

Dr Eleni Vardoulaki

Curriculum Vitae

WORK EXPERIENCE

1 MAY 2020 – 30 JUN 2024
Thüringer Landessternwarte Tautenburg, DE
Postdoctoral researcher

15 JAN 2019 – 31 AUG 2020
Max-Planck-Institut für Radioastronomie, Bonn, DE
Postdoctoral Researcher

1 OCT 2015 – 31 DEC 2018
Argelander-Institut für Astronomie, Bonn, DE
Postdoctoral Researcher

1 FEB 2012 – 30 JUN 2015
University of Crete, Heraklion, GR
Postdoctoral Fellow

MAY 2015 & MAR – APR 2013
California Institute of Technology (Caltech), USA
visiting Postdoctoral Researcher

1 SEP 2010 – 31 DEC 2011
Centro de Astrofísica da Universidade do Porto, PT
Postdoctoral Researcher

EDUCATION

2003 – 2009 **Doctor of Philosophy**
ASTROPHYSICS
University of Oxford, UK




1998 – 2002 **Ptychion (4 year degree)**
PHYSICS
University of Ioannina, GR

AWARDS & GRANTS

2012 **Postdoctoral fellowship**
*ESF (EU) & GSRT (Greece)
with 3rd party funding of
135,290 Euro*

2004-2006 **Travel grants**
University of Oxford

2001 & 1999 **University Excellence Award**
Greek scholarship foundation IKY

 Jena, Germany
 +4917663459424
 elenivard@gmail.com
 www.linkedin.com/in/eleni-wardoulaki/

TECHNICAL SKILLS & LANGUAGES

Python (astropy, matplotlib, NumPy, scikit-learn), Jupyter Notebook, IDL, Octave, C, perl, Fortran; Virtual Observatory; ADQL (SQL); IRAF; AIPS; CASA; Topcat; STILTS; Aladin

operating systems (Linux, Mac OS X, Windows); Office applications; latex, overleaf; HTML, wordpress

Data reduction, analysis, visualisation; 3D cubes; large data-sets; classification; clustering; regression; ML; AI; ChatGPT; image/signal processing; proposal writing; event/ conference organiser

GREEK (native), ENGLISH (fluent), GERMAN (basic), PORTUGUESE (basic), FRENCH (basic).

MANAGEMENT SKILLS

work coordination, people and interpersonal skills, project & crisis management, abstract thinking, decision-making, problem-solving, delegation, motivating, adaptive leadership, organisation, story-telling; agile, culturally agile; international group leadership (groups of 100s); negotiations

PROFESSIONAL EXPERIENCE

referee for A&A; MNRAS; Springer Nature; MDPI; referee for theses; ESO OPC112

Publications: 50 academic articles (11 first author); h-index 18; 1 academic book (Springer 2024); publications on ADS; Google Scholar).

Student (co-)supervision: intern (high-school; 2), bachelor's (5), master's (7), PhD (2); Lecturer undergraduate tutorials (3 groups).

Science communication: articles (35); books (2); videos/live events online (135); citizen science; elenivardoulaki.com

Contents

Table of Contents	1
Contact Information	3
Research Interests	3
Education	3
Professional Experience	3
Awards & 3rd party funding	5
Professional Skills	5
Journal Refereeing and personal references	5
Internal examiner	5
Reducing inequality	5
STEAM	5
Management	6
Student supervision	6
Teaching Experience	8
Computing and data reduction	9
Computing and data reduction - detailed	9
Observing experience	9
Observing proposals - awarded time	10
Affiliations	10
Public outreach	10
Special Volumes - Academic Books - White papers	13
Publications in international journals - First author	13
Publications in international journals - co-author	14
Publications in conferences proceedings with referees	17
Working papers	18
Public outreach books	19
Public outreach articles in Greek and YouTube channels	19

Conferences, Presentations, Seminars, and Schools	20
Conference organisation	20
Seminars/Colloquia given in English	20
Talks in conferences given in English	22
Contributed posters	24
Participations in seminars, conferences and schools	25
Languages	27
Sports, music and Arts/Leadership, Presentation and Performance	27
References	28

Eleni Vardoulaki - Curriculum Vitae - Extended

Contact

Information

Thüringer Landessternwarte,
Sternwarte 5, 07778,Tautenburg, Germany
email: elenivard@gmail.com
tel: +4917663459424
LinkedIn: <https://www.linkedin.com/in/eleni-varoulaki>
websites: elenivardoulaki.com, [RogueAstrophysics](#),
Radio GOALS, Astronomy on Tap Jena, Astronomy on Tap Bonn

Research Interests

Multi-wavelength (radio, infrared, optical, X-ray) studies of extragalactic radio sources; active galactic nuclei (AGN); quasars; black holes; radio structures; (Ultra)-Luminous Infrared Galaxies (U)LIRGs; IR/radio relation; local and high-redshift Universe; star formation (SF); SF/AGN connection & disentangling; environment of radio AGN; galaxy formation & evolution; pattern recognition techniques; machine learning; deep learning; AI; citizen science

Education

University of Oxford, Oxford, UK

DPhil., Astrophysics, 2003-2009

- Thesis Title: [Understanding the nature of the faint radio-source population](#)
- Advisor: Prof Steve Rawlings (deceased)
- Thesis Examiners: Prof Katherine Blundell & Prof Philip Best

University of Ioannina, Ioannina, Greece

Ptychion, Physics, 1998-2002

- Distinction - **Rank: graduated 2nd in class**
- Grade - 7.66/10
- Major: Astrophysics (research thesis 1 year)
- Additional course including: Nuclear, Atomic, and Atmospheric physics; Fluid dynamics
- Thesis title: Seyfert galaxies, Active Galactic nuclei and comparison to Normal galaxies' (using IRAS data)
- Thesis advisor: Prof. Vassiliki Tsikoudi

Professional Experience

Thüringer Landessternwarte Tautenburg (TLS), Bonn, Germany

coordinator for data intense radio astronomy: Postdoctoral researcher in the radio galaxies group of Matthias Hoefft under the ZEISS grand KODAR, investigating methods to bring radio astronomy to the exabyte era, in collaboration with the DLR in Jena. Leading editor and author of special volume on 'Data-Intensive radio astronomy', Vardoulaki et al., 2024, Springer. PI of LOFAR observations of the COSMOS field (DDT19_002, 48h; ECOLE, 324h pending; LBA commissioning proposal 12h, pending). Member of the international collaborations COSMOS, EMU, MeerKAT MIGHTEE and LOFAR. AGN studies using multi-wavelength data (COSMOS, EMU, MIGHTEE, LOFAR). Lead of the [radio galaxy zoo EMU](#) working group and co-lead of the citizen science project (recommended by OAD). Student supervision and mentoring. Science communicator. Co-lead of outreach group for JWST COSMOS-Web survey. Founder and manager of the public outreach and astronomy hubs [Astronomy on Tap Jena](#) (2020-2022; Online), [Astronomy on Tap Bonn](#) (2018-2020; In-person and Online) and of [Rogue Astrophysics](#) (2017-today; In-person and Online).

1 May 2020 to 30 June 2024

Max-Planck-Institut für Radioastronomie, Bonn, Germany

visiting Postdoctoral Researcher: Member of VLBI group (A. Zensus). Member of the international COSMOS collaboration and of the international collaboration EMU. AGN studies using multi-wavelength data (COSMOS & EMU). Founder and manager of Astronomy on Tap Bonn and of [Rogue Astrophysics](#).

15 July 2019 to 31 August 2020

Max-Planck-Institut für Radioastronomie, Bonn, Germany

Postdoctoral Researcher: Member of VLBI group (A. Zensus). Collaboration with Silke Britzen & Andreas Eckart on analysis of circumnuclear region of local galaxy NGC 289 with near-infrared integral field spectroscopy with SINFONI (VLT). Member of the international COSMOS collaboration and of the international collaboration EMU & group leader EMU Development 1 Project and of EMU Radio Galaxy Zoo. Study of AGN at radio wavelengths. Study of the infrared/radio relation in galaxies in the local and high-redshift Universe (in the COSMOS field) in relation to environment. Machine learning techniques. Founder and manager of Astronomy on Tap Bonn and of [Rogue Astrophysics](#).

