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5. **J.P. DIAS** AND **M. FIGUEIRA**, *On the uniqueness of the weak solutions of a quasilinear hyperbolic system with a singular source term*, Chin. Ann. Math., 23 B (2002), 317-324.
6. **ANA RUTE DOMINGOS** AND YUXIA GUO, *A note on a Liouville-type result for a system of fourth-order equations in IR^N*, EJDE, Vol. 2002, No. 99, 1-20.
7. **ANA RUTE DOMINGOS** AND **M. RAMOS**, *Solutions of semilinear elliptic equations with superlinear sign changing nonlinearities*, Nonlinear Analysis 50 (2002), 149-161.
8. **T. FARIA** AND W. HUANG, *Stability of periodic solutions arising from Hopf bifurcation for a reaction-diffusion equation with time delay*, Fields Institute Communications, 31 (2002), 125-141.
9. **T. FARIA**, W. HUANG AND J. WU, *Smoothness of center manifolds for maps and formal adjoints for semilinear FDEs in general Banach spaces*, SIAM J. Math. Anal., 34 (2002), 173-203.
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18. G. BOUCHITTÉ, I. FONSECA AND **L. MASCARENHAS**, *Relaxation of variational problems under trace constraints*, Nonlinear Analysis, vol. 49, 2, Ser. A, 221-246 (2002).
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(C) Communications in proceedings

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5. **J.F. RODRIGUES**, *Reaction-diffusion: from systems to nonlocal equations in a class of free boundary problems*, International Conference on Reaction-Diffusion Systems: Theory and Applications (Kyoto, 2001), Surikaisekikenkyusho Kokyuroku No. 1249 (2002), 72-89.

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(B) Books as authors

1. **Jorge Nuno Silva**, *Berkeley Problems in Mathematics* (edição chinesa), ISBN 7-03-010402-1.

B.1. Books as editors

2. **M.R. Grossinho**, *Matemática: legados e desafios*, Dossier da Revista Episteme, Universidade Técnica de Lisboa, (Coordenação da edição: 2002 (Note: publication finished in 2003)).

(C) Communications in proceedings (International)

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4. **Nikolai Chemetov** and M. Frémond, *The education of shape memory alloys?, in the book? Fundamental physical-mathematical problems and modelling of technological systems?,* L. Uvarova et al., eds., "Yanus-K" Publishers, Moscow, 2003, 64-71.
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C.1. Communications in proceedings (National)

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2. **ANCA-MARIA TOADER**, *Optimização de forma pelo método das linhas de nível*, VII Congresso Nacional de Mecânica Aplicada e Computacional, Évora, 14-16 Abril 2003.
3. **F. FERREIRA,** *Emendando o Grundgesetze der Arithmetik de Frege* in Encontro Nacional de Filosofia Analítica, organização de Henrique Jales Ribeiro, Faculdade de Letras, Coimbra 2003, 137-142 (Resumo alargado do artigo abaixo a sair em Synthese).
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33. HONGWEI LONG AND **ISABEL SIMÃO**, *A note on the essential self-adjointness of Ornstein-Uhlenbeck operators perturbed by a dissipative drift and a potential*, Infinite Dimensional Analysis Quantum Probability and Related Topics, Vol. 7, no. 2, (2004), 249-259.

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(B) Books as authors

1. **S. NÁPOLES**, J. EURICO NOGUEIRA, ANTÓNIO MONTEIRO, J. A. RODRIGUES AND M. ADELAIDE CARREIRA, *Contar e fazer contas: uma introdução à teoria dos números* (GRADIVA, 2004).

B.1. Books as editors

1 **L. SARAIVA**, *History of Mathematical Sciences: Portugal and East Ásia II,* World Scientific Publishing Company, Singapore, 2004.

2 **L. SARAIVA,** Proceedings of the International Meeting, *The Practice of Mathematics in Portugal,* Imprensa da Universidade de Coimbra, 2004 (editor of the Proceedings, together with Henrique Leitão, CHCUL).

B.2. Chapters in books

1. **J. M. GOMES** AND **L. SANCHEZ,** *Positive solutions of a Singular Ordinary Differential Equation relevant in Mathematical Physics,* in The First 60 Years of Nonlinear Analysis of Jean Mawhin, eds M Delgado, J Lopez-Gomez, R Ortega and A Su rez, World Scientific, 89-102 (2004).

(C) Communications in conferences (International)

1. **C. ALBUQUERQUE** AND R. BARREIRA, *A Numerical Method for the Steady Flow of a Viscoelastic Fluid with a Free Surface*, in Interphase 2004- Numerical Methods for Free Boundary Problems, actas electrónicas em: http://www.mat.uniroma1.it/interphase04, acedido em Dezembro de 2004.

