

Chuanrui WANG

Tel: (+86)132 4181 3285

Email: buaa_wcr@buaa.edu.cn

EDUCATION

Beihang University, Beijing, China

Aug 2020 - Feb 2022

- M.S. in System Engineering; Overall GPA: 3.7/4.0
- **Major Courses in Maths and CS:** Mathematical statistics (A) / Advanced Algorithm Design (A) / Software Engineering
- **Major Courses in Engineering:** Robotic / Complex System Design / Sustainable Development

École Centrale de Lille, Lille, France

Aug 2018 - June 2020

- Exchange Student, General Engineer Diploma (=Master of Engineering); Overall GPA: 3.7/4.0
- **Major Courses in CS:** Collaborative Intelligence (A) / Information Systems (A) / Representation of signals and inverse problems (A) / Advanced Algorithms and Programming / Systems and Networks
- **Major Courses in Engineering:** Mathematical analysis for engineers / System modeling and control / Continuum Mechanics / Signal Processing / Project Management / Telecommunication Systems

Beihang University, Beijing, China

Aug 2015 - July 2018

- B.S. in Mathematics and Applied Mathematics, Sino-French Engineering School. Entrance at 14 y/o.
- **Overall GPA:** 3.67/4.0; **Ranking:** Top 10% in 120+ students

RESEARCH EXPERIENCES

#Research in natural language generation and pre-trained language models

Sept 2020 - Present

Advisor: Wenge RONG, Professor, School of Computer Science and Engineering, Beihang University

- Researched and applied Knowledge graph (KG) embedding methods in order to generate contextualized natural languages with more details
- Proposed an attention-based knowledge filter mechanism to filter out irrelevant knowledge
- Proposed a hierarchical lexicon embedding structure to solve Chinese named entity recognition task and achieved SOTA in 3 commonly used Chinese dataset
- In preparation for submission to iccasp 2022 conference

PROJECTS AND INTERNSHIP EXPERIENCES

Ainnovation, Department of Industrialized Computer Vision | R&D Intern | Beijing

Dec 2020 - Aug 2020

- Mainly participated in two projects: an online face recognition registration management system (web application) composed of multiple cameras and a bright kitchen monitoring project (<https://www.ainnovation.com/mmo/matrixvision>)
- Joined the development of the underlying api of Huawei HiSilicon chip (C++), the basic layer of MatrixVision platform
- Manually marked the collected video data and made it a part of the dataset

Online Chinese Chess Game | WEB course project | Lille

June 2020 - June 2020

- Created a game application on web page which permits two players on different web browsers to participate in the same match on live ([Documentation](#))
- Defined the specifications of gameplay, functions and main user interface
- Developed both front end and back end. Realized the database, web page display, as well as game realization

Drone Project, BL evolution (<https://www.bl-evolution.com>) | Co-Leader | Lille

Dec 2018 - Feb 2020

- Designed and assembled devices (drones) to measure various environmental data from the air
- Participated in project establishment, budget estimation, schedule arrangement, work allocation, and final product delivery
- Responsible for analysis, selection of sensors, and the controlling part using Raspberry Pi to monitor/record/store data
- Responsible for the collection of the observed data, represented them on a map database, and applied target detection to the images to identify thermal energy, roof ridges, or green coverage

SKILLS AND INTERESTS

Computer Skills: Python, C, C++, Java, SQL, php, XHTML, CSS, UML, Linux, Matlab, Catia, Office

Language: Mandarin (Native); English (Fluent); French: DELF B2