



UNIVERSITÀ CAMPUS BIO-MEDICO DI ROMA

Research Units of Intelligent Health Technologies and
Nonlinear Physics and Mathematical Modelling

Biomedical Signal and Image Processing from Brain Imaging to Motor Control



Prof. Christos Papadelis,
Director of Research,
Cook Children's Neurosciences Center



Prof. Paolo Gargiulo,
Professor in Biomedical Engineering,
Reykjavik University & Landspítali



Dr. Antonio Fratini,
Senior Lecturer,
Aston University

Christos Papadelis is Director of Research at Jane and John Justin Neurosciences Center at Cook Children's Health Care System and Professor of Research in Bioengineering at the University of Texas at Arlington. He studied at Aristotle University of Thessaloniki and finished his Ph.D. in 2005. His research focuses on developing an epilepsy biomarker and identifying brain changes in children with cerebral palsy. He has authored over 80 peer-reviewed research articles, a patent, and received funding from NINDS, AES, EU, etc.

Paolo Gargiulo is a professor of biomedical engineering who works at the Medical Technology Center at Reykjavik University /University Hospital Landspítali. He studied at TU Wien and finished his Ph.D. in 2008. Paolo's interests and expertise are mostly in Medical Image processing, Neuroengineering, 3-D printing, and medical technologies. He has published 65 papers in peer-reviewed international journals, and several chapters in academic books and presented his work at many international conferences and workshops.

Antonio Fratini is a senior lecturer at Aston University (Birmingham, UK). He studied at Università degli Studi di Napoli Federico II and finished his Ph.D. in 2008. His interests are in segmentation and 3D modelling to improve surgical training, planning and outcomes and the effects of sensorimotor stimulation (mainly focal or whole body vibrations) in healthy and pathological subjects with regards to motor functions and balance. Through the years he has contributed to the design, development and testing of cutting-edge medical devices in collaboration with leading national and international Academic institutions and SMEs.

Agenda:

- 12:10-12:35 *Mapping Brain Plasticity in Children with Cerebral Palsy using a Multimodal Integration Approach*, Prof. Christos Papadelis
- 12:35-13:00 *New Directions to assess postural control*, Prof. Paolo Gargiulo
- 13:00-13:25 *Recalibration of postural and motor strategies: the case of proprioceptive stimulation*, Dr. Antonio Fratini

**18 Aprile 2024 - ore 12:00-TBA
Aula R1 - PRABB**

Università Campus Bio-Medico di Roma
Via Álvaro del Portillo, 21

Info: Prof. Leandro Pecchia (leandro.pecchia@unicampus.it)

Round table