

PERSONAL INFORMATION **Lorenzo Paolo Corgnati**

JOB APPLIED FOR

WORK EXPERIENCE

2013 - present **Coastal Radar, Data Management and Stereo Vision Research Engineer**
Tecnologo III livello – Matricola 17410
National Research Council of Italy (CNR) - Institute of Marine Science (ISMAR) in Lerici Forte Santa Teresa, 19032 Pozzuolo di Lerici (SP), Italy

Research contracts

12/2018-present: Contratto TI, Protocollo CNR-ISMAR nr 8688 del 01/12/2018
04/2018-12/2018: Contratto TD, Protocollo CNR-ISMAR nr 0001368 del 22/02/2018
04/2017-03/2018: Contratto TD, Protocollo CNR-ISMAR nr 0001685 del 27/02/2017

Research grants

03/2016-03/2017: Assegno di Ricerca, Protocollo CNR-ISMAR nr 0000793 del 04/02/2016
03/2015-02/2016: Assegno di Ricerca, Protocollo CNR-ISMAR nr 0001532 del 18/02/2015
03/2013-02/2015: Assegno di Ricerca, Protocollo CNR-ISMAR nr 0000859 del 31/01/2013

Business or sector Oceanographic research

Main tasks include the management of the CNR-ISMAR Coastal HF Radar network for the monitoring of sea surface currents (2013-present), the technical coordination of the HF Radar data management within the European HFR Node (2018-present), the data management for oceanographic instruments and catalogues (2013-present), the 3D reconstruction of sea surface, marine waves, underwater environment and marine organism's detection (2013-2015).

Areas of responsibility:

Research and Development; Software Development; Infrastructure Manager; Scientific Production.

Assignments:**Technical coordination of the distribution service of the HF Radar (HFR) data towards CMEMS INSTAC, EMODnet Physics and SeaDataNet infrastructures within the European HFR Node.**

- *Team:* two researchers and two research engineers.
- *Role:* technical coordinator and software developer.
- *Methods:* collection, processing and distribution of standardized quality-controlled Near Real Time (NRT) HFR data towards CMEMS INSTAC, EMODnet Physics and SeaDataNet infrastructures. The performed activities consist in the design and implementation of all the software needed for the NRT data processing workflow and in the coordination and maintenance of the operational service for the creation and distribution of NRT HFR surface current data in standard format and compliant to a minimum set of Quality Control tests to the main European data distribution infrastructures.
- *Programming language:* Matlab, Python, bash scripts, xml, html
- *Tools:* M_Map libraries, HFR_Prog libraries, netCDF tools (NCO), THREDDS.
- *Publications:* [1], [3], [7], [24], [26], [27], [28], [29], [30], [31], [42], [43], [44]
- *Released software:* [46], [47], [48], [49], [50], [51]

Contribution to the Service Evolution Task for the Integration of the HF Radar (HFR) in the CMEMS INSTAC.

- *Team*: two research engineers.
- *Role*: member of the working team.
- *Methods*: integration of quality-controlled Near Real Time (NRT) HFR data within the In Situ TAC products based on the INCREASE project recommendations. The performed activities aim to insure a realistic calendar to start the provision of NRT HFR data in April 2019. The first task consists in organizing the Integration of the NRT HF Radar data in products such as Sea-In-Situ Near Real Time observations for first integration in V5 according to the recommendations produced in the INCREASE project. These include the delivery of standardized data with RTQC procedures. The second task consists in the support of the implementation of the production of NRT Total and Radial velocities of surface current that will be in place in a pre-operational mode in the INSTAC production unit for October 2018, and then delivered in V5 in April 2019 and V6 in April 2020.
- *Programming language*: Matlab, Python, bash scripts, xml, html
- *Tools*: M_Map libraries, HFR_Prog libraries, netCDF tools (NCO), THREDDS.
- *Publications*: [7], [24], [28], [29], [30], [31], [44]

Definition of data and metadata interoperable formats and QA/QC procedures to be adopted as European standards for coastal radar applications within Italian flagship project RITMARE, EU projects JERICO-NEXT, INCREASE (CMEMS) and SeaDataCloud (SDC), EuroGOOS HFR Task Team.

- *Team*: three senior researchers, one technician and one research engineer.
- *Role*: member of the working team.
- *Methods*: definition of data and metadata formats compliant with CF-1.6, ACDD, Unidata Dataset Discovery and INSPIRE conventions. Definition of QA/QC procedures: QA procedures are based on IOOS best practices and QC methods are based on SNR, spatial geometry (GDOP) and statistics. The defined data and metadata formats and the QA/QC procedures are intended to be adopted as official European standards within the European HF Radar network and within the European services for delivery of NRT and historical HFR data (CMEMS and SDC).
- *Programming language*: Matlab, Python, bash scripts, xml, html
- *Tools*: M_Map libraries, HFR_Prog libraries, netCDF tools (NCO), THREDDS.
- *Publications*: [3], [7], [28], [29], [30], [31], [44]

Sea surface current monitoring using High Frequency radar

- *Team*: one senior researcher, one technician and one research engineer.
- *Role*: member of the working team.
- *Methods*: development of a control software tool for the data management, from data gathering at the sites to the final velocity data production. Realization of OGC compliant interoperable data format architecture (netCDF based) and management of a THREDDS catalog for data visualization and access.
The data produced by the system are processed for quality control through signal to noise ratio analysis and GDOP analysis. Technical reports and scientific papers (peer-review and conference proceedings) are produced.
- *Programming language*: Matlab
- *Tools*: M_Map libraries, HFR_Prog libraries, netCDF tools (NCO).
- *Publications*: [1], [2], [3], [4], [5], [9], [10], [11], [13], [15], [25], [26], [32], [33], [34]

Installation and data management of a High Frequency radar network for sea surface current monitoring

- *Team*: one senior researcher, one technician and one research engineer.
- *Role*: member of the working team
- *Methods*: installation of 4 sites of the radar network, from the infrastructure to the IT framework. Calibration of the antenna patterns is made through the use of a transponder moving along circular paths centred in the antenna sites. The network products are validated through the analysis of current velocity data sensed by drifters deployed in the radar coverage area and of Acoustic Doppler Current Profilers installed in the radar coverage area. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming languages*: Matlab, bash scripts.
- *Tools*: Codar SeaSonde radars, transponder for calibration, drifters for validation.
- *Publications*: [1], [2], [3], [4], [5], [9], [10], [11], [13], [15], [25], [26], [32], [33], [34]

Design and implementation of a data management system for real-time retrieval and quality control of data collected from research vessels and automatic cruise report generation (<http://cruise.sp.ismar.cnr.it>)

- *Team:* one senior researcher, one technician and one research engineer.
- *Role:* member of the working team.
- *Methods:* development of a control software tool for the data management for data gathering at the research vessels, preliminary quality check, real time presentation on a web platform, complete Quality Control, automatic cruise report generation and production of final data in interoperable formats. Realization of a semantic framework (based on Resource Description Framework) for data and of OGC compliant interoperable data format architecture (netCDF based).
The data processed by the system are collected by CTDs and Acoustic Doppler Current Profilers. The data produced by the system are processed for Quality Control according to the standards of the specific instruments. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Matlab, Python, bash scripts, xml, html, MySQL, PHP.
- *Tools:* M_Map libraries, RDI WinADCP, RDI VMDas, netCDF tools (NCO), RDF, CSS.

Experimental design and implementation of an acoustic underwater point-to-point communication channel for dispatching operations.

- *Team:* one senior researcher and one research engineer.
- *Role:* leader of the working team
- *Methods:* operational test of the acoustic modems via Hyperteminal application, design and implementation of software tools for text string and image compression and binary coding, design and implementation of the software tools for controlling and synchronizing the two acoustic modems, installation and operation of the software tools onboard Raspberry Pi mini PC, test of the acoustic point-to-point network in tank and at sea. Technical report and is produced.
- *Programming languages:* Python, bash scripts.
- *Tools:* Pyserial libraries, Binascii libraries, Base64 libraries, Hyperteminal, Trittech Micron Data Modem, Raspberry Pi.

Design and implementation of a method for gelatinous zooplankton automatic recognition

- *Team:* one senior researcher and two research associates.
- *Role:* member of the working team
- *Methods:* image processing, feature extraction, Machine Learning, feature elimination.
The developed method is based on the Elastic Net Tikhonov Regularization method and it allows for the training of predictive models for gelatinous zooplankton identification. The generated models automatically detect gelatinous zooplankton specimens in underwater images. The validation of the models is made in a cross-validation framework based on ground truth datasets. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Python
- *Tools:* OpenCV libraries, L1L2 libraries.
- *Publications:* [6], [8], [11], [16], [17], [18]

Design and realization of an autonomous underwater imaging system for the gelatinous zooplankton monitoring

- *Team:* one senior researcher and two research associates.
- *Role:* member of the working team
- *Methods:* design and realization of prototypes with high resolution cameras, Raspberry Pi mini-PC, lighting system, underwater case, battery pack. Development of calibration methods and software tools for the management of the camera firmware.
Software tools for calibration of the optical sensors are developed based on the pinhole camera model. Calibration activity is performed on the system sensors. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Python, C++, LUA
- *Tools:* OpenCV libraries, CHDK, Canon SDK, Magic Lantern.
- *Publications:* [6], [8], [11], [16], [17], [18]

Design and implementation of a method for 3D reconstruction of sea surface and wave field feature extraction aimed at the wave field spectral characterization:

- *Team:* one senior researcher and two research associates.
- *Role:* member of the working team
- *Methods:* calibration, rectification, disparity evaluation of the stereo data. Remapping of the point clouds into elevation domain. Pattern Recognition techniques for wave crests and troughs detection. Wave field feature extraction.
The developed method is based on the acquisition and processing of large datasets of images sensed in the visible band. The method results are validated through the acquisition of image datasets of a wave tank able to generate regular and irregular waves of known period, significant height and wavelength. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Python, C++
- *Tools:* OpenCV libraries, Point Cloud libraries.
- *Publications:* [14]

Design and realization of a stereo vision system for the sea surface imaging aimed at the wave field spectral characterization:

- *Team:* one senior researcher and two research associates.
- *Role:* member of the working team
- *Methods:* design and realization of prototypes with reflex high-resolution cameras and adequate lenses. Development of calibration methods and software tools. Design of a mathematical model for the system design optimization.
Software tools for calibration of the optical sensors are developed based on the pinhole camera model. Calibration activity is performed on the system sensors. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Python, C++
- *Tools:* OpenCV libraries, Point Cloud libraries.
- *Publications:* [14]

Shipboard on R/V SARS in Arctic Sea for the research cruise “PREPARED and Polar Plastics – EUROFLEETS 2”

- *Team:* 40-person crew.
- *Role:* member of the scientific crew
- *Methods:* preparation and deployment of 3 moorings for current, salinity, temperature, conductivity, sedimentary measurements.
- *Tools:* CTD, currentmeters, sedimentary traps, acoustic releaser, various probes.
- *Publications:* [45]

2007 – 2013 Film Company - ‘Due Monete’ (now DUEL:Film) - Founder and Joint Owner

Due Monete Snc
Via Ponzio 3, 10141 Torino (TO), Italy

Business or sector Movie production, advertisement

Communication and video company operating in scriptwriting and in the production of short films and videos for both advertising and individual client productions. The company also produces their own short films some of which have received international recognition and nominations at various film festival, most notably in the Cannes Film Festival for the film “Il Resto” in 2010.

Positions held

Executive producer (2007-2012)
Head of production (2007-2012)
Director assistant (2007-2012)
Camera operator (2007-2012)
Editor (2007-2012)
Colorist (2010-2012)

Areas of responsibility

As founder and joint owner of Due Monete my responsibilities covered many differing roles within the company: company management, fund raising, promotion, strategy planning, accounting, supply chain manager, head of production, post-production and motion graphics, distribution and teaching.

2001-2011 **Forest Fires Early Warning Research Associate**

Politecnico di Torino
Corso Duca degli Abruzzi 24, 10128 Torino (TO), Italy

Research grants

08/2009-07/2011: Assegno di Ricerca, Protocollo Politecnico di Torino nr 14078.VII.17 del 31/07/2009
08/2007-70/2009: Assegno di Ricerca, Contratto Politecnico di Torino nr 183/2007/AR del 31/07/2007

Business or sector Remote sensing research

Main tasks included the development of a Doppler excess prediction software in radio-occultation satellite link (2001-2004), the development of a predictive fire danger index evaluation system suited for alpine regions (2004-2006) and the development of an integrated monitoring system for wildfires monitoring and early warning (2007-2011).

Areas of responsibility:

Instrumentation development; Supply chain management; Software development; Infrastructure manager; Promotion and outreach; Teaching activity; Scientific production

*Assignments:***Design and implementation of a software for image rectification:**

- *Team:* research team, consisting of myself and two PhD students
- *Role:* leader of the working team
- *Methods:* projective approach based on Digital Terrain Models and geospatial information.
- The developed method was based on the acquisition and the processing of large datasets of images sensed in the visible, near infrared and thermal infrared bands. The geo-referenced outputs were validated through comparison with ground control points in the monitoring coverage. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Matlab, C++
- *Tools:* Digital Terrain Models, IDRISI GIS
- *Publications:* [19], [20], [35]

Design and implementation of a software for false alarm reduction in alpine forest fires early warning:

- *Team:* research team, consisting of myself and two PhD students
- *Role:* leader of the working team
- *Methods:* image analysis, pattern recognition, wavelet analysis and machine learning. The method is based on the acquisition and processing of large datasets of images sensed in the visible and near infrared bands. The results were validated using machine learning methods in cross-validation framework, based on ground truth data. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming languages:* Matlab, C++
- *Tools:* OpenCV libraries.
- *Publications:* [12], [19], [35]

Design and implementation of a software for smoke detection in alpine forest fires:

- *Team:* research team, consisting of myself and two PhD students
- *Role:* leader of the working team
- *Methods:* image analysis, pattern recognition. The developed method was based on the acquisition and the processing of large datasets of images sensed in the visible, near infrared and thermal infrared bands. The software results were validated through the application of machine learning methods in cross-validation frameworks based on ground truth data. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming language:* Matlab, C++
- *Tools:* OpenCV libraries
- *Publications:* [19], [35]

Design and implementation of a software for hot spot detection in alpine forest fires:

- *Team:* research team, consisting of myself and two PhD students
- *Role:* leader of the working team
- *Methods:* image analysis, pattern recognition and radiometric analysis.
The developed method was based on the acquisition and the processing of large datasets of images sensed in the visible, near infrared and thermal infrared bands. The software results were validated through the application of machine learning methods in cross-validation framework, based on ground truth data. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming languages:* Matlab, C++
- *Tools:* radiometric model developed by the team.
- *Publications:* [19], [35], [36], [37]

Design and implementation of an observing system for forest fires monitoring and early warning:

- *Team:* research team, consisting of myself and two PhD students
- *Role:* leader of the working team
- *Methods:* realization of prototypes through the modification of consumer cameras (IR filter removal and additional filters addition) and thermal cameras for Visible, Near InfraRed and Thermal InfraRed imaging. Realization of the control software for the integration with a pan-tilt system for the monitoring scan management.
The prototypes were installed in a fixed station and on a mobile station (van with internal lab). The developed system was based on the acquisition of large datasets of images sensed in the visible, near infrared and thermal infrared bands. Software tools for calibration of the visible and infrared sensors were developed based on the pinhole camera model. Calibration activity was performed on the system visible and infrared sensors. Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming languages:* Matlab, C++
- *Tools:* consumer camera, modification of optical sensors, optical filters, pan-tilt engines.
- *Publications:* [19], [35], [37]

Design and implementation of a software forecast tool for fire danger index evaluation suited for alpine region

- *Team:* research team, consisting of myself and one thesis student
- *Role:* leader of the working team
- *Methods:* modelling extension of the Canadian Forest Weather Index (FWI) through the analysis and the modelling of climatological, orographic and vegetation conditions. Integration of numerical weather prediction data provided by ECMWF.
Land surface temperature data sensed by MODIS have been studied and analysed as a potential input for the model. Vegetation index data sensed by ATSR-2 and MODIS have been studied and analysed as potential input for the model. The model results were validated through the application of machine learning methods in cross-validation frameworks, based on ground truth data (historical forest fires time series). Technical reports and scientific papers (peer-reviewed and conference proceedings) are produced.
- *Programming languages:* Matlab
- *Tools:* ECMWF numerical weather previsions, GRIB data format, IDRISI GIS.
- *Publications:* [19], [21], [35], [37], [38]

Design and development of a software for GPS signal Doppler shift prediction in radio-occultation satellite link:

- *Team:* research team, consisting of a professor, a senior researcher and myself
- *Role:* member of the working team
- *Methods:* simulation of signal behaviour in radio-occultation satellite link, based on ray-tracing approach and Runge-Kutta solution for fourth order differential equations
- Teaching (Numerical analysis, radiometry)
- *Programming language:* Matlab
- *Publications:*[22], [23], [39], [40], [41]

1999 - 2006 **Head of Production – film company**

Associazione culturale Immagina
Strada Berteu 5, 10020 Casalborgone (TO), Italy

Business or sector Education, movie production, movie workshops

Short description of job title:

Festival coordinator (2003-2006)

Executive producer (2000-2006)

Editor (1999-2006)

Camera operator (1999-2006)

Workshop coordinator (1999-2006)

Areas of responsibility

Festival management; Fund rising; Promotion; Strategy planning; Accounting; Head of production, Post-production and motion graphics; Teaching.

