

ZCAP ZION STATION COMMUNITY ADVISORY PANEL

MINUTES OF THE MEETING HELD ON FEBRUARY 27, 2012 AT THE ZION PARK DISTRICT LEISURE CENTER, ZION, IL

Present: Brent Paxton, Chairman
Joel Brumlik
Craig Dyke
Cynthia Johnson
John Lewis, Secretary
Audrey Liddle
Doug Ower
Linda Sittig
Patrick Thurman

Absent: Craig Mason
Kent McKenzie
Rep. JoAnn Osmond, Deputy Chairman

Item 1: Call to Order

The Chairman called the meeting to order at 6:00 pm. He thanked everyone for attending.

Item 2: Approval of Minutes

The Panel had no comments on the minutes of the November 30, 2011 meeting. Ms. Johnson motioned to accept the minutes, seconded by Ms. Sittig and this was carried unanimously by the Panel.

Item 3: Chairman's Remarks

The Chairman noted that agenda items would always include status updates and he reminded Panel members that other topics would be included at their request.

Item 4: ZionSolutions Presentations

Decommissioning Project Update

by Patrick Daly, General Manager

There were two OSHA recordable injuries in February: one was a worker with shoulder pain that required physical therapy and the other was a sprained ankle resulting from a step ladder fall.

Regarding radiation protection, the maximum radiation dose a worker can receive annually is 5 Rem set by the Nuclear Regulatory Commission and so far in 2012 the total dose received by the entire workforce is only 4.75 Rem. Work is controlled to ensure workers stay well below the regulatory limit and ALARA Regulations (“As Low As Reasonably Achievable”).

Offsite activity has included QA vendor inspections and NRC visits for all three of the fuel canister fabricators and the fuel building crane vendor to ensure that specifications are met.

The Unit-2 reactor head was removed and shipped to EnergySolutions’ disposal site in Clive, Utah. The reactor vessel upper and lower internals have been removed and segmentation will begin soon; the process will finish in September. The liner for Unit-2’s Greater-than-Class-C waste was received. Unit-1 preparatory work is underway.

Rail construction continues.

A lower voltage electrical system is being installed to disengage from the switchyard.

Asbestos abatement continues, which is the removal of thermal insulation from piping components. The work is safely conducted under negative pressure with workers in protective suiting. It is expected to be completed this summer.

Regarding waste management, not much material has yet been shipped offsite. 27,179 ft³ of low-level radioactive waste has been shipped to Clive, Utah. More than half of the asbestos has been disposed at a local landfill.

On spent fuel management, the fuel assembly modification work is complete except for one nozzle for which Westinghouse will propose a solution. A fuel assembly that has any damage will be handled differently to ensure its integrity during eventual shipment (response to question from Mr. Ower). The fuel sipping campaign is one-third complete; all data will be used to compile a Fuel Loading Plan.

Major work in the next six months includes a lot of construction activity:

- Complete the rail construction
- Construct the vertical concrete cask (VCC) pad – the ZCAP will receive a heads-up
- Construct the independent spent fuel storage installation (ISFSI) pad and building
- Construct the heavy haul road
- Upgrade the fuel building crane to meet NRC regulations

- Unit-2 reactor vessel internals segmentation
- Unit-1 reactor cavity prep work
- Asbestos abatement
- Electrical system modifications

The Decommissioning Trust Fund balance at the beginning of the project was \$801.4 million and at December 31, 2011 was \$696.5 million. The Fund earned \$44 million in investments and disbursements of \$148.9 million have been made.

Radiation Protection Program

by Chris Baker, Vice President Environment Safety & Health

The purpose of the program is to protect the health and safety of the workers, public and the environment by maintaining radiation exposure ALARA and keeping strict control of radioactive materials. The project has a qualified and experienced radiation protection staff and the workforce is trained and then retrained. Mr. Baker described the NRC radiation dose limits for workers and the stringent administrative guidelines adopted by *ZionSolutions*. He showed different types of radiation monitoring equipment and protective clothing. There are many sources of natural and manmade radiation, for example radon, soils/rocks/building materials, medical radiation, air travel and consumer products. Mr. Baker discussed public concerns after the Fukushima nuclear accident in Japan and that the potassium iodide KI pill had been erroneously represented as a “magic bullet” of radiation protection. The project has an air sampling and monitoring program. In response to questions from the public regarding emergency notifications, Mr. Daly emphasized that there is no scenario at the Zion Station with offsite consequences to the public.

