Preface

You are viewing the Eleventh Annual Report from the Anti-Doping Authority of the Netherlands. This is the sixth Annual Report to be published exclusively in digital form.

During 2016, the 'Racing for clean sport' project, which was completed in 2015, was succeeded by the 'Together for clean sport' project. This project was launched formally at the end of 2015 and it is being implemented in close collaboration with NOC*NSF, the KNVB, the Athletics Union and Fit!vak. The Ministry of Health, Welfare and Sport is also providing financial support for this follow-up project. There are various activities (prevention and control) targeting football, billiards, athletics and fitness. The aim is to establish models tailored specifically to team sports, sports with a high percentage of inadvertent doping violations, sports with a relatively high doping risk, and fitness. The models will be used by other sports associations and organisations in these categories to improve their anti-doping policies.

Given the ongoing intensive contacts with the press in 2016, it would seem fair to conclude that the high profile of the Doping Authority is a fact of life that does not depend on the seriousness or extent of current doping cases. It is not possible to respond to all requests for information and comments, and so a selective approach is unavoidable. Nevertheless, the aim is to provide the fastest and most complete possible service for the principal media (national newspapers, radio and television). The numerous contacts with the media resulted once again in an extremely large number of publications and broadcasts that included the Doping Authority's views and the information we provided. More than in previous years, the media reported on the organisation of the doping policy in an international context in direct response to the very serious doping issues in Russia and often on the basis (in part) of information provided by the Doping Authority.

The nature and extent of the Russian 'doping scandal', and the range of responses in the international sports world, also had a major impact on the Doping Authority. WADA involved the Doping Authority in different ways in a number of projects focusing not only on finding solutions for the short term but also on the implementation of reforms in the global anti-doping world in the longer term. At the same time, there was also the rapid development of a new form of cooperation between national Anti-Doping Organisations (NADO Leader Summits). These summits produced analyses and explanations that now play a major role in international decision-making.

During the first half of 2016, the Doping Authority was involved in extensive consultations with our policy partners about the need to extend the national doping control programme in order to catch up to some extent with other elite sports countries. Once again in 2016, there was a reduction in the Lotto funding received via NOC*NSF (3.5% on this occasion) that necessitated cutbacks in the prevention programme targeting elite sports. Fortunately, however, the General Meeting of NOC*NSF decided in May 2016 to raise the Lotto budget for 2017 and 2018, and so the prevention programme can be returned to the original level, with the number of doping controls in those years increasing. A start was made with the extension of the national control programme in the second half of 2016, as a result of which the number of controls was well above the target of 1710 (2.061 national controls were conducted).

The Anti-Doping Policy Implementation Bill was submitted to the Lower House of the Dutch parliament by the Minister of Health, Welfare and Sport in September 2016, together with the recommendations of the Council of State. The bill, which (at the time of writing) is expected to go into effect in 2018, will have a major impact on the work of the Doping Authority. This legislation will result in the establishment of the Doping Authority as an independent governing authority which will take over the work currently done by the present Doping Authority. During the course of 2015, a review was conducted in collaboration with the Ministry of Health, Welfare and Sport of the impact that these changes will have on our organisation and these matters were looked at in greater detail in 2016. The transfer of tasks, personnel and resources from the present foundation structure to the independent governing authority will require thorough preparation but these matters can only be settled and arranged in concrete terms when the exact details of the new law (and any associated decrees) are known. This stage had not yet been reached at the end of 2016.

Despite the ongoing struggle to balance the responsibilities of the organisation and the available resources, we believe that we made an important contribution to the fight against doping in sport once again in 2016. We hope you will agree with us after reading this Annual Report.

Chapter 1 Prevention

GENERAL

The overall goal of the Prevention department with respect to organised sports and elite sports is: the prevention of inadvertent and deliberate doping violations in Dutch sport.

Sports organised outside a club context (in other words, the fitness sector) have no doping regulations or doping controls. The goals for this sector are therefore formulated from the perspective of public health and they are as follows: the prevention of deliberate and inadvertent doping, or the prevention of harm to health or additional harm caused by doping (harm reduction)'.

The main target groups are:

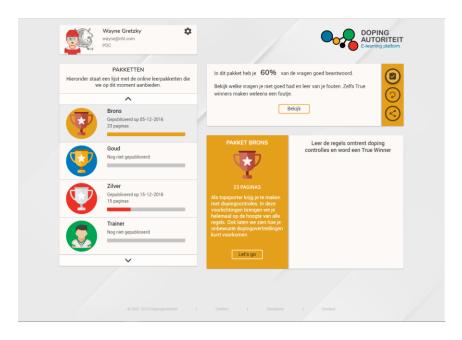
- elite athletes (including elite athletes of the future);
- athletes and fitness professionals in sports organised outside a club context (fitness);
- support staff (in particular trainers/coaches, sports doctors and GPs, physiotherapists, dieticians, masseurs and parents);
- sports associations;
- the general public.

Information activities in the context of sports organised in a club context cover the doping regulations and the risks of doping. In addition, healthy and legitimate alternatives for improving performance are discussed, and efforts are made to foster or reinforce an anti-doping attitude among athletes.

Since 2015, information for elite athletes in particular has been structured using the Ongoing Educational Module for Doping-Free Sport (DLDS). The DLDS describes the knowledge, skills and attitude needed for doping-free sports for all ages and development phases. In line with these phases, three different information packages have been developed for athletes: Bronze, Silver and Gold. Each package consists of face-to-face education, a test and (with effect from 2017) e-learning.

