

*International Network for Doping
Research*

2017 conference

Doping in Sport, Doping in Society –
Lessons, Themes, and Connections



24—25 August, 2017

Aarhus University, Denmark

Book of Abstracts



Indhold

Jesper Andreasson.....	2
Geoff Bates	4
Andy Brown.....	5
Thijs Devriendt, Davit Chokoshvili, Maddalena Favaretto and Pascal Borry.....	6
Anna Efverström and Åsa Bäckström.....	7
Bertrand Fincoeur, Fabien Ohl and Rachel Cunningham.....	8
Ingrid Havnes, Ingveig Innerdal, Marie Jørstad and Astrid Bjørnebekk.....	9
John Gleaves and Deborah Rose.....	11
April Henning	12
Malene Radmer Johannisson	13
Lars B Jørgensen.....	14
Bengt Kayser,.....	14
Dimitrios Liokaftos	16
Sigmund Loland.....	16
Charlotte McLean	17
Jim McVeigh.....	18
Werner Pitsch.....	20
Marcel Reinold.....	21
Ian Ritchie.....	22
Morten Renslo Sandvik.....	23
Anders Schmidt Vinther	25
Hans-Jørgen Wallin Weihe and Bjørnar Bergengen.....	26
Jules Woolf, Khalid Ballouli and Bob Heere.....	27
Nils Zurawski and Marcel Scharf	28

Jesper Andreasson

Linnaeus University, Department of Sport Science, Sweden

Doing manhood in an online community: Doping and the mainstreaming of online marginal masculinities

Internationally, official regimes and public health organizations conduct fairly comprehensive anti-doping measures. As a consequence, numerous alternative ways to access these types of drugs have emerged. This is not the least the case in Sweden where legislation does not simply forbid the possession and distribution of doping substances – like for example many other European countries – but also the presence

of these substances in the body. This development combined with technological development in recent decades has resulted in the emergence of new ways of accessing and discussing doping.

In this study I will focus on the emerging complexity in the understanding of doping use and gender/masculinity in an online context. Using a netnographic approach I will focus on users narratives found on a Swedish online community called Flashback. The aim is to explore how participants in this community negotiate the meanings of doping use and how such negotiations can be understood in terms of gender, masculinity and marginalization processes. Furthermore, I am interested in exploring how doping use and online fitness communities sometimes challenge dominant regimes of masculinity and gender equality, and also how the positionality of the marginal and central must be understood as dynamic, contradictory, mutable and contextual.

The results indicate that many of the behaviours and bodily appearances constructed within the online community (and subculture) studied could be regarded as signs of marginalization – of a marginal masculinity in society at large. However, there is at the same time an interesting relationship between hegemonic and marginalized hyper-masculinities being put forward in different postings. In the world of the bodybuilder, the marginal masculinity in certain senses becomes dominant. In one sense it seems that achieving a muscular and well-trained body is regarded as a core aspect of masculinity within the online community. In another sense, however, the practice – the trajectory – leading to such a hyper-masculine body is also discussed and challenged by other highly valued masculine ideals such as that of the employable man and father. What makes this even more complex today is a trend towards the normalization of the hard-core muscle culture cultivated in the fitness and bodybuilding context, leading to changes in attitudes towards drugs, hyper-bodies and protest masculinity in society at large. To a certain extent, we are now seeing hyper-masculinity becoming normalized and brought into mainstream culture and society.

Geoff Bates

Public Health Institute - Liverpool John Moores University, UK

Behaviour change interventions to reduce use of performance enhancing drugs: what is the state of the evidence, and what lessons can be learnt from other disciplines?

Background

Use of performance enhancing drugs (PED) has increased greatly amongst the general population over the past 30 years. As awareness of use outside elite sport has grown there has been a great increase in research into PEDs in this context in areas such as prevalence, harms and adverse effects, aetiology, addiction and mental health. As far back as the early 1990s researchers were pointing towards the need to identify approaches to prevent PED use in the general population, but despite the advances in knowledge in these other domains very little research has been undertaken to identify effective prevention interventions.

Methods

A systematic review was undertaken to identify evaluations of interventions that have been implemented to prevent or reduce use of PEDs in the general population. In the past decade there have been substantial efforts to improve the science of behaviour change intervention development and the reporting of these interventions, and in this context the review examined the state of the evidence on PED prevention. The review focused on understanding the characteristics and behaviour change strategies applied within these interventions, and whether there are any associations between these and intervention effectiveness.

Results and implications

Over 20 years after the first interventions of their kind, findings from this review suggest that there are still large gaps in our knowledge regarding prevention of the uptake and continuation of PED use in the general population. The evidence base is limited not only by the lack of evaluated interventions, but the frequently insufficient reporting of intervention content and delivery that restricts our interpretation of outcomes and understanding of mediating variables. Approaches that may be effective, such as combining education with skills training and establishing normative

beliefs, are discussed alongside recommendations for future research. Given the limitations of the current evidence base it is important to consider whether there is transferable evidence from other disciplines that can be used to inform PED prevention programmes and policy. Key messages from research including prevention of negative body image and eating disorders and the potential for, and advantages of, interventions with multiple health benefits are considered in the context of PEDs. Finally, the transferability of messages from programmes targeting the general population to within recreational and elite sport settings are discussed.

