Melanie H Cobb

List of Publications by Citations

201 papers	23,330 citations	67 h-index	152 g-index
216 ext. papers	24,817 ext. citations	9.5 avg, IF	6.67 L-index

#	Paper	IF	Citations
201	Mitogen-activated protein (MAP) kinase pathways: regulation and physiological functions. *Endocrine Reviews*, **2001**, 22, 153-83	27.2	2971
200	Mitogen-activated protein kinase pathways. *Current Opinion in Cell Biology*, **1997**, 9, 180-6	9	2221
199	ERKs: a family of protein-serine/threonine kinases that are activated and tyrosine phosphorylated in response to insulin and NGF. *Cell*, **1991**, 65, 663-75	56.2	1710
198	How MAP kinases are regulated. *Journal of Biological Chemistry*, **1995**, 270, 14843-6	5.4	1403
197	MAP kinases. *Chemical Reviews*, **2001**, 101, 2449-76	68.1	741
196	MAP kinase pathways. *Progress in Biophysics and Molecular Biology*, **1999**, 71, 479-500	4.7	654
195	Activation mechanism of the MAP kinase ERK2 by dual phosphorylation. *Cell*, **1997**, 90, 859-69	56.2	643
194	Phosphorylation of the MAP kinase ERK2 promotes its homodimerization and nuclear translocation. *Cell*, **1998**, 93, 605-15	56.2	582
193	Atomic structure of the MAP kinase ERK2 at 2.3 A resolution. *Nature*, **1994**, 367, 704-11	50.4	569
192	Structural basis of inhibitor selectivity in MAP kinases. *Structure*, **1998**, 6, 1117-28	5.2	395
191	Pharmacological inhibitors of MAPK pathways. *Trends in Pharmacological Sciences*, **2002**, 23, 40-5	13.2	377
190	WNK1, a novel mammalian serine/threonine protein kinase lacking the catalytic lysine in subdomain II. *Journal of Biological Chemistry*, **2000**, 275, 16795-801	5.4	376
189	New insights into the control of MAP kinase pathways. *Experimental Cell Research*, **1999**, 253, 255-70	4.2	367
188	A constitutively active and nuclear form of the MAP kinase ERK2 is sufficient for neurite outgrowth and cell transformation. *Current Biology*, **1998**, 8, 1141-50	6.3	286
187	Crystal structures of MAP kinase p38 complexed to the docking sites on its nuclear substrate MEF2A and activator MKK3b. *Molecular Cell*, **2002**, 9, 1241-9	17.6	274
186	The PHD domain of MEKK1 acts as an E3 ubiquitin ligase and mediates ubiquitination and degradation of ERK1/2. *Molecular Cell*, **2002**, 9, 945-56	17.6	269
185	IL-1 receptor-associated kinase modulates host responsiveness to endotoxin. *Journal of Immunology*, **2000**, 164, 4301-6	5.3	248

184	HTLV-I Tax protein binds to MEKK1 to stimulate IkappaB kinase activity and NF-kappaB activation. *Cell*, **1998**, 93, 875-84	56.2	243
183	Chloride sensing by WNK1 involves inhibition of autophosphorylation. *Science Signaling*, **2014**, 7, ra41	8.8	222
182	ASCL1 and NEUROD1 Reveal Heterogeneity in Pulmonary Neuroendocrine Tumors and Regulate Distinct Genetic Programs. *Cell Reports*, **2016**, 16, 1259-1272	10.6	193
181	Isolation of MEK5 and differential expression of alternatively spliced forms. *Journal of Biological Chemistry*, **1995**, 270, 28897-902	5.4	182
180	The roles of MAPKs in disease. *Cell Research*, **2008**, 18, 436-42	24.7	179
179	Reconstitution of mitogen-activated protein kinase phosphorylation cascades in bacteria. Efficient synthesis of active protein kinases. *Journal of Biological Chemistry*, **1997**, 272, 11057-62	5.4	172
178	Differential effects of PAK1-activating mutations reveal activity-dependent and -independent effects on cytoskeletal regulation. *Journal of Biological Chemistry*, **1998**, 273, 28191-8	5.4	166
177	Purification and properties of extracellular signal-regulated kinase 1, an insulin-stimulated microtubule-associated protein 2 kinase. *Biochemistry*, **1991**, 30, 278-86	3.2	165
