CURRICULUM VITAE

Name	Stathis FILIPPAS
Birth	August 27, 1961, Greece.
Office Address	Department of Applied Mathematics University of Crete, 71409 Heraklio, Greece tel: (+302810) 393713, fax: (+302810) 393861 e-mail: filippas@tem.uoc.gr Homepage: www.tem.uoc.gr/˜filippas
Education	Diploma, Naval architect and Marine Engineer, National Technical University of Athens, Greece (1979-1985) Ph.D. in Mathematics, Courant Institute, New York (USA) (1985-1990) Thesis advisor: R. V. Kohn
Research Interests	Partial Differential Equations, Applied Analysis, Dynamical Systems, Asymptotic Methods.
Positions	Professor (11/08–present), Univ. of Crete, Greece Associate Professor (08/01–10/08), Univ. of Crete, Greece Visiting Assistant Professor (02/97–07/01), Univ. of Crete, Greece Postdoctoral fellow (01/96–12/96), Univ. Complutense, Madrid, Spain Military service (01/94– 12/95), Greek Navy, Greece Postdoctoral fellow (12/92–12/93), Univ. Cergy-Pontoise, Paris, France Postdoctoral fellow (09/91–12/92), Univ. Paris VI, Paris, France Postdoctoral fellow (09/90–09/91), I.M.A., Univ. of Minnessota, USA
Teaching experience	Undergraduate: Twenty (20) semesters of teaching of various courses: Calculus I & II, Analysis I & II, ODEs, PDEs, Optimization Theory, Fluid Mechanics, Introduction to Applied Math. I & II, Probability, Methods of Applied Math. I & II. Graduate: Six (6) semesters of teaching: Methods of Applied Math., ODEs, PDEs, PDEs–Theory of weak solutions.

PUBLICATIONS

1. Refined asymptotics for the blowup of $u_t = \Delta u + u^p$, (with R. V. Kohn), **Comm. Pure Appl. Math.**, *45*, (1992), 821-869.

2. On the blowup of multidimensional semilinear heat equaltions, (with W. Liu), **Annales de l' I.H.P., analyse nonlineaire**, *10(3)*, (1993), 313-344.

3. Quenching profiles for one dimensional semilinear heat equations, (with J. S. Guo), **Quart. of Applied Math.**, *51(4)*, (1993), 713-729.

4. Modulation theory for the blowup of nonlinear vector valued heat equations, (with F. Merle), **J. Diff. Eqns.**, *116(1)*, (1995), 119-148.

5. Compactness and single point blowup of positive solutions on bounded domains, (with F. Merle), **Proc. Royal Soc. Edinburgh A**, *127*, (1997), 47-65.

6. On Similarity Solutions of a Heat Equation with a Nonhomogenous Nonlinearity, (with A. Tertikas), **J. Diff. Eqns.**, *165*, (2000), 468-492.

7. Fast blowup mechanisms for sign-changing solutions of a semilinear parabolic equation with critical nonlinearity, (with M. A. Herrero and J.J.L. Velazquez), **Proc. Royal Soc. London A**, *456*, (2000), 2957-2982.

8. Optimizing Improved Hardy Inequalities, (with A. Tertikas), **J. Funct. Anal.**, *192*, (2002), 186-233.

9. Series expansion for L^p Hardy inequalities, (with G. Barbatis and A. Tertikas), **Indiana Univ. Math. J.**, *52*, (2003), 171-190.

10. Refined geometric L^p Hardy inequalities, (with G. Barbatis and A. Tertikas), **Commun. Contemp. Math.** *5(6)* (2003), 869–881.

11. Semiclassical Wigner function and geometrical optics, (with G. N. Makrakis), **Multiscale Model. Simul.**, *1(4)*, (2003), 674–710.

12. A unified approach to improved L^p Hardy inequalities with best constants, (with G. Barbatis and A. Tertikas), **Trans. Amer. Math. Soc.**, *356*, (2004), 2169-2196.

13. Critical heat kernel estimates for Schrödinger operators via Hardy–Sobolev inequalities, (with G. Barbatis and A. Tertikas), **J. Funct. Anal.**, *208*, (2004), 1–30.

14. Sharp Hardy Sobolev inequalities. (with V. G. Maz'ya and A. Tertikas), **C. R. Acad. Sci. Paris Sr. I Math.**, *339(7)*, (2004), 483–486.

15. On a question of Brezis and Marcus, (with V. G. Maz'ya and A. Tertikas), **Calc. Var. Partial Differential Equations**, *25*, (2006), no. 4, 491–501.

16. On the evolution of semiclassical Wigner function in higher dimensions, (with G. N. Makrakis), **European J. Appl. Math.**, *17*, (2006), no. 1, 33–62.

17. Positive solutions of a Neumann problem with competing critical nonlinearities, (with J. Chabrowski and A. Tertikas), **Topol. Methods Nonlinear Anal.**, *28*, (2006), 1-31.

18. Critical Hardy Sobolev inequalities. (with V. G. Maz'ya and A. Tertikas), **J. Math. Pures Appl. (9)**, *87(1)*, (2007), 37-56.

19. Sharp two–sided heat kernel estimates for critical Schrödinger operators on bounded domains, (with L. Moschini and A. Tertikas), **Comm. Math. Physics** , *273, no. 1*, (2007), 237–281.

20. On a class of weighted anisotropic Sobolev inequalities, (with L. Moschini and A. Tertikas), **J. Funct. Anal.** *255, no. 1*, (2008), 90–119.

21. On the structure of Hardy–Sobolev–Maz'ya inequalities, (with A. Tertikas and J. Tidblom), to appear in **J. Eur. Math. Soc.**, (2008).

22. Improving L^2 estimates to Harnack inequalities, (with L. Moschini and A. Tertikas), **Proc. London Math. Soc.**, to appear (2009).

23. On the best constant of Hardy–Sobolev inequalities, (with Adimurthi and A. Tertikas), **Nonlinear Anal. TMA**, to appar (2009).