Arjan P Verweij

List of Publications by Year
in descending order

50 papers	1,107 citations	567281 15 h-index	395702 33 g-index
50 all docs	50 docs citations	50 times ranked	1036 citing authors

#	Article	IF	Citations
1	Quench Protection of the HL-LHC Hollow Electron Lens Superconducting Solenoid Magnets. IEEE Transactions on Applied Superconductivity, 2022, 32, 1-5.	1.7	2
2	Quench Behavior of Prototype Nb-Ti HL-LHC Dipole Canted Cos-Theta Orbit Corrector Magnets. IEEE Transactions on Applied Superconductivity, 2022, 32, 1-5.	1.7	4
3	A Simplified Approach to Simulate Quench Development in a Superconducting Magnet. IEEE Transactions on Applied Superconductivity, 2021, 31, 1-5.	1.7	1
4	Quench Protection Studies for the High Luminosity LHC Nb$_3$Sn Quadrupole Magnets. IEEE Transactions on Applied Superconductivity, 2021, 31, 1-5.	1.7	12
5	Performance of the Large Hadron Collider's Cryogenic Bypass Diodes Over the First Two Physics Runs, Future Projects, and Perspectives. IEEE Transactions on Applied Superconductivity, 2020, 30, 1-4.	1.7	0
6	A Coupled Aâ€“H Formulation for Magneto-Thermal Transients in High-Temperature Superconducting Magnets. IEEE Transactions on Applied Superconductivity, 2020, 30, 1-11.	1.7	38
7	Fast failures in the LHC and the future high luminosity LHC. Physical Review Accelerators and Beams, 2020, 23, .	1.6	2
8	Characterization of the radiation tolerance of cryogenic diodes for the High Luminosity LHC inner triplet circuit. Physical Review Accelerators and Beams, 2020, 23, .	1.6	0
9	Numerical analysis of the screening current-induced magnetic field in the HTS insert dipole magnet Feather-M2.1-2. Superconductor Science and Technology, 2020, 33, 125008.	3.5	14
10	Quench Protection of the 16 T Nb₃Sn Dipole Magnets Designed for the Future Circular Collider. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-5.	1.7	10
11	FCC-hh: The Hadron Collider. European Physical Journal: Special Topics, 2019, 228, 755-1107.	2.6	367
12	HE-LHC: The High-Energy Large Hadron Collider. European Physical Journal: Special Topics, 2019, 228, 1109-1382.	2.6	108
13	Conceptual Design of the FCC-hh Dipole Circuits With Integrated CLIQ Protection System. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-9.	1.7	4
14	Quench Protection of the First 4-m-Long Prototype of the HL-LHC Nb<inline-formula> <tex-math notation="LaTeX">$_3$</tex-math> </inline-formula>Sn Quadrupole Magnet. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-5.	1.7	3
15	The CLIQ Quench Protection System Applied to the 16 T FCC-hh Dipole Magnets. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-9.	1.7	7
16	Quench Protection Performance Measurements in the First MQXF Magnet Models. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-6.	1.7	8
17	STEAM: A Hierarchical Cosimulation Framework for Superconducting Accelerator Magnet Circuits. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-6.	1.7	32
18	First Experimental Results on Damage Limits of Superconducting Accelerator Magnet Components Due to Instantaneous Beam Impact. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-10.	1.7	3

