

Clara L. Blättler

University of Chicago
Dept. of the Geophysical Sciences
5734 S. Ellis Ave., Chicago, IL 60637

617-678-6211
cblattler@uchicago.edu
<https://geosci.uchicago.edu/people/clara-blaettler/>

EDUCATION

2012 DPhil: University of Oxford, Earth Sciences
2008 AB: Harvard College, Earth and Planetary Sciences

PROFESSIONAL APPOINTMENTS

2018– Assistant Professor, University of Chicago, Dept. of the Geophysical Sciences
2012–2018 Postdoctoral fellow/associate, Princeton University, Dept. of Geosciences
2015–2018 Simons Foundation Postdoctoral Fellow
2012–2014 Agouron Institute Postdoctoral Fellow

HONORS AND AWARDS

2015 Simons Foundation Fellowship, Collaboration on the Origins of Life
2012 Agouron Institute Geobiology Fellowship
2008 Rhodes Scholarship (Massachusetts and University College)
2008 Phi Beta Kappa (Harvard College)
2005, 2006 John Harvard Scholarship
2005 Detur Book Prize

PUBLICATIONS

Submitted articles:

---- Swart, P.K., **Blättler, C.L.**, Nakakuni, M., Mackenzie, G.J., Betzler, C., Eberli, G.P., Reolid, J., Alonso-García, M., Slagle, A.L., Wright, J.D., Kroon, D., Reijmer, J.J.G., Ling Hui Mee, A., Young, J.R., Alvarez-Zarikian, C.A., Bialik, O.M., Guo, J.A., Haffen, S., Horozal, S., Inoue, M., Jovane, L., Lanci, L., Laya, J.C., Lüdmann, T., Nath, B.N., Niino, K., Petruny, L.M.,

- Pratiwi, S.D., Su, X., Sloss, C.R., Yao, Z. Cyclic anoxia and sapropel formation in Early Miocene sediments from the Maldives Archipelago. In review at *Earth and Planetary Science Letters*.
- Kunkelova, T., Jung, S.J.A., de Leau, E.S., Odling, N., Thomas, A., Betzler, C., Eberli, G.P., Alvarez-Zarikian, C.A., Alonso-García, M., Bialik, O.M., **Blättler, C.L.**, Guo, J.A., Haffen, S., Horozal, S., Ling Hui Mee, A., Inoue, M., Jovane, L., Lanci, L., Laya, J.C., Lüdmann, T., Nath, B.N., Nakakuni, M., Niino, K., Petruny, L.M., Pratiwi, S.D., Reijmer, J.J.G., Reolid, J., Slagle, A.L., Sloss, C.R., Su, X., Swart, P.K., Wright, J.D., Yao, Z., Young, J.R., Hayman, S., Spezzaferri, S., Kroon, D. A 2 million year record of continental aridity from the Maldives. In review at *Progress in Earth and Planetary Science*.

Peer-reviewed articles:

- 2018 Pruss, S.B., **Blättler, C.L.**, Macdonald, F.A., Higgins, J.A. Calcium isotope evidence that the earliest metazoan biomineralizers formed aragonite shells. *Geology*, in press. doi: 10.1130/G45275.1.
- 2018 Lüdmann, T., Betzler, C., Eberli, G.P., Reolid, J., Reijmer, J.J.G., Sloss, C.R., Bialik, O.M., Alvarez-Zarikian, C.A., Alonso-García, M., **Blättler, C.L.**, Guo, J.A., Haffen, S., Horozal, S., Inoue, M., Jovane, L., Kroon, D., Lanci, L., Laya, J.C., Ling Hui Mee, A., Nakakuni, M., Nath, B.N., Niino, K., Petruny, L.M., Pratiwi, S.D., Slagle, A.L., Su, X., Swart, P.K., Wright, J.D., Yao, Z., Young, J.R. Carbonate delta drift: A new sediment drift type. *Marine Geology* 401, 98–111. doi:10.1016/j.margeo.2018.04.011.
- 2018 **Blättler, C.L.**, Claire, M.W., Prave, A.R., Kirsimäe, K., Higgins, J.A., Medvedev, P.V., Romashkin, A.E., Rychanchik, D.V., Zerkle, A.L., Paiste, K., Kreitsmann, T., Millar, I.L., Hayles, J.A., Bao, H., Turchyn, A.V., Warke, M.R., Lepland, A. Two-billion-year-old evaporites capture Earth's great oxidation. *Science* 360, 320–323. doi:10.1126/science.aar2687.
- 2018 Ahm, A.S.C., Bjerrum, C.J., **Blättler, C.L.**, Swart, P.K., Higgins, J.A. Quantifying early marine diagenesis in shallow-water carbonate sediments. *Geochimica et Cosmochimica Acta* 236, 140–159. doi:10.1016/j.gca.2018.02.042.
- 2018 Betzler, C., Eberli, G.P., Lüdmann, T., Reolid, J., Kroon, D., Reijmer, J.J.G., Swart, P.K., Wright, J., Young, J.R., Alvarez-Zarikian, C., Alonso-García, M., Bialik, O.M., **Blättler, C.L.**, Guo, J.A., Haffen, S., Horozal, S., Inoue, M., Jovane, L., Lanci, L., Laya, J.C., Hui Mee, A.L., Nakakuni, M., Nath, B.N., Niino, K., Petruny, L.M., Pratiwi, S.D., Slagle, A.L., Sloss, C.R., Su, X., Yao, Z. Refinement of Miocene sea level and monsoon events

