

## Dr. Chan, Hubert T.H.

[hubert@cs.hku.hk](mailto:hubert@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/hubert>

### Research/Project Interests

Algorithms, Combinatorial Optimization, Discrete Metric Spaces, Graphs and Information Networks, Security & Privacy

In general, I can offer advice on the theoretical and mathematical aspects of the FYP. In the past, I have supervised FYPs on various topics such as security and privacy, algorithms and optimization, data mining, social networks. I can also give guidance on the theoretical component of implementation-based projects such as machine learning, but students will be expected to have a strong foundation on system and programming and be able to resolve technical issues themselves.



## Professor Reynold Cheng

[ckcheng@cs.hku.hk](mailto:ckcheng@cs.hku.hk)  
<https://reynold.hku.hk>



### MTR data analytics

- Analyze behaviors of MTR passengers during pandemic
- Develop efficient, scalable, methods
- Implement user-friendly analysis system for transportation & environment experts



## S.T.A.R. lab.

<https://star.hku.hk>

### Data Science for Social Good

- Extract important insights from elderly care and family care data
- Enable social workers to analyze data through designing simple and effective tools
- Work with our 15-people team for developing systems for 10+ NGOs



## HINCare

<https://hincare.hku.hk>



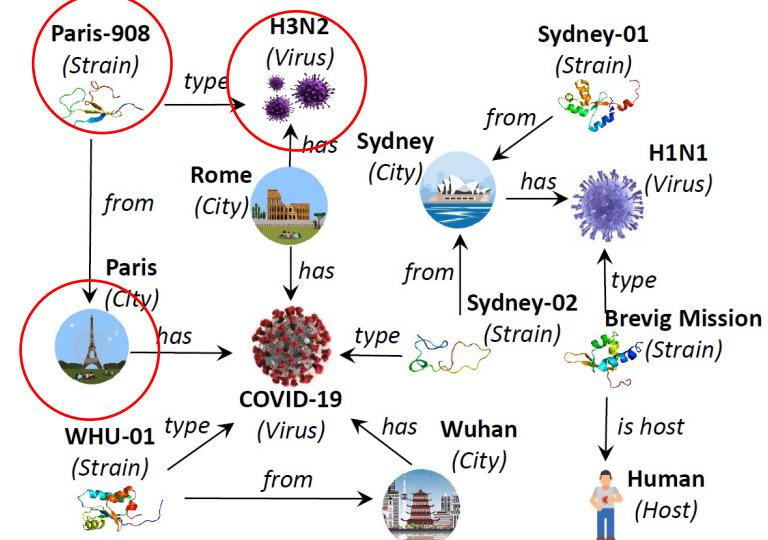
香港賽馬會慈善信託基金  
The Hong Kong Jockey Club Charities Trust



HKU Musketeers Foundation  
**Institute of Data Science**  
香港大學同心基金數據科學研究院

## Research/Project Interests

Scalable Data Science, Big Graph Data



### Big Graphs

- Heterogenous information networks, knowledge graphs, social networks
- Queries, ML, AI, NLP
- TCL Video & COVID graphs



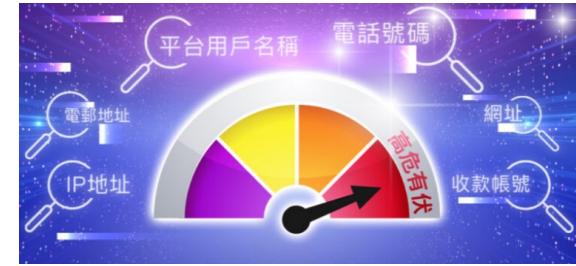


## Dr. Chim, Tat Wing

[twchim@cs.hku.hk](mailto:twchim@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/twchim>

List of completed projects: <https://i.cs.hku.hk/~twchim/>

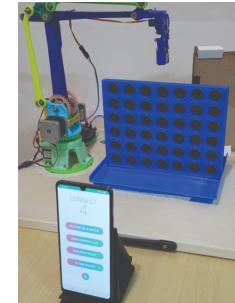


### Research / Project Interests:

Cybersecurity, Mobile Technologies and Applications, Computer Games

### Potential Projects:

- Cybersecurity Projects
  - Students will implement computer or mobile applications / services to protect users from malicious URLs, suspicious emails and telephone deceptions.
- MakerLab / InnoWing Robotics Projects
  - Students will implement interesting systems that involve both hardware and software. Examples include pick and place game app for 3D printed robotic arm, 3D printed robot dog walking on terrain and smart phone controlled omni-directional wheel driven robot.
- Projects proposed by Innovation Solution Lab, Hong Kong Police Force
  - Bluetooth Low Energy (BLE) beacon for tracking personal items around you
  - AI model for vehicle identification (special features, logos or signs in addition of license plates)
  - Video analytic AI for handling of found properties
  - Natural Language Processing (NLP) for case summary report (currently in free text without standard)
  - Technologies for prevention of telephone deception
  - Speech recognition and NLP AI for classification and prioritization of 999 calls to call center and calls to police stations (e.g., by means of an avatar / chatbot)



**Please contact me for more information! Other smart and innovative ideas are also welcome!**



## Professor Chiribella, Giulio

[giulio@cs.hku.hk](mailto:giulio@cs.hku.hk)

<https://qici.weebly.com/>

### Research/Project Interests

Quantum information theory, foundations of quantum mechanics

In our everyday life, processes happen in a well-defined order: for two processes A and B, we can have "A before B," "B before A," or "A and B at the same time."

