

Institution: Edge Hill University
Unit of Assessment: Sport and Exercise Sciences, Leisure and Tourism
<p>a. Overview</p> <p>On its establishment in 2002 the Department of Sport & Physical Activity set the strategic 10-year goal of building research capacity to the point where it could credibly be seen to rival more established departments. We have evolved from a small team of seven (in 2002) to become the largest department in the institution (currently 44 FTEs). This is our first REF submission. Since the University achieved research degree awarding powers in 2008, the Department has made systematic and strategic investments of approximately £1 million rapidly to expand the range and reach of its research portfolio, changing a culture and bringing the added benefit of research insights to undergraduate and postgraduate provision in the physical and social sciences. We have also invested in research leadership to accelerate our capacity building. These investments have led to the construction of two research groups that structure the Department's research.</p> <p>The Sports Performance Group (SPG) is led by Professors McNaughton (joined 2011) and Midgley (2012), with assistance from Readers (Greig and Levy) alongside a core of established academic staff (Marchant, Marrin, Sparks), and four PhD students who started in 2011. The interdisciplinary research of the Group is oriented around two themes: (i) fatigue; and (ii) applied sports performance and nutrition, as these relate to biomechanics, physiology and psychology. This applied research is frequently undertaken collaboratively with sports clubs (including Wigan Athletic and Wigan Warriors), organisations and individual athletes (including players at Liverpool FC and Warrington Wolves). The strong applied emphases of the Department's sports science post-graduate programmes (e.g., Football Rehab) reinforce the Group's commitment to investigating and providing solutions to the complex practical problems faced by research users who include professional and amateur sports clubs.</p> <p>The Social Science of Sport Group (SSSG) is led by Professors Potrac (2013) and Smith (2012) assisted by Readers (Culbertson, Lindsey), Senior Lecturers (Hartill, Lang), one early career researcher (Haycock), and a PhD student. Research in this cluster is divided into sub-groups focusing on complex problems in: (i) sports regulation and ethics (Culbertson, Hartill, Lang); (ii) sport, leisure and the life course (Haycock, Smith); (iii) coaching, policy and development (Lindsey, Potrac).</p> <p>The construction of these two groups has enabled the Department to facilitate the inclusion and development of less experienced researchers (through mentorship and capacity building measures) alongside more established research-active staff within the diversity of research domains that characterise the field. In all cases, staff are supported and encouraged to develop research activity intended to make a significant theoretical and empirical contribution to the enhancement of scientific knowledge and resolution of practical problems in regional, national and international contexts. These substantial developments are expressions of the significant step-change in, and achievements of, a now vibrant, research-led and teaching-centred Department.</p> <p>b. Research strategy</p> <p>Between 2008-13, the main achievements of the Sports Performance Group have been to: (i) research practical problems identified by practitioners (sports coaches, physiotherapists, medical staff, and nutritionists) in the sport and exercise sciences concerned with maximising human performance; (ii) conduct impact-led and innovative research published in peer reviewed journals that provide novel findings for applied sports performance practitioners (iii) produce original work that challenges thinking in, and has significant implications for, other domains including health promotion and (iv) develop protocols with the potential to changing thinking in relation to methodological design and data analysis. For example:</p> <p>Greig has published widely on the influence of fatigue on markers of injury risk in football. A secondary research strand is evident in providing biomechanics specialism to the collaboration with Marchant in the efficacy of attentional focus instructions on issues relating to strength training and rehabilitation. Marchant examines the role of verbal instruction, feedback and encouragement during the learning and execution of motor skills. Levy and Marchant work on projects that cover attentional focus and coping among coaching population in sport. Levy also explores the role of coping, personality and performance in the context of doping in sport. Specifically, the research, which has recently been funded by the World Anti-Doping Agency, explores the predictive ability of personality traits upon various doping behaviours and to determine whether coping can act as a mechanism to account for this relationship. Marrin's research is directed at the physiological</p>