15 January 2019 to 14 July 2019

Argelander-Institut für Astronomie, University of Bonn, Germany

Postdoctoral Researcher: Member of the international COSMOS collaboration and of the international collaboration EMU & group leader EMU Development 1 Project and of EMU Radio Galaxy Zoo. Study of AGN at radio wavelengths. Study of the infrared/radio relation in galaxies in the local and high-redshift Universe (in the COSMOS field) in relation to environment. Galaxy morphology in the optical (e.g. galfit) and radio wavelengths (e.g. PyBDSF), as well as algorithms that automatically identify structures (pattern recognition) and use of machine learning techniques. Student supervision at undergraduate, masters and PhD levels. Founder and manager of Astronomy on Tap Bonn and of [Rogue Astrophysics](#).

1 October 2015 to 31 December 2018

University of Crete, Heraklion, Crete, Greece

Postdoctoral Researcher: *Radio continuum properties of (Ultra)-Luminous Infrared Galaxies.* Part of the Great Observatory All-Sky LIRG Survey GOALS collaboration. Project involved disentangling of AGN and SF in local starburst galaxies, and spatially resolved infrared/radio correlation (Radio GOALS). Two-month break related to unpaid maternity leave.

1 February 2012 to 30 June 2015

California Institute of Technology (Caltech), Pasadena, CA, USA

Visiting Postdoctoral Researcher at the Infrared Processing and Analysis Center (IPAC), collaborating with Dr Lee Armus and Dr Eric Murphy.

May 2015

California Institute of Technology (Caltech), Pasadena, CA, USA

Visiting Postdoctoral Researcher at the Infrared Processing and Analysis Center (IPAC), collaborating with Dr Lee Armus, Dr Eric Murphy, and Dr Tanio Diaz-Santos.

March-April 2013

Centro de Astrofísica da Universidade do Porto, Porto, Portugal

Postdoctoral Researcher in the galaxies group of Dr Polychronis Papaderos. Astrophysics of Active Galactic Nuclei. Research on the stellar properties of the hosts of high-redshift active galactic nuclei.

1 September 2010 to 31 December 2011

Awards & 3rd party funding

General Secretariat for Research and Technology, Greece

Post-Doctoral Research position supported by the Action "Supporting Postdoctoral Researchers" of the Operational Program "Education and Lifelong Learning" (Action's Beneficiary: General Secretariat for Research and Technology), and co-financed by the European Social Fund (ESF) and the Greek State, 2012-2015; 3rd party funding awarded to Vardoulaki of the amount of 135,290 Euro

St. Peter's College, Oxford, UK

Three travel grants awarded by St. Peter's College during DPhil studies

State Scholarships Foundation IKY, Greece

Award by the Greek scholarship foundation IKY for achieving 1st rank during the 3rd year of undergraduate studies, 2001

Award by the Greek scholarship foundation IKY for achieving 1st rank during the 1st year of undergraduate studies, 1999

Professional Skills

Journal Refereeing and personal references

- Referee for academic journals: MNRAS; A&A; ApJ; Galaxies MDPI; Astrophysics and Space Science, Springer Nature.
- Referee for proposals: ESO OPC for P112-P113
- Referee for academic positions (letters of reference): graduate and PI level

Internal examiner

February 18, 2011: Principal investigator in master thesis defence, University of Porto.

Reducing inequality

Radio Galaxy Zoo - EMU: Reducing inequality through a citizen science-based education programme. Involved countries: China, Pakistan, Greece, Australia, United Kingdom, Germany, Italy, United States of America. Recommended by the Office of Astronomy for Development (OAD).

STEAM

- Painting and Astronomy: painting astronomical objects with acrylic (YOUTUBE)

Management

- Lead editor and author of special volume for Springer entitled "Data-Intensive Radio Astronomy: Bringing astrophysics to the exabyte era", Springer 2024, Vardoulaki, Dembska, Drabent, Hoeft (75 international authors; ~ 500 pages). Since July 2021: lead editor and co-author, organisation of content and structure, content editing, managing the interaction between authors and editors, organisation, correspondence with Springer.
- Co-lead of the outreach activities for the JWST COSMOS-Web survey
- Chair and organiser of EAS 2021 special session on 'Data-Intensive Radio Astronomy: Bringing Astrophysics to the Exabyte Era' (July 2021)
- Coordinator for data-intensive radio astronomy at TLS (2020-2023)
- Working group lead of radio galaxy zoo for the evolutionary map of the universe ASKAP survey (EMU) citizen science project and co-lead of project. Group organisation, managing an international team of radio astronomy and artificial intelligence experts. Investigating techniques and providing solutions. Co-building project. Leading and co-leading publications on innovative and AI techniques using citizen science projects to advance the field of radio astronomy in understanding the nature of radio sources.
- Group leader of EMU Development Project 1. Duties include coordination of international team responsible for control of data products that come out of the pipeline and are catalogued, researching the current state of the pipeline and catalogues produced, and provide solutions in a collaborative manner (2018).
- Founder and Manager of monthly public outreach events [Astronomy on Tap Jena](#) (since November 2020).
- Founder and Manager of monthly public outreach events [Astronomy on Tap Bonn](#) and in charge of a team of 12 (September 2018-July 2020)
- Founder and Manager of outreach YouTube channel www.youtube.com/c/RogueAstrophysics (since October 2017)

Student supervision Levels: intern (highschool student; 2), bachelor's (5), master's (7), PhD (2)

- January 2022-December 2023: Master's student project "Radio AGN jet paths and cluster weather", Vincent Backöfer, University of Leipzig. A follow-up of Vardoulaki et al. (2021c) comparing the bent angle of extended AGN in COSMOS & XMM-LSS using MeerKAT-MIGHTEE data to magnetohydrodynamical ENZO-MHD simulations of Vazza et al. (2021).
- October 2022-January 2023: project manager and scientific advisor for RGZ-EMU self-organising maps (SOM) related project in collaboration with 6 bachelor's students from the Darmstadt University of Applied Sciences

- June 2022: Supervisor of intern Cristina Lindlacher at TLS (radio galaxy zoo EMU alpha tester; investigating the XMM-LSS MeerKAT-MIGHTEE field for extended sources, measuring basic radio properties, cross-correlating with infrared catalogue and plotting RA-Dec, L-z, L-size diagrams; writing a report on overleaf using an astronomical paper template.)
- October 2021: Supervisor of intern Mathilda Ochotzki at TLS (radio observations, active/non-active galaxies, galaxy evolution, optical spectroscopy, host identification, intro to astrophysics, radio data analysis, topcat, latex; data analysis using the sample of Vardoulaki et al. 2021 and putting these into an article format with title "Radio properties of AGN with jets and lobes in COSMOS.").
- September 2020-July 2021: Bachelor's student co-supervising at the TLS (4 undergraduate theses: Anna Berlin, Johannes Lindner, Arsenije Arsenic, Annalena Pless). Identification of FRI, FRII AGN from LOTSS and investigation of their radio and host properties; in collaboration with Dr Matthias Hoeft and Prof Helmut Meusinger.
- October-November 2018: Student supervision for the Astroseminar at the University of Bonn of the masters student, Luis Aipu, with title "A catalogue of faint local radio AGN and the properties of their host galaxies", Lofthouse et al. (2018)
- April 2018 - May 2018: Student supervision for the Astroseminar at the University of Bonn of the masters student, Aswin Manohar, with title "SHINING, A Survey of Far Infrared Lines in Nearby Galaxies. II: Line-Deficit Models, AGN impact, [CII]-SFR Scaling Relations, and Mass-Metallicity Relation in (U)LIRGS", Herrera-Camus et al. (2018)
- November 2016-January 2017: Student supervision for the Astroseminar at the University of Bonn of the masters student, Thanh Dat Hoang, with title "The Radio Spectral Energy Distribution and Star Formation Rate Calibration in Galaxies", Tabatabaei et al. (2016)
- April 2016- May 2017: Co-supervision of masters thesis in astrophysics at the University of Bonn. Research topic: 1) Radio spectral index maps of radio AGN in the COSMOS field between 1.4 and 3 GHz, and 2) data reduction from archival GMRT observations in the COSMOS field at 330 MHz, "Multi-Frequency Radio Observations of the COSMOS Field", Vishnu Balakrishnan, Bonn, 2017
- April 2015-March 2016: Co-supervision of masters thesis at the University of Bonn. Research topic: 1) Galaxy morphology in the COSMOS field; comparison of optical and radio structures, Nils Linz, Bonn, 2017
- October 2015-December 2018: Co-supervision of PhD thesis in astrophysics at the University of Bonn. Research topic: 1) Size of star-forming galaxies in the radio in the COSMOS field, 2) study of a sub-mm galaxy at redshift above 4 with data in the optical, infrared, radio and ALMA, 3) code developing for semi-automatic pattern recognition of galaxies with complex radio structure in the COSMOS field, Eric Faustino Jimenez Andrade, Bonn, 2019
- October 2015-December 2018: Co-supervision of PhD thesis in astrophysics at the University of Bonn. Research topic: 1) radio recombination lines in luminous infrared galaxies at low redshift, 2) developing of pipeline for optimising archival use of ALMA data (for the

