CURRICULUM VITAE (Detailed) - C. CRISTOFRE MARTIN

Current Address:
Department of Biochemistry
St. George's University Medical School
St. George, Grenada WEST INDIES
Email: CMartin@sgu.edu

Birthdate: April 18, 1969
Citizenship: Canadian
Marital Status: married

ACADEMIC APPOINTMENTS: GREATER THAN 10 YEARS OF ACADEMIC SERVICE

Year	University	Position
2005-present	St. George's University Department of Biochemistry	Associate Professor
2000-2007	University of Ottawa Dept. of Biology	Assistant Professor (tenured)
1999-2000	University of Saskatchewan Dept. of Anatomy & Cell Biology	Lecturer

ACADEMIC CREDENTIALS: EARNED PHD DEGREE AND 3 YEARS POSTDOC

Year	Degree	University
1997	Ph.D.	Dept. of Anatomy & Neurobiology Loeb Institute University of Ottawa Dr. Marc Ekker (advisor)
1994	M.Sc.	Department of Zoology University of Manitoba Dr. Ross McGowan (advisor)
1992	B.Sc. (Dean's Honor List)	Department of Zoology University of Manitoba

Postdoctoral Training:

1998-1999	Dept. of Anatomy & Cell Biol. Univ. of Saskatchewan School of Medicine Dr. Patrick Krone (advisor)
1997-1998	Fels Institute for Cancer Research Temple University Dr. Carmen Sapienza (advisor)

ACADEMIC AWARDS: CAREER TOTAL $256,500

Year	Award	Institution	Amount
2004	Canada's Top 40 Under 40	Univ. of Ottawa	nominated
1999-2001	HSURC Post-doctoral Fellowship	Univ. of Sask.	$60,000
1998	NSERC Post-doctoral Fellowship	Univ. of Sask.	$35,000
1997	NSERC Post-doctoral Fellowship	Temple University	$30,000
1997-99	HSURC Post-doctoral Fellowship	Univ. of Sask.	$53,000 (Declined)*
1996	Dept. Seminar Award	Univ. of Ottawa	$50
1996-97	Ontario Graduate Scholarship	Univ. of Ottawa	$10,000
1996	University of Ottawa Travel Grant	Univ. of Ottawa	$400
1995-96	Univ. of Ottawa Research Grant	Univ. of Ottawa	$3,000
1994-97	Univ. of Ottawa Excellence Scholar	Univ. of Ottawa	$18,150
1994-96	NSERC Post-Graduate Scholarship	Univ. of Ottawa	$34,800
1993	Dept. of Zoology Scholarship	Univ. of Manitoba	$4,000
1992	Dept of Zoology Scholarship	Univ. of Manitoba	$4,000
1992	Northern Studies Training Program	Univ. of Manitoba	$4,100 (Declined)*

*****These items were awarded but declined because of the requirement to not hold more than one scholarship at any particular time. Corresponding awards of higher value were accepted.

RESEARCH AND OPERATING GRANTS: CAREER TOTAL $931,155

Year	Type	Funding Organization	Amount
2005-10	Operating Grant	NSERC	$41,000/yr
2002	Equipment Grant (co-applic.)	NSERC	$21,000
2002	Student Employment	Human Resources Canada	$1,500
2001	Laboratory Infrastructure	Canadian Foundation for Innovation	$228,317
2001	Laboratory Infrastructure	Ontario Innovation Trust	$228,317
2001-04	Operating Grant	NSERC	$28,000/yr
2001	Equipment Grant	NSERC	$43,661
2001 - 03	Operating funds	Faculty Development Fund	$60,000
2001 - 03	Operating funds	University Research Fund	$15,000
2001 - 03	Operating funds	Department Research Fund	$15,000
2001	Student Employment	Human Resources Canada	$1,360

STUDENT RESEARCH SUPERVISION:

