

AWARENESS ON THE USE OF STEROIDAL DRUGS AMONG BASKETBALL PLAYERS IN SCHOOL STUDENTS

RUNNING TITLE: Steroidal drugs among basketball players in school

ABSTRACT

Background: the use of performance enhancing drugs by pre-teenagers and teenagers has increased tremendously over the past decade. The trend is driven by multiple factors, including the decrease in the age of participation in competing sports, the increase in popularity of team sports. The questions were distributed through an online survey planet link to the study professionals including 69 basketball professionals. The participants were explained in detail about the purpose. The questions were carefully studied and the corresponding answers were marked by the participants the data was collected and statistically analysed. From the current study, about 83.3% of the population were aware of the use of steroidal drugs in basketball and 16.7% were not aware of it. Majority of the population are aware of the use of steroidal drugs in sports and they are aware of the harmful effects of it.

Keywords: basketball, drugs, performance, sports, students

INTRODUCTION:

There are many types of drugs, which were used by athletes to improve performance. There are many studies which review different categories of drugs: those that enhance performance as stimulants, those that are used to reduce tremor and heart rate and those involved in body weight gain or loss (1). The first ban on “stimulating substances” via a sporting organization was brought by means of the International Amateur Athletic Federation in 1928(2). Non-Steroidal Anti-Inflammatory Drugs are frequently used in sports activities medicine. NSAIDs are over-the-counter pills and NSAIDs are often taken at high doses through athletes with unrestricted access. Severe unfavorable outcomes have been stated consisting of acute renal failure, and gastrointestinal disorders.

NSAIDs aren't considered as performance improving capsules and aren't included within the World Anti- Doping Agency (WADA) Prohibited List(3). Doping has historic origins, wherein individuals began to practice bodily hobby in opposition with others, in fact, they've sought to enhance their own overall performance by means of taking mixtures of various forms of plants (4). Sport has to additionally be a source of aspirational behavioural change however this ‘legacy effect’ of elite game is modest, possibly due in part to the general public disillusionment introduced by repeated drug scandals(4,5). The origin of the usage of tablets in

sports goes back to the very advent of sports activities itself. There are reviews of the usage of special diets with the aid of athletes in 688 BC Ancient Olympic Games in Greece(6).

The discrimination between healing and abusive use of medication in sports activities is performed using threshold concentrations or reporting levels, and the detection of the materials in a sample is handiest said as an detrimental analytical locating while the awareness exceeds the threshold or the reporting level (7). The use of positive overall performance-improving pills (PED) is banned in recreation.(8). However, while studies have generated information about placebo outcomes on sport performance, there are limited studies devoted to how this could assist applied practice(9). Athletic lifestyles may lead to drug abuse due to a few reasons, which includes for performance boosters, to self-treat otherwise untreated mental illness, and to deal with stressors, along with stress to perform, injuries, bodily pain, and retirement from game (10). The use of performance-enhancing tablets by way of pre-young adults and teenagers has multiplied tremendously over the past decade. This fashion is driven by using a couple of factors, such as the decrease inside the age of participation in competitive sports, the increase in reputation of team sports activities. Types of overall performance improving pills. Among the most famous PEDs are anabolic steroids, human increase hormone, erythropoietin (EPO), beta-blockers, stimulants and diuretics to name just a few. While tablets which include those get a lot of publicity, they're possibly not well understood. Previously our department has published extensive research on various aspects of prosthetic dentistry (11-19), this vast research experience has inspired us to research awareness on the use of steroidal drugs among basketball players in school..

Materials and method:

The questions were distributed through an online survey planet link and the study population included 69 basketball professionals in school. The participants were explained about the purpose of the study in detail The questions were carefully studied and the corresponding answers were marked by the participants the data was collected and statistically analysed.

In a school the self administered questionnaire was given to 69 basketball players The questionnaire was distributed through an online survey planet link, The participants were explained about the purpose of the study in detail the questions were carefully studied and answers were marked by the participants.

Result and discussion:

In this study about 83.3% of the population were aware of the use of steroidal drugs in basketball and 16.7% were not aware of it[graph 1]. In a study by R. Terney a majority of 74% were aware of the usage of drugs. Fig-2 shows 85.3 % knew that the drugs which were taken in sports are injurious to health and 14.7 percentage of the population did not know that it was injurious to health. In a study by B Desbrow, 74% respondents know that drugs are injurious to health. Fig-3 shows 81.8% of the population knew that drug usage had adverse side-effects on an individual's

health and 18.2 percent of the population did not know that usage of drugs will cause side-effects . In a study by R. Terney a majority of 79 % knew the side effects due to the usage of the drugs. Fig-4 shows 31.3% of the population thought that it was okay to use drugs for sports but a majority of 68.7 percentage of the population did not think that it is okay to use drugs and sports, In a study by R. Terney, a minority of 12% said it was okay to use drugs for sports. Fig-5 shows the majority 90.8% of the participants knew that the drugs will have an impact on the social behaviour of the individuals very small percentage of the population of about 9.2 % did not think that the drugs will have a negative impact on social behaviour of the individual. In a study by RL Simon a majority of 53% think that the drugs will have a negative impact on social behaviour of the individual. Fig-6 shows 56.5 % find drugs easily available and of light a lesser percentage of about 43.5% of the population did not think that the availability of drugs are easy. In a study by R. Terney, 77% said availability of drugs is not easy.

