

**Information Notice Number 11
(revised December 1997)**

For Florida Radiation Machine Registrants

Department of Health, Bureau of Radiation Control

RADIATION PROTECTION PROGRAM FOR VETERINARY REGISTRANTS

The Florida Administrative Code requires radiation machine registrants to develop, document and implement a radiation protection program (RPP). A properly developed and implemented RPP can minimize unnecessary radiation exposure to employees and the general public, help prevent either group from exceeding their legal limits on exposure to radiation, and document such an effort has been made by the registrant. The RPP requirement for veterinarians can be satisfied in one of the following ways:

I. Pre-approved Radiation Protection Program: Veterinary (see attachment).

The requirements for an RPP will have been met if:

- a) the conditions at the registrant's facility satisfy line items 1 through 12,
- b) the name of the person responsible for the radiation protection program is entered in line item 13,
- c) the dates the plan is in effect [Note: a plan is valid at most for one calendar year, it must be reviewed and dated in January of every year, see line item 10] i.e., the current month through December of the current year, are entered in line item 14,
- d) the facility name and x-ray machine registration number are entered at the bottom, and
- e) the form is signed and dated by the responsible party,

This plan does NOT have to be submitted for approval by the Radiation Machine Program office.

II. Alternate Radiation Protection Program (see attachment).

The alternate plan offers the registrant a structured set of options for developing an RPP. For each numbered step one and only one option must be selected. If the second choice in a step is selected, the required documentation must be attached to the plan. This plan and the required attachments MUST be submitted to the program office for review. Previously reviewed alternate radiation protection program do not need to be resubmitted for review unless changes are made.

III. Self-developed Radiation Protection Program.

The registrant may develop an RPP to fit their specific situation. The provisions of this RPP should address all requirements in the Florida Administrative Code. Self-developed programs MUST be submitted to the program office for review. Previously reviewed self-developed radiation protection program do not need to be resubmitted for review unless changes are made.

If you have questions or need guidance, please contact this office at:

Department of Health
Bureau of Radiation Control, Radiation Machine Section
4052 Bald Cypress Way, Bin C21, Tallahassee, FL 32399-1741
Phone: (850) 245-4888 Fax: (850) 617-6442
www.myFloridaEH.com/radiation

PRE-APPROVED RADIATION PROTECTION PROGRAM

VETERINARY

Note: Radiation Protection Programs are used to minimize unnecessary exposure to employees and the general public and help prevent either group from exceeding their legal limits on exposure to radiation. This program has been developed by the Bureau of Radiation Control to assist registrants in meeting Florida Administrative Code requirements. If this program is used, it does not need to be submitted for review.

The signature below attests this registrant has evaluated the following provisions and agrees they accurately describe the conditions present. All staff members involved in making radiographic exposures will be made aware of these provisions and held accountable for them.

1. Only protected and monitored staff are allowed in the x-ray room during radiographic exposures.
2. Minors never take radiographic exposures.
3. Declared Pregnant Women never take radiographic exposures or when a woman declares pregnancy in writing (including estimated conception date) they are provided with a monitoring device specifically for documenting fetal dose. The device will be worn at waist level and underneath any protective clothing.
4. Lead aprons, lead gloves and/or movable barriers are used when the operator is not positioned completely behind a fixed barrier during radiographic exposures.
5. Film badges (or other NVLAP certified personnel monitoring devices) are worn outside protective clothing during all examinations.
6. All personnel monitoring records will be kept until the registration is terminated.
7. Less than 100 radiographic exposures are made per week when averaged over a year or the time the facility is open if shorter.
8. The center of the radiation machine table is at least 2 feet from any wall.
9. Fluoroscopic exposures are not made.
10. The radiation protection program will be evaluated annually during the month of January for accuracy. An attached sheet will be used to document this review. Each review will include a date of review and the signature of the reviewer.
11. The radiation protection program will be re-evaluated when changes occur that could affect dose.
12. All radiation protection program(s) will be kept on file until the registration is terminated.
13. _____ is responsible for radiation protection.
14. The above provisions are true from _____ through December of _____.
(Month/Year) (Year)

Facility Name (print or type)

JR

X-ray Machine Registration Number

Signature of Person Responsible for Above Program

Date Signed

ALTERNATE RADIATION PROTECTION PROGRAM

Note: Radiation Protection Programs (RPPs) are used to minimize unnecessary exposure to radiation workers and the general public and help prevent either group from exceeding their legal limits on exposure to radiation. This program has been developed by the Bureau of Radiation Control to assist registrants in developing an RPP which meets the Florida Administrative Code requirements. This program and all required attachments must be submitted to the Bureau of Radiation Control, Radiation Machine Program for review.

The signature below attests this registrant has evaluated the following provisions. One option for each numbered section has been selected and accurately describes the conditions present at this facility. All staff members involved in making radiographic exposures will be made aware of these provisions and held accountable for following them.

