

INFORMAȚII PERSONALE

Loredana Gabriela Marcu



DETALII PERSONALE

Ocupația curentă

Profesor universitar

Universitatea din Oradea, Oradea (Romania)

Domenii de expertiză:

- *radiobiologie / simularea proceselor radiobiologice*
- *radioprotecție*
- *fizică medicală / radioterapie / brahiterapie*

Activități de bază:

- predare / cercetare
- conducere doctorate; conducere lucrări de finalizare a studiilor.

STUDII

4 Jan 2000–1 Mar 2005

Doctorat in Fizică

University of Adelaide, Adelaide (Australia)

1 Oct 2007–1 Iul 2008

Masterat Didactic

Universitatea din Oradea

1 Oct 1994–1 Iul 1995

MSc in Fizica Aplicată

Universitatea de Vest, Timișoara

1 Oct 1989–1 Iul 1994

Licențiat in Fizică

Universitatea de Vest, Timișoara

APTITUDINI

Limba maternă

Română, Maghiară

Alte limbi

	UNDERSTANDING		SPEAKING		WRITING
	Listening	Reading	Spoken interaction	Spoken production	
Engleza	C2	C2	C2	C2	C2
Franceza	A2	A2	A2	A2	A2

Aptitudini de comunicare

- abilități foarte bune de comunicare dobândite prin experiența mea ca profesor
- abilități foarte bune de comunicare cu studenții ca profesor/coordonator de curs
- publicarea a numeroase cărți în limbile engleză și română

Organizare / aptitudini manageriale

- Chair of Women in Medical Physics Subcommittee / IOMP (Aug 2022 -)
- Chair of the European Matters Committee / EFOMP (Jan 2021- Dec 2023)
- Presedinte - Colegiului Fizicienilor Medicali din România (Jan 2018 – Dec 2023)
- Co-chair of Women in Medical Physics and Biomedical Engineering Task Group, IUPESM (International Union for Physical and Engineering Sciences in Medicine) (March 2020 - present)
- Coordonator PhD la University of South Australia (Australia) si Universitatea de Vest, Timisoara
- TEAP preceptor (Training, Education and Accreditation Program in Medical physics) in South Australia (2010-2012)

Aptitudini digitale

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

Digital skills - Self-assessment grid

INFORMAȚII ADIȚIONALE

Invited Speaker / Visiting Professor

- Keynote speaker - International Conference on Advances in Radiation Oncology (ICARO3), IAEA, Vienna, 16-19 Feb (2021)
- Keynote Speaker - Engineering & Physical Sciences in Medicine (EPSM) Conference, Adelaide, 29-31 Oct (2018)
- Invited Speaker - IUPESM World Congress on Medical Physics and Biomedical Engineering 2025, Adelaide, 29 Sept - 4 Oct (2025)
- Invited Speaker - Workshop: Accounting for fractionation in radiotherapy, Stockholm, Sweden, 5-6 Sept (2024)
- Invited Speaker - The 5th European Congress of Medical Physics (ECMP), Munich, 11-14 Sept (2024)
- Invited Speaker - 11th Alpe-Adria Medical Physics Meeting, Novi Sad, Serbia, 19-22 Oct (2023)
- Invited Speaker - Workshop: The role of oxygen in radiation therapy, Stockholm, Sweden, 4-5 Sept (2023)
- Invited Speaker - IUPESM World Congress on Medical Physics & Biomedical Engineering, Singapore, 12-17 June (2022)
- Invited Speaker - 13th ACOMP Workshop - Radiobiology in the era of precision medicine, Malaysia, 23 April (2021)
- Invited Speaker - International Conference on Advances in Radiation Oncology - ICARO3, IAEA, Vienna, 16-19 Feb (2021)
- Invited Speaker - International Organization for Medical Physics (IOMP) School Webinar, 9 Sept (2020)
- Invited Speaker - National Conference of Biophysics & Radiobiology, Bucharest, 7-10 Sept (2018)

- Invited Speaker - The 2nd European Congress of Medical Physics (ECMP), Copenhagen, 23-25 Aug (2018)
- Invited Speaker - Workshop: Risk of secondary cancer following radiotherapy, Stockholm, 8-9 Sept (2016)
- Invited Speaker – Australasian College of Physical & Engineering Sciences in Medicine Meeting, Perth, Australia, 17-22 May (2015)
- Invited Speaker – EPSM Summer School on Functional Imaging, Darwin, Australia, 12-13 Aug (2011)
- Invited Speaker - TIM17 Physics Conference, Timisoara, Romania, 25-27 May (2017)
- Visiting Professor - School of Health Sciences, University of South Australia, 1-16 Sept (2017)
- Visiting Professor - Karolinska Institutet, Stockholm, Sweden, 18-24 Sept (2016)
- Visiting Professor - Sansom Institute for Cancer Research, University of South Australia, 21 May-4 June (2016)

