Governor's Nuclear Advisory Council Meeting Brown Building, Room 252 October 10, 2013 1:00 PM – 4:00 PM

Council Members in Attendance

Ms. Karen Patterson, Chairman
Mr. Steve Byrne
Captain Claude Cross
Dr. Carolyn Hudson
Mr. James Little
Dr. Vincent Van Brunt
Sen. Tom Young
SC Energy Office Staff: Jennifer Satterthwaite, Trish Jerman, George Kokolis

Call to Order – Approval of Minutes & Update of GNAC Activities Karen Patterson

Ms. Patterson reported that two letters regarding the federal budget were sent on behalf of the GNAC since the last meeting. These letters are available at (LINK). In addition, Governor Haley wrote to David Huizenga, Senior Advisor for Environmental Management, US Department of Energy, stressing the importance of adequate funding for SRS clean-up activities.

She mentioned that since the last meeting she has made a presentation to the SRS Citizens Advisory Board about the Governor's Nuclear Advisory Council. She also toured WIPP for the first time, noting that it was a very good tour. She also called the committee's attention to National Nuclear Science Week, supported by the National Museum of Science and History. Events will take place in Aiken during the week of October 20-25^{th.} The program focuses on areas with a strong nuclear presence, recognizing the contributions of nuclear science and the highly trained nuclear workforce. Finally, she announced a shift in scheduling for the GNAC, in order to allow for more complete discussions of the federal budget. In the future, the GNAC will meet on the second Thursday of January, April, July, and October.

The minutes of the last meeting were approved as distributed.

Duke Energy Programs Update Steve Nesbit, Director, Nuclear Policy & Support

Mr. Nesbit's presentation is available at (LINK). Following his presentation, Dr. Van Brunt asked what the status of performance would have been without the merger. Mr. Nesbit said that he didn't know, but speculated that fleets with more than one unit at a site can perform better than fleets with a preponderance of single reactors with smaller sites. Thus, legacy Duke was well positioned to do well, "but now we have more challenges as we try to move back up to the number 1 position...each of our plants have specific initiatives to address issues." He added that boiling water reactors, new with the combined companies, tend to have "more issues."

Ms. Patterson asked if the fleet excellence program to which he referred was Duke's or NRC's and was told that it was Duke's. He added that the NRC has a list of criteria which they use to evaluate plant on a scale of 1-5. Currently the Robinson plant is categorized as Level 2.

Ms. Patterson followed up by asking if Duke is meeting milestones to integrate the two companies. Mr. Nesbit replied "Not as well as we'd like, but we've already seen benefits...we're able to deploy resources among plants." Finally, she asked if there was a "statute of limitation" on combined license applications (COLs). Discussion by both Mr. Nesbit and Steve Byrne suggested that while COLs are issued for 40 years, there is an effort to balance rushing to build with not letting the process extend too long.

Steve Byrne asked whether a start date for new plants had been determined, and was told that Duke was not definitely committed to either one—not a decision not to build, but not a definite decision to build either. Duke will get the COLs and make a decision at that time. He emphasized that Duke expects "to keep nuclear generation as a key part of our fleet, so we will continue toward that goal."

Mr. Byrne asked a follow up question about the dates for Catawba licensing and was told that they didn't line up with the original plans because license renewal took less time than anticipated, and the plant had not yet been in operation for 20 years before a new license was issued. They applied early for the 20 year extension, so they received the 20 year extension minus the difference in lack of operating years.

Before relinquishing the podium, Mr. Nesbit introduced Debbie Kyser, a colleague at Duke who is likely to return to future GNAC meetings.

Westinghouse Nuclear Fuel Annual Update Nancy Parr, Licensing Manager

Ms. Parr's presentation is available at LINK. Following her presentation Steve Byrne asked if Westinghouse Columbia had to make many changes as a result of AP1000. Ms. Parr responded that they were not significant changes, and had to do with material handling, since fuel rods were longer. Mr. Byrne followed up with questions about parent company Toshiba fabricating fuel rods in Japan. Ms. Parr's colleague Gilda Bocock responded that two other firms in the Toshiba family produced similar products, but that they were not competitors; in fact with the shutdown of reactors in Japan, Westinghouse Columbia has been using some of their surplus material. Mr. Byrne asked about whether they supplied fuel to reactors in the Czech Republic, and was told they did in 2009, do not at present, but hope to in the future.

