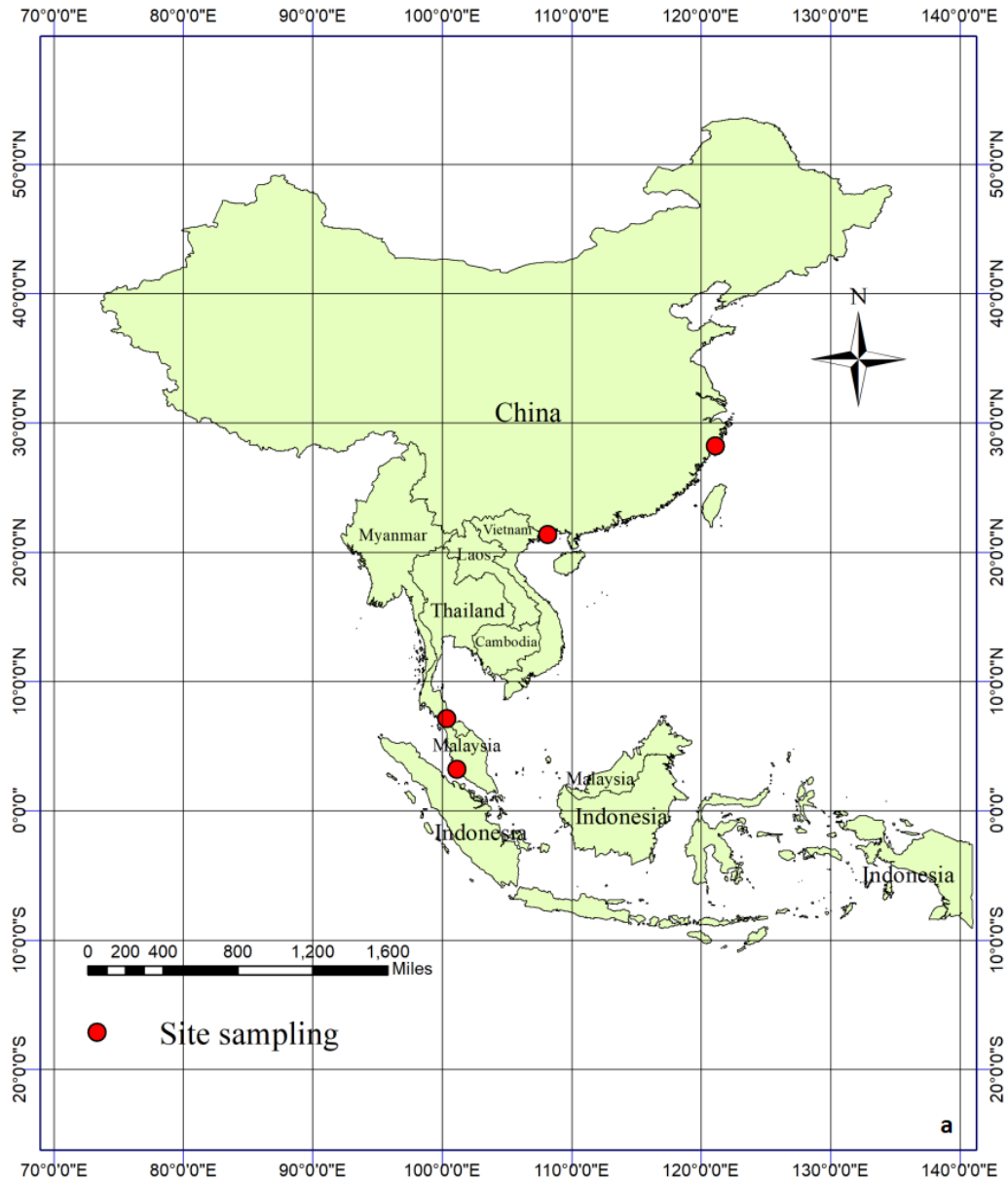
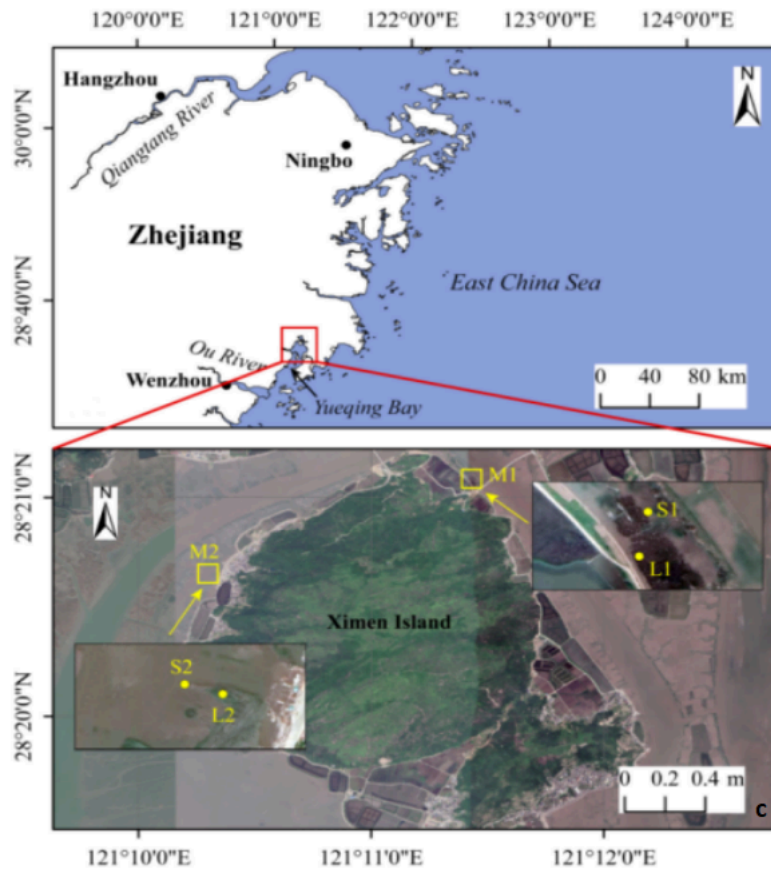
