

Conventional & Specialised NM: Miscellaneous

Tuesday October 18, 2011 16:00h - 16:30h

Room: NIA - Poster Exhibition Area

P689

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Novel Ideas to Reduce Radioiodine Contamination ¹³¹I Ablation rooms

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Purpose: This investigation was performed to determine the suitability of new products for the decontamination of ¹³¹I ablation treatment rooms. Expected benefits: reduced levels of contamination during the patients stay, reduced the time the room is unavailable for patient use and the lessened dose rates to staff. The two new products being introduced are *Packexe* disposable plastic flooring and *Bind it* a new decontamination product. *Bind it* is available as a concentrated decontamination solution specifically designed for Iodine based products, and as hand soap for patient use during their stay and for staff if required. Method: The permeability of the *Packexe* was tested by comparing dose measurements of the flooring before removal of *Packexe* and after on a linoleum tile. Materials mimicking those found in the patient's room were contaminated with ¹³¹I and decontaminated with *Bind it* (10:1 concentration) and the product currently used in the department. Surface dose rates were compared before and after decontamination. Initial Results: The *Packexe* covered tile measured 70 counts per second (cps) above background; after *Packexe* was removed 30cps were detected, reducing contamination by approximately 60%. Ceramic tiles which were pre-sprayed with bind-it before contaminating with I131 showed a reduction in counts per second (cps) of 70% when using bind-it and 68% when using our current product. Without pre-spraying with the decontaminant, bind-it reduced cps by 73% and our current product reduced counts by 56%. Decontaminating a linoleum tile with bind it gave a 66% difference in cps and 22% with our current product. Initial results for decontamination products indicate that pre-spraying the sink and toilet during room preparation with bind-it would increase the efficiency of the decontamination process. Discussion: Initial results show a vast improvement in the level, ease and speed of decontamination.