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1. Education:

McGill University, Montreal, Quebec (Sept. 1996-Feb. 2001).
Ph.D. in Atmospheric Science, conferred June 2001.
Thesis Advisor: Dr. M. K. Yau
Thesis Title: *The role of blowing snow in the hydrometeorology of the Mackenzie River Basin.*

York University, Toronto, Ontario (Sept. 1991-Dec. 1993).
M. Sc. in Atmospheric Science, conferred June 1994.
Thesis Advisor: Dr. R. E. Stewart.
Thesis Title: *Surface effects within Avalon Peninsula winter storms.*
Honours B.Sc. in Earth and Atmospheric Science and Applied Mathematics (1987-1991).

2. Positions Held:

Associate Professor (tenured) and Canada Research Chair in Northern Hydrometeorology, *UNBC* (July 2010-present)
Assistant Professor (tenure track) and Canada Research Chair in Northern Hydrometeorology, *UNBC* (July 2005-June 2010)
Adjunct Associate Research Scientist, *Columbia University* (Feb. 2004-June 2009)
Visiting Research Scientist, *Princeton University* (Jan. 2004-June 2005)
Post-Doctoral Research Scientist, *Columbia University* (Dec. 2000-Dec. 2003)
Project Scientist, *York University* (Nov. 1994-Aug. 1996)
Research Scientist, *Technical University of Budapest* (Summer 1994)
Meteorological Technician, *Ontario Hydro* (Summers of 1991-1993)

3. Peer-Reviewed Publications:

- 1) Sanderson, D., Picketts, I. M., **Déry, S. J.**, Fell, B., Baker, S., Lee-Johnson, E., and Auger, M., 2014: Climate change and water at Stellat'en First Nation, British Columbia, Canada: Insights from western science and traditional knowledge, *The Canadian Geographer*, in press.
- 2) Padilla, A., Rasouli, K., and **Déry, S. J.**, 2014: Impacts of variability and trends in monthly runoff and water temperature on salmon migration in the Fraser River Basin, Canada, *Hydrological Sciences Journal*, in press.

- 3) Kang, D. H., Shi, X., Gao, H., and **Déry, S. J.**, 2014: On the changing contribution of snow to the hydrology of the Fraser River Basin, *Journal of Hydrometeorology*, **15**, 1344-1365.
- 4) Picketts, I. M., **Déry, S. J.**, and Curry, J., 2014: Incorporating climate change adaptation into community plans, *Journal of Environmental Planning and Management*, **57**, 984-1002.
- 5) **Déry, S. J.**, Knudsvig, H. K., Hernández-Henríquez, M. A. and Coxson, D. S. 2014: Net snowpack accumulation and ablation characteristics in the Inland Temperate Rainforest of the Upper Fraser Basin of Canada, *Hydrology*, **1**, 1-19.
- 6) Kang, D. H., Barros, A., and **Déry, S. J.**, 2014: Evaluating passive microwave radiometry for the dynamical transition from dry to wet snowpacks, *IEEE Transactions on Geoscience and Remote Sensing*, **52**, 3-15.
- 7) Rasouli, K., Hernández-Henríquez, M. A., and **Déry, S. J.**, 2013: Streamflow input to Lake Athabasca, Canada, *Hydrology and Earth System Sciences*, **17**, 1681-1691.
- 8) Picketts, I. M., Curry, J., **Déry, S. J.**, and Cohen, S. J., 2013: Learning from and for local practitioners: Determining community climate change adaptation priorities, *Climatic Change*, **118**, 321-337.
- 9) Shi, X., **Déry, S. J.**, Groisman, P. Ya, and Lettenmaier, D. P., 2013: Relationships between recent pan-Arctic snow cover and hydroclimate trends, *Journal of Climate*, **26**, 2048-2064.
- 10) **Déry, S. J.**, Hernández-Henríquez, M. A., Owens, P. N., Parkes, M. W., and Petticrew, E. L., 2012: A century of hydrological variability and trends in the Fraser River Basin, *Environmental Research Letters*, **7**, 024019.
- 11) Lenaerts, J. T. M., van den Broeke, M., van Angelen, J. H., van Meijgaard, E., and **Déry, S. J.**, 2012: Drifting snow climate of the Greenland ice sheet: A study with a regional climate model, *The Cryosphere*, **6**, 891-899.
- 12) Lenaerts, J. T. M., van den Broeke, M., **Déry, S. J.**, van Meijgaard, E., van de Berg, W. J., Palm, S., and Rodrigo, J. S., 2012: Modeling snowdrift in Antarctica with a regional climate model, Part I: Methods and model evaluation, *Journal of Geophysical Research*, **117**, D05108.
- 13) Picketts, I. M., Werner, A. T., Murdock, T. Q., Curry, J., **Déry, S. J.**, and Dyer, D., 2012: Planning for climate change adaptation: Lessons learned from a community-based workshop, *Environmental Science & Policy*, **17**, 82-93.
- 14) Mlynowski, T. J., Hernández-Henríquez, M. A., and **Déry, S. J.**, 2011: An evaluation of hydrometric monitoring across the Canadian pan-Arctic region, 1950-2008, *Hydrology Research*, **42**, 479-490.

- 15) **Déry, S. J.**, Mlynowski, T. J., Hernández-Henríquez, M. A., and Straneo, F., 2011: Interannual variability and interdecadal trends in Hudson Bay streamflow, *Journal of Marine Systems*, **88**, 341-351.
- 16) Shi, X., Groisman, P. Ya., **Déry, S. J.**, and Lettenmaier, D. P., 2011: The role of surface energy fluxes in pan-Arctic snow cover changes, *Environmental Research Letters*, **6**, 035204.
- 17) Hernández-Henríquez, M. A., Mlynowski, T. J., and **Déry, S. J.**, 2010: Reconstructing the natural streamflow of a regulated river: A case study of La Grande Rivière, Québec, Canada, *Canadian Water Resources Journal*, **35**, 301-316.
- 18) Tong, J., **Déry, S. J.**, Jackson, P. L., and Derksen, C., 2010: Testing snow water equivalent retrieval algorithms for passive microwave remote sensing in an alpine watershed of western Canada, *Canadian Journal of Remote Sensing*, **36**, S74-S86.
- 19) Tong, J., **Déry, S. J.**, Jackson, P. L., and Derksen, C., 2010: Snow distribution from SSM/I and its relationship to the hydroclimatology of the Mackenzie River Basin, Canada, *Advances in Water Resources*, **33**, 667-677.
- 20) **Déry, S. J.**, Clifton, A., MacLeod, S., and Beedle, M. J., 2010: Blowing snow fluxes in the Cariboo Mountains of British Columbia, Canada, *Arctic, Antarctic and Alpine Research*, **42(2)**, 188-197.
- 21) Lenaerts, J. T. M., van den Broeke, M. R., **Déry, S. J.**, König-Langlo, G., Ettema, J., and Kuipers-Munneke, P., 2010: Modelling snowdrift sublimation on an Antarctic ice shelf, *The Cryosphere*, **4**, 179-190.
- 22) Tong, J., **Déry, S. J.**, Hu, B., Chen, Y., 2010: An alternative method for in-flight absolute radiometric calibration of thermal infrared channels of Chinese geostationary meteorological satellites, *International Journal of Remote Sensing*, **31**, 791-803.
- 23) Tong, J., **Déry, S. J.**, and Jackson, P. L., 2009: Interrelationships between MODIS/Terra remotely sensed snow cover and the hydrometeorology of the Quesnel River Basin, British Columbia, Canada, *Hydrology and Earth System Sciences*, **13**, 1439-1452.
- 24) **Déry, S. J.**, Hernández-Henríquez, M., Burford, J. E., and Wood, E. F., 2009: Observational evidence of an intensifying hydrological cycle in northern Canada, *Geophysical Research Letters*, **36**, L13402, doi: 10.1029/2009GL038852.
- 25) Burford, J. E., **Déry, S. J.**, and Holmes, R. D., 2009: Some aspects of the hydroclimatology of the Quesnel River Basin, British Columbia, Canada, *Hydrological Processes*, **23(10)**, 1529-1536, doi: 10.1002/hyp.7253.
- 26) **Déry, S. J.**, Stahl, K., Moore, R. D., Whitfield, P. H., Menounos, B. and Burford, J. E., 2009: Detection of runoff timing changes in pluvial, nival and glacial rivers of western Canada, *Water Resources Research*, **45**, W04426, doi:10.1029/2008WR006975.

