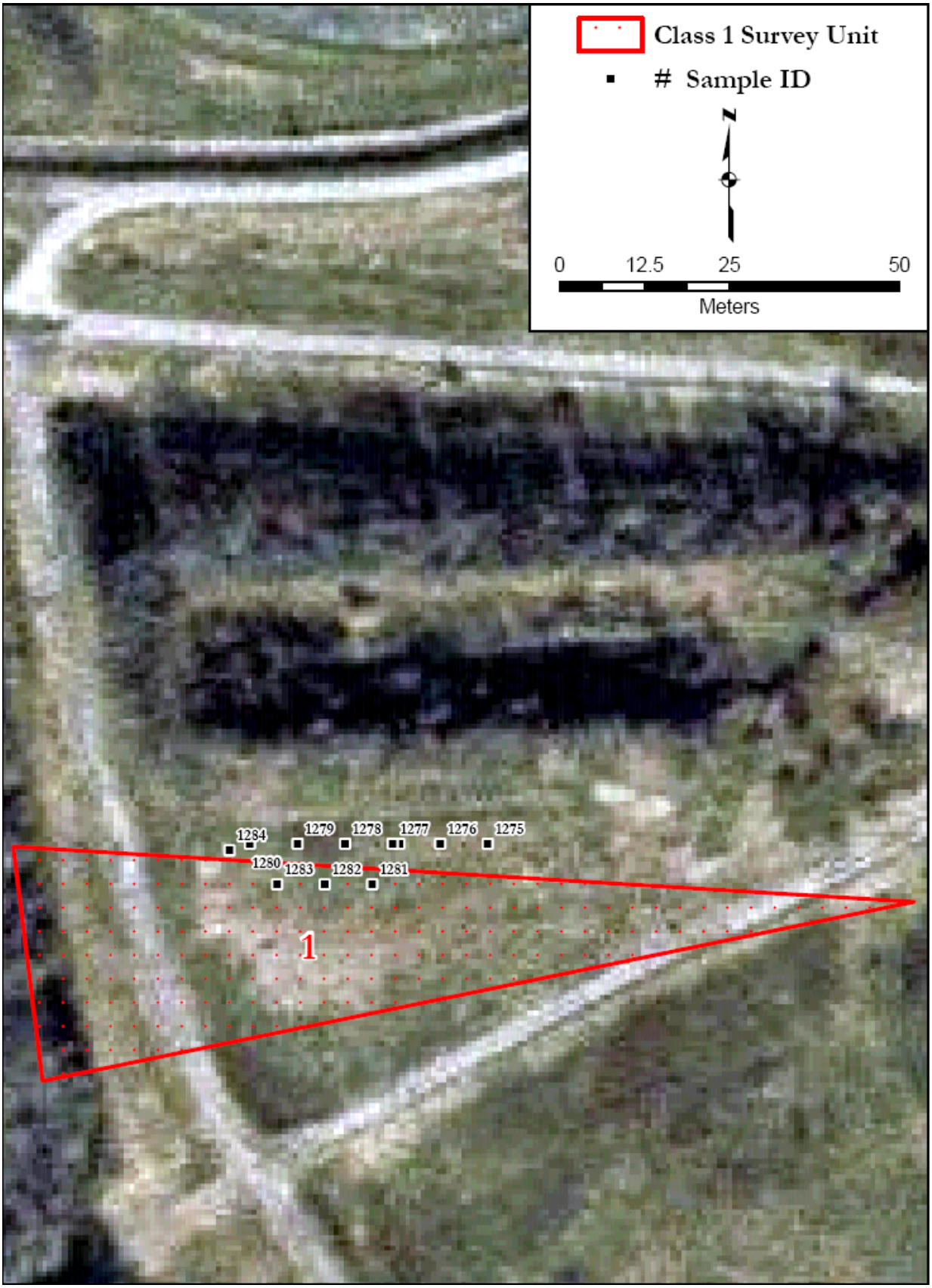


Figure A-50: C1 SU1b—FSS Soil Sampling Locations

Figure A-51: C1 SU2—FSS Soil Sampling Locations

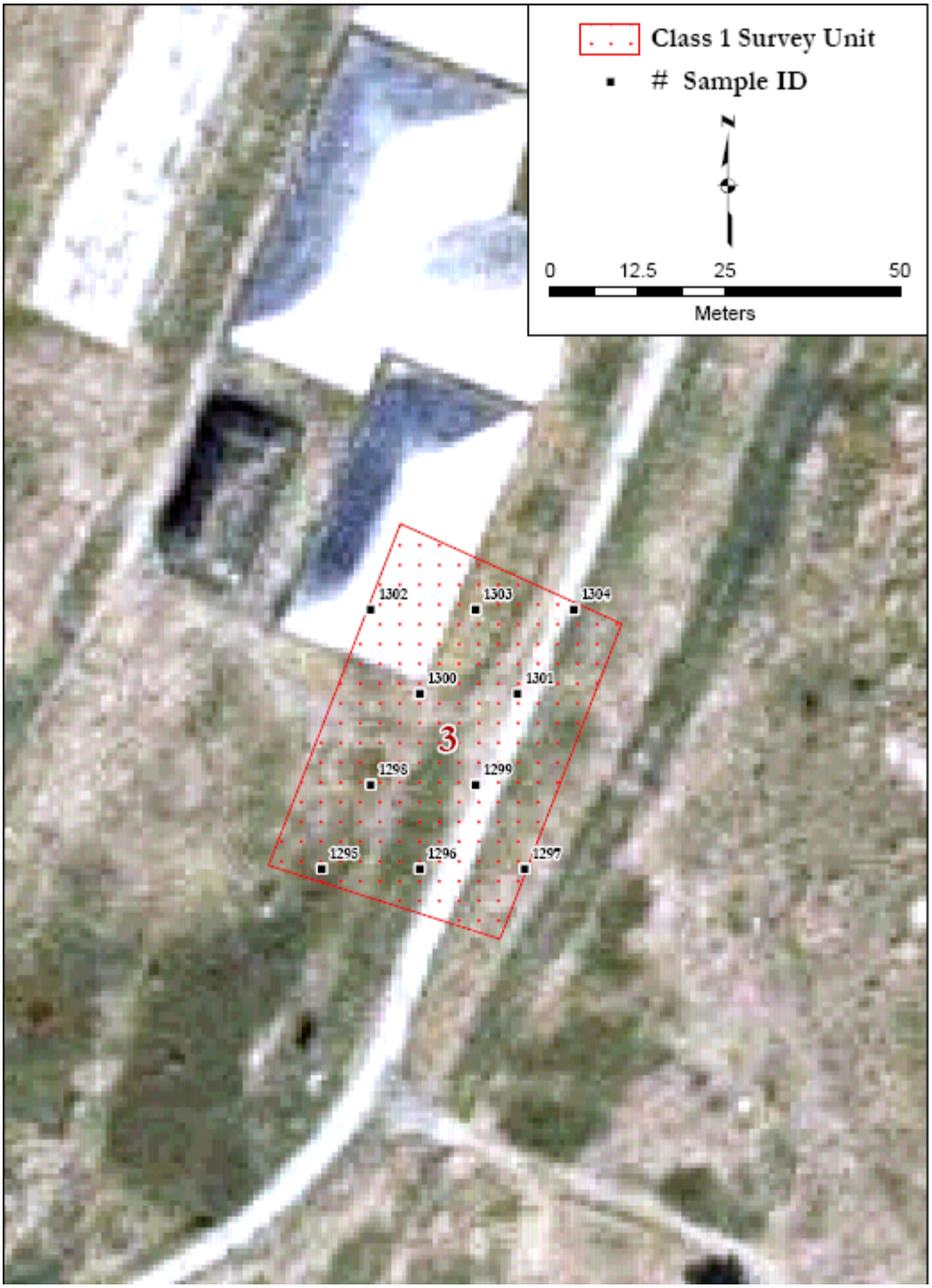


Figure A-52: C1 SU3—FSS Soil Sampling Locations

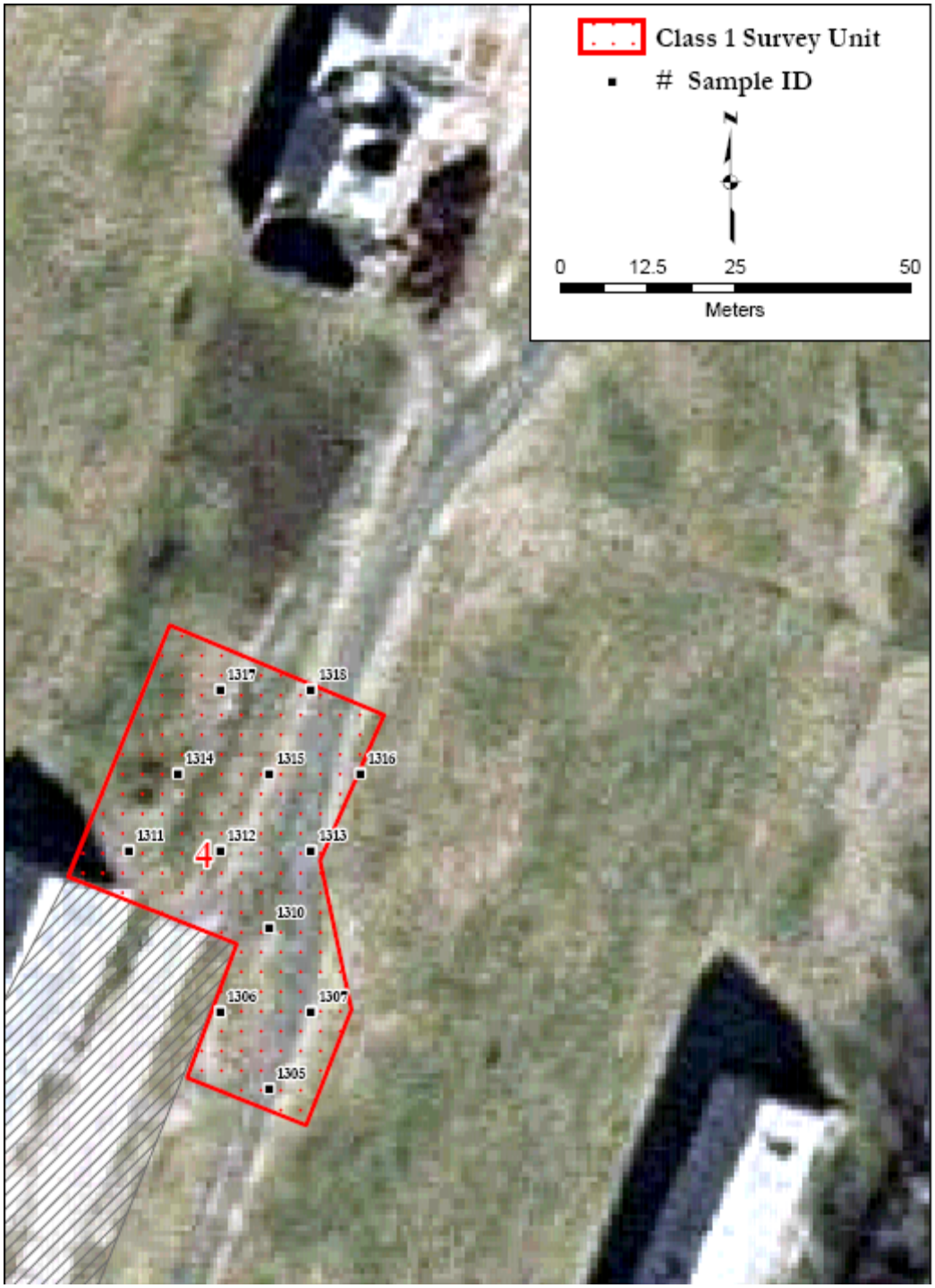


Figure A-53: C1 SU4—FSS Soil Sampling Locations

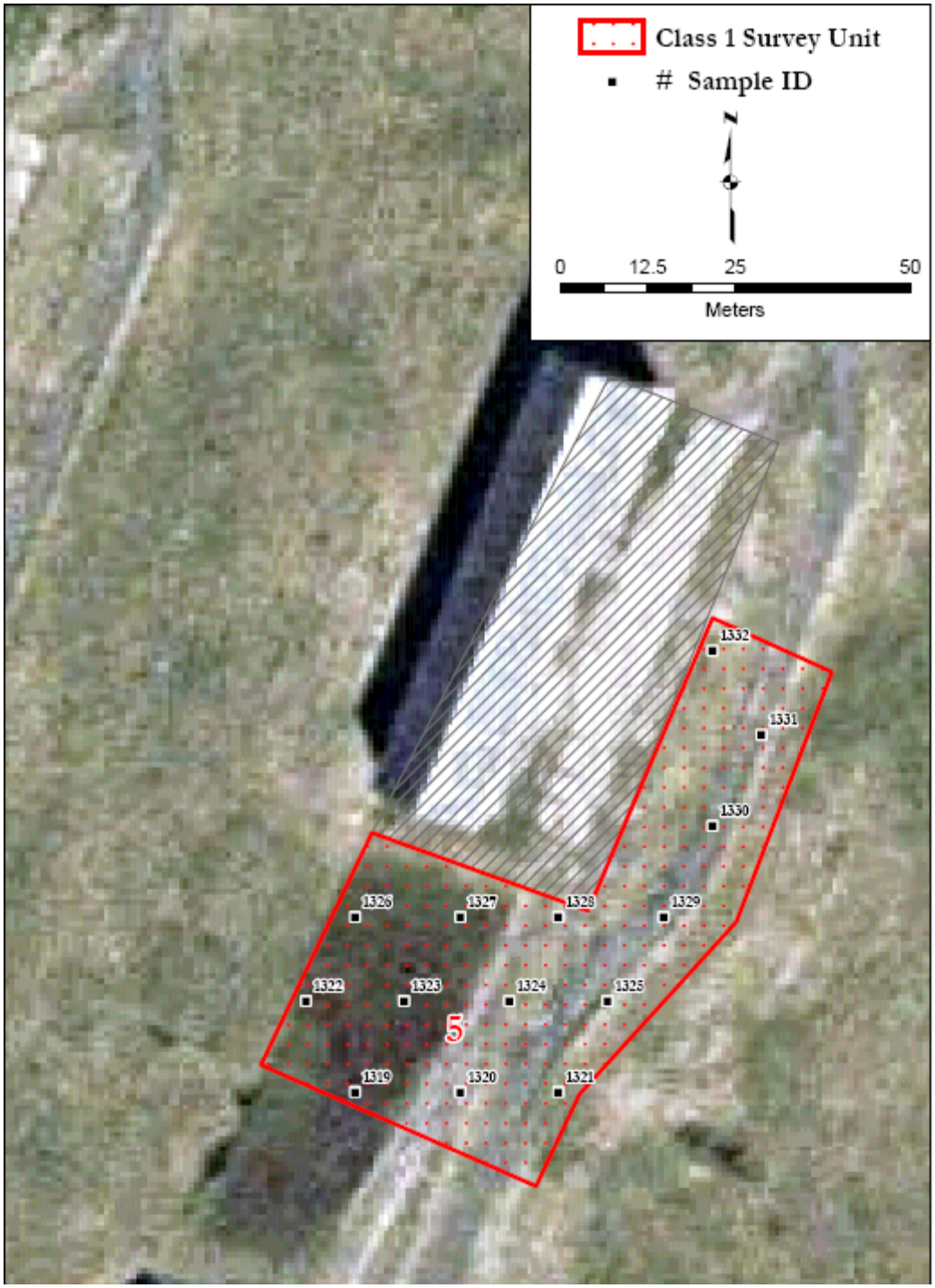


Figure A-54: C1 SU5—FSS Soil Sampling Locations

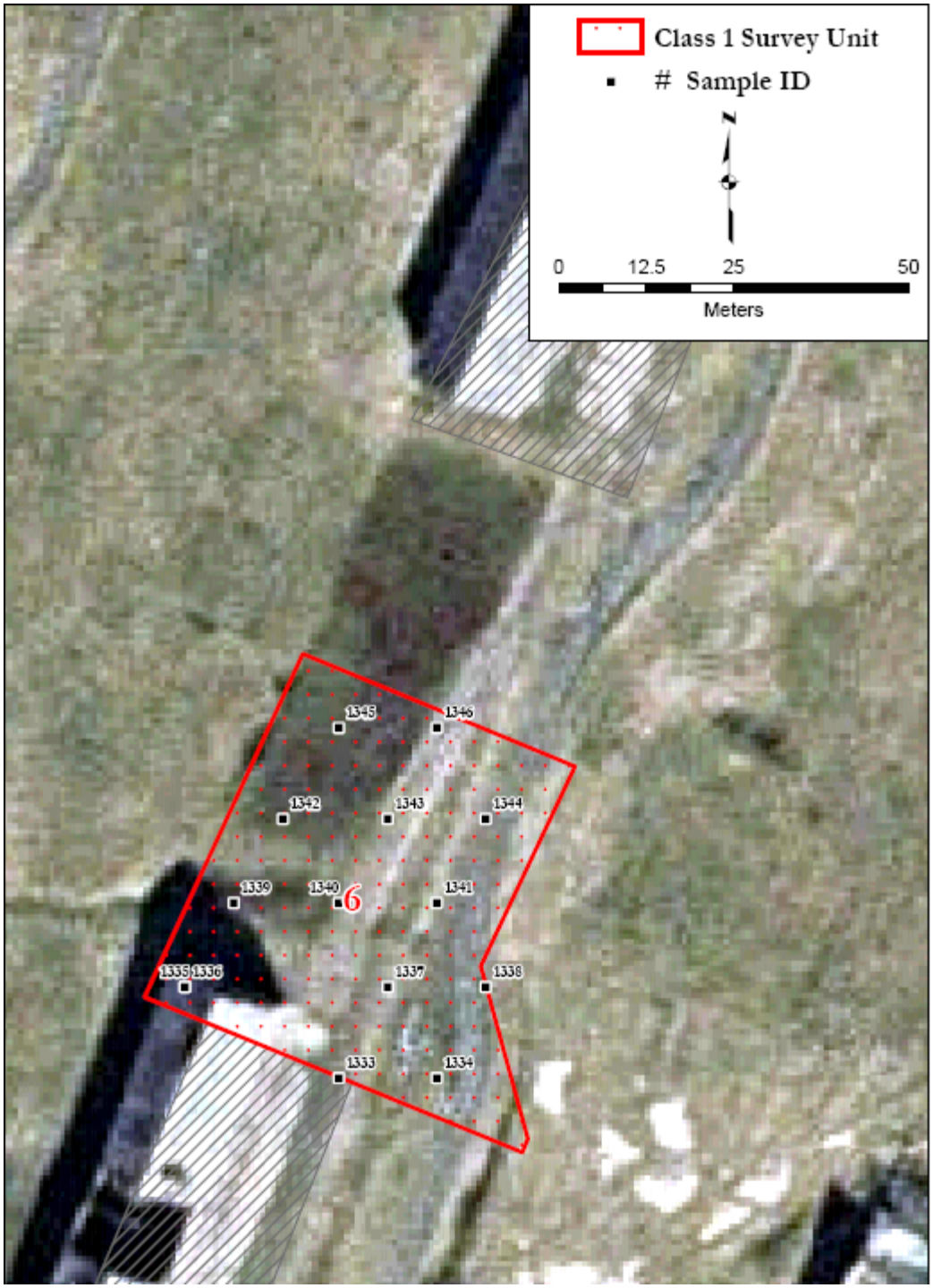


Figure A-55: C1 SU6—FSS Soil Sampling Locations

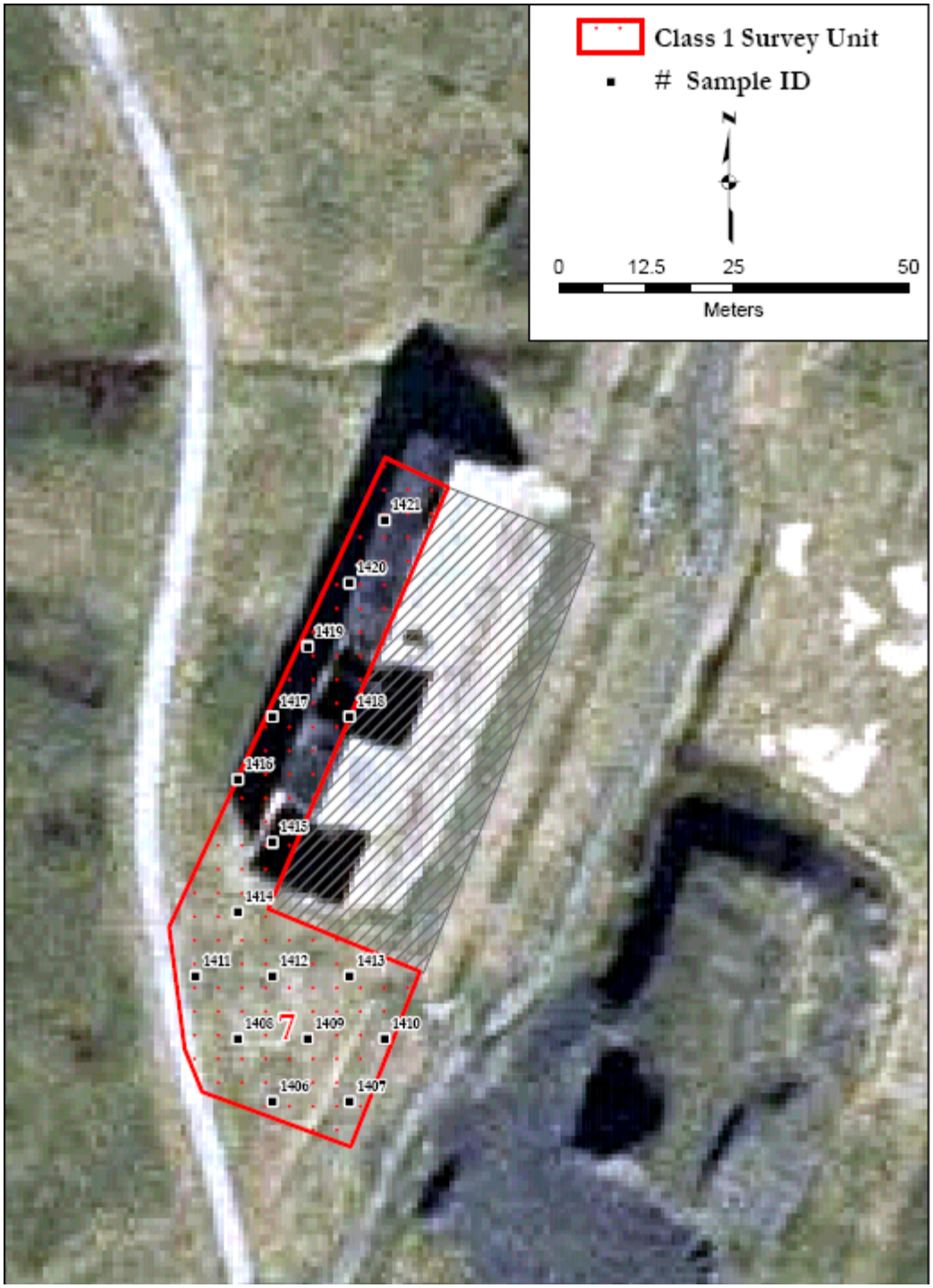


Figure A-56: C1 SU7—FSS Soil Sampling Locations

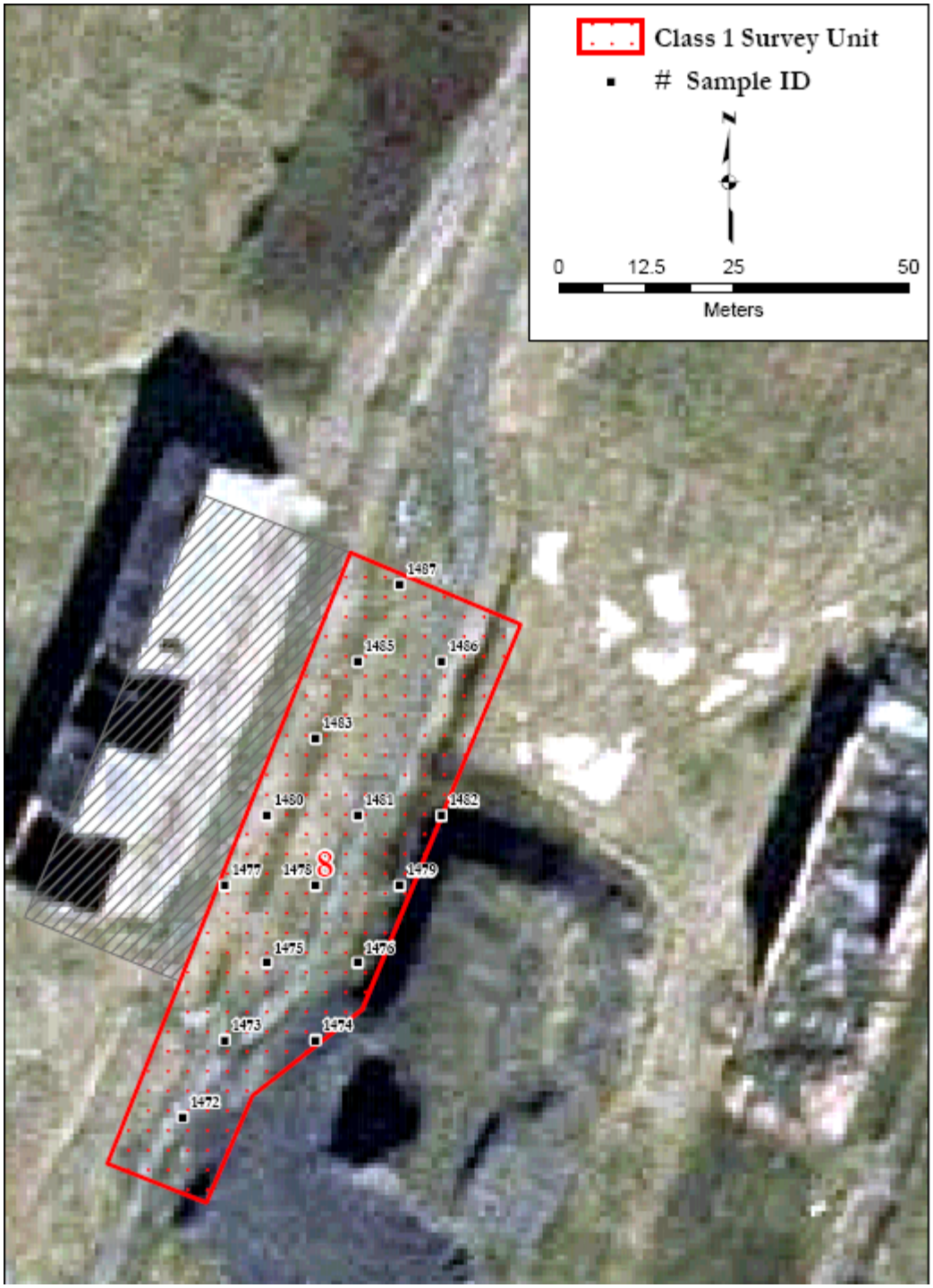


Figure A-57: C1 SU8—FSS Soil Sampling Locations

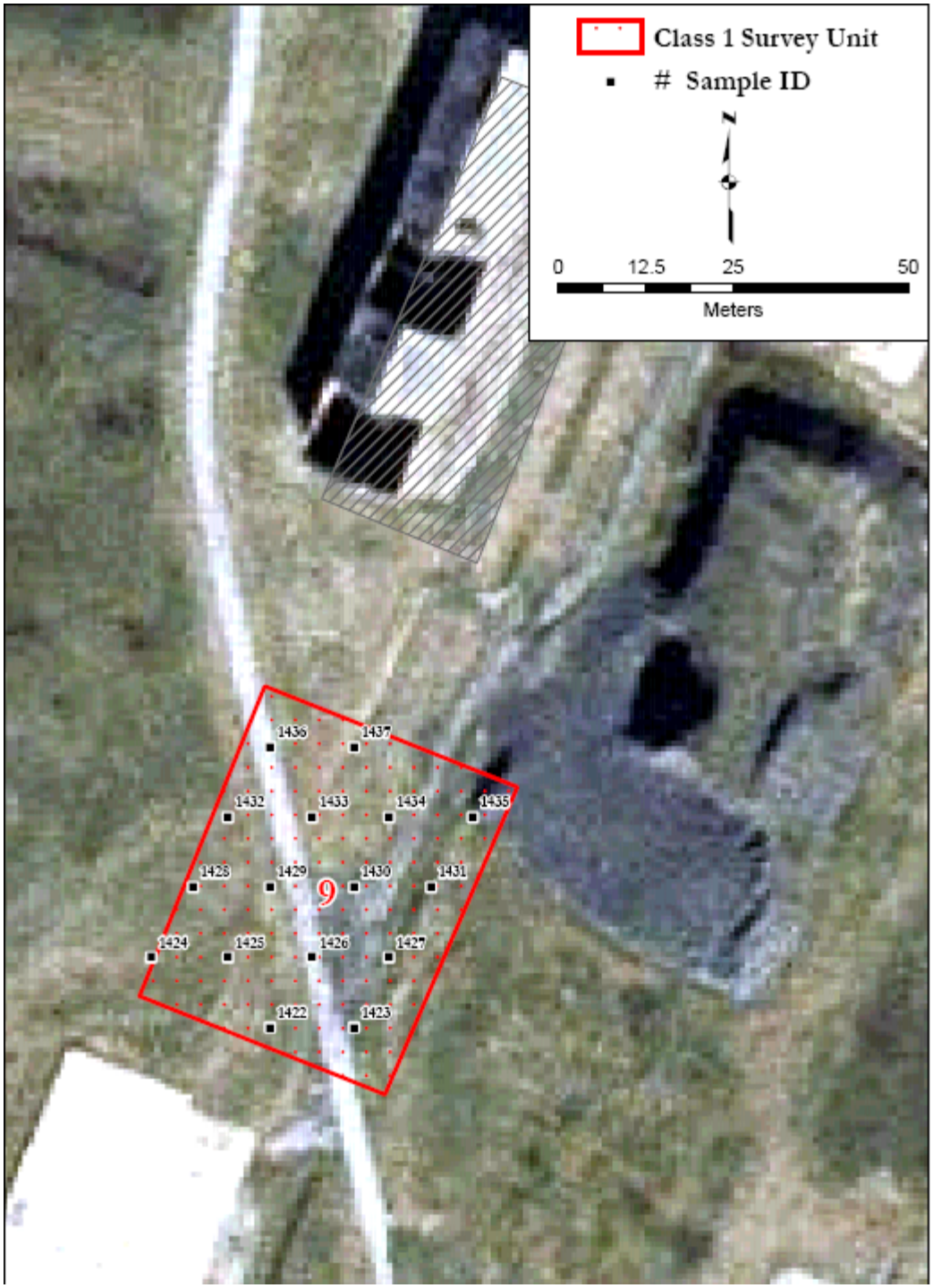


Figure A-58: C1 SU9—FSS Soil Sampling Locations

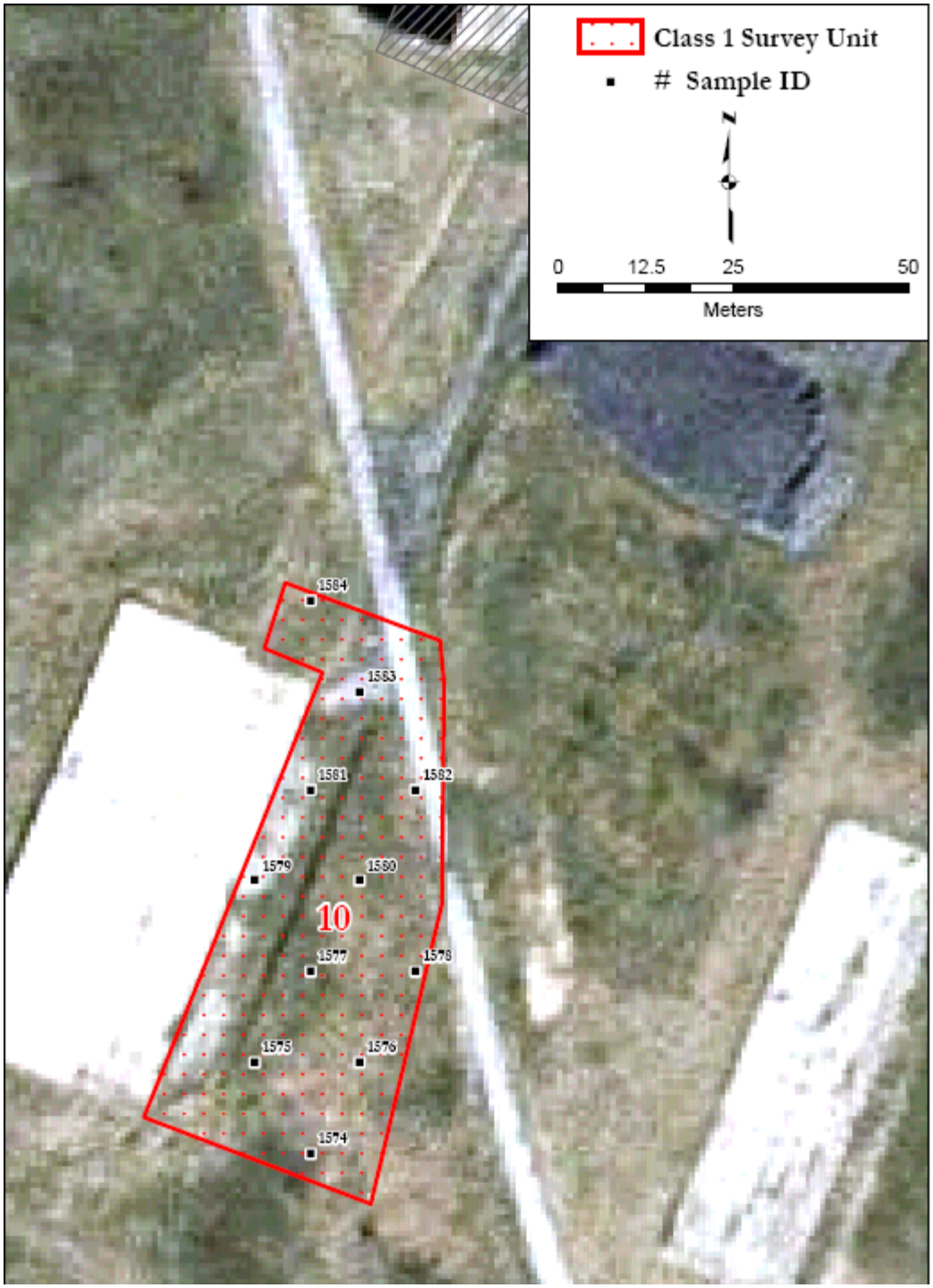


Figure A-59: C1 SU10—FSS Soil Sampling Locations

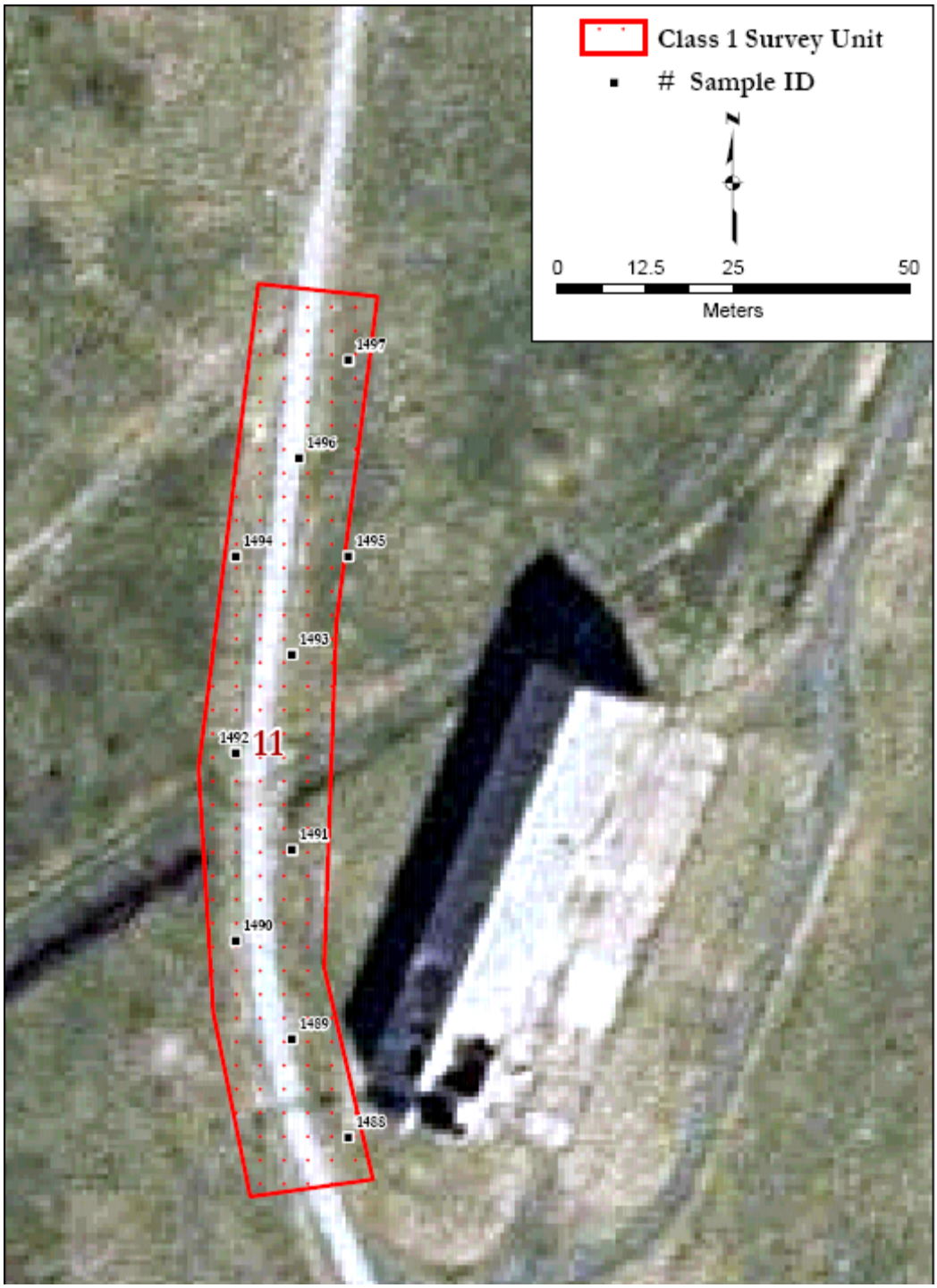


Figure A-60: C1 SU11—FSS Soil Sampling Locations

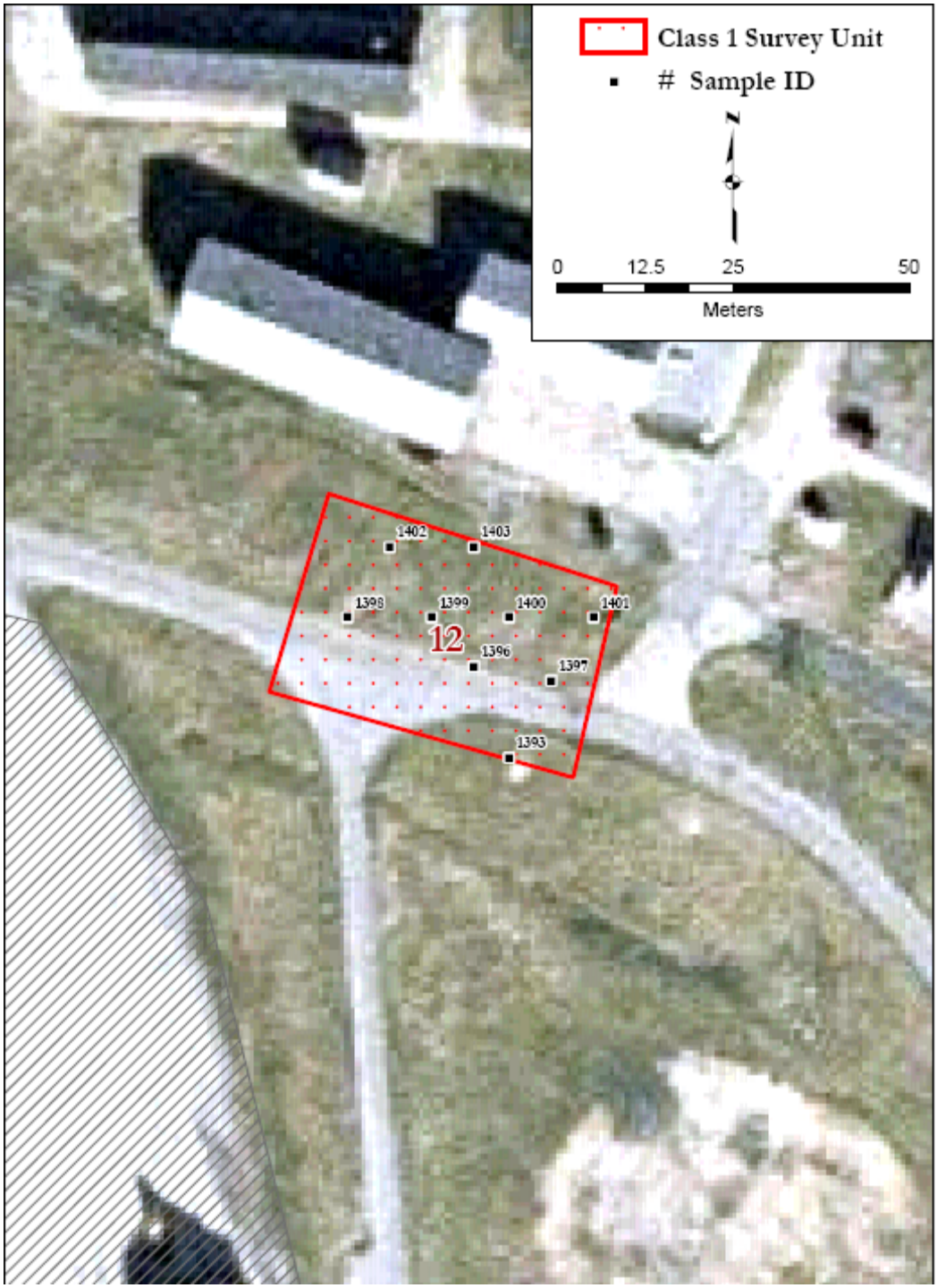


Figure A-61: C1 SU12—FSS Soil Sampling Locations

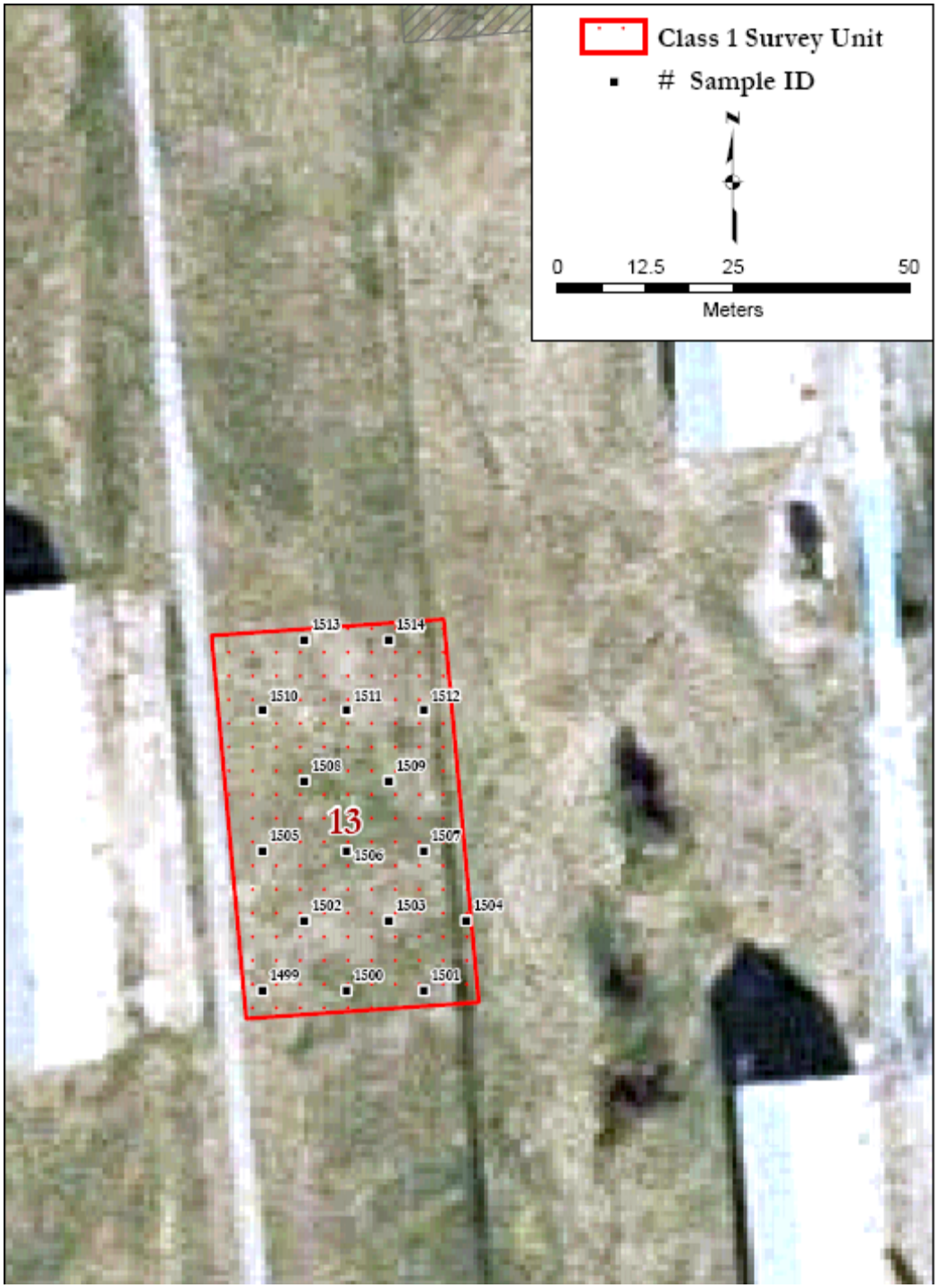


Figure A-62: C1 SU13—FSS Soil Sampling Locations

Figure A-63: C1 SU14—FSS Soil Sampling Locations

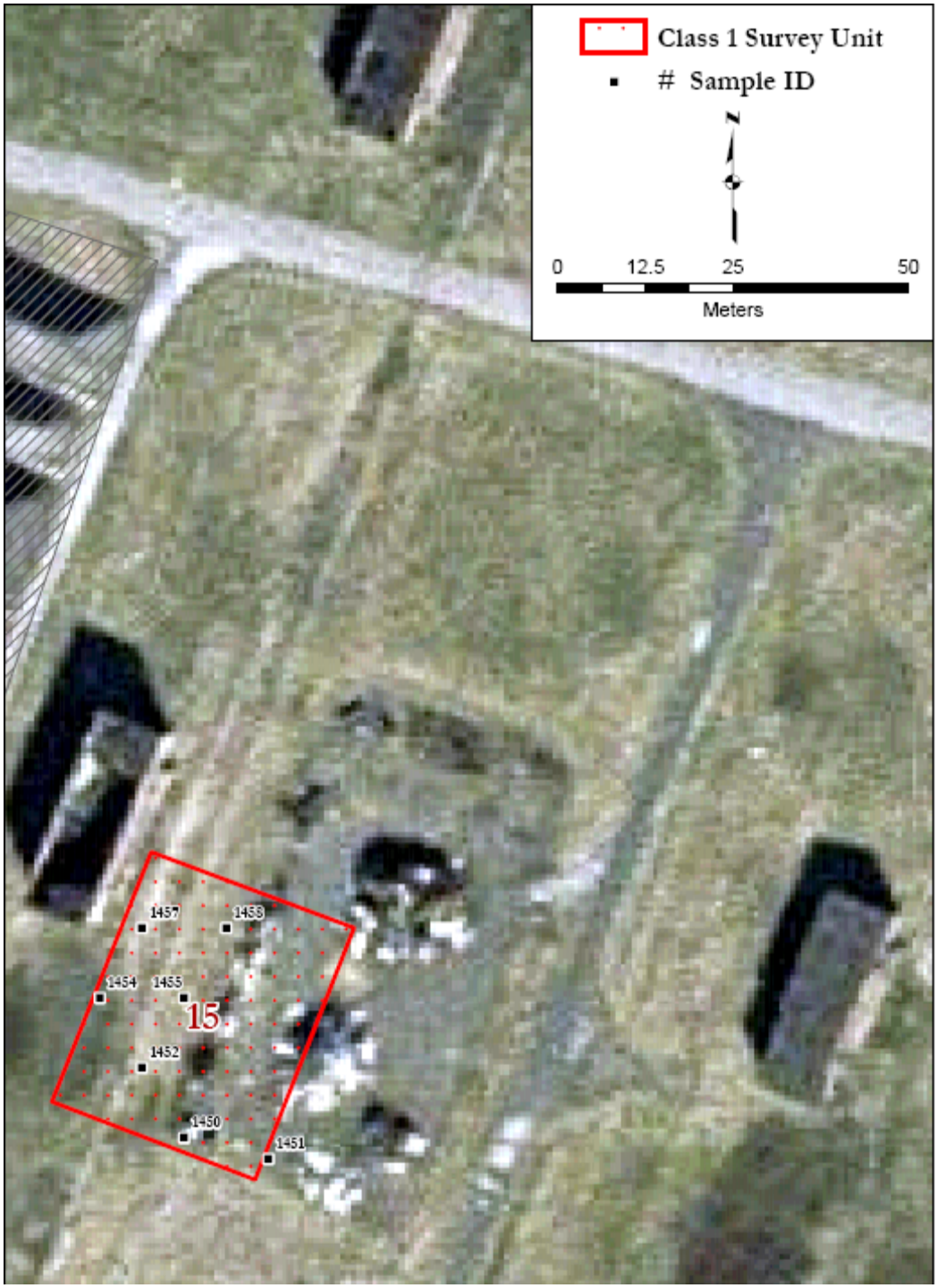


Figure A-64: C1 SU15—FSS Soil Sampling Locations

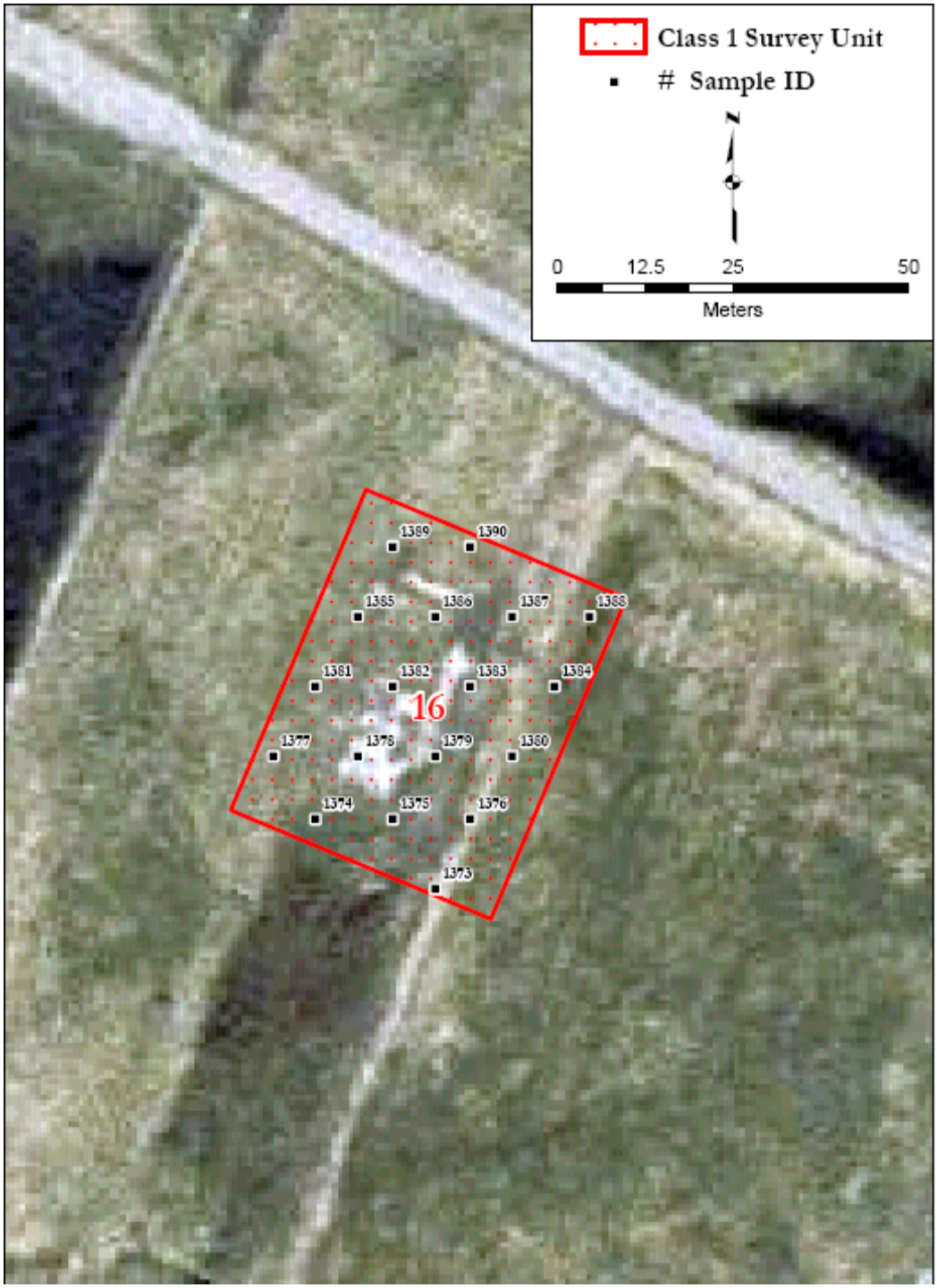


Figure A-65: C1 SU16—FSS Soil Sampling Locations

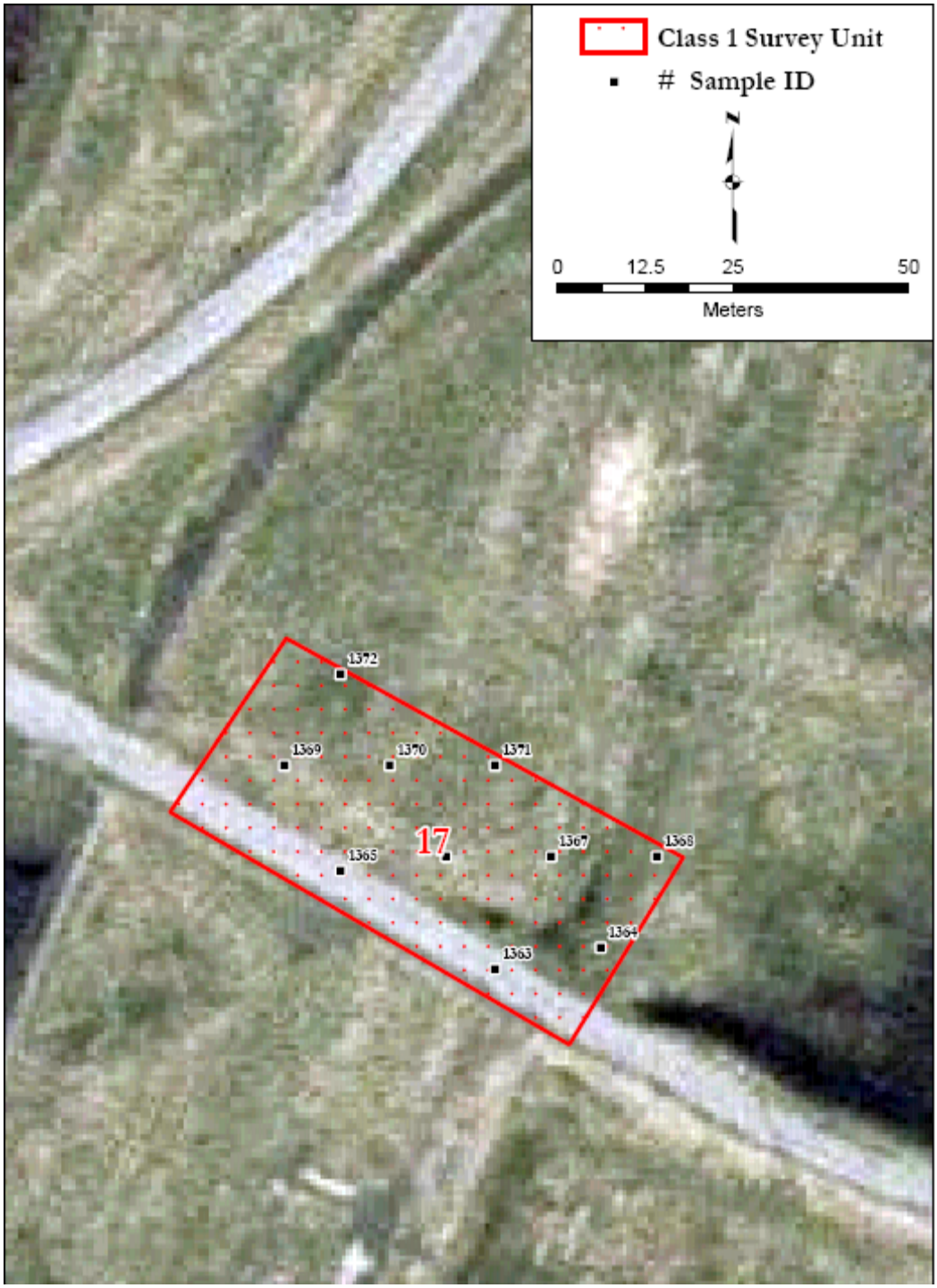


Figure A-66: C1 SU17—FSS Soil Sampling Locations

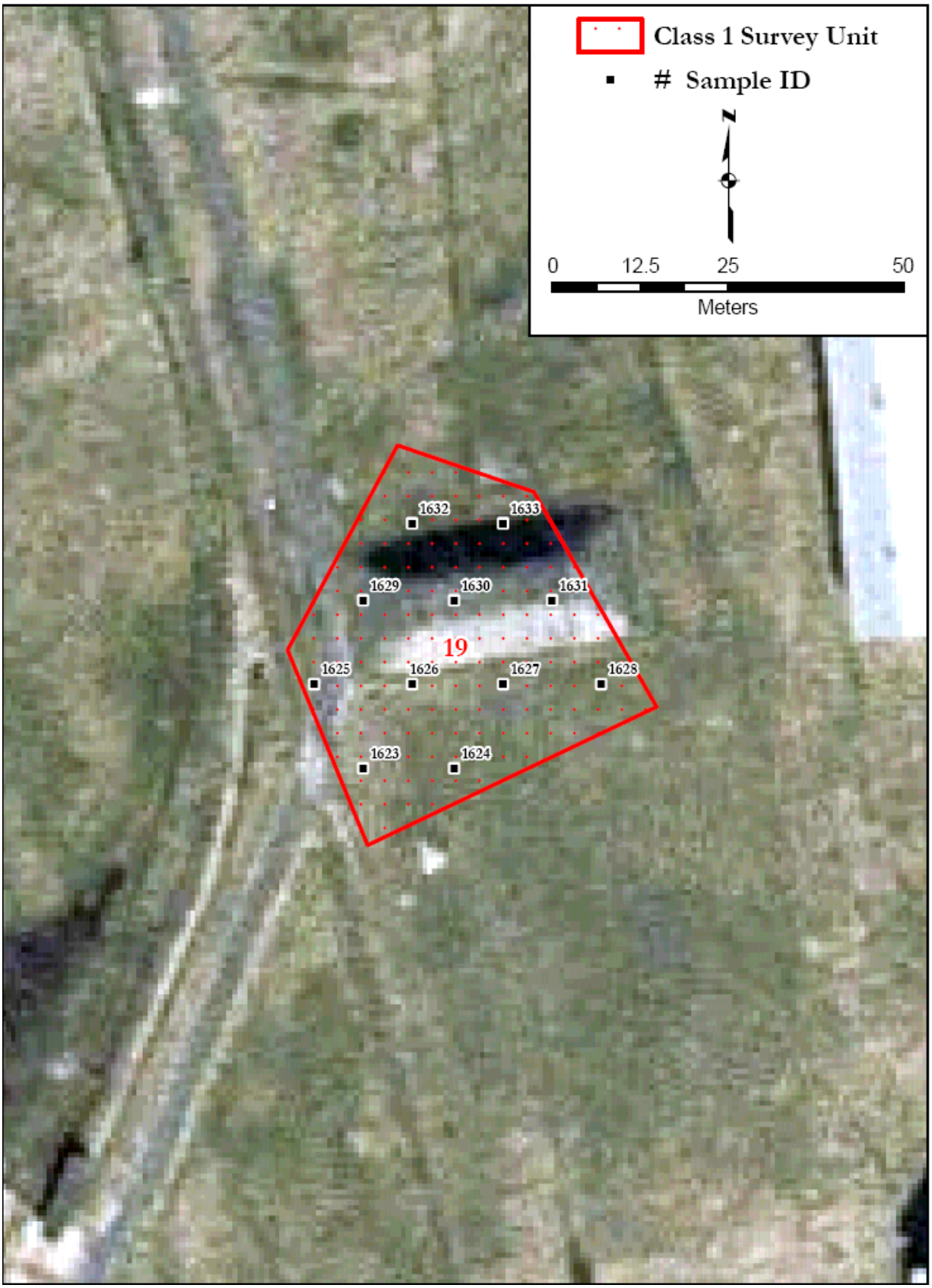


Figure A-67: C1 SU19—FSS Soil Sampling Locations

Figure A-68: C1 SU20—FSS Soil Sampling Locations

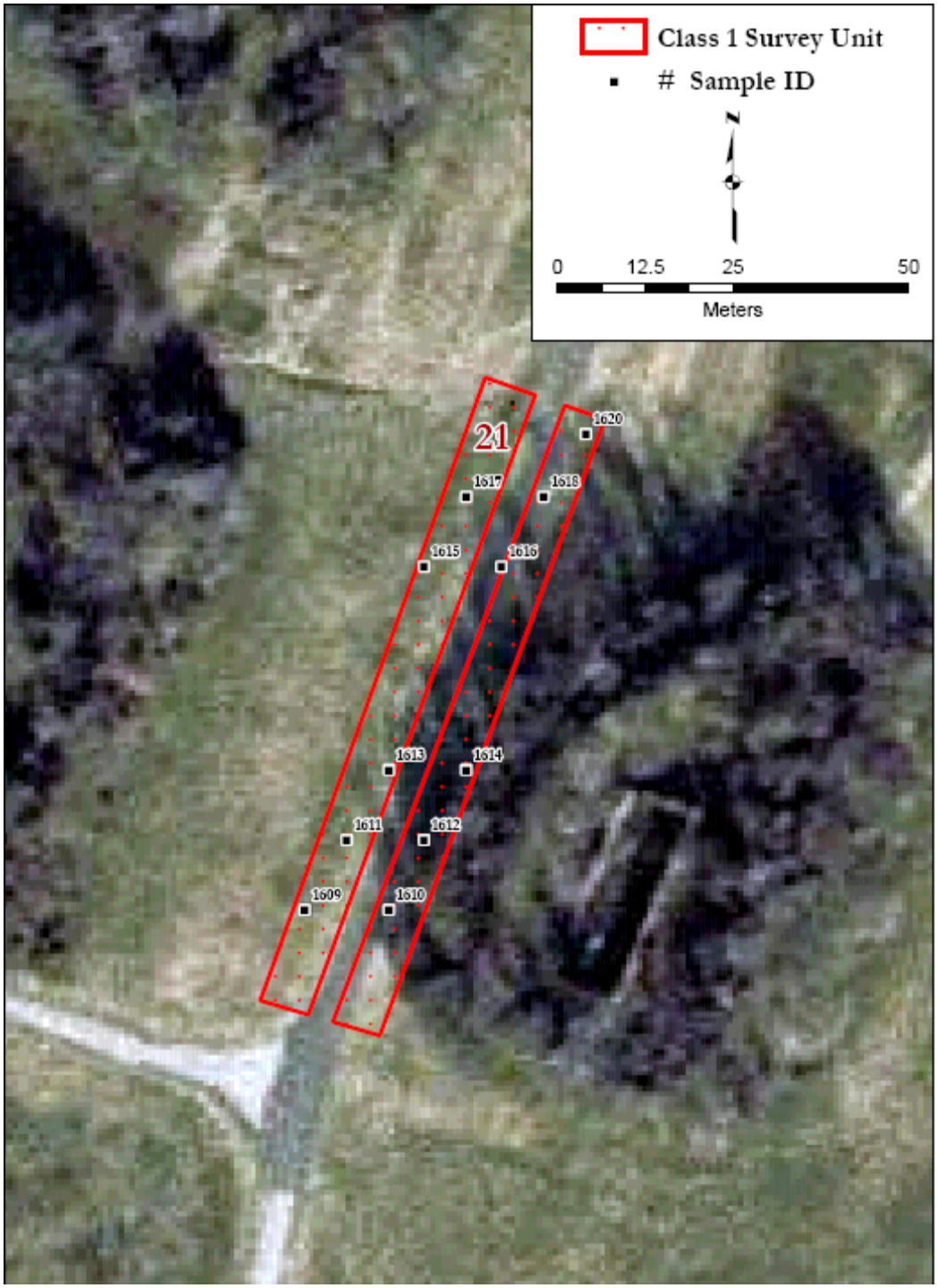


Figure A-69: C1 SU21—FSS Soil Sampling Locations

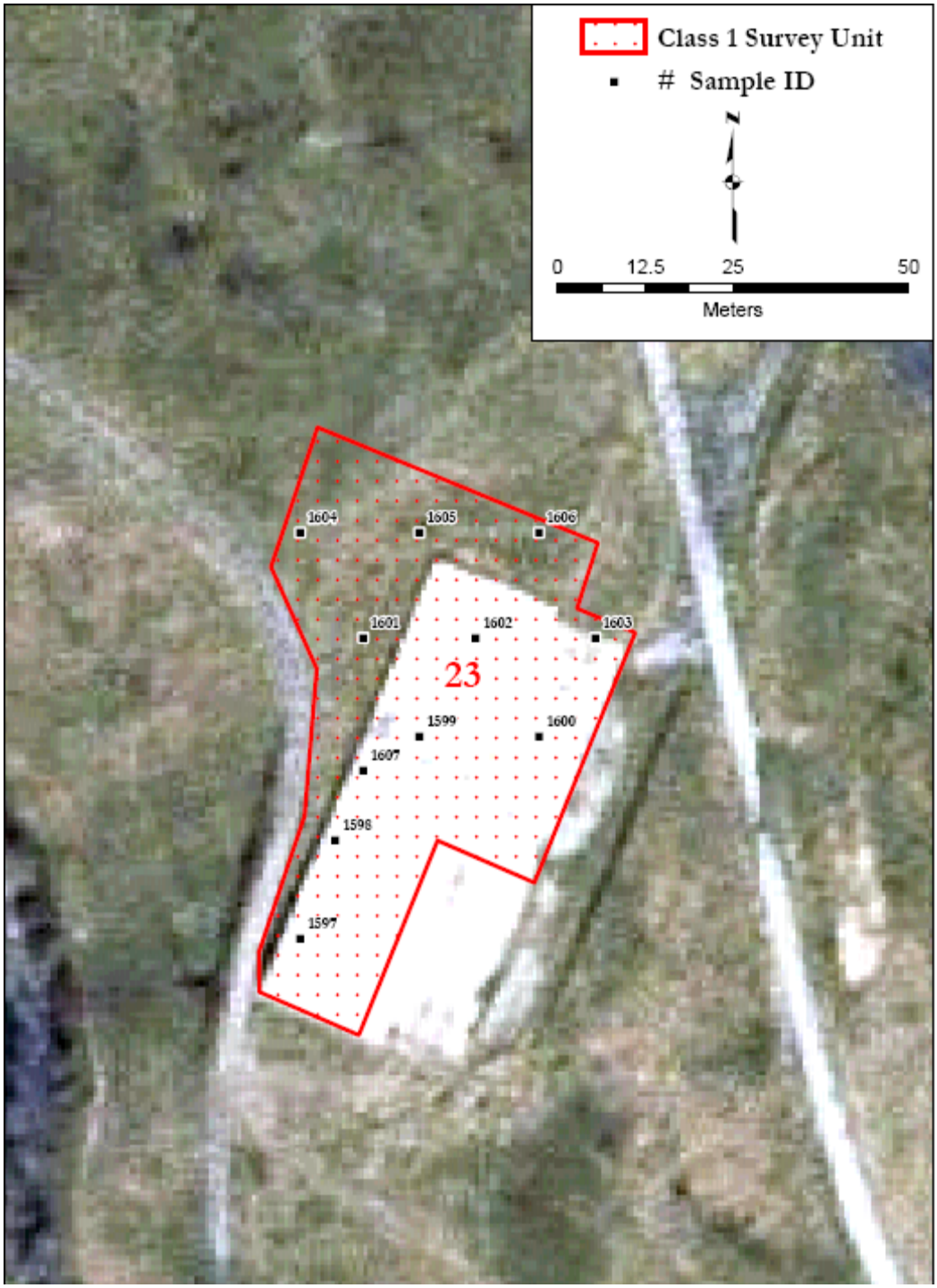


Figure A-70: C1 SU23—FSS Soil Sampling Locations

Figure A-71: C1 SU24—FSS Soil Sampling Locations

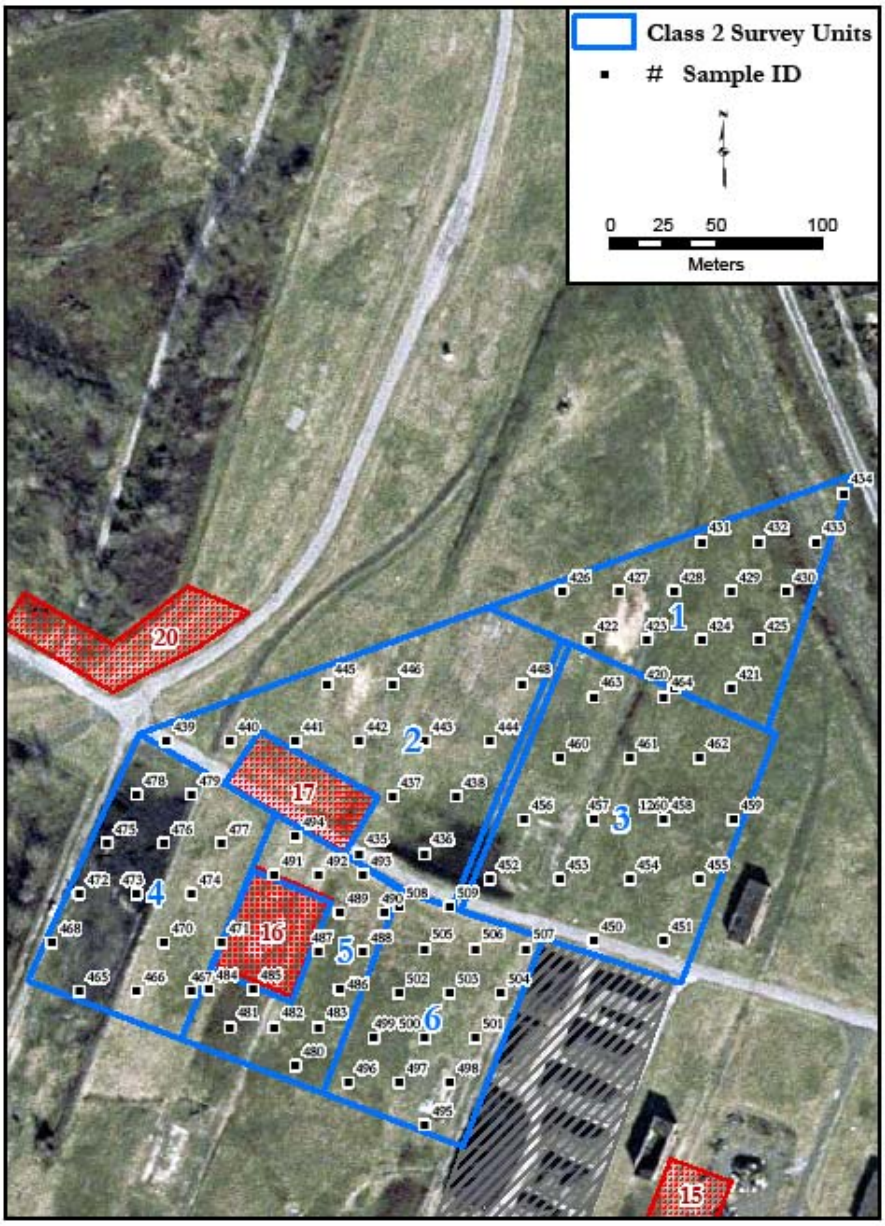


Figure A-72: C2 SU1 through 6—FSS Soil Sampling Locations

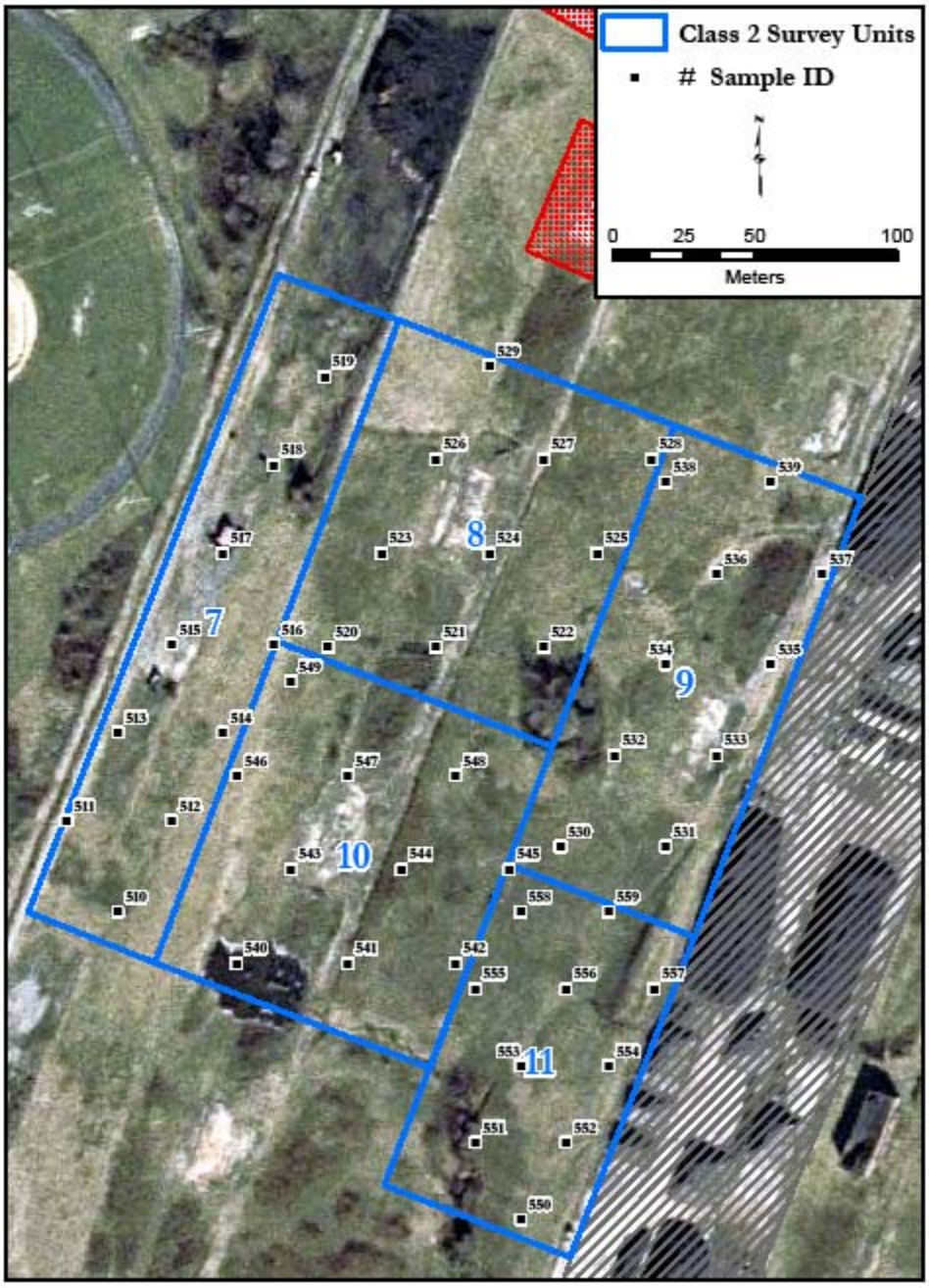


Figure A-73: C2 SU7 through 11—FSS Soil Sampling Locations

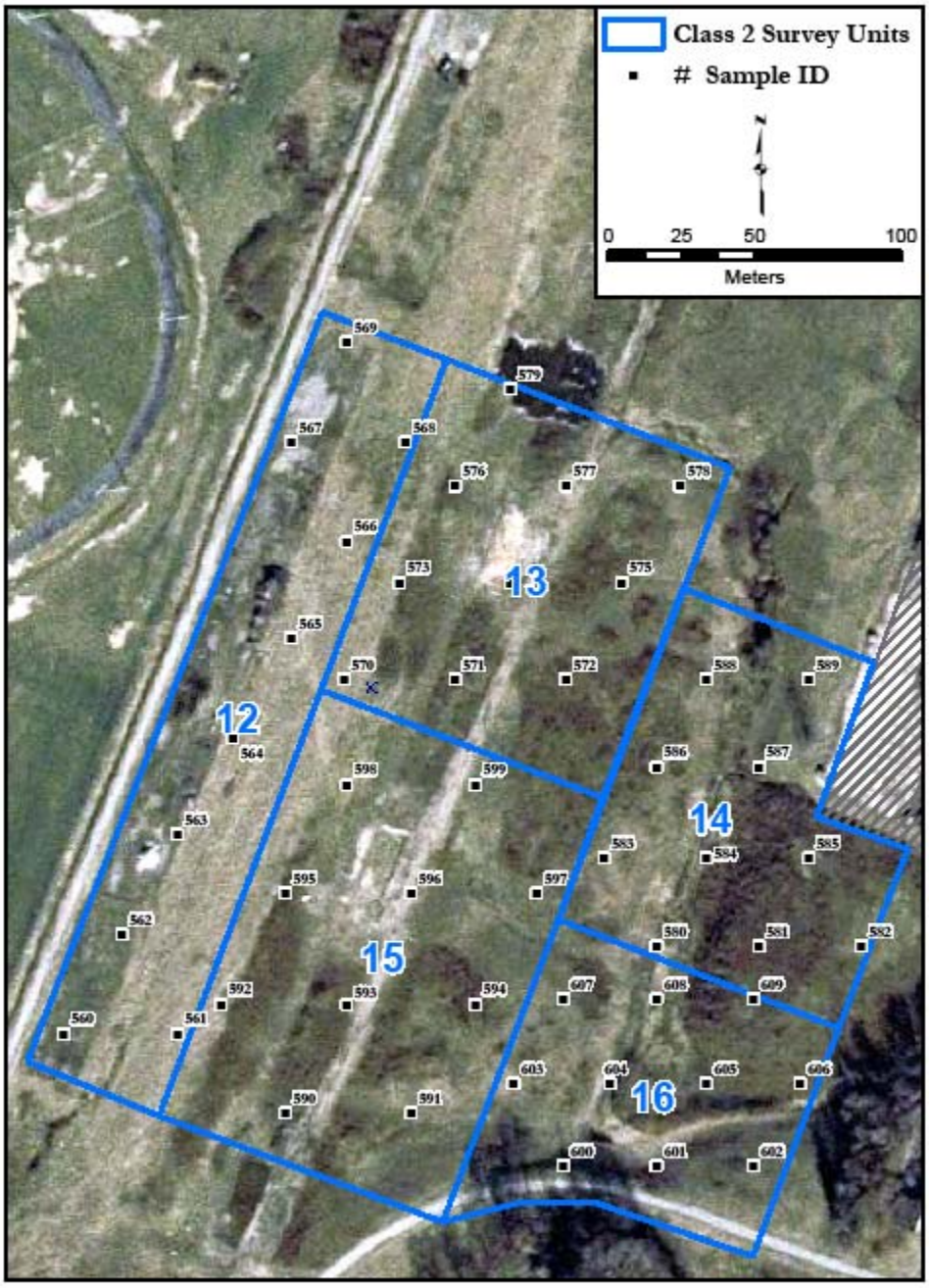


Figure A-74: C2 SU12 through 16—FSS Soil Sampling Locations

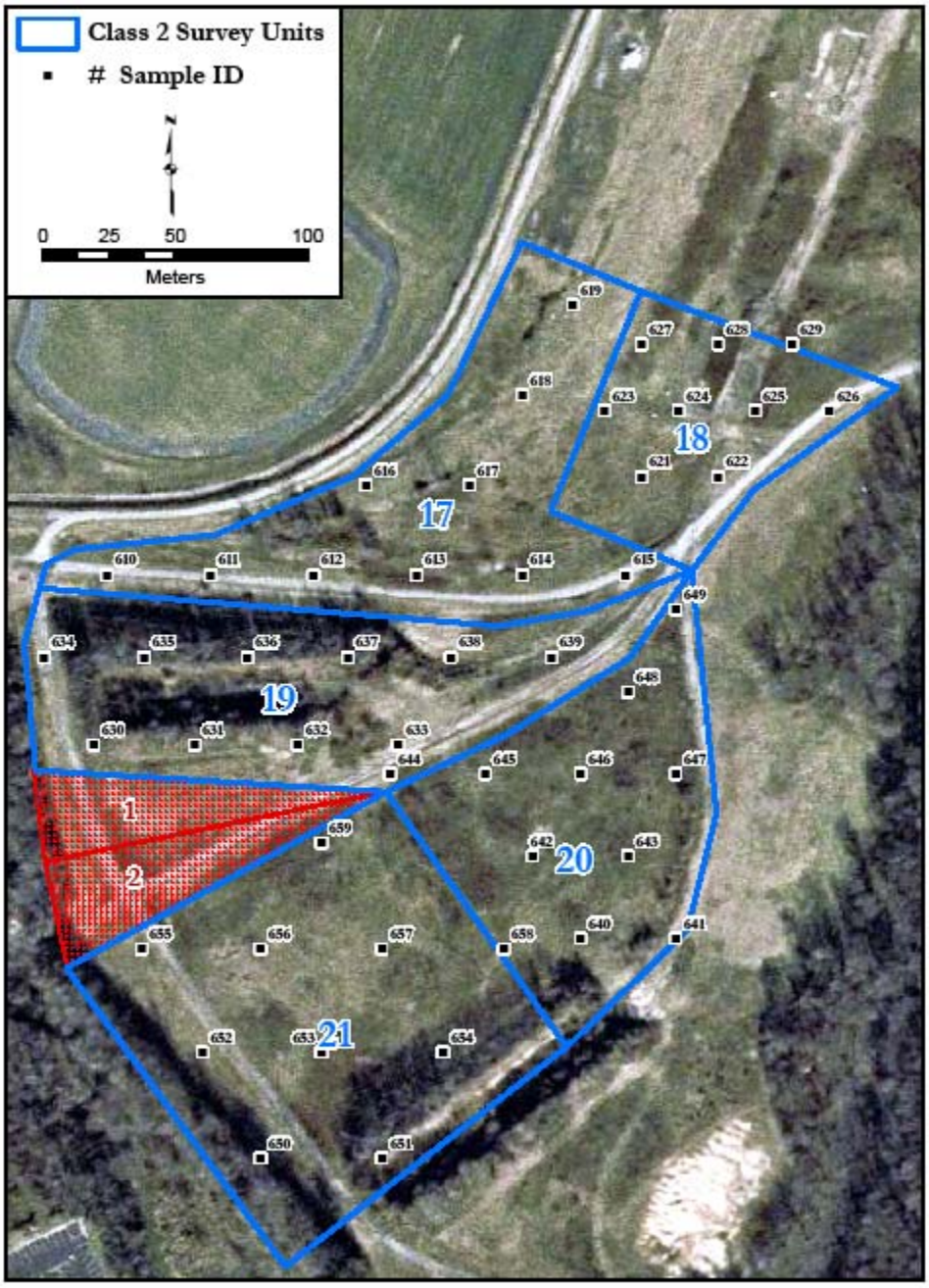


Figure A-75: C2 SU17 through 21—FSS Soil Sampling Locations

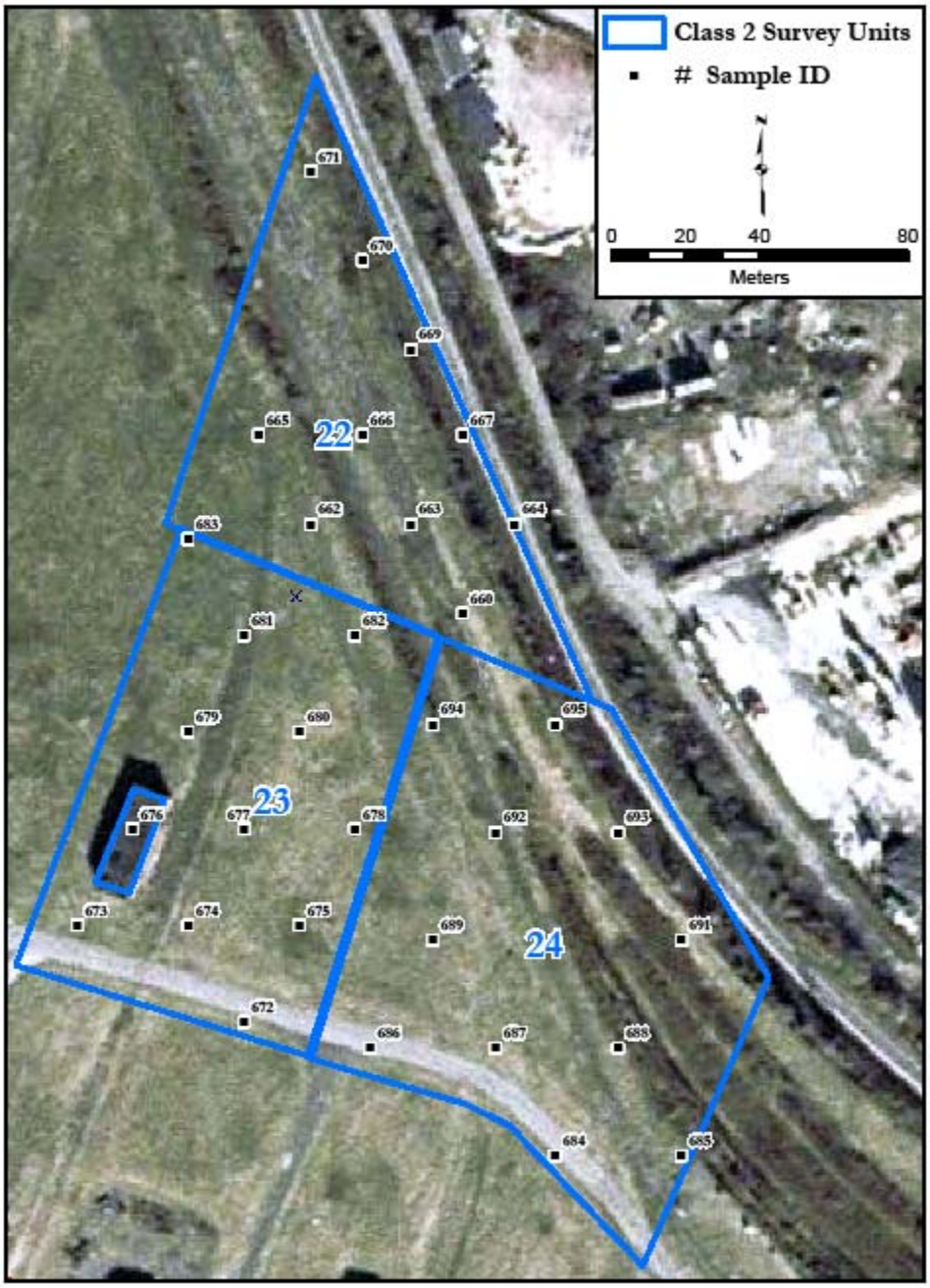


Figure A-76: C2 SU22 through 24—FSS Soil Sampling Locations

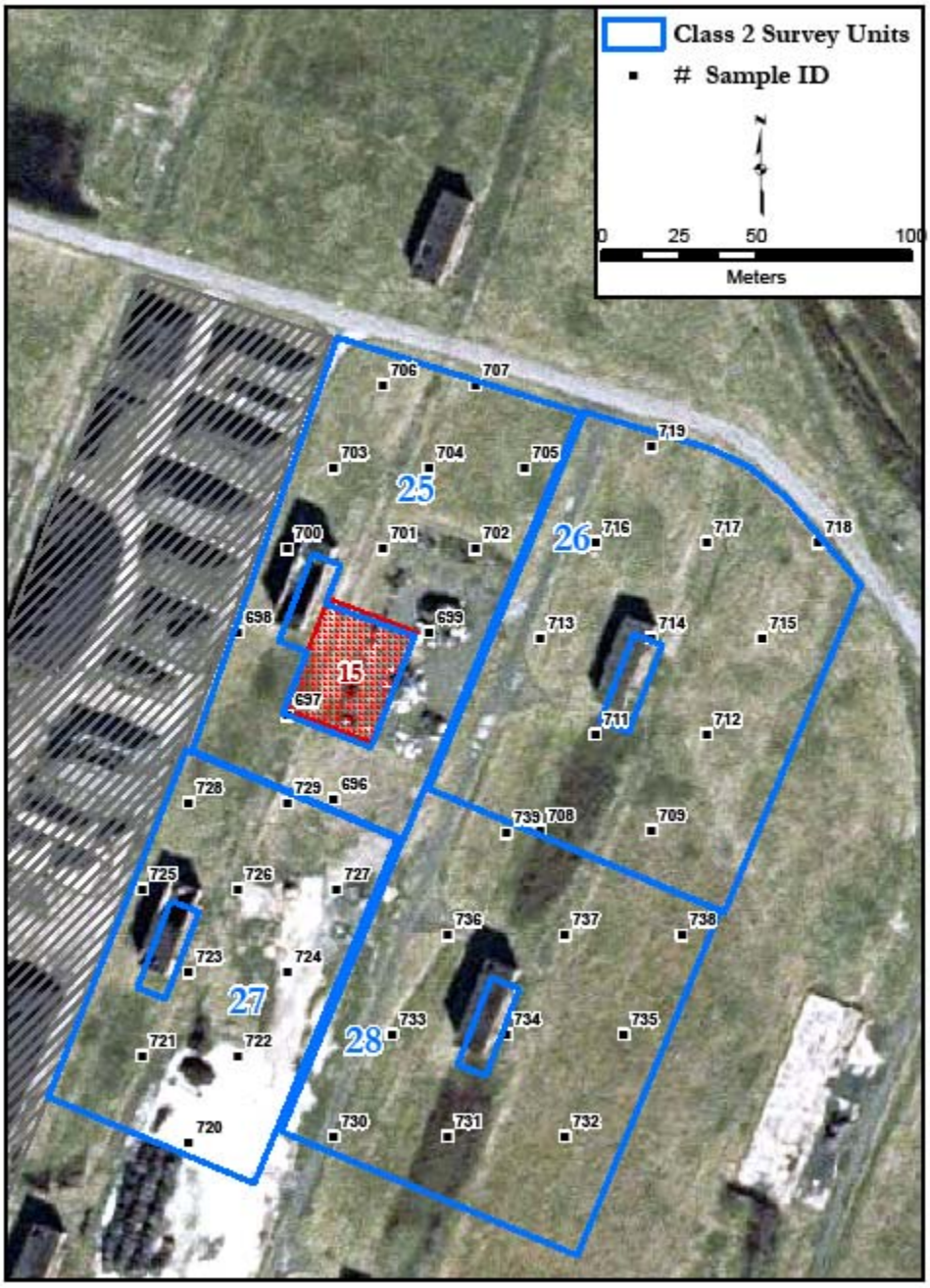


Figure A-77: C2 SU25 through 28—FSS Soil Sampling Locations

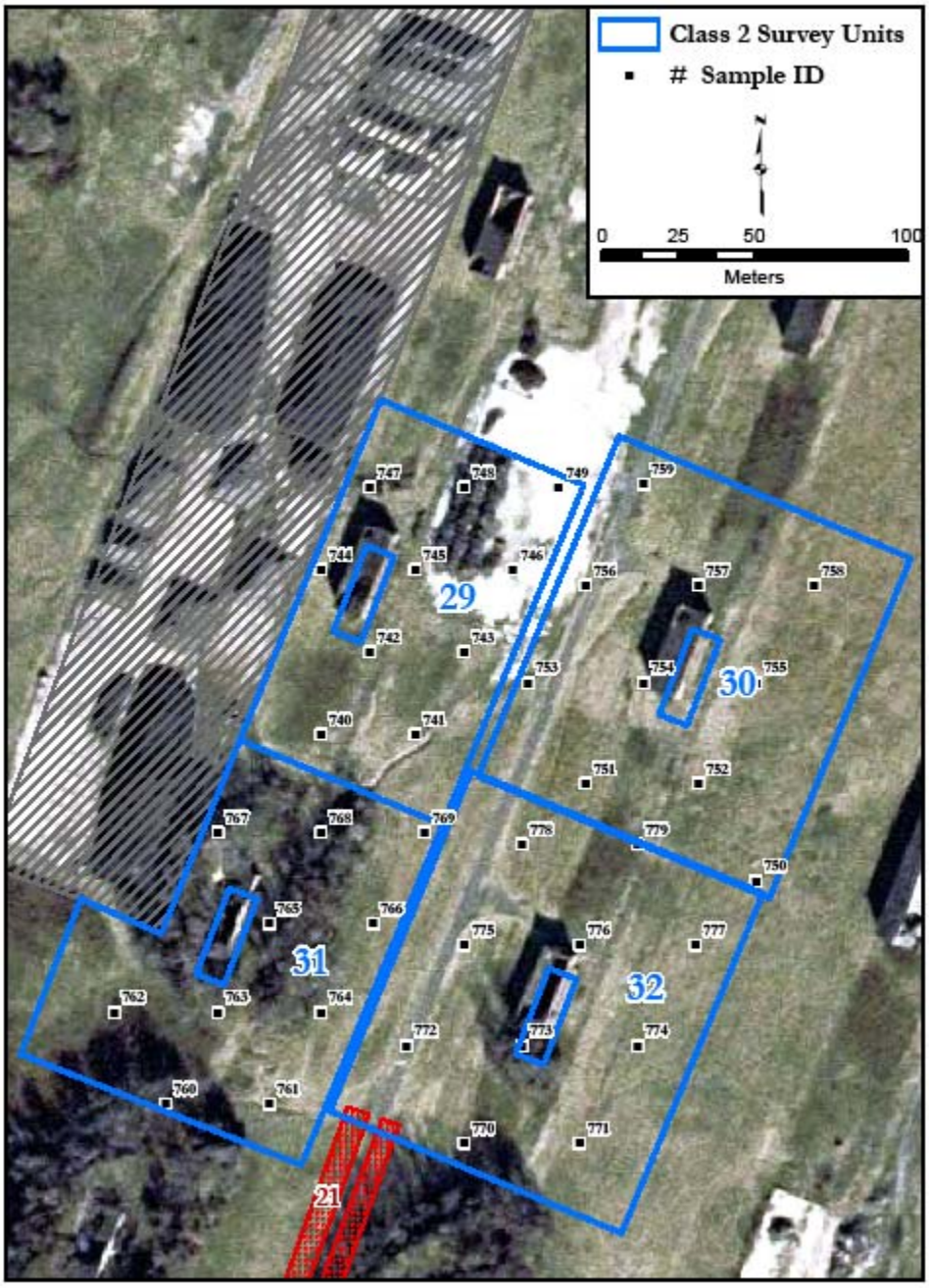


Figure A-78: C2 SU29 through 32—FSS Soil Sampling Locations

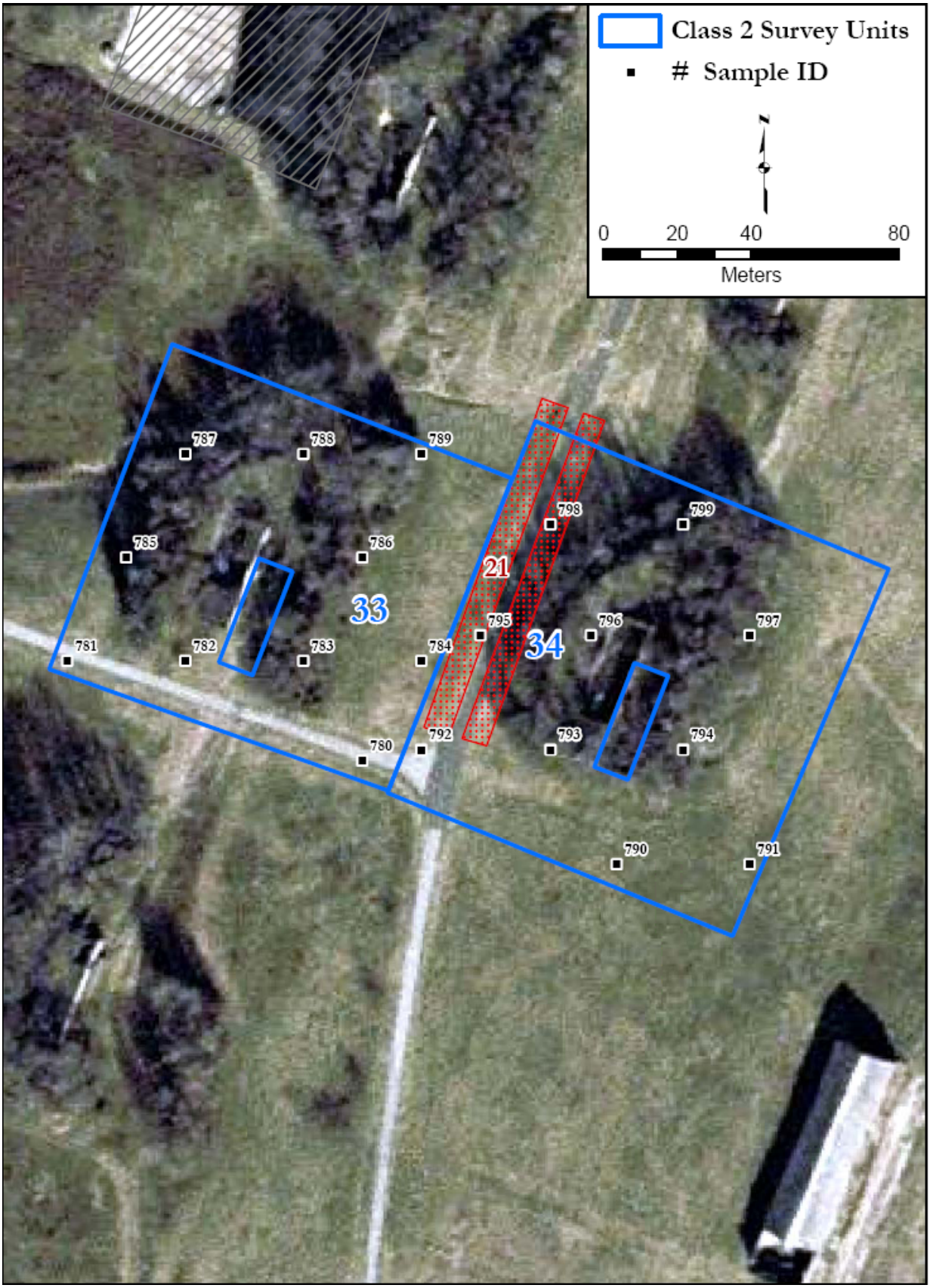


Figure A-79: C2 SU33 and 34—FSS Soil Sampling Locations

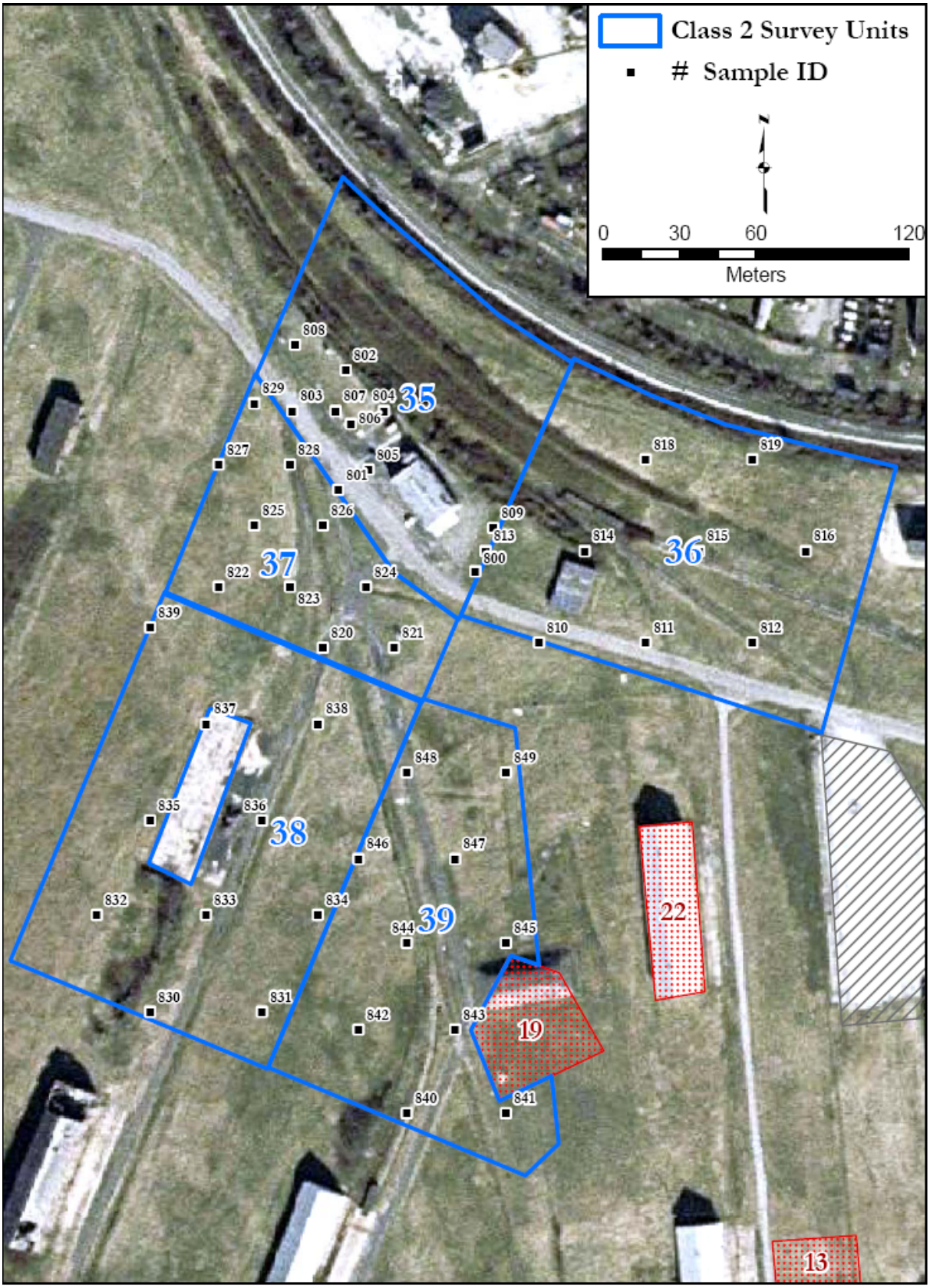


Figure A-80: C2 SU35 through 39—FSS Soil Sampling Locations

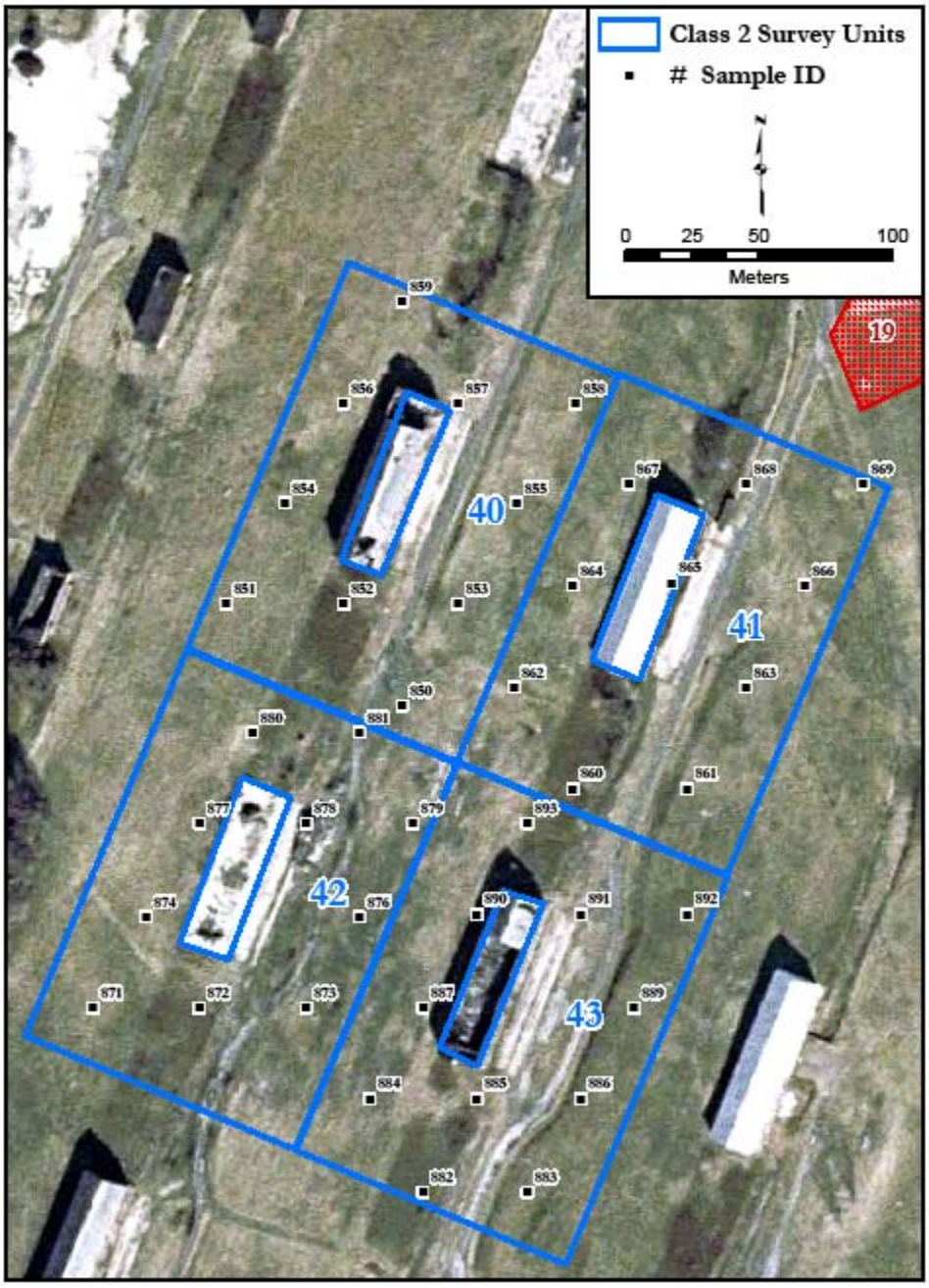


Figure A-81: C2 SU40 through 43—FSS Soil Sampling Locations

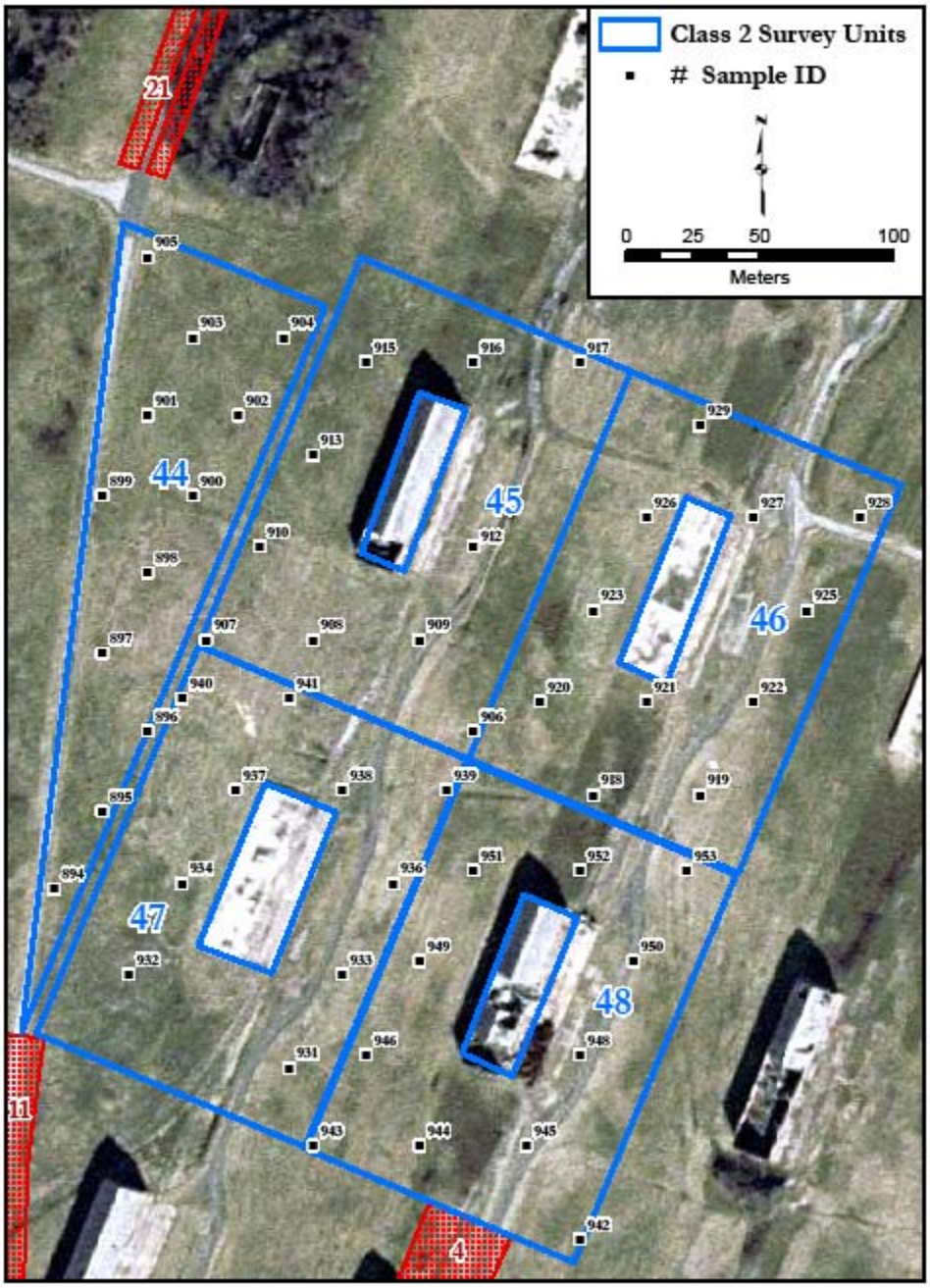


Figure A-82: C2 SU44 through 48—FSS Soil Sampling Locations

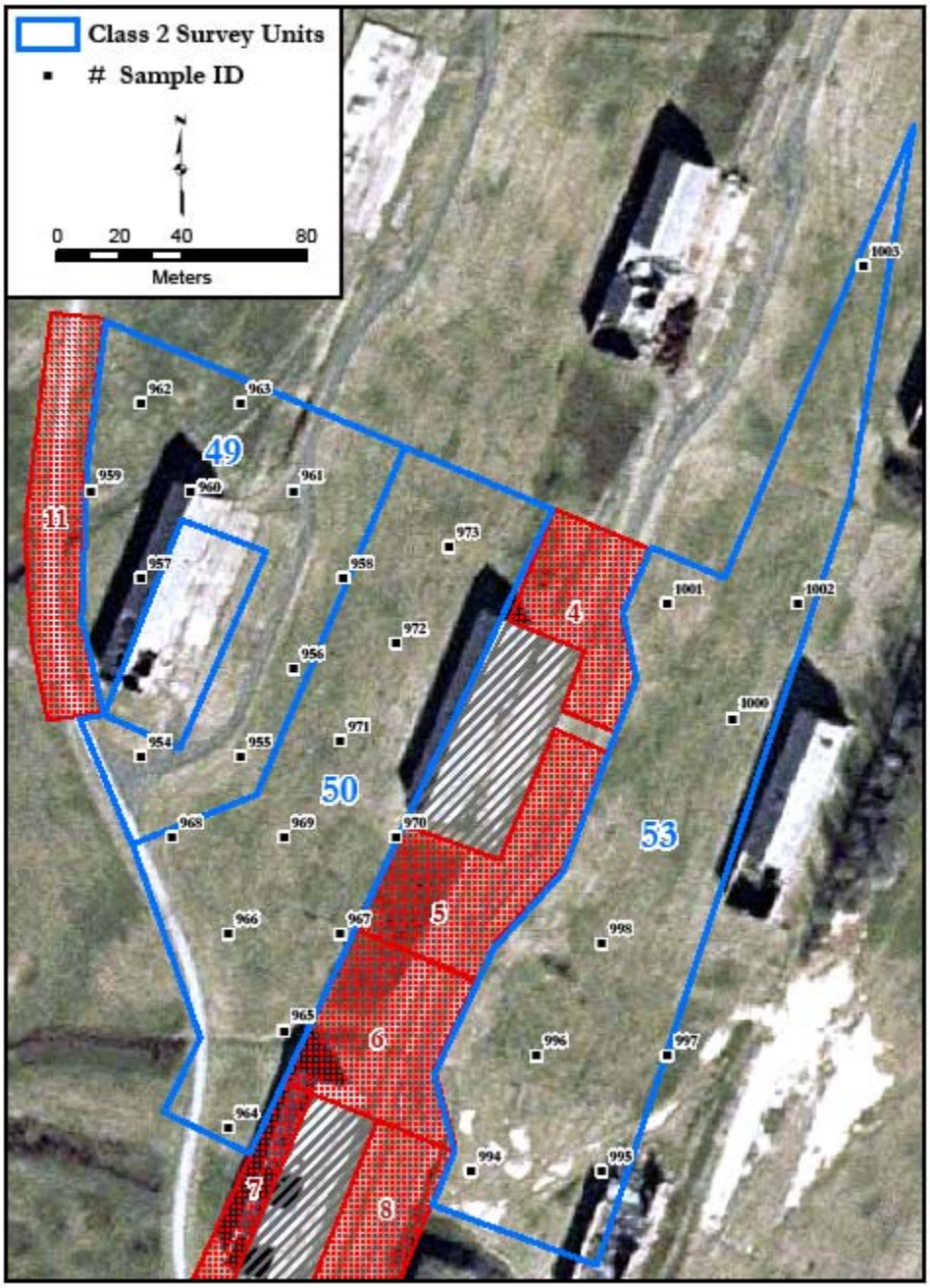


Figure A-83: C2 SU49, 50, and 53—FSS Soil Sampling Locations

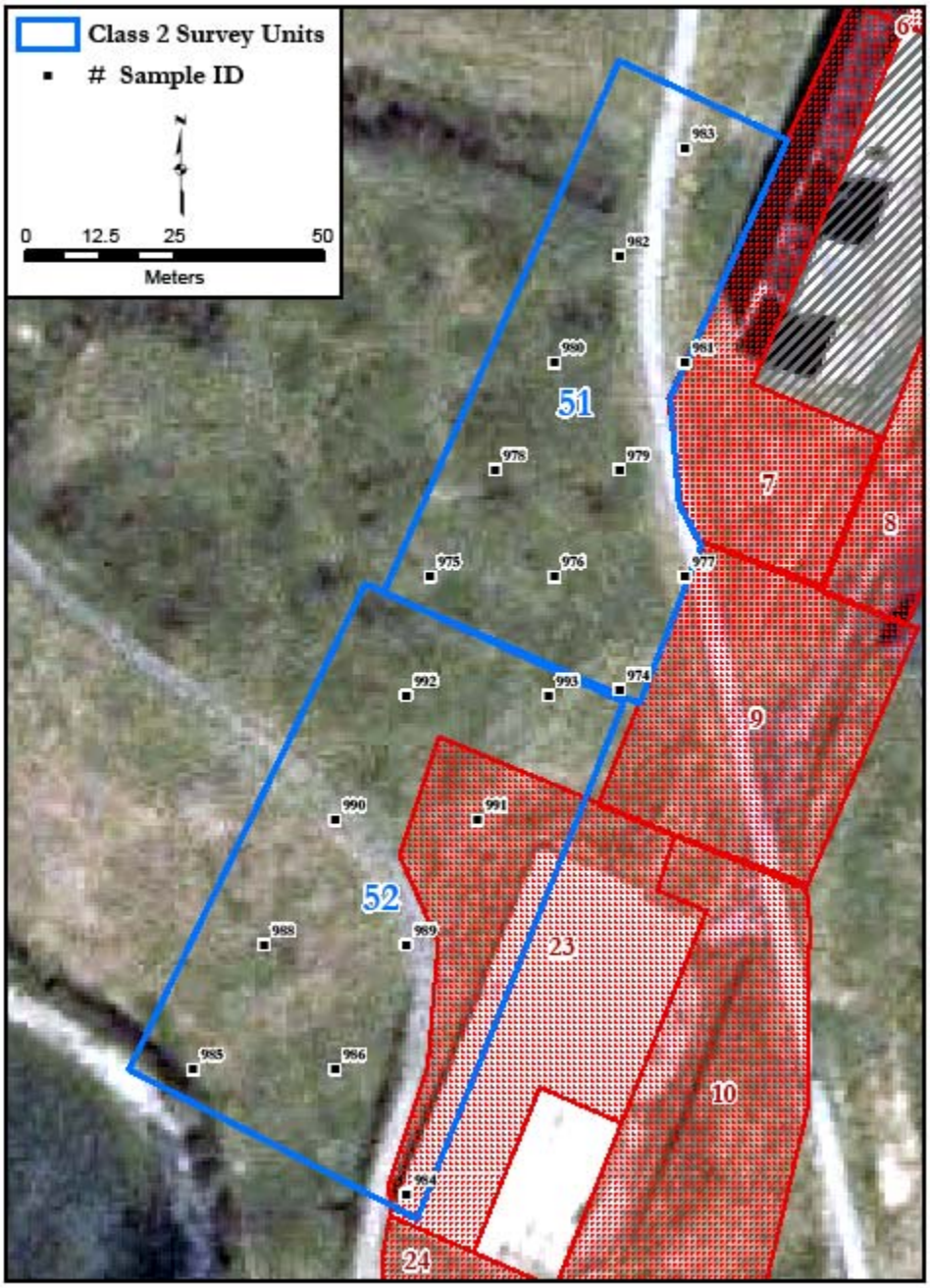


Figure A-84: C2 SU51 and 52—FSS Soil Sampling Locations

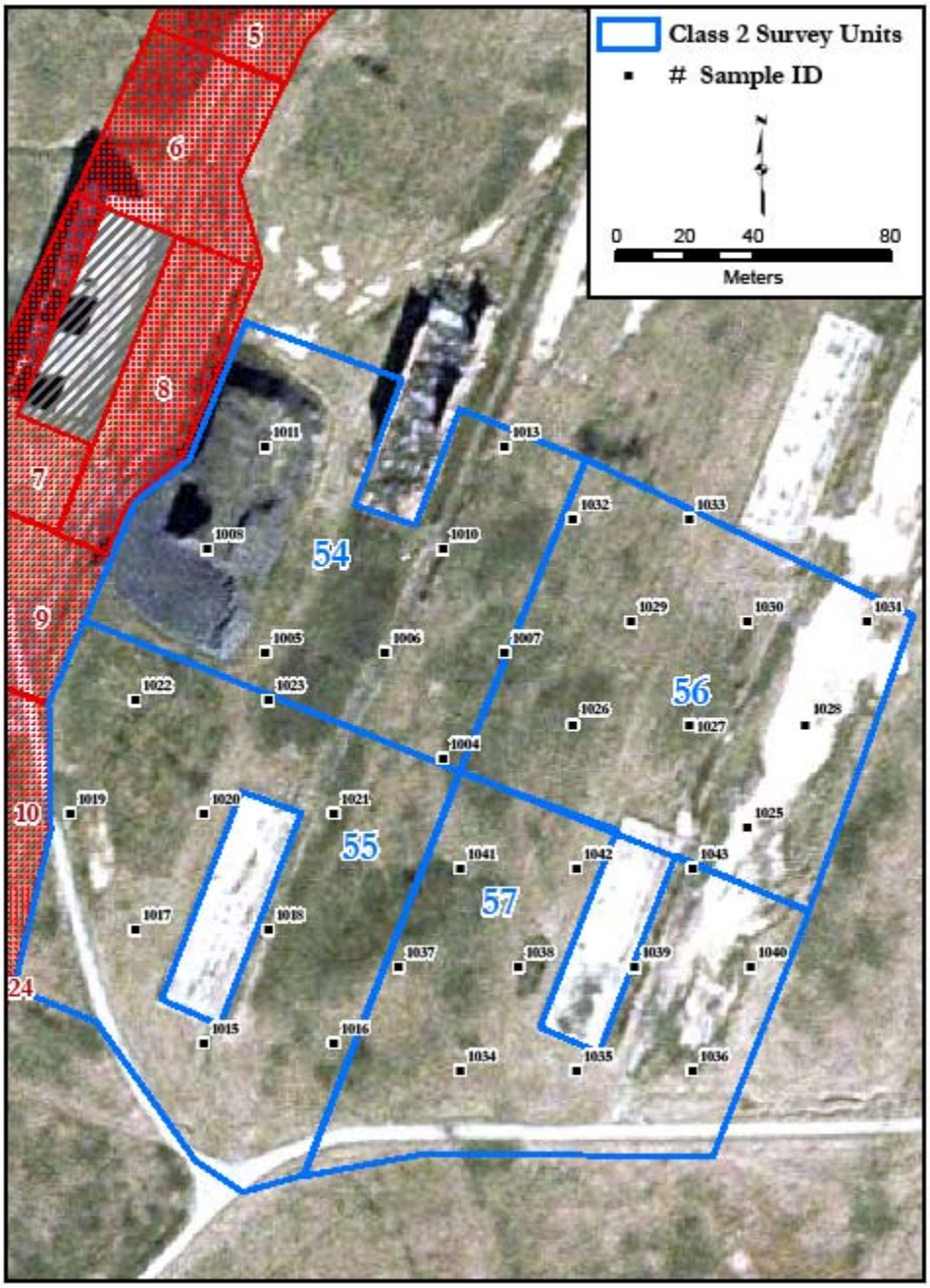


Figure A-85: C2 SU54 through 57—FSS Soil Sampling Locations

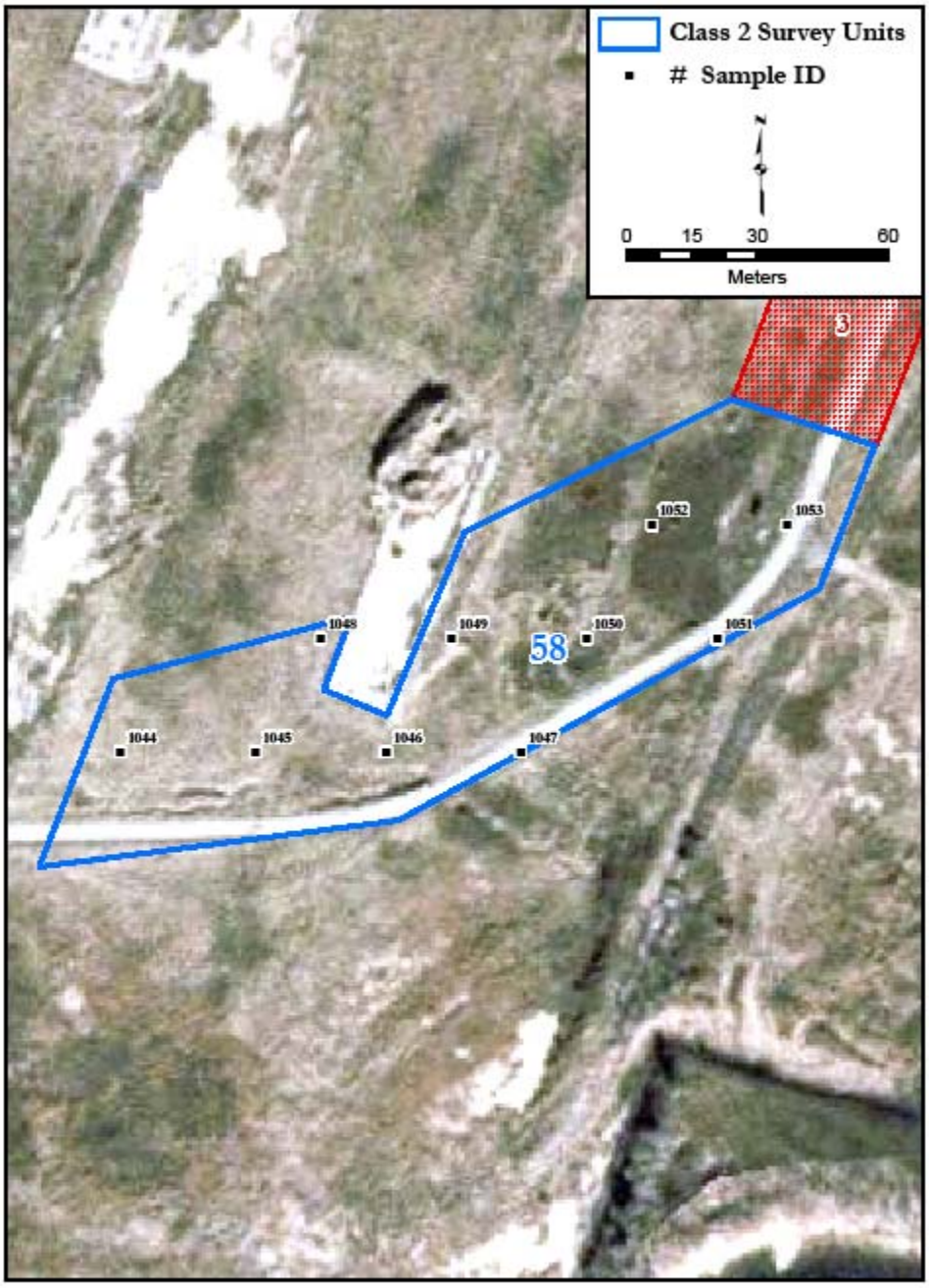


Figure A-86: C2 SU58—FSS Soil Sampling Locations

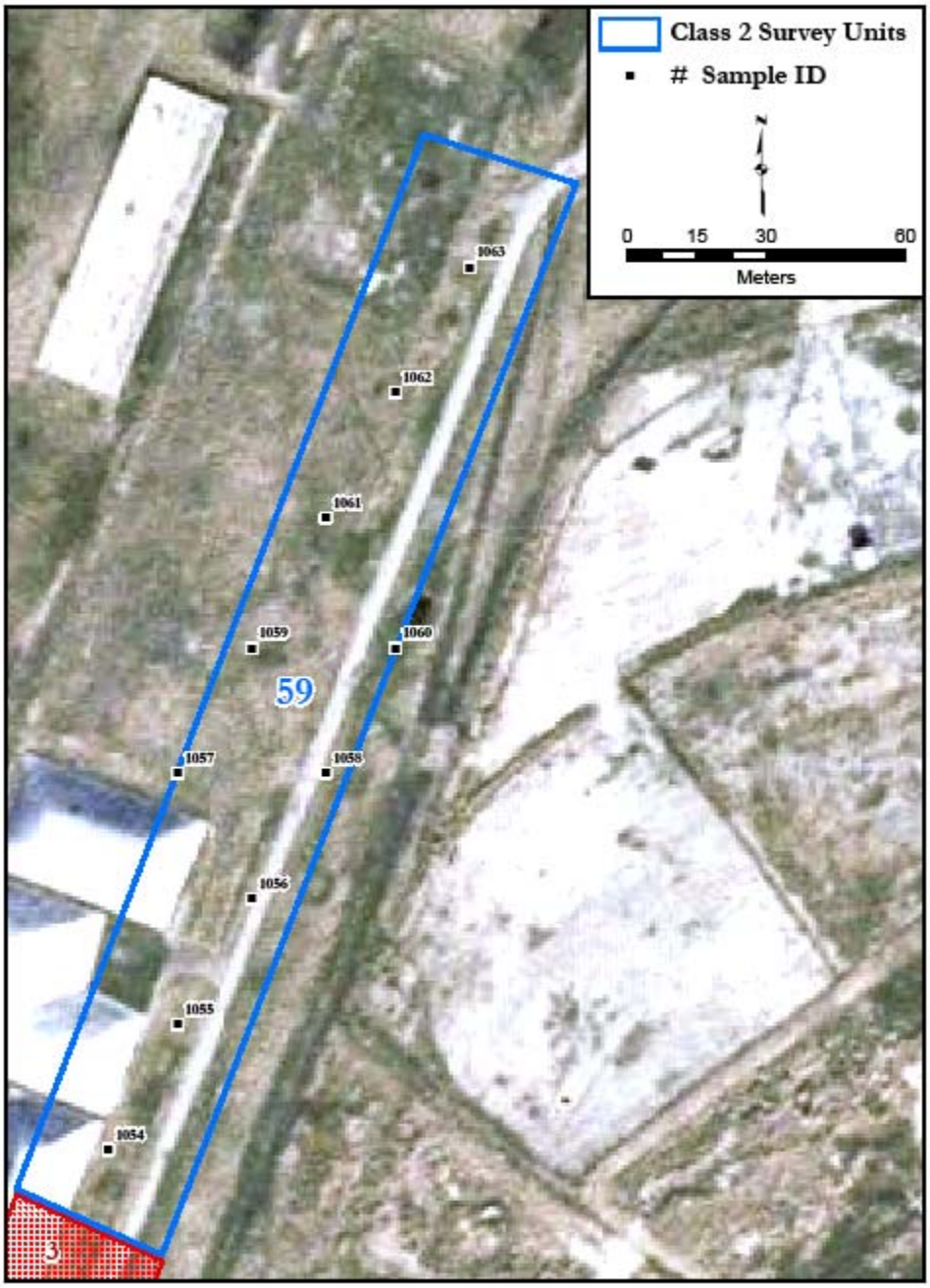


Figure A-87: C2 SU59—FSS Soil Sampling Locations

Figure A-88: C2 SU60 through 63—FSS Soil Sampling Locations

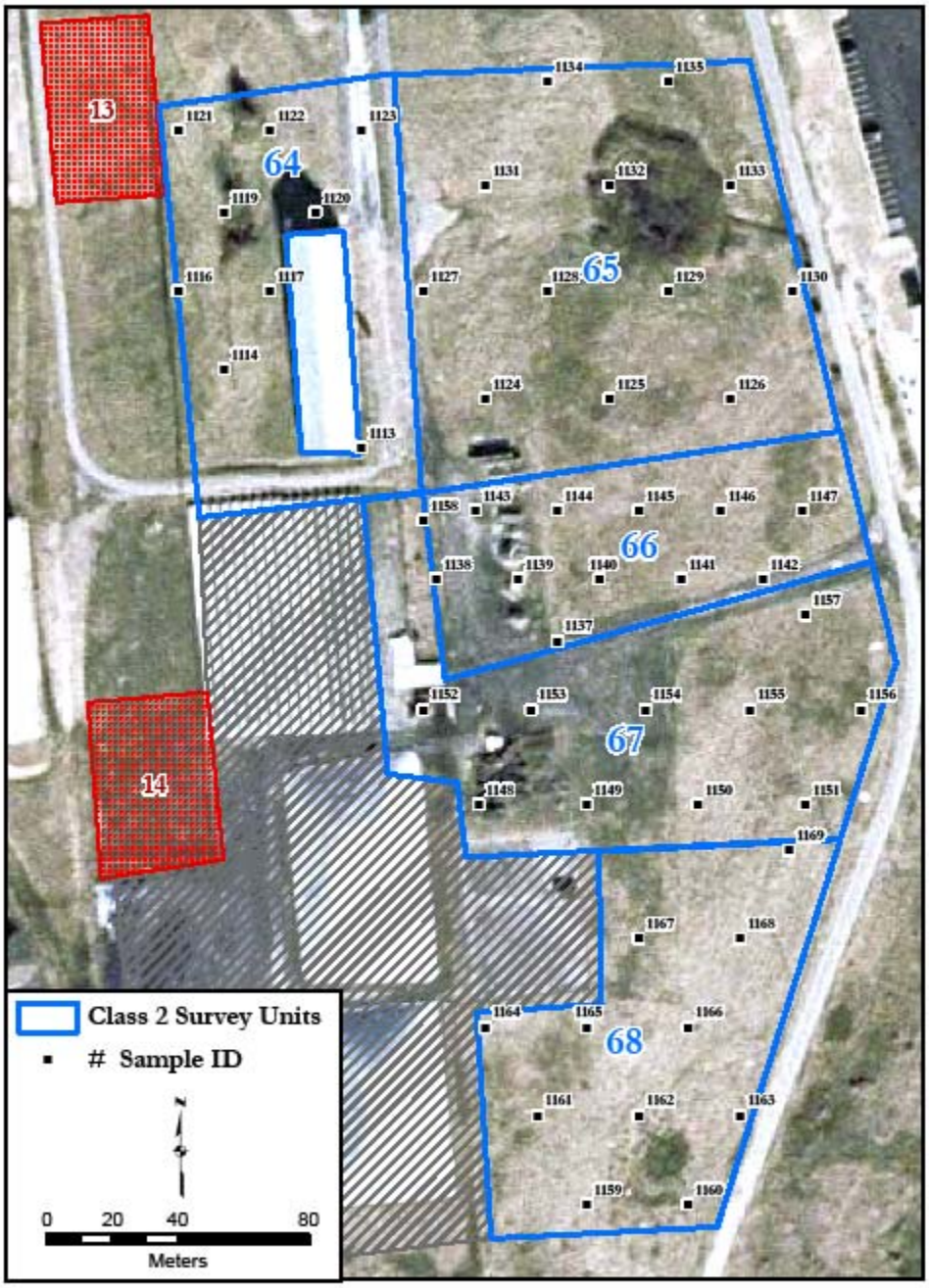


Figure A-89: C2 SU64 through 68—FSS Soil Sampling Locations

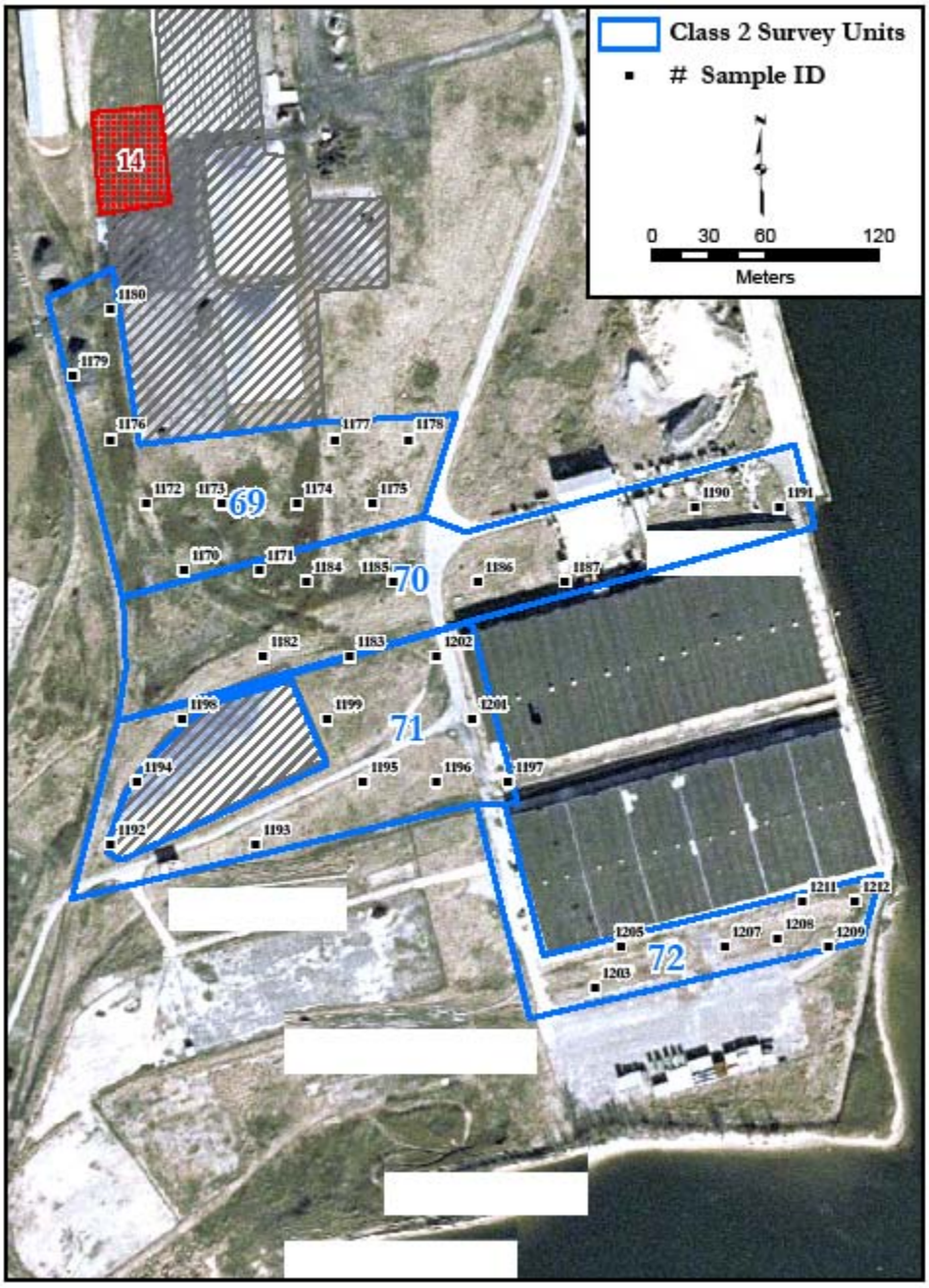


Figure A-90: C2 SU69 through 72—FSS Soil Sampling Locations

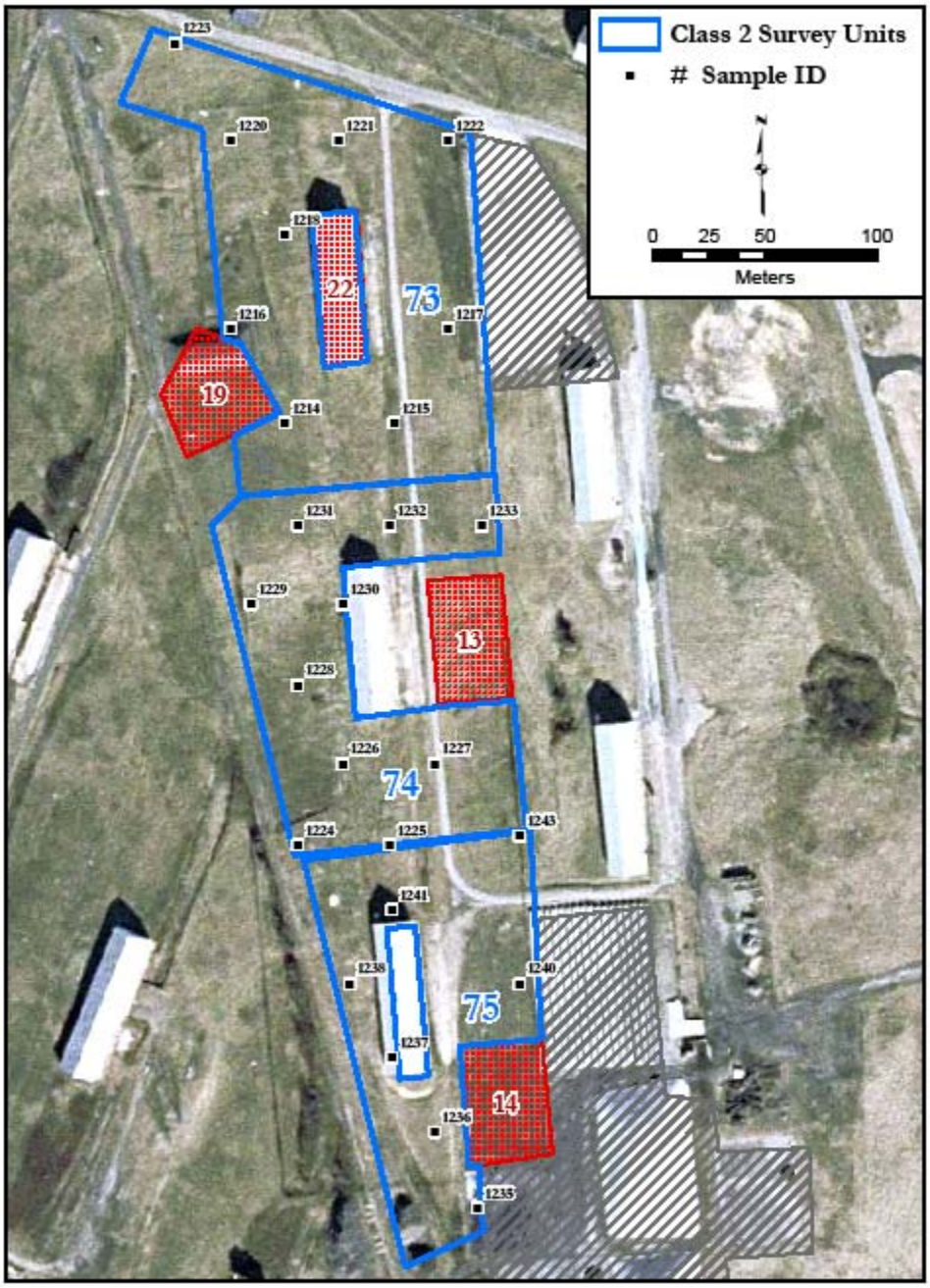
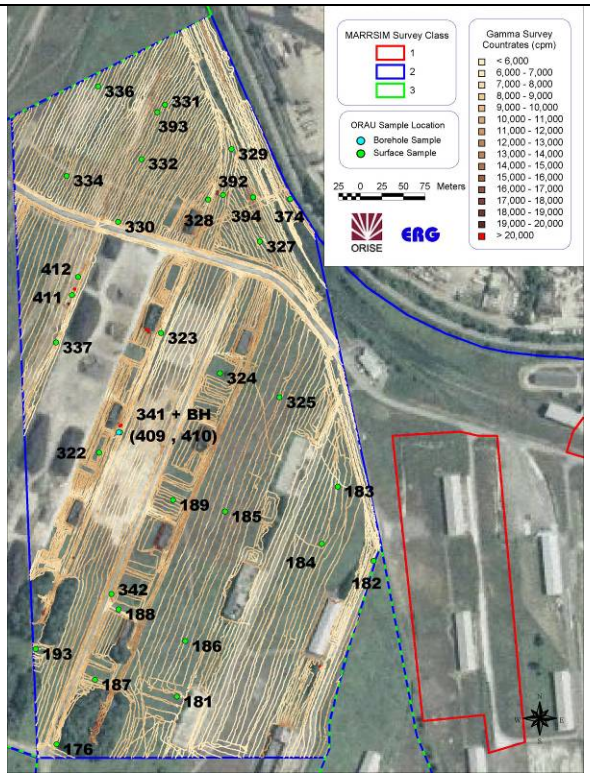
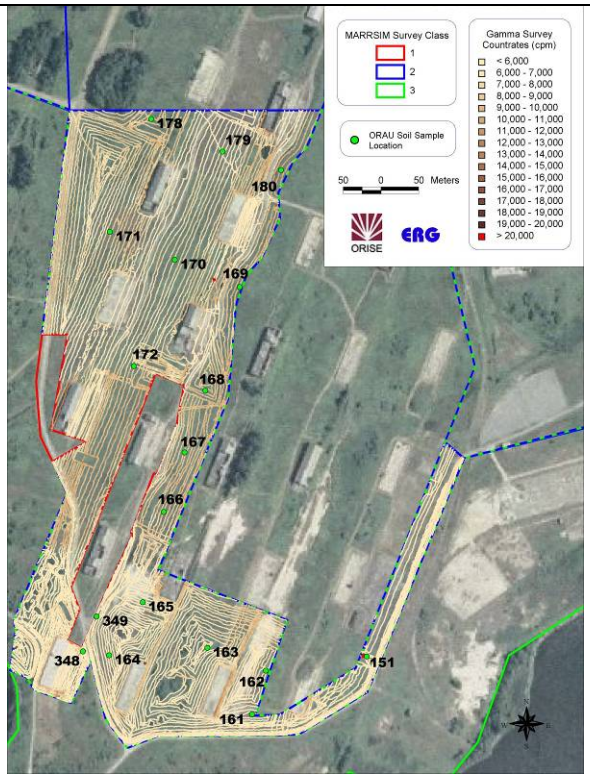


Figure A-91: C2 SU73 through 75—FSS Soil Sampling Locations

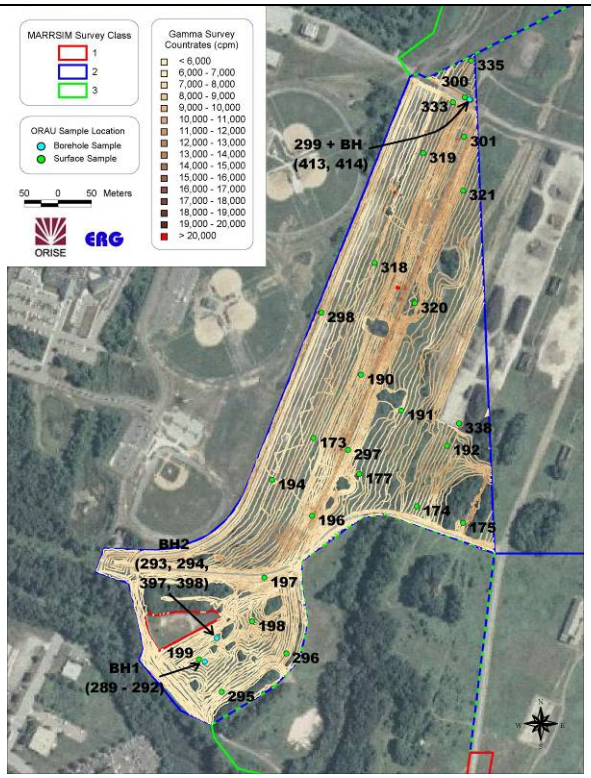


Class 2 Area 1

Class 2 Area 2

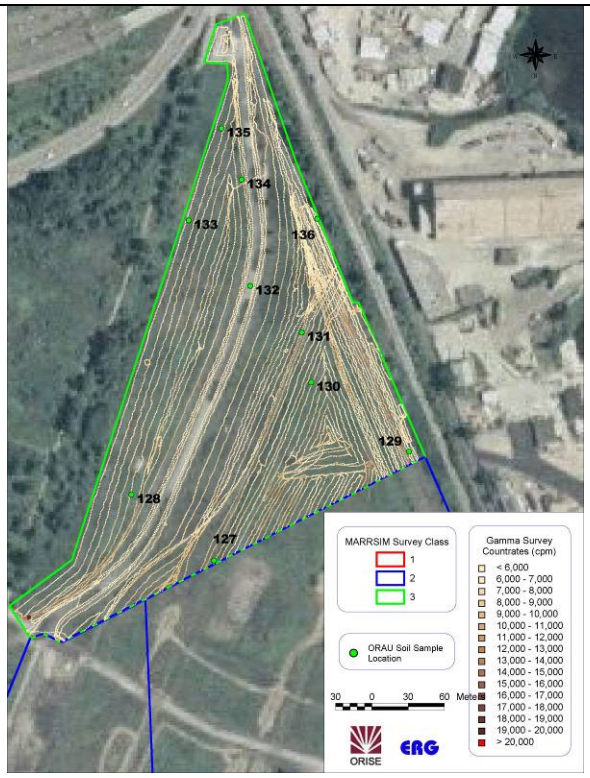


Class 2 Area 3

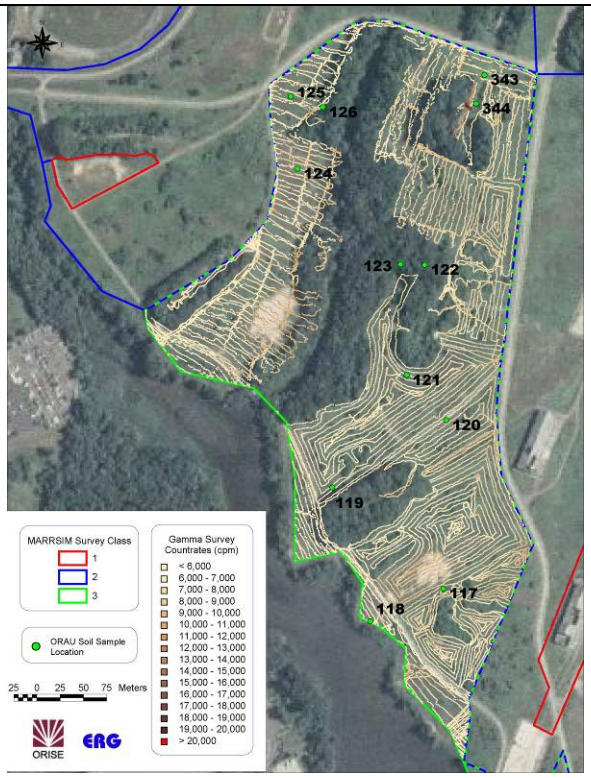


Class 2 Area 4

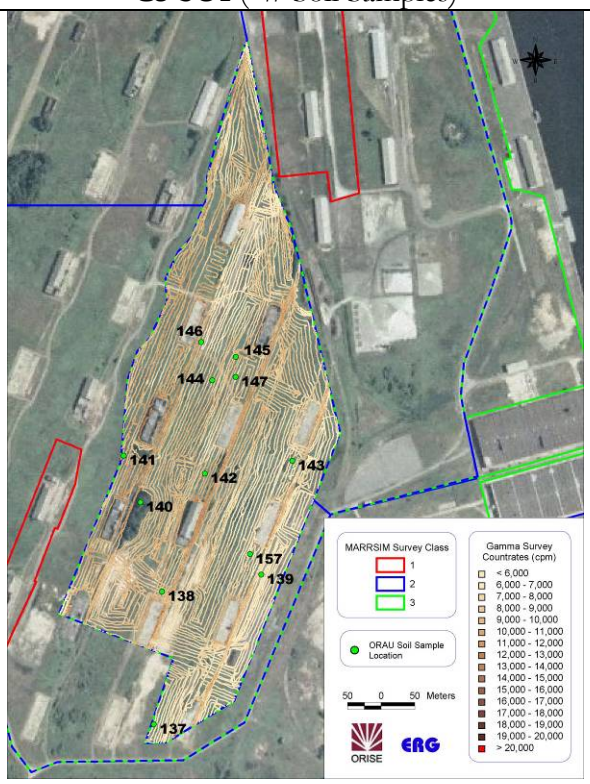
Figure A-92: Class 2 Land Area Survey Areas—Characterization Report Gamma Scanning Results



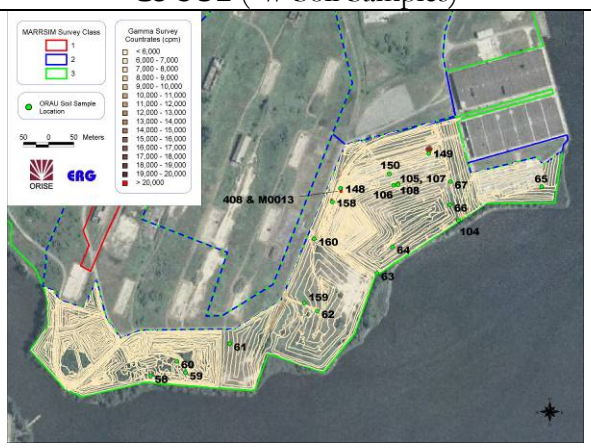
C3 SU1 (•# Soil Samples)



C3 SU2 (•# Soil Samples)



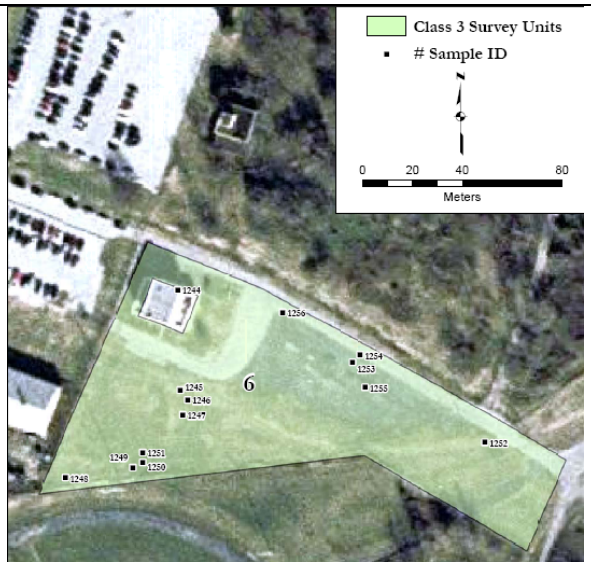
C3 SU3 (•# Soil Samples)



C3 SU4 (•# Soil Samples)

Figure A-93: Class 3 Land Area Survey Units SU1 through SU4—Characterization Report FSS Sampling Locations And Gamma Scanning Results

C3 SU5



C3 SU6

Figure A-94: Class 3 Land Areas Survey Units SU5 and SU6—Characterization Report and Final Status Survey FSS Sampling Locations and Gamma Scanning Results

APPENDIX B:

TABLES

Table B-1: Building Information Curtis Bay Depot, Maryland				
Building Line Designation	**Building ID**	**History of Radioactive Material Use**	**Radioactive Material[a]**	**Initial HSA Building Classification**
Warehouses 73 m × 183 m	1021 1022	No Yes	 Th	3 2
A Line 15 m × 67 m	A-921 A-922	Yes No	Th, MS	2 3
B Line 15 m × 67 m	B-911 B-912 B-913	Yes Yes Yes	Th, SS Th Th	1 1 2
C Line 15 m × 67 m	C-1131 C-1132 C-1133 C-1134	No No No No		3 3 3 3
D Line 15 m × 67 m	D-1121 D-1122 D-1123 D-1124 D-1125	No No No No No		3 3 3 3 3
E Line 15 m × 67 m	E-1111 E-1112 E-1113 E-1114 E-1115 E-1116	No No No No No No		3 3 3 3 3 3
F Line 15 m × 67 m	F-731 F-732 F-733 F-734 F-735 F-736 F-737	Yes No No Yes Yes Yes Yes	Th Th MS MS MS	1 3 3 2 2 2 1

Table B-1 (cont.): Building Information Curtis Bay Depot, Maryland				
Building Line Designation	**Building ID**	**History of Radioactive Material Use**	**Radioactive Material[a]**	**Initial HSA Building Classification**
G Line 15 m × 67 m	G-721	Yes	SS	2
	G-722	No		3
	G-723	No		3
	G-724	No		3
	G-725	No		3
	G-726	No		3
H Line 10 m × 29 m	H-711	Yes	SS	2
	H-712	Yes	SS	2
	H-713	Yes	SS	2
	H-714	Yes	SS	2
	H-715	Yes	SS	2
I Line 10 m × 29 m	I-531	No		3
	I-631	No	Designation changed	2
	I-632	No		3
	I-633	No		3
	I-634 Igloo	No		3
	I-634	No		3
	I-636	No		3
	I-641	No		3
800 series	821	No		3
	825	No		3

[a]Th = thorium nitrate, oxide, or hydroxide, MS = monazite sand, SS = sodium sulfate.

