

Prof. Dawn Bazely's Sabbatical Report



30 June , 2012

The year July 1 2011 to June 30 2012

York University requires faculty on sabbatical to file a report. By making my report in a newsletter format, I hope that it will be more readable and more useful.



I had great fun on my third 12-month sabbatical since I arrived at York University in 1990. I returned to most of the sites where I had previously done

research, plus, got to visit some stunning new places.

This sabbatical was much more strategically planned than the previous two. I began thinking about July 1st 2011 in early 2010, and was, for a change, prepared for various fellowship deadlines well ahead of time. Everyone's sabbatical will, necessarily, be structured according to their current family circumstances. My first sabbatical was delayed by teaching duties in the wake of the 1997 YUFA strike, and was also punctuated by a maternity leave. I can barely remember it. My second sabbatical (2004-05) involved three one-month trips to Umeå, Sweden. It was more fruitful, publication-wise, than my first sabbatical, but my family circumstances (daughters being only 6 and 10 years old) meant that most of my time was actually spent in the basement library of Massey College, University of Toronto.

This year, I left my family in Toronto and headed to

Harvard Forest, Harvard University, Massachusetts for 6 months, followed by 3 months at the Zoology Department, Oxford University, where I had done my D.Phil and a post-doc in the 1980s. My family DID get to join me, occasionally, in Massachusetts, and they also came to the Bob Jefferies' Memorial Symposium that I and others organized, which was held in Churchill, Manitoba in August 2011.

Sustainability & IRIS

In February 2012, I taught in the SSHRC-funded Youth Climate Institute, with Prof. Steve Tufts (Geography), and organized with Prof. Carla Lipsig-Mummé (Social Science). High school students were introduced to the natural, physical and social sciences aspects of climate change, including the implications for politics and employment.



In June 2012, I visited the National Botanic Garden of Wales (above) over 2 days, to learn about the biodiversity research, public outreach and sustainability plans from Dr. Rosie Plummer, the director and her welcoming staff and volunteers.

Bob Jefferies' Memorial Symposium, Churchill, Manitoba, Canada

In August 2011, the new building of the Churchill Northern Studies Centre (centre below) was officially opened in a ribbon-cutting ceremony, and the symposium immediately followed. We celebrated the life and research legacy of Professor Bob (Robert L.) Jefferies (Botany Department, later the Ecology and Evolution Department) of the University of Toronto. In 1978, Bob began three decades of research on the plant ecology of Hudson Bay, that ended with his untimely death in 2009. Over 50 colleagues, former students, family and friends from around the world attended the Symposium and experienced the history and wildlife of the region.

A celebration and a reunion in Churchill, on Hudson Bay



In 1980, I began my field research career La Pérouse Bay, 30 km east of Churchill; I was a 3rd year U of T undergraduate in Bob Jefferies' lab. I spent a total of 5 summers on this sub-arctic salt-marsh, completing an M.Sc., near the the beginning of what went on to become one of the longest-running field-based plant ecology studies in North America. The even longer-running companion study of the Bay's lesser snow goose populations, led by Professor Fred Cooke (2nd from right) and later, others, began in 1968. Myself, Sue Jefferies (Bob's widow), Dr. Peter Ewins (WWF Canada) and Prof. Dave Hik (U of Alberta) organized the symposium with help from Bob's and Fred's colleagues and past students, Churchill Northern Studies Centre and Parks Canada staff.

A legacy for Bob Jefferies, Wapusk National Park and Churchill



The first 2 months of my sabbatical were not only taken up with intensive Symposium organizing, but also, with learning, from Andrea Kosavic, York University's Digital Initiatives Librarian, how to create an Open Access Digital Archive hosted by our Institutional Repository, Yorkspace. In 1996, Bob Jefferies' and Fred Cooke's long-term field site at La Pérouse Bay became part of the newly created Wapusk National Park. Bob and Fred were also mainstays of the Churchill Northern Studies Centre, which houses many other researchers. The *Churchill*

Communities of Knowledge Digital Collection brings together images, publications and other media from the long-term research on lesser snow geese and the salt-marshes at Pérouse Bay and Churchill. Both Wapusk National Park and the Churchill Northern Studies Centre will benefit from this open access collection, which is searchable on Google. Parks Canada has funded York University Research at York (RAY) Students to work on the Collection, led by the very able Biology undergraduate student, Ms. Netta Unterschats.

“We'll meet again... probably at a university... or, more likely, a pub”



The Bob Jefferies' Symposium kicked off one of the main themes of this sabbatical year, which was reconnecting with people from my graduate student years (1982-88), as well as with my former students from York University. On the way home to Toronto from Churchill, Manitoba, I visited Professor Stephane McLachlan (University of Manitoba), my first PhD student at York. At Uppsala University, Sweden, I visited doctoral students, Adriana Puentes (MSc Biology, York) and her husband, Gustaf Granath, who met when they worked in my lab. at York on fungal

endophytes of grasses. Other reunions, included lunch with former Ernest Cook Research Fellows from Somerville College, Oxford - Dr. Trudy Watt (ret'd Senior Tutor, Trinity College, Oxford - centre) and Prof. Amanda Vincent (UBC, Vancouver - right), as well as with Profs. Naomi Pearce (Harvard), Marion Dawkins and Alan Grafen (Oxford), who had provided excellent ideas for my graduate research. I also got to have a good series of chats with my D.Phil. supervisor, Professor Lord John Krebs and with Prof. Edith Hall, Classics and my best friend from St. Hugh's College, Oxford, days. 2



Harvard Forest

Harvard Forest of Harvard University has a separate campus located in central Massachusetts. The campus, plus several hundred hectares of forest,

lie to the northeast of Quabbin Reservoir (seen from the air, above). I lived here from Sept '11 to Feb '12.