mechanisms underpinning circadian variation and thermoregulation during exercise. The nature of the applied exercise physiology specialism is such that there is a natural collaboration with the football work previously conducted by **Greig**, with further potential to influence practice in professional sport. The synergy between physiology and biomechanics has most recently been applied to the concept of movement economy and is currently being investigated in a simulated tournament situation as part of supervised postgraduate study. **McNaughton** is best known for his work on acid base balance and exercise which continues, and of late has been combining such work with molecular work in Heat Shock Proteins (HSP 70). Work examining fatigue and the concept of deception in exercise with **Marchant** and **Sparks** will bear fruit. On-going work in ergogenic aids such as sodium bicarbonate and Taurine (**Sparks**) will also have an applied perspective as will current work on the use of sodium bicarbonate at altitude to offset acidosis. **Sparks** has focused particularly on sport performance and measurement, and is currently working on investigating nutritional intervention studies that have examined the contributions of carbohydrate and fat oxidation to energy expenditure during ultra-endurance activity. **Midgley's** main area of research expertise is on the determination and enhancement of the maximal oxygen uptake ($VO_2\text{max}$). This research has particularly focused upon the evaluation of $VO_2\text{max}$ tests with respect to identifying whether an individual has elicited a true $VO_2\text{max}$.

These contributions exemplify the commitment of the SPG to engaging with new problems in the theoretical and methodological application of sports performance research and to orientate their work towards wider populations in ways that maximize its impact on human health and potential. In the future, the Group will: (i) build upon existing innovative findings to develop an increased scientific understanding of sport and exercise performance, human health and well-being; (ii) increase quantity/quality of work within skill acquisition, nutrition, injury prevention, and environmental physiology, applied to health, well-being and sports performance; (iii) develop an understanding of the applied implications of their work by working with practitioners in both intermittent team sports and endurance/ultra-endurance sports such as running and cycling; (iv) develop research projects underpinned by a commitment to working in interdisciplinary ways with colleagues in sports therapy and sports coaching and (v) support existing and future PhD students who will extend the work of existing and new members of the Group.

The Social Science of Sport Research Group is a newer feature of the Department's research portfolio, although research into childhood and youth has been a long-standing concern at Edge Hill. The Group includes amongst its main achievements between 2008-13: (i) a step-change in the number and breadth of theoretically-informed and empirically-based projects published in peer-reviewed journals as well as in outlets oriented towards research users in safeguarding and welfare, policy makers in physical education, sports coaching educators and national governing bodies, and youth and community workers in international contexts; (ii) externally-funded interventions in safeguarding and child protection in sport through its decade-long engagement with the Rugby Football League (RFL) and Child Protection in Sport Unit and, more recently, in other sports including swimming and football; and (iii) departmental editorship of an international journal (**Smith** and **Lindsey**) in the form of the *International Journal of Sport Policy and Politics*.

The Social Science of Sport Research Group divides into three sub-groups which focus on topics that are theoretically fertile and policy-relevant. The first sub-group, *Sport Ethics and Regulation*, includes the publication of work in peer-reviewed journals by **Culbertson** on the ethics of human enhancement in international sport. **Culbertson** is co-author of the Higher Education Academy subject resource guide to the philosophy of sport and the ethics of sport, was one of the founding members of the British Philosophy of Sport Association (BPSA) of which he was an executive committee member between 2003 and 2011, and is currently Reviews Editor of *Sport, Ethics and Philosophy*. **Hartill** is recognised internationally for his work on the sexual abuse of athletes and child protection in sport and has published widely in these areas. Accordingly, he has been an invited keynote speaker to practitioners and academics in the UK and throughout Europe, including as scientific advisor to an EU-funded project on the prevention of sexualised violence in sport led by ENGSO Youth. **Hartill** also advises and undertakes research with the Rugby Football League on the implementation of its child protection policy and practice. **Lang** is also known internationally for her work on child protection, safeguarding and athlete and coach welfare, particularly in swimming. During the review period her work has featured on several BBC national radio programmes and she has served as a policy advisor for the US-based athlete welfare advocacy group Safe4Athletes. **Lang** and **Hartill** are also members of the NSPCC's Child

