

# Boone Hospital Center

June 15, 2015

1600 East Broadway  
Columbia, Missouri 65201  
Phone: 573-815-8000

Vered A. Shaffer, License Reviewer  
US Nuclear Regulatory Commission  
Materials Licensing Section -Region III  
2443 Warrenville Road Suite 210  
Lisle, IL 60532-4352

Docket Number: 030-02304  
Control Number: 585900

RE: Boone Hospital Center  
Additional Information requested for renewal of Materials License No. 24-01565-01

Dear Ms. Shaffer,

In response to your request, I am providing the additional information necessary to process our renewal application.


- 1) Please find a current "Delegation of Authority" letter attached.
- 2) The PET holding room (OPG409 on the submitted department floor plan) is occupied by only one patient at a time. The maximum injected activity of F-18FDG for our PET patients is 12.0 mCi. The room is surrounded by a restricted hallway to the North and East, an equipment bay to the West and a soiled linen room and staff toilet to the South. Below the PET holding room is ground (fill). Above the room (15' ceiling and 4" of concrete) is our infusion and treatment center. I performed a survey of areas adjacent to the PET holding room on June 8<sup>th</sup>, 2015 at 9:30 a.m. (using a Ludlum Model 3 GM Survey meter SN # 163350, last calibration date 1-20-2016) The survey was conducted when the room was occupied by a patient 10 minutes post FDG injection. The results of the survey (below) confirm that dose levels are well below regulatory limits for individuals outside of the room:

Center of North Hallway	.10 mR/hr
Center of East Hallway	.15 mR/hr
Center of Staff Restroom	.15 mR/hr
Infusion Treatment room	.03 mR/hr

The soiled linen room and equipment bay were not surveyed since they would not be occupied by an individual.
- 3) The following emergency response equipment is immediately accessible in the event that a seed is dislodged, damaged or lost during a manual brachytherapy procedure:  
Gloves, long handled forceps, tweezers, lead container, low energy gamma scintillation survey meter, "Caution Radioactive Material" labels.

I appreciate your time in reviewing our application. Please feel free to contact me at 573-815-3729.

Respectfully,

  
Liesje Myers

Radiation Safety Officer-Boone Hospital Center

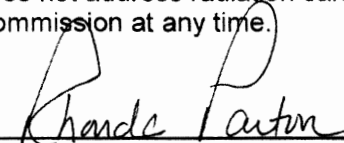
# Boone Hospital Center

---

1600 East Broadway  
Columbia, Missouri 65201  
Phone: 573-815-8000

To: Liesje Myers, Radiation Safety Officer  
From: Boone Hospital Center Executive Management and Radiation Safety Committee  
Subject: Delegation of Authority

You, Liesje Myers, have been appointed Radiation Safety Officer and are responsible for ensuring the safe use of radiation. You are responsible for managing the Radiation Protection Program; identifying radiation protection problems; initiating, recommending, or providing corrective actions; verifying implementation of corrective actions; stopping unsafe activities; and ensuring compliance with regulations. You are hereby delegated the authority necessary to meet those responsibilities, including prohibiting the use of byproduct material by employees who do not meet the necessary requirements and shutting down operations where justified to maintain radiation safety. You are required to notify management if staff does not cooperate and does not address radiation safety issues. In addition, you are free to raise issues with the Nuclear Regulatory Commission at any time.

  
\_\_\_\_\_  
Signature of Management Representative

6/15/2015  
Date

I accept the above responsibilities,

  
\_\_\_\_\_  
Signature of Radiation Safety Officer

6/15/2015  
Date

## Shaffer, Vered

---

**From:** Liesje Myers <ldotson@bjc.org>  
**Sent:** Wednesday, June 17, 2015 1:45 PM  
**To:** Shaffer, Vered  
**Subject:** Re: Additional Information Request for NRC License for Boone Hospital Center  
**Attachments:** Request for additional information.pdf

Vered,  
I hope you enjoyed your time off! I am attaching a cover letter with the additional information you requested. If you need anything else from me, let me know- and I will get on it right away.  
Thank You,  
Liesje Myers

Liesje Myers  
Radiation Safety Officer  
Boone Hospital Center  
Columbia, Missouri  
(573) 815-3729

>>> "Shaffer, Vered" <Vered.Shaffer@nrc.gov> 6/4/2015 3:01 PM >>>  
Ms. Myers,

Thank you for speaking with me today regarding your license renewal for Boone Hospital Center.

Attached is the conversation record which details what we spoke about and the additional information that I need in order to continue with the review of the application. I have requested the information by June 26th but if you can get it to me sooner that would be great.

If you have any questions, please feel free to contact me.

Vered

Vered Anzenberg Shaffer, Ph.D.  
Health Physicist

U.S. Nuclear Regulatory Commission, Region III  
Division of Nuclear Materials Safety  
Materials Licensing Branch  
vered.shaffer@nrc.gov  
630-829-9862 (Office)  
630-515-1078 (Fax)