South Texas Project Update

CPS Energy Board of Trustees Meeting
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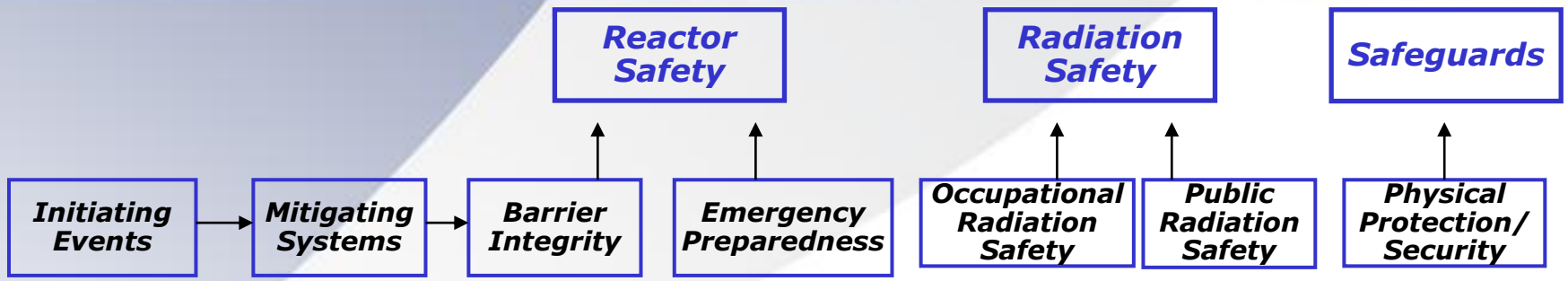
Overview

- South Texas Project – Overview of Units 1 and 2
- STP 1&2 Safety Performance
- STP 1&2 Performance Summary
  - Recent Challenges
  - Performance Indicators
  - Accomplishments

South Texas Project – Overview of Units 1 and 2

- Nominal net electrical output
  - Per unit = 1350 MW
  - Total for two units = 2700 MW
- CPS Energy share 1080 MW (40%)
- Other owners of STP 1&2
  - NRG Energy -> 44%
  - Austin Energy -> 16%
- STP Nuclear Operating Company (STPNOC) operates the facility
- Commercial Operation Dates:
  - Unit 1 -> 1988; Unit 2 -> 1989
- Current operating licenses will expire:
  - Unit 1 -> 2027; Unit 2 -> 2028
- License Renewal Application submitted to Nuclear Regulatory Commission in Oct 2010
  - Upon approval, will extend current licenses until 2047 (Unit 1) and 2048 (Unit 2)

