PERSONAL INFORMATION

Mihai IOVEA

ACCENT PRO 2000 SRL

www.accent.ro +40745182660

mihai.iovea@accent.ro

http://accent.ro/sites/default/files/CV Europass Mihai IOVEA.pdf

WhatsApp: +4074518266o

Sex M | Date of birth 29/04/1954 | Nationality Romanian

POSITION WITHIN THE COMPANY

GENERAL MANAGER

WORK EXPERIENCE

2000 – present

General manager, Senior Research Scientist with
ACCENT PRO 2000 Ltd. Bucharest, Romania

- QuPix - Pixelated Scintillator for X-ray imaging applications
- Dr..Laser - X-ray mammography imaging with phase contrast
- SmartScint - X-Ray high-resolution pixelated scintillator
- Gamma Ray Imaging experiment using 100TW femto laser interaction with matter.
- Design and development of in-line combined Laser profiler and X-ray imaging scanners for ballistic plates and sintered parts high-accuracy density measurement
- Design and development of X-ray tomography/radioscopy equipment for Security and NDT applications;
- Design, development and prototype manufacturing for portable X-ray dual energy system for bomb squad interventions
- Design, development and prototype manufacturing for X-ray dual/multi energy tomography/radioscopy equipment dedicated for security and NDT (sedimentary cores and minerals analysis
- Research, experiments and algorithms development for X and gamma ray baggage and trucks screening devices
- R &D for high resolution X-ray imaging with application in NDT (electronic components scan, pipe welds digital radiography, sintered parts, OLED displays etc)
- Materials identification algorithms by X-Ray dual/multi-energy, diffraction, backscattering Tomography and Radioscopy
- Medical X-Ray Imaging
- European Community FP7 & H2020 Projects' Evaluator
- Coordinator for 19 R&D projects and partner in other 16 projects financed by Romanian Ministry of Research, EU or private companies
- Mentoring, guiding and co-supervising undergraduate and PhD students (Mummering, Ice-Link..)
- R&D Company management for 26 years

1999 - 2000

Postdoctoral fellow with The Johns Hopkins University, Department of Physics and Astronomy, Plasma Spectroscopy Group from Baltimore, Maryland, USA;
Long-term Visitor Research Scientist at Princeton Plasma Physics Laboratory, Princeton University, New Jersey

- R&D of tomographic system for Soft X-Ray plasma diagnostics at NSTX Tokamak;
- Design and development of data acquisition and software packages for Soft X-Ray tomographic systems.

1990 -1999

Senior Research Scientist, Head of "Computerized Control and Non-Destructive Testing Laboratory" and Head of a NDT Nuclear Unit, at the R&D Institute for Electrical Engineering - ICPE S.A., Bucharest

R&D oriented to new-product and new applications development in the following domains:

- 2D and 3D Industrial gamma-ray Computerized Tomography;
- Immersion Ultrasound scanner with focalized transducers for lithotripsy;
- Multi-channel Acoustic Emission equipment;
- Vibration Monitoring Systems;
- High-accuracy density measurement;
- Studies and experiments in Electrical Impedance Tomography
- Stands for complex electrical tests and measurements for electrical motors and electrical tools;
- Magnetic-powder and eddy current brakes design;
- Large size LED-based Graphic Panel design and manufacturing;
- Laboratory Department Manager; representative and dealer activity.
- Coordinator for 7 national R&D projects and partner in 3 projects financed by Romanian Ministry of Research, EC or private companies.

1990 -1991

Scientific Director with R&D Institute for Electrical Engineering (ICPE S.A.) - Bucharest

- Building and implementing new technical and economical algorithm for R&D departments evaluation and management;
- Scientific management of following domains/laboratories: Non-conventional energies (solar, photovoltaic, wind, H2, etc.), Non-Destructive Testing, R&D for Electrical Materials, Accelerating Aging tests for electrical components, Electrical Technologies, Quality Assurance in Electrical Domain, Superconductivity, Medical Equipment, Microwave technologies, Tests of equipment destined for Nuclear Power Plants; Quality Assurance Department.

1984 -1990

Research Scientist with R&D Institute for Electrical Engineering - ICPE S.A., Bucharest

- Development of techniques and instrumentations for monitoring electrical equipment behaviour during the "Seismic Test" and "Loss of Cooling Accident Test" for Nuclear Power Plants equipment qualification.

1982 - 1984

Research Scientist with the Research Institute for Nuclear Reactors - IRNE, Pitesti - Romania

- Participating at the development of computerized stand dedicated for nuclear fuel reactivity test and analysis. Nuclear fuel gamma scanning measurements. Water residual contamination analysis by activation method.

EDUCATION AND TRAINING

1998 - 2000 **Postdoctoral studies**

Johns Hopkins University - Baltimore, Maryland - USA; Department of Physics and Astronomy, Plasma Spectroscopy Group

1996- 1998 **Ph.D. in Physics**

The Institute for Atomic Physics, Bucharest

Thesis: „Study of Physical Mechanisms in Computerized Tomography"

1977 - 1982

M.Sc. Engineering in Physics –

- Measurements and Control

B.Sc. Technology Physics

Physics University of Bucharest, Romania

PERSONAL SKILLS

Mother tongue(s) Romanian

Other language(s)

	UNDERSTANDING		SPEAKING		WRITING
	Listening	Reading	Spoken interaction	Spoken production	
English	C2	C2	C2	C2	C2

Levels: A1/A2: Basic user - B1/B2: Independent user - C1/C2 Proficient user
Common European Framework of Reference for Languages

Communication skills

- Good international communication skills gained through my experience as EU projects coordinator and partner

Organisational / managerial skills

Replace with your organisational / managerial skills. Specify in what context they were acquired. Example:

- 2 years Scientific director at Electrical Engineering Research Institute – Bucharest
- 12 years Head of NDT Computerized Control Laboratory with Electrical Engineering Research Institute – Bucharest
- 26 years General Manager with R&D private company ACCENT PRO 2000 S.R.L
- Project coordinator/partner in the last 26 years for

- 23 R&D National funded projects
- 11 projects financed by EU R&D program (HE, H2020, FP7, Eureka, Marie-Curie…)
- 10 projects financed by private companies

Job-related skills

- Basic and applied research in 2D and 3D X and Gamma ray Industrial Computerized Tomography and Radioscopy
- Research, design and prototypes development of various types of computerized X and gamma rays Industrial Tomography and Radioscopy Systems, with applications in NDT and Security domains
- R&D for security screening in X-Ray radioscopy and tomography by using dual-multi energy, backscattering and diffraction techniques
- R&D of specialized algorithms and software packages for data acquisition, 2D & 3D tomograms reconstruction, data analysis and visualization in Tomography and Radioscopy
- Research & Development of dual/multi energy technique for measuring Zeff (Atomic effective number) and Density values in X and gamma ray Tomography and Radioscopy, with application in Security, Cores and minerals analysis, Industrial NDT, etc
- Fast in-line industrial X-Ray applications development based on microfocus X-ray source, Flat Panel or TDI type X-ray detectors
- Fast prototyping and R & D equipment design and development
- Software development using LabView, NI language
- R & D companies management for:

- NDT and Computerized Technologies Laboratory as Head of Department for 12 years
- National R&D Institute for Electrical Engineering as Scientific Director for 2 years
- ACCENT PRO 2000 Ltd as General Manager for the last 26 years until present

- European Community FP7 Projects Scientific Expert Evaluator
- The Johns Hopkins University-USA External Collaborator 2000-2004
- Project coordinator for and partner in more than 40 projects financed by Romanian Ministry of Research, European Union or private companies

Digital competence

SELF-ASSESSMENT				
Information processing	Communication	Content creation	Safety	Problem solving
Independent	Independent	Independent	Independent	Proficient user

Levels: Basic user - Independent user - Proficient user
Digital competences - Self-assessment grid

Replace with name of ICT-certificate(s)

Replace with your other computer skills. Specify in what context they were acquired. Example:

- good command of Office suite (word processor, spread sheet, presentation software)
- good developer of technical algorithms design and implementation using LabView software development

Other skills

Driving licence B

ADDITIONAL INFORMATION

Publications
Presentations
Projects
Conferences
Seminars
Honours and awards
Memberships
References
Citations
Courses
Certifications