176	WNK1 activates SGK1 to regulate the epithelial sodium channel. *Proceedings of the National Academy of Sciences of the United States of America*, **2005**, 102, 10315-20	11.5	161
175	Stimulation of NFkappa B activity by multiple signaling pathways requires PAK1. *Journal of Biological Chemistry*, **2000**, 275, 19693-9	5.4	158
174	Crystal structure of the kinase domain of WNK1, a kinase that causes a hereditary form of hypertension. *Structure*, **2004**, 12, 1303-11	5.2	156
173	WNK1 and OSR1 regulate the Na+, K+, 2Cl- cotransporter in HeLa cells. *Proceedings of the National Academy of Sciences of the United States of America*, **2006**, 103, 10883-8	11.5	152
172	ASCL1 is a lineage oncogene providing therapeutic targets for high-grade neuroendocrine lung cancers. *Proceedings of the National Academy of Sciences of the United States of America*, **2014**, 111, 14788-93	11.5	144
171	TAO kinases mediate activation of p38 in response to DNA damage. *EMBO Journal*, **2007**, 26, 2005-14	13	143
170	Identification of substrates and regulators of the mitogen-activated protein kinase ERK5 using chimeric protein kinases. *Journal of Biological Chemistry*, **1998**, 273, 3854-60	5.4	137
169	The G protein-coupled taste receptor T1R1/T1R3 regulates mTORC1 and autophagy. *Molecular Cell*, **2012**, 47, 851-62	17.6	129
168	WNK1 activates ERK5 by an MEKK2/3-dependent mechanism. *Journal of Biological Chemistry*, **2004**, 279, 7826-31	5.4	129
167	Mutation of position 52 in ERK2 creates a nonproductive binding mode for adenosine 5Striphosphate. *Biochemistry*, **1996**, 35, 5641-6	3.2	129

166	ERKs, extracellular signal-regulated MAP-2 kinases. *Current Opinion in Cell Biology*, **1991**, 3, 1025-32	9	129
165	ERK2 enters the nucleus by a carrier-independent mechanism. *Proceedings of the National Academy of Sciences of the United States of America*, **2002**, 99, 7496-501	11.5	128
164	Regulation of insulin gene transcription by ERK1 and ERK2 in pancreatic beta cells. *Journal of Biological Chemistry*, **2003**, 278, 32969-77	5.4	123
163	Overview of the Alliance for Cellular Signaling. *Nature*, **2002**, 420, 703-6	50.4	120
162	FAK phosphorylation by ERK primes ras-induced tyrosine dephosphorylation of FAK mediated by PIN1 and PTP-PEST. *Molecular Cell*, **2009**, 35, 11-25	17.6	119
161	Isolation of TAO1, a protein kinase that activates MEKs in stress-activated protein kinase cascades. *Journal of Biological Chemistry*, **1998**, 273, 28625-32	5.4	115
160	Regulation of WNK1 by an autoinhibitory domain and autophosphorylation. *Journal of Biological Chemistry*, **2002**, 277, 48456-62	5.4	110
159	Regulation of ERK1 and ERK2 by glucose and peptide hormones in pancreatic beta cells. *Journal of Biological Chemistry*, **2003**, 278, 32517-25	5.4	109
158	ERK5 and ERK2 cooperate to regulate NF-kappaB and cell transformation. *Journal of Biological Chemistry*, **2001**, 276, 7927-31	5.4	109
157	Small Cell Lung Cancer: Can Recent Advances in Biology and Molecular Biology Be Translated into Improved Outcomes?. *Journal of Thoracic Oncology*, **2016**, 11, 453-74	8.9	106
156	Properties of WNK1 and implications for other family members. *Journal of Biological Chemistry*, **2005**, 280, 26653-8	5.4	105
155	Contribution of the ERK5/MEK5 pathway to Ras/Raf signaling and growth control. *Journal of Biological Chemistry*, **1999**, 274, 31588-92	5.4	105
154	Activity of the MAP kinase ERK2 is controlled by a flexible surface loop. *Structure*, **1995**, 3, 299-307	5.2	105
153	NGF and other growth factors induce an association between ERK1 and the NGF receptor, gp140prototrk. *Neuron*, **1992**, 9, 1053-65	13.9	102
152	MEKK1 binds raf-1 and the ERK2 cascade components. *Journal of Biological Chemistry*, **2000**, 275, 40120-7	5.4	98
