1.0 DEFINITIONS (Cont'd)

Simulated Automatic Actuation - Simulated automatic actuation means applying a simulated signal to the sensor to actuate the circuit in question.

Site Boundary - That line beyond which the land is not owned, leased or otherwise controlled by licensee.

Source Check - A source check shall be the qualitative assessment of channel response when the channel sensor is exposed to a radioactive source.

Startup/Hot Standby Mode - In this mode the reactor protection scram trips, initiated by condenser low vacuum and main steam line isolation valve closure are bypassed, the reactor protection system is energized with IRM neutron monitoring system trip, the APRM 15% high flux trip, and control rod withdrawal interlocks in service. This is often referred to as just Startup Mode. This is intended to imply the Startup/Hot Standby position of the mode switch.

Surveillance Frequency - Periodic surveillance tests, checks, calibrations, and examinations shall be performed within the specified surveillance intervals. The operating cycle interval as pertaining to instrument and electrical surveillance shall not exceed 18 months. These specified time intervals may be exceeded by 25%. In cases where the elapsed interval has exceeded 100% of the specified interval, the next surveillance interval shall commence at the end of the original specified interval. Surveillance tests are not required on systems or parts of the systems that are not required to be operable or are tripped. If tests are missed on parts not required to be operable or are tripped, then they shall be performed prior to returning the system to an operable status.

A surveillance test of the diesel generators, that requires a plant outage, may be deferred beyond the calculated due date until the next refueling outage, provided the equipment has been similarly tested and meets the surveillance requirement for the other unit. When a test is deferred under this provision, the next surveillance interval shall commence at the end of the original specified interval.

Transition Boiling - Transition boiling means the boiling regime between nucleate and film boiling. Transition boiling is the regime in which both nucleate and film boiling occur intermittently with neither type being completely stable.

Trip System - A trip system means an arrangement of instrument channel trip signals and auxiliary equipment required to initiate

LIMITING CONDITIONS FOR OPERATION

3.6.B Coolant Chemistry

1. Coolant Activity Limits

Whenever the reactor is critical, the limits on activity concentrations in the reactor coolant shall not exceed the equilibrium value of 0.2 uc/gm of dose equivalent *I-131.

This limit may be exceeded for a maximim of 48 hours. During this activity transient the iodine concentration shall not exceed the equilibrium value of 4.0 uc/gram of dose equivalent I-131 whenever the reactor is critical. The reactor shall not be operated under this exception from the equilibrium activity limits for more than 800 hours in any consecutive 12 month period. If the iodine concentration in the coolant exceeds 0.2 uc/gram dose equivalent I-131 for more than 48 continuous hours or is greater than 4.0 uc/gm dose equivalent I-131, the reactor shall be shutdown, and the steam line isolation valves shall be closed within 12 hours.

*That concentration I-131 which alone would produce the same thyroid dose as the quantity and isotopic mixture actually present.

**The following definition will apply to the term significant increase in offgas level.

a) At release rates less than or equal to 75,000 uc/sec, significant increase means an increase of 10,000 uc/sec from the previous corresponding power level steady state release rate within 1 hour.

b) At release rates greater than 75,000 uc/sec, significant increase means an increase of 15% from the previous corresponding power level steady state release rate within 1 hr.

SURVEILLANCE REQUIREMENTS

4.6.B Coolant Chemistry

1. During the equilibrium power operation the sampling frequencies of Table I shall apply. Additional samples shall be taken whenever the reactor coolant concentration exceeds ten percent of the equilibium value in 3.6.B.1 and one or more of the following conditions are met:

a. During startup
b. Following a significant power change***
c. Following a significant increase** in the equilibrium offgas level at the steam air ejector over a 1 hour period.

Additional samples will also be obtained whenever the equilibrium iodine concentration limit of 3.6.B.1 is exceeded.

The additional coolant liquid samples shall be taken and analyzed isotopically for dose equivalent I-131 at 4 hour intervals for 48 hours, or until two successive samples indicate a decreasing trend below the limiting value of 0.2 uc/gm dose equivalent I-131. However, at least 3 consecutive samples shall be taken in all cases.