Andy Brown

The Sports Integrity Initiative, UK

Meldonium Madness and lessons for future additions to WADA's Prohibited List

One of the problems with an ever-lengthening list is that it becomes more difficult to manage. The World Anti-Doping Agency (WADA) is finding this out regarding its Prohibited List. It is impossible to ascertain how many substances are on it, due to vague assertions such as ‘all selective and non-selective beta-2 agonists, including all optical isomers, are prohibited’. Scientists will tell you that there are many of these. Optical isomers refer to mirror images of the same compound, which instantly doubles this number. Yet the Prohibited List is for athletes, not scientists, and none of these are listed for athletes to search and find. This mismanagement came into sharp relief with the addition of meldonium to the 2016 Prohibited List. I will explain how WADA’s negligence led to a situation where athletes had no chance of knowing that the substance had been added to the List, and every chance of testing positive due to inadequate research on excretion times. I will name innocent athletes who were excluded from the Rio Olympics due to ‘regulatory creep’ that extended the ban on meldonium back further than its intended 1 January 2016 prohibition. This negligence also gives the appearance to Eastern European athletes that meldonium’s addition to the List was designed to target them ahead of the Rio 2016 Olympics, as the research behind its inclusion was commissioned by US sport.

WADA didn’t verify the research, which was submitted shortly after an agreement

with the Partnership for Clean Competition, which commissioned it. Also, despite knowing about the substance's widespread use in certain countries (figures included), it failed to issue any kind of warning and only published the addition to the List in English. It used the chemical name meldonium rather than the brand name mildronate. No information was published in Russian or other cyrillic languages. WADA's criteria for inclusion on the List are deliberately vague, allowing it to place any substance it wishes onto the List. Scientific research isn't necessary, but it should be. Footballer Mamadou Sakho was sanctioned after testing positive for higenamine, however it was later shown that scientific evidence about whether the substance is a beta-2 agonist is inconclusive. He was exonerated. Higenamine is a naturally-occurring plant compound that is also present in sweetsop, a fruit to which Usain Bolt partly attributes his success.

Ostarine is another, slightly different, example. It is a selective androgen receptor modulator (SARM) that is prohibited, however a larger than usual proportion of athletes claim, convincingly, that they have never taken it. It appears to be turning up in salt tablets and even drinks. Again, research needs to be carried out into why this is happening, but there is no provision in the Code to protect the athlete. As the List grows, a new approach will be needed. It is not reasonable to expect athletes to become chemists, and some form of culpability should be attributable to WADA if it is found to have made a mistake or failed to provide information about why and when a substance is added to the List, in all relevant countries. Especially as a four-year ban is now our starting point...

**Thijs Devriendt, Davit Chokoshvili, Maddalena Favaretto and
Pascal Borry**

University of Leuven, Belgium

Do athletes have a right to access their Athlete's Biological Passport?

The Athlete's Biological Passport (ABP), as defined in the ABP Operating Guidelines, refers to "the program and methods of gathering and collating data as described in the International Standard for Testing and Investigations (ISTI) and International Standard for Laboratories (ISL)." In practice, ABP is commonly used in

reference to the athlete's personal biological profile, meaning the collective of all data bound to a certain athlete, including gender, race, sports discipline, competition schedule, data on biological variables and whereabouts information. The major added value of the ABP, in comparison to earlier test methods, is the establishment of an athlete-specific longitudinal profile based on personal data acquired through the hematological and steroidal modules. These modules can be used to monitor changes in several hematological or urinary variables, with large deviations being suggestive for doping use. There is disagreement within the sport and anti-doping community whether athletes have the right to access results of analytical tests taken during the course of anti-doping procedures. In this regard, we have analyzed the background and working mechanisms of the ABP, with a particular attention to the issue of granting athletes access to their ABP data. We have compared ABP to the contexts where biological data is processed for medical and forensic purposes, emphasizing key differences and similarities among these contexts. Furthermore, we have explored underlying ethical issues regarding disclosure of personal information to athletes. Based on the outcomes of the study, we offer suggestions and recommendations for improving the practice of disclosing personal information to athletes.

Anna Efverström and Åsa Bäckström

University of Gävle - Swedish School of Sport and Health Sciences, Sweden

Different societies – different conditions: lessons from anti-doping in elite sport on a global level

Justice and fairness in sport is fundamental for its legitimate existence. On a global level, the creation of the World Anti-Doping Agency and the regulatory framework World Anti-Doping Code was formed largely as a consequence of the need for a coordination of the work against performance enhancing drugs in sports. Today, the anti-doping system often means application of rules and "best practice" developed in the cultural West for the cultural rest. Research on anti-doping policy or practice not only tends to be based on deductive models, these models may also assumingly be culturally biased. Moreover, we have relatively little knowledge of the practical conditions for individual athletes concerning implementation of the rules in different

contexts around the world. This presentation, however, adds to the existing research with new empirical findings from interview data on diverging conditions for elite athletes in different social, cultural and geographical contexts. Through exploring how 13 elite athletes from five continents and three different sports federations perceived the anti-doping programme, we were able to show that global anti-doping policy was implemented in different contexts under different conditions. These differences included infrastructure, knowledge and support. How participation in anti-doping procedures on an everyday basis is endorsed may thus vary around the world.

By examining our interview data on the athletes' perceptions and experiences in relation to theories of procedural justice, we were able to analyse the legitimacy of anti-doping in practice. These findings suggest that inequities and structural injustice emerge on an individual level because of the varying contexts and conditions. In turn, the consequences may have implications for the legitimacy of the anti-doping work. In order to understand implementation processes of regulations, we propose that anti-doping policy-making pay attention to differences that may exist on an individual and practical level. Perspectives that underpin regulations applied globally should in other words be sensitive to varying contexts and conditions.

