Marie Sissler

List of Publications by Year
in descending order

31 papers	1,332 citations	471509 17 h-index	501196 28 g-index
32 all docs	32 docs citations	32 times ranked	1859 citing authors

#	Article	IF	Citations
1	Mitochondrial aspartyl-tRNA synthetase deficiency causes leukoencephalopathy with brain stem and spinal cord involvement and lactate elevation. Nature Genetics, 2007, 39, 534-539.	21.4	415
2	Recent Advances in Mitochondrial Aminoacyl-tRNA Synthetases and Disease. Trends in Molecular Medicine, 2017, 23, 693-708.	6.7	132
3	Toward the Full Set of Human Mitochondrial Aminoacyl-tRNA Synthetases:Â Characterization of AspRS and TyrRSâ€. Biochemistry, 2005, 44, 4805-4816.	2.5	127
4	Mutations of Human NARS2, Encoding the Mitochondrial Asparaginyl-tRNA Synthetase, Cause Nonsyndromic Deafness and Leigh Syndrome. PLoS Genetics, 2015, 11, e1005097.	3.5	97
5	Aminoacylation properties of pathology-related human mitochondrial tRNALys variants. Rna, 2004, 10, 841-853.	3.5	52
6	Recognition of Human Mitochondrial tRNALeu(UUR) by its Cognate Leucyl-tRNA Synthetase. Journal of Molecular Biology, 2004, 339, 17-29.	4.2	47
7	When a common biological role does not imply common disease outcomes: Disparate pathology linked to human mitochondrial aminoacyl-tRNA synthetases. Journal of Biological Chemistry, 2019, 294, 5309-5320.	3.4	46
8	Structure of the mature kinetoplastids mitoribosome and insights into its large subunit biogenesis. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 29851-29861.	7.1	42
9	MiSynPat: An integrated knowledge base linking clinical, genetic, and structural data for disease-causing mutations in human mitochondrial aminoacyl-tRNA synthetases. Human Mutation, 2017, 38, 1316-1324.	2.5	37
10	Thermodynamic properties distinguish human mitochondrial aspartyl-tRNA synthetase from bacterial homolog with same 3D architecture. Nucleic Acids Research, 2013, 41, 2698-2708.	14.5	32
11	Loss of a Primordial Identity Element for a Mammalian Mitochondrial Aminoacylation System*. Journal of Biological Chemistry, 2006, 281, 15980-15986.	3.4	31
12	Pathogenic mutations causing LBSL affect mitochondrial aspartyl-tRNA synthetase in diverse ways. Biochemical Journal, 2013, 450, 345-350.	3.7	31
13	Neurodegenerative disease-associated mutants of a human mitochondrial aminoacyl-tRNA synthetase present individual molecular signatures. Scientific Reports, 2015, 5, 17332.	3.3	31
14	Pathogenic Implications of Human Mitochondrial Aminoacyl-tRNA Synthetases. Topics in Current Chemistry, 2013, 344, 247-292.	4.0	26
15	Two proteomic methodologies for defining N-termini of mature human mitochondrial aminoacyl-tRNA synthetases. Methods, 2017, 113, 111-119.	3.8	24
16	Adaptation of aminoacylation identity rules to mammalian mitochondria. Biochimie, 2012, 94, 1090-1097.	2.6	22
17	A human pathology-related mutation prevents import of an aminoacyl-tRNA synthetase into mitochondria. Biochemical Journal, 2011, 433, 441-446.	3.7	20
18	Idiosyncrasies in decoding mitochondrial genomes. Biochimie, 2014, 100, 95-106.	2.6	17

#	Article	IF	Citations
19	Peculiar inhibition of human mitochondrial aspartyl-tRNA synthetaseby adenylate analogs. Biochimie, 2009, 91, 596-603.	2.6	16
20	Handling mammalian mitochondrial tRNAs and aminoacyl-tRNA synthetases for functional and structural characterization. Methods, 2008, 44, 176-189.	3.8	15
21	Phenotypic diversity of brain MRI patterns in mitochondrial aminoacyl-tRNA synthetase mutations. Molecular Genetics and Metabolism, 2021, 133, 222-229.	1.1	15
22	How to fold and protect mitochondrial ribosomal RNA with fewer guanines. Nucleic Acids Research, 2018, 46, 10946-10968.	14.5	14
23	Re-designed N-terminus enhances expression, solubility and crystallizability of mitochondrial protein. Protein Engineering, Design and Selection, 2012, 25, 473-481.	2.1	12
24	Three human aminoacyl-tRNA synthetases have distinct sub-mitochondrial localizations that are unaffected by disease-associated mutations. Journal of Biological Chemistry, 2018, 293, 13604-13615.	3.4	12
25	Peculiarities of aminoacyl-tRNA synthetases from trypanosomatids. Journal of Biological Chemistry, 2021, 297, 100913.	3.4	6
26	Released selective pressure on a structural domain gives new insights on the functional relaxation of mitochondrial aspartyl-tRNA synthetase. Biochimie, 2014, 100, 18-26.	2.6	5
27	Mitoribosome assembly comes into view. Nature Structural and Molecular Biology, 2021, 28, 631-633.	8.2	3
28	Translation in Mammalian Mitochondria: Order and Disorder Linked to tRNAs and Aminoacyl-tRNA Synthetases. , 2013, , 55-83.		2
29	Decoding the impact of disease-causing mutations in an essential aminoacyl-tRNA synthetase. Journal of Biological Chemistry, 2021, 297, 101386.	3.4	2
30	What is so special about neuronal translation? (comment on DOI 10.1002/bies.201600052). BioEssays, 2016, 38, 816-816.	2.5	0
31	Purification of Mitochondrial Ribosomal Complexes from Trypanosoma cruzi and Leishmania tarentolae for Cryo-EM Analysis. Bio-protocol, 2022, 12, .	0.4	0