

NRC FORM 313  
17-87  
10 CFR 30.32, 33, 34,  
35 and 40

U.S. NUCLEAR REGULATORY COMMISSION  
APPROVED BY OMB  
3180-0120  
Expires 6-30-90

## APPLICATION FOR MATERIAL LICENSE

INSTRUCTIONS: SEE THE APPROPRIATE LICENSE APPLICATION GUIDE FOR DETAILED INSTRUCTIONS FOR COMPLETING APPLICATION. SEND TWO COPIES OF THE ENTIRE COMPLETED APPLICATION TO THE NRC OFFICE SPECIFIED BELOW.

### APPLICATIONS FOR DISTRIBUTION OF EXEMPT PRODUCTS FILE APPLICATIONS WITH:

U.S. NUCLEAR REGULATORY COMMISSION  
DIVISION OF FUEL CYCLE AND MATERIAL SAFETY, NMSS  
WASHINGTON, DC 20546

ALL OTHER PERSONS FILE APPLICATIONS AS FOLLOWS, IF YOU ARE LOCATED IN:

CONNECTICUT, DELAWARE, DISTRICT OF COLUMBIA, MAINE, MARYLAND, MASSACHUSETTS, NEW HAMPSHIRE, NEW JERSEY, NEW YORK, PENNSYLVANIA, RHODE ISLAND, OR VERMONT, SEND APPLICATIONS TO:

U.S. NUCLEAR REGULATORY COMMISSION, REGION I  
NUCLEAR MATERIALS SAFETY SECTION B  
631 PARK AVENUE  
KING OF PRUSSIA, PA 19406

ALABAMA, FLORIDA, GEORGIA, KENTUCKY, MISSISSIPPI, NORTH CAROLINA, PUERTO RICO, SOUTH CAROLINA, TENNESSEE, VIRGINIA, VIRGIN ISLANDS, OR WEST VIRGINIA, SEND APPLICATIONS TO:

U.S. NUCLEAR REGULATORY COMMISSION, REGION II  
NUCLEAR MATERIALS SAFETY SECTION  
131 MARIETTA STREET, SUITE 2800  
ATLANTA, GA 30333

### IF YOU ARE LOCATED IN:

ILLINOIS, INDIANA, IOWA, MICHIGAN, MINNESOTA, MISSOURI, OHIO, OR WISCONSIN, SEND APPLICATIONS TO:

U.S. NUCLEAR REGULATORY COMMISSION, REGION III  
MATERIALS LICENSING SECTION  
789 ROOSEVELT ROAD  
GLEN ELLYN, IL 60137

ARKANSAS, COLORADO, IDAHO, KANSAS, LOUISIANA, MONTANA, NEBRASKA, NEW MEXICO, NORTH DAKOTA, OKLAHOMA, SOUTH DAKOTA, TEXAS, UTAH, OR WYOMING, SEND APPLICATIONS TO:

U.S. NUCLEAR REGULATORY COMMISSION, REGION IV  
MATERIAL RADIATION PROTECTION SECTION  
611 RYAN PLAZA DRIVE, SUITE 1000  
ARLINGTON, TX 76011

ALASKA, ARIZONA, CALIFORNIA, HAWAII, NEVADA, OREGON, WASHINGTON, AND U.S. TERRITORIES AND POSSESSIONS IN THE PACIFIC, SEND APPLICATIONS TO:

U.S. NUCLEAR REGULATORY COMMISSION, REGION V  
NUCLEAR MATERIALS SAFETY SECTION  
1460 MARIA LANE, SUITE 210  
WALNUT CREEK, CA 94690

PERSONS LOCATED IN AGREEMENT STATES SEND APPLICATIONS TO THE U.S. NUCLEAR REGULATORY COMMISSION ONLY IF THEY WISH TO POSSESS AND USE LICENSED MATERIAL IN STATES SUBJECT TO U.S. NUCLEAR REGULATORY COMMISSION JURISDICTION.

1. THIS IS AN APPLICATION FOR (Check appropriate item):

☐ A. NEW LICENSE

☒ B. AMENDMENT TO LICENSE NUMBER 21-20416-01

☐ C. RENEWAL OF LICENSE NUMBER \_\_\_\_\_

2. NAME AND MAILING ADDRESS OF APPLICANT (Include Zip Code)

Basha Radiology  
1401 S. Washington Avenue  
Royal Oak, Michigan 48069

3. ADDRESS(ES) WHERE LICENSED MATERIAL WILL BE USED OR POSSESSED

SEE ENCLOSED

4. NAME OF PERSON TO BE CONTACTED ABOUT THIS APPLICATION

Colleen Brady, Consultant NMA/Mallinckrodt, Inc.

