

Dr Andy Sparks – Publications and Conference Communications

Publications

Peer-Reviewed Journal Articles

1. Sheridan, A., Marchant, D.C., Williams, E.L., Jones, H., Hewitt, P.A., and **Sparks, S.A.** (2017). The Presence of Spotters Improves Bench Press Performance: A Deception Study. *Journal of Strength and Conditioning Research (In Press)*.
2. Gough, L., Deb, S.K., **Sparks, S.A.**, and McNaughton, L.R. (2017). The reproducibility of 4 km time trial (TT) performance following individualised sodium bicarbonate supplementation: a randomised controlled trial in trained cyclists. *Sports Medicine Open (In Press)*.
3. Boya, M., Foulsham, T., Hettinga, F., Parry, D., Williams, E., Jones, H., **Sparks, S.A.**, Marchant, D., Ellison, P., Bridge, C., McNaughton, L., and Micklewright, D. (2017). Information acquisition differences of experienced and novice time trial cyclists. *Medicine and Science in Sports and Exercise*, 49(9):1884-1898. DOI: 10.1249/MSS.0000000000001304.
4. Deb, S.K., Gough, L., **Sparks, S.A.**, and McNaughton, L.R. (2017). Determinants of curvature constant (W') of the power duration relationship under normoxia and hypoxia: the effect of pre-exercise alkalosis. *European Journal of Applied Physiology*, 117(5):901-912. DOI: 10.1007/s00421-017-3574-4.
5. Gough, L., Deb, S., **Sparks, S.A.**, and McNaughton, L.R. (2017). The Reproducibility of Blood Acid Base Responses in Male Collegiate Athletes Following Individualised Doses of Sodium Bicarbonate: A Randomised Controlled Crossover Study. *Sports Medicine (In Press)*. DOI: 10.1007/s40279-017-0699-x.
6. **Sparks, S.A.**, Williams, E.L., Bentley, D., Bridge, C.A., and McNaughton, L.R. (2017). Sodium bicarbonate ingestion and individual variability in time to peak pH. *Research in Sports Medicine*, 25(1): 58-66. DOI: 10.1080/15438627.2016.1258645.
7. Baxter, C., McNaughton, L.R., **Sparks, S.A.**, Norton, L., and Bentley, D. (2017). Impact of stretching on the performance and injury risk of long distance runners. *Research in Sports Medicine*, 25(1):78-90. DOI: 10.1080/15438627.2016.1258640.
8. Owens, D.J., Tang, J.C.Y., Bradley, W.J. **Sparks, S.A.**, Fraser, W.D., Morton, J.P., and Close, G.L. (2017). Efficacy of high dose vitamin D supplements for elite athletes. *Medicine and Science in Sports and Exercise*, 49(2):349-356. DOI: 10.1249/MSS.0000000000001105.
9. **Sparks, S.A.**, Williams, E.L., Jones, H.S., Bridge, C.A., Marchant, D., and McNaughton, L.R. (2016). Test-retest reliability of a 16.1 km time trial in trained cyclists using the CompuTrainer ergometer. *Journal of Science and Cycling*, 5(3):35-41.
10. Mosher, S., **Sparks, S.A.**, Williams, E.L., Bentley, D., and McNaughton, L.R. (2016). Ingestion of a nitric oxide enhancing supplement improves resistance exercise performance. *Journal of Strength and Conditioning Research*, 30(12):3520-3524. DOI: 10.1519/JSC.0000000000001437.
11. Williams, E.L., Jones, H.S., **Sparks, S.A.**, Marchant, D., Bridge, C.A., Midgley, A.W., and McNaughton, L.R. (2016). Deceptive manipulation of competitive starting strategies influences subsequent pacing, physiological status and perceptual responses during cycling time trials. *Frontiers in Physiology*. 7:536. DOI: 10.3389/fphys.2016.00536.

