#### **CURRICULUM VITAE**

- Name: KRISTÁLY Alexandru
  Birth of date: 22 March 1975
- 3. Citizenships: Romanian, Hungarian
- 4. E-mail: alexandrukristaly@vahoo.com, alexandru.kristaly@econ.ubbcluj.ro

## 5. Studies

- 1. *PhD*, Babeş-Bolyai University, Faculty of Mathematics and Informatics, Cluj-Napoca, 1998-2003. Title of dissertation: Critical and equilibrium points for set-valued maps. Scientific advisor: dr. Wolfgang W. Breckner;
- 2. *Master degree*, Babeş-Bolyai University, Faculty of Mathematics and Informatics, Cluj-Napoca, 1997-1998. Title of dissertation: Closed geodesics. Scientific advisor: dr. Csaba Varga;
- 3. *Bachelor degree*, Babeș-Bolyai University, Faculty of Mathematics and Informatics, Cluj-Napoca, 1993-1997.
- 4. High School Graduate, Márton Áron High School, Miercurea-Ciuc, 1989-1993.

#### 6. Academic positions

- Associate Professor, Babeş-Bolyai University, Faculty of Economics, Cluj-Napoca, Romania, 2007-present.
- *Lecturer*, Babeș-Bolyai University, Faculty of Mathematics and Informatics, Cluj-Napoca, Romania, 2003-2007.
- Assistant Professor, Babeş-Bolyai University, Faculty of Mathematics and Informatics, Cluj-Napoca, Romania, 2001-2003.
- *Junior Assistant Professor*, Babeş-Bolyai University, Faculty of Mathematics and Informatics, Cluj-Napoca, 1998-2000.

# 7. Fellowships & visits (selective list)

# 7.1. Postdoctoral fellowships

- 1. **J. Bolyai Research Fellowship**, Hungarian Academy of Sciences, Budapest, Hungary, 2009-2012 (in progress).
- 2. **Junior Research Fellowship**, Central European University, Special and Extension Programs, Budapest, Hungary, 3 months (01 November 2005 31 January 2006).
- 3. **Domus Hungarica,** Hungarian Academy of Sciences, University of Debrecen, Debrecen, Hungary, 3 months in 2005 and 2006.
- 4. **Young Researcher**, Geometrical Analysis, EU Research Training Network PRN-CT-999-00118/2000-2004, Institute of Mathematics of the Polish Academy of Sciences, Warsaw, Poland, 4 months (1 June 31 August 2003, and 20 January 20 February 2004).

### 7.2. Visits to prestigious institutions

- 1. Institut des Hautes Etudes Scientifiques (IHES), Bures-sur-Yvette, France, 15 March-15 April 2011.
- 2. Professori visitatori, Istituto Nazionale di Alta Matematica (INDAM), Universita di Catania, Catania, Italy. 01 June 2005 30 July 2005, 01-15 September 2009, 08-22 January 2011.
- 3. Mathematisches Institute, Universitat Bern, 01-15 December 2011, 01-15 May 2011, 15 November 31 December 2011.
- 4. Centro di Ricerca Matematica Ennio De Giorgi, Scuola Normale Superiore, Pisa, 13-23 February 2005.

### 8. Awards

- 1. Award for Scientific Research (Premiul Cercetării Științifice), Babeș-Bolyai University, 2007, 2009, 2011.
- 2. The papers published in 2007-2012 have been awarded by CNSC/UEFISCDI within the project Resurse Umane/Premierea rezultatelor cercetarii.

