# NCMIC FOUNDATION Publications and Presentations

#### **Publications**

#### Articles in Submission:

Currie SJ, Myers CA, Krishnamurthy A, Enebo BA, and Davidson BS. Methods of muscle activation onset timing recorded during spinal manipulation. *J. Manip. Physiol. Ther.* Accepted Aug 2015

Currie, SJ, Myers CA, Durso C, Enebo BA, DC, and Davidson BS. The neuromuscular response to spinal manipulation in the presence of pain. *J. Manip. Physiol. Ther.* Accepted Nov 2015.

Salsbury S, Goertz CM, Twist E, Smith V, Lisi AJ. Doctors of chiropractic working in private sector medical facilities: A descriptive survey under review at the *Journal of Interprofessional Care*.

Rempel JT, Busse JW, Drew B, Reddy K, Cenic A, Kachur E, Murty N, Candelaria H, Moore AE, Riva JJ. Patients' attitudes toward non-physician screening of low back and low back-related leg pain complaints referred for surgical assessment. *Spine* (Phila Pa 1976) [submitted] 2016.

Bauman CA, Milligan JD, Lebreche T, Riva JJ. Nonfunctioning pituitary macroadenoma: a case report from the patient perspective. *Chiropr Manip Ther* [submitted] 2015.

Ward J, Tyer K, Pourmoghaddam A. Immediate influence of lumbar spine manipulation on pain, functional reach, static balance, and walking gait kinematics of individuals with acute low back pain. Submitted April 19, 2015. *J Manip Physiol Ther*.

Pohlman KA, Carroll L, Hartling L, Tsuyuki R, Vohra S. Pediatric chiropractors' attitudes and opinions towards patient safety. *J Manip Physiol Ther (in submission)* 

Hewitt E, Pohlman KA, Hestbaek L. Core competencies of the certified pediatric chiropractor: results of a Delphi consensus process. *JEBCAM* (in submission)

Pohlman KA, Carroll L, Hartling L, Tsuyuki R, Vohra S. Barriers to implementing a reporting and learning patient safety system: pediatric chiropractic perspective. *JEBCAM* (accepted)

Rhee TG, Evans R, McAlpine DD, & Johnson PJ. Racial/ethnic differences in the use of complementary and alternative medicine among adults with moderate mental distress: Results from *2012 National Health Interview Survey*.

Jou J & Johnson PJ. Non-disclosure of complementary and alternative medicine (CAM) use to usual care providers: Analysis of the *2012 National Health Interview Survey*.

Leininger B, McDonough C, Evans R, Tosteson T, Tosteson A, Bronfort GB. Cost-effectiveness of spinal manipulation, supervised exercise, and home exercise for older adults with chronic neck pain. *Spine Journal* (Under review)

Bussieres A, Terhorst L, Leach M, Stuber K, Evans R, Schneider M. An exploration of the attitudes, skills and use of evidence-based practice among Canadian doctors of chiropractic: a national survey. *J Canadian Chiro Assoc. Accepted for publication.* 

Abode-Iyamah, KO, Viljoen, SV, McHenry, CL, Petrie, MA, Stoner KL, Dahdaleh, NS, Grosland, NM, Howard, MA, and Shields RK. The Effects of Brain Derived Neurotrophic Factor Val66Met Polymorphism in Patients with Cervical Spondylotic Myelopathy. *Spine* (Submitted for Review)

Abode-Iyamah, KO, Viljoen, SV, McHenry, CL, Petrie, MA, Stoner KL, Dahdaleh, NS, Grosland, NM, Howard, MA, and Shields RK. Effect of surgery on gait and sensory motor performance in patients with cervical spondylotic myelopathy. *Spine* (Submitted for Review)

Spurgin, K., Gutierrez, R., Prien, A., Muller, A., Valdez, M., and M. C. Curras-Collazo, "Intraadrenal PACAP mRNA is regulated by various stressors in association with markers of glucocorticoid hormone production and catecholamine biosynthesis" *J Neurophysiology*, Submitted

Spurgin, K., Gutierrez, R., Prien, A., and M. C. Curras-Collazo, "Developmental PBDE exposure produces hypertensive responses associated with altered sympathoadrenal and hypothalamic- pituitary-adrenal endocrine activity" *Environmental Health Perspectives*, Submitted

Spurgin, K., Gutierrez, R., Kaprelian, A., Jha, V., Wilson, C. G., and M. C. Curras-Collazo"A Calibrated Method of Manual Therapy Decreases Systolic Blood Pressure Concomitant with Changes in Heart Rate Variability in Male Rats" *J Manip Physiol Therap*, Submitted

Spurgin, K. Kaprelian, A., Angeli, J., Prien, A., and M. C. Curras-Collazo "Chronic Psychogenic Stress Increases Blood Pressure and Alters Stress Axis Markers in the Adrenal Gland and Hypothalamus" In preparation

Petrie MA, McHenry CL, Kimball AL, Suneja M, Yen CL, Shields RK. Distinct skeletal muscle gene regulation from active contraction, passive vibration, and whole body heat stress in humans. PloS one (in review)

## Articles in Peer-Reviewed Journals

### 2016

Hurwitz E, Vassilaki M, Li D, Schneider MJ, Stevans JM, Phillips RB, Phelan S, Lewis EA, Armstrong RC, Variations in patterns of use and charges for the care of headache in North Carolina, 2000-2009: A statewide claims' data analysis. *JMPT*, May 2016, 39(4) 229-39.

