Hany S Abdel-Khalik

List of Publications by Year
in descending order

39	259	1162889	1058333
papers	citations	8	14
		h-index	g-index

42	42	42	131
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Hybrid reduced order modeling applied to nonlinear models. International Journal for Numerical Methods in Engineering, 2012, 91, 929-949.	1.5	39
2	Efficient Subspace Methods-Based Algorithms for Performing Sensitivity, Uncertainty, and Adaptive Simulation of Large-Scale Computational Models. Nuclear Science and Engineering, 2008, 159, 256-272.	0.5	28
3	Dimensionality reducibility for multi-physics reduced order modeling. Annals of Nuclear Energy, 2017, 110, 526-540.	0.9	27
4	Overview of hybrid subspace methods for uncertainty quantification, sensitivity analysis. Annals of Nuclear Energy, 2013, 52, 28-46.	0.9	25
5	REDUCED ORDER MODELING FOR NONLINEAR MULTI-COMPONENT MODELS. , 2012, 2, 341-361.		13
6	Generalized Perturbation Theory-Free Sensitivity Analysis for Eigenvalue Problems. Nuclear Technology, 2012, 179, 169-179.	0.7	12
7	Effectiveness of Model-Based Defenses for Digitally Controlled Industrial Systems: Nuclear Reactor Case Study. Nuclear Technology, 2020, 206, 82-93.	0.7	11
8	Hybrid Monte Carlo-Deterministic Methods for Reactor Analysis. Nuclear Technology, 2012, 180, 372-382.	0.7	9
9	Exact-to-precision generalized perturbation theory for source-driven systems. Nuclear Engineering and Design, 2011, 241, 5104-5112.	0.8	8
10	Global variance reduction for Monte Carlo reactor physics calculations. Nuclear Engineering and Design, 2014, 280, 76-85.	0.8	7
11	Nuclear data uncertainty propagation and modeling uncertainty impact evaluation in neutronics core simulation. Progress in Nuclear Energy, 2020, 128, 103443.	1.3	7
12	Exact-to-precision generalized perturbation theory for eigenvalue problems. Nuclear Engineering and Design, 2013, 256, 130-140.	0.8	6
13	Estimation of sensitivity coefficients of core characteristics based on reduced-order modeling using sensitivity matrix of assembly characteristics. Journal of Nuclear Science and Technology, 2017, 54, 637-647.	0.7	6
14	Adjoint-based sensitivity analysis for multi-component models. Nuclear Engineering and Design, 2012, 245, 49-54.	0.8	5
15	Hybrid biasing approaches for global variance reduction. Applied Radiation and Isotopes, 2013, 72, 83-88.	0.7	5
16	Hybrid reduced order modeling for assembly calculations. Nuclear Engineering and Design, 2015, 295, 661-666.	0.8	5
17	Data trustworthiness signatures for nuclear reactor dynamics simulation. Progress in Nuclear Energy, 2021, 133, 103612.	1.3	5
18	Adaptive Core Simulation Employing Discrete Inverse Theory - Part I: Theory. Nuclear Technology, 2005, 151, 9-21.	0.7	4

#	Article	IF	Citations
19	Verification of the sensitivity and uncertainty-based criticality safety validation techniques: ORNL's SCALE case study. Nuclear Engineering and Design, 2020, 361, 110571.	0.8	4
20	A data analytical approach for assessing the efficacy of Operational Technology active defenses against insider threats. Progress in Nuclear Energy, 2020, 124, 103339.	1.3	4
21	Non-intrusive stochastic approach for nuclear cross-sections adjustment. Annals of Nuclear Energy, 2021, 155, 108162.	0.9	4
22	Real-Time Monitoring for Detection of Adversarial Subtle Process Variations. Nuclear Science and Engineering, 2022, 196, 544-567.	0.5	4
23	ROM-Based Surrogate Systems Modeling of EBR-II. Nuclear Science and Engineering, 2021, 195, 520-537.	0.5	3
24	Theoretical Development of Cross Section Uncertainty Library for Core Simulators. Journal of Nuclear Engineering and Radiation Science, 2020, 6, .	0.2	3
25	Application of Cross Sections Uncertainty Propagation Framework to Light and Heavy Water Reactor Systems. Journal of Nuclear Engineering and Radiation Science, 2020, 6, .	0.2	3
26	State-Based Adjoint Method for Reduced Order Modeling. Transport Theory and Statistical Physics, 2012, 41, 101-132.	0.4	2
27	Exact-to-precision generalized perturbation theory for neutron transport calculation. Nuclear Engineering and Design, 2015, 295, 651-660.	0.8	2
28	GPT-Free Sensitivity Analysis for Monte Carlo Models. Nuclear Technology, 2019, 205, 912-927.	0.7	2
29	Covert Cognizance: A Novel Predictive Modeling Paradigm. Nuclear Technology, 2021, 207, 1163-1181.	0.7	2
30	Adaptive Core Simulation Employing Discrete Inverse Theory - Part II: Numerical Experiments. Nuclear Technology, 2005, 151, 22-34.	0.7	1
31	A Hybrid Energy System Workflow for Energy Portfolio Optimization. Energies, 2021, 14, 4392.	1.6	1
32	Overview of the Tolerance Limit Calculations with Application to TSURFER. Energies, 2021, 14, 7092.	1.6	1
33	ACCRUE—An Integral Index for Measuring Experimental Relevance in Support of Neutronic Model Validation. Frontiers in Energy Research, 2021, 9, .	1.2	1
34	State-based adjoint model reduction for large scale control problems. , 2011, , .		0
35	Projection-based second order perturbation theory. Annals of Nuclear Energy, 2013, 52, 80-85.	0.9	0
36	Addressing Ambiguities in Constrained Sensitivity Analysis for Reactor Physics Problems. Nuclear Technology, 2020, 206, 1827-1839.	0.7	0

#	Article	IF	Citations
37	UNCERTAINTY CHARACTERIZATION FRAMEWORK FOR STEADY-STATE AND TRANSIENT NEUTRONICS SIMULATIONS OF A CANDU REACTOR. EPJ Web of Conferences, 2021, 247, 15002.	0.1	0
38	Validation of Covert Cognizance Active Defenses. Nuclear Science and Engineering, 2021, 195, 977-989.	0.5	0
39	Modeling errors-preserving constrained sensitivity analysis. Nuclear Engineering and Design, 2020, 365, 110729.	0.8	0