

NOTICE OF VIOLATION
AND
PROPOSED IMPOSITION OF CIVIL PENALTY

Consumers Power Company
Palisades Nuclear Generating Plant

Docket No. 50-255
License No. DPR-20
EA 89-251

During an NRC inspection conducted on August 14 through December 7, 1989, violations of NRC requirements were identified. In accordance with the "General Statement of Policy and Procedure for NRC Enforcement Actions," 10 CFR Part 2, Appendix C (1989) the Nuclear Regulatory Commission proposes to impose a civil penalty pursuant to Section 234 of the Atomic Energy Act of 1954, as amended (Act), 42 U.S.C. 2282, and 10 CFR 2.205. The particular violations and associated civil penalty are set forth below:

A. 10 CFR 50, Appendix B, Criterion III, requires that measures be established to assure that the design bases are correctly translated into design documents and that the design adequacy is verified and checked.

1. The design basis for Palisades Design Class 1 Pipe Supports, as specified in Paragraph 5.10.1.2 of the Updated Safety Analysis Report, requires that the calculated stresses in structural components be less than 1.1 times the minimum yield stress of the support material for the Safe Shutdown Earthquake (SSE) load case.

Contrary to the above, measures were not adequate for modifications performed in 1987 to assure that the design bases was correctly translated into design documents and that the design adequacy was verified and checked, in that the stresses in the structural components identified as Detail A-A on Class 1 Pipe Supports No. EB1-S2 and No. EB1-S3 were subsequently calculated in October 1989 and found to be in excess of 1.25 times the minimum yield stress of the support material for the SSE load case.

2. ANSI N45.2.11, as committed to in the Palisades Quality Assurance Program, CPC-2A, requires design analyses to be documented in sufficient detail to permit auditing and verification of the adequacy of the results.

Contrary to the above, engineering analyses performed in 1987 for the Palisades Snubber Reduction Program and in 1988 for Specification Change SC-88138 did not provide sufficient documentation to demonstrate the design adequacy. No quantitative justification was provided for the acceptability of the following pipe supports which had load increase:

GC1-H137
JB-14-6"-H197.4
JB-14-6"-H197.5

- B. 10 CFR 50, Appendix B, Criterion V, requires that activities affecting quality be prescribed by documented procedures and be accomplished in accordance with these procedures.

1. Paragraph 18 of the Palisades procedure, "Criteria for Evaluation of Supporting Structures for Safety-Related Piping Systems," Revision 1, January 17, 1980, requires, in part, that the allowable weld stress be based on the properties of the base material at temperature.

Contrary to the above, Calculation PSR No. 20, June 23, 1987, did not consider the base material properties at the operating temperature of 300°F during the review of the adequacy of supports GC1-H137 and GC1-H140 for support load increases.

2. Paragraph 19 of the Palisades procedure, "Criteria for Evaluation of Supporting Structures for Safety-Related Piping Systems," Revision 1, January 17, 1980, requires in part, that a friction force be included in the support evaluation when the relative displacement between contacting surfaces of pipe attachment steel and structural attachment steel is greater than 1/16".

Contrary to the above, Calculation PSR No. 20, June 23, 1987, did not consider the friction force during the review of the adequacy of pipe support GC1-H140 even though the calculated relative displacement exceeded 1/4".

3. Paragraph 20 of the Palisades procedure, "Criteria for Re-analysis of Safety Pipe," Revision 1, November 12, 1979, requires that supports utilizing "U" bolts be modeled as two-way restraints.

Contrary to the above, the U-bolt for Support No. H-9 at Node 525 of Piping Stress Analysis, No. EA-SC-88138-4, Revision 0, August 1, 1988, was incorrectly modeled as a one-way restraint.

- C. 10 CFR 50, Appendix B, Criterion XVI, requires that measures be established to assure that conditions adverse to quality, such as deficiencies and nonconformances are promptly reported and corrected. Also, in the case of significant conditions adverse to quality, the measures shall assure that the cause of the conditions is determined and actions are taken to preclude repetition.

1. Contrary to the above, the calculations performed during the IEB 79-14 project for the main steam piping supports EB1-S2Q, Revision 0, August 20, 1981, EB1-S3Q, Revision 0, August 20, 1981, and Safety Injection Piping Support HC3-R133.1, Revision 2, December 3, 1981, concluded that portions of the pipe support assemblies were not in conformance with the applicable design criteria. The licensee failed to take appropriate corrective action in that the identified

conditions adverse to quality were not promptly corrected or addressed in any manner until 1987.