#	Article	IF	Citations
19	Status of the 16 T Dipole Development Program for a Future Hadron Collider. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-5.	1.7	36
20	Training of the Main Dipoles Magnets in the Large Hadron Collider Toward 7 TeV Operation. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-5.	1.7	1
21	Coupling of Magnetothermal and Mechanical Superconducting Magnet Models by Means of Mesh-Based Interpolation. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-5.	1.7	6
22	A 2-D Finite-Element Model for Electrothermal Transients in Accelerator Magnets. IEEE Transactions on Magnetics, 2018, 54, 1-4.	2.1	17
23	Resistance of Splices in the LHC Main Superconducting Magnet Circuits at 1.9 K. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-5.	1.7	2
24	Simulation of a Quench Event in the Upgraded High-Luminosity LHC Main Dipole Circuit Including the 11 T Nb3Sn Dipole Magnets. IEEE Transactions on Applied Superconductivity, 2018, 28, 1-5.	1.7	0
25	The 16 T Dipole Development Program for FCC. IEEE Transactions on Applied Superconductivity, 2017, 27, 1-5.	1.7	77
26	Modeling of Interfilament Coupling Currents and Their Effect on Magnet Quench Protection. IEEE Transactions on Applied Superconductivity, 2017, 27, 1-8.	1.7	15
27	Suitability of Different Quench Protection Methods for a 16 T Block-Type Nb3Sn Accelerator Dipole Magnet. IEEE Transactions on Applied Superconductivity, 2017, 27, 1-5.	1.7	10
28	A Consistent Simulation of Electrothermal Transients in Accelerator Circuits. IEEE Transactions on Applied Superconductivity, 2017, 27, 1-5.	1.7	14
29	Quench Protection System Optimization for the High Luminosity LHC Nb $_3$Sn Quadrupoles. IEEE Transactions on Applied Superconductivity, 2017, 27, 1-7.	1.7	14
30	Optimized Field/Circuit Coupling for the Simulation of Quenches in Superconducting Magnets. IEEE Journal on Multiscale and Multiphysics Computational Techniques, 2017, 2, 97-104.	2.2	18
31	Training Behavior of the Main Dipoles in the Large Hadron Collider. IEEE Transactions on Applied Superconductivity, 2017, 27, 1-7.	1.7	8
32	Quench protection analysis integrated in the design of dipoles for the Future Circular Collider. Physical Review Accelerators and Beams, 2017, 20, .	1.6	25
33	First Implementation of the CLIQ Quench Protection System on a 14-m-Long Full-Scale LHC Dipole Magnet. IEEE Transactions on Applied Superconductivity, 2016, 26, 1-5.	1.7	12
34	Advanced Quench Protection for the Nb3Sn Quadrupoles for the High Luminosity LHC. IEEE Transactions on Applied Superconductivity, 2016, 26, 1-6.	1.7	9
35	First Implementation of the CLIQ Quench Protection System on a Full-Scale Accelerator Quadrupole Magnet. IEEE Transactions on Applied Superconductivity, 2016, 26, 1-5.	1.7	22
36	Towards an Optimized Coupling-loss Induced Quench Protection System (CLIQ) for Quadrupole Magnets. Physics Procedia, 2015, 67, 215-220.	1.2	15

#	Article	IF	Citations
37	Automated lumped-element simulation framework for modelling of transient effects in superconducting magnets. , 2015, , .		11
38	Protecting a Full-Scale <inline-formula> <tex-math notation="TeX">$hbox{Nb}_{3}hbox{Sn}$</tex-math></inline-formula> Magnet With CLIQ, the New Coupling-Loss-Induced Quench System. IEEE Transactions on Applied Superconductivity, 2015, 25, 1-5.	1.7	27
39	A new hybrid protection system for high-field superconducting magnets. Superconductor Science and Technology, 2014, 27, 044023.	3.5	26
40	New, Coupling Loss Induced, Quench Protection System for Superconducting Accelerator Magnets. IEEE Transactions on Applied Superconductivity, 2014, 24, 1-5.	1.7	52
41	Effect of superfluid helium at the inner coil face on cooling and stability in superconducting accelerator magnets. , 2012, , .		3
42	Finite Element Modeling in 3D of the Impact of Superfluid Helium Filled Micro-Channels on the Heat Transfer through LHC Type Cable Insulation. IEEE Transactions on Applied Superconductivity, 2012, 22, 4701205-4701205.	1.7	4
43	Novel Ways of Heat Removal from Highly Irradiated Superconducting Windings in Accelerator Magnets. Physics Procedia, 2012, 36, 818-823.	1.2	0
44	Thermal Runaways in LHC Interconnections: Experiments. IEEE Transactions on Applied Superconductivity, 2011, 21, 1781-1785.	1.7	10
45	Consolidation of the 13 kA Interconnects in the LHC for Operation at 7 TeV. IEEE Transactions on Applied Superconductivity, 2011, 21, 2376-2379.	1.7	8
46	Thermal Runaway of the 13 kA Busbar Joints in the LHC. IEEE Transactions on Applied Superconductivity, 2010, 20, 2155-2159.	1.7	5
47	Predicting the Quench Behavior of the LHC Dipoles During Commissioning. IEEE Transactions on Applied Superconductivity, 2010, 20, 135-139.	1.7	11
48	Feasibility Study of ${m Nb}_{3}{m Al}$ Rutherford Cable for High Field Accelerator Magnet Application. IEEE Transactions on Applied Superconductivity, 2007, 17, 1461-1464.	1.7	25
49	Critical Current Measurements of the Main LHC Superconducting Cables. IEEE Transactions on Applied Superconductivity, 2007, 17, 1454-1460.	1.7	9
50	Rutherford-type cables: interstrand coupling currents. , 0, , .		0