- <u>Bronze</u> (for the age group ±15 years) is an introduction to the topic of doping. The topics covered here are the doping regulations, doping controls and the risks of inadvertent doping.
- <u>Silver</u> (±17 years) focuses more on practising skills. It is assumed that the information from bronze is known, and the focus is more on practical matters. There is, for example, an opportunity to practise using the Doping Information App.
- <u>Gold</u> has been designed specifically for elite athletes with a whereabouts obligation. This category discusses the whereabouts regulations in detail but also looks at difficult doping dilemmas that athletes may encounter, such as doping violations by other members of a team, or using medicines to perform better.

The first steps were taken in 2016 towards providing the Bronze package through e-learning.



Screenshot showing the homepage of the e-learning platform

Meetings for support staff cover the same issues as those discussed with athletes, but also focus on the rights and, above all, the obligations of support staff, as well as factors that exacerbate or mitigate the risk of doping. An Ongoing Educational Module for Doping-Free Sport was also developed for trainer levels 3, 4 and 5 in 2016. This formulates in more concrete terms what knowledge, skills and attitudes coaches require.

The target groups in sports organised outside a club context consist primarily of fitness athletes and fitness professionals. A website, articles and books have been produced for the fitness athletes. In addition to the website, articles and books, the main information activity for the *fitness professionals* target group consists of guest talks at the various fitness centres. These talks look at the different types of doping, the risks of use, the way the substances work and the side-effects, fact and fiction relating to supplements, doping prevention and the Own Strength programme. There is also a focus on *harm reduction*: reducing the risks (and particularly the health risks) for users.

The corporate website (<u>www.dopingautoriteit.nl</u>) and the websites <u>www.dopefree.nl</u> and <u>www.eigenkracht.nl</u> are important ways of communicating with the various target groups. Anyone with doping-related questions can send an email to the Doping Email Line. Answers are sent within one working day.

In order to establish a clearer picture of when we use which logo (Doping Authority, 100% Dope Free and Own Strength), we called in a branding and communications firm. Explanations about doping regulations come from the Doping Authority. 100% Dope Free and Own Strength are offered as a platform or supporters club where athletes and support staff can state their support for clean sports. These steps have led to the diversification of the styling for information materials.

ELITE SPORT

www.dopefree.nl

The website of 100% Dope Free underwent a major overhaul in 2015 and the name has been changed to www.dopefree.nl. The site plays a central role in this prevention programme for elite athletes of the present and future. Twelve news items were posted on the website in 2016. They are sent immediately to all subscribers (numbering about 14,500). The digital Bronze, Silver and Gold tests have also been added to the website. The tests consist of 10 true/false questions and they are used to test what the athletes have learnt at the end of an information meeting. During a test (on smartphones or tablets), the scores can be followed live on a large screen. A test can also be completed outside the context of a meeting.

100% Dope Free - True Winner

This part of the programme (which began in December 2007) gives elite and competition athletes the opportunity to sign an anti-doping statement and to adopt an active stance in favour of clean sports. Once they have signed the statement, the athletes receive the gold wristband to symbolise the fact that you are only a true winner if you perform without doping. The number of signed statements increased from 30,600 to 32,600 in 2016 (+2,000).

This component was developed and implemented in collaboration with the NOC*NSF Athletes Committee. Our ambassadors at the end of 2016 were: Femke Dekker (rowing), Carl Verheijen (speed skating), Richard Bottram (marathon 365 & Wheel of Energy), Epke Zonderland (gymnastics), Mirjam de Koning-Peper (swimming), Thijs van Valkengoed (swimming), Churandy Martina (athletics), Marianne Vos (cycling), Vince Rooi (baseball), Bauke Mollema (cycling), Madelein Meppelink (beach volleyball) and Jetze Plat (handbiking/triathlon).



Congratulations for ambassador Jetze Plat

Information meetings and materials

The Ongoing Educational Module for Doping-Free Sport was introduced in 2015. Agreements have been made with various associations about which information (bronze, silver or gold) is most appropriate for which groups of athletes. That led to a sharp increase in the number of information meetings. From 36 in 2014 to 65 in 2015 and 80 in 2016.

Development of E-learning

To extend the reach further, we began on the development of an e-learning platform in late 2016. This platform provides access to several e-learning modules, such as Bronze, Silver, Gold and modules for coaches.

Z card

A new Z card was produced in 2016 entitled: 'Stay Negative - Tips for clean sport'. It contains the eight most important tips for keeping sports clean.



New Z card with box

Video of doping analysis in a doping laboratory

Recordings were made in November for a video showing the analysis process in a doping laboratory. The video shows what happens to samples in the lab. The presenter of Bureau Sport, Frank Evenblij, was the interviewer. Recordings were made in, among other locations, the DoCoLab in Ghent.

Outreach Events

There were four outreach events in 2016. A deliberate decision was made to visit sports events with the aim of providing general information for large groups of athletes (and in particular young and talented athletes), parents and trainers/coaches. There were also opportunities to sign the 100% Dope Free – True Winner statement and to complete the WADA doping quiz.

The outreach events were organised at: the participants meeting for the Young Olympic Winter Games, the ITU 2016 Triathlon Championships (paratriathlon), the National Cycling Team Pursuit Championships, and the National under-18 Judo Teams Championships.

Articles

The Doping Authority has a regular spot in the NOC*NSF elite sports magazine *Lopend Vuur*. Eight doping-related articles were published in 2016.

Doping Information App

The Doping Information App (iOS and Android) appeared in late 2013. There is a *responsive* website for other systems: www.dopingwaaier.nl. The app had been downloaded 18,614 times at the end of 2016, an increase of 5,457 (the increase was 4,761 in 2015).

The Doping Information App is always kept up to date. The Doping Hotline and the Bronze test (under 'Quiz') were added to the menu in 2016.

