



## Arben Merkoçi

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## General quality indicators of scientific research

This section describes briefly the main quality indicators of scientific production (periods of research activity, experience in supervising doctoral theses, total citations, articles in journals of the first quartile, H index...). It also includes other important aspects or peculiarities.

- Number of directed doctoral thesis (last 10 years): 35 finished theses + 10 theses in progress
- Times cited: 21.588
- Average citations/year (last 5 years): 308,86
- h-index (Web-of-Science): 76

## Arben Merkoçi

Surname(s): **Merkoçi**  
Name: **Arben**  
DNI: **46874595C**  
ORCID: **0000-0003-2486-8085**  
ScopusID: **55775145500**  
ResearcherID: **C-7211-2008**  
Date of birth: **14/06/1961**  
Gender: **Male**  
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### Current professional situation

**Employing entity:** FUNDACION INSTITUT CATALA DE NANOCIÈNCIA I NANOTECNOLOGIA  
**Type of entity:** R&D Centre  
**Department:** Nanobioelectronics and Biosensors Group, Nanobioelectronics & Biosensors Group  
**Professional category:** ICREA Research Professor and Group Leader  
**Start date:** 01/09/2008  
**Type of contract:** Permanent employment contract  
**Dedication regime:** Full time  
**Primary (UNESCO code):** 230104 - Electrochemical analysis  
**Performed tasks:** Development of nanomaterials and nanobioelectronics based DNA, protein and cell sensors including lab-on-a-chip for a rapid, low cost and efficient (bio)analysis with interest for diagnostic, food control / safety, security, environmental monitoring and other industries.  
**Identify key words:** Biosensors; Electrochemical; Nanomaterials

### Previous positions and activities

	Employing entity	Professional category	Start date
1	FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA	Research professor and Group Leader	16/09/2006
2	Universitat Autònoma de Barcelona	Ramon y Cajal Senior Scientist	01/01/2004
3	New México State University	research scientist & laboratory manager	15/02/2002
4	Universitat Autònoma de Barcelona	Invited researcher	1997
5	University of Tirana	Lecturer and Scientific Researcher	01/01/1996
6	Universitat Politècnica de Catalunya	Postdoctoral researcher	01/01/1995
7	Università degli studi di Padova	Postdoctoral Researcher	15/04/1993
8	University of Tirana	Lecturer and scientific researcher	01/01/1986



- 1** **Employing entity:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**Professional category:** Research professor and Group Leader  
**Start-End date:** 16/09/2006 - 31/08/2008      **Duration:** 2 years
  
- 2** **Employing entity:** Universitat Autònoma de Barcelona  
**Professional category:** Ramon y Cajal Senior Scientist  
**Start-End date:** 01/01/2004 - 15/09/2006      **Duration:** 2 years - 8 months - 15 days  
**Type of entity:** University
  
- 3** **Employing entity:** New México State University  
**Professional category:** research scientist & laboratory manager  
**Start-End date:** 15/02/2002 - 15/12/2002      **Duration:** 10 months  
**Type of entity:** University
  
- 4** **Employing entity:** Universitat Autònoma de Barcelona  
**Professional category:** Invited researcher  
**Start-End date:** 1997 - 2002      **Duration:** 5 years  
**Type of entity:** University
  
- 5** **Employing entity:** University of Tirana  
**Professional category:** Lecturer and Scientific Researcher  
**Start-End date:** 01/01/1996 - 31/12/1996      **Duration:** 1 year
  
- 6** **Employing entity:** Universitat Politècnica de Catalunya  
**Professional category:** Postdoctoral researcher  
**Start-End date:** 01/01/1995 - 01/01/1996      **Duration:** 1 year  
**Type of entity:** University
  
- 7** **Employing entity:** Università degli studi di Padova  
**Professional category:** Postdoctoral Researcher  
**Start-End date:** 15/04/1993 - 15/10/1994      **Duration:** 1 year - 6 months  
**Type of entity:** University
  
- 8** **Employing entity:** University of Tirana  
**Professional category:** Lecturer and scientific researcher  
**Start-End date:** 01/01/1986 - 31/03/1993      **Duration:** 7 years - 3 months



## Education

### University education

#### 1st and 2nd cycle studies and pre-Bologna degrees

**1 University degree:** Higher degree

**Name of qualification:** B. Sc. degree in Chemistry

**Degree awarding entity:** Spanish Equivalency received by Ministerio de Educación Cultura y Deporte, Secretaria General Técnica, Subdirección General de Títulos, Convalidaciones y Homologaciones of Spain

**Date of qualification:** 15/11/2000

**2 University degree:** Higher degree

**Name of qualification:** B. Sc. degree in Industrial Chemistry

**Degree awarding entity:** University of Tirana

**Type of entity:** University

**Date of qualification:** 15/01/1985

#### Doctorates

**1 Doctorate programme:** Ph.D. in Chemistry

**Degree awarding entity:** Spanish Equivalency received by Ministerio de Educación Cultura y Deporte, Secretaria General Técnica, Subdirección General de Títulos, Convalidaciones y Homologaciones of Spain

**Date of degree:** 16/11/2000

**2 Doctorate programme:** Ph.D. in Chemistry

**Degree awarding entity:** University of Tirana

**Type of entity:** University

**Date of degree:** 16/09/1991

### Language skills

Language	Listening skills	Reading skills	Spoken interaction	Speaking skills	Writing skills
French		C1	A1	A1	A1
Albanian		C1	C1	C1	C1
Catalan		C1	C1	C1	C1
Spanish		C1	C1	C1	C1
English		C1	C1	C1	C1
Italian		C1	C1	C1	C1



## Teaching experience

### Experience supervising doctoral thesis and/or final year projects

- 1** **Project title:** Cost-effective electrochemical heavy metal sensors in environmental monitoring and healthcare: from in-situ monitoring to a wearable format  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Qiuyue Yang  
**Date of reading:** 27/10/2022
- 2** **Project title:** Feasibility study of MIP-based biosensor for the detection of kinurenic acid for acute-onchronic liver failure (ACLF)  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Nerea de Mariscal  
**Date of reading:** 15/09/2021
- 3** **Project title:** Design, development and application of protein-templated gold nanoclusters in biosensing of glutathione, sodium and potassium ions  
**Type of project:** Doctoral thesis  
**Entity:** University of Nottingham Malaysia  
**Student:** Xin Yi Wong  
**Date of reading:** 12/03/2021
- 4** **Project title:** Ratiometric approximation to the lateral flow assay  
**Type of project:** Work leading to an ASD  
**Co-director of thesis:** Arben Merkoçi  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Helena Torné  
**Date of reading:** 15/10/2020
- 5** **Project title:** Nanobiosensors for water contaminants detections  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Ruslan Álvarez Diduk; Arben Merkoçi Hyka  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**City of entity:** Bellaterra, Catalonia, Spain  
**Student:** José Francisco Bergua Canudo  
**Date of reading:** 18/09/2020
- 6** **Project title:** Development and application of innovative point-of-care biosensing platforms  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Amadeo Sena Torralba  
**Date of reading:** 24/07/2020



- 7** **Project title:** Nanoparticle-based sensors for pathogen nucleic acid detection with interest for agriculture  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Mohga Khater  
**Date of reading:** 21/06/2019
- 8** **Project title:** Printed graphene for energy storage and sensing applications  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Bhawna Nagar  
**Date of reading:** 07/05/2019
- 9** **Project title:** Designing advanced nanomaterials for next generation in vitro diagnostics: development of optical and electrochemical biosensors based on hollow AuAg nanoparticles for determination of viral and bacterial infections  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Lorenzo Russo  
**Date of reading:** 18/01/2019
- 10** **Project title:** Inkjet-Printed Devices for Chemical- and Biosensing Applications  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Carme Martínez Domingo  
**Date of reading:** 13/12/2018
- 11** **Project title:** Design and application of nanomaterial-based lateral flow devices  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Daniel Quesada González  
**Date of reading:** 26/10/2018
- 12** **Project title:** Toxicity Bioassay and Bioremediation of Diuron Pollution Using Microorganism-decorated Nano Biocomposites  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Guohua Zhong  
**Entity:** South China Agricultural University **Type of entity:** University  
**Student:** Jie Liu  
**Date of reading:** 03/12/2017
- 13** **Project title:** Development of novel electrochemical and optical lab-on-a-chip platforms for contaminants and biomarkers sensing  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Andrzej Chalupniak  
**Date of reading:** 27/11/2017
- 14** **Project title:** Nanobiosensors for diagnostics applications  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Eden Morales; Carmen Mayorga  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University



**Student:** Alejandro Zamora  
**Date of reading:** 11/11/2017

- 15** **Project title:** Bacterial cellulose supported sensor for bacteria and gas detection development  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Abdellah Aji  
**Entity:** Polytechnique Montréal **Type of entity:** R&D Centre  
**Student:** Bentolhoda heli  
**Date of reading:** 04/11/2017
- 16** **Project title:** From nanoparticles to graphene: architecting novel (bio)sensing platforms and devices  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Luis Miguel Baptista Pires  
**Date of reading:** 04/11/2016
- 17** **Project title:** Integrated analytical biosystems for industrial and environmental applications  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Salvador Alegret  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Xavier Llopis  
**Date of reading:** 05/02/2016
- 18** **Project title:** Development of nanomaterials for environmental monitoring  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Carmen C. Mayorga  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Flavio Pino  
**Date of reading:** 16/11/2015
- 19** **Project title:** Development of Quantum Dot-based tools for in vitro and biosensing applications  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Carme Nogués  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Helena Monton Domingo  
**Date of reading:** 13/11/2015
- 20** **Project title:** Electrochemical and optical nanomaterial-based biosensors for diagnostic applications  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Alejandro Chamorro  
**Date of reading:** 09/11/2015
- 21** **Project title:** Graphene Based Sensor to Monitor Orange Juice Spoilage  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Mlreia Burdó Masferrer  
**Date of reading:** 10/09/2015





- 22** **Project title:** Graphene oxide-based magnetic Janus micromotors for decontamination of persistent organic pollutants  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Roberto Pol Arias  
**Date of reading:** 10/09/2015
- 23** **Project title:** Mapping of graphene electrodes on plastic substrates using scanning electrochemical microscopy  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Victor Mas Cagide  
**Date of reading:** 10/09/2015
- 24** **Project title:** Construction and development of point-of-care testing devices with electrochemical detection in paper  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** Lauro T. Kubota; Arben Merkoçi  
**Entity:** Institute of Chemistry - UNICAMP **Type of entity:** University Research Institute  
**Student:** Everson Thiago Santos Gerônimo Da Silva  
**Date of reading:** 19/05/2015
- 25** **Project title:** Electrochemical and optical nanoparticle-based biosensors for point-of-care applications  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Lourdes Rivas Torcates  
**Date of reading:** 26/01/2015
- 26** **Project title:** Bismuth based (nano)materials and platforms for (bio)sensing  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Miquel Cadevall Riera  
**Date of reading:** 14/11/2014
- 27** **Project title:** Magnetic nanoparticles modified with rGO and HRP for pesticides detection  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Natalia Chamorro García  
**Date of reading:** 22/09/2014
- 28** **Project title:** Tributyltin label free detection using a graphene based paper electrode modified with molecularly imprinted magnetic particles  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Alejandro Zamora Gálvez  
**Date of reading:** 22/09/2014
- 29** **Project title:** Use of micro/nanoparticles with high biofunctionalizing capacity as signal amplifiers in lateral flow immunoassays  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Daniel Quesada González



**Date of reading:** 22/09/2014

- 30** **Project title:** Evaluation of enzyme immobilization methods for biosensors construction  
**Type of project:** Doctoral thesis  
**Co-director of thesis:** María Teresa Ramirez Silva  
**Entity:** Universidad Autónoma Metropolitana Unidad Iztapalapa  
**Student:** Erika Rodríguez Sevilla  
**Date of reading:** 01/08/2014  
**Type of entity:** University
- 31** **Project title:** Study of the influence of the structure of B-ring of flavonoids in their acidity constants and antioxidant capacity  
**Type of project:** Doctoral thesis  
**Entity:** Universidad Autónoma Metropolitana Unidad Iztapalapa  
**Student:** Ruslán Raulievich Alvarez Diduk  
**Date of reading:** 01/08/2014  
**Type of entity:** University
- 32** **Project title:** Study and development of new biosensors based on nanoparticles and nanochannels  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona  
**Student:** Marisol Espinoza Castañeda  
**Date of reading:** 21/07/2014  
**Type of entity:** University
- 33** **Project title:** Improved biosensing applications using lab-on-a-chip and other platforms  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona  
**Student:** Mariana Medina Sánchez  
**Date of reading:** 2013  
**Type of entity:** University
- 34** **Project title:** Nano/micromaterials and motors in (bio)sensing applications  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona  
**Student:** Maria Guix Noguera  
**Date of reading:** 2013  
**Type of entity:** University
- 35** **Project title:** Nanomaterials Based Microarray Platforms for biodetection  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Politècnica de Catalunya  
**Student:** Eden Morales Narváez  
**Date of reading:** 2013  
**Type of entity:** University
- 36** **Project title:** Nanostructured micromaterials and devices for sensing and removing of chemical contaminants  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona  
**Student:** Adaris López Marzo  
**Date of reading:** 2013  
**Type of entity:** University
- 37** **Project title:** Plastic and paper platforms for nanoparticle based immunosensors  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona  
**Date of reading:** 2013  
**Type of entity:** University



**Student:** Claudio Parolo  
**Date of reading:** 2013

- 38** **Project title:** Electrocatalytic Nanoparticle Based Sensing for Diagnostics  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Marisa Maltez da Costa  
**Date of reading:** 2012
- 39** **Project title:** Development of graphene based platforms for biosensing applications  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Luis Miguel Baptista Pires  
**Date of reading:** 2012
- 40** **Project title:** Biosensori elettrochimici a base di quantum dot e microparticelle magnetiche  
**Type of project:** End of course project  
**Entity:** Università Degli Studi Di Padova **Type of entity:** University  
**Student:** Irene Xochilt Cantarelli  
**Date of reading:** 2011
- 41** **Project title:** Macro, Micro And Nanobased Tools For Heavy Metals Detection  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Gemma Aragay Esteve  
**Date of reading:** 2011
- 42** **Project title:** Application of nanoparticles to the analysis of biomarkes  
**Type of project:** End of course project  
**Entity:** Università Degli Studi di Milano-Bicocca **Type of entity:** University  
**Student:** Federico Airò  
**Date of reading:** 2010
- 43** **Project title:** Bismuth nanoparticles for ink-jet printing of heavy metals sensors  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Miquel Cadevall Riera  
**Date of reading:** 2010
- 44** **Project title:** Nanobioelectronics based platforms for lab-on-a-chip applications  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Mariana Medina Sánchez  
**Date of reading:** 2010
- 45** **Project title:** Prussian blue nanoparticles for biosensing applications  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Marisol Espinoza Castañeda  
**Date of reading:** 2010



- 46** **Project title:** Electrochemical Characterization of Gold Nanoparticles for Biomedical Diagnostics Applications  
**Type of project:** End of course project  
**Entity:** Università degli Studi di Padova **Type of entity:** University  
**Student:** Claudio Parolo  
**Date of reading:** 2009
- 47** **Project title:** Carbon nanotubes for electrochemical (bio)sensing  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Briza Pérez López  
**Date of reading:** 2009
- 48** **Project title:** Synthesis and applications of nanoparticles in biosensing systems  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Sergio Marín Mancebo  
**Date of reading:** 2009
- 49** **Project title:** Carbon nanotubes modified electrochemical biosensor for phenol detection  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Maria Guix Noguera  
**Date of reading:** 2009
- 50** **Project title:** Desarrollo de Métodos de Cuantificación de Dopamina (DA), Azometina-H (AzH) y Ácido Ascórbico (AA) basados en Sistemas Supramoleculares DA/AA/AzH con  $\beta$ -Ciclodextrina ( $\beta$ -CD) y Dodecil sulfato de sodio (SDS)  
**Type of project:** Doctoral thesis  
**Entity:** Universidad Autónoma Metropolitana Unidad Iztapalapa **Type of entity:** University  
**Student:** Georgina Alarcón Ángeles  
**Date of reading:** 2008
- 51** **Project title:** Electrochemical stripping analysis and nanoparticles for affinity biosensors  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** María Teresa Castañeda Briones  
**Date of reading:** 2008
- 52** **Project title:** Nanostructured biosensor designs for dopamine  
**Type of project:** Work leading to an ASD  
**Entity:** Universidad Autónoma Metropolitana Unidad Iztapalapa **Type of entity:** University  
**Student:** Georgina Alarcón Ángeles  
**Date of reading:** 2006
- 53** **Project title:** Development of novel immunosystems based nanoparticles  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Marta Aldavert  
**Date of reading:** 2005



- 54** **Project title:** Synthesis of quantum dots and their integration into DNA detection systems  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Sergio Marín Mancebo  
**Date of reading:** 2005
- 55** **Project title:** Flow injection (micro) biosystems based on magnetical particles and electrochemical detections  
**Type of project:** Work leading to an ASD  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Xavier Llopis  
**Date of reading:** 2004
- 56** **Project title:** Development of screen printed biosensors for application in agriculture  
**Type of project:** Doctoral thesis  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Miquel Albareda  
**Date of reading:** 2003
- 57** **Project title:** Estudi analític de l'aplicació d'un elèctrode grafit-epoxi en l'anàlisi de metalls pesants en aigua potable amb la tècnica DPASV. Automatització amb un sistema de flux continu (ASD)  
**Entity:** Universitat Autònoma de Barcelona **Type of entity:** University  
**Student:** Sergi Carrégalo Gil  
**Date of reading:** 2002
- 58** **Project title:** Analytical characterisation of acid precipitation in Tirana city using optical as well as electrochemical methods  
**Type of project:** Doctoral thesis  
**Entity:** University of Tirana **Type of entity:** University  
**Student:** Majlinda Vasjari  
**Date of reading:** 1997



## Scientific and technological experience

### Scientific or technological activities

#### R&D projects funded through competitive calls of public or private entities

- 1 Name of the project:** Twinning to boost the scientific and innovation capacity of the Universiteti i Tiranes to develop sustainable nanosensors for water pollution detection (SUSNANO)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
European Commission **Type of entity:** EU funding body  
**Name of the programme:** HORIZON-WIDERA-2021-ACCESS-02  
**Code according to the funding entity:** 101059266  
**Start-End date:** 01/09/2022 - 31/08/2025  
**Total amount:** 352.062 €
- 2 Name of the project:** Emerging Printed Electronics Research Infrastructure (EMERGE)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
European Commission  
**Start-End date:** 01/07/2021 - 30/06/2025  
**Total amount:** 254.650 €
- 3 Name of the project:** MICROBiome-based biomarkers to PREDICT decompensation of liver cirrhosis and treatment response (MICRO-PREDICT) (825694)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Start-End date:** 01/01/2019 - 31/03/2025  
**Total amount:** 1.089.400 €
- 4 Name of the project:** Fully integrated nanomaterial-based point-of-care devices for health care applications (FULLPOC)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA **Type of entity:** R&D Centre  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Agencia Estatal de Investigación **Type of entity:** State agency



**Name of the programme:** PROYECTO GENERACIÓN DE CONOCIMIENTO  
**Code according to the funding entity:** PID2021-124795NB-I00  
**Start-End date:** 01/01/2022 - 31/12/2024  
**Total amount:** 326.700 €

**5 Name of the project:** Nano-Monitoring of Cancer Immunotherapy Efficiency: The Graphene Lateral Electrophoretic Bioassay platform (GLEBIOASSAY)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**  
Instituto de Salud Carlos III

**Type of entity:** Public Research Body

**Name of the programme:** AES 2021: PROYECTOS DE PROGRAMACIÓN CONJUNTA INTERNACIONAL  
**Code according to the funding entity:** AC21\_2/00044  
**Start-End date:** 01/01/2022 - 31/12/2024  
**Total amount:** 157.300 €

**6 Name of the project:** Multiplexed nanobiosensor for the instantaneous diagnosis and classification of anaemia at the point of care (NANOANAEMIA)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA

**Type of entity:** R&D Centre

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**  
Agencia Estatal de Investigación

**Type of entity:** State agency

**Type of participation:** Co-ordinator

**Name of the programme:** Líneas Estratégicas 2021  
**Code according to the funding entity:** PLEC2021-007727  
**Start-End date:** 01/12/2021 - 30/11/2024  
**Total amount:** 316.742 €

**7 Name of the project:** Polymerase Amplification combined into a Paper-based electrochemical lateral flow arraY for antimicrobial Resistance qUantification (PAPYRUS)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**  
Agencia Estatal de Investigación

**Type of entity:** State agency

**Type of participation:** Principal investigator

**Name of the programme:** Líneas Estratégicas 2021  
**Code according to the funding entity:** PLEC2021-007972  
**Start-End date:** 01/11/2021 - 31/10/2024  
**Total amount:** 197.367 €

**8 Name of the project:** Graphene Flagship Core 3  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA



**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi Hyka  
**Start-End date:** 01/04/2020 - 31/03/2023  
**Total amount:** 176.000 €

- 9** **Name of the project:** Integrated smart cost and effective nanodiagnostics (INCOSTNANO) (MAT2017-87202-P)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Start-End date:** 01/01/2018 - 31/12/2021      **Duration:** 4 years  
**Total amount:** 60.500 €
- 10** **Name of the project:** Rapid diagnosis of COVID-19 and other viral upper respiratory tract infections through a rapid paper-based device (COVID19-122)  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Consejo Superior de Investigaciones Científicas      **Type of entity:** State agency  
**Start-End date:** 15/05/2020 - 10/05/2021  
**Total amount:** 36.000 €
- 11** **Name of the project:** Graphene Flagship Core Project 2  
**Entity where project took place:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Comisión Europea      **Type of entity:** European Commission  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 01/04/2018 - 31/03/2020  
**Total amount:** 218.000 €
- 12** **Name of the project:** Development and application of Novel, Integrated Tools for monitoring and managing Catchments (INTCATCH)  
**Entity where project took place:** FUNDACIO INSTITUT CATALA DE NANOCIENCIA I NANOTECNOLOGIA      **Type of entity:** R&D Centre  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Start-End date:** 01/06/2016 - 31/01/2020  
**Total amount:** 523.575 €
- 13** **Name of the project:** Development of a Nanodiagnostic platform for monitoring of Cancer cell secreted proteins (NACANCELL)  
**Entity where project took place:** FUNDACIO INSTITUT CATALA DE NANOCIENCIA I NANOTECNOLOGIA      **Type of entity:** R&D Centre





**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

Ministerio de Ciencia e Innovación. Investigación **Type of entity:** Spanish Government

**City funding entity:** Madrid, Community of Madrid, Spain

**Start-End date:** 01/11/2016 - 31/10/2019

**Total amount:** 130.000 €

**14 Name of the project:** Plataformas de papel y plástico nanobioconjugadas para aplicaciones de diagnóstico mejoradas

**Entity where project took place:** FUNDACIO **Type of entity:** R&D Centre

INSTITUT CATALA DE NANOCIENCIA I  
NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Start-End date:** 01/01/2015 - 31/12/2017

**Total amount:** 157.300 €

**15 Name of the project:** Sensing toxicants in Marine waters makes Sense using biosensors (SMS).  
FP7-OCEAN 2013.1 Program. Contract number: 613844

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

European Commission

**City funding entity:** Brussels, Belgium

**Start-End date:** 01/12/2013 - 31/08/2017

**Total amount:** 485.500 €

**16 Name of the project:** SMART PRINTED PAPER: Printed Electronics for new paper functionalities

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Start-End date:** 01/02/2014 - 31/12/2016

**Total amount:** 96.456 €

**17 Name of the project:** Suport a Grups de Recerca (SGR) reconeguts per la Generalitat de Catalunya (grup consolidat)

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Start-End date:** 01/01/2014 - 31/12/2016

**Total amount:** 30.100 €

**18 Name of the project:** Development of a novel highly sensitive and interference-free endotoxin detection system using new nanobiomaterials and phenomena

