



PROGRAMA

Martes 8 de julio

17:00-19:00 Recogida de documentación

19:30 **Vino de bienvenida**

Miércoles 9 de julio

09:00 Sesión de apertura

Sesión I, presidida por M^a Paz Sevilla Sierra

09:30 Conferencia Plenaria

PL-1. Concepción Domingo

Raman Spectroscopy, a “broad-spectrum” tool: from rock art to Mars exploration; from graphene-based materials to medical diagnosis or cosmetics industry

10:15 Conferencia Invitada

IL-1. Martín Resano

Non-invasive methods for clinical elemental analysis. Direct analysis of dried matrix spots for diagnosis and control

10:45 Café

Sesión II, presidida por Maria Paula Marques y Belén Maté Naya

11:15 Conferencia Invitada

IL-2. Helena Vieira Alberto

Spectroscopy of a muonium atom formed inside a semiconductor

11:45 Comunicaciones Orales: Nanotecnología

O-01. Diameter selection of carbon nanotubes in arrays of polymer/SWCNT nanowires by template wetting

M.C. García-Gutiérrez, C. Domingo

O-02. Synthesis and study of plasmonic properties of gold-silver nanostructures: From a spherical nanoparticles to ultrathin nanowires

J. Crespo, A. Falqui, J.M. López-de-Luzuriaga, M. Monge, M. E. Olmos, M. Rodríguez-Castillo, M. Sestu, K. Soulantica

O-03. Gaps induced by molecular linkage of plasmonic nanoparticles in colloidal suspensions for SERS enhanced pesticide sensing

S. Sánchez-Cortés, J. Kubackova, D. Jancura, J.V. García-Ramos

O-04. An ICPMS-based analytical platform for the determination of nanoparticles released from nanocomposites

E. Bolea, I. Abad-Álvarez, J. Jiménez-Lamana, N. Manninen, A. Cavaleiro, S. Carvalho, F. Laborda, J.R. Castillo

O-05. *A novel quantum dot-based phosphorescent immunoassay for PSA detection in human serum: signal amplification strategies based on ICP-MS*

M. García-Cortés, M.T. Fernández-Argüelles, J.M. Costa-Fernández, J. Ruiz Encinar, A. Sanz-Medel

O-06. *Bioconcentration and toxicity studies of titanium dioxide nanoparticles by zebrafish embryos*

R. Muñoz-Olivas, A. López-Serrano, J. Sanz, S. Rainieri, C. Cámara

O-07. *Experimental observation of Fano- and Lorentz-like line shapes in the optical extinction of plasmonic nanorods*

F. López-Tejeira, N. Verellen, R. Paniagua-Domínguez, D. Vercruysse, D. Denkova, L. Lagae, P. Van Dorpe, V.V. Moshchalkov, J.A. Sánchez-Gil

13:30 **Comida**

Sesión III, presidida por Manuel Hernández Córdoba y María Teresa Tena Vázquez de la Torre

15:30 Conferencia Plenaria

PL-2. **Demetrios Anglos**

Art and Archaeology through the spectroscopic looking glass

16:15 Comunicaciones Orales: Plasmas

O-08. *Biomedical applications of laser induced breakdown spectroscopy in bacterial identification*

S. Manzoor, S. Moncayo, F. Navarro-Villoslada, J.A. Ayala, R. Izquierdo-Hornillos, F.J. Manuel de Villena, J.O. Cáceres

O-09. *LIBS quantitative analysis of fluorite ores (CaF₂) through the measurement of CaF molecular emission bands*

C. Álvarez, J. Pisonero, N. Bordel

O-10. *Different approaches for the generation of chemical maps of complex samples by laser-induced plasma spectroscopy*

M.P. Mateo, G. Nicolás

O-11. *MIR-FIR Spectroscopy in One Step – Wide Range Infrared Technology*

C. Villar Pascual, G. Zachmann

O-12. *Spectral interferences removal in multiple isotope selenium and iodine determinations using an ICP-MS triple quadrupole in MS/MS mode*

N. Sugiyama, Y. Shikamori, K. Nakano, S. Kakuta, F. Tobalina

17:30 **Café**

17:30-19:30 **Sesión de carteles 1**
Exhibición Comercial

20:30 **Visita a la calle Laurel (bono-pincho)**

Jueves 10 de julio

Sesión IV, presidida por María Cruz Moreno Bondi y José Manuel Costa Fernández

09:00 Conferencia Plenaria

PL-3. Luca Prodi

Dye doped silica nanoparticles as luminescent organized systems for nanomedicine

09:45 Conferencia Invitada

IL-3. Fernando Rull

Applications of Raman spectroscopy: from the historical heritage to the space exploration

10:15 Comunicaciones Orales: Alimentos y sensores

O-13. *β -Cyclodextrin modified CdSe/ZnS quantum dots as a vanillin-sensor*

A. Ríos, G.M. Durán, A.M. Contento

O-14. *Furfural selective colorimetric sensors for beer ageing monitoring*

A. Rico-Yuste, E. Benito-Peña, V. González-Vallejo, M.C. Moreno-Bondi

O-15. *Determination of technological maturity of grapes and total phenolic compounds of grape skins in red and white cultivars during ripening by near infrared hyperspectral image: A preliminary approach*

