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Economic Research Department

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Education

“Agregação” in Econometrics, Faculdade de Economia, Universidade do Algarve, 2005

Ph.D. in Econometrics, School of Economic Studies, University of Manchester, UK 1995-1998

M.A. in Economics and Econometrics (*Distinction*), School of Economic Studies, University of Manchester, UK, 1994-1995

Licenciatura in Business Management (*Distinction*), Universidade do Algarve 1988-1993

Employment

Banco de Portugal, Since 2008

Researcher, Economic Research Department

Universidade Nova de Lisboa, Since 2008

Invited Associate Professor “com Agregação”, Faculdade de Economia

Universidade do Algarve, 2005-2008

Associate Professor “com Agregação”, Faculdade de Economia

Universidade do Algarve, 2002-2005

Associate Professor, Faculdade de Economia

Universidade do Algarve, 1999-2002

Assistant Professor, Faculdade de Economia

Universidade do Algarve, 1996-1999

Assistant, Unidade de Ciências Económicas e Empresariais

Universidade do Algarve, 1993-1996

Junior Assistant, Unidade de Ciências Económicas e Empresariais

Research Interests

Time Series Econometrics, Financial Econometrics, Economic Growth and Business Cycles.

Awards and Honors

Jon Stewart price in Econometrics, *School of Economic Studies*, University of Manchester (1995).

Award for Journal Article Excellence, “Dating and synchronizing tourism growth cycles” *Tourism Economics* (2006)

Refereed Publications

Luetkepohl, H.L. and P.M.M. Rodrigues. (2008) Unit Root and Cointegration Testing: Guest Editors’ Introduction, *Econometric Theory*, 24 (1), 1-6.

Hassler U., Rodrigues P.M.M. and Rubia A. (2008) A Test for Seasonal Fractional Integration, Proceedings of the XVIII International Conference on Computational Statistics, Springer Verlag (eds).

Andraz, J.M.L. and P.M.M. Rodrigues (2008) Events that Marked Tourism in Portugal, *Applied Economic Letters*, forthcoming.

Gouveia, P., D.R. Osborn and Rodrigues, P.M.M. (2008) Comparing Forecasts of Industrial Production. *Chapter of Book edited by EUROSTAT*, forthcoming.

Rodrigues, P.M.M. and Rubia, A. (2008) A Note on Testing for Nonstationarity in Autoregressive Processes with Level Dependent Conditional Heteroskedasticity. *Statistical Papers* 49, 581-593.

J.L.M. Andraz, P.M.D.C.B. Gouveia and P.M.M. Rodrigues (2008) Modelling and Forecasting Tourism Growth Cycle, *Tourism Economics*, forthcoming.

Rodrigues, P.M.M. and Rubia, A. (2007) Testing for causality in variance under nonstationarity in variance. *Economics Letters* 97, 133-137.

Rodrigues, P.M.M. and A.M.R. Taylor (2007) Efficient Seasonal Unit Root Tests. *Journal of Econometrics* 141, 548 -573.

A.C.M. Daniel and P.M.M. Rodrigues (2007) Modelling and Forecasting Tourism Demand in Portugal: Past, Present and Future, *Revista Turismo e Desenvolvimento* 7, 173-182.

P. Gouveia and P.M.M. Rodrigues (2007) Desempenho de Testes de Raízes Unitárias em Modelos SETAR com Enviesamento do Parâmetro de Desfasamento. Em Ferrão, M.E., C. Nunes e C.A. Braumann (eds) *Estatística Ciência Interdisciplinar - Actas do XIV Congresso Anual da Sociedade Portuguesa de Estatística*, Edições SPE.

Ghysels, E., Osborn, D.R. and Rodrigues, P.M.M., (2006) Forecasting Seasonal Time Series, *Handbook of Economic Forecasting*, Chapter 13, Ed. G. Elliott, C.W.J. Granger e A. Timmermann, Elsevier B.V.

Rodrigues, P.M.M. (2006) Properties of recursive trend-adjusted unit root tests. *Economics Letters* 91, 413-419.

