Joshua D Rabinowitz

List of Publications by Year
in descending order

201 papers	42,989 citations	2802 94 h-index	2509 196 g-index
220 all docs	220 docs citations	220 times ranked	50568 citing authors

#	Article	IF	Citations
1	Metabolic Profiling Reveals a Dependency of Human Metastatic Breast Cancer on Mitochondrial Serine and One-Carbon Unit Metabolism. Molecular Cancer Research, 2022, 18, 599-611.	3.4	56
2	GCN2 adapts protein synthesis to scavenging-dependent growth. Cell Systems, 2022, 13, 158-172.e9.	6.2	12
3	Inhibition of glucose transport synergizes with chemical or genetic disruption of mitochondrial metabolism and suppresses TCA cycle-deficient tumors. Cell Chemical Biology, 2022, 29, 423-435.e10.	5.2	18
4	SHMT2 inhibition disrupts the TCF3 transcriptional survival program in Burkitt lymphoma. Blood, 2022, 139, 538-553.	1.4	27
5	MTHFD2 is a metabolic checkpoint controlling effector and regulatory TÂcell fate and function. Immunity, 2022, 55, 65-81.e9.	14.3	74
6	Circulating metabolite homeostasis achieved through mass action. Nature Metabolism, 2022, 4, 141-152.	11.9	26
7	Sex and genetic background define the metabolic, physiologic, and molecular response to protein restriction. Cell Metabolism, 2022, 34, 209-226.e5.	16.2	44
8	Spatially resolved isotope tracing reveals tissue metabolic activity. Nature Methods, 2022, 19, 223-230.	19.0	67
9	Ketogenic diet and chemotherapy combine to disrupt pancreatic cancer metabolism and growth. Med, 2022, 3, 119-136.e8.	4.4	31
10	SHMT inhibition is effective and synergizes with methotrexate in T-cell acute lymphoblastic leukemia. Leukemia, 2021, 35, 377-388.	7.2	68
11	Upregulation of Antioxidant Capacity and Nucleotide Precursor Availability Suffices for Oncogenic Transformation. Cell Metabolism, 2021, 33, 94-109.e8.	16.2	39
12	Inhibition of <i>de novo</i> pyrimidine synthesis augments Gemcitabine induced growth inhibition in an immunocompetent model of pancreatic cancer. International Journal of Biological Sciences, 2021, 17, 2240-2251.	6.4	8
13	Restoring metabolism of myeloid cells reverses cognitive decline in ageing. Nature, 2021, 590, 122-128.	27.8	264
14	The Source of Glycolytic Intermediates in Mammalian Tissues. Cell Metabolism, 2021, 33, 367-378.e5.	16.2	80
15	The adverse metabolic effects of branched-chain amino acids are mediated by isoleucine and valine. Cell Metabolism, 2021, 33, 905-922.e6.	16.2	183
16	Monitoring mammalian mitochondrial translation with MitoRiboSeq. Nature Protocols, 2021, 16, 2802-2825.	12.0	16
17	mTORC1 promotes cell growth via m6A-dependent mRNA degradation. Molecular Cell, 2021, 81, 2064-2075.e8.	9.7	50
18	NADK is activated by oncogenic signaling to sustain pancreatic ductal adenocarcinoma. Cell Reports, 2021, 35, 109238.	6.4	19

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19	Live-Cell Imaging of NADPH Production from Specific Pathways. CCS Chemistry, 2021, 3, 1642-1648.	7.8	5
20	Local production of lactate, ribose phosphate, and amino acids by human triple-negative breast cancer. Med, 2021, 2, 736-754.e6.	4.4	28
21	Quantitative flux analysis in mammals. Nature Metabolism, 2021, 3, 896-908.	11.9	35
22	Metabolic decisions in development and diseaseâ€"a Keystone Symposia report. Annals of the New York Academy of Sciences, 2021, 1506, 55-73.	3.8	6