PUBLICATION

1. HIGH-POWER LASER-DRIVEN GAMMA IRRADIATION STATION FOR INDUSTRIAL IMAGING: CONCEPT, SETUP, AND EXPERIMENTAL BENCHMARKING, G Giubega, O Tesileanu, Y Nakamiya, L Neagu, F Negoita, G Cojocaru, Nalbaru (Nita), L., M Mirea, E Hermann, M Neagu, G Suliman, P-g Bleotu, L Tudor, S Norbaev, A Lazar, A Berceanu, JF Ong, M Rosu, I Fidel, A Voda, P Vasos, A Toma, L Vasescu, I Dancus, M Iovea, Bulletin of the Russian Academy of Sciences Physics 90 (5), 2026/1/1
2. Visualization Tool for Hydro Power Plant Operators: Interactive Data Monitoring & Surveillance on Large Screen with Voice Warning, M. Iovea, T.A. Netculescu & E. Hermann, Volumul 12, 2025/08/25; http://escc.uth.gr/wp-content/uploads/2026/01/ESCC-2025_Book-of-Proceedings.pdf
3. Simulation imaging process of laser-induced multi-MeV photon emission, L Nita, AC Berceanu, JF Ong, G Suliman, E Hermann, M Iovea, Journal of Applied Physics 135 (20), Volumul 135, Numărul 20, 2024/5/28
4. Highlighting the Effects of Gamma Irradiation of the Brain Through Non-Conventional X-Ray Imaging, Mihai Iovea, Marian Neagu, Edward Hermann, Monica Mirea, Cosmin Mustaciosu, Roberta Stoica, Mina Raileanu, Daniel Negut, Octavian G Duliu, Mihai Radu, Rom. Rep. Phys, Volumul 76, Numărul 1, 2024/1/1
5. Material classification using basis material decomposition from spectral X-ray CT, Doniyor Jumanazarov, Asalkhon Alimova, Azamat Abdikarimov, Jakeoung Koo, Henning F Poulsen, Ulrik L Olsen, Mihai Iovea, Nuclear Instruments and Methods in Physics Research Section A: Accelerators …, Volumul 1056, 2023/11/1
6. Multi-Energy and Fast-Convergence Iterative Reconstruction Algorithm for Organic Material Identification Using X-ray Computed Tomography, Mihai Iovea, Andrei Stanciulescu, Edward Hermann, Marian Neagu, Octavian G Duliu, Materials, Volumul 16, Numărul 4, 1654, 2023/2/16
7. PRELIMINARY TESTS FOR SPECKLE-BASED X-RAY PHASE-CONTRAST IMAGING: OPTIMIZATION, Laura-Anamaria Nita, Mihai Iovea, Gabriel Suliman, Alexandru Enciu, Marian Neagu, UNIVERSITY POLITEHNICA OF BUCHAREST SCIENTIFIC BULLETIN-SERIES A-APPLIED MATHEMATICS AND PHYSICS, Volumul 85, Numărul 1, 149-158, 2023/1/1
8. Material classification using basis material decomposition from spectral x-ray CT, Doniyor Jumanazarov, Asalkhon Alimova, Henning F Poulsen, Ulrik L Olsen, Mihai IOVEA, Articole Google Academic, https://doi.org/10.21203/rs.3.rs-2260614/v1 , 2022/11/16
9. Significance of the spectral correction of photon counting detector response in material classification from spectral X-ray CT, Doniyor Jumanazarov, Jakeoung Koo, Henning F. Poulsen, Ulrik L. Olsen, Mihai Iovea, *J. Med. Imag.* **9**(3), 034504 (2022). doi: 10.1117/1.JMI.9.3.034504, http://dx.doi.org/10.1117/1.JMI.9.3.034504
10. Material classification from sparse spectral X-ray CT using vectorial total variation based on L infinity norm, D Jumanazarov, J Koo, J Kehres, HF Poulsen, UL Olsen, M Iovea, Materials Characterization 187, 111864, 2022
11. Non-Destructive X-ray Characterization of a Novel Joining Method Based on Laser-Melting Deposition for AISI 304 Stainless Steel, MA Mahmood, D Chioibasu, S Mihai, M Iovea, IN Mihailescu, AC Popescu, Materials 14 (24), 7796, 2021
12. Development of a non-destructive testing system for the automated inspection of ceramic armour plates and parts, M Iovea, M Cerit, A Tunc, JD Stephenson, K Gündoğdu, AIP Conference Proceedings 2380 (1), 040004, 2021
13. The significance of the spectral correction of photon counting detector response in material classification from spectral x-ray CT, Doniyor Jumanazarov, Ja-Keoung Koo, Henning F. Poulsen, Ulrik L. Olsen, Mihai Iovea; Proceedings Volume 11771, Quantum Optics and Photon Counting 2021; 117710J (2021) https://doi.org/10.1117/12.2589290, Event: SPIE Optics + Optoelectronics, 2021, Online Only
14. SYSTEM-INDEPENDENT MATERIAL CLASSIFICATION THROUGH X-RAY ATTENUATION DECOMPOSITION FROM SPECTRAL X-RAY CT, D. Jumanazarov, J Koo, M Busi, HF Poulsen, UL Olsen, M Iovea; NDT & E International, 102336, 2020
15. EFFECTIVE Z EVALUATION USING MONOENERGETIC GAMMA RAYS AND NEURAL NETWORKS G. V. Turturica V. Iancu, A. Pappalardo, P.-A. Söderström, E. Açıksöz, D. Balabanski, L. Capponi, P. Constantin, V.Fugaru, L. Guardo, M Ilie, S. Ilie, M. Iovea, D. Lattuada, D. Nichita, T. Petruse, A. Spataru, and C. A. Ur , 2019 EPJ Plus - The European Physical Journal Plus 135 (2), 1-13
16. Wideband Sub-terahertz Coplanar Waveguide-Fed Spiral Antenna, AC Bunea, D Neculoiu, MA Avram, M Iovea, SCIENCE AND TECHNOLOGY 23 (2), 140-156, 2020
17. ARCHIMEDEAN SPIRAL ANTENNA WITH COPLANAR WAVEGUIDE FEED, Alina-Cristina Bunea, Dan Neculoiu Andrei Avram, Mihai Iovea, IEEE 42nd International Semiconductor Conference –IEEE CAS 2019, Sinaia - Romania, 9-11 October 2019, pp. 65-68 - Best paper award
18. HIGH-RESOLUTION GAMMA-RAY SPECTROSCOPY WITH ELIADE AT THE EXTREME LIGHT INFRASTRUCTURE. PA Söderström, G Suliman, CA Ur, D Balabanski, T Beck, L Capponi, ..., Acta Physica Polonica B 50 (3), 2019
19. PRELIMINARY THEORETICAL APPROACH FOR MATERIALS ELEMENTAL COMPOSITION IDENTIFICATION USING X - RAYS SPECTRAL TRANSMISSION DATA, E. Hermann, O. G. Duliu, M. Iovea, JOURNAL OF OPTOELECTRONICS AND ADVANCED MATERIALS, Vol. 20, No. 7-8, July – August 2018, p. 410 - 418 (2018);
20. Wideband Micromachined Antenna for W-band Applications, AC Bunea, D Neculoiu, A Avram, M Iovea, 2018 IEEE Asia-Pacific Conference on Antennas and Propagation (APCAP), 433-434, 2018
21. ELEMENTAL ANALYSES SENSITIVITIES OF PROSPECTIVE NONDESTRUCTIVE INSPECTIONS AT ELI-NP, V Iancu, Gabriel V. Turturica, Gabriel Suliman, Edward Hermann, Mihai Iovea, Dimiter L. Balabanski, Hideaki Ohgaki, Calin A. Ur; 2nd International Conference on Nuclear Photonics June 2018-Brasov, Abstract, p188 (2018);
22. SUPPORT ACTIONS FOR INDUSTRIAL IMAGING APPLICATIONS DEVELOPMENT AT ELI-NP GAMMA BEAM, Mihai Iovea, Calin A. Ur, Violeta Iancu, Edward Hermann, Gabriel Suliman, Gabriel Turturica, Alfio Pappalardo, Gabriela Mateiasi, Marian Neagu, Florin Valeriu Cotorobai,Elena Angheluta, Bogdan Stefanescu, Alexandru Enciu; 2nd International Conference on Nuclear Photonics June 2018-Brasov, Abstract, p195 (2018);
23. NONDESTRUCTIVE MATERIAL INSPECTION USING BRILLIANT QUASI-MONOENERGETIC GAMMA BEAMS AT ELI-NP: V. Iancu, G.Suliman, G.V.Turturica, E.Hermann, M.Iovea, D.L.Balabanski, H.Ohgaki, C.A. Ur., The 2017 International Conference on Applications of Nuclear Techniques, Crete -Greece, June 11-172017;
24. Brilliant gamma beams for industrial applications: new opportunities, new challenges, V Iancu, G Suliman, GV Turturica, M Iovea, I Daito, H Ohgaki, C Matei, ..., Journal of Physics: Conference Series 763 (1), 012003, 2016
25. Development of a tangential neutron radiography system for monitoring the fatigue cracks in hydrogen fuel tanks, M Vieyra, M Iovea, K Tzortzatou, Proc. of 19th World Conf. on Non-Destructive Testing, 13-17, 2016
26. Complementary Methods: Γ-beam Techniques, X-ray Fluorescence (XRF) and Nuclear Magnetic Resonance (NMR), DL Balabanski, B Blümich, N Gelli, V Iancu, M Iovea, A Kriznar, M Massi, ..., Universitätsbibliothek der RWTH Aachen, 2016
27. DIGITAL X-RAY EQUIPMENT AND FAST DEFECTS DETECTION TECHNOLOGY FOR IN-LINE SINTERED