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Start-End date:** 01/09/2014 - 31/08/2016



**Total amount:** 102.850 €

- 19 Name of the project:** Nanosystems for early Diagnosis of Neurodegenerative Diseases (NADINE)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Comisión Europea **Type of entity:** CE  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 01/09/2010 - 31/08/2015  
**Total amount:** 489.939,25 €
- 20 Name of the project:** Development of Electrochemical Peptide Nanosensors for protein and antibody detection (FP7-PEOPLE-2011-IRSES)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
European Commission **Type of entity:** EC  
**City funding entity:** Brussels, Belgium  
**Start-End date:** 01/05/2012 - 30/04/2015  
**Total amount:** 71.424 €
- 21 Name of the project:** NANOMaterials for Highly on-off Electroswitchable Recognitions capabilities with Outstanding ElectroBioSensing applications - NANOHEROES (MAT2011-25870)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Ministerio de Ciencia e Innovación. Investigación **Type of entity:** Gobierno de España  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 01/01/2012 - 31/12/2014  
**Total amount:** 150.000 €
- 22 Name of the project:** Point of Care Diagnostics for rapid and cheap pathogen detection of companion animals (POC4PETS) (FP7-SME-2012)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
European Commission **Type of entity:** EC  
**City funding entity:** Brussels, Belgium  
**Start-End date:** 01/09/2012 - 31/08/2014  
**Total amount:** 224.704 €
- 23 Name of the project:** Evaluation of the calcium-sensing receptor as a novel candidate tumor suppressor gene and therapeutic target in neuroblastic tumors.  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain



**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

Fundación Privada CELLEX

**Type of entity:** Foundation

**City funding entity:** Barcelona, Catalonia, Spain

**Start-End date:** 01/01/2011 - 31/12/2013

**Total amount:** 27.500 €

**24 Name of the project:** Multifunctional Nanoplatfoms For High Sensitive Pollution Control and Purification of Water (PIB2010JP-00278)

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

Ministerio de Ciencia e Innovación. Investigación

**Type of entity:** Gobierno de España

**City funding entity:** Madrid, Community of Madrid, Spain

**Start-End date:** 01/12/2010 - 30/11/2013

**Total amount:** 180.000 €

**25 Name of the project:** Nanoparticle-based Sensors for Detection of Chemical and Biological Threats. (SfP 983807)

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

OTAN

**Type of entity:** Organismo Internacional

**City funding entity:** Bruselas, Belgium

**Start-End date:** 22/10/2010 - 22/06/2013

**Total amount:** 165.000 €

**26 Name of the project:** Nanobiosensors for tumoral marker evaluation (IT2009-0092)

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Cerdanyola del Vallès, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

Ministerio de Ciencia e Innovación. Investigación

**Type of entity:** Gobierno de España

**City funding entity:** Madrid, Community of Madrid, Spain

**Start-End date:** 01/01/2010 - 31/12/2012

**Total amount:** 10.000 €

**27 Name of the project:** Multifunctional water treatment system based on ultrasensitive detection and purification nanoplatfoms for removal of environmental pollutants (PLE2009-0050)

**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA

**City of entity:** Bellaterra, Catalonia, Spain

**Name principal investigator (PI, Co-PI....):** Arben Merkoçi

**Funding entity or bodies:**

Ministerio de Ciencia e Innovación. Investigación

**Type of entity:** Gobierno de España

**City funding entity:** Madrid, Community of Madrid, Spain

**Start-End date:** 01/11/2009 - 31/10/2012

**Total amount:** 40.000 €



- 28** **Name of the project:** Development of an electrochemical biosensor based on nanoparticles for fast and simple detection of DNA sequences  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
VETGENOMICS **Type of entity:** R&D Centre  
**City funding entity:** Bellaterra, Catalonia, Spain  
**Start-End date:** 01/01/2012 - 30/06/2012  
**Total amount:** 69.960 €
- 29** **Name of the project:** Development of novel nanomaterial based targeting approaches as emerging universal platforms with interest for biosensors (MAT2008-03079)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Ministerio de Ciencia e Innovación. Investigación **Type of entity:** Gobierno de España  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 01/01/2009 - 31/12/2011  
**Total amount:** 242.000 €
- 30** **Name of the project:** Early breast cancer diagnostics system (VALTEC08-1-0007)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Generalitat de Catalunya **Type of entity:** AGAUR  
**City funding entity:** Barcelona, Catalonia, Spain  
**Start-End date:** 21/07/2008 - 20/07/2011  
**Total amount:** 76.797 €
- 31** **Name of the project:** Evaluation of the dietary Zn and blocking agents of the microbial intestinal adhesion in the weaning piglets feeding (ZINBLOC)  
**Entity where project took place:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City of entity:** Bellaterra, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:**  
Ministerio de Ciencia e Innovación. Investigación **Type of entity:** Gobierno de España  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 01/11/2010 - 30/04/2011  
**Total amount:** 12.000 €
- 32** **Name of the project:** Nanotechnologies In Biomedicine (Project CSD2006-00012)  
**Entity where project took place:** Universitat **Type of entity:** University  
Autònoma de Barcelona  
**City of entity:** Cerdanyola del Vallès, Catalonia, Spain  
**Funding entity or bodies:**



MINISTERIO DE EDUCACION Y CIENCIA

**City funding entity:** Spain

**Start-End date:** 2006 - 2011

- 33 Name of the project:** WATER Risk Management in EuRope (WARMER)  
**Entity where project took place:** Universitat Autònoma de Barcelona **Type of entity:** University  
**City of entity:** Cerdanyola del Vallès, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:** Comisión Europea **Type of entity:** CE  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 01/09/2006 - 31/08/2009  
**Total amount:** 247.860 €
- 34 Name of the project:** Modified Nanoparticles For Fast Proteomic Analysis Based On Multiplexed Immunoassays With Electrochemical Coding And Lab-On-A-Chip Technologies (MAT2005-03553/)  
**Entity where project took place:** Universitat Autònoma de Barcelona **Type of entity:** University  
**City of entity:** Cerdanyola del Vallès, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:** MINISTERIO DE EDUCACION Y CIENCIA  
**City funding entity:** Spain  
**Start-End date:** 15/10/2005 - 14/10/2008  
**Total amount:** 159.460 €
- 35 Name of the project:** Development of new smart bionanostructures for molecular biosensors for environment interest  
**Entity where project took place:** Universitat Autònoma de Barcelona **Type of entity:** University  
**City of entity:** Cerdanyola del Vallès, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:** Fundación Ramón Areces **Type of entity:** Foundation  
**City funding entity:** Madrid, Community of Madrid, Spain  
**Start-End date:** 2005 - 2007  
**Total amount:** 82.000 €
- 36 Name of the project:** Biologically modified Quantum Dots as smart bionanostructures for the development of new detection systems including their integration in a Lab-on-a-chip (MAT2004-05164)  
**Entity where project took place:** Universitat Autònoma de Barcelona **Type of entity:** University  
**City of entity:** Cerdanyola del Vallès, Catalonia, Spain  
**Name principal investigator (PI, Co-PI....):** Arben Merkoçi  
**Funding entity or bodies:** MINISTERIO DE EDUCACION Y CIENCIA  
**City funding entity:** Spain  
**Start-End date:** 01/01/2005 - 31/01/2005



Total amount: 10.000 €

## R&D non-competitive contracts, agreements or projects with public or private entities

**Name of the project:** Nuevas Soluciones basadas en PRINTED ELECTRONICS para la detección de variables físicas y la liberación de compuestos orgánicos

**Degree of contribution:** Subcontracted by company

**Name principal investigator (PI, Co-PI...):** Arben Merkoçi

**Participating entity/entities:** CREACIONES AROMATICAS INDUSTRIALES, S.A; D+T Microelectrónica / IMB-CNM (CSIC)

**Funding entity or bodies:**

Ministerio de Industria Turismo y Comercio

**Type of entity:** Spanish Government

**City funding entity:** Madrid, Community of Madrid, Spain

**Start date:** 2014

**Duration:** 2 years

**Total amount:** 44.625 €

## Scientific and technological activities

### Scientific production

#### Publications, scientific and technical documents

- David Panáček; Lukáš Zdražil; Michal Langer; Veronika Šedajová; Zdeněk Baďura; Georgio Zoppellaro; Qiuyue Yang; Emily P. Nguyen; Ruslan Álvarez-Diduk; Vítězslav Hrubý; Jan Kolařík; Nikolaos Chalmes; Athanasios B. Bourlinos; Radek Zbořil; Arben Merkoçi; Aristides Bakandritsos; Michal Otyepka. Graphene Nanobeacons with High-Affinity Pockets for Combined, Selective, and Effective Decontamination and Reagentless Detection of Heavy Metals. *Small*. 18 - 33, 2201003, Wiley, 01/07/2022. Available on-line at: <<https://onlinelibrary.wiley.com/doi/full/10.1002/smll.202201003>>.

**DOI:** 10.1002/smll.202201003

**Type of production:** Scientific paper **Format:** Journal

**Corresponding author:** No
- Andrea Idili; Andrea Bonini; Claudio Parolo; Ruslan Alvarez-Diduk; Fabio di Francesco; Arben Merkoçi. A Programmable Electrochemical Y-Shaped DNA Scaffold Sensor for the Single-Step Detection of Antibodies and Proteins in Untreated Biological Fluids. *Advanced Functional Materials*. 32 - 2201881, Wiley, 22/06/2022. Available on-line at: <<https://onlinelibrary.wiley.com/doi/full/10.1002/adfm.202201881>>.

**DOI:** 10.1002/adfm.202201881

**Type of production:** Scientific paper **Format:** Journal

**Corresponding author:** Yes
- Liming Hu; Enric Calucho; Celia Fuentes-Chust; Claudio Parolo; Andrea Idili; Ruslan Álvarez-Diduk; Lourdes Rivas; Arben Merkoçi. Selection and characterisation of bioreceptors to develop nanoparticle-based lateral-flow immunoassays in the context of the SARS-CoV-2 outbreak. *Lab on a Chip*. 22, pp. 2938. Royal Society of Chemistry, 10/06/2022. Available on-line at: <<https://pubs.rsc.org/en/Content/ArticleLanding/2022/LC/D2LC00486K>>.

**DOI:** 10.1039/d2lc00486k

**Type of production:** Scientific paper **Format:** Journal

**Corresponding author:** Yes



- 4** Qiuyue Yang; Giulio Rosati; Vernalyn Abarintos; Miguel Ángel Aroca; Johann F. Osma; Arben Merkoçi. Wearable and fully printed microfluidic nanosensor for sweat rate, conductivity, and copper detection with healthcare applications. *Biosensors and Bioelectronics*. 202 - 114005, ELSEVIER, 15/04/2022. Available on-line at: <<https://www.sciencedirect.com/science/article/abs/pii/S0956566322000458#>>.  
**DOI:** 10.1016/j.bios.2022.114005  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 5** Amadeo Sena-Torralba; Helena Torné-Morató; Claudio Parolo; Saba Ranjbar; Mohammad Amin Farahmand Nejad; Ruslan Álvarez-Diduk; Andrea Idili; Mohammad Reza Hormozi-Nezhad; Arben Merkoçi. A Novel Ratiometric Fluorescent Approach for the Modulation of the Dynamic Range of Lateral Flow Immunoassays. *Advanced Materials Technologies*. 7 - 8, pp. 2101450. Wiley, 14/03/2022. Available on-line at: <<https://onlinelibrary.wiley.com/doi/full/10.1002/admt.202101450>>.  
**DOI:** 10.1002/admt.202101450  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 6** Elisabetta De Vito-Francesco; Alessandro Farinelli; Qiuyue Yang; Bhawna Nagar; Ruslan Álvarez-Diduk; Arben Merkoçi; Thorsten Knutz; Alexander Haider; Wolfgang Stach; Falko Ziegenbalg; Roza Allabashi. An innovative autonomous robotic system for on-site detection of heavy metal pollution plumes in surface water. *Environmental Monitoring and Assessment*. 194 - 122, SpringerLink, 24/01/2022. Available on-line at: <<https://link.springer.com/article/10.1007/s10661-021-09738-z#citeas>>.  
**DOI:** 10.1007/s10661-021-09738-z  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** No
- 7** Giulio Rosati; Massimo Urban; Lei Zhao; Qiuyue Yang; Cecilia de Carvalho Castro e Silva; Stefano Bonaldo; Claudio Parolo; Emily P. Nguyen; Gabriel Ortega; Paolo Fornasiero; Alessandro Paccagnella; Arben Merkoçi. A plug, print & play inkjet printing and impedance-based biosensing technology operating through a smartphone for clinical diagnostics. *Biosensors and Bioelectronics*. 196 - 113737, ELSEVIER, 15/01/2022. Available on-line at: <<https://www.sciencedirect.com/science/article/pii/S0956566321007740?via%3Dihub>>.  
**DOI:** 10.1016/j.bios.2021.113737  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 8** José Francisco Bergua; Ruslan Álvarez-Diduk; Andrea Idili; Claudio Parolo; Marc Maymó; Liming Hu; Arben Merkoçi. Low-Cost, User-Friendly, All-Integrated Smartphone-Based Microplate Reader for Optical-Based Biological and Chemical Analyses. *Analytical Chemistry*. 94 - 2, pp. 1271 - 1285. ACS Publications, 03/01/2022. Available on-line at: <<https://pubs.acs.org/doi/10.1021/acs.analchem.1c04491>>.  
**DOI:** 10.1021/acs.analchem.1c04491  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 9** Close José M.R. Flauzino; Emily P. Nguyen; Qiuyue Yang; Giulio Rosati; David Panáček; Ana G. Brito-Madurro; João M. Madurro; Aristides Bakandritsos; Michal Otyepka; Arben Merkoçi. Label-free and reagentless electrochemical genosensor based on graphene acid for meat adulteration detection. *Biosensors and Bioelectronics*. 195 - 113628, ELSEVIER, 01/01/2022. Available on-line at: <<https://www.sciencedirect.com/science/article/abs/pii/S0956566321006655#>>.  
**DOI:** 10.1016/j.bios.2021.113628  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes



- 10** Florence Anne Castelli; Giulio Rosati; Christian Moguet; Celia Fuentes; Jose Marrugo-Ramírez; Thibaud Lefebvre; Hervé Volland; Arben Merkoçi; Stéphanie Simon; François Fenaille; Christophe Junot. Metabolomics for personalized medicine: the input of analytical chemistry from biomarker discovery to point-of-care tests. *Analytical and Bioanalytical Chemistry*. 414, pp. 759 - 789. SpringerLink, 01/01/2022. Available on-line at: <<https://link.springer.com/article/10.1007/s00216-021-03586-z>>.  
**DOI:** 10.1007/s00216-021-03586-z  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** No
- 11** Qiuyue Yang; Bhawna Nagar; Ruslan Alvarez-Diduk; Marc Balsells; Alessandro Farinelli; Domenico Bloisi; Lorenzo Proia; Carmen Espinosa; Marc Ordeix; Thorsten Knutz; Elisabetta De Vito-Francesco; Roza Allabashi; Arben Merkoçi. Development of a Heavy Metal Sensing Boat for Automatic Analysis in Natural Waters Utilizing Anodic Stripping Voltammetry. *ACS EST Water*. 1 - 12, pp. 2470 - 2476. ACS Publications, 21/10/2021. Available on-line at: <<https://pubs.acs.org/doi/10.1021/acsestwater.1c00192>>.  
**DOI:** 10.1021/acsestwater.1c00192  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 12** Andrea Idili; Claudio Parolo; Ruslan Álvarez-Diduk; Arben Merkoçi. Rapid and Efficient Detection of the SARS-CoV-2 Spike Protein Using an Electrochemical Aptamer-Based Sensor. *ACS Sensors*. 6 - 8, pp. 3093 - 3101. ACS Publications, 10/08/2021. Available on-line at: <<https://pubs.acs.org/doi/10.1021/acssensors.1c01222>>.  
**DOI:** 10.1021/acssensors.1c01222  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 13** José Francisco Bergua; Liming Hu; Celia Fuentes-Chust; Ruslan Álvarez-Diduk; Abdelrahim H. A. Hassan; Claudio Parolo; Arben Merkoçi. Lateral flow device for water fecal pollution assessment: From troubleshooting of its microfluidics using bioluminescence to colorimetric monitoring of generic *Escherichia coli*. *Lab on a Chip*. 21, pp. 2417 - 2426. Royal Society of Chemistry, 06/05/2021. Available on-line at: <<https://pubs.rsc.org/en/content/articlelanding/2021/lc/d1lc00090j>>.  
**DOI:** 10.1039/D1LC00090J  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 14** José Francisco Bergua; Ruslan Álvarez-Diduk; Liming Hu; Abdelrahim H.A. Hassan; Arben Merkoçi. Improved *Aliivibrio fischeri* based-toxicity assay: Graphene-oxide as a sensitivity booster with a mobile-phone application. *Journal of Hazardous Materials*. 406, pp. 124434. 15/03/2021.  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 15** Amadeo Sena-Torralba; Ruslan Alvarez-Diduk; Claudio Parolo; Helena Torné-Morató; Alexander Müller; Arben Merkoçi. Paper-Based Electrophoretic Bioassay: Biosensing in Whole Blood Operating via Smartphone. *Analytical Chemistry*. 93 - 6, pp. 3112 - 3121. 03/02/2021.  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 16** Xin Yi Wong; Daniel Quesada-González; Sivakumar Manickam; Siu Yee New; Kasturi Muthoosamy; Arben Merkoçi. Integrating gold nanoclusters, folic acid and reduced graphene oxide for nanosensing of glutathione based on “turn-off” fluorescence. *Scientific Reports*. 11, pp. Article number: 2375. 27/01/2021.  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes





- 17** Amadeo Sena-Torralba; Duy Ba Ngo; Claudio Parolo; Liming Hu; Ruslan Álvarez-Diduk; José Francisco Bergua; Giulio Rosati; Werasak Surareungchai; Arben Merkoçi. Lateral flow assay modified with time-delay wax barriers as a sensitivity and signal enhancement strategy. *Biosensors and Bioelectronics*. 168, pp. 112559. 15/11/2020.  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** Yes
- 18** Carsten Weiss; Marie Carriere; Laura Fusco; Ilaria Capua; Jose Angel Regla-Nava; Matteo Pasquali; James A. Scott; Flavia Vitale; Mehmet Altay Unal; Cecilia Mattevi; Davide Bedognetti; Arben Merkoçi; Ennio Tasciotti; Açelya Yilmazer; Yury Gogotsi; Francesco Stellacci; Lucia Gemma Delogu. Toward Nanotechnology-Enabled Approaches against the COVID-19 Pandemic. *ACS Nano*. 14 - 6, pp. 6383 - 6406. 10/06/2020.  
**Type of production:** Scientific paper **Format:** Journal  
**Corresponding author:** No
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- 280** Georgina Alarcon-Ángeles; Giaan-Arturo Álvarez-Romero; Giulio Rosati; Claudio Parolo; Arben Merkoçi. Point-of-Care Sensors in Clinical Environments. Book: *Encyclopedia of Sensors and Biosensors*. 4, pp. 772 - 788. Elsevier, 03/10/2022. Available on-line at: <<https://www.sciencedirect.com/science/article/pii/B9780128225486001060?via%3Dihub>>. ISBN 978-0-12-822549-3  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes



- 281** Maria Maddalena Calabretta; Ruslan Álvarez-Diduk; Elisa Michelini; Arben Merkoçi. ATP Sensing Paper with Smartphone Bioluminescence-Based Detection. Book: Bioluminescence, Methods and Protocols. 2, pp. 297 - 307. SpringerLink, 15/07/2022. Available on-line at: <[https://link.springer.com/protocol/10.1007/978-1-0716-2473-9\\_23](https://link.springer.com/protocol/10.1007/978-1-0716-2473-9_23)>. ISBN 978-1-0716-2473-9  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes
- 282** Qiuyue Yang; Emily Nguyen; Cecília de Carvalho Castro e Silva; Giulio Rosati; Arben Merkoçi. Signal enhancement strategies. Book: Wearable Physical, Chemical and Biological Sensors Fundamentals, Materials and Applications. Chapter 5, pp. 123 - 168. Elsevier, 22/02/2022. Available on-line at: <<https://shop.elsevier.com/books/wearable-physical-chemical-and-biological-sensors/morales-narvaez/978-0-12-821661-3>>. ISBN 9780128232347  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes
- 283** Liming Hu; Andrea Idili; Claudio Parolo; Ruslan Álvarez-Diduk; Enric Calucho; Arben Merkoçi. Optical smartphone-based sensing: diagnostic of biomarkers. Book: The Detection of Biomarkers. Past, Present and the Future Prospects. Chapter 11, pp. 277 - 302. Elsevier, 08/12/2021. Available on-line at: <<https://www.sciencedirect.com/book/9780128228593/the-detection-of-biomarkers#book-info>>. ISBN 978-0-12-822859-3  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes
- 284** Enric Calucho; Claudio Parolo; Lourdes Rivas; Ruslan Álvarez-Diduk; Arben Merkoçi. Nanoparticle-based lateral flow assays. Comprehensive Analytical Chemistry. 89, pp. 313 - 359. ELSEVIER, 08/06/2020.  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes
- 285** Flavio Pino; Carmen C Mayorga Martínez; Arben Merkoçi. Nanomaterials based platforms platforms for environmental monitoring. Comprehensive Analytical Chemistry. 77, pp. 207 - 236. ELSEVIER, 2017.  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes
- 286** Sandrine Miserere; Arben Merkoçi. Microfluidic electrochemical biosensors; fabrication and applications. Lab-on-a-Chip and Micro Total Analysis Systems – A Practical Guide. 7, Springer, 2015.  
**Type of production:** Book chapter **Format:** Book
- 287** Marisol Espinoza-Castaneda; Alfredo de la Escosura-Muniz; Arben Merkoçi. Nanoparticle/Nanochannels-Based Electrochemical Biosensors. Electrospinning For High Performance Sensors. pp. 205 - 223. Springer, 2015.  
**Type of production:** Book chapter **Format:** Book  
**Corresponding author:** Yes
- 288** Alfredo de la Escosura-Muñiz; Arben Merkoçi. Application of Nanomaterials for DNA Sensing. Nucleic Acids Nanotechnology. 12, pp. 305 - 331. Springer, 2014.  
**Type of production:** Book chapter **Format:** Book
- 289** Georgina Alarcon-Angeles; G.A. Álvarez-Romero; Arben Merkoçi. Graphene and Carbon Nanotube-based Electrochemical Biosensors for Environmental Monitoring. Advanced Carbon Materials and Technology. Chapter 3, pp. 87. Wiley, 2014.  
**Type of production:** Book chapter **Format:** Book
- 290** G.A. Álvarez-Romero; Georgina Alarcon-Angeles; Arben Merkoçi. Graphene: Insights of its Application in Electrochemical Biosensors for Environmental Monitoring. Biosensors Nanotechnology, 5. pp. 111 - 140. Wiley, 2014.



**Type of production:** Book chapter

**Format:** Book

- 291** Arben Merkoçi; Alfredo de la Escosura Muñiz. Nanoparticles for DNA, protein and cells electrochemical detection. Nanomaterials for electrochemical sensing and biosensing. Chapter 6, pp. 209 - 242. Pan Stanford Publishing, 2014.

**Type of production:** Book chapter

**Format:** Book

**Corresponding author:** Yes

- 292** Claudio Parolo; Alfredo de la Escosura-Muñiz; Arben Merkoçi. Electrochemical DNA Sensors based on Nanoparticles. Electrochemical biosensors. Chapter 7, Pan Stanford Publishing, 2013.

**Type of production:** Book chapter

**Format:** Book

- 293** Jordi Pascual; Arben Merkoçi; Daniel MasPOCH; Victor Puentes; Aurora Conill. Nanotecnología: concepto y fundamentos. Nanotecnología en Medicina. 1, 2013.