23	NAD+ flux is maintained in aged mice despite lower tissue concentrations. Cell Systems, 2021, 12, 1160-1172.e4.	6.2	51
24	A genetic model of methionine restriction extends <i>Drosophila</i> health- and lifespan. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	7.1	8
25	CAR T-Cells Depend on the Coupling of NADH Oxidation with ATP Production. Cells, 2021, 10, 2334.	4.1	7
26	Metabolite discovery through global annotation of untargeted metabolomics data. Nature Methods, 2021, 18, 1377-1385.	19.0	107
27	Activation of the NRF2 antioxidant program sensitizes tumors to G6PD inhibition. Science Advances, 2021, 7, eabk1023.	10.3	43
28	Serine catabolism generates liver NADPH and supports hepatic lipogenesis. Nature Metabolism, 2021, 3, 1608-1620.	11.9	37
29	Methionine synthase supports tumour tetrahydrofolate pools. Nature Metabolism, 2021, 3, 1512-1520.	11.9	24
30	Elevated Choline Kinase Î±â€"Mediated Choline Metabolism Supports the Prolonged Survival of TRAF3-Deficient B Lymphocytes. Journal of Immunology, 2020, 204, 459-471.	0.8	13
31	Comprehensive quantification of fuel use by the failing and nonfailing human heart. Science, 2020, 370, 364-368.	12.6	276
32	Bisphosphoglycerate Mutase Deficiency Protects against Cerebral Malaria and Severe Malaria-Induced Anemia. Cell Reports, 2020, 32, 108170.	6.4	7
33	Lactate: the ugly duckling of energy metabolism. Nature Metabolism, 2020, 2, 566-571.	11.9	371
34	Glucose-6-Phosphate Dehydrogenase Is Not Essential for K-Rasâ€"Driven Tumor Growth or Metastasis. Cancer Research, 2020, 80, 3820-3829.	0.9	33
35	CD38 ecto-enzyme in immune cells is induced during aging and regulates NAD+ and NMN levels. Nature Metabolism, 2020, 2, 1284-1304.	11.9	157
36	SLC25A51 is a mammalian mitochondrial NAD+ transporter. Nature, 2020, 588, 174-179.	27.8	158

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37	Enhancing Chimeric Antigen Receptor T Cell Anti-tumor Function through Advanced Media Design. Molecular Therapy - Methods and Clinical Development, 2020, 18, 595-606.	4.1	39
38	Quantitative Fluxomics of Circulating Metabolites. Cell Metabolism, 2020, 32, 676-688.e4.	16.2	148
39	Chaperone-mediated autophagy regulates the pluripotency of embryonic stem cells. Science, 2020, 369, 397-403.	12.6	60
40	The hepatocyte clock and feeding control chronophysiology of multiple liver cell types. Science, 2020, 369, 1388-1394.	12.6	103
41	Metabolic excretion associated with nutrientâ€"growth dysregulation promotes the rapid evolution of an overt metabolic defect. PLoS Biology, 2020, 18, e3000757.	5.6	17
42	Autophagy promotes growth of tumors with high mutational burden by inhibiting a T-cell immune response. Nature Cancer, 2020, 1, 923-934.	13.2	67
43	Obesity Shapes Metabolism in the Tumor Microenvironment to Suppress Anti-Tumor Immunity. Cell, 2020, 183, 1848-1866.e26.	28.9	347
44	Genome-scale metabolic reconstruction of the non-model yeast Issatchenkia orientalis SD108 and its application to organic acids production. Metabolic Engineering Communications, 2020, 11, e00148.	3.6	20
45	A small molecule G6PD inhibitor reveals immune dependence on pentose phosphate pathway. Nature Chemical Biology, 2020, 16, 731-739.	8.0	101
46	A Dual-Mechanism Antibiotic Kills Gram-Negative Bacteria and Avoids Drug Resistance. Cell, 2020, 181, 1518-1532.e14.	28.9	202