POWDER METALLURGY PARTS NON DESTRUCTIVE CONTROl;; Mihai IOVEA, Marian NEAGU, Bogdan STEFANESCU, Gabriela MATEIASI, Elena ANGHELUTA; 2016, Hamburg 9-13 October, World PM Congress Proceedings

28. GAMMA-BEAM TECHNIQUES, X-RAY FLUORESCENSE (XRF) AND NUCLEAR MAGNETIC RESONANCE(NMR): D.L.Balabanski, B.Blumich, N.Gelli, V. Iancu, M.Iovea, A.Kriznar, M.Massi,A.Mazzinghi,I.Ortega-Feliu, M.A.Respaldiza, C.Ruberto, S.Scrivano, G.Suliman, Z.Szokefalvi-Nagy, C.A.UR, W.Zia; Nuclear Physics For Cultural Heritage October 2016, pg. 37-53
29. GAMMA BEAM INDUSTRIAL APPLICATIONS AT ELI-NP: G. Suliman, V. Iancu, C. A. Ur, M. Iovea, I. Daito, H Ohgaki, International Journal of Modern Physics: Conference Series 44, 1660216, 2016;
30. GAMMA-BEAM ANALYTICAL METHODS D L Balabanski, V Iancu, M Iovea, G Suliman,C.A.Ur, Nuclear Physics for Cultural Heritage topical review, p37-p39 (2016);
31. Defect detection and classification system for automatic analysis of digital radiography images of PM parts MG Ponomarev, C Selcuk, T-H Gan, M Amos, I Nicholson, M Iovea, M Neagu, B Stefanescu, G Mateiasi; Powder Metallurgy. 01/2014; 57(1):17-20
32. A DEFECT DETECTION AND CLASSIFICATION SYSTEM FOR AUTOMATIC ANALYSIS OF DIGITAL RADIOGRAPHY IMAGES OF POWDER METALLURGY PARTS ; Maxim G Ponomarev, C. Selcuk, T.-H. Gan, M. Amos, I.Nicholson, M.Iovea, M.Neagu, B.Stefanescu G.Mateiasi Euro PM2013 - Non Destructive Testing, Referred Proceedings, Gothenburg, Sweden; 09/2013
33. Tools for Improving PM: An X-ray Imaging Solution for Green and Sintered PM Parts-NDT Control, Mihai Iovea, Marian Neagu, Bogdan Stefanescu, Gabriela Mateiasi, Alan L Clarke, Malini Vieyra, P Ian Nicholson, European Congress and Exhibition on Powder Metallurgy. European PM Conference Proceedings

34. HIGH-POWER LASER-DRIVEN GAMMA IRRADIATION STATION FOR INDUSTRIAL IMAGING: CONCEPT, SETUP, AND EXPERIMENTAL BENCHMARKING, G Giubega, O Tesileanu, Y Nakamiya, L Neagu, F Negoita, G Cojocaru, Nalbaru (Nita), L., M Mirea, E Hermann, M Neagu, G Suliman, P-g Bleotu, L Tudor, S Norbaev, A Lazar, A Berceanu, JF Ong, M Rosu, I Fidel, A Voda, P Vasos, A Toma, L Vasescu, I Dancus, M Iovea, Bulletin of the Russian Academy of Sciences Physics 90 (5), 2026/1/1
35. Visualization Tool for Hydro Power Plant Operators: Interactive Data Monitoring & Surveillance on Large Screen with Voice Warning, M. Iovea, T.A. Netculescu & E. Hermann, Volumul 12, 2025/08/25; http://escc.uth.gr/wp-content/uploads/2026/01/ESCC-2025_Book-of-Proceedings.pdf
36. Simulation imaging process of laser-induced multi-MeV photon emission, L Nita, AC Berceanu, JF Ong, G Suliman, E Hermann, M Iovea, Journal of Applied Physics 135 (20), Volumul 135, Numărul 20, 2024/5/28
37. Highlighting the Effects of Gamma Irradiation of the Brain Through Non-Conventional X-Ray Imaging, Mihai Iovea, Marian Neagu, Edward Hermann, Monica Mirea, Cosmin Mustaciosu, Roberta Stoica, Mina Raileanu, Daniel Negut, Octavian G Duliu, Mihai Radu, Rom. Rep. Phys, Volumul 76, Numărul 1, 2024/1/1
38. Material classification using basis material decomposition from spectral X-ray CT, Doniyor Jumanazarov, Asalkhon Alimova, Azamat Abdikarimov, Jakeoung Koo, Henning F Poulsen, Ulrik L Olsen, Mihai Iovea, Nuclear Instruments and Methods in Physics Research Section A: Accelerators …, Volumul 1056, 2023/11/1
39. Multi-Energy and Fast-Convergence Iterative Reconstruction Algorithm for Organic Material Identification Using X-ray Computed Tomography, Mihai Iovea, Andrei Stanciulescu, Edward Hermann, Marian Neagu, Octavian G Duliu, Materials, Volumul 16, Numărul 4, 1654, 2023/2/16
40. PRELIMINARY TESTS FOR SPECKLE-BASED X-RAY PHASE-CONTRAST IMAGING: OPTIMIZATION, Laura-Anamaria Nita, Mihai Iovea, Gabriel Suliman, Alexandru Enciu, Marian Neagu, UNIVERSITY POLITEHNICA OF BUCHAREST SCIENTIFIC BULLETIN-SERIES A-APPLIED MATHEMATICS AND PHYSICS, Volumul 85, Numărul 1, 149-158, 2023/1/1
41. Material classification using basis material decomposition from spectral x-ray CT, Doniyor Jumanazarov, Asalkhon Alimova, Henning F Poulsen, Ulrik L Olsen, Mihai IOVEA, Articole Google Academic, https://doi.org/10.21203/rs.3.rs-2260614/v1 , 2022/11/16
42. Significance of the spectral correction of photon counting detector response in material classification from spectral X-ray CT, Doniyor Jumanazarov, Jakeoung Koo, Henning F. Poulsen, Ulrik L. Olsen, Mihai Iovea, *J. Med. Imag.* **9**(3), 034504 (2022), doi: 10.1117/1.JMI.9.3.034504, http://dx.doi.org/10.1117/1.JMI.9.3.034504
43. Material classification from sparse spectral X-ray CT using vectorial total variation based on L infinity norm, D Jumanazarov, J Koo, J Kehres, HF Poulsen, UL Olsen, M Iovea, Materials Characterization 187, 111864, 2022
44. Non-Destructive X-ray Characterization of a Novel Joining Method Based on Laser-Melting Deposition for AISI 304 Stainless Steel, MA Mahmood, D Chioibasu, S Mihai, M Iovea, IN Mihailescu, AC Popescu, Materials 14 (24), 7796, 2021
45. Development of a non-destructive testing system for the automated inspection of ceramic armour plates and parts, M Iovea, M Cerit, A Tunc, JD Stephenson, K Gündoğdu, AIP Conference Proceedings 2380 (1), 040004, 2021
46. The significance of the spectral correction of photon counting detector response in material classification from spectral x-ray CT, Doniyor Jumanazarov, Ja-Keoung Koo, Henning F. Poulsen, Ulrik L. Olsen, Mihai Iovea; Proceedings Volume 11771, Quantum Optics and Photon Counting 2021; 117710J (2021) https://doi.org/10.1117/12.2589290, Event: SPIE Optics + Optoelectronics, 2021, Online Only
47. SYSTEM-INDEPENDENT MATERIAL CLASSIFICATION THROUGH X-RAY ATTENUATION DECOMPOSITION FROM SPECTRAL X-RAY CT, D. Jumanazarov, J Koo, M Busi, HF Poulsen, UL Olsen, M Iovea; NDT & E International, 102336, 2020
48. EFFECTIVE Z EVALUATION USING MONOENERGETIC GAMMA RAYS AND NEURAL NETWORKS G. V. Turturica V. Iancu, A. Pappalardo, P.-A. Söderström, E. Açıksöz, D. Balabanski, L. Capponi, P. Constantin, V.Fugaru, L. Guardo, M Ilie, S. Ilie, M. Iovea, D. Lattuada, D. Nichita, T. Petruse, A. Spataru, and C. A. Ur , 2019 EPJ Plus - The European Physical Journal Plus 135 (2), 1-13
49. Wideband Sub-terahertz Coplanar Waveguide-Fed Spiral Antenna, AC Bunea, D Neculoiu, MA Avram, M Iovea, SCIENCE AND TECHNOLOGY 23 (2), 140-156, 2020
50. ARCHIMEDEAN SPIRAL ANTENNA WITH COPLANAR WAVEGUIDE FEED, Alina-Cristina Bunea, Dan Neculoiu Andrei Avram, Mihai Iovea, IEEE 42nd International Semiconductor Conference –IEEE CAS 2019, Sinaia - Romania, 9-11 October 2019, pp. 65-68 - Best paper award
51. HIGH-RESOLUTION GAMMA-RAY SPECTROSCOPY WITH ELIADE AT THE EXTREME LIGHT INFRASTRUCTURE. PA Söderström, G Suliman, CA Ur, D Balabanski, T Beck, L Capponi, ..., Acta Physica Polonica B 50 (3), 2019
52. PRELIMINARY THEORETICAL APPROACH FOR MATERIALS ELEMENTAL COMPOSITION IDENTIFICATION USING X - RAYS SPECTRAL TRANSMISSION DATA, E. Hermann, O. G. Duliu, M. Iovea, JOURNAL OF OPTOELECTRONICS AND ADVANCED MATERIALS, Vol. 20, No. 7-8, July – August 2018, p. 410 - 418 (2018);
53. Wideband Micromachined Antenna for W-band Applications, AC Bunea, D Neculoiu, A Avram, M Iovea, 2018 IEEE Asia-Pacific Conference on Antennas and Propagation (APCAP), 433-434, 2018
54. ELEMENTAL ANALYSES SENSITIVITIES OF PROSPECTIVE NONDESTRUCTIVE INSPECTIONS AT ELI-NP, V Iancu, Gabriel V. Turturica, Gabriel Suliman, Edward Hermann, Mihai Iovea, Dimiter L. Balabanski, Hideaki Ohgaki, Calin A. Ur; 2nd International Conference on Nuclear Photonics June 2018-Brasov, Abstract, p188 (2018);
55. SUPPORT ACTIONS FOR INDUSTRIAL IMAGING APPLICATIONS DEVELOPMENT AT ELI-NP GAMMA BEAM, Mihai Iovea, Calin A. Ur, Violeta Iancu, Edward Hermann, Gabriel Suliman, Gabriel Turturica, Alfio Pappalardo, Gabriela Mateiasi, Marian Neagu, Florin Valeriu Cotorobai,Elena Angheluta, Bogdan Stefanescu, Alexandru Enciu; 2nd International Conference on Nuclear Photonics June 2018-Brasov, Abstract, p195 (2018);
56. NONDESTRUCTIVE MATERIAL INSPECTION USING BRILLIANT QUASI-MONOENERGETIC GAMMA BEAMS AT ELI-NP: V. Iancu, G.Suliman, G.V.Turturica, E.Hermann, M.Iovea, D.L.Balabanski, H.Ohgaki, C.A. Ur., The 2017 International Conference on Applications of Nuclear Techniques, Crete -Greece, June 11-172017;
57. Brilliant gamma beams for industrial applications: new opportunities, new challenges, V Iancu, G Suliman, GV Turturica, M Iovea, I Daito, H Ohgaki, C Matei, ..., Journal of Physics: Conference Series 763 (1), 012003, 2016
58. Development of a tangential neutron radiography system for monitoring the fatigue cracks in hydrogen fuel tanks, M Vieyra, M Iovea, K Tzortzatou, Proc. of 19th World Conf. on Non-Destructive Testing, 13-17, 2016
59. Complementary Methods: Γ-beam Techniques, X-ray Fluorescence (XRF) and Nuclear Magnetic Resonance (NMR), DL Balabanski, B Blümich, N Gelli, V Iancu, M Iovea, A Kriznar, M Massi, ..., Universitätsbibliothek der RWTH Aachen, 2016

