



# **NRC Oversight Status of Salem & Hope Creek**

**Work Environment  
and  
Corrective Action Effectiveness**

**June 29, 2004**

*F*  
*6/29*

# HISTORY

---

## **Extended S/D and Watch List - Late 1990's**

## **Recovery Satisfactory but Performance Improvements Stalled in Early 2000's**

- Poorly-conceived realignment to “3-Unit Site”
  - ▶ stretched mgt thin and created confusion, especially in engineering
- Equipment Reliability/Outages/Events stressed the organization
- Corrective Action issues and Work Management ineffectiveness evident
- ORG Changes and Management Turnover

# PSEG PERFORMANCE AND NRC OVERSIGHT 2000-2003

---

- All three units have stayed in Licensee Response or Regulatory Response columns --a number of White indicators or findings, numerous other findings
- Strong crosscutting theme, PIR, highlighted in three Assessment letters; continues today
  - ▶ Numerous findings involving PIR
  - ▶ Involved S/HC EDGs, S/HC SW, S/HC grid UV protection, Salem water hammers, air systems, HC CRDMs, leaks, MOV's
  - ▶ Also lots of issues in BOP

# **PSEG PERFORMANCE AND NRC OVERSIGHT 2000-2003 (cont.)**

---

- Increased NRC management attention and site visits
  - ▶ RA visits: 4/01, 10/01, 7/02, 4/03, 7/03, 12/03, 3/04, 5/04
  - ▶ Maintained separate inspection programs for Salem and Hope Creek (2 SRIs)
  - ▶ Special inspections (e.g., partial LOOP, fuel pool leak with Tritium migration, EDG turbo charger failure)
- Late 2003: Initiated Special Review based on crosscutting themes, events, and allegations
  - ▶ Disciplined, structured approach through allegation process – panels led by Region I DRP Director

# NRC OVERSIGHT 2004

---

## January 28: Interim Results of Special Review

- NRC concerns related to work environment and station capacity for:
  - ▶ Handling emergent issues and associated operational decision-making
  - ▶ Addressing potential safety issues
- These concerns included:
  - ▶ Openness of management to concerns and alternate views
  - ▶ Strength of communication
  - ▶ Effectiveness of corrective actions and feedback processes
- Concerns did not involve any serious safety violations
- Recognized some change under new management but need to understand and address lingering issues
- **NRC Requested PSEG to do their own Assessment**

# NRC OVERSIGHT 2004 (cont.)

---

- NRC Letter to PSEG 1/28/04
- PSEG Letter to NRC 2/27/04
  - ▶ Provided interim assessment plant
- Public Meeting 3/18/04
  - ▶ Discussed assessment plans
- PSEG Letter to NRC 5/21/04
  - ▶ Submitted assessment results
- NRC Public Meeting 6/16/04
  - ▶ Discussed PSEG assessment results and action plan
- PSEG Commitment letter 6/25/04
  - ▶ Documented action plans in summary form

# PSEG ASSESSMENTS SUBMITTED

## 5/21/04

---

- Synergy Cultural Assessment (Dec. 2003)
- USA Group Safety Culture Assessment (Mar. 2003)--DBLL SOER Review
- Independent Review by IAT (Feb.- May 2004)--interviews and overall review, included corporate
  - ▶ Results consistent with NRC inspections, assessments and special review
  - ▶ Very detailed results ( $\approx$  200 pages docketed)
  - ▶ Includes stark, unvarnished verbiage
  - ▶ None found major safety issues but overall implications are negative about "organizational effectiveness" and SCWE

# EXTERNAL STAKEHOLDER PERSPECTIVES

---

- Key Allegor -- revealed allegor status publicly in March; has ongoing civil suit against PSEG. Very frequent contact with NRC Region I. Allegor contends that extensive "records" and views of numerous station staff provide "irrefutable evidence" that corporate-driven production pressure has overshadowed safety; and plant should be shut down to fix equipment and other plant problems.
- UCS -- Increasing involvement over past several months -- advocates plant S/D, Order, or CAL. Considers problems to be the same as during extended shut down and watch list during 1990's.
- Unplug Salem -- small group consistently advocates S/D
- New Jersey -- very interested; supportive of NRC
- Congressional -- interest, but little direct involvement so far
- Financial -- recent strong interest including mtg attendance
- Media -- mostly local



# PSEG ACTION PLANS

---

- PSEG letter recently submitted, summarizes plans. Licensee initiatives involve, in large measure, better execution of standard industry processes that PSEG has been trying to implement for several years.
- PSEG focus areas: SCWE, CAP, Work Management, Leadership Effectiveness, Facilities (detailed plans ECD July 31, 2004)
- PSEG intends to pursue action plans thru Business Plan
- Recent emphasis: conservative decisions and communications. Expanded outage scope to fix more equipment.
- Commitments:
  - ▶ Submit Key metrics (SCWE and SCWE drivers)
  - ▶ SCWE and Safety Culture Survey after the HC outage, submit and meet with NRC early 2005
  - ▶ Survey for five years
- Assessment of effectiveness to be part of normal line management processes

# REGULATORY OVERSIGHT -- PRINCIPLES

---

- Provide appropriate safety perspective and attention
- Understand that these issues will take some time to address. Recognize that things could get worse before improving
  - ▶ Need to assure PSEG has long term focus
- Look for effectiveness of efforts vs. merely completing action items
- Capture commitments and performance measures while avoiding “over-constraining” licensee processes.
- Recognize that metrics can be helpful but cannot become the sole measure of effectiveness

# REGULATORY OVERSIGHT -- PRINCIPLES (cont.)

---

- Recognize that “organization effectiveness” and equipment reliability problems are principal drivers of “soft” communications/SCWE issues
- Avoid open-ended process – have a clear exit strategy
- Needn’t satisfy all stakeholders, but NRC action should be logical and be clearly explained within context of ROP and other processes (SCWE policy and allegation process)

# **REGULATORY OPTIONS ADDITIONAL PSEG COMMITMENT**

---

**Considering the need for additional PSEG commitments in several areas:**

- Metrics submittal -- better coverage of equipment issues.
- Management meetings -- one this Fall, semiannually thereafter
- Additional effectiveness review -- without undercutting licensee management line processes, obtain agreement to repeat third-party assessment (e.g., USA review) covering more than work environment

# REGULATORY OPTIONS -- MONITORING AND FOLLOW UP

---

- Continued overall strong inspection effort
  - ▶ Maintain resident staffing
  - ▶ Thorough special/supplemental inspections as needed
  - ▶ Management site visits
- Complete the allegations and investigations in progress
- Some combination of some of the following:
  - ▶ Site Visits (some with HQ assist)
  - ▶ Review PSEG assessment in more detail (probably not needed)
  - ▶ Review PSEG approach and method for future assessments (with HQ assist or lead)
  - ▶ Focused Inspection follow up of selected actions (with HQ assist)
  - ▶ Periodic management meetings (how often?)
  - ▶ SCWE x-cut in mid-cycle assessment (probably)
  - ▶ Deviation Memo (likely)
  - ▶ Oversight panel – to coordinate HQ and RI activities
  - ▶ Remove site from ROP due to corrective action weaknesses? (Not needed)

# REGULATORY OPTIONS – REGULATORY “FOOTPRINT”

---

- Order
- CAL
- Letter Accepting Commitments
  - ▶ Possibly to include Oversight Panel and Deviation Memo