Ms. Patterson and Mr. Byrne both engaged Ms. Parr and Ms. Bocock in a discussion of MOX, and whether the facility, if it ever opens, might be a direct competitor. The response was that it could be a competitor for reload fuel, and that several hurdles would have to be overcome for the two to jointly market their outputs.

Mr. Byrne asked for clarification of INPO (Institute of Nuclear Power Operations) evaluations and was told that the company performs peer review INPO-style evaluations, and that other companies have begun to follow suit. (Noting that Westinghouse was first!)

Mr. Byrne asked if some of the grid components were subbed out to companies in South Carolina and was told that product tooling equipment was subbed to Alpha manufacturing in West Columbia.

Dr. Van Brunt asked about cyber-security efforts and was told that Westinghouse was increasing the capabilities of their security force. "Prior to 9/11, security requirements were very basic. After 9/11, additional requirements came out in the form of orders. We've met those requirements and continue to improve, because to us it is smart business." Westinghouse is trying to take lessons learned from NRC evaluations and "do it right the first time."

Ms. Patterson asked for clarification that the seismic upgrades made were not required by NRC and was told that was correct, because there is no design basis accident for a category 3 event, so Westinghouse has strengthened ahead of NRC guidance. Westinghouse evaluated the facility and found one masonry block wall to which shielding was added to protect valving.

DHEC Update Shelly Wilson, DOE Federal Facilities Liaison

Ms. Wilson noted that she was pleased to be working, unlike her federal counterparts. Her presentation is available at LINK

There was considerable discussion about a recently discovered seep from a saltstone disposal facility vault 4, and when DHEC was notified. Ms. Wilson explained that it took DOE some time to draw the connections between the contamination found in the Z-Area retention basin and the small amount of liquid coming through cracks in the vault. She also clarified that while DHEC regulates chemical contaminants in storm water it does not have regulatory responsibility for radiological constituents. The July meeting referenced in the slides was not the first time DHEC was aware of the problem, but a meeting to discuss the cumulative impact of the seeps, caused by the heavy rainfall this year. Ms. Wilson stated that the contamination was minimal, that radioactive contamination had never been found in the retention basin before and was due to the extensive rains in 2013, and that DOE planned to stabilize Vault 4 in 2014 or 2015. This discussion was limited because of the government shutdown, and the consequent inability of DOE to participate in the GNAC meeting.

There was also considerable discussion of the proposed SRS funding and the resulting inability of DOE to meet enforceable Federal Facility Agreement dates for progress on tank closure, leaving SRS in the position of possibly having to pay more in fines for failure to progress on schedule than would be saved by the budget cuts. All noted how well the state and SRS had worked together to map out a plan to correct the situation. Senator Young asked if Secretary Moniz had responded to the letters he received from Catherine Templeton or Governor Haley, and Ms. Wilson responded that Ms. Templeton's letter had not been answered, and she did not believe the Governor's had been either.

Dr. Van Brunt introduced the question of politics, and there was general consensus that politics played a role in how budget decisions were made.

There also was consensus that slowing the Vitrification of tank waste created the potential for greater risk, through earthquake or other disaster, as well as leaking tanks. After discussion about which site had the greater problems, it was concluded that because SRS had a clear path forward, as well as more waste at or below the water table, action and money were more likely to be effective here.

Public Comments

Suzanne Rhodes, SC League of Women Voters, noted that her organization had also written to the SC delegation about SRS funding but had not received a reply. The remainder of her comments are available here: LINK

Tom Clements, Friends of the Earth, provided several news articles and discussed the NNSA plutonium disposition contract change. He also called attention to a link that shows plutonium disposal in WIPP is cheaper than using the MOX facility planned for the SRS site. All articles and links that he referenced are available here: LINK