

## PhD studentship (Full-time)



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| Institution          | Xi'an Jiaotong-Liverpool University, China   |
| Department           | Department of Electrical and Electronic Engineering  |
| Supervisors          | Principle supervisor: Dr. Kaizhu Huang (Xi'an Jiaotong-Liverpool University)<br>Co-supervisor: Dr. Yannis Goulemas (University of Liverpool, UK);  |
| Application Deadline | Open until the position is filled  |
| Funding Availability | Funded PhD project (world-wide students)   |
| Project Title        | Theoretical and Empirical Investigation of Deep Learning for Object Recognition and Computer Vision  |
| Contact              | Please email <a href="mailto:kaizhu.huang@xjtlu.edu.cn">kaizhu.huang@xjtlu.edu.cn</a> (principal supervisor's email address) and copy to <a href="mailto:doctoralstudies@xjtlu.edu.cn">doctoralstudies@xjtlu.edu.cn</a> with a subject line of the PhD project title |

### **Requirements:**

The candidate should have a first class or upper second class honours degree, or a master's degree (or equivalent qualification), in Computer Science, Engineering, Mathematics, and other related areas. Evidence of good spoken and written English is essential. The candidate should have an IELTS score of 6.5 or above, or an equivalent qualification, if the first language is not English. This position is open to all qualified candidates irrespective of nationality.

### **Degree:**

The student will be awarded a PhD degree from the University of Liverpool (UK) upon successful completion of the program.

### **Funding:**

The PhD studentship is available for three years subject to satisfactory progress by the student. The award covers tuition fees for three years (currently equivalent to RMB 80,000 per annum) and provides a monthly stipend of 3500 RMB as a contribution to living expenses. It also provides up to RMB 16,500 to allow participation at international conferences during the period of the award. It is a condition of the award that holders of XJTLU PhD scholarships carry out 300-500 hours of teaching assistance work per year. The scholarship holder is expected to carry out the major part of his or her research at XJTLU in Suzhou, China. However, he or she is eligible for a research study visit to the University of Liverpool of up to three months, if this is required by the project.

**Project Description:**

Deep learning or deep neural network (DNN) has become the most successful artificial intelligence technology in the last ten years. However, most existing DNN models were merely empirically verified to be successful and they might be in lack of theoretical and biological explanations. This project will not only target interesting investigations on how DNN can be useful in real applications like face recognition, object detections, machine translations, and semantic understandings, but also focus on insightful exploration on why these models could achieve superior performance. Novel and significant new DNN models will be expected from the projects. Real prototypes or even innovative products in artificial intelligence could be also incubated from this exciting project.

For more information about doctoral scholarship and PhD programme at Xi'an Jiaotong-Liverpool University (XJTLU): Please visit

<http://www.xjtlu.edu.cn/en/admissions/phd.html>

<http://www.xjtlu.edu.cn/en/admissions/phd/feescholarships.html>

**How to Apply:**

Interested applicants are advised to email [kaizhu.huang@xjtlu.edu.cn](mailto:kaizhu.huang@xjtlu.edu.cn) (principal supervisor's email address) the following documents and copy to [doctoralstudies@xjtlu.edu.cn](mailto:doctoralstudies@xjtlu.edu.cn) (please put the project title in the subject line).

- CV
- Two formal reference letters with company/university letterhead
- Personal statement outlining your interest in the position
- Proof of English language proficiency (an IELTS score of above 6.5 or equivalent is required)
- Verified school transcripts in both Chinese and English (for international students, only the English version is required)
- Verified certificates of education qualifications in both Chinese and English (for international students, only the English version is required)

**Informal enquiries** may be addressed to Dr. Kaizhu Huang ([kaizhu.huang@xjtlu.edu.cn](mailto:kaizhu.huang@xjtlu.edu.cn)), whose personal profile is linked below,

<http://www.xjtlu.edu.cn/en/departments/academic-departments/electrical-and-electronic-engineering/staff/kaizhu-huang>

or [www.premilab.com](http://www.premilab.com)