In order to maintain the focus on the Doping Information App, Z cards, digital ads, posters and information meetings provide a large range of target groups with information about the App.

Dutch Safeguards System for Dietary Supplements in Elite Sport (NZVT)

A total of 281 NZVT certificates were issued in 2016 (for 488 product-batch combinations). This is the highest number ever, a sign that the Dutch Dietary Supplements system (NZVT) is still catering to a significant need of athletes and their support staff. At the same time, seven batches have been rejected this year because listed substances were found in them, which is a strong signal that the risk of consuming a contaminated supplement is still very real. The system was established in 2003 and, as evidenced by the numbers of positive doping controls that can still be linked to 'contaminated' dietary supplements, a testing system of this kind continues to be necessary. In total, on 31 December 2016, there were 955 product-batch combinations on the NZVT website (antidoping.nl/nzvt) representing 270 products, 48 brands and 16 substantive categories.

A switch was made last year from the laboratory in Cologne to the LGC laboratory in London for analyses.

Together for clean sport

At the National Doping Conference on 23 April 2015, Minister Schippers granted financing for a follow-up to *Racing for clean sport*. Six organisations then drew up an action plan: the Dutch Athletics Union, the KNBB (billiards), the KNVB (football), Fit!Vak, the Doping Authority and the NOC*NSF (the coordinator). The plan was given the name: *Together for clean sport*. On 28 February 2016, the Dutch Indoor Athletics Championships was the backdrop for the launch of the project with all parties involved. The campaign 'Athletics, just clean' was also launched at the same time. It brings together a number of elite athletes (including Dafne Schippers and Churandy Martina). The sports associations involved and Fit!vak started off the project with a study of how much their constituents know about doping. A range of actions and materials were developed on the basis of the results. As part of this project, the Doping Authority has produced animations about the NZVT, therapeutic exemptions, drugs

and tips for a clean sport (in line with the Z card). An animation was developed in 2016 providing a basic explanation of the doping regulations.



'Athletics, just clean' flyer

SPORTS ORGANISED OUTSIDE A CLUB CONTEXT

Own Strength programme

The main target group in sports organised outside a club context consists of: visitors to fitness centres and their immediate circles. The latter category consists primarily of fitness instructors but also entrepreneurs in this branch.

www.eigenkracht.nl

The Own Strength website plays a central role. Alongside text, videos are being used more and more. In addition, there are four full annual programmes for four different training goals. The weekly web reports are placed in files on topics that include

training, nutrition, supplements, doping, health, etc. This makes it easier for visitors to find extensive information about specific topics.

The site specifically targets athletes/cosmetic athletes in fitness centres. It provides objective, clear and practical information about how to build up muscle mass cleanly and effectively, and about sound ways of losing weight. There is also objective information about various types of prohibited substances and the side-effects, and the doping risks of dietary supplements are discussed.

In 2016, a total of 49 factual news reports were posted on the site. They were written by three external experts (journalists or specific experts) from the fitness/bodybuilding branch and by our own prevention officers.

Videos

The documentary 'Bigger than big - The evolution of bodybuilding?' (Groter dan groot - De evolutie van bodybuilding?) was screened in the Lantarenvenster cinema in Rotterdam on 10 September. There was then a discussion and a presentation by endocrinologist Pim de Ronde focusing on the HAARLEM study (health risks of anabolic androgen steroid use by male amateur athletes; see also Chapter 7). The documentary and the associated report can be found on the Own Strength and Doping Authority websites. A version of the documentary with English subtitles has also been produced. The documentary will be sent to a number of NADOs so they can include it in their communications strategies. The documentary will also be used during a range of information activities.



Première in Lantarenvenster cinema in Rotterdam

Two interviews from the documentary have also been used as a basis for sixteen shorter videos. These are the interviews with Dr Pim de Ronde (of the Steroids Clinic) and Hans Kroon, the strength training coach at Fitnesscentrum Noord in Rotterdam.

To show that you can develop an impressive physique on your own, a <u>video</u> has been produced with the elite heavyweight judoka Roy Meyer.

Fitness courses & meetings

In 2016, the Own Strength programme organised 18 guest lectures (13 in 2015) for numerous educational institutes and private fitness institutions. The Own Strength water bottle was handed out during those talks to trainee fitness instructors.

The SAP CUP event was organised on 10 and 11 December 2016. This is the largest fitness/strength sports event in the Benelux. A total of more than 7000 visitors attended the event during the weekend.

In addition, we were involved in an information/discussion evening for younger bodybuilders (including users of prohibited substances) on 15 December at the request of the Menswel foundation in Heel. The thinking was to discourage the use of prohibited substances.

At the request of, and in collaboration with, a number of institutions for welfare and substance abuse, a folder was produced for health professionals in 2016 describing the effects of anabolic steroids.

Clean Hunks

Clean Hunks are fitness athletes/body builders who have demonstrated, and continue to demonstrate, that you can build up an impressive physique without dope. They are the ambassadors for doping-free fitness. Another Clean Hunk joined the campaign in 2016, bringing up the total to 18. They are all on the site, which includes background stories and photos. A number of profiles were updated in 2016.

Articles

Since 1997, Own Strength has had a regular column in the popular bodybuilding magazine *Sport & Fitness Magazine*. Acting under its own editorial responsibility, the Doping Authority again supplied objective information in each issue about prohibited substances and related matters. Since 2014, the approach has been to place several short reports rather than a single large article. This approach was seen in all six issues in 2016.

Since August 2015, Own Strength has been publishing a large article every month in the popular bodybuilding & fitness magazine *Muscle & Fitness*. Those articles are also posted also on www.eigenkracht.nl after the magazine has been issued.

