

Han Joon Kim

List of Publications by Citations

Source: <https://exaly.com/author-pdf/11607583/han-joon-kim-publications-by-citations.pdf>

Version: 2024-04-17

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

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

37
papers

3,248
citations

27
h-index

37
g-index

37
ext. papers

3,817
ext. citations

8.6
avg, IF

5.06
L-index

#	Paper	IF	Citations
37	Ferroelectricity and antiferroelectricity of doped thin HfO ₂ -based films. <i>Advanced Materials</i> , 2015 , 27, 1811-31	24	554
36	Evolution of phases and ferroelectric properties of thin Hf _{0.5} Zr _{0.5} O ₂ films according to the thickness and annealing temperature. <i>Applied Physics Letters</i> , 2013 , 102, 242905	3.4	352
35	Thin Hf _x Zr _{1-x} O ₂ Films: A New Lead-Free System for Electrostatic Supercapacitors with Large Energy Storage Density and Robust Thermal Stability. <i>Advanced Energy Materials</i> , 2014 , 4, 1400610	21.8	221
34	The effects of crystallographic orientation and strain of thin Hf _{0.5} Zr _{0.5} O ₂ film on its ferroelectricity. <i>Applied Physics Letters</i> , 2014 , 104, 072901	3.4	191
33	Surface and grain boundary energy as the key enabler of ferroelectricity in nanoscale hafnia-zirconia: a comparison of model and experiment. <i>Nanoscale</i> , 2017 , 9, 9973-9986	7.7	162
32	A study on the wake-up effect of ferroelectric Hf _{0.5} Zr _{0.5} O ₂ films by pulse-switching measurement. <i>Nanoscale</i> , 2016 , 8, 1383-9	7.7	153
31	Toward a multifunctional monolithic device based on pyroelectricity and the electrocaloric effect of thin antiferroelectric Hf _x Zr _{1-x} O ₂ films. <i>Nano Energy</i> , 2015 , 12, 131-140	17.1	144
30	Grain size engineering for ferroelectric Hf _{0.5} Zr _{0.5} O ₂ films by an insertion of Al ₂ O ₃ interlayer. <i>Applied Physics Letters</i> , 2014 , 105, 192903	3.4	134
29	Effect of Zr Content on the Wake-Up Effect in Hf _{1-x} Zr _x O ₂ Films. <i>ACS Applied Materials & Interfaces</i> , 2016 , 8, 15466-75	9.5	132
28	Effect of forming gas annealing on the ferroelectric properties of Hf _{0.5} Zr _{0.5} O ₂ thin films with and without Pt electrodes. <i>Applied Physics Letters</i> , 2013 , 102, 112914	3.4	117
27	Understanding the formation of the metastable ferroelectric phase in hafnia-zirconia solid solution thin films. <i>Nanoscale</i> , 2018 , 10, 716-725	7.7	103
26	Ferroelectric properties and switching endurance of Hf _{0.5} Zr _{0.5} O ₂ films on TiN bottom and TiN or RuO ₂ top electrodes. <i>Physica Status Solidi - Rapid Research Letters</i> , 2014 , 8, 532-535	2.5	102
25	Study on the degradation mechanism of the ferroelectric properties of thin Hf _{0.5} Zr _{0.5} O ₂ films on TiN and Ir electrodes. <i>Applied Physics Letters</i> , 2014 , 105, 072902	3.4	99
24	Study on the size effect in Hf _{0.5} Zr _{0.5} O ₂ films thinner than 8 nm before and after wake-up field cycling. <i>Applied Physics Letters</i> , 2015 , 107, 192907	3.4	92
23	Giant Negative Electrocaloric Effects of Hf Zr O Thin Films. <i>Advanced Materials</i> , 2016 , 28, 7956-7961	24	91
22	Scale-up and optimization of HfO ₂ -ZrO ₂ solid solution thin films for the electrostatic supercapacitors. <i>Nano Energy</i> , 2017 , 39, 390-399	17.1	59
21	Time-Dependent Negative Capacitance Effects in Al ₂ O ₃ /BaTiO ₃ Bilayers. <i>Nano Letters</i> , 2016 , 16, 4375-81	11.5	59

