

POLICY ISSUE NOTATION VOTE

April 26, 2001

SECY-01-0074

FOR: The Commissioners

FROM: William Travers
Executive Director for Operations

SUBJECT: APPROVAL TO PUBLISH GENERIC LICENSE RENEWAL GUIDANCE
DOCUMENTS

PURPOSE:

To obtain the Commission's approval to publish Regulatory Guide (RG) 1.188 "Standard Format and Content for Applications to Renew Nuclear Power Plant Operating Licenses" (Attachment 1), and NUREG-1800 "Standard Review Plan for the Review of License Renewal Applications for Nuclear Power Plants" (SRP-LR) (Attachment 2) for implementation. The RG and SRP-LR are based on the supporting guidance provided in NUREG-1801, the "Generic Aging Lessons Learned (GALL) Report" (Attachment 3), and the explanation of the staff's response to public comments in the accompanying NUREG-1739 "Analysis of Public Comments on the Improved License Renewal Guidance Documents" (Attachment 4).

BACKGROUND:

By a memorandum dated March 24, 1999, the staff informed the Commission about the issue of crediting existing programs for license renewal. Subsequently, in SECY 99-148 the staff discussed this issue at length and presented three options for addressing it. Option 1, proposed by the Nuclear Energy Institute (NEI), was to not review the adequacy of existing programs. The staff proposed two options. Option 2 was to amend the license renewal rule to exclude structures and components subject to existing programs. Option 3 was to focus staff review guidance in the standard review plan on areas where existing programs should be augmented. In a staff requirements memorandum (SRM) dated August 28, 1999, the Commission approved Option 3 and directed the staff to focus the review guidance in the standard review plan on areas where existing programs should be augmented, as described in SECY 99-148, to provide credit for existing programs for license renewal. In approving Option 3, the Commission specifically directed the staff to:

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- Ensure that the GALL report received the benefit of the experience of the staff members who conducted the review of the initial license renewal applications.
- Ensure that lessons learned from the initial license renewal application reviews were incorporated into the GALL report and SRP-LR.
- Ensure that the regulatory guidance was clear and understandable to stakeholders so that the license renewal process would be stable and predictable for future applicants.
- Issue the draft GALL report and SRP-LR to solicit public comments.
- Seek stakeholder participation in the development of the draft GALL report and SRP-LR through activities such as workshops.
- Hold public meetings with stakeholders to resolve comments on individual issues.
- Brief the Commission after the public comment period and the staff's initial evaluation of the comments.
- Provide a recommendation to the Commission on whether it would be appropriate to resolve generic technical issues by rulemaking.

The staff has carried out Option 3 with the exception of the last item, which the staff will provide later in 2001.

In developing the GALL report and the SRP-LR, Office of Nuclear Reactor Regulation staff involved with the initial license renewal application reviews, Office of Nuclear Regulatory Research staff, and the Argonne and Brookhaven National Laboratories, have worked to make sure that the aging management programs relied upon to manage aging for license renewal reflect current industry practices. The staff has incorporated applicable lessons learned from the first four license renewal application reviews. The staff has also improved these documents as a result of incorporating comments received from stakeholders in response to a *Federal Register* notice soliciting comments (described below). As a result, these documents now reflect the staff's and stakeholders's experience with four of the license renewal reviews completed or currently under review (three pressurized water reactor reviews and one boiling water reactor review). As the staff develops more experience in subsequent reviews, it expects to periodically update these documents. For future revisions to these documents the staff would follow the normal approval process for issuance of such guidance (NRC Management Directive 3.7 and applicable office instructions) and will inform the Commission. If the need arises between updates to immediately notify license renewal applicants of relevant changes, the staff will use an interim information dissemination mechanism such as a Regulatory Information Summary. In developing the GALL report and the SRP-LR, the staff also considered the information in the five technical reports provided by the Union of Concerned Scientists (UCS) in a May 5, 2000, letter.

RG 1.188 (formerly DG-1104) was developed to provide applicants with guidance on information to be included as part of an application for license renewal. The RG endorsed NEI's guidance document NEI 95-10, Revision 3, "Industry Guidance for Implementing the Requirements of 10 CFR Part 54 – The License Renewal Rule," because it provides methods that are acceptable to the NRC staff for complying with the requirements of 10 CFR Part 54 for preparing a license renewal application. To complete the endorsement of NEI 95-10 by RG 1.188, the staff met with

NEI in February 2001 to discuss several changes to NEI 95-10, Revision 2. The staff requested the changes to make it consistent with the SRP-LR and the GALL report. Subsequently, NEI revised NEI 95-10 and submitted Revision 3 to the NRC by letter dated April 16, 2001. The staff has reviewed NEI 95-10, Revision 3, and has endorsed it in RG 1.188 without exceptions.

On December 6, 1999, the staff held a public workshop to invite the public to participate in the early development of license renewal guidance documents and to specifically gather feedback on which existing plant programs needed to be augmented for license renewal and which programs could adequately manage aging effects without being changed. The staff made an early draft of the GALL report available at the public workshop. Following the workshop, NEI submitted a significant number of comments that were discussed in subsequent public meetings. The UCS also submitted five technical reports following the workshop for NRC's consideration in preparing the draft GALL report. As a result of comments received and meetings with stakeholders, the staff revised and improved the draft GALL report, the SRP-LR, and DG-1104.

