Revised Technical Specifications for
Diesel Generator Surveillance Testing

Revised Pages: 115 125
116 165a
117 193
120 199

Reference: 1) Generic Letter 84-15 "Proposed Staff Actions to Improve and Maintain Diesel Generator Reliability" dated July 2, 1984

2) Letter L. G. Kuncl to D. G. Eisenhut, "Response to 'Proposed Staff Action to Improve and Maintain Diesel Generator Reliability' (Generic Letter 84-15)" dated October 1, 1984

- Part I -

Reference 1 identified Diesel Generator (DG) reliability as being one of the main factors affecting the risk from station blackout and that early actions to improve this reliability would have a significant safety benefit. Toward this objective, reduction in the number of DG cold fast start surveillance tests was identified as an area which would enhance reliability. In Enclosure 1 to Reference 1, it is stated "the staff is concerned regarding a number of additional diesel generator tests that are currently being required by Technical Specifications for some of the earlier licensed operating plants. For example, when subsystems of the emergency core cooling system on some plants are declared inoperable, the diesel generators are required to be tested. The staff has concluded that excessive testing results in degradation of diesel engines. In order to make those few plants consistent with the majority of the plants, it is the staff's position that the requirements for testing diesel generators while emergency core cooling equipment is inoperable be deleted from the Technical Specifications for such plants. The affected licensees are encouraged to propose Technical Specifications to make such changes."

In Reference 2, the District responded that Cooper Nuclear Station Technical Specifications currently requires the diesel generators to be tested and proven operable whenever an emergency core or containment cooling subsystem is made or found to be inoperable and that this has added significantly to the number of fast start tests performed over the past several years. The District also stated it would submit proposed Technical Specification changes to delete testing the diesel generators when an emergency core or containment cooling subsystem is inoperable.

Accordingly, Nebraska Public Power District requests a revision to the Technical Specifications to delete testing the diesel generators when an emergency core or containment cooling subsystem is inoperable. In particular, the following changes are proposed:

1. Specification 4.5.A.2, page 115, delete testing the diesel generators when it is determined that one core spray subsystem is inoperable.

2. Specification 4.5.A.4, page 115, delete testing the diesel generators when it is determined that one of the RHR pumps is inoperable at a time when it is required to be operating.

3. Specification 4.5.A.5, page 116, delete testing the diesel generators when it is determined that the LPCI subsystem is inoperable.

4. Specification 4.5.B.3, page 117, delete testing the associated diesel generator of the operable subsystem if the other containment cooling subsystem loop becomes inoperable.

5. Bases for 3.5.A, page 125, delete testing the diesel generators should one core spray subsystem become inoperable.

6. Bases for 3.5.B, page 125, delete the testing of the appropriate diesel generator if one loop of the containment cooling subsystem is out of service.

In addition, the District believes testing DG operability after a Standby Gas Treatment (SBGT) system is made or found to be inoperable does not meet the intent of Reference 1. Although the District is not currently required to perform this demonstration, it requests clarification be made to the Technical Specifications to ensure against future interpretation that it is required. In particular, Specification 4.7.B.4.c on page 165a requires a SBGT system be demonstrated operable immediately and daily thereafter when the other SBGT system is inoperable. Specification 3.7.B.3 on page 165 allows reactor operation or fuel handling to continue for seven days after a SBGT system is inoperable as long as the other SBGT system and its associated diesel generator are operable. To avoid interpreting the above two specifications to imply the DG associated with the operable SBGT system is to be demonstrated operable, the District requests a sentence be added to Specification 4.7.B.4.c to clearly state it is not the intent to demonstrate DG operability. The DG is still required to be operable, but a demonstration (i.e., a start) is not required. A change in nomenclature is also proposed for Specification 4.7.B.4.c and is covered in Part IV.

Evaluation of this Revision with Respect to 10CFR50.92

A. The enclosed Technical Specification change is judged to involve no significant hazards based on the following:

1. Does the proposed license amendment involve a significant increase in the probability or consequences of an accident previously evaluated?

Evaluation:

The proposed amendment does not delete the requirement for the diesel generators to be operable when components of an Emergency Core or Containment Cooling Subsystem or Standby Gas Treatment System are made or found to be inoperable. Diesel generator fast start operability is still present to mitigate the consequences of a large LOCA coincident with loss of off-site power. By decreasing the number of fast starts, the proposed amendment reduces the degradation of the diesel engines due to excessive testing and

increases their reliability. For these reasons, the proposed license amendment does not involve a significant increase in the probability or consequences of an accident previously evaluated.

