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Professional address

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Main position :

Professor in University Paris1 Panthéon-Sorbonne

Researcher inside the Centre d'Economie de la Sorbonne (Finance team)

Prime for PhD supervisions (9 students)

Member of the "Commission de Spécialistes" in Mathematics at Paris1 Panthéon-Sorbonne.

Responsible of the project Electricity Prices and weather derivatives inside Europlace of finance.

Coordinator of the different finance formations (Master2 degree) inside the UFR of Economics and Mathematics in Paris 1 Panthéon-Sorbonne.

Head of the track: "Quantitative Finance" of the Master MMEF of Paris1 Panthéon-Sorbonne.

Responsible of the cooperation between the University Paris1 Pantheon-Sorbonne and the Haut College d'Economie of Moscova (Russia) for the finance studies.

Research domains

Non linear time series modelling

Risk measures in finance

Financial markets

Parametric and non-parametric statistical methods : application in finance

Deterministic chaotic system

Formation

Bachelor in sociology, Paris VII, 1974

PhD in mathematics, Orsay, 1977

PhD in psychology, EPHESS, Paris, 1981

Oriental languages diploma Paris III, 1982

Doctorat d'état in Mathematics, Grenoble, 1988

Distinction

Senior Academic Fellow of l'IEF (Institut Europlace de Finance) , Paris, since 2003.

Chair in Finance at Birckbeck College (Londres – Grande Bretagne) - 2003.

Fellow of the European network EABCN (Euro Area Business Cycle Network) since 2002.

Editorial responsibility

European Journal of finance : Associated editor (2000 – 2005)

Referee in 17 scientific journals : Annales d'économie et de statistiques - Econometrica. - Economie et prévision - Journal of Business and Economic Statistics. - Journal of the Royal Statistical Society (JRSS). - Journal of Time Series Analysis (JTSA). - The European Journal of finance - Notes aux Comptes rendus de l'Académie des Sciences - Publications de Statistiques de l'ISUP.- Scandinavian journal of statistics and their Applications- Systems and Control Letters. - Revue de Statistique Appliquée - Statistique et Analyse des données. - Statistical Inference for Stochastic Processes - Systems and Control - Signal Processing – Traitement du signal.

Professional and academic communities

Member of: A.S.U. : Association des Statisticiens Universitaires ; S.M.F. : Société Mathématique de France ; S.M.A.I. : Société Mathématiques et Applications Industrielles. ; I.S.I., “**elected Fellowship**” inside the Bernoulli ; I.M.S. : Institute of Mathematical Society ; Bachelier committee ; AFFI.

Previous and Other positions

- Professor inside the Department of Economy and Management in Ecole Normale Supérieure de Cachan (2001 – 2007)
- Head of the Department of Economy and Management in Ecole Normale Supérieure de Cachan (2004 – 2007)
- Head of the team « Quantitative Finance» (located in Cachan) inside the Centre d'Economie de la Sorbonne of Paris 1 (C.E.S.) UMR 8711 (2006 -2007).
 - Head of the concourse to enter in Department of Economy and Management in Ecole Normale Supérieure de Cachan (2004 – 2007).
- Elected member of the Scientific Council of ENS Cachan (2005 – 2007)
- Head of the specialist commission of Economie-Management-Law of Ecole Normale Supérieure de Cachan (2007)
- Nominated member of the Faculty council of the University Paris 11 (2004 – 2007)
- Responsible of the PhD thesis in economy and management inside the Doctoral School EDSP of ENS Cachan.(2003 – 2007)
- Co – Responsible with R. Wolff of an exchange and research program between ENSC and Queensland University of Technology of Brisbane, Australia (2003 – 2007).
- Responsible of several exchange programs between ENSC and Italy, Roumania, Spain and Sénégal (2003 – 2007).
- Member of the laboratory council of IDHE – UMR CNRS 8533 (2004 – 2006)
- Head of the team MORA (Modelling – Risks – Applications) inside IDHE UMR CNRS 8533 (2002 – 2006)
- Member of the specialist commission in Economy in ENSC (2003).
- Professor inside the department of Mathematics of the University of Reims – (1998 – 2001)
- Head of the Master profession Formation DESS « Statistical Methods for finance and industry » in Reims. (2000-2001)
- Professor in Statistics in ENSAE (1993-1998)
- Associate professor in University Paris XIII.(1975- 1998)
- Assistant professor in University of Niamey – Niger.(1971 -1975)
- Professor of mathematics in colleges (1969-1971)

- IPES (1966 -1969).

Training

2007 – 2008 : Paris 1 Panthéon-Sorbonne

Courses in English (M1 and M2 Master degree)

- Statistical Methods in Finance
- Risk measures in Finance
- Contagion models on the financial and economics spheres
- Nonlinear modelling: econometric approach
- Probabilistic tools for insurance: extreme value theory
- Stochastic processes: theory and applications in finance (course given also inside HEC in Moscou)

2001 - 2007

- **Courses in ENS Cachan :**

Statistique mathématique (1^{ère} année ENS Cachan)

Séries temporelles (2^{ème} année ENS Cachan)

Gestion des risques (2^{ème} année ENS Cachan)

- **Courses in Masters P1, P2, P11, P12, GREQAM, Université de Venise et de Brisbane, Université UP Dilliman of Manilla, ENSAE, ENSTA, ESCP**

Modélisation non linéaire en finance et théorie des valeurs extrêmes

Processus non linéaires et gestion des risques

- **Training inside EDF (2001 – 2003)**

Processus longue mémoire et valeurs extrêmes.

Before 2001

- **Université de Reims (1998 - 2001) :** cours de statistiques (maîtrise de mathématiques) – séries temporelles et valeurs extrêmes (DESS MSFI) – encadrements de stages en entreprise.

- **ENSAE (1993 – 1998):** cours de statistiques et séries temporelles (en 2^{ème} année) – cours de modélisation non linéaire et valeurs extrêmes (en 3^{ème} année) – systèmes chaotiques (formation par la recherche) – groupes de travail – encadrements de stages en entreprise.

- **Paris XIII (1975 – 1993) :** mise en place d’enseignements spécifiques en DEUG MASS et en maîtrise pour l’ingénieur – cours en licence et maîtrise de mathématiques.

- **DEA P1, VI, IX, XIII (1989 – 2001) :** cours de modélisation non linéaire.

- **Formation continue (1993 – 1998) :** encadrement de stage à finalité professionnelle dans le cadre du CEPE (INSEE) sur la modélisation linéaire et formation continue au sein du Crédit Lyonnais.

Supervisions of PhD Theses

PhD theses already defended under my supervision

19 - Céline Zhang : Dynamic methods for multivariate option pricing, **2008**, Doctorat in mathematics, ECNU Shanghai and ENSC.

