22 October	23 October	24 October
8:45-9:00 Opening		
9:00-9:50 **S. McKee** Non local diffusion, a Mittag-Leffler function and a two-dimensional Volterra integral equation	9:00-9:50 **N.Ford** Mathematical modelling of autoimmunity	9:00-9:50 **Z. Jackiewicz** Construction of implicit-explicit dimsims of high order
9:50-10:40 **F. Almeida** The choice of basis for projection methods in weakly singular integral equations.	9:50-10:15 **P. Thanh An** Method of multiple shooting for ODE boundary value problems and application for finding geometric shortest paths. 10:15-10:40 **W. Auzinger** Singular polynomial systems.	9:50-10:40 **P. Oliveira** The mathematics of ageing: from the heart to the eye.
Coffee break: 10:40	**Coffee Break : 10:40**	**Coffee Break: 10:40**
11:00- 11:50 **G. Vainikko** Characterization of fractionally differentiable functions.	11:00- 11:50 **M. Vynnycky** The singular-perturbation asymptotics and numerics of flow in smectic A liquid crystals.	11:00- 11:50 **E. Weinmuller** Collocation – an efficient tool for solving singular ODEs and DAEs.
11:50-12:15 **A.Pedas** Numerical solution of fractional integro-differential equations	11:50-12:40 **Y.Xu** A Fast Fourier--Galerkin Method Solving a Boundary Integral Equation for the Biharmonic Equation	11:50-12:15 **I.Rachunkova** Analytical and constructive approach to impulsive boundary value problems.
12:15-12:40 **E. Sousa** Optical flow with fractional order regularization: variational model and solution method		12:15-12:40 **J. Burkotova** Solutions structure of singular nonlinear second order ODE.
Lunch break: 12:40	**Lunch break: 12:40**	**Lunch break: 12:40**
14:00-14:25 **P. Vasconcelos** Hierarchical matrices on the Eigenvalue Computation of Integral Operators.	14:00-14:25 **K. Nakane** An edge detection method for metal grain via a reaction diffusion system.	14:00-14:25 **S. McKee** On the convergence of a finite difference scheme for a second order differential equation containing nonlinearly a first derivative.
14:25-14:50 **H. Kaboul** A product integration method for nonlinear Fredholm integral equations in L1.	14:25-14:50 **M. Pazouki** Evolving Radial Basis Function Neural Network: A learning algorithm for time series forecasting.	14:25-14:50 **G. Izzo** Composed Multistep Methods for ODEs.

14:50-15:15 **S. Seyed Allaei** Numerical methods for a class of nonlinear singular second kind Volterra integral equations.	14:50-15:15 **J. Roberts** Introducing delay dynamics to Bertalanffy's spherical tumour growth model.	14:50-15:15 **Z. Bartoszewski** Application of the ε-approximate fixed-point method to solving boundary value problems for second order singularly disturbed delay differential equations.
15:15-15:40 **L. Ferrás** Spectral methods for distributed-order space Riesz diffusion equations.	15:15-15:40 **L. Uvarova** Modification of the nonlinear Schrodinger equation as a model of propagation of electromagnetic waves in nanostructures.	**End of Scientific Program**
15:40-16:05 **D. Occorsio** Approximation of Hadamard finite part transforms on (0,+∞)	15:40-16:05 **F. Teodoro** Computational methods for a forward-backward equation from physiology.	**Guided visit to Lagos**
Coffee Break: 16:05	**Coffee Break:** 16:05	
16:30-16:55 **L. Fermo** A Nystrom method for mixed boundary value problems on domains with corners.	16:30-16:55 **C. Laurita** A numerical method for the solution of an exterior Neumman problem on domains with corners.	
16:55-17:20 **M.C. De Bonis** A Nystrom method for integral equations with fixed singularities of Mellin type in weighted Lp spaces	16:55-17:17:20 **B. Li** Numerical approximation of singular solutions of the dynamic Ginzburg–Landau equations	
17:20-17:45 **M.G. Russo** Nystrom methods for Fredholm integral equations defined on strips.	17:20-17:45 **S. Valtchev** A meshfree method for harmonic problems with singular boundary conditions **POSTER SESSION**: 18:00	
Reception: 19:00	**Conference dinner: 20:00** **"Restaurante Adega da Marina"**	

POSTER SESSION

R. D'Ambrosio A High order exponentially fitted methods for periodic Volterra integral equations	**D. Conte** Parallel methods for weakly singular Volterra Integral Equations on GPUs	**T. Diogo** Numerical investigation of cordial Volterra integral equations.
P. Lima A Stochastic Approach to Neural Field Equations on Unbounded Domains.	**L. Morgado** Collocation methods with smoothing variable substitutions for singular m-laplacian free boundary problems	**K. Nakane** The application of Homology analysis for the periodic patterns
M. Rebelo A spectral collocation method for the diffusion equation with distributed order in time.		