**Type of production:** Book chapter

**Format:** Book

- 294** Sergio Marin; Arben Merkoçi. Electrochemical detection of DNA using nanomaterials based sensors. Detection of non amplified genomic DNA. Chapter 8, pp. 185 - 202. Springer, 2012.

**Type of production:** Book chapter

**Format:** Book

- 295** Mariana Medina Sánchez; Arben Merkoçi. Micro- And Nanomaterials Based Detection Systems Applied in Lab-On-A-Chip Technology. Handbook of Green Analytical Chemistry. doi: 10.1002/9781119 - Chapter 18, pp. 389 - 405. John Wiley & Sons, Ltd, 2012.

**Type of production:** Book chapter

**Format:** Book

- 296** Briza Pérez-López; Arben Merkoçi. Nanomaterials-based (bio)sensing systems for safety and security applications. "Biosensors for safety and security applications", D.P. Nikoilelis (ed.), Portable Chemical Sensors: Weapons Against Bioterrorism, 43 NATO Science for Peace and Security Series A: Chemistry and Biology, DOI 10.1007/978-94-007-2872-1\_3. 3, pp. 43 - 61. © Springer Science+B, 2012.

**Type of production:** Book chapter

**Format:** Book

- 297** Marisa Maltez; Alfredo de la Escosura; Arben Merkoçi. Nanoparticle induced catalysis for electrochemical DNA biosensors. Electrochemical DNA Biosensors. 5, pp. 141 - 162. Pan Stanford, 2012.

**Type of production:** Book chapter

**Format:** Book

- 298** Alfredo de la Escosura; Mariana Medina; Arben Merkoçi. New trends in DNA sensors for environmental applications. Nanomaterials, miniaturisation and lab-on-a-chip technology. Nucleic Acid Biosensors for Environmental Monitoring. 8, pp. 143 - 166. RSC Publishing, 2011.

**Type of production:** Book chapter

**Format:** Book

- 299** Arben Merkoçi; Adriano Ambrosi; Alfredo de la Escosura; Briza Pérez; Maria Guix; Marisa Maltez; Sergio Marín. Nanomaterials for Electroanalysis. Encyclopedia of Analytical Chemistry Arben Merkoçi, Adriano Ambrosi, Alfredo de la Escosura, Briza Pérez-López, Maria Guix, Marisa Maltez-da Costa, Sergio Marin. Wiley, 2010.

**Type of production:** Book chapter

**Format:** Book

- 300** María Teresa Castañeda; Salvador Alegret; Arben Merkoçi. Electrochemical Detection of DNA Hybridization Using Micro and Nanoparticles. Methods in Molecular Biology: Biosensors and Biodetection. 504 - 9, pp. 127. Humana Press, 2009.

**Type of production:** Book chapter

**Format:** Book

- 301** Alfredo de la Escosura; Adriano Ambrosi; Salvador Alegret; Arben Merkoçi. Electrochemical Immunosensing Using Micro and Nanoparticles. Methods in Molecular Biology: Biosensors and Biodetection. 504 - 10, pp. 145. Humana Press, 2009.



**Type of production:** Book chapter

**Format:** Book

- 302** Adriano Ambrosi; María Teresa Castañeda; Alfredo de la Escosura; Arben Merkoçi. Gold nanoparticles a powerful label for affinity electrochemical biosensors. *BIOSENSING USING NANOMATERIALS – BIONANO*. 6, Wiley-Interscience, 2009.

**Type of production:** Book chapter

**Format:** Book

- 303** Alfredo de la Escosura; Roza Allabashi; Arben Merkoçi. Inductively coupled plasma mass spectroscopy of nanoparticles. *New horizons for biosensing applications. BIOSENSING USING NANOMATERIALS – BIONANO*. 12, Wiley-Interscience, 2009.

**Type of production:** Book chapter

**Format:** Book

- 304** Raul Cartas; Laura Moreno; Arben Merkoçi; Salvador Alegret; Manel del Valle; J.M. Gutiérrez; L. Leija; P.R. Hernández; R. Muñoz. Multivariate Calibration Model for a Voltammetric Electronic Tongue Based on a Multiple Output Wavelet Neural Network. *Biologically Inspired Signal Processing for Chemical Sensing, Studies in Computational Intelligence*. 188 - 9, pp. 137 - 164. Springer, 2009.

**Type of production:** Book chapter

**Format:** Book

- 305** Briza Pérez; Arben Merkoçi. Application of carbon nanotubes in analytical chemistry. *Chemistry of Carbon Nanotubes*. 2, American Scientific Publishers, 2008.

**Type of production:** Book chapter

**Format:** Book

- 306** Martin Pumera; Arben Merkoçi; Salvador Alegret. Analysis of nitroaromatic explosives with microchip electrophoresis using a graphite–epoxy composite detector. *Electrochemical Sensor Analysis”, Comprehensive Analytical Chemistry*. 49 - Procedure 49, pp. e351. Elsevier, 2007.

**Type of production:** Book chapter

**Format:** Book

- 307** María Teresa Castañeda; Martin Pumera; Salvador Alegret; Arben Merkoçi. DNA analysis by using gold nanoparticle labels. *Electrochemical Sensor Analysis”, Comprehensive Analytical Chemistry*. 49 - Procedure 53, pp. e381. Elsevier, 2007.

**Type of production:** Book chapter

**Format:** Book

- 308** Arben Merkoçi; Ülkü Anik; Salvador Alegret. Determination of lead and cadmium in tap water and soils by stripping analysis using mercury-free graphite–epoxy composite electrodes. *Electrochemical Sensor Analysis”, Comprehensive Analytical Chemistry*. 49 - Procedure 7, pp. e47. Elsevier, 2007.

**Type of production:** Book chapter

**Format:** Book

- 309** María Teresa Castañeda; Salvador Alegret; Arben Merkoçi. Gold nanoparticles in DNA and protein analysis. *Electrochemical Sensor Analysis”, Comprehensive Analytical Chemistry*. 49 - 38, pp. 941. Elsevier, 2007.

**Type of production:** Book chapter

**Format:** Book

- 310** Salvador Alegret; Arben Merkoçi. Graphite-epoxy electrodes for stripping analysis. *Electrochemical Sensor Analysis”, Comprehensive Analytical Chemistry*,. 49 - 7, pp. 143. Elsevier, 2007.

**Type of production:** Book chapter

**Format:** Book

- 311** Arjan Durresi; Arben Merkoçi; Mimoza Durresi; Leonard Barolli. Integrated Biomedical System for Ubiquitous Health Monitoring. *Network-Based Information Systems (NBIS 2007). Lecture Notes in Computer Science (LNCS)*. 4658, pp. 397. Springer-Verlag, 2007.

**Type of production:** Book chapter

**Format:** Book

- 312** Martin Pumera; Arben Merkoçi; Salvador Alegret. Microchip electrophoresis/electrochemistry systems for analysis of nitroaromatic explosives. *Electrochemical Sensor Analysis”, Comprehensive Analytical Chemistry*. 49 - 35, pp. 873. Elsevier, 2007.



**Type of production:** Book chapter

**Format:** Book

- 313** Salvador Alegret; Arben Merkoçi. Quantum dots (QDs) as tracers for DNA electrochemical sensing systems. Nanotechnology in Biology and Medicine. Methods, Devices and Applications. 26, pp. 1. CRC Press, 2007.

**Type of production:** Book chapter

**Format:** Book

- 314** Arben Merkoçi. Application of nanomaterials in the design of new electrochemical sensors and biosensors. Desafíos de la sociedad Científico Tecnológico Actual. pp. 361 - 385. Fundación General de la Universidad Complutense de Madrid, 2006. ISBN 84-608-0418-6

**Type of production:** Book chapter

**Format:** Book

- 315** Salvador Alegret; Arben Merkoçi; Maria Isabel Pividori; Manel del Valle. Electrochemical (bio)sensors based on rigid conducting carbon-polymer composites. Encyclopedia of Sensors, The Pennsylvania State University, University Park, USA.3, pp. 23 - 44. American Scintific Publishers, 2006.

**Type of production:** Book chapter

**Format:** Book

- 316** Nanoscience and nanotechnology. Applications in different fields including that of biosensors. ANASH. 1, pp. 4. 2006.

**Type of production:** Book chapter

**Format:** Book

- 317** Arben Merkoçi; Maria Teresa Castañeda; Salvador Alegret. Stripping analysis of heavy metals by using mercury free composite based sensors. Pure & Applied Analytical Chemistry. pp. 1 - 22. Research SignPost, 2005.

**Type of production:** Book chapter

**Format:** Book

- 318** Salvador Alegret; Arben Merkoçi. Composite and biocomposite materials for electrochemical sensing. Integrated analytical systems. pp. 377 - 412. Elsevier, 2003. ISBN 0-444-51037-0

**Type of production:** Book chapter

**Format:** Book

- 319** BIOSENSING USING NANOMATERIALS – BIONANO. Wiley-Interscience, 2009. ISBN 978-0-470-18309-0

**Type of production:** Scientific book or monograph

**Format:** Book

**Degree of contribution:** Editor or co-editor

- 320** Salvador Alegret; Arben Merkoçi. "Electrochemical Sensor Analysis", Comprehensive Analytical Chemistry. 49, Elsevier, 2007.

**Type of production:** Scientific book or monograph

**Format:** Book

**Degree of contribution:** Editor or co-editor

- 321** salvador Alegret; Manel del Valle; Arben Merkoçi. Sensores Electroquímicos. Universitat Autònoma de Barcelona, Servei de publicacions, 2004. ISBN 84-490-2361-0

**Type of production:** Scientific book or monograph

**Format:** Book

- 322** Man Bock Gu; Chenzhong Li; Arben Merkoçi. Editorial note - Professor Turner's retirement. Biosensors and Bioelectronics. 150, pp. 111913. ELSEVIER, 15/02/2020.

**Type of production:** Scientific edition

**Format:** Journal

**Corresponding author:** Yes

- 323** Ana Rubio-Monterde; Daniel Quesada-González; Arben Merkoçi. Toward Integrated Molecular Lateral Flow Diagnostic Tests Using Advanced Micro- and Nanotechnology. Analytical Chemistry. 95 - 1, pp. 468 - 489. ACS Publications, 22/11/2022. Available on-line at: <<https://pubs.acs.org/doi/abs/10.1021/acs.analchem.2c04529>>.

**Type of production:** Review

**Format:** Journal

**Corresponding author:** Yes

- 324** Amadeo Sena-Torrallba; Ruslan Álvarez-Diduk; Claudio Parolo; Andrew Piper; Arben Merkoçi. Toward Next Generation Lateral Flow Assays: Integration of Nanomaterials. *Chem. Rev.* 2022. 122 - 18, pp. 14881 - 14910. 06/09/2022. Available on-line at: <<https://pubs.acs.org/doi/full/10.1021/acs.chemrev.1c01012>>.  
**DOI:** 10.1021/acs.chemrev.1c01012  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** Yes
- 325** Claudia Pereira; Claudio Parolo; Andrea Idili; Roger R. Gomis; Lígia Rodrigues; Goreti Sales; Arben Merkoçi. Paper-based biosensors for cancer diagnostics. *Trends in Chemistry.* 4 - 6, pp. 554 - 567. ELSEVIER, 01/06/2022. Available on-line at: <<https://www.sciencedirect.com/science/article/abs/pii/S2589597422000788>>.  
**DOI:** 10.1016/j.trechm.2022.03.005  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** Yes
- 326** Mohammad Amin Farahmand Nejad; Saba Ranjbar; Claudio Parolo; Emily P. Nguyen; Ruslan Álvarez-Diduk; Mohammad Reza Hormozi-Nezhad; Arben Merkoçi. Electrochromism: An emerging and promising approach in (bio)sensing technology. *Materials Today.* 50, pp. 476 - 498. ELSEVIER, 09/12/2021. Available on-line at: <<https://www.sciencedirect.com/science/article/abs/pii/S1369702121002236#!>>.  
**DOI:** 10.1016/j.mattod.2021.06.015  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** Yes
- 327** Sruthi Prasood Usha; Hariharan Manoharan; Rehan Deshmukh; Ruslan Alvarez-Diduk; Enric Calucho; V. V. R Sai; Arben Merkoçi. Attomolar analyte sensing techniques (AttoSens): a review on a decade of progress on chemical and biosensing nanoplatfoms. *CHEMICAL SOCIETY REVIEWS.* 50 - 23, pp. 13012 - 13089. 29/11/2021.  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** Yes
- 328** Giulio Rosati; Andrea Idili; Clauio Parolo; Celia Fuentes-Chust; Enric Calucho; Liming Hu; Cecilia de Carvalho Castro E Silva; Lourdes Rivas; Emily P Nguyen; Jose F Bergua; Ruslan Alvarez-Diduk; José Muñoz; Christophe Junot; Oriol Penon; Dominique Monferrer; Emmanuele Delamarche; Arben Merkoçi. Nanodiagnosics to Face SARS-CoV-2 and Future Pandemics: From an Idea to the Market and Beyond. *ACS Nano.* 15, pp. 17137 - 17149. 27/10/2021.  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** Yes
- 329** Celia 13. Fuentes-Chust; Claudio Parolo; Giulio Rosati; Lourdes Rivas; Karla Perez-Toralla; Stephanie Simon; Itziar de Lecuona; Christophe Junot; Jonel Trebicka; Arben Merkoçi. The Microbiome Meets Nanotechnology: Opportunities and Challenges in Developing New Diagnostic Devices. *ADVANCED MATERIALS.* 33 - 18, pp. 2006104. 14/03/2021.  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** Yes
- 330** Hatice Ceren Ates; Anna Brunauer; Felix von Stetten; Gerald A. Urban; Firat Güder; Arben Merkoçi; Susanna Maria Früh; Can Dincer. Integrated Devices for Non-Invasive Diagnostics. *Advanced Funtional Materials.* pp. 202010388. 04/01/2021.  
**Type of production:** Review **Format:** Journal  
**Corresponding author:** No
- 331** Claudio Parolo; Amadeo Sena-Torrallba; José Francisco Bergua; Enric Calucho; Cèlia Fuentes-Chust; Liming Hu; Lourdes Rivas; Ruslan Álvarez-Diduk; Emily P. Nguyen; Stefano Cinti; Daniel Quesada-González; Arben Merkoçi. Tutorial: design and fabrication of nanoparticle-based lateral-flow immunoassays. *Nature Protocols.* 15, pp. 3788 - 3816. Springer Nature Limited, 23/10/2020.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 332** Emily P. Nguyen; Cecilia de Carvalho Castro Silva; Arben Merkoçi. Recent advancement in biomedical applications on the surface of two-dimensional materials: From biosensing to tissue engineering. *Nanoscale*. 12 - 37, pp. 19043 - 19067. 22/09/2020.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 333** Jing Kou; Emily P. Nguyen; Arben Merkoçi; Zhenzhong Guo. 2-dimensional materials-based electrical/optical platforms for smart on-off diagnostics applications. *2D Materials*. 7 - 3, pp. 032001. IOP Publishing, 10/06/2020.

**Type of production:** Review  
**Corresponding author:** No

**Format:** Journal

- 334** Can Dincer; Richard Bruch; Estefanía Costa-Rama; Maria Teresa Fernández-Abedul; Arben Merkoçi; Andreas Manz; Gerald Anton Urban; Firat Güder. Disposable Sensors in Diagnostics, Food, and Environmental Monitoring. *Advanced Materials*. 31 - 30, pp. 1806739. WILEY, 26/07/2019.

**Type of production:** Review  
**Corresponding author:** No

**Format:** Journal

- 335** Daniel Quesada-González; Arben Merkoçi. Nanomaterial-based devices for point-of-care diagnostic applications. *Chemical Society Reviews*. 47 - 13, pp. 4697 - 4709. Royal Society of Chemistry, 07/07/2018.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 336** Hamed Golmohammadi; Eden Morales Narvaez; Tina Naghdi; Arben Merkoçi. Nanocellulose in Sensing and Biosensing. *Chemistry of Materials*. 29 - 13, pp. 5426 - 5446. ACS Publications, 09/06/2017.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 337** Adaris M. López Marzo; Arben Merkoçi. Paper-based sensors and assays: a success of the engineering design and the convergence of knowledge areas. *Lab on chip*. 16, pp. 3150 - 3176. RSC, 28/06/2016.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 338** Alfredo de la Escosura-Muñiz; Arben Merkoçi. Nanochannels for electrical biosensing. *TrAC Trends in Analytical Chemistry*. 79, pp. 134 - 150. Elsevier, 2016.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 339** Andrzej Chałupniak; Eden Morales-Narváez; Arben Merkoçi. Micro and nanomotors in diagnostics. *Advanced Drug Delivery Reviews*. 95, pp. 104 - 116. Elsevier, 2015.

**Type of production:** Review  
**Corresponding author:** Yes

**Format:** Journal

- 340** Maria Guix; Carmen C. Mayorga-Martinez; Arben Merkoçi. Nano/Micromotors in (Bio)chemical Science Applications. *Chemical Reviews*, 114 (12), 6285–6322. 114 - 12, pp. 6285 - 6322. ACS Publications, 2014.

**Type of production:** Review

- 341** Arben Merkoçi; Chen-zhong Li; Laura Lechuga; Aydogan Ozcan. Editorial on COVID-19 biosensing technologies-2d Edition. *Biosensors and Bioelectronics*. 212 - 114340, ELSEVIER, 15/09/2022. Available on-line at: <<https://www.sciencedirect.com/journal/biosensors-and-bioelectronics/special-issue/10WR5Z3BX9P>>.



**DOI:** 10.1016/j.bios.2022.114340

**Type of production:** Editorial

**Format:** Journal

**Corresponding author:** Yes

- 342** Arben Merkoçi. Smart nanobiosensors in agriculture. *Nature Food*. 2 - 12, pp. 920 - 921. Springer Nature, 13/12/2021. Available on-line at: <<https://www.nature.com/articles/s43016-021-00426-2>>.

**DOI:** 10.1038/s43016-021-00426-2

**Type of production:** News & Views

**Format:** Journal

**Corresponding author:** Yes

- 343** Arben Merkoçi; Chen-zhong Li; Laura M. Lechuga; Aydogan Ozcan. COVID-19 biosensing technologies. *Biosensors and Bioelectronics*. 178, pp. 113046. 15/04/2021.

**Type of production:** Editorial

**Format:** Journal

**Corresponding author:** Yes

- 344** Arben Merkoçi. Graphene-based biosensors. *2D Materials*. 7 - 4, pp. 040401. IOP Publishing, 21/07/2020.

**Type of production:** Editorial

**Format:** Journal

**Corresponding author:** Yes

- 345** Arben Merkoçi. Electroanalysis-Based Clinical Diagnostics. *Electroanalysis*. 26 - 6, pp. 1110 - 1110. Wiley, 2014.

**Type of production:** Editorial

**Format:** Journal

- 346** Arben Merkoçi. Nanobiomaterials in Electroanalysis. *Electroanalysis*. 19, pp. 739. Wiley, 2007.

**Type of production:** Editorial

**Format:** Journal

## Works submitted to national or international conferences

- 1** **Title of the work:** Nanotech-based Diagnostics Devices: Designs and Applications

**Name of the conference:** talk at China University of Petroleum

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line,

**Date of event:** 05/12/2022

**End date:** 05/12/2022

**Organising entity:** China University of Petroleum

Arben Merkoçi.

- 2** **Title of the work:** Sustainable and Democratized Nanotech-based Diagnostics Devices

**Name of the conference:** Insights in Technology conference

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Bremen, Germany

**Date of event:** 27/11/2022

**End date:** 29/11/2022

Arben Merkoçi.





- 3** **Title of the work:** Nanobiosensors for environment diagnostics  
**Name of the conference:** International Conference On Engineering And Applied Sciences ICEAS 2022  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 17/11/2022  
**End date:** 18/11/2022  
Arben Merkoçi.
- 4** **Title of the work:** Sustainable and Democratized Nanotech-based Diagnostics  
**Name of the conference:** PuzzleX 2022  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 14/11/2022  
**End date:** 14/11/2022  
Arben Merkoçi.
- 5** **Title of the work:** Nanobiosensors, as effective tools for diagnostics.  
**Name of the conference:** 4th EURASIA BIOCHEMICAL APPROACHES & TECHNOLOGIES (EBAT) CONGRESS  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 03/11/2022  
**End date:** 06/11/2022  
Arben Merkoçi.
- 6** **Title of the work:** Nanobiosensors platforms for diagnostics applications  
**Name of the conference:** Invited talk at KAUST  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Saudi Arabia  
**Date of event:** 31/10/2022  
**End date:** 04/11/2022  
Arben Merkoçi.
- 7** **Title of the work:** REASSURED Nanobiosensors for Ubiquitous Diagnostics  
**Name of the conference:** 4TH INTERNATIONAL CONFERENCE ON NANOMATERIALS - RESEARCH & APPLICATION  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Brno, Czech Republic  
**Date of event:** 19/10/2022  
**End date:** 21/10/2022  
Arben Merkoçi.



- 8** **Title of the work:** Nanobiosensors for diagnostics  
**Name of the conference:** Talk at CATRIN –ICN2 WORKSHOP  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Olomouc, Czech Republic  
**Date of event:** 17/10/2022  
**End date:** 18/10/2022  
Arben Merkoçi.
- 9** **Title of the work:** Nanobiosensors for point of care diagnostics applications  
**Name of the conference:** 5th International Congress on Biosensors  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Çanakkale, Turkey  
**Date of event:** 21/09/2022  
**End date:** 23/09/2022  
Arben Merkoçi.
- 10** **Title of the work:** Nanobiosensors for diagnostics  
**Name of the conference:** BIOMAD Workshop  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Bari, Italy  
**Date of event:** 15/09/2022  
**End date:** 16/09/2022  
Arben Merkoçi.
- 11** **Title of the work:** Ubiquitous nanobiosensors technologies for REASSURED diagnostics applications  
**Name of the conference:** NANO-TR-16  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 05/09/2022  
**End date:** 08/09/2022  
Arben Merkoçi.
- 12** **Title of the work:** DESIGN AND APPLICATION OF NANOBIOSENSORS  
**Name of the conference:** Summer School, Universidad de los Andes  
**Type of event:** Summer School  
**Type of participation:** Participatory - others  
**Corresponding author:** Yes  
**City of event:** Bogotá, Colombia  
**Date of event:** 18/07/2022  
**End date:** 27/07/2022  
**Organising entity:** Universidad de los Andes  
Arben Merkoçi.



- 13** **Title of the work:** Graphene-based biosensors for diagnostics  
**Name of the conference:** Graphene2022  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Aachen, Germany  
**Date of event:** 28/06/2022  
**End date:** 01/07/2022  
Arben Merkoçi.
- 14** **Title of the work:** Nanobiosensors and their use in the service of human health and the protection of nature  
**Name of the conference:** Invited talk at University of Prishtina  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Prishtina,  
**Date of event:** 23/06/2022  
**End date:** 23/06/2022  
Arben Merkoçi.
- 15** **Title of the work:** Cost effective nanobiosensors for diagnostics: towards democratization of evidence-based health care  
**Name of the conference:** Select BIO Point-of-Care and Mobile Diagnostics 2022  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Rotterdam, Holland  
**Date of event:** 21/06/2022  
**End date:** 22/06/2022  
Arben Merkoçi.
- 16** **Title of the work:** Nanobiosensors as cost effective diagnostics devices for point of care applications  
**Name of the conference:** NanoCanada Conference  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Edmonton, Alberta, Canada  
**Date of event:** 08/06/2022  
**End date:** 10/06/2022  
Arben Merkoçi.
- 17** **Title of the work:** Nanobiosensors for nano diagnostics: Progress and Opportunities  
**Name of the conference:** Invited talk at UMass Lowell  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** United States of America  
**Date of event:** 06/06/2022  
**End date:** 06/06/2022  
Arben Merkoçi.



