James E. Silliman

Texas A&M University - Corpus Christi Department of Physical and Life Sciences 6300 Ocean Drive, Corpus Christi, TX 78412

Tel: (361) 825-3718; Fax: (361) 825-3719; Email: silliman@falcon.tamucc.edu

Educational Background:

- Ph.D. Marine Geology and Geochemistry, University of Michigan, 1998
- M.S. Chemistry, John Carroll University, 1989
- B.S. Geology, Muskingum College, 1980

Professional Experience:

Assistant Professor of Chemistry and Geology, Texas A&M University-Corpus Christi, Department of Physical and Life Sciences, Corpus Christi, TX, 2001-Present.

Post-Doctoral Fellow, Geological Survey of Canada, Calgary, Alberta. 1999 – 2001.

Post-Doctoral Researcher, The University of Florida, Department of Fisheries and Aquatic Sciences, Gainesville, FL, 1998 – 1999.

Graduate Student Associate, The University of Michigan, Center for Research on Learning and Teaching, Ann Arbor, MI, 1997-1998.

Interdisciplinary Associate, The University of Michigan, Center for Research on Learning and Teaching, Ann Arbor, MI, 1995-1996.

Research/Materials Chemist, The Sherwin Williams Co., Cleveland, OH, 1987-1993.

Research Interests:

Sedimentary and biological records of climate and environmental change • Biogeochemical applications to the paleontological record • Environmental education.

Publications:

- Louchouarn, P., Naehr, T.H. and **Silliman, J.** Submitted. Elemental, Stable Isotopic (δ¹³C), and Molecular Signatures of Organic Matter in Holocene-Late Pleistocene Sediments from the Peru Margin (Site 1229). *Proceedings, Ocean Drilling Program, Scientific Results*, **201**.
- Silliman, J.E. and Schelske, C.L. 2003. Saturated hydrocarbons in the sediments of Lake Apopka, Florida. *Organic Geochemistry*, **34**, 253-260.
- Obermajer, M., Osadetz, K.G., Fowler, M.G., **Silliman, J.**, Hansen, W.B., Clark, M. 2002. Delineating compositional variabilities among crude oils from Central Montana, USA, using light hydrocarbon and biomarker characteristics. *Organic Geochemistry*, **33**, 1343-1359.
- Silliman, J.E., Li, M., Yao, H., and Hwang, R. 2002. Molecular distributions and geochemical implications of pyrrolic nitrogen compounds in the Permian Phosphoria-derived oils of Wyoming. *Organic Geochemistry*, 33, 527-544.
- Silliman, J.E., Meyers, P.A., Eadie, B.J, and Klump, J.V. 2001. An Hypothesis for the Origin of Perylene Based on Its Low Abundance in Sediments of Green Bay, Wisconsin. *Chemical Geology*, **177**, 309-322.
- Silliman, J.E., Meyers, P.A., Ostrom, P., Ostrom, N., and Eadie, B.J. 2000. Insights into the origin of perylene from isotopic analyses of sediments from Saanich Inlet, British Columbia. *Organic Geochemistry*, **31**, 1133-1142.
- Obermajer, M., **Silliman, J.E.,** Osadetz, K.G., and Hansen, W.B. 2000. Organic geochemistry and biomarker compositions of crude oils from eastern and central Montana, USA. *Montana Geological Society's* 50th *Anniversary Guidebook*, **1**, 47-63.

- Silliman, J.E., Meyers, P.A., and Eadie, B.J. 1998. Perylene: an indicator of alteration processes or precursor materials? *Organic Geochemistry*, **29**, 1737-1744.
- Meyers, P.A., **Silliman, J.E.**, and Shaw, T.J. 1996. Effects of turbidity flows on organic matter accumulation, sulfate reduction, and methane generation in deep-sea sediments on the Iberia Abyssal Plain. *Organic Geochemistry*, **25**, 69-78.
- Silliman, J.E., Meyers, P.A., and Bourbonniere, R.A. 1996. Record of postglacial organic matter delivery and burial in sediments of Lake Ontario. *Organic Geochemistry*, **24**, 463-472.
- Meyers, P.A. and Silliman, J.E. 1996. Organic Matter in Pleistocene to Pliocene turbidites from Sites 897, 898, 899, and 900, Iberia Abyssal Plain. In: R.B. Whitmarsh, D.S. Sawyer, et al., *Proceedings, Ocean Drilling Program, Scientific Results*, 149, 305-313.

Collaborators:

Meyers, P.A. (University of Michigan); Obermajer, M. (Geological Survey of Canada-Calgary); Osadetz K.G. (Geological Survey of Canada-Calgary); Ostrom, P. (Michigan State University); Ostrom, N. (Michigan State University); Schelske, C.L. (University of Florida).

Educational Contributions:

- Develop geoscience lab activities for public middle school students in South Texas (2003-present).
- Designed, coordinated, and facilitated teaching development activities for new Teaching Assistants in the Department of Geological Sciences at the University of Michigan (1995-1996).

Graduate Advisors:

Postdoctoral Advisor: Maowen Li, Geological Survey of Canada-Calgary; Ph. D. Advisor: Philip A. Meyers, University of Michigan; M.S. Advisor: David Ewing, John Carroll University.

Honors and Awards:

2005-2006: University Research Enhancement Grant, PI (Texas A&M University-Corpus Christi, \$14,107)
2003-2006: Acquisition of a GC/MS System for Enhancement of Research/Teaching at Texas A&M University-Corpus Christi, Co-PI (NSF-MRI/REU, 0321201, \$142,385)
2003-2006: The Cabeza de Vaca Earthmobile Program, PI (NSF-OEDG, 0303139, \$580,868)
2002-2005: Ocean Drilling Program Grant for Climate Research, Co-PI (ODP, \$25,042)
2002-2003: College Research Enhancement Grant, PI (Texas A&M University-Corpus Christi, \$4000)
1997-1998: Geology Kruger/Alumni Merit Research Fellowship (University of Michigan, \$17,000)
1996: Geology Scott Turner Research Grant (University of Michigan, \$1200)