

Joint Symposium 8

Radiopharmacy Committee / Society of Radiopharmaceutical Sciences (SRS)

Friday, October 23, 10:40-12:10

Session Title

The Revival of Radiometals

Chairperson

Peter Laverman (Nijmegen, Netherlands)

Programme

10:40 - 11:09 Ulli Köster (Grenoble, France): Production of New Radiometals

11:09 - 11:38 Frank Rösch (Mainz, Germany): Chelators for New Radiometals

11:38 - 12:07 Cathy Cutler (Upton, United States of America / SRS): Strengths and Limitations of New Radiometals

Educational Objectives

1. Explain various methods to produce new radiometals for both PET, SPECT and therapy
2. Gain knowledge about the various chelators for radiometals
3. Explain the strengths and limitations of new radiometals

Summary

Whereas radiometals such as ^{111}In , ^{68}Ga , ^{90}Y have been used for decades, non-radiometal isotopes such as ^{18}F , ^{11}C gained more interest. However, the last few years there is a revival of the production and application radiometals such as ^{44}Sc , ^{45}Tl , ^{52}Mn , $^{152/155/161}\text{Tb}$, ^{89}Zr and others. In this joint EANM/SRS session the production methods of several of these new radiometals will be discussed as well as the chelators required for the radiolabeling with these radiometals. Finally, the strengths, but also the limitations, of these new radiometals in all its aspects will be discussed.

Key Words

Radiometals, radiolabeling, chelators, radiopharmaceutical chemistry, PET, SPECT