151	MEKK1 binds directly to the c-Jun N-terminal kinases/stress-activated protein kinases. *Journal of Biological Chemistry*, **1997**, 272, 32056-60	5.4	92
150	MAP kinase modules: many roads home. *Current Biology*, **2003**, 13, R886-8	6.3	91
149	ERK1/2-dependent activation of transcription factors required for acute and chronic effects of glucose on the insulin gene promoter. *Journal of Biological Chemistry*, **2005**, 280, 26751-9	5.4	91

148	Activation of mitogen-activated protein kinase cascades by p21-activated protein kinases in cell-free extracts of Xenopus oocytes. *Journal of Biological Chemistry*, **1995**, 270, 26067-70	5.4	88
147	The N-terminal ERK-binding site of MEK1 is required for efficient feedback phosphorylation by ERK2 in vitro and ERK activation in vivo. *Journal of Biological Chemistry*, **1999**, 274, 34029-35	5.4	87
146	WNK1 activates SGK1 by a phosphatidylinositol 3-kinase-dependent and non-catalytic mechanism. *Journal of Biological Chemistry*, **2005**, 280, 34218-23	5.4	86
145	Enteroid Monolayers Reveal an Autonomous WNT and BMP Circuit Controlling Intestinal Epithelial Growth and Organization. *Developmental Cell*, **2018**, 44, 624-633.e4	10.2	85
144	MEKK1 interacts with alpha-actinin and localizes to stress fibers and focal adhesions. *Cytoskeleton*, **1999**, 43, 186-98		82
143	PTMap--a sequence alignment software for unrestricted, accurate, and full-spectrum identification of post-translational modification sites. *Proceedings of the National Academy of Sciences of the United States of America*, **2009**, 106, 761-6	11.5	81
142	Stimulus-coupled spatial restriction of extracellular signal-regulated kinase 1/2 activity contributes to the specificity of signal-response pathways. *Molecular and Cellular Biology*, **2004**, 24, 10145-50	4.8	80
141	ERK3 is a constitutively nuclear protein kinase. *Journal of Biological Chemistry*, **1996**, 271, 8951-8	5.4	79
140	Identification of novel point mutations in ERK2 that selectively disrupt binding to MEK1. *Journal of Biological Chemistry*, **2002**, 277, 14844-52	5.4	77
139	Stress pathway activation induces phosphorylation of retinoid X receptor. *Journal of Biological Chemistry*, **2000**, 275, 32193-9	5.4	77
138	Isolation of the protein kinase TAO2 and identification of its mitogen-activated protein kinase/extracellular signal-regulated kinase kinase binding domain. *Journal of Biological Chemistry*, **1999**, 274, 28803-7	5.4	74
137	Stimulus-specific requirements for MAP3 kinases in activating the JNK pathway. *Journal of Biological Chemistry*, **2002**, 277, 49105-10	5.4	72
136	WNK1 phosphorylates synaptotagmin 2 and modulates its membrane binding. *Molecular Cell*, **2004**, 15, 741-51	17.6	70
135	Hydrophobic as well as charged residues in both MEK1 and ERK2 are important for their proper docking. *Journal of Biological Chemistry*, **2001**, 276, 26509-15	5.4	69
134	The death effector domain protein PEA-15 prevents nuclear entry of ERK2 by inhibiting required interactions. *Journal of Biological Chemistry*, **2004**, 279, 12840-7	5.4	67
133	Characterization of OSR1, a member of the mammalian Ste20p/germinal center kinase subfamily. *Journal of Biological Chemistry*, **2004**, 279, 11129-36	5.4	66
132	RhoA binds to the amino terminus of MEKK1 and regulates its kinase activity. *Journal of Biological Chemistry*, **2004**, 279, 1872-7	5.4	66
131	Protein kinases. *Current Opinion in Structural Biology*, **1994**, 4, 833-40	8.1	65

130	Mechanisms of the amplifying pathway of insulin secretion in the cell. *Pharmacology & Therapeutics*, **2017**, 179, 17-30	13.9	62
129	Contributions of the mitogen-activated protein (MAP) kinase backbone and phosphorylation loop to MEK specificity. *Journal of Biological Chemistry*, **1996**, 271, 29734-9	5.4	61
