

Dr. Patricia Taladriz-Blanco

PhD in Chemistry

International Iberian Nanotechnology Laboratory

Current E-mail: patricia.taladrizblanco@inl.int

Permanent E-mail: patriciataladriz@gmail.com

Phone: +34 646 87 99 77



ORCID ID: [0000-0002-2469-9704](https://orcid.org/0000-0002-2469-9704)

Core research expertise and interests: Nanoparticles, microfluidics, submicron- and nanoplastics, and bio-nano interactions.

Synthesis, characterization, surface modification, and controlled assembly of metal nanoparticles in bulk and microfluidic devices. Detection and characterization of nanoparticles, submicron- and nanoplastics in complex environments. Cell-nanoparticle interactions and thermoplasmonics. Design, fabrication and applications of microfluidic devices.

Current responsibilities: Co-supervision of PhD students, **project management, writing and edition** of scientific grant proposals and papers, **facility manager** of ICP-OES, TDA, DLS, and ITC.

Publication statistics: h-Index: 9, 27 peer-reviewed scientific papers (41% as first author and 12% as corresponding author), 2 journal covers, 333 times cited (Source: Scopus and Web of Science, July 2021).

20 conference contributions (**3 invited talks**)

2 awarded grants and extraordinary PhD award.

Languages: Spanish and Galician: native; **English:** spoken: fluent; written: full working proficiency; **Portuguese:** advanced level.

PROFESSIONAL EXPERIENCE

POSTDOCTORAL RESEARCHER

<u>International Iberian Nanotechnology Laboratory</u> , Portugal	07/2021-Now
<u>University of Fribourg</u> , Switzerland	01/2018-01/2021
<u>University of Braunschweig</u> , Germany	04/2017-10/2017
<u>University of Cambridge</u> , UK	05/2015-05/2016
<u>University of Campinas</u> , Brazil	09/2013-04/2015
<u>University of Vigo</u> , Spain	09/2010-12/2010

GROUP LEADER

<u>University of Fribourg</u> , Switzerland	02/2021-07/2021
---	-----------------

VISITING PhD STUDENT

<u>University of Catania</u> , Italy	09/2010-12/2010
<u>University of Cardiff</u> , UK	09/2009-12/2009

Member of the National Centre of Competence (**NCCR**) in Research Bio-Inspired Materials 09/2012-07/2021

EDUCATION

University of Vigo, Spain

International PhD in Chemistry 30.11.2012

Thesis: Design of colloidal systems to control the nitric oxide release.
Supervisors: Prof. Jorge Pérez-Juste and Prof. Pablo Hervés. **Extraordinary PhD. Award of the University of Vigo, Spain.**

Advanced studies diploma (MSc, *Science of colloids and interfaces*) 24.07.2009

BSc in Chemistry (*Physical-Chemistry*) 18.07.2007

PROFESSIONAL SKILLS

- **Project management.**
- **Lab management.**
- **Writing and edition** of scientific grant proposals and papers.
- Synthesis, characterization, surface modification, and controlled assembly of metal and polymeric **nanoparticles**.
- Detection and characterization of submicron and **nanoplastics**.
- Fabrication, design, and applications of **microfluidic** devices.
- **Cellular uptake** of nanoparticles and **cell adhesion** on substrates.
- Fabrication of polymeric **drug delivery carriers**.
- Kinetic studies.
- Analytical and characterization techniques: Electron Microscopy (**TEM** and **SEM**), Dynamic Light Scattering (**DLS**, **DDLS**, **Zeta Potential**), UV-Vis spectroscopy, Spectrofluorimetry, Infrared spectroscopy (**FTIR**), Surface Enhanced Raman Spectroscopy (**SERS**), Small-angle X-Ray Scattering (**SAXS**), calorimetry (**ITC**, **DSC**, **TGA**), chemiluminescence techniques (**NOA Analyser**), amperometric techniques (**ISO-NOP electrode**), Taylor-Aris Dispersion (**TDA**), Inductively coupled plasma optical emission spectrometry (**ICP-OES**), Capillary Electrophoresis (**CE**).
- Synchrotron activities: Small Angle X-Ray Scattering (**SAXS**) measurements of solid and liquid samples at SOLEIL synchrotron (France) and CNPEM synchrotron (Brazil). Real-time measurements in microfluidic devices.

