ALESSANDRO FUSCO

Via Saffi 32, Bologna, 40131 Italy
E-MAIL alessandro.fusco3@studio.unibo.it
WEB https://afus.co/
PHONE +39 388 1617872

https://afus.co

EDUCATION

Bologna, Italy **University Of Bologna** **Fall 2017 (planned)**

- B.S.E in Computer Engineering. Weighted Average 28.5/30. Converted GPA: 3,8/4

Las Palmas, Spain **University Of Las Palmas de Gran Canaria** **Spring 2017**

- Erasmus Program. Weighted Average 29/30
- Coursework in Spanish

Online **Coursera & EdX**

- Stanford cs231n (2017): Convolutional neural networks for image recognition
- Stanford cs229 (2015): Introduction to ML, data mining, and statistical pattern recognition.
- Princeton Algorithms, pt II (2014): graph-processing algorithms and string processing algorithms.
- Princeton Algorithms, pt I (2013): fundamental data types and algorithms, with emphasis on applications and scientific performance analysis of Java implementations.
- Harvard cs50x (2012): Introduction to computer science with coursework taught in C.

Bologna, Italy **Liceo Scientifico A. Righi** **Summer 2014**

- Italian scientific high school diploma

Phoenix, Arizona **Shadow Mountain High School** **Fall 2011 – Spring 2012**

- American high school diploma
- Year-long abroad experience in U.S.A

AREAS OF INTEREST

I am currently working on my bachelor thesis, titled “Use of Deep Convolutional Neural Networks for the Improvement of Confidence Measures of Stereo-Vision Algorithms” under the supervision of professor Stefano Mattoccia of University Of Bologna.

I am interested in Artificial Intelligence and Machine Learning, which will be the main subjects of my future studies, but my curiosity pushed me to explore many other technological fields such as distributed applications and cryptography.

I am also involved in the local startup scene and I have been working on many side projects, which taught me (aside from technical and development skills) the dynamics of team working, project management and entrepreneurship.

EXPERIENCE

External Brand Consultant **Fondazione Golinelli, Bologna, Italy** **2016**

- Participated to the Icaro Project, an "Entrepreneurship Gym"
- Passed a strict selection of 33 students out of ~200.
- Studied and applied the Stanford-created "design-thinking" methodology to real-world business problems.
- Worked on the redefinition of a communication strategy to improve the spread of the brand identity for Theras Group, a successful Italian startup in the medical field.

FullStack Developer **CenaRandom, Bologna, Italy** **2015-2016**

- Created a social eating startup as a result of a Google-organized Startup Weekend Event.
- Successfully defined the business model and customer validation.
- Developed the MVP based on RESTful APIs, based on a Node.js + Express.js + MongoDB stack.

System Administrator **ArtBit, Bologna, Italy** **2012-2013**

- Configuration and management of local network for a small (5 people) business.
- Setup and management of a LAMP based web server, DNS and email server.

Web Developer **Liceo Scientifico A. Righi, Bologna** **2009-2012**

- Helped developing the high school's website.
- Successfully redesigned the entire frontend
- Developed custom Joomla! PHP plugins.
- Worked in a team of 5 students under the supervision of the school IT department.

(Some) PERSONAL PROJECTS

- **Matrix and complex number calculator** - Implemented my own multi-threaded linear algebra library that supports multi-dimensional matrices of big numbers, either real or complex. C++ unit-tested with gtest.
- **Advanced Windows File Manager** - Project for a Software Engineering university exam. Application that allows to schedule and execute complex filesystem searches and operations. C#
- **Radio copyright infringement monitor**. A program that monitors a periodic web radio transmission and sends a notification when a key-word from a given list is identified. Built on a Raspberry Pi using cronjobs and a speech recognition API. Bash + Java.
- **Musical Artificial Composer**. Project (still in early stage) that aims to shorten the distance between human musical inventive and mathematics, through pattern recognition and unsupervised machine learning. Python and Tensorflow.
- **Eudyptula Challenge**. A series of programming exercise for learning the development of Linux kernel modules. C. http://eudyptula-challenge.org

SKILLS, LANGUAGES AND TECHNOLOGIES

Programming Languages	C, C++, Java, C#, MATLAB, Server-side JavaScript (node.js), Bash scripting.
Frameworks	Tensorflow (python), OpenCV (python and C++), .NET 4 (C#)
Web Application tools	JavaScript (including some popular libraries and frameworks such as jQuery and Angular.js), HTML5, CSS3, XML.
Database Skills	MySQL, IBM DB2, MongoDB.
Platforms	GNU Linux, OS X, Microsoft Windows
Spoken Languages	English (Proficient, IELTS Score: 7.5), Italian (Native), Spanish (Intermediate)