



Andrea
Vannini

WORK EXPERIENCE

01/04/2019 – CURRENT – Pisa, Italy

Software engineer

The BioRobotics Institute of Sant'Anna School of Advanced Studies

During my employment for the biorobotics laboratory I have developed the vision software for drones, for the search and interception of a suspended objects.

Developed a communication systems between drones on wifi networks, for the coordinated flight of several drones in the same area.

I supervised and maintained both software and hardware the laboratory computers.

I have collaborated with various contributions to the following projects:

- MBZIRC Mohamed Bin Zayed International Robotics Challenge
- SMASH: Smart Machine for Agricultural Solutions Hightech
- FID-U4E (Smart Factory -- Unity 4 Efficiency) Fabbrica Intelligente Diffusa
- InGene: Development and application of an integrated, multiparametric system for early genetic diagnosis and personalized treatments in children and adults with neuromuscular diseases
- AUTOMA: a wearable device to assess the upper limb muscular activity in patients with neuromuscular disorders
- INGENE 2,0 Development and application of an integrated, multiparametric system for early genetic diagnosis and personalized treatments in children and adults with neuromuscular diseases
- National Geographic UAVIMALS: Unmanned Aerial Vehicle Integrated with Micro Airborne Laser Scanner
- VIRMA : Smart agriculture droneusing heterogeneous platforms and AI techniques
- 2022 IEEE Autonomous Unmanned Aerial Vehicles (UAV) Competition: A competition where autonomous drones actively track one of several ground robots in a miniature city

EDUCATION AND TRAINING

20/12/2010 – Siena , Italy

SCIENZA E TEORIA DELL'INFORMATICA 26 - Classe delle lauree in scienze e tecnologie informatiche

Università degli Studi di SIENA Facoltà di Scienze Matematiche Fisiche e Naturali, Siena (Italia)

Address via Banchi di Sotto 55, Siena , Italy | **Website** <https://www.unisi.it/>

LANGUAGE SKILLS

MOTHER TONGUE(S): Italian

OTHER LANGUAGE(S):

English

Listening
C1

Reading
C1

**Spoken
production**
B1

**Spoken
interaction**
B1

Writing
B2

DIGITAL SKILLS

My Digital Skills

Machine Learning and Deep Learning frameworks Tensorflow Keras PyTorch / Python / Linux / C++ / C / Microsoft Office / LaTeX / Machine Learning / Computer Vision / OpenCv / Proficient in Python Java Javascript C C++ and some knowledge of Matlab / Parallel Programming (CUDA OpenMP) / Robotic Operative System (ROS) / ROS Gazebo

DRIVING LICENCE

- **Driving Licence: A**
- **Driving Licence: B**

BLS - BASIC LIFE SUPPORT DEFIBRILLATION

17/11/2020 – 17/11/2022

- **BLS - Basic Life Support Defibrillation**

Cardiopulmonary resuscitation course and use of the semi-automatic defibrillator for all age groups for non-professional personnel

27/09/2022 – 27/09/2024

- **BLS - Basic Life Support Defibrillation**