



**VOLUME 37 NUMBER 16**

29 April – 5 May 2011

## **CONGRATULATIONS**

A belated congratulations for the announcement made on 23 March in the Oliphant Link Tea Room. Congratulations to nine new members of tenured staff: Jodie Bradby, Ben Buchler, Lan Fu, Patrick Kluth, Elena Ostrovskya, Daniel Shaddock, Adrian Sheppard, Andrey Sukhorukov and Andrew Truscott - the most tenured positions announced at any one time in the history of the school.

## **STAFF MOVEMENTS**

From the Department of Nuclear Physics, Prof David Hinde will be overseas from 29 April-9 May. He will be attending as an invited speaker the 5<sup>th</sup> International Conference FUSION11, Saint-Malo, France. Prof Andrew Stuchbery will be acting HOD in this time. Dr Evers and PhD students Messrs Luong and Wakhle will also be presenting talks at FUSION11 and will return 12, 11 May and 14 June respectively.

From the Department of Electronic Materials Engineering, Drs Mark Ridgway, Hoe Tan, Simon Ruffell and Patrick Kluth will attend the EMRS conference, France during May. Drs Mark Ridgway, Stefan Decoster, Fouad Karouta and Mr Thomas Bierschenk will conduct experiments in Melbourne during May. Dr Xijun (Gordon) Li will attend training courses in Germany 7 May-23 May. Prof Robert Elliman, Drs Simon Ruffell and David Sprouster will be attending the MRS Spring Meeting, USA, 23 April-1 May. Prof Jagadish and Dr Fu Lan will visit Macquarie Uni 28 April.

## **SCHOOL SEMINAR PROGRAM**

**Thursday 5 May, 4pm**

*Turbulence in fluid layers*

Dr Hua Xia, Plasma Research Laboratory

Drinks and light refreshments will be provided after the Seminar for all attendees.

## **IQEC/CLEO PACIFIC RIM 2011**

**28 August - 1 September, Sydney**

**ABSTRACT DEADLINE TODAY.** The largest international laser-based conference to be held in the Southern Hemisphere. This is a perfect chance for students and early career researchers to experience a major international conference in Australia, and to showcase the excellent research being done here. Abstract deadline TODAY, details here:

<http://www.iqec-cleopr2011.com/call-for-abstracts/>

## **SCHOOL SEMINARS**

**Nuclear Physics: Monday 2 May, 11.15am**

Nuclear Physics Seminar Room *Radiation-based measurement and imaging for industrial applications*

Dr James Tickner, CSIRO Process Science and Engineering

## **EDUCATION BULLETIN**

A learning goal is an aspirational statement about the purpose of the major, framed as competencies that can be assessed. For draft set of learning goals for the undergraduate Physics Major. Comments and suggestions to Craig Savage.

### Physics Major Learning Goals

1. Be able to describe and explain the fundamental principles of physics, including those of: mechanics, electromagnetism, quantum mechanics, and thermal and statistical physics.
2. Be able to apply the fundamental principles of physics to solve problems, including those likely to be encountered in future careers. Such problems may involve ambiguity and uncertainty and require the application of multiple principles.
3. Be able to integrate the fundamental principles of physics to describe and explain specialised areas of physics.
4. Be able to describe and explain specific examples of how physics is applied to benefit people.
5. Be able to describe critical experiments in the history of physics and explain how they led to revisions of our theoretical descriptions of nature.
6. Be able to use mathematical, computational and experimental skills to solve conceptual and quantitative problems in physics.
7. Demonstrate skills including: equipment familiarity, data gathering, record keeping, data analysis, dealing with uncertainty, experiment design, and comparison with theory.
8. Be able to analyse unfamiliar physical systems and provide order-of-magnitude estimates of quantities. This includes a knowledge of basic physical constants and key equations.
9. Be both creative and rigorous in the design and construction of scientific investigations of physical systems.
10. Be able to effectively communicate physics based analyses to expert and non-expert audiences.
11. Be able to constructively criticise evidence, arguments and conclusions wherever they are encountered.

## **OHS BULLETIN**

Training Sessions in May

Laser Safety: **18 May, 9am – 1pm**

OH&S for Supervisors: **23 May, 1 - 4 pm**

Ionizing Radiation Safety: **26 May, 9am – 1pm**

Contact OH&S Manager, Anthony Hyde 50105