

# Utpal Sen

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/2682058/publications.pdf>

Version: 2024-02-01

97  
papers

7,158  
citations

159358

30  
h-index

118652

62  
g-index

97  
all docs

97  
docs citations

97  
times ranked

16220  
citing authors

#	ARTICLE	IF	CITATIONS
1	Toll-like receptor 4 mutation protects the kidney from Ang-II-induced hypertensive injury. <i>Pharmacological Research</i> , 2022, 175, 106030.	3.1	12
2	Glucosidase Inhibitor Alleviates Inflammation and Fibrosis in Type-1 Diabetic Kidney. <i>FASEB Journal</i> , 2022, 36, .	0.2	0
3	Exogenous hydrogen sulfide and miR-21 antagonism attenuates macrophage-mediated inflammation in ischemia reperfusion injury of the aged kidney. <i>GeroScience</i> , 2021, 43, 1349-1367.	2.1	23
4	Nimbidiol ameliorates adverse renal remodeling and dysfunction in diabetic nephropathy. <i>FASEB Journal</i> , 2021, 35, .	0.2	0
5	CYY4137 Regulates Extracellular Matrix Turnover in the Diabetic Kidney by Modulating Retinoid X Receptor Signaling. <i>Biomolecules</i> , 2021, 11, 1477.	1.8	9
6	Collagen receptor- and metalloproteinase-dependent hypertensive stress response in mesangial and glomerular endothelial cells. <i>Molecular and Cellular Biochemistry</i> , 2020, 466, 1-15.	1.4	4
7	Sodium-hydrogen exchanger regulatory factor-1 (NHERF1) confers salt sensitivity in both male and female models of hypertension in aging. <i>Life Sciences</i> , 2020, 243, 117226.	2.0	4
8	Methylation-dependent antioxidant-redox imbalance regulates hypertensive kidney injury in aging. <i>Redox Biology</i> , 2020, 37, 101754.	3.9	14
9	More than just an enzyme: Dipeptidyl peptidase-4 (DPP-4) and its association with diabetic kidney remodelling. <i>Pharmacological Research</i> , 2019, 147, 104391.	3.1	37
10	Hydrogen sulphide mitigates homocysteine-induced apoptosis and matrix remodelling in mesangial cells through Akt/FOXO1 signalling cascade. <i>Cellular Signalling</i> , 2019, 61, 66-77.	1.7	19
11	Hydrogen sulfide inhibits Ca <sup>2+</sup> -induced mitochondrial permeability transition pore opening in type-1 diabetes. <i>American Journal of Physiology - Endocrinology and Metabolism</i> , 2019, 317, E269-E283.	1.8	25
12	Hydrogen Sulfide Protects Hyperhomocysteinemia-Induced Renal Damage by Modulation of Caveolin and eNOS Interaction. <i>Scientific Reports</i> , 2019, 9, 2223.	1.6	27
13	Exercise Induced Irisin Alleviates Type 1 Diabetic Nephropathy by Promoting Mitochondria Biogenesis and Function. <i>FASEB Journal</i> , 2019, 33, 567.10.	0.2	0
14	Hypertension exaggerates renovascular resistance via miR-122-associated stress response in aging. <i>Journal of Hypertension</i> , 2018, 36, 2226-2236.	0.3	17
15	Altered microRNA regulation of short chain fatty acid receptors in the hypertensive kidney is normalized with hydrogen sulfide supplementation. <i>Pharmacological Research</i> , 2018, 134, 157-165.	3.1	16
16	Linking Toll-Like Receptor 4, Gut Microbiota, and Doxycycline in the Hypertensive Kidney. <i>FASEB Journal</i> , 2018, 32, 716.14.	0.2	0
17	Hydrogen sulfide alleviates hypertensive kidney dysfunction through an epigenetic mechanism. <i>American Journal of Physiology - Heart and Circulatory Physiology</i> , 2017, 312, H874-H885.	1.5	46
18	CYY4137, a Hydrogen Sulfide Donor Modulates miR194-Dependent Collagen Realignment in Diabetic Kidney. <i>Scientific Reports</i> , 2017, 7, 10924.	1.6	47

