

## **CURRICULUM VITAE**

David Roy Clements, Professor,  
Biology and Environmental Studies,  
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## **EDUCATION**

### Graduate Studies:

Ph.D., Queen's University, Kingston, Ont., Canada 1991  
Subject: Integrated pest management in apple orchards

### Undergraduate Studies:

B.Sc., University of Western Ontario, London, Ont., Canada 1986  
Specialization: Ecology and Evolution; B.Sc. thesis subject: Weed ecology

## **AFFILIATIONS**

A Rocha Canada—Christians in Conservation (founding board member, served from 1996-2011)  
Agricultural Institute of Canada – member of Scientific Journals Committee (2008-2010)  
American Scientific Affiliation/ Canadian Christian and Scientific Affiliation (member)  
Canadian Journal of Plant Science, Associate Editor with responsibility for the Biology of  
Canadian Weeds Series (2004-2009)  
Canadian Weed Science Society (President; chair of Biology of Weeds committee + served 4  
years with the Awards committee)  
Derek Double Day Arboretum stakeholders group (2008-present)  
Garry Oak Ecosystems Recovery Team  
Invasive Plant Council of BC (member of research and development committee)  
Journal of Crop Improvement (editorial board 2001-2010)  
Langley Environmental Partners Society (board of directors 2001-2009; Chair 2008-2009)  
Langley Field Naturalists board member (2010-2011)  
The Northwest Scientific Association  
Pacific Science Board of Editors (2007-present)  
Salmon River Enhancement Society (board of directors 1997-2010)  
Soil and Water Conservation Society (Treasurer for the BC chapter 2004-present)  
University of British Columbia (Faculty Associate in the Forest Science Department)  
Weed Research editorial board (2007-present)  
Weed Science Society of America

## EXPERIENCE

Professor of Biology and Environmental Studies at Trinity Western University, Langley, B.C., Canada (1994-present); co-coordinator of Environmental Studies, teaching courses in plant biology and ecology (promoted to full professor in 2006)

**Research areas:** Restoration ecology, plant ecology, weed science, invasive species ecology, agroecology, allelopathy, seed bank biology, watershed ecology, environmental ethics

**Academic exchange with Yunnan Academy of Agricultural Sciences (China):** Oct. 2010, Oct. 2011 and Aug. 2012. Three 1 week trips to advise on the invasive plant *Mikania micrantha*.

**Taught 5-week field courses** for the Au Sable Institute of Environmental Studies (Pacific Rim Campus, Whidby Island, WA); Plant Ecology in 2002 and 2004 and Field Botany in 2008.

**Participant in a 3-week seminar at Calvin College**, Grand Rapids, MI: "Christian environmentalism with/out Boundaries" in 2003

**Sabbatical (2000-2001)** with Dr. C.J. Swanton at the Dept. of Plant Agriculture, University of Guelph, Guelph, ON and also with Dr. P.B. Cavers in the Dept. of Biology, University of Western Ontario, London, ON

**Sabbatical (2009-2010)** focussing on research in grassland systems on Salt Spring Island, BC and Whidbey Island, WA.

**Research associate (1991-1994)** with Dr. C.J. Swanton, Dept of Crop Science, University of Guelph. Conducted a variety of research efforts on various ecological approaches to integrated weed management. Assisted with a graduate course in plant ecology.

**Graduate student supervision:** served on supervisor committee of Ph.D. candidate Emily Gonzales in the UBC Faculty of Forestry (defended in January 2008) and was involved in supervision of a number of graduate students at University of Guelph, 1991-1994.

**Courses taught:** General Biology (BIOL 113/114), General Ecology (BIOL 381), Invertebrate Zoology (BIOL 360), Biology of Vascular Plants (BIOL 212/312), Biology of Non-Vascular Plants (BIOL 214/314), Plant Ecology (BIOL 216/316), Tropical Botany (BIOL 318), Biology & Faith (BIOL 390), Directed Studies in Biology (BIOL 400), Applied Ecology (BIOL 482), Natural and Applied Science capstone course (NATS 487)

**Other course involvement:** Senior Thesis supervisor (BIOL 409/410 or ENVS 409/410), mentor in IDIS 400 (interdisciplinary), guest lecturer in IDIS 400 and NATS 487

**Administrative involvement:** Co-coordinator of Environmental Studies, Environmental Studies Committee, Ecological Stewardship Committee

Teaching assistant for 2nd and 3rd yr population and organismal biology courses at Queen's (1986-1988, 1990-1991)

Teaching assistant for 1st yr biology at U.W.O. (1985-1986)

Research assistant for Dr. P.B. Cavers, Dept. of Plant Sciences, U.W.O. (April-September, 1985)  
Weed ecology research

Research assistant for Grizzly Bear Habitat study in northern Alberta, with Western Wildlife Environments Consulting Limited (May-August, 1983)

### **Grant Funding**

Environment Canada Habitat Stewardship Program \$39,300 "Garry oak ecosystem restoration" (2011-2012)