2002 - 2005 **Head of Guest Lodging Office**

Cinemambiente Environmental International Film Festival
Via Montebello 15, 10100 Torino (TO), Italy

Business or sector Film Festival

Management of the Guest Lodging Office (2002-2005)

Areas of responsibility

Festival management; Drivers department coordination; Accounting; Supply chain manager; Festival organization

EDUCATION AND TRAINING

- 2020 **Course in Julia programming**
Coursera – University of Cape Town
- Julia programming language
- 2019 **ADCP Crash Course (by SINAPSI Interreg Project)**
Università di Genova – DICCA Dipartimento di Ingegneria Civile, Chimica e Ambientale, Italy
- Fundamentals of ADCP use, deployment and maintenance
 - Fundamentals of ADCP data processing and management
- 2019 **WERA Operator Seminar**
Helzel Messtechnik GmbH, Germany
- WERA hardware structure
 - WERA site geometry
 - WERA software solutions
- 2019 **I-STORM THREDDS workshop**
National Research Council of Italy (CNR) – Institute of Marine Science (ISMAR), Italy
- THREDDS architecture
 - THREDDS server deployment and maintenance
 - Metadata formats
 - THREDDS catalog management for data access and distribution
- 2017 **Summer school on HF and X-band radars**
ISSOR (International Summer School on Radio-Oceanography) at Université de Caen, France
- Fundamentals for radio-oceanography
 - HF radar: technology, validation and measurements
 - X-band radar: technology and measurements
 - Data analysis for surface currents
 - HF radars for high tidal currents
 - Data analysis for sea states
 - Radio-oceanography: quality controls, coupling with other methods and applications
 - HF radar for tsunami detection
 - Data Assimilation
- 2016 **Course in Monitoring the Oceans from Space**
EUMETSAT by Imperative Space
- Oceans and climate
 - Oceans, weather and climate impacts
 - Ocean transport and hazards
 - Living oceans (bio-geochemistry)
 - Oceans and us (socio-economics)
- 2014 **School in Mediterranean Sea models, observations and experiments**
National Research Council of Italy (CNR) – Institute of Atmospheric Science and Climate (ISAC), Italy
- Ocean modelling
 - Operational oceanography
 - Lagrangian oceanography
 - Eulerian oceanography
 - Oceanographic geology
 - Ocean satellite observation

- 2014 **Course in Getting and cleaning data**
Coursera – Johns Hopkins University
- R
 - Tidy data
 - Statistical data cleaning
- 2014 **Course in R Programming**
Coursera – Johns Hopkins University
- R
- 2014 **Course in Machine Learning**
Coursera – Stanford University
- Machine Learning
 - Logistic regression
 - Neural networks
 - Support Vector Machines
- 2013 **School in Pattern Analysis and Computer Vision**
Italian Institute of Technology, Italy
- Computer Vision
 - Pattern analysis
 - Pattern recognition
 - Machine learning
- 2013 **School in Regularization Methods for High Dimensional Learning**
Università degli Studi di Genova - DIBRIS, Italy
- Machine Learning
 - Tikhonov Regularization
 - LASSO
 - L1L2 regularization and feature selection
- 2004-2006 **PhD in Electronics and Communication Engineering** EQF 8
- Politecnico di Torino
Corso Duca degli Abruzzi 24, 10128 Torino (TO), Italy
- Active and passive remote sensing
 - Radiometry
 - Forest fires monitoring and early warning
 - Forest fires risk analysis
 - Computer science
 - Numerical calculus
 - Information technology
 - GPS signal analysis
- 1995-2003 **Master degree in Telecommunication Engineering** EQF 7
Grade:
101/110
- Politecnico di Torino
Corso Duca degli Abruzzi 24, 10128 Torino (TO), Italy
- Active and passive remote sensing
 - Radiometry
 - GPS signal analysis
 - Computer science
 - Signal processing
 - Information technology
 - Electronics

1990-1995 **High school degree**

EQF 4
Grade:
60/60

Liceo Scientifico "G. Segrè"
Corso Alberto Picco 14, 10131 Torino (TO), Italy

- Italian literature
- Latin language and literature
- Mathematics
- Physics
- Chemistry
- History
- Philosophy

PERSONAL SKILLS

Mother tongue(s) Italian

| Other language(s) | UNDERSTANDING | | SPEAKING | | WRITING |
|--------------------------------|---------------|---------|--------------------|-------------------|---------|
| | Listening | Reading | Spoken interaction | Spoken production | |
| English | C1 | C1 | C1 | C1 | C1 |
| PET. Passed with merit (1995). | | | | | |
| German | A1 | B1 | A1 | A1 | A1 |
| High school class (1990-1995) | | | | | |

Levels: A1/2: Basic user - B1/2: Independent user - C1/2 Proficient user
Common European Framework of Reference for Languages

Communication skills

- Good communication skills gained through my experience as a company owner and as a researcher.
- Good team working skills gained through my experience in research groups and as the head of production.

Organisational / managerial skills

- Leadership - experience as company manager, head of production and coordinator of educational activities.
- Organisational skills - experience in coordinating field experiments, as head of production and as festival coordinator.

Job-related skills

- Good command of production processes - experience as responsible of movie executive production.

Computer skills

- Proficient user of Microsoft Windows™ OS.
- Proficient user of Macintosh OS.
- Proficient user of Linux Ubuntu OS.
- Proficient command of Microsoft Office™ tools (MS Office, MS Excel, MS PowerPoint).
- Proficient command of LaTeX.
- Proficient command of MATLAB™.
- Proficient command of C and C++.
- Proficient command of Python.
- Advanced command of R.
- Advanced command of Julia.
- Proficient command of Visual Studio suite.
- Advanced command of HTML5 and CSS.
- Proficient command of PHP.
- Advanced command of MySQL.
- Basic command of IDL.
- Advanced command of IDRISI GIS.
- Proficient command of OpenCV library, PCL library.
- Proficient command of Final Cut Suite.
- Proficient command of Adobe Creative Suite.

Driving licence

- A
- B

PUBLICATIONS

ISI journal articles

- [1] Mantovani C., Corgnati L., Horstmann J., Rubio A., Reyes E., Quentin C., Cosoli S., Asensio JL., Mader J., Griffa A., 2020. Best Practices on High Frequency Radar Deployment and Operation for Ocean Current Measurement. *Frontiers in Marine Science*, vol. 7, ISSN 2296-7745, doi: 10.3389/fmars.2020.00210. WOS:000525186600001
- [2] Rubio A., Manso-Narvarte I., Caballero A., Corgnati L., Mantovani C., Reyes E., Griffa A., Mader J., 2019. The seasonal intensification of the slope Iberian Poleward Current. *Copernicus Marine Service Ocean State Report 3, Journal of Operational Oceanography*, vol. 12, pp. s13-s18, doi: 10.1080/1755876X.2019.1633075. WOS:000495675100011
- [3] Roarty H., Cook T., Hazard L., George D., Harlan J., Cosoli S., Wyatt L., Alvarez Fanjul E., Terrill E., Otero M., Largier J., Glenn S., Ebuchi N., Whitehouse B., Bartlett K., Mader J., Rubio A., Corgnati L., Mantovani C., Griffa A., Reyes E., Lorente P., Flores-Vidal X., Saavedra-Matta KJ., Rogowski P., Prukpitikul S., Lee S-H., Lai J-W., Guerin C-A., Sanchez J., Hansen B., Grilli S., 2019. The Global High Frequency Radar Network. *Frontiers in Marine Science*, vol. 6, ISSN=2296-7745, doi: 10.3389/fmars.2019.00164. WOS:000467919400001
- [4] Corgnati L., Mantovani C., Griffa A., Berta M., Penna P., Celentano P., Bellomo L., Carlson DF., D'Adamo R., 2019. Implementation and Validation of the ISMAR High-Frequency Coastal Radar Network in the Gulf of Manfredonia (Mediterranean Sea). *IEEE Journal of Oceanic Engineering*, vol. 44, no. 2, pp. 424-445, doi: 10.1109/JOE.2018.2822518. WOS:000464929900013
- [5] Sciascia R., Berta M., Carlson DF., Griffa A., Panfili M., La Mesa M., Corgnati L., Mantovani C., Domenella E., Fredj E., Magaldi MG., D'Adamo R., Paziienza G., Zambianchi E., Poulain PM., 2018. Linking sardine recruitment in coastal areas to ocean currents using surface drifters and HF radar: a case study in the Gulf of Manfredonia, Adriatic Sea. *Ocean Science*, vol. 14, pp. 1461-1482, doi: <https://doi.org/10.5194/os-14-1461-2018>. WOS:000451278500001
- [6] Marini S., Corgnati L., Mantovani C., Bastianini M., Ottaviani E., Fanelli E., Aguzzi J., Griffa A., Poulain PM., 2018. Automated estimate of fish abundance through the autonomous imaging device GUARD1. *Measurement*, vol. 126, pp. 72-75, doi: <https://doi.org/10.1016/j.measurement.2018.05.035>. WOS:000444627000008
- [7] Rubio A., Mader J., Corgnati L., Mantovani C., Griffa A., Novellino A., Quentin C., Wyatt L., Schulz-Stellenfleth J., Horstmann J., Lorente P., Zambianchi E., Hartnett M., Fernandes C., Zervakis V., Gorringer P., Melet A., Puillat I., 2017. HF Radar Activity in European Coastal Seas: Next Steps toward a Pan-European HF Radar Network. *Frontiers in Marine Science*, vol. 4, ISSN 2296-7745, doi: 10.3389/fmars.2017.00008. WOS:000457690600008
- [8] Corgnati L., Marini S., Mazzei L., Ottaviani E., Aliani S., Conversi A., Griffa A., 2016. Looking inside the Ocean: Toward an Autonomous Imaging System for Monitoring Gelatinous Zooplankton. *Sensors*, Vol. 16, N. 12, ISSN 1424-8220, doi: 10.3390/s16122124. WOS:000391303000143
- [9] Carlson DF, Griffa A., Zambianchi E., Suaria G., Corgnati L., Magaldi MG, Poulain PM, Russo A., Bellomo L., Mantovani C., Celentano P., Molcard A., Borghini M., 2016. Observed and modeled surface Lagrangian transport between coastal regions in the Adriatic Sea with implications for marine protected areas, *Continental Shelf Research*, ISSN 0278-4343, doi: 10.1016/j.csr.2016.02.012. WOS:000374078400003
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ISI conference publications

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Non ISI conference publications

- [24] Corgnati L., Mantovani C., Rubio A., Mader J., Reyes E., Igoa JL., Novellino A., Gorringer P., Griffa A., 2020. The European HF Radar Node: focal point to promote land-based remote sensing of coastal surface currents and its applications. EGU General Assembly Conference Abstracts, pp. 1537
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- [26] Rubio A., Mader J., Corgnati L., Mantovani C., Griffa A., Igoa JL., Reyes E., Tarot S., 2019. High Frequency Radar-derived surface currents: a powerful new data set for CMEMS. Geophysical Research Abstracts, vol. 21
- [27] Corgnati L., Mantovani C., Igoa JL., Rubio A., Mader J., Reyes E., Novellino A., Gorringer P., Griffa A., 2019. The European High Frequency Radar Node. Geophysical Research Abstracts, vol. 21
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- [29] Corgnati L., Mantovani C., Rubio A., Reyes E., Quentin C., Cosoli S., Novellino A., Mader J.,

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- [35] Losso A., Corgnati L., Bertoldo S., Allegretti M., Notarpietro R., Perona G., 2012. SIRIO: an integrated forest fire monitoring, detection and decision support system - performance and results of the installation in Sanremo (Italy). WIT Transactions on Ecology and the Environment, Volume: 158, WIT Press, pp. 79-90. DOI: 10.2495/FIVA120071
- [36] Bertoldo S., Corgnati L., Losso A., Perona G., 2012. Safety in forest fire fighting action: a new radiometric model to evaluate the safety distance for firemen working with hand-operated systems. WIT Transactions on Ecology and the Environment, Volume: 158, WIT Press, pp. 3-12. DOI: 10.2495/FIVA120011
- [37] Perona G., Corgnati L., Losso A., Ciavoli Cortelli L., Falzini S., Palutan F., Fiorani A., 2009. Development of an Integrated Methodology for Early Firing Alarm And Real Time Monitoring. Proceedings of 33rd International Symposium on Remote Sensing of Environment, 4-8 May 2009, Stresa (VB).
- [38] Corgnati L., Bertoldo S., Tartaglione N., Perona G., 2008. Use of MERIS and AATSR data in previsionsal fire danger index computation system for alpine regions. ESA ESRIN second joint MERIS and (A)ATSR workshop, 22-26 September 2008, Frascati (Italy).
- [39] Gabella M., Corgnati L., Morin E., Perona G., Combining multisource data observations: how to use the TRMM spaceborne weather radar to adjust meteorological radars at ground level, 7th INTERNATIONAL WORKSHOP on PRECIPITATION IN URBAN AREAS Extreme Precipitation, Multisource Data Measurement and Uncertainty December, 2006, St. Moritz, Switzerland.
- [40] M. Gabella, L. Corgnati, S. Turso, G. Perona, "Taratura e messa a punto di radar meteorologici operanti nel Mediterraneo mediante il TRMM Precipitation Radar", Riunione Annuale SIEm, Torino, Italy, Sep.2006.
- [41] Notarpietro R., Corgnati L., Gabella M., Perona G., 2004: Modelling and Inverting GPS radio-occultation signals using a physical optics approach, XV Riunione Nazionale di Elettromagnetismo, Cagliari.

