Mini Course 3  
Technologists Committee  
Accessible on-demand at any time

Session Title  
Case Studies (Conventional Nuclear Medicine)

Chairperson  
Rie Strand Olsen (Copenhagen, Denmark)

Programme  
29 min Claudiu Pestean (Cluj Napoca, Romania): Interesting Cases in Conventional Nuclear Medicine  
29 min Marina Gazzilli (Brescia, Italy): How Clinic Affects the Image and its Interpretation  
2 min Session Summary by Chairperson

Educational Objectives  
1. To raise awareness of artefacts and pitfalls during image acquisition and processing.  
2. Understand the biological uptake and tracer mechanism.  
3. Recognize the different types of artefacts and pitfalls.  
4. Understand the importance of proper preparation and injection.  
5. Correlate anatomical variants and patient anamnesis to possible artefacts and/or pitfalls or pathology.  
6. Recognize the importance of quality control

Summary  
In the nuclear medicine community, great enthusiasm was generated by the introduction of the positron emission tomography (PET) combined with computed tomography (CT). In some forecasted future scenario, due to the decrease of the cost and the increase of the PET radiopharmaceuticals availability, the PET/CT should have made obsolete the conventional nuclear medicine. Despite this forecast, two decades after advent of the PET/CT, the planar imaging (PI) and the Single-photon emission computed tomography (SPECT) are still demonstrating their great diagnostic value and they are still object of technological research.  
The growing developments and its diagnostic accuracy of the PI and SPECT/CT make this minicourse a valuable tool to improve the knowledge of the conventional nuclear medicine imaging.  
This mini course is aimed to depict a spectrum of an interesting cases in conventional nuclear medicine. The first talk will describe the wide range of technical cases that the nuclear medicine technologist (NMT) could encounter during his daily routine. The second talk defines how clinic affects the image quality and its interpretation, helping the NMT to recognize physiological uptakes and how to relate the artefacts with the patient anamnesis.

Key Words  
Biodistribution, artefacts, pitfalls, preparation, physiological uptake, anatomical variants