- 18 - Octavie M'Biakou : Contagion et volatilité dans les marchés asiatiques, **2008**, Doctorat en économie, Ecole Normale Supérieure de Cachan, France .
- 17 – Rany Thach : Business cycles and seasonalities, **2007**, Queensland University of Technology, Brisbane, Australie, “co-tutelle” with R. Wolff.
- 16 - Lanouar Chafferline : Tests de ruptures et modèles à changements de régime, **2007**, Université Paris 2, ATER Université Marne La Vallée.
- 15 – Julien Houdain : Valorisation et gestion du risque de crédit : les CDS synthétiques ou la croissance exponentielle des produits de corrélation, **2006**, Doctorat en économie, Ecole Normale Supérieure de Cachan, France, Risk Manager Fortis investment.
- 14 – Nicolas Huck : Prévision du sens de variation des series financiers: une approche relative et transitive, **2005**, Doctorat en économie, Ecole Normale Supérieure de Cachan, France, Professeur au sein de l'Ecole de Commerce de Nancy..
- 13 – Abdou Ka Diongue : processus longue mémoire généralisés et multivariés : application au prix spot d'électricité, **2005**, Doctorat en Mathématiques, Ecole Normale Supérieure de Cachan, France. Post – doc QUT Brisbane, Australie.
- 12-Stéphanie Rioublanc : Mesures de concordance entre les cycles de séries financières,, **2005**, Doctorat en économie, Ecole Normale Supérieure de Cachan, France, Trader Abn Amro.
- 11 – Cyril Caillault : Le risque de marché. Mesures et backtesting. Approche par les copules dynamiques, **2005**, Doctorat en économie, Ecole Normale Supérieure de Cachan, France. Risk Manager chez Fortis Investment.
- 10 - Aliou Diop : Valeurs extrêmes dans des processus à temps discret, Thèse d'état en Mathématiques, **2004**, Université de Saint Louis, Sénégal, Maître de Conférence à l'Université Gaston Berger de Saint Louis, Sénégal.
- 9 – Jérôme Collet : Processus longue mémoire généralisés : estimation et prévisions, **2003**, Doctorat en Mathématiques, Université de Reims, France, Risk manager chez Fortis Investment.
- 8 – Ryan Suleiman : Indices boursiers internationaux et la crise des nouvelles technologies : approches switching et DCC-MV GARCH, **2003**, Doctorat en Economie Ecole Normale Supérieure de Cachan, France, Risk manager chez Fortis Investment.
- 7 – Sophie Ladoucette : Modélisation et Estimation des systèmes non linéaires : Applications à la finance, **2002**, Doctorat en Economie, Ecole Normale Supérieure de Cachan, France, Post-doc à l'Université de Leuven.
- 6 - Voicu Mirela : Etude de l'instabilité de certains modèles macro - économiques (approche chaotique). Applications à l'économie roumaine, **2001**, Doctorat en Mathématiques, Université de Timisoara, Roumanie. Assistante à l'Université de Timisoara.
- 5 - Ferrara Laurent: Processus de Gegenbauer : théorie et applications , **2000**, Doctorat en Mathématiques, Université Paris XIII. Chercheur au Centre d'Observation Economique, Paris.
- 4 - Mercier Ludovic : Détection de Chaos et prédictions dans des séries financières, **1998**, Doctorat en Mathématiques, Université Paris IX. Risk-Manager chez Dexia.
- 3 - Bisaglia Luisa: Estimation dans les processus longue mémoire, **1998**, Doctorat en Mathématiques, Université de Padoue, Italie. Maitre Assistante à l'université de Padoue.
- 2 - Doucoure Fodyia : Erreurs de prévisions dans les modèles de séries chronologiques, **1998**, Doctorat en Mathématiques, Université de Saint Louis, Sénégal. Maître assistant à l'Université de Dakar.
- 1 - Wandji N'Gatchou ; Etude des tests de non linéarité. Construction de tests, étude de puissance, **1995**, Doctorat en Mathématiques, Université Paris XIII. Maître de Conférence à l'Université de Caen, HdR 2006.

PhD thesis in progress under my supervision

- 1 Florian Ielpo : Gestion ALM et prévisions de court terme, defense in september 2008 (CIFRE DEXIA).
- 2 Mathieu Gatamel : Valorisation du risque et applications actuarielles, defense in 2009 (CIFRE AXA)
- 3 Lu Zhiping : Modélisation non linéaire et ondelettes, defense in 2009, (Bourse ENS) – Cotutelle avec l’Université de Shanghai.
- 4 Souleymane Fofana : Non stationarité et longue mémoire, defense in 2009, (Bourse EGIDE)- Cotutelle avec l’Université Saint Louis du Sénégal.
- 5 Katernyna Shapovalova : Econométrie financière, defense in 2010, Bourse MRT.
- 8 Bertrand Hassani : Les copules extrêmes dynamiques : une application aux risques opérationnelles, (CIFRE CNCE), defense in 2010, Université Paris1 Panthéon – Sorbonne
- 9 Abdelkader Marhaoui : Pricing d’options en marchés incomplets, Bourse Marocaine, defense in 2010, Université Paris1 Panthéon-Sorbonne .
- 10 Marius-cristian Funza : Modélisation du CO2, Université Paris1.Panthéon-Sorbonne.

Member of PhD defence examining board (details from 2001)

- Frederic Specklin, 2001, PhD in management, ENSC, Paris, (Supervisor B. Munier). (Head of the jury)
- Adrian Gerard Barnett, 2002, PhD in mathematics, Brisbane, Australia, (Supervisor R.Wolff). (Referee)
- Laurent Deveaux, 2002, PhD in management, ENSC, Paris, (Supervisor B. Munier). (Head of the jury)
- Pierre Mazzega, 2002, HDR in Physics, University of Toulouse . (Referee).
- Daniel Ventosa Santaularia, 2003, PhD in economics, GREQAM, Marseille, (Supervisor Pr Russell) (Referee).
- Alois Lanyanda-Kasanda, 2004, PhD in management, Paris IX, (Supervisor H. Geman) : (Referee)
- François Ghoulmie, 2005, PhD in Physics, ENS Ulm - Paris (Supervisor J.P Nadal) (Invited member)
- Michael Falta, 2005, PhD in Finance, Brisbane, Australia, (Supervisor R. Wolff). (Referee)
- Muriel Nguiffo-Boyom, 2005, PhD in economics, University Paris 2 (Supervisor F. Charpin) (Head of the jury)
- Chafik Mehry, 2006, PhD in economics in Montpellier 1, (Supervisor J. Aben) : (Referee)
- Leila Nourra, 2006, PhD in economics, GREQAM, Marseille, (Supervisor C. Marimoutou) : (Referee)
- Amir Nafi, 2006, PhD in management, Strasbourg 1, (Supervisor M. Llerena). (Referee).
- Alexei Kozhemiak, 2006, PhD in mathematics in Ecole polytechnique de Paris, (Supervisor P. Bacri). (Invited member)
- Mamadou Faye, 2007, PhD in economics in the University Paris II, (Supervisor A. Scannavino). (Referee)..
- Kohei Marumo, 2007, PhD in finance, University of QUT in Brisbane, Australia (Supervisor R. Wolff) . (Referee)

- Laurent Ferrara, 2007, HdR in economics, University Paris1 Panthéon-Sorbone, (Presented by T. Chauveau). (Invited member)
- Naamane Laib, 2007, HdR in Mathematics, University Paris 6, (Presented by P. Deheuvels). (Invited member)
- Calum Robertson, 2008, PhD in computing, University of QUT in Brisbane, Australia (Supervisor R. Wolff) . (Referee).

Supervisions of Master dissertations

I have supervised around 50 master dissertations inside research laboratories or enterprises (EDF, RATP, Insurance companies, a lot of banks).

Invitations in Universities

2008 – HEC Montreal and University of Montreal, Canada - Business School of Warwick, GB - ECNU University in Shanghai, China – Department of Statistics, Padova, Italy - Christchurch University in New Zealand - University of Monash in Melbourne (Australia) – University of Adelaide, (Australia) - University of Technology in Sydney (Australia) - Queensland University of technology in Brisbane (Australie) – Ca’Foscari University in Venezia (italy) - ISI (Indian Statistical Institute) in Kolkata (India) and New Delhi (India) – ICIER (Indian Center of International Economics Research) in New Delhi (India) – IFMR (Institute For Financial Management and Research) in Chennai (India).

2007 – University of Aix-en Provence, France - University of Brisbane, QUT, Australia - Haut College d’Economie de Moscou Department of mathematics, University of Singapour-UP Dilliman of Manilla

2006 - University Ca’Foscari, Venezia – University ECNU Shanghai - HEC Montreal Canada .

2005 – UP Dilliman of Manilla - University Ca’Foscari, Venezia - Universidad federal de Rio Grande de Sur in Porto Alegre (Brésil) - Texas University in Austin (USA) . Macquarie University in Sydney (Australie)

2004 – Queensland University of technologie in Brisbane (Australia) – Research Centre of Eurandom in Eindhoven (pays Bas) . Université Ca’Foscari in Venezia..

2003 – University of London (Birckbeck College) (GB) – Université Ca’Foscari in Venezia.

2002 – Research Centre of Eurandom in Eindhoven (pays Bas) - University of Saint Louis in Sénégal – Université Ca’Foscari in Venezia– University of Queensland in Brisbane.

