

BENOIT GUERAND

benoit@guerand.net ◇ +33.6.48.73.26.07 ◇ linkedin.com/in/benoit-guerand

EDUCATION

Karlsruhe Institute of Technology

Dual Degree - MSc. in Mechanical Engineering

Coursework : Data analysis for engineers, Computational intelligence, Deep learning.

Karlsruhe, DE

Oct 2020 - Sep 2022

Arts & Métiers ParisTech

Dual Degree - MSc. in General Engineering

Coursework : Mathematics, Object-Oriented Programming, Statistics

Metz, FR

Sep 2017 - Sep 2022

Classes Préparatoires aux Grandes Écoles, Lycée Gustave Eiffel

National competitive exam to elite French engineering schools (National Rank: top 15%)

Coursework : Mathematics, Physics, Computer Science

Cachan, FR

Sep 2015 - Jun 2017

PROFESSIONAL EXPERIENCE

Professional athlete - Water polo

Primera Division

Barcelona, ESP

Sep 2023 - now

Business & System Architects

Project Manager in data science

Barcelona, ESP

Sep 2022 - Aug 2023

- Designed & implemented data reports in an ERP leading to 25% increase in customer retention
- Developed data visualizations for the C-level executives using Python, VBA, PowerQuery and APIs

Mercedes-Benz Tech Motion

Master thesis in AI - computer vision

Stuttgart, DE

Oct 2021 - May 2022

- Implemented an object detection algorithm on Mercedes-Benz's production lines to detect the open flaps states
- Reached 98% accuracy using AI deep learning algorithm RetinaNet with Tensorflow, OpenCV & Python

Karlsruhe Institute of Technology

Working Student

Karlsruhe, DE

Aug 2020 - Dec 2020

- Coded tests and new models for a HPC and linear algebra library in C++ (ginkgo)
- Implemented solver and preconditioners

Arts & Métiers ParisTech - Karlsruhe Institute of Technology

Bachelor thesis in deep learning

Karlsruhe, DE

Dec 2019 - May 2020

- Coded basic DL architectures: RBF, DFF, DCN, CNN & used images and num. data with Keras & Scikit-learn
- Designed rules for industrial implementation (epoch nbr, batch size, ...) to improve accuracy by increments of 5%

CACEIS Crédit Agricole - financial services

Structured products - Pricing officer

Luxembourg, LU

Mar 2019 - Sep 2019

- Reduced error by 98% by optimizing workflow with VBA macros
- Valuated complex structured products using statistical algorithms such as MonteCarlo on various financial models

PUBLICATIONS

GUÉRAND B., SCHEER F., DEMETGÜL M., FLEISCHER J., Deep learning for the detection of open car flap states, Winter School of Computing Graphics 2022

LANGUAGES

Languages: French (Native), English (C1), German (C1), Spanish (B1)

Programming Languages: Python, C++, SQL, VBA, Matlab, Scilab, R

EXTRACURRICULAR ACTIVITIES

Professional & student athlete: Water-polo Goalkeeper: medalled in Spain, France & Germany