Bertrand Fincoeur, Fabien Ohl and Rachel Cunningham

University of Lausanne - Institute of Sports Sciences, Switzerland
--

I'm a poor lonesome rider: help! I could dope

Irrespective of the perceived efficiency of the anti-doping policy, the analysis of its evolution shows that the use of illegal enhancers in a sports context has been (and still is) mainly considered an individual (moral) fault of the athlete. This widespread perception of doping led to a primarily deterrence-based approach, which resulted in increasingly invasive measures against athletes' privacy. Despite several initiatives that now tackle the role of the athletes' entourage, the representation of doping as an individual threat to the integrity of the sport ignores the social dimension of a phenomenon that is far from being limited to individual failures. Indeed, taking the example of elite cycling, there is evidence of the (past) existence of

a culture of tolerance towards doping. As a result, considering doping as an output of the cycling culture, including the working conditions elite cycling provides to its riders, helps to avoid simplistic viewpoints regarding the responsibility for individual behaviors. It also helps to better understand the reasons for which elite riders may use (illegal) performance-enhancing drugs.

This presentation will then focus on the organizational risks of doping within elite cycling teams. We will therefore aim at further analyzing how the cycling teams' organization models, which rely e.g. on the types of training organization, medical supervision and career management, may influence the individual's decision of whether or not to use doping products. To this end, we will present different organizational models and we will discuss the doping risks associated to their exposure.

The role of the elite cycling teams in the possible exposure to doping has, indeed, far changed for two decades. Although the effective prevalence of doping practices remains very difficult to assess, most if not all elite cycling teams are today no longer supportive of this kind of practice. Even further, elite cycling teams are now expected to play a role in reducing the doping risks by individual riders. How does this control, if any, occur? What is its impact? How is it perceived among the teams? And more broadly, what do we know already about this possible changing culture within elite cycling?

The presentation will rely, on the one hand, on the results from a doctoral research about doping in Belgian and French elite cycling and, on the other hand, on an ongoing international research project about the changes in the elite cycling culture. Both research projects are mainly based on qualitative interviews with elite riders, team and sports physicians, trainers, and sports directors.

Ingrid Havnes, Ingveig Innerdal, Marie Jørstad and Astrid Bjørnebekk

Oslo University Hospital and Anti-Doping Norway

Anabolic-androgenic steroid use among women – a qualitative study of motivation for use, sources of information and experienced side effects

Background

Lifetime use of anabolic-androgenic steroids (AAS) in Scandinavia is suggested to be approximately 3% among men and 0.2% among women. Female AAS users are at risk of developing masculinizing side effects and other unintended physical and mental side effects. The aim of this study is to give a nuanced understanding of motivations for AAS use among women, their sources of information about AAS use and experienced side effects.

Method

14 women with former or present AAS use were included. The interviews were semi-structured and focused on motivation for AAS use and intended results, how the participant got information about different substances, routes of administration, desirable effects and unintended side effects. The interviews were audio recorded, transcribed verbatim and analyzed thematically.

Findings

The participants were primarily motivated to use AAS to gain muscle and reduce body fat quickly, both recreationally and in preparation for fitness competitions. AAS was also used to increase strength to be able to protect oneself. Some participants had troubled background and experienced AAS use to be of importance to get positive feedback and gain a sense of belonging in a gym. Participants were typically motivated by and introduced to AAS through male partners, friends or coaches. These individuals, along with dealers, were the ones who the participants trusted to provide information on substances, doses, cycles, how to take measures to avoid side effects and routes of administration, as it was uncommon to discuss experiences of AAS use with other female users. Furthermore, most of the participants relied on these male individuals to inject the substances intramuscularly during the first cycle, and for some, throughout the course of AAS use. The participants mainly used AAS in cycles, and some had used the female menstrual cycle to monitor whether the hormonal system was normalized after an AAS cycle, so that a new cycle of use could be started. Most of the women ignored the masculinizing side effects when they first appeared, but later these gave rise to feelings of shame and social stigma, particularly within the female fitness subculture. Psychological side effects such as reduced empathy and emotional flattening were perceived as positive for some participants with previous trauma exposure. Several experienced extreme difficulties in disclosing AAS use to family and friends. Some did not even inform health professionals who

they had contacted specifically for AAS-related health problems and there were experiences of stigmatization by health professionals among those who did.

Conclusions

Some female gym users may be motivated by and introduced to AAS through male partners, friends or coaches who may also be their main source of information about AAS use. A fear of social stigmatization in various settings, particularly among female gym users, may therefore result in limited access to balanced gender-specific information about AAS use and unintended effects. Being female may also represent an additional barrier for seeking treatment for side effects related to AAS use.

John Gleaves and Deborah Rose

California State University, Fullerton
--

Advances in medicine have meant researchers, clinicians, and health professionals have increased their focus on interventions that help people grow old better. Such interventions look to slow or reverse normal declines associated with aging. Of particular interest is age-associated decrease in muscle mass, muscle strength, and physical performance brought on through biological aging process. Prevention or reduction in strength loss promises improved quality of life for older adults while potentially reducing healthcare costs. Yet interventions to improve physical performance in older adults, however, raise ethical questions with implications for clinicians and health policymakers. In particular, interventions targeting age-associated strength loss might appropriately be qualified as enhancements rather than treatments because they disturb humans' natural life cycle by leaving people stronger than they would normally be at their biological age. If so, common bioethical objections to enhancements including may object to such interventions may prompt moratoriums on research targeting performance enhancement for older adults, resistance by clinicians to administer interventions, and a refusal by health insurance to cover costs for interventions not deemed medically necessary. This article counters such objections and concludes that even if interventions for age-associated strength loss are best characterized as enhancements, certain interventions are ethically appropriate and should be deemed medically necessary. The article concludes that the current resistance to performance enhancing interventions in older adults is less about

ethical concerns over enhancement but rather ethically unjustifiable ageist biases within medicine and biomedical research. Thus if older adults are going to grow old better, the clinicians, researchers, and health policymakers must take seriously the value of physical performance enhancement for older adults.

