



Activity report for the PIANOFORTE

travel grant

Traveler: Katalin Bettina Balázs
Event: 48th European Radiation Research Society Meeting
Location: University of Aveiro, Aveiro, Portugal
Dates: 10.09.2024 - 13.09.2024
Scientific presentation: oral
Institute: National Centre for Public Health and Pharmacy, Hungary

Personal motivation and contribution

I applied for a PIANOFORTE travel grant to participate in 48th European Radiation Research Society (ERRS) Meeting in Aveiro, which took place on 10-13 September 2024. My application was successful and due to winning this award, I had the opportunity to present my latest results in the form of an oral presentation on 12 September.

The title of my presentation is: *"Acute and long-lasting immunological changes in prostate cancer patients treated with low and high dose rate radiotherapy protocols"*. I summarized the complex immunological processes detected in cancer patients at gene expression, protein and cellular level before and long after the radiotherapy. My presentation focused on the most relevant effects of different radiotherapy protocols on the immune system and tried to highlight the genetic background of them.

I also attended the ERRS General Assembly as an ERRS member, where we listed the most important points of the agenda (we summarized the last year and we welcomed the new president and vice president).

Finally, I also participated in ERRS NgenR2 Network Session. It was organized for PhD students and post-doctoral early career researchers. The most important aim of this session was to improve and support the formation of the next generation of radiation researchers. This session was useful and fruitful: the attendees were able to establish new professional relationships with each other. Besides the session's main goals it is an excellent platform for networking between young investigators.

This partnership has received funding from the European Union's "EURATOM" research and innovation program under the 101061037 grant agreement.





About the conference

The ERRS annual congress covers various fields of radiation research and focused on 12 different main topics. These are: health effects, clinical and radiotherapy research, molecular effects, biomarker research, radiation protection, natural radioactivity, radiation physics, particle radiation, radioecology, space radiation and social aspects. Furthermore, 6 short courses were organised this year with different topics, for example: assessing and predicting effects of radiation on the environment impact; using theranostics for planning and verification dosimetry and investigating the effects of ionizing radiation on the immune system. This session allowed us to gain even deeper knowledge in these specific topics.

Conclusion

ERRS meeting serves as an excellent platform for knowledge exchange, networking, and professional growth in the special field of radiation research. With my attendance, I was able to expand and update my knowledge in the field of biomarker research, radiation protection and immunological processes in relation to radiation. There were many excellent presentations, that were close to my professional field of interest and the scientific posters provided a good opportunity for further professional discussions with the authors. Furthermore, the congress gave the possibility to further extend my professional and international network, which is inevitable for the future.

Finally, I am extremely grateful for the PIANOFORTE grant, which allowed me to participate in this excellent and highly professional conference.

Yours sincerely,

Katalin Balázs, PhD

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