#	ARTICLE	IF	CITATIONS
19	Toll-like Receptor 4 Deficiency Reduces Oxidative Stress and Macrophage Mediated Inflammation in Hypertensive Kidney. <i>Scientific Reports</i> , 2017, 7, 6349.	1.6	76
20	Regulation and involvement of matrix metalloproteinases in vascular diseases. <i>Frontiers in Bioscience - Landmark</i> , 2016, 21, 89-118.	3.0	63
21	Homocysteine and hydrogen sulfide in epigenetic, metabolic and microbiota related renovascular hypertension. <i>Pharmacological Research</i> , 2016, 113, 300-312.	3.1	60
22	Atherogenesis: hyperhomocysteinemia interactions with LDL, macrophage function, paraoxonase 1, and exercise. <i>Annals of the New York Academy of Sciences</i> , 2016, 1363, 138-154.	1.8	37
23	Mini-review: diabetic renal complications, a potential stinky remedy. <i>American Journal of Physiology - Renal Physiology</i> , 2016, 310, F119-F122.	1.3	10
24	Guidelines for the use and interpretation of assays for monitoring autophagy (3rd edition). <i>Autophagy</i> , 2016, 12, 1-222.	4.3	4,701
25	MMP-9- and NMDA receptor-mediated mechanism of diabetic renovascular remodeling and kidney dysfunction: Hydrogen sulfide is a key modulator. <i>Nitric Oxide - Biology and Chemistry</i> , 2015, 46, 172-185.	1.2	45
26	DNA hypermethylation in hyperhomocysteinemia contributes to abnormal extracellular matrix metabolism in the kidney. <i>FASEB Journal</i> , 2015, 29, 4713-4725.	0.2	36
27	Comparison of protein expression in kidney tubular apical and basolateral membranes in young and old rats. <i>FASEB Journal</i> , 2015, 29, 969.9.	0.2	0
28	Deregulation of miRâ€21 Contributes to Differential Macrophage Activation in Acute Kidney Injury in Aged Mice. <i>FASEB Journal</i> , 2015, 29, 807.9.	0.2	0
29	Hydrogen Sulfide Inhibits Ca <sup>2+</sup> â€induced Mitochondrial Permeability Transition Pore Opening in Typeâ€1 Diabetes. <i>FASEB Journal</i> , 2015, 29, 959.11.	0.2	0
30	Hydrogen sulfide mitigates hyperglycemic remodeling via liver kinase B1-adenosine monophosphate-activated protein kinase signaling. <i>Biochimica Et Biophysica Acta - Molecular Cell Research</i> , 2014, 1843, 2816-2826.	1.9	43
31	Homocysteine in renovascular complications: Hydrogen sulfide is a modulator and plausible anaerobic ATP generator. <i>Nitric Oxide - Biology and Chemistry</i> , 2014, 41, 27-37.	1.2	17
32	Endothelial Dysfunction: The Link Between Homocysteine and Hydrogen Sulfide. <i>Current Medicinal Chemistry</i> , 2014, 21, 3662-3672.	1.2	164
33	Hydrogen sulfide deficiency and diabetic renal remodeling: role of matrix metalloproteinase-9. <i>American Journal of Physiology - Endocrinology and Metabolism</i> , 2013, 304, E1365-E1378.	1.8	71
34	Matrix metalloproteinase inhibition mitigates renovascular remodeling in salt-sensitive hypertension. <i>Physiological Reports</i> , 2013, 1, e00063.	0.7	30
35	Angiotensin-II induced hypertension and renovascular remodelling in tissue inhibitor of metalloproteinase 2 knockout mice. <i>Journal of Hypertension</i> , 2013, 31, 2270-2281.	0.3	36
36	Folic Acid Mitigates Angiotensin-II-Induced Blood Pressure and Renal Remodeling. <i>PLoS ONE</i> , 2013, 8, e83813.	1.1	29