Ph.D.: 6 students
M.Sc.: 15 students
B.Sc.: 17 students

Year	Name	Type
2007-present	Ravindra Naraine	M.Sc.
2006-present	Cythia Bruno	Ph.D.
2005	Jacques Niles	B.Sc. (summer)
2005	Lindsay Burton	B.Sc. (summer)
2004 – 2005	Ashish Maurya	M.Sc.
2004	Qian Sun (Dalhousie)	Visiting Scientist
2004	Vishal Saxena (Dalhousie)	Visiting Scientist
2004	Anjali Shroff	B.Sc. (summer)
2004 – 2005	Jing Zhang	M.Sc.
2004 – 2005	Purva Wagh	M.Sc.
2004 – 2005	Mohamed Abu-Farha	M.Sc.
2004 – 2005	Bitapi Ray	M.Sc.
2003 – 2005	Vicki Marlatt	Ph.D.
2003 – 2004	Megan Kendell	B.Sc. (honors)
2003 – 2004	Tim Allaby	B.Sc. (honors)
2003 – 2004	Alain-Remi Lajeunesse	B.Sc. (honors)
2003 – 2004	Abdulsamad Ghani	B.Sc. (honors)
2003 – 2006	Amira Mohammad	M.Sc.
2003	Misha Marovac	B.Sc. (summer)
2003	Victoria Karimi	B.Sc. (summer)
2003	Amy Sharaf	B.Sc. (summer)
2003 – 2005	Jennifer Gibson	M.Sc.
2003 – 2005	Xi Chen	M.Sc.
2003 – 2005	Mustafa Bayaa	Ph.D.
2003 - present	Maryam Kamkar	Ph.D.
2002 – 2005	Renjitha Pillai	M.Sc.
2002 – 2004	Mufida Al-Azzabi	M.Sc.
2002 – 2006	Louise Coverdale	Ph.D.
2002 – 2003	Vandana Parnandi	B.Sc. (honors)
2002 – 2003	Bonnie Scott	B.Sc. (honors)
2002 – 2003	Dorothee Amie	B.Sc. (honors)
2002 – 2004	Parisa Aghsani	M.Sc.
2002 – 2006	Chris Martiniuk	Ph.D
2002 – 2005	Dominique Vaillant	M.Sc.
2001 – 2003	Ariane Beauvais	M.Sc.
2001 – 2005	Neda Mansoorian	M.Sc.
2001 – 2002	David Pepin	B.Sc. (honors)
2001 – 2003	Gaytri Dubay	B.Sc. (summer)
2001	Kathryn Towns	B.Sc. (summer)
2001	Louise Coverdale	B.Sc. (summer)

PUBLICATIONS:

Refereed Journal Articles: 16
Review Articles: 6
Book Chapters: 1
Books: 2
Editorials: 2
Conference Proceedings: 29
Invited Lectures: 17
Journal Cover Art: 2

Under SGU affiliation: 2 review articles, 1 book chapter, 2 books, 2 editorials, 2 conference proceedings and 2 invited lectures.

i) Refereed Journal Publications

1. L.E. Coverdale, C.J. Martyniuk, V.L. Trudeau & **C.C. Martin** (2004). Differential expression of the methyl-cytosine binding protein 2 (MeCP2) gene in embryonic and adult brain of zebrafish. *Developmental Brain Research* **153**: 281-287.

2. R. Pillai, L.E. Coverdale, G. Dubay & **C.C Martin (**2004). Histone deacetylase 1 (HDAC-1) required for normal formation of cartilage and pectoral fins of the zebrafish. *Developmental Dynamics* **231**: 647-654.

3. **C.C. Martin**, C.H. Tsang, R.G. Beiko & P.H. Krone (2002). Expression and genomic organization of the zebrafish chaperonin gene complex. *Genome* **45**(5): 804-811.

4. **C.C. Martin**, P. Tang, G. Barnardo, & P.H. Krone (2001). Expression of the chaperonin 10 gene during zebrafish development. *Cell, Stress, and Chaperones **6**(1): 38-43.*

5. J.B. Sass, **C.C. Martin** & P.H. Krone (1999). Restricted expression of the zebrafish hsp90α gene in slow and fast muscle fibre lineages. *International Journal of Developmental Biology Biology* **43**: 835-838. (includes journal cover art).

6. Z. Lele, S.D. Hartson, **C.C. Martin, L.** Whitesell, R.L. Matts & P.H. Krone (1999) Disruption of zebrafish somite development by pharmacologic inhibition of Hsp90. *Developmental Biology* **210**: 56-70.

