

# Tae Yun Kim

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/7471000/publications.pdf>

Version: 2024-02-01

50  
papers

728  
citations

516710  
16  
h-index

580821  
25  
g-index

52  
all docs

52  
docs citations

52  
times ranked

975  
citing authors

#	ARTICLE	IF	CITATIONS
1	From The Cover: Complex-periodic spiral waves in confluent cardiac cell cultures induced by localized inhomogeneities. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2005, 102, 10363-10368.	7.1	68
2	SK Channel Enhancers Attenuate Ca <sup>2+</sup> -Dependent Arrhythmia in Hypertrophic Hearts by Regulating Mito-ROS-Dependent Oxidation and Activity of RyR.. <i>Cardiovascular Research</i> , 2017, 113, cvx005.	3.8	45
3	Complex excitation dynamics underlie polymorphic ventricular tachycardia in a transgenic rabbit model of long QT syndrome type 1. <i>Heart Rhythm</i> , 2015, 12, 220-228.	0.7	43
4	Pharmacological Modulation of Mitochondrial Ca <sup>2+</sup> Content Regulates Sarcoplasmic Reticulum Ca <sup>2+</sup> Release via Oxidation of the Ryanodine Receptor by Mitochondria-Derived Reactive Oxygen Species. <i>Frontiers in Physiology</i> , 2018, 9, 1831.	2.8	42
5	Directed fusion of cardiac spheroids into larger heterocellular microtissues enables investigation of cardiac action potential propagation via cardiac fibroblasts. <i>PLoS ONE</i> , 2018, 13, e0196714.	2.5	41
6	Mechanisms linking T-wave alternans to spontaneous initiation of ventricular arrhythmias in rabbit models of long QT syndrome. <i>Journal of Physiology</i> , 2018, 596, 1341-1355.	2.9	40
7	RING Finger Protein RNF207, a Novel Regulator of Cardiac Excitation. <i>Journal of Biological Chemistry</i> , 2014, 289, 33730-33740.	3.4	38
8	Spontaneous initiation of premature ventricular complexes and arrhythmias in type 2 long QT syndrome. <i>American Journal of Physiology - Heart and Circulatory Physiology</i> , 2016, 311, H1470-H1484.	3.2	36
9	Laser-Etched Designs for Molding Hydrogel-Based Engineered Tissues. <i>Tissue Engineering - Part C: Methods</i> , 2017, 23, 311-321.	2.1	26
10	Gq-activated fibroblasts induce cardiomyocyte action potential prolongation and automaticity in a three-dimensional microtissue environment. <i>American Journal of Physiology - Heart and Circulatory Physiology</i> , 2017, 313, H810-H827.	3.2	25
11	Interleukin-1 $\beta$ , Oxidative Stress, and Abnormal Calcium Handling Mediate Diabetic Arrhythmic Risk. <i>JACC Basic To Translational Science</i> , 2021, 6, 42-52.	4.1	25
12	Spatially Discordant Alternans and Arrhythmias in Tachypacing-Induced Cardiac Myopathy in Transgenic LQT1 Rabbits: The Importance of IKs and Ca <sup>2+</sup> Cycling. <i>PLoS ONE</i> , 2015, 10, e0122754.	2.5	23
13	PKA phosphorylation underlies functional recruitment of sarcolemmal SK2 channels in ventricular myocytes from hypertrophic hearts. <i>Journal of Physiology</i> , 2020, 598, 2847-2873.	2.9	23
14	IL-18 mediates sickle cell cardiomyopathy and ventricular arrhythmias. <i>Blood</i> , 2021, 137, 1208-1218.	1.4	22
15	Cardiac beat-to-beat alternations driven by unusual spiral waves. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2007, 104, 11639-11642.	7.1	20
16	A predictive in vitro risk assessment platform for pro-arrhythmic toxicity using human 3D cardiac microtissues. <i>Scientific Reports</i> , 2021, 11, 10228.	3.3	19
17	Human Cardiac Fibroblast Number and Activation State Modulate Electromechanical Function of hiPSC-Cardiomyocytes in Engineered Myocardium. <i>Stem Cells International</i> , 2020, 2020, 1-16.	2.5	18
18	Spiral reentry waves in confluent layer of HL-1 cardiomyocyte cell lines. <i>Biochemical and Biophysical Research Communications</i> , 2008, 377, 1269-1273.	2.1	17