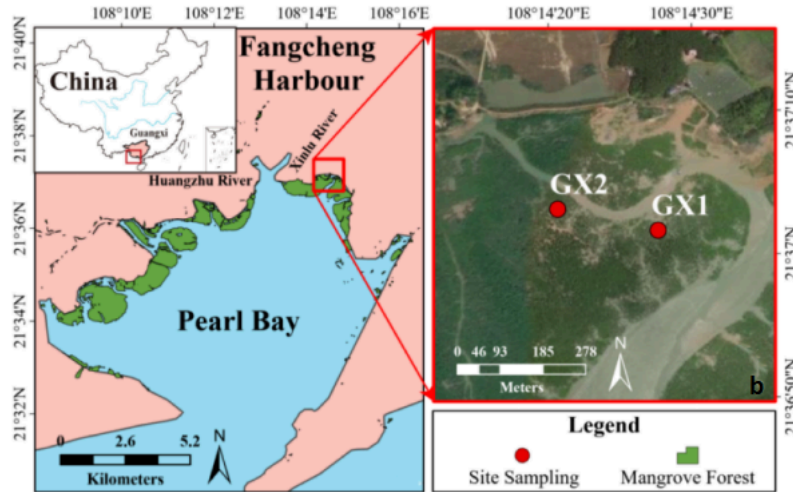