7. **C.C. Martin**, L. LaForest, M-A Akimenko, & M. Ekker (1999). A role for DNA methylation in gastrulation and somite patterning. *Developmental Biology* **206**(2): 189-205.

8. R. McGowan & **C.C. Martin** (1997). DNA methylation and genomic imprinting in the zebrafish: some evolutionary ramifications. *Biochemistry and Cell Biology* **75**(5): 499-506.

9. D.L. Ellies, R.M. Langille, **C.C. Martin,** M-A Akimenko & M. Ekker (1997). Specific craniofacial cartilage dysmorphogenesis coincides with a loss of *dlx* gene expression in retinoic acid treated zebrafish embryos. *Mechanisms of Development* **61**: 23-36.

10. **C.C. Martin** & R. Gordon (1997). Ultrastructural analysis of the cell state splitter in ectoderm cells differentiating to neural plate and epidermis during gastrulation in embryos of the axolotl *Ambystoma mexicanum. Ontogenez* (Russian) **28**(2): 95-105. Translated in *Russian Journal of Developmental Biology* **28**(2): 71-80.

11. M. Ekker, M. Speevak, **C.C. Martin**, L. Joly, G. Giroux & M. Chevrette (1996). Stable transfer of zebrafish chromosome segments into mouse cells. *Genomics* **33**: 65-74.

12. **C.C. Martin** & R. McGowan (1995). Parent-of-origin specific effects on the methylation of a transgene in the zebrafish, *Danio rerio. Developmental Genetics* **17**(3): 233-239.

13. **C.C. Martin** & R. McGowan (1995). Genotype-specific modifiers of transgene methylation and expression in the zebrafish, *Danio rerio. Genetical Research Cambridge* **65**: 21-28.

14. **C.C. Martin** & R. Gordon (1995). Differentiation trees, a junk DNA molecular clock, and the evolution of neoteny in salamanders. *Journal of Evolutionary Biology* **8**: 339-354.

15. G.W. Brodland, R. Gordon, M.J. Scott, N.K. Bjorklund, K.B. Luchka, **C.C. Martin**, C. Matuga, M. Globus, S. Vethamany-Globus & D. Shu (1994). Furrowing surface contraction wave coincident with primary neural induction in amphibian embryos. *Journal of Morphology* **219:** 131-142.

16. R.W. Flint, R. Gordon, **C.C. Martin** & G.W. Brodland (1989). Simulation of inversion of amphibian eggs in a gravitational field using hollow glass spheres. (Invited) *European Space Agency Bulletin,* Noordwijk, The Netherlands. *Selected Proceedings of the Workshop on Microgravity as a Tool in Developmental Biology, 11th International Congress of The International Society of Developmental Biologists,* Aug 20-25, 1989. Utrecht.

ii) Book Chapters, Reviews (Invited) and Editorials

1. **C.C. Martin** and K.B. Storey (2007). Ensuring anonymity in the internet age. *Nature (Peer to Peer)*, May 22, 2007. http://blogs.nature.com/peer-to-peer/2007/05/ensuring_anonymity_in_the_inte.html.

2. L.E. Coverdale, L.E. Burton & **C.C. Martin** (2008). High-throughput whole mount *in situ* hybridization of zebrafish for analysis of tissue specific gene expression changes following environmental perturbation. In: Environmental Genomics – Methods in Molecular Biology, C.C. Martin (Ed.). Humana Press, New York.

3. **C.C. Martin** (2006). Grenada hosts 16th Lake Shirakaba Conference: Caribbean Gem. *Mace (St. George's University)*: 24-25.

4. M. Kamkar, M.A. Steggles & **C.C. Martin** (2006). Fish Pharming: Identifying gene function and therapeutic targets using pharmacologic treatment of zebrafish embryos. *Current Pharmacogenomics* **4**: 145-152.

5. L.E. Coverdale & **C.C. Martin** (2005). Epigenomics – genome wide modifications of cytosine and new dimensions for disease diagnosis. *Current Genomics* **6(7)**: 491-500.

6. L.E. Coverdale & **C.C. Martin** (2004). Not just a fishing trip – environmental genomics using zebrafish. *Current Genomics* **5:** 299-308. (includes journal cover art)

7. **C.C. Martin** & R. Gordon (2001). The evolution of perception. *Cybernetics and Systems* 32: 393-409.

