

***Modeling Energy Materials From First Principles
Simulations: Optoelectronic and Hybrid-Photovoltaic
Devices***

Prof. Angel Rubio

Universidad del País Vasco (Spain)

Thursday 27th March, 2014. ICIQ Auditorium, 4 p.m.

Professional career

Angel Rubio was born in Oviedo in 1965. He received his PhD in Physics in 1991 from the University of Valladolid (UVA), Spain. During his PhD studies, he spent time at the Max Planck in Berlin and at Universities of Palma de Mallorca, Santander, Barcelona (Spain), Osnabruck (Germany), Nancy (France) He did postdoctoral work at University of California at Berkeley. After an Associate Professorship at (UVA) in 1994, he moved in 2001 to University of the Basque Country (UPV/EHU) as Full Professor/Chair of Condensed Matter Physics and director of the Nano-Bio Spectroscopy Group. He is also External Director of the Max-Planck Society and Group Director ("Theoretical Spectroscopy") of the Fritz Haber Institute of Max-Planck-Gesellschaft, Berlin. He is one of the founders of the the European Theoretical Spectroscopy Facility (ETSF) (<http://www.etsf.es>) where he is now the Vicepresident for Scientific Development in San Sebastián. The ETSF is a research and knowledge center dealing with problems of spectroscopy and the properties of electronic excited states in matter. He has an excellent publication record: more than 300 publications with more than 19000 citations (Hirsch index 69) related to theory and modeling of electronic and structural properties. He is one of the few Spanish scientists appearing in the ISI Essential Science Indicators as one of the most cited scientists in three different fields: Physics, Chemistry, and Materials Science. His research activity is internationally recognized and he has received numerous honours and awards. Among them are: Sir Allan Sewell Fellowship School of Science, Griffith University, Australia; 2004 Fellow of the American Physical Society: Materials Science Division; 2005 Friedrich Wilhelm Bessel Award, Humboldt Foundation, Germany; DuPont Award in Science, 2006; American Association for Advanced Science (AAAS) Fellow, 2010; "European Research Council Advanced Grant" 2011. His group is one of the worldwide references in the field of simulation and modeling of materials, nanostructures, and biomolecules



Research Interests

His research interests are rooted to the modeling and theory of electronic and structural properties of condensed matter, to the development of new theoretical tools to investigate the electronic response of materials, nanostructures, biomolecules and hybrid materials to external electromagnetic fields. His research activity is internationally recognized and has received many awards and honorary visiting professor positions in USA and Europe. He has two patents one on Gated-controlled light-emitting device made of BN nanotubes with defects,(2011) and another on Field emission source with BN nanotubes, (2001).