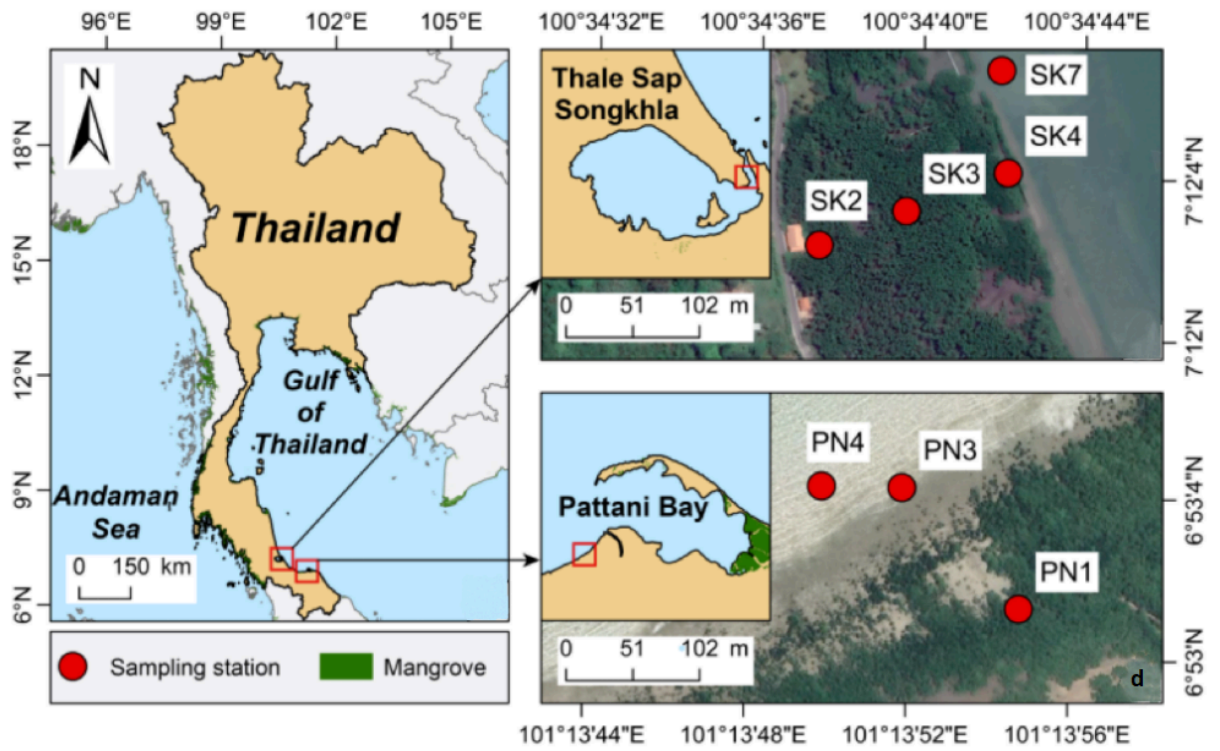
APPENDIX 1 MAPS



Map showing sampling points in China, Thailand and Malaysia



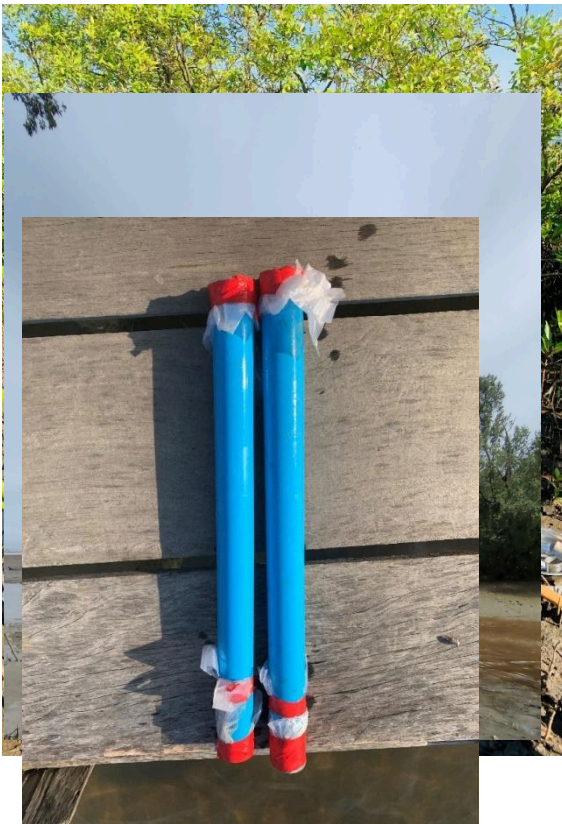
The locations of Fangcheng Harbor (pink), Pearl Bay (blue), and mangrove forests (green) surrounding Pearl Bay, southern China; (c) the Ximen Island mangrove area in the northern part of Yueqing Bay, Zhejiang Province, China



