



**Department of State Health Services (DSHS)  
Program Report to the Texas Radiation Advisory Board (TRAB)  
Consumer Protection Division**

**April 21, 2023  
Radiation Section**

**Licensing and Registration Activities**

<b>License Type</b>	<b>Companies</b>	<b>Sites</b>
X-Ray Registrations	17887	22666
Laser	3568	4343

<b>Registration Completed Actions Dec 2022 - Feb 2023</b>				
	<b>New</b>	<b>Renewal</b>	<b>Amendment</b>	<b>Termination</b>
X-Ray	845	171	983	229
Laser	277	32	118	31
<b>Total</b>	<b>2686</b>			

<b>RAM Licensing actions November 1 – March 31, 2022</b>				
	<b>New</b>	<b>Renewal</b>	<b>Amendment</b>	<b>Termination</b>
General License Acknowledgment	1	N/A	7	3
RAM	13	39	450	26
Waste Shipper/Transporter	2	9	0	N/A
RAM Reciprocity	6	11	4	N/A
Sealed Source and Device	0	0	0	11

<b>Industrial Radiographer Certification</b>	
Application for Exam	468
Trainee Application	367
Renewal Application	156
Non-Texas Radiographer	439

**Rulemaking**

23R011 - Radioactive Materials (ensuring compatibility with NRC RATS)

- §289.201 General Provisions for Radioactive Material
- §289.202 Standards for Protection Against Radiation from Radioactive

## Material

- §289.253 Radiation Safety Requirements for Well Logging Service Operations and Tracer Studies
- §289.255 Radiation Safety Requirements and Licensing and Registration Procedures for Industrial Radiography
- §289.256 Medical and Veterinary Use of Radioactive Material
- §289.257 Packaging and Transportation of Radioactive Material
- §289.258 Licensing and Radiation Safety Requirements for Irradiators.
  - DRAFT version was submitted to the HHS Rule Coordination Office (RCO) on March 30.
  - This version will be presented to the public for a two-week comment period at the end of April. Any comments received will be reviewed and may be incorporated into the Proposed rule version.
  - The Proposed rule will be presented to the HHS Executive Council Meeting on August 17, 2023.
  - The Proposed rule is expected to be published in the Texas Register on September 22, 2023, and will have a 31-day public comment period ending October 23, 2023. Any comments received will be reviewed and may be incorporated into the Adopted version of the rule.
  - The Adopted version is expected to be published in the Texas Register on January 19, 2024, and become effective on January 28, 2024.

## 32R012 - X-ray

### §289.229 Radiation Safety Requirements for Accelerators, Therapeutic Radiation Machines, Simulators, and Electronic Brachytherapy Devices

- DRAFT version is under review by the Division and due to the RCO on June 6, 2023.
- The two-week DRAFT public comment period is scheduled to start July 6, 2023. Any comments received will be reviewed and may be incorporated into the Proposed rule version.
- The Proposed rule will be presented to the HHS Executive Council Meeting on November 16, 2023.
- The Proposed rule is expected to be published in the Texas Register on December 22, 2023, and will have a 31-day public comment period ending January 22, 2024. Any comments received will be reviewed and may be incorporated into the Adopted version of the rule.
- The Adopted version is expected to be published in the Texas Register on April 19, 2024, and become effective on April 22, 2024.

## 32R013 - Laser

### §289.301 Registration and Radiation Safety Requirements for Lasers and Intense-Pulsed Light Devices

- This rule project will follow the same schedule as 23R012

## Inspection Data (FY23 to date)

- 429 RAM Inspections, 50 Fail (11%)
- 2706 X-Ray Inspections, 977 Fail (36%)
- 449 Remote Inspections, 310 Responded (69%), 165 Fail (37%)
- 371 Mammography Inspections, 72 Fail (19%)
- 30 Laser Inspections, 25 Fail (83%)

### **Technical Staff Vacancies**

<b>Position</b>	<b>Location</b>	<b>Anticipated Fill Date</b>	<b>Notes</b>
Mammography Inspector	El Paso	June 2024	Wait to train the new X-ray inspector
Mammography Inspector	Arlington	June 2023	Training current X-ray inspector
Mammography Inspector	Tyler	June 2023	To be posted
Mammography Inspector	Amarillo	June 2023	To be posted
X-ray Inspector/Trainer	Statewide	April 2023	Internal applicants interviewing
RAM Inspector	San Antonio/Austin	June 2023	Reviewing job posting
RAM Inspector	Arlington	Perpetual posting	2 positions filled
RAM Inspector	Houston	Perpetual Posting	Position filled
RAM Inspector / Trainer	Austin	Perpetual Posting	Position filled
RAM License Reviewer	Austin	Perpetual Posting	
Incident Investigator	Statewide	April 15, 2023	Hiring in process

### **Staff Training**

- Six staff members attended the Center for Radiological/Nuclear Training's Weapons of Mass Destruction Rad/Nuc HazMat Tech Course at the Nevada National Security Site near Las Vegas, Nevada.