- from the sedimentary archive of the Maldives (Indian Ocean). *Progress in Earth and Planetary Science* 5, 18 pp. doi: 10.1186/s40645-018-0165-x.
- 2018 Higgins, J.A., **Blättler, C.L.**, Lundstrom, E.A., Santiago-Ramos, D.P., Akhtar, A.A., Crüger Ahm, A.-S., Bialik, O., Holmden, C., Bradbury, H., Murray, S.T., Swart, P.K. Mineralogy, early marine diagenesis, and the chemistry of shallow-water carbonate sediments. *Geochimica et Cosmochimica Acta* 220, 512–534. doi: 10.1016/j.gca.2017.09.046.
- 2017 **Blättler, C.L.**, Higgins, J.A. Testing Urey’s carbonate–silicate cycle using the calcium isotopic composition of sedimentary carbonates. *Earth and Planetary Science Letters* 479, 241–251. doi: 10.1016/j.epsl.2017.09.033.
- 2017 **Blättler, C.L.**, Kump, L.R., Fischer, W.W., Paris, G., Kasbohm, J.J., Higgins, J.A. Constraints on ocean carbonate chemistry and pCO₂ in the Archaean and Palaeoproterozoic. *Nature Geoscience* 10, 41–45. doi: 10.1038/ngeo2844.
- 2016 Betzler, C., Eberli, G.P., Kroon, D., Wright, J.D., Swart, P.K., Nath, B.N., Alvarez-Zarikian, C.A., Alonso-García, M., Bialik, O.M., **Blättler, C.L.**, Guo, J.A., Haffen, S., Horozal, S., Inoue, M., Jovane, L., Lanci, L., Laya, J.C., Ling Hui Mee, A., Lüdmann, T., Nakakuni, M., Niino, K., Petruny, L.M., Pratiwi, S.D., Reijmer, J.J.G., Reolid, J., Slagle, A.L., Sloss, C.R., Su, X., Yao, Z., Young, J.R. The abrupt onset of the modern South Asian Monsoon winds. *Scientific Reports* 6, 29838. doi: 10.1038/srep29838.
- 2016 Gothmann, A.M., Bender, M.L., **Blättler, C.L.**, Swart, P.K., Giri, S.J., Adkins, J.F., Stolarski, J., Higgins, J.A. Calcium isotopes in scleractinian fossil corals since the Mesozoic: Implications for vital effects and biomineralization through time. *Earth and Planetary Science Letters* 444, 205–214. doi: 10.1016/j.epsl.2016.03.012.
- 2016 Owen, R.A., Day, C.C., Hu, C.-Y., Liu, Y.-H., Pointing, M.D., **Blättler, C.L.**, Henderson, G.M. Calcium isotopes in caves as a proxy for aridity: Modern calibration and application to the 8.2 kyr event. *Earth and Planetary Science Letters* 443, 129–138. doi: 10.1016/j.epsl.2016.03.027.
- 2015 **Blättler, C.L.**, Miller, N.R., Higgins, J.A. Mg and Ca isotope signatures of authigenic dolomite in siliceous deep-sea sediments. *Earth and Planetary Science Letters* 419, 32–42. doi:10.1016/j.epsl.2015.03.006.
- 2014 **Blättler, C.L.**, Higgins, J.A. Calcium isotopes in evaporites record variations in Phanerozoic seawater SO₄ and Ca. *Geology* 42, 711–714. doi:10.1130/G35721.1.
- 2014 **Blättler, C.L.**, Stanley, S.M., Henderson, G.M., Jenkyns, H.C. Identifying vital effects in *Halimeda* algae with Ca isotopes. *Biogeosciences* 11, 7202–7217. doi:10.5194/bg-11-7202-2014.

