

# Liste de publications de MATH

## Articles dans des revues avec comité de lecture

### A paraître

Bonheure, D., & Galdi, G. P. (2024). Global Weak Solutions to a Time-Periodic Body-Liquid Interaction Problem. *Annales de l'Institut Henri Poincaré. Analyse non linéaire.*, To appear.

Leemans, D., Stokes, K., & Tranchida, P. A. (2024). On trialities and their absolute geometries. *Advances in geometry*.

Cameron, P., Fernandes, M. E., & Leemans, D. (2024). The number of string C-groups of high rank. *Advances in mathematics*.

Leemans, D., & Toledo Roy, M. A. (2024). Faithful and thin non-polytopal manifolds. *Ars Mathematica contemporanea*.

Batista, E., Hautekiet, W., Saracco, P., & Vercruyse, J. (2025). Towards a classification of simple partial comodules of Hopf algebras. *Journal of algebra*, 664, 312-347.  
doi:10.1016/j.jalgebra.2024.10.005

### 2024

Cruzeiro, E. Z., De Mol, C., Massar, S., & Pironio, S. (2024). Quantum-inspired classification based on quantum state discrimination. *Quantum Machine Intelligence*, 6(2).  
doi:10.1007/s42484-024-00216-6

Bonheure, D., Galdi, G. P., & Gazzola, F. (2024). Stability of equilibria and bifurcations for a fluid-solid interaction problem. *Journal of differential equations*, 408, 324-367.  
doi:10.1016/j.jde.2024.07.007

Morsomme, H., Alonso Garcia, J., & Devolder, P. (2024). Intergenerational risk sharing in pay-as-you-go pension schemes. *Scandinavian actuarial journal*, 1-29.  
doi:10.1080/03461238.2024.2427229

Loris, I., & Rebegoldi, S. (2024). Convergence analysis of a primal-dual optimization-by-continuation algorithm. *Journal of computational and applied mathematics*, 452, 116299.  
doi:10.1016/j.cam.2024.116299

Belhouari, O., Deelstra, G., & Devolder, P. (2024). Hybrid life insurance valuation based on a new standard deviation premium principle in a stochastic interest rate framework. *European Actuarial Journal*, 2024, 1-28.

Deelstra, G., Devolder, P., & Roelants Du Vivier, B. (2024). Impact of correlation between interest rates and mortality rates on the valuation of various life insurance products. *ASTIN bulletin*, 2024, 1-31.

Bernard, G., & Verdebout, T. (2024). Power enhancement for dimension detection of Gaussian signals. *Statistica sinica*, 34, 2161-2182.

Hallin, M., Liu, H., & Verdebout, T. (2024). Nonparametric Measure-transportation-based Methods for Directional Data. *Journal of the Royal Statistical Society. Series B. Methodological*, 86, 1172-1196.

Denuit, M., Huyghe, J., Trufin, J., & Verdebout, T. (2024). Testing for auto-calibration with Lorenz and Concentration curves. *Insurance. Mathematics & economics*, 117, 130-139. doi:10.1016/j.insmatheco.2024.04.003

Grosskopf, P., & Vercruyse, J. (2024). Free and co-free constructions for Hopf categories. *Journal of pure and applied algebra*, 228(10), 107704. doi:10.1016/j.jpaa.2024.107704

Berger, J., Saracco, P., & Vercruyse, J. (2024). Everybody knows what a normal gabi-algebra is. *Advances in mathematics*, 451, 109797. doi:10.1016/j.aim.2024.109797

Batista, E., Hautekiet, W., & Vercruyse, J. (2024). A comonadicity theorem for partial comodules. *Quaestiones mathematicae*. doi:10.2989/16073606.2024.2322011

Berchio, E., Bonheure, D., Galdi, G. P., Gazzola, F., & Perotto, S. (2024). Equilibrium Configurations of a Symmetric Body Immersed in a Stationary Navier–Stokes Flow in a Planar Channel. *SIAM journal on mathematical analysis*, 56(3), 3759-3801. doi:10.1137/23M1568752

Bonheure, D., Casteras, J.-B., & Premoselli, B. (2024). Classification of radial blow-up at the first critical exponent for the Lin–Ni–Takagi problem in the ball. *Mathematische Annalen*. doi:10.1007/s00208-024-02888-8

Bhattacharya, S., Lefèvre, L., Chatzistergos, T., Hayakawa, H., & Jansen, M. (2024). RudolfWolf to AlfredWolfer: The Transfer of the Reference Observer in the International Sunspot Number Series (1876–1893). *Solar physics*, 299, 45.

El Kaoutit, L., Ghobadi, A., Saracco, P., & Vercruyse, J. (2024). Correspondence theorems for Hopf algebroids with applications to affine groupoids. *Canadian journal of mathematics*, 1-51. doi:10.4153/S0008414X23000238

Delbrouck, C., & Alonso Garcia, J. (2024). COVID-19 and Excess Mortality: An Actuarial Study. *Risks*, 12(4), 61. doi:10.3390/risks12040061

Wolf, F. L., Deelstra, G., & Grzelak, L. (2024). Consistent asset modelling with random coefficients and switches between regimes. *Mathematics and computers in simulation*, 223, 65-85. doi:10.1016/j.matcom.2024.03.021

Jansen, M. (2024). Information criteria for structured parameter selection in high dimensional tree and graph models. *Digital signal processing*, 148, 104437.

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De Saedeleer, J., Leemans, D., & Mulpas, J. (2024). A rank augmentation theorem for rank three string C-group representations of the symmetric groups. *Journal of algebraic combinatorics*, 59(2), 393-411. doi:10.1007/s10801-023-01291-x

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García-Portugués, E., Lafaye De Micheaux, P., Meintanis, S., & Verdebout, T. (2024). Nonparametric tests of independence for circular data based on trigonometric moments. *Statistica sinica*, 34, 567-588.

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Duerinckx, M., Gloria, A., & Ruf, M. (2024). Un ansatz spectral pour l'homogénéisation de l'équation des ondes en temps long. *Journal de l'Ecole Polytechnique - Mathématiques*, 11, 523-587. doi:10.5802/JEP.259

Alonso Garcia, J., Sherris, M., Thirurajah, S., & Ziveyi, J. (2024). Taxation and policyholder behavior: the case of guaranteed minimum accumulation benefits. *ASTIN bulletin*, 1-28. doi:10.1017/asb.2023.38