DISCUSSION:

In the August 31, 2000, *Federal Register* notice (65 FR 53047), the staff noticed the issuance of the draft GALL report, SRP-LR, and DG-1104 for public comment. These documents were made available in the Agency's document management system, ADAMS, and on the NRC's external web site to give stakeholders easier access to them. To facilitate gathering public comments on these draft documents and bring stakeholders up to date on the staff's efforts, the *Federal Register* notice also informed stakeholders that a public workshop was planned for September 25, 2000. Over 1000 comments were received from the September 25 workshop and in letters and emails sent to the NRC. Approximately two-thirds of the comments were submitted by NEI and one-third by private citizens, law firms, public interest groups, and utilities. The staff also provided copies of these documents to the Commission as requested in the August 27, 1999, SRM.

The staff has evaluated these stakeholder comments and has made changes, as appropriate, to the GALL report, the SRP-LR, and RG 1.188 to make them clear and understandable to stakeholders and to explain the staff's reasoning for its conclusions. In evaluating stakeholder comments, the staff has held public meetings with stakeholders to ensure that issues and comments were clearly understood and the basis for the staff's evaluation of an issue was clearly communicated. The staff's evaluation of stakeholder comments is documented in NUREG-1739. In addition, senior NRC managers who serve on the License Renewal Steering Committee have monitored the staff's efforts to resolve comments made by stakeholders.

On December 4, 2000, following the public comment period the staff briefed the Commission on its initial evaluation of the public comments. NEI and UCS also made presentations to the Commission at the briefing. Although NEI had not seen the results of the staff's disposition of the public comments, NEI said that there are certain areas where it believed the GALL report was establishing unjustified requirements for aging management programs and it disagreed with the staff regarding a few of the details in the license renewal guidance documents.

Following the Commission meeting, the staff devoted significant resources to communicating with NEI to address potential issues. The staff held a public meeting in December 2000 to define the

scope of the issues. In addition to discussing issues raised by NEI, the staff told the meeting participants the general nature of changes made to the guidance documents in response to the public comments. As a result of the meeting, NEI indicated which issues it wished to further discuss with management. In January 2001, the staff held three public meetings to discuss these issues. Most of the issues were addressed through these meetings and dialogue is continuing on remaining issues as described below.

The staff believes that all of the public comments have been adequately addressed. The most significant comment was the general concern about whether the public had an adequate opportunity to comment on the guidance, as described by the UCS, the Nuclear Information Resource Service (NIRS), and the Citizens Awareness Network (CAN). To address the general concern, as the staff has worked to finalize these license renewal guidance documents, the staff invited the public to participate in the meetings with industry. Specifically, the staff sent UCS and NIRS copies of meeting notices. In addition, the staff ensured that the resolution of comments was made publically available in meeting summaries. The staff also offered to meet with and requested comments from UCS, NIRS, and CAN to give them ample opportunity to offer comments after the formal comment period was over. To date, these stakeholders have not responded to the request. The staff will continue to ensure that the interested public have adequate opportunities to participate in future license renewal process improvements.

All comments from the industry have been resolved with the exception of six issues. The industry has agreed that the improved guidance should be approved at this time because it proposes to conduct a demonstration project to further improve the use of referencing to achieve efficiency, and because the staff has agreed to continue a dialog on the following five issues: (1) cracking of small-bore piping, (2) the degradation of bolting, (3) the role of monitoring loose parts in detecting loose bolts in reactor vessel internals, (4) the inspection and flow testing of fire protection piping, and (5) consideration of individual plant evaluation of external events (IPEEE) information in determining structures and components within the scope of license renewal. The staff and NEI agreed to have additional public meetings to exchange information on these five issues. Although significant progress has been made on clarifying how an applicant is to use the GALL report (the sixth industry issue) the demonstration project that NEI is sponsoring with several utilities will help resolve the remaining implementation details. The demonstration project is to be conducted by several future license renewal applicants. They will prepare sections of an application focusing on a few selected systems at their plants; for some selected systems, their aging management program will meet a GALL program; for others, the aging management program will be very similar to a GALL program; and for yet others, the program will be very different from the GALL program. The staff supports NEI's proposal and agrees that the demonstration project will help iron out implementation details. It will also provide near-term feedback to the staff on what efficiencies it can expect to achieve through the use of the GALL report. According to the preliminary schedule for the demonstration, utilities will submit sample sections of license renewal applications to the NRC in late April 2001. The staff and NEI would then interact over the next few months to support incorporating lessons learned into NEI 95-10 around August 2001.

It is the staff's expectation that future license renewal applicants will realize resource savings in preparing their applications if they choose to use the GALL report and RG 1.188. Applying the GALL report will reduce the need to review plant-specific aging management programs. If applicants follow the guidance in RG 1.188, the format and content of their application will be similar to previous applications which provides for efficiencies for both parties because it provides a standard format and content for a license renewal application which will provide

efficiencies for the applicant in preparing and the staff reviewing an application. In addition, when applicants state that their aging management programs are bounded by the GALL programs, the staff's review will shift from reviewing each program in detail to verifying the applicant's assertion. This will significantly reduce staff review resources and increase the efficiency of the review. The staff believes that the improved license renewal guidance documents will increase the stability and predictability of the license renewal review process because they describe the framework for a disciplined process that clearly articulates the evaluation criteria. They also provide a clear and sound technical basis to support the staff's conclusion that (1) actions have been identified and have been or will be taken with respect to managing the effects of aging during the period of extended operation for structures, systems, and components within the scope of the license renewal rule, (2) and that actions have been identified and have been or will be taken with respect to time-limited aging analysis that are required to be reviewed in accordance with the license renewal rule. These documents should also increase public confidence in the license renewal review process because the public was involved in developing them, and the public's comments were considered and incorporated, and because the documents will make the staff's license renewal reviews more predictable.

