

SIMPLIFIED PROGRAM

MONDAY 23 November	TUESDAY 24 November	WEDNESDAY 25 November
	 TALKS	 TALKS
	LUNCH 	LUNCH 
	 TALKS	
WELCOME RECEPTION 	CONFERENCE DINNER 	

DETAILED PROGRAM

MONDAY – 23 NOVEMBER

20:00 – Welcome Reception at *Los Girasoles*

TUESDAY – 24 NOVEMBER

9:00-9:20 – Registration

9:20-9:30 – Opening of the Conference

MODELLING SESSION:

9:30-10:20 – **Iuliu Sorin Pop**: Upscaling of mathematical models defined in time dependent geometries

10:20-10:50 – Coffee break

10:50-11:40 – **José Manuel García Aznar**: Finite element modeling of porous media in mechanobiology: from bone to cell mechanics

11:40-12:30 – **Anna Scotti**: The interplay of flow, chemistry and compaction in sedimentary basins

12:30-12:55 – **Xiulei Cao**: Two phase flow in porous media with dynamic effects in the capillary pressure: finite volume analysis

13:15-15:15 – Lunch

SOLVERS SESSION:

15:15-16:05 – **Petr Vabishchevich**: Decoupling technique in poroelasticity problems

16: 05-16:30 – **Andrés Arrarás**: Multipoint flux splitting methods for time-dependent Darcy flow

16:30-16:55 – **Manuel Borregales**: Convergence of iterative coupling for non-linear Biot's model

16:55-17:20 – **Peiyao Luo**: On an Uzawa Smoother in Multigrid for Poroelasticity Equations

20:15 – Conference Dinner

WEDNESDAY – 25 NOVEMBER

DISCRETIZATION SESSION:

9:00-9:50 – **Ludmil Zikatanov**: Monotonicity properties of some finite element discretizations of the linear Biot's model in poroelasticity

9:50-10:15 – **Martin Stynes**: Analysis of a finite difference method for a time-fractional advection-diffusion equation

10:15-10:45 – Coffee break

10:45-11:35 – **Xiaozhe Hu**: Convergence Analysis of Finite Element Discretizations for Biot's Equations

11:35-12:25 – **Markus Bause**: Towards Poroelasticity: Variational Space-Time Methods for Elastic Waves and Single-Phase Flow

13:00 – Lunch