### **Compliance Activities**

November 2022 to March 2023:

- Orders: 210
- Administrative Penalties: \$346,950.00
- Revocations:
  - 37 X-ray registrations
  - 5 Radioactive Material licenses

### **Mammography Branch**

- As of March 1, 2023, the DSHS Radiation Section realigned all mammography operations into one branch. This moved all Mammography

Accreditation, Certification, Inspections, and Operations under one Branch Manager, Trae Windham.

### **Emergency Response Activities**

#### South Texas Project Nuclear Power Plant

- No drills have occurred.

#### Comanche Peak Nuclear Power Plant

- March 8, 2023, Hood County Emergency Worker Dress Rehearsal and training were performed at the Hood County Decontamination Facility located at the Granbury City Pool. The FEMA-graded exercise is scheduled for April 6, 2023.

#### Waste Isolation Pilot Plant (WIPP)

- WIPP has continued to have quarterly meetings.
- There have been (10) WIPP shipments thru the State of Texas.
- No meter exchanges occurred this quarter.
- No WIPP training was provided for this quarter.
- Meetings were done with Michael Tully, Assistant Chief for Midland Fire Department, and Jerry Bullard, Reeves County EMC, related to the WIPPTREX exercise.
- An in-person briefing was done with the Judge of Andrews County, Charlie Falcon, and the County Fire Marshal and EMC, Michael Cook.
- A tour was done of WCS and WIPP.

#### Pantex/Agreement In Principle (AIP)

Tim Gibson has been selected for the DSHS Pantex/AIP Emergency Planner, effective March 2023.

A quarterly AIP task III meeting was attended by DSHS staff in January.

Monthly local AIP meetings were attended by DSHS staff in January, February, and March of 2023.

Quarterly environmental sampling was performed on January 11, 2023; soil/sediment, vegetation, surface water, and drinking water were obtained and sent to the DSHS Lab for analysis. OSLs were exchanged at the sampling locations on and around the Pantex plant as well.

Calibrations were performed by Amarillo DSHS personnel on handheld radiation detection instruments owned by DSHS, the City of Amarillo reception center, and fire stations.

Amarillo DSHS personnel traveled to Borger, Texas, to attend a Mass Casualty Attack Response Conference on January 19, 2023.

#### Radiological Operational Support Specialists (ROSS)

Three Texas ROSS personnel attended DSHS and Texas State Emergency

Management training in January 2023. They have all previously supported DSHS in field and tabletop exercises. Personnel has been added to the DSHS Radiation Emergency Response Team (RERT) roster as qualified City/County Liason Officers and Medical Liason Officers.

Two ROSS personnel participated in a Radiation Public Health TTX in Collin County on March 30, 2023, and one ROSS personnel participated in a Southeast Texas RAC functional exercise on April 12, 2023.

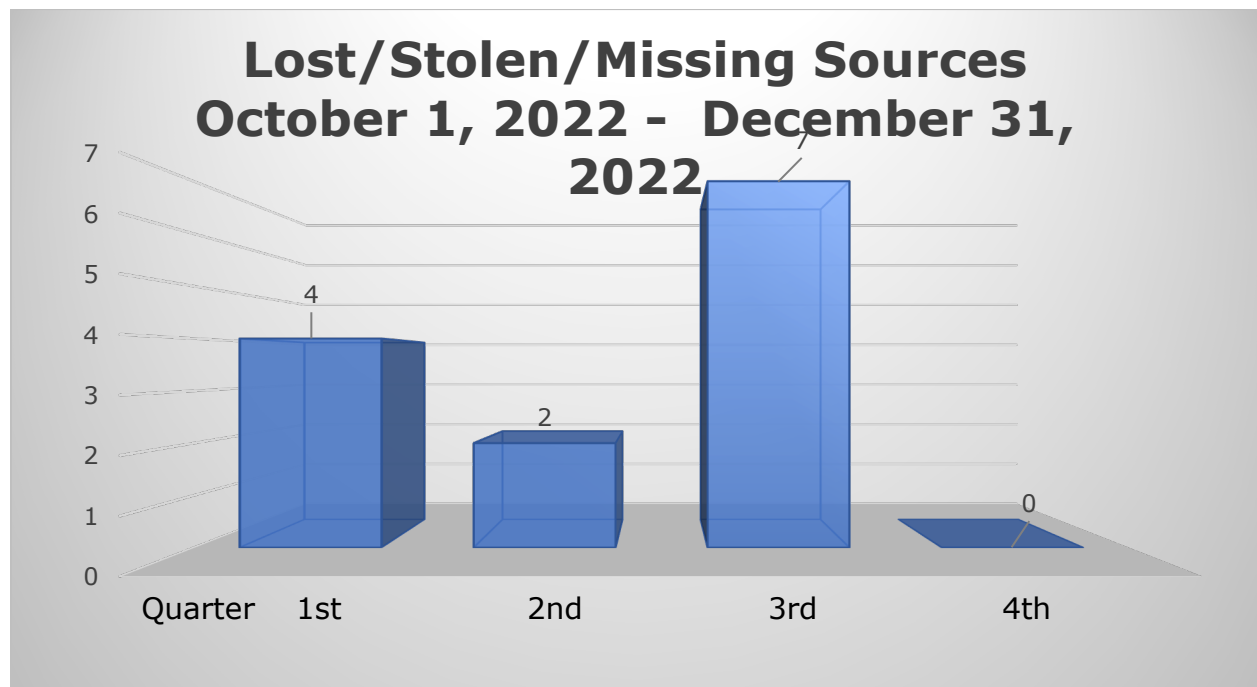
One ROSS personnel attended the FEMA Radiological Accident Assessment Course (RAAC) with DSHS personnel from March 27-31, 2023.