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
Class 1 Land Area Survey Units (C1 SU#)							
C1 SU 1	1	2,271 m^2	AOC 1	Yes	Yes	Yes	**Pass**
C1 SU 1a	1	TBD	AOC 1 overburden	Yes	Yes	Yes	**Pass**
C1 SU 1b	1	456 m^2	Waste Pit Excavation	Yes	Yes	Yes	**Pass**
C1 SU 2	1	2,671 m^2	AOC 1	Yes	Yes	Yes	**Pass**
C1 SU 3	1	1,743 m^2	AOC 2	Yes	Yes	Yes	**Pass**
C1 SU 4	1	2,115 m^2	AOC 3	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C1 SU 5	1	2,601 m^2	AOC 3	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C1 SU 6	1	2,513 m^2	AOC 3	Yes	Yes	Yes	**Pass**
C1 SU 7	1	1,575 m^2	AOC 4	Yes	Yes	Yes	**Pass**
C1 SU 8	1	2,148 m^2	AOC 4	Yes	Yes	Yes	**Pass**
C1 SU 9	1	1,832 m^2	AOC 4	Yes	Yes	Yes	**Pass**
C1 SU 10	1	2,030 m^2	AOC 5	Yes	Yes	Yes	**Pass**
C1 SU 11	1	2,220 m^2	AOC 6	Yes	Yes	Yes	**Pass**
C1 SU 12	1	1,263 m^2	AOC 9	Yes	Yes	Yes	**Pass**
C1 SU 13	1	1,770 m^2	AOC 8	Yes	Yes	Yes	**Pass**
C1 SU 14	1	1,964 m^2	AOC 7	Yes	Yes	Yes	**Pass**
C1 SU 15	1	1,158 m^2	AOC 10	Yes	Yes	Yes	**Pass**
C1 SU 16	1	1,993 m^2	AOC 11	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C1 SU 17	1	1,987 m^2	AOC 12	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C1 SU 18	1	200 m^2	B-911 loading dock soil	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C1 SU 19	1	1764 m^2	Waste Staging Area	Yes	Yes	Yes	**Pass**
C1 SU 20	1	2450 m^2	AOC 20	Yes	Yes	Yes	**Pass**
C1 SU 21	1	1298 m^2	AOC 21	Yes	Yes	Yes	**Pass**
C1 SU 22	1	1022 m^2	B-911 sub-floor soil	Yes	Yes	Yes	**Pass**
C1 SU 23	1	2652 m^2	AOC 5 F-737 pad area	Yes	Yes	Yes	**Pass**
C1 SU 24	1	1520 m^2	AOC 5 F-737 south area	Yes	Yes	Yes	**Pass**
Class 2 Land Area Survey Units (C2 SU#)							
C2 SU 1	2	9,188 m^2	Planning Area 1	Yes	Yes	Yes	**Pass**
C2 SU 2	2	12,164 m^2	Planning Area 1	Yes	Yes	Yes	**Pass**
C2 SU 3	2	14,189 m^2	Planning Area 1	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 4	2	9,232 m^2	Planning Area 1	Yes	Yes	Yes	**Pass**
C2 SU 5	2	5,653 m^2	Planning Area 1	Yes	Yes	Yes	**Pass**
C2 SU 6	2	7,435 m^2	Planning Area 1	Yes	Yes	Yes	**Pass**
C2 SU 7	2	11,323 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 8	2	12,602 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 9	2	11,714 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 10	2	12,602 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 11	2	8,536 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 12	2	13,047 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 13	2	12,602 m^2	Planning Area 2	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C2 SU 14	2	10,706 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 15	2	16,177 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 16	2	9,287 m^2	Planning Area 2	Yes	Yes	Yes	**Pass**
C2 SU 17	2	13,330 m^2	Planning Area 3	Yes	Yes	Yes	**Pass**
C2 SU 18	2	7,018 m^2	Planning Area 3	Yes	Yes	Yes	**Pass**
C2 SU 19	2	12,873 m^2	Planning Area 3	Yes	Yes	Yes	**Pass**
C2 SU 20	2	11,216 m^2	Planning Area 3	Yes	Yes	Yes	**Pass**
C2 SU 21	2	18,018 m^2	Planning Area 3	Yes	Yes	Yes	**Pass**
C2 SU 22	2	7,948 m^2	Planning Area 4	Yes	Yes	Yes	**Pass**
C2 SU 23	2	9,351 m^2	Planning Area 4	Yes	Yes	Yes	**Pass**
C2 SU 24	2	11,601 m^2	Planning Area 4	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 25	2	9,952 m^2	Planning Area 4	Yes	Yes	Yes	**Pass**
C2 SU 26	2	13,388 m^2	Planning Area 4	Yes	Yes	Yes	**Pass**
C2 SU 27	2	8,596 m^2	Planning Area 5	Yes	Yes	Yes	**Pass**
C2 SU 28	2	12,305 m^2	Planning Area 5	Yes	Yes	Yes	**Pass**
C2 SU 29	2	8,473 m^2	Planning Area 5	Yes	Yes	Yes	**Pass**
C2 SU 30	2	12,305 m^2	Planning Area 5	Yes	Yes	Yes	**Pass**
C2 SU 31	2	10,000 m^2	Planning Area 5	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 32	2	12,305 m^2	Planning Area 5	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 33	2	8,850 m^2	Planning Area 5	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C2 SU 34	2	10,855 m^2	Planning Area 5	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 35	2	11,225 m^2	Planning Area 6	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 36	2	15,104 m^2	Planning Area 6	Yes	Yes	Yes	**Pass**
C2 SU 37	2	6,677 m^2	Planning Area 6	Yes	Yes	Yes	**Pass**
C2 SU 38	2	16,473 m^2	Planning Area 6	Yes	Yes	Yes	**Pass**
C2 SU 39	2	13,056 m^2	Planning Area 6	Yes	Yes	Yes	**Pass**
C2 SU 40	2	16,473 m^2	Planning Area 6	Yes	Yes	Yes	**Pass**
C2 SU 41	2	16,473 m^2	Planning Area 6	Yes	Yes	Yes	**Pass**
C2 SU 42	2	16,473 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 43	2	16,473 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 44	2	12,103 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 45	2	16,473 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 46	2	16,473 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 47	2	16,473 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 48	2	16,473 m^2	Planning Area 7	Yes	Yes	Yes	**Pass**
C2 SU 49	2	7,222 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 50	2	11,134 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 51	2	3,828 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 52	2	5,052 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 53	2	15,175 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 54	2	10,514 m^2	Planning Area 8	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C2 SU 55	2	12,778 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 56	2	10,264 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 57	2	10,128 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 58	2	8,063 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 59	2	8,507 m^2	Planning Area 8	Yes	Yes	Yes	**Pass**
C2 SU 60	2	15,636 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 61	2	8,830 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 62	2	7,090 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 63	2	10,649 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 64	2	8,142 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 65	2	14,551 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 66	2	6,518 m^2	Planning Area 9	Yes	Yes	Yes	**Pass**
C2 SU 67	2	10,691 m^2	Planning Area 10	Yes	Yes	Yes	**Pass**
C2 SU 68	2	9,232 m^2	Planning Area 10	Yes	Yes	Yes	**Pass**
C2 SU 69	2	14,991 m^2	Planning Area 10	Yes	Yes	Yes	**Pass**
C2 SU 70	2	19,889 m^2	Planning Area 10	Yes	Yes	Yes	**Pass**
C2 SU 71	2	14,038 m^2	Planning Area 10	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C2 SU 72	2	7,258 m^2	Planning Area 10	Yes	Yes	Yes	**Pass**
C2 SU 73	2	20,505 m^2	Planning Area 11	Yes	Yes	Yes	**Pass**
C2 SU 74	2	14,569 m^2	Planning Area 11	Yes	Yes	Yes	**Pass**
C2 SU 75	2	12,711 m^2	Planning Area 11	Yes	Yes	Yes	**Pass**
C2 SU 76	2	1022 m^2	B-912 sub-floor soil	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
Class 3 Land Area Survey Units (C3 SU#)							
C3 SU 1	3	94,266 m^2	land area	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C3 SU 2	3	200,571 m^2	land area	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C3 SU 3	3	201,931 m^2	land area	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
C3 SU 4	3	184,966 m^2	land area	Yes	Yes	Yes	**Pass**
C3 SU 5	3	77,293 m^2	land area	Yes	Yes	Yes	**Pass**
C3 SU 6	3	11,580 m^2	land area	Yes	Yes	Yes	**Pass**
Structures With Class 1 Survey Units							
Building B-911							
C1 SU 1	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 2	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 3	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 4	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 5	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 6	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 7	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 8	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 9	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 10	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 11	1	93 m^2	Floor	Soil	NA	NA	NA
C1 SU 12	1	69 m^2	South Wall	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C1 SU 13	1	100 m^2	S. West Wall	Yes	Yes	Yes	**Pass**
C1 SU 14	1	100 m^2	C. West Wall	Yes	Yes	Yes	**Pass**
C1 SU 15	1	100 m^2	N. West Wall	Yes	Yes	Yes	**Pass**
C1 SU 16	1	69 m^2	North Wall	Yes	Yes	Yes	**Pass**
C1 SU 17	1	100 m^2	N. East Wall	Yes	Yes	Yes	**Pass**
C1 SU 18	1	100 m^2	C. East Wall	Yes	Yes	Yes	**Pass**
C1 SU 19	1	100 m^2	S. East Wall	Yes	Yes	Yes	**Pass**
C1 SU 20	1	83 m^2	Overhead Trusses	Yes	Yes	Yes	**Pass**
C1 SU 21	1	114 m^2	Loading Dock	Yes	Yes	Yes. Investigation completed/see Table B-3	**Pass**
Building B-912							
C1 SU 22	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 23	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 24	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 25	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 26	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 27	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 28	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 29	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 30	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 31	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 32	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 33	1	69 m^2	South Wall	Yes	Yes	Yes	**Pass**
C1 SU 34	1	100 m^2	S. West Wall	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C1 SU 35	1	100 m^2	C. West Wall	Yes	Yes	Yes	**Pass**
C1 SU 36	1	100 m^2	N. West Wall	Yes	Yes	Yes	**Pass**
C1 SU 37	1	69 m^2	North Wall	Yes	Yes	Yes	**Pass**
C1 SU 38	1	100 m^2	N. East Wall	Yes	Yes	Yes	**Pass**
C1 SU 39	1	100 m^2	C. East Wall	Yes	Yes	Yes	**Pass**
C1 SU 40	1	100 m^2	S. East Wall	Yes	Yes	Yes	**Pass**
C1 SU 41	1	83 m^2	Overhead Trusses	Yes	Yes	Yes	**Pass**
Building B-913							
C1 SU 42	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C2 SU 43	2	495 m^2	Floor	Yes	Yes	Yes	**Pass**
C2 SU 44	2	495 m^2	Floor	Yes	Yes	Yes	**Pass**
C2 SU 45	2	69 m^2	South Wall	Yes	Yes	Yes	**Pass**
C2 SU 46	2	300 m^2	West Wall	Yes	Yes	Yes	**Pass**
C2 SU 47	2	69 m^2	North Wall	Yes	Yes	Yes	**Pass**
C2 SU 48	2	300 m^2	East Wall	Yes	Yes	Yes	**Pass**
C3 SU 49	3	83 m^2	Overhead Trusses	Yes	Yes	Yes	**Pass**
C2 SU125	2	200 m^2	Loading Dock	Yes	Yes	Yes	**Pass**
Building F-731							
C1 SU 50	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 51	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 52	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 53	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 54	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 55	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C1 SU 56	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 57	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 58	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 59	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 60	1	93 m^2	Floor	Yes	Yes	Yes	**Pass**
C1 SU 61	1	134 m^2	Lower West Wall	Yes	Yes	Yes	**Pass**
C2 SU 62	2	69 m^2	South Wall	Yes	Yes	Yes	**Pass**
C2 SU 63	2	168 m^2	Upper West Wall	Yes	Yes	Yes	**Pass**
C2 SU 64	2	69 m^2	North Wall	Yes	Yes	Yes	**Pass**
C2 SU 65	2	300 m^2	East Wall	Yes	Yes	Yes	**Pass**
C2 SU 66	2	83 m^2	Overhead Trusses	Yes	Yes	Yes	**Pass**
C2 SU124	2	200 m^2	Loading Dock	Yes	Yes	Yes	**Pass**
Building F-737							
C1SU 67	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 68	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 69	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 70	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 71	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 72	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 73	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 74	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 75	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 76	1	153 m^2	Pad	Yes	Yes	Yes	**Pass**
C1 SU 77	1	107 m^2	Pad	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
C2 SU126	2	670 m^2	Loading Dock	Yes	Yes	Yes	**Pass**
C1 SU128	1	TBD	sub pad	NA			
Building G-723							
C1 SU129	1	112 m^2	N. 1/3 Loading Dock	Yes	Yes	Yes	**Pass**
C2 SU 78	2	224 m^2	S. 2/3 Loading Dock	Yes	Yes	Yes	**Pass**
C3 SU 79	3	1,022 m^2	Pad	Yes	Yes	Yes	**Pass**
Class 2 Structures							
A-921/C2 SU 80	2	1,351 m^2 (F and LWa)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
F-734/ C2 SU 81	2	1,022 m^2 (F and DPb)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
F-735/ C2 SU 82	2	1,022 m^2 (F and DP)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
F-736/ C2 SU 83	2	1,022 m^2 (F and DP)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
G-721/ C2 SU 84	2	1,022 m^2 (pad)	C2 Pad DQO	Yes	Yes	Yes	**Pass**
H-711/ C2 SU 85	2	293 m^2 (F and DP)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
H-712/ C2 SU 86	2	293 m^2 (debris piles)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
H-713/ C2 SU 87	2	293 m^2 (debris piles)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
H-714/ C2 SU 88	2	293 m^2 (debris piles)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
H-715/ C2 SU 89	2	293 m^2 (debris piles)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
1022/ C2 SU 90a	2	4,462 m^2 (south floor/LW)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
1022/ C2 SU 90b	2	4,462 m^2 (center floor/LW)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
1022/ C2 SU 90c	2	4,462 m^2 (north floor/LW)	C2 Building and DP DQO	Yes	Yes	Yes	**Pass**
Class 3 Structures							
A-922/C3 SU 91	3	1,351 m^2 (F and LW)		Yes	Yes	Yes	**Pass**
C-1131/C3 SU 92	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
C-1132/C3 SU 93	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
C-1133/C3 SU 94	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
C-1134/C3 SU 95	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
D-1121/C3 SU 96	3	1,022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
D-1122/C3 SU 97	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
D-1123/C3 SU 98	3	1,022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
D-1124/C3 SU 99	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
D-1125/C3 SU 100	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
E-1111/C3 SU 101	3	1,022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
E-1112/C3 SU 102	3	1,022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
E-1113/C3 SU 103	3	1,022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
E-1114/C3 SU 104	3	1,022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
E-1115/C3 SU 105	3	1022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
E-1116/C3 SU 106	3	1022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
F-732/C3 SU 107	3	1022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**

Table B-2: Survey Unit Descriptions and Results Curtis Bay Depot Curtis Bay, Maryland							
Class and Survey Unit	**Class**	**Unit Area**	**Remarks**	**DQO complete**	**FSS complete**	**DQA Complete**	**Remarks**
F-733/C3 SU 108	3	1022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
G-722/C3 SU 109	3	1022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
G-724/C3 SU 110	3	1022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
G-725/C3 SU 111	3	1022 m^2 (pad)	C3 Pad DQO	Yes	Yes	Yes	**Pass**
G-726/C3 SU 112	3	1022 m^2 (F and DP)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-531/C3 SU 113	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-631/C3 SU 114	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-632/C3 SU 115	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-633/C3 SU 116	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-634/C3 SU 117	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-636/C3 SU 118	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-641/C3 SU 119	3	293 m^2 (debris piles)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
I-634 Igloo/C3 SU 120	3	274 m^2 (F and LW)	Pad DQO used	Yes	Yes	Yes	**Pass**
821/C3 SU 121	3	655 m2 (F and LW)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
825/C3 SU 122	3	512 m^2 (F and LW)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
1021/C3 SU 123	3	13,386 m^2 (F and LW)	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**
Building 305/C3 SU127	3	625 m^2	C3 Pad and DP DQO	Yes	Yes	Yes	**Pass**

Table B-3: Investigation Results Curtis Bay Depot Curtis Bay, Maryland						
Survey Unit	**Class**	**Investigation Cause**	**Sample IDs**	**Initial Review**	**Further Investigation Required**	**Open/Closed Investigation**
C3 SU 1	3	2 FSS sample gross analytical results exceeded 75% of the unity rule	127, 130	SORs were recalculated using the net concentrations	No. Net SORs were 0.34 to 0.38. Survey unit passes and satisfies classification	Closed
C3 SU 2	3	3 FSS samples gross analytical results exceeded 75% of the unity rule	117, 124, 126	SORs were recalculated using the net concentrations	No. Net SORs ranged from 0.17 to 0.75. Survey unit passes and satisfies classification	Closed
C3 SU 3	3	2 FSS samples gross analytical results exceeded 75% the unity rule	140, 142	SORs were recalculated using the net concentrations	Yes. Net SORs were 0.35 for #142 and 1.2 for #140. Sample #140 was collected from the side of a berm area. Additional samples were collected and berm rescanned. Judgmental sample SORs were 0.62 and 0.59. Determined to be U-238 background variability and high analytical error on sample.	Closed
C2 SU 3	2	1 FSS sample gross analytical results exceeded the unity rule	458	SORs were recalculated using the net concentrations	Yes. Net SOR was 1.33 for #458. Location resampled (sample 1260) to confirm if elevated uranium and noted residual ore material. Investigation sample net SOR was 0.53, high analytical error on original sample.	Closed

Table B-3: Investigation Results Curtis Bay Depot Curtis Bay, Maryland						
Survey Unit	**Class**	**Investigation Cause**	**Sample IDs**	**Initial Review**	**Further Investigation Required**	**Open/Closed Investigation**
C2 SU 13	2	1 FSS sample gross analytical results exceeded the unity rule	577	SORs were recalculated using the net concentrations, result was 1.35	Yes. Sample was collected from within railroad ballast, characterization showed elevated Th/U background in ballast. Ballast background calculated from characterization off-site RR background area is 1.38 pCi/g Th-232 and 2.00 pCi/g U-238. Net SOR recalculated using ballast background was 0.62.	Closed
C2 SU 24	2	1 FSS sample gross analytical results exceeded the unity rule	694	SORs were recalculated using the net concentrations, result was 1.08	Yes. Sample was collected from within railroad ballast, characterization showed elevated Th/U background in ballast. Ballast background calculated from characterization off-site RR background area is 1.38 pCi/g Th-232 and 2.00 pCi/g U-238. Net SOR recalculated using ballast background was 0.35.	Closed

Table B-3: Investigation Results Curtis Bay Depot Curtis Bay, Maryland						
Survey Unit	**Class**	**Investigation Cause**	**Sample IDs**	**Initial Review**	**Further Investigation Required**	**Open/Closed Investigation**
C2 SU 31	2	1 FSS sample gross analytical results exceeded the unity rule	765	SORs were recalculated using the net concentration SOR was 1.06	Yes. Sample was collected from within railroad ballast, characterization showed elevated Th/U background in ballast. Ballast background calculated from characterization off-site RR background area is 1.38 pCi/g Th-232 and 2.00 pCi/g U-238. Net SOR recalculated using ballast background was 0.33.	Closed
C2 SU32	2	1 FSS sample gross analytical results exceeded the unity rule	779	SORs were recalculated using the net concentration SOR was 1.05	Yes. Sample was collected from within railroad ballast, characterization showed elevated Th/U background in ballast. Ballast background calculated from characterization off-site RR background area is 1.38 pCi/g Th-232 and 2.00 pCi/g U-238. Net SOR recalculated using ballast background was 0.32.	Closed
C2 SU 34	2	1 FSS sample gross analytical results exceeded the unity rule	798	SOR was 2.31 Th-232>DCGL	Yes. New Class 1 area referred to as AOC 21 established along roadway on both sides.	Closed

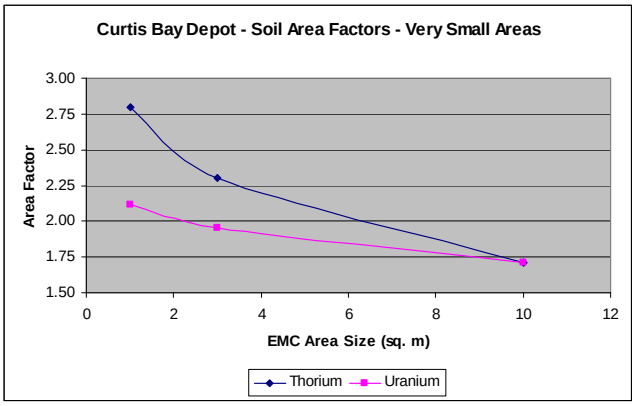
Table B-3: Investigation Results Curtis Bay Depot Curtis Bay, Maryland						
Survey Unit	**Class**	**Investigation Cause**	**Sample IDs**	**Initial Review**	**Further Investigation Required**	**Open/Closed Investigation**
C2 SU35	2	Survey Unit investigated due to proximity with AOC identified in C2 SU34	1273	1273 Judgmental sample from maximum direct gamma count rate. Sample <1 SOR	No. Net SOR less than DCGL in judgmental sample	Closed
C2 SU54	2	1 FSS sample gross analytical results exceeded the unity rule	1006	Net SOR was 1.37	Yes. Sample was collected from within railroad ballast, characterization showed elevated Th/U background in ballast. Ballast background calculated from characterization off-site RR background area is 1.38 pCi/g Th-232 and 2.00 pCi/g U-238. Net SOR recalculated using ballast background was 0.64.	Closed
C2 SU71	2	1 FSS systematic sample exceed SOR and U-238 DCGL	1201	U-238 = 3.19, net SOR = 1.25	Yes. Area investigated and determined that a wide-spread area contained pebble-like material from unlicensed flourspar piles. Additioanal judgmenatal sample of material collected with U-238 = 2.02.	Closed
C1 SU4	1	1 Judgmental samples from location identified by gamma scan,	1352	Net SOR was 7.93	Yes. Location remediated by World. Post-RA sample 1360 SOR = 0.60	Closed

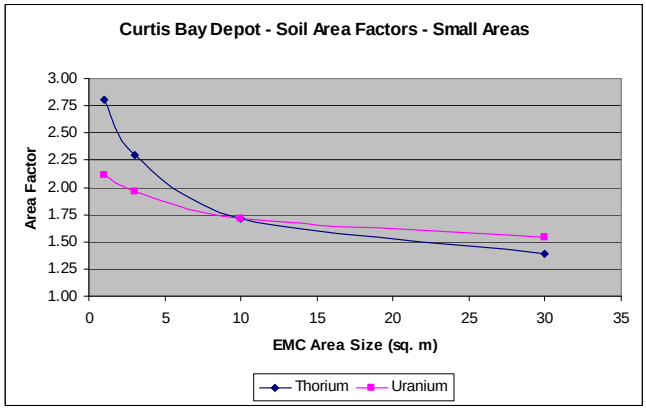
Table B-3: Investigation Results Curtis Bay Depot Curtis Bay, Maryland						
Survey Unit	**Class**	**Investigation Cause**	**Sample IDs**	**Initial Review**	**Further Investigation Required**	**Open/Closed Investigation**
		Th-232 = 21.2 pCi/g				
C1 SU5	1	2 Judgmental samples from two locations were identified by gamma scan, Th-232 = 4.95 and 5.8 pCi/g	1353 and 1362	Net SORs were 1.26 and 1.73	Yes. Location remediated by World. Post-RA samples 1361 SOR = 0.22; 1518 SOR = 0.38	Closed
C1 SU16	1	One systematic sample exceeded the DCGL with Th-232 = 4.17	1383	Net SOR was 1.37	Location passed the EMC evaluation but was remediated by World as ALARA. Post-RA sample 1517 Th-232 = 1.8 pCi/g and net SOR of 0.65	Closed
B-911 Loading Dock C1 SU21	1	One systematic direct measurement co-located with an area of elevated activitiy identified by scanning. Two additional locations identified by scanning on the south end of pad.	DM location 0.4, 34.6.	Initial result was 600 dpm	All three locations measured less than 1 m^2 in area. World remediated all 3 locations. Location 0.4, 34.6 measured 420 dpm/100 cm^2 post-RA. EMC for an area = to SU A/N = 13.4 m^2. Associated AF = 11.24. EMC satisfied.	Closed

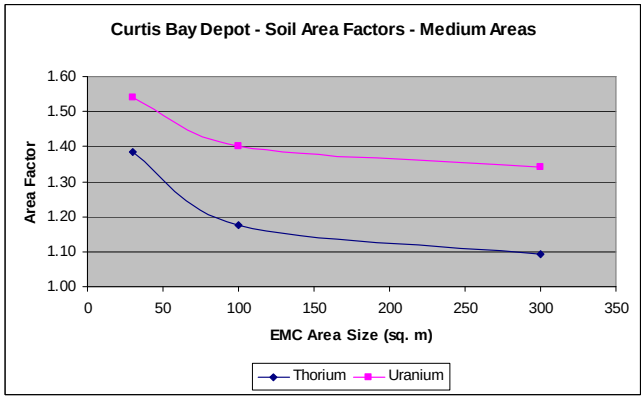
Table B-3: Investigation Results Curtis Bay Depot Curtis Bay, Maryland						
Survey Unit	**Class**	**Investigation Cause**	**Sample IDs**	**Initial Review**	**Further Investigation Required**	**Open/Closed Investigation**
B-911 sub Loading Dock soil C1 SU18	1	Two systematic soil samples with activity in excess of DCGL	Sample locations 1561 and 1571.	Initial SORs were 1.2 and 2.2	World remediated both locations, post-RA samples 1644 and 1585 SORs were 0.4 and 0.2.	Closed

Table B-4: Soil Area Factors

Soil Area Factors	Area Size (square meters)								
	10000	3000	1000	300	100	30	10	3	1
Curtis Bay - Thorium	1.00	1.02	1.03	1.09	1.17	1.39	1.71	2.30	2.80
Curtis Bay - Uranium	1.00	1.01	1.01	1.34	1.40	1.54	1.71	1.96	2.11







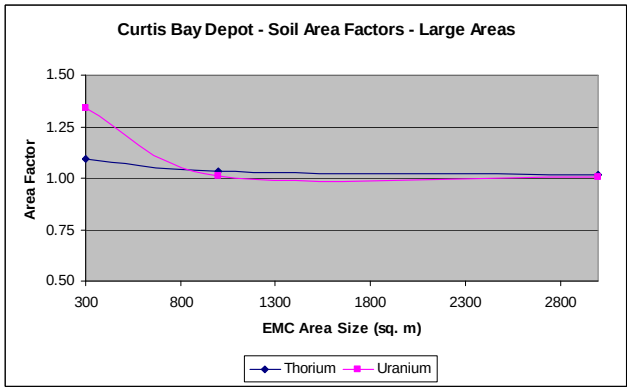
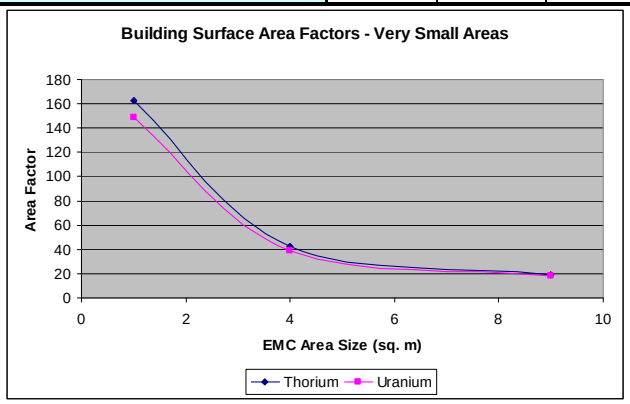
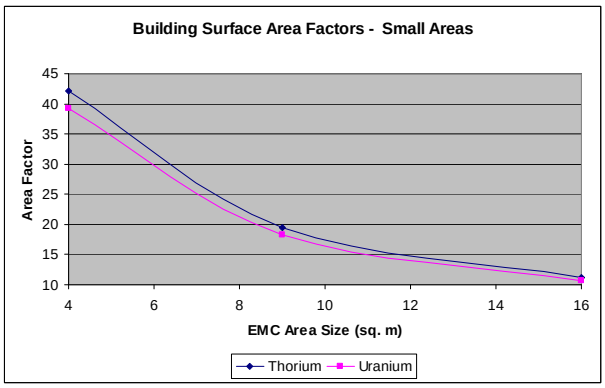
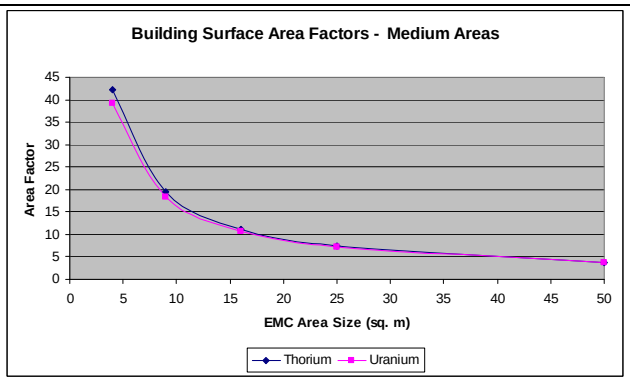


Table B-5: Structural Surface Area Factors

Building Area Factors	Area Size (square meters)							
	200	100	50	25	16	9	4	1
Thorium	1.00	1.96	3.82	7.40	11.24	19.41	42.15	162.56
Uranium	1.00	1.94	3.74	7.15	10.75	18.32	39.19	149.08







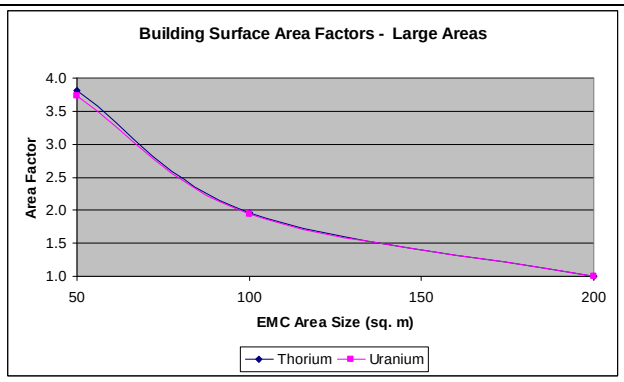


Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
Building B-913				
C2 SU43				
	0.9, 0.5	South Floor	425	180
	7.5, 0.5	South Floor	393	110
	14.2, 0.5	South Floor	463	250
	4.2, 6.2	South Floor	359	46
	10.9, 6.2	South Floor	367	62
	0.9, 12.0	South Floor	352	32
	7.5, 12.0	South Floor	357	42
	14.2, 12.0	South Floor	354	36
	4.2, 17.7	South Floor	356	40
	10.9, 17.7	South Floor	360	48
	0.9, 23.4	South Floor	382	91
	7.5, 23.4	South Floor	408	140
	14.2, 23.4	South Floor	401	130
	4.2, 29.2	South Floor	379	85
	10.9, 29.2	South Floor	382	91
C1 SU42				
	1.9, 30.6	Center Floor	431	190
	5.1, 30.6	Center Floor	347	22
	8.3, 30.6	Center Floor	416	160
	11.5, 30.6	Center Floor	354	36
	14.7, 30.6	Center Floor	424	170
	0.3, 33.4	Center Floor	424	170
	3.5, 33.4	Center Floor	379	85
	6.7, 33.4	Center Floor	340	8
	9.9, 33.4	Center Floor	402	130
	13.1, 33.4	Center Floor	382	91
	1.9, 36.2	Center Floor	447	220
	5.1, 36.2	Center Floor	424	170
	8.3, 36.2	Center Floor	402	130
	11.5, 36.2	Center Floor	386	99
	14.7, 36.2	Center Floor	426	180
C2 SU44				
	3.6, 37.1	North Floor	376	79
	9.9, 37.1	North Floor	449	220
	0.4, 42.6	North Floor	484	290
	6.7, 42.6	North Floor	370	67
	13.0, 42.6	North Floor	432	190

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C2 SU44 (cont.)	3.6, 48.0	North Floor	456	240
	9.9, 48.0	North Floor	380	87
	0.4, 53.5	North Floor	491	310
	6.7, 53.5	North Floor	362	52
	13.0, 53.5	North Floor	356	40
	3.6, 59.0	North Floor	392	110
	9.9, 59.0	North Floor	339	6
	0.4, 64.4	North Floor	435	200
	6.7, 64.4	North Floor	422	170
	13.0, 64.4	North Floor	403	130
C3 SU49				
	15.2, 6.3/Truss 1	Truss 1	242	-89
	10.5, 18.4/Truss 3	Truss 3	271	-32
	0.3, 24.5/ Truss 4	Truss 4	295	16
	4.9, 24.40/Truss 4	Truss 4	282	-10
	10.6, 30.6/Truss 5	Truss 5	268	-38
	7.5, 36.7/Truss 6	Truss 6	295	16
	8.5, 42.8/Truss 7	Truss 7	305	36
	4.1, 42.8/Truss 7	Truss 7	276	-22
	9.4, 42.8/Truss 7	Truss 7	275	-24
	9.5, 42.8/Truss 7	Truss 7	273	-28
	8.4, 48.8/Truss 8	Truss 8	291	8
	1.7, 54.9/Truss 9	Truss 9	258	-58
	3.9, 54.9/Truss 9	Truss 9	283	-8
	0.9, 61.1/Tuss 10	Truss 10	254	-65
	1.5, 61.2/Truss 10	Truss 10	304	34
C2 SU47				
	0.5, 1.1	North Wall	458	110
	2.8, 1.1	North Wall	496	-250
	5.2, 1.1	North Wall	345	-110
	7.6, 1.1	North Wall	512	-220
	10.0, 1.1	North Wall	414	24
	12.4, 1.1	North Wall	569	-110
	14.7, 1.1	North Wall	619	-10
	1.6, 3.2	North Wall	588	-71
	4.0, 3.2	North Wall	645	42
	6.4, 3.2	North Wall	541	-160
	8.8, 3.2	North Wall	493	-260
	11.2, 3.2	North Wall	528	-190
	13.6, 3.2	North Wall	600	-48
	5.2, 5.3	North Wall	395	-14

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C2 SU47 (cont.)	7.6, 5.3	North Wall	323	71
	10.0, 5.3	North Wall	610	-28
C2 SU48				
	3.6, 2.0	East Wall	632	16
	7.6, 4.3	East Wall	607	-34
	11.7, 2.0	East Wall	673	97
	15.7, 4.3	East Wall	580	-87
	19.8, 2.0	East Wall	227	-120
	23.8, 4.3	East Wall	539	-170
	27.8, 2.0	East Wall	650	52
	31.9, 4.3	East Wall	634	20
	35.9, 2.0	East Wall	493	180
	39.9, 4.3	East Wall	263	-140
	44.0, 2.0	East Wall	478	280
	48.0, 4.3	East Wall	569	-110
	52.1, 2.0	East Wall	639	30
	56.1, 4.3	East Wall	626	4
	60.1, 2.0	East Wall	613	-22
	64.2, 4.3	East Wall	254	-160
C2 SU46				
	3.9, 1.0	West Wall	661	73
	7.9, 3.3	West Wall	637	26
	11.9, 1.0	West Wall	644	40
	16.0, 3.3	West Wall	621	-6
	20.0, 1.0	West Wall	659	69
	24.1, 3.3	West Wall	431	58
	28.1, 1.0	West Wall	453	230
	32.1, 3.3	West Wall	571	-110
	36.2, 1.0	West Wall	643	38
	40.2, 3.3	West Wall	579	-89
	44.3, 1.0	West Wall	645	42
	48.3, 3.3	West Wall	417	30
	52.3, 1.0	West Wall	428	52
	56.4, 3.3	West Wall	528	-190
	60.4, 1.0	West Wall	637	26
	64.5, 3.3	West Wall	615	-18
C2 SU45				
	5.5, 5.0	South Wall	395	-14
	7.9, 5.0	South Wall	275	-24
	10.3, 5.0	South Wall	383	-38
	1.9, 3.0	South Wall	584	-79

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C2 SU45 (cont.)	4.3, 3.0	South Wall	608	-32
	6.7, 3.0	South Wall	633	18
	9.1, 3.0	South Wall	631	14
	11.5, 3.0	South Wall	588	-71
	13.9, 3.0	South Wall	555	-140
	0.8, 0.9	South Wall	405	-430
	3.1, 0.9	South Wall	623	-2
	5.5, 0.9	South Wall	377	-490
	7.9, 0.9	South Wall	524	240
	10.3, 0.9	South Wall	430	-380
	12.7, 0.9	South Wall	513	220
	15.0, 0.9	South Wall	535	-180
	12.7,5.0	South Wall	566	-120
	15.0, 5.0	South Wall	625	2
C2 SU125				
	0.1, 4.7	Loading Dock	474	270
	2.9, 9.5	Loading Dock	377	81
	0.1, 14.3	Loading Dock	395	120
	2.9, 19.1	Loading Dock	380	87
	0.1, 23.9	Loading Dock	359	46
	2.9, 28.6	Loading Dock	346	20
	0.1, 33.4	Loading Dock	340	8
	2.9, 38.2	Loading Dock	350	28
	0.1, 43.0	Loading Dock	392	110
	2.9, 47.8	Loading Dock	479	280
	0.1, 52.6	Loading Dock	367	62
	2.9, 57.4	Loading Dock	401	130
	0.1, 62.1	Loading Dock	405	140
	2.9, 66.9	Loading Dock	407	140
Building B-911				
C1 SU12				
	5.3, 5.2	South Wall	478	150
	7.2, 5.2	South Wall	315	-42
	9.1, 5.2	South Wall	625	2
	11.0, 5.2	South Wall	618	-12
	0.5, 3.6	South Wall	513	220
	2.4, 3.6	South Wall	694	140
	4.3, 3.6	South Wall	625	2
	6.2, 3.6	South Wall	666	83
	8.1, 3.6	South Wall	656	63
	10.0, 3.6	South Wall	472	140

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU12 (cont.)	11.9, 3.6	South Wall	636	24
	13.8, 3.6	South Wall	674	99
	1.5, 1.9	South Wall	658	67
	3.4, 1.9	South Wall	591	-65
	5.3, 1.9	South Wall	517	230
	7.2, 1.9	South Wall	660	71
	9.1, 1.9	South Wall	658	67
	11.0, 1.9	South Wall	662	75
	12.9, 1.9	South Wall	747	240
	14.8, 1.9	South Wall	541	280
	0.5, 0.3	South Wall	573	340
	2.4, 0.3	South Wall	586	-75
	4.3, 0.3	South Wall	597	-54
	6.2, 0.3	South Wall	713	180
	8.1, 0.3	South Wall	570	-110
	10.0, 0.3	South Wall	451	97
	11.9, 0.3	South Wall	674	99
	13.8, 0.3	South Wall	631	14
C1 SU13				
	1.8, 3.4	S. West Wall	640	32
	1.8, 1.2	S. West Wall	669	89
	3.7, 4.5	S. West Wall	672	95
	3.7, 2.3	S. West Wall	658	67
	3.7, 0.1	S. West Wall	645	42
	5.6, 3.4	S. West Wall	448	91
	5.6, 1.2	S. West Wall	534	-180
	7.5, 4.5	S. West Wall	603	-42
	7.5, 2.3	S. West Wall	660	71
	7.5, 0.1	S. West Wall	634	20
	9.4, 3.4	S. West Wall	664	79
	9.4, 1.2	S. West Wall	615	-18
	11.3, 4.5	S. West Wall	699	150
	11.3, 2.3	S. West Wall	722	190
	11.3, 0.1	S. West Wall	737	220
	13.2, 3.4	S. West Wall	710	170
	13.2, 1.2	S. West Wall	694	140
	15.1, 4.5	S. West Wall	649	50
	15.1, 2.3	S. West Wall	643	38
	15.1, 0.1	S. West Wall	697	140
	17.0, 3.4	S. West Wall	662	75
	17.0, 1.2	S. West Wall	686	120

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU13 (cont.)	18.9, 4.5	S. West Wall	633	18
	18.9, 2.3	S. West Wall	591	-65
	18.9, 0.1	S. West Wall	660	71
	20.8, 3.4	S. West Wall	682	120
	20.8, 1.2	S. West Wall	601	-46
C1 SU14				
	23.2, 4.5	C. West Wall	684	120
	23.2, 2.3	C. West Wall	595	-58
	23.2, 0.1	C. West Wall	562	-120
	25.1, 3.4	C. West Wall	704	160
	25.1, 1.2	C. West Wall	664	79
	27.0, 4.5	C. West Wall	623	-2
	27.0, 2.3	C. West Wall	618	-12
	27.0, 0.1	C. West Wall	576	-95
	28.8, 3.4	C. West Wall	612	-24
	28.8, 1.2	C. West Wall	622	-4
	30.7, 4.5	C. West Wall	475	140
	30.7, 2.3	C. West Wall	457	110
	30.7, 0.1	C. West Wall	437	69
	32.6, 3.4	C. West Wall	633	18
	32.6, 1.2	C. West Wall	329	-14
	34.5, 4.5	C. West Wall	---	---
	34.5, 2.3	C. West Wall	349	26
	34.5, 0.1	C. West Wall	325	-22
	36.4, 3.4	C. West Wall	406	8
	36.4, 1.2	C. West Wall	539	270
	38.2, 4.5	C. West Wall	611	-26
	38.2, 2.3	C. West Wall	539	-170
	38.2, 0.1	C. West Wall	679	110
	40.1, 3.4	C. West Wall	614	-20
	40.1, 1.2	C. West Wall	619	-10
	42.0, 4.5	C. West Wall	398	-8
	42.0, 2.3	C. West Wall	460	120
	42.0, 0.1	C. West Wall	527	250
	43.9, 3.4	C. West Wall	637	26
	43.9, 1.2	C. West Wall	695	140
C1 SU15				
	44.9, 3.3	N. West Wall	671	93
	44.9, 1.2	N. West Wall	739	230
	46.7, 4.4	N. West Wall	619	-10
	46.7, 2.3	N. West Wall	558	-130

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU15 (cont.)	46.7, 0.2	N. West Wall	723	200
	48.5, 3.3	N. West Wall	424	44
	48.5, 1.2	N. West Wall	539	270
	50.4, 4.4	N. West Wall	657	65
	50.4, 2.3	N. West Wall	668	87
	50.4, 0.2	N. West Wall	713	180
	52.2, 3.3	N. West Wall	338	4
	52.2, 1.2	N. West Wall	623	-2
	54.0, 4.4	N. West Wall	465	120
	54.0, 2.3	N. West Wall	522	240
	54.0, 0.2	N. West Wall	547	290
	55.9, 3.3	N. West Wall	652	56
	55.9, 1.2	N. West Wall	701	150
	57.7, 4.4	N. West Wall	649	50
	57.7, 2.3	N. West Wall	714	180
	57.7, 0.2	N. West Wall	650	52
	59.5, 3.3	N. West Wall	675	100
	59.5, 1.2	N. West Wall	623	-2
	61.3, 4.4	N. West Wall	695	140
	61.3, 2.3	N. West Wall	550	-150
	61.3, 0.2	N. West Wall	654	60
	63.2, 3.3	N. West Wall	647	46
	63.2, 1.2	N. West Wall	752	250
	65.0, 4.4	N. West Wall	681	110
	65.0, 2.3	N. West Wall	776	300
	65.0, 0.2	N. West Wall	687	120
	66.8, 3.3	N. West Wall	766	280
	66.8, 1.2	N. West Wall	678	110
C1 SU16				
	1.0, 0.1	North Wall	498	190
	3.0, 0.1	North Wall	717	180
	4.9, 0.1	North Wall	623	-2
	6.9, 0.1	North Wall	641	34
	8.8, 0.1	North Wall	656	63
	10.8, 0.1	North Wall	513	220
	12.8, 0.1	North Wall	573	-100
	14.7, 0.1	North Wall	531	260
	0.0, 1.8	North Wall	555	300
	2.0, 1.8	North Wall	713	180
	3.9, 1.8	North Wall	702	150
	5.9, 1.8	North Wall	465	120

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU16 (cont.)	7.9, 1.8	North Wall	708	170
	9.8, 1.8	North Wall	470	130
	11.8, 1.8	North Wall	678	110
	13.7, 1.8	North Wall	709	170
	1.0, 3.5	North Wall	503	200
	3.0, 3.5	North Wall	674	99
	4.9, 3.5	North Wall	529	250
	6.9, 3.5	North Wall	622	-4
	8.8, 3.5	North Wall	685	120
	10.8, 3.5	North Wall	498	190
	12.8, 3.5	North Wall	688	130
	14.7, 3.5	North Wall	552	300
	5.9, 5.2	North Wall	456	110
	7.9, 5.2	North Wall	713	180
	9.8, 5.2	North Wall	685	120
C1 SU17				
	45.2, 0.1	N. East Wall	510	350
	45.2, 2.3	N. East Wall	242	-89
	45.2, 4.4	N. East Wall	656	63
	47.1, 1.2	N. East Wall	580	-87
	47.1, 3.3	N. East Wall	653	58
	49.0, 0.1	N. East Wall	546	290
	49.0, 2.3	N. East Wall	502	200
	49.0, 4.4	N. East Wall	465	120
	50.9, 1.2	N. East Wall	611	-26
	50.9, 3.3	N. East Wall	644	40
	52.7, 0.1	N. East Wall	633	18
	52.7, 2.3	N. East Wall	621	-6
	52.7, 4.4	N. East Wall	649	50
	54.6, 1.2	N. East Wall	508	210
	54.6, 3.3	N. East Wall	522	240
	56.5, 0.1	N. East Wall	237	-99
	56.5, 2.3	N. East Wall	250	-73
	56.5, 4.4	N. East Wall	637	26
	58.4, 1.2	N. East Wall	466	260
	58.4, 3.3	N. East Wall	476	280
	60.3, 0.1	N. East Wall	572	340
	60.3, 2.3	N. East Wall	468	130
	60.3, 4.4	N. East Wall	436	67
	62.2, 1.2	N. East Wall	695	140
	62.2, 3.3	N. East Wall	685	120

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU17 (cont.)	64.0, 0.1	N. East Wall	657	65
	64.0, 2.3	N. East Wall	644	40
	64.0, 4.4	N. East Wall	341	10
	65.9, 1.2	N. East Wall	581	-85
	65.9, 3.3	N. East Wall	662	75
C1 SU18				
	23.0, 0.0	C. East Wall	637	26
	23.0, 2.2	C. East Wall	664	79
	23.0, 4.4	C. East Wall	652	56
	24.9, 1.1	C. East Wall	519	230
	24.9, 3.3	C. East Wall	427	50
	26.8, 0.0	C. East Wall	629	10
	26.8, 2.2	C. East Wall	675	100
	26.8, 4.4	C. East Wall	329	-14
	28.6, 1.1	C. East Wall	551	-140
	28.6, 3.3	C. East Wall	664	79
	30.5, 0.0	C. East Wall	550	290
	30.5, 2.2	C. East Wall	498	190
	30.5, 4.4	C. East Wall	431	58
	32.4, 1.1	C. East Wall	234	-110
	32.4, 3.3	C. East Wall	674	99
	34.3, 0.0	C. East Wall	292	-87
	34.3, 2.2	C. East Wall	238	-97
	34.3, 4.4	C. East Wall	641	34
	36.2, 1.1	C. East Wall	526	250
	36.2, 3.3	C. East Wall	469	130
	38.0, 0.0	C. East Wall	645	42
	38.0, 2.2	C. East Wall	651	54
	38.0, 4.4	C. East Wall	291	-89
	39.9, 1.1	C. East Wall	590	-67
	39.9, 3.3	C. East Wall	666	83
	41.8, 0.0	C. East Wall	566	-120
	41.8, 2.2	C. East Wall	744	240
	41.8, 4.4	C. East Wall	621	-6
	43.7, 1.1	C. East Wall	625	2
	43.7, 3.3	C. East Wall	689	130
C1 SU19				
	0.7, 0.1	S. East Wall	545	280
	0.7, 2.3	S. East Wall	561	320
	0.7, 4.4	S. East Wall	451	97
	2.6, 1.2	S. East Wall	622	-4

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU19 (cont.)	2.6, 3.4	S. East Wall	653	58
	4.4, 0.1	S. East Wall	603	-42
	4.4, 2.3	S. East Wall	640	32
	4.4, 4.4	S. East Wall	683	120
	6.3, 1.2	S. East Wall	648	48
	6.3, 3.4	S. East Wall	697	140
	8.2, 0.1	S. East Wall	322	-28
	8.2, 2.3	S. East Wall	245	-83
	8.2, 4.4	S. East Wall	636	24
	10.1, 1.2	S. East Wall	425	180
	10.1, 3.4	S. East Wall	361	50
	12.0, 0.1	S. East Wall	540	270
	12.0, 2.3	S. East Wall	512	220
	12.0, 4.4	S. East Wall	510	210
	13.8, 1.2	S. East Wall	678	110
	13.8, 3.4	S. East Wall	615	-18
	15.7, 0.1	S. East Wall	721	190
	15.7, 2.3	S. East Wall	582	-83
	15.7, 4.4	S. East Wall	301	-69
	17.6, 1.2	S. East Wall	646	44
	17.6, 3.4	S. East Wall	616	-16
	19.5, 0.1	S. East Wall	618	-12
	19.5, 2.3	S. East Wall	662	75
	19.5, 4.4	S. East Wall	697	140
	21.4, 1.2	S. East Wall	677	110
	21.4, 3.4	S. East Wall	633	18
C1 SU20				
	Truss 1, 13.3	Trusses	366	160
	Truss 1, 10.8	Trusses	316	58
	Truss 1, 7.2	Trusses	315	56
	Truss 1, 1.2	Trusses	293	12
	Truss 2, 11.0	Trusses	353	130
	Truss 2, 1.5	Trusses	379	180
	Truss 3, 14.4	Trusses	341	110
	Truss 3, 7.8	Trusses	361	150
	Truss 3, 3.2	Trusses	366	160
	Truss 4, 11.4	Trusses	384	190
	Truss 4, 7.9	Trusses	417	260
	Truss 4, 6.1	Trusses	389	200
	Truss 5, 12.6	Trusses	480	380
	Truss 5, 10.5	Trusses	380	180

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU20 (cont.)	Truss 5, 3.4	Trusses	414	250
	Truss 5, 2.0	Trusses	363	150
	Truss 6, 11.8	Trusses	458	340
	Truss 6, 7.9	Trusses	344	110
	Truss 6, 2.9	Trusses	436	300
	Truss 7, 12.6	Trusses	345	120
	Truss 7, 8.9	Trusses	365	150
	Truss 7, 1.1	Trusses	381	190
	Truss 8, 13.2	Trusses	355	130
	Truss 8, 7.6	Trusses	328	81
	Truss 8, 2.6	Trusses	360	140
	Truss 9, 14.5	Trusses	340	110
	Truss 9, 9.0	Trusses	368	160
	Truss 9, 4.1	Trusses	381	190
	Truss 10, 14.3	Trusses	347	120
	Truss 10, 8.6	Trusses	451	330
	Truss 10, 5.9	Trusses	360	140
	Truss 10, 1.4	Trusses	358	140
C1 SU21				
	2.9, 3.9	Loading Dock	343	14
	0.4, 8.3	Loading Dock	330	-12
	2.9, 12.7	Loading Dock	319	-34
	0.4, 17.1	Loading Dock	388	100
	2.9, 21.5	Loading Dock	327	-18
	0.4, 25.9	Loading Dock	393	110
	2.9, 30.2	Loading Dock	362	52
	0.4, 34.6	Loading Dock	637	600
	Post RA: 0.4, 34.6	Loading Dock	546	420
	2.9, 39.0	Loading Dock	385	97
	0.4, 43.4	Loading Dock	423	170
	2.9, 47.8	Loading Dock	380	87
	0.4, 52.2	Loading Dock	452	230
	2.9, 56.6	Loading Dock	345	18
	0.4, 60.9	Loading Dock	369	65
	2.9, 65.3	Loading Dock	346	20
Building B-912				
C1 SU22				
	0.8, 0.5	Floor	331	-10
	4.0, 0.5	Floor	331	-10
	7.2, 0.5	Floor	339	6
	10.4, 0.5	Floor	368	63

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU22 (cont.)	13.6, 0.5	Floor	366	60
	2.4, 3.2	Floor	396	120
	5.6, 3.2	Floor	304	-63
	8.8, 3.2	Floor	294	-83
	12.0, 3.2	Floor	329	-14
	15.2, 3.2	Floor	426	180
	0.8, 6.0	Floor	372	71
	4.0, 6.0	Floor	374	75
	7.2, 6.0	Floor	311	-50
	10.4, 6.0	Floor	313	-46
	13.6, 6.0	Floor	360	48
C1 SU23				
	0.1, 6.5	Floor	363	54
	3.2, 6.5	Floor	348	24
	6.2, 6.5	Floor	310	-52
	9.3, 6.5	Floor	352	32
	12.3, 6.5	Floor	302	-67
	1.6, 9.2	Floor	334	-4
Random	0.4, 6.8	Floor	365	58
Random	0.7, 7.0	Floor	373	73
Random	9.1, 12.0	Floor	280	-110
Random	1.1, 10.1	Floor	315	-42
	0.1, 11.8	Floor	407	140
	3.2, 11.8	Floor	345	18
	6.2, 11.8	Floor	374	75
	9.3, 11.8	Floor	337	2
Random	8.3, 11.5	Floor	292	-87
C1 SU24				
	2.1, 12.5	Floor	410	150
	5.3, 12.5	Floor	347	22
	8.5, 12.5	Floor	375	77
	11.7, 12.5	Floor	329	-14
	1.6, 16.4	Floor	296	-79
	0.5, 15.3	Floor	352	32
	3.7, 15.3	Floor	338	4
	6.9, 15.3	Floor	321	-30
	10.1, 15.3	Floor	323	-26
	13.3, 15.3	Floor	299	-73
	2.1, 18.1	Floor	325	-22
	5.3, 18.1	Floor	325	-22
	8.5, 18.1	Floor	291	-89

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU24 (cont.)	11.7, 18.1	Floor	305	-62
	14.9, 18.1	Floor	414	150
C1 SU25				
	0.4, 18.3	Floor	470	270
	3.5, 18.3	Floor	361	50
	6.5, 18.3	Floor	344	16
	9.5, 18.3	Floor	303	-65
	12.6, 18.3	Floor	333	-6
	1.9, 20.9	Floor	341	10
	5.0, 20.9	Floor	293	-85
	8.0, 20.9	Floor	273	-120
	11.0, 20.9	Floor	268	-130
	14.1, 20.9	Floor	312	-48
	0.4, 23.6	Floor	362	52
	3.5, 23.6	Floor	312	-48
	6.5, 23.6	Floor	319	-34
	9.5, 23.6	Floor	321	-30
	12.6, 23.6	Floor	336	0
C1 SU26				
	0.7, 24.9	Floor	328	-16
	3.9, 24.9	Floor	357	42
	7.1, 24.9	Floor	280	-110
	10.3, 24.9	Floor	304	-63
	13.5, 24.9	Floor	325	-22
	2.3, 27.7	Floor	345	18
	5.5, 27.7	Floor	303	-65
	8.7, 27.7	Floor	264	-140
	11.9, 27.7	Floor	346	20
	15.1, 27.7	Floor	394	120
	0.7, 30.5	Floor	296	-79
	3.9, 30.5	Floor	346	20
	7.1, 30.5	Floor	327	-18
	10.3, 30.5	Floor	300	-71
	13.5, 30.5	Floor	343	14
C1 SU27				
	0.5, 31.0	Floor	386	99
	3.7, 31.0	Floor	367	62
	6.9, 31.0	Floor	331	-10
	10.1, 31.0	Floor	345	18
	13.3, 31.0	Floor	341	10
	2.1, 33.8	Floor	298	-75

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU27 (cont.)	5.3, 33.8	Floor	280	-110
	8.5, 33.8	Floor	316	-40
	11.7, 33.8	Floor	270	-130
	14.9, 33.8	Floor	331	-10
	0.5, 36.6	Floor	373	73
	3.7, 36.6	Floor	369	65
	6.9, 36.6	Floor	312	-48
	10.1, 36.6	Floor	335	-2
	13.3, 36.6	Floor	304	-63
C1 SU28				
	1.7, 37.1	Floor	324	-24
	4.9, 37.1	Floor	324	-24
	8.2, 37.1	Floor	303	-65
	11.4, 37.1	Floor	307	-58
	14.6, 37.1	Floor	340	8
	0.1, 39.9	Floor	361	50
	3.3, 39.9	Floor	317	-38
	6.6, 39.9	Floor	338	4
	9.8, 39.9	Floor	284	-100
	13.0, 39.9	Floor	335	-2
	1.7, 42.7	Floor	321	-30
	4.9, 42.7	Floor	304	-63
	8.2, 42.7	Floor	273	-120
	11.4, 42.7	Floor	283	-110
	14.6, 42.7	Floor	343	14
C1 SU29				
	2.0, 42.7	Floor	346	20
	5.2, 42.7	Floor	336	0
	8.4, 42.7	Floor	298	-75
	11.6, 42.7	Floor	341	10
	14.8, 42.7	Floor	320	-32
	0.4, 45.5	Floor	339	6
	3.6, 45.5	Floor	307	-58
	6.8, 45.5	Floor	307	-58
	10.0, 45.5	Floor	308	-56
	13.2, 45.5	Floor	315	-42
	2.0, 48.3	Floor	335	-2
	5.2, 48.3	Floor	309	-54
	8.4, 48.3	Floor	343	14
	11.6, 48.3	Floor	314	-44
	14.8, 48.3	Floor	311	-50

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU30				
	0.2, 49.5	Floor	335	-2
	3.3, 49.5	Floor	338	4
	6.3, 49.5	Floor	302	-67
	9.4, 49.5	Floor	310	-52
	12.4, 49.5	Floor	319	-34
	1.8, 52.1	Floor	334	-4
	4.8, 52.1	Floor	321	-30
	7.9, 52.1	Floor	348	24
	10.9, 52.1	Floor	364	56
	14.0, 52.1	Floor	325	-22
	0.2, 54.8	Floor	399	120
	3.3, 54.8	Floor	343	14
	6.3, 54.8	Floor	297	-77
	9.4, 54.8	Floor	306	-60
	12.4, 54.8	Floor	322	-28
C1 SU31				
	1.9, 55.3	Floor	354	36
	5.1, 55.3	Floor	300	-71
	8.3, 55.3	Floor	284	-100
	11.5, 55.3	Floor	346	20
	14.7, 55.3	Floor	357	42
	0.3, 58.1	Floor	369	65
	3.5, 58.1	Floor	343	14
	6.7, 58.1	Floor	326	-20
	9.9, 58.1	Floor	278	-120
	13.1, 58.1	Floor	322	-28
	1.9, 60.9	Floor	328	-16
	5.1, 60.9	Floor	375	77
	8.3, 60.9	Floor	315	-42
	11.5, 60.9	Floor	305	-62
	14.7, 60.9	Floor	338	4
C1 SU32				
	0.2, 61.4	Floor	369	65
	3.4, 61.4	Floor	350	28
	6.6, 61.4	Floor	363	54
	9.8, 61.4	Floor	320	-32
	13.0, 61.4	Floor	352	32
	1.8, 64.2	Floor	390	110
	5.0, 64.2	Floor	358	44
	8.2, 64.2	Floor	335	-2

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU32 (cont.)	11.4, 64.2	Floor	334	-4
	14.6, 64.2	Floor	376	79
	0.2, 67.0	Floor	436	200
	3.4, 67.0	Floor	343	14
	6.6, 67.0	Floor	386	99
	9.8, 67.0	Floor	370	67
	13.0, 67.0	Floor	380	87
C1 SU33				
	0.6, 1.0	South Wall	526	250
	1.7, 2.9	South Wall	681	110
	2.8, 1.0	South Wall	583	-81
	2.8, 4.7	South Wall	683	120
	3.8, 2.9	South Wall	657	65
	4.9, 1.0	South Wall	429	54
	4.9, 4.7	South Wall	490	170
	6.0, 2.9	South Wall	610	-28
	7.0, 1.0	South Wall	620	-8
	7.0, 4.7	South Wall	293	12
	8.1, 2.9	South Wall	655	62
	9.2, 1.0	South Wall	671	93
	9.2, 4.7	South Wall	619	-10
	10.2, 2.9	South Wall	545	280
	11.3, 1.0	South Wall	601	-46
	11.3, 4.7	South Wall	670	91
	12.4, 2.9	South Wall	724	200
	13.4, 1.0	South Wall	634	20
	13.4, 4.7	South Wall	651	54
	14.5, 2.9	South Wall	643	38
C1 SU34				
	1.8, 1.6	S. West Wall	667	85
	1.8, 4.0	S. West Wall	563	-120
	3.9, 0.4	S. West Wall	604	-40
	3.9, 2.8	S. West Wall	495	-260
	6.0, 1.6	S. West Wall	423	42
	6.0, 4.0	S. West Wall	470	130
	8.1, 0.4	S. West Wall	620	-8
	8.1, 2.8	S. West Wall	628	8
	10.1, 1.6	S. West Wall	704	160
	10.1, 4.0	S. West Wall	601	-46
	12.2, 0.4	S. West Wall	536	270
	12.2, 2.8	S. West Wall	500	190

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU34 (cont.)	14.3, 1.6	S. West Wall	573	-100
	14.3, 4.0	S. West Wall	311	-50
	16.4, 0.4	S. West Wall	669	89
	16.4, 2.8	S. West Wall	513	-220
	18.5, 1.6	S. West Wall	601	-46
	18.5, 4.0	S. West Wall	636	24
	20.6, 0.4	S. West Wall	560	-130
	20.6, 2.8	S. West Wall	674	99
C1 SU35				
	24.3, 1.7	C. West Wall	476	150
	24.3, 4.1	C. West Wall	490	170
	26.4, 0.5	C. West Wall	641	34
	26.4, 2.9	C. West Wall	306	-60
	28.5, 1.7	C. West Wall	616	-16
	28.5, 4.1	C. West Wall	641	34
	30.6, 0.5	C. West Wall	589	-69
	30.6, 2.9	C. West Wall	657	65
	32.6, 1.7	C. West Wall	557	-130
	32.6, 4.1	C. West Wall	652	56
	34.7, 0.5	C. West Wall	622	-4
	34.7, 2.9	C. West Wall	617	-14
	36.8, 1.7	C. West Wall	676	100
	36.8, 4.1	C. West Wall	336	0
	38.9, 0.5	C. West Wall	651	54
	38.9, 2.9	C. West Wall	583	-81
	41.0, 1.7	C. West Wall	686	120
	41.0, 4.1	C. West Wall	599	-50
	43.1, 0.5	C. West Wall	494	-260
	43.1, 2.9	C. West Wall	550	290
C1 SU36				
	46.6, 1.7	N. West Wall	579	-89
	46.6, 4.2	N. West Wall	643	38
	48.7, 0.5	N. West Wall	684	120
	48.7, 3.0	N. West Wall	638	28
	50.8, 1.7	N. West Wall	592	-63
	50.8, 4.2	N. West Wall	628	8
	52.9, 0.5	N. West Wall	605	-38
	52.9, 3.0	N. West Wall	295	-81
	55.0, 1.7	N. West Wall	604	-40
	55.0, 4.2	N. West Wall	625	2
	57.1, 0.5	N. West Wall	530	250

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU36 (cont.)	57.1, 3.0	N. West Wall	417	30
	59.1, 1.7	N. West Wall	600	-48
	59.1, 4.2	N. West Wall	682	120
	61.2, 0.5	N. West Wall	644	40
	61.2, 3.0	N. West Wall	647	46
	63.3, 1.7	N. West Wall	611	-26
	63.3, 4.2	N. West Wall	632	16
	65.4, 0.5	N. West Wall	629	10
	65.4, 3.0	N. West Wall	617	-14
C1 SU37				
	0.9, 2.9	North Wall	600	-48
	2.0, 1.0	North Wall	596	-56
	2.0, 4.7	North Wall	562	-120
	3.0, 2.9	North Wall	607	-34
	4.1, 1.0	North Wall	631	14
	4.1, 4.7	North Wall	628	8
	5.2, 2.9	North Wall	511	220
	6.2, 1.0	North Wall	641	34
	6.2, 4.7	North Wall	658	67
	7.3, 2.9	North Wall	531	-180
	8.4, 1.0	North Wall	681	110
	8.4, 4.7	North Wall	255	-63
	9.4, 2.9	North Wall	551	-140
	10.5, 1.0	North Wall	506	210
	10.5, 4.7	North Wall	424	44
	11.6, 2.9	North Wall	628	8
	12.6, 1.0	North Wall	647	46
	12.6, 4.7	North Wall	611	-26
	13.7, 2.9	North Wall	571	-110
	14.7, 1.0	North Wall	615	-18
C1 SU38				
	1.6, 1.4	N. East Wall	593	-62
	1.6, 3.8	N. East Wall	608	-32
	3.7, 0.2	N. East Wall	618	-12
	3.7, 2.6	N. East Wall	582	-83
	5.8, 1.4	N. East Wall	462	120
	5.8, 3.8	N. East Wall	518	230
	7.9, 0.2	N. East Wall	666	83
	7.9, 2.6	N. East Wall	327	-18
	10.0, 1.4	N. East Wall	492	310
	10.0, 3.8	N. East Wall	590	-67

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU38 (cont.)	12.1, 0.2	N. East Wall	493	180
	12.1, 2.6	N. East Wall	419	34
	14.2, 1.4	N. East Wall	653	58
	14.2, 3.8	N. East Wall	651	54
	16.3, 0.2	N. East Wall	671	93
	16.3, 2.6	N. East Wall	607	-34
	18.4, 1.4	N. East Wall	574	-99
	18.4, 3.8	N. East Wall	661	73
	20.5, 0.2	N. East Wall	203	-170
	20.5, 2.6	N. East Wall	188	-200
C1 SU39				
	24.0, 0.3	C. East Wall	441	77
	24.0, 2.8	C. East Wall	486	170
	26.1, 1.6	C. East Wall	630	12
	26.1, 4.0	C. East Wall	586	-75
	28.2, 0.3	C. East Wall	625	2
	28.2, 2.8	C. East Wall	587	-73
	30.3, 1.6	C. East Wall	410	16
	30.3, 4.0	C. East Wall	444	83
	32.4, 0.3	C. East Wall	193	-190
	32.4, 2.8	C. East Wall	205	-160
	34.5, 1.6	C. East Wall	193	-190
	34.5, 4.0	C. East Wall	640	32
	36.6, 0.3	C. East Wall	442	79
	36.6, 2.8	C. East Wall	475	140
	38.6, 1.6	C. East Wall	665	81
	38.6, 4.0	C. East Wall	522	-200
	40.7, 0.3	C. East Wall	601	-46
	40.7, 2.8	C. East Wall	623	-2
	42.8, 1.6	C. East Wall	588	-71
	42.8, 4.0	C. East Wall	690	130
C1 SU40				
	46.3, 1.6	S. East Wall	157	-260
	46.3, 4.0	S. East Wall	536	-170
	48.4, 0.4	S. East Wall	471	140
	48.4, 2.8	S. East Wall	440	75
	50.5, 1.6	S. East Wall	657	65
	66.0, 1.8	S. East Wall	599	-50
	52.6, 0.4	S. East Wall	577	-93
	53.0, 2.0	S. East Wall	638	28
	54.7, 1.6	S. East Wall	409	14

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU40 (cont.)	54.7, 4.0	S. East Wall	467	130
	50.6, 0.5	S. East Wall	491	180
	63.3, 2.3	S. East Wall	586	-75
	53.0, 0.1	S. East Wall	634	20
	48.0, 1.2	S. East Wall	170	-230
	60.9, 0.4	S. East Wall	526	-190
	60.9, 2.8	S. East Wall	614	-20
	63.0, 1.6	S. East Wall	586	-75
	63.0, 4.0	S. East Wall	669	89
	65.1, 0.4	S. East Wall	625	2
	65.1, 2.8	S. East Wall	513	-220
C1 SU41				
	Truss 1, 1.7	Trusses	468	360
	Truss 1, 2.3	Trusses	420	260
	Truss 1, 12.1	Trusses	307	40
	Truss 3, 4.5	Trusses	365	150
	Truss 3, 5.0	Trusses	369	160
	Truss 3, 10.9	Trusses	409	240
	Truss 3, 14.4	Trusses	337	99
	Truss 4, 7.8	Trusses	387	200
	Truss 5, 1.5	Trusses	436	300
	Truss 5, 1.6	Trusses	416	260
	Truss 5, 3.2	Trusses	424	270
	Truss 5, 7.7	Trusses	354	130
	Truss 6, 1.0	Trusses	322	69
	Truss 6, 3.4	Trusses	339	100
	Truss 6, 7.0	Trusses	384	190
	Truss 6, 11.4	Trusses	312	50
	Truss 6, 13.6	Trusses	350	120
	Truss 7, 1.0	Trusses	392	210
	Truss 8, 3.1	Trusses	357	140
	Truss 8, 5.0	Trusses	342	110
	Truss 8, 6.7	Trusses	364	150
	Truss 8, 11.0	Trusses	341	110
	Truss 8, 11.8	Trusses	282	-10
	Truss 8, 12.6	Trusses	247	-79
	Truss 9, 0.2	Trusses	335	95
	Truss 9, 2.4	Trusses	315	56
	Truss 10, 2.4	Trusses	326	77
	Truss 10, 9.5	Trusses	351	130

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
Building F-731				
C1 SU50				
	2.5, 1.2	Floor	447	220
	5.1, 1.2	Floor	419	160
	7.7, 1.2	Floor	386	99
	10.3, 1.2	Floor	419	160
	12.9, 1.2	Floor	461	250
	1.2, 3.4	Floor	459	240
	3.8, 3.4	Floor	441	210
	6.4, 3.4	Floor	435	200
	9.0, 3.4	Floor	393	110
	11.6, 3.4	Floor	440	210
	14.2, 3.4	Floor	450	230
	2.5, 5.7	Floor	464	250
	5.1, 5.7	Floor	381	89
	7.7, 5.7	Floor	439	200
	10.3, 5.7	Floor	388	100
	12.9, 5.7	Floor	425	180
C1 SU51				
	2.4, 6.6	Floor	458	240
	5.0, 6.6	Floor	379	85
	7.6, 6.6	Floor	368	63
	10.1, 6.6	Floor	372	71
	12.7, 6.6	Floor	408	140
	1.1, 8.8	Floor	419	160
	3.7, 8.8	Floor	445	220
	6.3, 8.8	Floor	366	60
	8.8, 8.8	Floor	422	170
	11.4, 8.8	Floor	414	150
	14.0, 8.8	Floor	388	100
	2.4, 11.0	Floor	464	250
	5.0, 11.0	Floor	528	380
	7.6, 11.0	Floor	489	300
	10.1, 11.0	Floor	432	190
	12.7, 11.0	Floor	357	42
C1 SU52				
	2.3, 12.9	Floor	464	250
	4.9, 12.9	Floor	427	180
	7.5, 12.9	Floor	454	230
	10.1, 12.9	Floor	415	160
	12.7, 12.9	Floor	459	240

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU52 (cont.)	1.1, 15.1	Floor	443	210
	3.6, 15.1	Floor	436	200
	6.2, 15.1	Floor	439	200
	8.8, 15.1	Floor	452	230
	11.4, 15.1	Floor	404	130
	14.0, 15.1	Floor	421	170
	2.3, 17.3	Floor	433	190
	4.9, 17.3	Floor	419	160
	7.5, 17.3	Floor	360	48
	10.1, 17.3	Floor	418	160
	12.7, 17.3	Floor	467	260
C1 SU53				
	0.4, 18.4	Floor	427	180
	3.3, 18.4	Floor	441	210
	6.2, 18.4	Floor	409	140
	9.1, 18.4	Floor	423	170
	12.0, 18.4	Floor	412	150
	14.9, 18.4	Floor	385	97
	1.8, 20.9	Floor	449	220
	4.7, 20.9	Floor	423	170
	7.7, 20.9	Floor	411	150
	10.6, 20.9	Floor	473	270
	13.5, 20.9	Floor	346	20
	0.4, 23.5	Floor	423	170
	3.3, 23.5	Floor	405	140
	6.2, 23.5	Floor	431	190
	9.1, 23.5	Floor	420	170
	12.0, 23.5	Floor	419	160
	14.9, 23.5	Floor	413	150
C1 SU54				
	2.6, 25.4	Floor	425	180
	5.2, 25.4	Floor	371	69
	7.8, 25.4	Floor	363	54
	10.4, 25.4	Floor	438	200
	13.0, 25.4	Floor	309	-54
	1.3, 27.7	Floor	351	30
	3.9, 27.7	Floor	395	120
	6.5, 27.7	Floor	401	130
	9.1, 27.7	Floor	346	20
	11.7, 27.7	Floor	416	160
	14.3, 27.7	Floor	383	93

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU54 (cont.)	2.6, 29.9	Floor	422	170
	5.2, 29.9	Floor	454	230
	7.8, 29.9	Floor	429	180
	10.4, 29.9	Floor	391	110
	13.0, 29.9	Floor	429	180
C1 SU55				
	2.4, 31.0	Floor	380	87
	5.0, 31.0	Floor	322	-28
	7.6, 31.0	Floor	446	220
	10.2, 31.0	Floor	507	340
	12.8, 31.0	Floor	393	110
	1.1, 33.3	Floor	450	230
	3.7, 33.3	Floor	395	120
	6.3, 33.3	Floor	362	52
	8.9, 33.3	Floor	436	200
	11.5, 33.3	Floor	435	200
	14.1, 33.3	Floor	375	77
	2.4, 35.5	Floor	433	190
	5.0, 35.5	Floor	438	200
	7.6, 35.5	Floor	469	260
	10.2, 35.5	Floor	435	200
	12.8, 35.5	Floor	400	130
C1 SU56				
	2.5, 37.7	Floor	457	240
	5.1, 37.7	Floor	448	220
	7.7, 37.7	Floor	418	160
	10.2, 37.7	Floor	362	52
	12.8, 37.7	Floor	419	160
	1.2, 39.9	Floor	403	130
	3.8, 39.9	Floor	391	110
	6.4, 39.9	Floor	408	140
	8.9, 39.9	Floor	353	34
	11.5, 39.9	Floor	413	150
	14.1, 39.9	Floor	388	100
	2.5, 42.2	Floor	407	140
	5.1, 42.2	Floor	372	71
	7.7, 42.2	Floor	435	200
	10.2, 42.2	Floor	358	44
	12.8, 42.2	Floor	361	50
C1 SU57				
	2.5, 43.5	Floor	384	95

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU57 (cont.)	5.1, 43.5	Floor	399	120
	7.7, 43.5	Floor	431	190
	10.3, 43.5	Floor	352	32
	12.8, 43.5	Floor	374	75
	1.2, 45.8	Floor	421	170
	3.8, 45.8	Floor	453	230
	6.4, 45.8	Floor	340	8
	9.0, 45.8	Floor	390	110
	11.5, 45.8	Floor	447	220
	14.1, 45.8	Floor	423	170
	2.5, 48.0	Floor	394	120
	5.1, 48.0	Floor	383	93
	7.7, 48.0	Floor	398	120
	10.3, 48.0	Floor	433	190
	12.8, 48.0	Floor	343	14
C1 SU58				
	2.5, 50.4	Floor	363	54
	5.1, 50.4	Floor	406	140
	7.7, 50.4	Floor	367	62
	10.3, 50.4	Floor	339	6
	12.9, 50.4	Floor	366	60
	1.2, 52.7	Floor	383	93
	3.8, 52.7	Floor	429	180
	6.4, 52.7	Floor	427	180
	9.0, 52.7	Floor	321	-30
	11.6, 52.7	Floor	418	160
	14.2, 52.7	Floor	392	110
	2.5, 54.9	Floor	383	93
	5.1, 54.9	Floor	396	120
	7.7, 54.9	Floor	395	120
	10.3, 54.9	Floor	418	160
	12.9, 54.9	Floor	439	200
Judgmental	9.0, 52.7	Floor	324	-24
C1 SU59				
	2.5, 56.4	Floor	388	100
	5.1, 56.4	Floor	428	180
	7.7, 56.4	Floor	352	32
	10.2, 56.4	Floor	413	150
	12.8, 56.4	Floor	406	140
	1.2, 58.7	Floor	415	160
	3.8, 58.7	Floor	384	95

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU59 (cont.)	6.4, 58.7	Floor	396	120
	9.0, 58.7	Floor	414	150
	11.5, 58.7	Floor	422	170
	14.1, 58.7	Floor	348	24
	2.5, 60.9	Floor	389	110
	5.1, 60.9	Floor	366	60
	7.7, 60.9	Floor	393	110
	10.2, 60.9	Floor	399	120
	12.8, 60.9	Floor	402	130
C1 SU60				
	2.5, 61.5	Floor	403	130
	5.1, 61.5	Floor	394	120
	7.7, 61.5	Floor	387	100
	10.3, 61.5	Floor	411	150
	12.9, 61.5	Floor	404	130
	1.2, 63.8	Floor	454	230
	3.8, 63.8	Floor	401	130
	6.4, 63.8	Floor	412	150
	9.0, 63.8	Floor	363	54
	11.6, 63.8	Floor	418	160
	14.2, 63.8	Floor	403	130
	2.5, 66.0	Floor	468	260
	5.1, 66.0	Floor	429	180
	7.7, 66.0	Floor	388	100
	10.3, 66.0	Floor	455	240
	12.9, 66.0	Floor	451	230
C1 SU61				
	3.1, 1.9	Lower W. Wall	642	36
	6.4, 0.1	Lower W. Wall	578	-91
	9.7, 1.9	Lower W. Wall	687	120
	12.9, 0.1	Lower W. Wall	575	-97
	16.2, 1.9	Lower W. Wall	598	-52
	19.4, 0.1	Lower W. Wall	632	16
	22.7, 1.9	Lower W. Wall	633	18
	25.9, 0.1	Lower W. Wall	513	-220
	29.2, 1.9	Lower W. Wall	616	-16
	32.4, 0.1	Lower W. Wall	389	110
	35.7, 1.9	Lower W. Wall	666	83
	39.0, 0.1	Lower W. Wall	433	190
	42.2, 1.9	Lower W. Wall	458	110
	45.5, 0.1	Lower W. Wall	420	-400

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU61 (cont.)	48.7, 1.9	Lower W. Wall	383	-38
	52.0, 0.1	Lower W. Wall	368	63
	55.2, 1.9	Lower W. Wall	671	93
	58.5, 0.1	Lower W. Wall	475	280
	61.7, 1.9	Lower W. Wall	645	42
	65.0, 0.1	Lower W. Wall	480	290
Judgmental	10.2, 1.5	Lower W. Wall	593	-62
C2 SU62				
	10.4, 5.3	South Wall	651	490
	8.0, 5.3	South Wall	228	-120
	5.6, 5.3	South Wall	386	-470
	14.0, 3.2	South Wall	621	-6
	11.6, 3.2	South Wall	652	56
	9.2, 3.2	South Wall	708	170
	6.8, 3.2	South Wall	631	14
	4.5, 3.2	South Wall	653	58
	2.1, 3.2	South Wall	626	4
	15.2, 1.1	South Wall	595	-58
	12.8, 1.1	South Wall	574	-99
	10.4, 1.1	South Wall	432	60
	8.0, 1.1	South Wall	633	18
	5.6, 1.1	South Wall	386	-32
	3.3, 1.1	South Wall	624	0
	0.9, 1.1	South Wall	479	150
C2 SU63				
	2.9, 2.1	Upper W. Wall	612	-24
	6.8, 4.4	Upper W. Wall	619	-10
	10.7, 2.1	Upper W. Wall	669	89
	14.7, 4.4	Upper W. Wall	293	-85
	18.6, 2.1	Upper W. Wall	605	-38
	22.5, 4.4	Upper W. Wall	627	6
	26.4, 2.1	Upper W. Wall	602	-44
	30.3, 4.4	Upper W. Wall	348	-110
	34.2, 2.1	Upper W. Wall	546	-150
	38.1, 4.4	Upper W. Wall	636	24
	42.0, 2.1	Upper W. Wall	624	0
	45.9, 4.4	Upper W. Wall	617	-14
	49.8, 2.1	Upper W. Wall	587	-73
	53.7, 4.4	Upper W. Wall	656	63
	57.6, 2.1	Upper W. Wall	645	42
	61.5, 4.4	Upper W. Wall	684	120

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C2 SU63 (cont.)	65.4, 2.1	Upper W. Wall	692	130
C2 SU64				
	0.3, 1.1	North Wall	509	210
	2.7, 1.1	North Wall	660	71
	5.1, 1.1	North Wall	481	160
	7.5, 1.1	North Wall	661	73
	9.8, 1.1	North Wall	616	-16
	12.2, 1.1	North Wall	568	-110
	14.6, 1.1	North Wall	617	-14
	1.5, 3.2	North Wall	632	16
	3.9, 3.2	North Wall	680	110
	6.3, 3.2	North Wall	604	-40
	8.7, 3.2	North Wall	611	-26
	11.0, 3.2	North Wall	617	-14
	13.4, 3.2	North Wall	621	-6
	5.1, 5.3	North Wall	416	28
	7.5, 5.3	North Wall	212	-150
	9.8, 5.3	North Wall	626	4
C2 SU65				
	2.6, 1.3	East Wall	660	71
	6.7, 3.6	East Wall	725	200
	10.7, 1.3	East Wall	236	-200
	14.8, 3.6	East Wall	621	-6
	18.8, 1.3	East Wall	528	-190
	22.8, 3.6	East Wall	261	-150
	26.9, 1.3	East Wall	668	87
	30.9, 3.6	East Wall	603	-42
	35.0, 1.3	East Wall	686	120
	39.0, 3.6	East Wall	677	110
	43.0, 1.3	East Wall	660	71
	47.1, 3.6	East Wall	661	73
	51.1, 1.3	East Wall	395	-14
	55.2, 3.6	East Wall	623	-2
	59.2, 1.3	East Wall	643	38
	63.2, 3.6	East Wall	253	-160
	59.2, 1.3	East Wall	291	-89
	56.0, 3.6	East Wall	609	-30
	36.5, 3.6	East Wall	240	-190
	35.7, 1.3	East Wall	607	-34
	23.0, 3.6	East Wall	666	83
	19.3, 1.3	East Wall	230	-210

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C2 SU65 (cont.)	15.5, 3.6	East Wall	437	200
C2 SU66				
	1.4, 6.3	Truss 1	302	30
	11.8, 12.3	Truss 2	268	-38
	1.3, 18.4	Truss 3	341	110
	14.6, 18.4	Truss 3	248	-77
	8.5, 18.4	Truss 3	299	24
	9.9, 18.5	Truss 3	263	-48
	10.2, 24.5	Truss 4	313	52
	4.3, 30.5	Truss 5	317	60
	9.0, 36.8	Truss 6	286	-2
	3.5, 42.8	Truss 7	262	-50
	4.1, 42.8	Truss 7	291	8
	11.7, 42.9	Truss 7	326	77
	1.6, 42.9	Truss 7	316	58
	0.4, 48.9	Truss 8	293	12
	3.3, 61.1	Truss 10	287	0
C2 SU124				
	2.4, 2.6	Loading Dock	402	130
	0.0, 6.7	Loading Dock	386	99
	2.4, 10.9	Loading Dock	395	120
	0.0, 15.0	Loading Dock	421	170
	2.4, 19.1	Loading Dock	352	32
	0.0, 23.3	Loading Dock	371	69
	2.4, 27.4	Loading Dock	351	30
	2.4, 43.9	Loading Dock	432	190
	0.0, 48.0	Loading Dock	343	14
	2.4, 52.2	Loading Dock	395	120
	0.0, 56.3	Loading Dock	389	110
	2.4, 60.4	Loading Dock	392	110
Building F-737				
C1 SU67				
	1.8, 0.1	Pad Top	322	-28
	5.1, 0.1	Pad Top	370	67
	8.5, 0.1	Pad Top	342	12
	11.9, 0.1	Pad Top	441	210
	15.2, 0.1	Pad Top	440	210
	0.1, 3.0	Pad Top	347	22
	3.5, 3.0	Pad Top	327	-18
	6.8, 3.0	Pad Top	335	-2
	10.2, 3.0	Pad Top	365	58

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU67 (cont.)	13.6, 3.0	Pad Top	297	-77
	1.8, 5.9	Pad Top	311	-50
	5.1, 5.9	Pad Top	343	14
	8.5, 5.9	Pad Top	333	-6
	11.9, 5.9	Pad Top	330	-12
	15.2, 5.9	Pad Top	351	30
C1 SU68				
	0.6, 6.2	Pad Top	379	85
	3.9, 6.2	Pad Top	297	-77
	7.3, 6.2	Pad Top	312	-48
	10.6, 6.2	Pad Top	335	-2
	14.0, 6.2	Pad Top	345	18
	2.2, 9.1	Pad Top	325	-22
	5.6, 9.1	Pad Top	313	-46
	9.0, 9.1	Pad Top	325	-22
	12.3, 9.1	Pad Top	379	85
	0.6, 12.0	Pad Top	435	200
	3.9, 12.0	Pad Top	304	-63
	7.3, 12.0	Pad Top	329	-14
	10.6, 12.0	Pad Top	397	120
	14.0, 12.0	Pad Top	319	-34
C1 SU69				
	0.4, 12.8	Pad Top	328	-16
	3.4, 12.8	Pad Top	324	-24
	6.4, 12.8	Pad Top	300	-71
	9.5, 12.8	Pad Top	267	-140
	12.5, 12.8	Pad Top	441	210
	1.9, 15.4	Pad Top	286	-99
	4.9, 15.4	Pad Top	278	-120
	8.0, 15.4	Pad Top	318	-36
	11.0, 15.4	Pad Top	334	-4
	14.0, 15.4	Pad Top	449	220
	0.4, 18.0	Pad Top	520	370
	3.4, 18.0	Pad Top	308	-56
	6.4, 18.0	Pad Top	326	-20
	9.5, 18.0	Pad Top	314	-44
	12.5, 18.0	Pad Top	340	8
C1 SU70				
	0.8, 18.7	Pad Top	336	0
	4.0, 18.7	Pad Top	289	-93
	7.2, 18.7	Pad Top	361	50

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU70 (cont.)	10.4, 18.7	Pad Top	352	32
	13.6, 18.7	Pad Top	330	-12
	2.4, 21.5	Pad Top	308	-56
	5.6, 21.5	Pad Top	309	-54
	8.8, 21.5	Pad Top	349	26
	12.0, 21.5	Pad Top	356	40
	15.2, 21.5	Pad Top	391	110
	0.8, 24.2	Pad Top	317	-38
	4.0, 24.2	Pad Top	310	-52
	7.2, 24.2	Pad Top	363	54
	10.4, 24.2	Pad Top	357	42
	13.6, 24.2	Pad Top	351	30
C1 SU71				
	0.3, 24.5	Pad Top	299	-73
	3.5, 24.5	Pad Top	295	-81
	6.7, 24.5	Pad Top	365	58
	9.9, 24.5	Pad Top	361	50
	13.1, 24.5	Pad Top	344	16
	1.9, 27.3	Pad Top	303	-65
	5.1, 27.3	Pad Top	324	-24
	8.3, 27.3	Pad Top	312	-48
	11.5, 27.3	Pad Top	362	52
	14.7, 27.3	Pad Top	326	-20
	0.3, 30.0	Pad Top	509	-230
	3.5, 30.0	Pad Top	365	58
	6.7, 30.0	Pad Top	341	10
	9.9, 30.0	Pad Top	351	30
	13.1, 30.0	Pad Top	336	0
C1 SU72				
	1.0, 30.7	Pad Top	332	-8
	4.2, 30.7	Pad Top	362	52
	7.4, 30.7	Pad Top	329	-14
	10.6, 30.7	Pad Top	309	-54
	13.8, 30.7	Pad Top	293	-85
	2.6, 33.4	Pad Top	351	30
	5.8, 33.4	Pad Top	294	-83
	9.0, 33.4	Pad Top	327	-18
	12.2, 33.4	Pad Top	332	-8
	1.0, 36.2	Pad Top	344	16
	4.2, 36.2	Pad Top	287	-97
	7.4, 36.2	Pad Top	357	42

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU72 (cont.)	10.6, 36.2	Pad Top	361	50
	13.8, 36.2	Pad Top	385	97
C1 SU73				
	1.5, 36.7	Pad Top	323	-26
	4.9, 36.7	Pad Top	378	83
	8.2, 36.7	Pad Top	316	-40
	11.6, 36.7	Pad Top	336	0
	15.0, 36.7	Pad Top	391	110
	3.2, 39.6	Pad Top	356	40
	6.6, 39.6	Pad Top	349	26
	9.9, 39.6	Pad Top	343	14
	13.3, 39.6	Pad Top	377	81
	1.5, 42.5	Pad Top/Dirt	384	95
	4.9, 42.5	Pad Top	363	54
	8.2, 42.5	Pad Top	334	-4
	11.6, 42.5	Pad Top	336	0
	15.0, 42.5	Pad Top	348	24
C1 SU74				
	1.2, 42.7	Pad Top/Dirt	334	-4
	4.6, 42.7	Pad Top	355	38
	7.9, 42.7	Pad Top	375	77
	11.3, 42.7	Pad Top	399	120
	14.6, 42.7	Pad Top	324	-24
	2.9, 45.6	Pad Top	378	83
	6.2, 45.6	Pad Top	309	-54
	9.6, 45.6	Pad Top	337	2
	13.0, 45.6	Pad Top	290	-91
	1.2, 48.5	Pad Top	330	-12
	4.6, 48.5	Pad Top	368	63
	7.9, 48.5	Pad Top	337	2
	11.3, 48.5	Pad Top	339	6
	14.6, 48.5	Pad Top	326	-20
C1 SU75				
	1.7, 49.0	Pad Top	381	89
	5.1, 49.0	Pad Top	397	120
	8.4, 49.0	Pad Top	334	-4
	11.8, 49.0	Pad Top	384	95
	15.2, 49.0	Pad Top	385	97
	0.0, 51.9	Pad Top	378	83
	3.4, 51.9	Pad Top	345	18
	6.7, 51.9	Pad Top	335	-2

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU75 (cont.)	10.1, 51.9	Pad Top	331	-10
	13.5, 51.9	Pad Top	403	130
	1.7, 54.8	Pad Top	326	-20
	5.1, 54.8	Pad Top	409	140
	8.4, 54.8	Pad Top	370	67
	11.8, 54.8	Pad Top	364	56
	15.2, 54.8	Pad Top	302	-67
C1 SU76				
	0.5, 55.0	Pad Top	334	-4
	3.9, 55.0	Pad Top	394	120
	7.3, 55.0	Pad Top	403	130
	10.6, 55.0	Pad Top	359	46
	14.0, 55.0	Pad Top	394	120
	2.2, 57.9	Pad Top	363	54
	5.6, 57.9	Pad Top	347	22
	8.9, 57.9	Pad Top	344	16
	12.3, 57.9	Pad Top	285	-100
	0.5, 60.8	Pad Top	379	85
	3.9, 60.8	Pad Top	408	140
	7.3, 60.8	Pad Top	351	30
	10.6, 60.8	Pad Top	362	52
	14.0, 60.8	Pad Top	321	-30
C1 SU77				
	1.5, 61.5	Pad Top	329	-14
	4.7, 61.5	Pad Top	385	97
	7.9, 61.5	Pad Top	321	-30
	11.1, 61.5	Pad Top	340	8
	14.3, 61.5	Pad Top	329	-14
	3.1, 64.3	Pad Top	296	-79
	6.3, 64.3	Pad Top	342	12
	9.5, 64.3	Pad Top	299	-73
	12.7, 64.3	Pad Top	356	40
	1.5, 67.1	Pad Top	333	-6
	4.7, 67.1	Pad Top	392	110
	7.9, 67.1	Pad Top	427	180
	11.1, 67.1	Pad Top	356	40
	14.3, 67.1	Pad Top	380	87
C1 SU126				
	20.8, 8.8	Loading Dock	353	34
	16.5, 16.1	Loading Dock	288	-95
	25.0, 16.1	Loading Dock	308	-56

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C1 SU126 (cont.)	20.8, 23.5	Loading Dock	302	-67
	16.5, 30.8	Loading Dock	326	-20
	25.0, 30.8	Loading Dock	309	-54
	20.8, 38.2	Loading Dock	310	-52
	16.5, 45.5	Loading Dock	327	-18
	25.0, 45.5	Loading Dock	312	-48
	20.8, 52.9	Loading Dock	309	-54
	16.5, 60.3	Loading Dock	319	-34
	25.0, 60.3	Loading Dock	312	-48
Building G-723				
C3 SU79				
	4.3, 1.0	Pad	361	50
	9.8, 9.0	Pad	325	-22
	9.0, 12.0	Pad	273	-120
	7.0, 13.0	Pad	329	-14
	3.7, 14.3	Pad	344	16
	10.1, 17.7	Pad	339	6
	5.2, 19.6	Pad	362	52
	11.8, 35.6	Pad	321	-30
	1.1, 37.0	Pad	334	-4
	11.4, 37.5	Pad	345	18
	6.6, 40.6	Pad	340	8
	0.9, 46.1	Pad	354	36
	0.5, 49.3	Pad	348	24
	8.0, 57.3	Pad	300	-71
	6.2, 59.1	Pad	320	-32
	13.1, 65.9	Pad	339	6
C2 SU78				
	17.8, 2.2	Loading Dock	344	16
	15.5, 6.1	Loading Dock	370	67
	20.0, 6.1	Loading Dock	284	-100
	17.8, 10.0	Loading Dock	347	22
	15.5, 13.9	Loading Dock	336	0
	20.0, 13.9	Loading Dock	302	-67
	17.8, 17.8	Loading Dock	335	-2
	15.5, 21.8	Loading Dock	432	190
	20.0, 21.8	Loading Dock	297	-77
	17.8, 25.7	Loading Dock	374	75
	15.5, 29.6	Loading Dock	418	160
	20.0, 29.6	Loading Dock	293	-85
	17.8, 33.5	Loading Dock	393	110

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C2 SU78 (cont.)	15.5, 37.4	Loading Dock	354	36
	20.0, 37.4	Loading Dock	336	0
	17.8, 41.4	Loading Dock	371	69
C1 SU 126				
	16.9, 47.2	Loading Dock	398	120
	20.1, 47.2	Loading Dock	284	-100
	15.3, 49.9	Loading Dock	324	-24
	18.5, 49.9	Loading Dock	500	330
	16.9, 52.7	Loading Dock	367	62
	20.1, 52.7	Loading Dock	313	-46
	15.3, 55.5	Loading Dock	331	-10
	18.5, 55.5	Loading Dock	378	83
	16.9, 58.3	Loading Dock	360	48
	20.1, 58.3	Loading Dock	319	-34
	15.3, 61.1	Loading Dock	331	-10
	18.5, 61.1	Loading Dock	413	150
	16.9, 64.5	Loading Dock	387	100
	20.1, 64.5	Loading Dock	305	-62
	15.8, 58.2 J	Loading Dock	315	-42
Building 305				
C3 SU127				
	Basement Rm 1: 2.3,0/0.6	S. Wall	233	-110
	Basement Rm 1: 3.1, 2.8/2.5	Ceiling	300	26
	Basement Rm 2: 4.6, 2.6/0.5	W. Wall	284	-6
	1st Floor Stairwell: 9.2, 1.8/2.5	W. Wall	241	-91
	1st Floor Rm 3: 14.2, 0.3/2.5	Ceiling	247	-79
	1st Floor Rm 2: 4.9, 5.3/1.8	S. Wall	260	-54
	1st Floor Rm 1: 0.1, 2.7	Floor	238	-97
	1st Floor Restroom: 19.6, 0/1.2	S. Wall	151	-270
	1st Floor Restroom: 16.3, 0/1.0	S. Wall	163	-250

Table B-6: FSS Structural Survey Units and Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building/ Survey Unit ID	**Location (X, Y)[a]**	**Description**	**Counts/ minute**	**dpm/100 cm^2**
C3 SU127 (cont.)	1st Floor Room 6: 8.8, 14.0/2.4	E. Wall	186	-200
	1st Floor Rm 7: 13.8, 13.5	Floor	234	-110
	2nd Floor Rm 3: 3.0, 13/2.5	Ceiling	242	-89
	2nd Floor Rm 3: 0.5, 11.1/2.5	Ceiling	247	-79
	2nd Floor Rm 5: 11.2, 10.7/0.9	W. Wall	213	-150
	2nd Floor Rm 5: 7.2, 11.1/1.8	N. Wall	269	-36

[a]Location referenced to the southwest corner of floors/pads or the lower left corner of a wall.

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
A-921 (2)				
1	F	140	--	--
2	F	100	--	--
3	F	-8	--	--
4	F	150	--	--
5	F	160	--	--
6	F	95	--	--
7	F	130	--	--
8	F	160	--	--
9	F	230	--	--
10	F	150	--	--
11	LW	12	--	--
12	LW	-160	--	--
13	LW	-95	--	--
14	LW	-110	--	--
15	LW	-29	--	--
16	LW	-180	--	--
17	LW	-87	--	--
A-922 (3)				
1	F	230	1	-1
2	F	75	1	2
3	F	23	0	4
4	F	89	0	3
5	F	170	0	-4
6	F	75	0	3
7	F	45	0	1
8	F	29	0	-2
9	F	70	1	-4
10	F	-6	1	7
11	LW	-220	0	5
12	LW	-380	0	4
13	F	95	0	2
14	F	100	0	2
15	F	-12	0	8
C-1131 (3)				
1	Pad	-75	--	--
2	Pad	35	--	--
3	Pad	41	--	--
4	Pad	33	--	--

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
C-1131 (3) (cont.) 5	Pad	43	--	--
6	Pad	6	--	--
7	Pad	79	--	--
8	Pad	-35	--	--
9	Pad	33	--	--
10	Pad	85	--	--
11	Pad	-60	--	--
12	Pad	-39	--	--
13	Pad	62	--	--
14	Pad	170	--	--
15	Pad	-41	--	--
C-1132 (3)				
1	Pad	-95	--	--
2	Pad	58	--	--
3	Pad	-14	--	--
4	Pad	60	--	--
5	Pad	60	--	--
6	Pad	-81	--	--
7	Pad	-27	--	--
8	Pad	-31	--	--
9	Pad	-35	--	--
10	Pad	-50	--	--
11	Pad	-52	--	--
12	Pad	50	--	--
13	Pad	10	--	--
14	Pad	-41	--	--
15	Pad	23	--	--
C-1133 (3)				
1	Pad	21	--	--
2	Pad	75	--	--
3	Pad	150	--	--
4	Pad	46	--	--
5	Pad	-46	--	--
6	Pad	0	--	--
7	Pad	56	--	--
9	Pad	-110	--	--
10	Pad	39	--	--
11	Pad	-75	--	--
12	Pad	-83	--	--
13	Pad	-79	--	--

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
C-1133 (cont.) 14	Pad	-39	--	--
15	Pad	-50	--	--
16	Pad	-54	--	--
17	Pad	-100	--	--
C-1134 (3)				
1	Pad	56	--	--
2	Pad	-10	--	--
3	Pad	-4	--	--
4	Pad	-12	--	--
5	Pad	-56	--	--
6	Pad	66	--	--
7	Pad	-56	--	--
8	Pad	-74	--	--
9	Pad	99	--	--
10	Pad	-35	--	--
11	Pad	37	--	--
12	Pad	72	--	--
13	Pad	17	--	--
14	Pad	60	--	--
15	Pad	2	--	--
16	Pad	-21	--	--
D-1122 (3)				
1	Pad	17	--	--
2	Pad	52	--	--
3	Pad	31	--	--
4	Pad	2	--	--
5	Pad	6	--	--
6	Pad	41	--	--
7	Pad	2	--	--
8	Pad	-2	--	--
9	Pad	21	--	--
10	Pad	-10	--	--
11	Pad	-31	--	--
12	Pad	60	--	--
13	Pad	21	--	--
14	Pad	6	--	--
15	Pad	-10	--	--
D-1124 (3)				
1	Pad	-6	--	--
2	Pad	66	--	--

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
D-1124 (3) (cont.) 3	Pad	23	--	--
4	Pad	95	--	--
5	Pad	29	--	--
6	Pad	25	--	--
7	Pad	140	--	--
8	Pad	95	--	--
9	Pad	100	--	--
10	Pad	-50	--	--
11	Pad	-35	--	--
12	Pad	81	--	--
13	Pad	31	--	--
14	Pad	72	--	--
15	Pad	62	--	--
D-1125 (3)				
1	Pad	45	--	--
2	Pad	-50	--	--
3	Pad	-89	--	--
4	Pad	-160	--	--
5	Pad	-200	--	--
6	Pad	-240	--	--
7	Pad	370	--	--
8	Pad	-48	--	--
9	Pad	56	--	--
10	Pad	-77	--	--
11	Pad	-45	--	--
12	Pad	33	--	--
13	Pad	-27	--	--
14	Pad	19	--	--
15	Pad	95	--	--
16/scoping location 7	Pad	-23	--	--
17	Pad	1200	--	--
E-1111 (3)				
1/32A	F	120	1	2
2/33A	F	140	0	2
3/34A	F	91	1	1
4/35A	F	-6	0	1
5/36A	F	35	0	-2
6/37A	F	43	1	-1

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
7/38A	F	-17	3	20
E-1111 (3) (cont.) 8/39A	F	-14	1	-1
9/40A	F	19	0	2
10/41A	F	130	0	1
11/42A	F	120	0	1
12/43A	F	120	1	2
13/44A	F	140	0	5
14/45A	F	150	0	-1
15/46A	F	200	0	3
16/47A	LW	72	0	1
17/48A	LW	-12	3	1
18/49A	LW	-130	0	1
E-1112 (3)				
1	Pad	29	--	--
2	Pad	-48	--	--
3	Pad	-2	--	--
4	Pad	-15	--	--
5	Pad	19	--	--
6	Pad	4	--	--
7	Pad	50	--	--
8	Pad	-21	--	--
9	Pad	85	--	--
10	Pad	72	--	--
11	Pad	14	--	--
12	Pad	29	--	--
13	Pad	74	--	--
14	Pad	0	--	--
15	Pad	33	--	--
16	Pad	250	--	--
E-1116 (3)				
1	Pad	48	--	--
2	Pad	25	--	--
3	Pad	-2	--	--
4	Pad	14	--	--
5	Pad	85	--	--
6	Pad	-35	--	--
7	Pad	130	--	--
8	Pad	56	--	--
9	Pad	99	--	--

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
10	Pad	200	--	--
E-1116 (3) (cont.) 11	Pad	200	--	--
12	Pad	27	--	--
13	Pad	-14	--	--
14	Pad	21	--	--
15	Pad	140	--	--
F-733 (3)				
1	Pad	290	--	--
2	Pad	120	--	--
3	Pad	150	--	--
4	Pad	-25	--	--
5	Pad	170	--	--
6	Pad	130	--	--
7	Pad	120	--	--
8	Pad	160	--	--
9	Pad	4	--	--
10	Pad	85	--	--
11	Pad	-33	--	--
13	Pad	-37	--	--
14	Pad	35	--	--
15	Pad	130	--	--
G-721 (2)				
1	Pad	-8	--	--
2	Pad	-2	--	--
3	Pad	110	--	--
4	Pad	72	--	--
5	Pad	52	--	--
6	Pad	150	--	--
7	Pad	72	--	--
8	Pad	170	--	--
9	Pad	140	--	--
10	Pad	160	--	--
11	Pad	120	--	--
12	Pad	130	--	--
13	Pad	99	--	--
14	Pad	17	--	--
15	Pad	95	--	--
16	Pad	89	--	--
17	Pad	66	--	--

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	Surface[c]	Total Activity[d] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
18	Pad	140	--	--
G-721 (2) (cont.) 19	Pad	190	--	--
20	Pad	220	--	--
G-725 (3)				
1	Pad	-33	--	--
2	Pad	-29	--	--
3	Pad	33	--	--
4	Pad	6	--	--
5	Pad	14	--	--
6	Pad	-19	--	--
7	Pad	8	--	--
8	Pad	-19	--	--
9	Pad	25	--	--
10	Pad	-6	--	--
11	Pad	21	--	--
12	Pad	-14	--	--
13	Pad	0	--	--
14	Pad	81	--	--
15	Pad	-29	--	--
Bldg. 821 (3)				
1/75A	F	150	5	4
2/76A	F	95	0	5
3/77A	F	110	1	6
4/78A	F	-46	1	3
5/79A	F	68	0	1
6/80A	F	-31	0	11
7/81A	F	95	0	5
8/82A	F	110	0	1
9/83A	F	10	1	-1
10/84A	F	-8	0	3
11/85A	F	-58	1	1
12/86A	F	-31	0	3
13/87A	F	52	0	3
14/88A	F	8	1	7
15/89A	F	95	0	-2
Bldg. 825 (3)				
1/91A	F	140	0	7
2/92A	F	200	0	5
3/93A	F	200	0	5

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	**Surface[c]**	**Total Activity[d] (dpm/100 cm^2)**	**Removable Activity (dpm/100 cm^2)**	
		Beta	**Alpha**	**Beta**
4/94A	F	79	1	2
Bldg. 825 (3) (cont.) 5/95A	F	25	1	14
6/96A	F	39	1	-4
7/97A	F	29	1	-1
8/98A	F	110	1	8
9/99A	F	83	1	1
10/100A	F	-39	0	3
11/8B	F	52	1	4
12/9B	F	29	0	-3
13/10B	F	62	0	-2
14/11B	F	100	5	-1
Bldg. 1021 (3)				
1	F	-33	--	--
2	F	64	--	--
3	F	-140	--	--
4	F	-15	--	--
5	F	-140	--	--
6	F	-120	--	--
7	F	-2	--	--
9	F	2	--	--
12	F	39	--	--
15	F	270	--	--
16	LW	-56	--	--
Bldg. 1022 (2)				
1/1A	F	87	1	-1
2/2A	F	41	0	-2
3/3A	F	2	0	4
4/4A	F	110	0	3
5/5A	F	15	1	-5
6/6A	F	41	0	-4
7/7A	F	-39	3	-1
8/8A	F	50	1	3
9/9A	F	35	1	-3
10/10A	F	37	3	2
11/11A	F	77	0	-3
12/12A	F	-19	0	-2
13/13A	F	19	0	-1
14/14A	F	33	0	-2
15/15A	F	31	0	3

Table B-7: Phase 1 Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a, b]	**Surface[c]**	**Total Activity[d] (dpm/100 cm^2)**	**Removable Activity (dpm/100 cm^2)**	
		Beta	**Alpha**	**Beta**
16/16A	F	68	1	8
Bldg. 1022 (2) (cont.) 17/17A	F	31	1	-3
18/18A	F	46	1	-3
19/19A	F	27	1	-1
20/20A	F	29	0	1
21/21A	F	120	1	-1
22/22A	F	140	0	5
23/23A	F	160	0	1
24/24A	F	46	1	4
25/25A	F	130	0	-1
26/26A	F	140	0	6
27/27A	F	180	0	10
28/28A	F	62	0	-2
29/29A	LW	120	3	2
30/30A	LW	20	5	4
31/31A	LW	-32	1	-4
32/1B	US	-85	0	5
33/2B	US	-210	0	-1
34/3B	US	-58	1	5
35/4B	US	-87	0	3
36/5B	US	190	0	-2
37/6B	US	-100	0	-3
38/7B	F	660	3	-1

[a]Refer to Figures A-18 through A-27.
[b]Where two numbers are indicated, the first value is the measurement location identifier and the second number is the smear sample designation.
[c]F=floor, LW=lower wall, US=upper surface.
[d]Data represent net surface activity levels that have been corrected for background contributions.
[e]-- = Measurement or sampling not performed.

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
D-1121 (3)				
1A	Pad	-17	0	2
2A	Pad	-72	0	2
3A	Pad	-74	0	-3
4A	Pad	32	1	2
5A	Pad	-34	0	2
6A	Pad	-11	0	3
7A	Pad	74	1	8
8A	Pad	8	0	4
9A	Pad	120	0	-1
10A	Pad	28	1	-3
11A	Wall Debris	-66	3	-2
12A	Wall Debris	6	1	-2
13A	Wall Debris	19	0	15
14A	Wall Debris	170	0	2
15A	Wall Debris	8	0	9
D-1123 (3)				
1	Pad	0	1	1
2	Pad	130	0	-1
3	Pad	210	0	1
4	Pad	150	1	7
5	Pad	68	0	-3
6	Pad	200	1	-2
7	Pad	140	0	4
8	Pad	85	0	-2
9	Pad	70	3	-2
10	Pad	25	0	1
11	Wall Debris	130	0	3
12	Wall Debris	150	7	1
13	Wall Debris	98	5	10
14	Wall Debris	-180	1	7
15	Wall Debris	-800	1	9
E-1113 (3)				
16	Pad	83	1	3
17	Pad	-30	0	8
18	Pad	30	1	-4
19	Pad	-11	1	-3
20	Pad	-43	0	3
21	Pad	-70	1	2

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
E-1113 (3) (cont.) 22	Pad	-130	0	11
23	Pad	-34	0	1
24	Pad	-38	3	6
25	Pad	2	0	-2
26	Wall Debris	85	1	7
27	Wall Debris	45	3	-3
28	Wall Debris	190	0	6
29	Wall Debris	-49	1	4
30	Wall Debris	45	0	8
E-1114 (3)				
16A	Pad	38	0	8
17A	Pad	0	0	1
18A	Pad	87	1	-2
19A	Pad	79	0	-3
20A	Pad	-4	0	6
21A	Pad	110	1	-1
22A	Pad	34	1	16
23A	Pad	89	1	2
24A	Pad	49	1	3
25A	Pad	38	0	1
26A	Wall Debris	53	0	7
27A	Wall Debris	-250	0	4
28A	Wall Debris	34	1	1
29A	Wall Debris	-51	1	3
30A	Wall Debris	-140	0	2
E-1115 (3)				
31A	Pad	-43	0	2
32A	Pad	-26	0	2
33A	Pad	25	0	-1
34A	Pad	38	1	4
35A	Pad	-38	1	6
36A	Pad	-28	1	-3
37A	Pad	43	9	7
38A	Pad	11	0	1
39A	Pad	34	3	5
40A	Pad	28	0	-3
41A	Wall Debris	-120	3	-1
42A	Wall Debris	74	0	-2
43A	Wall Debris	-130	0	7

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
E-1115 (3) (cont.) 44A	Wall Debris	17	7	20
45A	Wall Debris	-170	0	6
F-732 (3)				
61C	Pad	-64	0	2
62C	Pad	-23	0	1
63C	Pad	9	0	10
64C	Pad	4	0	4
65C	Pad	36	0	-2
66C	Pad	34	0	1
67C	Pad	76	1	-3
68C	Pad	47	0	1
69C	Pad	13	1	1
70C	Pad	47	1	-2
71C	Wall Debris	-240	0	4
72C	Wall Debris	-15	0	1
73C	Wall Debris	72	1	16
74C	Wall Debris	170	0	9
75C	Wall Debris	140	0	6
F-734 (2)				
31B	Pad	26	0	2
32B	Pad	38	0	-1
33B	Pad	9	0	-3
34B	Pad	17	0	-3
35B	Pad	25	1	2
36B	Pad	13	1	2
37B	Pad	0	3	1
38B	Pad	8	0	5
39B	Pad	110	0	7
40B	Pad	68	0	2
41B	Pad	62	0	2
42B	Pad	40	0	2
43B	Pad	34	0	9
44B	Pad	-13	1	17
45B	Pad	91	0	7
46B	Pad	25	1	2
47B	Pad	81	3	8
48B	Pad	28	0	-2
49B	Pad	43	3	10
50B	Pad	91	0	4

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
F-734 (2) (cont.) 51B	Wall Debris	-140	0	14
52B	Wall Debris	140	0	1
53B	Wall Debris	-57	1	4
54B	Wall Debris	-23	3	15
55B	Wall Debris	11	0	8
F-735 (2)				
76C	Pad	-85	1	7
77C	Pad	-91	0	8
78C	Pad	-100	0	15
79C	Pad	-120	1	3
80C	Pad	-53	5	2
81C	Pad	-79	0	5
82C	Pad	-100	0	-1
83C	Pad	-110	1	-1
84C	Pad	-93	1	-1
85C	Pad	-94	0	3
86C	Wall Debris	43	0	-1
87C	Wall Debris	-77	0	-1
88C	Wall Debris	25	1	5
89C	Wall Debris	0	0	-1
90C	Wall Debris	-53	0	-4
F-736 (2)				
31	Pad	-4	0	-2
32	Pad	45	0	-3
33	Pad	55	1	3
34	Pad	49	0	1
35	Pad	-23	0	1
36	Pad	47	1	-2
37	Pad	42	5	7
38	Pad	74	0	4
39	Pad	70	1	5
40	Pad	-21	5	-1
41	Pad	85	3	3
42	Pad	62	0	2
43	Pad	34	0	4
44	Pad	25	1	8
45	Pad	40	0	6
46	Pad	47	1	-3
47	Pad	62	3	12

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
F-736 (2) (cont.) 48	Pad	-62	0	-3
49	Pad	-40	1	5
50	Pad	25	1	4
51	Wall Debris	57	0	12
52	Wall Debris	120	0	2
53	Wall Debris	34	1	7
54	Wall Debris	-150	3	18
55	Wall Debris	130	0	3
G-722 (3)				
86B	Pad	-13	1	5
87B	Pad	21	0	5
88B	Pad	-8	1	2
89B	Pad	36	0	8
90B	Pad	-40	0	1
91B	Pad	23	0	-1
92B	Pad	-49	1	8
93B	Pad	11	3	-1
94B	Pad	-51	0	10
95B	Pad	-15	0	14
96B	Wall Debris	42	0	3
97B	Wall Debris	89	0	2
98B	Wall Debris	96	0	-3
99B	Wall Debris	510	3	-2
100B	Wall Debris	190	1	4
G-724 (3)				
71B	Pad	120	1	7
72B	Pad	81	0	3
73B	Pad	180	0	17
74B	Pad	110	3	4
75B	Pad	170	0	1
76B	Pad	19	0	12
77B	Pad	59	0	2
78B	Pad	130	0	8
79B	Pad	130	0	7
80B	Pad	60	0	1
81B	Wall Debris	-190	0	-1
82B	Wall Debris	81	0	-1
83B	Wall Debris	140	0	3
84B	Wall Debris	-38	0	2
85B	Wall Debris	230	0	-1

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
G-726 (3)				
56B	Pad	140	1	1
57B	Pad	8	0	7
58B	Pad	53	0	5
59B	Pad	-2	0	8
60B	Pad	70	0	6
61B	Pad	-100	0	1
62B	Pad	21	1	3
63B	Pad	-89	0	25
64B	Pad	-72	1	1
65B	Pad	43	0	4
66B	Wall Debris	-150	0	-4
67B	Wall Debris	15	0	3
68B	Wall Debris	-43	0	-3
69B	Wall Debris	100	0	-2
70B	Wall Debris	110	0	-1
H-711 (2)				
61A	Floor	-32	3	3
62A	Floor	-76	1	3
63A	Floor	-23	1	15
64A	Floor	-79	5	5
65A	Floor	-89	3	-4
66A	Floor	-47	1	3
67A	Floor	-93	0	-1
68A	Floor	-51	0	4
69A	Floor	-36	1	7
70A	Floor	-91	1	3
71A	Wall Debris	-250	0	3
72A	Wall Debris	-250	1	1
73A	Wall Debris	11	0	7
74A	Wall Debris	36	1	3
75A	Wall Debris	-260	3	-1
H-712 (2)				
76A	Floor Debris	53	0	12
77A	Floor Debris	25	1	1
78A	Floor Debris	45	0	18
79A	Floor Debris	-30	0	-3
80A	Floor Debris	42	0	3
81A	Floor Debris	4	1	2
82A	Floor Debris	-13	0	4

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
H-712 (2) (cont.) 83A	Floor Debris	-38	0	-2
84A	Floor Debris	15	3	5
85A	Floor Debris	62	0	3
86A	Wall Debris	-350	0	5
87A	Wall Debris	66	1	6
88A	Wall Debris	-93	0	2
89A	Wall Debris	-230	3	2
90A	Wall Debris	68	0	4
H-713 (2)				
91A	Floor Debris	13	1	2
92A	Floor Debris	30	0	-2
93A	Floor Debris	2	0	1
94A	Floor Debris	-40	1	3
95A	Floor Debris	8	0	14
96A	Floor Debris	-25	1	-1
97A	Floor Debris	-23	0	2
98A	Floor Debris	-42	3	5
99A	Floor Debris	-60	0	-2
100A	Floor Debris	-13	0	7
1B	Wall Debris	9	1	3
2B	Wall Debris	93	1	-1
3B	Wall Debris	110	0	2
4B	Wall Debris	-150	0	7
5B	Wall Debris	-220	1	2
H-714 (2)				
6B	Wall Debris	-120	0	2
7B	Wall Debris	-87	0	1
8B	Wall Debris	93	0	-2
9B	Wall Debris	72	0	1
10B	Wall Debris	-140	1	-1
11B	Floor Debris	-21	5	3
12B	Floor Debris	53	3	-3
13B	Floor Debris	38	0	10
14B	Floor Debris	-13	0	-2
15B	Floor Debris	-79	1	1
16B	Floor Debris	-15	0	-1
17B	Floor Debris	36	1	-3
18B	Floor Debris	13	0	-4
19B	Floor Debris	-19	0	-1

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
H-714 (2) (cont.) 20B	Floor Debris	-6	0	5
H-715 (2)				
21B	Floor Debris	-120	0	3
22B	Wall Debris	-9	0	5
23B	Wall Debris	-45	0	-3
24B	Wall Debris	-210	1	12
25B	Wall Debris	-120	0	-2
26B	Wall Debris	-220	0	3
27B	Wall Debris	57	1	5
28B	Wall Debris	-440	1	2
29B	Wall Debris	-140	3	9
30B	Wall Debris	4	3	11
I-531 (3)				
46C	Floor Debris	-23	0	1
47C	Floor Debris	-42	1	17
48C	Floor Debris	-13	0	-1
49C	Floor Debris	15	0	11
50C	Floor Debris	-21	0	11
51C	Floor Debris	-77	1	8
52C	Floor Debris	-11	1	2
53C	Floor Debris	-34	0	1
54C	Floor Debris	-55	3	14
55C	Floor Debris	4	0	-3
56C	Wall Debris	91	1	-1
57C	Wall Debris	17	1	9
58C	Wall Debris	-59	1	4
59C	Wall Debris	-81	1	8
60C	Wall Debris	-30	0	4
I-631 (3)				
1C	Wall Debris	220	0	3
2C	Wall Debris	-220	0	-3
3C	Wall Debris	23	1	1
4C	Wall Debris	210	1	-1
5C	Wall Debris	-4	1	-2
6C	Floor Debris	8	1	-5
7C	Floor Debris	-26	3	-1
8C	Floor Debris	-38	3	-1
9C	Floor Debris	-140	0	1
10C	Floor Debris	-130	0	5

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
I-631 (3) (cont.) 11C	Floor Debris	-6	7	2
12C	Floor Debris	-77	1	1
13C	Floor Debris	-38	3	10
14C	Floor Debris	-47	1	-1
15C	Floor Debris	-8	0	6
I-632 (3)				
86	Floor Debris	-6	0	1
87	Floor Debris	-110	0	2
88	Floor Debris	-51	1	4
89	Floor Debris	-4	0	-1
90	Floor Debris	-38	1	4
91	Floor Debris	160	1	-1
92	Floor Debris	-170	0	5
93	Floor Debris	-49	0	3
94	Floor Debris	-260	0	2
95	Floor Debris	60	1	7
96	Wall Debris	-270	0	-4
97	Wall Debris	93	0	5
98	Wall Debris	81	0	3
99	Wall Debris	60	0	1
100	Wall Debris	-32	0	6
I-633 (3)				
71	Wall Debris	-74	1	-1
72	Wall Debris	-130	1	1
73	Wall Debris	130	0	15
74	Wall Debris	-51	0	6
75	Wall Debris	120	3	1
76	Floor Debris	-26	0	16
77	Floor Debris	-47	0	7
78	Floor Debris	-40	1	22
79	Floor Debris	-13	0	1
80	Floor Debris	-96	0	3
81	Floor Debris	-38	0	-2
82	Floor Debris	32	0	-2
83	Floor Debris	-45	0	2
84	Floor Debris	-34	0	-2
85	Floor Debris	11	0	1
I-634 (3)				
56	Floor Debris	-62	0	1

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	Surface	Total Activity[b] (dpm/100 cm^2)	Removable Activity (dpm/100 cm^2)	
		Beta	Alpha	Beta
I-634 (3) (cont.) 57	Floor Debris	-120	0	5
58	Floor Debris	-15	3	2
59	Floor Debris	2	0	7
60	Floor Debris	-68	0	2
61	Floor Debris	-13	1	-2
62	Floor Debris	-200	1	4
63	Floor Debris	-36	3	20
64	Floor Debris	-36	0	6
65	Floor Debris	-94	0	5
66	Wall Debris	4	0	-1
67	Wall Debris	-2	3	6
68	Wall Debris	-64	3	-2
69	Wall Debris	-120	0	-1
70	Wall Debris	-11	3	4
I-636 (3)				
31C	Wall Debris	-53	0	4
32C	Wall Debris	-43	1	-1
33C	Wall Debris	-28	0	3
34C	Wall Debris	-62	1	-3
35C	Wall Debris	-87	0	2
36C	Floor Debris	-53	1	-2
37C	Floor Debris	2	1	8
38C	Floor Debris	-2	0	1
39C	Floor Debris	-40	0	5
40C	Floor Debris	9	1	-1
41C	Floor Debris	-23	0	-1
42C	Floor Debris	-32	0	1
43C	Floor Debris	-81	3	4
44C	Floor Debris	89	3	19
45C	Floor Debris	-4	5	5
I-641 (3)				
16C	Wall Debris	11	1	4
17C	Wall Debris	-77	0	-5
18C	Wall Debris	17	1	1
19C	Wall Debris	-34	0	2
20C	Wall Debris	9	0	-3
21C	Floor Debris	-23	1	3
22C	Floor Debris	-51	0	3
23C	Floor Debris	-62	1	5
24C	Floor Debris	-96	1	6

Table B-8: Phase II Scoping Survey/FSS Surface Activity Levels Curtis Bay Depot Curtis Bay, Maryland				
Building (Class) Measurement Location[a]	**Surface**	**Total Activity[b] (dpm/100 cm^2)**	**Removable Activity (dpm/100 cm^2)**	
		Beta	**Alpha**	**Beta**
I-641 (3) (cont.) 25C	Floor Debris	-15	0	-1
26C	Floor Debris	-62	0	8
27C	Floor Debris	-57	1	2
28C	Floor Debris	-85	3	-1
29C	Floor Debris	-76	0	11
30C	Floor Debris	-160	0	1
I-634 Igloo (3)				
46A	Floor	-66	3	-3
47A	Floor	-100	1	10
48A	Floor	-120	0	-3
49A	Floor	-120	0	6
50A	Floor	-110	0	1
51A	Floor	-110	0	10
52A	Floor	-150	1	6
53A	Floor	-72	1	5
54A	Floor	-180	1	16
55A	Floor	-110	1	4
56A	Wall	-160	5	5
57A	Wall	-120	0	12
58A	Wall	-320	1	1
59A	Wall	-270	0	4
60A	Wall	-290	3	6

[a]Refer to Figures A-18 through A-27.
[b]Data represent net surface activity levels that have been corrected for background contributions.

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
C2 SU1					
420	363066E, 4340201N	1.13 ± 0.19	1.72 ± 0.68	1.17	0.51
421	363093E, 4340201N	1.01 ± 0.19	1.33 ± 0.66	0.95	0.30
422	363026E, 4340224N	1.19 ± 0.16	2.02 ± 0.54	1.33	0.67
423	363053E, 4340224N	2.00 ± 0.22	1.59 ± 0.57	1.41	0.76
424	363079E, 4340224N	1.32 ± 0.28	1.32 ± 0.84	1.06	0.40
425	363106E, 4340224N	1.05 ± 0.19	1.28 ± 0.59	0.94	0.29
426	363013E, 4340247N	0.60 ± 0.20	1.20 ± 0.66	0.75	0.10
427	363040E, 4340247N	0.63 ± 0.11	1.13 ± 0.39	0.73	0.07
428	363066E, 4340247N	1.02 ± 0.19	1.55 ± 0.8	1.06	0.40
429	363093E, 4340247N	0.93 ± 0.18	1.15 ± 0.72	0.84	0.19
430	363119E, 4340247N	0.73 ± 0.18	1.06 ± 0.62	0.73	0.08
431	363079E, 4340270N	0.93 ± 0.14	1.55 ± 0.53	1.03	0.37
432	363106E, 4340270N	1.06 ± 0.17	1.44 ± 0.68	1.02	0.36
433	363133E, 4340270N	0.44 ± 0.13	1.29 ± 0.65	0.74	0.08
434	363146E, 4340293N	0.71 ± 0.12	0.69 ± 0.40	0.56	-0.10
C2 SU2					
435	362917E, 4340123N	1.09 ± 0.24	1.15 ± 0.64	0.90	0.24
436	362948E, 4340123N	1.11 ± 0.21	0.53 ± 0.68	0.62	-0.03
437	362933E, 4340150N	1.00 ± 0.15	0.95 ± 0.58	0.78	0.12
438	362963E, 4340150N	1.14 ± 0.18	1.93 ± 0.61	1.27	0.61
439	362826E, 4340176N	0.71 ± 0.13	0.60 ± 0.53	0.52	-0.14
440	362856E, 4340176N	1.23 ± 0.20	1.45 ± 0.64	1.08	0.43
441	362887E, 4340176N	1.06 ± 0.21	1.67 ± 0.75	1.12	0.47
442	362917E, 4340176N	0.89 ± 0.21	1.37 ± 0.70	0.93	0.27
443	362948E, 4340176N	1.33 ± 0.20	1.19 ± 0.63	1.00	0.34
444	362979E, 4340176N	1.09 ± 0.19	1.21 ± 0.67	0.93	0.27
445	362902E, 4340203N	1.30 ± 0.24	1.83 ± 0.76	1.28	0.62
446	362933E, 4340203N	0.57 ± 0.13	0.68 ± 0.51	0.51	-0.15
447	Sample not collected				
448	362994E, 4340203N	0.56 ± 0.11	1.08 ± 0.32	0.68	0.03
449	Sample not collected				
C2 SU3					
450	363028E, 4340082N	0.92 ± 0.16	1.04 ± 0.56	0.79	0.13
451	363061E, 4340082N	1.25 ± 0.27	1.20 ± 0.78	0.98	0.32
452	362979E, 4340111N	0.88 ± 0.15	0.72 ± 0.42	0.63	-0.03
453	363012E, 4340111N	0.46 ± 0.16	1.06 ± 0.54	0.64	-0.02
454	363045E, 4340111N	1.32 ± 0.24	1.58 ± 0.94	1.17	0.52
455	363078E, 4340111N	1.24 ± 0.19	1.95 ± 0.64	1.31	0.66
456	362995E, 4340139N	0.80 ± 0.15	0.71 ± 0.45	0.60	-0.06

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
457	363028E, 4340139N	1.16 ± 0.21	1.22 ± 0.73	0.95	0.30
458	363061E, 4340139N	1.03 ± 0.25	3.6 ± 1.1	1.99	1.33
459	363094E, 4340139N	1.05 ± 0.15	1.20 ± 0.65	0.91	0.25
460	363012E, 4340168N	1.18 ± 0.20	1.81 ± 0.55	1.23	0.57
461	363045E, 4340168N	1.07 ± 0.22	1.93 ± 0.78	1.25	0.59
462	363078E, 4340168N	0.97 ± 0.18	1.64 ± 0.59	1.08	0.42
463	363028E, 4340197N	1.18 ± 0.16	1.54 ± 0.59	1.11	0.45
464	363061E, 4340197N	1.32 ± 0.22	1.66 ± 0.77	1.21	0.55
1260J[d] Resample Loc. 458	363061E, 4340139N	0.91 ± 0.16	1.91 ± 0.52	1.18	0.53
C2 SU4					
465	362785E, 4340058N	0.16 ± 0.06	0.21 ± 0.12	0.15	-0.51
466	362812E, 4340058N	1.32 ± 0.2	1.78 ± 0.61	1.26	0.61
467	362838E, 4340058N	1.07 ± 0.26	1.06 ± 0.71	0.85	0.19
468	362772E, 4340081N	0.98 ± 0.16	1.06 ± 0.69	0.82	0.16
469	Sample not collected				
470	362825E, 4340081N	0.95 ± 0.14	1.34 ± 0.52	0.94	0.28
471	362852E, 4340081N	1.22 ± 0.17	1.26 ± 0.75	0.99	0.34
472	362785E, 4340104N	0.15 ± 0.05	0.24 ± 0.13	0.16	-0.50
473	362812E, 4340104N	0.16 ± 0.06	0.03 ± 0.19	0.07	-0.59
474	362838E, 4340104N	0.86 ± 0.13	0.62 ± 0.37	0.58	-0.08
475	362798E, 4340128N	0.30 ± 0.10	0.27 ± 0.32	0.23	-0.43
476	362825E, 4340128N	0.09 ± 0.04	0.16 ± 0.28	0.10	-0.55
477	362852E, 4340128N	1.33 ± 0.23	1.57 ± 0.72	1.17	0.52
478	362812E, 4340151N	0.25 ± 0.09	0.44 ± 0.22	0.29	-0.37
479	362838E, 4340151N	0.91 ± 0.19	1.54 ± 0.69	1.01	0.36
C2 SU5					
480	362887E, 4340023N	1.12 ± 0.23	1.58 ± 0.55	1.10	0.45
481	362856E, 4340041N	1.34 ± 0.22	0.96 ± 0.72	0.90	0.24
482	362877E, 4340041N	0.96 ± 0.19	1.19 ± 0.39	0.87	0.22
483	362898E, 4340041N	0.81 ± 0.15	1.16 ± 0.56	0.81	0.15
484	362846E, 4340059N	1.28 ± 0.18	1.38 ± 0.55	1.07	0.41
485	362867E, 4340059N	1.20 ± 0.22	1.64 ± 0.78	1.16	0.50
486	362908E, 4340059N	1.15 ± 0.25	2.08 ± 0.81	1.34	0.69
487	362898E, 4340077N	1.15 ± 0.18	1.48 ± 0.62	1.07	0.41
488	362919E, 4340077N	1.37 ± 0.20	1.34 ± 0.61	1.08	0.42
489	362908E, 4340095N	1.27 ± 0.22	1.13 ± 0.63	0.95	0.29
490	362929E, 4340095N	1.30 ± 0.23	1.62 ± 0.87	1.18	0.53
491	362877E, 4340113N	1.31 ± 0.20	1.50 ± 0.46	1.13	0.48
492	362898E, 4340113N	1.26 ± 0.19	1.12 ± 0.35	0.94	0.29
493	362919E, 4340113N	1.12 ± 0.22	2.04 ± 0.68	1.31	0.66

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
494	362887E, 4340131N	1.23 ± 0.19	0.95 ± 0.68	0.86	0.20
C2 SU6					
495	362948E, 4339995N	0.87 ± 0.13	1.07 ± 0.5	0.79	0.13
496	362912E, 4340015N	0.92 ± 0.17	1.13 ± 0.63	0.83	0.17
497	362936E, 4340015N	1.40 ± 0.21	1.97 ± 0.5	1.38	0.72
498	362960E, 4340015N	1.44 ± 0.23	1.53 ± 0.53	1.19	0.54
499	362924E, 4340036N	0.88 ± 0.20	1.45 ± 0.73	0.96	0.31
500	362948E, 4340036N	1.09 ± 0.15	1.31 ± 0.47	0.97	0.31
501	362972E, 4340036N	2.24 ± 0.27	1.22 ± 0.62	1.33	0.67
502	362936E, 4340057N	1.15 ± 0.23	1.63 ± 0.71	1.14	0.48
503	362960E, 4340057N	1.23 ± 0.20	1.47 ± 0.69	1.09	0.44
504	362984E, 4340057N	1.24 ± 0.16	1.48 ± 0.59	1.10	0.44
505	362948E, 4340078N	0.79 ± 0.17	0.95 ± 0.45	0.70	0.05
506	362972E, 4340078N	1.01 ± 0.17	0.63 ± 0.54	0.63	-0.02
507	362996E, 4340078N	1.42 ± 0.19	1.04 ± 0.64	0.96	0.31
508	362936E, 4340098N	1.11 ± 0.18	2.2 ± 0.71	1.38	0.73
509	362960E, 4340098N	1.13 ± 0.20	1.74 ± 0.69	1.18	0.52
C2 SU7					
510	362704E, 4339839N	0.75 ± 0.17	0.83 ± 0.45	0.64	-0.02
511	362686E, 4339871N	1.20 ± 0.22	1.39 ± 0.77	1.05	0.39
512	362723E, 4339871N	0.74 ± 0.11	0.84 ± 0.47	0.64	-0.02
513	362704E, 4339902N	0.58 ± 0.11	0.51 ± 0.37	0.43	-0.22
514	362741E, 4339902N	0.85 ± 0.19	1.12 ± 0.53	0.80	0.15
515	362723E, 4339933N	0.76 ± 0.15	1.11 ± 0.58	0.77	0.11
516	362759E, 4339933N	0.99 ± 0.16	1.07 ± 0.58	0.83	0.17
517	362741E, 4339965N	0.88 ± 0.15	1.01 ± 0.52	0.76	0.11
518	362759E, 4339996N	1.07 ± 0.17	1.41 ± 0.55	1.01	0.35
519	362777E, 4340027N	1.24 ± 0.19	1.49 ± 0.73	1.10	0.45
C2 SU8					
520	362778E, 4339932N	1.35 ± 0.23	1.19 ± 0.73	1.01	0.35
521	362816E, 4339932N	1.16 ± 0.21	1.64 ± 0.64	1.15	0.49
522	362854E, 4339932N	1.23 ± 0.16	1.49 ± 0.52	1.10	0.44
523	362797E, 4339965N	1.08 ± 0.19	0.80 ± 0.64	0.74	0.08
524	362835E, 4339965N	1.16 ± 0.15	0.90 ± 0.53	0.81	0.15
525	362873E, 4339965N	1.23 ± 0.20	1.59 ± 0.55	1.15	0.49
526	362816E, 4339998N	1.32 ± 0.22	1.18 ± 0.66	0.99	0.33
527	362854E, 4339998N	1.38 ± 0.22	2.39 ± 0.71	1.56	0.91
528	362892E, 4339998N	1.15 ± 0.22	1.23 ± 0.69	0.96	0.30
529	362835E, 4340031N	1.10 ± 0.16	1.07 ± 0.47	0.87	0.21
C2 SU9					
530	362860E, 4339862N	1.14 ± 0.18	1.64 ± 0.84	1.14	0.48

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
531	362897E, 4339862N	0.80 ± 0.16	1.19 ± 0.52	0.82	0.16
532	362879E, 4339894N	0.95 ± 0.20	1.07 ± 0.71	0.81	0.16
533	362915E, 4339894N	1.88 ± 0.22	0.92 ± 0.59	1.07	0.41
534	362897E, 4339926N	0.62 ± 0.15	0.75 ± 0.70	0.55	-0.10
535	362934E, 4339926N	0.84 ± 0.12	0.74 ± 0.38	0.63	-0.03
536	362915E, 4339958N	1.30 ± 0.20	1.67 ± 0.70	1.21	0.55
537	362952E, 4339958N	0.52 ± 0.12	0.94 ± 0.47	0.61	-0.05
538	362897E, 4339990N	1.26 ± 0.21	1.71 ± 0.79	1.21	0.56
539	362934E, 4339990N	1.31 ± 0.18	1.27 ± 0.6	1.03	0.37
C2 SU10					
540	362746E, 4339821N	1.07 ± 0.18	1.26 ± 0.60	0.94	0.29
541	362785E, 4339821N	1.27 ± 0.20	1.93 ± 0.62	1.32	0.66
542	362823E, 4339821N	1.14 ± 0.20	1.05 ± 0.61	0.87	0.21
543	362765E, 4339854N	1.15 ± 0.17	1.53 ± 0.53	1.09	0.44
544	362804E, 4339854N	1.10 ± 0.16	1.54 ± 0.55	1.08	0.42
545	362842E, 4339854N	1.19 ± 0.18	1.27 ± 0.53	0.99	0.33
546	362746E, 4339887N	0.79 ± 0.15	0.57 ± 0.58	0.53	-0.13
547	362785E, 4339887N	0.91 ± 0.15	0.76 ± 0.42	0.66	0.00
548	362823E, 4339887N	1.27 ± 0.21	1.66 ± 0.83	1.19	0.54
549	362765E, 4339920N	1.34 ± 0.17	1.61 ± 0.53	1.19	0.54
C2 SU11					
550	362846E, 4339731N	1.14 ± 0.18	0.94 ± 0.67	0.82	0.16
551	362830E, 4339758N	1.12 ± 0.20	1.54 ± 0.45	1.09	0.43
552	362862E, 4339758N	1.21 ± 0.21	1.25 ± 0.66	0.99	0.33
553	362846E, 4339785N	1.10 ± 0.19	1.42 ± 0.81	1.02	0.37
554	362877E, 4339785N	1.02 ± 0.18	0.56 ± 0.62	0.61	-0.05
555	362830E, 4339812N	1.31 ± 0.19	1.36 ± 0.55	1.07	0.41
556	362862E, 4339812N	1.12 ± 0.19	1.52 ± 0.51	1.08	0.42
557	362893E, 4339812N	1.31 ± 0.18	1.24 ± 0.44	1.02	0.36
558	362846E, 4339839N	1.10 ± 0.19	1.61 ± 0.78	1.11	0.45
559	362877E, 4339839N	0.79 ± 0.18	1.72 ± 0.77	1.05	0.40
C2 SU12					
560	362586E, 4339591N	0.46 ± 0.13	0.94 ± 0.47	0.59	-0.07
561	362625E, 4339591N	0.90 ± 0.13	0.87 ± 0.36	0.71	0.05
562	362606E, 4339625N	0.40 ± 0.12	0.53 ± 0.30	0.38	-0.28
563	362625E, 4339659N	0.77 ± 0.14	0.78 ± 0.51	0.62	-0.04
564	362644E, 4339692N	0.58 ± 0.11	0.90 ± 0.44	0.61	-0.05
565	362664E, 4339726N	0.77 ± 0.15	0.73 ± 0.48	0.60	-0.06
566	362683E, 4339759N	0.59 ± 0.13	0.87 ± 0.42	0.60	-0.06
567	362664E, 4339793N	0.66 ± 0.12	1.11 ± 0.41	0.73	0.08
568	362703E, 4339793N	0.66 ± 0.15	0.34 ± 0.53	0.38	-0.27

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
569	362683E, 4339827N	0.86 ± 0.14	0.71 ± 0.34	0.62	-0.04
C2 SU13					
570	362682E, 4339712N	0.79 ± 0.14	0.98 ± 0.48	0.72	0.06
571	362720E, 4339712N	1.08 ± 0.16	1.41 ± 0.54	1.01	0.36
572	362758E, 4339712N	0.88 ± 0.17	1.15 ± 0.50	0.83	0.17
573	362701E, 4339745N	0.95 ± 0.22	1.16 ± 0.63	0.85	0.20
574	362739E, 4339745N	1.07 ± 0.15	0.87 ± 0.43	0.76	0.11
575	362777E, 4339745N	0.88 ± 0.18	1.08 ± 0.60	0.79	0.14
576	362720E, 4339778N	0.83 ± 0.15	1.31 ± 0.70	0.88	0.23
577	362758E, 4339778N	2.26 ± 0.29	2.69 ± 0.91	2.00	1.35
578	362797E, 4339778N	1.25 ± 0.23	1.76 ± 0.46	1.23	0.57
579	362739E, 4339811N	1.15 ± 0.20	1.41 ± 0.86	1.04	0.38
C2 SU14					
580	362789E, 4339621N	1.11 ± 0.18	1.38 ± 0.66	1.01	0.35
581	362824E, 4339621N	1.22 ± 0.17	1.37 ± 0.46	1.04	0.39
582	362859E, 4339621N	1.14 ± 0.21	1.82 ± 0.68	1.22	0.56
583	362771E, 4339651N	0.69 ± 0.11	0.51 ± 0.43	0.47	-0.19
584	362806E, 4339651N	1.18 ± 0.21	1.86 ± 0.58	1.25	0.60
585	362841E, 4339651N	1.40 ± 0.20	1.21 ± 0.75	1.03	0.38
586	362789E, 4339682N	0.57 ± 0.11	0.74 ± 0.38	0.53	-0.12
587	362824E, 4339682N	1.20 ± 0.22	1.17 ± 0.58	0.95	0.29
588	362806E, 4339712N	0.78 ± 0.11	1.01 ± 0.39	0.73	0.07
589	362841E, 4339712N	1.04 ± 0.17	1.06 ± 0.58	0.84	0.18
C2 SU15					
590	362662E, 4339564N	0.59 ± 0.11	0.51 ± 0.40	0.44	-0.22
591	362705E, 4339564N	0.68 ± 0.14	0.69 ± 0.57	0.55	-0.11
592	362640E, 4339601N	0.72 ± 0.17	1.43 ± 0.50	0.90	0.24
593	362683E, 4339601N	0.60 ± 0.12	0.91 ± 0.42	0.62	-0.04
594	362727E, 4339601N	0.78 ± 0.14	1.22 ± 0.50	0.82	0.17
595	362662E, 4339639N	0.55 ± 0.12	0.55 ± 0.50	0.44	-0.22
596	362705E, 4339639N	0.74 ± 0.16	1.02 ± 0.58	0.72	0.06
597	362748E, 4339639N	0.53 ± 0.09	0.54 ± 0.31	0.43	-0.23
598	362683E, 4339676N	0.81 ± 0.15	1.21 ± 0.57	0.83	0.17
599	362727E, 4339676N	0.70 ± 0.13	1.15 ± 0.48	0.76	0.11
C2 SU16					
600	362757E, 4339546N	0.73 ± 0.13	1.19 ± 0.56	0.79	0.14
601	362789E, 4339546N	0.59 ± 0.14	0.83 ± 0.55	0.58	-0.08
602	362822E, 4339546N	0.97 ± 0.15	1.33 ± 0.48	0.94	0.28
603	362740E, 4339574N	0.51 ± 0.13	0.88 ± 0.57	0.58	-0.08
604	362773E, 4339574N	0.37 ± 0.08	0.82 ± 0.34	0.50	-0.16
605	362806E, 4339574N	1.10 ± 0.16	1.16 ± 0.56	0.91	0.25

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
606	362838E, 4339574N	0.84 ± 0.14	1.06 ± 0.51	0.77	0.11
607	362757E, 4339603N	1.08 ± 0.16	1.22 ± 0.42	0.93	0.27
608	362789E, 4339603N	1.37 ± 0.21	1.19 ± 0.51	1.01	0.36
609	362822E, 4339603N	1.23 ± 0.21	1.67 ± 0.72	1.18	0.53
C2 SU17					
610	362417E, 4339456N	0.53 ± 0.14	0.86 ± 0.56	0.57	-0.08
611	362456E, 4339456N	0.69 ± 0.14	0.85 ± 0.53	0.62	-0.03
612	362495E, 4339456N	0.59 ± 0.13	1.19 ± 0.46	0.74	0.09
613	362534E, 4339456N	0.62 ± 0.12	1.25 ± 0.48	0.78	0.13
614	362574E, 4339456N	1.05 ± 0.20	1.53 ± 0.71	1.06	0.40
615	362613E, 4339456N	0.57 ± 0.14	0.62 ± 0.35	0.48	-0.18
616	362515E, 4339490N	1.08 ± 0.15	0.97 ± 0.57	0.81	0.16
617	362554E, 4339490N	0.76 ± 0.17	2.42 ± 0.81	1.36	0.71
618	362574E, 4339524N	0.80 ± 0.18	0.77 ± 0.51	0.63	-0.03
619	362593E, 4339558N	0.86 ± 0.17	1.26 ± 0.52	0.87	0.21
C2 SU18					
620	Sample not collected				
621	362619E, 4339493N	0.64 ± 0.13	1.93 ± 0.47	1.10	0.44
622	362648E, 4339493N	0.83 ± 0.18	2.62 ± 0.53	1.48	0.82
623	362605E, 4339518N	0.61 ± 0.13	1.32 ± 0.46	0.81	0.15
624	362633E, 4339518N	0.60 ± 0.13	0.62 ± 0.38	0.49	-0.17
625	362662E, 4339518N	0.55 ± 0.14	0.89 ± 0.51	0.59	-0.06
626	362690E, 4339518N	0.78 ± 0.13	0.86 ± 0.50	0.66	0.00
627	362619E, 4339543N	0.74 ± 0.16	0.49 ± 0.44	0.48	-0.18
628	362648E, 4339543N	2.10 ± 0.23	1.93 ± 0.68	1.60	0.94
629	362676E, 4339543N	0.73 ± 0.12	1.00 ± 0.42	0.71	0.05
C2 SU19					
630	362412E, 4339392N	0.67 ± 0.16	0.62 ± 0.43	0.51	-0.14
631	362450E, 4339392N	0.69 ± 0.12	0.90 ± 0.41	0.65	-0.01
632	362489E, 4339392N	0.71 ± 0.14	0.59 ± 0.49	0.51	-0.14
633	362527E, 4339392N	0.76 ± 0.17	0.51 ± 0.48	0.49	-0.16
634	362393E, 4339425N	0.56 ± 0.17	0.52 ± 0.53	0.43	-0.23
635	362431E, 4339425N	0.73 ± 0.15	0.73 ± 0.50	0.58	-0.07
636	362470E, 4339425N	0.60 ± 0.11	0.66 ± 0.34	0.51	-0.15
637	362508E, 4339425N	1.33 ± 0.21	2.08 ± 0.76	1.40	0.75
638	362547E, 4339425N	1.25 ± 0.23	1.74 ± 0.75	1.22	0.57
639	362585E, 4339425N	0.88 ± 0.18	1.30 ± 0.62	0.89	0.24
C2 SU20					
640	362596E, 4339319N	0.78 ± 0.15	0.86 ± 0.47	0.66	0.00
641	362632E, 4339319N	0.67 ± 0.16	1.15 ± 0.56	0.75	0.10
642	362578E, 4339350N	0.97 ± 0.14	1.33 ± 0.60	0.94	0.28

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
643	362614E, 4339350N	0.98 ± 0.17	1.20 ± 0.58	0.88	0.23
644	362524E, 4339381N	0.87 ± 0.14	0.98 ± 0.45	0.75	0.09
645	362560E, 4339381N	1.14 ± 0.17	1.69 ± 0.54	1.16	0.50
646	362596E, 4339381N	0.86 ± 0.13	0.92 ± 0.41	0.71	0.06
647	362632E, 4339381N	0.97 ± 0.17	0.96 ± 0.52	0.77	0.11
648	362614E, 4339412N	0.93 ± 0.16	0.63 ± 0.55	0.61	-0.05
649	362632E, 4339443N	0.56 ± 0.12	0.69 ± 0.47	0.51	-0.15
C2 SU21					
650	362475E, 4339236N	0.62 ± 0.15	1.3 ± 0.52	0.80	0.15
651	362521E, 4339236N	0.67 ± 0.10	0.77 ± 0.34	0.58	-0.08
652	362453E, 4339276N	0.49 ± 0.12	0.59 ± 0.38	0.44	-0.22
653	362498E, 4339276N	0.56 ± 0.11	0.63 ± 0.39	0.48	-0.18
654	362544E, 4339276N	0.62 ± 0.14	0.86 ± 0.47	0.60	-0.05
655	362430E, 4339315N	0.56 ± 0.11	0.70 ± 0.35	0.51	-0.15
656	362475E, 4339315N	0.55 ± 0.13	0.30 ± 0.45	0.33	-0.33
657	362521E, 4339315N	0.71 ± 0.14	1.16 ± 0.62	0.77	0.12
658	362567E, 4339315N	0.62 ± 0.11	0.99 ± 0.51	0.66	0.01
659	362498E, 4339355N	0.76 ± 0.14	1.36 ± 0.65	0.88	0.22
C2 SU22					
660	363190E, 4340157N	0.75 ± 0.18	1.11 ± 0.61	0.76	0.11
661	363121E, 4340181N	1.04 ± 0.15	1.06 ± 0.56	0.84	0.18
662	363149E, 4340181N	0.83 ± 0.17	0.89 ± 0.51	0.69	0.03
663	363176E, 4340181N	0.74 ± 0.15	1.49 ± 0.55	0.93	0.28
664	363204E, 4340181N	0.79 ± 0.19	1.45 ± 0.41	0.93	0.27
665	363135E, 4340205N	0.74 ± 0.16	1.09 ± 0.57	0.75	0.09
666	363163E, 4340205N	0.66 ± 0.14	0.87 ± 0.58	0.62	-0.03
667	363190E, 4340205N	0.58 ± 0.11	1.13 ± 0.53	0.71	0.06
668	Sample not collected				
669	363176E, 4340228N	0.31 ± 0.10	0.79 ± 0.35	0.47	-0.19
670	363163E, 4340252N	0.72 ± 0.17	1.37 ± 0.83	0.87	0.21
671	363149E, 4340276N	0.22 ± 0.06	0.46 ± 0.38	0.28	-0.37
C2 SU23					
672	363131E, 4340047N	1.12 ± 0.19	1.29 ± 0.63	0.97	0.32
673	363086E, 4340073N	0.87 ± 0.19	2.02 ± 0.68	1.22	0.56
674	363116E, 4340073N	1.16 ± 0.21	1.74 ± 0.65	1.19	0.53
675	363146E, 4340073N	1.18 ± 0.19	1.44 ± 0.69	1.06	0.40
676	363101E, 4340099N	1.18 ± 0.16	1.78 ± 0.41	1.22	0.56
677	363131E, 4340099N	1.23 ± 0.17	1.45 ± 0.54	1.08	0.43
678	363161E, 4340099N	1.00 ± 0.18	1.12 ± 0.64	0.85	0.20
679	363116E, 4340125N	1.39 ± 0.2	1.30 ± 0.71	1.07	0.41
680	363146E, 4340125N	0.97 ± 0.21	1.42 ± 0.67	0.98	0.32

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
681	363131E, 4340151N	0.83 ± 0.16	1.06 ± 0.59	0.77	0.11
682	363161E, 4340151N	1.45 ± 0.24	1.33 ± 0.52	1.10	0.45
683	363116E, 4340177N	0.94 ± 0.19	1.28 ± 0.58	0.91	0.25
C2 SU24					
684	363215E, 4340011N	0.85 ± 0.16	0.68 ± 0.63	0.60	-0.05
685	363249E, 4340011N	1.35 ± 0.23	1.63 ± 0.60	1.21	0.55
686	363165E, 4340040N	0.74 ± 0.12	0.72 ± 0.43	0.58	-0.07
687	363199E, 4340040N	1.10 ± 0.17	0.98 ± 0.41	0.82	0.17
688	363232E, 4340040N	1.00 ± 0.17	1.66 ± 0.47	1.10	0.44
689	363182E, 4340069N	1.04 ± 0.19	1.42 ± 0.62	1.00	0.35
690	363215E, 4340069N	0.87 ± 0.16	1.24 ± 0.58	0.86	0.21
691	363249E, 4340069N	1.03 ± 0.16	1.56 ± 0.46	1.06	0.41
692	363199E, 4340098N	0.65 ± 0.1	0.94 ± 0.36	0.65	-0.01
693	363232E, 4340098N	1.04 ± 0.17	1.16 ± 0.53	0.89	0.23
694	363182E, 4340127N	1.50 ± 0.24	2.68 ± 0.87	1.74	1.08
695	363215E, 4340127N	0.54 ± 0.16	1.10 ± 0.60	0.69	0.03
C2 SU25					
696	363066E, 4339914N	0.78 ± 0.15	0.74 ± 0.38	0.61	-0.05
697	363051E, 4339941N	1.05 ± 0.19	1.19 ± 0.59	0.90	0.25
698	363035E, 4339968N	1.11 ± 0.19	1.17 ± 0.55	0.91	0.26
699	363097E, 4339968N	0.62 ± 0.15	0.67 ± 0.51	0.52	-0.14
700	363051E, 4339995N	1.27 ± 0.20	1.23 ± 0.54	1.00	0.34
701	363082E, 4339995N	0.10 ± 0.04	0.23 ± 0.17	0.14	-0.52
702	363112E, 4339995N	0.04 ± 0.03	0.01 ± 0.10	0.02	-0.64
703	363066E, 4340021N	0.90 ± 0.15	1.01 ± 0.56	0.77	0.11
704	363097E, 4340021N	0.96 ± 0.2	1.78 ± 0.84	1.14	0.48
705	363128E, 4340021N	1.12 ± 0.18	1.18 ± 0.58	0.92	0.27
706	363082E, 4340048N	0.99 ± 0.19	0.89 ± 0.74	0.75	0.09
707	363112E, 4340048N	1.09 ± 0.20	1.58 ± 0.76	1.09	0.44
C2 SU26					
708	363133E, 4339904N	1.08 ± 0.16	1.56 ± 0.57	1.08	0.42
709	363169E, 4339904N	0.98 ± 0.16	1.69 ± 0.34	1.11	0.45
710	Sample not collected				
711	363151E, 4339935N	1.00 ± 0.18	1.45 ± 0.50	1.00	0.35
712	363187E, 4339935N	0.78 ± 0.16	1.18 ± 0.51	0.81	0.15
713	363133E, 4339966N	1.09 ± 0.2	1.27 ± 0.63	0.95	0.30
714	363169E, 4339966N	0.82 ± 0.15	0.77 ± 0.55	0.63	-0.02
715	363205E, 4339966N	0.85 ± 0.15	1.01 ± 0.52	0.75	0.10
716	363151E, 4339997N	1.19 ± 0.21	1.68 ± 0.57	1.17	0.52
717	363187E, 4339997N	2.18 ± 0.23	1.65 ± 0.63	1.50	0.85
718	363223E, 4339997N	1.03 ± 0.20	1.05 ± 0.62	0.83	0.18

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	Coordinate E, N[a] (X, Y)	Th-232[b] (pCi/g)	U-238[c] (pCi/g)	SOR Gross	SOR Net
719	363169E, 4340028N	1.37 ± 0.20	1.57 ± 0.47	1.19	0.53
C2 SU27					
720	363019E, 4339803N	0.53 ± 0.12	0.95 ± 0.32	0.61	-0.04
721	363004E, 4339831N	0.52 ± 0.12	0.91 ± 0.42	0.59	-0.06
722	363035E, 4339831N	0.66 ± 0.12	1.26 ± 0.46	0.80	0.14
723	363019E, 4339858N	0.62 ± 0.13	0.51 ± 0.39	0.45	-0.21
724	363051E, 4339858N	0.82 ± 0.13	0.58 ± 0.39	0.55	-0.11
725	363004E, 4339885N	1.24 ± 0.20	0.92 ± 0.58	0.85	0.19
726	363035E, 4339885N	0.69 ± 0.15	0.75 ± 0.53	0.58	-0.08
727	363067E, 4339885N	0.93 ± 0.18	1.04 ± 0.58	0.79	0.14
728	363019E, 4339913N	1.31 ± 0.21	1.37 ± 0.44	1.07	0.42
729	363051E, 4339913N	0.89 ± 0.17	1.59 ± 0.64	1.03	0.37
C2 SU28					
730	363066E, 4339805N	1.52 ± 0.22	1.82 ± 0.51	1.35	0.69
731	363103E, 4339805N	0.95 ± 0.17	1.64 ± 0.47	1.07	0.42
732	363141E, 4339805N	1.85 ± 0.27	0.94 ± 0.91	1.07	0.41
733	363085E, 4339838N	1.09 ± 0.17	1.77 ± 0.70	1.18	0.52
734	363122E, 4339838N	0.9 ± 0.21	2.09 ± 0.85	1.26	0.60
735	363160E, 4339838N	1.23 ± 0.18	1.43 ± 0.48	1.07	0.42
736	363103E, 4339870N	1.25 ± 0.20	1.42 ± 0.76	1.08	0.42
737	363141E, 4339870N	1.14 ± 0.17	1.33 ± 0.57	1.00	0.34
738	363179E, 4339870N	1.25 ± 0.19	1.68 ± 0.54	1.19	0.54
739	363122E, 4339903N	0.80 ± 0.16	2.22 ± 0.62	1.28	0.63
C2 SU29					
740	362954E, 4339708N	1.14 ± 0.15	1.36 ± 0.53	1.01	0.35
741	362985E, 4339708N	1.28 ± 0.20	1.05 ± 0.69	0.92	0.26
742	362970E, 4339735N	0.94 ± 0.17	0.86 ± 0.51	0.72	0.06
743	363001E, 4339735N	1.01 ± 0.16	1.19 ± 0.59	0.89	0.23
744	362954E, 4339762N	0.91 ± 0.17	1.05 ± 0.56	0.79	0.13
745	362985E, 4339762N	1.32 ± 0.22	1.77 ± 0.8	1.26	0.60
746	363017E, 4339762N	0.53 ± 0.10	0.89 ± 0.32	0.59	-0.07
747	362970E, 4339789N	1.24 ± 0.22	1.12 ± 0.73	0.94	0.28
748	363001E, 4339789N	1.51 ± 0.22	2.04 ± 0.90	1.45	0.79
749	363032E, 4339789N	0.65 ± 0.12	0.73 ± 0.44	0.56	-0.10
C2 SU30					
750	363097E, 4339660N	1.20 ± 0.20	1.18 ± 0.67	0.95	0.29
751	363041E, 4339692N	1.37 ± 0.23	1.51 ± 0.74	1.16	0.50
752	363078E, 4339692N	1.03 ± 0.20	1.31 ± 0.74	0.95	0.29
753	363022E, 4339725N	1.24 ± 0.19	1.58 ± 0.59	1.15	0.49
754	363060E, 4339725N	1.42 ± 0.24	1.49 ± 0.71	1.17	0.51
755	363097E, 4339725N	0.78 ± 0.17	1.67 ± 0.64	1.03	0.37

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
756	363041E, 4339757N	1.24 ± 0.17	0.69 ± 0.41	0.74	0.08
757	363078E, 4339757N	0.97 ± 0.17	0.88 ± 0.60	0.73	0.08
758	363116E, 4339757N	0.98 ± 0.17	1.73 ± 0.48	1.12	0.47
759	363060E, 4339790N	1.27 ± 0.19	1.1 ± 0.59	0.94	0.28
C2 SU31					
760	362903E, 4339587N	0.76 ± 0.13	0.80 ± 0.35	0.63	-0.03
761	362937E, 4339587N	0.70 ± 0.11	0.73 ± 0.42	0.57	-0.08
762	362886E, 4339617N	1.03 ± 0.18	1.22 ± 0.58	0.91	0.25
763	362920E, 4339617N	0.89 ± 0.16	0.65 ± 0.53	0.60	-0.05
764	362954E, 4339617N	0.47 ± 0.11	1.07 ± 0.55	0.65	-0.01
765	362937E, 4339646N	2.11 ± 0.24	2.18 ± 0.84	1.72	1.06
766	362971E, 4339646N	1.23 ± 0.21	1.10 ± 0.78	0.92	0.27
767	362920E, 4339676N	0.77 ± 0.13	0.75 ± 0.47	0.61	-0.05
768	362954E, 4339676N	1.51 ± 0.18	1.18 ± 0.40	1.06	0.40
769	362988E, 4339676N	1.32 ± 0.23	1.53 ± 0.63	1.15	0.49
C2 SU32					
770	363001E, 4339574N	1.21 ± 0.17	1.82 ± 0.72	1.24	0.59
771	363039E, 4339574N	1.37 ± 0.21	0.85 ± 0.72	0.86	0.20
772	362982E, 4339606N	2.73 ± 0.31	1.22 ± 0.83	1.50	0.84
773	363020E, 4339606N	1.06 ± 0.16	1.11 ± 0.53	0.87	0.21
774	363058E, 4339606N	1.27 ± 0.21	1.32 ± 0.74	1.04	0.38
775	363001E, 4339639N	1.40 ± 0.21	1.20 ± 0.61	1.03	0.37
776	363039E, 4339639N	0.29 ± 0.10	0.91 ± 0.41	0.51	-0.14
777	363077E, 4339639N	1.26 ± 0.18	1.20 ± 0.55	0.98	0.32
778	363020E, 4339672N	1.58 ± 0.22	1.28 ± 0.69	1.13	0.47
779	363058E, 4339672N	2.15 ± 0.25	2.13 ± 0.67	1.71	1.05
1354J[d] soil separated from ore/charact. Location 342	363010E, 4339667N	3.37 ± 0.37	1.9 ± 0.77	2.03	1.37
1355J ore separated from soil	363010E, 4339667N	2.28 ± 0.36	1.52 ± 0.83	1.48	0.82
C2 SU33					
780	362914E, 4339488N	0.64 ± 0.12	0.39 ± 0.52	0.40	-0.26
781	362834E, 4339515N	0.44 ± 0.09	0.49 ± 0.36	0.37	-0.28
782	362866E, 4339515N	0.7 ± 0.13	0.69 ± 0.44	0.56	-0.10
783	362898E, 4339515N	1.00 ± 0.18	0.90 ± 0.52	0.75	0.10
784	362930E, 4339515N	0.80 ± 0.18	0.59 ± 0.50	0.54	-0.11
785	362850E, 4339543N	0.93 ± 0.18	0.96 ± 0.47	0.76	0.10
786	362914E, 4339543N	0.88 ± 0.15	1.32 ± 0.50	0.90	0.25
787	362866E, 4339571N	0.68 ± 0.13	0.68 ± 0.44	0.54	-0.11
788	362898E, 4339571N	0.73 ± 0.15	0.89 ± 0.52	0.66	0.00

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
789	362930E, 4339571N	0.99 ± 0.18	0.95 ± 0.66	0.77	0.12
C2 SU34					
790	362983E, 4339460N	1.04 ± 0.20	0.92 ± 0.71	0.78	0.12
791	363019E, 4339460N	1.12 ± 0.17	1.10 ± 0.62	0.89	0.23
792	362930E, 4339491N	0.67 ± 0.14	0.96 ± 0.56	0.67	0.01
793	362965E, 4339491N	0.89 ± 0.13	0.90 ± 0.46	0.72	0.06
794	363001E, 4339491N	1.04 ± 0.17	1.48 ± 0.53	1.03	0.37
795	362946E, 4339522N	3.75 ± 0.40	0.69 ± 0.75	1.61	0.95
796	362976E, 4339522N	0.95 ± 0.14	0.91 ± 0.51	0.74	0.08
797	363019E, 4339522N	1.00 ± 0.16	1.01 ± 0.58	0.80	0.15
798	362965E, 4339552N	4.02 ± 0.38	2.04 ± 0.79	2.31	1.66
799	363001E, 4339552N	1.02 ± 0.17	2.10 ± 0.70	1.31	0.65
1270 J investigation 0798	362946E, 4339522N	1.34 ± 0.20	1.28 ± 0.60	1.04	0.39
1271 J investigation 0798	362953E, 4339525N	3.84 ± 0.37	1.04 ± 0.55	1.80	1.14
1272 J investigation 0798	362938E, 4339500N	1.77 ± 0.21	1.32 ± 0.56	1.21	0.55
C2 SU35					
800	363325E, 4339905N	0.23 ± 0.12	0.5 ± 0.39	0.31	-0.35
801	363271E, 4339937N	0.12 ± 0.07	0.18 ± 0.27	0.12	-0.53
802	363274E, 4339984N	0.93 ± 0.19	0.71 ± 0.71	0.64	-0.01
803	363253E, 4339968N	0.50 ± 0.10	0.72 ± 0.33	0.50	-0.16
804	363289E, 4339968N	1.29 ± 0.21	1.86 ± 0.70	1.29	0.63
805	363283E, 4339945N	0.50 ± 0.09	0.93 ± 0.41	0.60	-0.06
806	363276E, 4339963N	1.25 ± 0.21	1.43 ± 0.59	1.08	0.42
807	363270E, 4339968N	0.86 ± 0.16	1.08 ± 0.62	0.79	0.13
808	363254E, 4339994N	0.93 ± 0.12	0.64 ± 0.41	0.61	-0.04
809	363332E, 4339922N	0.81 ± 0.16	1.03 ± 0.51	0.75	0.09
C2 SU36					
810	363350E, 4339877N	0.69 ± 0.13	0.60 ± 0.48	0.51	-0.15
811	363392E, 4339877N	0.81 ± 0.16	1.06 ± 0.51	0.76	0.10
812	363434E, 4339877N	0.64 ± 0.14	0.92 ± 0.45	0.64	-0.02
813	363329E, 4339913N	0.87 ± 0.18	1.39 ± 0.62	0.93	0.28
814	363368E, 4339913N	0.87 ± 0.14	1.14 ± 0.49	0.82	0.16
815	363413E, 4339913N	0.77 ± 0.15	0.81 ± 0.65	0.63	-0.02
816	363455E, 4339913N	0.74 ± 0.13	1.17 ± 0.47	0.79	0.13
817	Sample not collected				
818	363392E, 4339949N	1.01 ± 0.17	1.38 ± 0.65	0.98	0.32
819	363434E, 4339949N	0.78 ± 0.14	0.64 ± 0.35	0.56	-0.10
C2 SU37					