20	Preparation and characterization of ferroelectric HfZrO thin films grown by reactive sputtering. <i>Nanotechnology</i> , 2017 , 28, 305703	3.4	48
19	Voltage Drop in a Ferroelectric Single Layer Capacitor by Retarded Domain Nucleation. <i>Nano Letters</i> , 2017 , 17, 7796-7802	11.5	43
18	A comprehensive study on the mechanism of ferroelectric phase formation in hafnia-zirconia nanolaminates and superlattices. <i>Applied Physics Reviews</i> , 2019 , 6, 041403	17.3	41
17	Dispersion in Ferroelectric Switching Performance of Polycrystalline HfZrO Thin Films. <i>ACS Applied Materials & Interfaces</i> , 2018 , 10, 35374-35384	9.5	38
16	Frustration of Negative Capacitance in Al ₂ O ₃ /BaTiO ₃ Bilayer Structure. <i>Scientific Reports</i> , 2016 , 6, 19039	4.9	37
15	Morphotropic Phase Boundary of HfZr O Thin Films for Dynamic Random Access Memories. <i>ACS Applied Materials & Interfaces</i> , 2018 , 10, 42666-42673	9.5	37
14	Two-step polarization switching mediated by a nonpolar intermediate phase in Hf _{0.4} Zr _{0.6} O ₂ thin films. <i>Nanoscale</i> , 2016 , 8, 13898-907	7.7	36
13	Alternative interpretations for decreasing voltage with increasing charge in ferroelectric capacitors. <i>Scientific Reports</i> , 2016 , 6, 20825	4.9	36
12	Transient Negative Capacitance Effect in Atomic-Layer-Deposited Al ₂ O ₃ /Hf _{0.3} Zr _{0.7} O ₂ Bilayer Thin Film. <i>Advanced Functional Materials</i> , 2019 , 29, 1808228	15.6	31
11	Improved Initial Growth Behavior of SrO and SrTiO ₃ Films Grown by Atomic Layer Deposition Using {Sr(demamp)(tmhd)} ₂ as Sr-Precursor. <i>Chemistry of Materials</i> , 2015 , 27, 3881-3891	9.6	29
10	Interfacial charge-induced polarization switching in Al ₂ O ₃ /Pb(Zr,Ti)O ₃ bi-layer. <i>Journal of Applied Physics</i> , 2015 , 118, 224105	2.5	24
9	Filament Shape Dependent Reset Behavior Governed by the Interplay between the Electric Field and Thermal Effects in the Pt/TiO ₂ /Cu Electrochemical Metallization Device. <i>Advanced Electronic Materials</i> , 2017 , 3, 1600404	6.4	20
8	Effect of the annealing temperature of thin Hf _{0.3} Zr _{0.7} O ₂ films on their energy storage behavior. <i>Physica Status Solidi - Rapid Research Letters</i> , 2014 , 8, 857-861	2.5	16
7	Composition, Microstructure, and Electrical Performance of Sputtered SnO Thin Films for p-Type Oxide Semiconductor. <i>ACS Applied Materials & Interfaces</i> , 2018 , 10, 3810-3821	9.5	13
6	Electrically-generated memristor based on inkjet printed silver nanoparticles. <i>Nanoscale Advances</i> , 2019 , 1, 2990-2998	5.1	13
5	Reducing the nano-scale defect formation of atomic-layer-deposited SrTiO ₃ films by adjusting the cooling rate of the crystallization annealing of the seed layer. <i>Thin Solid Films</i> , 2015 , 589, 723-729	2.2	8
4	Research Update: Diode performance of the Pt/Al ₂ O ₃ /two-dimensional electron gas/SrTiO ₃ structure and its time-dependent resistance evolution. <i>APL Materials</i> , 2017 , 5, 042301	5.7	6
3	Effect of Surface/Interface Energy and Stress on the Ferroelectric Properties 2019 , 145-172		4

2 Impact of Zr Content in Atomic Layer Deposited Hf_{1-x}Zr_xO₂ Thin Films **2019**, 75-101

3

1 Poster: Polar Dielectrics, Optics, and Ionics 633-663