2. **C. BARBAROSIE** AND **ANCA-MARIA TOADER**, *Bounds for non periodic mixtures in terms of Young measures*, comunicação apresentada a Midnight Sun Narvik Conference on Multiscale Problems and Asymptotic Analysis, June 22-26, 2004 Narvik University College, Norway.

3. **C. BARBAROSIE**, *Bounds for periodic mixtures of an infinite number of materials*, comunicação apresentada a Midnight Sun Narvik Conference on Multiscale Problems and Asymptotic Analysis, June 22-26, 2004 Narvik University College, Norway.

4. **C. BARBAROSIE**, *Bounds on effective coefficients*, comunicação apresentada à Escola de Verão Homogenization and Shape Optimization, September 13-17, CMAF-UL, Lisboa.

5. **F. A. C. CHALUB** AND J. P. Zubelli**, *Matrix Bisprectrality and Huygens' Principle for Dirac Operators. Partial Differential Equations and Inverse Problems,* Contemporary Mathematics, Vol 362 (2004),.89-112, Amer. Math. Soc., Providence, RI, (2004).

6. **F. A. C. CHALUB**, *Modelling Cell Motility and Angiogenesis*, Wolfgang Pauli Institute, Vienna, November 2004 (invited talk in *"Kinetic Models for Chemotaxis",* 30 min).

7. **F. A. C. CHALUB**, *Mathematical Models Applied to the Biological Sciences, Economics, and Complex Systems,* Siena and Grosseto, Italy, July 2004 (invited talk in *"How to go across limits"*, 30 min).

8. **F. A. C. CHALUB**, *Free Boundary Problems in Biomathematics, Multiscaling and Infinite-Dimensional Dynamical Systems,* Montecatini, Italy, June 2004 (contributed talk on *"Kinetic Models for Chemotaxis",* 25 min).

9. **F. A. C. CHALUB**, Brazilian Workshop on *Mathematical Physics*, Institute of Pure and Applied Mathematics (IMPA), Rio de Janeiro, Brazil, February 2004 (invited talk on *"Huygens' Principle and Integrable Systems",* 30 min).

10. **F. A. C. CHALUB**, Workshop on *Biomathematics and Evolutionary Dynamics,* Institute of Pure and Applied Mathematics (IMPA), Rio de Janeiro, Brazil, February 2004 (invited short course *"Introduction to Game Theory"*, two lectures, 90 min each, and invited talk *"Introduction to Chemotaxis",* 50 min).

11. **MÁRIO EDMUNDO**, *Solvable groups and rings definable in o-minimal Structures,* Logic Colloquium '99, Lecture Notes in Logic 17 (2004) (ed., J. van Eijck et al.) A. K. Peters Ltd.

12. **M. L. ESQUÍVEL,** CARLOS VEIGA AND LUIS DIMAS, *Dynamic V-a-R via Ito Line Integrals, Session Integrated Risk Management*, in Proc. Stoc. Finance 04, CIM and ISEG/UTL (2004).

13. **T. FARIA**, *A criterion for the global attractivity of scalar population models with delay,* E. J. Qualitative Theory of Diff. Equ., Proc. 7th coll QTDE, 8 (2004), 1-7.

14. **T. FARIA**, *Special solutions for linear functional differential equations and asymptotic behaviour,* seminário apresentado no Departamento de Matemáticas Aplicadas II, University of Vigo, Spain, July 2004.

15. **F. FERREIRA**, *Amending Frege's Grundgesetze der Arithmetik*, Comunicação em "Fregefest", Universidade da Califórnia em Irvine, EUA, Maio de 2004.

16. **F. FERREIRA**, *Bounded Functional Interpretation*, Comunicação no "Pure and Applied Logic Colloquium", Carnegie Mellon University, EUA, Março de 2004.

17. **F. FERREIRA**, *Bounded Functional Interpretation*, Comunicação no "Penn State Logic Seminar", Pennsylvania State University, EUA, Março de 2004.

18. **R. MARTINS**, *Attractors of dissipative systems with a cylindrical phase space,* AIMS's Fifth International Conference on Dynamical Systems and Differential Equations, Pomona, Los Angeles, Junho 2004.

19. **HERMENEGILDO OLIVEIRA**, *Some Applications on the Localization of Solutions for Planar Navier-Stokes Equations,* International Conferences Analysis of Partial Differential Equations, SIAM, Houston – Texas, E.U.A., 5-8 Dezembro 2004, pp. 34-35.

20. **M. RAMOS**, *Asymptotic properties of the ground-state solutions of singularly perturbed elliptic Hamiltonian systems,* Workshop on Nonlinear Differential Equations, Universidade de Campinas, Brasil.

21. **L. SANTOS**, J. F. FRANCISCO AND ASSIS AZEVEDO, *Remarks on the two and three membranes problems,* International Conference on Elliptic and Parabolic Problems, Taiwan, February of 2004.

