

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

December 4, 2009

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-09539

**Subject: Transmittal of the Materials to Technical Needs in Support of the MHI
US-APWR LBLOCA WCOBRA/TRAC Code Applicability and FSAR 15.6.5
LBLOCA Review**

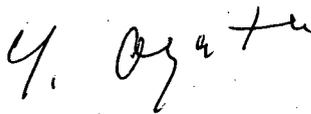
Mitsubishi Heavy Industries, Ltd. ("MHI") is submitting to the U.S. Nuclear Regulatory Commission ("NRC") the modified subroutines in WCOBRA/TRAC and HOTSPOT, output files, and plot variables (hereby the "Referenced Material") for the US-APWR Large Break LOCA analyses referenced in the "Design Control Document for the US-APWR" ("DCD") and supporting Topical Report "Large Break LOCA Code Applicability Report for US-APWR" (MUAP-07011), submitted to the NRC in support of MHI's US-APWR Design Certification Application ("DCA"). The Referenced Materials are being submitted electronically in the Optical Storage Media ("OSM") enclosure. The file contained on OSM is listed on the associated enclosure cover sheet.

These files are being furnished to the NRC in confidence and solely for the purpose of supporting the NRC staff's review of MHI's Application for certification of its US-APWR Standard Plant Design.

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

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

Sincerely,



Yoshiaki Ogata
General Manager-APWR Promoting Department
Mitsubishi Heavy Industries, Ltd.

D081
NR5

Enclosures:

1. Affidavit of Yoshiki Ogata
2. OSM: Materials to Technical Needs for the Confirmatory Run of the US-APWR LBLOCA Analysis (Proprietary)
The files contained in this OSM are listed in Attachment 1.

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

Contact Information

C. Keith Paulson, Senior Technical Manager
Mitsubishi Nuclear Energy Systems, Inc.
300 Oxford Drive, Suite 301
Monroeville, PA 15146
E-mail: ckpaulson@mnes.com
Telephone: (412) 373-6466

ENCLOSURE 1

Docket No. 52-021
MHI Ref: UAP-HF-09539

MITSUBISHI HEAVY INDUSTRIES, LTD.

AFFIDAVIT

I, Yoshiki Ogata, being duly sworn according to law, depose and state as follows:

1. I am General Manager, 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 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 Optical Storage Medium ("OSM") dated December 4, 2009, and have determined that the OSM contains proprietary information that should be withheld from public disclosure. The labels on the OSM have been marked to indicate that the entire contents of the OSM should be withheld from public disclosure pursuant to 10 C.F.R. § 2.390 (a)(4).
3. The basis for holding the referenced information confidential is that it describes the unique design of the safety analysis, developed by MHI (the "MHI Information").
4. The MHI Information is 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. Therefore public disclosure of the materials would adversely affect MHI's competitive position.
5. The referenced information has in the past been, and will continue to be, held in confidence by MHI and is always subject to suitable measures to protect it from unauthorized use or disclosure.
6. The referenced information is not available in public sources and could not be gathered readily from other publicly available information.
7. The referenced information is being furnished to the Nuclear Regulatory Commission ("NRC") in confidence and solely for the purpose of supporting the NRC staff's review of MHI's application for certification of its US-APWR Standard Plant Design.
8. Public disclosure of the referenced information would assist competitors of MHI in their design of new nuclear power plants without the costs or risks associated with the design and testing of new systems and components. Disclosure of the information identified as proprietary would therefore have negative impacts on the competitive position of MHI in the U.S. nuclear plant market.

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 4th day of December, 2009.

Y. Ogata

Yoshiki Ogata

ATTACHMENT 1

FILES Contained in OSM

OSM: Materials to Technical Needs for the Confirmatory Run of the US-APWR LBLOCA Analysis (Proprietary)

Contents of OSM

<u>Folder/File Name</u>	<u>Size</u>	<u>Sensitivity Level</u>
• Source_File		
Changes_of_source_code.pdf	92KB	Proprietary
<WCOBRATRAC>	0.97MB	Proprietary
<HOTSPOT>	262KB	Proprietary
• Water_property_subroutin		
Water_property_subroutin_List.pdf	39KB	Proprietary
<lib>	607KB	Proprietary
• Output_File		
Variable_names_for_output_files.pdf	316KB	Proprietary
<Annual_Report_2009>		
std.out	59,622KB	Proprietary
u20	127,793KB	Proprietary
u21	33,272KB	Proprietary
hs01_pctmax	171KB	Proprietary
hs02_pctmax	6KB	Proprietary
hs01_oxdmax	171KB	Proprietary
hs02_oxdmax	6KB	Proprietary
<DCD_Revision1_PCT_Limiting (RUN72)>		
std.out	60,404KB	Proprietary
u20	126,688KB	Proprietary
u21	33,272KB	Proprietary
hs01_pctmax	171KB	Proprietary
hs02_pctmax	6KB	Proprietary
hs01_oxdmax	171KB	Proprietary
hs02_oxdmax	6KB	Proprietary
<DCD_Revision2_PCT_Limiting (RUN48)>		
std.out	60,370KB	Proprietary
u20	127,793KB	Proprietary
u21	33,272KB	Proprietary
hs01_pctmax	171KB	Proprietary
hs02_pctmax	6KB	Proprietary
hs01_oxdmax	171KB	Proprietary
hs02_oxdmax	6KB	Proprietary

- Plot_Variable
Plot_variable_information_in_Documents.pdf

92KB Proprietary