

## LISTA DE LUCRĂRI ȘTIINȚIFICE

Dr. Ágnes Mester

a) lista celor maximum 10 lucrări considerate de candidat a fi cele mai relevante pentru realizările profesionale proprii, care sunt incluse în format electronic în dosar și care se pot regăsi și în celelalte categorii de lucrări:

[1] **Á. Mester**. Talenti's Comparison Theorem on Finsler Manifolds with Nonnegative Ricci Curvature. *Acta Universitatis Sapientiae – Mathematica* **16** (2024), no. 1, 1-22. *In press*.

[2] **Á. Mester** and K. Szilák. A Dirichlet inclusion problem on Finsler manifolds. *2023 IEEE 23rd International Symposium on Computational Intelligence and Informatics (CINTI)*. Budapest, Hungary, 2023, 99-104. DOI: 10.1109/CINTI59972.2023.10381972.

[3] A. Kristály, **Á. Mester** and I.-I. Mezei. Sharp Morrey-Sobolev inequalities and eigenvalue problems on Riemannian-Finsler manifolds with nonnegative Ricci curvature. *Communications in Contemporary Mathematics* **25** (2023), no. 10, Paper no: 2250063. DOI: 10.1142/S0219199722500638.

[4] A. Kopacz, **Á. Mester**, S. Kolumbán and L. Csató. Standardized feature extraction from pairwise conflicts applied to the train rescheduling problem. *2022 IEEE 20th Jubilee World Symposium on Applied Machine Intelligence and Informatics (SAMI)*. Poprad, Slovakia, 2022, 103-108. DOI: 10.1109/SAMI54271.2022.9780701.

[5] C. Farkas, A. Kristály and **Á. Mester**. Compact Sobolev embeddings on non-compact manifolds via orbit expansions of isometry groups. *Calculus of Variations and PDE* **60** (2021), Article no: 128. DOI: 10.1007/s00526-021-01997-5.

[6] **Á. Mester** and A. Kristály. Three isometrically equivalent models of the Finsler-Poincaré disk. *2021 IEEE 15th International Symposium on Applied Computational Intelligence and Informatics (SACI)*. Timișoara, Romania, 2021, 403-408. DOI: 10.1109/SACI51354.2021.9465545.

[7] **Á. Mester**, I. R. Peter and C. Varga. Sufficient criteria for obtaining Hardy inequalities on Finsler manifolds. *Mediterranean Journal of Mathematics* **18** (2021), Article no: 76. DOI: 10.1007/s00009-021-01725-5.

[8] **Á. Mester** and A. Kristály. A bipolar Hardy inequality on Finsler manifolds. *2019 IEEE 13th International Symposium on Applied Computational Intelligence and Informatics (SACI)*, 308-313, 2019. DOI: 10.1109/SACI46893.2019.9111497.

[9] Z. Gábos and **Á. Mester**. Lines in the three-dimensional Bolyai-Lobachevskian hyperbolic geometry. *Studia Universitatis Babeș-Bolyai Mathematica* **60** (2015), no. 4, 583-595.

[10] Z. Gábos and **Á. Mester**. Curves with constant geodesic curvature in the Bolyai-Lobachevskian plane. *Studia Universitatis Babeș-Bolyai Mathematica* **60** (2015), no. 3, 449-462.

b) teza de doctorat

Ágnes Mester. *Functional Inequalities on Riemann-Finsler Manifolds*. PhD Thesis, Óbuda University, Budapest, Hungary, 2023.

c) brevete de invenție și alte titluri de proprietate industrială

d) cărți și capitole în cărți

e) articole/studii, publicate în reviste din fluxul științific internațional principal:

[1] **Á. Mester**. Talenti's Comparison Theorem on Finsler Manifolds with Nonnegative Ricci Curvature. *Acta Universitatis Sapientiae – Mathematica* **16** (2024), no. 1, 1-22. *In press*.

[3] A. Kristály, **Á. Mester** and I.-I. Mezei. Sharp Morrey-Sobolev inequalities and eigenvalue problems on Riemannian-Finsler manifolds with nonnegative Ricci curvature. *Communications in Contemporary Mathematics* **25** (2023), no. 10, Paper no: 2250063. DOI: 10.1142/S0219199722500638.

[5] C. Farkas, A. Kristály and **Á. Mester**. Compact Sobolev embeddings on non-compact manifolds via orbit expansions of isometry groups. *Calculus of Variations and PDE* **60** (2021), Article no: 128. DOI: 10.1007/s00526-021-01997-5.

[7] **Á. Mester**, I. R. Peter and C. Varga. Sufficient criteria for obtaining Hardy inequalities on Finsler manifolds. *Mediterranean Journal of Mathematics* **18** (2021), Article no: 76. DOI: 10.1007/s00009-021-01725-5.

[9] Z. Gábos and **Á. Mester**. Lines in the three-dimensional Bolyai-Lobachevskian hyperbolic geometry. *Studia Universitatis Babeş-Bolyai Mathematica* **60** (2015), no. 4, 583-595.

[10] Z. Gábos and **Á. Mester**. Curves with constant geodesic curvature in the Bolyai-Lobachevskian plane. *Studia Universitatis Babeş-Bolyai Mathematica* **60** (2015), no. 3, 449-462.

f) publicații in extenso, apărute în lucrări ale principalelor conferințe internaționale de specialitate:

[2] **Á. Mester** and K. Szilák. A Dirichlet inclusion problem on Finsler manifolds. *2023 IEEE 23rd International Symposium on Computational Intelligence and Informatics (CINTI)*. Budapest, Hungary, 2023, 99-104. DOI: 10.1109/CINTI59972.2023.10381972.

[4] A. Kopacz, **Á. Mester**, S. Kolumbán and L. Csató. Standardized feature extraction from pairwise conflicts applied to the train rescheduling problem. *2022 IEEE 20th Jubilee World Symposium on Applied Machine Intelligence and Informatics (SAMI)*. Poprad, Slovakia, 2022, 103-108. DOI: 10.1109/SAMI54271.2022.9780701.

[6] **Á. Mester** and A. Kristály. Three isometrically equivalent models of the Finsler-Poincaré disk. *2021 IEEE 15th International Symposium on Applied Computational Intelligence and Informatics (SACI)*. Timișoara, Romania, 2021, 403-408. DOI: 10.1109/SACI51354.2021.9465545.

[8] **Á. Mester** and A. Kristály. A bipolar Hardy inequality on Finsler manifolds. *2019 IEEE 13th International Symposium on Applied Computational Intelligence and Informatics (SACI)*, 308-313, 2019. DOI: 10.1109/SACI46893.2019.9111497.

*g) alte lucrări și contribuții științifice sau, după caz, din domeniul creației artistice.*

[11] L. Csató, S. Kolumbán, A. Kopacz and **Á. Mester**. Optimizing train rescheduling with reinforcement learning. In Z. Horváth (Ed.), *HU-MATHS-IN Success Stories of Mathematical Short-term Projects for Industry in 2017-2021*. Széchenyi István Egyetem, 2021, pp. 76-83. ISBN 978-615-6443-00-7

[12] Z. Darvay, **Á. Mester**, I.-M. Papp and P.-R. Takács. Egy új nem megengedett belsőpontos algoritmus a lineáris optimalizálásban. *XVIII. Fiatal Műszakiak Tudományos Ülésszaka*, 107-110, 2013. DOI: 10.36243/fmtu-2013.18.

Data:

10.06.2024.

Semnătura:

Ágnes Mester