RADIOGRAPHIC EXPOSURES

1. X-ray machine operators will remain completely behind a fixed barrier during all radiographic exposures.
 Written procedures are followed describing how aprons and movable barriers are used when operators are not positioned behind a fixed barrier during radiographic exposures. These procedures are attached and are part of this Alternate Plan. In addition, surveys, calculations or monitoring records are attached to document members of the public and occupationally exposed persons do not exceed dose limits when the operator is not completely behind a fixed barrier during radiographic exposures.
2. Patients are not held during radiographic exposures.
 Written procedures are followed describing how aprons and movable barriers are used when patients are held during radiographic exposures. These procedures are attached and are part of this Alternate Plan. In addition, holding logs or monitoring records are kept to document members of the public and occupationally exposed persons do not exceed dose limits when any person other than the patient is allowed in the x-ray room during radiographic exposures.
3. Only patients are allowed in the x-ray room during radiographic exposures.
 Written procedures are followed to assure that any person in the x-ray room during radiographic exposures is medically necessary. Written procedures are followed that describe how aprons and movable barriers are used when any person other than the patient is allowed in the x-ray room during radiographic exposures. These procedures are attached and are part of this Alternate Plan. In addition, surveys, calculations or monitoring records are attached to document members of the public and occupationally exposed persons do not exceed dose limits when patients are held during radiographic exposures.
4. Less than 100 radiographic exposures are made per week when averaged over a year or the portion of the year the facility is open for business.
 Surveys, calculations or monitoring records are attached to document members of the public do not exceed dose limits outside any radiographic x-ray room where 100 or more radiographic exposures are made per machine each week.

RADIOGRAPHIC EXPOSURES (continued)

5. _____ Any wall bucky or cassette stand is located on an outside wall or a wall with at least one sixteenth (1/16) inch of lead equivalent shielding.
_____ Surveys, calculations or monitoring records are attached to document members of the public do not exceed dose limits outside any radiographic x-ray room where the wall bucky or cassette stand is not located on an outside wall nor a wall with at least one sixteenth (1/16) inch lead equivalent shielding.
6. _____ The center of any radiation machine table is at least two (2) feet from any wall.
_____ Any wall less than two (2) feet from the center of the radiation machine table is either an outside wall or a wall with at least one thirty-second (1/32) inch lead equivalent shielding.
_____ Surveys, calculations or monitoring records are attached to document members of the public do not exceed dose limits outside any radiographic x-ray room where the center of the radiation machine table is not at least two (2) feet from any inside wall and the wall does not have at least one thirty-second (1/32) inch lead equivalent shielding.

FLUOROSCOPIC EXPOSURES (if applicable)

7. _____ Fluoroscopic machine operators remain completely behind a fixed barrier during all fluoroscopic exposures.
_____ Written procedures are followed describing how aprons and movable barriers are used when operators are not positioned behind a fixed barrier during fluoroscopic exposures. These procedures are attached and are part of the Alternate Plan. In addition, surveys, calculations or monitoring records are attached to document members of the public and occupationally exposed persons do not exceed dose limits when the operator is not positioned behind a fixed barrier during fluoroscopic exposures.
8. _____ Patients are not held during fluoroscopic exposures.
_____ Written procedures are followed that describe how aprons and movable barriers are used when patients are held during fluoroscopic exposures. These procedures are attached and are part of this Alternate Plan. In addition, holding logs or monitoring records are kept to document members of the public and occupationally exposed persons do not exceed dose limits when patients are held during fluoroscopic exposures.
9. _____ Only patients are allowed in the x-ray room during fluoroscopic exposures.
_____ Written procedures are followed to assure that any person in the x-ray room during fluoroscopic exposures is medically necessary. Written procedures are followed that describe how aprons and movable barriers are used when any person other than the patient is allowed in the x-ray room during fluoroscopic exposures. These procedures are attached and are part of this Alternate Plan. In addition, surveys, calculations or monitoring records are attached to document members of the public and occupationally exposed persons do not exceed dose limits when any person other than the patient is allowed in the x-ray room during radiographic exposures.

FLUOROSCOPIC EXPOSURES (continued)

10. _____ Fluoroscopic x-ray machines are operated less than fifteen (15) minutes per machine each week.
_____ Surveys, calculations or monitoring records are attached to document members of the public dose limits are not exceeded outside each fluoroscopic x-ray room where fluoroscopic x-ray machines are operated fifteen (15) or more minutes per machine each week.
11. _____ High level (>10 R/min) fluoroscopy is not used at this facility.
_____ Surveys, calculations or monitoring records are attached to document members of the public dose limits are not exceeded outside each room where high level fluoroscopy is used.

GENERAL REQUIREMENTS

12. _____ Minors never make radiographic and fluoroscopic exposures.
_____ Written procedures are followed when minors make radiographic or fluoroscopic exposures. These procedures are attached and are part of this Alternate Plan.
13. _____ Declared Pregnant Women never make radiographic and fluoroscopic exposures.
_____ When a woman declares her pregnancy or intent to become pregnant in writing (this statement should include estimated conception date) they are provided with a monitoring device specifically for documenting fetal dose. The device will be worn at waist level and underneath any protective clothing.
14. The provisions of this radiation protection program will be evaluated annually during the month of January to ensure they accurately describe the conditions expected in the coming year. An attached sheet will be used to document this review. Each review will include a date of review, the signature of the reviewer, and the statement the provisions are true for the coming January through December. If the program needs to be changed, the revisions will be sent to the Bureau of Radiation Control, Radiation Machine Program for review.
15. This radiation protection program will be re-evaluated when changes occur that could affect dose to radiation workers or the general public.
16. All radiation protection program(s) will be kept on file until the registration is terminated.
17. _____ is responsible for radiation protection.
18. The above provisions are true from _____ through December of _____.
(Month/Year) (Year)

Facility Name (print or type)

JR

X-ray Machine Registration Number

Signature of Person Responsible for Above Program

Date Signed