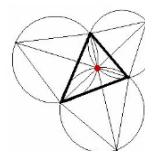


## Cuernavaca Gathering on Transport at the Nanoscale

05 - 09 November 2018



Centro  
Internacional de  
Ciencias A.C.



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FRONTERAS 952  
CB 219993

- 1) B. Baumeier: *Electronic transport and conversion processes in molecular materials: a multiscale challenge for electronic structure theory*
- 2) T. Stuyver: *Diradical Character as a Guiding Principle for the Insightful Design of Molecular Nanowires with an Increasing Conductance with Length*
- 3) J. Garcia: *The kernel polynomial method for spintronics and quantum transport: Toward quantum simulation of macroscopic devices*
- 4) I. Garzón: *Electronic structure of organic molecules and ligand-protected metal clusters: A first step toward the understanding of their conductive behavior*
- 5) A. Martinez: *Phenomenological approach to transport through three-terminal disordered wires*
- 6) J. Gonzalez: *Resonant thermoelectric transport in DNA-like systems*
- 7) M. Brandbyge: *Electron-phonon effects and signals in transport: From molecules to graphene*
- 8) P. Stegmann: *Full counting statistics of electron transport in nanoscale systems*
- 9) J. Franco: *From the Dirac oscillator to the graphene strips, microwave experiments*
- 10) P. Majari: *From Klein to anti-Klein tunneling in graphene tuning the Rashba spin-orbit interaction or the bilayer coupling*
- 11) G. Naumis: *Valley engineering by strain in Kekulé-distorted graphene*
- 12) V. Gopar: *Transmission of Anomalously and Anderson-Localized Waves and Intensity Inside Random Media*
- 13) C. Herrmann: *Spin-dependent effects in molecular and nanoscale electron transport: challenges for first-principles descriptions*
- 14) T. Stegmann: *Centrosymmetry, current vortices and energy distribution functions*
- 15) E. Mendoza & E. Paredes: *Electron transport in graphene heterojunctions*
- 16) Y. Betancur: *Partial positive refraction in asymmetric Veselago lenses of uniaxially strained graphene*
- 17) E. Kleinherbers: *Revealing attractive electron-electron interaction in a quantum dot by full counting statistics*
- 18) J. Palma: *Structural Modifications and Quantum Interference to Tune Rectification in Molecular Junctions*
- 19) I. Guzman: *Theoretical Studies on the Length Dependence of Molecular Rectification*
- 20) R. Peña: *Theoretical Studies of Coherent Transport in p-p Stacking Systems*
- 21) M. Brandbyge: *Electron transport in stacked and gated 2D nanostructures: Lessons from calculations*
- 22) L. Foa-Torres: *Topological states and anomalous localization in non-Hermitian systems*
- 23) N. Szpak: *How General Relativity Helps to Design Valleytronic Nanodevices*
- 24) L. Serkovic: *Graphene transistors using TiO<sub>2</sub>*
- 25) A. Gamboa: *Helium Nanodroplets at Ultra Cold Temperatures. The Problem of Excited States Calculation*
- 26) V. Mujica: *Electron Transport in Molecular Junctions and Spin-dependent Chemistry*

- 27) R. Mendez: *Emulating Solid State Physics with Mechanical Waves: from Tunneling to Bloch Oscillations and Rainbow Trapping*
- 28) L. Celardo: *Macroscopic Coherence as an emergent property in molecular nanotubes*
- 29) J.-C. Charlier: *Electronic transport through carbon chains and graphene p-n junctions*
- 30) J. Barrios: *Laser-induced effects in graphite*
- 31) S. Dubois: *Understanding the role of interfaces in 2D Magnetic Tunnel junctions*
- 32) M. Berdakin: *One way transport of charge and valley in graphene and topological states in metal-organic frameworks*
- 33) A. Botello: *Ab-initio tight binding models for transport and spectroscopies*
- 34) T. Seligman: *Microwave emulation experiments*

	Monday	Tuesday	Wednesday	Thursday	Friday
10:00 am	1) B. Baumeier	7) M. Brandbyge	13) C. Herrmann	22) L. Foa-Torres	29) J.-C. Charlier
10:30 am					
11:00 am	Coffee Break	Coffee Break	Coffee Break	Coffee Break	Coffee Break
11:30 am					
12:00 am	2) T. Stuyver	8) P. Stegmann	14) T. Stegmann	23) N. Szpak	30) J. Barrios
12:30 am					31) S. Dubois
1:00 pm	3) J. Garcia	9) J. Franco	15) Mendoza & Paredes	24) L. Serkovic	32) M. Berdakin
			16) Y. Betancur		
		10) P. Majari	17) E. Kleinherbers	25) A. Gamboa	33) A. Botello
1:30 pm	Lunch	Lunch	Lunch	Lunch	Lunch
2:00 pm					
2:30 pm					
3:00 pm	4) I. Garzon	11) G. Naumis	18) J. Palma	26) V. Mujica	
3:30 pm					
4:00 pm	Coffee Break	Coffee Break	Coffee Break	Coffee Break	
4:30 pm					
5:00 pm	5) A. Martinez	12) V. Gopar	19) I. Guzman	27) R. Mendez	
			20) R. Peña		
5:30 pm	6) J. Gonzalez			28) L. Celardo	
6:00 pm			21) M. Brandbyge	34) T. Seligman	
			Colloquium at ICF		
6:30 pm					
7:00 pm				Conference dinner at the Guesthouse	