22. **L. SANCHEZ**, *Positive solutions of a second order singular ordinary differential equation*, invited talk of the International Workshop on Analysis and Numerical Approximation of Singular Problems, Lisbon, IST, November 2004.

C.1. Communications in conferences (National)

1. **C. ALBUQUERQUE** AND R. BARREIRA, *Simulação numérica da fronteira livre num fluido viscoelástico*, in Soares, C. et al. (editores), Métodos Computacionais em Engenharia, p. 237 e CD-ROM (6 páginas), APMTAC, SEMNI e LNEC, Lisboa, 2004.

2. **C. ALBUQUERQUE**, *Representação integral e diferenças finitas na simulação numérica de ondas na água,* in Soares, C. et al. (editores), Métodos Computacionais em Engenharia, p. 271 e CD-ROM (8 páginas), APMTAC, SEMNI e LNEC, Lisboa, 2004.

3. **C. ALBUQUERQUE,** *História dos métodos e instrumentos de cálculo: uma proposta de exposição,* 17º Seminário Nacional de História da Matemática, realizado em Lisboa, de 25 a 26 de Junho de 2004.

4. **J.P. DIAS**, *Phase transitions and discontinuous conservation laws,* Invited seminar in Encontro Nacional da SPM, ISEP, Porto, 5-8 Maio, 2004.

5. **M. L. ESQUÍVEL,** *Funções Geradoras de Probabilidade para Variáveis Aleatórias Discretas Gerais e Aplicações*, XII Congresso Anual 2004 da Sociedade Portuguesa de Estatística, Évora, 29 de Setembro a 2 de Outubro.

6. **L. MASCARENHAS**, *Error estimates in an almost-periodic problem*, Encontro Nacional da Sociedade Portuguesa de Matemática, Porto (2004).

7. **HERMENEGILDO OLIVEIRA** AND S. N. ANTONTSEV, *Localização de soluções fracas para escoamentos de fluidos não-Newtonianos*, No CD-Rom das Actas do Congresso Métodos Computacionais em Engenharia (Laboratório Nacional de Engenharia Civil, Lisboa, 2004). APMTAC e SEMNI.

8. **LUIS SARAIVA**, XIII International Research Meeting on Mathematical Education (EIEM), on the History of Mathematical Education in Portugal, Beja, May 2 to 4, 2004: one talk and organization (with Henrique Guimarães, DEMFCUL) of a symposium on "The History of Mathematics Teaching in Portugal".

PUBLICATIONS 2005

(A) Papers in international journals with referees

1. **T. Alpuim** AND **E. Severino**, *A Spatiotemporal Models in the Estimation of Area Precipitation,* Environmetrics, vol.16, nº 8 (2005).
2. **C. Barbarosie** AND **Anca-Maria Toader,** *Bounds for non-periodic mixtures of infinitely many materials,* Mathematical Methods in the Applied Sciences, 28, no. 9, 1089-1114 (2005).
3. **A. C. Barroso** AND J. Matias, *Necessary and sufficient conditions for existence of solutions of a variational problem involving the curl,* Discrete and Continuous Dynamical Systems, 12, Nº 1 (2005) 97-114.
4. **C. Carvalho,** E. A. Carlen, R. Esposito, J. Lebowitz AND R. Marra, *Phase transitions in equilibrium systems: microscopic models and mesoscopic free energies,* Journal Molecular Physics, 103 (2005) 3141-3151.
5. **C. Carvalho,** E. A. Carlen AND E. Gabetta, *On the relation between the rates of relaxation and convergence of Wild sums for solutions of the Kac equation,* Journal Functional Analysis 220, 362-387 (2005).
6. **C. Carvalho,** E. A. Carlen AND E. Orlandi, *Aproximate solution to the Cahn-Hilliard equation via corrections to the Mullins-Sekerka motionon,* Arch. Rat. Mech., 178, 1-55 (2005).
7. F.A.C.C. Chalub AND J.P. Zubelli, *Huygens' Principle, Dirac Operators, and Rational Solutions of the AKNS Hierarchyhe,* Math. Phys. Anal. And Geom. Vol. 8 (2005) 187-210.
8. **N. Chemetov**, *Numerical analysis of a time discretization of the model for two-shape memory alloys,* in Fundamental Physical Mathematical Problems and Modeling and of technical technological systems, Moscow State Technological University "STANKIN", Vol. 8 (2005) 136-144.
9. **N. Chemetov**, P. M. Lima, N. B. Konyukhova AND A. I. Sukov, *Mathematical analysis and numerical solution of a singular problem in nonlinear physics,* in Russian Journal "Vestnik Nizhegorodskogo Universiteta", Vol. 1 (28), ser. Mathematical Modeling and Optimal Control (2005), 162-171.
10. Francesca Dalbono AND P.J McKenna, *Multiplicity results for a class of asymmetric weakly coupled systems of second order ordinary differential equations,* Boundary Value Problems 2 (2005) 129-151.
11. Francesca Dalbono AND M. García-Huidobro, *Singular solutions to a quasilinear ODE,* Advances in Differential Equations 10, Nº7 (2005) 747-765.
12. **J. P. Dias, M. Figueira** AND J. F. Rodrigues, *Solutions to a scalar discontinuous conservation law in a limit case of phase transitions,* J. Math. Fluid Mechanics, 7 (2005), 153-163.
13. **J. P. Dias** AND **M. Figueira,** *On the approximation of the solutions of the Riemann problem for a discontinuous conservation law,* Bull. Braz. Math. Soc., 36 (2005), 115-125.
14. **J. P. Dias** AND **M. Figueira**, *On the viscous Cauchy problem and the existence of shock profiles for a p-system with a discontinuous stress function,* Quart. Appl. Math., 63 (2005), 335-341.
15. **J. P. Dias** AND H. Frid, *Radially symmetric weak solutions for a quasilinear wave equation in two space dimensions,* J. Diff. Eq., 219 (2005), 306-322.
16. **M.J. Edmundo**, *A remark on divisibility of definable groups,* Math. Logic Quart. 51 (6), 639-641 (2005).