RESOURCES:

The staff presently has budgeted adequate resources for license renewal application reviews (which includes the anticipated efficiencies from the GALL report, SRP-LR, and RG 1.188) and adequate resources to finish issuing these documents. The staff is evaluating the need for additional resources to support the demonstration project and to continue dialog with the industry on improving the guidance documents. Additional resources will be reprogrammed in accordance with the Office of Nuclear Reactor Regulation's implementation of planning, budgeting, and performance monitoring practices, if necessary.

COORDINATION:

The Office of the General Counsel has reviewed this paper and has no legal objection. The Office of the Chief Financial Officer has reviewed this paper for resource implications and has no objections.

RECOMMENDATION:

That the Commission:

1. Approve publication of RG 1.188 and NUREG-1800.
2. Note:
 - a. The *Federal Register* notice for informing stakeholders of the availability of these documents and the documents supporting them is attached (Attachment 5).

- b. The Advisory Committee on Reactor Safeguards (ACRS) has been provided copies of these documents and was briefed on them by the staff on March 27, 2001, and April 5, 2001. The ACRS intends to issue its recommendation on these documents to the Commission.
- c. Letters have been prepared to inform the appropriate Congressional members to be responsive to commitments previously made to the House Appropriation Committee staff by the Chief Financial Officer to respond to the Conference Report for the Fiscal Year 2000 Appropriations Bill.
- d. The Office of Public Affairs has prepared a press release to announce the publication of these documents.

/RA/

William Travers
Executive Director
for Operations

Attachments:

- 1. RG 1.188
- 2. NUREG-1800
- 3. NUREG-1801
- 4. NUREG-1739
- 5. *Federal Register* Notice



U.S. NUCLEAR REGULATORY COMMISSION

April 2001

REGULATORY GUIDE

OFFICE OF NUCLEAR REGULATORY RESEARCH

PREPUBLICATION

REGULATORY GUIDE 1.188

(Drafts were DG-1104, DG-1047, and DG-1009)

STANDARD FORMAT AND CONTENT FOR APPLICATIONS TO RENEW NUCLEAR POWER PLANT OPERATING LICENSES

A. INTRODUCTION

GENERAL

The issuance of renewed operating licenses for nuclear power plants is governed by Title 10 of the Code of Federal Regulations (10 CFR) in Part 54, "Requirements for Renewal of Operating Licenses for Nuclear Power Plants" (the license renewal rule), which specifies the information to be included as part of an application for license renewal. This information is to be included in the application to renew an operating license submitted by a nuclear power plant licensee. The application should include (1) general information, (2) the integrated plant assessment, (3) an evaluation of time-limited aging analyses, (4) a final safety analysis report (FSAR) supplement, (5) technical specification changes, and (6) an environmental report supplement. The FSAR supplement should provide a summary description of the programs and activities for managing the effects of aging for the period of extended operation, which is determined by the integrated plant assessment and an evaluation of time-limited aging analyses.

Regulatory guides are issued to describe and make available to the public such information as methods acceptable to the NRC staff for implementing specific parts of the NRC's regulations, techniques used by the staff in evaluating specific problems or postulated accidents, and data needed by the NRC staff in its review of applications for permits and licenses. Regulatory guides are not substitutes for regulations, and compliance with them is not required. Methods and solutions different from those set out in the guides will be acceptable if they provide a basis for the findings requisite to the issuance or continuance of a permit or license by the Commission.

This guide was issued after consideration of comments received from the public. Comments and suggestions for improvements in these guides are encouraged at all times, and guides will be revised, as appropriate, to accommodate comments and to reflect new information or experience. Written comments may be submitted to the Rules and Directives Branch, ADM, U.S. Nuclear Regulatory Commission, Washington, DC 20555-0001.

Regulatory guides are issued in ten broad divisions: 1, Power Reactors; 2, Research and Test Reactors; 3, Fuels and Materials Facilities; 4, Environmental and Siting; 5, Materials and Plant Protection; 6, Products; 7, Transportation; 8, Occupational Health; 9, Antitrust and Financial Review; and 10, General.

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The following general provisions, with the corresponding regulations, apply to filing an application for a renewed license.

- ! The application must be filed in accordance with Subpart A of 10 CFR Part 2, 10 CFR 50.4, and 10 CFR 50.30. [10 CFR 54.17(a)]
- ! The application may not be submitted to the Commission earlier than 20 years before the expiration of the operating license currently in effect. [10 CFR 54.17(c)]
- ! For the timely renewal provisions of 10 CFR 2.109(b) to apply, a sufficient application must be filed at least 5 years prior to the expiration of the existing license. [10 CFR 2.109(b)]
- ! The application for a renewed license may be combined with applications for other types of licenses. [10 CFR 54.17(d)]
- ! The application may incorporate by reference information contained in previous applications for licenses or license amendments, statements, correspondence, or reports filed with the Commission, provided that the references are clear and specific. [10 CFR 54.17(e)]

The requirements for filing a license renewal application are specified in 10 CFR 54.17. An application may be submitted to the NRC in electronic or paper format, as described in Regulatory Issue Summary (RIS) 2001-05, "Guidance on Submitting Documents to the NRC by Electronic Information Exchange or on CD-Rom."¹ The RIS provides guidance on acceptable electronic formats for electronic submittals and references an NRC web site for further details at <<http://www.nrc.gov/NRC/EIE/index.html>>. This regulatory guide applies to license renewal applications or portions thereof.

