Florida
Power
CORPORATION
Crystal River Unit 3
Docket No. 50-302
Operating License No. DPR-72

November 6, 1998
3F1198-04

U.S. Nuclear Regulatory Commission
Attn: Document Control Desk
Washington, D.C. 20555-0001

Subject: INSERVICE INSPECTION SUMMARY REPORT

References:
1. FPC to NRC Letter 3F0896-12, dated August 15, 1996
2. FPC to NRC Letter 3F0397-12, dated March 13, 1997
3. FPC to NRC Letter 3F0498-03, dated April 16, 1998

Dear Sir:

The purpose of this letter is to submit a summary of the inservice inspections performed at Florida Power Corporation's (FPC) Crystal River Unit 3 (CR-3) since the conclusion of Refueling Outage 10, through the end of the Second Ten-Year Inspection Interval (May 17, 1996 through August 13, 1998.)

In Reference 1, FPC committed to submit a summary report to the NRC by March 15, 1997, to closeout the Second Ten-Year Inspection Interval. However, in September of 1996, CR-3 entered an outage that extended past the end of the inspection interval ending in February 1998. In Reference 2, FPC notified the NRC of the Second Ten-Year Inspection Interval extension to August 13, 1998, and committed to submit a summary report 90 days following the conclusion of the inspection interval.

The attached summary report includes inspections and repair/replacements that occurred May 17, 1996 through August 13, 1998. The report includes: NIS-1 Form, "Owners Report for Inservice Inspections;" a summary and listing of examinations performed on American Society of Mechanical Engineers (ASME) Code Class 1 and 2 pressure retaining components and supports; NIS-2 Forms, "Owners Report of Repair and Replacements;" Code Cases utilized; and Relief Requests granted by the NRC. Two of the Relief Requests granted by the NRC (90-20 and 91-10) were superseded by a later Relief Request, 95-020.

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This summary report concludes the Second Ten-Year Inservice Inspection Interval activities for CR-3. FPC has updated the ISI program for the third Ten-Year Inservice Inspection Interval to meet the requirements of ASME Code, Section XI, 1989 Edition, with no Addenda, as described in Reference 3.

If there are any questions on this summary report, please contact Ms. Sherry Bernhoft, Manager, Nuclear Licensing at (352) 563-4566.

Sincerely,

M. W. Rencheck
Director
Nuclear Engineering and Projects

MWR/pmp

Attachment

xc: Regional Administrator, Region II
Senior Resident Inspector
NRR Project Manager

SECOND TEN-YEAR INSPECTION INTERVAL CLOSEOUT

SUMMARY REPORT

INTRODUCTION:

The following report documents the American Society of Mechanical Engineers (ASME) Section XI Code, Inservice Inspection (ISI) examinations and repairs/replacements performed from the conclusion of Refuel Outage 10 through the end of the Second Ten-Year Inspection Interval (May 17, 1996 through August 13, 1998), which includes the Extended Outage. The Extended Outage was the last outage for the Second Ten-Year Inspection Interval. Examinations performed during this time period satisfy the requirements of ASME Section XI, 1983 Edition, Summer 1983 Addenda. Refueling Outage summary reports for the Second Ten-Year Inspection Interval have been previously submitted and are not summarized in this report.

NRC regulations (10CFR50.55a) require that ISI examinations are performed in accordance with the latest edition and addenda of the ASME Code, Section XI, incorporated by reference, 12 months prior to the start of the 120 month interval. This report contains an abstract of the examination activities conducted during this period. The detailed records of these examinations are on file and available at the plant site for review. ASME Code Cases utilized by the Florida Power Corporation (FPC) during this period are documented within this report and have been approved for use either through inclusion in NRC Regulatory Guide 1.147 or by NRC approved Relief Requests.

The Second Ten-Year Inspection Interval was scheduled to end March 13, 1997. Refuel Outage 10 was expected to be the last outage of the Second Ten-Year Inspection Interval. However, due to an unplanned extended outage, the Second Ten-Year Inspection Interval was extended to August 13, 1998. The interval extension is allowed as described in ASME Code, Section XI 1983 Edition with Summer 1983 Addenda, Article IWA-2400(c) which states, "For power units that are out of service continuously for 6 months or more, the inspection interval during which the outage occurred may be extended for a period equivalent to the outage." The extended outage began September 4, 1996 and ended February 5, 1998. Therefore, the end of the Second Ten-Year Inspection Interval was extended from March 13, 1997 to August 13, 1998.

EXAMINATION ABSTRACT:

Components

One hundred forty-six (146) components were examined during this time period. A summary listing of examinations conducted on ASME Class 1, 2, and 3 components is provided in Table 1 of this report. These examinations were conducted in accordance with the 1983 Edition with the Summer 1983 Addenda of the ASME Code, Section XI. For some code categories, the number of examinations conducted were adjusted as necessary to assure code requirements were satisfied for the closure of the Second Ten-Year Inspection Interval. There were no indications identified during this inspection period that exceeded the acceptance tables of ASME Section XI, 1983 Edition with Summer 1983 Addenda.

Steam Generator Eddy Current Examinations

Eddy current examinations were conducted on 100% of the tubes in both steam generators during the Extended Outage. A summary report for these examinations was previously submitted to the NRC within 90 days of the end of the outage as required in Improved Technical Specification 5.7.2.C.

Snubbers

There were no snubber examinations performed during the time period described by this report.