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
820	363265E, 4339875N	0.81 ± 0.16	0.88 ± 0.41	0.68	0.02
821	363293E, 4339875N	0.58 ± 0.13	0.80 ± 0.38	0.56	-0.09
822	363224E, 4339899N	0.92 ± 0.15	2.13 ± 0.51	1.29	0.63
823	363252E, 4339899N	1.04 ± 0.20	1.16 ± 0.64	0.89	0.23
824	363282E, 4339899N	0.76 ± 0.14	0.77 ± 0.49	0.61	-0.04
825	363238E, 4339923N	0.68 ± 0.17	1.56 ± 0.58	0.94	0.29
826	363265E, 4339923N	1.00 ± 0.17	1.14 ± 0.53	0.86	0.21
827	363224E, 4339947N	0.86 ± 0.15	1.91 ± 0.57	1.16	0.51
828	363252E, 4339947N	1.17 ± 0.16	1.20 ± 0.52	0.95	0.29
829	363238E, 4339971N	0.95 ± 0.16	0.58 ± 0.58	0.59	-0.07
C2 SU38					
830	363197E, 4339732N	0.41 ± 0.08	0.65 ± 0.37	0.44	-0.22
831	363241E, 4339732N	1.03 ± 0.15	1.05 ± 0.44	0.83	0.18
832	363176E, 4339770N	0.78 ± 0.12	1.32 ± 0.39	0.87	0.21
833	363219E, 4339770N	0.66 ± 0.13	0.86 ± 0.40	0.62	-0.04
834	363263E, 4339770N	0.84 ± 0.16	0.92 ± 0.51	0.71	0.05
835	363197E, 4339807N	0.74 ± 0.12	1.07 ± 0.36	0.74	0.08
836	363241E, 4339807N	0.22 ± 0.10	0.32 ± 0.40	0.22	-0.44
837	363219E, 4339845N	0.84 ± 0.15	1.31 ± 0.62	0.89	0.23
838	363263E, 4339845N	0.85 ± 0.13	0.90 ± 0.38	0.70	0.05
839	363197E, 4339883N	0.85 ± 0.15	2.40 ± 0.51	1.38	0.73
C2 SU39					
840	363298E, 4339692N	1.03 ± 0.17	1.47 ± 0.57	1.02	0.37
841	363337E, 4339692N	0.78 ± 0.13	0.70 ± 0.45	0.59	-0.07
842	363279E, 4339725N	1.16 ± 0.15	1.37 ± 0.51	1.02	0.37
843	363317E, 4339725N	0.68 ± 0.16	0.95 ± 0.46	0.67	0.01
844	363298E, 4339759N	1.13 ± 0.19	1.49 ± 0.42	1.07	0.41
845	363337E, 4339759N	0.30 ± 0.10	1.23 ± 0.46	0.66	0.01
846	363279E, 4339792N	0.66 ± 0.13	1.02 ± 0.47	0.69	0.03
847	363317E, 4339792N	0.49 ± 0.10	1.58 ± 0.37	0.89	0.23
848	363298E, 4339826N	0.51 ± 0.11	0.92 ± 0.36	0.59	-0.06
849	363337E, 4339826N	0.77 ± 0.12	0.78 ± 0.44	0.62	-0.04
C2 SU40					
850	363162E, 4339586N	0.03 ± 0.02	0.09 ± 0.10	0.05	-0.61
851	363096E, 4339624N	1.15 ± 0.17	1.59 ± 0.55	1.12	0.46
852	363140E, 4339624N	0.52 ± 0.10	0.73 ± 0.46	0.51	-0.15
853	363183E, 4339624N	1.03 ± 0.17	0.94 ± 0.53	0.78	0.13
854	363118E, 4339662N	1.23 ± 0.20	1.80 ± 0.63	1.24	0.59
855	363205E, 4339662N	1.16 ± 0.16	1.42 ± 0.55	1.05	0.39
856	363140E, 4339699N	1.00 ± 0.16	2.37 ± 0.61	1.42	0.77
857	363183E, 4339699N	0.88 ± 0.16	0.74 ± 0.55	0.64	-0.02

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
858	363227E, 4339699N	1.10 ± 0.20	1.02 ± 0.52	0.84	0.19
859	363162E, 4339737N	0.74 ± 0.12	1.30 ± 0.48	0.85	0.19
C2 SU41					
860	363226E, 4339555N	1.01 ± 0.18	0.96 ± 0.56	0.78	0.13
861	363269E, 4339555N	1.16 ± 0.20	1.23 ± 0.59	0.96	0.30
862	363204E, 4339593N	1.00 ± 0.17	1.15 ± 0.49	0.87	0.21
863	363291E, 4339593N	0.65 ± 0.11	1.03 ± 0.45	0.69	0.04
864	363226E, 4339631N	0.99 ± 0.17	1.10 ± 0.51	0.84	0.18
865	363263E, 4339632N	1.49 ± 0.19	1.34 ± 0.73	1.12	0.47
866	363313E, 4339631N	1.46 ± 0.23	1.46 ± 0.81	1.17	0.51
867	363247E, 4339669N	1.26 ± 0.21	1.95 ± 0.80	1.32	0.66
868	363291E, 4339669N	0.82 ± 0.17	1.01 ± 0.47	0.74	0.09
869	363335E, 4339669N	0.59 ± 0.10	0.85 ± 0.33	0.59	-0.07
C2 SU42					
870	Sample not collected				
871	363046E, 4339473N	1.30 ± 0.22	1.03 ± 0.73	0.92	0.26
872	363086E, 4339473N	0.87 ± 0.17	1.33 ± 0.67	0.90	0.25
873	363126E, 4339473N	0.28 ± 0.09	0.5 ± 0.30	0.32	-0.33
874	363066E, 4339507N	0.66 ± 0.12	0.51 ± 0.41	0.46	-0.20
875	Sample not collected				
876	363146E, 4339507N	0.32 ± 0.08	0.59 ± 0.41	0.38	-0.28
877	363086E, 4339542N	1.06 ± 0.17	1.18 ± 0.55	0.90	0.25
878	363126E, 4339542N	0.08 ± 0.03	0.01 ± 0.07	0.03	-0.62
879	363166E, 4339542N	0.08 ± 0.04	0.14 ± 0.11	0.09	-0.57
880	363106E, 4339576N	0.87 ± 0.15	1.01 ± 0.34	0.76	0.10
881	363146E, 4339576N	0.05 ± 0.02	0.07 ± 0.07	0.05	-0.61
C2 SU43					
882	363170E, 4339404N	1.24 ± 0.2	0.99 ± 0.69	0.88	0.22
883	363209E, 4339404N	1.16 ± 0.23	1.74 ± 0.64	1.19	0.53
884	363150E, 4339439N	0.58 ± 0.11	0.51 ± 0.37	0.43	-0.22
885	363190E, 4339439N	0.69 ± 0.11	0.59 ± 0.36	0.51	-0.15
886	363229E, 4339439N	0.90 ± 0.16	0.90 ± 0.50	0.72	0.06
887	363170E, 4339473N	0.63 ± 0.11	0.78 ± 0.33	0.57	-0.08
888	Sample not collected				
889	363249E, 4339473N	1.00 ± 0.20	1.10 ± 0.51	0.84	0.19
890	363190E, 4339508N	0.73 ± 0.11	1.09 ± 0.42	0.75	0.09
891	363229E, 4339508N	0.28 ± 0.07	0.41 ± 0.31	0.28	-0.37
892	363269E, 4339508N	0.77 ± 0.15	0.93 ± 0.57	0.69	0.03
893	363209E, 4339542N	0.84 ± 0.13	0.92 ± 0.41	0.71	0.05
C2 SU44					
894	362906E, 4339226N	0.68 ± 0.16	0.95 ± 0.50	0.67	0.01

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
895	362924E, 4339255N	0.82 ± 0.13	1.25 ± 0.49	0.85	0.19
896	362941E, 4339285N	0.71 ± 0.16	0.97 ± 0.44	0.69	0.03
897	362924E, 4339314N	0.66 ± 0.13	1.00 ± 0.48	0.68	0.03
898	362941E, 4339344N	0.68 ± 0.11	1.06 ± 0.47	0.72	0.06
899	362924E, 4339373N	0.89 ± 0.17	1.16 ± 0.66	0.83	0.18
900	362958E, 4339373N	0.83 ± 0.13	0.95 ± 0.41	0.72	0.06
901	362941E, 4339403N	0.63 ± 0.13	0.82 ± 0.28	0.59	-0.07
902	362975E, 4339403N	0.80 ± 0.15	0.70 ± 0.57	0.59	-0.06
903	362958E, 4339432N	0.81 ± 0.13	1.02 ± 0.37	0.74	0.09
904	362992E, 4339432N	0.96 ± 0.14	1.34 ± 0.5	0.94	0.28
905	362941E, 4339462N	0.92 ± 0.16	1.08 ± 0.55	0.81	0.15
1273J investigation	362928E, 4339421N	2.27 ± 0.28	0.91 ± 0.64	1.20	0.54
C2 SU45					
906	363063E, 4339285N	1.06 ± 0.21	1.47 ± 0.6	1.03	0.38
907	362963E, 4339319N	0.69 ± 0.11	0.9 ± 0.34	0.65	-0.01
908	363003E, 4339319N	0.91 ± 0.16	1.48 ± 0.50	0.99	0.33
909	363043E, 4339319N	0.43 ± 0.10	0.86 ± 0.42	0.54	-0.12
910	362983E, 4339354N	0.62 ± 0.11	0.67 ± 0.31	0.52	-0.14
911	Sample not collected				
912	363063E, 4339354N	0.79 ± 0.11	0.48 ± 0.35	0.49	-0.17
913	363003E, 4339388N	0.89 ± 0.17	1.51 ± 0.68	0.99	0.34
914	Sample not collected				
915	363023E, 4339423N	1.08 ± 0.17	1.23 ± 0.58	0.93	0.27
916	363063E, 4339423N	1.13 ± 0.16	1.08 ± 0.53	0.88	0.22
917	363103E, 4339423N	0.57 ± 0.10	0.57 ± 0.33	0.46	-0.20
C2 SU46					
918	363108E, 4339261N	1.07 ± 0.17	1.22 ± 0.63	0.92	0.27
919	363148E, 4339261N	1.00 ± 0.18	1.34 ± 0.64	0.95	0.30
920	363088E, 4339296N	0.88 ± 0.13	1.08 ± 0.42	0.79	0.14
921	363128E, 4339296N	0.48 ± 0.09	0.64 ± 0.35	0.46	-0.20
922	363168E, 4339296N	0.65 ± 0.16	0.46 ± 0.42	0.43	-0.22
923	363108E, 4339330N	0.91 ± 0.17	0.67 ± 0.41	0.62	-0.04
924	Sample not collected				
925	363188E, 4339330N	1.17 ± 0.17	1.6 ± 0.55	1.13	0.47
926	363128E, 4339365N	1.07 ± 0.16	0.85 ± 0.41	0.76	0.10
927	363168E, 4339365N	0.66 ± 0.14	0.44 ± 0.46	0.43	-0.23
928	363208E, 4339365N	1.36 ± 0.22	1.48 ± 0.70	1.14	0.49
929	363148E, 4339399N	1.10 ± 0.20	0.76 ± 0.69	0.72	0.07
C2 SU47					
930	Sample not collected				
931	362994E, 4339159N	0.75 ± 0.11	0.91 ± 0.49	0.67	0.02

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
932	362934E, 4339194N	0.52 ± 0.12	0.72 ± 0.36	0.51	-0.15
933	363014E, 4339194N	1.05 ± 0.17	1.24 ± 0.66	0.93	0.27
934	362954E, 4339228N	0.76 ± 0.15	0.83 ± 0.43	0.64	-0.02
935	Sample not collected				
936	363033E, 4339228N	1.10 ± 0.16	1.11 ± 0.47	0.88	0.23
937	362974E, 4339263N	0.95 ± 0.17	1.06 ± 0.50	0.81	0.15
938	363014E, 4339263N	0.75 ± 0.13	1.06 ± 0.35	0.74	0.08
939	363053E, 4339263N	1.01 ± 0.14	0.94 ± 0.51	0.78	0.12
940	362954E, 4339297N	0.85 ± 0.15	0.86 ± 0.52	0.68	0.03
941	362994E, 4339297N	1.18 ± 0.17	1.54 ± 0.45	1.11	0.45
C2 SU48					
942	363103E, 4339095N	1.20 ± 0.18	1.91 ± 0.51	1.28	0.63
943	363003E, 4339130N	1.11 ± 0.17	1.44 ± 0.43	1.04	0.38
944	363043E, 4339130N	0.97 ± 0.17	1.17 ± 0.51	0.87	0.21
945	363083E, 4339130N	0.23 ± 0.07	0.46 ± 0.31	0.29	-0.37
946	363023E, 4339164N	0.80 ± 0.12	0.72 ± 0.34	0.60	-0.05
947	Sample not collected				
948	363103E, 4339164N	0.51 ± 0.1	0.57 ± 0.42	0.43	-0.22
949	363043E, 4339199N	1.10 ± 0.17	1.21 ± 0.50	0.93	0.27
950	363123E, 4339199N	0.51 ± 0.10	0.74 ± 0.44	0.51	-0.14
951	363063E, 4339233N	0.88 ± 0.18	1.40 ± 0.68	0.94	0.28
952	363103E, 4339233N	0.81 ± 0.12	0.80 ± 0.45	0.64	-0.01
953	363143E, 4339233N	1.04 ± 0.16	1.30 ± 0.62	0.95	0.29
C2 SU49					
954	362914E, 4339030N	0.85 ± 0.14	0.89 ± 0.47	0.70	0.04
955	362946E, 4339030N	0.85 ± 0.16	1.07 ± 0.63	0.78	0.12
956	362963E, 4339058N	1.13 ± 0.19	1.74 ± 0.78	1.18	0.52
957	362914E, 4339087N	1.21 ± 0.23	2.05 ± 0.78	1.35	0.69
958	362979E, 4339087N	0.93 ± 0.14	1.28 ± 0.46	0.90	0.25
959	362898E, 4339115N	1.23 ± 0.18	1.06 ± 0.58	0.91	0.25
960	362930E, 4339115N	1.45 ± 0.22	1.36 ± 0.61	1.12	0.46
961	362963E, 4339115N	0.62 ± 0.13	1.03 ± 0.67	0.68	0.03
962	362914E, 4339143N	0.80 ± 0.16	1.09 ± 0.46	0.77	0.11
963	362946E, 4339143N	0.58 ± 0.11	0.77 ± 0.39	0.55	-0.11
C2 SU50					
964	362942E, 4338911N	0.94 ± 0.15	1.05 ± 0.52	0.80	0.14
965	362960E, 4338942N	0.97 ± 0.17	0.95 ± 0.56	0.77	0.11
966	362942E, 4338973N	1.22 ± 0.19	1.9 ± 0.70	1.28	0.63
967	362978E, 4338973N	1.08 ± 0.22	1.2 ± 1.0	0.92	0.26
968	362924E, 4339004N	1.04 ± 0.13	1.38 ± 0.52	0.99	0.33
969	362960E, 4339004N	1.20 ± 0.16	1.12 ± 0.47	0.92	0.27

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
970	362996E, 4339004N	0.83 ± 0.15	1.02 ± 0.53	0.75	0.09
971	362978E, 4339035N	1.03 ± 0.15	1.11 ± 0.45	0.86	0.20
972	362996E, 4339066N	0.90 ± 0.14	0.94 ± 0.45	0.74	0.08
973	363013E, 4339097N	1.19 ± 0.19	1.15 ± 0.64	0.93	0.28
C2 SU51					
974	362921E, 4338810N	0.78 ± 0.14	0.81 ± 0.56	0.64	-0.02
975	362889E, 4338829N	0.86 ± 0.15	1.12 ± 0.59	0.81	0.15
976	362910E, 4338829N	0.55 ± 0.13	0.81 ± 0.37	0.56	-0.10
977	362932E, 4338829N	0.71 ± 0.13	0.74 ± 0.34	0.58	-0.08
978	362900E, 4338847N	0.49 ± 0.10	0.54 ± 0.34	0.41	-0.24
979	362921E, 4338847N	0.45 ± 0.09	0.47 ± 0.32	0.37	-0.29
980	362910E, 4338865N	0.35 ± 0.10	0.33 ± 0.35	0.27	-0.39
981	362932E, 4338865N	0.84 ± 0.14	0.55 ± 0.52	0.54	-0.12
982	362921E, 4338883N	0.60 ± 0.12	0.66 ± 0.46	0.51	-0.15
983	362932E, 4338901N	0.78 ± 0.14	0.84 ± 0.51	0.65	-0.01
C2 SU52					
984	362885E, 4338725N	1.68 ± 0.22	1.13 ± 0.70	1.09	0.44
985	362849E, 4338746N	0.55 ± 0.12	0.59 ± 0.45	0.46	-0.20
986	362873E, 4338746N	0.51 ± 0.12	0.86 ± 0.48	0.57	-0.09
987	Sample not collected				
988	362861E, 4338767N	0.56 ± 0.16	1.01 ± 0.66	0.65	0.00
989	362885E, 4338767N	0.85 ± 0.16	0.79 ± 0.47	0.65	0.00
990	362873E, 4338788N	0.87 ± 0.17	0.16 ± 0.58	0.37	-0.28
991	362897E, 4338788N	0.49 ± 0.09	0.72 ± 0.43	0.50	-0.16
992	362885E, 4338809N	0.57 ± 0.13	1.07 ± 0.49	0.68	0.03
993	362909E, 4338809N	0.75 ± 0.13	0.69 ± 0.55	0.57	-0.08
C2 SU53					
994	363020E, 4338897N	1.05 ± 0.16	0.97 ± 0.49	0.80	0.15
995	363062E, 4338897N	0.61 ± 0.11	0.78 ± 0.32	0.56	-0.09
996	363041E, 4338934N	1.05 ± 0.17	1.07 ± 0.54	0.85	0.19
997	363083E, 4338934N	1.16 ± 0.15	0.97 ± 0.49	0.84	0.18
998	363062E, 4338970N	1.10 ± 0.16	1.34 ± 0.56	0.99	0.33
999	363083E, 4339006N	1.28 ± 0.21	1.85 ± 0.79	1.28	0.63
1000	363104E, 4339042N	1.28 ± 0.21	1.16 ± 0.66	0.97	0.31
1001	363083E, 4339079N	1.41 ± 0.18	1.86 ± 0.61	1.33	0.68
1002	363125E, 4339079N	1.27 ± 0.20	1.46 ± 0.55	1.10	0.44
1003	363146E, 4339187N	0.94 ± 0.15	1.13 ± 0.43	0.84	0.18
C2 SU54					
1004	363068E, 4338761N	0.95 ± 0.17	1.11 ± 0.42	0.83	0.18
1005	363016E, 4338792N	0.65 ± 0.11	0.73 ± 0.38	0.56	-0.10

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1006	363051E, 4338792N	2.18 ± 0.26	2.8 ± 1.0	2.02	1.37
1007	363086E, 4338792N	0.54 ± 0.12	1.18 ± 0.55	0.72	0.07
1008	362999E, 4338822N	0.39 ± 0.09	0.76 ± 0.38	0.48	-0.18
1009	363034E, 4338822N	0.52 ± 0.09	0.63 ± 0.37	0.47	-0.19
1010	363068E, 4338822N	0.49 ± 0.11	0.77 ± 0.41	0.52	-0.14
1011	363016E, 4338852N	0.48 ± 0.12	0.62 ± 0.34	0.45	-0.21
1012	Sample not collected				
1013	363086E, 4338852N	1.05 ± 0.2	1.01 ± 0.55	0.82	0.16
C2 SU55					
1014	Sample not collected				
1015	362998E, 4338678N	1.17 ± 0.20	1.74 ± 0.68	1.19	0.54
1016	363036E, 4338678N	0.95 ± 0.20	0.94 ± 0.6	0.75	0.10
1017	362978E, 4338711N	0.76 ± 0.13	1.12 ± 0.47	0.77	0.11
1018	363017E, 4338711N	1.56 ± 0.23	1.80 ± 0.63	1.36	0.70
1019	362959E, 4338745N	0.88 ± 0.14	1.07 ± 0.52	0.79	0.13
1020	362998E, 4338745N	0.68 ± 0.11	0.83 ± 0.34	0.61	-0.04
1021	363036E, 4338745N	0.80 ± 0.16	1.22 ± 0.5	0.83	0.17
1022	362978E, 4338778N	0.26 ± 0.09	0.10 ± 0.28	0.14	-0.52
1023	363017E, 4338778N	0.41 ± 0.12	0.21 ± 0.42	0.24	-0.42
C2 SU56					
1024	Sample not collected				
1025	363157E, 4338741N	0.65 ± 0.13	0.48 ± 0.42	0.44	-0.21
1026	363106E, 4338771N	0.71 ± 0.14	0.81 ± 0.51	0.61	-0.04
1027	363140E, 4338771N	0.53 ± 0.11	0.64 ± 0.40	0.47	-0.18
1028	363174E, 4338771N	0.66 ± 0.11	0.64 ± 0.36	0.52	-0.14
1029	363123E, 4338801N	0.79 ± 0.16	0.72 ± 0.38	0.60	-0.06
1030	363157E, 4338801N	1.08 ± 0.19	1.62 ± 0.83	1.11	0.45
1031	363192E, 4338801N	0.96 ± 0.17	1.29 ± 0.51	0.92	0.26
1032	363106E, 4338831N	0.74 ± 0.14	0.53 ± 0.39	0.50	-0.16
1033	363140E, 4338831N	1.04 ± 0.14	1.14 ± 0.52	0.88	0.22
C2 SU57					
1034	363073E, 4338670N	0.72 ± 0.11	0.69 ± 0.48	0.56	-0.09
1035	363107E, 4338670N	0.46 ± 0.11	0.47 ± 0.46	0.37	-0.28
1036	363141E, 4338670N	0.83 ± 0.13	0.92 ± 0.42	0.70	0.05
1037	363055E, 4338700N	0.68 ± 0.11	0.95 ± 0.46	0.67	0.01
1038	363090E, 4338700N	0.55 ± 0.14	1.02 ± 0.48	0.65	0.00
1039	363124E, 4338700N	1.98 ± 0.23	1.33 ± 0.59	1.29	0.63
1040	363158E, 4338700N	0.85 ± 0.13	1.00 ± 0.46	0.75	0.09
1041	363073E, 4338729N	0.94 ± 0.15	0.82 ± 0.51	0.70	0.04
1042	363107E, 4338729N	0.59 ± 0.17	1.06 ± 0.52	0.69	0.03
1043	363141E, 4338729N	1.83 ± 0.23	1.90 ± 0.58	1.49	0.84

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
C2 SU58					
1044	363166E, 4338671N	0.71 ± 0.13	0.69 ± 0.50	0.56	-0.10
1045	363197E, 4338671N	0.50 ± 0.12	0.47 ± 0.65	0.39	-0.27
1046	363227E, 4338671N	0.49 ± 0.09	0.48 ± 0.25	0.39	-0.27
1047	363258E, 4338671N	0.66 ± 0.13	0.41 ± 0.38	0.41	-0.24
1048	363212E, 4338697N	0.64 ± 0.13	0.67 ± 0.43	0.53	-0.13
1049	363242E, 4338697N	0.92 ± 0.15	0.96 ± 0.36	0.75	0.10
1050	363273E, 4338697N	0.67 ± 0.13	0.59 ± 0.40	0.50	-0.16
1051	363303E, 4338697N	0.58 ± 0.13	1.00 ± 0.46	0.65	0.00
1052	363288E, 4338723N	0.73 ± 0.13	1.28 ± 0.53	0.83	0.18
1053	363319E, 4338723N	0.74 ± 0.17	1.14 ± 0.55	0.77	0.12
C2 SU59					
1054	363345E, 4338810N	0.49 ± 0.09	0.65 ± 0.38	0.46	-0.19
1055	363360E, 4338837N	0.51 ± 0.11	0.37 ± 0.45	0.34	-0.31
1056	363376E, 4338864N	0.57 ± 0.10	0.52 ± 0.35	0.43	-0.22
1057	363360E, 4338891N	0.65 ± 0.14	1.10 ± 0.59	0.72	0.07
1058	363392E, 4338891N	0.58 ± 0.11	0.56 ± 0.43	0.45	-0.20
1059	363376E, 4338918N	0.52 ± 0.09	0.46 ± 0.28	0.39	-0.27
1060	363407E, 4338918N	0.53 ± 0.11	1.07 ± 0.46	0.67	0.01
1061	363392E, 4338946N	0.60 ± 0.13	0.76 ± 0.31	0.55	-0.10
1062	363407E, 4338973N	0.35 ± 0.10	0.40 ± 0.27	0.30	-0.35
1063	363423E, 4339000N	0.69 ± 0.14	0.77 ± 0.59	0.59	-0.07
C2 SU60					
1064	363517E, 4339830N	0.77 ± 0.12	0.72 ± 0.45	0.59	-0.06
1065	363595E, 4339830N	0.44 ± 0.11	0.49 ± 0.29	0.37	-0.28
1066	363498E, 4339863N	0.85 ± 0.12	1.10 ± 0.48	0.79	0.14
1067	363614E, 4339863N	0.74 ± 0.16	0.81 ± 0.48	0.62	-0.03
1068	363478E, 4339897N	0.78 ± 0.18	1.11 ± 0.80	0.77	0.12
1069	363517E, 4339897N	0.58 ± 0.13	0.81 ± 0.48	0.57	-0.09
1070	363556E, 4339897N	0.77 ± 0.18	1.15 ± 0.59	0.79	0.13
1071	363595E, 4339897N	0.53 ± 0.10	0.76 ± 0.34	0.53	-0.13
1072	363498E, 4339930N	0.69 ± 0.13	0.61 ± 0.44	0.52	-0.14
1073	363536E, 4339930N	1.02 ± 0.17	1.64 ± 0.67	1.10	0.44
1074	363575E, 4339930N	0.55 ± 0.11	0.68 ± 0.28	0.50	-0.16
1075	363614E, 4339930N	0.49 ± 0.12	0.23 ± 0.37	0.27	-0.38
C2 SU61					
1076	363542E, 4339738N	0.34 ± 0.09	0.64 ± 0.36	0.41	-0.25
1077	363571E, 4339738N	0.37 ± 0.10	0.49 ± 0.43	0.35	-0.31
1078	363600E, 4339738N	0.63 ± 0.15	0.63 ± 0.47	0.50	-0.15
1079	363629E, 4339738N	0.67 ± 0.15	1.24 ± 0.63	0.79	0.14
1080	363527E, 4339764N	1.10 ± 0.18	1.35 ± 0.61	0.99	0.34

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1081	363556E, 4339764N	1.14 ± 0.15	1.42 ± 0.54	1.04	0.38
1082	363585E, 4339764N	0.84 ± 0.12	0.94 ± 0.39	0.72	0.06
1083	363615E, 4339764N	0.43 ± 0.09	0.37 ± 0.43	0.32	-0.34
1084	363542E, 4339789N	1.17 ± 0.20	0.94 ± 0.66	0.83	0.17
1085	363571E, 4339789N	0.80 ± 0.12	0.96 ± 0.36	0.71	0.06
1086	363600E, 4339789N	0.60 ± 0.12	0.66 ± 0.48	0.51	-0.15
1087	363527E, 4339814N	1.12 ± 0.20	1.02 ± 0.58	0.85	0.19
C2 SU62					
1088	363483E, 4339623N	0.49 ± 0.10	0.59 ± 0.23	0.44	-0.22
1089	363509E, 4339623N	0.88 ± 0.17	1.02 ± 0.51	0.77	0.11
1090	363535E, 4339623N	0.31 ± 0.12	0.50 ± 0.28	0.33	-0.32
1091	363496E, 4339646N	0.71 ± 0.16	0.58 ± 0.42	0.51	-0.15
1092	363522E, 4339646N	0.72 ± 0.11	0.99 ± 0.3	0.70	0.04
1093	363550E, 4339646N	0.46 ± 0.16	0.79 ± 0.48	0.52	-0.14
1094	363483E, 4339669N	0.30 ± 0.06	0.32 ± 0.30	0.25	-0.41
1095	363509E, 4339669N	1.17 ± 0.14	1.21 ± 0.49	0.95	0.30
1096	363535E, 4339669N	0.40 ± 0.10	1.00 ± 0.44	0.59	-0.06
1097	363496E, 4339691N	0.78 ± 0.14	0.89 ± 0.58	0.67	0.02
1098	363483E, 4339714N	0.34 ± 0.10	0.45 ± 0.31	0.32	-0.33
1099	Sample not collected				
C2 SU63					
1100	363575E, 4339635N	0.88 ± 0.16	1.29 ± 0.60	0.89	0.23
1101	363607E, 4339635N	0.84 ± 0.16	0.81 ± 0.59	0.66	0.00
1102	363639E, 4339635N	0.77 ± 0.16	1.07 ± 0.61	0.75	0.10
1103	363559E, 4339662N	1.01 ± 0.15	1.30± 0.58	0.94	0.28
1104	363591E, 4339662N	0.90 ± 0.15	0.71 ± 0.52	0.63	-0.02
1105	363623E, 4339662N	1.38 ± 0.22	1.57 ± 0.81	1.19	0.53
1106	363575E, 4339690N	1.16 ± 0.21	1.29 ± 0.59	0.99	0.33
1107	363607E, 4339690N	0.82 ± 0.14	1.38 ± 0.51	0.91	0.25
1108	363639E, 4339690N	0.99 ± 0.17	0.81 ± 0.39	0.71	0.05
1109	363559E, 4339718N	0.62 ± 0.13	0.87 ± 0.36	0.61	-0.05
1110	363591E, 4339718N	0.33 ± 0.07	0.29 ± 0.22	0.25	-0.41
1111	363623E, 4339718N	0.63 ± 0.17	1.01 ± 0.60	0.68	0.02
1112	363512E, 4339512N	0.91 ± 0.18	0.98 ± 0.61	0.76	0.10
C2 SU64					
1113	363540E, 4339512N	0.28 ± 0.07	0.38 ± 0.25	0.27	-0.39
1114	363498E, 4339536N	0.93 ± 0.21	1.42 ± 0.68	0.97	0.31
1115	Sample not collected				
1116	363484E, 4339560N	1.10 ± 0.17	1.17 ± 0.55	0.91	0.25
1117	363512E, 4339560N	0.95 ± 0.21	1.29 ± 0.62	0.91	0.26
1118	Sample not collected				

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1119	363498E, 4339584N	0.75 ± 0.16	0.77 ± 0.53	0.61	-0.05
1120	363526E, 4339584N	1.11 ± 0.19	0.96 ± 0.63	0.82	0.16
1121	363484E, 4339609N	1.21 ± 0.20	1.55 ± 0.78	1.12	0.47
1122	363512E, 4339609N	0.72 ± 0.13	0.72 ± 0.33	0.58	-0.08
1123	363540E, 4339609N	0.32 ± 0.11	0.49 ± 0.40	0.33	-0.32
C2 SU65					
1124	363578E, 4339527N	0.44 ± 0.09	0.53 ± 0.27	0.39	-0.26
1125	363616E, 4339527N	0.57 ± 0.13	0.66 ± 0.41	0.50	-0.16
1126	363653E, 4339527N	0.54 ± 0.11	0.54 ± 0.48	0.43	-0.22
1127	363559E, 4339560N	0.41 ± 0.10	0.32 ± 0.22	0.29	-0.37
1128	363597E, 4339560N	0.48 ± 0.11	0.76 ± 0.44	0.51	-0.15
1129	363634E, 4339560N	0.43 ± 0.10	0.47 ± 0.33	0.36	-0.29
1130	363672E, 4339560N	0.83 ± 0.20	1.22 ± 0.68	0.84	0.18
1131	363578E, 4339592N	1.06 ± 0.22	1.65 ± 0.75	1.12	0.46
1132	363616E, 4339592N	0.73 ± 0.14	0.62 ± 0.51	0.53	-0.12
1133	363653E, 4339592N	0.66 ± 0.13	0.60 ± 0.35	0.50	-0.16
1134	363597E, 4339624N	1.08 ± 0.19	1.36 ± 0.53	0.99	0.33
1135	363634E, 4339624N	0.79 ± 0.13	1.12 ± 0.50	0.78	0.12
C2 SU66					
1136	Sample not collected				
1137	363600E, 4339453N	0.71 ± 0.12	1.07 ± 0.43	0.73	0.07
1138	363563E, 4339472N	0.63 ± 0.12	0.87 ± 0.58	0.61	-0.04
1139	363588E, 4339472N	0.67 ± 0.15	0.65 ± 0.46	0.53	-0.13
1140	363613E, 4339472N	0.69 ± 0.16	0.84 ± 0.48	0.62	-0.04
1141	363638E, 4339472N	0.54 ± 0.11	0.47 ± 0.39	0.40	-0.26
1142	363663E, 4339472N	0.61 ± 0.13	0.58 ± 0.45	0.47	-0.18
1143	363575E, 4339493N	0.27 ± 0.07	0.49 ± 0.26	0.32	-0.34
1144	363600E, 4339493N	0.42 ± 0.11	0.35 ± 0.38	0.30	-0.35
1145	363625E, 4339493N	0.6 ± 0.13	1.05 ± 0.48	0.68	0.03
1146	363650E, 4339493N	0.35 ± 0.11	0.47 ± 0.35	0.33	-0.32
1147	363675E, 4339493N	0.3 ± 0.1	0.35 ± 0.34	0.26	-0.39
C2 SU67					
1148	363576E, 4339403N	0.42 ± 0.12	0.86 ± 0.43	0.54	-0.12
1149	363609E, 4339403N	0.33 ± 0.12	0.65 ± 0.35	0.41	-0.25
1150	363643E, 4339403N	0.37 ± 0.08	0.33 ± 0.42	0.28	-0.38
1151	363676E, 4339403N	0.78 ± 0.17	0.75 ± 0.72	0.61	-0.05
1152	363559E, 4339432N	0.75 ± 0.15	1.14 ± 0.43	0.78	0.12
1153	363592E, 4339432N	0.72 ± 0.15	1.12 ± 0.47	0.76	0.10
1154	363627E, 4339432N	0.37 ± 0.10	0.56 ± 0.25	0.38	-0.27
1155	363659E, 4339432N	0.39 ± 0.08	0.52 ± 0.32	0.37	-0.29
1156	363693E, 4339432N	0.37 ± 0.10	0.30 ± 0.46	0.26	-0.39

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1157	363676E, 4339461N	0.36 ± 0.09	0.59 ± 0.35	0.39	-0.26
1158	363559E, 4339490N	0.33 ± 0.11	0.36 ± 0.44	0.28	-0.38
C2 SU68					
1159	363609E, 4339281N	1.00 ± 0.13	1.22 ± 0.51	0.90	0.24
1160	363640E, 4339281N	1.01 ± 0.19	0.89 ± 0.44	0.75	0.10
1161	363594E, 4339308N	0.60 ± 0.10	0.75 ± 0.34	0.55	-0.11
1162	363625E, 4339308N	0.96 ± 0.17	1.20 ± 0.63	0.88	0.22
1163	363656E, 4339308N	1.01 ± 0.14	1.32 ± 0.49	0.95	0.29
1164	363578E, 4339335N	0.56 ± 0.14	1.52 ± 0.54	0.88	0.23
1165	363609E, 4339335N	0.70 ± 0.16	1.14 ± 0.46	0.76	0.10
1166	363640E, 4339335N	0.76 ± 0.15	1.10 ± 0.67	0.76	0.11
1167	363625E, 4339362N	0.98 ± 0.20	1.37 ± 0.53	0.96	0.30
1168	363656E, 4339362N	0.72 ± 0.14	0.80 ± 0.54	0.61	-0.04
1169	363671E, 4339389N	0.82 ± 0.15	0.90 ± 0.47	0.69	0.04
C2 SU69					
1170	363505E, 4339192N	1.15 ± 0.16	0.91 ± 0.55	0.81	0.15
1171	363545E, 4339192N	1.13 ± 0.16	1.08 ± 0.48	0.88	0.22
1172	363485E, 4339227N	0.58 ± 0.14	2.08 ± 0.64	1.15	0.49
1173	363525E, 4339227N	0.74 ± 0.16	1.00 ± 0.44	0.71	0.05
1174	363565E, 4339227N	0.49 ± 0.10	0.85 ± 0.45	0.56	-0.10
1175	363605E, 4339227N	0.77 ± 0.13	0.69 ± 0.54	0.58	-0.08
1176	363466E, 4339261N	0.94 ± 0.14	1.26 ± 0.51	0.90	0.24
1177	363585E, 4339261N	0.51 ± 0.12	0.76 ± 0.39	0.52	-0.14
1178	363624E, 4339261N	0.79 ± 0.17	0.67 ± 0.59	0.58	-0.08
1179	363446E, 4339295N	0.40 ± 0.13	0.59 ± 0.32	0.41	-0.25
1180	363466E, 4339330N	0.35 ± 0.13	1.38 ± 0.47	0.75	0.09
C2 SU70					
1181	Sample not collected				
1182	363547E, 4339146N	0.73 ± 0.12	1.16 ± 0.43	0.78	0.12
1183	363593E, 4339146N	0.40 ± 0.10	0.37 ± 0.41	0.31	-0.35
1184	363570E, 4339186N	1.18 ± 0.20	0.98 ± 0.47	0.85	0.20
1185	363616E, 4339186N	0.41 ± 0.10	0.80 ± 0.46	0.51	-0.15
1186	363661E, 4339186N	0.65 ± 0.13	0.71 ± 0.52	0.55	-0.11
1187	363707E, 4339186N	0.61 ± 0.13	0.51 ± 0.39	0.44	-0.21
1188	Sample not collected				
1189	Sample not collected				
1190	363776E, 4339225N	1.12 ± 0.15	1.12 ± 0.50	0.90	0.24
1191	363821E, 4339225N	0.64 ± 0.12	0.69 ± 0.49	0.53	-0.12
C2 SU71					
1192	363466E, 4339047N	0.51 ± 0.14	2.11 ± 0.64	1.13	0.48
1193	363543E, 4339047N	0.28 ± 0.10	0.22 ± 0.37	0.20	-0.46

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1194	363480E, 4339080N	1.15 ± 0.19	0.92 ± 0.54	0.81	0.16
1195	363600E, 4339080N	0.34 ± 0.10	0.33 ± 0.33	0.27	-0.39
1196	363639E, 4339080N	0.48 ± 0.11	0.63 ± 0.39	0.45	-0.20
1197	363677E, 4339080N	0.57 ± 0.10	0.9 ± 0.38	0.61	-0.05
1198	363504E, 4339113N	0.38 ± 0.12	2.06 ± 0.49	1.07	0.41
1199	363581E, 4339113N	0.41 ± 0.10	0.57 ± 0.32	0.40	-0.26
1200	363620E, 4339113N	0.27 ± 0.09	0.24 ± 0.26	0.20	-0.45
1201	363658E, 4339113N	1.32 ± 0.19	3.19 ± 0.81	1.91	1.25
1202	363639E, 4339146N	0.62 ± 0.12	0.75 ± 0.58	0.55	-0.10
1356J investigation 1201	363658E, 4339113N	0.57 ± 0.14	2.03 ± 0.61	1.12	0.46
C2 SU72					
1203	363723E, 4338971N	0.39 ± 0.08	0.65 ± 0.28	0.43	-0.23
1204	Sample not collected				
1205	363737E, 4338993N	0.80 ± 0.15	0.91 ± 0.43	0.69	0.03
1206	363764E, 4338993N	0.36 ± 0.09	0.21 ± 0.35	0.22	-0.44
1207	363792E, 4338993N	0.35 ± 0.10	0.40 ± 0.32	0.30	-0.35
1208	363820E, 4338997N	0.39 ± 0.11	0.53 ± 0.39	0.38	-0.28
1209	363847E, 4338993N	0.34 ± 0.10	0.50 ± 0.44	0.34	-0.31
1210	Sample not collected				
1211	363833E, 4339017N	0.54 ± 0.13	0.44 ± 0.52	0.39	-0.27
1212	363861E, 4339017N	0.52 ± 0.12	0.53 ± 0.44	0.42	-0.24
1213	Sample not collected				
C2 SU73					
1214	363378E, 4339712N	1.00 ± 0.14	0.85 ± 0.41	0.73	0.07
1215	363427E, 4339712N	1.41 ± 0.24	1.81 ± 0.91	1.31	0.65
1216	363354E, 4339754N	0.57 ± 0.14	0.78 ± 0.49	0.55	-0.11
1217	363451E, 4339754N	0.85 ± 0.15	0.76 ± 0.50	0.64	-0.02
1218	363378E, 4339796N	1.15 ± 0.20	1.38 ± 0.59	1.02	0.37
1219	Sample not collected				
1220	363354E, 4339838N	0.89 ± 0.14	0.85 ± 0.45	0.69	0.04
1221	363402E, 4339838N	1.14 ± 0.17	1.16 ± 0.57	0.92	0.26
1222	363451E, 4339838N	0.70 ± 0.18	2.09 ± 0.69	1.19	0.53
1223	363329E, 4339881N	0.86 ± 0.17	1.16 ± 0.41	0.82	0.17
C2 SU74					
1224	363384E, 4339524N	0.66 ± 0.15	0.40 ± 0.45	0.41	-0.25
1225	363425E, 4339524N	1.31 ± 0.23	1.45 ± 0.66	1.11	0.45
1226	363404E, 4339560N	0.82 ± 0.14	1.22 ± 0.48	0.84	0.18
1227	363445E, 4339560N	0.61 ± 0.13	0.75 ± 0.46	0.55	-0.11
1228	363384E, 4339595N	0.76 ± 0.13	2.07 ± 0.51	1.20	0.55
1229	363363E, 4339631N	0.65 ± 0.14	0.67 ± 0.36	0.53	-0.13

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1230	363404E, 4339631N	1.02 ± 0.21	0.83 ± 0.67	0.73	0.07
1231	363384E, 4339666N	0.63 ± 0.12	0.45 ± 0.43	0.42	-0.23
1232	363425E, 4339666N	1.29 ± 0.22	1.92 ± 0.74	1.32	0.66
1233	363466E, 4339666N	0.52 ± 0.10	0.62 ± 0.33	0.46	-0.20
C2 SU75					
1234	Sample not collected				
1235	363464E, 4339362N	0.04 ± 0.06	1.94 ± 0.47	0.90	0.24
1236	363445E, 4339396N	0.74 ± 0.13	1.04 ± 0.4	0.73	0.07
1237	363426E, 4339429N	1.25 ± 0.18	1.01 ± 0.57	0.89	0.23
1238	363407E, 4339462N	0.56 ± 0.13	0.62 ± 0.38	0.47	-0.18
1239	Sample not collected				
1240	363483E, 4339462N	0.56 ± 0.10	0.59 ± 0.23	0.46	-0.20
1241	363426E, 4339495N	0.78 ± 0.13	0.88 ± 0.38	0.67	0.01
1242	Sample not collected				
1243	363483E, 4339528N	1.20 ± 0.23	1.28 ± 0.76	1.00	0.34
C2 SU76 B-912 Sub-Floor Soil					
1554 J	0.5, 12.5	1.76 ± 0.30	3.08 ± 0.94	2.01	1.35
1555 J	13.6, 9.5	1.42 ± 0.19	1.27 ± 0.55	1.07	0.41
1556 J	13.6, 13.6	1.61 ± 0.21	1.46 ± 0.43	1.22	0.56
1634	7.7, 5.7	0.53 ± 0.09	0.21 ± 0.28	0.28	-0.38
1635	2.3, 15.1	1.08 ± 0.19	1.18 ± 0.66	0.91	0.25
1636	13.1, 15.1	0.22 ± 0.06	0.33 ± 0.38	0.23	-0.43
1637	7.7, 24.5	0.12 ± 0.08	0.41 ± 0.26	0.23	-0.43
1638	2.3, 34	0.86 ± 0.15	0.75 ± 0.45	0.64	-0.02
1639	13.1, 34	0.34 ± 0.09	0.38 ± 0.28	0.29	-0.37
1640	7.7, 43.4	1.21 ± 0.16	0.90 ± 0.47	0.83	0.17
1641	2.3, 52.8	0.39 ± 0.08	0.30 ± 0.23	0.27	-0.39
1642	13.1, 52.8	0.76 ± 0.15	0.95 ± 0.40	0.69	0.04
1643	7.7, 62.2	0.38 ± 0.09	0.24 ± 0.42	0.24	-0.42
C3 SU6					
1244	362651E, 434261N	1.04 ± 0.16	0.86 ± 0.61	0.75	0.09
1245	362652E, 434221N	0.93 ± 0.20	1.66 ± 0.64	1.08	0.42
1246	362655E, 434217N	0.91 ± 0.18	1.50 ± 0.50	1.00	0.34
1247	362653E, 434211N	0.94 ± 0.14	1.58 ± 0.53	1.04	0.39
1248	362606E, 434186N	1.16 ± 0.20	1.44 ± 0.53	1.05	0.40
1249	362633E, 434190N	1.09 ± 0.16	1.58 ± 0.57	1.09	0.44
1250	362637E, 434192N	1.27 ± 0.21	1.46 ± 0.64	1.10	0.44
1251	362637E, 434196N	1.19 ± 0.21	0.96 ± 0.80	0.85	0.19
1252	362774E, 434200N	1.53 ± 0.20	1.58 ± 0.61	1.25	0.59
1253	362721E, 434232N	0.30 ± 0.10	0.40 ± 0.31	0.29	-0.37

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1254	362724E, 434235N	1.31 ± 0.19	1.18 ± 0.57	0.99	0.33
1255	362726E, 434222N	0.61 ± 0.11	0.67 ± 0.47	0.51	-0.14
1256	362693E, 434252N	0.81 ± 0.12	0.89 ± 0.33	0.68	0.03
1257	Sample not collected				
Judgmental of C3 SU6					
1261	362800E, 4340207N	23.7 ± 1.9	4.0 ± 1.5	9.99	9.33
1262	362796E, 4340206N	8.88 ± 0.75	1.8 ± 1.1	3.88	3.22
1263	362792E, 4340173N	1.18 ± 0.20	1.37 ± 0.68	1.03	0.37
1264	362746E, 4340195N	1.16 ± 0.17	0.89 ± 0.53	0.80	0.15
1265	362613E, 4340198N	1.22 ± 0.19	1.69 ± 0.70	1.19	0.53
1266	362632E, 4340197N	0.97 ± 0.17	1.25 ± 0.58	0.90	0.25
1267	362795E, 4340194N	1.71 ± 0.26	3.01 ± 0.71	1.96	1.30
1268	362836E, 4340227N	1.84 ± 0.25	2.22 ± 0.62	1.64	0.99
1269	362784E, 4340225N	5.39 ± 0.50	1.9 ± 1.0	2.72	2.07
C3 SU3 judgmental investigation samples					
1258	39.19183N, 76.55412W	0.72 ± 0.15	0.81 ± 0.47	0.62	-0.04
1259	39.19125N, 76.58438W	0.68 ± 0.10	0.78 ± 0.35	0.59	-0.07
C1 SU1a/AOC 1 Overburden					
1285	10.8 , 2	0.51 ± 0.10	0.70 ± 0.44	0.49	-0.16
1286	26 , 2	0.57 ± 0.16	0.71 ± 0.38	0.52	-0.14
1287	41.2 , 2	0.64 ± 0.10	0.76 ± 0.41	0.57	-0.09
1288	3.2 , 15.1	0.61 ± 0.11	0.68 ± 0.35	0.52	-0.14
1289	18.4 , 15.1	0.68 ± 0.13	0.90 ± 0.41	0.64	-0.01
1290	33.6 , 15.1	0.60 ± 0.10	0.65 ± 0.35	0.50	-0.15
1291	48.8 , 15.1	0.63 ± 0.12	0.59 ± 0.48	0.49	-0.17
1292	10.8 , 28.3	0.68 ± 0.14	0.38 ± 0.44	0.41	-0.25
1293	26 , 28.3	0.55 ± 0.11	0.45 ± 0.42	0.39	-0.26
1294	41.2 , 28.3	0.63 ± 0.10	0.71 ± 0.32	0.54	-0.12
C1 SU1b / AOC 1 Waste Pit					
1274	362446E, 4339383N	1.06 ± 0.19	0.81 ± 0.62	0.73	0.08
1275	362459E, 4339383N	1.61 ± 0.24	1.72 ± 0.73	1.34	0.68
1276	362452E, 4339383N	1.01 ± 0.13	0.96 ± 0.46	0.78	0.13
1277	362445E, 4339383N	0.22 ± 0.06	0.31 ± 0.23	0.22	-0.44
1278	362438E, 4339383N	0.33 ± 0.08	0.51 ± 0.23	0.35	-0.31
1279	362431E, 4339383N	0.33 ± 0.07	0.23 ± 0.26	0.22	-0.44
1280	362424E, 4339383N	0.67 ± 0.12	0.81 ± 0.44	0.60	-0.06

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1281	362441.5E, 4339377N	0.50 ± 0.11	0.82 ± 0.46	0.55	-0.11
1282	362434.5E, 4339377N	0.64 ± 0.11	0.80 ± 0.46	0.58	-0.07
1283	362427.5E, 4339377N	1.31 ± 0.20	1.12 ± 0.65	0.96	0.30
1284	362421E, 4339382N	1.38 ± 0.21	2.06 ± 0.74	1.41	0.76
C1 SU1 / AOC 1					
1533	362406E, 4339360N	0.18 ± 0.09	0.39 ± 0.47	0.24	-0.42
1534	362422E, 4339360N	0.57 ± 0.10	0.90 ± 0.41	0.61	-0.05
1535	362438E, 4339360N	1.10 ± 0.15	0.54 ± 0.44	0.62	-0.03
1536	362398E, 4339374N	0.42 ± 0.09	0.51 ± 0.37	0.38	-0.28
1537	362414E, 4339932N	0.40 ± 0.07	0.21 ± 0.24	0.23	-0.42
1538	362414E, 4339933N	0.27 ± 0.08	0.16 ± 0.28	0.17	-0.49
1539	362414E, 4339934N	0.49 ± 0.11	0.9 ± 0.51	0.58	-0.08
1540	362414E, 4339935N	0.77 ± 0.12	0.87 ± 0.40	0.66	0.00
1541	362414E, 4339936N	0.70 ± 0.10	0.51 ± 0.34	0.47	-0.18
1542	362414E, 4339937N	0.41 ± 0.09	0.62 ± 0.34	0.42	-0.23
1553 J	362459E, 4339387N	1.02 ± 0.19	1.11 ± 0.54	0.86	0.20
C1 SU2 / AOC 1					
1543	362407E, 4339327N	0.44 ± 0.09	0.47 ± 0.41	0.37	-0.29
1544	362424E, 4339327N	0.56 ± 0.12	0.91 ± 0.64	0.61	-0.05
1545	362400E, 4339342N	0.40 ± 0.10	0.41 ± 0.30	0.32	-0.33
1546	362415E, 4339342N	0.89 ± 0.18	1.23 ± 0.67	0.87	0.21
1547	Sample Not Collected				
1548	362451E, 4339342N	0.52 ± 0.12	0.45 ± 0.44	0.38	-0.27
1549	362442E, 4339357N	0.90 ± 0.14	1.14 ± 0.54	0.83	0.17
1550	362459E, 4339357N	0.69 ± 0.14	1.21 ± 0.45	0.79	0.13
1551	362477E, 4339357N	0.77 ± 0.15	0.80 ± 0.42	0.63	-0.03
1552	362503E, 4339372N	0.61 ± 0.12	0.62 ± 0.38	0.49	-0.16
C1 SU3 / AOC 2				0.00	-0.66
1295	363314E, 4338751N	0.54 ± 0.11	0.41 ± 0.43	0.37	-0.28
1296	363328E, 4338751N	0.57 ± 0.12	0.53 ± 0.41	0.44	-0.22
1297	363343E, 4338751N	0.66 ± 0.13	0.54 ± 0.43	0.47	-0.18
1298	363321E, 4338763N	0.77 ± 0.12	0.57 ± 0.36	0.52	-0.13
1299	363336E, 4338763N	0.57 ± 0.11	0.63 ± 0.39	0.48	-0.17
1300	363328E, 4338776N	0.32 ± 0.12	0.26 ± 0.37	0.23	-0.43
1301	363342E, 4338776N	0.54 ± 0.13	0.35 ± 0.36	0.35	-0.31
1302	363321E, 4338788N	0.18 ± 0.07	0.39 ± 0.25	0.24	-0.42
1303	363336E, 4338788N	0.48 ± 0.12	0.46 ± 0.40	0.37	-0.28
1304	363350E, 4338788N	0.69 ± 0.13	0.84 ± 0.51	0.62	-0.04
1357	363315E, 4338759N	0.66 ± 0.10	0.39 ± 0.32	0.40	-0.25
C1 SU4 / AOC 3					
1305	363061E, 4339043N	0.53 ± 0.12	0.60 ± 0.35	0.46	-0.20

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1306	363054E, 4339054N	0.91 ± 0.16	0.93 ± 0.38	0.74	0.08
1307	363067E, 4339054N	0.74 ± 0.15	1.05 ± 0.56	0.73	0.08
1308	Sample Not Collected				
1309	Sample Not Collected				
1310	363061E, 4339066N	0.90 ± 0.14	1.18 ± 0.44	0.85	0.19
1311	363041E, 4339077N	1.02 ± 0.16	0.53 ± 0.42	0.59	-0.06
1312	363054E, 4339077N	1.05 ± 0.16	0.58 ± 0.48	0.63	-0.03
1313	363067E, 4339077N	0.57 ± 0.17	0.78 ± 0.47	0.55	-0.11
1314	363048E, 4339088N	1.20 ± 0.16	0.76 ± 0.50	0.76	0.10
1315	363061E, 4339088N	0.62 ± 0.14	0.52 ± 0.38	0.45	-0.21
1316	363074E, 4339088N	1.20 ± 0.21	1.64 ± 0.75	1.16	0.50
1317	363054E, 4339100N	0.69 ± 0.17	0.57 ± 0.52	0.50	-0.16
1318	363067E, 4339100N	0.68 ± 0.14	0.85 ± 0.43	0.62	-0.04
1352 J Pre-remediation	363044E, 4339083N	21.2 ± 1.8	2.8 ± 2.0	8.58	7.93
1358 J excavated area	363050E, 4339079N	0.91 ± 0.17	1.19 ± 0.43	0.85	0.20
1359 J excavated area	363039E, 4339077N	1.08 ± 0.19	1.52 ± 0.76	1.06	0.41
1360 J post-RA 1352	363044E, 4339084N	2.32 ± 0.27	1.01 ± 0.76	1.26	0.60
C1 SU5 / AOC 3					
1319	362996E, 4338971N	0.68 ± 0.14	0.63 ± 0.42	0.52	-0.14
1320	363011E, 4338971N	0.98 ± 0.17	0.90 ± 0.57	0.75	0.09
1321	363025E, 4338971N	0.76 ± 0.13	0.79 ± 0.46	0.62	-0.04
1322	362989E, 4338984N	1.32 ± 0.23	1.82 ± 0.75	1.28	0.63
1323	363003E, 4338984N	0.94 ± 0.18	1.34 ± 0.58	0.93	0.28
1324	363018E, 4338984N	0.58 ± 0.14	0.44 ± 0.50	0.40	-0.26
1325	363032E, 4338984N	0.73 ± 0.16	0.64 ± 0.55	0.54	-0.11
1326	362996E, 4338996N	1.30 ± 0.21	1.25 ± 0.67	1.02	0.36
1327	363011E, 4338996N	0.85 ± 0.13	0.38 ± 0.40	0.47	-0.19
1328	363025E, 4338996N	0.86 ± 0.15	0.93 ± 0.50	0.72	0.06
1329	363040E, 4338996N	0.52 ± 0.11	0.49 ± 0.52	0.40	-0.25
1330	363047E, 4339009N	0.41 ± 0.08	0.65 ± 0.37	0.44	-0.22
1331	363054E, 4339022N	0.76 ± 0.20	0.92 ± 0.66	0.68	0.02
1332	363047E, 4339034N	0.60 ± 0.11	0.90 ± 0.43	0.62	-0.04
1353 J Pre-remediation	363017E, 4339009N	4.95 ± 0.48	0.47 ± 0.66	1.92	1.26
1361 J post-RA 1353	363016E, 4339008N	1.14 ± 0.19	1.07 ± 0.61	0.88	0.22
1362 J Pre-remediation	363015E, 4339004N	5.8 ± 0.52	0.84 ± 0.84	2.38	1.73

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1518 J post-RA 1362	363015E, 4339004N	1.65 ± 0.23	1.02 ± 0.59	1.03	0.38
C1 SU6/AOC 3					
1333	362988E, 4338914N	1.85 ± 0.22	1.28 ± 0.53	1.22	0.56
1334	363002E, 4338914N	0.47 ± 0.11	0.27 ± 0.54	0.28	-0.37
1335	362966E, 4338927N	0.67 ± 0.11	0.77 ± 0.39	0.58	-0.08
1336	362966E, 4338927N	1.26 ± 0.23	1.19 ± 0.74	0.98	0.32
1337	362995E, 4338927N	1.68 ± 0.22	1.34 ± 0.67	1.19	0.53
1338	363009E, 4338927N	0.64 ± 0.13	0.75 ± 0.47	0.56	-0.09
1339	362973E, 4338939N	1.17 ± 0.16	1.32 ± 0.52	1.00	0.35
1340	362988E, 4338939N	0.92 ± 0.19	1.28 ± 0.68	0.90	0.24
1341	363002E, 4338939N	0.62 ± 0.12	1.14 ± 0.50	0.73	0.08
1342	362980E, 4338951N	0.97 ± 0.22	0.81 ± 0.79	0.70	0.05
1343	362995E, 4338951N	0.82 ± 0.15	1.17 ± 0.55	0.81	0.16
1344	363009E, 4338951N	0.77 ± 0.14	0.61 ± 0.43	0.54	-0.11
1345	362988E, 4338964N	0.89 ± 0.15	1.17 ± 0.54	0.84	0.18
1346	363002E, 4338964N	0.84 ± 0.14	1.19 ± 0.55	0.83	0.17
C1 SU7/AOC 4					
1406	362944E, 4338834N	0.69 ± 0.12	0.74 ± 0.36	0.57	-0.08
1407	362955E, 4338834N	0.90 ± 0.13	0.84 ± 0.43	0.69	0.04
1408	362939E, 4338843N	0.60 ± 0.11	0.84 ± 0.36	0.59	-0.07
1409	362949E, 4338843N	0.51 ± 0.12	0.49 ± 0.36	0.40	-0.26
1410	362960E, 4338843N	1.62 ± 0.21	1.61 ± 0.61	1.29	0.63
1411	362933E, 4338852N	0.87 ± 0.15	0.72 ± 0.58	0.63	-0.03
1412	362944E, 4338852N	0.68 ± 0.15	0.65 ± 0.47	0.53	-0.13
1413	362955E, 4338852N	0.64 ± 0.13	0.53 ± 0.46	0.46	-0.19
1414	362939E, 4338861N	0.67 ± 0.15	0.94 ± 0.56	0.66	0.00
1415	362944E, 4338871N	0.55 ± 0.15	0.64 ± 0.40	0.48	-0.18
1416	362939E, 4338880N	0.53 ± 0.11	0.06 ± 0.47	0.46	-0.20
1417	362944E, 4338889N	0.57 ± 0.13	0.66 ± 0.53	0.50	-0.16
1418	362955E, 4338889N	0.72 ± 0.12	0.61 ± 0.39	0.53	-0.13
1419	362949E, 4338899N	0.56 ± 0.12	0.68 ± 0.41	0.50	-0.15
1420	362955E, 4338908N	0.65 ± 0.11	0.54 ± 0.36	0.47	-0.19
1421	362960E, 4338917N	0.61 ± 0.12	0.67 ± 0.26	0.51	-0.14
C1 SU8/AOC 4					
1472	362966E, 4338833N	0.90 ± 0.15	0.77 ± 0.53	0.66	0.00
1473	362972E, 4338844N	0.98 ± 0.15	0.69 ± 0.44	0.65	-0.01
1474	362985E, 4338844N	0.10 ± 0.04	0.26 ± 0.14	0.15	-0.50
1475	362978E, 4338855N	0.77 ± 0.13	0.60 ± 0.50	0.54	-0.12
1476	362991E, 4338855N	0.26 ± 0.05	0.19 ± 0.20	0.18	-0.48
1477	362972E, 4338866N	1.06 ± 0.16	0.86 ± 0.47	0.76	0.10

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1478	362985E, 4338866N	0.67 ± 0.16	0.38 ± 0.5	0.40	-0.25
1479	362997E, 4338866N	0.45 ± 0.09	0.42 ± 0.29	0.35	-0.31
1480	362978E, 4338876N	0.75 ± 0.12	0.87 ± 0.40	0.65	0.00
1481	362991E, 4338876N	0.62 ± 0.13	0.52 ± 0.48	0.45	-0.21
1482	363003E, 4338876N	0.73 ± 0.13	0.90 ± 0.31	0.66	0.00
1483	362985E, 4338887N	0.66 ± 0.10	0.48 ± 0.34	0.45	-0.21
1484	Sample Not Collected				
1485	362991E, 4338898N	0.59 ± 0.12	0.44 ± 0.43	0.40	-0.25
1486	363003E, 4338898N	0.63 ± 0.13	0.44 ± 0.34	0.42	-0.24
1487	362997E, 4338909N	0.67 ± 0.13	0.51 ± 0.49	0.46	-0.19
C1 SU9/AOC 4					
1422	362936E, 4338786N	0.79 ± 0.14	1.15 ± 0.40	0.80	0.14
1423	362948E, 4338786N	0.92 ± 0.15	0.53 ± 0.34	0.56	-0.10
1424	362919E, 4338796N	0.81 ± 0.15	0.76 ± 0.47	0.62	-0.03
1425	362930E, 4338796N	0.68 ± 0.13	0.68 ± 0.45	0.54	-0.11
1426	362942E, 4338796N	1.03 ± 0.16	1.26 ± 0.59	0.93	0.27
1427	362953E, 4338796N	0.79 ± 0.14	0.87 ± 0.59	0.67	0.01
1428	362925E, 4338806N	0.72 ± 0.18	1.05 ± 0.64	0.73	0.07
1429	362936E, 4338806N	0.98 ± 0.16	0.42 ± 0.44	0.53	-0.13
1430	362948E, 4338806N	1.30 ± 0.16	0.29 ± 0.30	0.58	-0.08
1431	362959E, 4338806N	0.78 ± 0.15	0.59 ± 0.44	0.54	-0.12
1432	362930E, 4338816N	0.78 ± 0.16	0.98 ± 0.56	0.71	0.06
1433	362942E, 4338816N	0.99 ± 0.17	0.53 ± 0.64	0.58	-0.07
1434	362953E, 4338816N	0.94 ± 0.14	0.77 ± 0.40	0.67	0.02
1435	362965E, 4338816N	0.62 ± 0.16	1.00 ± 0.59	0.67	0.01
1436	362936E, 4338826N	0.73 ± 0.13	0.54 ± 0.35	0.50	-0.16
1437	362948E, 4338826N	0.49 ± 0.13	0.41 ± 0.37	0.36	-0.30
C1 SU10/AOC 5					
1574	362934E, 4338704N	0.63 ± 0.13	0.60 ± 0.47	0.49	-0.17
1575	362926E, 4338717N	0.64 ± 0.15	1.13 ± 0.49	0.73	0.08
1576	362941E,4338717N	0.61 ± 0.11	0.93 ± 0.31	0.63	-0.02
1577	362934E, 4338730N	0.67 ± 0.16	1.33 ± 0.61	0.84	0.18
1578	362949E, 4338730N	0.73 ± 0.14	0.67 ± 0.47	0.56	-0.10
1579	362926E,4338743N	1.01 ± 0.16	0.68 ± 0.44	0.66	0.00
1580	362941E, 4338743N	0.68 ± 0.14	0.91 ± 0.54	0.65	-0.01
1581	362934E, 4338756N	0.82 ± 0.16	0.43 ± 0.45	0.48	-0.18
1582	362949E, 4338756N	0.79 ± 0.14	0.13 ± 0.32	0.33	-0.33
1583	362941E, 4338770N	1.23 ± 0.15	0.58 ± 0.43	0.69	0.03
1584	362934E, 4338783N	1.45 ± 0.22	1.19 ± 0.60	1.04	0.38
1347 J under F-737 pad	Location 1	0.79 ± 0.15	1.06 ± 0.57	0.75	0.10

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1348 J under F-737 pad	Location 2	0.41 ± 0.11	0.44 ± 0.31	0.34	-0.32
1349 J under F-737 pad	Location 3	0.69 ± 0.12	0.55 ± 0.40	0.49	-0.17
1350 J under F-737 pad	Location 4	0.59 ± 0.11	0.38 ± 0.28	0.38	-0.28
1351 J under F-737 pad	Location 5	0.84 ± 0.15	1.11 ± 0.50	0.79	0.14
C1 SU11/AOC 6					
1488	362898E, 4339050N	1.20 ± 0.21	1.68 ± 0.76	1.18	0.52
1489	362890E, 4339064N	1.47 ± 0.24	1.09 ± 0.70	1.00	0.35
1490	362882E, 4339078N	1.54 ± 0.20	1.06 ± 0.53	1.01	0.36
1491	362890E, 4339091N	1.35 ± 0.23	0.90 ± 0.69	0.87	0.22
1492	362882E, 4339105N	2.21 ± 0.28	0.76 ± 0.65	1.11	0.45
1493	362890E, 4339119N	0.88 ± 0.16	1.02 ± 0.59	0.77	0.11
1494	362882E, 4339133N	0.89 ± 0.19	1.29 ± 0.63	0.89	0.24
1495	362898E, 4339133N	0.55 ± 0.14	0.33 ± 0.37	0.34	-0.32
1496	362891E, 4339147N	2.58 ± 0.27	1.53 ± 0.65	1.59	0.93
1497	362898E, 4339161N	0.34 ± 0.10	1.09 ± 0.39	0.61	-0.04
1498 J	362897E, 4339116N	0.91 ± 0.16	1.68 ± 0.72	1.08	0.42
C1 SU12/AOC 9					
1393	363555E, 4339815N	1.33 ± 0.20	1.05 ± 0.52	0.94	0.28
1394	Sample Not Collected				
1395	Sample Not Collected				
1396	363550E, 4339828N	0.41 ± 0.10	0.28 ± 0.23	0.27	-0.39
1397	363561E, 4339826N	0.44 ± 0.09	0.45 ± 0.35	0.36	-0.30
1398	363532E, 4339835N	0.59 ± 0.11	0.64 ± 0.42	0.49	-0.16
1399	363544E, 4339835N	0.82 ± 0.13	0.96 ± 0.63	0.72	0.06
1400	363555E, 4339835N	0.54 ± 0.11	0.46 ± 0.41	0.40	-0.26
1401	363567E, 4339835N	0.50 ± 0.09	0.95 ± 0.37	0.60	-0.05
1402	363538E, 4339845N	0.56 ± 0.11	1.00 ± 0.44	0.65	-0.01
1403	363550E, 4339845N	0.93 ± 0.15	0.83 ± 0.50	0.70	0.04
1404 J	363565E, 4339544N	0.95 ± 0.16	0.51 ± 0.41	0.56	-0.10
C1 SU13/AOC 8					
1499	363449E, 4339591N	0.47 ± 0.11	0.57 ± 0.38	0.42	-0.24
1500	363461E, 4339591N	0.84 ± 0.13	0.78 ± 0.39	0.64	-0.01
1501	363472E, 4339591N	0.94 ± 0.17	1.33 ± 0.62	0.93	0.27
1502	363455E, 4339601N	1.17 ± 0.18	1.32 ± 0.52	1.00	0.35
1503	363467E, 4339601N	0.91 ± 0.17	1.14 ± 0.66	0.83	0.18
1504	363478E, 4339601N	0.95 ± 0.16	0.98 ± 0.57	0.77	0.12
1505	363449E, 4339611N	0.92 ± 0.17	0.76 ± 0.54	0.66	0.01
1506	363461E, 4339611N	0.86 ± 0.14	1.31 ± 0.41	0.89	0.24

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1507	363472E, 4339611N	0.72 ± 0.15	0.96 ± 0.49	0.68	0.03
1508	363455E, 4339621N	1.20 ± 0.18	1.17 ± 0.49	0.95	0.29
1509	363467E, 4339621N	0.98 ± 0.18	0.87 ± 0.52	0.73	0.08
1510	363449E, 4339631N	0.46 ± 0.10	0.16 ± 0.31	0.23	-0.43
1511	363461E, 4339631N	0.44 ± 0.09	0.05 ± 0.34	0.17	-0.48
1512	363472E, 4339631N	0.96 ± 0.16	0.98 ± 0.62	0.78	0.12
1513	363455E, 4339641N	0.63 ± 0.11	0.69 ± 0.34	0.53	-0.13
1514	363467E, 4339641N	0.67 ± 0.11	0.97 ± 0.37	0.67	0.02
1515 J	363445E, 4339617N	0.97 ± 0.16	1.04 ± 0.55	0.81	0.15
C1 SU14/AOC 7					
1459	Sample Not Collected				
1460	363483E, 4339387N	0.38 ± 0.12	1.61 ± 0.55	0.86	0.21
1461	363496E, 4339387N	0.22 ± 0.08	1.51 ± 0.27	0.76	0.11
1462	363460E, 4339399N	0.37 ± 0.07	0.66 ± 0.24	0.43	-0.23
1463	363476E, 4339399N	0.13 ± 0.07	1.42 ± 0.37	0.69	0.03
1464	363490E, 4339399N	0.10 ± 0.07	1.14 ± 0.58	0.55	-0.10
1465	363469E, 4339410N	0.20 ± 0.11	1.10 ± 0.39	0.57	-0.09
1466	Sample Not Collected				
1467	363496E, 4339410N	0.46 ± 0.12	0.95 ± 0.48	0.59	-0.07
1468	363459E, 4339422N	0.21 ± 0.06	0.65 ± 0.26	0.37	-0.29
1469	363476E, 4339422N	0.10 ± 0.05	0.06 ± 0.21	0.06	-0.59
1470	Sample Not Collected				
1471 J	363476E, 4339445N	1.29 ± 0.18	1.56 ± 0.38	1.15	0.50
C1 SU15/AOC 10					
1450	363069E, 4339938N	0.21 ± 0.07	0.19 ± 0.29	0.16	-0.50
1451	363081E, 4339935N	0.34 ± 0.09	0.62 ± 0.28	0.40	-0.26
1452	363063E, 4339948N	0.12 ± 0.05	0.25 ± 0.23	0.16	-0.50
1453	Sample Not Collected				
1454	363057E, 4339958N	1.05 ± 0.19	1.11 ± 0.64	0.87	0.21
1455	363069E, 4339958N	0.31 ± 0.08	0.38 ± 0.30	0.28	-0.38
1456	Sample Not Collected				
1457	363063E, 4339968N	0.82 ± 0.13	0.38 ± 0.39	0.46	-0.20
1458	363075E, 4339968N	0.33 ± 0.07	0.25 ± 0.24	0.23	-0.43
C1 SU16/AOC 11					
1373	362877E, 4340060N	1.18 ± 0.22	1.67 ± 0.57	1.17	0.51
1374	362860E, 4340070N	1.14 ± 0.25	1.05 ± 0.71	0.87	0.21
1375	362871E, 4340070N	1.17 ± 0.21	1.85 ± 0.73	1.24	0.59
1376	362882E, 4340070N	1.14 ± 0.20	1.67 ± 0.66	1.15	0.50
1377	362854E, 4340079N	1.03 ± 0.19	1.38 ± 0.53	0.98	0.33
1378	362866E, 4340079N	0.78 ± 0.15	0.68 ± 0.50	0.58	-0.08
1379	362877E, 4340079N	1.71 ± 0.24	1.42 ± 0.73	1.24	0.58

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1380	362888E, 4340079N	0.57 ± 0.10	0.62 ± 0.46	0.48	-0.18
1381	362860E, 4340089N	0.95 ± 0.15	1.12 ± 0.47	0.84	0.18
1382	362871E, 4340089N	1.13 ± 0.24	1.81 ± 0.89	1.21	0.56
1383	362882E, 4340089N	4.17 ± 0.40	1.29 ± 0.87	2.02	1.37
1517 J post-RA 1383	362882E, 4340089N	1.80 ± 0.24	1.51 ± 0.63	1.31	0.65
1384	362894E, 4340089N	1.26 ± 0.18	1.74 ± 0.45	1.23	0.57
1385	362866E, 4340099N	0.81 ± 0.13	0.62 ± 0.41	0.56	-0.10
1386	362877E, 4340099N	1.51 ± 0.24	1.34 ± 0.69	1.13	0.47
1387	362888E, 4340099N	2.23 ± 0.26	1.60 ± 0.69	1.50	0.84
1388	362899E, 4340099N	1.23 ± 0.20	1.86 ± 0.62	1.27	0.61
1389	362871E, 4340109N	0.94 ± 0.17	1.28 ± 0.57	0.91	0.25
1390	362882E, 4340109N	1.12 ± 0.17	0.94 ± 0.52	0.81	0.16
C1 SU17/AOC 12					
1363	362900E, 4340134N	0.76 ± 0.15	0.46 ± 0.54	0.47	-0.19
1364	362915E, 4340137N	0.91 ± 0.14	0.59 ± 0.54	0.58	-0.07
1365	362878E, 4340148N	0.72 ± 0.13	0.58 ± 0.56	0.51	-0.14
1366	362893E, 4340150N	1.36 ± 0.19	1.16 ± 0.58	1.00	0.34
1367	362908E, 4340150N	1.99 ± 0.22	1.90 ± 0.55	1.55	0.89
1368	362923E, 4340150N	1.18 ± 0.25	1.60 ± 0.85	1.13	0.48
1369	362870E, 4340163N	1.59 ± 0.20	1.58 ± 0.60	1.27	0.61
1370	362885E, 4340163N	1.08 ± 0.18	0.93 ± 0.49	0.80	0.14
1371	362900E, 4340163N	1.05 ± 0.19	1.76 ± 0.54	1.16	0.51
1372	362878E, 4340176N	1.20 ± 0.17	0.76 ± 0.51	0.76	0.10
1391 J within excavation	362876E, 4040156N	2.17 ± 0.27	0.92 ± 0.59	1.17	0.51
1392 J within excavation	362870E, 4340160N	1.52 ± 0.23	1.74 ± 0.68	1.32	0.66
C1 SU18/B-911 Loading Dock Soil					
1557	2.7, 2.2	1.08 ± 0.19	1.16 ± 0.65	0.90	0.24
1558	0.6, 6.3	1.26 ± 0.16	0.79 ± 0.50	0.79	0.14
1559	2.7, 10.3	1.26 ± 0.18	1.31 ± 0.59	1.03	0.37
1560	0.6, 14.4	1.21 ± 0.19	1.18 ± 0.48	0.95	0.30
1561	2.7, 18.4	1.88 ± 0.28	2.66 ± 0.84	1.86	1.20
1644 J post-RA 1561	2.7, 18.4	1.24 ± 0.18	1.31 ± 0.68	1.02	0.37
1562	0.6, 22.4	1.28 ± 0.20	1.41 ± 0.67	1.08	0.43
1563	2.7, 26.5	1.73 ± 0.20	1.63 ± 0.64	1.34	0.68
1564	0.6, 30.5	1.37 ± 0.17	1.42 ± 0.54	1.12	0.46
1565	2.7, 34.6	0.63 ± 0.13	1.44 ± 0.62	0.87	0.22

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1566	0.6, 38.6	1.14 ± 0.17	0.69 ± 0.57	0.71	0.05
1567	2.7, 42.7	1.24 ± 0.16	1.17 ± 0.45	0.96	0.30
1568	0.6, 46.7	1.28 ± 0.20	1.26 ± 0.72	1.01	0.36
1569	2.7, 50.7	0.88 ± 0.13	1.10 ± 0.31	0.80	0.15
1570	0.6, 54.8	0.96 ± 0.16	0.61 ± 0.42	0.61	-0.05
1571	2.7, 58.8	2.32 ± 0.28	4.47 ± 0.82	2.83	2.18
1585 J post-RA 1571	2.7, 58.8	0.96 ± 0.15	1.09 ± 0.48	0.83	0.17
1572	0.6, 62.9	1.19 ± 0.19	1.47 ± 0.69	1.08	0.42
1573	2.7, 66.9	1.27 ± 0.16	1.34 ± 0.37	1.05	0.39
C1 SU19/Waste Staging Area					
1623	363326E, 4339719N	0.72 ± 0.11	0.95 ± 0.39	0.68	0.02
1624	363339E, 4339719N	0.39 ± 0.10	0.58 ± 0.25	0.40	-0.26
1625	363319E, 4339731N	0.58 ± 0.13	0.62 ± 0.35	0.48	-0.17
1626	363333E, 4339731N	0.38 ± 0.09	1.12 ± 0.39	0.64	-0.02
1627	363346E, 4339731N	1.19 ± 0.20	1.44 ± 0.66	1.06	0.41
1628	363360E, 4339731N	0.78 ± 0.14	1.32 ± 0.51	0.87	0.21
1629	363326E, 4339743N	0.25 ± 0.09	1.01 ± 0.38	0.55	-0.11
1630	363339E, 4339743N	0.59 ± 0.11	0.72 ± 0.56	0.53	-0.13
1631	363353E, 4339743N	1.33 ± 0.20	1.61 ± 0.57	1.19	0.53
1632	363333E, 4339754N	0.35 ± 0.13	1.41 ± 0.54	0.76	0.11
1633	363346E, 4339754N	0.42 ± 0.08	0.47 ± 0.28	0.36	-0.30
C1 SU20/AOC 20					
1438	362795E, 4340209N	1.00 ± 0.16	1.13 ± 0.61	0.86	0.20
1439	362811E, 4340209N	0.34 ± 0.13	0.69 ± 0.52	0.43	-0.23
1440	Sample Not Collected				
1441	362788E, 4340222N	0.87 ± 0.14	1.00 ± 0.43	0.75	0.10
1442	362803E, 4340222N	0.78 ± 0.15	1.15 ± 0.49	0.79	0.14
1443	362818E, 4340222N	0.91 ± 0.16	1.16 ± 0.69	0.84	0.18
1444	362834E, 4340222N	0.56 ± 0.14	0.52 ± 0.42	0.43	-0.23
1445	Sample Not Collected				
1446	362780E, 4340236N	1.10 ± 0.20	1.33 ± 0.61	0.98	0.33
1447	362826E, 4340236N	0.65 ± 0.15	1.24 ± 0.48	0.79	0.13
1448	362841E, 4340236N	0.61 ± 0.14	1.19 ± 0.59	0.75	0.09
1449	362857E, 4340236N	0.38 ± 0.12	0.59 ± 0.40	0.40	-0.26
1405 J pre-remediation	362785E, 4340216N	4.58 ± 0.48	1.7 ± 1.1	2.35	1.70
1516 J post-RA 1405	362783E, 4340216N	2.09 ± 0.23	0.94 ± 0.54	1.15	0.49
C1 SU21/AOC 21					
1609	362937E, 4339510N	0.8 ± 0.15	1.22 ± 0.39	0.83	0.17

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1610	362949E, 4339510N	0.88 ± 0.18	0.91 ± 0.45	0.72	0.06
1611	362943E, 4339520N	3.23 ± 0.37	0.97 ± 0.81	1.55	0.90
1612	362954E, 4339520N	1.00 ± 0.14	0.94 ± 0.50	0.77	0.12
1613	362949E, 4339530N	3.65 ± 0.39	1.14 ± 0.90	1.78	1.12
1614	362960E, 4339530N	1.01 ± 0.17	1.10 ± 0.54	0.85	0.19
1615	362954E, 4339559N	1.10 ± 0.15	1.03 ± 0.53	0.85	0.19
1616	362965E, 4339559N	2.06 ± 0.27	1.33 ± 0.77	1.31	0.66
1617	362960E, 4339569N	0.99 ± 0.20	1.01 ± 0.67	0.80	0.14
1618	362971E, 4339569N	1.03 ± 0.20	1.57 ± 0.65	1.07	0.41
1619	362965E, 4339578N	1.32 ± 0.21	1.11 ± 0.63	0.96	0.30
1620	362977E, 4339578N	1.04 ± 0.17	1.09 ± 0.55	0.85	0.20
1621 J N. Excavation	362965E, 4339559N	2.05 ± 0.23	0.91 ± 0.56	1.12	0.46
1622 J S. Excavation	362954E, 4339532N	0.95 ± 0.15	1.19 ± 0.73	0.87	0.21
C1 SU22/B-911 Sub-floor soil					
1519	2.2, 2.3	1.44 ± 0.21	1.27 ± 0.58	1.07	0.42
1520	11.4, 2.3	0.60 ± 0.11	0.54 ± 0.32	0.45	-0.20
1521	6.8, 10.2	1.31 ± 0.20	1.58 ± 0.61	1.17	0.51
1522	2.2, 18.2	1.44 ± 0.22	1.43 ± 0.75	1.15	0.49
1523	11.4, 18.2	0.56 ± 0.12	0.42 ± 0.49	0.38	-0.27
1524	6.8, 26.1	1.4 ± 0.19	1.17 ± 0.53	1.01	0.36
1525	2.2, 34.1	1.14 ± 0.21	1.32 ± 0.67	0.99	0.34
1526	11.4, 34.1	1.66 ± 0.23	1.09 ± 0.59	1.07	0.41
1527	6.8, 42.1	1.33 ± 0.19	1.52 ± 0.57	1.15	0.49
1528	2.2, 50	1.75 ± 0.23	1.86 ± 0.55	1.45	0.79
1529	11.4, 50	1.48 ± 0.22	1.56 ± 0.53	1.22	0.56
1530	6.8, 58	1.60 ± 0.20	1.64 ± 0.55	1.30	0.64
1531	2.2, 65.9	1.15 ± 0.22	1.05 ± 0.62	0.87	0.22
1532	11.4, 65.9	0.96 ± 0.16	1.45 ± 0.48	0.99	0.33
C1 SU23/AOC 5					
1597	362888E, 4338729N	0.55 ± 0.10	0.57 ± 0.35	0.45	-0.21
1598	362893E, 4338743N	0.46 ± 0.11	0.65 ± 0.38	0.45	-0.20
1599	362905E, 4338758N	0.66 ± 0.12	0.56 ± 0.48	0.48	-0.17
1600	362922E, 4338758N	0.65 ± 0.11	0.58 ± 0.42	0.49	-0.17
1601	362897E, 4338772N	0.67 ± 0.16	0.91 ± 0.70	0.64	-0.01
1602	362913E, 4338772N	0.56 ± 0.10	0.28 ± 0.29	0.32	-0.34
1603	362930E, 4338772N	0.68 ± 0.14	0.54 ± 0.44	0.48	-0.18
1604	362888E, 4338787N	0.62 ± 0.13	0.63 ± 0.34	0.50	-0.16
1605	362905E, 4338787N	0.78 ± 0.15	0.56 ± 0.41	0.52	-0.13

Table B-9: FSS Survey Units and Radionuclide Concentration Levels Curtis Bay Depot Curtis Bay, Maryland					
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**	**SOR Net**
1606	362922E, 4338787N	1.11 ± 0.17	0.96 ± 0.65	0.82	0.16
1607	362897E, 4338753N	1.31 ± 0.17	1.38 ± 0.54	1.08	0.42
1608 J	362933E, 4338775N	4.20 ± 0.43	0.66 ± 0.84	1.75	1.09
C1 SU24/AOC 5					
1586	362926E, 4338681N	0.91 ± 0.17	1.58 ± 0.64	1.03	0.38
1587	362895E, 4338692N	0.57 ± 0.14	0.53 ± 0.50	0.44	-0.22
1588	362907E, 4338692N	0.78 ± 0.16	1.21 ± 0.50	0.82	0.16
1589	362920E, 4338692N	0.89 ± 0.14	0.96 ± 0.50	0.74	0.09
1590	362933E, 4338692N	0.59 ± 0.15	0.75 ± 0.54	0.54	-0.11
1591	362888E, 4338703N	0.84 ± 0.14	0.73 ± 0.48	0.62	-0.04
1592	362901E, 4338703N	0.66 ± 0.16	0.99 ± 0.5	0.68	0.02
1593	362914E, 4338703N	1.46 ± 0.19	0.62 ± 0.58	0.79	0.13
1594	362926E, 4338703N	0.64 ± 0.12	0.78 ± 0.40	0.58	-0.08
1595	362882E, 4338714N	0.64 ± 0.12	0.72 ± 0.44	0.55	-0.11
1596	362895E, 4338714N	1.10 ± 0.17	0.82 ± 0.49	0.75	0.10

[a]Global positioning coordinates are NAD 27 UTM Zone 18
[b]Th-232 quantified from Ac-228 911 keV photopeak, uncertainties represent total propagated uncertainties at the 95% confidence interval.
[c]U-238 quantified from Th-234 63 keV photopeak, uncertainties represent total propagated uncertainties at the 95% confidence interval.
[d]J = Judgmental samples

Table B-10: Class 3 FSS Survey Units Soil Concentrations Curtis Bay Depot Curtis Bay, Maryland				
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**
C3 SU1				
127	39.20264N, 76.58685W	1.26 ± 0.16	1.24 ± 0.49	0.34
128	39.20312N, 76.58765W	0.82 ± 0.16	1.22 ± 0.56	0.18
129	39.20331N, 76.58476W	0.56 ± 0.11	1.02 ± 0.26	0.00
130	39.20398N, 76.58590W	1.15 ± 0.19	1.40 ± 0.62	0.38
131	39.20435N, 76.58609W	0.66 ± 0.10	0.84 ± 0.42	-0.05
132	39.20469N, 76.58653W	0.44 ± 0.11	0.64 ± 0.39	-0.21
133	39.20517N, 76.58712W	0.70 ± 0.13	0.82 ± 0.46	-0.04
134	39.20548N, 76.58667W	0.68 ± 0.13	0.86 ± 0.44	-0.03
135	39.20586N, 76.58687W	0.67 ± 0.13	1.32 ± 0.49	0.17
136	39.20520N, 76.58589W	0.58 ± 0.11	0.83 ± 0.43	-0.08
C3 SU2				
117	39.19067N, 76.58803W	1.44 ± 0.20	2.00 ± 0.80	0.75
118	39.19034N, 76.58890W	0.75 ± 0.16	0.89 ± 0.51	0.01
119	39.19163N, 76.58941W	0.56 ± 0.10	0.49 ± 0.35	-0.24
120	39.19230N, 76.58800W	0.93 ± 0.16	0.97 ± 0.52	0.11
121	39.19273N, 76.58856W	0.64 ± 0.11	0.56 ± 0.53	-0.18
122	39.19380N, 76.58836W	0.71 ± 0.10	0.55 ± 0.35	-0.16
123	39.19380N, 76.58869W	0.72 ± 0.14	0.71 ± 0.44	-0.09
124	39.19471N, 76.58998W	0.90 ± 0.16	1.13 ± 0.36	0.17
125	39.19541N, 76.59001W	0.77 ± 0.14	0.84 ± 0.43	-0.01

Table B-10: Class 3 FSS Survey Units Soil Concentrations Curtis Bay Depot Curtis Bay, Maryland				
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**
126	39.19531N, 76.58966W	0.73 ± 0.16	1.21 ± 0.51	0.15
C3 SU3				
137	39.18876N, 76.58385W	0.77 ± 0.13	0.77 ± 0.46	-0.04
138	39.19054N, 76.58373W	1.03 ± 0.14	1.07 ± 0.40	0.18
139	39.19079N, 76.58203W	0.84 ± 0.14	0.94 ± 0.37	0.06
140	39.19173N, 76.58417W	1.98 ± 0.34	2.6 ± 1.6	1.21
141	39.19235N, 76.58441W	1.20 ± 0.22	1.16 ± 0.75	0.28
142	39.19213N, 76.58303W	0.98 ± 0.20	1.48 ± 0.80	0.35
143	39.19232N, 76.58159W	0.57 ± 0.12	0.79 ± 0.39	-0.10
144	39.19338N, 76.58297W	1.04 ± 0.19	0.95 ± 0.56	0.13
145	39.19370N, 76.58250W	0.92 ± 0.16	0.91 ± 0.38	0.07
146	39.19389N, 76.58312W	1.10 ± 0.16	0.67 ± 0.49	0.03
147	39.19343N, 76.58250W	1.09 ± 0.16	1.14 ± 0.53	0.24
C3 SU4				
58	39.18742N, 76.58521W	0.35 ± 0.07	0.40 ± 0.29	-0.35
59	39.18749N, 76.58442W	0.33 ± 0.09	0.39 ± 0.27	-0.37
60	39.18769N, 76.58461W	0.59 ± 0.11	0.65 ± 0.42	-0.16
61	39.18802N, 76.58340W	0.48 ± 0.10	0.39 ± 0.28	-0.31
62	39.18863N, 76.58141W	0.53 ± 0.11	0.58 ± 0.34	-0.21
63	39.18931N, 76.58005W	0.21 ± 0.09	0.12 ± 0.23	-0.53
64	39.18980N, 76.57977W	0.29 ± 0.07	0.31 ± 0.42	-0.42
65	39.19092N, 76.57634W	0.38 ± 0.07	0.39 ± 0.25	-0.35

Table B-10: Class 3 FSS Survey Units Soil Concentrations Curtis Bay Depot Curtis Bay, Maryland				
Sample ID	**Coordinate E, N[a] (X, Y)**	**Th-232[b] (pCi/g)**	**U-238[c] (pCi/g)**	**SOR Gross**
66	39.19057N, 76.57845W	0.29 ± 0.08	0.39 ± 0.25	-0.38
67	39.19098N, 76.57843W	0.33 ± 0.09	0.33 ± 0.30	-0.39
C3 SU5				
375	39.19365N, 76.57687W	0.36 ± 0.10	0.36 ± 0.32	-0.37
376	39.19389N, 76.57669W	0.42 ± 0.12	0.22 ± 0.33	-0.41
377	39.19398N, 76.57805W	0.34 ± 0.07	0.35 ± 0.22	-0.38
378	39.19458N, 76.57806W	1.07 ± 0.17	0.99 ± 0.64	0.16
379	39.19479N, 76.57783W	0.52 ± 0.11	0.57 ± 0.36	-0.22
380	39.19450N, 76.57792W	0.77 ± 0.13	1.13 ± 0.51	0.12
381	39.19626N, 76.57794W	0.77 ± 0.13	0.75 ± 0.40	-0.05
382	39.19641N, 76.57795W	0.89 ± 0.19	1.33 ± 0.57	0.25
383	39.19697N, 76.57816W	0.81 ± 0.11	0.66 ± 0.35	-0.08
384	39.19866N, 76.57918W	1.10 ± 0.17	1.81 ± 0.57	0.55

[a]Global positioning coordinates are WGS 84 Lat/Lon
[b]Th-232 quantified from Ac-228 911 keV photopeak, uncertainties represent total propagated uncertainties at the 95% confidence level.
[c]U-238 quantified from Th-234 63 keV photopeak, uncertainties represent total propagated uncertainties at the 95% confidence level.

Table B-11: Background Reference Area Data Curtis Bay Depot Curtis Bay, Maryland			
Background Reference Area			
Sample ID	Th-232	U-238	Unity
0431S0043	0.72	0.73	0.58
0431S0044	0.51	0.34	0.33
0431S0045	0.5	0.74	0.51
0431S0046	0.77	0.83	0.64
0431S0047	1.32	0.92	0.87
0431S0048	1.24	1.1	0.93
0431S0049	1.12	0.97	0.83
0431S0050	0.81	1.21	0.83
0431S0051	0.71	0.74	0.58
0431S0052	0.91	1.18	0.85
0431S0053	0.58	0.49	0.42
0431S0054	0.60	0.84	0.59
0431S0055	0.71	0.79	0.60
0431S0056	0.73	0.69	0.57
0431S0057	0.91	0.95	0.75
DCGLs	2.90	2.20	
Mean	0.81	0.83	0.66
Sigma	0.25	0.24	0.14

APPENDIX C:
REFERENCES

REFERENCES

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RADIOLOGICAL FINAL STATUS SURVEY OF THE CURTIS BAY DEPOT CURTIS BAY, MARYLAND

APPENDIX D THROUGH F
VOLUME 2 OF 3

T. J. Vitkus

Prepared for the
Defense National Stockpile Center
of the
Defense Logistics Agency

ORISE
Oak Ridge Institute for Science and Education

Approved for public release; further dissemination unlimited.

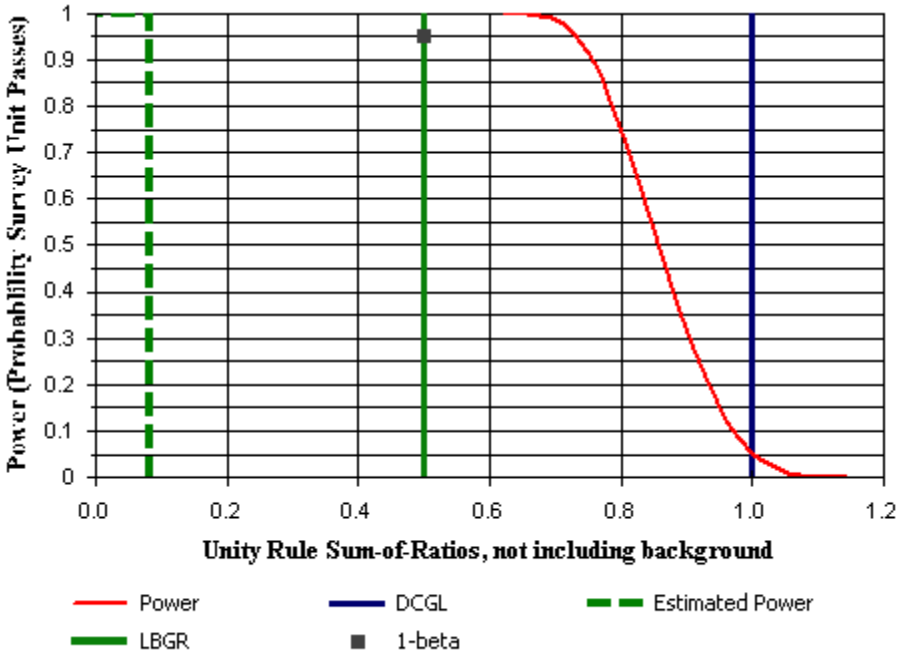
APPENDIX D:
LAND SURVEY UNIT DQOs

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU2 and C1 SU1		
Comments:			
Area (m²):	2,671 and 2,271	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.18
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.5	Estimated Conc. (SOR):	0.08
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	10
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9

Note, actual scan MDC=4.0 2.9 reflects combined MDC

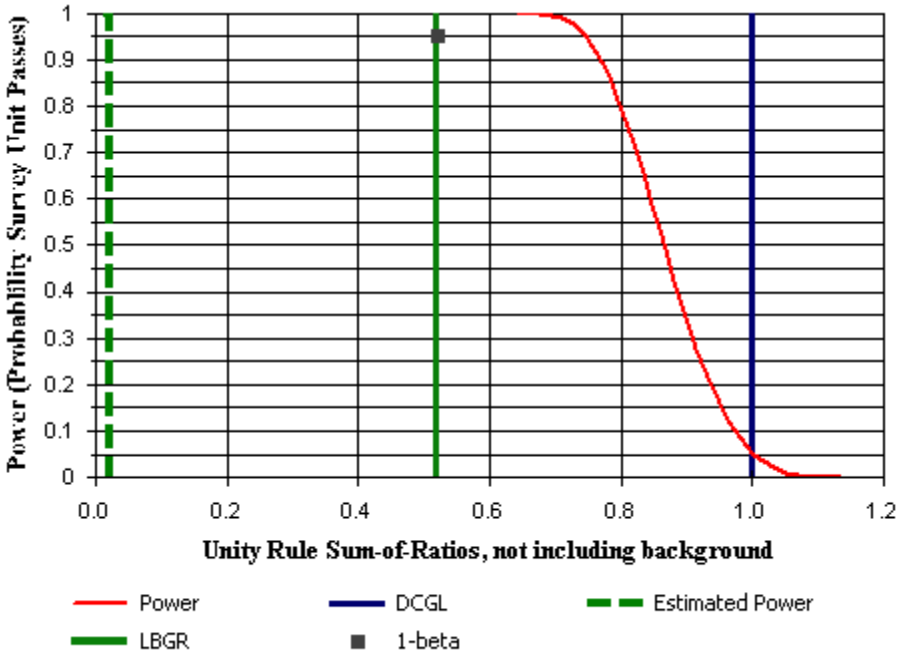
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.9 ± 0.33	0.81 ± 0.25
U-238	0.94 ± 0.3	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU1a AOC soil overburden		
Comments:			
Area (m²):	2,000	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.17
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.52	Estimated Conc. (SOR):	0.02
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	10
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9

Note, actual Scan MDC=4.5 2.9 reflects combined MDC

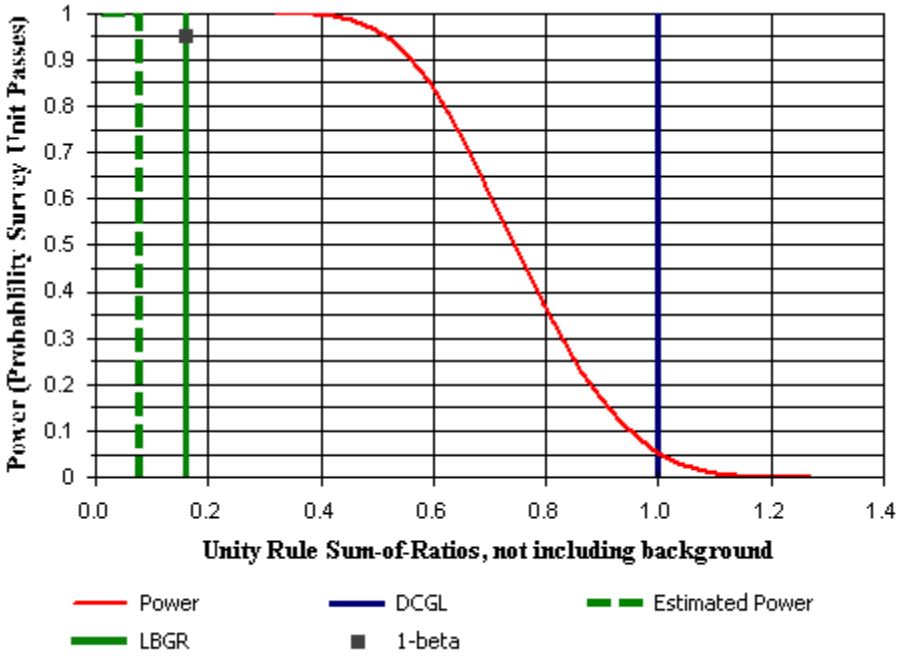
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.72 ± 0.35	0.65 ± 0.32
U-238	0.62 ± 0.21	0.63 ± 0.27

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU1b AOC 1 Waste Pit Excavation		
Comments:			
Area (m²):	456	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.34
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.16	Estimated Conc. (SOR):	0.08
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)	
Th-232	2.90	N/A	N/A	N/A	2.8	
U-238	2.20	N/A	N/A	N/A	2.9	Actual scan MDC = 4 Set to 2.9 to equal the mixture MDC

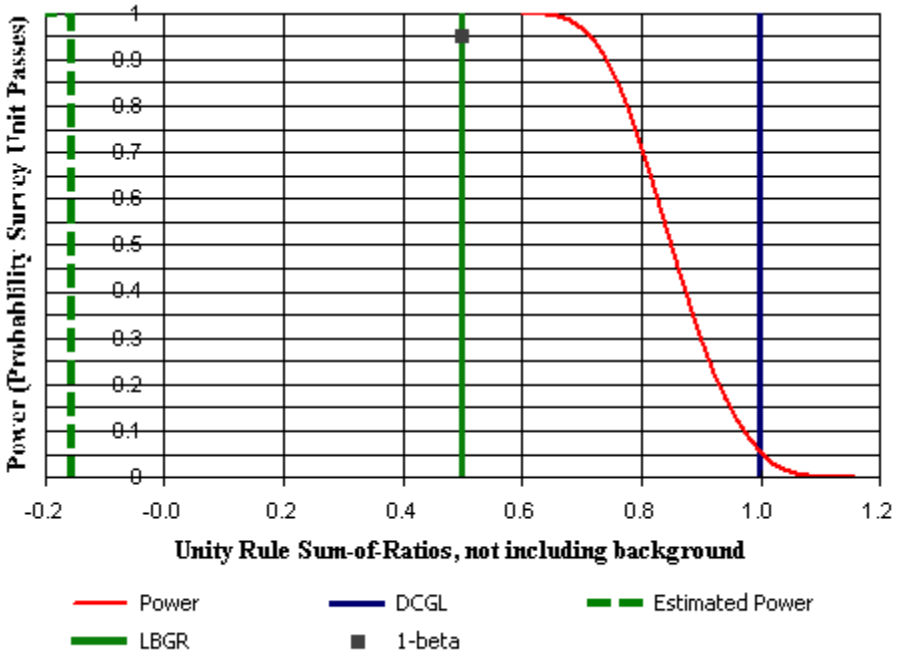
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.03 ± 0.6	0.81 ± 0.25
U-238	0.83 ± 0.6	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU3 AOC-2		
Comments:			
Area (m²):	1,743	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.2
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.5	Estimated Conc. (SOR):	-0.16
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)	
Th-232	2.90	N/A	N/A	N/A	2.8	
U-238	2.20	N/A	N/A	N/A	2.9	Note, actual U MDC = 4.5, Reflects Combined MDC

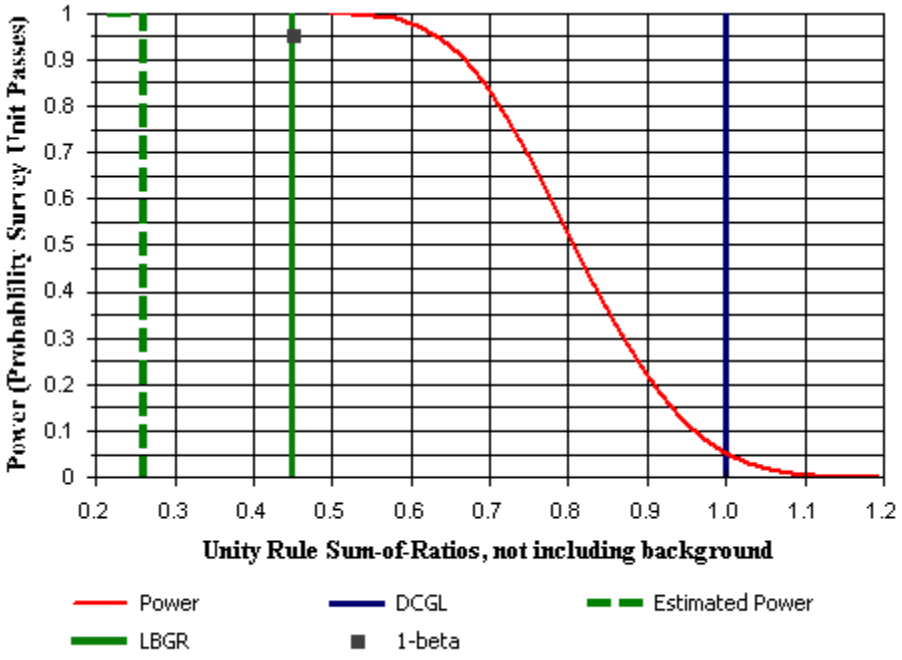
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.5 ± 0.2	0.81 ± 0.25
U-238	0.72 ± 0.39	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU4 through 6/AOC 3		
Comments:			
Area (m²):	2,600	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.45	Estimated Conc. (SOR):	0.26
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	13
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Note Actual U Scan MDC = 4.5, MDC noted represents combined MDC of mixture

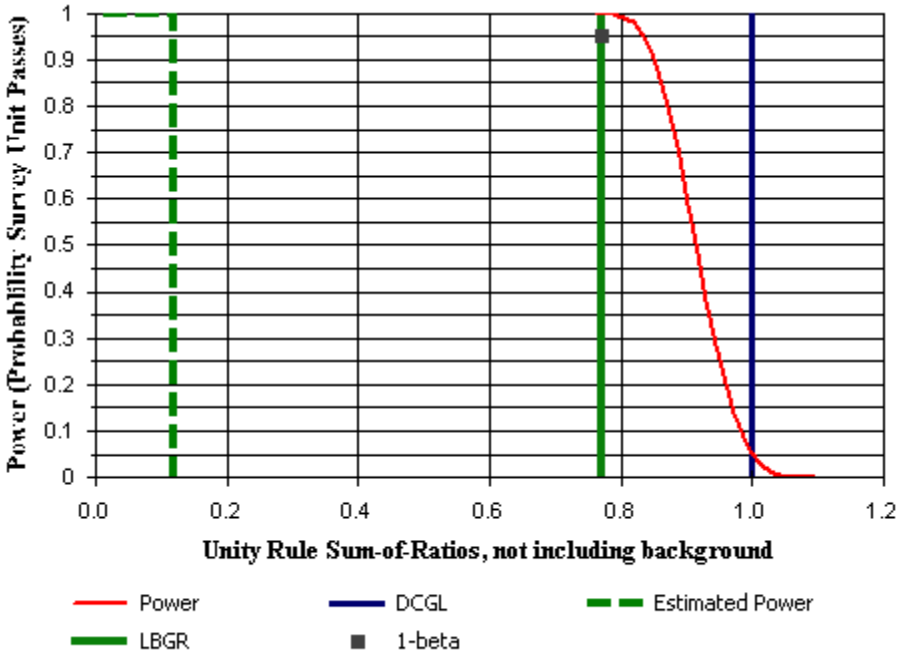
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.25 ± 0.51	0.81 ± 0.25
U-238	1.07 ± 0.49	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU7 through 9/AOC-4		
Comments:	Survey unit area is largest area of the 3 SUs		
Area (m²):	2,148	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.14
DCGL (SOR):	1	Sample Size (N/2):	16
LBGR (SOR):	0.77	Estimated Conc. (SOR):	0.12
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	16
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Note U MDC actual = 4.5 MDC noted represents combined MDC of mixture

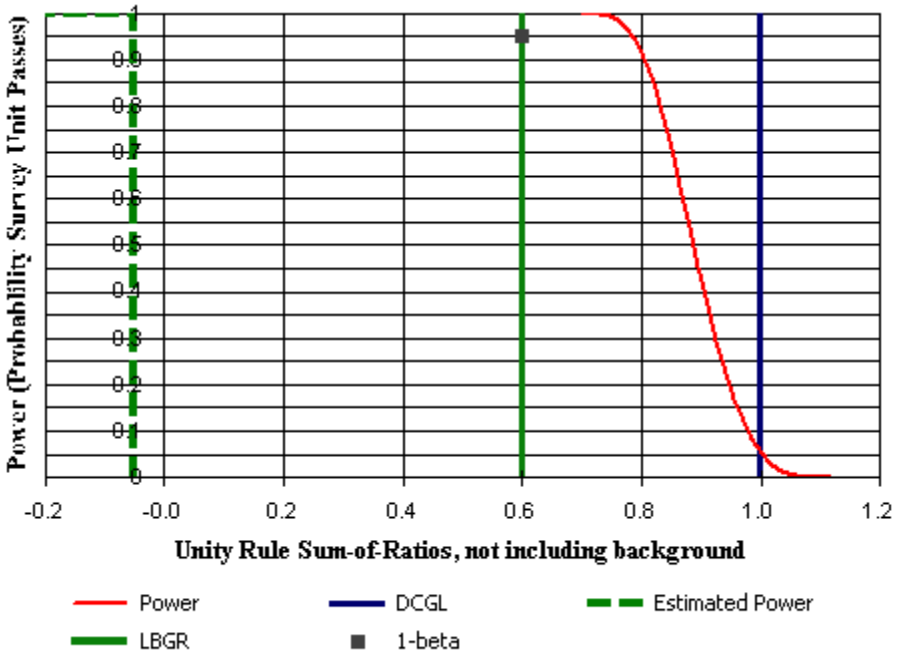
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.43 ± 0.22	0.81 ± 0.25
U-238	0.62 ± 0.11	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU10, 23, and 24		
Comments:	Survey unit area is the largest of the 3 SUs		
Area (m²):	2,030	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.15
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.6	Estimated Conc. (SOR):	-0.05
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual U-238 scan MDC = 4 pCi/g scan MDC set to that of the mixture.

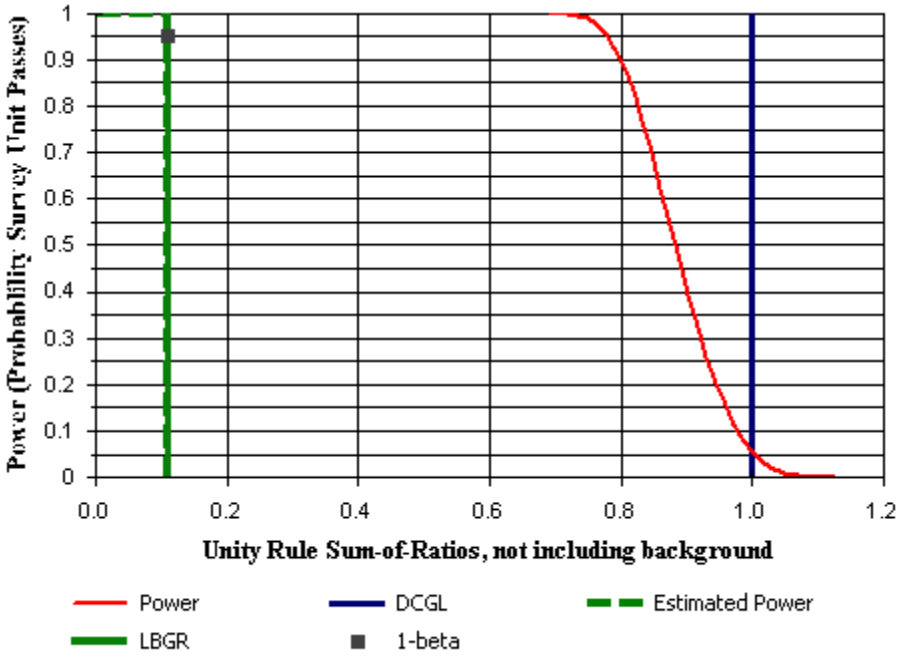
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.92 ± 0.31	0.81 ± 0.25
U-238	0.63 ± 0.12	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU11 AOC-6		
Comments:			
Area (m²):	2,220	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.14
DCGL (SOR):	1	Sample Size (N/2):	9
LBGR (SOR):	0.11	Estimated Conc. (SOR):	0.11
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	9
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual scan MDC=4,MDC for mixture=2.9

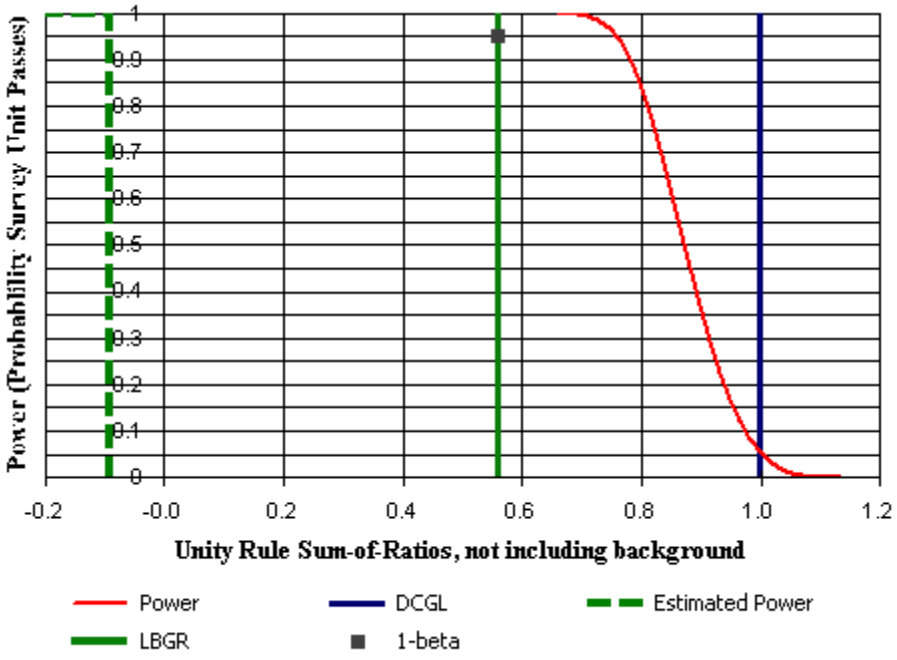
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.11 ± 0.25	0.81 ± 0.25
U-238	0.84 ± 0.06	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 AOC-9		
Comments:			
Area (m²):	1,263	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.17
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.56	Estimated Conc. (SOR):	-0.09
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual scan MDC is <4.0, set to 2.9 to match gross activity scan MDC

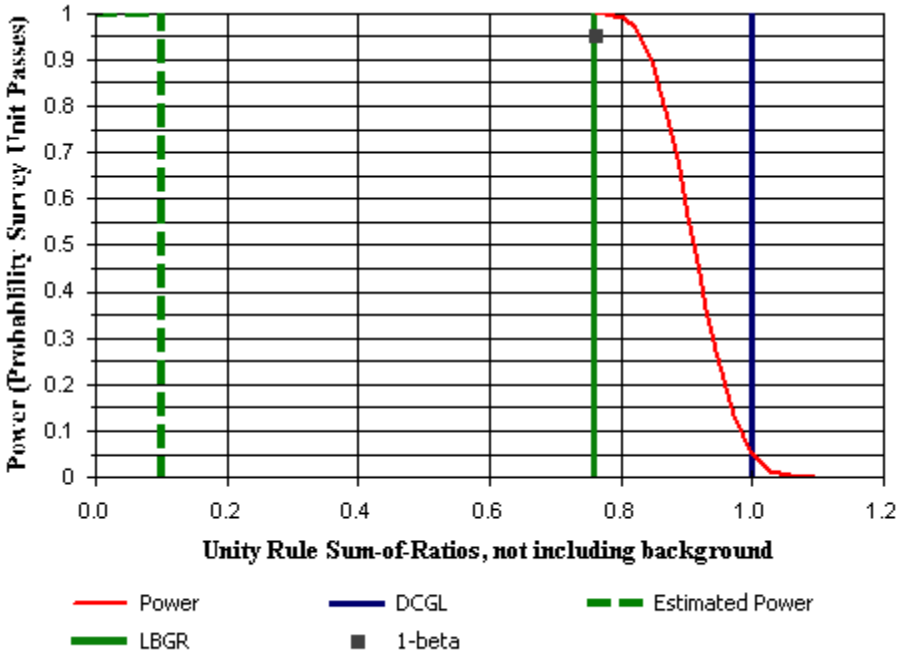
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.79 ± 0.38	0.81 ± 0.25
U-238	0.64 ± 0.09	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU13 AOC 8		
Comments:			
Area (m²):	2,148	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.14
DCGL (SOR):	1	Sample Size (N/2):	15
LBGR (SOR):	0.76	Estimated Conc. (SOR):	0.1
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	15
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual Scan MDC is 4.0, changed to the gross activity scan MDC of 2.9

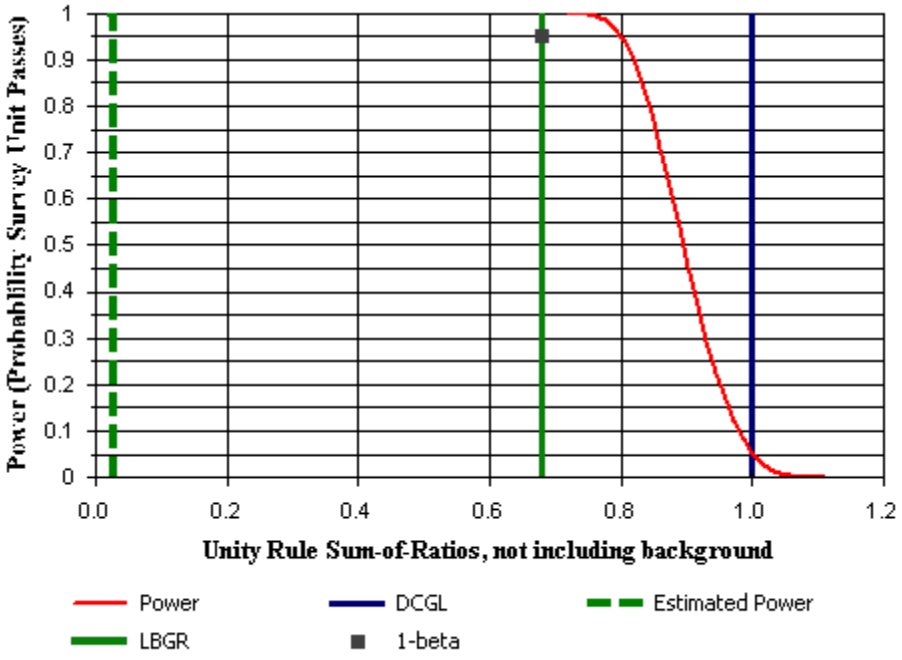
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.13 ± 0.23	0.81 ± 0.25
U-238	0.81 ± 0.14	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU14/AOC 7		
Comments:			
Area (m²):	1,964	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.14
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.68	Estimated Conc. (SOR):	0.03
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual scan of approximately 4 modified to 2.9 to reflect gross activity Scan MDC

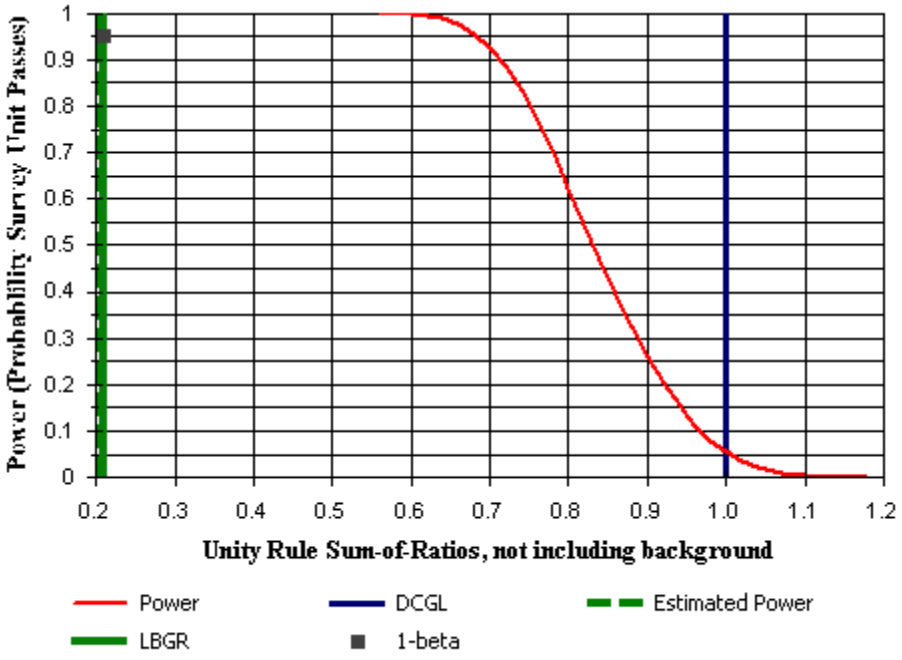
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.74 ± 0.09	0.81 ± 0.25
U-238	0.94 ± 0.16	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU15 AOC-10		
Comments:			
Area (m²):	1,158	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.2
DCGL (SOR):	1	Sample Size (N/2):	9
LBGR (SOR):	0.21	Estimated Conc. (SOR):	0.21
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	9
Scanning Instrumentation:	NaI 2 by 2		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.8 Note Actual U MDC = 4.5 represents MDC of mixture

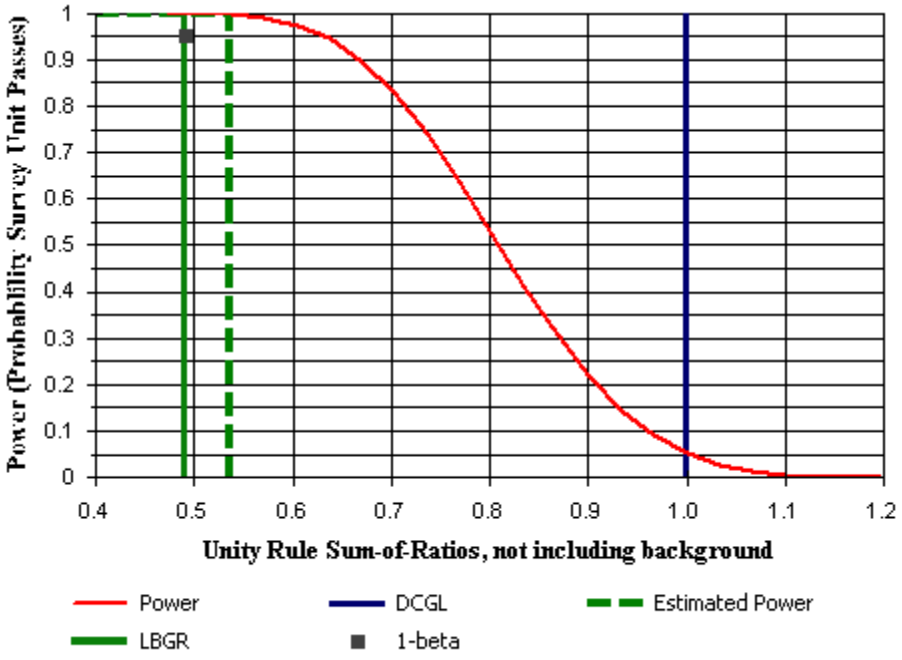
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.15 ± 0.18	0.81 ± 0.25
U-238	1.03 ± 0.4	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU16/AOC 11		
Comments:			
Area (m²):	1,993	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.33
DCGL (SOR):	1	Sample Size (N/2):	18
LBGR (SOR):	0.49	Estimated Conc. (SOR):	0.54
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	18
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual U-238 scan MDC = 4, scan MDC set to 2.9 to reflect gross activity scan MDC

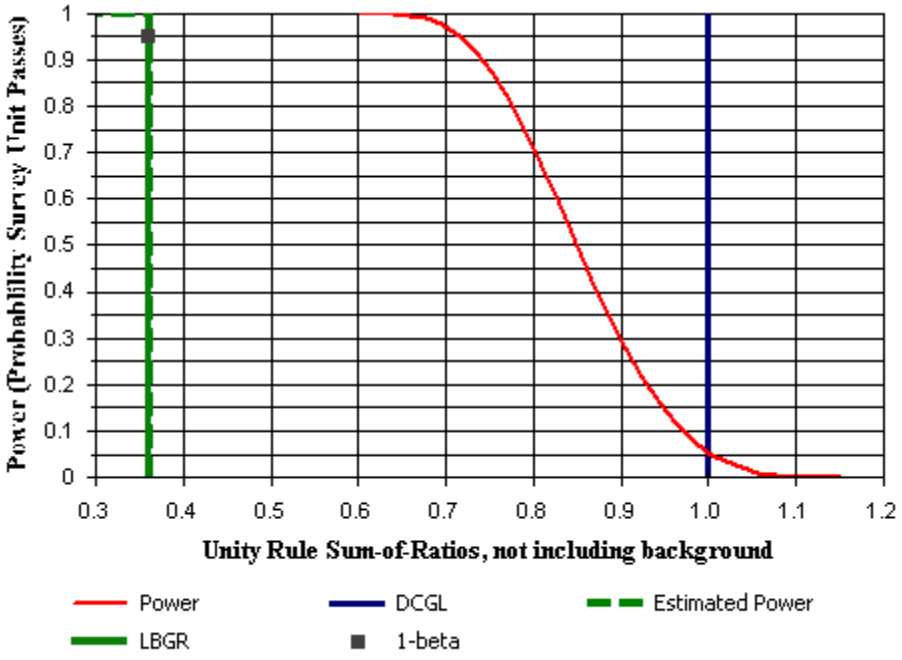
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.47 ± 0.66	0.81 ± 0.25
U-238	1.51 ± 0.54	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 17/AOC 12		
Comments:			
Area (m²):	1,987	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.19
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.36	Estimated Conc. (SOR):	0.36
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	10
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Note represents combined MDC of mixture, actual U MDC = 4.5

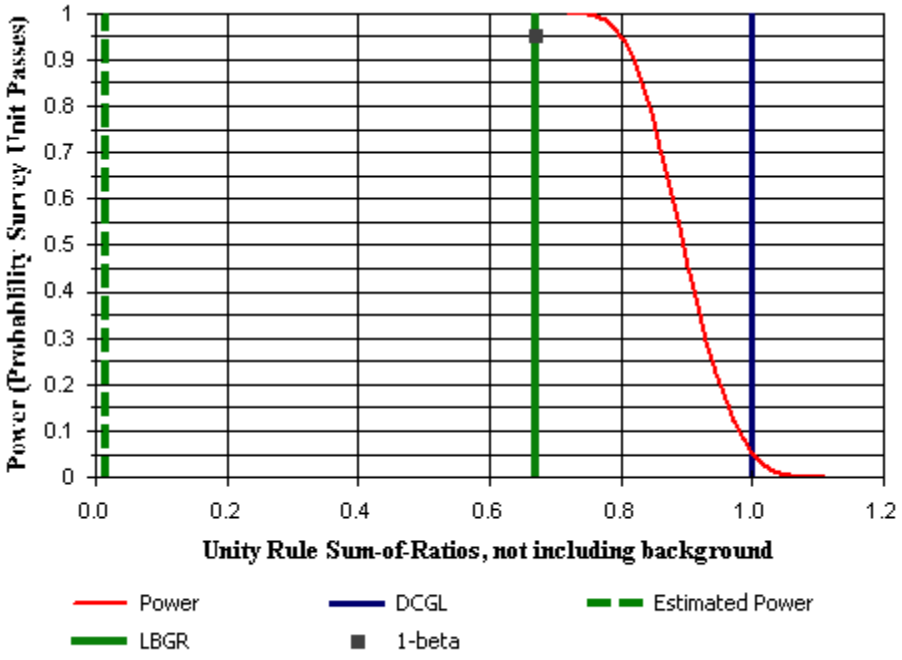
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.37 ± 0.45	0.81 ± 0.25
U-238	1.2 ± 0.23	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU18 Building B-911 sub-loading dock soil		
Comments:			
Area (m²):	200	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.14
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.67	Estimated Conc. (SOR):	0.02
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Note, represents combined MDC of mixture, actual U MDC - 4.5

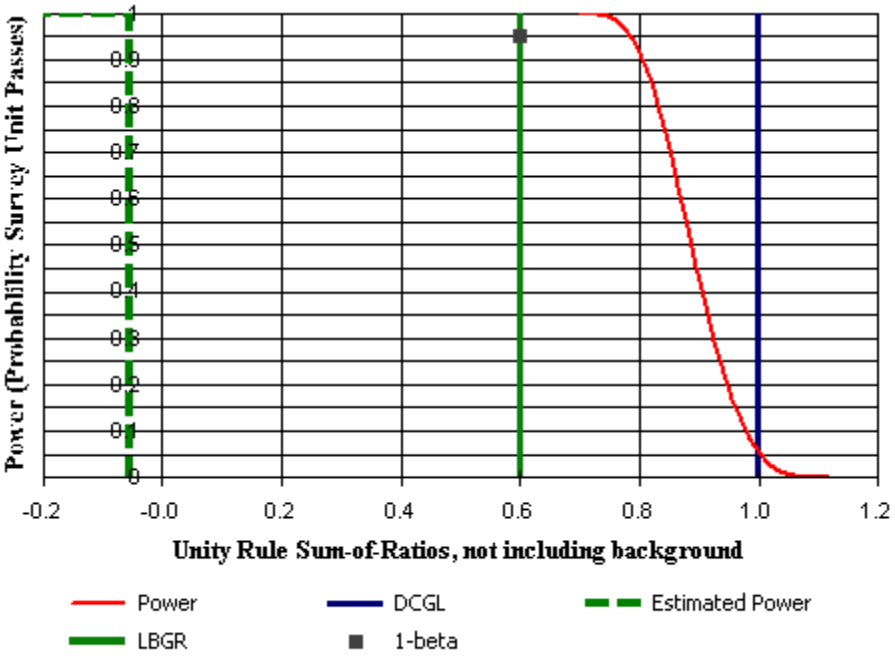
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1 ± 0.26	0.81 ± 0.25
U-238	0.72 ± 0.14	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU19 Waste Staging Area		
Comments:			
Area (m²):	1,764	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.15
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.6	Estimated Conc. (SOR):	-0.06
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	11
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)	
Th-232	2.90	N/A	N/A	N/A	2.8	
U-238	2.20	N/A	N/A	N/A	2.9	Actual scan MDC = 4, set to MDC of mixture

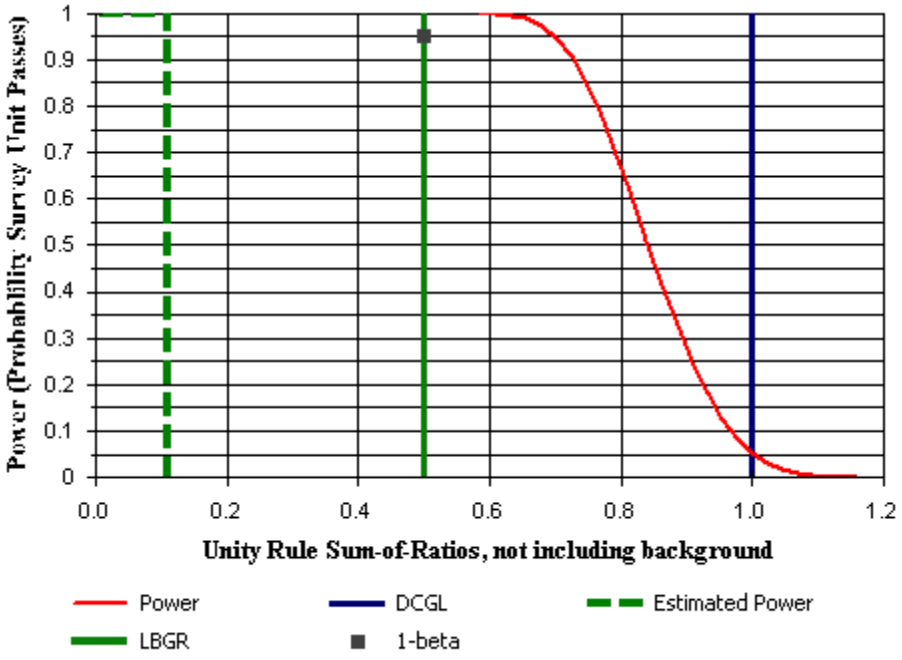
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.69 ± 0.29	0.81 ± 0.25
U-238	0.8 ± 0.24	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU20/AOC 20		
Comments:			
Area (m²):	2,450	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.23
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.5	Estimated Conc. (SOR):	0.11
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	13
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Actual scan MDC is 4.5 set to 2.9 to reflect gross activity scan MDC

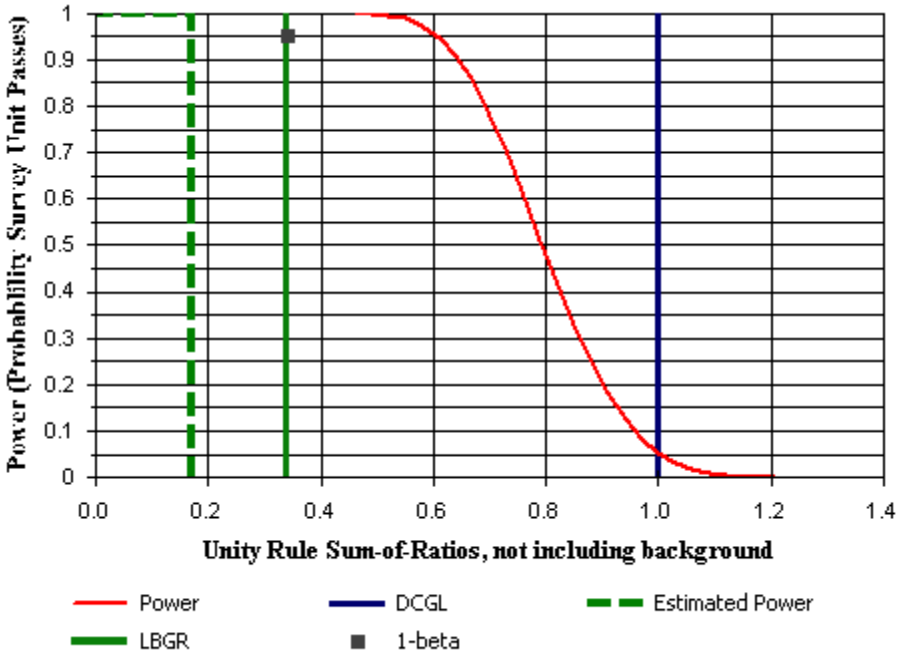
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.22 ± 0.6	0.81 ± 0.25
U-238	0.76 ± 0.21	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU21/AOC 21		
Comments:			
Area (m²):	1,298	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.3
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.34	Estimated Conc. (SOR):	0.17
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	13
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)	
Th-232	2.90	N/A	N/A	N/A	2.9	
U-238	2.20	N/A	N/A	N/A	2.8	Actual U-238 scan MDC = 4.0 set to 2.8 match MDC for mixture

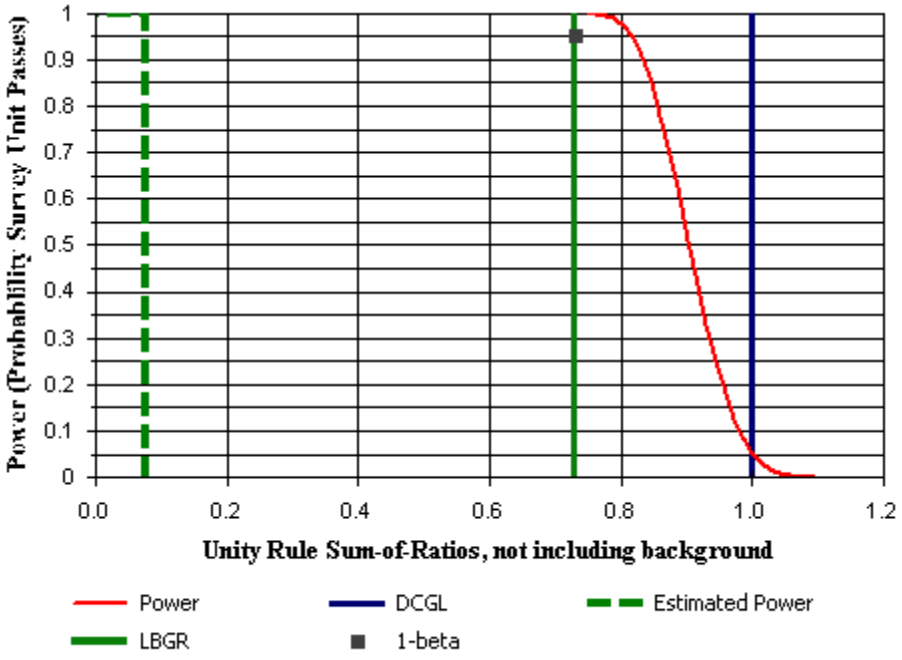
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.3 ± 0.82	0.81 ± 0.25
U-238	0.83 ± 0.25	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 Building B-911 Interior sub-floor soil		
Comments:			
Area (m²):	1,022	Classification:	1
Selected Test:	WRS	Estimated Sigma (SOR):	0.14
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.73	Estimated Conc. (SOR):	0.08
Alpha:	0.050	Estimated Power:	1
Beta:	0.050	EMC Sample Size (N):	13
Scanning Instrumentation:	NaI		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	2.8
U-238	2.20	N/A	N/A	N/A	2.9 Note, represents combined MDC of mixture, actual U MDC = 4.5

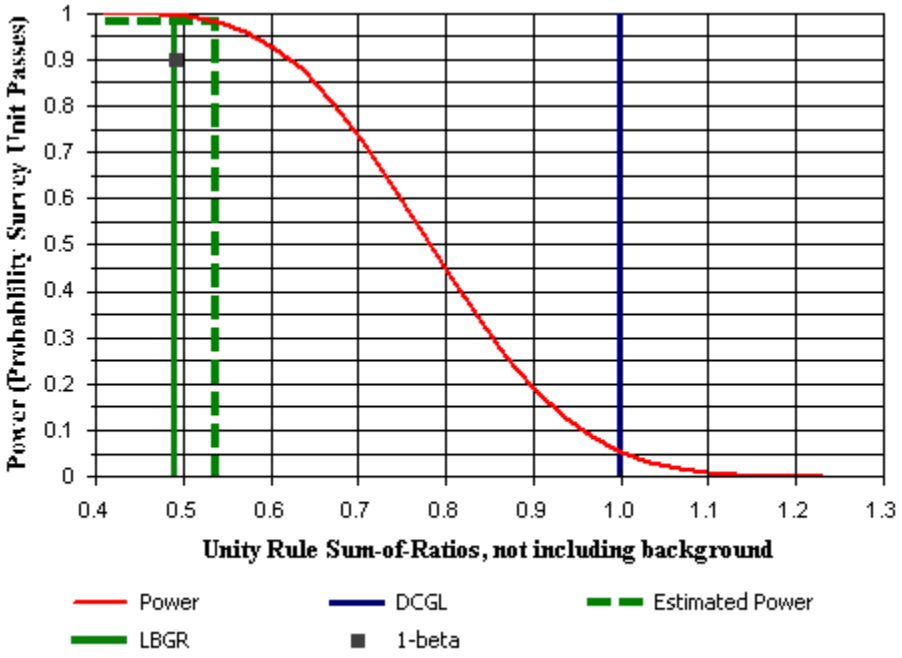
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.03 ± 0.13	0.81 ± 0.25
U-238	0.83 ± 0.19	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 1		
Comments:	SU area is the largest of the Planning Area SUs		
Area (m²):	14,189	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.33
DCGL (SOR):	1	Sample Size (N/2):	14
LBGR (SOR):	0.49	Estimated Conc. (SOR):	0.54
Alpha:	0.050	Estimated Power:	0.98
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

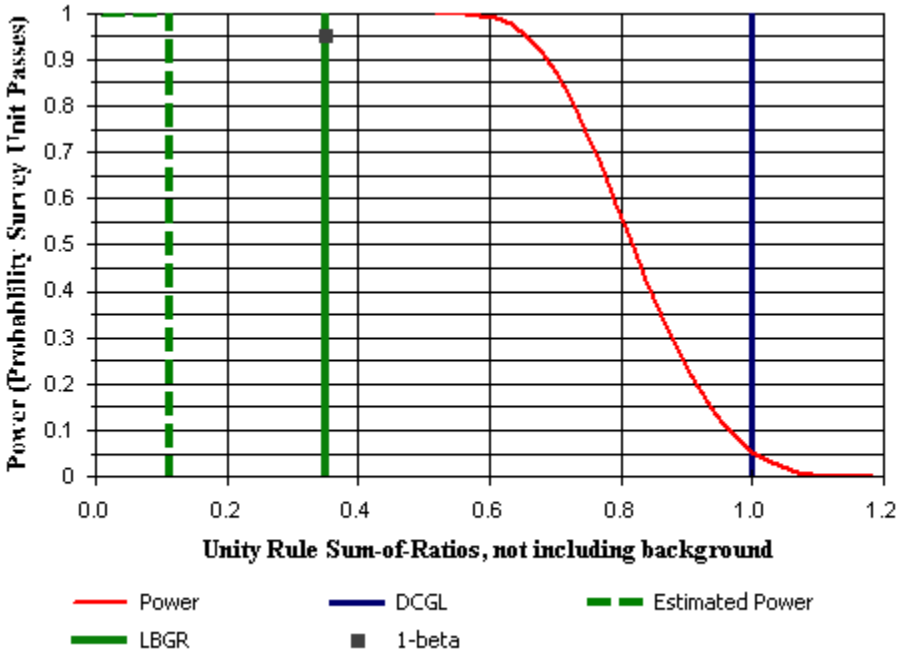
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.47 ± 0.66	0.81 ± 0.25
U-238	1.51 ± 0.54	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 2/SU7-16		
Comments:	SU area = largest SU area		
Area (m²):	16,177	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.23
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.35	Estimated Conc. (SOR):	0.11
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

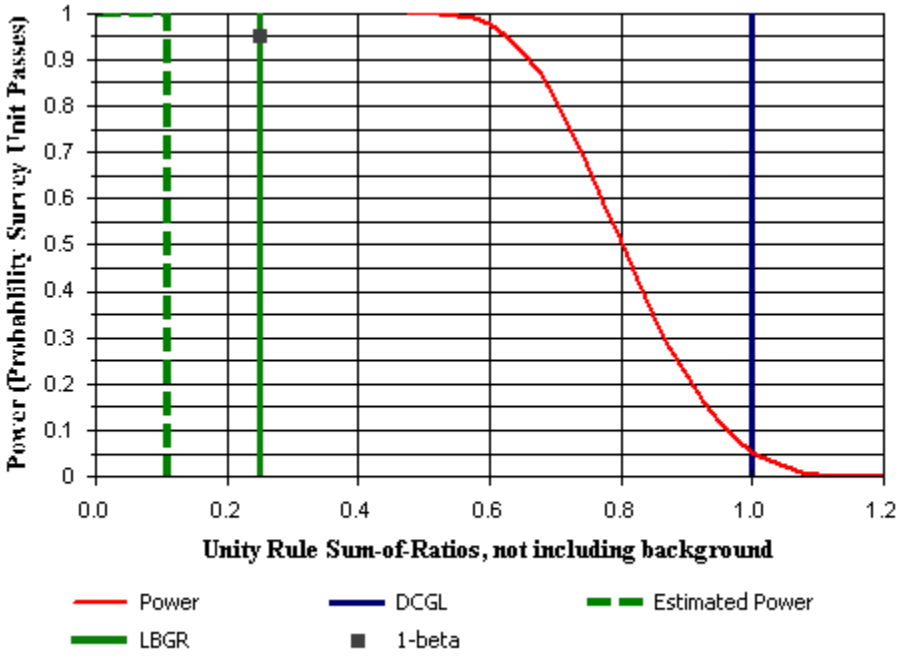
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.98 ± 0.56	0.81 ± 0.25
U-238	0.95 ± 0.26	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 3/SU17-21		
Comments:	Survey unit area is largest of group		
Area (m²):	18,000	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.25
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.25	Estimated Conc. (SOR):	0.11
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

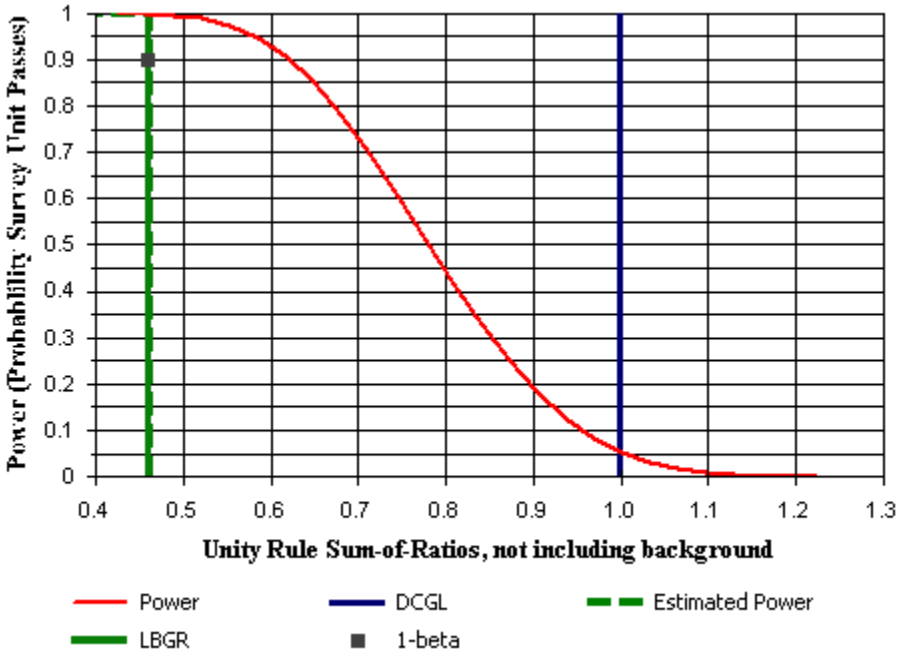
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.89 ± 0.36	0.81 ± 0.25
U-238	1.01 ± 0.48	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 4/SU22-26		
Comments:	SU area is largest of the group		
Area (m²):	13,388	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.32
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.46	Estimated Conc. (SOR):	0.46
Alpha:	0.050	Estimated Power:	1
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

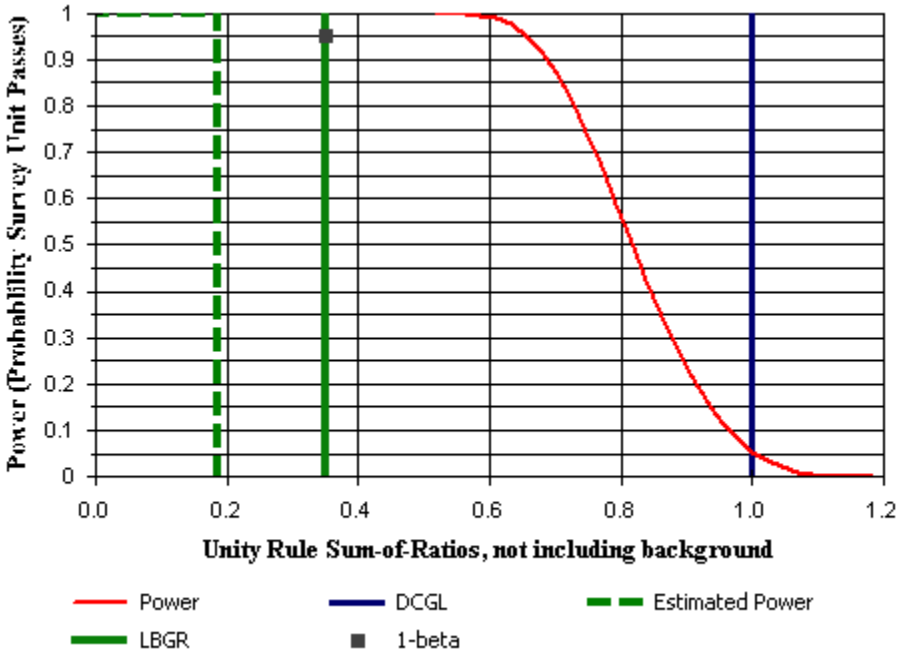
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.29 ± 0.59	0.81 ± 0.25
U-238	1.48 ± 0.55	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 5/SU27-34		
Comments:	SU area is largest of the group		
Area (m²):	12,305	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.23
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.35	Estimated Conc. (SOR):	0.19
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

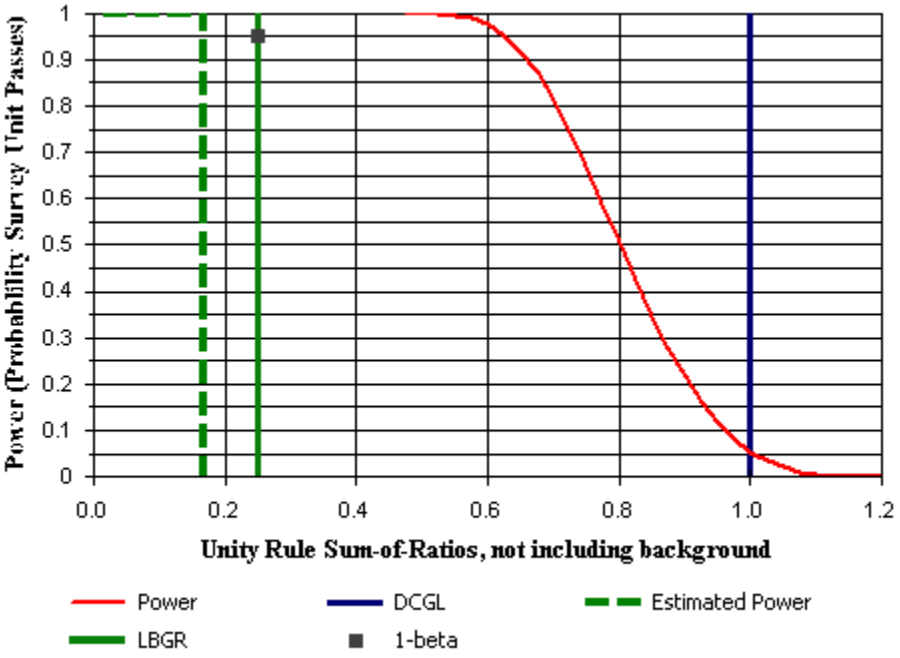
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.94 ± 0.37	0.81 ± 0.25
U-238	1.14 ± 0.43	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 6/SU35-41		
Comments:	Survey unit area is largest of the group		
Area (m²):	16,473	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.25
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.25	Estimated Conc. (SOR):	0.17
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

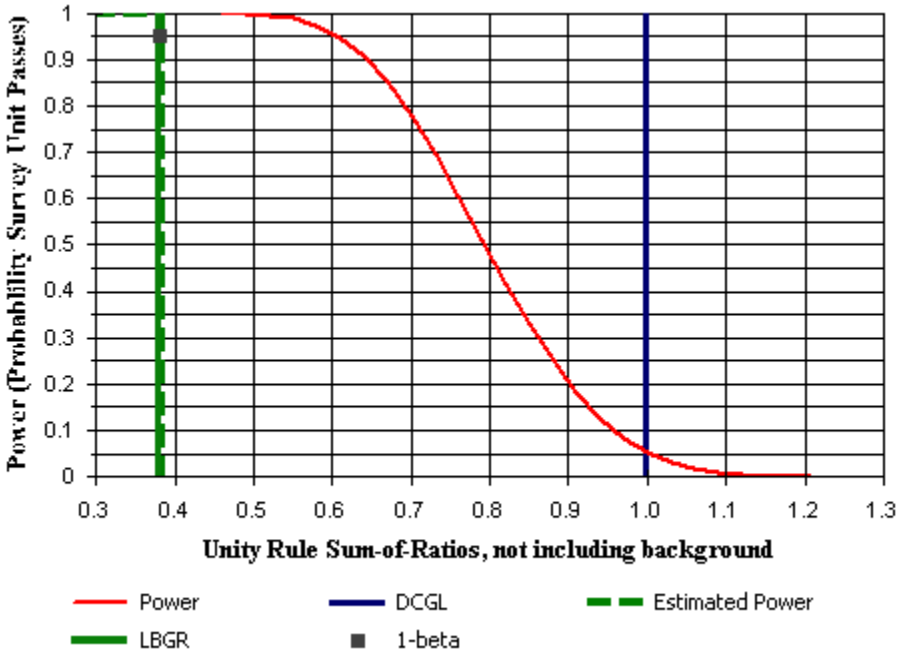
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.85 ± 0.26	0.81 ± 0.25
U-238	1.17 ± 0.51	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 7/SU42-48		
Comments:	Survey unit area is largest of the group		
Area (m²):	16,473	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.3
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.38	Estimated Conc. (SOR):	0.38
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

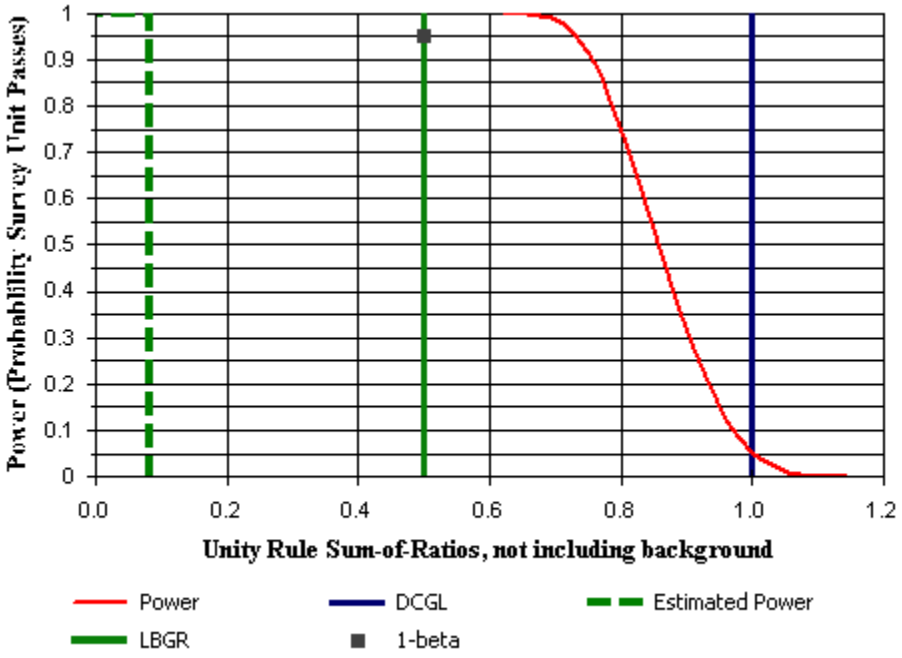
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.05 ± 0.39	0.81 ± 0.25
U-238	1.49 ± 0.6	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 8/SU49-59		
Comments:	Survey unit area is largest of the group		
Area (m²):	15,175	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.18
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.5	Estimated Conc. (SOR):	0.08
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

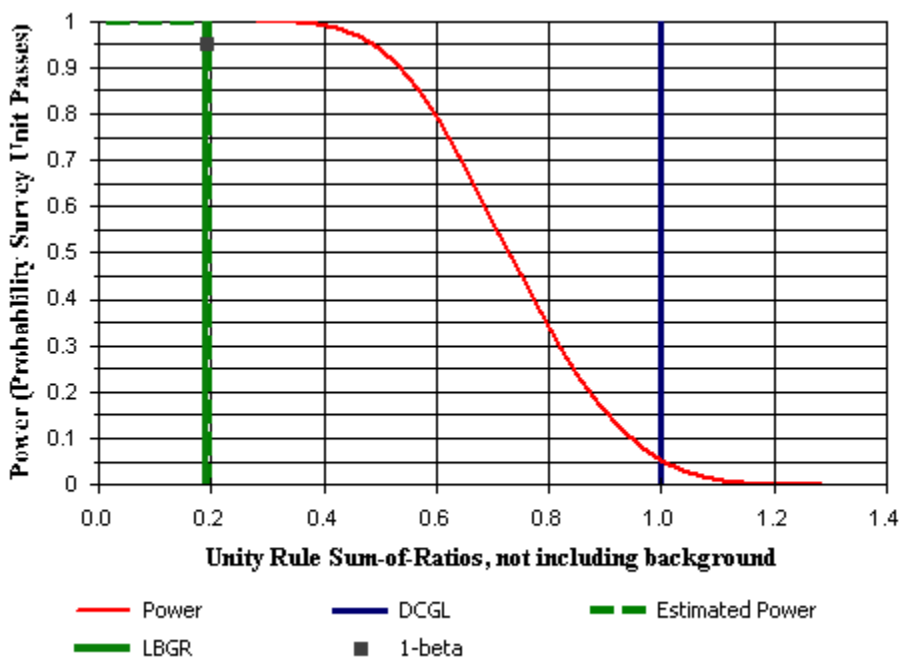
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.9 ± 0.33	0.81 ± 0.25
U-238	0.94 ± 0.3	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 9/SU60-66		
Comments:	Survey unit area is the largest of the group		
Area (m²):	15,636	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.36
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.19	Estimated Conc. (SOR):	0.2
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

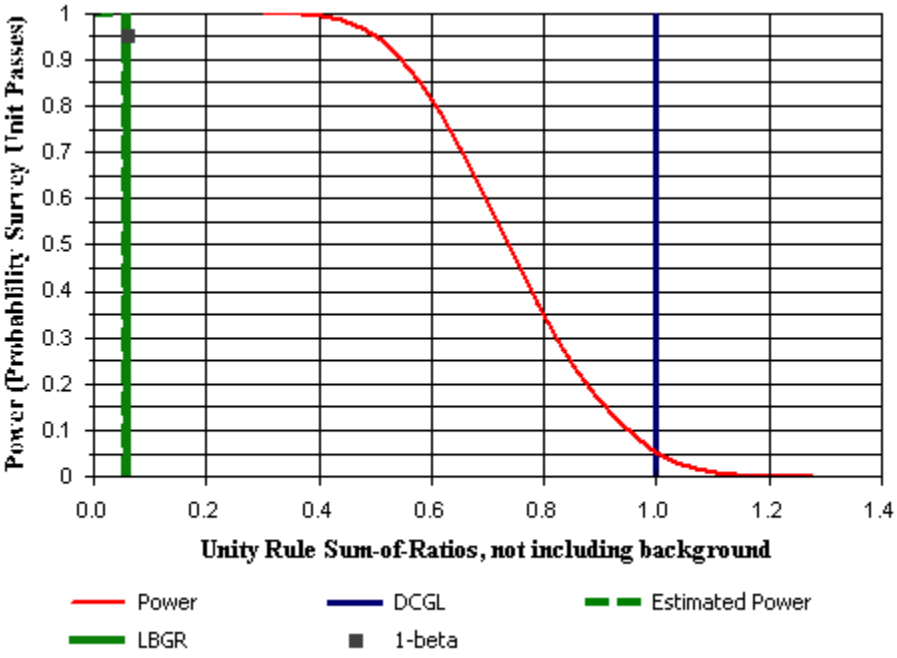
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.02 ± 0.58	0.81 ± 0.25
U-238	1.1 ± 0.66	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 10/SU67-72		
Comments:	Survey unit area is the largest of the group		
Area (m²):	19,889	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.35
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.06	Estimated Conc. (SOR):	0.06
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

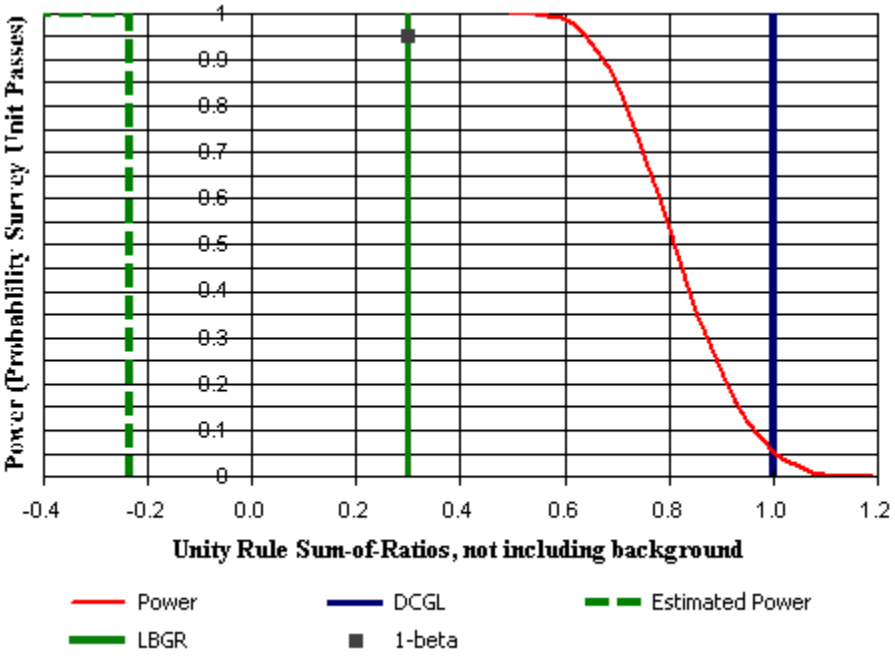
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.87 ± 0.67	0.81 ± 0.25
U-238	0.91 ± 0.57	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Land Areas Planning Area 11/SU73-75		
Comments:	Survey unit area is the largest of the group		
Area (m²):	20,505	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.24
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.3	Estimated Conc. (SOR):	-0.24
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