Advertisements

Two new banners/advertisements were produced in 2013 portraying two Clean Hunks (a man and a woman), who are also the face of the new website. After the publication of *Doping, the sober facts*, an advertisement was also produced for that book. These three advertisements appeared again in 2016 on several occasions in *Sport & Fitness, Muscle & Fitness, and* Fit!vak magazine.

Book: 'Doping, the sober facts'

Doping, the sober facts was published in October 2014. Since then, the book has been promoted in advertisements in bodybuilding magazines and journals of Arko Sports Media.

There is still a lot of interest in the book and a lot of copies have been sold.

'Own Strength' book

The last edition of the 'Own Strength' (Op Eigen Kracht) book was published in 2008. There have been some changes since then. The book has therefore been almost entirely rewritten by two authors from inside the organisation and four from the outside who are all authorities in their field. Part of the book was revised in 2016.

Supplements Guide App

Work started on the design of the supplements guide app in 2015. Fitness athletes, and also other athletes and support staff, have more and more questions about the facts and fiction relating to all kinds of nutritional supplements. This app makes it possible to check a supplement on the basis of the ingredients. The app includes other functionalities such as the basics about supplements, health risks, NZVT, alerts, news, a knowledge quiz, etc. A database was established in 2016 and almost 1000 ingredients were listed and evaluated. Details about each ingredient (whether they are prohibited substances, dangerous or dubious) can be listed so that it is immediately clear to see whether there is a problem with the ingredient. In addition, the evaluations state whether the claims relating to the ingredients are justified. The details, claims and judgments are shown using icons. And finally, there is a 'profile' for each ingredient. This is a short description of origin, claims and research/evidence. The app also includes a glossary.

SUPPORT STAFF

In addition to the focus on athletes, there has been an increase in recent years in the emphasis on the people in the circles around elite athletes of the present and future. Support staff can play an important role in a positive sense. Trainers and coaches in particular can play an major role. In addition, medics and paramedics are an important target group.

Because the Doping Information App is also a major source of information for support staff, it was again featured in advertisements in 2016. A poster/advertisement was also produced for the new Z card 'Stay Negative – Tips for clean sport'. It appeared in, among other places, the magazine *Sportgericht*.



'Stay negative' poster/ad

Coaches

There were a number of presentations at a range of coach courses and/or refresher training events, such as: judo coaches, boxing trainer/coach 3, cycling coach 3, the Master Coach course in Heerenveen, the minor in sport coaching at the ALO in Amsterdam, pool trainers 3, korfball coaches 4 and carambole coaches.

An incentive was developed specifically for coaches: the *Coach Negative* Coaching Folder. It is handed out to students at training institutions. A new design was produced in 2016. The previous design was in the 100% Dope Free style; the new one has adopted the Doping Authority house style.

The Doping Authority had a stand on 9 December at the NL Coach annual conference, which was attended by more than 400 people in total. The goodie bag included the new Z card 'Stay Negative - Tips for clean sport'.



Stand at NL Coach conference

Medics/paramedics and other support staff

We gave presentations at a range of courses, such as the Sports Physiotherapy course (2x), the two Sports Nutrition courses, the Royal Dutch Cycling Union courses for team leaders and soigneurs, Sports Psychology at the Radboud University of Nijmegen, the course for Indoor Football trainers from the Royal Netherlands Football Association, refresher training for club doctors and consultants from Professional Football Organisations (BVOs), a guest lecture for medical students at the

Amsterdam Medical Centre, two guest lectures for *Chemistry & Crime* students at Hogeschool Rotterdam, and a guest lecture for the practical sports psychology course at the VU University of Amsterdam.

SPORTS ASSOCIATIONS

Meeting of sports associations

The annual meeting for the staff of sports associations *Samen tegen doping!* (Together against doping!) was organised for the seventh time. It took place on 11 October 2016 in Nieuwegein and approximately 60 people attended. They were representatives of sports associations (and, specifically, the association medics), RTOs (Regional Elite Sports Organisations) and CTOs (Centres for Elite Sports and Education). The aim of the annual meeting is to catch up on developments in the field of anti-doping policy. The primary focus is on prevention.

The guest speakers were Sylvia Barlag (IAAF), Peter Bonthuis (Dutch Boxing Association), Laurens den Ouden (NOC*NSF), Emiel Krijt (NOC*NSF), Brigitte Claessens and Tirza van Noorden (Radboud University Nijmegen). Herman Ram and Erik Duiven spoke on behalf of the Doping Authority. The average rating for the event from the participants was 8/10.



Image from the 'Tips for clean sport' animated film which was shown for the first time at the meeting of sports associations

GENERAL PUBLIC

www.dopingautoriteit.nl

Changes were made to the structure of the corporate website in 2016. Both the quick links and the regular content were altered. General links have also been assigned to the most important web pages (such as the prohibited list) so that users will

always obtain the right information. There is a new quick link to the Doping Hotline. This is the place for anyone who wants confidential information about doping violations such as doping or trafficking. Requests for information can also be submitted anonymously.

