

THE OFFICIAL MAGAZINE OF THE OCEANOGRAPHY SOCIETY

Oceanography

CITATION

Garrison, T. 2009. The oceanography classroom: In praise of travel. *Oceanography* 22(3):268–269, doi:10.5670/oceanog.2009.89.

COPYRIGHT

This article has been published in *Oceanography*, Volume 22, Number 3, a quarterly journal of The Oceanography Society. Copyright 2009 by The Oceanography Society. All rights reserved.

USAGE

Permission is granted to copy this article for use in teaching and research. Republication, systematic reproduction, or collective redistribution of any portion of this article by photocopy machine, reposting, or other means is permitted only with the approval of The Oceanography Society. Send all correspondence to: info@tos.org or The Oceanography Society, PO Box 1931, Rockville, MD 20849-1931, USA.

In Praise of Travel

BY TOM GARRISON

A FAMOUS TEACHER once wrote, “You teach with what you are. You are only as good a teacher as you are, or are becoming, a person” (Pullias and Lockhart, 1963). Anyone with the good fortune to share a room with a gifted teacher will quickly notice that the information coming through that teacher invariably takes on some of his or her personal characteristics. In a sense, an excellent teacher acts as a prism, splitting and combining his or her feelings for the material being taught with the material itself in ways that project his or her own values and experiences.

Of course, a good teacher will thoroughly know the information to be presented, including its history, relevance to the larger topic, and technicalities. But in the process of teaching, that teacher’s life will intervene to put a unique stamp on the data being presented. A general level of enthusiasm for life, reading (from all fields), the teacher’s teachers, deeply held opinions, and what was on the lunch menu will all have an effect.

A surprisingly strong influence on teaching will be experiences gained during travel. Oceanography is among the most field-oriented of specialties, and, given its immense breadth, marine science involves each of us in

Tom Garrison (tomgarrison@sbcglobal.net) is an instructor at Orange Coast College, Costa Mesa, CA, USA.

some way nearly every time we step outdoors.

The travel process itself can be illuminating in unsuspecting ways that will invariably change a teacher’s perceptions and—memorably, one hopes—find its way into later lectures. Take, for example, Figure 1. I awoke from a shallow sleep to discover my fellow 747 passengers and I were hurtling across the northern Pacific at about 810 miles per hour assisted, clearly, by a vigorous jet stream clocking 225 mph. My attention was total! Nothing unusual to see outside (always demand a window seat), but the subtle motion of the airplane was unique in my experience. The ride was smooth, but at intervals of roughly three minutes, a slow but large-amplitude corkscrewing motion would begin. Each time this happened, our course changed by a small angle to the right, and then (three minutes later) to the left, and then to the right again, and so on. When we landed at San Francisco more than two hours early, I waited to talk to the captain about the experience. He told me he was as excited as I was, flying with autopilot disengaged across the jet stream from side to side, centering the aircraft in the fastest winds for what became a record-setting crossing from Hong Kong.

What had been, for me, an abstract



Figure 1. A jetliner rushes east across the Pacific with an assist from a very fast jet stream.

concept of rivers of air at the cores of atmospheric circulation cells became very real. A 30-second digression into the subject of that photo, and of my feelings in an airliner full of passengers oblivious to moving at such speed, makes the discussion of global wind patterns much more interesting to me and to my students. I surely teach the topic better because of that experience.

Sometimes marine forces intervene to change one’s nature and provide more than just a good story. I had long wanted to experience a tropical cyclone from the inside, and the opportunity accidentally arose a few summers ago in Hong Kong. I had joined our son during one of his frequent business trips to Asia when we learned a typhoon was imminent. As any rational father-son team would do in similar circumstances, we repaired to the Intercontinental Hotel bar (which has a



Figure 2. Onlookers watch as a Typhoon Bilis and some the world's tallest buildings intersect at Hong Kong harbor.



Figure 3. The Sydney Institute of Marine Science (SIMS), a not-for-profit marine research facility, was established in 2005 by four of Sydney's leading universities.



Figure 4. Sólfar, a stylized Viking longship, guards the approach to Reykjavik harbor, Iceland. An Arctic Tern, the world's longest-migrating bird, rests atop the prow.

spectacular view of the harbor through three-story-high windows) and ordered up some beers. When lightning began playing around the top of the world's third tallest building and the wind speed increased significantly (Figure 2), we moved away from the flexing windows and kept a firm grip on our drinks. Discretion being the better part of valor, we re-thought our exposure to potentially flying glass and hiked (with no little difficulty) to our hotel where we hunkered down to watch the storm. At its height, the raindrops pelting the bay windows sounded like hailstones. I was wisely prevented from going outside by the hotel staff, but the effect made an indelible impression and my discussion of storms is the better for it. The next day we discovered that the one-hour deluge was the greatest recorded in Hong Kong since records have been kept.

Again, travel enriches the teacher's armamentarium. It's one thing to point at diagrams of a tropical cyclone on a screen, and quite another to describe the violence and chaos from firsthand experience and then hold up the next morning's headline from the *South China Morning Times*. Yet another story.

Most of my family likes to lounge on beaches or shop during vacations. Not me. I find the nearest university with ocean connections and barge right in. Writing a widely used oceanography text helps open a few doors (even more opportunities arise when I offer to buy lunch). Marine research laboratories are always the most interesting places to collect information on state-of-the-art research to use in teaching, and my friends at Woods Hole Oceanographic Institution and Scripps Institution of Oceanography are invariably accommodating. Farther afield lie such places as Chowder Bay in Sydney Harbour (Figure 3), a consortium of four Australian universities dedicated to marine research and education, or the beautiful Cape d'Aguilar facility of Hong Kong University. As always, the most valued commodities at these places are enthusiasm and focus.

John Steinbeck once described marine scientists as the "...tenors of the scientific world" (Steinbeck, 1951). Few researchers are as enthusiastic as we are in sharing our work with colleagues, even ones who pop in unexpectedly. Spending time in active places finding

what's new is always time well spent, and sometimes situations simply take one's breath away (Figure 4). More grist for the teaching mill.

Those of us in academia have three primary obligations: research, teaching, and community service. If Earl Pullias's admonition is true, what better way to become a better person and teacher than to expose one's self to a combination of the planned and the accidental experiences travel offers? Go, introduce yourself, ask questions, look around.

Just remember to keep the airliner's window shade in the full-upright and locked position! ☒

REFERENCES

- Pullias, E.V., and A. Lockhart. 1963. *Toward Excellence in College Teaching*. W.C. Brown, 133 pp.
Steinbeck, J. 1951. *The Log from the Sea of Cortez*. The Viking Press, ~ 300 pp.