- 27) Tong, J., **Déry, S. J.**, and Jackson, P. L., 2009: Topographic control of snow distribution in an alpine watershed of western Canada inferred from spatially-filtered MODIS snow products, *Hydrology and Earth System Sciences*, **13**, 319-326.
- 28) Tong, J., **Déry, S. J.**, Hu, B., Chen, Y., Yang, C., and Rong, Z., 2009: On-board real time absolute radiometric calibration for thermal infrared channels of Chinese geostationary meteorological satellites, *Journal of Atmospheric and Oceanic Technology*, **26**, 281-289.
- 29) Cherry, J. E., Tremblay, L.-B., Stieglitz, M., Gong, G., and **Déry, S. J.**, 2007: Development of the pan-Arctic Snowfall Reconstruction: New land-based solid precipitation estimates for 1940-1999, *Journal of Hydrometeorology*, **8**, 1243-1263.
- 30) **Déry, S. J.**, and Brown, R. D., 2007: Recent Northern Hemisphere snow cover extent trends and implications for the snow-albedo feedback, *Geophysical Research Letters*, **34**, L22708, doi: 10.1029/2007GL031474.
- 31) Rennermalm, A., Wood, E. F., Weaver, A. J., Eby, M., and **Déry, S. J.**, 2007: Relative sensitivity of the Atlantic Meridional Overturning Circulation to river discharge into Hudson Bay and the Arctic Ocean, *Journal of Geophysical Research*, **112**, G04S48, doi: 10.1029/2006JG000330.
- 32) **Déry, S. J.**, and Wood, E. F., 2006: Analysis of snow in the 20th and 21st century Geophysical Fluid Dynamics Laboratory coupled climate model simulations, *Journal of Geophysical Research*, **111**, D19113, doi: 10.1029/2005JD006920.
- 33) Rennermalm, A., Wood, E. F., **Déry, S. J.**, Weaver, A. J., and Eby, M., 2006: Sensitivity of the thermohaline circulation to Arctic Ocean runoff, *Geophysical Research Letters*, **33**, L12703, doi: 10.1029/2006GL026124.
- 34) McClelland, J. W., **Déry, S. J.**, Peterson, B. J., Holmes, R. M., and Wood, E. F., 2006: A Pan-Arctic evaluation of changes in river discharge during the latter half of the 20th century, *Geophysical Research Letters*, **33**, L06715, doi: 10.1029/2006GL025753.
- 35) **Déry, S. J.** and Wood, E. F. 2005. Observed twentieth century land surface air temperature and precipitation covariability. *Geophysical Research Letters*, **32**, L21414, doi: 10.1029/2006GL025753.
- 36) **Déry, S. J.**, Sheffield, J., and Wood, E. F. 2005. Connectivity between Eurasian snow cover extent and Canadian snow water equivalent and river discharge. *Journal of Geophysical Research*, **110**, D23106, doi: 10.1029/2005JD006173.
- 37) **Déry, S. J.**, Stieglitz, M., Rennermalm, Å. K., and Wood, E. F. 2005. The water budget of the Kuparuk River Basin, Alaska. *Journal of Hydrometeorology*, **6**, 633-655.
- 38) Cherry, J. E., Tremblay, L.-B., **Déry, S. J.**, and Stieglitz, M. 2005. Reconstructing solid precipitation from snow depth measurements and a land surface model. *Water Resources Research*, **41**, W09401, doi: 10.1029/2005WR003965.

- 39) **Déry, S. J.**, Stieglitz, M., McKenna, E. C., and Wood, E. F. 2005. Characteristics and trends of river discharge into Hudson, James, and Ungava Bays, 1964-2000. *Journal of Climate*, **18**, 1540-1557.
- 40) **Déry, S. J.**, Salomonson, V. V., Stieglitz, M., Hall, D. K., and Appel, I. 2005. An approach to using snow areal depletion curves inferred from MODIS and its application to land surface modelling in Alaska. *Hydrological Processes*, **19**, 2755-2774, doi:10.1002/hyp.5784
- 41) **Déry, S. J.** and Wood, E. F. 2005. Decreasing river discharge in northern Canada. *Geophysical Research Letters*, **32**, L10401, doi: 10.1029/2005GL022845.
- 42) **Déry, S. J.** and Wood E. F. 2004. Teleconnection between the Arctic Oscillation and Hudson Bay river discharge. *Geophysical Research Letters*, **31**, L18205, doi: 10.1029/ 2004GL020729.
- 43) **Déry, S. J.** and Tremblay, L.-B. 2004. Modeling the effects of wind redistribution on the snow mass budget of Arctic sea ice. *Journal of Physical Oceanography*, **34**(1), 258-271.
- 44) **Déry, S. J.**, Crow, W. T., Stieglitz, M., and Wood, E. F. 2004. Modeling snowcover heterogeneity over complex Arctic terrain for regional and global climate models. *Journal of Hydrometeorology*, **5**(1), 33-48.
- 45) Stieglitz, M., **Déry, S. J.**, Romanovsky, V. E., Osterkamp, T. E. 2003: The role of snow cover in the warming of Arctic permafrost, *Geophysical Research Letters*, **30**(13), 1721, doi:10.1029/2003GL017337.
- 46) **Déry, S. J.** and Yau, M. K. 2002: Large-scale mass balance effects of blowing snow and surface sublimation, *Journal of Geophysical Research*, **107**(D23), 4679, doi:10.1029/2001JD001251.
- 47) **Déry, S. J.** and Stieglitz, M. 2002: A note on surface humidity measurements in the cold Canadian environment, *Boundary-Layer Meteorology*, **102**, 491-497.
- 48) **Déry, S. J.** and Yau, M. K. 2001: Simulation of blowing snow in the Canadian Arctic using a double-moment model, *Boundary-Layer Meteorology*, **99**(2), 297-316.
- 49) **Déry, S. J.** and Yau, M. K. 2001: Simulation of an Arctic ground blizzard using a coupled blowing snow-atmosphere model, *Journal of Hydrometeorology*, **2**, 579-598.
- 50) Xiao, J., Bintanja, R., **Déry, S. J.**, Mann, G. W. and Taylor, P. A. 2000: An intercomparison among four models of blowing snow, *Boundary-Layer Meteorology*, **97**, 109-135.
- 51) **Déry, S. J.** and Yau, M. K. 1999: A climatology of adverse winter-type weather events, *Journal of Geophysical Research*, **104**(D14), 16,657-16,672.

- 52) **Déry, S. J.** and Yau, M. K. 1999: A bulk blowing snow model, *Boundary-Layer Meteorology*, **93(2)**, 237-251.
- 53) **Déry, S. J.**, Taylor, P. A and Xiao, J. 1998: The thermodynamic effects of sublimating, blowing snow in the atmospheric boundary layer, *Boundary-Layer Meteorology*, **89(2)**, 251-283.
- 54) **Déry, S. J.** and Taylor, P. A. 1996: Some aspects of the interaction of blowing snow with the atmospheric boundary layer, *Hydrological Processes*, **10**, 1345-1358.

