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FIVE MORE SETS OF EARS TO 'HEAR' THE SOUNDS OF THE UNIVERSE

Five PhD students from The University of Western Australia involved in one of the most challenging international scientific endeavours ever undertaken – to directly detect vibrations of space called gravitational waves – will be awarded their doctorates at a graduation ceremony on Monday.

The students: Jean-Charles Dumas, Pablo Barriga, Slawomir Gras, Eric Howell and Andrew Sunderland, were all co-supervised by internationally recognised physicist Winthrop Professor David Blair. It is the first time five PhD students with the same supervisor from the UWA School of Physics have graduated together.

Einstein predicted gravity waves, generated by the formation of black holes in the universe. While physicists agree the theory is sound, nobody has detected them yet. Since antiquity, our only source of information about the stars has been through their electromagnetic radiation.

Developments in technology have allowed us to expand our window on the universe from strictly visible variation to infrared, microwave, radio, ultra-violet, x-ray radiation. Gravitational wave astronomy offers an entirely new spectrum of radiation through which to explore the universe. Whereas electromagnetic telescopes are our eyes on the universe, gravity wave detectors constitute 'ears' which will allow us to 'hear' for the first time the 'sounds' produced by the universe.

Professor Blair, Director of the UWA-based Australian International Gravitational Research Centre, said he and his team were among the world leaders in the race to detect the waves, despite other countries spending hundreds of millions of dollars more on their research.

MEDIA REFERENCE

Winthrop Professor David Blair (Director AIGRC) (+61 8) 6488 2736 / (+61 4) 09 687 703
Janine MacDonald (UWA Public Affairs) (+61 8) 6488 5563 / (+61 4) 32 637 716