

### Giulia Pedrazzi

#### ABOUT ME

Biologist with 3+ years experience working within the marine bioacoustics field, with specific focus on marine mammals and anthropogenic noise monitoring.

JNCC MMO, PSO & PAM Operator

#### **WORK EXPERIENCE**

#### **Technical Consultant for Noise Monitoring**

CONISMA - SAPIENZA [ 05/2023 - 11/2023 ]

City: Rome

Noise monitoring program (led by the CONISMA - Sapienza University of Rome, Department of Environmental Biology Operative Unit) within the Marine Strategy Framework Directive in the Lazio seas under the ISPRA authority.

Daily on-board surveys for the acquisition of acoustic data for continuous noise monitoring (MSFD D11.2). Analysis of noise levels (SPLrms) as required by TG NOISE guidelines. Reporting of activities and results.

#### **Technical Consultant for Noise Monitoring**

[07/2023]

City: Piombino (LI)

Collection of calibrated acoustic data through on-board daily surveys for the analysis and propagation modeling of anthropogenic noise in the Piombino port (Italy) as required by ministerial prescriptions.

#### **Technical Consultant for Noise Monitoring**

[05/2023]

City: Porto Torres (SS)

Collection of calibrated acoustic data through on-board daily surveys for the analysis and propagation modeling of anthropogenic noise in the Porto Torres port (Italy) as required by ministerial prescriptions.

#### **Technical Consultant for Noise Monitoring**

[11/2022]

City: Genoa (GE)

Collection of calibrated acoustic data through on-board daily surveys for the analysis and propagation modeling of anthropogenic noise in the Genoa port (Italy) as required by ministerial prescriptions.

#### **Research Fellow (Category B - Type I)**

Department of Environmental Biology - Sapienza University of Rome [03/10/2022 - 02/10/2023]

City: Rome

Research associate position in the Department of Environmental Biology (DBA) for research activity on "Distribution, abundance, habitat use and acoustic repertoire of bottlenose dolphin (*Tursiops truncatus*), and other cetacean species, in different geographical units" as part of the research project "Ecology and acoustics of marine mammals in the Mediterranean Sea".

Seminars on acoustic analysis for marine mammals' studies at the master's degree course "Ecology and acoustic behavior of marine mammals". Co-tutoring of Master Degree theses on acoustic behavior and ecology of marine mammals. Co-author of scientific papers.

Involved in the noise monitoring program within the Marine Strategy Framework Directive in the Lazio seas under the ISPRA authority for the part concering the acquisition of acoustic data and the analysis of noise levels (SPLrms).

#### MMO & PAM Operator

**TAP/Shelter** [ 04/2022 – 05/2022 ]

City: San Foca - Adriatic Sea

Marine Mammal Observer (MMO) and Passive Acoustic Monitoring (PAM) operator for the Trans Adriatic Pipeline (TAP) project. On-board acoustic and visual monitoring of the presence of marine mammals and sea turtles. Application of mitigation measures aimed at minimizing the impact of the operations and ensuring the welfare of protected species.

Drafting of daily reports on monitoring activity, including marine mammal's acoustic detections.

Involved in the Trans Adriatic Pipeline (TAP) project progress report out with focus and responsibility on the paragraphs regarding marine mammal's acoustic monitoring and description of recorded detections and mitigation measures applied.

#### **Technical Consultant for Noise Monitoring**

CONISMA - SAPIENZA [ 11/2021 - 05/2022 ]

City: Rome

Noise monitoring program (led by the CONISMA - Sapienza University of Rome, Department of Environmental Biology Operative Unit) within the Marine Strategy Framework Directive in the Lazio seas under the ISPRA authority.

Daily on-board surveys for the definition of the continuous noise monitoring protocol (MSFD D11.2) and the acquisition of acoustic data for the analysis of noise levels (SPLrms).

#### **External Collaborator**

Department of Environmental Biology - Sapienza University of Rome [03/2021 - 10/2021]

City: Rome

External collaborator at Department of Environmental Biology (DBA) of "La Sapienza" University of Rome within the research agreement between "Cooperativa Pelagos" and DBA

Support to the research program on the ecology and acoustics of bottlenose dolphins (*Tursiops truncatus*) at the Tiber River estuary (Rome, Italy) through the collection of Visual (MMO) and acoustic (PAM) data.

Co-author of scientific papers

Acoustic seminars at the master's degree course: "Ecology and acoustic behavior of marine mammals".

#### **PAM Operator**

Pelagos/TAP [ 09/2020 - 11/2020 ]

City: San Foca - Adriatic Sea

Passive Acoustic Monitoring (PAM) operator for the Trans Adriatic Pipeline (TAP) project. On-board acoustic monitoring (PAM) of both the presence of marine mammals and the levels of anthropogenic noise produced in the worksite during the pipeline construction.

