

Mukti Singh

ISMB Report - Gordon Research Seminar and Conference on Elastin, Elastic Fibers & Microfibrils, July 29 – August 4 2017 at the University of New England, Biddeford, Maine, USA.

I am a first year PhD student in Professor Clair Baldock's research group in the Wellcome Trust Centre for Cell-Matrix Research at the University of Manchester. Prior to beginning my PhD, I was a research technician in Professor Baldock's lab, during which I completed a part-time MPhil investigating the structure and interactions of A Disintegrin and Metalloprotease with Thrombospondin type 1 motifs-like (ADAMTSL) proteins, and the aim of my PhD project is to further these investigations.

Earlier this year I had the opportunity to attend the Gordon Research Seminar and Conference on Elastin, Elastic Fibers & Microfibrils held at the University of New England in Maine, USA. This renowned conference is focused on the role of elastic fibres and microfibrils in the regulation of growth factor signaling in development, homeostasis and disease. Having worked in this area of science for several years, the research presented at this conference was highly relevant to my own work, and I am honoured that the ISMB granted me the International Travel Grant for Young Scientists award to attend this prestigious meeting.

The sessions at both the GRS and the GRC covered several areas of matrix biology such as elastic fiber assembly, disease, metabolic function and signalling; each provided me with insights into various aspects and of the research field. The meeting was led by plenary lectures and discussions from experts in the field which were inspiring as well as informative. Many of the presentations and posters at the conference were highly relevant to my own research. For example a presentation given by Dr Dirk Hubmacher (Cleveland Clinic Lerner Research Institute, USA) titled "Limb- and tendon-specific deletion of ADAMTSL2 results in a short-limb phenotype mimicking Geleophysic Dysplasia", not only deepened my understanding of the research area, but also helped me develop my own concepts to further my own research. In addition to this, research presented on areas of matrix biology such as elastic tissue regeneration and translational approaches informed me of the revolutionary advances the field was making. In particular research presented by Dr Willeke Daamen (Radboud University, The Netherlands) on "Tubular scaffolds with shape recovery resulting in radial elasticity" was fascinating.

I was given the opportunity to showcase my own research at the GRS after my abstract was selected for a presentation. My talk entitled "Structure and interactions of ADAMTSL2" presenting the 3D structure of ADAMTSL2 obtained through cryo electron microscopy and novel interactions with other ECM proteins drew in a lot of interest and was also appreciated by the audience. This was my first ever presentation at an international conference and not only has it honed my presentational skills, but the whole experience was invaluable. I also presented my research findings as a poster at both the GRS and GRC. This was a fantastic opportunity for me to directly interact with other researchers and leaders in the field, as well as obtain valuable feedback and advice.

Attending the GRS and GRC meeting allowed me to learn about emerging research, trends and techniques in my field as well as network with other scientists working in this and related fields. However, the GRS and GRC were not only learning experiences for me but they also allowed me to develop my own interpersonal skills through interactions with fellow scientists. I was able to form valuable connections that will in the future benefit my research as well as enhance the research efforts of the lab I work in. I have also made several friends through the great social atmosphere present at the meeting.

I would personally describe the meeting as a positive and successful experience as not only did I get to learn from the experts in my field and present my research, but I also was honoured to be elected

as the vice-chair of the next GRS which will be held in 2019! I am greatly looking forward to the privilege of getting involved with organising this impressive meeting as well as participating in it again.

The GRS and the GRC meetings not only celebrate the ground-breaking progress matrix biology is making, but also inspire and motivate researchers to contribute towards this rapidly growing field. I would once again like to thank the ISMB for making my participation in the conference possible and for supporting young scientists like myself.