

List of Publications

Dániel Virosztek

1 Preprints

1. G.P. Gehér, T. Titkos, D. Virosztek, The isometry group of Wasserstein spaces: the Hilbertian case. Preprint, submitted.
Available online: <https://arxiv.org/abs/2102.02037>
Independent citations: 1
 - (a) J. S. Rodríguez. "Isometric rigidity of compact Wasserstein spaces." arXiv preprint arXiv:2102.08725 (2021).

2 Papers

1. D. Virosztek, The metric property of the quantum Jensen-Shannon divergence. *Adv. Math.* **380** (2021), 107595.
Available online: <https://doi.org/10.1016/j.aim.2021.107595>
Independent citations: 8
 - (a) "Jensen-Shannon divergence." Wikipedia article, https://en.wikipedia.org/wiki/Jensen-Shannon_divergence
 - (b) Nielsen, F., "On a variational definition for the Jensen-Shannon symmetrization of distances based on the information radius." arXiv preprint arXiv:2102.09728 (2021).
 - (c) Friedland, S., M. Eckstein, S. Cole, and K Życzkowski. "Quantum Monge-Kantorovich problem and transport distance between density matrices." arXiv preprint arXiv:2102.07787 (2021).
 - (d) Megier, N., A. Smirne, and B. Vacchini. "Entropic bounds on information backflow." arXiv preprint arXiv:2101.02720 (2021).
 - (e) Sra, S. "Metrics induced by Jensen-Shannon and related divergences on positive definite matrices." *Linear Algebra Appl.* **616** (2021), 125–138.
 - (f) Lam, N., and P.L. Le. "Quantum divergences with p -power means." *Linear Algebra Appl.* **609** (2021), 289–307.
 - (g) Lam, N., and R. Milley. "Some notes on quantum Hellinger divergences with Heinz means." *Electron. J. Linear Algebra* **36** (2020), 704–722.
 - (h) Pires, D.P., K. Modi, and L.C. Céleri. "Bounding generalized relative entropies: non-asymptotic quantum speed limits." arXiv preprint arXiv:2008.12192 (2020).
2. J. Pitrik, D. Virosztek, A divergence center interpretation of general symmetric Kubo-Ando means, and related weighted multivariate operator means. *Linear Algebra Appl.* **609** (2021), 203–217.
Available online: <https://doi.org/10.1016/j.laa.2020.09.007>
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 - (a) Lam, N., and R. Milley. "Some notes on quantum Hellinger divergences with Heinz means." *Electron. J. Linear Algebra* **36** (2020), 704–722.

3. G.P. Gehér, T. Titkos, D. Viosztek, Isometric study of Wasserstein spaces — the real line. *Trans. Amer. Math. Soc.* **373** (2020), 5855–5883.
Available online: <https://doi.org/10.1090/tran/8113>
Independent citations: 2
 - (a) J. S. Rodríguez. "Isometric rigidity of compact Wasserstein spaces." arXiv preprint arXiv:2102.08725 (2021).
 - (b) J. S. Rodríguez. "Symmetries of curved metric measure spaces." Ph.D. Thesis, Universidad Autónoma de Madrid, 2020. https://www.icmat.es/Thesis/2020/Tesis_Jaime_Santos.pdf
4. J. Pitrik, D. Viosztek, Quantum Hellinger distances revisited. *Lett. Math. Phys.* **110** (2020), 2039–2052.
Available online: <https://doi.org/10.1007/s11005-020-01282-0>
Independent citations: 5
 - (a) Mosonyi, M., and T. Ogawa. "Divergence radii and the strong converse exponent of classical-quantum channel coding with constant compositions." *IEEE Trans. Inf. Theory* **67** (2021), 1668–1698.
 - (b) Lam, N., and P.L. Le. "Quantum divergences with p -power means." *Linear Algebra Appl.* **609** (2021), 289–307.
 - (c) Lam, N., and R. Milley. "Some notes on quantum Hellinger divergences with Heinz means." *Electron. J. Linear Algebra* **36** (2020), 704–722.
 - (d) Dumitru, R., and J.A. Franco. "Generalized Hellinger metric and Audenaert's in-betweenness." *Linear Algebra Appl.* **585** (2020), 191–198.
 - (e) Bhatia, R., S. Gaubert, and T. Jain. "Correction to: Matrix versions of the Hellinger distance." *Lett. Math. Phys.* **109** (2019), 2779–2781.
5. G.P. Gehér, T. Titkos, and D. Viosztek, On isometric embeddings of Wasserstein spaces — the discrete case. *J. Math. Anal. Appl.* **480** (2019), 123435.
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6. G.P. Gehér, T. Titkos, and D. Viosztek, Dirac masses and isometric rigidity, *Kyoto University RIMS Kokyûroku* **2125** (2019), 34–41.
Available online: <http://www.kurims.kyoto-u.ac.jp/kyodo/kokyuroku/contents/pdf/2125-05.pdf>
7. D. Viosztek, Jointly convex quantum Jensen divergences. *Linear Algebra Appl.* **576** (2019), 67–78.
Available online: <https://doi.org/10.1016/j.laa.2018.03.002>
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8. D. Viosztek, Maps on probability measures preserving certain distances — a survey and some new results. *Acta Sci. Math. (Szeged)* **84** (2018), 65–80.
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- (b) J. S. Rodríguez. "Symmetries of curved metric measure spaces." Ph.D. Thesis, Universidad Autónoma de Madrid, 2020. https://www.icmat.es/Thesis/2020/Tesis_Jaime_Santos.pdf
9. D. Viosztek, Characterizations of centrality by local convexity of certain functions on C^* -algebras. *Oper. Theory Adv. Appl.* **268** (2018), 487-494.
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10. D. Viosztek, Applications of an intersection formula to dual cones. *Bull. Austral. Math. Soc.* **97** (2018), 94-101.
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3 Ph.D. dissertation

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