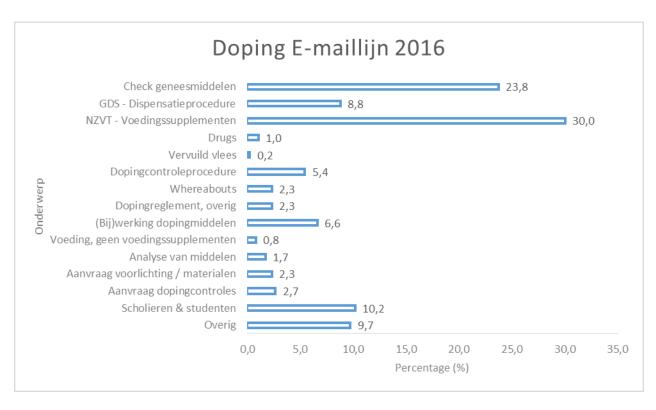
We contributed seventeen reports of our own to the site in 2016. In addition, ANP news reports make up an important part of the topical information. Approximately 598 ANP news reports were published on the site in 2016. That is a substantial increase by comparison with 2015 (413) and 2014 (339). The aftermath of the WADA reports on the IAAF and particularly Russia, in addition to the various meldonium cases, generated a lot of reports.

Doping Email Line

The Doping Email Line is the front office for any questions relating to doping. It is manned by teams of four working in turn. All questions are processed within one working day and recorded anonymously in a database.

A total of 863 emails were received in 2016. That is more than 6% up on 2015, when 811 emails were registered.

In addition, the numbers of questions per subject were also monitored. Individual questions could be allocated to several subjects. The percentages for each subject can be found in the table below. As in 2015, two subjects stand out: checking whether a medicine is on the prohibited list (23.8%) and questions about dietary supplements (30%). The third place (just over 10%) is occupied by questions from students or schoolchildren.



The percentage of emails by subject

Club sports and elite sports accounted for 74% of the e-mails, fitness for 9%, and other sectors for 18%. There were eight reports of possible doping violations, a representative of the press sent an email on six occasions, and seven emails related to an athlete who was found positive.

Press conference

The postponed press conference from 2015 took place on 4 March. A press conference was also planned for 23 September but it was cancelled due to a lack of interest.

Press contacts

In 2016, the Doping Authority was approached on more than 400 occasions by the media, both for information and comments about current events and for answers to in-depth questions not related to topical issues. The CEO of the Doping Authority acts

as spokesman. In his absence, stands in for him.	or when specific topics are inv	olved, the Doping Authority's S	Scientific Policy Officer sometimes

Chapter 2 Therapeutic Use Exemptions

Therapeutic Use Exemption Committee (TUE committee)

There were almost no amendments to the regulations relating to exemptions between 2016 and 2015.

Exemptions were granted in 97 cases. Applications were turned down in five cases.

Table 2.1: Overview of exemptions granted and rejected applications

	2011	2012	2013	2014	2015	2016
Granted	111	82	89	88	99	97
Rejected	8 (6.7%)	1 (1.2%)	4 (4.3%)	6 (6.4%)	8 (7.5%)	5 (4.9%)

As in most recent years, the highest numbers of exemptions in 2016 were granted for the use of methylphenidate (55). In percentage terms, that amounts to 56.7%, a sharp increase by comparison with previous years. Other types of medication for which exemptions were often granted were prednisone/prednisolone (12.3%) and insulin (4.1%).

As a whole, the applications came from 30 different sports associations. The Royal Dutch Cycling Union was at the top of the list again with 20 exemptions (15.5%), followed by the Royal Netherlands Swimming Association (10.3%) and the Royal Dutch Football Association (8.2%).

Chapter 3 Doping controls

Controls in practice

General

In 2016, work continued on the implementation of the doping control policy, which was drawn up in close partnership with NOC*NSF in 2007. The emphasis of the doping controls is on the very top levels of Dutch sports.

In addition, the Doping Authority was able to conduct more occasional/targeted controls for specific individuals and/or groups at competition levels immediately below the very top. The number of follow-up investigations and specific, supplementary analyses increased further once again. A lot of attention was also paid to the whereabouts system. Some elite athletes, if they are members of national or international registered testing pools, are required to report some of their daily activities to the Doping Authority or the international federation.

In view of the increasing number of doping controls to be conducted in 2017 and 2018, the Doping Authority trained new doping control officials (DCOs) in 2016 after the completion of an extensive selection procedure. A total of 11 new doping control officials received training in two training rounds. Some of them also received accreditation in 2016. As a result, the total number of doping control officials available for deployment was 19 at year-end 2016.

Intelligence & Investigations is housed with the Enforcement & Investigations department. Doping Control and Intelligence & Investigations have been merged in order to improve collaboration, enhance exchanges of information, and further the efficiency of operations. There are consultations every two weeks about Cases under Investigation between the head of the department, the doping control officials account manager/team leader and the intelligence officer. These meetings look at matters such as progress and current developments in ongoing investigations. Specific agreements are also made about investigation strategies.

Doping controls are the main tool at our disposal for investigating doping violations but they are also important in terms of prevention. This chapter reports on the number of doping violations identified on the basis of doping controls and on the nature of those violations. However, it is not known how many athletes refrain from doping or stop in response to the doping control programme.

Registered Testing Pool (RTP)

Pursuant to the elaboration of the amended World Anti-Doping Code (WADC) and the associated International Standards, the Doping Authority established a new Registered Testing Pool (RTP). Athletes in the RTP of the Doping Authority are required to comply with a number of obligations. For example, before using any medicines, they must apply for a therapeutic use exemption from the TUE committee. They must also provide whereabouts information and attend an information meeting organised by the Doping Authority.

There were 13 sports associations with athletes in the RTP in 2016. That is fewer than in 2015 (14 sports associations). The number of athletes in the RTP was slightly lower than in 2015: 317 athletes at the beginning of 2016 as opposed to 331 athletes at the beginning of 2015. Once again in 2016, athletes were only required to provide whereabouts information to one organisation: either the Doping Authority or the international federation. To consult whereabouts information from international

federations about Dutch athletes, the Doping Authority has reading privileges for the global administration and management system ADAMS. That makes it possible for the Doping Authority to view whereabouts information about Dutch athletes that is not supplied directly to the Doping Authority. In this way, the Doping Authority can rest assured that the information obtained through this channel is up-to-date.

