

improving the health of the people in our communities by providing quality, compassionate care to everyone, every time

June 12, 2015

UNITED STATES NUCLEAR REGULATORY COMMISSION Region III, Materials Licensing Section 2443 Warrenville Road, Suite 210 Lisle. IL 60532-4352

Re: Amendment to license No. 21-32431-01, Sparrow Ionia Hospital

Please remove the following address of use:

Sparrow Ionia Hospital 479 Lafayette Street Ionia, MI 48846

All sealed sources were transferred to the new hospital address at 3565 S. State Road Ionia, MI 48846. All radioactive waste was decayed in storage until at background exposure levels.

A copy of the closeout survey at 479 Lafayette Street, Ionia, MI 48846 is enclosed for your review.

The latest sealed source leak test results are also enclosed. There is no history of any leaking sources.

If you have any questions, please contact our radiology manager, Blain Pierce at 616-523-1354 or our consulting physicist, Dawn Edwards at dedwards@mpcphysics.com or 734-662-3197.

Sincerely,

VP level administrator Sparrow Ionia Hospital



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Closeout Survey

SPARROW IONIA HOSPITAL 479 Lafayette Street Ionia, MI 48846

Date Performed: 6-12-15

Performed By: Dawn M. Edwards, M.S.

Close out Nuclear Medicine camera room, hot lab and treadmill room

Wipe tests were analyzed with a Captus 600 Uptake Probe. The efficiency factor is 4.2 dpm/cpm and the MDA is 166 dpm. The action level for wipe tests was 1000 dpm/100 cm².

Surveys were performed using a Ludlum 14C survey meter, serial number 189124. The meter was last calibrated on 12-29-14. The range used was 0-0.2 mR/hr and the action level for exposure rate surveys was 0.1 mR/hr.

Visual Check

The room was checked to verify no radioactive materials remained. Only Tc-99m, Tl-201 and l-123 radiopharmaceuticals were used in these rooms. The last day of use of radioactive materials was June 9, 2015.

Radiation Level Survey

No area within the office demonstrated radiation levels in excess of the background reading of <u>0.02 mR/hr</u>.

Sparrow Ionia Hospital Closeout Survey – June 12, 2015

Removable Contamination

1 minute counts

Background 200 cpm, 0 dpm

Area Results in dpm

A diagram of the survey area is enclosed.

Wipe test results:

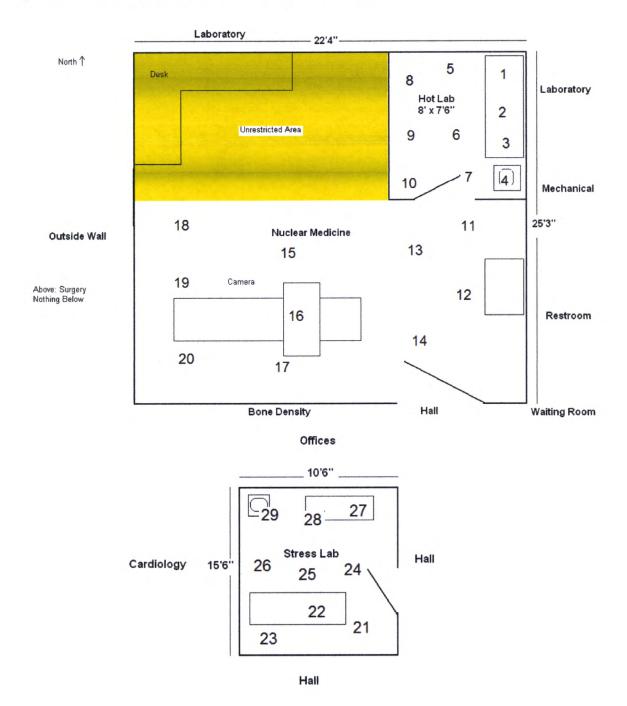
Area	Result		
1	0 dpm	16	54 dpm
2	0 dpm	17	0 dpm
3	40 dpm	18	25 dpm
4	156 dpm	19	0 dpm
5	105 dpm	20	20 dpm
6	0 dpm	21	0 dpm
7	200 dpm	22	10 dpm
8	65 dpm	23	140 dpm
9	390 dpm	24	0 dpm
10	0 dpm	25	62 dpm
11	325 dpm	26	333 dpm
12	0 dpm	27	30 dpm
13	0 dpm	28	200 dpm
14	232 dpm	29	65 dpm
15	65 dpm		·

Maximum removable contamination: <u>390</u> dpm

Conclusion

No removable contamination is present.

Survey Diagrams





Sealed Source Leak Test

Licensee: Sparrow Ionia Hospital Date: 06/12/15

Performed by: Dawn Edwards

Nuclide	Type	Calibration Activity	Calibration Date	on Location	M/N	S/N
Cs-137	Vial	205.6uCi	02/01/03	Hot Lab	RV137200U	934-100-10
Current Ad	ctivity: 15	4.52uCi				
Ba-133	Vial	284.9uCi	02/01/03	Hot Lab	RV133250U	934-96-10
Current Ad	ctivity: 12	6.23uCi				
Co-57	Flood	15mCi	03/29/13	Hot Lab	BM01-15	13058301
Current Ad	ctivity: 1	.918mCi				

Comment: The sources listed above were leak tested using a dry wipe technique and were found to have less than 0.005 uCi removable activity. The following Minimum Detectable Activities are based upon a background at the indicated value. Background was at or below these levels when the above tests were completed.

Well Counter: Captus 3000

Nuclide	MDA	Background
Cs-137	2.0 x 10 ⁻⁴ uCi	145 counts/1 min
Ba-133	8.8 x 10 ⁻⁵ uCi	204 counts/1 min
Co-57	1.7 x 10 ⁻⁵ uCi	53 counts/1 min

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3HIP TO: (616) 523-1557

BILL THIRD PARTY

United States Nuclear Regulatory Co Region III, Materials Licensing Sec 2443 Warrenville Road, Suite 210 Lisle, IL 60532







Ref# Invoice# PO# Dept#

> TUE - 23 JUN AA ** 2DAY **

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