In quantum mechanics it is possible to have some new situations, where A happens both before B and after B. This phenomenon is called *indefinite causal order*.

Indefinite causal order offers many advantages in computation and communication.

For an example, see <https://arxiv.org/abs/2005.00618>

Can you find some new advantages? Maybe in some algorithm?



## Dr. Loretta Choi, Yi King

[ykchoi@cs.hku.hk](mailto:ykchoi@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/ykchoi>



## Research/Project Interests

- VR/AR/MR, metaverse, motion capture, brain computer interface, haptics feedback, (virtual) sensing, virtual experience, virtual analytics, virtual character modeling
- Visualization, computer graphics, gamification applications
- Human-robot interaction, smart robots
- Health/Fitness apps with wearable devices

## Current Projects

- VR/AR/MR applications in archaeology (in collaboration with Dr. Peter Cobb, Faculty of Education): e.g., remote excavations, virtual objects comparison, hands-free data recording, onsite tourism and education, virtual remote teaching and learning experiences
- Health/Fitness apps with wearable devices (in collaboration with HKU Centre for Sports and Exercises; Dr. Youngwon Kim, School of Public Health)
- AI-enabled medical diagnosis and visualization (in collaboration with HKU Dept of Orthopaedics and Traumatology; CUHK Echocardiography Laboratory)
- Mixed reality-enabled human-robot interaction (in collaboration with InnoHK Centre for Transformative Garment Production)



## Dr. Chow, Kam Pui

[chow@cs.hku.hk](mailto:chow@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/chow>

### Research/Project Interests

Computer Forensics, Digital Investigation, Data Privacy, Cyber Security

### Some previous capstone projects

- A Multi-currency Wallet Using Blockchain
- Automated Cryptocurrency Trading Using Machine Learning Algorithms
- Acceleration of Monte Carlo Option Pricing
- AI Cryptocurrency Trading Advisory System
- Application of Machine Learning Algorithm for Trading Strategies Formation and Equity Research in the Semiconductor Industry



## Dr. Cui, Heming

[heming@cs.hku.hk](mailto:heming@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/heming>

### Research/Project Interests

- Operating systems and distributed systems, including distributed big-data and parallel computing systems, distributed AI training/serving systems, blockchains, cloud computing systems, and distributed robotic learning/operating systems

### FYP topics

- To maintain good QC on FYP outcomes, the supervisor will *accept only* FYP teams that choose/propose one of the FYP topics based on the software systems built by the supervisor's PhD students (i.e., an FYP team must implement a new software application based on Dr. Cui's software systems). A topic can be blockchains ([Bidl SOSP 2021]), or big AI model training systems ([vPipe TPDS 2021] [NASPipe ASPLOS 2022]), or edge computing databases ([Dast EuroSys 2021]). See the supervisor's website for the details of the papers and PhD students' video talks.
- More info is here: <https://cs.hku.hk/~heming/projects/fyp-guidelines.html>



## Dr. Huang, Chao

[chuang@cs.hku.hk](mailto:chuang@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/chuang>

### Research/Project Interests

Developing novel machine learning frameworks to tackle various challenges in Data Mining, Information Retrieval, Spatial-Temporal Data Analytics, User Behavior Modeling, Recommendation, Graph Mining, and Deep Representation Learning

### Current Research Focus:

- **Deep Neural Networks/Graph Neural Networks/Self-Supervised Learning**
- **Information Retrieval/Recommendation/Personalization**
- **Spatial-Temporal Data Mining/Urban Computing/Human Mobility Modeling**
- **Graph Mining/Network Representation/Knowledge Graph**



## Dr. Huang, Zhiyi

[zhiyi@cs.hku.hk](mailto:zhiyi@cs.hku.hk)

<https://www.cs.hku.hk/~zhiyi/>

### Research/Project Interests

I am interested in studying information as a computational resource, including computation under uncertainty (**online algorithm**), strategic manipulation of information (**game theory**), selective release of information (**differential privacy**).

