



MQ Photonics Research Centre Seminar

1) **Speaker:** *Mr Muye Li*

Title: Tunable IR CW Resonantly Pumped Raman Laser

Bio: My current research is focused on extending the wavelength coverage of continuous-wave tunable laser systems such as Ti:sapphires. My aim is to build a ring cavity diamond Raman laser to achieve single-longitudinal mode lasing at second Stokes shifted wavelengths. A theoretical model is developed to describe the behavior of resonantly pumped cascaded Raman lasers. The new wavelength range accessed by the laser can be applied in quantum physics, biology imaging, precision measurement, etc. This work is under the supervision of Prof. David Spence and Dr. Ondrej Kitzler from MQ Photonics research center, Department of Physics and Astronomy.

2) **Speaker:** *Ms Fatima Tuz Zahra*

Title: A new seeding process for low-temperature microcrystalline diamond growth

Bio: Fatima is currently working on low temperature (<500C) growth of microcrystalline diamond thin films. The aim of my project is to encapsulate the electronic devices in diamond thin films for thermal management applications. Fatima is in the 3rd year of her Ph.D. working under the supervision of A/Prof. James Downes and Prof. Michael Heimlich.

When: Wednesday 13 November 2019

Time: 2pm

Where: Multipurpose room, 2.300 7WW