The information collections contained in this regulatory guide are covered by the requirements of 10 CFR Part 54, which were approved by the Office of Management and Budget, approval number 3150-0155. If a means used to impose an information collection does not display a currently valid OMB control number, the NRC may not conduct or sponsor, and a person is not required to respond to, the information collection.

B. DISCUSSION

The purpose of this guide is to provide guidance on the information to be submitted in an application for renewal of a nuclear power plant operating license in a uniform format that is acceptable to the NRC staff for structuring and presenting this information. Conformance with this guide is not required, but its use facilitates both preparation of a license renewal application by a licensee and timely, uniform review by the NRC staff. A different format will be acceptable to the NRC staff if it provides an adequate basis for approval of the application for license renewal.

Drafts of this guide were issued for public comment as DG-1104 in August 2000, DG-1047 in August 1996, and DG-1009 in December 1990. This guide incorporates lessons learned from the review of license renewal applications and Owners Group topical report reviews. The guide also incorporates relevant information from the development of the "Standard Review Plan for the

¹ Regulatory Issue Summaries are available on the NRC's web site at WWW.NRC.GOV in the Reference Library.

Review of License Renewal Applications for Nuclear Power Plants” (SRP-LR) (NUREG-1800),² and “Generic Aging Lessons Learned (GALL) Report” (NUREG-1801),² as well as from public comments received on these documents (these public comments are summarized in NUREG-1739, “Analysis of Public Comments on the Improved License Renewal Guidance Documents.”²

The Nuclear Energy Institute (NEI) has developed NEI 95-10, "Industry Guideline for Implementing the Requirements of 10 CFR Part 54 - The License Renewal Rule," Revision 3 (March 2000),³ regarding implementation of the license renewal rule. The NRC staff has reviewed this document and found that it provides guidance acceptable to the staff. Licensees may use methods other than those provided in NEI 95-10 to meet the intent of the license renewal rule, but the NRC staff will determine the acceptability of other methods on a case-by-case basis.

Additional information for preparing a license renewal application is provided in the Standard Review Plan for License Renewal (NUREG-1800).²

This guide provides guidance on applications for renewal of operating licenses for commercial nuclear power plants and is expected to ensure that actions have been identified and have been taken or will be taken with respect to (1) managing the effects of aging during the extended period of operation on the functionality of structures and components that have been identified to require review and (2) evaluating time-limited aging analyses that have been identified to require review, such that there is reasonable assurance that the activities authorized by the renewed license will continue to be conducted in accordance with the current licensing basis (CLB).

C. REGULATORY POSITION

1. CONTENTS OF AN APPLICATION

The requirements that an applicant must meet for renewal of a nuclear power plant operating license are delineated in 10 CFR Part 54, "Requirements for Renewal of Operating Licenses for Nuclear Power Plants." This rule establishes the procedures, criteria, and standards governing renewal of an operating license. Figure 1 provides a summary of the contents of a license renewal application.

² Copies are available at current rates from the U.S. Government Printing Office, P.O. Box 37082, Washington, DC 20402-9328 (telephone (202)512-1800); or from the National Technical Information Service by writing NTIS at 5285 Port Royal Road, Springfield, VA 22161; (telephone (703)487-4650; <<http://www.ntis.gov/ordernow>>. Copies are available for inspection or copying for a fee from the NRC Public Document Room at 11555 Rockville Pike, Rockville, MD; the PDR's mailing address is USNRC PDR, Washington, DC 20555; telephone (301)415-4737 or (800)397-4209; fax (301)415-3548; email is PDR@NRC.GOV. Electronic copies of these documents are available on the NRC home page at <WWW.NRC.GOV> in the Reference Library. Copies are also available at <WWW.NRC.GOV/NRC/REACTOR/LR/IRG/index.html>, which is the NRC's license renewal web site. Electronic copies are also available through NRC's Electronic Reading Room at the same web site; accession numbers are listed at the end of this guide.

³ Copies are available for inspection or copying for a fee from the NRC Public Document Room at 11555 Rockville Pike, Rockville, MD; the PDR's mailing address is USNRC PDR, Washington, DC 20555; telephone (301)415-4737 or (800)397-4209; fax (301)415-3548; email is PDR@NRC.GOV. Electronic copies are also available at the NRC's license renewal web site, <WWW.NRC.GOV/NRC/REACTOR/LR/IRG/index.html>. Electronic copies are also available through NRC's Electronic Reading Room at the same web site; the accession number is listed at the end of this guide.

The information developed and submitted or retained by an applicant for license renewal should permit the NRC staff to make the determination that the requirements of 10 CFR Part 54 have been met. The format in which this information is presented should provide for optimum use of the applicant's resources and should facilitate the NRC staff review of the license renewal application. An application will consist of general information concerning the applicant and the plant, technical information referenced or contained in the integrated plant assessment (IPA) and the evaluation of time-limited aging analyses (TLAAs), a supplement to the Final Safety Analysis Report (FSAR), technical specification changes and their justification, and a supplement to the environmental report.