STP 1&2 SAFETY PERFORMANCE - REGULATORY SUMMARY



Performance Indicators

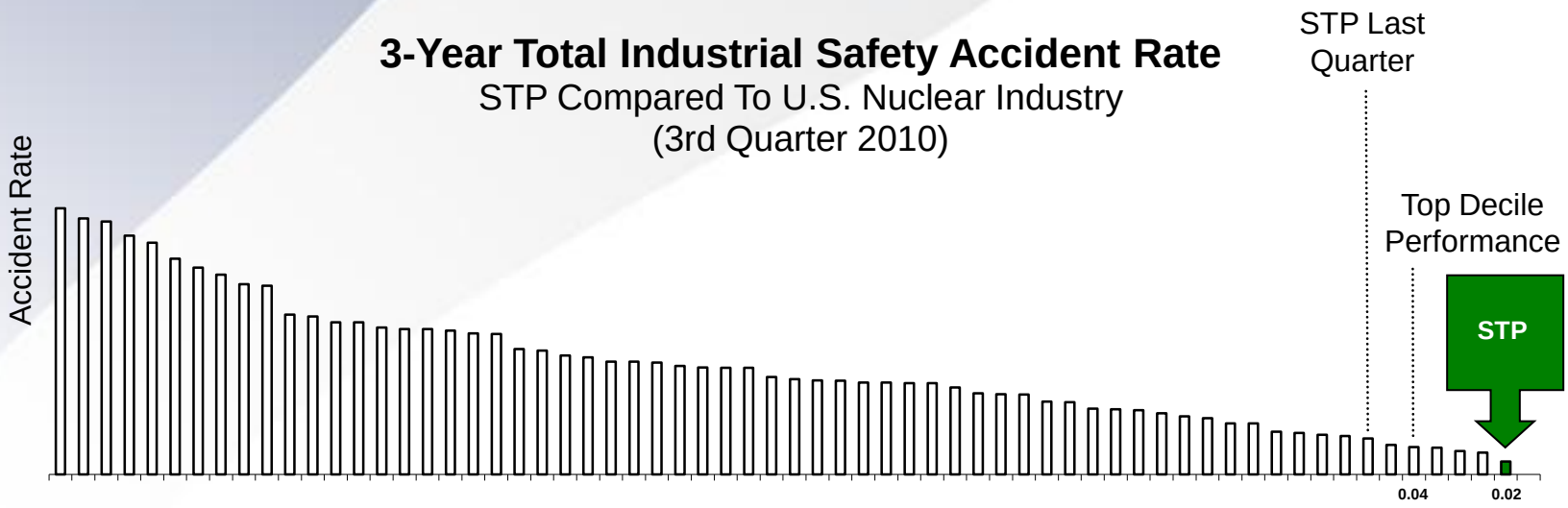
- Unplanned Scrams (G)
- Unplanned Power Changes (G)
- Unplanned Scrams with Complications (G)
- Safety System Functional Failures (G)
- Emergency AC Power System (G)
- High Pressure Injection System (G)
- Heat Removal System (G)
- Residual Heat Removal System (G)
- Cooling Water Systems (G)
- Reactor Coolant System Activity (G)
- Reactor Coolant System Leakage (G)
- Drill/Exercise Performance (G)
- ERO Drill Participation (G)
- Alert and Notification System (G)
- Occupational Exposure Control Effectiveness (G)
- RETS/ODCM Radiological Effluent (G)

Green inspection findings or Performance Indicators (PIs) indicate a very low risk significance and therefore have little or no impact on safety.

White, yellow, or red inspection findings or PIs each, respectively, represent a greater degree of safety significance.

Data taken from NRC website on 01/06/11; data last modified on 10/25/10

STP 1&2 SAFETY PERFORMANCE –
TOTAL INDUSTRIAL SAFETY ACCIDENT RATE



Named as one of 12 companies to the *EHS Today* 2010 list of America's Safest Companies.

- **First nuclear facility to receive this award**

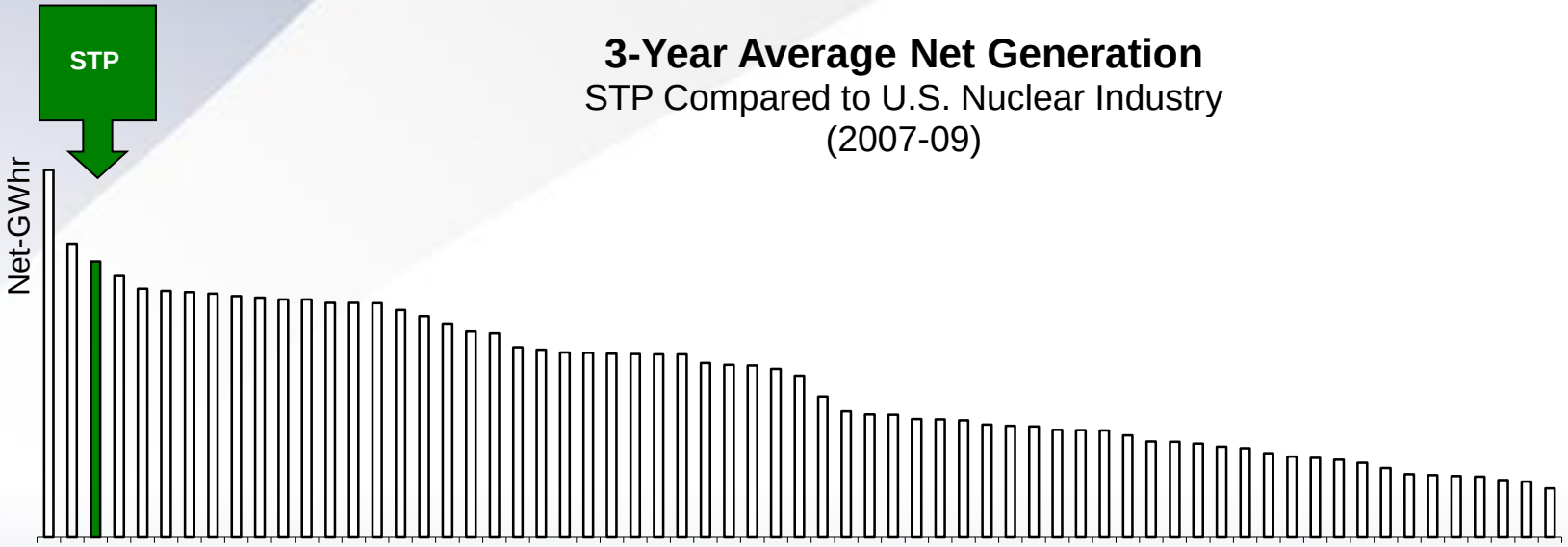
In June 2010, STP reached 12 million labor-hours (34 months) without a restricted duty or lost-time injury.