60. DIGITAL X-RAY EQUIPMENT AND FAST DEFECTS DETECTION TECHNOLOGY FOR IN-LINE SINTERED POWDER METALLURGY PARTS NON DESTRUCTIVE CONTROl;; Mihai IOVEA, Marian NEAGU, Bogdan STEFANESCU, Gabriela MATEIASI, Elena ANGHELUTA; 2016, Hamburg 9-13 October, World PM Congress Proceedings
61. GAMMA-BEAM TECHNIQUES, X-RAY FLUORESCENSE (XRF) AND NUCLEAR MAGNETIC RESONANCE(NMR): D.L.Balabanski, B.Blumich, N.Gelli, V. Iancu, M.Iovea, A.Kriznar, M.Massi,A.Mazzinghi,I.Ortega-Feliu, M.A.Respaldiza, C.Ruberto, S.Scrivano, G.Suliman, Z.Szokefalvi-Nagy, C.A.UR, W.Zia; Nuclear Physics For Cultural Heritage October 2016, pg. 37-53
62. GAMMA BEAM INDUSTRIAL APPLICATIONS AT ELI-NP: G. Suliman, V. Iancu, C. A. Ur, M. Iovea, I. Daito, H Ohgaki, International Journal of Modern Physics: Conference Series 44, 1660216, 2016;
63. GAMMA-BEAM ANALYTICAL METHODS D L Balabanski, V Iancu, M Iovea, G Suliman,C.A.Ur, Nuclear Physics for Cultural Heritage topical review, p37-p39 (2016);
64. Defect detection and classification system for automatic analysis of digital radiography images of PM parts MG Ponomarev, C Selcuk, T-H Gan, M Amos, I Nicholson, M Iovea, M Neagu, B Stefanescu, G Mateiasi; Powder Metallurgy. 01/2014; 57(1):17-20
65. A DEFECT DETECTION AND CLASSIFICATION SYSTEM FOR AUTOMATIC ANALYSIS OF DIGITAL RADIOGRAPHY IMAGES OF POWDER METALLURGY PARTS ; Maxim G Ponomarev, C. Selcuk, T.-H. Gan, M. Amos, I.Nicholson, M.Iovea, M.Neagu, B.Stefanescu G.Mateiasi Euro PM2013 - Non Destructive Testing, Referred Proceedings, Gothenburg, Sweden; 09/2013
66. Tools for Improving PM: An X-ray Imaging Solution for Green and Sintered PM Parts-NDT Control, Mihai Iovea, Marian Neagu, Bogdan Stefanescu, Gabriela Mateiasi, Alan L Clarke, Malini Vieyra, P Ian Nicholson, European Congress and Exhibition on Powder Metallurgy. European PM Conference Proceedings
67. FAST X-RAY DIGITAL RADIOGRAPHY EQUIPMENT FOR IN-LINE PRODUCTION CONTROL M. Iovea1, M. Neagu1, B. Stefanescu1, G. Mateiasi1, I. Porosnicu1, E. Angheluta , Accent Pro 2000, Bucharest, Romania
68. DIGITAL RADIOGRAPHIC INSPECTION TECHNIQUE FOR PRODUCTION FRIENDLY QUALITY ASSESSMENT OF PM PARTS Maxim G Ponomarev, Vassilios Kappatos, Cem Selcuk, Tat-Hean Gan, Mathew Amos, Harshad Halai, Christian Gierl, Mihai Iovea; Powder Metallurgy 01/2013; 56(2):92-95.
69. PORTABLE LOW-COST FLAT-PANEL DETECTORS FOR REAL-TIME DIGITAL RADIOGRAPHY, *7TH International symposium on NDT in aerospace, Bremen, Germany, 16-18 November , 2015*, Mihai IOVEA, Marian NEAGU, Bogdan STEFANESCU, Gabriela MATEIASI, Ioana POROSNICU, Elena ANGHELUTA
70. ASPECTS REGARDING NON-DESTRUCTIVE HIGH RESOLUTION X-RAY IMAGING IN INDUSTRIAL DIGITAL RADIOGRAPHY , Asociatia romana de examinari nedistructive, Revista Examinari nedistructive , Nr. 1(3), 2015, pag. 13-23 (in Romanian language)
71. SIMULATION STUDY ON CUMPUTER TOMOGRAPHY IMAGING ON NUCLEAR DISTRIBUTION BY QUASI MONOENERGETIC GAMMA RAYS WITH NUCLEAR RESONANCE FLUORESCENCE : CASE STUDY FOR ELI-NP APPLICATION, 12th Eco-Energy and Materials Science and Engineering Symposium, Krabi, Thailand, June 11-14, 2015, I. Daito, H. Ohgaki, G. Suliman, V. Iancu, C.A. Ur, M. Iovea
72. TIME DELAY INTEGRATION DETECTOR BASED SOLUTION FOR INDUSTRIAL X-RAY NDT INSPECTION, 11th European Conference on Non-Destructive Testing (ECNDT 2014), October 6-10, 2014, Prague, Czech Republic, Mihai IOVEA, Marian NEAGU, Bogdan STEFANESCU, Gabriela MATEIASI, Alan L. CLARKE, Malini VIEYRA, P. Ian NICHOLSON
73. AN X-RAY IMAGING SOLUTION FOR GREEN AND SINTERED PM PARTS-NDT CONTROL; EURO PM Congress - EMPA 2014, Salzburg AUSTRIA, 21-24 September 2014; Mihai IOVEA, Marian NEAGU, Bogdan STEFANESCU, Gabriela MATEIASI Alan CLARKE, Malini Vieyra, Ian NICHOLSON – EMPA 2014 Conference proceedings, p21-p24 ;
74. THREAT LIQUID IDENTIFICATION IN HAND-HELD BAGGAGE, "The Third International Conference on Image Formation in X-Ray Computed Tomography", June 22-25, 2014, Salt Lake City, Utah, USA, Conf. Proceedings pg. 117-121; Sebastian Faby, Marcus Brehm, Michael Knaup, Keith Powell, Mohammed Ayoub, Benjamin Cantwell, Ian Radley, Mihai Iovea and Marc Kachelrieß
75. PRODUCTION OF FERROUS PM-PARTS FOR CALIBRATION ANDDEMONSTRATION OF TYPICAL DEFECT DETECTION PERFORMANCE OF IN-LINE X-RAY DIGITAL RADIOGRAPHY EQUIPMENT; European Powder Metallurgy Association EMPA 2013, 15-18 September 2013, Gothenburg, Sweden, Proceedings Volume 2, Session 27: Non Destructive Testing, pp.169 – 174, ISBN 978-1-899072-42, Christian Gierl-Mayer Mohammad Momeni, Herbert Danninger, Mihai Iovea; G Mateiasi, A Clarke; I. Nicholson
76. PM PARTS FAST IN-LINE X-RAY DIGITAL RADIOGRAPHY; European Powder Metallurgy Association EMPA 2013, 15-18 September 2013, Gothenburg, Sweden, Proceedings Volume 2, Session 27: Non Destructive Testing, pp.187 – 192, ISBN 978-1-899072-42, Mihai Iovea, Marian Neagu, B. Stefanescu, Gabriela Mateiasi, Mathew Amos, Ian Nicholson, Maxim Ponomarev
77. A DEFECT DETECTION AND CLASSIFICATION SYSTEM FOR AUTOMATIC ANALYSIS OF DIGITAL RADIOGRAPHY IMAGES OF POWDER METALLURGY PARTS; European Powder Metallurgy Association 2013,15-18 September, Gothenburg, Sweden; Proceedings Volume 2, Session 27: Non Destructive Testing, pp.181-186, ISBN 978-1-899072-42-2; Maxim Ponomarev; Tat-Hean Gan; CemSelcuk; Mathew Amos; Ian Nicholson; Mihai Iovea, Marian Neagu
78. THREAT LIQUID IDENTIFICATION IN HAND-HELD BAGGAGE, 2013 IEEE Nuclear Science Symposium and Medical Imaging Conference (2013 NSS/MIC); Mihai Iovea, Marcus Brehm, Sebastian Faby, Michael Knaup, Marc Kachelrieß, Ben Cantwell, Xun Wang, Ian Radley, Mohammed Ayoub, Keith Powell
79. ON THE HEAVY ELEMENTS CONTENT OF SEDIMENTS AND ROCKS FROM TWO SEMICLOSED ECOSYSTEMS: PROGLACIAL LAKE BÂLEA (FĂGĂRAŞ MOUNTAINS) AND CRATER LAKE ST. ANA (HARGHITA MOUNTAINS), Physics of Particles and Nuclei 01/2013; 10(5):469–475. DOI: 10.1134/S1547477113050087; O.G. Duliu; S.I. Lyapunov, A.V. Gorbunov, C. Ricman, T. Brustur, M.V. Frontasyeva, O.A. Culicov and M. Iovea
80. PRELIMINARY NDT INVESTIGATION OF SINTERED POWDER METALLURGY PARTS BY HIGH-RESOLUTION TDI BASED X-RAY DIGITAL RADIOGRAPHY, Powder Metallurgy European Congress, 2013 September 16-19, Basel, Switzerland; Mihai IOVEA, Marian NEAGU, Gabriela MATEIASI; Harshad V. HALAI, Mathew AMOS; Maxim PONOMAREV, Vassilis KAPPATOS, Cem SELCUK, Tat-Hean GAN; Christian GIERL, Mohammad MOMENI; Powder Metallurgy European Proceedings, Vol.1, p.145-150
81. DEVELOPMENT OF A DIGITAL RADIOGRAPHIC INSPECTION TECHNIQUE FOR PRODUCTION FRIENDLY QUALITY ASSESSMENT OF POWDER METALLURGY PARTS; Powder Metallurgy European Congress, September 16-19, Basel, Switzerland; Maxim G Ponomarev, Vassilis Kappatos, Cem Selcuk, Tat-Hean Gan, Mathew Amos, Harshad Halai Christian Gierl, Mihai Iovea; Powder Metallurgy Journal - Vol. 56, No. 2, pp 92-95, 2013;
82. X-Ray Radiographic Study of some Panel Painting Icons from the Beginning of the XX-th Century, *International Journal of Conservation Science*, ISSN 2067-533X, Volume 2, Issue 3, July-September 2011, 179-183; http://www.ijcs.uaic.ro/pub/IJCS-11-16-Emandi.pdf
83. A Dedicated On-Board Dual-Energy Computer Tomograph, *Journal of Nondestructive Evaluation* (Springer), Volume: 30,Issue: 3,Pages: 164-171,DOI: 10.1007/s10921-011-0104-x,June 2011; Mihai Iovea, Marian Neagu, Octavian G. Duliu, Gheorghe Oaie, Stefan Szobotka, Gabriela Mateiasi. http://www.springerlink.com/content/bpx2mn784r7k5h71/
84. New Portable and Autonomous Dual ENERGY X-Ray System for NDT and Security Applications, International Symposium on Digital Industrial Radiology and Computed Tomography, June 20 – 22, 2011, Berlin, Germany; M. Iovea, G. Mateiasi, M. Neagu , O.G. Duliu
85. Performances Comparison between a 2D Flat Panel X-ray Detector and a Virtual One Based On Linear Array X-Ray Detector Translation Technique, International Symposium on Digital Industrial Radiology and Computed Tomography, June 20 – 22, 2011, Berlin, Germany; M. Iovea, I. Tiseanu, T. Craciunescu, M. Neagu, G. Mateiasi;
86. PORTABLE AND AUTONOMOUS X-RAY EQUIPMENT FOR IN-SITU THREAT MATERIALS IDENTIFICATION BY EFFECTIVE ATOMIC NUMBER HIGH-ACCURACY MEASUREMENT, *SPIE 2011 Defence, Security & Sensing Conference*, April 2011, Orlando -Florida USA , M. Iovea, G. Mateiasi, M. Neagu , O.G. Duliu (published in Proc. of SPIE Vol 8017 801713-1; DOI: 10.1117/12.883666) http://spie.org/x648.html?product_id=883666
87. COMBINED X-RAY DUAL-ENERGY RADIOSCOPY AND TOMOGRAPHY ANALYSIS FOR EXPLOSIVES DETECTION, Materials Evaluation, vol 67, Issue:12, pg. 1343-1349, December 2009, M. Iovea, G. Mateiasi, O.G. Duliu, M. Neagu and M. Mangu. http://www.asnt.org/publications/materialseval/materialseval.htm
88. Dual energy X-ray computer axial tomography and digital radiography investigation of cores and other objects of geological interest; 2008 *Engineering Geology*, Volume:103, Issue: 3-4, Pages:119-126,DOI: 10.1016/j.enggeo. 2008.06.018, M. Iovea, G. Oaie, C. Ricman, G. Mateiasi, M. Neagu, S. Szobotka and O.G. Duliu http://www.sciencedirect.com/science/article/pii/S0013795208001713
89. PORTABLE AND AUTONOMOUS X-RAY DUAL-ENERGY RADIOSCOPY AND TOMOGRAPHY EQUIPMENT FOR SECURITY AND NDT APPLICATION, *American Society for Non-destructive Testing Fall Conference 2009 Columbus OHIO*, 16-18 October 2009, M. Iovea, M. Neagu, O. Duliu, G. Mateiasi, M. Mangu (abstract)
90. COMPLEX STUDY OF OXIGENATED and ANOXIC SEDIMENTS OF THE BLACK SEA ZONES, Faculty of Physics General Scientific Seminar, University of Bucharest, 25th November 2009, Bucharest, Romania O.G. DULIU, M. IOVEA, M. NEAGU, G. OAIE, S.A. SZOBOTKA, C. CRISTACHE, M. TOMA, O.A. CULICOV, M.V. FRONTASYEVA (invited paper);
91. VISUALIZATION, ANALYSIS AND MATERILAS IDENTIFICATION TECHNIQUES IN X_RAY DUAL_ENERGY RADIOSCOPY AND TOMOGRAPHY FOR SECURITY AND NDT APPLICATION, *Institute of Atomic Physics Seminar, 26th June 2009 (invited paper);* M. Iovea; http://www.ifa-mg.ro/seminarii/26_iunie_2009/Mihai_IOVEA-Seminar_IFA_26Iunie2009.pdf (in Romanian language)
92. PRELIMINARY EXPERIMENTS OF SINGLE X-RAY VIEW CATHETER 3D LOCALIZATION ALGORITHM FOR TARGETED STEM CELL INJECTIONS, SPIE Medical