April Henning

Brooklyn College

From “Clean” to “Honest”: Rethinking How We Talk About Doping

This presentation considers the limits and problems arising from “clean” sport and argues in favor of an “honest” approach to addressing doping. Though it may seem clear and intuitive, clean is a complex, subjective, and often problematic concept through which to discuss doping and enhancement. Clean becomes murkier outside the context of elite sport, where anti-doping rules do not apply or are weakly enforced, and where using a range of substances for wellness, performance, or health is socially acceptable and even encouraged. The quest for clean sport places all responsibility for doping on the individual athlete, each of whom is strictly responsible for constantly ensuring they remain clean through their individual choices, without acknowledging the role of other institutions, systems, and stakeholders in shaping athletes’ behaviors and choices. Focusing on clean sport or athletes also limits the ways in which doping can be discussed or regulated, as what is not clean must be “dirty”.

Rather than continue with a vague standard, I offer “honest” as an alternative to clean in the narrative of sport and the goals of anti-doping. Drawing on the current sport environment, I will consider the ways honest sport could hold anti-doping organizations, sports federations, event organizers, commercial sponsors, and fans to account for their role in shaping the current sporting environment. Honest sport could help shift the full burden from athletes, to be shared by all sport stakeholders by acknowledging and addressing the pressures, expectations, and motivations each place on athletes. Being open to a fuller accounting of sport culture as it currently exists would allow for a clearer understanding of the context in which athletes then

make decisions regarding doping. It may also help shape deterrence strategies that rely less on the problematic current surveillance-based system of anti-doping. I argue that a shift to honesty would benefit athletes while still promoting a safe and fair environment by supporting a more health-focused approach to performance enhancement.

Malene Radmer Johannisson

Anti-Doping Denmark, Denmark

Doping prevention in Danish fitness and strength training environments - experience and lessons learned

The use of doping substances outside organised sport – especially anabolic steroid use – has been recognised as a public health issue. Worldwide, and within the EU, different policies and strategies have been adopted to prevent doping use in fitness and strength training environments and prevention efforts have taken many different forms – ranging from the use of doping control and information campaigns to harm reduction initiatives and peer/user education.

Since its establishment in 2005, Anti Doping Denmark (ADD) has been required by law to seek collaborative agreements with commercial fitness centres and private gyms in order to prevent the use of steroids and other image enhancing drugs – mainly among young men and women between 15 and 25 years. The focus of combining doping control in gyms with broad educational campaigns has caused much debate and controversy among certain groups within the fitness community including gym owners, personal trainers and public voices.

In 2012, however, ADD expanded its prevention scheme to include an increasing number of dialogue-based outreach initiatives in gyms and at educational institutions where the use of e.g. sports supplements and certain doping substances is known to be prevalent. At the same time, unannounced doping tests in gyms are now increasingly being used as a proactive tool to promote healthy training environments by excluding unhealthy role models who may inspire others – especially young people – to experiment with doping. In addition, ADD has over the years engaged with a broad range of relevant stakeholders such as the police, customs, municipality staff, fitness

personnel and health professionals. This has led to the creation of several networks as well as community-based projects involving four municipalities across the country who now work with doping prevention locally embedded in interdisciplinary partnerships.

This presentation will focus on the knowledge and experience that we have gathered over the years – what we know and what we have learned – and conclude with a brief discussion of the present anti-doping landscape in Denmark including how we hope to continue to develop the field in collaboration with relevant international and national partners and stakeholders as well as academic institutions.

Lars B Jørgensen

Senior staff reporter at numerous Danish national papers
--

Doping and modern sport: myths, reality, entertainment and corporate companies

Lars has been very kind to replace prof. John Hoberman in the last minute. Here are a few keypoints he is going to speak over:

- Modern sport between myth and reality - case study the Lance Armstrong Hollywood tale
- The development in cycling (and other sports since) The Festina Scandal in 1998
- Sport as entertainment and the public's urge to maintain that breathing hole
- Investigative reporting versus corporate right holders

Bengt Kayser,

ISSUL, University of Lausanne, Switzerland
--

Regulating human enhancement: extending anti-doping policy beyond sport?

Humankind is witnessing a scientific revolution arguably of Kuhnian paradigmatic proportions. Bio-medical and engineering invention rapidly advance and unleash important potential beyond therapeutic use. These developments come with important ethical questions concerning equity, equality, and need. Sports was and is a human activity in which performance enhancement is essential. The Olympic motto is

exemplary in this regard: higher, faster, stronger. Athletes adopt behaviour that helps them performing better in their sport by means of training schemes, nutrition, supplements, psychology, and technology. Most pharmacological means and some technologies are not permitted because considered doping. Since the inception of the World Anti Doping Agency early century, anti-doping efforts in elite sport have led to a gradual shift towards vilification of doping behaviour. This in turn led to increasingly strong repression by means of surveillance and punishment. Pressed by WADA and the IOC, increasingly specific national punitive anti-doping legislation was introduced, in several countries in the form of criminal law, something now explicitly asked for by WADA. In several countries this legislation also applies outside elite competitive sport. In Belgium and in Denmark non-competitive fitness clients are subject to unannounced urine sampling and risk sanctions when traces of forbidden substances are found. Anti-doping surveillance is now also extended to amateur sport such as popular grand fondo cycling races in the USA. Compulsory urine controls for students were introduced in several schools in the USA. Such extensions of anti-doping outside competitive professional sport, for example in fitness centres, can result in increased harm since it pushes the behaviour underground, something accompanied by more risky behaviour. Akin to the consequences of the 'war on drugs', a 'war on doping', anchored in international conventions obliging national governments to combat doping in and outside elite sport, may thus lead to greater societal harm than it prevents. This leads to the question on how much of the present harm of doping – for the athlete and the wider society – might be related to anti-doping policy rather than to the use of the performance-enhancing methods or substances as such. The prospect of a blanket extension of sport's anti-doping policies to wider society would seem a bad idea. Based on the experience with illicit drugs, for which experimenting with alternative policies with harm reduction strategies have come of age and proven their societal benefits, a pragmatic non-essentialist approach of enhancement behaviour in general society applying principles of harm reduction would seem a more viable approach. Whether this would eventually lead to similar changes within competitive sport remains an open question.

