

Branch Evaluation, Plan & Recommendation

Allegation Number: RIV-2010-A-0023

Concern: 16.

		*RX Code or Functional Area:	Operations
Responsible Branch:	RPBD	*Discipline:	Operations
*OI Investigation Priority:		OI Case Number:	4-20XX-0XX
*OI Priority Basis:			

Concern: (A concern is one or two sentences.)

On Dec 15, 2009, the LA times reported that a backup generator failed to start over the weekend at SONGS, triggering a low level emergency known as an "unusual event" (NRC has inspected and documented 2 NCV's in IR 2009-005)

Concern Background, Supporting Information, & Comments:

NRC has inspected this issue and issued 2 NCV's in IR 2009005.

Regulatory Requirement: (fill in below)

10 CRF Part 50 App B Crit XVI

*Safety Significance:		HIGH	X	Normal		N/A	
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Basis: Describe the concern's safety significance (current, on going issue; level of individual(s) involved; etc.).

Past Issue

Check each question as applicable to this concern.

X	Is it a declaration, statement, or assertion of impropriety or inadequacy? Is there a potential deficiency?
X	Is the impropriety or inadequacy associated with NRC regulated activities or policy (e.g. SCWE)?
X	Is the validity of the issue unknown?

If all of the above statements are checked, the issue is an allegation.

***Technical Staff Recommendation(s)**

Date	Recommended Action	Assigned Branch	Planned Date
03/10/10	Send closure basis with reference to IR 2009005	RPBD	3/19/10

★ **NOTE:** Attach Draft NOV, RFI questions/requests, and/or an inspection plan as a separate document.

★ RFI discussed & determined ACCEPTABLE by the ARB?	YES		No		N/A	
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Document the INHIBITING FACTOR(S) in the ARB Decision(s) if not noted on first page. Document any INHIBITING FACTOR(S) that are overruled; provide ARB Justification/Reason why overruled.

ARB Date	ARB Decision(s)	Assigned to	Accepted Planned Date

D/1

is added to ensure a strong joint is formed between the steam generator and the reactor coolant system. The air bubbles mentioned in this and other related press articles at the time were ground out after they were discovered by the normal NDE inspection process. NRC inspectors reviewed the final radiography test results and found them to be satisfactory.

Concern 16

On December 15, 2009, the LA Times reported that a backup generator failed to start over the weekend at SONGS, triggering a low level emergency known as an "unusual event."

NRC Response to Concern 16

The NRC reviewed this event as part of the 4th quarter baseline inspection performed by the resident inspectors. SONGS Unit 3 has two emergency diesel generators which are designed to supply power to critical plant safety systems in the event of an accident. In December, 2009, while performing maintenance on one of the generators personnel blew a fuse in an alarm panel. Operators determined that the generator was inoperable and thus unable to perform its design function until the exact cause for the blown fuse was known. Plant procedures required SONGS operators to then test the other diesel generator to ensure that it did not have the same defect that caused the first generator to fail. The second generator failed to start for the test run and the plant declared a Notice of Unusual Event and reduced power in accordance with their operating guidelines. After just under 4 hours operators performed a successful test run of the first diesel generator and exited the Notice of Unusual Event

NRC inspectors reviewed these events and the associated maintenance surrounding them. Inspectors identified two violations of NRC requirements associated with the generator failures. Both violations were a failure of plant personnel to take adequate corrective actions in accordance with Title 10 of the Code of Federal Regulations, part 50, Appendix B, criterion XVI. The first generator failure was caused by an inadvertent grounding of a wire by a maintenance technician which caused a fuse to blow in an "annunciator" (i.e. alarm / display) panel. NRC inspectors determined that a similar event had happened 7 months earlier, and that an engineering evaluation had pointed to an internal fault in the annunciator panel. At the time of the first incident the licensee just replaced the blown fuse and moved on, rather than examining or replacing the faulty annunciator panel. This led to a nearly identical failure in December during maintenance. This NRC finding was determined to be of very low safety significance and was entered into the licensee's corrective action program, which the NRC periodically inspects to ensure proper follow up occurs.

The second generator failure was caused by a failure of the generator to start due to faulty circuitry caused by a power supply failure. A similar failure had also occurred in this diesel generator about 6 months earlier, and licensee engineers had determined that the cause was the same. The licensee took corrective action for the first failure by replacing power supply capacitors, however the replacement components were mis-configured in such a way that the

capacitors degraded rapidly, leading to the second failure in December, 2009. The second failure was also determined to be of very low safety significance and was entered into the licensee's corrective action program.

More detailed descriptions of the inspection findings are documented in NRC integrated inspection report 05000361/2009005 and 05000362/2009005. These inspection reports are available on the NRC public website using the Agency-wide Documents Access and management System (ADAMS) at www.NRC.gov.