The study area in southern Thailand along the coast off the Gulf of Thailand

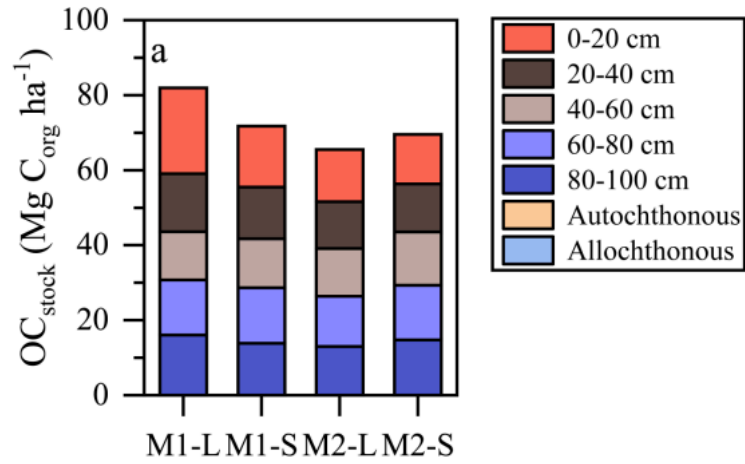
APPENDIX 2 SAMPLING PHOTOS



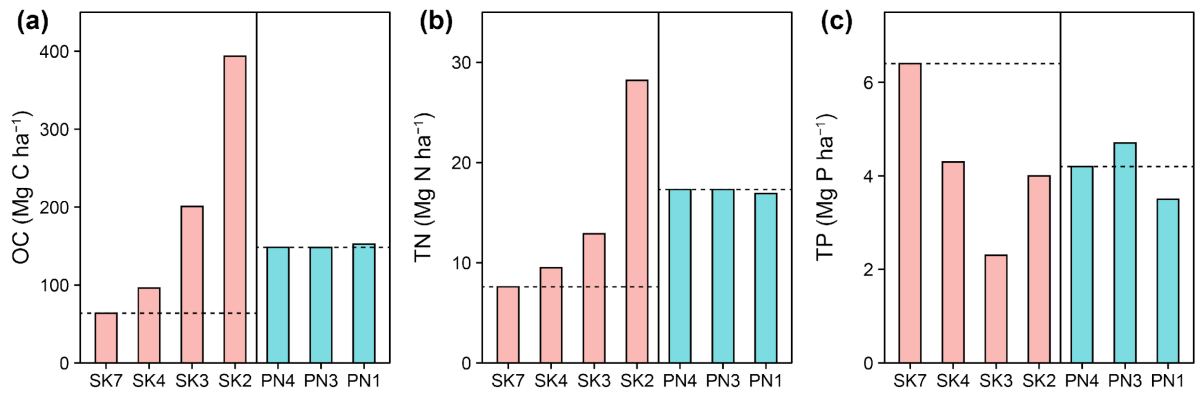


APPENDIX 3

RESULTS



Results showed highest OC stock in M1-L (old mangrove), followed by M1-S (salt marsh stand), M2-S (bare mudflat), and M2-L (young mangrove) (from Hu et al., 2022).



Spatial distributions of (a) SOC, (b) TN, and (c) TP stocks in the top 1 m of the soils in the sampling locations along Songkhla (SK) and Pattani (PN) mangrove forests (from Hu et al., 2024).