- 18** **Title of the work:** Nanobiosensors for targeted diagnostics  
**Name of the conference:** Invited talk at Giner Inc, Newton Ma, USA  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Newton, Massachusetts, United States of America  
**Date of event:** 02/06/2022  
**End date:** 02/06/2022  
Arben Merkoçi.
- 19** **Title of the work:** Nanobiosensors as efficient and sustainable tools for democratizing our current environment monitoring system  
**Name of the conference:** 5th SDEWES SEE Conference  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Vlora, Albania  
**Date of event:** 22/05/2022  
**End date:** 26/05/2022  
Arben Merkoçi.
- 20** **Title of the work:** Nanobiosensors for diagnostics applications: from optical to electrical-based cost/efficient devices  
**Name of the conference:** Invited talk at Department of Chemistry, University of Pavia  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Pavia, Italy  
**Date of event:** 31/03/2022  
**End date:** 31/03/2022  
Arben Merkoçi.
- 21** **Title of the work:** Nanobiosensors for Diagnostics: From Standalone to Wearable Devices  
**Name of the conference:** Sensors Global Summit 2022  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** La Jolla, San Diego, United States of America  
**Date of event:** 02/03/2022  
**End date:** 03/03/2022  
Arben Merkoçi.
- 22** **Title of the work:** Nanobiosensors for diagnostics  
**Name of the conference:** CSB SPECIAL SEMINAR, Center for Systems Biology, Massachusetts General Hospital, Richard B. Simches Research Center. Harvard University  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Boston, United States of America  
**Date of event:** 01/12/2021



**End date:** 01/12/2021

Arben Merkoçi.

- 23 Title of the work:** Graphene-based materials for biosensing platforms  
**Name of the conference:** 2021 FALL Meeting & EXHBIT / Boston USA  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Boston, United States of America  
**Date of event:** 29/11/2021  
**End date:** 02/12/2021  
Arben Merkoçi.

- 24 Title of the work:** Lateral flow paper-based nanobiosensors for diagnostics applications  
**Name of the conference:** Imagine NanoSpain Conference  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Bilbao, Basque Country, Spain  
**Date of event:** 23/11/2021  
**End date:** 25/11/2021  
Arben Merkoçi.

- 25 Title of the work:** Nanobiosensors for point of care diagnostics applications  
**Name of the conference:** on-line: Biological and Environmental Science and Engineering Division, King Abdullah University of Science and Technology (KAUST)  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Saudi Arabia  
**Date of event:** 23/11/2021  
**End date:** 23/11/2021  
Arben Merkoçi.

- 26 Title of the work:** Nanotech Diagnostics Going Simple  
**Name of the conference:** PUZZLE X  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 17/11/2021  
**End date:** 17/11/2021  
Arben Merkoçi.

- 27 Title of the work:** Nanobiosensors for diagnostics  
**Name of the conference:** DCEX Seminar at Universitat Pompeu Fabra  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 15/11/2021



**End date:** 15/11/2021

**Organising entity:** Universitat Pompeu Fabra  
Arben Merkoçi.

- 28** **Title of the work:** Biomedical diagnostics at point-of-care: from devices development to applications in clinical analysis  
**Name of the conference:** The 13th International Congress of Pharmaceutical Sciences CIFARP (on-line)  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Ribeirão Preto, Brazil  
**Date of event:** 03/11/2021  
**End date:** 06/11/2021  
Arben Merkoçi.
- 29** **Title of the work:** NANOBIOSENSORS FOR POINT-OF-CARE DIAGNOSTICS APPLICATIONS  
**Name of the conference:** XVIIth International Symposium PRIOCHEM "Priorities of Chemistry for a Sustainable Development"  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Bucharest, Romania  
**Date of event:** 27/10/2021  
**End date:** 29/10/2021  
**Organising entity:** National Institute of Research-Development for Chemistry and Petrochemistry - ICECHIM Bucharest  
Arben Merkoçi.
- 30** **Title of the work:** Graphene-related materials for biosensing platforms  
**Name of the conference:** Graphene 2021  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Grenoble, France  
**Date of event:** 26/10/2021  
**End date:** 29/10/2021  
Arben Merkoçi.
- 31** **Title of the work:** Nanomaterials Based Biosensors for Diagnostics  
**Name of the conference:** TNT2021  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Tirana, Albania  
**Date of event:** 04/10/2021  
**End date:** 08/10/2021  
Arben Merkoçi.
- 32** **Title of the work:** My nanotechnology story  
**Name of the conference:** TEDx Tirana official talk  
**Type of event:** Seminar



**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Tirana, Albania

**Date of event:** 19/09/2021

**End date:** 19/09/2021

Arben Merkoçi.

- 33** **Title of the work:** REASSURED paper-based nanobiosensors for diagnostic  
**Name of the conference:** #NPTO2021, The 2nd edition of the NanoPT Online conference (NPTO2021)  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 16/09/2021  
**End date:** 16/09/2021  
Arben Merkoçi.
- 34** **Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** 22nd Annual Conference on Material Science - YUKOMAT 2021.  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Herceg Novi, Montenegro  
**Date of event:** 30/08/2021  
**End date:** 05/09/2021  
Arben Merkoçi.
- 35** **Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** Universitat Internacional de Catalunya  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** arcelona, Catalonia, Spain  
**Date of event:** 23/07/2021  
**End date:** 23/07/2021  
Arben Merkoçi.
- 36** **Title of the work:** Nanobiosensors for diagnostics  
**Name of the conference:** ViBrANT2021 conference on the interdisciplinary research into viral and bacterial adhesion  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 16/07/2021  
**End date:** 16/07/2021  
Arben Merkoçi.



- 37** **Title of the work:** Nanobiosensores de papel para el diagnóstico: de la investigación básica a la creación de una spin-off  
**Name of the conference:** Workshop Sensores para la Sociedad: del laboratorio al mercado, Red Nacional de Sensores y Biosensores Ópticos  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Oviedo, Principality of Asturias, Spain  
**Date of event:** 28/06/2021  
**End date:** 28/06/2021  
Arben Merkoçi.
- 38** **Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** 13th International Symposium on Pharmaceutical Sciences (ISOPS)  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Ankara, Turkey  
**Date of event:** 22/06/2021  
**End date:** 25/06/2021  
Arben Merkoçi.
- 39** **Title of the work:** Nanobiosensors for industrial applications  
**Name of the conference:** 3rd International Week of Industrial Innovation in Electrochemistry - III S3IE during the “Smart BioSensors” session  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 17/06/2021  
**End date:** 17/06/2021  
Arben Merkoçi.
- 40** **Title of the work:** Nanobiosensors for point of care diagnostics applications  
**Name of the conference:** SMARTMAT Academic Seminar  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** webinar,  
**Date of event:** 08/06/2021  
**End date:** 08/06/2021  
Arben Merkoçi.
- 41** **Title of the work:** Nanomaterials-based sensors for diagnostics applications  
**Name of the conference:** 3rd edition of NeXT-CHEM workshop  
**Type of event:** Workshop  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 28/05/2021  
**End date:** 28/05/2021





Arben Merkoçi.

- 42** **Title of the work:** Sensing and biosensing using Graphene-based materials  
**Name of the conference:** 8th International Symposium on Sensor Science”, Part of the International Symposium on Sensor Science (I3S) series  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 26/05/2021  
**End date:** 26/05/2021  
Arben Merkoçi.
- 43** **Title of the work:** Advances in addressing challenges of point-of-care diagnostics through REASSURED nanobiosensors  
**Name of the conference:** Center for the Advancement of Integrated Medical & Engineering Sciences  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Sweden  
**Date of event:** 21/04/2021  
**End date:** 21/04/2021  
Arben Merkoçi.
- 44** **Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** The Chemist’s Interactions  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** webinar,  
**Date of event:** 16/04/2021  
**End date:** 16/04/2021  
**Organising entity:** Department of Chemistry of the Università degli Studi di Milano  
Arben Merkoçi.
- 45** **Title of the work:** Nanobiosensors for point-of-care diagnostics applications  
**Name of the conference:** The Barcelona-Grenoble-Tsukuba “Clustering and Global Challenges” (CGC2021) international online conference  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line,  
**Date of event:** 09/04/2021  
**End date:** 09/04/2021  
Arben Merkoçi.
- 46** **Title of the work:** Nanobiosensores a base de plataformas de papel y plástico como dispositivos de bajo coste y eficientes con la posibilidad de ser conectados con un teléfono móvil para el diagnóstico de COVID-19  
**Name of the conference:** Ciclo: Lunes de Ciencia: Salud Global  
**Type of event:** Seminar



**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 15/03/2021  
**End date:** 15/03/2021  
Arben Merkoçi.

**47** **Title of the work:** Nanobiosensors for diagnostics  
**Name of the conference:** World Nano Congress on Advanced Science and Technology - WNCST 2021  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 08/03/2021  
**End date:** 13/03/2021  
Arben Merkoçi.

**48** **Title of the work:** Advances in low cost and efficient electro/optical nanobiosensors connected via a smartphone for COVID19 biomarkers detection  
**Name of the conference:** International Workshop "SARS-CoV-2: Online Meeting on Detection Systems  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 20/01/2021  
**End date:** 20/01/2021  
Arben Merkoçi.

**49** **Title of the work:** Sensing and biosensing using graphene-based materials  
**Name of the conference:** 2nd Symposium on 2D Nanomaterials, Graphene, Devices and Applications  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 03/12/2020  
**End date:** 04/12/2020  
Arben Merkoçi.

**50** **Title of the work:** Nanobiosensors for environment diagnostics  
**Name of the conference:** WIRC Water Colloquium Online  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 19/11/2020  
**End date:** 19/11/2020  
Arben Merkoçi.

**51** **Title of the work:** Graphene-based materials in sensors and biosensors  
**Name of the conference:** GrapheneCanada Online Conference  
**Type of event:** Conference



**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 16/11/2020

**End date:** 17/11/2020

Arben Merkoçi.

**52 Title of the work:** Nanobiosensors for diagnostics applications

**Name of the conference:** Sensors in Medicine

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 20/10/2020

**End date:** 23/10/2020

**53 Title of the work:** Graphene & Biosensors

**Name of the conference:** GrapChina

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 16/10/2020

**End date:** 18/10/2020

Arben Merkoçi.

**54 Title of the work:** Nanobiosensors for applications in clinical diagnostics, environment, safety and security fields

**Name of the conference:** IV Colombian Congress of Electrochemistry, IVCCEQ2020

**Type of event:** Conference

**Type of participation:** Participatory - Plenary session

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 06/10/2020

**End date:** 07/10/2020

Arben Merkoçi.

**55 Title of the work:** Cost/efficient graphene-based platforms for biosensing applications

**Name of the conference:** ImagineNano 2020

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Bilbao, Basque Country, Spain

**Date of event:** 29/09/2020

**End date:** 01/10/2020

Arben Merkoçi.

**56 Title of the work:** Nanobiosensors for Diagnostics Applications

**Name of the conference:** Point-of-Care Diagnostics, Global Health & Biosensors 2020, SelectBIO Online conference

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 28/09/2020

**End date:** 30/09/2020

Arben Merkoçi.

**57 Title of the work:** Research Internalisation, collaboration as key factors for success in science

**Name of the conference:** Post Centenary 150th year Celebrations of Mahatma Gandhiji

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 10/09/2020

**End date:** 10/09/2020

Arben Merkoçi.

**58 Title of the work:** Nanobiosensors for diagnostics applications

**Name of the conference:** Seminar at the Biomedical Engineering Department at Mahidol University

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 01/09/2020

**End date:** 01/09/2020

Arben Merkoçi.

**59 Title of the work:** Nanobiosensors for point of care applications

**Name of the conference:** NanoBioMed Online Conference, NBMO2020

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 10/07/2020

**End date:** 10/07/2020

Arben Merkoçi.

**60 Title of the work:** Paper-based nanobiosensors as point of care for pathogens detection

**Name of the conference:** Virtual Seminar Cycle: SARS-CoV2 Pandemic Research Initiative

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** on-line event,

**Date of event:** 02/07/2020

**End date:** 02/07/2020

Arben Merkoçi.

**61 Title of the work:** Paper-based naobiosensors as point of care for pathogens detection

**Name of the conference:** Seminar at University of Rio de Janeiro

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 02/07/2020  
**End date:** 02/07/2020  
Arben Merkoçi.

**62 Title of the work:** Paper-based nanobiosensors as point of care for pathogens detection  
**Name of the conference:** Biosensors for Pandemics  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** on-line event,  
**Date of event:** 06/05/2020  
**End date:** 06/05/2020  
Arben Merkoçi.

**63 Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** Seminar at Imperial College  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** London, United Kingdom  
**Date of event:** 09/03/2020  
**End date:** 10/03/2020  
Arben Merkoçi.

**64 Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** Seminar at Indian Institute of Technologu Madras, IIT  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Chennai, India  
**Date of event:** 03/03/2020  
**End date:** 03/03/2020  
Arben Merkoçi.

**65 Title of the work:** Nanomaterial-based sensors for diagnostics applications  
**Name of the conference:** Seminar at University College Cork  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Cork, Ireland  
**Date of event:** 12/02/2020  
**End date:** 12/02/2020  
Arben Merkoçi.

**66 Title of the work:** Nanodiagnosics: from multidimensional nanomaterials-based biosensing to nanotheranostics  
**Name of the conference:** Seminar at DSCM, Dottorato in Scienze Chimiche e dei Materiali, University of Pisa  
**Type of event:** Seminar



**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Pisa, Italy

**Date of event:** 05/02/2020

**End date:** 05/02/2020

Arben Merkoçi.

**67 Title of the work:** Graphene-based devices for health diagnostics, environment control, safety and security

**Name of the conference:** NanoTech2020 International Nanotechnology Exhibition and Conference

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Tokio, Japan

**Date of event:** 31/01/2020

Arben Merkoçi.

**68 Title of the work:** Nanobiosensors for diagnostics applications: paper-based platforms

**Name of the conference:** NANOTECHNOLOGIES FOR 21st CENTURY COOPERATION EVENT BETWEEN ALBANIA, JAPAN AND SPAIN

**Type of event:** Workshop

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Tokio, Japan

**Date of event:** 29/01/2020

**End date:** 29/01/2020

Arben Merkoçi.

**69 Title of the work:** Graphene-based biosensors for diagnostics applications

**Name of the conference:** 1&2DM International Conference 2020

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Tokyo, Japan

**Date of event:** 28/01/2020

Arben Merkoçi.

**70 Title of the work:** Nanobiosensors for diagnostics applications

**Name of the conference:** Seminar at Department of Information Engineering, University of Padova

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Padua, Italy

**Date of event:** 08/01/2020

**End date:** 08/01/2020

Arben Merkoçi.

**71 Title of the work:** Graphene-based biosensors for diagnostics

**Name of the conference:** MicroNanoConference 2019 (iMNC19)

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Utrecht, Holland

**Date of event:** 10/12/2019

**End date:** 11/12/2019

Arben Merkoçi.



- 72** **Title of the work:** Nanobiosensors for food safety and security and environment applications  
**Name of the conference:** XVIII workshop rapid methods and automation in food microbiology  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Spain  
**Date of event:** 26/11/2019  
**End date:** 29/11/2019  
Arben Merkoçi.
- 73** **Title of the work:** Paper-based nanobiosensors: diagnostics going simple  
**Name of the conference:** NanoBio&Med 2019  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Spain  
**Date of event:** 19/11/2019  
**End date:** 21/11/2019  
Arben Merkoçi.
- 74** **Title of the work:** Graphene-based biosensors for diagnostics  
**Name of the conference:** 5th Graphene Flagship Korea-EU Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Seoul, Democratic People's Republic of Korea  
**Date of event:** 21/10/2019  
**End date:** 23/10/2019  
Arben Merkoçi.
- 75** **Title of the work:** Paper-based Nanobiosensors: Diagnostics Going Simple  
**Name of the conference:** Point-of-Care Diagnostics, Global Health & Biosensors 2019  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** San Diego, United States of America  
**Date of event:** 07/10/2019  
**End date:** 09/10/2019  
Arben Merkoçi.
- 76** **Title of the work:** Graphene-based biosensors for diagnostics  
**Name of the conference:** "Graphene and 2D Materials" Brazil International Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Rio de Janeiro, Brazil  
**Date of event:** 09/09/2019  
**End date:** 10/09/2019  
Arben Merkoçi.
- 77** **Title of the work:** Graphene-based biosensors  
**Name of the conference:** Euroanalysis XX Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Istanbul, Turkey  
**Date of event:** 02/09/2019  
**End date:** 05/09/2019  
Arben Merkoçi.



- 78** **Title of the work:** Paper-based nanobiosensors  
**Name of the conference:** Editorial Session: ELSEVIER BIOSENSORS AND BIOELECTRONICS, at Euroanalysis XX Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Istanbul, Turkey  
**Date of event:** 02/09/2019  
**End date:** 05/09/2019  
Arben Merkoçi.
- 79** **Title of the work:** Nanobiosensors for diagnostics: from health, environment to safety and security applications  
**Name of the conference:** CIS2019 Conference "Chemistry meets Industry and Society"  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Salerno, Italy  
**Date of event:** 28/08/2019  
**End date:** 30/08/2019  
Arben Merkoçi.
- 80** **Title of the work:** Graphene-based platforms for diagnostics  
**Name of the conference:** 9th Edition of European Conference in Graphene and 2D Materials  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Rome, Italy  
**Date of event:** 25/06/2019  
**End date:** 28/06/2019  
Arben Merkoçi.
- 81** **Title of the work:** Nanobiosensors for Diagnostics Applications  
**Name of the conference:** Point-of-Care, Biosensors & Mobile Diagnostics Europe 2019  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Rotterdam, Holland  
**Date of event:** 18/06/2019  
**End date:** 19/06/2019  
Arben Merkoçi.
- 82** **Title of the work:** Smartphone coupled paper-based nanobiosensor for cancer biomarkers detection  
**Name of the conference:** 5th EuroNanoMed Review seminar for funded projects  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Bratislava, Slovakia  
**Date of event:** 28/05/2019  
**End date:** 29/05/2019  
Arben Merkoçi.
- 83** **Title of the work:** Graphene-based biosensors for diagnostics  
**Name of the conference:** Graphene for US  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** New York, United States of America  
**Date of event:** 14/02/2019  
**End date:** 15/02/2019





- 84** **Title of the work:** Nanobiosensors for safety and security applications  
**Name of the conference:** NanoSD2018 Security & Defense  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Madrid, Community of Madrid, Spain  
**Date of event:** 11/12/2018  
**End date:** 12/12/2018  
Arben Merkoçi.
- 85** **Title of the work:** Heavy Metals Detection using Screen printed Carbon electrodes  
**Name of the conference:** First Scientific Symposium on Health and Climate Change 2018  
**Type of participation:** Participatory - oral communication  
**City of event:** Rome, Italy  
**Date of event:** 03/12/2018  
**End date:** 05/12/2018  
Arben Merkoçi.
- 86** **Title of the work:** Graphene-Based Biosensors  
**Name of the conference:** EU-Japan Symposium on Application of Graphene and Related 2D Materials  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tokyo, Japan  
**Date of event:** 22/11/2018  
Arben Merkoçi.
- 87** **Title of the work:** Nanomaterials-based biosensors for diagnostics applications  
**Name of the conference:** Frontiers of Science (FoS) seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Turku, Finland  
**Date of event:** 11/10/2018
- 88** **Title of the work:** Cost-effective and globally deployable mobile diagnostics using paper-based nanobiosensors  
**Name of the conference:** Point-of-Care Diagnostics & Global Health 2018  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Coronado Island, San Diego, United States of America  
**Date of event:** 01/10/2018  
Arben Merkoçi.
- 89** **Title of the work:** Nanobiosensors in diagnostics  
**Name of the conference:** 1st Global Congress of Pharmacy Faculties. Innovation in Pharmacy: Advances and perspectives  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Salamanca, Spain  
**Date of event:** 25/09/2018  
**End date:** 28/09/2018  
Arben Merkoçi.
- 90** **Title of the work:** Graphene-based biosensors  
**Name of the conference:** International Graphene Innovation Conference (GRAPCHINA)  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Xi'an, China  
**Date of event:** 19/09/2018



**End date:** 21/09/2018

Arben Merkoçi.

**91 Title of the work:** Graphene-based biosensors for diagnostics

**Name of the conference:** Graphene Week 2018

**Type of participation:** Participatory - invited/keynote talk

**City of event:** San Sebastian, Basque Country, Spain

**Date of event:** 10/09/2018

**End date:** 14/09/2018

Arben Merkoçi.

**92 Title of the work:** Nanobiosensors in diagnostics applications

**Name of the conference:** The 43d Federation of European Biochemical Societies (FEBS) Congress

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Prague, Czech Republic

**Date of event:** 07/07/2018

**End date:** 12/07/2018

Arben Merkoçi.

**93 Title of the work:** Diagnostics using paper-based platforms

**Name of the conference:** 12 International Symposium on Pharmaceutical Sciences

**Type of participation:** Participatory - Plenary session

**City of event:** Ankara, Turkey

**Date of event:** 26/06/2018

**End date:** 29/06/2018

Arben Merkoçi.

**94 Title of the work:** Graphene-based biosensors. What make graphene and other 2D materials advantageous in comparison to others?

**Name of the conference:** 28th World Congress of Biosensors 2018

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Miami, United States of America

**Date of event:** 15/06/2018

Arben Merkoçi.

**95 Title of the work:** Nanobiosensors Design and Applications in Diagnostics

**Name of the conference:** Select Biosciences Point-of-Care Diagnostics and Biosensors Europe 2018

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Rotterdam, Holland

**Date of event:** 05/06/2018

**End date:** 06/06/2018

Arben Merkoçi.

**96 Title of the work:** Health and environment diagnostics using paper-based nanobiosensors

**Name of the conference:** NanoBioMed Conference

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**Corresponding author:** Yes

**City of event:** Barcelona, Catalonia, Spain



**Date of event:** 22/11/2017

**End date:** 24/11/2017

Arben Merkoçi.

- 97** **Title of the work:** Graphene-based platforms for biosensing applications  
**Name of the conference:** Graphene Connect workshop - Biomedical Technologies  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Dusseldorf, Germany  
**Date of event:** 16/11/2017  
**End date:** 16/11/2017  
Arben Merkoçi.

- 98** **Title of the work:** Paper-based Nanobiosensors: Diagnostics Going Simple  
**Name of the conference:** Lab-on-a-Chip & Microfluidics World Congress 2017  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** california, United States of America  
**Date of event:** 02/10/2017  
**End date:** 04/10/2017  
Arben Merkoçi.

- 99** **Title of the work:** Diagnostics with paper-based sensors using nanomaterials as signalling tools  
**Name of the conference:** NanoBioSensor Conference  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Dresden, Germany  
**Date of event:** 04/09/2017  
**End date:** 05/09/2017  
Arben Merkoçi.

- 100** **Title of the work:** Promoting the establishment of Centres of Excellence in Albania and the impacts on promoting Albanian young scientists  
**Name of the conference:** Workshop: Capacity Building and Knowledge Transfer in Albania  
**Type of event:** Workshop  
**Type of participation:** Participatory - others  
**Corresponding author:** Yes  
**City of event:** Tirana, Albania  
**Date of event:** 16/02/2017  
**End date:** 17/02/2017  
Arben Merkoçi.

- 101** **Title of the work:** Paper-based nanobiosensors in diagnostics: from health, safety and security to environment monitoring  
**Name of the conference:** NanoBiomed Conference  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes



**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 23/11/2016  
**End date:** 23/11/2016  
Arben Merkoçi.

**102 Title of the work:** Nanobiosensors in Diagnostics  
**Name of the conference:** 2nd Annual Bioelectronics & Biosensors Congress  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Lodon, United Kingdom  
**Date of event:** 17/11/2016  
**End date:** 17/11/2016  
Arben Merkoçi.

**103 Title of the work:** Graphene-based platforms for (bio)sensing applications  
**Name of the conference:** Graphene & 2-D Materials Conference: From Research to Applications  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** London, United Kingdom  
**Date of event:** 16/11/2016  
**End date:** 16/11/2016  
Arben Merkoçi.