128	Chromatin-bound mitogen-activated protein kinases transmit dynamic signals in transcription complexes in beta-cells. *Proceedings of the National Academy of Sciences of the United States of America*, **2008**, 105, 13315-20	11.5	60
127	Minireview: Nutrient sensing by G protein-coupled receptors. *Molecular Endocrinology*, **2013**, 27, 1188-97		58
126	Crystal structure of the TAO2 kinase domain: activation and specificity of a Ste20p MAP3K. *Structure*, **2004**, 12, 1891-900	5.2	58
125	Uncoupling Raf1 from MEK1/2 impairs only a subset of cellular responses to Raf activation. *Journal of Biological Chemistry*, **2000**, 275, 37303-6	5.4	58
124	Regulation of stress-responsive mitogen-activated protein (MAP) kinase pathways by TAO2. *Journal of Biological Chemistry*, **2001**, 276, 16070-5	5.4	57
123	MAP kinases ERK1 and ERK2: pleiotropic enzymes in a ubiquitous signaling network. *Advances in Cancer Research*, **1994**, 63, 93-116	5.9	56
122	Extracellular signal-regulated kinases in T cells: characterization of human ERK1 and ERK2 cDNAs. *Biochemical and Biophysical Research Communications*, **1992**, 182, 1416-22	3.4	56
121	Serum and glucocorticoid-induced kinase (SGK) 1 and the epithelial sodium channel are regulated by multiple with no lysine (WNK) family members. *Journal of Biological Chemistry*, **2010**, 285, 25161-7	5.4	55
120	The MEK1 proline-rich insert is required for efficient activation of the mitogen-activated protein kinases ERK1 and ERK2 in mammalian cells. *Journal of Biological Chemistry*, **1998**, 273, 19909-13	5.4	55
119	NeuroD1 regulates survival and migration of neuroendocrine lung carcinomas via signaling molecules TrkB and NCAM. *Proceedings of the National Academy of Sciences of the United States of America*, **2013**, 110, 6524-9	11.5	54
118	Identification of an activator of the microtubule-associated protein 2 kinases ERK1 and ERK2 in PC12 cells stimulated with nerve growth factor or bradykinin. *Journal of Neurochemistry*, **1992**, 59, 147-56	6	54
117	Crystal structure of domain-swapped STE20 OSR1 kinase domain. *Protein Science*, **2009**, 18, 304-13	6.3	53
116	Catalytic reaction pathway for the mitogen-activated protein kinase ERK2. *Biochemistry*, **2000**, 39, 6258-66	3.2	52
115	Reciprocal signaling between heterotrimeric G proteins and the p21-stimulated protein kinase. *Journal of Biological Chemistry*, **1999**, 274, 31641-7	5.4	51
114	Menin determines K-RAS proliferative outputs in endocrine cells. *Journal of Clinical Investigation*, **2014**, 124, 4093-101	15.9	51
113	Biological cross-talk between WNK1 and the transforming growth factor beta-Smad signaling pathway. *Journal of Biological Chemistry*, **2007**, 282, 17985-17996	5.4	50

112	Lipopolysaccharide-induced tumor necrosis factor-alpha promoter activity is inhibitor of nuclear factor-kappaB kinase-dependent. *Journal of Biological Chemistry*, **1999**, 274, 11667-71	5.4	50
111	Phosphorylation of MAP kinases by MAP/ERK involves multiple regions of MAP kinases. *Journal of Biological Chemistry*, **1999**, 274, 16988-94	5.4	49
110	WNK1: analysis of protein kinase structure, downstream targets, and potential roles in hypertension. *Cell Research*, **2005**, 15, 6-10	24.7	48
109	The MAP kinase ERK5 binds to and phosphorylates p90 RSK. *Archives of Biochemistry and Biophysics*, **2006**, 449, 8-16	4.1	47
108	G protein-coupled receptors and the regulation of autophagy. *Trends in Endocrinology and Metabolism*, **2014**, 25, 274-82	8.8	46
107	Mutations in ERK2 binding sites affect nuclear entry. *Journal of Biological Chemistry*, **2007**, 282, 28759-28767	5.4	46
