SAFETY & SECURITY WORKING GROUP of the NDCAP, Plymouth MA
Minutes of October 16, 2017,
Initial meeting of the Group at Plymouth Community Intermediate School. 6:30 PM


Vote on chairmanship differed until next meeting and attendance of all working group appointees.

Rich Grassie advised that the scope of the security issues are addressed in NRC rule 10.74.53.75. The means once plant is in dormancy and into active “clean-up” the area of protection will shrink. Now we have multiple zones of necessity. Post shut down, it is likely that we may have a 10-acre security zone, where the owner controls the area, once spent nuclear fuel is on the dry cask pad in 3 to 3.5 years after shutdown. The area will ultimately take up (2) pads. Only one is built now. The security zone will shrink to the ISFSI perimeter.

Discussion of Vermont Yankee (VtY) where there is a perceived economic benefit to outsourcing the security details. Some discussion followed that led to a request that Joe Lynch provide the presentation that was prepared for VtY at the next meeting or soon. Some discussion follow re: Part 50 license for personnel qualifications and Part 72 license.

Discussion of Areva/ Burns & McDonald engineers. Security plan puts together minimum staffing for the plant and practices limiting rotations and shifts. A 12-hour rotation is key. Practice is 3 days on-4 days offs, then 4 days on and 3 off. Guards have weapons qualifications and are in school every 7 weeks.

Discussion of equipment on site to assist with security including role of the Coast Guard (CG). CG from Hull is first water response.

Discussion follows question from R. Rothstien we when security zones are reduced after shutdown—Perimeter will stay the same until ALL fuel is positioned on ISFSI/protected area. At PNPS a “corral chute” or fenced path enclosure would be required to bring vehicles onto the site and change out security personnel.

NRC currently controls safety—3 types: Nuclear, Radiological and Personnel.

Present ISPSI pad will hold 38 HOLTEC 100 casks. Discussion regarding updated fuel management plan is the anticipated PSDAR, including the boroflex panels. We should request the September report (to NRC?)
P. Ciaramella asks for clarification of the process for spent nuclear fuel (SNF): once fuel is cooled it is put into dry casks, which also has boron. 68 assemblies per cask—which can have older and newer rods in same canister. Helium or Argon gas is injected into the over-pack to “wait” for shipment. Over-packs are high density concrete poured on-site around metal frame supplied by HOLTEC. Air vents at top and bottom of (20-foot tall casks) cool and maintain temperature with air flow. Temperature of vented air increase of 60 degrees over ambient. Dr. Chris Singh of HOLTEC would be the best person to discuss.

Additional issues. Contaminated water on site. At VtY discharge of 500 gals a day floods the turbine building from groundwater which can be contaminated. Energy Solutions is a source of information.

At Yankee Rowe, DEP NDCAP member Mike Gorski would have valuable information.

R. Grassie sums up 3 aspects of Safety:
>When PNPS is shut down
>When fuel is in spent fuel pool (SFP) it is still an issue
>When fuel is in dry cask monitoring and security is an issue.

Remaining questions: Does PSDAR reference Safety & Security?

IT Security at Pilgrim. Plant is not run on internet, but other aspects on management are.

Working Group adjourned by vote at 8:35

Draft Prepared by
Pine duBois
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