Protection in Sport Unit's Research and Evidence Advisory Group, as are **Haycock** and **Smith**. The second sub-group, *Sport, Leisure and the Life Course*, includes the sociological work of **Haycock** and **Smith**. **Haycock's** research has focused on the sport careers of young adults and young disabled people (both inside and outside education) and their relationship with broader life transitions. He is currently Editorial Assistant for the *International Journal of Sport Policy and Politics* (IJSPP), which is rapidly becoming established as the reference point for international studies of sport policy, politics and development. **Smith** is Co-Editor of the IJSPP and his work locates young people's sport and leisure participation within their broader lifestyles and focuses, in particular, on the youth life-stage and impact of these on their health and well-being. The third sub-group, *Coaching, Policy and Development*, includes the work of **Lindsey** who undertakes research on the policy and practice of sport development with a particular focus on youth and community programmes in the Global North and South. He is also Co-Editor of the IJSPP. Since 2008, **Lindsey** has been granted over £160,000 by research funders and national sporting bodies to lead and undertake research and evaluation projects in these areas. He is the Principal Investigator on the three-year International Networks project Sustainable Development in African Sport funded by the Leverhulme Trust, which involves four other universities, three of which are based in Ghana and Tanzania. **Potrac's** sociological and pedagogical research focuses on the interplay between emotion, micropolitics, and practice in coaching and coach education and has published widely with colleagues from the UK, Europe, New Zealand and Australia. His work has been used by leading national and international sporting organizations to enhance their coaching practice. He is also an associate editor for the *Sports Coaching Review* journal and was the lead editor for the *Routledge Handbook of Sports Coaching*.

To support their research activity (e.g. interview transcription, purchase of equipment) and attendance at national (BASES, BERA, LSA, PSA) and international conferences (ACSM, ECSS, ICSEMIS, ISSA), individual researchers are able to access departmental and Faculty level staff development funding as well as a University-wide Research Investment Fund (RIF). In the period, the RIF has been used strategically by the Department to support the engagement of five members of staff in full- or partially- funded part time PhD study, £13,423 has been secured to pump-prime research projects, including the study of safeguarding and welfare in rugby league which has informed the publications of **Hartill** and **Lang**, and the appointment of a research assistant to work with **Marchant** on the effects of physical exercise on false remembering in sports performance. In addition, over £100,000 of RIF monies were used to purchase equipment to support the production of research in SPG. This resulted, for example, in publications related to performance in cycling ergometry by staff in physiology (**McNaughton, Midgley, Sparks**), psychology (**Marchant**), and the use of portable gas analysis systems (**Marrin, Sparks**).

The SSSG has identified the following as key priority development areas: (i) a further increase in the quantity and quality of outputs in peer reviewed journals; (ii) greater engagement with research users so as to focus on issues such as youth welfare and development, health and well-being, sport and leisure lifestyles, and the implications of these for policy and practice amongst research users, e.g., Everton in the Community (EitC), Sports Coach UK, and UK Sport alongside its longstanding association with the RFL; (iii) expand the research activity and international profile of its *Centre of Youth Sport and Leisure Research* (launched in 2013), housed in the Department, through the production of impact-led interdisciplinary research between members of its constituent sub-groups (especially in youth, coaching and welfare); (iv) build upon the appointment of its first social science PhD student in September 2013 by recruiting externally and self-funded postgraduate research students who will extend the work of existing members of the Group in its cognate research areas; and (v) increase its quantum of research income by working with its key research users to identify and solve practical problems of value to individuals and communities within and outside of sport.

In general terms, post-2014 the Department will capitalise on the dynamic and vibrant research culture it has developed by continuing to: (i) embed the seven principles of the *Concordat to Support the Career Development of Researchers* in all aspects of its work and remain compliant with the *Concordant to Support Research Integrity*; (ii) encourage the publication of high quality, impact-oriented, and applied interdisciplinary research of international reach and significance to achieve its aim of building further the department's research capacity in the next REF cycle; (iii) continue to pursue opportunities for external funding to facilitate research; (iv) expand its Visiting Professor Scheme (currently Rod Harter [University of Texas] and James Skinner [Griffith

University)) to develop research output and training for ECRs and more established researchers; (v) support the development of research in sports coaching, sports therapy and physical education; and (vi) continue the growth in post-graduate research students from the current group of 11 (including five GTAs) in its priority research areas.