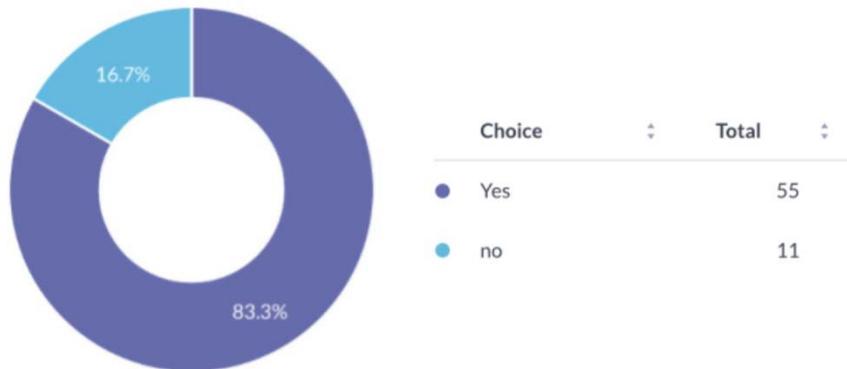


Fig-1. This pie chart represents the percentage distribution of respondents, Who are aware of the use of steroidal drugs among basketball players, Where violet represents yes and blue represents no. A majority of 88.3% are aware of the use of steroidal drugs in sports and 16.7% said no.

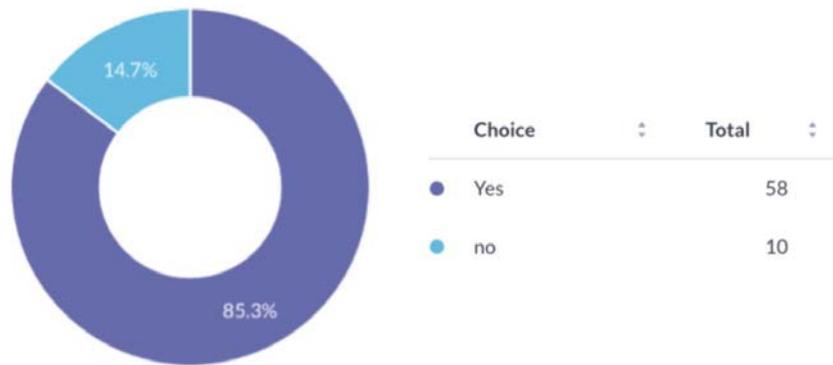


FIG-2. This pie chart represents the percentage distribution of respondents, who are aware that the use of steroidal drugs is injurious to health. Where while at the present says and blue represents no, 85.3% say this and 14.7% said no

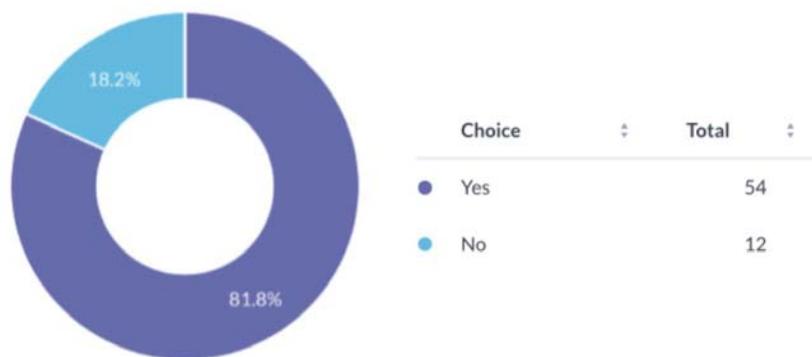


FIG-3. This pie chart represents the percentage distribution of respondents, Who are aware of the side-effects of the use of steroidal drugs, where violet represents yes and blue represents no. A majority of 81.8% said yes and the remaining 18.2% said no