Hurwitz E, Li D, Guillen J, Schneider MJ, Stevans JM, Phillips RB, Phelan S, Lewis EA, Armstrong RC, Vassilaki M. Variations in patterns of use and charges for the care of low back pain in North Carolina, 2000-2009: A statewide claims' data analysis. *JMPT*, May 2016, 39(4) 252-62.

Hurwitz E, Li D, Guillen J, Schneider MJ, Stevans JM, Phillips RB, Phelan S, Lewis EA, Armstrong RC, Vassilaki M. Variations in patterns of use and charges for neck pain care in North Carolina, 2000-2009: A statewide claims' data analysis. *JMPT*, May 2016 39(4) 240-51.

Milligan JD, Labreche T, Riva JJ, Bauman CA. Nonfunctioning pituitary macroadenoma: a case report from the patient perspective. Chiropractic & Manual Therapies 2016**24**:12 **DOI:** 10.1186/s12998-016-0093-z© Bauman et al. 2016

Hondras M, Hartvigsen J, Myburgh C, Johannessen H. Everyday burden of musculoskeletal conditions among villagers in rural Botswana: a focused ethnography. *J Rehab Med* 2016;48(5):449-55.

Rhee G, Leininger B, Ghildayal N, Evans R, Dusek JA, Johnson PJ. Complementary and Integrative Healthcare for Patients with Mechanical Low Back Problems in a Hospital Setting. *Complementary Therapies in Medicine*. Feb 2016.

Ghildayal N, Johnson PJ, Evans R, Kreitzer MJ. Use of CAM among US adults with chronic low back pain. *Global Advances in Health and Medicine*. Jan 2016.

## 2015

Herman, Patricia M. and Ian D. Coulter. Complementary and Alternative Medicine: Professions or Modalities? Policy Implications for Coverage, Licensure, Scope of Practice, Institutional Privileges, and Research. Santa Monica, CA: RAND Corporation, 2015. http://www.rand.org/pubs/research\_reports/RR1258.html.

Dagenais S, Brady O, Haldeman S, Manga P. A systematic review comparing the costs of chiropractic care to other interventions for spine pain in the United States. *BMC Health Serv Res.* 2015 Oct 19;15:474.

Dudley Javoroski S, Petrie MA, McHenry CL, Amelon RE, Saha PK, Shields RK. Bone architecture adaptations after spinal cord injury: impact of long term vibration of a constrained lower limb. *Osteoporosis international:* a journal established as result of cooperation between

the European Foundation for Osteoporosis and the National Osteoporosis Foundation of the USA. 2015.

Evans R, Vihstadt C, Westrom K, Baldwin L. Complementary and Integrative Healthcare in a Long-term Care Facility: A Pilot Project. *Global Advances In Health And Medicine*, Jan. 2015, 4(1):18-27.

Abode Iyamah KO, Stoner KE, Grossbach AJ, Viljoen SV, McHenry CL, Petrie MA, et al. Effects of brain derived neurotrophic factor Val66Met polymorphism in patients with cervical spondylotic myelopathy. *J Clin Neurosci.* 2015.

Gross, A., T.M. Kay, J.P. Paquin, S. Blanchette, P. Lalonde, T. Christie, G. Dupont, N. Graham, S.J. Burnie, G. Gelley, C.H. Goldsmith, M. Forget, J.L. Hoving, G. Bronfort, and P.L. Santaguida, Exercises for mechanical neck disorders. *Cochrane Database Syst Rev*, 2015.

Maiers M, Evans R, Hartvigsen J, Schulz C, Bronfort G. Adverse events among seniors receiving spinal manipulation and exercise in a randomized clinical trial. *Man Ther*. April 2015.

Schneider MJ, Evans R, Haas M, Leach M, Hawk C, Long C, Cramer GD, Walters O, Vihstadt C, Terhorst L. US chiropractors' attitudes, skills and use of evidence-based practice: A cross-sectional national survey. *Chiropr Man Therap.* May 2015.

Furlan A, Van Tulder M, Chou R, Schoene M, Deyo R, Bronfort G, Maher C et al. 2015 Updated Method Guideline for Systematic Reviews in the Cochrane Back and Neck. *Spine*. July 2015.

Delagran L, Vihstadt C, Evans, R. Aligning Theory and Design: The Development of an Online Learning Intervention to Teach Evidence Based Practice for Maximal Reach. *Global Advances in Health and Medicine*. Sept 2015.

Gross A, Kay TM, Paquin JP, Blanchette S, Lalonde P, Christie T, Dupont G, Graham N, Burnie SJ, Gelley G, Goldsmith CH, Forget M, Hoving JL, Brønfort G, Santaguida PL; Cervical Overview Group. Exercises for mechanical neck disorders. *Cochrane Database Syst Rev.* 2015 Jan 28;1:CD004250.

Gross A, Langevin P, Burnie SJ, Bedard-Brochu MS, Empey B, Dugas E, Faber-Dobrescu M, Andres C, Graham N, Goldsmith CH, Bronfort G, Hoving JL, LeBlanc F. Manipulation and mobilisation for neck pain contrasted against an inactive control or another active treatment. *Cochrane Database Syst Rev.* 2015;9:CD004249.

Brønfort G, Evans RL, Goldsmith CH, Haas M, Leininger B, Levin M, Schmitt J, Westrom K. Spinal rehabilitative exercise and manual treatment for the prevention of migraine attacks in adults. *Cochrane Database Syst Rev* 2015, Issue 8. Art. No.:CD011848.