106	Mxi2 promotes stimulus-independent ERK nuclear translocation. *EMBO Journal*, **2007**, 26, 635-46	13	44
105	Signal control through Raf: in sickness and in health. *Cell Research*, **2012**, 22, 14-22	24.7	43
104	The nuclear localization of ERK2 occurs by mechanisms both independent of and dependent on energy. *Journal of Biological Chemistry*, **2006**, 281, 15645-52	5.4	41
103	Binding of JNK/SAPK to MEKK1 is regulated by phosphorylation. *Journal of Biological Chemistry*, **2002**, 277, 45785-92	5.4	41
102	The mitogen-activated protein kinase p38-2 is necessary for the inhibition of N-type calcium current by bradykinin. *Journal of Neuroscience*, **1998**, 18, 112-8	6.6	41
101	WNKs: protein kinases with a unique kinase domain. *Experimental and Molecular Medicine*, **2007**, 39, 565-73	12.8	40
100	Role of with-no-lysine [K] kinases in the pathogenesis of Gordon's syndrome. *Pediatric Nephrology*, **2006**, 21, 1231-6	3.2	38
99	p115 Rho GTPase activating protein interacts with MEKK1. *Journal of Cellular Physiology*, **2002**, 192, 200-8	7	38
98	Amino Acids Regulate mTORC1 by an Obligate Two-step Mechanism. *Journal of Biological Chemistry* , **2016**, 291, 22414-22426	5.4	38
97	Actions of the protein kinase WNK1 on endothelial cells are differentially mediated by its substrate kinases OSR1 and SPAK. *Proceedings of the National Academy of Sciences of the United States of America*, **2014**, 111, 15999-6004	11.5	37
96	Differential regulation of mitogen-activated protein/ERK kinase (MEK)1 and MEK2 and activation by a Ras-independent mechanism. *Molecular Endocrinology*, **1997**, 11, 1618-25		37
95	Characterization of a protein kinase that phosphorylates serine 189 of the mitogen-activated protein kinase homolog ERK3. *Journal of Biological Chemistry*, **1996**, 271, 12057-62	5.4	36

94	TAO (thousand-and-one amino acid) protein kinases mediate signaling from carbachol to p38 mitogen-activated protein kinase and ternary complex factors. *Journal of Biological Chemistry*, **2003**, 278, 22278-83	5.4	36
93	Chromatin-tethered MAPKs. *Current Opinion in Cell Biology*, **2013**, 25, 272-7	9	35
92	WNK1 is required for mitosis and abscission. *Proceedings of the National Academy of Sciences of the United States of America*, **2011**, 108, 1385-90	11.5	35
91	Calcineurin increases glucose activation of ERK1/2 by reversing negative feedback. *Proceedings of the National Academy of Sciences of the United States of America*, **2010**, 107, 22314-9	11.5	34
90	WNK pathways in cancer signaling networks. *Cell Communication and Signaling*, **2018**, 16, 72	7.5	32
89	A small molecule differentiation inducer increases insulin production by pancreatic cells. *Proceedings of the National Academy of Sciences of the United States of America*, **2011**, 108, 20713-8	11.5	31
88	Inhibition of glucose-stimulated activation of extracellular signal-regulated protein kinases 1 and 2 by epinephrine in pancreatic beta-cells. *Diabetes*, **2006**, 55, 1066-73	0.9	31
87	Off-target effects of MEK inhibitors. *Biochemistry*, **2013**, 52, 5164-6	3.2	30
86	Differential regulation of CHOP-10/GADD153 gene expression by MAPK signaling in pancreatic beta-cells. *Proceedings of the National Academy of Sciences of the United States of America*, **2007**, 104, 11518-25	11.5	29
85	Characterization of mitogen-activated protein kinase (MAPK) dimers. *Biochemistry*, **2006**, 45, 13175-82	3.2	29
84	Cyclic AMP selectively uncouples mitogen-activated protein kinase cascades from activating signals. *Molecular and Cellular Biology*, **2006**, 26, 3039-47	4.8	28
83	Crystallization and preliminary X-ray studies of extracellular signal-regulated kinase-2/MAP kinase with an incorporated His-tag. *Journal of Molecular Biology*, **1993**, 233, 550-2	6.5	28
