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 To: "Bernard White" <BHW@nrc.gov>, "Mahendra Shah" <MJS3@nrc.gov>
 Date: 1/31/03 11:37AM
 Subject: RE: Summary Table of Analyses

Bernie:

This is my attempt to summarize some of our discussion from yesterday afternoon while we were at Kenneth Gwinn's office. I expect Jerry, Carlos, Doug and I will talk today and sort out some of the other issues. So, I will just try to keep this e-mail addressing those issues you and I discussed.

1) I will construct a table that summarizes the analyses we have conducted for the HI-STORM cask. Both global (CTH) and local (PRONTO).

2) With this table I will summarize the cask-on-cask analyses and the respective cases that they address for the PFS cask layout.

3) In addition, I will meet with Kenneth Gwinn and summarize the results of these analyses. Quantitatively where possible (i.e. strain values in bolts where applicable).

4) I will also include any proposed analyses we have (i.e. analyses to address MPC failure inside the overpack).

5) I told you we would get back to you on when we think we can get you the next draft of the report.

In regard to 5), I don't think we should issue another draft that does not include discussion of ALL analyses. So, if there are still calculations being conducted that are to be included in the report, I am skeptical about issuing another draft. It is difficult to compile and begin completing the structural section of the report without having established (and knowing the results of) all the analyses to address the possible vulnerabilities.

I believe there are several situations that we have not addressed at this point:

a) can the MPC impacting the

This could be due to the MPC

Ex 2

b) most likely the aircraft will impact a cask and then the aircraft and the cask will impact the cask next to it. As all of the structural people here have said, after the initial impact (the many cask-on-cask analyses we have conducted) there is still SUBSTANTIAL kinetic energy. As a matter of fact there is still a

Ex 2

What I am trying to point out is, that although the analyses that support the 4 ft separation distance suggest we have not addressed what velocity the TWO casks will achieve. Once we address that issue, we can examine how that compares with analyses we have that address the MPC failure and bolt failure.

We need to discuss these issues with our analysts here and let you know how we plan to address these issues for the report. They might be addressed by computer analysis or judgment.

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