Weeks W, Tosteson T, Whedon J, Leininger B, Lurie J, Swenson R, Goertz C, O'Malley A. Describing and comparing propensity score methods for creating comparable cohorts of

4 NCMIC Foundation Publications and Presentations

chiropractic users and non-users in older, multiply comorbid Medicare patients with chronic low back pain. *J Manip Physiol Therap.* Nov-Dec. 2015.

Lubbe D, Lakhani E, Brantingham JW, Parkin-Smith G, Cassa T, Globe G, Korporaal C. Manipulative therapy and rehabilitation for recurrent ankle sprain with functional instability short-term assessor-blind parallel-group randomised trial. *J Manip Ther Physiol Ther* Oct 2015;Jan 38(1)22-34

Dwyer L, Parkin-Smith GF, Brantingham JW, Korporaal C, Cassa TK, Globe G, Bonnefin D, Tong, V. Manual and manipulative therapy in addition to rehabilitation for osteoarthritis of the knee: assessor-blind randomized pilot trial. *J Manip Physiol Ther* Jan 2015;38(1):1-21 e2

Brantingham JW, Cassa T. Conservative, Manipulative and Multimodal Therapies in the Treatment of Osteoarthritis of the Great Toe: A Case Series. *J Chiropr Med* 2015

Hondras M, Myburgh C, Hartvigsen J, Johannessen H. *Botlhoko, botlhoko!* How people talk about their musculoskeletal complaints in rural Botswana: a focused ethnography. *Global Health Action* 2015, 8: 29010. <u>http://dx.doi.org/10.3402/gha.v8.29010</u>.

Gay, CW, Papuga MO, Bishop MD, Dougherty P. The frequency and reliability or cortical activity using a novel strategy to present pressured pain stimulus over the lumbar spine. *J Neurosci Methods.* 2015 Jan 15, 108-13

Gay CW, Horn ME, Bishop MD, Robinson ME, Bialosky JE. Investigating dynamic pain sensitivity in the context of the fear-avoidance model. *Eur J Pain*. 2015 19(1) 48-58.

## 2014

Fernandes N, Bryant D, Griffith L, El-Rabbany M, Fernandes NM, Kean C, Marsh J, Mathur S, Moyer R, Reade CJ, Riva JJ, Somerville L, Bhatnagar N. Outcomes for patients with the same disease treated inside and outside of randomized trials: a systematic review and meta-analysis. *CMAJ*. 2014 Nov 4;186(16):E596-609.

Busse JW, Riva JJ, Rampersaud R, Goytan MJ, Feasby TE, Reed M, You JJ. Spine surgeons' requirements for imaging at the time of referral: a survey of Canadian spine surgeons. *Can J Surg. 2014* Apr;57(2):E25-30.

Busse JW, Bruno P, Malik K, Connell G, Torrance D, Ngo T, Kirmayr K, Avrahami D, Riva JJ, Ebrahim S, Struijs PA, Brunarski D, Burnie SJ, LeBlanc F, Coomes EA, Steenstra IA, Slack T, Rodine R, Jim J, Montori VM, Guyatt GH. An efficient strategy allowed English-speaking reviewers to identify foreign-language articles eligible for a systematic review. *J Clin Epidemiol*. 2014 May; 67(5): 547-53.

Mieritz RM, Bronfort G, Hartvigsen J. Regional lumbar motion and patient-rated outcomes: a secondary analysis of data from a randomized clinical trial. *J Manip Physiol Ther*. Nov-Dec 2014.

Michaleff ZA, Kamper SJ, Maher CG, Evans R, Broderick C, Henschke N. Low back pain in children and adolescents: a systematic review and meta-analysis evaluating the effectiveness of conservative interventions. *Eur Spine* J. Oct 2014.

Petrie M, Suneja M, Shields RK. Low frequency stimulation regulates metabolic gene expression in paralyzed muscle. *Journal of applied physiology*. 2015:jap 00628 2014.

Olson E, Bodziony M, Ward J, Coats J, Koby B, Goehry D. Effect of lumbar spine manipulation on asymptomatic cyclist sprint performance and hip flexibility. J Chiropr Med 2014;13:230-8. Petrie MA, Suneja M, Faidley E, Shields RK. Low force contractions induce fatigue consistent with muscle mRNA expression in people with spinal cord injury. *Physiological Reports* 2014;2(2).

Petrie MA, Suneja M, Faidley E, Shields RK. A minimal dose of electrically induced muscle activity regulates distinct gene signaling pathways in humans with spinal cord injury. *PloS one*. 2014;9:e115791.

Petrie MA, Suneja M, Faidley E, Shields RK. Low force contractions induce fatigue consistent with muscle mRNA expression in people with spinal cord injury. *Physiological Reports* 2014;2(2).

Ricardo Angeles, Beatrice McDonough, Michelle Howard, Lisa Dolovich, Francine Marzanek-Lefebvre, Helen Qian, John Riva. Primary health care needs for a priority population: A survey of professional truck drivers. *Work.* 49 (2014) 175-181.

McDonough B, Howard M, Angeles R, Dolovich L, Marzanek-Lefebvre F, Riva J, Laryea S. Lone Workers attitudes towards their health: Views of Ontario truck drivers and their managers. *BMC Research Notes*. 2014 7:249.

Quesnele JJ, Triano J, Noseworthy MD, Wells, GD. Changes in vertebral artery blood flow following various head positions and cervical spine manipulation. *J Manip Physiol Therap.* 37(1) Jan 2014, 22-31.