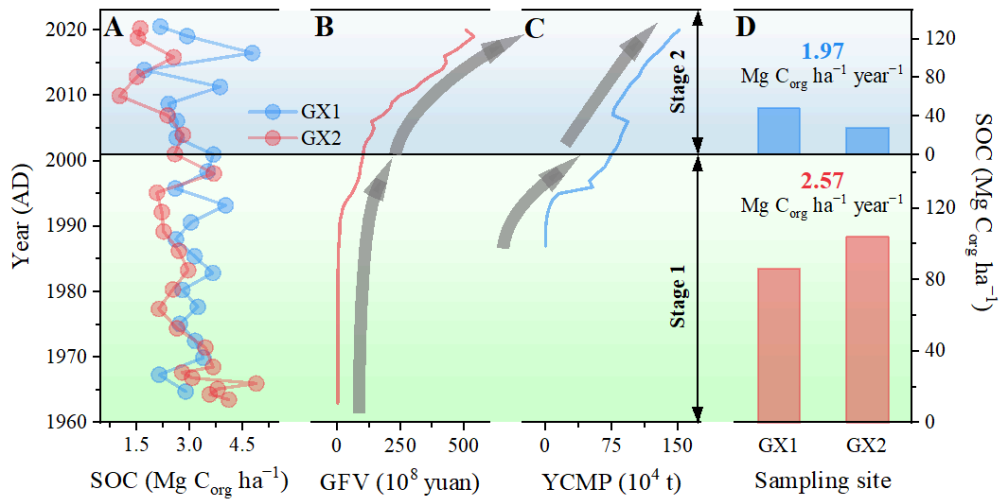
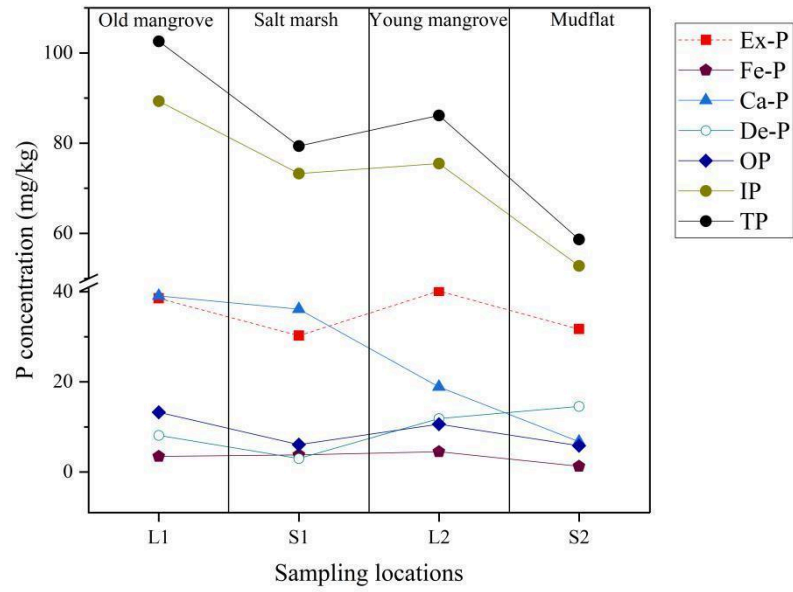
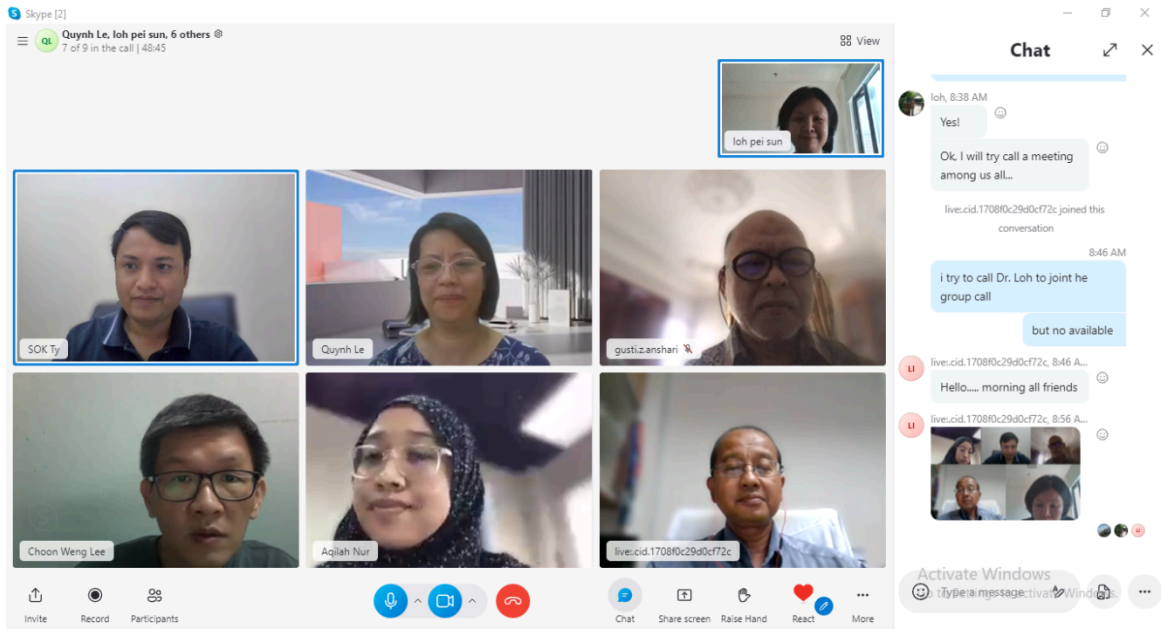


Figure showing decreasing trend of SOC from bottom toward surface along the GX1 and GX2 cores and overall higher carbon stock at the bottom portion compared to surface portion of sediments (from Guo et al., submitted), in accordance with increasing gross fishery value (GFV) and yield of cultured marine products (YCMP) in Guangxi (cited from 2022 Guangxi Statistical Yearbook, <http://tjj.gxzf.gov.cn/tjsj/tjnj/material/tjnj20200415/2022/zk/indexch.htm>).



