Frank S Lee

List of Publications by Citations

64 papers	5,240 citations	30 h-index	72 g-index
77 ext. papers	5,676 ext. citations	8.4 avg, IF	5.39 L-index

#	Paper	IF	Citations
64	Fatal systemic inflammatory response syndrome in a ornithine transcarbamylase deficient patient following adenoviral gene transfer. *Molecular Genetics and Metabolism*, **2003**, 80, 148-58	3.7	1115
63	Activation of the IkappaB alpha kinase complex by MEKK1, a kinase of the JNK pathway. *Cell*, **1997**, 88, 213-22	56.2	675
62	MEKK1 activates both IkappaB kinase alpha and IkappaB kinase beta. *Proceedings of the National Academy of Sciences of the United States of America*, **1998**, 95, 9319-24	11.5	360
61	A family with erythrocytosis establishes a role for prolyl hydroxylase domain protein 2 in oxygen homeostasis. *Proceedings of the National Academy of Sciences of the United States of America*, **2006**, 103, 654-9	11.5	263
60	A gain-of-function mutation in the HIF2A gene in familial erythrocytosis. *New England Journal of Medicine*, **2008**, 358, 162-8	59.2	247
59	Sequence determinants in hypoxia-inducible factor-1alpha for hydroxylation by the prolyl hydroxylases PHD1, PHD2, and PHD3. *Journal of Biological Chemistry*, **2002**, 277, 39792-800	5.4	233
58	Mitogen-activated protein kinase/ERK kinase kinases 2 and 3 activate nuclear factor-kappaB through IkappaB kinase-alpha and IkappaB kinase-beta. *Journal of Biological Chemistry*, **1999**, 274, 8355-8	5.4	229
57	Regulation of adult erythropoiesis by prolyl hydroxylase domain proteins. *Blood*, **2008**, 111, 3229-35	2.2	211
56	Human high-altitude adaptation: forward genetics meets the HIF pathway. *Genes and Development*, **2014**, 28, 2189-204	12.6	168
55	Tight-binding inhibition of angiogenin and ribonuclease A by placental ribonuclease inhibitor. *Biochemistry*, **1989**, 28, 225-30	3.2	148
54	The HIF pathway and erythrocytosis. *Annual Review of Pathology: Mechanisms of Disease*, **2011**, 6, 165-92	34	128
53	A novel erythrocytosis-associated PHD2 mutation suggests the location of a HIF binding groove. *Blood*, **2007**, 110, 2193-6	2.2	128
52	Novel exon 12 mutations in the HIF2A gene associated with erythrocytosis. *Blood*, **2008**, 111, 5400-2	2.2	96
51	Structure and action of mammalian ribonuclease (angiogenin) inhibitor. *Progress in Molecular Biology and Translational Science*, **1993**, 44, 1-30		81
50	Erythrocytosis and pulmonary hypertension in a mouse model of human HIF2A gain of function mutation. *Journal of Biological Chemistry*, **2013**, 288, 17134-44	5.4	76
49	Primary structure of human placental ribonuclease inhibitor. *Biochemistry*, **1988**, 27, 8545-53	3.2	71
48	A role for IOP1 in mammalian cytosolic iron-sulfur protein biogenesis. *Journal of Biological Chemistry*, **2008**, 283, 9231-8	5.4	61