In 2016, as in previous years, the Doping Authority also drew extensively on information from external sources such as the websites of national and international federations, Twitter and Facebook. The whereabouts website developed by the Doping Authority (and the associated Whereabouts App for smartphones) provided both general and more detailed information about athletes, teams and training locations. The Whereabouts App was brought into line in 2016 with the ongoing developments in the different smartphone operating systems and the associated safety standards.

Controls conducted - general

The Doping Authority conducted two types of doping control for Dutch sports in 2016: controls in the context of the Dutch national programme, and doping controls on behalf and for the account of third parties, including Dutch and international federations, event organisers and foreign National Anti-Doping Organisations. The Doping Authority's responsibilities also included controls pursuant to official records, target controls when there were specific suspicions, and various types of follow-up investigations. Controls in the Netherlands included not only Dutch athletes, but also athletes from other countries who were present in the Netherlands. They were sometimes conducted on behalf of other ADOs.

The national programme – underlying principles

As in previous years, the Ministry of Sport and NOC*NSF made funding available in 2016 for the implementation of the national control programme on behalf of the Dutch sports associations. In addition, some of the control budget for 2015 (5%) was passed on to 2016. This reallocation was welcome in 2016, partly in view of the large number of Dutch athletes who participated in the Olympic and Paralympic Games in Rio de Janeiro. The total available budget meant that a national programme of slightly more than 1,800 controls was possible in 2016. In accordance with the policy agreed upon with NOC*NSF, approximately 600 of these controls were earmarked for controls pursuant to records and qualification limits, for the implementation of target controls and for follow-up investigations. On the basis of the anti-doping policy, the Doping Authority spread the other controls amounting approximately to 1200 across the sports associations. A mathematical distribution model based on international guidelines, and including information such as sport-specific physiological characteristics and international and national doping incidence statistics, is used to decide on this allocation.

The national programme – implementation

In 2016, 2,061 controls were conducted as part of the national control programme. The overwhelming majority (1,817) were urine controls. There were also 244 blood controls in 2016, for example in the context of the Athlete Biological Passport. This was a substantial increase by comparison with 2015 (325%).

The 2,061 doping controls conducted as part of the national control programme covered 31 Olympic sports and 18 non-Olympic sports in a ratio of 91:9. There were no doping controls in a number of non-Olympic sports that are less susceptible to doping, examples being mind sports.

Doping controls in the National Control Programme: the top five

- 1 Cycling
- 2 Skating
- 3 Athletics
- 4 Swimming
- 5 Rowing

The percentage of out-of-competition controls (blood and urine) in the national programme was 57%. Relative to 2015, this was a significant increase (46.8% in 2015) which can be attributed in part to the integration of *Intelligence & Investigations* in the Enforcement & Investigations department. That step made it possible to conduct target controls more frequently. Of the 2,061 doping controls (blood and urine) conducted for sports in the Netherlands, 1,101 involved men (53.4%) and 960 women (46.6%).

Doping controls by third parties

The Royal Dutch Football Association (KNVB) and the Royal Dutch Cycling Union (KNWU) have financed an additional doping control programme alongside the national programme for Dutch competitions. In addition, NOC*NSF commissioned additional doping controls for athletes who qualified for the Olympic and Paralympic Games in Rio de Janeiro, in so far as these athletes had not yet been included in the RTP of the Doping Authority.

Various Dutch associations and sports organisations have purchased additional controls from the Doping Authority for international events in the Netherlands. A total of 727 doping controls were conducted on the basis of assignments from third parties. That is an increase of 7% by comparison with 2015.

The majority of the additional doping controls conducted for Dutch and foreign associations and organisers were in-competition controls (84.3%). Due to the relatively large number of additional out-of-competition doping controls for NOC*NSF, this percentage is lower than in 2015. The doping controls for third parties involved 459 men and 268 women.

Doping controls - total

The controls for the national control programme and the controls for third parties together make up the total doping control programme in 2016. A total of 2,788 doping controls were conducted.

Table 3.2: General overview of doping controls in 2016

Doping controls conducted by the Doping Authority	Urine	Blood	Total
Doping controls conducted for Dutch sport (Dutch national programme)	1,817	244	2,061
Doping controls conducted for foreign sports organisations and other organisations	704	23	727
Total conducted by the Doping Authority	2,521	267	2,788

Total	2,788	2,416
On behalf of third parties	727	679
National programme	2,061	1,737

Total number of doping controls: the top five

- 1 Cycling
- 2 Skating
- 3 Athletics
- 4 Swimming
- 5 Football

The total number of 2,788 doping controls for Dutch sports and sports organisations represents an increase of 15.4% by comparison with 2015, when there were 2,416 doping controls.