SUPERVISION EXPERIENCE

Thesis committee.

Universidade do Minho, Portugal.

2019-Now Alexandra Catarina PereiraTeixeira, PhD student.

Co-supervision of students and laboratory technicians.

Adolphe Merkel Institute. University of Fribourg, Switzerland.

2020-Now PhD students: Jessica Calwell.

2019-Now PhD students: Mauro Almeida and Eva Susnik.

2018-Now PhD students: Aaron Lee, Giovanni Spiaggia and Phattadon Yajan.
Laetitia Haeni and Liliane Ackermann, laboratory assistants.

2018-2020 PhD students: Lukas Steinmetz
2018-2019 PhD students: Philipp Lemal.
Advisor of Master and summer students.
University of Campinas, Brazil
2013-2015 Master students: Thatiane Camargo-Marini.
2013 Summer students: Luciana Derami.

FUNDING AND RECOGNITION

2015 BEPE-FAPESP postdoctoral mobility grant - **71 K €**
2015 **ViaGalicia 2015** start-up competition with the project NanoSmarTech. Among the 20 finalists.
2014 Faro de Vigo- 'Gallegos en la cima-Patricia Taladriz Blanco'.
2013 FAPESP postdoctoral grant - **47 K €**
2012 **Extraordinary PhD award.**
2009 UVIGO PhD mobility grant.

ORGANIZATION OF RESEARCH ACTIVITIES

- NCCR webinar on Project Management 2020. Adolphe Merkle Institute, Fribourg, Switzerland.

PEER-REVIEWING ACTIVITIES

- Guest Editor Special Issue "Nanomedicine and Nanotoxicology: Characterization of Particles and Interactions at the Bio-Nano Interface" of "Molecules (ISSN 1420-3049)".
- Peer-reviewer of Food Analytical Methods.

COLLABORATIONS

- Synchrotron SAXS, SANS, XPCS, X-Ray Tomography. Dr Florian Meneau. Brazilian synchrotron light laboratory, Brazil. *E-mail: florian.meneau@lnls.br*
- Synthesis of plasmonic nanoparticles. Prof. Jorge Perez-Juste and Prof. Isabel Pastoriza Santos. Universidad de Vigo, Spain. *E-mail: juste@uvigo.es*
- Microfluidic devices. Dr Sara Abalde-Cela. International Iberian Nanotechnology Laboratory, Portugal. *E-mail: sara.abalde@inl.int*
- SERS. Dr Laura Rodriguez-Lorenzo. International Iberian Nanotechnology Laboratory, Portugal. *E-mail: laura.rodriguez-lorenzo@inl.int*
- Polymers. Dr. Anselmo del Prado Abellán. Universidad Autónoma de Madrid, Spain. *E-mail: anselmo.delprado@uam.es*
- Magnetic nanoparticles. Dr. Cintia Meiorin. Universidad Nacional de Mar de Plata, Argentina. *E-Mail: cintia.meiorin@fi.mdp.edu.ar*

REFERENCES

- Prof. Alke Fink. Adolphe Merkle Institute, Switzerland. *E-mail: alke.fink@unifr.ch*
- Prof. Barbara Rothen-Rutishauser. Adolphe Merkle Institute, Switzerland. *E-mail: barbara.rothen@unifr.ch*
- Prof. Jorge Pérez-Juste. University of Vigo, Spain. *E-mail: juste@uvigo.es*

