

Tino Ebbers

List of Publications by Year in Descending Order

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

125
papers

4,752
citations

37
h-index

66
g-index

135
ext. papers

5,756
ext. citations

5
avg, IF

5.66
L-index

#	Paper	IF	Citations
125	Wall shear stress and relative residence time as potential risk factors for abdominal aortic aneurysms in males: a 4D flow cardiovascular magnetic resonance case-control study.. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2022 , 24, 18	6.9	0
124	The transluminal attenuation gradient does not add diagnostic accuracy to coronary computed tomography. <i>Acta Radiologica</i> , 2021 , 62, 867-874	2	
123	Evaluating the prevalence and severity of NAFLD in primary care: the EPSONIP study protocol. <i>BMC Gastroenterology</i> , 2021 , 21, 180	3	2
122	Non-invasive estimation of relative pressure for intracardiac flows using virtual work-energy. <i>Medical Image Analysis</i> , 2021 , 68, 101948	15.4	6
121	Using Deep Learning to Emulate the Use of an External Contrast Agent in Cardiovascular 4D Flow MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2021 , 54, 777-786	5.6	2
120	Impact of prosthetic mitral valve orientation on the ventricular flow field: Comparison using patient-specific computational fluid dynamics. <i>Journal of Biomechanics</i> , 2021 , 116, 110209	2.9	4
119	T1 and T2 Mapping for Early Detection of Treatment-Related Myocardial Changes in Breast Cancer Patients. <i>Journal of Magnetic Resonance Imaging</i> , 2021 ,	5.6	1
118	Cardiac Kinetic Energy and Viscous Dissipation Rate From Radial Flow Data. <i>Frontiers in Physiology</i> , 2021 , 12, 725104	4.6	0
117	and Assessment of 4D Flow MRI Reynolds Stress Mapping for Pulsatile Blood Flow.. <i>Frontiers in Bioengineering and Biotechnology</i> , 2021 , 9, 774954	5.8	1
116	Non-contrast myocardial perfusion in rest and exercise stress using systolic flow-sensitive alternating inversion recovery.. <i>Magnetic Resonance Materials in Physics, Biology, and Medicine</i> , 2021 , 1	2.8	
115	In vitro experiments on ICOSA6 4D flow MRI measurement for the quantification of velocity and turbulence parameters. <i>Magnetic Resonance Imaging</i> , 2020 , 72, 49-60	3.3	5
114	Non-invasive estimation of relative pressure in turbulent flow using virtual work-energy. <i>Medical Image Analysis</i> , 2020 , 60, 101627	15.4	13
113	Assessment of mitral valve regurgitation by cardiovascular magnetic resonance imaging. <i>Nature Reviews Cardiology</i> , 2020 , 17, 298-312	14.8	45
112	Improved Efficiency of Intraventricular Blood Flow Transit Under Cardiac Stress: A 4D Flow Dobutamine CMR Study. <i>Frontiers in Cardiovascular Medicine</i> , 2020 , 7, 581495	5.4	3
111	Clinical validation of three cardiovascular magnetic resonance techniques to measure strain and torsion in patients with suspected coronary artery disease. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2020 , 22, 83	6.9	3
110	Data Quality and Optimal Background Correction Order of Respiratory-Gated k-Space Segmented Spoiled Gradient Echo (SGRE) and Echo Planar Imaging (EPI)-Based 4D Flow MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2020 , 51, 885-896	5.6	4
109	Impact of Pulmonary Venous Inflow on Cardiac Flow Simulations: Comparison with In Vivo 4D Flow MRI. <i>Annals of Biomedical Engineering</i> , 2019 , 47, 413-424	4.7	17