2. Does the proposed license amendment create the possibility for a new or different kind of accident from any accident previously evaluated?

Evaluation:

Since the proposed amendment will enhance diesel generator reliability and introduces no new mode of plant operation, previous accident analysis remain bounding with no creation of a new or different kind of accident.

3. Does the proposed amendment involve a significant reduction in a margin of safety?

Evaluation:

The proposed amendment enhances the margin of safety by improving diesel generator reliability.

- Part II -

Appendix A to Reference 1 provided modified standard Technical Specifications intended as an example of changes due to the reduction in number of fast starts and DG reliability improvement program surveillance requirements. Although at present the District is not ready to submit Technical Specification changes regarding diesel generator inoperability limits, it is prepared to follow one of the changes regarding reduction in the number of diesel fast starts. Specifically, this is the deletion of the requirement to test, at greatly increased frequency, the operability of a diesel generator after the other diesel generator is determined to be inoperable. The change still requires an initial demonstration of diesel generator operability, but deletes the requirement for additional fast start testing after operability is verified.

Accordingly, Nebraska Public Power District requests a revision to the Technical Specifications to delete testing a diesel generator subsequent to an immediate verification of operability after the other diesel generator is found to be inoperable. In particular, it is proposed to change Specification 4.5.F.1 on page 120 to delete the words "and daily thereafter" at the end of the paragraph. The requirement to immediately verify diesel generator operability is retained as in the example Technical Specifications in Appendix A to Reference 1. The District believes this proposed change meets the intent of Reference 1 by reducing the number of diesel generator fast starts, hence increasing reliability.

Evaluation of this Revision with Respect to 10CFR50.92

A. The enclosed Technical Specification change is judged to involve no significant hazards based on the following:

1. Does the proposed license amendment involve a significant increase in the probability or consequences of an accident previously evaluated?

Evaluation:

The proposed amendment does not delete the requirement to immediately verify operability of a diesel generator when the other is found to be inoperable. It does not delete the requirement that allows plant operation for only seven days with one operable diesel generator. Diesel generator fast start capability is present to mitigate the consequences of a large LOCA coincident with loss of off-site power. Since decreasing the number of fast starts will improve reliability and operation time with only one operable diesel generator does not change, the proposed amendment does not involve a significant increase in the probability or consequences of an accident previously evaluated.

2. Does the proposed license amendment create the possibility for a new or different kind of accident from any accident previously evaluated?

Evaluation:

Since the proposed amendment will enhance diesel generator reliability and introduces no new mode of plant operation, previous accident analysis remain bounding with no creation of a new or different kind of accident from any accident previously evaluated.

3. Does the proposed amendment involve a significant reduction in a margin of safety?

Evaluation:

The proposed amendment will increase the reliability of the diesel generators and will enhance the margin of safety.

- Part III -

The District would like to propose another amendment to enhance diesel generator reliability. This involves increasing the minimum percent of rated load a diesel generator must be loaded to demonstrate operational readiness. This will bring the Technical Specifications in line with Regulatory Guide 1.108, Section C.2.e(3). The increased load will help prevent fouling of the diesel engine and increase reliability. In particular, the following changes are proposed:

1. Specification 4.9.A.2.a on page 193 to increase to 50 percent of rated load what a diesel generator must be loaded to demonstrate operational readiness.

2. Bases for 4.9, page 199, change from 35 percent to 50 percent of rated load, what a diesel generator should be loaded, to prevent fouling of the engine.

Evaluation of this Revision with Respect to 10CFR50.92

A. The enclosed Technical Specification change is judged to involve no significant hazards based on the following:

1. Does the proposed license amendment involve a significant increase in the probability or consequences of an accident previously evaluated?

Evaluation:

Since the proposed amendment only imposes move restrictive criteria for determining diesel generator operability it does not increase the probability or consequences of an accident previously evaluated.

2. Does the proposed license amendment create the possibility for a new or different kind of accident from any accident previously evaluated?

Evaluation:

Since the proposed amendment only imposes more restrictive criteria for determining diesel generator operability it does not create the possibility for a new or different kind of accident from any accident previously evaluated.