**104 Title of the work:** Paper-based nanobiosensors: simple biosensing platforms compatible with smart phones  
**Name of the conference:** Rapid Methods Europe, The RME Conference Series, 11th Conference Food, Feed, Water Analysis, Animal Human Diagnostics  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Amsterdam, Holland  
**Date of event:** 08/11/2016  
**End date:** 08/11/2016  
Arben Merkoçi.

**105 Title of the work:** Paper-based biosensors for diagnostics  
**Name of the conference:** 2nd Microfluidics Congress  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** London, United Kingdom  
**Date of event:** 21/10/2016  
**End date:** 21/10/2016  
Arben Merkoçi.

**106 Title of the work:** Nanomaterial-based biosensors  
**Name of the conference:** First workshop on electrochemistry devices: (bio)sensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes



**City of event:** Porto, Portugal  
**Date of event:** 13/10/2016  
**End date:** 13/10/2016

**107 Title of the work:** Diagnostics using nanobiosensors  
**Name of the conference:** 3rd International Congress on Biosensors  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Ankara, Turkey  
**Date of event:** 05/10/2016  
**End date:** 05/10/2016  
Arben Merkoçi.

**108 Title of the work:** Graphene-based biosensors  
**Name of the conference:** International Graphene Innovation Conference (GRAPCHINA 2016)  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Qingdao, China  
**Date of event:** 24/09/2016  
**End date:** 24/09/2016  
Arben Merkoçi.

**109 Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** AACC CPOCT INTERNATIONAL SYMPOSIUM, The Benefits and Challenges of Point-of-Care Testing Across the Clinical Spectrum  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Copenhagen, Denmark  
**Date of event:** 22/09/2016  
**End date:** 22/09/2016  
Arben Merkoçi.

**110 Title of the work:** Paper-based sensors  
**Name of the conference:** Sensors STRATEGIC WORKSHOP  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Iasi, Romania  
**Date of event:** 21/09/2016  
**End date:** 21/09/2016  
Arben Merkoçi.

**111 Title of the work:** Graphene-based Platforms for Biosensing Applications  
**Name of the conference:** Nanotech France 2016 / European Graphene Forum 2016  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Paris, France



**Date of event:** 01/06/2016

**End date:** 03/06/2016

Arben Merkoçi.

- 112 Title of the work:** Nanotechnology and Biosensors: Opportunities in Albania  
**Name of the conference:** ALBNANO 2016 Workshop on nanotechnology and biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** Tirana, Albania  
**Date of event:** 29/05/2016  
**End date:** 31/05/2016  
Arben Merkoçi.
- 113 Title of the work:** Paper-based nanobiosensors  
**Name of the conference:** ALBNANO 2016 Workshop on nanotechnology and biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Tirana, Albania  
**Date of event:** 29/05/2016  
**End date:** 31/05/2016
- 114 Title of the work:** From paper to nanopaper-based biosensors Current challenges and future perspectives  
**Name of the conference:** Biosensors 2016  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Gothenburg, Sweden  
**Date of event:** 25/05/2016  
**End date:** 27/05/2016  
Arben Merkoçi.
- 115 Title of the work:** Graphene-based Platforms for Biosensing Applications  
**Name of the conference:** GM-2016 International Conference  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Paestum, Italy  
**Date of event:** 23/05/2016  
**End date:** 24/05/2016  
Arben Merkoçi.
- 116 Title of the work:** Nanobiosensors-based diagnostics  
**Name of the conference:** 4th edition of School of Bioanalytical Chemistry  
**Type of event:** School  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Campinas, Brazil  
**Date of event:** 26/04/2016  
**End date:** 26/04/2016



Arben Merkoçi.

- 117 Title of the work:** Diagnostics using nanobiosensors  
**Name of the conference:** BioNanoMed 2016 -Nanotechnologyenables Personalized Medicine  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Krems, Austria  
**Date of event:** 06/04/2016  
**End date:** 08/04/2016
- 118 Title of the work:** Diagnostic devices using graphene and other nanomaterials  
**Name of the conference:** NanoSpain2016  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Logroño, Spain  
**Date of event:** 15/03/2016  
**End date:** 18/03/2016  
Arben Merkoçi.
- 119 Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** CONFERENCE ADVANCED FUNCTIONAL & INDUSTRIAL PRINTING  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Düsseldorf, Germany  
**Date of event:** 03/03/2016  
**End date:** 03/03/2016  
Arben Merkoçi.
- 120 Title of the work:** Paper-based optical biosensors for accurate enough diagnostics. A hot topic of nowadays research and development with interest for technology transfer to the market  
**Name of the conference:** Photonics PPP Annual Meeting 2016  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**Corresponding author:** Yes  
**City of event:** Brussels, Belgium  
**Date of event:** 02/03/2016  
**End date:** 02/03/2016  
Arben Merkoçi.
- 121 Title of the work:** Biosensors performance enhancement using nanomaterials  
**Name of the conference:** SEVENTH INTERNATIONAL WORKSHOP ON « BIOSENSORS FOR FOOD SAFETY AND ENVIRONMENTAL MONITORING »  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Morocco  
**Date of event:** 19/11/2015  
**End date:** 19/11/2015



- 122** **Title of the work:** Graphene-based platforms for sensing and biosensing  
**Name of the conference:** International Graphene Innovation Conference (GRAPCHINA 2015)  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** China  
**Date of event:** 30/10/2015  
**End date:** 30/10/2015
- 123** **Title of the work:** Diagnostics with graphene-based materials  
**Name of the conference:** Graphene and 2D Materials International Conference and Exhibition  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Canada  
**Date of event:** 16/10/2015  
**End date:** 16/10/2015  
Arben Merkoçi.
- 124** **Title of the work:** Paper/Plastic-based Nanomicrofluidics and Nanobiosensing Enhancement  
**Name of the conference:** Point-of-Care Diagnostics & Global Health World Congress, San Diego, USA  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** United States of America  
**Date of event:** 30/09/2015  
**End date:** 30/09/2015  
Arben Merkoçi.
- 125** **Title of the work:** Graphene-based platforms for biosensing applications  
**Name of the conference:** VI Congreso Internacional de Docencia e Investigación en Química  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Mexico  
**Date of event:** 23/09/2015  
**End date:** 23/09/2015  
Arben Merkoçi.
- 126** **Title of the work:** Development of simple paper/plastic-based nanobiosensors for diagnostics Applications  
**Name of the conference:** Catalonia nano cluster - Technion symposium  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Haifa, Israel  
**Date of event:** 06/07/2015  
**End date:** 07/07/2015  
Arben Merkoçi.
- 127** **Title of the work:** Why graphene-related materials are an advantageous optical biosensing platform?  
**Name of the conference:** 2nd INTERNATIONAL BIOSENSOR CONGRESS  
**Type of participation:** Participatory - oral communication  
**City of event:** Izmir, Turkey  
**Date of event:** 10/06/2015  
**End date:** 12/06/2015  
Eden Morales-Narváez; Arben Merkoçi.





- 128** **Title of the work:** Nanodiagnostics with Simple Paper/Plastic-Based Platforms  
**Name of the conference:** 11th International Symposium on Pharmaceutical Sciences (ISOPS-11)  
**Type of participation:** Participatory - Plenary session  
**City of event:** Ankara, Turkey  
**Date of event:** 09/06/2015  
**End date:** 12/06/2015  
Arben Merkoçi.
- 129** **Title of the work:** Fabrication of Biofunctionalized Few-Layer Defect-Free Microsheets of Graphene  
**Name of the conference:** ICREA Workshop on Graphene NanoBiosensors  
**Type of participation:** Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 25/05/2015  
**End date:** 26/05/2015  
Alfredo Maria Gravagnuolo; Eden Morales-Naváez; Sara Longobardi; Everson Thiago S. G. da Silva; Paola Giardina; Arben Merkoçi.
- 130** **Title of the work:** Graphene oxide in optical biosensing  
**Name of the conference:** ICREA Workshop on Graphene NanoBiosensors  
**Type of participation:** Participatory - oral communication  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 25/05/2015  
**End date:** 26/05/2015  
Eden Morales-Narváez; Arben Merkoçi.
- 131** **Title of the work:** Nanomaterials and Plastic/Paper-Based Sensors for Diagnostics Applications  
**Name of the conference:** 1st Tunisian Chemical Society Conference on Coordination Chemistry  
**Type of participation:** Participatory - Plenary session  
**City of event:** Hammamet, Tunisia  
**Date of event:** 08/05/2015  
**End date:** 10/05/2015  
Arben Merkoçi.
- 132** **Title of the work:** Paper/plastic nanobiosensors for food and environmental applications  
**Name of the conference:** Rapid Methods Europe 2015  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Noordwijkerhout, Holland  
**Date of event:** 20/04/2015  
**End date:** 22/04/2015  
Arben Merkoçi.
- 133** **Title of the work:** Nanomaterials-Based Biosensors: from Health to Safety and Security Applications  
**Name of the conference:** Department of Chemistry, Faculty of Science Chulalongkorn University Phayathai Road  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Bangkok, Thailand  
**Date of event:** 30/03/2015  
**End date:** 30/03/2015  
Arben Merkoçi.



- 134** **Title of the work:** Nanomaterials and plastic/paper-based sensors for diagnostics applications  
**Name of the conference:** Workshop: Next Generation Tools for DNA diagnostics  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Edinburgh, United Kingdom  
**Date of event:** 26/02/2015  
**End date:** 26/02/2015
- 135** **Title of the work:** Clinical and environment diagnostics using nanobiosensors  
**Name of the conference:** Universitat Pompeu Fabra  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 20/02/2015  
**End date:** 20/02/2015  
Arben Merkoçi.
- 136** **Title of the work:** Nanobiosensors and Applications in Diagnostics  
**Name of the conference:** University of Girona  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Girona, Catalonia, Spain  
**Date of event:** 18/02/2015  
**End date:** 18/02/2015  
Arben Merkoçi.
- 137** **Title of the work:** Nanobiosensors and Applications in Diagnostics  
**Name of the conference:** Nanoscience and Nanotechnology International Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Porto, Portugal  
**Date of event:** 11/02/2015  
**End date:** 13/02/2015  
Arben Merkoçi.
- 138** **Title of the work:** Nanobiosensors and applications in diagnostics  
**Name of the conference:** NanoPT 2015 International Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Porto, Portugal  
**Date of event:** 11/02/2015  
**End date:** 13/02/2015  
Arben Merkoçi.
- 139** **Title of the work:** Nanomaterials and Plastic/Paper-Based Sensors for Environment Monitoring  
**Name of the conference:** WORKSHOP ON “ENVIRONMENTAL SENSORS FOR INLAND WATER”  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Sorèze, France  
**Date of event:** 26/01/2015  
**End date:** 28/01/2015  
Arben Merkoçi.
- 140** **Title of the work:** Nanobiosensor Application in Medical and Environment Technology  
**Name of the conference:** Chemistry Fair 2014  
**Type of participation:** Participatory - Plenary session  
**City of event:** Indonesia, Indonesia



**Date of event:** 20/11/2014

**End date:** 20/11/2014

Arben Merkoçi.

- 141 Title of the work:** How to Develop Grand Design Research: Trend Topics in Nanobiotechnology  
**Name of the conference:** Makara Journal of Science Research Colloquium 2014  
**Type of participation:** Participatory - Plenary session  
**City of event:** Indonesia, Indonesia  
**Date of event:** 19/11/2014  
**End date:** 19/11/2014  
Arben Merkoçi.
- 142 Title of the work:** Nanomaterials-Based Platforms for Biosensing Applications  
**Name of the conference:** 9èmes Journées Maghreb-Europe, Matériaux Et Applications Aux Dispositifs Et Capteurs, MADICA 2014  
**Type of participation:** Participatory - Plenary session  
**City of event:** Mahdia, Tunisia  
**Date of event:** 05/11/2014  
**End date:** 07/11/2014  
Arben Merkoçi.
- 143 Title of the work:** Graphene-based platforms for electrical and optical biosensing  
**Name of the conference:** 15th edition of Trends in Nanotechnology International Conference (TNT2014)  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 27/10/2014  
**End date:** 31/10/2014  
Arben Merkoçi.
- 144 Title of the work:** Nanodevices for Societal Challenges- Life  
**Name of the conference:** 15th edition of Trends in Nanotechnology International Conference (TNT2014)  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 27/10/2014  
**End date:** 31/10/2014  
Arben Merkoçi.
- 145 Title of the work:** Nanomaterials-Based Platforms for Biosensing Applications  
**Name of the conference:** Department of Computer Science and Technology, University of Bedfordshire  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Luton, United Kingdom  
**Date of event:** 21/10/2014  
**End date:** 21/10/2014  
Arben Merkoçi.
- 146 Title of the work:** Graphene in Biosensing Platforms  
**Name of the conference:** XXX Trobades Científiques de la Mediterrània  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Mahó, Balearic Islands, Spain  
**Date of event:** 15/10/2014  
**End date:** 17/10/2014



Eden Morales-Narváez; Arben Merkoçi.

- 147** **Title of the work:** Nanomaterials in diagnostics and sensoremoval applications  
**Name of the conference:** 14as Jornadas de Análisis Instrumental  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 01/10/2014  
**End date:** 03/10/2014  
Arben Merkoçi.
- 148** **Title of the work:** Antithyroid drug detection using an enzyme cascade blocking in a nanoparticle-based lab-on-a-chip  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
Sevinç Kurbanoglu; Carmen C. Mayorga-Martinez; Mariana Medina; Lourdes Rivas; Sibel A. Ozkan; Arben Merkoçi.
- 149** **Title of the work:** Enhancement of in- chip quantum dots labelled protein electrochemical analysis through the use of an in-situ bismuth modified detector  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
Mariana Medina-Sánchez; Sandrine Miserere; Miquel Cadevall; Arben Merkoçi.
- 150** **Title of the work:** Gold Nanoparticles Hydrogen Evolution Reaction by Electrochemical Impedance Spectroscopy for (Bio)sensing applications.  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** Participatory - oral communication  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
Carmen C. Mayorga-Martinez; Alejandro Chamorro-García; Arben Merkoçi.
- 151** **Title of the work:** Graphene oxide related forms for biosensing applications  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** Participatory - oral communication  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
Luis Baptista-Pires; Briza Pérez-López; Carmen C. Mayorga-Martinez; Eden Morales-Narváez; Neus Domingo; Maria Jose Esplandiú; Francesc Alzina; Clivia Sotomayor Torres; Arben Merkoçi.
- 152** **Title of the work:** Graphene/Silicon heterojunction schottky diode for vapours sensing using impedance spectroscopy  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster



**City of event:** Bellaterra, Catalonia, Spain

**Date of event:** 25/09/2014

**End date:** 26/09/2014

Ali Fattah; Carmen C. Mayorga-Martinez; Mariana Medina-Sánchez; Luis Baptista-Pires; Saeid Khatami; Arben Merkoçi.

**153 Title of the work:** Label free impedimetric aptasensor for Ochratoxin-A using iridium oxide nanoparticles

**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Bellaterra, Catalonia, Spain

**Date of event:** 25/09/2014

**End date:** 26/09/2014

Lourdes Rivas; Carmen C. Mayorga-Martinez; Alejandro Zamora; Daniel Quesada; Alfredo de la Escosura-Muñiz; Arben Merkoçi.

**154 Title of the work:** Magnetic plug-based platform modelling and application in a microfluidics/quantum dots based electrochemical biosensing system

**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Bellaterra, Catalonia, Spain

**Date of event:** 25/09/2014

**End date:** 26/09/2014

Sandrine Miserere; Mariana Medina-Sánchez; Miquel Cadevall; Arben Merkoçi.

**155 Title of the work:** Micro/Nanomaterials and microarray technology

**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Bellaterra, Catalonia, Spain

**Date of event:** 25/09/2014

**End date:** 26/09/2014

Eden Morales-Narváez; Arben Merkoçi.

**156 Title of the work:** Nanoparticles induced dual catalytic/inhibition based detection of phenol and pesticide compounds

**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Bellaterra, Catalonia, Spain

**Date of event:** 25/09/2014

**End date:** 26/09/2014

Carmen C. Mayorga-Martinez; Flavio Pino; Sevinç Kurbanoglu; Lourdes Rivas; Sibel A. Ozkan; Arben Merkoçi.

**157 Title of the work:** Porous magnetic microspheres as efficient capturing/pre-concentrating platforms for detection of Alzheimer disease biomarkers using electrocatalytic gold nanoparticle tags

**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Bellaterra, Catalonia, Spain

**Date of event:** 25/09/2014

**End date:** 26/09/2014

Alfredo de la Escosura-Muñiz; Z. Plichta; Daniel Horák; Arben Merkoçi.



- 158** **Title of the work:** Quantum dots for biomedical and biosensing applications  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
Helena Monton; Eden Morales-Narváez; Claudio Parolo; Carme Nogués; Arben Merkoçi.
- 159** **Title of the work:** Rapid and sensitive detection of Escherichia coli O157:H7 in minced beef and water using electrocatalytic gold nanoparticles  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
A.H.A.Z Hassan; Alfredo de la Escosura-Muñiz; Arben Merkoçi.
- 160** **Title of the work:** Simple Lab-on-a-chip devices for biomarkers and pollutants detection  
**Name of the conference:** XIX Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** Participatory - oral communication  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 25/09/2014  
**End date:** 26/09/2014  
Andrzej Cha?upniak; Eden Morales; Sandrine Miserere; Arben Merkoçi.
- 161** **Title of the work:** Nanomaterials-Based Electrochemical Biosensing Platforms  
**Name of the conference:** XIVème colloque du Groupe Français de Bioélectrochimie  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Sete, France  
**Date of event:** 24/09/2014  
**End date:** 24/09/2014  
Arben Merkoçi.
- 162** **Title of the work:** Nanomaterials-based biosensing platforms  
**Name of the conference:** 2nd International Conference on Applied Biotechnology  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tirana, Albania  
**Date of event:** 22/09/2014  
**End date:** 22/09/2014  
Arben Merkoçi.
- 163** **Title of the work:** Nanobiosensing devices using plastic and paper-based platforms  
**Name of the conference:** 2nd International Conference on Analytical Chemistry  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Targoviste, Romania  
**Date of event:** 17/09/2014  
**End date:** 21/09/2014  
Arben Merkoçi.



- 164** **Title of the work:** Graphene-based sensing and biosensing platforms  
**Name of the conference:** The International Graphene Innovation Conference (GrapChina, 2014)  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Ningbo, China  
**Date of event:** 01/09/2014  
**End date:** 03/09/2014  
Arben Merkoçi.
- 165** **Title of the work:** Nanobiosensing and actuating in lab-on-chip and paper-based lateral flow platforms  
**Name of the conference:** New frontiers of nanomaterial technologies for applications in biology and medicine  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tirana, Albania  
**Date of event:** 10/07/2014  
**End date:** 11/07/2014
- 166** **Title of the work:** On-chip magneto-immunoassay for Alzheimer's biomarker electrochemical detection using QDs as labels  
**Name of the conference:** WORKSHOP WAM NANO 2014  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Copenhagen, Denmark  
**Date of event:** 22/06/2014  
**End date:** 24/06/2014  
Sandrine Miserere; Arben Merkoçi.
- 167** **Title of the work:** Biosensing using graphene  
**Name of the conference:** Graphene & 2D Materials, Singapore-Spain Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Singapore, Singapore  
**Date of event:** 19/06/2014  
**End date:** 20/06/2014  
Arben Merkoçi.
- 168** **Title of the work:** Nanomaterials-based biosensors  
**Name of the conference:** Cell Model Systems Summer School 2014  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Rome, Italy  
**Date of event:** 18/06/2014  
**End date:** 19/06/2014  
Eden Morales; Arben Merkoçi.
- 169** **Title of the work:** Antithyroid drug detection using an enzyme cascade blocking in a nanoparticle-based lab-on-a-chip system  
**Name of the conference:** 24th Biosensors World Congress  
**Type of event:** Conference  
**Type of participation:** Participatory - poster  
**City of event:** Melbourne, Australia  
**Date of event:** 27/05/2014  
**End date:** 30/05/2014  
Sevinç Kurbanoglu; Carmen C. Mayorga-Martinez; Mariana Medina; Lourdes Rivas; Sibel A. Ozkan; Arben Merkoçi.



- 170 Title of the work:** Electrochemical Impedance Spectroscopy (bio)sensing through hydrogen evolution reaction induced by gold nanoparticles  
**Name of the conference:** 24th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Melbourne, Australia  
**Date of event:** 27/05/2014  
**End date:** 30/05/2014  
Alejandro Chamorro; Carmen C. Mayorga-Martinez; Arben Merkoçi.
- 171 Title of the work:** Enhancement of in-chip quantum dots labelled protein electrochemical analysis through the use of an in-situ bismuth modified detector  
**Name of the conference:** 24th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Melbourne, Australia  
**Date of event:** 27/05/2014  
**End date:** 30/05/2014  
Mariana Medina-Sánchez; Sandrine Miserere; Miquel Cadevall; Arben Merkoçi.
- 172 Title of the work:** Highly sensitive and rapid determination of Escherichia coli O157:H7 in minced beef and water using electrocatalytic gold nanoparticle tags  
**Name of the conference:** 24th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Melbourne, Australia  
**Date of event:** 27/05/2014  
**End date:** 30/05/2014  
Abdel-Rahim Hussein Abdel-Azzem Hassan; Alfredo de la Escosura-Muñiz; Arben Merkoçi.
- 173 Title of the work:** Integration of micro/nanomaterials into microarray technology: boosting biosensing platforms  
**Name of the conference:** 24th Biosensors World Congress  
**Type of participation:** Participatory - oral communication  
**City of event:** Melbourne, Australia  
**Date of event:** 27/05/2014  
**End date:** 30/05/2014  
Eden Morales-Narváez; Arben Merkoçi.
- 174 Title of the work:** Label free impedimetric aptasensor for ochratoxin-A using iridium oxide nanoparticles  
**Name of the conference:** 24th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Melbourne, Australia  
**Date of event:** 27/05/2014  
**End date:** 30/05/2014  
Lourdes Rivas; Carmen C. Mayorga-Martinez; Alejandro Zamora; Daniel Quesada; Alfredo de la Escosura-Muñiz; Arben Merkoçi.
- 175 Title of the work:** Magnetic plug-based platform modelling and application in a microfluidics/quantum dots based electrochemical biosensing system  
**Name of the conference:** 24th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Melbourne, Australia





**Date of event:** 27/05/2014

**End date:** 30/05/2014

Sandrine Miserere; Mariana Medina-Sánchez; Miquel Cadevall; Arben Merkoçi.

**176 Title of the work:** Nanochannel array devices for sensitive label-free immunodetection of cancer biomarkers

**Name of the conference:** 24th Biosensors World Congress

**Type of participation:** Participatory - oral communication

**City of event:** Melbourne, Australia

**Date of event:** 27/05/2014

**End date:** 30/05/2014

Marisol Espinoza-Castañeda; Alejandro Chamorro; Carmen de Torres; Arben Merkoçi; Alfredo de la Escosura-Muñiz.

**177 Title of the work:** Nanoparticles induced dual catalytic/inhibition based detection of phenol and pesticide compounds

**Name of the conference:** 24th Biosensors World Congress

**Type of participation:** Participatory - poster

**City of event:** Melbourne, Australia

**Date of event:** 27/05/2014

**End date:** 30/05/2014

Carmen C. Mayorga-Martinez; Flavio Pino; Sevinç Kurbanoglu; Lourdes Rivas; Sibel A. Ozkan; Arben Merkoçi.

**178 Title of the work:** Novel porous magnetic microspheres as enhanced capturing platforms for the detection of Alzheimer disease biomarkers in human samples using electrocatalytic gold nanoparticle tags

**Name of the conference:** 24th Biosensors World Congress

**Type of participation:** Participatory - poster

**City of event:** Melbourne, Australia

**Date of event:** 27/05/2014

**End date:** 30/05/2014

Alfredo de la Escosura-Muñiz; Zdeněk Plichta; Daniel Horák; Arben Merkoçi.