German ARC Node), Toma Badescu, Bonn 2022

- October 2015-April 2016: Co-supervision of masters thesis in astrophysics at the University of Bonn with title "The Evolution of the FIR/Radio Correlation in the COSMOS Field", Christos Karoumpis, Bonn, 2016
- December 2015-April 2016: Co-supervision of undergraduate thesis in astrophysics at the University of Bonn with title "Struktureigenschaften ferner Galaxien in der Karl G. Jansky VLA COSMOS Durchmusterung", Bianca Monika Hilger, Bonn, 2016

Teaching Experience

International Workshop on Machine Learning in Astronomy, online

Guest lecturer on Machine Learning in Astronomy

May 2023

- 2 hours on Conventional classification methods of radio astronomical sources, robust training samples, and hands-on examples using jupyter notebook and demonstrating the citizen science project "Radio Galaxy Zoo EMU (co-PI Vardoulaki)

University of Athens, Greece

Guest lecturer on Classical Mechanics

May 2023

- One 45min lecture on central forces, in Greek. Part of job application.

University of Athens, Greece

Guest lecturer on Asteroseismology

May 2022

- One 45min lecture on asteroseismology, in Greek. Part of job application.

Trinity College, Oxford, UK

Non-Stipendiary Lecturer in Astrophysics and Atmospheric Physics

2009

- Tutoring 4th year students; tutorials and exams

University College, Oxford, UK

Non-Stipendiary Lecturer in Astrophysics and Atmospheric Physics

2009

- Tutoring 4th year students; tutorials and exams

The Queen's College, Oxford, UK

Non-Stipendiary Lecturer in Astrophysics and Atmospheric Physics

2006

- Tutoring of 4th year students; tutorials and exams

Computing and data reduction

- Operating systems: Mac OS, Mac OS X, Linux, WINDOWS
- Programming languages and software: Python, Jupyter Notebook, IDL, C, and Perl, Fortran, Office applications (word, excel, pages, keynote, powerpoint) and HTML. Virtual observatory; ADQL (SQL). Singularity.
- Experience in analysis of astronomical data using packages IRAF, AIPS, CASA, IDL and Python.
- Astronomical software/tools: AIPS; CASA; Topcat; STILTS; Aladin; CDS; Vizier; HiPS; MOC; X-Match; Virtual observatory tools and protocols (TAP).
- Writing tools: latex; overleaf; word; google docs.
- Galaxy morphology in the optical (e.g. galfit) and radio wavelengths (e.g. PyBDSF).
- Data reduction and analysis in radio continuum surveys (VLA, LOFAR, LOFAR-VLBI), in the optical (William Herschel Telescope, 2.7m McDonald Obs., HST) and in the infrared (UKIRT, Spitzer /IRAC/MIPS, Herschel, SINFONI).
- Spectral energy distribution fitting using code Hyperz.
- Use of machine learning algorithms for pattern recognition in astronomical imaging; Matlab/Octave.

Computing and data reduction - detailed

- *courses taken*: LOFAR-VLBI workshop (2024); 2nd ESCAPE Virtual Observatory School (2022), VLBI school (2021), LOFAR school (2021), Python (2017), C (before 2010), Perl (before 2010), Machine Learning (2017, Coursera, by Andrew Ng, Stanford University), Windows (before 2002), Fortran (before 2002), Office applications (before 2002), AIPS (NRAO summer school 2004)
- *self-taught*: IDL (2003), Python (2013), HMTL (before 2006); IRAF (2003), AIPS (2004), CASA, galfit (2016), PyBDSF (2016), wordpress (2020)
- *used in the past*:
 - IRAF: for astronomical data reduction, spectroscopy and imaging; manual & by writing/using semi-automatic code
 - AIPS: for radio astronomical data reduction
 - CASA: for radio astronomical data visualisation and analysis
 - machine learning: python packages to automatically classify radio objects based on their structure (pattern recognition)
 - IDL analysis of astronomical data (radio, optical, infrared; 2D; 3D cubes); plotting of physical parameters, χ^2 , image plotting, clustering using poisson probability
 - HTML for personal website
- *currently using*:
 - Python: used to analyse astronomical data (radio imaging and near-infrared 3D spectroscopy); packages include astropy (for astronomical analysis); reading & comparing arrays; plotting; running mock simulations; reading 3D data (data cube) and analysing them
 - IDL: analysis of astronomical data (radio imaging and near-infrared 3D spectroscopy); plotting of physical parameters, χ^2 , image plotting
 - CASA: for analysis of radio data
 - VO tools
 - LOFAR-VLBI CWL pipeline; singularity
 - wordpress for personal and for the Astronomy on Tap website

Observing experience

- August 2006: WHT telescope, La Palma, Canary Islands, Spain (3 nights of observing - optical spectroscopy)

- September 2005: McDonald observatory, Texas, USA (10 nights of observing and self-operating the telescope - optical spectroscopy)
- February 2005: UKIRT telescope, Hawaii, USA (6 nights of observing - near-infrared imaging)

Observing proposals - awarded time

- 2024: COSMOS LOFAR LBA commissioning proposal; 12h requested PI: Vardoulaki (decision pending)
- 2023: COSMOS LOFAR2.0 Large Program Proposal; 324h requested; PI: Vardoulaki (decision pending; 80 co-investigators)
- 2022: DDT LOFAR COSMOS; 48 hours in collaboration with LoTSS; PI: Vardoulaki
- 2021: JWST Cycle 1; 207.8 Primary Spacecraft Hours; 81.3 Parallel Spacecraft Hours; Kartaltepe et al. incl. Vardoulaki; "COSMOS-Webb: The Webb Cosmic Origins Survey"
- 2020: ATCA; 23.5 Hours; Vardoulaki et al.; "Revealing the putative binary nature of an X-shaped radio source behind the Small Magellanic Cloud"

Affiliations

- Member of the ngVLA science working group 3 since 2023*
- Member of the International Astronomical Union IAU since 2023*
- Member of the SKA continuum working group since 2023*
- Member of the international collaboration LOFAR since 2022*
- Member of the international collaboration MeerKAT-MIGHTEE since 2021*
- Member of the international collaboration EMU since 2018*
- Member of the American Astronomical Society since 2017*
- Member of the European Astronomical Society since 2016*
- Member of the international collaboration COSMOS since 2015*
- Member of the international collaboration GOALS (2012-2015)*
- Member of the Hellenic Astronomical Society since 2010*

Public outreach

Regular outreach efforts since 2005 including books, articles, events, mentoring, education, art, etc through presentations, interviews, and social media channels ([Rogue Astrophysics](#), [Astronomy on Tap](#)). TEDx AUAthens speaker (May 2019).

Detailed:

- [Interview](#) by Eleni Karachaliou, RESET Podcasts, for women in science and academia, gender equality and equity (September 2023)
- [Interview](#) by Periklis Vasilopoulos ERA for Greece (June 2023)
- [Interview](#) by itspossible.gr (May 2023)
- [Interview](#) by ERA SPORT for Greece about my book 'The Universe in your pocket' (December 2022)

- Director and co-organiser of Long Night of the Stars Online at TLS (cancelled due to COVID-19)
- Long Night of the stars public talk, University of Jena (November 2022)
- Interview by Vice.com for Greece about my book 'The Universe in your pocket' (November 2022)
- Interview by Patris newspaper about astrophysics and outreach (August 2022)
- Interview by Nautemporiki newspaper about astrophysics and outreach (August 2022)
- Interview by Katerina Pouloupoulou from Athina9,84 radio station about astrophysics and outreach (August 2022)
- Interview by Vassileia Zervou from ERT national radio station about astrophysics and outreach (August 2022)
- Interview by Kostas Mpourousis from Proto Thema, Gala, newspaper about astrophysics and outreach (July 2022)
- Public talk at National Observatory of Athens, 'Starting with a Bang' and Q&A (July 2022)
- Interview by Maria Lemonia and Elena Karamichalou from Parapolitika 90,1 radio program about astrophysics and outreach (July 2022)
- Interview by Emy Ntourou from Documento newspaper about astrophysics, JWST, and outreach (July 2022)
- Interview by Bovary.gr about the first released images of JWST (July 2022)
- Interview by Giorgos Apostolidis from Athina9.84 radio station about science communication (July 2022)
- Interview by youtubers 'Top 10 GR' for the 'PHD talks' program about my career in astrophysics and the field (July 2022)
- Interview by youtuber 'biotech guy' about academic career and astronomy (April 2022)
- Interview by Giorgos Apostolidis from Athina9.84 radio station about science communication (February 2022)
- Interview for 'not a top 10' podcast about historical figures and women in science (May 2021)
- Online public talk for Youthtopia in Greek (2021)
- Online public talk for Astronomy on Tap Bonn online 'Starting with a Bang' (January 2021)
- Online public talk Telecom Bonn and discussion about women in STEAM (2021)
- Online poster presentation for Astronomy on Tap Expands Online at AAS 237 (2021)
- Content creator for social media of the Hellenic Astronomical Society (Hel.A.S.; 2020-)
- Invited speaker at SILBESALT science and media festival (October 2020)
- Online public talk for Astronomy on Tap at EAS 2020
- EAS 2020 - Astronomy on Tap Europe lunch session co-organiser
- Manager and moderator of European session of Astronomy on Tap on the Couch event (April 2020)