8. **C. C. Martin** & C. Sapienza (1999). A role for modifier genes in genome imprinting. In Results and Problems in Cell Differentiation. R. Ohlsson (Ed.). Springer Verlag **25:**251-70.

6. **C.C. Martin** (1996). Genomic Imprinting. In L. W. Browder (Ed.). *Advanced Developmental Biology*, <http://www.ucalgary.ca/~browder>.

iii) Books

1. *Environmental Genomics*, Methods in Molecular Biology Series (reprinted in Chinese). Ed. **C.C. Martin**. Science Press, China. 2009. *In press.*

2. *Environmental Genomics*, Methods in Molecular Biology Series. Ed. **C.C. Martin**. Humana Press, New York. 2008.

iv) Conference Proceedings

1. **C. Martin** (2006). Gene expression profiling of histone deacetylase 1 (HDAC1) deficient zebrafish embryos reveals a functional role in the development of fins, cartilage and neuronal structures. 16th Lake Shirakaba Conference, December 6-7, 2006. St. George's, Grenada.

2. **C. Martin** (2006). Gene expression profiling of histone deacetylase 1 (HDAC1) deficient zebrafish embryos reveals a functional role in the development of fins, cartilage and neuronal structures. American Academy of Orthopaedic Surgeons Research Symposia: Developmental Biology in Orthopaedics. October 26-28, 2006, Toronto, Canada.

3. M. Kamkar, W.W. Willmore, & **C.C. Martin** (2005). Characterization of bidirectional regulatory region of the zebrafish (Danio rerio) Cpn10/60 gene. 45th American Society for Cell Biology Annual Meeting. December 10-14, San Francisco, California.

4. L.E. Coverdale, C. Martyniuk, V. Trudeau & **C.C. Martin** (2005). Genomic organization and functional analysis of the zebrafish methyl-cytosine binding protein 2 (MeCP2) gene. 64th Annual Meeting of the Society for Developmental Biology. Aug 27 – July 1, San Francisco, California.

5. A. Mohamed, J. Yorston, **C.C. Martin**, & S.F. Perry (2005). Hypoxia and preconditioning in zebrafish (Danio rerio) embryos. Society of Experimental Biologists. July 11-15, Barcelona, Spain.

6. L.E. Coverdale & **C.C. Martin** (2005). Fish N' Chips: Using DNA microarrays to analyse gene expression changes in zebrafish embryos deficient in histone deacetylase 1 (HDAC-1). 14th Annual Fish Physiology and Biochemistry Workshop. February 4-6, 2005. Keene, Ontario.

7. L.E. Coverdale & **C.C. Martin** (2004). Fish N' Chips: Using DNA microarrays to analyse gene expression changes in zebrafish embryos deficient in histone deacetylase 1 (HDAC-1). 63rd Annual Meeting of the Society for Developmental Biology. Calgary, Alberta. July 24-28, 2004.

8. R. Pillai. L.E. Coverdale, G. Dubay & **C.C. Martin** (2004). Histone deacetylase 1 (HDAC-1) essential for craniofacial cartilage and pectoral fin development in zebrafish. 63rd Annual Meeting of the Society for Developmental Biology. Calgary, Alberta. July 24-28, 2004.

9. **C.C. Martin** (2004). Tissue patterning defects in zebrafish embryos laching proteins involved in the epigenetic process. 14th Lake Shirakaba Conference – International Symposium on Epigenetics and Regenerative Medicine. Tokai University European Center. Copenhagen, Denmark. June 22-23, 2004.

10. S.F. Perry & **C.C. Martin** (2004). Hypoxic pre-conditioning in zebrafish. *Symposium on Environmental Adaptation of Fish: Reviews and New Insights.* Taipei, Taiwan. March 4-7, 2004.

11. L.E. Coverdale, V. Parnandi & **C.C. Martin**. (2004). Expression and genomic characterization of the zebrafish methyltransferase 3 gene. 13th Annual Fish Physiology and Biochemistry Workshop. February 6-8, 2004. Keene, Ontario.

12. R. Pillai, L.E. Coverdale, G. Dubey & **C.C. Martin** (2004). Histone deacetylase (HDAC-1) required for the formation of craniofacial cartilage and pectoral fins in zebrafish. 13th Annual Fish Physiology and Biochemistry Workshop. February 6-8, 2004. Keene, Ontario.