The technical information submitted should focus on reviews of aging management, TLAAs, and the activities necessary to ensure that the CLB for the plant will be maintained for the period of extended operation. The technical content of a license renewal application should be sufficient to allow an NRC reviewer to understand (1) the methodologies used to determine the structures and components subject to an aging management review and (2) the actions taken or to be taken to manage the effects of aging during the period of extended operation. The NRC staff will review these areas to (1) determine whether the methodology is acceptable and whether the resultant lists of systems, structures, or components and TLAAs are comprehensive, (2) assess the effectiveness of actions taken or to be taken to manage aging during the period of extended operation, and (3) determine that TLAAs will remain valid for the period of extended operation or have been acceptably resolved or dispositioned for the purposes of license renewal.

The FSAR supplement should contain a summary description of programs and activities for managing the effects of aging and the evaluation of TLAAs. The regulatory controls associated with placing a summary description of these activities and evaluations into the FSAR, along with the existing regulatory process, should ensure that future changes to programs that could decrease the overall effectiveness of aging management activities and the evaluation of TLAAs will receive appropriate review by the licensee.

The general information required by 10 CFR 54.17 and 54.19 is to be incorporated into the application. Any conforming changes to the indemnity agreement to account for the expiration term of the proposed renewed license [10 CFR 54.19(b)] and restricted data agreements [10 CFR 54.17(f) and (g)] should be included in the application. The technical information required by 10 CFR 54.21 and 54.22 should be contained or referenced in the integrated plant assessment, the evaluation of time-limited aging analyses, or the supplement to the current FSAR.

Technical specification changes or additions that are necessary to manage the effects of aging during the period of extended operation should be included or referenced in the license renewal application. The applicant should identify technical specification changes or additions when additional regulatory control is warranted to ensure that the effects of aging will be managed such that the necessary quality of systems, structures, and components is maintained, that facility operation is within safety limits, and that limiting conditions for operation will continue to be met. Justification for the changes or additions should be included in the application and the justifications must comply with the requirements of 10 CFR Part 50. The NRC staff may also include conditions or limitations on the renewed license in accordance with 10 CFR 54.33(b) when the NRC staff determines that the additional regulatory control is warranted to ensure that the effects of aging will be adequately managed.

Environmental information should be provided in a supplement to the environmental report that complies with the requirements of Subpart A of 10 CFR Part 51 as required by 10 CFR 54.23. Guidance on the format and content of the environmental report is in Supplement 1 to Regulatory Guide 4.2, "Preparation of Supplemental Environmental Reports for Applications To Renew Nuclear Power Plant Operating Licenses" (September 2000).⁴

2. ENDORSEMENT OF NEI GUIDELINE

The Nuclear Energy Institute's NEI 95-10, "Industry Guideline for Implementing the Requirements of 10 CFR Part 54 - The License Renewal Rule," Revision 3 (March 2001),² provides methods that are acceptable to the NRC staff for complying with the requirements of 10 CFR Part 54 for preparing a license renewal application.

3. FORMATTING SPECIFICATIONS

The filing requirements for a license renewal application are specified in 10 CFR 54.17. The application may be submitted to the NRC in electronic or paper format, as described in Regulatory Issue Summary (RIS) 2001-05, "Guidance on Submitting Documents to the NRC by Electronic Information Exchange or on CD-Rom."¹ This guide applies to license renewal applications or portions thereof.

3.1 Graphical Presentations

Graphical presentations such as drawings, maps, diagrams, sketches, and tables should be employed if the information may be presented more adequately or conveniently by such means. Due concern should be taken to ensure that all information so presented is legible, that symbols are defined, that no essential information is lost when colored drawings are printed in black on white paper, and that scales are not reduced to the extent that visual aids are necessary to interpret pertinent items of information. These graphical presentations should be located in the section where they are primarily discussed. References used may appear either as footnotes to the page where discussed or at the end of each chapter.

3.2 Physical Specifications

Paper Size

1. Text pages: 8-1/2 x 11 inches.
2. Drawings and graphics: 8-1/2 x 11 inches; however, a larger size is acceptable provided that the finished copy when folded does not exceed 8-1/2 x 11 inches.

⁴ Single copies of regulatory guides, both active and draft, and draft NUREG documents may be obtained free of charge by fax to (301)415-2289, or by email to <DISTRIBUTION@NRC.GOV>. Active guides may also be purchased from the National Technical Information Service on a standing order basis. Details on this service may be obtained by writing NTIS, 5285 Port Royal Road, Springfield, VA 22161; telephone (703)487-4650; online <<http://www.ntis.gov/ordernow>>. Copies of certain guides and many other NRC documents are available electronically at <WWW.NRC.GOV> in the Reference Library. Documents are also available through the Electronic Reading Room (NRC's ADAMS document system, or PARS) at the same web site.

Paper Stock and Ink. Suitable quality in substance, paper color, and ink density for handling and reproduction by microfilming or image-copying equipment.

Paper Margins. A margin of no less than 1 inch should be maintained on the top, bottom, and binding side of all pages submitted.

Printing.

