Yoram Bresler

List of Publications by Year
in descending order

66 papers	3,150 citations	257450 24 h-index	345221 36 g-index
66 all docs	66 docs citations	66 times ranked	2422 citing authors

#	Article	IF	Citations
1	Transform Learning for Magnetic Resonance Image Reconstruction: From Model-Based Learning to Building Neural Networks. IEEE Signal Processing Magazine, 2020, 37, 41-53.	5.6	76
2	VIDOSAT: High-Dimensional Sparsifying Transform Learning for Online Video Denoising. IEEE Transactions on Image Processing, 2019, 28, 1691-1704.	9.8	26
3	Blind Gain and Phase Calibration via Sparse Spectral Methods. IEEE Transactions on Information Theory, 2019, 65, 3097-3123.	2.4	19
4	GAN-Based Projector for Faster Recovery With Convergence Guarantees in Linear Inverse Problems. , 2019, , .		28
5	Learning Filter Bank Sparsifying Transforms. IEEE Transactions on Signal Processing, 2019, 67, 504-519.	5.3	16
6	Bounding Multivariate Trigonometric Polynomials. IEEE Transactions on Signal Processing, 2019, 67, 700-707.	5.3	3
7	Near-Optimal Compressed Sensing of a Class of Sparse Low-Rank Matrices Via Sparse Power Factorization. IEEE Transactions on Information Theory, 2018, 64, 1666-1698.	2.4	34
8	FRISTâ€"flipping and rotation invariant sparsifying transform learning and applications. Inverse Problems, 2017, 33, 074007.	2.0	26
9	When sparsity meets low-rankness: Transform learning with non-local low-rank constraint for image restoration. , 2017, , .		36
10	Identifiability in Bilinear Inverse Problems With Applications to Subspace or Sparsity-Constrained Blind Gain and Phase Calibration. IEEE Transactions on Information Theory, 2017, 63, 822-842.	2.4	23
11	Identifiability and Stability in Blind Deconvolution Under Minimal Assumptions. IEEE Transactions on Information Theory, 2017, 63, 4619-4633.	2.4	17
12	Automatic parameter tuning for image denoising with learned sparsifying transforms. , 2017, , .		6
13	Joint Adaptive Sparsity and Low-Rankness on the Fly: An Online Tensor Reconstruction Scheme for Video Denoising. , 2017, , .		34
14	Range-space based identification of parametric linear systems. , 2016, , .		0
15	Learning flipping and rotation invariant sparsifying transforms. , 2016, , .		9
16	Optimal Sample Complexity for Blind Gain and Phase Calibration. IEEE Transactions on Signal Processing, 2016, 64, 5549-5556.	5.3	17
17	Identifiability in Blind Deconvolution With Subspace or Sparsity Constraints. IEEE Transactions on Information Theory, 2016, 62, 4266-4275.	2.4	44
18	Data-Driven Learning of a Union of Sparsifying Transforms Model for Blind Compressed Sensing. IEEE Transactions on Computational Imaging, 2016, 2, 294-309.	4.4	53

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19	Uniqueness in bilinear inverse problems with applications to subspace and joint sparsity models. , 2015, , .		3
20	Sparsifying Transform Learning With Efficient Optimal Updates and Convergence Guarantees. IEEE Transactions on Signal Processing, 2015, 63, 2389-2404.	5.3	74
21	Video denoising by online 3D sparsifying transform learning. , 2015, , .		35
22	Structured Overcomplete Sparsifying Transform Learning with Convergence Guarantees and Applications. International Journal of Computer Vision, 2015, 114, 137-167.	15.6	122
23	Dynamic PET reconstruction using temporal patch-based low rank penalty for ROI-based brain kinetic analysis. Physics in Medicine and Biology, 2015, 60, 2019-2046.	3.0	18
24	Online Sparsifying Transform Learning—Part I: Algorithms. IEEE Journal on Selected Topics in Signal Processing, 2015, 9, 625-636.	10.8	74
25	Online Sparsifying Transform Learning—Part II: Convergence Analysis. IEEE Journal on Selected Topics in Signal Processing, 2015, 9, 637-646.	10.8	39
26	Improving M-SBL for Joint Sparse Recovery Using a Subspace Penalty. IEEE Transactions on Signal Processing, 2015, 63, 6595-6605.	5.3	12
27	Learning sparsifying filter banks. , 2015, , .		5
28	Blind compressed sensing using sparsifying transforms. , 2015, , .		4
29	Data-driven adaptation of a union of sparsifying transforms for blind compressed sensing MRI reconstruction. , 2015, , .		1
30	Efficient Blind Compressed Sensing Using Sparsifying Transforms with Convergence Guarantees and Application to Magnetic Resonance Imaging. SIAM Journal on Imaging Sciences, 2015, 8, 2519-2557.	2.2	87
31	Learning overcomplete sparsifying transforms with block cosparsity. , 2014, , .		5
32	Online sparsifying transform learning for signal processing. , 2014, , .		4
33	Doubly sparse transform learning with convergence guarantees. , 2014, , .		6
34	Motion Adaptive Patch-Based Low-Rank Approach for Compressed Sensing Cardiac Cine MRI. IEEE Transactions on Medical Imaging, 2014, 33, 2069-2085.	8.9	53
35	Sparsifying transform learning for Compressed Sensing MRI. , 2013, , .		38
36	Learning overcomplete sparsifying transforms for signal processing. , 2013, , .		36