13. A. Mohamed, J. Yorston, **C.C. Martin**, M. Mbkay & S.F. Perry (2004). Hypoxia preconditioning in zebrafish. 13th Annual Fish Physiology and Biochemistry Workshop. February 6-8, 2004. Keene, Ontario.

14. L.E. Coverdale & C.C. Martin (2003). MECP-2 deficient zebrafish embryos undergo developmental arrest at mid-blastula transition. 12th Annual Fish Physiology and Biochemistry Workshop. February 7-9, 2003. Keene, Ontario.

15 L.E. Coverdale & **C.C. Martin** (2002). MECP-2 deficient zebrafish embryos undergo developmental arrest at mid-blastula transition (Invited). 3rd Annual Rett Syndrome Symposium. Baltimore, MD. June 17-19, 2002.

16. **C.C. Martin** & R. Gordon (2000). The evolution of perception – molecules to man. *Selected Proceedings of the 15Th European Meeting on Cyberbetics and Systems Research*, April 25-28, 2000. Vienna.

17. **C.C. Martin**, Barnardo, G., & P.H. Krone (2000). Cloning and analysis of zebrafish heat shock proteins genes *hsp10* and *hsp60* – applications for their promoter in zebrafish transgenics. *The Seventh Annual Life Sciences Student Research Day*. January 21, 2000. Saskatoon, Saskatchewan.

18. **C.C. Martin** & P.H. Krone (1999). Cloning and expression analysis of the zebrafish *hsp60* and *hsp10* protein genes. *Midwest Zebrafish Meeting.* June 16-18. Chicago, Illinois.

19. F. Ye, **C.C. Martin**, P. Tellis, G. Giroux, M. Ekker, & M. Chevrette (1997). Analysis of zebrafish repetitive sequences using a panel of zebrafish X mouse somatic cell hybrids. *HUGO Conference*, March 5-8, 1997. Toronto, Ontario.

20. M. Ekker, **C.C. Martin**, L. Joly, G. Giroux, P. Tellis, & M. Chevrette (1996). Physical mapping of the zebrafish genome with panels of zebrafish X mouse somatic cell hybrids. *Genome Canada 96 - General Meeting of CGAT Grantees*, June 13 - 15, 1996. Ottawa, Ontario.

21. R. McGowan, C. Björnsson, & **C.C. Martin** (1996). Cloning and analysis of an snRNP-associated protein gene from the zebrafish, *Danio rerio. Abstracts of papers presented at the 1996 meeting on Zebrafish Development & Genetics,* April 24 - 28, 1996. Cold Spring Harbor, New York.

22. M. Ekker, **C.C. Martin**, L. Joly, G. Giroux, P. Tellis, & M. Chevrette (1996). Physical mapping of the zebrafish genome with panels of zebrafish X mouse somatic cell hybrids. *Abstracts of papers presented at the 1996 meeting on Zebrafish Development & Genetics,* April 24 - 28, 1996. Cold Spring Harbor, New York.

23. **C.C. Martin**, M-A Akimenko & M. Ekker (1996). DNA demethylation causes disruption in the anterior-posterior body axis of the developing zebrafish embryo. *Abstracts of papers*

presented at the 1996 meeting on Zebrafish Development & Genetics, April 24 - 28, 1996. Cold Spring Harbor, New York.

24. **C.C. Martin**, G. Giroux, M. Chevrette & M. Ekker (1995). Analysis of zebrafish-mouse somatic cell hybrids using repetitive DNA sequences from the zebrafish *Danio rerio*. *Proceedings of the 38h Annual Meeting, Canadian Federation of Biological Sciences,* June 14-18, 1995. Saskatoon, Saskatchewan.

25. M. Ekker, L. Joly, M. Speevak, **C.C. Martin** & M. Chevrette (1994). Stable transfer of zebrafish chromosome segments into mouse cells. *Special Poster Session, The American Society for Cell Biology Thirty-fourth Annual Meeting,* December 10-14, 1994. San Francisco, California.

