2022
Journal Articles

Deep Learning in Attosecond Metrology,
Optics Express, 2022.

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[C1] J. Veraart and 100 coauthors,
A data-driven variability assessment of brain diffusion MRI preprocessing pipelines,

2021
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[J1] P. Müller, V. Golkov, V. Tomassini and D. Cremers,
Rotation-Equivariant Deep Learning for Diffusion MRI,

[J2] M. Mozes, M. Schmitt, V. Golkov, H. Schütze and D. Cremers,
Scene Graph Generation for Better Image Captioning?,

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[C1] M Naeyaert, V Golkov, D Cremers, J Sijbers and M Verhoye,
Faster and better HARDI using FSE and holistic reconstruction,

[C2] P. Müller, V. Golkov, V. Tomassini and D. Cremers,
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[PhD1] V. Golkov,
Deep learning and variational analysis for high-dimensional and geometric biomedical data,
Department of Informatics, Technical University of Munich, Germany, 2021.
2020

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[J1] V. Golkov, A. Becker, D. T. Plop, D. 38;26ihaturo, N. Davoudi, J. Mendenhall, R. Moretti, J. Meiler and D. Cremers,

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[J3] G Fabbro, V Golkov, T Kemp and D Cremers,

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[C1] V. Golkov, M. J. Skwark, A. Mirchev, G. Dikov, A. R. Geanes, J. Mendenhall, J. Meiler and D. Cremers,

3D Deep Learning for Biological Function Prediction from Physical Fields,


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Efficient Deep Network Architectures for Fast Chest X-Ray Tuberculosis Screening and Visualization,


[J2] J. Schuchardt, V. Golkov and D. Cremers,

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[J3] L. Della Libera, V. Golkov, Y. Zhu, A. Mielke and D. Cremers,

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[C1] A. Vasilev, V. Golkov, M. Meissner, I. Lipp, E. Sgarlata, V. Tomassini, D. K. Jones and D. Cremers,

q-Space Novelty Detection with Variational Autoencoders,

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[C2] P. Swazinna, V. Golkov, I. Lipp, E. Sgarlata, V. Tomassini, D. K. Jones and D. Cremers,

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D. K. Jones and D. Cremers,
*q-Space Novelty Detection in Short Diffusion MRI Scans of Multiple Sclerosis*,
*International Society for Magnetic Resonance in Medicine (ISMRM) Annual Meeting*,
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[C3] B. T. Do, V. Golkov, G. E. Gürel and D. Cremers,
*Precursor microRNA Identification Using Deep Convolutional Neural Networks*,

[C4] P. Haeusser, J. Plapp, V. Golkov, E. Aljalbout and D. Cremers,
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*Regularization for Deep Learning: A Taxonomy*,

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[C1] J.C. Peeken, C. Knie, V. Golkov, K. Kessel, F. Pasa, Q. Khan, M. Seroglazov, J. Kukacka,
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Protein Contact Prediction from Amino Acid Co-Evolution Using Convolutional Networks for Graph-Valued Images, 
*Annual Conference on Neural Information Processing Systems (NIPS)*, Barcelona, Spain, dec 2016, Oral Presentation (acceptance rate: under 2%).

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A. Dosovitskiy, P. Fischer, E. Ilg, P. Haeusser, C. Hazirbas, V. Golkov, P. van der Smagt, D. Cremers and T. Brox,
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Improved Diffusion Kurtosis Imaging and Direct Propagator Estimation Using 
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pressed Sensing on Diffusion MR Image Reconstruction and Kurtosis Tensor 
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Meeting, 2013, Oral Presentation.

[C2] V. Golkov, T. Sprenger, M.I. Menzel, D. Cremers and J.I. Sperl, 
Line-Process-Based Joint SENSE Reconstruction of Diffusion Images with In-
tensity Inhomogeneity Correction and Noise Non-Stationarity Correction, 
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Meeting, 2013, Certificate of Merit Award.

[C3] V. Golkov, M.I. Menzel, T. Sprenger, A. Menini, D. Cremers and J.I. Sperl, 
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