

CURRICULUM VITAE

SILVANA DE LILLO

Posizione accademica

Settore Concorsuale	dal 07/09/2011 01/A4 - FISICA MATEMATICA
Settore Scientifico Disciplinare	dal 06/03/2001 MAT/07 - FISICA MATEMATICA
Qualifica	Professore Ordinario
Anzianità nel ruolo di professore di I fascia	31/12/2006
Sede universitaria	Università degli Studi di PERUGIA
Dipartimento	Dipartimento di MATEMATICA E INFORMATICA

Posizioni ricoperte precedentemente nel medesimo ateneo o in altri:

dal 28/02/1985 Professore II Fascia Università degli Studi di SALERNO
dal 01/11/1988 Professore II Fascia Università degli Studi di PERUGIA
dal 31/12/2006 Professore I Fascia Università degli Studi di PERUGIA

Pubblicazioni scientifiche

Pubblicazioni principali

1. 2012 - Articolo in rivista
S. DE LILLO, D. BURINI (2012). *Nonlinear Heat Diffusion Under Impulsive Forcing*. MATHEMATICAL AND COMPUTER MODELLING, vol. 55, p. 471-478, ISSN: 0895-7177, doi: 10.1016/j.mcm.2011.05.0
2. 2011 - Articolo in rivista
V. BARONE, S. DE LILLO, G. LUPO, A. POLIMENO (2011). *Dirichlet to Neumann Map for a Nonlinear Diffusion Equation*. STUDIES IN APPLIED MATHEMATICS, vol. 126, p. 145-155, ISSN: 0022-2526, doi: 10.1111/j.1467-9520.2010.00500x
3. 2011 - Articolo in rivista
N. BELLOMO, S. DE LILLO (2011). *On the Modeling of Collective Learning Dynamics*. APPLIED MATHEMATICS LETTERS, vol. 24, p. 1861-1866, ISSN: 0893-9659
4. 2010 - Articolo in rivista
S. DE LILLO, G. LUPO, M. SOMMACAL (2010). *Helical Configurations of Elastic Rods in the Presence of a Long-range Interaction Potential*. JOURNAL OF PHYSICS. A, MATHEMATICAL AND THEORETICAL, vol. 43, p. 85214-85233, ISSN: 1751-8113, doi: 10.1088/1751-8113/43/8/085214
5. 2009 - Articolo in rivista

