Jun CEN

Robotics and Autonomous Systems
The Hong Kong University of Science and Technology
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Degree	University	Major	Year	GPA
PhD	HKUST	Robotics	2020-now	3.98/4.3
MSc	HKUST	Mechanical	2019-20	3.99/4.3
Bachelor	Zhejiang University	Mechatronics	2015-19	3.82/4.0

Research Interests

- **Life-long Learning**: open-set recognition, incremental learning
- **Distributed Learning**: federated learning, blockchain

Publication

[1]. **Open-set 3D Object Detection**
Jun Cen, Peng Yun, Junhao Cai, Michael Yu Wang, Ming Liu, *International Conference on 3D Vision (3DV), 2021*

[2]. **Deep Metric Learning for Open World Semantic Segmentation**
Jun Cen, Peng Yun, Junhao Cai, Michael Yu Wang, Ming Liu, *International Conference on Computer Vision (ICCV), 2021*

[3]. **Open-world Semantic Segmentation for LIDAR Point Clouds**
Jun Cen, Peng Yun, Junhao Cai, Di Luan, Michael Yu Wang, Ming Liu, *Under Review*

[4]. **Active Stream Learning in 3D Object Detection for Autonomous Driving**
Peng Yun*, **Jun Cen***, Bowen Yang, Di Luan, Michael Yu Wang, Ming Liu, *Transactions on Neural Networks and Learning Systems (TNNLS), Under review*

[5]. **Conflicts between Likelihood and Knowledge Distillation in Task Incremental Learning for 3D Object Detection**
Peng Yun, **Jun Cen**, Ming Liu, *International Conference on 3D Vision (3DV), 2021*

[6]. **BORM: Bayesian Object Relation Model for Indoor Scene Recognition**
Liguang Zhou, **Jun Cen**, Xingchao Wang, Zhenglong Sun, Tin Lun Lam, Yangsheng Xu, *International Conference on Intelligent Robots and Systems (IROS), 2021*

[7]. **Precision forward design for 3D printing using kinematic sensitivity via Jacobian matrix considering uncertainty**
Jinghua Xu, Xueqing Feng, **Jun Cen**, Shuyou Zhang, *The International Journal of Advanced Manufacturing Technology, 2020*

Projects

- **Life-long Learning System for 3D Object Detection in Autonomous Driving** *(Jan'21-Jan'22)*
  - HKJRI-52, Kaisa Seed Project, supervised by Prof. Michael Yu Wang
- **Aggressive Quadrotor Flight through Narrow Gaps** *(Sep'19-Jun'20)*
  - MSc independent project, supervised by Prof. Lilong Cai
- **Kinematic sensitivity analysis for 3D printer** *(Sep'18-Jun'19)*
  - Bachelor graduation project, supervised by Prof. Jinghua Xu

Experience

- ***Robotics and Artificial Intelligence Laboratory, The Chinese University of Hong Kong (SZ)*** *(Oct'19-Jan'20)*
  - Research Assistant, supervised by Prof. Tin Lun Lam
- ***Autonomous Driving Group, HIKVISION*** *(Mar'20-Jul'20)*
  - Algorithm engineer, supervised by Dr. Yushi Zhu