Dr. Zachariae A. ANASTASSI

<u>ulumivandat "" " eurstaa</u>

Personal Details & Qualifications	. 1
Professional Experience	.2
Publication Record	.2
Research Grants & Funding	. 3
Organization of Conferences and Symposia	. 3
Co-Editorship of International Conference Proceedings	.4
Programme Committees of International Conferences	.4

Numerical analysis, Numerical solution of initial/boundary value problems, Development and analysis of numerical algorithms

Scientific computing, Computational methods for the solution of real problems in physics, material science, chemistry, engineering etc.

Development of software packages, Parallel algorithms

Senior Lecturer in Computational Mathematics, Games, Mathematics and Intelligent Systems, School of Computer Science and Informatics, Faculty of Technology, De Montfort University, Leicester, United Kingdom.

Assistant Professor in Mathematics, Department of Mathematics, Statistics and Physics, College of Arts and Sciences, Qatar University, Doha, Qatar. : NPRP9-329-1-067, "Split-ring resonator based nonlinear metamaterials: from few to many, theory and experiments", funded by Qatar National Research Fund (Aug 2016 – Aug 2019, Budget: . . P.I. after Feb 2018, due to affiliation change).

: NPRP8-764-1-160, "Rogue Waves: From Oceans to Microwaves and Light", funded by Qatar National Research Fund (Feb 2016 – Feb 2019, Budget: P.I. after Feb 2018, due to affiliation change).

: Internal Grant QUUG-CAS-DMSP-13/14-7, "Numerical Methods for the Solution of the Schrödinger Equation", funded by Qatar University (Apr 2014 – Apr 2015, Budget:).

: Start-Up Grant, QUSG-CAS-MPS-12/13-25, funded by Qatar University (Apr 2013 – Apr 2014, Budget:).

: Research Programme "Archimedes" funded by the General Department of Technological Institute of Chalkis, with subject "Optimized Runge-Kutta methods with minimal phase-lag and infinite phase-lag order and combination of infinite phase-lag order and infinite anticipation factor order" (Apr 2004 – Apr 2006). Member of the Organizing Committee of the annual Conference entitled

(2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010, and 2011)

Member of the Organizing Committee of the annual Conference entitled " - IeCCS (2005, 2006,

2007, and 2008)

Member of the Organizing Committee of the Conference entitled " - ICTDM 2009

Member of the Organizing Committee of the Conference entitled " - ICMMS 2008

Organizer of the Symposium entitled "

" during the "International Conference of Numerical Analysis and Applied Mathematics" (ICNAAM) for the years 2008, 2009, 2010, 2011 and 2012.

T.E. Simos, G. Psihoyios, C. Tsitouras, Z.A. Anastassi, Preface: Proceedings of the International Conference on Numerical Analysis and Applied Mathematics 2012 (ICNAAM-2012) <u>http://dx.doi.org/10.1063/1.4756047</u> (2450 pages).

T.E. Simos, G. Psihoyios, C. Tsitouras, Z.A. Anastassi, Preface: Proceedings of the International Conference on Numerical Analysis and Applied Mathematics 2011 (ICNAAM-2011), AIP Proceedings, 1389 <u>http://dx.doi.org/10.1063/1.3636658</u> (2060 pages).

Member of the Programme Committee of the annual conference "Computer Aspects of Numerical Algorithms" - CANA (2010, 2011, 2012, 2013, 2014, 2015, 2016, 2017, 2018).

Member of the Programme Committee of the conference "International Conference of Numerical Analysis and Applied Mathematics" - ICNAAM (2011, 2012).

T.E. Simos, A.D. Zdetsis, G. Psihoyios, Z.A. Anastassi, Special Issue on Mathematical Chemistry based on papers presented within ICCMSE 2005 Preface, Journal of Mathematical Chemistry, 46, 3, 727-728 (2009).

Scientific Research Committee (2012-2017) Academic Quality and Assessment (2016-2017) Portfolio Evaluation Committee (2017) Math Placement Test Committee (2017) Math Conference Preparation Committee (2017) Curriculum and Study Plans Committee (2015-2016) Math Learning Support Committee (2015-2016) Student Affairs Committee (2012-2015)

	Acrobat (presentation slides)	2006 Autumn
(part of the course)		
'	Matlab (in-class examples, assignments, projects), Maple (in-	· · · ·

(secondary lecturer) 16.

problems,

P27. G.A. Panopoulos,

.

, T. E. Simos, A Symmetric Eight-Step Predictor-

P1. and T.E. Simos: Special Optimized Runge-Kutta methods for IVPs with Oscillating Solutions, , 15, 1-15 (2004).

C34. , G. Fotopoulos, D.J. Frantzeskakis, T.P. Horikis, N.I. Karachalios, P.G. Kevrekidis, I.G. Stratis, and K. Vetas, Numerical simulations of a nonlinear Schrödinger model with gain and loss, The 27th Biennial Numerical Analysis Conference 2017 (NANCONF 2017).

C33. , Fitted Linear Multistep Methods for the Solution of Periodic Differential Equations, Computational Techniques and Applications Conference (CTAC 2016).

C32. F. Tsitoura, , J. L. Marzuola, P. G. Kevrekidis, and D. J. Frantzeskakis, Computation of Dark Solitons near Potential and Nonlinearity Steps, Global Conference on Applied Physics & Mathematics 2016.

C31. , A.A. Kosti, A family of optimized symmetric linear multistep methods for the numerical solution of differential equations, 3rd ECCOMAS Young Investigators Conference (YIC 2015).

C30. , A.A. Kosti, A new Runge-Kutta-Nyström pair for the numerical solution of periodic initial value problems, 14th International Conference Computational and Mathematical Methods in Science and Engineering, (CMMSE 2014).

C29. A.A. Kosti, , T.E. Simos, A Fitted Runge-Kutta-Nyström Method with Fifth Order for the Integration of the Two-Body Problem, Proceedings of the

C16.

Methods in Sciences and Engineering (ICCMSE) 2006, 132-136, VSP Brill, included in Thomson ISI Proceedings.

C6. and T.E. Simos: A Trigonometrically-Fitted P-Stable Multistep Method for the Numerical Integration of the N-Body Problem, Proceedings of the International Conference of Computational Methods in Sciences and Engineering (ICCMSE) 2006, 455-457, VSP Brill, included in Thomson ISI Proceedings.

C5. and T.E. Simos: A Dispersive-Fitted and Dissipative-Fitted Runge-Kutta Method for IVPs with Oscillating Solutions, Proceedings of the International Conference of Numerical Analysis and Applied Mathematics (ICNAAM) 2005, 866-868, Wiley-VC.

C4. and T.E. Simos: A Trigonometrically Fitted Runge-Kutta Pair of Orders Four and Five for the Numerical Solution of the Schrödinger Equation, Proceedings of the International Conference of Computational Methods in Sciences and Engineering (ICCMSE) 2004, VSP Brill, 535-538.

C3. and T.E. Simos: Trigonometrically Fitted Runge-Kutta Methods of Order Five for the Numerical Solution of the Schrödinger Equation, Proceedings of the International Conference of Computational Methods in Sciences and Engineering (ICCMSE) 2004, 33-36, VSP Brill.

C2. and T.E. Simos: Trigonometrically-Fitted Runge-Kutta Methods for the Numerical Solution of the Schrödinger Equation, Proceedings of the International Conference of Numerical Analysis and Applied Mathematics (ICNAAM) 2004, Wiley-VCH, 21-23, included in Thomson ISI Proceedings.BDC q0.000008871 0 595.32 841.92 reW^{*}nBT/F3 12