4. Manuscripts submitted for publication

- 1) Leggat, M. S., Owens, P. N., Stott, T. A., Forrester, B. J., and **Déry, S. J.**, 2014: Hydroclimatic drivers and sources of suspended sediment flux in the proglacial zone of the retreating Castle Creek Glacier, British Columbia, submitted to *Earth Surface Processes and Landforms*.
- 2) Picketts, I. M., Andrey, J., Matthews, L., **Déry, S. J.** and Tighe, S., 2014: Climate change adaptation strategies for local transportation infrastructure management, submitted to *Regional Environmental Change*.
- 3) Albers, S. J., **Déry, S. J.** and Petticrew, E. L., 2014: Flooding in the Nechako River Basin of Canada: A random forest modeling approach to flood analysis in a highly regulated reservoir system, submitted to *Canadian Water Resources Journal*.

5. Peer reviewed book chapters

- 1) Stott, T. A., Leggat, M. S., Owens, P. N., Forrester, B. J., **Déry, S. J.**, and Menounos, B., 2014: Suspended sediment dynamics in the proglacial zone of the rapidly retreating Castle Creek Glacier, British Columbia, Canada, in Beylich, A. A., Dixon, J. C., and Zwolinski, Z. (eds.), *Sources-to-sink fluxes in undisturbed cold environments*, Cambridge University Press, in press.
- 2) Hall, D. K., Frei, A., and **Déry, S. J.**, 2014: Chapter 3: Remote sensing of snow cover extent, in Tedesco, M. (ed.), *Remote Sensing of Snow and Ice*, Wiley-Blackwell, in press.
- 3) Cherry, J. E., **Déry, S. J.**, Chen, Y., Stieglitz, M., Jacobs, A. S., and Pan, F.-F., 2014: Chapter 2: Climate and hydrometeorology of the Toolik Lake region and the Kuparuk River Basin, in Hobbie, J. E. and Kling, G.W. (eds.), *Alaska's Changing Arctic: Ecological Consequences for Tundra, Streams and Lakes*, Oxford University Press, 21-60.
- 4) **Déry, S. J.**, 2011: Global warming and its effect on snow/ice/glaciers, in Singh, V. P., Singh, P., and Haritashya, U. K. (eds.), *Encyclopedia of Snow, Ice, and Glaciers*, Springer, 468-470.
- 5) **Déry, S. J.**, and Yau, M. K., 2007: Chapter 14: Recent studies on the climatology and modelling of blowing snow in the Mackenzie River Basin (MRB), *Atmospheric Dynamics of a Cold Region: The Mackenzie GEWEX Study Experience*, Springer, 241-257.

6. Non-peer reviewed publications:

- 1) Déry, S. J., 2010: Book Review: Snow and Climate, *Polar Research*, **29**, 461-462.
- 2) Déry, S. J., 2010: Snow sublimation on the Ekström Ice Shelf, *Newsletter of the Canadian Antarctic Research Network*, **29**, 2.
- 3) Brown, R. and S. J. Déry, 2008: Characteristics of recent trends in Northern Hemisphere snow cover extent, IGARSS 2008, Boston, MA.
- 4) MacLeod, S. and Déry, S. J., 2007: The Cariboo Alpine Mesonet, *CMOS Bull. SCMO*, **35**, 45-51.
- 5) Déry, S. J. and Yau, M. K., 2006: Recent studies on the climatology and modeling of blowing snow in the Mackenzie River Basin, *Final Report of the Mackenzie GEWEX Study (MAGS): Proc. Of the Final (11th) Annual Scientific Meeting, 22-25 Nov. 2005, Ottawa, Ont., Canada*, 367-386.
- 6) Déry, S. J., Luo, L., Sheffield, J., and Wood, E. F. 2005. Do dynamical models pick up pan-Arctic teleconnections? *GEWEX News*, **15**(4), 12-13.
- 7) Déry, S. J., Sheffield, J., and Wood, E. F. 2005. Connectivity between Eurasian snow extent and Canadian snow mass and river discharge. *Conference Proceedings of the 62nd Annual Eastern Snow Conference*, June 2005, Waterloo, ON.
- 8) Déry, S. J., and Wood, E. F. 2005. Characteristics, trends, and atmospheric drivers of Canadian river discharge to high latitude oceans. *Preprints 8th Conf. Polar Meteorology and Oceanography*, American Meteorological Society, January 2005, San Diego, CA.
- 9) Déry, S. J., Stieglitz, M., McKenna, E. and Wood, E. F. 2004. Recent trends and changes in freshwater discharge into Hudson, James, and Ungava Bays. *EOS Trans. AGU*, **85**(17), H34A-03, American Geophysical Union, May 2004, Montreal, QC.

7. Conference presentations and seminars:

- 1) Sharma, A., Déry, S. J. and Cannon, A., 2014: Elevational dependence of climate variability and trends in British Columbia's Cariboo Mountains, 1950-2010, 5th Annual Pacific Northwest Climate Science Conference, Seattle, Washington, 9-10 September 2014.
- 2) Picketts, I. M., Déry, S. J. and Parkes, M., 2014: Climate change and resource development in the Nechako Watershed. Resource North Cooperative land management conference: Breaking down silos, Prince George, BC, 17 June 2014.
- 3) Déry, S. J., Sanderson, D., Picketts, I., Fell, B., Baker, S., Lee-Johnson, E., and Auger, M., 2014: Climate change and water at Stellat'en First Nation, British Columbia, Canada: Insights from western science and traditional knowledge, 48th CMOS Annual Congress, Rimouski, QC, 4 June 2014.

- 4) Gurung, P., and **Déry, S. J.**, 2014: Improving snow modelling in the CRCM5: Strategies moving forward, Canadian Network for Regional Climate and Weather Prediction workshop, UQAM, Montreal, QC, 30 May 2014.
- 5) **Déry, S. J.**, 2014: Exploring causes for the global warming hiatus observed during the last 15 years, Climate Science Informal Discussion, UNBC, Prince George, BC, 26 March 2014.
- 6) Picketts, I.M. and **Déry, S.J.**, 2013: Evaluating climate change adaptation in a Canadian community. AGU Fall Meeting. San Francisco CA, 9 December 2013.
- 7) **Déry, S. J.**, Kang, D.-H., Shi, X., and Gao, H., 2013: On the changing contribution of snow to the hydrology of the Fraser River Basin, Canada, AGU Fall Meeting, San Francisco, CA, 12 December 2013.
- 8) **Déry, S. J.**, 2013: Tracking climate change in north-central BC. UNBC Board of Governors, Prince George, BC, 30 November 2013 (invited).
- 9) **Déry, S. J.**, Hernández-Henríquez, M., and Kang, D.-H., 2013: Research on snow/hydroclimate processes and trends, integration with CanSISE, CanSISE workshop, Victoria, BC, 30 October 2013.
- 10) Kang, D.-H., Shi, X., Gao, H., and **Déry, S. J.**, 2013: Changing contribution of snow to Fraser River discharge, Northern Provincial Government Water Stewardship Group, Prince George, BC, 9 October 2013 (invited).
- 11) **Déry, S. J.**, 2013: Keeping track of weather and climate in the Cariboo Mountains, QRRC Annual Open House, Likely, BC, 5 October 2013 (invited).
- 12) Hamilton, S., Andrishak, R., Boals, R., Bouchard, A., **Déry, S. J.**, Pilon, P., and Whitfield, P., 2013: North American Stream Hydrographers, AWRA, Portland, OR, 10 June 2013.
- 13) Picketts, I. M., **Déry, S. J.** and Curry, J., 2013: Moving from models, projections and assessments to implementation: addressing climate impacts in local plans. Joint 2013 CMOS/CGU/CWRA Congress, Saskatoon, SK, 27 May 2013.
- 14) Rasouli, K., Hernández-Henríquez, M., and **Déry, S. J.**, 2013: Recent hydrological changes of Lake Athabasca, Joint 2013 CMOS/CGU/CWRA Congress, Saskatoon, SK, 27 May 2013.
- 15) **Déry, S. J.**, Knudsvig, H., Hernández-Henríquez, M., and Coxson, D., 2013: Net snowpack accumulation and ablation characteristics for the Inland Temperate Rainforest of the Upper Fraser River Basin, Joint 2013 CMOS/CGU/CWRA Congress, Saskatoon, SK, 27 May 2013.
- 16) **Déry, S. J.**, Simon, A., and Brown, R., 2013: Contribution of snow to Hudson Bay river discharge, Joint 2013 CMOS/CGU/CWRA Congress, Saskatoon, SK, 27 May 2013.
- 17) Kang, D.-H., Shi, X., Gao, H., and **Déry, S. J.**, 2013: A modeling study of the changing contribution of snow to the hydrology of the Fraser River Basin, Joint 2013 CMOS/CGU/CWRA Congress, Saskatoon, SK, 27 May 2013.
- 18) **Déry, S. J.**, Simon, A., and Brown, R., 2013: Contribution of snow to Hudson Bay river discharge, Joint 2013 CMOS/CGU/CWRA Congress, Saskatoon, SK, 27 May 2013.
- 19) Stott, T., Leggat, M., Owens, P., Forrester, B., and **Déry, S.**, 2013: Suspended sediment dynamics in the forefield of the rapidly deglaciating Castle Creek Glacier, British Columbia, EGU Annual Assembly, Vienna, Austria, 4 April 2013.
- 20) Shi, X., Déry, S. J., Groisman, P. Y., and Lettenmaier, D. P., 2013: Recent pan-Arctic snow cover and permafrost changes, Third International Symposium on Arctic Research, Tokyo, Japan, 16 January 2013.