Component Supports

There were eight (8) component supports examined during the Extended Outage to meet the requirements of ASME Section XI as modified by ASME Code Case N-491, "Alternative Rules for Examination of Class 1, 2, 3 and MC Component Supports of Light Water Cooled Power Plants." A summary listing of these exams is provided in Table 1 of this report.

Pressure Testing

Relief Request 95-020 was issued (approved April 14, 1996) for use of ASME Code Case N-498-1, "Alternative Rules for 10-Year System Hydrostatic Pressure Testing for Class 1, 2, and 3 Systems". This code case incorporates those requirements previously approved and documented in Relief Requests 90-20 and 91-10. As such, Relief Request 95-020 supercedes Relief Requests 90-20 and 91-10. Relief Requests 90-20 and 91-10 are no longer necessary and are hence voided.

There were no system pressure tests conducted to meet the ASME Section XI code requirements during the Extended Outage. Pressure testing for each Repair/Replacement of ASME Class 1 and 2 components is documented on the applicable NIS-2 form attached to this report. A summary listing of these Repairs/Replacements is provided in Table 2 of this report.

Repair and Replacement

There were seven (7) ASME Class 1 and forty-five (45) ASME Class 2 Repairs/Replacements performed since the last summary report. A summary listing of these Repairs/Replacements is provided in Table 2 of this report. Additionally, there are 18 NIS-2 forms for ASME Class 1 and Class 2 Repairs/Replacements that were not previously submitted with the 90 day Summary Report from Refuel Outage 10 (See Table 3). This oversight was discovered as part of the ASME Section XI self-assessment performed by Nuclear Engineering Programs in order to assure proper close out of the Second Ten-Year Inspection Interval.

Augmented Plan Examinations:

The four (4) High Pressure Injection (HPI) nozzles and associated piping up to the first isolation valve were examined by both ultrasonic and radiographic techniques. These examinations were performed in accordance with Babcock & Wilcox Topical Report, "HPI/MU Nozzle Component Cracking." There were no detrimental conditions identified during these examinations.

EXAMINATION SUMMARY:

This section contains a listing of all ASME Section XI Code Cases, NRC approved Relief Requests applicable to the examinations tabulated, and a summary of Non-Destructive Examinations performed during the Extended Outage. Table 1 provides the unique identification numbers for the examinations, the component examined, and the type of examinations performed.

Section XI Code Cases Used

Code Case N-356,	Certification Period for Level III NDE Personnel.
Code Case N-416,	Alternative Rules for Hydrostatic Testing of Repair or Replacement of Class 2 Piping Section XI Division 1.
Code Case N-424,	Qualification of Visual Examination Personnel.
Code Case N-446,	Recertification of Visual Examination Personnel.
Code Case N-460,	Alternative Examination Coverage for Class 1 and 2 Welds.
Code Case N-491,	Alternative Rules for Examination of Class 1, 2, 3, and MC Components Supports of Light Water Cooled Power Plants.
Code Case N-498-1,	Alternative Rules for 10 Year System Hydrostatic Testing for Class 1, 2, and 3 Systems.
Code Case N-509,	Alternative Rules for the selection and Examination of Class 1, 2, and 3 Integrally Welded Attachments.
Code Case N-523,	Mechanical Clamping Devices for Class 2 and 3 Piping.
Code Case N-524,	Alternative Examination Requirements for Longitudinal Welds in Class 1 and 2 Piping.

Relief Requests

88-100 IWA-2300(a)/IWA-2300(a)(1) Recertification of Level III personnel by examination on a triennial basis. Use extended certification period of 5 years as detailed in Code Case N-356.

90-10 Core Flood nozzle Item B1.6 examination category B-F Surface Examination. Relief from performing the surface examination.

90-020 Hydrostatic pressure test and visual examination of specific limited class 2 components. ***VOID*** Superceded by 95-020.

90-050 Volumetric examination of pump casing welds and visual examination of pump casing internal surfaces, IWB-2500-1 Cat. B-L-1, Item B12.10, and Cat. B-L-2, Item B12.20.

90-060 Visual inspection of the Reactor Vessel support skirt, IWF-2500-1 Cat. F-A, Item F1.30.

91-010 Code Case N-498, inservice leak testing in lieu of hydrostatic testing. ***VOID*** Superceded by 95-020.

92-010 Use of OM-4 as an alternative to the sample selection requirements of ASME Section XI, IWF-5400(c), Snubbers That Fail Inservice Tests.

93-030 Volumetric or surface examination performed on any 6 CRDM'S removed for maintenance or cleaning in lieu of 10% of the peripheral drives.

95-010 Alternate examination requirements for the core flood nozzle surface examinations. See also RR-90-10.

95-020 Use of ASME Code Case N-498-1. Alternati·· Rules for 10 Year System Hydrostatic Testing for Class 1, 2, and 3 Systems.

95-030 Relief from examination of the Reactor Vessel lower head to transition piece weld, ISI inspection number B1.2.2.

95-040 Relief to use flat ultrasonic calibration blocks in lieu of curved blocks.

95-055 Relief to use ASME Code Case N-523 for temporary repair to the Emergency Feedwater (EF) System.

96-001-II Request to use ASME Code Case N-524, Alternative Examination Requirements for Longitudinal Welds in Class 1 and 2 Piping.

97-001-II Request to use ASME Code Case N-509, Alternative Rules for the selection and Examination of Class 1, 2, and 3 Integrally Welded Attachments.

98-001-RR GL90-05 Evaluation of through wall flaw in Raw Water System.