5. ARGERI M, BARONE V, S. DE LILLO, LUPO G, SOMMACAL M (2009). *Elastic Rods in Life- and Material-Sciences. A General Integrable Model*. *PHYSICA D-NONLINEAR PHENOMENA*, vol. 238, p. 1031-1049, ISSN: 0167-2789
6. 2009 - Articolo in rivista
S. DE LILLO, M. DELITALA, M.C. SALVATORI (2009). *Modelling epidemics and virus mutations by the methods of the kinetic theory of active particles* . *MATHEMATICAL MODELS AND METHODS IN APPLIED SCIENCES*, vol. 19 suppl., p. 1405-1425, ISSN: 0218-2025, doi: 10.1142/S021820250900038
7. 2009 - Articolo in rivista
ARGERI M, BARONE V, S. DE LILLO, LUPO G, SOMMACAL M (2009). *Existence of Energy Minimums for Elastic Thin Rods in Static Helical Configurations*. *THEORETICAL AND MATHEMATICAL PHYSICS*, vol. 159, p. 698-711, ISSN: 0040-5779
8. 2008 - Articolo in rivista
S. DE LILLO, G. LUPO (2008). *A two-phase free boundary problem for a nonlinear diffusion-convection equation*. *JOURNAL OF PHYSICS. A, MATHEMATICAL AND THEORETICAL*, vol. 41, p. 145207-145221, ISSN: 1751-8113
9. 2007 - Articolo in rivista
S. DE LILLO, A.S. FOKAS (2007). *The Dirichlet to Neumann Map for the Heat Equation on a Moving Boundary* . *INVERSE PROBLEMS*, vol. 23, p. 1699-1710, ISSN: 0266-5611, doi: 10.1088/0266-5611/23/4/020
10. 2007 - Articolo in rivista
S.DE LILLO, M. SALVATORI, N. BELLOMO (2007). *Mathematical tools of the kinetic theory of active particles with some reasoning on the modelling progression and heterogeneity..* *MATHEMATICAL AND COMPUTER MODELLING*, vol. 45, p. 564-578, ISSN: 0895-7177
11. 2007 - Articolo in rivista
S. DE LILLO, G. LUPO, M. SOMMACAL (2007). *Half-line Solutions of a Nonlinear Heat Conduction Problem*. *THEORETICAL AND MATHEMATICAL PHYSICS*, vol. 151, p. 926-932, ISSN: 0040-5779, doi: 10.1088/0305-4470/39/23/008
12. 2006 - Articolo in rivista
S. DE LILLO, G. LUPO, G. SANCHINI (2006). *A Cauchy Problem in Nonlinear Heat Conduction*. *JOURNAL OF PHYSICS. A, MATHEMATICAL AND GENERAL*, vol. 39, p. 7299-7307, ISSN: 0305-4470
13. 2005 - Articolo in rivista
S. DE LILLO, G.SANCHINI (2005). *On the Eckhaus Soliton Propagation in a Random Medium*. *MATHEMATICAL AND COMPUTER MODELLING*, vol. 50, p. 255-261, ISSN: 0895-7177
14. 2005 - Articolo in rivista
S. DE LILLO (2005). *Neumann Problem on the Semi-Line for the Eckhaus Equation* . *NONLINEARITY*, vol. 18, p. 2365-2372, ISSN: 0951-7715, doi: 10.1088/0951-7715/18/2/. .
15. 2003 - Articolo in rivista
De Lillo S., Ablowitz M. (2003). *On a two-phase free boundary problem* . *JOURNAL OF PHYSICS. A, MATHEMATICAL AND GENERAL*, vol. 36, p. 4307-4319, ISSN: 0305-4470, doi: 10.1088/0305-4470/36/15
16. 2003 - Articolo in rivista
De Lillo S., Salvatori M.C., Sanchini G. (2003). *On a Free Boundary Problem in a Nonlinear Diffusive-Convective System* . *PHYSICS LETTERS A*, vol. 310, p. 25-29, ISSN: 0375-9601, doi: 10.1016/j.physleta.2011.11.011
17. 2001 - Articolo in rivista
De Lillo S., Konotop V. (2001). *Inhomogeneous Burgers Lattices* . *JOURNAL OF NONLINEAR MATHEMATICAL PHYSICS*, vol. 8S, p. 82-88, ISSN: 1402-9251
18. 2001 - Articolo in rivista
De Lillo S., Biondini G. (2001). *On the Burgers equation with moving boundary*. *PHYSICS LETTERS A*, vol. 279, p. 194-201, ISSN: 0375-9601
19. 2000 - Articolo in rivista
M.J.ABLOWITZ, S. DE LILLO (2000). *Solutions of a Burgers-Stefan problem*. *PHYSICS LETTERS A*, vol. 271, p. 273-276, ISSN: 0375-9601, doi: 10.1016/S0375-9601(00)00358-3
20. 2000 - Articolo in rivista
De Lillo S., Ablowitz M. (2000). *On a Burgers-Stefan problem*. *NONLINEARITY*, vol. 13, p. 471-478, ISSN: 0951-7715, doi: 10.1088/0951-7715/13/2/308
21. 1999 - Articolo in rivista

21.

De Lillo S., Di Gregorio G. (1999). Nonlinear heat conduction with time dependent flux. *INVERSE PROBLEMS*, vol. 15, p. 189-192, ISSN: 0266-5611, doi: 10.1110.1088/0266-5611/15/1/020

22. 1998 - Articolo in rivista

S. DE LILLO, KONOTOP V.V. (1998). On an integrable stochastic Volterra lattice. *JOURNAL OF PHYSICS. A, MATHEMATICAL AND GENERAL*, vol. 31, p. 3831-3837, ISSN: 0305-4470

23. 1998 - Articolo in rivista

A.DEGASPERIS, S. DE LILLO, F.TINEBRA (1998). Solutions of 1+1 relativistic field models. *JOURNAL OF MATHEMATICAL PHYSICS*, vol. 39, p. 497-531, ISSN: 0022-2488, doi: 10.1063/1.532329

24. 1997 - Articolo in rivista

M.J.ABLOWITZ, G.BIONDINI, S. DE LILLO (1997). On the well posedness of the Eckhaus equation. *PHYSICS LETTERS A*, vol. 230, p. 319-323, ISSN: 0375-9601, doi: 10.1016/S0375-9601

25. 1997 - Articolo in rivista

CALOGERO F., DEGASPERIS A., S. DE LILLO (1997). The Multicomponent Eckhaus equation. *JOURNAL OF PHYSICS. A, MATHEMATICAL AND GENERAL*, vol. 30, p. 5805-5814, ISSN: 0305-4470

26. 1996 - Articolo in rivista

ABLOWITZ M.J., S. DE LILLO (1996). The Burgers equation under deterministic and stochastic forcing. *PHYSICA D-NONLINEAR PHENOMENA*, vol. 92, p. 245-259, ISSN: 0167-2789, doi: 10.1016/0167-2789(95)00

