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Revision of Management Measures Guidance: Chapter 11 of NUREG-1520

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Management Measures

- 10 CFR Part 70 requires that each applicant or licensee establish management measures to ensure compliance with the performance requirements of §70.61
  - Management measures may be graded commensurate with the reduction of the risk attributable to a control or control system
- Chapter 11 of NUREG-1520 provides guidance to staff on how to conduct a review of management measures submittals
  - New guidance added to describe use of graded management measures

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Case Study: Graded Management Measures

Vs.

- How would you apply graded management measures to these items?
- What factors would you consider?

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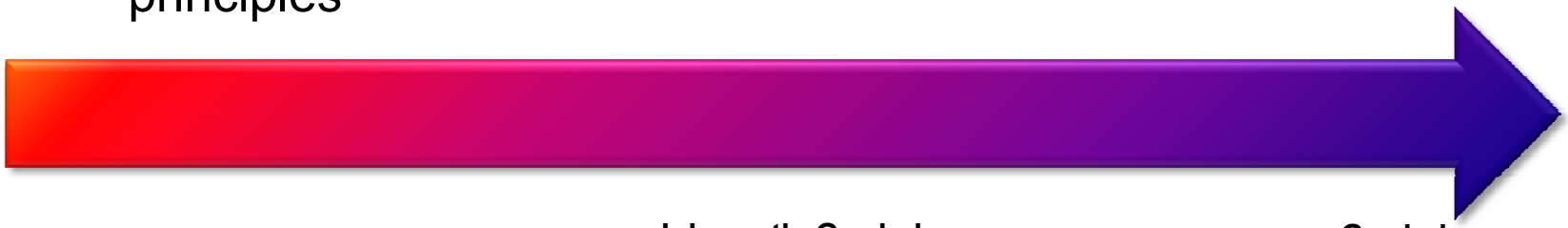
Graded Management Measures

- Spectrum of applicability for grading of management measures
  - Differing levels of guidance needed for application of graded principles



Not conducive to grading

- Necessary for consistent program/process implementation, control of design information, etc.
- No guidance provided in NUREG

Inherently Graded

- Naturally geared toward graded application
- Factors such as level of detail easily adjusted based on complexity and importance of IROFS or process to safety (i.e., procedures, records, investigations, etc.)
- Certain aspects of measures must still be applied regardless of IROFS' significance
- Less detailed guidance provided in NUREG

Graded

- Suitable for grading, but application of graded principles may not be as apparent as inherently graded controls
- Parameters for grading might include adjusted frequency for implementation or use of skilled tradespeople in lieu of engineers or inspectors
- NUREG focuses guidance on these areas

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NUREG-1520 Chapter 11: Management Measures

Management Measure	Graded	Not Graded
Configuration Management		X
Maintenance	X	
Training and Qualification	X	
Procedures	X	
Audits and Assessments	X	
Incident Investigations	X	
Records Management	X	
Other Quality Assurance Elements	X	X

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- Configuration Management
  - Not subject to grading
  - Necessary for the management of design and safety information
- Maintenance
  - May be graded
  - Examples of grading include reduced frequency for surveillances or reduced frequency for preventative maintenance of IROFS having lower importance to safety and low susceptibility to failure

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- Training and qualification
  - May be graded
  - Examples of grading include different requirements for the qualification, training, or education of personnel performing activities associated with graded IROFS
- Procedures
  - May be graded
  - Examples of grading include lesser detail in procedures for activities that have a lower complexity and lower importance to safety
  - Regardless of grading process, procedures and written guidance must be reviewed and approved and subjected to periodic effectiveness reviews

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- Audits and Assessments
  - May be graded
  - Examples of grading include reduced frequency or performance of audit/assessment functions by skilled/trade individuals
- Incident Investigations
  - May be graded
  - Examples of grading include applying rigor to investigation commensurate with the safety significance of the issue/IROFS
  - Regardless of grading process, abnormal events must be investigated

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- Records Management
  - May be graded
  - Examples of grading include shorter record retention times (unless otherwise required by regulation) and less detailed design and procurement records for IROFS with less complex designs and low safety significance
  - Many aspects of records management must be applied to all IROFS (i.e., use of a controlled system for preparation, issuance, revision, and control of records)
- Other Quality Assurance Elements
  - Some elements may be graded

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Other Quality Assurance Elements

- Certain QA elements are not readily graded
  - Examples include Organization (facility is not likely to have a separate organization for managing graded IROFS) and Handling, Storage and Shipping (where applicable, IROFS must be handled, stored, and packaged according to certain specifications to avoid damage or deterioration)
- Many QA elements may be graded by applying principles like those applied to other management measures

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Other Quality Assurance Elements

Graded	Not Graded
QA Program	Organization
Control of Purchased Material, Equipment, and Services	Document Control
Inspection	Identification and Control of Items
Corrective Action	Control of Special Processes
Audits	Test Control
Design Control	Handling, Storage, and Shipping
Procurement Document Control	Inspection, Test, and Operating Status
Instructions, Procedures, and Drawings	Control of Nonconforming Items
Control of Measuring and Test Equipment	
QA Records	

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Questions

&

Discussion