### Previous FYP Projects

- Game theoretic study of the toll-rates of HK's cross harbour tunnels
- Smart calendar app for the academic needs
- Ride-sharing app for HK

### Other Example Projects

- Gamified online algorithm problems
- Selected topics in theoretical computer science



# Professor Kao, Benjamin C.M.

[kao@cs.hku.hk](mailto:kao@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/kao>

## Research/Project Interests

Legal Knowledge Bases, Database Management Systems, Data Mining, and Information Retrieval Systems

## On-going projects

- AI-HKLII (AI-powered Hong Kong Legal Information Institute).
- AI-CLIC (AI-powered Community Legal Information Centre).
- HKU AI Lawyer
  - Illegal Drug Trafficking Sentencing Predictor (<http://wwwnew2.hklili.hk/predictor>)
  - Machine-assisted Personal Injury Compensation Estimation

My current research interest is LegalTech. In particular, I am applying machine learning (ML) and natural language processing (NLP) techniques to achieve two goals: (1) Assisting legal professionals to conduct legal research, and (2) Improving legal knowledge dissemination to the general public. To achieve these goals, we provide two online services, namely, HKLII and CLIC. HKLII and CLIC rank #3 and #2 under the category of “Law and Government > Legal” among HK websites. We are developing AI technology to make these services better.



## Professor Komura, Taku

[taku@cs.hku.hk](mailto:taku@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/taku>

### Research/Project Interests

Physical simulation, Character animation, 3D modelling



## Dr. Kong, Lingpeng

[lpk@cs.hku.hk](mailto:lpk@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/lpk>

### Research/Project Interests

Artificial Intelligence, Machine Learning, Natural Language Processing

**Dr. Kong's work lies at the intersection of natural language processing (NLP) and machine learning (ML), with a focus on representation learning, structured prediction, and generative models. His recent projects focus on the architecture design of the Transformer model and controllable text generation methods.**



# Professor Lam, Tak-Wah

[twlam@cs.hku.hk](mailto:twlam@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/twlam>

## Research/Project Interests

- Algorithms, Bioinformatics & Big Data Analytics

## On-going projects

- Karyotyping Image Analysis for Chromosomal Abnormality detection
- DNA analysis for structural variation detection
- ESG data analytics



## Dr Liu, Qi

[liuqi@cs.hku.hk](mailto:liuqi@cs.hku.hk)

<https://www.cs.hku.hk/people/academic-staff/liuqi>

### Research/Project Interests

Natural Language Processing, Machine Learning, Artificial Intelligence, and FinTech

More specific directions:

AIGC

Training Large Language Models



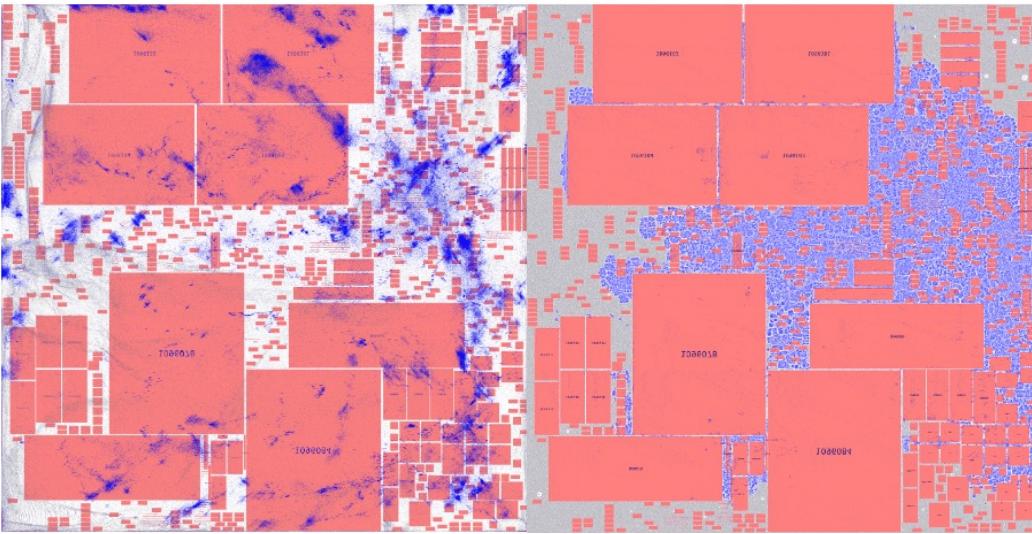
# Dr. Luo, Ping

[pluo@cs.hku.hk](mailto:pluo@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/pluo>