2001 - University of Saint Louis in Sénégal – Research Centre of Statistics Louvain La Neuve, Belgium - University Ca’Foscari in Venezia – University of Timisoara in Roumania - European Institute for Statistic in Eindhoven (Pays bas)

2000 – Institut in mathematical Statistics of Tokyo -Universitéyof Padova - University of Saint Louis in Sénégal

1993 à 1999 – Research center in Statistics in Calcutta , India – Universities of Padova and Venezia – Montreal University, Canada - Universities of Brisbane, Melbourne, Sydney in Australia - University of Humboldt in Berlin, Germany

Organisations of sessions in congress and scientific committees:

Congresses:

- Head of the Quantitative Economic Doctorate Jamboree, University Paris I Panthéon-Sorbonne, Paris, France, 2008
- Head of the session on « Weather Derivatives and Energy » at the International Symposium of Forecasting, IIF, Nice, France, 2008.
- Head of the session on « Copulas and their use in finance » ISI, Sydney, 2005.
- Head of the session on « Dynamical systems » Brisbane, 2002 (IWSM02).
- Head of the session on « Prevision in complex systems » ,Sydney , 2004 (24th Symposium on Forecasting).
- Member of the scientific committee in the annual congress “Financial Forecasting Markets” (1993 -2005)
- Member of the scientific committee in the Australian congress in Statistics, IWSM04. Avril 2004.
- Member of the scientific committee of the mathematical congress in Sénégal (1999 et 2000)

Responsible of different research seminars :

- 2006 – 2008 Monthly seminar « Monnaie – Banque - Finance – Assurance (MBFA) in Paris I Panthéon – Sorbonne.
- 2002 – 2006 Monthly seminar « gestion des risques en instabilité financière » in ENS Cachan
- 1998 – 2001 Monthly seminar « Statistiques et Finance » in University of Reims.

Professional and International networks:

Professional network:

- Consulting in EDF : 2002
- Consulting in Banque de France: 2002 – 2003
- Supervision of theses inside enterprises: Banque de France (from 1999 to 2005); EDF (from 2003 to 2006); Dexia (from 2001 to 2008); Fortis investments (from 2004 to 2007); Axa (from 2005 to 2008).
- Contract with the PACA region (South of France) : 2003 – 2004.

International network:

- Responsible of Bilateral cooperations with :
The economics department of Ca’Foscari, University of Venezia, Italy
The mathematics department of University Gaston Berger in St Louis, Sénégal
The finance department of Eurandom institute in Eindhoven, The Netherlands
The finance department of the Business school in QUT, Brisbane, Australia.
The department of mathematics of ECNU, Shanghai, China.
The department of Economics of NUS, Singapore;
- Specific cooperations and links with researchers of different universities:
J. Ieroux, HEC, Montreal, Canada (2008), Nedda Cechinaddo, Padova, Italy (2008), Marco Valquez, New Zealand (2008), A. Faure-Grimaud, LES, London (2007), Reisen Univ. of Rio, Bresil, (2007), R. Wolff Brisbane, Australie (2007), M. Billio et L. Pelizzon , Venice (2006), R. Wolff, Australie (2005), E. Ruiz, Espagne (2005), T. Mikosch, Norvège (2005), S. Mandira, Eurandom, Pays –bas (2004), K. Marinas, Univ de Budapest, Hongrie (2004), C. Starica de Chalmers Univ, (2004), T. Terasvirta de Stockholm (2003), M. Taylor de Warwick (2003), M. Billio et D. Sartore de Venice (2003), J. Clifford d’Oxford (2003), R. Wolff à Brisbane (2002, 2003), J. de Vries d’Eurandom (2001), Provenzale de Turin (2000), C. Starica de Chalmers Univ, (2000), F. lisi de Padoue (1999), D. MacKernan de Rome (1999), L. Bisaglia de Pavie (1999), R. Wolff de Brisbane (1994, 1995, 1997, 1998), R.

Tchernig de Berlin (1997), W. Haerdle de Berlin (1996), F. Lisi de Padoue (1996), R. Chen de texas A&M (1995, 1997), P. Robinson de Londres (1994, 1996), M. Taquq de Boston (1995), H Kunitomo de Tokyo (1995), O. Lessi de Padoue (1994, 1995), H. Tong de Sheffield (1994), P. Lewis de Washington (1994). R. Dalhaus de Heidelberg (1993), O. Lessi de Padoue (1992,1993), T. Ozaki de Tokyo (1992), R. Tsay de Chicago (1992), H. Tong de Sheffield (1991, 1988), J. Willems (1988).

Publications

Books

- 1 – Les chaos en finance : Approche statistique, Economica, Série Mathématique et Probabilité, **2003**, 420 pages.
- 2 - Analyser les séries chronologiques avec S-Plus : une approche paramétrique, Presses universitaires de Rennes, **2003**, 147 pages (en collaboration avec Laurent Ferrara).
- 3 - Séries chronologiques non linéaires à temps discret, Economica, Série Mathématique et Probabilité, **1994**, 301 pages.
- 4 - Enseignement et mathématiques en langues africaines, ACCT, Paris, **1983**, 181 pages.
- 5 - "Manuel de Mathématiques, 4 books, Vuibert, (en collaboration avec M.Balabane,M.Duflo,M.Frisch.)
Tome 1 : Géométrie, **1981**, 292 pages.
Tome 2 : Séries, **1982**, 160 pages.
Tome 3 : Intégration, **1982**, 160 pages.
Tome 4 : Fonction de variables complexes, **1982**, 154 pages.

Chapters in Books

- 1** - VaR computation in a non-stationary setting, ed. G. N. Gregoriou, Handbook of Value at Risk, Bloomberg Press, **2008**.
- 2** – Fractional and seasonal filtering, chapter in the Proceeding Book on the Conference Seasonality, Seasonal adjustment and its implication for short term analysis and forecasting, Eurostat, ed. J.L. Mazi, Luxembourg, **2008**, (with Ferrara).
- 3** - Synthetic CDO Squared Pricing Methodologies, ed. G. Gregoriou and P.U. Ali, “Credit Derivatives Handbook”, McGraw Hill, **2008**, Chapter 16, 361 – 377, (with J. Houdain).
- 4** - Contagion between the financial sphere and the real economy . Parametric and non-parametric tools : A comparison, in Progress in financial market analysis, ed C. Kyrtsov, C. Vorlov, NOVA publishers, NY, **2008**.
- 5** – Fractional seasonality : Models and application to economic activity in the euro area, in Euroindicators Working papers collection, Eurostat publ. Luxembourg, **2008**, (avec L. Ferrara).
- 6** - Real time detection of economic cycles using a threshold model, Growth and cycle in the Euro-zone, eds. G. L. Mazzi and G. Savio, Palgrave McMillan, New York, **2006**. (avec L. Ferrara).
- 7** - Denoising with wavelets method in chaotic time series: application in climatology, energy and finance, in Noise and Fluctuations in econophysics and finance, ed. By D. Abbott, J.P. Bouchaud, X. gabaix, J.L. McCaulay, Proc. SPIE, vol 5848, 174-185, **2005** (avec Hoummiya).
- 8** - Real Time Detection of the Business Cycle using SETAR models, in Proceeding of the 4th Colloquium on Modern Tools for Business Cycle Analysis, October **2003**, Luxembourg (avec Ferrara).

9 – Comparison of Parameter Estimation Methods in Cyclical Long Memory Time Series, in Wiley, eds. C. Dunis, J. Timmermann, Chapter 8 in “Developments in forecast combination and portfolio choice”, **2001**, (avec Laurent Ferrara).

10 – Some Remarks on the Statistical Modelling of Chaotic Systems, in Birhauser, eds. Mees, Chapter 5 in “Nonlinear dynamics and Statistics, **2000**.

11 - Forecasting Financial Time Series with Generalized Long Memory Processes, in Kluwer Academic Press, eds. C. Dunis, Chapter 14 in «Advances in Quantitative Asset management », **2000**, (with Ferrara).

12 - Processus Stochastiques à Temps Discret, Chapitre 1 dans «Ecole Signal et non linéaire », CNRS, Grenoble, 1 - 20, **1998**.

13 – Non parametric forecasting techniques for mixing chaotic time series, in Birkauser Boston, eds Prochazka, J. Uhler, P.J.W. Rayner, N.G. Kingsbury, chapter 25 in “Signal Analysis and Prediction”, **1998** (with Mercier).

