

Calculated Instrument Efficiencies

2224-1 #162426 paired with 43-93 #PR193921

10 Initial Background Counts (1 min each)

	Alpha	Beta
1)	2	164
2)	2	165
3)	1	156
4)	3	136
5)	3	163
6)	3	146
7)	2	165
8)	0	150
9)	1	141
10)	4	138
Ave	2.1	152.4

10 Initial Source Counts (1 min each)

	Alpha	Beta
1)	2523	1693
2)	2816	1822
3)	2387	1584
4)	2816	1793
5)	2240	1845
6)	2676	1769
7)	2038	1708
8)	2643	1802
9)	2743	1769
10)	2398	1828
Ave	2528	1761.3

Th-230 Source Surface Activity 8850
Tc-99 Source Surface Activity 7760

Alpha Efficiency (cpm/dpm) (2pi) 0.071353107
Beta Efficiency (cpm/dpm) (2pi) 0.103666237

Calculated Instrument Efficiencies

2224-1 #162425 paired with 43-93 #PR182403

10 Initial Background Counts (1 min each)

	Alpha	Beta
1)	1	198
2)	2	183
3)	0	172
4)	0	177
5)	1	170
6)	0	180
7)	0	178
8)	0	154
9)	1	182
10)	1	167
Ave	0.6	176.1

10 Initial Source Counts (1 min each)

	Alpha	Beta
1)	2718	1870
2)	2756	1923
3)	2830	1979
4)	2694	1859
5)	2668	1920
6)	2674	1816
7)	2607	1897
8)	2594	1903
9)	2643	1861
10)	2784	1789
Ave	2696.8	1881.7

Th-230 Source Surface Activity 8850
Tc-99 Source Surface Activity 7760

Alpha Efficiency (cpm/dpm) (2pi) 0.076163842
Beta Efficiency (cpm/dpm) (2pi) 0.109896907

Calculated Instrument Efficiencies

2360 #202398 paired with 43-93 #PR211706

10 Initial Background Counts (1 min each)

	Alpha	Beta
1)	0	178
2)	0	181
3)	2	158
4)	1	168
5)	0	178
6)	0	185
7)	2	163
8)	1	164
9)	2	164
10)	0	170
Ave	0.8	170.9

10 Initial Source Counts (1 min each)

	Alpha	Beta
1)	2512	1247
2)	2927	1147
3)	2526	1719
4)	2419	1699
5)	2759	1161
6)	2503	1224
7)	2263	2044
8)	2820	1282
9)	2656	1886
10)	2638	1238
Ave	2602.3	1464.7

Th-230 Source Surface Activity 8850
Tc-99 Source Surface Activity 7760

Alpha Efficiency (cpm/dpm) (2pi) 0.073488701
Beta Efficiency (cpm/dpm) (2pi) 0.083363402

Calculated Instrument Efficiencies

2360 #193647 paired with 43-93 #PR238107

10 Initial Background Counts (1 min each)

	Alpha	Beta
1)	0	150
2)	0	139
3)	0	144
4)	1	163
5)	0	164
6)	0	132
7)	0	164
8)	0	132
9)	1	146
10)	1	178
Ave	0.3	151.2

10 Initial Source Counts (1 min each)

	Alpha	Beta
1)	2985	1786
2)	2871	1717
3)	2762	1727
4)	2741	1688
5)	2864	1720
6)	2852	1725
7)	2755	1736
8)	2858	1695
9)	2762	1668
10)	2892	1702
Ave	2834.2	1716.4

Th-230 Source Surface Activity 8850
Tc-99 Source Surface Activity 7760

Alpha Efficiency (cpm/dpm) (2pi) 0.080053672
Beta Efficiency (cpm/dpm) (2pi) 0.100850515

Calculated Instrument Efficiencies

2360 #276935 paired with 43-93 #PR295818

10 Initial Background Counts (1 min each)

	Alpha	Beta
1)	0	81
2)	0	100
3)	1	85
4)	0	105
5)	1	83
6)	0	100
7)	0	84
8)	0	91
9)	1	82
10)	2	84
Ave	0.5	89.5

10 Initial Source Counts (1 min each)

	Alpha	Beta
1)	2376	1491
2)	2415	1548
3)	2358	1449
4)	2520	1548
5)	2452	1448
6)	2565	1369
7)	2426	1395
8)	2433	1547
9)	2540	1521
10)	2448	1459
Ave	2453.3	1477.5

Th-230 Source Surface Activity 8850
Tc-99 Source Surface Activity 7760

Alpha Efficiency (cpm/dpm) (2pi) 0.069288136
Beta Efficiency (cpm/dpm) (2pi) 0.08943299