



## **THUAI-IRCN Workshop**

## Between artificial and human intelligence

To bridge the gap between artificial and human intelligence, we need to understand the gap. This understanding must be explicit enough that an actual research plan can be formulated. To achieve this, researchers from Tsinghua University Institute for Artificial Intelligence (THUAI) and IRCN will present their state-of-the-art work, and share their visions on the major problems of current AI, the missing elements for a better AI, and aspects of human or animal intelligence that can be explored to understand the gap.

Date: Saturday, December 21, 2019

Venue: IRCN Seminar room, 13F Faculty of Medicine Experimental Research Building

Program Schedule:	
9:00~9:10 Opening remarks Takao Hensch	
9:10~9:20 Introduction to THUAI Xiaoyan Zhu	
Short talk session <b>THUAI</b> :	
9:20~9:40 Deep Learning-based Chinese Language Computation at Tsinghua Univer	
9:40~10:00 Machine Learning in Uncertain and Adversarial Environments	Jun Zhu
10:00~10:20 Neuromorphic Platform and A Roadmap Towards AGI	Sen Song
10:20~10:50 Coffee break	
Short talk session IRCN:	
10:50~11:10 A Reinforcement Learning Model with Distinct Functions of D1 and D2 Striatal Projection Neurons	Shin Ishii
11:10~11:30 Predictive-coding signals in the primate brain	Zenas Chao
11:30~12:00 Discussion session Host: Zenas Chao	
Short talk session THUAI:	
14:30~14:50 Machine Learning in The Studies of Cell Differentiation, cell-cell Interaction and Disease Diagnosis	
14:50~15:10 A Hierarchical Sparse Coding Model for the Auditory System	Xiaolin Hu
15:10~15:30 Rethinking the Role of Artificial Neural Networks (ANNs) and Spiking Neural Networks (SNNs)	Guoqi Li
15:30~16:00 Coffee break	
Short talk session IRCN:	

16:00~16:20 Machine Learning from Weakly-Supervised and Noisy Data Masashi Sugiyama

16:20~16:40 Auditory Information Processing in the Songbird Brain: Accuracy and Tolerance

Yoko Yazaki Sugiyama

16:40~17:10 Discussion session Host: Mingbo Cai

17:10~17:20 Closing remarks

## **IRCN** (International Research Center for Neurointelligence)

This workshop is supported by UTokyo Strategic Partnership Project.



Register now! conference@ircn.jp