Departamento de Álgebra > | Universidad de Granada

- Inicio
- Personal
- fichas_profesores
- Pedro A. García Sánchez
- Investigación

- Inicio
- Docencia
- Investigación
- Enlaces de interés

Investigación

Oficina Web UGR

Proyectos recientes y perfil

- Investigador Principal del proyecto MTM2014-55367-P: Semigrupos Numéricos y Afines; Generalizaciones y Aplicaciones (histórico, MTM2010-15595: Semigrupos numéricos).
- Pertenezco al grupo de investigación FQM-343: Semigrupos conmutativos.
- Fui miembro del proyecto de excelencia Nuevos Desafíos de la Matemática Combinatoria (FQM-5849).
- Perfil en mathscinet, scopus, orcid, researcherid y en Google Scholar.

Publicaciones

Tesis

-Semigrupos Afines, Universidad de Granada, 1996, dirigida por José Carlos Rosales (ver en Mathematics Genealogy Project); premio extraordinario por la Universidad de Granada.

Libros

1. J. C. Rosales y P. A. García-Sánchez, Finitely generated commutative monoids, Nova Science Publishers, Inc., New York, 1999.
2. J. C. Rosales y P. A. García-Sánchez, Numerical semigroups, Springer, 2009.
3. A. Assi, P. A. García-Sánchez, Numerical semigroups and applications, RSME Springer series 1, Springer, Switzerland, 2016.

Artículos y capítulos de libros

Los últimos trabajos en los que he participado se pueden consultar en arXiv.

1. A. Abbas, A. Assi, P. A. García-Sánchez, Canonical bases of modules over one dimensional K-algebras, RACSAM (2019) 113-1121.
2. P. A. García-Sánchez, U. Krause, D. Llena Inside factorial monoids and the cale monoid of a linear Diophantine equation , Journal of Algebra 531 (2019) 125– 14
3. P. A. García-Sánchez, C. O'Neill, G. Webb, On the compuation of factorization invariants for affine semigroups, J. Algebra Appl. 18 (2019) 1950019 (21 pages).
4. J. I. Farrán, P. A. García-Sánchez, B. A. Heredia, On the second Feng-Rao distance of Algebraic Geometry codes related to Arf semigroups, Designs, Codes and Cryptography 86(12) (2018), 2893– 2916. DOI: 10.1007/s10623-018-0483-4
5. J. I. Farrán, P. A. García-Sánchez, B. A. Heredia, M. Leamer, The second Feng-Rao number for codes coming from telescopic semigroups, Designs, Codes and Cryptography 86 (2018), 1849– 1864. DOI: 10.1007/s10623-017-0426-5
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7. P. A. García-Sánchez, D. Llena, A. Moscariello, Delta sets for nonsymmetric numerical semigroups with embedding dimension three, Forum Math. 30 (1) (2018), 15– 30.
8. P. A. García-Sánchez, D. Llena, A. Moscariello, Delta sets for symmetric numerical semigroups with embedding dimension three, Aequationes Math. 91 (2017), 579– 600.
9. A. Assi, P. A. García-Sánchez, V. Micale, Bases of subalgebras of K[[x]] and K[x], Journal of Symbolic Computation 79(1) (2017), 4– 22.
10. P. A. García-Sánchez, B. A. Heredia, H. İ. Karakaş, J. C. Rosales, Parametrizing Arf numerical semigroups, J. Algebra Appl. Vol. 16, No. 11 (2017) 1750209 (31 pages)
11. P. A. García-Sánchez, An overview of the computational aspects of nonunique factorization invariants, in Multiplicative Ideal Theory and Factorization Theory -Commutative and Non-Commutative Perspectives, Springer Proceedings in Mathematics & Statistics 170 (2016), Springer.

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13. M. Delgado, and P. A. García-Sánchez, numericalsgps, a GAP package for numerical semigroups, ACM Communications in Computer Algebra 50 (2016), 12– 14.
14. M. Delgado, P. A. García-Sánchez, and A. M. Robles-Pérez, Numerical semigroups with a given set of pseudo-Frobenius numbers, LMS J. Comput. Math. 19(1) (2016), 186– 205.
15. A. Assi, P. A. García-Sánchez, Algorithms for curves with one place at infinity, Journal of Symbolic Computation 74 (2016), 475-492.
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Comité editorial

Editor asociado de Le Matematiche.

Paquetes

Paquete numericalsgps para GAP, que mantengo junto con M. Delgado. La versión de desarrollo se aloja en GitHub.

Algunas contribuciones en GitHub.