Dimitrios Liokaftos

Aarhus University, Denmark

Cultural responses to the use of human enhancement drugs: the case of natural bodybuilding

Much of the debate and scientific analysis of doping revolves around philosophical and policy responses to the use of human enhancement drugs. Aiming to contribute to the examination of cultural responses to this phenomenon, the present paper will look into natural, i.e. drug-free, bodybuilding. Coming out of an ethnographically informed study based on in-depth interviews and participant observation in 3 countries as well as online and social media research, this paper will argue that natural bodybuilding has been growing in different parts of the world as an alternative to a dominant, pharmacologically-enhanced model of bodybuilding that has thus far monopolized public attention and academic research. I will attempt to offer an overview of how natural bodybuilding is being assembled as a distinct, organised body culture by situating it in a series of interrelated fields of human activity. In doing so, I hope to defend the conceptual approach that pro-enhancement and anti-enhancement cultures are co-constitutive of each other and the phenomenon of human enhancement in its entirety.

Sigmund Loland

Professor, Norwegian School of Sport Science

Doping and the ideal of natural athletic performance

Use of performance-enhancing drugs (PED) in sport is controversial and a complex ethical, scientific and practical issue. One challenge is the gap between references to the values of sport, or what in WADA's terminology is called 'the spirit of sport', and operative anti-doping work. General statements on sport values of little help in line drawing between what are considered acceptable and non-acceptable means and

methods. I will propose one way of bridging this gap by outlining a biologically informed ideal of natural athletic performance.

References to ‘the natural’ can be problematic. The concept is vague and can be and has been misused to marginalize and exclude athletes based on biological sex, sexual orientation, and cultural and ethnic background. Still, references to what is ‘natural’ and ‘artificial’ are frequently heard in the debate over PED. I will argue that, if understood biologically and with reference to the phenotypic plasticity of the human body as developed in evolution, the ideal of natural athletic performance can inform significantly both ethical issues and operative line drawing when it comes to PED use in sport. Moreover, the discussion will illustrate the more general point that anti-doping is a normative position and depends upon sound and critical reflection upon sport values.

Charlotte McLean

Public Health Institute - Liverpool John Moores University, UK
--

Exploration of the Female Use of Performance Enhancement Drugs

There is a growing interest in the use of pharmaceuticals to alter human attributes such as muscularity. Performance enhancing drugs (PEDs) that fall into this category include anabolic-androgenic steroids (AAS) and growth hormone (GH). Use of these compounds are associated with a range of adverse physical and psychological health consequences, giving rise to an increasing public health concern. The aesthetically orientated sport of bodybuilding (BB) is one where the use of both AAS and GH is established. Traditionally a male domain, female participation in the sport has evolved since its introduction in the 1970’s, from the thin and toned figures of the early 80s to the more muscular physiques in the later 80s and 90s. While images of muscular females may still be considered deviant in mainstream society (Bunsell, 2010 pp.129), there is an increasing emphasis within popular culture on fit, muscular and lean bodies (Benton and Karazsia, 2015); the rise of the ‘fitness competitor’. The latter, coupled with a recent increase in the number of female

categories in BB, may well be important factors in the initiation of AAS use, as women are under more pressure to increase muscularity and improve body composition, seeking validation through competition.

While AAS are manufactured to promote their anabolic characteristics, the androgenic, masculinising effects cannot be completely eradicated. The latter can be most damaging in females; menstrual irregularities, clitoral enlargement (Eric et al., 2010) acne, growth of body hair, deepening of the voice, reduction in breast tissue and problems with reproductive function are among the potential side effects of AAS use, some of which may be irreversible. In light of this, these virilising effects should be considered adverse with respect to the female AAS user.

This research engages with female bodybuilders, a hard to reach and understudied population of PED users, reflected in the paucity of data currently available. The study comprises an exploration, guided by a number of objectives that seek to determine the nature of PED use; perceptions and attitudes towards use; motivations for use; health effects experienced; and attitudes and perceptions towards medical professionals. This innovative project combines ethnography, in depth interviews, and photo elicitation, in order to provide the theory and method that allow the exploration of PED use within the context of the wider BB culture. By observing, participating and becoming part of a BB community the project seeks to identify the specific, yet unquantified needs of female PED users, and forms the first stage in developing unique harm reduction initiatives to ensure the needs of this population are met.

Jim McVeigh

Public Health Institute - Liverpool John Moores University, UK
--

Image and performance enhancing drug use in the United Kingdom: challenges and implications

Background

Society, often fuelled by moralistic media headlines is preoccupied with the use of drugs to enhance performance in elite sport, “doping”. The reality is that the 21st century has seen the use of anabolic steroids and associated drugs (referred to as

image and performance enhancing drugs) become commonplace within the general population on a global basis.

Methods

This paper will draw on a number of United Kingdom data sources to better understand the changing phenomenon of image and performance enhancement drug (IPED) use over the last 20 years, including; surveillance data from needle and syringe programmes (NSP); HIV, hepatitis B and hepatitis C prevalence data from the bio-behavioural surveillance system of people who inject drugs (dating back to 1992) and two bespoke IPED injector surveys; National survey data (2013- 2016) providing a sample of 1549 injectors of IPEDs and providing detailed information relating to demographics, drug use histories and associated behaviour together with motivations for use.

