From: Gaskins, Farrah

To: <a href="mailto:shahadhar.m.mohapatra@medstar.net">shahadhar.m.mohapatra@medstar.net</a>
Subject: Request for Additional Information
Date: Tuesday, October 21, 2014 4:14:00 PM

## Dear Dr. Mohapatra,

This is in reference to your letter dated August 11, 2014 requesting to amend Nuclear Regulatory Commission License No. 08-03604-03. In order to continue our review, we need the following additional information:

- Regulations set forth in 10 CFR 20.1501 state, in part, that each licensee shall
  make or cause to be made surveys of areas, including the subsurface that are
  reasonable under the circumstances to evaluate the potential radiological hazards
  of the radiation levels and the residual radioactivity detected.
  - a. Your letter states that "Final close-out radiation surveys of the areas in this building were performed where byproduct materials were used." Please explain your survey methods. Specifically, describe how you performed direct scans using the survey meter.
  - b. Your data of wipe test results does not specify your liquid scintillation counting methods. Please describe how your wipes were counted, specifically, describe the analysis results. What channels were the wipes counted for the given results? Were all samples counted on the same channel or were different channels used for Hydrogen 3 and Carbon 14.
- The survey data you submitted for Rooms 205 and 225 appeared to be surveys of certain items and the surrounding areas. Building surfaces do not appear to be sufficiently surveyed in these rooms. Please perform additional surveys in the room for tritium contamination or describe how you surveyed building surfaces adequately.
- 3. In your letter, you mention that calibration sources for the Gamma Counter were moved to room G-122 and are under radiation safety inventory. Please confirm if the calibration sources were used under the general license or are specifically licensed sealed sources. If specifically licensed, please confirm that the sources have been removed from the George Hyman Memorial Research Building and submit confirmation that the sources were not leaking.
- 4. You stated that sealed Strontium 90 sources have been transferred to the Brachytherapy storage room in the Cath Lab. Please confirm that this storage location is not in the George Hyman Memorial Research Building. Also please either submit leak tests or confirm that these sealed sources are not leaking.
- Please note that records of disposal by release into sanitary sewerage should be maintained until your license is terminated in accordance with 10 CF20.2108 (b).
- 6. You submitted a record indicating disposal of licensed material through sanitary

sewerage, please state if there was a designated sink for release of radioactive material through sanitary sewerage. If more than one sink was used, please confirm if the record includes the cumulative amount from all sources.

Current NRC regulations and guidance are included on the NRC's website at www.nrc.gov; select Nuclear Materials; Med, Ind, & Academic Uses; then Licensee Toolkits, see our toolkit index page. You may also obtain these documents by contacting the Government Printing Office (GPO) toll-free at 1-866-512-1800. The GPO is open from 8:00 a.m. to 5:30 p.m. EST, Monday through Friday (except Federal holidays).

We will continue our review upon receipt of this information. Please reply to my attention at the Region I Office and refer to Mail Control No. 584610. Information submitted must be signed, by a management representative, and either faxed to 610-337-5269 or attached electronically as a PDF. If you have any technical questions regarding this deficiency letter, please call me at (610) 337-5143 or Dennis Lawyer at (610) 337-5366.

In order to continue prompt review of your application, we request that you submit your response to this letter within **15 calendar days** from the date of this email.

Farrah C. Gaskins

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