Sedimentary P species in the surface sediments (0-2 cm) of the Ximen Island mangrove ecosystems showing highest P in old mangrove, followed by young mangrove, salt marsh stand, and mudflat (from You et al., 2022).



APPENDIX 5
2023 MANGROVE CONFERENCE - MONITORING, CONSERVATION, AND
SUSTAINABLE DEVELOPMENT


浙江大学 海洋学院
 OCEAN COLLEGE
 ZHEJIANG UNIVERSITY

APN

2023 Mangrove Conference

Monitoring, conservation and sustainable development

Conference talk themes:

- Topics related to mangrove forests worldwide
- Nutrients and pollutants
 - Remote sensing
 - Carbon cycle
 - Conservation
 - Policy

Conference Information

Zhejiang University, Zhoushan | 17-18th October 2023 | Email: MangroveConference@hotmail.com

Jointly organized by
 Institute of Technology of Cambodia; Central University of Kerala; Tanjungpura University;
 University Kebangsaan Malaysia; Universiti Malaya; National University of Singapore; Prince of Songkla University;
 Institute of Natural Product Chemistry, Vietnam Academy of Science and Technology; Yangzhou University
 Supported by Asia-Pacific Network for Global Change Research (APN)





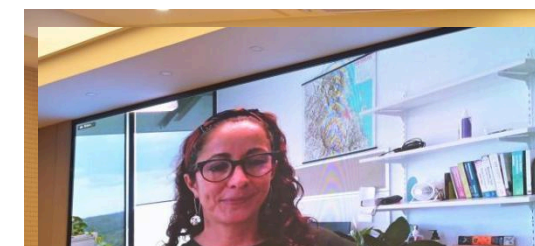
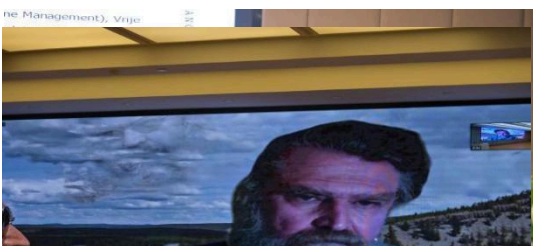


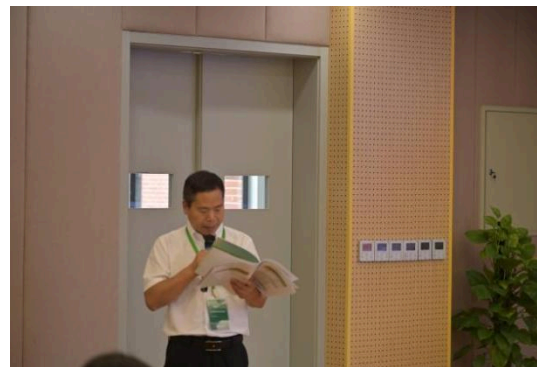
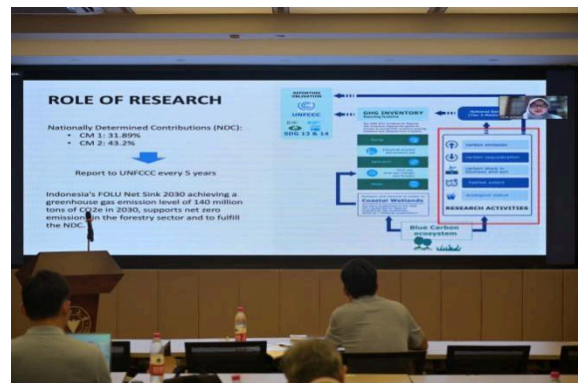
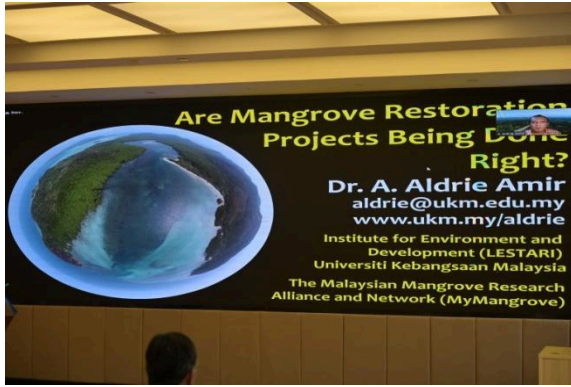