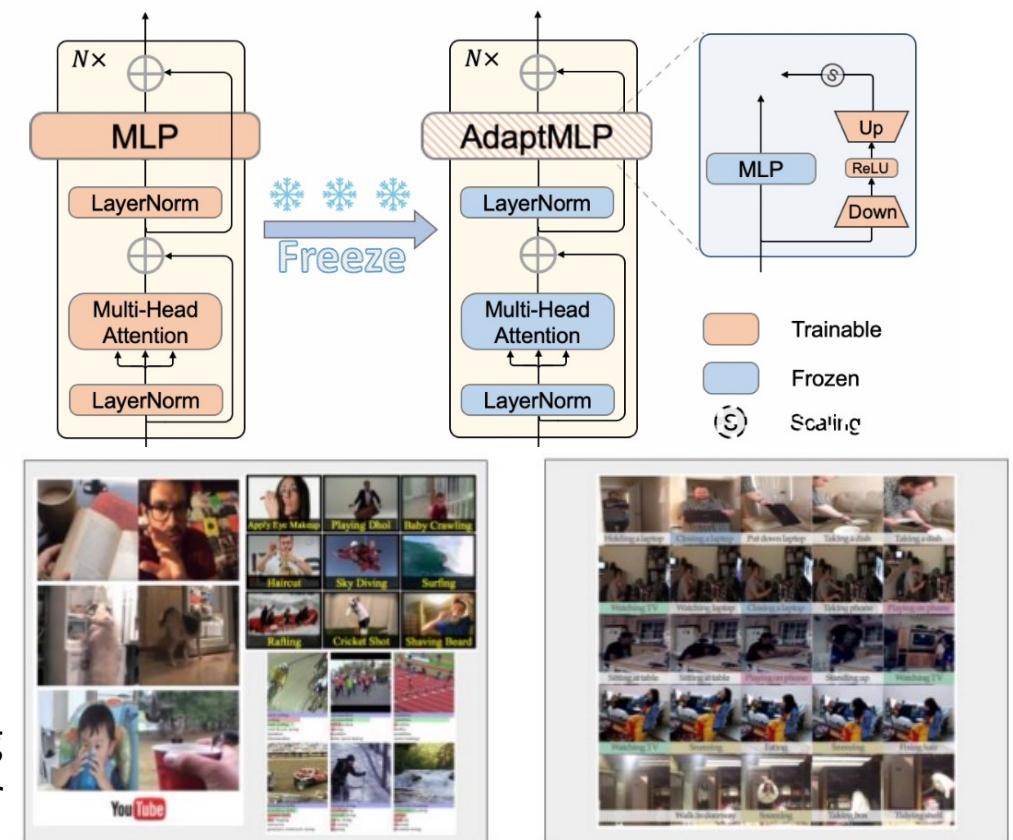
## **Research/Project Interests**

# Computer Vision, Machine Learning, Deep Learning



# AI for Chip Layout Design

# Video Recognition and Captioning using Transformer



Associate Professor  
**Ruibang Luo**

rbluo@cs.hku.hk  
<http://luo-lab.hk/>



## I am

*Top 1% Scholars by ISI Essential Science Indicators, 2019, 2020, 2021  
Innovators Under 35 Asia Pacific by MIT Technology Review, Class of 2019  
Forbes 30 Under 30 Asia 2017: Healthcare and Science  
INTP  
Speaking Cantonese, English, Mandarin, French*



## I work on

*Digital Healthcare and Bioinformatics  
✓ Algorithm, Precision Medicine, Metagenomics, Literature Mining  
Applied Finance  
✓ Modeling, Data Mining, High-Performance Computing  
General Data Science  
✓ Methodology, Machine Learning, Teaching and Learning*



## Don't choose me if you

*Take it as just another homework  
Have no plan to do something impactful*



## Come with me if you want to win

**Angel Chung Yu Woo, Snow Xue Wu, and Kwanyoung Lee**  
❖ Building a code and data repository for teaching algorithmic trading  
✓ 2021 Won The Champion in the FYP final competition

**Tarun Sudhams & Saripalli Varun Vamsi**  
❖ Understanding Financial Reports using Natural Language Processing  
✓ 2019 Won the 1st runner-up award in the FYP final competition



## Dr. Oliveira, Bruno

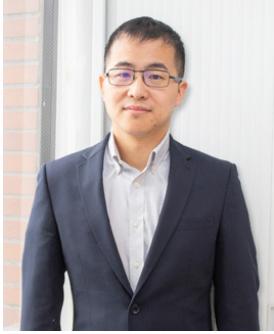
[bruno@cs.hku.hk](mailto:bruno@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/bruno>

### Research/Project Interests

Programming Languages, Modularity, Functional Programming, Object-Oriented Programming

- Projects using functional languages (like Haskell, Ocaml or Scala) are welcome.
- I'm interested in the design of domain specific languages in general.
- My group has expertise with interactive theorem provers. Projects involving theorem provers are also welcome.



## Dr. Pan, Jia

[jpan@cs.hku.hk](mailto:jpan@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/jpan>

### Research/Project Interests

Robotics and Artificial Intelligence, with a focus on developing intelligent algorithms, sensors, and machines to accomplish fully autonomous robots

Completed capstone projects in 2021:

- cloth quality checking using tactile sensor
- Differentiable physics in robot learning (nominated for ASM Technology Award)

On-going projects:

- Learning with new sensors: event camera, tactile glove, etc.
- Robotic learning: navigation, manipulation, etc.
- Multi-agent AI: swarm simulation, herding policy, etc.
- Robotic vision



## Dr. Qian, Chenxiong

[cqian@cs.hku.hk](mailto:cqian@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/cqian>

### Research/Project Interests

Software & System Security, Program Analysis, and Model Checking

### Ongoing projects:

- Hybrid Software Testing
- Differential Software Analysis
- Binary Code Similarity Detection
- Software Debloating
- Security of AI Systems