Total Industrial Safety Accident (TISA) Rate measures number of accidents per 200,000 work-hours that result in injuries classified as OSHA restricted duty or lost-time.

STP 1&2 PERFORMANCE SUMMARY – RECENT CHALLENGES

- Unit 1 Shutdown due to Rod Control System
  - Shutdown occurred Feb. 3, 2010
  - Root cause: Corrosion products from normal fabrication and passivation process associated with the new Reactor Vessel Head
  - Unit returned to service on Feb. 9, 2010
- Unit 1 Trip due to human performance error
  - Trip occurred Aug. 20, 2010
  - Root cause: Human performance error during surveillance testing
  - Unit returned to service on Aug. 22, 2010
- Unit 2 Trip due to breaker failure
  - Trip occurred Nov. 3, 2010
  - Event description: Breaker failure resulted in under voltage condition that caused reactor trip
  - Root cause analysis in progress
  - STPNOC Management made conservative decision to extend outage and repair seal housing gasket on one reactor coolant pump
  - Unit returned to service on Nov. 26, 2010

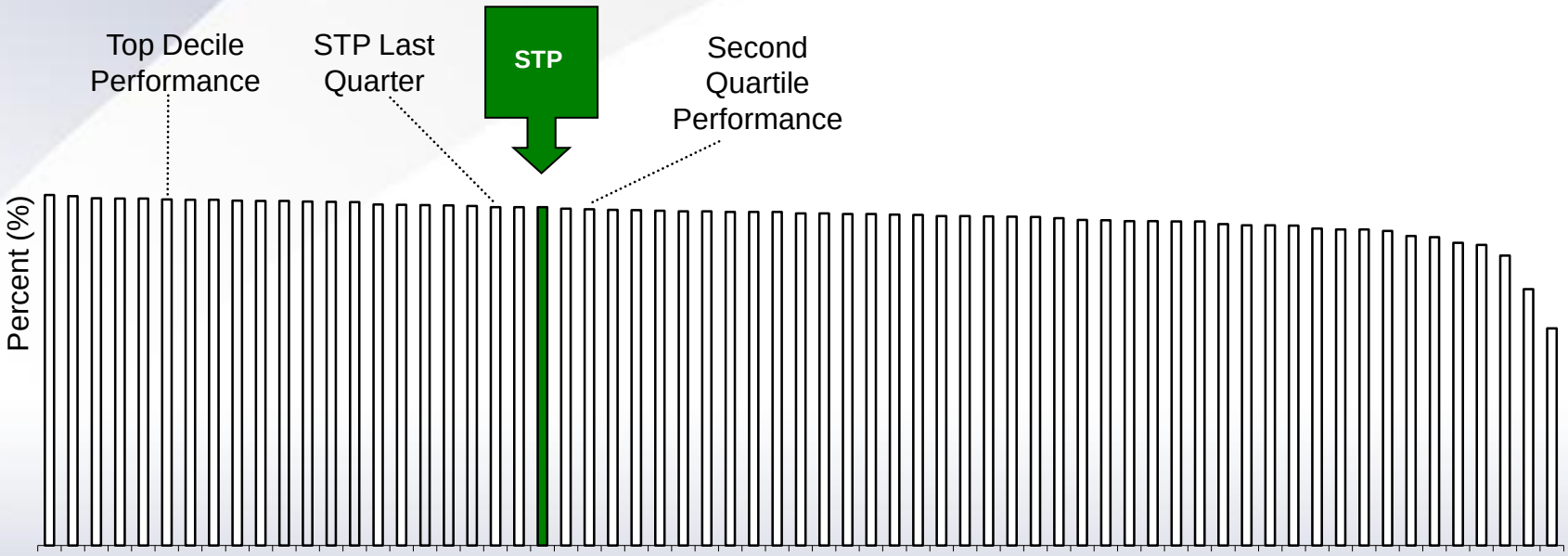
STP PERFORMANCE INDICATORS – NET GENERATION