#	ARTICLE	IF	CITATIONS
37	Matrix Metalloproteinase Inhibition Protects Kidney from Adverse Remodeling Induced by Hypertension. FASEB Journal, 2013, 27, 906.6.	0.2	0
38	H <sub>2</sub> S Therapy Improves MMP-9 and NMDA Receptor Mediated Diabetic Renovascular Remodeling. FASEB Journal, 2013, 27, 702.9.	0.2	0
39	C3H Mice are Resistant to Hypertensive Renovascular Remodeling Due to Decreased Mitochondrial Oxidative Stress. FASEB Journal, 2013, 27, 704.13.	0.2	0
40	Increased endogenous H <sub>2</sub> S generation by CBS, CSE, and 3MST gene therapy improves ex vivo renovascular relaxation in hyperhomocysteinemia. American Journal of Physiology - Cell Physiology, 2012, 303, C41-C51.	2.1	102
41	Renovascular remodeling in Angiotensin-II induced hypertension is strain-dependent. FASEB Journal, 2012, 26, lb809.	0.2	0
42	Role Of MMP9 In Cardiac Stem Cell Differentiation And Autophagy. FASEB Journal, 2012, 26, .	0.2	0
43	Hydrogen sulfide mitigates diabetic nephropathy through NMDA receptor mediated renal remodeling. FASEB Journal, 2012, 26, 687.5.	0.2	0
44	Hydrogen sulfide mitigates renovascular matrix pathobiology in hyperhomocysteinemia. FASEB Journal, 2012, 26, 866.4.	0.2	0
45	Chronic hyperhomocysteinemia causes vascular remodelling by instigating vein phenotype in artery. Archives of Physiology and Biochemistry, 2011, 117, 270-282.	1.0	8
46	Cystathionine $\beta$ -synthase and cystathionine $\beta$ -lyase double gene transfer ameliorate homocysteine-mediated mesangial inflammation through hydrogen sulfide generation. American Journal of Physiology - Cell Physiology, 2011, 300, C155-C163.	2.1	45
47	Hydrogen sulfide mitigates transition from compensatory hypertrophy to heart failure. Journal of Applied Physiology, 2011, 110, 1093-1100.	1.2	61
48	The siRNA targeting MMP-9 mitigates Homocysteine induced disruption of barrier integrity in Human intestinal microvascular cells. FASEB Journal, 2011, 25, 1066.7.	0.2	0
49	Cystathionine beta synthase gene dose dependent vascular remodeling in murine model of hyperhomocysteinemia. International Journal of Physiology, Pathophysiology and Pharmacology, 2011, 3, 210-22.	0.8	17
50	Remodeling in vein expresses arterial phenotype in hyperhomocysteinemia. International Journal of Physiology, Pathophysiology and Pharmacology, 2011, 3, 266-79.	0.8	4
51	Homocysteine to Hydrogen Sulfide or Hypertension. Cell Biochemistry and Biophysics, 2010, 57, 49-58.	0.9	148
52	Blood flow interplays with elastin: collagen and MMP: TIMP ratios to maintain healthy vascular structure and function. Vascular Health and Risk Management, 2010, 6, 215.	1.0	35
53	Homocysteine and Hypertension in Diabetes: Does PPAR $\gamma$ Have a Regulatory Role?. PPAR Research, 2010, 2010, 1-12.	1.1	43
54	Cardiac specific deletion of N-methyl-D-aspartate receptor 1 ameliorates mtMMP-9 mediated autophagy/mitophagy in hyperhomocysteinemia. Journal of Receptor and Signal Transduction Research, 2010, 30, 78-87.	1.3	60