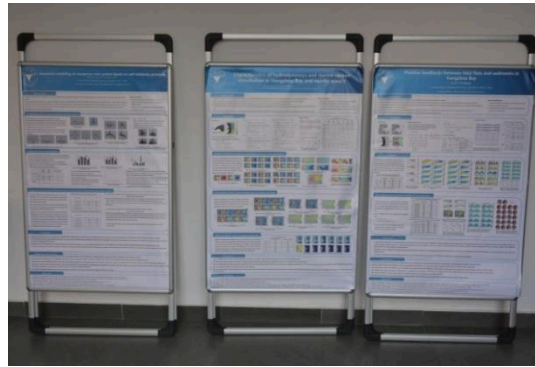














Conference talks:

17 th October 2023 (afternoon session)	
Session 1	
Presenter	Title
Professor LIN Guanghui	Carbon cycle and blue carbon potentials of natural vs restored mangrove forests in China
Professor OUYANG Xiaoguang	Mangrove conservation and carbon sinks under global changes
Dr Ahmad Aldrie AMIR (online)	Are mangrove restoration projects being done right?
Session 2	
Professor Oleg SHIPIN (online)	Major unused C storage potential for mangroves in the deep inland areas, particularly, cities
Dr Kashif Ali SOLANGI (online)	Integrating electrophysiological data, remote sensing, and GIS techniques for the adaptive management of mangrove species
Dr Nicole KHAN	Thresholds of mangrove survival under rapid sea-level rise
Dr NGUYEN Tai Tue	Management of mangrove ecosystems for enhancing climate change response and sustainability in Vietnam
Professor WU Jiaping	Carbon sequestration and the changes of eco-environmental properties after mangrove transplantation in the northern most subtropical area of China
18 th October 2023 (morning session)	
Session 3	
Presenter	Title
Professor Che Abd Rahim MOHAMED	Radionuclides is a tool to estimate the sedimentation rate at mangrove area
Dr Maria Fernanda ADAME (online)	Coastal wetlands that protect the Great Barrier Reef
Dr BONG Chui Wei	Prevalence of antibiotic resistant Escherichia coli and Klebsiella pneumoniae in tropical mangrove estuaries of Malaysia
Dr Bijeesh Kozhikkodan VEETIL	Mangrove research in Vietnam: past, present and future
Session 4	
Professor CHEN Luzhen	Exploring on monitoring and trading mechanisms of coastal blue carbon

Mr Henricus Rotarius Octavianus TARIGAN	Determining rehabilitation strategy for mangrove ecosystems: Case of Sumenep Regency, Jawa Timur Province, Indonesia
Dr Virni Budi ARIFANTI (online)	Mangrove blue carbon research in Indonesia
Miss Alexa Samantha Tivera HERNANDEZ (online)	Mangroves enhancing local climate resilience: the case of Olo-Olo mangrove forest and ecopark, Lobo, Batangas

18th October 2023 (afternoon session)	
Session 5	
Presenter	Title
Professor Dixon GEVAÑA	Mangrove conservation: pressing challenges and future actions
Dr Siriporn PRADIT	Microplastic accumulation in sediment from two mangrove areas in Southern Thailand
Miss Sharafina Zul QISTHI	Anthropogenic impact assessing of mangrove ecosystem using biotic index in Sumenep, Jawa Timur Province, Indonesia
Dr LOH Pei Sun	Biogeochemistry of sedimentary organic matter and phosphorus in mangroves
Session 6	
Professor ZHANG Zhaohui	Carbon sources, trophic level and transfer of heavy metals through the aquatic food web in the largest mangrove reserve in China
Dr NGUYEN Hai -Hoa	Status of mangrove forests and enhancement of carbon storage & sequestration: solutions toward climate change mitigations in Vietnam
Dr Sigit SASMITO (online)	Identifying mangrove restoration opportunities in Indonesia
Mr Md Nurul ISLAM (online)	Understanding social resilience in Sundarbans Delta: stories from world's largest mangrove forest

Poster:

Dr KIM Jin-soo, CHEN Ran: Sharp NDVI declines in Hong Kong's mangroves related to weather extremes

Dr LI Li, WU Lihong: Positive feedbacks between tidal flats and sediments in Hangzhou Bay

Dr LI Li, ZHOU Yuanhang: Characterization of hydrodynamics and marine carbon distribution in Hangzhou Bay and nearby waters

Dr XIA Yuezhang, GAO Kai: Geometric modeling of mangrove root systems based on self-similarity principle