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January 30, 2018

SUBJECT: WESTINGHOUSE JANUARY 2018 UPDATED INTEGRATED SAFETY ANALYSIS (ISA) SUMMARY

Westinghouse Electric Company LLC (Westinghouse) is pleased to submit the updated Integrated Safety Analysis (ISA) Summary for the Columbia Fuel Fabrication Facility (CFFF) in accordance with 10CFR70.72(d)(3). This submittal incorporates facility changes and the results of new or revised analyses completed within calendar year 2017 which impact the ISA Summary. The ISA changes implemented in 2017 did not require Nuclear Regulatory Commission (NRC) pre-approval under the provisions of 10CFR70.72(c).

As part of this annual update, Westinghouse specifically reviewed the ISA to implement conservative rounding, i.e., for an event calculated to occur at a frequency between 5×10^{-5} /year to 9.9×10^{-5} /year, the Overall Likelihood Index (OLI) is -4. Based on this review, in all cases the performance requirements remain satisfied. Some supporting fault tree calculation notes are being revised.

Also in this annual update, the index scores applied to administrative IROFS were reviewed and justified based on recent operating experience; the use of key terms approved in the SNM-1107 license application was reviewed, and where necessary, the descriptions within the ISA Summary were clarified to ensure consistent application of the definitions; and the fire risk assessment sections were revised to incorporate the bounding consequence method in accordance with the revised ISA handbook. In all cases, the performance requirements remain satisfied.

Table 1 on page 3 of this letter provides a listing of the impacted sections of the ISA Summary and a general description of the revisions. Changes in the enclosed ISA summary are identified by revision lines in the left margin.

If you have any questions, please contact me at (803) 647-3338.

Nancy Blair Parr

Nancy Blair Parr, Manager
Licensing
Westinghouse Columbia Fuel Fabrication Facility
Docket 70-1151 License SNM -1107
Enclosure: January 2018 Updated ISA Summary

The enclosure transmitted herewith contains Security-Related - Sensitive Unclassified Non-Safeguards Information (SUNSI) subject to Withholding under 10 CFR 2.390. When separated from the enclosure, this transmittal document is uncontrolled.

CC:

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TABLE 1: GENERAL SCOPE OF REVISIONS

No.	Summary Section Title	10CFR70.72 Revision Scope	Revised Pages
1	Plant Ventilation	Incorporated facility changes and revised Criticality Safety Evaluations. Incorporated additional S-1030 scrubber related modifications. Updated non-criticality risk assessment.	Entire Document
2	Uranyl Nitrate Bulk Storage	Incorporated minor descriptive facility changes and updated non-criticality risk assessment.	Entire Document
3	Ammonium Diuranate (ADU) Conversion	Incorporated facility changes, revised Criticality Safety Evaluations and updated process description. Updated seismic and UF ₆ pad accident sequences. Added combustible material accident sequence. Also, incorporated physical modifications for the UF ₆ storage pad expansion. Updated non-criticality risk assessment.	Entire Document
4	Safe Geometry Dissolver	Incorporated facility changes, revised Criticality Safety Evaluations and updated non-criticality risk assessment.	Entire Document
5	ADU Bulk Blending	Incorporated facility changes, revised Criticality Safety Evaluations and updated non-criticality risk assessment.	Entire Document
6	Chemical Receipt & Handling	Incorporated facility changes and updated process description. Updated non-criticality risk assessment.	Entire Document
7	Solvent Extraction	Incorporated facility changes, revised Criticality Safety Evaluations and updated process description. Updated tank fire accident sequence and non-criticality risk assessment.	Entire Document
8	Pelleting	Incorporated facility changes and revised Criticality Safety Evaluations. Updated process description and non-criticality risk assessment.	Entire Document
9	Cylinder Wash	Incorporated facility changes, minor descriptive in nature. Updated process description and non-criticality risk assessment.	Entire Document
10	ADU Rods	Incorporated facility changes, minor descriptive in nature. Updated process description and non-criticality risk assessment.	Entire Document
11	Scrap Uranium Processing	Incorporated facility changes, revised Criticality Safety Evaluations and updated non-criticality risk assessment.	Entire Document
12	Integral Fuel Burnable Absorber (IFBA) Rods	Incorporated facility changes, minor descriptive in nature. Updated process description and non-criticality risk assessment.	Entire Document
13	Low Level Radioactive Waste	Incorporated facility changes, minor descriptive in nature. Updated process description.	Entire Document
14	IFBA Processing	Incorporated facility changes, minor descriptive in nature. Updated process description and non-criticality risk assessment.	Entire Document
15	Wastewater Treatment	Incorporated facility changes and revised Criticality Safety Evaluations. Updated process description and non-criticality risk assessment.	Entire Document
16	Storage of Uranium Bearing Materials	Incorporated facility changes and revised Criticality Safety Evaluations. Updated process description and non-criticality risk assessment.	Entire Document
17	Final Assembly	Incorporated facility changes and revised Criticality Safety Evaluations. Updated process description and non-criticality risk assessment.	Entire Document
18	Laboratories	Incorporated facility changes and revised Criticality Safety Evaluations. Updated process description and non-criticality risk assessment.	Entire Document
19	Hoods and Containment	Incorporated facility changes, revised Criticality Safety Evaluations and updated non-criticality risk assessment.	Entire Document
20	Erbia	Incorporated facility changes, minor descriptive in nature. Updated process description and non-criticality risk assessment.	Entire Document
S&S	Site And Structures	Incorporated facility changes to several systems.	Entire Document