

Docket File Information
SAFETY INSPECTION REPORT AND COMPLIANCE INSPECTION

1. LICENSEE/LOCATION INSPECTED: Mercy Hospital 1500 East Sherman Blvd. Muskegon, MI 49444 REPORT NUMBER(S) 2014-001	2. NRC/REGIONAL OFFICE Region III U. S. Nuclear Regulatory Commission 2443 Warrenville Road, Suite 210 Lisle, IL 60532-4352
---	---

3. DOCKET NUMBER(S) 030-02016	4. LICENSE NUMBER(S) 21-02187-01	5. DATE(S) OF INSPECTION December 2, 2014
--------------------------------------	---	--

6. INSPECTION PROCEDURES USED 87131, 87132	7. INSPECTION FOCUS AREAS All
---	--------------------------------------

SUPPLEMENTAL INSPECTION INFORMATION

1. PROGRAM CODE(S) 02230	2. PRIORITY 2	3. LICENSEE CONTACT Jennifer H. Fisher, MS - RSO	4. TELEPHONE NUMBER (231) 672-2011
---------------------------------	----------------------	---	---

Main Office Inspection Next Inspection Date: December 2016

Field Office Inspection 1440 East Sherman Blvd, 1700 Clinton St.

Temporary Job Site Inspection _____

PROGRAM SCOPE

This was a routine inspection of a local healthcare system authorized to use byproduct material under 10 CFR 35.100, 200, 300, 400, and 600 between three locations in Muskegon, Michigan. At the time of the inspection, the licensee performed a full spectrum of diagnostic nuclear medicine studies at its main facility and at the Clinton Street location. The licensee performed therapeutic administrations of radiopharmaceuticals, including two courses of Ra-223 Xofigo therapies to date, primarily at the Clinton Street location. The licensee's radiation oncology department performed eight gynecological HDR treatments and four prostate seed implants to date in 2014. The licensee retained the services of a medical physics consultant to perform quarterly audits of each nuclear medicine department. The licensee also maintained a quarterly radiation safety committee.

PERFORMANCE OBSERVATIONS

The inspector toured the nuclear medicine departments at the main facility and at the Clinton street location to evaluate the licensee's measures for materials security, hazard communication and exposure control. The inspector observed the preparation and administration of two bone scans, one stress test and one GI bleed using Tc-99m, as well as one uptake scan using I-123. The inspector conducted independent and confirmatory surveys, and found no residual contamination or exposures to members of public in excess of regulatory limits. The technologists on staff demonstrated implementation of procedures for package receipt, administration of I-131 and Ra-223 therapies including patient release evaluation, area surveys and waste handling. The licensee also demonstrated HDR daily checks and brachytherapy treatment planning and verification. Through these demonstrations and other discussions, the licensee's staff demonstrated adequate knowledge of radiation protection principles, licensee procedures and NRC requirements.

The inspector reviewed the licensee's records for the administration of byproduct material requiring a written directive, including several I-131 and Ra-223 therapies, as well as a selection of HDR and LDR brachytherapy treatments performed since the last inspection. The inspector also reviewed a selection of nuclear medicine records, dosimetry, quarterly audits and RSC meeting minutes.

No violations of NRC requirements were identified as a result of this inspection.