**179 Title of the work:** Nanomaterials as signalling and actuation tools in biosensing

**Name of the conference:** EHPS2014 - Electrospinning for High Performance Sensing

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Monterotondo, Italy

**Date of event:** 29/04/2014

**End date:** 30/04/2014

Arben Merkoçi.

**180 Title of the work:** Nanomaterials-based biosensing systems for diagnostics and environment monitoring applications

**Name of the conference:** Department of Chemical Sciences, University of Naples

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Napoli, Italy

**Date of event:** 28/04/2014

**End date:** 28/04/2014

Arben Merkoçi.



- 181** **Title of the work:** Quantum dots for biomedical and biosensing applications  
**Name of the conference:** COST Action meeting  
**Type of participation:** 'Participatory - poster  
**City of event:** Catania, Italy  
**Date of event:** 28/04/2014  
**End date:** 30/04/2014  
Helena Montón; Carme Nogués; Eden Morales-Narváez; Claudio Parolo; Arben Merkoçi.
- 182** **Title of the work:** Nanomaterials-based platforms for biosensing applications  
**Name of the conference:** Nagoya University  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Nagoya, Japan  
**Date of event:** 20/03/2014  
**End date:** 20/03/2014  
Arben Merkoçi.
- 183** **Title of the work:** Carbon based electrodes in nanomaterials-involved biosensing systems  
**Name of the conference:** International Symposium on Diamond Electrochemistry  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Yokohama, Japan  
**Date of event:** 18/03/2014  
**End date:** 19/03/2014  
Arben Merkoçi.
- 184** **Title of the work:** Recent trends and applications of nanomaterial-based biosensing systems  
**Name of the conference:** Advances in Biodetection and Biosensors  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Berlin, Germany  
**Date of event:** 10/03/2014  
**End date:** 11/03/2014  
Arben Merkoçi.
- 185** **Title of the work:** Point of care diagnostics using simple nanomaterials based platforms  
**Name of the conference:** Universitat Pompeu Fabra  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 07/03/2014  
**End date:** 07/03/2014  
Arben Merkoçi.
- 186** **Title of the work:** Biosensing using nanomaterials  
**Name of the conference:** 34th Summer School of Chemistry in Brazil  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Sao Carlos, Brazil  
**Date of event:** 17/02/2014  
**End date:** 21/02/2014  
Arben Merkoçi.
- 187** **Title of the work:** Bioanalytical nanosystems. Building nanoblocks (Part I & II)  
**Name of the conference:** 3d BIOANALYTICAL NANOTECHNOLOGY SCHOOL  
**Type of participation:** Participatory - invited/keynote talk



**City of event:** Manila, Philippines  
**Date of event:** 29/01/2014  
**End date:** 01/02/2014  
Arben Merkoçi.

- 188** **Title of the work:** Nanomaterial-based biosensors for diagnostic, safety and security  
**Name of the conference:** Nanotecnologie per la sicurezza  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Bologna, Italy  
**Date of event:** 05/12/2013  
**End date:** 05/12/2013  
**Organising entity:** Accademia delle Scienze dell'Istituto di Bologna  
**City organizing entity:** Bologna, Italy  
Arben Merkoçi.
- 189** **Title of the work:** Lab-on-a-chip for electrochemical magneto-immunoassay for  
**Name of the conference:** MicroTAS2013: 17th International Conference on Miniaturized Systems for Chemistry & Life Sciences  
**Type of participation:** Participatory - poster  
**City of event:** Freiburg, Germany  
**Date of event:** 27/10/2013  
**End date:** 31/10/2013  
Mariana Medina; Sandrine Miserere; Edén Morales; Arben Merkoçi.
- 190** **Title of the work:** Paper-based electrodes for nanoparticles detection  
**Name of the conference:** NNT2013: 12th International Conference on Nanoimprint and Nanoprint Technology 2013  
**Type of participation:** Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 21/10/2013  
**End date:** 23/10/2013  
Claudio Parolo; Mariana Medina; Helena Montón; Alfredo de la Escosura; Arben Merkoçi.
- 191** **Title of the work:** Nanomaterial-based devices for point of care applications  
**Name of the conference:** Second Workshop on Nanomedicine  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Bellaterra, Catalonia, Spain  
**Date of event:** 08/10/2013  
**End date:** 08/10/2013  
Claudio Parolo; Arben Merkoçi.
- 192** **Title of the work:** Nanomaterials based platforms for biosensing applications  
**Name of the conference:** Workshop on Biosensors for Food Safety and Environmental Monitoring  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Essaouira, Morocco  
**Date of event:** 03/10/2013  
**End date:** 05/10/2013  
Arben Merkoçi.



- 193** **Title of the work:** Lateral flow immunoassays and paper-based electrodes in diagnostic applications  
**Name of the conference:** XVIIIe Transfrontier Meeting - Sensors and Biosensors  
**Type of participation:** Participatory - oral communication  
**City of event:** Ales, France  
**Date of event:** 19/09/2013  
**End date:** 20/09/2013  
Claudio Parolo; Mariana Medina; Helena Monton; Alfredo de la Escosura; Arben Merkoçi.
- 194** **Title of the work:** Nanostructured platforms for phenol detection using microfluidic system  
**Name of the conference:** XVIIIe Transfrontier Meeting - Sensors and Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Ales, France  
**Date of event:** 19/09/2013  
**End date:** 20/09/2013  
Carmen C. Martínez; Miquel Cadevall; Lenka Hlavata; Sandrine Miserere; Adaris López; Arben Merkoçi.
- 195** **Title of the work:** On-chip magneto-immunoassay for Alzheimer's biomarker electrochemical detection by using QDs as labels.  
**Name of the conference:** XVIIIe Transfrontier Meeting - Sensors and Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Ales, France  
**Date of event:** 19/09/2013  
**End date:** 20/09/2013  
Mariana Medina; Sandrine Miserere; Edén Morales; Arben Merkoçi.
- 196** **Title of the work:** Tuning biosensor response by nanomaterials and signal transducing architectures (The Nano Award Lecture)  
**Name of the conference:** Advanced Materials World Congress  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Çe?me, Turkey  
**Date of event:** 16/09/2013  
**End date:** 19/09/2013  
Arben Merkoçi.
- 197** **Title of the work:** Simple and efficient biosensing devices using plastic and paper based platforms  
**Name of the conference:** XXIV Congresso della Divisione di Chimica Analitica della Società Chimica Italiana  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Genova, Liguria, Italy  
**Date of event:** 15/09/2013  
**End date:** 19/09/2013  
Arben Merkoçi.
- 198** **Title of the work:** Graphene oxide related forms for biosensing applications  
**Name of the conference:** TNT2013: Trends in Nanotechnology International Conference  
**Type of participation:** 'Participatory - poster  
**City of event:** Sevilla, Andalusia, Spain  
**Date of event:** 09/09/2013  
**End date:** 13/09/2013  
Briza Pérez; Carmen C. Mayorga; Eden Morales; Neus Domingo; María José Esplandiú; Francesc Alzina; Clivia M. Sotomayor; Arben Merkoçi.



- 199** **Title of the work:** Prussian blue nanoparticles as novel red-ox specie for sensitive label-free immunosensing using nanochannels: application to parathyroid hormone –related protein (PTHrP) detection  
**Name of the conference:** TNT2013: Trends in Nanotechnology International Conference  
**Type of participation:** 'Participatory - poster  
**City of event:** Sevilla, Andalusia, Spain  
**Date of event:** 09/09/2013  
**End date:** 13/09/2013  
Marisol Espinoza; Alfredo de la Escosura; Alejandro Chamorro; Carmen de Torres; Arben Merkoçi.
- 200** **Title of the work:** Nanomaterials based devices in electrochemical bio-sensing technology  
**Name of the conference:** 10th International Congress of Electrochemistry  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Konya, Turkey  
**Date of event:** 04/09/2013  
**End date:** 04/09/2013
- 201** **Title of the work:** Nanomaterials based biosensors  
**Name of the conference:** Summer School of Univ. Rovira Virgili  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 08/07/2013  
**End date:** 08/07/2013
- 202** **Title of the work:** Paper-based electrodes for nanoparticles detection  
**Name of the conference:** VINyNA 2013: VI Workshop en Nanociencia y Nanotecnologías Analíticas  
**Type of participation:** 'Participatory - poster  
**City of event:** Alcalá de Henares, Community of Madrid, Spain  
**Date of event:** 08/07/2013  
**End date:** 09/07/2013  
Claudio Parolo; Mariana Medina; Helena Monton; Alfredo de la Escosura; Arben Merkoçi.
- 203** **Title of the work:** Paper-based nanobiosensors in diagnostics: modulation of lateral flow immunoassay  
**Name of the conference:** VINyNA 2013: VI Workshop en Nanociencia y Nanotecnologías Analíticas  
**Type of participation:** Participatory - oral communication  
**City of event:** Alcalà de Henares, Community of Madrid, Spain  
**Date of event:** 08/07/2013  
**End date:** 09/07/2013  
Claudio Parolo; Mariana Medina; Alfredo de la Escosura; Arben Merkoçi.
- 204** **Title of the work:** Nanomaterials based electrobiosensing  
**Name of the conference:** Internationally Participated Electrochemistry Workshop, Nanostructure Modified Electrochemical and Bioelectrochemical Systems  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Mugla, Turkey  
**Date of event:** 23/06/2013  
**End date:** 28/06/2013
- 205** **Title of the work:** Nanotheranostics: diagnostics and therapies using nanomaterials: Building simple nanomaterial based platforms that signal and evaluate diseases or pollutants  
**Name of the conference:** 55th ICREA Colloquium



**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 18/06/2013  
**End date:** 18/06/2013

**206 Title of the work:** Point of care diagnostics using simple nanomaterials based platforms

**Name of the conference:** Invited lecture at Universitat Pompeu Fabra  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 05/06/2013  
**End date:** 05/06/2013

**207 Title of the work:** Ferrocene-decorated gold nanoparticles immunosensor for sensitive amperometric detection of human immunoglobulin G

**Name of the conference:** ACSD2013: The 2nd International Symposium on Analytical Chemistry for Sustainable Development  
**Type of participation:** Participatory - poster  
**City of event:** Marrakech, Morocco  
**Date of event:** 07/05/2013  
**End date:** 09/05/2013

Abdelmoneim Mars; Noureddine Raouafi; Khaled Boujlel; Arben Merkoçi.

**208 Title of the work:** Graphene Based Platforms for Biosensing Applications

**Name of the conference:** Parallel workshop: Applications of Graphene-based Materials, Graphene 2013, ImagineNano Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Bilbao, Basque Country, Spain  
**Date of event:** 23/04/2013  
**End date:** 26/04/2013

Eden Morales Narváez; Luis Miguel Baptista Pires; Arben Merkoçi.

**209 Title of the work:** Development of Nanostructured Platforms for Sensing and Destroying of Pollutants  
**Name of the conference:** 2ND JAPANESE- SPANISH BILATERAL SYMPOSIUM ON "NANOTECHNOLOGIES AND NEW MATERIALS FOR ENVIRONMENTAL CHALLENGES" (SJ-NANO 2013)

**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tsukuba, Japan  
**Date of event:** 05/03/2013  
**End date:** 05/03/2013

Arben Merkoçi.

**210 Title of the work:** Human IgG electrochemical detection in COC microfluidic device

**Name of the conference:** Advances in Biodetection and biosensors  
**Type of participation:** Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 05/03/2013  
**End date:** 06/03/2013

Sandrine Miserere; Mariana Medina; Alfredo de la Escosura; Arben Merkoçi.



- 211 Title of the work:** Lateral flow immunoassay designs with improved sensitivities using gold nanoparticles  
**Name of the conference:** Advances in Biodetection & Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 05/03/2013  
**End date:** 06/03/2013  
Claudio Parolo; Alfredo de la Escosura; Mariana Medina; Lourdes Rivas; Arben Merkoçi.
- 212 Title of the work:** Nanostructured platforms for phenol detection  
**Name of the conference:** Advances in Biodetection and biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 05/03/2013  
**End date:** 06/03/2013  
Carmen C. Mayorga; Miquel Cadevall; Lenka Hlavata; Sandrine Miserere; Adaris López; Josefina Pons; Josep Ros; Arben Merkoçi.
- 213 Title of the work:** Nanomaterials based biosensors  
**Name of the conference:** Invited Talk at Universidad de Concepción  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Concepción, Chile  
**Date of event:** 06/11/2012  
**End date:** 06/11/2012  
Arben Merkoçi.
- 214 Title of the work:** Ink-jet printed FET for biosensing applications  
**Name of the conference:** MicroTAS 2012  
**Type of participation:** 'Participatory - poster  
**City of event:** Okinawa, Japan  
**Date of event:** 28/10/2012  
**End date:** 01/11/2012  
Mariana Medina Sánchez; Carme Martínez Domingo; Eloi Ramon; Sandrine Miserere; Ana Alcalde Aragonés; Jordi Carrabina; Arben Merkoçi.
- 215 Title of the work:** Nanomaterials-based platforms in biotechnological applications  
**Name of the conference:** The 1st International Conference on Nanomaterials: Fundamentals and Applications, NFA 2012  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Strbske Pleso, Slovakia  
**Date of event:** 03/10/2012  
**End date:** 06/10/2012
- 216 Title of the work:** Nanomaterial-based biosensing systems  
**Name of the conference:** Invited talk at Université Tunis El-Manar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tunis El-Manar, Tunisia  
**Date of event:** 24/09/2012  
**End date:** 24/09/2012  
Arben Merkoçi.



- 217** **Title of the work:** Nanoporous membranes for biomarkers detection in human blood  
**Name of the conference:** XVII Trobada Transfronterera sobre Sensors i Biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 20/09/2012  
**End date:** 21/09/2012  
Alfredo de la Escosura; Arben Merkoçi.
- 218** **Title of the work:** Bismuth nanoparticles for phenolic compounds biosensing application  
**Name of the conference:** XVII Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 20/09/2012  
**End date:** 21/09/2012  
Carmen C Mayorga Martinez; Miquel Cadevall; Maria Guix; Josep Ros; Arben Merkoçi.
- 219** **Title of the work:** Casein modified gold nanoparticles for future theranostic applications  
**Name of the conference:** XVII Trobada Transfronterera sobre Sensors i Biosensors.  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 20/09/2012  
**End date:** 21/09/2012  
Marisol Espinoza Castañeda; Alfredo de la Escosura Muñoz; G. González Ortiz; J.F. Pérez; Arben Merkoçi.
- 220** **Title of the work:** Human IgG electrochemical detection in COC microfluidic device  
**Name of the conference:** XVII Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 20/09/2012  
**End date:** 21/09/2012  
Sandrine Miserere; Mariana Medina; Alfredo de la Escosura Muñoz; Arben Merkoçi.
- 221** **Title of the work:** On-Chip Electrochemical Detection Of CdS Quantum Dots Using Normal And Multiple Recycling Flow Through Modes  
**Name of the conference:** XVII Trobada Transfronterera sobre Sensors i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 20/09/2012  
**End date:** 21/09/2012  
Mariana Medina; Sandrine Miserere; Gemma Aragay; Sergio Marin; Arben Merkoçi.
- 222** **Title of the work:** Nanomaterials-based bioanalytical devices  
**Name of the conference:** 1st International Conference on Analytical Chemistry  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Targoviste, Romania  
**Date of event:** 18/09/2012  
**End date:** 21/09/2012  
Arben Merkoçi.





- 223** **Title of the work:** Graphene Based Platforms for Biosensing Applications  
**Name of the conference:** GRANADA'12, Graphene Nanoscience: from Dirac Physics to Applications  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Granada, Andalusia, Spain  
**Date of event:** 09/09/2012  
**End date:** 13/09/2012  
Eden Morales Narváez; Luis Miguel Baptista Pires; Briza Pérez López; Arben Merkoçi.
- 224** **Title of the work:** Nanomaterials based biosensors  
**Name of the conference:** 5th Edition of the Cell Model Systems Summer School  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Roma, Italy  
**Date of event:** 14/06/2012  
**End date:** 14/06/2012  
Arben Merkoçi.
- 225** **Title of the work:** Nanomaterials based Microfluidics Biosensing  
**Name of the conference:** III International Workshop on Analytical Miniaturization and NANOTEchnologies, WAM-NANO2102.  
**Type of event:** Workshop  
**Type of participation:** Participatory - others  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 11/06/2012  
**End date:** 12/06/2012  
Arben Merkoçi.
- 226** **Title of the work:** Electroanalysis using Nanomaterials  
**Name of the conference:** 14th International Conference on Electroanalysis  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Portorož, Slovenija, Slovenia  
**Date of event:** 03/06/2012  
**End date:** 07/06/2012  
Arben Merkoçi.
- 227** **Title of the work:** Nanobiosensors for diagnostics  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Date of event:** 30/05/2012  
**End date:** 30/05/2012  
**Organising entity:** FUNDACIÓ BARCELONA MEDIA UNIVERSITAT POMPEU FABRA  
**City organizing entity:** Barcelona, Catalonia, Spain  
Arben Merkoçi.
- 228** **Title of the work:** Nanomaterials-based Biodevices  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**Date of event:** 23/05/2012  
**End date:** 23/05/2012  
**Organising entity:** Institute for Chemical-Physical Processes



**City organizing entity:** Cetraro, Italy  
Arben Merkoçi.

- 229 Title of the work:** Nanomaterials-based Biosensors  
**Name of the conference:** IMCS 2012 - The 14th International Meeting on Chemical Sensors  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Nurenberg, Germany  
**Date of event:** 21/05/2012  
**End date:** 21/05/2012  
Arben Merkoçi.
- 230 Title of the work:** Enhanced lateral flow immunoassay using gold nanoparticles loaded with enzymes  
**Name of the conference:** 21th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Cancún, Mexico  
**Date of event:** 15/05/2012  
**End date:** 18/05/2012  
Claudio Parolo; Alfredo de la Escosura Muñiz; Gemma Aragay; Sergi Gassó; Arben Merkoçi.
- 231 Title of the work:** Gold nanoparticles as carriers of k-casein derived peptides for therapeutic and biosensing applications  
**Name of the conference:** 21th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Cancún, Mexico  
**Date of event:** 15/05/2012  
**End date:** 18/05/2013  
Marisol Espinoza Castañeda; Alfredo de la Escosura Muñiz; S.M. Martín Orúe; F. Pérez; Arben Merkoçi.
- 232 Title of the work:** Nanochannels for diagnostics  
**Name of the conference:** 21th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Cancun, Mexico  
**Date of event:** 15/05/2012  
**End date:** 18/05/2012  
Alfredo de la Escosura Muñiz; Arben Merkoçi.
- 233 Title of the work:** Nanostructured biosensors for toxins detection  
**Name of the conference:** 21th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Cancún, Mexico  
**Date of event:** 15/05/2012  
**End date:** 18/05/2012  
Lourdes Rivas; Alfredo de la Escosura Muñiz; Josefina Pons; Arben Merkoçi.
- 234 Title of the work:** QDs versus fluorescent dyes in microarray based biomarkers screening.  
**Name of the conference:** 21th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Cancun, Mexico  
**Date of event:** 15/05/2012  
**End date:** 18/05/2012



Eden Morales Narváez; Helena Montón; Anna Fomithceva; Arben Merkoçi.

- 235** **Title of the work:** Optical biosensors based on graphene  
**Name of the conference:** Graphene International Conference  
**Type of participation:** 'Participatory - poster  
**City of event:** Brussels, Belgium  
**Date of event:** 10/04/2012  
**End date:** 13/04/2012  
Eden Morales Narváez; Briza Pérez López; Arben Merkoçi.
- 236** **Title of the work:** Nanomaterials applications in biosensing platforms  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Stuttgart, Germany  
**Date of event:** 14/02/2012  
**End date:** 14/02/2012  
**Organising entity:** Max-Planck-Institute for Solid State Research
- 237** **Title of the work:** Improving biosensors by using nanotechnology  
**Name of the conference:** International Conference on Nanomaterials & Nanotechnology (ICNANO)  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Delhi, India  
**Date of event:** 18/12/2011  
**End date:** 21/12/2011  
Arben Merkoçi.
- 238** **Title of the work:** Nanomaterials based biosensors for rapid and cost effective diagnostic of biomarkers  
**Name of the conference:** ICREA Conference on Network Medicine Approaches to Human Disease  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 21/11/2011  
**End date:** 23/11/2011  
Alfredo de la Escosura Muñiz; Claudio Parolo; Marisa Maltez da Costa; Arben Merkoçi.
- 239** **Title of the work:** Nanomaterials-based biosensors for point of care diagnostics, safety and security  
**Name of the conference:** International Conference "Biotechnological developments"  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tirana, Albania  
**Date of event:** 20/11/2011  
**End date:** 21/11/2011
- 240** **Title of the work:** Nanomaterials applications in biosensing platforms  
**Name of the conference:** Potsdam Days on Bioanalysis  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Postdam, Germany  
**Date of event:** 09/11/2011  
**End date:** 11/11/2011



- 241** **Title of the work:** Nanomaterials based biosensors for rapid and cost effective diagnostic of biomarkers  
**Name of the conference:** "Evolving Challenges in Promoting Cardiovascular Health" Workshop  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 04/11/2011  
**End date:** 05/11/2011  
Claudio Parolo; Marisa Maltez da Costa; Alfredo de la Escosura Muñoz; Arben Merkoçi.
- 242** **Title of the work:** Alzheimer biomarker screening using microarrays  
**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Toulouse, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Eden Morales; Arben Merkoçi.
- 243** **Title of the work:** Impedance based biosensing  
**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Toulouse, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Carmen C. Mayorga; Maria Guix; R.E. Madrid; Arben Merkoçi.
- 244** **Title of the work:** Protein Electrochemical Detection based on a Sandwich System formed by ZnS-thioglycerol Quantum Dots and Magnetic nanoparticles  
**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Toulouse, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Irene Xochilt Cantarelli; Gemma Aragay; Helena Montón; Sergio Marin; Claudio Parolo; Flavio Maran; Arben Merkoçi.
- 245** **Title of the work:** Syntheses of gold based nanostructures for biosensing applications  
**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Toulouse, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Lourdes Rivas; Alfredo de la Escosura; Gemma Aragay; Tiziana Placido; Lucia Curri; Josefina Pons; Arben Merkoçi.
- 246** **Title of the work:** Diagnostics using electrochemical sensing platforms and nanomaterials  
**Name of the conference:** XVIèmes Rencontres Transfrontalières  
**Type of participation:** 'Participatory - poster  
**City of event:** Toulouse, Midi-Pyrénées, France



**Date of event:** 29/09/2011

**End date:** 30/09/2011

Marisa Maltez da Costa; Alfredo de la Escosura Muñiz; Arben Merkoçi.

**247 Title of the work:** Different strategies for rapid and high sensitive detection of heavy metal ions using N-alkylaminopyrazole ligands

**Name of the conference:** XVIèmes Rencontres Transfrontalières « Capteurs et Biocapteurs »

**Type of participation:** 'Participatory - poster

**City of event:** Toulouse, Midi-Pyrénées, France

**Date of event:** 29/09/2011

**End date:** 30/09/2011

Gemma Aragay; Helena Montón; Josefina Pons; Arben Merkoçi.

**248 Title of the work:** Electrochemical interrogation of cellular uptake of quantum dots decorated with a proline-rich cell penetrating peptide

**Name of the conference:** XVIèmes Rencontres Transfrontalières

**Type of participation:** 'Participatory - poster

**City of event:** Toulouse, Midi-Pyrénées, France

**Date of event:** 29/09/2011

**End date:** 30/09/2011

Sergio Marín; Sílvia Pujals; Ernest Giral; Arben Merkoçi.

**249 Title of the work:** Gold nanoparticles as carriers of a caseinglycopeptide for therapeutic and biosensing applications

**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"

**Type of participation:** 'Participatory - poster

**City of event:** Toulouse, Midi-Pyrénées, France

**Date of event:** 29/09/2011

**End date:** 30/09/2011

Marisol Espinoza Castañeda; Alfredo de la Escosura Muñiz; Gemma González Ortiz; Susana Martín Orúe; Francisco Pérez; Arben Merkoçi.