12. Jones, H.S., Williams, E.L., Marchant, D., **Sparks, S.A.**, Bridge, C.A., Midgley, A.W., and McNaughton, L.R. (2016). Improvements in cycling time trial performance are not sustained following the acute provision of challenging and deceptive feedback. *Frontiers in Physiology*, 7:399. DOI: 10.3389/fphys.2016.00399.
13. Ward, R., Bridge, C.A., Mc Naughton, L.R., and **Sparks, S.A.** (2016). Acute taurine ingestion has no effect on 4 km time trial performance in trained cyclists. *Amino Acids*, 48(11):2581-2587. DOI: 10.1007/s00726-016-2282-4.
14. McNaughton, L.R. Gough, L., Deb, S., Bentley, D., and **Sparks, S.A.** (2016). Recent developments in the use of sodium bicarbonate as an ergogenic aid. *Current Sports Medicine Reports*, 15(4):233-44. DOI: 10.1249/JSR.0000000000000283.
15. Jones, H.S, Williams, E.L., Marchant, D.C., **Sparks, S.A.**, Midgley, A.W., Bridge, C.A., and McNaughton, L.R. (2016). Deception has no Acute or Residual Effect on Cycling Time Trial Performance but Negatively Effects Perceptual Responses. *Journal of Science and Medicine in Sport*, 19(9):771-6. DOI: 10.1016/j.jsams.2015.12.006.
16. Miller, P., Robinson, A., **Sparks, S.A.**, Bridge, C.A., Bentley, D., and McNaughton, L.R. (2016). The effects of novel ingestion of sodium bicarbonate on repeated sprint ability. *Journal of Strength and Conditioning Research*. 30(2) 561-568. DOI: 10.1519/JSC.0000000000001126.
17. Williams, E.L., Jones, H.S., **Sparks, S.A.**, Marchant, D.C., Midgley, A.W., and McNaughton, L.R. (2015). Altered psychological responses to different magnitudes of deception during cycling. *Medicine and Science in Sports and Exercise*, 47(11):2423-2430. DOI: 10.1249/MSS.0000000000000694.
18. **Sparks, S.A.**, Dove, B., Bridge, C.A., Midgley, A.W., and McNaughton, L.R. (2015). Validity and Reliability of the Look Power Pedal System for Measuring Power during Incremental and Repeated Sprint Cycling. *International Journal of Sports Physiology and Performance*, 10: 39-45. DOI: 10.1123/ijsp.2013-0317.
19. Jones, H.S., Williams, E.L., Marchant, D., **Sparks, S.A.**, Midgley, A.W., Bridge, C.A., and McNaughton, L.M. (2015). Distance-dependent Association of Affect with Pacing Strategy in Cycling Time Trials. *Medicine and Science in Sports and Exercise*. 47(4): 825-832). DOI: 10.1249/MSS.0000000000000475.
20. Williams, E.L., Jones, H.S., **Sparks, S.A.**, Marchant, D.C., Midgley, A.W., and McNaughton, L.R. (2015). Competitor presence reduces internal attentional focus and improves 16.1km cycling time trial performance. *Journal of Science and Medicine in Sport*, 18(4): 486-491. DOI: 10.1016/j.jsams.2014.07.003.
21. **Sparks, S.A.** and Hilton, N. (2015). A quantification of the treadmill six-minute walk test using the MyWellness Key™ accelerometer. *Journal of Sport and Health Sciences*. 4(2): 188–194. DOI: 10.1016/j.jshs.2013.09.005.
22. Williams, E.L., Jones, H.S., **Sparks, S.A.**, Marchant, D., Micklewright, D., and Mc Naughton, L.R. (2014). Deception studies manipulating centrally acting performance modifiers: A review. *Medicine and Science in Sports and Exercise*, 46(7):1441-51. DOI: 10.1249/MSS.0000000000000235.
23. Wilson, G., Hawken, M.B., Poole, I., **Sparks, S.A.**, Bennett, S., Drust, B., Morton J., and Close, G.L. (2014). Rapid weight-loss impairs simulated riding performance and strength in jockeys: implications for making-weight. *Journal of Sports Sciences*, 32(4):383-91. DOI: 10.1080/02640414.2013.825732.