108	Characterization and estimation of turbulence-related wall shear stress in patient-specific pulsatile blood flow. <i>Journal of Biomechanics</i> , 2019 , 85, 108-117	2.9	11
107	Left Ventricular Flow Analysis. <i>Circulation: Cardiovascular Imaging</i> , 2019 , 12, e008130	3.9	22
106	Intracardiac 4D Flow MRI in Congenital Heart Disease: Recommendations on Behalf of the ISMRM Flow & Motion Study Group. <i>Journal of Magnetic Resonance Imaging</i> , 2019 , 50, spcone-spcone	5.6	20
105	Intracardiac 4D Flow MRI in Congenital Heart Disease: Recommendations on Behalf of the ISMRM Flow & Motion Study Group. <i>Journal of Magnetic Resonance Imaging</i> , 2019 , 50, 677-681	5.6	16
104	Post-cardioversion Improvement in LV Function Defined by 4D Flow Patterns and Energetics in Patients With Atrial Fibrillation. <i>Frontiers in Physiology</i> , 2019 , 10, 659	4.6	5
103	Pathophysiology behind prolonged whiplash associated disorders: study protocol for an experimental study. <i>BMC Musculoskeletal Disorders</i> , 2019 , 20, 51	2.8	1
102	Visualizing and quantifying flow stasis in abdominal aortic aneurysms in men using 4D flow MRI. <i>Magnetic Resonance Imaging</i> , 2019 , 57, 103-110	3.3	9
101	Validation of pressure drop assessment using 4D flow MRI-based turbulence production in various shapes of aortic stenoses. <i>Magnetic Resonance in Medicine</i> , 2019 , 81, 893-906	4.4	16
100	4D Flow MRI quantification of blood flow patterns, turbulence and pressure drop in normal and stenotic prosthetic heart valves. <i>Magnetic Resonance Imaging</i> , 2019 , 55, 118-127	3.3	10
99	Longitudinal changes in myocardial T and T relaxation times related to diffuse myocardial fibrosis in aortic stenosis; before and after aortic valve replacement. <i>Journal of Magnetic Resonance Imaging</i> , 2018 , 48, 799	5.6	7
98	Test-retest variability of left ventricular 4D flow cardiovascular magnetic resonance measurements in healthy subjects. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2018 , 20, 15	6.9	22
97	Improving left ventricular segmentation in four-dimensional flow MRI using intramodality image registration for cardiac blood flow analysis. <i>Magnetic Resonance in Medicine</i> , 2018 , 79, 554-560	4.4	7
96	Assessment of Reynolds stress components and turbulent pressure loss using 4D flow MRI with extended motion encoding. <i>Magnetic Resonance in Medicine</i> , 2018 , 79, 1962-1971	4.4	17
95	Automated three-dimensional tracking of the left ventricular myocardium in time-resolved and dose-modulated cardiac CT images using deformable image registration. <i>Journal of Cardiovascular Computed Tomography</i> , 2018 , 12, 139-148	2.8	11
94	Age-Related Vascular Changes Affect Turbulence in Aortic Blood Flow. <i>Frontiers in Physiology</i> , 2018 , 9, 36	4.6	29
93	Automated multi-atlas segmentation of cardiac 4D flow MRI. <i>Medical Image Analysis</i> , 2018 , 49, 128-140	15.4	14
92	Fixed volume particle trace emission for the analysis of left atrial blood flow using 4D Flow MRI. <i>Magnetic Resonance Imaging</i> , 2018 , 47, 83-88	3.3	5
91	Mechanical dyssynchrony alters left ventricular flow energetics in failing hearts with LBBB: a 4D flow CMR pilot study. <i>International Journal of Cardiovascular Imaging</i> , 2018 , 34, 587-596	2.5	7