#	ARTICLE	IF	CITATIONS
55	Functional consequences of the collagen/elastin switch in vascular remodeling in hyperhomocysteinemic wild-type, eNOS <sup>+/+</sup> , and iNOS <sup>+/+</sup> mice. American Journal of Physiology - Lung Cellular and Molecular Physiology, 2010, 299, L301-L311.	1.3	50
56	Hydrogen Sulfide Regulates Homocysteine-Mediated Glomerulosclerosis. American Journal of Nephrology, 2010, 31, 442-455.	1.4	78
57	Blood Flow Regulates Vasculature by Maintaining Collagen/elastin and MMP/TIMP ratio. FASEB Journal, 2010, 24, 790.3.	0.2	0
58	Role of dicer in diabetic cardiomyopathy through dysregulation of MMP <sup>9</sup> and TIMP <sup>4</sup> . FASEB Journal, 2010, 24, 978.19.	0.2	0
59	Inhibition of Matrix Metalloproteinase <sup>9</sup> (MMP <sup>9</sup> ) Reverses Changes in Vascular Wall Structure and Function of Thoracic Aorta of Dahl Salt <sup>sensitive</sup> (DSS) Rats. FASEB Journal, 2010, 24, 599.4.	0.2	0
60	Folic acid mitigated homocysteine <sup>ε</sup> -mediated decrease in bone blood flow and bone remodeling. FASEB Journal, 2010, 24, 630.7.	0.2	0
61	Activation of renal NMDA by Hcy causes ECM remodeling by modulating MMP/TIMP axis. FASEB Journal, 2010, 24, .	0.2	0
62	Tetrahydrocurcumin ameliorates mtMMP <sup>9</sup> mediated mitophagy and mitochondria remodeling in Stroke. FASEB Journal, 2010, 24, 604.4.	0.2	0
63	Folic Acid Mitigated Cardiac Dysfunction by Normalizing the Levels of Tissue Inhibitor of Metalloproteinase and homocysteine <sup>ε</sup> -metabolizing enzymes Post myocardial Infarction in Mice.. FASEB Journal, 2010, 24, 600.5.	0.2	0
64	Functional heterogeneity in vascular remodeling (MMP <sup>9</sup> <sup>+/+</sup> and PAR <sup>1</sup> <sup>+/+</sup> ) in hyperhomocysteinemic (CBS <sup>+/+</sup> ) and diabetic (Akita, Ins2 <sup>+/+</sup> ) mice.. FASEB Journal, 2010, 24, 599.6.	0.2	0
65	Cystathionine <sup>β</sup> -synthase and cystathionine <sup>β</sup> -lyase double gene transfer ameliorated homocysteine <sup>ε</sup> -mediated mesangial inflammation through hydrogen sulfide generation. FASEB Journal, 2010, 24, 590.6.	0.2	0
66	Fibrinogen-induced endothelin-1 production from endothelial cells. American Journal of Physiology - Cell Physiology, 2009, 296, C840-C847.	2.1	48
67	Hydrogen sulfide ameliorates hyperhomocysteinemia-associated chronic renal failure. American Journal of Physiology - Renal Physiology, 2009, 297, F410-F419.	1.3	146
68	Nitrotyrosinylation, remodeling and endothelial <sup>ε</sup> myocyte uncoupling in iNOS, cystathionine beta synthase (CBS) knockouts and iNOS/CBS double knockout mice. Journal of Cellular Biochemistry, 2009, 106, 119-126.	1.2	26
69	Activation of GABA <sup>A</sup> receptor ameliorates homocysteine <sup>ε</sup> -induced MMP <sup>9</sup> activation by ERK pathway. Journal of Cellular Physiology, 2009, 220, 257-266.	2.0	60
70	Matrix imbalance by inducing expression of metalloproteinase and oxidative stress in cochlea of hyperhomocysteinemic mice. Molecular and Cellular Biochemistry, 2009, 332, 215-224.	1.4	28
71	H <sub>2</sub> S Protects Against Methionine <sup>ε</sup> -Induced Oxidative Stress in Brain Endothelial Cells. Antioxidants and Redox Signaling, 2009, 11, 25-33.	2.5	149
72	Activation of GABA <sup>A</sup> -A receptor Protects Mitochondria and Reduces Cerebral ischemia.. FASEB Journal, 2009, 23, 614.8.	0.2	2