3. Does the proposed amendment involve a significant reduction in a margin of safety?

Evaluation:

By increasing the loading criteria for determining diesel generator operability, the proposed amendment will decrease fouling of the engine, increase diesel generator reliability, and enhance the margin of safety.

B. Additional basis for proposed no significant hazards consideration determination:

The Commission has provided guidance concerning the application of the standards for determining whether a significant hazards consideration exists by providing certain examples (48CFR14870). The examples include: "(ii) A change that constitutes an additional limitation, restriction, or control not presently included in the Technical Specifications. . ." Since the proposed change constitutes a more restrictive criteria to demonstrate operability, the District believes the above example includes the proposed amendment.

- Part IV -

Finally, the District requests a revision to the Technical Specifications to achieve consistency in nomenclature regarding the Standby Gas Treatment (SBGT) System. Amendment 88 to the Cooper Nuclear Station Facility Operating License changed the nomenclature such that use of the word "circuit" was deleted in regards to the SBGT system. Accordingly, the District requests changing

Specification 4.7.B.4.c on page 165a to delete use of the term "circuit" and replace it with "standby gas treatment system" which is consistent with Amendment 88.

Evaluation of this Revision with Respect to 10CFR50.92

The Commission has provided guidance concerning the application of the standards for determining whether a significant hazards consideration exists by providing certain examples (48CFR14870). The examples include: "(i) A purely administrative change to Technical Specifications: for example, a change to achieve consistency throughout the Technical Specifications. . ." Since the above amendment is a change to achieve consistency throughout the Technical Specifications in the nomenclature of the Standby Gas Treatment System, it is the District's belief the change is included in the above example.

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS
3.5.A (cont'd.)	4.5.A (cont'd.)
2. From and after the date that one of the core spray subsystems is made or found to be inoperable for any reason, continued reactor operation is permissible during the succeeding seven days provided that during such seven days all active components of the other core spray subsystem and active components of the LPCI subsystem and the diesel generators are operable.	2. When it is determined that one core spray subsystem is inoperable, the operable core spray subsystem and the LPCI subsystem shall be demonstrated to be operable immediately. The operable core spray subsystem shall be demonstrated to be operable daily thereafter.
3. Both LPCI subsystems shall be operable: (1) prior to reactor startup from a Cold Condition, except as specified in 3.5.F.7, or (2) when there is irradiated fuel in the vessel and when the reactor vessel pressure is greater than atmospheric pressure, except as specified in 3.5.A.4 and 3.5.A.5 below.	3. LPCI subsystem testing shall be as follows: a. Simulated Automatic Actuation Test — Once/Operating Cycle b. Pump Operability — Once/month c. Motor Operated Valve Operability — Once/month d. Pump Flow Rate — Once/3 months During single pump LPCI, each RHR pump shall deliver at least 7700 GPM but no more than 8400 GPM against a system head equivalent to a reactor vessel pressure of 20 psid above drywell pressure with water level below the jet pumps. At the same conditions, two pump LPCI flow shall be at least 15,000 GPM. e. Recirculation pump discharge valves shall be tested each refueling outage to verify full open to full closed in $20 \leq t \leq 26$ seconds.
4. From and after the date that one of the RHR (LPCI) pumps is made or found to be inoperable for any reason, continued reactor operation is permissible only during the succeeding thirty days provided that during such thirty days the remaining active components of the LPCI subsystem and all active components of both core spray subsystems and the diesel generators are operable.	4. When it is determined that one of the RHR (LPCI) pumps is inoperable at a time when it is required to be operating the remaining active components of the LPCI subsystems, the containment cooling subsystem and both core spray systems shall be demonstrated to be operable immediately and the operable LPCI pumps daily thereafter.