47	The small intestine shields the liver from fructose-induced steatosis. Nature Metabolism, 2020, 2, 586-593.	11.9	81
48	Dietary fructose feeds hepatic lipogenesis via microbiota-derived acetate. Nature, 2020, 579, 586-591.	27.8	314
49	Serine Catabolism Feeds NADH when Respiration Is Impaired. Cell Metabolism, 2020, 31, 809-821.e6.	16.2	118
50	Lactate dehydrogenase inhibition synergizes with IL-21 to promote CD8 ⁺ T cell stemness and antitumor immunity. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 6047-6055.	7.1	128
51	Improved Annotation of Untargeted Metabolomics Data through Buffer Modifications That Shift Adduct Mass and Intensity. Analytical Chemistry, 2020, 92, 11573-11581.	6.5	20
52	Downregulation of the tyrosine degradation pathway extends Drosophila lifespan. ELife, 2020, 9, .	6.0	25
53	Novel Pyrrolo[3,2-<i>d</i>]pyrimidine Compounds Target Mitochondrial and Cytosolic One-carbon Metabolism with Broad-spectrum Antitumor Efficacy. Molecular Cancer Therapeutics, 2019, 18, 1787-1799.	4.1	38
54	Metabolite Exchange between Mammalian Organs Quantified in Pigs. Cell Metabolism, 2019, 30, 594-606.e3.	16.2	170

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55	Peripheral TREM1 responses to brain and intestinal immunogens amplify stroke severity. Nature Immunology, 2019, 20, 1023-1034.	14.5	101
56	Energy budget of Drosophila embryogenesis. Current Biology, 2019, 29, R566-R567.	3.9	32
57	Natural human genetic variation determines basal and inducible expression of <i>PM20D1</i> , an obesity-associated gene. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 23232-23242.	7.1	35
58	A comprehensive genome-scale model for Rhodosporidium toruloides IFO0880 accounting for functional genomics and phenotypic data. Metabolic Engineering Communications, 2019, 9, e00101.	3.6	55
59	T Cell Activation Depends on Extracellular Alanine. Cell Reports, 2019, 28, 3011-3021.e4.	6.4	117
60	PRDM16 Maintains Homeostasis of the Intestinal Epithelium by Controlling Region-Specific Metabolism. Cell Stem Cell, 2019, 25, 830-845.e8.	11.1	62
61	Near-equilibrium glycolysis supports metabolic homeostasis and energy yield. Nature Chemical Biology, 2019, 15, 1001-1008.	8.0	60
62	Distinct modes of mitochondrial metabolism uncouple T cell differentiation and function. Nature, 2019, 571, 403-407.	27.8	156
63	The Tumor Metabolic Microenvironment: Lessons from Lactate. Cancer Research, 2019, 79, 3155-3162.	0.9	140
64	A PRDM16-Driven Metabolic Signal from Adipocytes Regulates Precursor Cell Fate. Cell Metabolism, 2019, 30, 174-189.e5.	16.2	141
65	The metabolites NADP+ and NADPH are the targets of the circadian protein Nocturnin (Curled). Nature Communications, 2019, 10, 2367.	12.8	41
66	A Two-Enzyme Adaptive Unit within Bacterial Folate Metabolism. Cell Reports, 2019, 27, 3359-3370.e7.	6.4	27
67	NADPH production by the oxidative pentose-phosphate pathway supports folate metabolism. Nature Metabolism, 2019, 1, 404-415.	11.9	209
68	Minor Isozymes Tailor Yeast Metabolism to Carbon Availability. MSystems, 2019, 4, .	3.8	14
69	Serine Metabolism Supports Macrophage IL-1Î² Production. Cell Metabolism, 2019, 29, 1003-1011.e4.	16.2	192
70	Peak Annotation and Verification Engine for Untargeted LCâ€“MS Metabolomics. Analytical Chemistry, 2019, 91, 1838-1846.	6.5	72