26. **C.C. Martin** & R. McGowan (1994). Strain-specific modifiers of transgene methylation and expression, and genomic imprinting in the zebrafish, *Brachydanio rerio*. *Abstracts of papers presented at the 1994 meeting on Zebrafish Development & Genetics,* April 27 - May 1, 1994. Cold Spring Harbor, New York.

27. **C.C. Martin** & R. Gordon (1992). Differentiation trees, junk DNA, and the evolution of neoteny in salamanders. *Bulletin of the Canadian Society of Theoretical Biology #10. Proceedings of the 35th Annual Meeting, Canadian Federation of Biological Sciences,* June 18-20, 1992.

28. N.K. Bjorklund, R. Gordon, & **C.C. Martin** (1991). Defects due to the compression of amphibian embryos at primary neural induction. *Proceedings of the 34th Annual Meeting, Canadian Federation of Biological Sciences,* June 9-11, 1991.

29. **C.C. Martin** & R. Gordon (1991). Ultrastructural confirmation of the "cell state splitter". *Proceedings of the 34th Annual Meeting, Canadian Federation of Biological Sciences,* June 9-11, 1991.

v) Invited Lectures

1. Gene expression profiling of histone deacetylase 1 (HDAC1) deficient zebrafish embryos reveals a functional role in the development of fins, cartilage and neuronal structures. Lake Shirakaba International Conference on Epigenetics. December 6-7, 2006, Grenada, West Indies.

2. Gene expression profiling of histone deacetylase 1 (HDAC1) deficient zebrafish embryos reveals a functional role in the development of fins, cartilage and neuronal structures. American Academy of Orthopaedic Surgeons Research Symposia: Developmental Biology in Orthopaedics. October 26-28, 2006, Toronto, Canada.

3. Cell proliferation and tissue patterning defects in histone deacetylase deficient zebrafish embryos. Inaugual CAREG Symposium. Ottawa, Ontario. May 27, 2005.

4. Function of histone deacetylases 1 gene during zebrafish embryonic development. Clarkson University, Potsdam, New York. March 25, 2005.

5. Epigenetic gene regulation and its role in embryonic patterning and tissue differentiation. St. George's University, St. George's, Grenada, West Indies. Feb 21, 2005

6. Epigenetic gene regulation in zebrafish embryos and its role in cellular differentiation. Loeb Research Institute, Ottawa Hospitals Research Institute, Ottawa, Ontario. Jan 24, 2005

7. Tissue patterning defects in zebrafish embryos lacking proteins involved in the epigenetic process. Tokai University Center, Copenhagen, Denmark. 2004.

8. HDAC-1 is required for normal development of craniofacial cartilage and pectoral fins in zebrafish. Department of Biology, Carleton University, Ottawa, ON. 2004.

9. Functional analysis of chromatin remodeling proteins in zebrafish embryos. Department of Biology, University of Dalhousie, Halifax, NS. 2004.

10. Gurus, Ganges and a fish eyed goddess. Research Days Pub Lecture. Ottawa, Ontario. May 14, 2004.

11. Indian Expatriate, The Zebrafish *Danio Rerio*, Makes A Splash As A Model Organism For Human Disease, Dept. of Zoology, Banaras Hindu University, Varanasi, India. 2002.

12. Environmental And Genetic Modifiers Of Gene Transcription In Zebrafish.
Dept. of Biology, University of Ottawa, Ottawa, Ontario. 2000.

13. A Role For DNA Methylation During Zebrafish Embryonic Development.
Dept. of Biology, University of Waterloo, Waterloo, Ontario. 2000.

15. Dept. of Biology, Okanagon University College, Kelowna, British Columbia. 1999

16. Dept. of Biology, Okanagon University College, Kelowna, British Columbia. 1998

17. A Wave Of Cell Differentiation That Forms The Brain, With Genetic And Evolutionary Consequences. Faculty of Medicine, University of Manitoba. 1991.