14 - Stochastic or Chaotic dynamics in High Frequency Financial Data, in J. Wiley & Sons, eds. C. Dunis et W. Zhou, Chapter 5 in « Nonlinear modelling of high frequency financial time series », **1998**, (avec L. Mercier).

15 - Etude Statistique des Chaos Déterministes, dans « Reconstruction d’attracteurs et mesure du chaos à partir de l’analyse du signal », Ecole thématique, **Oléron**, CNRS , 27 - 86, **1997**.

16 – Non parametric methods for time series and dynamical systems, in Springer, eds. G.J. Babu and E.D. Feigelson, Chapter 17 in “Statistical Challenges in Modern Astronomy II”, **1997**.

17 - From data to models, in Chapman and Hall, eds. T. Subba Rao, M.B. priestley and O; Lessi, Chapter 8 in “Applications of time series in Astronomy and Meteorology”, **1997**.

18 - « Comparison of several methods to predict chaotic time series », Proceedings of ICASSP-97, Munich, Avril **1997**, 3793 - 3797, (avec Badel, Mercier, Michel).

Publications in Journals with reading committee

61 - Forecasting electricity spot market prices with a k-factor GIGARCH process, to appear in Applied Energy, **2009**, (with Diongue and Vignal).

60 – Business surveys modelling with seasonal-cyclical long memory models, **2008**, Economics Bulletin, 3, (29), 1-10, (with L. Ferrara).

59 - Changing-regime volatility : A fractionally integrated SETAR model, Applied Financial Economics, **2008**, vol. 18, n° 7, 519 – 526, (with Dufrénot et Peguin-Feissolle).

58 – Pricing bivariate option under GARCH processes with time varying copula, Insurance: Mathematics and economics, **2008**, Vol 42/3 pp 1095-1103 , (with Zhang).

57 – Flexible time series models for subjective distribution estimation with monetary policy in view, to appear in Brussels Economic review, **2008**, (with Ielpo).

56 - Effect of noise filtering on predictions : on the routes of chaos", to appear in Brussels Economic Review, to appear in **2008**.

55 – Estimation of k-factor GIGARCH process: A Monte Carlo Study, To appear in Communications in Statistics – Simulation and Computation, **2008**, (with Diongue).

54 - Forecasting VaR and Expected shortfall using dynamical Systems : a risk Management Strategy, to appear in Frontiers in Finance, **2008** (with Caillault).

53 - D. Guégan - La persistance dans les marchés financiers, Revue Banques et Marchés, vol. 90, 1 – 10, Septembre - Octobre **2007**.

52 – The Stationary Seasonal Hyperbolic Asymmetric Power ARCH model, Statistic and Probability Letters, vol. 77, Issue 11, 1158 – 1164, **2007** (with Diongue).

- 51** - Hedging tranches index products: illustration of model dependency, *The ICFAI Journal of Derivatives Markets*, 3, 39 – 61, **2006** (with Houdain).
- 50** - On the use of nearest neighbors in finance, *Revue de Finance*, 26, 67 – 86, **2005**, (with Huck).
- 49** – Prediction in Chaotic Time Series : Methods and Comparisons with an Application to Financial Intra-day Data, *The European Journal of Finance*, 11, 137-150, **2005** (with Mercier).
- 48** – How can we define the concept of long memory ? An econometric survey, *Econometric Reviews*, 24 (2), **2005**.
- 47** - Empirical Estimation of Tail Dependence Using Copulas. Application to Asian Markets, *Quantitative Finance*, 5, 489 – 501, **2005** (with Caillaud).
- 46** – Tail behavior of a threshold autoregressive stochastic volatility model, *Extremes*, **2005** (with Diop).
- 45** - Modelling squares returns using a SETAR model with long memory dynamics, *Economics Letters*, 86, 237 – 243, **2005**, (with Dufrénot et Peguin – Feissolle).
- 44** - Long memory dynamics in a SETAR model: Applications to stock markets, *Journal of International Financial markets, Institutions and Money*, 15, N°5, 391 - 406 **2005** (with Dufrénot et Peguin – Feissolle).
- 43** - Multi-period conditional distribution functions for heteroscedastic models with applications to VaR., *Journal of Applied Probability*, 42, n ° 2, **2005** (with Brummelhuis).
- 42** – Detection of the industrial business cycle using SETAR models, *Journal of the business cycle measurement and analysis*, 2, 353 – 372, **2004**, (avec L. Ferrara)
- 41** - Estimating parameters for a k-GIGARCH process, *C.R.A.S., Serie I*, 339, 435 – 440, **2004** (with Diongue).
- 40** - Asymptotic Behavior for the Extreme Values of a Linear Regression Model, *African Diaspora Journal of Mathematics*, 1, 59 – 67, **2004** (with Diop).
- 39** - Extreme Distribution of a Generalized Stochastic Volatility Model, *South African Journal of Statistics*, 37, 127 – 148, **2003** (with Diop).
- 38** - A prospective study of the k-factor Gegenbauer processes with heteroscedastic errors and an application to inflation rates, *Finance India*, XVII, 1, March **2003**.
- 37**- Modelization and Nonparametric estimation for a dynamical system with noise, *Journal of Statistical Planning and Inference*, 6, 267 – 290, **2003** (with Bosq).
- 36**- Extreme values of particular nonlinear processes, *C.R.A.S., t. 335*, 73 – 78, **2002** (with Ladoucette).
- 35** - Long memory behavior for simulated chaotic time series, *IEICE Trans. Fundamentals*, E84-A, 2145 – 2155, **2001**.
- 34** - Non-mixing properties of long memory processes, *CRAS*, t. 322, Série I, 1-4, **2001** (with Ladoucette).
- 33** - Forecasting with k-Gegenbauer processes: theory and applications, *Journal of forecasting*, 20, 581 – 601, **2001** (with Ferrara).
- 32** - Prediction of chaotic time series in the presence of measurement error: the importance of initial conditions, *Statistics and Computing*, 11, 277 – 284, **2001** (with Tchernig).
- 31** - A new model : the k-factor GIGARCH process, *Journal of signal processing*, 4, 265 - 271, **2000**.
- 30** - Prediction in chaotic time series : Methods and comparisons with an application to financial intra day data, *The European Journal of finance*, **2000**. (with Mercier).
- 29** - Analyse d'intervention et Prévisions. Problématique et applications à des données de la RATP, *R.S.A.*, **1999**, (with Ferrara).
- 28** - « Statistical estimation of the Embedding Dimension of a dynamical system », *International Journal of Bifurcations and Chaos*, **1999**, (with Bosq et Léorat).