47	Defective Tibetan PHD2 binding to p23 links high altitude adaption to altered oxygen sensing. *Journal of Biological Chemistry*, **2014**, 289, 14656-65	5.4	52
46	Tryptophan fluorescence as a probe of placental ribonuclease inhibitor binding to angiogenin. *Biochemistry*, **1989**, 28, 219-24	3.2	50
45	Erythrocytosis-associated HIF-2alpha mutations demonstrate a critical role for residues C-terminal to the hydroxylacceptor proline. *Journal of Biological Chemistry*, **2009**, 284, 9050-8	5.4	47
44	A common polymorphism in the oxygen-dependent degradation (ODD) domain of hypoxia inducible factor-1alpha (HIF-1alpha) does not impair Pro-564 hydroxylation. *Molecular Cancer*, **2003**, 2, 31	42.1	45
43	Human ISCA1 interacts with IOP1/NARFL and functions in both cytosolic and mitochondrial iron-sulfur protein biogenesis. *Journal of Biological Chemistry*, **2009**, 284, 35297-307	5.4	43
42	I kappa B kinase is critical for TNF-alpha-induced VCAM1 gene expression in renal tubular epithelial cells. *Journal of Immunology*, **2001**, 166, 6839-46	5.3	42
41	Prolyl hydroxylase domain protein 2 (PHD2) binds a Pro-Xaa-Leu-Glu motif, linking it to the heat shock protein 90 pathway. *Journal of Biological Chemistry*, **2013**, 288, 9662-9674	5.4	40
40	IOP1, a novel hydrogenase-like protein that modulates hypoxia-inducible factor-1alpha activity. *Biochemical Journal*, **2007**, 401, 341-52	3.8	38
39	A knock-in mouse model of human PHD2 gene-associated erythrocytosis establishes a haploinsufficiency mechanism. *Journal of Biological Chemistry*, **2013**, 288, 33571-33584	5.4	36
38	Characterization of ribonucleolytic activity of angiogenin towards tRNA. *Biochemical and Biophysical Research Communications*, **1989**, 161, 121-6	3.4	36
37	Genetic causes of erythrocytosis and the oxygen-sensing pathway. *Blood Reviews*, **2008**, 22, 321-32	11.1	35
36	Binding of placental ribonuclease inhibitor to the active site of angiogenin. *Biochemistry*, **1989**, 28, 3556-61	3.2	33
35	Two new mutations in the HIF2A gene associated with erythrocytosis. *American Journal of Hematology*, **2012**, 87, 439-42	7.1	32
34	Update on mutations in the HIF: EPO pathway and their role in erythrocytosis. *Blood Reviews*, **2019**, 37, 100590	11.1	30
33	The transcriptional activity of the APP intracellular domain-Fe65 complex is inhibited by activation of the NF-kappaB pathway. *Biochemistry*, **2003**, 42, 3627-34	3.2	30
32	Electronic spectroscopy of cobalt angiotensin converting enzyme and its inhibitor complexes. *Biochemistry*, **1987**, 26, 7291-7	3.2	30
31	Erythrocytosis associated with a novel missense mutation in the HIF2A gene. *Haematologica*, **2010**, 95, 829-32	6.6	28
30	Mouse knock-out of IOP1 protein reveals its essential role in mammalian cytosolic iron-sulfur protein biogenesis. *Journal of Biological Chemistry*, **2011**, 286, 15797-805	5.4	27

