Edwin A Schauble

List of Publications by Year
in descending order

38 papers	5,072 citations	159585 30 h-index	315739 38 g-index
38 all docs	38 docs citations	38 times ranked	3880 citing authors

#	Article	IF	Citations
1	Mass Dependence of Equilibrium Oxygen Isotope Fractionation in Carbonate, Nitrate, Oxide, Perchlorate, Phosphate, Silicate, and Sulfate Minerals. Reviews in Mineralogy and Geochemistry, 2021, 86, 137-178.	4.8	23
2	Theoretical constraints on the effects of added cations on clumped, oxygen, and carbon isotope signatures of dissolved inorganic carbon species and minerals. Geochimica Et Cosmochimica Acta, 2020, 269, 496-539.	3.9	17
3	Kinetic and equilibrium Ca isotope effects in high-T rocks and minerals. Earth and Planetary Science Letters, 2019, 517, 71-82.	4.4	59
4	Stable Te isotope fractionation in tellurium-bearing minerals from precious metal hydrothermal ore deposits. Geochimica Et Cosmochimica Acta, 2017, 202, 215-230.	3.9	15
5	Equilibrium Fractionation of Non-traditional Isotopes: a Molecular Modeling Perspective. Reviews in Mineralogy and Geochemistry, 2017, 82, 27-63.	4.8	71
6	A model for ¹²CH₂D₂ and ¹³CH₃D as complementary tracers for the budget of atmospheric CH₄. Global Biogeochemical Cycles, 2017, 31, 1387-1407.	4.9	19
7	Extreme enrichment in atmospheric ¹⁵ N ¹⁵ N. Science Advances, 2017, 3, eaao6741.	10.3	31
8	Mass Fractionation Laws, Mass-Independent Effects, and Isotopic Anomalies. Annual Review of Earth and Planetary Sciences, 2016, 44, 709-783.	11.0	190
9	High-temperature equilibrium isotope fractionation of non-traditional stable isotopes: Experiments, theory, and applications. Chemical Geology, 2015, 395, 176-195.	3.3	163
10	Theoretical modeling of rhenium isotope fractionation, natural variations across a black shale weathering profile, and potential as a paleoredox proxy. Earth and Planetary Science Letters, 2015, 430, 339-348.	4.4	25
11	Beyond temperature: Clumped isotope signatures in dissolved inorganic carbon species and the influence of solution chemistry on carbonate mineral composition. Geochimica Et Cosmochimica Acta, 2015, 166, 344-371.	3.9	104
12	Stable strontium isotope fractionation in synthetic barite. Geochimica Et Cosmochimica Acta, 2014, 147, 58-75.	3.9	43
13	Frontiers of stable isotope geoscience. Chemical Geology, 2014, 372, 119-143.	3.3	99
14	Silicon isotope fractionation in silicate minerals: Insights from first-principles models of phyllosilicates, albite and pyrope. Geochimica Et Cosmochimica Acta, 2014, 134, 137-154.	3.9	85
15	Theoretical constraints on the effects of pH, salinity, and temperature on clumped isotope signatures of dissolved inorganic carbon species and precipitating carbonate minerals. Geochimica Et Cosmochimica Acta, 2014, 125, 610-652.	3.9	123
16	Estimation of nuclear volume dependent fractionation of mercury isotopes in equilibrium liquidâ€“vapor evaporation experiments. Chemical Geology, 2013, 336, 5-12.	3.3	138
17	Modeling nuclear volume isotope effects in crystals. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 17714-17719.	7.1	29
18	Spectroscopic and X-ray diffraction investigation of the behavior of hanksite and tychite at high pressures, and a model for the compressibility of sulfate minerals. American Mineralogist, 2013, 98, 1543-1549.	1.9	5

#	Article	IF	Citations
19	Polymerization of aqueous silica in H2Oâ€“K2O solutions at 25â€“200Â°C and 1bar to 20kbar. Chemical Geology, 2011, 283, 161-170.	3.3	59
20	Calculation of equilibrium stable isotope partition function ratios for aqueous zinc complexes and metallic zinc. Geochimica Et Cosmochimica Acta, 2011, 75, 769-783.	3.9	83
21	First-principles estimates of equilibrium magnesium isotope fractionation in silicate, oxide, carbonate and hexaaquamagnesium(2+) crystals. Geochimica Et Cosmochimica Acta, 2011, 75, 844-869.	3.9	225
22	Isotopic Evidence of Cr Partitioning into Earthâ€™s Core. Science, 2011, 331, 1417-1420.	12.6	92
23	Body temperatures of modern and extinct vertebrates from ¹³ C- ¹⁸ O bond abundances in bioapatite. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 10377-10382.	7.1	138
24	Effects of changing solution chemistry on Fe3+/Fe2+ isotope fractionation in aqueous Feâ€“Cl solutions. Geochimica Et Cosmochimica Acta, 2010, 74, 6669-6689.	3.9	66
25	Metalâ€“silicate silicon isotope fractionation in enstatite meteorites and constraints on Earth's core formation. Earth and Planetary Science Letters, 2010, 295, 487-496.	4.4	90
26	Experimentally determined Si isotope fractionation between silicate and Fe metal and implications for Earth's core formation. Earth and Planetary Science Letters, 2009, 288, 228-234.	4.4	115
27	Experimental studies of equilibrium iron isotope fractionation in ferric aquoâ€“chloro complexes. Geochimica Et Cosmochimica Acta, 2009, 73, 2366-2381.	3.9	51
28	Modeling the effects of bond environment on equilibrium iron isotope fractionation in ferric aquo-chloro complexes. Geochimica Et Cosmochimica Acta, 2008, 72, 1939-1958.	3.9	97
29	Characterization of calcium isotopes in natural and synthetic barite. Geochimica Et Cosmochimica Acta, 2008, 72, 5641-5658.	3.9	57
30	Role of nuclear volume in driving equilibrium stable isotope fractionation of mercury, thallium, and other very heavy elements. Geochimica Et Cosmochimica Acta, 2007, 71, 2170-2189.	3.9	405
31	Silicon in the Earthâ€™s core. Nature, 2007, 447, 1102-1106.	27.8	278
32	13Câ€“18O bonds in carbonate minerals: A new kind of paleothermometer. Geochimica Et Cosmochimica Acta, 2006, 70, 1439-1456.	3.9	707
33	Preferential formation of 13Câ€“18O bonds in carbonate minerals, estimated using first-principles lattice dynamics. Geochimica Et Cosmochimica Acta, 2006, 70, 2510-2529.	3.9	395
34	Theoretical estimates of equilibrium chromium-isotope fractionations. Chemical Geology, 2004, 205, 99-114.	3.3	165
35	18O13C16O in Earthâ€™s atmosphere. Geochimica Et Cosmochimica Acta, 2004, 68, 4767-4777.	3.9	291
36	Equilibrium thermodynamics of multiply substituted isotopologues of molecular gases. Geochimica Et Cosmochimica Acta, 2004, 68, 4779-4797.	3.9	279

#	Article	IF	Citations
37	Theoretical estimates of equilibrium chlorine-isotope fractionations. Geochimica Et Cosmochimica Acta, 2003, 67, 3267-3281.	3.9	143
38	A Stable Isotope Study of Anorogenic Magmatism in East Central Asia. Journal of Petrology, 1996, 37, 1063-1095.	2.8	97