- 27** - « Some recent developments in nonlinear time series », Atti del Convegno in Honore di Oliviero Lessi, ed. Università degli Studi di Padova, 17 - 38, **1998**.
- 26** - « A review of techniques of estimation in long memory processes: application to intra-day data », Computational Statistics and Data Analysis, 61 - 81, **1997**, (with Bisaglia).
- 25** - « Prediction in chaotic time series: methods and comparisons using simulations », Proceedings ECASP-97, Prague, 215 -218, Mai **1997** (with Mercier).
- 24** - « Consistent estimation to determine the embedding dimension in financial data », The European Journal of Finance, 231 -242, **1997**, (with Léorat).
- 23** - « Determinating Lyapunov exponents in deterministic dynamical systems », Computational Statistics, 12, 93-107, **1997**, (with Delecroix et Léorat).
- 22** - « Nonparametric methods for time series and dynamical systems », Lectures Notes in Physics, Chapter 17, Springer Verlag, 303 - 320, **1997**.
- 21** - « Power of the Lagrange multiplier test for certain subdiagonal bilinear models ». Stat. and Prob. Letters, 29, 201 - 212, **1996** (with Wandji).
- 20** - « Puissance du Test du Multiplicateur de Lagrange pour Certains Modèles Bilineaires Sousdiagonaux d'Ordre Deux », CRAS, Série I, T. 322, 179 - 184, **1996**. (avec Wandji).
- 19** - « Etude de Séries Chronologiques Linéaires à Temps Discret: Comparaison de Logiciels », R.S.A. **1995**. (with Borgard).
- 18** - Réponse à Tong, in Scandinavian Journal of Statistics and Applications, 26-28. **1995**.
- 17** - « Nonparametric Estimation of the Chaotic Function and the Invariant Measure of a Dynamical System », Statistics and Probability letters, 25, 201 -212, **1995**, (with Bosq).
- 16** - « Probabilistic Properties of the Béta-ARCH Model », Statistica Sinica, 2, 157-174, **1994**, (with Diebolt).
- 15** - « Asymptotic Normality of the Discrete Fourier Transform of Long Memory Time Series », Statistics and Probability letters., 21, 299 - 309, **1994**. (with Pham).
- 14** - « Tail behaviour of the Stationary Density of General Nonlinear Autoregressive Process of Order One », Journal of Applied Prob., 30, 315-329. **1993**. (with Diebolt).
- 13** - « Power of Score Tests against Bilinear Time Series Analysis », Statistica Sinica, Vol. 2,1, 157-171, **1992**.
- 12** - « Le Modèle de Séries Chronologiques Autorégressives Béta-ARCH », C.R.A.S Série 1, 625-630. **1991**. (with Diebolt).
- 11** - « Processus Longue Mémoire. Propriétés Probabilistes et Statistiques », Publ. Inst. Stat. Univ. Paris, 36, fasc. 1.2, 5-41. **1991**.
- 10** - « Statistique Paramétrique des Processus à Longue Mémoire », Publ. Inst. Stat. Univ. Paris, 36, fasc. 1.2, 125-140. **1991**.
- 9** - « Detecting Nonlinearity », Statistiques et Analyse des Données. Vol. 15, 2, 1-17. **1990**.
- 8** - « A Note on the Estimation of the Parameters of the Diagonal Bilinear Models by the Least Squares Method », Scand. Journ. of Stat. Th. and Appl. 16. 129-136. **1989**. (with Pham).
- 7** - « Minimalité et Inversibilité des Modèles Bilineaires à Temps Discret », C.R.A.S Série 1, 448, **1987**, (with Pham).
- 6** - « Different Representations of Bilinear Models », J.T.S.A. 8. **1987**.
- 5** - « Représentation Markovienne des Modèles Bilineaires à Temps Discret », CRAS Série I. **1986**.
- 4** - « Une Condition d'Ergodicité pour des Modèles Bilineaires à Temps Discret », C.R.A.S. Série 1, 297. **1983**.
- 3** - « Cadre d'Etude pour des Modèles non Linéaires », C.R.A.S Série 1, 296. **1983**.
- 2** - « Etude d'un Modèle non Linéaire, le Modèle Superdiagonal d'Ordre 1 », C.R.A.S Série 1, 293. **1981**.

1 - « Tests d'Hypothèses Séparées pour des Processus Stochastiques ». C.R.A.S Série A, 289, **1979**.

Theses

1 - « Modèles Bilinéaires et Polynômiaux de Séries Chronologiques : Etude Probabiliste et Analyse Statistique », *Thèse d'état, Université de Grenoble I*, 1988.

2 - « Loi limite de Statistique de Test de Vraisemblance », *Thèse de 3ème cycle. Orsay*, 1977.

3 - « Notion de nombre et pratique numérique chez l'enfant hausa ». *Thèse de 3^{ème} cycle*. Paris EPHESS, 1981.

Colloquim acts

25 - Denoising with wavelets method in chaotic time series: application in climatology, energy and finance, in Noise and Fluctuations in econophysics and finance, ed. By D. Abbott, J.P. Bouchaud, X. gabaix, J.L. McCaulay, Proc. SPIE, vol 5848, 174-185, **2005** (avec Hoummiya).

24 - A k- factor GIGARCH process : estimation and application to electricity market spot prices, Proc of the 8th International Conference on Probabilistic methods applied to power systems, Iowa State University, 1- 7, September **2004**.

23 - Estimation de la tail dependance à l'aide de la notion de copule, Proc. XXXV ème Journées de Stat., Lyon, Tome I, 289 – 292, **2003**

22 - Forecasting with non Gaussian long memory processes, Proc. XXXV ème Journées de Stat., Lyon, Tome I, 285 – 288, **2003**.

21 - Une mesure de la persistance dans les indices boursiers, NER 95, Banque de France, Paris, 2002.

20 - What is the best approach to measure the interdependence between different markets, NER 94, Banque de France, Paris, **2002**.

19 - A measure of the Persistence in Stock Markets, 5th Conference of the Swiss Society for Financial Market Research, March **2002**, Basel.

18 - Propriétés du second ordre et mesures invariantes pour des séries temporelles chaotiques définies sur [0,1], GRETSI, Septembre **2001**, Toulouse.

17 - Processus longue mémoire et systèmes chaotiques, Actes des 33^{ème} Journées de Statistiques, 771 - 774, Mai **2001**, Nantes.

16 - Long memory and chaotic systems, in Proceedings of the International Symposium on Frontiers of time series modelling, inTokyo, ISM, February **2000**., p. 236 - 251.

15 - Nonlinear dynamics and estimation of the embedding dimension, ECC'99, Orlando, Proceedings of the Fifth experimental chaos conference in simulation, ed. M. Ding, W. Ditto, L.Pecora, M. Spano, World Scientific Publ. Co., 357, - 363., **1999**.

14 - Gegenbauer processes : estimation and forecasting, Bulletin of the International Stat. Inst., Tome LVIII, book 1, ISI 1999, Helsinki.

13 - Chaos and Statistics, Proceedings of the International symposium on nonlinear Theory and its applications, Crans Montana, Switzerland, 1, 219 - 222 , **1998**.

12 - Idea of the multi - attractors approach, dans les Proceedings of the Forecasting financial markets, ed. by Imperial College, London, **1998**.

11 - Study of the instability in economic data : the use of the ergodic principle, in Actes des XXX èmes journées de statistiques, Vol. II, 285., **1998**

10 - Long range dependance in financial intra-day data: is the exchange rate market really efficient?, dans les Proceedings of the Forecasting financial markets, ed. by Imperial College, London, **1997**.

- 9 - «Rising and falling predictions in financial intra day data », dans les Proceedings of the Forecasting financial markets, ed. by Imperial College, London, **1996**.
- 8 - « How Can Noise Be Brought out in Dynamical Chaos », dans les Proceedings of the Workshop: “ Methods of Non Equilibrium Processes and Thermodynamics in Economics and Environment sciences ”, Matrafured (Hongrie), Sept. **1995**.
- 7 - « Invariance in Stochastic and Deterministic System », dans les Proceedings of the 50th ISI Session, Beijing, Tome LVI, Book 1, 357-373. **1995**.
- 6 - « Robust Estimation in Discrete Time Chaotic Systems », dans IEEE Signal Processing, ATHOS Workshop on Higher Order Statistics, Barcelone, 376-380. **1995**.
- 5 - « Consistent Estimation to Detect Chaos in Financial Data », dans les Proceedings of the Forecasting financial markets, ed. by Imperial College, London, **1995**.
- 4 - « Nonparametric Estimation in Chaotic Deterministic System », dans les Proceedings of the International Conference on Dynamical Systems and Chaos, Tokyo, Advanced Series in Dynamical Systems, Scientific World. **1994**.
- 3 - « On the Identification and Prediction of Nonlinear Models », dans les "Proceedings on Time Series Analysis" édité par E. Parzen, I.M.A.. **1992**.
- 2 - « Tests de Modèles non Linéaires », dans les Proceedings of the 3rd Franco Belgium Meeting of Statisticians, nov. 1982, Publication de l'Université Libre de Bruxelles, Belgique, **1984**.
- 1 - « Tests of Adequacy for ARMA Models and Tests of Separated Hypothesis », Stochastic Systems, Springer Verlag, 18. **1981**.