*Corresponding author

1. J. Caldwell, **P. Taladriz-Blanco**, R. Lehner, A. Lubskyy, R. D. Ortuso, D. Rothen-Rutishauser, A. Petri-Fink*. The Micro- and Nanoplastic Hunt: A review of Sampling, Separation, and Detection Methods for Plastic Particles in Analytically Complex Environments. **2021**. Submitted.
2. G. Spiaggia, P. Taladriz-Blanco, D. Septiadi, R. D. Ortuso, V. Trappe, B. Rothen-Rutishauser, A. Petri-Fink. Nanomaterials-doped aligned and oriented collagen fibers for in vitro cell culture. **2021**. Submitted.
3. **P. Taladriz-Blanco**, M. Spuch-Calvar, A. del Prado, L. Ackermann-Hirschi, B. Rothen-Rutishauser, A. Petri-Fink*, L. Rodriguez-Lorenzo*. Impurities in Polyvinylpyrrolidone: the key factor in the synthesis of gold nanostars. **2021**. Submitted.
4. D. A. Urban, **P. Taladriz-Blanco***, P. Lemal, A. Milosevic, A. Lee, S. Balog, L. Haeni, L. Ackermann, D. Vanhecke, L. Rodriguez Lorenzo, B. Rothen-Rutishauser, A. Petri-Fink*. Taylor Dispersion Analysis to determine the size of spherical and anisotropic PEGylated gold nanoparticles in water and physiological fluids. **2021**. Submitted.
5. J. Caldwell, P. Taladriz-Blanco*, B. Rothen-Rutishauser, A. Petri-Fink. Spherical gold nanoparticle Surface Enhanced Raman Spectroscopy (SERS) substrates for the detection of Sub-Micro- and Nanoplastic particles. *Nanomaterials* **2021**, 11, 1149. DOI: 10.3390/nano11051149.
6. M. Almeida, E. Susnik, B. Drasler, **P. Taladriz-Blanco**, A. Petri-Fink, B. Rothen-Rutishauser*. Understanding nanoparticle endocytosis to improve targeting strategies in nanomedicine. *Chem. Soc. Rev.* **2021**. DOI: 10.1039/D0CS01127D
7. A. Lee, D. Septiadi, **P. Taladriz-Blanco**, M. Sousa de Almeida, L. Haeni, M. Spuch-Calvar, W. Abdussalam, B. Rothen-Rutishauser and A. Petri-Fink*. Particle stiffness and surface topography determine macrophage-mediated removal of surface adsorbed particles. *Adv. Healthcare Mater.* **2021**, 2001667. DOI: /10.1002/adhm.202001667
8. L. Steinmetz, C. Geers, S. Balog, M. Bonmarin, L. Rodriguez-Lorenzo, **P. Taladriz-Blanco***, B. Rothen-Rutishauser, A. Petri-Fink*. A comparative study of silver nanoparticle dissolution under physiological conditions. *Nanoscale Adv.* **2020**. DOI: 10.1039/D0NA00733A.
9. E. Susnik, **P. Taladriz-Blanco**, B. Drasler, S. Balog, A. Petri-Fink, B. Rothen-Rutishauser*. Increased uptake of silica nanoparticles in inflamed macrophages but not upon co-exposure to micron-sized particles. *Cells* **2020**, 9, 2099. DOI: 10.3390/cells9092099.
10. L. Steinmetz, J. Bourquin, H. Barosova, L. Haeni, J. Caldwell, A. Milosevic, C. Geers, M. Bonmarin, **P. Taladriz-Blanco***, B. Rothen-Rutishauser, A. Petri-Fink*. Rapid and sensitive investigation of cellular associated multi-walled carbon nanotubes. *Nanoscale* **2020**, 12, 17362. DOI: 10.1039/D0NR03330H.
11. D. Septiadi, A. Lee, M. Spuch-Calvar, T. Moore, W. Abdussalam, L. Rodriguez-Lorenzo, **P. Taladriz-Blanco**, B. Rothen-Rutishauser, A. Petri-Fink*. Particle surfaces to study macrophage adherence, migration and clearance. *Adv. Funct. Mater.* **2020**, 2002630. DOI: 10.1002/adfm.202002630.
12. P. Lemal, S. Balog, L. Ackermann-Hirschi, **P. Taladriz-Blanco**, A. M. Hirt, B. Rothen-Rutishauser, M. Lattuada* and A. Petri-Fink.* Simple and fast evaluation of relaxation parameters of magnetic nanoparticles. *J. Magn. Magn. Mater.* **2020**, 499, 166176. DOI: 10.1016/j.jmmm.2019.166176.