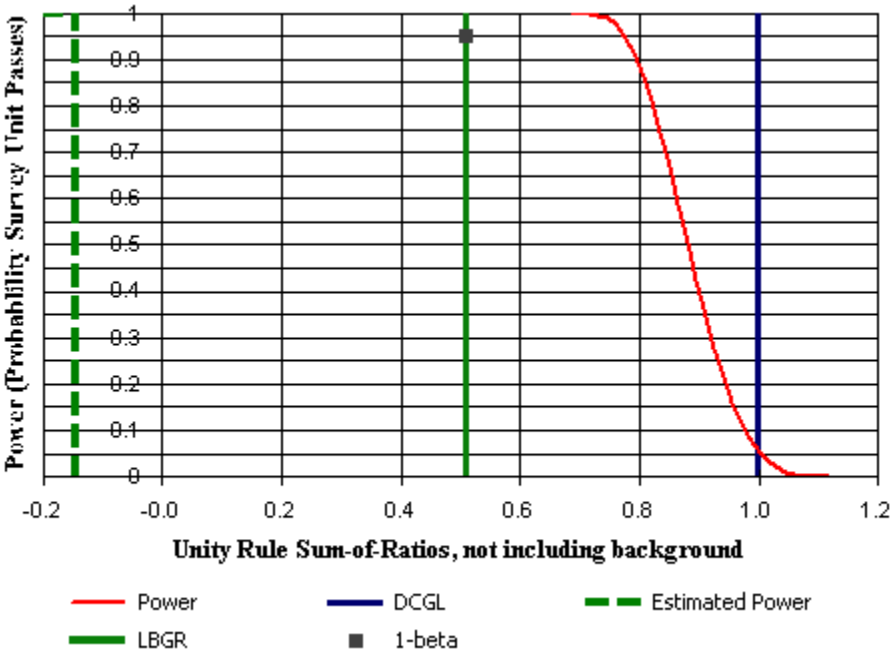
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.89 ± 0.28	0.81 ± 0.25
U-238	0.25 ± 0.48	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU76 B-912 sub-floor soil		
Comments:			
Area (m²):	1,022	Classification:	2
Selected Test:	WRS	Estimated Sigma (SOR):	0.15
DCGL (SOR):	1	Sample Size (N/2):	10
LBGR (SOR):	0.51	Estimated Conc. (SOR):	-0.14
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

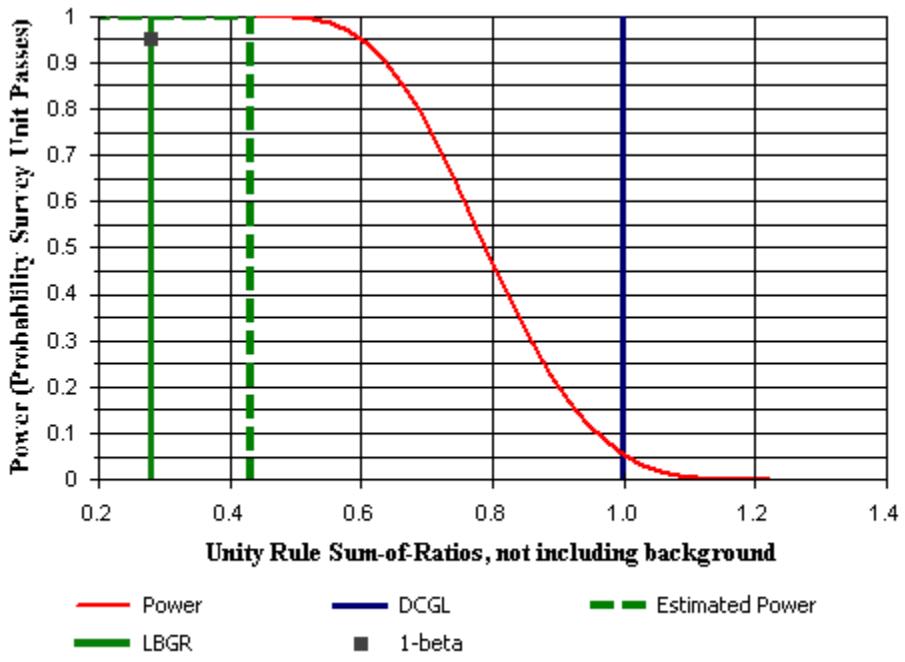
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	0.84 ± 0.31	0.81 ± 0.25
U-238	0.49 ± 0.19	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU 1		
Comments:			
Area (m²):	~~95,000~~ 94,266	Classification:	3
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	11
LBGR (SOR):	0.28	Estimated Conc. (SOR):	0.43
Alpha:	0.050	Estimated Power:	1
Beta:	0.050		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

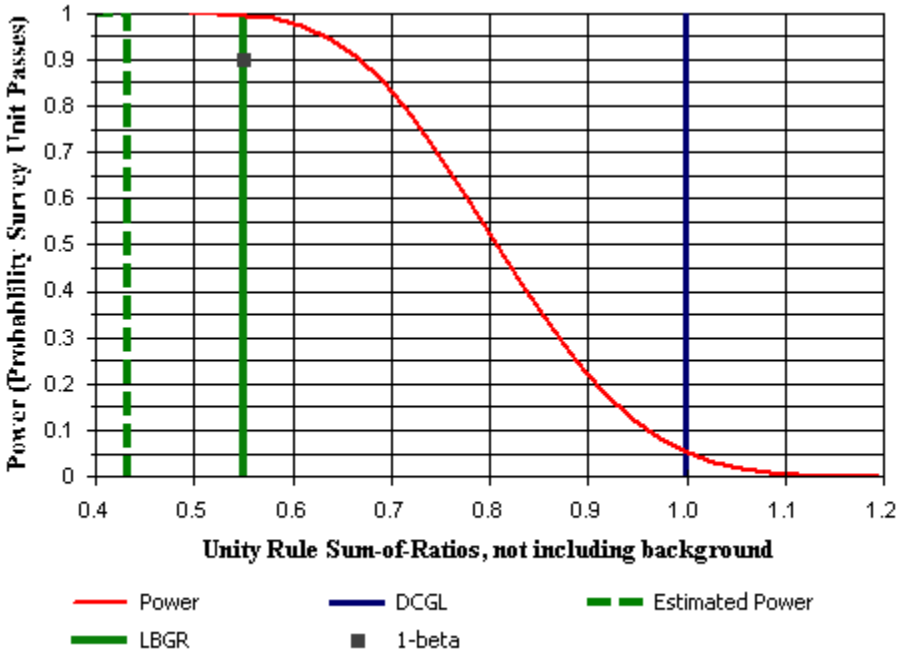
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.31 ± 0.55	0.81 ± 0.25
U-238	1.4 ± 0.44	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU2 rev 1		
Comments:			
Area (m²):	200,571	Classification:	3
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.55	Estimated Conc. (SOR):	0.43
Alpha:	0.050	Estimated Power:	1
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

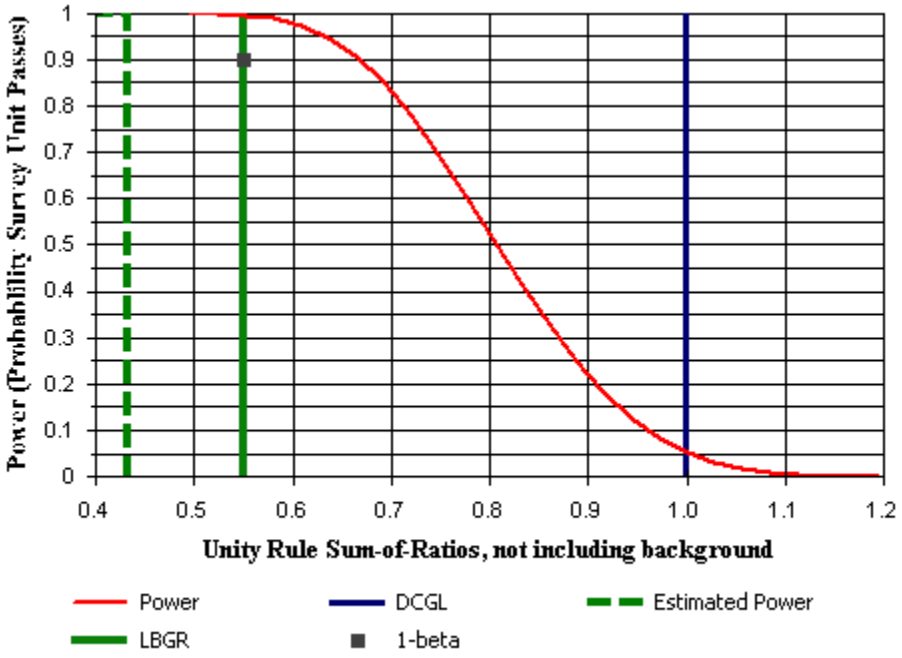
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.31 ± 0.55	0.81 ± 0.25
U-238	1.4 ± 0.44	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU3 rev 1		
Comments:			
Area (m²):	201,931	Classification:	3
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.55	Estimated Conc. (SOR):	0.43
Alpha:	0.050	Estimated Power:	1
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

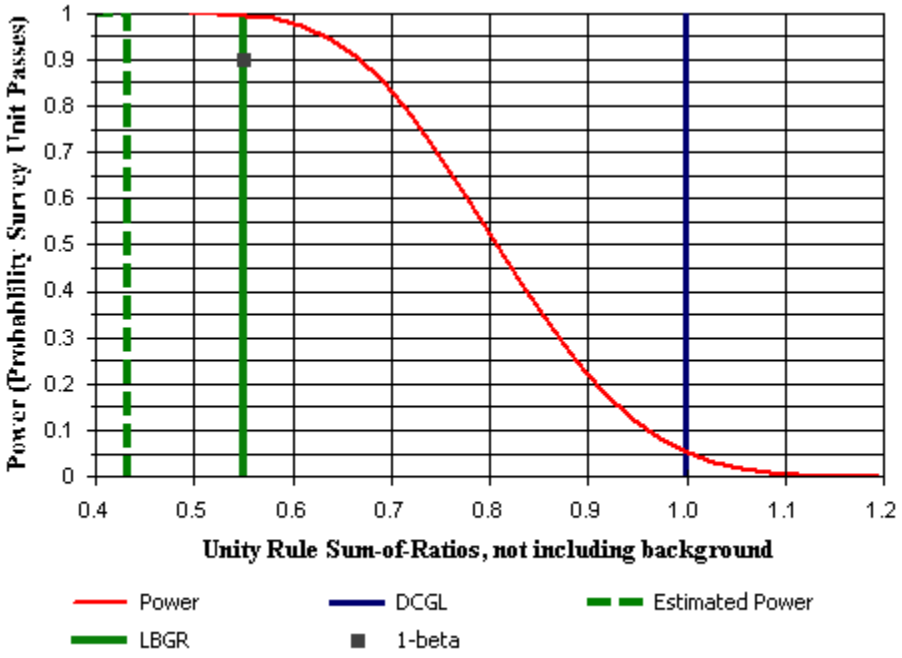
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.31 ± 0.55	0.81 ± 0.25
U-238	1.4 ± 0.44	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU4 Rev 1		
Comments:			
Area (m²):	184,966	Classification:	3
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.55	Estimated Conc. (SOR):	0.43
Alpha:	0.050	Estimated Power:	1
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

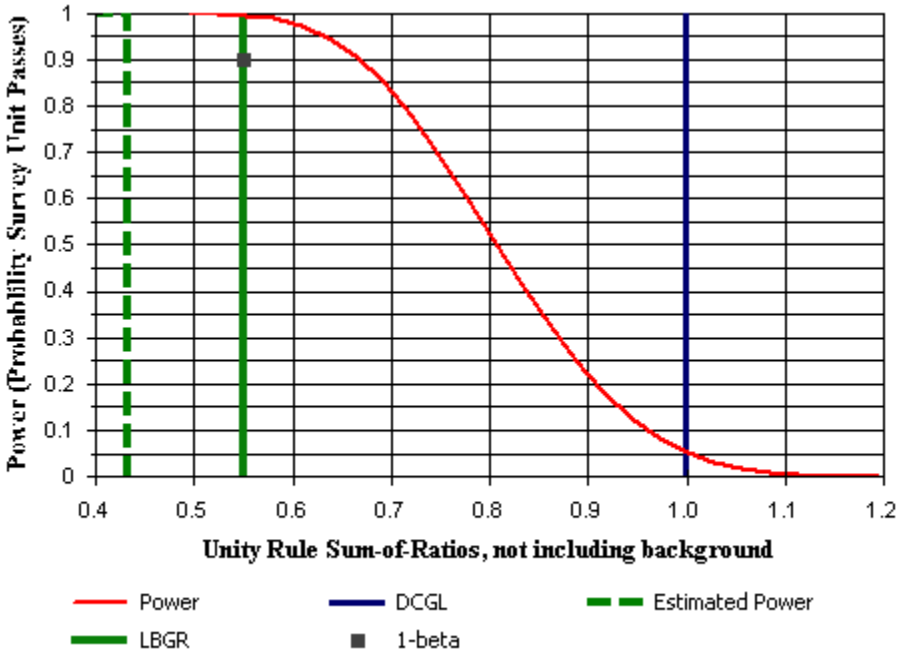
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.31 ± 0.55	0.81 ± 0.25
U-238	1.4 ± 0.44	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU5 rev 1		
Comments:			
Area (m²):	77,293	Classification:	3
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.55	Estimated Conc. (SOR):	0.43
Alpha:	0.050	Estimated Power:	1
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

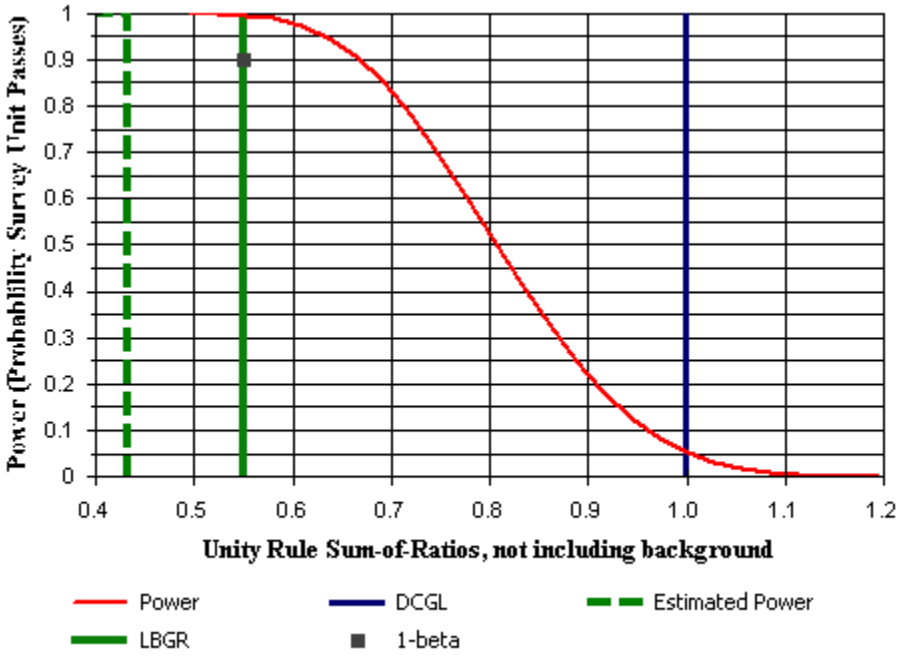
Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.31 ± 0.55	0.81 ± 0.25
U-238	1.4 ± 0.44	0.83 ± 0.24

Surface Soil Survey Plan

Survey Plan Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU6		
Comments:			
Area (m²):	11,580	Classification:	3
Selected Test:	WRS	Estimated Sigma (SOR):	0.28
DCGL (SOR):	1	Sample Size (N/2):	13
LBGR (SOR):	0.55	Estimated Conc. (SOR):	0.43
Alpha:	0.050	Estimated Power:	1
Beta:	0.100		

Prospective Power Curve



Surface Soil Survey Plan

Contaminant Summary

Contaminant	DCGLw (pCi/g)	Inferred Contaminant	Ratio	Modified DCGLw (pCi/g)	Scan MDC (pCi/g)
Th-232	2.90	N/A	N/A	N/A	N/A
U-238	2.20	N/A	N/A	N/A	N/A

Contaminant	Survey Unit Estimate (Mean ± 1-Sigma) (pCi/g)	Reference Area Estimate (Mean ± 1-Sigma) (pCi/g)
Th-232	1.31 ± 0.55	0.81 ± 0.25
U-238	1.4 ± 0.44	0.83 ± 0.24

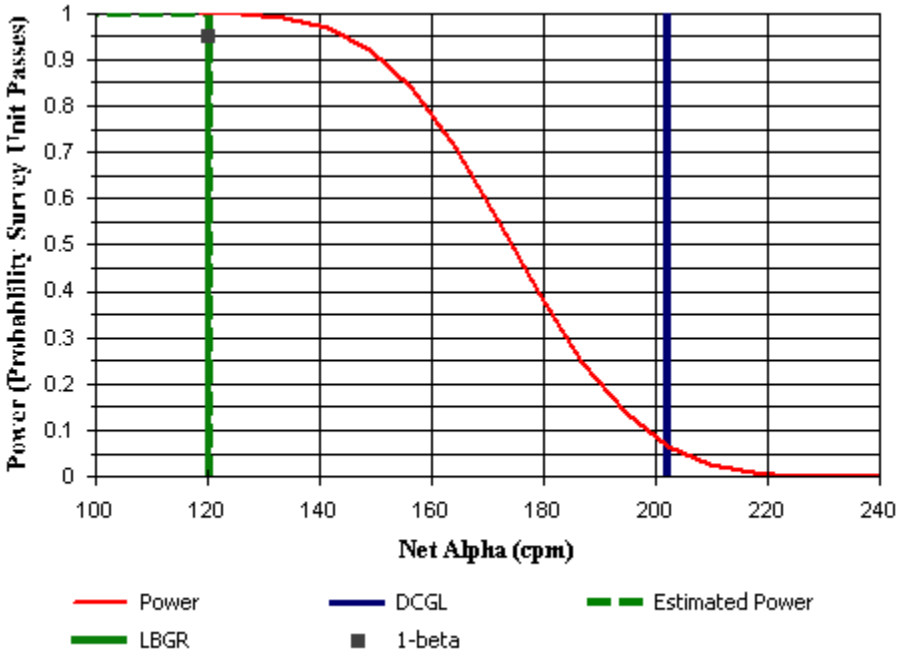
APPENDIX E:
STUCTURE SURVEY UNIT DQOs

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1		
Comments:	North and south wall survey unit size is 83 m2		
Area (m²):	100	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	76
DCGL (cpm):	202	Sample Size (N):	28
LBGR (cpm):	120	Estimated Conc. (cpm):	120
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	28

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 407 ± 56 (1-sigma)
Count Time (min): 1

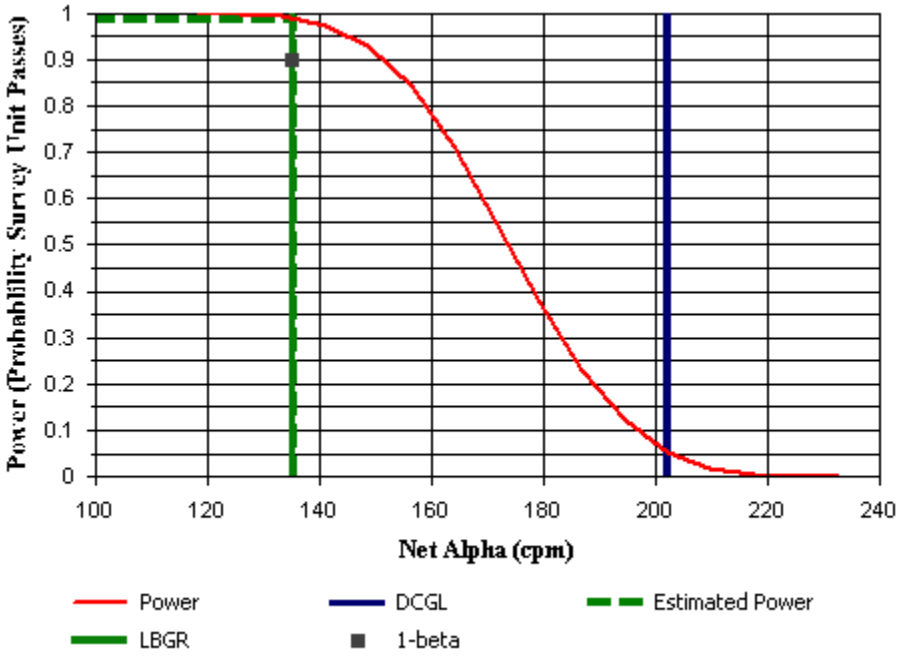
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	191
Concrete	10	335.9	22.7	175
FSS Terra Cotta	9	636.1	51.4	239
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU20 B-911 trusses		
Comments:			
Area (m²):	83	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	76.4
DCGL (cpm):	202	Sample Size (N):	31
LBGR (cpm):	135	Estimated Conc. (cpm):	135
Alpha:	0.050	Estimated Power:	0.99
Beta:	0.100	EMC Sample Size (N):	31

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 422 ± 73 (1-sigma)
Count Time (min): 1

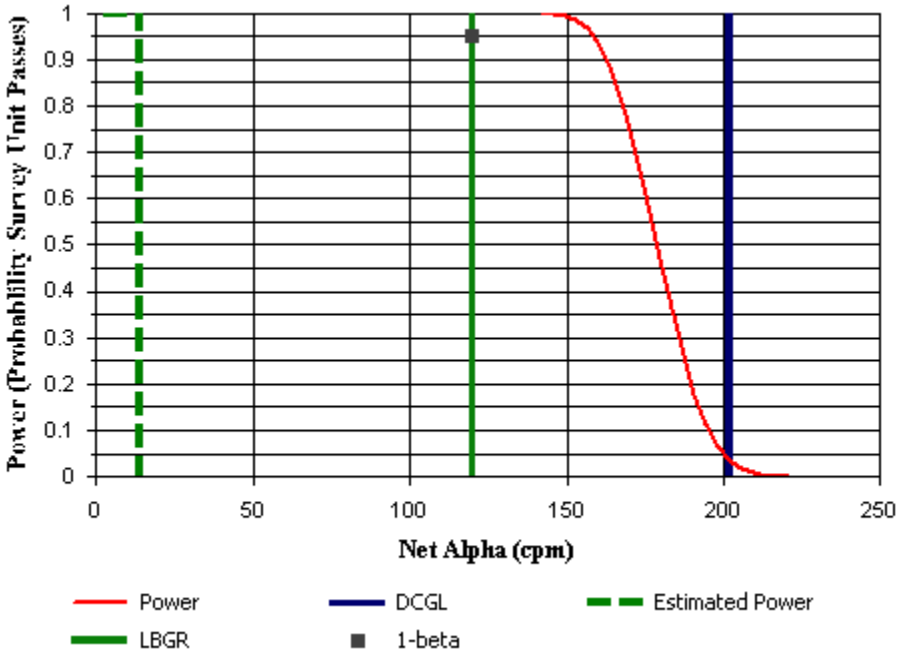
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU21 B-911 Loading Dock		
Comments:			
Area (m²):	208	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	37.6
DCGL (cpm):	202	Sample Size (N):	15
LBGR (cpm):	120	Estimated Conc. (cpm):	14.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	15

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²):	400
Total Efficiency:	0.40
Gross Alpha DCGLw (cpm):	202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 350 ± 30 (1-sigma)
Count Time (min): 1

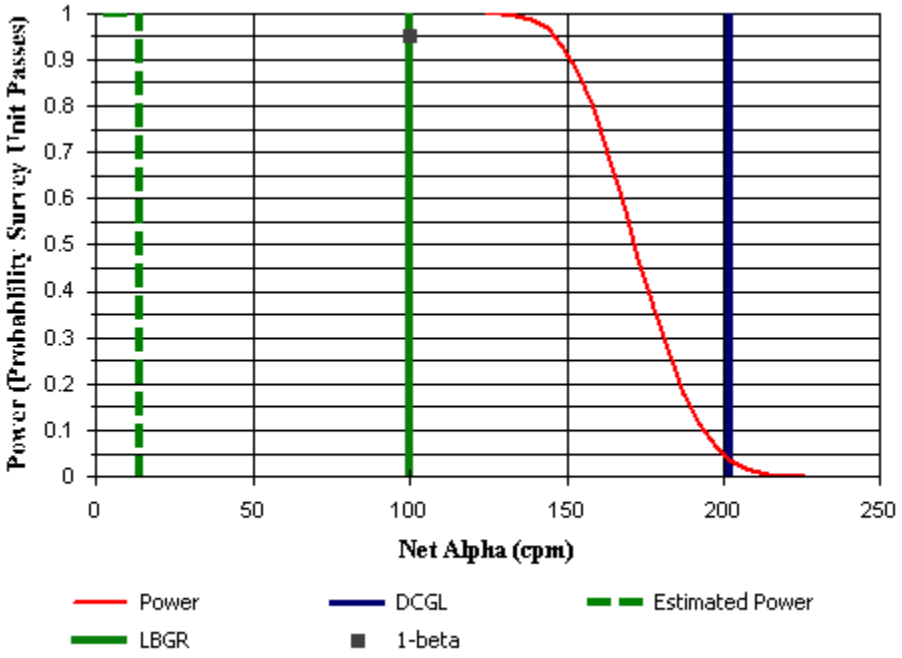
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor		
Comments:			
Area (m²):	93	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	48.6
DCGL (cpm):	202	Sample Size (N):	15
LBGR (cpm):	100	Estimated Conc. (cpm):	14.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	15

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 350 ± 43 (1-sigma)
Count Time (min): 1

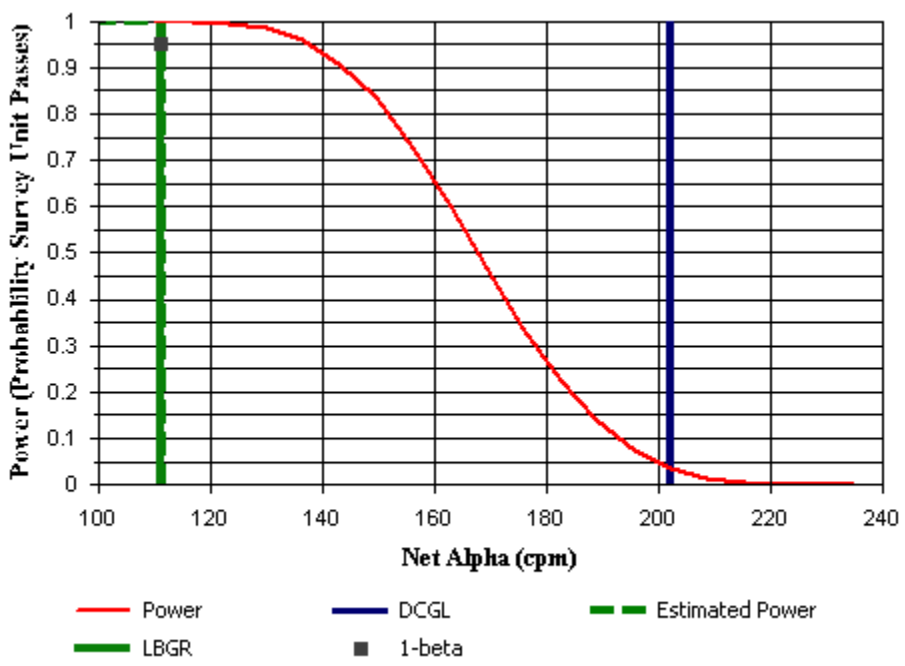
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1		
Comments:	Survey Unit Area=largest of the survey units		
Area (m²):	100	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	65.7
DCGL (cpm):	202	Sample Size (N):	20
LBGR (cpm):	111	Estimated Conc. (cpm):	111
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	20

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 398 ± 41 (1-sigma)
Count Time (min): 1

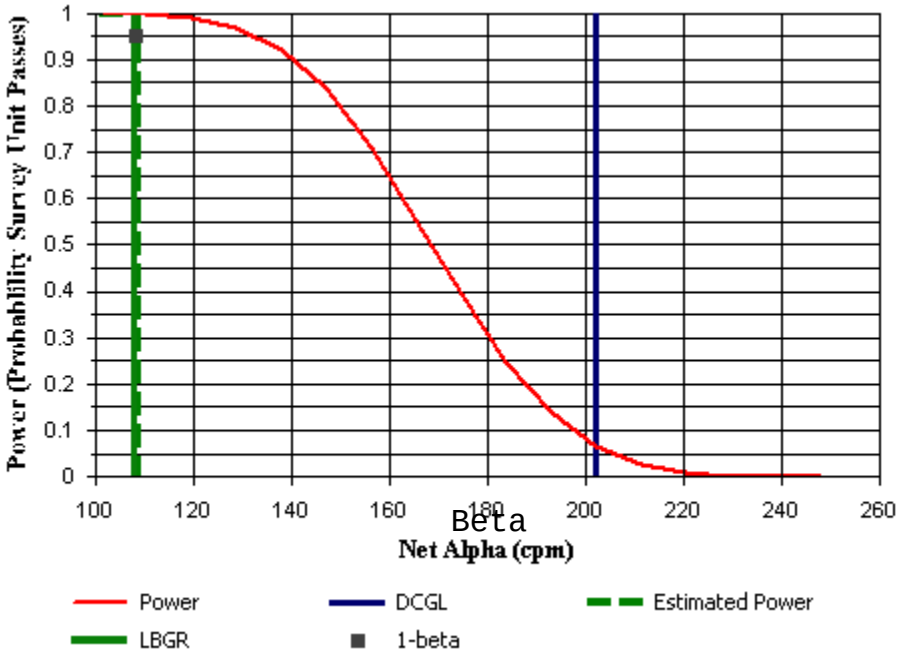
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	191
Concrete	10	335.9	22.7	175
FSS Terra Cotta	9	636.1	51.4	239
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU41 B-912 trusses		
Comments:			
Area (m²):	83	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	91.8
DCGL (cpm):	202	Sample Size (N):	28
LBGR (cpm):	108	Estimated Conc. (cpm):	108
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	28

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 395 ± 89 (1-sigma)
Count Time (min): 1

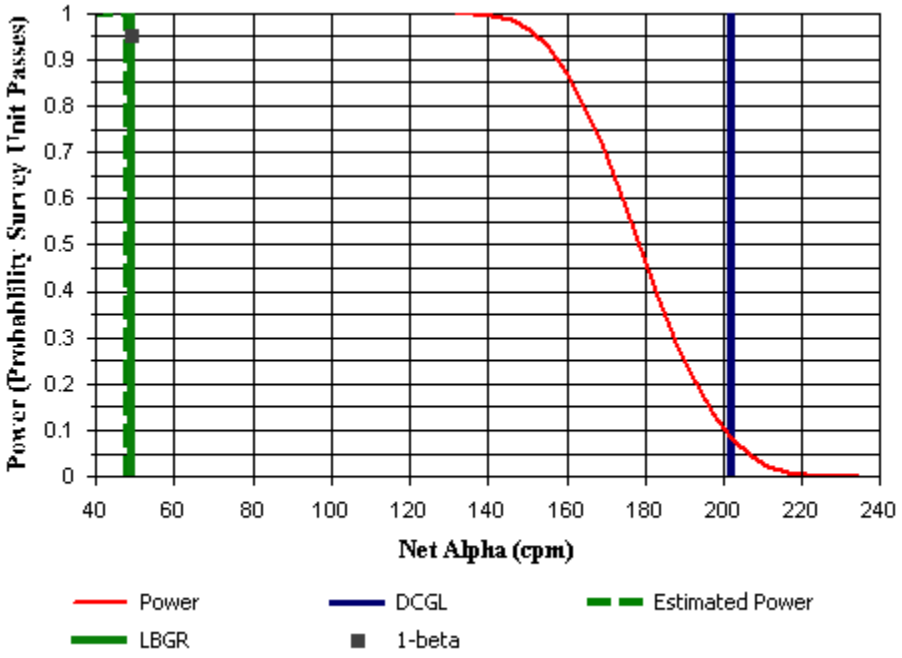
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU42 Building B-913 Floor		
Comments:			
Area (m²):	93	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	46.9
DCGL (cpm):	202	Sample Size (N):	13
LBGR (cpm):	49	Estimated Conc. (cpm):	48.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	13

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 384 ± 41 (1-sigma)
Count Time (min): 1

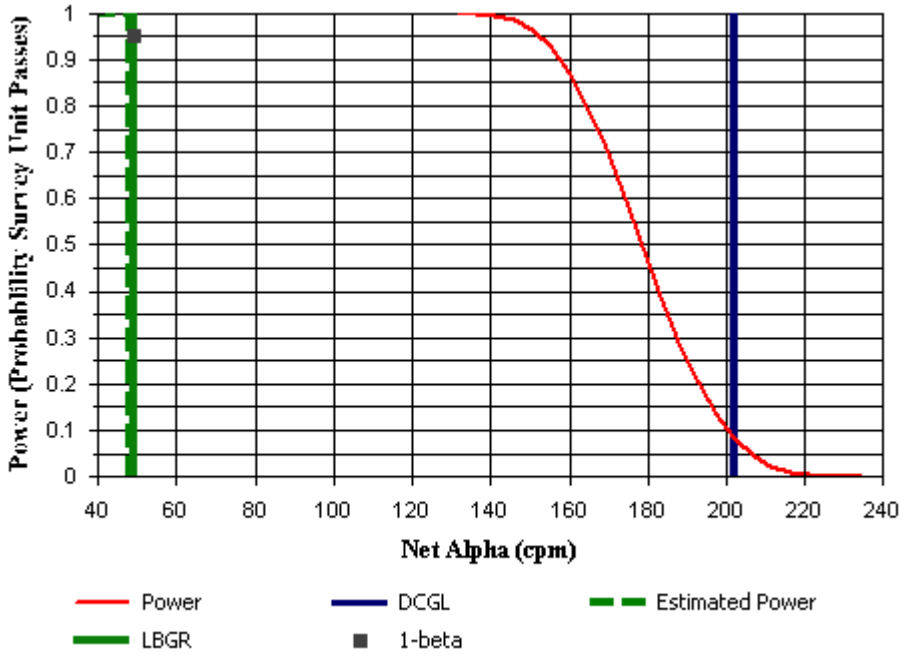
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU43 and 44 B-913 Floor		
Comments:	DQO session for two SUs		
Area (m²):	495	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	46.9
DCGL (cpm):	202	Sample Size (N):	13
LBGR (cpm):	49	Estimated Conc. (cpm):	48.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) ~~[N/A indicates alpha emission]~~
[2] Activity fraction

Beta measurements performed see calibration worksheets

Gross Survey Unit Mean (cpm): 384 ± 41 (1-sigma)
Count Time (min): 1

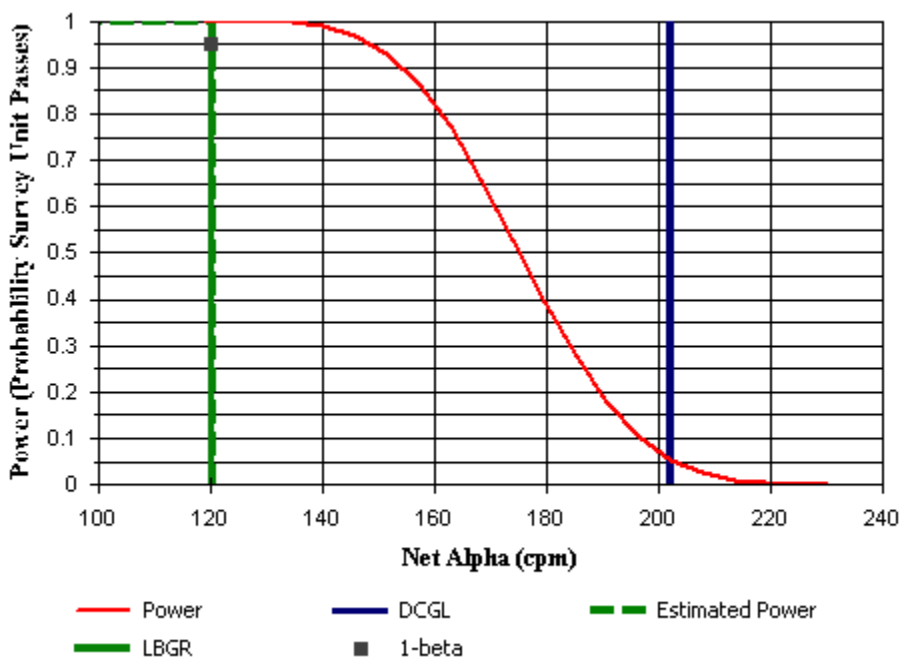
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU45 B-913 South Wall Rev. 1		
Comments:			
Area (m²):	69	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	56.3
DCGL (cpm):	202	Sample Size (N):	19
LBGR (cpm):	120	Estimated Conc. (cpm):	120
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Note: All information below is in terms of Beta

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 407 ± 23 (1-sigma)
Count Time (min): 1

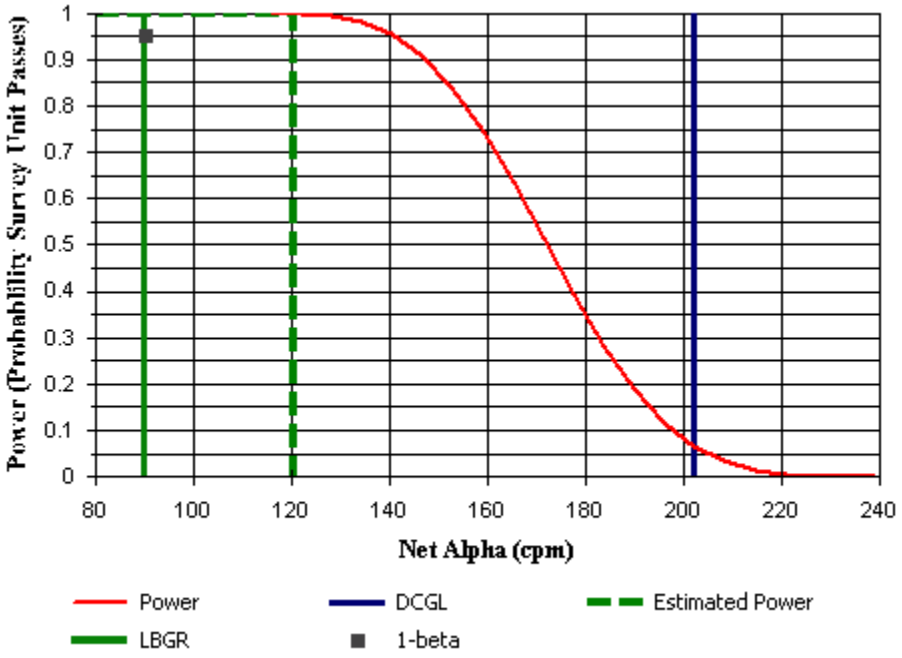
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	191
FSS Terra Cotta	9	636.1	51.4	239
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU46 through 48 B-913 wall Rev. 1		
Comments:	survey unit area entered as largest of the SUs		
Area (m²):	300	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	61.6
DCGL (cpm):	202	Sample Size (N):	16
LBGR (cpm):	90	Estimated Conc. (cpm):	120
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 456 ± 34 (1-sigma)
Count Time (min): 1

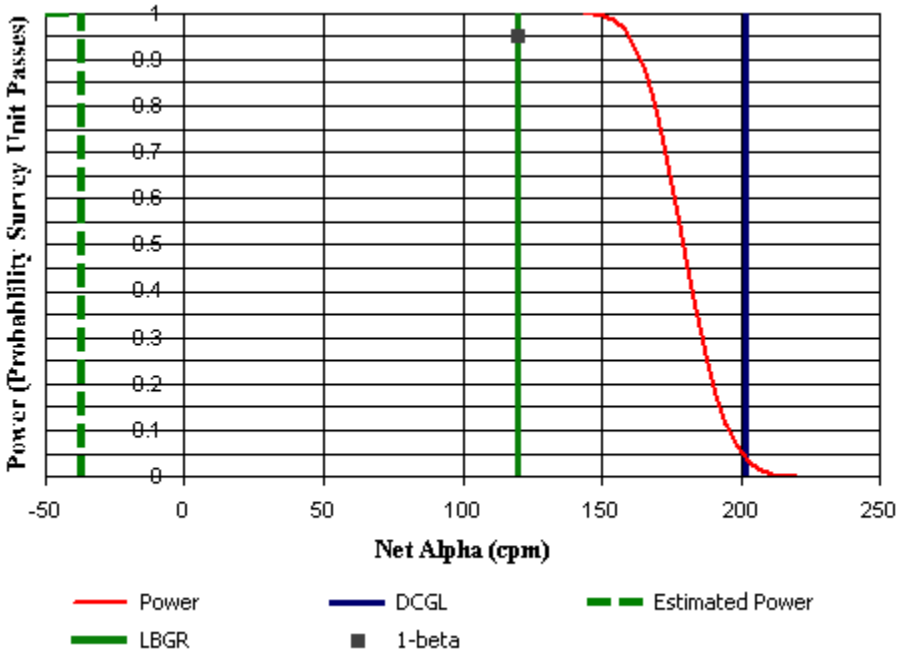
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	191
Concrete	10	335.9	22.7	175
FSS Terra Cotta	9	636.1	51.4	239

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU49 B-913 trusses		
Comments:			
Area (m²):	83	Classification:	3
Selected Test:	Sign	Estimated Sigma (cpm):	36.7
DCGL (cpm):	202	Sample Size (N):	15
LBGR (cpm):	120	Estimated Conc. (cpm):	-36.7
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 250 ± 29 (1-sigma)
Count Time (min): 1

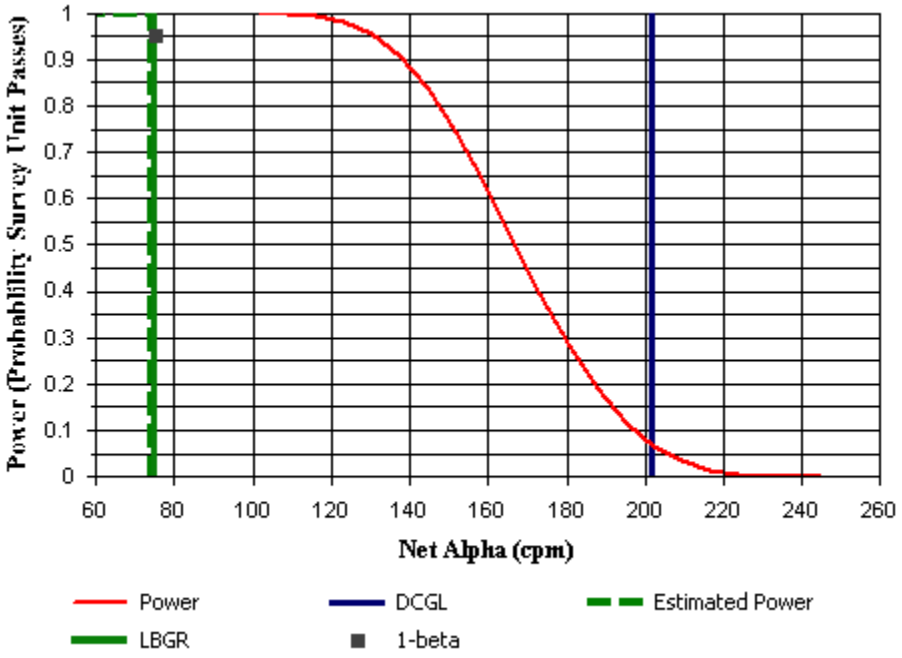
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor		
Comments:			
Area (m²):	93	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	71.7
DCGL (cpm):	202	Sample Size (N):	16
LBGR (cpm):	75	Estimated Conc. (cpm):	74.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	16

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 410 ± 68 (1-sigma)
Count Time (min): 1

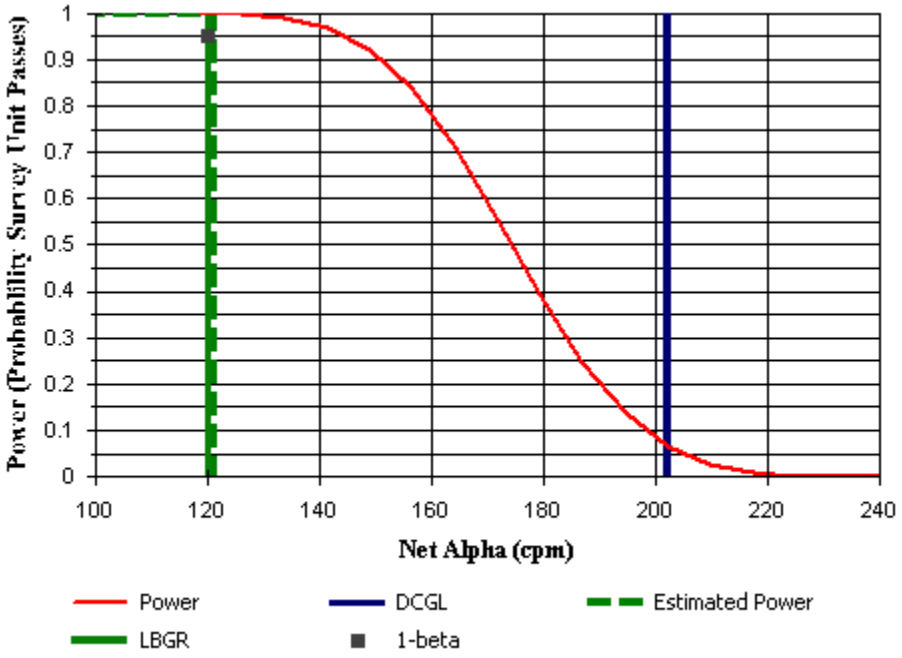
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU61 F-731 Lower West Wall Revised		
Comments:			
Area (m²):	134	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	76
DCGL (cpm):	202	Sample Size (N):	28
LBGR (cpm):	120	Estimated Conc. (cpm):	121
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	28

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 457 ± 56 (1-sigma)
Count Time (min): 1

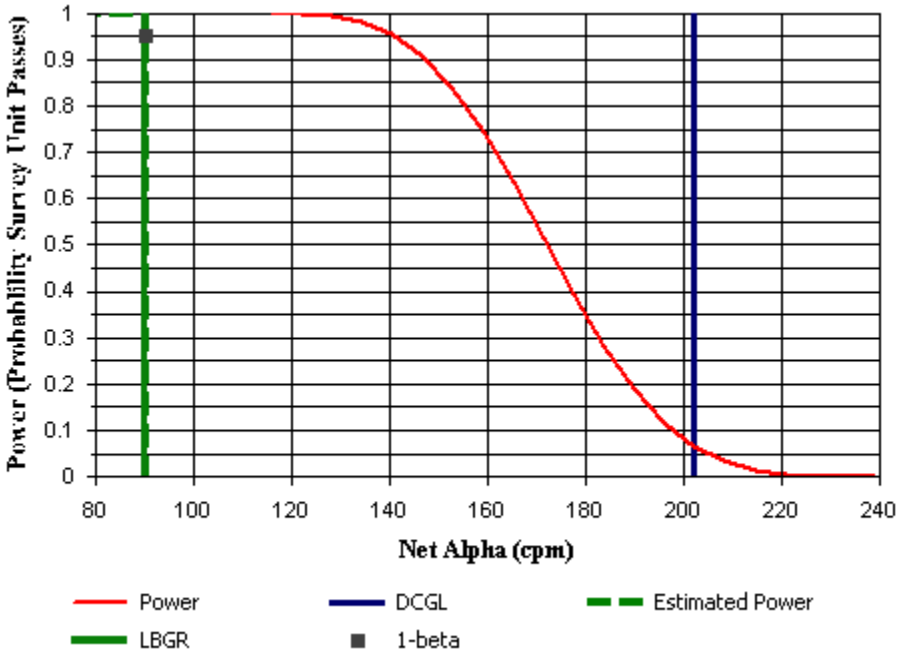
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	191
Concrete	10	335.9	22.7	175
FSS Terra Cotta	9	636.1	51.4	239

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU62 through 65 F-731 walls revised		
Comments:	Largest wall area entered as survey unit area		
Area (m²):	300	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	61.6
DCGL (cpm):	202	Sample Size (N):	16
LBGR (cpm):	90	Estimated Conc. (cpm):	90.3
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²):	400
Total Efficiency:	0.40
Gross Alpha DCGLw (cpm):	202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 377 ± 34 (1-sigma)
Count Time (min): 1

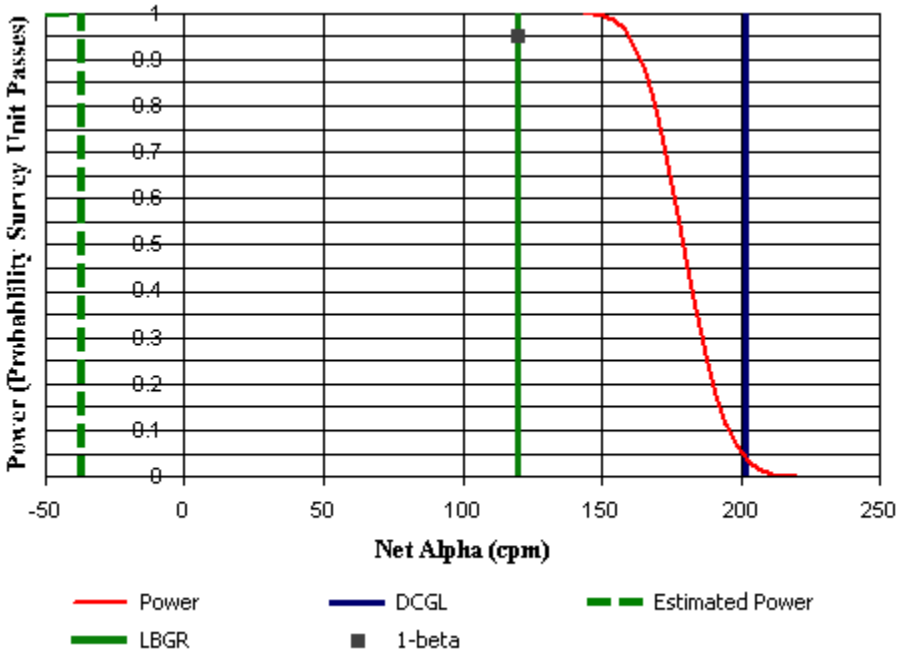
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	191
Concrete	10	335.9	22.7	175
FSS Terra Cotta	9	636.1	51.4	239
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU66 F-731 Trusses		
Comments:	DQO for B-913 used in original development for FSS		
Area (m²):	83	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	36.7
DCGL (cpm):	202	Sample Size (N):	15
LBGR (cpm):	120	Estimated Conc. (cpm):	-36.7
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 250 ± 29 (1-sigma)
Count Time (min): 1

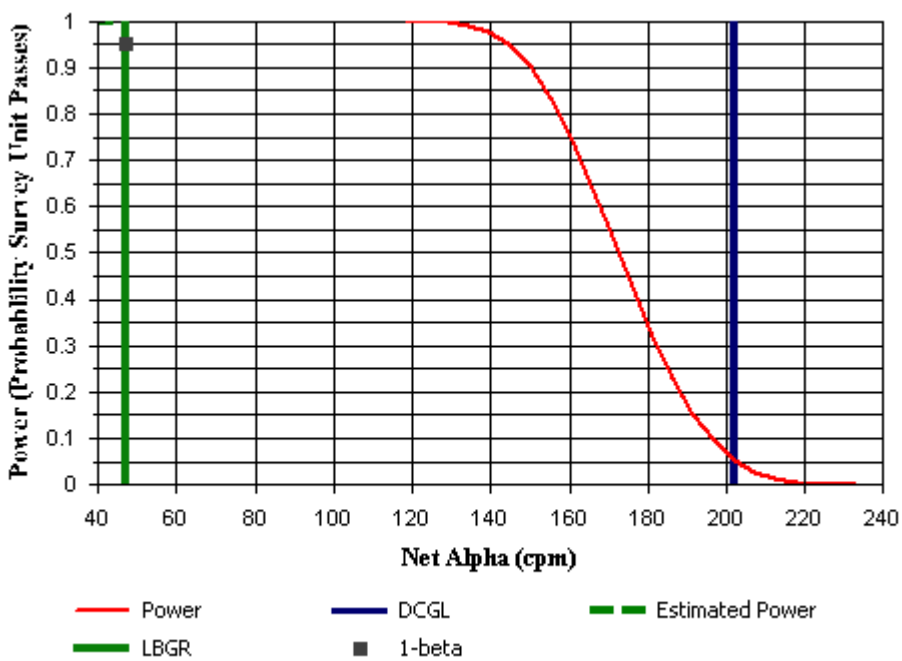
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Wood	10	286.7	22.5	162

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 and C2 SU126 Building F-737		
Comments:	DQO session for multiple SU		
Area (m²):	153	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	52.2
DCGL (cpm):	202	Sample Size (N):	14
LBGR (cpm):	47	Estimated Conc. (cpm):	47.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	14

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 383 ± 47 (1-sigma)
Count Time (min): 1

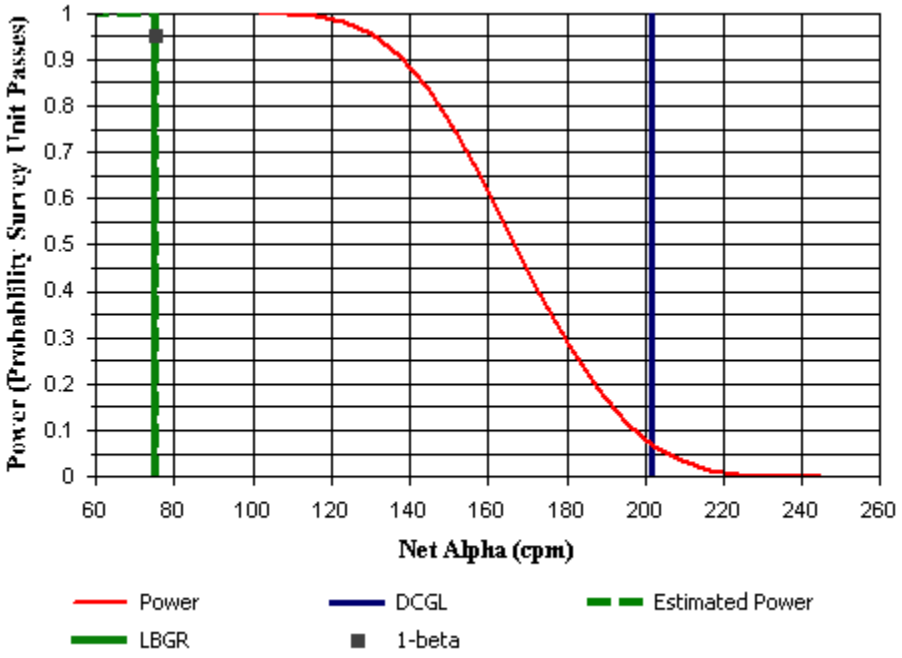
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU124 F-731 Loading Dock		
Comments:	Original DQO used in planning C1 SU77		
Area (m²):	200	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	71.7
DCGL (cpm):	202	Sample Size (N):	16
LBGR (cpm):	75	Estimated Conc. (cpm):	75.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 411 ± 68 (1-sigma)
Count Time (min): 1

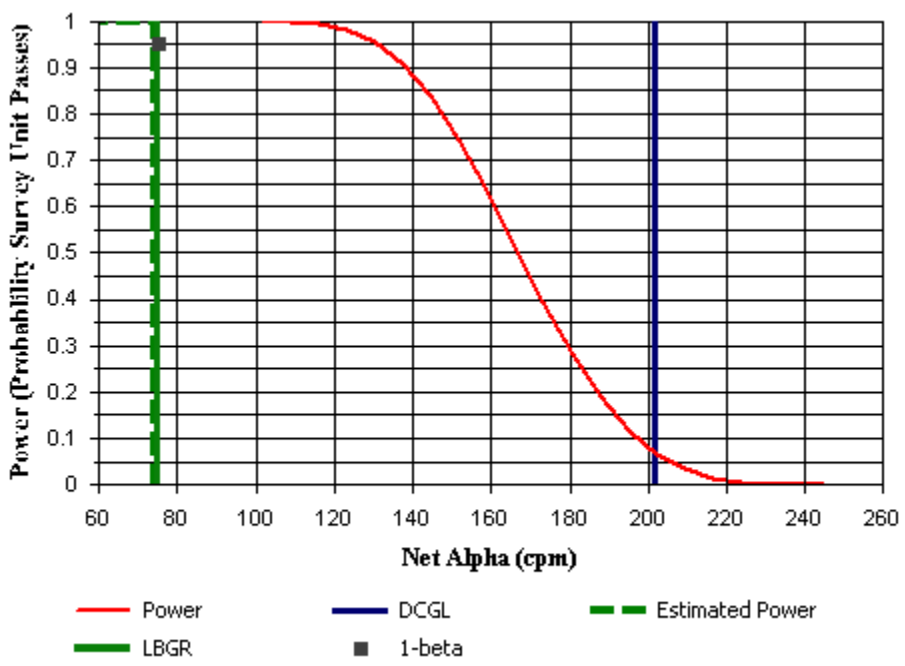
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU~~77~~ SU129 G-723 Loading dock		
Comments:			
Area (m²):	112	Classification:	1
Selected Test:	Sign	Estimated Sigma (cpm):	71.7
DCGL (cpm):	202	Sample Size (N):	16
LBGR (cpm):	75	Estimated Conc. (cpm):	74.1
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050	EMC Sample Size (N):	16

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed
see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²):	400
Total Efficiency:	0.40
Gross Alpha DCGLw (cpm):	202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 410 ± 68 (1-sigma)
Count Time (min): 1

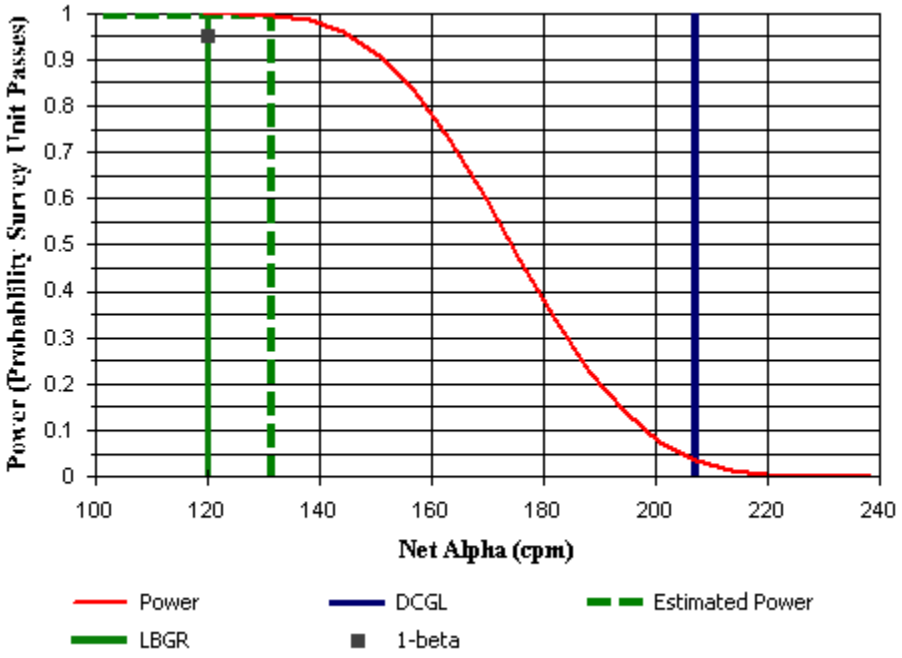
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1		
Comments:			
Area (m²):	293, and 1,022 and 4462 m2	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	62.7
DCGL (cpm):	207	Sample Size (N):	20
LBGR (cpm):	120	Estimated Conc. (cpm):	131
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.41
Gross Alpha DCGLw (cpm): 207

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.41	1.00	0.4100

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 418 ± 56 (1-sigma)
Count Time (min): 1

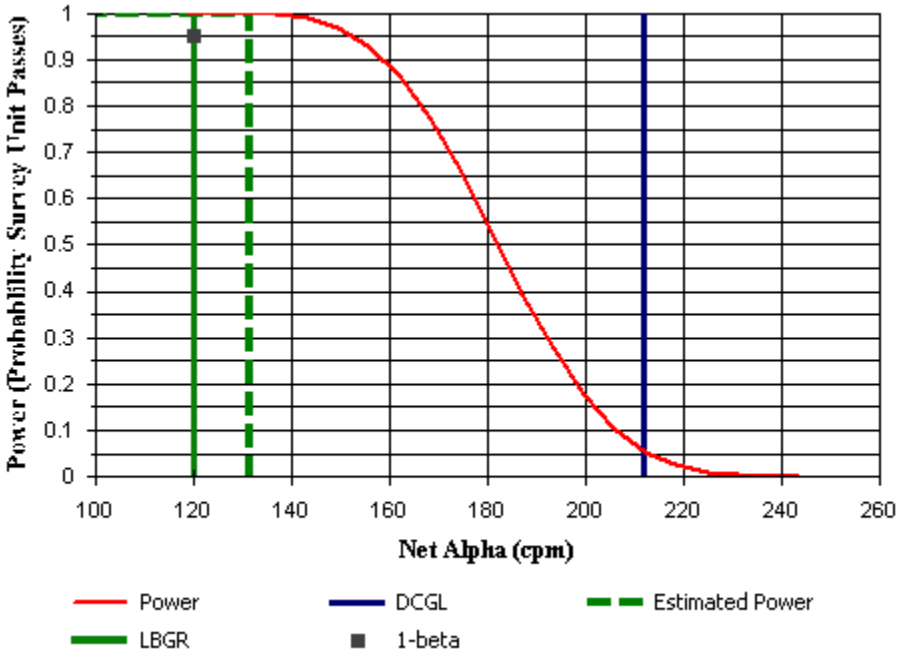
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	186
Concrete	10	335.9	22.7	171
Terra Cotta	10	704	28.2	245
Wood	10	286.7	22.5	158

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2		
Comments:			
Area (m²):	1,022	Classification:	2
Selected Test:	Sign	Estimated Sigma (cpm):	62.7
DCGL (cpm):	212	Sample Size (N):	19
LBGR (cpm):	120	Estimated Conc. (cpm):	131
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta measurements performed see calibration worksheets

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.42
Gross Alpha DCGLw (cpm): 212

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.42	1.00	0.4200

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 418 ± 56 (1-sigma)
Count Time (min): 1

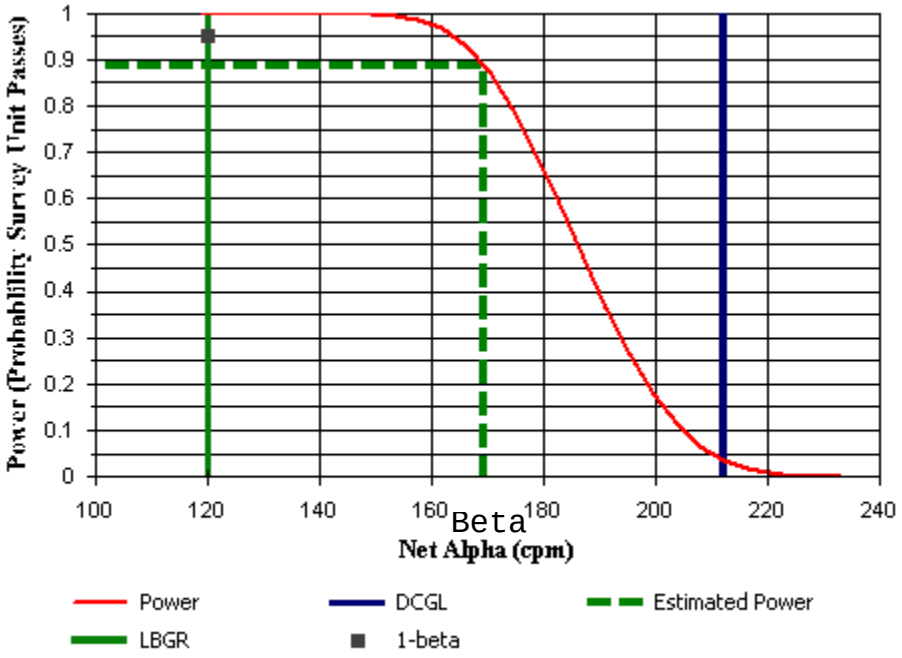
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	182
Concrete	10	335.9	22.7	167
Terra Cotta	10	704	28.2	239
Wood	10	286.7	22.5	154

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles		
Comments:	Single DQO session for Class 3 Building and Debris		
Area (m²):	1,022	Classification:	3
Selected Test:	Sign	Estimated Sigma (cpm):	41.9
DCGL (cpm):	212	Sample Size (N):	15
LBGR (cpm):	120	Estimated Conc. (cpm):	169
Alpha:	0.050	Estimated Power:	0.88
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Beta

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400 Beta
Total Efficiency: 0.42
Gross Alpha DCGLw (cpm): 212

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Beta Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.42	1.00	0.4200

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 456 ± 31 (1-sigma)
Count Time (min): 1

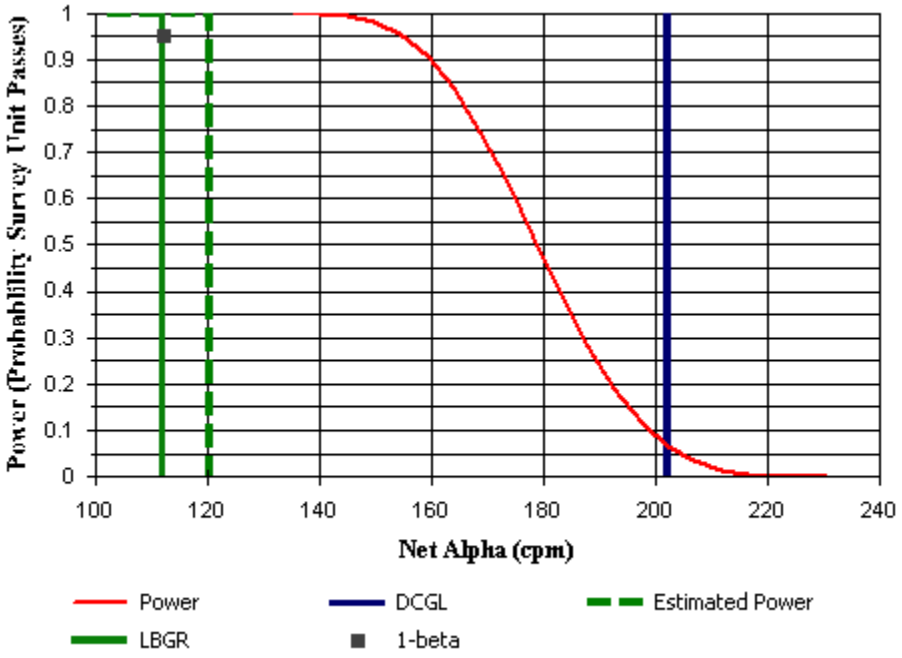
Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Brick	10	402.4	16.1	182
Concrete	10	335.9	22.7	167
Terra Cotta	10	704	28.2	239
Wood	10	286.7	22.5	154

Building Surface Survey Plan

Survey Plan Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO		
Comments:			
Area (m²):	1,022	Classification:	3
Selected Test:	Sign	Estimated Sigma (cpm):	47.7
DCGL (cpm):	202	Sample Size (N):	16
LBGR (cpm):	112	Estimated Conc. (cpm):	120
Alpha:	0.050	Estimated Power:	1.00
Beta:	0.050		

Prospective Power Curve



Building Surface Survey Plan

Contaminant Summary

Contaminant	DCGLw (dpm/100 cm²)
Th-232	400

Alpha Instrumentation Summary

Gross Alpha DCGLw (dpm/100 cm²): 400
Total Efficiency: 0.40
Gross Alpha DCGLw (cpm): 202

ID	Type	Mode	Area (cm²)
3	43-68 Gas Proportional	Alpha	126

Contaminant	Energy[1]	Fraction[2]	Inst. Eff.	Surf. Eff.	Total Eff.
Th-232	N/A	1.0000	0.40	1.00	0.4000

[1] Average beta energy (keV) [N/A indicates alpha emission]
[2] Activity fraction

Gross Survey Unit Mean (cpm): 456 ± 42 (1-sigma)
Count Time (min): 1

Material	Number of BKG Counts	Average (cpm)	Standard Deviation (cpm)	MDC (dpm/100 cm²)
Concrete	10	335.9	22.7	175

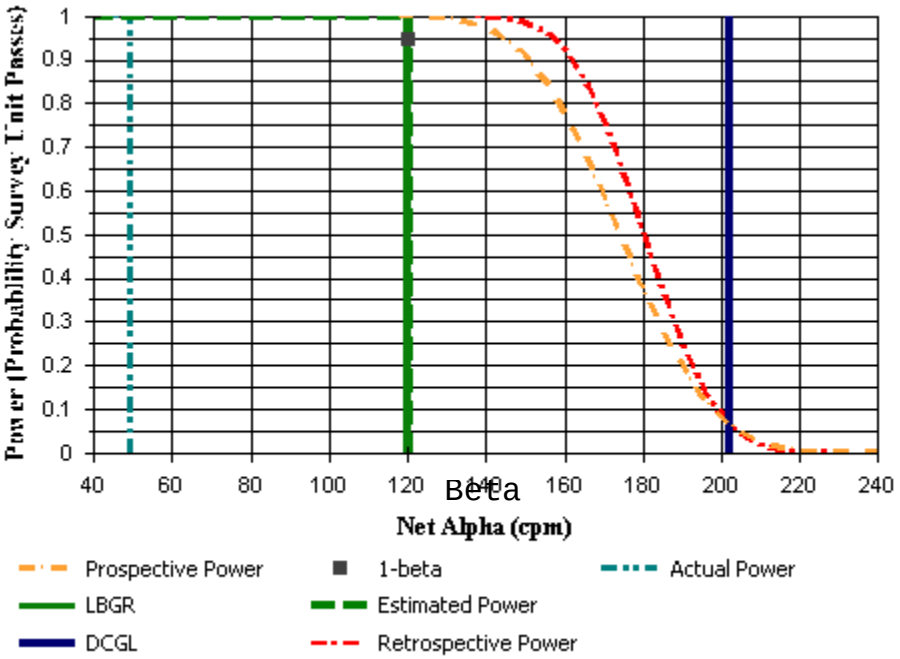
APPENDIX F:
STRUCTURE SURVEY UNIT DQAs

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU12 South Wall		
Report Number:	1		
Survey Unit Measurements:	28		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
5.3, 5.2	Brick	S	478
7.2, 5.2	Concrete	S	315
9.1, 5.2	FSS Terra Cotta	S	625
11.0, 5.2	FSS Terra Cotta	S	618
0.5, 3.6	Brick	S	513
2.4, 3.6	FSS Terra Cotta	S	694
4.3, 3.6	FSS Terra Cotta	S	625
6.2, 3.6	FSS Terra Cotta	S	666
8.1, 3.6	FSS Terra Cotta	S	656
10.0, 3.6	Brick	S	472
11.9, 3.6	FSS Terra Cotta	S	636
13.8, 3.6	FSS Terra Cotta	S	674
1.5, 1.9	FSS Terra Cotta	S	658
3.4, 1.9	FSS Terra Cotta	S	591
5.3, 1.9	Brick	S	517
7.2, 1.9	FSS Terra Cotta	S	660
9.1, 1.9	FSS Terra Cotta	S	658
11.0, 1.9	FSS Terra Cotta	S	662
12.9, 1.9	FSS Terra Cotta	S	747
14.8, 1.9	Brick	S	541
0.5, 0.3	Brick	S	573
2.4, 0.3	FSS Terra Cotta	S	586
4.3, 0.3	FSS Terra Cotta	S	597
6.2, 0.3	FSS Terra Cotta	S	713
8.1, 0.3	FSS Terra Cotta	S	570
10.0, 0.3	Brick	S	451
11.9, 0.3	FSS Terra Cotta	S	674
13.8, 0.3	FSS Terra Cotta	S	631

Basic Statistical Quantities Summary

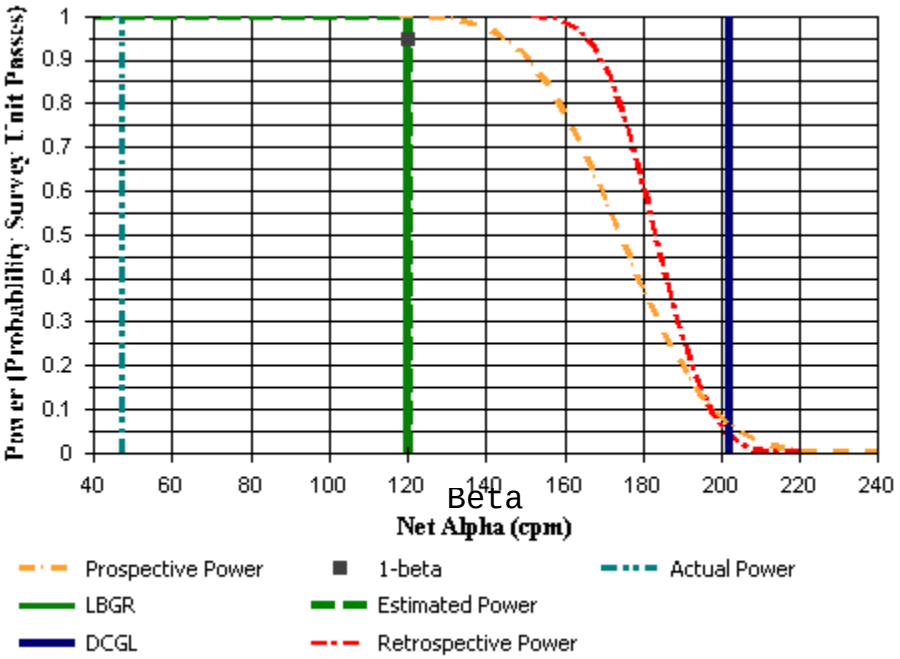
Statistic	Survey Unit	Background	DQO Results
Sample Number	28	N/A	N=28
Mean (dpm/100 cm²)	65.62	N/A	120
Median (dpm/100 cm²)	49.38	N/A	N/A
Std Dev (dpm/100 cm²)	117.92	N/A	76
High Value (dpm/100 cm²)	338.49	N/A	N/A
Low Value (dpm/100 cm²)	-131.17	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU13 S. West Wall		
Report Number:	9		
Survey Unit Measurements:	27		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.8, 3.4	FSS Terra Cotta	S	640
1.8, 1.2	FSS Terra Cotta	S	669
3.7, 4.5	FSS Terra Cotta	S	672
3.7, 2.3	FSS Terra Cotta	S	658
3.7, 0.1	FSS Terra Cotta	S	645
5.6, 3.4	Brick	S	448
5.6, 1.2	FSS Terra Cotta	S	534
7.5, 4.5	FSS Terra Cotta	S	603
7.5, 2.3	FSS Terra Cotta	S	660
7.5, 0.1	FSS Terra Cotta	S	634
9.4, 3.4	FSS Terra Cotta	S	664
9.4, 1.2	FSS Terra Cotta	S	615
11.3, 4.5	FSS Terra Cotta	S	699
11.3, 2.3	FSS Terra Cotta	S	722
11.3, 0.1	FSS Terra Cotta	S	737
13.2, 3.4	FSS Terra Cotta	S	710
13.2, 1.2	FSS Terra Cotta	S	694
15.1, 4.5	FSS Terra Cotta	S	649
15.1, 2.3	FSS Terra Cotta	S	643
15.1, 0.1	FSS Terra Cotta	S	697
17.0, 3.4	FSS Terra Cotta	S	662
17.0, 1.2	FSS Terra Cotta	S	686
18.9, 4.5	FSS Terra Cotta	S	633
18.9, 2.3	FSS Terra Cotta	S	591
18.9, 0.1	FSS Terra Cotta	S	660
20.8, 3.4	FSS Terra Cotta	S	682
20.8, 1.2	FSS Terra Cotta	S	601

Basic Statistical Quantities Summary

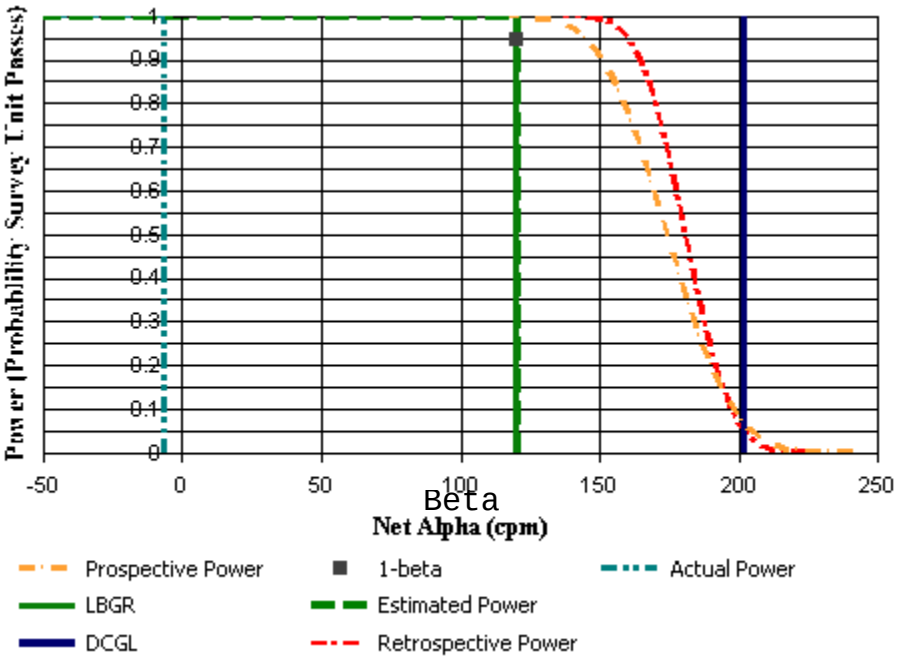
Statistic	Survey Unit	Background	DQO Results
Sample Number	27	N/A	N=28
Mean (dpm/100 cm²)	41.65	N/A	120
Median (dpm/100 cm²)	47.40	N/A	N/A
Std Dev (dpm/100 cm²)	86.84	N/A	76
High Value (dpm/100 cm²)	200.18	N/A	N/A
Low Value (dpm/100 cm²)	-202.60	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU14 C. West Wall		
Report Number:	3		
Survey Unit Measurements:	29		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
23.2, 4.5	FSS Terra Cotta	S	684
23.2, 2.3	FSS Terra Cotta	S	595
23.2, 0.1	FSS Terra Cotta	S	562
25.1, 3.4	FSS Terra Cotta	S	704
25.1, 1.2	FSS Terra Cotta	S	664
27.0, 4.5	FSS Terra Cotta	S	623
27.0, 2.3	FSS Terra Cotta	S	618
27.0, 0.1	FSS Terra Cotta	S	576
28.8, 3.4	FSS Terra Cotta	S	612
28.8, 1.2	FSS Terra Cotta	S	622
30.7, 4.5	Brick	S	475
30.7, 2.3	Brick	S	457
30.7, 0.1	Brick	S	437
32.6, 3.4	FSS Terra Cotta	S	633
32.6, 1.2	Concrete	S	329
34.5, 2.3	Concrete	S	349
34.5, 0.1	Concrete	S	325
36.4, 3.4	Brick	S	406
36.4, 1.2	Brick	S	539
38.2, 4.5	FSS Terra Cotta	S	611
38.2, 2.3	FSS Terra Cotta	S	539
38.2, 0.1	FSS Terra Cotta	S	679
40.1, 3.4	FSS Terra Cotta	S	614
40.1, 1.2	FSS Terra Cotta	S	619
42.0, 4.5	Brick	S	398
42.0, 2.3	Brick	S	460
42.0, 0.1	Brick	S	527
43.9, 3.4	FSS Terra Cotta	S	637
43.9, 1.2	FSS Terra Cotta	S	695

DQA Building Surface Report

Basic Statistical Quantities Summary

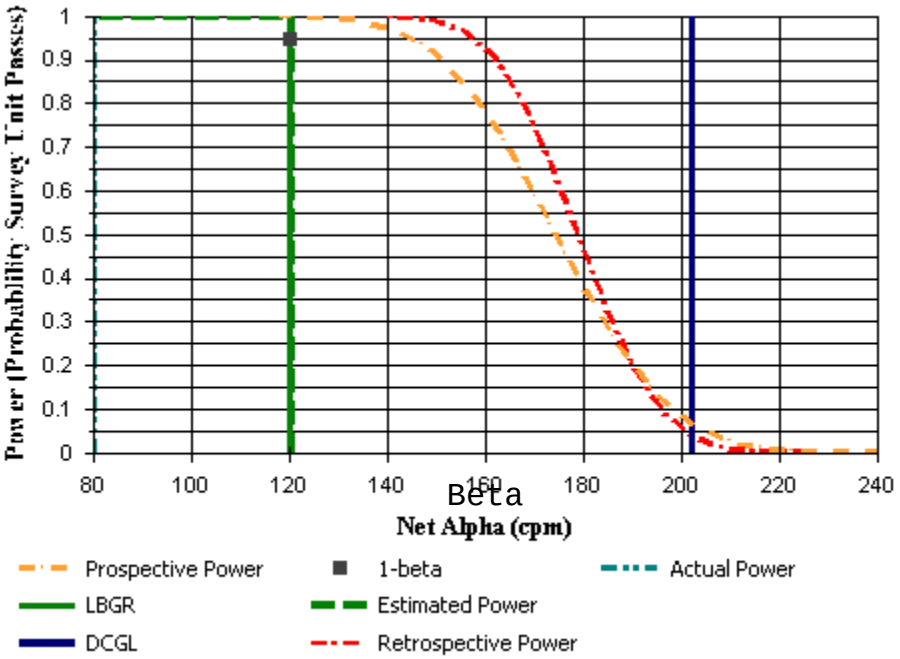
Statistic	Survey Unit	Background	DQO Results
Sample Number	29	N/A	N=28
Mean (dpm/100 cm²)	21.35	N/A	120
Median (dpm/100 cm²)	-6.17	N/A	N/A
Std Dev (dpm/100 cm²)	105.98	N/A	76
High Value (dpm/100 cm²)	271.03	N/A	N/A
Low Value (dpm/100 cm²)	-192.68	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU15 N. West Wall		
Report Number:	4		
Survey Unit Measurements:	32		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
44.9, 3.3	FSS Terra Cotta	S	671
44.9, 1.2	FSS Terra Cotta	S	739
46.7, 4.4	FSS Terra Cotta	S	619
46.7, 2.3	FSS Terra Cotta	S	558
46.7, 0.2	FSS Terra Cotta	S	723
48.5, 3.3	Brick	S	424
48.5, 1.2	Brick	S	539
50.4, 4.4	FSS Terra Cotta	S	657
50.4, 2.3	FSS Terra Cotta	S	668
50.4, 0.2	FSS Terra Cotta	S	713
52.2, 3.3	Concrete	S	338
52.2, 1.2	FSS Terra Cotta	S	623
54.0, 4.4	Brick	S	465
54.0, 2.3	Brick	S	522
54.0, 0.2	Brick	S	547
55.9, 3.3	FSS Terra Cotta	S	652
55.9, 1.2	FSS Terra Cotta	S	701
57.7, 4.4	FSS Terra Cotta	S	649
57.7, 2.3	FSS Terra Cotta	S	714
57.7, 0.2	FSS Terra Cotta	S	650
59.5, 3.3	FSS Terra Cotta	S	675
59.5, 1.2	FSS Terra Cotta	S	623
61.3, 4.4	FSS Terra Cotta	S	695
61.3, 2.3	FSS Terra Cotta	S	550
61.3, 0.2	FSS Terra Cotta	S	654
63.2, 3.3	FSS Terra Cotta	S	647
63.2, 1.2	FSS Terra Cotta	S	752
65.0, 4.4	FSS Terra Cotta	S	681
65.0, 2.3	FSS Terra Cotta	S	776
65.0, 0.2	FSS Terra Cotta	S	687
66.8, 3.3	FSS Terra Cotta	S	766
66.8, 1.2	FSS Terra Cotta	S	678

DQA Building Surface Report

Basic Statistical Quantities Summary

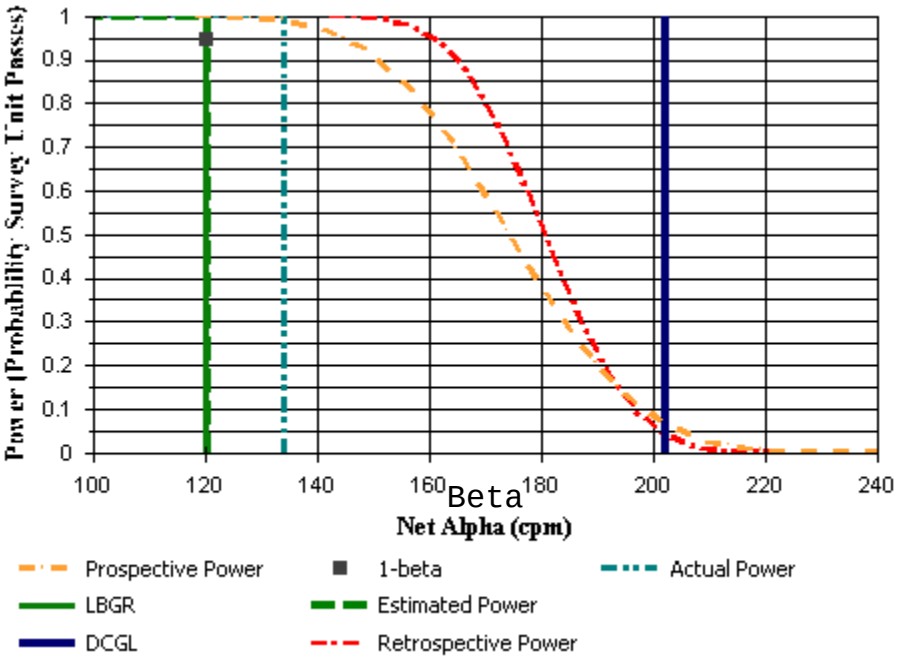
Statistic	Survey Unit	Background	DQO Results
Sample Number	32	N/A	N=28
Mean (dpm/100 cm²)	91.10	N/A	120
Median (dpm/100 cm²)	80.14	N/A	N/A
Std Dev (dpm/100 cm²)	115.04	N/A	76
High Value (dpm/100 cm²)	286.90	N/A	N/A
Low Value (dpm/100 cm²)	-170.86	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU16 North Wall		
Report Number:	8		
Survey Unit Measurements:	27		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.0, 0.1	Brick	S	498
3.0, 0.1	FSS Terra Cotta	S	717
4.9, 0.1	FSS Terra Cotta	S	623
6.9, 0.1	FSS Terra Cotta	S	641
8.8, 0.1	FSS Terra Cotta	S	656
10.8, 0.1	Brick	S	513
12.8, 0.1	FSS Terra Cotta	S	573
14.7, 0.1	Brick	S	531
0.0, 1.8	Brick	S	555
2.0, 1.8	FSS Terra Cotta	S	713
3.9, 1.8	FSS Terra Cotta	S	702
5.9, 1.8	Brick	S	465
7.9, 1.8	FSS Terra Cotta	S	708
9.8, 1.8	Brick	S	470
11.8, 1.8	FSS Terra Cotta	S	678
13.7, 1.8	FSS Terra Cotta	S	709
1.0, 3.5	Brick	S	503
3.0, 3.5	FSS Terra Cotta	S	674
4.9, 3.5	Brick	S	529
6.9, 3.5	FSS Terra Cotta	S	622
8.8, 3.5	FSS Terra Cotta	S	685
10.8, 3.5	Brick	S	498
12.8, 3.5	FSS Terra Cotta	S	688
14.7, 3.5	Brick	S	552
5.9, 5.2	Brick	S	456
7.9, 5.2	FSS Terra Cotta	S	713
9.8, 5.2	FSS Terra Cotta	S	685

Basic Statistical Quantities Summary

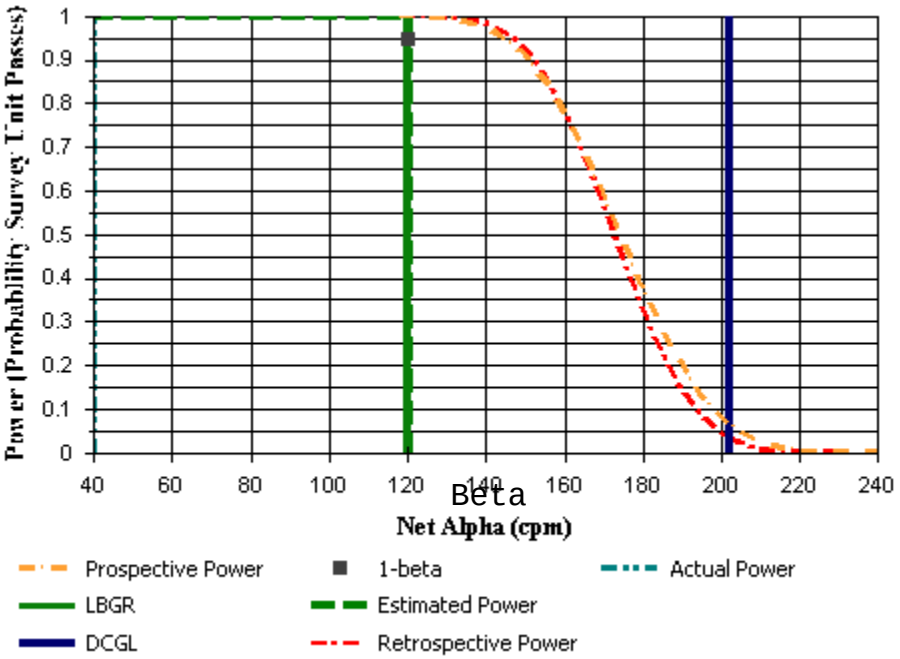
Statistic	Survey Unit	Background	DQO Results
Sample Number	27	N/A	N=28
Mean (dpm/100 cm²)	128.81	N/A	120
Median (dpm/100 cm²)	134.13	N/A	N/A
Std Dev (dpm/100 cm²)	99.25	N/A	76
High Value (dpm/100 cm²)	302.78	N/A	N/A
Low Value (dpm/100 cm²)	-125.22	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU17 N. East Wall		
Report Number:	5		
Survey Unit Measurements:	30		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
45.2, 0.1	Concrete	S	510
45.2, 2.3	Wood	S	242
45.2, 4.4	FSS Terra Cotta	S	656
47.1, 1.2	FSS Terra Cotta	S	580
47.1, 3.3	FSS Terra Cotta	S	653
49.0, 0.1	Brick	S	546
49.0, 2.3	Brick	S	502
49.0, 4.4	Brick	S	465
50.9, 1.2	FSS Terra Cotta	S	611
50.9, 3.3	FSS Terra Cotta	S	644
52.7, 0.1	FSS Terra Cotta	S	633
52.7, 2.3	FSS Terra Cotta	S	621
52.7, 4.4	FSS Terra Cotta	S	649
54.6, 1.2	Brick	S	508
54.6, 3.3	Brick	S	522
56.5, 0.1	Wood	S	237
56.5, 2.3	Wood	S	250
56.5, 4.4	FSS Terra Cotta	S	637
58.4, 1.2	Concrete	S	466
58.4, 3.3	Concrete	S	476
60.3, 0.1	Brick	S	572
60.3, 2.3	Brick	S	468
60.3, 4.4	Brick	S	436
62.2, 1.2	FSS Terra Cotta	S	695
62.2, 3.3	FSS Terra Cotta	S	685
64.0, 0.1	FSS Terra Cotta	S	657
64.0, 2.3	FSS Terra Cotta	S	644
64.0, 4.4	Concrete	S	341
65.9, 1.2	FSS Terra Cotta	S	581
65.9, 3.3	FSS Terra Cotta	S	662

DQA Building Surface Report

Basic Statistical Quantities Summary

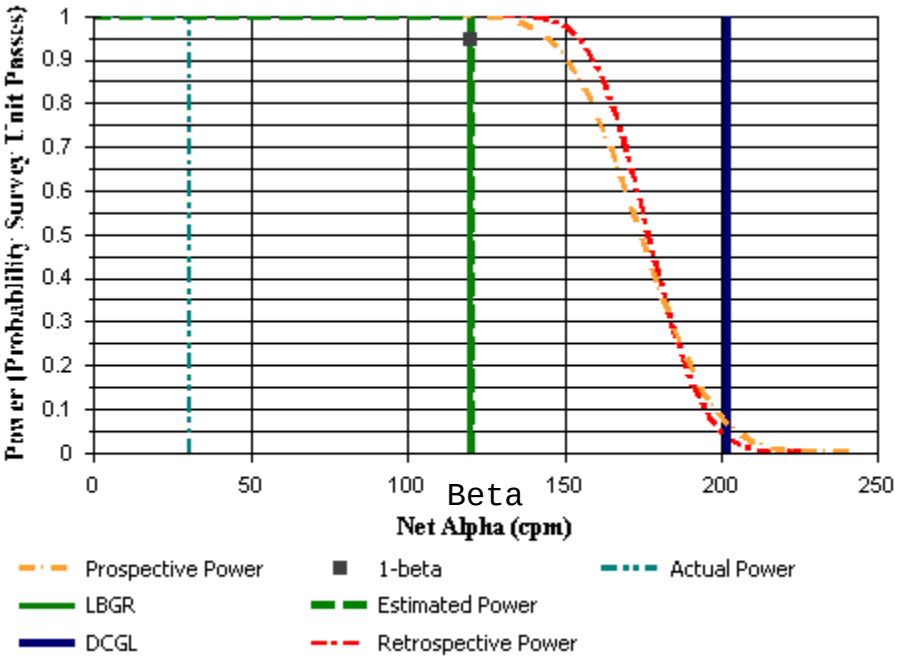
Statistic	Survey Unit	Background	DQO Results
Sample Number	30	N/A	N=28
Mean (dpm/100 cm²)	78.34	N/A	120
Median (dpm/100 cm²)	40.45	N/A	N/A
Std Dev (dpm/100 cm²)	135.40	N/A	76
High Value (dpm/100 cm²)	345.44	N/A	N/A
Low Value (dpm/100 cm²)	-111.33	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU18 C. East Wall		
Report Number:	6		
Survey Unit Measurements:	30		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
23.0, 0.0	FSS Terra Cotta	S	637
23.0, 2.2	FSS Terra Cotta	S	664
23.0, 4.4	FSS Terra Cotta	S	652
24.9, 1.1	Brick	S	519
24.9, 3.3	Brick	S	427
26.8, 0.0	FSS Terra Cotta	S	629
26.8, 2.2	FSS Terra Cotta	S	675
26.8, 4.4	Concrete	S	329
28.6, 1.1	FSS Terra Cotta	S	551
28.6, 3.3	FSS Terra Cotta	S	664
30.5, 0.0	Brick	S	550
30.5, 2.2	Brick	S	498
30.5, 4.4	Brick	S	431
32.4, 1.1	Wood	S	234
32.4, 3.3	FSS Terra Cotta	S	674
34.3, 0.0	Concrete	S	292
34.3, 2.2	Wood	S	238
34.3, 4.4	FSS Terra Cotta	S	641
36.2, 1.1	Brick	S	526
36.2, 3.3	Brick	S	469
38.0, 0.0	FSS Terra Cotta	S	645
38.0, 2.2	FSS Terra Cotta	S	651
38.0, 4.4	Concrete	S	291
39.9, 1.1	FSS Terra Cotta	S	590
39.9, 3.3	FSS Terra Cotta	S	666
41.8, 0.0	FSS Terra Cotta	S	566
41.8, 2.2	FSS Terra Cotta	S	744
41.8, 4.4	FSS Terra Cotta	S	621
43.7, 1.1	FSS Terra Cotta	S	625
43.7, 3.3	FSS Terra Cotta	S	689

DQA Building Surface Report

Basic Statistical Quantities Summary

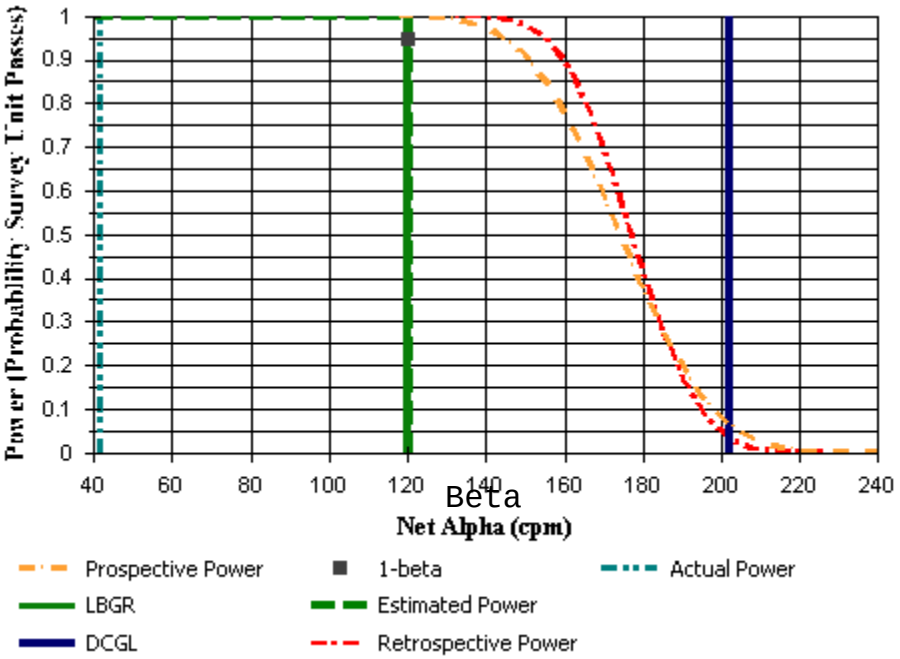
Statistic	Survey Unit	Background	DQO Results
Sample Number	30	N/A	N=28
Mean (dpm/100 cm²)	35.72	N/A	120
Median (dpm/100 cm²)	30.53	N/A	N/A
Std Dev (dpm/100 cm²)	116.61	N/A	76
High Value (dpm/100 cm²)	292.86	N/A	N/A
Low Value (dpm/100 cm²)	-168.87	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 through 19 B-911 walls Rev 1 C1 SU19 S. East Wall		
Report Number:	7		
Survey Unit Measurements:	30		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.7, 0.1	Brick	S	545
0.7, 2.3	Brick	S	561
0.7, 4.4	Brick	S	451
2.6, 1.2	FSS Terra Cotta	S	622
2.6, 3.4	FSS Terra Cotta	S	653
4.4, 0.1	FSS Terra Cotta	S	603
4.4, 2.3	FSS Terra Cotta	S	640
4.4, 4.4	FSS Terra Cotta	S	683
6.3, 1.2	FSS Terra Cotta	S	648
6.3, 3.4	FSS Terra Cotta	S	697
8.2, 0.1	Concrete	S	322
8.2, 2.3	Wood	S	245
8.2, 4.4	FSS Terra Cotta	S	636
10.1, 1.2	Concrete	S	425
10.1, 3.4	Concrete	S	361
12.0, 0.1	Brick	S	540
12.0, 2.3	Brick	S	512
12.0, 4.4	Brick	S	510
13.8, 1.2	FSS Terra Cotta	S	678
13.8, 3.4	FSS Terra Cotta	S	615
15.7, 0.1	FSS Terra Cotta	S	721
15.7, 2.3	FSS Terra Cotta	S	582
15.7, 4.4	Concrete	S	301
17.6, 1.2	FSS Terra Cotta	S	646
17.6, 3.4	FSS Terra Cotta	S	616
19.5, 0.1	FSS Terra Cotta	S	618
19.5, 2.3	FSS Terra Cotta	S	662
19.5, 4.4	FSS Terra Cotta	S	697
21.4, 1.2	FSS Terra Cotta	S	677
21.4, 3.4	FSS Terra Cotta	S	633

DQA Building Surface Report

Basic Statistical Quantities Summary

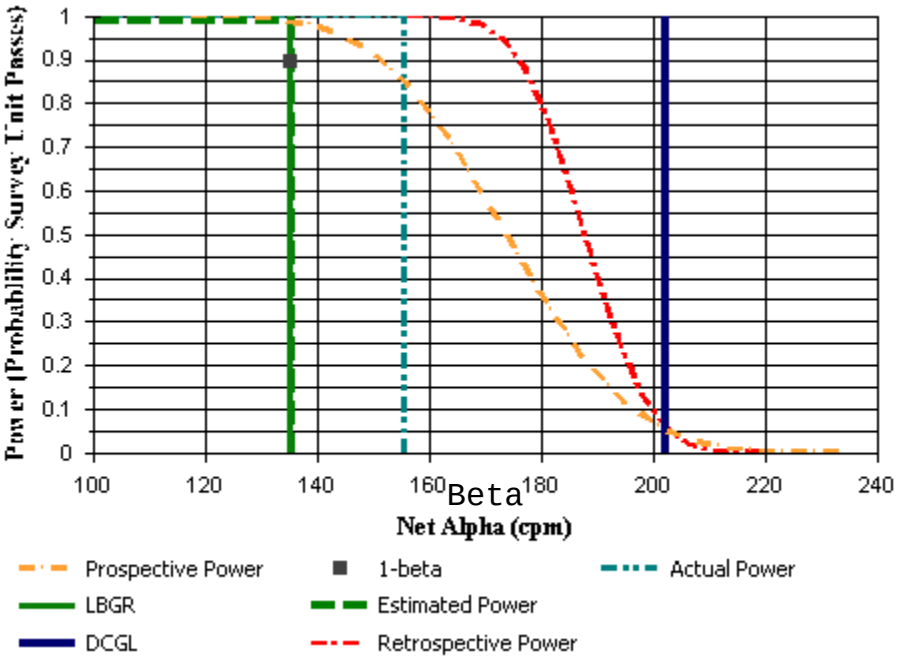
Statistic	Survey Unit	Background	DQO Results
Sample Number	30	N/A	N=28
Mean (dpm/100 cm²)	64.10	N/A	120
Median (dpm/100 cm²)	41.66	N/A	N/A
Std Dev (dpm/100 cm²)	115.13	N/A	76
High Value (dpm/100 cm²)	314.68	N/A	N/A
Low Value (dpm/100 cm²)	-107.36	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU20 B-911 trusses		
Report Number:	1		
Survey Unit Measurements:	33		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
Truss 1, 13.3	Wood	S	366
Truss 1, 10.8	Wood	S	316
Truss 1, 7.2	Wood	S	315
Truss 1, 1.2	Wood	S	293
Truss 2, 11.0	Wood	S	353
Truss 2, 1.5	Wood	S	379
Truss 3, 14.4	Wood	S	341
Truss 3, 7.8	Wood	S	361
Truss 3, 3.2	Wood	S	366
Truss 4, 11.4	Wood	S	384
Truss 4, 7.9	Wood	S	417
Truss 4, 6.1	Wood	S	389
Truss 5, 12.6	Wood	S	480
Post RA:Truss 5, 12.	Wood	S	400
Truss 5, 10.5	Wood	S	380
Truss 5, 3.4	Wood	S	414
Truss 5, 2.0	Wood	S	363
Truss 6, 11.8	Wood	S	458
Truss 6, 7.9	Wood	S	344
Truss 6, 2.9	Wood	S	436
Truss 7, 12.6	Wood	S	345
Truss 7, 8.9	Wood	S	365
Truss 7, 1.1	Wood	S	381
Truss 8, 13.2	Wood	S	355
Truss 8, 7.6	Wood	S	328
Truss 8, 2.6	Wood	S	360
Truss 9, 14.5	Wood	S	340
Truss 9, 9.0	Wood	S	368
Truss 9, 4.1	Wood	S	381
Truss 10, 14.3	Wood	S	347
Truss 10, 8.6	Wood	S	451
Truss 10, 5.9	Wood	S	360
Truss 10, 1.4	Wood	S	358

DQA Building Surface Report

Basic Statistical Quantities Summary

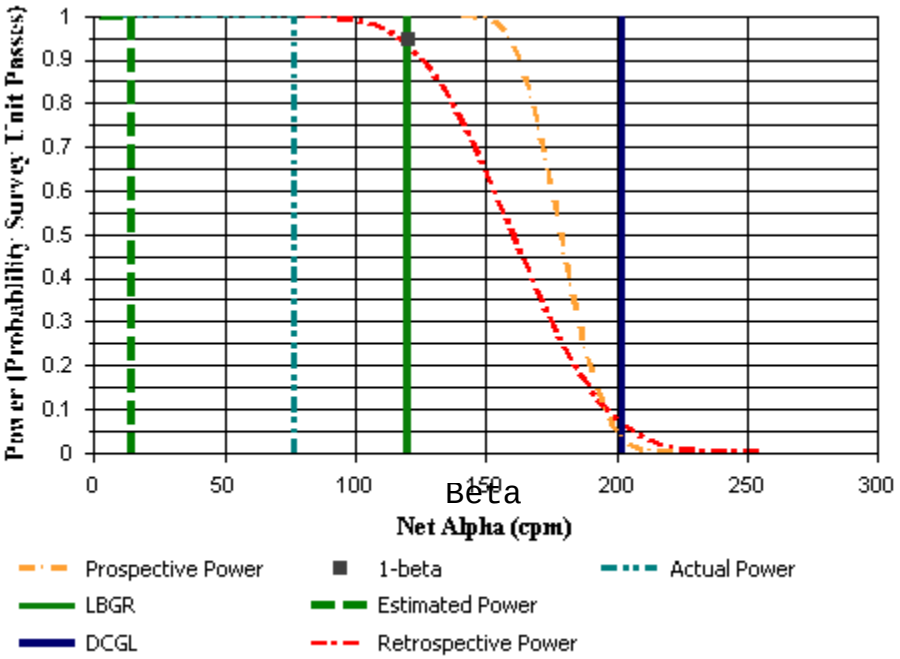
Statistic	Survey Unit	Background	DQO Results
Sample Number	33	N/A	N=31
Mean (dpm/100 cm²)	170.33	N/A	135
Median (dpm/100 cm²)	155.36	N/A	N/A
Std Dev (dpm/100 cm²)	82.13	N/A	76.4
High Value (dpm/100 cm²)	383.53	N/A	N/A
Low Value (dpm/100 cm²)	12.50	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU21 B-911 Loading Dock		
Report Number:	1		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Pass
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.9, 3.9	Concrete	S	343
0.4, 8.3	Concrete	S	330
2.9, 12.7	Concrete	S	319
0.4, 17.1	Concrete	S	388
2.9, 21.5	Concrete	S	327
0.4, 25.9	Concrete	S	393
2.9, 30.2	Concrete	S	362
0.4, 34.6	Concrete	S	637
Post RA: 0.4, 34.6	Concrete	S	546
2.9, 39.0	Concrete	S	385
0.4, 43.4	Concrete	S	423
2.9, 47.8	Concrete	S	380
0.4, 52.2	Concrete	S	452
2.9, 56.6	Concrete	S	345
0.4, 60.9	Concrete	S	369
2.9, 65.3	Concrete	S	346

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=15
Mean (dpm/100 cm²)	120.36	N/A	14.1
Median (dpm/100 cm²)	76.59	N/A	N/A
Std Dev (dpm/100 cm²)	169.70	N/A	37.6
High Value (dpm/100 cm²)	597.42	N/A	N/A
Low Value (dpm/100 cm²)	-33.53	N/A	N/A

DQA Building Surface Report

Statistical Test Summary

S+:	14
Critical Value:	11
Result:	Pass

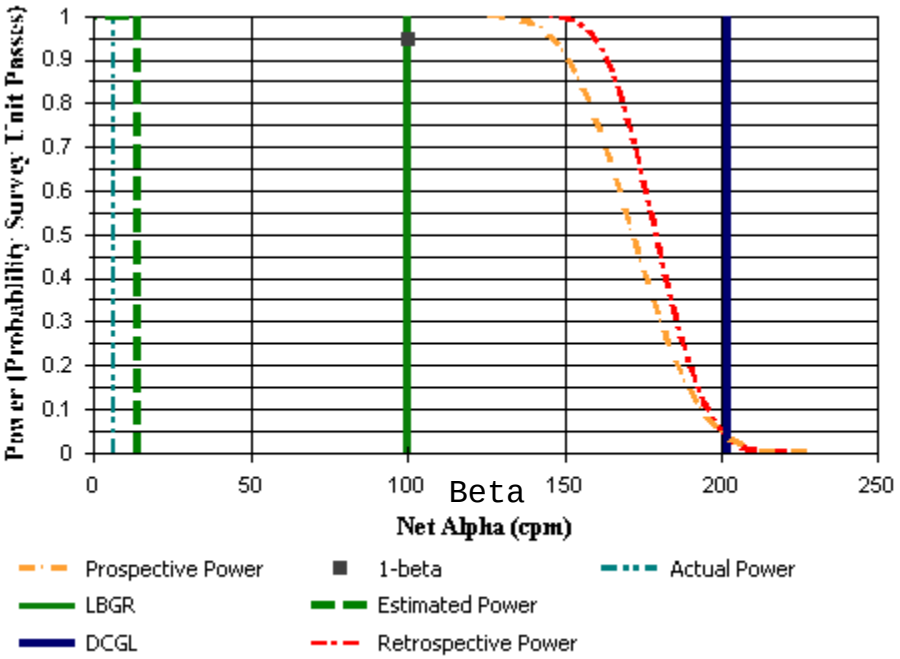
Data	DCGLw - Data	Sign
7.10000000000002	194.90	+
-5.89999999999998	207.90	+
-16.9	218.90	+
52.1	149.90	+
-8.89999999999998	210.90	+
57.1	144.90	+
26.1	175.90	+
301.1	-99.10	-
210.1	-8.10	-
49.1	152.90	+
87.1	114.90	+
44.1	157.90	+
116.1	85.90	+
9.10000000000002	192.90	+
33.1	168.90	+
10.1	191.90	+

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU22		
Report Number:	1		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.8, 0.5	Concrete	S	331
4.0, 0.5	Concrete	S	331
7.2, 0.5	Concrete	S	339
10.4, 0.5	Concrete	S	368
13.6, 0.5	Concrete	S	366
2.4, 3.2	Concrete	S	396
5.6, 3.2	Concrete	S	304
8.8, 3.2	Concrete	S	294
12.0, 3.2	Concrete	S	329
15.2, 3.2	Concrete	S	426
0.8, 6.0	Concrete	S	372
4.0, 6.0	Concrete	S	374
7.2, 6.0	Concrete	S	311
10.4, 6.0	Concrete	S	313
13.6, 6.0	Concrete	S	360

Basic Statistical Quantities Summary

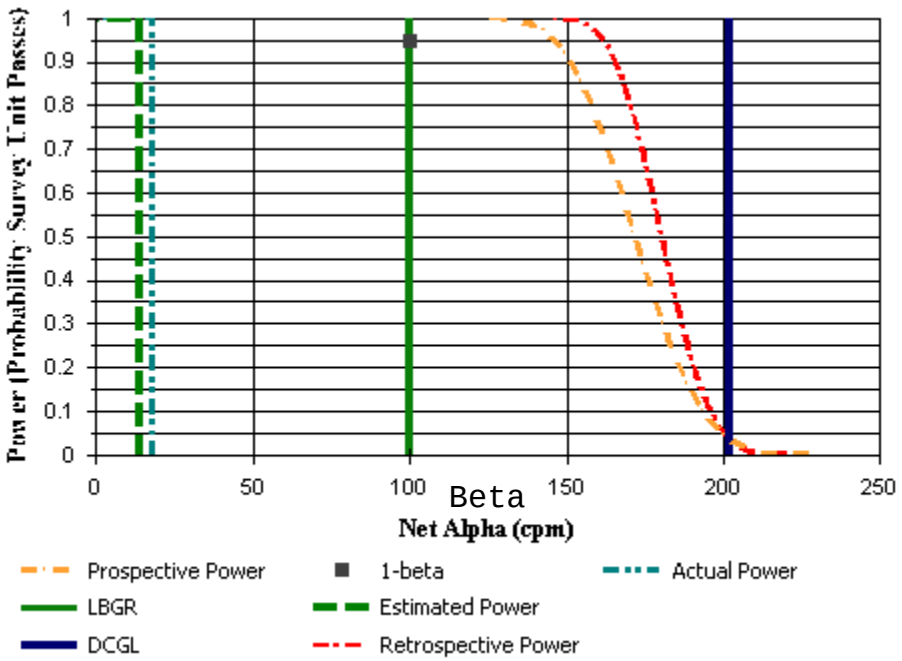
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	23.21	N/A	14.1
Median (dpm/100 cm²)	6.15	N/A	N/A
Std Dev (dpm/100 cm²)	73.04	N/A	48.6
High Value (dpm/100 cm²)	178.77	N/A	N/A
Low Value (dpm/100 cm²)	-83.13	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU23		
Report Number:	2		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.1, 6.5	Concrete	S	363
3.2, 6.5	Concrete	S	348
6.2, 6.5	Concrete	S	310
9.3, 6.5	Concrete	S	352
12.3, 6.5	Concrete	S	302
1.6, 9.2	Concrete	S	334
0.4, 6.8	Concrete	S	365
0.7, 7.0	Concrete	S	373
9.1, 12.0	Concrete	S	280
1.1, 10.1	Concrete	S	315
0.1, 11.8	Concrete	S	407
3.2, 11.8	Concrete	S	345
6.2, 11.8	Concrete	S	374
9.3, 11.8	Concrete	S	337
8.3, 11.5	Concrete	S	292

Basic Statistical Quantities Summary

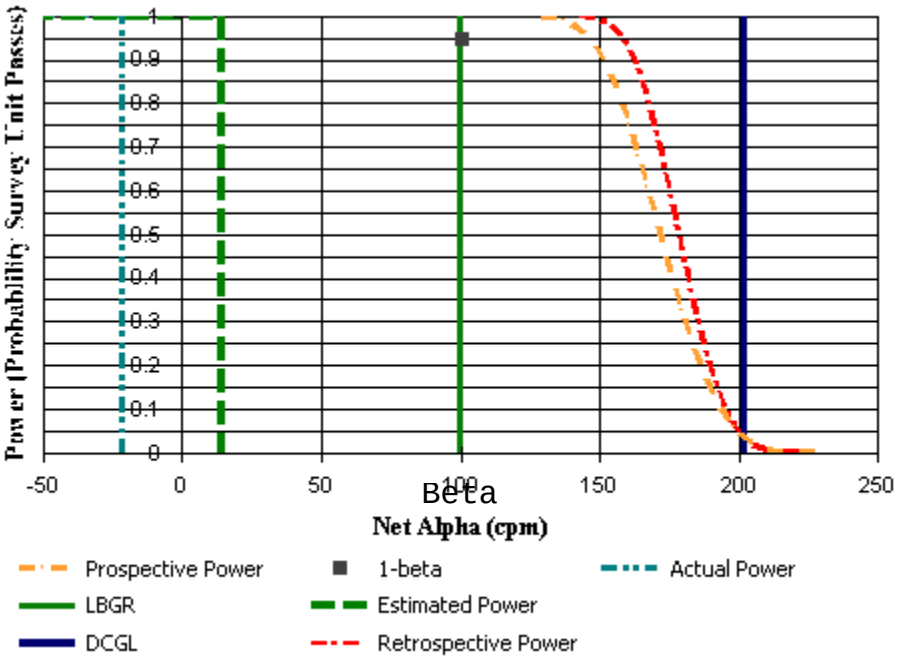
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	7.74	N/A	14.1
Median (dpm/100 cm²)	18.06	N/A	N/A
Std Dev (dpm/100 cm²)	69.22	N/A	48.6
High Value (dpm/100 cm²)	141.07	N/A	N/A
Low Value (dpm/100 cm²)	-110.91	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU24		
Report Number:	3		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.1, 12.5	Concrete	S	410
5.3, 12.5	Concrete	S	347
8.5, 12.5	Concrete	S	375
11.7, 12.5	Concrete	S	329
1.6, 16.4	Concrete	S	296
0.5, 15.3	Concrete	S	352
3.7, 15.3	Concrete	S	338
6.9, 15.3	Concrete	S	321
10.1, 15.3	Concrete	S	323
13.3, 15.3	Concrete	S	299
2.1, 18.1	Concrete	S	325
5.3, 18.1	Concrete	S	325
8.5, 18.1	Concrete	S	291
11.7, 18.1	Concrete	S	305
14.9, 18.1	Concrete	S	414

Basic Statistical Quantities Summary

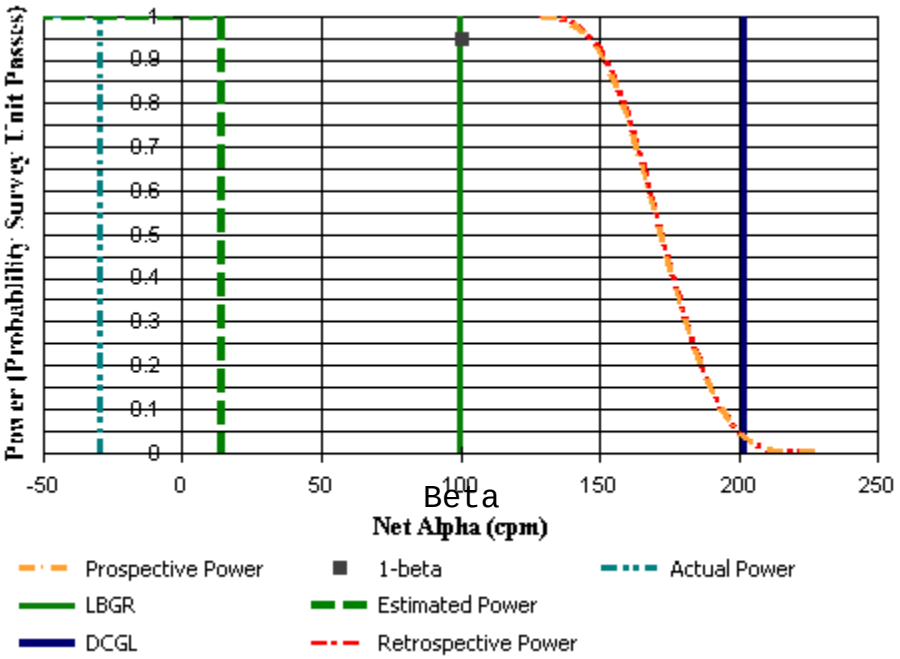
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	1.52	N/A	14.1
Median (dpm/100 cm²)	-21.63	N/A	N/A
Std Dev (dpm/100 cm²)	75.17	N/A	48.6
High Value (dpm/100 cm²)	154.96	N/A	N/A
Low Value (dpm/100 cm²)	-89.09	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU25		
Report Number:	4		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.4, 18.3	Concrete	S	470
3.5, 18.3	Concrete	S	361
6.5, 18.3	Concrete	S	344
9.5, 18.3	Concrete	S	303
12.6, 18.3	Concrete	S	333
1.9, 20.9	Concrete	S	341
5.0, 20.9	Concrete	S	293
8.0, 20.9	Concrete	S	273
11.0, 20.9	Concrete	S	268
14.1, 20.9	Concrete	S	312
0.4, 23.6	Concrete	S	362
3.5, 23.6	Concrete	S	312
6.5, 23.6	Concrete	S	319
9.5, 23.6	Concrete	S	321
12.6, 23.6	Concrete	S	336

Basic Statistical Quantities Summary

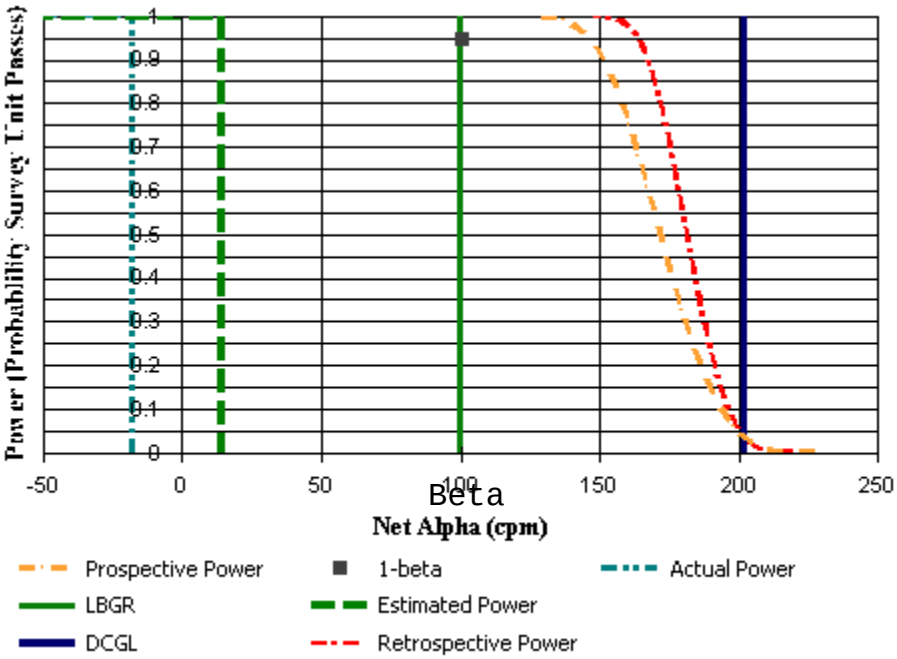
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-11.97	N/A	14.1
Median (dpm/100 cm²)	-29.56	N/A	N/A
Std Dev (dpm/100 cm²)	94.84	N/A	48.6
High Value (dpm/100 cm²)	266.07	N/A	N/A
Low Value (dpm/100 cm²)	-134.72	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU26		
Report Number:	5		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.7, 24.9	Concrete	S	328
3.9, 24.9	Concrete	S	357
7.1, 24.9	Concrete	S	280
10.3, 24.9	Concrete	S	304
13.5, 24.9	Concrete	S	325
2.3, 27.7	Concrete	S	345
5.5, 27.7	Concrete	S	303
8.7, 27.7	Concrete	S	264
11.9, 27.7	Concrete	S	346
15.1, 27.7	Concrete	S	394
0.7, 30.5	Concrete	S	296
3.9, 30.5	Concrete	S	346
7.1, 30.5	Concrete	S	327
10.3, 30.5	Concrete	S	300
13.5, 30.5	Concrete	S	343

Basic Statistical Quantities Summary

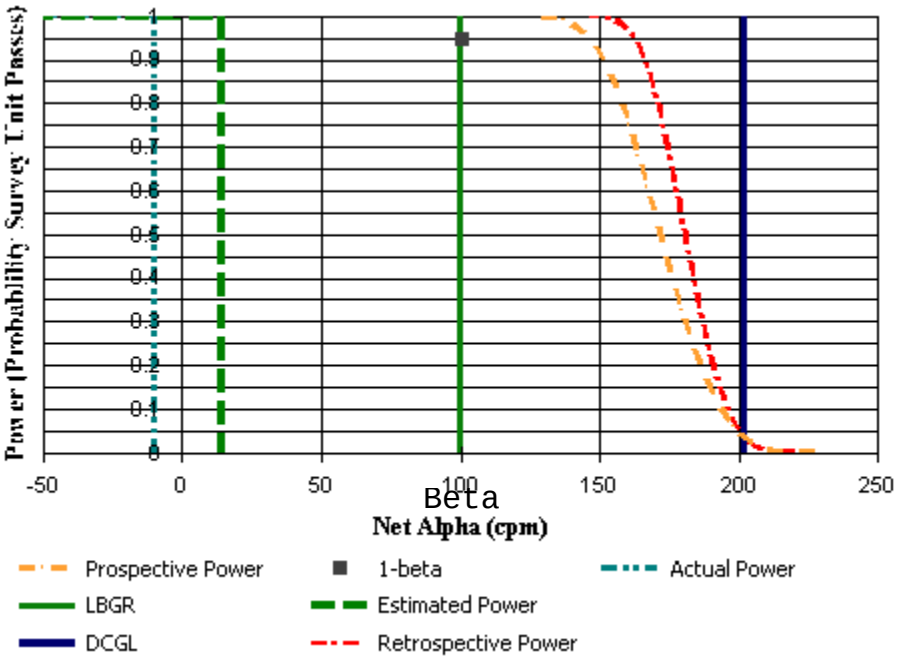
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-23.88	N/A	14.1
Median (dpm/100 cm²)	-17.66	N/A	N/A
Std Dev (dpm/100 cm²)	66.07	N/A	48.6
High Value (dpm/100 cm²)	115.28	N/A	N/A
Low Value (dpm/100 cm²)	-142.66	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU27		
Report Number:	6		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.5, 31.0	Concrete	S	386
3.7, 31.0	Concrete	S	367
6.9, 31.0	Concrete	S	331
10.1, 31.0	Concrete	S	345
13.3, 31.0	Concrete	S	341
2.1, 33.8	Concrete	S	298
5.3, 33.8	Concrete	S	280
8.5, 33.8	Concrete	S	316
11.7, 33.8	Concrete	S	270
14.9, 33.8	Concrete	S	331
0.5, 36.6	Concrete	S	373
3.7, 36.6	Concrete	S	369
6.9, 36.6	Concrete	S	312
10.1, 36.6	Concrete	S	335
13.3, 36.6	Concrete	S	304

Basic Statistical Quantities Summary

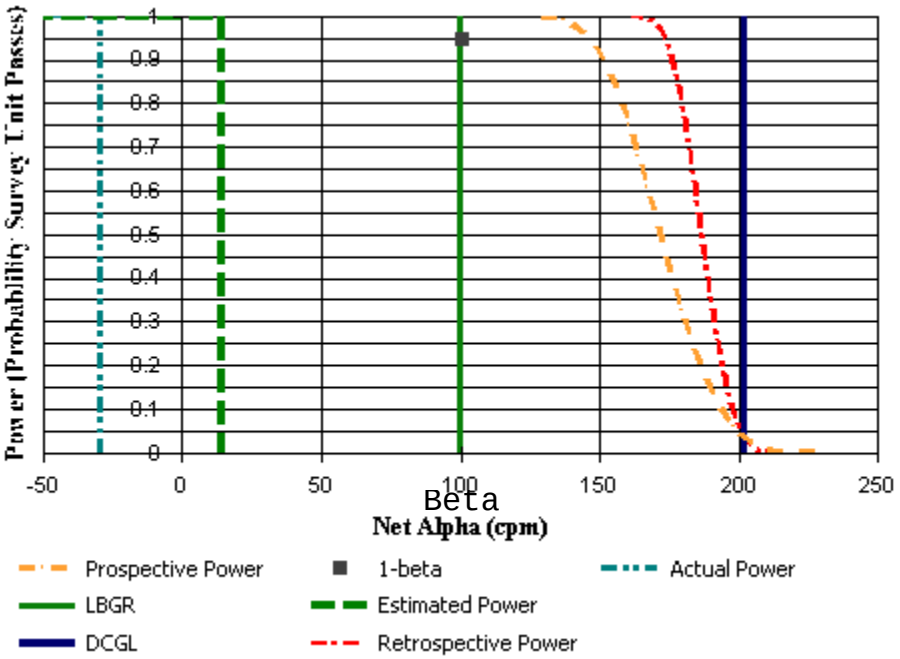
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-10.65	N/A	14.1
Median (dpm/100 cm²)	-9.72	N/A	N/A
Std Dev (dpm/100 cm²)	68.25	N/A	48.6
High Value (dpm/100 cm²)	99.40	N/A	N/A
Low Value (dpm/100 cm²)	-130.75	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU28		
Report Number:	7		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.7, 37.1	Concrete	S	324
4.9, 37.1	Concrete	S	324
8.2, 37.1	Concrete	S	303
11.4, 37.1	Concrete	S	307
14.6, 37.1	Concrete	S	340
0.1, 39.9	Concrete	S	361
3.3, 39.9	Concrete	S	317
6.6, 39.9	Concrete	S	338
9.8, 39.9	Concrete	S	284
13.0, 39.9	Concrete	S	335
1.7, 42.7	Concrete	S	321
4.9, 42.7	Concrete	S	304
8.2, 42.7	Concrete	S	273
11.4, 42.7	Concrete	S	283
14.6, 42.7	Concrete	S	343

Basic Statistical Quantities Summary

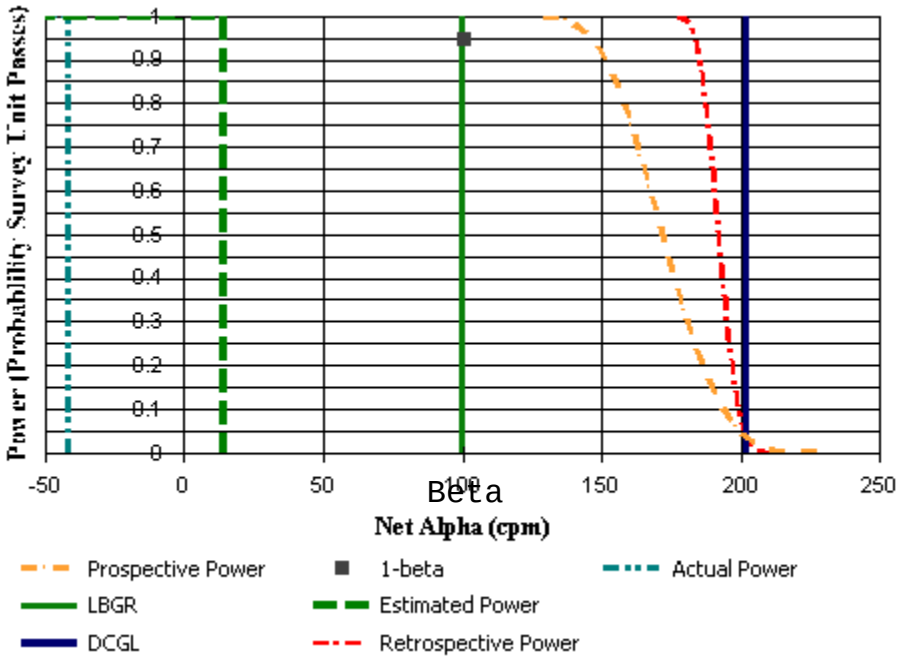
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-37.24	N/A	14.1
Median (dpm/100 cm²)	-29.56	N/A	N/A
Std Dev (dpm/100 cm²)	49.36	N/A	48.6
High Value (dpm/100 cm²)	49.80	N/A	N/A
Low Value (dpm/100 cm²)	-124.80	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU29		
Report Number:	8		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.0, 42.7	Concrete	S	346
5.2, 42.7	Concrete	S	336
8.4, 42.7	Concrete	S	298
11.6, 42.7	Concrete	S	341
14.8, 42.7	Concrete	S	320
0.4, 45.5	Concrete	S	339
3.6, 45.5	Concrete	S	307
6.8, 45.5	Concrete	S	307
10.0, 45.5	Concrete	S	308
13.2, 45.5	Concrete	S	315
2.0, 48.3	Concrete	S	335
5.2, 48.3	Concrete	S	309
8.4, 48.3	Concrete	S	343
11.6, 48.3	Concrete	S	314
14.8, 48.3	Concrete	S	311

Basic Statistical Quantities Summary

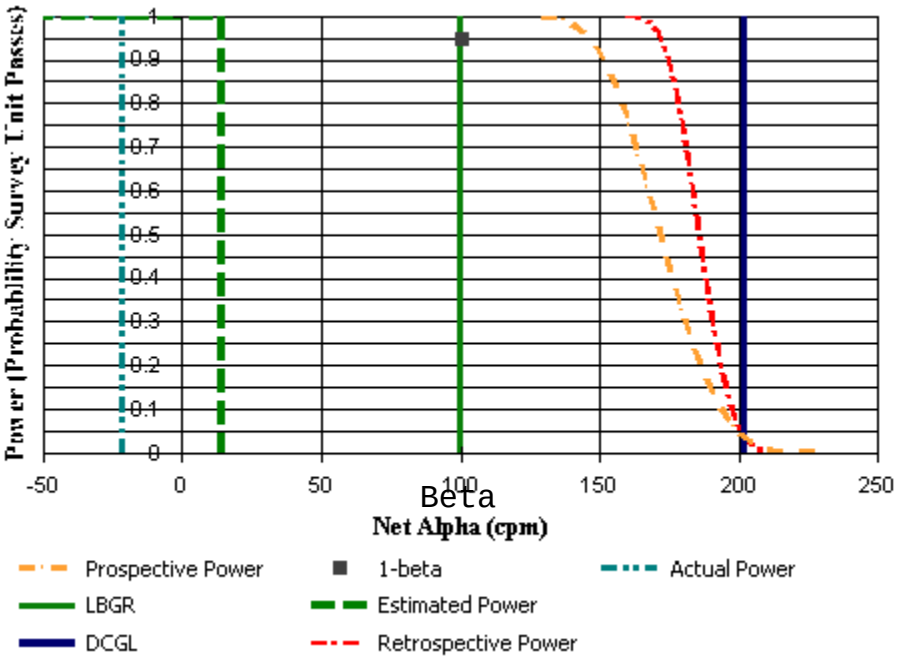
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-27.71	N/A	14.1
Median (dpm/100 cm²)	-41.47	N/A	N/A
Std Dev (dpm/100 cm²)	32.08	N/A	48.6
High Value (dpm/100 cm²)	20.04	N/A	N/A
Low Value (dpm/100 cm²)	-75.20	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU30		
Report Number:	9		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.2, 49.5	Concrete	S	335
3.3, 49.5	Concrete	S	338
6.3, 49.5	Concrete	S	302
9.4, 49.5	Concrete	S	310
12.4, 49.5	Concrete	S	319
1.8, 52.1	Concrete	S	334
4.8, 52.1	Concrete	S	321
7.9, 52.1	Concrete	S	348
10.9, 52.1	Concrete	S	364
14.0, 52.1	Concrete	S	325
0.2, 54.8	Concrete	S	399
3.3, 54.8	Concrete	S	343
6.3, 54.8	Concrete	S	297
9.4, 54.8	Concrete	S	306
12.4, 54.8	Concrete	S	322

Basic Statistical Quantities Summary

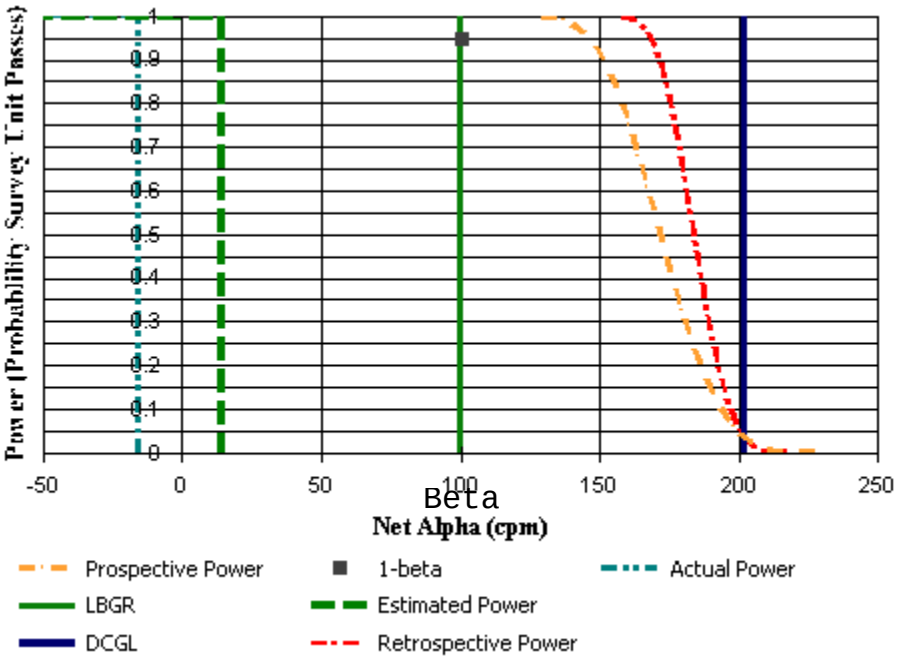
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-9.99	N/A	14.1
Median (dpm/100 cm²)	-21.63	N/A	N/A
Std Dev (dpm/100 cm²)	52.07	N/A	48.6
High Value (dpm/100 cm²)	125.20	N/A	N/A
Low Value (dpm/100 cm²)	-77.18	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU31		
Report Number:	10		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.9, 55.3	Concrete	S	354
5.1, 55.3	Concrete	S	300
8.3, 55.3	Concrete	S	284
11.5, 55.3	Concrete	S	346
14.7, 55.3	Concrete	S	357
0.3, 58.1	Concrete	S	369
3.5, 58.1	Concrete	S	343
6.7, 58.1	Concrete	S	326
9.9, 58.1	Concrete	S	278
13.1, 58.1	Concrete	S	322
1.9, 60.9	Concrete	S	328
5.1, 60.9	Concrete	S	375
8.3, 60.9	Concrete	S	315
11.5, 60.9	Concrete	S	305
14.7, 60.9	Concrete	S	338

Basic Statistical Quantities Summary

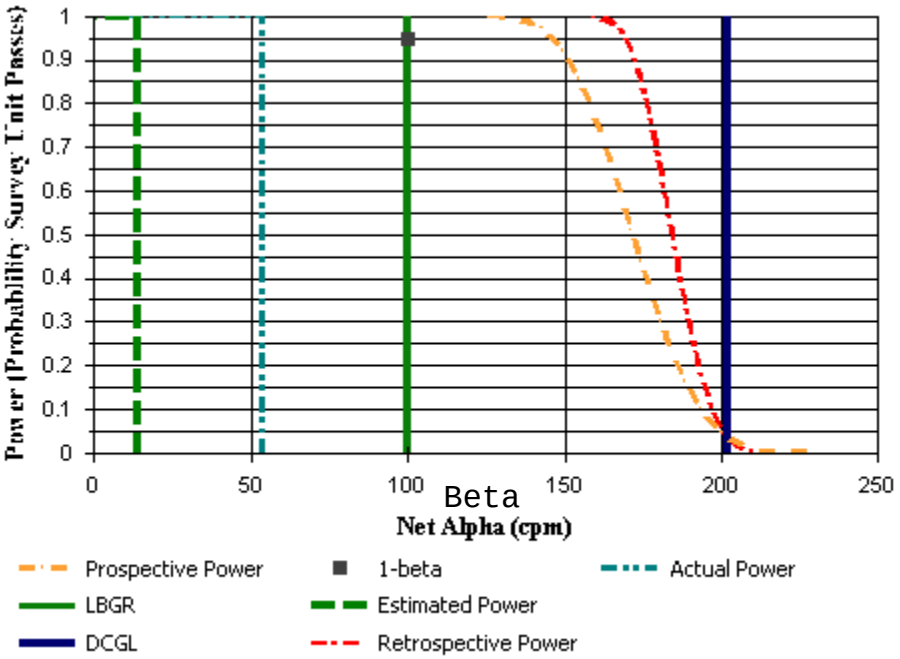
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-13.03	N/A	14.1
Median (dpm/100 cm²)	-15.67	N/A	N/A
Std Dev (dpm/100 cm²)	58.06	N/A	48.6
High Value (dpm/100 cm²)	77.58	N/A	N/A
Low Value (dpm/100 cm²)	-114.88	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 through 32 B-912 Floor C1 SU32		
Report Number:	11		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.2, 61.4	Concrete	S	369
3.4, 61.4	Concrete	S	350
6.6, 61.4	Concrete	S	363
9.8, 61.4	Concrete	S	320
13.0, 61.4	Concrete	S	352
1.8, 64.2	Concrete	S	390
5.0, 64.2	Concrete	S	358
8.2, 64.2	Concrete	S	335
11.4, 64.2	Concrete	S	334
14.6, 64.2	Concrete	S	376
0.2, 67.0	Concrete	S	436
3.4, 67.0	Concrete	S	343
6.6, 67.0	Concrete	S	386
9.8, 67.0	Concrete	S	370
13.0, 67.0	Concrete	S	380

Basic Statistical Quantities Summary

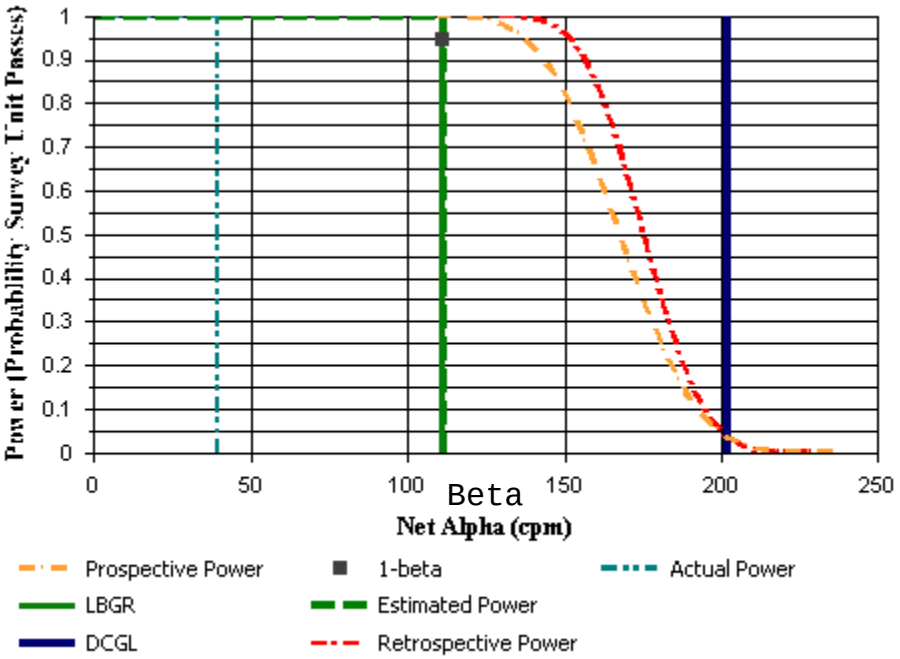
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	56.02	N/A	14.1
Median (dpm/100 cm²)	53.77	N/A	N/A
Std Dev (dpm/100 cm²)	56.37	N/A	48.6
High Value (dpm/100 cm²)	198.61	N/A	N/A
Low Value (dpm/100 cm²)	-31.55	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU33 South Wall		
Report Number:	1		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.6, 1.0	Brick	S	526
1.7, 2.9	FSS Terra Cotta	S	681
2.8, 1.0	FSS Terra Cotta	S	583
2.8, 4.7	FSS Terra Cotta	S	683
3.8, 2.9	FSS Terra Cotta	S	657
4.9, 1.0	Brick	S	429
4.9, 4.7	Brick	S	490
6.0, 2.9	FSS Terra Cotta	S	610
7.0, 1.0	FSS Terra Cotta	S	620
7.0, 4.7	Wood	S	293
8.1, 2.9	FSS Terra Cotta	S	655
9.2, 1.0	FSS Terra Cotta	S	671
9.2, 4.7	FSS Terra Cotta	S	619
10.2, 2.9	Brick	S	545
11.3, 1.0	FSS Terra Cotta	S	601
11.3, 4.7	FSS Terra Cotta	S	670
12.4, 2.9	FSS Terra Cotta	S	724
13.4, 1.0	FSS Terra Cotta	S	634
13.4, 4.7	FSS Terra Cotta	S	651
14.5, 2.9	FSS Terra Cotta	S	643

Basic Statistical Quantities Summary

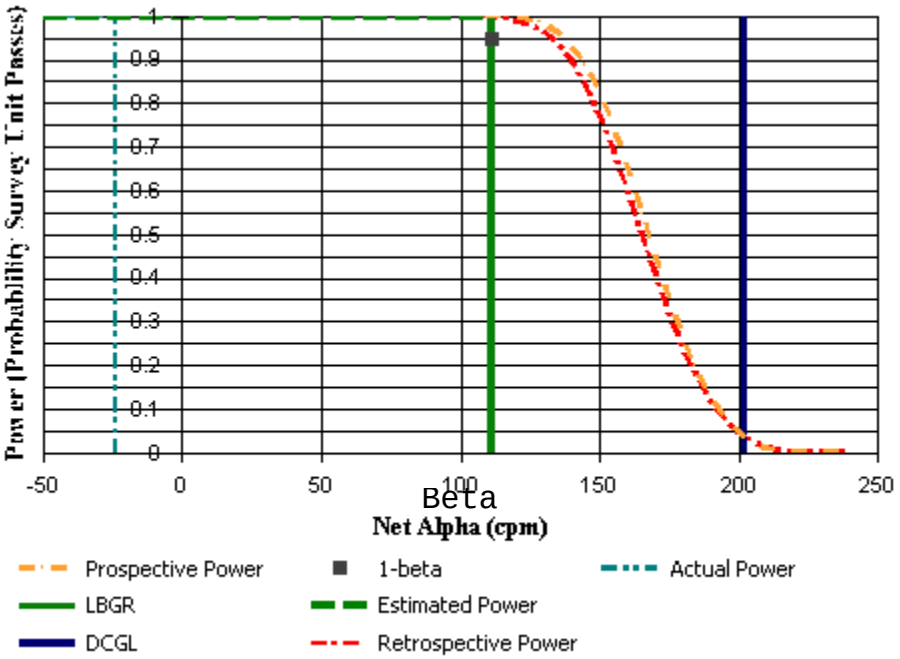
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	54.27	N/A	111
Median (dpm/100 cm²)	39.46	N/A	N/A
Std Dev (dpm/100 cm²)	101.51	N/A	65.7
High Value (dpm/100 cm²)	282.94	N/A	N/A
Low Value (dpm/100 cm²)	-105.38	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU34 S. West Wall		
Report Number:	2		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.8, 1.6	FSS Terra Cotta	S	667
1.8, 4.0	FSS Terra Cotta	S	563
3.9, 0.4	FSS Terra Cotta	S	604
3.9, 2.8	FSS Terra Cotta	S	495
6.0, 1.6	Brick	S	423
6.0, 4.0	Brick	S	470
8.1, 0.4	FSS Terra Cotta	S	620
8.1, 2.8	FSS Terra Cotta	S	628
10.1, 1.6	FSS Terra Cotta	S	704
10.1, 4.0	FSS Terra Cotta	S	601
12.2, 0.4	Brick	S	536
12.2, 2.8	Brick	S	500
14.3, 1.6	FSS Terra Cotta	S	573
14.3, 4.0	Concrete	S	311
16.4, 0.4	FSS Terra Cotta	S	669
16.4, 2.8	FSS Terra Cotta	S	513
18.5, 1.6	FSS Terra Cotta	S	601
18.5, 4.0	FSS Terra Cotta	S	636
20.6, 0.4	FSS Terra Cotta	S	560
20.6, 2.8	FSS Terra Cotta	S	674

Basic Statistical Quantities Summary

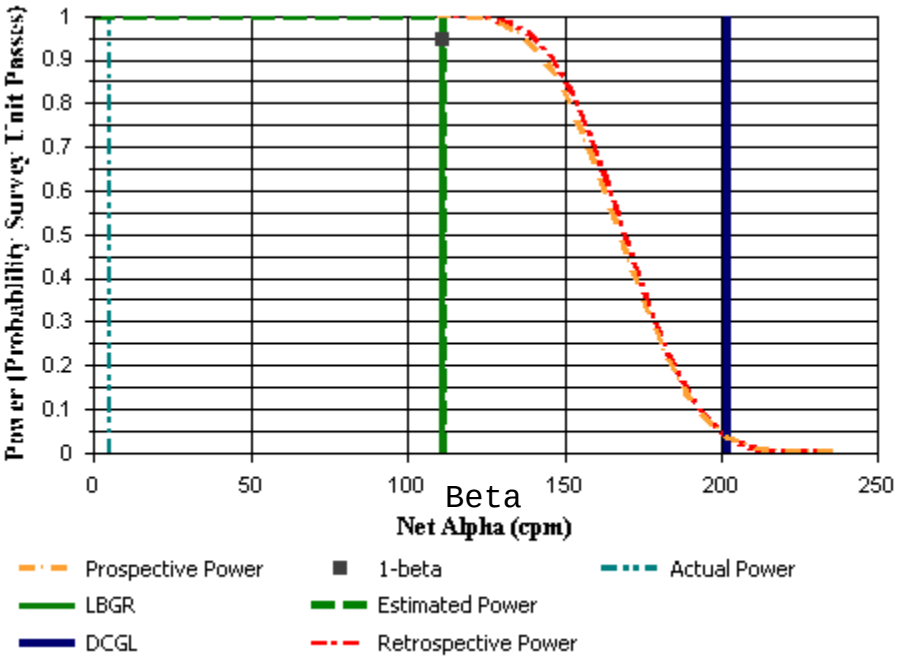
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	-13.81	N/A	111
Median (dpm/100 cm²)	-24.03	N/A	N/A
Std Dev (dpm/100 cm²)	139.64	N/A	65.7
High Value (dpm/100 cm²)	265.08	N/A	N/A
Low Value (dpm/100 cm²)	-279.98	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU35 C. West Wall		
Report Number:	3		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
24.3, 1.7	Brick	S	476
24.3, 4.1	Brick	S	490
26.4, 0.5	FSS Terra Cotta	S	641
26.4, 2.9	Concrete	S	306
28.5, 1.7	FSS Terra Cotta	S	616
28.5, 4.1	FSS Terra Cotta	S	641
30.6, 0.5	FSS Terra Cotta	S	589
30.6, 2.9	FSS Terra Cotta	S	657
32.6, 1.7	FSS Terra Cotta	S	557
32.6, 4.1	FSS Terra Cotta	S	652
34.7, 0.5	FSS Terra Cotta	S	622
34.7, 2.9	FSS Terra Cotta	S	617
36.8, 1.7	FSS Terra Cotta	S	676
36.8, 4.1	Concrete	S	336
38.9, 0.5	FSS Terra Cotta	S	651
38.9, 2.9	FSS Terra Cotta	S	583
41.0, 1.7	FSS Terra Cotta	S	686
41.0, 4.1	FSS Terra Cotta	S	599
43.1, 0.5	FSS Terra Cotta	S	494
43.1, 2.9	Brick	S	550

Basic Statistical Quantities Summary

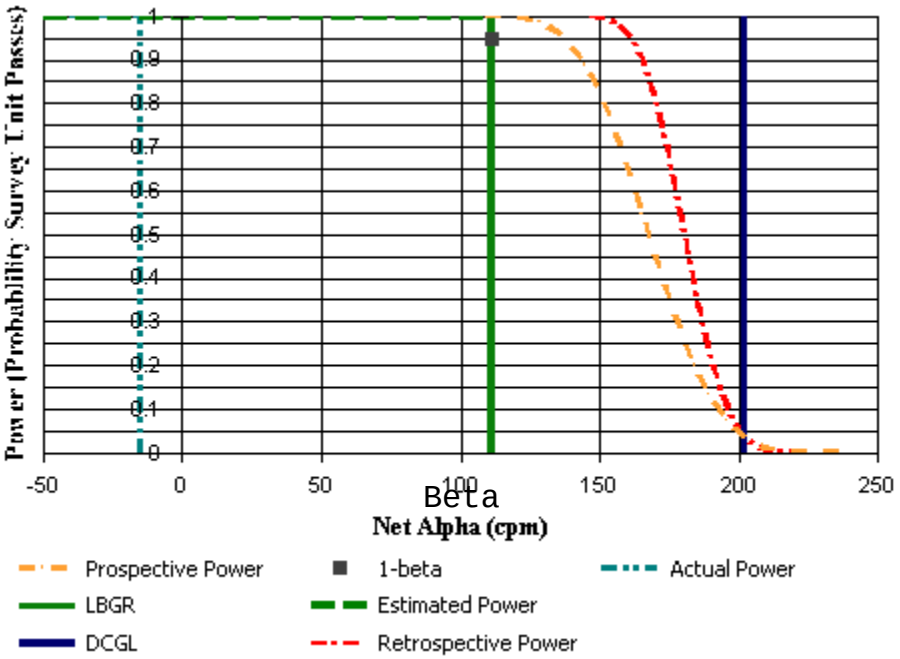
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	1.82	N/A	111
Median (dpm/100 cm²)	4.95	N/A	N/A
Std Dev (dpm/100 cm²)	124.35	N/A	65.7
High Value (dpm/100 cm²)	292.86	N/A	N/A
Low Value (dpm/100 cm²)	-281.97	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU36 N. West Wall		
Report Number:	4		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
46.6, 1.7	FSS Terra Cotta	S	579
46.6, 4.2	FSS Terra Cotta	S	643
48.7, 0.5	FSS Terra Cotta	S	684
48.7, 3.0	FSS Terra Cotta	S	638
50.8, 1.7	FSS Terra Cotta	S	592
50.8, 4.2	FSS Terra Cotta	S	628
52.9, 0.5	FSS Terra Cotta	S	605
52.9, 3.0	Concrete	S	295
55.0, 1.7	FSS Terra Cotta	S	604
55.0, 4.2	FSS Terra Cotta	S	625
57.1, 0.5	Brick	S	530
57.1, 3.0	Brick	S	417
59.1, 1.7	FSS Terra Cotta	S	600
59.1, 4.2	FSS Terra Cotta	S	682
61.2, 0.5	FSS Terra Cotta	S	644
61.2, 3.0	FSS Terra Cotta	S	647
63.3, 1.7	FSS Terra Cotta	S	611
63.3, 4.2	FSS Terra Cotta	S	632
65.4, 0.5	FSS Terra Cotta	S	629
65.4, 3.0	FSS Terra Cotta	S	617

Basic Statistical Quantities Summary

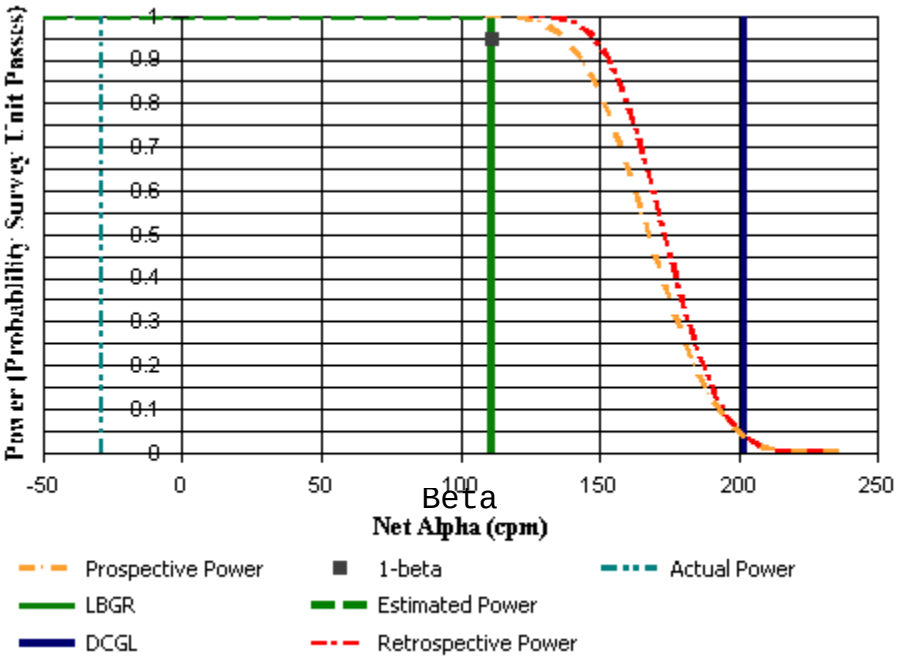
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	-5.22	N/A	111
Median (dpm/100 cm²)	-15.10	N/A	N/A
Std Dev (dpm/100 cm²)	81.96	N/A	65.7
High Value (dpm/100 cm²)	253.17	N/A	N/A
Low Value (dpm/100 cm²)	-113.32	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU37 North Wall		
Report Number:	5		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.9, 2.9	FSS Terra Cotta	S	600
2.0, 1.0	FSS Terra Cotta	S	596
2.0, 4.7	FSS Terra Cotta	S	562
3.0, 2.9	FSS Terra Cotta	S	607
4.1, 1.0	FSS Terra Cotta	S	631
4.1, 4.7	FSS Terra Cotta	S	628
5.2, 2.9	Brick	S	511
6.2, 1.0	FSS Terra Cotta	S	641
6.2, 4.7	FSS Terra Cotta	S	658
7.3, 2.9	FSS Terra Cotta	S	531
8.4, 1.0	FSS Terra Cotta	S	681
8.4, 4.7	Wood	S	255
9.4, 2.9	FSS Terra Cotta	S	551
10.5, 1.0	Brick	S	506
10.5, 4.7	Brick	S	424
11.6, 2.9	FSS Terra Cotta	S	628
12.6, 1.0	FSS Terra Cotta	S	647
12.6, 4.7	FSS Terra Cotta	S	611
13.7, 2.9	FSS Terra Cotta	S	571
14.7, 1.0	FSS Terra Cotta	S	615

Basic Statistical Quantities Summary

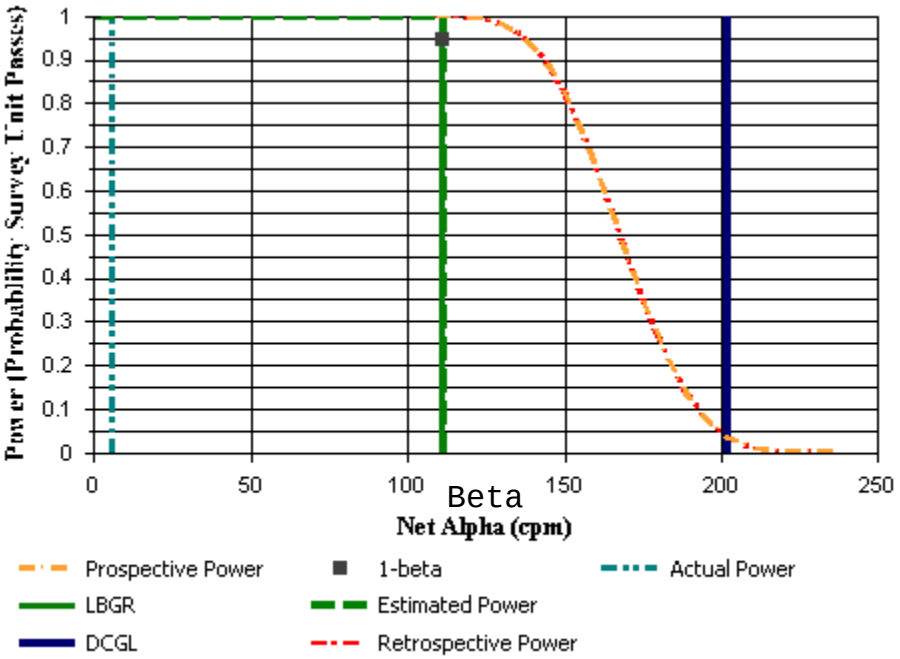
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	-21.60	N/A	111
Median (dpm/100 cm²)	-28.99	N/A	N/A
Std Dev (dpm/100 cm²)	108.95	N/A	65.7
High Value (dpm/100 cm²)	215.48	N/A	N/A
Low Value (dpm/100 cm²)	-208.55	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU38 N. East Wall		
Report Number:	6		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.6, 1.4	FSS Terra Cotta	S	593
1.6, 3.8	FSS Terra Cotta	S	608
3.7, 0.2	FSS Terra Cotta	S	618
3.7, 2.6	FSS Terra Cotta	S	582
5.8, 1.4	Brick	S	462
5.8, 3.8	Brick	S	518
7.9, 0.2	FSS Terra Cotta	S	666
7.9, 2.6	Concrete	S	327
10.0, 1.4	Concrete	S	492
10.0, 3.8	FSS Terra Cotta	S	590
12.1, 0.2	Brick	S	493
12.1, 2.6	Brick	S	419
14.2, 1.4	FSS Terra Cotta	S	653
14.2, 3.8	FSS Terra Cotta	S	651
16.3, 0.2	FSS Terra Cotta	S	671
16.3, 2.6	FSS Terra Cotta	S	607
18.4, 1.4	FSS Terra Cotta	S	574
18.4, 3.8	FSS Terra Cotta	S	661
20.5, 0.2	Wood	S	203
20.5, 2.6	Wood	S	188