TELEPHONE NUMBER

(313)268-5300

SUBMIT ITEMS 5 THROUGH 11 ON 8 1/2 x 11" PAPER. THE TYPE AND SCOPE OF INFORMATION TO BE PROVIDED IS DESCRIBED IN THE LICENSE APPLICATION GUIDE.

5. RADIOACTIVE MATERIAL

a. Element and mass number, b. chemical and/or physical form, and c. maximum amount which will be possessed at any one time

6. PURPOSE(S) FOR WHICH LICENSED MATERIAL WILL BE USED

7. INDIVIDUAL(S) RESPONSIBLE FOR RADIATION SAFETY PROGRAM AND THEIR TRAINING AND EXPERIENCE

8. TRAINING FOR INDIVIDUALS WORKING IN OR FREQUENTING RESTRICTED AREAS

9. FACILITIES AND EQUIPMENT

10. RADIATION SAFETY PROGRAM

11. WASTE MANAGEMENT

12. LICENSEE FEES (See 10 CFR 170 and Section 170.31)

FEE CATEGORY 7C AMOUNT ENCLOSED \$120.00

13. CERTIFICATION (Must be completed by applicant) THE APPLICANT UNDERSTANDS THAT ALL STATEMENTS AND REPRESENTATIONS MADE IN THIS APPLICATION ARE BINDING UPON THE APPLICANT.

THE APPLICANT AND ANY OFFICIAL EXECUTING THIS CERTIFICATION ON BEHALF OF THE APPLICANT, NAMED IN ITEM 2, CERTIFY THAT THIS APPLICATION IS PREPARED IN CONFORMITY WITH TITLE 10, CODE OF FEDERAL REGULATIONS, PARTS 30, 32, 33, 34, 36, AND 40 AND THAT ALL INFORMATION CONTAINED HEREIN, IS TRUE AND CORRECT TO THE BEST OF THEIR KNOWLEDGE AND BELIEF.

WARNING: 18 U.S.C. SECTION 1001 ACT OF JUNE 25, 1948, 62 STAT. 749 MAKES IT A CRIMINAL OFFENSE TO MAKE A WILLFULLY FALSE STATEMENT OR REPRESENTATION TO ANY DEPARTMENT OR AGENCY OF THE UNITED STATES AS TO ANY MATTER WITHIN ITS JURISDICTION.

SIGNATURE—CERTIFYING OFFICER

TYPED/PRINTED NAME

TITLE

DATE

*X* *Y.M. BASHA, M.D.*

*X* *Y.M. BASHA, M.D.*

*X* *RADIATION SAFETY OFFICER*

*X* *6/27/88*

8905080345 880809

REG3 LIC30

21-20416-01

PNU

FOR NRC USE ONLY

TYPE OF FEE

FEE LOG

FEE CATEGORY

COMMENTS

APPROVED BY

AMOUNT RECEIVED

CHECK NUMBER

CONTROL NO. 85697

REGION III

DATE

ITEM #3

RE: NRC License #21-20416-01

The purposes of this application are as follows:

- 1) We wish to delete the 5210 Lapeer Road, Burton, Michigan location from the license. All materials at this location have been transferred to the 5200 Lapeer Road, Burton, Michigan facility of the same license. A close-out survey of the facility was performed, and the results are enclosed for review.

The close-out survey information is being submitted in response to your letter dated April 15, 1988, which was enclosed with Amendment No. 11.

- 2) We wish to add two new facilities to the license as sites of use. One facility is located at 10951 Farmington Road, Livonia, Michigan. The other facility is located at 15115 Northline Road, Southgate, Michigan. A room diagram and an equipment list are attached for each location.