Results

NSP data between 1995 and 2015 identified an increase in reported anabolic steroid injectors from 553 to 5336 in the Liverpool area alone. This pattern was replicated in cities across the North of England, Scotland and Wales, providing evidence that this population of injectors outnumber injectors of all other substances combined (including heroin and cocaine). While the presence of blood borne viruses amongst this population has never been considered a major public health concern, prevalence has increased over time and for HIV, is now similar to that among heroin injectors. Findings from the survey data provided evidence of an extensive array of pharmacological substances including anabolic agents, drugs used to counter side effects and other enhancement drugs (typically weight loss, skin tanning and sexual enhancement products). High levels of psychoactive drug use were also identified, in particular the use of cocaine.

Conclusion

Findings will be viewed in the context of a growing understanding of the long term potential damage caused by anabolic steroids and other IPEDs, together with an assessment of the current United Kingdom response, characterised by both legislation and harm reduction.

Werner Pitsch

Saarland University, Germany

A coherent explanation of doping decisions of amateur and elite athletes: understanding sporting performance as consumer capital

Research on the prevalence of doping in amateur sport as well as on its determinants has shown that about 5% of the amateurs deliberately used forbidden substances or methods in order to improve their sporting performance. The challenging issue for social sciences is that the determinants in amateur sports are similar to the patterns already known for elite sports, although the context differs significantly in terms of costs and benefits. Therefore, a coherent explanation of doping is required which at best works for low costs-low benefit situations in amateur sports as well as for the typical high costs-high benefit elite sport. The model builds on the basic idea of consumer capital: the consumption of sport (e.g. hours and money spent on training) increases the utility from future consumptions (e.g. from participating in competitions). With this idea, doping decisions in amateur sport as well as in elite sport can be explained as results of a rational choice. This choice allows deviators to preserve their utility from the consumer capital, they have spent on developing their sporting performance. While the core structure of the model is equal independent from the level of sporting performance, there are different assumptions concerning the relationship between the costs, necessary to increase the consumer capital and the expected utility from it in the future. As a result, this model not only provides a coherent explanation of doping decisions but remains also specific enough to address different conditions according to different levels of sport. The (mathematical) model will be presented and model-based inferences on possibilities and limitations for Anti Doping measures will be drawn.

Marcel Reinold

University of Muenster, Germany

Doping in Autobiographies of Cyclists

It is a central assumption of social science research that anti-doping measures cannot be fully effective without an understanding of athletes' attitudes, motives and perceptions about doping. Typically, researchers use either questionnaire- or interview-based methods to investigate the athletes' viewpoints. It is interesting, however, that autobiographies of athletes have never been systematically analysed in this endeavour. This paper will try to close this gap and use autobiographies as a neglected type of empirical source. The focus will be on cycling, as it is one of the sports most associated with doping. Another reason cycling was chosen is because there are many autobiographies of cyclists, so systematic comparison is possible. First, I will characterise autobiography as a specific type of empirical source and outline its possibilities and limitations. Sociological research has emphasised that autobiographies are narrative constructions of the self (Heinze, 2010). People retrospectively make sense of their past through a coherent story. Furthermore, autobiographies communicate meaning and present the self to a broad public audience (Goffman, 1990). The reception of an autobiography depends on what the readers find believable and acceptable, so autobiographies must be written within the confines of what is socially believable and acceptable. This is why every autobiography has a social dimension and sheds light on broader norms and expectations in society. Secondly, I will categorise different types of autobiographies: On the most basic level, I will distinguish between athletes who have admitted doping (self-admitted dopers) and those who have denied doping (deniers). Third, the different categories suggest different research questions. Regarding the deniers, the most important question is how they try to create credibility in a field in which doping is assumed to be widespread. Regarding the self-admitted dopers, the focus is on how they try to rationalise their deviant behaviour to protect themselves from self-blame and the blame of others (Sykes & Matza, 1957). Equally important for both categories is how doping deviance or resistance is embedded within the whole life story.

Literature

Goffman, E. (1990). *The Presentation of Self in Everyday Life*. London: Penguin Books.

Heinze, C. (2010). Zum Stand und den Perspektiven der Autobiographie in der Soziologie: sozialkommunikative Konzepte zur Beschreibung einer literarischen Gattung. *BIOS – Zeitschrift für Biographieforschung, Oral History und Lebensverlaufsanalyse*, 23 (2), 201-231.

Sykes, G. M. & Matza, D. (1957). Techniques of Neutralization: A Theory of Delinquency. *American Social Review*, 22 (6), 664-670.

Ian Ritchie

Brock University, Canada

Doping, Anti-Doping, and Public Participation: The Canadian Case

This paper explores the relationship between anti-doping programs and public participation in sport, showing through a careful examination of the development of Canada's anti-doping programs how the two are interrelated. Building on an under-explored document in the history of anti-doping, this presentation first of all considers the recommendations made by Canadian sport sociologists Bruce Kidd and Rob Beamish in their public submission to Commissioner Charles Dubin's Commission of Inquiry into the Use of Drugs and Banned Practices (1990), released by Justice Dubin during his public inquiry following Ben Johnson's infamous positive drug test at the 1988 Summer Olympic Games. In their "Brief to Mr. Justice Charles Dubin" – a fascinating historical document that presciently speaks to virtually all major themes addressed in anti-doping research since its publication – professors Kidd and Beamish recommend the "significant enrichment and democratization of opportunities at all levels" in Canadian sport. Doping could only be defeated, the professors argued, when the "meaning and character" of sport is questioned and this can only come with a more broad based approach alongside a "restructuring of the rewards available" and an emphasis on the "educational," "artistic" and "developmental" aspects of Olympism. While Dubin did to some degree speak to the importance of broad-based programs in Canada, little flowed from his recommendations in terms of policy. Since

