

## **EANM reply to the EU Consultation on EURATOM RESEARCH AND TRAINING PROGRAMME 2026-2027**

*May 2024*

As an umbrella organisation for nuclear medicine professionals across Europe, the open consultation on the follow-up to Euratom's research and training programme for the period 2026-27 is a major topic for the European Association of Nuclear Medicine.

### **Increasing the budget**

The Euratom budget should be significantly increased for the end of the period (2026-27). The 1.4 billion euros allocated to the 2021-25 period did not provide sufficient cover for research and training activities, given the diversity of the fields supported (fission, nuclear energy, etc.), the stakes involved and the cost of research programmes in these research programmes in these areas.

### **Putting the focus on Medical Applications, and leveraging previous projects**

The Nuclear Medicine community very much welcomed how the Euratom Research & Training Programme 2021-2025 address research on non-power applications, and especially the use of ionising radiation to support safe and optimised medical procedures, contributing to Europe's Beating Cancer action plan.

While this was implemented in the previous annual work programmes, we will very much welcome that a dedicated budget line would be allocated to non-power applications. This clarification would allow avoid any overlap with the fission and fusion traditional topics programme for 2021-22. In parallel, it would be important to reinforce the synergies with Horizon Europe. The inclusion of the medical applications within the Euratom Research & Training Programme should not prevent Horizon Europe Health Programme, in particular in relation to the objectives of the Cancer mission, to fund actions to promote research and development of radioisotopes for medical use.

The Euratom Research and Training Programme should broaden its scope to include all radiation applications, particularly emphasising medical uses. Positive outcomes from Euratom-funded projects like SINFONIA and EURAMED Rocc-n-Roll highlight the potential benefits of expanding these activities. Integrating the EURAMED Rocc-n-Roll research agenda with dedicated funding and support in the 2026-2027 extension will further enhance the programme's impact and improve radiation safety in medical applications for the public and the environment. The outcomes of the SIMPLERAD study should be regarded as a call for further support to medical applications.

## Example of future topics

Potential topics identified by the nuclear medicine community include:

- Support the establishment of a Europe-wide Centre of Excellence structure for personalised medicine based on the application of Ionising Radiation in a distributed but well-coordinated structure.
- Research in Radiation Protection and Radiobiology for Nuclear medicine therapies; establish co-funded projects with DG SANTE and DG ENER; clarify role of EMA and EURATOM when licensing radiopharmaceuticals for therapeutic nuclear medicine.
- Sustainable production of radionuclides (E.g. alternative for fission-produced Mo-99)
- Facilitate measures to foster the sustainable supply with radiopharmaceuticals and technologies for applying Ionising Radiation in medicine in the best possible way.
- Support continuous effort to enable life-long learning, education and training of researchers and clinical staff.
- Support digitalisation in the field of medical applications of ionising radiation, including Improved medicine by Ionising Radiation applications and electronic health records, Standardisation of data formats for medical applications of Ionising Radiation, AI for Radiation Protection,
- Support technology transfer and translation in the field of medical applications of ionising radiation.
- Research for optimal measurement protocols in nuclear medicine and radiotherapy, standardised protocols and metrics for diagnostic imaging and therapy to reduce radiation exposure and improve quality.
- Research to improve measurement techniques, dose estimation, and validation for accurate risk assessment.

For further details on suggested research topics, we invite you to consult the following publication: "EANM position paper on article 56 of the Council Directive 2013/59/Euratom (basic safety standards) for nuclear medicine therapy" by Konijnenberg et. al, Eur J Nucl Med Mol Imaging (2020). <https://doi.org/10.1007/s00259-020-05038-9>