90	Turbulent kinetic energy in the right ventricle: Potential MR marker for risk stratification of adults with repaired Tetralogy of Fallot. <i>Journal of Magnetic Resonance Imaging</i> , 2018 , 47, 1043-1053	5.6	18
89	Non-invasive Assessment of Systolic and Diastolic Cardiac Function During Rest and Stress Conditions Using an Integrated Image-Modeling Approach. <i>Frontiers in Physiology</i> , 2018 , 9, 1515	4.6	6
88	Intracardiac Flow at 4D CT: Comparison with 4D Flow MRI. <i>Radiology</i> , 2018 , 289, 51-58	20.5	16
87	Clinical feasibility of 3D-QALAS - Single breath-hold 3D myocardial T1- and T2-mapping. <i>Magnetic Resonance Imaging</i> , 2017 , 38, 13-20	3.3	12
86	Comparison of respiratory motion suppression techniques for 4D flow MRI. <i>Magnetic Resonance in Medicine</i> , 2017 , 78, 1877-1882	4.4	17
85	Estimating the irreversible pressure drop across a stenosis by quantifying turbulence production using 4D Flow MRI. <i>Scientific Reports</i> , 2017 , 7, 46618	4.9	37
84	Creating hemodynamic atlases of cardiac 4D flow MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2017 , 46, 1389-1399	5.6	10
83	Multidirectional WSS disturbances in stenotic turbulent flows: A pre- and post-intervention study in an aortic coarctation. <i>Journal of Biomechanics</i> , 2017 , 51, 8-16	2.9	18
82	Bridging the gap between measurements and modelling: a cardiovascular functional avatar. <i>Scientific Reports</i> , 2017 , 7, 6214	4.9	22
81	Improving visualization of 4D flow cardiovascular magnetic resonance with four-dimensional angiographic data: generation of a 4D phase-contrast magnetic resonance CardioAngiography (4D PC-MRCA). <i>Journal of Cardiovascular Magnetic Resonance</i> , 2017 , 19, 47	6.9	12
80	Left ventricular hemodynamic forces as a marker of mechanical dyssynchrony in heart failure patients with left bundle branch block. <i>Scientific Reports</i> , 2017 , 7, 2971	4.9	18
79	Assessment of turbulent flow effects on the vessel wall using four-dimensional flow MRI. <i>Magnetic Resonance in Medicine</i> , 2017 , 77, 2310-2319	4.4	18
78	112 Evaluation of patients with left ventricular thrombus using intra-cardiac blood visualisation with 4d flow. <i>Heart</i> , 2017 , 103, A83-A84	5.1	
77	Left Atrial 4D Blood Flow Dynamics and Hemostasis following Electrical Cardioversion of Atrial Fibrillation. <i>Frontiers in Physiology</i> , 2017 , 8, 1052	4.6	16
76	4D Phase-Contrast Magnetic Resonance CardioAngiography (4D PC-MRCA) Creation from 4D Flow MRI. <i>Lecture Notes in Computer Science</i> , 2016 , 519-526	0.9	2
75	4D flow CMR detects progressive improvement in ventricular function following cardioversion of atrial fibrillation. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2016 , 18,	6.9	78
74	Left ventricular kinetic energy as a marker of mechanical dyssynchrony in failing hearts with LBBB: a 4D flow CMR study. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2016 , 18,	6.9	78
73	Myocardial mapping of T1 and T2 with 3D-QALAS - precision of independent and dependent scans in healthy subjects. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2016 , 18,	6.9	78