Non published Working papers and submitted papers

- 73 – C. Chorro, D. Guégan, F. Ielpo “Option pricing under GARCH models with generalized hyperbolic innovations (II): Data and Results”, WP-2008, Publications du CES Paris 1 Panthéon-Sorbonne.
- 72 – C. Chorro, D. Guégan, F. Ielpo “Option pricing under GARCH models with generalized hyperbolic innovations (I): Methodology”, WP-2008.35, Publications du CES Paris 1 Panthéon-Sorbonne.
- 71 - [Abdou Kâ Diongue](#), [Dominique Guegan](#) et [Rodney C. Wolff](#), "Exact Maximum Likelihood estimation for the BL-GARCH model under elliptical distributed innovations". WP-2008.27, Publications du CES Paris 1 Panthéon-Sorbonne, soumis to Biometrika..
- 70 - [Dominique Guegan](#), "Non-stationarity and meta-distribution". WP-2008.26, Publications du CES Paris 1 Panthéon-Sorbonne. Chapter of book.
- 69 - [Dominique Guegan](#) et [Justin Leroux](#), "Forecasting chaotic systems : the role of local Lyapunov exponents". WP-2008.14, Publications du CES Paris 1 Panthéon-Sorbonne. Soumis to Chaos, Solitrons and Fractals.
- 68 - [Abdou Kâ Diongue](#) et [Dominique Guegan](#), "The k -factor Gegenbauer asymmetric Power GARCH approach for modelling electricity spot price dynamics". WP-2008.13, Publications du CES Paris 1 Panthéon-Sorbonne. Soumis to CSDA.
- 67 - [Laurent Ferrara](#), [Dominique Guegan](#) et [Zhiping Lu](#), "Testing fractional order of long memory processes : A Monte Carlo study" . WP-2008.12, Publications du CES Paris 1 Panthéon-Sorbonne.
- 66- [Dominique Guegan](#), "Effect of noise filtering on predictions : on the routes of chaos" WP-2008.08, Publications du CES Paris 1 Panthéon-Sorbonne. Soumis to CSDA.
- 65- [Dominique Guegan](#) et [Mathieu Gatamel](#), Centre d'Economie de la Sorbonne, Equipe CERMSEM "Towards an understanding approach of the insurance linked securities market" WP-2008.06, Publications du CES Paris 1 Panthéon-Sorbonne, soumis to Insurance: Mathematics and economics, .

- 64** - Abdou Kâ Diongue et Dominique Guegan, Centre d'Economie de la Sorbonne, Equipe CERMSEM "Estimation of k -factor GIGARCH process : a Monte Carlo study" , WP-2008.04, Publications du CES Paris 1 Panthéon-Sorbonne, soumis à CSDA.
- 63** – D. Guégan, F. Ielpo, “Further evidence on the impact of economic news on interest rates, WP-2007.62, Publications du CES Paris 1 Panthéon-Sorbonne, soumis to *Frontiers in economics and Finance*.
- 62** – D. Guégan, L. Charffedine, “Which is the best model for the US inflation rate: A structural change model or a long memory process?,” **2007**, WP-2007.61, Publications du CES Paris 1 Panthéon-Sorbonne.
- 61** – D. Guégan et L.Zhiping « Self-Similarity in continuous and discrete long memory processes », **2007**, WP-2007.55, Publications du CES Paris 1 Panthéon-Sorbonne.
- 60** – D. Guégan et J. Zhang « Pricing bivariate option under GARCH-GH model with dynamic copula, **2007**, WP-2007.57, Publications du CES Paris 1 Panthéon-Sorbonne, En revision to QF.
- 59** – D. Guégan « Global and local stationary modelling in finance : theory and empirical evidence », **2007**, Soumis à *Econometrics Review*
- 58** – S. De Kort, D. Guégan, J. Houdain « Synthetic CDO squares pricing methodologies », WP **2006** – 08, CES – Cachan.
- 57** – L. Charffedine et D. Guégan “Is it possible to discriminate between structural break models and long memory processes? An empirical approach, WP **2006** – 07, CES – Cachan, soumis à J.S.P.I..
- 56** – D. Guégan et J. Zhang “Change analysis of dynamic copula for measuring dependence in multivariate financial data”, WP **2006** – 06, CES – Cachan, soumis à J.S.P.I..
- 55** – L. Ferrara, D. Guégan, O. MBIakou « Price and volume : which one is the best to predict financial crisis? The case of some Asian and Latin America markets, WP **2006** – 05, CES – Cachan, soumis à la *Revue d’Economie Internationale*..
- 54** – D. Guégan et F. Ielpo “Was Alan Blinder true? An econometric specification of the monetary policy’s dark art”, WP **2006** – 01, CES – Cachan, soumis to *Modelling Economics*..
- 53** – L. Charffedine et D. Guégan Can supLR test discriminate between different switching regression models: application to the US GNP and the US/UK exchange rates, NOTE MORA 09 – 2005, décembre **2005**, Cachan, France, soumis à la revue *Empirical economics*.
- 52** – D. Guégan et N. Huck Forecasting rises and drops or forecasting relative movements?, NOTE MORA 08-2005, septembre **2005**, Cachan, France.
- 51** - D. Guégan – S. Rioublanc - Regime switching models: real or spurious long memory, Note de recherché MORA – IDHE – n° 02-2005, Février **2005**, Cachan, France.
- 50** - Dominique Guégan et Sophie Ladoucette « Dependence modelling of the joint extremes in a portfolio using Archimedean copulas: application to MSCI indices » - Note de Recherche IDHE-MORA , 05-2004, Juin **2004**.
- 49** - N. Huck et D. Guégan If transitivity was useful to forecast?, NR IDHE- MORA, ENS-Cachan, 02-**2004**, France.
- 48**-. Collet et D. Guégan Another characterization of long memory behavior, NR IDHE-MORA, ENS-Cachan, 01-**2004**, France, **soumis au CRAS**.
- 46**- Huck et D. Guégan Predictability of foreign exchange rates: on the chaos’ routes, NR IDHE- MORA, ENS-Cachan, 15-**2003**, France
- 45**-. K. Diongue et D. Guégan Processus GIGARCH à k -facteurs: estimation et application aux prix spot de l’électricité, NR IDHE- MORA, ENS-Cachan, 14-**2003**, France.
- 44**. Guégan et S. Rioublanc Study of regime switching models. Do they provide long memory behavior? An empirical approach, NR IDHE- MORA, ENS-Cachan, 13-**2003**, France.

- 43** – A SETAR model with long memory dynamics, NR IDHE- MORA, ENS-Cachan, 11-2003, France, **2003**.
- 42** – Deconvolution of the chaotic maps defined on $[0,1]$ polluted by measurement noise, using wavelets, NR IDHE- MORA, ENS-Cachan, 10-2003, France, **2003**.
- 41** – How shall we determine the number and the location of the gegenbauer frequencies? An empirical approach, NR IDHE- MORA, ENS-Cachan, 09-2003, France, **2003**.
- 40** – Non Gaussian long memory processes : construction and forecasting, NR IDHE- MORA, ENS-Cachan, 08-2003, France, **2003**.
- 39** – Business and Financial cycles: How to measure them and to measure their interdependence, NR IDHE- MORA, ENS-Cachan, 07-2003, France, **2003**.
- 38** – Point de vue personnel sur le problème de la contagion en économie et son interaction avec la sphère financière, NR IDHE- MORA, ENS-Cachan, 06-2003, France, **2003**.
- 37** - Extremal behavior of particular non linear processes, Note de Recherche GRID, ENS - Cachan, NR 02-01, **2002**.
- 36** - Applications des processus de longue mémoire à l'analyse des indices boursiers, Note de Recherche GRID, ENS – Cachan, NR 01-12, **2001**.
- 35** - Invariant measures and second order properties for maps on $[0,1]$, Preprint Université de Reims, 01-07. 1-36, **2000**.
- 34** - On nonparametric recursive estimators of invariant densities of chaotic maps, Preprint Université de Reims, 01-05. 1-30 , **2000**.
- 33** - Chaotic behavior in macroeconomic model, Preprint Université de Reims, 01-06. 1-28, **2000**.
- 32** - Extreme values of conditional distributions of GARCH(1,1) processes, Prépublication Université de Reims, 00.08, **2000**.
- 31** - Stochasticity and deterministic chaotic systems, Prépublication Université de Reims, n° 00.04, **2000**.
- 30** - Comment modéliser la persistance : modèles de type ARCH, modèles de volatilité ou longue mémoire ? Note interne ABF Capital Management, **1999**.
- 29** - Note on long memory processes with cyclical behavior and Heteroscedasticity, Prépublication Université de Reims, n° 99.08, **1999**.
- 28** - Estimation et Applications of Gegenbauer Processes, Preprint INSEE n° 9927, **1999**.
- 27** - Study of Alcatel and France Telecom stocks regarding nonlinearity, Preprint Caisse des dépôts, **1999**.
- 26** - Un nouveau point de vue sur le principe ergodique par rapport à la stabilité statistique : le rôle de la mesure SBR, Preprint université Paris XIII, 99-04, **1999**.
- 25** - Modelization and Nonparametric estimation for a dynamical system with noise, Preprint INSEE n° 9857, **1998**.
- 24** - The multiplicative threshold model : an alternative to detect breaks and hidden cycles on real data, Preprint INSEE n°9839, **1998**.
- 23** - Predictive dimension : an alternative definition of the embedding dimension, Preprint, **1997**, n°9749.
- 22** - « Some remarks on the prediction in dynamical systems », Preprint, **1997**.
- 21** - « What is the good way to identify chaos? An empirical approach. », Technical report INSEE, n° 9619, **1996**
- 20** - « A nonparametric point of view: stochastic versus deterministic », Technical report INSEE, n°9620, **1996**.
- 19** - « On Estimation on ARCH Models », Preprint Texas A&M University, U.S.A, **1996**.
- 18** - « On the Estimation of the Simultaneous Switching Autoregressive Models », Prepublication 95-10, CNRS U.A. 742. Université paris XIII, **1995**.
- 17** - « Stochastic Versus Deterministic Systems », Preprint CREST n ° 9438. **1994**.