***For the purpose of this section on sampling frequency a significant power change is defined as a change exceeding 15% of rated power in less than 1 hour.

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
The reactor shall not be made critical unless all of the following conditions are satisifed:	
1. Both off-site sources, both 13 KV startup sources and emergency transformers are available and capable of automatically supplying power to the 4kV emergency buses.	1. Diesel Generators
2. The four diesel generators shall be operable and there shall be a minimum of 104,000 gal. of diesel fuel on site.	a. Each diesel generator shall be manually started and loaded once each month to demonstrate operational readiness. The test shall continue for at least a one-hour period at rated load.
3. The 4kV emergency buses and the 480V emergency load centers are energized.	During the monthly generator test the diesel generator starting air compressor shall be checked for operation and its ability to recharge air receivers. The operation of the diesel fuel oil transfer pumps shall be demonstrated, and the diesel starting time to reach rated voltage and frequency shall be logged.
4. The four unit 125V batteries and their chargers shall be operable.	

LIMITING CONDITIONS FOR OPERATION	SURVEILLANCE REQUIREMENTS

3.9.B Operation with Inoperable Equipment

4.9.B

Whenever the reactor is in Run Mode or Startup Mode with the reactor not in a Cold Condition, the availability of electric power shall be as specified in 3.9.A, except as follows:

1. From and after the date incoming power is not available from both Unit 3 startup transformers, or the Unit 2 startup transformer, or one emergency transformer, continued reactor operation is permissible for seven days. During this period, the four diesel generators and associated emergency buses must be demonstrated to be operable.

2. From and after the date that incoming power is not available from all three startup transformers or both emergency transformers, continued operation is permissible, provided the four diesel generators and associated emergency buses are operable, all core and containment cooling systems are operable and reactor power level is reduced to 25% of the design.

3.9 BASES

The general objective of this Specification is to assure an adequate source of electrical power to operate the auxiliaries during plant operation, to operate facilities to cool and lubricate the plant during shutdown, and to operate the engineered safeguards following the accident. There are four sources of ac electrical energy available; namely, two Unit 3 startup transformers, one Unit 2 startup transformer, and the diesel generators. The dc supply is required for switchgear and engineered safety feature systems. Specification 3.9.A states the required availability of ac and dc power; i.e., active off-site ac source and the required amount of on-site ac and dc sources.