NSERC Discovery Grant. Restoration of Garry oak ecosystems. (2009-2010). \$17,000

Invasive Alien Species Partnership Program award (administered by Environment Canada): funding a symposium - Invasive plants: inventories, strategies and action. CWSS-SCM 2006 Symposium, Victoria, B.C. and the resulting publication (2006-2008). \$39,500

Okanagan Habitat Restoration Research Contract (c/o Dr. G.G.E. Scudder's NSERC): \$6,300

### **Contracts**

*Garry oak restoration guide* for the Garry oak ecosystems recovery team (GOERT, 2010) [\$6857 contract for editorial team, David R. Clements and Tracey Hooper]

2<sup>nd</sup> contract: \$2600 contract for editorial team, David R. Clements and Tracey Hooper] to complete the guide

Publications for CABI in 2009-2013 (Centre for Agricultural Bioscience International)

- Invasive Plant Species ISC datasheet for *Mikania scandens* [\$450 U.S. contract]
- Invasive Plant Species ISC datasheet for *Rumex acetosella* [\$450 U.S. contract]
- Invasive Plant Species ISC datasheet for *Rubus argutus* [\$450 U.S. contract]
- Invasive Plant Species ISC datasheet for *Passiflora suberosa* [\$450 U.S. contract]
- Invasive Plant Species ISC datasheet (supplement) for *Cinchona pubescens* [\$200 U.S. contract]
- Invasive Plant Species ISC datasheet (full review) for *Sida acuta* [\$350 U.S. contract]
- Invasive Plant Species ISC datasheet for *Typha latifolia* [\$450 U.S. contract]

### **PUBLICATIONS**

1. Day, M.D., Clements, D. R., Gile, C., Shen, S., Weston, L.A., and Zhang, F. 2013. Biology and impacts of Pacific Island invasive species. X. *Mikania micrantha*, mile-a-minute (Magnoliopsida: Asteraceae). *Pacific Science in prep*
2. Clements, D. R. 2013. Translocation of rare plant species to restore Garry oak ecosystems in western Canada: challenges and opportunities. *Botany* 91(5): 283-291.
3. Steensma K.M.M., Clements, D.R., Wood, J.R., Van Dragt, R., and Lowe, B. 2013. Stewarding the gift of land: Christian campuses as land management models. *Perspectives on Science and Christian Faith*. 65(2): 104-115.

4. Clements, D. R., and DiTommaso, A. 2012. Predicting weed invasion in Canada under climate change: evaluating evolutionary potential. *Can. J. Plant Sci.* 92: 1013-1020.
5. Clements, D. R. and Atwood, L. B. 2012. Protecting Ecosystems from Underground Invasions - Seed Bank Dynamics in a Semi-Arid Shrub-Steppe, *Diversity of Ecosystems*, Prof. Mahamane Ali (Ed.), ISBN: 978-953-51-0572-5, InTech, Available from: <http://www.intechopen.com/books/diversity-of-ecosystems/protecting-ecosystems-from-underground-invasions-seed-bank-dynamics-in-a-semi-arid-shrub-steppe>
6. Darbyshire, S. J., Francis, A., DiTommaso, A. and Clements, D. R. 2012. The Biology of Canadian weeds. 150. *Erechtites hieraciifolius* (L.) Raf. ex DC. *Can. J. Plant Sci.* 92: 729-746.
7. Stopps, G. J., White, S. N., Clements, D. R. and Upadhyaya, M. K. 2011. The Biology of Canadian weeds. 149. *Rumex acetosella* L. *Can. J. Plant Sci.* 91: 1037-1052.
8. Clements, D.R. and DiTommaso, A. 2011. Climate change and weed adaptation: can evolution of invasive plants lead to greater range expansion than forecasted? *Weed Res.* 51: 227-240.
9. Francis, A., Darbyshire, S.J., Clements, D. R. and DiTommaso, A. 2011. The Biology of Canadian Weeds. 146. *Lapsana communis* L. *Can. J. Plant Sci.* 91: 553-569.
10. Clements, D.R., Luginbill, S., Jordan, D.A., Van Dragt, R., and Pelant, R. 2011. Techniques to promote Garry oak seedling growth and survival in areas with high levels of herbivory and competition. *Northwest Sci.* 85: 172-181.
11. Dennehy, C., Alverson, E.R., Anderson, H.E., Clements, D.R., Gilbert, E.R., and Kaye, T.N. 2011. Management strategies for invasive plants in Pacific Northwest prairies, savannas, and oak woodlands. *Northwest Sci.* 85: 329-351.
12. Clements, D.R. and Scott, L. 2011. Weed invasion of the Montane Cordillera Ecozone. *In Assessment of Species Diversity in the Montane Cordillera Ecozone. Edited by G.G.E. Scudder and I.M. Smith.* Royal British Columbia Museum. Pages 1-29. [http://www.royalbcmuseum.bc.ca/Content\\_Files/Files/mce/weed\\_invasion.pdf](http://www.royalbcmuseum.bc.ca/Content_Files/Files/mce/weed_invasion.pdf)
13. Gonzales, E.K. and Clements, D.R. 2010. Plant community biomass shifts in response to mowing and fencing in invaded oak meadows with non-native grasses and abundant ungulates. *Restoration Ecology* 18: 753-761.
14. DiTommaso, A., Clements, D. R., Darbyshire, S. J. and Dauer, J. T. 2009. The Biology of Canadian Weeds 143. *Apocynum cannabinum* L. *Can. J. Plant Sci.* 89: 977-992.
15. Qaderi, M. M., Clements, D. R. and Cavers, P. B. 2009. The Biology of Canadian Weeds 139. *Rhamnus cathartica* L. *Can. J. Plant Sci.* 89: 169-189.