Basic Statistical Quantities Summary

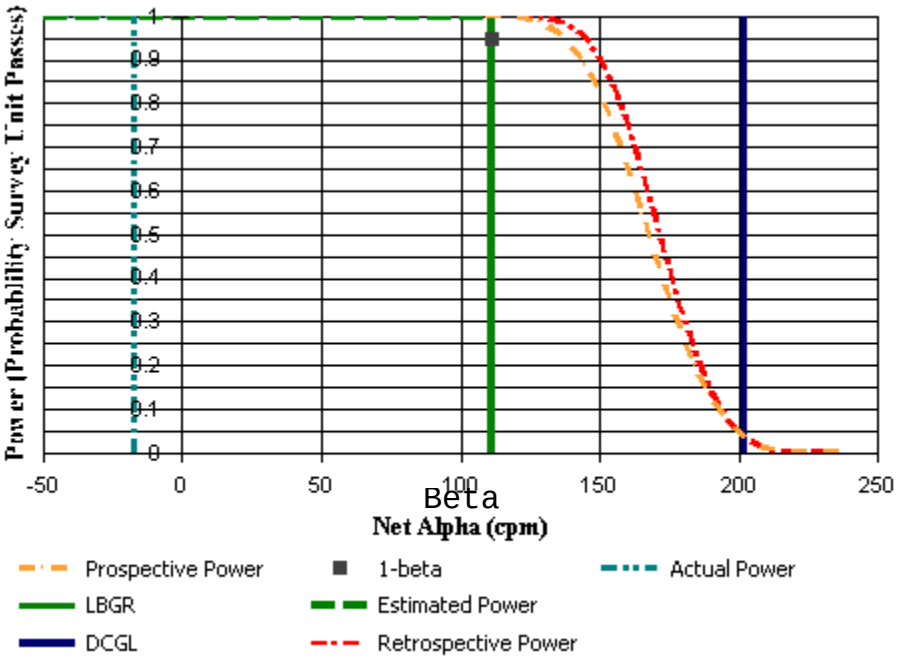
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	8.72	N/A	111
Median (dpm/100 cm²)	5.94	N/A	N/A
Std Dev (dpm/100 cm²)	130.49	N/A	65.7
High Value (dpm/100 cm²)	309.72	N/A	N/A
Low Value (dpm/100 cm²)	-195.83	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU39 C. East Wall		
Report Number:	7		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
24.0, 0.3	Brick	S	441
24.0, 2.8	Brick	S	486
26.1, 1.6	FSS Terra Cotta	S	630
26.1, 4.0	FSS Terra Cotta	S	586
28.2, 0.3	FSS Terra Cotta	S	625
28.2, 2.8	FSS Terra Cotta	S	587
30.3, 1.6	Brick	S	410
30.3, 4.0	Brick	S	444
32.4, 0.3	Wood	S	193
32.4, 2.8	Wood	S	205
34.5, 1.6	Wood	S	193
34.5, 4.0	FSS Terra Cotta	S	640
36.6, 0.3	Brick	S	442
36.6, 2.8	Brick	S	475
38.6, 1.6	FSS Terra Cotta	S	665
38.6, 4.0	FSS Terra Cotta	S	522
40.7, 0.3	FSS Terra Cotta	S	601
40.7, 2.8	FSS Terra Cotta	S	623
42.8, 1.6	FSS Terra Cotta	S	588
42.8, 4.0	FSS Terra Cotta	S	690

Basic Statistical Quantities Summary

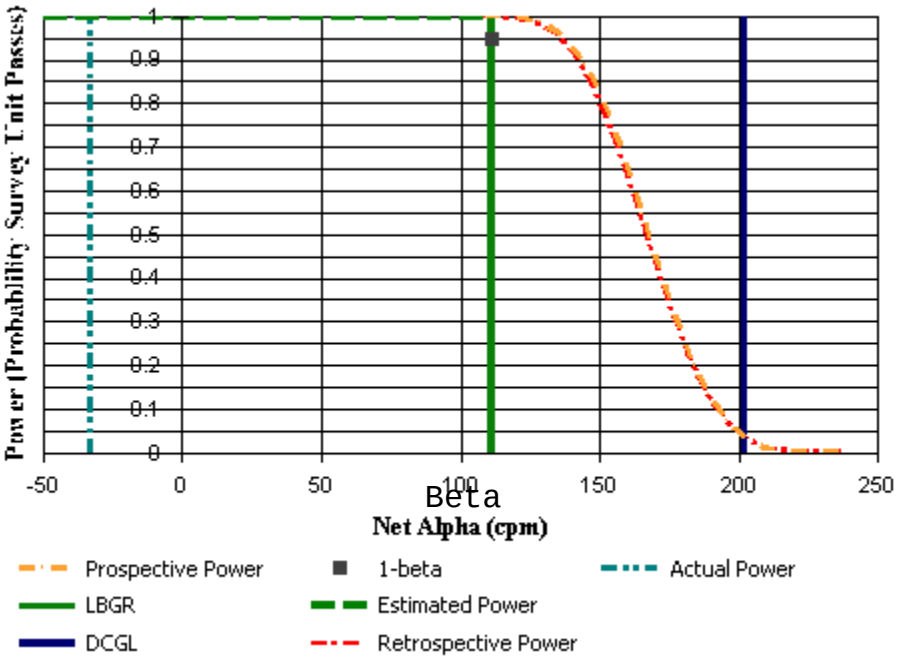
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	-22.39	N/A	111
Median (dpm/100 cm²)	-17.09	N/A	N/A
Std Dev (dpm/100 cm²)	115.49	N/A	65.7
High Value (dpm/100 cm²)	165.87	N/A	N/A
Low Value (dpm/100 cm²)	-226.41	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU33 through 40 B-912 Walls Rev 1 C1 SU40 S. East Wall		
Report Number:	8		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
46.3, 1.6	Wood	S	157
46.3, 4.0	FSS Terra Cotta	S	536
48.4, 0.4	Brick	S	471
48.4, 2.8	Brick	S	440
50.5, 1.6	FSS Terra Cotta	S	657
66.0, 1.8	FSS Terra Cotta	S	599
52.6, 0.4	FSS Terra Cotta	S	577
53.0, 2.0	FSS Terra Cotta	S	638
54.7, 1.6	Brick	S	409
54.7, 4.0	Brick	S	467
50.6, 0.5	Brick	S	491
63.3, 2.3	FSS Terra Cotta	S	586
53.0, 0.1	FSS Terra Cotta	S	634
48.0, 1.2	Wood	S	170
60.9, 0.4	FSS Terra Cotta	S	526
60.9, 2.8	FSS Terra Cotta	S	614
63.0, 1.6	FSS Terra Cotta	S	586
63.0, 4.0	FSS Terra Cotta	S	669
65.1, 0.4	FSS Terra Cotta	S	625
65.1, 2.8	FSS Terra Cotta	S	513

Basic Statistical Quantities Summary

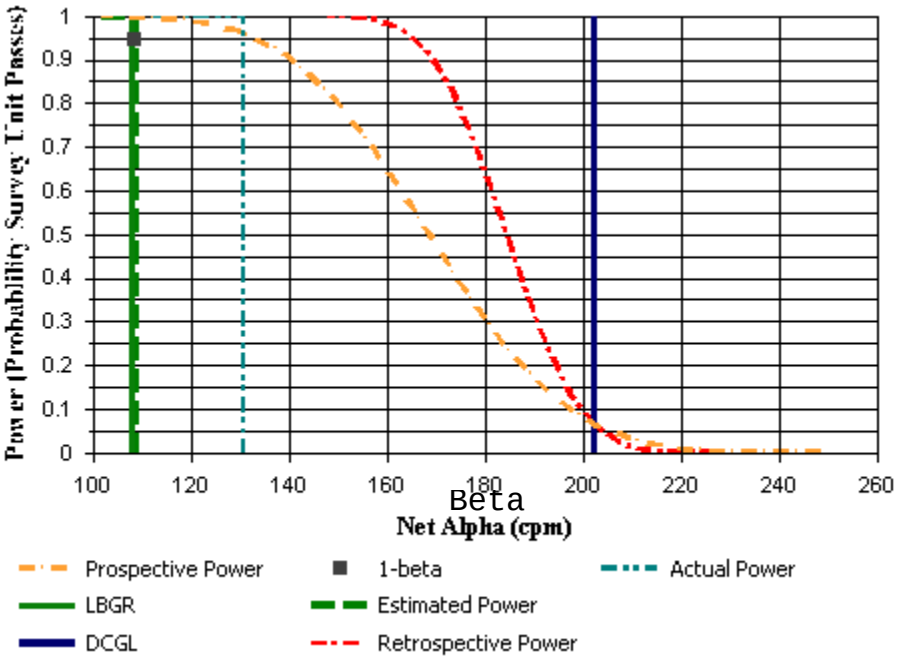
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	-48.60	N/A	111
Median (dpm/100 cm²)	-32.96	N/A	N/A
Std Dev (dpm/100 cm²)	133.46	N/A	65.7
High Value (dpm/100 cm²)	175.79	N/A	N/A
Low Value (dpm/100 cm²)	-257.34	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU41 B-912 trusses		
Report Number:	1		
Survey Unit Measurements:	28		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
Truss 1, 1.7	Wood	S	468
Truss 1, 2.3	Wood	S	420
Truss 1, 12.1	Wood	S	307
Truss 3, 4.5	Wood	S	365
Truss 3, 5.0	Wood	S	369
Truss 3, 10.9	Wood	S	409
Truss 3, 14.4	Wood	S	337
Truss 4, 7.8	Wood	S	387
Truss 5, 1.5	Wood	S	436
Truss 5, 1.6	Wood	S	416
Truss 5, 3.2	Wood	S	424
Truss 5, 7.7	Wood	S	354
Truss 6, 1.0	Wood	S	322
Truss 6, 3.4	Wood	S	339
Truss 6, 7.0	Wood	S	384
Truss 6, 11.4	Wood	S	312
Truss 6, 13.6	Wood	S	350
Truss 7, 1.0	Wood	S	392
Truss 8, 3.1	Wood	S	357
Truss 8, 5.0	Wood	S	342
Truss 8, 6.7	Wood	S	364
Truss 8, 11.0	Wood	S	341
Truss 8, 11.8	Wood	S	282
Truss 8, 12.6	Wood	S	247
Truss 9, 0.2	Wood	S	335
Truss 9, 2.4	Wood	S	315
Truss 10, 2.4	Wood	S	326
Truss 10, 9.5	Wood	S	351

Basic Statistical Quantities Summary

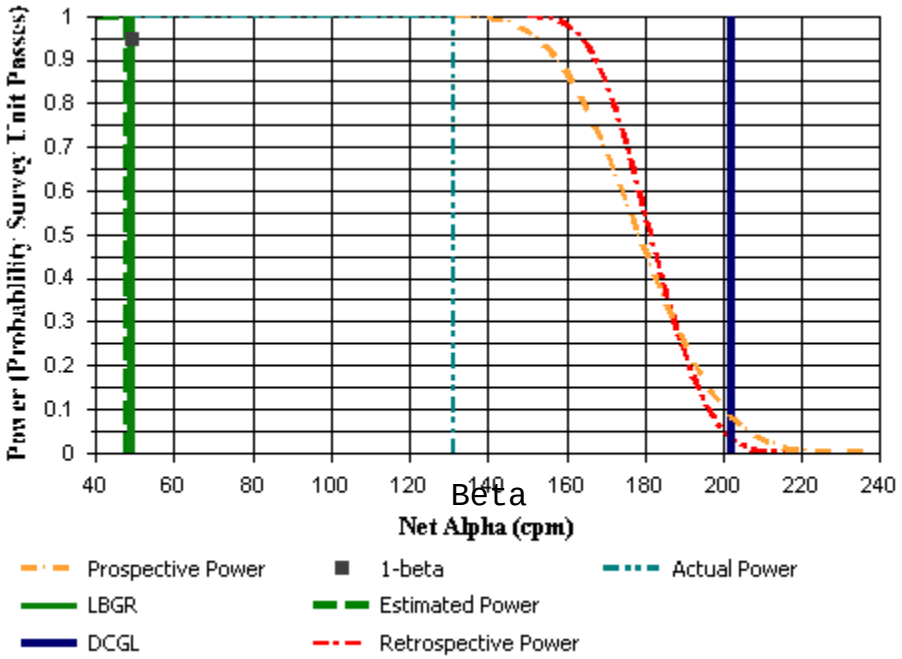
Statistic	Survey Unit	Background	DQO Results
Sample Number	28	N/A	N=28
Mean (dpm/100 cm²)	143.38	N/A	108
Median (dpm/100 cm²)	130.56	N/A	N/A
Std Dev (dpm/100 cm²)	96.74	N/A	91.8
High Value (dpm/100 cm²)	359.72	N/A	N/A
Low Value (dpm/100 cm²)	-78.77	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU42 B-913 Center Floor		
Report Number:	2		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.9, 30.6	Concrete	S	431
5.1, 30.6	Concrete	S	347
8.3, 30.6	Concrete	S	416
11.5, 30.6	Concrete	S	354
14.7, 30.6	Concrete	S	424
0.3, 33.4	Concrete	S	424
3.5, 33.4	Concrete	S	379
6.7, 33.4	Concrete	S	340
9.9, 33.4	Concrete	S	402
13.1, 33.4	Concrete	S	382
1.9, 36.2	Concrete	S	447
5.1, 36.2	Concrete	S	424
8.3, 36.2	Concrete	S	402
11.5, 36.2	Concrete	S	386
14.7, 36.2	Concrete	S	426

Basic Statistical Quantities Summary

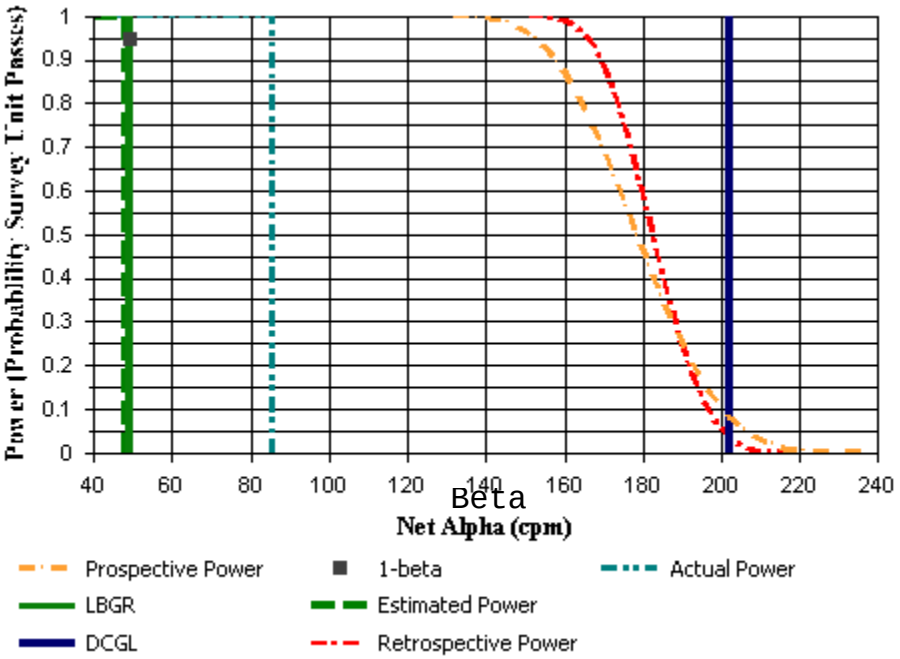
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=13
Mean (dpm/100 cm²)	125.07	N/A	48.1
Median (dpm/100 cm²)	131.15	N/A	N/A
Std Dev (dpm/100 cm²)	65.61	N/A	46.9
High Value (dpm/100 cm²)	220.44	N/A	N/A
Low Value (dpm/100 cm²)	8.13	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU43 and 44 B-913 C2 SU43 South Floor		
Report Number:	4		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.9, 0.5	Concrete	S	425
7.5, 0.5	Concrete	S	393
14.2, 0.5	Concrete	S	463
4.2, 6.2	Concrete	S	359
10.9, 6.2	Concrete	S	367
0.9, 12.0	Concrete	S	352
7.5, 12.0	Concrete	S	357
14.2, 12.0	Concrete	S	354
4.2, 17.7	Concrete	S	356
10.9, 17.7	Concrete	S	360
0.9, 23.4	Concrete	S	382
7.5, 23.4	Concrete	S	408
14.2, 23.4	Concrete	S	401
4.2, 29.2	Concrete	S	379
10.9, 29.2	Concrete	S	382

Basic Statistical Quantities Summary

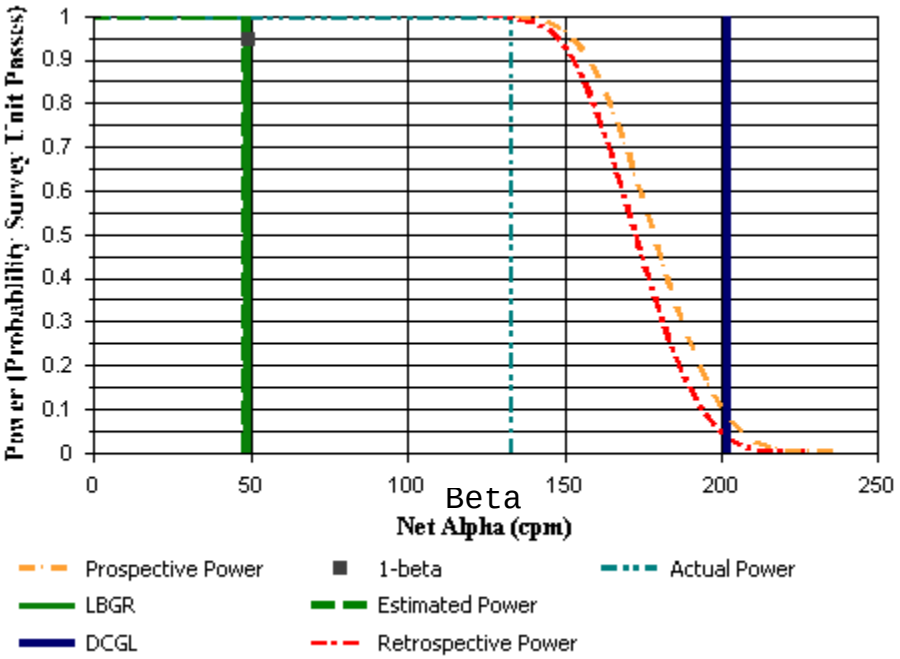
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=13
Mean (dpm/100 cm²)	92.53	N/A	48.1
Median (dpm/100 cm²)	85.52	N/A	N/A
Std Dev (dpm/100 cm²)	62.28	N/A	46.9
High Value (dpm/100 cm²)	252.18	N/A	N/A
Low Value (dpm/100 cm²)	31.94	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU43 and 44 B-913 C2 SU44		
Report Number:	5		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
3.6, 37.1	Concrete	S	376
9.9, 37.1	Concrete	S	449
0.4, 42.6	Concrete	S	484
6.7, 42.6	Concrete	S	370
13.0, 42.6	Concrete	S	432
3.6, 48.0	Concrete	S	456
9.9, 48.0	Concrete	S	380
0.4, 53.5	Concrete	S	491
6.7, 53.5	Concrete	S	362
13.0, 53.5	Concrete	S	356
3.6, 59.0	Concrete	S	392
9.9, 59.0	Concrete	S	339
0.4, 64.4	Concrete	S	435
6.7, 64.4	Concrete	S	422
13.0, 64.4	Concrete	S	403

Basic Statistical Quantities Summary

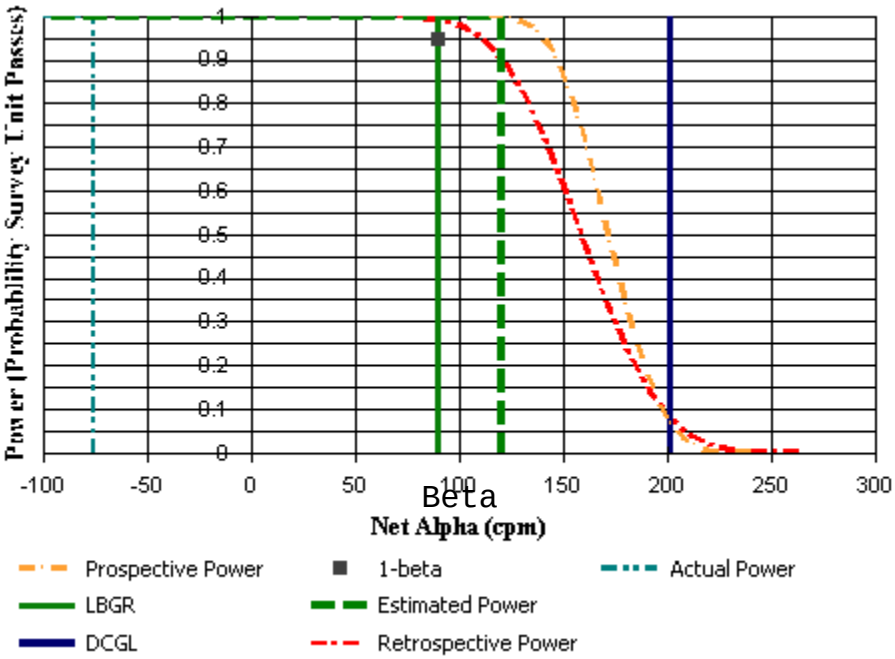
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=13
Mean (dpm/100 cm²)	146.63	N/A	48.1
Median (dpm/100 cm²)	133.13	N/A	N/A
Std Dev (dpm/100 cm²)	93.69	N/A	46.9
High Value (dpm/100 cm²)	307.74	N/A	N/A
Low Value (dpm/100 cm²)	6.15	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU46 through 48 B-913 wall Rev. 1 C2 SU45 South Wall		
Report Number:	7		
Survey Unit Measurements:	18		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)	
5.5, 5.0	Brick	S	395	
7.9, 5.0	Concrete	S	275	Actual material = metal, wood background of 287
10.3, 5.0	Brick	S	383	dpm/100 cm2 = -24
1.9, 3.0	FSS Terra Cotta	S	584	
4.3, 3.0	FSS Terra Cotta	S	608	
6.7, 3.0	FSS Terra Cotta	S	633	
9.1, 3.0	FSS Terra Cotta	S	631	
11.5, 3.0	FSS Terra Cotta	S	588	
13.9, 3.0	FSS Terra Cotta	S	555	
0.8, 0.9	FSS Terra Cotta	S	405	
3.1, 0.9	FSS Terra Cotta	S	623	
5.5, 0.9	FSS Terra Cotta	S	377	
7.9, 0.9	Brick	S	524	
10.3, 0.9	FSS Terra Cotta	S	430	
12.7, 0.9	Brick	S	513	
15.0, 0.9	FSS Terra Cotta	S	535	
12.7,5.0	FSS Terra Cotta	S	566	
15.0, 5.0	FSS Terra Cotta	S	625	

Basic Statistical Quantities Summary

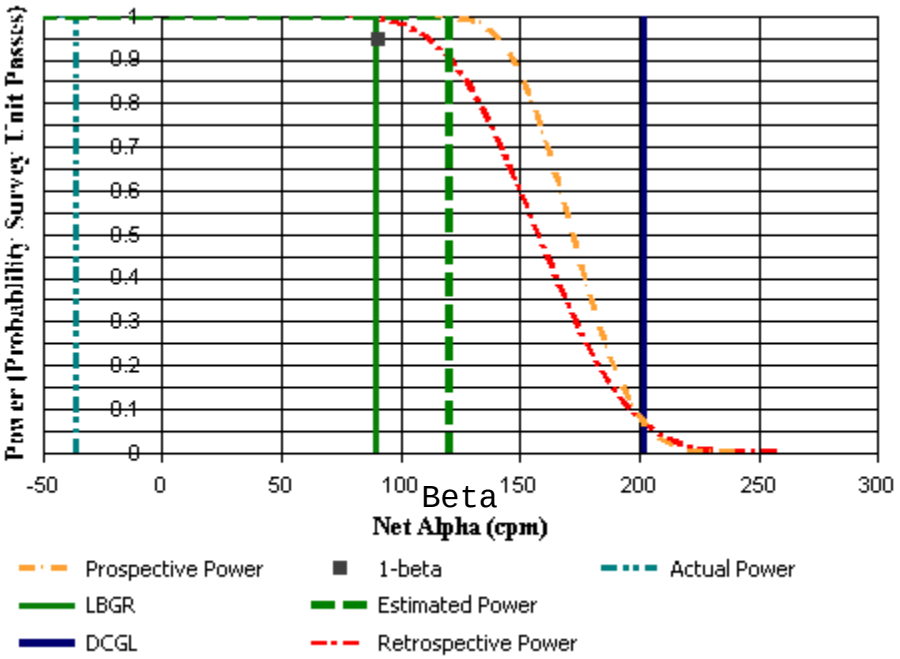
Statistic	Survey Unit	Background	DQO Results
Sample Number	18	N/A	N=16
Mean (dpm/100 cm²)	-106.37	N/A	120
Median (dpm/100 cm²)	-75.62	N/A	N/A
Std Dev (dpm/100 cm²)	198.61	N/A	61.6
High Value (dpm/100 cm²)	241.27	N/A	N/A
Low Value (dpm/100 cm²)	-514.11	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU46 through 48 B-913 wall Rev. 1 C2 SU46 West Wall		
Report Number:	6		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
3.9, 1.0	FSS Terra Cotta	S	661
7.9, 3.3	FSS Terra Cotta	S	637
11.9, 1.0	FSS Terra Cotta	S	644
16.0, 3.3	FSS Terra Cotta	S	621
20.0, 1.0	FSS Terra Cotta	S	659
24.1, 3.3	FSS Terra Cotta	S	431
28.1, 1.0	FSS Terra Cotta	S	453
32.1, 3.3	FSS Terra Cotta	S	571
36.2, 1.0	FSS Terra Cotta	S	643
40.2, 3.3	FSS Terra Cotta	S	579
44.3, 1.0	FSS Terra Cotta	S	645
48.3, 3.3	FSS Terra Cotta	S	417
52.3, 1.0	FSS Terra Cotta	S	428
56.4, 3.3	FSS Terra Cotta	S	528
60.4, 1.0	FSS Terra Cotta	S	637
64.5, 3.3	FSS Terra Cotta	S	615

Basic Statistical Quantities Summary

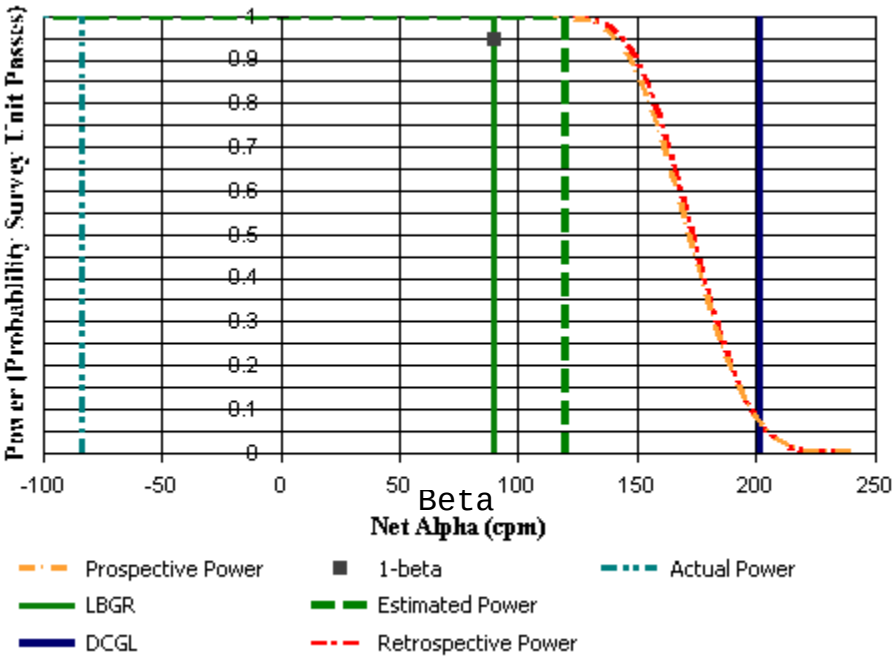
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	-125.10	N/A	120
Median (dpm/100 cm²)	-35.93	N/A	N/A
Std Dev (dpm/100 cm²)	180.77	N/A	61.6
High Value (dpm/100 cm²)	49.38	N/A	N/A
Low Value (dpm/100 cm²)	-434.74	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU46 through 48 B-913 wall Rev. 1 C2 SU47 North Wall		
Report Number:	4		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.5, 1.1	Brick	S	458
2.8, 1.1	FSS Terra Cotta	S	496
5.2, 1.1	Brick	S	345
7.6, 1.1	FSS Terra Cotta	S	512
10.0, 1.1	Brick	S	414
12.4, 1.1	FSS Terra Cotta	S	569
14.7, 1.1	FSS Terra Cotta	S	619
1.6, 3.2	FSS Terra Cotta	S	588
4.0, 3.2	FSS Terra Cotta	S	645
6.4, 3.2	FSS Terra Cotta	S	541
8.8, 3.2	FSS Terra Cotta	S	493
11.2, 3.2	FSS Terra Cotta	S	528
13.6, 3.2	FSS Terra Cotta	S	600
5.2, 5.3	Brick	S	395
7.6, 5.3	Concrete	S	323
10.0, 5.3	FSS Terra Cotta	S	610

Basic Statistical Quantities Summary

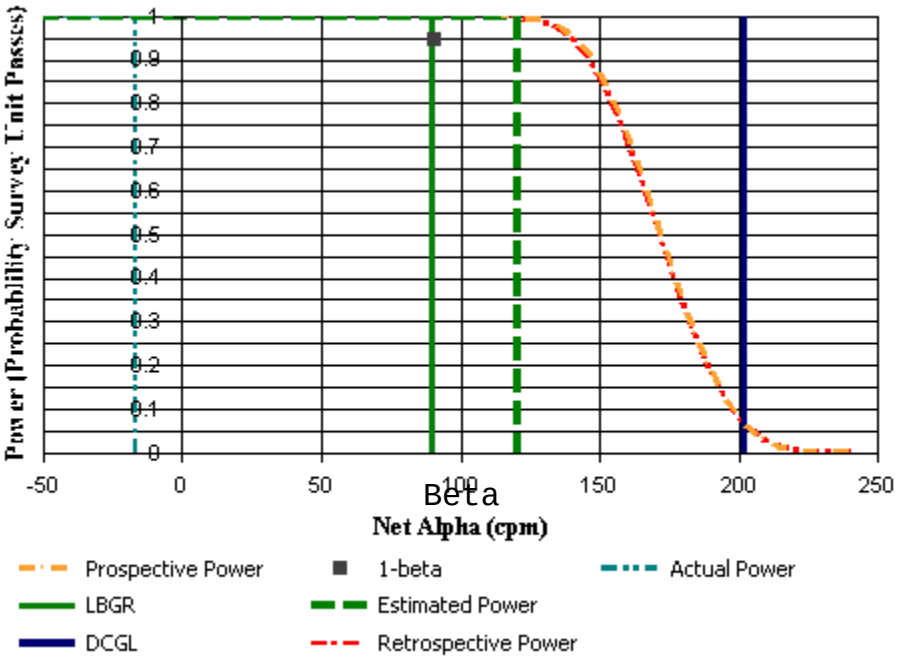
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	-100.04	N/A	120
Median (dpm/100 cm²)	-83.55	N/A	N/A
Std Dev (dpm/100 cm²)	116.25	N/A	61.6
High Value (dpm/100 cm²)	110.32	N/A	N/A
Low Value (dpm/100 cm²)	-283.95	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU46 through 48 B-913 wall Rev. 1 C2 SU48 East Wall		
Report Number:	5		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
3.6, 2.0	FSS Terra Cotta	S	632
7.6, 4.3	FSS Terra Cotta	S	607
11.7, 2.0	FSS Terra Cotta	S	673
15.7, 4.3	FSS Terra Cotta	S	580
19.8, 2.0	Concrete	S	329
23.8, 4.3	FSS Terra Cotta	S	539
27.8, 2.0	FSS Terra Cotta	S	650
31.9, 4.3	FSS Terra Cotta	S	634
35.9, 2.0	Brick	S	493
39.9, 4.3	Concrete	S	263
44.0, 2.0	Concrete	S	478
48.0, 4.3	FSS Terra Cotta	S	569
52.1, 2.0	FSS Terra Cotta	S	639
56.1, 4.3	FSS Terra Cotta	S	626
60.1, 2.0	FSS Terra Cotta	S	613
64.2, 4.3	Concrete	S	254

Basic Statistical Quantities Summary

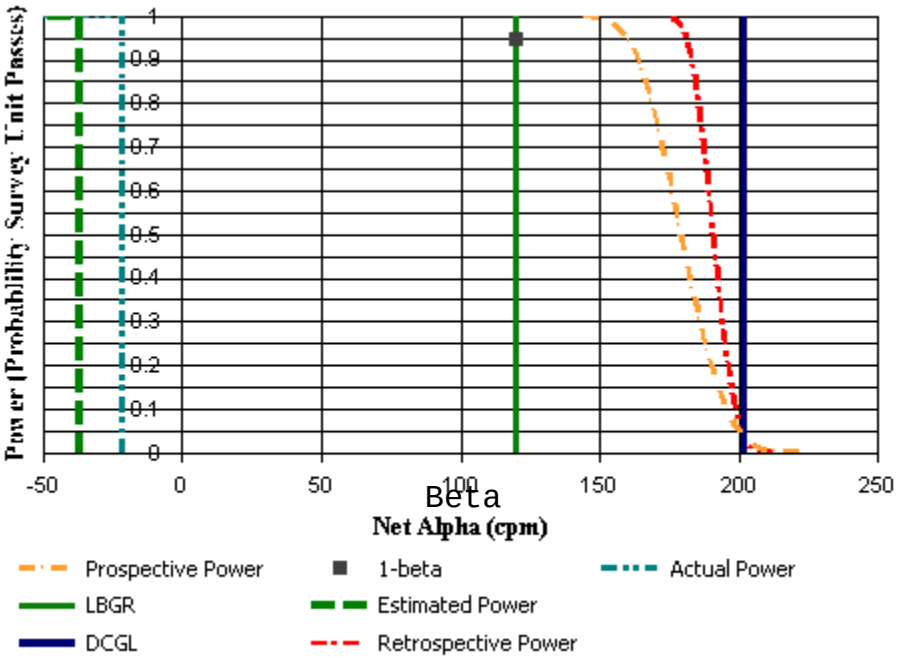
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	-20.36	N/A	120
Median (dpm/100 cm²)	-16.88	N/A	N/A
Std Dev (dpm/100 cm²)	124.37	N/A	61.6
High Value (dpm/100 cm²)	281.94	N/A	N/A
Low Value (dpm/100 cm²)	-192.68	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU49 B-913 trusses		
Report Number:	2		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
15.2, 6.3/Truss 1	Wood	S	242
10.5, 18.4/Truss 3	Wood	S	271
0.3, 24.5/ Truss 4	Wood	S	295
4.9, 24.40/Truss 4	Wood	S	282
10.6, 30.6 /Truss 5	Wood	S	268
7.5, 36.7/Truss 6	Wood	S	295
8.5, 42.8/Truss 7	Wood	S	305
4.1, 42.8/Truss 7	Wood	S	276
9.4, 42.8/Truss 7	Wood	S	275
9.5, 42.8 /Truss 7	Wood	S	273
8.4, 48.8/Truss 8	Wood	S	291
1.7, 54.9/Truss 9	Wood	S	258
3.9, 54.9/Truss 9	Wood	S	283
0.9, 61.1Tuss 10	Wood	S	254
1.5, 61.2 / Truss 10	Wood	S	304

Basic Statistical Quantities Summary

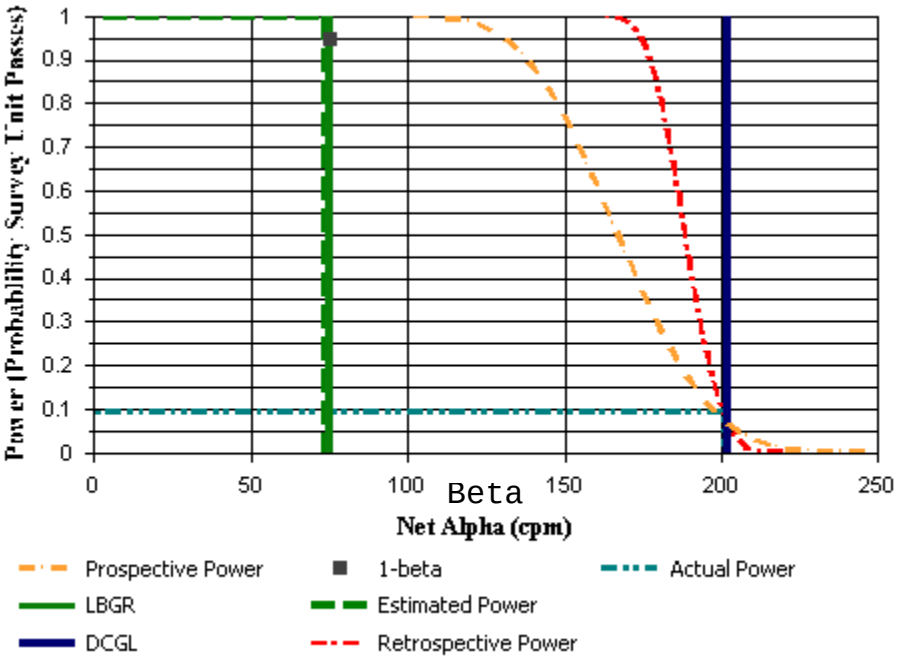
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-17.00	N/A	-36.7
Median (dpm/100 cm²)	-21.23	N/A	N/A
Std Dev (dpm/100 cm²)	36.17	N/A	36.7
High Value (dpm/100 cm²)	36.31	N/A	N/A
Low Value (dpm/100 cm²)	-88.69	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU50		
Report Number:	12		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.5, 1.2	Concrete	S	447
5.1, 1.2	Concrete	S	419
7.7, 1.2	Concrete	S	386
10.3, 1.2	Concrete	S	419
12.9, 1.2	Concrete	S	461
1.2, 3.4	Concrete	S	459
3.8, 3.4	Concrete	S	441
6.4, 3.4	Concrete	S	435
9.0, 3.4	Concrete	S	393
11.6, 3.4	Concrete	S	440
14.2, 3.4	Concrete	S	450
2.5, 5.7	Concrete	S	464
5.1, 5.7	Concrete	S	381
7.7, 5.7	Concrete	S	439
10.3, 5.7	Concrete	S	388
12.9, 5.7	Concrete	S	425

Basic Statistical Quantities Summary

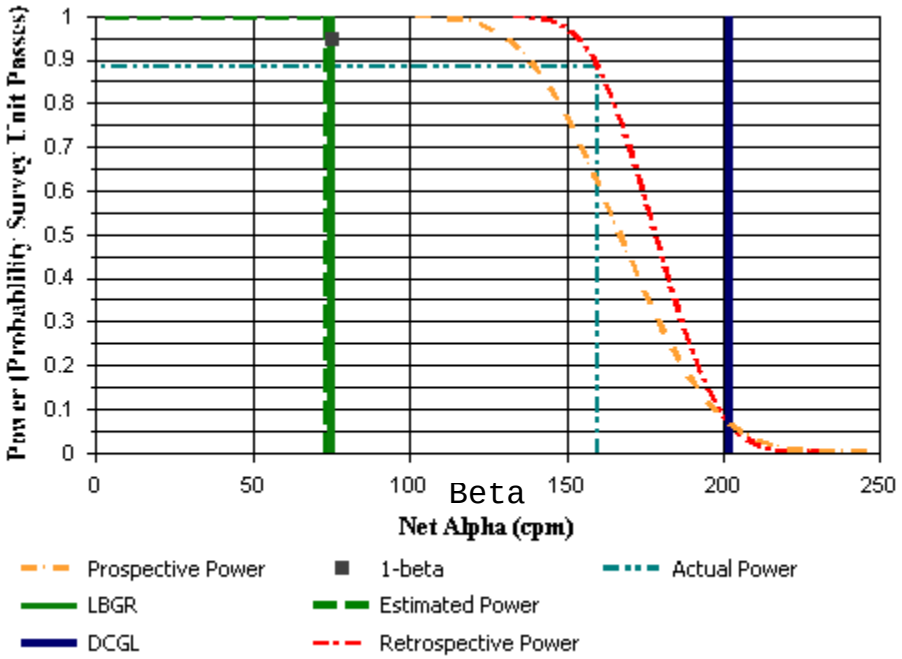
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	182.61	N/A	74.1
Median (dpm/100 cm²)	200.60	N/A	N/A
Std Dev (dpm/100 cm²)	55.28	N/A	71.7
High Value (dpm/100 cm²)	254.17	N/A	N/A
Low Value (dpm/100 cm²)	89.48	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU51		
Report Number:	13		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.4, 6.6	Concrete	S	458
5.0, 6.6	Concrete	S	379
7.6, 6.6	Concrete	S	368
10.1, 6.6	Concrete	S	372
12.7, 6.6	Concrete	S	408
1.1, 8.8	Concrete	S	419
3.7, 8.8	Concrete	S	445
6.3, 8.8	Concrete	S	366
8.8, 8.8	Concrete	S	422
11.4, 8.8	Concrete	S	414
14.0, 8.8	Concrete	S	388
2.4, 11.0	Concrete	S	464
5.0, 11.0	Concrete	S	528
7.6, 11.0	Concrete	S	489
10.1, 11.0	Concrete	S	432
12.7, 11.0	Concrete	S	357

Basic Statistical Quantities Summary

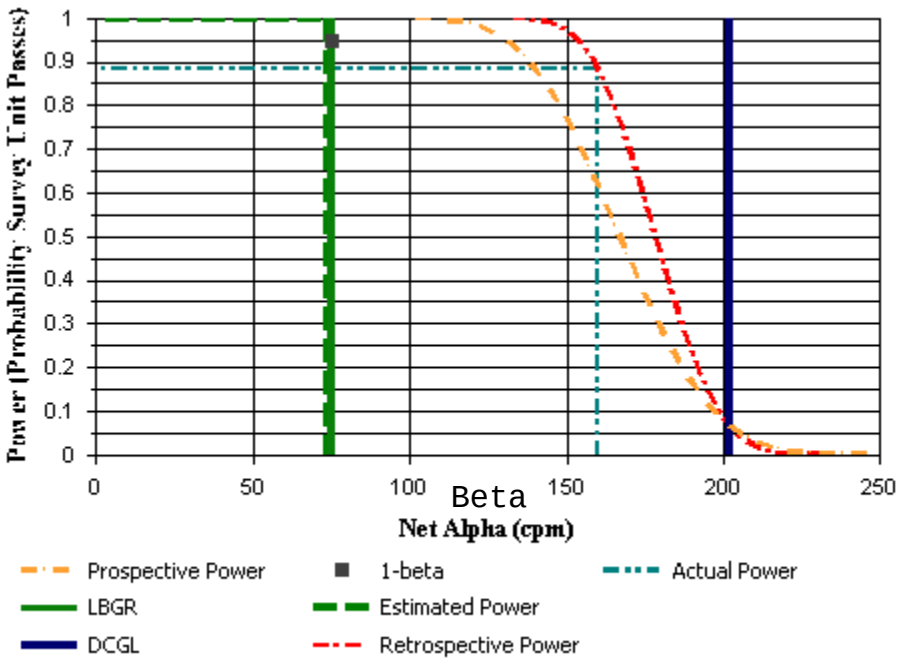
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	165.50	N/A	74.1
Median (dpm/100 cm²)	159.92	N/A	N/A
Std Dev (dpm/100 cm²)	96.32	N/A	71.7
High Value (dpm/100 cm²)	381.15	N/A	N/A
Low Value (dpm/100 cm²)	41.87	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU52		
Report Number:	14		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.3, 12.9	Concrete	S	458
4.9, 12.9	Concrete	S	379
7.5, 12.9	Concrete	S	368
10.1, 12.9	Concrete	S	372
12.7, 12.9	Concrete	S	408
1.1, 15.1	Concrete	S	419
3.6, 15.1	Concrete	S	445
6.2, 15.1	Concrete	S	366
8.8, 15.1	Concrete	S	422
11.4, 15.1	Concrete	S	414
14.0, 15.1	Concrete	S	388
2.3, 17.3	Concrete	S	464
4.9, 17.3	Concrete	S	528
7.5, 17.3	Concrete	S	489
10.1, 17.3	Concrete	S	432
12.7, 17.3	Concrete	S	357

Basic Statistical Quantities Summary

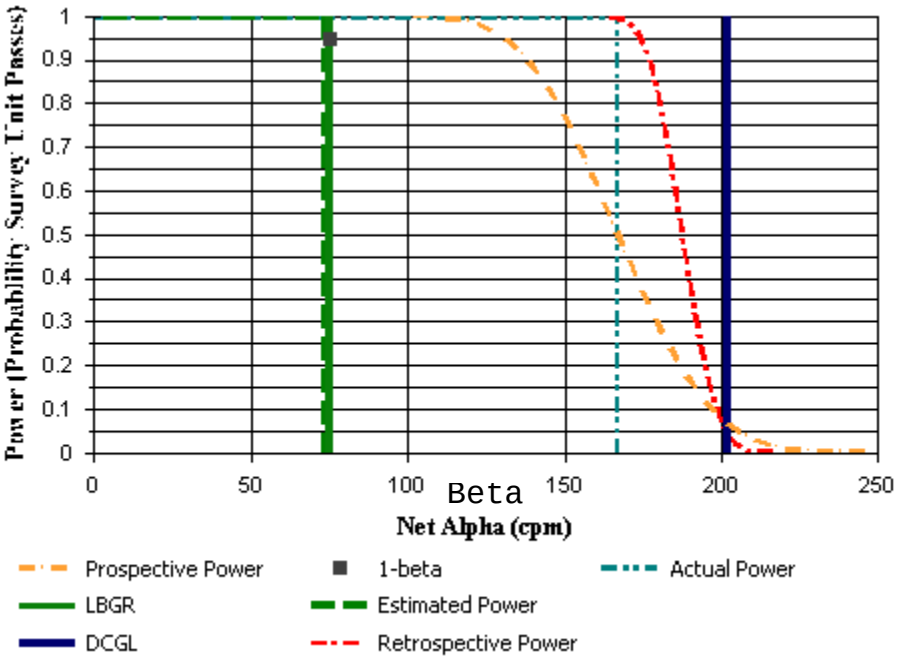
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	165.50	N/A	74.1
Median (dpm/100 cm²)	159.92	N/A	N/A
Std Dev (dpm/100 cm²)	96.32	N/A	71.7
High Value (dpm/100 cm²)	381.15	N/A	N/A
Low Value (dpm/100 cm²)	41.87	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU53		
Report Number:	15		
Survey Unit Measurements:	17		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.4, 18.4	Concrete	S	427
3.3, 18.4	Concrete	S	441
6.2, 18.4	Concrete	S	409
9.1, 18.4	Concrete	S	423
12.0, 18.4	Concrete	S	412
14.9, 18.4	Concrete	S	385
1.8, 20.9	Concrete	S	449
4.7, 20.9	Concrete	S	423
7.7, 20.9	Concrete	S	411
10.6, 20.9	Concrete	S	473
13.5, 20.9	Concrete	S	346
0.4, 23.5	Concrete	S	423
3.3, 23.5	Concrete	S	405
6.2, 23.5	Concrete	S	431
9.1, 23.5	Concrete	S	420
12.0, 23.5	Concrete	S	419
14.9, 23.5	Concrete	S	413

Basic Statistical Quantities Summary

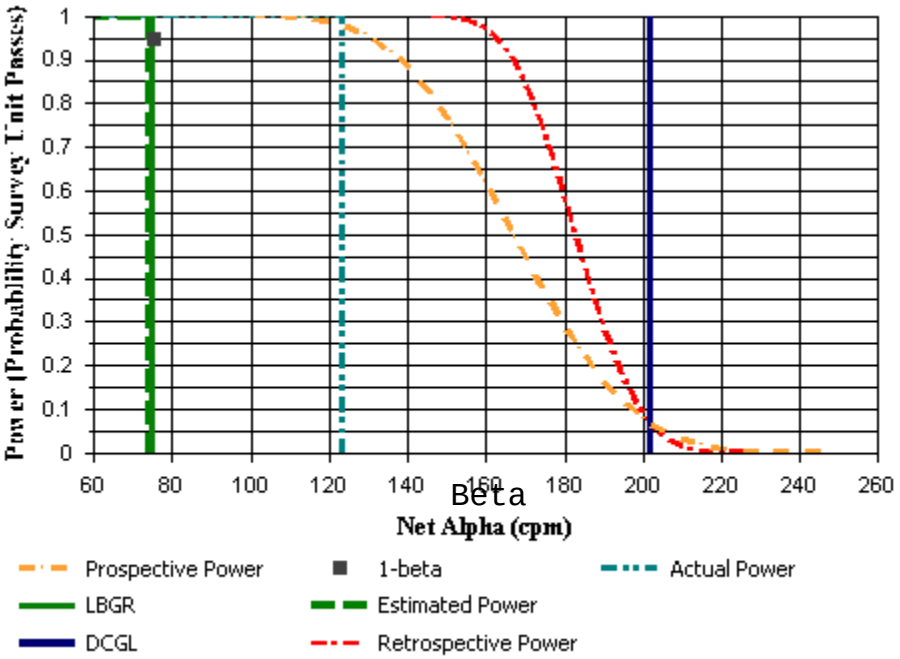
Statistic	Survey Unit	Background	DQO Results
Sample Number	17	N/A	N=16
Mean (dpm/100 cm²)	163.36	N/A	74.1
Median (dpm/100 cm²)	166.87	N/A	N/A
Std Dev (dpm/100 cm²)	53.14	N/A	71.7
High Value (dpm/100 cm²)	272.02	N/A	N/A
Low Value (dpm/100 cm²)	20.04	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU54		
Report Number:	16		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.6, 25.4	Concrete	S	425
5.2, 25.4	Concrete	S	371
7.8, 25.4	Concrete	S	363
10.4, 25.4	Concrete	S	438
13.0, 25.4	Concrete	S	309
1.3, 27.7	Concrete	S	351
3.9, 27.7	Concrete	S	395
6.5, 27.7	Concrete	S	401
9.1, 27.7	Concrete	S	346
11.7, 27.7	Concrete	S	416
14.3, 27.7	Concrete	S	383
2.6, 29.9	Concrete	S	422
5.2, 29.9	Concrete	S	454
7.8, 29.9	Concrete	S	429
10.4, 29.9	Concrete	S	391
13.0, 29.9	Concrete	S	429

Basic Statistical Quantities Summary

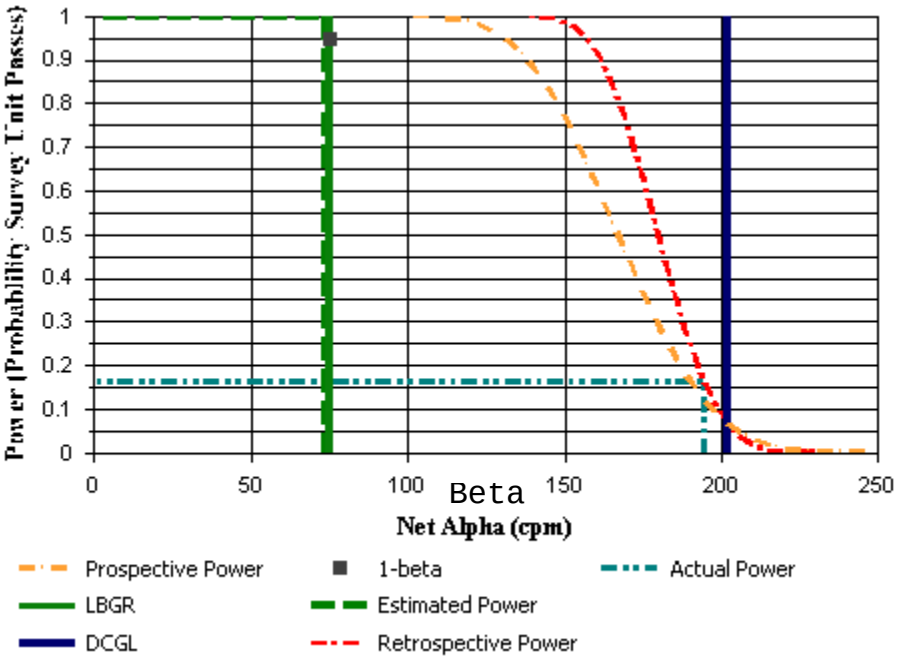
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	117.63	N/A	74.1
Median (dpm/100 cm²)	123.21	N/A	N/A
Std Dev (dpm/100 cm²)	78.10	N/A	71.7
High Value (dpm/100 cm²)	234.33	N/A	N/A
Low Value (dpm/100 cm²)	-53.37	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU55		
Report Number:	17		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.4, 31.0	Concrete	S	380
5.0, 31.0	Concrete	S	322
7.6, 31.0	Concrete	S	446
10.2, 31.0	Concrete	S	507
12.8, 31.0	Concrete	S	393
1.1, 33.3	Concrete	S	450
3.7, 33.3	Concrete	S	395
6.3, 33.3	Concrete	S	362
8.9, 33.3	Concrete	S	436
11.5, 33.3	Concrete	S	435
14.1, 33.3	Concrete	S	375
2.4, 35.5	Concrete	S	433
5.0, 35.5	Concrete	S	438
7.6, 35.5	Concrete	S	469
10.2, 35.5	Concrete	S	435
12.8, 35.5	Concrete	S	400

Basic Statistical Quantities Summary

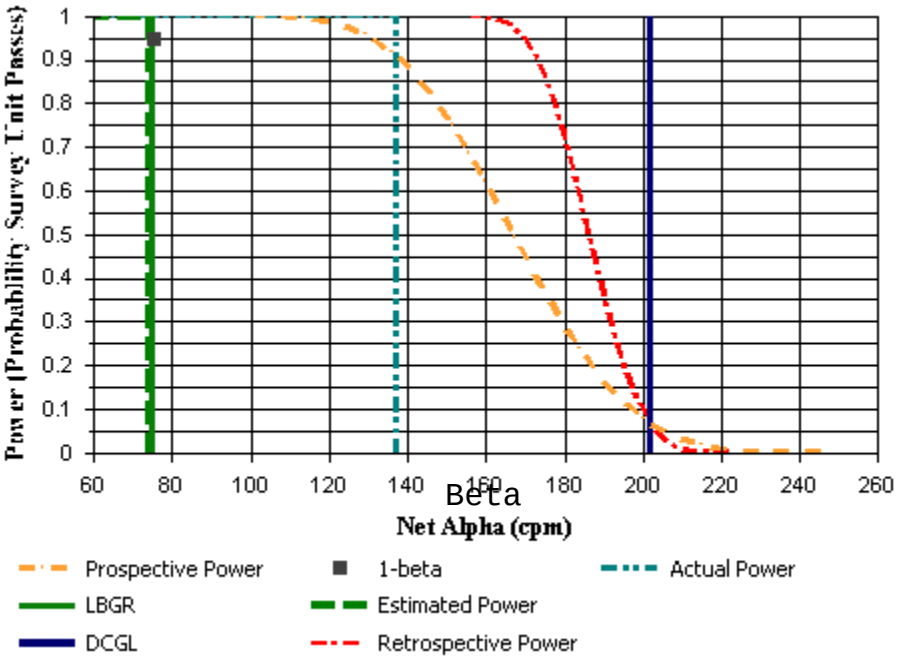
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	161.41	N/A	74.1
Median (dpm/100 cm²)	194.64	N/A	N/A
Std Dev (dpm/100 cm²)	90.16	N/A	71.7
High Value (dpm/100 cm²)	339.48	N/A	N/A
Low Value (dpm/100 cm²)	-27.58	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU56		
Report Number:	18		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.5, 37.7	Concrete	S	457
5.1, 37.7	Concrete	S	448
7.7, 37.7	Concrete	S	418
10.2, 37.7	Concrete	S	362
12.8, 37.7	Concrete	S	419
1.2, 39.9	Concrete	S	403
3.8, 39.9	Concrete	S	391
6.4, 39.9	Concrete	S	408
8.9, 39.9	Concrete	S	353
11.5, 39.9	Concrete	S	413
14.1, 39.9	Concrete	S	388
2.5, 42.2	Concrete	S	407
5.1, 42.2	Concrete	S	372
7.7, 42.2	Concrete	S	435
10.2, 42.2	Concrete	S	358
12.8, 42.2	Concrete	S	361

Basic Statistical Quantities Summary

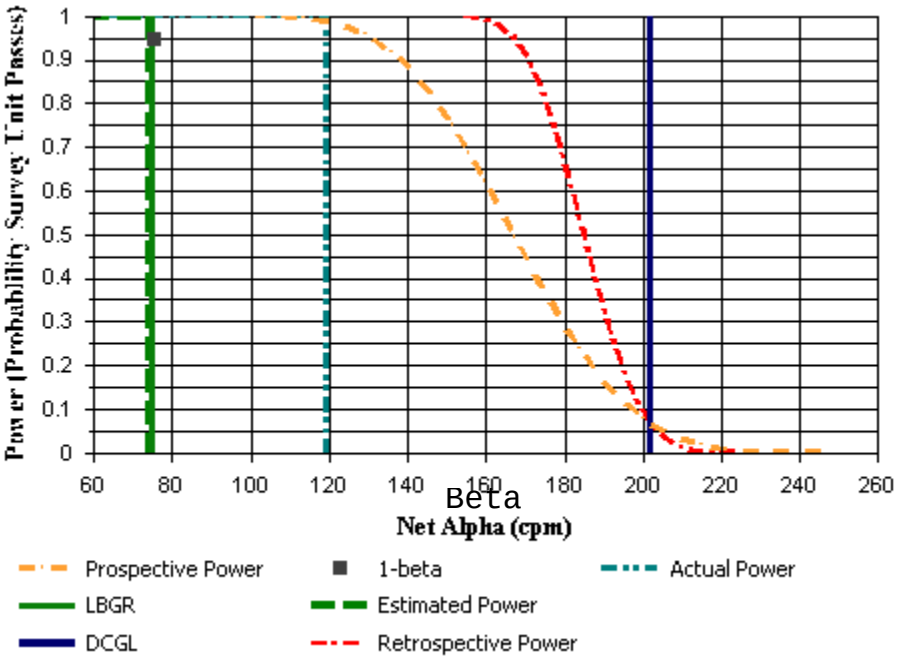
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	126.31	N/A	74.1
Median (dpm/100 cm²)	137.10	N/A	N/A
Std Dev (dpm/100 cm²)	64.19	N/A	71.7
High Value (dpm/100 cm²)	240.28	N/A	N/A
Low Value (dpm/100 cm²)	33.93	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU57		
Report Number:	19		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.5, 43.5	Concrete	S	384
5.1, 43.5	Concrete	S	399
7.7, 43.5	Concrete	S	431
10.3, 43.5	Concrete	S	352
12.8, 43.5	Concrete	S	374
1.2, 45.8	Concrete	S	421
3.8, 45.8	Concrete	S	453
6.4, 45.8	Concrete	S	340
9.0, 45.8	Concrete	S	390
11.5, 45.8	Concrete	S	447
14.1, 45.8	Concrete	S	423
2.5, 48.0	Concrete	S	394
5.1, 48.0	Concrete	S	383
7.7, 48.0	Concrete	S	398
10.3, 48.0	Concrete	S	433
12.8, 48.0	Concrete	S	343

Basic Statistical Quantities Summary

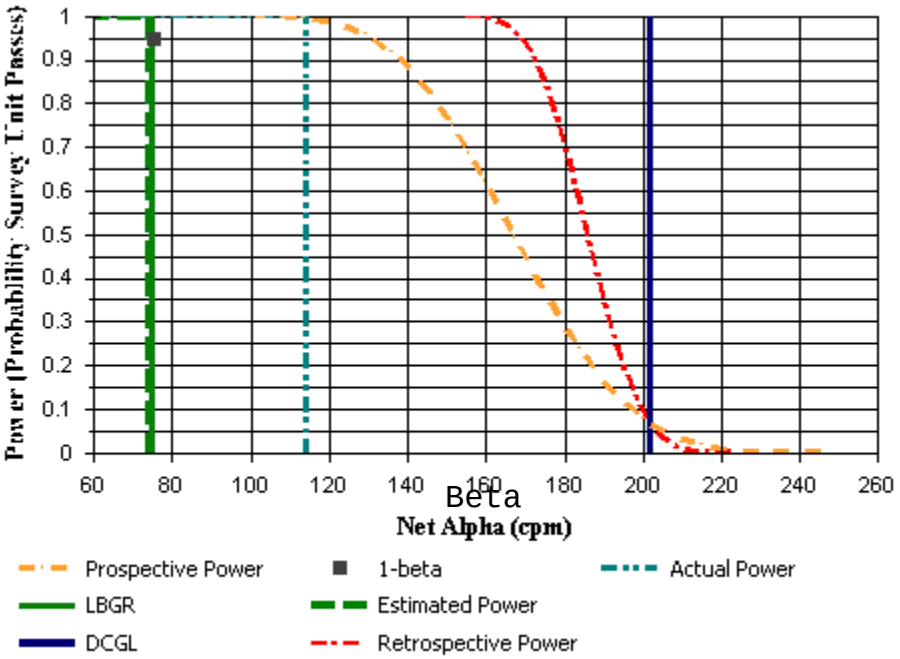
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	122.84	N/A	74.1
Median (dpm/100 cm²)	119.25	N/A	N/A
Std Dev (dpm/100 cm²)	69.64	N/A	71.7
High Value (dpm/100 cm²)	232.34	N/A	N/A
Low Value (dpm/100 cm²)	8.13	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU58		
Report Number:	20		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.5, 50.4	Concrete	S	363
5.1, 50.4	Concrete	S	406
7.7, 50.4	Concrete	S	367
10.3, 50.4	Concrete	S	339
12.9, 50.4	Concrete	S	366
1.2, 52.7	Concrete	S	383
3.8, 52.7	Concrete	S	429
6.4, 52.7	Concrete	S	427
9.0, 52.7	Concrete	S	321
11.6, 52.7	Concrete	S	418
14.2, 52.7	Concrete	S	392
2.5, 54.9	Concrete	S	383
5.1, 54.9	Concrete	S	396
7.7, 54.9	Concrete	S	395
10.3, 54.9	Concrete	S	418
12.9, 54.9	Concrete	S	439

Basic Statistical Quantities Summary

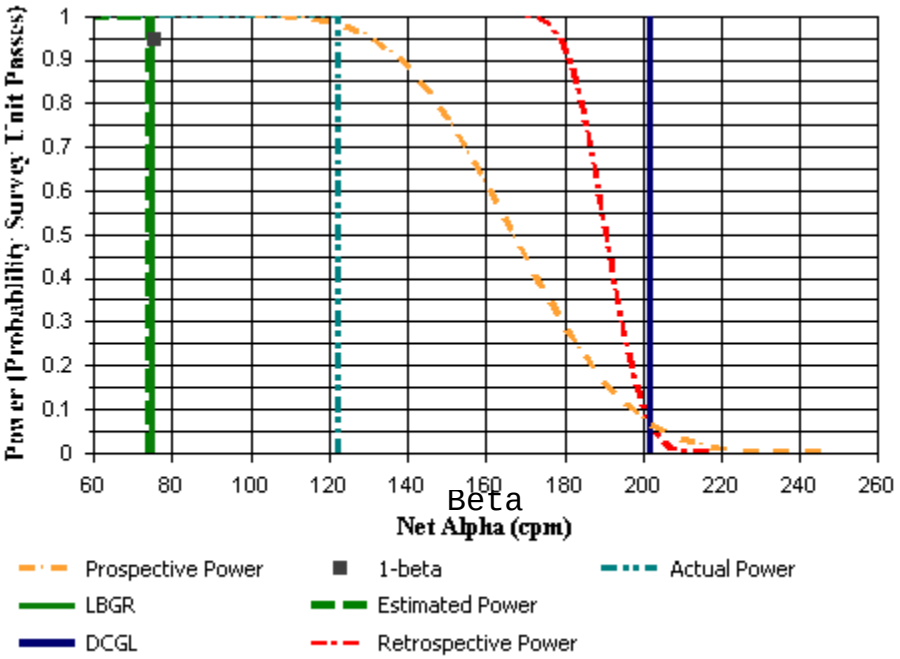
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	107.59	N/A	74.1
Median (dpm/100 cm²)	114.29	N/A	N/A
Std Dev (dpm/100 cm²)	65.75	N/A	71.7
High Value (dpm/100 cm²)	204.56	N/A	N/A
Low Value (dpm/100 cm²)	-29.56	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU59		
Report Number:	21		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.5, 56.4	Concrete	S	388
5.1, 56.4	Concrete	S	428
7.7, 56.4	Concrete	S	352
10.2, 56.4	Concrete	S	413
12.8, 56.4	Concrete	S	406
1.2, 58.7	Concrete	S	415
3.8, 58.7	Concrete	S	384
6.4, 58.7	Concrete	S	396
9.0, 58.7	Concrete	S	414
11.5, 58.7	Concrete	S	422
14.1, 58.7	Concrete	S	348
2.5, 60.9	Concrete	S	389
5.1, 60.9	Concrete	S	366
7.7, 60.9	Concrete	S	393
10.2, 60.9	Concrete	S	399
12.8, 60.9	Concrete	S	402

Basic Statistical Quantities Summary

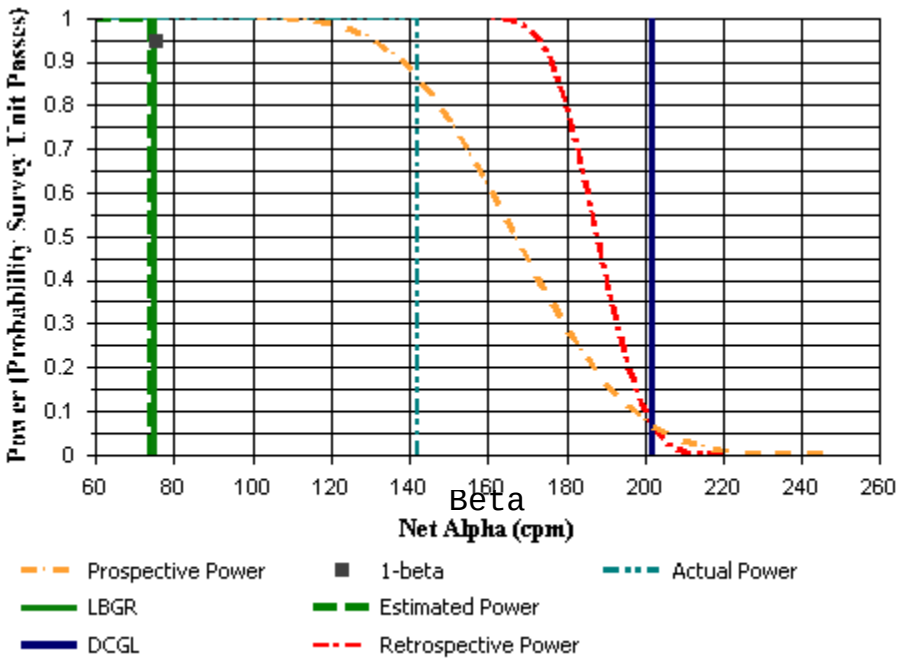
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	116.64	N/A	74.1
Median (dpm/100 cm²)	122.22	N/A	N/A
Std Dev (dpm/100 cm²)	46.38	N/A	71.7
High Value (dpm/100 cm²)	182.74	N/A	N/A
Low Value (dpm/100 cm²)	24.01	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU50 through 60 F-731 Floor C1 SU60		
Report Number:	22		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.5, 61.5	Concrete	S	403
5.1, 61.5	Concrete	S	394
7.7, 61.5	Concrete	S	387
10.3, 61.5	Concrete	S	411
12.9, 61.5	Concrete	S	404
1.2, 63.8	Concrete	S	454
3.8, 63.8	Concrete	S	401
6.4, 63.8	Concrete	S	412
9.0, 63.8	Concrete	S	363
11.6, 63.8	Concrete	S	418
14.2, 63.8	Concrete	S	403
2.5, 66.0	Concrete	S	468
5.1, 66.0	Concrete	S	429
7.7, 66.0	Concrete	S	388
10.3, 66.0	Concrete	S	455
12.9, 66.0	Concrete	S	451

Basic Statistical Quantities Summary

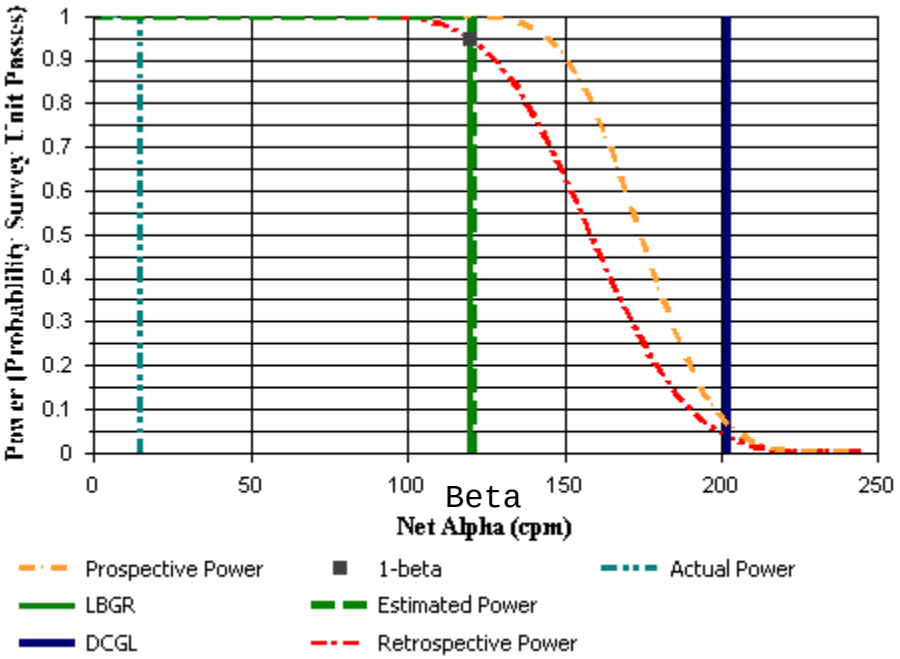
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	157.07	N/A	74.1
Median (dpm/100 cm²)	142.06	N/A	N/A
Std Dev (dpm/100 cm²)	57.78	N/A	71.7
High Value (dpm/100 cm²)	262.10	N/A	N/A
Low Value (dpm/100 cm²)	53.77	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU61 F-731 Lower West Wall Revised		
Report Number:	2		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
50/44A	FSS Terra Cotta	S	642
51	FSS Terra Cotta	S	578
52	FSS Terra Cotta	S	687
53	FSS Terra Cotta	S	575
54	FSS Terra Cotta	S	598
55	FSS Terra Cotta	S	632
56	FSS Terra Cotta	S	633
57	FSS Terra Cotta	S	513
58	FSS Terra Cotta	S	616
59	Concrete	S	389
60/45A	FSS Terra Cotta	S	666
61	Concrete	S	433
62	Brick	S	458
63	FSS Terra Cotta	S	420
64	Brick	S	383
65	Concrete	S	368
66	FSS Terra Cotta	S	671
67	Concrete	S	475
68	FSS Terra Cotta	S	645
69	Concrete	S	480

Basic Statistical Quantities Summary

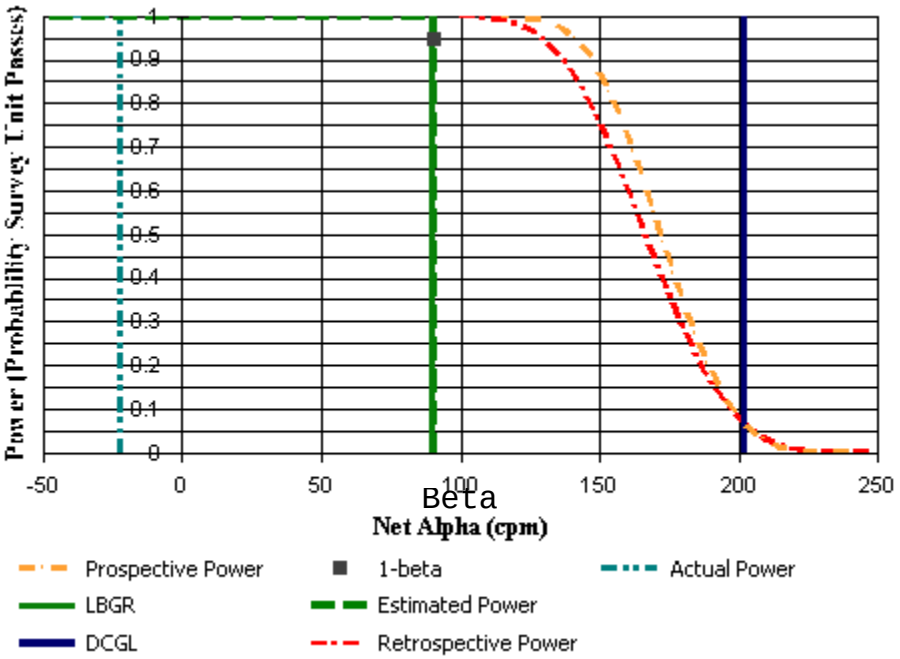
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=28
Mean (dpm/100 cm²)	10.74	N/A	121
Median (dpm/100 cm²)	14.66	N/A	N/A
Std Dev (dpm/100 cm²)	165.34	N/A	76
High Value (dpm/100 cm²)	285.91	N/A	N/A
Low Value (dpm/100 cm²)	-428.79	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU62 through 65 F-731 walls revised C2 SU62 South Wall		
Report Number:	5		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
10.4, 5.3	Brick	S	377
8.0, 5.3	Wood	S	228
5.6, 5.3	FSS Terra Cotta	S	386
14.0, 3.2	FSS Terra Cotta	S	621
11.6, 3.2	FSS Terra Cotta	S	652
9.2, 3.2	FSS Terra Cotta	S	708
6.8, 3.2	FSS Terra Cotta	S	631
4.5, 3.2	FSS Terra Cotta	S	653
2.1, 3.2	FSS Terra Cotta	S	626
15.2, 1.1	FSS Terra Cotta	S	595
12.8, 1.1	FSS Terra Cotta	S	574
10.4, 1.1	Brick	S	432
8.0, 1.1	FSS Terra Cotta	S	633
5.6, 1.1	Brick	S	386
3.3, 1.1	FSS Terra Cotta	S	624
0.9, 1.1	Brick	S	479

Basic Statistical Quantities Summary

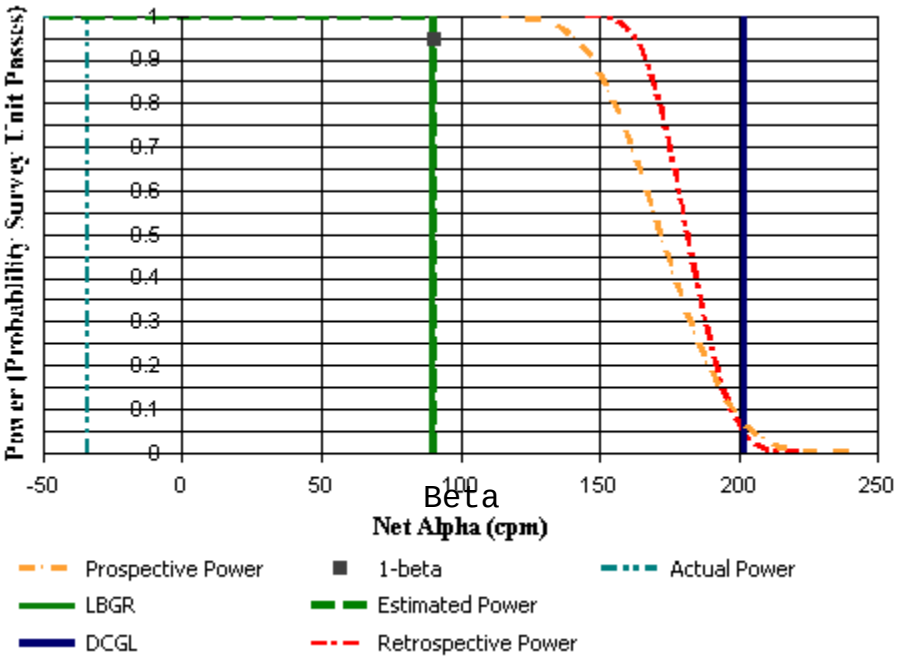
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	-35.78	N/A	90.3
Median (dpm/100 cm²)	-22.05	N/A	N/A
Std Dev (dpm/100 cm²)	145.10	N/A	61.6
High Value (dpm/100 cm²)	151.98	N/A	N/A
Low Value (dpm/100 cm²)	-496.25	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU62 through 65 F-731 walls revised C2 SU63 Upper West Wall		
Report Number:	6		
Survey Unit Measurements:	17		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.9, 2.1	FSS Terra Cotta	S	612
6.8, 4.4	FSS Terra Cotta	S	619
10.7, 2.1	FSS Terra Cotta	S	669
14.7, 4.4	Concrete	S	293
18.6, 2.1	FSS Terra Cotta	S	605
22.5, 4.4	FSS Terra Cotta	S	627
26.4, 2.1	FSS Terra Cotta	S	602
30.3, 4.4	Brick	S	348
34.2, 2.1	FSS Terra Cotta	S	546
38.1, 4.4	FSS Terra Cotta	S	636
42.0, 2.1	FSS Terra Cotta	S	624
45.9, 4.4	FSS Terra Cotta	S	617
49.8, 2.1	FSS Terra Cotta	S	587
53.7, 4.4	FSS Terra Cotta	S	656
57.6, 2.1	FSS Terra Cotta	S	645
61.5, 4.4	FSS Terra Cotta	S	684
65.4, 2.1	FSS Terra Cotta	S	692

Basic Statistical Quantities Summary

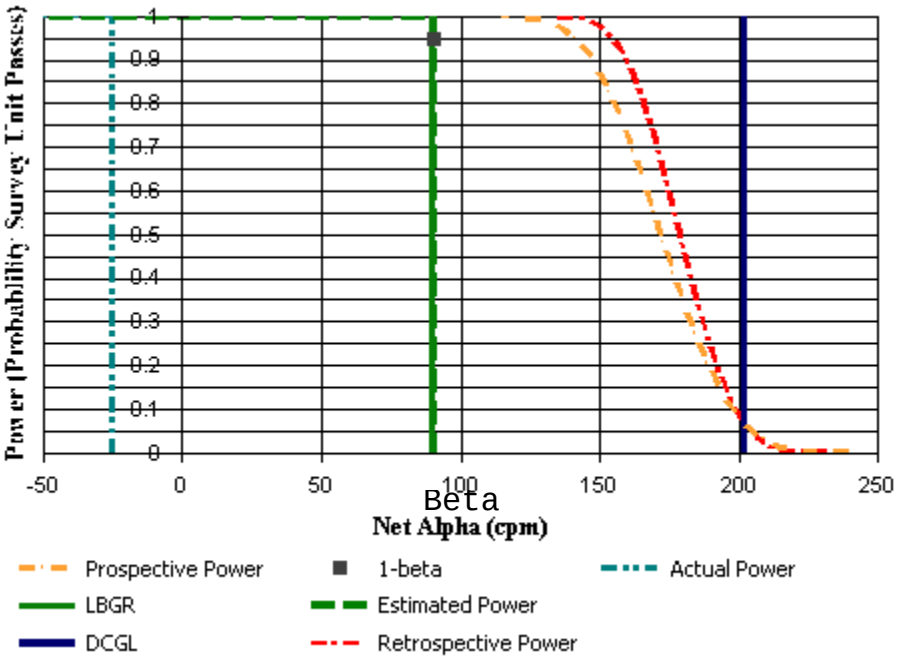
Statistic	Survey Unit	Background	DQO Results
Sample Number	17	N/A	N=16
Mean (dpm/100 cm²)	-25.44	N/A	90.3
Median (dpm/100 cm²)	-33.95	N/A	N/A
Std Dev (dpm/100 cm²)	75.41	N/A	61.6
High Value (dpm/100 cm²)	110.89	N/A	N/A
Low Value (dpm/100 cm²)	-178.79	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU62 through 65 F-731 walls revised C2 SU64 North Wall		
Report Number:	7		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.3, 1.1	Brick	S	509
2.7, 1.1	FSS Terra Cotta	S	660
5.1, 1.1	Brick	S	481
7.5, 1.1	FSS Terra Cotta	S	661
9.8, 1.1	FSS Terra Cotta	S	616
12.2, 1.1	FSS Terra Cotta	S	568
14.6, 1.1	FSS Terra Cotta	S	617
1.5, 3.2	FSS Terra Cotta	S	632
3.9, 3.2	FSS Terra Cotta	S	680
6.3, 3.2	FSS Terra Cotta	S	604
8.7, 3.2	FSS Terra Cotta	S	611
11.0, 3.2	FSS Terra Cotta	S	617
13.4, 3.2	FSS Terra Cotta	S	621
5.1, 5.3	Brick	S	416
7.5, 5.3	Wood	S	212
9.8, 5.3	FSS Terra Cotta	S	626

Basic Statistical Quantities Summary

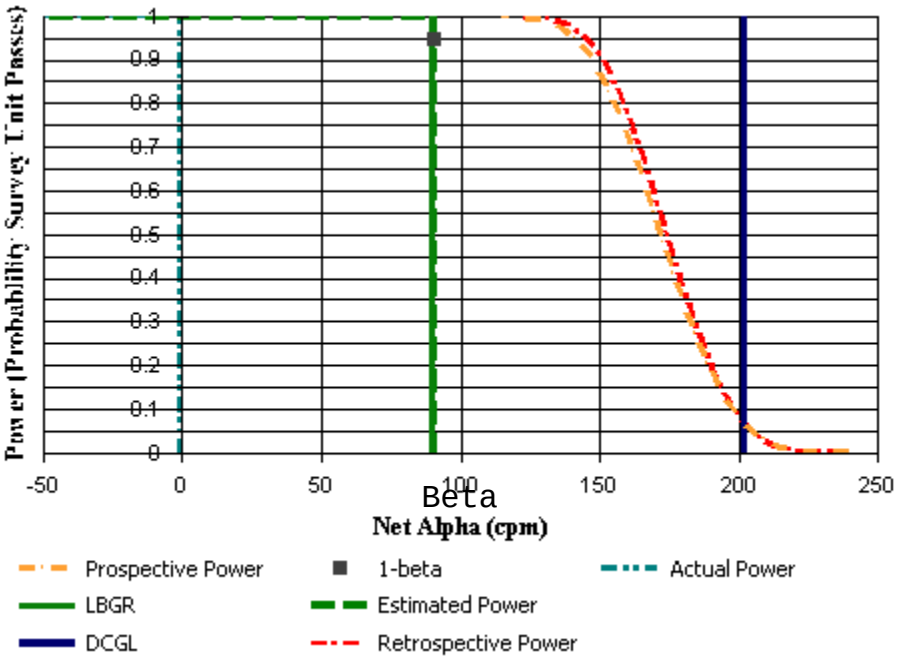
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	0.47	N/A	90.3
Median (dpm/100 cm²)	-25.02	N/A	N/A
Std Dev (dpm/100 cm²)	94.75	N/A	61.6
High Value (dpm/100 cm²)	211.51	N/A	N/A
Low Value (dpm/100 cm²)	-148.21	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU62 through 65 F-731 walls revised C2 SU65 East Wall		
Report Number:	8		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.6, 1.3	FSS Terra Cotta	S	660
6.7, 3.6	FSS Terra Cotta	S	725
10.7, 1.3	Concrete	S	236
14.8, 3.6	FSS Terra Cotta	S	621
18.8, 1.3	FSS Terra Cotta	S	528
22.8, 3.6	Concrete	S	261
26.9, 1.3	FSS Terra Cotta	S	668
30.9, 3.6	FSS Terra Cotta	S	603
35.0, 1.3	FSS Terra Cotta	S	686
39.0, 3.6	FSS Terra Cotta	S	677
43.0, 1.3	FSS Terra Cotta	S	660
47.1, 3.6	FSS Terra Cotta	S	661
51.1, 1.3	Brick	S	395
55.2, 3.6	FSS Terra Cotta	S	623
59.2, 1.3	FSS Terra Cotta	S	643
63.2, 3.6	Concrete	S	253

Basic Statistical Quantities Summary

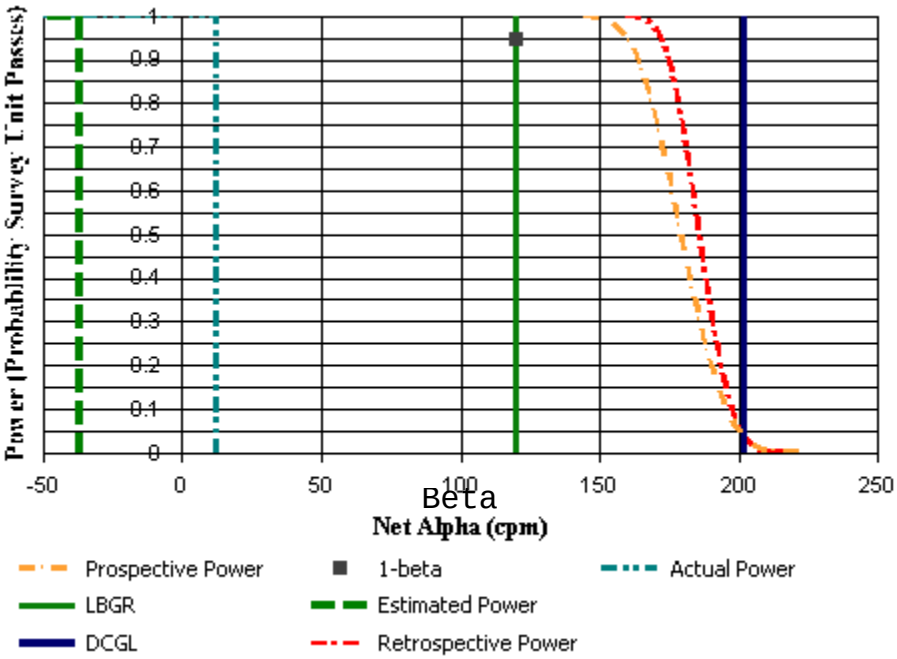
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	-17.79	N/A	90.3
Median (dpm/100 cm²)	-0.51	N/A	N/A
Std Dev (dpm/100 cm²)	113.75	N/A	61.6
High Value (dpm/100 cm²)	176.37	N/A	N/A
Low Value (dpm/100 cm²)	-214.51	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU66 F-731 Trusses		
Report Number:	3		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.4, 6.3, Truss 1	Wood	S	302
11.8, 12.3, Truss 2	Wood	S	268
1.3, 18.4, Truss 3	Wood	S	341
14.6, 18.4, Truss 3	Wood	S	248
8.5, 18.4, Truss 3	Wood	S	299
9.9, 18.5, Truss 3	Wood	S	263
10.2, 24.5, Truss 4	Wood	S	313
4.3, 30.5, Truss 5	Wood	S	317
9.0, 36.8, Truss 6	Wood	S	286
3.5, 42.8, Truss 7	Wood	S	262
4.1, 42.8, Truss 7	Wood	S	291
11.7, 42.9, Truss 7	Wood	S	326
1.6, 42.9, Truss 7	Wood	S	316
0.4, 48.9, Truss 8	Wood	S	293
3.3, 61.1, Truss 10	Wood	S	287

Basic Statistical Quantities Summary

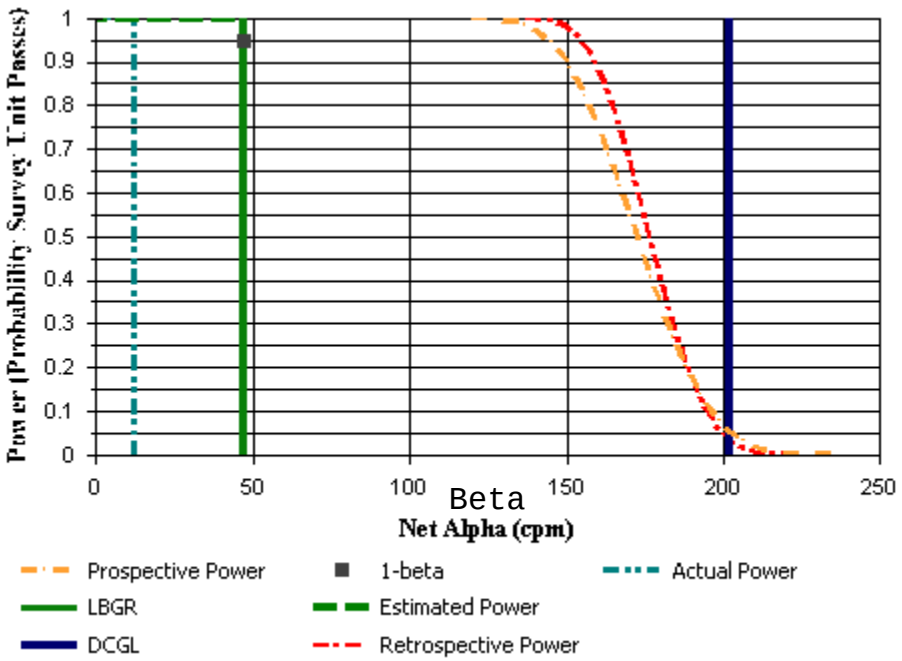
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	14.75	N/A	-36.7
Median (dpm/100 cm²)	12.50	N/A	N/A
Std Dev (dpm/100 cm²)	51.95	N/A	36.7
High Value (dpm/100 cm²)	107.74	N/A	N/A
Low Value (dpm/100 cm²)	-76.79	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 Pad C1 SU67		
Report Number:	12		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.8, 0.1	Concrete	S	322
5.1, 0.1	Concrete	S	370
8.5, 0.1	Concrete	S	342
11.9, 0.1	Concrete	S	441
15.2, 0.1	Concrete	S	440
0.1, 3.0	Concrete	S	347
3.5, 3.0	Concrete	S	327
6.8, 3.0	Concrete	S	335
10.2, 3.0	Concrete	S	365
13.6, 3.0	Concrete	S	297
1.8, 5.9	Concrete	S	311
5.1, 5.9	Concrete	S	343
8.5, 5.9	Concrete	S	333
11.9, 5.9	Concrete	S	330
15.2, 5.9	Concrete	S	351

Basic Statistical Quantities Summary

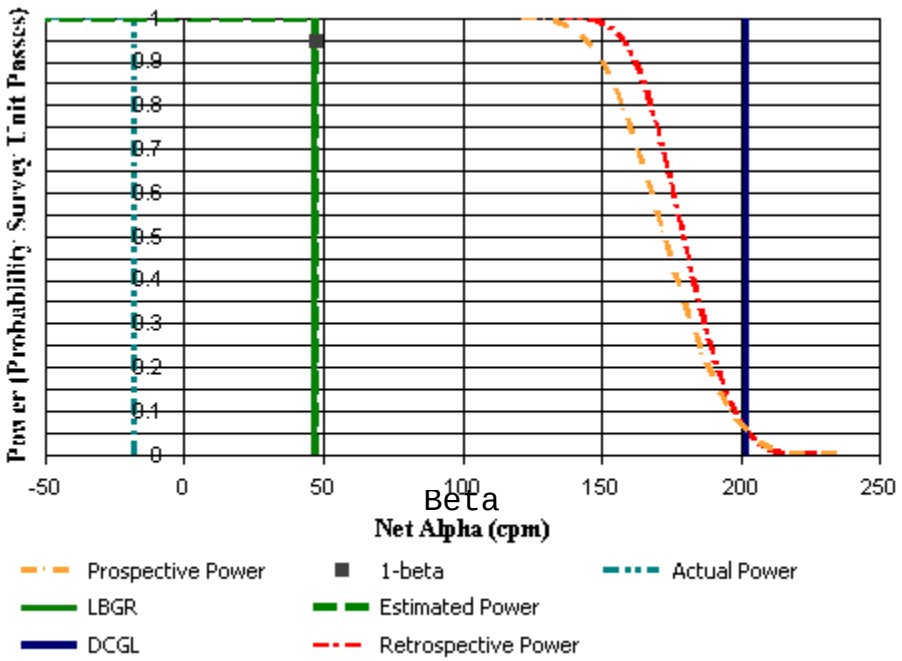
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=14
Mean (dpm/100 cm²)	28.51	N/A	47.1
Median (dpm/100 cm²)	12.10	N/A	N/A
Std Dev (dpm/100 cm²)	81.61	N/A	52.2
High Value (dpm/100 cm²)	208.53	N/A	N/A
Low Value (dpm/100 cm²)	-77.18	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU68		
Report Number:	13		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.6, 6.2	Concrete	S	379
3.9, 6.2	Concrete	S	297
7.3, 6.2	Concrete	S	312
10.6, 6.2	Concrete	S	335
14.0, 6.2	Concrete	S	345
2.2, 9.1	Concrete	S	325
5.6, 9.1	Concrete	S	313
9.0, 9.1	Concrete	S	325
12.3, 9.1	Concrete	S	379
0.6, 12.0	Concrete	S	435
3.9, 12.0	Concrete	S	304
7.3, 12.0	Concrete	S	329
10.6, 12.0	Concrete	S	397
14.0, 12.0	Concrete	S	319

Basic Statistical Quantities Summary

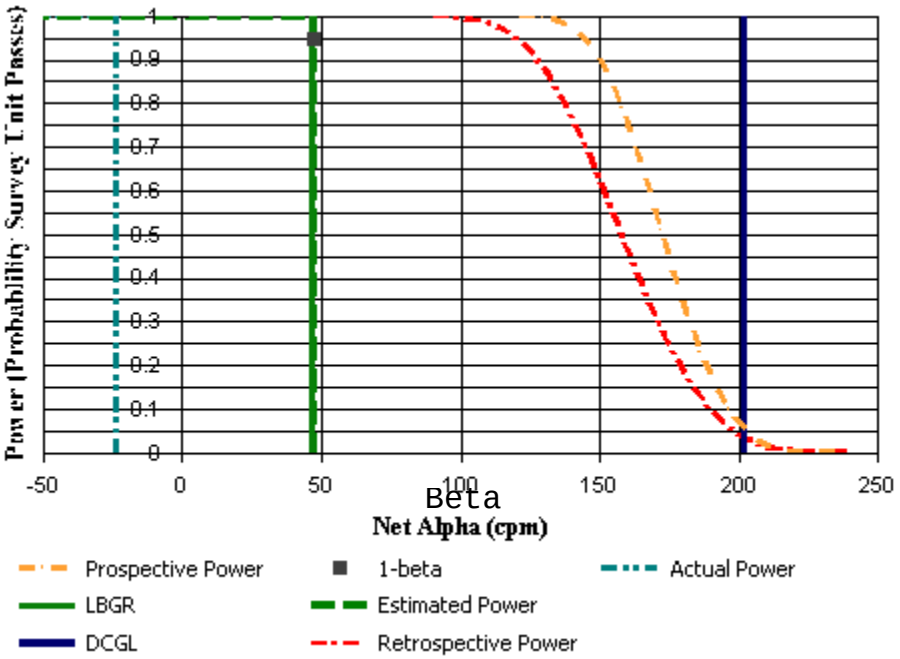
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=14
Mean (dpm/100 cm²)	12.95	N/A	47.1
Median (dpm/100 cm²)	-17.66	N/A	N/A
Std Dev (dpm/100 cm²)	79.66	N/A	52.2
High Value (dpm/100 cm²)	196.63	N/A	N/A
Low Value (dpm/100 cm²)	-77.18	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU69		
Report Number:	14		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.4, 12.8	Concrete	S	328
3.4, 12.8	Concrete	S	324
6.4, 12.8	Concrete	S	300
9.5, 12.8	Concrete	S	267
12.5, 12.8	Concrete	S	441
1.9, 15.4	Concrete	S	286
4.9, 15.4	Concrete	S	278
8.0, 15.4	Concrete	S	318
11.0, 15.4	Concrete	S	334
14.0, 15.4	Concrete	S	449
0.4, 18.0	Concrete	S	520
3.4, 18.0	Concrete	S	308
6.4, 18.0	Concrete	S	326
9.5, 18.0	Concrete	S	314
12.5, 18.0	Concrete	S	340

Basic Statistical Quantities Summary

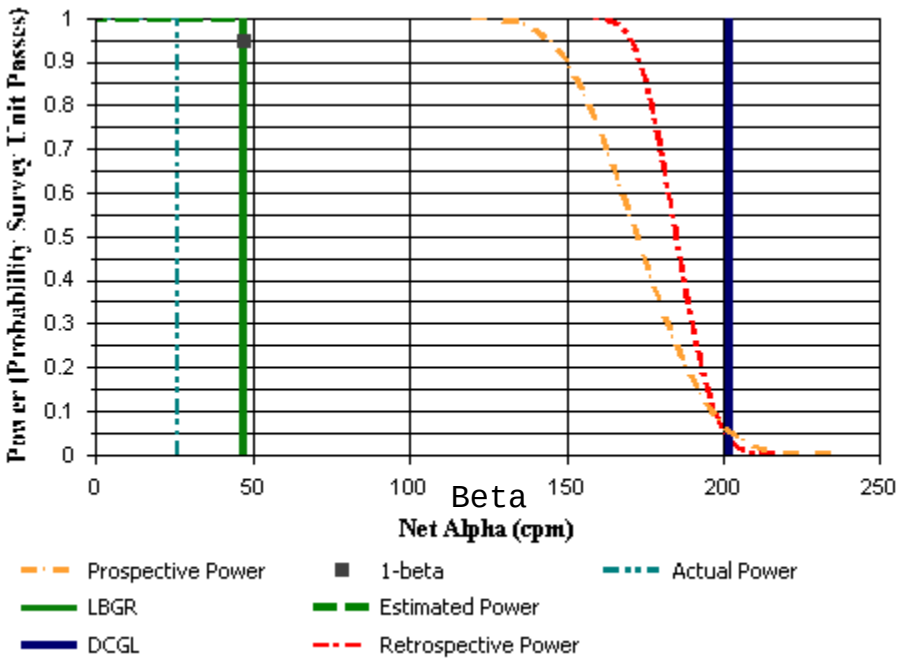
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=14
Mean (dpm/100 cm²)	12.50	N/A	47.1
Median (dpm/100 cm²)	-23.61	N/A	N/A
Std Dev (dpm/100 cm²)	141.21	N/A	52.2
High Value (dpm/100 cm²)	365.28	N/A	N/A
Low Value (dpm/100 cm²)	-136.71	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU70		
Report Number:	15		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.8, 18.7	Concrete	S	336
4.0, 18.7	Concrete	S	289
7.2, 18.7	Concrete	S	361
10.4, 18.7	Concrete	S	352
13.6, 18.7	Concrete	S	330
2.4, 21.5	Concrete	S	308
5.6, 21.5	Concrete	S	309
8.8, 21.5	Concrete	S	349
12.0, 21.5	Concrete	S	356
15.2, 21.5	Concrete	S	391
0.8, 24.2	Concrete	S	317
4.0, 24.2	Concrete	S	310
7.2, 24.2	Concrete	S	363
10.4, 24.2	Concrete	S	357
13.6, 24.2	Concrete	S	351

Basic Statistical Quantities Summary

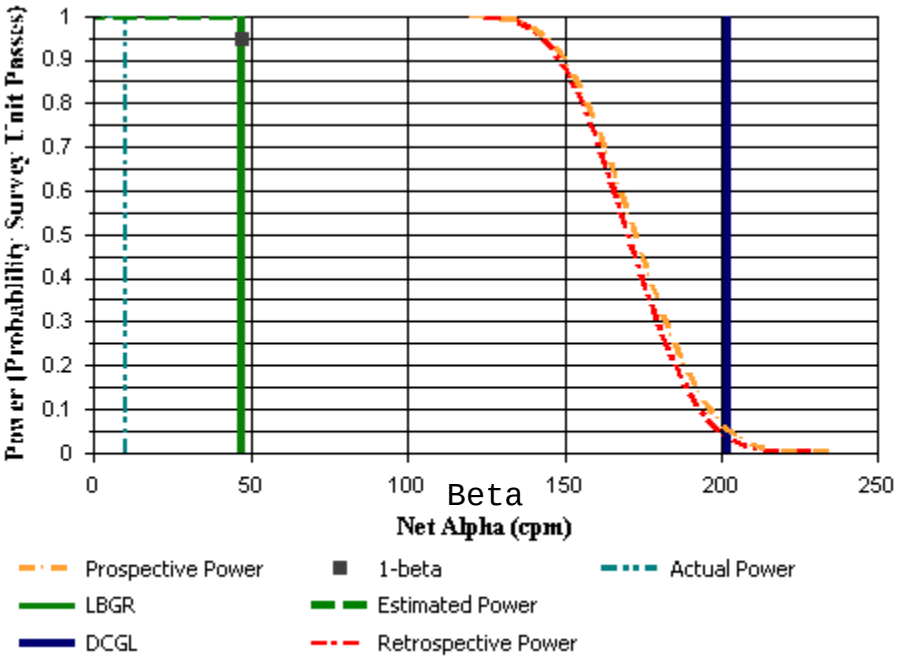
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=14
Mean (dpm/100 cm²)	5.36	N/A	47.1
Median (dpm/100 cm²)	25.99	N/A	N/A
Std Dev (dpm/100 cm²)	54.50	N/A	52.2
High Value (dpm/100 cm²)	109.33	N/A	N/A
Low Value (dpm/100 cm²)	-93.06	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU71		
Report Number:	16		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.3, 24.5	Concrete	S	299
3.5, 24.5	Concrete	S	295
6.7, 24.5	Concrete	S	365
9.9, 24.5	Concrete	S	361
13.1, 24.5	Concrete	S	344
1.9, 27.3	Concrete	S	303
5.1, 27.3	Concrete	S	324
8.3, 27.3	Concrete	S	312
11.5, 27.3	Concrete	S	362
14.7, 27.3	Concrete	S	326
0.3, 30.0	Concrete	S	509
3.5, 30.0	Concrete	S	365
6.7, 30.0	Concrete	S	341
9.9, 30.0	Concrete	S	351
13.1, 30.0	Concrete	S	336

Basic Statistical Quantities Summary

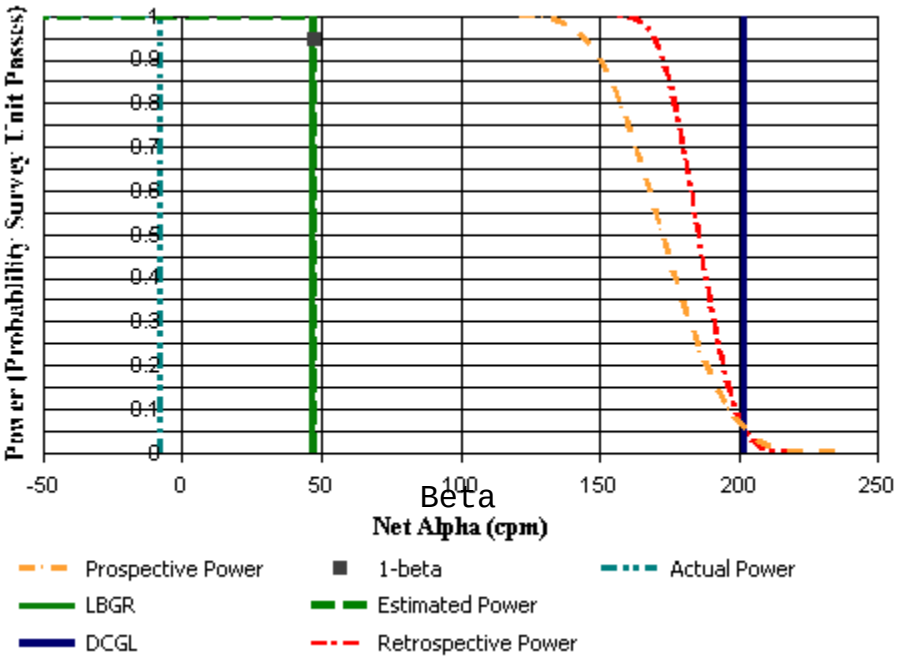
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=14
Mean (dpm/100 cm²)	20.44	N/A	47.1
Median (dpm/100 cm²)	10.12	N/A	N/A
Std Dev (dpm/100 cm²)	101.48	N/A	52.2
High Value (dpm/100 cm²)	343.45	N/A	N/A
Low Value (dpm/100 cm²)	-81.15	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU72		
Report Number:	17		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.0, 30.7	Concrete	S	332
4.2, 30.7	Concrete	S	362
7.4, 30.7	Concrete	S	329
10.6, 30.7	Concrete	S	309
13.8, 30.7	Concrete	S	293
2.6, 33.4	Concrete	S	351
5.8, 33.4	Concrete	S	294
9.0, 33.4	Concrete	S	327
12.2, 33.4	Concrete	S	332
1.0, 36.2	Concrete	S	344
4.2, 36.2	Concrete	S	287
7.4, 36.2	Concrete	S	357
10.6, 36.2	Concrete	S	361
13.8, 36.2	Concrete	S	385

Basic Statistical Quantities Summary

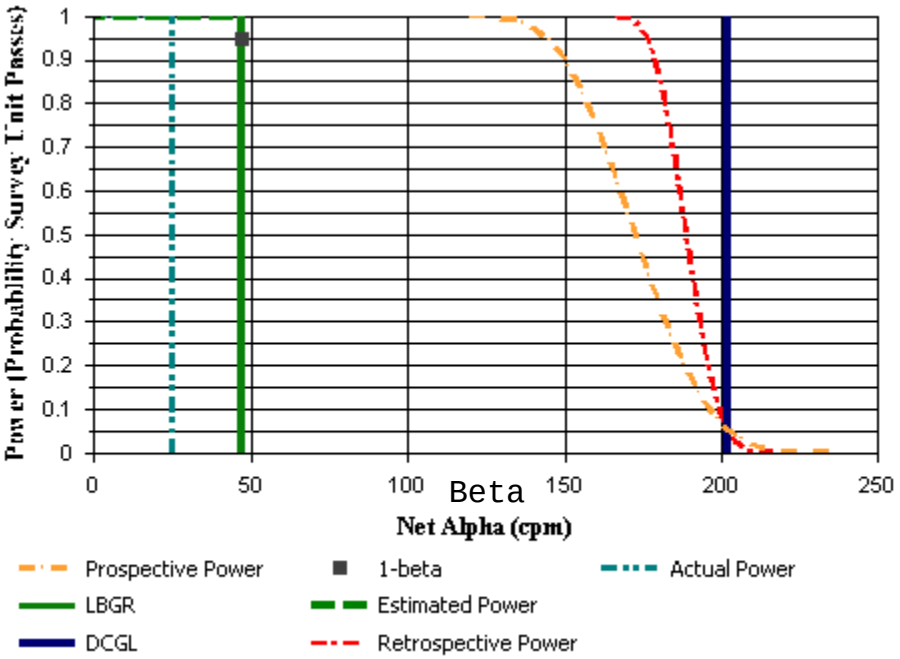
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=14
Mean (dpm/100 cm²)	-5.61	N/A	47.1
Median (dpm/100 cm²)	-7.74	N/A	N/A
Std Dev (dpm/100 cm²)	58.28	N/A	52.2
High Value (dpm/100 cm²)	97.42	N/A	N/A
Low Value (dpm/100 cm²)	-97.02	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU73		
Report Number:	18		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.5, 36.7	Concrete	S	323
4.9, 36.7	Concrete	S	378
8.2, 36.7	Concrete	S	316
11.6, 36.7	Concrete	S	336
15.0, 36.7	Concrete	S	391
3.2, 39.6	Concrete	S	356
6.6, 39.6	Concrete	S	349
9.9, 39.6	Concrete	S	343
13.3, 39.6	Concrete	S	377
1.5, 42.5	Concrete	S	384
4.9, 42.5	Concrete	S	363
8.2, 42.5	Concrete	S	334
11.6, 42.5	Concrete	S	336
15.0, 42.5	Concrete	S	348

Basic Statistical Quantities Summary

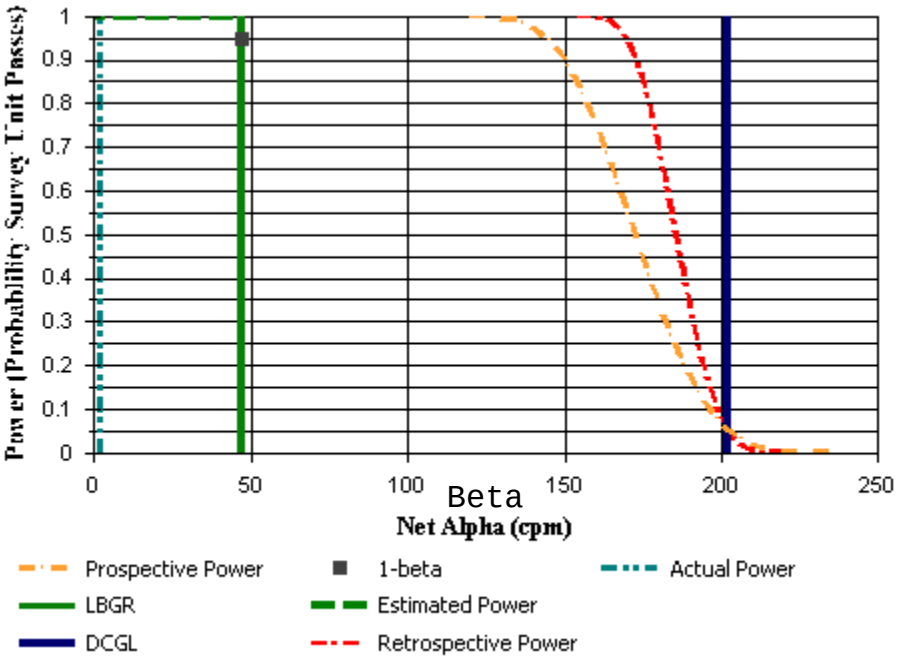
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=14
Mean (dpm/100 cm²)	32.79	N/A	47.1
Median (dpm/100 cm²)	25.00	N/A	N/A
Std Dev (dpm/100 cm²)	46.24	N/A	52.2
High Value (dpm/100 cm²)	109.33	N/A	N/A
Low Value (dpm/100 cm²)	-39.48	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU74		
Report Number:	19		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.2, 42.7	Concrete	S	334
4.6, 42.7	Concrete	S	355
7.9, 42.7	Concrete	S	375
11.3, 42.7	Concrete	S	399
14.6, 42.7	Concrete	S	324
2.9, 45.6	Concrete	S	378
6.2, 45.6	Concrete	S	309
9.6, 45.6	Concrete	S	337
13.0, 45.6	Concrete	S	290
1.2, 48.5	Concrete	S	330
4.6, 48.5	Concrete	S	368
7.9, 48.5	Concrete	S	337
11.3, 48.5	Concrete	S	339
14.6, 48.5	Concrete	S	326

Basic Statistical Quantities Summary

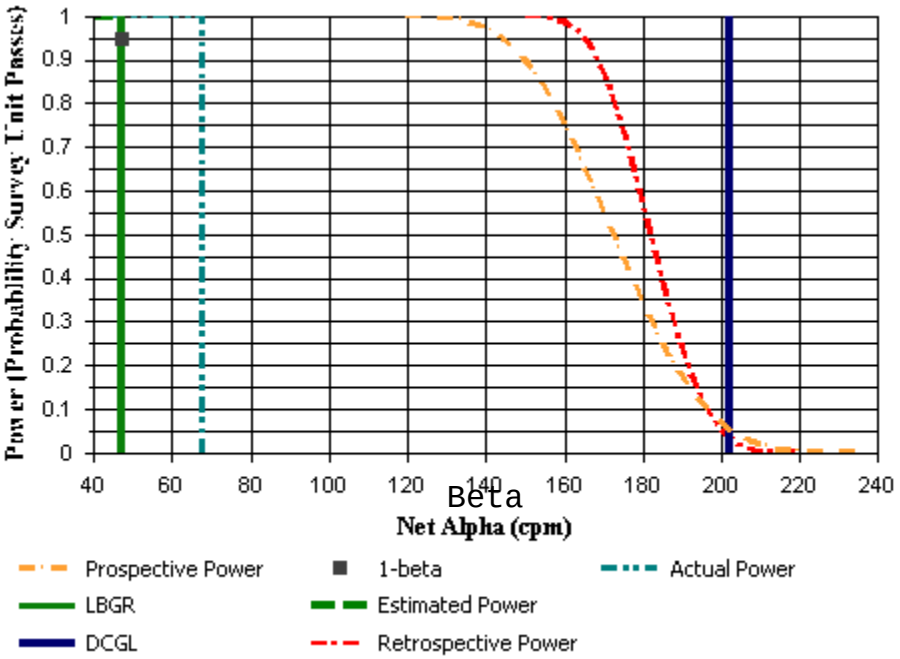
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=14
Mean (dpm/100 cm²)	13.95	N/A	47.1
Median (dpm/100 cm²)	2.18	N/A	N/A
Std Dev (dpm/100 cm²)	58.00	N/A	52.2
High Value (dpm/100 cm²)	125.20	N/A	N/A
Low Value (dpm/100 cm²)	-91.07	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU75		
Report Number:	20		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.7, 49.0	Concrete	S	381
5.1, 49.0	Concrete	S	397
8.4, 49.0	Concrete	S	334
11.8, 49.0	Concrete	S	384
15.2, 49.0	Concrete	S	385
0.0, 51.9	Concrete	S	378
3.4, 51.9	Concrete	S	345
6.7, 51.9	Concrete	S	335
10.1, 51.9	Concrete	S	331
13.5, 51.9	Concrete	S	403
1.7, 54.8	Concrete	S	326
5.1, 54.8	Concrete	S	409
8.4, 54.8	Concrete	S	370
11.8, 54.8	Concrete	S	364
15.2, 54.8	Concrete	S	302

Basic Statistical Quantities Summary

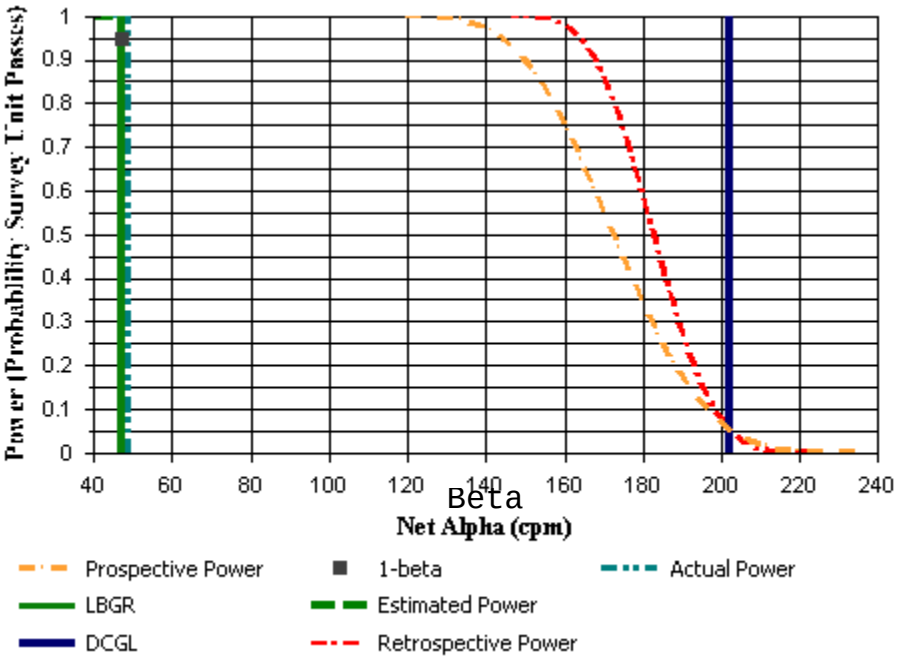
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=14
Mean (dpm/100 cm²)	53.64	N/A	47.1
Median (dpm/100 cm²)	67.66	N/A	N/A
Std Dev (dpm/100 cm²)	63.76	N/A	52.2
High Value (dpm/100 cm²)	145.04	N/A	N/A
Low Value (dpm/100 cm²)	-67.26	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU76		
Report Number:	21		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.5, 55.0	Concrete	S	334
3.9, 55.0	Concrete	S	394
7.3, 55.0	Concrete	S	403
10.6, 55.0	Concrete	S	359
14.0, 55.0	Concrete	S	394
2.2, 57.9	Concrete	S	363
5.6, 57.9	Concrete	S	347
8.9, 57.9	Concrete	S	344
12.3, 57.9	Concrete	S	285
0.5, 60.8	Concrete	S	379
3.9, 60.8	Concrete	S	408
7.3, 60.8	Concrete	S	351
10.6, 60.8	Concrete	S	362
14.0, 60.8	Concrete	S	321

Basic Statistical Quantities Summary

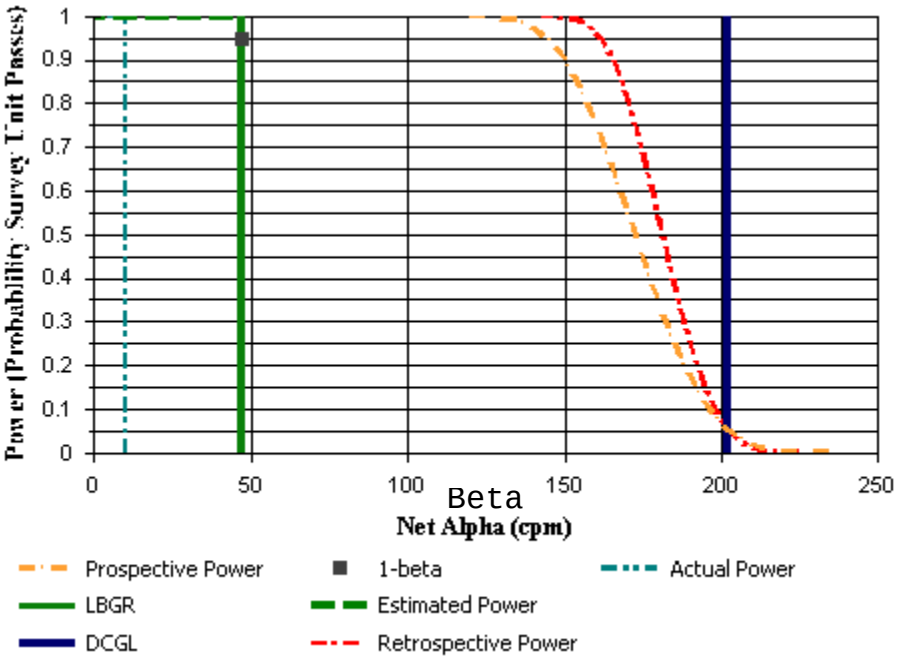
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=14
Mean (dpm/100 cm²)	48.38	N/A	47.1
Median (dpm/100 cm²)	48.81	N/A	N/A
Std Dev (dpm/100 cm²)	67.77	N/A	52.2
High Value (dpm/100 cm²)	143.06	N/A	N/A
Low Value (dpm/100 cm²)	-100.99	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 67 through 76 F-737 C1 SU77		
Report Number:	23		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1.5, 61.5	Concrete	S	329
4.7, 61.5	Concrete	S	385
7.9, 61.5	Concrete	S	321
11.1, 61.5	Concrete	S	340
14.3, 61.5	Concrete	S	329
3.1, 64.3	Concrete	S	296
6.3, 64.3	Concrete	S	342
9.5, 64.3	Concrete	S	299
12.7, 64.3	Concrete	S	356
1.5, 67.1	Concrete	S	333
4.7, 67.1	Concrete	S	392
7.9, 67.1	Concrete	S	427
11.1, 67.1	Concrete	S	356
14.3, 67.1	Concrete	S	380

Basic Statistical Quantities Summary

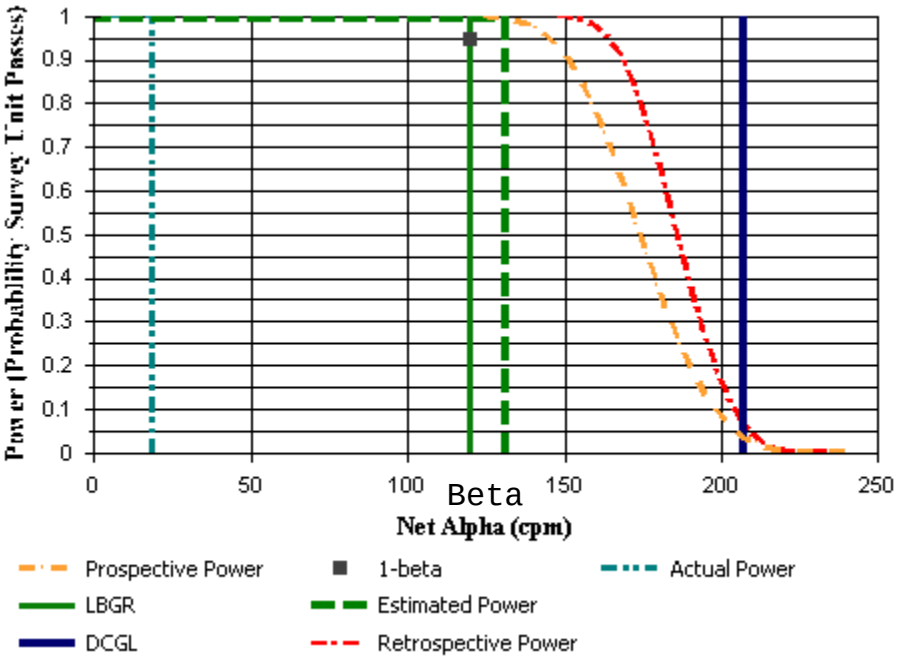
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=14
Mean (dpm/100 cm²)	25.85	N/A	47.1
Median (dpm/100 cm²)	10.12	N/A	N/A
Std Dev (dpm/100 cm²)	72.94	N/A	52.2
High Value (dpm/100 cm²)	180.75	N/A	N/A
Low Value (dpm/100 cm²)	-79.17	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1 Building G-723, C2 SU78		
Report Number:	7		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
17.8, 2.2	Concrete	S	344
15.5, 6.1	Concrete	S	370
20.0, 6.1	Concrete	S	284
17.8, 10.0	Concrete	S	347
15.5, 13.9	Concrete	S	336
20.0, 13.9	Concrete	S	302
17.8, 17.8	Concrete	S	335
15.5, 21.8	Concrete	S	432
20.0, 21.8	Concrete	S	297
17.8, 25.7	Concrete	S	374
15.5, 29.6	Concrete	S	418
20.0, 29.6	Concrete	S	293
17.8, 33.5	Concrete	S	393
15.5, 37.4	Concrete	S	354
20.0, 37.4	Concrete	S	336
17.8, 41.4	Concrete	S	371

Basic Statistical Quantities Summary

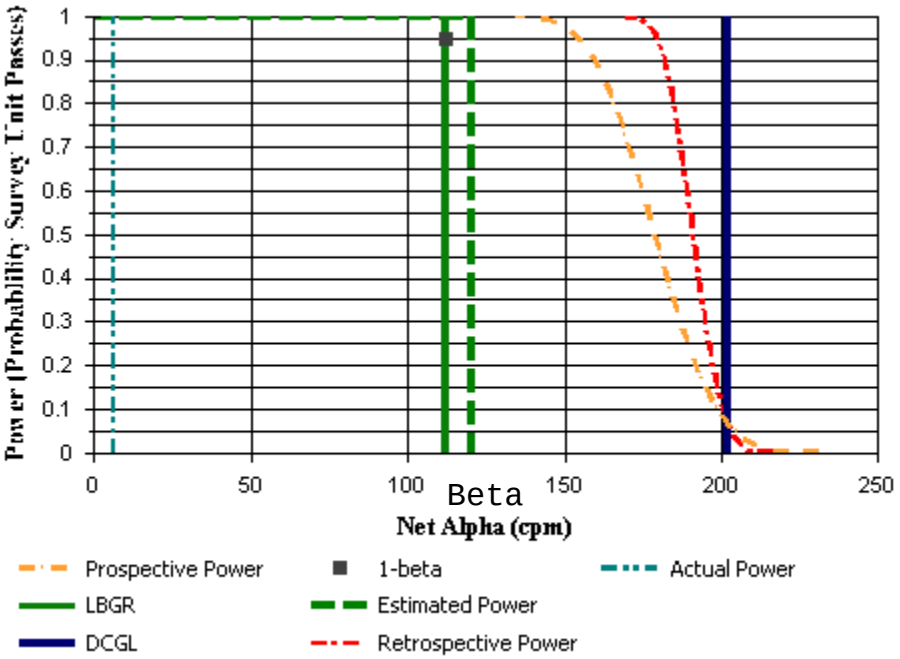
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=20
Mean (dpm/100 cm²)	25.60	N/A	131
Median (dpm/100 cm²)	18.58	N/A	N/A
Std Dev (dpm/100 cm²)	83.63	N/A	62.7
High Value (dpm/100 cm²)	186.02	N/A	N/A
Low Value (dpm/100 cm²)	-100.46	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO G-723, C3 SU79		
Report Number:	16		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
4.3, 1.0	Concrete	S	361
9.8, 9.0	Concrete	S	325
9.0, 12.0	Concrete	S	273
7.0, 13.0	Concrete	S	329
3.7, 14.3	Concrete	S	344
10.1, 17.7	Concrete	S	339
5.2, 19.6	Concrete	S	362
11.8, 35.6	Concrete	S	321
1.1, 37.0	Concrete	S	334
11.4, 37.5	Concrete	S	345
6.6, 40.6	Concrete	S	340
0.9, 46.1	Concrete	S	354
0.5, 49.3	Concrete	S	348
8.0, 57.3	Concrete	S	300
6.2, 59.1	Concrete	S	320
13.1, 65.9	Concrete	S	339

Basic Statistical Quantities Summary

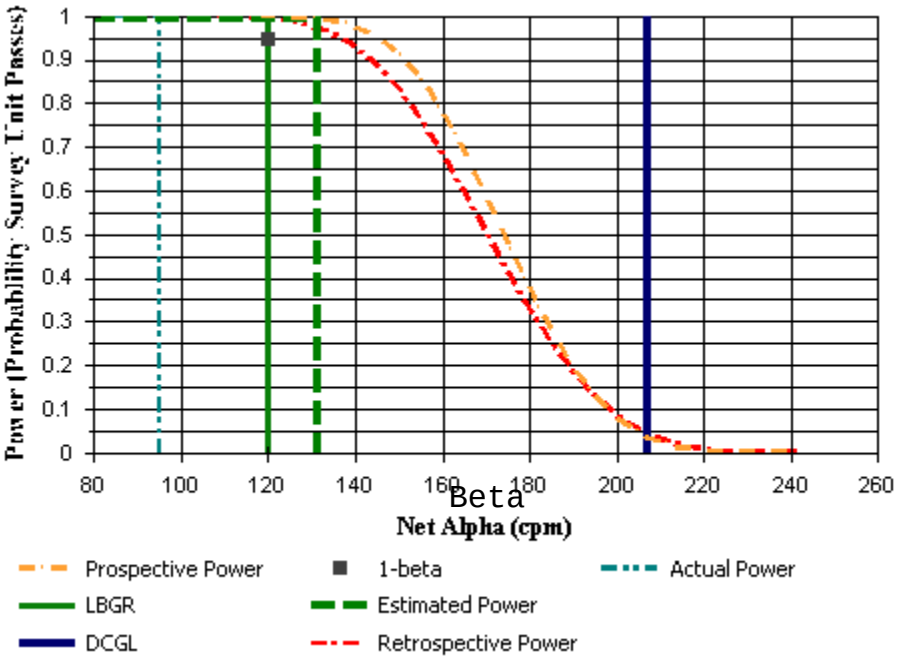
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	-5.01	N/A	120
Median (dpm/100 cm²)	6.15	N/A	N/A
Std Dev (dpm/100 cm²)	45.12	N/A	47.7
High Value (dpm/100 cm²)	51.79	N/A	N/A
Low Value (dpm/100 cm²)	-124.80	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1 C2 SU80 Building A-921		
Report Number:	1		
Survey Unit Measurements:	17		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	406
2	Concrete	S	389
3	Concrete	S	332
4	Concrete	S	416
5	Concrete	S	421
6	Concrete	S	385
7	Concrete	S	401
8	Concrete	S	419
9	Concrete	S	457
10	Concrete	S	414
11	Terra Cotta	S	710
12	Terra Cotta	S	619
13	Terra Cotta	S	655
14	Terra Cotta	S	646
15	Terra Cotta	S	689
16	Terra Cotta	S	609
17	Terra Cotta	S	659

Basic Statistical Quantities Summary

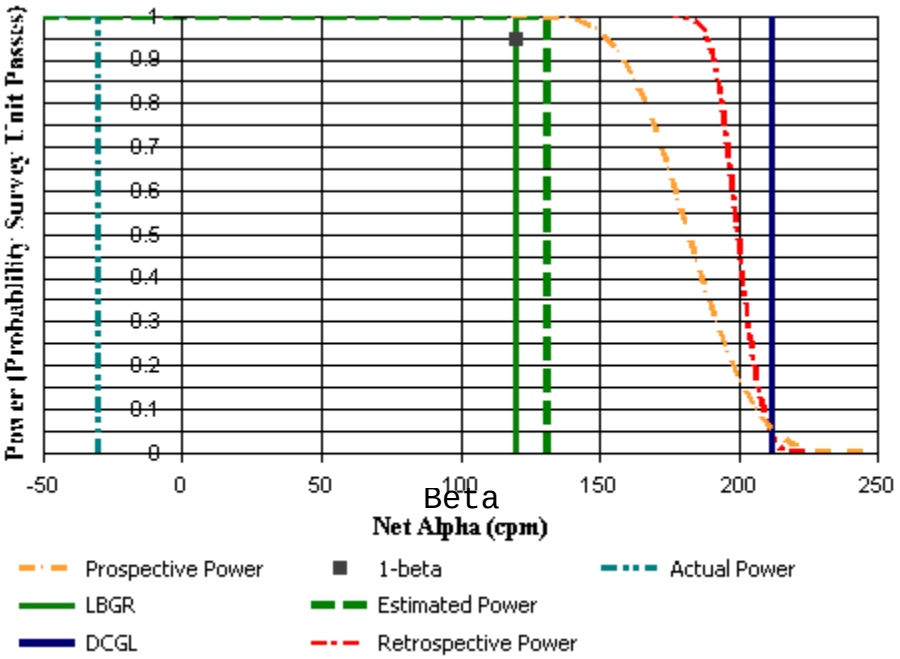
Statistic	Survey Unit	Background	DQO Results
Std Dev (dpm/100 cm²)	130.95	N/A	62.7
High Value (dpm/100 cm²)	234.42	N/A	N/A
Low Value (dpm/100 cm²)	-183.89	N/A	N/A
Sample Number	17	N/A	N=20
Mean (dpm/100 cm²)	38.71	N/A	131
Median (dpm/100 cm²)	95.04	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU81 Building F-734		
Report Number:	1		
Survey Unit Measurements:	25		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
31B	Concrete	S	319
32B	Concrete	S	325
33B	Concrete	S	310
34B	Concrete	S	314
35B	Concrete	S	318
36B	Concrete	S	312
37B	Concrete	S	305
38B	Concrete	S	309
39B	Concrete	S	361
40B	Concrete	S	341
41B	Concrete	S	338
42B	Concrete	S	326
43B	Concrete	S	323
44B	Concrete	S	298
45B	Concrete	S	353
46B	Concrete	S	318
47B	Concrete	S	348
48B	Concrete	S	320
49B	Concrete	S	328
50B	Concrete	S	353
51B	Terra Cotta	S	631
52B	Brick	S	474
53B	Terra Cotta	S	674
54B	Terra Cotta	S	692
55B	Wood	S	265

Basic Statistical Quantities Summary

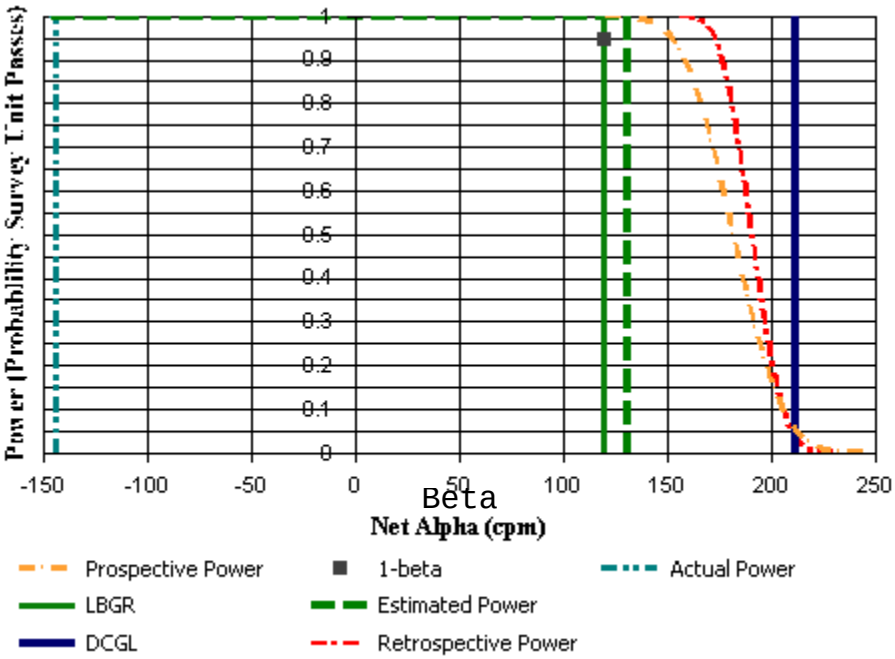
Statistic	Survey Unit	Background	DQO Results
Sample Number	25	N/A	N=19
Mean (dpm/100 cm²)	-19.96	N/A	131
Median (dpm/100 cm²)	-30.05	N/A	N/A
Std Dev (dpm/100 cm²)	50.34	N/A	62.7
High Value (dpm/100 cm²)	135.30	N/A	N/A
Low Value (dpm/100 cm²)	-137.94	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU82 Building F-735		
Report Number:	2		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
76C	Concrete	S	260
77C	Concrete	S	257
78C	Concrete	S	252
79C	Concrete	S	243
80C	Concrete	S	277
81C	Concrete	S	263
82C	Concrete	S	252
83C	Concrete	S	245
84C	Concrete	S	256
85C	Concrete	S	255
86C	Terra Cotta	S	727
87C	Brick	S	361
88C	Wood	S	272
89C	Wood	S	259
90C	Terra Cotta	S	676

Basic Statistical Quantities Summary

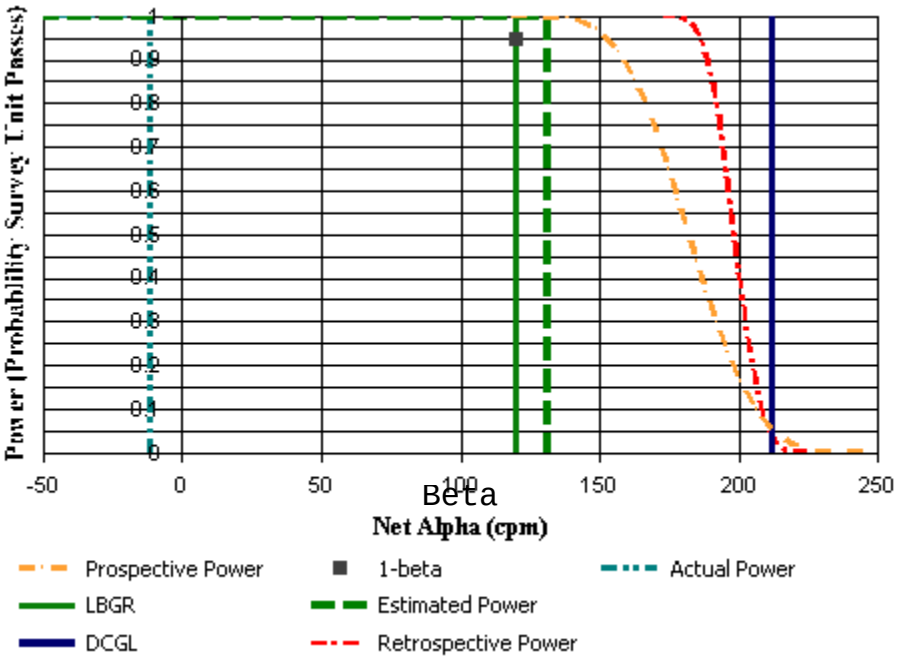
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=19
Mean (dpm/100 cm²)	-111.84	N/A	131
Median (dpm/100 cm²)	-143.42	N/A	N/A
Std Dev (dpm/100 cm²)	64.15	N/A	62.7
High Value (dpm/100 cm²)	43.46	N/A	N/A
Low Value (dpm/100 cm²)	-175.55	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU83 Building F-736		
Report Number:	3		
Survey Unit Measurements:	25		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
31	Concrete	S	303
32	Concrete	S	329
33	Concrete	S	334
34	Concrete	S	331
35	Concrete	S	293
36	Concrete	S	330
37	Concrete	S	327
38	Concrete	S	344
39	Concrete	S	342
40	Concrete	S	294
41	Concrete	S	350
42	Concrete	S	338
43	Concrete	S	323
44	Concrete	S	318
45	Concrete	S	326
46	Concrete	S	330
47	Concrete	S	338
48	Concrete	S	272
49	Concrete	S	284
50	Concrete	S	318
51	Brick	S	432
52	Wood	S	324
53	Brick	S	420
54	Terra Cotta	S	627
55	Wood	S	329

Basic Statistical Quantities Summary

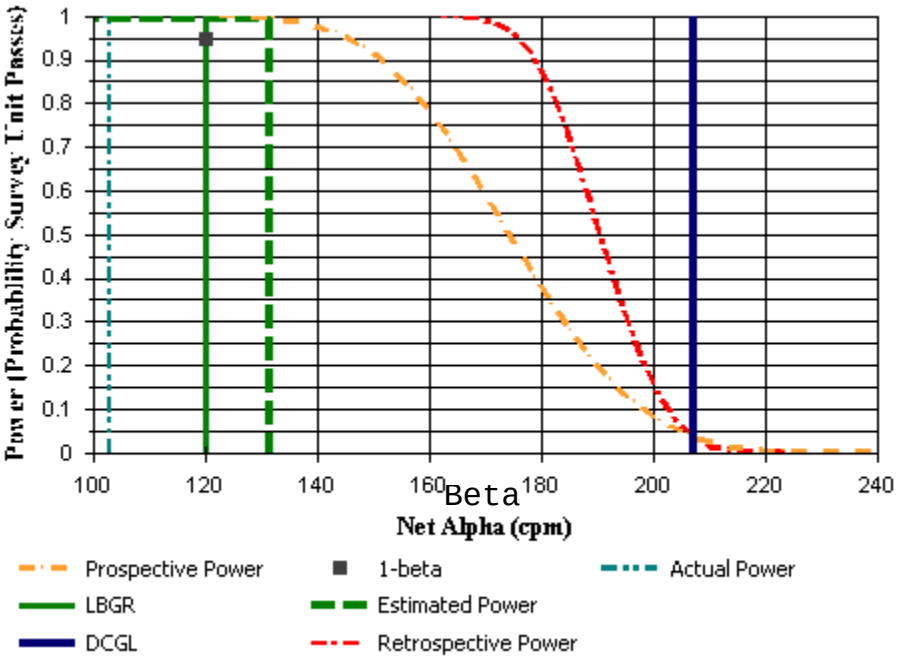
Statistic	Survey Unit	Background	DQO Results
Sample Number	25	N/A	N=19
Mean (dpm/100 cm²)	-18.46	N/A	131
Median (dpm/100 cm²)	-11.15	N/A	N/A
Std Dev (dpm/100 cm²)	55.64	N/A	62.7
High Value (dpm/100 cm²)	79.93	N/A	N/A
Low Value (dpm/100 cm²)	-145.50	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1 C2 SU84 Building G-721		
Report Number:	2		
Survey Unit Measurements:	20		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	332
2	Concrete	S	335
3	Concrete	S	391
4	Concrete	S	373
5	Concrete	S	363
6	Concrete	S	416
7	Concrete	S	373
8	Concrete	S	425
9	Concrete	S	410
10	Concrete	S	421
11	Concrete	S	398
12	Concrete	S	403
13	Concrete	S	387
14	Concrete	S	345
15	Concrete	S	385
16	Concrete	S	382
17	Concrete	S	370
18	Concrete	S	409
19	Concrete	S	433
20	Concrete	S	448

Basic Statistical Quantities Summary

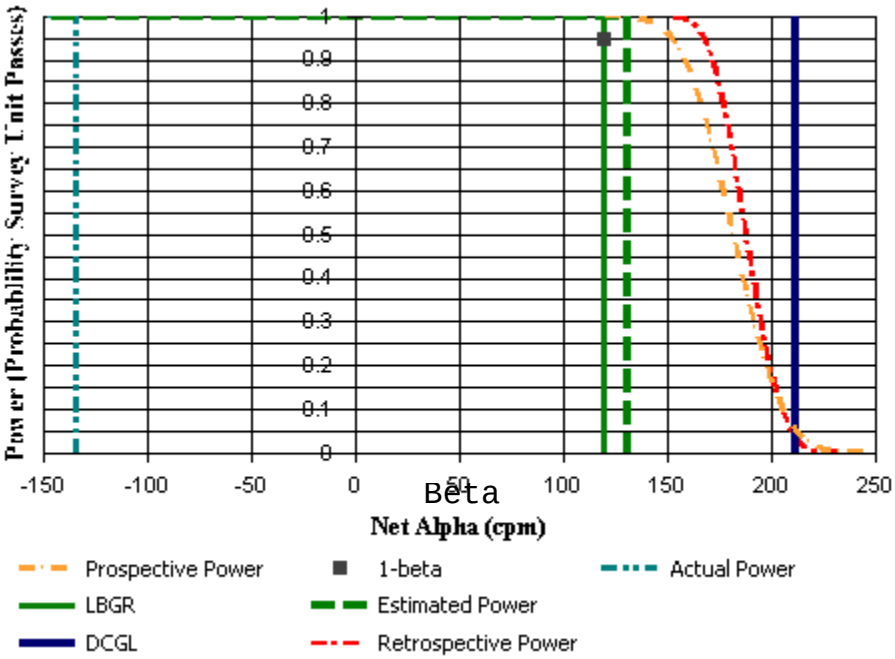
Statistic	Survey Unit	Background	DQO Results
Sample Number	20	N/A	N=20
Mean (dpm/100 cm²)	104.63	N/A	131
Median (dpm/100 cm²)	102.79	N/A	N/A
Std Dev (dpm/100 cm²)	61.68	N/A	62.7
High Value (dpm/100 cm²)	217.00	N/A	N/A
Low Value (dpm/100 cm²)	-7.55	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU85 Building H-711		
Report Number:	4		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
61A	Concrete	S	288
62A	Concrete	S	265
63A	Concrete	S	293
64A	Concrete	S	263
65A	Concrete	S	258
66A	Concrete	S	280
67A	Concrete	S	256
68A	Concrete	S	278
69A	Concrete	S	286
70A	Concrete	S	257
71A	Terra Cotta	S	570
72A	Terra Cotta	S	571
73A	Wood	S	265
74A	Wood	S	278
75A	Terra Cotta	S	569

Basic Statistical Quantities Summary

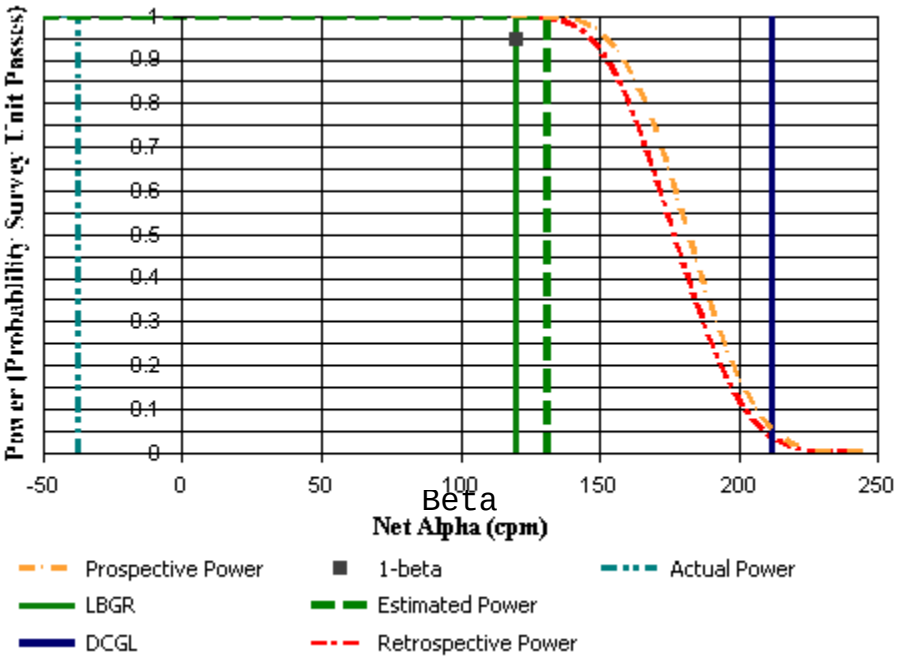
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=19
Mean (dpm/100 cm²)	-134.47	N/A	131
Median (dpm/100 cm²)	-133.98	N/A	N/A
Std Dev (dpm/100 cm²)	72.45	N/A	62.7
High Value (dpm/100 cm²)	-16.44	N/A	N/A
Low Value (dpm/100 cm²)	-255.10	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU86 Building H-712		
Report Number:	5		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
76A	Wood	S	287
77A	Wood	S	272
78A	Wood	S	283
79A	Wood	S	243
80A	Wood	S	281
81A	Wood	S	261
82A	Wood	S	252
83A	Wood	S	239
84A	Wood	S	267
85A	Wood	S	292
86A	Terra Cotta	S	521
87A	Brick	S	437
88A	Terra Cotta	S	655
89A	Terra Cotta	S	581
90A	Brick	S	438

Basic Statistical Quantities Summary

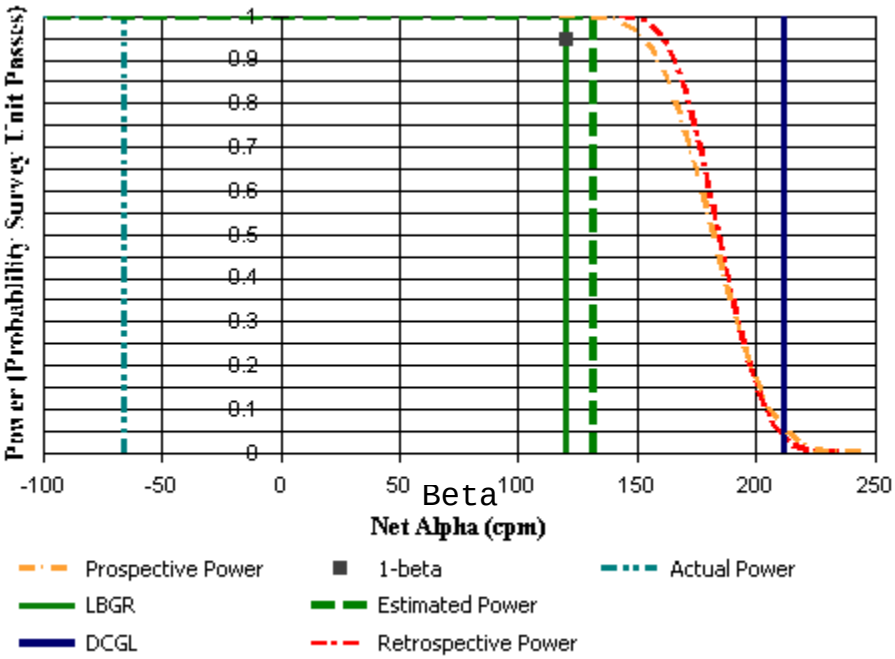
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=19
Mean (dpm/100 cm²)	-59.81	N/A	131
Median (dpm/100 cm²)	-37.23	N/A	N/A
Std Dev (dpm/100 cm²)	107.35	N/A	62.7
High Value (dpm/100 cm²)	67.27	N/A	N/A
Low Value (dpm/100 cm²)	-345.80	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU87 Building H-713		
Report Number:	6		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
91A	Wood	S	266
92A	Wood	S	275
93A	Wood	S	260
94A	Wood	S	238
95A	Wood	S	263
96A	Wood	S	246
97A	Wood	S	247
98A	Wood	S	237
99A	Wood	S	227
100A	Wood	S	252
1B	Brick	S	407
2B	Brick	S	451
3B	Brick	S	462
4B	Terra Cotta	S	627
5B	Terra Cotta	S	587

Basic Statistical Quantities Summary

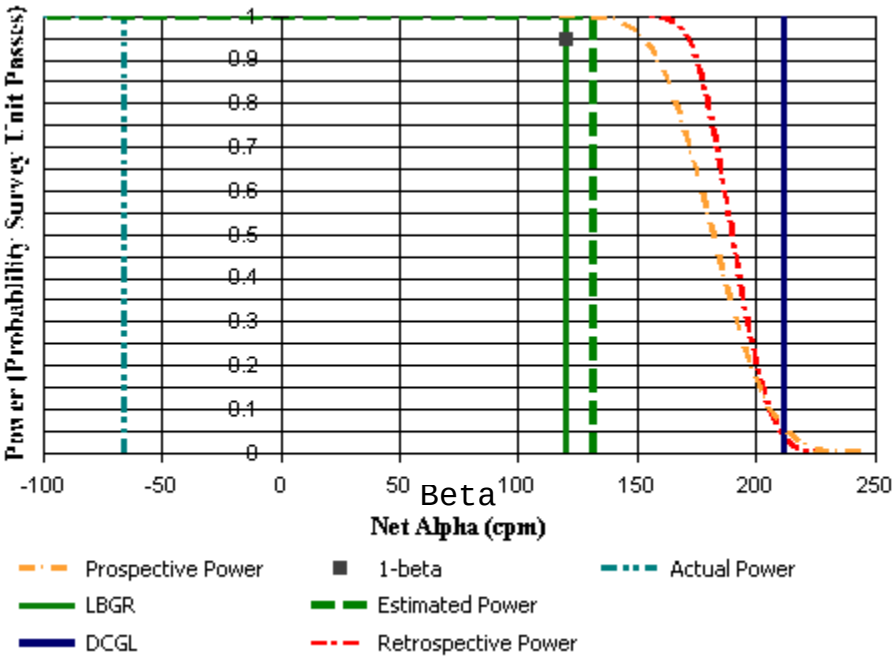
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=19
Mean (dpm/100 cm²)	-55.08	N/A	131
Median (dpm/100 cm²)	-65.57	N/A	N/A
Std Dev (dpm/100 cm²)	83.74	N/A	62.7
High Value (dpm/100 cm²)	112.62	N/A	N/A
Low Value (dpm/100 cm²)	-221.09	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU88 Building H-714		
Report Number:	7		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
6B	Terra Cotta	S	641
7B	Terra Cotta	S	658
8B	Brick	S	451
9B	Brick	S	440
10B	Terra Cotta	S	629
11B	Wood	S	248
12B	Wood	S	287
13B	Wood	S	279
14B	Wood	S	252
15B	Wood	S	217
16B	Wood	S	251
17B	Wood	S	278
18B	Wood	S	266
19B	Wood	S	249
20B	Wood	S	256

Basic Statistical Quantities Summary

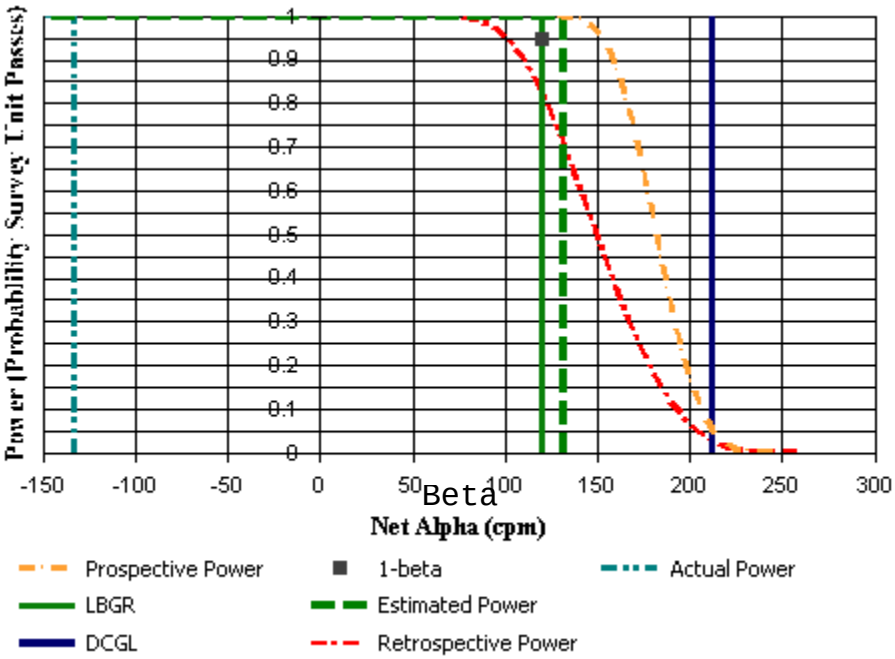
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=19
Mean (dpm/100 cm²)	-48.10	N/A	131
Median (dpm/100 cm²)	-65.57	N/A	N/A
Std Dev (dpm/100 cm²)	66.87	N/A	62.7
High Value (dpm/100 cm²)	91.84	N/A	N/A
Low Value (dpm/100 cm²)	-141.72	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU89 Building H-715		
Report Number:	8		
Survey Unit Measurements:	10		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
21B	Wood	S	196
22B	Brick	S	397
23B	Concrete	S	281
24B	Terra Cotta	S	593
25B	Terra Cotta	S	638
26B	Terra Cotta	S	588
27B	Brick	S	432
28B	Terra Cotta	S	473
29B	Terra Cotta	S	629
30B	Brick	S	404

Basic Statistical Quantities Summary

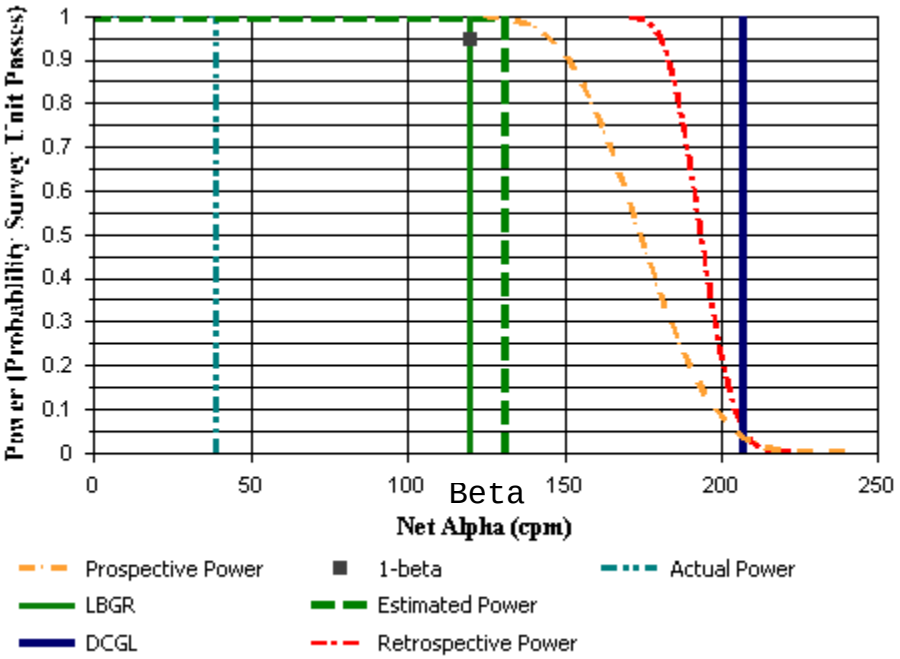
Statistic	Survey Unit	Background	DQO Results
Sample Number	10	N/A	N=19
Mean (dpm/100 cm²)	-135.83	N/A	131
Median (dpm/100 cm²)	-133.22	N/A	N/A
Std Dev (dpm/100 cm²)	140.28	N/A	62.7
High Value (dpm/100 cm²)	55.93	N/A	N/A
Low Value (dpm/100 cm²)	-436.51	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1 C2 SU90a Building 1022 South Floor and lower walls		
Report Number:	3		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1/1A	Concrete	S	381
2/2A	Concrete	S	357
3/3A	Concrete	S	337
4/4A	Concrete	S	393
5/5A	Concrete	S	344
6/6A	Concrete	S	357
7/7A	Concrete	S	316
8/8A	Concrete	S	362
9/9A	Concrete	S	354
10/10A	Concrete	S	355
11/11A	Concrete	S	376
29/29A	Brick	S	461
30/30A	Brick	S	412
31/31A	Brick	S	386

Basic Statistical Quantities Summary

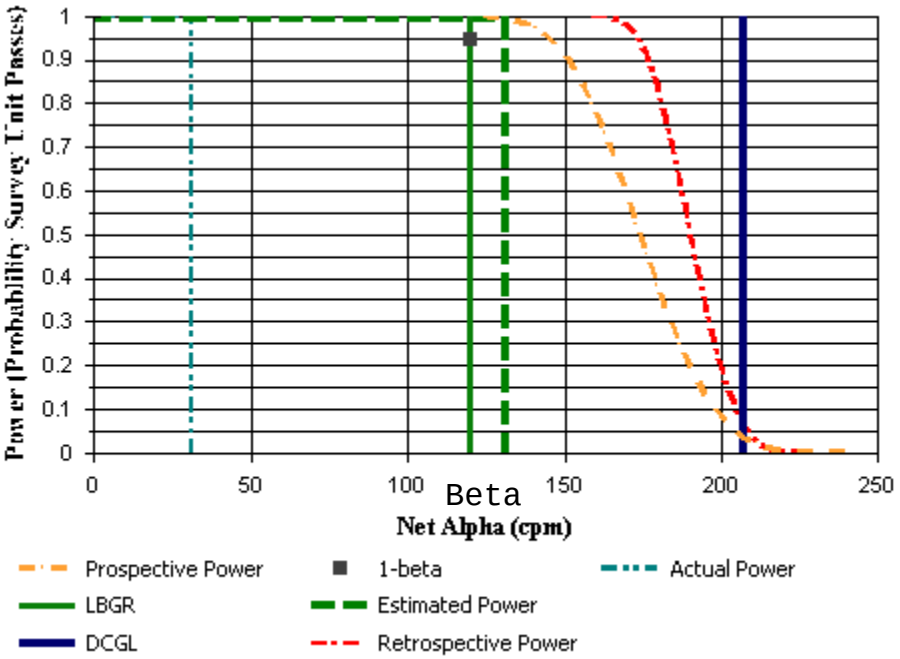
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=20
Mean (dpm/100 cm²)	39.95	N/A	131
Median (dpm/100 cm²)	38.91	N/A	N/A
Std Dev (dpm/100 cm²)	46.38	N/A	62.7
High Value (dpm/100 cm²)	113.43	N/A	N/A
Low Value (dpm/100 cm²)	-38.52	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1 C2 SU90b Building 1022 Center floor and lower walls		
Report Number:	4		
Survey Unit Measurements:	11		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
12/12A	Concrete	S	326
13/13A	Concrete	S	346
14/14A	Concrete	S	353
15/15A	Concrete	S	352
16/16A	Concrete	S	371
17/17A	Concrete	S	352
18/18A	Concrete	S	360
19/19A	Concrete	S	350
20/20A	Concrete	S	351
21/21A	Concrete	S	398
37/6B	Wood	S	235

