International Workshop on Radiation Imaging Detectors

22 - 26 June 2014 Trieste, Italy

International Workshop on Radiation Imaging Detectors
16th iWoRiD

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Luigi Stebel, Elettra Sincrotrone Trieste
Andrea Vacchi, INFN Trieste
Hazem Yousef, Elettra Sincrotrone Trieste

Program

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The workshop will have plenary sessions with invited and contributed papers presented orally and in poster sessions. The invited talks will be chosen to review recent advances in different areas covered in the workshop. Two Best Poster Awards will be presented. This year's workshop will have special enphasis on pixelated - energy dispersive devices.

Sensor Materials, Device Processing & Technologies

Si, A-Si, Ge, GaAs, CdTe and other semiconductors
CVD Diamond detectors
Scintillators
Gaseous detectors
Quantum devices
Drifting schemes
Processing, Characterization, Reliability & Radiation damage

Front end electronics and readout

Monolithic and hybrid systems
Spectroscopic systems
Charge integrating and counting systems
3D ASICs and 3D interconnections
Data compression, transfer and storage
> 100 GHz electronics

Imaging theory

Imaging with ionizing radiation
Complementary imaging techniques at different length scales
Fluorescence mapping and tomography
3D- reconstruction with limited data sets
Low radiation dose approaches

Applications

Material & life science
Multi wavelength techniques
Element mapping in 2D / 3D
Sub μm imaging
Sub ns imaging
TOF and particle tracking
High energy physics
High power lasers
Applications at X-ray free electron lasers
Electron microscopy
Neutron imaging
Security systems and other Industrial applications
Astronomical and space applications
Nuclear physics
Fusion research...

16th iWoRiD
website
http://iworid2014.ts.infn.it

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