



MITSUBISHI HEAVY INDUSTRIES, LTD.
16-5, KONAN 2-CHOME, MINATO-KU
TOKYO, JAPAN

October 9, 2012

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-12268

Subject: Transmittal of Revised HFE Documentation

Reference: 1) "US-APWR Chapter 18, Human Factors Engineering (HFE) Roadmap," UAP-HF-12170, ML12173A288, June 19, 2012.

With this letter, Mitsubishi Heavy Industries, Ltd. ("MHI") submits to the U.S. Nuclear Regulatory Commission ("NRC") the HFE documentation listed below, as committed in Reference 1. These documents are being submitted electronically in two enclosed compact discs (CDs). CD 1 contains proprietary versions of documents 3 and 6 listed below. CD 2 contains the non-proprietary versions of all the documents listed.

Revised Documents:

- 1) Staffing and Qualifications Implementation Plan, MUAP-10008 Rev.2
- 2) HSI Design Implementation Plan, MUAP-10009 Rev.2
- 3) Verification and Validation Implementation Plan, MUAP-10012 Rev.2
- 4) Design Implementation Plan, MUAP-10013 Rev.2
- 5) Human Performance Monitoring Implementation Plan, MUAP-10014 Rev.2
- 6) HSI Design, MUAP-09019 Rev.2

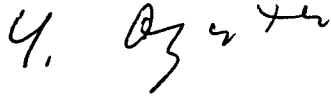
As indicated in the enclosed materials, this document contains information that MHI considers proprietary, and therefore should be withheld from public disclosure pursuant to 10 C.F.R. § 2.390 (a)(4) as trade secrets and commercial or financial information which is privileged or confidential. A non-proprietary version of the document is also being submitted in this package. In the non-proprietary version, the proprietary information is replaced by the designation "[]".

This letter includes a copy of the proprietary version (Enclosure 2), a copy of the non-proprietary version (Enclosure 3), and the Affidavit of Yoshiki Ogata (Enclosure 1) which identifies the reasons MHI respectfully requests that all materials designated as "Proprietary" in Enclosure 2 be withheld from public disclosure pursuant to 10 C.F.R. § 2.390 (a)(4).

Please contact Mr. Joseph Tapia, General Manager of Licensing Department, Mitsubishi Nuclear Energy Systems, Inc. if the NRC has questions concerning any aspect of the submittal. His contact information is below.

D081
NRD

Sincerely,



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

Enclosures:

1. Affidavit of Yoshiki Ogata
2. CD 1: "US-APWR HFE Documents (Proprietary) "
– Version containing Proprietary information
3. CD 2: "US-APWR HFE Documents (Non-Proprietary) "
– Version not containing Proprietary information

The files contained in each CD are listed in Attachments 1 and 2 hereto.

CC: J. A. Ciocco
W. R. Ward
J. Tapia

Contact Information

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ENCLOSURE 1

Docket No. 52-021
MHI Ref: UAP-HF-12268

MITSUBISHI HEAVY INDUSTRIES, LTD.

AFFIDAVIT

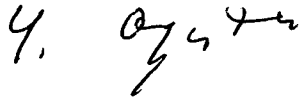
I, Yoshiki Ogata, state as follows:

1. I am Director, APWR Promoting Department, of Mitsubishi Heavy Industries, LTD ("MHI"), and have been delegated the function of reviewing MHI's US-APWR documentation to determine whether it contains information that should be withheld from public disclosure pursuant to 10 C.F.R. § 2.390 (a)(4) as trade secrets and commercial or financial information which is privileged or confidential.
2. In accordance with my responsibilities, I have reviewed the enclosed documents dated September 2012, and have determined that portions of several documents contain proprietary information that should be withheld from public disclosure. Those pages containing proprietary information are identified with the label "Proprietary" on the top of the page and the proprietary information has been bracketed with an open and closed bracket as shown here "[]". The first page of the document indicates that all information identified as "Proprietary" should be withheld from public disclosure pursuant to 10 C.F.R. § 2.390 (a)(4).
3. The information identified as proprietary in the enclosed documents has in the past been, and will continue to be, held in confidence by MHI and its disclosure outside the company is limited to regulatory bodies, customers and potential customers, and their agents, suppliers, and licensees, and others with a legitimate need for the information, and is always subject to suitable measures to protect it from unauthorized use or disclosure.
4. The basis for holding the referenced information confidential is that it describes the unique design information and implementation plan of Human Factor Engineering, developed by MHI and not used in the exact form by any of MHI's competitors. This information was developed at significant cost to MHI, since it required the performance of Research and Development and detailed design for its software and hardware extending over several years.
5. The referenced information is being furnished to the Nuclear Regulatory Commission ("NRC") in confidence and solely for the purpose of information to the NRC staff.
6. The referenced information is not available in public sources and could not be gathered readily from other publicly available information. Other than through the provisions in paragraph 3 above, MHI knows of no way the information could be lawfully acquired by organizations or individuals outside of MHI.
7. Public disclosure of the referenced information would assist competitors of MHI in their design of new nuclear power plants without incurring the costs or risks associated with the design and testing of the subject systems. Therefore, disclosure of the information contained in the referenced document would have the following negative impacts on the competitive position of MHI in the U.S. nuclear plant market:

- A. Loss of competitive advantage due to the costs associated with development of the US-APWR Human Factor Engineering. Providing public access to such information permits competitors to duplicate or mimic the Human Factor Engineering information without incurring the associated costs.
- B. Loss of competitive advantage of the US-APWR created by benefits of enhanced US-APWR Human Factor Engineering development costs associated with the Human System Interface System.

I declare under penalty of perjury that the foregoing affidavit and the matters stated therein are true and correct to the best of my knowledge, information and belief.

Executed on this 9th day of October, 2012.



Yoshiaki Ogata,
Director- APWR Promoting Department
Mitsubishi Heavy Industries, LTD.

ATTACHMENT 1

FILES CONTAINED IN CD 1

**CD 1: “US-APWR HFE Documents (Proprietary) “
– Version containing proprietary information**

Contents of CD

<u>File Name</u>	<u>Size</u>	<u>Sensitivity Level</u>
HSI design (Proprietary).pdf	4.0MB	Proprietary
V and V Implementation Plan (Proprietary).pdf	1.0MB	Proprietary

ATTACHMENT 2

FILES CONTAINED IN CD 2

**CD 2: “US-APWR HFE Documents (Non-Proprietary) “
– Version not containing proprietary information**

Contents of CD

<u>File Name</u>	<u>Size</u>	<u>Sensitivity Level</u>
HSI Design (Non-Proprietary).pdf	1.4MB	Non-Proprietary
V and V Implementation Plan (Non-Proprietary).pdf	0.6MB	Non-Proprietary
S and Q Implementation Plan (Non-Proprietary).pdf	1.2MB	Non-Proprietary
HSI Design Implementation Plan (Non-Proprietary).pdf	0.6MB	Non-Proprietary
Design Implementation Plan (Non-Proprietary).pdf	0.4MB	Non-Proprietary
HPM Implementation Plan (Non-Proprietary).pdf	0.5MB	Non-Proprietary