CURRICULUM VITÆ

Name	Jacopo De Simoi
Birth date	September 20th 1981
Current address	Università degli studi di Roma Tor Vergata
	Dipartimento di Matematica
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Current research interests

Statistical and ergodic properties of smooth and
piecewise smooth dynamical systems;
Hamiltonian systems; coexistence of elliptic and chaotic behavior;
Fermi acceleration; KAM theory.

Post-doctoral employment

European Research Council research fellow (Assegno di ricerca)

Affiliation: II Università di Roma, Tor Vergata
Dates of Appointment: Oct 2012 - Sep 2014
Scientist in charge of the position: Prof. C. Liverani

European Research Council Post-Doctoral fellow

Affiliation: II Università di Roma, Tor Vergata
Dates of Appointment: Oct 2010 - Sep 2012
Scientist in charge of the position: Prof. C. Liverani

Fondation Science Mathématiques de Paris Post-Doctoral fellow

Affiliation: Université Pierre et Marie Curie, Paris
Dates of Appointment: Oct 2009 - Sep 2010
Scientist in charge of the position: Prof. R. Krikorian

Education

Ph.D. program in Mathematics at University of Maryland, College Park (2005-2009)

Block Grant Fellowship (Aug 2005 - Aug 2007)
Teaching assistantship (Aug 2007 - Aug 2009)
Visiting student at University of Toronto (2006 - 2007), supervisor: Prof K. Khanin
Graduated 09/09/2009; thesis advisor: Prof. D. Dolgopyat
Thesis: *Abundance of escaping orbits in a family of
anti-integrable limits of the standard map*

Undergraduate studies (2000-2005)

Diploma di Licenza in Physics at Scuola Normale Superiore, Pisa
Graduated *cum laude* in Dec 2005

M. Sc. in Physics at Università di Pisa
Graduated *cum laude* in May 2005, thesis advisor: Prof. S. Marmi
Thesis: *Potts models on hierarchical lattices and renormalization group dynamics*

B. Sc. in Physics at Università di Pisa
Graduated *cum laude* in Oct 2003, thesis advisor: Prof. S. Marmi
Thesis: *Hierarchical models and Julia Sets*

Teaching experience

Teaching assistant - University of Maryland, College Park

Class: Calculus III - Third year undergraduate level - Spring 2008
Weekly work load: 10h - Main instructor: Prof. P. Wolfe

Grader - University of Maryland, College Park

Class: Linear algebra - Fourth year undergraduate level - Spring 2009
Weekly work load: 10h - Main instructor: Prof. D. Hamilton

Class: Complex analysis - Postgraduate level - Fall 2008
Weekly work load: 10h - Main instructor: Prof. G. Forni

Class: Topology and Geometry - Postgraduate level - Fall 2008
Weekly work load: 10h - Main instructor: Prof. S. Novikov

Class: Complex analysis - Postgraduate level - Fall 2007
Weekly work load: 10h - Main instructor: Prof. M. Jakobson

Publications

Fermi acceleration in anti-integrable limits of the standard map
Preprint, `arxiv:1204.5667` (2012)

Dynamics of some piecewise smooth Fermi-Ulam Models
(joint with D. Dolgopyat) *Chaos*, 22 026124 (2012)

On Cyclicity one Elliptic Islands of the Standard Family
Preprint, `arxiv:1107.3518` (2011)

Stability and Instability results in a model of Fermi Acceleration
Discrete and Continuous Dynamical Systems A, 25 719-750 (2009)

Potts models on hierarchical lattices and Renormalization Group dynamics
(joint with S. Marmi) *Journal of Physics A*, 42, 095001 (2009).

Potts models on hierarchical lattices and Renormalization Group dynamics II:
examples and numerical results
Journal of Physics A, 42, 095002 (2009)

In preparation

(with C. Liverani) Partially hyperbolic systems close to trivial extensions I & II
(with D. Dolgopyat) On ergodic properties of dispersing Fermi-Ulam models
(with V. Kaloshin) On prevalent properties of smooth convex billiards

Workshops and schools

2012   ICTP-ESF School and Conference in Dynamical Systems
ICTP, Trieste, Italy

Workshop in Dynamical Systems and related topics
University of Maryland, College Park, MD, USA

2011   Thematic Program on Dynamics and Transport in Disordered Systems
Fields Institute, Toronto, Canada

Second meeting of the Young Italian Hyperbolicians
Università di Pisa, Italy

2010   Periodic Approximations in Ergodic Theory
Centro De Giorgi, Pisa, Italy

INdAM Meeting: Hyperbolic Dynamical Systems in the Sciences
Corinaldo, Italy

2009   Progress in Dynamics (in honor of A. Katok 65th birthday)
IHP, Paris, France

Workshop on weak turbulence
IHP, Paris, France

First Young Italian Hyperbolicians workshop
Corinaldo, Italy

2009	Workshop in Dynamical Systems and related topics *University of Maryland, College Park, MD, USA*
2008	Workshop in Dynamical Systems and related topics *Penn State University, State College, PA, USA*
	Summer school and conference in Dynamical Systems *ICTP, Trieste, Italy*
	ESI programme in Hyperbolic Dynamical Systems *ESI, Vienna, Austria*
	Workshop in Dynamical Systems and related topics *University of Maryland, College Park, MD, USA*
2007	Workshop in Dynamical Systems and related topics *Penn State University, State College, PA, USA*
	Clay Institute summer school on Homogeneous flows, Moduli spaces and arithmetic *Centro di ricerca Matematica E. De Giorgi, Pisa, Italy*
2006	Hyperbolic geometry workshop *Fields Institute, Toronto, ON, Canada*
2003	SMI summer school on Holomorphic Dynamics *SNS, Cortona, Italy*

Language skills

Italian · native
English · fluent written and spoken
French · intermediate spoken, proficient written
Spanish · fluent spoken

Extra-academic interests

Studied violin since 1990, achieved *Conservatory Diploma* (10 year-course) in June 2005. Founding member of the Youth University Orchestra in Pisa, Italy and member of the Corktown Chamber Orchestra in Toronto, Canada
Experienced in computer programming (Qt/C++, bash) and as GNU/Linux system administrator; open source enthusiast and contributor (KDE software).