27. 1994 - Articolo in rivista

F.CALOGERO, S. DE LILLO (1994). Flux infiltration into soils: analytic solutions. *JOURNAL OF PHYSICS. A, MATHEMATICAL AND GENERAL*, vol. 27, p. L137-L142, ISSN: 0305-4470, doi: 10.1088/0305-4470/27/5/006

28. 1994 - Articolo in rivista

M.J.ABLOWITZ, S. DE LILLO (1994). Parametric forcing, bound states and solutions of a nonlinear Schrodinger type equation. *NONLINEARITY*, vol. 7, p. 1143-1153, ISSN: 0951-7715, doi: 10.1088/0951-7715/7/4/0

29. 1994 - Articolo in rivista

S. DE LILLO (1994). The Burgers equation under multiplicative noise. *PHYSICS LETTERS A*, vol. 188, p. 305-308, ISSN: 0375-9601, doi: 10.1016/0375-9601(94)9

30. 1993 - Contributo in volume (Capitolo o Saggio)

M.J.ABLOWITZ, S. DE LILLO (1993). Rapidly forced Burgers equation. In: P.A.CLARKSON. Applications of analytic and geometric methods to nonli near differential equations. vol. 413, p. 81-88, DORDRECHT:--Netherlands: Springer Netherlands -Dordrecht Netherlands:Kluwer Academic Publishers, ISBN: 0792324579

31. 1992 - Articolo in rivista

S. DE LILLO (1992). Semiline solutions of the Eckhaus equation. *INVERSE PROBLEMS*, vol. 8, p. L1-L4, ISSN: 0266-5611, doi: 10.11088/0266-5611/8/4/0

32. 1992 - Articolo in rivista

S. DE LILLO (1992). Semiline solutions of a nonlinear diffusion-convection equation. *PHYSICS LETTERS A*, vol. 167, p. 479-482, ISSN: 0375-9601, doi: 10.1016/0375-9601(92)9

33. 1992 - Articolo in rivista

F.CALOGERO, S. DE LILLO (1992). The Eckhaus equation in an external potential. *JOURNAL OF PHYSICS. A, MATHEMATICAL AND GENERAL*, vol. 25, p. L287-L290, ISSN: 0305-4470, doi: 10.1088/0305-4470/25/7/

34. 1991 - Articolo in rivista

M.J.ABLOWITZ, S. DE LILLO (1991). Forced and semiline solutions of the Burgers equation. *PHYSICS LETTERS A*, vol. 156, p. 483-487, ISSN: 0375-9601, doi: 10.1016/0375-9601(91)9

35. 1991 - Articolo in rivista

F.CALOGERO, S. DE LILLO (1991). Burgers equation on the semiline with general boundary conditions at the origin. *JOURNAL OF MATHEMATICAL PHYSICS*, vol. 32, p. 99-105, ISSN: 0022-2488, doi: 10.1063/1.529101

36. 1989 - Articolo in rivista

F.CALOGERO, S. DE LILLO (1989). Burgers equation on the semiline. *INVERSE PROBLEMS*, vol. 5, p. L37-L40, ISSN: 0266-5611, doi: 10.1088/0266-5611/4/4/0

37. 1989 - Articolo in rivista

F.CALOGERO, S. DE LILLO (1989). The Burgers equation on the semi-infinite and finite interval. *NONLINEARITY*, vol. 2, p. 37-43, ISSN: 0951-7715, doi: 10.1088/0951-7715/2/1/0

38.

38. 1988 - Articolo in rivista
F.CALOGERO, S. DE LILLO (1988). *Cauchy problems on the semiline and on a finite interval for the Eckhaus equation*. *INVERSE PROBLEMS*, vol. 4, p. L33-L37, ISSN: 0266-5611, doi: 10.1088/0266-5611/4/
39. 1987 - Articolo in rivista
CALOGERO F., S. DE LILLO (1987). *The Eckhaus PDE*. *INVERSE PROBLEMS*, vol. 3, p. 633-681, ISSN: 0266-5611, doi: 10.1088/0266-5611/3/4/0
40. 1987 - Articolo in rivista
De Lillo S (1987). *Discreteness Effects on Sine Gordon Solitons*. *IL NUOVO CIMENTO B*, vol. 100, p. 105-120, ISSN: 2037-4895, doi: 10.1007/BF02829779
41. 1983 - Articolo in rivista
De Lillo S, Sodano P (1983). *Kink Size Dependent Bound States In Modified Sine Gordon Models*. *LETTERE AL NUOVO CIMENTO*, vol. 37, p. 380-384, ISSN: 0024-1318, doi: 10.1007/BF02739661

