

Institution: Swansea University

Unit of Assessment: 26 - Sports and Exercise Sciences, Leisure and Tourism

Title of case study: The ethics of enhancement in elite sport: improving anti-doping education

and policy development

1. Summary of the impact

The use of performance enhancing methods and substances, or 'doping', has been the major ethical issue relating to elite sports for several decades. Prof McNamee has led internationally recognised research that has contributed significantly to national and international approaches to catch or deter athletes from doping. This has taken the form of research underpinning the development of UK wide approaches to anti-doping education for sportsmen and women, educational materials for sports physicians around the world, and significant influences on policy critique and development at the global level for both the International Cycling Union and the World Anti Doping Agency (WADA).

2. Underpinning research

The underpinning research arises from a variety of competitively won national and international grants funded during the REF period. It is also the product of international and multi-disciplinary research collaboration. McNamee has led a research program that has developed from purely philosophical ethical considerations to incorporate international collaborations with humanistic scholars, natural and social scientists, and research clinicians in sports medicine.

The underpinning research has been presented as keynote and invited lectures at leading practitioner and professional constituencies, within the UK: (i) the Royal College Physicians (Edinburgh), and (ii) the Royal Society of Medicine; and internationally (i) International Paralympic Committee, (ii) European Federations of Sports Medicine Associations, (iii) International Federation of Sports Medicine, (iv) Qatar and (v) Chinese National Anti Doping Agencies, and the (vi) The Pontifical Council for the Laity, the Vatican. It is the combination of oral and published influence by keynote and invited addresses that have generated international interest in reforming policy and practice regarding the ethics of human enhancement in sports.

Research Outputs R1 and R2 presented a detailed overview of attitudes and values of young elite UK athletes in 40 sports with respect to doping and anti doping. R1 and R2, based on questionnaire responses from 403 participants from across the UK sports spectrum on the Talented and Elite funded programs of UK Sport, (the quango who oversee the management of key elite sports) demonstrated widespread (48%) supplement use, and that those convinced of the necessity of supplementation for sporting success were also more likely to express permissive attitudes towards doping products. It also reported the various sources of information that athletes used regarding performance enhancement to underpin educational attempts to steer athletes away from potential gateways to doping decisions. It also showed how few athletes would consider consulting the team doctor for advice. R2 comprised a qualitative study based on focus groups totalling 40 such athletes, including Olympic medallists and finalists, from 13 sports. A highly important finding was the influence of shame that would be felt from a doping offence as a significant deterrent to doping decisions, which highlighted the educational importance of the influence of significant others in shaping the formation of negative attitudes towards doping.

Building upon these data, R3 focused on ethical issues regarding how confidential athlete information was mediated by team doctors and other healthcare professionals (known as Athlete Support Personnel [ASP]). International inter-sport inconsistencies in the governance of and sanctioning by National Anti Doping Organizations (NADOs) and International Sports Federations in relation to ASP are highlighted in R4 (which is the product of collaboration with Anti Doping personnel in Austria and Serbia).

R5 is an unpublished, though publicly available, research study report, funded by the European Commission Framework 7 Programme (with nine European university partners), pertaining to the non/utilisation of ethical expertise in policy making concerning human enhancement practices in European societies (not limited to sports). The report was disseminated widely among Directors of



WADA and heads of NADOs and presented to various international anti doping meetings arranged by WADA whose aim regarding these invited presentations was to influence agendas in Asia and the Middle East. The study, conducted between 2010-12, comprised 41 in depth qualitative interviews with key global stakeholders in Anti Doping, including nearly all Directorate personnel at WADA, and 12 heads of European NADOs, and 5 heads of Medicine/Science within them. This investigation demonstrated a) the need for ethical expertise to be used to better interpret and apply the criteria by which doping methods and substances are determined, b) the lack of ethical expertise on the Prohibited List Committee, and c) the need to better understand the principle of the Spirit of Sport in Anti Doping policy.

Most notably, R6 arose from the European Commission funded project and is a complex ethical argument against a proposed change (set out in the 2nd draft revised code for WADA in 2013) in the policy and practice for the determination of doping substances and methods. It discusses the role of cannabinoids on the Prohibited List, and argues against the medicalization of Anti Doping, which would have arisen if the policy changes advocated in the second stage of revisions to the WADA Code had been accepted. It is specifically mentioned in the letters from Prof Ljungqvist (Vice President) and Dr Rabin (Medical Director), at WADA, for its global impact.