Technical reports

- [42] Etienne H., Verbrugge N., Boone C., Rubio A., Corgnati L., Mantovani C., Reyes E., Chifflet M., Mader J., Carval T., 2020. Global Ocean-Delayed Mode in-situ Observations of surface (drifters and HFR) and sub-surface (vessel-mounted ADCPs) water velocity. Quality Information Document (QUID). Copernicus Marine In Situ TAC, doi: 10.13155/41256
- [43] Verbrugge N., Etienne H., Mader J., Corgnati L., Mantovani C., Reyes E., Rubio A., 2019. Copernicus Marine In Situ TAC quality information document for near real-time waves (QUID NRT WAVES). Copernicus Marine In Situ TAC, doi: 10.13155/74324
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- [45] Lucchi R., Kovacevic V., Aliani S., Caburlotto A., Celussi M., Corgnati L., Cosoli S., Deponte D., Ersdal E.A., Fredriksson S., Goszczko I., Husum K., Ingrosso G., Laberg J.S., Łacka M.,

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Released software

- [46] EU_HFR_NODE__WebForm: DOI 10.5281/zenodo.3460422
- [47] HFR_Node__Centralized_Processing: DOI 10.5281/zenodo.2639558
- [48] HFR_Node__Historical_Data_Processing: DOI 10.5281/zenodo.3569518
- [49] HFR_Node__REP_Temporal_Aggregation: DOI 10.5281/zenodo.3707649
- [50] HFR_Node__SDC_Processing: DOI 10.5281/zenodo.3855468
- [51] HFR_Node_tools: DOI 10.5281/zenodo.2639555

PERSONAL INFORMATION

Giovanni Besio

 DICCA, Department of Civil, Chemical and Environmental Engineering, University of Genoa



 www.dicca.unige.it/besio www.dicca.unige.it/meteocean

 Skype

 LinkedIn - <https://www.linkedin.com/in/giovanni-besio-57a001a/>

WORK EXPERIENCE

From February 2015 to Today

Associate Professor in Coastal and Harbour Engineering

Polytechnic School, University of Genoa, Italy, www.politecnica.unige.it

- Full Professor of "Maritime Engineering", "Coastal Structures" and "Harbour Engineering" for the Civil and Environmental Engineering degree (BSc and MSc careers)

Business or sector Research and education

From November 2005 to
February 2015

Assistant Professor in Coastal Engineering

Polytechnic School, University of Genoa, Italy, www.politecnica.unige.it

- Full Professor of "Maritime Engineering", "Coastal Structures" and "Environmental Fluid Mechanics" for the Civil and Environmental Engineering degree (BSc and MSc careers)

Business or sector Research and education

From October 2004 to
November 2005

Post Doc – Research Fellow

Centro Andaluz de Medio Ambiente (CEAM), Granada, Spain, <http://www.iista.es/>

- Junior Scientist in Coastal Engineering and Coastal Morphodynamics

Business or sector Research

From January 2004 to
September 2004

Research Fellow

DIAM (now DICCA), University of Genoa, Italy

- Researcher in Environmental Fluid Mechanics

Business or sector Research

From January 2001 to
December 2003

PhD Grant

DIAM (now DICCA), University of Genoa, Italy

- PhD in Environmental Fluid Mechanics

Business or sector Research

From December 1999 to May
2000

Junior Engineer

STI, Studio Tecnico di Ingegneria, Genova, Italy

- Junior Engineer for Civil and Hydraulic works

Business or sector Civil Engineering Consultancy

EDUCATION AND TRAINING

From January 2001 to
December 2003

PhD in Environmental Fluid Mechanics

DIAM (now DICCA), University of Genoa, Italy

- Fluid Mechanics, Morphodynamics, Turbulence

Level 8

From September 1994 to
November 1999

MSc in Civil Engineering with Hydraulics

Level 7

University of Genoa, Italy

- Civil Engineering, Fluvial and Coastal Hydraulics

PERSONAL SKILLS

Mother tongue(s) Italian

Other language(s)

| | UNDERSTANDING | | SPEAKING | | WRITING |
|---------|---------------|---------|--------------------|-------------------|---------|
| | Listening | Reading | Spoken interaction | Spoken production | |
| English | C1 | C1 | C1 | C1 | C1 |
| Spanish | C1 | C1 | C1 | C1 | C1 |
| French | B2 | B1 | A1 | A2 | A1 |

Communication skills Good communication skills developed either teaching different courses and giving talks at international conferences

Organisational / managerial skills Leadership and tutoring (PhD and Master students)

Job-related skills Innovation and development for basic research and applied research (knowledge transfer to industry)

Digital skills

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

Levels: Basic user - Independent user - Proficient user
[Digital competences - Self-assessment grid](#)

Skills in programming languages (Fortran, Matlab, Python, shell scripting), GIS tools (QGIS, Grass, ArcGIS)

Other skills Manual abilities for laboratory works (steel and wood carpentry, PVC and similar materials handling)

Driving licence A and B

ADDITIONAL INFORMATION

Referee Activity

Review Editor for Coastal and Offshore Engineering section of Frontiers in Built Environment
 Review Editor for Coastal Ocean Processes section of Frontiers in Marine Science
 Guest Associate Editor for Physical Oceanography section of Frontiers
 Editorial Board Member for Journal of Marine Science and Engineering, MDPI

Advances in Water Resources
 ANVUR – VQR 2010-2014
 Applied Energy
 Atmosphere
 Coastal Engineering
 Continental Shelf Research
 Earth-Science Review
 Earth Surface Processes and Landforms
 Ecological Indicators
 Energies
 Energy
 Engineering Applications of Artificial Intelligence
 Environment International
 Environment, Development and Sustainability
 Environmental Modelling and Software
 Engineering and Physical Sciences Research Council (EPSRC - UK)
 Estuarine, Coastal and Shelf Science
 European Journal of Mechanics B/Fluid
 Frontiers in Marine Science
 Future in Research (Regione Puglia)
 Geophysical Research Letters
 IAHR - International Association of Hydro-Environment Engineering and Research
 International Journal of Marine Energy
 Journal of Cleaner Production
 Journal of Fluid Mechanics
 Journal of Geophysical Research
 Journal of Marine Science and Engineering
 Journal of Waterway, Port, Coastal and Ocean Engineering
 Meccanica
 MIUR – PRIN Projects
 MSCA Bienvenue
 National Science Foundation (NSF)
 Natural Hazard and Earth System Science
 Natural Resource Research
 Ocean Dynamics
 Ocean Engineering
 Ocean Modelling
 Physics of Fluids
 Progress in Oceanography
 Regional Environmental Change
 Science of the Total Environment
 Water Resources Research
 Water



Affiliations

American Geophysical Union (AGU)
 European Mechanic Society (EUROMECH)
 Permanent International Association of Navigation Congresses (PIANC)
 Associazione Ingegneria Offshore e Marina (AIOM)

Institutional Activities

- Member of the AquaClew Project (ERA-NET ERA4CS) External Expert Committee - 2020
- Member of the Committee for the draft of ROM1.1 guideline (Ministry of Development, Spain, 2018)
- Expert member for fluvial and coastal hydraulics in the Regional Technical Committee for the Environmental Management (Regione Liguria, 2014-2017)
- Committee Member for Public Works Tendering processes for Spezia and Genoa Harbour (Quay Walls Design, Marinas Design, Geomatic Surveys, Road Design Services)
- Technical Consultant for the Genoa Court (Harbour Planning and Safety, Coastal Structures Damages, 2016-2019)
- Technical Consultant for TAR Liguria (Coastal Zone Management, 2015)
- Technical Consultant for the Public Waters Court of Rome (River Engineering and Managing, 2007)
- Reference Person for Research Joint Program UniGe-Regione Liguria, 2016-ongoing
- Member of the PIANC-Universities working group, 2017-today
- Coordinator of the PhD Curriculum in Engineering for Marine and Coastal Environments belonging to the PhD in Sea Science and Technology, University of Genoa, 2019-ongoing
- Member of the Committee for the PhD in Civil, Chemical and Environmental Engng, University of Genoa, 2005-2018
- Referee for the PhD Degrees:
- Civil Engineering, University of Nottingham, United Kingdom
 - Geophysics, University of Auckland, New Zealand
 - Department of Infrastructure Engineering, University of Melbourne, Australia
 - Ingegneria de los Fluidos Aplicada, Universidad de la Republica, Montevideo, Uruguay
 - Territorio, Infraestructuras y Medio Ambiente, Universidad de Castilla la Mancha, Spain
 - Civil Engineering, Universidad de Granada, Spain
 - Earth Science, University of Pisa, Italy
 - Environmental and Building Risk and Development, Environmental and Natural Resources, Polytechnic of Bari, Italy
 - Civil and Environmental Engineering, University of Florence, Italy
 - Fenomeni e rischi ambientali, University Parthenope, Naples, Italy

Teaching
Master and PhD Courses

| | |
|----------------|---|
| 2010/12/13/14 | Classes on “Mixing Processes in Fluids” for the PhD program in Civil, Chemical and Environmental Engineering and in Marine Science and Technologies, University of Genoa, Genoa, Italy |
| 2019 | Classes on “Wave Modelling” for the IV International Summer School on Dynamics of Estuarine and Nearshore Systems, Granada, Spain |
| 2018 | Classes on “Wave Energy Converter Design” for the International Workshop in “Offshore Renewable and Aquaculture” ESITC Caen, France |
| 2014, 2015 | Classes on “Forecast models for ocean waves” for the “FORTEMARE – System Engineering for Maritime Technologies”, DLTM, MIUR & Regione Liguria, and DITEN, University of Genoa, Italy |
| 2010/12/13/14 | Classes on “Perturbation Methods” for the Doctorate in Fluid Mechanics and Environmental Processes, University of Genoa, Genoa, Italy |
| June 2012 | Classes on “Submarine Dunes” at the Summer School “Morphological instabilities in natural systems”, Institut de Physique de Rennes, Universite de Rennes 1, Rennes, France |
| November 2011 | Classes on “Hidrodinamica zona de rompientes” for the Curso Avanzado de Ingenieria de Costas y Puertos, Colegio de Ingegneros de Andalucia, Sevilla, Spain |
| 2009, 2017 | Classes on “Harbour Engineering” for the Master in Marine Geomatics, II Ed., University of Genoa and Istituto Idrografico della Marina |
| June 2009 | Classes for the course “Fluid Mechanics” for the Doctorate in Fluid Mechanics and Environmental Processes, University of Genoa, Genoa, Italy |
| 2007/2008/2010 | Classes on “Wave averaged models” for the course “Sea Waves” for the Doctorate in Water, Material and Earth Engineering for Environment, Polytechnic University of Marche, Ancona, Italy |
| June 2007 | Supervisor for the Summer School “Hydro and Morphodynamics of Coastal Seas”, Motril, Spain. Organized by Utrecht University, Universidad de Granada and Università di Genova. |
| Apr – May 2005 | Classes on “Coastal Circulation” and “Analysis of Coastal Processes” within the master program “Sistemazione Idrogeologica e Riqualficazione Ambientale” organized by Regione Liguria. |
| May 2004 | Practical lessons for the course “Elementi di base dell'idraulica applicata allo studio dei corsi d'acqua” carried out for the La Spezia Province by the Department of Environmental Engineering, University of Genoa, Genoa, Italy |

| | | |
|----------------------------|---------------------|--|
| Teaching Degree Courses | A.A. 2018/19-20/21 | Professor for “Renewable Energy Production”, Environmental Engineering – University of Genoa |
| | A.A. 2016/17-20/21 | Full professor for “Harbour Engineering”, Civil Engineering – University of Genoa |
| | A.A. 2012/13-20/21 | Full professor for “Coastal Engineering”, Civil Engineering – University of Genoa |
| | A.A. 2012/13-17/18 | Full professor for “Maritime Engineering”, Civil Engineering – University of Genoa |
| | A.A. 2010/11-11/12 | Full professor for “Environmental Hydraulics”, Civil Engineering – University of Genoa |
| | A.A. 2011/12 | Assistant professor for “Coastal Engineering”, Civil Engineering – University of Genoa |
| | A.A. 2010/11 | Assistant professor for “Coastal Engineering”, Civil Engineering – University of Genoa |
| | A.A. 2009/10 | Assistant professor for “Maritime Hydraulics”, Civil Engineering – University of Genoa |
| | A.A. 2009/10 | Assistant professor for “Hydraulics I”, Civil Engineering – University of Genoa |
| | A.A. 2008/09 | Assistant professor for “Port Engineering” and “Coastal Engineering”, Civil Engineering – University of Genoa |
| | A.A. 2007/08, 06/07 | Full professor for “Fluid Mechanics I”, Mechanical Engineering – University of Genoa - Polo di La Spezia |
| | A.A. 01/02 – 08/09 | Assistant professor for “Hydrodynamics I” for the Naval Architecture and Marine Engineering Degree - University of Genoa |
| Teaching PhD Students | 2011-2015 | Sonia Angiolani (actual position: high school teacher) |
| | 2012-2016 | Lorenzo Mentaschi (actual position: rtd-A GEO12 University of Bologna) |
| | 2013 – 2017 | Francesco Enrile (actual position: engineer at Acquadotti Loano) |
| | 2016 – 2020 | Francesco De Leo (actual position: postdoc at CalPoly) |
| | 2018 – ongoing | Giulia Cremonini |
| | 2019 – ongoing | Stefania Magri |
| | 2019 – ongoing | Stefano Pastorino |
| Teaching Post Doc Students | 2013-2015 | Ludovica Sartini (actual position: Metocean division at RINA) |
| | 2013-2015 | Saeed Hariri (actual position: researcher at FREMER - DYNECO) |
| | 2018-2020 | Francesco Enrile (actual position: engineer at Acquadotti Loano) |
| | 2018 – ongoing | Francesco Ferrari |
| | 2020 – ongoing | Andrea Lira Loarca |
| | 2020 – ongoing | Mohamad Daliri |
| | 2020 – ongoing | Alejandro Caceres |

Invited Seminars

- “Wave Modeling in the Mediterranean Sea: hindcast, forecast and climate projection for engineering applications” REMTECHExpo, Ferrara, Italy, September 2019
- “Wave modeling and its applications” Universidad de La Republica, Montevideo, Uruguay, July 2018
- “Modellistica meteo-marina: lo stato dell’arte per il bacino del Mediterraneo” Workshop La simulazione ambientale in ambito marino, ATENA, May 2017
- “Stima del potenziale energetico del moto ondoso all’interno del bacino del Mediterraneo” Workshop Energia dal Mare, Onde e Correnti, ATENA, September 2016
- “Modellistica di reanalisi per la stima degli eventi estremi” Studi di Aggiornamento sull’Ingegneria Off-Shore e Marina AIOM, Salerno, October 2016
- “Stima del potenziale energetico del moto ondoso all’interno del bacino del Mediterraneo” ATENA Meeting, La Spezia, September 2016
- “Numerical Modelling for Environmental needs @ UniGe” ARC Meeting, Toulon, France, April 2016
- “La modellistica previsionale del moto ondoso ai fini dell’ingegneria offshore e costiera” Studi di Aggiornamento sull’Ingegneria Off-Shore e Marina AIOM, Palermo, November 2014
- “Sea-weather modeling and engineering applications” CoastEsonda, Ferrara, September 2014
- “Operational high resolution meteo marine modelling over the Mediterranean area: tailoring WWIII model for the Mediterranean basin and development of prompt coastal risk index” DeSRAAP Workshop, NATO-CMRE, La Spezia, July 2014
- “Strutture Lagrangiane Coerenti e barriere al trasporto: applicazione al Golfo di Trieste” Studi di Aggiornamento sull’Ingegneria Off-Shore e Marina AIOM, Bologna, November 2013
- “Lagrangian mixing and LCS as barrier to transport in compound channels” CNR-ISMAR, U.O. Pozzuolo di Lerici (SP), Italy, January 2013
- “Wetlands, fragile ecosystems at risk. The case of Venice lagoon” GCCRP, Griffith University, Queensland, Australia, November 2012
- “Wetlands, fragile ecosystems at risk. The case of Venice lagoon” GCCRP, Southern Cross University, Lismore New South Wales, Australia, November 2012
- “Lagrangian Coherent Structures as barrier to transport” IH Cantabria, Universidad de Cantabria, Santander, Spain, November 2011
- “Modelli per l’analisi della qualità delle acque costiere e dei bacini” Studi di Aggiornamento sull’Ingegneria Off-Shore e Marina AIOM, Lecce, Italy, July 2011
- “Tidal generated Sand Waves” GIOC, Universidad de Cantabria, Santander, Spain, June 2005

Education

- 2004: PhD grant at the University of Genoa in the field “Fluodynamics and Environmental Engineering Processes”. PhD Thesis title: “Modelling of tidally generated large scale bedforms”
- 1999: 18/11/1999 *Laurea* - Master degree in Civil Engineering in Hydraulics at the University of Genoa. Thesis: “River bifurcation stability: theoretical analysis and experimental observations”. Score: 110 cum laude/110
- 1994: Classical high school degree at the C. Columbus Liceum, Genoa

Post Graduate Courses

- November 2014: “Time-frequency analysis: a glance beyond Fourier region” Prof. L. Carassale - DICCA, Università di Genova.
- November 2009: “Non-linear dynamical systems” Prof. M. Storace - DIBE, University of Genova.
- February 2009: “Advanced numerical methods for hyperbolic equations and applications” Prof. E. Toro. Organizzato dall’Università di Trento.
- October 2007: “Communication Skills Training Workshop” - Education Training Ltd (University of Edinburgh). Marie Curie EST Centre – DICAT Univ. of Genoa.
- July 2003: “Hydro and Morphodynamics of coastal seas” – Renesse, Netherlands. Organized by Utrecht University and Universitat Politècnica de Catalunya.
- Apr - Jun 2003: “Problematiche della cooperazione internazionale e le progettualità applicabili” organized by Ingegneria Senza Frontiere - Genova.
- October 2002: “Water Waves for Engineers” by Prof. M. Brocchini (University of Genoa) and Dr. M. Landrini (INSEAN).
- May 2002: “Le tecnologie appropriate per la cooperazione e lo sviluppo sostenibile: il ruolo dell’università” organized by CETAMB (Brescia).
- January 2000: “La progettazione strutturale con gli Eurocodici”.