16. Feenstra, K. R. and Clements, D. R. 2008. Biology and impacts of Pacific Island invasive species. 4. *Verbesina encelioides*, Golden Crownbeard (Magnoliopsida: Asteraceae). Pacific Science 62: 161-176.
17. Clements, D. R., Feenstra, K. R., Jones, K. and Staniforth, R. 2008. The biology of invasive plants in Canada 9. *Impatiens glandulifera* Royle. Can. J. Plant Sci. 88: 403-417.
18. Clements, D. R. and Catling, P. 2007. Invasive species issues in Canada – How can ecology help? Can. J. Plant Sci. 87: 989-992.
19. Clements, D. R. and Darbyshire, S. J. eds. 2007. Invasive plants: Inventories, strategies and action. Topics in Canadian Weed Science, Volume 5. Sainte Anne de Bellevue, Québec: Canadian Weed Science Society – Société canadienne de malherbologie. 165 pp.
20. Clements, D. R. and Darbyshire, S. J. 2007. Introduction. Pages 1-4 in Invasive plants: Inventories, strategies and action. Topics in Canadian Weed Science, Volume 5. Sainte Anne de Bellevue, Québec: Canadian Weed Science Society – Société canadienne de malherbologie. 165 pp.
21. Clements, D.R., Krannitz, P.G. and Gillespie, S.M. 2007. Seed banks of invasive and native plant species in a semi-desert shrub-steppe with varying grazing histories. Northwest Science 81: 37- 49.
22. Clements, D.R. and Daehler, C. 2007. Introducing a new series: Biology and impacts of Pacific Island Invasive Species. Pacific Science 61:1.
23. Clements, D.R. and Warners, D.P. 2006. “The Plants We Grow”, pages 57-62 In: Koetje, D.S. (ed) Living the Good Life on God’s Good Earth. Grand Rapids, MI: Faith Alive Christian Resources. 83 pp.
24. Swanton, C.J., Booth, B.D., Chandler, K., Clements, D.R. and Shrestha, A. 2006. Management in a modified no-tillage corn–soybean–wheat rotation influences weed population and community dynamics. Weed Science 54:47-58.
25. Murphy, S.D., Clements, D.R., Belaoussoff, S., Kevan, P.G. and Swanton, C.J. 2006. Promotion of weed species diversity and reduction of weed seedbanks with conservation tillage and crop rotation. Weed Science 54:69-77.
26. Clements, D.R. and Corapi, W.V. 2005. Paradise lost? Setting the boundaries around invasive species. Perspectives on Science and Christian Faith 57:44-54.
27. Shrestha, A., Clements, D.R. and Upadhyaya, M.K. 2004. Weed management in agroecosystems: Towards a holistic approach. In: Recent Research Developments in Crop Science, 1: 451-477. Published by Research Signpost, Trivandrum, Kerala, India.