13. **P. Taladriz-Blanco**, B. Rothen-Rutishauser, A. Petri-Fink, S. Balog*. Versatile macroscale concentration gradients of nanoparticles in soft nanocomposites. *Small* **2020**, 16, 1905192. DOI: 10.1002/smll.201905192.
14. **P. Taladriz-Blanco**, B. Rothen-Rutishauser, A. Petri-Fink, S. Balog*. Resolution limit of Taylor Dispersion: An Exact Theoretical Study. *Anal. Chem.* **2020**, 92, 561. DOI: 10.1021/acs.analchem.9b03837.
15. D. Hauser, L. Steinmetz, S. Balog, **P. Taladriz-Blanco**, D. Septiadi, B. D. Wilts, A. Petri-Fink, B. Rothen-Rutishauser*. Polydopamine nanoparticle doped nanofluid for solar thermal energy collector efficiency increase. *Adv. Sustainable Syst.* **2020**, 4, 1900101. DOI: 10.1002/adsu.201900101. *Featured on the front cover of the issue 1 (January 19, 2020) of Advanced Sustainable Systems.*
16. D. Septiadi, L. Rodriguez-Lorenzo, S. Balog, M. Spuch-Calvar, G. Spiaggia, **P. Taladriz-Blanco**, H. Barosova, S. Chortarea, M. J. D. Clift, J. Teeguarden, M. Sharma, A. Petri-Fink*, and B. Rothen-Rutishauser*. Quantification of carbon nanotube doses in adherent cell culture assays using UV-Vis-NIR spectroscopy. *Nanomaterials*, **2019**, 9, 1765. DOI: 10.3390/nano9121765.
17. J. Bourquin, D. Septiadi, D. Vanhecke, S. Balog, L. Steinmetz, M. Spuch-Calvar, **P. Taladriz-Blanco**, A. Petri-Fink, B. Rothen-Rutishauser*. Reduction of nanoparticle load in cells by mitosis but not exocytosis. *ACS Nano*. **2019**, 13, 7759. DOI: 10.1021/acsnano.9b01604.
18. L. Steinmetz, **P. Taladriz-Blanco***, C. Geers, M. Spuch-Calvar, M. Bonmarin, S. Balog, B. Rothen-Rutishauser, A. Petri-Fink*. Lock-in thermography to analyze plasmonic nanoparticle dispersions. *Part. Part. Syst. Charact.* **2019**, 36, 1900224. DOI: 10.1002/ppsc.201900224.
19. **P. Taladriz-Blanco**, B. Rothen-Rutishauser, A. Petri-Fink, S. Balog*. Precision of Taylor Dispersion. 2019. *Anal. Chem.* **2019**, 91, 9946. DOI: 10.1021/acs.analchem.9b01679.
20. G. Picheth, T. C. Marini, **P. Taladriz-Blanco**, G. G. Shimamoto, G. JVP dos Santos; F. Meneau, M. Ganzarolli*. Influence of Pluronic F127 microenvironments on the photochemical nitric oxide release from S-nitrosoglutathione. *J. Colloid Interface Sci.* **2019**, 544, 217. DOI:10.1016/j.jcis.2019.02.087.
21. P. Lemal, S. Balog, C. Geers, **P. Taladriz-Blanco**, A. Palumbo, A. Hirt, B. Rothen-Rutishauser, A. Petri-Fink*. Heating behavior of magnetic iron oxide nanoparticles at clinically relevant concentration. *J. Magn. Magn. Mater.* **2019**, 474, 637. DOI: 10.1016/j.jmmm.2018.10.009.
22. A. Acuña, N. Basilio, M. Parajo, J. C. C Mejuto, J. Perez-Juste, **P. Taladriz-Blanco** and L. Garcia Rio*. Nitric Oxide Release From a Cucurbituril Encapsulated NO-Donor. *Org. Biomol. Chem.* **2018**, 16, 4272. DOI: 10.1039/C8OB00895G.
23. **P. Taladriz-Blanco**, S. Abalde-Cela*, M. Ganzarolli, C. Abell. Droplet microfluidics for the highly controlled synthesis of branched gold nanoparticles. *Sci. Rep.* **2018**, 8, 2440. DOI: 10.1038/s41598-018-20754-x.
24. V. Baldim, A. Ismail, **P. Taladriz-Blanco**, S. Griveau, M. Ganzarolli*, F. Bedioui*. Amperometric quantification of S-nitrosoglutathione using gold nanoparticles: a step towards determination of S-nitrosothiols in plasma. *Anal. Chem.* **2016**, 88, 3115. DOI:10.1021/acs.analchem.5b04035.
25. G. Freitas Pereira de Souza, **P. Taladriz Blanco**, L. A. Velloso, M. Ganzarolli*. Nitric oxide released from luminal S-nitroso-N-acetylcysteine increases gastric mucosal blood flow. *Molecules*. **2015**, 20, 4109. DOI:10.3390/molecules20034109.
26. **P. Taladriz-Blanco** and M. Ganzarolli*. Enhanced photochemical nitric oxide release from a glutamide derivative incorporated in Pluronic F127 micelles. *J Photochem. Photobiol. A.* **2014**, 293, 65. DOI:10.1016/j.jphotochem.2014.07.022.
27. **P. Taladriz-Blanco**, J.Pérez-Juste, N. Kandath, P. Hervés, S. Sortino*. Layer-by-Layer assembled gold nanoparticles with a tunable payload of a nitric oxide