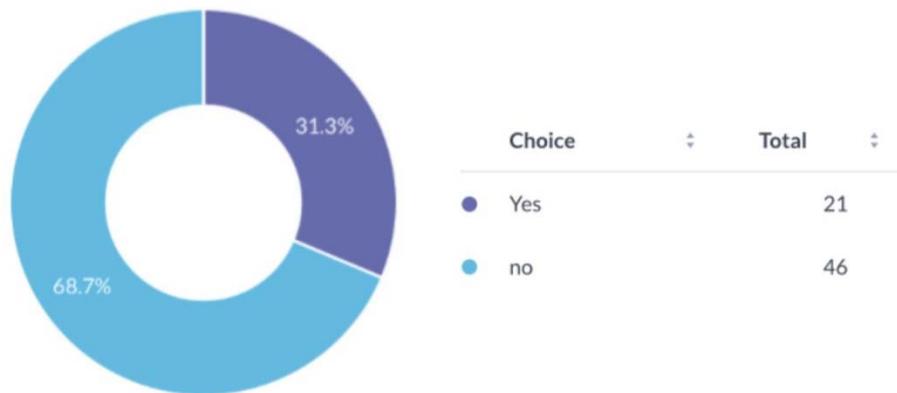


FIG-4: This pie chart represents the percentage distribution of respondents, Who think that it is okay to use steroidal drugs in basketball, where violet represents yes and blue represents no. A majority of 68.7% said no and 31.3% said yes

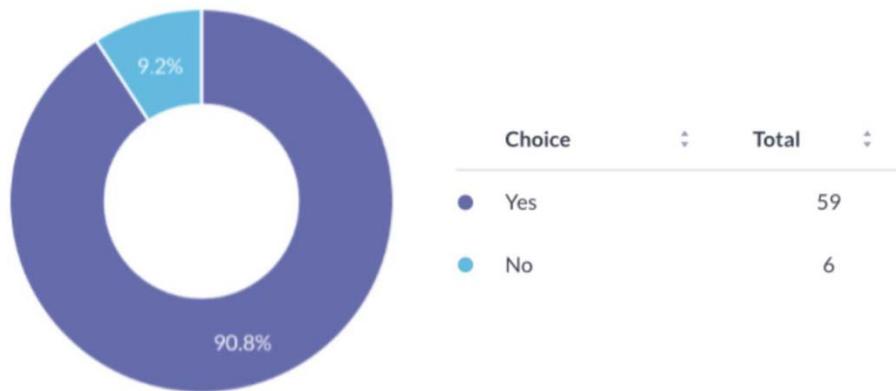


FIG 5. This pie chart represents the percentage distribution of respondents, Who think that these drugs will have an impact on the social behaviour of the individuals, where violet represents yes and blue represents no. A majority of 90.8% said yes and the remaining 9.2% said no

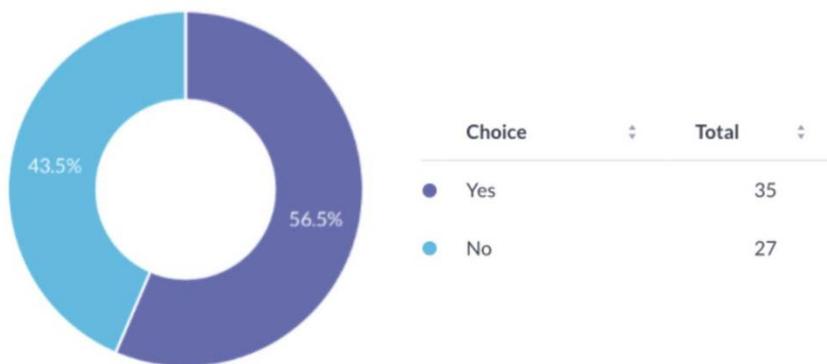


FIG 6. This pie chart represents the percentage distribution of respondents, Who think that steroidal drugs are easily available, where violet represents yes and blue represents no. A majority of 56.5% said yes and 43.5% said no.

CONCLUSION:

Within the limitations of this study following conclusion can be drawn, majority of the respondents are aware of the steroidal drugs and its effects on physical and mental health, awareness camps can be conducted about these drugs not only for the individuals in sports but also the students who are easily attracted to steroidal drugs for the purpose of enhancing their physical abilities.

Reference:

