



MITSUBISHI HEAVY INDUSTRIES, LTD.
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TOKYO, JAPAN

November 7, 2008

Document Control Desk
U.S. Nuclear Regulatory Commission
Washington, DC 20555-0001

Attention: Mr. Jeffrey A. Ciocco,

Docket No. 52-021
MHI Ref: UAP-HF-08258

Subject: MHI's Response to US-APWR DCD RAI No.82

Reference: 1) "Request for Additional Information No.82 Revision 0, SRP Section: 06.05.01 – ESF Atmosphere Cleanup Systems, Application Section: FSAR Section 6.5.1" dated October 8, 2008.

With this letter, Mitsubishi Heavy Industries, Ltd. ("MHI") transmits to the U.S. Nuclear Regulatory Commission ("NRC") a document entitled "Response to Request for Additional Information No.82 Revision 0".

Enclosed is the response to one RAI contained within Reference 1.

Please contact Dr. C. Keith Paulson, Senior Technical Manager, Mitsubishi Nuclear Energy Systems, Inc. if the NRC has questions concerning any aspect of the submittals. His contact information is below.

Sincerely,

Yoshiki Ogata,
General Manager- APWR Promoting Department
Mitsubishi Heavy Industries, LTD.

Enclosure:

1. Response to Request for Additional Information No. 82 Revision 0

CC: J. A. Ciocco
C. K. Paulson

Contact Information

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NRO

Docket No. 52-021
MHI Ref: UAP-HF-08258

Enclosure 1

UAP-HF-08258
Docket Number 52-021

Response to Request for Additional Information No. 82 Revision 0

November 2008

RESPONSE TO REQUEST FOR ADDITIONAL INFORMATION

11/07/2008

**US-APWR Design Certification
Mitsubishi Heavy Industries
Docket No. 52-021**

RAI NO.: NO.82-808 REVISION 0
SRP SECTION: 06.05.01 – ESF Atmosphere Cleanup Systems
APPLICATION SECTION: FSAR Sections 6.5.1
DATE OF RAI ISSUE: 10/8/2008

QUESTION NO. : 06.05.01-2

Provide design criteria for in-place (in-situ) testing of the air flow distribution in the HEPA filters.

ANSWER:

The HEPA filter is one of several components within an air filtration unit (air-cleaning unit). The air filtration unit is designed and built in accordance with RG 1.52 and ASME AG-1-2003. The field testing of air treatment systems is covered in section TA of ASME AG-1. Section TA-4600 of ASME AG-1 provides the field acceptance test requirements for components within a filter bank, which includes the HEPA filter. The airflow distribution test acceptance criteria are specifically provided in section TA-4641 of ASME AG-1, which states "With the system operating within $\pm 10\%$ of design flow rate, the variation in velocity measurements across the HEPA filter banks shall be limited to $\pm 20\%$ of the average, when measured in accordance with Mandatory Appendix TA-IV."

Impact on DCD

There is no impact on the DCD.

Impact on COLA

There is no impact on the COLA.

Impact on PRA

There is no impact on the PRA.

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