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS
3.5.A (Cont'd.)	4.5.A. (Cont'd.)
5. From and after the date that one LPCI subsystem is made or found to be inoperable for any reason, continued reactor operation is permissible only during the succeeding 7 days, unless it is sooner made operable, provided that during such 7 days all active components of both core spray subsystems, the containment cooling subsystems (including 2 LPCI pumps) and the diesel generators required for operation of such components shall be operable.	5. When it is determined that the LPCI subsystem is inoperable, both core spray subsystems and the containment cooling subsystem shall be demonstrated to be operable immediately and daily thereafter.
6. All recirculation pump discharge valves and bypass valves shall be operable prior to reactor startup (or closed if permitted elsewhere in these specifications).	6. All recirculation pump discharge and bypass valves shall be tested for operability during any period of Reactor cold shutdown exceeding 48 hours, if operability tests have not been performed during the preceding 31 days.
7. The reactor shall not be started up with the RHR system supplying cooling to the fuel pool.	
8. If the requirements of 3.5.A 1,2,3,4, 5,6 or 7 cannot be met, an orderly shutdown of the reactor shall be initiated and the reactor shall be in the cold shutdown condition within 24 hours.	
B. Containment Cooling Subsystem (RHR Service Water)	B. Containment Cooling Subsystem (RHR Service Water)
1. Except as specified in 3.5.B.2, 3.5.B.3, and 3.5.F.3 below both containment cooling subsystems loops shall be operable whenever irradiated fuel is in the reactor vessel and reactor coolant temperature is greater than 212°F, and prior to reactor startup from a Cold Condition.	1. Containment Cooling Subsystem Testing shall be as follows:

	Item	Frequency
a.	Pump & Valve Operability	Once/3 months
b.	Pump Capacity Test. Each RHR service water booster pump shall deliver 4000 gpm.	After pump maintenance and every 3 months
c.	Air test on drywell and torus headers and nozzles.	Once/5 years

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS
3.5.B (Cont'd.)	4.5.B (Cont'd.)
2. From and after the date that any RHR service water booster pump is made or found to be inoperable for any reason, continued reactor operation is permissible only during the succeeding thirty days, unless such pump is sooner made operable provided that during such thirty days all other active components of the containment cooling subsystem are operable.	2. When it is determined that any RHR service water booster pump is inoperable, the remaining active components of the containment cooling subsystems shall be demonstrated to be operable immediately and weekly thereafter.
3. From and after the date that one containment cooling subsystem loop is made or found to be inoperable for any reason, continued reactor operation is permissible only during the succeeding seven days unless such subsystem loop is sooner made operable, provided that all active components of the other containment cooling subsystem loop, including its associated diesel generator, are operable.	3. When one containment cooling subsystem loop becomes inoperable, the operable subsystem loop shall be demonstrated to be operable immediately and daily thereafter.
4. If the requirements of 3.5.B.1, 3.5.B.2 or 3.5.B.3 cannot be met, an orderly shutdown shall be initiated and the reactor shell be in a cold shutdown condition within 24 hours.	
C. HPCI Subsystem	C. HPCI Subsystem
1. The HPCI Subsystem shall be operable whenever there is irradiated fuel in the reactor vessel, reactor pressure is greater than 113 psig, and prior to reactor startup from a Cold Condition, except as specified in 3.5.C.2 and 3.5.C.3 below.	1. HPCI subsystem testing shall be performed as follows:

	Item	Frequency
a.	Simulated Automatic Actuation Test	Once/operating Cycle
b.	Pump Operability	Once/month
c.	Motor Operated Valve Operability	Once/month

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS
3.5.E (cont'd)	4.5.E (cont'd)
2. From and after the date that one valve in the automatic depressurization subsystem is made or found to be inoperable for any reason, continued reactor operation is permissible only during the succeeding seven days unless such valve is sooner made operable, provided that during such seven days the HPCI subsystem is operable.	2. When it is determined that one valve of the ADS is inoperable, the ADS subsystem actuation logic for the other ADS valves and the HPCI subsystem shall be demonstrated to be operable immediately and at least weekly thereafter.
3. With the surveillance requirements of 4.6.D.5 not performed at the required intervals due to reactor shutdown, a reactor startup may be conducted provided the appropriate surveillance is performed within 12 hours of achieving 113 psig reactor steam pressure.	
4. If the requirements of 3.5.E.1 or 3.5.E.2 cannot be met, an orderly shutdown shall be initiated and the reactor pressure shall be reduced to at least 113 psig within 24 hours.	
F. Minimum Low Pressure Cooling and Diesel Generator Availability	F. Minimum Low Pressure Cooling and Diesel Generator Availability
1. During any period when one diesel generator is inoperable, continued reactor operation is permissible only during the succeeding seven days unless such diesel generator is sooner made operable, provided that all of the low pressure core and containment cooling subsystems and the remaining diesel generator shall be operable and the requirements of 3.9.A.1 are met. If this requirement cannot be met, the requirements of 3.5.F.2 shall be met.	1. When it is determined that one diesel generator is inoperable, all low pressure core cooling and containment cooling subsystems shall be demonstrated to be operable immediately and daily thereafter. In addition, the operable diesel generator shall be demonstrated to be operable immediately.
2. During any period when both diesel generators are inoperable, continued reactor operation is permissible only during the succeeding 24 hours unless one diesel generator is sooner made operable, provided that all the low pressure core and containment cooling subsystems are operable and the reactor power level is reduced to 25% of rated power and the requirements of 3.9.A.1 are met. If this requirement cannot be met, either the requirements shall be met or an orderly shutdown shall be initiated and the reactor placed in the cold shutdown condition within 24 hours.	