1990 there have been attempts to link anti-doping to greater public participation in sport but those programs have largely been failures. A commendable attempt was made by the Canadian Centre for Ethics in Sport, created as the central anti-doping body in Canada based on Dubin's recommendations. The CCES formed the "Spirit of Sport" campaign in the 1990s (the wording of this campaign later became the basis, or "Fundamental Rationale" for WADA's Code) to encourage participation and positive values in sport while simultaneously attempting to divert sport participants at all levels from the use of performance enhancing substances. But while an admirable campaign, it ended in 1998, and since the turn of the century, virtually all government-based programs in Canada have failed to encourage participation (Donnelly, 2013). Meanwhile, anti-doping policies, alongside the emphasis on winning at all costs at the highest levels of the Canadian high-performance sport system, have only gained strength. The release of Justice Dubin's Commission of Inquiry proved to be a critical juncture in Canadian sport, but the opportunity to revisit the goal – proposed by Kidd and Beamish in their public submission – to broaden the Canadian government's focus to encourage greater participation at all levels was lost. Today participation is down in virtually every social category while tougher anti-doping policies and the emphases on high-performance sport and winning medals have only strengthened. The opposite, professors Kidd and Beamish suggested, should be the case. It is for this reason that this rare document is worth revisiting; the idea of building a broad-based participatory model as a way of combating the doping problem has rarely been considered. Sources used for this presentation include interviews, original policy documents, and secondary sources.

Morten Renslo Sandvik

Norwegian School of Sport Sciences, Norway
--

The confession dilemma: A narrative approach

The elite athlete's dilemma of whether to dope or not has received much attention in the philosophy of sport. However, athletes who choose to dope are likely to face a new and different dilemma, of whether or not to confess. Doping confessions are morally relevant for reasons beyond the moral virtue of honesty. On the one hand, the

question of confessing may concern in fundamental ways the well-being of the athlete and his or her close relations. On the other hand, confessions carry the potential of informing anti-doping work and, more generally, improving our understanding of the doping phenomenon.

In this paper, I attempt to illuminate the complexity of the confession dilemma, arguing that neither alternative – confessing or not – seem particularly advisable in terms of well-being and self-esteem. I make this argument through the conceptual lens of narrative identity. The narrative identity view posits that human practical identity takes a narrative form. When a person asks herself 'who am I', she answers in terms of a narrative interpretation of her life; a life that has a past and a present and which she projects into the future, and in virtue of which she makes sense of herself and her world (Scechtman 1996; Ricoeur 1991).

A person's narrative identity is constrained by the fact that she is not just the subject of her own life, but lives in relations with other people. As social beings, we view ourselves from three perspectives: In the first-personal psychological perspective, I am the 'me' in my life; in the second-personal relational perspective, I am a 'you' in your life; and in the third-personal objective perspective, I am a generalized 'they' among others (Atkins 2008). A strong narrative identity – essential to high self-esteem (Atkins 2008; Ricoeur 1991) and eudaimonic well-being in the Aristotelian sense (Bauer, McAdams and Pals 2006) – rests upon our ability to construct self-narratives that unify the three perspectives of self-awareness.

In the first section, I argue that, at least under circumstances of considerable public suspicion and distrust, the not-confessing athlete is likely to experience confusion between the three perspectives of self-awareness; a notion that the 'me' in my life' is not the same person as the 'you' in your life' or the 'generalized 'they' among others'. Confessing seems the obvious solution.

In the second section, I show that the picture is much more complicated. I argue that the confessing athlete will experience a more complex confusion, due to the trouble of projecting to others a meaningful 'athlete narrative' including doping practices. One telling example regards the narratives of confessing athletes in which what at least partly is an ambitious, loyal, norm adhering 'me' in my life' comes across, more or less, as a villain 'you' to others.

Towards a conclusion, I frame my argument as an example of the seamy side of a dogmatic anti-doping discourse in which doping is seen as "bad, period" (Kayser

2015).

References

- Atkins, K. (2008). Narrative identity and moral identity: A practical perspective. New York: Routledge.
- Bauer, J. J., McAdams, D. P. & Pals, J. L. (2006). Narrative identity and eudaimonic well-being. *Journal of Happiness Studies*, 9, 81-104.
- Kayser, B. (2015). Towards risk reduction in doping: Learning from the failure of the war on Drugs. In Y. V. Auweele, E. Cook, & J. Parry (Eds.), *Ethics and Governance in Sport: The Future of Sport Imagined*. London: Routledge.
- Ricoeur, P. (1991). Narrative identity. In D. Wood (ed.), *On Paul Ricoeur*. New York: Routledge.
- Schechtman, M. (1996). *The constitution of selves*. Ithaca, NY: Cornell University Press.

Anders Schmidt Vinther

Aalborg Municipality, Denmark

Aalborg Antidoping - experiences from a local, community-based partnership project

In Denmark, efforts to prevent the use of doping substances in fitness and strength training environments – mainly anabolic steroid use – have taken place since the establishment of Anti Doping Denmark (ADD) in 2005. The Danish doping prevention scheme comprise a broad range of measures such as value-based campaigns, collaboration with commercial fitness centres, private gyms and sports organisations and outreach initiatives at e.g. educational institutions. In recent years an increasing number of key persons from the field of health promotion and substance use prevention have called attention to the need for local action in order to prevent the use of steroids and other performance- and image-enhancing drugs. In addition, some Danish municipalities have already taken the first step by establishing local partnership alliances with relevant stakeholders and by raising awareness about the adverse health consequences of doping use among substance use workers, health professionals and local politicians. This development has led to the creation of a

