

Soumyashant Nayak

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Postdoctoral Affiliation	<i>Postdoctoral Researcher in Bioinformatics</i> at the Institute for Translational Medicine and Therapeutics, Smilow Center for Translational Research in the Perelman School of Medicine, University of Pennsylvania . (September 2016 - present) Mentored by Gregory Grant .
Education	<i>Philosophiae Doctorate in Mathematics</i> , awarded by the University of Pennsylvania , Philadelphia in August 2016. Thesis - <i>On the Diagonals of Projections in Matrix Algebras over von Neumann Algebras</i> Advisor - Richard V. Kadison <i>Bachelor of Mathematics (Hons.)</i> , Mathematics (2008-2011) Indian Statistical Institute , Bangalore Centre
Research Interests	Operator Algebras, Statistical Methods in Bioinformatics
Awards and Honors	<ul style="list-style-type: none">• Benjamin Franklin Fellowship - University of Pennsylvania, 2011 - present.• KVPY fellowship , Dept. of Science and Technology, Govt. of India, 2006-2011• Selected for the Summer Research Fellowship Programme (SRFP) for 2 consecutive years, 2010-2011 by Indian Academy of Sciences• Selected among top 30 students in India in the Indian National Mathematical Olympiad (INMO) for 3 consecutive years, 2006-2008• Gold Medal in International Olympiad on Astronomy and Astrophysics (IOAA) 2007 held at Chiang Mai, Thailand• Bronze Medal in International Astronomy Olympiad (IAO) 2006 held at Mumbai, India• Silver Medal in International Astronomy Olympiad (IAO) 2005 held at Beijing, China• Placed among top 1% in National Standard Examination in Physics 2007
Teaching Experience	<i>Instructor, University of Pennsylvania</i> <ul style="list-style-type: none">• Math 241, Calculus IV, Introduction to Partial Differential Equations (Summer Session II, 2016)• Math 170, Ideas in Mathematics (Full Summer Session 2016)• Official Math Help Tutor, All Undergraduate Courses (Summer Session II, 2015)• Math 114, Introduction to Multivariable Calculus (Summer Session II, 2013) <i>Teaching Assistant, University of Pennsylvania</i> <ul style="list-style-type: none">• Math 608, Complex Analysis, Fall 2014• Math 509, Advanced Analysis, Spring 2014• Math 180, Analytical Methods in Economics, Law and Medicine, Fall 2013• Math 425, Partial Differential Equations, Spring 2013

Conferences Attended

- Math 312, Linear Algebra, Fall 2012
- COSy - 2017 at Lakehead University. 29 May - 1 June, 2017
- NCGOA - 2016 at University of Bonn. 17-25 May, 2016
- CBMS conference at University of Wyoming, Laramie. 8-12 June, 2015
- RMMC Summer School at University of Wyoming, Laramie. 1-5 June, 2015
- GPOTS - 2015 at Purdue University, West Lafayette. 26-30 May, 2015
- Classification Of C*-Algebras, Flow Equivalence of Shift Spaces, And Graph and Leavitt Path Algebras at University of Louisiana, Lafayette. 11-15 May, 2015
- Lecture Series on Quantum Groups by Dr. Moritz Weber at the Institute of Mathematical Sciences, Chennai. 5-24 Jan, 2015
- 2013 CNA Summer School: Topics in Nonlinear PDEs and Calculus of Variations, and Applications in Materials Science, at CMU, Pittsburgh. 29 May - 7 June, 2013
- NCGOA - 2013 at Vanderbilt University, Nashville. 3-9 May, 2013
- Riviere-Fabes Symposium at University of Minnesota, Twin Cities. 19-21 April, 2013
- 3rd Ohio River Analysis Meeting at University of Cincinnati. 9-10 March, 2013

Talks

Colloquia and Seminar Talks

- SOPM - 2017 at NISER, Jatni (Bhubaneswar), June 24, 2017
- Analysis Seminar at Drexel University, April 14, 2017
- Seminar series on Derivations and Automorphisms of Operator Algebras, University of Pennsylvania, Spring 2014

Contributed Talks

- The Hadamard Determinant Inequality, Canadian Operator Algebras Symposium - 2017
- Numerical ranges, convexity and C*-convexity, RMMC Summer School - 2015
- The Schur-Horn Theorem and the Pythagorean Theorem, GPOTS - 2015

Graduate Student Seminars

- *Derivation of Vlasov Equation*, Landau Damping seminar, Jan 2013
- *Pontryagin Duality*, graduate student seminar, November 2012
- *Morse Lemma and Morse Inequalities*, graduate student seminar, February 2012