- 16** - « Minimum Hellinger Distance Estimates for General Bilinear Time Series Models », Preprint CREST n° 9401. **1994.**
- 15** - « An Index of non Linearity », Prépublication Univ. de Padoue. **1993.**
- 14** - « Un Test non Paramétrique pour un Modèle Bilineaire Diagonal d'Ordre 1 », Preprint, **1993.**
- 13** - « Notion de Chaos. Approche Dynamique et Problèmes d'Identification », Rapport de recherche n°1623 INRIA. **1992.**
- 12** - « A continuous time ARCH model », Prépublication Paris Nord, 92-1. 1992. Test for Contiguous Hypothesis", Prépublication Paris Nord, 92-2. **1992.**
- 11** - « Heart Rate Variability in Sleeping Neonates », Rapport de recherche INRIA, n°1472. **1991.**
- 10** - « Les modèles ARCH », Publication Paris Nord, 90, 2. **1990.**
- 9** - « Probabilistic Properties of the General Nonlinear Markovian Process of Order One and Applications to Time Series Modelling », Technical report n°125, L.S.T.A. Paris VI. **1990.**
- 8** - « Statistique des Modèles non Linéaires ».I, Classification des Modèles, Publication Paris Nord, 89, 15. **1989.**
- 7** - « Propriété de Mélange. Quelques Résultats dans le Cas Indépendant et Markovien. Application aux Modèles Bilineaires », Prépublication U.P.N., n°53. **1984.**
- 6** - « Processus ARMA Multidimensionnels », Prépublication U.P.N., n°29. **1981.**
- 5** - « Comparaisons de Tests d'Hypothèses pour des Processus Gaussiens », Annales de Clermont-Ferrand. **1980.**
- 4** - « Utilisation des Séries chronologiques dans un Problème de Météorologie », Extension au cas non linéaire. Prépublication U.P.N. **1980.**
- 3** - « Tests d'Adéquation pour des Processus Stochastiques », Publication U.P.N. n°10, Villetaneuse. **1979.**
- 2** - « Pratiques Pédagogiques », Publication IREM Paris Nord. **1979.**
- 1** - « A Propos de Nombre et de Numération à l'Ecole Primaire », Publication IREM Paris Nord, **1978.**

Invited Conferences

2008

- Conference inside the department of Economics at the “Séminaire Marcel-Dagenais d'économétrie et de macroéconomie », Montreal University, **Montreal, Canada.**
- Poster session at the Fifth World Congress of the Bachelier Society, **London, UK.**
- Conference at the “14th International Conference on Computing in Economics and Finance”, **Paris, France.**
- Conferences at the IIF, 28th International Symposium on Forecasting, **Nice, France**
- Conference inside the Finance Group of the Business School of **Warwick, Great Britain.**
- Conference inside the department of mathematics of ECNU University, **Shanghai, China.**
- Conference inside the department of Statistics, **Padova, Italy.**
- Conference inside the Department of mathematics in Christchurch University, **Christchurch, New Zealand.**
- Conference inside the University of Technoogy of Sydney (School of finance), **Sydney, Australia.**
- Conference inside the department of Mathematics of Monash University, **Melbourne, Australia.**
- Conference inside the department of mathematics, in the University of **Adelaide, Australia.**
- Conference inside the Department of Mathematics in QUT, **Brisbane, Australie.**

- Conference at the 2nd Cofin 2006-13-1140 workshop on Volatility, Spillover and Contagion at Ca Foscari **University, Venice, Italie.**
- Conference in "Platinum Jubilee Celebration", in The Indian Statistical Institute, **Kolkata, India**
- Conference in ICRIER (Indian Center of International Economics Research), **New Delhi, India**
- Conference in ISI (Indian Statistical Institute) in **New Delhi, India.**
- Conference in IFMR (Institute For Financial Management and Research) in **Chennai (India).**

2007

- Conference in EC2 Conference, **Faro, Portugal**
- Conference at the workshop on complex systems, QUT - **Brisbane, Australia.**
- Conference at the workshop on Copulas at **Warwick Business School, GB**
- Seminar at **Macquarie University in Sydney, Australia**
- Conference at **Queensland university of Technology, Business School, Brisbane, Australia.**
- Conference inside the department of mathematics at the **University of Singapur.**
- Conference at the 15th Annual Symposium of the Society for nonlinear dynamics and econometric (SNDE), **Paris.**
- Conference at the Second italian Congress of Econometrics and Empirical economics, **Univ Bologna, Italy.**

2006

- Conference at **Ca Foscari University in Venezia , Italie**
- Conference at **HEC Montreal, Canada.**
- Conference at **the congress « Chaos 06 », Reims, France.**
- Conference at the **congress “ Forecasting Financial Markets”, Aix en Provence, France.**
- Seminar in the Département of mathematics at **ECNU, Shanghai, Chine.**
- Seminar in **Ca’ Foscari University, Venezia, Italie.**
- Conference at **Infostat of the SFdS– Institut Henri Poincaré – Paris.**
- Seminar at **CREST, Paris.**

2005

- Conference at the Econometrics congress **in Vitoria, Brésil**
- Conference at “ Noise and Fluctuations in Econophysics and Finance” SPIE Symposium, in **Austin, USA.**
- Conference at **ISI Conférence in Sydney, Australie.**
- Seminar at **University Macquarie of Sydney, Australie**
- Conference at **SNDE 2005 in Londres, GB.**

2004

- Seminar at **Ca’ Foscari University, Venezia, Italie.**
- Conference at **ISW04 Sydney, Australie**
- Conference at the **Conference on Forecasting, Melbourne, Australie**
- Conference at the Workshop on dynamical systems, **Brisbane, Australie.**
- Seminar at Eurandom, **Eindhoven, Pays Bas.**
- Conference at « **International Symposium on Forecasting », Sydney, Australie ;**
- Conference at **QUT (Queensland University of Technology), Brisbane, Australie.**
- Conference at **GREQAM, Marseille. France.**

2003

- Conference at the **congress on « Dependence modelling for credit risk portfolio », Venezia, Italy .**
- Conference at the 4th Colloquium on modern tools for business cycle analysis organized by **Eurostat à Luxembourg, Luxembourg**
- Seminar at **University Ca' Foscari in Venezia, Italy.**
- Conference at **XXXV ème Journées de Statistique Françaises, Lyon, France.**
- Conference at Centre de Recherche de la **Banque de France, Paris, France.**
- Conference at **FFM03 Congress** Financial Forecasting Markets, **Paris, France.**
- Conference at **ESCP, Paris.**
- Conference at **Birkbeck College, Londres, GB.**
- Conference at the department of Statistics of the **Oxford University, GB.**
- Conference at ISINI (International Society for intercommunication of new ideas) , **Lille, France.**