Gay CW, Bishop MD. Research on Placebo Analgesia is Relevant to Clinical Practice. *Chiropr Man Therap.* 2014; 22(1)

Horn ME, Alappattu MJ, Gay CW, Bishop MD. Fear of Severe Pain Mediates Sex Differences in Pain Sensitivity Responses to Thermal Stimuli. *Pain Res Treat*. 2014; 2014: 897953

Gay CW, Robinson ME, George SZ, Perlstein WM, Bishop MD. Immediate changes after manual therapy in resting-state functional connectivity as measured by functional magnetic resonance imaging in participants with induced low back pain. *J Manip Physiol Therap.* 2014. 37(9) 614-27

### 2013

Busse JW, Schandelmaier S, Kamaleldin M, Hsu S, Riva JJ, Vandvik PO, Tsoi L, Lam T, Ebrahim S, Johnston B, Oliveri L, Montoya L, Kunz R, Malandrino A, Bhatnagar N, Mulla SM, Lopes LC, Soobiah C, Wong A, Buckley N, Sessler D, Guyatt GH. Opioids for chronic non-cancer pain: a protocol for a systematic review of randomized controlled trials. *Syst Rev.* 2013 Aug 21;2:66.

Riva JJ, Wong JJ, Brunarski DJ, Chan AH, Lobo RA, Aptekman M, Alabousi M, Imam M, Gupta A, Busse JW. Consideration of chronic pain in trials to promote physical activity for diabetes: a systematic review of randomized controlled trials. *PLoS One*. 2013 Aug 7;8(8):e71021. doi: 10.1371/journal.pone.0071021. Print 2013. Review.

Reade CJ, Riva JJ, Busse JW, Goldsmith CH, Elit L. Risks and benefits of screening asymptomatic women for ovarian cancer: a systematic review and meta-analysis. *Gynecol Oncol.* 2013 Sep;130(3):674-81.

Busse JW, Ebrahim S, Connell G, Coomes EA, Bruno P, Malik K, Torrance D, Ngo T, Kirmayr K, Avrahami D, Riva JJ, Struijs P, Brunarski D, Burnie SJ, LeBlanc F, Steenstra IA, Mahood Q, Thorlund K, Montori VM, Sivarajah V, Alexander P, Jankowski M, Lesniak W, Faulhaber M, Bała MM, Schandelmaier S, Guyatt GH. Systematic review and network meta-analysis of interventions for fibromyalgia: a protocol. *Syst Rev.* 2013 Mar 13;2:18.

Busse JW, Riva JJ, Nash JV, Hsu S, Fisher CG, Wai EK, Brunarski D, Drew B, Quon JA, Walter SD, Bishop PB, Rampersaud R. Surgeon attitudes toward nonphysician screening of low back or low back-related leg pain patients referred for surgical assessment: a survey of Canadian spine surgeons. *Spine* (Phila Pa 1976). 2013 Apr 1;38(7):E402-8.

Williams, S. Pinto Zipp, G., Cahill, T., Parasher, R.K.. "Prevalence of burnout among doctors of chiropractic in the northeastern united states.." *J Manip Physiol Therap*.36(6) 2013: 376-384.

Williams, S. "The Prevalence of Burnout among Chiropractic Practitioners." *Medicine and Health Sciences Commons*<sup>TM</sup>. 2013: 126.

Urrea J, Vohra J, Ward J, Amonette W, Coats J. Pilot study of the impact of Rocktape<sup>®</sup> on female's depth jump performance. *World Academy of Science, Engineering, and Technology International Science Index* 2013;83 (Nov):1266-71. eISSN 2010-3778.

Humphries K, Ward J, Coats J, Norbert J, Amonette W, Dyess S. Lower cervical spine manipulation impact on handgrip strength and free-throw accuracy of asymptomatic recreational basketball players: a pilot study. *J Chirop Med* 2013;12:153-9.

Gay CW, Alappattu MJ,Coronado RA, Horn ME, Bishop MD. The Effect of a Single Session of Muscle-Biased Therapy on Pain Sensitivity: A Systematic Review and Meta-Analysis of Randomized Controlled Trials. *J Pain Res*.2013;6:7-22

## 2012

Bauman CA, Milligan JD, Lee FJ, Riva JJ. Autonomic dysreflexia in spinal cord injury patients: an overview. *J Can Chiropr Assoc*. 2012 Dec;56(4):247-50.

Riva JJ, Malik KM, Burnie SJ, Endicott AR, Busse JW. What is your research question? An introduction to the PICOT format for clinicians. *J Can Chiropr Assoc*. 2012 Sep;56(3):167-71.

Henry J, Yashpal K, Vernon H, Kim J, Im HJ. Lumbar facet joint compressive injury induces lasting changes in local structure, nociceptive scores and inflammatory mediators in a novel rat model. *Pain Res Treat* 2012, Article ID 127636: Epub 2012 Jun 28.

Gay CW, Beres JL, Bishop MD. Clinical presentation of a patient with thoracic myelopathy at a chiropractic Clinic. *J Chirop Med*, June 2012. Vol 11 (2): 115-120.

Coronado RA, Gay CW, Bialosky JE, Carnaby GD, Bishop MD, George SZ. Changes in pain sensitivity following spinal manipulation: a systematic review and meta-analysis. *J Electromyo Kines*, Oct. 2012; 22 (5):752-67.