Application of mitigation measures aimed at minimizing the impact of the activities on marine mammals.

Drafting of daily reports on monitoring activity, including marine mammal's acoustic detection and noise levels recorded (SPLrms, SPL peak-to-peak, SEL).

Involved in the Trans Adriatic Pipeline (TAP) project progress report out with focus and responsibility on the paragraphs regarding marine mammal's acoustic monitoring and description of recorded detections and mitigation measures applied.

#### **External Collaborator**

Department of Environmental Biology - Sapienza University of Rome [07/2020 - 09/2020]

City: Rome

External collaborator at Department of Environmental Biology (DBA) of "La Sapienza" University of Rome within the research agreement between "Cooperativa Pelagos" and DBA

Support to the research program on the ecology and acoustics of bottlenose dolphins (*Tursiops truncatus*) at the Tiber River estuary (Rome, Italy) through the collection of Visual (MMO) and acoustic (PAM) data.

#### **PAM Operator**

Pelagos/TAP [ 07/2020 - 08/2020 ]

City: San Foca - Adriatic Sea

Passive Acoustic Monitoring (PAM) operator for the Trans Adriatic Pipeline (TAP) project. On-board acoustic monitoring (PAM) of both the presence of marine mammals and the levels of anthropogenic noise produced in the worksite during the pipeline construction.

Application of mitigation measures aimed at minimizing the impact of the activities on marine mammals.

Drafting of daily reports on monitoring activity, including marine mammal's acoustic detection and noise levels recorded (SPLrms, SPL peak-to-peak, SEL).

Involved in the Trans Adriatic Pipeline (TAP) project progress report out with focus and responsibility on the paragraphs regarding marine mammal's acoustic monitoring and description of recorded detections and mitigation measures applied.

#### **PAM Operator**

**Pelagos/TAP** [ 02/2020 - 04/2020 ]

City: San Foca - Adriatic Sea

Passive Acoustic Monitoring (PAM) operator for the Trans Adriatic Pipeline (TAP) project. On-board acoustic monitoring (PAM) of both the presence of marine mammals and the levels of anthropogenic noise produced in the worksite during the pipeline construction.

Application of mitigation measures aimed at minimizing the impact of the activities on marine mammals.

Drafting of daily reports on monitoring activity, including marine mammal's acoustic detection and noise levels recorded (SPLrms, SPL peak-to-peak, SEL).

#### **PAM Operator**

Pelagos/TAP [ 11/2019 - 01/2020 ]

City: San Foca - Adriatic Sea

Passive Acoustic Monitoring (PAM) operator for the Trans Adriatic Pipeline (TAP) project. On-board acoustic monitoring (PAM) of both the presence of marine mammals and the levels of anthropogenic noise produced in the worksite during the pipeline construction.

Application of mitigation measures aimed at minimizing the impact of the activities on marine mammals.

Drafting of daily reports on monitoring activity, including marine mammal's acoustic detection and noise levels recorded (SPLrms, SPL peak-to-peak, SEL).

#### **EDUCATION AND TRAINING**

Workshop for the collection of data on cetaceans in the Pelagos Sanctuary

Cetacean Sanctuary Research (CSR) - Tethys Research Institute [ 10/2022 ]

PASSIVE ACOUSTIC MONITORING and PAMGUARD TRAINING Intelligent Ocean Training and Consultancy Services [2021]

BOEM PROTECTED SPECIES OBSERVER (PSO) Seiche Training [ 2020 ]

JNCC MARINE MAMMAL OBSERVER (MMO) Seiche Training [ 2020 ]

#### FOET (Further Offshore Emergency Training including HUET e EBS)

Centro Formazione Offshore (OPITO)

City: Ravenna Country: Italy

#### MS Evolution of Animal and Human Behavior (LM-60)

Turin University [ 2019 ]

Address: Via Verdi, 8, 10124 Torino (Italy) Final grade: 110/110 cum laude

*Thesis title: "*Annual acoustic presence of fin (*Balaenoptera physalus*) and blue (*Balaenoptera musculus*) whale in Kongsfjorden, Svalbard islands, and co-occurrence with anthropogenic activity"

#### **Curricular Internship**

**CNR-IAS** [ 07/2019 - 08/2019 ]

City: Capo Granitola (TP)

The aim of the internship was to improve the knowledge about ecology and bioacoustics of marine mammals which inhabit the arctic ecosystem, with focus on the acoustic analysis of mysticetes vocalization in long temporal series of acoustic data.

