

CURRICULUM VITAE

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Personal Data: Place of birth: México, D.F., June 14, 1965.

Gender and Citizenship: Woman, Mexican and Spanish.

Full Researcher “C” (Highest level), Instituto de Matemáticas, Universidad Nacional Autónoma de México (UNAM). Since May 2018. Other positions at Unam, 1995-2018.

Instituto de Matemáticas

Área de la Investigación Científica

Circuito Exterior, C.U. 04510, D.F. México

Education

1995 Ph. D. Applied Mathematics. 1990-1992. Facultad de Ciencias Matemáticas. Universidad Complutense de Madrid. Spain.

Dissertation: *Controllability of some equations of the mathematical Physics: Wave equation, heat equation and system of thermoelasticity*

Advisor: Enrique Zuazua Iriondo.

1990 B.S: Mathematics. Universidad Nacional Autónoma de México (UNAM).

Main publications

1. S. Avdonin, J. Park, L. de Teresa. The Kalman Condition for the Boundary Controllability of Coupled 1-D Wave Equations., *Evolution Equations and Control Theory*, 9(1), (2020), 255–273.
2. F. Boyer, V. Hernández-Santamaría, L. de Teresa. Insensitizing controls for a semilinear parabolic equation: a numerical approach. *Mathematical control and Related Fields* 2019, 9 (1): 117–158. doi: 10.3934/mcrf.2019007
3. V. Hernández-Santamaría, L. de Teresa. Some Remarks on the Hierarchic Control for Coupled Parabolic PDEs. Capítulo en “Recent Advances in PDEs: Analysis, Numerics and Control”. Edited by: Doubova, A., González-Burgos, M., Guillén-González, F., Marín Beltrán, M. Springer 2018.
4. C. Montoya, L. de Teresa, Robust Stackelberg controllability for the Navier-Stokes equations, *Nonlinear Differ. Equ. Appl.* (2018) 25: 46. <https://doi.org/10.1007/s00030-018-0537-3>
5. V. Hernández-Santamaría, L. de Teresa. Robust Stackelberg controllability for linear and semilinear heat equations. *Evol. Equ. Control Theory* 7 (2018), no. 2, 247–273

6. V. Hernández-Santamaría, L. de Teresa and A. Poznyak. Corrigendum and addendum to “Hierarchic control for a coupled parabolic system”, *Portugaliae Math.* 73 (2016), 2: 115–137 *Portugaliae Math.* 74 (2017) pp. 161–168
7. C. Castro, L. de Teresa. A null controllability result for the linear system of thermoelastic plates with a single control. Capítulo en “Evolution Equations: Long Time Behavior and Control” editado por Kais Ammari y Stéphane Gerbi, publicado por Cambridge University Press Cambridge. *London Mathematical Society Lecture Note Series.* (2017)
8. Ammar-Khodja, F.; Benabdallah, A.; González-Burgos, M.; de Teresa, L. New phenomena for the null controllability of parabolic systems: Minimal time and geometrical dependence. *J. Math. Anal. Appl.* 444 (2016), 1071–1113.
9. López-García, M.; Mercado, A.; de Teres, L. Controllability of a system of Schrödinger equations. *Electron. J. Diff. Equ.* (2016), 74, pp. 1-12.
10. Ammar-Khodja, F.; Benabdallah, A.; González-Burgos, M.; de Teresa, L. Minimal time for the null controllability of parabolic systems: The effect of the condensation index of complex sequences. *J. Funct. Anal.* 267 (2014), no. 7, 2077–2151.
11. Avdonin, S.; Choque A.; de Teresa L. Exact boundary controllability results for two coupled 1-d hyperbolic equations. *Int. J. Appl. Math. Comput. Sci.*, Vol. 23, No. 4 (2013), 701–710
12. Fernández-Cara, E; González-Burgos, M.; de Teresa, L. Boundary controllability of one dimensional systems of parabolic equations. *Journal of Functional Analysis*, Volume 259, Issue 7, (2010), pp.1720-1758.
13. González-Burgos, M; de Teresa, L. Some results on controllability for linear and nonlinear heat equations in unbounded domains. *Adv. Differential Equations.* 12 N.11, (2007), pp.1201-1240.
14. de Teresa, L. Controls Insensitizing the Semilinear Heat Equation. *Communications in Partial Diff. Equations*, 25 (1&2) (2000), 39-72.

Present Research Grants

1. Project head UNAM-PAPIIT IN100919 *Control y problemas inversos en Ecuaciones Diferenciales Parciales*; 2019-2021
2. Project Head: Conacyt A1-S-17475, *Control en Ecuaciones Diferenciales Parciales* 2019-2021.

Others

- Plenary Speaker in 12 meetings, national and international. More than 45 invited conferences. Collaborators in Mexico, Chile, France, Spain, Brazil, Rumania and USA.
- President of the Mexican Mathematical Society 2018-2020.
- Member of three Editorial Boards: Mathematics, Control and Related Fields; Boletim da Sociedade Paranaense de Matemática; Computational and Applied Mathematics, ESAIM: COCV.
- Level 3 of the “Sistema Nacional de Investigadores” (maximum level of the National System of Researchers, CONACyT-Mexico) starting January 2017, level 2 from January 2008 to 2016, level 1, from 1999 to 2007.
- Award: “Reconocimiento Sor Juana Inés de la Cruz 2009” for women at UNAM.
- Regular member at the Mexican Academy of Sciences, since 2011.
- More than 600 citations according to MathSciNet, more than 1100 according to Google Scholar.