CONTROL NO. 85697

CLOSE-OUT SURVEY

Basha, M.D. Diagnostics  
5210 Lapeer Road  
Lapeer, Michigan 48509

Date Performed: June 15, 1988

Person Performing Survey: Colleen Brady, Consultant

Instruments Used: Bicon Surveyor 2000 S/N A693L  
Spectroscaler 4 S/N 20558

Survey Instrument Calibration Date: February 18, 1988

Background Readings: .01 mR/hr - 89 dpm

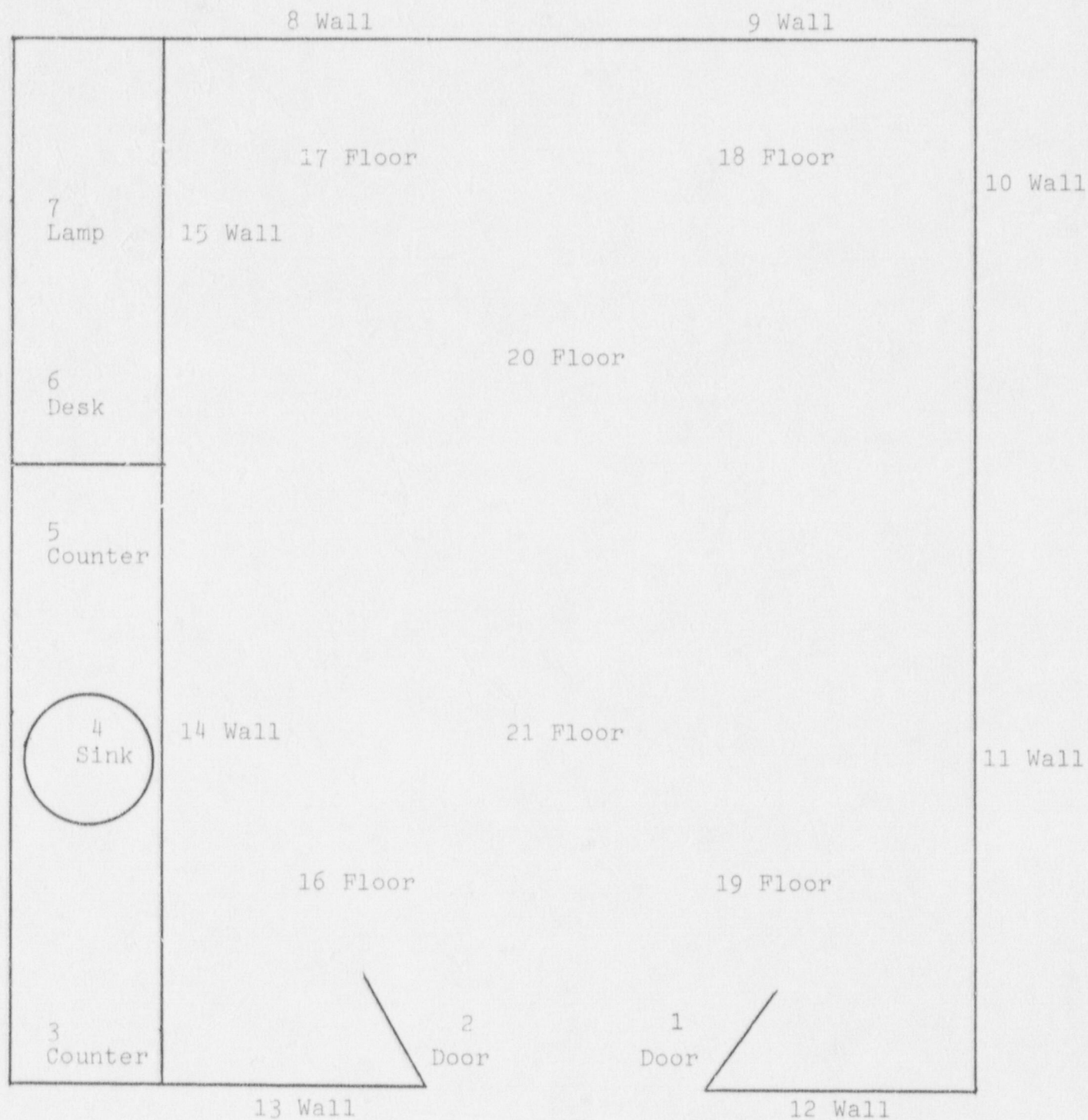
Survey corresponds with the enclosed room diagram:

	<u>mR/hr</u>	<u>Dpm</u>
1	.01	0
2	.01	24
3	.01	19
4	.01	42
5	.01	29
6	.01	29
7	.01	31
8	.01	11
9	.01	29
10	.01	24
11	.01	32
12	.01	32
13	.01	34
14	.01	16
15	.01	26
16	.01	34
17	.01	19
18	.01	23
19	.01	31
20	.01	26
21	.01	41



ROOM DIAGRAM

5210 Lapeer Road  
Burton, MI 48509



EQUIPMENT  
(Proposed list or equivalent)

