

THEORY CANADA 11 CONFERENCE: YET ANOTHER SUCCESS

BY THOMAS GRÉGOIRE AND SVETLANA BARKANOVA



The Theory CANADA conference, launched in 2005 as a satellite conference for the annual Canadian Association of Physicists (CAP) congress, celebrated its 10th-year anniversary in 2015^[1] and was yet another success in 2016. This unique conference brings together theorists from all regions of Canada, aiming to foster collaboration and exchange of ideas across disciplines. One of the goals of Theory CANADA is to give an opportunity to physicists from across various subfields to learn from each other so all the sessions of the conference are plenary, with no parallel talks, and always plenty of time set aside for discussions and informal interactions. Another goal is to engage the new generation of Canadian physicists, like new faculty members, postdocs and graduate students. The broad themes of the conference are normally (i) Mathematical Physics, (ii) Quantum Gravity and Strings, (iii) Particles and Fields, (iv) Relativity, Gravitation and Cosmology, (v) Condensed Matter Theory, and (vi) Quantum Information.

The 11th edition of the Theory CANADA conference was held from Friday June 10 to Saturday June 11 2016 at Carleton University in Ottawa, right before the beginning of the CAP congress at the University of Ottawa. There were more than 50 participants from all over Canada, from British Columbia to Newfoundland. The participants were theoretical physicists working in various subfields, from cosmology to theoretical condensed matter physics.

After introductory remarks by Carleton's Dean of Science Malcom Butler, also a theorist, the DTP/WITP thesis prize was presented to Vincent Genest (Ph.D., Université de Montréal) for his thesis entitled "Algebraic Structures, Super-Integrable Systems and Orthogonal Polynomials". The prize has been jointly awarded by the Division of Theoretical Physics (DTP) and the Winnipeg Institute for Theoretical Physics (WITP) to a student receiving a Ph.D. degree in Physics from a Canadian University with a thesis in Theoretical Physics. Vincent, who is now at MIT, was

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Participants of Theory CANADA 11 at Carleton University.

also an invited speaker for Theory CANADA 11 giving the opening talk of the conference in the “Mathematical Physics and Quantum Computing” session. The other sessions of the Friday were “String Theory” and “Condensed Matter”.

At the end of the talks on Friday the participants were invited to a reception which was then followed by a public lecture on gravitational waves. The lecture was given by Harald Pfeiffer from the University of Toronto and CITA. It was a big success with over 200 attendees and a long question period at the end. Following the lecture, everybody was invited to observe the moon with Etienne Rollin, a lab supervisor in the department, who had brought his telescope for the occasion. On Saturday we had the “Particle Physics” and “Cosmology, Astrophysics and Gravitation” sessions. Finally, the conference ended with a banquet at the East India Company restaurant in downtown Ottawa.

The conference was a big success with 32 talks, 8 of which were by invited speakers. Details from the conferences and most of the presentations can be found at <http://physics.carleton.ca/theory-canada-11> and <https://indico.physics.carleton.ca/event/0/>.

The organizing committee consisted of Thomas Grégoire (Carleton U., Chair of the Organizing Committee), Steve Godfrey (Carleton U.), Heather Logan (Carleton U.), Daniel Stolarski (Carleton U.), Svetlana Barkanova (Acadia, DTP Chair), and Ariel Edery (Bishop, DTP Vice-Chair).

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Theory CANADA 12 will be hosted by York University (Toronto, Ontario), May 25-27, 2017, right before the CAP Congress hosted by Queen’s University (Kingston, Ontario), May 29 – June 2, 2017. As it is customary for Theory CANADA conferences, we will sponsor accommodation of invited speakers, graduate students and postdoctoral fellows, and, funding permitting, accommodation to all participants. There are no registration fees for the CAP Congress delegates, and we will organize transportation from TC to CAP (Toronto to Kingston). Please contact the TC12 conference chair, Matthew Johnson, Physics & Astronomy at York University, matthewj@yorku.ca for details.

REFERENCE

1. Manu Paranjape, “Ten Years of Theory CANADA”, *Physics in Canada*, **71**(3), 199-201 (2015).