1. Composition -- Text pages should be single spaced.
2. Type face and style -- Should be suitable for microfilming or image-copying equipment.
3. Reproduction -- May be mechanically or photographically reproduced. All pages of text should be printed on both sides and the image printed head-to-head.

Binding. Pages should be punched for standard 3-hole loose leaf binders.

Page Numbering. Pages should be numbered with the two digits corresponding to the chapter followed by a hyphen and a sequential number (e.g., the third page of Section 4.1 of Chapter 4 should be numbered 4.1-3). Do not number the entire report sequentially.

Table of Contents. A table of contents and index of key items should be provided for the renewal application.

3.3 Procedure for Updating or Revising Pages

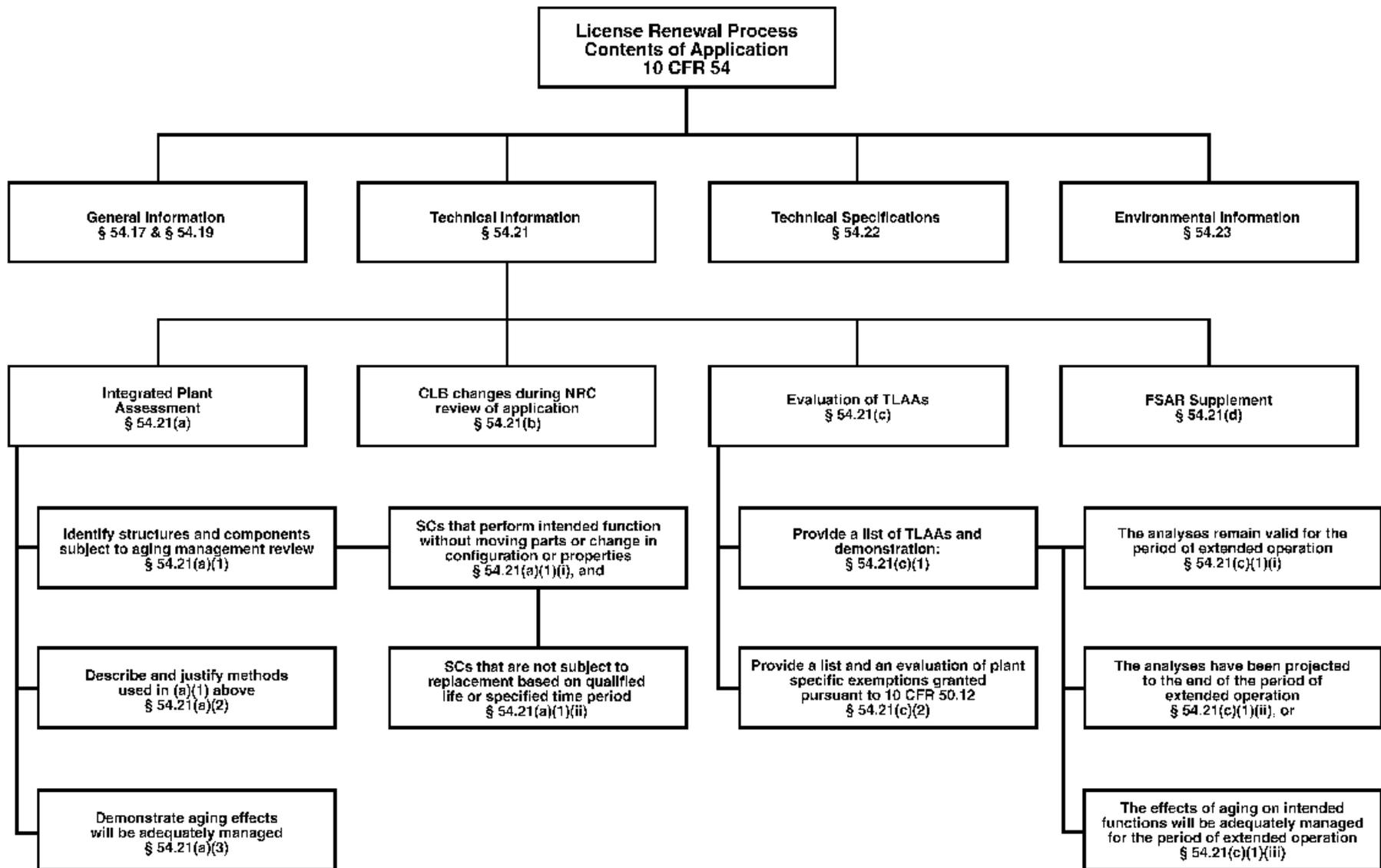
The text should be revised by replacing pages. The changed or revised portion of each page should be highlighted by a "change indicator" mark consisting of a bold vertical line drawn in the margin opposite the binding margin. The line should be of the same length as the portion changed.

All pages submitted to update, revise, or add pages to the report should show the date of the change and the change or amendment number. A guide page listing the pages to be inserted and the pages to be removed should accompany the revised pages. When major changes or additions are made, a revised table of contents should be provided.

D. IMPLEMENTATION

The purpose of this section is to provide information to applicants regarding the NRC staff's plans for using this regulatory guide.

Except in those cases in which an applicant proposes an acceptable alternative method for complying with specified portions of the NRC's regulations, the methods described in this guide that reflects public comments will be used in the evaluation of applications to renew nuclear power plant operating licenses.



