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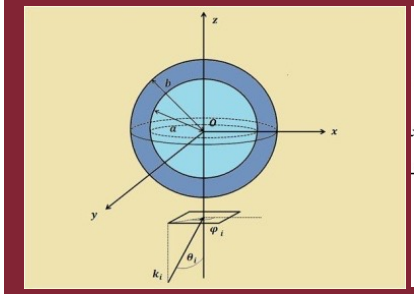
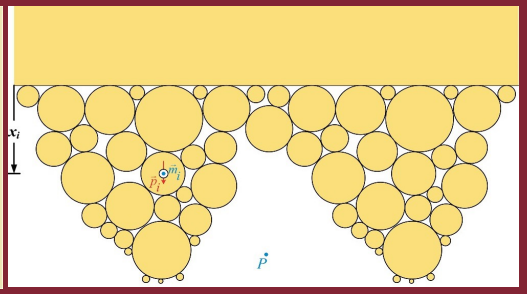
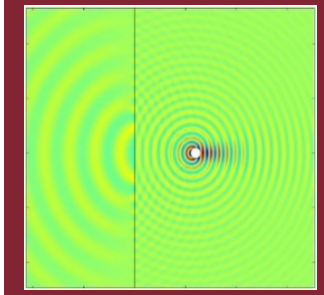
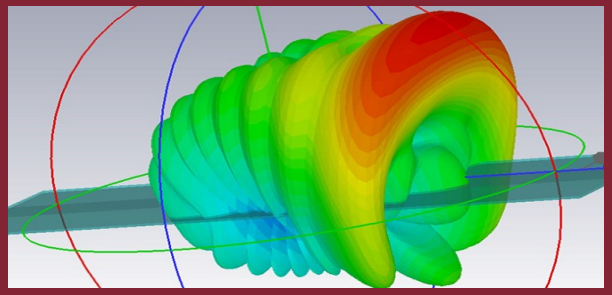
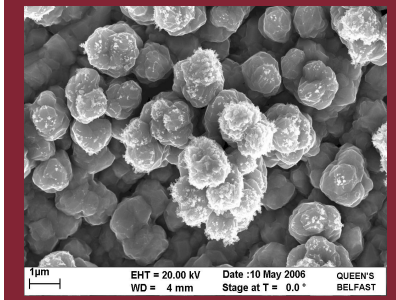


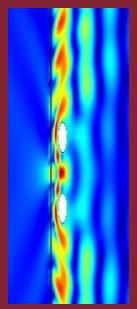
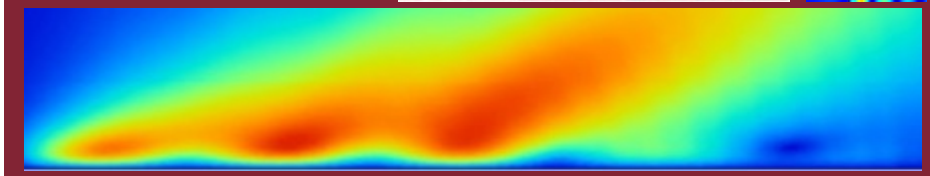

Electromagnetic Fields 2 Group

People and Research topics

Electromagnetic Fields 2 Lab website: bit.ly/FabrizioFrezzaLaboratory

Prof. Fabrizio Frezza website: bit.ly/FabrizioFrezzaDepartment

Fabrizio Frezza, PhD,
Full Professor of Electromagnetic Fields

- Advanced Electromagnetics and Scattering (6 ECTS)
  (M.Sc. Electronics Engineering and M.Sc. Atmospheric Science and Technology)
- Artificial Materials, Metamaterials and Plasmonics for Electromagnetic Applications (6 ECTS)
  (M.Sc. Nanotechnology Engineering and M.Sc. Electronics Engineering)
- Microwaves, Part II (3 ECTS)
  (M.Sc. Electronics Engineering)
- Basic Electromagnetic Fields (in Italian, 9 ECTS)
  (B.Sc. Information Engineering, at Latina)
- Elements of Technical-Scientific Communication (in Italian, 1ECTS)
- Department of Information Engineering, Electronics and Telecommunications (DIET)
  Laboratory of Electromagnetic Fields 2 (LabCEm2)