Russo, S., Rodrigues, P.M.M. and M.E. Camargo (2006) Aplicação de Séries Temporais na Serie Teor de Humidade da Area de Fundição da Industria FUNDIMISA. *Gestão Industrial* Vol.2, nº 1, 36-46.

Rodrigues, P.M.M. and Rubia, A. (2005) The performance of unit root tests under level-dependent heteroskedasticity. *Economics Letters* 89, 262-268.

Rodrigues, P.M.M. and Franses, P.H. (2005) A sequential approach to testing seasonal unit roots in high frequency data. *Journal of Applied Statistics*, Vol.32, 555-569.

Rodrigues, P.M.M. and P. Gouveia (2005) Dating and synchronizing tourism growth cycles. *Tourism Economics* 11, 501-516.

Barreira, A.P. and P.M.M. Rodrigues (2005) Unit root Tests for Panel Data - a Survey and an Application, in *Estudos II*, Ed. Faculdade de Economia, Universidade do Algarve, 665-685.

Gouveia, P.M.B. and Rodrigues, P.M.M. (2005) Propriedades Empiricas de Séries do Turismo, in *Estudos II*, Ed. Faculdade de Economia, Universidade do Algarve, 771-782.

Rodrigues, P.M.M. and A.M.R. Taylor, (2004) Asymptotic distributions for regression-based seasonal unit root test statistics in a near-integrated model. *Econometric Theory* 20, 645-670.

Rodrigues, P.M.M. and A.M.R. Taylor (2004) Alternative Estimators and Unit Root Tests for Seasonal Autoregressive Processes. *Journal of Econometrics* 120, 35-73.

Rodrigues, P.M.M. and A.M.R. Taylor (2004) Starting Value Effects on Tests for Double Differencing. *Econometric Theory* 20, 95-115.

Hassler, U. and P.M.M. Rodrigues (2004) Seasonal Unit Root Tests under Structural Breaks. *Journal of Time Series Analysis* 25, 33-53.

Gouveia, P. and P.M.M. Rodrigues (2004) Threshold Cointegration and the PPP Hypothesis. *Journal of Applied Statistics* 31, 115-127.

Rodrigues, P.M.M. and A. Tremayne (2004) F versus t tests for unit roots: A Comment. *Economics Bulletin* 3, No.12, 1-7.

Rodrigues, P.M.M. and P. Gouveia, (2004) Testes de raízes unitárias em modelos M-TAR na presença de quebras estruturais sob a hipótese nula. Em Rodrigues, Rebelo and Rosado (eds) *Estatística com Acaso e Necessidade* - Actas do XI Congresso Anual da Sociedade Portuguesa de Estatística, Edições SPE.

Rodrigues, P.M.M. and P. Gouveia (2004) An Application of PAR Models for Tourism Forecasting. *Tourism Economics* 10, 281-303.

Rodrigues, P.M.M. and P.M.B. Gouveia (2004) Combinação de previsões com modelos Autorregressivos lineares e não lineares - Aplicações a séries do Turismo. in *Estudos I*, Ed. Faculdade de Economia, Universidade do Algarve, 643-662.

Gouveia, P.M.D.C., E.L. Rebelo and P.M.M. Rodrigues (2003), Assimetria no Mecanismo de Taxas de Câmbio do SME, Em Brito, Figueiredo, Sousa, Teles and Rosado (eds.) *Literacia e Estatística* - Actas do X Congresso Anual da Sociedade Portuguesa de Estatística, Edições SPE, 325-336.

Rodrigues, P.M.M. (2002) On LM Tests for Seasonal Unit Roots. *The Econometrics Journal* 5, 76-195.

Rodrigues, P.M.M. (2002) Seasonal Random Walks with Drift: Properties of Least Squares Estimators. *Portuguese Economic Journal* 1, 27-46.

Rodrigues, P.M.M. and P.M.D.C. Gouveia (2002) Avaliação de Testes de Raízes Unitárias em Modelos SETAR. Actas do IV Encontro de Economistas de Língua Portuguesa.