- Public outreach talk at Astronomy on Tap Bonn, [The Xmas star debunked](#) (December 2019)
- Public outreach talk for Camp for Future organised by Fridays for Future, Sinzig, Bonn (September 2019)
- Video contribution to [1st SciTalks Convention](#) in Athens, Greece (September 2019)
- Public outreach talk at Astronomy on Tap Bonn, with the title '[Starting with a Bang](#)' (June 2019)
- Invited speaker at TEDxAUAthens Serendipity event, with the title '[A serendipitous discovery that came with a Bang, a Big Bang](#)' (April 2019)
- Interview by online magazine pink.gr with title '[Girl Power: 20 women who inspire us](#)' (March 2019)
- Invited speaker at the Science Fair 2019 in Nicosia, Cyprus (16 March 2019)
- Invited panel speaker at the Stand-up talks+ on innovation at the United Nations Framework Convention on Climate Change in Bonn, Germany (March 2019)
- Founder and manager of "[Astronomy on Tap Bonn](#)" (founded September 2018)
- Public outreach talk at the University of Bonn, for the astroclub@AIfA, with title '[Women in Science](#)' (December 2018)
- Public outreach talk at the University of Bonn, for the astroclub@AIfA, with title '[Journey to the unexpected: Research in Astrophysics and how it improves our everyday lives](#)' (June 2018)
- Founder and manager of the youtube channel [Rogue Astrophysics](#) and producer of public outreach videos about astrophysics (science writer, producer, and advertiser on youtube, facebook, instagram, linkedIn), which was founded in October 2017
- Science Writer for an online Greek newspaper, [a8inea](#) (since October 2018)
- Science Writer of science articles for the general public about astrophysics, physics and technology for the [scinews.eu](#) (since September 2017)
- Interview at the journal [VICE](#) (December 2017)
- Interview at the youtube channel SciTalksGR (December 2017)
- Interview on Creta TV channel regarding the solar eclipse of 2015, Heraklion, Crete
- Complete study on the correct placement of a sundial in the city of Heraklion, Crete (2015)
- Public talk for the 100 years of University of Porto (Winter 2011)
- Author of article on Dark Matter, for a popular science Portuguese newspaper (2011)
- Public outreach for Oxford University, University of Porto and for the E-ELT (Summer 2010)
- Telescope demonstrating for [MacDonald Observatory, 107'](#) (September 2005)

**Special Volumes -
Academic Books -
White papers**

1. "Data-intensive radio astronomy", Edited Volume, Vardoulaki et al., Springer, 2024
Editors: **Eleni Vardoulaki**, Marta Dembska; Alexander Drabent; Matthias Hoefl
75 international authors; ~ 500 pages, in production
2. A Collection of German Science Interests in the Next Generation Very Large Array ; November 2023;
"Big Data, surveys, classification", Eleni Vardoulaki, Etienne Bonnassieux, Yuri Y. Kovalev;
"AGN jets at all scales", Anne-Kathrin Baczko, Eleni Vardoulaki, Etienne Bonnassieux

**Publications in
international
journals - First
author**

- 11 first author articles - h-index = 18 - Google Scholar - ADS
1. The evolution of the radio luminosity function of group galaxies in COSMOS, (**Vardoulaki, E.** ; Gozaliasl, G. ; Novak, M. ; Finoguenov, A. ; Khosroshahi, H. G.), 2022, A&A in review
 2. Bent it like FRs: extended radio AGN in the COSMOS field and their large-scale environment (**Eleni Vardoulaki**; Franco Vazza; Eric F. Jiménez-Andrade; Ghassem Gozaliasl; Alexis Finoguenov; and Denis Wittor), 2021, Galaxies, 9, 93
 3. The circumnuclear region of NGC 289 as seen with SINFONI: revealing a secret bar, (**Vardoulaki, E.**; Fazeli, N.; Eckart, A.; Britzen, S., Zensus, J. A.), A&A in review
 4. The $M^* - M_{\text{halo}}$ relation at $0.08 < z < 1.53$ in COSMOS: the role of AGN radio-mode feedback, (**Vardoulaki, Eleni**; Gozaliasl, Ghassem; Finoguenov, Alexis; Jiménez-Andrade, Eric F.; the COSMOS Team), 2021, RNAAS, 5, 89
 5. FR-type radio sources at 3 GHz VLA-COSMOS: Relation to physical properties and large-scale environment, (**E. Vardoulaki**, E. F. Jiménez Andrade, I. Delvecchio, V. Smolčić, E. Schinnerer, M. T. Sargent, G. Gozaliasl, A. Finoguenov, M. Bondi, G. Zamorani, T. Badescu, S. K. Leslie, L. Ceraj, K. Tisanić, A. Karim, B. Magnelli, F. Bertoldi, E. Romano-Diaz, K. Harrington), 2021, A&A, 648A, 102
 6. A closer look at the deep radio sky: Multi-component radio sources at 3-GHz VLA-COSMOS, (**Vardoulaki, E.**, Jiménez Andrade, E. F., Karim, A., Novak, M., Leslie, S. K., Smolčić, V., Schinnerer, E., Sargent, M. T., Bondi, M., Zamorani, G., Magnelli, B., Bertoldi, F., Herrera Ruiz, N., Mooley, K. P., Tisanić, K., Delhaize, J., Myers, S. T., Marchesi, S., Koekemoer, A. M., Gozaliasl, G., Middleberg, E., Ciliegi, P.), 2019, A&A, 627A, 142
 7. Radio continuum properties of luminous infrared galaxies. Identifying the presence of an AGN in the radio, (**Vardoulaki, E.**; Charmandaris, V.; Murphy, E. J.; Diaz-Santos, T.; Armus, L.; Evans, A.; Mazzarella, J. M.; Privon, G. C.; Stierwalt, S.; Barcos-Munoz, L.), 2015, A&A, 574, 4
 8. The TexOx-1000 redshift survey of radio sources I: the TOOT00 region, (**Vardoulaki, Eleni**; Rawlings, Steve; Hill, Gary J.; Mauch, Tom; Inskip, Katherine J.; Riley, Julia; Brand, Kate; Croft, Steve; Willott, Chris J.), 2010, MNRAS, 401, 1709

9. Radio imaging of the Subaru/XMM-Newton Deep Field - II. The 37 brightest radio sources, (**Vardoulaki, Eleni**; Rawlings, Steve; Simpson, Chris; Bonfield, David G.; Ivison, R. J.; Ibar, Eduardo), 2008, MNRAS, 387, 505
10. Accretion indicators for the 37 brightest radio sources in the Subaru/XMM-Newton Deep Field, (**Vardoulaki, E.**; Rawlings, S.; Simpson, C.), 2007, NCimB, 122, 1029
11. The TOOT00 redshift survey of radio sources, (**Vardoulaki, E.**; Rawlings, S.; Hill, G. J.; Croft, S.; Brand, K.; Riley, J.; Willott, C.), 2006, AN, 327, 282