72	Phase-contrast MRI volume flow--a comparison of breath held and navigator based acquisitions. <i>BMC Medical Imaging</i> , 2016 , 16, 26	2.9	11
71	4D Flow MRI-based pressure loss estimation in stenotic flows: Evaluation using numerical simulations. <i>Magnetic Resonance in Medicine</i> , 2016 , 75, 1808-21	4.4	34
70	Assessment of left ventricular hemodynamic forces in healthy subjects and patients with dilated cardiomyopathy using 4D flow MRI. <i>Physiological Reports</i> , 2016 , 4, e12685	2.6	31
69	Multi-centre validation of an automatic algorithm for fast 4D myocardial segmentation in cine CMR datasets. <i>European Heart Journal Cardiovascular Imaging</i> , 2016 , 17, 1118-27	4.1	14
68	Altered Diastolic Flow Patterns and Kinetic Energy in Subtle Left Ventricular Remodeling and Dysfunction Detected by 4D Flow MRI. <i>PLoS ONE</i> , 2016 , 11, e0161391	3.7	38
67	4D flow MRI can detect subtle right ventricular dysfunction in primary left ventricular disease. <i>Journal of Magnetic Resonance Imaging</i> , 2016 , 43, 558-65	5.6	26
66	Patient-Specific Simulation of Cardiac Blood Flow From High-Resolution Computed Tomography. <i>Journal of Biomechanical Engineering</i> , 2016 , 138,	2.1	27
65	Assessment of turbulent viscous stress using ICOSA 4D Flow MRI for prediction of hemodynamic blood damage. <i>Scientific Reports</i> , 2016 , 6, 39773	4.9	23
64	Letter by Dyverfeldt and Ebbers regarding article "Estimation of turbulent kinetic energy using 4D phase-contrast MRI: Effect of scan parameters and target vessel size". <i>Magnetic Resonance Imaging</i> , 2016 , 34, 1226	3.3	3
63	Retrospectively gated intracardiac 4D flow MRI using spiral trajectories. <i>Magnetic Resonance in Medicine</i> , 2016 , 75, 196-206	4.4	15
62	Quantification of turbulence and velocity in stenotic flow using spiral three-dimensional phase-contrast MRI. <i>Magnetic Resonance in Medicine</i> , 2016 , 75, 1249-55	4.4	14
61	Quantitative Assessment of Turbulence and Flow Eccentricity in an Aortic Coarctation: Impact of Virtual Interventions. <i>Cardiovascular Engineering and Technology</i> , 2015 , 6, 281-93	2.2	16
60	Automatic multi-vessel volume flow calculation with 4D flow CMR. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17,	6.9	78
59	Turbulent kinetic energy in the ascending aorta is greater in bicuspid than tricuspid aortic valve stenosis. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17,	6.9	78
58	4D flow cardiovascular magnetic resonance consensus statement. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17, 72	6.9	446
57	Spatial heterogeneity of four-dimensional relative pressure fields in the human left ventricle. <i>Magnetic Resonance in Medicine</i> , 2015 , 74, 1716-25	4.4	7
56	Turbulent kinetic energy in normal and myopathic left ventricles. <i>Journal of Magnetic Resonance Imaging</i> , 2015 , 41, 1021-9	5.6	47
55	Clinical experience of strain imaging using DENSE for detecting infarcted cardiac segments. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17, 50	6.9	21

