

Attachment A

WNP-1/4

Docket Nos. 50-460 and 50-513

Reportable Condition 10CFR50.55(e)

Emergency Core Cooling Make-Up Pump Speed Increaser Supports

Background

There are three (3) makeup pumps per plant which provide RCS makeup and RC pump seal injection during normal operation. (Only two of these pumps are aligned to the emergency busses at any time.) These pumps also serve a safety function as a part of the Emergency Core Cooling System (ECCS). During normal plant operation, one (1) pump is in service. However, upon Engineered Safety Features Actuation (ESFAS), two (2) makeup pumps provide high pressure injection into the RCS from the Borated Water Storage Tank.

Description of Deficiency

While preparing to install WNP-1 makeup pump 2B, the installing contractor (JA Jones) discovered that the hold down bolts for the speed increaser had too little thread engagement and that the threads on one of the bolts had been stripped. These hold down bolts pass through the support feet of the speed increaser and thread into the base pad.

The cause of this problem is unknown; however, it can be attributed to a manufacturing error at Bingham-Willamette Co., manufacturer of the pumps. It is not possible to pinpoint the date of the occurrence. This defect was found on only one of the six makeup pumps supplied for WNP-1 and WNP-4.

Safety Implications

It has been determined that there was not sufficient thread engagement to maintain proper placement and operation of the speed increaser during all required operating conditions.

In the ECCS mode of operation, ESFAS actuation will start two (2) pumps.

Since it is necessary to postulate an active failure of one (1) pump, the operability of the other pump can not be jeopardized by failure of the speed increaser.

Corrective Action Taken

A nonconformance report was written detailing the problem. B&W provided a recommendation to; increase the holes from 3/4" to 7/8" and retap, redrill the support feet to 1/8" over the original size, and install new 7/8 UNC bolts.

1206 249

7910240 580

Corrective Action Taken

The nonconformance report was dispositioned in accordance with B&W's recommendation. The required repair work has been completed and accepted.

B&W will review Bingham Willamette's inspection and QA procedures. B&W will require Bingham Willamette to report the corrective action taken to prevent recurrence of this type defect and, also, to verify that similar pumps shipped to PGE & TVA are not defective.

1206 250