Tuesday 15

9.00-13.00	ECMolS Registration
10-13	**WG2 workshop** **Chairs:** **Uta Schlickum and Sebastian Loth**
13.00- 14.00	Lunch
14.00-14.10	**Conference Welcome**
14.10-14.50	**A. Cornia** Forging Single-Molecule Magnets for spintronics: background, achievements and current trends
14.50-15.10	**A. Lunghi** Spins and Phonons as a Whole System: the Role of Environment on the Spin Relaxation of Single Molecule Magnets
15.10-15.30	**N.F. Chilton** Electronic Structure of Uranium(V)-Nitride Complexes
15.30-15.50	**B. Tsukerblat** A paradigm of quantum-dot cellular automata: molecular implementation
15.50-16.10	**R. Gaudenzi** Scraping the Landauer limit at high speeds with a quantum nanomagnet
16.10 16.40	coffee break
16.40-17.10	**M.Yamashita** Giant- and Tunneling-Magnetoresistance Based on Single-Molecule Magnets
17.10- 17 30	**L. Persichetti** Magnetic bistability in single atoms
17.30-17.50	**M. Bernien** Light-Induced Spin-State Switching of an Fe(II) Complex in Direct Contact with a Solid Surface
17.50-18.10	**T. Mallah** Engineering exchange coupling and magnetic anisotropy at the molecule/magnetic electrode interface in molecular spintronic devices
18.10- 18.30	**A. Bellec** Molecular scale dynamics of light-induced spin crossover in a two-dimensional layer

Wednesday 16* at the "Oratorio San Filippo Neri" Via Manzoni 5

9.00-9.40	**P. Seneor** Molecular spintronics: new opportunities beyond conventional materials
9.40-10.00	**L. Hueso** Spin-optical molecular devices
10.00-10.20	**M. Mannini** The challenge of embedding complex molecules in spintronic devices: a multitechnique approach
10.20-10.40	**J. Veciana** Chemical control over the energy-level alignment in a two-terminal junction
10.40-11.10	coffee break
11.10-11.40	**A. Riminucci** Transport regimes in organic spintronic devices
11.40-12.00	**S. Heutz** Flexible ferromagnetic films and nanostructures
12.00-12.30	**A. Forment Aliaga** Self-assembled monolayers on ferromagnets: A solution approach for molecular spintronics
12.30-14.00	**Lunch at "Sala Borsa" Piazza del Nettuno, 3**
14.00- 14.30	**M. Bowen** Simple and advanced ferromagnet/molecule spinterfaces
14.30-14.50	**N. Pascual** Tuning the magnetism of transition metal atoms with Hydrogen atoms
14.50-15.10	**A. Droghetti** Tailoring charge and spin transport by hybrid interface design
15.10-15.30	**A. Pratt** Oscillatory spin polarisation at organic semiconductor/ferromagnetic interfaces
15.30-15.50	**F. Tassinari** PNAs and oligopeptides self-assembled monolayers as spin filters
15.50-16.20	coffee break
16.20- 16.50	**N. Atodiresei** Magnetic Exchange Interactions at Hybrid Interfaces
16.50- 17.10	**I. A. Kowalik** Towards single molecule spin filters: organic chiral molecules on metal surfaces
17.10- 17.30	**S. Majumdar** Proximity-induced spin polarization of graphene in contact with half-metallic manganite
17.30- 18.00	**M.Cshiev** Anatomy of the perpendicular magnetic anisotropy of cobalt|graphene interfaces

Thursday 17

9.00-9.30	**E. Burzuri** Electron transport through individual all-organic polyradicals
9.30-9.50	**E. Ruiz** Magnetoresistance in Single-Molecule Devices based on Magnetic Mononuclear Transition Metal Complexes
9.50-10.10	**A. Candini** TbPc2 Single-Molecule Transistor with graphene electrodes
10.10-10.30	**W. Wulfhekel** Spin crossover complexes on ferromagnetic substrates
10.30-11.00	coffee break
11.00-11.40	**J. Sinova** Relativity shakes future technology: how the spin Hall effect and relativistic torques are opening new paths for information storage
11.40-12.00	**L. Malavolti** Spin sensing with atomically assembled nanomagnets
12.00-12.20	**T. Jung** Configuring Electronic States in an Atomically Precise Array of Quantum Boxes
12.20-12.40	**O. Tal** Atomic scale half metallicity: Rational design of extreme spin filtering and high magnetoresistance in atomic and molecular junctions
12-40-13.10	**M.Cinchetti** Functionalizing spin-textured 2D electronic systems with tailored organic bonds
13.10-14.00	**Lunch & poster**
14.00-15.00	**Poster session**
15.00-15.30	**W. Wernsdorfer** Quantum gate and algorithm using a single molecular magnet
15.30-18.30	**WG1 Workshop** **Chair:** **Luis Hueso**
18.30-20	**MC meeting**
20.15	**Social dinner** **Circolo Ufficiali via Marsala Bologna**

Friday 18

9.00-9.30	**S. Hill** EPR Studies of Molecular Lanthanide Spin Qubits
9.30-9.50	**J. Van Slageren** Decoherence mechanisms in molecular quantum bits
9.50-10.10	**G. Aromi** Dinuclear Lanthanide Complexes as Two-Qubit Molecular Spin Quantum Gates
10.10-10.30	**J. F. Soria** A supramolecular approach to implement universal quantum gates
10.30-11.00	coffee break
11.00-11.40	**J. Morton** Molecular spins and quantum technologies
11.40-12.00	**J. Majer** Hybrid Quantum Systems: Coupling Diamond Color Centers and Molecular to Superconducting Cavities
12.00-12.20	**M. Ruben** Towards quGates Switching of a Coupled Spin Pair in a Binuclear Co(II)2 Complex
12.20-12.40	**F. Tuna** Rabi Oscillations at room temperature in a Y-Yb single crystal
12-40-13.00	**S. Piligkos** Towards Molecular 4f Single-Ion Magnet Qubits
13.00-14.00	**Lunch & poster**
14.00-15.00	**Poster session**
15.00-15.20	Closing ceremony and prizes
15.30-18.30	**WG 3 Workshop** **Chair:** **Fernando Luis**

Key Note Lecture

Invited Lecture

Contributed talk