- Projects**
- 2020 Development of a wave hazard index [for ARPAL Liguria]
 - 2020 Containers' drift in the Southern Pacific Ocean [for Longitude]
 - 2019 Extreme Values Analysis for waves in the deep ocean [for MMP]
 - 2019 Study of coastal circulation and coastal flooding for the Baia del Silenzio [for Comune di Sestri Levante]
 - 2017 Wave tank experiments for Absorbing Caissons [for RINA]
 - 2017 Morphodynamics of beach nourishment in Romania [Dinamica s.r.l.]
 - 2016 Wave climate and extreme events for La Spezia Gulf [Autorità Portuale di La Spezia]
 - 2015-2020 Wave climate hindcast and analysis in the Med Sea [for different Consultancies]
 - Wave climate analysis in the Gulf Area [NMDC Abu-Dhabi]
 - Wave climate analysis in the Seuz Channel [Longitude]
 - March 2014 Fast ferry generated waves propagation to the coast [for Corsica Ferries]
 - July 2013 Offshore Mar Ligure wave climate. [for Studio Legale Farina]
 - June 2012 Physical modelling of Vernazzola (Ge) beach nourishment. [for Comune di Genova]
 - March 2012 Negative buoyant jet modelling for FPSO. [for DEAM]
 - February 2012 Implementation and validation of a wave forecast-hindcast model for the Western Mediterranean basin. [for ARPAL]
 - April - July 2011 Physical modelling of possible asbenthos releases due to slurry dumping in the port of Genoa (Ge). [for S.P.E.A.]
 - June 2010 Wave climate and coastal circulation analysis in Bagnoli-Coroglio area (Na). [for Typsa]
 - January 2008 - November 2010 Tanaro river physical modelling (fixed and mobile bed) along Alessandria city reach. [for A.I.Po]
 - March - December 2008 Flood propagation along Bormida and Orba rivers [for A.I.Po]
 - December 2007 Analysis of littoral sediment transport along the coast in the proximity of Lerone outlet (Genoa). [for S.T.I.]
 - July 2007 Hydraulic study of the last reach of Torrente Chiaravagna (Genoa). [for S.T.I.]
 - March 2007 Final design of rubble mound breakwater of Savona Harbour. [for S.T.I.]
 - February 2007 Wave climate for Ospedaletti (SV). [for Ing. Repetto]
 - Jan – Sept 2006 Study of flood propagation in the Tanaro river focussed on the city of Alessandria. [for A.I.Po]
 - Oct 2004 – Oct 2005 Study of erosion patterns at the offshore wind farm “Mar de Trafalgar”. Evaluation of the “Mar de Trafalgar” offshore wind farm influence on longshore sediment transport. [for CEAMA - I.N.R. Eolica]
 - January 2004 Analysis of littoral sediment transport along the coast in the proximity of Arenzano harbour (Genoa). [for S.T.I.]
 - November 2003 Analysis of sediment transport of the Leiro river outlet (Genoa). [for S.T.I.]
 - April 2003 Design of levees for the river Magra in the community of Ameglia (Spezia). [for S.T.I.]
 - February 2003 Preliminary design of rubble mound breakwater for the enlargement of Savona's commercial harbour. [for S.T.I.]
 - Dec 1999 - Jun 2000 Site preparation planning for power plants in Brasil (ABB Baden); drawing up of relative bills of quantities following CESSM3 rules; foundation design and steel structure check of the Manjung power plant, Malaysia, with Alstom, Velizy (Paris). Design of reinforced concrete retaining structures in Pieve Ligure (Genoa). Quality control for certification ISO 9001. [for S.T.I.]
- Awards**
- July 2018: Visiting Grant, IMFIA, Universidad de La Republica, Montevideo, Uruguay
 - December 2014 Trasporti & Cultura Award (Sec. A) for the book “Ingegneria e Paesaggio. Un progetto per le valli e per le coste”
 - October 2012: GCCRP visiting fellow, Griffith University, Australia
 - September 2011: Best Presentation Award, RCEM Conference, Beijing, China
 - June 2004: CARIGE grant for research activities

Research Funding

| Title | Financed by | Period | Role |
|---|-------------------------------------|------------|--------------|
| ISYPORT - Sistema integrato per la mitigazione dei rischi della navigazione in aree portuali | PON | 2020-20200 | P.I. |
| BE-READY - Rapid Environmental Assessment Decision sYstem | DG-ECHO | 2020-2021 | P.I. |
| SINAPSI - asSIstenza alla Navigazione per l'Accesso ai Porti in SIcurezza | Interreg - Marittimo European Union | 2019-2021 | Collaborator |
| SINBAD – Sicurezza della navigazione da diporto | POR-FESR Liguria 2014-2020 | 2018-2020 | P.I. |
| SICOMAR+ - SIstema transfrontaliero per la sicurezza in mare COntro i rischi della navigazione e per la salvaguardia dell'ambiente MARino | Interreg - Marittimo European Union | 2018-2020 | P.I. |
| GEREMIA - Gestione dei reflui per il miglioramento delle acque portuali | Interreg - Marittimo European Union | 2018-2020 | P.I. |
| SPLASH! – Stop alle plastiche in H2O! | Interreg - Marittimo European Union | 2018-2020 | P.I. |
| RISQ'EAU – Increasing flood resilience of Alcotra territories | Interreg – Alcotra European Union | 2017-2019 | Collaborator |
| MAREGOT - MAnagement des Risques de l'Erosion cotière et actions de GOuvernance Transfrontalière | Interreg - Marittimo European Union | 2017-2019 | Collaborator |
| ICODEP - Impact of Changing fOreshore on flood DEfence Performance | Hydralab+ European Union | 2016 | Collaborator |
| Subgrid obstacle modeling in wave propagation | University of Genoa | 2014 | P.I. |
| Monitoring boat anchoring pressure on Posidonia oceanica meadows through satellite SAR imagery | ESA | 2013 | Collaborator |
| PO CRO FSE 2007/13 | Regione Liguria | 2013-2014 | P.I. |
| AMSEDIS - Amplified Growth of Sediment Waves in the Irish Sea | EuroFleet European Union | 2011 | Collaborator |
| Studio dei processi Lagrangiani di mescolamento dovuti a strutture vorticosi di grande scala su acqua bassa | University of Genoa | 2010 | Coordinator |
| Effetto della presenza di Parchi Eolici offshore sulla morfodinamica costiera | MIUR, IT-ES Actions | 2009 | Collaborator |
| Strumenti per la valutazione della vulnerabilità delle aree costiere in relazione ai previsti cambiamenti climatici | MIUR | 2008 | Collaborator |
| Modellazione numerica di processi morfodinamici | MIUR | 2007 | Collaborator |
| Dinamica di forme di fondo di grande dimensioni e ampiezza finita | University of Genoa | 2006 | Collaborator |
| Cave sottomarine e ripascimenti: modellazione morfologica e applicazioni | MIUR | 2005 | Collaborator |
| MODITE - Modelli di trasporto per difesa del territorio | Fondazione CariVerona | 2005 | Collaborator |
| SANDPIT - Sand Transport and Morphology of Offshore Sand Mining Pits/Areas | European Union | 2002-2005 | Collaborator |
| HUMOR - Human interaction with large scale coastal morphological evolution | European Union | 2001-2004 | Collaborator |
| Modellazione matematica e fisica di processi di sedimentazione nella laguna di Venezia | Corila | 2004 | Collaborator |

ANNEXES

International Peer Reviewed
Articles

58. Carpi, L., Mucerino, L., Bonello, G., Besio, G. & Ferrari, M. 2021 Rip currents investigation on a Ligurian pocket beach, NW Mediterranean. *Estuarine, Coastal and Shelf Science*, In Press
57. Lira-Loarca, A., Ferrari, F., Mazzino, A. & Besio, G. 2021 Future wind and wave energy resources and exploitability in the Mediterranean Sea by 2100. *Applied Energy*, 302, 117492, <https://doi.org/10.1016/j.apenergy.2021.117492>
56. Cecchi, G., Cutroneo, L., Di Piazza, S., Besio, G., Capello, M. & Zotti, M. 2021 Port Sediments: Problem or Resource? A Review Concerning the Treatment and Decontamination of Port Sediments by Fungi and Bacteria. *Microorganisms*, 9, 1279. <https://doi.org/10.3390/microorganisms9061279>
55. Cremonini, G., De Leo, F., Stocchino, A. & Besio, G. 2021 On the selection of time-varying scenarios of wind and ocean waves: Methodologies and applications in the North Tyrrhenian Sea. *Ocean Modelling*, 163, 101819, <https://doi.org/10.1016/j.ocemod.2021.101819>.
54. De Leo, F., Besio, G., Briganti, R. & Vanem, E. 2021 Non-stationary extreme value analysis of sea states based on linear trends. Analysis of annual maxima series of significant wave height and peak period in the Mediterranean Sea. *Coastal Engineering*, 167, 103896, <https://doi.org/10.1016/j.coastaleng.2021.103896>.
53. Tesán Onrubia, J.A., Djaoudi, K., Borgogno, F., Canuto, S., Angeletti, B., Besio, G., Capello, M., Cutroneo, L., Stocchino, A., Mounier, S. & Lenoble, V. 2021 Quantification of Microplastics in North-Western Mediterranean Harbors: Seasonality and Biofilm-related Metallic Contaminants. *Journal of Marine Science and Engineering*, 9(3), 337, <https://doi.org/10.3390/jmse9030337>
52. Cutroneo, L., Ferretti, G., Barani, S., Scafidi, D., De Leo, F., Besio, G. & Capello, M. 2021 Near real-time monitoring of significant sea wave height through microseism recordings: Analysis of an exceptional sea-storm event. *Journal of Marine Science and Engineering*, 9(3), 319, <https://doi.org/10.3390/jmse9030319>
51. Canale, C., Barbaro, G., Foti, G., Petrucci, O., Besio, G. & Barillà, G.C. 2021 Bruzzano river mouth damage due to meteorological events. *International Journal of River Basin Management*, <https://doi.org/10.1080/15715124.2021.1901725>
50. Carchen, A., Gaggero, T., Besio, G., Mazzino, A. & Villa, D. 2021 A method for the probabilistic assessment of the on-board comfort on a passenger vessel route. *Ocean Engineering*, 225, <https://doi.org/10.1016/j.oceaneng.2021.108702>
49. Loarca, A.L., Cobos, M., Besio, G. & Baquerizo, A. 2021 Projected wave climate temporal variability due to climate change. *Stoch Environ Res Risk Assess.* <https://doi.org/10.1007/s00477-020-01946-2>
48. Rizza, U., Canepa, E., Miglietta, M.M., Passerini, G., Morichetti, M., Mancinelli, E., Virgili, S., Besio, G., De Leo, F. & Mazzino, A. 2021 Evaluation of drag coefficients under medicane conditions: Coupling waves, sea spray and surface friction. *Atmos. Res.* 247, <https://doi.org/10.1016/j.atmosres.2020.105207>
47. De Leo, F., Besio, G. & Mentaschi, L. 2020 Trends and variability of ocean waves under RCP8.5 emission scenario in the Mediterranean Sea. *Ocean Dynamics*, <https://doi.org/10.1007/s10236-020-01419-8>
46. Mentaschi, L., Vousdoukas, M., Montblanc, T.F., Kakoulaki, G., Voukouvalas, E., Besio, G. & Salamon, P. 2020 Assessment of global wave models on regular and unstructured grids using the Unresolved Obstacles Source Term. *Ocean Dynamics* 70, 1475–1483, <https://doi.org/10.1007/s10236-020-01410-3>

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45. Oprandi, A., Mucerino, L., De Leo, F., Bianchi, C.N., Morri, C., Azzola, A., Benelli, F., Besio, G., Ferrari, M., Montefalcone, M. 2020 Effects of a severe storm on seagrass meadows. *Science of the Total Environment*, 748, <https://doi.org/10.1016/j.scitotenv.2020.141373>
44. Enrile, F., Besio, G., Stocchino, A. 2020 Eulerian spectrum of finite-time Lyapunov exponents in compound channels. *Meccanica*, 55(9), 1821-1828, <https://doi.org/10.1007/s11012-020-01217-y>
43. Lavidas, G., De Leo, F., Besio, G. 2020 Blue growth development in the mediterranean sea: Quantifying the benefits of an integrated wave energy converter at genoa harbour. *Energies*,13(6), 4201, <https://doi.org/10.3390/en13164201>
42. Saviano, S., De Leo, F., Besio, G., Zambianchi, E. & Uttieri, M. 2020 HF radar measurements of surface waves in the Gulf of Naples (Southeastern Tyrrhenian Sea): comparison with hindcast results at different scales. *Frontiers in Marine Science*, [https://doi: 10.3389/fmars.2020.00492](https://doi.org/10.3389/fmars.2020.00492)
41. Mazzaretto, O., Lucero, F., Besio, G., & Cienfuegos, R. 2020 Perspectives for harnessing the energetic persistent high swells reaching the coast of Chile, *Renewable Energy*, 159, 494-505, <https://doi.org/10.1016/j.renene.2020.05.031>.
40. De Leo, F., Solari, S. & Besio, G. 2020 Extreme wave analysis based on atmospheric pattern classification: an application along the Italian coast, *Nat. Hazards Earth Syst. Sci.*, 20, 1233-1246, <https://doi.org/10.5194/nhess-20-1233-2020>
39. De Leo, F., De Leo, A., Besio, G. & Briganti, R. 2020 Detection and quantification of trends in time series of significant wave heights: An application in the Mediterranean Sea. *Ocean Engineering*, 202, 107155, doi.org/10.1016/j.oceaneng.2020.107155.
38. Cutroneo, L., Reboa, A., Besio, G. et al. 2020 Microplastics in seawater: sampling strategies, laboratory methodologies, and identification techniques applied to port environment, *Environmental Science and Pollution Research*. doi.org/10.1007/s11356-020-07783-8
37. Ferrari, F., Besio, G., Cassola, F. & Mazzino, A. 2020 Optimized wind and wave energy resource assessment and offshore exploitability in the Mediterranean Sea. *Energy*, 190, 116447, doi.org/10.1016/j.energy.2019.116447
36. Stocchino, A., De Leo, F. & Besio, G. 2019 Sea waves transport of inertial micro-plastics: mathematical model and applications. *Journal of Marine Science and Engineering*, 7(1), 467
35. Putzu, S., Enrile, F., Besio, G., Cucco, A., Cutroneo, L., Capello, M. & Stocchino, A. 2019 A reasoned comparison between two hydrodynamic models: Delft3d-Flow and ROMS (Regional Oceanic Modelling System). *Journal of Marine Science and Engineering*, 7(1), 464
34. Enrile F., Besio G., Stocchino A., Magaldi M.G. 2019 Influence of initial conditions on absolute and relative dispersion in semi-enclosed basins. *PLOS ONE* 14(7): e0217073, [doi:10.1371/journal.pone.0217073](https://doi.org/10.1371/journal.pone.0217073)
33. Lo Re, C., Manno, G. Ciraolo, G. & Besio, G. 2019 Wave Energy Assessment around the Aegadian Islands (Sicily). *Energies*, 12, 333, [doi:10.3390/en12030333](https://doi.org/10.3390/en12030333)
32. De Leo, F., Besio, G., Zolezzi, G. & Bezzi, M. 2019 Coastal Vulnerability assessment: through regional to local downscaling of wave characteristics along the Bay of Lalzit (Albania). *Natural Hazards and Earth System Science*, 19, pp. 287-298, doi.org/10.5194/nhess-19-287-2019
31. Mentaschi, L., Vousedoukas, M., Besio, G. & Feyen, L. 2019 alphaBetaLab: Automatic estimation of subscale transparencies for the Unresolved Obstacles Source Term in ocean wave modelling. *SoftwareX*, 9, pp. 1-6, [doi.10.1016/j.softx.2018.11.006](https://doi.org/10.1016/j.softx.2018.11.006)