Imaging Conference, 8-12 February 2009, Florida; Proc. SPIE 7261, 72611Y (2009); doi:10.1117/12.811036 ; M. Iovea , J.Creed, E. Perin; M. Neagu, G. Mateiasi. http://spie.org/x648.html?product_id=811036

93. X-RAY MICRO-TOMOGRAPHY AS A TOOL FOR QUANTITATIVE CHARACTERIZATION OF ADVANCED MATERIALS MANUFACTURING PROCESSES, Advanced Materials Research Vol 47-50 (2008), 698-701, Ion Tiseanu, Teddy Craciunescu, M. Iovea; http://www.scientific.net/0-87849-378-6/698/
94. DUAL-ENERGY COMPUTED TOMOGRAPHY AND DIGITAL RADIOGRAPHY: VALUABLE METHODS IN INVESTIGATING UNCONSOLIDATED SEDIMENTS, *International Seminar on Natural Hazards in the Marine Area*, 28-29 July 2008, Bucharest, Romania; Duliu O., Iovea M., Oaie Gh., Neagu M. , Szobotka St., Mateiasi G
95. MATERIALS MICROANALYSIS TECHNIQUE BY DUAL-ENERGY X-RAY TOMOGRAPHY AND RADIOSCOPY, The British Institute of Non-Destructive Testing *NDT 2008 Conference*, 16-18 September 2008, Cheshire - UK; M. Iovea, O.Duliu, G.Mateiasi, M. Neagu, M. Mangu; Ion Tiseanu, Teddy Craciunescu
96. COMBINED X-RAY DUAL-ENERGY RADIOSCOPY AND TOMOGRAPHY ANALYSIS FOR EXPLOSIVES DETECTION, ASNT Fall Conference 2008, 10-14 November 2008, Charleston, South Carolina-USA; M. Iovea, G.Mateiasi, O.Duliu, M. Neagu, M. Mangu
97. Studiul interdisciplinar al ecosistemelor semiînchise (lacuri alpine si vulcanice) in vederea stabilirii nivelului de referinta pentru aprecierea impactului factorului antropic: Lacurile alpine din Masivul Fagaras si Lacul Sfânta Ana, Geo-Eco-Marina 14, supliment nr. 1, 2008, p.181 – 185; Duliu O., Brustur T., Szobotka S., Oaie G., Ricman C., Alexe V., Iovea M., Hodorogea S.
98. THE COMPUTERIZED STAND FOR ELECTRICAL MOTORS TESTING "ELMOTE 03" - FACILITIES AND PERFORMANCE; The XVII - th Session of Scientific Papers "Progress in Electrical Motors Under 10 kW Design", Pitesti, 14-15 mai 1998; Mihai Iovea, Paul Chitescu, Marian Neagu

RECONSTRUCTION ALGORITHM FOR ELECTRICAL IMPEDANCE TOMOGRAPHY; 3rd General Conference of the Balkan Physical Union, Cluj-Napoca, 2-5 September 1997, [abstract pg. 396]; M. Iovea, Gh. Georgescu, A. Marinescu, C. Rizescu, P. Chitescu

