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ABOUT ME

I am a Ph.D. student at the University of Bologna, specializing in VET/05 Infectious Diseases of Domestic Animals. My main interests lie in bioinformatics and biostatistics, with a focus on genome structural evolution. I am highly motivated to further develop my skills in genomics and bioinformatics throughout my doctoral studies, aiming to apply these tools in life sciences research.

WORK EXPERIENCE

Master Intern

Laboratory of Viral Metagenomics, Rega Institute, KU Leuven [03/2022 - 09/2022]

City: Leuven | Country: Belgium

Project's aim: Metagenomics analyses on the virome of blackfly and its correlation with a severe type of Onchocerciasis-Associated Epilepsy (OAE) named Nodding Syndrome.

Applied Techniques:

- 1. Processing of samples with the NetoVIR protocol for viral purification (nuclease treatment, viral genome extraction, random amplification, library preparation, submitting samples for sequencing).
- 2. Bioinformatic analysis on shotgun metagenomic using UNIX/Linux operating systems on an HPC cluster (trimming, mapping, assembly, taxonomic identification).
- 3. Biostatistics and ecological analysis using R/R studio software.
- 4. Construction of phylogenetic trees (IQtree, MegaX, R).

Bachelor Intern

University of Bayreuth [08/2020 – 11/2020]

City: Bayreuth | **Country:** Germany

Project's aim: Detecting the diversity of viruses in mosquitoes (Diptera: Culicidae) through data mining.

Applied Techniques:

1. Biostatistics and modelling using R/Rstudio software.

Young apprenticeship programme

ARPA Puglia [08/2014 – 06/2016]

City: Lecce | Country: Italy

Microbiology quality control tests carried out on the city's waste water.

Applied Techniques:

- 1. Acute Toxicity Test with the planktonic crustacean Daphnia magna
- 2. Identification and counting methods of phytoplankton (optical microscopy).

EDUCATION AND TRAINING

Industrial Ph.D. Candidate in Future Earth, Climate Change and Societal Challenges

Alma Mater Studiorum - Università di Bologna [11/2023 – Current]

City: Bologna | Country: Italy | Level in EQF: EQF level 8

Industrial PhD in collaboration between the Italian Local Health Authority (AUSL) of Romagna and the Istituto Zooprofilattico Sperimentale della Lombardia e dell'Emilia Romagna, focusing on "Climate change and health emergencies at the human/animal/environment interface" with a one health approach to syndromic surveillance and diagnostics.

Una Europa One Health Summer School 2024

University of Helsinki [24/06/2024 – 28/06/2024]

City: Lammi Biological Station | Country: Finland

Topics Discussed: History and Principles of On Health; Human Medicine and One Health; AMR, Authorities, Surveillance; Vector-Borne Diseases; Environmental Health; Pests and Biosafety; Animal Welfare; Food Production and Planetary Health; Visit to Saari Veterinary Hospital; Placement of rodent traps.

One Health Winter School: Food Systems in the Anthropocene

Alma Mater Studiorum - University of Bologna [12/2023]

City: Bertinoro | Country: Italy

Topics Discussed: Food Production and risk of Zoonoses; Food Production, Migration and Farm Workers Health; Susteinable yet Highly Productive Agriculture

Master's Degree in Biodiversity and Evolution - Genomics and Evolution Curriculum

Alma Mater Studiorum - University of Bologna [10/2020 - 07/2023]

City: Bologna | Country: Italy | Final grade: 110/110 and honours | Level in EQF: EQF level 7 | Type of credits: CFU | Number of credits: 120 | Thesis: Analyses on the virome of blackfly (Diptera: Simuliidae) and its relation to a severe type of onchocerciasis-associated epilepsy (OAE) named nodding syndrome.

24th Bologna Winter School - Bioinformatics and Deep learning for biodata analysis

Alma Mater Studiorum - University of Bologna [14/02/2023 - 27/02/2023]

City: Bologna | Country: Italy

Topics Discussed: Applications of Machine Learning to analysis and prediction of proteins; Deep Learning in Science; Decoding the language of life through protein language models.

Bachelor's Degree in Biological Sciences

Alma Mater Studiorum - Università di Bologna [08/2017 – 12/2020]

City: Bologna | Country: Italy | Final grade: 104/110 | Level in EQF: EQF level 6 | Type of credits: CFU | Number of credits: 180 | Thesis: Detecting the diversity of viruses in mosquitoes (Diptera: Culicidae) through data mining.