#	ARTICLE	IF	CITATIONS
73	Hydrogen sulfide mitigates homocysteine-induced glomerular injury. FASEB Journal, 2009, 23, 604.9.	0.2	0
74	Structural and Functional Heterogeneity in Vascular Remodeling. FASEB Journal, 2009, 23, 593.20.	0.2	0
75	Cerebroprotective role of Tetrahydro Curcumin in hyperhomocysteinemic ischemic mice by regulating NF- $\kappa$ B. FASEB Journal, 2009, 23, 614.7.	0.2	1
76	Role of MicroRNAs in homocysteine induced oxidative stress. FASEB Journal, 2009, 23, 1038.9.	0.2	0
77	Cardioprotective Role of Sodium Thiosulfate on Chronic Heart Failure by Modulating Endogenous H <sub>2</sub> S Generation. Pharmacology, 2008, 82, 201-213.	0.9	65
78	Ciglitazone, a PPAR $\gamma$ agonist, ameliorates diabetic nephropathy in part through homocysteine clearance. American Journal of Physiology - Endocrinology and Metabolism, 2008, 295, E1205-E1212.	1.8	38
79	PPAR gamma agonist normalizes glomerular filtration rate, tissue levels of homocysteine, and attenuates endothelial-myocyte uncoupling in alloxan induced diabetic mice. International Journal of Biological Sciences, 2008, 4, 236-244.	2.6	18
80	Homocysteine attenuates blood brain barrier function by inducing oxidative stress and the junctional proteins. FASEB Journal, 2008, 22, 734.7.	0.2	5
81	Mechanism of homocysteine-induced dementia/spasm. FASEB Journal, 2008, 22, 734.9.	0.2	0
82	Ex vivo real-time MMP activation in kidney in hyperhomocysteinemia. FASEB Journal, 2008, 22, 942.10.	0.2	0
83	Effect of hydrogen sulfide on methionine-induced oxidative stress in brain endothelial cells. FASEB Journal, 2008, 22, 734.8.	0.2	0
84	Hyperhomocysteinemia causes cardiac rhythm disturbances due to a shift in atrial and ventricular gap junction protein distribution. FASEB Journal, 2008, 22, 971.10.	0.2	0
85	Role of Copper and Homocysteine in Pressure Overload Heart Failure. FASEB Journal, 2008, 22, 1210.16.	0.2	0
86	Cardioprotective role of sodium thiosulfate on chronic heart failure by modulating endogenous H <sub>2</sub> S generation. FASEB Journal, 2008, 22, .	0.2	0
87	Cystathionine- $\beta$ -synthase gene transfer and 3-deazaadenosine ameliorate inflammatory response in endothelial cells. American Journal of Physiology - Cell Physiology, 2007, 293, C1779-C1787.	2.1	38
88	Synergism between AT1 receptor and hyperhomocysteinemia during vascular remodeling. Clinical Chemistry and Laboratory Medicine, 2007, 45, 1771-6.	1.4	24
89	Cardiac Synchronous and Dys-synchronous Remodeling in Diabetes Mellitus. Antioxidants and Redox Signaling, 2007, 9, 971-978.	2.5	3
90	Homocysteine-induced biochemical stress predisposes to cytoskeletal remodeling in stretched endothelial cells. Molecular and Cellular Biochemistry, 2007, 302, 133-143.	1.4	12

#	ARTICLE	IF	CITATIONS
91	Differential Expression of the GABA <sub>A</sub> receptor subunits in the Kidney and Cardiovascular system. FASEB Journal, 2007, 21, A497.	0.2	1
92	Early onset of atherosclerosis in ApoE <sup>-/-</sup> knockout mice is induced by in utero arsenic exposure. FASEB Journal, 2007, 21, A810.	0.2	1
93	Activation of GABA A receptor ameliorate homocysteine-induced MMP-9 by ERK pathway. FASEB Journal, 2007, 21, A497.	0.2	0
94	Homocysteine-induced myofibroblast differentiation in mouse aortic endothelial cells. Journal of Cellular Physiology, 2006, 209, 767-774.	2.0	33
95	Regulation of homocysteine-induced MMP-9 by ERK1/2 pathway. American Journal of Physiology - Cell Physiology, 2006, 290, C883-C891.	2.1	90
96	Homocysteine alters Redox Regulation through Thioredoxin-Interacting Protein: A Novel role of Forkhead Transcription Factor (FOXO3a/FKHRL1). FASEB Journal, 2006, 20, A1456.	0.2	1
97	Homocysteine induces endothelial myofibroblast differentiation through activation of focal adhesion kinase. FASEB Journal, 2006, 20, A1465.	0.2	0