IAEA
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Atoms for Peace and Development

Roles and Responsibilities of Management

Regional Workshop on the development and implementation of effective IMS based on GSR Part 2

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Regulatory Activities Section
Division of Nuclear Installation Safety (NSNI)
International Atomic Energy Agency (IAEA)
Department of Nuclear Safety & Security

Content

- Management responsibilities within the fundamental safety principles and the essential elements of nuclear security related to the management system (MS).
- Management responsibilities and functions as part of GSR Part 2 requirements related to the MS.
- NSS-11-G Guidelines (Rev. 1) specific for nuclear security.
- Safety and security cultures.
- Key elements of leadership for safety.

Purpose

- Review the responsibilities of managers in organizations using radiation sources and other organizations associated with safety and security in relation to establishing, sustaining and improving the management system.
- Establish the importance of having a global vision and prioritizing activities within the MS.

Learning objectives

At the end of this module, participants will be able to:

- Understand the primary responsibilities of ensuring that the organization gives top priority to safety and security and provides resources and means to fulfil these responsibilities.
- Identify how to implement goals, strategies, plans, and objectives in a consistent manner.
- Understand the need to set safety and security objectives at all organizational levels that are consistent with the organization's safety and security policy.
- Prioritize roles for establishing applying, sustaining and improving the organization's MS.

Responsibility and functions for safety and security

Principle 1: Responsibility for safety

The prime responsibility for safety must rest with the **person or organization responsible for facilities that give rise to radiation risks.**

3.6. The **licensee** is responsible for:… These responsibilities are to be fulfilled in accordance with applicable safety objectives and requirements as established or approved by the regulatory body, and their fulfilment is to be ensured through the implementation of the **management system**.

Principle 3: Leadership and management for safety

3.12. **Leadership** in safety matters has to be demonstrated at the **highest levels in an organization**. Safety has to be achieved and maintained by means of an **effective management system**.

Essential element 3: Legislative and regulatory framework

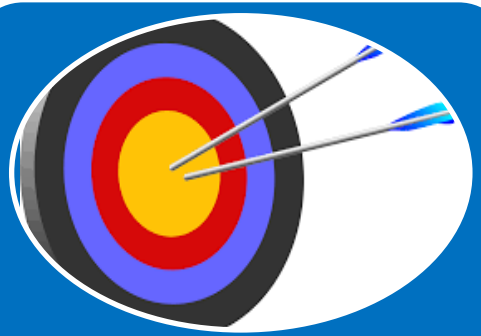
The legislative and regulatory framework, and associated administrative measures, to govern the nuclear security regime:…

3.3. (h) Ensure that prime responsibility for the security of nuclear material, other radioactive material, associated facilities, associated **activities**, sensitive information and sensitive information assets **rests with the authorized persons**.

Essential element 12: Sustaining a nuclear security regime

3.12. A nuclear security regime ensures that each competent authority and authorized person and other organizations with nuclear security responsibilities contribute to the sustainability of the regime by: (a) Developing, implementing, and maintaining appropriate and effective **integrated management systems** including quality management systems.

GSR Part 2: Requirements 1 - 3

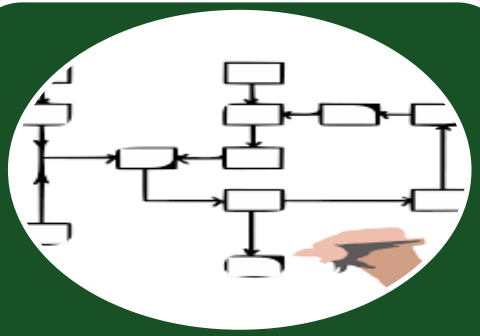


Requirement 1: Achieving the fundamental safety objective

The registrant or licensee —starting with the senior management— shall ensure that the fundamental safety objective of protecting people and the environment from harmful effects of ionizing radiation is achieved.

Requirement 2: Demonstration of leadership for safety by managers

Managers shall demonstrate leadership for safety and commitment to safety.



Requirement 3: Responsibility of senior management for the management system

Senior management shall be responsible for establishing, applying, sustaining and continuously improving a management system to ensure safety.

GSR Part 2: Requirements 4 - 5

Requirement 4: Goals, strategies, plans and objectives

Senior management shall establish goals, strategies, plans, and objectives for the organization that are consistent with the organization's safety policy.

Requirement 5: Interaction with interested parties

Senior management shall ensure that appropriate interaction with interested parties takes place.

R1: Achieving the fundamental safety objective

SENIOR MANAGEMENT

R2: Demonstration of leadership for safety

SENIOR MANAGEMENT

- Organizational approach prioritizing issues relating to protection and safety
- Establishing behavioural expectations and fostering a strong safety culture

- Acknowledging interactions between people, technology and organization
- Establishing accountability and security as factor in decision making

R2: Demonstration of leadership for safety

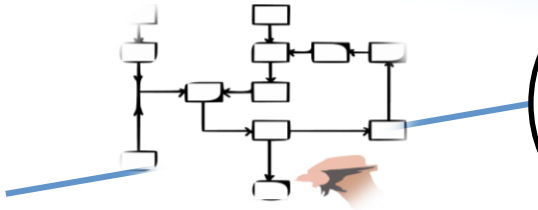
- Set goals for safety that are consistent with the policy for safety
- Develop values and expectations for safety
- Encourage the reporting of safety related problems