**250 Title of the work:** Integration of electrochemical detection in COC microfluidic platform for biosensing applications

**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"

**Type of participation:** 'Participatory - poster

**City of event:** Toulouse, Midi-Pyrénées, France

**Date of event:** 29/09/2011

**End date:** 30/09/2011

Sandrine Miserere; Mariana Medina; Arben Merkoçi.

**251 Title of the work:** Nanomaterial-based strategies for (bio)sensing systems applied in food quality control

**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"

**Type of participation:** 'Participatory - poster

**City of event:** Toulouse, Midi-Pyrénées, France

**Date of event:** 29/09/2011

**End date:** 30/09/2011

Luis Baptista Pires; André Santiago Afonso; Arben Merkoçi.



- 252** **Title of the work:** Nanomaterials for pesticides detection  
**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"  
**Type of participation:** 'Participatory - poster  
**City of event:** Toulouse, Midi-Pyrénées, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Flavio Pino; Gemma Aragay; Arben Merkoçi.
- 253** **Title of the work:** Synthesis of CaCO<sub>3</sub> micro and nanoparticles for future biosensing applications  
**Name of the conference:** XVIèmes Rencontres Transfrontalières « Capteurs et Biocapteurs »  
**Type of participation:** 'Participatory - poster  
**City of event:** Toulouse, Midi-Pyrénées, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Gemma Aragay; Claudio Parolo; Alfredo de la Escosura Muñiz; Josefina Pons; Arben Merkoçi.
- 254** **Title of the work:** Synthesis of bismuth nanoparticles for sensing applications  
**Name of the conference:** XVIèmes Rencontres Transfrontalières "Capteurs et Biocapteurs"  
**Type of participation:** 'Participatory - poster  
**City of event:** Toulouse, Midi-Pyrénées, France  
**Date of event:** 29/09/2011  
**End date:** 30/09/2011  
Miquel Cadevall; Josep Ros; Arben Merkoçi.
- 255** **Title of the work:** Carbon nanotube and graphene based biosensing platforms  
**Name of the conference:** International Workshop on Graphene Nanostructures  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Regensburg, Germany  
**Date of event:** 28/09/2011  
**End date:** 30/09/2011
- 256** **Title of the work:** Graphene in biosensor applications  
**Name of the conference:** Sectorial Meeting  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Castelldefels, Catalonia, Spain  
**Date of event:** 23/09/2011  
**End date:** 23/09/2011  
Eden Morales; Briza Pérez; Luis Pires; Arben Merkoçi.
- 257** **Title of the work:** Nanomaterials in biosensing applications  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Izmir, Turkey  
**Date of event:** 20/09/2011  
**End date:** 20/09/2011  
**Organising entity:** Ege University Faculty of Pharmacy, Analytical Chemistry Department.  
Arben Merkoçi.



- 258 Title of the work:** Nanomaterials applications in (Bio)Sensing platforms  
**Name of the conference:** SJNANO2011 Workshop on Nanotechnology and New Materials for Environmental Challenges First Bilateral Japan-Spain, Meeting on Nanotechnology and New Materials for Environmental Challenges.  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Toledo, Castile-La Mancha, Spain  
**Date of event:** 15/09/2011  
**End date:** 16/09/2011  
Arben Merkoçi.
- 259 Title of the work:** Nanomaterials based strategies for heavy metals detection  
**Name of the conference:** SJNANO2011  
**Type of participation:** 'Participatory - poster  
**City of event:** Toledo, Castile-La Mancha, Spain  
**Date of event:** 15/09/2011  
**End date:** 16/09/2011  
Gemma Aragay; Josefina Pons; Arben Merkoçi.
- 260 Title of the work:** Nanomaterials for pesticides detection  
**Name of the conference:** SJNANO2011  
**Type of participation:** 'Participatory - poster  
**City of event:** Toledo, Castile-La Mancha, Spain  
**Date of event:** 15/09/2011  
**End date:** 16/09/2011  
Flavio Pino; Gemma Aragay; Arben Merkoçi.
- 261 Title of the work:** Immunosensing using nanoparticles  
**Name of the conference:** NATO Workshop  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Lund (Sjöbo), Sweden  
**Date of event:** 01/07/2011  
**End date:** 04/07/2011  
Arben Merkoçi.
- 262 Title of the work:** Diagnostics using nanobioelectronics based sensing systems  
**Name of the conference:** 4th Annual Advances in Biodetection & Biosensors Conference and Exhibition  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Hamburg, Germany  
**Date of event:** 30/06/2011  
**End date:** 01/07/2011  
Arben Merkoçi; Alfredo de la Escosura; Marisa Maltez.
- 263 Title of the work:** Nanomaterials for (bio)sensing applications  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 17/05/2011  
**End date:** 17/05/2011



**Organising entity:** Institut Català d'Investigació Química, ICIQ  
Arben Merkoçi.

**264 Title of the work:** Biosensing using nanoparticles

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**Date of event:** 13/05/2011

**End date:** 13/05/2011

**Organising entity:** University of P. J. Safarik

**Type of entity:** University

**City organizing entity:** Kosice, Slovakia

Arben Merkoçi.

**265 Title of the work:** Nanomaterials based biosensors

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Barcelona, Catalonia, Spain

**Date of event:** 11/05/2011

**End date:** 11/05/2011

**Organising entity:** FUNDACIÓ BARCELONA MEDIA UNIVERSITAT POMPEU FABRA

Arben Merkoçi.

**266 Title of the work:** Confocal Laser Scanning Microscopy In Nanobiosensing

**Name of the conference:** Focus on Microscopy 2011

**Type of participation:** 'Participatory - poster

**City of event:** Konstanz, Stuttgart, Germany

**Date of event:** 17/04/2011

**End date:** 20/04/2011

Helena Montón; Sergio Marín; Gemma Aragay; Alfredo de la Escosura; Maria Guix; Carme Nogués; Arben Merkoçi.

**267 Title of the work:** Electrochemical biosensors based on nanomaterials for diagnostics

**Name of the conference:** Imagenano - NanoBio&Med

**Type of participation:** 'Participatory - poster

**City of event:** Bilbao, Basque Country, Spain

**Date of event:** 11/04/2011

**End date:** 14/04/2011

Marisa Maltez da Costa; Alfredo de la Escosura Muñiz; Arben Merkoçi.

**268 Title of the work:** Nanotechnology and green chemistry

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Paris, France

**Date of event:** 24/03/2011

**End date:** 25/03/2011

**Organising entity:** Gastronomie Moleculaire et Chimie Analytique Verte, Paris Colegio de España.

Arben Merkoçi.

**269 Title of the work:** Nanomaterials for biosensing applications

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Thun, Switzerland





**Date of event:** 07/03/2011

**End date:** 07/03/2011

**Organising entity:** EMPA Thun, Laboratory for Mechanics of Materials and Nanostructures, Group of Electrochemistry

**270 Title of the work:** Nanoparticles for DNA, protein and cell sensing

**Type of event:** Seminar

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Milan, Italy

**Date of event:** 22/02/2011

**End date:** 22/02/2011

**Organising entity:** Organic and Medicinal Chemistry Department of Biotechnology and Biosciences University of Milano-Bicocca

Arben Merkoçi.

**271 Title of the work:** Biosensing through labelling with nanoparticles

**Name of the conference:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems. Improving the quality and security of citizen's life (Workshop: SPAIN-JAPAN)

**Type of event:** Workshop

**Type of participation:** Participatory - others

**City of event:** Barcelona, Catalonia, Spain

**Date of event:** 29/11/2010

**End date:** 30/11/2010

Arben Merkoçi.

**272 Title of the work:** On-off" Magneto-switchable Biosensor Based on Hybrid Nanobiomaterials

**Name of the conference:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems. Improving the quality and security of citizen's life (Workshop: SPAIN-JAPAN)

**Type of event:** Workshop

**Type of participation:** Participatory - oral communication

**City of event:** Barcelona, Catalonia, Spain

**Date of event:** 29/11/2010

**End date:** 30/11/2010

Arben Merkoçi; Briza Pérez.

**273 Title of the work:** Gold Nanoparticles modification with coordination ligands for sensing applications

**Name of the conference:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems. Improving the quality and security of citizen's life (Workshop: SPAIN-JAPAN)

**Type of participation:** Participatory - poster

**City of event:** Barcelona, Catalonia, Spain

**Date of event:** 29/11/2010

**End date:** 30/11/2010

Gemma Aragay; Josefina Pons; Josep Ros; Arben Merkoçi.

**274 Title of the work:** Heavy metals monitoring using screen-printed electrodes

**Name of the conference:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems. Improving the quality and security of citizen's life (Workshop: SPAIN-JAPAN)

**Type of participation:** Participatory - poster

**City of event:** Barcelona, Catalonia, Spain

**Date of event:** 29/11/2010

**End date:** 30/11/2010



Gemma Aragay Esteve; Anna Puig Font; Miquel Cadevall; Josefina Pons; Arben Merkoçi.

- 275 Title of the work:** Quantum dots for electrochemical detection of DNA and cells  
**Name of the conference:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems. Improving the quality and security of citizen's life (Workshop: SPAIN-JAPAN)  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 29/11/2010  
**End date:** 30/11/2010  
Sergio Marín; Helena Montón; Carme Nogués; Arben Merkoçi.
- 276 Title of the work:** Voltammetric biosensors using a nanoporous membrane based platform  
**Name of the conference:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems. Improving the quality and security of citizen's life (Workshop: SPAIN-JAPAN)  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 29/11/2010  
**End date:** 30/11/2010  
Alfredo de la Escosura Muñiz; Arben Merkoçi.
- 277 Title of the work:** Scanning electrochemical microscopy studies of nano and microstructured platforms with interest for biosensing applications  
**Name of the conference:** I Congreso Internacional de Docencia e Investigación Química  
**Type of event:** Conference  
**Type of participation:** Participatory - oral communication  
**City of event:** México D.F., Mexico  
**Date of event:** 27/11/2010  
**End date:** 29/11/2010  
Marisol Espinoza; Alfredo de la Escosura; Welter Cantanhede; Arben Merkoçi.
- 278 Title of the work:** Hybrid nanobiomaterials for magneto-switchable biosensing applications  
**Name of the conference:** I Congreso Internacional de Docencia e Investigación Química  
**Type of participation:** 'Participatory - poster  
**City of event:** Mexico D.F., Mexico  
**Date of event:** 27/11/2010  
**End date:** 29/11/2010  
Briza Pérez López; Arben Merkoçi.
- 279 Title of the work:** Nanoparticles based biosensors for diagnostics applications  
**Name of the conference:** International Symposium of Materials on Regenerative Medicine, 2010 ISOMRM  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Taiwan, China  
**Date of event:** 03/11/2010  
**End date:** 05/11/2010  
Arben Merkoçi.
- 280 Title of the work:** Nanoparticles for DNA, protein and cell sensors  
**Name of the conference:** Congreso internacional de docencia e investigación en química  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk



**City of event:** Ciudad de Mexico, Mexico

**Date of event:** 26/10/2010

**End date:** 26/10/2010

Arben Merkoçi.

- 281 Title of the work:** Nanoparticles for electrochemical biosensors  
**Name of the conference:** 3rd Workshop of the Sensors, Divisional Group of the Italian Chemical Society, GS2010  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Florence, Italy  
**Date of event:** 26/10/2010  
**End date:** 28/10/2010  
Arben Merkoçi.
- 282 Title of the work:** Nanoparticles for DNA, protein and cell sensors  
**Name of the conference:** SLONANO 2010  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Ljubljana, Slovenia  
**Date of event:** 20/10/2010  
**End date:** 22/10/2010  
Arben Merkoçi.
- 283 Title of the work:** Nanoparticles for DNA, protein and cell sensors  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Oxford, United Kingdom  
**Date of event:** 12/10/2010  
**End date:** 12/10/2010  
**Organising entity:** Concateno  
Arben Merkoçi.
- 284 Title of the work:** Electrochemical aptasensor using nanoporous platforms  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Wilanee Chunglok; Alfredo de la Escosura; Arben Merkoçi.
- 285 Title of the work:** Non-toxic ZnS nanoparticles as electrochemical tags in biosensing  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Helena Montón; Sergio Marin; Carme Nogués; Arben Merkoçi.



- 286** **Title of the work:** Scanning electrochemical microscopy studies of nano and microstructured platforms with interest for biosensing applications  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Marisol Espinoza; Alfredo de la Escosura; Welter Cantanhede; Arben Merkoçi.
- 287** **Title of the work:** Effect of gold nanoparticles size on electrochemical immunosensing  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Claudio Parolo; Alfredo de la Escosura Muñiz; Arben Merkoçi.
- 288** **Title of the work:** Gold nanoparticles modification with intramolecular coordination ligands with interest for sensing applications  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Gemma Aragay; Josefina Pons; Josep Ros; Arben Merkoçi.
- 289** **Title of the work:** Lateral flow immunoassay using gold nanoparticles as labels  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Maëlle Perfezou; Claudio Parolo; Alfredo de la Escosura Muñiz; Arben Merkoçi.
- 290** **Title of the work:** On-off" Magneto-switchable Biosensor Based on Hybrid Nanobiomaterials  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Briza Pérez López; Arben Merkoçi.
- 291** **Title of the work:** Single nucleotide polymorphism detection using a selective polymerase chain reaction assay  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Nicholas Kleovoulou; Claudio Parolo; Alfredo de la Escosura Muñiz; Arben Merkoçi.



- 292** **Title of the work:** Synthesis of bismuth nanoparticles and applications in metals sensing  
**Name of the conference:** XV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant Carles de la Ràpita, Catalonia, Spain  
**Date of event:** 16/09/2010  
**End date:** 17/09/2010  
Miquel Cadevall; Josep Ros; Arben Merkoçi.
- 293** **Title of the work:** Nanoparticles for DNA, protein and cell sensing  
**Name of the conference:** ANM 2010, 3rd International Conference on Advanced Nano Materials  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Agadir, Morocco  
**Date of event:** 12/09/2010  
**End date:** 15/09/2010  
Arben Merkoçi.
- 294** **Title of the work:** Nanoparticles for DNA, protein and cell sensing  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Albuquerque, United States of America  
**Date of event:** 08/09/2010  
**End date:** 08/09/2010  
**Organising entity:** Sandia National Laboratories
- 295** **Title of the work:** Protein detection using gold nanoparticles as labels and electrochemical sensing routes  
**Name of the conference:** 13th International Conference on Electroanalysis (ESEAC 2010)  
**Type of participation:** 'Participatory - poster  
**City of event:** Gijón, Principality of Asturias, Spain  
**Date of event:** 20/06/2010  
**End date:** 24/06/2010  
Alfredo de la Escosura Muñiz; Marisa Maltez da Costa; Claudio Parolo; Arben Merkoçi.
- 296** **Title of the work:** Scanning electrochemical microscopy studies of nano and microstructured platforms with interest for biosensing applications  
**Name of the conference:** 13th International Conference on Electroanalysis (ESEAC 2010)  
**Type of participation:** 'Participatory - poster  
**City of event:** Gijón, Principality of Asturias, Spain  
**Date of event:** 20/06/2010  
**End date:** 24/06/2010  
Marisol Espinoza Castañeda; Alfredo de la Escosura Muñiz; Welter Cantanhede Silva; Arben Merkoçi.
- 297** **Title of the work:** Magnetic and electrokinetic manipulation on microchip device for bead based immunoassay  
**Name of the conference:** II International Workshop on Analytical Miniaturization  
**Type of participation:** 'Participatory - poster  
**City of event:** Oviedo, Principality of Asturias, Spain  
**Date of event:** 07/06/2010  
**End date:** 08/06/2010  
Maria Guix; Adriano Ambrosi; Arben Merkoçi.



- 298** **Title of the work:** New Lab-on-a-chip designs for biological samples sorting and detection basen on micro/nanostructures  
**Name of the conference:** II International Workshop on Analytical Miniaturization  
**Type of participation:** 'Participatory - poster  
**City of event:** Oviedo, Principality of Asturias, Spain  
**Date of event:** 07/06/2010  
**End date:** 08/06/2010  
Mariana Medina Sánchez; Maria Guix Noguera; Arben Merkoçi.
- 299** **Title of the work:** Aptamers based electrochemical biosensor for protein detection using carbon nanotubes platforms  
**Name of the conference:** BIOSENSORS2010: 20th Anniversary World Congress on Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Glasgow, United Kingdom  
**Date of event:** 26/05/2010  
**End date:** 28/05/2010  
Pinar Kara; Maria Guix; Alfredo de la Escosura Muñiz; Marisa Maltez da Costa; M. Ozsoz; Arben Merkoçi.
- 300** **Title of the work:** Enzyme entrapment by cyclodextrine electropolymerization onto carbon nanotube modified screen-printed electrode  
**Name of the conference:** Biosensors2010: 20th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Glasgow, United Kingdom  
**Date of event:** 26/05/2010  
**End date:** 28/05/2010  
Georgina Alarcón Ángeles; Maria Guix Noguera; Welter Cantanhede Silva; María Teresa Ramírez Silva; Manuel Palomar Pardavé; Arben Merkoçi.
- 301** **Title of the work:** Gold nanoparticle-based electrochemical magnetoimmunosensor for rapid detection of anti-hepatitis B virus antibodies in human serum  
**Name of the conference:** Biosensors2010: 20th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Glasgow, United Kingdom  
**Date of event:** 26/05/2010  
**End date:** 28/05/2010  
Marisa Maltez da Costa; Alfredo de la Escosura Muñiz; Cristian Sánchez Espinel; Belén Díaz Freitas; África González Fernández; Arben Merkoçi.
- 302** **Title of the work:** Gold nanoparticle-based electrochemical magnetoimmunosensors for rapid detection of clinical biomarkers  
**Name of the conference:** Biosensors2010: 20th Biosensors World Congress  
**Type of participation:** 'Participatory - poster  
**City of event:** Glasgow, United Kingdom  
**Date of event:** 26/05/2010  
**End date:** 28/05/2010  
Marisa Maltez da Costa; Alfredo de la Escosura Muñiz; Cristian Sánchez Espinel; Belen Diaz Freitas; África González Fernández; Arben Merkoçi.
- 303** **Title of the work:** Nanoparticle based enhancement of electrochemical DNA hybridization signal using nanoporous electrodes  
**Name of the conference:** BIOSENSORS2010, 20th Biosensors World Congress



**Type of participation:** Participatory - oral communication  
**City of event:** Glasgow, United Kingdom  
**Date of event:** 26/05/2010  
**End date:** 28/05/2010  
Alfredo de la Escosura Muñiz; Arben Merkoçi.

**304 Title of the work:** Nanomaterials based biosensors for cost effective cancer diagnostics  
**Name of the conference:** Towards Personalized Cancer Medicine  
**Type of participation:** 'Participatory - poster  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 19/05/2010  
**End date:** 21/05/2010  
Arben Merkoçi; Alfredo de la Escosura Muñiz; Sergio Marin; Marisa Maltez da Costa.

**305 Title of the work:** Nanoparticles for DNA, protein and cell sensors  
**Name of the conference:** BIOSENSORS 2010, 20th Anniversary World Congress on Biosensors  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Glasgow, United Kingdom  
**Date of event:** 2010  
**End date:** 2010  
Arben Merkoçi.

**306 Title of the work:** Biosensors based on nanoparticles. Applications in biomedical field  
**Name of the conference:** Drug Discovery Workshop: Emerging Directions in Drug Delivery  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 2010  
**End date:** 2010  
Arben Merkoçi.

**307 Title of the work:** Nanomaterials for biosensing  
**Name of the conference:** Global COE Program, Information, Electrical Engineering and Electronics  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Keio, Japan  
**Date of event:** 2010  
**End date:** 2010

**308 Title of the work:** Nanomaterials for biosensing applications  
**Name of the conference:** MICINN (Spain) – JST (Japan) Joint Workshop on Nanosciences and New Materials for Environmental Challenges”  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 2010  
**End date:** 2010  
Arben Merkoçi.



- 309** **Title of the work:** Nanoparticles based biosensors for diagnostics applications  
**Name of the conference:** International Workshop on Nanomedicine: Translation of nanosciences and nanotechnologies to clinical applications”  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Málaga, Andalusia, Spain  
**Date of event:** 2010  
**End date:** 2010  
Arben Merkoçi.
- 310** **Title of the work:** Nanomaterials for DNA, protein and cell sensors  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tsukuba, Ibaraki, Japan  
**Date of event:** 2010  
**End date:** 2010  
**Organising entity:** National Institute for Materials Science  
Arben Merkoçi.
- 311** **Title of the work:** Characterization and visualisation of the tyrosinase distribution onto multi-walled carbon nanotubes modified Screen Printed Electrode  
**Name of the conference:** Nanotech Europe 2009  
**Type of participation:** 'Participatory - poster  
**City of event:** Berlin, Germany  
**Date of event:** 28/09/2009  
**End date:** 30/09/2009  
Maria Guix Noguera; Georgina Alarcón Ángeles; Briza Pérez López; Adriano Ambrosi; Arben Merkoçi.
- 312** **Title of the work:** Gold Nanoparticles modification with coordination ligands for sensing applications  
**Name of the conference:** Nanotech Europe 2009  
**Type of participation:** 'Participatory - poster  
**City of event:** Berlin, Germany  
**Date of event:** 28/09/2009  
**End date:** 30/09/2009  
Gemma Aragay; Josefina Pons; Josep Ros; Arben Merkoçi.
- 313** **Title of the work:** Direct electrical detection of point mutations at multi walled carbon nanotube modified electrodes  
**Name of the conference:** XIV Trobada Transfronterera sobre Sentos i Biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 24/09/2009  
**End date:** 25/09/2009  
Pinar Kara; Maria Guix Noguera; Alfredo de la Escosura Muñiz; M. Ozsoz; Arben Merkoçi.
- 314** **Title of the work:** Heavy metal screen-printed electrodes integration in an in-situ voltammetric probe  
**Name of the conference:** XIV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 24/09/2009  
**End date:** 25/09/2009





Gemma Aragay; Anna Puig; Mariana Medina; Arben Merkoçi; Luca Sanfilippo; Marzio Malizia; Pompeo Moschetta; Pietro Moschetta.

- 315** **Title of the work:** PDMS based LAB-ON-A-CHIP with electrochemical detection using screen printed electrodes  
**Name of the conference:** XIV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 24/09/2009  
**End date:** 25/09/2009  
Mariana Medina; Sergio Marín; Maria Guix; Georgina Alarcón; Adriano Ambrosi; Arben Merkoçi; Diego A. Garzón.
- 316** **Title of the work:** Silver, gold and the corresponding core shell nanoparticles for sensing applications  
**Name of the conference:** XIV Trobada transfronterera sobre sensors i biosensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 24/09/2009  
**End date:** 25/09/2009  
Mariana Medina; D.A. Garzón; Sergio Marin; Maria Guix; Georgina Alarcón; Adriano Ambrosi; Arben Merkoçi.
- 317** **Title of the work:** Immunosensor to identify tumor cells: a novel low cost and efficient device based on electrocatalytic effect induced by gold nanoparticles conjugated to antibodies  
**Name of the conference:** II European Congress of Immunology  
**Type of participation:** 'Participatory - poster  
**City of event:** Berlin, Germany  
**Date of event:** 13/09/2009  
**End date:** 16/09/2009  
Alfredo de la Escosura; Marisa Maltez; Cristian Sánchez; Belen Diaz; A. Hernández; África González; Arben Merkoçi.
- 318** **Title of the work:** Design of a phenol biosensor based on carbon nanotubes  
**Name of the conference:** Workshop on Environmental Risk Management tools for water quality monitoring  
**Type of participation:** 'Participatory - poster  
**City of event:** Southampton, United Kingdom  
**Date of event:** 30/03/2009  
**End date:** 30/03/2009  
Maria Guix; Melike Sahin; Briza Pérez; Adriano Ambrosi; Arben Merkoçi.
- 319** **Title of the work:** Heavy metals detection using screen-printed electrodes  
**Name of the conference:** Workshop on Environmental Risk Management tools for water quality monitoring  
**Type of participation:** 'Participatory - poster  
**City of event:** Southampton, United Kingdom  
**Date of event:** 30/03/2009  
**End date:** 30/03/2009  
Gemma Aragay; Anna Puig; Raquel Güell; Arben Merkoçi.
- 320** **Title of the work:** In-situ voltammetric probe for heavy metal detection  
**Name of the conference:** Workshop on Environmental Risk Management tools for water quality monitoring  
**Type of participation:** 'Participatory - poster



**City of event:** Southampton, United Kingdom

**Date of event:** 30/03/2009

**End date:** 30/03/2009

Pompeo Moschetta; Luca Sanfilippo; Gemma Aragay; Anna Puig; Miquel Cadevall; Mariana Medina; Arben Merkoçi.