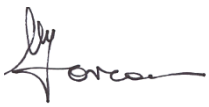
99. ADVANCED NON-DESTRUCTIVE TECHNIQUES USING GAMMA RAY COMPUTERIZED TOMOGRAPHY ; 3rd General Conference of the Balkan Physical Union, Cluj-Napoca , 2-5 September 1997, [abstract pg. 467]; M. Iovea, C. Rizescu, A. Marinescu, Gh. Georgescu, P. Chitescu
100. A DIRECT GAMMA RAY CALIBRATION METHOD FOR DENSITY MEASUREAMENT WITH APPLICATIONS IN INDUSTRIAL TOMOGRAPHY ; 3rd General Conference of the Balkan Physics Union, Cluj-Napoca , 2-5 September1997, [abstract pg. 466]; M. Iovea, A. Marinescu, C. Rizescu, Gh. Georgescu, I. Dumitrescu
101. AN OBJECT ORIENTED MODELLING SYSTEM FOR INTERACTION SIMULATION IN 3D INDUSTRIAL TOMOGRAPHY; Proceedings of the 19th International Conference on INFORMATION TECHNOLOGY INTERFACES, Poula, Croatia, 17-20 June 1997, [pg. 457-462]; M.Iovea, A. Marinescu, C. Rizescu, Gh. Georgescu, I. Dumitrescu
102. COMPUTERIZED MONITORING OF VESSELS BY ACOUSTIC EMISSION EVALUATION XXIII-rd National Conference of Thermo-energy; Brasov, Romania, December 4-6, 1996; Gabriela Mateiasi, Mihai Iovea
103. NON DESTRUCTIVE TESTS OF PIPES USING INDUSTRIAL COMPUTERIZED TOMOGRAPHY; *National Conference of Energy*, Neptun-Olimp, Romania, 1-5 September 1996 [pg. 201-205]; M.Iovea, C.Rizescu, Gh.Georgescu, A.Marinescu, P.Chitescu, et al
104. ON-LINE MONITORING OF THE METALLIC STRUCTURE USING ACOUSTIC EMISSION ANALYSIS; The Session of Scientific Papers of the Acoustical Commission of the Romanian Academy, Bucharest, Romania, September 15-16, 1996 [pg. 141-144]; G.Mateiasi, M.Iovea, N.Cupcea
105. COMPUTERIZED TOMOGRAPHY USED IN NON-DESTRUCTIVE TESTING OF WELDED PIPES; National Energy Conference, Neptun-Olimp, Romania, September 1-5, 1996 [pg. 201-205]; M.Iovea, C.Rizescu, Gh.Georgescu, A.Marinescu, P.Chitescu, T.Sava, M.Neagu, D.Avram
106. SOME ASPECTS OF COMPUTERIZED TECHNOLOGIES BY USING GAMMA-RAY COMPUTERIZED TOMOGRAPHY AND ULTRASONIC IMAGING IN NDT; The 3rd edition of the National Symposium of the Romanian Association of Non-Destructive Testing, Mamaia, Romania, May 29-31, 1996 [pg. 104-111]; M.Iovea, C.Rizescu, A.Marinescu, P.Chitescu, Gh.Georgescu
107. GRAPHIC ENVIRONMENT FOR INDUSTRIAL COMPUTERIZED TOMOGRAPHY; The Fourth International Conference in Central Europe on Computer Graphics and Visualization'96, University of West Bohemia, Plzen, Czech Republic, February 12-16, 1996 [pg. 267-268]; M.Iovea, A.Marinescu, P.Chitescu, T.Sava, C.Rizescu, Gh.Georgescu http://wscg.zcu.cz/wscg96/papers96/IOvea_96.pdf
108. TRIDIMENSIONAL ANALYSIS BY COMPUTERIZED TOMOGRAPHY; National Physics Conference, Baia Mare, Romania, Nov.-Dec. 30-02, 1995 [abs., pg. 54]; M.Iovea, A.Marinescu, P.Chitescu, C.Rizescu, T.Sava, Gh.Georgescu, M.Neagu, D.Avram
109. DEFECTS ANALYSIS BY IMMERSION ULTRASOUND TRANSDUCERS; The Session of Scientific Papers "Electro technique. Present and Perspectives", Bucharest, Romania, October 30-31, 1995 [pg. IC 88-93]; M.Iovea, C.Rizescu, Gh.Georgescu, A.Marinescu, P.Chitescu, D.Avram, M.Neagu
110. SOME ASPECTS CONCERNING THE COMPUTERIZED MONITORING OF VIBRATIONS The Session of Scientific Papers of the Acoustical Commission of the Romanian Academy, Bucharest, Romania, October 17-18, 1995, [pg. 23-26]; G.Mateiasi, M.Iovea, T.Sava, P.Chitescu
111.
112. COMPUTERIZED RECONSTRUCTION OF OBJECTS BY ULTRASOUND SCANNING *The Session of Scientific Papers of the Acoustical Commission of the Romanian Academy*, Bucharest, Romania, October 17-18, 1995 [pg. 81-86]; M.Iovea, Gh.Georgescu, C.Rizescu, A.Marinescu et.al
113. NON-DESTRUCTIVE TESTING USING IMMERSED ULTRASOUNDS SYSTEM; The 5th National Conference on Non-Destructive Testing, Bucharest, Romania, September 27-29, 1995 M.Iovea, Gh.Georgescu, C.Rizescu, A.Marinescu
114. 2D AND 3D COMPUTERIZED CONTROL USING INDUSTRIAL TOMOGRAPHY The 5th National Conference on Non-Destructive Testing, Bucharest, Romania, September 27-29, 1995; M.IoveaM, A.Marinescu, P.Chitescu, T.Sava, C.Rizescu, Gh.Georgescu
115. COMPUTERIZED SYSTEM FOR VIBRATION MONITORING WITH APPLICATION TO STEAM TURBINES; The 5th National Conference on Non-Destructive Testing, Bucharest, Romania, September 27-29, 1995; G.Mateiasi, M.Iovea, P.Chitescu, T.Sava
116. USING COMPUTERIZED TOMOGRAPHY IN NON-DESTRUCTIVE TESTING OF SOLID MATERIALS; The Annual Symposium of the Institute of Solid Mechanics, Romanian Academy, Bucharest, Romania, December 15-16, 1994 [pg. 357-364]; M.Iovea, A.Marinescu, P.Chitescu, T.Sava, Gh.Georgescu, C.Rizescu
117. THE USE OF ULTRASONIC WAVES IN COMPUTER-BASED SYSTEMS WITH IMMERSED TRANSDUCERS; The Annual Symposium of the Institute of Solid Mechanics, Romanian Academy, Bucharest, Romania, December 15-16, 1994 [pg. 365-370]; M.Iovea, Gh.Georgescu, C.Rizescu. A.Marinescu, P.Chitescu
118. THE STRUCTURAL INTEGRITY EVALUATION FOR METALLIC MATERIALS BY ACOUSTIC EMMISION; The Session of Scientific Papers of the Acoustical Commission of the Romanian Academy, Bucharest, Romania, October 18-19, 1994 [pg. 167-170]; G.Mateiasi, M.Iovea
119. APPLICATION OF ACOUSTIC EMISSION TECHNIQUES FOR DETECTION OF DISCONTINUITIES IN ELECTRIC POWER STATIONS; The National Conference on Physics, Sibiu, Romania, September 21-24, 1994 [abs., pg.38]; G.Mateiasi, M.Iovea
120. SOME ASPECTS OF INDUSTRIAL NON-DESTRUCTIVE EVALUATION BY GAMMA RAY COMPUTED TOMOGRAPHY; The National Conference on Physics, Sibiu, Romania, September 21-24, 1994 [abs., pg.38]; M.Iovea, A.Marinescu, P.Chitescu, T.Sava
121. THREE-DIMENSIONAL METHOD OF REPRESENTATION IN INDUSTRIAL COMPUTERIZED TOMOGRAPHY; International Conference on Physics Computing, Lugano, Switzerland, August 22-26, 1994; M.Iovea, A.Marinescu, P.Chitescu
122. MULTI-CHANNEL EQUIPMENT FOR STEAM TURBINES VIBRATION DIAGNOSIS; The National Energy Conference, Neptun, Romania, June 13-16, 1994 [vol. IX, pg. 80-86]; G.Mateiasi, A.Zabunov, M.Iovea, P.Chitescu, T.Sava
123. SOME ASPECTS CONCERNING THE STAGE OF APPLYING COMPUTERIZED INDUSTRIAL TOMOGRAPHY IN ROMANIA; International Symposium on Computerized Tomography for Industrial Applications, Berlin, Germany, June 8-10, 1994 [pg. 316-321]; M.Iovea, A.Marinescu, P.Chitescu, T.Sava