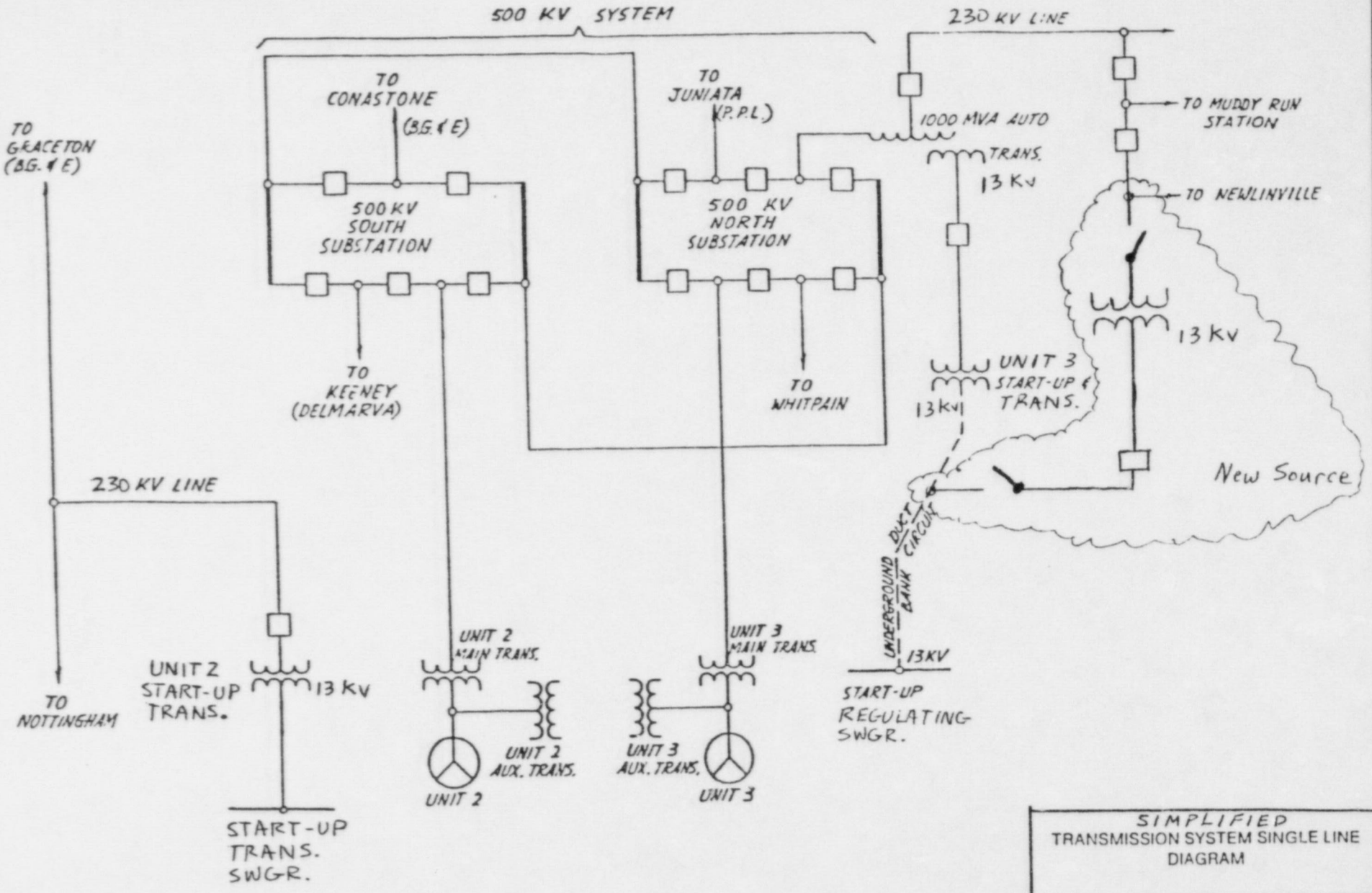
The diesel fuel supply consists of four (4) 35,000 gallon tanks.

Auxiliary power for PBAPS is supplied from three sources; the corresponding unit auxiliary transformer, the Unit 2 startup transformer, and one of the Unit 3 startup transformers. These transformers are sized to carry 100% of the auxiliary load. If one of the startup transformers is lost, the unit can continue to operate since the unit auxiliary transformer is in service, the other startup transformer is available, and the required number of diesel generators is operational.

If all three startup transformers are inoperable, the reactor power level must be reduced to a value whereby the units can safely reject the load and continue to supply auxiliary electric power to the station.

In the normal mode of operation, the Unit 2 startup transformer and one of the Unit 3 startup transformers are energized and four diesel generators are operable. One diesel generator may be allowed out-of-service based on the availability of power from the startup transformer and the fact that three diesel generators carry sufficient engineered safeguards equipment to cover all breaks. With the Unit 2 startup transformer and one diesel generator out-of-service, the off-site transmission line corresponding to the operable startup transformer and emergency transformer must be available. With both Unit 3 startup transformers and one diesel generator out-of-service, the off-site transmission line corresponding to the operable startup transformer and emergency transformer must be available. Upon the loss of one on-site and one off-site power source, power would be available from the other immediate off-site power source and the three operable on-site diesels to carry sufficient engineered safeguards equipment to cover all breaks. In addition to these two power sources, removal of the Isolated Phase Bus "quick" disconnect links would allow backfeed of power through the main transformer to the unit auxiliary transformer and provide power to carry the full station auxiliary load. The time required to perform this operation is comparable to the time the reactor could remain on RCIC operation before controlled depressurization need be initiated.

A battery charger is supplied with each of the 125-Volt batteries.