Responsibility for the monitoring and achievement of these targets is led on behalf of the Department by the Department Research Management Group (DRMG) comprised of Professors **McNaughton, Midgley, Potrac** and **Smith**, and Readers **Greig, Lindsey**, who advise the Head of Department (HoD) on all research-related matters. The DRMG is also charged with implementing the Department's Research Policy and Strategy, coordinating and monitoring the publication of all research outputs, and identifying suitable research income streams to facilitate the recruitment of a sustainable supply of ECRs into the Department's research groupings. Professors **McNaughton, Potrac** and **Smith** and HoD also serve as line managers for departmental staff and will monitor closely – through the annual Performance Review cycle – the research and professional development activities of staff to ensure its strategic aims are delivered as intended, add value to its existing outputs, and are oriented appropriately towards the production of research designed at the outset with considerations of impact for 2020 in mind.

c. People, including:

i. Staffing strategy and staff development

Since 2008 the Department has made the recruitment of new staff who are research-active one of its key strategic priorities. This has included the appointment of more experienced researchers (**McNaughton, Potrac, Smith, Midgley**), established researchers (**Greig, Lindsey, Levy**), emerging researchers (**Lang, Marchant, Sparks**) and ECRs (**Haycock**) with the potential to develop the Department's two research groups, and assist in the development of research activity amongst other staff. This is explicitly intended to assist the Department in achieving its aim of an increased research profile by 2020 and to facilitate the development and mentorship of staff.

The development and training of staff, including those relatively new to research activity, is a strategic priority of the University and Department. The University currently funds the fees of six colleagues from the department who are working on PhDs at other universities, on the grounds that such experience will broaden their intellectual horizons. None of these are ready for inclusion in this exercise. In the past the dominant practice was for staff to do PhDs in-house. **Hartill** is an example of a successful in-house PhD. In keeping with its commitment to the *Concordat to Support the Career Development of Researchers*, and to ensure equality of opportunity to engage in research is being effectively promoted and delivered, the University also has a comprehensive programme of training through its centrally-provided *Research Capacity Building* programme (RCB) which, in turn, is explicitly mapped on to the *Researcher Development Framework* (RDF). All staff, regardless of contract (including post-graduate students), have access to the RCB and particular attention is paid to enabling staff from practice backgrounds to develop research skills to become independent researchers. This has been particularly significant for enabling ECRs in sports coaching to develop research skills, and devise a future programme of research, to facilitate their inclusion in the next research assessment exercise. The Department is also committed to extending the RCB into the practical disciplines of sports therapy and physical education to facilitate staff development and ensure that research-active staff are represented across the Department's entire portfolio by 2020. The University has applied for an Athena Swan Bronze award and the department is aware of the need to support and develop the research careers of female colleagues, to identify and remove, as far as possible, obstacles to their full involvement in the research life of the department. We particularly encourage women to access courses such as Vitae's Leadership in Action and, as part of our preparations for Athena Swan, we shall be working with colleagues to identify areas for action. We confidently expect to field a higher proportion of female colleagues in the next REF.

The Department also provides research training for staff as part of the annual in-house *Staff Research and Continuing Professional Development* programme led by its senior staff and the DRMG who also act as mentors to early-career and novice researchers. Intended to enhance the research training of staff equitably and consistently, the programme consists of bi-weekly sessions dedicated to the design, implementation and evaluation of disciplinary and interdisciplinary research projects, writing for publication, strategies to enhance the impact of research outputs, identifying and securing research funding, and embedding research into teaching and professional development activity. This is complemented by the Department's monthly *Research Seminar*

