

Current position

2009– Maître de Conférences (Assistant Professor), University of Nice - Sophia Antipolis

Former positions and education

2008–2009 ATER (Instructor), University of Cergy-Pontoise

2005–2008 Ph.D. Thesis, University of Cergy-Pontoise

2005 Agrégation de Mathématiques (teaching diploma)

Ph.D.

Title: Elliptic and anisotropic nonlinear equations

Thesis advisor: Emmanuel Hebey

Defended on December 4, 2008 at the University of Cergy-Pontoise.

Papers

- (10) Strong maximum principles for anisotropic elliptic and parabolic equations, *Advanced Nonlinear Studies* **12** (2012), no. 1, 101–114.
- (9) The blow-up of critical anisotropic equations with critical directions, *NoDEA Nonlinear Differential Equations and Applications* **18** (2011), no. 2, 173–197.
- (8) Existence and regularity for critical anisotropic equations with critical directions, *Advances in Differential Equations* **16** (2011), no. 1/2, 61–83.
- (7) Bounded stability for strongly coupled critical elliptic systems below the geometric threshold of the conformal Laplacian, with Olivier Druet and Emmanuel Hebey, *Journal of Functional Analysis* **258** (2010), no. 3, 999–1059.
- (6) Asymptotic stability, convexity, and Lipschitz regularity of domains in the anisotropic regime, *Communications in Contemporary Mathematics* **12** (2010), no. 1, 35–53.
- (5) Blow-up solutions for asymptotically critical elliptic equations on Riemannian manifolds, with Anna Maria Micheletti and Angela Pistoia, *Indiana University Mathematics Journal* **58** (2009), no. 4, 1719–1746.
- (4) A priori estimates for solutions of anisotropic elliptic equations. *Nonlinear Analysis: Theory, Methods & Applications* **71** (2009), no. 9, 3881–3905.
- (3) Sharp Sobolev asymptotics for critical anisotropic equations, with Abdallah El Hamidi, *Archive for Rational Mechanics and Analysis* **192** (2009), no. 1, 1–36.
- (2) Multiple solutions for critical elliptic systems in potential form, with Emmanuel Hebey, *Communications on Pure and Applied Analysis* **7** (2008), no. 3, 715–741.
- (1) Multiple solutions for nonlinear elliptic equations on compact Riemannian manifolds, *International Journal of Mathematics* **18** (2007), no. 9, 1071–1111.

Talks

- Jan. 2012 Workshop on cocompact imbeddings, profile decompositions, and their applications to PDE, Tata Institute of Fundamental Research, Bangalore
- Nov. 2011 Differential geometry seminar, Élie Cartan Institute, Nancy
- Nov. 2011 Workshop on nonlinear differential equations, Pienza
- May 2011 PDE seminar, University of Sydney

Mar. 2011 Analysis seminar, Australian National University, Canberra
 Jan. 2011 Conference “Nancy’s geometric days”, Élie Cartan Institute, Nancy
 Nov. 2010 Analysis seminar, University of Roma “La Sapienza”
 Oct. 2010 Spectral theory and geometry seminar, Fourier Institute, Grenoble
 Sept. 2010 Joint seminar on geometric analysis, CIRM, Marseille
 May 2010 Geometry seminar, CIRGET, UQAM, Montreal
 Apr. 2010 PDE seminar, Brown University, Providence
 Jul. 2009 Analysis seminar, McGill University, Montreal
 May 2009 Conference “Geometric and nonlinear analysis”, University of Cergy-Pontoise
 Apr. 2009 Colloquium “Meeting AGM/LAGA”, University Paris 13
 Mar. 2009 PDE seminar, University of Rouen
 Mar. 2009 Conference “Geometric aspects of PDEs”, CIRM, Marseille
 Feb. 2009 PDE seminar, Brown University, Providence
 Jun. 2008 Differential geometry seminar, Élie Cartan Institute, Nancy
 Apr. 2008 Geometry seminar, University of Cergy-Pontoise
 Apr. 2008 Geometry and analysis seminar, University of Nice - Sophia Antipolis
 Mar. 2008 Seminar of the laboratory, University of La Rochelle
 Nov. 2007 PDE seminar, University of Roma “La Sapienza”
 Oct. 2007 PDE and applications seminar, University of Poitiers
 Oct. 2007 Applied analysis seminar, University of Picardie
 May 2007 Seminar of the laboratory, University of La Rochelle
 Mar. 2006 Colloquium, University of La Rochelle

Invitations in foreign universities

Jan. 2012 Tata Institute of Fundamental Research (India)
 May 2011 University of Sydney (Australia)
 Feb.–Jun. 2011 Australian National University, Canberra (Australia)
 Nov. 2010 University of Roma 3 (Italy)
 Apr. 2010 Brown University, Providence (US)
 Feb.–Jun. 2010 McGill University, Montreal (Canada)
 Nov. 2009 University of Roma “La Sapienza” (Italy)
 Jul. 2009 McGill University, Montreal (Canada)
 Jul. 2009 University of British Columbia, Vancouver (Canada)
 Feb. 2009 Brown University, Providence (US)
 Feb. 2009 Massachusetts Institute of Technology (US)
 Nov. 2007 University of Roma “La Sapienza” (Italy)

Organizing activities

2009– Co-organization of the seminar on geometry and analysis, Univ. of Nice - Sophia Antipolis

Grants

2010– Holder of the PES (Prime d’Excellence Scientifique - Grant for Scientific Excellence), granted in 2010 for the period 2010–2014

Teaching experience

2011–2012 Applied quantitative techniques (first year undergraduate students)
 2009–2012 Analysis (second year undergraduate students)
 2009–2011 Statistics (second year undergraduate students)
 2008–2009 Variational methods (third year undergraduate students)
 2008–2009 Analysis on \mathbb{R}^n (second year undergraduate students)
 2005–2009 Mathematics for sciences (first year undergraduate students)