national 3-year pilot project called 'Anti-Doping Municipalities 2015-2017' funded partly by the Ministry of Culture with the aim of intervening at the local level. A total of four municipalities (Aalborg, Hjørring, Odense and Holbæk) have received funding for the project and they are now all engaging in local doping prevention in collaboration with ADD. The idea behind the pilot project is to encourage the formation of collaborative partnerships between the municipality staff and relevant local stakeholders such as commercial fitness centres, sports and leisure clubs, schools and the police. This community-based approach is considered pivotal since it ensures a common understanding of the problem as well as mutual expectations to the solution. The overall aim of the pilot projects is to prevent the use of doping substances in and around fitness and strength training environments – especially among young men and women between 15 and 25 years. This aim will, however, be pursued differently among the four municipalities e.g. by organising conferences, events and workshops and e.g. by bringing about a variety of educational material covering topics such as training, nutrition and the use and risks of sports supplements. This presentation will introduce one of the local projects – Aalborg Antidoping – that is located in Aalborg Municipality by giving an overview of the preliminary results and the experiences gathered so far. The presentation will conclude with a brief discussion of some of the challenges and dilemmas that arise in the endeavor to communicate the anti-doping message.

Hans-Jørgen Wallin Weihe and Bjørnar Bergengen

Inland University of Applied Sciences and Oslo Municipality, Norway

Doping, economy and vanity - body, dependence and addiction

The economy connected to investments in personal and bodily appearance is considerable. The vanity of the individual might involve use of various kinds of doping to develop the desired body and the desired kind of performance. The authors have background from work with dependency/addiction problems with gaming/gambling as well as various kind of substances and doping as well as on-going co-operation with the Norwegian Academy of Arts (School of Dance) for a project of choreography. The focus of the presentation is doping as a vanity

phenomenon, and the addiction/dependence problems resulting from such doping. The authors will also shortly discuss the economy of such doping within different segments of users. The examples will include various age groups as well as users with a variety of backgrounds.

Jules Woolf, Khalid Ballouli and Bob Heere

Adelphi University and University of South Carolina, USA
--

Examining doping from a community of practice perspective: insights into learning, meaning and identity.

A challenge for doping researchers is to recruit athletes who engage in doping to uncover the processes by which they learn about, engage in, and maintain their doping practice, along with the impact this has on their person. Doping is a secretive activity (Fincoeur, van de Ven, & Mulrooney, 2015) and although some scholars have interviewed athletes who have doped (e.g., Engelberg, Moston, & Skinner, 2015; Hoff, 2012; Kirby, Moran, & Guerin, 2010), these studies involved participants from non-commercialized sports, or who had retired from sport prior to contemporary doping policies. Furthermore, previous research has focused on the individual (e.g., motives for using), yet we recognized that doping is not an isolated affair (Waddington, 2000) and likely occurs within a network of others (Connor, 2009). It would be beneficial for doping scholars to understand this process and the way such a network operates. In line with INDR mission, such knowledge would provide insights into the complexity of the doping problem. To this end, this presentation will introduce how using a community of practice (Wenger, 1998) perspective may aid in this venture. In addition, preliminary results from an ongoing study involving former professional baseball players will be discussed.

The community of practice framework is a social theory of learning. It argues that learning is not an individual affair, nor is it a simple process of information transmission or acquisition. Instead, people learn through practice, their interactions with others and the environment. Such an arrangement need not be formal, nor must the learner be aware of the community or of their membership. For instance, shared ways of knowing change over time (e.g., opinions on doping being a prime example),

yet people may not realize how or when this occurred. As this is a shared enterprise, learning and meaning are negotiated and renegotiated among members. This observation demonstrates how knowledge can change and advance as meanings change. Furthermore, as one learns within a community of practice they do not just learn to do, they learn to be. The learner is transformed from their practice and involvement with the community, and as such, learning always affects identity. Finally, this framework uses a situated dynamical approach, which would be beneficial for understanding how an athletes' relationship with sport and with doping change based on their social context and life stage. In brief, this perspective provides a powerful lens to understand athletes' doping. We are currently interviewing former professional baseball players who have admitted to doping during their career. We are using a narrative life history (Plummer 2001) approach where participants are interviewed on their life as an athlete and their relationship with doping. This conversation involves the athletes' early experience of sport, how their play and career progressed, and how they became expose to and then used drugs. The interviews also address the athletes' relationship with other users, suppliers, and the ways in which they kept their drug use secret and avoided detection. Preliminary results and insights will be discussed.

Nils Zurawski and Marcel Scharf

University of Hamburg and German Sports University Cologne, Germany

Negotiating privacy. Athletes assessment and knowledge of the ADAMS

Elite athletes, in order to participate in international sports and competitions, have to comply to a complex system of controls, the ADAMS being one of them. One prize being that their privacy and that of others might be compromised. Hence, there exists a tension between the fight against doping and the integrity of privacy. This tension lead us to ask what athletes themselves have to say about their use of the system and such questions as:

- Do athletes have privacy?
- Do they feel this privacy is infringed upon by the whereabouts system and constant controls?

- What actually do athletes know about the ADAMS and how do they use it?
These are the central questions that guided our study into the use and assessments of ADAMS by German elite athletes, conducted in the summer and fall 2016. As part of a larger study, the online survey was used to particularly explore the use of ADAMS by athletes and their respective knowledge about the system. Furthermore we were interested in the athletes' views on privacy in general and ADAMS in particular. 526 German athletes registered in the RTP and NTP test pools of the German NADO (n total = 2152), took part, thus we were able to gather a representative sample. Among others we found that athletes,

- have contradictory views towards ADAMS;
- have little knowledge of the system as such;
- would (or know how to) engage playing the system to avoid controls;
- have strong feelings about privacy and at the same time accepting ADAMS as a necessary nuisance;
- voice a strong concern about the lack of transparency of the system and the fight against doping in general.

In this paper we want to discuss the consequences and repercussions of our findings for the fight against doping and the rights of athletes as citizens. Furthermore we want to explore whether it would be worth, extending this survey to other countries and NADOs.