Postdoctoral Position Available at Khalifa University: Composite Manufacturing and Multiscale Modeling

A Postdoctoral Research Fellow position is available immediately in the aerospace department at the Khalifa University of Science and Technology in Abu Dhabi in United Arab Emirates. The research project focuses on Composite materials and manufacturing, Autoclave/out of autoclave techniques, LCM, constitutive and multi-scale computational modeling of the viscoelastic and other inelastic behavior of composites. Those with a background in mechanics of textile composites, continuum mechanics, viscoelasticity/plasticity/viscoplasticity theories, finite element implementation of computational models using UMAT/VUMAT in Abaqus are encouraged to apply.

About Khalifa University:

The newly-established Khalifa University of Science and Technology combines The Masdar Institute of Science and Technology, Khalifa University of Science, Technology and Research and The Petroleum Institute into one world-class, research-intensive institution, seamlessly integrating research and education to produce world leaders and critical thinkers in applied science and engineering. Khalifa University endeavors to be a leader among research intensive universities of the 21st century, while catalyzing the growth of Abu Dhabi and the UAE's rapidly developing knowledge economy.

Khalifa University ranked 1st in Middle East and 15th in Emerging Economies in latest Times Higher Education Rankings. The subject rankings in 'Engineering and Technology', second in the 2018 The Arab World University Rankings, and 32nd out of 359 Asian universities in the 2018 THE Asia University Rankings.

Requirements:

The ideal candidate will have a PhD in a relevant discipline (Engineering Mechanics, Mechanical Engineering, Aerospace Engineering), and an established track record evident by publication in top quality journals. Expertise in one or more of the following areas is a must: mechanics of textile composites, Autoclave/out of autoclave techniques, LCM, theoretical/computational multiscale mechanics of solid, continuum mechanics, viscoelasticity/plasticity/viscoplasticity theories, finite element implementation of computational models using UMAT/VUMAT in Abaqus.

Package:

The position will offer a **very competitive** salary package (tax-free) including housing allowance, relocation and repatriation tickets to home country, and health insurance. The position will be for an initial duration of 12 months (or up to 3 years depending on the candidate background) and extendable depending on performance.

Application submittal information:

Only applications providing all application requirements will be further considered. These requirements should be numbered and attached to the application following this order:

• applicant name and contact information,

- a curriculum vitae including list of publications, awards, with potential start date,
- Short statement of previous work and a description of your vision and your research plan on that field (no more than one A4 page but should be very high quality). It should clearly highlight a vision of the candidate in the field, a prior understanding of the related literature and the definition of key steps towards innovative results in the field. This document will be a key element for the decision process towards recruitment.
- Slides from a recent presentation in a conference or seminar
- Pdf of two most publication considered by the candidate as being representative of his research work
- e-mail and contact information for at least two references.

Materials must be submitted electronically to **Dr. Kamran A Khan** (kamran.khan@ku.ac.ae) specifying in the **e-mail subject** "Postdoctoral-Composite Manufacturing and Multiscale Modeling". Review of applications will begin immediately and continue until the position is filled. The candidate is expected to start at the earliest possible date. While we thank all applicants for their interest, only those under consideration will be contacted for a follow-up interview.