3-Year Average Net Generation
STP Compared to U.S. Nuclear Industry
(2007-09)

STP PERFORMANCE INDICATORS – CAPABILITY FACTOR

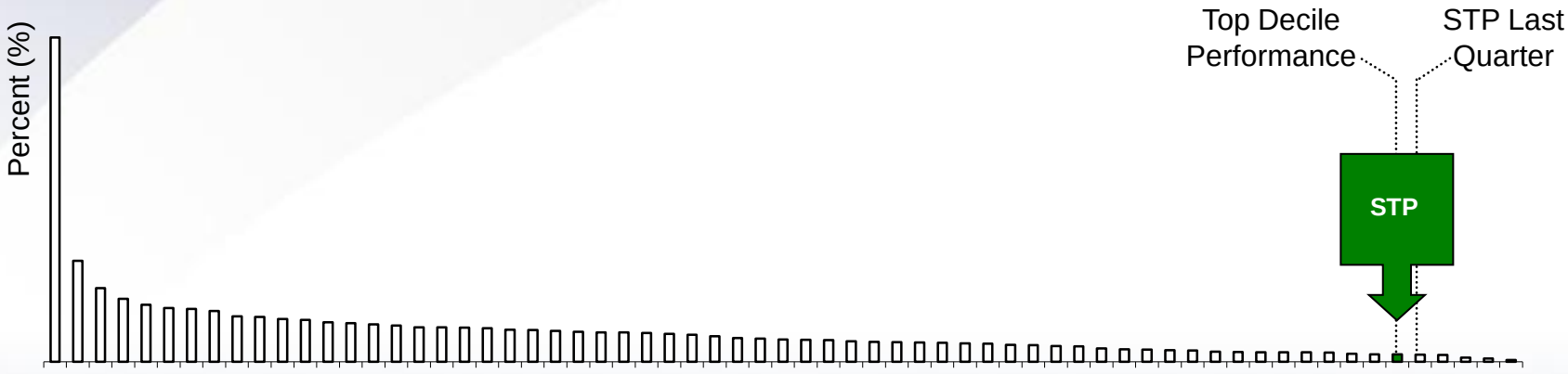
3-Year Average Unit Capability Factor
STP Compared to U.S. Nuclear Industry
(3rd Quarter 2010)



Capability Factor is the ratio of actual energy produced to the total amount of energy that could have been produced if the units were operated continuously at full power.

