TANGUY MARSAULT

08/12/2002

Student at CentraleSupélec Saclay (Paris) in gap year



EXPERIENCES



07 81 97 64 22



tanguy.marsault02@gmail.com



Gif-Sur-Yvette, 91190, France

SKILLS

Physics

Quantum Mechanics Quantum Field Theory General relativity Condensed Matter Gauge theory Basics of string theory

Mathematics

Statistics Group theory Differential geometry

Programming

Python Basics of C++ ROOT

LANGUAGES

English C1 level - Fluent Spanish B2 level French-native speaker

QUALITIES

Fast learner
Curious & Enthusiastic
Creative
Efficient
Team Spirit

February 2023-Now

Intern in Particle Physics in the FTX group at DESY

Working on detector physics for the LEAP experiment. LEAP is an experiment which aims to produce a polarized electron beam using laser plasma acceleration. Working specifically on the calorimeter used to measure polarization. Supervised by PhD Louis Helary.

July 2022-December 2022

Intern in Particle Physics at CEA-Saclay, France

Probing the CP nature of the Yukawa coupling in the ttH analysis for the Atlas experiment. Working with several PhD students, Post-Docs and permanent researchers, supervised by Frédéric Déliot and Matthias Saimpert.

Developped skills: QFT, group theory, data analysis, MC simulations

September 2021-June 2022

Teaching Assistant in Mathematics at CentraleSupélec

Reinforcement classes with foreign students in mathematics at CentraleSupélec, Université Paris-Saclay, First university in mathematics worldwide according to the Shanghai ranking

April 2020-September 2022 CentraleSupélec Chess Club President & Coach

20 members, weekly training sessions, online training and tournaments with

Leader of the competition team for the "Ligue Ingénieure Française d'Echecs"

(LIFE)

Novembre 2022

Synchrotron beamline design

Design of a synchrotron beamline over a week with a team of 20 students supervised by PhD P.E. Janolin,, PhD Y. Dabin and PhD S. Sharma

EDUCATION

2021-Now

Second year of engineering at CentraleSupélec

School of engineering, member of Université Paris-Saclay Topics : Advanced QM, Particle physics, GR, Optimization

Grade of 17/20

2020-2021

First year of engineering at CentraleSupélec

School of engineering, member of Université Paris-Saclay Topics: Measure theory, PDE, Statistics, EM, QM

2018-2020

Lycée Stanislas, Paris

CPGE (Classe préparatoire aux grandes écoles) in mathematics and physics

INTERESTS

- Chess: Player & Teacher (DIFFE certified & 1980 FIDE rating)
- Sports: Table tennis, badminton, tennis, running
- Other: Theoretical physics (quantum field theory), New technologies (quantum engineering), Artificial Intelligence