28. Clements, D.R., DiTommaso, A., Jordan, N., Booth, B., Murphy, S.D., Cardina, J., Doohan, D., Mohler, C., Swanton, C.J. 2004. Adaptability of plants invading North American Cropland. *Agriculture, Ecosystems and Environment* 104:379-398.
29. Clements, D.R. and Shrestha, A. (eds.). 2004. *New Dimensions in Agroecology*. The Haworth Press, Binghamton, NY. 553 pp.
30. Clements, D.R. and Shrestha, A. 2004. New dimensions in agroecology for developing a biological approach to crop production. *Journal of Crop Improvement* 11(1/2):1-20.
31. Clements, D.R., DiTommaso, A., Darbyshire, S.J., Cavers, P.B. and Sartono, A.D. 2004. Biology of Canadian Weeds.127. *Panicum capillare* L. *Canadian Journal of Plant Science* 84: 327-341.
32. Clements, D.R., Cole, D., Darbyshire, S.J., King J. and McClay, A. 2004. Biology of Canadian Weeds. 128. *Leucanthemum vulgare* Lam. *Canadian Journal of Plant Science* 84: 343-363.
33. Cavers, P. B., Warwick, S. I. and Clements, D. R. 2003. The biology of Canadian weeds. Revised instructions and format, updated lists of accounts published and in preparation. *Canadian Journal of Plant Science* 83: 661-665.
34. Shrestha, A. and Clements, D.R. 2003. Emerging trends in cropping systems research. *Journal of Crop Production* 8:1-14.
35. Klemow, K.M., Clements, D.R., Threadgill, P.F., and Cavers, P.B. 2002. The biology of Canadian weeds 116. *Echium vulgare* L. *Canadian Journal of Plant Science* 82: 235-248.
36. Swanton, C.J., Shrestha, A., Clements, D.R. and Chandler, K. 2002. Evaluation of alternative weed management systems in a no-till corn-soybean-winter wheat rotation: Crop yield and economic analysis. *Weed Science* 50: 504-511.
37. Clements, D.R., Peterson, D.J. and Prasad, R. 2001. The biology of Canadian weeds. 112. *Ulex europaeus* L. *Canadian Journal of Plant Science* 81: 325-337.
38. Clements, D.R. and Swanton, C.J. 2001. Agriculture: healthy, sick or left in the waiting room? Pages 125-140 in Chesworth, W., Moss, M. R. and Thomas, V. G. (eds.) *Malthus and the Third Millennium*. Faculty of Environmental Sciences, University of Guelph, Guelph, ON.
39. Clements, D.R., M.K. Upadhyaya, and S.J. Bos. 1999. The biology of Canadian weeds 110. *Tragopogon dubius Scop., Tragopogon pratensis L., and Tragopogon porrifolius L.* *Canadian Journal of Plant Science* 79: 153-163.
40. Thistlewood, H.M.A., D.R. Clements, and R. Harmsen. 1996. Stigmaeidae. Pages 457-470 in Lindquist, E.E., M.W. Sabelis and J. Bruin (eds) *Eriophyoid Mites – Their Biology, Natural Enemies and Control*. World Crop Pests Vol. 6. Elsevier, Amsterdam.

41. Swanton, C.J., S.D. Murphy, D.J. Hume and D.R. Clements. 1996. Recent improvements in the energy efficiency of agriculture: Case studies from Ontario, Canada. *Agricultural Systems* 52:399-418.
42. Clements, D.R., D.L. Benoit, S.D. Murphy and C.J. Swanton. 1996. Tillage effects on weed seed return and seedbank composition. *Weed Science* 44:314-322.
43. Saner, M.A., D.R. Clements, M.R. Hall, D.J. Doohan, C.W. Crompton. 1995. The biology of Canadian weeds 105. *Linaria vulgaris* L. *Canadian Journal of Plant Science* 75:525-537.
44. Clements, D.R., C.J. Swanton, S.F. Weise, R. Brown, D. Hume and P. Stonehouse. 1995. Energy analysis of tillage and herbicide inputs in alternative weed management systems. *Agriculture, Ecosystems and Environment* 52:119-128.
45. Aflakpui, G.K.S., G.W. Anderson, T.J. Vyn, D.R. Clements, M.R. Hall and C.J. Swanton. 1994. Crop management systems for corn (*Zea mays* L.) following established alfalfa (*Medicago sativa* L.). *Canadian Journal of Plant Science* 74:255-259.
46. Clements, D.R., S.F. Weise and C.J. Swanton. 1994. Integrated weed management and weed species diversity. *Phytoprotection* 75:1-18.
47. Swanton, C.J., D.R. Clements and D.A. Derksen. 1993. Weed succession under conservation tillage: A hierarchical framework for research and management. *Weed Technology* 7:286-297.
48. Clements, D.R. and R. Harmsen. 1993. Prey preferences of adult and immature *Zetzellia mali* Ewing (Acari: Stigmaeidae) and *Typhlodromus caudiglans* Schuster (Acari: Phytoseiidae). *Canadian Entomologist* 125:967-969.
49. Clements, D.R. and R. Harmsen. 1992. Stigmaeid-phytoseiid interactions and the impact of the natural enemy complex on plant inhabiting mites. *Experimental and Applied Acarology* 14:327-341.
50. Li, S.Y., D.R. Clements and R. Harmsen. 1992. The impact of low dose pyrethroid applications on the spotted tentiform leafminer, *Phyllonorycter blancardella* (Lepidoptera: Gracillariidae) and its parasitoids in an apple orchard. *Journal of Economic Entomology* 85:192-201.
51. Swanton, C.J., P.B. Cavers, D.R. Clements and M.J. Moore. 1992. Biology of Canadian Weeds 101. *Helianthus tuberosus* L. *Canadian Journal of Plant Science* 72:1367-1382.
52. Clements, D.R., R. Harmsen and P.J. Clements. 1991. A mechanistic simulation to complement an empirical transition matrix model of acarine population dynamics. *Ecological Modelling* 59:257-277.
53. Clements, D.R. and R. Harmsen. 1990. Predatory behavior and prey-stage preferences of stigmaeid and phytoseiid mites and their potential compatibility in biological control. *Canadian Entomologist* 122: 321-328.

