

REQUEST FOR ADDITIONAL INFORMATION NO. 179-1741 REVISION 1

2/3/2009

US-APWR Design Certification

Mitsubishi Heavy Industries

Docket No. 52-021

SRP Section: 12.02 - Radiation Sources

Application Section: 12.02 - Radiation Sources

QUESTIONS for Health Physics Branch (CHPB)

12.02-16

10 CFR 20.1101(b) requires licensees to ensure that engineering controls are used to keep occupational doses ALARA. The guidance contained in Regulatory Guide 1.206 sections C.I.12.1 "Radiation Protection" and C.I.12.2 note that the applicant is to provide the models, parameters and bases for all values used to calculate source magnitudes, for normal, AOO and accident conditions. 10 CFR 50 Appendix A, notes that Anticipated Operational Occurrences (AOO), mean those conditions of normal operation which are expected to occur one or more times during the life of the nuclear.

Question 1:

The APWR DCD Section 12.2.1 "Contained Sources" notes that the basis of the shielding design source terms are the three plant conditions: (1) normal full-power operation; (2) shutdown; and (3) design-basis accident (DBA) events.

In accordance with 10 CFR 20.1101(b) and RG 1.206, please provide in chapter 12, information that describes the bases, methods and assumptions for the source term, and dose rates, associated with Abnormal Operational Occurrences. If this information is not presented, then please provide justification for omitting this data.