



CME Session 4

Dosimetry Committee

Sunday, October 18, 16:45–18:15

Session Title

Dosimetry in Practice: Choosing the Right Level of Complexity

Chairpersons

Caroline Stokke (Oslo, Norway)

Johannes Tran-Gia (Würzburg, Germany)

Programme

16:45–17:05 **Caroline Stokke** (Oslo, Norway): What Levels of Dosimetry Are There? A Fit-for-Purpose Framework

17:05–17:30 **Frida Westerbergh** (Gothenburg, Sweden): When Is Comprehensive Dosimetry Needed? Exploratory and First-in-Human Studies

17:30–17:55 **Emmanuel Deshayes** (Montpellier, France): Optimising Dosimetry for Clinical Trials: Enabling Multicentre Studies

17:55–18:15 **Johannes Tran-Gia** (Würzburg, Germany): Routine Practice with Approved Radiopharmaceuticals: From Verification to Evidence Generation

Educational Objectives

1. Differentiate between levels of dosimetric complexity and understand their appropriate clinical and scientific use cases.
2. Recognise scenarios in which comprehensive dosimetry is required versus situations where simplified or verification-based approaches are sufficient.
3. Apply fit-for-purpose dosimetry concepts in the context of clinical trials and routine practice in targeted radionuclide therapy.
4. Understand how nuclear medicine-specific absorbed dose–effect relationships (ADERS) can be generated from clinical and routine dosimetry data.

Summary

This CME session addresses the practical question of how much dosimetry is needed across different targeted radionuclide therapy (TRT) scenarios. Starting from a conceptual framework, the session illustrates how dosimetry requirements evolve from exploratory and first-in-human studies to clinical trials and routine patient care. Through practical examples, speakers highlight strategies to balance scientific rigour, clinical feasibility, and resource constraints. The session aims to support harmonised, pragmatic, and clinically meaningful implementation of dosimetry across different clinical settings.

Key Words

Targeted Radionuclide Therapy; Dosimetry; Absorbed Dose; Fit-for-Purpose; Clinical Trials; Routine Clinical Practice