54. Clements, D.R. and P.B. Cavers. 1990. Seasonal viability patterns and the role of incomplete seed development in the life history strategy of *Linaria vulgaris*. *Naturaliste canadienne*. 117:189-198.

#### **NON-REFEREED PUBLICATIONS**

1. Clements, D.R., Hooper, T.D., Martell, K., and Masson, C. (eds.). 2011. Restoring British Columbia's Garry Oak Ecosystems: Principles and Practices. Garry oak ecosystems recovery team. 520 pp. [http://www.goert.ca/gardeners\\_restoration/restoration.php](http://www.goert.ca/gardeners_restoration/restoration.php)
2. Clements, D.R. 2011. Review of "Global Warming and the Risen Lord: Christian Discipleship and Climate Change by Jim Ball". *Perspectives on Science and Christian Faith* 63:206-207.
3. Brown, P.D., D.A. Jordan, G. Jordan, D. Clements, K. VanderGugten, S. Steunenberg, T. Buhler, M. Ness, M. Paivinen, and D. Budi Ayu. 2010. Langley Bog Scientific Projects Report, 2008-2009. Trinity Western University Environmental Studies Research Report 012011. Trinity Western University, Langley, BC.
4. Shrestha, A., M.K. Upadhyaya, and D. Clements. 2006. Seeking solutions: Researchers shine a spotlight on alternative weed management tools. *American/Western Fruit Grower*. 12-14.
5. Upadhyaya, M.K., D. Clements and R. Cranston. 2003. Purple Loosestrife: Don't Let This Beauty Fool You. *Agri-Digest* September/October, p. 25.
6. Graham, P. 2003. Invasive plants of southwestern British Columbia. <http://www.shim.bc.ca/invasivespecies/title.htm> (D.R. Clements, editor).

#### **SCHOLARLY PRESENTATIONS [presenter(s) marked with an asterisk\*]**

1. Clements, D.R. 2012. Predicting how far mile-a-minute (*Mikania micrantha* Kunth.) will invade. Canadian Weed Science Society Annual meeting, Winnipeg, Manitoba.
2. Alexander, B.C.\*, Beckie, H.J., Clements, D.R., Nurse, R.E., Simard, M-J., Hall, L.M. 2012. Quantifying the relative invasive potential of PNT using demographic analysis. Canadian Weed Science Society Annual meeting, Winnipeg, Manitoba.
3. Clements, D.R.\* and Shrestha, A. 2012. High tech and human pride versus the inexorable evolution of weeds. International Eco-theological (Ecothee) Symposium, Renew it. Do it. Green the Scene! Surrey, BC.
4. L.M. Hall\*, B. Alexander, H.J. Beckie, M-J. Simard, R.E. Nurse, D. Clements. 2012. Quantification of invasiveness in crops using demographic analysis. 12th International Symposium on Biosafety of Genetically Modified Organisms (ISBGMO12). St Louis, Missouri, USA (September).



5. Clements, D.R. 2012. Translocation of rare plant species to restore Garry oak ecosystems in western Canada: challenges and opportunities. Botanical Society of America (Joint meeting with the Canadian Botanical Association), Columbus, OH. Invited talk.
6. Clements, D.R.\* and Gile, C. 2012. Mile-a-Minute Weed (*Mikania micrantha*) Infestations in the Indo-Pacific: Can We Put the Brakes on These Invasions? Weed Science Society of America, Kona, HI.
7. Clements, D.R.\* and Gile, C. 2011. Japanese knotweed (*Fallopia japonica* Houtt.): getting to the root of the problem. Canadian Weed Science Society, Niagara Falls, ON.
8. Alexander, B.\*, Beckie, H., Clements, D., Nurse, R., Simard, M.-J., Hall, L. 2011. Validating demographic analysis as a method for predicting the invasive potential of plant species. Canadian Weed Science Society, Niagara Falls, ON. [poster]
9. Gile, C.\* and Clements, D.R. 2011. Effects of different control methods on the rhizomes of Japanese knotweed (*Fallopia japonica* Houtt.) Invasive Plant Council of BC Research Forum, Richmond, BC. [poster]
10. Gile, C.\* and Clements, D.R. 2011. Effects of different control methods on the rhizomes of Japanese knotweed (*Fallopia japonica* Houtt.) Murdock Undergraduate Research Conference, Seattle University, Seattle, WA. [poster]
11. Hall, L.M.\*, Beckie, H.J., Simard, M.-J., Nurse, R.E. and Clements, D.R. 2011. New crops with new traits: are they weedy or invasive. Plant Canada, Halifax, NS. [invited talk]
12. Clements, D.R. 2011. Vulnerability of plant communities in coastal British Columbia to past and future environmental change. Plant Canada, Halifax, NS. [invited talk]
13. Clements, D.R.\* and DiTommaso, A.D. 2011. Predicting weed invasion of Canada under climate change: measuring evolutionary potential. Plant Canada, Halifax, NS. [invited talk]
14. Methven, D.\* and Clements, D.R. 2011. Induction of condensed tannins in Garry oak (*Quercus garryana*) foliage. Garry oak ecosystem recovery team (GOERT) Research Colloquium, Victoria, BC [11 Feb. 2011].
15. Clements, D.R.\*, Luginbill, S., Jordan, D., Van Dragt, R. and Pelant, R. 2010. Techniques to promote Garry oak seedling survival in areas with high levels of herbivory and competition. Northwest Science Annual Meeting, Centralia, WA.
16. Methven, D.\* and Clements, D.R. 2010. Field studies of the larval biology of *Propertius duskywing* (*Erynnis propertius*). Garry oak ecosystem recovery team (GOERT) Research Colloquium, Victoria, BC [4 Mar. 2010].

