

Surveillance Frequency Control Program Implementing Insights

Zhiping Li^{a,b}, Mary Anne Billings^b

^a Ameren Missouri (Callaway), Fulton, United States of America

^b STP Nuclear Operating Company, Wadsworth, United States of America

INTRODUCTION

- Risk Informed Technical Specification (RITS), Initiative 5b
 - provides a risk-informed, performance-based approach for licensee control of Surveillance Frequencies
- Revision 1 of NEI 04-10, *Risk-Informed Method for Control of Surveillance Frequencies*
 - provides guidance for implementation

INTRODUCTION

- Callaway's LAR for "5b" was approved in July 2011
- as of December 2017, Callaway has implemented only two surveillance interval extensions
- in 2018, Callaway approved only one surveillance interval extension
- insights and lessons learned from implementing of SFCP at Callaway will be presented

LESSONS LEARNED SHARED BY INDUSTRY

- NextEra
 - Early involvement of system engineering and plant staff in development of procedures is necessary
 - Industry is not consistent in SFCP ownership
 - lack of understanding of the SFCP procedure/process
- Palo Verde Nuclear Generation Station
 - Data gathering: multiple organizations
 - Resource issues: manager level project leadership
 - commonly test multiple Surveillance Requirements
 - cumulative risk concerns

INSIGHTS/LESSONS LEARNED AT CALLAWAY

- The Callaway's LAR for "5b" was approved in July 2011
- Weekly Inspection of NK large Stationary Batteries was extended to monthly in 2014
- Trip Actuating Device Operational Test (TADOT) was extended in 2016
- Extension of Integrated Engineered Safety Features Actuation System (ESFAS) Testing was approved in August 2018

INSIGHTS/LESSONS LEARNED AT CALLAWAY

- Manager level project leadership is very helpful with resource issue
 - the chairperson of the IDP and the 5b project leader is an operations manager
- Support from operations and engineering department as well as PRA department
- Ownership and responsibilities needs to be clear in order to have an effective program
 - now PRA engineers can focus on the STRIDE PRA assessment
- Coordination from Engineering SME and PRA engineers plays a critical role in the ESFAS test interval extension evaluation
 - with the engineering SME's help, the incremental risk for CDF reduced about 50% and for LERF reduced more than 90%.

Questions?