#	ARTICLE	IF	CITATIONS
19	Progesterone modulates SERCA2a expression and function in rabbit cardiomyocytes. American Journal of Physiology - Cell Physiology, 2014, 307, C1050-C1057.	4.6	16
20	Ero1±-Dependent ERp44 Dissociation From RyR2 Contributes to Cardiac Arrhythmia. Circulation Research, 2022, 130, 711-724.	4.5	16
21	Spiral wave drift and complex-oscillatory spiral waves caused by heterogeneities in two-dimensional in vitro cardiac tissues. New Journal of Physics, 2008, 10, 015005.	2.9	15
22	HuR-mediated SCN5A messenger RNA stability reduces arrhythmic risk in heart failure. Heart Rhythm, 2018, 15, 1072-1080.	0.7	15
23	Transient Outward K <sup>+</sup> Current (I <sub>to</sub> ) Underlies the Right Ventricular Initiation of Polymorphic Ventricular Tachycardia in a Transgenic Rabbit Model of Long-QT Syndrome Type 1. Circulation: Arrhythmia and Electrophysiology, 2018, 11, e005414.	4.8	15
24	Period-2 spiral waves supported by nonmonotonic wave dispersion. Physical Review E, 2010, 82, 046213.	2.1	13
25	Late I <sub>Na</sub> Blocker GS967 Suppresses Polymorphic Ventricular Tachycardia in a Transgenic Rabbit Model of Long QT Type 2. Circulation: Arrhythmia and Electrophysiology, 2020, 13, e006875.	4.8	11
26	MEMS-based power generation system using contractile force generated by self-organized cardiomyocytes. Sensors and Actuators B: Chemical, 2010, 151, 291-296.	7.8	10
27	LITAF (Lipopolysaccharide-Induced Tumor Necrosis Factor) Regulates Cardiac L-Type Calcium Channels by Modulating NEDD (Neural Precursor Cell Expressed Developmentally Downregulated Protein) 4-1 Ubiquitin Ligase. Circulation Genomic and Precision Medicine, 2019, 12, 407-420.	3.6	9
28	Nucleation, Drift, and Decay of Phase Bubbles in Period-2 Oscillatory Wave Trains in a Reaction-Diffusion System. Physical Review Letters, 2008, 100, 068302.	7.8	8
29	Short-Long Heart Rate Variation Increases Dispersion of Action Potential Duration in Long QT Type 2 Transgenic Rabbit Model. Scientific Reports, 2019, 9, 14849.	3.3	6
30	Human Atrial Cardiac Microtissues for Chamber-Specific Arrhythmic Risk Assessment. Cellular and Molecular Bioengineering, 2021, 14, 441-457.	2.1	6
31	Methodology for Cross-Talk Elimination in Simultaneous Voltage and Calcium Optical Mapping Measurements With Semasbestic Wavelengths. Frontiers in Physiology, 2022, 13, 812968.	2.8	6
32	Impact of ISK Voltage and Ca <sup>2+</sup> /Mg <sup>2+</sup> -Dependent Rectification on Cardiac Repolarization. Biophysical Journal, 2020, 119, 690-704.	0.5	5
33	Alternans by non-monotonic conduction velocity restitution, bistability and memory. New Journal of Physics, 2013, 15, 013046.	2.9	3
34	MEMS power generation using activation of cardiomyocytes on a PMN-PT diaphragm. , 2010, , .		1
35	Cardiac Action Potential Propagation through Compact Fibroblasts in 3D Cardiac Microtissues Engineered from Self-Assembled Spheroids as Building Blocks. Biophysical Journal, 2018, 114, 626a.	0.5	1
36	Mutations in KCNE1 Promote Cardiac Alternans in Long QT Syndrome Type 5 Rabbits. Biophysical Journal, 2020, 118, 102a.	0.5	1

#	ARTICLE	IF	CITATIONS
37	Alternating Cycle Lengths Increases Dispersion of Action Potential Durations (APD) in Transgenic Rabbit Model of Long QT Syndrome Type 2. <i>Biophysical Journal</i> , 2012, 102, 539a-540a.	0.5	0
38	Different Ventricular Fibrillation (VF) Dynamics in Long QT Syndrome Type 1 vs. 2 in a Transgenic Rabbit Model. <i>Biophysical Journal</i> , 2013, 104, 294a-295a.	0.5	0
39	TTX Converts Polymorphic VT to Monomorphic VT in Transgenic Rabbit Model of LQT1. <i>Biophysical Journal</i> , 2013, 104, 294a.	0.5	0
40	Modulation of Action Potential Alternans by IKs in Myocardial Infarction. <i>Biophysical Journal</i> , 2015, 108, 273a.	0.5	0
41	Regulation of the Human Ether-A-Go-Go-Related Gene (hERG) Potassium Channel by the Ubiquitin Ligase Riffifylin (RFFL). <i>Biophysical Journal</i> , 2017, 112, 253a.	0.5	0
42	Facilitation of SK Channel Activity via Inhibition OF PYK2-Dependent Tyrosine Phosphorylation Alleviates Ventricular Tachyarrhythmia in Cardiac Hypertrophy. <i>Biophysical Journal</i> , 2018, 114, 383a-384a.	0.5	0
43	The Role of Myofibroblast Senescence in Arrhythmogenesis of the Aged Infarcted Heart. <i>Biophysical Journal</i> , 2019, 116, 422a.	0.5	0
44	Pharmacological Modulation of Mitochondrial Ca <sup>2+</sup> Uptake Regulates Sarcoplasmic Reticulum Ca <sup>2+</sup> Release via Oxidation of Ryanodine Receptor by Reactive Oxygen Species. <i>Biophysical Journal</i> , 2019, 116, 382a.	0.5	0
45	Role of SK Current Rectification in Shaping Action Potential of Ventricular Cardiomyocytes. <i>Biophysical Journal</i> , 2020, 118, 253a.	0.5	0
46	Inhibition of Tyrosine Kinase Pyk2 in Hypertrophic Hearts: Cellular Mechanisms of Anti-Arrhythmic Effects. <i>Biophysical Journal</i> , 2020, 118, 566a.	0.5	0
47	The Sarcoplasmic Reticulum Oxidoreductase System Modulates Luminal Ca <sup>2+</sup> Regulation of the Ryanodine Receptor in Cardiac Disease. <i>Biophysical Journal</i> , 2021, 120, 239a.	0.5	0
48	Abstract 16606: Cardiac Fibroblast-Restricted Enhancement of G <sub>q</sub> Signaling Prolongs Calcium Transients and Increases Spontaneous Activity in Biomimetic Cardiac Microtissues. <i>Circulation</i> , 2014, 130, .	1.6	0
49	LITAF regulates action potential duration by modulating NEDD4-mediated degradation of L-type calcium channels. <i>FASEB Journal</i> , 2019, 33, 824.19.	0.5	0
50	Scarring and Arrhythmia in the Aged Infarcted Heart: The Role of Senescent Fibroblasts. <i>FASEB Journal</i> , 2020, 34, 1-1.	0.5	0