54	Single breath-hold 3D mapping of T1 and T2 relaxation times with 3D-QALAS - feasibility in patients. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17,	6.9	1
53	Left ventricular hemodynamic forces are altered in patients with dilated cardiomyopathy. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17,	6.9	3
52	Atlas-based analysis of 4D flow CMR: automated vessel segmentation and flow quantification. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2015 , 17, 87	6.9	35
51	Improving Blood Flow Simulations by Incorporating Measured Subject-Specific Wall Motion. <i>Cardiovascular Engineering and Technology</i> , 2014 , 5, 261-269	2.2	13
50	Pulse wave velocity with 4D flow MRI: systematic differences and age-related regional vascular stiffness. <i>Magnetic Resonance Imaging</i> , 2014 , 32, 1266-71	3.3	31
49	Simultaneous three-dimensional myocardial T1 and T2 mapping in one breath hold with 3D-QALAS. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2014 , 16, 102	6.9	66
48	Validation of turbulent kinetic energy in an aortic coarctation before and after intervention - MRI vs. CFD. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2013 , 15,	6.9	78
47	Practical application of DENSE in ischemic heart disease. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2013 , 15,	6.9	78
46	Retrospectively gated intra-cardiac 4D flow CMR using spiral k-space trajectories. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2013 , 15,	6.9	1
45	Spatial heterogeneity of intracardiac 4D relative pressure fields during diastole. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2013 , 15,	6.9	78
44	Numerical and experimental assessment of turbulent kinetic energy in an aortic coarctation. <i>Journal of Biomechanics</i> , 2013 , 46, 1851-8	2.9	45
43	Determining optimal noninvasive parameters for the prediction of left ventricular remodeling in chronic ischemic patients. <i>Scandinavian Cardiovascular Journal</i> , 2013 , 47, 329-34	2	16
42	Four-dimensional blood flow-specific markers of LV dysfunction in dilated cardiomyopathy. <i>European Heart Journal Cardiovascular Imaging</i> , 2013 , 14, 417-24	4.1	96
41	Temporal 3D Lagrangian strain from 2D slice-followed cine DENSE MRI. <i>Clinical Physiology and Functional Imaging</i> , 2012 , 32, 139-44	2.4	1
40	Emerging trends in CV flow visualization. <i>JACC: Cardiovascular Imaging</i> , 2012 , 5, 305-16	8.4	174
39	Myocardial strains from 3D displacement encoded magnetic resonance imaging. <i>BMC Medical Imaging</i> , 2012 , 12, 9	2.9	6
38	Characterization of shear-sensitive genes in the normal rat aorta identifies Hand2 as a major flow-responsive transcription factor. <i>PLoS ONE</i> , 2012 , 7, e52227	3.7	14
37	Spiral readouts for 4D flow MRI. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2012 , 14,	6.9	2

36	Assessment of the accuracy of MRI wall shear stress estimation using numerical simulations. <i>Journal of Magnetic Resonance Imaging</i> , 2012 , 36, 128-38	5.6	87
35	Four-dimensional flow MRI using spiral acquisition. <i>Magnetic Resonance in Medicine</i> , 2012 , 68, 1065-73	4.4	45
34	In vivo validation of numerical prediction for turbulence intensity in an aortic coarctation. <i>Annals of Biomedical Engineering</i> , 2012 , 40, 860-70	4.7	48
33	Determination of right ventricular volume and function using multiple axially rotated MRI slices. <i>Clinical Physiology and Functional Imaging</i> , 2011 , 31, 233-9	2.4	5
32	Evaluation of aortic geometries created by magnetic resonance imaging data in healthy volunteers. <i>Clinical Physiology and Functional Imaging</i> , 2011 , 31, 485-91	2.4	
31	Flow Imaging: Cardiac Applications of 3D Cine Phase-Contrast MRI. <i>Current Cardiovascular Imaging Reports</i> , 2011 , 4, 127-133	0.7	30
30	Sequence optimization to reduce velocity offsets in cardiovascular magnetic resonance volume flow quantification--a multi-vendor study. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2011 , 13, 18	6.9	42
29	Comprehensive 4D velocity mapping of the heart and great vessels by cardiovascular magnetic resonance. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2011 , 13, 7	6.9	314
28	Diastolic preparation for left ventricular ejection - A marker of inefficiency of the failing heart. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2011 , 13,	6.9	78
27	Hemodynamic aspects of mitral regurgitation assessed by generalized phase-contrast MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2011 , 33, 582-8	5.6	29
26	A novel MRI framework for the quantification of any moment of arbitrary velocity distributions. <i>Magnetic Resonance in Medicine</i> , 2011 , 65, 725-31	4.4	15
25	Influence of the FID and off-resonance effects in dense MRI. <i>Magnetic Resonance in Medicine</i> , 2011 , 65, 1103-11	4.4	3
24	4-D blood flow in the human right ventricle. <i>American Journal of Physiology - Heart and Circulatory Physiology</i> , 2011 , 301, H2344-50	5.2	89
23	In vivo SNR in DENSE MRI; temporal and regional effects of field strength, receiver coil sensitivity and flip angle strategies. <i>Magnetic Resonance Imaging</i> , 2011 , 29, 202-8	3.3	15
22	Quantification of presystolic blood flow organization and energetics in the human left ventricle. <i>American Journal of Physiology - Heart and Circulatory Physiology</i> , 2011 , 300, H2135-41	5.2	89
21	In vitro assessment of flow patterns and turbulence intensity in prosthetic heart valves using generalized phase-contrast MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2010 , 31, 1075-80	5.6	35
20	Single-breath-hold multiple-slice DENSE MRI. <i>Magnetic Resonance in Medicine</i> , 2010 , 63, 1411-4	4.4	10
19	Simulation of phase contrast MRI of turbulent flow. <i>Magnetic Resonance in Medicine</i> , 2010 , 64, 1039-46	4.4	35

