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EDUCATION

- Bachelor in Chemistry, Universidad de Salamanca, España (2001)
- Master in Science (Chemistry), Universidad de Salamanca, España (2004)
- Doctor in Science (Chemistry), Universidad de Salamanca, España (2007)

MAIN INTEREST

Molecular structure of simple liquids and complex fluids (Worm-micelles).

Synthesis and characterization of Janus particles.

THECNIQUES

Mechanical and Optical Rheometry.

Optical and Confocal Microscopy.

PUBLICATIONS

1. “*Synergism in mixtures of zwitterionic and ionic surfactant*” D. López-Díaz, I. García-Mateos, M. M. Velázquez. **Colloids and Surfaces A**, 270-271, 2005, 153-162.
2. “*Propiedades superficiales de mezclas binarias del tesoactivo zwiteriónico tetradecil sulfobetaina y tensioactivos iónicos*” D. López Díaz, M.M. Velázquez. **Coloides e Interfases**. Ediciones Universidad de Salamanca Aquilafuente, Salamanca, 2005, 197-201.
3. “*Surface properties of mixed monolayers of sulfobetaines and ionic surfactants*” David López-Díaz, Inmaculada García-Mateos, M. Mercedes Velázquez. **Journal of Colloid and Interface Science**, 290, 2006, 858-866.

4. “*Effect of micelles on the dynamic surface tension of zwitterionic surfactants*” C. Delgado, D. López-Díaz, M. D. Merchán, M. M. Velázquez. **Tenside Surfactant Detergent.** 43, 2006, 192-196.
5. “*Variation of the critical micelle concentration with surfactant structure: a simple method to analyze the role of the attractive-repulsive forces on the micellar association*” D. López Díaz, M.M. Velázquez. **The Chemical Educator,** 12, 2007, 327-330.
6. “*Evidence of glass state in Polymers adsorbed at the air/liquids interface: effect of the surfactant coadsorption*” D. López Díaz, M.M. Velázquez. **European Journal Physics E,** 226, 2008, 417.
7. “*The Worm Micelle fluid made of Zwitterionic Surfactant (TDPS), Anionic Surfactant (SDS), and Brine. Dilute Regime*”. **Journal of Colloid and Interface Science.** 2010, 348, 152.
8. “*The Worm Micelle fluid made of Zwitterionic Surfactant (TDPS), Anionic Surfactant (SDS), and Brine in the Semidilute Regime*”. **J. Phys. Chem. B.** 2010, 114, 8917.
9. “*Microrheology and Characteristic Lengths in Wormlike Micelles made of a zwitterionic surfactant and SDS in brine.*” . **J. Phys. Chem. B.** 2010, 114, 12193.

SCIENTIFIC MEETINGS and CONFERENCES

1. “*Gold nanoparticles-doped polyelectrolyte multilayers*” E. Guzmán, D. López-Díaz, H. Ritacco, F.Ortega, R. G. Rubio. **XXI Encuentro de Ciencia y Tecnología de Fluidos Complejos. San Luis de Potosí.** Agosto 2008
2. “*Shear-induced structures in dilute worm-micelle solutions made of mixtures of zwitterionic and anionic surfactants*”. David López-Díaz, Erik Sarmiento, Cristina Garza,

and Rolando Castillo. **Gordon Research Conferences of Chemistry and Physics of Liquids**. Holderness School in Holderness NH (United States). Agosto 2009.

3. “*Rheology and microrheology of worm-micelles solutions made of mixtures of zwitterionic and anionic surfactants*”. Erik Sarmiento, David López-Díaz and Rolando Castillo. **Gordon Research Conferences of Chemistry and Physics of Liquids**. Holderness School in Holderness NH (United States). Agosto 2009.
4. “*Estudio reológico de sistemas micelares que contienen tensioactivos zwiteriónicos*”. David López-Díaz, Erik Sarmiento, Cristina Garza, y Rolando Castillo. **XV Congreso de la División de Dinámica de Fluidos**. Acapulco (Méjico). Octubre 2009.
5. “*Micro-reología de micelas tubulares flexibles utilizando espectroscopía de onda difusa(DWS)*”. Erick Sarmiento, David López-Díaz y Rolando Castillo. **XV Congreso de la División de Dinámica de Fluidos**. Acapulco (Méjico). Octubre 2009.