TEACHING SUPPORT ACTIVITIES

[27/09/2024]

Collaborator in the Organization of the European Researchers' Night - Faenza, University of Bologna

DIGITAL SKILLS

Operating Systems and Virtual Machines

• Windows, Linux, Virtual Box

Programming Languages

• Python, R, Bash

Phylogenetic Tools

• MEGA X, Mr. Bayes, IQ-TREE

VOLUNTEERING

[03/2023 – Current]

Italian Red Cross volunteer

[2017 - Current]

Blood and bone marrow donor

Onlus - AFS Intercultura Education and training of incoming exchange students.

COMMUNICATION AND INTERPERSONAL SKILLS

Languages skills Italian: Mother Tongue

English: C1

Portuguese: B2

Soft skills Communication and interpersonal skill acquired during my MSc, BSc and Erasmus interneships:

- Pitching
- Critical thinking
- · Problem solving
- · Decision-making ability
- · Stress management
- Social intelligence
- Flexibility

COURSES AND CERTIFICATES

License to practice as a Biologist (Section A) during the 1st Session of 2024

Certificates of Courses Completed During my Academic Career

- Data visualization for dissemination
- Linux Introduction, Linux tools, Linux scripting infosession, Linux for HPC
- Python for data science, Scientific Python
- HPC Introduction
- Introduction to R

CONFERENCES AND SEMINARS

[11/10/2024] NH Collection Milano CityLife, Milan, Italy

Seegene Event. Syndromic GI Seminar: Excellence of Multiplex MDx test on Gastro Infection

[18/09/2024 – 20/09/2024] Molecular Biotechnology Center - University of Turin, Italy

INF-ACT IV RN2 Meeting

[08/09/2024 - 11/09/2024] University of Pavia, Italy

52nd National Congress of the Italia Society of Microbiology (SIM)

[27/04/2024 – 30/04/2024] Barcellona, Spain

34th European Congress of Clinical Microbiology & Infectious Diseases (ESCMID)

[22/02/2024] Aula Magna di Anatomia Comparata, University of Bologna, Italy

Symposium of the One Health Artificial Intelligence Research Hub (OHAI)

[02/11/2023 – 03/11/2023] Aula Magna Ex Santa Lucia, University of Bologna, Italy

International One Health Congress "From Eve's snake to molecular dogs"

[06/05/2022] Rega Institute, KU Leuven, Belgium.

Belgian Arbovirus Day 2022

[04/03/2020 – 05/03/2020] Iwalewahaus, Universität Bayreuth, Germany.

Kick-off meeting "DiMoC - Diversity components in mosquito-borne diseases in face of Climate Change"

PUBLICATIONS

Journal Article: Isolation and Genomic Analysis of a Case of Staphylococcus argenteus ST2250 Related to Sepsis in Italy

Gatti G., (...), Ingletto L., Scagliarini A., Sambri V., Cricca M. (2024). Microorganisms.

Journal Article: Cameroonian blackflies (Diptera: Simuliidae) harbour a plethora of (RNA) viruses

Coninck L. De, Hadermann A., Ingletto L., (...), Matthijnssens J. (2024). Virus Evolution.

Journal Article: Advancing West Nile Virus monitoring through Whole Genome Sequencing: insights from One Health genomic surveillance in Romagna (Italy) This paper is still under peer review.

Brandolini M., De Pascali A.M., Zaghi I., Ingletto L., (...), Sambri V. (2024). One Health.

Poster Presentation: MALDI-TOF MS identification of ticks in East Africa: a focus on Malawi

Ingletto L., (...), Maioli G., De Pascali A.M., Sambri V., Scagliarini S., Maioli G. (2024)

Poster Presentation: Detection of Borrelia burgdorferi sensu latu in off-season questing ticks: Lyme-carrying ticks live longer and spread farther.

De Pascali A.M., (...), Ingletto L., Colosimo C., Cricca M., Scagliarini A., Sambri V. (2024)

Poster Presentation: The data when tortured, speaks: the FUO's whispering

Scagliarini A., Frassineti V., Ingletto L., (...), Sambri V. (2024)

Poster Presentation: Phylogenomic characterisation of Monkeypox virus strains isolated in Emilia Romagna (Italy) during the 2022 epidemic: new insights for different lineages co-circulation

De Pascali A.M., (...), Ingletto L., Cricca M., Sambri V., Scagliarini A. (2024)

PRIVACY

Personal data

I hereby authorize the use of my personal data in accordance to the GDPR 679/16 - "European regulation on the protection of personal data".

Bologna, 15/10/2024

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