### **Staff Activities**

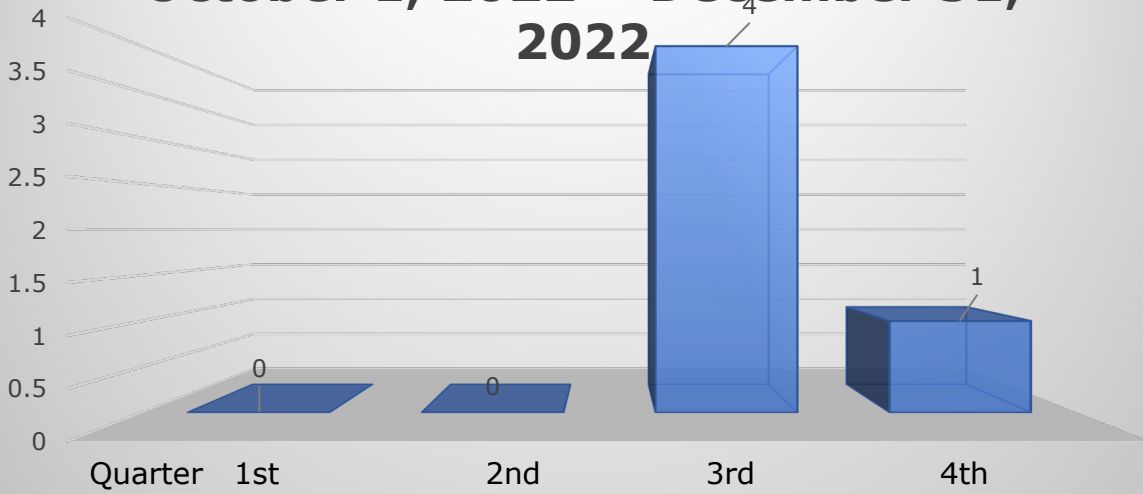
- Six Emergency Response employees attended the National Radiological Emergency Response (NREP) Conference in Indianapolis, IN from April 3-6, 2023.

### **Incident Investigations**

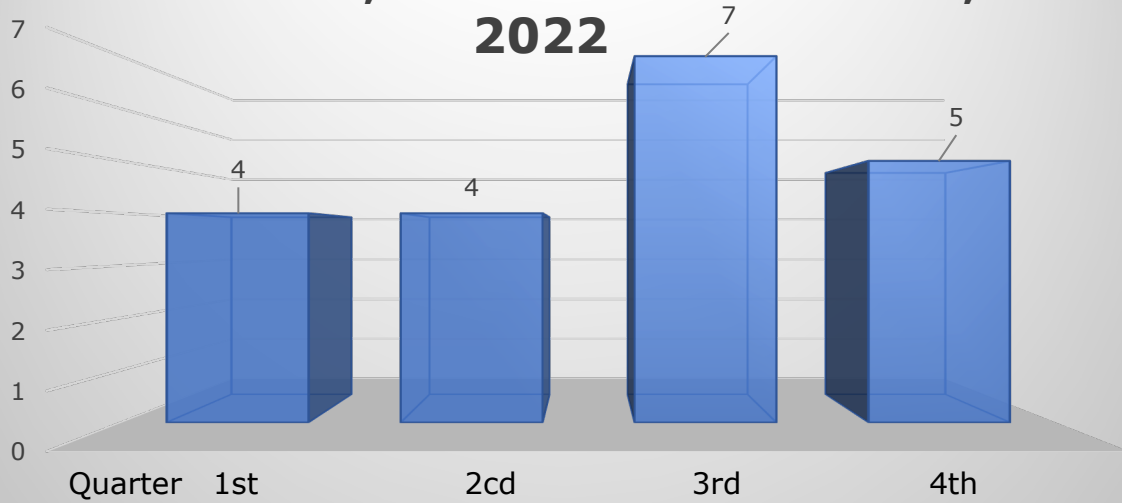
The graphs below reflect the numbers and categories of incidents received during this reporting period.