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Articles

30. Mucerino, L., Albarella, M., Carpi, L., Besio, G., Benedetti, A., Corradi, N. Firpo, M. & Ferrari, M. 2019 Coastal Exposure on Bonassola bay. *Ocean and Coastal Management*, 167, pp. 20-31, doi:10.1016/j.ocecoaman.2018.09.015
29. Ferretti, G., Barani, S., Scafidi, D., Capello, M., Cutroneo, L., Vagge, G., Besio, G. 2018. Near real-time monitoring of significant sea wave height through microseism recordings: an application in the Liguria Sea (Italy). *Ocean and Coastal Management*, 165, pp. 185-194, doi:10.1016/j.ocecoaman.2018.08.023
28. Enrile, F., Besio, G., Stocchino, A., Magaldi, M.G., Mantovani, C., Cosoli, S., Gerin, R. & Poulain, P.M. 2018. Evaluation of surface Lagrangian transport barriers in the Gulf of Trieste. *Continental Shelf Research*, 167, pp. 125-138, doi:10.1016/j.csr.2018.04.016
27. Mentaschi, L., Kakoulaki, G., Vousdoukas, M., Voukouvalas, E., Feyen, L. & Besio G. 2018. Parametrizing unresolved obstacles with source terms in wave modeling: a real-world application. *Ocean Modelling*, 126, pp. 77-84, doi:10.1016/j.ocemod.2018.04.003
26. Bozzi, S., Besio, G. & Passoni, G. 2018. Wave power technologies for the Mediterranean offshore: Scaling and performance analysis. *Coastal Engineering*, 136, pp. 130-146, doi:10.1016/j.coastaleng.2018.03.001
25. Enrile, F., Besio, G. & Stocchino, A. 2018. Shear and Shearless Lagrangian Structures in compound channels. *Advances in Water Resources*, 113, pp. 141-154, doi:10.1016/j.advwatres.2018.01.006
24. Pepe, F., Corradino, M., Parrino, N., Besio, G., Lo Presti, V., Renda, P., Calcagnile, L., Quarta, G., Sulli, A., & Antonioli, F. 2018. Boulder coastal deposits at Favignana Island rocky coast (Sicily, Italy): Litho-structural and hydrodynamic control. *Geomorphology*, 303, pp. 191-209, doi:10.1016/j.geomorph.2017.11.017
23. Sartini, L., Besio, G. & Cassola, F. 2017. Spatio-temporal modelling of extreme wave heights in the Mediterranean Sea. *Ocean Modeling*, 117, pp. 52-69, doi:10.1016/j.ocemod.2017.07.001
22. Masina, M., Archetti, R., Besio, G. & Lamberti, A. 2017. Tsunami taxonomy and detection from recent Mediterranean tide gauge data. *Coastal Engineering*, 127, pp. 145-169, doi:10.1016/j.coastaleng.2017.06.007
21. Besio, G., Briganti, R., Romano, A., Mentaschi, L. & De Girolamo, P. 2017. Time clustering of wave storms in the Mediterranean Sea. *Natural Hazards and Earth System Science*, 17, pp. 505-514, doi:10.5194/nhess-17-505-2017
20. Mentaschi, L., Vousdoukas, M., Voukouvalas, E., Sartini, L., Feyen, L., Besio, G. & Alfieri, L. 2016. The transformed-stationary approach: a generic and simplified methodology for non-stationary extreme value analysis. *Hydrology and Earth System Sciences*, 20, pp. 3527-3547, doi:10.5194/hess-20-3527-2016
19. Besio G., Mentaschi L. & Mazzino A., 2016. Wave energy resource assessment in the Mediterranean Sea on the basis of a 35-year hindcast. *Energy*, 94, pp. 50-63, doi:10.1016/j.energy.2015.10.044
18. Sartini L., Cassola F. & Besio G., 2015. Extreme waves seasonality analysis: an application in the Mediterranean Sea. *Journal of Geophysical Research – Oceans*, 120, pp. 6266-6288, doi: 10.1002/2015JC011061
17. Mentaschi L., Perez J., Besio G., Mendez F. & Menendez M. 2015. Parameterization of unresolved obstacles in wave modeling: a source term approach. *Ocean Modelling*, 96, pp. 93-102, doi:10.1016/j.ocemod.2015.05.004
16. Mentaschi L., Besio G., Cassola F. & Mazzino A., 2015. Performance evaluation of WavewatchIII in the Mediterranean Sea. *Ocean Modelling*, 90, pp. 82-94, doi:10.1016/j.ocemod.2015.04.003

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15. Sartini L., Mentaschi L. & Besio G., 2015. Comparing different extreme wave analysis models for wave climate assessment along the Italian coast. *Coastal Engineering*, 100, pp. 37-47, doi:10.1016/j.coastaleng.2015.03.006
14. Mentaschi L., Besio G., Cassola F. & Mazzino A., 2013. Problems in RMSE-based wave model validations. *Ocean Modelling*, 72, pp. 53-58 doi:10.1016/j.ocemod.2013.08.003
13. Mentaschi L., Besio G., Cassola F. & Mazzino A., 2013. Developing and validating a forecast/hindcast system for the Mediterranean Sea. *Journal of Coastal Research*, Special Issue 65, pp. 1551-1556
12. Besio G., Stocchino A., Angiolani S. & Brocchini M., 2012. Transversal and longitudinal mixing in compound channels. *Water Resources Research*, 48, W12517, 15 pp. doi:10.1029/2012WR012316
11. Stocchino A., Besio G., Angiolani S. & Brocchini M., 2011. Lagrangian mixing in straight compound channels. *Journal of Fluid Mechanics*, 675, pp. 168-198, doi: 10.1017/S0022112011000127
10. Borsje B.W., Buijsman M.C., Besio G., de Vries M.B., Hulscher S.J.M.H., Herman P.M.J. & Ridderinkhof H., 2009. On the modelling of bio-physical influences on seasonal variation in sandwave dynamics. *Journal of Coastal Research*, Special Issue 56, pp 698-702
9. Borsje B.W., de Vries M.B., Bouma T.J., Besio G., Hulscher S.J.M.H. & Herman P.M.J., 2009. Modeling bio-geomorphological influences for offshore sandwaves. *Continental Shelf Research* 29, pp. 1289-1301, doi:10.1016/j.csr.2009.02.008
8. Besio G., Blondeaux P., Brocchini M., Hulscher S.J.M.H., Idier D., Knaapen M.A.F., Németh A.A., Roos P.C. & Vittori G., 2008. The morphodynamic of tidal sand waves: a model overview. *Coastal Engineering* 55/7-8, pp 657-670, doi:10.1016/j.coastaleng.2007.11.004
7. Besio G. & Losada M.A., 2008. Sediment transport patterns at Trafalgar Offshore Windfarm. *Ocean Engineering*, 35, pp. 653-665, doi:10.1016/j.oceaneng.2008.01.002
6. Cherlet J., Besio G., Blondeaux P., van Lancker V., Verfaillie E. & Vittori G., 2007. Modelling sand waves characteristics on the Belgian continental shelf and in the Calais-Dover Strait. *Journal of Geophysical Research* 112, C06002, doi:10.1029/2007JC004089.
5. Besio G., Blondeaux P., Vittori G., 2006. On the formation of sand waves and sand banks. *Journal of Fluid Mechanics* 557, pp. 1-27, doi:10.1017/S0022112006009256.
4. Besio G., Blondeaux P. & Vittori G., 2005. A three-dimensional model of sand bank formation. *Oceans Dynamics* 55 (5-6), pp. 515-525, doi:10.1007/S10236-005-0027-0.
3. Besio G., Blondeaux P., Brocchini M. & Vittori G., 2004. On the modeling of sand waves migration. *Journal of Geophysical Research* 109, C4, C04018, doi:10.1029/2002JC001622.
2. Besio G., Blondeaux P., Frisina P., 2003. A note on tidally generated sand waves. *Journal of Fluid Mechanics* 485, pp. 171-190, doi:10.1007/S0022112003004415.
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60. Canale, C., Barabaro, G., Petrucci, O., Besio, G., Foti, G., Barillà, G.C. & Puntorieri, P. 2020. Analysis of the concurrent conditions of floods and sea storms: a case study of Crotona, Italy. WIT Transactions on Engineering Sciences, 129, 147-156, doi.org/10.2495/RISK200131
59. Cremonini, G., Besio, G., Lagomarsino, D. & Seminara, A. 2020. A machine learning approach to achieve accurate time series forecast of sea-wave conditions. EGU2020, 4-8 May, online, doi.org/10.5194/egusphere-egu2020-22666
58. Lira-Loarca, A., Cobos, M., Millares, A., Besio, G. & Baquerizo, A. 2020. Integrated extreme sea level events in the Mediterranean coast of Spain. EGU2020, 4-8 May, online, doi.org/10.5194/egusphere-egu2020-7951
57. Carpi, L., Mucerino, L., Besio, G., Corradi, N. & Ferrari, M. 2019. MAREGOT project experience: Integrated approach to understanding coastal dynamics behaviour. Metrosea, 3-5 October, Genova, Italy
58. Ottaviani, E. et al. 2019. SINDBAD: a new operational service for a safer leisure and boating navigation. Metrosea, 3-5 October, Genova, Italy
57. De Leo, F., Besio, G., Saviano, S., Zambianchi, E. & Uttieri, M. 2019. Evaluation of HF-radar wave measures in the Gulf of Naples. Metrosea, 3-5 October, Genova, Italy
56. Lira-Loarca, A., Cobos, M., Besio, G. & Baquerizo, A. 2019. Coastal flooding due to extreme events in the Mediterranean coast of Spain. ICRC-CORDEX, 14-18 October, Beijing, China
- 55.. Reboa, A., L. Cutroneo, G. Besio, F. Borgogno, L. Canesi, S. Canuto, K. Djaoudi, F. Enrile, I. Forioso, G. Greco, V. Lenoble, A. Malatesta, S. Mounier, M. Petrillo, A. Stocchino, J. Tesan, M. Capello 2019. SPLASH! - Stop to plastic in H2O! An EU Project to investigate the state of the port environment. Heraklion2019, 26-29 June, Heraklion, Greece
54. De Leo, A., De Leo, F. Besio, G. & Briganti, R. 2019. Climatic trends analysis of sea waves in the Mediterranean basin. SCACR19, 9-11 September, Bari, Italy
53. De Leo, F., Solari, S. & Besio, G. 2019. Extreme waves evaluation due to clustering techniques: an application in Mazara del Vallo (Sicily). SCACR19, 9-11 September, Bari, Italy
52. Cremonini, G. & Besio, G. 2019. Wave spectral climatology in the Mediterranean Sea: a new methodology based on spectral partitions. SCACR19, 9-11 September, Bari, Italy
51. Stocchino, A., De Leo, F. & Besio, G. 2019. Wave-induced kinematic of microplastics in the sea: mathematical model and practical examples. SCACR19, 9-11 September, Bari, Italy

International Conferences

50. Lo Re, C., Manno, G., Besio, G. & Ciruolo, G. 2019. Efficiency of Wave Energy converters off the Sicilian Channel. EWTEC19, 1-6 September, Naples, Italy
49. Besio, G., Briganti, R., Romano, A., Mentaschi, L. & DE Girolamo, P. 2017. Occurrence of time clustering of wave storms in the Mediterranean Sea: a spatial analysis. International Short Course and Conference on Applied Coastal Research, 3-6 October, Santander, Spain
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INFORMAZIONI PERSONALI Dr. Marco Uttieri, PhD

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www.researchgate.net/profile/Marco_Uttieri

Ulteriori dati personali**ISTRUZIONE E FORMAZIONE**

Dottore di Ricerca (PhD) in “Dynamics of marine ecosystems” presso la Stazione Zoologica “Anton Dohrn” (Napoli, IT) nell’ambito della collaborazione con la Open University (Milton Keynes, GB), con tesi dal titolo:

“Swimming behaviour and prey perception in the calanoid copepod *Clausocalanus furcatus*”

Relatori: Dr. M. G. Mazzocchi, Dr. R. P. Harris

Titolo conseguito il 12/01/2006

Laurea quinquennale (votazione: 110/110 e lode) in Scienze Ambientali, conseguita presso l’Università degli Studi di Napoli “Parthenope” (Napoli, IT), con tesi dal titolo: “Analisi di traiettorie descritte da organismi zooplanctonici mediante tecniche lagrangiane”

Relatori: Prof. M. Ribera d’Alcalà, Prof. E. Zambianchi

Laurea conseguita il 30/10/2001

POSIZIONE ATTUALE

- Ricercatore TI presso il Dipartimento di Ecologia Marina Integrata, Stazione Zoologica Anton Dohrn (Napoli, IT).

- Ricercatore affiliato presso la ULR Parthenope (Napoli, IT), Consorzio Nazionale Interuniversitario per le Scienze del Mare (CoNISMa) (Roma, IT).

- Co-chair dell’ICES Expert Group WGEUROBUS (Towards a EUROpean OBServatory of the non-indigenous calanoid copepod *Pseudodiaptomus marinUS*) (Copenhagen, DK).

ATTIVITÀ DI RICERCA

I miei principali interessi di ricerca sono focalizzati su differenti aspetti della biologia, ecologia e comportamento di organismi zooplanctonici marini e dulciacquicoli, con particolare riferimento a copepodi e cladoceri. Per sviluppare queste linee di ricerca, durante la mia carriera scientifica ho utilizzato differenti metodiche di studio, realizzando un approccio multidisciplinare integrato attraverso:

- l'analisi del comportamento natatorio di organismi zooplanctonici mediante osservazioni in microcosmi, a piccola scala spaziale e temporale;
- sviluppo di tecniche numeriche di analisi di traiettorie descritte da organismi planctonici;
- l'implementazione di Individual Based Models per la simulazione di traiettorie di nuoto ideali e realistiche di organismi zooplanctonici;
- la valutazione del significato ecologico (dall'individuo alla comunità) degli adattamenti comportamentali.

In aggiunta, le mie attività di ricerca includono lo studio della circolazione superficiale e del moto ondoso ricostruito attraverso radar costieri ad alta frequenza (HF), modelli numerici, strumenti *in situ* e di remote sensing, valutando sia le dinamiche fisiche che il loro impatto sulle dinamiche ecologiche.

PROGETTI DI RICERCA

- 2018-presente: co-chair (insieme alla Dr. Arantza Iriarte, University of the Basque Country (UPV/EHU), Bilbao, ES) dell'ICES Expert Group WGEUROBUS ("Towards a EUropean OBservatory of the non-indigenous calanoid copepod *Pseudodiaptomus marinus*").
- 2018-presente: leader dei Terms of Reference b ("Identification of key ecological, biological and behavioural traits of *Pseudodiaptomus marinus*") e d ("Investigate the possible dormancy strategies of *Pseudodiaptomus marinus*") del WGEUROBUS.
- 2017-2018: chair del working group WKEUROBUS ("Towards a EUropean OBservatory of the invasive calanoid copepod *Pseudodiaptomus marinus*"), designato come ICES Training Workshop.
- 2012-2016: responsabile Unità Operative SP2_WP2_AZ1_UO06 ("Modellizzazione di habitat e connettività") e SP5_WP2_AZ3_UO05 ("Implementazione della rete dei radar costieri") nell'ambito del "Progetto Bandiera RITMARE – La Ricerca Italiana per il Mare", coordinato dal Consiglio Nazionale delle Ricerche e finanziato dal Ministero dell'Istruzione, dell'Università e della Ricerca nell'ambito del Programma Nazionale della Ricerca 2011-2013.
- 2012-2015: P. I. (Coordinatore e Responsabile Scientifico) del progetto "MOKA – Modellizzazione ed osservazione di organismi zooplanktonici" (RBFR10VF6M) finanziato dal Ministero dell'Istruzione, dell'Università e della Ricerca nell'ambito del bando FIRB - Programma "Futuro in Ricerca 2010" (FIRB/FIR).
- 2007-presente: contributo alla stesura ed alla realizzazione di progetti a livello nazionale ed internazionale ("TOSCA – Tracking Oil Spills and Coastal Awareness Network" TOSCA - N. 2G – MED09-425 MED Programme 2007-2013; "VECTOR – Vulnerabilità delle Coste e degli ecosistemi marini italiani ai cambiamenti climatici e loro ruolo nei cicli del carbonio oceanico"; "PROMETEO – Nuove tecnologie per il monitoraggio ambientale, il trasferimento tecnologico e per l'integrazione dei saperi a sostegno della ricerca giovane").