3. References to the research

- [R1] Bloodworth, A. J., Petróczi,* A., Bailey**, R., Pearce, G.**, & **McNamee**, M. J. (2012). Doping and supplementation: the attitudes of talented young athletes. *Scandinavian journal of medicine & science in sports*, 22(2), 293-301. DOI: 10.1016/j.drugpo.2009.11.009 (collaboration with Universities of Kingston* and Roehampton**, Bloodworth, Swansea University, ECR).
- [R2] Bloodworth, AJ. **McNamee**, MJ Clean Olympians? Doping, anti-doping and the values of talented young British athletes *International Journal of Drug Policy*, 2010, 21(4): 276-82.
- [R3] Griffith, R., McNamee, M., & Phillips, N. (2011). On the duty of the doctor not to disclose athlete doping data without consent. *International Journal of Sport Policy and Politics*, 3(2), 191-203. DOI: 10.1080/19406940.2011.579144 (Griffiths, Swansea; Phillips, Cardiff University)
- [R4] Dikic, N., M. J., Gunther, H*., Samardzic Markovic, S**., and Vadjic, B**. (2013) Sports physicians, ethics and antidoping governance: between assistance and negligence. *British Journal of Sports Medicine*, published online first DOI:10.1136/bjsports-2012-091838 (Collaboration with *Austrian NADO; ** Serbian NADO)
- [R5] **McNamee**, MJ (2012) Epoch Final Report: Work Package 7 (Physical Enhancement) Unpublished Report, distributed to European Commission, European NADO Heads, WADA.
- [R6] **McNamee**, M. J. (2012). The Spirit of Sport and the Medicalisation of Anti-Doping: Empirical and Normative Ethics. *Asian Bioethics Review*, 4(4), 374-392. DOI: 10.1353/asb.2012.0032

Competitive Research Grants from which the above were developed (G)

- [G1] McNamee, MJ (PI) Attitudes and values towards doping and anti doping policies and practices UK Sport (Drug Free Sport) 2008-10 (£43,758k)
- [G2] McNamee, MJ (PI) Anticipating doping behaviour UK Anti Doping 2011 (£18k)
- [G3] McNamee, MJ (Co-I) "EPOCH: Ethical expertise and public policy: the case of human enhancement European Commission Framework 7 (Science and Society) (£86.429k)

4. Details of the impact

The beneficiaries of the research are both national and international. The benefits are two-fold: (i) contributions to the development of educational materials and programs in anti-doping for UKAD and WADA; and (ii) wide-reaching policy influence on national and leading global actors of anti-doping, arising from frequent high profile invitations to address key stakeholders in anti-doping at WADA, the European Commission, UK Sport and UK Anti-Doping, and the Federation International de Medicin du Sport (FIMS) and the International Cycling Union (UCI).

National Impact

G1 and G2 enabled UK Sport to help build bridges between the anti doping and sports medical authorities and led to an invitation only seminar with leading sports physicians and anti doping



personnel in 2009 organised by Prof McNamee, which raised the issue of professional conflicts of confidentiality arising from obligations to the General Medical Council and Health Professions Council and the World Anti Doping Agency (WADA) Code (R3).

R1 and R2 provided a basis for the development of stronger stakeholder relations between UKAD and national sports federations leading to the development of a policy tool to assist anti doping prevention. UKAD Chief Executive Andy Parkinson writes "This research assisted UKAD in understanding the tolerance to doping activity and how this changed as athletes sporting careers progressed, providing a useful insight into the psychology and mind sets of the next generation of athletes." He also noted how the research was "essential in developing our understanding, cumulating in the development of a 'Doping Signature' model." This model can be used to help identify particularly vulnerable athletes prior to their making decisions to dope. Parkinson writes that the model arose from the research and was utilized as a tool they use with sports stakeholders (e.g. national sports federations) to "communicate these risks to the sporting landscape. At the recent industry conference, the Clean Sport Forum (November 2012), this model was presented and unanimously accepted by the audience of over 80 representatives from a wide range of UK sporting organisations and Universities".

International Impact

In recognition of McNamee's corpus of published research he was invited to prepare peer-reviewed educational materials, and give presentations to international congresses for anti-doping personnel in Seoul (November, 2010). Among delegates were 60 heads/representatives of anti-doping from 30 NADOs. His invitation to talk to key Asian stakeholders at the Chinese National Anti-Doping Organization (CHINADA)/WADA Gene and Cell Doping Symposium focused on social aspects of Anti-Doping policy, with particular reference to the Spirit of Sport (R5 and R6). The Vice President, WADA / President of the IOC Medical Commission, writes that he requested R6, having heard it presented in Doha, at an international Anti-Doping conference and that he used it to "help prepare for the Executive Board meeting of WADA, which agreed the final revisions of the WADA Code to be ratified at the November 2013 meeting in South Africa".

