

Workshop 2: Large Time Series Models: Where we are and where we are going

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In the rapidly evolving field of time series forecasting, large time series models (LTMs) have emerged as a pivotal area of research and application. Unlike traditional time series models, which are designed for specific tasks, LTMs aim to establish generalizable models that can be quickly adapted or zero-shot to new tasks or scenarios, unlocking the power of deep models in practical applications. Over the past year, we have witnessed significant progress in this topic, such as MOMENT (ICML 2024), Timer (ICML 2024), Moirai (ICML 2024), TimeFM (ICML 2024), Chronos (TMLR 2024) and Time-MOE (arXiv 2024) and etc. This workshop aims to provide an in-depth and comprehensive introduction to this rapidly advancing area, covering cutting-edge techniques, practical tools, and real-world applications. We will start with a comprehensive overview of the development of deep time series forecasting and large time series models. The presentation will cover both foundational knowledge and innovative methodologies in LTM research, along with hands-on demonstrations of two practical tools: Time-Series-Library (<https://github.com/thuml/Time-Series-Library>) and OpenLTM (<https://github.com/thuml/OpenLTM>) for training and utilizing deep or large time series models. Next, we will showcase our latest research on LTM and its applications in areas such as climate forecasting, economics, and the Internet of Things. This workshop is suitable for anyone interested in or working on time series forecasting. Prior knowledge of deep learning is recommended but not necessary.

Time	Contents
9:00-9:45	Deep Time Series Forecasting and TSLib
9:45-10:30	Large Time Series Models and OpenLTM
10:30-10:40	Break
10:30-11:15	Latest Progress of LTM
11:15-11:45	Applications of LTM in Climate, Economics and IoT
11:45-12:00	Discussion and Q & A