MARIN LAUBER

Born 28^{th} August $1994 \diamond$ Swiss \diamond Living in Southampton, UK Contact: $(0044) \cdot 0747 \cdot 8278 \cdot 616 \diamond$ M.Lauber@soton.ac.uk

EDUCATION

Integrated PhD in Next Generation Computational Modelling

September 2018 - Present

University of Southampton, Maritime Engineering Group

Title: Flexible Sheets in Turbulent Flows

Taught Year: Lectures in Simulation and Modelling, Numerical Methods, Statistical Analysis, Computational Methods, Advanced Finite-Element Analysis, Partial Differential Equations, Integral Transform Methods.

Experience Gained: Developpement of a Finite-volume Cartesian grid solver (Fortran) to simulate thin flexible sheets/membrane in an unsteady flow. Development of a coupling with an open-source Finite-Element framework.

MSc in Maritime Computational Fluid Dynamics

September 2017 - September 2018

University of Southampton

Thesis: Acquisition of Manoeuvring Characteristics of Ships using RANS CFD

Overall grade: First Class. Lectures in: Turbulence, Computational Fluid Dynamics, Aeroelasticity, Ship Resistance and Propulsion, Finite-ElementAnalysis, Hydrodynamics, Structures in Fluid.

BEng in Yacht & Powercraft Design

September 2014 - June 2017

Southampton Solent University

Final Year Project: Preliminary Design of a Mini 6.50 with a Foil CFD Investigation

Award: The 2017 RINA - BAE Systems Student Naval Architect Award - Final Year Project

Overall grade: First Class with Honours

EXPERIENCE

Teaching Assistant

University of Southampton

September 2019 - Present

Southampton, UK

· Teaching asistance for lectures/labs in Marine Hydrodynamics, Programming (Python), Computational fluid dynamics (Fluent).

Design of a 6m eletric boat

September 2020 - January 2021

 $A\,Composite.ch$

Aubonne, Switzerland

· Design of a 6m eletric boat aimed at a rental company in Geneva. Hull design, structural and stability assessment for registration, design of mould for CNC milling.

Shore Team during the 2015 C-Class world championship

September 2015

Team Norgador

Geneva. Switzerland

· The work performed ranged from lamination to rigging, covering all aspects of high-performance sailing yacht maintenance.

Sailing Instructor

June 2010 - September 2016

Société Nautique Rolloise

Rolle, Switzerland

· Sailing instructor during summer camps (8 weeks) with children aged 8 to 18.

SKILLS

Languages French (native), English (proficient user), German (independent user)

Computer Languages Python, Fortran (OpenMP, MPI), C, Matlab

Modelling Autocad, Rhinoceros 5, Maxsurf (modeller, stability, seakeeping,

structure), Solidworks

CFD Star-CCM+, Ansys Fluent, Ansys CFX, OpenFOAM

FEA ABAQUS, Ansys APDL

Experimental Towing Tank (resistance, seakeeping)
Other HullScant (ISO 12215), WinDesign (VPP)

ADDITIONAL INFORMATIONS

Interests Sailing, kite surfing, skiing

Driving Licence A1, B, Sailing & motor yachts (Swiss)