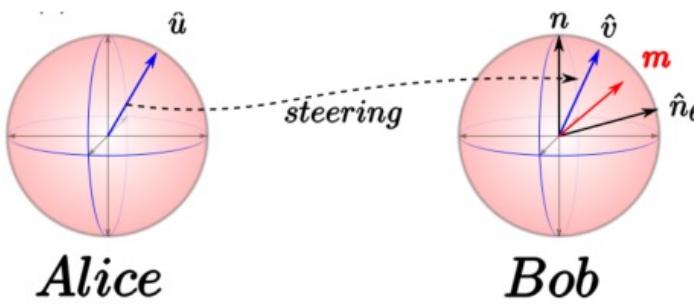
# Dr. Ramanathan, Ravishankar

[ravi@cs.hku.hk](mailto:ravi@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/ravi>

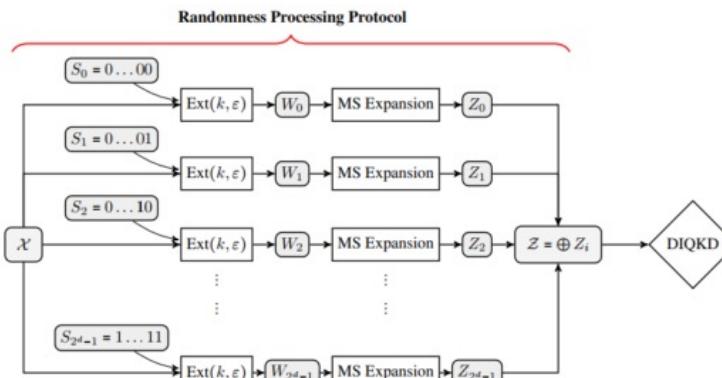
**Research/Project Interests:** Quantum Information Theory, Quantum Cryptography, Device-Independent Quantum Information Processing, Foundations of Quantum Mechanics

## Foundations of Quantum Theory



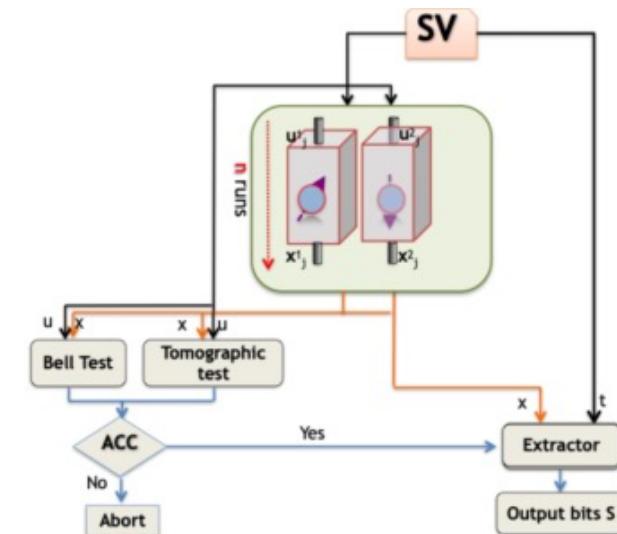
Quantum Entanglement refers to strong correlations between measurement results on distant quantum particles, that defy local classical description. These form the foundational underpinning for many of the applications of quantum technologies, including much of Quantum Cryptography.

## Quantum Key Distribution



Key Distribution is a flagship application of quantum technologies. In the Device-Independent framework, Alice and Bob can generate secure key bits without even trusting their physical devices. Our group designed the state-of-art fully device-independent quantum key distribution protocol and proved its security.

## Quantum Random Number Generation



Our group designed the first practical protocol to amplify arbitrarily weak randomness seeds into nearly perfect cryptographically secure random bits device-independently.



## **Dr. Schnieders, Dirk**

[sdirk@cs.hku.hk](mailto:sdirk@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/sdirk>

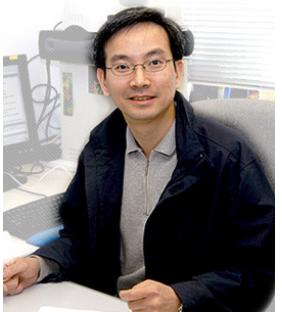
### **Research/Project Interests**

Computer Vision, Machine Learning, Artificial Intelligence, Virtual Reality, Augmented Reality, Brain Computer Interface, Robotics

**I am interested to supervise projects related to my research interests above.**

**Please contact me with your project proposal.**

**You can find past projects that I supervised here (<https://i.cs.hku.hk/~sdirk/>)**



## Dr. Tam, Anthony T.C.

[atctam@cs.hku.hk](mailto:atctam@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/atctam>

### Research/Project Interests

Parallel Computing, High-speed Communication, Network Protocol Design, Congestion Control, Performance Evaluation and Benchmarking, Web Application Development, and Advanced Web Technologies