Table 3.3: Overview of the number of doping controls in 2016

Sport	National Pr	National Programme (Netherlands)			Conducted for third parties			Total conducted		
	Urine	Blood	Total	Urine	Blood	Total	Urine	Blood	Total	
Athletics	188	44	232	28	1	29	216	45	261	
Car racing	3	0	3	0	0	0	3	0	3	
Badminton	5	0	5	15	0	15	20	0	20	
Basketball	41	0	41	12	0	12	53	0	53	
Billiard sports	11	0	11	0	0	0	11	0	11	
Bobsleigh	3	0	3	0	0	0	3	0	3	
Boxing	35	0	35	0	0	0	35	0	35	
Bowling	6	0	6	0	0	0	6	0	6	
Bridge	0	0	0	0	0	0	0	0	0	
Cricket	8	0	8	0	0	0	8	0	8	
Crossfit	0	0	0	6	0	6	6	0	6	
Curling	6	0	6	0	0	0	6	0	6	
Draughts	0	0	0	0	0	0	0	0	0	
Dance sport	6	0	6	0	0	0	6	0	6	
Darts	7	0	7	8	0	8	15	0	15	
Floorball and unihockey	4	0	4	0	0	0	4	0	4	
Disabled sports	3	0	3	0	0	0	3	0	3	
Golf	6	0	6	5	0	5	11	0	11	
Gymnastics	41	0	41	0	0	0	41	0	41	

Sport	National Pro	gramme (N	etherlands)		ed for thir	•		tal conduc	ted
	Urine	Blood	Total	Urine	Blood	Total	Urine	Blood	Total
Handball	30	0	30	0	0	0	30	0	30
Archery	12	0	12	0	0	0	12	0	12
Equestrian sports	19	0	19	9	0	9	28	0	28
Hockey	44	0	44	16	0	16	60	0	60
Baseball and softball	37	0	37	12	0	12	49	0	49
Ice hockey	30	0	30	0	0	0	30	0	30
Indoor and outdoor bowls	0	0	0	0	0	0	0	0	0
Boules	0	0	0	0	0	0	0	0	0
Judo	53	0	53	1	0	1	54	0	54
Karate Do	15	0	15	10	0	10	25	0	25
Mountaineering and climbing	10	0	10	0	0	0	10	0	10
Korfball	26	0	26	10	0	10	36	0	36
Strength sports	63	0	63	0	0	0	63	0	63
Air sports	0	0	0	0	0	0	0	0	0
Motor sport	9	0	9	0	0	0	9	0	9
Underwater sports	6	0	6	0	0	0	6	0	6
Eastern martial arts	3	0	3	12	4	16	15	4	19
Life-saving	7	0	7	20	0	20	27	0	27
Rowing	115	0	115	0	0	0	115	0	115
Roller sports	8	0	8	0	0	0	8	0	8
Rugby	47	0	47	0	0	0	47	0	47
Skating	213	86	299	104	18	122	317	104	421
Chess	0	0	0	0	0	0	0	0	0
Fencing	7	0	7	4	0	4	11	0	11
Shooting	3	0	3	0	0	0	3	0	3
Skiing	7	0	7	3	0	3	10	0	10
Angling	0	0	0	2	0	2	2	0	2
Squash	14	0	14	0	0	0	14	0	14
Taekwondo	7	0	7	2	0	2	9	0	9
Table tennis	9	0	9	6	0	6	15	0	15
Tennis	15	0	15	1	0	1	16	0	16
Tug of war	0	0	0	5	0	5	5	0	5
Triathlon	42	17	59	27	0	27	69	17	86
Football	110	0	110	106	0	106	216	0	216

Sport	National Programme (Netherlands)			Conducted for third parties			Total conducted		
	Urine	Blood	Total	Urine	Blood	Total	Urine	Blood	Total
Volleyball	32	0	32	6	0	6	38	0	38
Water skiing	6	0	6	0	0	0	6	0	6
Water sports	11	0	11	10	0	10	21	0	21
Cycling	311	65	376	190	0	190	501	65	566
Swimming	123	32	155	74	0	74	197	32	229
Total	1817	244	2061	704	23	727	2521	267	2788

Table 3.4: Number of in-competition and out-of-competition controls in 2016

Sport		In competition			Out of competition		
	Urine	Blood	Total	Urine	Blood	Total	
Athletics	76	0	76	140	45	185	
Car racing	3	0	3	0	0	0	
Badminton	16	0	16	4	0	4	
Basketball	36	0	36	17	0	17	
Billiard sports	11	0	11	0	0	0	
Bobsleigh	0	0	0	3	0	3	
Boxing	22	0	22	13	0	13	
Bowling	6	0	6	0	0	0	
Bridge	0	0	0	0	0	0	
Cricket	8	0	8	0	0	0	
Crossfit	6	0	6	0	0	0	
Curling	0	0	0	6	0	6	
Draughts	0	0	0	0	0	0	
Dance sport	6	0	6	0	0	0	
Darts	15	0	15	0	0	0	
Floorball and unihockey	4	0	4	0	0	0	
Disabled sports	0	0	0	3	0	3	
Golf	8	0	8	3	0	3	
Gymnastics	10	0	10	31	0	31	

Sport		In competition	n	Out of competition		
	Urine	Blood	Total	Urine	Blood	Total
Handball	16	0	16	14	0	14
Archery	6	0	6	6	0	6
Equestrian sports	8	0	8	20	0	20
Hockey	20	0	20	40	0	40
Baseball and softball	40	0	40	9	0	9
Ice hockey	8	0	8	22	0	22
Indoor and outdoor bowls	0	0	0	0	0	0
Boules	0	0	0	0	0	0
Judo	20	0	20	34	0	34
Karate Do	10	0	10	15	0	15
Mountaineering and climbing	8	0	8	2	0	2
Korfball	30	0	30	6	0	6
Strength sports	55	0	55	8	0	8
Air sports	0	0	0	0	0	0
Motor sport	0	0	0	9	0	9
Underwater sports	6	0	6	0	0	0
Eastern martial arts	6	0	6	9	4	13
Life-saving	25	0	25	2	0	2
Rowing	20	0	20	95	0	95
Roller sports	8	0	8	0	0	0
Rugby	32	0	32	15	0	15
Skating	209	11	220	108	93	201
Chess	0	0	0	0	0	0
Fencing	9	0	9	2	0	2
Shooting	3	0	3	0	0	0
Skiing	3	0	3	7	0	7
Angling	2	0	2	0	0	0
Squash	14	0	14	0	0	O
Taekwondo	2	0	2	7	0	7

