



**UNITED STATES
NUCLEAR REGULATORY COMMISSION**

REGION III
2443 WARRENVILLE ROAD, SUITE 210
LISLE, ILLINOIS 60532-4352

April 8, 2011

Dolph Martel Denny, M.D.
Radiation Safety Officer
River Cities Cardiology
1713 East 10th Street
Jeffersonville, IN 47130

**SUBJECT: NRC ROUTINE INSPECTION REPORT NO. 030-33227/11-01(DNMS) –
RIVER CITIES CARDIOLOGY**

Dear Dr. Denny:

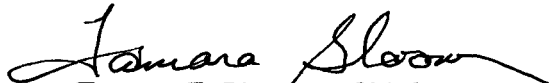
On March 21, 2011, a U.S. Nuclear Regulatory Commission (NRC) inspector conducted an inspection at the River Cities Cardiology facility in Jeffersonville, Indiana. The inspection identified two violations that were provided to you at the close of the inspection on an NRC Form 591M.

Please disregard and dispose of the NRC Form 591M dated March 21, 2011. Enclosed is a revised NRC Form 591M, "Safety Inspection Report and Compliance Inspection," Parts 1 and 2, issued to License No. 13-26510-01. The two violations are correctly represented on this revised Form 591M.

Please print your name and title, sign, and date the form in the line labeled "Licensee's Representative" indicating your agreement with the corrective actions for the violations, and fax the signed form to 630-515-1259.

In accordance with Title 10 of the Code of Federal Regulations (CFR) 2.390 of the NRC's "Rules of Practice," a copy of this letter, its enclosure, and the signed copy of the report will be made available electronically for public inspection in the NRC Public Document Room or from the NRC's Agencywide Documents Access and Management System (ADAMS), accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html>.

Sincerely,


Tamara E. Bloomer, Chief
Materials Inspection Branch
Division of Nuclear Materials Safety

Docket No.030-33227
License No. 13-26510-01

Enclosure: NRC Form 591M, Parts 1 and 2

Dolph Martel Denny, M.D.
Radiation Safety Officer
River Cities Cardiology
1713 East 10th Street
Jeffersonville, IN 47130

SUBJECT: NRC ROUTINE INSPECTION REPORT NO. 03033227/11-01(DNMS) –
RIVER CITIES CARDIOLOGY

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Sincerely,
/RA/

Tamara E. Bloomer, Chief
Materials Inspection Branch
Division of Nuclear Materials Safety

Docket No.030-33227
License No. 13-26510-01
Enclosure: NRC Form 591M, Parts 1 and 2

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DOCUMENT NAME: IR 030-33227/11-01 River Cities Cardiology-Corrected Copy
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OFFICE	RIII DNMS	RIII DNMS	RIII	RIII
NAME	GMWarren:rj TEB for	TEBloomer TEB		
DATE	04/08/11	04/08/11		

OFFICIAL RECORD COPY

(06-2010)

10 CFR 2.201

SAFETY INSPECTION REPORT AND COMPLIANCE INSPECTION

1. LICENSEE/LOCATION INSPECTED:

River Cities Cardiology
1713 East 10th Street
Jeffersonville, Indiana 47130

REPORT NUMBER(S): 11-01

2. NRC/REGIONAL OFFICE

U.S. Nuclear Regulatory Commission, Region III
2443 Warrenville Road, Suite 210
Lisle, Illinois 60532

3. DOCKET NUMBER(S)

030-33227

4. LICENSEE NUMBER(S)

13-26510-01

5. DATE(S) OF INSPECTION

March 21, 2011

LICENSEE:

The inspection was an examination of the activities conducted under your license as they relate to radiation safety and to compliance with the Nuclear Regulatory Commission (NRC) rules and regulations and the conditions of your license. The inspection consisted of selective examinations of procedures and representative records, interviews with personnel, and observations by the inspector. The inspection findings are as follows:

☐

1. Based on the inspection findings, no violations were identified.

☐

2. Previous violation(s) closed.

☐

3. The violation(s), specifically described to you by the inspector as non-cited violations, are not being cited because they were self-identified, non-repetitive, and corrective action was or is being taken, and the remaining criteria in the NRC Enforcement Policy, NUREG-1600, to exercise discretion, were satisfied

_____ Non-cited violation(s) were discussed involving the following requirement(s):

☒

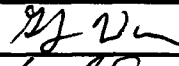

4. During this inspection certain of your activities, as described below and/or attached, were in violation of NRC requirements and are being cited. This form is a NOTICE OF VIOLATION, which may be subject to posting in accordance with 10 CFR 19.11

- A. Title 10 of the Code of Federal Regulations (10 CFR), Section 20.1802, requires that the licensee control and maintain constant surveillance of licensed material that is in a controlled or unrestricted area and that is not in storage. Contrary to the above, on March 21, 2011, the licensee failed to maintain constant surveillance of approximately 5 millicuries (mCi) of cobalt-57 and 7 mCi of thallium-201 at a temporary job site at 1804 E. 10th St., Jeffersonville, Indiana. As corrective action, the licensee committed to securing all materials at temporary job sites in the licensee's vehicle whenever such materials are not under direct surveillance, and licensee mobile staff will be trained on this requirement.

