2016-09-28

Brief Report on Commission on Computational Physics (C20) Activities

1) C20 Commission Chair: Hai-Qing Lin (China) Vice-chair: David P. Landau (US) Secretary: Joan Adler (Israel) Members: Constantia Alexandrou (Cyprus) Mark Brachet (France) Ronald Dickman (Brazil); Hans Fangohr (UK); Suklyun Hong (Korea); Masatoshi Imada (Japan); Georg Kresse (Austria); Richard Liska (Czech Republic); Priya Mahadezvan (India); Lev Shchur (Russia); Maria-Roser Valent (Germany);

Associate members Nithaya Chetty (South Africa); Rodolphe Vuilleumier (France); Yuan Ping Feng (Singapore)

Observer Alex Hansen

2) Conference on Computational Physics (CCP) and Others

(a) Conference "Computer Simulations in Physics and beyond" was successfully held 06-10 September 2015 in Moscow, Russia, organized by Professor Lev Shchur of Landau Institute for Theoretical Physics, Scientific Center in Chernogolovka and National Research University Higher School of Economics. Details could be found in: http://csp2015.ac.ru.

(b) CCP2015 was successfully held at the Indian Institute of Technology Guwahati, Assam, India from 2 to 5 December 2015, organized by Professors Sitangshu Bikas Santra of the Indian Institute of Technology at Guwahati and Purusattam Ray of the Institute for Mathematical Sciences in Chennai at the IIT campus in Guwahati.

In addition to IUPAP sponsoring and endorsing the event, the American Physical Society (APS), Association for Asia Pacific Physical Society (AAPPS) and the European Physical Society (EPS) are also sponsors and active collaborators. Around 350 physicists and researchers around the world are expected to participate in this conference to discuss the latest developments in the field of computational physics and their applications in widely varied research fields such as nuclear and particle physics, astrophysics and cosmology, accelerator and plasma physics, atomic, molecular and optical physics, condensed matter theory, strongly correlated systems, nano sciences, complex system, chaos and statistical physics, computational physics education, etc.

The conference report form can be accessed on the following IUPAP web link: <u>http://iupap.org/sponsored-conferences/conference-report-form/</u>

(c) CCP2016 was successfully held at St George's Hotel Pretoria, South Africa, 10-14 July 2016, organized by Prof. Nithaya Chetty and Prof. Brian Masara and hosted by the South African Institute of Physics. The organizer will submit the conference report to IUPAP soon.

(d) CCP2017 is going to be held in Paris, France, 09-13 July 2017, organized by Prof. Rodolphe Vuilleumier, Marco Saitta, and Riccardo Spezia. They have booked already the new conference center in the Campus Jussieu (right in the center of Paris) for the conference. See the attached poster.

(e) CCP2018 is going to be held in Davis, California, organized by Prof. Barry Klein, possibly July 29-Aug 02, 2018.

3) Young Scientist Prize (YSP)

(a) The 2015 YSP was awarded to Dr. Wei-Min Wang at Laser-plasma physics of the Institute of Physics, Chinese Academy of Sciences, China "for his significant achievements in computational plasma physics with applications to advanced schemes of inertial confined fusion and novel laser-plasma based particle accelerators and radiation sources." The prize was presented at the CCP2016, because Dr. Wang cannot attend CCP2015 due to visa problem.

(b) The 2016 YSP was awarded to Dr. Wei-Min Wang at Temple University (then, now at University of Texas at El Paso), USA "for his innovative and deep achievements in developing efficient and accurate density functionals for computation in quantum chemistry, materials science, and condensed matter physics". The prize was presented at the CCP2016.

(c) The 2017 YSP is calling for nominations. The announcement is also attached.

4) Other Matters

(a) Our commission submitted a supporting letter to IUPAP for the endorsement of ICCP10, which is organized by University of Macau in January, 2017.

H.Q. Lin, C20