29	The role of PHD2 mutations in the pathogenesis of erythrocytosis. *Hypoxia (Auckland, N Z)*, **2014**, 2, 71-90	2.1	26
28	Expression of human placental ribonuclease inhibitor in Escherichia coli. *Biochemical and Biophysical Research Communications*, **1989**, 160, 115-20	3.4	23
27	Kinetic characterization of two active mutants of placental ribonuclease inhibitor that lack internal repeats. *Biochemistry*, **1990**, 29, 6633-8	3.2	18
26	Functional Assays to Screen and Dissect Genomic Hits: Doubling Down on the National Investment in Genomic Research. *Circulation Genomic and Precision Medicine*, **2018**, 11, e002178	5.2	16
25	Association of gene with high aerobic capacity of Peruvian Quechua at high altitude. *Proceedings of the National Academy of Sciences of the United States of America*, **2019**, 116, 24006-24011	11.5	16
24	Identification of prolyl hydroxylation modifications in mammalian cell proteins. *Proteomics*, **2015**, 15, 1259-67	4.8	14
23	A novel beta-oxa polyunsaturated fatty acid downregulates the activation of the IkappaB kinase/nuclear factor kappaB pathway, inhibits expression of endothelial cell adhesion molecules, and depresses inflammation. *Circulation Research*, **2006**, 99, 34-41	15.7	14
22	A subdomain of MEKK1 that is critical for binding to MKK4. *Cellular Signalling*, **2003**, 15, 65-77	4.9	14
21	Tibetan , an allele with loss-of-function properties. *Proceedings of the National Academy of Sciences of the United States of America*, **2020**, 117, 12230-12238	11.5	13
20	Oxygen sensing: recent insights from idiopathic erythrocytosis. *Cell Cycle*, **2006**, 5, 941-5	4.7	13
19	Integrity of the prolyl hydroxylase domain protein 2:erythropoietin pathway in aging mice. *Blood Cells, Molecules, and Diseases*, **2010**, 45, 9-19	2.1	12
18	The Zinc Finger of Prolyl Hydroxylase Domain Protein 2 Is Essential for Efficient Hydroxylation of Hypoxia-Inducible Factor *Molecular and Cellular Biology*, **2016**, 36, 2328-43	4.8	10
17	Loss-of-function zinc finger mutation in the gene associated with erythrocytosis. *Blood*, **2018**, 132, 1455-1458	17.4	10
16	Analysis of HIF-1a and its regulator, PHD2, in retroperitoneal sarcomas: clinico-pathologic implications. *Cancer Biology and Therapy*, **2010**, 9, 303-11	4.6	10
15	Loss of Phd2 cooperates with BRAF to drive melanomagenesis. *Nature Communications*, **2018**, 9, 5426	17.4	8
14	Novel Homozygous Mutation of the Internal Translation Initiation Start Site of VHL is Exclusively Associated with Erythrocytosis: Indications for Distinct Functional Roles of von Hippel-Lindau Tumor Suppressor Isoforms. *Human Mutation*, **2015**, 36, 1039-42	4.7	7
13	Subdomain VIII is a specificity-determining region in MEKK1. *Journal of Biological Chemistry*, **2003**, 278, 48498-505	5.4	7
12	Mutations in protein kinase subdomain X differentially affect MEKK2 and MEKK1 activity. *Biochemical and Biophysical Research Communications*, **2003**, 303, 532-40	3.4	7

List of Publications

11	Identification of Small-Molecule PHD2 Zinc Finger Inhibitors that Activate Hypoxia Inducible Factor. *ChemBioChem*, **2016**, 17, 2316-2323	3.8	5
10	Substrates of PHD. *Cell Metabolism*, **2019**, 30, 626-627	24.6	5
9	At the crossroads of oxygen and iron sensing: hepcidin control of HIF-2 *Journal of Clinical Investigation*, **2019**, 129, 72-74	15.9	3
8	High-altitude deer mouse hypoxia-inducible factor-2 shows defective interaction with CREB-binding protein. *Journal of Biological Chemistry*, **2021**, 296, 100461	5.4	3
7	gain-of-function mutation modulates the stiffness of smooth muscle cells and compromises vascular mechanics. *IScience*, **2021**, 24, 102246	6.1	2
6	Erythrocytosis Caused by Mutations in the PHD2 and VHL Genes.. *Blood*, **2007**, 110, 3663-3663	2.2	1
5	HIF-2alpha Associated Familial Erythrocytosis Supports the PHD2-HIF- 2alpha-VHL Axis as the Major Regulator of Erythropoietin Production. *Blood*, **2008**, 112, 481-481	2.2	1
4	An Erythrocytosis-Associated Mutation in the Zinc Finger of PHD2 Provides Insights into Its Binding of p23. *Hypoxia (Auckland, N Z)*, **2019**, 7, 81-86	2.1	0
3	Activation of Nuclear Factor- **2001**, 203-227		
2	A Novel HIFalpha Mutation Associated with Familial Erythrocytosis Supports This Isoform Being the Major Regulator of Erythropoietin in Humans.. *Blood*, **2007**, 110, LB5-LB5	2.2	
1	Reply to Liu et al.: The Andean adaptive allele could be a loss of function variant that increases HIF1- in skeletal muscle. *Proceedings of the National Academy of Sciences of the United States of America*, **2020**, 117, 29286-29287	11.5	