17. Clements, D.R.\* and Steunenberg, S. 2010. Competition between native (*Vaccinium oxycoccus*) and non-native (*V. macrocarpon*) cranberries in a *Sphagnum* bog. BC Invasive Plant Council Annual Forum, Richmond, BC.[poster]
18. Clements, D.R. 2010. Pacific islands invaded by pigs, plants and people: is paradise lost? Thompson Rivers University, Environmental Science Seminar Series, Kamloops, BC. [14 Jan. 2010].
19. Clements, D.R.\* and Steunenberg, S. 2009. A tale of two cranberry species: native (*Vaccinium oxycoccus*) vs. non-native (*V. macrocarpon*). Canadian Weed Science Society, Charlottetown, Prince Edward Island.
20. Methven, D.\* and Clements, D.R. 2009. The relationship between Propertius duskywing larvae and the Garry Oak Ecosystem. Murdock Undergraduate Research Conference, Spokane, WA. [poster]
21. Clements, D.R. 2009. Weed ecology in the antelope brush ecosystem. Pacific Regional Society of Soil Science Fall Field Trip, Oliver, BC. [invited talk]
22. Clements, D.R. 2008. Seed bank responses to restoration techniques in an invaded semi-desert plant community. Canadian Weed Science Society, Banff, AB.
23. Clements, D.R.\* and Gonzales, E.K. 2008. Restoration techniques for Garry oak meadows with abundant non-native grasses and herbivores. BC Invasive Plant Council Research Forum, Richmond, BC. [invited talk]
24. Clements, D.R.\* and Carlson, G. 2008. Conservation science, doing right and walking humbly: An A Rocha perspective. American Scientific Affiliation, George Fox University, Newberg, Oregon.
25. Clements, D.R.\*, Zhou A. and Brown, P.D. 2008. Invasive plant management from cradle to grave: management of decomposition of the annual *Impatiens glandulifera*. 5<sup>th</sup> International Weed Science Congress, Vancouver, BC. [poster]
26. Clements, D.R. 2008. Invasive plant research in Western Canada: University Perspective. Manitoba Invasive Species Council Forum "BREAKING DOWN BORDERS: Issues and Actions for Invasive Plant Species in Western Canada." Winnipeg, Manitoba. [invited talk]
27. Clements, D.R. 2007. Long-term strategies against invasive weeds: case study from Langley, BC. Canadian Weed Science Society, Mt. Tremblant, QC.
28. Clements, D.R. and Cavers, P.B. 2007. The biology of Canadian Weeds. Update on the series. Canadian Weed Science Society, Mt. Tremblant, QC. [poster]
29. Gonzales, E.K. and Clements, D.R.\* 2007. Community response to two types of disturbance: Lessons for Garry oak ecosystem restoration. Plant Canada, Saskatoon, SK. [invited talk]

