

Recent Publications

1. Clarke, D.B., Renno, A.D., Hamilton, D.C., Gilbricht, S. and Bachman, K. (2021). The spatial association of accessory minerals with biotite in granitic rocks for the South Mountain Batholith, Nova Scotia, *Geosphere*.
<https://doi.org/10.1130/GES02339.1>.
2. Ata, N., Maguire, B., Hamilton, D.C. and Kuhle, S. (2018) Percentile curves for cardiometabolic disease markers in Canadian children and youth: A cross-sectional study. *BMC Pediatrics* 18, 314 Sept 2018.
<https://doi.org/10.1186/s12887-018-1289-2>
3. Kuhle, S., Maguire, B. Zhang, H., Hamilton, D.C. and Allen A.C., (2018) Comparison of logistic regression with machine learning methods for the prediction of fetal growth abnormalities: a retrospective cohort study. *em BMC Pregnancy and Childbirth* 18, 333.
<https://doi.org/10.1186/s12884-018-1971-2>
4. Clarke, D.B., McFarlane, C.R.M., Dunning, G., Hamilton, D.C., Stevens, D., (2017) *Atlantic Geology*, 53, pp. 87-114 & *Canadian Mineralogist*, Vol. 55, pp. 145-177. Applied forensic igneous petrogenesis: locating the source quarry for the “black granite” Titanic headstones in Halifax, Nova Scotia.
5. Roop, M.L., Cole, D.E.C., and Hamilton, D.C. (2016) Variance formulae for correlation measures of linkage disequilibrium. *Human Heredity*, 82, 75-85.
6. Kuhle, S., Ashely-Martin, J., Maguire, B., Hamilton, D.C., (2016). Percentile curves for skinfold thickness for Canadian children and youth. *PeerJ* 4:e2247,
<https://doi.org/10.7717/peerj.2247>
7. Al-Awadhi, F., Sarhan, A. Hamilton, D.C., Marshall-Olkin extended two-parameter bathtub-shaped lifetime distribution. (2016), *Journal of Statistical Computation and Simulation*, 86:18, 3653-3666,
<https://DOI:10.1080/00949655.2016.1180388>.
8. Kuhle, S. Maguire, B, Ata, N. Hamilton, D.C., (2015). Percentile curves for anthropometric measures for Canadian children and youth, *PLOS One*.
<https://doi.org/10.1371/journal.pone.0132891>

9. Sarhan, A.M., Smith, R.B. and Hamilton, D.C., (2015). Estimation of $P(Y < X)$ for a two-parameter bathtub shaped failure rate distribution. *International Journal of Statistics and Probability*, 4, 33-45.
10. MacDonald, W.K., Kuhle, S and Hamilton, D.C., (2014). SMA carrier testing: a meta-analysis of differences in test performance by ethnic group, *Prenatal Diagnosis*, 34(12), 1219-26.
11. Horrocks, J., Rueffer, M., Hamilton, D.C. and Wong, S. (2014). Estimation of Abundance from a Correlated Binary Time Series, Proceedings, AMMCS-2013 (Applied Mathematics, Modeling and Computational Science Conference). Wilfrid Laurier University, Waterloo, ON. August 30, 2013.
12. Sarhan, A., Tadj, L. and Hamilton, D.C., (2014). A new lifetime distribution and its power transformation. *Journal of Probability and Statistics*, ID 532024, <https://doi:10.1155/2014/532024>.
13. Renault, N., Pritchett, S.M., Howell, R.E., Greer, W.L., Sapienza, C., Orstavik, K.H. and Hamilton, D.C., (2013). Human X-chromosome inactivation pattern distributions fit a model of genetically influenced choice better than models of completely random choice. *European Journal of Human Genetics*, 21, 1396-1402, <https://doi:10.1038/ejhg.2013.84>.
14. Grover, V.K., Cole, D.E.C. and Hamilton, D.C., (2013) Genotype-based association analysis using discordant pairs: a penetrance odds ratio approach, *Annals of Human Genetics*, 77, 137-146.
15. Sarhan, A., Hamilton, D.C. and Smith, B., (2012), Parameter Estimation for a two-parameter bathtub-shaped lifetime distribution, *Applied Mathematical Modelling*, 36(11), pp. 5380-5392. <http://dx.doi.org/10.1016/j.apm.2011.12.054>
16. Horrocks, J. **Hamilton, D.C** and Whitehead, H., (2012), A likelihood approach to estimating abundance from binary acoustic transects, *Biometrics*, 67(3), pp. 681-690.

