PROTOPAPADAKIS Georgios

Mechanical Engineer with a Research Master in Fluid Dynamics

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Thessaloniki, 54636, Greece

EXPERIENCE

- 2020 - Present,
  HECARRUS, a Horizon 2020 / Clean Sky 2 project
  Hybrid ElectriC smAll commuteR aiRcraft conceptUal deSign
  - ⋆ Qualitative assessment of hybrid-electric aircraft concepts
  - ⋆ Numerical methods and tools for gas turbine modelling
- 2018 - 2019,
  Code development for the computation of grid sensitivities through the adjoint approach for gradient based optimization
  Master Thesis at von Karman Institute
  - ⋆ Code development in C++
- 2018 - 2018,
  Conceptual prediction of noise level of intercooled - recuperated aero-engines
  Master Thesis at Aristotle University of Thessaloniki
- 2017 - 2017,
  Internship at Von Karman Institute,
  Fluid dynamics and Thermodynamics.
  - ⋆ Thermodynamic cycle calculations
- 2016 - 2018,
  Aristotle Space and Aeronautics Team,
  Founding member of Rocketry department,
  Specialized in Propulsion
  - ⋆ Aerodynamic and thermodynamic simulations

EDUCATION

PhD Candidate

Laboratory of Fluid Mechanics and Turbomachinery, Mechanical Engineering Department, Aristotle University of Thessaloniki

2020 - Present

- **PhD Title:** Digital Twins and their application in turbomachinery and/or aeroengines for predictive maintenance

Post-Graduate Research Master in Fluid Dynamics

von Karman Institute for Fluid Dynamics, Belgium

2018 - 2019

- Option: Turbomachinary and propulsion

Degree in Mechanical Engineering

Aristotle University of Thessaloniki, Greece

2013 - 2018

- Option: Energy - Aeronautics and engines

STRENGTHS

Commitment | Motivation | Initiative | Critical mind | Curiosity | Team Work | Adaptability | Trustworthiness & Ethics

SKILLS

- Development of computation code for modelling and simulations
- Automatic optimization techniques
- Turbomachinery design, development and dimensioning

TOOLS

Engineer Tools

- ANSYS CFX/Fluent and Mechanical
- SolidWorks
- Matlab

Programming

- C++
- Python (basics)

Office

- MS Word, Power Point and Excel
- LaTeX

O.S.

- Linux, Windows

Others

- Git, CMake, Qt

INTERESTS

- Gas turbines development and optimization for the reduction of environmental impact
- Technological innovation in aeronautics and aerospace
- Travelling, hiking and landscape photography
- Practicing individual and team sports such as cycling and basketball

LANGUAGES

English ●●●●○

French ●●●●○

Greek ●●●●●