CLB: Current licensing basis
 SSC: Systems, structures, and components
 FSAR: Final safety analysis report
 TLAA: Time-limited aging analysis
 SC: Structures and components

Figure 1. Contents of Application

REGULATORY ANALYSIS

A separate regulatory analysis was not prepared for this regulatory guide. The regulatory analysis prepared for the final license renewal rule provides the regulatory basis for this guide and examines the costs and benefits of implementing the rule. A copy of the regulatory analysis, "Nuclear Power Plant License Renewal - 10 CFR Part 54," February 1995, is available for inspection and copying for a fee at the NRC's Public Document Room, located at 11555 Rockville Pike, Rockville, MD.

BACKFIT ANALYSIS

This regulatory guide proposes NRC staff guidance on complying with the final license renewal rule, 10 CFR Part 54, effective June 7, 1995. Accordingly, publication of this regulatory guide is not a backfit under 10 CFR 50.109, and no backfit analysis is necessary or has been prepared for this regulatory guide.

Accession Numbers for:
Regulatory Guide 1.188
SRP-LR -
GALL Report -
NEI 95-10, Rev. 3
NUREG-1739 -
Regulatory Issue Summary 2001-05 - ML003768343

SECY 01-0074

Attachment 2

NUREG-1800 - “Standard Review Plan for Review of License Renewal Applications for Nuclear Power Plants”

Can be viewed at
ADAMS Accession # ML011090011

SECY 01-0074

Attachment 3

NUREG-1801 - “Generic Aging Lessons Learned (GALL) Report”

Can be viewed at
ADAMS Accession # ML011080726

SECY 01-0074

Attachment 4

NUREG-1739 - “Analysis of Public Comments on the Improved License Renewal Guidance Documents”

Can be viewed at
ADAMS Accession # ML011080600

NUCLEAR REGULATORY COMMISSION

Issuance, Availability of Regulatory Guide, Standard Review Plan, and
Generic Aging Lessons Learned (GALL) Report

AGENCY: Nuclear Regulatory Commission.

ACTION: Notice of Availability.

SUMMARY: The Nuclear Regulatory Commission (NRC) is issuing Regulatory Guide 1.188, "Standard Format and Content for Applications to Renew Nuclear Power Plant Operating Licenses"; NUREG-1800, "Standard Review Plan for the Review of License Renewal Applications for Nuclear Power Plants" (SRP-LR); and NUREG-1801, "Generic Aging Lessons Learned (GALL) Report." These documents describe methods acceptable to the NRC staff for implementing the license renewal rule, as well as techniques used by the NRC staff in evaluating applications for license renewals. The draft versions of these documents were issued for public comments on August 31, 2000 (64FR53047). The staff assessment of public comments is being issued as NUREG-1739, "Analysis of Public Comments on the Improved License Renewal Guidance Documents."

ADDRESSES: Electronic copies of all the documents in this paragraph are available on NRC's License Renewal web site, at <<http://www.nrc.gov/NRC/REACTOR/LR/IRG/index.html>>. Electronic copies are also available in NRC's Electronic Reading Room accessible from the NRC Web site <<http://www.nrc.gov>>. Regulatory Guide 1.188 is under ADAMS Accession Number ML011070105, NUREG-1800 (SRP-LR) is under ADAMS Accession number ML01109011, NUREG-1801 the GALL Report is under ADAMS Accession number ML011080726, the NEI 95-10 (Revision 3) is under ADAMS Accession number

ML011100576, and NUREG-1739 (Analysis of Public Comments) is under ADAMS Accession number ML011080600.

Copies are available at current rates from the U.S. Government Printing Office, P.O. Box 37082, Washington, DC 20402-9328 (telephone (202)512-1800); or from the National Technical Information Service by writing NTIS at 5285 Port Royal Road, Springfield, VA 22161; (telephone (703)487-4650); <<http://www.ntis.gov/ordernow>>. Copies are available for inspection or copying for a fee from the NRC Public Document Room at 11555 Rockville Pike, Rockville, MD; the PDR's mailing address is USNRC PDR, Washington, DC 20555; telephone (301)415-4737 or (800)397-4209; fax (301)415-3548; email is PDR@NRC.GOV. These license renewal guidance documents are not copyrighted, and Commission approval is not required to reproduce them.

FOR FURTHER INFORMATION CONTACT: Raj Anand, Office of Nuclear Reactor Regulation, Mail Stop O-12G15, U.S. Nuclear Regulatory Commission, Washington, DC 20555-0001, Telephone (301) 415-1146, or email <RKA@NRC.GOV> .

SUPPLEMENTARY INFORMATION:

Regulatory Guide for License Renewal

Regulatory Guide 1.188 is being issued as guidance for the license renewal rule. This regulatory guide provides guidance on the format and content acceptable to the NRC staff for structuring and presenting the information to be compiled and submitted in an application for renewal of a nuclear power plant operating license. Regulatory Guide 1.188 endorses the use of the Nuclear Energy Institute (NEI) guidance document, Revision 3 of NEI 95-10, "Industry Guideline for Implementing the Requirements of 10 CFR Part 54—The License Renewal Rule",

March 2001, as an acceptable method for preparing an application that complies with the requirements of the license renewal rule.

Regulatory Guide 1.188 supersedes Draft Regulatory Guides DG-1104 and DG-1047 which were issued for public comment in August 2000, and in August 1996, respectively, to propose endorsement of an earlier version of NEI 95-10.

