U.S.NRC
United States Nuclear Regulatory Commission
Protecting People and the Environment

RIC 2017



Office of Nuclear
Regulatory Research

Enhanced Tracking and Reporting of Research Projects

In response to congressional and Commission inquiries, the Office of Nuclear Regulatory Research has begun to enhance the tracking and reporting of budgeted resources, priorities, duration, basis, and status of research projects to provide more transparent information to internal and external stakeholders. This effort builds upon agencywide efforts to upgrade the interfaces among IT systems to improve data support for efficient and effective management decisionmaking.

Project Goals Include:

- Improved clarity about the work being supported by the anticipatory and confirmatory research being performed (make linkages explicit).
- Shared understanding of the research infrastructure necessary to support a wide range of confirmatory research (e.g., computer codes).
- Improved management information to ensure highest priority work is funded by projecting future costs and tracking actual expenditures.

Timeframes:

- Enhanced reporting currently available for 2017-2018 budget execution and in formulation of the FY 2019 budget.
- Ongoing NRC systems improvements will make reporting more automated by FY 2020.

ENTERPRISEWIDE PROJECT IDENTIFIERS (EPIDS)

1. Safety of I&C
2. Security of I&C
3. Electrical System Evaluation
4. Cable and Equipment Aging
5. Structural & Geotechnical Evaluations
6. Piping and Other Components Integrity
7. Integrity Analysis Tool Development and Guidance
8. Vessel Integrity (RPV and internals)
9. Steam Generator Integrity
10. Storage (dry cask, transportation)
11. Evaluation Techniques (NDE)
12. Materials Degradation, Analysis and Mitigation Techniques
13. Seismic Analysis and Evaluation
14. External Hazards Analysis
15. Probabilistic Flood Hazard Assessment Research
16. Support for Fire Protection Activities
17. Fire Risk Training
18. High-Energy Arc Faults Testing
19. Halden
20. Accident Sequence Precursor Program
21. Reactor Operating Experience Program
22. Regulatory Guides (includes codes and standards)
23. Long Term Research Program (LTRP)
24. Generic Issues Program
25. Risk Analysis Research
26. Safety Culture Inspections and Technical Assistance
27. Development and Enhancement of NRC Risk Analysis Tools
28. Development of Technical Guidance for Implementation of Risk-Informed Activities
29. Drug-and-Alcohol-Related Fitness-for-Duty Projects
30. Level 3 PRA Project (full site, multi-unit risk assessment)
31. Human Reliability Analysis Data Collection
32. Human Reliability Analysis Methods
33. PARCS Code Development and Maintenance
34. SCALE Code Development and Maintenance
35. FRAPCON/FRAPTRAN Code Development and Maintenance
36. Fuels and Neutronics Analysis
37. TRACE Code Development and Maintenance
38. SNAP Code Development and Maintenance
39. Thermal-Hydraulic Verification and Validation
40. Thermal-Hydraulic Analysis
41. CFD Analysis
42. MELCOR Code Development and Maintenance
43. Severe Accident Verification and Validation
44. Accident Progression and Source Term Analysis
45. MACCS Code Development, Maintenance, and Verification/ Validation
46. WinMACCS, MelMACCS, and SECPOP Code Development and Maintenance
47. Consequence Analysis
48. Dose Assessment Code Development and Maintenance
49. Radiation Protection Code Development and Maintenance
50. Decommissioning Code Development and Maintenance
51. Radiation Protection Analysis