18	Semi-automatic quantification of 4D left ventricular blood flow. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2010 , 12, 9	6.9	141
17	Improving computation of cardiovascular relative pressure fields from velocity MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2009 , 30, 54-61	5.6	47
16	On MRI turbulence quantification. <i>Magnetic Resonance Imaging</i> , 2009 , 27, 913-22	3.3	70
15	Improved estimation and visualization of two-dimensional myocardial strain rate using MR velocity mapping. <i>Journal of Magnetic Resonance Imaging</i> , 2008 , 28, 604-11	5.6	8
14	Assessment of fluctuating velocities in disturbed cardiovascular blood flow: in vivo feasibility of generalized phase-contrast MRI. <i>Journal of Magnetic Resonance Imaging</i> , 2008 , 28, 655-63	5.6	110
13	2007 ,		8
12	Transit of blood flow through the human left ventricle mapped by cardiovascular magnetic resonance. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2007 , 9, 741-7	6.9	148
11	Quantification of intravoxel velocity standard deviation and turbulence intensity by generalizing phase-contrast MRI. <i>Magnetic Resonance in Medicine</i> , 2006 , 56, 850-8	4.4	106
10	Feasibility of patient specific aortic blood flow CFD simulation. <i>Lecture Notes in Computer Science</i> , 2006 , 9, 257-63	0.9	8
9	Three-directional myocardial motion assessed using 3D phase contrast MRI. <i>Journal of Cardiovascular Magnetic Resonance</i> , 2004 , 6, 627-36	6.9	28
8	Flow patterns in the aortic root and the aorta studied with time-resolved, 3-dimensional, phase-contrast magnetic resonance imaging: implications for aortic valve-sparing surgery. <i>Journal of Thoracic and Cardiovascular Surgery</i> , 2004 , 127, 1602-7	1.5	164
7	Three-dimensional flow characterization using vector pattern matching. <i>IEEE Transactions on Visualization and Computer Graphics</i> , 2003 , 9, 313-319	4	51
6	Correction for displacement artifacts in 3D phase contrast imaging. <i>Journal of Magnetic Resonance Imaging</i> , 2002 , 16, 591-7	5.6	9
5	Noninvasive measurement of time-varying three-dimensional relative pressure fields within the human heart. <i>Journal of Biomechanical Engineering</i> , 2002 , 124, 288-93	2.1	98
4	Kinematics of the heart: strain-rate imaging from time-resolved three-dimensional phase contrast MRI. <i>IEEE Transactions on Medical Imaging</i> , 2002 , 21, 1105-9	11.7	28
3	Estimation of relative cardiovascular pressures using time-resolved three-dimensional phase contrast MRI. <i>Magnetic Resonance in Medicine</i> , 2001 , 45, 872-9	4.4	102
2	Particle trace visualization of intracardiac flow using time-resolved 3D phase contrast MRI. <i>Magnetic Resonance in Medicine</i> , 1999 , 41, 793-9	4.4	148
1	Pitfalls in Doppler evaluation of diastolic function: insights from 3-dimensional magnetic resonance imaging. <i>Journal of the American Society of Echocardiography</i> , 1999 , 12, 817-26	5.8	47