Hawk C, Schneider MJ, Evans MW, Redwood D. Consensus process to develop a best practices document on the role of chiropractic care in health promotion, disease prevention and wellness. *J Manip Physiol Ther.* 2012; 35(7):556-67.PMID: 22742964

## 2011

Dagenais S. Estimating the return on investment from developing and operating a utilization review program for health services related to low back pain in a health plan in the United States (Master's dissertation). London School of Economics and Political Science, 2011.

Enyinnaya, E. Eliminating the Burden of Musculoskeletal Health Care Disparities: The Chiropractic Contribution, *J Amer Chiropr Assoc* 2011 April;48(3):19-23.

Dagenais S, Haldeman S (eds). Evidence-based management of low back pain. Elsevier-Mosby, St Louis, MO, 2011.

## 2010

Triano JJ, <u>Goertz C</u>, Weeks J, Murphy DR, Kranz KC, McClelland GC, Kopansky-Giles D, Morgan W, Nelson CF. Chiropractic in North America: Toward a Strategic Plan for Professional Renewal – Outcomes from the 2006 Chiropractic Strategic Planning Conference. *J Manip Physiol Ther* 2010;33(5):395-405.

Hawk C, <u>Schneider M</u>J, <u>Dougherty P</u>, <u>Gleberzon BJ</u>, <u>Killinger LZ</u>. Best Practices Recommendations for Chiropractic Care for Older Adults: Results of a Consensus Process. *J Manip Physiol Ther*. 2010; 33(6):464-473. PMID: 20732584

### 2009

Hawk C, Schneider MJ, Ferrance R, Hewitt E, Van Loon M, Tanis L. Best Practices Recommendations for Chiropractic Care for Infants, Children, and Adolescents. *J Manip Physiol Ther.* 2009; 32(8):639-647. PMID: 19836600

Dagenais S, Roffey DM, Wai EK, Haldeman S, Caro J. Can cost utility evaluations inform decision making about interventions for low back pain? *The Spine Journal*, 2009;9:944-957.

### 2008

Dagenais S, Caro J, Haldeman S. A systematic review of low back pain cost of illness studies in the United States and internationally. *The Spine Journal*, 2008;8:8-20.

Haldeman S, Dagenais S. A supermarket approach to the evidence-informed management of chronic low back pain. *The Spine Journal*, 2008;8:1-7.

Goertz C, Grimm R, Grandits G, Svendsen K. Treatment of Hypertension with Alternative Therapies (THAT) Study – A Randomized Clinical Trial. *J Hypertens* 2002;Oct.20:2063-2068.

Lawrence DJ, Polipnick J, Colby E. Barriers to and opportunities for the implementation of best practice recommendations in chiropractic: report of a focus group. *J Allied Health*. 2008 Summer;37(2):82-9. PMID: 18630783

#### 2007

Schwarz I, Hondras MA. A survey of chiropractors practicing in Germany: practice characteristics, professional reading habits, and attitudes and perceptions toward research. *Chiropractic and Osteopathy*2007;15(6).

#### 2005

Polipnick J, Hondras MA, Delevan SM, Lawrence DJ. An exploration of community leader perspectives about minority involvement in chiropractic clinical research. *J Altern Complement*. *Med* 2005 Dec;11(6):1015-20. PMID: 16398592

## **Books & Chapters**

Currie, SA. The Neuromuscular Response to Spinal Manipulation: Quantifying the Effect of Pain with Electromyography. A Dissertation Presented to the Faculty of the Daniel Felix Ritchie School of Engineering and Computer Science University of Denver, Nov. 2015.

Bishop MD, Bialosky JE, Gay CW. Chronic Low Back Pain. In Fernandez de las Penas C, Cleland J (eds). Manual Therapy for Musculoskeletal Pain Syndromes. 236-244 Elsevier. 2015

Phillips RB, Clum C, Chapman-Smith D. The Global Advance of Chiropractic: The World Federation of Chiropractic 1988-2013. World Federation of Chiropractic, Toronto, Canada, 2013.

Phillips RB. The Journey of Scott Haldeman: Spine Care Specialist & Researcher. National Chiropractic Mutual Holding Company, Clive, IA, 2009.

## **Conference Proceedings**

## 2016

Lisi AJ, Brandt CA. Trends in the use of chiropractic services in the Department of Veterans Affairs. Association of Chiropractic Colleges-Research Agenda Conference, Orlando, FL, March 2016.

Salsbury S, Goertz CM, Twist E, Smith V, Lisi AJ. Doctors of chiropractic working in private sector medical facilities: A descriptive survey. Accepted by ACC-RAC 2016 as a platform presentation.

Dougherty P, Killinger L, Hawk C, Schneider M. Best practices in geriatrics (workshop). Association of Chiropractic Colleges-Research Agenda Conference. Orlando, March 2016.

Russell BS, Hoiriis KT, Hosek RS, Weiner MT. Kinetic and kinematic analysis of walking gait, before and after chiropractic care, following fifth metatarsal fractures. Accepted by ACC-RAC 2016 as platform presentation.

Capes M, Russell BS, Oz M, Hosek RS. Kinetic gait assessment before and after chiropractic lower extremity adjustments. Accepted by ACC-RAC 2016 as platform presentation.

## 2015

Bitra J, Phung J, Weber II KA, Inoue N, Espinoza Orías AA, Parrish TB. Use of a Novel MRI Compatible Head-Positioning Device for the Three Dimensional Kinematic Analysis of the Cervical Spine in Axial Rotation, American Society of Neuroradiology 53rd Annual Meeting 2015, Chicago, IL.

