

Submittee: Vladimir Troitsky
Date Submitted: 2017-08-21 20:48
Title: Positivity IX
Event Type: Conference-Workshop

Location:
University of Alberta

Dates:
July 17-21, 2017

Topic:
Positivity (order structures in analysis and applications)

Methodology:
We had 9 plenary lectures and 8 semiplenary lectures, the rest of the talks were in two parallel sessions. One speaker could not attend in person due to a disability; his lecture was partially skyped in and partially presented by another participant.

Objectives Achieved:
Objective 1: As Positivity conferences are held every second year, this conference was supposed to be a major event for the Positivity community. This goal was achieved: most of leading Positivity researches attended the conference. This was one of the largest Positivity conferences; it was about twice as large as the previous one. This was especially challenging given that it was the first Positivity conference outside of Eurasia. This conference was a venue for experts on Positivity from all over the world to get together and to exchange recent discoveries and open questions, to discuss new trends, to make contacts, and to start new collaborations.

Objective 2: Focus of recent and actively developing areas of Positivity, including measure-free stochastic analysis, unbounded convergences and their applications to Math Economics, Banach lattice algebras and positive representations, etc, This was achieved by selecting plenary talks in these areas.

Objective 3: Provide opportunities for bright HQPs to showcase their work to the Positivity community. This was achieved by having many talks given by HQP, including some of the plenary and semi-plenary talks.

Scientific Highlights:
The conference focused on modern and active areas. In particular:

1. J.Grobler and C.Labuschagne presented a theory of "measure-free" stochastic integration in

vector lattice setting;

2. D.Leung, N.Gao, and F.Xanthos presented new applications of order convergence to Math Economics.

3. About ten talks were devoted to unbounded convergences; this new area has only started around 2014.

4. A.Tcaciuc presented a complete solution to the Almost Invariant Halfspace Problem for an arbitrary operator on any Banach spaces.

5. M.de Jeu and his students presented an overview of the newly emerging area of positive representations.

6. A. Wickstead presented a solution to a long-standing open problem related to the Riesz-Kantorovich formula.

Please see the conference program (attached) for more highlights.

Organizers:

Troitsky, Vladimir, Department of Mathematical and Statistical Sciences, University of Alberta
Xanthos, Foivos, Department of Mathematics, Ryerson University

Speakers:

Attached

Links:

<http://www.math.ualberta.ca/~vtroitsky/positivity2017/index.html>

Comments / Miscellaneous:

Many talks were presented by young researchers.

File Uploads:

Additional Upload 1: http://www.pims.math.ca/files/final_report/program_0.pdf

Additional Upload 2: http://www.pims.math.ca/files/final_report/schedule_3.pdf
