Appendix II

Comment h[13]	Previous comment: I'm confused by this. Where does the 1.8 percent come from?	**YES-they modified the discussion to remove reference to the 1.8 percent.**
Comment h[15]	PREVIOUS COMMENT: If they are included in EPA region 10 why are they not considered here?	**YES-Table was eliminated.** Changing to clarify HI, AK states.
Comment h[18]&h[19]	If this is a stop, why is the time 0? If the time =0 why is it included in the table? I don't see this explained.	**YES-Table data modified to include <<1 rather than a 0 time.**
Comment h[21]	Same comment as Table 2-13/ Why are the doses the same for the rail-lead and rail-steel casks when the 1 meter doses are different.? I assume the lack of data for inspector and truck stop worker for DU urban results from the assumption that there are no inspections or stops for urban environments. This is reasonable but not bounding. Also, why is it assumed that there would be no rail classification in urban rail yards? There are plenty of large rail yards that exist in urban areas.	YES-data in tables was modified and the rail-lead and rail-steel doses are now different.

Appendix V

Comment[h3]	I think 5% of the truck accidents with fixed objects appears very low.	**Maybe-The comment was an observation not necessarily an error or needed revision/correction. I assume in reviewing my comment they affirmed the value as correct. DOT data;5% OK – no change.**

Comment[h6]	MCNP is used here only to determine an increase in photon density. A little more explanation here as to how this translates into conservative estimates using RADTRAN would be useful.	**No- No additional discussion provided but perhaps not needed.** Changing to clarify total loss of shielding in void area, not thinning of lead shielding in void area.
Comment[h7]	Why is this different than Impact Speed (explain)	**YES**
Comment[h13]	I think this value is corrected from previous revision. However, that is if the value is derived from Figure V-5. You should reference this so the reader knows where it is coming from.	**YES - reference provided**
Comment[h16]	The numbers in bold italics from the previous revision are missing here. The inclusion of the source for these results is excellent (as is the footnote discussion below) However, no discussion was provided about the acceptability or justification for doses that exceed regulatory thresholds. Certainly this warrants some discussion.	**YES – bolded numbers included and discussion above table identifies the exceeded doses as belonging to emergency workers.**
Comment[h17]&[h18]	Where does this come from? Explain. It looks to be a combination of conditional probabilities associated with slumped lead fraction in table V-2 and the resulting 1-5 m doses reported in table V-3, however this is not explained. It is probably intuitive from the authors perspective but not the readers.	**YES – discussion added**
Comment[h20]	Is this Reference 3 in the body of the report? I think it should be self contained as a footnote or a reference in individual sections to facilitate ease of reference.	**This table appears to be deleted from the final document.**
Comment[h21]	Reference Table 5-6 for comparison purposes.	**No – This was only a recommendation, not a needed correction. ? Tables V-6 and 5-6 are the same.**

Comment[h22]	Example calculation to show where a single entry comes from would be useful.	**YES -This table is substantially different. My comment to provide an example calculation was incorporated.**
Comment[h23]	Where are these results from? Example calculation.	**YES- footnote provided that explains the source of the data in the table.**
Comment[h25]	I've noted before and stress again the use of this probability construct is questionable in leading to these extremely low probabilities. The nature of the uncertainty in the probability of the events and the potential validity of assuming these are all independent events, leads me to question the final results. Without doing the analysis, it is very hard to imagine that the actual probability of a major derailment resulting in pool fires and potential pile-ups is this small. It is more convincing in my mind to say that the total probability of such an event including uncertainty is very unlikely and can be shown to approach or exceed the threshold for event credibility. This is a far more accurate and defendable position in my mind that quoting probabilities of events that are on the order of (and less than) the probability of asteroid impacts on the earth. This comment applies to every determination in this document where probabilities far less than 1e-6 are estimated.	**NO- This is a philosophical disagreement. I believe their use of probabilities is suspect in their estimates of absolute event likelihoods. I think anyone who truly understands the power (and limitations) of PRA can pick apart their estimates for these VERY low probabilities. Without some caveated discussion, it calls into question the determination of all probabilities in this report. The key, is that probabilities determined within the PRA are relative where failure estimates are not based on actual data. Only when you have actual data are failure estimates truly absolute values. This distinction is quite important, but I leave it to others to determine if it needs to be mentioned or discussed.** Changing text to address assumption of independence among probabilities.
Comment[h26]&h[27]	Multiply the numbers out to show this.	**YES**

Comment[h28]&h[29]	The truck probability seems to come directly from Figure V-1, but the rail probabilities don't seem to be derived directly from Figure V-2 as readily. Why are these numbers different than table 2-1?	YES
Comment[h30]	And the meteorological conditions	YES
Comment[h31]	Why do these values differ from those presented in table 5-10?	**NO- I presume they reviewed my question and determined that there were no inconsistencies/errors with the data presented in this table.** ? Tables V-16 and 5-10 do not differ – no change.
Comment[h33]	Is this correct for the maximum downwind air concentration? As noted in similar statement made in Chapter 5, maximum air concentrations in Gaussian plume releases are typically at the source, with monotonic increasing dispersion downwind from the source. Ground concentrations, however, are typically downwind due to finite deposition rate.	**YES-Explanation was provided that resolves the discrepancy. The release is slightly elevated and the air concentrations are measured at ground level. This is why the maximum concentration is downwind. This also resolves the identical comment made in Chapter 5.**
Comment[h34]	Why are the numbers in this column (the 8.8e-5 values) different from those reported in table 5-11 (the .0001 values)	**YES- The number in question was revised.**
Comment[h35]	Why would you not do the same thing for the worst meteorological conditions typically assumed (F and 1 m/s –or F and 0.5 considered in this analysis) and compare the total collective dose risk and report the larger of the two?	**YES-A comparison to F and 0.5 met conditions was made and the small difference noted (due to low elevation of release).**