71	Macrophage de novo NAD+ synthesis specifies immune function in aging and inflammation. Nature Immunology, 2019, 20, 50-63.	14.5	304
72	Quantitative Analysis of the Whole-Body Metabolic Fate of Branched-Chain Amino Acids. Cell Metabolism, 2019, 29, 417-429.e4.	16.2	301

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73	A metabolic strategy to reverse fibrosis?. Nature Metabolism, 2019, 1, 12-13.	11.9	19
74	Quantitative Survey of NAD + Flux in Aged Mice. FASEB Journal, 2019, 33, 794.14.	0.5	0
75	NADPH production by the oxidative pentose-phosphate pathway supports folate metabolism. Nature Metabolism, 2019, 1, 404-415.	11.9	84
76	The Small Intestine Converts Dietary Fructose into Glucose and Organic Acids. Cell Metabolism, 2018, 27, 351-361.e3.	16.2	416
77	Perinatal high fat diet and early life methyl donor supplementation alter one carbon metabolism and <scp>DNA</scp> methylation in the brain. Journal of Neurochemistry, 2018, 145, 362-373.	3.9	25
78	Mitochondrial translation requires folate-dependent tRNA methylation. Nature, 2018, 554, 128-132.	27.8	213
79	As Extracellular Glutamine Levels Decline, Asparagine Becomes an Essential Amino Acid. Cell Metabolism, 2018, 27, 428-438.e5.	16.2	220
80	Metabolomics and Isotope Tracing. Cell, 2018, 173, 822-837.	28.9	537
81	Quantitative Analysis of NAD Synthesis-Breakdown Fluxes. Cell Metabolism, 2018, 27, 1067-1080.e5.	16.2	363
82	Targeting hepatic glutaminase activity to ameliorate hyperglycemia. Nature Medicine, 2018, 24, 518-524.	30.7	50
83	Extraction and Quantitation of Nicotinamide Adenine Dinucleotide Redox Cofactors. Antioxidants and Redox Signaling, 2018, 28, 167-179.	5.4	136
84	Autophagy maintains tumour growth through circulating arginine. Nature, 2018, 563, 569-573.	27.8	279
85	Discovery and Functional Characterization of a Yeast Sugar Alcohol Phosphatase. ACS Chemical Biology, 2018, 13, 3011-3020.	3.4	12
86	Late-gestation maternal dietary methyl donor and cofactor supplementation in sheep partially reverses protection against allergic sensitization by IUGR. American Journal of Physiology - Regulatory Integrative and Comparative Physiology, 2018, 314, R22-R33.	1.8	4
87	Ribosomes on the night shift. Science, 2018, 360, 710-711.	12.6	3
88	5,10-methenyltetrahydrofolate synthetase deficiency causes a neurometabolic disorder associated with microcephaly, epilepsy, and cerebral hypomyelination. Molecular Genetics and Metabolism, 2018, 125, 118-126.	1.1	18
89	Four Key Steps Control Glycolytic Flux in Mammalian Cells. Cell Systems, 2018, 7, 49-62.e8.	6.2	249
90	Nicotinamide adenine dinucleotide is transported into mammalian mitochondria. ELife, 2018, 7, .	6.0	111

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91	Diet-Induced Circadian Enhancer Remodeling Synchronizes Opposing Hepatic Lipid Metabolic Processes. Cell, 2018, 174, 831-842.e12.	28.9	150
92	Ketohexokinase C blockade ameliorates fructose-induced metabolic dysfunction in fructose-sensitive mice. Journal of Clinical Investigation, 2018, 128, 2226-2238.	8.2	89
93	Metabolite Spectral Accuracy on Orbitraps. Analytical Chemistry, 2017, 89, 5940-5948.	6.5	201
94	Treatment of Pancreatic Cancer Patientâ€"Derived Xenograft Panel with Metabolic Inhibitors Reveals Efficacy of Phenformin. Clinical Cancer Research, 2017, 23, 5639-5647.	7.0	76
