

Conference Theme: Embracing innovative development of oceans

2024 International Conference on Frontiers of Ocean Science and Technology

In order to implement the strategy of building China into a maritime power, promote innovation in China's marine science and technology and strengthen the development of first-class disciplines in marine science, the 2024 International Conference on Frontiers of Ocean Science and Technology (ICFOST), sponsored by the College of Meteorology and Oceanography, National University of Defense Technology, will be held in Changsha, China (Saint-Tropez Hotel Changsha) from November 22 to 24, 2024.

Call for papers

OS 1 Multi-scale Ocean Dynamic Processes

1. Ocean general circulation and air-sea interactions
2. Oceanic mesoscale and submesoscale processes
3. Surface waves, internal waves, turbulence and small-scale processes
4. Data assimilation and numerical forecast
5. Interpretation and application of ocean numerical forecasting products

OS 2 Ocean Environmental Data Analysis and Safety Support

1. Preprocessing and analysis of marine data
2. Standardization processing and evaluation of marine data
3. Storage and distribution of marine data
4. Surface-undersea reconstruction technology
5. Regional marine environmental phenomena
6. Marine environmental risk assessment
7. Marine disaster prevention and mitigation
8. Marine environment application platform

OS 3 Research on Marine Instruments and Equipment

1. Sensor technology
2. Data acquisition and processing technology
3. Underwater robotics technology
4. Marine instrumentation and equipment development
5. Marine environmental monitoring equipment

OS 4 Ocean Detection Technology

1. Ocean acoustic detection techniques
2. Ocean optical detection techniques
3. Ocean remote sensing technology
4. Ocean gravity and magnetic field detection techniques
5. Ocean chemical and biological detection techniques
6. Ocean detection platform, networks and data processing

OS 5 Artificial Intelligence Oceanography

1. Application of artificial intelligence in ocean feature identification
2. Application of artificial intelligence in ocean parameter prediction
3. Application of artificial intelligence in underwater acoustic target detection and recognition, source localization, parameter inversion, and acoustic communication
4. Application of artificial intelligence in ocean dynamic parameters estimation
5. Application of artificial intelligence in ocean big data mining

OS 6 Underwater Acoustics

1. Sound propagation in the ocean
2. Estimation and inversion of underwater acoustic environment parameters
3. Underwater Vector Sound Field
4. Underwater noise modelling and measurements
5. Reverberation in the Ocean
6. Target scattering
7. Geoacoustic inversion method
8. The seafloor-acoustic prediction model

OS 7 Underwater Acoustics Signal Processing

1. Underwater acoustics array signal processing
2. Underwater communication and networking
3. Underwater acoustic calibration, testing, facilities, and standards
4. Underwater target detection, classification, localization and tracking
5. Machine learning and applications to ocean acoustics

OS 8 Practice Oceanography

1. Marine exploration for engineering
2. Marine data engineering
3. Marine environmental governance
4. Marine antifouling and anticorrosion
5. Seawater desalination

OS 9 Ocean Remote Sensing

1. Ocean color remote sensing and its applications
2. Ocean thermal remote sensing and its applications
3. Ocean microwave remote sensing and its applications
4. Ocean LIDAR remote sensing and its applications

Special Session New Engineering Oriented Marine Education Practice

1. The new engineering oriented curriculum paradigm
2. The new engineering oriented courses reform
3. The new engineering oriented industry-education integration regime
4. The new engineering oriented teaching quality control architecture

More information: <https://icfost.net/cfp.html>

Publication

After a careful reviewing process, all accepted papers after proper registration and presentation, will be published in the IOP Conference Series: Journal of Physics: Conference Series (Online ISSN: 1742-6596; Print ISSN: 1742-6588), and will be submitted for Ei Compendex and Scopus. Excellent paper will be recommended to SCI journal publication.

ICFOST 2023 was held successfully in Changsha during October 13-15, 2023. ICFOST 2023 conference proceedings was online in IOP-JPCS and indexed by Ei Compendex and Scopus.