photocage. *J. Colloid Interface Sci.* **2013**, 407, 524. DOI:10.1016/j.jcis.2013.06.060.

28. **P. Taladriz-Blanco**, P. Hervés*, J. Pérez-Juste*. Supported Pd nanoparticles for Carbon-Carbon Coupling Reactions. *Topics in Catalysis*. **2013**, 56, 1154.
29. **P. Taladriz-Blanco**, V. Pastoriza-Santos, J. Pérez-Juste,* P. Hervés*. Controllable Nitric Oxide Release in the presence of Gold Nanoparticles. *Langmuir*. **2013**, 29, 8061. DOI:10.1007/s11244-013-0082-6.
30. **P. Taladriz-Blanco**, N.J. Buurma, L. Rodríguez-Lorenzo, J. Pérez-Juste,* L.M. Liz-Marzán, P. Hervés*. Reversible assembly of metal nanoparticles induced by penicillamine. Dynamic formation of SERS hot spots. *J. Mater. Chem.* **2011**, 21, 16880. DOI:10.1039/C1JM12175H. *Featured on the inside front cover of the issue 42 (October 20, 2011) of Journal of Materials Chemistry.*
31. **P. Taladriz-Blanco**, L. Rodríguez-Lorenzo, M. Sanles-Sobrido, P. Hervés*, M.A. Correa-Duarte, R.A. Álvarez-Puebla*, L.M. Liz-Marzán. SERS study of the controllable release of nitric oxide from aromatic nitrosothiols on bimetallic, bifunctional nanoparticles supported on carbon nanotubes. *ACS Appl. Mater. Interf.*, **2009**, 1, 56. DOI:10.1021/am800141j.