95	Direct evidence for cancer-cell-autonomous extracellular protein catabolism in pancreatic tumors. Nature Medicine, 2017, 23, 235-241.	30.7	263
96	Human SHMT inhibitors reveal defective glycine import as a targetable metabolic vulnerability of diffuse large B-cell lymphoma. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 11404-11409.	7.1	190
97	Glucose feeds the TCA cycle via circulating lactate. Nature, 2017, 551, 115-118.	27.8	1,112
98	An LC-MS chemical derivatization method for the measurement of five different one-carbon states of cellular tetrahydrofolate. Analytical and Bioanalytical Chemistry, 2017, 409, 5955-5964.	3.7	40
99	Chemical Basis for Deuterium Labeling of Fat and NADPH. Journal of the American Chemical Society, 2017, 139, 14368-14371.	13.7	71
100	Enhancing CD8+ T Cell Fatty Acid Catabolism withinÂa Metabolically Challenging Tumor Microenvironment Increases the Efficacy of Melanoma Immunotherapy. Cancer Cell, 2017, 32, 377-391.e9.	16.8	419
101	mTOR Inhibition Restores Amino Acid Balance in Cells Dependent on Catabolism of Extracellular Protein. Molecular Cell, 2017, 67, 936-946.e5.	9.7	78
102	A Unified Approach to Targeting the Lysosome's Degradative and Growth Signaling Roles. Cancer Discovery, 2017, 7, 1266-1283.	9.4	159
103	PDK4 Inhibits Cardiac Pyruvate Oxidation in Late Pregnancy. Circulation Research, 2017, 121, 1370-1378.	4.5	33
104	Dynamic Control of dNTP Synthesis in Early Embryos. Developmental Cell, 2017, 42, 301-308.e3.	7.0	30
105	Bisphosphoglycerate mutase controls serine pathway flux via 3-phosphoglycerate. Nature Chemical Biology, 2017, 13, 1081-1087.	8.0	47
106	Post-transcriptional Regulation of De Novo Lipogenesis by mTORC1-S6K1-SRPK2 Signaling. Cell, 2017, 171, 1545-1558.e18.	28.9	159
107	Metabolite Measurement: Pitfalls to Avoid and Practices to Follow. Annual Review of Biochemistry, 2017, 86, 277-304.	11.1	322
108	One-Carbon Metabolism in Health and Disease. Cell Metabolism, 2017, 25, 27-42.	16.2	1,275

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109	A systematic genetic screen for genes involved in sensing inorganic phosphate availability in Saccharomyces cerevisiae. PLoS ONE, 2017, 12, e0176085.	2.5	25
110	Mitochondrial Biogenesis and Proteome Remodeling Promote One-Carbon Metabolism for T Cell Activation. Cell Metabolism, 2016, 24, 104-117.	16.2	282
111	Reversal of Cytosolic One-Carbon Flux Compensates for Loss of the Mitochondrial Folate Pathway. Cell Metabolism, 2016, 23, 1140-1153.	16.2	296
112	Metabolite concentrations, fluxes and free energies imply efficient enzyme usage. Nature Chemical Biology, 2016, 12, 482-489.	8.0	332
113	Loss of NAD Homeostasis Leads to Progressive and Reversible Degeneration of Skeletal Muscle. Cell Metabolism, 2016, 24, 269-282.	16.2	273
114	Autophagy provides metabolic substrates to maintain energy charge and nucleotide pools in Ras-driven lung cancer cells. Genes and Development, 2016, 30, 1704-1717.	5.9	291
115	Glucose becomes one of the worst carbon sources for E.coli on poor nitrogen sources due to suboptimal levels of cAMP. Scientific Reports, 2016, 6, 24834.	3.3	110
116	Physiological Suppression of Lipotoxic Liver DamageÂby Complementary Actions of HDAC3 andÂSCAP/SREBP. Cell Metabolism, 2016, 24, 863-874.	16.2	59
