



Infieri 2021

23/8 to 4/9, 2021, in Madrid
at the UAM Campus

<http://infieri2020.ft.uam.es/ciaff>

VIth edition of the International Summer School Series on Intelligent Signal Processing for Frontier Research and Industry

Keywords: *Astrophysics, Medical Physics, Particle Physics, Technological Challenges for confronting Physics Objectives, Exploiting Synergies, Cross Disciplinary*

Cutting edge instrumentation is a driving force for scientific progress, in Physics, Astrophysics as well as in many other scientific disciplines like Medicine. Novel sophisticated signal processing schemes are a key element in building the advanced instruments of the 21st century. It is around all aspects of the signal processing chain that the scientific and technological program of the INFIERI schools is built.

Following successful editions in Oxford, Paris, Hamburg, Sao Paulo and Wuhan the 6th edition will be held from August 23 to September 4, 2021, at the Universidad Autonoma de Madrid (UAM).

The program of the school will cover Advanced Semiconductors, Deep Sub-Micron 3D Technologies, Nanotechnology, Interconnects, Data Transmission, Big Data, High-Performance Computing, Artificial Intelligence, Quantum Technology, as well as their scientific motivations. The latter range from the exploration and understanding of the universe (dark matter/energy and gravity), particle physics and future accelerators, with opening on new energies, to the human-body (Neurology and Nanomedicine).

The three-tier program comprises lectures, keynote talks and hands-on sessions.

The school will only be offering in person attendance as essential to the traditions of the school are the laboratory sessions and the close interactions of students with international experts in fundamental research and instrumentation from Academia and Industry.

The organisers are making every provision to ensure full safety of students and staff through very strict safety rules to be observed by all the participants. The impressive progress in the COVID-19 vaccination, diagnostics and treatment indicate that conditions at the time of the school will allow full safety of all participants to be ensured.

The target audience is M.Sc., Ph.D. and postdoc-level, mainly physicists and engineers.



For examples of the previous schools' programs: <https://indico.cern.ch/category/4891/>