Series in which nationally and internationally recognised colleagues, including Visiting Professors, present their work, engage staff in discussions within their respective specialism, and stimulate discussion about the use of innovative methodologies and research designs in their future work. Dedicated interdisciplinary sessions on research ethics and protocols (including research on and with minors and other vulnerable groups) complement and inform decisions made by the Department's Research Ethics Committee, members of whom are also represented on the Faculty Research Ethics Committee (**Midgley**) and University Research Ethics Committee (**Culbertson, McNaughton**). In the social sciences, the expertise of staff researching young people, safeguarding and welfare-related issues, and vulnerable groups (**Hartill, Lang, Smith**) is routinely used to disseminate best practice across the Department to ensure all its research in these areas is undertaken ethically and with the highest possible quality and integrity. SPG Staff (**Marrin, Midgley, Sparks**) advise on research design, statistical techniques, and exercise-related interventions, to other members of staff, especially in areas where research is developing (e.g. sports therapy). Collectively, these mechanisms help ensure standards of research quality and integrity are maintained and promoted amongst staff. At the University level, considerations of 'impact', international significance of research, and contribution to the body of knowledge and/or broader community are central criteria for the award of promotion to professor (**Midgley**) or reader (**Culbertson, Greig, Lindsey**), as well as promotion through salary grades, particularly to senior lecturer level (**Hartill, Marchant, Marrin**).

ii. Research students

Until recently, the Department had two post-graduate taught programmes undertaken part-time by students and there were three part-time PhD students (with one completion in the census period). In 2012, the first seven full-time MRes students were recruited to the Department's new post-graduate programmes which were introduced strategically to expand its research provision and portfolio in the two research groups. This is achieved, amongst other things, by the expectation that students will, with appropriate support and guidance from their supervisory team (comprising at least research-active staff), produce a REF returnable output in an area of enquiry related to their future career aspirations. In 2013, the Department's full-time post-graduate programme expanded still further and was facilitated by the University's decision to offer 16 part-funded (50% fee waiver worth approximately £32,000) competitive bursaries to enhance post-graduate provision and pump-prime the production of high quality and applied research output. In the social sciences, six of these projects were advertised jointly and provided with Everton in the Community (EitC) under the leadership of Professor **Smith** to expand research output and capacity in each of the sub-groups of the Social Science of Sport Research Group, and to develop its activity with research users in the local community and surrounding regions (e.g. Merseyside and Lancashire). Three bursaries were also used strategically to add further capacity to a European Union funded project (DAPHNE III) led by **Hartill** (as the UK representative) and facilitated by **Lang** in conjunction with the RFL to extend their international work on the prevention of sexual harassment and abuse across all in sport. As well as expanding the international reach and significance of research in the area and introducing emerging researchers to the importance of generating impact in their work, these projects were designed with 'impact' in mind by affecting positive behavioural and attitudinal change amongst the appointees. This was achieved by incorporating them into an international youth-led campaign focused on the training of young people to become active agents of social change.

The growth of post-graduate provision complemented the appointment in 2012 of four full-time GTA students to the Sports Performance Research Group (in applied nutrition, psycho-physiology and biomechanics to extend the work of **Sparks, Marchant, Marrin, McNaughton** and **Greig**, respectively), and these students work alongside part time PhD students working in the Department. In 2013 a full-time PhD student was added to the Sport, Leisure and Life course sub-group in the social sciences to extend the published work of **Smith** and **Haycock** and to incorporate the psychological expertise of **Marchant**. Thus far, the recruitment of GTA students via a competitive application process has been supported by internal funds provided by the Faculty which has committed to the appointment of 12 such students each year between 2012 and 2016. The aim is to expand the PGR body to generate a critical mass and provide the basis for future recruitment. Over the next seven years the Department plans to add to its nascent group of PGRs by pursuing other opportunities to secure prestigious and competitive studentships via the

procurement of research income, developing on-going collaborative projects with research users (e.g. EitC, RFL), and engaging in interdisciplinary research.