117	Systems-level analysis of mechanisms regulating yeast metabolic flux. Science, 2016, 354, .	12.6	236
118	Metabolic control of methylation and acetylation. Current Opinion in Chemical Biology, 2016, 30, 52-60.	6.1	241
119	Malic enzyme tracers reveal hypoxia-induced switch in adipocyte NADPH pathway usage. Nature Chemical Biology, 2016, 12, 345-352.	8.0	103
120	Mitochondria and Cancer. Molecular Cell, 2016, 61, 667-676.	9.7	800
121	A branched-chain amino acid metabolite drives vascular fatty acid transport and causes insulin resistance. Nature Medicine, 2016, 22, 421-426.	30.7	421
122	Partners in the Warburg effect. ELife, 2016, 5, e15938.	6.0	10
123	Human Pancreatic Cancer Tumors Are Nutrient Poor and Tumor Cells Actively Scavenge Extracellular Protein. Cancer Research, 2015, 75, 544-553.	0.9	673
124	ZMP: A Master Regulator of One-Carbon Metabolism. Molecular Cell, 2015, 57, 203-204.	9.7	13
125	Avoiding Misannotation of In-Source Fragmentation Products as Cellular Metabolites in Liquid Chromatographyâ€“Mass Spectrometry-Based Metabolomics. Analytical Chemistry, 2015, 87, 2273-2281.	6.5	160
126	Hierarchy in Pentose Sugar Metabolism in Clostridium acetobutylicum. Applied and Environmental Microbiology, 2015, 81, 1452-1462.	3.1	38

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127	A roadmap for interpreting 13 C metabolite labeling patterns from cells. Current Opinion in Biotechnology, 2015, 34, 189-201.	6.6	513
128	Characterizing the in vivo role of trehalose in <i>Saccharomyces cerevisiae</i> using the <i>AGT1</i> transporter. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 6116-6121.	7.1	77
129	Fatty Acid Elongase 7 Catalyzes Lipidome Remodeling Essential for Human Cytomegalovirus Replication. Cell Reports, 2015, 10, 1375-1385.	6.4	73
130	Oncogenic Myc Induces Expression of Glutamine Synthetase through Promoter Demethylation. Cell Metabolism, 2015, 22, 1068-1077.	16.2	189
131	RNA Futile Cycling in Model Persisters Derived from MazF Accumulation. MBio, 2015, 6, e01588-15.	4.1	48
132	The return of metabolism: biochemistry and physiology of the pentose phosphate pathway. Biological Reviews, 2015, 90, 927-963.	10.4	908
133	Genetic Basis of Metabolome Variation in Yeast. PLoS Genetics, 2014, 10, e1004142.	3.5	53
134	Serine Catabolism Regulates Mitochondrial Redox Control during Hypoxia. Cancer Discovery, 2014, 4, 1406-1417.	9.4	342
135	Autophagy Is Required for Glucose Homeostasis and Lung Tumor Maintenance. Cancer Discovery, 2014, 4, 914-927.	9.4	450
136	Asparagine Plays a Critical Role in Regulating Cellular Adaptation to Glutamine Depletion. Molecular Cell, 2014, 56, 205-218.	9.7	347
137	Functional Role of Autophagy-Mediated Proteome Remodeling in Cell Survival Signaling and Innate Immunity. Molecular Cell, 2014, 55, 916-930.	9.7	96
138	Enzyme clustering accelerates processing of intermediates through metabolic channeling. Nature Biotechnology, 2014, 32, 1011-1018.	17.5	340
139	LC-MS and GC-MS based metabolomics platform for cancer research. Cancer & Metabolism, 2014, 2, .	5.0	3
140	Quantitation of Cellular Metabolic Fluxes of Methionine. Analytical Chemistry, 2014, 86, 1583-1591.	6.5	42
141	Quantitative flux analysis reveals folate-dependent NADPH production. Nature, 2014, 510, 298-302.	27.8	892