82	Rasip1-Mediated Rho GTPase Signaling Regulates Blood Vessel Tubulogenesis via Nonmuscle Myosin II. *Circulation Research*, **2016**, 119, 810-26	15.7	28
81	Amino acid regulation of autophagy through the GPCR TAS1R1-TAS1R3. *Autophagy*, **2013**, 9, 418-9	10.2	26
80	Multiple chromatin-bound protein kinases assemble factors that regulate insulin gene transcription. *Proceedings of the National Academy of Sciences of the United States of America*, **2009**, 106, 22181-6	11.5	26
79	Radial spoke protein 3 is a mammalian protein kinase A-anchoring protein that binds ERK1/2. *Journal of Biological Chemistry*, **2009**, 284, 29437-45	5.4	26
78	Sumoylation regulates the transcriptional activity of MafA in pancreatic beta cells. *Journal of Biological Chemistry*, **2009**, 284, 3117-3124	5.4	25
77	WNK1 is a novel regulator of Munc18c-syntaxin 4 complex formation in soluble NSF attachment protein receptor (SNARE)-mediated vesicle exocytosis. *Journal of Biological Chemistry*, **2007**, 282, 32613-22	5.4	25

76	Regulation of a third conserved phosphorylation site in SGK1. *Journal of Biological Chemistry*, **2009**, 284, 3453-60	5.4	24
75	Multistep regulation of autophagy by WNK1. *Proceedings of the National Academy of Sciences of the United States of America*, **2016**, 113, 14342-14347	11.5	24
74	The structure of the MAP2K MEK6 reveals an autoinhibitory dimer. *Structure*, **2009**, 17, 96-104	5.2	23
73	Differential abundance of CK1 provides selectivity for pharmacological CK1 activators to target WNT-dependent tumors. *Science Signaling*, **2017**, 10,	8.8	22
72	Structural analysis of the MAP kinase ERK2 and studies of MAP kinase regulatory pathways. *Advances in Pharmacology*, **1996**, 36, 49-65	5.7	22
71	Insulin promoter-driven Gaussia luciferase-based insulin secretion biosensor assay for discovery of cell glucose-sensing pathways. *ACS Sensors*, **2016**, 1, 1208-1212	9.2	21
70	MAP kinases and their roles in pancreatic beta-cells. *Cell Biochemistry and Biophysics*, **2004**, 40, 191-200	3.2	21
69	Bacterial expression of activated mitogen-activated protein kinases. *Methods in Enzymology*, **2001**, 332, 387-400	1.7	21
68	Regulation of OSR1 and the sodium, potassium, two chloride cotransporter by convergent signals. *Proceedings of the National Academy of Sciences of the United States of America*, **2013**, 110, 18826-31	11.5	19
67	WNK1 is an unexpected autophagy inhibitor. *Autophagy*, **2017**, 13, 969-970	10.2	18
66	Isoxazole Alters Metabolites and Gene Expression, Decreasing Proliferation and Promoting a Neuroendocrine Phenotype in Cells. *ACS Chemical Biology*, **2016**, 11, 1128-36	4.9	18
65	TGF-beta regulation by Emilin1: new links in the etiology of hypertension. *Cell*, **2006**, 124, 893-5	56.2	18
64	Regulation of CCAAT/enhancer-binding protein homologous protein (CHOP) expression by interleukin-1 beta in pancreatic beta cells. *Journal of Biological Chemistry*, **2010**, 285, 19710-9	5.4	17
63	The transcriptional ETS2 repressor factor associates with active and inactive Erks through distinct FXF motifs. *Journal of Biological Chemistry*, **2006**, 281, 25601-11	5.4	17
62	Structure of MAPKs. *Methods in Molecular Biology*, **2004**, 250, 127-44	1.4	17
61	Cell condition-dependent regulation of ERK5 by cAMP. *Journal of Biological Chemistry*, **2002**, 277, 48094-8	5.4	17
60	Interactions with WNK (with no lysine) family members regulate oxidative stress response 1 and ion co-transporter activity. *Journal of Biological Chemistry*, **2012**, 287, 37868-79	5.4	15
59	Chemoattractant concentration-dependent tuning of ERK signaling dynamics in migrating neutrophils. *Science Signaling*, **2016**, 9, ra122	8.8	15