COLLABORAZIONI

Lista delle principali collaborazioni nazionali ed internazionali:

- Prof. J. Rudi Strickler, School of Freshwater Sciences, University of Wisconsin-Milwaukee, Milwaukee (WI, USA).
- Prof. Sami Souissi, Laboratoire d'Océanologie et de Géosciences, Université Lille 1, Station Marine, Wimereux (FR).
- Prof. Rubens Lopes, Instituto Oceanográfico, Universidade de São Paulo, São Paulo (BR).
- Prof. Enrico Zambianchi, Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli "Parthenope", Napoli (IT).
- Dr. Maria Grazia Mazzocchi, Dipartimento di Ecologia Marina Integrata, Stazione Zoologica Anton Dohrn, Napoli (IT).
- Dr. Maurizio Ribera d'Alcalà, Dipartimento di Ecologia Marina Integrata, Stazione Zoologica Anton Dohrn, Napoli (IT).
- Prof. Giacomo Zagami, Dipartimento di Biologia Animale e Ecologia Marina, Università di Messina, S. Agata (ME) (IT).
- Prof. Peter Hinow, Department of Mathematical Sciences, University of Wisconsin-Milwaukee, Milwaukee (WI, USA).
- Dr. R. Pastore, CNR-SPIN (SuPerconductors, oxides and other INnovative materials and devices), Napoli (IT).
- Prof. A. Bazzani, Dipartimento di Fisica e Astronomia, Alma Mater Studiorum – Università di Bologna, Bologna (IT)
- Dr. A. Amato, Laboratoire de Physiologie Cellulaire et Végétale, Université Grenoble Alpes, CEA, INRA, CNRS. IRIG, Grenoble (FR).
- Dr. Leonid Svetlichny, I. I. Schmalhausen Institute of Zoology, National Academy of Sciences of Ukraine, Kiev (UA).

VISITING SCIENTIST

- Gennaio 2017: visiting scientist presso School of Freshwater Sciences, University of Wisconsin-Milwaukee, Milwaukee (WI, USA).
- Luglio 2001: research stage presso il laboratorio del Prof. J. Rudi Strickler, Great Lakes Water Institute – University of Wisconsin-Milwaukee, Milwaukee (WI, USA).

FUND RAISING

- 2018: assegnatario di un finanziamento totale di € 3,700 per l'organizzazione del workshop EUROBUS, svoltosi a Napoli nei giorni 29 e 30 Gennaio 2018 presso la Stazione Zoologica Anton Dohrn. Il finanziamento è stato erogato dalla Stazione Zoologica Anton Dohrn (€ 2,000), dalla Società Italiana di Biologia Marina (SIBM) (€ 1,200) (in compartecipazione con la Dott.ssa E. Camatti), e dal Consorzio Nazionale Interuniversitario per le Scienze del Mare (CoNISMa) (€ 500).
- 2012-2016: assegnatario di un finanziamento totale di € 100,000 nell'ambito del "Progetto Bandiera RITMARE – La Ricerca Italiana per il Mare", coordinato dal Consiglio Nazionale delle Ricerche e finanziato dal Ministero dell'Istruzione, dell'Università e della Ricerca nell'ambito del Programma Nazionale della Ricerca 2011-2013, in qualità di responsabile dell'Unità Operativa SP5_WP2_AZ3_UO05.
- 2012-2015: assegnatario di un finanziamento totale di € 300,000 erogato dal Ministero dell'Istruzione, dell'Università e della Ricerca in qualità di P.I. (Coordinatore

e Responsabile Scientifico) del progetto FIRB/FIR “MOKA – Modelling and Observation of zooplankton orgAnisms” (RBFR10VF6M).

ESPERIENZE PROFESSIONALI

- 1 Settembre 2017-presente: ricercatore TD presso il Dipartimento di Ecologia Marina Integrata, Stazione Zoologica Anton Dohrn (Napoli, IT).
- 1 Dicembre 2016-31 Agosto 2017: assegnista di ricerca presso il Dipartimento di Ecologia Marina Integrata, Stazione Zoologica Anton Dohrn (Napoli, IT), sul tema “Risposte comportamentali di copepodi in relazione alla presenza di altri organismi planctonici”.
- 1 Settembre 2016-30 Novembre 2016: assegnista di ricerca presso il Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope” (Napoli, IT) nell’ambito dei progetti “Marine Strategy” (in convenzione con il CoNISMa) e “Dinamica Costiera” sul tema “Utilizzazione di dati radar HF in aree costiere per studi di onde e di correnti”.
- 1 Luglio-31 Dicembre 2015: borsa di studio presso CoNISMa (Consorzio Nazionale Interuniversitario per le Scienze del Mare) (Roma, IT) nell’ambito del progetto “CoCoNET – Towards COast to COast NETworks of marine protected areas (from the shore to the high and deep sea), coupled with sea-based wind energy potential” con progetto dalla tematica “Analisi di tecniche di valutazione teorica della connettività a partire da dati lagrangiani o risultati di simulazioni” svolto presso il Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”.
- 7 Marzo 2012-7 Marzo 2015: contratto di ricercatore a tempo determinato (RTDa) presso il Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope” (Napoli, IT), in qualità di P. I. (Coordinatore e Responsabile Scientifico) del progetto “MOKA – Modellizzazione ed osservazione di organismi zooplanktonici” (RBFR10VF6M) finanziato dal Ministero dell’Istruzione, dell’Università e della Ricerca nell’ambito del bando FIRB - Programma “Futuro in Ricerca 2010” (FIRB/FIR).
- 1 Settembre 2011-29 Febbraio 2012: contratto di collaborazione coordinata e continuativa presso l’Università degli Studi di Napoli “Parthenope” (Napoli, IT) nell’ambito del progetto “PROMETEO –Nuove tecnologie per il monitoraggio ambientale, il trasferimento tecnologico e per l’integrazione dei saperi a sostegno della ricerca giovane” con l’incarico di “Esperto gestione strumentazione per il monitoraggio meteo-marino”.
- 5 Maggio 2011-5 Giugno 2011: contratto di collaborazione occasionale presso il Dipartimento di Scienze per l’Ambiente, Università degli Studi di Napoli “Parthenope” (Napoli, IT) nell’ambito del progetto “TOSCA – Tracking Oil Spills and Coastal Awareness Network” TOSCA - N. 2G – MED09-425 Programma MED 2007-2013 per incarico con oggetto “Elaborazione e gestione di dati radar di correnti marine superficiali costiere mediante software dedicati”.
- 6 Maggio 2010-5 Maggio 2011: contratto di collaborazione coordinata e continuativa presso l’Università degli Studi di Napoli “Parthenope” (Napoli, IT) nell’ambito del progetto “PROMETEO –Nuove tecnologie per il monitoraggio ambientale, il trasferimento tecnologico e per l’integrazione dei saperi a sostegno della ricerca giovane” con l’incarico di “Esperto gestione strumentazione per il monitoraggio meteo-marino”.
- 20 Novembre 2009-31 Dicembre 2009: contratto di collaborazione a progetto presso CLU S.r.l. (Castelfranco Emilia, IT) nell’ambito del progetto della Comunità Europea “SESAME –Southern European Seas: Assessing and Modelling Ecosystem Changes

(VIFP 6.3 – Global Change and Ecosystems – Contract no.: 036949-2), Task T10.1: Working with partners”.

- 19 Dicembre 2008-19 Gennaio 2009: contratto di collaborazione occasionale presso il Dipartimento di Scienze per l’Ambiente, Università degli Studi di Napoli “Parthenope” (Napoli, IT) nell’ambito delle attività del progetto “CRdC Analisi e Monitoraggio del Rischio Ambientale (AMRA)” per incarico con oggetto “Sviluppo di software per la elaborazione e gestione dati radar di correnti superficiali costiere ai fini della realizzazione di un database strutturato”.

- 1 Agosto 2007-31 Luglio 2008: contratto di lavoro a progetto presso il CoNISMa (Consorzio Nazionale Interuniversitario per le Scienze del Mare) (Roma, IT) nell’ambito del progetto “VECTOR – VulnErabilità delle Coste e degli ecosistemi marini italiani ai cambiamenti climaTici e loro ruolo nei cicli del caRbonio oceanico”), attività 4.1.5 (“DivCost – Idrografia”) e 4.1.6 (“DivCost – Modelli Oceanografici”), condotto presso l’ULR Parthenope (Napoli, IT), con progetto “Implementazione di un modello di circolazione generale nel Golfo di Napoli”.

- Febbraio 2007: contratto di collaborazione occasionale presso il CoNISMa (Consorzio Nazionale Interuniversitario per le Scienze del Mare) (Roma, IT) nell’ambito del progetto “MERSEA –Marine EnviRonment and Security for the European Area-Integrated Project n. SIP3-CT-2003-502885”.

- 22 Maggio 2006-21 Maggio 2007: borsa di studio presso l’Università degli Studi di Napoli “Federico II”(Napoli, IT) come capofila del Centro Regionale di Competenza- Analisi e Monitoraggio Rischio Ambientale con progetto dalla tematica “Metodologie avanzate di misura delle correnti marine superficiali” svolto presso il Dipartimento di Scienze per l’Ambiente, Università degli Studi di Napoli “Parthenope”.

- 1 Novembre 2001-31 Ottobre 2005: Borsa di studio per il Corso di Dottorato nell’ambito della collaborazione fra Open University (Milton Keynes, GB) e Stazione Zoologica Anton Dohrn (Napoli, IT).

ATTIVITÀ DI SUPERVISIONE

:: Post-doc & Contrattisti

- Gennaio 2014-Aprile 2015: Simona Saviano, contratto di collaborazione a progetto “Studio della correntometria superficiale e del moto ondoso del Golfo di Napoli attraverso analisi di dati HF radar” nell’ambito del “Progetto Bandiera RITMARE – La Ricerca Italiana per il Mare”, coordinato dal Consiglio Nazionale delle Ricerche e finanziato dal Ministero dell’Istruzione, dell’Università e della Ricerca nell’ambito del Programma Nazionale della Ricerca 2011-2013.

- Febbraio 2014-Gennaio 2015: Luciana Sabia, assegno di ricerca post-doc “Osservazione e modellizzazione di traiettorie descritte da organismi zooplanctonici” nell’ambito del progetto “MOKA – Modelling and Observation of zooplankton orgAnisms”, finanziato del Ministero dell’Istruzione, dell’Università e della Ricerca nell’ambito del programma di ricerca FIRB “Futuro in Ricerca” Anno 2010 (Protocollo: RBFR10VF6M) (FIRB/FIR).

- Gennaio 2013-Febbraio 2013: Luciana Sabia, contratto di collaborazione occasionale “Analisi del comportamento di nuoto di organismi zooplanctonici” nell’ambito del progetto “MOKA – Modelling and Observation of zooplankton orgAnisms”, finanziato del Ministero dell’Istruzione, dell’Università e della Ricerca nell’ambito del programma di ricerca FIRB “Futuro in Ricerca” Anno 2010 (Protocollo: RBFR10VF6M) (FIRB/FIR).

:: Studenti PhD

- a. a. 2014-2018 (XXIX Ciclo): Simona Saviano, PhD in “Scienze Applicata al Mare,

all'Ambiente e al Territorio" – Università degli Studi di Napoli "Parthenope" (Napoli, IT).
Titolo della tesi: "Retrieval of surface gravity waves in the Gulf of Naples from HF radar data".

- a. a. 2009-2011 (XXIV Ciclo): Luciana Sabia, PhD in "Metodologie dei Sistemi di Rappresentazione della Semiotica Animale ed Ambientale" – Università degli Studi di Messina (Messina, IT). Titolo della tesi: "An integrated approach to the study of the swimming behaviour of *Pseudodiaptomus marinus* and its responses to environmental stimuli".

:: Studenti Master

- Novembre-Dicembre 2020: Angela Garzia, Master in Meteorologia e Oceanografia Fisica. Università del Salento e Università degli Studi di Napoli "Parthenope".

:: Tesisti

- a. a. 2008-2009: Pasquale Mozzillo, Laurea Magistrale in "Oceanografia e Meteorologia" – Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli "Parthenope" (Napoli, IT). Titolo della tesi: "Variabilità stagionale delle correnti superficiali del Golfo di Napoli".

:: Tirocini

- Giugno 2019-Agosto 2019: Elizabeth Jasmin Fennimore, University of Wisconsin-Milwaukee, Milwaukee (WI, USA).

- Maggio 2019-Giugno 2019: Francesco Golin, International Master of Science in Marine Biological Resources (IMBRSea) (Erasmus Mundus Joint Master Degree), Ghent University, Ghent (BE).

- Aprile 2019-Maggio 2019: Jordan Moss, International Master of Science in Marine Biological Resources (IMBRSea) (Erasmus Mundus Joint Master Degree), Ghent University, Ghent (BE).

- Settembre 2014-Gennaio 2015: Anna Maffia, Corso di Formazione OTTIMA "Oceanografia operativa e Tecnologie Informatiche per la sicurezza Marittima" (Anno 2014-15) (PON01_02823), organizzato da CNR-IAMC (IT).

RESPONSABILITÀ EDITORIALI

:: Libri

- Editor del volume "Biology, Distribution and Ecology of Copepods", Nova Science Publishers, Inc., New York, 326 p. (2018).

:: Editorial Board Member

- Membro dell'Editorial Board delle seguenti riviste (in ordine alfabetico):
Frontiers in Marine Science (ISSN: 2296-7745; publisher: Frontiers);
Journal of Marine Science and Engineering (ISSN: 2077-1312; publisher: MDPI AG);
Scientific Reports (ISSN: 2045-2322; publisher: Springer Nature Publishing AG).

:: Special Issue

- Co-guest editor dello Special Issue "Radar Technology for Coastal Areas and Open Sea Monitoring" in *Journal of Marine Science and Engineering*, doi: 10.3390/books978-3-03936-973-7, ISBN: 978-3-03936-972-0 (Hbk), 978-3-03936-973-7 (PDF), 250 p. (2020).

:: Referaggio per Riviste Scientifiche Internazionali

Reviewer (>45 articoli referati) per le seguenti riviste ISI: *Adaptive Behaviour*; *Aquatic Biology*; *Aquatic Ecology*; *Aquatic Toxicology*; *Chinese Journal of Oceanology and Limnology*; *Dynamics of Atmospheres and Oceans*; *Ecological Modelling*; *Environmental Science and Pollution Research*; *Estuarine, Coastal and Shelf Science*; *Frontiers in Marine Science*; *Hydrobiologia*; *ICES Journal of Marine Science*; *Journal of Experimental Marine Biology and Ecology*; *Journal of Fish Biology*; *Journal of Marine Science and Engineering*; *Journal of Marine Systems*; *Journal of Plankton Research*; *Journal of the Royal Society Interface*; *Marine Biology*; *Mathematical Biosciences*; *PLoS ONE*; *Remote Sensing*; *Science of the Total Environment*; *Water*.

REFERAGGIO PER PROGETTI SCIENTIFICI INTERNAZIONALI

Reviewer per le seguenti Istituzioni scientifiche internazionali (in ordine alfabetico):

- ETH Zurich Research Commission;
- German-Israeli Foundation for Scientific Research and Development;
- HRZZ Croatian Science Foundation.

ASSOCIATURA A SOCIETÀ PROFESSIONALI

- 2018-presente: membro dell'International Council for the Exploration of the Sea (ICES) (DK).
- 2015-presente: membro della American Society of Limnology and Oceanography (ASLO) (USA).
- 2017-presente: membro della World Association of Copepodologists (WAC) (USA).
- 2017: membro della Systematics Association (UK).

PUBBLICAZIONI

:: Articoli su Riviste Indicizzate ISI/Scopus

- **Uttieri M.**[§], Mazzocchi M. G., Nihongi A., Ribera d'Alcalà M., Strickler J. R., Zambianchi E. (2004) Lagrangian description of zooplankton swimming trajectories. *Journal of Plankton Research*, 26 (1): 99-105, doi:10.1093/plankt/fbg116. Accession Number – WOS:000187988400011.
- **Uttieri M.**[§], Zambianchi E., Strickler J. R., Mazzocchi M. G. (2005) Fractal characterization of three-dimensional zooplankton swimming trajectories. *Ecological Modelling*, 185 (1): 51-63, doi:10.1016/j.ecolmodel.2004.11.015. Accession Number – WOS:000229273100004.
- Menna M., Mercatini A., **Uttieri M.**, Buonocore B., Zambianchi E. (2007) Wintertime transport processes in the Gulf of Naples investigated by HF radar measurements of surface currents. *Il Nuovo Cimento*, 30C (6): 605-622, doi:10.1393/ncc/i2008-10270-0. Accession Number – WOS:000259266800005.
- **Uttieri M.**[§], Nihongi A., Mazzocchi M. G., Strickler J. R. and Zambianchi E. (2007) Pre-copulatory behaviour in the freshwater copepod *Leptodiatomus ashlandi*. *Journal of Plankton Research*, 29 (Suppl. 1): i17-i26, doi:10.1093/plankt/fbl062. Accession Number – WOS:000208220100003.
- **Uttieri M.**[§], Cianelli D., Strickler J. R., Zambianchi E. (2007) On the relationship between fractal dimension and encounters in zooplankton swimming trajectories. *Journal of Theoretical Biology*, 247 (3): 480-491, doi:10.1016/j.jtbi.2007.03.026. Accession Number – WOS:000248178600007.