He also writes: "Professor McNamee's article clearly laid out the logic for maintaining WADAs 2 from 3 stance (performance enhancement or harm to health or against the spirit of sport) on anti-doping substances and methods. His arguments were a significant foil against the move to downgrade the spirit of sport criterion, and therefore to underwriting the logic of anti-doping policy." The re-instatement of three equal criteria for Anti Doping Rule Violations is evidenced in the 3rd and final WADA Code Review Version at (http://www.wada-ama.org/Documents/World_Anti-Doping_Program/WADP-The-

Code/Code Review/Code%20Review%202015/WADC-2015-draft-version-3.0.pdf) Equally the Science Director at WADA writes of the invited presentations noted above that: "in the context of gene therapy and gene doping and the relevance of Prof McNamee's comments and perspectives were highly appreciated by the audiences, in particular from the anti-doping experts attending these two meetings. In addition, in the current context of the revision of the World Anti-Doping Code, Prof McNamee's reflections on the importance of the spirit of sport criterion in the overall considerations regarding identification of substances or methods prohibited in sport was of significance. He contributed to strengthen the debate and ultimately to maintain the current balanced position between the three existing criteria (performance enhancement, protection of health and spirit of sport). Generally speaking, in the symposia referred to above, as well as in his recent publications on this specific subject, Prof McNamee significantly contributed to placing ethical considerations as one of the key elements in the reflections supporting anti-doping policy making a practical impact in the applications of anti-doping rules under the auspices of the World Anti-Doping Code."

Moreover, based on R5 and R6, McNamee was solicited to write an accessible article for the WADA magazine, Play True, on the subject of the "Spirit of Sport" that was distributed to all National Anti Doping organizations worldwide. The Medical Director of WADA, writes about this article: "Professor McNamee's discussions on ethics and the spirit of sport have been particularly timely as this Code is being reviewed and we wrestle with such crucial dilemmas such as inclusion criteria for List of Prohibited Substances and Methods." He continues: "Professor Mike McNamee has been involved in numerous projects with WADA. His writings, whether from published articles



or work specifically commissioned by WADA education purposes (the WADA Physician Toolkit) have been of great value in our efforts to educate athletes and physicians." (see http://library.wada-ama.org/results.php#/item/000000011019098/view)

Given his work for the G3, McNamee was invited to present findings (January, 2011) to the 6th Annual EU Anti Doping Working Group comprising all heads of NADOs in Europe. He subsequently became a member of the newly formed European Commission Expert Group on Recreational Doping, which submitted recommendations for an EC declaration. The Head of the EC Education and Sport Unit writes: "the impact of the research directed by Professor McNamee on EU-level policy development has been consistent and considerable" and that "the Sport Unit has been in close contact with Professor McNamee and found him to be a valuable source of information and inspiration."

Finally, in the wake of the Lance Armstrong scandal, UCI commissioned McNamee to address all Directors of the Professional Tours (December, 2012) in their annual meeting. This meeting is normally restricted to heads of professional teams and their representatives that comprise the elite level of world cycling. In this arena McNamee raised key ethical issues that UCI and Professional teams needed to address regarding the cultures of anti doping in professional cycling. He was invited to the subsequent (March, 2103) stakeholder meeting – Anti Doping Working Group - including representatives from professional cyclists, professional teams, TV sport media, International Tour Event Organisers. This group was formed as to discuss the future of anti doping policy and practice for the future health of the sport.

5. Sources to corroborate the impact

- 1. Head of Unit, Directorate of Youth and Sport, Directorate General for Education and Culture, European Commission, MADO, 20/10, B-1049 Brussels, Belgium
- 2. **Medical Director, WADA**, Stock Exchange Tower, 800 Place Victoria (Suite 1700) Montreal (Québec) H4Z 1B7 Canada.
- 3. **President IOC Medical Commission/Vice President, WADA**, Stock Exchange Tower, 800 Place Victoria (Suite 1700) Montreal (Québec) H4Z 1B7 Canada.
- 4. **Science Director, WADA**, Stock Exchange Tower, 800 Place Victoria (Suite 1700) Montreal (Québec) H4Z 1B7 Canada.
- 5. **Chief Executive Officer, UK Anti Doping**, Fleetbank House, 2-6 Salisbury Square, London, EC4Y 8AE.