Links

Skype: fabriziofrezza
bit.ly/FabrizioFrezzaProfile
bit.ly/FabrizioFrezzaPublications
bit.ly/videofrezza
bit.ly/FabrizioFrezzaLaboratory

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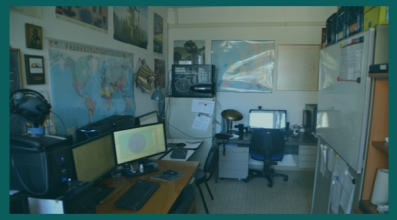
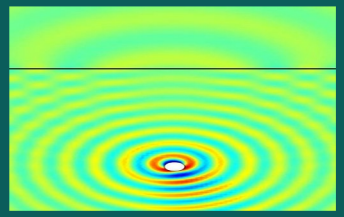
Outline

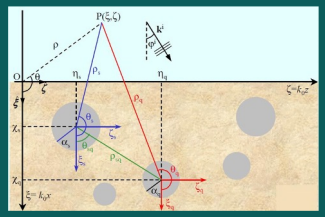
- Introduction to the Department and the research group
- Electromagnetic scattering from buried objects
- Electro-Thermal Passive Intermodulation due to Conductor Surface Roughness
- Ground Penetrating Radar (GPR)
- Biomedical space applications
- Metamaterials
- Frequency-selective surfaces (FSSs) for field absorbers
- Leaky-Waves and Leaky-Wave Antennas
- Electromagnetic-wave propagation in lossy media
- European School of Antennas (ESoA)
  - 7th Edn. of the Course, April 22-24, 2024
- Magnetic-Resonance Imaging (MRI)
- Sensor Networks, Remote Sensing
- Cultural-Heritage Applications
- Artificial Intelligence applied to biomedical imaging and GPR

Introduction to the Department and Research Group

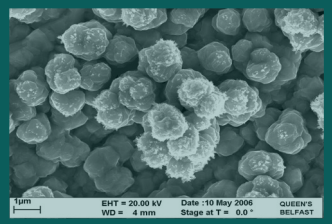


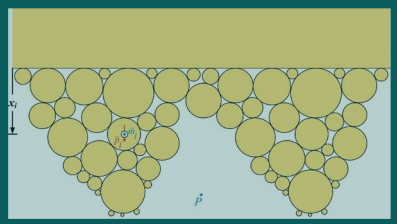
Electromagnetic scattering from buried objects





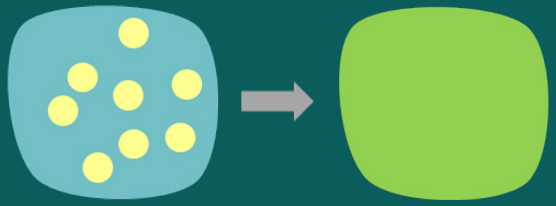
Electro-thermal passive intermodulation due to conductor surface roughness



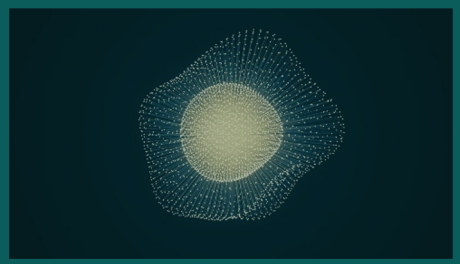


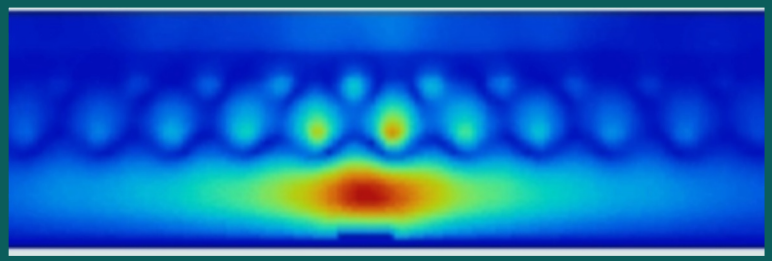
Ground Penetrating Radar (GPR), COST Action TU1208

