

Antarctica New Zealand Science Update (42) April 2009

1. **Antarctic Science Bidding Round 2009:** The Foundation for Research Science and Technology (FRST) and Antarctica NZ will run a joint process for allocating science funding (FRST funds) and Antarctic logistics (Ant NZ support) for the 2010/11 season and beyond. The FRST funding that will be part of this bidding round will come from current FRST Antarctic science contracts that end in September 2010. A document outlining the draft process and timeline for the bidding round this year was sent out to the Antarctic science community yesterday requesting feedback by 13 May 2009. If you have not yet received a copy and would like one contact Ed Butler.
2. **Possible Beardmore Helicopter Camp 2010/11:** We have had a number of recent discussions with the NSF about a camp in the Beardmore Glacier area. At this stage it looks likely that this will occur in the 2010/11 field season. If the plan for a Beardmore camp becomes more certain, there will be a need to reference this in the documentation for the 2009 bidding round. If you want to visit the Beardmore in 2010/11 you will need to submit an application in this year's bidding round for support. We'll keep you updated on any developments.
3. **Registration and abstract submission for the Annual Antarctic Conference will open May 1st.** The conference will be hosted and sponsored by the University of Auckland from 1-3 July 2009. All information can be found at: <http://www.antarcticanz.govt.nz/article/10566.html#19289>. An email reminder will be sent out when registration opens.
4. **PhD Research opportunity** at the University of Auckland on the recruitment processes in Antarctic silverfish. See information at the end of this Science update.
5. **The latest edition of the SCAR Newsletter** is now available to view on the SCAR website at: <http://www.scar.org/news/newsletters/issues2009/mar09.html>
6. **SCAR's Geosciences Newsletter** can be downloaded at: http://www.scar.org/researchgroups/geoscience/GeoReach_Feb09.pdf
7. **The latest SCAR Bulletin (number 171)** contains the report of this February's Cross-Linkages Workshop in Italy and is available to view and download at: <http://www.scar.org/publications/bulletins/>
8. **April APECS newsletter** can be downloaded at http://arcticportal.org/uploads/5-/HK/5-HKNKrbGDb_gezMgBDcUA/APECS-April-2009-Newsletter.pdf

Publications submitted to Ant NZ this month:

Adlam, L.S.

Soil climate and permafrost temperature monitoring in the McMurdo Sound region, Antarctica. M.Sc., University of Waikato, 2009.

Caruso, T., Hogg, I.D., Carapelli, A., Frati, F., Bargagli, R.

Large-scale spatial patterns in the distribution of Collembola (Hexapoda) species in Antarctic terrestrial ecosystems.

Journal of biogeography 36: 879-886 2009.

Clark, D., Lamare, M.D., Barker, M.

Response of sea urchin pluteus larvae (Echinodermata: Echinoidea) to reduced seawater pH: a comparison among a tropical, temperate, and a polar species.

Marine biology 156: 1125-1137 2009.

doi: 10.1007/s00227-009-1155-8

Griffith, G.P., Vennell, R., Lamare, M.D.

Diadinoxanthin cycle of the bottom ice algal community during spring in McMurdo Sound, Antarctica.

Polar biology 22:632-636 2009.

doi: 10.1007/s00300-008-0562-5

Naish, T., Powell, R., Levy, R., Wilson, G., Scherer, R., Talarico, F., Krissek, L., Niessen, F., Pompilio, M., Wilson, T., Carter, L., DeConto, R., Huybers, P., McKay, R., Pollard, D., Ross, J., Winter, D., Barrett, P., Browne, G., Cody, R., Cowan, E., Crampton, J., Dunbar, G., Dunbar, N., Florindo, F., Gebhardt, C., Graham, I., Hannah, M., Hansaraj, D., Harwood, D., Helling, D., Henrys, S., Hinnov, L., Kuhn, G., Kyle, P., Laufer, A., Maffioli, P., Mogens, D., Mandernack, K., McIntosh, W., Millan, C., Morin, R., Ohneiser, C., Paulin, T., Persico, D., Raine, I., Reed, J., Riesselman, C., Sagnotti, L., Schmitt, D., Sjunneskog, C., Strong, P., Taviani, M., Vogel, S., Wilch, T., Williams, T.

Obliquity-paced Pliocene West Antarctic ice sheet oscillations.

Nature 458(7867): 322-328 2009.

doi: 10.1038/nature07867

Nolan, L.

Population genetic structure of Antarctic springtails (Collembola) and New Zealand damselflies (Odonata).

M.Phil., (Biological Sciences) University of Waikato, 2006.

Schiller, M., Dickinson, W., Ditchburn, R.G., Graham, I.J., Zondervan, A.

Atmospheric ¹⁰Be in an Antarctic soil: implications for climate change.

Journal of geophysical research 114: F01033 2009.

doi:10.1029/2008JF001052

Wery, N., Gerike, U., Sharman, A., Chaudhuri, J.B., Hough, D.W., Danson, M.J.

Use of a packed-column bioreactor for isolation of diverse protease-producing bacteria from Antarctic soil.

Applied and environmental microbiology 69(3): 1457-1464 2009.

doi: 10.1128/AEM.69.3.1457-1464.2003



SCHOOL OF BIOLOGICAL SCIENCES

PHD RESEARCH OPPORTUNITY

Recruitment processes in Antarctic silverfish

Dr.'s Mary Sewell and Shane Lavery have a PhD project available to examine genetic aspects of recruitment processes in the Antarctic silverfish (*Pleuragramma antarcticum*). The project is to study the genetic relatedness of larvae of the Antarctic silverfish in Terra Nova Bay using microsatellite markers. Samples were collected in 2006 and 2007 in Terra Nova Bay and we have developed a set of microsatellite markers that can be used in the research. It is intended that other samples could be collected and/or obtained through collaborations with the Antarctic scientific community to allow broader scale comparisons.

Funds have not yet been acquired to cover a student stipend, so we are looking for a potential PhD student who is interested in applying for the May 13th deadline of the Bright Future Scheme (Top Achiever Doctoral Scholarship) – application details available at <http://www.tec.govt.nz/templates/standard.aspx?id=675>.

If you are in the top 10% of students eligible for the Bright Future's Scheme, are personable, highly motivated and with a background or interest in molecular ecology, then this project may be right for you.

Further information is available from:

Dr. Mary Sewell = m.sewell@auckland.ac.nz

Dr. Shane Lavery = s.lavery@auckland.ac.nz

Expressions of interest, with a CV, are required as soon as possible (preferably before Monday April 27th) to either of the above email addresses.