1. Clarkson PM, Thompson HS. Drugs and sport. Research findings and limitations. *Sports Med.* 1997 Dec;24(6):366–84.
2. Savulescu J. Why we should allow performance enhancing drugs in sport [Internet]. Vol. 38, *British Journal of Sports Medicine.* 2004. p. 666–70. Available from: <http://dx.doi.org/10.1136/bjism.2003.005249>
3. Cornu C, Grange C, Regalin A, Munier J, Ounissi S, Reynaud N, et al. Effect of Non-Steroidal Anti-Inflammatory Drugs on Sport Performance Indices in Healthy People: a Meta-Analysis of Randomized Controlled Trials [Internet]. Vol. 6, *Sports Medicine - Open.* 2020. Available from: <http://dx.doi.org/10.1186/s40798-020-00247-w>
4. Mazzeo F, Raiola G. An investigation of drugs abuse in sport performance [Internet]. *Journal of Human Sport and Exercise - 2018 - Spring Conferences of Sports Science.* 2018. Available from: <http://dx.doi.org/10.14198/jhse.2018.13.proc2.15>
5. Gerche AL, La Gerche A, Brosnan MJ. Drugs in Sport — A Change is Needed, but What? [Internet]. Vol. 27, *Heart, Lung and Circulation.* 2018. p. 1099–104. Available from: <http://dx.doi.org/10.1016/j.hlc.2018.04.302>
6. Mahendru D, Kumar S, Prakash A, Medhi B. Drugs in sport: The curse of doping and role of pharmacologist. *Indian J Pharmacol.* 2019 Jan;51(1):1–3.
7. Ventura R, Matabosch X, Segura J. Bioanalytical techniques in discrimination between therapeutic and abusive use of drugs in sport. *Bioanalysis.* 2016 May;8(9):965–80.
8. Loland S. Response to Open Peer Commentaries on “Performance-Enhancing Drugs, Sport, and the Ideal of Natural Athletic Performance” [Internet]. Vol. 18, *The American Journal of Bioethics.* 2018. p. W1–3. Available from: <http://dx.doi.org/10.1080/15265161.2018.1474963>
9. Hurst P, Schipof-Godart L, Szabo A, Raglin J, Hettinga F, Roelands B, et al. The Placebo

- and Nocebo effect on sports performance: A systematic review [Internet]. Vol. 20, *European Journal of Sport Science*. 2020. p. 279–92. Available from: <http://dx.doi.org/10.1080/17461391.2019.1655098>
10. Creado S, Reardon C. The sports psychiatrist and performance-enhancing drugs [Internet]. Vol. 28, *International Review of Psychiatry*. 2016. p. 564–71. Available from: <http://dx.doi.org/10.1080/09540261.2016.1190690>
 11. Evaluation of Corrosive Behavior of Four Nickel–chromium Alloys in Artificial Saliva by Cyclic Polarization Test: An in vitro Study [Internet]. Vol. 8, *World Journal of Dentistry*. 2017. p. 477–82. Available from: <http://dx.doi.org/10.5005/jp-journals-10015-1490>
 12. Ganapathy DM, Kannan A, Venugopalan S. Effect of Coated Surfaces influencing Screw Loosening in Implants: A Systematic Review and Meta-analysis [Internet]. Vol. 8, *World Journal of Dentistry*. 2017. p. 496–502. Available from: <http://dx.doi.org/10.5005/jp-journals-10015-1493>
 13. Jain A, Ranganathan H, Ganapathy D. Cervical and incisal marginal discrepancy in ceramic laminate veneering materials: A SEM analysis [Internet]. Vol. 8, *Contemporary Clinical Dentistry*. 2017. p. 272. Available from: http://dx.doi.org/10.4103/ccd.ccd_156_17
 14. Mahmood M, Pal N, Rayner J, Holloway C, Raman B, Dass S, et al. The interplay between metabolic alterations, diastolic strain rate and exercise capacity in mild heart failure with preserved ejection fraction: a cardiovascular magnetic resonance study. *J Cardiovasc Magn Reson*. 2018 Dec 24;20(1):88.
 15. Gupta P, Ariga P, Deogade SC. Effect of Monopoly-coating Agent on the Surface Roughness of a Tissue Conditioner Subjected to Cleansing and Disinfection: A Contact Profilometric Study. *Contemp Clin Dent*. 2018 Jun;9(Suppl 1):S122–6.
 16. Das A, Anbu N, Sk M, Dhakshinamoorthy A, Biswas S. Highly Active Urea-Functionalized Zr(IV)-UiO-67 Metal-Organic Framework as Hydrogen Bonding Heterogeneous Catalyst for Friedel-Crafts Alkylation. *Inorg Chem*. 2019 Apr 15;58(8):5163–72.
 17. Ashok V, Ganapathy D. A geometrical method to classify face forms. *J Oral Biol Craniofac Res*. 2019 Jul;9(3):232–5.
 18. Balakrishnan S, Duraisamy S, Kasi M, Kandasamy S, Sarkar R, Kumarasamy A. Syntheses, physicochemical characterization, antibacterial studies on potassium morpholine dithiocarbamate nickel (II), copper (II) metal complexes and their ligands. *Heliyon*. 2019 May;5(5):e01687.
 19. Varghese SS, Ramesh A, Veeraiyan DN. Blended Module-Based Teaching in Biostatistics and Research Methodology: A Retrospective Study with Postgraduate Dental Students. *J Dent Educ*. 2019 Apr;83(4):445–50.