30. Campbell, K.R. and Clements, D.R. 2006. Investigation of allelopathic phenolics exuded from roots of *Verbesina encelioides*. Canadian Weed Science Society, Victoria, BC. [poster]
31. Campbell, K.R.\* and Clements, D.R. 2006. Investigation of allelopathic phenolics exuded from roots of *Verbesina encelioides*. Murdock Pacific Northwest conference [poster]
32. Steensma, K.M.M.\* and Clements, D.R.\* 2006. A Tale of Oaks, Salmon and Snails: Land Stewardship at Trinity Western University. American Scientific Affiliation, Calvin College, Grand Rapids, Michigan.
33. Roberts, K.\*, Koole, S. and Clements, D. 2006. Garry oak meadow restoration through Douglas-fir removal. Garry Oak Ecosystems Research Colloquium, Victoria, BC.
34. Clements, D.R.\*, Campbell, K., Becker, A, and Bainard, J.D. 2005. Phenotypic differences between a coastal and an interior population of purple loosestrife (*Lythrum salicaria* L.) in British Columbia. Canadian Weed Science Society, Niagara Falls, ON. [poster]
35. Newmaster, S. G.\* , S. Ragupathy, C. A. Lacroix, J. Levac, D. R. Clements, B. Booth, M. Irvine, F. W. Bell, M. Cowbrough and J. Alex. 2005. Invasive Alien Plants in Ontario. Popular Summary from Eastern Canadian Vegetation Management Associations Conference. October 4-6, Kingston, Ontario.
36. Shelvey, B.\* and D.R. Clements. 2005. Surviving in paradise: Keeping the image of the Kipahulu Valley pristine. American Society of Environmental History, Houston, TX.
37. Clements, D.R. 2005. Invasive species and ethical values: learning from the Hawaiian experience. Weed Science Society of America, Honolulu, HI.
38. Becker, A., Clements, D.R.\* and Kunstar, H. 2004. Optimal timing and control treatments for Scotch broom. Canadian Weed Science Society, Winnipeg, MT. [poster]
39. Clements, D.R.\* and Corapi, W. V. 2004. Paradise lost? Setting the boundaries around weeds. American Scientific Affiliation, Langley, BC. [symposium talk]
40. Clements, D.R.\* 2004. Adaptability of cropland weeds: the genetic route across the border. Weeds Across Borders (North American Weed Management Association), Minneapolis, MN [invited talk]
41. Clements, D.R.\* 2004. Invasive weeds of BC. BC Society of Landscape Architects, Vancouver, BC. [invited talk]
42. Clements, D.R.\* 2003. Invasive weeds of BC. Canadian Weed Science Society, Halifax, NS. [invited talk]
43. Shriner, H. and Clements, D.R.\* 2003. Seedbanks, herbivory and N dispersion for Scotch broom (*Cytisus scoparius* L.). Canadian Weed Science Society, Halifax, NS [poster]

44. Kunstar, H.C\* and Clements, D.R. 2003. Seed banks, propagation and solarization in grassland restoration with *Sporobolus cryptandrus*. Soil and Water Conservation Society, Spokane, WA. [poster]
45. Clements, D.R.\* 2003. Knapweed seed banks in antelope brush. Society for Ecological Restoration Meeting (BC Chapter), Osoyoos, BC. [poster]
46. Clements, D.R.\*, Vander Woude, J., and Johnson, J.L. 2002. Weed adaptability: Coastal vs. interior purple loosestrife. Canadian Weed Science Society, Saskatoon, SK. [poster]
47. Clements, D.R.\* and Corapi, W. 2002. Responsible stewardship: What about pigs? American Scientific Affiliation, Malibu, California.
48. Clements, D.R. and Shrestha, A.\* Oct., 2001. New dimensions in agroecology for developing a biological approach to crop production. Joint meeting of the Agronomy Society of America, the Soil Science Society of America and ... (Invited paper)
49. Clements, D.R.\* July, 2001. Stewardship of creation: what about the weeds? American Scientific Affiliation, Manhattan, Kansas.
50. Swanton\*, C.J., Shrestha, A., Chandler, K., Clements, D.R. and Booth, B. July, 2001. Alternative weed management systems in a no-till corn-soybean-winter wheat rotation. Canadian Society of Agronomy, Guelph, ON.
51. Swanton\*, C.J., Shrestha, A., Chandler, K., Clements, D.R. and Booth, B. February, 2001. Agronomic and ecological evaluation of weed management systems in a no-till corn-soybean-winter wheat rotation. Weed Science Society of America, Greensboro, NC. [note, my name was added after submission of the abstract but was in the title slide of the presentation]
52. Clements, D.R.\* 2000. The war on biological invaders: Churchill's defiance or Chamberlain's complicity? Inheriting the Earth: Faith, Conflict and the Environmental Professional. 2<sup>nd</sup> in the series of Canadian conferences for Christian environmental professionals, held at Trinity Western University in Langley. I chaired the conference, along with John R. Wood (The King's University College) and Bruce Shelvey (TWU).
53. Clements, D.R.\*, Birch, B. and Snidal, T. 2000. Invasive characteristics of Himalayan balsam, *Impatiens glandulifera*. Weed Science Society of America annual meeting, Toronto, ON.
54. Jack Van Dyke\* and David R. Clements\*. 1999. Stewardship of Creation (Awakening Biophilia to Keep the Earth). Presentation to combined meeting of Christian teachers (NWCSI-CTABC), Lynden, Washington.
55. David R. Clements\* and Heather Robinson.\* 1999. The five C's of A Rocha. Workshop at "Stewardship of Creation" at St. John's Shaughnessy, Vancouver, BC.