### 9. Conferences & talks (selective list)

- 1. Winter School on Abstract Analysis, Lhota nad Rohanovem, Czech Republic, 3-10 February, 2001. (Presented: Coerciveness property for a class of set-valued mappings).
- International Conference in Nonlinear Differential Equations and Applications (ICNODEA), Cluj-Napoca, 22-27 August, 2004 (Presented: Multiplicity results for an eigenvalue problem for hemivariational inequalities in strip-like domains). http://www.cs.ubbcluj.ro/www/index.php?module=pagemaster&PAGE\_user\_op=view\_page&PAGE\_id=5 5&MMN position=46:46
- 3. University of Messina, Messina, Italy, 12 June, 2005 (Presented: Multiple solutions of certain elliptic problems on unbounded strips).
- 4. University of Reggio Calabria, Reggio Calabria, Italy, 13 June, 2005 (Presented: Infinitely many homoclinic solutions for an elliptic problem in R<sup>N</sup>).
- 5. The 22th IFIP TC 7 Conference on System Modelling and Optimization, 18-22 July, 2005, Politecnico di Torino, Italy. (Presented: Infinitely many solutions for a differential inclusion problem in R<sup>N</sup>).
- 6. *Invited main speaker* at The 5th ISAAC Congress, 25-30 July, 2005, University of Catania, Italy. (Presented: Elliptic eigenvalue problems on unbounded domains involving sublinear terms). http://atlas-conferences.com/cgi-bin/abstract/capg-01
- 7. Central European University, Budapest, Hungary, 7 December, 2005 (Presented: Multiple solutions of sublinear elliptic problems in R<sup>N</sup>).
- 8. Central European University, Budapest, Hungary, Mini-workshop: Recent advances in calculus of variations, 30 April 7 May, 2006. (Presented: One-dimensional scalar field equations involving an oscillatory nonlinear term)http://web.ceu.hu/math/News&Events/Archives/Archives\_2006\_2009.html
- 9. Mini-workshop: New Advances in Applied Mathematics, Central European University, Budapest, 27-28 September 2006.(Presented: Quasilinear elliptic problems with oscillatory nonlinearities). http://web.ceu.hu/math/News&Events/Archives/Archives 2006 2009.html
- 10. University of Perpignan, Perpignan, France, 27 March, 2007. (Presented: Sublinear eigenvalue problems on compact Riemannian manifolds).
- 11. Workshop "Topological and variational methods for differential equations", University of Rousse, Rousse, Bulgaria, 7-11 May, 2007. (Presented: Sublinear eigenvalue problems on compact Riemannian manifolds with applications in Emden-Fowler equations).
- 12. "International Workshop on Applied Evolution Equations", Central European University, Budapesta, Ungaria, 21-25 May, 2007. (Presented: Homoclinic solutions for an elliptic problem in R<sup>N</sup> with oscillatory terms).

# http://web.ceu.hu/math/News&Events/Archives/Archives\_2006\_2009.html

- 13. Universita di Messina, Italy, 26 June 2007. (Presented: Sublinear eigenvalue problems on compact Riemannian manifolds).
- 14. Universita di Catania, Italy, 28 June 2007. (Presented: Asymptotically critical problems on spheres).
- 15. International Conference in Nonlinear Differential Equations and Applications (ICNODEA), Cluj-Napoca, 3-8 July 2007. (Presented: Elliptic problems in R<sup>N</sup> involving oscillatory nonlinearities). http://www.cs.ubbcluj.ro/~icnodeacj/icnodea 2007.htm

