## **Nonlinear Life Summer School 2024**

Blended Intensive Programme on Biomedical Engineering and Medical Physics

## PRELIMINARY PROGRAM

Introduction of the School — Yuri Dekhtyar, Lucio Tommaso De Paolis Lecture 1: Filip Górski - University of Poznan, Poland Cutting tumors and healing hands: a few stories about use of XR in medicine  Lecture 2: Franco Milano - Chulalongkorn University, Thailandia Possible replace of the Linear No-threshold Model in Radiation Protection  16 July (remotely)  Lecture 3: Joaquin Francisco Roca Gonzáles - University of Cartagena, Spain Ubiquitous Artificial Intelligence in Medical Devices Discussions on the projects to be reached Organization of the groups  17 July (remotely)  Lecture 3: Yuri Dekhtyar - Riga Technical University, Latvia Physical fundamentals of CT, MRI, PET  Self-learning and preparation for the project  18 July (remotely)  Lecture 4: Valerio De Luca - University of Salento, Italy eXtended Reality in medicine Self-learning and preparation for the project  19 July (remotely)  Self-learning and preparation for the project  ACTIVITIES IN PRESENCE  3 September  Arrival to Lecce  4 September  Lectures/workshop in accordance with the program of the XR Salento 2024 Conference  5 September  Lectures/workshop in accordance with the program of the XR Salento 2024 Conference	15 July (remotely)
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7 September
Self-learning and preparation for the project
Social event
8 September
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Self-learning and preparation for the project
9 September
Project defense
Departure from Lecce

## **Lectures in presence**

Yuri Dekhtyar – Riga Technical University, Latvia Electrical functionalization of nanoobjects for bio needs

Joaquín Francisco Roca Gonzáles – University of Cartagena, Spain Biomedical Engineering as paradigm of Convergence of Science and Technology for well-being

Razvan Pacurar - Technical University of Cluj-Napoca, Romania 3D printing and rapid tooling methods for medical applications