STP PERFORMANCE INDICATORS – FORCED LOSS RATE

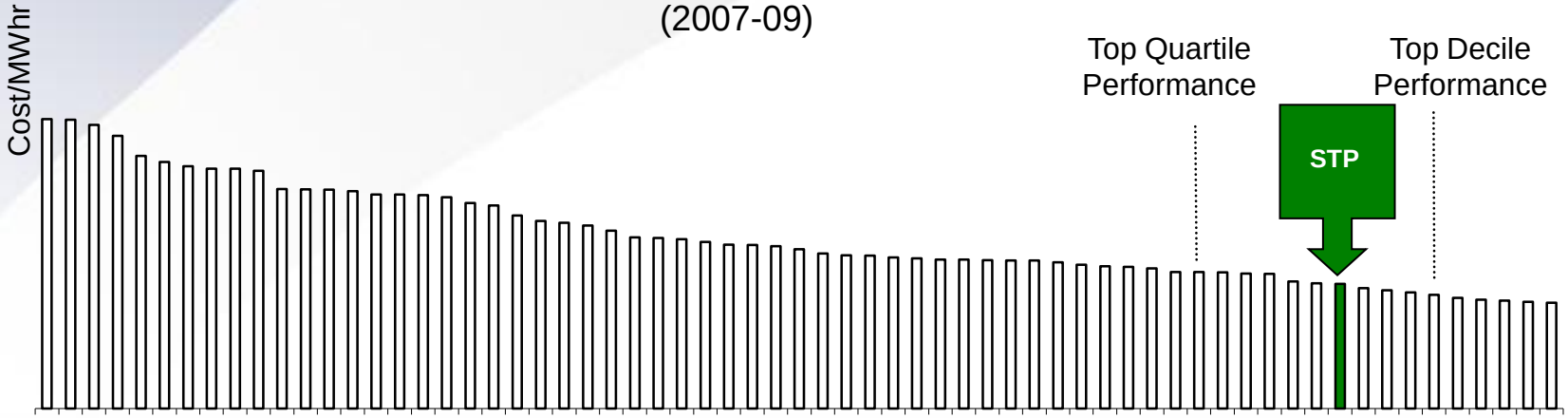
3-Year Average Forced Loss Rate
STP Compared to U.S. Nuclear Industry
(3rd Quarter 2010)



Forced Loss Rate is the percentage of energy generation during non-outage periods that a unit is not able to produce due to unplanned energy losses (such as unplanned shutdowns or load reductions).

STP PERFORMANCE INDICATORS – INCREMENTAL COST

3-Year Average Incremental Cost
STP Compared to U.S. Nuclear Industry
(2007-09)



Incremental Cost is comprised of Total O&M, Capital, and Fuel Expense.

STP 1&2 PERFORMANCE SUMMARY – ACCOMPLISHMENTS

- Named as one of 12 companies to the *EHS Today* 2010 list of America's Safest Companies
  - First nuclear facility to receive this award
- Received third consecutive "Excellent" performance rating from the Institute of Nuclear Power Operations (INPO)
- Set industry record by completing five consecutive breaker-to-breaker production runs
  - Operated continuously between refueling outages
- Nuclear generation rankings for 2009
  - Unit 1: #9 of 104 in U.S.; #20 of 437 in world
  - Unit 2: #2 in U.S.; #4 in world
  - Notes
    - 2010 generation statistics not available yet
    - Unit 1 had scheduled refueling outage in 2009
- Produced over 22.4 million MWh in 2009
- Top two-unit site in U.S. for 6 consecutive years (2004 – 2009)
- Received American Nuclear Society Utility Achievement Award for prolonged dedication to safe and economical nuclear generation

CLOSING

"**Another excellent example of a healthy and desirable safety culture in the United States commercial nuclear industry was the identification of reactor coolant system leakage at the South Texas Project Unit 1 reactor in 2003**. In this example, the license holder identified white residue at two of the 58 instrument penetrations on the bottom of the reactor vessel. The white residue was determined to be boric acid deposits due to leakage from the reactor coolant system.

The boric acid deposits were small in size and amount, and could have easily been overlooked, but they were not. Instead of stopping, the license holder took additional steps to remove access panels in the insulation to perform voluntary inspections. Further examination and testing by the license holder found cracking at the two instrument penetrations with boric acid deposits. In addition to repairing the two leaking penetrations, the license holder also examined all of the other penetrations for evidence of cracking. **The technical details of this example are not important. What is important is the questioning attitude, the culture within that nuclear power plant organization that led the utility to take steps to find the root cause of the abnormal indication. A strong safety focus led to the identification of an important material degradation issue**."

Comments from NRC Commissioner William Ostendorff

International Keynote Address

Nuclear Energy Asia 2010

Hong Kong, China

December 7, 2010