Pohlman KA, Carroll L, Hartling L, Tsuyuki R, Vohra S. Pediatric chiropractors' attitude and opinion about patient safety culture. *J Chiropr Educ* 2015;29(1):84.

Hewitt E, Pohlman KA, Hestbaek L. Core competencies of the certified pediatric chiropractor: results of a Delphi consensus process. *Oregon Collaborative for Integrative Medicine*, Portland, OR, June 2015.

Schneider MJ, Evans R, Haas M, Leach M, Hawk C, Long C, Cramer G, Walters O, Vihstadt C, Terhorst L. Distance education online intervention for evidence based practice literacy (Platform

Presentation). World Federation of Chiropractic Congress - European Chiropractors' Union Convention, Athens, Greece; May 13-16, 2015

Leininger B. Pain reduction and costs of spinal manipulative therapy for older adults with neck pain: a RCT-based cost-effectiveness analysis (Platform Presentation). ACC-RAC 2015, Las Vegas, NV; March 19-21, 2015.

Leininger B. Chronic Neck Pain in Older Adults: Cost-Effectiveness of Spinal Manipulation, Supervised Exercise and Self-Management; Academy Health 2015; Minneapolis, MN; June 14-16, 2015.

Leininger B. Cost-Effectiveness of Spinal Manipulation (Webinar). Academic Consortium for Integrative Medicine and Health; August 10, 2015.

Evans R. Spinal Manipulation for Chronic Low Back and Neck Pain: Best Evidence Update (Keynote Presentation), The Chiropractic & Osteopathic College of Australia's 11<sup>th</sup> Biennial Conference 2015; Melbourne, Australia; October 9-11, 2015.

Evans R. Self-Management for Chronic Low Back and Neck Pain: Best Evidence Update and Implications for Practice. (Keynote Presentation), The Chiropractic & Osteopathic College of Australia's 11<sup>th</sup> Biennial Conference 2015; Melbourne, Australia; October 9-11, 2015.

Bronfort G. Revisiting the Biopsychosocial Model for Chronic Spine Pain. (Keynote Presentation), The Chiropractic & Osteopathic College of Australia's 11<sup>th</sup> Biennial Conference 2015; Melbourne, Australia; October 9-11, 2015.

Evans R, Bronfort G. Comparative Effectiveness Research: Can Randomized Controlled Trials Be More Pragmatic or Should We Use Observational Studies Instead? (Workshop), The Chiropractic & Osteopathic College of Australia's 11<sup>th</sup> Biennial Conference 2015; Melbourne, Australia; October 9-11, 2015.

Riva J, More A. Collaborative Care: A New Paradigm that Ensures Excellence in Patient Care. Canadian Chiropractic Conference, 18 Sep 2015, Niagara Falls, Canada.

Haldeman S, Hondras M. Developing primary spine care: World Spine Care model and protocols [platform presentation]. 13<sup>th</sup> World Federation of Chiropractic Biennial Congress, Athens, Greece, 15 May 2015.

Hondras, M, Salsbury S, Nissen N, Johannessen H. Walking sticks for muscle, bone and joint health in rural Botswana: Villager perspectives from the World Spine Care MuBoJo project [poster]. In: Proceedings of the 13<sup>th</sup> WFC Biennial Congress, p. 145-6. Athens, Greece, 13-16 May 2015.

Hondras, M, Johannessen H, Hartvigsen J, Myburgh C, Haldeman S. Should healthcare in rural Botswana focus on integration and group activities to ease the burdens associated with muscle,

bone and joint disorders? The World Spine Care MuBoJo project [poster]. In: Proceedings of the 13<sup>th</sup> WFC Biennial Congress, p. 145. Athens, Greece, 13-16 May 2015.

Petrie, MA, Suneja, M, Faidley, E, Shields, RK. Low force contractions induce fatigue consistent with muscle mRNA expression in people with spinal cord injury. APTA CSM 2015

Nate Hinkeldey, Michael Olson, Michael Petrie, and Nicole Ingrando. Interdisciplinary Care Models: Working Together to Benefit the Patient. Palmer College, Florida Homecoming 2015

Petrie MA. Muscle Physiology Review: The use of physiology during patient evaluation and care. Palmer College, Florida Homecoming 2015

Petrie MA, McHenry CL, Suneja M, Shields RK. "Muscle Metabolic Gene Expression Following Three Stressors: Mechanical (vibration), Systemic Heat Stress, And Muscle Activation," American College of Sport Medicine, Annual Conference: Exercise is Medicine 2015

Russell BS, Hosek R, Hoiriis KT. Kinetic gait evaluation of three patients with foot and ankle injuries, before and after a limited protocol of chiropractic care [conference abstract]. J Chiropr Educ. 2015; 29(1): 103. DOI 10.7899/JCE-14-34.

Dudley-Javoroski S, McHenry CL, Petrie MA, Shields RK. "Bone Architecture Adaptations after Spinal Cord Injury: Impact of Long Term Vibration of a Constrained Lower Limb," American College of Sport Medicine, Annual Conference: Exercise is Medicine 2015 Michael Petrie, D.C., Ph.Dc. Muscle Physiology Review: The use of physiology during patient evaluation and care. Palmer College, Florida Homecoming 2015

Gay CW, Bishop MD. "Longitudinal assessment of pressure pain sensitivity following an acute muscular injury and manual therapy" Accepted for <u>poster presentation</u> at the 13<sup>th</sup> WFC Congress, May 13-16<sup>th</sup>, 2015 Athens, Greece.