124. VIBRATION DIAGNOSIS EQUIPMENT FOR 50 MW STEAM TURBINES; The Conference "New Methods of Computer Aided Analysis for Energetic Equipment", Arad, Romania, May 20-21, 1993; G.Mateiasi, M.Iovea, V.Toader
125. THE CONTINUOUS SURVEILLANCE OF TURBINE VIBRATIONS; The 9th International FASE Symposium of Romanian Academy Acoustical Commission, Bucharest, Romania, September 15-17, 1993 [pg. 67-70]; G.Mateiasi, A.Cavaleru, M.Iovea, V.Toader
126. ACOUSTIC EMISSION AS A TOOL FOR TESTING VESSELS UNDER HYDROSTATIC PRESSURE; The Annual Symposium of the Institute of Solid Mechanics, Romanian Academy, Bucharest, Romania, November 26-27, 1992 [pg. 214-218]; G.Mateiasi, M.Iovea

.

Projects

1. Quantum-enhanced Perovskite crystal scintillators for Innovative X-ray photon-counting in medical imaging and other applications - QuPIX, , Program HORIZON-EIC-2025-PATHFINDEROPEN
2. Aplicații medicale ale laserilor de mare putere - Dr. LASER, 20.02.2025 – 19.12.2029, MINISTERUL INVESTIȚIILOR ȘI PROIECTELOR EUROPENE (MIPE) Program Sănătate
3. Platforma Nationala pentru Tehnologiile Semiconductorilor - PNTS, 27.11.2024 – 26.11.2029, MINISTERUL INVESTIȚIILOR ȘI PROIECTELOR EUROPENE (MIPE), Programul Crestere Inteligenta, Digitalizare si Instrumente Financiare 2021 – 2027 (PCIDIF)
4. Integration of Advanced Experiments, Computation and Data for Innovation in Freeze Casting and Advanced Porous Structures - ice-Link, 01.01.2024 – 31.12.2027, European Commission - Program Marie-Curie
5. DIGITAL MAINTENANCE FOR SUSTAINABLE AND FLEXIBLE OPERATION OF HYDROPOWER PLANT - Di-Hydro, 01.10.2023 – 30.09.2026, European Commission - Horizon Europe
6. X-Ray Density measurement equipment – DensitiX, 27.11.2023 – 30.09.2024, SINTEX A/S, Danemarca
7. LASER-DRIVEN GAMMA IMAGING STUDIES AND EXPERIMENTS FOR APPLICATIONS DEVELOPMENT - ELI-NP, Magurele, ILFOV
8. sHip inspection by auTonOmousdRone – HECTOR, 10.03.2022 – 09.03.2023, European Commission – Horizon 2020 – Proiect GALATEA
9. PinScratch - August, 2022 to December, 2022, Private funded project
10. Imbunatatirea tehnicilor de imagistica cu raze X neconventionale pentru investigarea efectelor iradierii tesuturilor biologice cu doze de radiatii gama monitorizate – BIOIMAGING, 01.07.2021- 23.01.2023, FONDUL EUROPEAN DE DEZVOLTARE REGIONALĂ, PROGRAMUL OPERAȚIONAL COMPETITIVITATE 2014-2020, AxaPrioritară 1 – Cercetare, dezvoltare tehnologică și inovare (CDI) în sprijinul competitivității economice și dezvoltării afacerilor, Acțiunea 1.2.3, Tip proiect – Parteneriate pentru transfer de cunoștințe
11. X-CAPS Automatic Digital X-Ray Radiography System For Medical Capsules and Small Parts, 22.04.2020 – 21.04.2023, QUALICAPS Romania SRL
12. Know-how transfer contract with Integrity NDT -Turkey for delivering the technologies and manufacturing design for ceramic ballistic plates in-line Non-Destructive Control machine, 14.02.2020 – 04.10.2021, Integrity NDT, Turcia
13. New advanced technologies for surfaces deposition by using high-power lasers for increasing the materials reliability and performances – PRELAM, 01.09.2019 – 31.12.2022, FONDUL EUROPEAN DE DEZVOLTARE REGIONALĂ prin PROGRAMUL OPERAȚIONAL COMPETITIVITATE 2014-2020, Axa Prioritară 1 – Cercetare, dezvoltare tehnologică și inovare (CDI) în sprijinul competitivității economice și dezvoltării afacerilor, Acțiunea 1.2.3, Tip proiect – Parteneriate pentru transfer de cunoștințe
14. Enabling X-ray CT based industry 4.0 process chains by training next generation research experts, xCTing, partner, March 2021 to February, 2025, MSCA-ITN-2020-ETN (Marie Skłodowska-Curie Innovative Training Networks), MSCA-ITN-ETN (European Training Networks), Proposal number: 956172
15. Development of a dedicated Non-destructive equipment for ballistic plates in-line control - NUROL Teknoloji A.S., coordinator
16. X-Shaper dedicated non-destructive equipment for ballistic plates in-line control, 15.02.2018 – 30.09.2019, Nurol Teknoloji, Turcia
17. Developing static tomographic machines equipped with new X-ray algorithms for the next generation of 3D baggage scanners- Gilardoni, coordinator
18. Sistem de imagistica pasiva cu unde milimetrice pentru scanarea rapida a persoanelor cu aplicații in domeniul securitati - acronim BODYSCAN, coordinator, 08.03.2018 – 07.05.2021, FONDUL EUROPEAN DE DEZVOLTARE REGIONALĂ, PROGRAMUL OPERAȚIONAL COMPETITIVITATE 2014-2020, AxaPrioritară 1 – Cercetare, dezvoltare tehnologică și inovare (CDI) în sprijinul competitivității economice și dezvoltării afacerilor, Acțiunea 1.2.3, Tip proiect – Parteneriate pentru transfer de cunoștințe
19. MUltiscale, Multimodal and Multidimensional imaging for EngineeRING - acronim MUMMERING, Partner, 01.01.2018 – 31.12.2021, European Commission - Horizon 2020 – Marie Sklodowska-Curie
20. Noi tehnologii avansate de acoperire a suprafetelor folosind fascicul laser de mare putere in vederea cresterii fiabilitatii si a performantelor materialelor – PRELAM, partener
21. A know-how transfer contract with Integrity NDT -Turkey for delivering the technologies and manufacturing design for ceramic ballistic plates in-line Non-Destructive Control machine -coordonator
22. Security applications development at ELI-NP: detecting concealed threatening materials by using Nuclear Resonance Fluorescence and 2D/3D tomography with gamma beams – acronym ELI_THREAT_DETECT, 2017-2019, coordinator, 10.2017 – 12.2019, Ministerul Crecetarii si Inovarii, PNCDI 2015 – 2020, Programul 5, Subprogramul 5.1 Programul de cercetare, dezvoltare și inovare pentru tehnologii în domeniul laserilor de ultra-înaltă putere – ELI-RO
23. Support action for gamma beam industrial imaging applications development at ELI-NP – acronym ELITOMO, 2016-2019, coordinator, 09.2016 – 08.2019, ANCSI, PNCDI 2015 – 2020, Programul 5, Subprogramul 5.1 Programul de cercetare, dezvoltare și inovare pentru tehnologii în domeniul laserilor de ultra-înaltă putere – ELI-RO
24. Security Applications: X-Ray Dual/Multi Energy and Diffraction Technique for Single/Dual View Digital