The Graduate School, established in 2010 (two years after the University gained research-degree awarding powers), provides generic training and support for all PGRs and the Department is charged with offering specialist training and support within the student's respective specialism. Upon appointment, all students receive a central University and Departmental induction so that they understand fully the regulations and services available to them at University and Department level during their period of study. All PGRs are encouraged to attend the *Staff Research and Continuing Professional Development* programme and to present their work at the Department's Research Seminar Series, as are Masters students. This ensures all students are exposed in their training to interdisciplinary perspectives on innovative future research questions that have the potential to change thinking, and encourage shifts in research paradigms, within the themes that characterize the Department's research activity. It is this commitment to developing a vibrant, inclusive and forward-thinking research culture incorporating ECRs alongside more established academics pursuing innovative research ideas, supported by continued investment in people and facilities, which provides the foundations upon which future departmental research will be based.

PGRs are supported by at least two supervisors (approved by Graduate School), one of whom acts as Director of Studies and has supervised at least one student to successful completion. Students meet regularly with their supervisory team and at least one monthly meeting is recorded formally with mutually agreed targets and outputs identified to ensure satisfactory progress. PGR student progress is reviewed formally on an annual basis and transfer from MPhil to PhD takes place within 18 months for full-time students and three years for part-time students following the successful completion of a second *viva-voce* examination (with the Graduate School), written report, and submission of a draft chapter. Every student is able to meet by appointment a designated representative from the Department (usually the HoD) as well as a member of the Graduate School should this be needed to resolve any issues they may have. Doctoral students can apply to for Graduate School bursaries to support research costs, including attendance at national and international conferences. Additional funds are available from by the Department and Faculty. Students also undertake a limited amount of teaching supported by modular training provided centrally to contribute to the successful completion of the Postgraduate Certificate in Higher Education as a basis for future applications for academic positions. Students' teaching activity is routinely observed as part of the Department's peer observation process.

d. Income, infrastructure and facilities

Since 2008 the Department has generated £104,756 in competitively sourced research income from organizations including the Leverhulme Trust (**Lindsey**), the European Union (**Hartill** and **Lang**), UK Sport, International Development through Sport, Child Protection Sport Unit, the International Cricket Council, and BASES. The University investment (£735,777) in capital funding to enhance research and teaching has been used for: resourcing research laboratories and equipment to facilitate research in the sports performance area, e.g., an environmental chamber to permit future studies of altitude and exercise (**McNaughton**) and thermoregulation and exercise (**Marrin**). **Marchant** and **Greig** have consolidated their work in the area of attentional focus in which they utilize biomechanical tools such as electromyography and isokinetic profiling to understand the mechanisms of psychological interventions. **Greig** has used this equipment in his work on fatigue, injury prevention and recovery; this research has recently been expanded to utilise both physiological measures and GPS athletic technology in projects with **Marrin** and two PGRs. **Marchant** has also recently extended this work in the development of original skill acquisition research utilizing tools such as the eye-tracker and sports vision-trainer, both individually and in collaboration with **Sparks** in the supervision of a part-time PhD student. **Marchant**, **McNaughton** and **Sparks** have also undertaken novel studies of pacing strategies in cycling supported by two PGRs. Institutional level support for sports research comes through the Research & Enterprise Support Office (RESO) as well as the Graduate School. Central funding 'pump-primes' new projects Conference attendance is also supported alongside research meetings for interdisciplinary and external collaborations.

In terms of facilities, the Department has a specialized IT suite for use by all research students, and three specialist research laboratories dedicated to physiology, biomechanics, and psychology. In the last five years the University has invested considerably in its sports facilities and has dedicated over £40 million, which is central to the future development of research and teaching in

the Department. The Department is located within rich sport networks which means that 'impact', and community well-being, are integral to most of its sport research rather than an exceptional add-on. Facilities are used jointly with other departments, including near infrared spectroscopy systems which are to be used as part of interdisciplinary work with the Department of Psychology, and specialized laboratories in the Department of Biology and Post-Graduate Medical Institute. The University will also be constructing a new £25 million Sports Centre which will open in September 2014.