- 16. Workshop on "Critical Point Theory and its Applications", Babes-Bolyai University, Cluj-Napoca, 9-14 July, 2007. (Presented: Asymptotically critical problem on higher dimensional spheres).
- 17. Spring School in Nonlinear Partial Differential Equations, Louvain-la-Neuve, Belgium, 26-30 May, 2008. (Presented: Detection of arbitrarily many solutions for perturbed elliptic problems involving oscillatory terms). http://www.uclouvain.be/math-spring-school-pde-2008.html
- 18. Central European University, Department of Mathematics and its Applications, Budapest, 2 October, 2008. (Presented: Best approximation problems on Finsler-Riemann manifolds). http://web.ceu.hu/math/News&Events/Archives/Archives 2006 2009.html
- 19. Universita di Messina, Italy, 10 September 2009. (Presented: Arbitrary many solutions for a perturbed problem).
- 20. Universita di Catania, Italy, 14 September 2009. (Presented: On a new class of elliptic systems with nonlinearities of arbitrary growth).
- 21. Eotvos Lorand University, Budapest, Hungary, 19 November 2009. (Presented: Metric projections and Nash equilibrium points on manifolds, in Hungarian).
- 22. The 7th Bolyai-Gauss-Lobachevsky Conference, International Conference on Non-Euclidean Geometry and its Applications, Cluj-Napoca, Romania, 5-9 July 2010. (Presented: Nash-Stampacchia equilibrium points on Riemannian manifolds).
  - http://blg.math.ubbcluj.ro/mainp.php?pg=prog
- 23. Institute of Mathematics "Simion Stoilow" of the Romanian Academy, Bucharest, Romania, Monthly Seminar Series, 17 November 2010. (Presented: Elliptic problems involving oscillatory nonlinearities).
  - http://www.imar.ro/~purice/Inst/Conf-Iunara-IMAR.html
- 24. University of Bern, Bern, Switzerland. 07 December 2010. (Presented: Nash-type equilibria on Riemannian manifolds: questions and perspectives).
  - http://www.mathstat.unibe.ch/content/lehrveranstaltungen/master\_mathematik/herbstsemester\_2010/oberseminar\_analysis/index\_ger.html
- 25. Universita di Messina, Messina, Italy, 13 January 2011. (Presented: Multiple solutions for an elliptic equation on the whole space).
- 26. Universita di Catania, Catania, Italia, 20 January 2011. (Presented: A dimension-depending multiplicity result for the Schrödinger equation).
- 27. International Conference on Nonlinear Operators, Differential Equations and Applications, 5-8 July 2011. Cluj-Napoca, Romania. (Invited speaker). (Presented: Anisotropic elliptic problems involving asymmetric Minkowski norms).
  - http://www.cs.ubbcluj.ro/~icnodeacj/plenary%20 speakers.htm
- 28. Budapest University of Technology and Economics, Budapest, Hungary, 15 September 2011. (Presented: Symmetrization principles and elliptic problems: isotropic and anisotropic phenomena) http://www.renyi.hu/~seminar/szept.html
- 29. University of Bern, Bern, Switzerland, 19 December 2011. (Presented: Nash-type equilibria on Riemannian manifolds).
  - http://www.math-stat.unibe.ch/content/lehrveranstaltungen/master\_mathematik/fruehjahrssemester 2012/mathematical colloquium/index ger.html
- 30. Budapest University of Technology and Economics, 30 January-03 February 2012. Intensive minicours (in Hungarian): (Presented: Calculus of variations and PDEs). http://www.math.bme.hu/uploads/meghivo kristaly 2U.pdf
- 31. Central European University, Department of Mathematics and its Applications, Budapest, Hungary, 22 June 2012. (Presented: The Schrödinger-Maxwell system involving sublinear terms).
  - http://mathematics.ceu.hu/news/2012-06-16/lecture-by-professor-alexandru-kristaly-romania-on-june-22-2012

### 10. Editorial activity and Commitees

- Member in the Editorial Board of Studia Universitatis Babeş-Bolyai Mathematica (2010- present) and Analele Universității din Timișoara, Seria Matematica (2012 –present).
- Member in the National Research Council (2011-present).
- Member in Doctoral Commitees:
  - 1. University of Craiova (2009). Title: Topological methods in the study of boundary value problems. PhD candidate: M.-M. Boureanu.
  - 2. Babeş-Bolyai University (2009). Title: Contributii la conceperea, proiectarea si implementarea unor sisteme de asistare a deciziilor utilizand algoritmi genetici. PhD candidate: L. Illés.
  - 3. University of Debrecen, Debrecen, Hungary (2009). Title: Ehresmann-manifolds, sprays, and transformations of D-manifolds. PhD candidate: J. Pék.
  - 4. Central European University, Budapest, Hungary (2011). Title: Iterative processes for solving nonlinear operator equations. PhD candidate: O. A. Boikanyo.

#### 11. Grants

- **Director** in the research project CNCS-UEFISCDI/PN-II-ID-PCE-2011-3-0241 (2011-2014). Title: Symmetries in elliptic problems: Euclidean and non-Euclidean techniques (1.200.000 lei)
- **Director** in the research project CNCSIS/PN-II-ID-527 (2007-2010). Title: Application of recent variational methods to the study of nonlinear elliptic PDEs and optimization problems (777.633 lei)
- **Director** in the research project CNCSIS/PN-AT 8/70 (2006-2007). Title: Study of elliptic problems via critical point theory (59.000 lei)
- **Member** in the research project CNCS-UEFISCDI/PN-II-RU-TE-2011-3-004 (2011-2014). Title: Recent problems in Computer Aided Geometric Design. Director: dr. Róth Ágoston.
- **Member** in the research project CNCS-UEFISCDI/PN-II-ID-PCCE-55/2008 (2010-2013). Title: Nonlinear systems in Mathematical Analysis and applications. Director: dr. Radu Precup.
- **Member** in the research project CNCS-UEFISCDI/PN-II-ID-PCE-2162/2008 (2008-2011). Title: Nonsmooth phenomena in nonlinear elliptic problems. Director: dr. Hannelore Lisei.

8 August 2012

Kristály Alexandru