## 2014

Pohlman KA, O'Beirne M, Thiel H, Cassidy JD, Mior S, Hurwitz EL, Westaway M, Ishaque S, Yager JY, Vohra S. Development and validation of instruments to evaluate adverse events after spinal manipulation therapy. *J Altern Complement Med* 2014:20(5):A49.

Petrie, MA, Johanns, JJ, Kockler, AM, Shields, RK. Muscle Electrical Stimulation Enhances Learning from Unexpected Events induced during a Single Limb Task, American College of Sport Medicine, Annual Conference: Exercise is Medicine 2014

Nate Hinkeldey, Michael Olson, Michael Petrie, and Mike Tunning. Interdisciplinary Care Models: Working Together to Benefit the Patient. Palmer College, Davenport Homecoming 2014 Spurgin K, Gutierrez R, Prien A, Curras-Collazo M. "Cardiovascular toxicity and sympathetic nervous system disruption following developmental exposure to organohalogen pollutant" Center for Neuronal-Glial Interactions (CGNI), University of California, Riverside, January 2014

Russell BS, Hosek R, Hoiriis KT, Linkhorn AE. Kinetic evaluation of gait in an injured football player before and after chiropractic care [conference abstract]. *J Chiropr Educ* 2014;28(1):97.

Ron Boesch, Dave Juehring, Michael Petrie, and Mike Tunning. An Overview of Movement Development, Injury and Recovery. Palmer College, Davenport Homecoming 2014

Spurgin, K., Gutierrez, R., Prien, A., and M. C. Curras-Collazo Sympathetic nervous system disruption following developmental exposure to organohalogen pollutants, Center for Neuronal-Glial Interactions (CGNI), University of California, Riverside, January 2014.

Spurgin, K., Gutierrez, R., Prien, A., and M. C. Curras-Collazo "Developmental PBDE Exposure Increases Blood Pressure and Hypothalamic-Pituitary-Adrenal Axis Activity in Osmotic Challenged Rats" American Autonomic Society, November 2014

Petrie MA, Johanns JJ, Kockler AM, Shields RK. Muscle Electrical Stimulation Enhances Learning from Unexpected Events induced during a Single Limb Task, American College of Sport Medicine, Annual Conference: Exercise is Medicine 2014

Hinkeldey N, Olson M, Petrie MA, Tunning M. Interdisciplinary Care Models: Working Together to Benefit the Patient. Palmer College, Davenport Homecoming 2014

Boesch R, Juehring D, Petrie MA, Tunning M. An Overview of Movement Development, Injury and Recovery. Palmer College, Davenport Homecoming 2014

Gay CW, Letzen JE, Craggs JG, Robinson ME, Bishop MD. "Longitudinal assessment of connectivity across resting-state networks in a model of acute low back pain" <u>Poster presentation</u> at the International Association for the Study of Pain's 15<sup>th</sup> World Congress of Pain, Buenos Aires, Argentina, October 6-11, 2014

Gay CW. "Changes in Resting-State Functional Connectivity following Acute Muscular Injury and Manual Therapy" Oral Presentation at the 2014 Neuromuscular Plasticity Noons, Gainesville, FL July 26<sup>th</sup> 2014

Gay CW, Letzen JE, Sevel LS, Craggs JG, Bishop MD. "Functional Connectivity between the Default Mode Network and the Insular Cortex mediates the pain sensitivity shifts in a Model of Acute Low Back Pain" Poster presentation at the 9<sup>th</sup> Annual Neuromuscular Plasticity Symposium Gainesville, Florida, March 14th, 2014

Gay CW, Craggs JC, Robinson ME, Bishop MD, "Changes in resting-state functional connectivity that are related increased pain sensitivity in a model of acute low back pain." Poster

presentation at the American Pain Society 33rd Annual Scientific Meeting, Tampa Florida, April30-May3rd, 2014

Gay CW, Bishop MD, "Functional Connectivity Changes Following Manipulative and Body Based Interventions: A Preliminary Report," Platform presentation at the Association of Chiropractic Colleges Educational Conference XXI, Orlando Florida, March 20-22, 2014 -Award Winning Submission

## 2013

Russell B, Geil M, Wu J, Hoiriis K. Asymmetry of vertical ground reaction forces during walking in adults with chronic low back pain, before and after chiropractic care [conference abstract]. *J Chiropr Educ* 2013;27(1):78.

Pohlman KA, Ishaque S, Cassidy JD, O'Beirne M, Vohra S. Validation of a Patient Safety Attitudes Survey for Spinal Manipulation Therapy Providers. *Forsch Komplementmed* 2013; 20(Suppl 1):100.

Spurgin, K., Valdez, M, Kouch, J, Jha, V & Curras-Collazo, M. PACAP: A Modulator of HPA-Axis and Hyperactivity, Experimental Biology, San Diego, April 2013

Spurgin K, Valdez M, Kouch J, Jha V, Curras-Collazo M. "PACAP: A Modulator of HPA-Axis and Hyperactivity" American Physiological Society 2013

Spurgin K, Valdez M, Kouch J, Washek J, Curras-Collazo M. "The impact of PACAP gene deletion on genes associated with adrenal corticosterone production in mice" Center for Neuronal-Glial Interactions (CGNI), University of California, Riverside, 2013

Petrie MA, Suneja M, Faidley E, Shields RK. "Acute Electrical Stimulation Induces Differential Expression of Gene Transcripts Related to Glucose Metabolism and Regulation," American College of Sport Medicine, Annual Conference: Exercise is Medicine 2013

Shaffer MA, Petrie MA, Campbell B, Aunan K, McHenry CL, Shields RK. "Age Influences Neuromuscular Performance During a Novel Single Limb Squat Test," American College of Sport Medicine, Annual Conference: Exercise is Medicine 2013.