Altre Pubblicazioni

1. 2005 - Articolo in rivista
M.J. ABLOWITZ, S. DE LILLO, C. AHRENS (2005). *On a "Quasi" Integrable Discrete Eckhaus Equation*. *JOURNAL OF NONLINEAR MATHEMATICAL PHYSICS*, vol. 12, p. 1-12, ISSN: 1402-9251, doi: 10.2991/jnmp.2005.12.s1.1
2. 2004 - Contributo in Atti di convegno
S. DE LILLO, G. SANCHINI (2004). *Stochastic effects on the Eckhaus Soliton Propagation*. In: -. *Nonlinear Waves: Classical and Quantum Aspects*. Estoril, 12-17/7/2003, p. 145-150, F.K.Abdullaev and V.V.Konotop ; KLUWER, ISBN: 9781402021886
3. 2004 - Articolo in rivista
S. DE LILLO, M.C. SALVATORI (2004). *A Two-Phase Free Boundary Problem for the Nonlinear Heat Equation*. *JOURNAL OF NONLINEAR MATHEMATICAL PHYSICS*, vol. 11, p. 134-140, ISSN: 1402-9251
4. 2003 - Contributo in Atti di convegno
De Lillo S., Salvatori M.C., Sanchini G. (2003). *Solution of a free boundary problem for a nonlinear diffusion-convection equation*. In: -. *Nonlinear physics: theory and experiment. II*. Gallipoli (Lecce), 27 giugno - 6 luglio 2002, p. 44-50, Singapore:World Sci.Publ.,river edge, NJ., ISBN: 9812382704
5. 2002 - Articolo in rivista
De Lillo S., Salvatori M.C. (2002). *On a One-Phase Stefan Problem in Nonlinear Conduction*. *JOURNAL OF NONLINEAR MATHEMATICAL PHYSICS*, vol. 9, p. 446-454, ISSN: 1402-9251
6. 2000 - Contributo in Atti di convegno
De Lillo S., Casagrande S. (2000). *More about Moving Boundary Problems for the Burgers Equation..* In: -. *Nonlinearity, Integrability and all that: 20 years after NEEDS '79*. Gallipoli (Italy), p. 97-100, SINGAPORE:World Scientific, ISBN: 981024147X
7. 1998 - Articolo in rivista
S. DE LILLO (1998). *Moving boundary problems for the Burgers equation*. *INVERSE PROBLEMS*, vol. 13, p. L1-L4, ISSN: 0266-5611, doi: 10.1088/0266-5611/1411/
8. 1996 - Contributo in volume (Capitolo o Saggio)
G.BIONDINI, S. DE LILLO (1996). *Stochastic effects on NLS solitons*. In: L.VASQUEZ; L.STREIT; V.PEREZ GARCIA. *Nonlinear Klein Gordon and Schroedinger Systems*. p. 262-265, SINGAPORE:World Scientific, ISBN: 9810225598
9. 1987 - Articolo in rivista
De Lillo S, Wong On, Umezawa H (1987). *Statistics of Renormalized Solitons in Thermo Field Dynamics*. *PHYSICAL REVIEW D*, vol. 27, p. 171-186, ISSN: 0556-2821, doi: 10.1016/0167-2789(87)90009
10. 1983 - Articolo in rivista
De Lillo S, Vitiello G (1983). *Discrete Chirality and Fermion Zero Modes*. *PHYSICS LETTERS. SECTION B*, vol. 124, p. 204-208, ISSN: 0370-2693, doi: 10.1016/0370-2693(83)91436-3
11. 1981 - Articolo in rivista
De Lillo S, Sodano P (1981). *A Note on the Internal Zero Modes Of Solitons*. *PHYSICAL REVIEW D*, vol. 24, p. 1675-1676, ISSN: 0556-2821, doi: 10.1103/PhysRevD.24.1675

Titoli

responsabilità scientifica per progetti di ricerca internazionali e nazionali, ammessi al finanziamento sulla base di bandi competitivi che prevedano la revisione tra pari

Progetto	Durata	Ruolo Ricoperto
PRIN 2002: Singolarita', Integrabilita', Simmetrie	24	Responsabile Unità
PRIN 2004: SINTESI (Singolarità Integrabilità Simmetrie)	24	Responsabile Unità
PRIN 2008: Molecular SPACE: Molecular Self-assembly Predicted and Accomplished: from Computation to Experiment	24	Responsabile Unità

F.to Silvana De Lillo