- 21) **Déry, S. J.**, 2012: Climate change and the water towers of western Canada, University of Toronto Centre for Global Change Science's Graduate Student Research Symposium, Toronto, Ontario (invited talk).
- 22) Kang, D.-H., Gao, H. and **Déry, S. J.**, 2012: Hydrological variability in the Fraser River Basin during the 20th century: A sensitivity study with the VIC model, AGU Fall Meeting, San Francisco, CA.
- 23) Knudsvig, H. K., **Déry, S. J.**, and Coxson, D. S., 2012: Impacts of a changing winter precipitation regime on the Great Snowforest of British Columbia, Canada, AGU Fall Meeting, San Francisco, CA.
- 24) Kang, D.-H., and **Déry, S. J.**, 2012: The changing contribution of snow to the hydrology of the Fraser River Basin, Canada, CGU Annual Meeting, Banff, Alberta.
- 25) Sanderson, D. and **Déry, S. J.**, 2012: Climate change and water at Stellat'en First Nation: Insights from western science and traditional knowledge, CALACS 2012, Kelowna, BC (invited joint talk).
- 26) **Déry, S. J.**, 2012: Climate, snow and water: An overview of change in the Upper Fraser River Basin, McGill University, Montreal, Québec (invited talk).
- 27) **Déry, S. J.**, 2012: Climate, snow and water: An overview of change in the Upper Fraser River Basin, University of Washington, Seattle, Washington (invited talk).
- 28) Straneo, F., Gratton, Y., Sutherland, D., St-Laurent, P., **Déry, S. J.**, and Ramsey, A., 2012: Fresh water transport into the North Atlantic: The contribution from Hudson Strait, IPY 2012 Knowledge to Action conference, Montreal, Quebec.
- 29) Shi, X., Groisman, P. Y., **Déry, S. J.**, and Lettenmaier, D. P., 2012: The role of surface energy fluxes in pan-Arctic snow cover changes, IPY 2012 Knowledge to Action conference, Montreal, Quebec.
- 30) **Déry, S. J.**, J. E. Burford, M. A. Hernández-Henríquez, T. J. Mlynowski, F. Straneo, and E. F. Wood, 2012: Recent fluctuations and trends in streamflow across northern Canada: Insights from the IPY, IPY 2012: From Knowledge to Action, Montreal, Quebec.
- 31) **Déry, S. J.**, 2011: Recent climate and environmental changes in the upper Fraser Basin, Climate Research Division, Environment Canada, Downsview, Ontario (invited talk).
- 32) **Déry, S. J.**, 2011: Blowing snow in BC's Cariboo Mountains, Department of Mathematics and Statistics, York University, Toronto, Ontario (invited talk).
- 33) **Déry, S. J.**, Hernández-Henríquez, M. A., Owens, P. N., Parkes, M. W., and Petticrew, E. L., 2011: Climate oscillations and the hydroclimatology of the Fraser River Basin, AGU Fall meeting, San Francisco, California (invited talk).
- 34) **Déry, S. J.**, 2011: Climate, water and snow: An overview of recent changes in the Upper Fraser Basin, International Centre for Climate Change (IC3), University of Waterloo, Waterloo, Ontario (invited talk).
- 35) Knudsvig, H., Mlynowski, T. J., **Déry, S. J.**, and Coxson, D., 2011: Climate change and the Great Snowforest of Canada, IUGG conference, Melbourne, Australia.
- 36) **Déry, S. J.**, 2011: The Quesnel River watershed, Ecohealth and watersheds in northern BC workshop, Prince George, BC (invited talk).
- 37) **Déry, S. J.**, 2011: Climate change in northern BC and its impacts on water resources, Climate, water, salmon workshop, Quesnel, BC (invited talk).
- 38) **Déry, S. J.**, Hernández-Henríquez, M. A., Owens, P. N., Parkes, M. W., and Petticrew, E. L., 2011: Hydrological extremes in the Fraser River Basin, CMOS congress, Victoria, BC.

- 39) Mlynowski, T. J., Knudsvig, H., and **Déry, S. J.**, 2011: Future climate of the Inland Temperate Rainforest: Demise of the Snowforest? FFESC workshop, Prince George, BC.
- 40) Mlynowski, T. J., Hernández-Henríquez, M. A., and **Déry, S. J.**, 2010: An evaluation of hydrometric monitoring across the Canadian pan-Arctic region, 1950-2008, NASH Symposium, Canadian Water Resources Association's annual meeting, Vancouver, BC.
- 41) **Déry, S. J.**, Mlynowski, T. J., Hernández-Henríquez, M. A., and Straneo, F., 2010: Variability and trends in streamflow input to Hudson Bay, NASH Symposium, Canadian Water Resources Association's annual meeting, Vancouver, BC.
- 42) Hernández-Henríquez, M. A., Mlynowski, T. J. and **Déry, S. J.**, 2010: Reconstructing the natural streamflow of a regulated river: A case study of La Grande Rivière, Québec, Canada, Canadian Water Resources Association's annual meeting, Vancouver, BC.
- 43) Lenaerts, J., van den Broeke, M., **Déry, S. J.**, van Meijgaard, E., and van de Berg, W. J., 2010: Including snowdrift in a regional climate model of Antarctica: Preliminary results, AGU Fall meeting, San Francisco, California.
- 44) **Déry, S. J.**, Ainslie, B., Jackson, P. L., 2010: Modeling intense blowing snow events in the Cariboo Mountains of British Columbia, Canada, AGU Fall meeting, San Francisco, California.
- 45) Shi, X., Groisman, P. Ya., **Déry, S. J.**, and Lettenmaier, D. P. 2010: The role of surface energy fluxes in pan-Arctic snow cover changes, AGU Fall meeting, San Francisco, California.
- 46) **Déry, S. J.** 2010: Climate change and water: A focus on Alexis Creek, Water Workshop, First Nation, BC.
- 47) **Déry, S. J.**, 2010: Climate change and water: A focus on Stelat'en and Nadleh Whut'en First Nations, Water Workshop, Stelat'en First Nation, BC.
- 48) Tong, J., **Déry, S. J.**, and Jackson, P. J., and Derksen, C., 2010: Remote sensing of snow in the Cariboo Mountains of British Columbia, Canada, EGU annual congress, Vienna, Austria (invited talk).
- 49) **Déry, S. J.**, Hernandez-Henriquez, M., Mlynowski, T. J., Hernandez-Henriquez, M. A., and Straneo, F., 2010: Variability and trends in streamflow input to Hudson Bay, Canada, EGU annual congress, Vienna, Austria.
- 50) **Déry, S. J.**, Hernandez-Henriquez, M., Mlynowski, T., Burford, J. E., and Wood, E. F., 2009: Observational evidence of an intensifying hydrological cycle in northern Canada, AGU Joint Meeting, Toronto, ON.
- 51) Tong, J., **Déry, S. J.**, and Jackson, P. L., 2009: Topographic and hydrometeorological controls of remotely sensed snow cover distribution in the Quesnel River Basin of British Columbia, AGU Joint Meeting, Toronto, ON (invited talk).
- 52) Yadghar, A., Ainslie, B., **Déry, S. J.**, and Jackson, P. L., 2009: Assessing the potential contribution of blowing snow to the mass balance of glaciers in the Cariboo Mountains of British Columbia, Canada, AGU Joint Meeting, Toronto, ON.
- 53) Straneo, F., Sutherland, D., St. Laurent, P., **Déry, S. J.**, Harvey, M., and Saucier, F., 2009: Freshwater and the MOC: The example of Hudson Strait, AMOC conference, Palisades, NY.
- 54) Lenaerts, J., van den Broeke, M., and **Déry, S.**, 2009: Modeling snowdrift sublimation on Antarctica using RACMO-SCM, MOCA, Montreal, QC.