COMMITEE ACTIVITIES:

1. St. George's University Medical School

2008	Salary and Benefit Committee
2008	Search Committee for Department of Biochemistry
2007 – present	SOM Faculty Affairs Senate Committee
2007	Search Committee for Department of Biochemistry (Demonstrator)
2007	Search Committee for Department of Biochemistry (Lab Assistant)
2007	Search Committee for Department of Anatomy
2006 -2007	Search Committee for Department of Microbiology
2006 -2007	Search Committee for Department of Biochemistry
2006 - present	Pre-Med Curriculum Committee

2. St. George's University School of Arts and Sciences

2008	Chair, Search Committee for Department of Life Sciences
2008	School of Arts and Science Committee on Admissions

3. University of Ottawa

2005	Ottawa/Carleton DB/Cell Hiring Committee
2004 – 2005	Animal Care Advisory Committee
2004	CAREG Web Site development Committee
2003	CAREG Open house symposium Committee
2003	CCAC Ethics Review Committee
2003	Ottawa/Carleton Physiology/Microbiol. Hiring Committee
2002 – 2005	Dept. Biology Microscopy Committee
2002 – 2005	Faculty of Science External Relations Committee
2001 – 2004	Ottawa Day Planning Committee
2001 – 2004	Undergraduate Program Committee

ADMINISTRATIVE ACTIVITIES:

1. St. George's University School of Medicine

2008	Interim Chair, Department of Biochemistry (SOM)
2008 - present	Chair, Faculty Affairs Senate Committee
2008	Co-Course Director, Medical Biochemistry BCHM550
2007	Acting Chair, Department of Biochemistry
2007	Acting Course Director, Medical Biochemistry BCHM550
2007 - 2008	Chair, Search Committee for Department of Life Sciences
2006 - 2008	Course Director, Medical Genetics BCHM 590
2005 – present	Course Director, Molecular Biology BIOL321
2005 – present	Course Director, Molecular Biology Lab BIOL331

2. St. George's Unversity School of Arts and Sciences

2008 - present	Chair, Department of Life Sciences

3. University of Ottawa

2004-2005	Assistant Director, Biopharmaceuticals Program (BPS)
2004-2005	Faculty of Science Executive
2003-2004	CCAC (Govern. Of Canada) Amphibian consultant

COMMUNITY SERVICE:

1. St. George's University Medical School

2007 – present	Advisor, Canadian Student Association
2005 – present	Photographer, Grand Anse Playgroup Picture Day
2005 – present	Science Activity Advisor, Grand Anse Playgroup
2005 – present	Water balloon target, SGA SandBlast
2005	Judge, SGU Student Talent Contest

2. Previous service

2001 – 2005	Univ. Ottawa Day Coordinator – high school student open house
1999	Judge, Saskatoon Regional Science Fair, University of Saskatchewan
1998	Editor, Scientific manuscripts by non-English speaking authors.
1994 – 1996	Spokesperson, "Let's Talk Science" Science outreach program
1990 – 1993	Board of Directors (Research Co-ordinator, Treasurer), Spina Bifida Association of Manito, Winnipeg, Manitoba.
1990 – 1993	Editor: Spina Bifida Association of Manitoba Newsletter.
1990 – 1991	Judge, Manitoba Schools Science Symposium. University of Winnipeg.

EXTERNAL SCHOLARLY ACTIVITY:

i) Thesis review

2004	External thesis reviewer – Dalhousie University
2004	External thesis reviewer – McGill University

ii) Journal Review activities

Genome
Genes & Development
Transgenic Research
GENE

iii) Grant Review activities

Wellcome Trust (UK)
National Science Foundation (USA)
NSERC (Canada)
Northwestern Health Foundation (USA)
Canadian Foundation for Innovation (Canada)

COORDINATION AND PROGRAM DEVELOPMENT ACTIVITY:

i) Meeting and Conference Organization

2007	Organizer, SGU Genomics Retreat, Flamboyant Hotel
2006	Co-organizer: 16th Lake Shirakaba Conference on Epigenetics, St. George's University
2005	Inaugural CAREG Symposium, University of Ottawa
2002	Coordinator, The Canadian Zebrafish Network

ii) Program and Course Development

In addition to providing input into various curriculum committees, I have had significant roles in the program development of the following:

2007 - present	Program Integration, Genomics Integration Initiative, St. George's Univ.
2006 – present	Program Development, Marine Biology Major, St. George's Univ.
2004 - 2005	Assistant Director, Biopharmaceuticals Program (BPS), Univ. of Ottawa

At St. George's University I have had highly notable contributions in the development and creation of the following courses.

