



Department of Energy

Washington, DC 20585

QA: L

JUL 11 1997

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ISSUANCE OF SURVEILLANCE RECORD M&O-SR-97-041 RESULTING FROM THE OFFICE OF QUALITY ASSURANCE (OQA) SURVEILLANCE OF THE CIVILIAN RADIOACTIVE WASTE MANAGEMENT SYSTEM MANAGEMENT AND OPERATING CONTRACTOR (CRWMS M&O)

Enclosed is the Quality Assurance Surveillance Record M&O-SR-97-041 conducted by the OQA at Duke Engineering Services, Inc., Charlotte, North Carolina, on June 16-19, 1997.

The purpose of the surveillance was to assess the implementation of CRMWS M&O design control procedures as they relate to the design process.

There were no deficiencies issued as a result of the surveillance. This surveillance is considered completed and closed as of the date of this letter. A response to this surveillance record is not required.

If you have any questions, please contact either James Blaylock at (702) 794-1420 or Patrick V. Auer at (702) 794-1495.

Donald G. Horton, Director
Office of Quality Assurance

OQA:JB-1812

Enclosure:
Surveillance Record M&O-SR-97-041

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OFFICE OF CIVILIAN
RADIOACTIVE WASTE MANAGEMENT
U.S. DEPARTMENT OF ENERGY
WASHINGTON, D.C.

Surveillance No. M&O-SR-97-041

QUALITY ASSURANCE SURVEILLANCE RECORD

SURVEILLANCE DATA

1. ORGANIZATION/LOCATION: Civilian Radioactive Waste Management Systems Management & Operating (CRWMS M&O) Contractor/Duke Engineering Services, Inc. (DES) Charlotte, North Carolina	2. SUBJECT: Design Control Process	3. DATE: 06/16-19/97
4. SURVEILLANCE OBJECTIVE: Assess the implementation of CRWMS M&O design control procedures as they relate to the design process.		
5. SURVEILLANCE SCOPE: Review documentation and interview personnel for activities related to implementation of M&O procedures for design control. Also, procedure availability, management control/oversight and training to appropriate design control procedures will be reviewed.		6. SURVEILLANCE TEAM: Team Leader: Patrick V. Auer Additional Team Members: N/A
7. PREPARED BY: Patrick V. Auer <i>P. Auer</i> Surveillance Team Leader Date: 06/02/97	8. CONCURRENCE: Donald G. Horton <i>D.G. Horton</i> for Director, OQA Date: 6/11/97	

SURVEILLANCE RESULTS

9. BASIS OF EVALUATION/DESCRIPTION OF OBSERVATIONS: On June 16 through 19, a surveillance was conducted at M&O/Duke Engineering Services facilities in Charlotte, North Carolina to assess the implementation of M&O design control procedures as they relate to the design process. Also, a review of compliance to applicable training, personnel qualification, and document control procedures, as well as management control/oversight of the design activities was performed. See Page 2	
10. SURVEILLANCE CONCLUSIONS: Based on document reviews and personnel interviews it has been determined that the overall effectiveness and adequacy of the design control process and related technical document preparation and procedure development process is in accordance with OCRWM and M&O quality assurance procedures and is considered satisfactory. No deficiencies or recommendations were generated as a result of this surveillance.	
11. COMPLETED BY: <i>P. Auer</i> Surveillance Team Leader Date: 6-24-97	12. APPROVED BY: <i>D.G. Horton</i> Director, OQA Date: 6/30/97

Block 9 (continued) BASIS OF EVALUATION/DESCRIPTION OF OBSERVATIONS:

DESIGN CONTROL

The following design products were discussed with appropriate engineering personnel and were reviewed for adequate assumptions, selection of inputs, and design method, as well as compliance to applicable design control procedures. The Centralized Interim Storage Facility (CISF) products were completed after OQA's audit (MO-ARP-97-04) of the M&O/Charlotte performed in November of 1996.

Document Type/ Project	Title	Number	Applicable procedure	Status
Design Analysis MGDS	Waste Package Design, 21 PWR UCF WP Analysis	Not yet assigned	QAP-3-9, Rev. 7	Development
Procedure MGDS	Classification of Permanent Items	QAP-2-3	QAP-5-1	Preliminary Research
Technical Document Licensing	Technical Guidance Document for License Application	N/A	YAP 5.1Q & YAP 5.8Q	Internal Review
Design Analysis CISF	ISF Design Requirements Document, Rev. 1	CC0000000-01717- 1708-00001	QAP-3-9, Rev. 6	Completed 1/08/97
Design Analysis CISF	ISF DRD Backup Analysis, Rev. 3	CC0000000-01717- 0200-00001	QAP-3-9, Rev. 6	Completed 1/15/97
Design Analysis CISF	QA Classification of ISF Site CI	CCA000000-01717- 0200-00002	QAP-3-9, Rev. 6	Completed 12/3/96
Design Analysis CISF	Fire Protection System Pump Sizing Calculation	CC0000000-01717- 0200-00029	QAP-3-9, Rev. 6	Completed 4/02/97
Design Analysis CISF	ISF Site CI System & Subsystem Descriptions	CCA000000-01717- 1705-00001	QAP-3-5, Rev. 6	Ready for review
Design Analysis CISF	ISF Transfer Facility CI Description	CCB000000-01717- 1705-00001	QAP-3-5, Rev. 6	Ready for review