Biomedical Space Application

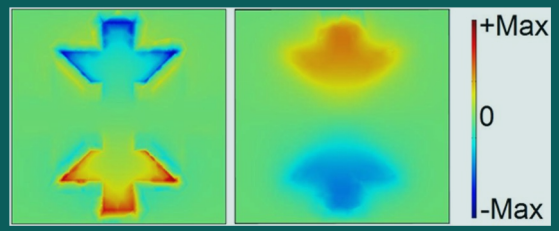


Metamaterials

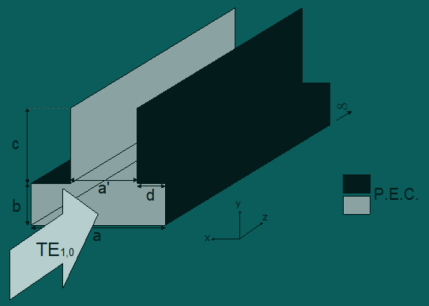


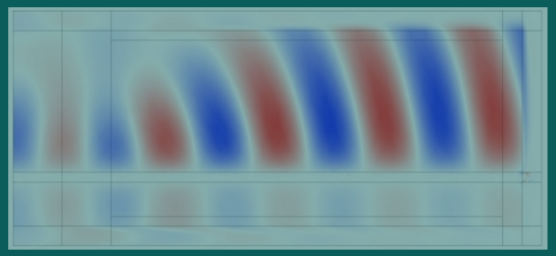


Frequency-Selective Surfaces (FSSs) for field absorbers

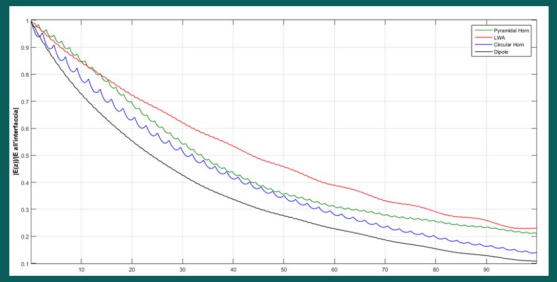


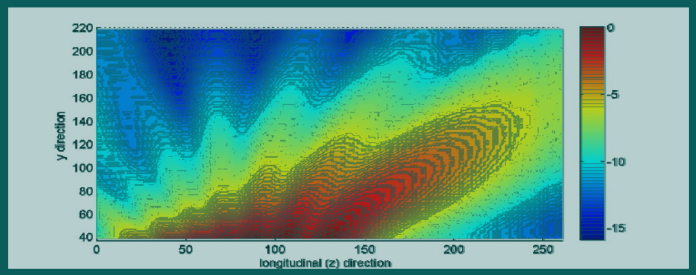
Leaky-Wave Antennas





Electromagnetic-wave propagation in lossy media





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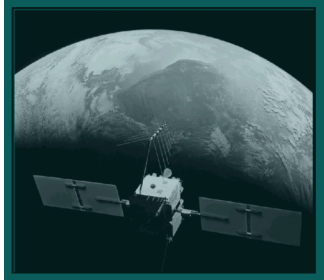
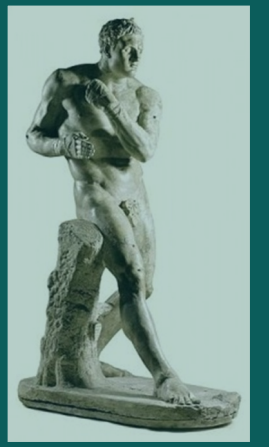
Magnetic Resonance Imaging (MRI)

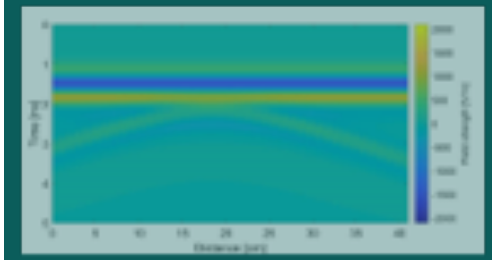
Sensor Networks, Remote Sensing



Cultural Heritage and Applications



Artificial intelligence applied to Ground Penetrating Radar and biomedical imaging



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