Basic Statistical Quantities Summary

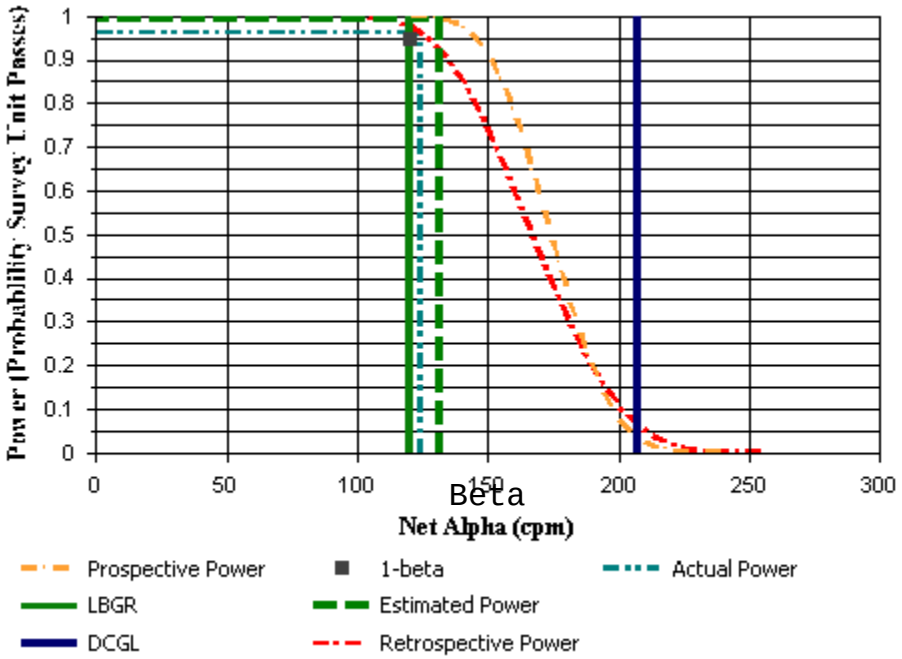
Statistic	Survey Unit	Background	DQO Results
Sample Number	11	N/A	N=20
Mean (dpm/100 cm²)	26.10	N/A	131
Median (dpm/100 cm²)	31.17	N/A	N/A
Std Dev (dpm/100 cm²)	53.99	N/A	62.7
High Value (dpm/100 cm²)	120.21	N/A	N/A
Low Value (dpm/100 cm²)	-100.08	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 1 C2 SU90c Building 1022 North Floor and Lower Walls		
Report Number:	5		
Survey Unit Measurements:	11		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
22/22A	Concrete	S	409
23/23A	Concrete	S	418
24/24A	Concrete	S	360
25/25A	Concrete	S	400
26/26A	Concrete	S	407
27/27A	Concrete	S	429
28/28A	Concrete	S	367
33/2B	Concrete	S	229
34/3B	Wood	S	257
35/4B	Wood	S	242
36/5B	Wood	S	386

Basic Statistical Quantities Summary

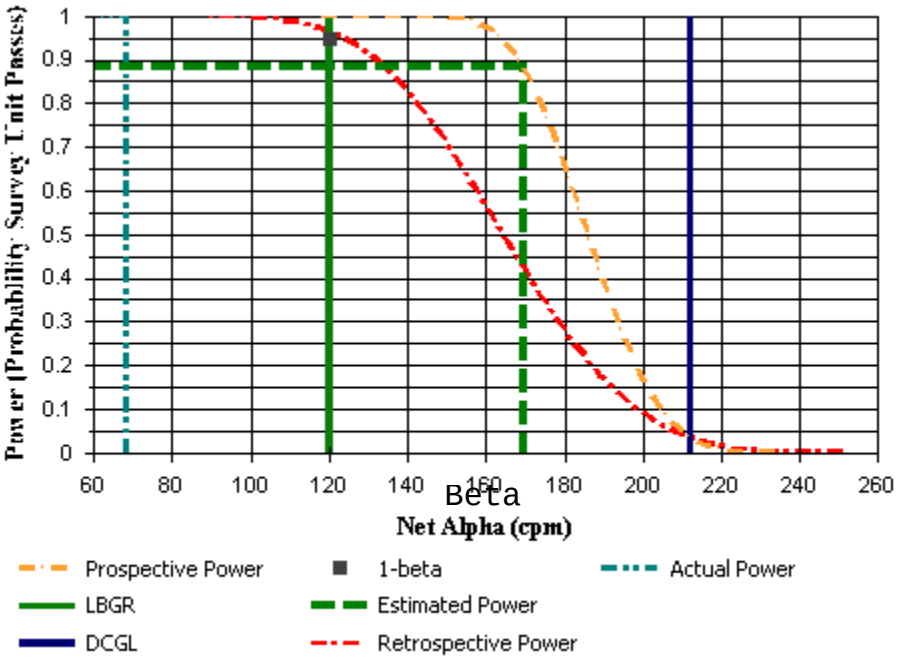
Statistic	Survey Unit	Background	DQO Results
Sample Number	11	N/A	N=20
Mean (dpm/100 cm²)	62.77	N/A	131
Median (dpm/100 cm²)	124.08	N/A	N/A
Std Dev (dpm/100 cm²)	128.50	N/A	62.7
High Value (dpm/100 cm²)	192.22	N/A	N/A
Low Value (dpm/100 cm²)	-206.93	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU91 Building A-922		
Report Number:	1		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	454
2	Concrete	S	375
3	Concrete	S	348
4	Concrete	S	382
5	Concrete	S	423
6	Concrete	S	375
7	Concrete	S	359
8	Concrete	S	351
9	Concrete	S	372
10	Concrete	S	333
11	Terra cotta	S	591
12	Terra cotta	S	510
13	Concrete	S	385
14	Concrete	S	388
15	Concrete	S	330

Basic Statistical Quantities Summary

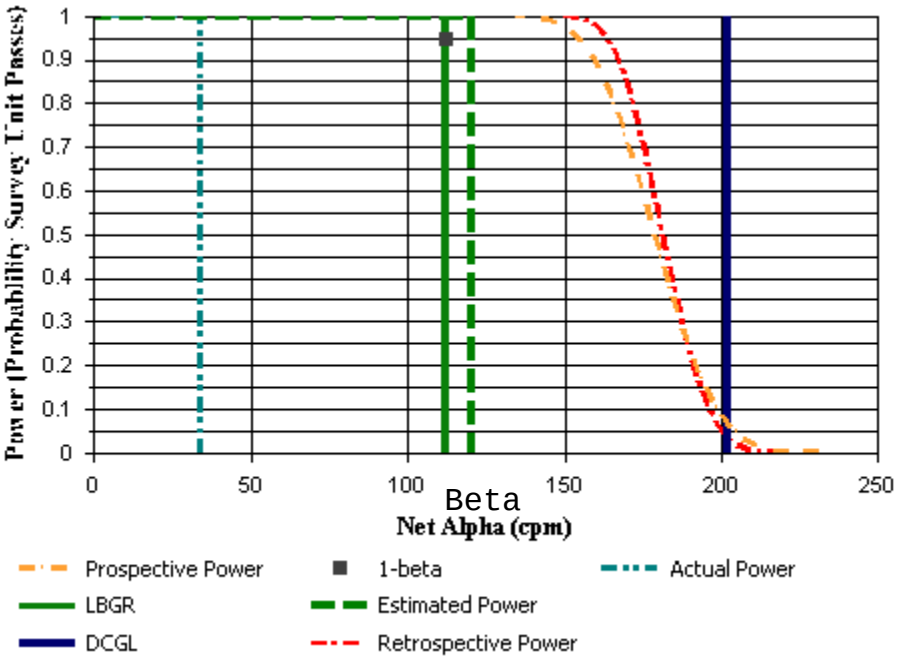
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	25.36	N/A	169
Median (dpm/100 cm²)	68.22	N/A	N/A
Std Dev (dpm/100 cm²)	144.44	N/A	41.9
High Value (dpm/100 cm²)	223.17	N/A	N/A
Low Value (dpm/100 cm²)	-366.59	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU92 Building C-1131		
Report Number:	1		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	297
2	Concrete	S	354
3	Concrete	S	357
4	Concrete	S	353
5	Concrete	S	358
6	Concrete	S	339
7	Concrete	S	377
8	Concrete	S	318
9	Concrete	S	353
10	Concrete	S	380
11	Concrete	S	305
12	Concrete	S	316
13	Concrete	S	368
14	Concrete	S	422
15	Concrete	S	315

Basic Statistical Quantities Summary

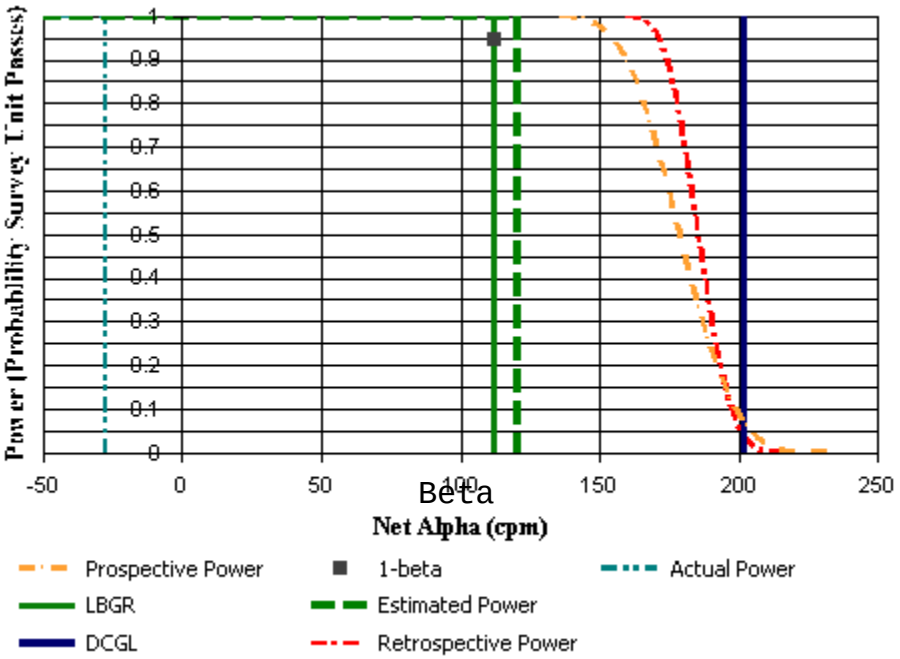
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	22.95	N/A	120
Median (dpm/100 cm²)	33.93	N/A	N/A
Std Dev (dpm/100 cm²)	66.12	N/A	47.7
High Value (dpm/100 cm²)	170.83	N/A	N/A
Low Value (dpm/100 cm²)	-77.18	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU93 Building C-1132		
Report Number:	3		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	287
2	Concrete	S	366
3	Concrete	S	329
4	Concrete	S	367
5	Concrete	S	367
6	Concrete	S	294
7	Concrete	S	322
8	Concrete	S	320
9	Concrete	S	318
10	Concrete	S	310
11	Concrete	S	309
12	Concrete	S	362
13	Concrete	S	341
14	Concrete	S	315
15	Concrete	S	348

Basic Statistical Quantities Summary

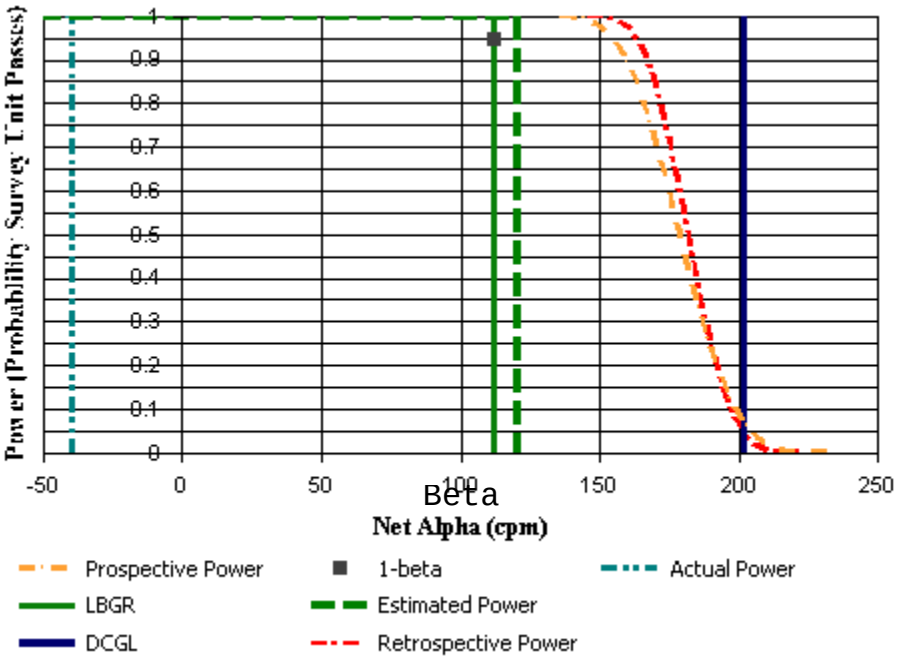
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	-11.04	N/A	120
Median (dpm/100 cm²)	-27.58	N/A	N/A
Std Dev (dpm/100 cm²)	53.08	N/A	47.7
High Value (dpm/100 cm²)	61.71	N/A	N/A
Low Value (dpm/100 cm²)	-97.02	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU94 Building C-1133		
Report Number:	4		
Survey Unit Measurements:	17		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	347
2	Concrete	S	375
3	Concrete	S	412
4	Concrete	S	360
5	Concrete	S	312
6	Concrete	S	336
7	Concrete	S	365
8	Concrete	S	353
9	Concrete	S	278
10	Concrete	S	356
11	Concrete	S	297
12	Concrete	S	293
13	Concrete	S	295
14	Concrete	S	316
15	Concrete	S	310
16	Concrete	S	308
17	Concrete	S	282

Basic Statistical Quantities Summary

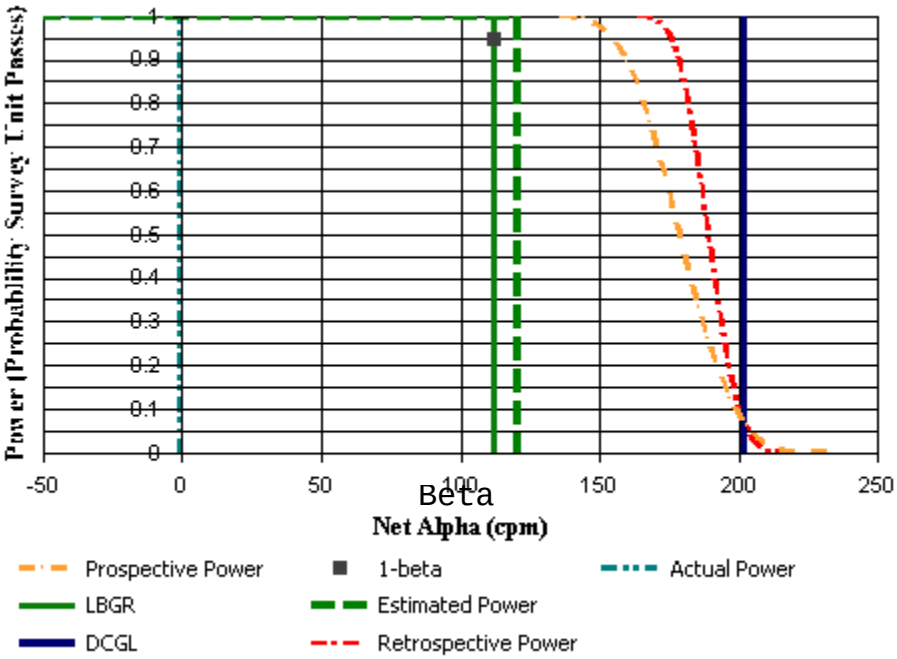
Statistic	Survey Unit	Background	DQO Results
Sample Number	17	N/A	N=16
Mean (dpm/100 cm²)	-13.46	N/A	120
Median (dpm/100 cm²)	-39.48	N/A	N/A
Std Dev (dpm/100 cm²)	74.38	N/A	47.7
High Value (dpm/100 cm²)	150.99	N/A	N/A
Low Value (dpm/100 cm²)	-114.88	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU 95 Building C-1134		
Report Number:	5		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	365
2	Concrete	S	331
3	Concrete	S	334
4	Concrete	S	330
5	Concrete	S	307
6	Concrete	S	370
7	Concrete	S	307
8	Concrete	S	298
9	Concrete	S	387
10	Concrete	S	318
11	Concrete	S	355
12	Concrete	S	373
13	Concrete	S	345
14	Concrete	S	367
15	Concrete	S	337
16	Concrete	S	325

Basic Statistical Quantities Summary

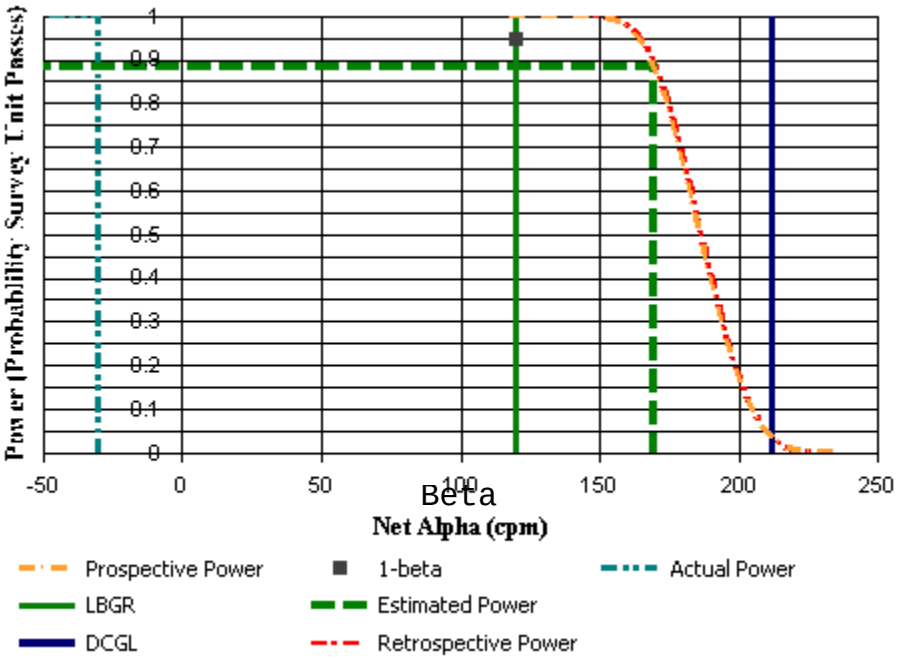
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	9.25	N/A	120
Median (dpm/100 cm²)	-0.79	N/A	N/A
Std Dev (dpm/100 cm²)	52.93	N/A	47.7
High Value (dpm/100 cm²)	101.39	N/A	N/A
Low Value (dpm/100 cm²)	-75.20	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU96 Building D-1121		
Report Number:	2		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	296
2	Concrete	S	267
3	Concrete	S	266
4	Concrete	S	322
5	Concrete	S	287
6	Concrete	S	299
7	Concrete	S	344
8	Concrete	S	309
9	Concrete	S	370
10	Concrete	S	320
11	Brick	S	367
12	Brick	S	405
13	Brick	S	412
14	Brick	S	491
15	Brick	S	406

Basic Statistical Quantities Summary

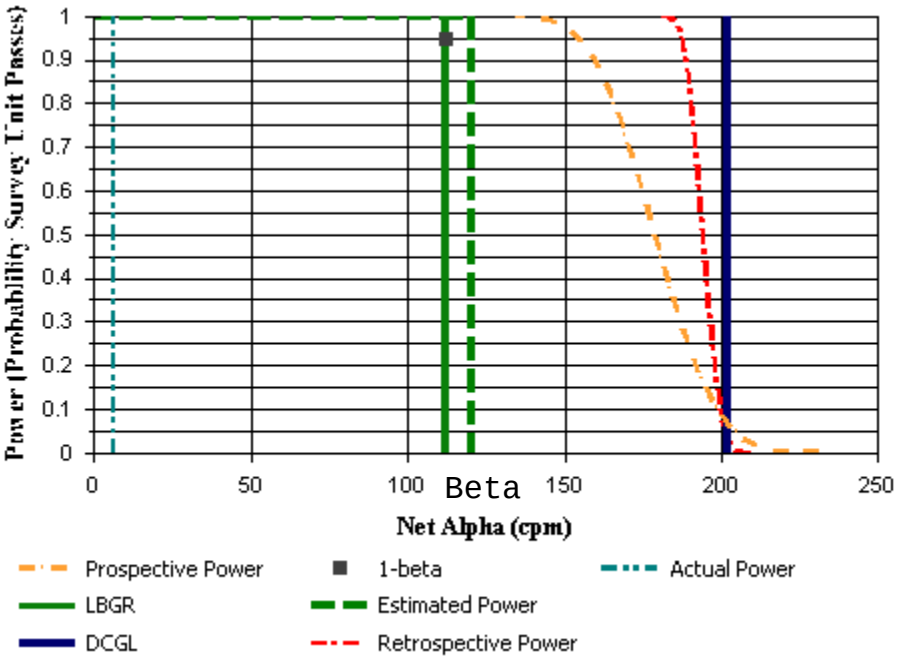
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-26.46	N/A	169
Median (dpm/100 cm²)	-30.05	N/A	N/A
Std Dev (dpm/100 cm²)	77.67	N/A	41.9
High Value (dpm/100 cm²)	167.42	N/A	N/A
Low Value (dpm/100 cm²)	-132.09	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU97 Building D-1122		
Report Number:	6		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	345
2	Concrete	S	363
3	Concrete	S	352
4	Concrete	S	337
5	Concrete	S	339
6	Concrete	S	357
7	Concrete	S	337
8	Concrete	S	335
9	Concrete	S	347
10	Concrete	S	331
11	Concrete	S	320
12	Concrete	S	367
13	Concrete	S	347
14	Concrete	S	339
15	Concrete	S	331

Basic Statistical Quantities Summary

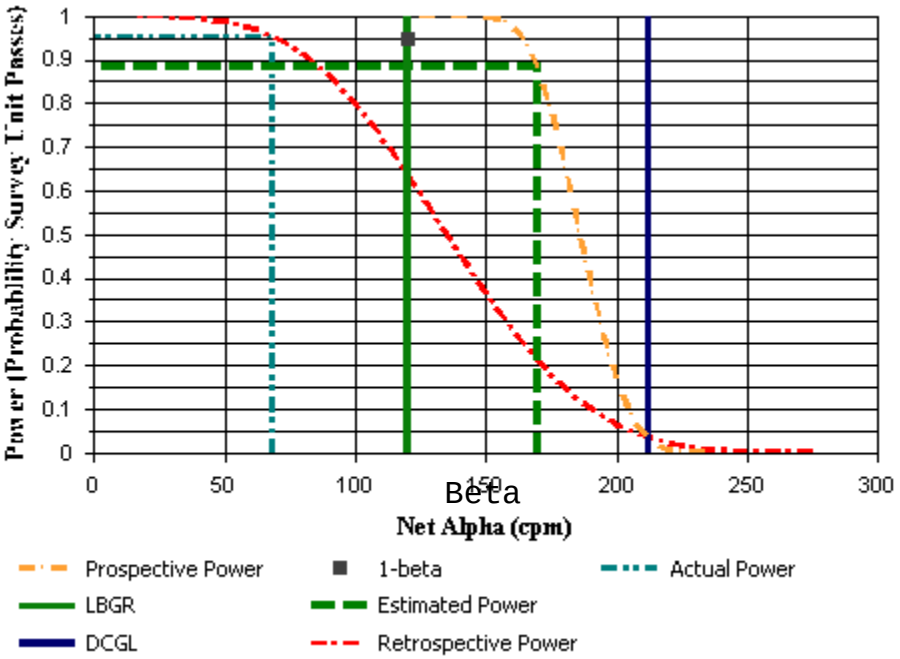
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	14.35	N/A	120
Median (dpm/100 cm²)	6.15	N/A	N/A
Std Dev (dpm/100 cm²)	25.29	N/A	47.7
High Value (dpm/100 cm²)	61.71	N/A	N/A
Low Value (dpm/100 cm²)	-31.55	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU98 Building D-1123		
Report Number:	3		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	305
2	Concrete	S	372
3	Concrete	S	414
4	Concrete	S	383
5	Concrete	S	341
6	Concrete	S	410
7	Concrete	S	377
8	Concrete	S	350
9	Concrete	S	342
10	Concrete	S	318
11	Brick	S	469
12	Wood	S	340
13	Brick	S	454
14	Brick	S	307
15	Terra Cotta	S	283

Basic Statistical Quantities Summary

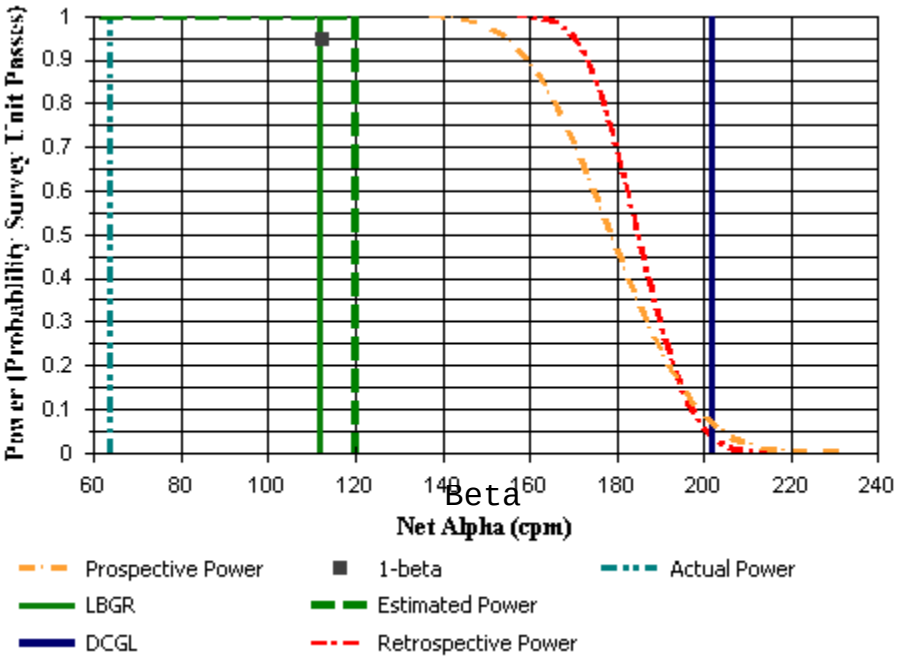
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-11.58	N/A	169
Median (dpm/100 cm²)	68.22	N/A	N/A
Std Dev (dpm/100 cm²)	233.66	N/A	41.9
High Value (dpm/100 cm²)	147.58	N/A	N/A
Low Value (dpm/100 cm²)	-795.54	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU99 Building D-1124		
Report Number:	7		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	333
2	Concrete	S	370
3	Concrete	S	348
4	Concrete	S	385
5	Concrete	S	351
6	Concrete	S	349
7	Concrete	S	410
8	Concrete	S	385
9	Concrete	S	389
10	Concrete	S	310
11	Concrete	S	318
12	Concrete	S	378
13	Concrete	S	352
14	Concrete	S	373
15	Concrete	S	368

Basic Statistical Quantities Summary

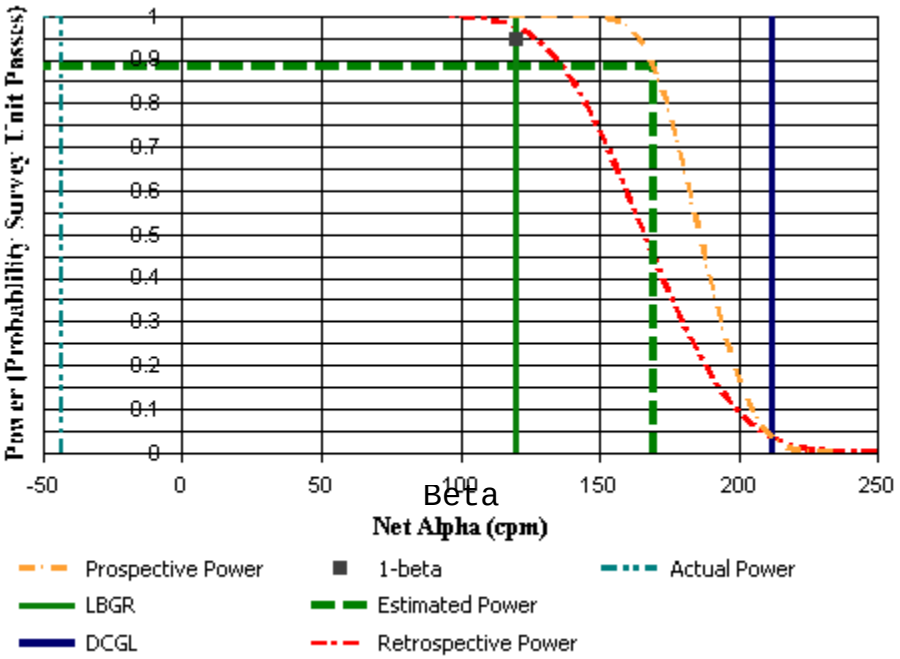
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	50.33	N/A	120
Median (dpm/100 cm²)	63.69	N/A	N/A
Std Dev (dpm/100 cm²)	54.67	N/A	47.7
High Value (dpm/100 cm²)	147.02	N/A	N/A
Low Value (dpm/100 cm²)	-51.39	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU100 Building D-1125		
Report Number:	5		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Gross ~~Alpha~~ Beta (cpm)
1	Concrete	S	359
2	Concrete	S	310
3	Concrete	S	290
4	Concrete	S	255
5	Concrete	S	232
6	Concrete	S	214
7	Concrete	S	526
8	Concrete	S	311
9	Concrete	S	365
10	Concrete	S	296
11	Concrete	S	313
12	Concrete	S	353
13	Concrete	S	322
14	Concrete	S	346
15	Concrete	S	385

Basic Statistical Quantities Summary

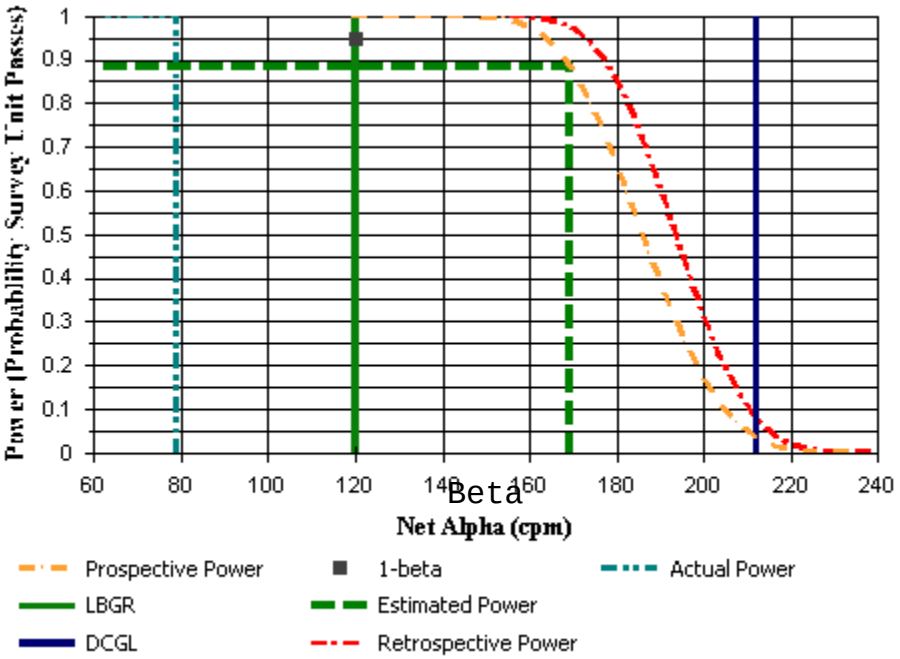
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-20.35	N/A	169
Median (dpm/100 cm²)	-43.27	N/A	N/A
Std Dev (dpm/100 cm²)	139.68	N/A	41.9
High Value (dpm/100 cm²)	359.22	N/A	N/A
Low Value (dpm/100 cm²)	-230.35	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU101 Building E-1111		
Report Number:	4		
Survey Unit Measurements:	18		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	396
2	Concrete	S	410
3	Concrete	S	383
4	Concrete	S	333
5	Concrete	S	354
6	Concrete	S	358
7	Concrete	S	327
8	Concrete	S	329
9	Concrete	S	346
10	Concrete	S	404
11	Concrete	S	400
12	Concrete	S	398
13	Concrete	S	408
14	Concrete	S	411
15	Concrete	S	440
16	Brick	S	439
17	Brick	S	396
18	Concrete	S	267

Basic Statistical Quantities Summary

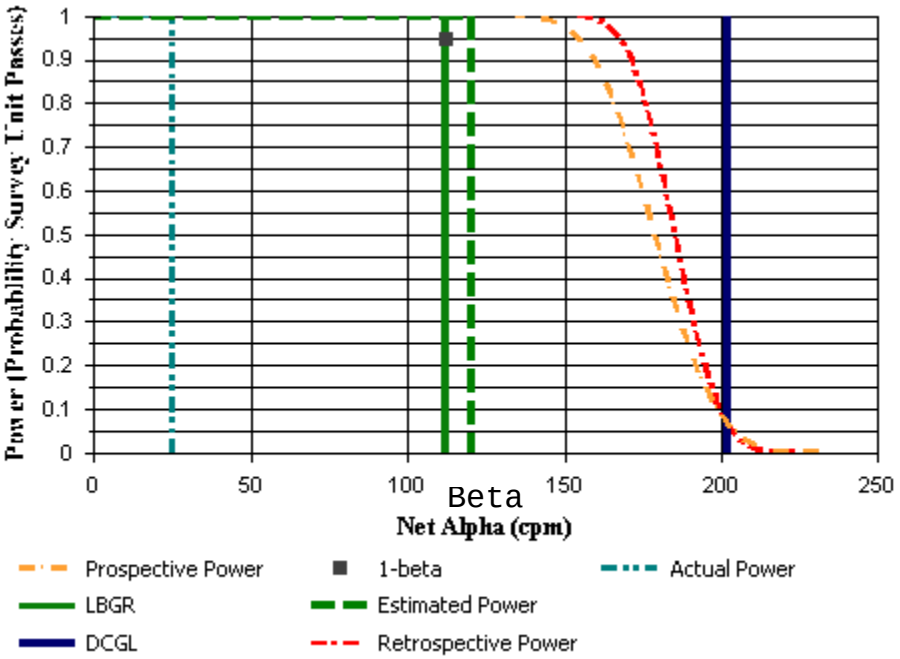
Statistic	Survey Unit	Background	DQO Results
Sample Number	18	N/A	N=15
Mean (dpm/100 cm²)	65.07	N/A	169
Median (dpm/100 cm²)	79.08	N/A	N/A
Std Dev (dpm/100 cm²)	81.26	N/A	41.9
High Value (dpm/100 cm²)	196.71	N/A	N/A
Low Value (dpm/100 cm²)	-130.20	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU102 Building E-1112		
Report Number:	12		
Survey Unit Measurements:	16		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	351
2	Concrete	S	311
3	Concrete	S	335
4	Concrete	S	328
5	Concrete	S	346
6	Concrete	S	338
7	Concrete	S	362
8	Concrete	S	325
9	Concrete	S	380
10	Concrete	S	373
11	Concrete	S	343
12	Concrete	S	351
13	Concrete	S	374
14	Concrete	S	336
15	Concrete	S	353
16	Concrete	S	463

Basic Statistical Quantities Summary

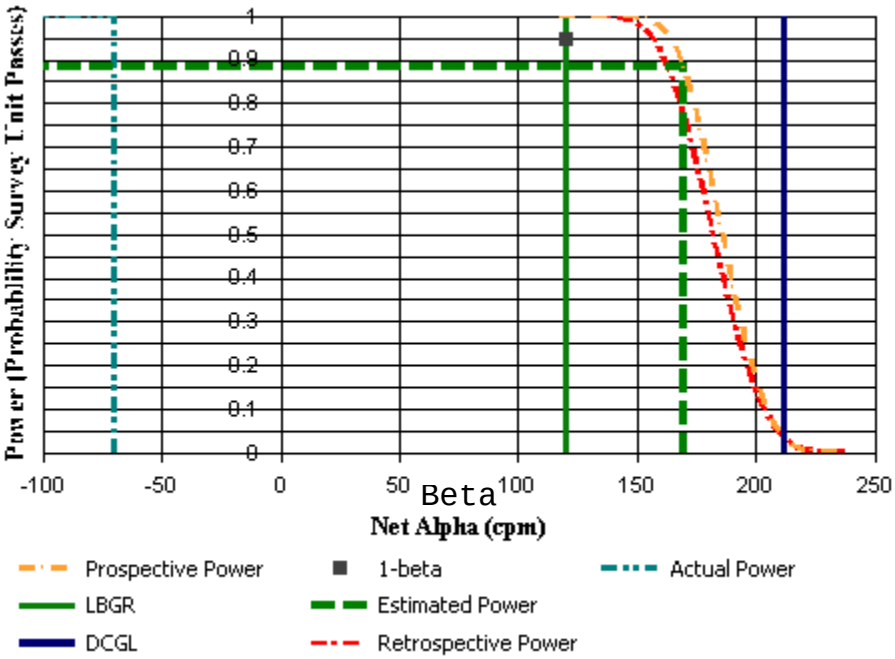
Statistic	Survey Unit	Background	DQO Results
Sample Number	16	N/A	N=16
Mean (dpm/100 cm²)	36.53	N/A	120
Median (dpm/100 cm²)	25.00	N/A	N/A
Std Dev (dpm/100 cm²)	68.52	N/A	47.7
High Value (dpm/100 cm²)	252.18	N/A	N/A
Low Value (dpm/100 cm²)	-49.40	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU103 Building E-1113		
Report Number:	6		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Gross ~~Alpha~~ Beta (cpm)
16	Concrete	S	349
17	Concrete	S	289
18	Concrete	S	321
19	Concrete	S	299
20	Concrete	S	282
21	Concrete	S	268
22	Concrete	S	234
23	Concrete	S	287
24	Concrete	S	285
25	Concrete	S	306
26	Wood	S	304
27	Brick	S	426
28	Brick	S	501
29	Wood	S	233
30	Concrete	S	329

Basic Statistical Quantities Summary

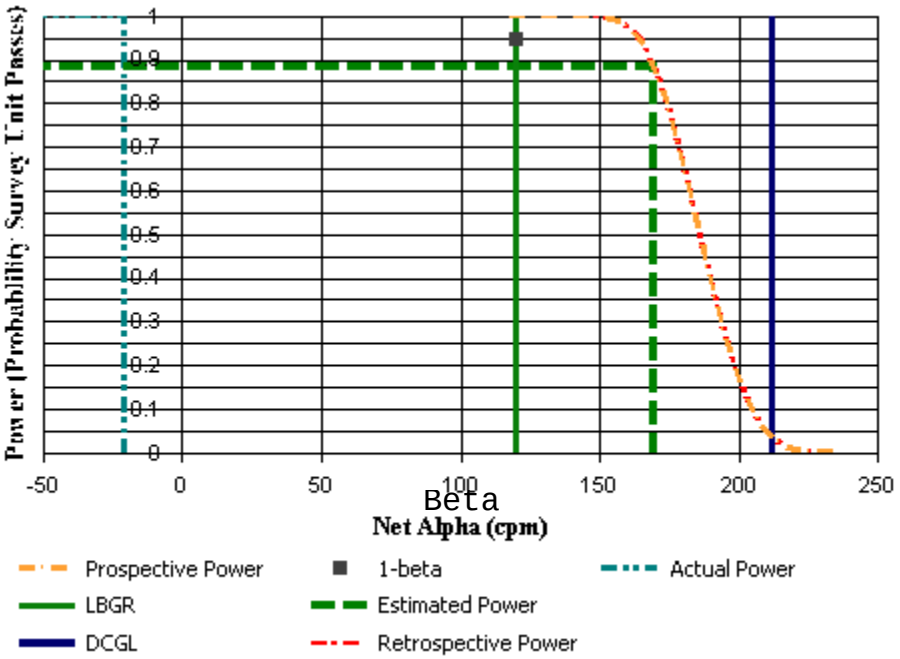
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-45.36	N/A	169
Median (dpm/100 cm²)	-69.73	N/A	N/A
Std Dev (dpm/100 cm²)	91.18	N/A	41.9
High Value (dpm/100 cm²)	186.32	N/A	N/A
Low Value (dpm/100 cm²)	-192.55	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU104 Building E-1114		
Report Number:	8		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
16A	Concrete	S	325
17A	Concrete	S	305
18A	Concrete	S	351
19A	Concrete	S	347
20A	Concrete	S	303
21A	Concrete	S	361
22A	Concrete	S	323
23A	Concrete	S	352
24A	Concrete	S	331
25A	Concrete	S	325
26A	Brick	S	430
27A	Terra Cotta	S	574
28A	Brick	S	420
29A	Terra Cotta	S	677
30A	Terra Cotta	S	632

Basic Statistical Quantities Summary

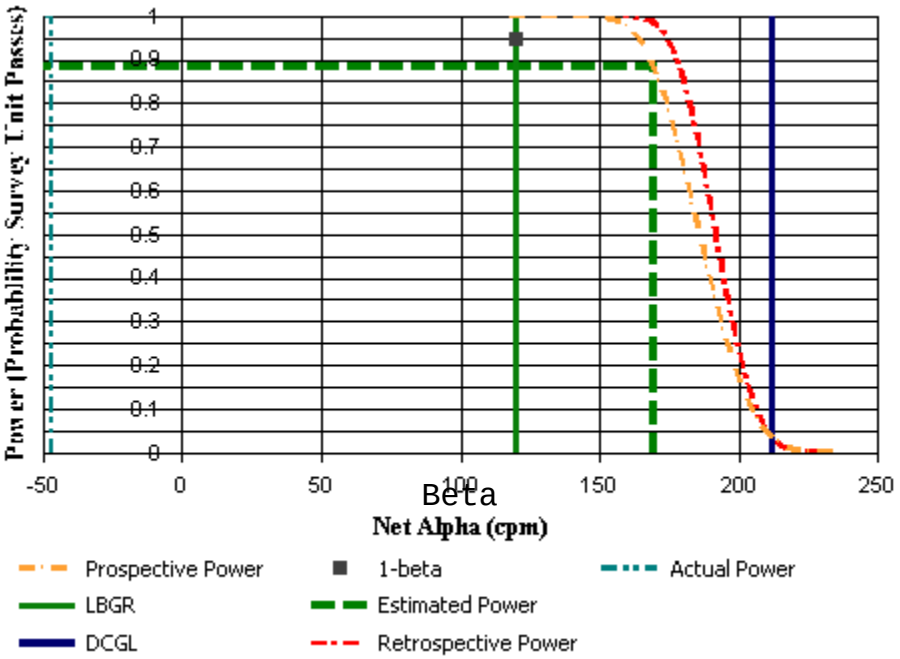
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-27.69	N/A	169
Median (dpm/100 cm²)	-20.60	N/A	N/A
Std Dev (dpm/100 cm²)	78.84	N/A	41.9
High Value (dpm/100 cm²)	52.15	N/A	N/A
Low Value (dpm/100 cm²)	-245.65	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU105 Building E-1115		
Report Number:	9		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
31A	Concrete	S	282
32A	Concrete	S	291
33A	Concrete	S	318
34A	Concrete	S	325
35A	Concrete	S	285
36A	Concrete	S	290
37A	Concrete	S	328
38A	Concrete	S	311
39A	Concrete	S	323
40A	Concrete	S	320
41A	Terra Cotta	S	643
42A	Brick	S	441
43A	Terra Cotta	S	636
44A	Brick	S	411
45A	Terra Cotta	S	615

Basic Statistical Quantities Summary

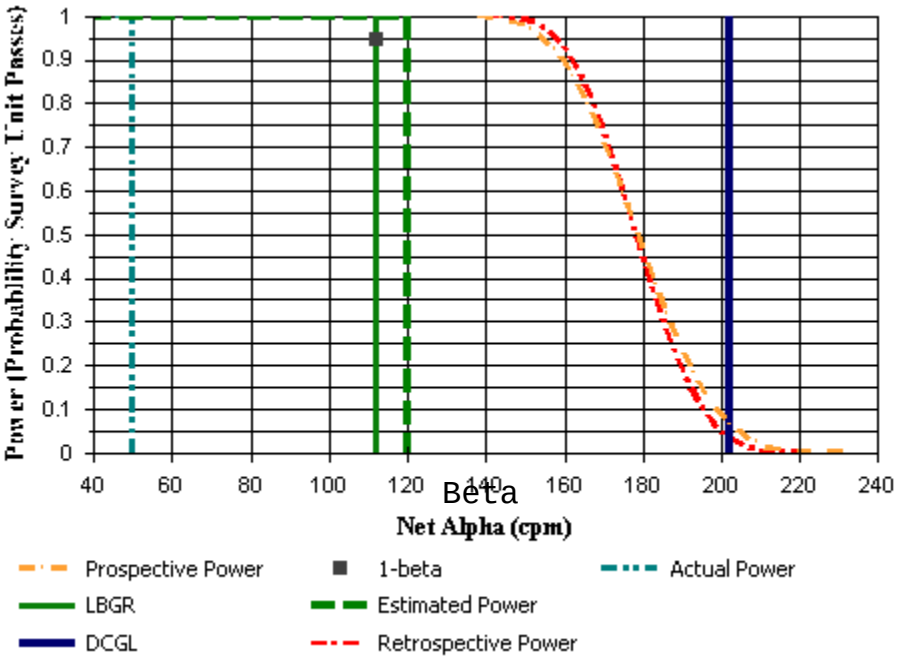
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-57.55	N/A	169
Median (dpm/100 cm²)	-47.05	N/A	N/A
Std Dev (dpm/100 cm²)	62.01	N/A	41.9
High Value (dpm/100 cm²)	72.94	N/A	N/A
Low Value (dpm/100 cm²)	-168.18	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU106 Building E-1116		
Report Number:	9		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	361
2	Concrete	S	349
3	Concrete	S	335
4	Concrete	S	343
5	Concrete	S	380
6	Concrete	S	318
7	Concrete	S	403
8	Concrete	S	365
9	Concrete	S	387
10	Concrete	S	441
11	Concrete	S	438
12	Concrete	S	350
13	Concrete	S	329
14	Concrete	S	347
15	Concrete	S	409

Basic Statistical Quantities Summary

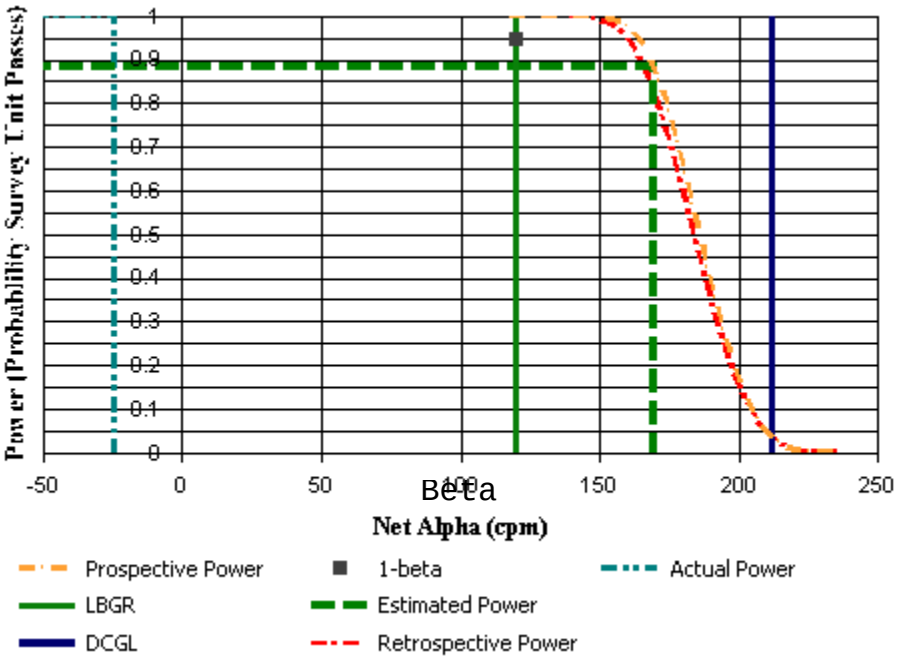
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	68.32	N/A	120
Median (dpm/100 cm²)	49.80	N/A	N/A
Std Dev (dpm/100 cm²)	75.88	N/A	47.7
High Value (dpm/100 cm²)	208.53	N/A	N/A
Low Value (dpm/100 cm²)	-35.52	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU107 Building F-732		
Report Number:	7		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Gross ~~Alpha~~ Beta (cpm)
61C	Concrete	S	271
62C	Concrete	S	293
63C	Concrete	S	310
64C	Concrete	S	307
65C	Concrete	S	324
66C	Concrete	S	323
67C	Concrete	S	345
68C	Concrete	S	330
69C	Concrete	S	312
70C	Concrete	S	330
71C	Terra cotta	S	578
72C	Wood	S	251
73C	Brick	S	440
74C	Concrete	S	394
75C	Wood	S	331

Basic Statistical Quantities Summary

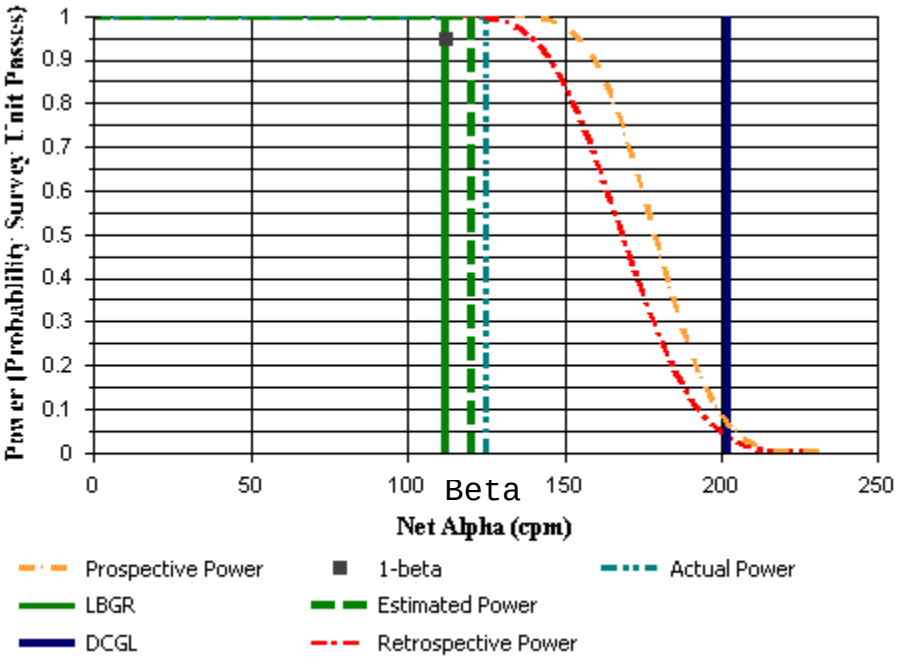
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-29.69	N/A	169
Median (dpm/100 cm²)	-24.38	N/A	N/A
Std Dev (dpm/100 cm²)	85.69	N/A	41.9
High Value (dpm/100 cm²)	109.79	N/A	N/A
Low Value (dpm/100 cm²)	-238.10	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU108 Building F-733		
Report Number:	11		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	488
2	Concrete	S	400
3	Concrete	S	413
4	Concrete	S	323
5	Concrete	S	422
6	Concrete	S	401
7	Concrete	S	399
8	Concrete	S	419
9	Concrete	S	338
10	Concrete	S	380
11	Concrete	S	319
12	Concrete	S	279
13	Concrete	S	317
14	Concrete	S	354
15	Concrete	S	401

Basic Statistical Quantities Summary

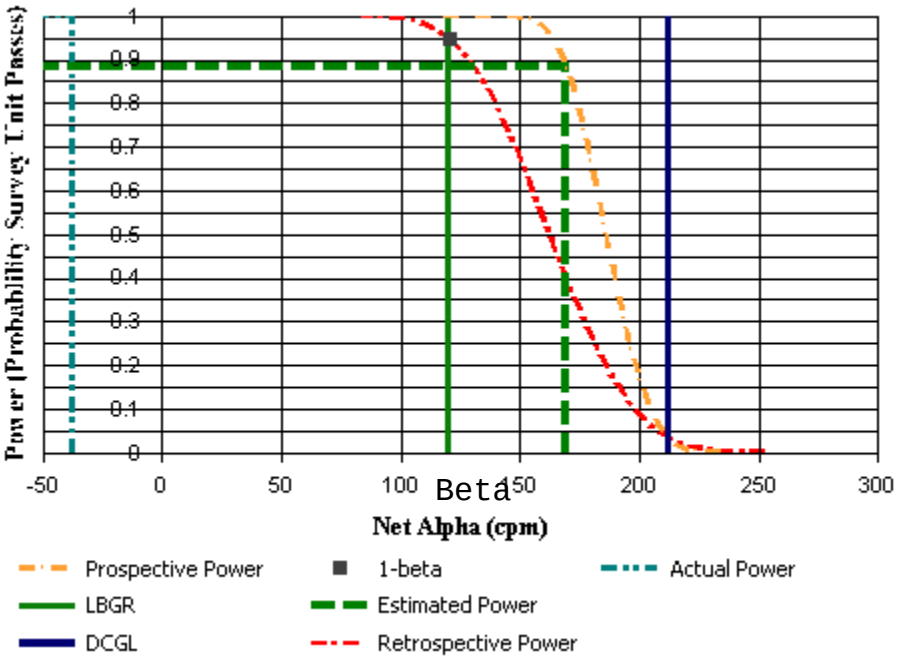
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	81.28	N/A	120
Median (dpm/100 cm²)	125.20	N/A	N/A
Std Dev (dpm/100 cm²)	107.52	N/A	47.7
High Value (dpm/100 cm²)	301.79	N/A	N/A
Low Value (dpm/100 cm²)	-112.90	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU109 Building G-722		
Report Number:	10		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Pass
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)	
86B	Concrete	S	298	
87B	Concrete	S	316	
88B	Concrete	S	301	
89B	Concrete	S	324	
90B	Concrete	S	284	
91B	Concrete	S	317	
92B	Concrete	S	279	
93B	Concrete	S	311	
94B	Concrete	S	278	
95B	Concrete	S	297	
96B	Brick	S	424	
97B	Brick	S	449	
98B	Brick	S	453	
99B	Wood /Metal	S	531	Judgmental location,
100B	Brick	S	504	investigated, Rn progeny

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	13.95	N/A	169
Median (dpm/100 cm²)	-37.60	N/A	N/A
Std Dev (dpm/100 cm²)	150.96	N/A	41.9
High Value (dpm/100 cm²)	461.64	N/A	N/A
Low Value (dpm/100 cm²)	-109.41	N/A	N/A

DQA Building Surface Report

Statistical Test Summary

S+:	14
Critical Value:	11
Result:	Pass

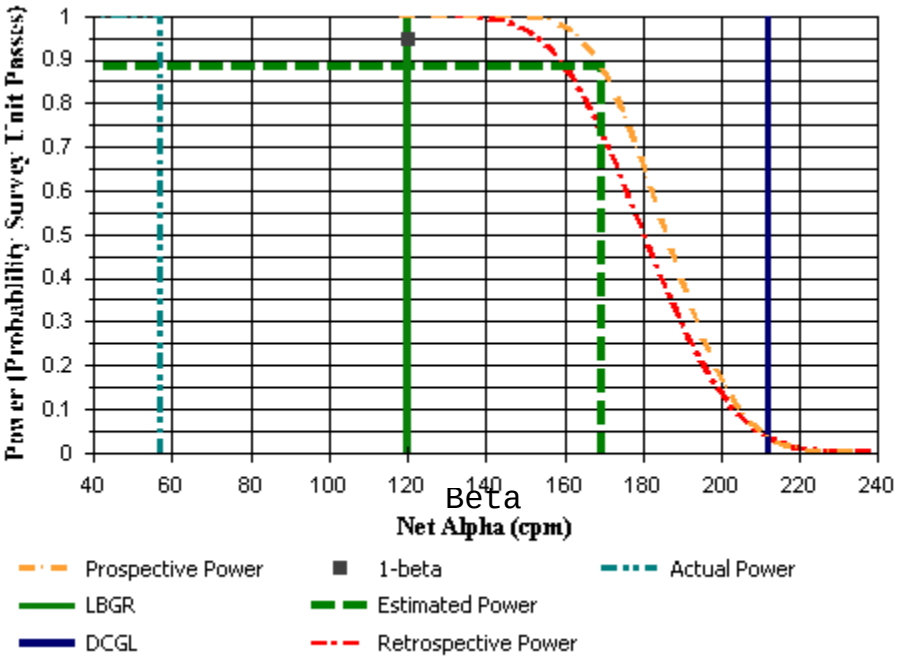
Data	DCGLw - Data	Sign
-37.9	249.90	+
-19.9	231.90	+
-34.9	246.90	+
-11.9	223.90	+
-51.9	263.90	+
-18.9	230.90	+
-56.9	268.90	+
-24.9	236.90	+
-57.9	269.90	+
-38.9	250.90	+
21.6	190.40	+
46.6	165.40	+
50.6	161.40	+
244.3	-32.30	-
101.6	110.40	+

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU110 Building G-724		
Report Number:	11		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
71B	Concrete	S	366
72B	Concrete	S	348
73B	Concrete	S	401
74B	Concrete	S	361
75B	Concrete	S	393
76B	Concrete	S	315
77B	Concrete	S	336
78B	Concrete	S	373
79B	Concrete	S	372
80B	Concrete	S	337
81B	Brick	S	300
82B	Brick	S	445
83B	Brick	S	475
84B	Brick	S	382
85B	Brick	S	523

Basic Statistical Quantities Summary

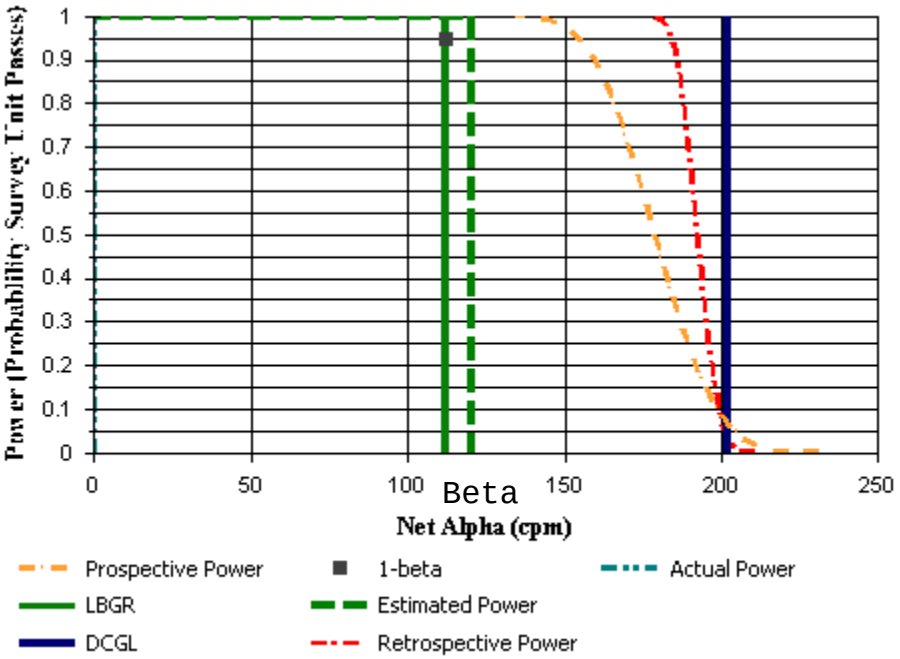
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	44.85	N/A	169
Median (dpm/100 cm²)	56.88	N/A	N/A
Std Dev (dpm/100 cm²)	96.33	N/A	41.9
High Value (dpm/100 cm²)	227.89	N/A	N/A
Low Value (dpm/100 cm²)	-193.50	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU111 Building G-725		
Report Number:	13		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	319
2	Concrete	S	321
3	Concrete	S	353
4	Concrete	S	339
5	Concrete	S	343
6	Concrete	S	326
7	Concrete	S	340
8	Concrete	S	326
9	Concrete	S	349
10	Concrete	S	333
11	Concrete	S	347
12	Concrete	S	329
13	Concrete	S	336
14	Concrete	S	378
15	Concrete	S	321

Basic Statistical Quantities Summary

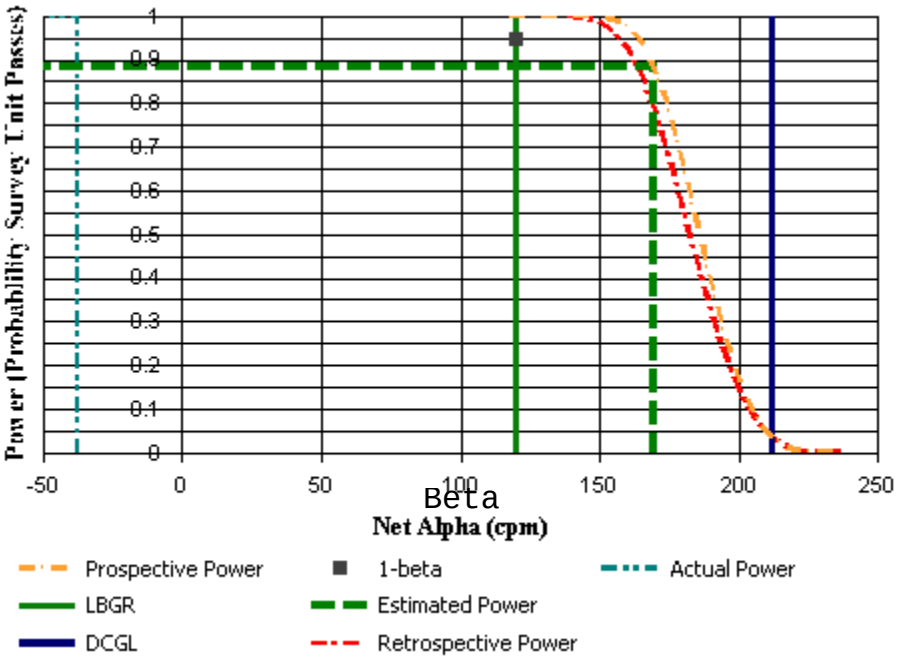
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	2.84	N/A	120
Median (dpm/100 cm²)	0.20	N/A	N/A
Std Dev (dpm/100 cm²)	30.86	N/A	47.7
High Value (dpm/100 cm²)	83.53	N/A	N/A
Low Value (dpm/100 cm²)	-33.53	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU112 Building G-726		
Report Number:	12		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
56B	Concrete	S	379
57B	Concrete	S	309
58B	Concrete	S	333
59B	Concrete	S	304
60B	Concrete	S	342
61B	Concrete	S	251
62B	Concrete	S	316
63B	Concrete	S	258
64B	Concrete	S	267
65B	Concrete	S	328
66B	Wood	S	177
67B	Terra Cotta	S	712
68B	Terra Cotta	S	681
69B	Wood	S	312
70B	Brick	S	458

Basic Statistical Quantities Summary

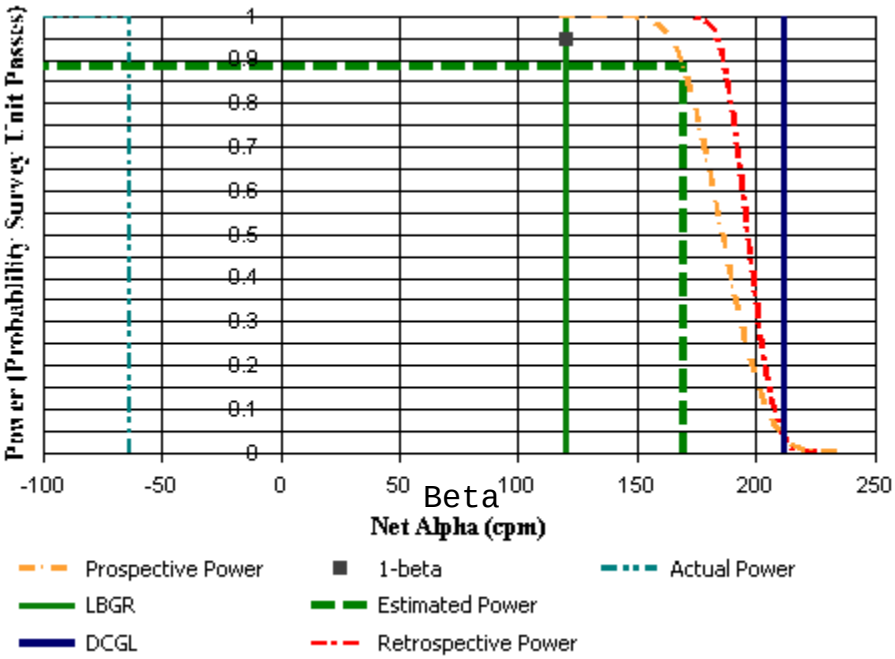
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-39.78	N/A	169
Median (dpm/100 cm²)	-37.60	N/A	N/A
Std Dev (dpm/100 cm²)	90.11	N/A	41.9
High Value (dpm/100 cm²)	105.06	N/A	N/A
Low Value (dpm/100 cm²)	-207.29	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU113 Building I-531		
Report Number:	13		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
46C	Wood	S	247
47C	Wood	S	237
48C	Wood	S	252
49C	Wood	S	267
50C	Brick	S	391
51C	Wood	S	218
52C	Wood	S	253
53C	Wood	S	241
54C	Brick	S	373
55C	Wood	S	261
56C	Wood	S	307
57C	Terra Cotta	S	713
58C	Brick	S	371
59C	Wood	S	216
60C	Wood	S	243

Basic Statistical Quantities Summary

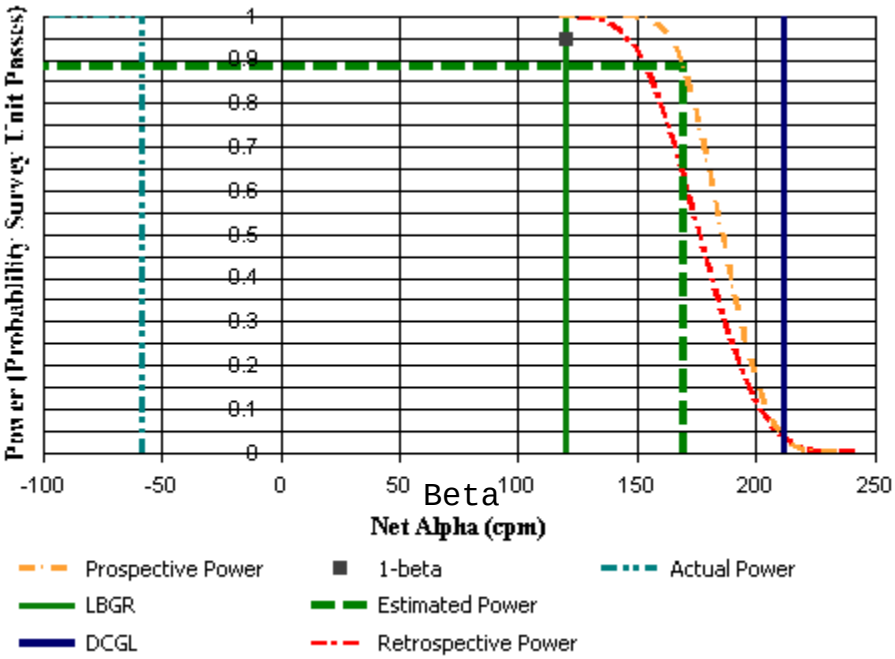
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-59.83	N/A	169
Median (dpm/100 cm²)	-63.68	N/A	N/A
Std Dev (dpm/100 cm²)	46.80	N/A	41.9
High Value (dpm/100 cm²)	38.36	N/A	N/A
Low Value (dpm/100 cm²)	-133.60	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU114 Building I-631		
Report Number:	14		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1C	Concrete	S	424
2C	Terra Cotta	S	588
3C	Wood	S	271
4C	Wood	S	372
5C	Brick	S	400
6C	Wood	S	263
7C	Brick	S	388
8C	Wood	S	239
9C	Wood	S	184
10C	Brick	S	333
11C	Wood	S	256
12C	Wood	S	218
13C	Wood	S	239
14C	Wood	S	234
15C	Brick	S	398

Basic Statistical Quantities Summary

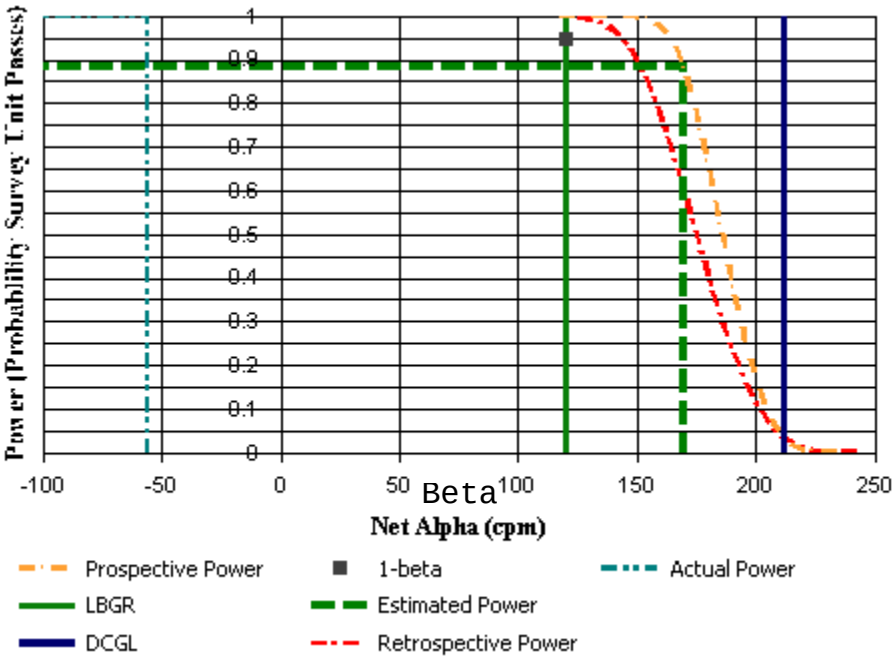
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-53.26	N/A	169
Median (dpm/100 cm²)	-58.01	N/A	N/A
Std Dev (dpm/100 cm²)	108.28	N/A	41.9
High Value (dpm/100 cm²)	166.48	N/A	N/A
Low Value (dpm/100 cm²)	-219.20	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU115 Building I-632		
Report Number:	15		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
86	Brick	S	399
87	Concrete	S	248
88	Wood	S	232
89	Wood	S	257
90	Wood	S	239
91	Wood	S	343
92	Brick	S	314
93	Wood	S	233
94	Terra Cotta	S	569
95	Wood	S	291
96	Terra Cotta	S	563
97	Concrete	S	354
98	Brick	S	445
99	Wood	S	291
100	Brick	S	385

Basic Statistical Quantities Summary

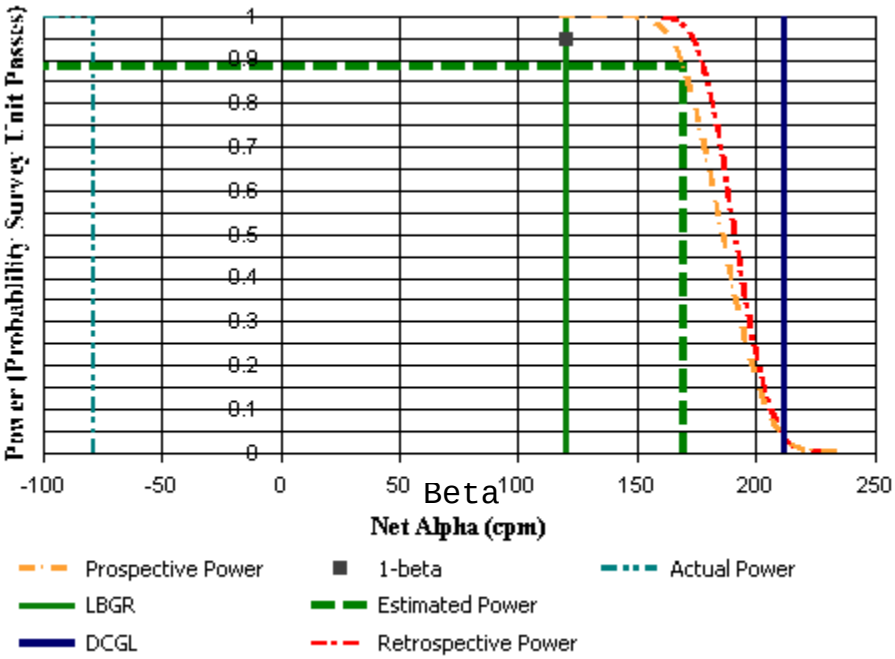
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-67.18	N/A	169
Median (dpm/100 cm²)	-56.12	N/A	N/A
Std Dev (dpm/100 cm²)	112.23	N/A	41.9
High Value (dpm/100 cm²)	106.39	N/A	N/A
Low Value (dpm/100 cm²)	-266.44	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU116 Building I-633		
Report Number:	16		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
71	Terra Cotta	S	665
72	Brick	S	331
73	Wood	S	326
74	Terra Cotta	S	677
75	Wood	S	323
76	Wood	S	245
77	Wood	S	234
78	Wood	S	238
79	Wood	S	252
80	Wood	S	208
81	Wood	S	239
82	Wood	S	276
83	Wood	S	235
84	Wood	S	241
85	Wood	S	265

Basic Statistical Quantities Summary

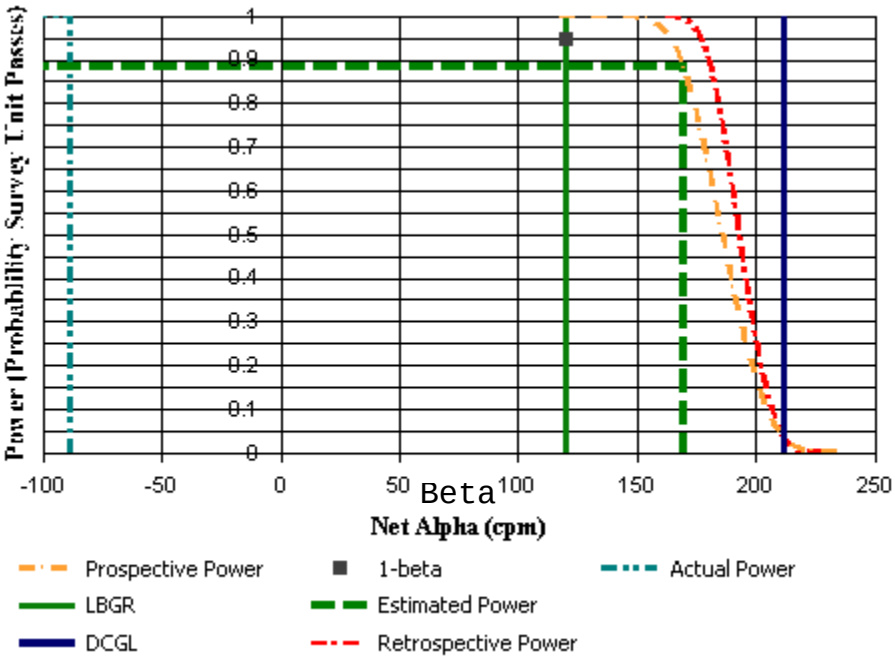
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-62.46	N/A	169
Median (dpm/100 cm²)	-78.80	N/A	N/A
Std Dev (dpm/100 cm²)	63.34	N/A	41.9
High Value (dpm/100 cm²)	74.26	N/A	N/A
Low Value (dpm/100 cm²)	-148.72	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU117 Building I-634		
Report Number:	18		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
56	Wood	S	226
57	Wood	S	197
58	Brick	S	394
59	Wood	S	260
60	Concrete	S	269
61	Wood	S	252
62	Brick	S	295
63	Brick	S	383
64	Wood	S	240
65	Wood	S	209
66	Wood	S	261
67	Wood	S	258
68	Wood	S	225
69	Concrete	S	239
70	Wood	S	253

Basic Statistical Quantities Summary

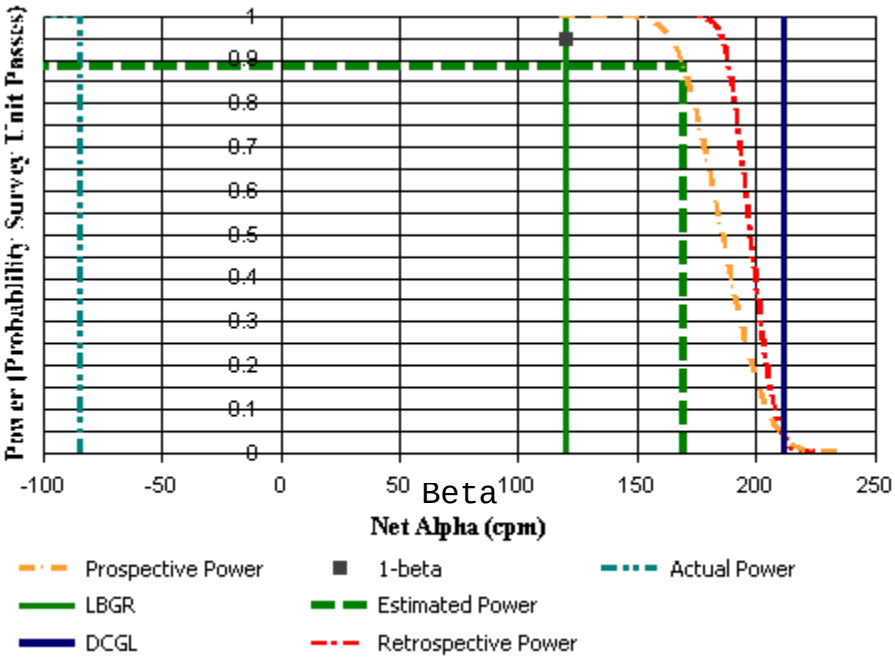
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-98.89	N/A	169
Median (dpm/100 cm²)	-88.25	N/A	N/A
Std Dev (dpm/100 cm²)	57.71	N/A	41.9
High Value (dpm/100 cm²)	-15.87	N/A	N/A
Low Value (dpm/100 cm²)	-202.95	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU118 Building I-636		
Report Number:	19		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
31C	Wood	S	231
32C	Wood	S	236
33C	Wood	S	244
34C	Wood	S	226
35C	Wood	S	213
36C	Wood	S	231
37C	Wood	S	260
38C	Wood	S	258
39C	Wood	S	238
40C	Wood	S	264
41C	Wood	S	247
42C	Wood	S	242
43C	Wood	S	216
44C	Wood	S	306
45C	Wood	S	257

Basic Statistical Quantities Summary

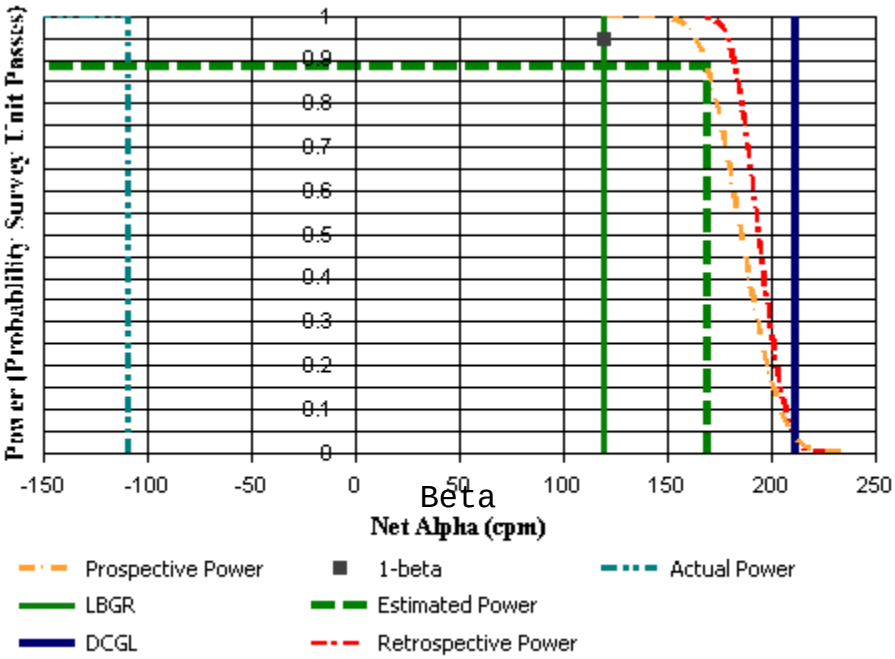
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-79.55	N/A	169
Median (dpm/100 cm²)	-84.47	N/A	N/A
Std Dev (dpm/100 cm²)	43.38	N/A	41.9
High Value (dpm/100 cm²)	36.47	N/A	N/A
Low Value (dpm/100 cm²)	-139.27	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU119 Building I-641		
Report Number:	20		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
16C	Brick	S	408
17C	Wood	S	218
18C	Wood	S	268
19C	Wood	S	241
20C	Wood	S	264
21C	Wood	S	247
22C	Wood	S	232
23C	Wood	S	226
24C	Wood	S	208
25C	Wood	S	251
26C	Wood	S	226
27C	Wood	S	229
28C	Wood	S	214
29C	Wood	S	219
30C	Wood	S	173

Basic Statistical Quantities Summary

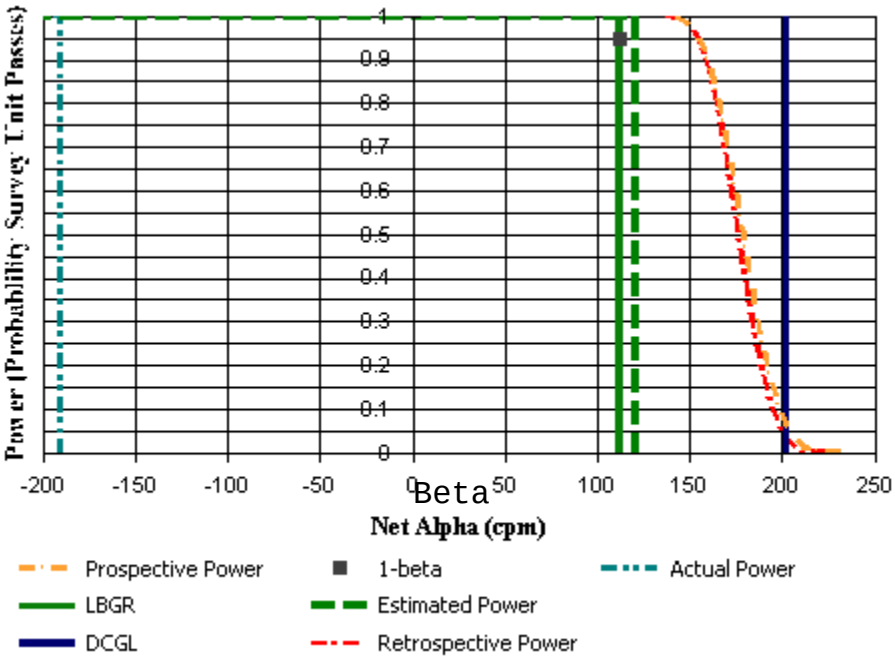
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-99.80	N/A	169
Median (dpm/100 cm²)	-109.03	N/A	N/A
Std Dev (dpm/100 cm²)	53.91	N/A	41.9
High Value (dpm/100 cm²)	10.58	N/A	N/A
Low Value (dpm/100 cm²)	-214.85	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Pads DQO C3 SU120 I-634 Igloo		
Report Number:	14		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	270
2	Concrete	S	250
3	Concrete	S	243
4	Concrete	S	240
5	Concrete	S	248
6	Concrete	S	245
7	Concrete	S	225
8	Concrete	S	267
9	Concrete	S	208
10	Concrete	S	248
11	Concrete	S	218
12	Concrete	S	239
13	Concrete	S	137
14	Concrete	S	161
15	Concrete	S	153

Basic Statistical Quantities Summary

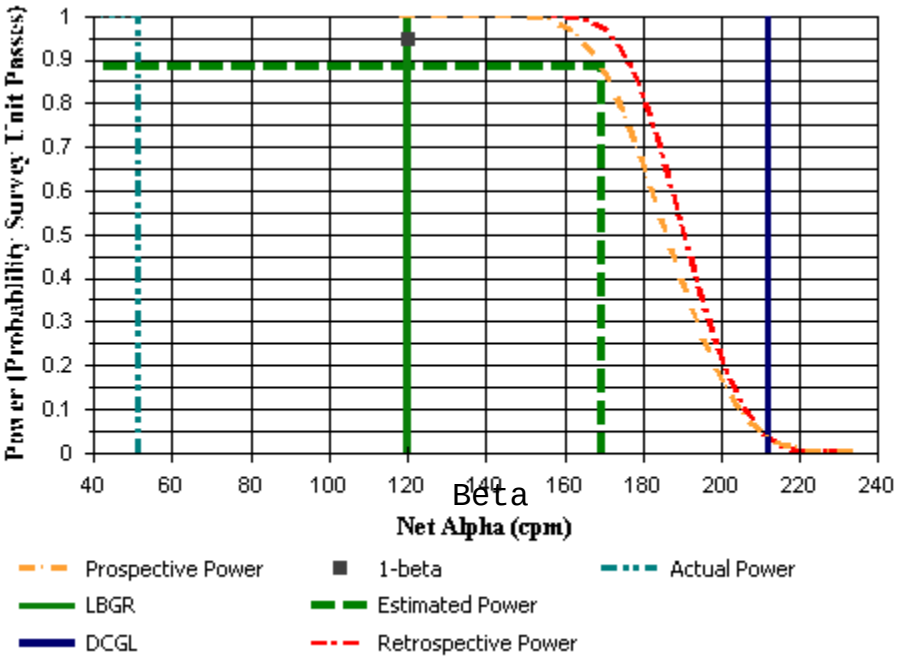
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=16
Mean (dpm/100 cm²)	-223.08	N/A	120
Median (dpm/100 cm²)	-190.28	N/A	N/A
Std Dev (dpm/100 cm²)	82.05	N/A	47.7
High Value (dpm/100 cm²)	-130.75	N/A	N/A
Low Value (dpm/100 cm²)	-394.64	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU121 Building 821		
Report Number:	21		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1/75A	Concrete	S	411
2/76A	Concrete	S	385
3/77A	Concrete	S	392
4/78A	Concrete	S	312
5/79A	Concrete	S	371
6/80A	Concrete	S	320
7/81A	Concrete	S	385
8/82A	Concrete	S	395
9/83A	Concrete	S	341
10/84A	Concrete	S	332
11/85A	Concrete	S	306
12/86A	Wood	S	271
13/87A	Concrete	S	363
14/88A	Concrete	S	340
15/89A	Concrete	S	385

Basic Statistical Quantities Summary

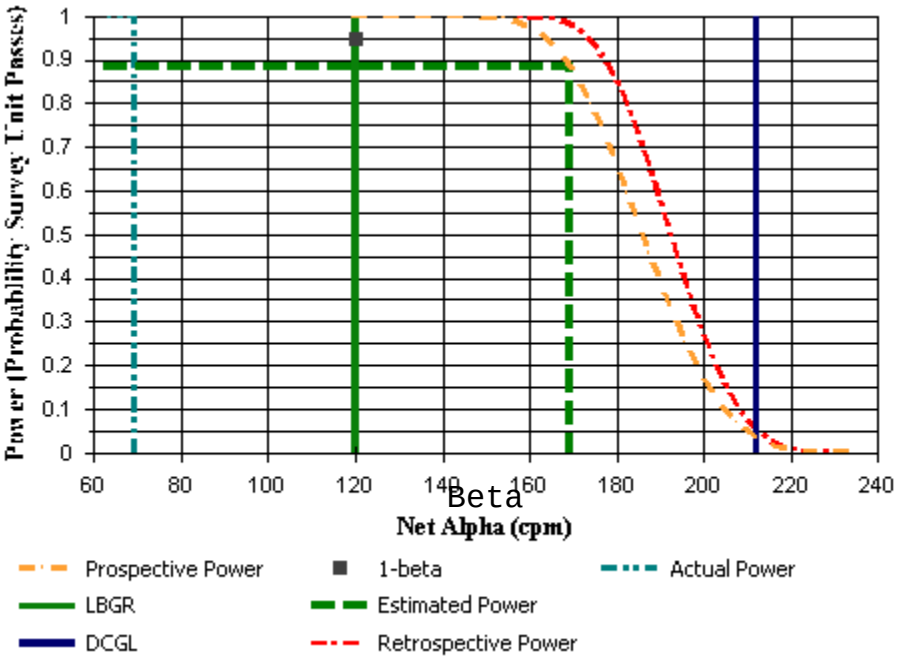
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	40.27	N/A	169
Median (dpm/100 cm²)	51.21	N/A	N/A
Std Dev (dpm/100 cm²)	65.24	N/A	41.9
High Value (dpm/100 cm²)	141.91	N/A	N/A
Low Value (dpm/100 cm²)	-56.50	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU122 Building 825		
Report Number:	22		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1/91A	Concrete	S	408
2/92A	Concrete	S	440
3/93A	Concrete	S	438
4/94A	Wood	S	328
5/95A	Concrete	S	349
6/96A	Concrete	S	356
7/97A	Concrete	S	351
8/98A	Concrete	S	394
9/99A	Concrete	S	379
10/100A	Concrete	S	316
11/8B	Concrete	S	363
12/9B	Concrete	S	351
13/10B	Concrete	S	368
14/11B	Concrete	S	389

Basic Statistical Quantities Summary

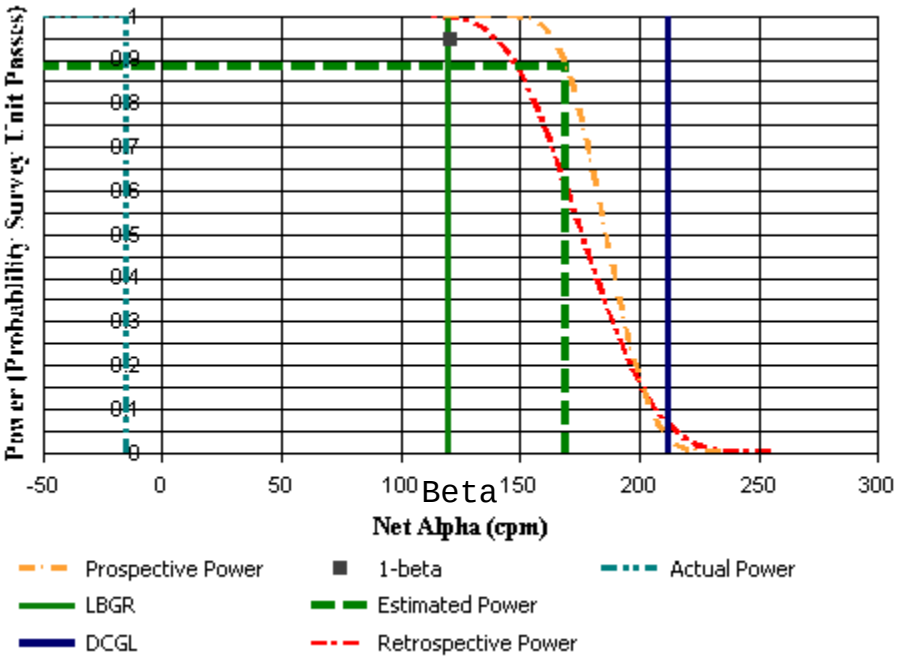
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=15
Mean (dpm/100 cm²)	77.83	N/A	169
Median (dpm/100 cm²)	69.35	N/A	N/A
Std Dev (dpm/100 cm²)	65.59	N/A	41.9
High Value (dpm/100 cm²)	196.71	N/A	N/A
Low Value (dpm/100 cm²)	-37.60	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU123 Building 1021		
Report Number:	23		
Survey Unit Measurements:	11		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
1	Concrete	S	319
2	Concrete	S	369
3	Concrete	S	263
4	Concrete	S	328
5	Concrete	S	262
6	Concrete	S	274
7	Concrete	S	335
9	Concrete	S	337
12	Concrete	S	356
15	Concrete	S	474
16	Brick	S	373

Basic Statistical Quantities Summary

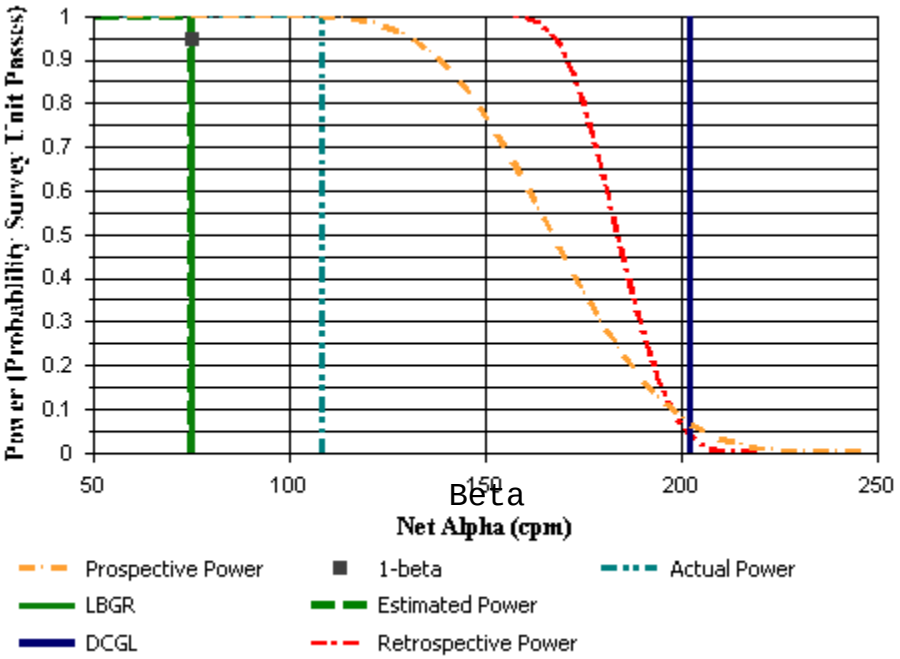
Statistic	Survey Unit	Background	DQO Results
Sample Number	11	N/A	N=15
Mean (dpm/100 cm²)	-12.27	N/A	169
Median (dpm/100 cm²)	-14.93	N/A	N/A
Std Dev (dpm/100 cm²)	113.27	N/A	41.9
High Value (dpm/100 cm²)	260.96	N/A	N/A
Low Value (dpm/100 cm²)	-139.64	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU124 F-731 Loading Dock		
Report Number:	2		
Survey Unit Measurements:	12		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.4, 2.6	Concrete	S	402
0.0, 6.7	Concrete	S	386
2.4, 10.9	Concrete	S	395
0.0, 15.0	Concrete	S	421
2.4, 19.1	Concrete	S	352
0.0, 23.3	Concrete	S	371
2.4, 27.4	Concrete	S	351
2.4, 43.9	Concrete	S	432
0.0, 48.0	Concrete	S	343
2.4, 52.2	Concrete	S	395
0.0, 56.3	Concrete	S	389
2.4, 60.4	Concrete	S	392

Basic Statistical Quantities Summary

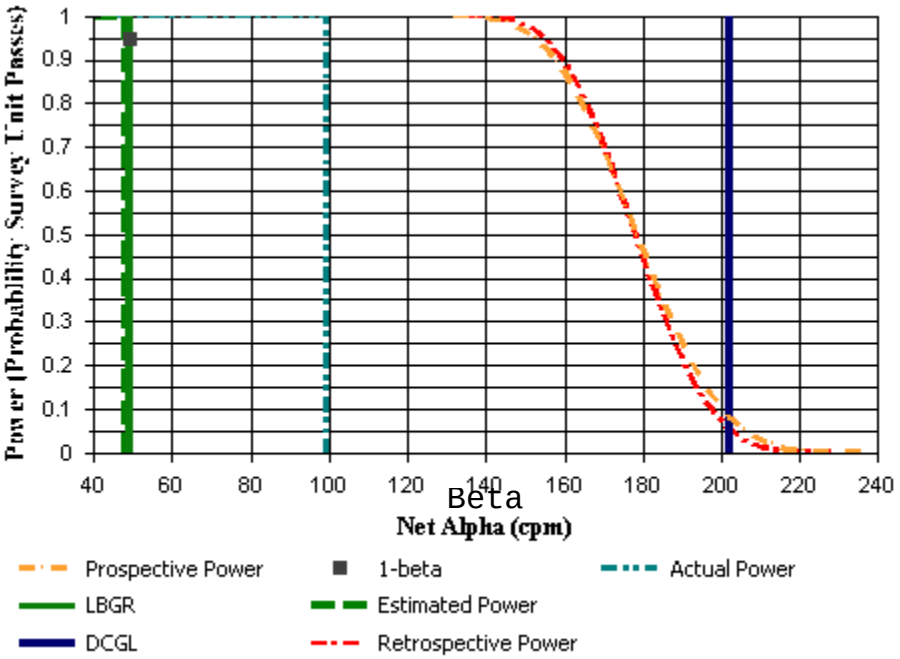
Statistic	Survey Unit	Background	DQO Results
Sample Number	12	N/A	N=16
Mean (dpm/100 cm²)	98.91	N/A	75.1
Median (dpm/100 cm²)	108.33	N/A	N/A
Std Dev (dpm/100 cm²)	54.36	N/A	71.7
High Value (dpm/100 cm²)	190.67	N/A	N/A
Low Value (dpm/100 cm²)	14.09	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU43 and 44 B-913 C2 SU125 Loading Dock		
Report Number:	6		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
0.1, 4.7	Concrete	S	474
2.9, 9.5	Concrete	S	377
0.1, 14.3	Concrete	S	395
2.9, 19.1	Concrete	S	380
0.1, 23.9	Concrete	S	359
2.9, 28.6	Concrete	S	346
0.1, 33.4	Concrete	S	340
2.9, 38.2	Concrete	S	350
0.1, 43.0	Concrete	S	392
2.9, 47.8	Concrete	S	479
0.1, 52.6	Concrete	S	367
2.9, 57.4	Concrete	S	401
0.1, 62.1	Concrete	S	405
2.9, 66.9	Concrete	S	407

Basic Statistical Quantities Summary

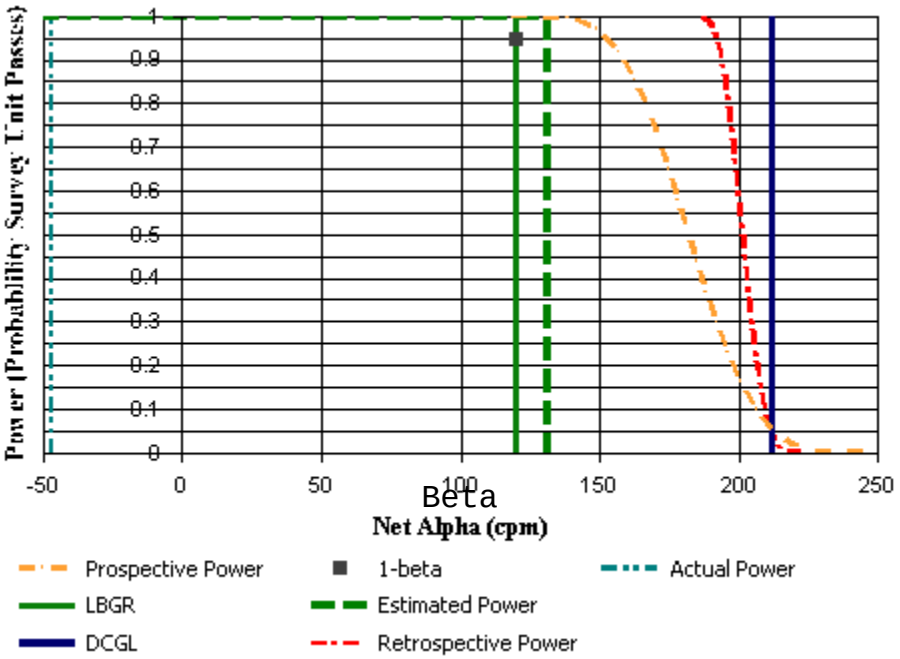
Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=13
Mean (dpm/100 cm²)	109.04	N/A	48.1
Median (dpm/100 cm²)	99.40	N/A	N/A
Std Dev (dpm/100 cm²)	84.23	N/A	46.9
High Value (dpm/100 cm²)	283.93	N/A	N/A
Low Value (dpm/100 cm²)	8.13	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 2 Building and DP Phase 2 C2 SU126 F-737 Loading Dock		
Report Number:	9		
Survey Unit Measurements:	12		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
20.8, 8.8	Concrete	S	353
16.5, 16.1	Concrete	S	288
25.0, 16.1	Concrete	S	308
20.8, 23.5	Concrete	S	302
16.5, 30.8	Concrete	S	326
25.0, 30.8	Concrete	S	309
20.8, 38.2	Concrete	S	310
16.5, 45.5	Concrete	S	327
25.0, 45.5	Concrete	S	312
20.8, 52.9	Concrete	S	309
16.5, 60.3	Concrete	S	319
25.0, 60.3	Concrete	S	312

Basic Statistical Quantities Summary

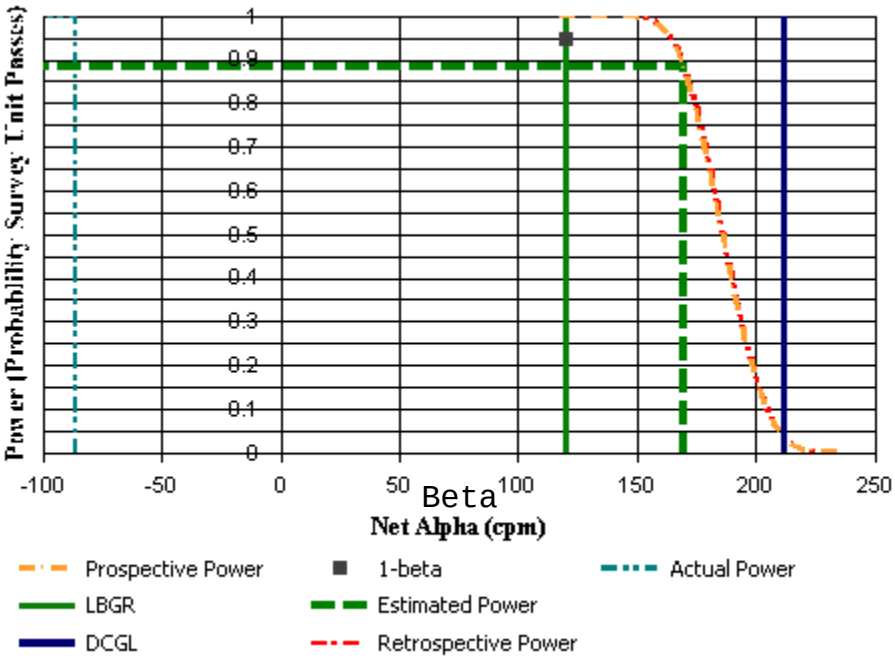
Statistic	Survey Unit	Background	DQO Results
Sample Number	12	N/A	N=19
Mean (dpm/100 cm²)	-40.28	N/A	131
Median (dpm/100 cm²)	-47.05	N/A	N/A
Std Dev (dpm/100 cm²)	30.07	N/A	62.7
High Value (dpm/100 cm²)	32.31	N/A	N/A
Low Value (dpm/100 cm²)	-90.51	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	Class 3 Building and Debris Piles C3 SU127 Building 305		
Report Number:	25		
Survey Unit Measurements:	15		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
2.3,0/0.6 Basement R	Wood	S	233
3.1, 2.8/2.5 Basemen	Wood	S	300
4.6, 2.6/0.5 Baseme	Wood	S	284
9.2, 1.8/2.5 1st Flo	Wood	S	241
14.2, 0.3/2.51st Fl	Wood	S	247
4.9, 5.3/1.8 1st Fl	Wood	S	260
0.1, 2.7 1st Floor	Wood	S	238
19.6, 0/1.2 1st Floo	Wood	S	151
16.3, 0/1.0 1st Floo	Wood	S	163
8.8, 14.0/2.4 1st F	Wood	S	186
13.8, 13.5 1st Floor	Wood	S	234
3.0, 13/2.5 2nd Flo	Wood	S	242
0.5, 11.1/2.5 2nd F	Wood	S	247
11.2, 10.7/0.9 2nd	Wood	S	213
7.2, 11.1/1.8 2nd Fl	Wood	S	269

Basic Statistical Quantities Summary

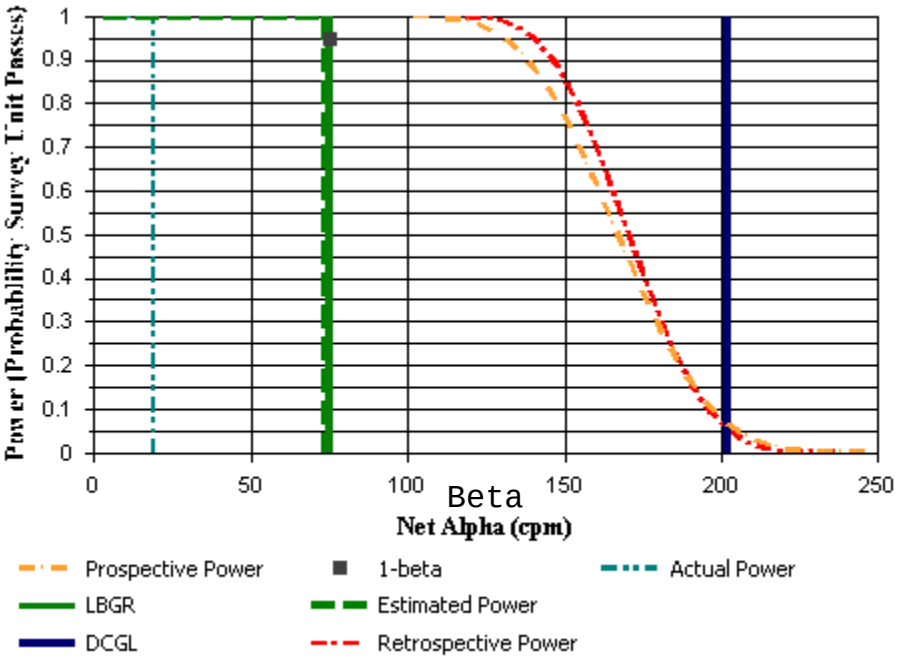
Statistic	Survey Unit	Background	DQO Results
Sample Number	15	N/A	N=15
Mean (dpm/100 cm²)	-99.84	N/A	169
Median (dpm/100 cm²)	-86.36	N/A	N/A
Std Dev (dpm/100 cm²)	78.08	N/A	41.9
High Value (dpm/100 cm²)	25.13	N/A	N/A
Low Value (dpm/100 cm²)	-256.42	N/A	N/A

DQA Building Surface Report

Assessment Summary

Site:	Curtis Bay Buildings Rev 1		
Planner(s):	Vitkus		
Survey Unit Name:	C1 ~~SU77~~ SU129 G-723 Loading dock		
Report Number:	2		
Survey Unit Measurements:	14		
Reference Area Measurements:	0		
Test Performed:	Sign	Test Result:	Not Performed
Judgmental Areas:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Building Surface Report

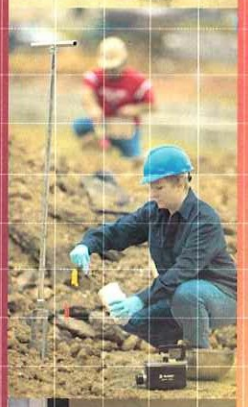
Survey Unit Data

NOTE: Type = "S" indicates survey measurement.
Type = "R" indicates reference measurement.

Measurement	Material	Type	Beta Gross Alpha (cpm)
16.9, 47.2	Concrete	S	398
20.1, 47.2	Concrete	S	284
15.3, 49.9	Concrete	S	324
18.5, 49.9	Concrete	S	500
16.9, 52.7	Concrete	S	367
20.1, 52.7	Concrete	S	313
15.3, 55.5	Concrete	S	331
18.5, 55.5	Concrete	S	378
16.9, 58.3	Concrete	S	360
20.1, 58.3	Concrete	S	319
15.3, 61.1	Concrete	S	331
18.5, 61.1	Concrete	S	413
16.9, 64.5	Concrete	S	387
20.1, 64.5	Concrete	S	305

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	14	N/A	N=16
Mean (dpm/100 cm²)	43.57	N/A	74.1
Median (dpm/100 cm²)	19.05	N/A	N/A
Std Dev (dpm/100 cm²)	110.83	N/A	71.7
High Value (dpm/100 cm²)	325.60	N/A	N/A
Low Value (dpm/100 cm²)	-102.98	N/A	N/A



RADIOLOGICAL FINAL STATUS SURVEY OF THE CURTIS BAY DEPOT CURTIS BAY, MARYLAND

APPENDIX G
VOLUME 3 OF 3

T. J. Vitkus

Prepared for the
Defense National Stockpile Center
of the
Defense Logistics Agency

ORISE
Oak Ridge Institute for Science and Education

Approved for public release; further dissemination unlimited.

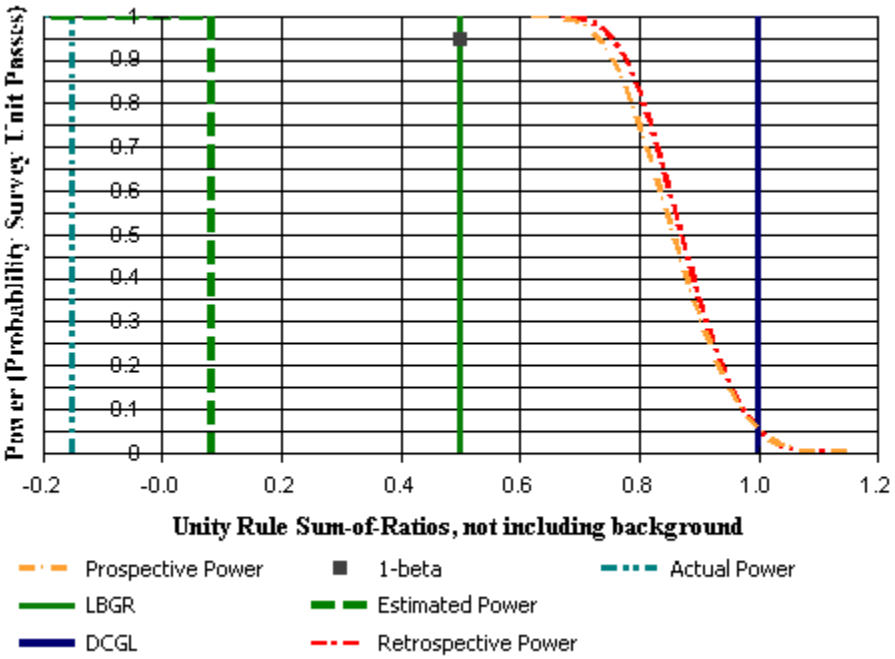
APPENDIX G:
LAND SURVEY UNIT DQAs

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	~~C1 SU2~~ C1 SU1		
Report Number:	3		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1533	S	0.18	0.39
1534	S	0.57	0.9
1535	S	1.1	0.54
1536	S	0.42	0.51
1537	S	0.4	0.21
1538	S	0.27	0.16
1539	S	0.49	0.9
1540	S	0.77	0.87
1541	S	0.7	0.51
1542	S	0.41	0.62
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1533	S	0.24
1534	S	0.61
1535	S	0.62
1536	S	0.38
1537	S	0.23
1538	S	0.17
1539	S	0.58
1540	S	0.66
1541	S	0.47
1542	S	0.42
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.44	0.66	0.08
Median (SOR)	0.45	0.60	N/A
Std Dev (SOR)	0.18	0.18	0.18
High Value (SOR)	0.66	0.93	N/A
Low Value (SOR)	0.17	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.17	S	0.17	1	0
0.23	S	0.23	2	0
0.24	S	0.24	3	0
0.38	S	0.38	4	0
0.42	S	0.42	5	0
0.47	S	0.47	6	0
0.58	S	0.58	7	0
0.61	S	0.61	8	0
0.62	S	0.62	9	0
0.66	S	0.66	10	0

DQA Surface Soil Report

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.02

EMC Result: Pass

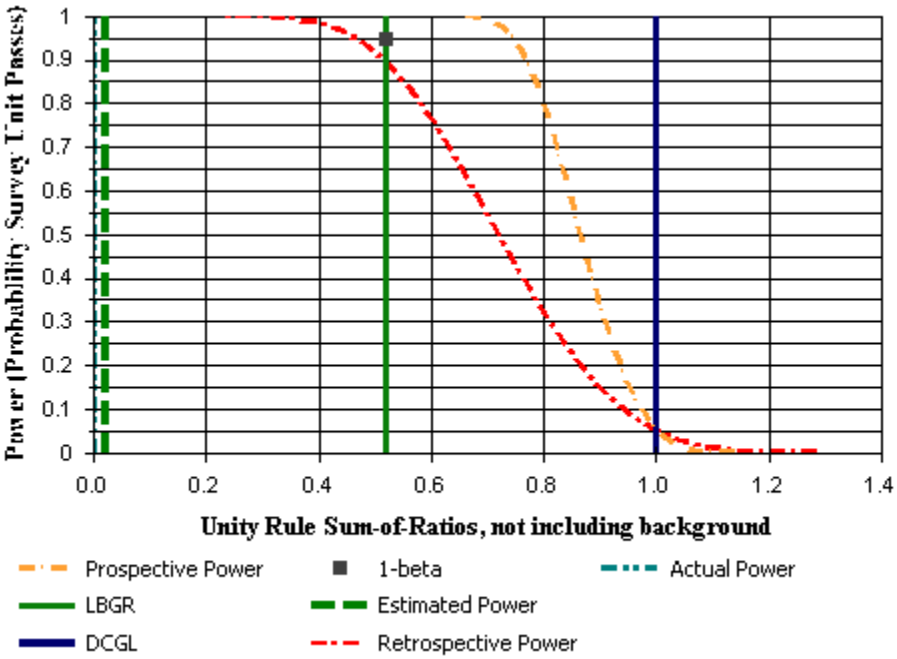
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1553	10	Th-232	1.02
Equation 8-2 Result for Th-232: 0			
1553	10	U-238	1.11
Equation 8-2 Result for U-238: 0.02			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU1a AOC soil overburden		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1274	S	1.06	0.81
1275	S	1.61	1.72
1276	S	1.01	0.96
1277	S	0.22	0.31
1278	S	0.33	0.51
1279	S	0.33	0.23
1280	S	0.67	0.81
1281	S	0.5	0.82
1282	S	0.64	0.8
1283	S	1.31	1.12
1284	S	1.38	2.06
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1274	S	0.73
1275	S	1.34
1276	S	0.78
1277	S	0.22
1278	S	0.35
1279	S	0.22
1280	S	0.6
1281	S	0.55
1282	S	0.58
1283	S	0.96
1284	S	1.41
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=10
Mean (SOR)	0.70	0.66	0.02
Median (SOR)	0.60	0.60	N/A
Std Dev (SOR)	0.40	0.18	0.17
High Value (SOR)	1.41	0.93	N/A
Low Value (SOR)	0.22	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	283
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.22	S	0.22	1.5	0
0.22	S	0.22	1.5	0
0.35	S	0.35	3	0
0.55	S	0.55	4	0
0.58	S	0.58	5	0
0.6	S	0.6	6	0
0.73	S	0.73	7	0
0.78	S	0.78	8	0
0.96	S	0.96	9	0
1.34	S	1.34	11	0

DQA Surface Soil Report

Statistical Test Summary

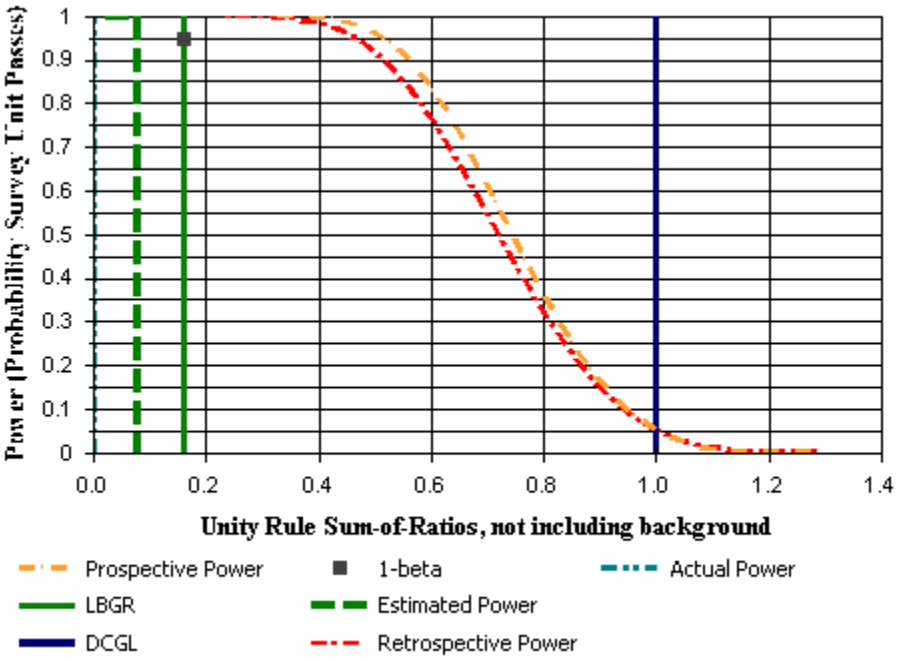
Data	Type	Adjusted Data	Rank	Reference Rank
1.41	S	1.41	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU1b AOC 1 Waste Pit Excavation		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1274	S	1.06	0.81
1275	S	1.61	1.72
1276	S	1.01	0.96
1277	S	0.22	0.31
1278	S	0.33	0.51
1279	S	0.33	0.23
1280	S	0.67	0.81
1281	S	0.5	0.82
1282	S	0.64	0.8
1283	S	1.31	1.12
1284	S	1.38	2.06
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1274	S	0.73
1275	S	1.34
1276	S	0.78
1277	S	0.22
1278	S	0.35
1279	S	0.22
1280	S	0.6
1281	S	0.55
1282	S	0.58
1283	S	0.96
1284	S	1.41
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.70	0.66	0.08
Median (SOR)	0.60	0.60	N/A
Std Dev (SOR)	0.40	0.18	0.34
High Value (SOR)	1.41	0.93	N/A
Low Value (SOR)	0.22	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	283
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.22	S	0.22	1.5	0
0.22	S	0.22	1.5	0
0.35	S	0.35	3	0
0.55	S	0.55	4	0
0.58	S	0.58	5	0
0.6	S	0.6	6	0
0.73	S	0.73	7	0
0.78	S	0.78	8	0
0.96	S	0.96	9	0
1.34	S	1.34	11	0

DQA Surface Soil Report

Statistical Test Summary

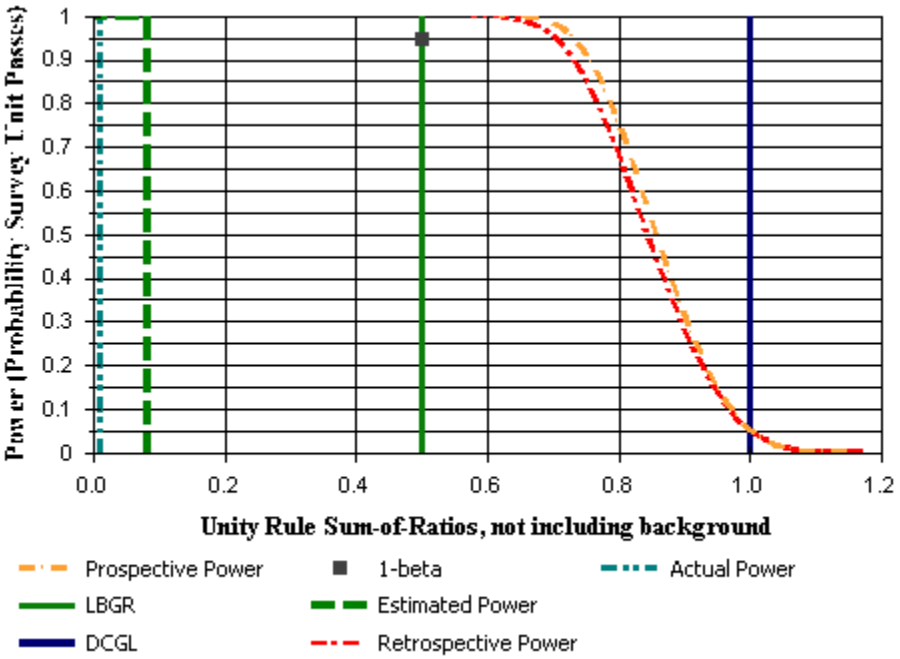
Data	Type	Adjusted Data	Rank	Reference Rank
1.41	S	1.41	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU2		
Report Number:	2		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1543	S	0.44	0.47
1544	S	0.56	0.91
1545	S	0.4	0.41
1546	S	0.89	1.23
1548	S	0.52	0.45
1549	S	0.9	1.14
1550	S	0.69	1.21
1551	S	0.77	0.8
1552	S	0.61	0.62
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1543	S	0.37
1544	S	0.61
1545	S	0.32
1546	S	0.87
1548	S	0.38
1549	S	0.83
1550	S	0.79
1551	S	0.63
1552	S	0.49
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.59	0.66	0.08
Median (SOR)	0.61	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.18
High Value (SOR)	0.87	0.93	N/A
Low Value (SOR)	0.32	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

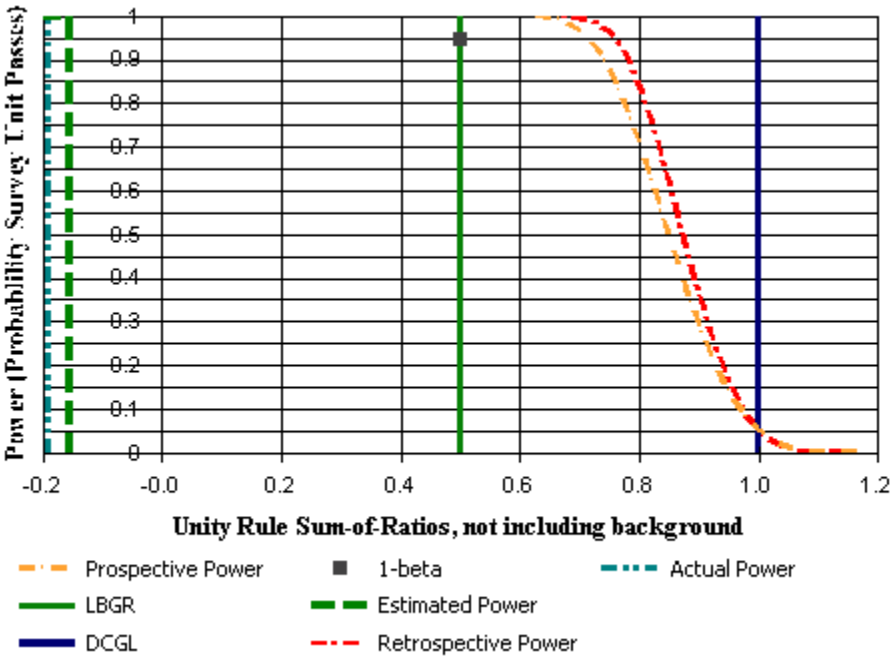
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.32	S	0.32	1	0
0.37	S	0.37	2	0
0.38	S	0.38	3	0
0.49	S	0.49	4	0
0.61	S	0.61	5	0
0.63	S	0.63	6	0
0.79	S	0.79	7	0
0.83	S	0.83	8	0
0.87	S	0.87	9	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU3 AOC-2		
Report Number:	3		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1295	S	0.54	0.41
1296	S	0.57	0.53
1297	S	0.66	0.54
1298	S	0.77	0.57
1299	S	0.57	0.63
1300	S	0.32	0.26
1301	S	0.54	0.35
1302	S	0.18	0.39
1303	S	0.48	0.46
1304	S	0.69	0.84
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1295	S	0.37
1296	S	0.44
1297	S	0.47
1298	S	0.52
1299	S	0.48
1300	S	0.23
1301	S	0.35
1302	S	0.24
1303	S	0.37
1304	S	0.62
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=11
Mean (SOR)	0.41	0.66	-0.16
Median (SOR)	0.41	0.60	N/A
Std Dev (SOR)	0.12	0.18	0.2
High Value (SOR)	0.62	0.93	N/A
Low Value (SOR)	0.23	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.23	S	0.23	1	0
0.24	S	0.24	2	0
0.35	S	0.35	3	0
0.37	S	0.37	4.5	0
0.37	S	0.37	4.5	0
0.44	S	0.44	6	0
0.47	S	0.47	7	0
0.48	S	0.48	8	0
0.52	S	0.52	9	0
0.62	S	0.62	10	0

DQA Surface Soil Report

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: -0.25

EMC Result: Pass

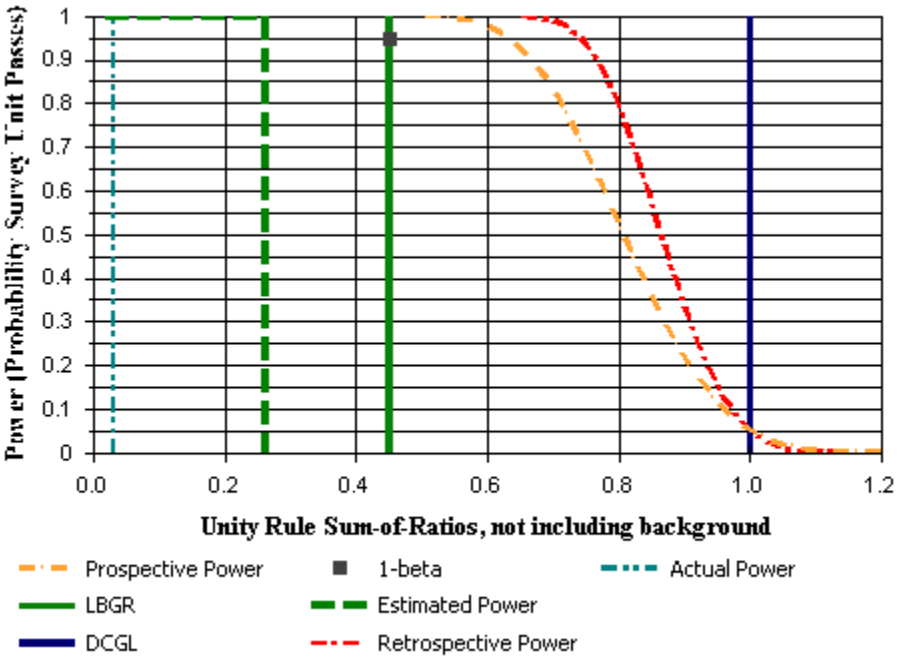
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1357 Exc. Judg	10	Th-232	.66
Equation 8-2 Result for Th-232: -0.07			
1357 Exc. Judg	10	U-238	.39
Equation 8-2 Result for U-238: -0.18			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU4 through 6/AOC 3 C1 SU4		
Report Number:	2		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	3	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1305	S	0.53	0.6
1306	S	0.91	0.93
1307	S	0.74	1.05
1310	S	0.9	1.18
1311	S	1.02	0.53
1312	S	1.05	0.58
1313	S	0.57	0.78
1314	S	1.2	0.76
1315	S	0.62	0.52
1316	S	1.2	1.64
1317	S	0.69	0.57
1318	S	0.68	0.85
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1305	S	0.46
1306	S	0.74
1307	S	0.73
1310	S	0.85
1311	S	0.59
1312	S	0.63
1313	S	0.55
1314	S	0.76
1315	S	0.45
1316	S	1.16
1317	S	0.5
1318	S	0.62
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=13
Mean (SOR)	0.67	0.66	0.26
Median (SOR)	0.63	0.60	N/A
Std Dev (SOR)	0.20	0.18	0.28
High Value (SOR)	1.16	0.93	N/A
Low Value (SOR)	0.45	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.45	S	0.45	1	0
0.46	S	0.46	2	0
0.5	S	0.5	3	0
0.55	S	0.55	4	0
0.59	S	0.59	5	0
0.62	S	0.62	6	0
0.63	S	0.63	7	0
0.73	S	0.73	8	0
0.74	S	0.74	9	0
0.76	S	0.76	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
0.85	S	0.85	11	0
1.16	S	1.16	12	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.62

EMC Result: Pass

EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1358 Exc. Judg	10	Th-232	.91
1359 Exc Judg	10	Th-232	1.08
1360 PostRA 1352	4	Th-232	2.32
Equation 8-2 Result for Th-232: 0.3			
1358 Exc. Judg	10	U-238	1.19
1359 Exc Judg	10	U-238	1.52
1360 PostRA 1352	4	U-238	1.01
Equation 8-2 Result for U-238: 0.32			

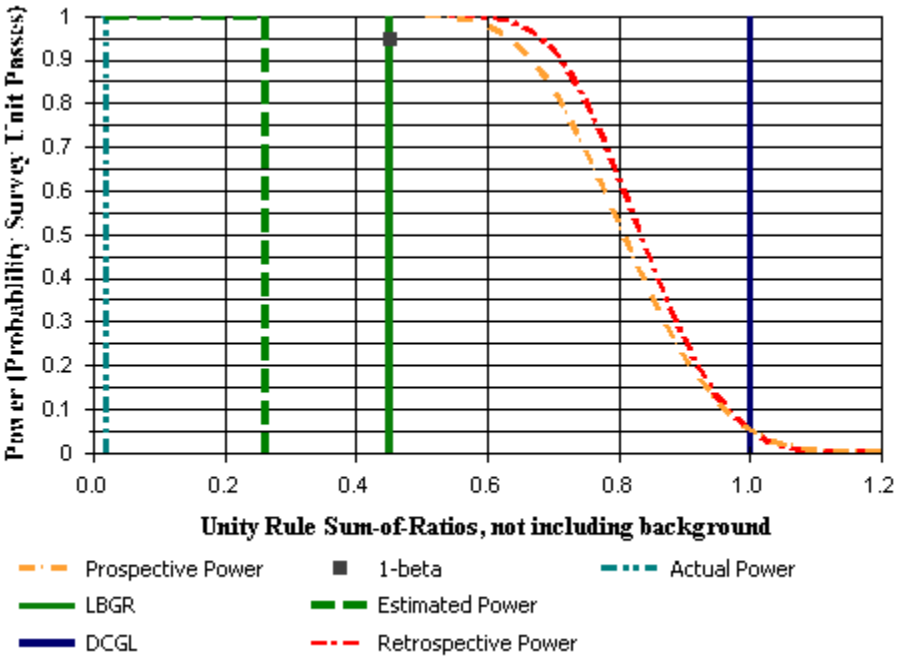
Sample 1352 SOR = 7.93, location remediated, post-RA SOR result for Sample 1360 = 0.60

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU4 through 6/AOC 3 C1 SU5 EMC		
Report Number:	4		
Survey Unit Samples:	14		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	2	EMC Result:	Fail
Assessment Conclusion:	***Do NOT Reject Null Hypothesis (Survey Unit FAILS)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1319	S	0.68	0.63
1320	S	0.98	0.9
1321	S	0.76	0.79
1322	S	1.32	1.82
1323	S	0.94	1.34
1324	S	0.58	0.44
1325	S	0.73	0.64
1326	S	1.3	1.25
1327	S	0.85	0.38
1328	S	0.86	0.93
1329	S	0.52	0.49
1330	S	0.41	0.65
1331	S	0.76	0.92
1332	S	0.6	0.9
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1319	S	0.52
1320	S	0.75
1321	S	0.62
1322	S	1.28
1323	S	0.93
1324	S	0.4
1325	S	0.54
1326	S	1.02
1327	S	0.47
1328	S	0.72
1329	S	0.4
1330	S	0.44
1331	S	0.68
1332	S	0.62
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	14	15	N/2=13
Mean (SOR)	0.67	0.66	0.26
Median (SOR)	0.62	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.28
High Value (SOR)	1.28	0.93	N/A
Low Value (SOR)	0.40	0.33	N/A

Statistical Test Summary

Sum of Ranks:	435
Sum of Reference Ranks:	330
Critical Value:	263
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	16	16
0.51	R	1.51	17	17
0.57	R	1.57	18	18
0.58	R	1.58	19.5	19.5
0.58	R	1.58	19.5	19.5
0.59	R	1.59	21	21
0.6	R	1.6	22	22
0.64	R	1.64	23	23
0.75	R	1.75	24	24
0.83	R	1.83	25.5	25.5
0.83	R	1.83	25.5	25.5
0.85	R	1.85	27	27
0.87	R	1.87	28	28
0.93	R	1.93	29	29
0.4	S	0.4	1.5	0
0.4	S	0.4	1.5	0
0.44	S	0.44	3	0
0.47	S	0.47	4	0
0.52	S	0.52	5	0
0.54	S	0.54	6	0
0.62	S	0.62	7.5	0
0.62	S	0.62	7.5	0
0.68	S	0.68	9	0
0.72	S	0.72	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
0.75	S	0.75	11	0
0.93	S	0.93	12	0
1.02	S	1.02	13	0
1.28	S	1.28	14	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 1.23

EMC Result: Fail

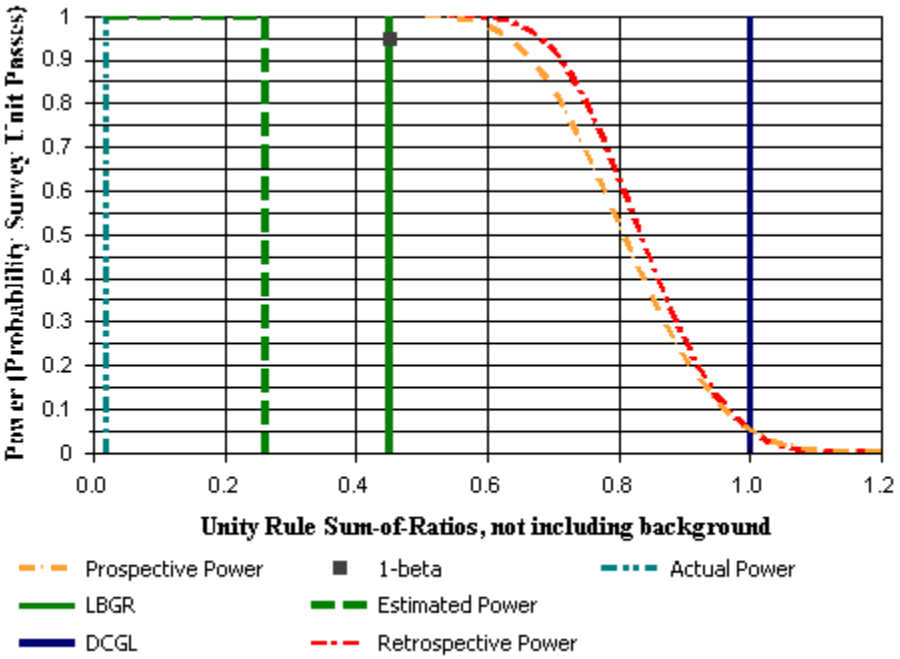
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
0431S1353	4	Th-232	4.95
0431S1362	2	Th-232	5.8
Equation 8-2 Result for Th-232: 1.32			
0431S1353	4	U-238	.47
0431S1362	2	U-238	.84
Equation 8-2 Result for U-238: -0.09			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU4 through 6/AOC 3 C1 SU5 Remediated EMC		
Report Number:	5		
Survey Unit Samples:	14		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	2	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1319	S	0.68	0.63
1320	S	0.98	0.9
1321	S	0.76	0.79
1322	S	1.32	1.82
1323	S	0.94	1.34
1324	S	0.58	0.44
1325	S	0.73	0.64
1326	S	1.3	1.25
1327	S	0.85	0.38
1328	S	0.86	0.93
1329	S	0.52	0.49
1330	S	0.41	0.65
1331	S	0.76	0.92
1332	S	0.6	0.9
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1319	S	0.52
1320	S	0.75
1321	S	0.62
1322	S	1.28
1323	S	0.93
1324	S	0.4
1325	S	0.54
1326	S	1.02
1327	S	0.47
1328	S	0.72
1329	S	0.4
1330	S	0.44
1331	S	0.68
1332	S	0.62
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	14	15	N/2=13
Mean (SOR)	0.67	0.66	0.26
Median (SOR)	0.62	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.28
High Value (SOR)	1.28	0.93	N/A
Low Value (SOR)	0.40	0.33	N/A

Statistical Test Summary

Sum of Ranks:	435
Sum of Reference Ranks:	330
Critical Value:	263
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	16	16
0.51	R	1.51	17	17
0.57	R	1.57	18	18
0.58	R	1.58	19.5	19.5
0.58	R	1.58	19.5	19.5
0.59	R	1.59	21	21
0.6	R	1.6	22	22
0.64	R	1.64	23	23
0.75	R	1.75	24	24
0.83	R	1.83	25.5	25.5
0.83	R	1.83	25.5	25.5
0.85	R	1.85	27	27
0.87	R	1.87	28	28
0.93	R	1.93	29	29
0.4	S	0.4	1.5	0
0.4	S	0.4	1.5	0
0.44	S	0.44	3	0
0.47	S	0.47	4	0
0.52	S	0.52	5	0
0.54	S	0.54	6	0
0.62	S	0.62	7.5	0
0.62	S	0.62	7.5	0
0.68	S	0.68	9	0
0.72	S	0.72	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
0.75	S	0.75	11	0
0.93	S	0.93	12	0
1.02	S	1.02	13	0
1.28	S	1.28	14	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.06

EMC Result: Pass

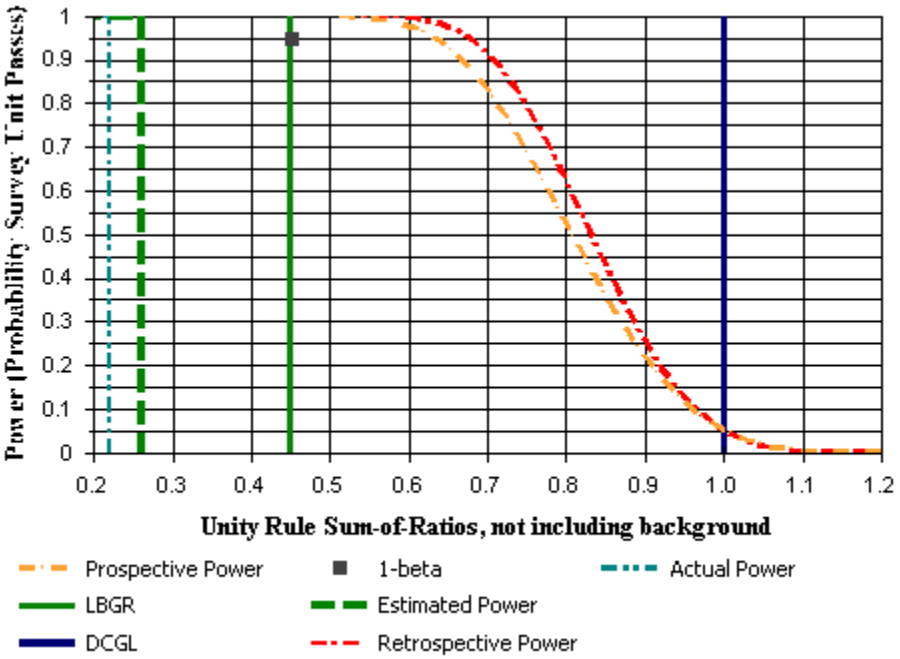
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
S1361 post-RA 1353	4	Th-232	1.14
S1518 post RA S1362	2	Th-232	1.65
Equation 8-2 Result for Th-232: 0.16			
S1361 post-RA 1353	4	U-238	.61
S1518 post RA S1362	2	U-238	.59
Equation 8-2 Result for U-238: -0.11			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU4 through 6/AOC 3 C1 SU6		
Report Number:	3		
Survey Unit Samples:	14		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1333	S	1.85	1.28
1334	S	0.47	0.27
1335	S	0.67	0.77
1336	S	1.26	1.19
1337	S	1.68	1.34
1338	S	0.64	0.75
1339	S	1.17	1.32
1340	S	0.92	1.28
1341	S	0.62	1.14
1342	S	0.97	0.81
1343	S	0.82	1.17
1344	S	0.77	0.61
1345	S	0.89	1.17
1346	S	0.84	1.19
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1333	S	1.22
1334	S	0.28
1335	S	0.58
1336	S	0.98
1337	S	1.19
1338	S	0.56
1339	S	1
1340	S	0.9
1341	S	0.73
1342	S	0.7
1343	S	0.81
1344	S	0.54
1345	S	0.84
1346	S	0.83
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	14	15	N/2=13
Mean (SOR)	0.80	0.66	0.26
Median (SOR)	0.82	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.28
High Value (SOR)	1.22	0.93	N/A
Low Value (SOR)	0.28	0.33	N/A

Statistical Test Summary

Sum of Ranks:	435
Sum of Reference Ranks:	330
Critical Value:	263
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	16	16
0.51	R	1.51	17	17
0.57	R	1.57	18	18
0.58	R	1.58	19.5	19.5
0.58	R	1.58	19.5	19.5
0.59	R	1.59	21	21
0.6	R	1.6	22	22
0.64	R	1.64	23	23
0.75	R	1.75	24	24
0.83	R	1.83	25.5	25.5
0.83	R	1.83	25.5	25.5
0.85	R	1.85	27	27
0.87	R	1.87	28	28
0.93	R	1.93	29	29
0.28	S	0.28	1	0
0.54	S	0.54	2	0
0.56	S	0.56	3	0
0.58	S	0.58	4	0
0.7	S	0.7	5	0
0.73	S	0.73	6	0
0.81	S	0.81	7	0
0.83	S	0.83	8	0
0.84	S	0.84	9	0
0.9	S	0.9	10	0

DQA Surface Soil Report

Statistical Test Summary

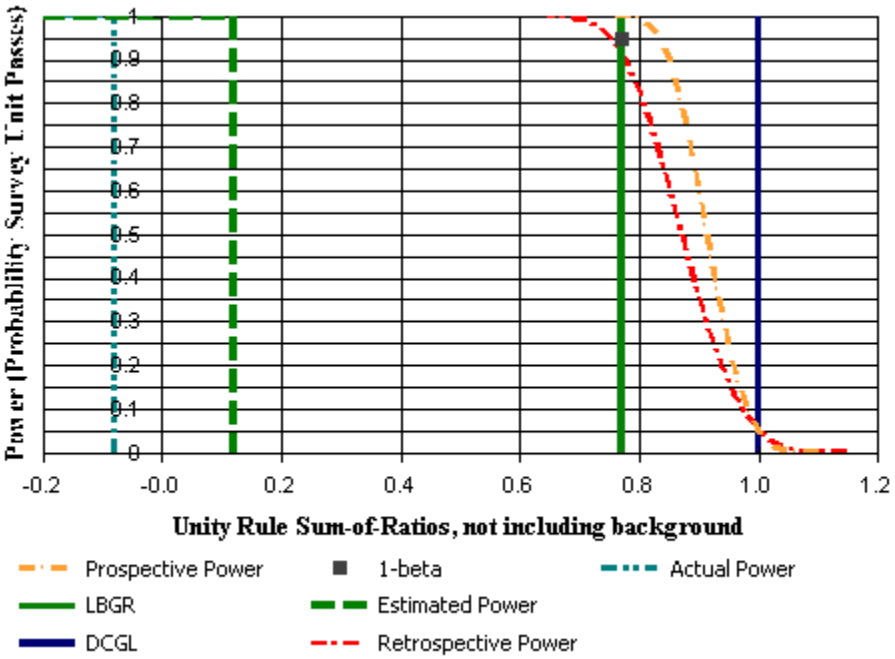
Data	Type	Adjusted Data	Rank	Reference Rank
0.98	S	0.98	11	0
1	S	1	12	0
1.19	S	1.19	13	0
1.22	S	1.22	14	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU7 through 9/AOC-4 C1 SU7/AOC 4		
Report Number:	1		
Survey Unit Samples:	16		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1406	S	0.69	0.74
1407	S	0.9	0.84
1408	S	0.6	0.84
1409	S	0.51	0.49
1410	S	1.62	1.61
1411	S	0.87	0.72
1412	S	0.68	0.65
1413	S	0.64	0.53
1414	S	0.67	0.94
1415	S	0.55	0.64
1416	S	0.53	0.6
1417	S	0.57	0.66
1418	S	0.72	0.61
1419	S	0.56	0.68
1420	S	0.65	0.54
1421	S	0.61	0.67
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1406	S	0.57
1407	S	0.69
1408	S	0.59
1409	S	0.4
1410	S	1.29
1411	S	0.63
1412	S	0.53
1413	S	0.46
1414	S	0.66
1415	S	0.48
1416	S	0.46
1417	S	0.5
1418	S	0.53
1419	S	0.5
1420	S	0.47
1421	S	0.51
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	16	15	N/2=16
Mean (SOR)	0.58	0.66	0.12
Median (SOR)	0.52	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.14
High Value (SOR)	1.29	0.93	N/A
Low Value (SOR)	0.40	0.33	N/A

Statistical Test Summary

Sum of Ranks:	496
Sum of Reference Ranks:	360
Critical Value:	282
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	17	17
0.42	R	1.42	18	18
0.51	R	1.51	19	19
0.57	R	1.57	20	20
0.58	R	1.58	21.5	21.5
0.58	R	1.58	21.5	21.5
0.59	R	1.59	23	23
0.6	R	1.6	24	24
0.64	R	1.64	25	25
0.75	R	1.75	26	26
0.83	R	1.83	27.5	27.5
0.83	R	1.83	27.5	27.5
0.85	R	1.85	29	29
0.87	R	1.87	30	30
0.93	R	1.93	31	31
0.4	S	0.4	1	0
0.46	S	0.46	2.5	0
0.46	S	0.46	2.5	0
0.47	S	0.47	4	0
0.48	S	0.48	5	0
0.5	S	0.5	6.5	0
0.5	S	0.5	6.5	0
0.51	S	0.51	8	0
0.53	S	0.53	9.5	0
0.53	S	0.53	9.5	0

DQA Surface Soil Report

Statistical Test Summary

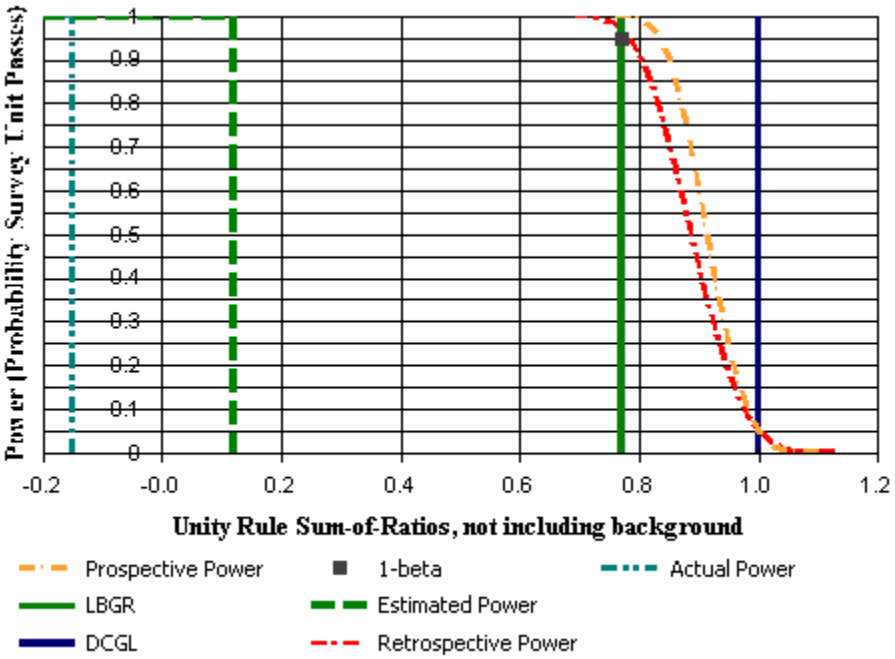
Data	Type	Adjusted Data	Rank	Reference Rank
0.57	S	0.57	11	0
0.59	S	0.59	12	0
0.63	S	0.63	13	0
0.66	S	0.66	14	0
0.69	S	0.69	15	0
1.29	S	1.29	16	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU7 through 9/AOC-4 C1 SU8/AOC 4		
Report Number:	3		
Survey Unit Samples:	15		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1472	S	0.9	0.77
1473	S	0.98	0.69
1474	S	0.1	0.26
1475	S	0.77	0.6
1476	S	0.26	0.19
1477	S	1.06	0.86
1478	S	0.67	0.38
1479	S	0.45	0.42
1480	S	0.75	0.87
1481	S	0.62	0.52
1482	S	0.73	0.9
1483	S	0.66	0.48
1485	S	0.59	0.44
1486	S	0.63	0.44
1487	S	0.67	0.51
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1472	S	0.66
1473	S	0.65
1474	S	0.15
1475	S	0.54
1476	S	0.18
1477	S	0.76
1478	S	0.4
1479	S	0.35
1480	S	0.65
1481	S	0.45
1482	S	0.66
1483	S	0.45
1485	S	0.4
1486	S	0.42
1487	S	0.46
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	15	15	N/2=16
Mean (SOR)	0.48	0.66	0.12
Median (SOR)	0.45	0.60	N/A
Std Dev (SOR)	0.18	0.18	0.14
High Value (SOR)	0.76	0.93	N/A
Low Value (SOR)	0.15	0.33	N/A

Statistical Test Summary

Sum of Ranks:	465
Sum of Reference Ranks:	345
Critical Value:	272
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	16	16
0.42	R	1.42	17	17
0.51	R	1.51	18	18
0.57	R	1.57	19	19
0.58	R	1.58	20.5	20.5
0.58	R	1.58	20.5	20.5
0.59	R	1.59	22	22
0.6	R	1.6	23	23
0.64	R	1.64	24	24
0.75	R	1.75	25	25
0.83	R	1.83	26.5	26.5
0.83	R	1.83	26.5	26.5
0.85	R	1.85	28	28
0.87	R	1.87	29	29
0.93	R	1.93	30	30
0.15	S	0.15	1	0
0.18	S	0.18	2	0
0.35	S	0.35	3	0
0.4	S	0.4	4.5	0
0.4	S	0.4	4.5	0
0.42	S	0.42	6	0
0.45	S	0.45	7.5	0
0.45	S	0.45	7.5	0
0.46	S	0.46	9	0
0.54	S	0.54	10	0

DQA Surface Soil Report

Statistical Test Summary

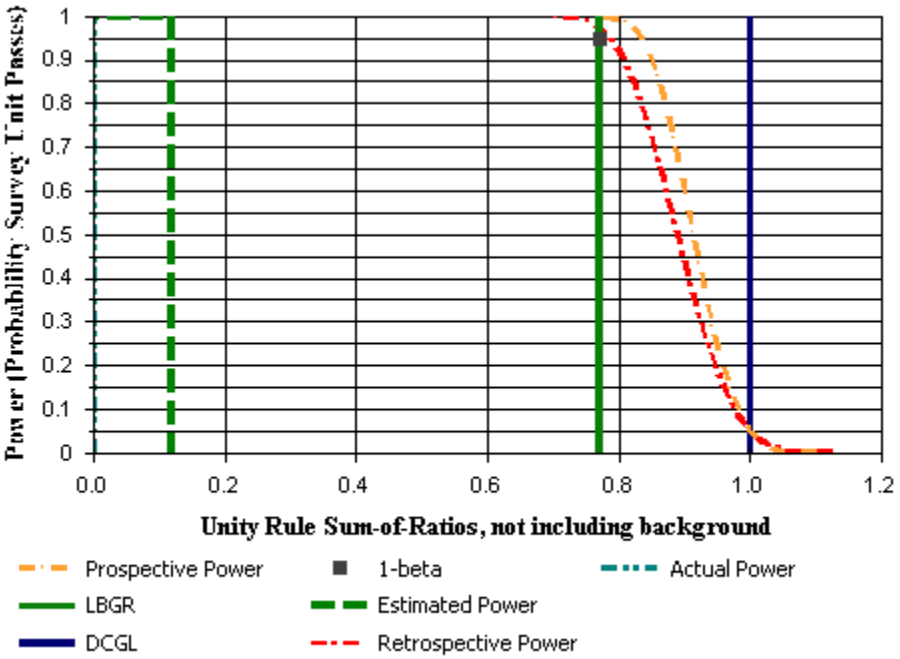
Data	Type	Adjusted Data	Rank	Reference Rank
0.65	S	0.65	11.5	0
0.65	S	0.65	11.5	0
0.66	S	0.66	13.5	0
0.66	S	0.66	13.5	0
0.76	S	0.76	15	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU7 through 9/AOC-4 C1 SU9/AOC 4		
Report Number:	2		
Survey Unit Samples:	16		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1422	S	0.79	1.15
1423	S	0.92	0.53
1424	S	0.81	0.76
1425	S	0.68	0.68
1426	S	1.03	1.26
1427	S	0.79	0.87
1428	S	0.72	1.05
1429	S	0.98	0.42
1430	S	1.3	0.29
1431	S	0.78	0.59
1432	S	0.78	0.98
1433	S	0.99	0.53
1434	S	0.94	0.77
1435	S	0.62	1
1436	S	0.73	0.54
1437	S	0.49	0.41
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1422	S	0.8
1423	S	0.56
1424	S	0.62
1425	S	0.54
1426	S	0.93
1427	S	0.67
1428	S	0.73
1429	S	0.53
1430	S	0.58
1431	S	0.54
1432	S	0.71
1433	S	0.58
1434	S	0.67
1435	S	0.67
1436	S	0.5
1437	S	0.36
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	16	15	N/2=16
Mean (SOR)	0.62	0.66	0.12
Median (SOR)	0.60	0.60	N/A
Std Dev (SOR)	0.13	0.18	0.14
High Value (SOR)	0.93	0.93	N/A
Low Value (SOR)	0.36	0.33	N/A

Statistical Test Summary

Sum of Ranks:	496
Sum of Reference Ranks:	360
Critical Value:	282
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	17	17
0.42	R	1.42	18	18
0.51	R	1.51	19	19
0.57	R	1.57	20	20
0.58	R	1.58	21.5	21.5
0.58	R	1.58	21.5	21.5
0.59	R	1.59	23	23
0.6	R	1.6	24	24
0.64	R	1.64	25	25
0.75	R	1.75	26	26
0.83	R	1.83	27.5	27.5
0.83	R	1.83	27.5	27.5
0.85	R	1.85	29	29
0.87	R	1.87	30	30
0.93	R	1.93	31	31
0.36	S	0.36	1	0
0.5	S	0.5	2	0
0.53	S	0.53	3	0
0.54	S	0.54	4.5	0
0.54	S	0.54	4.5	0
0.56	S	0.56	6	0
0.58	S	0.58	7.5	0
0.58	S	0.58	7.5	0
0.62	S	0.62	9	0
0.67	S	0.67	11	0

DQA Surface Soil Report

Statistical Test Summary

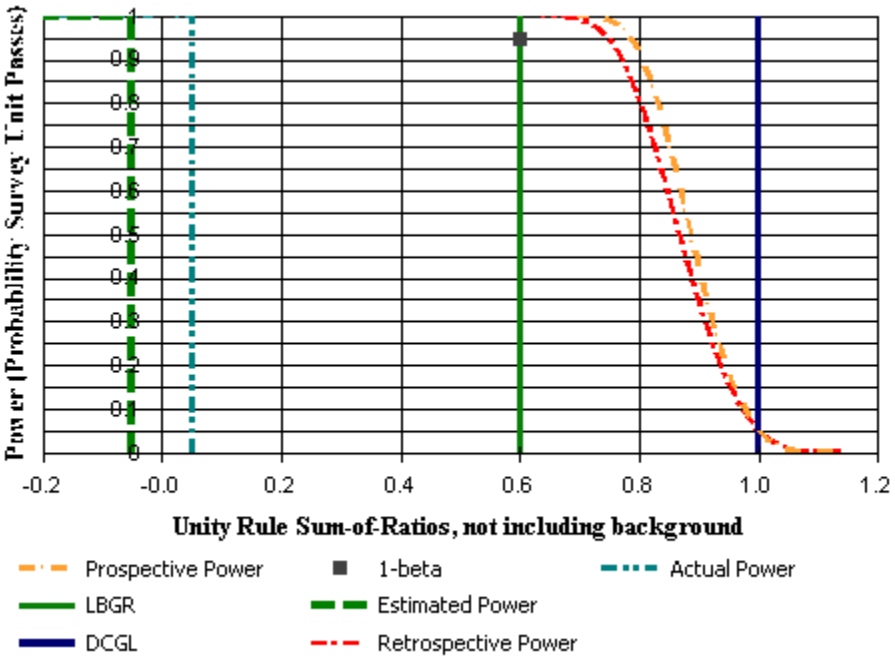
Data	Type	Adjusted Data	Rank	Reference Rank
0.67	S	0.67	11	0
0.67	S	0.67	11	0
0.71	S	0.71	13	0
0.73	S	0.73	14	0
0.8	S	0.8	15	0
0.93	S	0.93	16	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU10, 23, and 24 C1 SU10		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	5	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1574	S	0.63	0.6
1575	S	0.64	1.13
1576	S	0.61	0.93
1577	S	0.67	1.33
1578	S	0.73	0.67
1579	S	1.01	0.68
1580	S	0.68	0.91
1581	S	0.82	0.43
1582	S	0.79	0.13
1583	S	1.23	0.58
1584	S	1.45	1.19
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1574	S	0.49
1575	S	0.73
1576	S	0.63
1577	S	0.84
1578	S	0.56
1579	S	0.66
1580	S	0.65
1581	S	0.48
1582	S	0.33
1583	S	0.69
1584	S	1.04
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.65	0.66	-0.05
Median (SOR)	0.65	0.60	N/A
Std Dev (SOR)	0.19	0.18	0.15
High Value (SOR)	1.04	0.93	N/A
Low Value (SOR)	0.33	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.33	S	0.33	1	0
0.48	S	0.48	2	0
0.49	S	0.49	3	0
0.56	S	0.56	4	0
0.63	S	0.63	5	0
0.65	S	0.65	6	0
0.66	S	0.66	7	0
0.69	S	0.69	8	0
0.73	S	0.73	9	0
0.84	S	0.84	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
1.04	S	1.04	11	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: -0.29

EMC Result: Pass

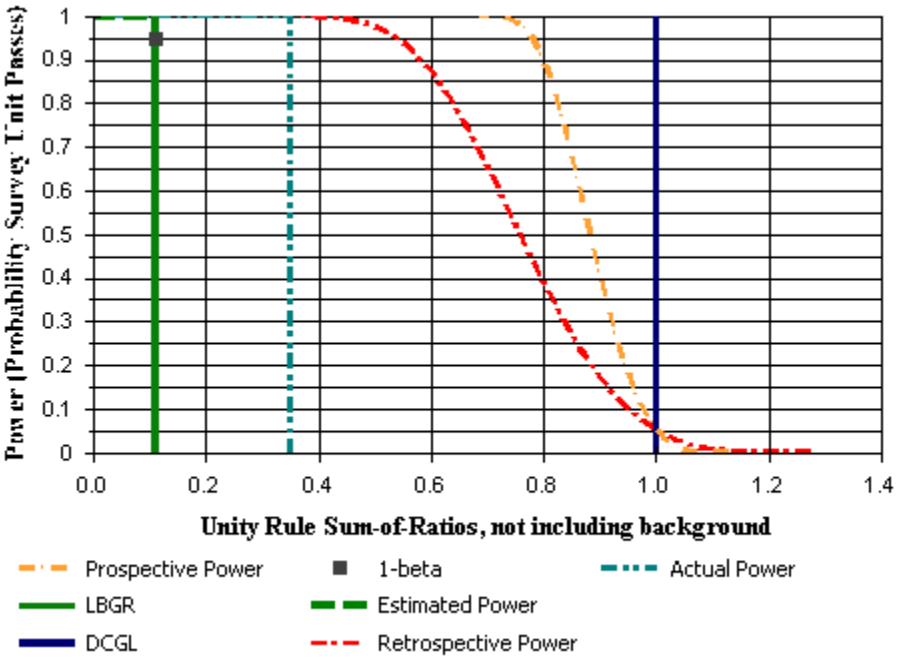
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1347	10	Th-232	.79
1348	10	Th-232	.41
1349	10	Th-232	.69
1350	10	Th-232	.59
1351	10	Th-232	.84
Equation 8-2 Result for Th-232: -0.17			
1347	10	U-238	1.06
1348	10	U-238	.44
1349	10	U-238	.55
1350	10	U-238	.38
1351	10	U-238	1.11
Equation 8-2 Result for U-238: -0.12			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU11 AOC-6		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1488	S	1.2	1.68
1489	S	1.47	1.09
1490	S	1.54	1.06
1491	S	1.35	0.9
1492	S	2.21	0.76
1493	S	0.88	1.02
1494	S	0.89	1.29
1495	S	0.55	0.33
1496	S	2.58	1.53
1497	S	0.34	1.09
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1488	S	1.18
1489	S	1
1490	S	1.01
1491	S	0.87
1492	S	1.11
1493	S	0.77
1494	S	0.89
1495	S	0.34
1496	S	1.59
1497	S	0.61
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=9
Mean (SOR)	0.94	0.66	0.11
Median (SOR)	0.95	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.14
High Value (SOR)	1.59	0.93	N/A
Low Value (SOR)	0.34	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	263
Critical Value:	225
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.34	S	0.34	1	0
0.61	S	0.61	2	0
0.77	S	0.77	3	0
0.87	S	0.87	4	0
0.89	S	0.89	5	0
1	S	1	6	0
1.01	S	1.01	7	0
1.11	S	1.11	8	0
1.18	S	1.18	9	0
1.59	S	1.59	17	0