Publications in international journals - co-author

32 co-authored articles

1. EMU/GAMA: Radio detected galaxies are more obscured than optically selected galaxies, (Ahmed, U. T. ; Hopkins, A. M. ; Ware, J. ; Gordon, Y. A. ; Bilicki, M. ; Brown, M. J. I. ; Cluver, M. ; Gürkan, G. ; López-Sánchez, Á. R. ; Leahy, D. A. ; Marchetti, L. ; Phillipps, S. ; Prandoni, I. ; Seymour, N. ; Taylor, E. N. ; **Vardoulaki, E.**), 2024, PASA, in press, arXiv:2312.11883
2. Resolving Galactic-scale Obscuration of X-Ray AGNs at $z > 1$ with COSMOS-Web, (Silverman, John D. et al. incl. **Vardoulaki, Eleni**), 2023, ApJ, 951L, 41
3. Radio Galaxy Zoo EMU: Towards a Semantic Radio Galaxy Morphology Taxonomy, (Bowles, Micah ; Tang, Hongming ; **Vardoulaki, Eleni** et al.), 2023, MNRAS, 522, 2584
4. COSMOS-Web: An Overview of the JWST Cosmic Origins Survey, (Casey, Caitlin M.; Kartaltepe, Jeyhan S., et al. incl **Vardoulaki, E.**), 2023, ApJ, arXiv221107865C
5. Identifying anomalous radio sources in the EMU Pilot Survey using a complexity-based approach, (Segal, Gary; Parkinson, David; Norris, Ray et al. incl **Vardoulaki, Eleni**), 2023, MNRAS, 521, 1429
6. The VMC Survey - XLIX. Discovery of a population of quasars dominated by nuclear dust emission behind the Magellanic Clouds,(Pennock, Clara M.; van Loon, Jacco Th; Anih, Joy O. et al. incl **Vardoulaki, Eleni**), 2022, MNRAS, 515, 6046
7. Radio continuum sources behind the Large Magellanic Cloud, (Filipović, M. D. ; et al. incl **Vardoulaki, E.**), 2021, MNRAS, 507, 2885
8. The ASKAP-EMU Early Science Project: 888 MHz radio continuum survey of the Large Magellanic Cloud (Pennock, Clara M.; et al. incl. **Vardoulaki, Eleni**), 2021, MNRAS, 506, 3540

9. The non-linear infrared-radio correlation of low- z galaxies: implications for redshift evolution, a new radio SFR recipe, and how to minimize selection bias (Molnár, D. et al. incl. **Vardoulaki, E.**), 2021, MNRAS, 504, 118
10. COSMOS-Webb: The Webb Cosmic Origins Survey (Kartaltepe, Jeyhan et al. incl. **Vardoulaki, Eleni**), 2021, JWST Proposal. Cycle 1, ID. 1727
11. Radio observations of the merging galaxy cluster system Abell 3391-Abell 3395, (M. Brüggem, T.H. Reiprich, E. Bulbul, et al incl **E. Vardoulaki**), 2021, A&A, 647A, 3
12. The Abell 3391/95 galaxy cluster system. A 15 Mpc intergalactic medium emission filament, a warm gas bridge, infalling matter clumps, and (re-) accelerated plasma discovered by combining SRG/eROSITA data with ASKAP/EMU and DECAM data, (Reiprich, T. H. et al. incl. **Vardoulaki, E.**), 2021, A&A, 647A, 2
13. The VLA-COSMOS 3 GHz Large Project: Average radio spectral energy distribution of active galactic nuclei, (Tisanić, K.; Smolčić, V.; Imbrišak, M.; Bondi, M.; Zamorani, G.; Ceraj, L.; **Vardoulaki, E.**; Delhaize, J.), 2020, A&A, 643A, 519
14. The VLA-COSMOS 3 GHz Large Project: Evolution of Specific Star Formation Rates out to $z \sim 5$, (Leslie, S. K.; Schinnerer, E.; Liu, D.; Magnelli, B.; et al. incl **Vardoulaki, E.**), 2020, ApJ, 899, 58
15. The XXL Survey. XLIII. The quasar radio loudness dichotomy exposed via radio luminosity functions obtained by combining results from COSMOS and XXL-S X-ray selected quasars, (Lana Ceraj, V. Smolcic, I. Delvecchio, K. Tisanic, G. Zamorani, A. Butler, **E. Vardoulaki**), 2020, A&A, 642A, 125
16. The VLA-COSMOS 3 GHz Large Project: Evolution of Specific Star Formation Rates out to $z \sim 5$, (Sarah K. Leslie, et al. incl. **Eleni Vardoulaki**, 2020, ApJ, 899, 58L
17. Automated Mining of the ALMA Archive in the COSMOS Field (A3COSMOS): I. Robust ALMA Continuum Photometry Catalogs and Stellar Mass and Star Formation Properties for ~ 700 Galaxies at $z = 0.5-6$, (Daizhong Liu, P. Lang, B. Magnelli, E. Schinnerer, S. Leslie, Y. Fudamoto, M. Bondi, B. Groves, E. Jiménez-Andrade, K. Harrington, A. Karim, P. A. Oesch, M. Sargent, **E. Vardoulaki**, T. Badescu, L. Moser, F. Bertoldi, A. Battisti, E. da Cunha, J. Zavala, M. Vaccari, I. Davidzon, D. Riechers, and M. Aravena), 2019, ApJS, 244, 40
18. The ASKAP-EMU Early Science Project: Radio Continuum Survey of the Small Magellanic Cloud, (T. D. Joseph, M. D. Filipovic, E. J. Crawford, E. L. Alexander, I. Bojicic, G. F. Wong, H. Leverenz, R. P. Norris, R. Z. E. Alsaberi, C. Anderson, L. A. Barnes, L. M. Bozzetto, F. Bufano, J. D. Bunton, F. Cavallaro, J. D. Collier, H. Denes, Y. Fukui, T. Galvin, F. Haberl, A. Ingallinera, A. D. Kapinska, B. S. Koribalski, R. Kothes, D. Li, P. Maggi, C. Maitra, P. Manojlovic, J. Marvil, N. I. Maxted, A. N. O'Brien, J. M. Oliveira, C. M. Pennock, S. Riggi, G. Rowell, L. Rudnick, H. Sano, M. Sasaki, N. Seymour, R. Soria, M. Stupar, N. F. H. Tothill, C. Trigilio, K. Tsuge, G. Umana, D. Urosevic, J. Th. van Loon, **E. Vardoulaki**, V. Velovic, M. Yew), 2019, MNRAS, 490, 1202

19. Revealing the Stellar Mass and Dust Distributions of Submillimeter Galaxies at Redshift 2, (Lang, P.; Schinnerer, E.; Smail, Ian; Dudzevičiūtė, U.; Swinbank, A. M.; Liu, Daizhong; Leslie, S. K.; Almaini, O.; An, Fang Xia; Bertoldi, F.; Blain, A. W.; Chapman, S. C.; Chen, Chian-Chou; Conselice, C.; Cooke, E. A.; Coppin, K. E. K.; Dunlop, J. S.; Farrah, D.; Fudamoto, Y.; Geach, J. E. Gullberg, B.; Harrington, K. C.; Hodge, J. A.; Ivison, R. J.; Jiménez-Andrade, E. F.; Magnelli, B.; Michałowski, M. J.; Oesch, P.; Scott, D.; Simpson, J. M.; Smolčić, V.; Stach, S. M.; Thomson, A. P.; Toft, S.; **Vardoulaki, E.**; Wardlow, J. L.; Weiss, A.; van der Werf, P.), 2019, ApJ, 879, 54
20. Radio continuum size evolution of star-forming galaxies over $0.35 < z < 2.25$, (Jiménez-Andrade, E. F.; Magnelli, B.; Karim, A.; Zamorani, G.; Bondi, M.; Schinnerer, E.; Sargent, M.; Romano-Díaz, E.; Novak, M.; Lang, P.; Bertoldi, F.; **Vardoulaki, E.**; Toft, S.; Smolčić, V.; Harrington, K.; Leslie, S.; Delhaize, J.; Liu, D.; Karoumpis, C.; Kartaltepe, J. Koeckmoer, A. M.), 2019, A&A, 625A, 114
21. The VLA-COSMOS 3 GHz Large Project: Average radio spectral energy distribution of highly star-forming galaxies, (K. Tisanic, V. Smolčić, J. Delhaize, M. Novak, H. Intema, I. Delvecchio, E. Schinnerer, G. Zamorani, M. Bondi, and **E. Vardoulaki**), 2018, A&A, 621A, 139
22. Chandra centres for COSMOS X-ray galaxy groups: Differences in stellar properties between central dominant and offset brightest group galaxies, (Ghassem Gozaliasl, Alexis Finoguenov, Masayuki Tanaka, Klaus Dolag, Francesco Montanari, Charles C Kirkpatrick, **Eleni Vardoulaki**, Habib G Khosroshahi, Mara Salvato et al.), 2019, MNRAS, 483, 3545
23. The VLA-COSMOS 3 GHz Large Project: Star formation properties and radio luminosity functions of AGN with moderate-to-high radiative luminosities out to $z \sim 6$, (L. Ceraj, V. Smolčić, I. Delvecchio, M. Novak, G. Zamorani, J. Delhaize, E. Schinnerer, **E. Vardoulaki**, and N. Herrera Ruiz), 2018, A&A, 620A, 192
24. The linear radio size evolution of μJy populations, (M. Bondi, G. Zamorani, P. Ciliegi, V. Smolčić, E. Schinnerer, I. Delvecchio, Jimenez-Andrade, E. F., Liu, D., Lang, P., Magnelli, B., E.J. Murphy, **E. Vardoulaki**), 2018, A&A, 618L, 8
25. Probing star formation and ISM properties using galaxy disk inclination II: Testing typical FUV attenuation corrections out to $z \sim 0.7$: Leslie, S. K., Schinnerer, E., Groves, B., Sargent, M. T., Zamorani, G., Lang, P., **Vardoulaki, E.**, 2018, A&A, 616A, 157
26. The infrared-radio correlation of spheroid- and disc-dominated star-forming galaxies to $z \sim 1.5$ in the COSMOS field: Molnár, Dániel Cs, Sargent, Mark T., Delhaize, Jacinta, Delvecchio, Ivan, Smolčić, Vernesa, Novak, Mladen, Schinnerer, Eva, Zamorani, Giovanni, Bondi, Marco, Herrera-Ruiz, Noelia, Murphy, Eric J., **Vardoulaki, Eleni**, Karim, Alexander, Leslie, Sarah, Magnelli, Benjamin, Carollo, C. Marcella, Middelberg, Enno, 2018, MNRAS, 475, 827
27. The VLA-COSMOS 3 GHz Large Project: Cosmic evolution of radio AGN and implications for radio-mode feedback since $z \sim 5$: Smolčić, V., Novak, M., Delvecchio, I., Ceraj, L., Bondi, M., Delhaize, J., Marchesi, S., Murphy, E., Schinnerer, E., **Vardoulaki, E.**, Zamorani, G., 2017, A&A, 602A, 6