With research leadership and this infrastructure now in place we are in a good position to implement a strategy of assembling research teams to bid for external grants and external consultancy in order to establish a sustainable research culture in sport at Edge Hill. All research bidding by staff is subject to peer review, including ethical clearance. Within the University we operate a three-tier ethical review system with Research Ethics Committees at Departmental, Faculty and University levels. At present all research protocols are reviewed at both Departmental and Faculty levels. Staff are required to seek ethical clearance for research programmes rather than individual small scale studies. Well-established low-risk data collection protocols are fast-tracked.

e. Collaboration or contribution to the discipline or research base

The Sports Performance Research Group has collaborated with elite sports clubs and organizations, including the English FA (Greig), Scottish Women's National Water Polo and Welsh Hockey Union (Marrin). The Group collaborate nationally with colleagues at the Universities of: Bedfordshire (McNaughton, Midgley), Hull (McNaughton, Midgley, Levy) Liverpool John Moores University (Marrin, Sparks) and Teeside (Marrin), and internationally with Harvard (Marrin) Adelaide (McNaughton, Midgley), Curtin (Levy), Victoria University (Levy), Western Sydney (Greig, McNaughton, Midgley), Bond (McNaughton), Heidelberg (Greig), Southern Illinois (Marchant), State Rio de Janeiro (Midgley), and Griffith (McNaughton). Academic leadership has been provided by members of the Group in the form of refereeing for over 15 international peer-reviewed journals. **McNaughton** is the Associate Editor for three journals including the *Journal of Science and Medicine in Sports*. Other boards memberships include; **Midgley**, *Journal of Sports Medicine*, and *ISRN Physiology*; **Levy**, *Journal of Sports Medicine and Physical Fitness*, and **Sparks**, *Journal of Science and Cycling*. **McNaughton** is a Fellow of ACSM, BASES, ECSS and ESSA and, with **Marrin**, is a Chartered Scientist. **Marchant** is also a Chartered Psychologist.

The Social Science of Sport Group collaborates with over 25 sports-related clubs and organizations clustered around its key research themes. This has resulted in the publication of applied work on safeguarding and child protection in sport (with the RFL, Child Protection Support Unit [CPSU]/NSPCC, Amateur Swimming Association, Netherlands Olympic Committee) and sexual abuse in sport (with CPSU/NSPCC, ENGSO Youth, Sport Austria) by **Hartill** and **Lang**, both of whom worked with colleagues in over 20 countries in their text, *Safeguarding, Child Protection and Abuse in Sport*. Their work with the RFL resulted in invitations to speak at high profile conferences including one hosted in Berlin in 2012 from which **Hartill** (in conjunction with German Sport Youth) was invited to make a number of recommendations to the European Union on the prevention of sexualized violence in sport. **Hartill** also made recommendations to the UK Children's Commissioner's National Enquiry on Sexual Violence and Gangs. **Lang** was invited in 2011/12 to sit on the advisory committee of Safe4Athletes (USA). The longstanding association between **Hartill**, **Lang** and the RFL resulted in the production of indirect impact via the joint delivery of annual CPD courses in safeguarding and child protection to sports studies and development students to enhance their career prospects. Organized by **Smith**, in 2013 80 delegates participated in the European Sports Development Network featuring internationally renowned speakers (Professors Houlihan, Roberts, Dugdill) alongside research users (EitC, RFL, UK Sport). Members of the Group collaborate nationally with colleagues at the Universities of: Brunel (Hartill, Lang, Lindsey), Cardiff Metropolitan (Potrac), Chester (Haycock, Smith), Hull (Potrac), Liverpool (Haycock, Smith), Loughborough (Haycock, Lindsey, Smith), Swansea (Culbertson), and internationally with: Antwerp (Hartill, Lang), California State (Potrac), Monash (Lindsey), Norwegian School of Sports Sciences (Potrac, Smith), Alberta, Otago and University of Queensland (Potrac). All members of the Group make contributions to their academic disciplines, including acting as journal editors, serving on editorial boards, and reviewing as well as being active members of associations, including: LSA, EASM, ISSA, PSA, and BSA.