INVOLVEMENT IN RESEARCH PROJECTS (12)

- 1. Opportunities and challenges of Taylor Dispersion Analysis.**
Period: 01/08/2018 – 14/07/2021
Financial entity: Adolphe Merkle Institute, **310 K CHF**
Participant entities: Adolphe Merkle Institute.
Principal Investigator: Prof. Alke Petri-Fink
Role: Conceptualisation, experimental design, writing and edition of publications, co-leading.
- 2. Gold nanostars.**
Period: 01/09/2019 – 14/07/2021
Financial entity: Adolphe Merkle Institute, **150 K CHF**
Participant entities: Adolphe Merkle Institute.
Principal Investigator: Prof. Alke Petri-Fink
Role: Conceptualisation, experimental design, writing and edition of publications.
- 3. Nanoparticle characterization.**
Period: 01/12/2019 – 30/01/2023
Financial entity: Swiss National Science Foundation, **785.740 CHF**
Participant entities: Adolphe Merkle Institute.
Principal Investigator: Prof. Alke Petri-Fink
Role: Conceptualisation, experimental design, supervision of PhD and master students, writing and edition of publications.
- 4. Magnetic nanoparticle clusters in thermos-responsive liposome hybrids.**
Period: 01/09/2015 – 30/03/2019
Financial entity: Swiss National Science Foundation, **378.251 CHF**
Participant entities: Adolphe Merkle Institute.
Principal Investigator: Prof. Alke Petri-Fink
Role: Supervision of PhD students, writing and edition of publications.
- 5. PIRE. Bio-inspired materials and systems.**
Period: 01/11/2017 – Ongoing
Financial entity: Swiss National Science Foundation, **312.833 CHF**
Participant entities: Adolphe Merkle Institute, Case Western Reserve University, University of Chicago, Argonne National Laboratory, Great Lakes Biomimicry, Research and Evaluation Bureau at Kent State University.
Principal Investigator: Prof. Alke Petri-Fink and Prof. B. Rothen-Rutishauser
Role: Conceptualisation, experimental design, supervision of PhD students, writing and edition of publications.
- 6. NanoRoomba: Cellular uptake and durotaxis on soft and rigid nanoparticle carpet.**
Period: 01/06/2018 – 31/05/2022
Financial entity: Swiss National Science Foundation, **590 K CHF**
Participant entities: Adolphe Merkle Institute.
Principal Investigator: Prof. Alke Petri-Fink
Role: Conceptualisation, experimental design, supervision of PhD students, writing and edition of publications.
- 7. Magneto-responsive cell culture substrates that can be modulated in situ.**
Period: 01/06/2014 – 31/05/2018
Financial entity: Swiss National Science Foundation **590 K CHF**
Participant entities: Adolphe Merkle Institute.
Principal Investigator: Prof. Alke Petri-Fink
Role: Experimental design, writing and edition of publications.
- 8. Real-time detection of nitric oxide in microdroplets via in situ SERS and SAXS spectroscopies.**
Period: 01/05/2015 – 30/04/2016

Financial entity: Fundação de Amparo à Pesquisa do Estado de São Paulo (FAPESP), **71 K €**

Participant entities: University of Campinas-UNICAMP and University of Cambridge.

Principal Investigator: Dr. P. Taladriz-Blanco, Prof. M. Ganzarolli, Prof. C. Abell.

Role: Principal Investigator

9. Nanoparticles and hydrogels for the photochemical delivery of nitric oxide.

Period: 01/09/2013 – 30/04/2015

Financial entity: Fundação de Amparo à Pesquisa do Estado de São Paulo (FAPESP), **47 K €**

Participant entities: University of Campinas-UNICAMP

Principal Investigator: Dr. P. Taladriz-Blanco and Prof. M. Ganzarolli.

Role: Principal Investigator

10. Estudio de la reactividad química en medios nanoheterogéneos: Vesículas y nanopartículas metálicas como medio de reacción.

Period: 01/10/2007-30/09/2010

Financial entity: Ministerio de Educación y Ciencia, **99.220 €**

Participant Entities: University of Vigo.