28. The VLA-COSMOS 3 GHz Large Project: Multiwavelength counterparts and the composition of radio sources, (Smolčić, V., Zamorani, G., Delvecchio, I., Baran, N., Novak, M., Delhaize, J., Schinnerer, E., Berta, S., Bondi, M., Ciliegi, P., Capak, P., Civano, F., Karim, A., Le Fevre, O., Ilbert, O., Laigle, C., Marchesi, S., McCracken, H. J., Tasca, L., Salvato, M., and **Vardoulaki, E.**), 2017, *A&A*, 602A, 2
29. The VLA-COSMOS 3 GHz Large Project: Continuum data and source catalog release, (Smolčić, V.; Novak, M.; Bondi, M.; Ciliegi, P.; Mooley, K. P.; Schinnerer, E.; Zamorani, G.; Navarette, F.; Bourke, S.; Karim, A.; **Vardoulaki, E.**, et al.), 2017, *A&A*, 602A, 1
30. Black-hole masses, accretion rates and hot- and cold-mode accretion in radio galaxies at $z \sim 1$, (Fernandes, C. A. C.; Jarvis, M. J.; Martinez-Sansigre, A.; Rawlings, S.; Afonso, J.; Hardcastle, M. J.; Lacy, M.; Stevens, J. A.; **Vardoulaki, E.**), 2015, *MNRAS*, 447, 1184
31. Evidence for a maximum jet efficiency for the most powerful radio galaxies, (Fernandes, C. A. C.; Jarvis, M. J.; Rawlings, S.; Martinez-Sansigre, A.; Hatziminaoglou, E.; Lacy, M.; Page, M. J.; Stevens, J. A.; **Vardoulaki, E.**), 2011, *MNRAS*, 411, 1909
32. The First Swift X-Ray Flash: The Faint Afterglow of XRF 050215B, (Levan, A. J.; Osborne, J. P.; Tanvir, N. R.; Page, K. L.; Rol, E.; Zhang, B.; Goad, M. R.; O'Brien, P. T.; Priddey, R. S.; Bersier, D.; Burrows, D. N.; Chapman, R.; Fruchter, A. S.; Giommi, P.; Gehrels, N.; Hughes, M. A.; Pak, S.; Simpson, C.; Tagliaferri, G.; **Vardoulaki, E.**), 2006, *ApJ*, 648, 1132
33. GRB 050215B: candidate afterglow, (Tanvir, N.; Pak, S.; Priddey, R.; Hughes, M.; Rol, E.; Levan, A.; O'Brien, P.; Simpson, C.; **Vardoulaki, E.**; Carroll, T.), 2005, *GCN*, 3031, 1

**Publications in
conferences
proceedings with
referees**

12 articles

1. How Astronomy on Tap Changed My Life (Rice, Emily; Levine, Brian; Silverman, Jeffrey; **Vardoulaki, Eleni**; McTier, Moiya; Adorno, Jose; Dagnello, Sophia, 2023, American Astronomical Society Meeting 241, id. 162.12
2. A New Task: Deriving Semantic Class Targets for the Physical Sciences, (Bowles, Micah ; Tang, Hongming ; **Vardoulaki, Eleni** et al.), 2022, Fifth Workshop on Machine Learning and the Physical Sciences (NeurIPS 2022), Neural Information Processing Systems 2022
3. Enabling the Discovery and Increasing the Engagement of Astronomy on Tap Events Online (Rice, Emily ; O'Hara, Ert ; Silverman, Jeffrey ; Plazas Malagon, Andres ; Hummels, Cameron ; **Vardoulaki, Eleni** ; Noel-Storr, Jacob ; Hirschauer, Alec, 2022, American Astronomical Society Meeting 240, id. 345.04
4. Astronomy on Tap Expands Online (**Vardoulaki, E.**; Rice, E. ; Hirschauer, A. ; Hummels, C. ; Larson, R. ; Levine, B. ; Linke, L. ; Noel-Storr, J. ; Rice, D. R. ; Silverman, J. ; Unruh, S. ; White, J.), 2021, American Astronomical Society meeting 237, id. 547.13

5. Discovering exotic AGN behind the Magellanic Clouds, (Pennock, Clara M. ; van Loon, Jacco Th. ; Bell, Cameron P. M. ; Filipović, Miroslav D. ; Joseph, Tana D. ; **Vardoulaki, Eleni**), 2021, IAUS, 356, 335
6. Broadening Event Horizons through Astronomy on Tap Public Outreach, (Rice, E. L.; Silverman, J.; Larson, R.; Narayan, G.; Levine, B.; Popinchalk, M.; Becker, T.; **Vardoulaki, E.**; Angerhausen, D.; Craig, H.; Hirschauer, A.; Matthews, E.; Shin, K.; Noel-Storr, J.), 2020, American Astronomical Society meeting 235, id. 221.01
7. Heterogeneity and Variability of "Astronomy on Tap" Public Outreach Events, (Rice, Emily; Livermore, Rachael; Silverman, Jeffrey; LaMassa, Stephanie; Levine, Brian; Hummels, Cameron; Ouellette, Nathalie; Popinchalk, Mark; Safron, Emily; Angerhausen, Daniel; **Vardoulaki, Eleni**; Plazas, Andrés; Seale, Sandy), American Astronomical Society, AAS Meeting 233, id.244.05
8. FR-type radio sources in COSMOS: relation of radio structure to size, accretion modes and large-scale environment: (**Vardoulaki, Eleni**; Jimenez Andrade, Eric F.; Delvecchio, Ivan; Karim, Alexander; Smolčić, Vernesa; Magnelli, Benjamin; Bertoldi, Frank; Schinnener, Eva; Sargent, Mark; Finoguenov, Alexis; VLA COSMOS Team), 2018, AAS Meeting 231, id. 304.03
9. The Radio Continuum Properties of Luminous Infrared Galaxies, (**Vardoulaki, E.**; Charmandaris, V.; Armus, L.; Murphy, E. J.; Diaz-Santos, T.; Evans, A.), The 11th Hellenic Astronomical Conference, held 8-12 September, 2013 in Athens, Greece. Online at <http://www.hellas.gr/conf/2013/>, pp.29-29
10. Radio Continuum Properties of Luminous IR Galaxies, (Charmandaris, Vassilis; **Vardoulaki, E.**; Armus, L.; Murphy, E. J.; Diaz Santos, T.; Evans, A. S.; GOALS Team), American Astronomical Society, AAS Meeting 221, id.157.04
11. Stellar luminosities and radio structures of radio sources, (**Vardoulaki, E.**), 10th Hellenic Astronomical Conference, Proceedings of the conference held at Ioannina, Greece, 5-8 September 2011. Edited by Iossif Papadakis and Anastasios Anastasiadis., pp.20-20
12. Probing accretion activity in radio sources using 24 micron Spitzer data, (**Vardoulaki, Eleni**; Rawlings, Steve; Simpson, Chris), Conference proceedings of "Galaxy Evolution with Spitzer and Herschel", Crete, May 2006