2. Contrary to the above, on April 23, 1987, the licensee rediscovered the design deficiencies described in C.1 above, for supports EB1-S2Q and EB1-S3Q, as part of the snubber reduction program. The licensee also identified similar design deficiencies for supports EB1-S5Q and EB1-S6Q. The licensee failed to take appropriate corrective action, in that with the unit in an operating status, the licensee: (a) did not determine the safety significance of the deficiencies with respect to the operability of the associated piping system; (b) did not correct the deficiencies until the unit outage in December 1987; (c) did not initiate a corrective action document until questioned by the NRC in October 1989; and (d) did not take any action to preclude repetition until the need was identified by NRC inspectors.

Collectively, these violations have been classified as a Severity Level III problem (Supplement I).

Cumulative Civil Penalty - \$75,000 (assessed equally among the seven violations)

Pursuant to the provisions of 10 CFR 2.201, Consumers Power (Licensee) is hereby required to submit a written statement or explanation to the Director, Office of Enforcement, U.S. Nuclear Regulatory Commission within 30 days of the date of this Notice. This reply should be clearly marked as a "Reply to a Notice of Violation" and should include for each alleged violation:

(1) admission or denial of the alleged violation; (2) the reasons for the violation if admitted; (3) the corrective steps that have been taken and the results achieved; (4) the corrective steps that will be taken to avoid further violations; and (5) the date when full compliance will be achieved. If an adequate reply is not received within the time specified in this Notice, an order may be issued to show cause why the license should not be modified, suspended, or revoked or why such other action as may be proper should not be taken. Consideration may be given to extending the response time for good cause shown. Under the authority of Section 182 of the Act, 42 U.S.C. 2232, this response shall be submitted under oath or affirmation.

Within the same time as provided for the response required above under 10 CFR 2.201, the Licensee may pay the civil penalty by letter addressed to the Director, Office of Enforcement, U.S. Nuclear Regulatory Commission, with a check, draft, or money order payable to the Treasurer of the United States in the amount of the civil penalty proposed above, or may protest imposition of the civil penalty in whole or in part by a written answer addressed to the Director, Office of Enforcement, U.S. Nuclear Regulatory Commission. Should the licensee fail to answer within the time specified, an order imposing the civil penalty will be issued. Should the licensee elect to file an answer in accordance with 10 CFR 2.205 protesting the civil penalty, in whole or in part, such answer should be clearly marked as an "Answer to a Notice of

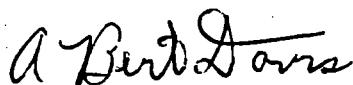
Violation" and may: (1) deny the violation listed in this Notice in whole or in part; (2) demonstrate extenuating circumstances; (3) show error in this Notice; or (4) show other reasons why the penalty should not be imposed. In addition to protesting the civil penalty, such answer may request remission or mitigation of the penalty.

In requesting mitigation of the proposed penalty, the factors addressed in Section V.B of 10 CFR, Part 2, Appendix C, should be addressed. Any written answer in accordance with 10 CFR 2.205 should be set forth separately from the statement or explanation in reply pursuant to 10 CFR 2.201, but may Notice of incorporate parts of the 10 CFR 2.201 reply by specific reference (e.g., citing page and paragraph numbers) to avoid repetition. The attention of the Licensee is directed to the other provisions of 10 CFR 2.205, regarding the procedure for imposing a civil penalty.

Upon failure to pay any civil penalty due which subsequently has been determined in accordance with the applicable provisions of 10 CFR 2.205, this matter may be referred to the Attorney General, and the penalty, unless compromised, remitted, or mitigated, may be collected by civil action pursuant to Section 234c of the Act, 42 U.S.C. 2282c.

The responses to the Director, Office of Enforcement, noted above (Reply to a Notice of Violation, letter with payment of civil penalty, and Answer to a Notice of Violation) should be addressed to: Director, Office of Enforcement, U.S. Nuclear Regulatory Commission, ATTN: Document Control Desk, Washington D.C. 20555, with a copy to the Regional Administrator, Region III, U.S. Nuclear Regulatory Commission, 799 Roosevelt Road, Glen Ellyn, Illinois 60137 and a copy to the NRC Resident Inspector at the Palisades Nuclear Generating Plant.

FOR THE NUCLEAR REGULATORY COMMISSION



A. Bert Davis
Regional Administrator

Dated at Glen Ellyn, Illinois
This 20th day of February 1990