(see continuation page)

Statement of Corrective Actions

I hereby state that, within 30 days, the actions described by me to the inspector will be taken to correct the violations identified. This statement of corrective actions is made in accordance with the requirements of 10 CFR 2.201 (corrective steps already taken, corrective steps which will be taken, date when full compliance will be achieved). I understand that no further written response to NRC will be required, unless specifically requested.

Title	Printed Name	Signature	Date
LICENSEE'S REPRESENTATIVE			
NRC INSPECTOR	Geoffrey M. Warren		4/7/11
Branch Chief	Tamara E. Bloomer		4/7/11

NRC FORM 591M PART 2
(06-2010)
10 CFR 2.201

U.S. NUCLEAR REGULATORY COMMISSION

SAFETY INSPECTION REPORT AND COMPLIANCE INSPECTION

1. LICENSEE/LOCATION INSPECTED:

River Cities Cardiology
Jeffersonville, IN
REPORT NUMBER(S) 11-01

2. NRC/REGIONAL OFFICE

U.S. Nuclear Regulatory Commission, Region III
2443 Warrenville Road, Suite 210
Lisle, Illinois 60532

3. DOCKET NUMBER(S)
030-33227

4. LICENSEE NUMBER(S)
13-26510-01

5. DATE(S) OF INSPECTION
March 21, 2011

(Continued)

- B. 10 CFR 35.60(b) requires, in part, that the licensee calibrate instrumentation used to measure the activity of unsealed byproduct material before it is administered to a patient in accordance with nationally recognized standards or the manufacturer's instructions. Licensee personnel stated that the dose calibrator is calibrated in accordance with manufacturer instructions. The instructions for the licensee's dose calibrator, a Capintec, Inc., CRC-15-R, require that constancy tests be done each working day prior to measuring any samples which will be administered to patients. Contrary to the above, on March 3, 7, 10, 11, 14, and 15, 2011, the licensee failed to perform constancy tests prior to measuring patient doses. As corrective action, the licensee will post a reminder to perform constancy daily and will re-train nuclear medicine staff on this requirement.

Docket File Information
SAFETY INSPECTION REPORT AND COMPLIANCE INSPECTION

1. LICENSEE River Cities Cardiology Jeffersonville, IN REPORT NUMBER(S) 11-01	2. NRC/REGIONAL OFFICE U.S. Nuclear Regulatory Commission, Region III 2443 Warrenville Road, Suite 210 Lisle, Illinois 60532
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3. DOCKET NUMBER(S) 030-33227	4. LICENSEE NUMBER(S) 13-26510-01	5. DATE(S) OF INSPECTION March 21, 2011
6. INSPECTION PROCEDURES 87130	7. INSPECTION FOCUS AREAS 03.01 – 03.08	

SUPPLEMENTAL INSPECTION INFORMATION

1. PROGRAM 02220	2. PRIORITY 3	3. LICENSEE CONTACT Dolph Martel Denny, M.D., RSO	4. TELEPHONE NUMBER 812-282-1617
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☒ Main Office Inspection

Next Inspection Date: March 2014

☐ Field Office Inspection

☐ Temporary Job Site Inspection

PROGRAM SCOPE

The licensee was a medical facility located in Jeffersonville, Indiana, with authorization to use byproduct materials in Section 35.200. Licensed activities were conducted at the location indicated on the license and at temporary job sites. At the time of the inspection, the licensee performed mobile nuclear medicine services at 1084 E. 10th Street in Jeffersonville IN on Mondays, as well as at two sites in Kentucky on Tuesdays and Wednesdays under a State of Kentucky license. A portable camera was used at the mobile sites. Doses were received at the main site and transported to the temporary site in Indiana. The nuclear medicine department was staffed with one full-time nuclear medicine technologist, and a second technologist worked at the mobile sites. The licensee's nuclear medicine staff typically administered 50 cardiac doses monthly at the permanent site and 15 doses monthly at the Indiana mobile sites. The diagnostic procedures were exclusively cardiac studies using thallium-201 unit doses, received as needed from a licensed nuclear pharmacy. All waste was either held for decay-in-storage (DIS) or returned to the nuclear pharmacy.

Performance Observations

No diagnostic procedures were being performed during the inspection. Licensee personnel demonstrated dose calibrator constancy, package receipt, survey meter QC, daily and weekly contamination surveys, waste disposal, and administration of licensed material. The inspector noted no concerns with these procedures. Interviews with licensee personnel indicated adequate knowledge of radiation safety concepts and procedures. The inspector performed independent and confirmatory radiation measurements which indicated results consistent with licensee survey records and postings.

The main facility, which was new on the license since the previous inspection, was consistent with information provided in the amendment request adding the site.

Two violations were cited from this inspection, as described on Part 1 of this form. The root cause of the security violation was that the mobile technologist had not considered that when she left the mobile site for lunch, she needed to secure the flood source and unused doses in a licensee-controlled area such as the vehicle rather than leaving them in an unlocked room where non-licensee personnel could access them. The root cause of the dose calibrator constancy violation was that, since the licensee had moved to the current facility, the dose calibrator was no longer located in a position which would remind the technologists to do the constancy each morning.