Radiography and 2D & 3D Tomography for Baggage Threats detection, 2015, coordinator

25. Advanced X-Ray Imaging System for Aerospace Components Structural Integrity Investigation (DUALXSCAN), 2012 – 2015, coordinator, Romanian Space Agency - STAR
26. Contract no.323E/01.10.2012 for co-financial support of Romanian partners in EUREKA-EUROSTARS projects participation (DCXScan), 2012 – 2015, coordinator
27. NextGen Scanner for Checked In Luggage – acronym **CIL2018**, European funded projects, 2016-2018, Coordinator: The Technical University of Denmark, Partner
28. Multi-parameter X-ray baggage scanner for threatening materials detection in Security applications – acronym Multi X-ray Scan, Romanian Funding Application for Joint Applied Research Projects PN-II-PT-PCCA-2013-4, 2014-2016, coordinator
29. Continuous monitoring systems for the SAFE storage, distribution and usage of Hydrogen POWER for transport - acronym **SafeHPower**, FP7 Research for SME, 2013-2015, GA 605095 – Coordinator, http://www.safehpower.eu/
30. Design and development of Soft X-ray Photodiodes data Acaqusition System for Tokamak's plasma X-ray Imaging, Contract with The Johns Hopkins University, Maryland USA, 2012-2013, coordinator
31. Contract no.190EU/22.10.2012 for co-financial support of Romanian partners in FP7 projects participation, acronym AUTOINSPECT, 2012 - 2013coordinator
32. EC-FP7 **PLASTRONICSSPEC** Project X-Ray Non-Destructive Testing of OLED Display, 2012 – 2013, coordinator
33. Contract no.194EU/22.10.2012 for co-financial support of Romanian partners in FP7 projects participation (ChipCheck), 2012 – 2013, coordinator
34. Digital Colour X-ray Security Scanning System - acronym DCXScan , Eureka Eurostars Project E!7308, 2012-2014, Partner
35. Development of an automated digital radiography system for the inspection of plastic electronics – acronym PlastronicsSpec, FP7 Research for SME, 2011- 2013, GA 286531 – Coordinator, www. plastronicsspec.com
36. Automated inspection for sintered parts by non-destructive techniques for improved quality in production – acronym **AutoInspect**, FP7 Research for SME, 2011-2013, GA 283288 – Coordinator, http://www.autoinspectproject.eu/
37. Development of Novel X-ray Inspection System for Fast Automated Detection of Counterfeit PCB Components – acronym **ChipCheck**, FP7 Research for SME, 2010-2012, GA 262212 – partner ; http://www.chipcheck.eu/
38. Experiments and improvements for Dual-energy X and gamma ray radioscopy and Tomography for baggage and truck screening, 2009-2010 (private customer) – coordinator
39. Preliminary Experiments with X-Ray backscattering technique for airport passenger screening, 2010 (private customer)- coordinator
40. Studies and preliminary experiments for portable, automate and fast system for dangerous materials identification from baggage, parcels or other suspected objects by X-ray Radioscopy and Tomography using dual-energy technique acronym TOMORAY (81-003/ 2007-2010) - coordinator
41. The design and development of high-resolution dual- energy X-ray Radioscopy and Tomography mobile and autonomous system destined for fast identification of the explosive materials during the antitero interventions acronym DUALTOMO, 2007 – 2010, coordinator, PNII PC D8 Security
42. Experiments and algorithms in Electrical Impedance Tomography – European Commission, FP5 PECO/COPERNICUS - CIPD940254 - partner
43. In Process Control with Optical Coherence Tomography - acronym IPC-OCT –FP6 CRAFT –COOP-CT, 2003-2005 GA 507825 – partner, January, 2004 to December, 2006,
44. Combined Terahertz- X-ray spectroscopy experiments and analysis Advanced contactless material identification in security and quality control, acronym AMATID (C-D FFG CIRCE AUSTRIA) – partner, January, 2008 to December, 2009, European funded project
45. Nano/Micro-Scale Imaging and Metrology By Electron and X-Ray 3-D Tomography of Innovative Materials, acronym NIMETIM (CEEX 06-D11- 23/2006-2008) - partner
46. Application and development of the new methods for investigation and dating of major climate and sea level changes in the Danube Delta and the Black Sea in order to reconstruct the evaluation and predict the associated risks, acronym CLIMARISC (31-068/2007-2010) – partner, January, 2007 to December, 2010, PN II PC D3 Environment
47. Studies and preliminary experiments for portable, automate and fast system for• dangerous materials identification from baggage, parcels or other suspected objects by X-ray Radioscopy and Tomography using dual-energy technique, acronym TOMORAY (S-001 PNCD Security, 2006-2007) – coordinator
48. The integrated and multidisciplinary investigation of the semi-closed ecosystems (alpine and volcanic lakes), to establish the reference level, to realize an ecological approach of the entropic impact: the alpine lakes from the Fagaras Mountains and the volcanic Saint Ana Lake, acronym ALPIMP (31-013/2007-2010) - partner , PN II PC D3 Environment
49. Dual-energy X-Ray Tomography applied to marine and deltaic geology for obtaining, in situ and in laboratory, new data about geological samples density and chemical compositions (CEEX – MENER, 625 /03.10.2005) – partner
50. Design and development of Low-Noise Transimpedance preamplifier for NSTX Tokamak soft X-ray detectors used in plasma diagnosis – contract with Johns Hopkins University, 2005 ccordinator, January, 2005 to December, 2005, Private funded project

Mihai IOVEA
Update: 21. 09.2026