Working papers

1. LOFAR observations of the COSMOS field and LOFAR-VLBI, (**Vardoulaki, E.** et al.), 2024; data paper, analysis stage
2. Radio AGN jet paths and cluster weather, (Backöfer, V.; **Vardoulaki, E.**; Vazza, F. et al.), 2023; follow-up of Vardoulaki et a. 2021c, comparing bent angle of radio AGN to MHD-ENZO simulations using COSMOS VLA and MIGHTEE data; extended research of master's thesis project

3. Radio Galaxy Zoo: EMU definition paper, (Hongming Tang & Eleni Vardoulaki, et al.), in prep.
4. Source identification methodologies: blind v catalogue and anomaly detection, (Gary Segal, Eleni Vardoulaki, David Parkinson, Micah Bowles, Hongming Tang, et al.), 2023-2024
5. A Study of the Fanaroff-Riley dichotomy with the GAMA-23 Survey, (Miranda Yew, Ray P. Norris et al. incl. **Eleni Vardoulaki**), draft circulated to EMU collaboration
6. X-ray/radio coincidence in FR-type radio sources in COSMOS, (**Vardoulaki, E.**; Gozaliasl, G.; Finoguenov, A.; and the COSMOS Team), advanced analysis
7. Classification games in the high resolution and sensitivity radio universe: the role of machine learning (**Vardoulaki, E.**; et al.), analysis COSMOS & MeerKAT-MIGHTEE data
8. Dissecting the IR/radio relation in the local Universe: environmental scope, (**Vardoulaki, E.**; et al.), draft
9. Dissecting the IR/radio relation in the COSMOS field: environmental scope, (**Vardoulaki, E.**; et al.), analysis
10. Lyman continuum photon escape from FRI/FRII type radio AGN in the COSMOS field, (**Vardoulaki, E.**; Papaderos, P.; Gomes, J. M. et al.), advanced analysis
11. Spatial variations in the mid-IR/radio correlation in Luminous Infrared Galaxies, (**Vardoulaki, E.**; Charmandaris, V.; Murphy, E. J.; Diaz-Santos, T.; Armus, L.; Appleton, P.; and the GOALS Team), advanced draft
12. The stellar luminosities and radio structures of radio sources, (**Vardoulaki, E.**; Rawlings, S.; Mauch, T.; Hill, G. J.; Simpson, C.), advanced draft

Public outreach books

- 'The Universe in your pocket', Keybooks (June 2022; Greek Edition)
- Children's Book: an astrophysics story from Rogue Astrophysics (TBD; Greek Edition)

Public outreach articles in Greek and YouTube channels

- Articles for [a8inea](#) - 16
- Articles for [scinews.eu](#) - 21
- Channels with video presentations:
 - [Rogue Astrophysics](#) (2017-) - 43 videos
 - [Astronomy on Tap Jena](#) (2020-2022) - 17 online events / 21 videos
 - [Astronomy on Tap Bonn](#) (2018-2020) - 78 pub/online events / interviews

**Conferences,
Presentations,
Seminars, and
Schools**

Conference
organisation

special session at EAS 2023

”Coming out of darkness: how JWST is changing our view of high-*z* dusty, massive galaxies”

* SOC: M. Talia (UniBO - co-chair); J. Kartaltepe (RIT - co-chair); C. Casey (UT); M. Franco (UT); S. Jin (DAWN); H.J. McCracken (IAP); S. Toft (DAWN); **E. Vardoulaki** (TLS); J. Zavala (NAOJ)

* Invited speakers: D. Elbaz (CEA Saclay); D. Liu (MPE); N. Drakos (UCSC) **July 2023**

special session at EAS 2021 virtual meeting

”Data-intensive radio astronomy: bringing astrophysics to the exabyte era”

* SOC: Chair - **Eleni Vardoulaki** (TLS, Germany); co-chair - Marta Dembska (DLR, Germany); co-chair - Alexander Drabent (TLS, Germany); Mattia Vaccari (UWC, South Africa); Roberto Pizzo (ASTRON, Netherlands); Hans Rainer-Kloeckner (MPIfR, Germany); Giuliano Taffoni (INAF, Italy); Matthias Hoeft (TLS, Germany)

* Invited speakers: Prof. Russ Taylor (UCT/UWC/IDIA); Dr. Minh Huynh (CASS, Kensington WA); Dr. Katrin Heitmann (Argonne National Laboratory); Prof. Ian Bird (Cern)
Leiden, Netherlands **July 2021**

lunch session at the EAS 2020 virtual meeting

”Astronomy on Tap in Europe”

* SOC: Chair - Lizette Guzman-Ramirez (Leiden Observatory, Leiden, The Netherlands); Francisca Concha-Ramirez (Leiden Observatory, Leiden, The Netherlands); Jacob White (Konkoly Observatory, Budapest, Hungary); Sascha Zeegers (Institute of Astronomy and Astrophysics, Academia Sinica, Taipei, Taiwan); Jake Noel-Storr (Kapteyn Astronomical Institute, Groningen, Netherlands); Eleni Vardoulaki (Max-Planck-Institut für Radioastronomie, Bonn, Germany)

Leiden, Netherlands

July 2020

Seminars/Colloquia
given in English

Invited 14

”The radio luminosity function of group galaxies in COSMOS” IAASARS, invited

Athens, Greece

February 2024

”The role of active galaxies in galaxy evolution and the exascale future of radio astronomy”

Demokritos, invited

Athens, Greece

November 2022

”Complex radio AGN and their large-scale environment” TLS

Tautenburg, Germany

July 2022

”The role of AGN in galaxy evolution” TLS

online

December 2021

<p>”The role of AGN in galaxy evolution”University of Herdfordshire, invited <i>online</i></p>	<p>November 2021</p>
<p>”The amazing radio nature of active galaxies at 3 GHz VLA-COSMOS”INAF, invited <i>online</i></p>	<p>June 2021</p>
<p>”The role of AGN in galaxy evolution - the COSMOS view” TLS <i>online</i></p>	<p>December 2020</p>
<p>”Radio AGN and their role in galaxy evolution”, Portsmouth, invited <i>online</i></p>	<p>December 2020</p>
<p>Max Planck Institute for Radio Astronomy, invited <i>online</i></p>	<p>May 2020</p>
<p>”Radio AGN in COSMOS: relation to physical properties & environment”, ASTRON/JIVE, invited <i>Dwingeloo, NL</i></p>	<p>April 2019</p>
<p>”Creating outreach platforms in astronomy - Astronomy on Tap Bonn”, Stand-up talks+ on innovation at the Secretariat of the United Nations Framework Convention on Climate Change UNFCCC, invited <i>Bonn, Germany</i></p>	<p>February 2019</p>
<p>”Radio AGN and their role in galaxy evolution”, National Observatory of Athens, invited <i>Athens, Greece</i></p>	<p>December 2018</p>
<p>”Women in Science, a personal experience”, astroclub@AIfA, Argelander-Institut für Astronomie, invited <i>Bonn, Germany</i></p>	<p>February 2018</p>
<p>”FR-type radio sources at 3 GHz COSMOS: relation to physical properties and environment”, University of Heraklion, invited <i>Crete, Greece</i></p>	<p>June 2017</p>
<p>”FR-type radio sources at 3 GHz COSMOS: relation to physical properties and environment”, National Observatory of Athens, invited <i>Athens, Greece</i></p>	<p>June 2017</p>
<p>Max Planck Institute for Radio Astronomy <i>Bonn, Germany</i></p>	<p>May 2017</p>
<p>National Observatory of Athens, invited <i>Athens, Greece</i></p>	<p>December 2016</p>
<p>Max Planck Institute for Radio Astronomy <i>Bonn, Germany</i></p>	<p>December 2016</p>