Role of the Environment Department

by Darlene Murphy, Environmental Manager
and Angela Rappa, Environmental Specialist

Ms. Murphy explained that the *ZionSolutions* Environment Department deals primarily with non-radiological environmental issues. She described the compliance measures under the Spill Prevention Control and Countermeasure (SPCC) to comply with the Oil Pollution Act and noted that the oil volume on site has been reduced by over 87,000 gallons. Risk Management activities are centered on the protection of Lake Michigan and there are many environmental permits in place from the Lake County Stormwater Management Commission, the Illinois Environmental Protection Agency and the U.S. Army Corps of Engineers, with many routine environmental inspections performed (both unannounced and scheduled).

Ms. Rappa described *ZionSolutions*' program to monitor groundwater wells and Lake Michigan surface water. Over the past year the site has increased the sampling frequency and analysis at an outside laboratory. Importance is placed on environmental stewardship and biodiversity

protection. Ms. Rappa gave examples of wildlife protection, including snakes that were removed and protected during rail upgrade work.

It was noted that the Independent Spent Fuel Storage Installation (ISFSI) will be carefully located away from the wetlands and above the flood plain. Regarding water intake from the lake, one of the service water pumps will be replaced with a smaller pump.

Mr. Thurman asked that future ZCAP meetings include an environmental report.

Item 5: Public Comment and Questions

The Chairman asked members of the public who wished to make comments or ask questions to introduce themselves. He noted that the ZCAP Charter has a three-minute limit per person.

Mr. Chris Fisher of Zion referenced the recent east coast earthquake and enquired about the reported shifting of casks in dry storage. Mr. Daly explained that during the earthquake the canisters in dry storage at the North Anna nuclear plant moved a few inches which is the seismic design: the pad floats, the casks move and dissipate energy.

A Winthrop Harbor resident asked how much radiation can come from fuel rods. Mr. Daly said this would depend on the context but at Zion the fuel will be handled in shielded conditions. On the dry cask storage pad, the vents enable air to circulate around the canisters and the fuel remains shielded.

Mr. Paul Kakuris asked about the requirements for measurements of radiation as the NPDES is a non-radiological permit. Mr. Daly said that all discharges are monitored and reported to the Nuclear Regulatory Commission (NRC).

A Zion resident expressed concern about the construction of the vertical concrete cask pad at the end of Shiloh Boulevard. Mr. Daly clarified that this will just be standard construction techniques to make the concrete overpacks to shield the fuel casks. Ready-mix concrete will be used.

Mr. Tom Rielly, Executive Principal of Vista 360, provided his contact information to the ZCAP. He called for the resignation of Representative JoAnn Osmond as Deputy Chairperson of ZCAP as he believed she had been absent for 50% of the meetings. He said that *ZionSolutions'* management told him that all ZCAP members had agreed to serve.

Ms. Marilyn Shineflug of Lake Bluff said that she had submitted written questions after the previous ZCAP meeting and had not received written answers. The Chairman apologized as he thought that her questions had been answered.

Mr. Kakuris referred to the high degree of endangered species at the Illinois Beach State Park, in particular the entire area on the east is a federal critical habitat. He asked about federal

involvement and said that the community should be involved in having contiguous park trails once the decommissioning is concluded. *ZionSolutions* management explained that its task is only to prepare the land for beneficial reuse.

Item 6: Old Business

The Chairman noted there was no Old Business from the November 2011 meeting.

Item 7: New Business

In response to Panel suggestions, Mr. Daly said he would provide a timeline on the whole project at the next meeting on May 21. There will also be a good update on reactor vessel segmentation and construction activities. The Panel will visit the site during August. Chief Brumlik asked that the outstanding questions from a member of the public be answered and that the ZCAP be copied by email.

Item 8: Adjournment

The Chairman entertained a motion to adjourn the meeting. Motion made by Ms. Sittig and seconded by Chief Brumlik. The Motion was carried unanimously by the Panel. The meeting was adjourned at 7:30 pm.