17. **M.J. EDMUNDO**, *Covers of groups definable in o-minimal structures,* IIIinois J. Math. 49 (1), 99-120 (2005).
18. **T. FARIA** AND W. HUANG, *Special solutions for linear functional differential equations and asymptotic behaviour,* Differential and Integral Equations, 18 (3) (2005) 337-360.
19. **T. FARIA,** E. LIZ, J.J. OLIVEIRA AND S. TROFIMCHUK, *On a generalized Yorke condition for scalar delayed population models,* Disc Cont. Dyn. Systems, 12 (3) (2005) 481-500.
20. **F. FERREIRA** AND PAULO OLIVA, *Bounded Functional Interpretation,* Annals of Pure and Applied Logic, 135 (2005), 73-112.
21. **F. FERREIRA,** *A Simple Proof of Parson's Theorem,* Notre Dame Journal of Formal Logic, 46 (2005), 83-91.
22. **F. FERREIRA,** *Amending Frege's Grundgesetze der arithmetik,* Synthese 147 (2005), 3-19.
23. D. BONHEURE, J.M. GOMES AND P. HABETS, *Multiple positive solutions of superlinear elliptic problems with sign-changing weight,* Journal Differential Equations, 214 (2005), 36-64.
24. M. G. GOMES, **A. MARGHERI,** G. MEDLEY AND **C. REBELO**, *Dynamical behaviour of epidemiological models with suboptimal immunity and nonlinear incidence,* Journal of Mathematical Biology, 51 (2005), 414-430.
25. A. LANCONELLI, *Wick product and backward heat equation,* in Mediterranean Journal of Mathematics, Vol. 2 (2005) 367-379.
26. A. LANCONELLI, *Computing conditional expectation of multidimensional diffusion processes,* in Stochastics, Vol. 77, Issue 4 (2005) 315-326.
27. T. CARLETTI, **A. MARGHERI** AND M. VILLARINI, *Normalization of Poincaré singularities via variation of constants,* Publicaciones Matematiques, 49 (2005), 197-212.
28. R. MARTINS, *The effect of inversely unstable solutions on the attractor of the forced pendulum equation with friction,* Journal Differential Equations, 212 (2005), 351-365.
29. A. BONDARENKO, G. BOUCHITTÉE, **L. MASCARENHAS** AND M. RAJESH, *Rate of convergence for correctors in almost periodic homogenization,* Continuous and Discrete Dynamical Systems A, 13, (2005), nº 2, 503-514.
30. **R.VILELA MENDES**, *Tools for network dynamics,* Int. J. Bifurcation and Chaos 15, 1185-1213 (2005).
31. **R.VILELA MENDES**, *Some consequences of a noncommutative space-time structure,* Eur. Phys. J. C42, 445-452 (2005).
32. **R.VILELA MENDES**, *The quantum ultimatum game,* Quant. Inf. Processing, 4, 1-12 (2005).
33. J.A.C. MARTINS, **M.D.P. MONTEIRO MARQUES** AND A. PETROV, *Dynamics with friction and persistent contact,* ZAMM-Z. Angew. Math. Mech., 85 (2005) 531-538.
34. **P. CRISTIANO** AND **O. NETO,** *The fundamental group of an algebraic link,* Comptes Rendus de I' Acad. des sciences Paris, 340, 141-146 (2005).
35. **M. J. OLIVEIRA,** M. FARIA AND L. STREIT, *Feynman integrals for non-smooth and rapidly growing potentials,* Journal of Mathematical Physics, 46 (6), Art. Nº 063505 (2005).
36. N. PEATFIELD, *Analytic Zariski structures and the Hrushovski construction,* Annals of Pure and Applied Logic 132 (2005), 127-180.
37. **M. RAMOS** AND J. YANG, *Spike-layered solutions for an elliptic system with Neumann boundary conditions,* Transactions of the American Mathematical Society, 357, 3265-3284 (2005).