#### BS in Biological Science (L-13)

Sapienza University of Rome [ 2015 ]

Address: Piazzale Aldo Moro, 5, 00185 Rome (Italy) Final grade: 110/110 cum laude

#### LANGUAGE SKILLS

Mother tongue(s): Italian

Other language(s):

#### English

LISTENING C1 READING C1 WRITING C1 SPOKEN PRODUCTION C1 SPOKEN INTERACTION C1

Levels: A1 and A2: Basic user; B1 and B2: Independent user; C1 and C2: Proficient user

#### **DIGITAL SKILLS**

Logger 2010 / Office Package / Qgis mapping software / R, RStudio

#### Software for Acoustic Analysis

PamGuard / SeaPro / iZotope RX / Raven / Ishmael / Avisoft Lab PRO

#### **PUBLICATIONS**

The acoustic ecology of wide-ranging cetaceans: the effect of the interactions with the surrounding environment in sound expression

[2023]

Pace, D.S., **Pedrazzi, G.**, D'Amario, I., Troccoli, A., Giacomini, G., Pavan, G., Ventura, D., Casoli, E., Ardizzone, G., & Papale, E. *Submitted*.

Potential signature whistles identified in groups of inner Mediterranean sub-population of longfinned pilot whales (Globicephala melas)

[2023]

Antilli, F., Lanfredi, C., **Pedrazzi, G.**, Airoldi, S., & Pace, D.S. Poster Contribution at **34th Conference of European Cetacean Society.** 

Male Sperm Whales' (Physeter macrocephalus) foraging activity in the Western Ligurian Sea (NW Mediterranean Sea)

[2023]

Comple, V., Lanfredi, C., **Pedrazzi, G.**, Airoldi, S., & Pace, D.S. Poster Contribution at **34th Conference of European Cetacean Society.** 

Whistles and bray-call variability in a Mediterranean bottlenose dolphin population: the effect of the context variables

[2023]

**Pedrazzi G.**, Troccoli A., Tumino C., D'Amario I., Silvestri M., Giacomini G., & Pace D.S. Poster Contribution at 34th Conference of European Cetacean Society.

Alternative migration strategies of fin whale in Svalbard Islands (Norway) revealed by passive acoustics

[2023]

Papale, E., Pelagatti, M., Pedrazzi, G., Buscaino, G. Poster Contribution at 34th Conference of European Cetacean Society.

## Fin whales in a changing sea: acoustic presence in relation to sea surface temperature (Svalbard Islands, Norway)

[2023]

Pelagatti, M., Papale, E, **Pedrazzi, G**., Buscaino, G. Poster Contribution at 1st Conference of Conservation Biology per ECR by Society of Conservation Biology.

Occurrence and patterns of fin whale songs reveal alternative migration strategies in Svalbard Islands, Norway

[2023]

Papale, E., Pelagatti, M., Pedrazzi, G., & Buscaino, G. Scientific Reports, 13, 4436.

First Report of Epimeletic and acoustic behavior in Mediterranean common bottlenose dolphins (Tursiops truncatus) carrying dead calves.

[2022]

Pedrazzi, G., Giacomini, G., & Pace, D. S. Biology, 11(2), 337.

### Bray-Call sequences in the Mediterranean common bottlenose dolphin (Tursiops truncatus) acoustic repertoire.

[2022]

Pace, D. S., Tumino, C., Silvestri, M., Giacomini, G., **Pedrazzi, G.**, Pavan, G., Papale, E., Ceraulo, M., Buscaino, G., & Ardizzone, G. Biology, 11(3), 367.

### Determinants of variability in signature whistles of the Mediterranean common bottlenose dolphin.

[2022]

La Manna, G., Rako-Gospić, N., Pace, D.S., Bonizzoni, S., Di Iorio, L., Polimeno, L., Perretti, F., Ronchetti, F., Giacomini, G., Pavan, G., **Pedrazzi, G.**, Labach, H., & Ceccherelli, G. Scientific Reports, 12, 6980.

# Resources and population traits modulate the association patterns in the common bottlenose dolphin living nearby the Tiber river estuary (Mediterranean Sea).

[2022]

Pace, D.S., Ferri, S., Giacomini, G., Di Marco, C., Papale, E., Silvestri, M., **Pedrazzi, G.,** Ventura, D., Casoli, E., & Ardizzone, G. Frontiers in Marine Science, 9:935235.

#### DRIVING LICENCE

Driving Licence: B

#### VOLUNTEERING

#### Marine Mammal Observer (MMO)

[NPO Association "Accademia del Leviatano", 05/2019]

Voluntary experience as part of the project "FLT MED Monitoring Network" aimed at monitoring marine mammals, sea turtles, and other big marine species and main anthropogenic disturbances (marine traffic and marine litter), using ferries as observation's platforms.

*In compliance with the Italian Legislative Decree no. 196 dated 30/06/2003, I hereby authorize the recipient of this document to use and process my personal details for the purpose of recruiting and selecting staff and I confirm to be informed of my rights in accordance to art. 7 of the above mentioned decree.* 

Rome, 15/12/2023

F.to Giulia Pedrazzi