**321 Title of the work:** Electrochemical Flow Through System for Real-Time Controlling of Environmental Pollution from Heavy Metals

**Name of the conference:** Pittcon Conference

**Type of participation:** Participatory - poster

**City of event:** Chicago, United States of America

**Date of event:** 08/03/2009

**End date:** 13/03/2009

Gemma Aragay Esteve; Anna Puig Font; Arben Merkoçi.

**322 Title of the work:** Biosensores electroquímicos basados en nanopartículas y nanomateriales: aplicaciones en biomedicina

**Name of the conference:** Nanotecnologías en Biomedicina

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** A Coruña, Spain

**Date of event:** 2009

**End date:** 2009

**Organising entity:** Universidad Internacional Menéndez-Pelayo  
Arben Merkoçi.

**323 Title of the work:** Nanobiosensing: synergy between nanotechnology methods, tools and materials

**Name of the conference:** Asia Pacific Conference on Chemistry Education & 24th Philippine Chemistry Congress (APC2E•24PC2): Chemistry for All: Safeguarding Man, Society and the Environment”

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Tagbilaran City, Bohol Island, Philippines

**Date of event:** 2009

**End date:** 2009

Arben Merkoçi.

**324 Title of the work:** Nanomaterial based electrochemical transducing platforms for biomedical applications

**Name of the conference:** Medical Physics and Biomedical Engineering World Congress 2009

**Type of event:** Conference

**Type of participation:** Participatory - oral communication

**City of event:** Munich, Germany

**Date of event:** 2009

**End date:** 2009

Arben Merkoçi.

**325 Title of the work:** Nanomaterials for fast DNA, protein and cell analysis

**Name of the conference:** 11th International Conference on Advanced Materials, Symposium I: New Materials and Processes for Sensing and Biosensing

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Río de Janeiro, Brazil



**Date of event:** 2009

**End date:** 2009

Arben Merkoçi.

- 326** **Title of the work:** Using nanoparticles makes an easier sensing and biosensing  
**Name of the conference:** AsiaSense 2009, The 4th Intern. Conference on Sensors. Con.Technology for Sensors application  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Bangkok, Thailand  
**Date of event:** 2009  
**End date:** 2009  
Arben Merkoçi.
- 327** **Title of the work:** An electrochemical biosensor design for protein detection based on aptamers  
**Name of the conference:** XIV Trobada Transfronterera sobre Sentos i Biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 2009  
**End date:** 2009
- 328** **Title of the work:** Interferences in heavy metals detection using voltammetric screen-printed electrodes with interest for seawater quality control  
**Name of the conference:** XIV Trobada Transfronterera sobre Sentos i Biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 2009  
**End date:** 2009
- 329** **Title of the work:** Investigation of electrochemical responses of different sized gold nanoparticles using screen-printed carbon electrodes  
**Name of the conference:** XIV Trobada Transfronterera sobre Sentos i Biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Banyuls-Sur-Mer, France  
**Date of event:** 2009  
**End date:** 2009
- 330** **Title of the work:** Nanomaterials for biosensing  
**Name of the conference:** NanoGune (San Sebastian)- BCN - TECHNION (Israel) Workshop  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** San Sebastian, Basque Country, Spain  
**Date of event:** 2009  
**End date:** 2009  
Arben Merkoçi.



- 331 Title of the work:** Voltammetric screen-printed sensors for heavy metals and phenols. Achievements and future prospects  
**Name of the conference:** Workshop Environmental Risk Management tools for water quality monitoring”  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Southampton, United Kingdom  
**Date of event:** 2009  
**End date:** 2009  
Arben Merkoçi.
- 332 Title of the work:** (Bio)sensors based on nanomaterials. Applications in environmental monitoring  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Banyuls sur mer, France  
**Date of event:** 2009  
**End date:** 2009  
**Organising entity:** Banyuls Observatory of the University of Paris 6  
Arben Merkoçi.
- 333 Title of the work:** Biosensors basats en nanomaterials i possibles aplicacions clíniques  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Barcelona, Catalonia, Spain  
**Date of event:** 2009  
**End date:** 2009  
**Organising entity:** Fundació Sant Joan de Déu. Hospital Sant Joan de Déu  
Arben Merkoçi.
- 334 Title of the work:** Nanomaterials and applications in biosensors  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Grenoble, France  
**Date of event:** 2009  
**End date:** 2009  
**Organising entity:** Département de Chimie Moléculaire, Université Joseph Fourier  
Arben Merkoçi.
- 335 Title of the work:** Nanomaterials and applications in biosensors  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Padua, Italy  
**Date of event:** 2009  
**End date:** 2009  
**Organising entity:** Università degli Studi di Padova, Dipartimento di Scienze Chimiche  
Arben Merkoçi.
- 336 Title of the work:** Nanotechnology and Biosensors. Applications in health and environmental studies  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Tirana, Albania  
**Date of event:** 2009



**End date:** 2009

**Organising entity:** Health Institute & Agriculture University

Arben Merkoçi.

- 337** **Title of the work:** Biosensores electroquímicos nanoestructurados  
**Name of the conference:** Summer School Nanociencia y Nanotecnología Analíticas"  
**Type of event:** Summer School  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Ciudad Real, Castile-La Mancha, Spain  
**Date of event:** 2009  
**End date:** 2009  
**Organising entity:** Universidad de Castilla-La Mancha  
Arben Merkoçi.
- 338** **Title of the work:** Stripping voltammetry as a robust detection method for heavy metals  
**Name of the conference:** CAREX (Coordination Action for Research Activities on life in Extreme Environments) Workshop, "Priorities for environment specific technological developments and infrastructures  
**Type of participation:** 'Participatory - poster  
**City of event:** Sant-Feliu de Guixols, Catalonia, Spain  
**Date of event:** 03/12/2008  
**End date:** 05/12/2008  
Gemma Aragay; Anna Puig; Arben Merkoçi.
- 339** **Title of the work:** Electrochemical Detection Nanosystems for Lab-On-A-Chip with Capillary Electrophoresis  
**Name of the conference:** 6th Ibero-American Congress on Sensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sao Paulo, Brazil  
**Date of event:** 24/11/2008  
**End date:** 26/11/2008  
Adriano Ambrosi; Briza Pérez; Arben Merkoçi.
- 340** **Title of the work:** Voltammetric screen-printed sensors for flow through detection of heavy metal  
**Name of the conference:** 6th Ibero-American Congress on Sensors  
**Type of participation:** 'Participatory - poster  
**City of event:** Sao Paulo, Brazil  
**Date of event:** 24/11/2008  
**End date:** 26/11/2008  
Gemma Aragay; Anna Puig; Arben Merkoçi.
- 341** **Title of the work:** Electrochemical bioassays based on Gold Nanoparticle tags  
**Name of the conference:** XIII TROBADA TRANSFRONTERERA SOBRE SENSORS I BIOSENSORS  
**Type of participation:** 'Participatory - poster  
**City of event:** Andorra la Vella, Andorra  
**Date of event:** 18/09/2008  
**End date:** 19/09/2008  
Georgina Alarcón; María Teresa Ramírez; Arben Merkoçi.
- 342** **Title of the work:** Lead and cadmium monitoring in seawater using screen-printed electrodes  
**Name of the conference:** XIII TROBADA TRANSFRONTERERA SOBRE SENSORS I BIOSENSORS  
**Type of participation:** 'Participatory - poster  
**City of event:** Andorra la Vella, Andorra



**Date of event:** 18/09/2008

**End date:** 19/09/2008

Raquel Güell; Gemma Aragay; Claudia Fontàs; Enriqueta Anticó; Arben Merkoçi.

**343 Title of the work:** Novel Screen Printed Biosensors based on Tyrosinase-Multi-Walled Carbon Nanotubes for Phenol Compounds determination

**Name of the conference:** XIII TROBADA TRANSFRONTERERA SOBRE SENSORS I BIOSENSORS

**Type of participation:** 'Participatory - poster

**City of event:** Andorra la Vella, Andorra

**Date of event:** 18/09/2008

**End date:** 19/09/2008

Briza Pérez; Maria Guix; Adriano Ambrosi; Arben Merkoçi.

**344 Title of the work:** Novel Screen Printed Biosensors based on Tyrosinase-Multi-Walled Carbon Nanotubes for Phenol Compounds determination

**Name of the conference:** XIII Trobada transfronterera sobre sensors i biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Andorra la Vella, Andorra

**Date of event:** 18/09/2008

**End date:** 19/09/2008

Briza Pérez; Maria Guix; Adriano Ambrosi; Arben Merkoçi.

**345 Title of the work:** Direct electrochemical detection of gold nanoparticles: application in magnetobiosensors

**Name of the conference:** TNT2008, Trends in Nanotechnology

**Type of participation:** 'Participatory - poster

**City of event:** Oviedo, Principality of Asturias, Spain

**Date of event:** 01/09/2008

**End date:** 05/09/2008

Alfredo de la Escosura; Adriano Ambrosi; Marisa Maltez; Arben Merkoçi.

**346 Title of the work:** Nanostructured biosensors for the analysis of phenolic compounds

**Name of the conference:** 3rd Annual Meeting of Institute Alb-Shkenca IASH

**Type of participation:** 'Participatory - poster

**City of event:** Tirana, Albania

**Date of event:** 01/09/2008

**End date:** 03/09/2008

Briza Pérez; Humberto Takeda; Adriano Ambrosi; Orlando Fatibello; Salvador Alegret; Arben Merkoçi.

**347 Title of the work:** Screen-Printed Sensors for the Determination of Trace Heavy Metals

**Name of the conference:** 3rd Annual Meeting of Institute Alb-Shkenca IASH

**Type of participation:** 'Participatory - poster

**City of event:** Tirana, Albania

**Date of event:** 01/09/2008

**End date:** 03/09/2108

Gemma Aragay; Anna Puig; Arben Merkoçi.

**348 Title of the work:** Electrochemical stripping analysis, a powerful technique for real-time controlling of environment pollution from heavy metals

**Name of the conference:** iEMSs 2008, International Congress on Environmental Modelling and Software Integrating Sciences and Information Technology for Environmental Assessment and Decision Making

**Type of participation:** Participatory - oral communication



**City of event:** Barcelona, Catalonia, Spain

**Date of event:** 07/07/2008

**End date:** 10/07/2008

Gemma Aragay Esteve; Anna Puig Font; Serena Laschi; Marco Mascini; Luca Sanfilippo; Arben Merkoçi.

**349 Title of the work:** Nanostructured conducting polymer based biosensors for the analysis of phenolic compounds

**Name of the conference:** 12th International Conference on Electroanalysis, ESEAC 2008

**Type of participation:** 'Participatory - poster

**City of event:** Prague, Czech Republic

**Date of event:** 16/06/2008

**End date:** 19/06/2008

Humberto Takeda; Briza Pérez; Adriano Ambrosi; Orlando Fatibello Filho; R.C. Faria; L.H.C. Mattoso; Arben Merkoçi.

**350 Title of the work:** Screen-printed electrodes for heavy metals monitoring in sea water

**Name of the conference:** 12th International Conference on Electroanalysis: ESEAC 2008

**Type of participation:** 'Participatory - poster

**City of event:** Prague, Czech Republic

**Date of event:** 16/06/2008

**End date:** 19/06/2008

Raquel Güell; Gemma Aragay; Claudia Fontàs; Enriqueta Anticó; Arben Merkoçi.

**351 Title of the work:** Application of Novel Materials To Screen-Printed Sensors For Environmental Analysis

**Name of the conference:** Chemical Sciences Printed Functional Materials Symposium

**Type of participation:** 'Participatory - poster

**City of event:** Dublin, Ireland

**Date of event:** 26/05/2008

**End date:** 27/05/2008

Adriano Ambrosi; Briza Pérez; Gemma Aragay; Anna Puig; Arben Merkoçi.

**352 Title of the work:** Amperometric biosensing of phenols based on carbon nanotube modified devices

**Name of the conference:** 10th World Congress on Biosensors

**Type of participation:** 'Participatory - poster

**City of event:** Shanghai, China

**Date of event:** 14/05/2008

**End date:** 16/05/2008

Briza Pérez; Manel del Valle; Salvador Alegret; Arben Merkoçi.

**353 Title of the work:** Electrochemical genosensors labelled with CdS QDs

**Name of the conference:** NANOSPAIN 2008

**Type of participation:** 'Participatory - poster

**City of event:** Braga, Portugal

**Date of event:** 14/04/2008

**End date:** 18/04/2008

Sergio Marín; Maria Teresa Castañeda; Salvador Alegret; Arben Merkoçi.

**354 Title of the work:** Nanostructured biosensors for the analysis of phenolic compounds

**Name of the conference:** NANOSPAIN 2008

**Type of participation:** 'Participatory - poster

**City of event:** Braga, Portugal



**Date of event:** 14/04/2008

**End date:** 18/04/2008

Briza Pérez; Humberto Takeda; Adriano Ambrosi; Orlando Fatibello; Salvador Alegret; Arben Merkoçi.

**355 Title of the work:** Clinical applications of gold nanoparticle based magnetobiosensors

**Name of the conference:** XXIV Trobades Científiques de la Mediterrània

**Type of event:** Conference

**Type of participation:** Participatory - oral communication

**City of event:** Maó, Balearic Islands, Spain

**Date of event:** 2008

**End date:** 2008

**356 Title of the work:** Detection biosystems based on nanoparticles

**Name of the conference:** Ibersensor 2008, 6th Ibero-American Congress on Sensors

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Sao Paulo, Brazil

**Date of event:** 2008

**End date:** 2008

Arben Merkoçi.

**357 Title of the work:** Nanobioelectronics, a powerful technology for DNA and protein Sensing

**Name of the conference:** New Tools for Biotechnologies

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Brno, Czech Republic

**Date of event:** 2008

**End date:** 2008

Arben Merkoçi.

**358 Title of the work:** Nanobiotechnology and biosensor opportunities

**Name of the conference:** XXIV Trobades Científiques de la Mediterrània

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Menorca, Balearic Islands, Spain

**Date of event:** 2008

**End date:** 2008

Arben Merkoçi.

**359 Title of the work:** Nanobiotechnology and biosensors. Potential applications in agriculture and food technology

**Name of the conference:** 7th Brazilian MRS Meeting

**Type of event:** Conference

**Type of participation:** Participatory - invited/keynote talk

**City of event:** Guarujá, Brazil

**Date of event:** 2008

**End date:** 2008

Arben Merkoçi.





- 360** **Title of the work:** Nanomaterials and (bio)sensing opportunities  
**Name of the conference:** 7th Brazilian MRS Meeting  
**Type of event:** Conference  
**Type of participation:** Participatory - others  
**City of event:** Guarujá, Brazil  
**Date of event:** 2008  
**End date:** 2008  
Arben Merkoçi.
- 361** **Title of the work:** Sensing DNA and proteins via tagging with nanoparticles  
**Name of the conference:** 59th Annual Meeting of the International Society of Electrochemistry  
**Type of event:** Conference  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Sevilla, Andalusia, Spain  
**Date of event:** 2008  
**End date:** 2008  
Arben Merkoçi.
- 362** **Title of the work:** Electrochemical bioassays based on gold nanoparticle tags  
**Name of the conference:** XIII Trobada Transfronterera sobre Sensors i Biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Andorra la Vella, Andorra  
**Date of event:** 2008  
**End date:** 2008
- 363** **Title of the work:** Flow through system using screen-printed electrodes for stable monitoring of heavy metal pollution  
**Name of the conference:** XIII Trobada Transfronterera sobre Sensors i Biosensors  
**Type of event:** Workshop  
**Type of participation:** Participatory - oral communication  
**City of event:** Andorra la Vella, Andorra  
**Date of event:** 2008  
**End date:** 2008
- 364** **Title of the work:** Nanobioelectronics for biosensors applications  
**Name of the conference:** 2nd Taiwan-Spain Workshop on Micro/Nano Electronics  
**Type of event:** Workshop  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Cheng Kung, Taiwan, China  
**Date of event:** 2008  
**End date:** 2008  
Arben Merkoçi.
- 365** **Title of the work:** Nanomaterials and (bio)sensing opportunities  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Sao Carlos, Brazil  
**Date of event:** 2008  
**End date:** 2008  
**Organising entity:** EMBRAPA (Embrapa Instrumentação Agropecuária)



Arben Merkoçi.

- 366** **Title of the work:** Nanoscience, Nanotechnology and Biosensors Development  
**Type of event:** Seminar  
**Type of participation:** Participatory - invited/keynote talk  
**City of event:** Arizona, United States of America  
**Date of event:** 2008  
**End date:** 2008  
**Organising entity:** University of Advancing Technology  
Arben Merkoçi.
- 367** **Title of the work:** Electrochemical and Morphological Characterization of Carbon Nanostructured Materials for Phenol Biosensor Applications  
**Name of the conference:** II Workshop of Analytical Nanoscience and Nanotechnologies  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 2008  
**End date:** 2008
- 368** **Title of the work:** Electrochemical routes for fast and efficient detection of biomolecules based on gold nanoparticles  
**Name of the conference:** II Workshop sobre Nanociencia y Nanotecnología Analíticas  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragon, Catalonia, Spain  
**Date of event:** 2008  
**End date:** 2008
- 369** **Title of the work:** Gold nanoparticles modification with intramolecular coordination ligands with interests for sensing applications  
**Name of the conference:** II Workshop en Nanociencia y Nanotecnología Analítica  
**Type of participation:** 'Participatory - poster  
**City of event:** Tarragona, Catalonia, Spain  
**Date of event:** 2008  
**End date:** 2008
- 370** **Title of the work:** Voltammetric screen-printed sensors for flow through detection of heavy metals  
**Name of the conference:** Ibersensors 2008  
**Type of participation:** 'Participatory - poster  
**City of event:** México D.F., Mexico  
**Date of event:** 2008  
**End date:** 2008
- 371** **Title of the work:** Nanobiosensors for diagnostics applications  
**Name of the conference:** The 9th International Conference on Sensors (AsiaSense 2021)  
**Type of event:** Conference  
**Type of participation:** Participatory - Plenary session  
**Corresponding author:** Yes  
**City of event:** on-line,  
Arben Merkoçi.

## R&D management and participation in scientific committees

### Organization of R&D activities

- 1** **Title of the activity:** 22nd edition of the Trends in Nanotechnology International Conference (TNT2022)  
**Type of activity:** Conference  
**City convening entity:** Tirana, Albania  
**Type of participation:** Organiser  
**Start-End date:** 03/10/2022 - 07/10/2022
- 2** **Title of the activity:** TNT 2021 - TRENDS IN NANOTECHNOLOGY  
**Type of activity:** Conference  
**City convening entity:** Tirana, Albania  
**Type of participation:** Organiser  
**Start-End date:** 04/10/2021 - 08/10/2021
- 3** **Title of the activity:** Biosensors 2021  
**Type of activity:** Conference  
**City of event:** on-line,  
**Type of participation:** Organiser  
**Start-End date:** 26/07/2021 - 29/07/2021
- 4** **Title of the activity:** NANOTECHNOLOGIES FOR 21st CENTURY COOPERATION EVENT BETWEEN ALBANIA, JAPAN AND SPAIN  
**Type of activity:** Workshop  
**City of event:** Tokyo, Japan  
**Convening entity:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City convening entity:** Bellaterra, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 29/01/2020 - 29/01/2020
- 5** **Title of the activity:** VIII International Congress on Analytical Nanoscience and Nanotechnology (NyNA 2017)  
**Type of activity:** Congress  
**City of event:** Barcelona, Catalonia, Spain  
**Convening entity:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**City convening entity:** Bellaterra, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 03/07/2017 - 05/07/2017  
**Type of entity:** R&D Centre
- 6** **Title of the activity:** ICREA Workshop on Graphene Nanobiosensors  
**Type of activity:** Workshop  
**City of event:** Barcelona, Catalonia, Spain  
**Convening entity:** Fundació Institut Català de Nanociència i Nanotecnologia  
**City convening entity:** Bellaterra, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 25/05/2015 - 26/05/2015  
**Geographical area:** Non EU International  
**Type of entity:** R&D Centre



- 7** **Title of the activity:** 1st WORKSHOP ON NANOBIOSENSORS FOR WATER MONITORING  
**Type of activity:** Workshop **Geographical area:** European Union  
**City of event:** Bellaterra, Catalonia, Spain  
**Convening entity:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City convening entity:** Bellaterra, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 24/03/2015 - 26/03/2015 **Duration:** 3 days
- 8** **Title of the activity:** 19th Transfrontier Meeting of Sensors and Biosensors  
**Type of activity:** Workshop **Geographical area:** European Union  
**City of event:** Bellaterra, Catalonia, Spain  
**Convening entity:** Fundació Institut Català de Nanociència i Nanotecnologia **Type of entity:** R&D Centre  
**City convening entity:** Bellaterra, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 25/09/2014 - 26/09/2014
- 9** **Title of the activity:** "III International Workshop on Analytical Miniaturization and NANotechnologies", WAM-NANO2012  
**Type of activity:** Workshop  
**Convening entity:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City convening entity:** Barcelona, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 11/06/2012 - 12/06/2012
- 10** **Title of the activity:** NANOJASP 2010 - Nanomaterials based biosensors and biosystems.  
**Type of activity:** Workshop  
**Convening entity:** FUNDACION PRIVADA INSTITUT CATALÀ DE PALEOECOLOGIA HUMANA I EVOLUCIÓ SOCIAL  
**City convening entity:** Barcelona, Catalonia, Spain  
**Type of participation:** Organiser  
**Start-End date:** 29/11/2010 - 30/11/2010
- 11** **Title of the activity:** XIII TROBADA TRANSFRONTERERA SOBRE SENSORS I BIOSENSORS  
**Type of activity:** Conference  
**Convening entity:** FUNDACION PRIVADA INSTITUT CATALA DE NANOTECNOLOGIA  
**City convening entity:** Andorra la Vella, Andorra  
**Type of participation:** Organiser  
**Start-End date:** 18/09/2008 - 19/09/2008
- 12** **Title of the activity:** Biosensors for Pandemics 2021: Reliable and efficient nanotech-based diagnostics in emergency situations  
**Type of activity:** Scientific Chairperson/Organizer of the on-line Conference  
**Convening entity:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA  
**Start date:** 02/02/2021
- 13** **Title of the activity:** Biosensors for Pandemics: Reliable and efficient nanotech-based diagnostics in emergency situations  
**Type of activity:** Scientific Chairperson/Organizer of the on-line conference  
**Convening entity:** FUNDACIÓ INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA



**Start date:** 06/05/2020

## Other achievements

### Stays in public or private R&D centres

- 1 Entity:** UNIVERSITY OF IOANNINA  
**City of entity:** Ioannina, Greece  
**Start-End date:** 01/10/1992 - 31/03/1993  
**Goals of the stay:** Post-doctoral  
**Provable tasks:** Research in the kinetic and mechanistic study of complexation phenomena through the use of electrochemical sensors
- 2 Entity:** POLYTECHNICAL UNIVERSITY OF BUDAPEST  
**City of entity:** Budapest, Hungary  
**Start-End date:** 01/06/1992 - 30/06/1992  
**Goals of the stay:** Post-doctoral  
**Provable tasks:** • Developed copper ion-selective-electrodes for FIA systems and PVC based ammonium ion-selective electrodes