142	Pyrimidine homeostasis is accomplished by directed overflow metabolism. Nature, 2013, 500, 237-241.	27.8	102
143	Chemical Genetics of Rapamycin-Insensitive TORC2 in S.Âcerevisiae. Cell Reports, 2013, 5, 1725-1736.	6.4	31
144	Biochemical and Structural Studies of Conserved Maf Proteins Revealed Nucleotide Pyrophosphatases with a Preference for Modified Nucleotides. Chemistry and Biology, 2013, 20, 1386-1398.	6.0	15

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145	Nucleotide degradation and ribose salvage in yeast. Molecular Systems Biology, 2013, 9, 665.	7.2	58
146	Macropinocytosis of protein is an amino acid supply route in Ras-transformed cells. Nature, 2013, 497, 633-637.	27.8	1,316
147	Autophagy suppresses progression of K-ras-induced lung tumors to oncocytomas and maintains lipid homeostasis. Genes and Development, 2013, 27, 1447-1461.	5.9	529
148	Glutamineâ€driven oxidative phosphorylation is a major ATP source in transformed mammalian cells in both normoxia and hypoxia. Molecular Systems Biology, 2013, 9, 712.	7.2	338
149	Hypoxic and Ras-transformed cells support growth by scavenging unsaturated fatty acids from lysophospholipids. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 8882-8887.	7.1	585
150	Ultrasensitive regulation of anapleurosis via allosteric activation of PEP carboxylase. Nature Chemical Biology, 2012, 8, 562-568.	8.0	72
151	Regulation of Yeast Pyruvate Kinase by Ultrasensitive Allostery Independent of Phosphorylation. Molecular Cell, 2012, 48, 52-62.	9.7	59
152	LCâ€MS Data Processing with MAVEN: A Metabolomic Analysis and Visualization Engine. Current Protocols in Bioinformatics, 2012, 37, Unit14.11.	25.8	406
153	Teaching the design principles of metabolism. Nature Chemical Biology, 2012, 8, 497-501.	8.0	26
154	Î±-ketoglutarate coordinates carbon and nitrogen utilization via enzyme I inhibition. Nature Chemical Biology, 2011, 7, 894-901.	8.0	212
155	Riboneogenesis in Yeast. Cell, 2011, 145, 969-980.	28.9	105
156	Liquid Chromatographyâ€"High Resolution Mass Spectrometry Analysis of Fatty Acid Metabolism. Analytical Chemistry, 2011, 83, 9114-9122.	6.5	82
157	Robust Control of Nitrogen Assimilation by a Bifunctional Enzyme in E.Âcoli. Molecular Cell, 2011, 41, 117-127.	9.7	56
158	Metabolome Remodeling during the Acidogenic-Solventogenic Transition in Clostridium acetobutylicum. Applied and Environmental Microbiology, 2011, 77, 7984-7997.	3.1	105
159	Metabolomics in systems microbiology. Current Opinion in Biotechnology, 2011, 22, 17-25.	6.6	110
160	Yeast cells can access distinct quiescent states. Genes and Development, 2011, 25, 336-349.	5.9	143
161	Survival of starving yeast is correlated with oxidative stress response and nonrespiratory mitochondrial function. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, E1089-98.	7.1	93
162	Activated Ras requires autophagy to maintain oxidative metabolism and tumorigenesis. Genes and Development, 2011, 25, 460-470.	5.9	1,093

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163	Divergent Effects of Human Cytomegalovirus and Herpes Simplex Virus-1 on Cellular Metabolism. PLoS Pathogens, 2011, 7, e1002124.	4.7	280
164	Remodeling of the Metabolome during Early Frog Development. PLoS ONE, 2011, 6, e16881.	2.5	59