- 55) **Déry, S. J.**, K. Stahl, R. D. Moore, P. Whitfield, B. Menounos, and J. E. Burford, 2008: Detection of runoff timing changes in pluvial, nival, and glacial rivers of western Canada, Canadian Meteorological and Oceanographic Society, Kelowna, BC.
- 56) **Déry, S. J.**, S. MacLeod and A. Clifton, 2008: Development of the Cariboo Alpine Mesonet (CAMnet) to detect ecohydrological change in British Columbia's great "snowforest", Canadian Geophysical Union, Banff, AB.
- 57) **Déry, S. J.**, 2008: Snow, soils and climate, Canadian Soil Science Society, Prince George, BC (invited plenary talk).
- 58) Upton, T., and **S. J. Déry**, 2008: Contribution of snowmelt to soil moisture replenishment and storage in the Cariboo Mountains of British Columbia, Canadian Soil Science Society, Prince George, BC.
- 59) **Déry, S. J.**, 2008: Recent Northern Hemisphere snow cover extent trends, University of Alberta, Edmonton, AB (invited talk).
- 60) Burford, J. E., and **S. J. Déry**, 2008: Recent trends in the timing and variability of river discharge in northern Canada, Canadian Meteorological and Oceanographic Society, Kelowna, BC.
- 61) Tong, J., and **S. J. Déry**, 2008: Relationships between remotely sensed snowcover, streamflow and hydrometeorology of the Quesnel River Basin, Canadian Meteorological and Oceanographic Society, Kelowna, BC.
- 62) **Déry, S. J.**, 2008: Development of the Cariboo Alpine Mesonet and Preliminary results, NRESi colloquium, Prince George, BC.
- 63) **Déry, S. J.**, M. Hernandez, J. E. Burford, and E. F. Wood, 2008: Recent trends and variability in river discharge in Northern Canada, Arctic Change 2008 conference, Quebec City, Quebec (invited talk).
- 64) **Déry, S. J.**, M. Hernandez, J. E. Burford, and E. F. Wood, 2008: Recent trends and variability in river discharge in Northern Canada, IP3/IPY workshop, Whitehorse, Yukon.
- 65) **Déry, S. J.**, 2008: Global climate change and some of its implications to northern BC, CUPE Climate Change Workshop, UNBC, Prince George, BC (invited talk).
- 66) **Déry, S. J.**, 2008: Recent activities at the QRRC by the Northern Hydrometeorology Group, QRRC Open House, Likely, BC.
- 67) Tong, J., **S. J. Déry**, B. Hu, Y. Chen, C. Yang, and Z. Rong, 2008: On-board real-time absolute calibration for thermal infrared channels of Feng Yun-2C (FY-2C), Ninth Biennial Pan Ocean Remote Sensing Conference, Guangzhou, China.
- 68) Brown, R. and **S. J. Déry**, 2008: Characteristics of recent trends in Northern Hemisphere snow cover extent, IGARSS 2008, Boston, MA (invited talk).
- 69) Sutherland, D., F. Straneo, K. Drinkwater, and **S. J. Déry**, 2008: How does a changing river input and sea ice cover affect the Hudson Strait Outflow?, Fall AGU, San Francisco, CA.
- 70) **Déry, S. J.**, 2008: Flooding in a changing climate, PIBC Annual conference, Prince George, BC (invited session talk).
- 71) **Déry, S. J.**, K. Stahl, R. D. Moore, P. Whitfield, B. Menounos, and J. E. Burford, 2008: Detection of runoff timing changes in pluvial, nival, and glacial rivers of western Canada, WC2N workshop, Prince George, BC.
- 72) **Déry, S. J.**, A. Clifton, S. MacLeod and A. Yadghar, 2008: On the potential contribution of blowing snow on the mass balance of glaciers in the Cariboo Mountains, WC2N workshop, Prince George, BC.

- 73) **Déry, S. J.** (on behalf of the WC2N network), 2007: The Western Canadian Cryospheric Network (WC2N): An update, Canadian Geophysical Union, St. John's, NF.
- 74) **Déry, S. J.**, and Brown, R. D., 2007: Poleward amplification of Northern Hemisphere weekly snowcover extent trends, Eastern Snow Conference, St. John's, NF.
- 75) **Déry, S. J.**, 2007: Changing Arctic Rivers, ARCUS workshop, Washington, DC (invited talk).
- 76) **Déry, S. J.**, 2007: Changing climate, Visions 2007 workshop, Prince George, BC (invited talk).
- 77) **Déry, S. J.**, 2007: Changing climates and our BC forests and fish habitats, Pine beetle workshop, Prince George, BC (invited talk).
- 78) **Déry, S. J.**, 2007: Detection of runoff timing changes in pluvial, nival and glacial rivers of western Canada, WC2N workshop, Banff, AB.
- 79) **Déry, S. J.**, 2007: Overview of Arctic Rivers, Eurasian hydroclimatology workshop, Fairbanks, AK (invited talk).
- 80) **Déry, S. J.**, Stahl, K., Moore, R. D., Whitfield, P. H. and Menounos, B., 2006: Twentieth century trends in observed river discharge in western Canada, Canadian Geophysical Union, Banff, AB.
- 81) Rennermalm, A. K., Wood, E. F., **Déry, S. J.**, and Weaver, A., 2006: Sensitivity of thermohaline circulation to freshwater export from Hudson Bay and Arctic Ocean rivers, 2006 Freshwater initiative meeting, Denver, CO.
- 82) **Déry, S. J.**, 2006: Large-scale interaction between the seasonal snow cover in Eurasia and hydroclimatic conditions in northern Canada, American Geophysical Union (invited talk), San Francisco, CA.
- 83) MacLeod, S., and **Déry, S. J.**, 2006: The Cariboo Alpine Mesonet, American Geophysical Union, San Francisco, CA.
- 84) **Déry, S. J.**, 2006: Snow conditions: Ecological impact and remote sensing, Prey-Predator workshop (invited talk), Vancouver, BC.
- 85) **Déry, S. J.**, Sheffield, J., and Wood, E. F., 2005: Connectivity between Eurasian snow extent and Canadian snow mass and river discharge, *62nd Annual Eastern Snow Conference*, June 2005, Waterloo, Ontario, Canada
- 86) **Déry, S. J.**, and Wood, E. F., 2005: Characteristics, trends, and atmospheric drivers of Canadian river discharge to high-latitude oceans, *American Meteorological Society*, Jan. 2005, San Diego, CA, USA
- 87) **Déry, S. J.**, Stieglitz, M., McKenna, E. and Wood, E. F. 2004: Recent changes and trends in freshwater discharge into Hudson, James, and Ungava Bays, *American Geophysical Union*, May 2004, Montreal, QC, Canada.
- 88) **Déry, S. J.**, Crow, W. T., Stieglitz, M., and Wood, E. F. 2003: Modeling snowcover heterogeneity in polar regions, *Preprints 7th Conf. Polar Meteorology and Oceanography*, AMS, May 2003, Hyannis, MA, USA.
- 89) **Déry, S. J.**, and Tremblay, L.-B., 2003: The Arctic Ocean snow mass budget, *Preprints 7th Conf. Polar Meteorology and Oceanography*, AMS, May 2003, Hyannis, MA, USA.
- 90) **Déry, S. J.** and Yau, M. K. 2001: Numerical simulation of an Arctic ground blizzard, *Preprints 6th Conf. Polar Meteorology and Oceanography*, AMS, May 2001, San Diego, CA, USA.
- 91) **Déry, S. J.** and Yau, M. K. 2001: A numerical study of a severe Arctic ground blizzard, CMOS, May/June 2001, Winnipeg, Manitoba, Canada.