3.5.A BASES (cont'd.)

core spray subsystems and LPCI constitute a 1 out of 3 system; however, the combined effect of the two systems to limit excessive clad temperatures must also be considered. The test interval specified in Specification 4.5 is 1 month. Should a subsystem fail, a daily test is called for on the remaining systems to ensure that they will function.

Should one core spray subsystem become inoperable, the remaining core spray and the LPCI system are available should the need for core cooling arise. To assure that the remaining core spray and LPCI subsystems are available, they are demonstrated to be operable immediately. This demonstration includes a manual initiation of the pumps and associated valves.

Should the loss of one LPCI pump occur, a nearly full complement of core and containment cooling equipment is available. Three LPCI pumps in conjunction with the core spray subsystem will perform the core cooling function. Because of the availability of the majority of the core cooling equipment, which will be demonstrated to be operable, a thirty day repair period is justified. If the LPCI subsystem is not available, at least 1 LPCI pump must be available to fulfill the containment cooling function. The 7 day repair period is set on this basis.

B. Containment Cooling Subsystem

The containment cooling subsystem for CNS consists of two loops each with 2 RHR (LPCI) pumps serving one side of the RHR heat exchanger and two RHR Service Water Booster Pumps serving the other side. The design of the loops is predicted upon the use of one RHR Service Water Booster Pump and one RHR heat exchanger, for heat removal after a design basis accident. Thus, there are ample spares for margin above design conditions. Loss of margin should be avoided and the equipment maintained in a state of operation. So a 30 day out-of-service time is chosen for this equipment. If one loop is out-of-service reactor operation is permissible for seven days with daily testing of the operable loop.

With components or subsystems out-of-service, overall core and containment cooling reliability is maintained by demonstrating the operability of the remaining cooling equipment. The degree of operability to be demonstrated depends on the nature of the reason for the out-of-service equipment. For routine out-of-service periods caused by preventive maintenance, etc., the pump and valve operability checks will be performed to demonstrate operability of the remaining components. However, if a failure, design deficiency, etc., caused the out-of-service period, then the demonstration of operability should be thorough enough to assure that a similar problem does not exist on the remaining components. For example, if an out-of-service period were caused by failure of a pump to deliver rated capacity, the other pumps of this type might be subjected to a capacity test. In any event, surveillance procedures, as required by Section 6 of these specifications, detail the required extent of testing.

The pump capacity test is a comparison of measured pump performance parameters

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS
3.7.B (cont'd)	4.7.B (cont'd)
4. If these conditions cannot be met, procedures shall be initiated immediately to establish reactor conditions for which the standby gas treatment system is not required.	4.a. At least once per operating cycle automatic initiation of each branch of the standby gas treatment system shall be demonstrated.
	b. At least once per operating cycle manual operability of the bypass valve for filter cooling shall be demonstrated.
	c. When one standby gas treatment system becomes inoperable the other standby gas treatment system shall be demonstrated to be operable immediately and daily thereafter. A demonstration of diesel generator operability is not required by this specification.
C. Secondary Containment	C. Secondary Containment
1. Secondary containment integrity shall be maintained during all modes of plant operation except when all of the following conditions are met.	1. Secondary containment surveillance shall be performed as indicated below:

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS
3.9 AUXILIARY ELECTRICAL SYSTEM	4.9 AUXILIARY ELECTRICAL SYSTEM
Applicability:	Applicability:
Applies to the auxiliary electrical power system.	Applies to the periodic testing requirements of the auxiliary electrical systems.
Objective:	Objective:
To assure an adequate supply of electrical power for operation of those systems required for safety.	Verify the operability of the auxiliary electrical system.
Specification:	Specification:
A. Auxiliary Electrical Equipment	A. Auxiliary Electrical Equipment
1. The reactor shall not be made critical from a Cold Shutdown Condition unless all of the following conditions are satisfied:	1. Emergency Buses Undervoltage Relays
a. Both off-site sources (345 KV and 69 KV) and the startup transformer and emergency transformer are available and capable of automatically supplying power to the 4160 Volt emergency buses 1F and 1G.	a. Loss of voltage relays Once every 18 months, loss of voltage on emergency buses is simulated to demonstrate the load shedding from emergency buses and the automatic start of diesel generators.
b. Both diesel generators shall be operable and there shall be a minimum of 45,000 gal. of diesel fuel in the fuel oil storage tanks.	b. Undervoltage relays Once every 18 months, low voltage on emergency buses is simulated to demonstrate disconnection of the emergency buses from the offsite power source. The undervoltage relays shall be calibrated once every 18 months.
c. The 4160V critical buses 1F and 1G and the 480V critical buses 1F and 1G are energized. 1. The loss of voltage relays and their auxiliary relays are operable. 2. The undervoltage relays and their auxiliary relays are operable.	2. Diesel Generators a. Each diesel-generator shall be started manually and loaded to not less than 50% of rated load for no less than 2 hours once each month to demonstrate operational readiness.
d. The four unit 125V/250V batteries and their chargers shall be operable.	
e. The power monitoring system for the inservice RPS MG set or alternate source shall be operable.	

4.9 BASES

The monthly test of the diesel generator is conducted to check for equipment failures and deterioration. Testing is conducted up to equilibrium operating conditions to demonstrate proper operation at these conditions. The diesel generator will be manually started, synchronized and connected to the bus and load picked up. The diesel generator should be loaded to at least 50% of rated load to prevent fouling of the engine. It is expected that the diesel generator will be run for at least two hours. Diesel generator experience at other generating stations indicates that the testing frequency is adequate and provides a high reliability of operation should the system be required.

Each diesel generator has two air compressors and two air receivers for starting. It is expected that the air compressors will run only infrequently. During the monthly check of the diesel generator, each receiver in each set of receivers will be drawn down below the point at which the corresponding compressor automatically starts to check operation and the ability of the compressors to recharge the receivers.

The diesel generator fuel consumption rate at full load is approximately 275 gallons per hour. Thus, the monthly load test of the diesel generators will test the operation and the ability of the fuel oil transfer pumps to refill the day tank and will check the operation of these pumps from the emergency source.

The test of the diesel generator during the refueling outage will be more comprehensive in that it will functionally test the system; i.e, it will check diesel generator starting and closure of diesel generator breaker and sequencing of load on the diesel generator. The diesel generator will be started by simulation of a loss-of-coolant accident. In addition, an undervoltage condition will be imposed to simulate a loss of off-site power.

Periodic tests between refueling outages verify the ability of the diesel generator to run at full load and the core and containment cooling pumps to deliver full flow. Periodic testing of the various components, plus a functional test once-a-cycle, is sufficient to maintain adequate reliability.

Although station batteries will deteriorate with time, utility experience indicates there is almost no possibility of precipitous failure. The type of surveillance described in this specification is that which has been demonstrated over the years to provide an indication of a cell becoming irregular or unserviceable long before it becomes a failure. In addition, the checks described also provide adequate indication that the batteries have the specified ampere-hour capability.

The diesel fuel oil quality must be checked to ensure proper operation of the diesel generators. Water content should be minimized because water in the fuel could contribute to excessive damage to the diesel engine.

When it is determined that some auxiliary electrical equipment is out of service, the increased surveillance required in Section 4.5.F is deemed adequate to provide assurance that the remaining equipment will be operable.

The Reactor Protection System (RPS) is equipped with a seismically qualified, Class 1E power monitoring system. This system consists of eight Electrical Protection Assemblies (EPA) which isolate the power sources from the RPS if the input voltage and frequency are not within limits specified for safe system operation. Isolation of RPS power causes that RPS division to fail safe.