

Attachment No. 2 to AEP:NRC:0591A  
Donald C. Cook Nuclear Plant Unit Nos. 1 and 2  
Proposed Revisions to Unit Nos. 1 and 2  
Technical Specifications

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TABLE 4.3-1

REACTOR TRIP SYSTEM INSTRUMENTATION SURVEILLANCE REQUIREMENTS

| <u>FUNCTIONAL UNIT</u>                           | <u>CHANNEL CHECK</u> | <u>CHANNEL CALIBRATION</u> | <u>CHANNEL FUNCTIONAL TEST</u> | <u>MODES IN WHICH SURVEILLANCE REQUIRED</u> |
|--|----------------------|----------------------------|--------------------------------|---|
| 1. Manual Reactor Trip                           | N.A.                 | N.A.                       | S/U(1)                         | N.A.  |
| 2. Power Range, Neutron Flux                     | S                    | D(2), M(3) and Q(5)        | M                              | 1, 2  |
| 3. Power Range, Neutron Flux, High Positive Rate | N.A.                 | R(6)                       | M                              | 1, 2  |
| 4. Power Range, Neutron Flux, High Negative Rate | N.A.                 | R(6)                       | M                              | 1, 2  |
| 5. Intermediate Range, Neutron Flux              | S                    | R(6)                       | S/U(1)                         | 1, 2 and 3                                  |
| 6. Source Range, Neutron Flux                    | S                    | R(6)                       | M and S/U(1)                   | 2(7), 3(7), 4 and 5                         |
| 7. Overtemperature $\Delta T$                    | S                    | R                          | M                              | 1, 2  |
| 8. Overpower $\Delta T$                          | S                    | R                          | M                              | 1, 2  |
| 9. Pressurizer Pressure--Low                     | S                    | R                          | M                              | 1, 2  |
| 10. Pressurizer Pressure--High                   | S                    | R                          | M                              | 1, 2  |
| 11. Pressurizer Water Level--High                | S                    | R                          | M                              | 1, 2  |
| 12. Loss of Flow - Single Loop                   | S                    | R                          | M                              | 1   |

D. C. COOK-UNIT 1

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Amendment No.

TABLE 4.3-1 (Continued)

NOTATION

- \* - With the reactor trip system breakers closed and the control rod drive system capable of rod withdrawal.
- (1) - If not performed in previous 7 days.
- (2) - Heat balance only, above 15% of RATED THERMAL POWER.
- (3) - Compare incore to excore axial offset above 15% of RATED THERMAL POWER. Recalibrate if absolute difference  $\geq$  3 percent.
- (4) - Manual ESF functional input check every 18 months.
- (5) - Each train tested every other month.
- (6) - Neutron detectors may be excluded from CHANNEL CALIBRATION.
- (7) - Below P-6 (Block of Source Range Reactor Trip) Setpoint.

TABLE 4.3-1

REACTOR TRIP SYSTEM INSTRUMENTATION SURVEILLANCE REQUIREMENTS

| <u>FUNCTIONAL UNIT</u>                           | <u>CHANNEL CHECK</u> | <u>CHANNEL CALIBRATION</u> | <u>CHANNEL FUNCTIONAL TEST</u> | <u>MODES IN WHICH SURVEILLANCE REQUIRED</u> |
|--|----------------------|----------------------------|--------------------------------|---|
| 1. Manual Reactor Trip                           | N.A.                 | N.A.                       | S/U(1)                         | N.A.  |
| 2. Power Range, Neutron Flux                     | S                    | D(2), M(3) and Q(6)        | M                              | 1, 2  |
| 3. Power Range, Neutron Flux, High Positive Rate | N.A.                 | R(6)                       | M                              | 1, 2  |
| 4. Power Range, Neutron Flux, High Negative Rate | N.A.                 | R(6)                       | M                              | 1, 2  |
| 5. Intermediate Range, Neutron Flux              | S                    | R(6)                       | S/U(1)                         | 1, 2 and *                                  |
| 6. Source Range, Neutron Flux                    | S                    | R(6)                       | M and S/U(1)                   | 2(7), 3(7), 4 and 5                         |
| 7. Overtemperature ΔT                            | S                    | R                          | M                              | 1, 2  |
| 8. Overpower ΔT                                  | S                    | R                          | M                              | 1, 2  |
| 9. Pressurizer Pressure--Low                     | S                    | R                          | M                              | 1, 2  |
| 10. Pressurizer Pressure--High                   | S                    | R                          | M                              | 1, 2  |
| 11. Pressurizer Water Level--High                | S                    | R                          | M                              | 1, 2  |
| 12. Loss of Flow - Single Loop                   | S                    | R                          | M                              | 1   |

D. C. COK-UNIT 2

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Amendment No.

TABLE 4.3-1 (Continued)

NOTATION

- \* - With the reactor trip system breakers closed and the control rod drive system capable of rod withdrawal.
- (1) - If not performed in previous 7 days.
- (2) - Heat balance only, above 15% of RATED THERMAL POWER. Adjust channel if absolute difference > 2 percent.
- (3) - Compare incore to excore axial offset above 15% of RATED THERMAL POWER. Recalibrate if absolute difference  $\geq$  3 percent.
- (4) - Manual ESF functional input check every 18 months.
- (5) - Each train tested every other month.
- (6) - Neutron detectors may be excluded from CHANNEL CALIBRATION.
- (7) - Below P-6 (Block of Source Range Reactor Trip) setpoint.