- 92) **Déry, S. J.**, Bintanja, R., Mann, G., Taylor, P. A., Xiao, J. and Yau, M. K. 1999: The Blowing Snow Model Intercomparison Project: An update, CMOS, May/June 1999, Montreal, Quebec, Canada.
- 93) **Déry, S. J.** and Yau, M. K. 1999: A climatology of significant winter-type events for the Mackenzie River Basin inferred from the ECMWF Re-Analysis, *Preprints 5th Conf. Polar Meteorology and Oceanography*, AMS, January 1999, Dallas, Texas, USA, 69-70.
- 94) **Déry, S. J.** and Yau, M. K. 1999: Blowing snow modelling and parameterization, *Preprints 5th Conf. Polar Meteorology and Oceanography*, AMS, January 1999, Dallas, Texas, USA, 349-350.
- 95) **Déry, S. J.** and Yau, M. K. 1999: A preliminary assessment of the blowing snow transport and sublimation fluxes for the Mackenzie River Basin, CMOS, May/June 1999, Montreal, Quebec, Canada.
- 96) Xiao, J., Bintanja, R., **Déry, S. J.**, Mann, G. and Taylor, P. A., 1999: An intercomparison between three models of blowing snow in the atmospheric boundary layer, IUGG, July 1999, Birmingham, UK.
- 97) Xiao, J., Taylor, P. A. and **Déry, S. J.**, 1999: A model of blowing snow and its predictions for sensible and latent heat flux perturbation in blowing snow events, EGS, April 1999, The Hague, Netherlands.
- 98) Xiao, J., Taylor, P. A. and **Déry, S. J.**, 1999: Sensible and latent heat fluxes in blowing snow events, CMOS, May/June 1999, Montreal, Quebec, Canada.
- 99) **Déry, S. J.** and Taylor, P. A. 1997: Thermodynamic effects of blowing snow in the atmospheric boundary layer, *Proceedings of the Hydro-ecology Workshop on the Arctic Environmental Strategy Action on Water*, CGU, May 1996, Banff, Alberta, Canada, 293-302.
- 100) **Déry, S. J.** and Taylor, P. A. 1996: On the impact of blowing snow sublimation in the Mackenzie River Basin, CMOS, May/June 1996, Toronto, Ontario, Canada.
- 101) **Déry, S. J.** and Taylor, P. A. 1995: Northern boundary-layer modelling; Some ideas on blowing snow, CGU, May 1995, Banff, Alberta, Canada.
- 102) **Déry, S. J.**, Stewart, R. E. and Taylor, P. A. 1995: A preliminary study of surface effects within Avalon Peninsula winter storms, CMOS, May/June 1995, Kelowna, British Columbia, Canada.

8. Professional Service:

8.1 Memberships

American Geophysical Union (AGU)
 American Meteorological Society (AMS)
 Canadian Geophysical Union (CGU)
 Canadian Meteorological and Oceanographic Society (CMOS)
 Canadian Water Resources Association (CWRA)
 European Geosciences Union (EGU)
 International Association of Hydrological Sciences (IAHS)
 International Glaciological Society (IGS)

8.2 Affiliations

Eastern Snow Conference (ESC)
 Natural Resources and Environmental Studies Institute (NRESi), UNBC
 North American Stream Hydrographers (NASH) Association
 Northern Climate Change Network (NCCN)
 Pacific Institute for Climate Solutions (PICS)
 Water Elevation Recovery Satellite Mission

8.3 Active Positions

2014-present Co-chief Editor (Meteorology and Hydrology), *Atmosphere-Ocean*
 2014-present Member, editorial board, *Journal of Hydrometeorology*
 2014-present Vice Chair/Treasurer, CMOS BC Interior and Yukon executive
 2012-present Member, Council of the International Glaciological Society
 2012-present Member, Climate change adaptation advisory group, T̓silhqot̓in National Government
 2012-present Member, publications committee, CMOS
 2011-present Member, BC Water Science Strategy Phase II Advisory Committee
 2006-present Member, editorial board, *Canadian Water Resources Journal*
 2006-present Member, scientific committee, CMOS
 2006-present Member, review committee, Eastern Snow Conference student paper competition

8.4 Former Positions

2012-2014 Member, editorial board, *Atmosphere-Ocean*
 2013 Co-chair, CMOS congress cryosphere session
 2012-2013 Co-Editor, Columbia River special issue of *Atmosphere-Ocean*
 2011-2014 Member, Geosciences Evaluation Group, NSERC
 2008-2011 Member, editorial board, *The Cryosphere*
 2008-2011 Member and Chair, Northern Research Supplement Committee, NSERC
 2007-2011 UNBC representative, ARCUS
 2008, 2011 Member, science planning committee, CMOS annual congress
 2010-2011 Reviewer, AGU student poster competition
 2011 Co-chair, CMOS congress plenary session
 2010 Co-chair, Fall AGU cryosphere session
 2008-2009 Member, program committee, PICS
 2008-2009 Member, director search committee, PICS
 2008 Member, graduate student fellowship adjudicating committee, PICS
 2008 Co-chair, CMOS congress session on climate change and water resources

8.5 Reviews

8.5.1 Journals

Journal	Number (Year)
<i>Advances in Water Resources</i>	1 (2005)

