Public Service Company of Colorado
P. O. Box 361, Platteville, Colorado 80651

March 7, 1975

Mr. E. Morris Howard, Director
Nuclear Regulatory Commission
Region IV
Office of Inspection and Enforcement
611 Ryan Plaza Drive
Suite 1000
Arlington, Texas 76012

REF: Facility Operating License
No. DPR-34

Docket No. 50-267

Dear Mr. Howard:

Enclosed please find a copy of Abnormal Occurrence Report No. 50-267/75/8, final, submitted per the requirements of the Technical Specifications.

Very truly yours,

H. Larry Brey
Superintendent-Operations
Fort St. Vrain Nuclear
Generating Station

HLB:il

cc: Mr. Angelo Giambusso

2872

REPORT DATE: March 4, 1975 ABNORMAL OCCURRENCE

OCCURRENCE DATE: February 24, 1975

FORT ST. VRAIN NUCLEAR GENERATING STATION
PUBLIC SERVICE COMPANY OF COLORADO
P. O. BOX 361
PLATTEVILLE, COLORADO 80651

REPORT NO. 50-267/75/8

Final

IDENTIFICATION OF OCCURRENCE:

On February 24, 1975, "B" diesel engine of "A" standby generator failed to function properly during a weekly surveillance test. The engine started, ran for approximately 20 seconds, then shut down.

This is defined as an Abnormal Occurrence as per definition 2.1.f) of the Technical Specification.

CONDITIONS PRIOR TO OCCURRENCE:

____	Steady State Power	____	Routine Shutdown
____	Hot Shutdown	____	Routine Load Change
X	Cold Shutdown	____	Other (specify)
____	Refueling Shutdown		____
____	Routine Startup		____

The major plant parameters at the time of the event were as follows:

Power	Rtr.	0	MWth
	Elect.	0	MWe
Secondary Coolant	Pressure	260	psig
	Temperature	68	°F
	Flow	18,000	#/hr.
Primary Coolant	Pressure	Atmospheric	psig
	Temperature	100	°F Inlet
		100	°F Outlet
	Flow	0	#/hr.

DESCRIPTION OF OCCURRENCE:

During SR 5.6.1 a-w, weekly testing of the standby diesel-generating units, engine B of A generator, started, ran for approximately 20 seconds, then shut down and declutched. A second, immediate attempt to start the engine was unsuccessful.

Exhaust temperature indication for B engine showed no increase during the 20 second run.

APPARENT CAUSE OF OCCURRENCE:

____	Design	____	Unusual Service Cond. Including Environ.
____	Manufacture	X	Component Failure
____	Installation/Const.	____	Other (specify)
____	Operator		
____	Procedure		

The exhaust temperature thermocouple had failed and therefore showed no temperature increase. The control system saw this as a failure of the engine to start, and therefore, shut the engine down and declutched it, to prevent A engine from dragging a supposedly dead load.

ANALYSIS OF OCCURRENCE:

Attempting to run S.R. 5.6.1-a-w, "B" engine on the "A" diesel-generator unit shut down after 20 seconds. Electrical inspection revealed that the exhaust temperature thermocouple was defective. These exhaust temperature thermocouples must show high temperature in the exhaust system for a "Go" in the process of starting the units. However, the thermocouple was not open but failed to produce the necessary millivolt output to drop out the temperature relay, which resulted in a declutch and trip of the "B" engine. All alarms associated with the trip operated normally.

CORRECTIVE ACTION:

PTR 2-350 issued. A new exhaust temperature thermocouple was installed, and a program initiated on the preventive maintenance program to change out all thermocouples on the diesel-generator units on an annual basis.

FAILURE DATA/
SIMILIAR REPORTED OCCURRENCES:

None. Other thermocouples have been changed in the past, but because of suspected deterioration, not complete failure.

PROGRAMMATIC IMPACT:

None

CODE IMPACT:

None

Recommended:

Frank M. Mathie
Superintendent-Maintenance
Fort St. Vrain Nuclear
Generating Station

Approved:

Frederic E. Swart
Superintendent Nuclear Production
Public Service Company of Colorado

Gloria Flick

Phoned to ~~Lois Grice~~, Extension 7750, 2/24/75, at 3:20 PM.

E. Morris Howard, Director
U. S. Nuclear Regulatory Commission
Office of Inspection & Enforcement
Region IV
611 Ryan Plaza Drive
Suite 1000
Arlington, Texas 76012

On 2/24/75, while running the weekly surveillance tests on the emergency diesel generators, "B" engine of the "A" diesel-generator set failed to operate normally due to a faulty exhaust temperature thermocouple.

Frederic E. Swart
Supt. Nuclear Production
Fort St. Vrain Nuclear Generating Station

REPORT DATE: March 4, 1975 ABNORMAL OCCURRENCE

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50-267 incident

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COPY SENT REGION IV

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Superintendent Nuclear Production
Public Service Company of Colorado

Gloria Allen

Phoned to ~~Lois Grice~~, Extension 7750, 2/24/75, at 3:20 PM.

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