### Past Capstone Projects

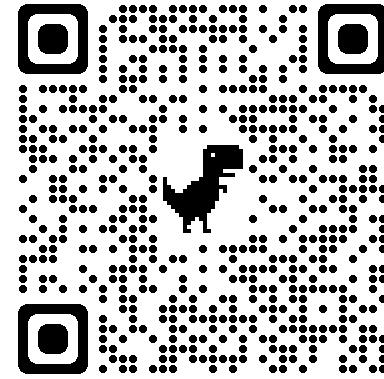
- Performance Evaluation of HTTP/3
- Redesign the Internship Placement System
- Food-Related Article Aggregation and Analytical System [Industry Project]
- Avatar-based Video Chat Web App
- P2P Live Streaming
- Design BCI controlling system



# Dr. Wong, Kenneth K.Y.

[kykwong@cs.hku.hk](mailto:kykwong@cs.hku.hk)

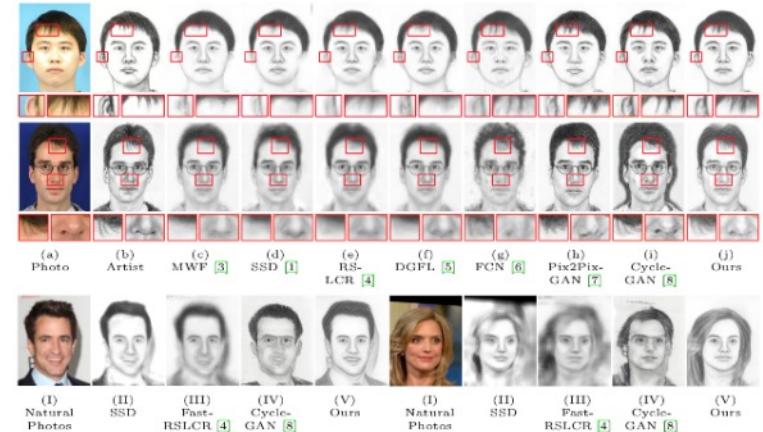
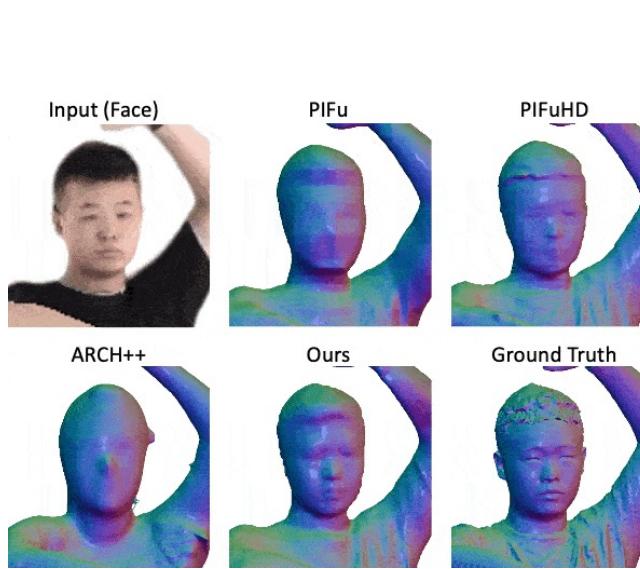
<https://www.cs.hku.hk/index.php/people/academic-staff/kykwong>



## Research/Project Interests

Computer vision and machine intelligence

Image super-resolution; photometric stereo; medical image analysis; face sketch synthesis; 3D human reconstruction; etc.





## Dr. Wu, Chenshu

[chenshu@cs.hku.hk](mailto:chenshu@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/chenshu>

### Research/Project Interests

Internet of Things, Wireless Sensing and Analytics, Contactless Healthcare and Eldercare, Robotic Tracking and Perception, Indoor Localization, Mobile Computing and Applications, Human-Computer Interaction



## Professor Wu, Chuan

[cwu@cs.hku.hk](mailto:cwu@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/cwu>

### Research/Project Interests

Cloud Computing, Distributed Machine Learning Systems/Algorithms, and Smart Elderly Care Technologies

### Current ongoing projects/interests:

- **Distributed Machine Learning Systems for Training Large DNN/GNN models**
- **A Virtual Classroom System for Young Learners (VR technologies such as 3D scene/face/body/hand modelling involved)**
- **Smart Elderly/Health Care (IoT, NLP technologies involved)**



## Professor Xu, Dong

[dongxu@cs.hku.hk](mailto:dongxu@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/dongxu>

### Research/Project Interests

Computer Vision, Multimedia, Machine Learning

Prof. Xu is an active researcher in the areas of computer vision, multimedia and machine learning. His research group has developed new machine learning methods and intelligent systems for a broad range of vision and multimedia related applications such large-scale image/video retrieval, video surveillance, biometrics (*i.e.*, face and human gait recognition), and medical image analysis. Some of my previous capstone projects are listed below:

- Deep learning for 2D visual recognition (e.g., image/video recognition, object detection and segmentation)
- Deep learning for 3D visual recognition (e.g., 3D object recognition/detection/segmentation, 3D action recognition)
- Deep learning for biometrics
- Deep video compression
- Transfer learning for visual recognition
- Deep learning for medical image analysis



## Dr. Yang, Yuxiang

[yuxiang@cs.hku.hk](mailto:yuxiang@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/yuxiang>

<https://sites.google.com/view/yuxiang-yang>

### Research/Project Interests

Quantum information, Quantum metrology,  
Quantum computation,  
Quantum machine learning  
Quantum foundations, Mathematical physics



# Professor Yiu, Siu Ming

[smyiu@cs.hku.hk](mailto:smyiu@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/smyiu>

## Research/Project Interests

Cyber Security & Cryptography, FinTech

Any topics related to (but not limited) :

### 1. Cyber security

- Anti-money laundry, e-KYC, cryptocurrency tracing, FinTech app security issues, AI system security, security in federated learning, blockchain access control etc.

### 2. FinTech

- Algo-trading, financial data analytics, risk assessment, solutions for financial inclusion, virtual bank related, RegTech (all kinds of xxTech, such as InsurTech, WealthTech related to FinTech), NLP applications for FinTech (e.g. ESG reporting) etc.

### 3. Any start-up idea related to cyber security or FinTech

- Students are welcome to bring start-up ideas to work on a FYP!

Potential projects (with law enforcement units):

### 1. Photo and video quality enhancement

Study how to improve and enhance poor quality of photo/video captured by CCTV and mobile phone regarding features for face/vehicles for investigation.

### 2. Impact of metaverse

Study the impact of metaverse and emerging VR/AR technologies w.r.t. cyber crime or law enforcement related issues.

### 3. Technology to locate missing persons

Develop effective methodologies to locate missing persons, e.g. analysing social media, related videos.

### 4. Security of IoT deployment

Study and enhance the security of IoT devices to be deployed in law enforcement units.

**More... (contact me for more information)**



# Dr. Yu, Tao

[tyu@cs.hku.hk](mailto:tyu@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/tyu>

## Research/Project Interests

### Natural Language Processing

#### Language to Code/Executable Language Understanding

- Mapping natural language (NL) into executable code so that lay people can code with natural language instead of programming language
- with applications in
  - Data Science (text to Python/R/SQL...)
  - Data processing/retrieving
  - Data analysis/modeling
  - Data visualization
- Dialog systems
- Robotics
- ...

I need to find unique rows in a `numpy.array`.

242 For example:

```
>>> a # I have
array([[1, 1, 1, 0, 0],
       [0, 1, 1, 1, 0],
       [0, 1, 1, 1, 0],
       [1, 1, 1, 0, 0],
       [1, 1, 1, 1, 0]])
>>> new_a # I want to get to
array([[1, 1, 1, 0, 0],
       [0, 1, 1, 1, 0],
       [1, 1, 1, 1, 0]])
```

I know that i can create a set and loop over the array, but I am looking for an efficient pure numpy solution. I believe that there is a way to set data type to void and then I could just use `numpy.unique`, but I couldn't figure out how to make it work.

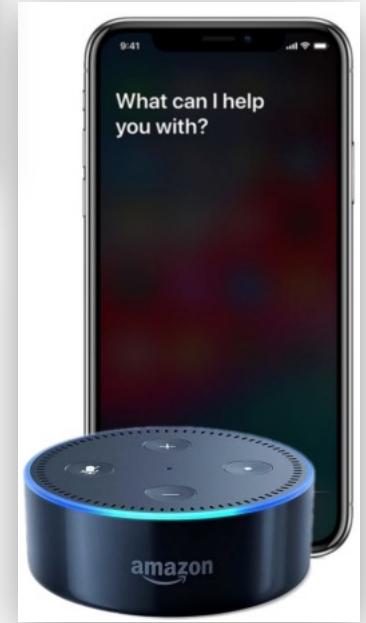
[python](#) [arrays](#) [numpy](#) [unique](#)

20 Answers Sorted by: Highest score (default)

As of NumPy 1.13, one can simply choose the axis for selection of unique values in any N-dim array. To get unique rows, one can do:

174 `unique_rows = np.unique(original_array, axis=0)`

Share Improve this answer Follow answered May 19, 2017 at 12:18 by [aiwabdn](#) 1,930 1 12 7





## Professor Yu, Yizhou

[yzyu@cs.hku.hk](mailto:yzyu@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/yzyu>

### Research/Project Interests

Computer Vision, Medical Image Analysis

**Specific topics include image classification, noisy labels, domain adaptation, object detection, medical image segmentation, medical image diagnosis**



## Dr. Yuen, John T.H.

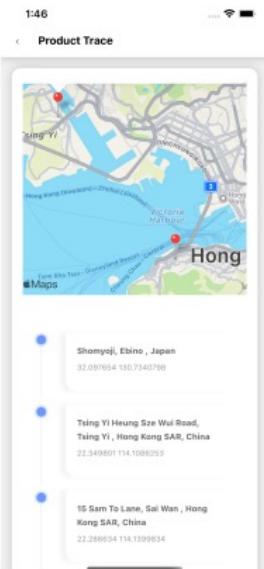
[thyuen@cs.hku.hk](mailto:thyuen@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/thyuen>