The detail presented in the Assumptions, Input Selection, and Design Method sections was adequate.

The following completed records packages for analyses were reviewed for adequate completion of discipline checking, design review when applicable, and final check including appropriate documentation of comments.

Document Type/ Project	Title	Number	Applicable procedure	Status
Design Analysis CISF	Design Basis Events Mitigated by ISF Phase I Design	CC0000000-01717- 0200-00032	QAP-3-9, Rev. 6	Completed 6/13/97
Design Analysis CISF	ISF TSAR - Structural Design Criteria, Rev. 1	CC0000000-01717- 0200-00004	QAP-3-9, Rev. 6	Completed 3/24/97
Design Analysis ISF	QA Classification of the ISF Security	CCD000000-01717- 0200-00001	QAP-3-9, Rev. 6	Completed 11/14/96
Design Analysis CISF	ISF Storage Area Radiation Analysis, Part 1 - Storage Mode	CCC000000-01717- 0200-00005	QAP-3-9, Rev. 6	Completed 4/04/97

All record packages reviewed were completed in accordance with QAP-3-9, Revision 6.

MANAGEMENT CONTROL/OVERSIGHT

Oversight of the work being performed at DESI facilities in Charlotte consists of one recent OQA performance based audit (MO-ARP-97-04), completed November 14, 1996 and this OQA surveillance. Work is defined and controlled via subcontract change requests issued by M&O/TRW. DESI is an M&O team mate.

DOCUMENT CONTROL

During the surveillance, a distribution list of controlled documents for the Engineering Manager (Control #339) and Engineering Supervisor (Control #209) was obtained from the M&O Document Control Center in Vienna. The following documents were verified to be current in both manuals:

M&O QAP-2-0, Rev. 4
M&O QAP-3-8, Rev. 7
M&O QAP-3-9, Rev. 7
M&O QAP-3-10, Rev. 7
M&O QAP-3-5, Rev. 7
M&O QAP-SIII-1, Rev. 1
M&O VLP-3-2, Rev. 2
OCRWM AP-16.1Q, Rev. 2
OCRWM AP-16.2Q, Rev. 2
OCRWM AP-17.1Q, Rev. 0
OCRWM AP-16.1Q, Rev. 2

NOTE: These were not the only documents in the manuals, the manuals appeared to contain all of the appropriate M&O and OCRWM procedures.

PERSONNEL TRAINING AND QUALIFICATION

Qualification and training records for Keyes Niemer, the newest employee in the group, were reviewed and found to be satisfactory. Documents reviewed included verification of education and experience completed 6/9/97, position description, approved 5/5/97, completion project classroom training 5/7/97, and completion of initial read and sign training on 4/24/97.

A sample of individuals who had either prepared or approved design analyses or technical documents was selected from the list of design/technical documents reviewed above to verify appropriate training had been completed. The following individuals required training records were reviewed, all revision 6:

J. Thornton	M&O QAP-3-9
J. McConaghy	M&O QAP-3-5 & QAP-3-9
J. Jenkins	M&O QAP-3-5 & QAP-3-9
R. Wright	M&O QAP-3-9
J. Stringer	M&O QAP-3-9
R. Eble	M&O QAP-3-5 & QAP-3-9
S. Salzman	OCRWM YAP-5.1Q & YAP-5.8Q
D. Williford	OCRWM YAP-5.1Q & YAP-5.8Q

The read and sign sheets were in process of being completed for revision 7 of the above listed procedures during the surveillance and were not verified except in the case of Keyes Niemer who was the only person currently working to revision 7 of QAP-3-9. His records had been completed satisfactorily.

Personnel contacted during the course of the surveillance

Joe Stringer, Engineering Manager, DESI

John McConaghy, Engineering Supervisor, DESI

Bob Howell, Engineering Supervisor, DESI

Keyes Niemer, Nuclear Engineer, DESI

Pam Boyles, Technical Specialist, DESI

Scott Salzman, Engineering, DESI

Dennis Williford, Engineering, DESI

Tom Doering, Waste Package Development, M&O/Las Vegas

Tricia White, Training, M&O/Vienna