165	Enhancing molecular discovery using descriptorâ€free rearrangement clustering techniques for sparse data sets. AICHE Journal, 2010, 56, 405-418.	3.6	1
166	Metabolomic Analysis via Reversed-Phase Ion-Pairing Liquid Chromatography Coupled to a Stand Alone Orbitrap Mass Spectrometer. Analytical Chemistry, 2010, 82, 3212-3221.	6.5	453
167	A network flow model for biclustering via optimal re-ordering of data matrices. Journal of Global Optimization, 2010, 47, 343-354.	1.8	12
168	The Common Feature of Leukemia-Associated IDH1 and IDH2 Mutations Is a Neomorphic Enzyme Activity Converting Î±-Ketoglutarate to 2-Hydroxyglutarate. Cancer Cell, 2010, 17, 225-234.	16.8	1,754
169	Growth-limiting Intracellular Metabolites in Yeast Growing under Diverse Nutrient Limitations. Molecular Biology of the Cell, 2010, 21, 198-211.	2.1	217
170	Regulatory and metabolic rewiring during laboratory evolution of ethanol tolerance in <i>E. coli</i>. Molecular Systems Biology, 2010, 6, 378.	7.2	141
171	Systems-Level Metabolic Flux Profiling Elucidates a Complete, Bifurcated Tricarboxylic Acid Cycle in <i>Clostridium acetobutylicum</i>. Journal of Bacteriology, 2010, 192, 4452-4461.	2.2	122
172	Metabolomic Changes Accompanying Transformation and Acquisition of Metastatic Potential in a Syngeneic Mouse Mammary Tumor Model. Journal of Biological Chemistry, 2010, 285, 9317-9321.	3.4	106
173	Quiescent Fibroblasts Exhibit High Metabolic Activity. PLoS Biology, 2010, 8, e1000514.	5.6	323
174	Achieving Optimal Growth through Product Feedback Inhibition in Metabolism. PLoS Computational Biology, 2010, 6, e1000802.	3.2	37
175	Autophagy and Metabolism. Science, 2010, 330, 1344-1348.	12.6	1,669
176	Metabolomic Analysis and Visualization Engine for LCâ^'MS Data. Analytical Chemistry, 2010, 82, 9818-9826.	6.5	571
177	Mass Spectrometry-Based Metabolomics of Yeast. Methods in Enzymology, 2010, 470, 393-426.	1.0	45
178	Cancer-associated IDH1 mutations produce 2-hydroxyglutarate. Nature, 2009, 462, 739-744.	27.8	3,315
179	Absolute metabolite concentrations and implied enzyme active site occupancy in Escherichia coli. Nature Chemical Biology, 2009, 5, 593-599.	8.0	1,588
180	Metabolomicsâ€driven quantitative analysis of ammonia assimilation in <i>E. coli</i>. Molecular Systems Biology, 2009, 5, 302.	7.2	168

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181	Analytical strategies for LCâ€"MS-based targeted metabolomics. Journal of Chromatography B: Analytical Technologies in the Biomedical and Life Sciences, 2008, 871, 236-242.	2.3	416
182	Systems-level metabolic flux profiling identifies fatty acid synthesis as a target for antiviral therapy. Nature Biotechnology, 2008, 26, 1179-1186.	17.5	562
183	A domino effect in antifolate drug action in Escherichia coli. Nature Chemical Biology, 2008, 4, 602-608.	8.0	106
184	Absolute quantitation of intracellular metabolite concentrations by an isotope ratio-based approach. Nature Protocols, 2008, 3, 1299-1311.	12.0	346
185	Kinetic flux profiling for quantitation of cellular metabolic fluxes. Nature Protocols, 2008, 3, 1328-1340.	12.0	243
186	Dissecting Enzyme Regulation by Multiple Allosteric Effectors: Nucleotide Regulation of Aspartate Transcarbamoylase. Biochemistry, 2008, 47, 5881-5888.	2.5	17
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