PhD studentship   (Full-time)

Institution	Xi'an Jiaotong-Liverpool University, China
Department	Department of Mathematical Sciences
Supervisors	Principle supervisor: Lu Zong (Xi'an Jiaotong-Liverpool University). Co-supervisor: Yi Zhang (University of Liverpool, UK); Ahmet Goncu (Xi'an Jiaotong-Liverpool University); David Liu (Xi'an Jiaotong-Liverpool University).
Application Deadline	Open until the position is filled
Funding Availability	Funded PhD project (world-wide students)
Project Title	Modelling Real Estate Bubbles/Anti-bubbles in China: Multi-Dimensional Log-Periodic Power Law Model 房地产泡沫与反泡沫的模型与预测: 宏观经济引导下的多维对数周期性幂率模型
Contact	Please email Lu.Zong@xjtlu.edu.cn (principal supervisor's email address) and copy doctoralstudies@xjtlu.edu.cn 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 the field of mathematics. 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:

Due to the battle between the governmental support and the turmoil of the entity economy, the real estate industry, which acts as the most prominent driver of economic growth in China, is believed to be up to a major correction. This project targets to investigate the current situation of real-estate bubble (in first- and second- tier cities) and anti-bubble (in third- and fourth- tier cities) developments in Chinese cities.

The main contribution of this project is three-fold. First, we extend the theoretical framework of the established log-periodic power-law (LPPL) model. By taking into account macroeconomic factors that have substantial connections with the generation of the real estate bubble, the multi-dimensional LPPL model is adapted in a way that is more suitable for real-estate bubble prediction. Second, we examine the future developments of Chinese real-estate bubble/anti-bubble, namely whether it will end as a housing crisis, or a slow price stabilization. Last, the indices of China real estate bubble/anti-bubble will be designed and computed.

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/feesscholarships.html

How to Apply:
Interested applicants are advised to email Lu.Zong@xjtlu.edu.cn (principle supervisor's email address) the following documents and copy doctoralstudies@xjtlu.edu.cn (please put the project title in the subject line).
- CV
- Two reference letters
- 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. Lu Zong (Lu.Zong@xjtlu.edu.cn), whose personal profile is linked below.
http://www.xjtlu.edu.cn/en/departments/academic-departments/mathematical-sciences/staff/lu-zong