Liu W, Bond B. Imaging markers in chronic back pain and fibromyalgia research: Literature review and pilot data. CTR Seminars, University of Kansas Medical Center, 24 Oct., 2013.

Russell BS, Geil MD, Wu J, Hoiriis KT. Variability of vertical ground reaction forces in adults with chronic low back pain, before and after a limited protocol of chiropractic care. Platform presentation at the annual meeting of the American Society of Biomechanics, September 3-5, 2013, Omaha, Nebraska.

Russell B, Geil M, Wu J, Hoiriis K. Variability and asymmetry of vertical ground reaction forces during walking in adults with chronic low back pain, before and after chiropractic care

**14** NCMIC Foundation Publications and Presentations

[conference abstract]. *Proceedings of the World Federation of Chiropractic, 12th Biennial Congress,* Durban, South Africa, April 10-13, 2013. Page 215.

Gay CW, O'Shea AM, Craggs JG, Bishop MD. "Grey matter density in the primary somatosensory cortex explains individual differences in the intensity of delayed onset muscle soreness," Poster presentation at 32nd Annual Scientific Meeting of the American Pain Society in New Orleans, LA May 8-11, 2013

Valencia C, Gay CW, Zeppieri G, George SZ, "Inducing temporal summation: the importance of relevant stimulus parameters," Poster presentation at 32nd Annual Scientific Meeting of the American Pain Society in New Orleans, LA May 8-11, 2013

Gay CW, "Expectation for pain relief prior to and after random assignment," Oral Presentation at the American Pain Society Preconference Symposium, New Orleans, May 8<sup>th</sup>, 2013

Gay CW, Alappattu MJ, Bishop MD, "The effect of a single session of muscle-biased therapy of pain sensitivity: a systematic review of randomized controlled trials," Platform Presentation at the Association of Chiropractic Colleges Educational Conference Research Agenda Conference (ACC-RAC), in Washington, DC March 15, 2013

## 2012

Hawk C, Schneider M, Evans MW, Redwood D. Consensus process to develop a best practices document on the role of chiropractic care in health promotion, disease prevention and wellness. Association of Chiropractic Colleges-Research Agenda Conference. Las Vegas, March 2012.

Russell BS, Geil MD, Wu J, Hoiriis KT. Variability of vertical ground reaction forces in patients with chronic low back pain, before and after chiropractic care [conference abstract]. *J Chiropr Educ* 2012;26(1):108.

Spurgin, K., Kaprelian, A., Valdez, M., Martinez, B., and Curras-Collazo, MC, Chronic sound stress raises systolic blood pressure and gene expression of pituitary adenylate cyclase activating polypeptide (PACAP) and its receptor PAC1R in the PVN (abstract/poster) Experimental Biology Conference April 21, 2012

Spurgin, K., Kaprielian, A., Valdez, J., Martinez, B., and Curras-Collazo, MC, Stress raises resting systolic blood pressure and increases adrenal expression of pituitary adenylate cyclase activating polypeptide (PACAP) as well as catecholamine biosynthetic enzymes in rats. (abstract/poster) Center for Neuronal-Glial Interactions (CGNI), University of California, Riverside, Jan, 2012

Gay CW, Horn-Robinson ME, Bishop MD, Robinson ME, Bialosky JE, "The role pain sensitivity and fear play in the relationship between low back pain intensity and disability," Poster presentation at 31st Annual Scientific Meeting of the American Pain Society in Honolulu, HI May 18, 2012 Gay CW, Horn-Robinson ME, Bishop MD, Robinson ME, Bialosky JE, "Factors Influencing the Relationship between Low Back Pain Intensity and Disability" Poster presentation at PHHP Research Day 2012 in Gainesville, FL April 18, 2012.

Gay CW, Bialosky JE, George SZ, Bishop MD, "Association between the magnitude of temporal summation and current level and duration of low back pain" Poster presentation at APTA Combined Sections Meeting 2012 in Chicago, IL February 10, 2012 : Nominated for Orthopaedic Section Research Poster Award.

## 2011

Spurgin, K., Valdez, M. Kaprielian, A., Nichol, R., Martinez, B. and Curras-Collazo, MC. Late Breaking Abstracts: Use of a calibrated method of massage therapy results in pressuredependent reductions in cardiovascular parameters, Clin Auton Res, 2011. 21(2): p. 130.

Wang X, Casadio M, Weber K, Parrish T, Mussa-Ivaldi F. White matter microstructure changes induced by motor skill learning, poster presentation at Neuroscience 2011, Society for Neuroscience Annual Meeting, Washington, DC.

Weber II KA, Wang X, Casadio M, Mussa-Ivaldi FA, Parrish TB. Does White Matter Change Following Motor Training?: A Pilot Study, poster presentation at the 17th Annual Meeting of the Organization for Human Brain Mapping 2011, Quebec City, Canada.

## 2010

Hawk C, Schneider M, Dougherty P, Gleberzon B, Killinger LZ. Consensus process to develop a "best practices" document for chiropractic care for older adults. *Proceedings of the 138<sup>th</sup> Annual Meeting of the American Public Health Association*. November 2010.