38. J.M. Gomes and **L. Sanchez**, *A variational approach to some boundary value problems in the half line,* Z. angew. Math. Phys. 56 (2005), 192-209.

39. J.M. Gomes and **L. Sanchez**, *On a variational approach to some non-local boundary problems,* Applicable Analysis 84 (2005), 909-925.

40. D. Bonheure, J.M. Gomes and **L. Sanchez**, *Positive solutions of a second order singular ordinary differential equation,* Nonlinear Analysis T.M.A. 61 (2005), 1383-1399.

41. M.R. Grossinho, **L. Sanchez** and S.A. Tersian, *On the solvability of a boundary value problem for a 4th order ordinary differential equation,* Applied Mathematics Letters 18 (4) 2005, 439-444.

42. A. Azevedo, **J.F. Rodrigues** and **L. Santos**, *The N-membranes problem for quasilinear degenerate systems,* Interfaces and Free Boundaries, Vol. 7 Issue 3 (2005), 319-337.

43. **Isabel Simão**, *A continuous Kernel for the transition semigroup associated with a diffusion process in a Hilbert space,* Semigroup Forum, vol. 71, No. 1 (2005), 49-72.

44. G. Allaire, F. de Gournay, F. Jouve and **Anca-Maria Toader**, *Structural optimization using topological and shape sensitivity via a level set method,* Control and Cybernetics, 34, 59-80, (2005).

45. **H. Beirão da Veiga**, *Regularity of solutions to a non homogeneous boundary value problem for general Stokes systems in IR^n*, Mathematische Annalen, V 331 (2005), No1, 203-217.

46. **H. Beirão da Veiga**, *On the regularity of flows with Ladyzhenskaya shear dependent viscosity and slip and non-slip boundary conditions,* Communications Pure Applied Mathematics, 58 (2005), 552-577.

47. **H. Beirão da Veiga**, *On time-periodic solutions of the Navier-Stokes equations in unbounded cylindrical domains. Leray's problem for periodic flows,* Archive Rational Mechanics and Analysis, 178 (2005), 301-325.

48. **J. Verdasca,** M. M. Telo Gama. A. Nunes, N. R. Bernardino, J. M. Pacheco and M. C. Gomes, *Recurrent epidemics in small world networks,* Journal Theoretical Biology, 233, 533-561 (2005).

(B) Books as authors

2. **C. Sarrico,** *Análise Matemática,* Leituras e Exercícios, Gradiva (6º edição 2005).

3. António Bivar, *Equações Diferenciais-Uma Introdução,* (3ª edição)-Textos de Matemática, nº 7-Departamento de Matemática da FCUL (2005).

B.1. Books as editors

1. **M.J. Edmundo**, D. Richardson and A. J. Wilkie, *O-minimal Structures, Proceedings of the RAAG Summer School Lisbon 2003,* Lecture Notes in Real Algebraic and Analytic Geometry, Cuvillier Verlag 2005.

B.2. Chapters in books

1. **F. FERREIRA** AND **A. FERNANDES**, *Basic applications of weak König's lemma in feasible analysis,* in Reserve Mathematics 2001, organização de Stephen Simpson, Lecture Notes in Logic, 21 (2005), 175-188.
2. **A. FERNANDES**, *The Baire category theorem over a feasible base theory,* in Reserve Mathematics 2001, organização de Stephen Simpson, Lecture Notes in Logic, 21 (2005), 164-174.
3. **B. LOURO**, J. HENRY AND M.C. SOARES, *Factorization by invariant embedding of elliptic problems in a circular domain. System modeling and optimization,* IFIP Int. Fed. Inf. Process., 166, Kluwer Acad. Publ., Boston, MA (2005), 159-170.
4. **HERMENEGILDO OLIVEIRA,** S.N. ANTONTSEV AND J.I. DÍAZ, *Stopping a viscous fluid by a feedback dissipative field: thermal effects without phase changing.* Trends in Partial Differential Equations of Mathematical Physics, Progress in Nonlinear Differential Equations and Their Applications 61 (2005), 1-14, Birkhäuser.
5. **H. BEIRÃO DA VEIGA**, *On some boundary value problems for flows with shear dependent viscosity,* in Variational Analysis and Applications, volume dedicated to the memory of Professors G. Stampacchia and J.L. Lions, F. Giannessi and A. Maugeri Editors, Springer 2005, pages 161-172.