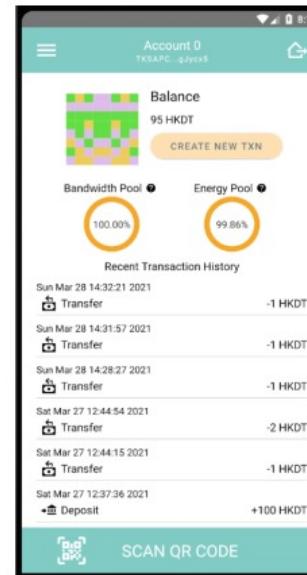
## Research/Project Interests

Blockchain, Cryptography, Security & Privacy

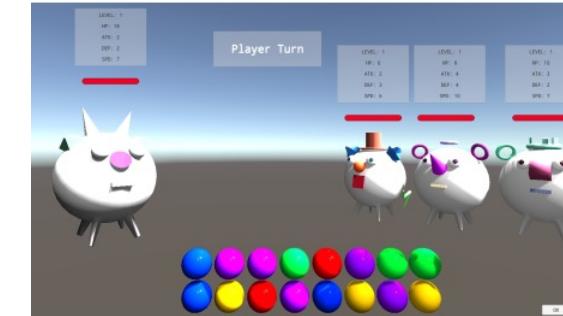
## Past student projects:



Blockchain-based logistic system



Stablecoin HKDT



NFT Game

## Other project directions:

- Blockchain applications
- Metaverse + NFT
- Identity management



# Dr. Zhao, Hengshuang

[hszhao@cs.hku.hk](mailto:hszhao@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/hszhao>

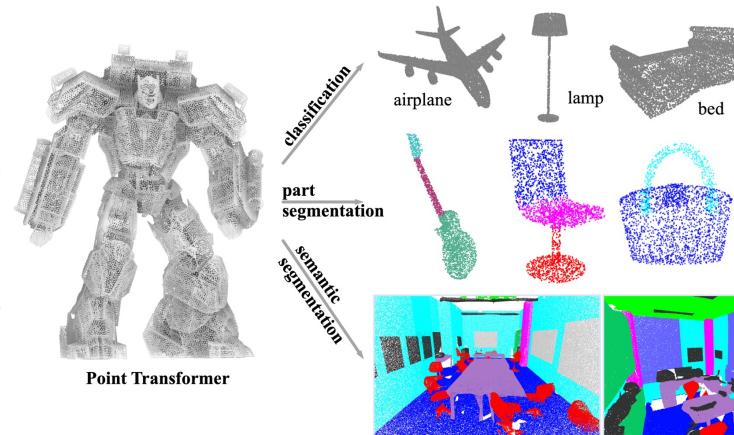
## Research/Project Interests

Computer Vision, Machine Learning, Artificial Intelligence

1. unified fundamental perception systems (raw operator and backbone)
2. visual content creation, generation, and manipulation (image/video/3d)
3. representation learning, open-world learning, multi-model learning
4. autonomous driving, embodied ai, robot learning, reinforcement learning, etc.



	Single object, user-specified	Multiple objects, detector-specified
Box	 Task: Single Object Tracking (SOT) Datasets: OTB-100, VOT-16/19	 Task: Multi-Object Tracking (MOT) Datasets: MOT challenge, KITTI
Mask	 Task: Video Object Segmentation (VOS) Datasets: DAVIS-2016/2017	 Task: Multi-Object Tracking & Seg. (MOTS) Datasets: MOTS, KITTI-MOTS
Pose	 Task: Pose Propagation Datasets: JHMDB	 Task: Pose Tracking (PoseTrack) Datasets: PoseTrack-2017/2018





## Dr. Zhao, Qi

[zhaoui@cs.hku.hk](mailto:zhaoui@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/zhaoui>

### Research/Project Interests

Quantum Computing, Quantum Simulation, Quantum Information, Quantum Resource Theories, Quantum Communication

### Selected on-going projects:

Understanding the performance of Quantum simulation algorithms

Improved/Modified Quantum simulation algorithms

Applications of quantum simulation algorithms



## Dr. Zou, Difan

[dzou@cs.hku.hk](mailto:dzou@cs.hku.hk)

<https://www.cs.hku.hk/index.php/people/academic-staff/dzou>

<https://difanzou.github.io/>

### Research/Project Interests

Machine Learning, Deep Learning, Decision Making, Stochastic Modeling, Structured Data Learning, Signal Processing

### Ongoing project:

1. Develop interpretable machine learning systems for various data-driven modeling in the fields of engineering, finance, and healthcare.
2. Understanding and explaining the magic of deep learning.
3. Evaluating and improving the stochastic algorithms in practical deep learning tasks.