	Max Planck Institute for Radio Astronomy <i>Bonn, Germany</i>	April 2016
	University of Crete <i>Heraklion, Greece</i>	March 2012
	"The nature of the faint radio-source population", National Observatory of Athens, invited <i>Athens, Greece</i>	April 2011
	"The faint radio-source population" CAUP <i>Porto, Portugal</i>	April 2011
	"The faint radio-source population" Princeton University <i>New Jersey, USA</i>	September 2010
Talks in conferences given in English	Contributed 37 - Invited 2	
	RADIO 2023 <i>Bochum, Germany</i>	November 2023
	Second Workshop on German Science Opportunities for the ngVLA, invited <i>Leipzig, Germany</i>	October 2023
	The 16th Hellenic Astronomical Conference <i>Athens, Greece</i>	July 2023 ; withdrawn due to personal reasons
	COSMOS meeting, online <i>Rochester, USA</i>	May 2023
	SPARCS international meeting, online <i>S. Africa</i>	November 2022
	RADIO2022 and GLOW assembly <i>Berlin, Germany</i>	November 2022
	EMU international meeting, online, talk given by co-lead of RGZ-EMU Hongming Tang <i>Australia</i>	July 2022
	COSMOS meeting, online <i>Paris, France</i>	July 2022
	Radio2021 Symposium and GLOW Annual Assembly, invited <i>MPA Garching, Germany</i>	November 2021
	The 15th Hellenic Astronomical Conference <i>online</i>	July 2021

EAS 2021 virtual meeting <i>Leiden, Netherlands</i>	July 2021
A new window on the radio emission from galaxies, clusters and cosmic web <i>online</i>	March 2021
SKA Science Conference 2021 <i>online</i>	March 2021
237st Meeting of the American Astronomical Society, virtual meeting <i>USA</i>	January 2021
EAS 2020 virtual meeting <i>Leiden, Netherlands</i>	July 2020
Radio2020 Symposium and GLOW Annual Assembly <i>online</i>	October 2020
The 14th Hellenic Astronomical Conference <i>Volos, Greece</i>	July 2019
COSMOS meeting <i>New York, USA</i>	May 2019
COSMOS meeting <i>Copenhagen, Denmark</i>	June 2018
RMS COSMOS meeting <i>Bologna, Italy</i>	May 2018
EWASS 2018 <i>Liverpool, UK</i>	April 2018
231st Meeting of the American Astronomical Society <i>Washington DC, USA</i>	January 2018
Diffuse Synchrotron Emission in Clusters of Galaxies - What's Next? <i>Leiden, Netherlands</i>	October 2017
COSMOS meeting <i>Kyoto, Japan</i>	July 2017
Escape of Lyman radiation from galactic labyrinths <i>Chania, Crete, Greece</i>	April 2016
JVLA COSMOS meeting <i>Zagreb, Croatia</i>	February 2015

	The 12th Hellenic Astronomical Conference <i>Thessaloniki, Greece</i>	June 2015
	EWASS 2015 <i>Tenerife, Spain</i>	June 2015
	A panchromatic view of galaxy evolution 30 years after IRAS <i>Cyprus</i>	June 2013
	High Redshift Radio Galaxies <i>Granada, Spain</i>	April 2005
Contributed posters	total 16	
	LOFAR family meeting <i>Olsztyn, Poland</i>	July 2023
	Coordinated Surveys of the Southern Sky <i>ESO Garching, Germany</i>	March 2023
	Coordinated Surveys of the Southern Sky <i>USA</i> Title: "Where data-intensive radio astronomy meets citizen science: RGZ-EMU"	February 2023
	241th Meeting of the American Astronomical Society <i>USA</i>	January 2023
	240th Meeting of the American Astronomical Society <i>USA</i>	June 2022
	237st Meeting of the American Astronomical Society, virtual meeting <i>USA</i>	January 2021
	The 13th Hellenic Astronomical Conference <i>Greece</i>	July 2017
	Gas, Dust, and Star-Formation in Galaxies from the Local to Far Universe <i>Chania, Crete, Greece</i>	May 2015
	Multiwavelength-Surveys: Galaxy Formation and Evolution from the early universe to today <i>Dubrovnik, Croatia</i>	May 2014
	The 11th Hellenic Astronomical Conference <i>Athens, Greece</i>	September 2013
	The Modern Radio Universe 2013 <i>Bonn, Germany</i>	April 2013

	Infrared and Submillimeter Probes of Gas in Galaxies: From the Milky Way to the Distant Universe <i>Pasadena, USA</i>	March 2013
	221st Meeting of the American Astronomical Society <i>Long Beach, USA</i>	January 2013
	The 10th Hellenic Astronomical Conference <i>Ioannina, Greece</i>	September 2011
	Challenges in Infrared Extragalactic Astrophysics II <i>Agios Nikolaos, Greece</i>	September 2010
	A century of Cosmology <i>Venice, Italy</i>	August 2007
Participations in seminars, conferences and schools	Lecturing (1); Attending (24)	
	LOFAR-VLBI workshop organised at the Thüringer Landessternwarte Tautenburg: learning, testing and implementing LOFAR-VLBI techniques in local server using two different types of pipelines (one written in CWL) on own COSMOS LOFAR data. <i>Tautenburg, Germany</i>	January 2024
	Invited Lecturer at International Workshop on Machine Learning in Astronomy <i>online</i>	November 2023
	<i>online</i>	April 2022
	Clusters and Relics TLS meeting <i>online</i>	March 2022
	Second ESCAPE Virtual Observatory school <i>online</i>	February 2022
	6th workshop on compact steep spectrum and GHz-peaked radio sources <i>online</i>	May 2021
	6th LOFAR data school <i>online</i>	March 2021
	ADASS virtual meeting <i>online</i>	November 2020
	CASA-VLBI workshop <i>online</i>	November 2020

- Exploiting Archives for Radio Astronomy in the SKA era
online **November 2020**
- Seminar "Astronomical Instruments: How they work, how they are planned, build and tested" (with certificate), IMPRS, Max Planck Institute for Radio Astronomy,
Bonn, Germany **January 2018**
- Online seminars on 'Machine Learning' (with certificate), Andrew Ng, Stanford University,
courseera **March 2017**
- Seminar "What is machine learning? Supervised Learning - regression, support vector machines, neural networks, Unsupervised Learning - clustering, principal component analysis, dimensionality reduction, Tools - Monte Carlo Markov chains and Bayesian inference" (with certificate), IMPRS, Max Planck Institute for Radio Astronomy,
Bonn, Germany **February 2017**
- Seminar with title 'Managing R&D Projects' (with certificate), Dr. Cristine Issa, University of Cologne,
Cologne, Germany **October 2016**
- Seminar with title 'Time- and Self-Management' (with certificate), Dr. Carrie B. Dohe, University of Cologne
Cologne, Germany **October 2016**
- Seminar with title 'Professional Presentations at Conferences and in the Academic World' (with certificate), Dr Carrie B. Dohe, University of Cologne
Cologne, Germany **June 2016**
- Seminar with title 'Self-Marketing for Female Scientists' (with certificate), Dr Cristine Issa, University of Cologne
Cologne, Germany **April 2016**
- The discovery of the Anisotropy of the Fossil Radiation of the Universe, by George F. Smoot, Nobel Prize of Physics 2006
Paris, France **December 2006**
- AstroGrid Science Workshop and RadioNet/Astro Grid workshop for radio data providers,
Oxford, UK **December 2006**
- Studying Galaxy Evolution with Spitzer and Herschel,
Agios Nikolaos, Greece **May 2006**
- Cosmology, galaxy formation and astro-particle physics on the pathway to the SKA,
Oxford, UK **April 2006**
- Ninth Synthesis Imaging Summer School,
New Mexico, USA **June 2004**

Summer School on Physics, University of Crete
Heraklion, Greece

June 2002

Conference on Lasers and their applications, FORTH
Heraklion, Greece

June 2001

Languages

- Greek: Native speaker
- English: Fluent & Proficiency from Cambridge University & TOELF
- Portuguese: Basic (A1; 2010-2011)
- French: Basic (A1; 2009-2010)
- German: Basic (A2; 2019, 2021)

Sports, music and Arts/Leadership, Presentation and Performance

- Organizer of dance team performances, specialized in salsa, and webmaster
- Performing art to an audience of 2000 people
- Sports captain in high-school
- Painting with pencil, charcoal on paper, watercolour, acrylic, oil on canvas
- 4 years ballet
- 6 years classical piano

References

Prof Dr Matthias Hoelt
Thüringer Landessternwarte Tautenburg
hoelt@tls-tautenburg.de

Prof Franco Vazza
Physics and Astronomy Department, University of Bologna
franco.vazza2@unibo.it

Dr Alexis Finoguenov
University of Helsinki
alexis.finoguenov@helsinki.fi