Premii

- Diploma Excelență în cercetare, Universitatea din Oradea (2022)
- Certificat de Merit, Universitatea din Oradea (2013)
- 'Boyce Worthley young achiever award' – Australasian College of Physical Scientists and Engineers in Medicine (ACPSEM) (2006)
- 'Eminent scientist of the year 2004' award – International Research Promotion Council (2004)
- University of Adelaide Award (PhD scholarship) (2000)

Comitete

- Membru al ICRP Committee 3 (2025 -)
- Membru al ICRP Task Group 126 (Sept 2022 -)
- Membru al comisiei CNATDCU de fizică (2016-prezent)
- Women in Medical Physics and Biomedical Engineering Task Group, IUPESM (International Union for Physical and Engineering Sciences in Medicine) (from 2015)
- EFOMP National Representative for Romania (2015-present)
- IOMP National Representative for Romania (2016-present)

Evaluator expert

- European Science Foundation – membru al Colegiului de evaluatori experti
- Qatar National Research Fund
- The National Fund for Scientific and Technological Development (FONDECYT)
- "La Caixa" Foundation Grants, Spain EFOMP National Representative for Romania (2015-present)
- The Czech Science Foundation
- The Slovak Research and Development Agency
- The Executive Unit for Financing Higher Education, Research, Development and Innovation (UEFISCDI)
- The Government of Western Australia, Department of Health
- Stockholm University, Faculty of Physics, External Expert Reviewer - Hiring Committee (2020/2021)
- Swiss Group for Clinical Cancer Research

Organizarea de conferințe

- Task chair of the IUPESM World Congress on Medical Physics and Biomedical Engineering, Adelaide 29 Sept. - 4 Oct. 2025
- Membru al International Advisory Committee of The International Conference on Medical Physics,

Mumbai, India, 6-9 Dec. 2023

- Membru al Scientific Board of The 6th European Congress on Radiation Protection, Budapest, 30 May - 3 June 2022
- Membru al Scientific Board of *The 2nd European Congress of Medical Physics*, Copenhagen, Denmark, 23-25 August 2018
- Organizator principal al *The 14th National Conference of Romanian Medical Physicists*, Oradea, 4-6 November 2016
- Organizator principal al International Day of Medical Physics Symposia, Oradea, University of Oradea, Nov 2013, 2014, 2015, 2016
- Membru al Organizing Committee of *The 13th National Conference of Romanian Medical Physicists*, Cluj-Napoca, 7-8 November 2015
- Membru al International Advisory Committee of the *World Congress on Medical Physics 2015*, Toronto, Canada
- Organizator principal al CPD course *The Physics of Radiological Imaging*, Baile Felix, Oradea, 19-21 September 2013
- Membru al Organizing Committee of *The 4th MOT Meeting (Modelling of tumour growth and development)*, Adelaide, 2-4 August 2012
- Scientific chair of the *EPSM-ABEC 2011* conference, Darwin, Australia, 14-18 August 2011
- Membru al Scientific Organizing Committee of the *Summer School on Functional Imaging*, Darwin, Australia, 12-13 August 2011
- Membru al Scientific Organizing Committee of the *EPSM 2005, Adelaide*, October 2005
- Membru al Organizing Committee of *The 2nd MOT Meeting (Modelling of tumour growth and development)*, Adelaide, May 2004.

Granturi de cercetare

- CNCS-UEFISCDI, PN-IV-P1-PCE-2023-0042 – Director proiect. Titlu proiect: *Delta-radiomics for personalised treatment of head and neck cancer using artificial intelligence*.
- “Scientia Gloria Universitas Varadiensis”, grant cercetare Universitatea din Oradea oferit Centrului de Cercetare Stiinte Naturale (director grant)
- Research Themes Investment Scheme (RTIS) Development Funding, University of South Australia; Project title: *Clonogenic Stem Cells in Head and Neck Cancer and Their Impact on Novel Treatment Approaches Based on Patient Stratification and Outcome Optimisation; Experimental and Modelling Investigation* – membru echipa.
- CNCS-UEFISCDI, PNII-ID-PCE-2012-4-0067 – Director proiect. Titlu proiect: *In silico modelling of biological processes in hypoxic tumours towards an individualized treatment protocol*.

Sumar al rezultatelor cercetării și didactice

- Peste 200 lucrări științifice și prezentări la conferințe internaționale
- 16 cărți / capitole de carte publicate cu ISBN
- Peste 2600 citări în reviste ISI, BDI, teze doctorat și tratate internaționale
- h-index: 22 (Scopus); 28 (Google Scholar)