24. Ellison, P.H., **Sparks, S.A.**, Carnegie, E., Murphy, P., and Marchant, D. (2014). Determining eye-hand co-ordination using the sport vision trainer (SVT™): an evaluation of test-retest reliability. *Research in Sports Medicine*, 22(1):36-48. DOI: 10.1080/15438627.2013.852090.
25. **Sparks, S.A.**, Chandler, P., Bailey, T.G., Marchant, D.C., and Orme, D. (2013). The energy demands of portable gas analysis system carriage during walking and running. *Ergonomics*, 56(12):1901-7. DOI: 10.1080/00140139.2013.839830.
26. **Sparks, S.A.**, MacLaren, D.P.M., Bridge, N.E., Cable, N.T., Doran D.A. (2013). Laboratory Simulated Duathlon Performance: Effects of Pre-Exercise Meals. *International Journal of Sports Nutrition and Exercise Metabolism*. 23: 610-616. DOI: 10.1123/ijsnem.23.6.610.
27. Wood, S.J., Khalil, B., Fusaro, F., Folaranmi, S.E., **Sparks, S.A.**, and Morabito, A. (2013). Early structured surgical management plan for neonates with short bowel syndrome may improve outcomes. *World Journal of Surgery*, 37(7):1714-1717. DOI: 10.1007/s00268-013-2011-z.
28. Wilson, G., **Sparks, S.A.**, Drust, B., Morton J.P., and Close, G.L. (2013). Assessment of energy expenditure in elite jockeys during simulated race-riding and a working day: Implications for making-weight. *Applied Physiology, Nutrition and Metabolism*, 38(4):415-20. DOI: 10.1139/apnm-2012-0269.
29. **Sparks, S.A.**, and Close, G.L. (2013). Criterion validity of a portable urine refractometer and the effects of sample freezing. *Journal of Sports Sciences*, 31(7):745-9. DOI: 10.1080/02640414.2012.747693.
30. Balshaw, T.G., Bampouras, T., Barry, T.J., and **Sparks, S.A.** (2013). The effect of acute taurine ingestion on 3 km running performance in trained middle distance runners. *Amino Acids*, 44(2):555-61. DOI: 10.1007/s00726-012-1372-1.
31. **Sparks, S.A.**, Orme, D., and Mc Naughton, L.R. (2013). The effect of carrying a portable respiratory gas analysis system on energy expenditure during incremental running. *Applied Ergonomics*, 44(3):355-9. DOI: 10.1016/j.apergo.2012.09.005.
32. Stiegler, P., **Sparks, S.A.**, & Cunliffe, A. (2008). Moderate exercise, postprandial energy expenditure, and substrate use in varying meals in lean and obese men. *International Journal of Sport Nutrition and Exercise Metabolism*, 18(1): 66-78. DOI: 10.1123/ijsnem.18.1.66.
33. **Sparks, S.A.**, Cable, N.T., Doran, D.A., and MacLaren, D.P.M. (2005). The influence of environmental temperature on duathlon performance. *Ergonomics*, 48 (11-14):1558-1567. DOI: 10.1080/00140130500101254.

Book Chapters

1. McNaughton, L.R., Bentley, D., and **Sparks S.A.** (2016). Manipulating dietary glycemic index as a means of improving exercise and sports performance. In: *The Glycemic Index: Applications in Practice*, Elena Philippou (Editor). CRC Press, London, UK. ISBN: 9781498703666.

Professional Publications

1. Ellison, P.H., **Sparks, S.A.**, Carnegie, E., Murphy, P., and Marchant, D. (2014). Sports Vision Trainer Studies. *The Vision Care Institute – Johnson & Johnson (Columbia)*: April-June News Edition.

2. **Sparks, S.A.**, (2008). The vital but problematic process of dehydration. *Professional Strength and Conditioning: Journal of the UK Strength and Conditioning Association*, (9).