2002

- Conference at **ESAM02, Brisbane, Australie.**
- Seminar at **GREQAM, Marseille, France.**
- Conference at **SESAME 2002, Aix les Baumes, France.**
- Conference at the **European Investment Review, Londres, G.B.**
- Conference at the International Conference Financial Markets **Londres, GB.**
- Seminar at **CRECH – Banque de France, Paris**
- Conference at the XXXIVèmes Journées de Statistique (SFDS), **Bruxelles, Belgique**
- Conference at the mathematics department of **University Gaston Berger in Saint Louis, Sénégal.**
- Seminar at **University Ca'Foscari in Venezia, Italie.**
- Conference at the the Swiss society for financial market research, **Basel, Suisse.**
- Conference at the Workshop on Statistical Modelling and Inference for Complex Data Structures, **Louvain-La-Neuve, Belgique.**
- Seminar at **GREQAM, Marseille.**

2001

- Conference at **CLAPEM, La Havane, Cuba.**
- Conference at summer school **CEA/EDF/INRIA au Bréaux, France.**
- Conference at the Intern. Conf. on Financial Markets”, (Imperial College) **Londres (G.B.)**
- Conference at **University Ca'Foscari in Venezia, Italy**
- Conference at the Statistical Institute of **Louvain la Neuve (Belgique)**
- Conference at the Centre of **Géophysics of Turin, Italie**
- Bachelier Conference , **IHP, Paris .**
- Seminar at **Ecole Polytechnique in Palaiseau. France**

2000

- Conference at the Mathematical days of Sénégal , **Dakar(Sénégal)**
- Conference at **BCEAO, Dakar , Sénégal..**
- Conference at **COMPSTAT, Utrecht, Pays Bas,**
- Conference at the « Risk Managment » congress in **Pittsburg, USA,**

- Conference at the Intern. Conf. on Financial Markets (Imperial College) **Londres (G.B.)**
- Conference at **U.L.B à Bruxelles (Belgique)**.
- Conference at The International Symposium on Frontiers of Time series Modelling, **ISM Tokyo (Japon)**
- Conference at the Colloquium in Mathématiques, **University Paris Dauphine, France.**

1999

- Conference at University **Saint Louis (Sénégal)**
- Conference at **University of Caen, France**
- Conference at the **société des mathématiciens japonais à Osaka (Japon)**
- Conference at **HSSS 99, Pavia, Italy**
- Conference at ISI 1999, **Helsinki, Finlande.**
- Conference at the Australian statistical Society, **Brisbane.**
- Conference at the Intern. Conf. on Financial Markets (Chemical bank) **Londres (G.B.)**
- Conference at the Colloquium of Mathématiques of **University Paris Dauphine :**
- Conference *at* **IHP - Paris.**

1998

- Conference at University of **Saint Louis (Sénégal)**
- Conference at Uni,versity of **Dakar (Sénégal)**
- Conference at the « International Workshop on Nonlinear dynamics and Statistics », in **Cambridge : The Isaac Newton Institute (Grande Bretagne) :**
- Conference at the « 1998 International Symposium on nonlinear Theory and its applications », in **Crans Montana, (Suisse) :**
- Conference at the « 1998 International Symposium of Statistics », in **Fukuoka (Japon)**
- Conference at the School on non linear signal, **Grenoble (France)**
- Conference at the international congress **ASC 14 in Gold Coast (Australie)**
- Conference at **GREQAM in Marseille, France.**
- Conference at the Intern. Conf. on Financial Markets (Chemical bank) **Londres (G.B.)**
- Conference at the XXX congress of **ASU à Rennes.**
- Conference at University of **Orléans, France.**
- Conference at University of **Venezia (Italie).**
- Conference at the research centre of **Ecole des Mines (Fontainebleau).**

1997

- Conference at the congress « Recent developments in Probability and Statistics, **Calcutta, (Inde).**
- Conference at **Budapest University, Hongrie,**
- Conference at IMS Pacific and Asian Regional Meeting, **Taipei (Taiwan)**
- Conference at the Intern. Conf. on Markets (Chemical bank) **Londres (G.B.)**
- Conference at University **Carlos III de Madrid (Espagne).**
- Conference at **University Libre de Bruxelles (Belgique).**
- Conference at **LMC in Grenoble, France.**

1996

- Conference at **University of Venezia (Italy).**
- Conference at **CORE, Louvain la Neuve (Belgique).**
- Conference at **NBER/NSF seminar on time series, Rotterdam (Hollande)**
- Conference at an International Conference in **Tata (Hongrie)**
- Conference at the **4th World Bernouilli Congress in Vienna (Autriche)**

- Conference at **Université de Brisbane (Australie)**
- Conference at University of **Canberra(Australie)**
- Conference at the cross disciplinary conference in astrophysics, » **Penn State, (U.S.A.)**
- Conference at Humboldt University,**Berlin (Allemagne)**
- Conference at the Intern. Conf. on Markets (Chemical bank) **Londres (G.B.)**
- Conference at the Commemorative congress for O. Lessi, **Padoue (Italie).**

1995

- Conference at University **ParisXIII.**
- Conference at the XVI èmes Journées Franco-Belges, **Bruxelles (Belgique).**
- Conference at **Matrafured University (Hongrie)**
- Conference at the **50 th ISI Conference, Beijing (Chine)**
- Conference at University of **Padoue (Italie)**
- Conference at the Switzerand Statistician Conference, **Lausanne (Suisse)**
- Conference at the Intern. Conf. on Markets (Chemical bank) **Londres (G.B.)**

1994

- Conference at **Texas a&m Univ. (U.S.A.)**
- Conference at **ESSEC Cergy-pontoise.**
- Conference at the University **Aix-Marseille.**
- Conference at **E.N.S. Lyon**
- Conference at **ICOTS, Marrakech, Maroc.**
- Conference at **ISI, Chapel Hill, U.S.A.**
- Conference at the International Conference on dynamical Systems and Chaos, **Tokyo, Japon;**

1993

- Conference at **ORSTOM Montpellier**
- Conference at NBER/NSF Time Series Seminar, **Vienne (Autriche).**
- Conference at the Intern. Conf. on Time Series Analysis, **Padoue (Italie),**
- Conference at the GDR CNRS sur les moments d'ordre supérieurs, **Paris**

1992

- Conference at the University **Heidelberg, Allemagne.**
- Conference at **A.S.U., Bruxelles, Belgique.**
- Conference at the Workshop on Time Series in **Heidelberg, (Allemagne).**

1991

- Conference at the Joint Summer Research Conferences in Mathematical Sciences, **Seattle (U.S.A.).**

1990

- Conference at thr Workshop on Modern Directions in Time Series Analysis? **Minneapolis (U.S.A.).**

1989

- Conference at the Research Workshop on non linear time series models., **Edinburg, (England).**
- Conference at **I.S.I. Paris.**

- Conference at NSF/NBER Time Series Seminar (University of California), **Madrid (Espagne)**.

1988

- Conference at **A.S.U. Grenoble**.
- Conference at University in **Berlin Est**.

1987

- Conference at **Tempere Conference** in Statistics.
- Conference at thr Institute of Applied Systems. **Laxembourg.(Autriche)**.

1986

- Conference at Unversity of **Grenoble**.

1985

- Conference at University, **Paris I**
- Conference at University **paris 11**

1984

- Conference at Ecole des **Mines, Fontainebleau**.
- Conference at International Congress of Statistics, **Marburg**.
- Conference at **A.S.U. Montpellier**.

1982

- Conference at the 9ème Conference on **les Processus Stochastiques et leurs Applications, Clermont Ferrand**.
- Conference at thr 3rd Franco-Belgium Meeting of Statisticians, **Rouen**.

1981

- Conference at **Ecole Normale Supérieure** , Paris

1980

- Conference at **A.S.U. Paris**.
- Conference at the Colloque du N.A.T.O. on "Stochastic Systems", **Les Arcs**

1979

- Conference at the Summer School of **St. Flour**.

1978

- Conference at **Ecole Normale Supérieure** , Paris