Principal Investigator: Prof. Pablo Hervés Beloso.

Role: Conceptualisation, experimental design.

11. Design of colloidal systems to control the nitric oxide release.

Period: 27/07/2010-31/10/2012

Financial entity: Secretaria Xeral de Investigación e Desenvolvemento-Xunta de Galicia, **72.604 €**.

Participant entities: University of Vigo

Principal Investigator: Prof. J.Pablo Hervés Beloso

Role: Conceptualisation, experimental design.

12. Catalysis by Metal Nanoparticles; Size, shape, composition and environment effects.

Period: 01/01/2011-31/12/2013

Financial entity: Ministerio de Ciencia e Innovación, **118.580 €**

Participant entities: University of Vigo

Principal Investigator: Prof. Jorge Pérez Juste

Role: Conceptualisation, experimental design.

CONFERENCE PROCEEDINGS (20)

Oral contributions and invited talks (4)

- Size determination of plasmonic nanoparticles by Taylor dispersion analysis. NCCR Annual Conference. Charmey (Switzerland), 2019. **Invited talk.**
- Nanoparticles and Nitric Oxide. Adolphe Merkel Institute. Fribourg (Switzerland), 2017. **Invited talk.**
- Design of Colloidal Systems to Control the Nitric Oxide Release. University of Aarhus (Denmark), 2016. **Invited talk.**
- Reversible Assembly of Gold and Silver Nanoparticles induced by Penicillamine. International Symposium on Surfactants in Solution. Melbourne (Australia), 2010.

Poster contributions (16)

- Taylor-Aris dispersion Analysis to characterise Plasmonic Nanoparticles. P. Taladriz-Blanco, S. Balog, L. Ackermann, D. Vanhecke, B. Rothen-Rutishauser and A. Petri-Fink. TNT2019 conference. San Sebastián (Spain), 2019.
- Nanocomposite collagen-based cell substrates fabricated using microfluidics. G. Spiaggia, P. Taladriz-Blanco, D. Septiadi, B. Rothen-Rutishauser, A. Petri-Fink. ACS National Meeting. San Diego (USA), 2019.
- *Cellular uptake and durotaxis on "soft and hard" nanoparticle carpets.* A. Lee, G. Spiaggia, D. Septiadi, T. Moore, P. Taladriz Blanco, M. Spuch-Calvar, B. Rothen-Rutishauser, A. Petri-Fink. NCCR Annual Conference. Fribourg (Switzerland), 2019.
- Investigating the synergistic effect of different nanoparticles to enhance their cellular uptake. E. Susnik, P. Taladriz-Blanco, M. Sousa de Almeida, B. Drasler, A. Petri-Fink, B. Rothen-Rutishauser. NCCR Annual Conference. Fribourg (Switzerland), 2019.
- Regulation of endocytic pathway genes upon cell-nanoparticle interaction. M. Almeida, B. Drasler, P. Taladriz-Blanco, A. Petri-Fink, B. Rothen-Rutishauser. NCCR Annual Conference (Switzerland), 2019.
- Lock-in thermography to analyze nanomaterial-cell association trends. *L. Steinmetz, J. Bourquin, H. Barosova, A. Milosevic, C. Geers, P. Taladriz-Blanco, M. Bonmarin, B. Rothen-Rutishauser, A. Petri-Fink.* SwissNanoconvention. Laussane (Switzerland), 2019.
- Highly controllable synthesis of gold nanostars in microdroplets. P. Taladriz-Blanco, S. Abalde-Cela and C. Abell. Microfluidics Congress. London (UK), 2015.
- Photochemical nitric oxide release from a Flutamin derivative incorporated in Pluronic F127 hydrogel. P. Taladriz-Blanco and M. Ganzarolli de Oliveira. 26th European Conference on Biomaterials. Liverpool (UK), 2014.
- Increasing dermal blood flow with photochemical NO release from topical formulations. P. Taladriz-Blanco, S. de M. Lourenço, K. S. R. Santos, M. Ganzarolli de Oliveira. Nitric Oxide-Nitrite/Nitrate Conference. Cleveland (USA), 2014.
- Nanocarregadores termo-sensíveis para liberação controlada de óxido nítrico. T. Camargo-Marini, P. Taladriz-Blanco, M. Ganzarolli de Oliveira. 37^a Reunião anual da Sociedade Brasileira de Química (SBQ). Natal (Brazil), 2014.
- Au@Penicillamine. Reversible Self-Assembly. P. Taladriz-Blanco, L. Rodríguez-Lorenzo, J. Pérez-Juste, N.J. Burma, P. Hervés, L. Liz-Marzán. International Workshop on Nanoplasmonics for Energy and Environment. Sanxenxo (Spain), 2011.
- Basic hydrolysis of N-methyl-N-nitroso-p-toluenesulfonamide in cationic micellar media. I. Fernández, P. Taladriz-Blanco, J. Pérez-Juste and P. Hervés. III Reunión Ibérica de Coloides e Interfases (RICI III). Granada (Spain), 2009.