Peer Reviewed Conference Communications

1. Deb, S., Gough, L., **Sparks, S.A.**, and McNaughton, L.R. Determinants of W' in the power duration relationship in normoxia and hypoxia: the effect of induced alkalosis. *British Association of Sport and Exercise Sciences Annual Conference*, (Nottingham, UK, November, 2016).
2. Gough, L., Deb, S., **Sparks, S.A.**, and McNaughton, L.R. The reproducibility of blood acid base responses following different doses of NaHCO₃. *British Association of Sport and Exercise Sciences Annual Conference*, (Nottingham, UK, November, 2016).
3. Blennerhassett, C.L., McNaughton, L.R., and **Sparks, S.A.** Factors that influence the food choices of ultra-endurance athletes during prolonged training and competition. *3rd International Congress of Medicine and Science in Ultra-Endurance Sports*, (Chamonix, France, August 2016).
4. McNaughton, L.R., **Sparks, S.A.**, Williams, E.L., Bentley, D., and Mosher, S. Ingesting a nitric oxide enhancing supplement improves resistance exercise performance. *6th Annual Meeting of Exercise and Sport Science Australia*, (Melbourne, Australia, April 2016).
5. Williams, E.L., Jones, H.S., **Sparks, S.A.**, Midgley, A.W., Marchant, D., Bridge, C.A., and McNaughton, L.R. Influence of manipulated start strategies on performance and perceptual responses during cycling. *British Psychological Society, Division of Sport and Exercise Psychology Conference*, (Leeds, UK, December 2015).
6. Jones, H.S., Williams, E.L., **Sparks, S.A.**, Midgley, A.W., Marchant, D., Bridge, C.A., and McNaughton, L.R. Effects of previous performance beliefs on perceptual responses and performance in 16.1 km cycling time trials. *British Psychological Society, Division of Sport and Exercise Psychology Conference*, (Leeds, UK, December 2015).
7. Boya, M., Foulsham, T., Hettinga, F., Parry, D., Williams, E.L., Jones, H.S., **Sparks, S.A.**, Marchant, D., Ellison, P., Bridge, C., Midgley, A., McNaughton, L. and Micklewright D. Differences between experienced and novice cyclists in information seeking, selection and utilization during 10 mile time trial. *Science in Cycling Conference*, (Utrecht, The Netherlands, July 2015).
8. **Sparks, S.A.**, Bridge, C.A., Bell, M.T., and Lindsay, C. Nutritional practices in trained cyclists prior to and during an ultra-endurance cyclosportive. *20th Annual Congress of the European College of Sport Science* (Malmö, Sweden, June 2015).
9. McNaughton, L., Miller, P., Robinson, A., **Sparks, S.A.**, Bridge, C.A., Bentley D.J. Influence of an acute dose of sodium bicarbonate on buffering capacity and performance during RSA. *62nd Annual Meeting of the American College of Sports Medicine*, (San Diego, CA, USA, May 2015).
10. Jones, H.S., Williams, E.L., Marchant, D.C., **Sparks, S.A.**, Midgley, A.W., Bridge, C.A., McNaughton, L.R. Deception Has No Residual Effect On Perceptual Responses Or Time Trial Performance. *62nd Annual Meeting of the American College of Sports Medicine*, (San Diego, CA, USA, May 2015).
11. Williams, E.L., Jones, H.S., **Sparks, S.A.**, Marchant, D.C., Midgely, A.W., Bridge, C.A., McNaughton, L.R. Magnitudes of Deception Elicit Similar Performance Improvements but

Diverse Psychological Responses during Cycling Time Trials. *62nd Annual Meeting of the American College of Sports Medicine, (San Diego, CA, USA, May 2015).*