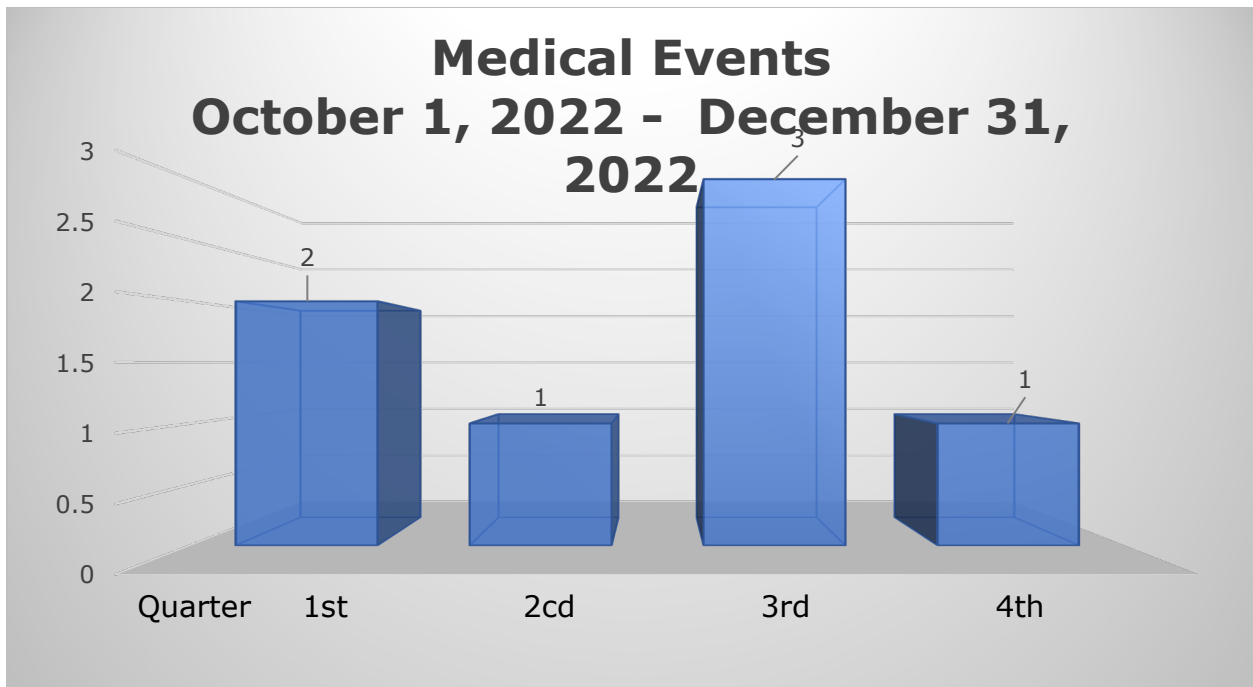


## Exposure Events October 1, 2022 - December 31, 2022



## Equipment Events October 1, 2022 - December 31, 2022





#### **Medical Event Summaries:**

November 23, 2022 - On November 23, 2022, the Department was notified of a medical incident involving yttrium-90 Sir-Spheres microspheres. A procedure was performed on November 22, 2022, with an intended activity of 13.4 mCi to be administered to a tumor within the patient's liver. After the procedure, it was determined that only 8.26 mCi, or 61.6% of the intended activity, had actually been delivered. The rest of the microspheres were determined to still be in the Sir-Sphere delivery system and not contaminating the room or towels. Both the prescribing physician and the patient were notified within 24 hours. Licensee reports that this incident did not cause an immediate harmful effect and does not know if there will be a long-term effect. The patient did not intervene in the procedure.

The cause is not known, but a survey of the assembly revealed that most of the spheres were still in the catheter. The licensee reported that they did not deviate from the Sir-Sphere procedure. The Sir-Sphere assembly was used without any substitution of parts. The catheter used was not part of the Sir-Sphere assembly but was considered standard. The manufacturer suggested the cause might be a premature air phase. Licensee reports that re-education of authorized users will be performed. No violations were cited. File Closed.