Regulatory Guide 1.188 and NEI 95-10 provide guidance on the contents of an application for license renewal that includes --

- (1) Required general information concerning the applicant and the plant;
- (2) Information contained in the integrated plant assessment;
- (3) An evaluation of time-limited aging analyses (TLAAs);
- (4) A supplement to the Final Safety Analysis Report (FSAR);
- (5) Technical specification changes and their justification; and
- (6) A supplement to the environmental report.

Specifically, guidance is provided for --

- (1) Identifying the structures and components subject to aging management review;
- (2) Ensuring that the effects of aging are managed;
- (3) Identifying and evaluating TLAAs;
- (4) Establishing the format and content of the license renewal application; and
- (5) Preparing an FSAR supplement.

As indicated in Revision 3 of NEI 95-10, NEI intends that NEI 95-10 be consistent with the GALL report and the SRP-LR.

Standard Review Plan for License Renewal

The NRC staff also has revised a SRP-LR (NUREG-1800) that contains guidance to NRC staff reviewers in performing safety reviews of applications submitted to renew licenses of nuclear power plants in accordance with the license renewal rule. The SRP-LR contains four major chapters: (1) Administrative Information (2) Scoping and Screening Methodology for Identifying Structures and Components Subject to Aging Management Review, and Implementation Results (3) Aging Management Review Results, and (4) Time-Limited Aging Analyses. In addition, three Branch Technical Positions are in an appendix to the SRP-LR.

During the initial license renewal reviews, the NRC and the industry recognized that most of the existing programs at the plants were adequate to manage aging effects for license renewal without change. The Commission, by a staff requirements memorandum (SRM) dated August 27, 1999, directed the NRC staff to focus the review guidance in the SRP-LR on existing programs that should be augmented for license renewal. The NRC staff developed the GALL report that evaluates existing programs generically to document the basis for determining when existing programs are adequate without change and when existing programs should be augmented for license renewal. The SRP-LR incorporates the GALL report by reference.

Generic Aging Lessons Learned Report

The GALL report, NUREG-1801, presents the aging management review results in a table format. The adequacy of the generic aging management programs in managing certain aging effects for particular structures and components are evaluated based on the review of 10 program attributes: scope of program, preventive actions, parameters monitored or inspected, detection of aging effects, monitoring and trending, acceptance criteria, corrective actions, confirmation process, administrative controls, and operating experience. If the

evaluation determines that a program is adequate to manage certain aging effects for particular structures and components without change, the GALL report would indicate that no further NRC staff evaluation is recommended for license renewal. Otherwise, it would recommend areas in which the NRC staff should focus its review.

The GALL report is a technical basis document for the SRP-LR. The GALL report should be treated in the same manner as an approved topical report that is applicable generically. An applicant may reference the GALL report in a license renewal application to demonstrate that the applicant's programs at its facility correspond to those reviewed and approved in the GALL report, and that no further NRC staff review is required. If the material presented in the GALL report is applicable to the applicant's facility, the NRC staff would find the applicant's reference to the GALL report acceptable. In making this determination, the NRC staff shall consider whether the applicant has identified specific programs described and evaluated in the GALL report. However, the NRC staff will not repeat its review of the substance of the matters described in the GALL report. Rather, the NRC staff shall ensure that the applicant verifies that the approvals set forth in the GALL report for generic programs apply to the applicant's programs. The focus of the NRC staff review shall be on augmented programs for license renewal. The NRC staff shall also review information that is not addressed in the GALL report, or is otherwise different from that in the GALL report.

Analysis of Public Comments on the Improved License Renewal Guidance Documents

On August 31, 2000, the NRC announced (65 FR 53047) the issuance for public comment and availability of Draft Regulatory Guide DG-1104, "Standard Format and Content for Applications to Renew Nuclear Power Plant Operating Licenses"; a draft "Standard Review Plan for the Review of License Renewal Applications for Nuclear Power Plants" (SRP-LR), and

a draft "Generic Aging Lessons Learned (GALL) Report". DG-1104 proposed to endorse NEI 95-10, Rev. 2, "Industry Guideline for Implementing the Requirements of 10 CFR Part 54 – The License Renewal Rule." The NRC also announced a public workshop that was held on September 25, 2000, to facilitate gathering of public comment on the draft documents. Written comments were received from over 128 commenters with the breakdown being 101 individuals, 15 public interest groups, and 12 industry groups (law firms, utilities, and the Nuclear Energy Institute). The staff also held public meetings with stakeholders to discuss their comments.

NUREG-1739, "Analysis of Public Comments on the Improved License Renewal Guidance Documents" contains the NRC response to stakeholders' comments. The dispositions are prepared in a table format and contained in five appendices. Appendix A addresses the participant comments from the license renewal public workshop on September 25, 2000; Appendix B addresses the specific written comments submitted by NEI; Appendix C addresses the written comments submitted by various stakeholders such as the Union of Concerned Scientists, utilities, and private citizens; Appendix D addresses five Union of Concerned Scientists reports; and Appendix E addresses the Advisory Committee on Reactor Safety (ACRS) consultants' structural and electrical comments.

Dated at Rockville, Maryland, this ____ day of April 2001.

FOR THE NUCLEAR REGULATORY COMMISSION

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Office of Nuclear Reactor Regulation