- **Uttieri M.**[§], Paffenhöfer G.-A., Mazzocchi M. G. (2008) Prey capture in *Clausocalanus furcatus* (Copepoda: Calanoida). The role of swimming behaviour. *Marine Biology*, 153 (5): 925-935, doi:10.1007/s00227-007-0864-0.
Accession Number – WOS:000252875500017.
- **Uttieri M.**[§], Brown E. R., G. A. Boxshall, Mazzocchi M. G. (2008) Morphology of antennular sensors in *Clausocalanus furcatus* (Copepoda: Calanoida). *Journal of the Marine Biological Association of the United Kingdom*, 88 (3): 535-541, doi:10.1017/S0025315408000854.
Accession Number – WOS:000257179800013.
- Cianelli D., **Uttieri M.**[§], Strickler J. R., Zambianchi E. (2009) Zooplankton encounters in patchy particle distributions. *Ecological Modelling*, 220 (5): 596-604, doi:10.1016/j.ecolmodel.2008.10.015.
Accession Number – WOS:000263817900001.
- **Uttieri M.**[§], Sabia L., Cianelli D., Strickler J. R., Zambianchi E. (2010) Lagrangian modelling of swimming behaviour and encounter success in co-occurring copepods: *Clausocalanus furcatus* vs. *Oithona plumifera*. *Journal of Marine Systems*, 81 (1-2): 112-121, doi:10.1016/j.jmarsys.2009.12.004.
Accession Number – WOS:000276172700010.
- Ziarek J. J., Nihongi A., Nagai T., **Uttieri M.**[§], Strickler J. R. (2011) Seasonal adaptations of *Daphnia pulicaria* swimming behaviour: the effect of water temperature. *Hydrobiologia*, 661 (1): 317-327, doi:10.1007/s10750-010-0540-0.
Accession Number – WOS:000285064900026.
- **Uttieri M.**[§], Cianelli D., Buongiorno Nardelli B., Buonocore B., Falco P., Colella S., Zambianchi E. (2011) Multiplatform observation of the surface circulation in the Gulf of Naples (Southern Tyrrhenian Sea). *Ocean Dynamics*, 61 (6): 779-796, doi:10.1007/s10236-011-0401-z.
Accession Number – WOS:000292275100005.
- Serafino F., Lugni C., Ludeno G., Arturi D., **Uttieri M.**, Buonocore B., Zambianchi E., Budillon G., Soldovieri F. (2012) REMOCEAN: a flexible X band radar system for sea state monitoring and surface current estimation. *IEEE Geoscience and Remote Sensing Letters*, 9 (5): 822-826, doi: 10.1109/LGRS.2011.2182031.
Accession Number – WOS:000310915500005.
- **Uttieri M.**[§], Cianelli D., Zambianchi E. (2013) Behaviour-dependent predation risk in swimming zooplankters. *Zoological Studies*, 52: 32, doi:10.1186/1810-522X-52-32.
Accession Number – WOS:000327402100008.
- Sabia L., **Uttieri M.**, Soussi S., Schmitt F. G., Zagami G., Zambianchi E. (2014) *Pseudodiaptomus marinus* Sato, 1913, a new invasive copepod in Lake Faro (Sicily): observations on the swimming behaviour and the sex-dependent responses to food. *Zoological Studies*, 53: 49, doi:10.1186/s40555-014-0049-8.
Accession Number – WOS:000341992400003.
- Cianelli D., Falco P., Iermano I., Mozzillo P., **Uttieri M.**, Buonocore B., Zambardino G., Zambianchi E. (2015) Inshore/offshore water exchange in the Gulf of Naples. *Journal of Marine Systems*, 145: 37-52, doi:10.1016/j.jmarsys.2015.01.002.
Accession Number – WOS:000350919900003.
- Sabia L., Zagami G., Mazzocchi M. G., Zambianchi E., **Uttieri M.** (2015) Spreading factors of a globally invading coastal copepod. *Mediterranean Marine Science*, 16 (2): 460-471, doi: 10.12681/mms.1154.
Accession Number – WOS:000362580500018.

- Bellomo L., Griffa A., Cosoli S., Falco P., Gerin R., Iermano I., Kalampokis A., Kokkini Z., Lana A., Magaldi M. G., Mamoutos I., Mantovani C., Marmain J., Potiris E., Sayol J. M., Barbin Y., Berta M., Borghini M., Bussani A., Corgnati L., Dagneaux Q., Gaggelli J., Guterman P., Mallarino D., Mazzoldi A., Molcard A., Orfila A., Poulain P.-M., Quentin C., Tintoré J., **Uttieri M.**, Vetrano A., Zambianchi E., Zervakis V. (2015) Toward an integrated HF radar network in the Mediterranean Sea to improve search and rescue and oil spill response: the TOSCA project experience. *Journal of Operational Oceanography*, 8(2): 95-107, doi: 10.1080/1755876X.2015.1087184. Accession Number – WOS:000368118900002.
- Falco P., Buonocore B., Cianelli D., De Luca L., Giordano A., Iermano I., Kalampokis A., Saviano S., **Uttieri M.**, Zambardino G., Zambianchi E. (2016) Dynamics and sea state in the Gulf of Naples: potential use of high-frequency radar data in an operational oceanographic context. *Journal of Operational Oceanography*, 9(S1): s33-s45, doi: 10.1080/1755876X.2015.1115633. Accession Number – WOS:000378721600005.
- Kalampokis A., **Uttieri M.**, Poulain P.-M., Zambianchi E. (2016) Validation of HF radar-derived currents in the Gulf of Naples with Lagrangian data. *IEEE Geoscience and Remote Sensing Letters*, 13(10): 1452-1456, doi: 10.1109/LGRS.2016.2591258. Accession Number – WOS:000386253500013.
- Nihongi A., Ziarek J. J., **Uttieri M.**[§], Sandulli R., Zambianchi E., Strickler J. R. (2016) Behavioural interseasonal adaptations in *Daphnia pulex* (Crustacea: Cladocera) as induced by predation infochemicals. *Aquatic Ecology*, 50(4): 667-684, doi: 10.1007/s10452-016-9585-0. Accession Number – WOS:000387422500005.
- Boero F., Fogliani F., Frascchetti S., Goriup P., Macpherson E., Planes S., Soukissian T., **The CoCoNet Consortium** (2016) CoCoNet: towards coast to coast networks of marine protected areas (from the shore to the high and deep sea), coupled with sea-based wind energy potential. *SCientific REsearch and Information Technology*, 6(Suppl.): 1-95, doi: 10.2423/i22394303v6Spl. Accession Number – WOS:000419224800002.
- Sabia L., Di Capua I., Percopo I., **Uttieri M.**, Amato A. (2017) ITS2 in calanoid copepods: reconstructing phylogenetic relationships and identifying a newly introduced species in the Mediterranean. *The European Zoological Journal*, 84(1): 104-115, doi: 10.1080/11250003.2016.1276639. Accession Number – WOS:000407954100011.
- Cianelli D., D'Alelio D., **Uttieri M.**, Sarno D., Zingone A., Zambianchi E., Ribera d'Alcalà M. (2017) Disentangling physical and biological drivers of phytoplankton dynamics in a coastal system. *Scientific Reports*, 7: 15868, doi: 10.1038/s41598-017-15880-x. Accession Number – WOS:000415692800040. [Article included in the “Top 100 in Earth Science” by Scientific Reports]
- Pastore R., **Uttieri M.**, Bianco G., Ribera d'Alcalà M., Mazzocchi M. G. (2018) Distinctive diffusive properties of motion in planktonic copepods swimming in different environmental conditions. *European Physical Journal E*, 41: 79, doi: 10.1140/epje/i2018-11688-5. Accession Number – WOS:000436372300001.
- Saviano S., Kalampokis A., Zambianchi E., **Uttieri M.** (2019) A year-long assessment of wave measurements retrieved from a HF radar network in the Gulf of Naples (Tyrrhenian Sea, Western Mediterranean Sea). *Journal of Operational Oceanography*, 12(1): 1-15, doi: 10.1080/1755876X.2019.1565853.

Accession Number - WOS:000456811900001.

- **Uttieri M.**[§], Nihongi A., Hinow P., Motschman J., Jiang H., Alcaraz M., Strickler J. R. (2019) Copepod manipulation of oil droplet size distribution. *Scientific Reports*, 9: 547, doi: 10.1038/s41598-018-37020-9.

Accession Number - WOS:000456553400112.

- Svetlichny L., Hubareva E., Khanaychenko A., **Uttieri M.**[§] (2019) Response to salinity and temperature changes in the alien Asian copepod *Pseudodiaptomus marinus* introduced in the Black Sea. *Journal of Experimental Zoology Part A-Ecological and Integrative Physiology*, 331(8): 416-426, doi: 10.1002/jez.2309.

- **Uttieri M.**[§], Aguzzi L., Aiese Cigliano R., Amato A., Bojanić N., Brunetta M., Camatti E., Carotenuto Y., Damjanović T., Delpy F., de Olazabal A., Di Capua I., Falcão J., Fernandez de Puellas M.L., Foti G., Garbazez O., Goruppi A., Gubanova A., Hubareva E., Iriarte A., Khanaychenko A., Lučić D., Marques S. C., Mazzocchi M. G., Mikuš J., Minutoli R., Pagano M., Pansera M., Percopo I., Primo A. L., Svetlichny L., Rožić, S., Tirelli V., Uriarte I., Vidjak O., Villate F., Wootton M., Zagami G., Zervoudaki S. (2020) WGEUROBUS – Working Group “Towards a EUROpean Observatory of the non-indigenous calanoid copepod *Pseudodiaptomus marinus*”. *Biological Invasions*, 22(3): 885-906, doi:10.1007/s10530-019-02174-8

- Saviano S., De Leo F., Besio G., Zambianchi E., **Uttieri M.** (2020) HF radar measurements of surface waves in the Gulf of Naples (Southeastern Tyrrhenian Sea): comparison with hindcast results at different scales. *Frontiers in Marine Science*, 7: 492, doi: 10.3389/fmars.2020.00492

- Ludeno, G., **Uttieri M.**[§] (2020) Editorial for Special Issue “Radar Technology for Coastal Areas and Open Sea Monitoring”. *Journal of Marine Science and Engineering*, 8(8): 560, doi: 10.3390/jmse8080560

- Saviano, S., Cianelli, D., Zambianchi, E., Conversano, F., **Uttieri, M.** (2020) An integrated reconstruction of the multiannual wave pattern in the Gulf of Naples (South-Eastern Tyrrhenian Sea, Western Mediterranean Sea). *Journal of Marine Science and Engineering*, 8(5), 372, doi: 10.3390/jmse8050372

- Saviano, S., Cianelli, D., Zambianchi, E., Conversano, F., **Uttieri M.** (2020) Multiple year characterization of the wave field in the Gulf of Naples by multi-platform measurements. *2019 IMEKO TC19 International Workshop on Metrology for the Sea: Learning to Measure Sea Health Parameters, MetroSea 2019*, 276-280.

- de Leo F., Besio G., Saviano S., Zambianchi E., **Uttieri M.** (2020) Evaluation of HF-radar wave measures in the Gulf of Naples. *2019 IMEKO TC19 International Workshop on Metrology for the Sea: Learning to Measure Sea Health Parameters, MetroSea 2019*, 135-136.

- Svetlichny L., Hubareva E., **Uttieri M.** (2021) Ecophysiological and behavioural responses to salinity and temperature stress in cyclopoid copepod *Oithona davisae* with comments on gender differences. *Mediterranean Marine Science*, 22(1): 89-101, doi: 10.12681/mms.22496

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- **Uttieri M.** (on behalf of WGEUROBUS) “EUROBUS – Towards a EUROpean Observatory of the non-indigenous calanoid copepod *Pseudodiaptomus marinus*”. 54th European Marine Biological Symposium. Dublino (IR). 25-29 Agosto 2019.
- D’Angiolo R., **Uttieri M.**, De Maio A., Percopo I., Minucci C., Boero F., Di Capua I. “Integrated diversity assessment of zooplankton species in the Gulf of Naples”. EVOLMAR 2020 Marine Evolution 1st Italian Congress. Online. 23-25 Novembre 2020.
- Di Capua I., D’Angiolo R., Camatti E., Carotenuto Y., Goruppi A., de Olazabal A., Pansera M., Percopo I., Tirelli V., Zagami G., **Uttieri M.** “Molecular and morphological identification of *Pseudodiaptomus marinus* strains from Italian waters” EVOLMAR 2020 Marine Evolution 1st Italian Congress. Online. 23-25 Novembre 2020.
- Zambianchi E., **Uttieri M.** “Waves” EuroGOOS HFR-FerryBox Joint Workshop, online. 17-18 Marzo 2021.
- Lorente P., **the RADAR-MED** “The High Frequency coastal radar network in the Mediterranean: joint efforts towards a fully operational implementation” EGU General Assembly 2021, online. 19–30 Aprile 2021.
- Reyes E., **the MONGOOS HF radar network community** “Mediterranean High-Frequency radar network: regional coordinated efforts meeting end users and science-driven requirements” 9th EUROGOOS International Conference, online. 3-5 Maggio 2021.

ATTIVITÀ DIDATTICA

- a. a. 2019-2020: membro del Collegio del programma congiunto di PhD fra Stazione Zoologica Anton Dohrn (Napoli, IT) ed Open University (Milton Keynes, GB).
- a. a. 2018-2019: membro del Collegio del programma congiunto di PhD fra Stazione Zoologica Anton Dohrn (Napoli, IT) ed Open University (Milton Keynes, UK).
- a. a. 2018-2019: Membro della Commissione di Esami per le cattedre di “Oceanografia” e “Trasporto e Diffusione nell’Oceano e nell’Atmosfera” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).
- a. a. 2017-2018: membro del Collegio del programma congiunto di PhD fra Stazione Zoologica Anton Dohrn (Napoli, IT) ed Open University (Milton Keynes, UK).
- a. a. 2017: Membro della Collegio dei Docenti per i Corso di Dottorato in “Scienze Applicate al Mare, all’Ambiente e al Territorio” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).
- a. a. 2016-2017: Docente di “Biologia e Fisiologia Animale” (5 CFU) – Corso di Laurea in Scienze Biologiche, Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).
- a. a. 2016: Membro della Collegio dei Docenti per i Corso di Dottorato in “Scienze Applicate al Mare, all’Ambiente e al Territorio” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).
- a. a. 2015-2016: Membro della Commissione di Esami per le cattedre di “Oceanografia” e “Trasporto e Diffusione nell’Oceano e nell’Atmosfera” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).
- Aprile 2015: Ciclo di lezioni su HF radar (“Running a CODAR network – The AMRA-CoNISMa

experience in the Gulf of Naples”, “Data validation”) nell’ambito del corso “CODAR SeaSonde HF Radar Training”, Accademia Navale di Livorno, Livorno (IT).

- a. a. 2015: Membro della Collegio dei Docenti per i Corso di Dottorato in “Scienze Applicate al Mare, all’Ambiente e al Territorio” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2014-2015: Docente di “Biodinamica della Colonna d’Acqua” (6 CFU) – Corso di Laurea in Scienze Biologiche, Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2014: Ciclo di seminari (1 CFU) “Introduzione al plancton”, “Ecologia dello zooplancton”, “Comportamento di nuoto. I. Osservazioni” e “Comportamento di nuoto. II. Modelli”, Corso di Dottorato in “Scienze Applicate al Mare, all’Ambiente e al Territorio” e “Scienze del Mare, della Terra e del Clima” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2014: Membro della Collegio dei Docenti per i Corso di Dottorato in “Scienze Applicate al Mare, all’Ambiente e al Territorio” e “Scienze del Mare, della Terra e del Clima” – Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2013-2014: Docente di “Biodinamica della Colonna d’Acqua” (6 CFU) – Corso di Laurea Magistrale in Scienze Ambientali, Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2013-2014: Membro della Commissione di Esami per le cattedre di “Biologia Marina”, “Lingua Inglese”, “Zoologia con Laboratorio” – Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2013: Membro della Collegio dei Docenti per il Corso di Dottorato in “Scienze del Mare, della Terra e del Clima” – Dipartimento di Scienze per l’Ambiente, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2012-2013: Docente di “Biologia Generale” (6 CFU) – Corso di Laurea in Scienze Biologiche, Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2012-2013: Membro della Commissione di Esami per le cattedre di “Ittiologia e Risorse Acquatiche”, “Zoologia con Laboratorio”, “Oceanografia Costiera”, “Oceanografia Fisica”, “Trasporto e Diffusione nell’Oceano e nell’Atmosfera” – Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2012: Ciclo di seminari (1 CFU) “Introduzione al plancton”, “Ecologia dello zooplancton”, “Comportamento di nuoto. I. Osservazioni” e “Comportamento di nuoto. II. Modelli”, Corso di Dottorato in “Scienze del Mare, della Terra e del Clima” – Dipartimento di Scienze per l’Ambiente, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2011-2012: Membro della Commissione per il Corso di Dottorato in “Metodologie dei Sistemi di Rappresentazione della Semiotica Animale ed Ambientale” – Università degli Studi di Messina, Messina (IT).