1. Survey meters

a. Manufacturer's name and model number: Bicron Surveyor  
2000

Number of instruments available: 1

Minumum range: 0 mR/hr 0.2 mR/hr

Maximum range: 0 mR/hr 2000 mR/hr

2. Dose calibrator

Manufacturer's name and model number: Capintec CRC-7

Number of instruments available: 1

3. Instruments used for diagnostic procedures

Type of Instrument	Manufacturer's Name	Model No.
Scintillation Camera	Searle	Pho Gamma <u>V</u>

10951 Farmington Road  
Livonia, MI 48150

Item #9  
1 of 4 pages  
Prepared 6-24-88  
License: #21-20416-01

EQUIPMENT  
(Proposed list or equivalent)

1. Survey meters

a. Manufacturer's name and model number: Eberline E-520

Number of instruments available:

Minumum range: 0 mR/hr 0.2 mR/hr

Maximum range: 0 mR/hr 2000 mR/hr

2. Dose calibrator

Manufacturer's name and model number: Capintec CRC-5

Number of instruments available: 1

3. Instruments used for diagnostic procedures

Type of Instrument	Manufacturer's Name	Model No.
Scintillation Camera	Searle	LFOV

15115 Northline Road  
Southgate, Michigan 48195



# Facilities and Equipment

## Diagram

- ☒ Air Supply
- ☒ Air Exhaust
- Scanner
- Uptake/Well
- 1 Camera
- 2 Lockable Door
- 3 Receipt Area
- Generator
- 4 Kit Preparation
- 5 Isotope Storage
- 4 Dose Preparation
- 5 Waste Storage
- 6 Dose Calibrator
- Refrigerator

## Adjacent Areas

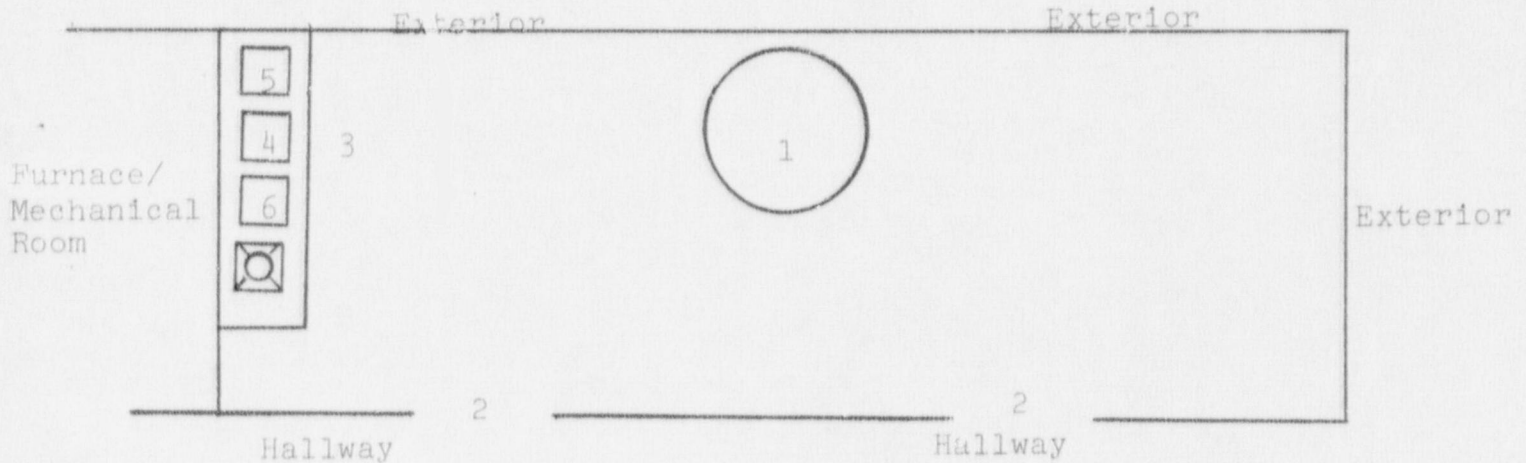

- ☒ Sink
- ☐ Lead Castle
- Lead Shielding

4 L-Shield  
 16" L x 18" W x 22" H x 3/4" T

5 Lead Shielding  
 8" L x 8" W x 8" H x 2" T

  L x   W x   H x   T

  L x   W x   H x   T



10951 Farmington Road  
 Livonia, MI 48150

ATT 9.1  
 3 of 4 pages  
 Prepared 6-24-88  
 License #21-20416-01

Scale: 1"=4'