Gouveia, P. and P.M.M. Rodrigues (2002) Cointegração em Modelos SETAR: Uma aplicação à Teoria da Paridade dos Poderes de Compra. Em Carvalho, Brilhante and Rosado (eds) *Novos Rumos em Estatística* - Actas do IX Congresso Anual da Sociedade Portuguesa de Estatística, Edições SPE.

Rodrigues, P.M.M. (2001) Near Seasonal Integration. *Econometric Theory* 17, 70-86.

Osborn, D.R. and P.M.M. Rodrigues (2001) The Asymptotic Distributions of Seasonal Unit Root Tests: A Unifying Approach. *Econometric Reviews* 21, 221-241.

Ghysels, E., D.R. Osborn and P.M.M. Rodrigues (2000) Seasonal Nonstationarity and Near-nonstationarity. In *A Companion to Theoretical Econometrics*, Ed. Badi Baltagi, Blackwells. (CIRANO Working Paper 99s-05 - <http://ftp.cirano.umontreal.ca/pub/publications/99s-05.pdf.zip>).

Rodrigues, P.M.M. and D.R. Osborn (1999) The Performance of Seasonal Unit Root Tests for Monthly Data. *Journal of Applied Statistics*, Vol. 26, No. 8, 985-1004.

Rodrigues, P.M.M. (1999) A Note on the Application of the DF Test to Seasonal Data. *Statistics and Probability Letters* 47, 171-175.

Rodrigues, P.M.M. (1999) Contrast of the Asymptotic Properties of Least Squares Estimates in Symmetric Seasonal Processes. Solution 98.5.3, *Econometric Theory* 15 No. 5, 783-786.

Rodrigues, P.M.M. (1998) Contrast of the Asymptotic Properties of Least Squares Estimates in Symmetric Seasonal Processes. Problem 98.5.3, *Econometric Theory* 14 No. 5, 687.

Rodrigues, P.M.M. (1997) Book Review: Modern Regression Methods by T.R. Ryan, *The Statistician*, The Royal Statistical Society.

Other Publications

Ferreira, F.A., Santos, S.P. and P.M.M. Rodrigues (2008), "M-S4BE - Multicriteria Software for Bank Branch Evaluation". *InforBanca*, 78 (Out.-Dez): 22-25.

Rodrigues, P.M.M. , J.M.L. Andraz, and S.A. Rodrigues (2006) Convergir para um Novo Paradigma de Ensino, *Cadernos de Economia*, Ago/Set.

Andraz, J.M.L. and P.M.M. Rodrigues (2005) Complementaridade de Funções, *Cadernos de Economia*, Abr/Jun, 84-88.

Rodrigues, P.M.M. and A. Tremayne (2000) On the Adequacy of Symmetric Asymptotic Confidence Intervals for the Largest Autoregressive Root. Newcastle *Discussion Papers in Economics*, No. 2000-15, Department of Economics, University of Newcastle.

Rodrigues, P.M.M. and D.R. Osborn (1999) Asymptotic Confidence Intervals and Seasonal Unit Root Statistics. University of Manchester, School of Economic Studies, *Discussion Paper Series*, No. 9916.

Working papers and Work in Progress

Hassler, U., Rodrigues, P.M.M. and A. Rubia (2008) Testing for the General Fractional Unit Root Hypothesis in the Time Domain. *Mimeo*. Faculdade de Economia, Universidade do Algarve (submitted for publication).

Rodrigues, P.M.M. and A. Rubia (2008) On the Finite-Sample Biases in Nonparametric Testing for Variance Constancy. *Mimeo*. Faculdade de Economia, Universidade do Algarve (submitted for publication).

Andraz, J.M.L. and P.M.M. Rodrigues (2008) What Causes Short and Long-run Economic Growth in Portugal: Exports or Inward FDI?, *Mimeo*. Faculdade de Economia, Universidade do Algarve (submitted for publication).

