香港浸會大學
HONG KONG BAPTIST UNIVERSITY

DEPARTMENT OF
COMPUTER SCIENCE
計算機科學系

DEPARTMENT OF COMPUTER SCIENCE

SEMINAR

2025 SERIES

Revealing Causal Information from Data

DATE & TIME
14 JAN 2025 (TUE) 10:00 – 11:00 AM

VENUE
DLB637, 6/F, David C Lam Building, Shaw Campus

PROF. TONGLIANG LIU

Director
Sydney AI Centre
The University of Sydney, Australia

ABSTRACT

Many tasks in sciences or engineering require the underlying causal information. Since it is typically expensive and time-consuming to conduct randomized experiments, there has been significant attention towards revealing causal relations through the analysis of purely observational data, commonly known as causal discovery. Over the past few years, with the rapid development of big data, causal discovery is facing great opportunities and challenges. In this talk, I will first introduce some classical causal discovery methods, including PC algorithm and LiNGAM, which has been successfully applied to the cases without latent variable. However, in complex systems, we typically fail to collect and measure all task-relevant variables. In the second part of the talk, I will focus on causal structure recovery in the presence of latent variables. In particular, I will briefly review some researches in this line and introduce our recent work, the latter requires less restrictive assumption and hence can handle more general cases.

SPEAKER'S BIOGRAPHY

REGISTER NOW