SIMPLIFIED
TRANSMISSION SYSTEM SINGLE LINE DIAGRAM

FIGURE 1

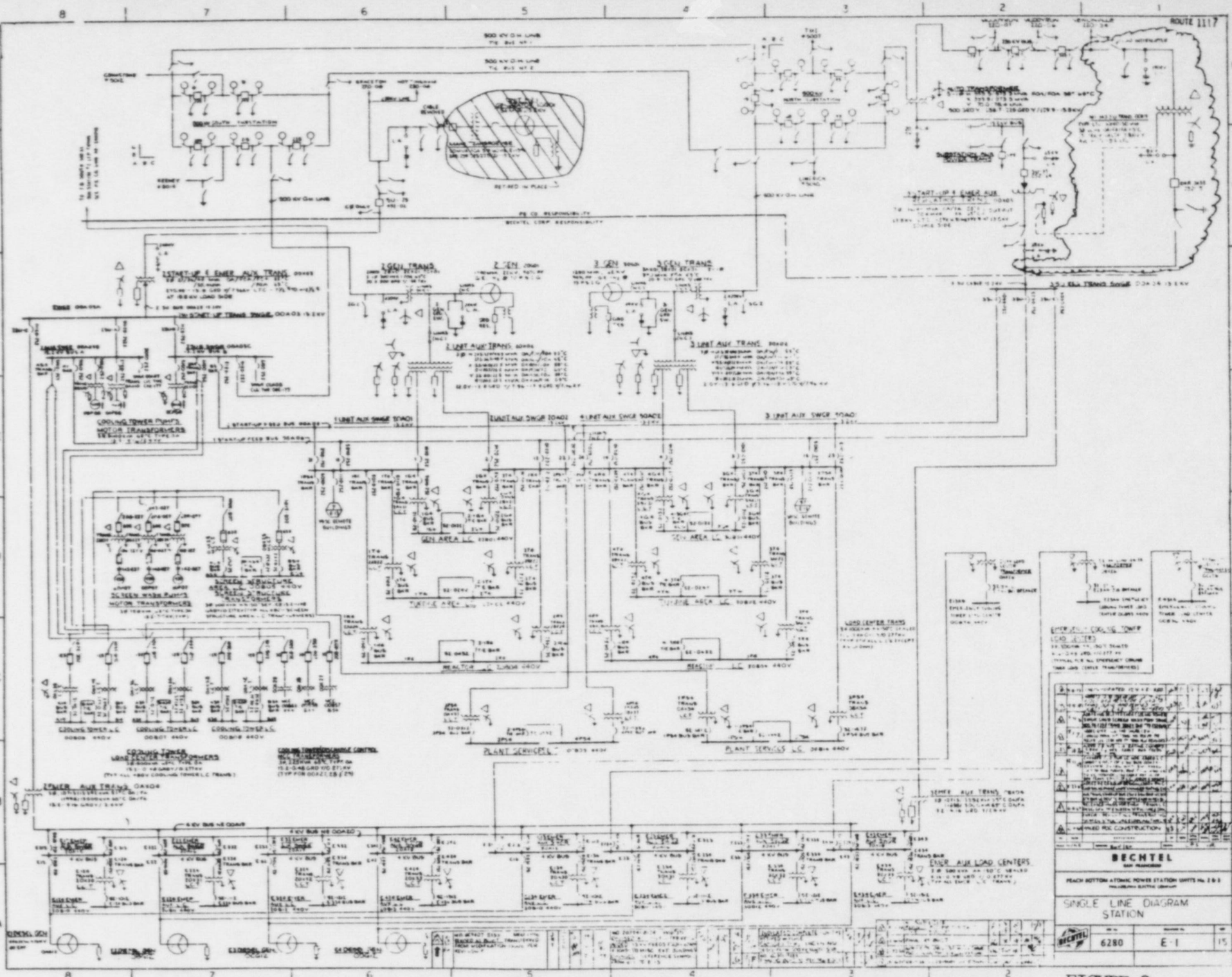


FIGURE 2

Docket Nos. 50-277;50-278

CERTIFICATE OF SERVICE

I hereby certify that copies of the foregoing Application were served on the following by deposit in the United States mail, first-class postage prepaid, on this 20th day of January, 1987.

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