CONTROL NO. 85697

# Facilities and Equipment

## Diagram

☒ Air Supply

☒ Air Exhaust

Scanner

Uptake/Well

1 Camera

2 Lockable Door

3 Receipt Area

Generator

4 Kit Preparation

5 Isotope Storage

4 Dose Preparation

5 Waste Storage

6 Dose Calibrator

Refrigerator

## Adjacent Areas

☒ Sink

☐ Lead Castle

Lead Shielding

4 L-Shield

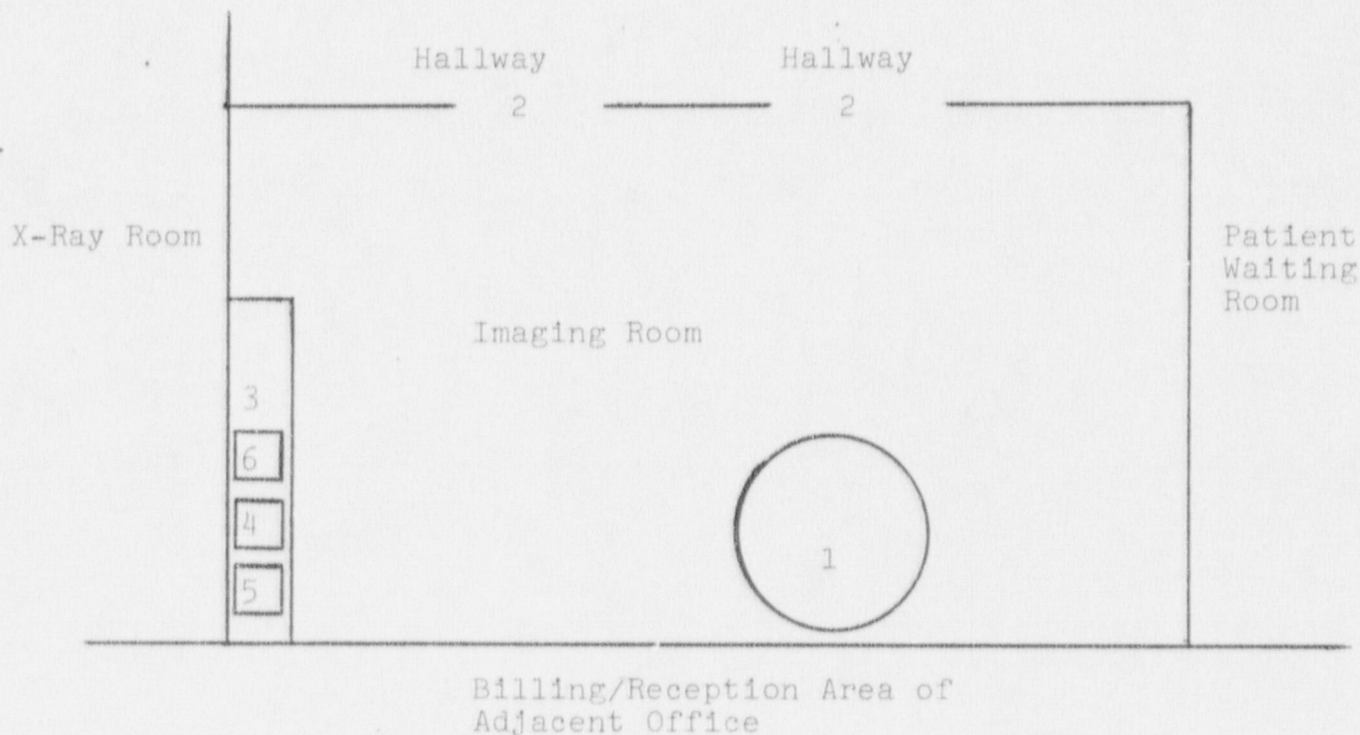
16" L x 18" W x 22" H x 1/2" T

5 Lead Shielding

8" L x 8" W x 8" H x 2" T

\_\_\_ L x \_\_\_ W x \_\_\_ H x \_\_\_ T

\_\_\_ L x \_\_\_ W x \_\_\_ H x \_\_\_ T



15115 Northline Road  
Southgate, MI 48195

ATT 9.1

4 of 4 pages

Prepared 6-24-88

License #21-20416-01

Scale: 1"-3'

CONTROL NO. 85697