<i>Annals of Glaciology</i>	2 (2003), 1 (2006), 1 (2010)
<i>Arctic, Antarctic and Alpine Research</i>	1 (2010), 1 (2011)
<i>Atmosphere-Ocean</i>	1 (2005), 1 (2009), 2 (2010), 2 (2011)
<i>Atmospheric Research</i>	1 (2011), 1 (2012)
<i>Book Chapters (John Wiley/AGU Books)</i>	2 (2013)
<i>Boundary-Layer Meteorology</i>	1 (1995), 1 (2002), 1 (2004), 1 (2006), 1 (2008), 1 (2011)
<i>Bulletin of the AMS</i>	1 (2002)
<i>Canadian Water Resources Journal</i>	2 (2007), 2 (2009), 1 (2010), 1 (2011)
<i>Climate Dynamics</i>	1 (2008), 1 (2009)
<i>Climate Research</i>	1 (2010)
<i>Cold Regions Science and Technology</i>	2 (2003), 1 (2007)
<i>The Cryosphere</i>	1 (2008), 1 (2010), 1 (2011), 3 (2012), 3 (2013), 1 (2014)
<i>Environmental Research Letters</i>	2 (2009), 1 (2010), 3 (2011), 1 (2014)
<i>Forest Ecology and Management</i>	1 (2006)
<i>Geophysical Research Letters</i>	2 (2004), 2 (2005), 3 (2006), 3 (2007), 3 (2008), 3 (2009), 2 (2010), 1 (2011), 1 (2012)
<i>Global and Planetary Change</i>	1 (2009)
<i>Hydrological Processes</i>	3 (2006), 1 (2007), 1 (2009), 1 (2010), 2 (2012)
<i>Hydrological Sciences Journal</i>	2 (2009), 2 (2014)
<i>Hydrology & Earth System Sciences</i>	1 (2010), 1 (2012)
<i>Hydrology Research</i>	2 (2009), 1 (2014)
<i>International Journal of Climatology</i>	1 (2001), 1 (2006), 1 (2009), 1 (2010), 2 (2014)
<i>Journal of Applied Meteorology and Climatology</i>	1 (2006), 1 (2008)
<i>Journal of Climate</i>	3 (2008)
<i>Journal of Cold Regions Engineering</i>	1 (2003)
<i>Journal of Geophysical Research</i>	1 (2000), 1 (2001), 1 (2002), 1 (2005), 1 (2007), 3 (2009), 2 (2010), 2 (2011), 1 (2012), 1 (2013), 2 (2014)
<i>Journal of Glaciology</i>	1 (2005), 1 (2013)
<i>Journal of Hydrology</i>	1 (2010), 1 (2011), 2 (2012), 1 (2013)
<i>Journal of Hydrometeorology</i>	3 (2003), 1 (2004), 1 (2005), 1 (2006), 1 (2007), 2 (2010), 1 (2012), 3 (2013)
<i>Journal of Water Sciences (in French)</i>	1 (2006), 1 (2007)
<i>PLOS One</i>	1 (2013)
<i>Remote Sensing</i>	1 (2011)
<i>Remote Sensing of Environment</i>	1 (2009)
<i>Water Resources Research</i>	1 (2007), 2 (2008)
<i>Weather and Forecasting</i>	1 (2004)
<i>Western Geography</i>	1 (2008)

Total	151

8.5.2 Grants

I have reviewed 30 proposals for various funding agencies including the Swiss National Science Foundation (2003, 2004), the United Kingdom Natural Environment and Research Council (two reviews in 2004), the Canadian Foundation for Climate and Atmospheric Science (2005), a Natural Sciences and Engineering Research Council of Canada (NSERC) site visit in 2007, NSERC Discovery grants in 2006, 2007 (in French), 2008, 2009 and 2010, NSERC Strategic grants in 2010 and 2012, NSERC Collaborative Research and Development grants in 2013 (in French), the Canada Foundation for Innovation (2010, 2011) the United States National Science Foundation (2006, 2008, 2010, 2011, 2012), a Canada Research Chair application (2007), a Chilean Fondecyt application (2010), four United States Strategic Environmental Research and Development Program applications (2013) and an Austrian FWF application (2012).

In addition to these grant and proposal reviews, I acted as a member and then chaired NSERC's Northern Research Supplement Committee for which I reviewed over 100 applications for funding over a period of three years. I then became a member of NSERC's Geosciences Evaluation Group to review applications to their Discovery Grant program. To that end, I reviewed nearly a total of 200 applications for funding over a period of three years and was assigned to do so in a period of only six to eight weeks each year. The evaluation of the funding applications was conducted during a full week of conference-style meetings in Ottawa with NSERC staff and other members of the evaluation group.

8.5.3 Professional Reports

In 2008, I performed the peer review of a professional report entitled "Climate Change Impacts in Prince George - A Summary of Past Trends and Future Projections of climate in North-Central British Columbia" produced by the Pacific Climate Impacts Consortium. In 2008/2009, I also acted as a consultant for a project entitled "Microclimate analysis and unique weather patterns of Highway 401 Northumberland County" conducted by 4DM Inc. on behalf of the Ministry of Transportation of Ontario.

8.5.4 Theses

I have acted as the external examiner for five doctoral theses: Princeton University (2006), Université du Québec à Rimouski (2010), McGill University (2010), University of Washington (2012) and University of Manitoba (2014).

8.5.5 Awards, Fellowships and Scholarships

Several of my ongoing and past engagements with the scientific community involve the review of fellowship and/or scholarship applications. Since becoming a member of the Scientific Committee for CMOS in 2006, I have participated in the adjudication of both undergraduate and graduate scholarships offered annually by the Society. I also review internal applications for the Northern

Scientific Training Program at UNBC annually and have assessed the best student paper for recent meetings of the Eastern Snow Conference. I also adjudicated nearly 100 applications for Pacific Institute for Climate Solutions graduate student fellowships in 2008. Finally, I have evaluated three applications for UNBC graduate student research project awards.

9. Recent Collaborators:

Ross Brown (Ouranos), Jessie Cherry (UAF), Stewart Cohen (EC), Darwyn Coxson (UNBC), Chris Derksen (Environment Canada), Huilin Gao (Texas A&M), Dorothy Hall (NASA GSFC), Peter Jackson (UNBC), Richard Kelly (U. Waterloo), Paul Kushner (U. Toronto), Dennis Lettenmaier (U. Washington), Jim McClelland (U. Texas), Brian Menounos (UNBC), Dan Moore (UBC), Phil Owens (UNBC), Margot Parkes (UNBC), Ellen Petticrew (UNBC), Valentina Radic (UBC), Vincent Salomonson (U. Utah), Xiaogang Shi (CSIRO), Laxmi Sushama (UQAM), Marc Stieglitz (Georgia Tech), Fiamma Straneo (WHOI), Peter Taylor (York U.), Bruno Tremblay (McGill), Michiel van den Broeke (Utrecht U.), Roger Wheate (UNBC), Paul Whitfield (Environment Canada), Andrew Weaver (UVic), Eric Wood (Princeton), Peter Yau (McGill).

10. Grants and Funding:

Name of Applicant, Role	Title of proposal, funding source and program	Total Amount	Years of Tenure
Principal applicant	One Time Funding Request for Newly Admitted Student – Mr. Aseem Raj Sharma, UNBC/BC Oil and Gas Commission	\$10,000	2014
Principal applicant	Quantifying the water budget of Coles Lake, northeastern British Columbia, Environment Canada Science Horizons	\$12,000	2014
Principal applicant	Developing capabilities at UNBC in the application of a programmatically piloted aerial systems for environmental research, UNBC seed grant	\$5,871	2014
Principal applicant	Using scenarios to improve community sustainability, land use and resilience in a changing Nechako River Basin, Real Estate Foundation of BC	\$14,581 (50%)	2014
Ellen Petticrew, co-applicant	Integrated watershed-based science in the Nechako River Basin, Nechako Environmental Enhancement Fund	\$500,000 (25%)	2014-2018
Laxmi Sushama, co-applicant	Canadian Network for Regional Climate and Processes, NSERC	\$4,078,000 (3%)	2013-2017

	CCAR		
Paul Kushner, co-applicant	The Canadian Sea Ice and Snow Evolution (CanSISE) network, NSERC CCAR	\$3,795,000 (11%)	2013-2017
Principal applicant	Snowpack characteristics and trends in northeastern British Columbia and impacts on regional surface water supply, BC Oil and Gas Commission	\$25,000	2013-2014
Principal applicant	Preparing proactively for the impacts of climate change on natural and human systems in the Nechako River Basin, Real Estate Foundation of BC	\$7000 (50%)	2013-2014
Principal applicant	Cariboo Alpine Mesonet, Env. Canada Science Horizons	\$12,000	2013-2014
Ellen Petticrew, co-applicant	Landscape ecology of large watersheds: linking hydrometric, geomorphic and biologic processes to evaluate material fluxes and their aquatic impacts, CFI + BCKDF	\$242,070 (33%)	2012-2013
Principal applicant	A century of hydrological variability in the Fraser River Basin, Env. Canada Science Horizons	\$12,000	2011-2012
Phil Owens, co-applicant	Climate, water and salmon, SSHRC	\$45,000 (25%)	2011-2012
Principal applicant	Floods in the Nechako River Basin, Real Estate Foundation of BC	\$12,000 (50%)	2011-2012
Principal applicant	Climate change and the water towers of western Canada, NSERC Discovery grant + Accelerator grant	\$166,500 \$120,000	2011-2015 2011-2013
Principal applicant	CAMnet field assistant, Service Canada	\$2,147	2011
Principal applicant	Infrastructure in support of CRC renewal, CFI	\$11,454	2010-2011
Principal applicant	Infrastructure in support of CRC renewal, BCKDF	\$11,454	2010-2011
Principal applicant	The Cariboo Alpine Transect Expansion, Env. Canada Science Horizons	\$12,000	2010-2011
Darwyn Coxson, co-applicant	Climate change vulnerability of old-growth forests in BC's Inland Temperate Forest, FFESC	\$43,000	2010-2011
Principal applicant	The water budget of a mountainous watershed, NSERC Discovery grant	\$111,500	2006-2010
Principal applicant	Canada Research Chair in Northern	\$500,000	2005-2010

