Briefing on Radiation Source Protection and Security

July 17, 2014

Mark Satorius

Executive Director for Operations

Accomplishments in Source Security

2003 - 2007	2008 - 2011	2012 - 2014

• Security Orders
  o 7 sets of orders covering a variety of modalities
 	
• NSTS rule
 	
• 1st Task Force report
	• NSTS deployment
	• ISMP contracted
	• 10 CFR Part 37 - proposed rule
	• Cesium Chloride - Final Policy
	• 2nd Task Force report
		• WBL deployment
		
		• 10 CFR Part 37 – final rule
		  ➤ Procedures and Guidance
		• LVS Deployment
		• 3rd Task Force report

ISMP: Integrated Source Management Portfolio; **NSTS**: National Source Tracking System; **WBL**: Web-Based Licensing; **LVS**: License Verification System

Looking forward

- **Continue to identify ways to improve source security**

NRC Source Security Activities

July 17, 2014

Brian Holian, Acting Director

Office of Federal and State Materials and Environmental Management Programs (FSME)

Robust Source Security Program

- **NRC and the Agreement States have created a strong regulatory framework**

- **Part 37 is an optimized mix of performance-based and prescriptive requirements**

- **Integrated and comprehensive program in place for management and control of radioactive sources**

Integrated Source Management Portfolio (ISMP)

- Category 1 and 2 sources
- Over 1,400 licensees and 80,000 sources
- Annual Inventory Reconciliation
- Deployed 2008

- Stores Category 1 and 2 licenses
- Capability to serve as nationwide license repository for over 20,000 licenses
- Needed to support license verification
- Deployed 2012

- Automates verification checks using WBL and NSTS data
- Users - regulators, government agencies, distributors/ licensees
- Deployed 2013

Coordinating with Federal and State Partners

- Radiation Source Protection and Security Task Force
- Department of Energy
- Department of Homeland Security
- Organization of Agreement States
- Conference of Radiation Control Program Directors

Government Accountability Office Audit Concerns

Source: GAO.

Implementation of 10 CFR Part 37

July 17, 2014
Adelaide Giantelli, Branch Chief
Source Management and
Protection Branch
FSME
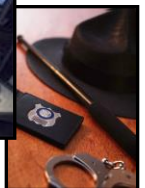
Security Requirements

Administrative

- **Access authorization and background investigations**
- **License verification**
- **Plans, training and self-assessments**
- **Document retention and information protection**

Security During Use

- **Monitor, detect, assess and respond**
- **Transportation security**
- **Portable and Mobile Device Controls**
- **Maintenance and testing of physical protection equipment**
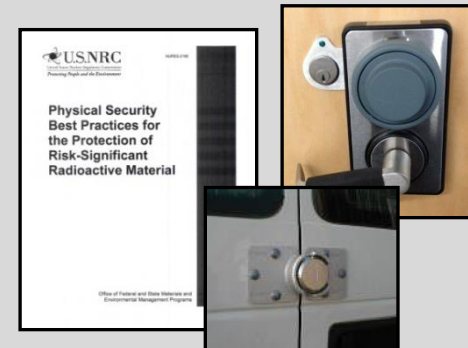
Implementation of 10 CFR Part 37

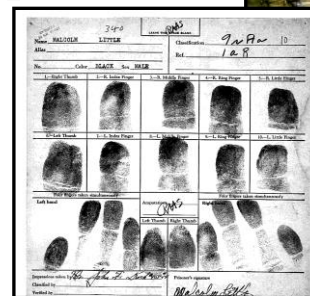Order Rescission

Training

Guidance
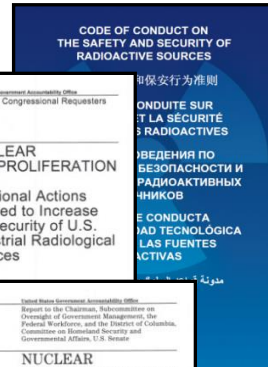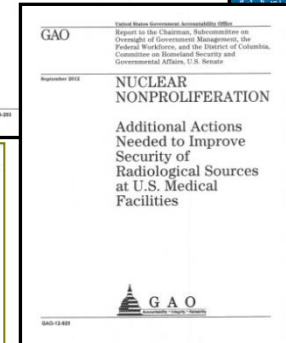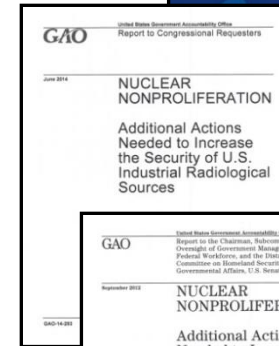

Outreach

Inspection

Enforcement

Looking Forward

- **Continue outreach with Agreement States and Licensees**
- **Ensure consistent identification and disposition of Part 37 violations**
- **Continue support and participation in international initiatives on source security**
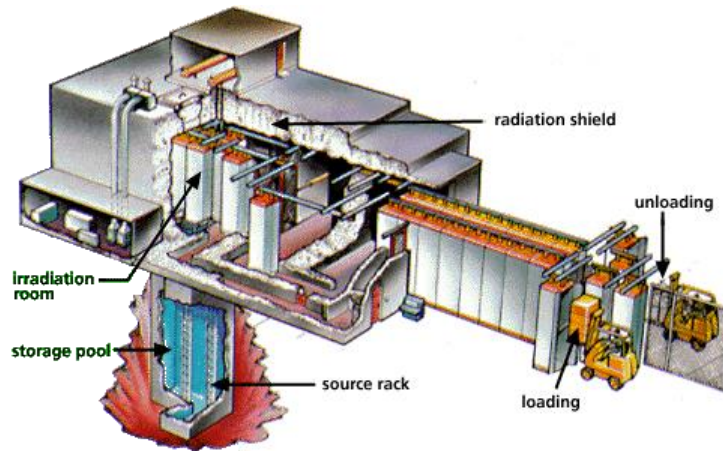- **Evaluate operational experience from first 2 years of Part 37 inspection data**

Regional Perspective on Radiation Source Security

July 17, 2014
Randolph Ragland, Team Leader
Part 37 Team, Region I

Examples of Category 1 Quantities

Panoramic Irradiator

Gamma Knife

Self-Shielded Irradiator

Self Shielded Irradiator, if Cs-137 Activity is > 2,700 Curies

Examples of Category 2 Quantities

Radiography

Self-Shielded Irradiator

Well Logging

Calibrator

Some fixed gauges

Materials Security Inspector Qualifications

- ☑ **Qualified safety inspector**
- ☑ **Training**
  - New security inspectors:
    - Materials Control, Security Systems & Principles (S-201) Course, provided by the Technical Training Center
  - Gap training provided by the Regions
- ☑ **Observe Inspections (optional)**
- ☑ **Branch Chief approval**

Inspections

- **Unannounced**
- **Frequency based on risk, and is the same as the safety inspection**
- **Performance-based review of physical security**

Initial Part 37 Findings

- **Overall, good performance**
  - **Licensees had existing security programs in place**
- **Challenges**
  - **Access authorization procedures**
  - **Security plan and implementing procedures**
- **Majority of violations have minor to low security significance**