DQA Surface Soil Report

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.36

EMC Result: Pass

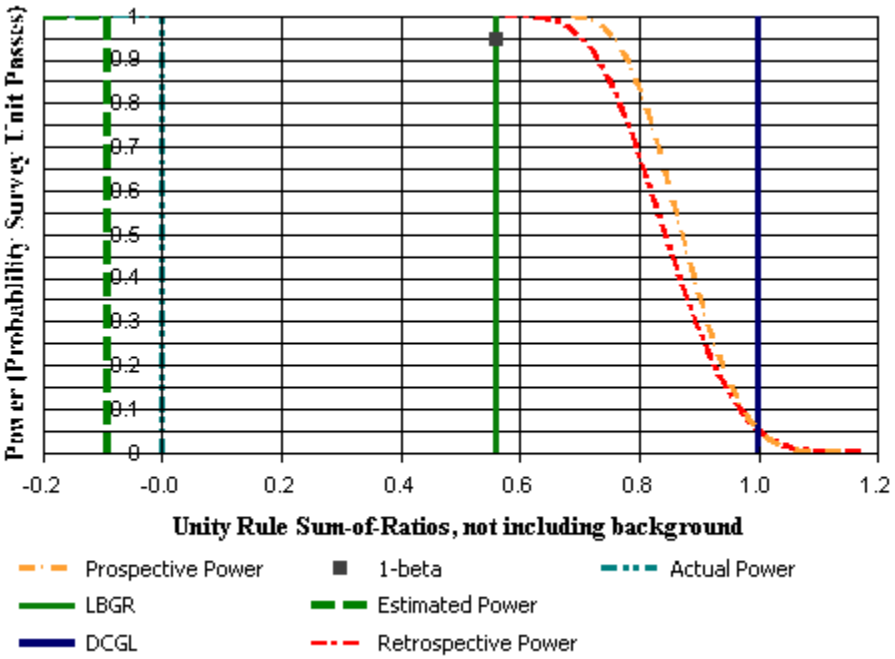
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1498 Judg.	10	Th-232	.91
Equation 8-2 Result for Th-232: 0.09			
1498 Judg.	10	U-238	1.68
Equation 8-2 Result for U-238: 0.27			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU12 AOC-9		
Report Number:	2		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1393	S	1.33	1.05
1396	S	0.41	0.28
1397	S	0.44	0.45
1398	S	0.59	0.64
1399	S	0.82	0.96
1400	S	0.54	0.46
1401	S	0.5	0.95
1402	S	0.56	1
1403	S	0.93	0.83
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1393	S	0.94
1396	S	0.27
1397	S	0.36
1398	S	0.49
1399	S	0.72
1400	S	0.4
1401	S	0.6
1402	S	0.65
1403	S	0.7
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=11
Mean (SOR)	0.57	0.66	-0.09
Median (SOR)	0.60	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.17
High Value (SOR)	0.94	0.93	N/A
Low Value (SOR)	0.27	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.27	S	0.27	1	0
0.36	S	0.36	2	0
0.4	S	0.4	3	0
0.49	S	0.49	4	0
0.6	S	0.6	5	0
0.65	S	0.65	6	0
0.7	S	0.7	7	0
0.72	S	0.72	8	0
0.94	S	0.94	9	0

DQA Surface Soil Report

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: -0.1

EMC Result: Pass

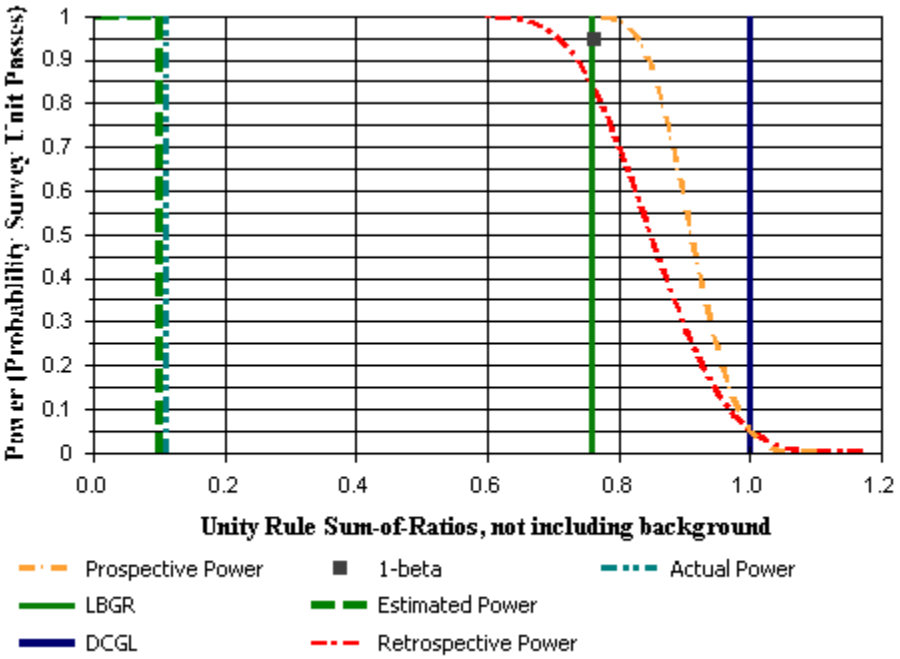
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1404 Judg.	10	Th-232	.95
Equation 8-2 Result for Th-232: 0.01			
1404 Judg.	10	U-238	.51
Equation 8-2 Result for U-238: -0.11			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU13 AOC 8		
Report Number:	1		
Survey Unit Samples:	16		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1499	S	0.47	0.57
1500	S	0.84	0.78
1501	S	0.94	1.33
1502	S	1.17	1.32
1503	S	0.91	1.14
1504	S	0.95	0.98
1505	S	0.92	0.76
1506	S	0.86	1.31
1507	S	0.72	0.96
1508	S	1.2	1.17
1509	S	0.98	0.87
1510	S	0.46	0.16
1511	S	0.44	0.05
1512	S	0.96	0.98
1513	S	0.63	0.69
1514	S	0.67	0.97
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1499	S	0.42
1500	S	0.64
1501	S	0.93
1502	S	1
1503	S	0.83
1504	S	0.77
1505	S	0.66
1506	S	0.89
1507	S	0.68
1508	S	0.95
1509	S	0.73
1510	S	0.23
1511	S	0.17
1512	S	0.78
1513	S	0.53
1514	S	0.67
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	16	15	N/2=15
Mean (SOR)	0.68	0.66	0.1
Median (SOR)	0.71	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.14
High Value (SOR)	1.00	0.93	N/A
Low Value (SOR)	0.17	0.33	N/A

Statistical Test Summary

Sum of Ranks:	496
Sum of Reference Ranks:	360
Critical Value:	282
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	17	17
0.42	R	1.42	18	18
0.51	R	1.51	19	19
0.57	R	1.57	20	20
0.58	R	1.58	21.5	21.5
0.58	R	1.58	21.5	21.5
0.59	R	1.59	23	23
0.6	R	1.6	24	24
0.64	R	1.64	25	25
0.75	R	1.75	26	26
0.83	R	1.83	27.5	27.5
0.83	R	1.83	27.5	27.5
0.85	R	1.85	29	29
0.87	R	1.87	30	30
0.93	R	1.93	31	31
0.17	S	0.17	1	0
0.23	S	0.23	2	0
0.42	S	0.42	3	0
0.53	S	0.53	4	0
0.64	S	0.64	5	0
0.66	S	0.66	6	0
0.67	S	0.67	7	0
0.68	S	0.68	8	0
0.73	S	0.73	9	0
0.77	S	0.77	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
0.78	S	0.78	11	0
0.83	S	0.83	12	0
0.89	S	0.89	13	0
0.93	S	0.93	14	0
0.95	S	0.95	15	0
1	S	1	16	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.1

EMC Result: Pass

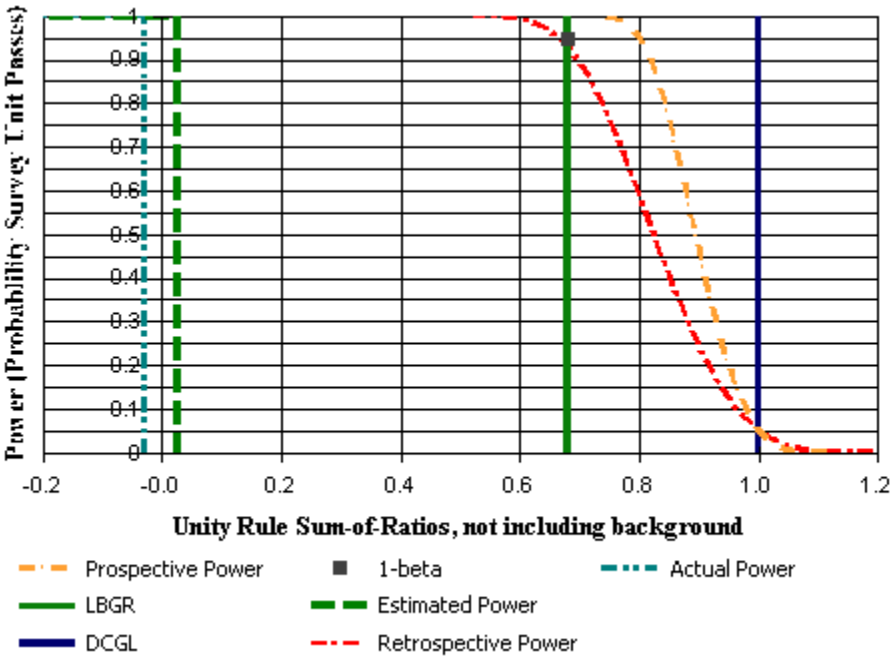
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1515 Judg. **Equation 8-2 Result for Th-232: 0.03**	10	Th-232	.97
1515 Judg. **Equation 8-2 Result for U-238: 0.06**	10	U-238	1.04

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU14/AOC 7		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1460	S	0.38	1.61
1461	S	0.22	1.51
1462	S	0.37	0.66
1463	S	0.13	1.42
1464	S	0.1	1.14
1465	S	0.2	1.1
1467	S	0.46	0.95
1468	S	0.21	0.65
1469	S	0.1	0.06
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1460	S	0.86
1461	S	0.76
1462	S	0.43
1463	S	0.69
1464	S	0.55
1465	S	0.57
1467	S	0.59
1468	S	0.37
1469	S	0.06
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=11
Mean (SOR)	0.54	0.66	0.03
Median (SOR)	0.57	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.14
High Value (SOR)	0.86	0.93	N/A
Low Value (SOR)	0.06	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.06	S	0.06	1	0
0.37	S	0.37	2	0
0.43	S	0.43	3	0
0.55	S	0.55	4	0
0.57	S	0.57	5	0
0.59	S	0.59	6	0
0.69	S	0.69	7	0
0.76	S	0.76	8	0
0.86	S	0.86	9	0

DQA Surface Soil Report

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.24

EMC Result: Pass

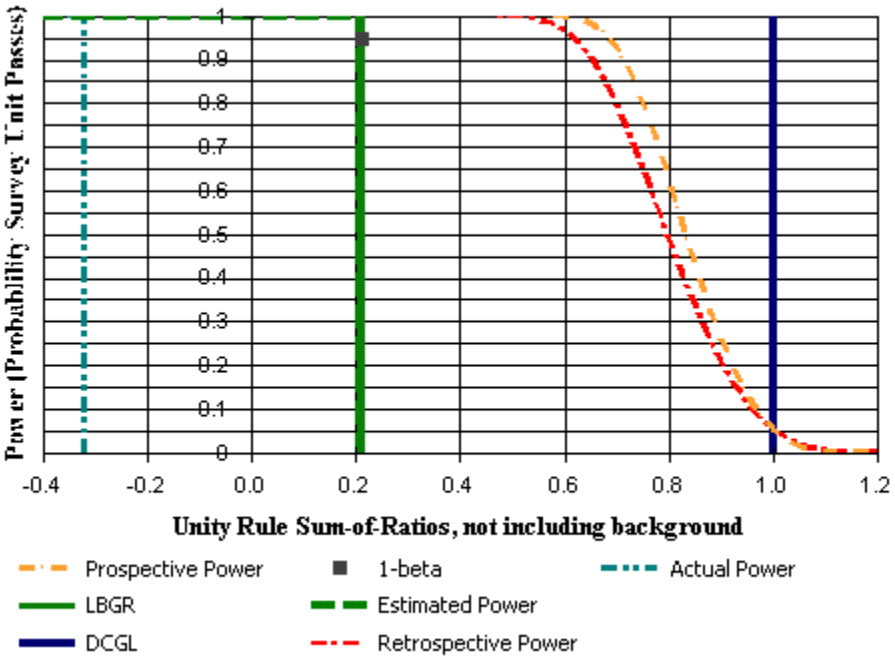
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1471 Judg.	10	Th-232	1.29
Equation 8-2 Result for Th-232: 0.02			
1471 Judg.	10	U-238	1.56
Equation 8-2 Result for U-238: 0.23			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU15 AOC-10		
Report Number:	1		
Survey Unit Samples:	7		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1450	S	0.21	0.19
1451	S	0.34	0.62
1452	S	0.12	0.25
1454	S	1.05	1.11
1455	S	0.31	0.38
1457	S	0.82	0.38
1458	S	0.33	0.25
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1450	S	0.16
1451	S	0.4
1452	S	0.16
1454	S	0.87
1455	S	0.28
1457	S	0.46
1458	S	0.23
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	7	15	N/2=9
Mean (SOR)	0.37	0.66	0.21
Median (SOR)	0.28	0.60	N/A
Std Dev (SOR)	0.25	0.18	0.2
High Value (SOR)	0.87	0.93	N/A
Low Value (SOR)	0.16	0.33	N/A

Statistical Test Summary

Sum of Ranks:	253
Sum of Reference Ranks:	225
Critical Value:	196
Result:	Pass

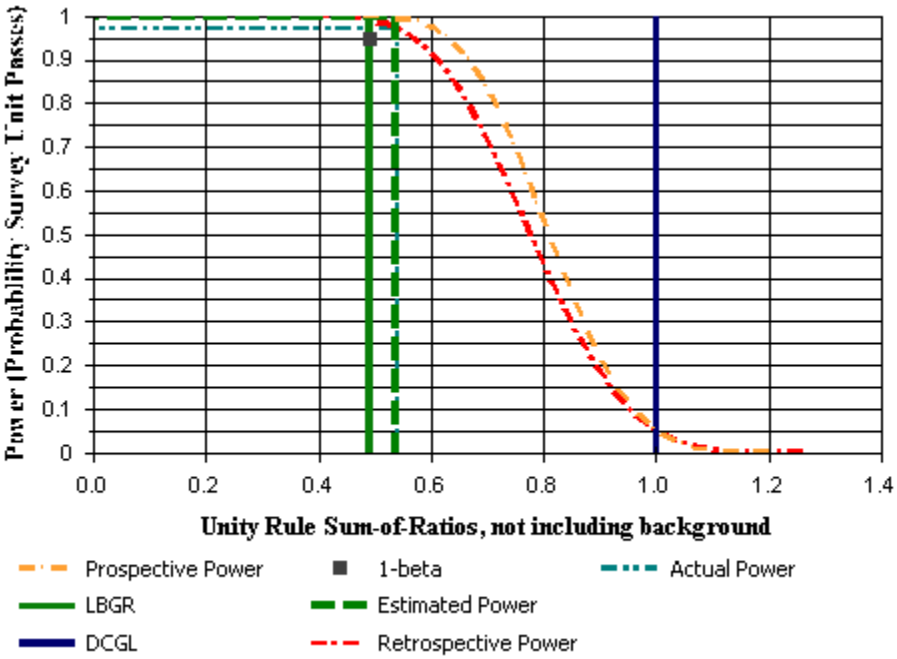
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	8	8
0.42	R	1.42	9	9
0.51	R	1.51	10	10
0.57	R	1.57	11	11
0.58	R	1.58	12.5	12.5
0.58	R	1.58	12.5	12.5
0.59	R	1.59	14	14
0.6	R	1.6	15	15
0.64	R	1.64	16	16
0.75	R	1.75	17	17
0.83	R	1.83	18.5	18.5
0.83	R	1.83	18.5	18.5
0.85	R	1.85	20	20
0.87	R	1.87	21	21
0.93	R	1.93	22	22
0.16	S	0.16	1.5	0
0.16	S	0.16	1.5	0
0.23	S	0.23	3	0
0.28	S	0.28	4	0
0.4	S	0.4	5	0
0.46	S	0.46	6	0
0.87	S	0.87	7	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU16/AOC 11 EMC DQA		
Report Number:	1		
Survey Unit Samples:	18		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1373	S	1.18	1.67
1374	S	1.14	1.05
1375	S	1.17	1.85
1376	S	1.14	1.67
1377	S	1.03	1.38
1378	S	0.78	0.68
1379	S	1.71	1.42
1380	S	0.57	0.62
1381	S	0.95	1.12
1382	S	1.13	1.81
1383	S	4.17	1.29
1384	S	1.26	1.74
1385	S	0.81	0.62
1386	S	1.51	1.34
1387	S	2.23	1.6
1388	S	1.23	1.86
1389	S	0.94	1.28
1390	S	1.12	0.94
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1373	S	1.17
1374	S	0.87
1375	S	1.24
1376	S	1.15
1377	S	0.98
1378	S	0.58
1379	S	1.24
1380	S	0.48
1381	S	0.84
1382	S	1.21
1383	S	2.02
1384	S	1.23
1385	S	0.56
1386	S	1.13
1387	S	1.5
1388	S	1.27
1389	S	0.91
1390	S	0.81
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	18	15	N/2=18
Mean (SOR)	1.07	0.66	0.54
Median (SOR)	1.14	0.60	N/A
Std Dev (SOR)	0.37	0.18	0.33
High Value (SOR)	2.02	0.93	N/A
Low Value (SOR)	0.48	0.33	N/A

Statistical Test Summary

Sum of Ranks:	561
Sum of Reference Ranks:	373
Critical Value:	300
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	17	17
0.42	R	1.42	18	18
0.51	R	1.51	20	20
0.57	R	1.57	21	21
0.58	R	1.58	22.5	22.5
0.58	R	1.58	22.5	22.5
0.59	R	1.59	24	24
0.6	R	1.6	25	25
0.64	R	1.64	26	26
0.75	R	1.75	27	27
0.83	R	1.83	28.5	28.5
0.83	R	1.83	28.5	28.5
0.85	R	1.85	30	30
0.87	R	1.87	31	31
0.93	R	1.93	32	32
0.48	S	0.48	1	0
0.56	S	0.56	2	0
0.58	S	0.58	3	0
0.81	S	0.81	4	0
0.84	S	0.84	5	0
0.87	S	0.87	6	0
0.91	S	0.91	7	0
0.98	S	0.98	8	0
1.13	S	1.13	9	0
1.15	S	1.15	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
1.17	S	1.17	11	0
1.21	S	1.21	12	0
1.23	S	1.23	13	0
1.24	S	1.24	14.5	0
1.24	S	1.24	14.5	0
1.27	S	1.27	16	0
1.5	S	1.5	19	0
2.02	S	2.02	33	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.97

EMC Result: Pass

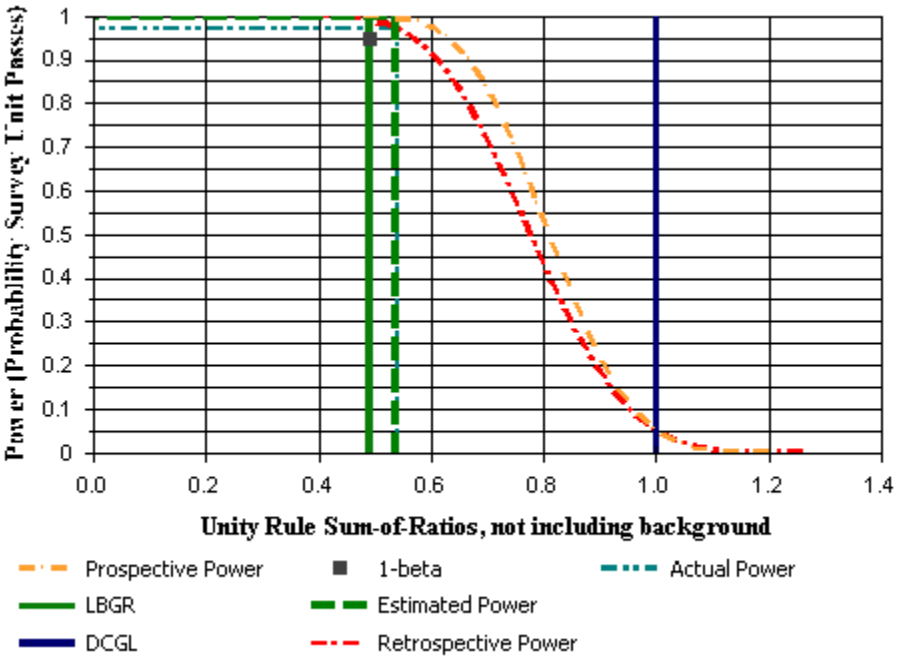
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
S1383	10	Th-232	4.17
Equation 8-2 Result for Th-232: 0.75			
S1383	10	U-238	1.29
Equation 8-2 Result for U-238: 0.21			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU16/AOC 11 Post RA EMC DQA		
Report Number:	2		
Survey Unit Samples:	18		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1373	S	1.18	1.67
1374	S	1.14	1.05
1375	S	1.17	1.85
1376	S	1.14	1.67
1377	S	1.03	1.38
1378	S	0.78	0.68
1379	S	1.71	1.42
1380	S	0.57	0.62
1381	S	0.95	1.12
1382	S	1.13	1.81
1383	S	4.17	1.29
1384	S	1.26	1.74
1385	S	0.81	0.62
1386	S	1.51	1.34
1387	S	2.23	1.6
1388	S	1.23	1.86
1389	S	0.94	1.28
1390	S	1.12	0.94
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1373	S	1.17
1374	S	0.87
1375	S	1.24
1376	S	1.15
1377	S	0.98
1378	S	0.58
1379	S	1.24
1380	S	0.48
1381	S	0.84
1382	S	1.21
1383	S	2.02
1384	S	1.23
1385	S	0.56
1386	S	1.13
1387	S	1.5
1388	S	1.27
1389	S	0.91
1390	S	0.81
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	18	15	N/2=18
Mean (SOR)	1.07	0.66	0.54
Median (SOR)	1.14	0.60	N/A
Std Dev (SOR)	0.37	0.18	0.33
High Value (SOR)	2.02	0.93	N/A
Low Value (SOR)	0.48	0.33	N/A

Statistical Test Summary

Sum of Ranks:	561
Sum of Reference Ranks:	373
Critical Value:	300
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	17	17
0.42	R	1.42	18	18
0.51	R	1.51	20	20
0.57	R	1.57	21	21
0.58	R	1.58	22.5	22.5
0.58	R	1.58	22.5	22.5
0.59	R	1.59	24	24
0.6	R	1.6	25	25
0.64	R	1.64	26	26
0.75	R	1.75	27	27
0.83	R	1.83	28.5	28.5
0.83	R	1.83	28.5	28.5
0.85	R	1.85	30	30
0.87	R	1.87	31	31
0.93	R	1.93	32	32
0.48	S	0.48	1	0
0.56	S	0.56	2	0
0.58	S	0.58	3	0
0.81	S	0.81	4	0
0.84	S	0.84	5	0
0.87	S	0.87	6	0
0.91	S	0.91	7	0
0.98	S	0.98	8	0
1.13	S	1.13	9	0
1.15	S	1.15	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
1.17	S	1.17	11	0
1.21	S	1.21	12	0
1.23	S	1.23	13	0
1.24	S	1.24	14.5	0
1.24	S	1.24	14.5	0
1.27	S	1.27	16	0
1.5	S	1.5	19	0
2.02	S	2.02	33	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.55

EMC Result: Pass

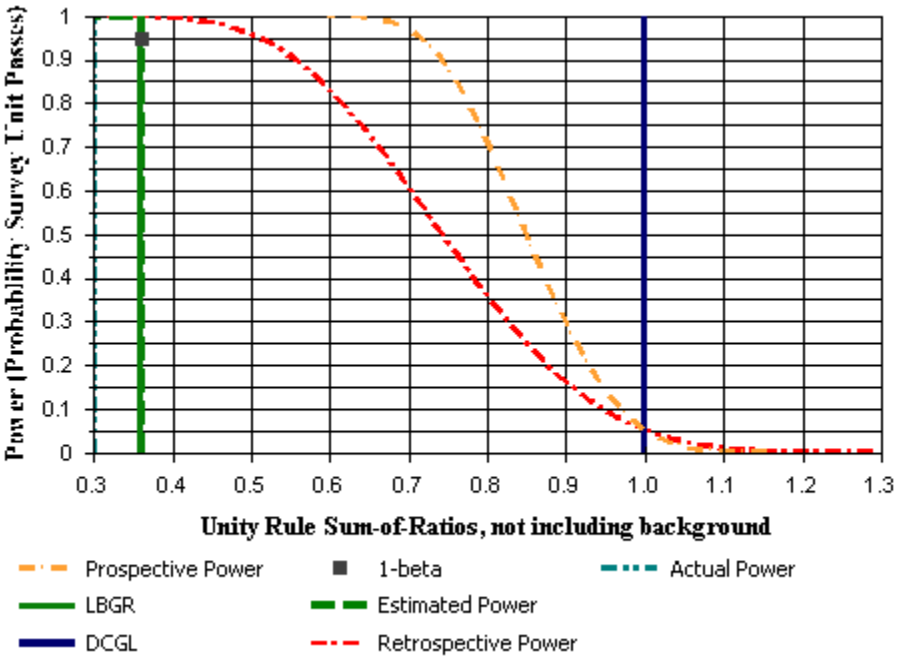
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1517 post RA of 1383	10	Th-232	1.8
Equation 8-2 Result for Th-232: 0.28			
1517 post RA of 1383	10	U-238	1.51
Equation 8-2 Result for U-238: 0.27			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU 17/AOC 12		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
0431S1363	S	0.76	0.46
0431S1364	S	0.91	0.59
0431S1365	S	0.72	0.58
0431S1366	S	1.36	1.16
0431S1367	S	1.99	1.9
0431S1368	S	1.18	1.6
0431S1369	S	1.59	1.58
0431S1370	S	1.08	0.93
0431S1371	S	1.05	1.76
0431S1372	S	1.2	0.76
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
0431S1363	S	0.47
0431S1364	S	0.58
0431S1365	S	0.51
0431S1366	S	1
0431S1367	S	1.55
0431S1368	S	1.13
0431S1369	S	1.27
0431S1370	S	0.8
0431S1371	S	1.16
0431S1372	S	0.76
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.92	0.66	0.36
Median (SOR)	0.90	0.60	N/A
Std Dev (SOR)	0.36	0.18	0.19
High Value (SOR)	1.55	0.93	N/A
Low Value (SOR)	0.47	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	267
Critical Value:	225
Result:	Pass

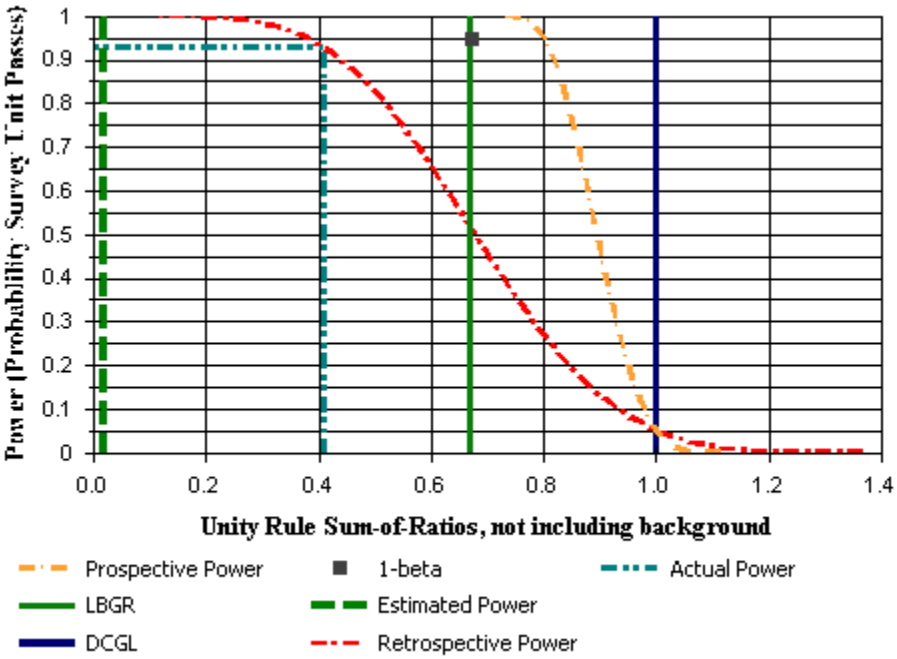
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.47	S	0.47	1	0
0.51	S	0.51	2	0
0.58	S	0.58	3	0
0.76	S	0.76	4	0
0.8	S	0.8	5	0
1	S	1	6	0
1.13	S	1.13	7	0
1.16	S	1.16	8	0
1.27	S	1.27	9	0
1.55	S	1.55	13	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU18 Building B-911 sub-loading dock soil		
Report Number:	1		
Survey Unit Samples:	17		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1557	S	1.08	1.16
1558	S	1.26	0.79
1559	S	1.26	1.31
1560	S	1.21	1.18
1561	S	1.88	2.66
1562	S	1.28	1.41
1563	S	1.73	1.63
1564	S	1.37	1.42
1565	S	0.63	1.44
1566	S	1.14	0.69
1567	S	1.24	1.17
1568	S	1.28	1.26
1569	S	0.88	1.1
1570	S	0.96	0.61
1571	S	2.32	4.47
1572	S	1.19	1.47
1573	S	1.27	1.34
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)	
1557	S	0.9	
1558	S	0.79	
1559	S	1.03	
1560	S	0.95	
1561	S	1.86	Location remediated,
1562	S	1.08	see post-RA sample 1644
1563	S	1.34	
1564	S	1.12	
1565	S	0.87	
1566	S	0.71	
1567	S	0.96	
1568	S	1.01	
1569	S	0.8	
1570	S	0.61	
1571	S	2.83	Location remediated,
1572	S	1.08	see post-RA sample 1585
1573	S	1.05	
43	R	0.58	
44	R	0.33	
45	R	0.51	
46	R	0.64	
47	R	0.87	
48	R	0.93	
49	R	0.83	
50	R	0.83	
51	R	0.58	
52	R	0.85	
53	R	0.42	
54	R	0.59	
55	R	0.6	
56	R	0.57	
57	R	0.75	

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	17	15	N/2=11
Mean (SOR)	1.12	0.66	0.02
Median (SOR)	1.01	0.60	N/A
Std Dev (SOR)	0.52	0.18	0.14
High Value (SOR)	2.83	0.93	N/A
Low Value (SOR)	0.61	0.33	N/A

Statistical Test Summary

Sum of Ranks:	528
Sum of Reference Ranks:	346
Critical Value:	291
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	17	17
0.51	R	1.51	18	18
0.57	R	1.57	19	19
0.58	R	1.58	20.5	20.5
0.58	R	1.58	20.5	20.5
0.59	R	1.59	22	22
0.6	R	1.6	23	23
0.64	R	1.64	24	24
0.75	R	1.75	25	25
0.83	R	1.83	26.5	26.5
0.83	R	1.83	26.5	26.5
0.85	R	1.85	28	28
0.87	R	1.87	30	30
0.93	R	1.93	31	31
0.61	S	0.61	1	0
0.71	S	0.71	2	0
0.79	S	0.79	3	0
0.8	S	0.8	4	0
0.87	S	0.87	5	0
0.9	S	0.9	6	0
0.95	S	0.95	7	0
0.96	S	0.96	8	0
1.01	S	1.01	9	0
1.03	S	1.03	10	0

DQA Surface Soil Report

Statistical Test Summary

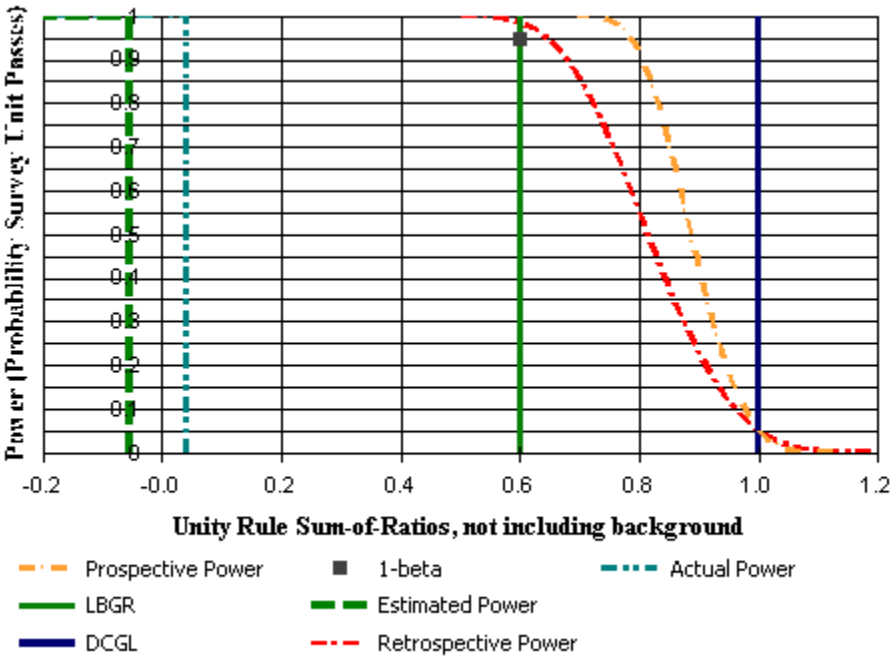
Data	Type	Adjusted Data	Rank	Reference Rank
1.05	S	1.05	11	0
1.08	S	1.08	12.5	0
1.08	S	1.08	12.5	0
1.12	S	1.12	14	0
1.34	S	1.34	16	0
1.86	S	1.86	29	0
2.83	S	2.83	32	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU19 Waste Staging Area		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1623	S	0.72	0.95
1624	S	0.39	0.58
1625	S	0.58	0.62
1626	S	0.38	1.12
1627	S	1.19	1.44
1628	S	0.78	1.32
1629	S	0.25	1.01
1630	S	0.59	0.72
1631	S	1.33	1.61
1632	S	0.35	1.41
1633	S	0.42	0.47
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1623	S	0.68
1624	S	0.4
1625	S	0.48
1626	S	0.64
1627	S	1.06
1628	S	0.87
1629	S	0.55
1630	S	0.53
1631	S	1.19
1632	S	0.76
1633	S	0.36
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.68	0.66	-0.06
Median (SOR)	0.64	0.60	N/A
Std Dev (SOR)	0.27	0.18	0.15
High Value (SOR)	1.19	0.93	N/A
Low Value (SOR)	0.36	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.36	S	0.36	1	0
0.4	S	0.4	2	0
0.48	S	0.48	3	0
0.53	S	0.53	4	0
0.55	S	0.55	5	0
0.64	S	0.64	6	0
0.68	S	0.68	7	0
0.76	S	0.76	8	0
0.87	S	0.87	9	0
1.06	S	1.06	10	0

DQA Surface Soil Report

Statistical Test Summary

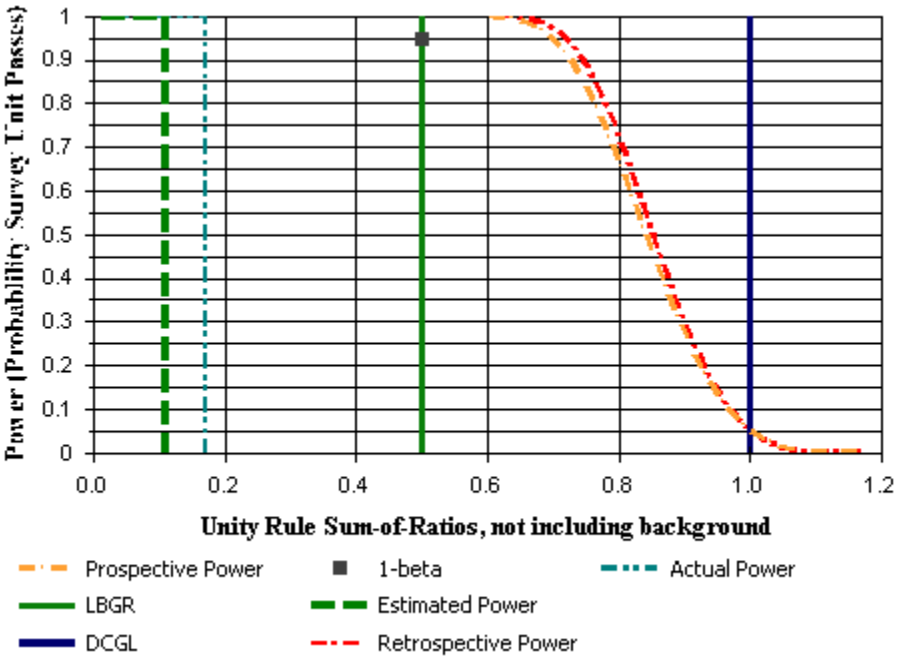
Data	Type	Adjusted Data	Rank	Reference Rank
1.19	S	1.19	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU20/AOC 20		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1438	S	1	1.13
1439	S	0.34	0.69
1441	S	0.87	1
1442	S	0.78	1.15
1443	S	0.91	1.16
1444	S	0.56	0.52
1446	S	1.1	1.33
1447	S	0.65	1.24
1448	S	0.61	1.19
1449	S	0.38	0.59
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1438	S	0.86
1439	S	0.43
1441	S	0.75
1442	S	0.79
1443	S	0.84
1444	S	0.43
1446	S	0.98
1447	S	0.79
1448	S	0.75
1449	S	0.4
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.70	0.66	0.11
Median (SOR)	0.77	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.23
High Value (SOR)	0.98	0.93	N/A
Low Value (SOR)	0.40	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.4	S	0.4	1	0
0.43	S	0.43	2.5	0
0.43	S	0.43	2.5	0
0.75	S	0.75	4.5	0
0.75	S	0.75	4.5	0
0.79	S	0.79	6.5	0
0.79	S	0.79	6.5	0
0.84	S	0.84	8	0
0.86	S	0.86	9	0
0.98	S	0.98	10	0

DQA Surface Soil Report

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.84

EMC Result: Pass

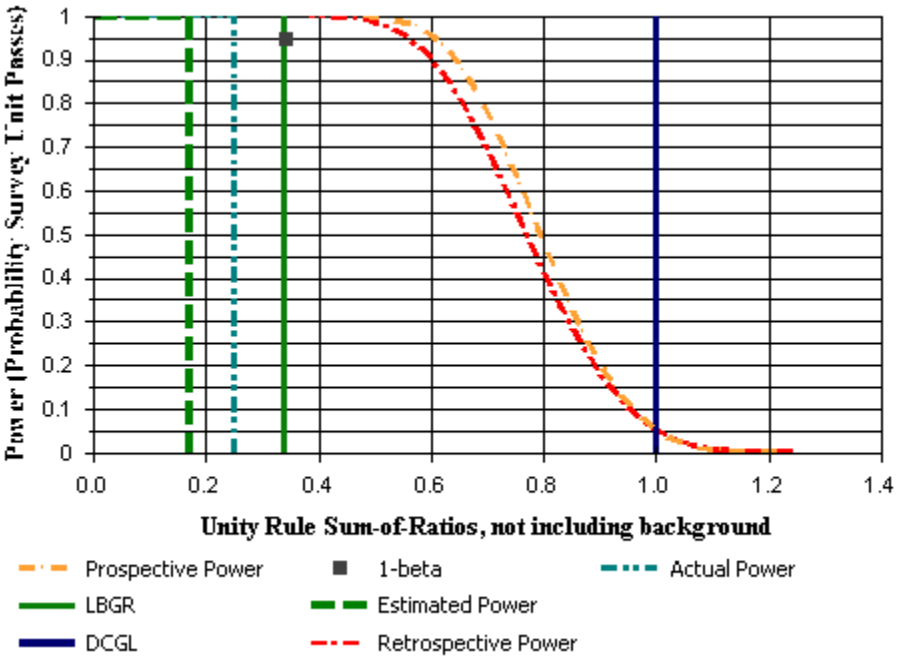
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1405	5	Th-232	4.58
Equation 8-2 Result for Th-232: 0.59			
1405	5	U-238	1.7
Equation 8-2 Result for U-238: 0.24			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU21/AOC 21		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	2	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1609	S	0.8	1.22
1610	S	0.88	0.91
1611	S	3.23	0.97
1612	S	1	0.94
1613	S	3.65	1.14
1614	S	1.01	1.1
1615	S	1.1	1.03
1616	S	2.06	1.33
1617	S	0.99	1.01
1618	S	1.03	1.57
1619	S	1.32	1.11
1620	S	1.04	1.09
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1609	S	0.83
1610	S	0.72
1611	S	1.55
1612	S	0.77
1613	S	1.78
1614	S	0.85
1615	S	0.85
1616	S	1.31
1617	S	0.8
1618	S	1.07
1619	S	0.96
1620	S	0.85
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=13
Mean (SOR)	1.03	0.66	0.17
Median (SOR)	0.85	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.3
High Value (SOR)	1.78	0.93	N/A
Low Value (SOR)	0.72	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	287
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.72	S	0.72	1	0
0.77	S	0.77	2	0
0.8	S	0.8	3	0
0.83	S	0.83	4	0
0.85	S	0.85	6	0
0.85	S	0.85	6	0
0.85	S	0.85	6	0
0.96	S	0.96	8	0
1.07	S	1.07	9	0
1.31	S	1.31	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
1.55	S	1.55	14	0
1.78	S	1.78	22	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.33

EMC Result: Pass

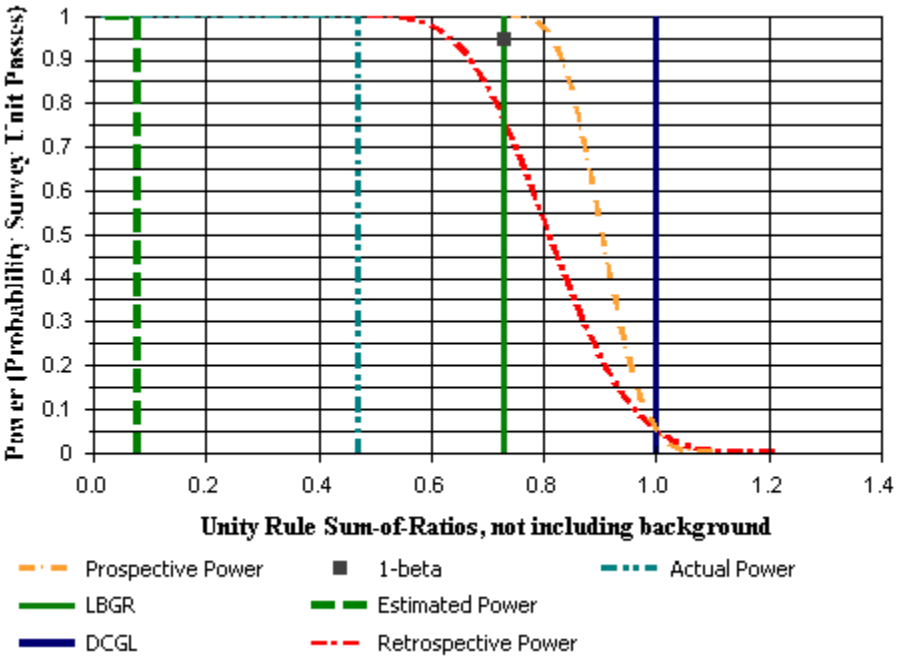
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1621J N. Exc.	10	Th-232	2.05
1622J S. Exc	10	Th-232	.95
Equation 8-2 Result for Th-232: 0.24			
1621J N. Exc.	10	U-238	.91
1622J S. Exc	10	U-238	1.19
Equation 8-2 Result for U-238: 0.09			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU22 Building B-911 Interior sub-floor soil		
Report Number:	1		
Survey Unit Samples:	14		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1519	S	1.44	1.27
1520	S	0.6	0.54
1521	S	1.31	1.58
1522	S	1.44	1.43
1523	S	0.56	0.42
1524	S	1.4	1.17
1525	S	1.14	1.32
1526	S	1.66	1.09
1527	S	1.33	1.52
1528	S	1.75	1.86
1529	S	1.48	1.56
1530	S	1.6	1.64
1531	S	1.15	1.05
1532	S	0.96	1.45
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1519	S	1.07
1520	S	0.45
1521	S	1.17
1522	S	1.15
1523	S	0.38
1524	S	1.01
1525	S	0.99
1526	S	1.07
1527	S	1.15
1528	S	1.45
1529	S	1.22
1530	S	1.3
1531	S	0.87
1532	S	0.99
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	14	15	N/2=13
Mean (SOR)	1.02	0.66	0.08
Median (SOR)	1.07	0.60	N/A
Std Dev (SOR)	0.29	0.18	0.14
High Value (SOR)	1.45	0.93	N/A
Low Value (SOR)	0.38	0.33	N/A

Statistical Test Summary

Sum of Ranks:	435
Sum of Reference Ranks:	328
Critical Value:	263
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	14	14
0.42	R	1.42	15	15
0.51	R	1.51	17	17
0.57	R	1.57	18	18
0.58	R	1.58	19.5	19.5
0.58	R	1.58	19.5	19.5
0.59	R	1.59	21	21
0.6	R	1.6	22	22
0.64	R	1.64	23	23
0.75	R	1.75	24	24
0.83	R	1.83	25.5	25.5
0.83	R	1.83	25.5	25.5
0.85	R	1.85	27	27
0.87	R	1.87	28	28
0.93	R	1.93	29	29
0.38	S	0.38	1	0
0.45	S	0.45	2	0
0.87	S	0.87	3	0
0.99	S	0.99	4.5	0
0.99	S	0.99	4.5	0
1.01	S	1.01	6	0
1.07	S	1.07	7.5	0
1.07	S	1.07	7.5	0
1.15	S	1.15	9.5	0
1.15	S	1.15	9.5	0

DQA Surface Soil Report

Statistical Test Summary

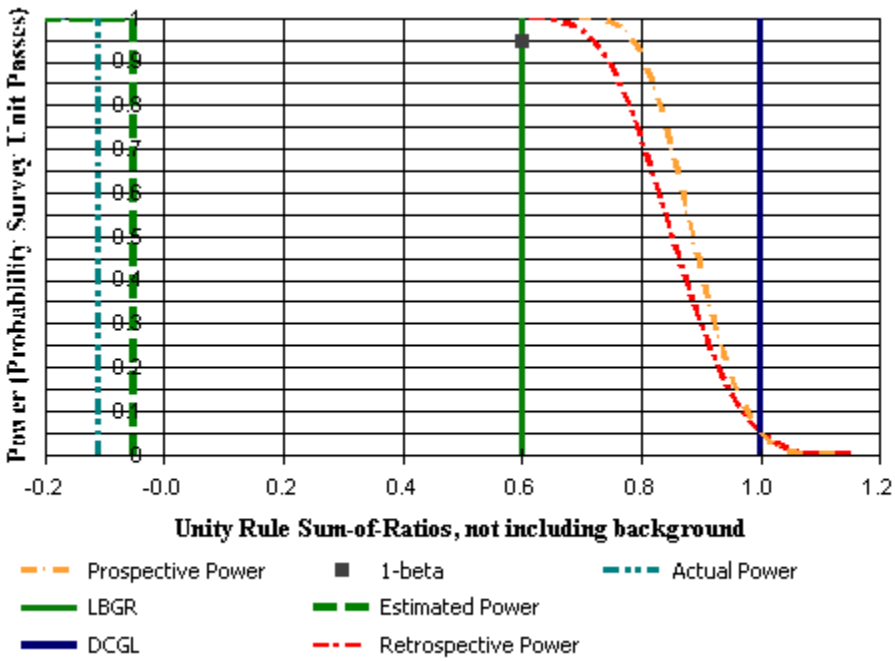
Data	Type	Adjusted Data	Rank	Reference Rank
1.17	S	1.17	11	0
1.22	S	1.22	12	0
1.3	S	1.3	13	0
1.45	S	1.45	16	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU10, 23, and 24 C1 SU23		
Report Number:	2		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1597	S	0.55	0.57
1598	S	0.46	0.65
1599	S	0.66	0.56
1600	S	0.65	0.58
1601	S	0.67	0.91
1602	S	0.56	0.28
1603	S	0.68	0.54
1604	S	0.62	0.63
1605	S	0.78	0.56
1606	S	1.11	0.96
1607	S	1.31	1.38
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1597	S	0.45
1598	S	0.45
1599	S	0.48
1600	S	0.49
1601	S	0.64
1602	S	0.32
1603	S	0.48
1604	S	0.5
1605	S	0.52
1606	S	0.82
1607	S	1.08
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.57	0.66	-0.05
Median (SOR)	0.49	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.15
High Value (SOR)	1.08	0.93	N/A
Low Value (SOR)	0.32	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.32	S	0.32	1	0
0.45	S	0.45	2.5	0
0.45	S	0.45	2.5	0
0.48	S	0.48	4.5	0
0.48	S	0.48	4.5	0
0.49	S	0.49	6	0
0.5	S	0.5	7	0
0.52	S	0.52	8	0
0.64	S	0.64	9	0
0.82	S	0.82	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
1.08	S	1.08	11	0

Elevated Measurement Comparison (EMC)

Sum of All Contaminants: 0.33

EMC Result: Pass

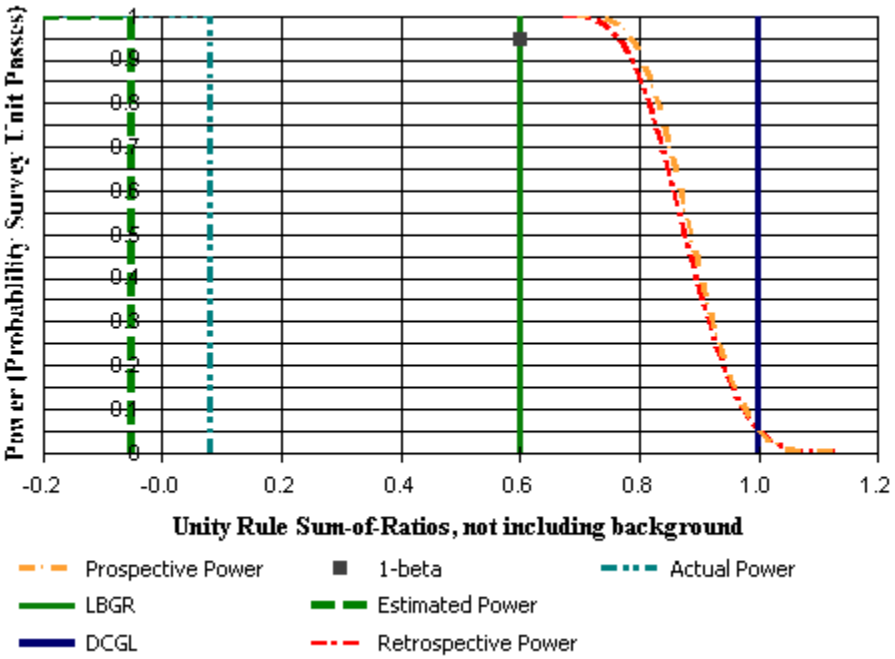
EMC Description	Area (m²)	Contaminant	Average Concentration (pCi/g)
1608	1	Th-232	4.2
Equation 8-2 Result for Th-232: 0.4			
1608	1	U-238	.66
Equation 8-2 Result for U-238: -0.07			

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay Depot Class 1 Soils		
Planner(s):	Vitkus		
Survey Unit Name:	C1 SU10, 23, and 24 C1 SU24		
Report Number:	3		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1586	S	0.91	1.58
1587	S	0.57	0.53
1588	S	0.78	1.21
1589	S	0.89	0.96
1590	S	0.59	0.75
1591	S	0.84	0.73
1592	S	0.66	0.99
1593	S	1.46	0.62
1594	S	0.64	0.78
1595	S	0.64	0.72
1596	S	1.1	0.82
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1586	S	1.03
1587	S	0.44
1588	S	0.82
1589	S	0.74
1590	S	0.54
1591	S	0.62
1592	S	0.68
1593	S	0.79
1594	S	0.58
1595	S	0.55
1596	S	0.75
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.69	0.66	-0.05
Median (SOR)	0.68	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.15
High Value (SOR)	1.03	0.93	N/A
Low Value (SOR)	0.44	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.44	S	0.44	1	0
0.54	S	0.54	2	0
0.55	S	0.55	3	0
0.58	S	0.58	4	0
0.62	S	0.62	5	0
0.68	S	0.68	6	0
0.74	S	0.74	7	0
0.75	S	0.75	8	0
0.79	S	0.79	9	0
0.82	S	0.82	10	0

DQA Surface Soil Report

Statistical Test Summary

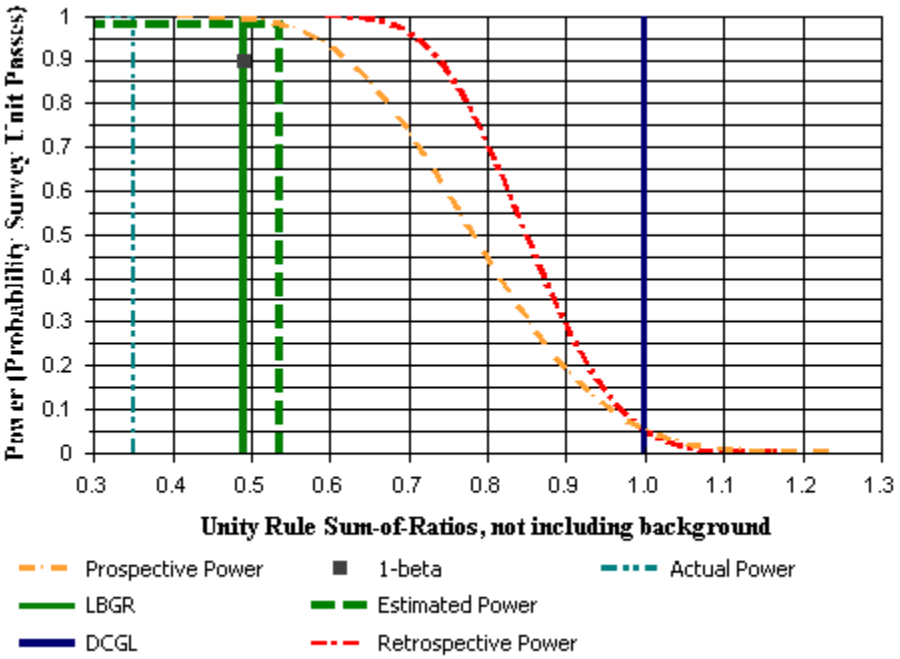
Data	Type	Adjusted Data	Rank	Reference Rank
1.03	S	1.03	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU1		
Report Number:	1		
Survey Unit Samples:	15		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
420	S	1.13	1.72
421	S	1.01	1.33
422	S	1.19	2.02
423	S	2	1.59
424	S	1.32	1.32
425	S	1.05	1.28
426	S	0.6	1.2
427	S	0.63	1.13
428	S	1.02	1.55
429	S	0.93	1.15
430	S	0.73	1.06
431	S	0.93	1.55
432	S	1.06	1.44
433	S	0.44	1.29
434	S	0.71	0.69
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
420	S	1.17
421	S	0.95
422	S	1.33
423	S	1.41
424	S	1.06
425	S	0.94
426	S	0.75
427	S	0.73
428	S	1.06
429	S	0.84
430	S	0.73
431	S	1.03
432	S	1.02
433	S	0.74
434	S	0.56
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	15	15	N/2=14
Mean (SOR)	0.95	0.66	0.54
Median (SOR)	0.95	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.33
High Value (SOR)	1.41	0.93	N/A
Low Value (SOR)	0.56	0.33	N/A

Statistical Test Summary

Sum of Ranks:	465
Sum of Reference Ranks:	343
Critical Value:	272
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	14	14
0.42	R	1.42	17	17
0.51	R	1.51	18	18
0.57	R	1.57	19	19
0.58	R	1.58	20.5	20.5
0.58	R	1.58	20.5	20.5
0.59	R	1.59	22	22
0.6	R	1.6	23	23
0.64	R	1.64	24	24
0.75	R	1.75	25	25
0.83	R	1.83	26.5	26.5
0.83	R	1.83	26.5	26.5
0.85	R	1.85	28	28
0.87	R	1.87	29	29
0.93	R	1.93	30	30
0.56	S	0.56	1	0
0.73	S	0.73	2.5	0
0.73	S	0.73	2.5	0
0.74	S	0.74	4	0
0.75	S	0.75	5	0
0.84	S	0.84	6	0
0.94	S	0.94	7	0
0.95	S	0.95	8	0
1.02	S	1.02	9	0
1.03	S	1.03	10	0

DQA Surface Soil Report

Statistical Test Summary

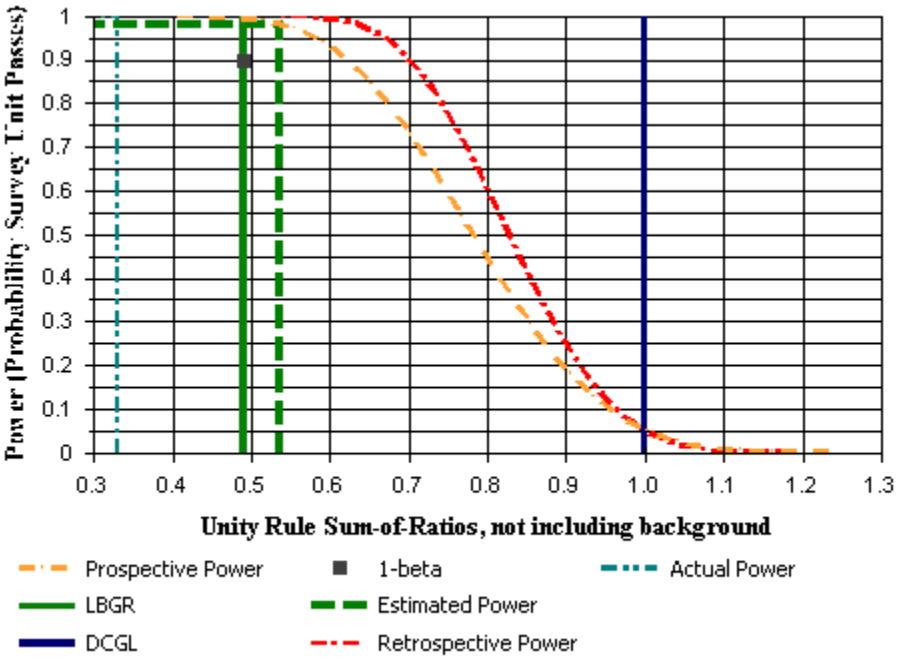
Data	Type	Adjusted Data	Rank	Reference Rank
1.06	S	1.06	11.5	0
1.06	S	1.06	11.5	0
1.17	S	1.17	13	0
1.33	S	1.33	15	0
1.41	S	1.41	16	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU2		
Report Number:	1		
Survey Unit Samples:	13		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
435	S	1.09	1.15
436	S	1.11	0.53
437	S	1	0.95
438	S	1.14	1.93
439	S	0.71	0.6
440	S	1.23	1.45
441	S	1.06	1.67
442	S	0.89	1.37
443	S	1.33	1.19
444	S	1.09	1.21
445	S	1.3	1.83
446	S	0.57	0.68
448	S	0.56	1.08
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
435	S	0.9
436	S	0.62
437	S	0.78
438	S	1.27
439	S	0.52
440	S	1.08
441	S	1.12
442	S	0.93
443	S	1
444	S	0.93
445	S	1.28
446	S	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
448	S	0.68
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	13	15	N/2=14
Mean (SOR)	0.89	0.66	0.54
Median (SOR)	0.93	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.33
High Value (SOR)	1.28	0.93	N/A
Low Value (SOR)	0.51	0.33	N/A

Statistical Test Summary

Sum of Ranks:	406
Sum of Reference Ranks:	315
Critical Value:	253
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	14	14
0.42	R	1.42	15	15
0.51	R	1.51	16	16
0.57	R	1.57	17	17
0.58	R	1.58	18.5	18.5
0.58	R	1.58	18.5	18.5
0.59	R	1.59	20	20
0.6	R	1.6	21	21
0.64	R	1.64	22	22
0.75	R	1.75	23	23
0.83	R	1.83	24.5	24.5
0.83	R	1.83	24.5	24.5
0.85	R	1.85	26	26
0.87	R	1.87	27	27
0.93	R	1.93	28	28
0.51	S	0.51	1	0
0.52	S	0.52	2	0
0.62	S	0.62	3	0
0.68	S	0.68	4	0
0.78	S	0.78	5	0
0.9	S	0.9	6	0
0.93	S	0.93	7.5	0
0.93	S	0.93	7.5	0
1	S	1	9	0
1.08	S	1.08	10	0

DQA Surface Soil Report

Statistical Test Summary

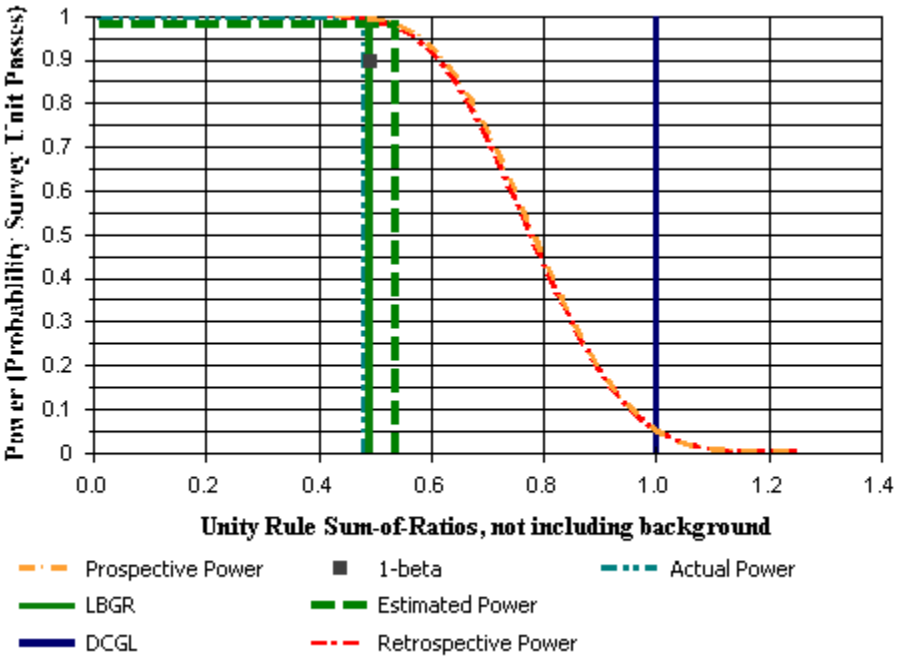
Data	Type	Adjusted Data	Rank	Reference Rank
1.12	S	1.12	11	0
1.27	S	1.27	12	0
1.28	S	1.28	13	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU3		
Report Number:	1		
Survey Unit Samples:	15		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	1	EMC Result:	Pass
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)	
450	S	0.92	1.04	
451	S	1.25	1.2	
452	S	0.88	0.72	
453	S	0.46	1.06	
454	S	1.32	1.58	
455	S	1.24	1.95	
456	S	0.8	0.71	
457	S	1.16	1.22	
458	S	1.03	3.6	Location 458 Resampled. See Sample 1260
459	S	1.05	1.2	U-238=1.91 pCi/g
460	S	1.18	1.81	
461	S	1.07	1.93	
462	S	0.97	1.64	
463	S	1.18	1.54	
464	S	1.32	1.66	
43	R	0.72	0.73	
44	R	0.51	0.34	
45	R	0.5	0.74	
46	R	0.77	0.83	
47	R	1.32	0.92	
48	R	1.24	1.1	
49	R	1.12	0.97	
50	R	0.81	1.21	
51	R	0.71	0.74	
52	R	0.91	1.18	
53	R	0.58	0.49	
54	R	0.6	0.84	
55	R	0.71	0.79	
56	R	0.73	0.69	
57	R	0.91	0.95	

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
450	S	0.79
451	S	0.98
452	S	0.63
453	S	0.64
454	S	1.17
455	S	1.31
456	S	0.6
457	S	0.95
458	S	1.99
459	S	0.91
460	S	1.23
461	S	1.25
462	S	1.08
463	S	1.11
464	S	1.21
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	15	15	N/2=14
Mean (SOR)	1.06	0.66	0.54
Median (SOR)	1.08	0.60	N/A
Std Dev (SOR)	0.35	0.18	0.33
High Value (SOR)	1.99	0.93	N/A
Low Value (SOR)	0.60	0.33	N/A

Statistical Test Summary

Sum of Ranks:	465
Sum of Reference Ranks:	330
Critical Value:	272
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	16	16
0.51	R	1.51	17	17
0.57	R	1.57	18	18
0.58	R	1.58	19.5	19.5
0.58	R	1.58	19.5	19.5
0.59	R	1.59	21	21
0.6	R	1.6	22	22
0.64	R	1.64	23	23
0.75	R	1.75	24	24
0.83	R	1.83	25.5	25.5
0.83	R	1.83	25.5	25.5
0.85	R	1.85	27	27
0.87	R	1.87	28	28
0.93	R	1.93	29	29
0.6	S	0.6	1	0
0.63	S	0.63	2	0
0.64	S	0.64	3	0
0.79	S	0.79	4	0
0.91	S	0.91	5	0
0.95	S	0.95	6	0
0.98	S	0.98	7	0
1.08	S	1.08	8	0
1.11	S	1.11	9	0
1.17	S	1.17	10	0

DQA Surface Soil Report

Statistical Test Summary

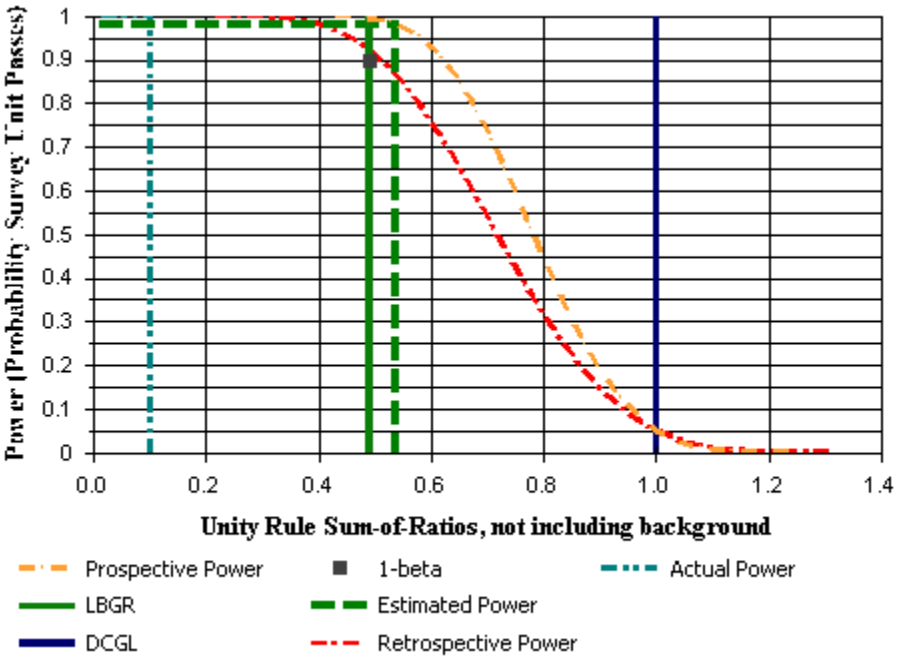
Data	Type	Adjusted Data	Rank	Reference Rank
1.21	S	1.21	11	0
1.23	S	1.23	12	0
1.25	S	1.25	13	0
1.31	S	1.31	14	0
1.99	S	1.99	30	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU4		
Report Number:	1		
Survey Unit Samples:	14		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
465	S	0.16	0.21
466	S	1.32	1.78
467	S	1.07	1.06
468	S	0.98	1.06
470	S	0.95	1.34
471	S	1.22	1.26
472	S	0.15	0.24
473	S	0.16	0.03
474	S	0.86	0.62
475	S	0.3	0.27
476	S	0.09	0.16
477	S	1.33	1.57
478	S	0.25	0.44
479	S	0.91	1.54
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
465	S	0.15
466	S	1.26
467	S	0.85
468	S	0.82
470	S	0.94
471	S	0.99
472	S	0.16
473	S	0.07
474	S	0.58
475	S	0.23
476	S	0.1
477	S	1.17
478	S	0.29
479	S	1.01
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	14	15	N/2=14
Mean (SOR)	0.62	0.66	0.54
Median (SOR)	0.70	0.60	N/A
Std Dev (SOR)	0.44	0.18	0.33
High Value (SOR)	1.26	0.93	N/A
Low Value (SOR)	0.07	0.33	N/A

Statistical Test Summary

Sum of Ranks:	435
Sum of Reference Ranks:	330
Critical Value:	263
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	16	16
0.51	R	1.51	17	17
0.57	R	1.57	18	18
0.58	R	1.58	19.5	19.5
0.58	R	1.58	19.5	19.5
0.59	R	1.59	21	21
0.6	R	1.6	22	22
0.64	R	1.64	23	23
0.75	R	1.75	24	24
0.83	R	1.83	25.5	25.5
0.83	R	1.83	25.5	25.5
0.85	R	1.85	27	27
0.87	R	1.87	28	28
0.93	R	1.93	29	29
0.07	S	0.07	1	0
0.1	S	0.1	2	0
0.15	S	0.15	3	0
0.16	S	0.16	4	0
0.23	S	0.23	5	0
0.29	S	0.29	6	0
0.58	S	0.58	7	0
0.82	S	0.82	8	0
0.85	S	0.85	9	0
0.94	S	0.94	10	0

DQA Surface Soil Report

Statistical Test Summary

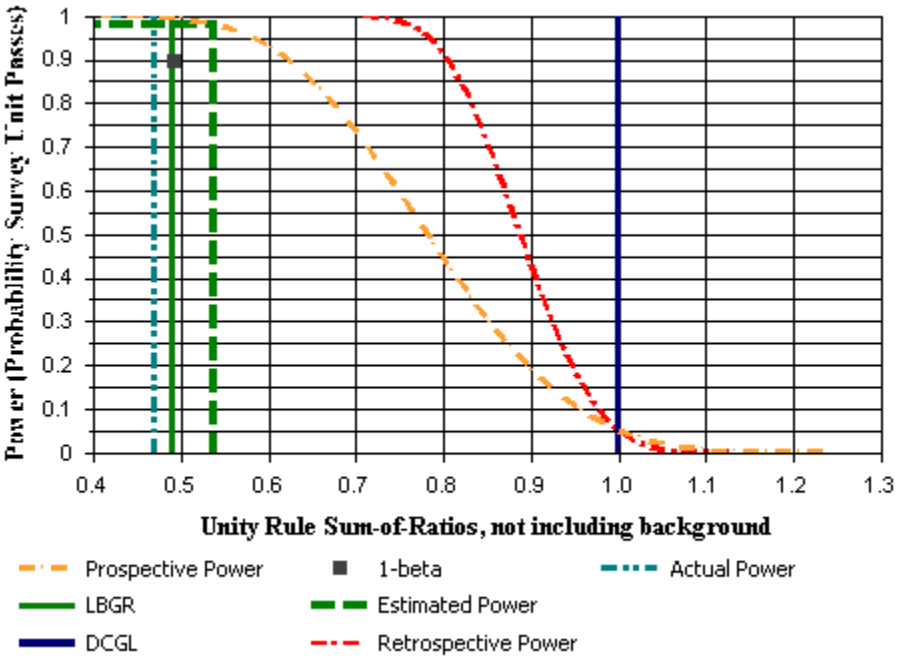
Data	Type	Adjusted Data	Rank	Reference Rank
0.99	S	0.99	11	0
1.01	S	1.01	12	0
1.17	S	1.17	13	0
1.26	S	1.26	14	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU5		
Report Number:	1		
Survey Unit Samples:	15		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
480	S	1.12	1.58
481	S	1.34	0.96
482	S	0.96	1.19
483	S	0.81	1.16
484	S	1.28	1.38
485	S	1.2	1.64
486	S	1.15	2.08
487	S	1.15	1.48
488	S	1.37	1.34
489	S	1.27	1.13
490	S	1.3	1.62
491	S	1.31	1.5
492	S	1.26	1.12
493	S	1.12	2.04
494	S	1.23	0.95
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
480	S	1.1
481	S	0.9
482	S	0.87
483	S	0.81
484	S	1.07
485	S	1.16
486	S	1.34
487	S	1.07
488	S	1.08
489	S	0.95
490	S	1.18
491	S	1.13
492	S	0.94
493	S	1.31
494	S	0.86
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	15	15	N/2=14
Mean (SOR)	1.05	0.66	0.54
Median (SOR)	1.07	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.33
High Value (SOR)	1.34	0.93	N/A
Low Value (SOR)	0.81	0.33	N/A

Statistical Test Summary

Sum of Ranks:	465
Sum of Reference Ranks:	344
Critical Value:	272
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	15	15
0.42	R	1.42	17	17
0.51	R	1.51	18	18
0.57	R	1.57	19	19
0.58	R	1.58	20.5	20.5
0.58	R	1.58	20.5	20.5
0.59	R	1.59	22	22
0.6	R	1.6	23	23
0.64	R	1.64	24	24
0.75	R	1.75	25	25
0.83	R	1.83	26.5	26.5
0.83	R	1.83	26.5	26.5
0.85	R	1.85	28	28
0.87	R	1.87	29	29
0.93	R	1.93	30	30
0.81	S	0.81	1	0
0.86	S	0.86	2	0
0.87	S	0.87	3	0
0.9	S	0.9	4	0
0.94	S	0.94	5	0
0.95	S	0.95	6	0
1.07	S	1.07	7.5	0
1.07	S	1.07	7.5	0
1.08	S	1.08	9	0
1.1	S	1.1	10	0

DQA Surface Soil Report

Statistical Test Summary

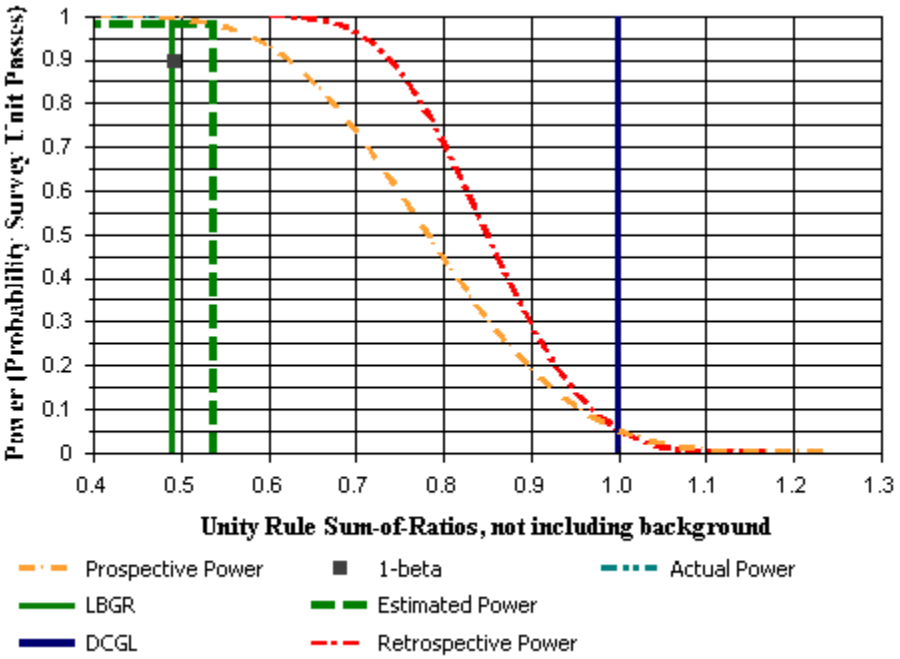
Data	Type	Adjusted Data	Rank	Reference Rank
1.13	S	1.13	11	0
1.16	S	1.16	12	0
1.18	S	1.18	13	0
1.31	S	1.31	14	0
1.34	S	1.34	16	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU6		
Report Number:	1		
Survey Unit Samples:	15		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
495	S	0.87	1.07
496	S	0.92	1.13
497	S	1.4	1.97
498	S	1.44	1.53
499	S	0.88	1.45
500	S	1.09	1.31
501	S	2.24	1.22
502	S	1.15	1.63
503	S	1.23	1.47
504	S	1.24	1.48
505	S	0.79	0.95
506	S	1.01	0.63
507	S	1.42	1.04
508	S	1.11	2.2
509	S	1.13	1.74
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
495	S	0.79
496	S	0.83
497	S	1.38
498	S	1.19
499	S	0.96
500	S	0.97
501	S	1.33
502	S	1.14
503	S	1.09
504	S	1.1
505	S	0.7
506	S	0.63
507	S	0.96
508	S	1.38
509	S	1.18
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	15	15	N/2=14
Mean (SOR)	1.04	0.66	0.54
Median (SOR)	1.09	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.33
High Value (SOR)	1.38	0.93	N/A
Low Value (SOR)	0.63	0.33	N/A

Statistical Test Summary

Sum of Ranks:	465
Sum of Reference Ranks:	342
Critical Value:	272
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	17	17
0.51	R	1.51	18	18
0.57	R	1.57	19	19
0.58	R	1.58	20.5	20.5
0.58	R	1.58	20.5	20.5
0.59	R	1.59	22	22
0.6	R	1.6	23	23
0.64	R	1.64	24	24
0.75	R	1.75	25	25
0.83	R	1.83	26.5	26.5
0.83	R	1.83	26.5	26.5
0.85	R	1.85	28	28
0.87	R	1.87	29	29
0.93	R	1.93	30	30
0.63	S	0.63	1	0
0.7	S	0.7	2	0
0.79	S	0.79	3	0
0.83	S	0.83	4	0
0.96	S	0.96	5.5	0
0.96	S	0.96	5.5	0
0.97	S	0.97	7	0
1.09	S	1.09	8	0
1.1	S	1.1	9	0
1.14	S	1.14	10	0

DQA Surface Soil Report

Statistical Test Summary

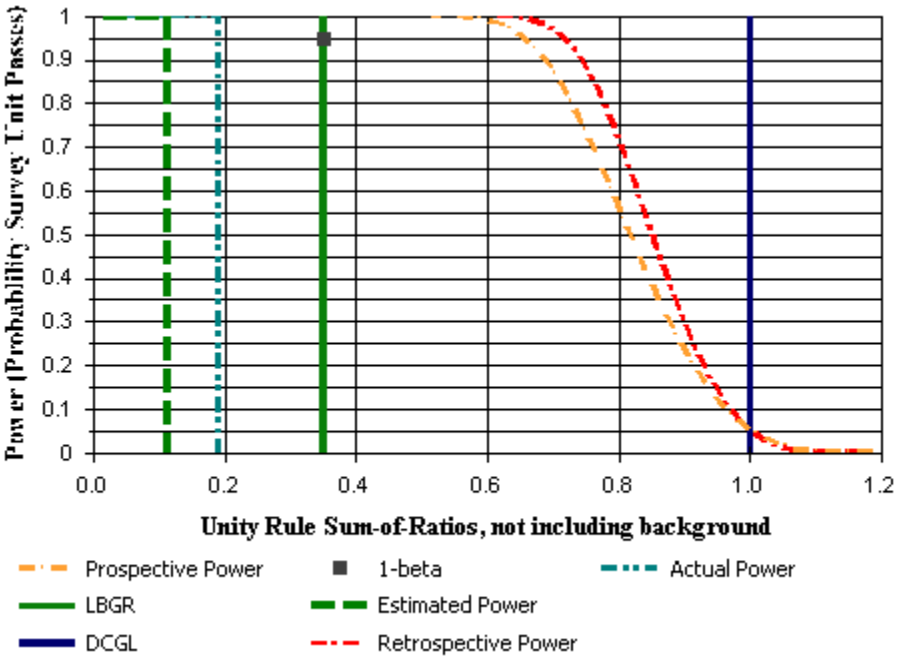
Data	Type	Adjusted Data	Rank	Reference Rank
1.18	S	1.18	11	0
1.19	S	1.19	12	0
1.33	S	1.33	14	0
1.38	S	1.38	15.5	0
1.38	S	1.38	15.5	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU7		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
510	S	0.75	0.83
511	S	1.2	1.39
512	S	0.74	0.84
513	S	0.58	0.51
514	S	0.85	1.12
515	S	0.76	1.11
516	S	0.99	1.07
517	S	0.88	1.01
518	S	1.07	1.41
519	S	1.24	1.49
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
510	S	0.64
511	S	1.05
512	S	0.64
513	S	0.43
514	S	0.8
515	S	0.77
516	S	0.83
517	S	0.76
518	S	1.01
519	S	1.1
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.80	0.66	0.11
Median (SOR)	0.79	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.23
High Value (SOR)	1.10	0.93	N/A
Low Value (SOR)	0.43	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

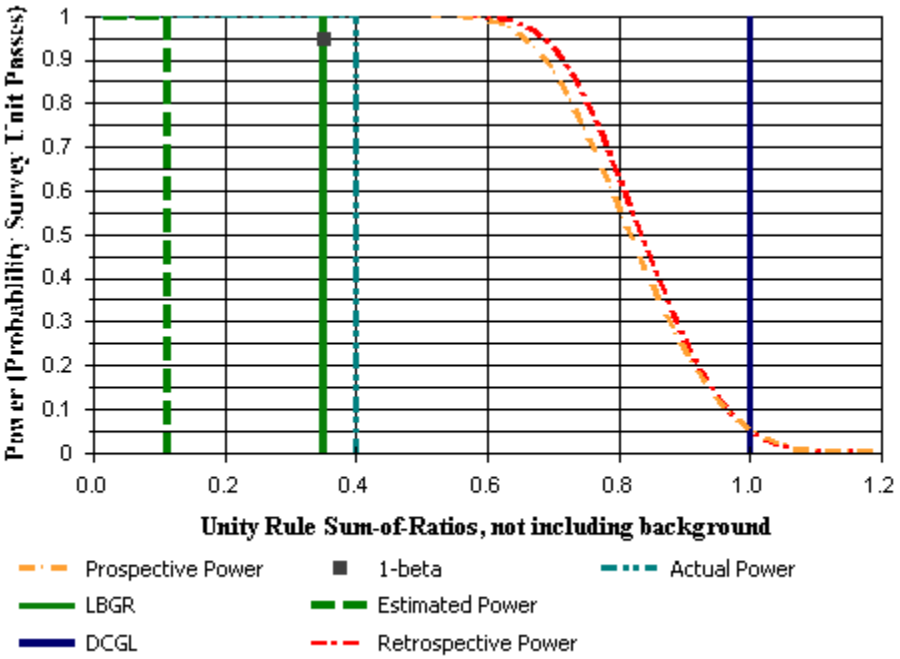
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.43	S	0.43	1	0
0.64	S	0.64	2.5	0
0.64	S	0.64	2.5	0
0.76	S	0.76	4	0
0.77	S	0.77	5	0
0.8	S	0.8	6	0
0.83	S	0.83	7	0
1.01	S	1.01	8	0
1.05	S	1.05	9	0
1.1	S	1.1	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU8 rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
520	S	1.35	1.19
521	S	1.16	1.64
522	S	1.23	1.49
523	S	1.08	0.8
524	S	1.16	0.9
525	S	1.23	1.59
526	S	1.32	1.18
527	S	1.38	2.39
528	S	1.15	1.23
529	S	1.1	1.07
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
520	S	1.01
521	S	1.15
522	S	1.1
523	S	0.74
524	S	0.81
525	S	1.15
526	S	0.99
527	S	1.56
528	S	0.96
529	S	0.87
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	1.03	0.66	0.11
Median (SOR)	1.00	0.60	N/A
Std Dev (SOR)	0.23	0.18	0.23
High Value (SOR)	1.56	0.93	N/A
Low Value (SOR)	0.74	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	267
Critical Value:	225
Result:	Pass

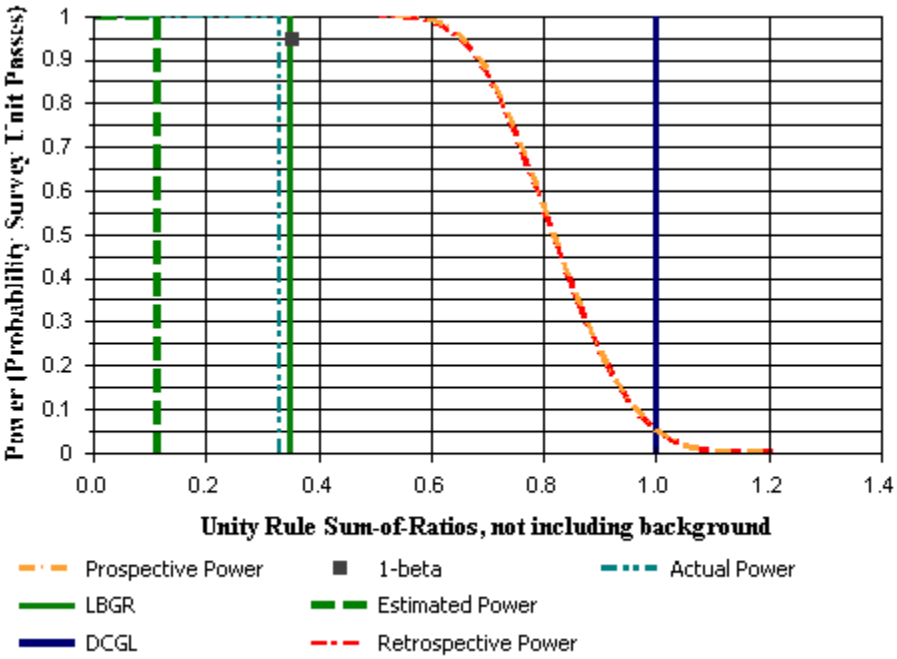
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.74	S	0.74	1	0
0.81	S	0.81	2	0
0.87	S	0.87	3	0
0.96	S	0.96	4	0
0.99	S	0.99	5	0
1.01	S	1.01	6	0
1.1	S	1.1	7	0
1.15	S	1.15	8.5	0
1.15	S	1.15	8.5	0
1.56	S	1.56	13	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU9		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
530	S	1.14	1.64
531	S	0.8	1.19
532	S	0.95	1.07
533	S	1.88	0.92
534	S	0.62	0.75
535	S	0.84	0.74
536	S	1.3	1.67
537	S	0.52	0.94
538	S	1.26	1.71
539	S	1.31	1.27
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
530	S	1.14
531	S	0.82
532	S	0.81
533	S	1.07
534	S	0.55
535	S	0.63
536	S	1.21
537	S	0.61
538	S	1.21
539	S	1.03
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.91	0.66	0.11
Median (SOR)	0.93	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.23
High Value (SOR)	1.21	0.93	N/A
Low Value (SOR)	0.55	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

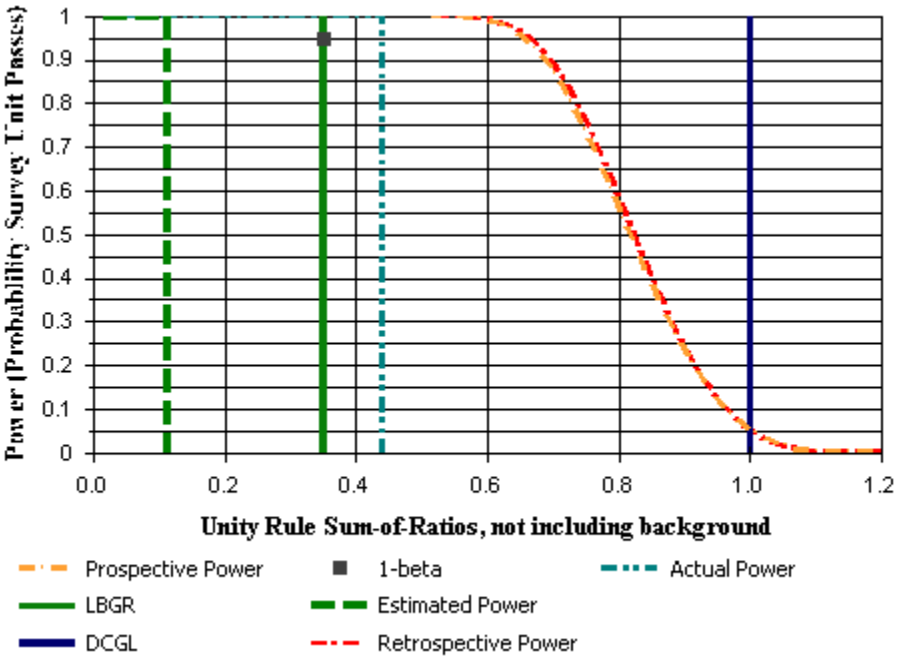
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.55	S	0.55	1	0
0.61	S	0.61	2	0
0.63	S	0.63	3	0
0.81	S	0.81	4	0
0.82	S	0.82	5	0
1.03	S	1.03	6	0
1.07	S	1.07	7	0
1.14	S	1.14	8	0
1.21	S	1.21	9.5	0
1.21	S	1.21	9.5	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU10		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
540	S	1.07	1.26
541	S	1.27	1.93
542	S	1.14	1.05
543	S	1.15	1.53
544	S	1.1	1.54
545	S	1.19	1.27
546	S	0.79	0.57
547	S	0.91	0.76
548	S	1.27	1.66
549	S	1.34	1.61
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
540	S	0.94
541	S	1.32
542	S	0.87
543	S	1.09
544	S	1.08
545	S	0.99
546	S	0.53
547	S	0.66
548	S	1.19
549	S	1.19
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.99	0.66	0.11
Median (SOR)	1.04	0.60	N/A
Std Dev (SOR)	0.25	0.18	0.23
High Value (SOR)	1.32	0.93	N/A
Low Value (SOR)	0.53	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

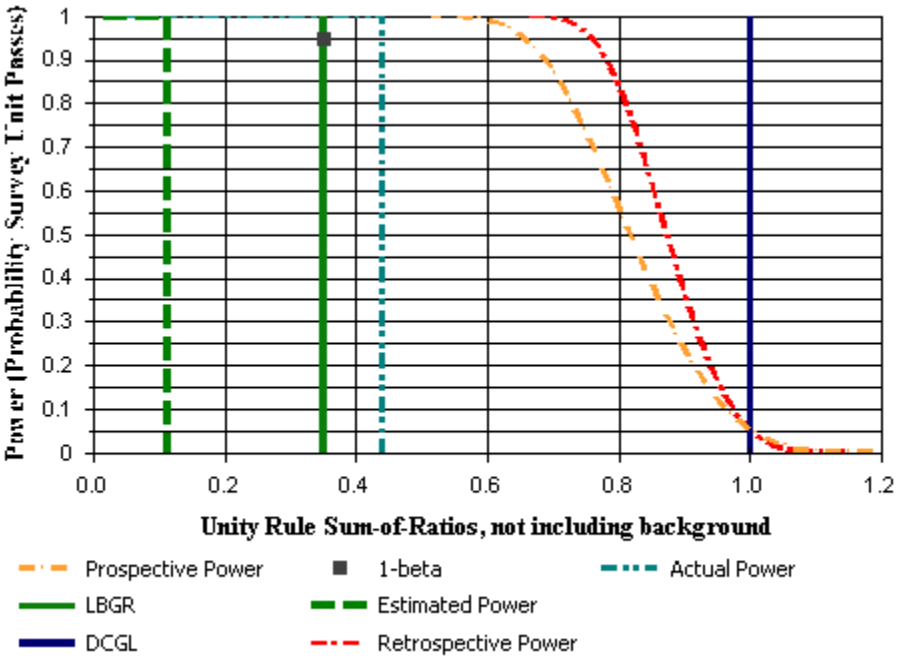
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.53	S	0.53	1	0
0.66	S	0.66	2	0
0.87	S	0.87	3	0
0.94	S	0.94	4	0
0.99	S	0.99	5	0
1.08	S	1.08	6	0
1.09	S	1.09	7	0
1.19	S	1.19	8.5	0
1.19	S	1.19	8.5	0
1.32	S	1.32	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU11		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
550	S	1.14	0.94
551	S	1.12	1.54
552	S	1.21	1.25
553	S	1.1	1.42
554	S	1.02	0.56
555	S	1.31	1.36
556	S	1.12	1.52
557	S	1.31	1.24
558	S	1.1	1.61
559	S	0.79	1.72
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
550	S	0.82
551	S	1.09
552	S	0.99
553	S	1.02
554	S	0.61
555	S	1.07
556	S	1.08
557	S	1.02
558	S	1.11
559	S	1.05
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.99	0.66	0.11
Median (SOR)	1.04	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.23
High Value (SOR)	1.11	0.93	N/A
Low Value (SOR)	0.61	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

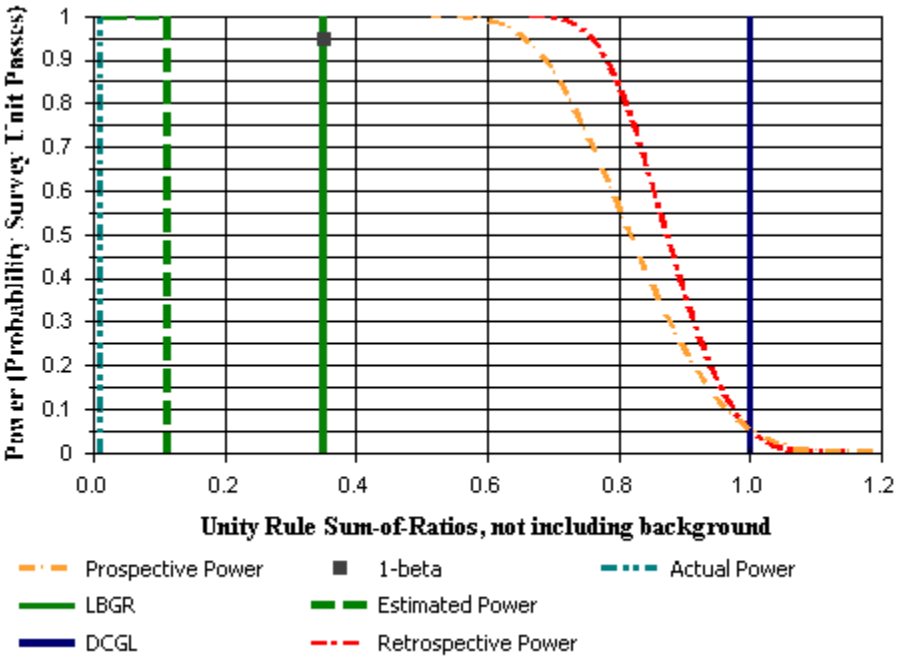
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.61	S	0.61	1	0
0.82	S	0.82	2	0
0.99	S	0.99	3	0
1.02	S	1.02	4.5	0
1.02	S	1.02	4.5	0
1.05	S	1.05	6	0
1.07	S	1.07	7	0
1.08	S	1.08	8	0
1.09	S	1.09	9	0
1.11	S	1.11	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU12		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
560	S	0.46	0.94
561	S	0.9	0.87
562	S	0.4	0.53
563	S	0.77	0.78
564	S	0.58	0.9
565	S	0.77	0.73
566	S	0.59	0.87
567	S	0.66	1.11
568	S	0.66	0.34
569	S	0.86	0.71
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
560	S	0.59
561	S	0.71
562	S	0.38
563	S	0.62
564	S	0.61
565	S	0.6
566	S	0.6
567	S	0.73
568	S	0.38
569	S	0.62
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.58	0.66	0.11
Median (SOR)	0.61	0.60	N/A
Std Dev (SOR)	0.12	0.18	0.23
High Value (SOR)	0.73	0.93	N/A
Low Value (SOR)	0.38	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

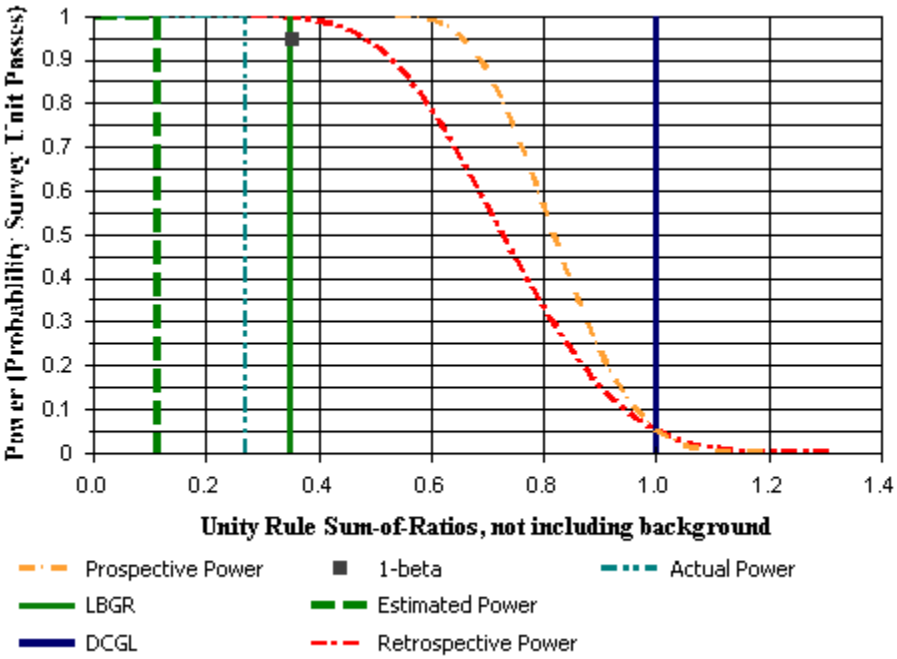
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.38	S	0.38	1.5	0
0.38	S	0.38	1.5	0
0.59	S	0.59	3	0
0.6	S	0.6	4.5	0
0.6	S	0.6	4.5	0
0.61	S	0.61	6	0
0.62	S	0.62	7.5	0
0.62	S	0.62	7.5	0
0.71	S	0.71	9	0
0.73	S	0.73	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU13		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
570	S	0.79	0.98
571	S	1.08	1.41
572	S	0.88	1.15
573	S	0.95	1.16
574	S	1.07	0.87
575	S	0.88	1.08
576	S	0.83	1.31
577	S	2.26	2.69
578	S	1.25	1.76
579	S	1.15	1.41
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
570	S	0.72
571	S	1.01
572	S	0.83
573	S	0.85
574	S	0.76
575	S	0.79
576	S	0.88
577	S	2
578	S	1.23
579	S	1.04
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	1.01	0.66	0.11
Median (SOR)	0.87	0.60	N/A
Std Dev (SOR)	0.38	0.18	0.23
High Value (SOR)	2.00	0.93	N/A
Low Value (SOR)	0.72	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	255
Critical Value:	225
Result:	Pass

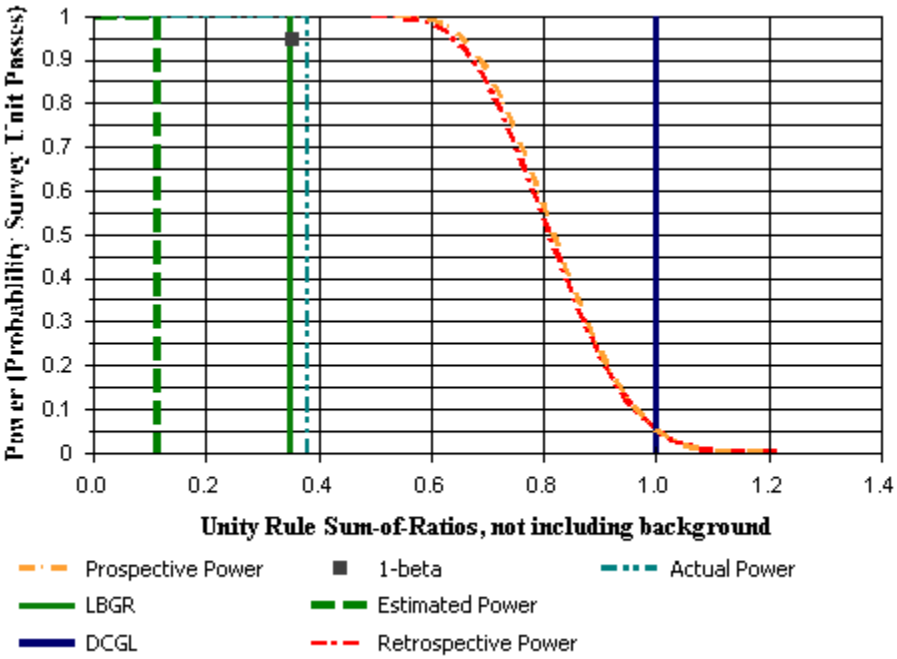
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.72	S	0.72	1	0
0.76	S	0.76	2	0
0.79	S	0.79	3	0
0.83	S	0.83	4	0
0.85	S	0.85	5	0
0.88	S	0.88	6	0
1.01	S	1.01	7	0
1.04	S	1.04	8	0
1.23	S	1.23	9	0
2	S	2	25	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU14		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
580	S	1.11	1.38
581	S	1.22	1.37
582	S	1.14	1.82
583	S	0.69	0.51
584	S	1.18	1.86
585	S	1.4	1.21
586	S	0.57	0.74
587	S	1.2	1.17
588	S	0.78	1.01
589	S	1.04	1.06
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
580	S	1.01
581	S	1.04
582	S	1.22
583	S	0.47
584	S	1.25
585	S	1.03
586	S	0.53
587	S	0.95
588	S	0.73
589	S	0.84
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.91	0.66	0.11
Median (SOR)	0.98	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.23
High Value (SOR)	1.25	0.93	N/A
Low Value (SOR)	0.47	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

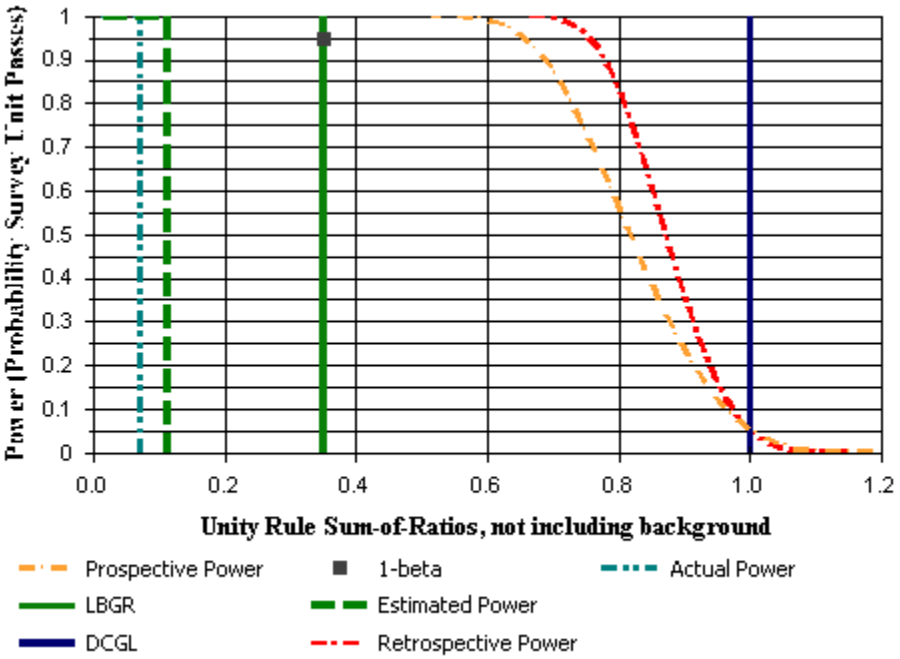
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.47	S	0.47	1	0
0.53	S	0.53	2	0
0.73	S	0.73	3	0
0.84	S	0.84	4	0
0.95	S	0.95	5	0
1.01	S	1.01	6	0
1.03	S	1.03	7	0
1.04	S	1.04	8	0
1.22	S	1.22	9	0
1.25	S	1.25	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU15		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
590	S	0.59	0.51
591	S	0.68	0.69
592	S	0.72	1.43
593	S	0.6	0.91
594	S	0.78	1.22
595	S	0.55	0.55
596	S	0.74	1.02
597	S	0.53	0.54
598	S	0.81	1.21
599	S	0.7	1.15
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
590	S	0.44
591	S	0.55
592	S	0.9
593	S	0.62
594	S	0.82
595	S	0.44
596	S	0.72
597	S	0.43
598	S	0.83
599	S	0.76
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.65	0.66	0.11
Median (SOR)	0.67	0.60	N/A
Std Dev (SOR)	0.18	0.18	0.23
High Value (SOR)	0.90	0.93	N/A
Low Value (SOR)	0.43	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

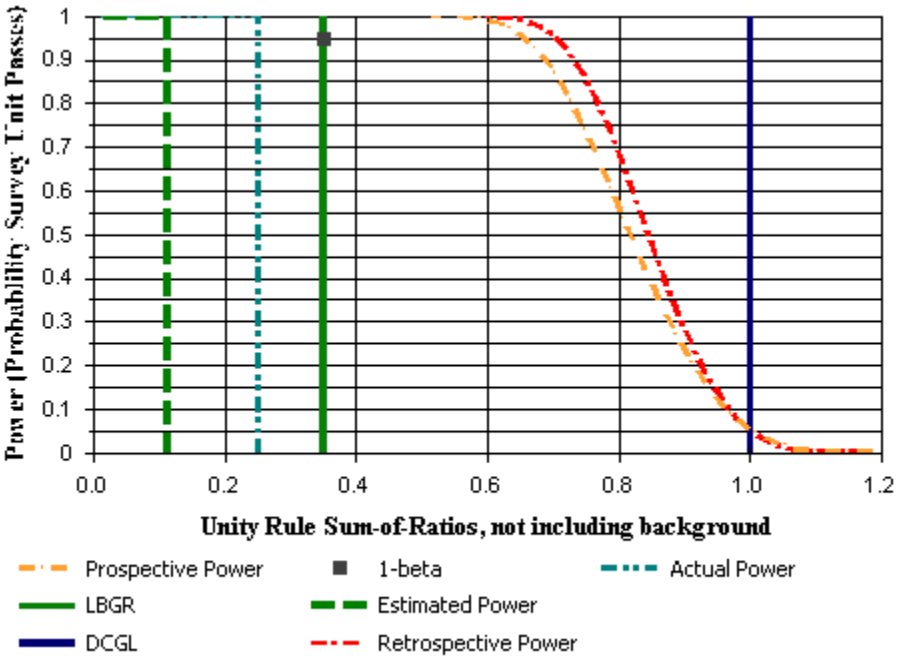
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.43	S	0.43	1	0
0.44	S	0.44	2.5	0
0.44	S	0.44	2.5	0
0.55	S	0.55	4	0
0.62	S	0.62	5	0
0.72	S	0.72	6	0
0.76	S	0.76	7	0
0.82	S	0.82	8	0
0.83	S	0.83	9	0
0.9	S	0.9	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU16		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
600	S	0.73	1.19
601	S	0.59	0.83
602	S	0.97	1.33
603	S	0.51	0.88
604	S	0.37	0.82
605	S	1.1	1.16
606	S	0.84	1.06
607	S	1.08	1.22
608	S	1.37	1.19
609	S	1.23	1.67
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
600	S	0.79
601	S	0.58
602	S	0.94
603	S	0.58
604	S	0.5
605	S	0.91
606	S	0.77
607	S	0.93
608	S	1.01
609	S	1.18
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.82	0.66	0.11
Median (SOR)	0.85	0.60	N/A
Std Dev (SOR)	0.22	0.18	0.23
High Value (SOR)	1.18	0.93	N/A
Low Value (SOR)	0.50	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

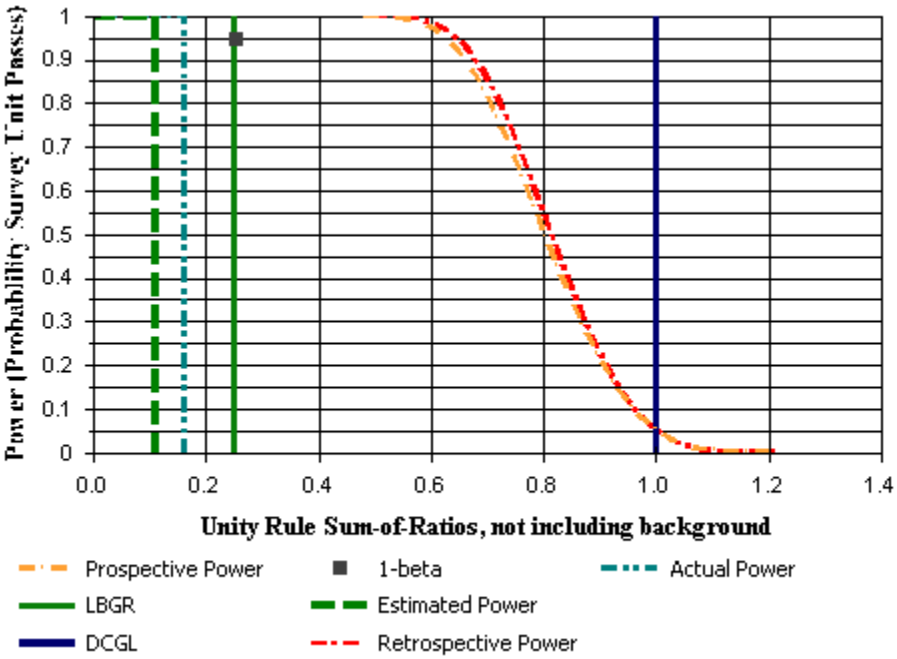
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.5	S	0.5	1	0
0.58	S	0.58	2.5	0
0.58	S	0.58	2.5	0
0.77	S	0.77	4	0
0.79	S	0.79	5	0
0.91	S	0.91	6	0
0.93	S	0.93	7	0
0.94	S	0.94	8	0
1.01	S	1.01	9	0
1.18	S	1.18	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU17		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
610	S	0.53	0.86
611	S	0.69	0.85
612	S	0.59	1.19
613	S	0.62	1.25
614	S	1.05	1.53
615	S	0.57	0.62
616	S	1.08	0.97
617	S	0.76	2.42
618	S	0.8	0.77
619	S	0.86	1.26
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
610	S	0.57
611	S	0.62
612	S	0.74
613	S	0.78
614	S	1.06
615	S	0.48
616	S	0.81
617	S	1.36
618	S	0.63
619	S	0.87
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.79	0.66	0.11
Median (SOR)	0.76	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.25
High Value (SOR)	1.36	0.93	N/A
Low Value (SOR)	0.48	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

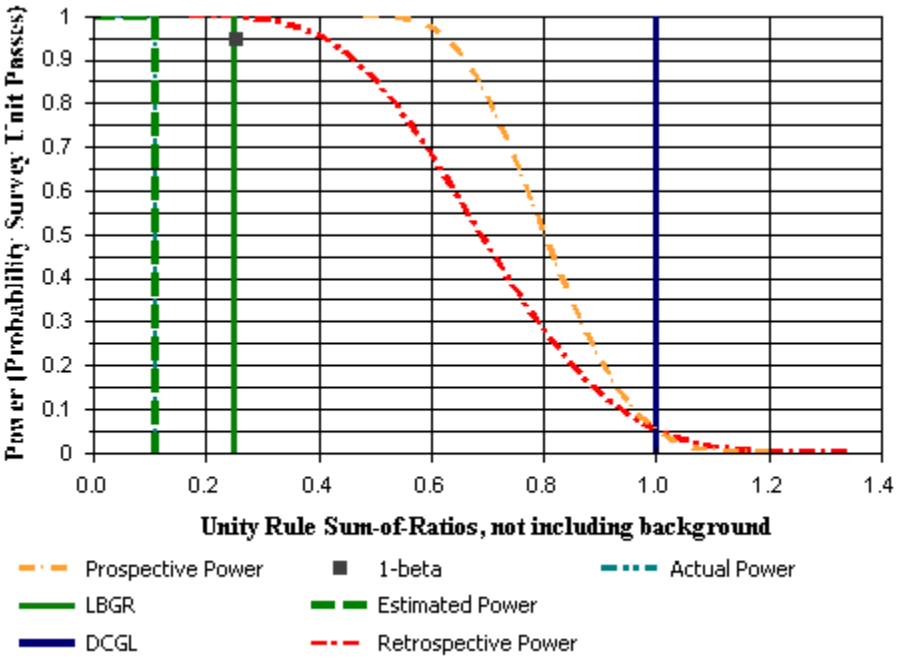
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.48	S	0.48	1	0
0.57	S	0.57	2	0
0.62	S	0.62	3	0
0.63	S	0.63	4	0
0.74	S	0.74	5	0
0.78	S	0.78	6	0
0.81	S	0.81	7	0
0.87	S	0.87	8	0
1.06	S	1.06	9	0
1.36	S	1.36	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU18		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
621	S	0.64	1.93
622	S	0.83	2.62
623	S	0.61	1.32
624	S	0.6	0.62
625	S	0.55	0.89
626	S	0.78	0.86
627	S	0.74	0.49
628	S	2.1	1.93
629	S	0.73	1
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
621	S	1.1
622	S	1.48
623	S	0.81
624	S	0.49
625	S	0.59
626	S	0.66
627	S	0.48
628	S	1.6
629	S	0.71
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.88	0.66	0.11
Median (SOR)	0.71	0.60	N/A
Std Dev (SOR)	0.42	0.18	0.25
High Value (SOR)	1.60	0.93	N/A
Low Value (SOR)	0.48	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	245
Critical Value:	215
Result:	Pass

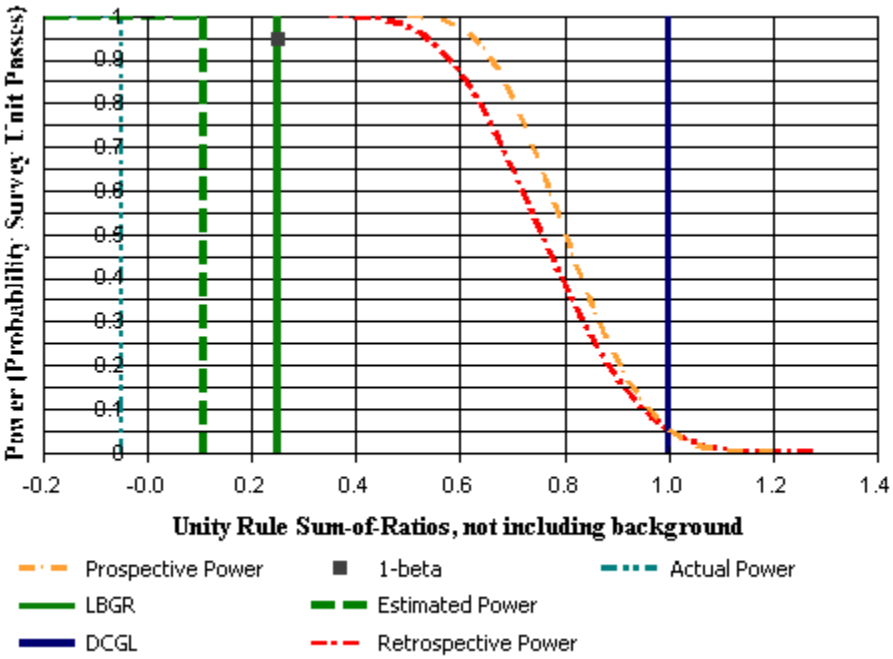
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	8	8
0.42	R	1.42	9	9
0.51	R	1.51	11	11
0.57	R	1.57	12	12
0.58	R	1.58	13.5	13.5
0.58	R	1.58	13.5	13.5
0.59	R	1.59	15	15
0.6	R	1.6	16	16
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.48	S	0.48	1	0
0.49	S	0.49	2	0
0.59	S	0.59	3	0
0.66	S	0.66	4	0
0.71	S	0.71	5	0
0.81	S	0.81	6	0
1.1	S	1.1	7	0
1.48	S	1.48	10	0
1.6	S	1.6	17	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU19 rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
630	S	0.67	0.62
631	S	0.69	0.9
632	S	0.71	0.59
633	S	0.76	0.51
634	S	0.56	0.52
635	S	0.73	0.73
636	S	0.6	0.66
637	S	1.33	2.08
638	S	1.25	1.74
639	S	0.88	1.3
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
630	S	0.51
631	S	0.65
632	S	0.51
633	S	0.49
634	S	0.43
635	S	0.58
636	S	0.51
637	S	1.4
638	S	1.22
639	S	0.89
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.72	0.66	0.11
Median (SOR)	0.55	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.25
High Value (SOR)	1.40	0.93	N/A
Low Value (SOR)	0.43	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

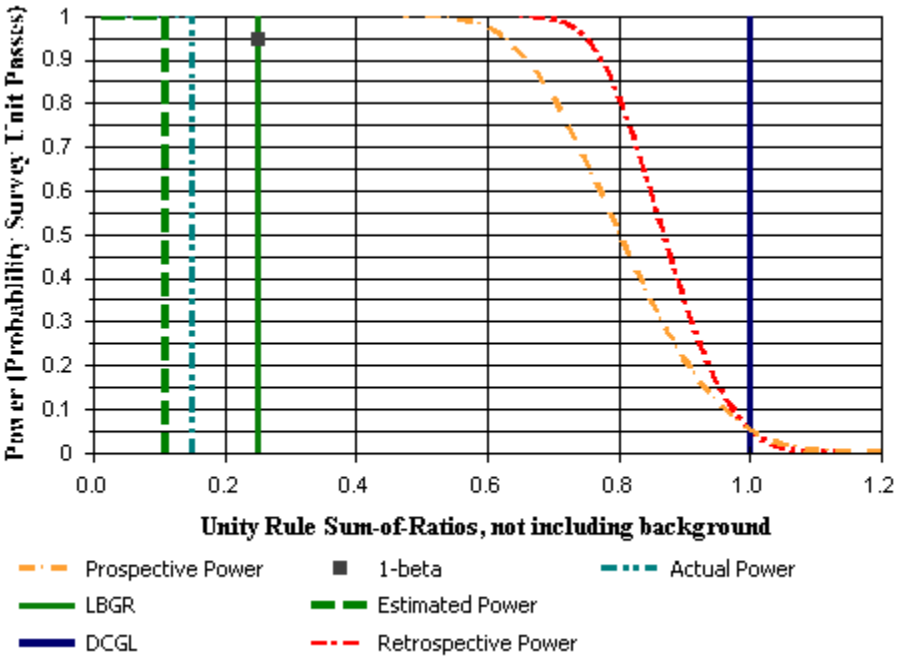
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.43	S	0.43	1	0
0.49	S	0.49	2	0
0.51	S	0.51	4	0
0.51	S	0.51	4	0
0.51	S	0.51	4	0
0.58	S	0.58	6	0
0.65	S	0.65	7	0
0.89	S	0.89	8	0
1.22	S	1.22	9	0
1.4	S	1.4	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU20		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
640	S	0.78	0.86
641	S	0.67	1.15
642	S	0.97	1.33
643	S	0.98	1.2
644	S	0.87	0.98
645	S	1.14	1.69
646	S	0.86	0.92
647	S	0.97	0.96
648	S	0.93	0.63
649	S	0.56	0.69
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
640	S	0.66
641	S	0.75
642	S	0.94
643	S	0.88
644	S	0.75
645	S	1.16
646	S	0.71
647	S	0.77
648	S	0.61
649	S	0.51
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.77	0.66	0.11
Median (SOR)	0.75	0.60	N/A
Std Dev (SOR)	0.18	0.18	0.25
High Value (SOR)	1.16	0.93	N/A
Low Value (SOR)	0.51	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

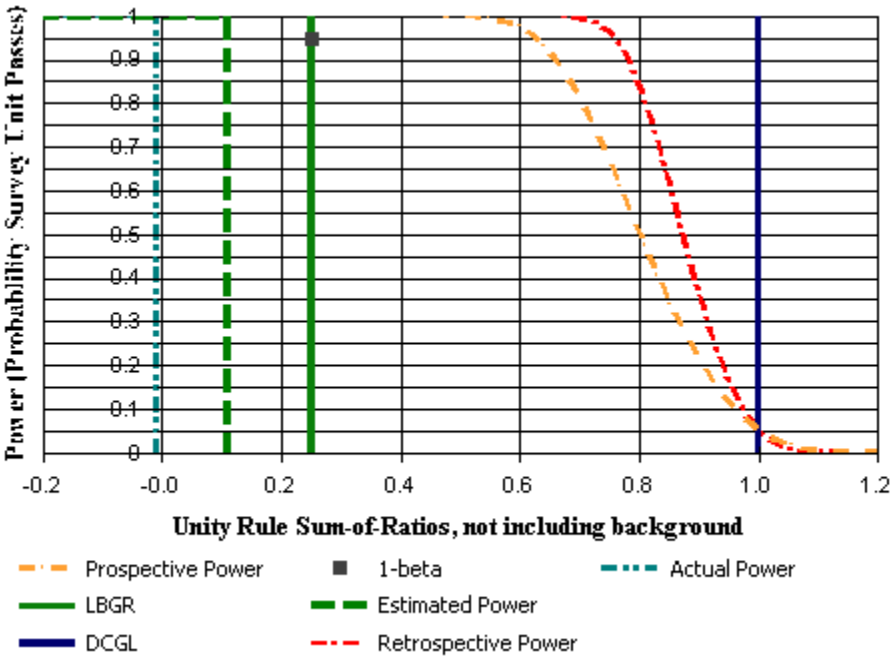
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.51	S	0.51	1	0
0.61	S	0.61	2	0
0.66	S	0.66	3	0
0.71	S	0.71	4	0
0.75	S	0.75	5.5	0
0.75	S	0.75	5.5	0
0.77	S	0.77	7	0
0.88	S	0.88	8	0
0.94	S	0.94	9	0
1.16	S	1.16	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU21		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
650	S	0.62	1.3
651	S	0.67	0.77
652	S	0.49	0.59
653	S	0.56	0.63
654	S	0.62	0.86
655	S	0.56	0.7
656	S	0.55	0.3
657	S	0.71	1.16
658	S	0.62	0.99
659	S	0.76	1.36
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
650	S	0.8
651	S	0.58
652	S	0.44
653	S	0.48
654	S	0.6
655	S	0.51
656	S	0.33
657	S	0.77
658	S	0.66
659	S	0.88
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.61	0.66	0.11
Median (SOR)	0.59	0.60	N/A
Std Dev (SOR)	0.17	0.18	0.25
High Value (SOR)	0.88	0.93	N/A
Low Value (SOR)	0.33	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

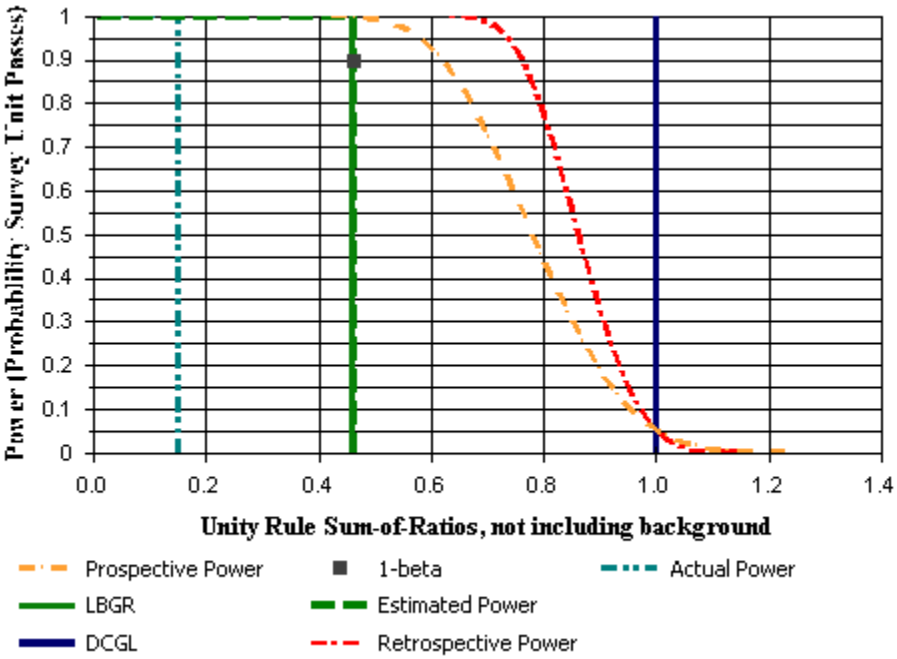
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.33	S	0.33	1	0
0.44	S	0.44	2	0
0.48	S	0.48	3	0
0.51	S	0.51	4	0
0.58	S	0.58	5	0
0.6	S	0.6	6	0
0.66	S	0.66	7	0
0.77	S	0.77	8	0
0.8	S	0.8	9	0
0.88	S	0.88	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU22		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
660	S	0.75	1.11
661	S	1.04	1.06
662	S	0.83	0.89
663	S	0.74	1.49
664	S	0.79	1.45
665	S	0.74	1.09
666	S	0.66	0.87
667	S	0.58	1.13
669	S	0.31	0.79
670	S	0.72	1.37
671	S	0.22	0.46
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
660	S	0.76
661	S	0.84
662	S	0.69
663	S	0.93
664	S	0.93
665	S	0.75
666	S	0.62
667	S	0.71
669	S	0.47
670	S	0.87
671	S	0.28
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=13
Mean (SOR)	0.71	0.66	0.46
Median (SOR)	0.75	0.60	N/A
Std Dev (SOR)	0.20	0.18	0.32
High Value (SOR)	0.93	0.93	N/A
Low Value (SOR)	0.28	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.28	S	0.28	1	0
0.47	S	0.47	2	0
0.62	S	0.62	3	0
0.69	S	0.69	4	0
0.71	S	0.71	5	0
0.75	S	0.75	6	0
0.76	S	0.76	7	0
0.84	S	0.84	8	0
0.87	S	0.87	9	0
0.93	S	0.93	10.5	0

DQA Surface Soil Report

Statistical Test Summary

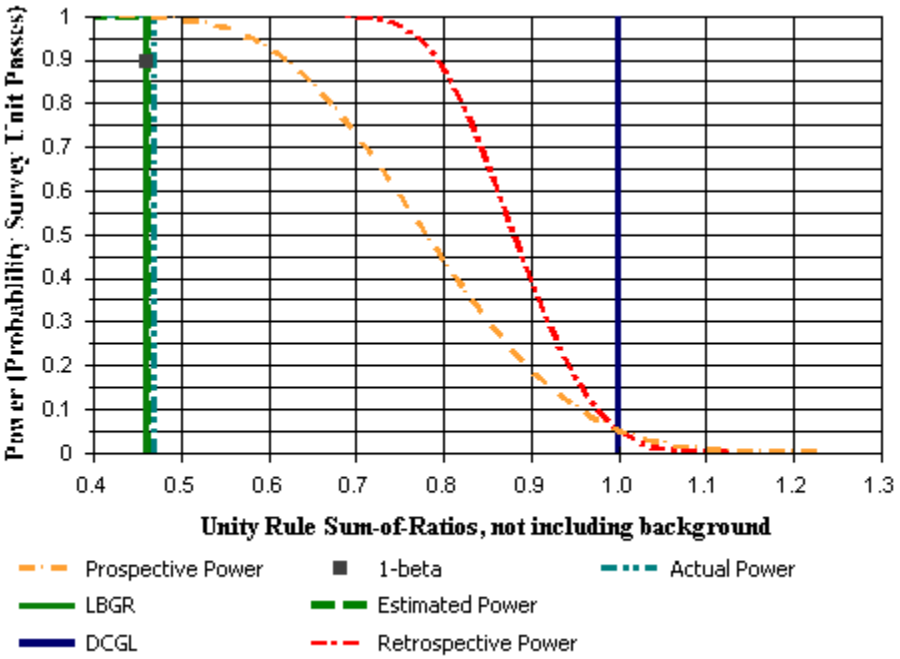
Data	Type	Adjusted Data	Rank	Reference Rank
0.93	S	0.93	10.5	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU23		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
672	S	1.12	1.29
673	S	0.87	2.02
674	S	1.16	1.74
675	S	1.18	1.44
676	S	1.18	1.78
677	S	1.23	1.45
678	S	1	1.12
679	S	1.39	1.3
680	S	0.97	1.42
681	S	0.83	1.06
682	S	1.45	1.33
683	S	0.94	1.28
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
672	S	0.97
673	S	1.22
674	S	1.19
675	S	1.06
676	S	1.22
677	S	1.08
678	S	0.85
679	S	1.07
680	S	0.98
681	S	0.77
682	S	1.1
683	S	0.91
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=13
Mean (SOR)	1.04	0.66	0.46
Median (SOR)	1.07	0.60	N/A
Std Dev (SOR)	0.14	0.18	0.32
High Value (SOR)	1.22	0.93	N/A
Low Value (SOR)	0.77	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.77	S	0.77	1	0
0.85	S	0.85	2	0
0.91	S	0.91	3	0
0.97	S	0.97	4	0
0.98	S	0.98	5	0
1.06	S	1.06	6	0
1.07	S	1.07	7	0
1.08	S	1.08	8	0
1.1	S	1.1	9	0
1.19	S	1.19	10	0

DQA Surface Soil Report

Statistical Test Summary

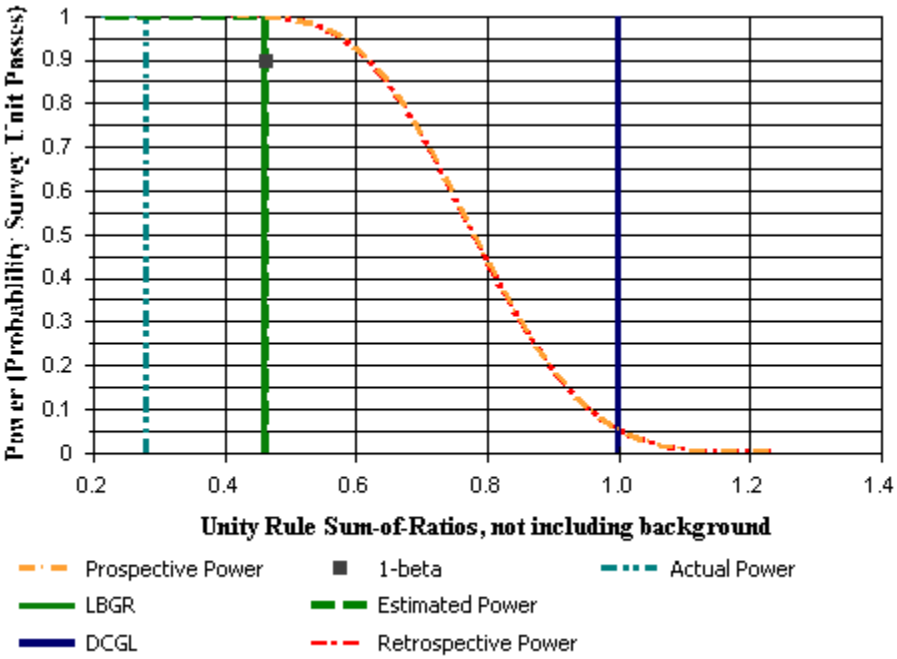
Data	Type	Adjusted Data	Rank	Reference Rank
1.22	S	1.22	11.5	0
1.22	S	1.22	11.5	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU24		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
684	S	0.85	0.68
685	S	1.35	1.63
686	S	0.74	0.72
687	S	1.1	0.98
688	S	1	1.66
689	S	1.04	1.42
690	S	0.87	1.24
691	S	1.03	1.56
692	S	0.65	0.94
693	S	1.04	1.16
694	S	1.5	2.68
695	S	0.54	1.1
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
684	S	0.6
685	S	1.21
686	S	0.58
687	S	0.82
688	S	1.1
689	S	1
690	S	0.86
691	S	1.06
692	S	0.65
693	S	0.89
694	S	1.74
695	S	0.69
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=13
Mean (SOR)	0.93	0.66	0.46
Median (SOR)	0.88	0.60	N/A
Std Dev (SOR)	0.33	0.18	0.32
High Value (SOR)	1.74	0.93	N/A
Low Value (SOR)	0.58	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	291
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.58	S	0.58	1	0
0.6	S	0.6	2	0
0.65	S	0.65	3	0
0.69	S	0.69	4	0
0.82	S	0.82	5	0
0.86	S	0.86	6	0
0.89	S	0.89	7	0
1	S	1	8	0
1.06	S	1.06	9	0
1.1	S	1.1	10	0

DQA Surface Soil Report

Statistical Test Summary

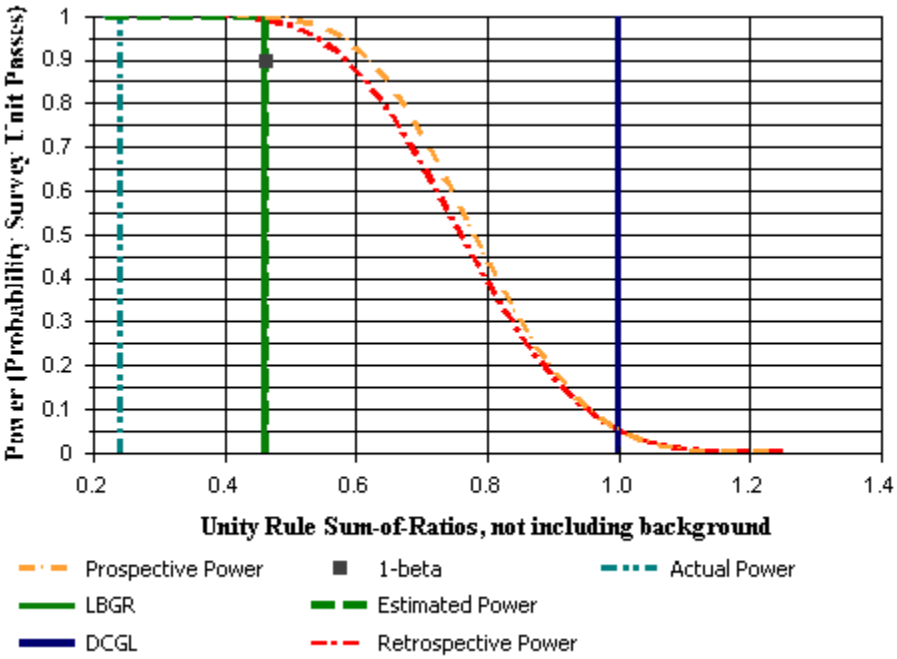
Data	Type	Adjusted Data	Rank	Reference Rank
1.21	S	1.21	11	0
1.74	S	1.74	21	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU25 rev 1		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
696	S	0.78	0.74
697	S	1.05	1.19
698	S	1.11	1.17
699	S	0.62	0.67
700	S	1.27	1.23
701	S	0.1	0.23
702	S	0.04	0.01
703	S	0.9	1.01
704	S	0.96	1.78
705	S	1.12	1.18
706	S	0.99	0.89
707	S	1.09	1.58
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
696	S	0.61
697	S	0.9
698	S	0.91
699	S	0.52
700	S	1
701	S	0.14
702	S	0.02
703	S	0.77
704	S	1.14
705	S	0.92
706	S	0.75
707	S	1.09
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=13
Mean (SOR)	0.73	0.66	0.46
Median (SOR)	0.84	0.60	N/A
Std Dev (SOR)	0.35	0.18	0.32
High Value (SOR)	1.14	0.93	N/A
Low Value (SOR)	0.02	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.02	S	0.02	1	0
0.14	S	0.14	2	0
0.52	S	0.52	3	0
0.61	S	0.61	4	0
0.75	S	0.75	5	0
0.77	S	0.77	6	0
0.9	S	0.9	7	0
0.91	S	0.91	8	0
0.92	S	0.92	9	0
1	S	1	10	0

DQA Surface Soil Report

Statistical Test Summary

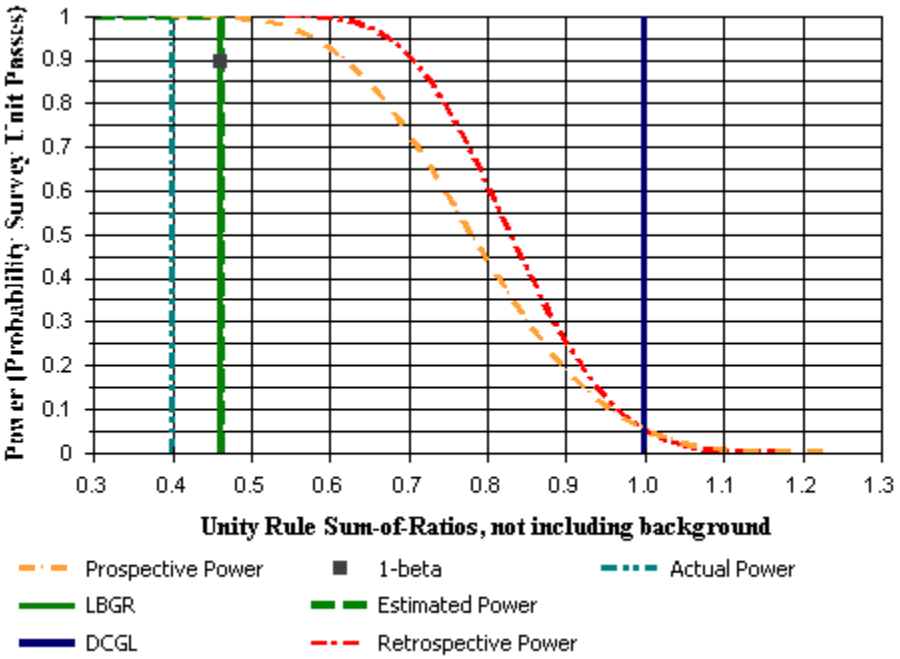
Data	Type	Adjusted Data	Rank	Reference Rank
1.09	S	1.09	11	0
1.14	S	1.14	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU26		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
708	S	1.08	1.56
709	S	0.98	1.69
711	S	1	1.45
712	S	0.78	1.18
713	S	1.09	1.27
714	S	0.82	0.77
715	S	0.85	1.01
716	S	1.19	1.68
717	S	2.18	1.65
718	S	1.03	1.05
719	S	1.37	1.57
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
708	S	1.08
709	S	1.11
711	S	1
712	S	0.81
713	S	0.95
714	S	0.63
715	S	0.75
716	S	1.17
717	S	1.5
718	S	0.83
719	S	1.19
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=13
Mean (SOR)	1.00	0.66	0.46
Median (SOR)	1.00	0.60	N/A
Std Dev (SOR)	0.25	0.18	0.32
High Value (SOR)	1.50	0.93	N/A
Low Value (SOR)	0.63	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	283
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.63	S	0.63	1	0
0.75	S	0.75	2	0
0.81	S	0.81	3	0
0.83	S	0.83	4	0
0.95	S	0.95	5	0
1	S	1	6	0
1.08	S	1.08	7	0
1.11	S	1.11	8	0
1.17	S	1.17	9	0
1.19	S	1.19	10	0

DQA Surface Soil Report

Statistical Test Summary

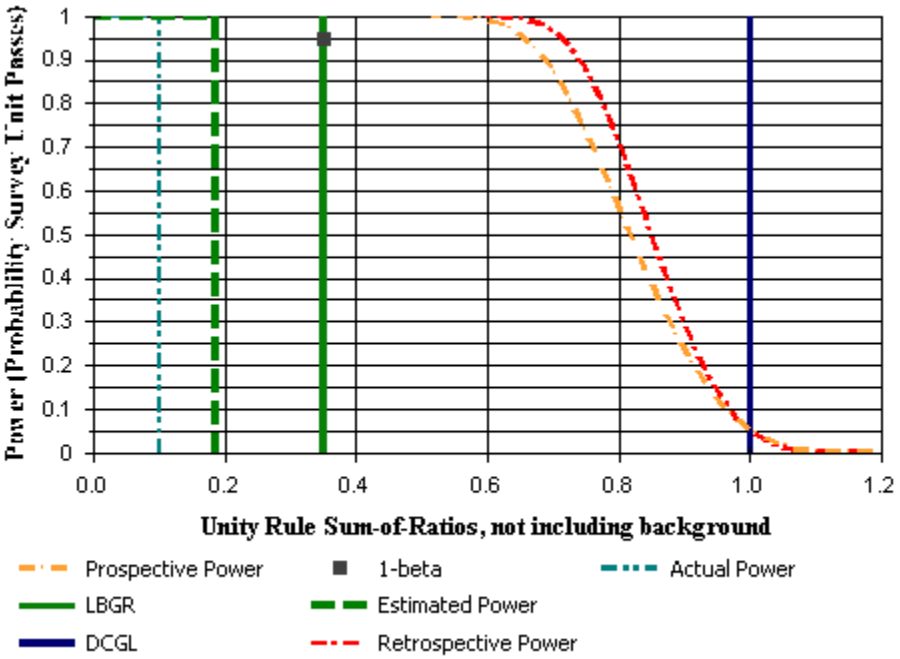
Data	Type	Adjusted Data	Rank	Reference Rank
1.5	S	1.5	13	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU27		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
720	S	0.53	0.95
721	S	0.52	0.91
722	S	0.66	1.26
723	S	0.62	0.51
724	S	0.82	0.58
725	S	1.24	0.92
726	S	0.69	0.75
727	S	0.93	1.04
728	S	1.31	1.37
729	S	0.89	1.59
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
720	S	0.61
721	S	0.59
722	S	0.8
723	S	0.45
724	S	0.55
725	S	0.85
726	S	0.58
727	S	0.79
728	S	1.07
729	S	1.03
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.73	0.66	0.19
Median (SOR)	0.70	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.23
High Value (SOR)	1.07	0.93	N/A
Low Value (SOR)	0.45	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

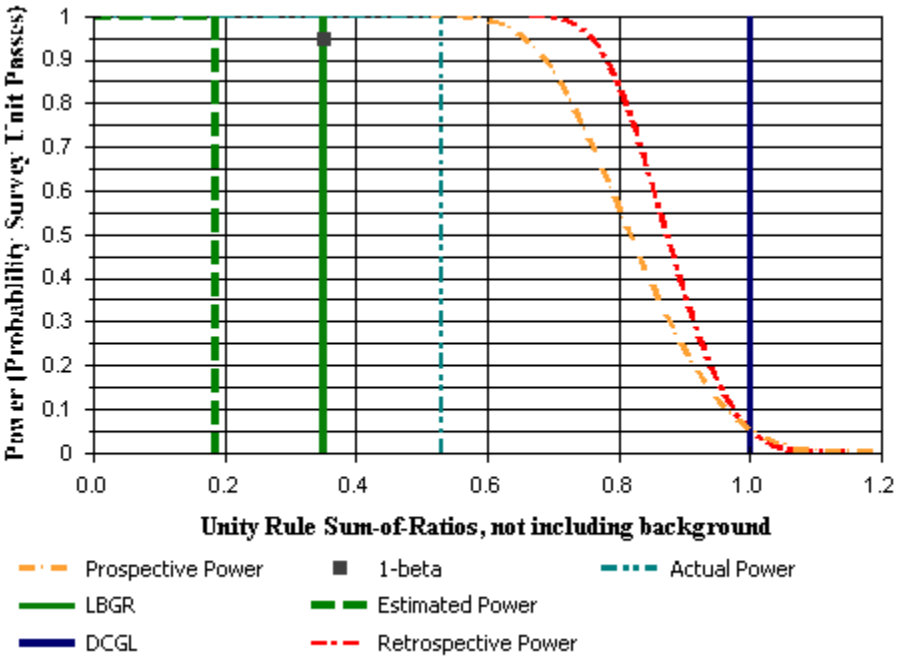
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.45	S	0.45	1	0
0.55	S	0.55	2	0
0.58	S	0.58	3	0
0.59	S	0.59	4	0
0.61	S	0.61	5	0
0.79	S	0.79	6	0
0.8	S	0.8	7	0
0.85	S	0.85	8	0
1.03	S	1.03	9	0
1.07	S	1.07	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU28		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
730	S	1.52	1.82
731	S	0.95	1.64
732	S	1.85	0.94
733	S	1.09	1.77
734	S	0.9	2.09
735	S	1.23	1.43
736	S	1.25	1.42
737	S	1.14	1.33
738	S	1.25	1.68
739	S	0.8	2.22
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
730	S	1.35
731	S	1.07
732	S	1.07
733	S	1.18
734	S	1.26
735	S	1.07
736	S	1.08
737	S	1
738	S	1.19
739	S	1.28
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	1.16	0.66	0.19
Median (SOR)	1.13	0.60	N/A
Std Dev (SOR)	0.11	0.18	0.23
High Value (SOR)	1.35	0.93	N/A
Low Value (SOR)	1.00	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

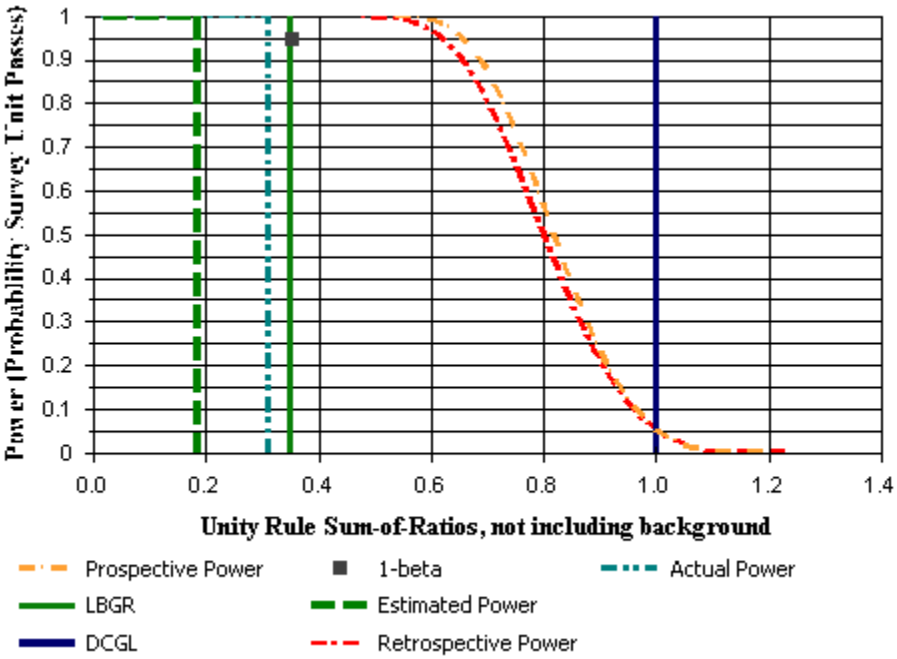
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
1	S	1	1	0
1.07	S	1.07	3	0
1.07	S	1.07	3	0
1.07	S	1.07	3	0
1.08	S	1.08	5	0
1.18	S	1.18	6	0
1.19	S	1.19	7	0
1.26	S	1.26	8	0
1.28	S	1.28	9	0
1.35	S	1.35	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU29 rev 2		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
740	S	1.14	1.36
741	S	1.28	1.05
742	S	0.94	0.86
743	S	1.01	1.19
744	S	0.91	1.05
745	S	1.32	1.77
746	S	0.53	0.89
747	S	1.24	1.12
748	S	1.51	2.04
749	S	0.65	0.73
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
740	S	1.01
741	S	0.92
742	S	0.72
743	S	0.89
744	S	0.79
745	S	1.26
746	S	0.59
747	S	0.94
748	S	1.45
749	S	0.56
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.91	0.66	0.19
Median (SOR)	0.91	0.60	N/A
Std Dev (SOR)	0.28	0.18	0.23
High Value (SOR)	1.45	0.93	N/A
Low Value (SOR)	0.56	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	268
Critical Value:	225
Result:	Pass

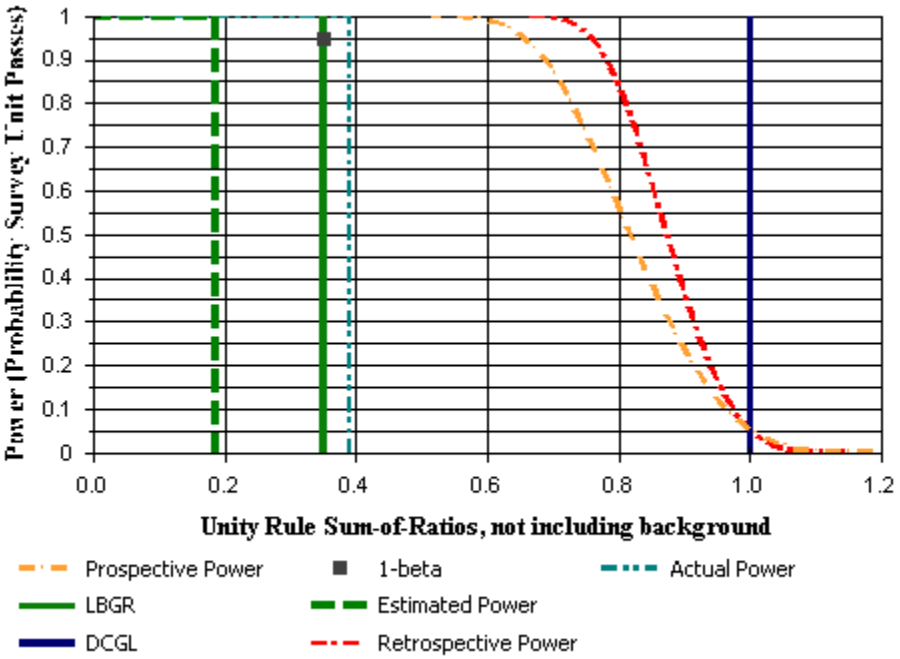
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.56	S	0.56	1	0
0.59	S	0.59	2	0
0.72	S	0.72	3	0
0.79	S	0.79	4	0
0.89	S	0.89	5	0
0.92	S	0.92	6	0
0.94	S	0.94	7	0
1.01	S	1.01	8	0
1.26	S	1.26	9	0
1.45	S	1.45	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU30		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
750	S	1.2	1.18
751	S	1.37	1.51
752	S	1.03	1.31
753	S	1.24	1.58
754	S	1.42	1.49
755	S	0.78	1.67
756	S	1.24	0.69
757	S	0.97	0.88
758	S	0.98	1.73
759	S	1.27	1.1
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
750	S	0.95
751	S	1.16
752	S	0.95
753	S	1.15
754	S	1.17
755	S	1.03
756	S	0.74
757	S	0.73
758	S	1.12
759	S	0.94
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.99	0.66	0.19
Median (SOR)	0.99	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.23
High Value (SOR)	1.17	0.93	N/A
Low Value (SOR)	0.73	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

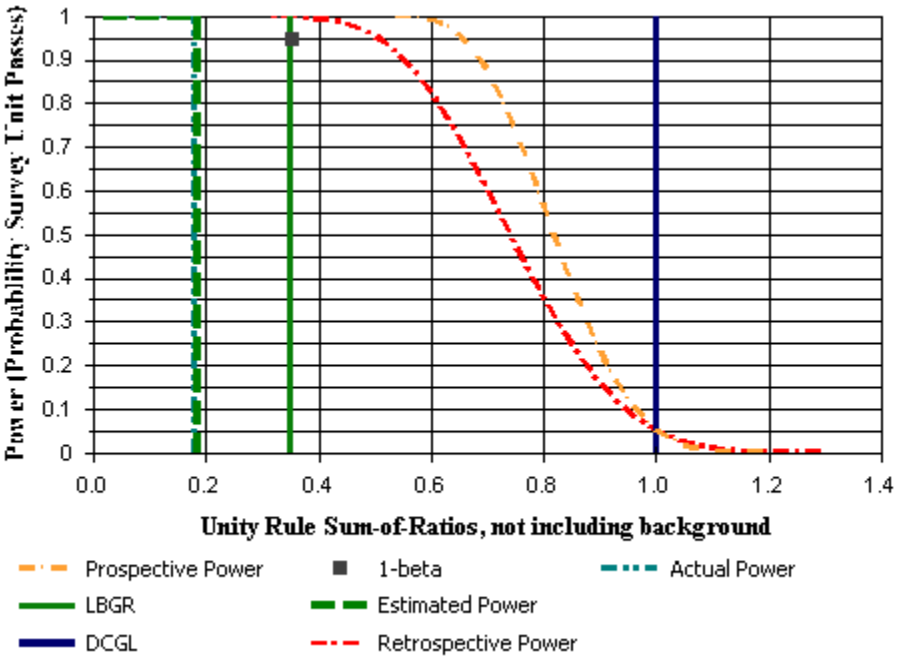
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.73	S	0.73	1	0
0.74	S	0.74	2	0
0.94	S	0.94	3	0
0.95	S	0.95	4.5	0
0.95	S	0.95	4.5	0
1.03	S	1.03	6	0
1.12	S	1.12	7	0
1.15	S	1.15	8	0
1.16	S	1.16	9	0
1.17	S	1.17	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU31		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)	
760	S	0.76	0.8	
761	S	0.7	0.73	
762	S	1.03	1.22	
763	S	0.89	0.65	
764	S	0.47	1.07	
765	S	2.11	2.18	RR ballast
766	S	1.23	1.1	
767	S	0.77	0.75	
768	S	1.51	1.18	
769	S	1.32	1.53	
43	R	0.72	0.73	
44	R	0.51	0.34	
45	R	0.5	0.74	
46	R	0.77	0.83	
47	R	1.32	0.92	
48	R	1.24	1.1	
49	R	1.12	0.97	
50	R	0.81	1.21	
51	R	0.71	0.74	
52	R	0.91	1.18	
53	R	0.58	0.49	
54	R	0.6	0.84	
55	R	0.71	0.79	
56	R	0.73	0.69	
57	R	0.91	0.95	

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
760	S	0.63
761	S	0.57
762	S	0.91
763	S	0.6
764	S	0.65
765	S	1.72
766	S	0.92
767	S	0.61
768	S	1.06
769	S	1.15
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.88	0.66	0.19
Median (SOR)	0.78	0.60	N/A
Std Dev (SOR)	0.36	0.18	0.23
High Value (SOR)	1.72	0.93	N/A
Low Value (SOR)	0.57	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	261
Critical Value:	225
Result:	Pass

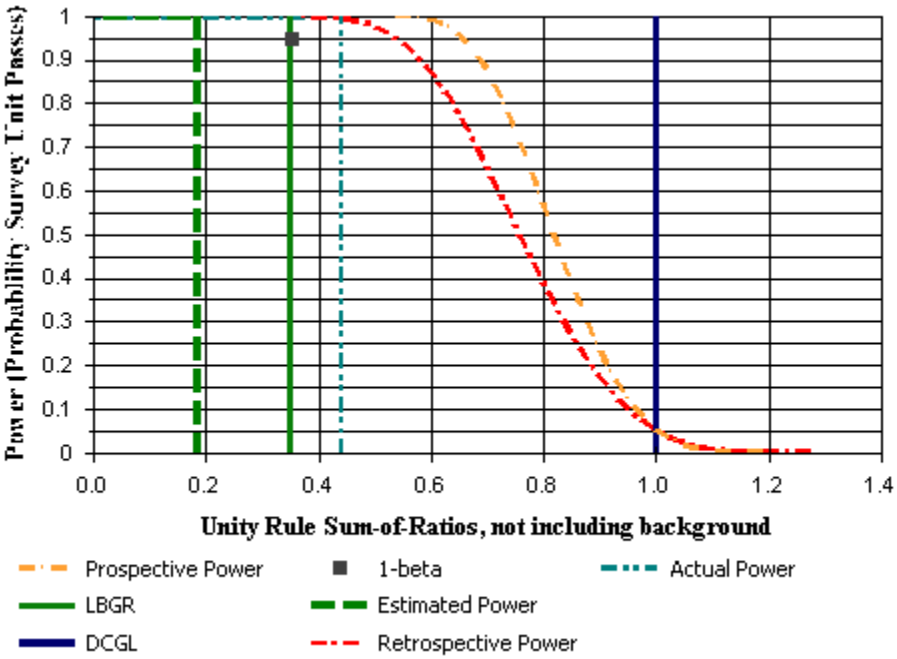
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.57	S	0.57	1	0
0.6	S	0.6	2	0
0.61	S	0.61	3	0
0.63	S	0.63	4	0
0.65	S	0.65	5	0
0.91	S	0.91	6	0
0.92	S	0.92	7	0
1.06	S	1.06	8	0
1.15	S	1.15	9	0
1.72	S	1.72	19	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU32		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)	
770	S	1.21	1.82	
771	S	1.37	0.85	
772	S	2.73	1.22	
773	S	1.06	1.11	
774	S	1.27	1.32	
775	S	1.4	1.2	
776	S	0.29	0.91	
777	S	1.26	1.2	
778	S	1.58	1.28	
779	S	2.15	2.13	RR ballast
43	R	0.72	0.73	
44	R	0.51	0.34	
45	R	0.5	0.74	
46	R	0.77	0.83	
47	R	1.32	0.92	
48	R	1.24	1.1	
49	R	1.12	0.97	
50	R	0.81	1.21	
51	R	0.71	0.74	
52	R	0.91	1.18	
53	R	0.58	0.49	
54	R	0.6	0.84	
55	R	0.71	0.79	
56	R	0.73	0.69	
57	R	0.91	0.95	

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
770	S	1.24
771	S	0.86
772	S	1.5
773	S	0.87
774	S	1.04
775	S	1.03
776	S	0.51
777	S	0.98
778	S	1.13
779	S	1.71
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	1.09	0.66	0.19
Median (SOR)	1.04	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.23
High Value (SOR)	1.71	0.93	N/A
Low Value (SOR)	0.51	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	259
Critical Value:	225
Result:	Pass

