

Special Issue

Computational Aerodynamic Modeling of Aerospace Vehicles

Message from the Guest Editors

This Special Issue covers recent computational efforts on simulation of aerospace vehicles including aircraft, rotorcraft, propeller driven vehicle, unmanned vehicle, projectile, and air drop configuration. The complex flow physics of these configurations pose significant challenges in CFD modeling. Some of these challenges include prediction of vortical flows and shock wave, rapid maneuvering aircraft with fast moving control surface, and interaction between propeller and wing, fluid and structure, boundary layer and shock wave. Additional topic of interest is the use of CFD tool in aircraft design and flight mechanics. The problem is the computational cost involved, particularly if this is viewed as a brute-force calculation of vehicle's aerodynamics through its flight envelope. To make progress in routinely using of CFD in aircraft design, methods based on sampling, model updating and system identification should be considered. **Advantages:**

- Open Access: Free access for reader
- High Visibility: indexed in ESCI, Scopus (CiteScore 1.23) and Inspec (IET).
- Rapid Publication: submission to first decision: 18 days; acceptance to publication: 6.3 days

Guest Editors

Dr. Mehdi Ghoreyshi

Senior Aerospace Engineer at US Air Force Academy, High Performance Computing Research Center, HQ USAFA/DFAN, 2354 Fairchild Dr, 6H148, United States Air Force Academy, Colorado, CO 80840, USA

Prof. Dr. Karl Jenkins

School of Aerospace, Transport and Manufacturing, Cranfield University, Cranfield MK43 0AL, UK

Deadline for manuscript submissions

closed (10 May 2018)



Aerospace

an Open Access Journal
by MDPI

Impact Factor 2.2
CiteScore 4.0



mdpi.com/si/10088

Aerospace
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
aerospace@mdpi.com

[mdpi.com/journal/
aerospace](https://mdpi.com/journal/aerospace)





Aerospace

an Open Access Journal
by MDPI

Impact Factor 2.2
CiteScore 4.0



[mdpi.com/journal/
aerospace](https://mdpi.com/journal/aerospace)



About the Journal

Message from the Editor-in-Chief

You are welcome to contribute a research article or a comprehensive review for consideration and publication in *Aerospace* (ISSN 2226-4310), an on-line, open access journal.

Aerospace adheres to rigorous peer-review as well as editorial processes and publishes high quality manuscripts that address both the fundamentals and applications of aeronautics and astronautics. Our goal is to enable rapid dissemination of high impact works to the scientific community.

Editor-in-Chief

Prof. Dr. Konstantinos Kontis
School of Engineering, University of Glasgow, James Watt Building
South, University Avenue, Glasgow G12 8QQ, Scotland, UK

Author Benefits

Open Access:

free for readers, with article processing charges (APC) paid by authors or their institutions.

High Visibility:

indexed within Scopus, SCIE (Web of Science), Inspec, Ei Compendex, and other databases.

Journal Rank:

JCR - Q2 (Engineering, Aerospace) / CiteScore - Q2
(Aerospace Engineering)