J. Nogales-Bueno, J.M. Hernández-Hierro, F.J. Rodríguez-Pulido, F.J. Heredia

11:00 **Café**

11:30-13:30 **Sesión de carteles 2**

Exhibición Comercial

13:30 **Comida**

Sesión V, presidida por Santiago Sánchez Cortés y Santiago Maspoch Andrés

15:30 Conferencia Invitada

IL-4. Manuel Montejo

Molecular and supramolecular chirality by VCD spectroscopy and quantum chemical calculations

16:00 Comunicaciones Orales: Análisis forense y bioquímico

O-16. *Double confirmation of MDMA abuse: saliva analysis*

S. Armenta, S. Garrigues, M. de la Guardia, J. Brassier, M. Alcalá, M. Blanco

O-17. *Evaluation of confocal Raman spectroscopy to identify gunshot residue particles*

M. López-López, C. García-Ruiz

O-18. *Porous membrane protected molecularly imprinted polymer based microsolid phase extraction for cocaine and metabolites assessment in human plasma by HPLC-MS/MS*

S. García-Carballal, J. Sánchez-González, A.M. Bermejo, M.J. Tabernero, P. Bermejo-Barrera, A. Moreda-Piñeiro

O-19. *Determination of lidocaine in urine at low ppm levels using dispersive microextraction and attenuated total reflectance-Fourier transform infrared measurements of dry films*

A. Sánchez-Illana, D. Pérez-Guaita, S. Garrigues, M. de la Guardia

17:00 **Café**

Sesión VI, presidida por José Miguel Vadillo Pérez

17:30 Comunicaciones orales: Casas comerciales

O-20. *Supercontinuum fiber lasers: White light with laser brightness. A new tool for advanced spectroscopy*

P. Pérez-Millán, E. Ribes, J.L. Cruz, A. Díez, Y.O. Barmenkov, M.V. Andrés

O-21. *Time-resolved Spectroscopy Using Streak Cameras*

J. Sobrino

O-22. *AFM for high resolution and high speed chemical imaging and first fully-integrated Raman Imaging + Scanning Electron Microscope (RISE)*

E. Bailo, J. Toporski, U. Schmidt

O-23. *Improving analysis of large isotopes ratios using high sensitivity ICPMS*

P. Cano, M. Hamester, R. Chemnitzer

18:30 **Asambleas de Sociedades**

19:30 Salida de autobuses

20:00 Visita y cena en bodega

Viernes 11 de julio

Sesión VII, presidida por Pilar Bermejo Barrera y Luis Batista de Carvalho

09:30 Conferencia Plenaria

PL-4. **Mario Berberan-Santos**

Thermally activated delayed fluorescence. Fundamentals and applications in optical sensing and in OLED materials.

10:15 Comunicaciones Orales: Análisis ambiental

O-24. *Molecularly imprinted polymer based – solid phase extraction for mercury speciation in seawater by HPLC-ICP-MS*

M.P. Rodríguez-Reino, R. Domínguez-González, P. Bermejo-Barrera, A. Moreda-Piñeiro

O-25. *First insights into mercury speciation in aquatic plants using coupled techniques based on gas chromatography and atomic fluorescence detection*

M. Jiménez-Moreno, M.A. Lominchar, M.J. Sierra, R. Millán, R.C. Rodríguez Martín-Doimeadios

O-26. *FAPA-APGD as ion source for VOCs detection by a novel ion differential mobility analyser*

M. Bouza, J. Orejas, S. López-Vidal, J. Pisonero, N. Bordel, R. Pereiro, A. Sanz-Medel

O-27. *Analytical environmental nanoscience: A new challenge for Analytical Chemistry in the XXI century*

J.R. Castillo, P. Bermejo-Barrera, F. Laborda, E. Bolea, M.S. Jiménez, M.T. Gómez, G. Cepriá, A. Moreda, M.C. Barciela

11:15 **Café**

Sesión VIII, presidida por Concha Domingo y Carmen Cámara Rica

11:45 Comunicaciones Orales: Estructura atómica y molecular, materiales avanzados y otros

O-28. *Unveiling the early history of ultrafast laser ablation: Design, construction and evaluation of a femtosecond-resolved phase-change microscope*

I.M. Carrasco-García, M. López-Claros, J.M. Vadillo, J.J. Laserna

O-29. *Copper(II) complexes of cinnamic and caffeic acids: A Raman study*

N.F.L. Machado, M.P.M. Marques

O-30. *Crystal disruption in novel titanias for enhanced photocatalytical applications*

M. Rico-Santacruz, E. Serrano, A. Sepúlveda, E. Lalinde, J. Berenguer, J. García-Martínez

O-31. *Trimeric gold-mercury containing species as fluorescence quenchers*

D. Pascual, J.M. López de Luzuriaga, M. Monge, M.E. Olmos

O-32. *Insights into the coordination chemistry in the system $[Zn(I-Lac)(H_2O)_2]^+$ from DFT, NBO and QTAIM: Structure/vibrational spectra relationship*

M.C. Ramírez Avi, A.A. Márquez García, F. Partal Ureña

O-33. *SCA methodology for the analysis of deposited atmospheric particles on the surface of outdoors exhibited steel sculptures*

J. Aramendia, L. Gómez-Nubla, K. Castro and J.M. Madariaga

O-34. *Raman, SERS and DFT analysis of mauve dye and its components*

M.V. Cañamares, J.R. Lombardi

13:30 **Clausura y entrega de premios**