Submission Method

1. Full paper (Presentation+Publication)
 2. Abstract (Only Presentation)
- <https://icfost.net/submission.html>
Paper template: <https://icfost.net/Template.docx>

Important Date

Submission Deadline: November 10, 2024
Notification Date: November 20, 2024
Registration Deadline: November 30, 2024

Special Activity

The 1st "Smart Ocean" Innovation Competition
<https://icfost.net/competition.html>

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国防科技大学气象海洋学院
College of Meteorology and Oceanography of NUDT



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会议主题： 拥抱海洋 聚焦前沿

2024年海洋科技前沿国际会议

为落实建设海洋强国战略,促进我国海洋科学技术的创新发展,加强海洋科学一流学科专业建设,国防科技大学气象海洋学院将主办2024年海洋科技前沿国际会议。本会议拟于2024年11月22日-24日在湖南长沙圣爵菲斯酒店召开。

征稿主题

OS 1 多尺度海洋动力过程

1. 海洋环流与海气相互作用
2. 海洋中尺度及亚中尺度过程
3. 海浪、内波、湍流与中小尺度过程
4. 数据同化与数值预报
5. 海洋数值预报产品解释应用

OS 2 海洋环境资料处理和安全保障

1. 海洋资料的预处理与分析
2. 海洋资料的标准化处理与评估
3. 海洋资料的存储与分发
4. 海面水下重构技术
5. 区域海洋环境现象
6. 海洋环境风险评估
7. 海洋防灾减灾
8. 海洋环境应用平台

OS 3 海洋仪器设备研究

1. 传感器技术
2. 数据采集与处理技术
3. 水下机器人技术
4. 海洋仪器设备研制
5. 海洋环境监测设备

OS 4 海洋探测技术

1. 海洋声学探测技术
2. 海洋光学探测技术
3. 海洋遥感技术
4. 海洋重力、磁力场探测技术
5. 海洋化学、生物探测技术
6. 海洋观测平台、网络与信息处理

OS 5 人工智能海洋学

1. 人工智能在海洋特征识别中的应用
2. 人工智能在海洋参数预测中的应用
3. 人工智能在水声目标探测与识别、声源定位、参数反演及水声通信中的应用
4. 人工智能在海洋动力参数估算中的应用
5. 人工智能在海洋大数据挖掘中的应用

OS 6 水声学

1. 海洋中的声传播
2. 水声环境参数估计与反演
3. 水下矢量声场
4. 水下噪声建模和测量
5. 海洋中的混响
6. 目标散射
7. 地声反演法
8. 海底声学预测模型

OS 7 水声信号处理

1. 水声阵列信号处理
2. 水下通信与网络
3. 水声校准、测试、设施和标准
4. 水下目标检测、识别、定位与跟踪
5. 机器学习及其在海洋声学中的应用

OS 8 实践海洋学

1. 海洋工程探测
2. 海洋数据工程
3. 海洋环境治理
4. 海洋防污防腐
5. 海水淡化技术

OS 9 海洋遥感

1. 海洋水色遥感与应用
2. 海洋热红外遥感与应用
3. 海洋微波遥感与应用
4. 海洋激光雷达遥感与应用

特别专题 新工科海洋教学实践

1. 新工科人才培养模式
2. 新工科课程教学改革
3. 新工科产教融合机制
4. 新工科教学质量管理体系

更多信息: <https://icfost.net/cfp.html>

会议出版

ICFOST文章将出版到IOP-JPCS (Online ISSN: 1742-6596; Print ISSN: 1742-6588) 会议论文集, 并提交Ei核心、Scopus检索。文章作者将被邀请参会做口头报告。优秀文章将推荐至SCI期刊。
ICFOST 2023已于2023年10月13-15日在长沙成功召开。会议论文集已被IOP-IPCS收录, Ei核心, Scopus均已检索。

投稿方式

1. 全文 (口头报告+发表)
2. 摘要 (仅口头报告)

<https://icfost.net/submission.html>

文章模版: <https://icfost.net/Template.docx>

重要日期

投稿截止: November 10, 2024

通知日期: November 20, 2024

注册截止: November 30, 2024

特色活动

第一届“智慧海洋”创新大赛
报名详情:

<https://icfost.net/competition.html>

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