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37	Closed-form solutions within sparsifying transform learning. , 2013, , .		35
38	Corrections to &#x201C;ADMiRA: Atomic Decomposition for Minimum Rank Approximation&#x201D; [Sep 10 4402-4416]. IEEE Transactions on Information Theory, 2013, 59, 4730-4732.	2.4	1
39	Oblique Pursuits for Compressed Sensing. IEEE Transactions on Information Theory, 2013, 59, 6111-6141.	2.4	54
40	Learning Sparsifying Transforms. IEEE Transactions on Signal Processing, 2013, 61, 1072-1086.	5.3	277
41	Learning Doubly Sparse Transforms for Images. IEEE Transactions on Image Processing, 2013, 22, 4598-4612.	9.8	50
42	Oblique pursuits for compressed sensing with random anisotropic measurements. , 2013, , .		0
43	Learning sparsifying transforms for image processing. , 2012, , .		17
44	Learning doubly sparse transforms for image representation. , 2012, , .		6
45	Subspace Methods for Joint Sparse Recovery. IEEE Transactions on Information Theory, 2012, 58, 3613-3641.	2.4	225
46	Generic Feasibility of Perfect Reconstruction With Short FIR Filters in Multichannel Systems. IEEE Transactions on Signal Processing, 2011, 59, 5814-5829.	5.3	3
47	MR Image Reconstruction From Highly Undersampled k-Space Data by Dictionary Learning. IEEE Transactions on Medical Imaging, 2011, 30, 1028-1041.	8.9	797
48	Compressive Diffuse Optical Tomography: Noniterative Exact Reconstruction Using Joint Sparsity. IEEE Transactions on Medical Imaging, 2011, 30, 1129-1142.	8.9	75
49	ADMiRA: Atomic Decomposition for Minimum Rank Approximation. IEEE Transactions on Information Theory, 2010, 56, 4402-4416.	2.4	171
50	Patientâ€adaptive reconstruction and acquisition in dynamic imaging with sensitivity encoding (PARADISE). Magnetic Resonance in Medicine, 2010, 64, 501-513.	3.0	32
51	Subspace-augmented MUSIC for joint sparse recovery with any rank. , 2010, , .		14
52	Efficient and guaranteed rank minimization by atomic decomposition. , 2009, , .		9
53	Spectrum-blind sampling and compressive sensing for continuous-index signals. , 2008, , .		58
54	Patient-adapted reconstruction and acquisition dynamic imaging method (PARADIGM) for MRI. Inverse Problems, 2008, 24, 045015.	2.0	30

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55	Upper bounds on aliasing error energy for multidimensional sampling of nonbandlimited signals. Proceedings of the IEEE International Conference on Acoustics, Speech, and Signal Processing, 2008, , .	1.8	1
56	AFFINE-CORRECTED PARADISE: FREE-BREATHING PATIENT-ADAPTIVE CARDIAC MRI WITH SENSITIVITY ENCODING. , 2007, , .		8
57	Hardware acceleration for sparse fourier image reconstruction. , 2007, , .		0
58	ADAPTIVE REAL-TIME CARDIAC MRI USING PARADISE: VALIDATION BY THE PHYSIOLOGICALLY IMPROVED NCAT PHANTOM. , 2007, , .		17
59	Combined algorithmic and hardware acceleration for ultra-fast backprojection. , 2007, , .		2
60	Ultra-fast hierarchical backprojection for Micro-CT reconstruction. , 2007, , .		4
61	Level-set algorithm for the reconstruction of functional activation in near-infrared spectroscopic imaging. Journal of Biomedical Optics, 2006, 11, 064029.	2.6	18
62	Optimal Multi-Channel Time-Sequential Acquisition in Dynamic MRI with Parallel Coils. , 2006, , .		9
63	A Self-Referencing Level-Set Method for Image Reconstruction from Sparse Fourier Samples. International Journal of Computer Vision, 2002, 50, 253-270.	15.6	42
64	On the Optimality of the Backward Greedy Algorithm for the Subset Selection Problem. SIAM Journal on Matrix Analysis and Applications, 2000, 21, 797-808.	1.4	82
65	<title>Mean-field and information-theoretic algorithms for direct segmentation of tomographic images</title>. , 1993, , .		2
66	Two-filter formulae for discrete-time non-linear bayesian smoothing. International Journal of Control, 1986, 43, 629-641.	1.9	28