(C) Communications in conferences (International)

1. **C. BARBAROSIE**, *Extending a Vector Field from an Interface to the Entire Domain,* comunicação apresentada no 2005 SIAM Annual Meeting, 11 a 15 de Julho 2005, New Orleans, E.U.A. no minisimp\'osio, *Films and Interfaces.*
2. **I. BARÃO** AND JONATHAN TAWN, "A Dynamic and Multivariate Model for Risk Management and Prediction", Mathematics and Statistics, Lancaster University e Ser-Huang Poon, Manchester Business School, no WRIEC (World Risk and Insurance Economics Congress) at Salt Lake City, August 2005, e no EURANDOM, Eindhoven, The Netherlands, The Economics and Finance of Extremes, December 2005.
3. **A. C. BARROSO**, 2005 CIME Course on Calculus of Variations and Nonlinear Partial Differential Equations, June 27-July 2, 2005, Cetraro, Italy.
4. **C. CARVALHO,** *Smoothing properties of the cut-off Boltzmann equation and the central limit theorem for Maxwellian molecules,* (comunicação apresentada), Kinetic equations: Direct and Inverse Problems, Mantova, Italy, 15-17 of May 2005.
5. **C. CARVALHO,** *Problems in the Calculus of Variations associated with droplet formation,* (comunicação apresentada), School of Mathematics, Georgia Institute of Tecnology, September 2005.
6. F.A.C.C. CHALUB, Mathematical Methods for Cell Movement, (three lectures), IMPA, Rio de Janeiro, Brazil, January 2005.
7. F.A.C.C. CHALUB, Modelling Mathematical Methods: Computer Simulation of Tumor Growth and Therapy, Puerto de La Cruz, Tenerife, Spain, September 2005 (contributed talk, "The Continuous Moran Process", 20min).
8. F.A.C.C. CHALUB, Partial Differential Equations in Industry and Engenieering, ALFA meeting, Vienna and Strobl, Austria, June 2005 (invited talk, "The Continuous Moran Process", 40 min).

9. F.A.C.C. CHALUB, Workshop on Bioinformatics and Biomathematics, Teheran, Iran, April 2005 (invited short course, "Kinetic Models for Cell Movement", three lectures, 1 hour each).

10. F.A.C.C. CHALUB, Mathematical Methods and Modelling of Biophysical Phenomena, Angra dos Reis, Brazil, February 2005 (invited talk in "Kinetic Models for Chemotaxis", 50 min).

11. **P. CRISTIANO,** Participação em Outubro no Mini-curso, *D-modulos y funciones especiales,* Faculdade de Ciências da Universidade de Valladolid, no âmbito da acção integrada Luso-Espanhola E-82/04 (responsável pela parte portuguesa), (duas palestras apresentadas), *Grupo fundamental local de una curva plana; Representaciones hipergeométricas del grupo fundamental.*

12. **FRANCESCA DALBONO**, *Multiplicity results for a class of asymmetric weakly coupled systems of second order ordinary differential equations,* "V Turin Fortnight on Nonlinear Analysis", Torino (Italia) 13-16 de Setembro 2005.

13. **FRANCESCA DALBONO**, *Multiplicity results for a class of asymmetric weakly coupled systems of second order ordinary differential equations,* "Topological and Variational Methods in Partial Differential Equations", Guanajuato (México) 5-9 de Dezembro 2005.

14. **J.P. DIAS**, *Some results on discontinuous conservation laws,* Seminar at Univ. Pisa-Dipartimento di Matematica Applicata, June 2005.

15. **M.J. EDMUNDO**, *O-minimal cohomology, definable groups and Lie group,* Logic Colloquium 2005. Atenas, Grecia, 28 de Julho a 3 de Agosto de 2005.

16. **M.J. EDMUNDO**, *Sheaf cohomology in arbitrary o-minimal structure,* Model Theory and Applications to Algebra and Analysis. Isaac Newton Institute for Mathematical Sciences, University of Cambridge, Reino Unido, 28 de Março a 16 de Abril de 2005.

17. **M.J. EDMUNDO**, *O-minimal sheaf cohomology,* Mini-Colloque en O-minimalité. Université Claude Bernand Lyon-1, França, 21 a 26 de Março de 2005.

18. **T. FARIA,** *Asymptotic behaviour of scalar delayed population models,* (invited speaker), International Workshop on Differential Equations in Mathematical Biology, Le Havre, France, July 11-13, 2005.

19. **T. FARIA,** *Large time behaviour for linear functional differential equations with small delays,* Seminar at the University of Leiden, The Netherlands, February 21, 2005.

