



**FORMAT AND CONTENTS OF APPLICATION FOR MODIFICATIONS IN
TECHNICAL SPECIFICATIONS AND OPERATING POLICIES AND
PRINCIPLES OF NPP**

PAKISTAN NUCLEAR REGULATORY AUTHORITY

FORMAT AND CONTENTS OF APPLICATION FOR MODIFICATIONS IN TECHNICAL SPECIFICATIONS AND OPERATING POLICIES AND PRINCIPLES OF NPP

ABSTRACT

The guide provides guidance to the licensees of nuclear power plants on format and contents of safety cases submitted for pursuing modifications in technical specification and operating policies and principles of nuclear power plants.

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1. INTRODUCTION

The operating licence issued to nuclear power plant requires the licensee to obtain prior approval of PNRA for any modification in the approved Plant Technical Specifications and Operating Policies and Principles (OPP) of nuclear power plants [3].

Accordingly, the licensees submit their safety cases for modifications in Technical Specifications, Operating Policies and Principles as required by PAK/913 (Section 23) from time to time for PNRA approval. This regulatory guide provides information on the format and content on such safety cases. Use of this guide will ensure completeness of information and will, therefore, shorten the duration of review.

2. PURPOSE

This guide is intended to facilitate the regulatory review process of modifications in Technical Specifications and OPP and avoid unnecessary delays in making correspondences with the licensees for obtaining required information.

3. SCOPE

The guide contains guidance for the Licensee on the format and contents of the application for modification in Technical Specifications and OPP of nuclear power plants.

4. CONTENTS OF MODIFICATION DOCUMENT SUBMITTED BY LICENSEES

4.1 Description

Description of proposed modification in the technical specification/operating policies and principles should be provided with the modification request along with the description of original modification and its basis. Description should be in line with regulatory requirements.

4.2 Reason(s) for Modification

Reasons for carrying out modifications to technical specifications/OPP should be clearly described. The reasons may include:

- 1) Maintaining or strengthening existing safety provisions.
- 2) Recovering from plant faults.
- 3) Reducing the radiation exposure of personnel.
- 4) Extending the design life of the plant.
- 5) Compensatory measures.
- 6) Feedback of Operational Experience
- 7) Technical Improvements
- 8) New Regulatory Requirements

4.3 Justification

Appropriate justification including the following information, should be provided:

- 1) Impact on design
- 2) Impact on safety
- 3) Impact on other operating NPPs and environment

Furthermore, necessary analysis should also be submitted for each modification and this should be assessed before the modification is submitted to PNRA.

4.4 Review and Approval

The proposed technical specification should undergo licensee's process of review, verification and approval [2]. The review should be made by those which are not directly involved in preparing the modification. Moreover, the licensee should provide a certificate that the modification will not affect/degrade the safety of the plant (sample attached at Annexure-I).

4.5 Reference of Codes and Standards

Applicable Codes and standards used in the modification should be mentioned.

4.6 Any other relevant information

The licensee may submit any other relevant information along with the modification request to support its safety case.

REFERENCES

- 1) Pakistan Nuclear Regulatory Authority, Regulations on Safety of Nuclear Power Plants Operation PAK/913 (2004).
- 2) IAEA Safety Guide NS-G-1.2, Safety Assessment and Verification for Nuclear Power Plants.
- 3) IAEA Safety Guide NS-G-2.2, Operational Limits and Conditions and Operating Procedures for Nuclear Power Plants.

ANNEXURE-I

REQUEST FOR MODIFICATION IN TECHNICAL SPECIFICATIONS/OPP

Technical specifications/OPP to be changed:

Proposed modification:

Reason for modification:

Justification:

Review and Approval by plant safety committee:

Certified that the subject modification has no adverse effect on safe operation of the plant and current safety level will not be degraded as a result of this modification

(Signature of Director General)