Each year, from four to six Charles Bullard Fellowship recipients are selected from among dozens of mid-career applicants in an international competition. Fellowships go to those deemed likely to make an important contribution to forestry and forest-related subjects.

My 6-month Bullard Fellowship at “the Forest” was spent learning about the research being done there, reading enormous amounts of recent and past literature on New England forestry, forest ecology and landscape history, and having lively conversations with staff scientists, post-docs, and graduate students.

I hosted 3 young colleagues from Laval and Sherbrooke Universities, and from Rensselaer Polytechnic, New York, as seminar speakers. Plus, I gave two research seminars at the Forest and at the Organismal and Evolution Department at Harvard, Cambridge, and facilitated a 2 hour discussion asking “*Why don't ecologists (and scientists in general) get more respect?*”.



A book re-imagined

My main goal while at Harvard Forest was to rethink my book about the conservation biology of Southern Ontario. I proposed but never completed it in 1999. There is STILL no synthesis of the topic, yet more than ever, an accessible account of the landscape history, biology and conservation policies of the most developed part of Canada is needed.

Total immersion in the history and ecology of the New England landscapes, enabled me to restructure the original book proposal. Inspired by Harvard Forest colleagues, the re-designed book has the working title “Finding Ontario’s Southern

Forests”. It is aimed at policy-makers, and the broader US and Canadian public. I got even more inspiration while doing field work at Wytham Woods in Oxford (above) - the most researched forest in the world - in June 2012.

Seminars at Penn and Memorial Universities

Professor Femida Handy, whom I got to know during her time at York’s Faculty of Environmental Studies, is a Full Professor at Penn School of Social Policy and Practice (University of Pennsylvania). We have been collaborating on sustainability research, and Femida invited me to give a seminar in October 2011.

Professor Luise Hermanutz (above right), Biology Professor at Memorial U., Newfoundland, and I share a research interest in invasive species of northern ecosystems. In January 2012, I headed to St. John to give lectures in her Conservation Biology courses, and a research seminar.

My seminar, *Why don't ecologists (and scientists) get more respect?*, extended Harvard Forest conversations and my chapter in the International Polar Year book, *Environmental Change and Human Security in the Arctic*. Over 60 people attended on a Friday afternoon - testament to the power of a snappy title (& cheap beer).

Biodiversity Institute, Zoology, an Oxford Martin School



Oxford University *may* be famous for its Dreaming Spires, but the Tinbergen Building of the Zoology Department, where I sat, (at left) is a strong contender for the *Ugliest Building in Oxford* Award. A YUFA Sabbatical Leave Fellowship covered the steep bench fees for Oxford University and Professor Kathy Willis, the *Tasso Leventis Chair of Biodiversity*, and director of the *Biodiversity Institute* (an Oxford Martin School), was a warm and welcoming host, in the department where I did doctoral and post-doc research in the 1980s.

The Martin Schools are a series of interdisciplinary research centres, with varying mandates, spread across the university. The research interests of the Biodiversity Institute's bright graduate students and post-doctoral fellows overlap with much of the research that we have been doing at IRIS at York U: biofuels, biodiversity conservation and public outreach. I will continue my association with Oxford, as a Research Associate at the Biodiversity Institute.



International Polar Year final conference in Tromsø, Norway

In early June 2012, we held a wrap-up conference on the GAPS (Gas, Arctic Peoples and Security) project, that had begun 6 years earlier. I reported on the Canadian arm of the project and met Russian and Norwegian colleagues and students, some for the first time, and others after 2-3 years. The cool thing is that a number of us plan to continue to collaborate (see past and future Arctic research collaborators at left, in Tromsø)

Unexpected stuff, to which I could say yes, because I was on sabbatical

Writing the Oxford University Press Annotated Bibliography in *Grazing Ecology*

In March 2012, OUP contacted me. I knew that at the Radcliffe Science Library I could lay my hands on every book and journal that I would need to read or re-read in order to identify up to 150 of the key references on this topic. While in Oxford, I was hosted by Drs. Trudy Watt and Keith Kirby, who both have extensive research experience in Herbivory. So I said yes to OUP, and have nearly completed the Bibliography.

Symposium at the AAAS AGM in Vancouver, Canada, February 2012

Transcending Interdisciplinary Research Barriers: Best Practices for Mobilizing Knowledge

I have been both inspired and depressed by my experiences working in interdisciplinary, collaborative research groups in the sustainability space, while I was director of York University's IRIS. So, I proposed a 3-hour symposium at the first American Association for the Advancement of Science AGM to be held outside of the USA in decades. A diverse group of colleagues with broad experience in interdisciplinary, collaborative projects, discussed project results & best practices. I believe, more than ever, that academic institutions need to put their money where their vision statements are, and grasp the nettle and extreme challenge presented by using interdisciplinarity as a means of generating innovative solutions to *wicked* problems.

“Get the York University internet information about yourself updated!”

This was the message from Prof. Paul Harvey, FRS, when I arrived at Oxford in March 2012. Paul is outgoing chair of the Zoology Department, and a past mentor. I will follow this sound advice in July 2012. Having spent much of the last 6 years building the online reputation of IRIS and York University, it's my turn, now.