12. Sharma, A., **Sparks, S.A.**, McNaughton, L.R., Govus, A., and Bentley, D.J. Differences in power output between national and club level cyclists during a new variable power cycling test. *World Congress of Science in Cycling, (Leeds, UK, July 2014).*
13. Ellison, P.H., **Sparks, S.A.**, Murphy, P., and Marchant, D.C. The Impact of an Eye-Hand Coordination Intervention in Experienced Older Table Tennis Players. *Expertise, and Skill Acquisition Network Conference, (Sheffield, UK, April 2014).*
14. Lindsay, C., Welford, D., Cobb, R., Etxeberria, A., Ammann, K., **Sparks, S.A.**, and Costa, R. Nutritional Status and Body Mass Changes of a 66 Year Old Ultra-endurance Athlete During a 3000 mile Challenge Over 100 Consecutive Days: A Case Study. *International Sport and Exercise Nutrition Conference, (Newcastle, UK, December 2013).*
15. Ellison, P.H., **Sparks, S.A.**, Murphy, P.N., and Marchant, D.C. Training in the dark: the influence of illumination on eye-hand coordination training. *British Psychological Society, Division of Sport & Exercise Psychology Conference (Manchester, UK December 2013).*
16. **Sparks, S.A.**, and Close, G.L. Criterion validity of a portable urine refractometer and the effects of sample storage. *17th Annual Congress of the European College of Sport Science (Bruges, Belgium, July 2012).*
17. Orme, D., Relph, N., and **Sparks, S.A.** The relationship between maximal fat oxidation rates and blood lactate thresholds in runners. *17th Annual Congress of the European College of Sport Science (Bruges, Belgium, July 2012).*
18. McNaughton, L.R., Orme, D., and **Sparks, S.A.**, The effect of carrying a portable respiratory gas analysis system on energy expenditure during incremental running. *59th Annual Meeting of the American College of Sports Medicine (San Francisco, USA, May 2012).*
19. Ellison, P., Marchant, D., **Sparks, S.A.**, and Murphy, P. A familiarisation strategy for the Sport Vision Trainer is independent of experience. *Sports Vision Conference, (Las Vegas, USA. January 2012).*
20. **Sparks, S.A.**, Bailey, T., Chandler, P., and Orme, D. The effect of using a portable gas analysis system on energy expenditure during submaximal exercise. *16th Annual Congress of the European College of Sport Science (Liverpool, UK, July 2011).*
21. Ellison, P.H., and **Sparks, S.A.** Can Turnitin™ operate as a formative feedback mechanism to improve writing development for sport and exercise science students? *16th Annual Congress of the European College of Sport Science (Liverpool, UK, July 2011).*
22. Ellison, P.H., **Sparks, S.A.**, Murphy P.N., Carnegie, E., and Marchant, D.C. A familiarisation strategy for the Sport Vision Trainer is independent of experience. *The British Psychological Society Division of Sport and Exercise Psychology Conference (London, UK, December 2010).*
23. Balshaw, T.G., Bampouras, T., Barry, T.J., and **Sparks, S.A.** The acute effect of taurine ingestion on 3 km running performance and force in trained middle distance runners. *14th Annual Congress of the European College of Sport Science (Oslo, Norway, July 2009).*
24. **Sparks, S.A.**, and Orme, D. The effect of carrying a portable respiratory gas analysis system on energy expenditure during incremental running. *14th Annual Congress of the European College of Sport Science (Oslo, Norway, July 2009).*

25. **Sparks, S.A.**, N.E. Bridge., Cable, N.T., Doran, D.A., and MacLaren, D.P.M. The effect of pre-exercise dietary manipulation on ATP utilisation and metabolism during simulated duathlon time-trial performance. *12th Annual Congress of the European College of Sport Science (Jyväskylä, Finland, July 2007).*
26. Jutley, S., Taylor, S.R., Donovan, T., and **Sparks, S.A.** A comparison of the anthropometric characteristics of amateur club level rowers. *6th Conference on Sport, Leisure and Ergonomics, (Burton Manor, Cheshire, England, November 2007).*
27. Stiegler, P., **Sparks, S.A.**, Reid, A., Knights, B., Cunliffe, A. The effect of the macronutrient composition of a meal consumed post-exercise on fat oxidation. *Annual Presentations by Younger Researchers at the House of Commons, (London, March 2006).*
28. Stiegler P., **Sparks, S.A.**, Reid, A., Knights, B., Cunliffe, A. Comparison of the BOD POD, skinfold measures, and bioelectrical impedance analysis for estimating percentage body fat. *7th International Symposium: In Vivo Body Composition Studies (Southampton Meeting, August 2005).*
29. **Sparks, S.A.**, N.E. Bridge., Cable, N.T., Doran, D.A., and MacLaren, D.P.M. Serum prolactin responses to duathlon performance following pre-exercise dietary manipulation. *The Physiological Society General Meeting (Kings College London, December 2004).*
30. **Sparks, S.A.**, N.E. Bridge., Cable, N.T., Doran, D.A., and MacLaren, D.P.M. Metabolic responses to duathlon performance following pre-exercise meals. *The Physiological Society General Meeting (Cambridge University, December 2003).*
31. **Sparks, S.A.**, Cable, N.T., Doran, D.A., and MacLaren, D.P.M. The influence of environmental temperature on duathlon performance. *5th International Conference on Sport, Leisure and Ergonomics (2003).*
32. **Sparks, S.A.**, Doran, D.A. and Nevill, A.M. The influence of cycling time trial pacing on subsequent 10 km running performance. *4th International Conference on Sport, Leisure and Ergonomics (1999).*