

File Effluent Specs.

Thursday 8/16/79

Radiological Effluent Technical Specifications Meeting

Reviewed 8/10/79 Revision of TMI-2 proposed RETS

The following TMI open items exist:

- a) Table 4.3-12 Note (1), item 4 (page 3/4 3-72)
- Table 4.3-12 Note (2) item 4 "
- Table 4.3-13 Note (1) item 4 (page 3/4 3-83)
- Table 4.3-13 Note (2) item 4 "

TMI-2 is to determine if a spring return to operate switch can be added to these monitor instrument controls

- b) Table 3.3-13 Notes and Actions (page 3/4 3-78)
- This page is to be revised by TMI-2 for the 7 star notes and the many operability conditions that are possible in ACTION 37 and 41 before sampling is required.

- c) Table 4.3-13 will be revised by TMI. (pages 3/4 3-90)
- proper system names and conditions required by RETS.

- d) Spec 3.11.1.3 (page 3/4 11-6)
- TMI wants to set concentration limits on radwaste equipment use rather than dose limits in RETS. What value depends on parameters used in the generic cost benefit study of NRC. Spec 3.11.2.4 may be considered again for a revision based on the above liquid system study.

- e) Site Boundary Figures for Liquid and Gas Effluents from Unit 2.

The following NRC open items exist:

- a) Can gas storage tank quantity be determined at least quarterly in S.R. 4.11.26 page 3/4 W-17?
- b) Resolve radiological problems with RAB. Take TMI proposal back for a second look.
- c) Set Parameters for TMI on their open item d) above.
- d) Resolve administrative controls section problems with D. Brinkman. Does section 3 of Appendix A contain the definition of time period?

TMI-2 proposed revisions and response to open items due Tuesday 8/21/79. Next meeting Thursday 8/23/79.

J. Progli

3:11.1.3.

JC

The liquid radwaste treatment system shall be OPERABLE. The appropriate portions of the system shall be used to reduce the radioactive materials in liquid wastes prior to their discharge when the projected dose due to the discharge in question exceeds          mrem/gallon based on the concentration of isotopes in the waste prior to any dilution.

JC

Please call to discuss this at your convenience

Jim Potter

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8/16/79  
JEP

# Rationale for 3.11.1.3

1. NRC has established that <sup>liquid</sup> discharges that lead to doses lower than  
0.06 mrem/yr total body  
0.2 mrem/yr any organ  
do not warrant treatment

2. This is based on NRC generic study for a release of  $x$  gallons/month

3. Thus a dose per gallon figure can be derived such that wastes yielding doses below this figure do not warrant treatment:

$$0.06/x \text{ mrem/gal (Total body)}$$

$$0.2/x \text{ mrem/gal (Other organs)}$$

where  $x$  is gallons/month in the NRC study

4. When a ~~to~~ question comes up regarding whether or not to process a tank, calculate  $D$  mrem/gal:

$$D = \frac{1}{V} \sum_i C_i \neq F_i$$

$\frac{1}{\text{gal}}$

$\sum_i C_i$

$\frac{\text{mrem}}{\text{mrem}} \frac{\text{mrem}}{C_i}$

$V = \text{volume of waste}$   
 $C = \text{activity of waste}$

$F = \text{open dose factor}$

If  $D$  does not exceed limits in 3, discharge without processing. ~~But~~  $V$  must be determined prior to any dilution and dilution as a means to reduce  $D$  must be prohibited.