- a. a. 2011-2012: Cultore della materia per le cattedre di “Oceanografia Costiera” e “Oceanografia Fisica” – Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2009-2010: Lezione intitolata “Radar costieri per la misura del campo superficiale di corrente” – Corso di Misure Meteo-Oceanografiche, Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2008-2009: Cultore della materia per le cattedre di “Oceanografia Costiera”, “Oceanografia Costiera con Misure” e “Trasporto e Diffusione in Fluidi Geofisici” – Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).

- a. a. 2007-2008: Cultore della materia per la cattedra di “Oceanografia Costiera”, “Oceanografia Costiera con Misure” e “Trasporto e Diffusione in Fluidi Geofisici” – Facoltà di Scienze e Tecnologie, Università degli Studi di Napoli “Parthenope”, Napoli (IT).
- a. a. 2007-2008: Titolare del modulo “Ecodinamica dei sistemi acquatici costieri e di transizione 2” (0.125 CFU) per il Master Universitario di I Livello in “Eco-Governance degli Ecosistemi Lagunari del Bacino Adriatico – Ecologia dei Sistemi Acquatici di Transizione” – Modulo di “Geomorfologia, Idrologia e Chimico-Fisica degli EAT”, Università del Salento, Lecce (IT).

ORGANIZZAZIONE DI WORKSHOP

- 28-29 Ottobre 2020: chair ed organizzatore del meeting annuale WGEUROBUS (Towards a EUROpean OBServatory of the non-indigenous calanoid copepod *Pseudodiaptomus marinUS*). Online workshop.
- 14-15 Ottobre 2019: chair del meeting annuale WGEUROBUS (Towards a EUROpean OBServatory of the non-indigenous calanoid copepod *Pseudodiaptomus marinUS*). Peniche (PT).
- 29-30 Gennaio 2018: organizzatore e chair del workshop EUROBUS (Towards an EUROpean OBServatory of the invasive calanoid copepod *Pseudodiaptomus marinUS*). L'evento è stato designato come ICES Training Workshop, ed è stato finanziato dalla Stazione Zoologica Anton Dohrn (IT), dalla Società Italiana di Biologia Marina (SIBM) (IT) e dal Consorzio Nazionale Interuniversitario per le Scienze del Mare (CoNISMa) (IT). Il workshop è stato inoltre supportato dalla World Association of Copepodologists (WAC) (USA), dalla Sir Alister Hardy Foundation for Ocean Science (SAHFOS) (GB) e dal servizio MOTax (Marine Organism Taxonomy) della Stazione Zoologica Anton Dohrn (IT).

PRESENTAZIONI A WORKSHOP

- Buonocore B., Menna M., Mercatini A., **Uttieri M.**, Zambianchi E., Pierini S. “Risultati preliminari dell'attività VECTOR – circolazione superficiale nel Golfo di Napoli”. Workshop VECTOR Geoitalia 2007. Rimini (IT). 10-11 Settembre 2007.
- **Uttieri M.**, Pierini S., Zambianchi E. “Attività sperimentali e modellistiche sulla circolazione nel Golfo di Napoli: risultati preliminari” Workshop VECTOR LINEA 4 Biodiversità Costiera (DIVCOST) - Attività 1: Variazioni del plancton e dell'idrografia nel Golfo di Napoli. Napoli (IT). 2 Febbraio 2008.
- Buonocore B., Cianelli D., Falco P., Menna M., Mercatini A., Pierini S., Sgubin G., **Uttieri M.**, Zambianchi E. “The VECTOR contribution to the understanding of surface transport processes in the Gulf of Naples”. Il Workshop Annuale VECTOR. Roma (IT). 25-26 Febbraio 2009.
- Zambianchi E., Pierini S., Buonocore B., Cianelli D., Falco P., **Uttieri M.**, Zambardino G. “Surface dynamics and water exchanges in the Gulf of Naples – results of studies carried out in the framework of the VECTOR project”. Workshop finale VECTOR. Roma (IT). 18-19 Ottobre 2010.
- Zambianchi E., Buonocore B., Cianelli D., Falco P., **Uttieri M.**, Buongiorno Nardelli B., Colella S. “Combined use of HF radar and satellite data to study the dynamics in the Gulf of Naples”. Workshop “HF RADAR Systems for the monitoring of surface currents: development and applications”. Pasaia (ES). 28-29 Ottobre 2010.
- **Uttieri M.**, Buonocore B., Cianelli D., De Luca L., Falco P., Giordano A., Iermano I., Kalampokis A., Saviano S., Zambardino G., Zambianchi E. “SP5_WP2_AZ3:

- Implementazione della rete dei radar costieri. Attività svolte ed in progress: UO05". Workshop RITMARE. Bologna (IT). 14-15 Aprile 2014.
- **Uttieri M.**, Buonocore B., Cianelli D., Falco P., Iermano I., Kalampokis A., Saviano S., Zambianchi E. "Modellazione di habitat e connettività – Connessioni all'interno del Golfo di Napoli" Workshop RITMARE – SP2_WP2_AZ1. Napoli (IT). 11 Luglio 2014.
 - Sabia L., Zagami G., Mazzocchi M. G., Zambianchi E, **Uttieri M.** "How a tiny copepod becomes ubiquitous: settlement of *Pseudodiaptomus marinus* in the Mediterranean Sea". Management of bioinvasions in the Mediterranean Sea – The way forward (MEDBINV). Ischia (IT) 4-5 Maggio 2016.
 - Falco P., Buonocore B., Cianelli D., Di Lemma R., Giordano A., Iermano I., Kalampokis A., Saviano S., **Uttieri M.**, Zambardino G., Zambianchi E. "Application and results obtained by an HF radar in the Gulf of Naples". INCREASE HF Radar Experts Workshop. Lerici (IT). 13-15 Settembre 2016.
 - **Uttieri M.**, Saviano S., Kalampokis A., Zambianchi E. "HF radar derived wave measurements in the Gulf of Naples". INCREASE HF Radar Experts Workshop. Lerici (IT). 13-15 Settembre 2016.
 - Falco P., Buonocore B., De Luca L., Di Lemma R., Giordano A., Saviano S., **Uttieri M.**, Zambardino G., Zambianchi E. "Currents, tides and waves measured by HF radar in the Gulf of Naples" Workshop THEMES 2016 – Measuring, Modelling and Predicting Marine Environments: State of the Art and Challenges. Venezia (IT). 23-25 Novembre 2016.
 - Saviano S., **Uttieri M.**, Besio G., Zambianchi E. "Comparison of model hindcasted waves with radar measurements in the Tyrrhenian Sea" International Radiowave Oceanography Workshop 2017. Lüneburg (DE). 19-21 Settembre 2017.
 - Falco P., Di Lemma R., De Ruggiero P., Esposito G., Pierini S., Saviano S., **Uttieri M.**, Giordano A., Zambardino G., Zambianchi E. "Currents, tides and waves measured by an HF radar in the Gulf of Naples" International Radiowave Oceanography Workshop 2017. Lüneburg (DE). 19-21 Settembre 2017.
 - **Uttieri M.**, Svetlichny L., Hubareva E., Khanaychenko A. "Biological and behavioural traits sustaining the invasiveness of *Pseudodiaptomus marinus*" WGEUROBUS ICES Training Workshop. Napoli (IT). 29-30 Gennaio 2018.
 - Svetlichny L., Hubareva E., Khanaychenko A., **Uttieri M.** "Temperature-induced torpor in *P. marinus*" 2019 WGEUROBUS Annual Meeting. Peniche (PT). 14-15 Ottobre 2019.
 - Carotenuto Y., Di Capua I., **Uttieri M.** "Multigeneration cultivation of *P. marinus*". 2019 WGEUROBUS Annual Meeting. Peniche (PT). 14-15 Ottobre 2019.
 - Svetlichny L., Hubareva E., Khanaychenko A., **Uttieri M.** "New findings on salinity and temperature resistance of *P. marinus*" 2019 WGEUROBUS Annual Meeting. Peniche (PT). 14-15 Ottobre 2019.
 - **Uttieri M.**, Barroeta Z., Camatti E., Carotenuto Y., Di Capua I., Hubareva E., Iriarte A., Khanaychenko A., Pansera M., Tirelli V., Svetlichny L., Uriarte I., Villate F., Zagami G. "Invasive ecology concepts explained by *Pseudodiaptomus marinus*" 2020 WGEUROBUS Annual Meeting. Online workshop. 28-29 Ottobre 2020.

INCARICHI ISTITUZIONALI

- 2019: Presidente della Commissione Giudicatrice Borsa di Studio "Paolo Brancaccio", Lions Club Napoli "Megaride" e Stazione Zoologica Anton Dohrn, Napoli (IT).

- 2018: membro della Commissione per l'identificazione di composto alternativi all'uso della formalina per la conservazione di campioni biologici che richiedono l'uso di fissativi, Stazione Zoologica Anton Dohrn, Napoli (IT).
- 2017-presente: componente di Commissioni per Borse di Studio e Assegni di Ricerca, Stazione Zoologica Anton Dohrn, Napoli (IT).
- aa. aa. 2012-2015: componente di Commissioni di Laurea Triennale e Laurea Specialistica/Magistrale, Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli "Parthenope", Napoli (IT).
- aa. aa. 2012-2015: referente per il titolo di *Doctor Europeus* nei Corsi di Dottorato "Scienze Applicate al Mare, all'Ambiente e al Territorio" e "Scienze del Mare, della Terra e del Clima", Dipartimento di Scienze e Tecnologie, Università degli Studi di Napoli "Parthenope", Napoli (IT).

SCUOLE DI SPECIALIZZAZIONE E CORSI

- Seminari CoNISMa-MERSEA sull'Oceanografia Operativa. Università degli Studi di Napoli "Parthenope", Napoli (IT). Febbraio 2008.
- Modellistica Oceanografica, Corso 2007-2008. Prof. Stefano Pierini. Università degli Studi di Napoli "Parthenope", Napoli (IT). Ottobre 2007- Gennaio 2008.
- Idrografia, Corso 2006-2007. Prof. Berardino Buonocore. Università degli Studi di Napoli "Parthenope", Napoli (IT). Marzo 2007 - Giugno 2007.
- Oceanografia, Corso 2005-2006. Prof. Stefano Pierini. Università degli Studi di Napoli "Parthenope", Napoli (IT). Marzo 2006 - Giugno 2006.
- Geofluidodinamica, Corso 2005-2006. Prof. Stefano Pierini. Università degli Studi di Napoli "Parthenope", Napoli (IT). Ottobre 2005 - Gennaio 2006.
- Grand Combin Summer School, Corso 2001 "The fluid dynamics of coastal seas, closed basins and lakes" St. Oyen (IT). 13-23 Giugno 2001.

ATTIVITÀ DI CAMPO

- 2019-presente: partecipazione alle attività di campionamento *in situ* nel Golfo di Napoli nell'ambito del monitoraggio della LTER-MC. Stazione Zoologica Anton Dohrn, Napoli (IT).
- 2006-2016: manutenzione del network di HF radar installati nel Golfo di Napoli, gestiti dal Dipartimento di Scienze e Tecnologie dell'Università degli Studi di Napoli "Parthenope"
- 2001-2005: partecipazione alle attività di campionamento *in situ* nel Golfo di Napoli nell'ambito delle attività scientifiche del Laboratorio di Oceanografia Biologica, Stazione Zoologica Anton Dohrn, Napoli (IT).
- 2000: partecipazione alle attività di campionamento per il programma di monitoraggio delle acque costiere della Regione Campania. Università degli Studi di Napoli "Parthenope", Napoli (IT).

CONOSCENZE LINGUISTICHE

- Giugno 2003: Certificate in Proficiency English rilasciato dal British Council di Napoli (IT).
- Giugno 2003: attestato di "Level C2" rilasciato dal St. Peter's English Language Center di Napoli (IT).
- Giugno 2002: Certificate in Advanced English rilasciato dal British Council di Napoli (IT).

RICONOSCIMENTI

- 2018: inclusione dell'articolo Cianelli et al. (2017) "Disentangling physical and biological drivers of phytoplankton dynamics in a coastal system" Scientific Reports, 7: 15868, doi: 10.1038/s41598-017-15880-x nella "Top 100 in Earth Science".
- 2007: incluso nel volume Marquis Who's Who "Who's Who of Emerging Leaders, 2007, 1st Edition".
- 2005: vincitore dell'"Award for Excellence" al 9th International Conference on Copepoda, rilasciato dalla World Association of Copepodologists (Hammamet, Tunisia. 11-15 Luglio 2005).

FINANZIAMENTI PER CONGRESSI E SCUOLE DI SPECIALIZZAZIONE

- Maggio 2007: finanziamento per la partecipazione al "4th International Zooplankton Production Symposium" (Hiroshima, JP. 28 Maggio-1 Giugno 2007).
- Aprile 2007: finanziamento per la partecipazione alla "EGU General Assembly 2007" (Vienna, AT. 16-20 Aprile 2007).
- Maggio 2003: finanziamento per la partecipazione al "3rd International Zooplankton Symposium" (Gijón, Spagna. 20-23 Maggio 2003).
- Giugno 2001: finanziamento per la partecipazione alla Grand Combin Summer School, Course 2001 - "The fluid dynamics of coastal seas, closed basins and lakes" (St. Oyen, IT. 13-23 Giugno 2001).

DIVULGAZIONE SCIENTIFICA

- a. s. 2018-2019: relatore scientifico presso Istituto Comprensivo Statale 9° Cuoco-Schipa (Napoli, IT) nell'ambito del laboratorio didattico "Il mare: una risorsa da scoprire".
- a. s. 2017-2018: relatore scientifico presso Istituto Comprensivo Statale 9° Cuoco-Schipa (Napoli, IT) nell'ambito del laboratorio didattico "Il mare: una risorsa da scoprire".

ATTIVITÀ DI SUPPORTO ALLA RICERCA

- 2008: segretariato scientifico per i "Seminari CoNISMa-MERSEA sull'Oceanografia Operativa" (19-20 Febbraio 2008. Napoli, IT).
- 2007: Sviluppo sito web per conto del CoNISMa (Consorzio Nazionale Interuniversitario per le Scienze del Mare) (Roma, IT) nell'ambito del progetto "MERSEA – Marine EnviRonment and Security for the European Area-Integrated Project n. SIP3-CT-2003-502885".
- 2001: segretariato scientifico per il "2nd International Conference on the Oceanography of the Ross Sea – Antarctica" (8-13 Ottobre 2001. Ischia, IT).

CONOSCENZE INFORMATICHE

- Programmazione e sviluppo strumenti numerici tramite linguaggio Matlab.
- Ottima conoscenza dei sistemi operativi Windows e dei pacchetti Office, e del sistema operativo Mac OS.
- Ottima conoscenza del sistema CODAR Ocean Sensors.
- Ottima conoscenza del software grafici Grapher e Surfer.
- Conoscenza del software statistico SPSS.

- Programmazione e sviluppo siti web con i principali linguaggi del settore (html, php, Flash, ecc.).

ULTERIORI ESPERIENZE LAVORATIVE

- 2003-2012: sviluppo di siti web ed applicativi lato server/client.
- 2006-2010: consulente scientifico per la KF Technology S.r.l., Roma (IT).
- 2007-2012: responsabile servizi web dello "Studio Tecnico di Ingegneria delle Strutture – Ing. Filippo Cavuoto S.r.l.", Napoli (IT).
- 1999: impiego part-time presso la Biblioteca Centrale dell'Università degli Studi di Napoli "Parthenope" (Napoli, IT), nell'ambito delle selezioni fra studenti meritevoli.

Si autorizza il trattamento dei dati personali ai sensi delle leggi 675/96 e 196/2003.

Le dichiarazioni rese e sottoscritte nel presente *Curriculum Vitae* hanno valore di autocertificazione ai sensi dell'art. 46 del DPR 445/2000.

Napoli, 30 agosto 2021