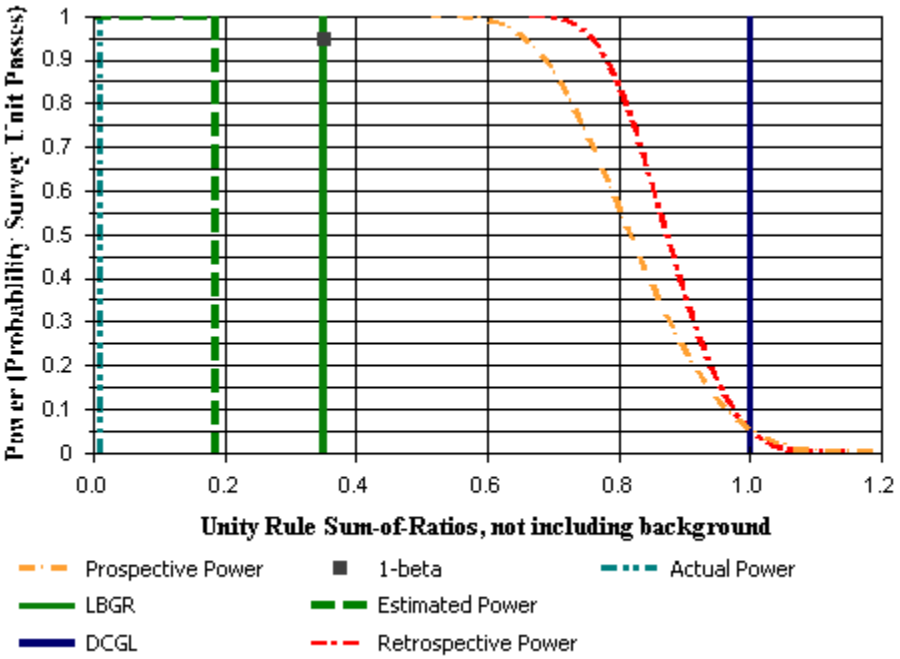
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	9	9
0.42	R	1.42	10	10
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.51	S	0.51	1	0
0.86	S	0.86	2	0
0.87	S	0.87	3	0
0.98	S	0.98	4	0
1.03	S	1.03	5	0
1.04	S	1.04	6	0
1.13	S	1.13	7	0
1.24	S	1.24	8	0
1.5	S	1.5	11	0
1.71	S	1.71	19	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU33		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
780	S	0.64	0.39
781	S	0.44	0.49
782	S	0.7	0.69
783	S	1	0.9
784	S	0.8	0.59
785	S	0.93	0.96
786	S	0.88	1.32
787	S	0.68	0.68
788	S	0.73	0.89
789	S	0.99	0.95
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
780	S	0.4
781	S	0.37
782	S	0.56
783	S	0.75
784	S	0.54
785	S	0.76
786	S	0.9
787	S	0.54
788	S	0.66
789	S	0.77
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.63	0.66	0.19
Median (SOR)	0.61	0.60	N/A
Std Dev (SOR)	0.17	0.18	0.23
High Value (SOR)	0.90	0.93	N/A
Low Value (SOR)	0.37	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

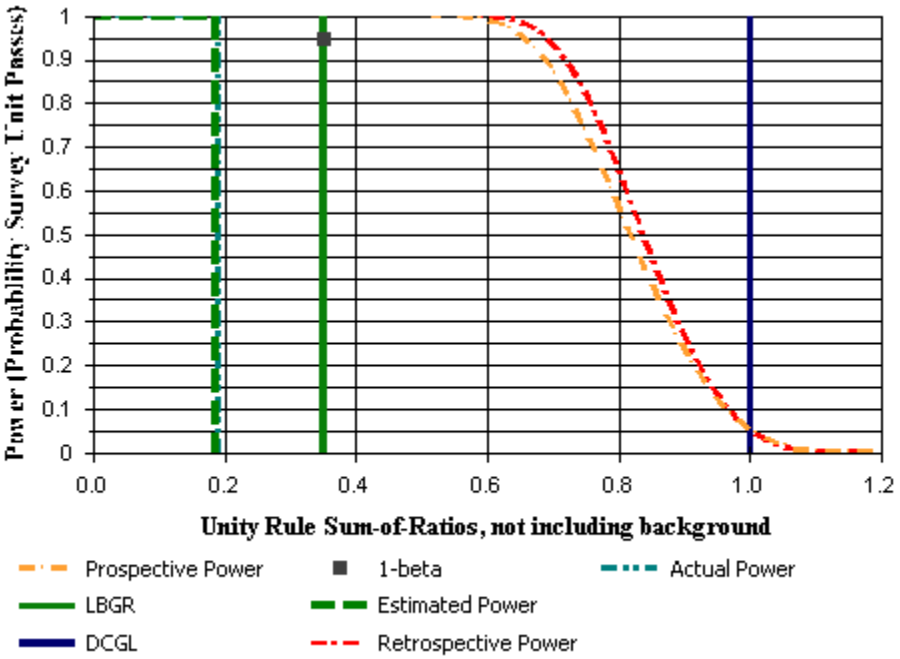
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.37	S	0.37	1	0
0.4	S	0.4	2	0
0.54	S	0.54	3.5	0
0.54	S	0.54	3.5	0
0.56	S	0.56	5	0
0.66	S	0.66	6	0
0.75	S	0.75	7	0
0.76	S	0.76	8	0
0.77	S	0.77	9	0
0.9	S	0.9	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU34		
Report Number:	1		
Survey Unit Samples:	8		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
790	S	1.04	0.92
791	S	1.12	1.1
792	S	0.67	0.96
793	S	0.89	0.9
794	S	1.04	1.48
796	S	0.95	0.91
797	S	1	1.01
799	S	1.02	2.1
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
790	S	0.78
791	S	0.89
792	S	0.67
793	S	0.72
794	S	1.03
796	S	0.74
797	S	0.8
799	S	1.31
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	8	15	N/2=10
Mean (SOR)	0.87	0.66	0.19
Median (SOR)	0.79	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.23
High Value (SOR)	1.31	0.93	N/A
Low Value (SOR)	0.67	0.33	N/A

Statistical Test Summary

Sum of Ranks:	276
Sum of Reference Ranks:	240
Critical Value:	205
Result:	Pass

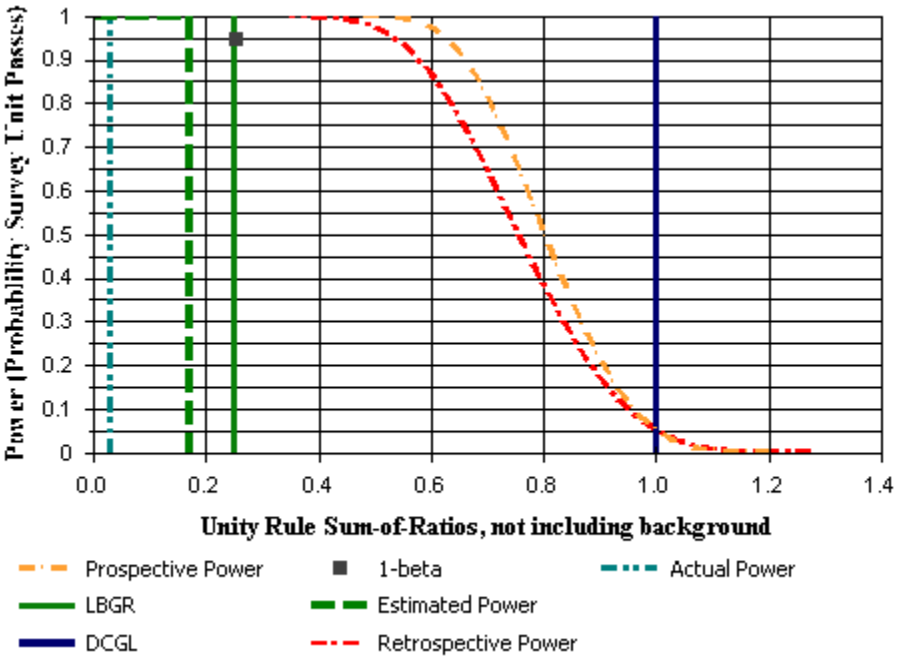
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	9	9
0.42	R	1.42	10	10
0.51	R	1.51	11	11
0.57	R	1.57	12	12
0.58	R	1.58	13.5	13.5
0.58	R	1.58	13.5	13.5
0.59	R	1.59	15	15
0.6	R	1.6	16	16
0.64	R	1.64	17	17
0.75	R	1.75	18	18
0.83	R	1.83	19.5	19.5
0.83	R	1.83	19.5	19.5
0.85	R	1.85	21	21
0.87	R	1.87	22	22
0.93	R	1.93	23	23
0.67	S	0.67	1	0
0.72	S	0.72	2	0
0.74	S	0.74	3	0
0.78	S	0.78	4	0
0.8	S	0.8	5	0
0.89	S	0.89	6	0
1.03	S	1.03	7	0
1.31	S	1.31	8	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 CU35		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
800	S	0.23	0.5
801	S	0.12	0.18
802	S	0.93	0.71
803	S	0.5	0.72
804	S	1.29	1.86
805	S	0.5	0.93
806	S	1.25	1.43
807	S	0.86	1.08
808	S	0.93	0.64
809	S	0.81	1.03
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
800	S	0.31
801	S	0.12
802	S	0.64
803	S	0.5
804	S	1.29
805	S	0.6
806	S	1.08
807	S	0.79
808	S	0.61
809	S	0.75
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.67	0.66	0.17
Median (SOR)	0.63	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.25
High Value (SOR)	1.29	0.93	N/A
Low Value (SOR)	0.12	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

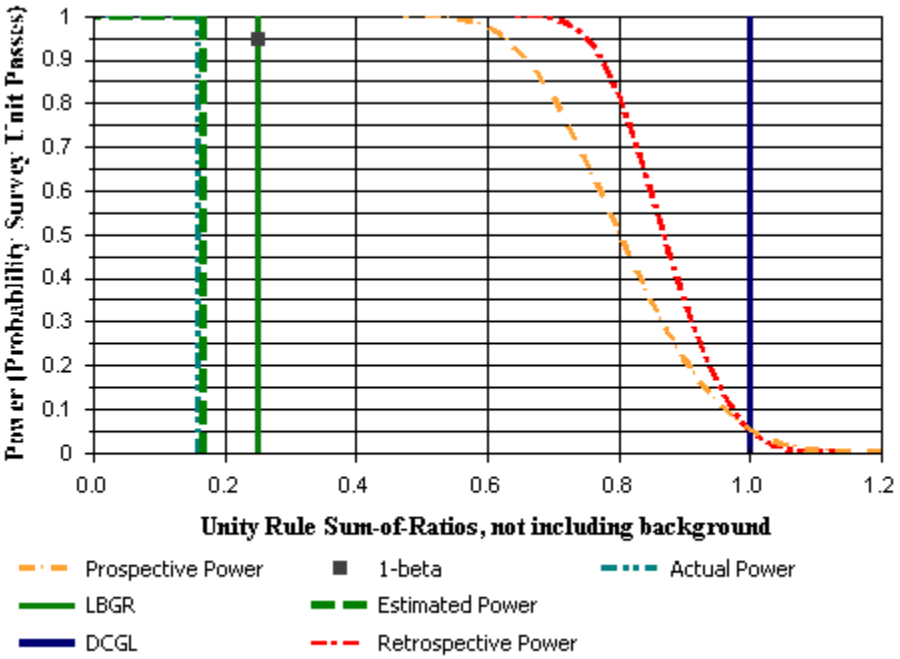
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.12	S	0.12	1	0
0.31	S	0.31	2	0
0.5	S	0.5	3	0
0.6	S	0.6	4	0
0.61	S	0.61	5	0
0.64	S	0.64	6	0
0.75	S	0.75	7	0
0.79	S	0.79	8	0
1.08	S	1.08	9	0
1.29	S	1.29	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU36		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
810	S	0.69	0.6
811	S	0.81	1.06
812	S	0.64	0.92
813	S	0.87	1.39
814	S	0.87	1.14
815	S	0.77	0.81
816	S	0.74	1.17
818	S	1.01	1.38
819	S	0.78	0.64
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
810	S	0.51
811	S	0.76
812	S	0.64
813	S	0.93
814	S	0.82
815	S	0.63
816	S	0.79
818	S	0.98
819	S	0.56
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.74	0.66	0.17
Median (SOR)	0.76	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.25
High Value (SOR)	0.98	0.93	N/A
Low Value (SOR)	0.51	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

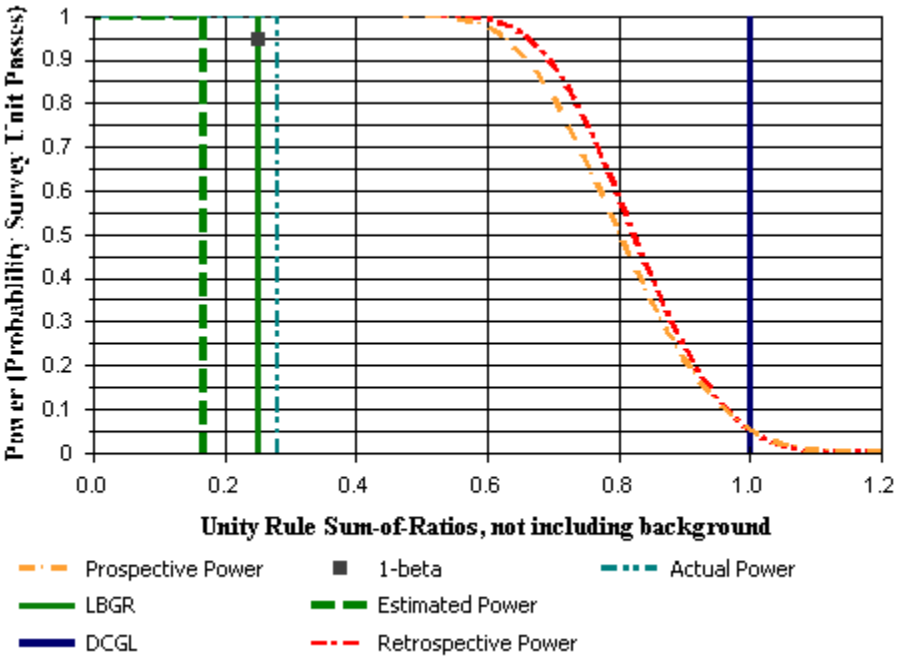
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.51	S	0.51	1	0
0.56	S	0.56	2	0
0.63	S	0.63	3	0
0.64	S	0.64	4	0
0.76	S	0.76	5	0
0.79	S	0.79	6	0
0.82	S	0.82	7	0
0.93	S	0.93	8	0
0.98	S	0.98	9	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU37		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
820	S	0.81	0.88
821	S	0.58	0.8
822	S	0.92	2.13
823	S	1.04	1.16
824	S	0.76	0.77
825	S	0.68	1.56
826	S	1	1.14
827	S	0.86	1.91
828	S	1.17	1.2
829	S	0.95	0.58
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
820	S	0.68
821	S	0.56
822	S	1.29
823	S	0.89
824	S	0.61
825	S	0.94
826	S	0.86
827	S	1.16
828	S	0.95
829	S	0.59
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.85	0.66	0.17
Median (SOR)	0.88	0.60	N/A
Std Dev (SOR)	0.25	0.18	0.25
High Value (SOR)	1.29	0.93	N/A
Low Value (SOR)	0.56	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

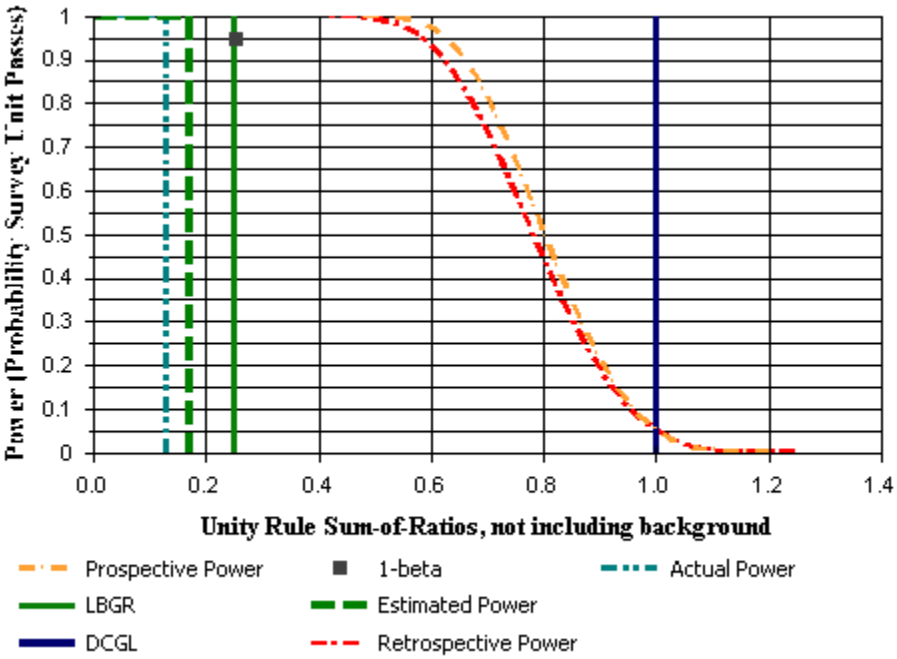
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.56	S	0.56	1	0
0.59	S	0.59	2	0
0.61	S	0.61	3	0
0.68	S	0.68	4	0
0.86	S	0.86	5	0
0.89	S	0.89	6	0
0.94	S	0.94	7	0
0.95	S	0.95	8	0
1.16	S	1.16	9	0
1.29	S	1.29	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU38		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
830	S	0.41	0.65
831	S	1.03	1.05
832	S	0.78	1.32
833	S	0.66	0.86
834	S	0.84	0.92
835	S	0.74	1.07
836	S	0.22	0.32
837	S	0.84	1.31
838	S	0.85	0.9
839	S	0.85	2.4
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
830	S	0.44
831	S	0.83
832	S	0.87
833	S	0.62
834	S	0.71
835	S	0.74
836	S	0.22
837	S	0.89
838	S	0.7
839	S	1.38
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.74	0.66	0.17
Median (SOR)	0.73	0.60	N/A
Std Dev (SOR)	0.30	0.18	0.25
High Value (SOR)	1.38	0.93	N/A
Low Value (SOR)	0.22	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

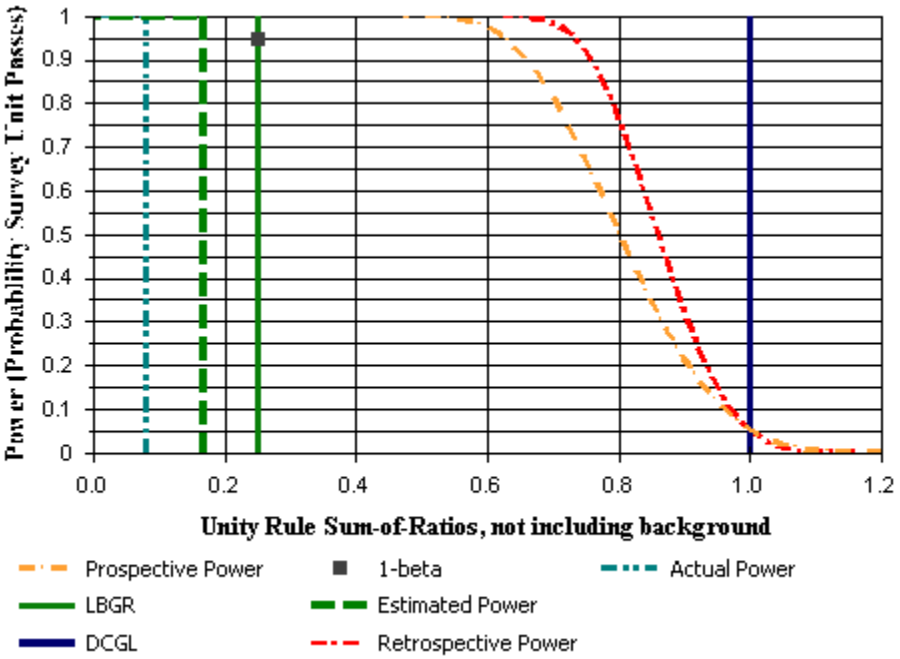
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.22	S	0.22	1	0
0.44	S	0.44	2	0
0.62	S	0.62	3	0
0.7	S	0.7	4	0
0.71	S	0.71	5	0
0.74	S	0.74	6	0
0.83	S	0.83	7	0
0.87	S	0.87	8	0
0.89	S	0.89	9	0
1.38	S	1.38	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU39		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
840	S	1.03	1.47
841	S	0.78	0.7
842	S	1.16	1.37
843	S	0.68	0.95
844	S	1.13	1.49
845	S	0.3	1.23
846	S	0.66	1.02
847	S	0.49	1.58
848	S	0.51	0.92
849	S	0.77	0.78
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
840	S	1.02
841	S	0.59
842	S	1.02
843	S	0.67
844	S	1.07
845	S	0.66
846	S	0.69
847	S	0.89
848	S	0.59
849	S	0.62
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.78	0.66	0.17
Median (SOR)	0.68	0.60	N/A
Std Dev (SOR)	0.20	0.18	0.25
High Value (SOR)	1.07	0.93	N/A
Low Value (SOR)	0.59	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

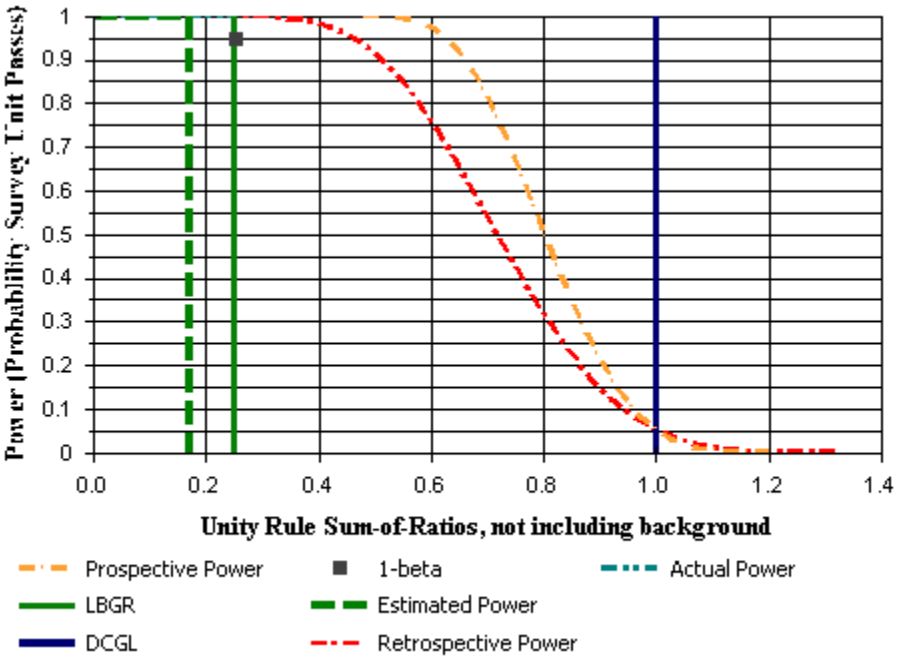
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.59	S	0.59	1.5	0
0.59	S	0.59	1.5	0
0.62	S	0.62	3	0
0.66	S	0.66	4	0
0.67	S	0.67	5	0
0.69	S	0.69	6	0
0.89	S	0.89	7	0
1.02	S	1.02	8.5	0
1.02	S	1.02	8.5	0
1.07	S	1.07	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU40		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
850	S	0.03	0.09
851	S	1.15	1.59
852	S	0.52	0.73
853	S	1.03	0.94
854	S	1.23	1.8
855	S	1.16	1.42
856	S	1	2.37
857	S	0.88	0.74
858	S	1.1	1.02
859	S	0.74	1.3
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
850	S	0.05
851	S	1.12
852	S	0.51
853	S	0.78
854	S	1.24
855	S	1.05
856	S	1.42
857	S	0.64
858	S	0.84
859	S	0.85
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.85	0.66	0.17
Median (SOR)	0.85	0.60	N/A
Std Dev (SOR)	0.39	0.18	0.25
High Value (SOR)	1.42	0.93	N/A
Low Value (SOR)	0.05	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	268
Critical Value:	225
Result:	Pass

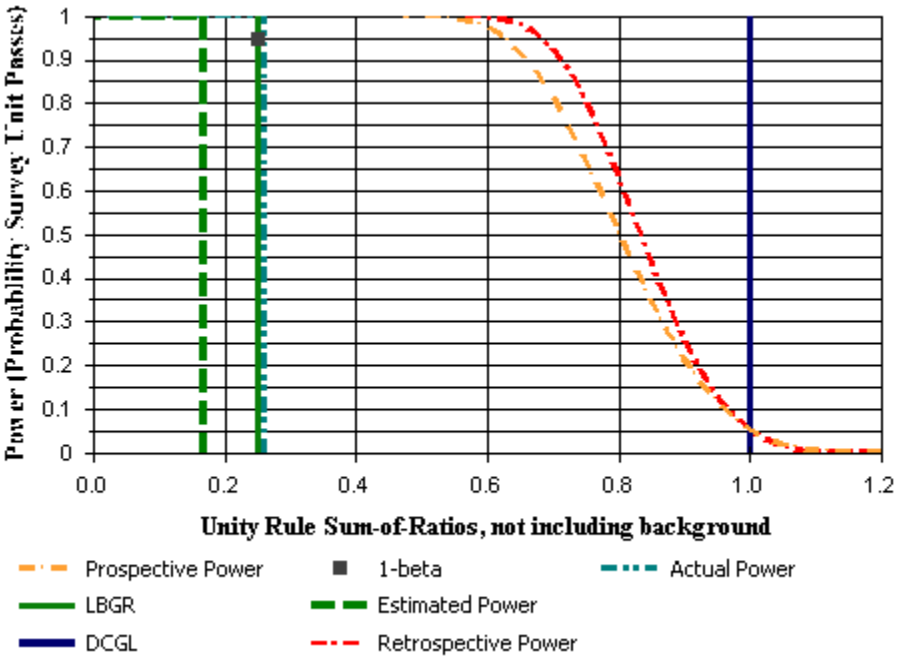
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.05	S	0.05	1	0
0.51	S	0.51	2	0
0.64	S	0.64	3	0
0.78	S	0.78	4	0
0.84	S	0.84	5	0
0.85	S	0.85	6	0
1.05	S	1.05	7	0
1.12	S	1.12	8	0
1.24	S	1.24	9	0
1.42	S	1.42	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU41		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
860	S	1.01	0.96
861	S	1.16	1.23
862	S	1	1.15
863	S	0.65	1.03
864	S	0.99	1.1
865	S	1.49	1.34
866	S	1.46	1.46
867	S	1.26	1.95
868	S	0.82	1.01
869	S	0.59	0.85
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
860	S	0.78
861	S	0.96
862	S	0.87
863	S	0.69
864	S	0.84
865	S	1.12
866	S	1.17
867	S	1.32
868	S	0.74
869	S	0.59
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.91	0.66	0.17
Median (SOR)	0.86	0.60	N/A
Std Dev (SOR)	0.23	0.18	0.25
High Value (SOR)	1.32	0.93	N/A
Low Value (SOR)	0.59	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

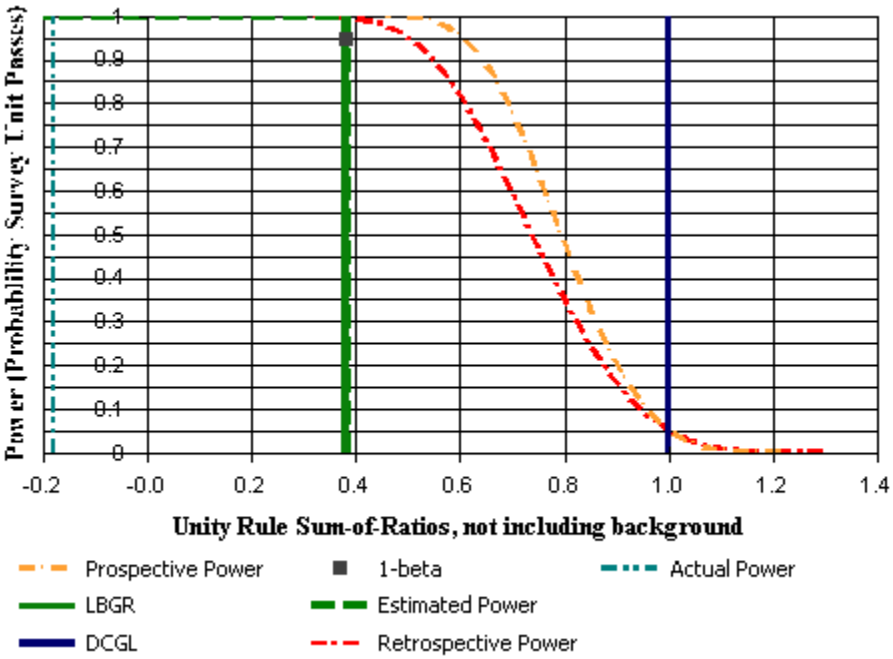
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.59	S	0.59	1	0
0.69	S	0.69	2	0
0.74	S	0.74	3	0
0.78	S	0.78	4	0
0.84	S	0.84	5	0
0.87	S	0.87	6	0
0.96	S	0.96	7	0
1.12	S	1.12	8	0
1.17	S	1.17	9	0
1.32	S	1.32	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU42		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
871	S	1.3	1.03
872	S	0.87	1.33
873	S	0.28	0.5
874	S	0.66	0.51
876	S	0.32	0.59
877	S	1.06	1.18
878	S	0.08	0.01
879	S	0.08	0.14
880	S	0.87	1.01
881	S	0.05	0.07
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
871	S	0.92
872	S	0.9
873	S	0.32
874	S	0.46
876	S	0.38
877	S	0.9
878	S	0.03
879	S	0.09
880	S	0.76
881	S	0.05
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.48	0.66	0.38
Median (SOR)	0.42	0.60	N/A
Std Dev (SOR)	0.37	0.18	0.3
High Value (SOR)	0.92	0.93	N/A
Low Value (SOR)	0.03	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

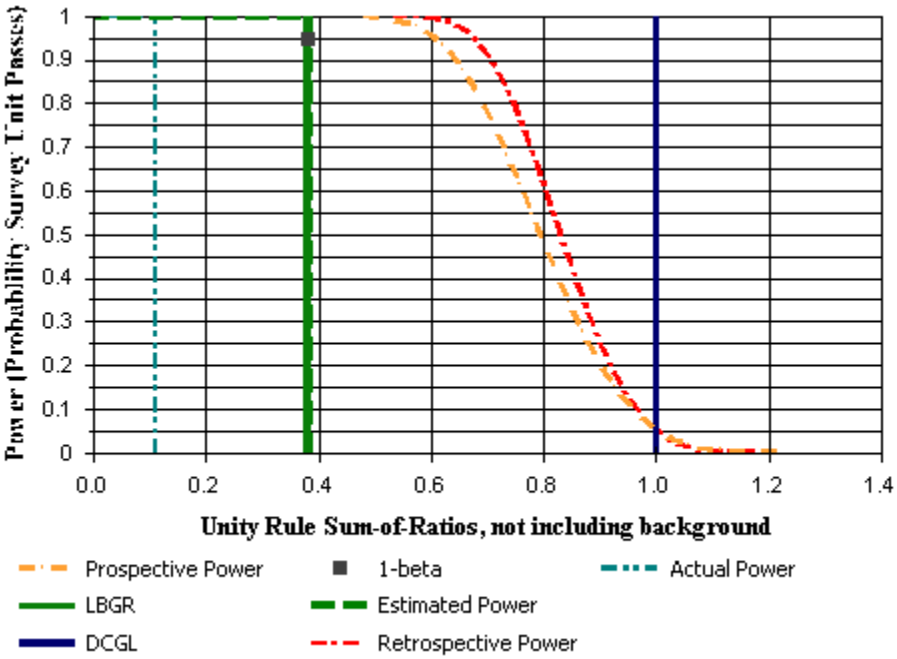
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.03	S	0.03	1	0
0.05	S	0.05	2	0
0.09	S	0.09	3	0
0.32	S	0.32	4	0
0.38	S	0.38	5	0
0.46	S	0.46	6	0
0.76	S	0.76	7	0
0.9	S	0.9	8.5	0
0.9	S	0.9	8.5	0
0.92	S	0.92	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU43		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
882	S	1.24	0.99
883	S	1.16	1.74
884	S	0.58	0.51
885	S	0.69	0.59
886	S	0.9	0.9
887	S	0.63	0.78
889	S	1	1.1
890	S	0.73	1.09
891	S	0.28	0.41
892	S	0.77	0.93
893	S	0.84	0.92
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
882	S	0.88
883	S	1.19
884	S	0.43
885	S	0.51
886	S	0.72
887	S	0.57
889	S	0.84
890	S	0.75
891	S	0.28
892	S	0.69
893	S	0.71
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=13
Mean (SOR)	0.69	0.66	0.38
Median (SOR)	0.71	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.3
High Value (SOR)	1.19	0.93	N/A
Low Value (SOR)	0.28	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.28	S	0.28	1	0
0.43	S	0.43	2	0
0.51	S	0.51	3	0
0.57	S	0.57	4	0
0.69	S	0.69	5	0
0.71	S	0.71	6	0
0.72	S	0.72	7	0
0.75	S	0.75	8	0
0.84	S	0.84	9	0
0.88	S	0.88	10	0

DQA Surface Soil Report

Statistical Test Summary

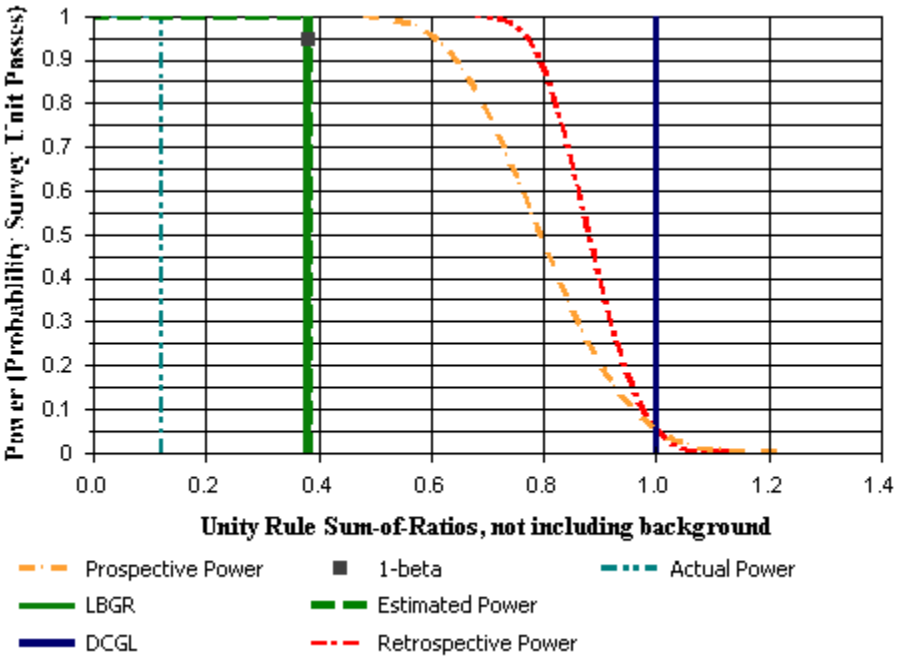
Data	Type	Adjusted Data	Rank	Reference Rank
1.19	S	1.19	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU44		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
894	S	0.68	0.95
895	S	0.82	1.25
896	S	0.71	0.97
897	S	0.66	1
898	S	0.68	1.06
899	S	0.89	1.16
900	S	0.83	0.95
901	S	0.63	0.82
902	S	0.8	0.7
903	S	0.81	1.02
904	S	0.96	1.34
905	S	0.92	1.08
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
894	S	0.67
895	S	0.85
896	S	0.69
897	S	0.68
898	S	0.72
899	S	0.83
900	S	0.72
901	S	0.59
902	S	0.59
903	S	0.74
904	S	0.94
905	S	0.81
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=13
Mean (SOR)	0.74	0.66	0.38
Median (SOR)	0.72	0.60	N/A
Std Dev (SOR)	0.11	0.18	0.3
High Value (SOR)	0.94	0.93	N/A
Low Value (SOR)	0.59	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.59	S	0.59	1.5	0
0.59	S	0.59	1.5	0
0.67	S	0.67	3	0
0.68	S	0.68	4	0
0.69	S	0.69	5	0
0.72	S	0.72	6.5	0
0.72	S	0.72	6.5	0
0.74	S	0.74	8	0
0.81	S	0.81	9	0
0.83	S	0.83	10	0

DQA Surface Soil Report

Statistical Test Summary

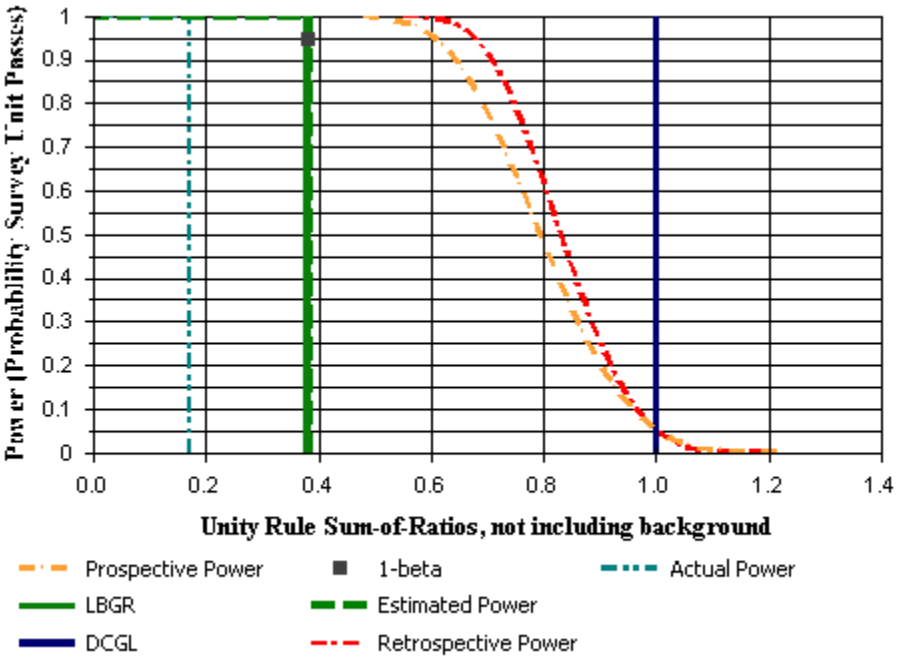
Data	Type	Adjusted Data	Rank	Reference Rank
0.85	S	0.85	11	0
0.94	S	0.94	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU45 rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
906	S	1.06	1.47
907	S	0.69	0.9
908	S	0.91	1.48
909	S	0.43	0.86
910	S	0.62	0.67
912	S	0.79	0.48
913	S	0.89	1.51
915	S	1.08	1.23
916	S	1.13	1.08
917	S	0.57	0.57
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
906	S	1.03
907	S	0.65
908	S	0.99
909	S	0.54
910	S	0.52
912	S	0.49
913	S	0.99
915	S	0.93
916	S	0.88
917	S	0.46
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.75	0.66	0.38
Median (SOR)	0.77	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.3
High Value (SOR)	1.03	0.93	N/A
Low Value (SOR)	0.46	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

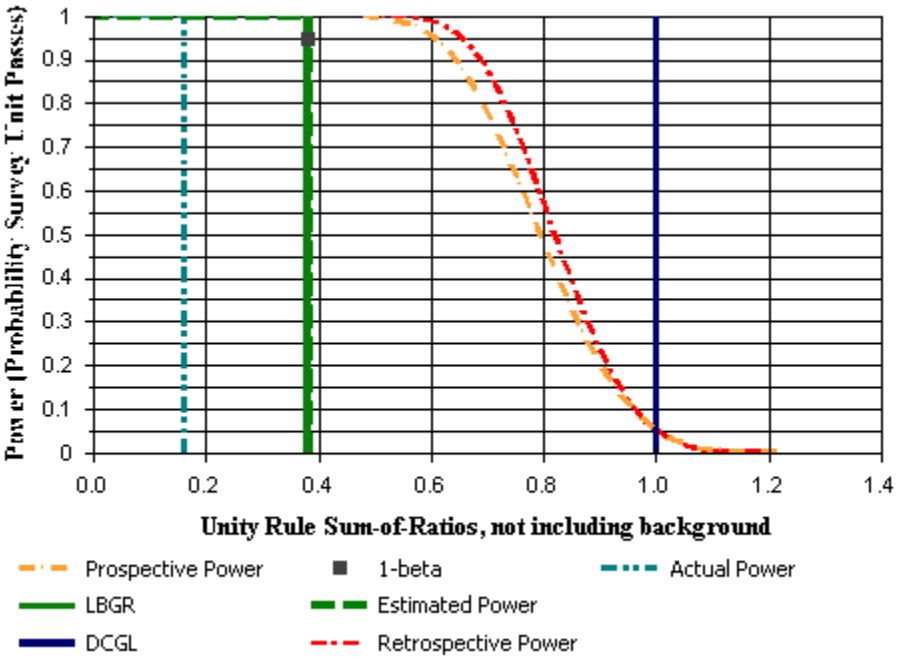
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.46	S	0.46	1	0
0.49	S	0.49	2	0
0.52	S	0.52	3	0
0.54	S	0.54	4	0
0.65	S	0.65	5	0
0.88	S	0.88	6	0
0.93	S	0.93	7	0
0.99	S	0.99	8.5	0
0.99	S	0.99	8.5	0
1.03	S	1.03	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU46		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
918	S	1.07	1.22
919	S	1	1.34
920	S	0.88	1.08
921	S	0.48	0.64
922	S	0.65	0.46
923	S	0.91	0.67
925	S	1.17	1.6
926	S	1.07	0.85
927	S	0.66	0.44
928	S	1.36	1.48
929	S	1.1	0.76
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
918	S	0.92
919	S	0.95
920	S	0.79
921	S	0.46
922	S	0.43
923	S	0.62
925	S	1.13
926	S	0.76
927	S	0.43
928	S	1.14
929	S	0.72
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=13
Mean (SOR)	0.76	0.66	0.38
Median (SOR)	0.76	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.3
High Value (SOR)	1.14	0.93	N/A
Low Value (SOR)	0.43	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.43	S	0.43	1.5	0
0.43	S	0.43	1.5	0
0.46	S	0.46	3	0
0.62	S	0.62	4	0
0.72	S	0.72	5	0
0.76	S	0.76	6	0
0.79	S	0.79	7	0
0.92	S	0.92	8	0
0.95	S	0.95	9	0
1.13	S	1.13	10	0

DQA Surface Soil Report

Statistical Test Summary

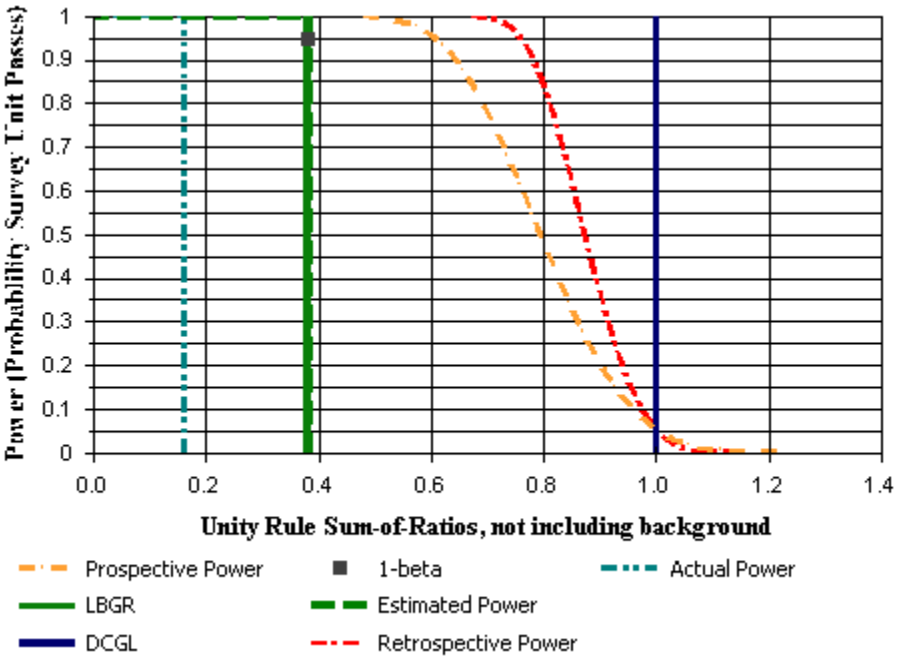
Data	Type	Adjusted Data	Rank	Reference Rank
1.14	S	1.14	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU47		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
931	S	0.75	0.91
932	S	0.52	0.72
933	S	1.05	1.24
934	S	0.76	0.83
936	S	1.1	1.11
937	S	0.95	1.06
938	S	0.75	1.06
939	S	1.01	0.94
940	S	0.85	0.86
941	S	1.18	1.54
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
931	S	0.67
932	S	0.51
933	S	0.93
934	S	0.64
936	S	0.88
937	S	0.81
938	S	0.74
939	S	0.78
940	S	0.68
941	S	1.11
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.78	0.66	0.38
Median (SOR)	0.76	0.60	N/A
Std Dev (SOR)	0.17	0.18	0.3
High Value (SOR)	1.11	0.93	N/A
Low Value (SOR)	0.51	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

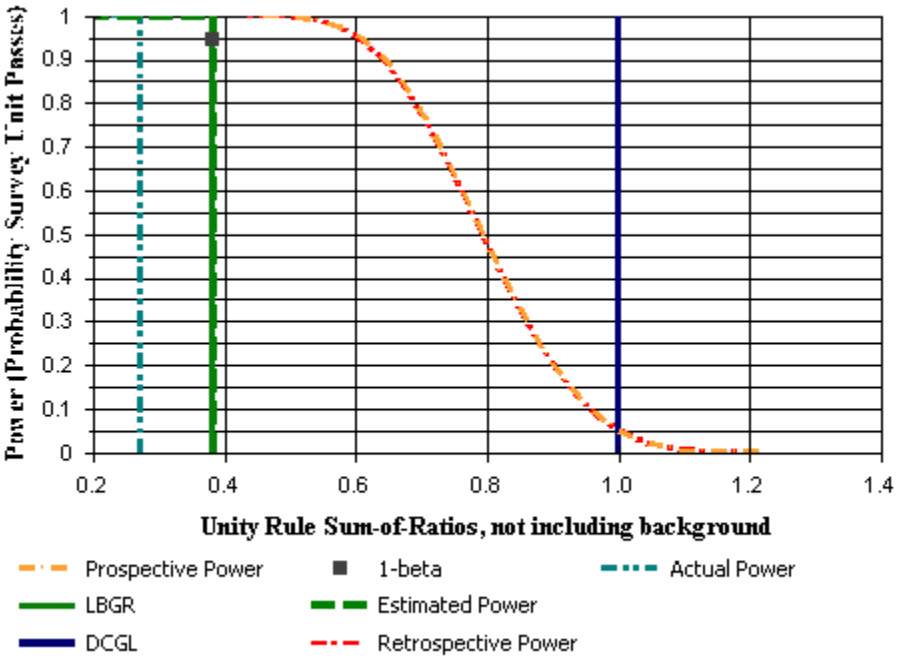
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.51	S	0.51	1	0
0.64	S	0.64	2	0
0.67	S	0.67	3	0
0.68	S	0.68	4	0
0.74	S	0.74	5	0
0.78	S	0.78	6	0
0.81	S	0.81	7	0
0.88	S	0.88	8	0
0.93	S	0.93	9	0
1.11	S	1.11	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU48		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
942	S	1.2	1.91
943	S	1.11	1.44
944	S	0.97	1.17
945	S	0.23	0.46
946	S	0.8	0.72
948	S	0.51	0.57
949	S	1.1	1.21
950	S	0.51	0.74
951	S	0.88	1.4
952	S	0.81	0.8
953	S	1.04	1.3
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
942	S	1.28
943	S	1.04
944	S	0.87
945	S	0.29
946	S	0.6
948	S	0.43
949	S	0.93
950	S	0.51
951	S	0.94
952	S	0.64
953	S	0.95
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=13
Mean (SOR)	0.77	0.66	0.38
Median (SOR)	0.87	0.60	N/A
Std Dev (SOR)	0.30	0.18	0.3
High Value (SOR)	1.28	0.93	N/A
Low Value (SOR)	0.29	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.29	S	0.29	1	0
0.43	S	0.43	2	0
0.51	S	0.51	3	0
0.6	S	0.6	4	0
0.64	S	0.64	5	0
0.87	S	0.87	6	0
0.93	S	0.93	7	0
0.94	S	0.94	8	0
0.95	S	0.95	9	0
1.04	S	1.04	10	0

DQA Surface Soil Report

Statistical Test Summary

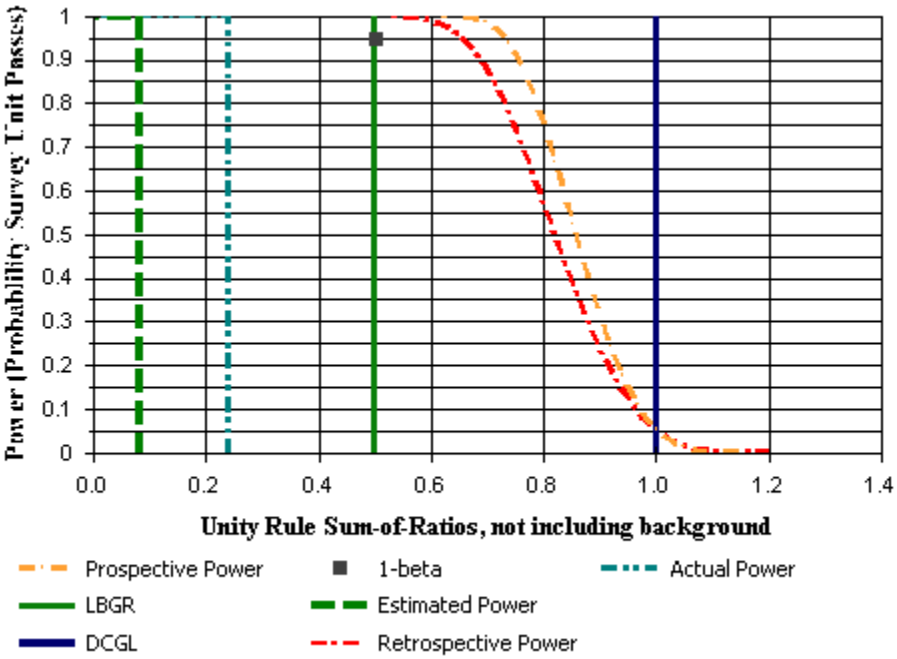
Data	Type	Adjusted Data	Rank	Reference Rank
1.28	S	1.28	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU49		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
954	S	0.85	0.89
955	S	0.85	1.07
956	S	1.13	1.74
957	S	1.21	2.05
958	S	0.93	1.28
959	S	1.23	1.06
960	S	1.45	1.36
961	S	0.62	1.03
962	S	0.8	1.09
963	S	0.58	0.77
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
954	S	0.7
955	S	0.78
956	S	1.18
957	S	1.35
958	S	0.9
959	S	0.91
960	S	1.12
961	S	0.68
962	S	0.77
963	S	0.55
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.89	0.66	0.08
Median (SOR)	0.84	0.60	N/A
Std Dev (SOR)	0.25	0.18	0.18
High Value (SOR)	1.35	0.93	N/A
Low Value (SOR)	0.55	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

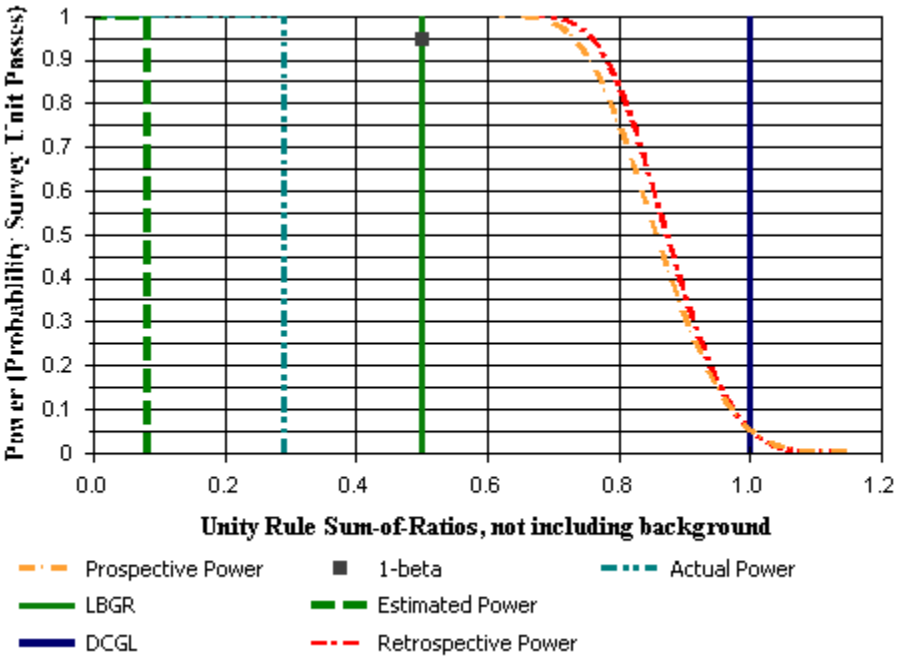
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.55	S	0.55	1	0
0.68	S	0.68	2	0
0.7	S	0.7	3	0
0.77	S	0.77	4	0
0.78	S	0.78	5	0
0.9	S	0.9	6	0
0.91	S	0.91	7	0
1.12	S	1.12	8	0
1.18	S	1.18	9	0
1.35	S	1.35	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU50		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
964	S	0.94	1.05
965	S	0.97	0.95
966	S	1.22	1.9
967	S	1.08	1.2
968	S	1.04	1.38
969	S	1.2	1.12
970	S	0.83	1.02
971	S	1.03	1.11
972	S	0.9	0.94
973	S	1.19	1.15
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
964	S	0.8
965	S	0.77
966	S	1.28
967	S	0.92
968	S	0.99
969	S	0.92
970	S	0.75
971	S	0.86
972	S	0.74
973	S	0.93
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.90	0.66	0.08
Median (SOR)	0.89	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.18
High Value (SOR)	1.28	0.93	N/A
Low Value (SOR)	0.74	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

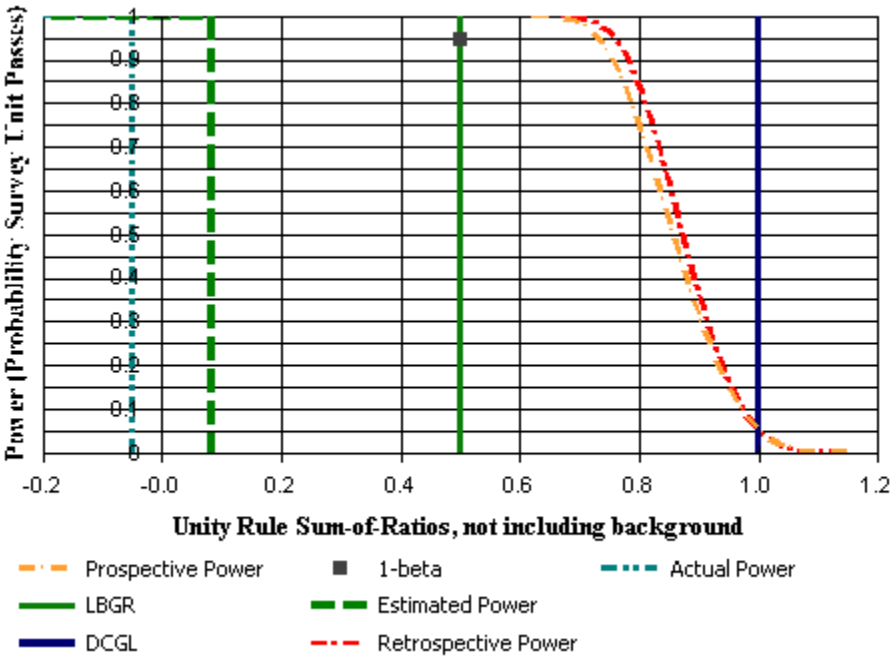
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.74	S	0.74	1	0
0.75	S	0.75	2	0
0.77	S	0.77	3	0
0.8	S	0.8	4	0
0.86	S	0.86	5	0
0.92	S	0.92	6.5	0
0.92	S	0.92	6.5	0
0.93	S	0.93	8	0
0.99	S	0.99	9	0
1.28	S	1.28	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU51		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
974	S	0.78	0.81
975	S	0.86	1.12
976	S	0.55	0.81
977	S	0.71	0.74
978	S	0.49	0.54
979	S	0.45	0.47
980	S	0.35	0.33
981	S	0.84	0.55
982	S	0.6	0.66
983	S	0.78	0.84
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
974	S	0.64
975	S	0.81
976	S	0.56
977	S	0.58
978	S	0.41
979	S	0.37
980	S	0.27
981	S	0.54
982	S	0.51
983	S	0.65
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.53	0.66	0.08
Median (SOR)	0.55	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.18
High Value (SOR)	0.81	0.93	N/A
Low Value (SOR)	0.27	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

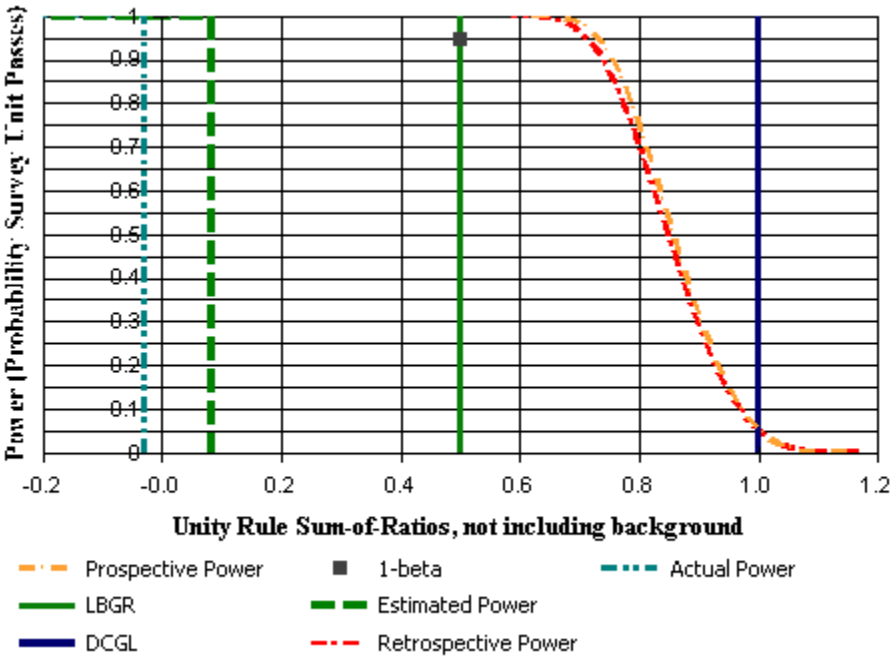
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.27	S	0.27	1	0
0.37	S	0.37	2	0
0.41	S	0.41	3	0
0.51	S	0.51	4	0
0.54	S	0.54	5	0
0.56	S	0.56	6	0
0.58	S	0.58	7	0
0.64	S	0.64	8	0
0.65	S	0.65	9	0
0.81	S	0.81	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU52		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
984	S	1.68	1.13
985	S	0.55	0.59
986	S	0.51	0.86
988	S	0.56	1.01
989	S	0.85	0.79
990	S	0.87	0.16
991	S	0.49	0.72
992	S	0.57	1.07
993	S	0.75	0.69
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
984	S	1.09
985	S	0.46
986	S	0.57
988	S	0.65
989	S	0.65
990	S	0.37
991	S	0.5
992	S	0.68
993	S	0.57
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.62	0.66	0.08
Median (SOR)	0.57	0.60	N/A
Std Dev (SOR)	0.20	0.18	0.18
High Value (SOR)	1.09	0.93	N/A
Low Value (SOR)	0.37	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

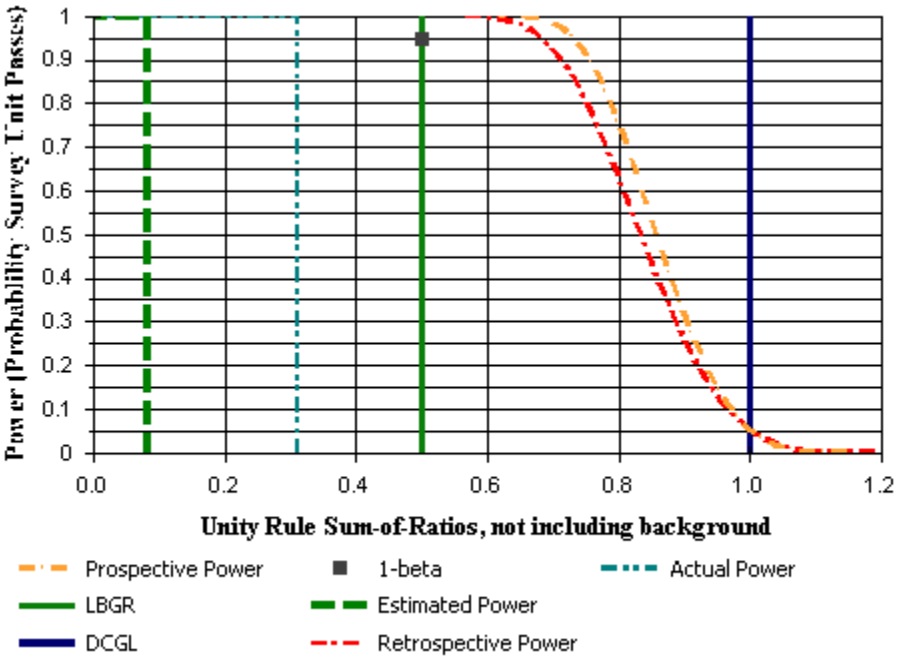
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.37	S	0.37	1	0
0.46	S	0.46	2	0
0.5	S	0.5	3	0
0.57	S	0.57	4.5	0
0.57	S	0.57	4.5	0
0.65	S	0.65	6.5	0
0.65	S	0.65	6.5	0
0.68	S	0.68	8	0
1.09	S	1.09	9	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU53 rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
994	S	1.05	0.97
995	S	0.61	0.78
996	S	1.05	1.07
997	S	1.16	0.97
998	S	1.1	1.34
999	S	1.28	1.85
1000	S	1.28	1.16
1001	S	1.41	1.86
1002	S	1.27	1.46
1003	S	0.94	1.13
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
994	S	0.8
995	S	0.56
996	S	0.85
997	S	0.84
998	S	0.99
999	S	1.28
1000	S	0.97
1001	S	1.33
1002	S	1.1
1003	S	0.84
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.96	0.66	0.08
Median (SOR)	0.91	0.60	N/A
Std Dev (SOR)	0.23	0.18	0.18
High Value (SOR)	1.33	0.93	N/A
Low Value (SOR)	0.56	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

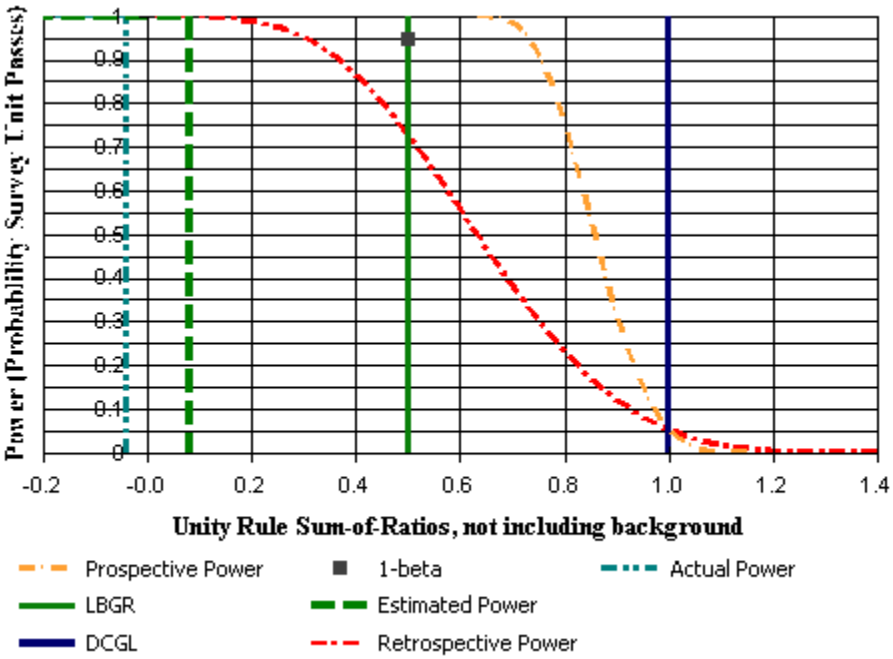
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.56	S	0.56	1	0
0.8	S	0.8	2	0
0.84	S	0.84	3.5	0
0.84	S	0.84	3.5	0
0.85	S	0.85	5	0
0.97	S	0.97	6	0
0.99	S	0.99	7	0
1.1	S	1.1	8	0
1.28	S	1.28	9	0
1.33	S	1.33	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU54		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)	
1004	S	0.95	1.11	
1005	S	0.65	0.73	
1006	S	2.18	2.8	RR ballast
1007	S	0.54	1.18	
1008	S	0.39	0.76	
1009	S	0.52	0.63	
1010	S	0.49	0.77	
1011	S	0.48	0.62	
1013	S	1.05	1.01	
43	R	0.72	0.73	
44	R	0.51	0.34	
45	R	0.5	0.74	
46	R	0.77	0.83	
47	R	1.32	0.92	
48	R	1.24	1.1	
49	R	1.12	0.97	
50	R	0.81	1.21	
51	R	0.71	0.74	
52	R	0.91	1.18	
53	R	0.58	0.49	
54	R	0.6	0.84	
55	R	0.71	0.79	
56	R	0.73	0.69	
57	R	0.91	0.95	

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1004	S	0.83
1005	S	0.56
1006	S	2.02
1007	S	0.72
1008	S	0.48
1009	S	0.47
1010	S	0.52
1011	S	0.45
1013	S	0.82
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.76	0.66	0.08
Median (SOR)	0.56	0.60	N/A
Std Dev (SOR)	0.49	0.18	0.18
High Value (SOR)	2.02	0.93	N/A
Low Value (SOR)	0.45	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	240
Critical Value:	215
Result:	Pass

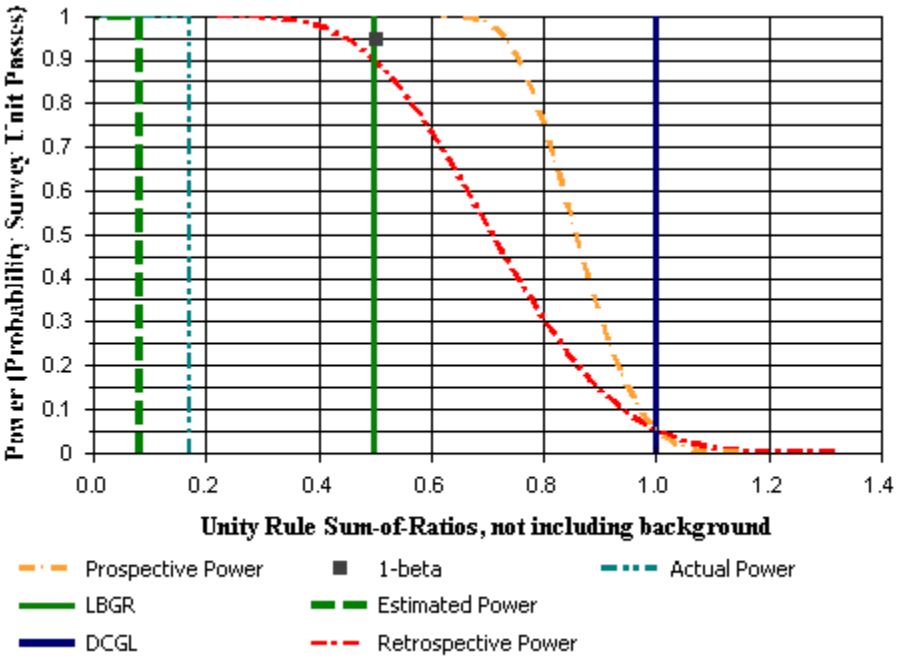
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	9	9
0.42	R	1.42	10	10
0.51	R	1.51	11	11
0.57	R	1.57	12	12
0.58	R	1.58	13.5	13.5
0.58	R	1.58	13.5	13.5
0.59	R	1.59	15	15
0.6	R	1.6	16	16
0.64	R	1.64	17	17
0.75	R	1.75	18	18
0.83	R	1.83	19.5	19.5
0.83	R	1.83	19.5	19.5
0.85	R	1.85	21	21
0.87	R	1.87	22	22
0.93	R	1.93	23	23
0.45	S	0.45	1	0
0.47	S	0.47	2	0
0.48	S	0.48	3	0
0.52	S	0.52	4	0
0.56	S	0.56	5	0
0.72	S	0.72	6	0
0.82	S	0.82	7	0
0.83	S	0.83	8	0
2.02	S	2.02	24	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU55		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1015	S	1.17	1.74
1016	S	0.95	0.94
1017	S	0.76	1.12
1018	S	1.56	1.8
1019	S	0.88	1.07
1020	S	0.68	0.83
1021	S	0.8	1.22
1022	S	0.26	0.1
1023	S	0.41	0.21
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1015	S	1.19
1016	S	0.75
1017	S	0.77
1018	S	1.36
1019	S	0.79
1020	S	0.61
1021	S	0.83
1022	S	0.14
1023	S	0.24
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.74	0.66	0.08
Median (SOR)	0.77	0.60	N/A
Std Dev (SOR)	0.39	0.18	0.18
High Value (SOR)	1.36	0.93	N/A
Low Value (SOR)	0.14	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	254
Critical Value:	215
Result:	Pass

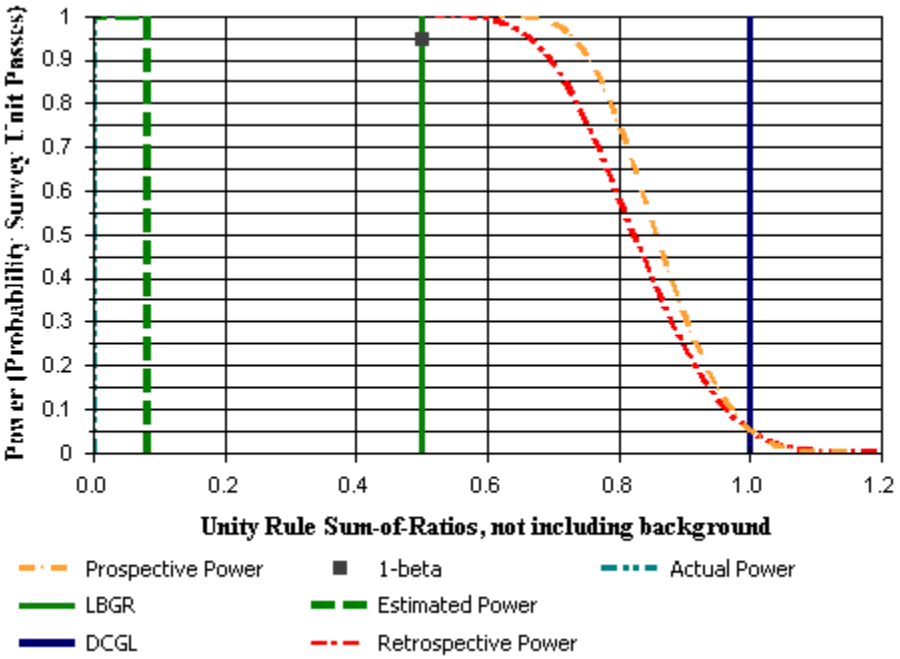
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	9	9
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.14	S	0.14	1	0
0.24	S	0.24	2	0
0.61	S	0.61	3	0
0.75	S	0.75	4	0
0.77	S	0.77	5	0
0.79	S	0.79	6	0
0.83	S	0.83	7	0
1.19	S	1.19	8	0
1.36	S	1.36	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU56		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1025	S	0.65	0.48
1026	S	0.71	0.81
1027	S	0.53	0.64
1028	S	0.66	0.64
1029	S	0.79	0.72
1030	S	1.08	1.62
1031	S	0.96	1.29
1032	S	0.74	0.53
1033	S	1.04	1.14
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1025	S	0.44
1026	S	0.61
1027	S	0.47
1028	S	0.52
1029	S	0.6
1030	S	1.11
1031	S	0.92
1032	S	0.5
1033	S	0.88
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.67	0.66	0.08
Median (SOR)	0.60	0.60	N/A
Std Dev (SOR)	0.24	0.18	0.18
High Value (SOR)	1.11	0.93	N/A
Low Value (SOR)	0.44	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

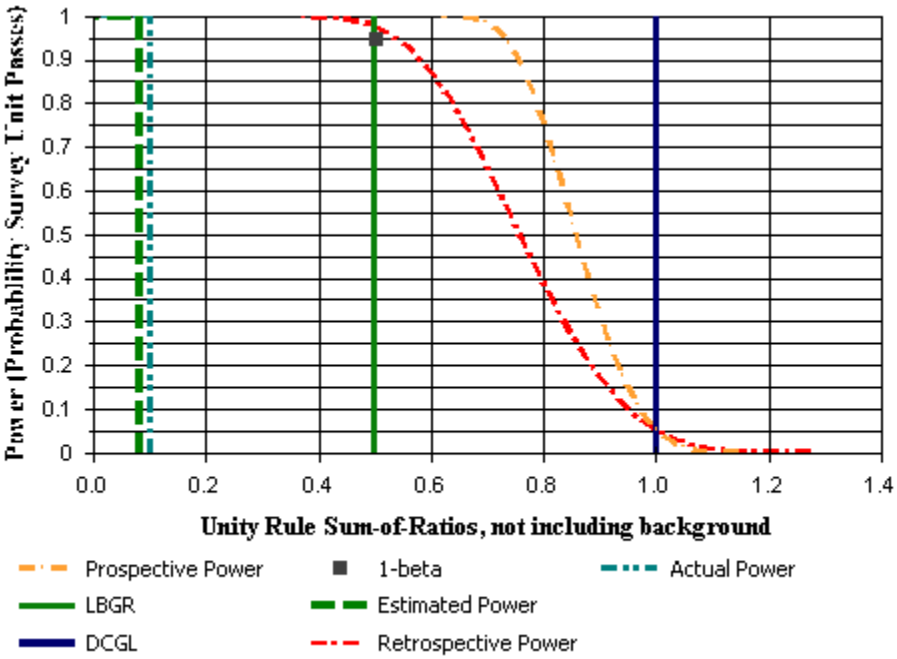
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.44	S	0.44	1	0
0.47	S	0.47	2	0
0.5	S	0.5	3	0
0.52	S	0.52	4	0
0.6	S	0.6	5	0
0.61	S	0.61	6	0
0.88	S	0.88	7	0
0.92	S	0.92	8	0
1.11	S	1.11	9	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU57		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1034	S	0.72	0.69
1035	S	0.46	0.47
1036	S	0.83	0.92
1037	S	0.68	0.95
1038	S	0.55	1.02
1039	S	1.98	1.33
1040	S	0.85	1
1041	S	0.94	0.82
1042	S	0.59	1.06
1043	S	1.83	1.9
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1034	S	0.56
1035	S	0.37
1036	S	0.7
1037	S	0.67
1038	S	0.65
1039	S	1.29
1040	S	0.75
1041	S	0.7
1042	S	0.69
1043	S	1.49
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.79	0.66	0.08
Median (SOR)	0.70	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.18
High Value (SOR)	1.49	0.93	N/A
Low Value (SOR)	0.37	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	268
Critical Value:	225
Result:	Pass

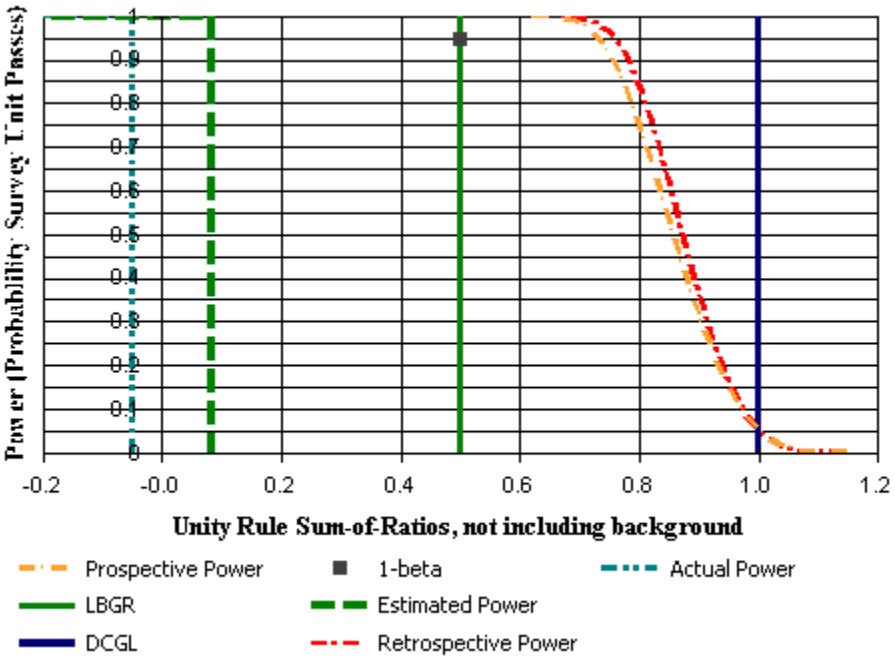
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.37	S	0.37	1	0
0.56	S	0.56	2	0
0.65	S	0.65	3	0
0.67	S	0.67	4	0
0.69	S	0.69	5	0
0.7	S	0.7	6.5	0
0.7	S	0.7	6.5	0
0.75	S	0.75	8	0
1.29	S	1.29	9	0
1.49	S	1.49	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU58		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1044	S	0.71	0.69
1045	S	0.5	0.47
1046	S	0.49	0.48
1047	S	0.66	0.41
1048	S	0.64	0.67
1049	S	0.92	0.96
1050	S	0.67	0.59
1051	S	0.58	1
1052	S	0.73	1.28
1053	S	0.74	1.14
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1044	S	0.56
1045	S	0.39
1046	S	0.39
1047	S	0.41
1048	S	0.53
1049	S	0.75
1050	S	0.5
1051	S	0.65
1052	S	0.83
1053	S	0.77
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.58	0.66	0.08
Median (SOR)	0.55	0.60	N/A
Std Dev (SOR)	0.16	0.18	0.18
High Value (SOR)	0.83	0.93	N/A
Low Value (SOR)	0.39	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

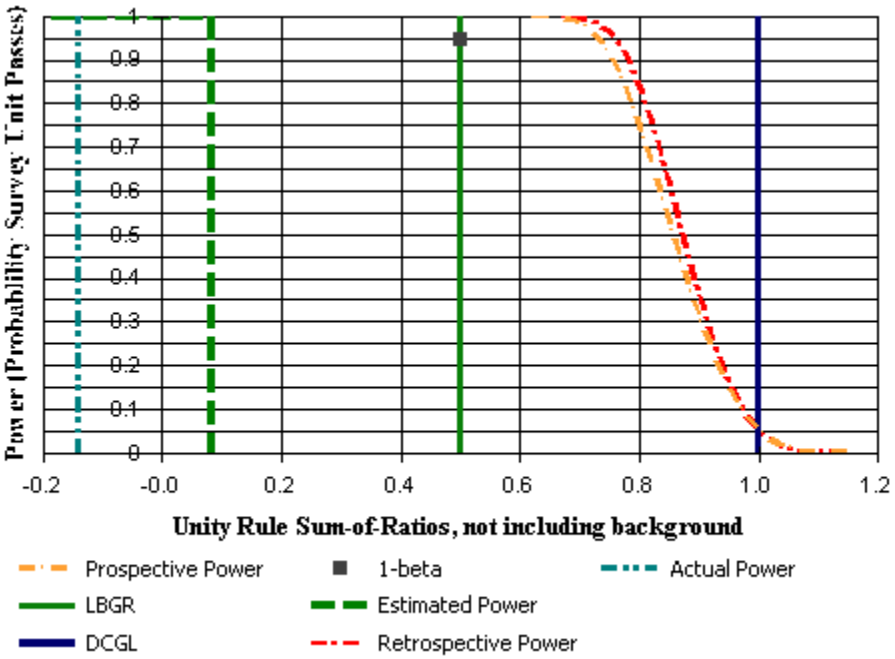
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.39	S	0.39	1.5	0
0.39	S	0.39	1.5	0
0.41	S	0.41	3	0
0.5	S	0.5	4	0
0.53	S	0.53	5	0
0.56	S	0.56	6	0
0.65	S	0.65	7	0
0.75	S	0.75	8	0
0.77	S	0.77	9	0
0.83	S	0.83	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU59		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1054	S	0.49	0.65
1055	S	0.51	0.37
1056	S	0.57	0.52
1057	S	0.65	1.1
1058	S	0.58	0.56
1059	S	0.52	0.46
1060	S	0.53	1.07
1061	S	0.6	0.76
1062	S	0.35	0.4
1063	S	0.69	0.77
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1054	S	0.46
1055	S	0.34
1056	S	0.43
1057	S	0.72
1058	S	0.45
1059	S	0.39
1060	S	0.67
1061	S	0.55
1062	S	0.3
1063	S	0.59
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.49	0.66	0.08
Median (SOR)	0.46	0.60	N/A
Std Dev (SOR)	0.14	0.18	0.18
High Value (SOR)	0.72	0.93	N/A
Low Value (SOR)	0.30	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

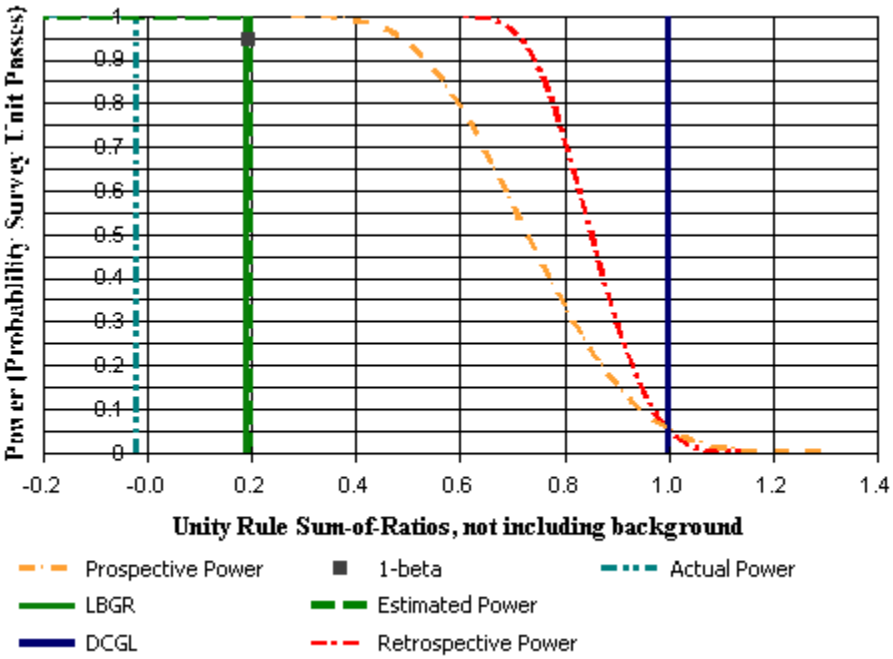
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.3	S	0.3	1	0
0.34	S	0.34	2	0
0.39	S	0.39	3	0
0.43	S	0.43	4	0
0.45	S	0.45	5	0
0.46	S	0.46	6	0
0.55	S	0.55	7	0
0.59	S	0.59	8	0
0.67	S	0.67	9	0
0.72	S	0.72	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU60		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1064	S	0.77	0.72
1065	S	0.44	0.49
1066	S	0.85	1.1
1067	S	0.74	0.81
1068	S	0.78	1.11
1069	S	0.58	0.81
1070	S	0.77	1.15
1071	S	0.53	0.76
1072	S	0.69	0.61
1073	S	1.02	1.64
1074	S	0.55	0.68
1075	S	0.49	0.23
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1064	S	0.59
1065	S	0.37
1066	S	0.79
1067	S	0.62
1068	S	0.77
1069	S	0.57
1070	S	0.79
1071	S	0.53
1072	S	0.52
1073	S	1.1
1074	S	0.5
1075	S	0.27
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=11
Mean (SOR)	0.62	0.66	0.2
Median (SOR)	0.58	0.60	N/A
Std Dev (SOR)	0.22	0.18	0.36
High Value (SOR)	1.10	0.93	N/A
Low Value (SOR)	0.27	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.27	S	0.27	1	0
0.37	S	0.37	2	0
0.5	S	0.5	3	0
0.52	S	0.52	4	0
0.53	S	0.53	5	0
0.57	S	0.57	6	0
0.59	S	0.59	7	0
0.62	S	0.62	8	0
0.77	S	0.77	9	0
0.79	S	0.79	10.5	0

DQA Surface Soil Report

Statistical Test Summary

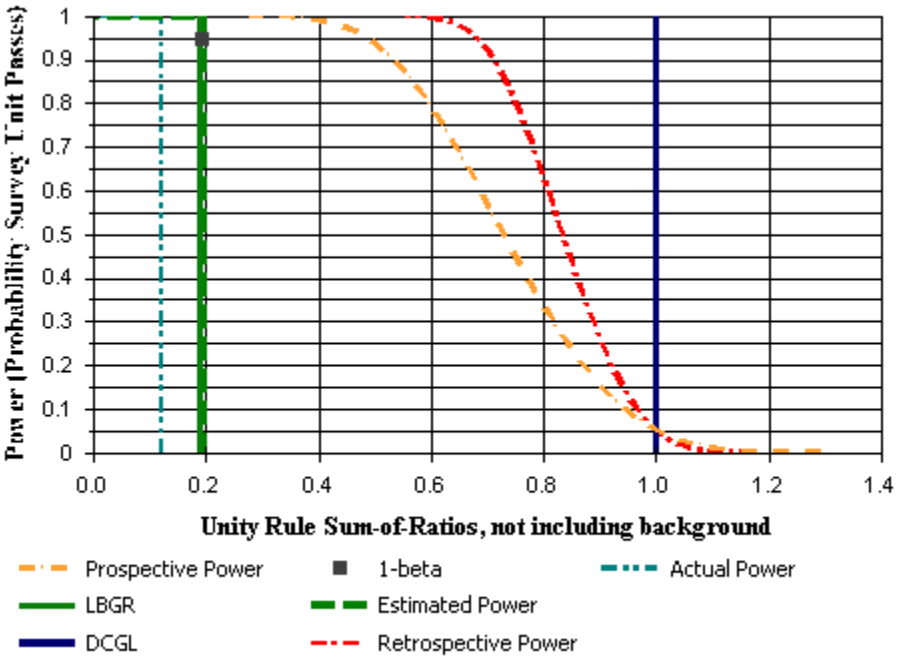
Data	Type	Adjusted Data	Rank	Reference Rank
0.79	S	0.79	10.5	0
1.1	S	1.1	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU61		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1076	S	0.34	0.64
1077	S	0.37	0.49
1078	S	0.63	0.63
1079	S	0.67	1.24
1080	S	1.1	1.35
1081	S	1.14	1.42
1082	S	0.84	0.94
1083	S	0.43	0.37
1084	S	1.17	0.94
1085	S	0.8	0.96
1086	S	0.6	0.66
1087	S	1.12	1.02
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1076	S	0.41
1077	S	0.35
1078	S	0.5
1079	S	0.79
1080	S	0.99
1081	S	1.04
1082	S	0.72
1083	S	0.32
1084	S	0.83
1085	S	0.71
1086	S	0.51
1087	S	0.85
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=11
Mean (SOR)	0.67	0.66	0.2
Median (SOR)	0.72	0.60	N/A
Std Dev (SOR)	0.25	0.18	0.36
High Value (SOR)	1.04	0.93	N/A
Low Value (SOR)	0.32	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.32	S	0.32	1	0
0.35	S	0.35	2	0
0.41	S	0.41	3	0
0.5	S	0.5	4	0
0.51	S	0.51	5	0
0.71	S	0.71	6	0
0.72	S	0.72	7	0
0.79	S	0.79	8	0
0.83	S	0.83	9	0
0.85	S	0.85	10	0

DQA Surface Soil Report

Statistical Test Summary

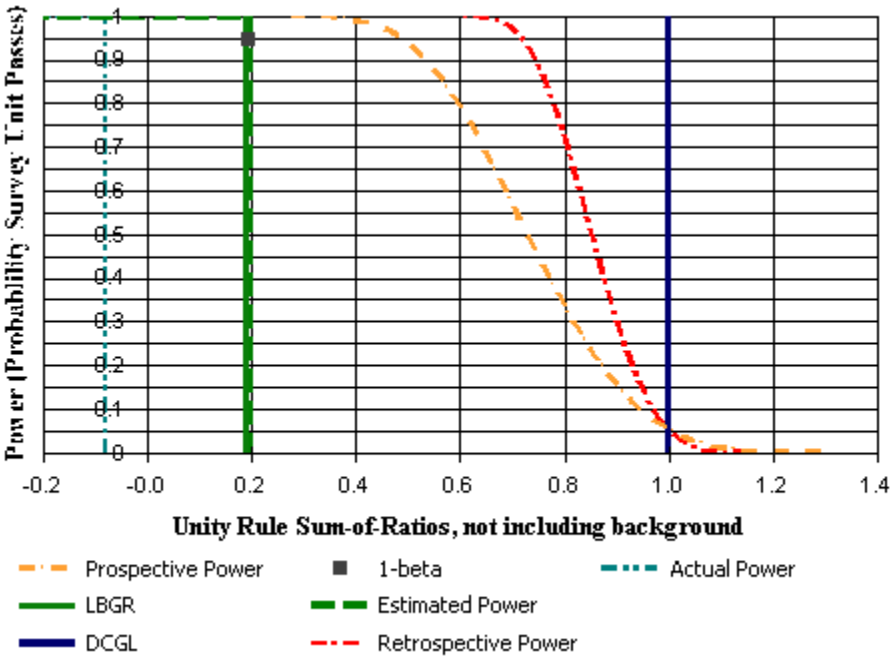
Data	Type	Adjusted Data	Rank	Reference Rank
0.99	S	0.99	11	0
1.04	S	1.04	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU62		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1088	S	0.49	0.59
1089	S	0.88	1.02
1090	S	0.31	0.5
1091	S	0.71	0.58
1092	S	0.72	0.99
1093	S	0.46	0.79
1094	S	0.3	0.32
1095	S	1.17	1.21
1096	S	0.4	1
1097	S	0.78	0.89
1098	S	0.34	0.45
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1088	S	0.44
1089	S	0.77
1090	S	0.33
1091	S	0.51
1092	S	0.7
1093	S	0.52
1094	S	0.25
1095	S	0.95
1096	S	0.59
1097	S	0.67
1098	S	0.32
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.55	0.66	0.2
Median (SOR)	0.52	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.36
High Value (SOR)	0.95	0.93	N/A
Low Value (SOR)	0.25	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.25	S	0.25	1	0
0.32	S	0.32	2	0
0.33	S	0.33	3	0
0.44	S	0.44	4	0
0.51	S	0.51	5	0
0.52	S	0.52	6	0
0.59	S	0.59	7	0
0.67	S	0.67	8	0
0.7	S	0.7	9	0
0.77	S	0.77	10	0

DQA Surface Soil Report

Statistical Test Summary

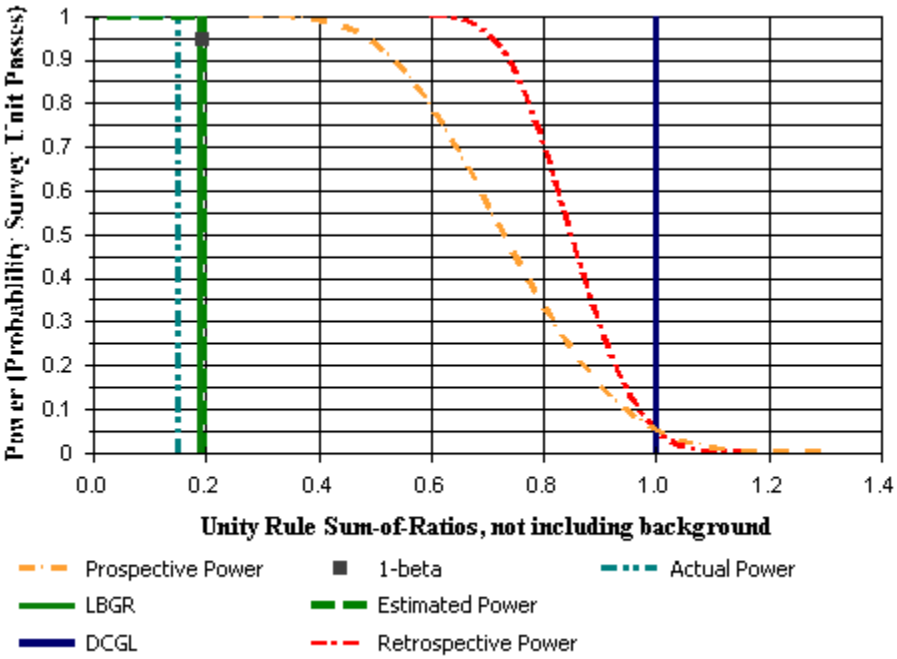
Data	Type	Adjusted Data	Rank	Reference Rank
0.95	S	0.95	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU63		
Report Number:	1		
Survey Unit Samples:	13		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1100	S	0.88	1.29
1101	S	0.84	0.81
1102	S	0.77	1.07
1103	S	1.01	1.3
1104	S	0.9	0.71
1105	S	1.38	1.57
1106	S	1.16	1.29
1107	S	0.82	1.38
1108	S	0.99	0.81
1109	S	0.62	0.87
1110	S	0.33	0.29
1111	S	0.63	1.01
1112	S	0.91	0.98
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1100	S	0.89
1101	S	0.66
1102	S	0.75
1103	S	0.94
1104	S	0.63
1105	S	1.19
1106	S	0.99
1107	S	0.91
1108	S	0.71
1109	S	0.61
1110	S	0.25
1111	S	0.68

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1112	S	0.76
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	13	15	N/2=11
Mean (SOR)	0.77	0.66	0.2
Median (SOR)	0.75	0.60	N/A
Std Dev (SOR)	0.23	0.18	0.36
High Value (SOR)	1.19	0.93	N/A
Low Value (SOR)	0.25	0.33	N/A

Statistical Test Summary

Sum of Ranks:	406
Sum of Reference Ranks:	315
Critical Value:	253
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	14	14
0.42	R	1.42	15	15
0.51	R	1.51	16	16
0.57	R	1.57	17	17
0.58	R	1.58	18.5	18.5
0.58	R	1.58	18.5	18.5
0.59	R	1.59	20	20
0.6	R	1.6	21	21
0.64	R	1.64	22	22
0.75	R	1.75	23	23
0.83	R	1.83	24.5	24.5
0.83	R	1.83	24.5	24.5
0.85	R	1.85	26	26
0.87	R	1.87	27	27
0.93	R	1.93	28	28
0.25	S	0.25	1	0
0.61	S	0.61	2	0
0.63	S	0.63	3	0
0.66	S	0.66	4	0
0.68	S	0.68	5	0
0.71	S	0.71	6	0
0.75	S	0.75	7	0
0.76	S	0.76	8	0
0.89	S	0.89	9	0
0.91	S	0.91	10	0

DQA Surface Soil Report

Statistical Test Summary

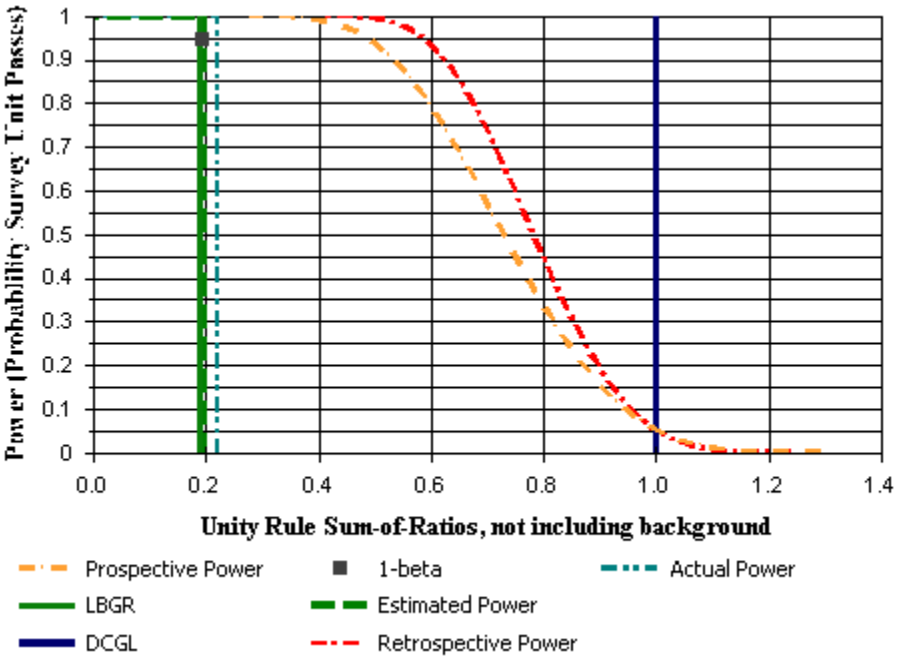
Data	Type	Adjusted Data	Rank	Reference Rank
0.94	S	0.94	11	0
0.99	S	0.99	12	0
1.19	S	1.19	13	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU64		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1113	S	0.28	0.38
1114	S	0.93	1.42
1116	S	1.1	1.17
1117	S	0.95	1.29
1119	S	0.75	0.77
1120	S	1.11	0.96
1121	S	1.21	1.55
1122	S	0.72	0.72
1123	S	0.32	0.49
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1113	S	0.27
1114	S	0.97
1116	S	0.91
1117	S	0.91
1119	S	0.61
1120	S	0.82
1121	S	1.12
1122	S	0.58
1123	S	0.33
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=11
Mean (SOR)	0.72	0.66	0.2
Median (SOR)	0.82	0.60	N/A
Std Dev (SOR)	0.29	0.18	0.36
High Value (SOR)	1.12	0.93	N/A
Low Value (SOR)	0.27	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

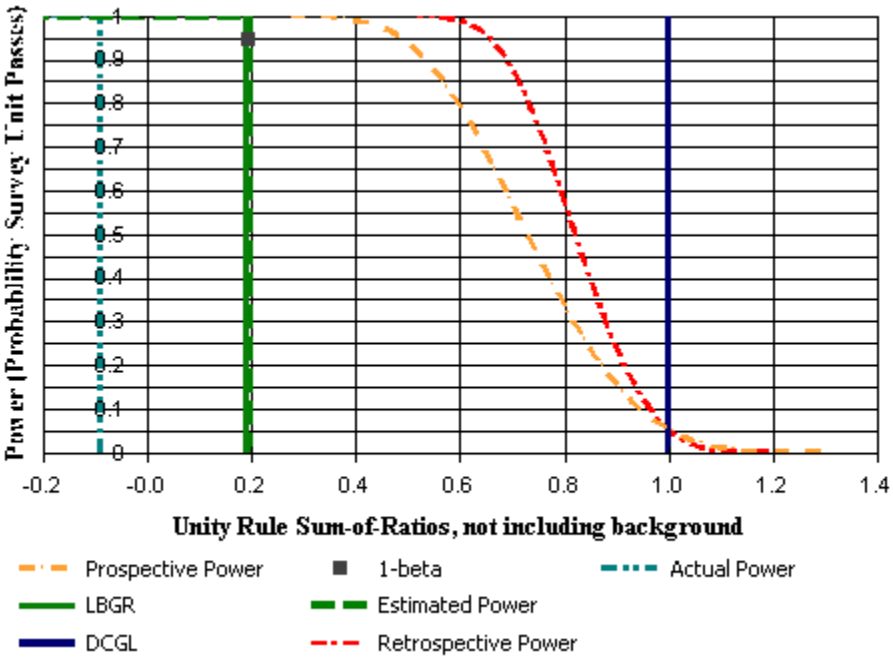
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.27	S	0.27	1	0
0.33	S	0.33	2	0
0.58	S	0.58	3	0
0.61	S	0.61	4	0
0.82	S	0.82	5	0
0.91	S	0.91	6.5	0
0.91	S	0.91	6.5	0
0.97	S	0.97	8	0
1.12	S	1.12	9	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU65		
Report Number:	1		
Survey Unit Samples:	12		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1124	S	0.44	0.53
1125	S	0.57	0.66
1126	S	0.54	0.54
1127	S	0.41	0.32
1128	S	0.48	0.76
1129	S	0.43	0.47
1130	S	0.83	1.22
1131	S	1.06	1.65
1132	S	0.73	0.62
1133	S	0.66	0.6
1134	S	1.08	1.36
1135	S	0.79	1.12
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1124	S	0.39
1125	S	0.5
1126	S	0.43
1127	S	0.29
1128	S	0.51
1129	S	0.36
1130	S	0.84
1131	S	1.12
1132	S	0.53
1133	S	0.5
1134	S	0.99
1135	S	0.78
43	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	12	15	N/2=11
Mean (SOR)	0.60	0.66	0.2
Median (SOR)	0.51	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.36
High Value (SOR)	1.12	0.93	N/A
Low Value (SOR)	0.29	0.33	N/A

Statistical Test Summary

Sum of Ranks:	378
Sum of Reference Ranks:	300
Critical Value:	244
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	13	13
0.42	R	1.42	14	14
0.51	R	1.51	15	15
0.57	R	1.57	16	16
0.58	R	1.58	17.5	17.5
0.58	R	1.58	17.5	17.5
0.59	R	1.59	19	19
0.6	R	1.6	20	20
0.64	R	1.64	21	21
0.75	R	1.75	22	22
0.83	R	1.83	23.5	23.5
0.83	R	1.83	23.5	23.5
0.85	R	1.85	25	25
0.87	R	1.87	26	26
0.93	R	1.93	27	27
0.29	S	0.29	1	0
0.36	S	0.36	2	0
0.39	S	0.39	3	0
0.43	S	0.43	4	0
0.5	S	0.5	5.5	0
0.5	S	0.5	5.5	0
0.51	S	0.51	7	0
0.53	S	0.53	8	0
0.78	S	0.78	9	0
0.84	S	0.84	10	0

DQA Surface Soil Report

Statistical Test Summary

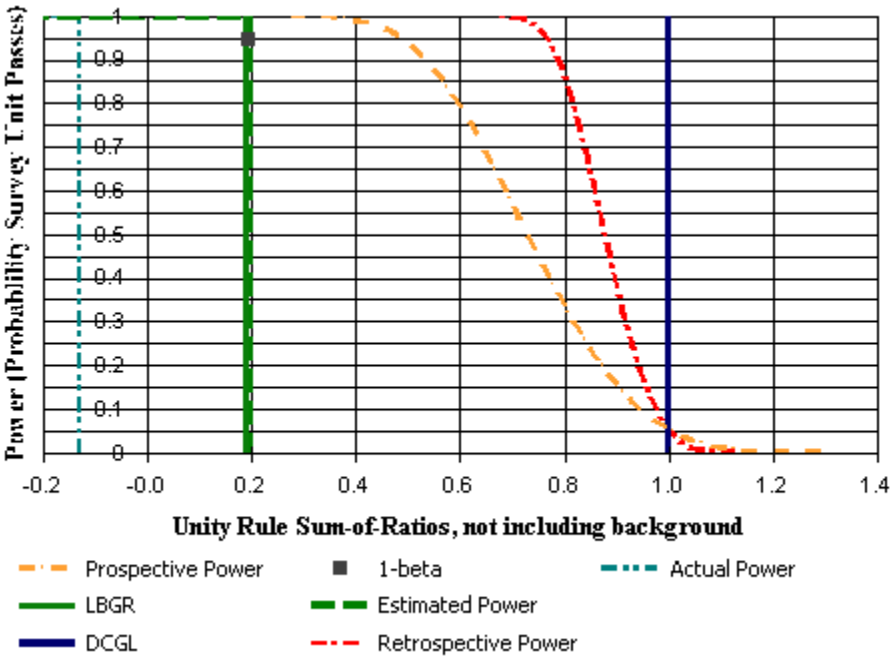
Data	Type	Adjusted Data	Rank	Reference Rank
0.99	S	0.99	11	0
1.12	S	1.12	12	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU66		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1137	S	0.71	1.07
1138	S	0.63	0.87
1139	S	0.67	0.65
1140	S	0.69	0.84
1141	S	0.54	0.47
1142	S	0.61	0.58
1143	S	0.27	0.49
1144	S	0.42	0.35
1145	S	0.6	1.05
1146	S	0.35	0.47
1147	S	0.3	0.35
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1137	S	0.73
1138	S	0.61
1139	S	0.53
1140	S	0.62
1141	S	0.4
1142	S	0.47
1143	S	0.32
1144	S	0.3
1145	S	0.68
1146	S	0.33
1147	S	0.26
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.48	0.66	0.2
Median (SOR)	0.47	0.60	N/A
Std Dev (SOR)	0.17	0.18	0.36
High Value (SOR)	0.73	0.93	N/A
Low Value (SOR)	0.26	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.26	S	0.26	1	0
0.3	S	0.3	2	0
0.32	S	0.32	3	0
0.33	S	0.33	4	0
0.4	S	0.4	5	0
0.47	S	0.47	6	0
0.53	S	0.53	7	0
0.61	S	0.61	8	0
0.62	S	0.62	9	0
0.68	S	0.68	10	0

DQA Surface Soil Report

Statistical Test Summary

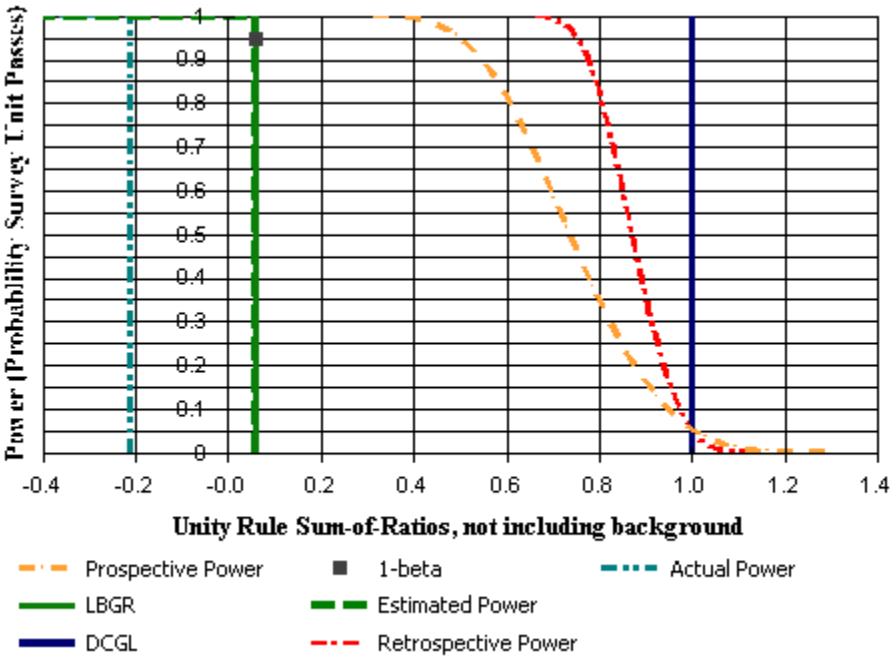
Data	Type	Adjusted Data	Rank	Reference Rank
0.73	S	0.73	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU67		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1148	S	0.42	0.86
1149	S	0.33	0.65
1150	S	0.37	0.33
1151	S	0.78	0.75
1152	S	0.75	1.14
1153	S	0.72	1.12
1154	S	0.37	0.56
1155	S	0.39	0.52
1156	S	0.37	0.3
1157	S	0.36	0.59
1158	S	0.33	0.36
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1148	S	0.54
1149	S	0.41
1150	S	0.28
1151	S	0.61
1152	S	0.78
1153	S	0.76
1154	S	0.38
1155	S	0.37
1156	S	0.26
1157	S	0.39
1158	S	0.28
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.46	0.66	0.06
Median (SOR)	0.39	0.60	N/A
Std Dev (SOR)	0.19	0.18	0.35
High Value (SOR)	0.78	0.93	N/A
Low Value (SOR)	0.26	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.26	S	0.26	1	0
0.28	S	0.28	2.5	0
0.28	S	0.28	2.5	0
0.37	S	0.37	4	0
0.38	S	0.38	5	0
0.39	S	0.39	6	0
0.41	S	0.41	7	0
0.54	S	0.54	8	0
0.61	S	0.61	9	0
0.76	S	0.76	10	0

DQA Surface Soil Report

Statistical Test Summary

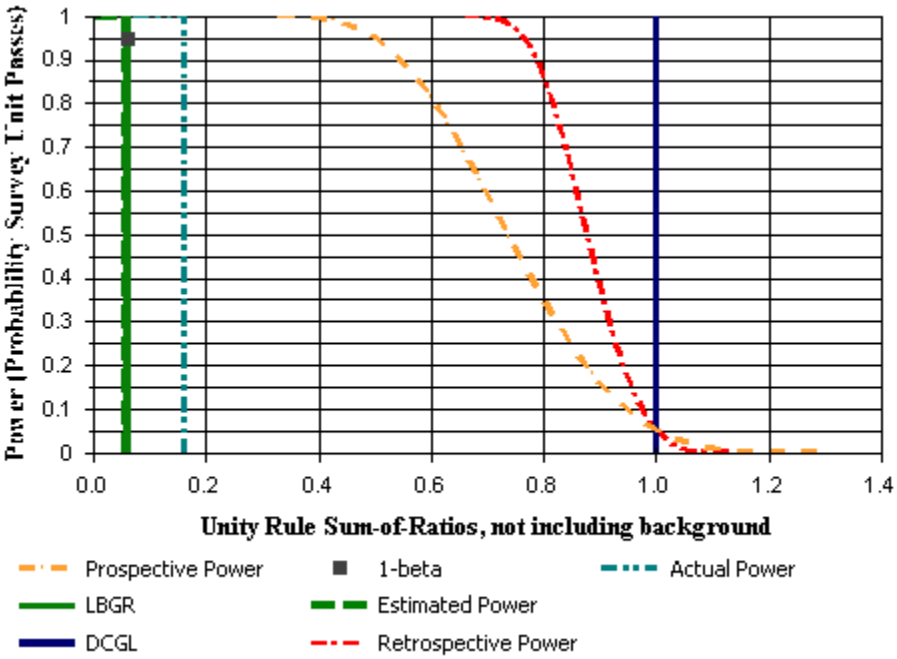
Data	Type	Adjusted Data	Rank	Reference Rank
0.78	S	0.78	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU68		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1159	S	1	1.22
1160	S	1.01	0.89
1161	S	0.6	0.75
1162	S	0.96	1.2
1163	S	1.01	1.32
1164	S	0.56	1.52
1165	S	0.7	1.14
1166	S	0.76	1.1
1167	S	0.98	1.37
1168	S	0.72	0.8
1169	S	0.82	0.9
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1159	S	0.9
1160	S	0.75
1161	S	0.55
1162	S	0.88
1163	S	0.95
1164	S	0.88
1165	S	0.76
1166	S	0.76
1167	S	0.96
1168	S	0.61
1169	S	0.69
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.79	0.66	0.06
Median (SOR)	0.76	0.60	N/A
Std Dev (SOR)	0.14	0.18	0.35
High Value (SOR)	0.96	0.93	N/A
Low Value (SOR)	0.55	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.55	S	0.55	1	0
0.61	S	0.61	2	0
0.69	S	0.69	3	0
0.75	S	0.75	4	0
0.76	S	0.76	5.5	0
0.76	S	0.76	5.5	0
0.88	S	0.88	7.5	0
0.88	S	0.88	7.5	0
0.9	S	0.9	9	0
0.95	S	0.95	10	0

DQA Surface Soil Report

Statistical Test Summary

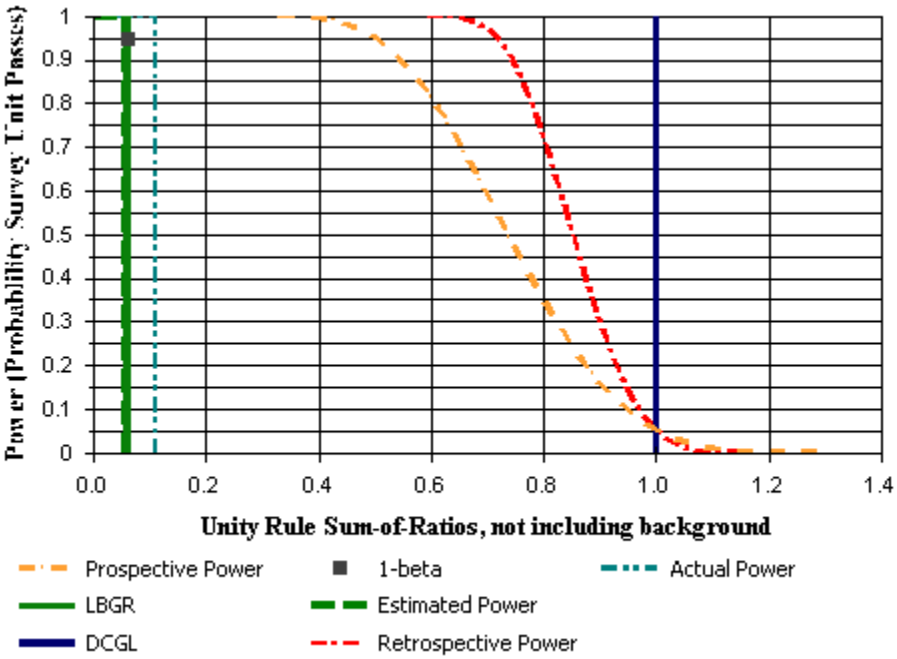
Data	Type	Adjusted Data	Rank	Reference Rank
0.96	S	0.96	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU69		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1170	S	1.15	0.91
1171	S	1.13	1.08
1172	S	0.58	2.08
1173	S	0.74	1
1174	S	0.49	0.85
1175	S	0.77	0.69
1176	S	0.94	1.26
1177	S	0.51	0.76
1178	S	0.79	0.67
1179	S	0.4	0.59
1180	S	0.35	1.38
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1170	S	0.81
1171	S	0.88
1172	S	1.15
1173	S	0.71
1174	S	0.56
1175	S	0.58
1176	S	0.9
1177	S	0.52
1178	S	0.58
1179	S	0.41
1180	S	0.75
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.71	0.66	0.06
Median (SOR)	0.71	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.35
High Value (SOR)	1.15	0.93	N/A
Low Value (SOR)	0.41	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	285
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	12	12
0.42	R	1.42	13	13
0.51	R	1.51	14	14
0.57	R	1.57	15	15
0.58	R	1.58	16.5	16.5
0.58	R	1.58	16.5	16.5
0.59	R	1.59	18	18
0.6	R	1.6	19	19
0.64	R	1.64	20	20
0.75	R	1.75	21	21
0.83	R	1.83	22.5	22.5
0.83	R	1.83	22.5	22.5
0.85	R	1.85	24	24
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.41	S	0.41	1	0
0.52	S	0.52	2	0
0.56	S	0.56	3	0
0.58	S	0.58	4.5	0
0.58	S	0.58	4.5	0
0.71	S	0.71	6	0
0.75	S	0.75	7	0
0.81	S	0.81	8	0
0.88	S	0.88	9	0
0.9	S	0.9	10	0

DQA Surface Soil Report

Statistical Test Summary

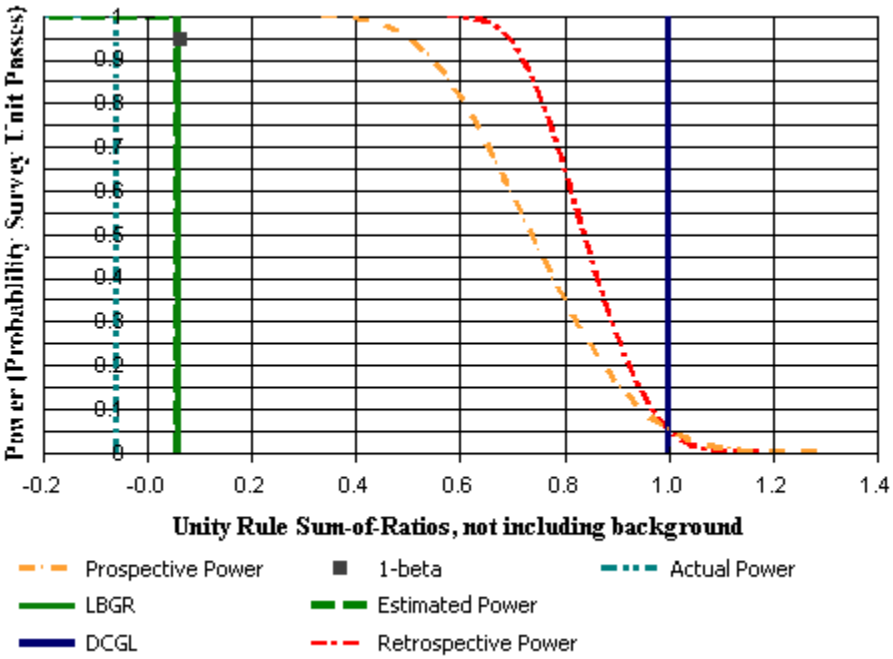
Data	Type	Adjusted Data	Rank	Reference Rank
1.15	S	1.15	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU70		
Report Number:	1		
Survey Unit Samples:	8		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1182	S	0.73	1.16
1183	S	0.4	0.37
1184	S	1.18	0.98
1185	S	0.41	0.8
1186	S	0.65	0.71
1187	S	0.61	0.51
1190	S	1.12	1.12
1191	S	0.64	0.69
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1182	S	0.78
1183	S	0.31
1184	S	0.85
1185	S	0.51
1186	S	0.55
1187	S	0.44
1190	S	0.9
1191	S	0.53
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	8	15	N/2=11
Mean (SOR)	0.61	0.66	0.06
Median (SOR)	0.54	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.35
High Value (SOR)	0.90	0.93	N/A
Low Value (SOR)	0.31	0.33	N/A

Statistical Test Summary

Sum of Ranks:	276
Sum of Reference Ranks:	240
Critical Value:	205
Result:	Pass

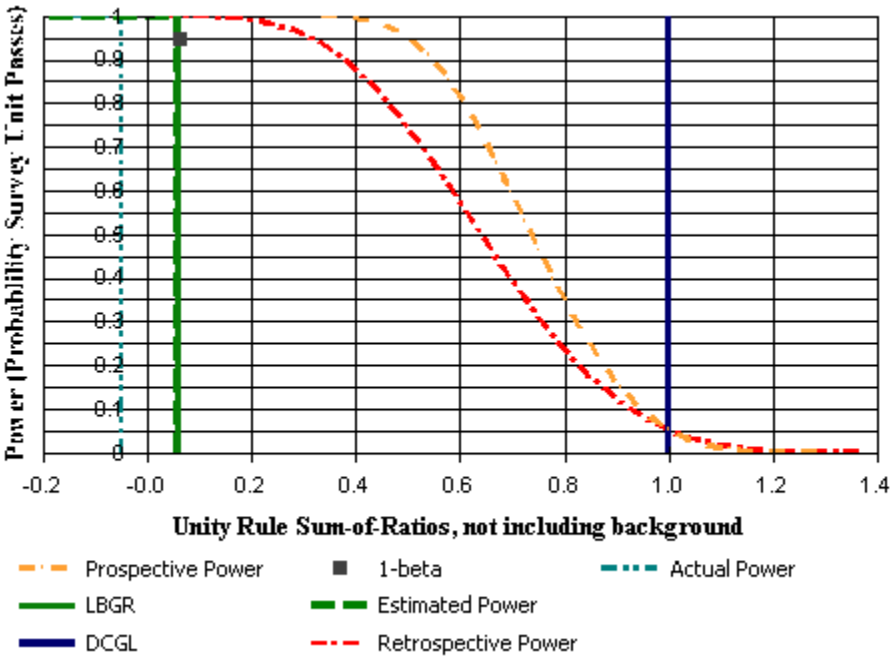
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	9	9
0.42	R	1.42	10	10
0.51	R	1.51	11	11
0.57	R	1.57	12	12
0.58	R	1.58	13.5	13.5
0.58	R	1.58	13.5	13.5
0.59	R	1.59	15	15
0.6	R	1.6	16	16
0.64	R	1.64	17	17
0.75	R	1.75	18	18
0.83	R	1.83	19.5	19.5
0.83	R	1.83	19.5	19.5
0.85	R	1.85	21	21
0.87	R	1.87	22	22
0.93	R	1.93	23	23
0.31	S	0.31	1	0
0.44	S	0.44	2	0
0.51	S	0.51	3	0
0.53	S	0.53	4	0
0.55	S	0.55	5	0
0.78	S	0.78	6	0
0.85	S	0.85	7	0
0.9	S	0.9	8	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU71		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1192	S	0.51	2.11
1193	S	0.28	0.22
1194	S	1.15	0.92
1195	S	0.34	0.33
1196	S	0.48	0.63
1197	S	0.57	0.9
1198	S	0.38	2.06
1199	S	0.41	0.57
1200	S	0.27	0.24
1201	S	1.32	3.19
1202	S	0.62	0.75
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1192	S	1.13
1193	S	0.2
1194	S	0.81
1195	S	0.27
1196	S	0.45
1197	S	0.61
1198	S	1.07
1199	S	0.4
1200	S	0.2
1201	S	1.91
1202	S	0.55
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=11
Mean (SOR)	0.69	0.66	0.06
Median (SOR)	0.55	0.60	N/A
Std Dev (SOR)	0.52	0.18	0.35
High Value (SOR)	1.91	0.93	N/A
Low Value (SOR)	0.20	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	271
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	26	26
0.2	S	0.2	1.5	0
0.2	S	0.2	1.5	0
0.27	S	0.27	3	0
0.4	S	0.4	4	0
0.45	S	0.45	5	0
0.55	S	0.55	6	0
0.61	S	0.61	7	0
0.81	S	0.81	8	0
1.07	S	1.07	9	0
1.13	S	1.13	10	0

DQA Surface Soil Report

Statistical Test Summary

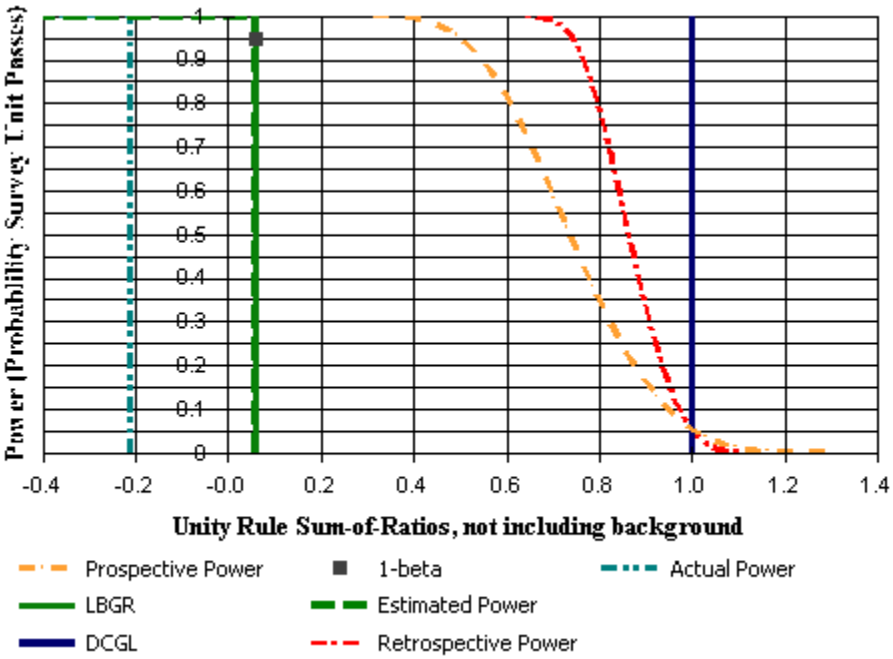
Data	Type	Adjusted Data	Rank	Reference Rank
1.91	S	1.91	25	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU72		
Report Number:	1		
Survey Unit Samples:	8		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1203	S	0.39	0.65
1205	S	0.8	0.91
1206	S	0.36	0.21
1207	S	0.35	0.4
1208	S	0.39	0.53
1209	S	0.34	0.5
1211	S	0.54	0.44
1212	S	0.52	0.53
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1203	S	0.43
1205	S	0.69
1206	S	0.22
1207	S	0.3
1208	S	0.38
1209	S	0.34
1211	S	0.39
1212	S	0.42
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	8	15	N/2=11
Mean (SOR)	0.40	0.66	0.06
Median (SOR)	0.39	0.60	N/A
Std Dev (SOR)	0.14	0.18	0.35
High Value (SOR)	0.69	0.93	N/A
Low Value (SOR)	0.22	0.33	N/A

Statistical Test Summary

Sum of Ranks:	276
Sum of Reference Ranks:	240
Critical Value:	205
Result:	Pass

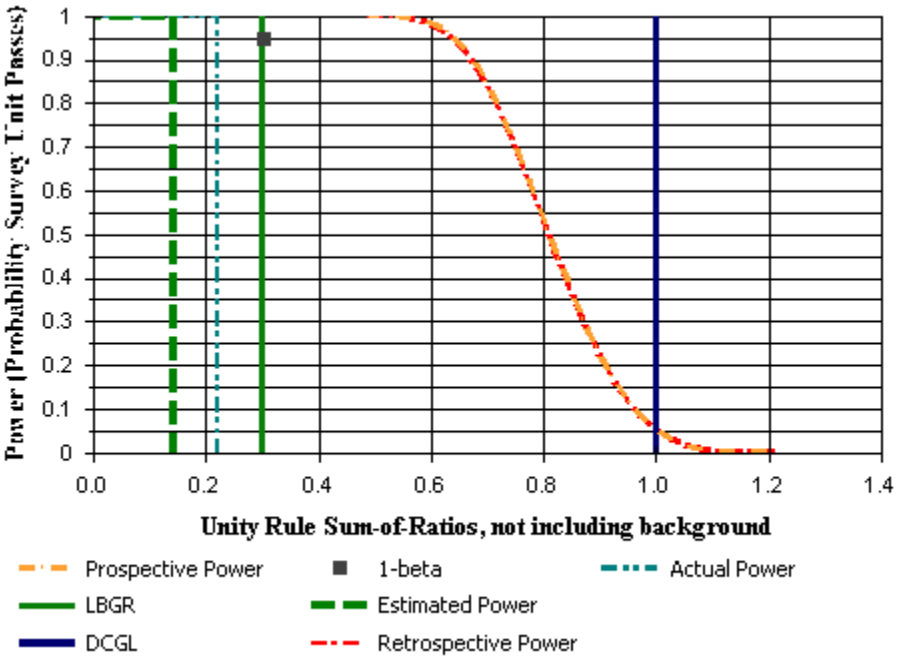
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	9	9
0.42	R	1.42	10	10
0.51	R	1.51	11	11
0.57	R	1.57	12	12
0.58	R	1.58	13.5	13.5
0.58	R	1.58	13.5	13.5
0.59	R	1.59	15	15
0.6	R	1.6	16	16
0.64	R	1.64	17	17
0.75	R	1.75	18	18
0.83	R	1.83	19.5	19.5
0.83	R	1.83	19.5	19.5
0.85	R	1.85	21	21
0.87	R	1.87	22	22
0.93	R	1.93	23	23
0.22	S	0.22	1	0
0.3	S	0.3	2	0
0.34	S	0.34	3	0
0.38	S	0.38	4	0
0.39	S	0.39	5	0
0.42	S	0.42	6	0
0.43	S	0.43	7	0
0.69	S	0.69	8	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU73		
Report Number:	1		
Survey Unit Samples:	9		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1214	S	1	0.85
1215	S	1.41	1.81
1216	S	0.57	0.78
1217	S	0.85	0.76
1218	S	1.15	1.38
1220	S	0.89	0.85
1221	S	1.14	1.16
1222	S	0.7	2.09
1223	S	0.86	1.16
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1214	S	0.73
1215	S	1.31
1216	S	0.55
1217	S	0.64
1218	S	1.02
1220	S	0.69
1221	S	0.92
1222	S	1.19
1223	S	0.82
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	9	15	N/2=10
Mean (SOR)	0.87	0.66	0.14
Median (SOR)	0.82	0.60	N/A
Std Dev (SOR)	0.26	0.18	0.24
High Value (SOR)	1.31	0.93	N/A
Low Value (SOR)	0.55	0.33	N/A

Statistical Test Summary

Sum of Ranks:	300
Sum of Reference Ranks:	255
Critical Value:	215
Result:	Pass

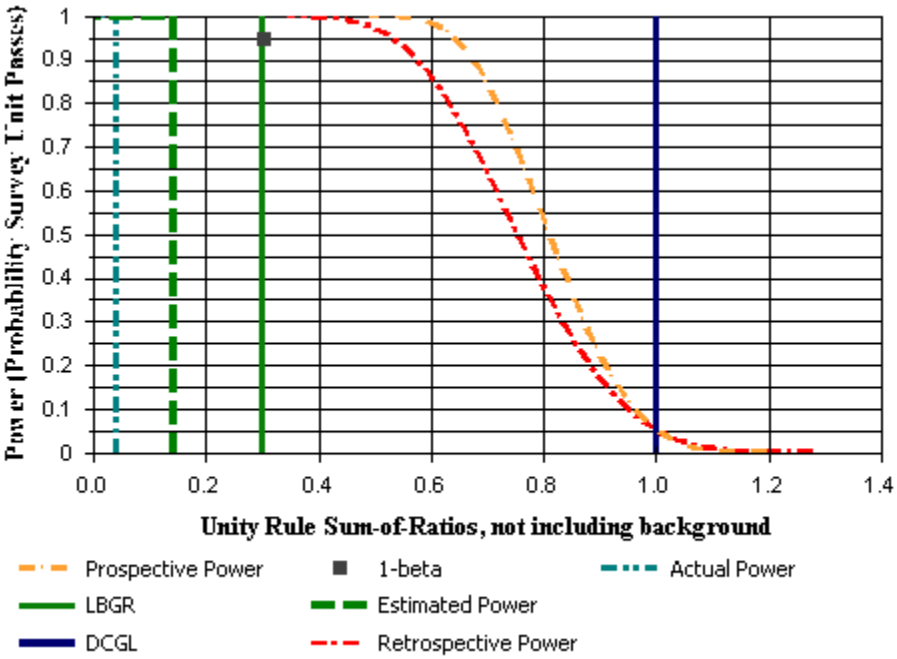
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	11	11
0.51	R	1.51	12	12
0.57	R	1.57	13	13
0.58	R	1.58	14.5	14.5
0.58	R	1.58	14.5	14.5
0.59	R	1.59	16	16
0.6	R	1.6	17	17
0.64	R	1.64	18	18
0.75	R	1.75	19	19
0.83	R	1.83	20.5	20.5
0.83	R	1.83	20.5	20.5
0.85	R	1.85	22	22
0.87	R	1.87	23	23
0.93	R	1.93	24	24
0.55	S	0.55	1	0
0.64	S	0.64	2	0
0.69	S	0.69	3	0
0.73	S	0.73	4	0
0.82	S	0.82	5	0
0.92	S	0.92	6	0
1.02	S	1.02	7	0
1.19	S	1.19	8	0
1.31	S	1.31	9	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU74		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1224	S	0.66	0.4
1225	S	1.31	1.45
1226	S	0.82	1.22
1227	S	0.61	0.75
1228	S	0.76	2.07
1229	S	0.65	0.67
1230	S	1.02	0.83
1231	S	0.63	0.45
1232	S	1.29	1.92
1233	S	0.52	0.62
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1224	S	0.41
1225	S	1.11
1226	S	0.84
1227	S	0.55
1228	S	1.2
1229	S	0.53
1230	S	0.73
1231	S	0.42
1232	S	1.32
1233	S	0.46
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.76	0.66	0.14
Median (SOR)	0.64	0.60	N/A
Std Dev (SOR)	0.34	0.18	0.24
High Value (SOR)	1.32	0.93	N/A
Low Value (SOR)	0.41	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

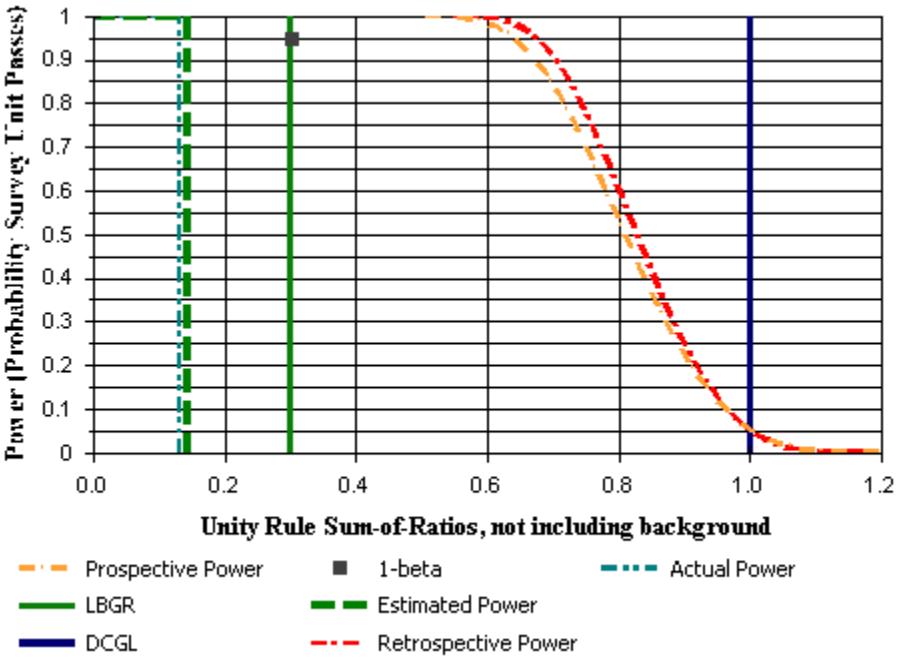
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.41	S	0.41	1	0
0.42	S	0.42	2	0
0.46	S	0.46	3	0
0.53	S	0.53	4	0
0.55	S	0.55	5	0
0.73	S	0.73	6	0
0.84	S	0.84	7	0
1.11	S	1.11	8	0
1.2	S	1.2	9	0
1.32	S	1.32	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU75		
Report Number:	1		
Survey Unit Samples:	7		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1235	S	0.04	1.94
1236	S	0.74	1.04
1237	S	1.25	1.01
1238	S	0.56	0.62
1240	S	0.56	0.59
1241	S	0.78	0.88
1243	S	1.2	1.28
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1235	S	0.9
1236	S	0.73
1237	S	0.89
1238	S	0.47
1240	S	0.46
1241	S	0.67
1243	S	1
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	7	15	N/2=10
Mean (SOR)	0.73	0.66	0.14
Median (SOR)	0.73	0.60	N/A
Std Dev (SOR)	0.21	0.18	0.24
High Value (SOR)	1.00	0.93	N/A
Low Value (SOR)	0.46	0.33	N/A

Statistical Test Summary

Sum of Ranks:	253
Sum of Reference Ranks:	225
Critical Value:	196
Result:	Pass

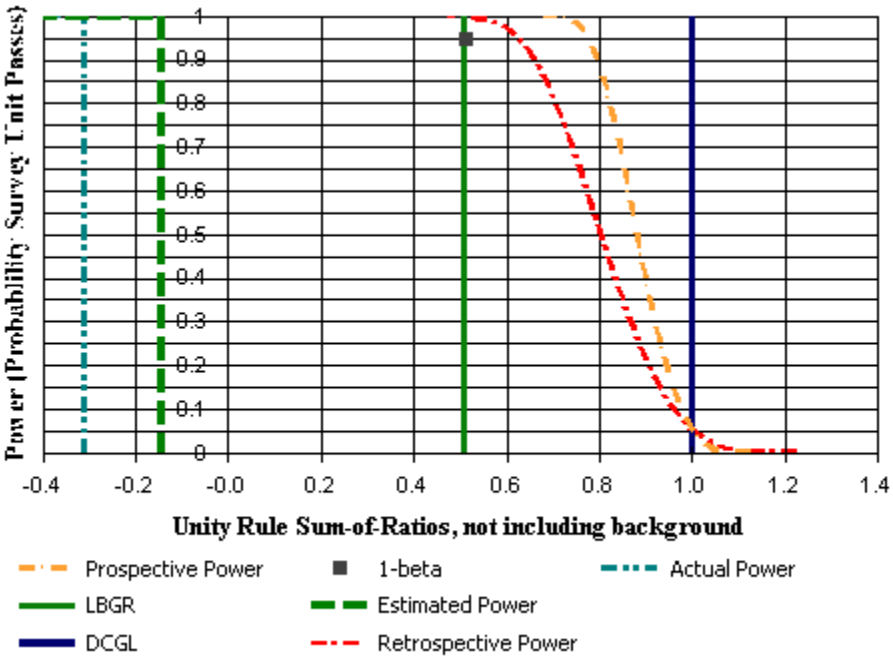
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	8	8
0.42	R	1.42	9	9
0.51	R	1.51	10	10
0.57	R	1.57	11	11
0.58	R	1.58	12.5	12.5
0.58	R	1.58	12.5	12.5
0.59	R	1.59	14	14
0.6	R	1.6	15	15
0.64	R	1.64	16	16
0.75	R	1.75	17	17
0.83	R	1.83	18.5	18.5
0.83	R	1.83	18.5	18.5
0.85	R	1.85	20	20
0.87	R	1.87	21	21
0.93	R	1.93	22	22
0.46	S	0.46	1	0
0.47	S	0.47	2	0
0.67	S	0.67	3	0
0.73	S	0.73	4	0
0.89	S	0.89	5	0
0.9	S	0.9	6	0
1	S	1	7	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C2 SU76 B-912 sub-floor soil		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1634	S	0.53	0.21
1635	S	1.08	1.18
1636	S	0.22	0.33
1637	S	0.12	0.41
1638	S	0.86	0.75
1639	S	0.34	0.38
1640	S	1.21	0.9
1641	S	0.39	0.3
1642	S	0.76	0.95
1643	S	0.38	0.24
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1634	S	0.28
1635	S	0.91
1636	S	0.23
1637	S	0.23
1638	S	0.64
1639	S	0.29
1640	S	0.83
1641	S	0.27
1642	S	0.69
1643	S	0.24
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=10
Mean (SOR)	0.46	0.66	-0.14
Median (SOR)	0.29	0.60	N/A
Std Dev (SOR)	0.27	0.18	0.15
High Value (SOR)	0.91	0.93	N/A
Low Value (SOR)	0.23	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

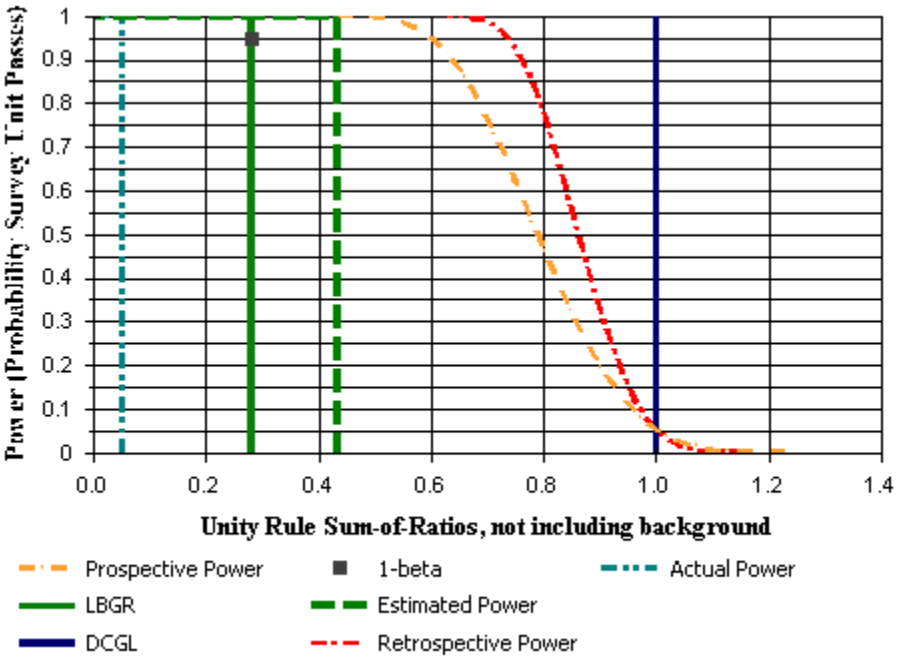
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.23	S	0.23	1.5	0
0.23	S	0.23	1.5	0
0.24	S	0.24	3	0
0.27	S	0.27	4	0
0.28	S	0.28	5	0
0.29	S	0.29	6	0
0.64	S	0.64	7	0
0.69	S	0.69	8	0
0.83	S	0.83	9	0
0.91	S	0.91	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	~~SU 1~~ C3 SU1 land		
Report Number:	3		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
127	S	1.26	1.24
128	S	0.82	1.22
129	S	0.56	1.02
130	S	1.15	1.4
131	S	0.66	0.84
132	S	0.44	0.64
133	S	0.7	0.82
134	S	0.68	0.86
135	S	0.67	1.32
136	S	0.58	0.83
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
127	S	1
128	S	0.84
129	S	0.66
130	S	1.03
131	S	0.61
132	S	0.44
133	S	0.61
134	S	0.63
135	S	0.83
136	S	0.58
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=11
Mean (SOR)	0.72	0.66	0.43
Median (SOR)	0.65	0.60	N/A
Std Dev (SOR)	0.19	0.18	0.28
High Value (SOR)	1.03	0.93	N/A
Low Value (SOR)	0.44	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

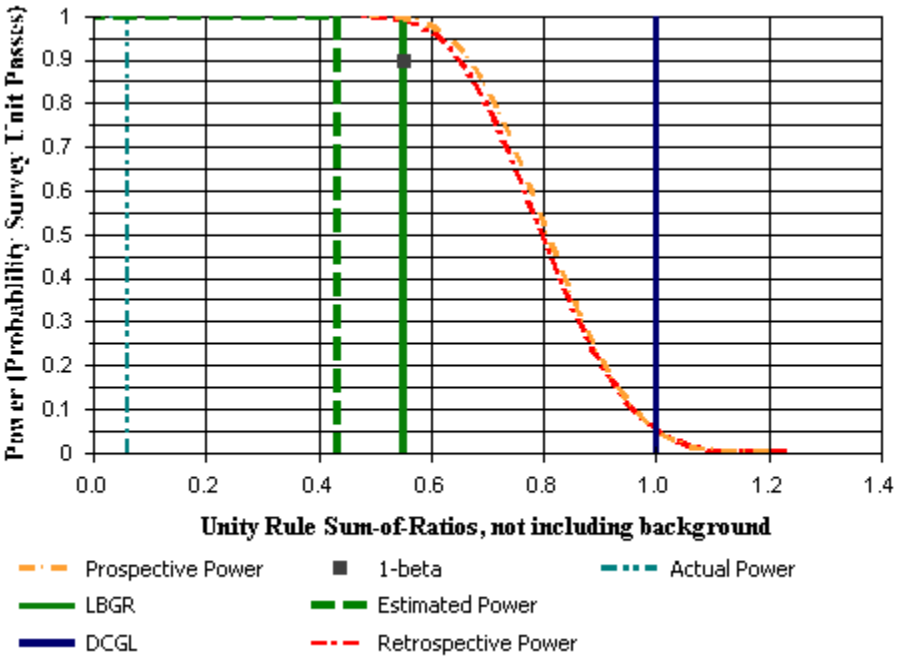
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.44	S	0.44	1	0
0.58	S	0.58	2	0
0.61	S	0.61	3.5	0
0.61	S	0.61	3.5	0
0.63	S	0.63	5	0
0.66	S	0.66	6	0
0.83	S	0.83	7	0
0.84	S	0.84	8	0
1	S	1	9	0
1.03	S	1.03	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU2 rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
117	S	1.44	2
118	S	0.75	0.89
119	S	0.56	0.49
120	S	0.93	0.97
121	S	0.64	0.56
122	S	0.71	0.55
123	S	0.72	0.71
124	S	0.9	1.13
125	S	0.77	0.84
126	S	0.73	1.21
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
117	S	1.41
118	S	0.66
119	S	0.42
120	S	0.76
121	S	0.48
122	S	0.49
123	S	0.57
124	S	0.82
125	S	0.65
126	S	0.8
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.71	0.66	0.43
Median (SOR)	0.66	0.60	N/A
Std Dev (SOR)	0.28	0.18	0.28
High Value (SOR)	1.41	0.93	N/A
Low Value (SOR)	0.42	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	269
Critical Value:	225
Result:	Pass

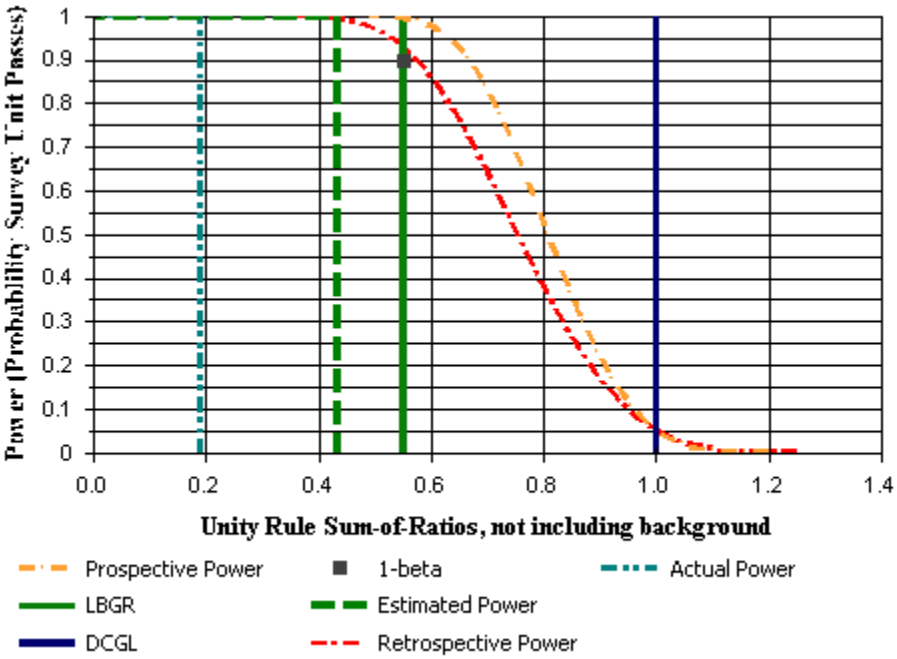
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	10	10
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.42	S	0.42	1	0
0.48	S	0.48	2	0
0.49	S	0.49	3	0
0.57	S	0.57	4	0
0.65	S	0.65	5	0
0.66	S	0.66	6	0
0.76	S	0.76	7	0
0.8	S	0.8	8	0
0.82	S	0.82	9	0
1.41	S	1.41	11	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU3 rev 1		
Report Number:	1		
Survey Unit Samples:	11		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
137	S	0.77	0.77
138	S	1.03	1.07
139	S	0.84	0.94
140	S	1.98	2.6
141	S	1.2	1.16
142	S	0.98	1.48
143	S	0.57	0.79
144	S	1.04	0.95
145	S	0.92	0.91
146	S	1.1	0.67
147	S	1.09	1.14
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
137	S	0.62
138	S	0.84
139	S	0.72
140	S	1.86
141	S	0.94
142	S	1.01
143	S	0.56
144	S	0.79
145	S	0.73
146	S	0.68
147	S	0.89
43	R	0.58
44	R	0.33
45	R	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	11	15	N/2=13
Mean (SOR)	0.88	0.66	0.43
Median (SOR)	0.79	0.60	N/A
Std Dev (SOR)	0.35	0.18	0.28
High Value (SOR)	1.86	0.93	N/A
Low Value (SOR)	0.56	0.33	N/A

Statistical Test Summary

Sum of Ranks:	351
Sum of Reference Ranks:	272
Critical Value:	234
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	25	25
0.93	R	1.93	26	26
0.56	S	0.56	1	0
0.62	S	0.62	2	0
0.68	S	0.68	3	0
0.72	S	0.72	4	0
0.73	S	0.73	5	0
0.79	S	0.79	6	0
0.84	S	0.84	7	0
0.89	S	0.89	8	0
0.94	S	0.94	9	0
1.01	S	1.01	10	0

DQA Surface Soil Report

Statistical Test Summary

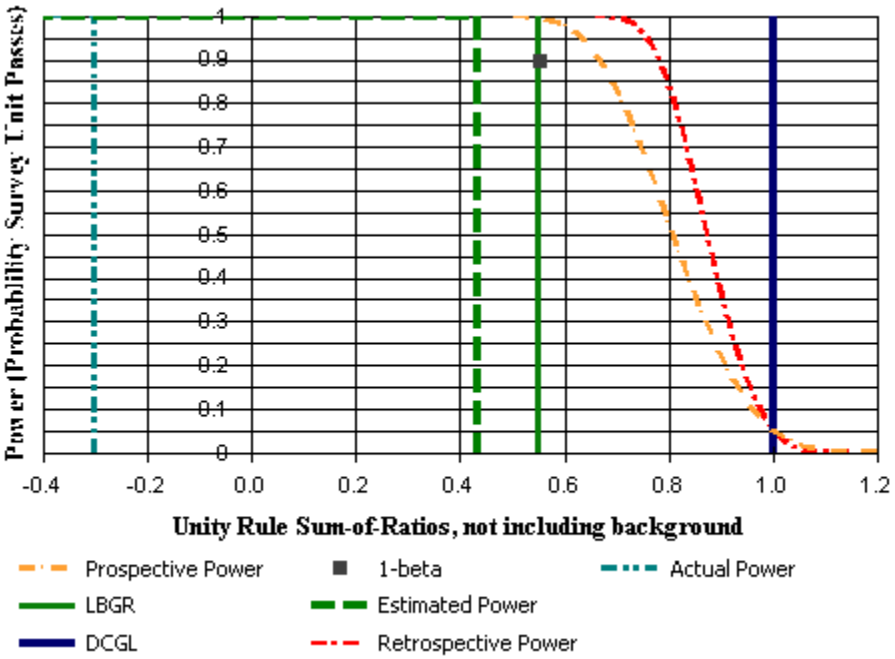
Data	Type	Adjusted Data	Rank	Reference Rank
1.86	S	1.86	24	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU4 Rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
58	S	0.35	0.4
59	S	0.33	0.39
60	S	0.59	0.65
61	S	0.48	0.39
62	S	0.53	0.58
63	S	0.21	0.12
64	S	0.29	0.31
65	S	0.38	0.39
66	S	0.29	0.39
67	S	0.33	0.33
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
58	S	0.3
59	S	0.29
60	S	0.5
61	S	0.34
62	S	0.45
63	S	0.13
64	S	0.24
65	S	0.31
66	S	0.28
67	S	0.26
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.31	0.66	0.43
Median (SOR)	0.30	0.60	N/A
Std Dev (SOR)	0.10	0.18	0.28
High Value (SOR)	0.50	0.93	N/A
Low Value (SOR)	0.13	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

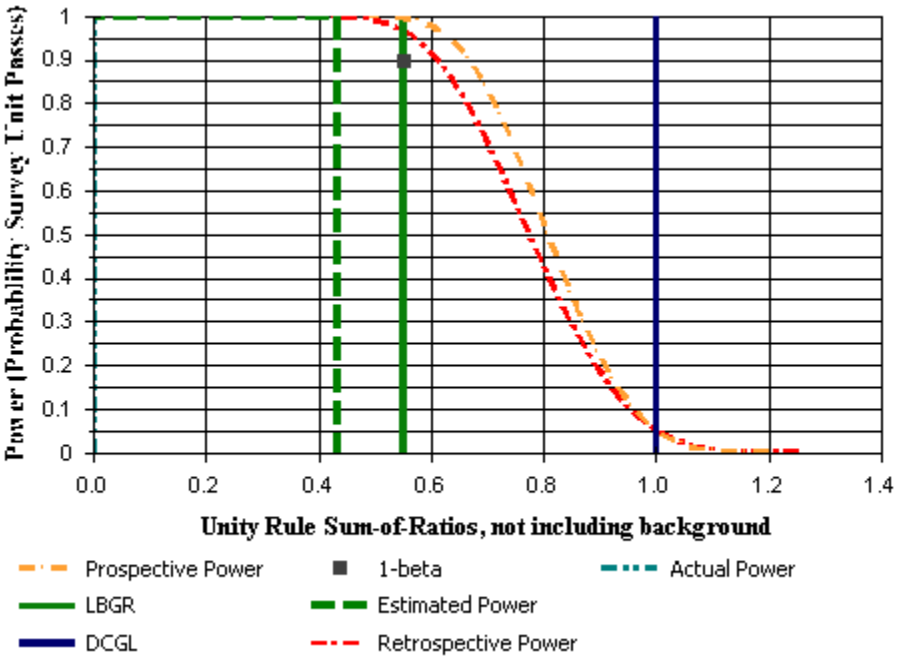
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.13	S	0.13	1	0
0.24	S	0.24	2	0
0.26	S	0.26	3	0
0.28	S	0.28	4	0
0.29	S	0.29	5	0
0.3	S	0.3	6	0
0.31	S	0.31	7	0
0.34	S	0.34	8	0
0.45	S	0.45	9	0
0.5	S	0.5	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU5 rev 1		
Report Number:	1		
Survey Unit Samples:	10		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
375	S	0.36	0.36
376	S	0.42	0.22
377	S	0.34	0.35
378	S	1.07	0.99
379	S	0.52	0.57
380	S	0.77	1.13
381	S	0.77	0.75
382	S	0.89	1.33
383	S	0.81	0.66
384	S	1.1	1.81
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
375	S	0.29
376	S	0.24
377	S	0.28
378	S	0.82
379	S	0.44
380	S	0.78
381	S	0.61
382	S	0.91
383	S	0.58
384	S	1.2
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	10	15	N/2=13
Mean (SOR)	0.62	0.66	0.43
Median (SOR)	0.60	0.60	N/A
Std Dev (SOR)	0.31	0.18	0.28
High Value (SOR)	1.20	0.93	N/A
Low Value (SOR)	0.24	0.33	N/A

Statistical Test Summary

Sum of Ranks:	325
Sum of Reference Ranks:	270
Critical Value:	225
Result:	Pass

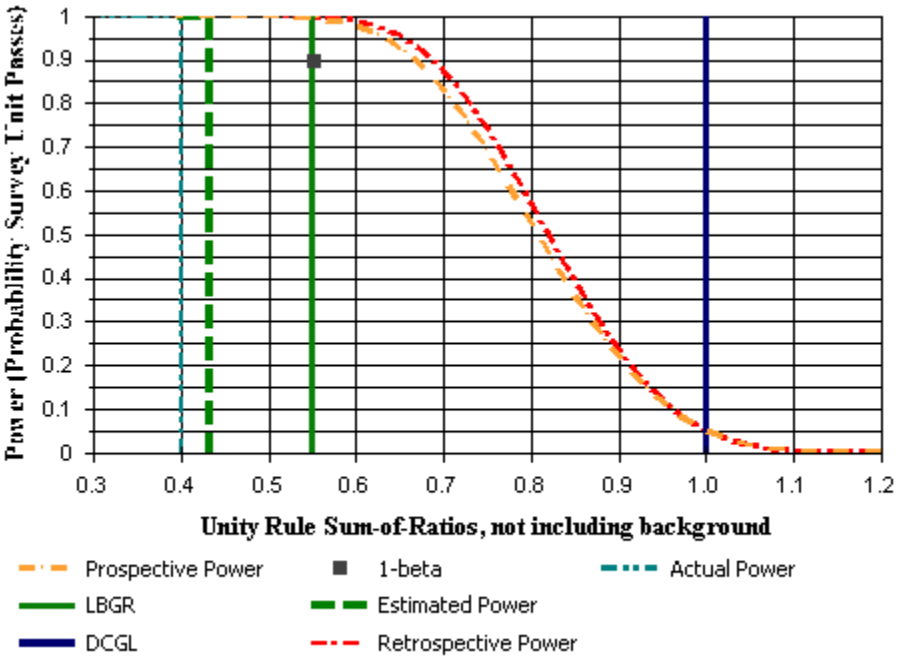
Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	11	11
0.42	R	1.42	12	12
0.51	R	1.51	13	13
0.57	R	1.57	14	14
0.58	R	1.58	15.5	15.5
0.58	R	1.58	15.5	15.5
0.59	R	1.59	17	17
0.6	R	1.6	18	18
0.64	R	1.64	19	19
0.75	R	1.75	20	20
0.83	R	1.83	21.5	21.5
0.83	R	1.83	21.5	21.5
0.85	R	1.85	23	23
0.87	R	1.87	24	24
0.93	R	1.93	25	25
0.24	S	0.24	1	0
0.28	S	0.28	2	0
0.29	S	0.29	3	0
0.44	S	0.44	4	0
0.58	S	0.58	5	0
0.61	S	0.61	6	0
0.78	S	0.78	7	0
0.82	S	0.82	8	0
0.91	S	0.91	9	0
1.2	S	1.2	10	0

DQA Surface Soil Report

Assessment Summary

Site:	Curtis Bay		
Planner(s):	Vitkus		
Survey Unit Name:	C3 SU6		
Report Number:	1		
Survey Unit Samples:	13		
Reference Area Samples:	15		
Test Performed:	WRS	Test Result:	Pass
Judgmental Samples:	0	EMC Result:	Not Performed
Assessment Conclusion:	***Reject Null Hypothesis (Survey Unit PASSES)***		

Retrospective Power Curve



DQA Surface Soil Report

Survey Unit Data

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Th-232 (pCi/g)	U-238 (pCi/g)
1244	S	1.04	0.86
1245	S	0.93	1.66
1246	S	0.91	1.5
1247	S	0.94	1.58
1248	S	1.16	1.44
1249	S	1.09	1.58
1250	S	1.27	1.46
1251	S	1.19	0.96
1252	S	1.53	1.58
1253	S	0.3	0.4
1254	S	1.31	1.18
1255	S	0.61	0.67
1256	S	0.81	0.89
43	R	0.72	0.73
44	R	0.51	0.34
45	R	0.5	0.74
46	R	0.77	0.83
47	R	1.32	0.92
48	R	1.24	1.1
49	R	1.12	0.97
50	R	0.81	1.21
51	R	0.71	0.74
52	R	0.91	1.18
53	R	0.58	0.49
54	R	0.6	0.84
55	R	0.71	0.79
56	R	0.73	0.69
57	R	0.91	0.95

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1244	S	0.75
1245	S	1.08
1246	S	1
1247	S	1.04
1248	S	1.05
1249	S	1.09
1250	S	1.1
1251	S	0.85
1252	S	1.25
1253	S	0.29
1254	S	0.99
1255	S	0.51

DQA Surface Soil Report

Modified Data (Unity Rule SOR)

NOTE: Type = "S" indicates survey unit sample.
Type = "R" indicates reference area sample.

Sample Number	Type	Sum-of-Ratios (SOR)
1256	S	0.68
43	R	0.58
44	R	0.33
45	R	0.51
46	R	0.64
47	R	0.87
48	R	0.93
49	R	0.83
50	R	0.83
51	R	0.58
52	R	0.85
53	R	0.42
54	R	0.59
55	R	0.6
56	R	0.57
57	R	0.75

DQA Surface Soil Report

Basic Statistical Quantities Summary

Statistic	Survey Unit	Background	DQO Results
Sample Number	13	15	N/2=13
Mean (SOR)	0.90	0.66	0.43
Median (SOR)	1.00	0.60	N/A
Std Dev (SOR)	0.27	0.18	0.28
High Value (SOR)	1.25	0.93	N/A
Low Value (SOR)	0.29	0.33	N/A

Statistical Test Summary

Sum of Ranks:	406
Sum of Reference Ranks:	315
Critical Value:	253
Result:	Pass

Data	Type	Adjusted Data	Rank	Reference Rank
0.33	R	1.33	14	14
0.42	R	1.42	15	15
0.51	R	1.51	16	16
0.57	R	1.57	17	17
0.58	R	1.58	18.5	18.5
0.58	R	1.58	18.5	18.5
0.59	R	1.59	20	20
0.6	R	1.6	21	21
0.64	R	1.64	22	22
0.75	R	1.75	23	23
0.83	R	1.83	24.5	24.5
0.83	R	1.83	24.5	24.5
0.85	R	1.85	26	26
0.87	R	1.87	27	27
0.93	R	1.93	28	28
0.29	S	0.29	1	0
0.51	S	0.51	2	0
0.68	S	0.68	3	0
0.75	S	0.75	4	0
0.85	S	0.85	5	0
0.99	S	0.99	6	0
1	S	1	7	0
1.04	S	1.04	8	0
1.05	S	1.05	9	0
1.08	S	1.08	10	0

DQA Surface Soil Report

Statistical Test Summary

Data	Type	Adjusted Data	Rank	Reference Rank
1.09	S	1.09	11	0
1.1	S	1.1	12	0
1.25	S	1.25	13	0