58	Differential Regulation of ERK1/2 and mTORC1 Through T1R1/T1R3 in MIN6 Cells. *Molecular Endocrinology*, **2015**, 29, 1114-22		13
57	Protein kinase WNK3 regulates the neuronal splicing factor Fox-1. *Proceedings of the National Academy of Sciences of the United States of America*, **2012**, 109, 16841-6	11.5	13
56	Domain-Swapping Switch Point in Ste20 Protein Kinase SPAK. *Biochemistry*, **2015**, 54, 5063-71	3.2	12
55	Different domains of the mitogen-activated protein kinases ERK3 and ERK2 direct subcellular localization and upstream specificity in vivo. *Journal of Biological Chemistry*, **2002**, 277, 5094-100	5.4	12
54	MAP Kinases and Their Roles in Pancreatic □Cells. *Cell Biochemistry and Biophysics*, **2004**, 40, 191-200	3.2	12
53	Functional divergence caused by mutations in an energetic hotspot in ERK2. *Proceedings of the National Academy of Sciences of the United States of America*, **2019**, 116, 15514-15523	11.5	11
52	NeuroD1 mediates nicotine-induced migration and invasion via regulation of the nicotinic acetylcholine receptor subunits in a subset of neural and neuroendocrine carcinomas. *Molecular Biology of the Cell*, **2014**, 25, 1782-92	3.5	11
51	WNK kinases and blood pressure control. *Current Hypertension Reports*, **2009**, 11, 421-6	4.7	11
50	A similar ribosomal protein S6 kinase activity is found in insulin-treated 3T3-L1 cells and chick embryo fibroblasts transformed by Rous sarcoma virus. *Biochemical and Biophysical Research Communications*, **1986**, 137, 702-8	3.4	11
49	The Epithelial Sodium Channel (□NaC) Is a Downstream Therapeutic Target of ASCL1 in Pulmonary Neuroendocrine Tumors. *Translational Oncology*, **2018**, 11, 292-299	4.9	10
48	Phosphorylation or Mutation of the ERK2 Activation Loop Alters Oligonucleotide Binding. *Biochemistry*, **2016**, 55, 1909-17	3.2	10
47	Subtype-specific secretomic characterization of pulmonary neuroendocrine tumor cells. *Nature Communications*, **2019**, 10, 3201	17.4	10
46	Context-dependent regulation of NeuroD activity and protein accumulation. *Molecular and Cellular Neurosciences*, **2005**, 28, 727-36	4.8	10
45	Irreversible inhibition of sodium transport by the toad urinary bladder following photolysis of amiloride analogs. *Experientia*, **1981**, 37, 68-9		10
44	Hypertension: the missing WNKs. *American Journal of Physiology - Renal Physiology*, **2016**, 311, F16-27	4.3	10
43	Expression and characterization of MAP kinases in bacteria. *Methods*, **2006**, 40, 209-12	4.6	9
42	kin-18, a C. elegans protein kinase involved in feeding. *Gene*, **2001**, 279, 137-47	3.8	9
41	Ras transformation uncouples the kinesin-coordinated cellular nutrient response. *Proceedings of the National Academy of Sciences of the United States of America*, **2014**, 111, 10568-73	11.5	8

40	The insulin receptor and tyrosine protein kinase activity. *Biochimica Et Biophysica Acta: Reviews on Cancer*, **1984**, 738, 1-8	11.2	8
39	Extracellular Signal-Regulated Protein Kinases (ERKS) 1, 2, and 3 **1994**, 61-66		8
38	OSR1 regulates a subset of inward rectifier potassium channels via a binding motif variant. *Proceedings of the National Academy of Sciences of the United States of America*, **2018**, 115, 3840-3845	11.5	7
37	Muscarinic control of MIN6 pancreatic □cells is enhanced by impaired amino acid signaling. *Journal of Biological Chemistry*, **2014**, 289, 14370-9	5.4	7
36	MAP-ping unconventional protein-DNA interactions. *Cell*, **2009**, 139, 462-3	56.2	7
35	Sucralose activates an ERK1/2-ribosomal protein S6 signaling axis. *FEBS Open Bio*, **2017**, 7, 174-186	2.7	6
34	Assaying Protein Kinase Activity with Radiolabeled ATP. *Journal of Visualized Experiments*, **2017**,	1.6	6