17. Mitchell, D., Sengpiel, F., Hamilton, D.C., Schwarzkopf, D.S., Kennie, J. (2011), Protection against deprivation amblyopia depends on relative not absolute daily binocular exposure, *Journal of Vision*, 11(7):13, pp. 1-13.
18. Sarhan, A.M, **Hamilton, D.C.**, Smith, R.B., and Kundu, D. (2011), The bivariate generalized linear failure rate distribution and its multivariate extension, *Comp. Stat. & Data Analysis*, **55**, 1, pp. 644-654.
19. McMullin, R.T., Duinker, P.N., Richardson, D.H.S., Cameron, R.P., **Hamilton, D.C.** and Newmaster, S.N., (2011), Relationships between the structural complexity and lichen community in coniferous forests of southwestern Nova Scotia. *Forest Ecology and Management*, 260, 744-749.
20. Sarhan, A.M, **Hamilton, D.C.** and Smith, R.B., (2010), Statistical analysis of competing risks models, *Reliability Engineering and System Safety*, 95, 953-962.
<http://dx.doi.org/10.1016/j.ress.2010.04.006>
21. Grover, V.K., Cole, D.E.C. and **Hamilton, D.C.**, (2010), Attributing Hardy-Weinberg disequilibrium to population stratification and genetic association in case-control studies. *Annals of Human Genetics*, 74(1), 77-87.
22. Enoki, R., Hu, Y-L, **Hamilton, D.C.** and Fine A. (2009), Expression of long-term plasticity at individual synapses in the hippocampus is graded, bidirectional, and mainly presynaptic: optical quantal analysis. *Neuron*, 62(2): 242-53.
23. **Hamilton, D.C.**, Grover, V.K., Smith, C.A. and Cole, D.E.C., (2009), Heterogeneous disease modeling for Hardy-Weinberg disequilibrium in case-control studies: Application to renal stones and calcium-sensing receptor polymorphisms. *Annals of Human Genetics*, 73,176-83.
24. **Hamilton, D.C.** and Cole, D.E.C., (2008), Testing for equality of standardized composite measures of linkage disequilibrium, *Annals of Human Genetics*, 72,2, 292-6.
25. **Hamilton, D.C.**, Liu, Q, and Cole, D.E.C., (2006), Approximate variance for a standardized composite measure of linkage disequilibrium, *Annals of Human Genetics*, 70,4, 535-40.

26. Dupuis, A., **Hamilton, D.C.**, Cole, D.E.C. and Corey, M., (2005), Cystic fibrosis birth rates in Canada: A decreasing trend since the onset of genetic testing, *The Journal of Pediatrics* 147(3), 312-315.
27. **Hamilton, D.C.** and Cole, D.E.C., (2004), Standardizing a composite measure of linkage disequilibrium, *Annals of Human Genetics*, 68, pp. 234-9.
28. MacNeil, S., Dodds, L., **Hamilton, D.C.**, Armson, B.A. and M. Vandanhof, (2001) Rates and risk factors for recurrence of gestational diabetes. *Diabetes Care*, **24**, 659-662.
29. Downer, R.G. and **Hamilton, D.C.**, (2000). A penalized multinomial approach to smoothed estimation of disease incidence. *Biometrical Journal*, **42**, 4, 395-415.
30. Dupuis, D.J. and **Hamilton, D.C.**, (2000), Regression residuals and test statistics: Assessing naive outlier deletion. *Canadian Journal of Statistics*, 28, 2, 259-275.
31. Chauhan, B.C., Blanchard, J.W., **Hamilton, D.C.**, LeBlanc, R.P., (2000), Technique for detecting serial topographical changes in the optic disc and peripapillary retina using scanning laser tomography, *Investigative Ophthalmology and Visual Science*, **41**, 3, 775-782.
32. Chong, M., Cole, D.E.C. and **Hamilton, D.C.**, (2000), Retrospective estimation for delayed onset disorders: Application to Cystic Fibrosis in Nova Scotia, *Statistics in Medicine*, **19(5)**, 743-751.