Knowledge, attitude and practice of nuclear medicine staff towards radiation protection

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(Received 21 January 2018, Revised 10 June 2018, Accepted 14 June 2018)

ABSTRACT

Introduction: Ionizing radiation in medical imaging is one of the dominant sources of exposure, and correct knowledge of radiation protection, affects staff safety behaviors during procedures. This study aimed to assess the radiation protection Knowledge, Attitude and Practice (KAP) amongst nuclear medicine centers' staff in Iran.

Methods: To evaluate the level of radiation protection KAP, a validated questionnaire was distributed between 243 participants considering demographic characteristics in different geographical regions in Iran from 2014 to 2015.

Results: There were statistically significant differences in the level of nuclear medicine staff KAP radiation protection with gender (p<0.05), practice age KAP level and radiation protection (p<0.05) among nuclear medicine staff with different working regions and healthcare market. There is no significant connection between educational age and KAP level of radiation protection of nuclear medicine department staff (p>0.05).

Conclusion: Our findings have shown that radiation protection KAP level of nuclear medicine staff was inadequate in some regions. This might be due to the lack of continuous training and absence of adequate safety knowledge about ionizing radiation. It seems that awareness about radiation protection rules and regulations, along with continuous training and preparations has a direct effect on radiation practice leading to enhanced KAP of staff in nuclear medicine centers.

Key words: Knowledge; Attitude; Practice; KAP; Radiation protection; Nuclear medicine staff

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