- SERS Study of the Controllable Release of Nitric Oxide from Aromatic Nitrosothiols on nanoparticles supported on Carbon Nanotubes. P. Taladriz-Blanco, L. Rodríguez-Lorenzo, M. Sanles-Sobrido, P. Hervés, M. A. Correa-Duarte, R. A. Álvarez-Puebla, and Luis M. Liz-Marzán. II Workshop on Nanomedicine Research. Santiago de Compostela (Spain), 2009.
- Nitric Oxide Release in colloidal media: Effects of cationic micelles. P. Taladriz-Blanco and P. Hervés. 42nd IUPAC CONGRESS. Chemistry Solutions. Glasgow (UK), 2009.
- Effects of colloidal media on the Formation and decomposition of S-nitrosothiols. P. Taladriz-Blanco, R. Álvarez-Puebla, P. Hervés. 19th IUPAC Conference on Physical Organic Chemistry (ICPOC 19). Santiago de Compostela (Spain), 2008.
- Formation and decomposition of S-Nitrosothiols in colloidal media. P. Taladriz-Blanco, R. Álvarez-Puebla and P. Hervés. 22nd Conference of the European Colloid and Interface Society. Cracow (Poland), 2008.

SKILLS AND QUALIFICATIONS

Participation in courses, workshops and round tables:

- Project management for successful researchers. Dr. Carine Galli Marxer. 16h. 2020. Fribourg, Switzerland.
- Workshop on Visual Communication of Science. Dr. Jernej Zupanc. National Center of Competence in Research (NCCR). 16h. 2018. Adolphe Merkle Institute, Fribourg, Switzerland.
- Done being Nice on Equal Opportunity, workshop. Sybil Schaedeli. National Center of Competence in Research (NCCR). 2018. Adolphe Merkle Institute, Fribourg, Switzerland.
- Gender Equality in Academia – Myth and Reality, round table discussion. Prof. Claudia Bagni. National Center of Competence in Research (NCCR). 2018. Adolphe Merkle Institute, Fribourg, Switzerland.
- V Theoretical-Practical Course in Transmission Electron Microscopy. Centro Nacional de Pesquisa em Energia e Materiais (CNPEM). 80h. 2013. Campinas, Brazil.
- Prevention of Occupational Risks. 33 h. 2005. University of Vigo, Spain.
- Communications skills. 20 h. 2007. University of Vigo, Spain.

Attendance to scientific conferences:

- Jornada Gallega de Investigación en Nanomedicina. Vigo, Spain.
- International Symposium in Medicine: Diagnosis and Therapy. Vigo, Spain, 2007.

Featured in news:

- March 2014-Faro de Vigo- 'Gallegos en la cima-Patricia Taladriz Blanco'.

Entrepreneur activities:

- Participant in **ViaGalicia 2015** start-up competition with the project NanoSmarTech. Among the 20 finalists.