- 2012 **Blättler, C.L.**, Henderson, G.M., Jenkyns, H.C. Explaining the Phanerozoic Ca isotope history of seawater. *Geology* 40, 843–846. doi:10.1130/G33191.1.
- 2011 **Blättler, C.L.**, Jenkyns, H.C., Reynard, L.M., Henderson, G.M. Significant increases in global weathering during Oceanic Anoxic Events 1a and 2 indicated by calcium isotopes. *Earth and Planetary Science Letters* 309, 77–88. doi:10.1016/j.epsl.2011.06.029.

Other:

- 2017 Betzler, C., Eberli, G.P., Alvarez Zarikian, C.A., and the **Expedition 359 Scientists**, Maldives Monsoon and Sea Level. Proceedings of the International Ocean Discovery Program, 359: College Station, TX. doi:10.14379/iodp.proc.359.2017.

INVITED PRESENTATIONS

- 2018 Goldschmidt conference, keynote and invited oral presentation
University of Arizona, Department of Geosciences
Stanford University, School of Earth, Energy & Environmental Sciences,
Department of Geological Sciences
University of Miami, Rosenstiel School of Marine & Atmospheric Science,
Department of Marine Geosciences
University of California, Santa Barbara, Department of Earth Science
University of Wisconsin–Madison, Department of Geoscience
University of Chicago, Department of the Geophysical Sciences
- 2017 AGU Fall Meeting, invited oral presentation
Geobiology Society Conference
Cornell University, Department of Earth and Atmospheric Sciences
University of California, Santa Cruz, Department of Earth and Planetary Sciences
Washington University in St. Louis, Department of Earth and Planetary Sciences
USGS Rocky Mountain Science Seminar
- 2016 Johns Hopkins University, Department of Earth and Planetary Sciences
Brown University, Department of Earth, Environmental and Planetary Sciences
Texas A&M University, Department of Geology and Geophysics
University of California, Berkeley, Department of Earth and Planetary Science
Lamont-Doherty Earth Observatory, Geochemistry Seminar
Yale University, Department of Geology & Geophysics
- 2015 MIT, Department of Earth, Atmospheric, and Planetary Sciences, COG3 Seminar
WHOI, Department of Marine Chemistry & Geochemistry

2014	AGU Fall Meeting, invited oral presentation Harvard University, Department of Earth and Planetary Sciences, Geobiology/ Paleobiology Seminar
2012	Rutgers University, Department of Earth and Planetary Sciences Binghamton University, Department of Geological Sciences and Environmental Studies

FIELD / SEAGOING EXPERIENCE

2015	IODP Expedition 359, Maldives Monsoon and Sea Level (JOIDES Resolution)
2014	Agouron Advanced Geobiology Field Course
2013	Site Survey Cruise RR1313 (R/V Roger Revelle)
2011	Sampling in the Cretaceous Chalk, England
2010	Assistant to K. Amor: Younger Dryas sediments, various locations in US/Canada
2007	Assistant to P.F. Hoffman and S.B. Pruss: Neoproterozoic Otavi Group, Namibia

OUTREACH AND SERVICE

2017	IODP-ECORD ‘School of Rock’, Brussels
2017	American Chemical Society ‘National Chemistry Week’, Princeton
2015–2018	Women In STEM Leadership Council, Princeton University
2015–2018	PWiGS (Princeton Women in Geosciences) co-leader
2013–2017	PWiGS (Princeton Women in Geosciences) mentor
2012	UNIQ summer school tutorial leader, University of Oxford
2008–2012	Student representative to the Graduate Student Forum, University of Oxford

Reviewer for:

Astrobiology
 ACS Petroleum Research Fund
Biogeosciences
Chemical Geology
Climate of the Past
Earth and Planetary Science Letters
Geobiology
Geochimica et Cosmochimica Acta
The Geological Society of America Bulletin
Geology
JGR-Biogeosciences

Nature Communications

Nature Geoscience

NERC

NSF

PNAS

Science Advances

Sedimentology

Memberships:

American Geophysical Union (Paleoceanography & Paleoclimatology)

The Geochemical Society

Earth Science Women's Network

updated Aug. 2018