- Encourage and support individuals in achieving safety goals and working safely
- Engage all individuals in enhancing safety performance
- Communicate clearly the basis for decisions relevant to safety

R3: Responsibility for the management system

SENIOR MANAGEMENT

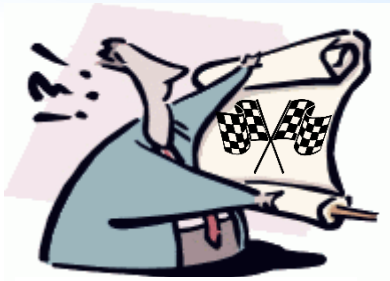
Retain accountability for the MS even when individuals are assigned other responsibilities



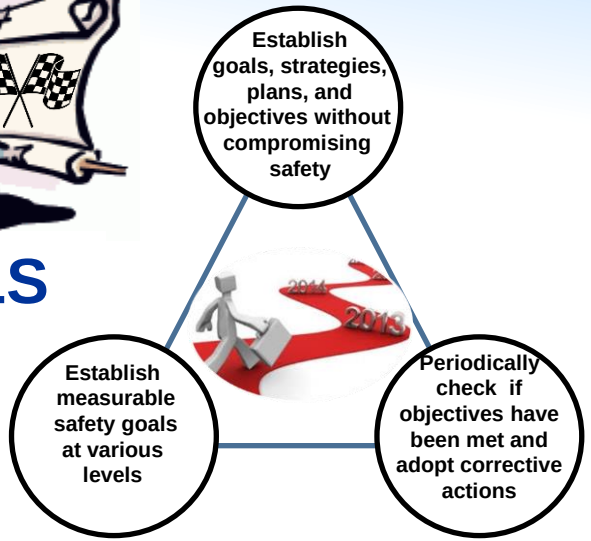
Responsible for establishing safety policy

R4: Goals, strategies, plans, and objectives

SENIOR MANAGEMENT



GOALS



R5: Interaction with interested parties

SENIOR MANAGEMENT

Identify interested parties and define an appropriate strategy for interaction

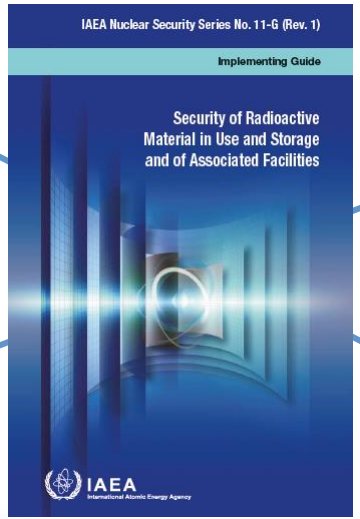
Provide means of informing and communicating with interested parties, while considering their opinion

Specific guidance for security

Generally speaking, the requirements of GSR Part 2 for SG are valid, with the necessary changes, for nuclear security provided that their specific aspects are taken into account

Identify sensitive information and protect it according to national regulations

Establish arrangements and lines of communication that result in an appropriate flow of information on security



Ensure that radioactive material is protected in accordance with the security plan

Ensure that radioactive material is identifiable, traceable and periodically verified to be present

Requirements and recommendations on the cultures for safety and security

Requirement 12: Fostering a culture for safety

Individuals in the organization, from senior managers downwards, **shall foster a strong safety culture**. The management system and leadership for safety shall be such as to foster and **sustain a strong safety culture**

5.1. All individuals in the organization shall contribute to fostering and sustaining a strong safety culture.

Sustaining the nuclear security regime

3.31 All organizations and individuals involved in implementing nuclear security should give due priority to the **nuclear security culture** with regard to radioactive material, to **its development and maintenance** necessary to ensure its effective implementation in the entire organization.

Attributes of the cultures for safety and security

Support **trust**, **collaboration**, **consultation** and **communication**

- **Common understanding of safety** (awareness of risks and hazards)
- Acceptance of **personal accountability**
- Support the **reporting of problems**

- Means to **foster cultures** using **a systemic approach**
- **Safety and security oriented decision making**
- Questioning and learning attitude

Exchange and combine ideas between safety culture and security culture

EVERGREEN
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Where to focus?

Where to focus?

Managers commitment

The senior management, as leaders of the organization, are responsible for planning and implementing an appropriate management system.

- Establish the framework for the development of the safety culture and the security culture.
- Communicate policies, responsibilities and the basis for them.
- Provide tools and resources for compliance.
- Encourage and support all individuals.
- Be a role model.

How do you do this?

Self-actualizing
Provide ideas
Suggest improvements
Personal integrity

Affiliative:
Cooperation
Clear communication
Collaboration

Achievements:
Clear expectations
Common objectives
Challenges

Humanistic-encouraging:
Trust
Support
Absolute respect
Transparency

Conclusion

- The responsibilities established by the IAEA safety requirements and the security recommendations are **equivalent**, although there are specific aspects that need to be considered.
- **The managers' commitment at all levels** is essential to manage safety and security efficient and effective manner.
- Managers must **continually strengthen their capabilities** to exercise **organizational leadership**.

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