2008	Program Development, Marine Ecology and Conservation (Major)
2007	Course Redesign, Medical Genetics (BCHM590)
2005	Course Redesign, Molecular Biology (BIOL321)
2005	Course Redesign, Molecular Biology Lab (BIOL331)
2007	Course Creation, Natural Hist. of Grenada (BIOL201)
2007	Course Creation, Marine Biology Lab (MBIO306)
2006	Course Creation, Development Biology (BIOL323)

TEACHING ACTIVITIES:

1. Department of Biochemistry, St. George's University.

Molecular Biology (BIOL321). 2005 – present. Enrollment: 70. Contact hours: 48.
Molecular Biology Lab (BIOL322). 2006 – present. Enrollment: 70. Contact hours: 32.
Biochemistry (BCHM550). 2005 – present. Enrollment: 440. Contact hours: 18.
Developmental Biology (BIOL323), 2006 – present. Enrollment: 10. Contact hours: 48.
Genetics (BIOL320), 2006 – present. Enrollment 110. Contact hours: 2.
Natural Hist. of Grenada (BIOL201), 2007 – present. Enrollment: 35. Contact hours: 48
Marine Biology Lab (MBIO306), 2007 – present. Enrollment: 6. Contact hours: 48
Medical Genetics (BCHM590), 2006-2008 (Course Director). Enrollment: 440.

Since taking employment at SGU, my teaching load has ranged from 150 to 225 hours of classroom contact per year.

2. Department of Biology, University of Ottawa.

Genetics (BIO 2123). 2001-2005. Enrollment: 375. Contact hours: 60.
Intro to Cell Biology (BIO 3157) 2002-2004. Enrollment: 150. Contact hours: 60.
Prin of Devel Biol (CMM 5304) 2002-2005 . Enrollment: 25. Contact hours: 8.
Biotechnology (BIO 4174). 2004 Enrollment: 50. Contact hours: 4.
Developmental Biology (BIO 3147). 2001-2005. Enrollment: 150. Contact hours: 60.
Recent Adv. in Biology (BIO 5901). 2001-2005. Enrollment: 20. Contact hours: 4.
Developmental Neurobiology (NSC 8103). 2005. Enrollment: 25. Contact hours: 12.
Advanced Developmental Biology (BIO4109) 2005. Enrollment: 35. Contact hours: 60.

3. Department of Anatomy and Cell Biology, University of Saskatchewan.

Prin. of Devel Biol (ANAT 201.3) 1999. Enrollment 60. Contact hours: 40.
Cell Biology (ANAT 300) 1999. Enrollment: 40. Contact hours: 12.

4. Department of Anatomy and Neurobiology, University of Ottawa

Topics in Developmental Biology, 1997. Enrollment: 15. Contact hours: 6.

5. Department of Zoology, University of Manitoba.

Genetics II 1.346, 1993. Enrollment: 25. Contact hours: 6.

6. Dept. of Education, Continuing Education (Adult education), University of Manitoba.

Introduction of Genetics I. 1994. Enrollment: 25. Contact hours: 36.

7. Department of Botany, University of Manitoba.

Introduction of Genetics I & II. 1992 - 94. Total enrollment: 200. Contact hours: 200.
Principles of Ecology. 1992. Total enrollment: 45. Contact hours: 40.

OTHER RESEARCH EXPERIENCE:

1991 – 1992	Research Assistant, Dr. John Stewart (Supervisor) Department of Botany (Head), University of Manitoba.
1988 – 1992	Research Assistant, Dr. Richard Gordon (Supervisor) Department of Botany, Radiology, Physics & Electrical Engineering.
1988	Research Assistant, Dr. Marianne Steggles (Supervisor) Department of Fine Arts, Acadia University, Wolfville, Nova Scotia.

EXTRACURRICULAR TRAINING:

1992 – 2005	WHMIS and AEC Radiation Safety Training
2001 – 2002	French Language Training (FSL100, FSL101), Second Language Institute, University of Ottawa
1995	Confocal Microscopy, University of Ottawa Confocal Microscopy Facility
1995	Workshop: The Lecture – A tool to be mastered. Center for University Training
1993	CCAC: Use of Laboratory Animals for Scientific Research
1989 – 1990	Electron microscopy, University of Manitoba EM Facility
1989, 2004	PADI Advanced Open Water SCUBA Certification, #C73,533

References Upon Formal Request