

DONALD CHARLES BARBER, PHD

Associate Professor of Geology on the Harold Alderfer Chair in Environmental Studies
Director of Environmental Studies, Bryn Mawr College

EDUCATION

2001	PhD, Geological Sciences	University of Colorado, Boulder, CO.
1995	MS, Geological Sciences	University of Maine, Orono, ME.
1991	BS, Geology	Duke University, Durham, NC.

ACADEMIC EMPLOYMENT

2006 - present	Associate Professor, Department of Geology, Bryn Mawr College, PA.
2001 - 2005	Assistant Professor, Department of Geology, Bryn Mawr College, PA.

SELECTED PUBLICATIONS

- Magee, P., H.-P. Uerpmann, M. Uerpmann, S.A. Jasim, M. Handel, **D.C. Barber**, C. Fritz and E. Hammer. (2009) Multidisciplinary research on the past human ecology of the east Arabian coast: excavations at Hamriya and Tell Abraq (Emirate of Sharjah, United Arab Emirates). *Arabian Archaeology & Epigraphy*. 20, 18-29.
- Kelley, J.T., **D.C. Barber**, D.F. Belknap, D.M. FitzGerald, S. van Heteren, S.M. Dickson. (2005) Sand budgets at geological, historical and contemporary time scales for a developed beach system, Saco Bay, Maine, USA. *Marine Geology* 214, 117-142.
- Magee, P., **D.C. Barber**, M. Sobur, S. Jasim. (2005) Sourcing Iron Age softstone artifacts in southeastern Arabia: Results from a programme of analysis using inductively coupled plasma-mass spectrometry/optical emission spectrometry (ICP-MS/OES). *Arabian Archaeology & Epigraphy*. 16, 129-143.
- Kelley, J.T., S.M. Dickson, D.F. Belknap, W.A. Barnhardt and **D.C. Barber**. (2003) Distribution and volume of sand bodies on the rocky, glaciated inner continental shelf of the northwestern Gulf of Maine. *Journal of Coastal Research* 19, 41-56.
- Farmer, G.L., **D.C. Barber**, J.T. Andrews. (2003) Nd, Sr and Pb isotopic compositions of late Quaternary ice proximal sediments in the northern North Atlantic. *Earth and Planetary Science Letters* 209, 227-243.
- Hemming, S.R., C.M. Hall, P.E. Biscaye, S.M. Higgins, B.D. Turrin, J.F. McManus, **D.C. Barber**, J.T. Andrews, W.S. Broecker (2002) $^{40}\text{Ar}/^{39}\text{Ar}$ step-heating spectra and $^{40}\text{Ar}^*$ concentrations of fine-grained sediment in North Atlantic Heinrich layers. *Chemical Geology*, 182, 583-603.
- Barber, D.C.**, A. Dyke, C. Hillaire-Marcel, A.E. Jennings, J.T. Andrews, M.W. Kerwin, G. Bilodeau, R. McNeely, J. Southon, M.D. Morehead, J.-M. Gagnon (1999) Forcing of the cold event 8200 years ago by outburst drainage of Laurentide lakes. *Nature*, 400, p. 344-348.

RECENT RESEARCH PRESENTATIONS

- “Geophysical prospecting for Mycenaean chamber tombs in ancient Nemea, Korinthia, Greece.” 44th Annual Meeting of the Northeastern Section, Geological Society of America, Portland, ME (March 2009).
- “Geohydrodynamic modeling of estuarine circulation in Hudson Strait.” National Ocean Sciences Meeting, Orlando, FL (March 2008).
- “Build, fortify, nourish—now what? Preservation of shoreline property in New Jersey.” Geological Society of America Annual National Meeting, Denver, CO (Oct 2007).
- “Geochemistry and mineralogy of Iron Age softstone artifacts compared with ancient ophiolitic quarry sites in southeast Arabia.” Geological Society of America Annual National Meeting, Denver, CO (Oct 2007).
- “The cold event 8,200 years ago: Cosmopolitan consequences of a provincial perturbation.” Pacific Climate Workshop (PACLIM), Pacific Grove, CA (May 2007).

MEMBERSHIPS IN PROFESSIONAL ORGANIZATIONS

1994 - present	Society for Sedimentary Geology (SEPM).
1991 - present	Geological Society of America.
1987 - present	American Geophysical Union.

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PEER REVIEWS FOR JOURNALS

Can. J. Earth Science, Earth & Planetary Science Letters, Environmental Management, Geology, GSA Bulletin, Geophys. Rev. Letters, J. Geoscience Educ., J. Quaternary Science, J. Sedimentary Research, Paleooceanography, Quaternary Research, Quat. Science Reviews.

PEER REVIEWS FOR FUNDING AGENCIES

National Science Foundation, Petroleum Research Fund (American Chemical Society).

COURSES TAUGHT AT BRYN MAWR COLLEGE

years taught

GEOL 103	Earth Systems and the Environment	2001; '02; '03; '05; '06; '08; '09
GEOL 205	Sedimentary Materials	2000; '01; '02; '05; '08; '09
GEOL 206	Energy Resources and Policy	2008
GEOL 209	Natural Hazards	2003; '04
GEOL 270	Geoarchaeology	2005; '07
GEOL 312	Quaternary Geology and Climate Change	2002; '06; '08
GEOL 314	Marine Geology	2001; '04; '07; '09
GEOL 350	Advanced Topics in Geology	2001; '05; 08
GEOL 397	Senior Seminar in Environmental Studies	2002; '07
GEOL 403	Supervised Research: Geology Thesis	2000; '02; '03; '04; '05; '07; '08; '09
GEOL 425	Praxis III: Energy Sustainability	2008

RESEARCH ADVISEES AND THEIR PRESENT POSITIONS (PARTIAL LIST)

Jessica Scheick AB '09, Staff Geologist, Geosyntec Consultants, Lawrenceville, NJ.

Alexi Ernstoff AB '08, presently in graduate school at the University of Michigan.

L. Camille Jones AB '08, presently in graduate school at the University of Delaware.

Matt Klinman AB '08, Development Associate, Metropolitan Waterfront Alliance, New York, NY.

Zoe Ruge AB '08, presently a research technician at the Academy of Natural Sciences, Philadelphia, PA.

Dr. Catherine Riihimaki, 2005-2007 Postdoctoral Fellow at Bryn Mawr College, now Assistant Professor of Environmental Science, Drew University, Madison, NJ.

Evan Pugh AB '07, presently in graduate school at the University of Colorado, Boulder.

Stephanie Olen AB '07, formerly employed by Bechtel Geophysics, West Chester, PA; presently a graduate student, University of Michigan.

Shannon Ulrich AB '06, formerly employed by Oak Ridge National Labs, Oak Ridge, TN; presently a graduate student, Colorado School of Mines.

Stephanie Nebel AB '05, Research Technician, Delaware Geological Survey; grad. student, Univ. Delaware.

Kira Diaz Tushman AB '04, Structural Geologist, BP, Houston, TX.

Rebecca Kraft AB '03, formerly employed by Alaska Department of Fisheries and Wildlife; presently a graduate student, University of Hawaii.

Kristen Bollman, MA '02, Geologist, Delaware Dept. Natural Resources & Environmental Control.

Andrea L. Friedman, AB '01, Geologist, New Jersey Geological Survey.