20. *M.J. FERREIRA,* Participação no Seminário da Universidade do Amazonas (Brasil), com a comunicação intitulada, *Isometric Immersions from Kahler Manifolds.*

21. *M.D.P. MONTEIRO MARQUES,* R. DZONOU AND L. PAOLI, *Sweeping process for an impact problem with a general inertia operator,* meeting of the research projects SICONOS/DA VINCI, Grenoble, July 2005.

22. **L. MASCARENHAS** AND **RITA FERREIRA,** Participação no *Workshop on Thin Structures,* de 15 a 18 de Setembro de 2005, em Nápoles, Itália.

23. **R. VILELA MENDES**, *Path-integral estimates of ground-state functionals,* International Conference on Mathematical Analysis of Random Phenomena, Setembro de 2005.

24. **I. OITAVEM,** *Implicit characterizations,* Mathematical Logic: Proof Theory, Type Theory and Constructive Mathematics, Mathematisches Forschungsinstitut Oberwolfach, 2005, Oberwolfach, Alemanha.

25. **HERMENEGILDO OLIVEIRA,** *Sobre um efeito térmico sem Mudança de fase*, Congresso Internacional Métodos Numéricos em Engenharia, Granada, Espanha 4-7 Julho 2005.

26. **M. JOÃO OLIVEIRA,** *Quasi-particle representation for Markov generators in continuum,* International Conference on Probabilistic and Analytic Aspects of the Theory of Infinite Particle Systems, Kazimierz Dolny (Poland), October 22-27 2005.

27. **M. JOÃO OLIVEIRA,** *Bogoliubov functionals and stochastic evolutions in continuum,* International Conference on Mathematical Analysis of Random Phenomena, Hammamet, Septmber 12-17 2005.

28. **M. JOÃO OLIVEIRA,** *Quasi-particle representation for Markov generators in continuum,* BiBoS (Seminares on Mathematical Physics), Bielefeld University, 2nd of November.

29. **M. JOÃO OLIVEIRA,** *Poissonian white noise analysis and harmonic analysis on configuration spaces,* Departament of Mathematics, University of Tunis (El Manar), 5th of April 2005.

30. *M. JOÃO OLIVEIRA,* Round table, *Stochastic Dynamics of Interacting Particle Systems: New Models, Problems, and Methods,* Bielefeld, 11th of May. Integrated on the ZIF research semester, *Stochastic Modeling in the Sciences: Stochastic Partial Differential Equations and Random Media.*

31. **L. SANCHEZ,** *On some classical boundary value problems in the half line: a variational setting* (Invited speaker), Trends in Differential Equations and Dynamical Systems, Reggio Emilia 29-30 Setembro de 2005.

32. **L. SANCHEZ,** *Um método monótono para as soluções radiais de um problema elíptico não local,* Seminário do Departamento de Análise Matemática, Faculdade de Matemática, Universidade de Santiago, Espanha, Outubro de 2005.

33. **L. SARAIVA,** *Mathematics in the Memoirs of the Lisbon Academy of Sciences in the 19th Century,* 22th International Congress on the History of Sciences, Beijing, 24-30, July 2005.

34. **L. SARAIVA,** *Jesuit Mathematicians of the Portuguese Assintancy and the Portuguese Historians of Mathematics,* Third International Meeting "History of Mathematical Sciences: Portugal and East Asia", Tokyo (2005), August 4-7.

35. **C. O. R. Sarrico**, *Solitons in Inviscid Burgers Equation*, 4th International Conference Aplimat 2005, Department of Mathematics, Faculty of Mechanical Engineering, Slovak University of Technology in Bratislava.

36. **ISABEL SIMÃO**, *Regularity of the transition semigroup associated with a diffusion process in a Hilbert space,* (conferencista convidada no "Fifth Seminar on Stochastic Analysis, Random Fields and Applications"), Centro Stefano Franscini, Ascona, Suíça, Maio/Junho de 2005.

37. *ANCA-MARIA TOADER*, *Structural optimization combining topological and shape derivatives via a level set method*, (comunicação apresentada) no 2005 SIAM Annual Meeting, 11 a 15 de Julho 2005, New Orleans, E.U.A. no minip\'osio, *Level Sets in Optimization.*

38. **L. TRABUCHO,** *On the curvature and torsion effects in onedimensional waveguides,* comunicação apresentada no Congresso: *Workshop on Thin Structures,* de 15 a 18 de Setembro de 2005, Nápoles, Itália.

C.1. Communications in conferences (National)

1. F.A.C.C. CHALUB, Free Boundary Problems, Theory and Applications, Coimbra, Portugal, June 2005 (invited talk, "Kinetic Models for Chemotaxis", 15 min).

2. **L. CONSIGLIERI**, *Cooling effect of blood flow on RF ablation technique,* (comunicação apresentada), 2nd International Symposium on Modelling of Physiological Flows, IST/UTL, Sezimbra, 31 Março-2 de Abril 2005.