Rodrigues, P.M.M. and A. Rubia (2008) Testing for Structural Breaks in Variance and the Effects of Additive Outliers and Measurement Errors. *Working Paper*,

Departamento de Economia Financeira, Universidade de Alicante (submitted for publication).

Silva, J.A., P.M.M. Rodrigues, J. Mendes, L. Pereira (2008) A Research Agenda for Tourism in Portugal. Mimeo. Faculdade de Economia, Universidade do Algarve (submitted for publication).

Rodrigues, P.M.M. and A. Rubia, Testing for Seasonal Nonstationarity under Conditional Heteroscedasticity. *Mimeo*.

Rodrigues, P.M.M. and A.M.R. Taylor, Robust Tests for Seasonal Unit Roots. *Mimeo*.

Rodrigues, P.M.M. and U. Hassler, Residual-Based Tests against Seasonal Cointegration. *Mimeo*.

Nunes, L.C. and P.M.M. Rodrigues, On LM-type Tests for Seasonal Unit Roots in the Presence of a Break in Trend. *Mimeo*.

Danie, A. and P.M.M. Rodrigues, Modelling Tourism Demand Volatility in Portugal.

Andraz, J.M.L.G. and P.M.M. Rodrigues, Forecasting with Spatial Panel Data Models.

Hassler, U., P.M.M. Rodrigues and A. Rubia, Testing for Seasonal Fractional Integration.

Valle e Azevedo, J., P.M.M. Rodrigues and A. Rubia, Finite Sample Performance of Frequency and Time Domain Tests for Seasonal Fractional Integration.

Ramos, C., P.M.M. Rodrigues and F. Perna, Dynamic Packaging e os Sistemas de Informação Turísticos: características, potencialidades e desafios.

Other Activities

Guest Editor:

Econometric Theory (2008), Vol. 24, No. 1.

Journal of Financial Econometrics (in progress).

Active Referee for:

Bulletin of Economic Research, Computational Statistics and Data Analysis, Econometric Theory, Economics Bulletin, Econometric Reviews, Empirica, Empirical Economics, Economic Modelling, Journal of Applied Econometrics, Journal of Business and Economics Statistics, Journal of Econometrics, Journal of Empirical Finance, Journal of Statistical Computation and Simulation, Journal of the American Statistical

Association, METRON – International Statistical Journal, Oxford Bulletin of Economics and Statistics, Portuguese Economic Journal, Revista Turismo e Desenvolvimento (Journal of Tourism and Development), Sociedade Portuguesa de Estatística, Spanish Economic Review, The Econometrics Journal, Tourism Economics, Tourism Management.

Member of the Scientific and/or Organising Committee of:

2nd Annual Meeting of the Portuguese Economic Journal, July 4 and 5, 2008, University of Évora.

EC2 conference on *Recent Advances in Time Series Analysis*, December 14-15, 2007, Faculdade de Economia, Universidade do Algarve.

Multivariate Volatility Models conference, October 26-27, 2007, Faculdade de Economia, Universidade do Algarve.

XIV Congress of the Portuguese Statistical Society, August 19-21, 2007, ISCTE, Lisbon.

Global Management, May 2-5, 2007, Faro (conference Chair).

New Developments in Macroeconomic Modelling and Growth Dynamics, September 7-9, 2006, Faculdade de Economia, Universidade do Algarve.

Recent Developments in Tourism Research, October 6-7, 2005, Faculdade de Economia, Universidade do Algarve.

Unit Root and Cointegration Testing, September 29 – October 1, 2005, Faculdade de Economia, Universidade do Algarve.

XI Congress of the Portuguese Statistical Society, September 24-27, Faculdade de Economia, Universidade do Algarve.

Seasonality in Economic and Financial Variables, October 6-7, 2000, Faculdade de Economia, Universidade do Algarve.

Membership

CASEE - *Centro de Estudos Avançados em Economia e Econometria/Centre for Advanced Studies in Economics and Econometrics*, Universidade do Algarve

External Fellow do Clive Granger Centre for Time Series Analysis, University of Nottingham.