YANG XUEHUAN

EDUCATION

Nanyang Technological University(NTU)

Singapore

Master of Engineering in Computer Science

Jan 2020 - Feb 2022

Email: s190113@e.ntu.edu.sg

- o Thesis: Simulation-Based perception testing for autonomous vehicles (10356/154942)
- o Research: Cyber Security for Autonomous Vehicle

Nanyang Technological University(NTU)

Singapore

Bachelor of Engineering in Electrical and Electronics

Aug 2016 - Dec 2019

- o FYP: Interfacing and Testing of Localization Sensors on An Autonomous Vehicle (10356/136704)
- Graduate: With Honours (Distinction)

RESEARCH EXPERIENCE

School of Computer Science and Engineering@NTU

Singapore

Research Associate, Cyber security team

Feb 2020 - Present

 Develop critical ML products, and utilize our proprietary 3D maps and real-time sensor data to make better driving decisions:

Cyber Security Research Centre@NTU

Singapore

Research Associate, Cyber Security team

Feb 2020 - Jan 2022

- Research Topics: Self-driving cars of deep learning systems in a wide variety of scenarios, especially in safety-critical applications
- Research Direction: It's crucial for building trust and reliability of AI systems in day-to-day decision making

Centre for Autonomous Robotics Lab EEE@NTU

Singapore

Research Intern, Autonomous Vehicle Localization Team

Jan 2019 - Dec 2019

- **DSTA**: The project focuses on the Safety and Cyber Security of driverless cars, in cooperation with the Singapore Defense Science and Technology Agency (DSTA), ordered by the Singapore Ministry of defense (Future Systems Technology Directorate FSTD)
- \circ **Autoware**: Success collaborated Velodyne LIDAR Delphi RADAR with existing software (ROS) and made necessary modifications with autonomous vehicle software
- o Toyota: Success applied Object Detection and Object Avoidance for Toyota Coms Car

Center for Energy Research Institute@NTU

Singapore

 $Research\ Intern,\ Future\ Mobility\ Team$

Sep 2018 - Dec 2018

- o NTU-JTC-Navya: ested NTU-JTC-Navya autonomous shuttle bus on NTU's campus
- NTU-Volvo-LTA: Joined NTU-Volvo-LTA 12-meter autonomous electric bus team

AWARD

• Math: 3rd Place, Chinese Mathematics Olympiad (CMO) Competition hosted by the Chinese National High School Mathematics League