3. **L. CONSIGLIERI**, *Steady-state Bingham flow with temperature dependent nonlocal parameters,* (comunicação apresentada), International Conference Free Boundary Problems: Theory and Applications, 7-12 Junho 2005, Coimbra.

4. **P. CRISTIANO**, *D-modules and Hypergeometric functions,* Lisboa de 11-14 Julho com a palestra, *Towards a local theory of special functions in several variables II,* (A palestra , *Towards a local theory of special functions in several variables I,* foi proferida pelo Professor Orlando Neto).

5. **P. CRISTIANO**, *Sistemas de EDP's com soluções ramificadas ao longo de uma curva plana,* (comunicação apresentada), 3 de Setembro 2005, Coimbra.

6. **FRANCESCA DALBONO**, *Multiplicity results for a class of asymmetric weakly coupled systems of second order ordinary differential equations,* no CMAF, 13 de Janeiro 2005.

7. **A. RUTE DOMINGOS**, Participation on the, *II International Conference on Computational Bioengineering,* Instituto Superior Técnico-Lisboa, September 14-16, 2005.

8. R. MARTINS, *Atractores de sistemas dissipativos no cilindro,* Seminário do Centro de Matemática da Universidade do Porto, Fevereiro de 2005.

9. R. MARTINS, *Na volta do pêndulo,* Seminário do Departamento de Matemática da FCTUNL, Maio de 2005.

10. R. MARTINS, *When is the attractor of a dissipative system in the cylinder homeomorphic to the circle?,* Seminário do Departamento de Matemática do IST, Outubro de 2005.

11. **R. VILELA MENDES**, *Ciência e arte: Duas abordagens cognitivas do real,* "Encontros da Arrabida – Os Caminhos da Complexidade", Julho de 2005.

12. **R. VILELA MENDES**, *Games and neuroeconomics,* Madeira Math Encounters XXIX, Outubro de 2005.

13. **I. OITAVEM**, *Esquemas de recursão e classes de complexidade computacional,* CMUC, Universidade de Coimbra, 2005, Coimbra, Portugal.

14. **HERMENEGILDO OLIVEIRA,** *On Navier-Stockes systems whose solutions have finite time localization*, Conferência International Free Boundary Problems: Theory and Applications, Coimbra, Portugal 7-12 Junho 2005.

15. **M. JOÃO OLIVEIRA,** *Some classes of Markov processes on configuration spaces and related quasi-particle dynamics,* Madeira Math Encounters XXIX, Quantum Control and Quantum Entanglement. Universidade da Madeira, Agosto de 2005.

16. **C. REBELO,** *Tuberculosis: scientific basis for control,* Instituo Gulbenkian de Ciência, Oeiras, Portugal, Setembro 2005.

17. **M. RAMOS**, *Sobre a localização dos 'picos' das soluções positivas de sistemas elípticos Hamiltonianos,* Meeting SPM/CIM on Partial Differential Equations, 5 Novembro 2005, Coimbra.

18. **L. SANTOS**, *Obstacle type problems*, Conference on Free Boundary Problems: Theory and Applications, Coimbra, June of 2005.

PUBLICATIONS 2006

A1. ARTICLES IN INTERNATIONAL JOURNALS WITH REFEREES

1. H. Queiroga, M. J. Almeida T. ALPUIM, A. Flores, S. Francisco, I. Gonzàlez-Gordillo, A. I. Miranda I. Silva e J. Paula Tide and wind control of megalopal supply to estuarine crab populations on the Portuguese west coast Marine Ecology Progress Series, Vol. 307, 21-36, 2006.

2. P. AMORIM (*), M. BEN-ARTZI AND PH. LEFLOCH, *AHyperbolic conservation laws on manifolds: total variation estimates and finite volume method,* Methods and Appl. of Anal., Vol. 12, Nº 3 (2005), 291-324.

3. MARIA CONCEIÇÃO CARVALHO, E. A. Carlen, R. Esposito, J. Lebowitz amd R. Marra, Dropplet minimizers for the Cahn-Hilliard free energy functional, Journal of Geometric Analysis, 16 (206), 233-264.

4. N. CHEMETOV, AND F. CIPRIANO, The 2D Euler equations and the Statistical Transport Equations, Communications in Mathematical Physics, vol. 267, Number 2, pp 543-558 (2006).

5. N. CHEMETOV,. Well-posedness of two-shape memory model", Math. Methods Appl. Sci., vol. 29, No. 2, 209-233 (2006)

6. LIMA, P. M., KONYUKHOVA, N. B., SUKOV, A. I. AND N. CHEMETOV, N.V., "Analytical-numerical investigation of bubble-type solutions of nonlinear singular problems", J. Comput. Appl. Math., 189, No. 1-2, 260-273 (2006).

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