	Hydrometeorology	(×2)	2011-2015
Principal applicant	Supplement to the CRC	\$200,000 (×2)	2005-2010 2011-2015
Eddison Lee-Johnson, co-applicant	Reducing the carbon footprint of Stelat'en First Nation, Environment Canada, ecoAction	\$47,578 (0%)	2009-2010
Darlene Sanderson, co-applicant	Reducing the carbon imprint of Stelat'en First Nation, MITACS	\$15,000 (100%)	2009-2010
Fiamma Straneo, co-applicant	From rivers to the ocean..., National Science Foundation (USA) - Oceans	\$887,239 (0%)	2008-2010
Alain Pietroniro/Fred Wrona, co-applicant	Arctic Freshwater Systems, NSERC-IPY	\$100,000	2007-2010
Brian Menounos, co-applicant	Western Canadian Cryospheric Network, CFCAS	\$2,130,591 (4.6%)	2006-2010
Principal applicant	Monitoring the changing climate of BC's Interior Wetbelt, Environment Canada Science Horizons	\$12,000	2009
Eric Rapaport, co-applicant	PIBC climate change workshop, BC Hydro	\$5,000 (0%)	2008
Principal applicant	Development of the Cariboo Alpine Mesonet, HRSDC Career Focus	\$15,000	2008
Principal applicant	Arctic Change 2008, UNBC travel grant	\$1,000	2008
Principal applicant	A meteorological network to monitor environmental change..., NSERC RTI	\$32,300	2008
Principal applicant	An eddy covariance system..., NSERC RTI	\$24,975	2007
Principal applicant	Closing the water budget of the Quesnel River Basin, UNBC seed grant	\$4,990	2007
Principal applicant	Publication grant, UNBC	\$1,461	2006
Principal applicant	CGU 2006, UNBC travel grant	\$1,162	2006
Principal applicant	BCKDF supplement to CFI grant, BCKDF	\$60,416	2005
Principal applicant	Infrastructure grant, CFI	\$60,416	2005
Principal applicant	UNBC start-up funds	\$15,000	2005
Principal applicant	UNBC supplement to CFI, UNBC	\$20,200	2005
Total (direct funds)		\$3,190,920	

10. Supervision:

Current Students and Research Staff

2013-2014 Sina Abadzadesahraei (Ph.D. student)
2013-2014 Michael Allchin (Ph.D. student)

2013-2014 Pabitra Gurung (Ph.D. student)
 2013-2014 Marco Hernández-Henríquez (Research Associate)
 2010-2014 Heidi Knudsvig (Master's student)
 2013-2014 Ian Picketts (PDF, co-supervised with Dr. Margot Parkes)
 2012-2014 Aseem Raj Sharma (Master's student)
 2013-2014 Bunu Sharma (Master's student)
 2014-2014 Kyle Siemens (Field Assistant)
 2014-2014 Derrick van Tol (Undergraduate field assistant)

Former Students and Research Staff

2013-2014 Geoff Kershaw (Research Assistant)
 2012-2014 Do-Hyuk Kang (Post-doctoral fellow)
 2012-2012 Sam Albers (Research Assistant, co-supervised with Dr. Ellen Petticrew)
 2012-2012 Andrew Duncan (Undergraduate field assistant)
 2013-2014 James Fraser (Research Assistant)
 2012-2012 Abigail Lewis (Part-time undergraduate field assistant)
 2012-2012 Ewan Jones (Part-time undergraduate field assistant)
 2012-2012 Suin Lee (Undergraduate student)
 2012-2012 Kate Hrinkevich (Part-time Research Assistant)
 2013-2013 Ben McGrath (Undergraduate field assistant, now undergraduate student at the University of Victoria)
 2011-2012 Allan Padilla (Research Associate)
 2012-2014 Kabir Rasouli (Part-time Research Associate, now doctoral student at the University of Saskatchewan)
 2010-2011 Bryndel Fell (Research Associate)
 2011-2011 Jake McQueen (Undergraduate Field Assistant, now meteorological technician for Pies Knighthold)
 2009-2012 Ian Picketts (Ph.D., co-supervised with Dr. John Curry, now PDF at UNBC)
 2007-2010 Kara Przewczek (Master's, co-supervised with Dr. Brian Menounos)
 2007-2010 Tullia Upton (Master's, now Ph.D. candidate, Oregon State U.)
 2009-2010 Darlene Sanderson (Post-doctoral Fellow, now post-doctoral fellow, University of Victoria)
 2008-2010 Theo Mlynowski (Research Assistant, now Master's student, UNBC)
 2008-2010 Marco Hernández-Henríquez (Research Assistant, now doctor of naturopathic medicine student at the Canadian College of Naturopathic Medicine, Toronto, Ontario)
 2008-2009 Amir Yadghar (Research Associate, now research associate at Concordia)
 2008-2010 Jinjun Tong (Ph.D., now post-doctoral fellow, U. of California, Irvine)
 2007-2008 Andy Clifton (Post-doctoral Fellow, now technical sales manager at Natural Power Consultants)
 2007-2008 Sara Ormenyi (Undergraduate Student from California State University, Northridge, now customer service specialist at REI)
 2006-2008 Shane MacLeod (Research Assistant, now environmental technician at Goldcorp Canada – Equity Silver)

2005-2008 Jason Burford (Research Associate, now meteorologist with Environment Canada)

11. Teaching:

Since joining UNBC, I have taught three courses regularly: ENSC 312 (“Biometeorology”), ENSC 408/608 (“Storms”), and ENSC 454/654 (“Snow and Ice”), a course that I proposed and developed. These are either required or optional courses in the upper level environmental science and engineering undergraduate degrees, although many of our students come from other programs such as geography, chemistry, and biology. “Storms” and “Snow and Ice” are also offered as graduate courses in the natural resources and environmental studies master’s program. Typically, the number of students in these classes ranges from 5 to 20, allowing for a personal and informal approach to teaching. Apart from these courses, I have contributed to seven directed graduate independent studies (NRES 799), two directed undergraduate independent studies (ENSC 499), one undergraduate internship (ENSC 440), two seminar courses (NRES 799 and NRES 804), and one undergraduate thesis (GEOG 499). I have also contributed 14 guest lectures in various UNBC courses.

Maintaining a high level of teaching excellence is one of my main goals as faculty. This includes ensuring course materials are presented in a clear and easily accessible manner. Thus all electronic course materials (lecture notes and labs, presentations, articles, etc.) are provided on the course website for the students’ convenience. Notes and presentations are usually provided prior to the lectures to the students and they are thus encouraged to actively engage in the class discussions rather than focus on taking notes. Field trips (such as to UNBC’s Quesnel River Research Centre in Likely, BC) are advocated since these provide students with unique opportunities to learn in their natural environment. Being accessible to students remains one of my highest priorities as UNBC faculty. I have an open-door policy and students are always encouraged to drop by my office with questions or comments on course materials, even outside my normal office hours. I also respond to voice mail and email messages as quickly as possible, even on evenings and weekends.