33	Catalytic reaction pathway for the mitogen-activated protein kinase ERK2. *Biochemistry*, **2000**, 39, 14002	3.2	6
32	Activation of MEKK1 by Rho GTPases. *Methods in Enzymology*, **2006**, 406, 468-78	1.7	5
31	Mineralocorticoid-induced membrane proteins in MDCK cells. *Molecular and Cellular Endocrinology*, **1982**, 27, 129-37	4.4	5
30	The CK1□Activator Pyrvinium Enhances the Catalytic Efficiency (/) of CK1□*Biochemistry*, **2019**, 58, 5102-5106	3.2	5
29	Chromomycin A potently inhibits glucose-stimulated insulin secretion from pancreatic □cells. *Journal of General Physiology*, **2018**, 150, 1747-1757	3.4	5
28	Pulling a MAST1 on Cisplatin Resistance. *Cancer Cell*, **2018**, 34, 183-185	24.3	4
27	Insulin-stimulated sodium transport in toad urinary bladder. *Biochimica Et Biophysica Acta - Biomembranes*, **1986**, 856, 123-9	3.8	4
26	Reconstitution of the nuclear transport of the MAP kinase ERK2. *Methods in Molecular Biology*, **2010**, 661, 273-85	1.4	4
25	Measuring Relative Insulin Secretion using a Co-Secreted Luciferase Surrogate. *Journal of Visualized Experiments*, **2019**,	1.6	3
24	A Kinase Divided. *Cancer Cell*, **2015**, 28, 145-7	24.3	2
23	Exposing contingency plans for kinase networks. *Cell*, **2010**, 143, 867-9	56.2	2

22	MAP kinases and their roles in pancreatic cells. *Cell Biochemistry and Biophysics*, **2004**, 2004, 191-200	3.2	2
21	ERKs weigh in on ribosome mass. *Molecular Cell*, **2001**, 8, 932-3	17.6	2
20	A comparison of protein synthetic patterns of MDCK cells grown in serum and hormonally defined serum-free medium. *Journal of Cellular Physiology*, **1985**, 123, 126-31	7	2
19	Effect of glutathione on cyclic nucleotide levels in hydra attenuata. *Comparative Biochemistry and Physiology Part C: Comparative Pharmacology*, **1980**, 65, 111-115		2
18	Insulin-induced alterations in the lactoperoxidase-catalyzed radioiodination of membrane proteins of the toad bladder epithelium. *Endocrinology*, **1981**, 109, 1775-7	4.8	2
17	Effects of insulin on ribonucleic acid synthesis in toad urinary bladder. *Endocrinology*, **1981**, 109, 2167-74	4.8	2
16	Adrenergic Disruption of Cell BDNF-TrkB Receptor Tyrosine Kinase Signaling. *Frontiers in Cell and Developmental Biology*, **2020**, 8, 576396	5.7	2
15	WNK1 Enhances Migration and Invasion in Breast Cancer Models. *Molecular Cancer Therapeutics*, **2021**, 20, 1800-1808	6.1	2
14	ERK5 signaling gets XIAPed: a role for ubiquitin in the disassembly of a MAPK cascade. *EMBO Journal*, **2014**, 33, 1735-6	13	1
13	Cholesterol Regulates the Tumor Adaptive Resistance to MAPK Pathway Inhibition. *Journal of Proteome Research*, **2021**, 20, 5379-5391	5.6	1
12	-adrenergic signaling disrupts cell BDNF-TrkB receptor tyrosine kinase signaling		1
11	. *Molecular Pharmacology*, **2021**,	4.3	1
10	Control of Podocyte and Glomerular Capillary Wall Structure and Elasticity by WNK1 Kinase. *Frontiers in Cell and Developmental Biology*, **2020**, 8, 618898	5.7	1
9	WNK1 Enhances Migration and Invasion in Breast Cancer Models		1
8	MEKK1 interacts with actinin and localizes to stress fibers and focal adhesions **1999**, 43, 186		1
7	Kinases in Diabetes and Hypertension. *FASEB Journal*, **2008**, 22, 102.3	0.9	
6	Cilia and mitogen-activated protein kinase signaling. *FASEB Journal*, **2008**, 22, 1052.2	0.9	
5	Erk3: Extracellular signal-regulated kinase 3 (vertebrates) **1995**, 217-218		

4	Erk1/2: Extracellular signal-regulated kinases 1/2 (vertebrates) (MAP, MBP, EGF receptor T669 (Ert)) **1995**, 214-216	
3	Regulation of the DNA-binding protein CFP1 by ERK1/2. *FASEB Journal*, **2013**, 27, 981.9	0.9
2	ERKonomics: MAPK assets and liabilities. *FASEB Journal*, **2013**, 27, 322.1	0.9
1	Beth Levine M.D. Prize in Autophagy Research. *Autophagy*,1-1	10.2