56. Michael T. Irvine\*, Robert G. Wagner, David R. Clements and Clarence J. Swanton. 1998. Growth response of bareroot eastern white pine nursery stock to multi-species weed competition. 3<sup>rd</sup> International Symposium on Forest Vegetation Management, Sault Ste Marie, ON.
57. Clements, D.R.\* 1998. Preserving the back 40 at TWU. Sensitive Habitat Inventory Mapping Workshop, 1998. Capilano College, North Vancouver, B.C.
58. Clements, D.R.\* and P. Krannitz. 1998. Seed banks and disturbance dynamics in a dry grassland with antelope bitter-brush. Weed Science Society of America annual meeting, Chicago, Illinois
59. Clements, D.R.,\* A. Carlile, K.M.M. Steensma, D. Kehler, B.G. Wernick and H. Schreier. 1997. Management of a healthy salmon stream (The Salmon River, Langley, B.C.) subject to increased urban and agricultural pressures. Soil and Water Conservation Society Annual Meeting, Toronto, ON. [poster]
60. Clements, D.R.\*, L. Reedyk and P. Krannitz. 1996. Weed seedbanks in the Southern Okanagan Grassland. Expert Committee on Weeds national meeting, Victoria, B.C.
61. Clements, D.R.\* 1996. The underground world: Weeds lying in wait. Antelope-brush Ecosystem Symposium for the South Okanagan Grassland Conservation Project, Penticton, B.C.
62. Clements, D.R.\*, C.J. Swanton and D.L. Benoit. 1994. Seed return and seedbank dynamics of common lambsquarters (*Chenopodium album* L.) in four tillage systems. Weed Science Society of America annual meeting, St. Louis, Missouri
63. Clements, D.R.\*, C.J. Swanton, S.F. Weise, R. Brown, D. Hume and P. Stonehouse. 1993. Energy efficiency of alternative weed management systems. Poster at Ontario Ministry of Environment and Energy Technology Transfer Conference, Toronto, Ontario.
64. Clements, D.R.\* 1993. Integrating ecological theory into integrated weed management. Guest lecture to a graduate course at the University of Western Ontario, Dept. of Plant Sciences, London, Ontario.
65. Clements, D.R.\* 1993. Energy analysis of alternative weed management systems. IWM seminar, Guelph Legion, Guelph, Ontario.
66. Clements, D.R.\*, C.J. Swanton and S.F. Weise. 1993. Implications of increased weed diversity under integrated weed management. Weed Science Society of America annual meeting, Denver, Colorado
67. Clements, D.R.\* and R. Harmsen. 1992. Foraging strategy of *Zetzellia mali* (Acari: Stigmaeidae). Entomological Society of Ontario, Kingston, Ontario.

68. Clements, D.R.\* and R. Harmsen. 1991. Interactions within the natural enemy complex of plant inhabiting mites. Symposium on Population Dynamics of Plant Inhabiting Mites, Amsterdam, The Netherlands. [invited talk]
69. Clements, D.R. 1990. The apple rust mite, *Aculus schlechtendali* (Acari: Eriophyidae): A beneficial pest. Entomological Society of Ontario, Sault Ste. Marie, Ont. abstract published in Proc. ent. Soc. Ont. 121:127-128. Won "President's Prize"
70. Clements, D.R. 1990. Population dynamics of phytoseiid-stigmaeid (Acarina) interactions. American Arachnological Society, Ottawa, ON.
71. Clements, D.R.\* and R. Harmsen. 1990. Predatory compatibility: An evaluation by system simulation. Entomological Society of Canada, Banff, AB.
72. Clements, D.R. 1990. Population implications of egg cannibalism. Ontario Ecological and Ethological Colloquium, Brock University, St. Catharines, ON.
73. Clements, D.R. 1989. The role of stigmaeids in the orchard acarine system. Entomological Society of Ontario, London, Ont. abstract published in Proc. ent. Soc. Ont. 120:74-75.
74. Clements, D.R.\* and R. Harmsen. 1989. The potential efficacy of phytoseiid and stigmaeid predators in integrated control of spider mites on apple. Ontario Pesticides Advisory Committee, Toronto, ON.
75. Clements, D.R.\* and R. Harmsen. 1988. Niche differentiation by two predatory mites. Ontario Ecological and Ethological Colloquium, U.W.O., London, ON.
76. Clements, D.R.\* and R. Harmsen. 1988. The development of an IPM module for the control of phytophagous mites in apple orchards. Ontario Pesticides Advisory Committee, Toronto, ON.
77. Clements, D.R.\* and P.B. Cavers. 1986. The seasonal pattern of seed viability in *Linaria vulgaris*. Ontario Ecological and Ethological Colloquium, York University, Toronto, ON.

#### **PERSONAL DETAILS**

I was born in Ann Arbor, Michigan and I hold Canadian and U.S. citizenship. I am married to Deb and we have four boys aged 14-22. I enjoy long-distance running (and trying to keep up to my kids), hiking, birding and other outdoor pursuits. I am actively involved in my local church and in various local as well as national conservation organizations. I write a monthly column for the local paper called the Green Beat. I also thrive on spending quality time with my university students, especially on field courses taught on Salt Spring Island (B.C.), Whidbey Island (Washington) and Hawai'i.