europass Curriculum vitae

PERSONAL INFORMATION

Gianluca Cocirla

Gender Male | Date of birth 5 July 1997 | Nationality Italian / Romanian

EXPERIENCES AND PROJECTS

February 2022 – November 2023

Postgraduate Fellowship

Centro Ricerca Aerospaziale Sapienza (CRAS) of La Sapienza, University of Rome

Postgraduate Fellowship focused on advanced statistical Eulerian multiphase modelling for Solid Rocket Motors for the VEGA launcher's performance evaluation.

February 2019 – December 2019

Sapienza Team Leader

MARGE – Melanoma Apoptosis Reduced Gravity Experiment

Team leader of the Sapienza student group for the 6th Mission Idea Contest (MIC).

- Organized, coordinated and supervised the team work.
- Conducted weekly team meetings and developed and implemented strategies and plans.
- Collaborated with the Laboratory of Cutaneous Physiopathology of the San Gallicano Dermatological Institute IRCCS.

EDUCATION AND TRAINING

November 2023 - Present

PhD in Aeronautical and Space Engineering

La Sapienza, University of Rome

- Analysis, validation and application of CFD numerical tools for wall heat flux and performances evaluation in Liquid Rocket Engine.
- Heat load management through thrust chamber active cooling techniques such as film cooling and mixture ratio bias.

September 2019 – January 2022

Master's Degree in Space and Astronautics Engineering

La Sapienza, University of Rome

Eulerian Modelling of Multiphase Flows in Solid Rocket Motors

110 with honors/110

September 2016 – July 2019

Bachelor's Degree in Aerospace Engineering

La Sapienza, University of Rome

Progetto e analisi di un sounding rocket basato su sistemi di propulsione ibridi

110 with honors/110

PERSONAL SKILLS AND COMPETENCES

Mother tongue: Italian

Other languages: English (Proficient)
Romanian (Basic)

Personal skills and competences:
- Excellent ability to work both in team and alone. Skills improved thanks to work and projects activities carried out at university.
- Attitude to punctuality and strong organizational skills acquired by managing daily activities during the years of studies and projects.
- Quick learner in new environments and good response to stressful situations.
- Highly motivated, strongly determined, perseverant, curious and competitive.

Technical skills and competences:
- Microsoft Windows and Linux OS user.
- Very good knowledge of MATLAB and FORTRAN programming languages.
- Basic knowledge of PYTHON programming language.
- Good knowledge of TECPLOT post-processing software.
- Excellent knowledge of NASA Chemical Equilibrium with Applications CEA software.

PUBLICATIONS

M. Grossi, **G. Cocirla**, D. Bianchi, B. Favini. Solid Rocket Motor Internal Ballistics Simulation Using Eulerian Multiphase Models. **Presented** at the 9th European Conference for Aeronautics and Space Sciences, Lille, France, 2022.

E. Vestito, M.G. Pancalli, G. Bagolan, **G. Cocirla**, F. Del Prete, A. Fabbrizi, P. Federici, E. Neri, A. Piergiacomo, M. Renda, F. Curianò, P. Marzioli, B. Bellei, D. Kovacs, M. Picardo, F. Santoni. Experimental investigation on the effect of microgravity and immunotherapy in melanoma cells: MARGE experiment. 71st International Astronautical Congress (IAC), CyberSpace edition, 2020.

G. Cocirla, G. Bagolan, F. Calidori, E. Colonna, F. Del Prete, A. Fabbrizi, P. Federici, R. Horshkov, P. Marzioli, E. Neri, M.G. Pancalli, A. Piergiacomo, M. Renda, E. Vestito. MARGE – Melanoma Apoptosis Reduced Gravity Experiment. **Presented** at the 6th Mission Idea Contest (MIC) for Achieving Sustainable Development Goal with Human Spaceflight, Tokyo, Japan, 2019.

Firma