Sport	In competition			Out of competition		
	Urine	Blood	Total	Urine	Blood	Total
Table tennis	6	0	6	9	0	9
Tennis	6	0	6	10	0	10
Tug of war	5	0	5	0	0	0
Triathlon	50	0	50	19	17	36
Football	148	0	148	68	0	68
Volleyball	16	0	16	22	0	22
Water skiing	6	0	6	0	0	0
Water sports	4	0	4	17	0	17
Cycling	349	0	349	152	65	217
Swimming	111	0	111	86	32	118
Total	1488	11	1499	1033	256	1289

Whereabouts filing failures

A total of 29 whereabouts filing failures were recorded in 2016. Of those failures, 23 are definitive and, as this annual report was being drafted, there were procedures ongoing relating to six whereabouts filing failures. Whereabouts failures can be either Missed tests (when the athlete is not present at the stated location in the *one hour time slot*) or Filing failures (the failure to supply adequate whereabouts information correctly and in good time).

The number of whereabouts failures increased in 2016 by comparison with 2015 (when there were 24 cases). In 2016, six athletes were found to have two whereabouts filing failures in a twelve-month period. No athletes were found to have made a third whereabouts filing failure in a period of twelve months.

The leading numbers of *definitive* whereabouts failures were accounted for by the Athletics Union, the Swimming Association, the Gymnastics Union, the Judo Association and the Cycling Union. It should be pointed out that associations with a large number of athletes in the Registered Testing Pool are more likely to have athletes who fail to meet whereabouts obligations. In 2016, the Athletics Union and the Swimming Association were the organisations with most whereabouts filing failures; the organisation at the top of this list in 2015 was the Cycling Union.

Doping controls that did not take place

In addition to the controls that did not take place due to a missed test, 93 planned doping controls failed to take place in 2016 for other reasons:

1) athletes/teams were absent from events and competitions and central training sessions which they were expected to attend;

- 2) the doping control official went to a training session or competition, and it then emerged that the training session or competition had been cancelled or moved;
- 3) a doping control official (DCO) visited an address that had been reported and the athlete proved to be absent during the control window or was not/no longer resident at the address (in the case of doping controls for which the athlete in question was not required to supply whereabouts information).

These included both out-of-competition and in-competition controls. When doping controls were not conducted, efforts were made to find an appropriate moment as quickly as possible thereafter to conduct the control in question or to schedule a comparable event.

Sport-specific analyses

On the basis of a risk analysis, the relevant standards of the World Anti-Doping Code (WADC) for sports and sports disciplines include a specific calculation for the minimum percentages required for additional laboratory analyses. The Technical Document Sport Specific Analysis (TDSSA) includes, as a part of the International Standard for Testing and Investigations, binding provisions that apply to National Anti-Doping Organisations, including the Doping Authority.

The analyses relate to, among other things, erythropoietin-like substances and growth hormones. The minimum number of specific additional analyses is expressed as a percentage of the number of doping controls conducted in a sport (percentage of additional analyses in addition to the standard analysis package). The mandatory TDSSA was evaluated in 2016 and there was more fine-tuning of the required percentages. The sport-specific analyses in 2016 took the planned changes that will come into effect in 2017 into account to some extent. In part as a result, the number of additional sport-specific analyses was significantly higher than in 2015.

In 2016, the analyses of 47% of the 2,061 controls in the national programme checked the urine and/or blood samples for Erythropoiesis Stimulating Agents (ESAs). This is a substantial increase by comparison with 2015 (34%). The ESA analyses were made in a range of relevant branches of sport.

Numbers of ESA analyses in the national control programme: the top five

- 1 Cycling
- 2 Skating
- 3 Athletics
- 4 Swimming
- 5 Rowing

The urine and/or blood samples collected in 39% of 2,061 controls were also analysed for the presence of human growth hormone (GH) or Growth Hormone Releasing Factors (GHRFs). This was done for a range of branches of sport.

Numbers of GH-GHRF analyses in the national control programme: the top five

- 1 Cycling
- 2 Athletics
- 3 Skating
- 4 Swimming
- 5 Football

In addition (as in 2015), various samples were also analysed for insulin and/or testosterone. Furthermore, large numbers of blood samples were taken to check for growth hormone, ESAs and Haemoglobin-Based Oxygen Carriers (HBOCs). In 2016, some of the urine samples were stored to allow for the possibility of repeat analyses at some time in the future.

Unannounced doping controls

The total percentage of out-of-competition doping controls increased significantly by comparison with 2015 to 46%. This increase was mainly due to the increased number of out-of-competition doping controls in the context of the national control programme and the additional programme of NOC*NSF, all of which was conducted out of competition. Almost all doping controls were conducted without prior warning for the athlete ('no advance notice testing'). The only exceptions were doping controls triggered by a record or limit; in these cases, the initiative for the control resides with the athlete or the athlete's association.

Target controls

The Doping Authority has the authority to conduct target controls. These controls are conducted in specific cases and on the basis of criteria determined beforehand. Target controls took place throughout the sports spectrum, with the emphasis being on a few specific sports and individuals, and controls also being conducted on occasion at the level just below the very top. The Intelligence & Investigations chapter contains more information about this area.

Athlete Biological Passport

The Athlete Biological Passport (ABP) was launched as a project and it is now an integral part of the Doping Authority's national doping control programme. In this project, several blood samples are taken from selected athletes from a range of sports for the purposes of establishing longitudinal profiles. The number of controls for which the results were included in the ABP were increased in the national programme in 2016. Moreover, the test frequency was raised when that was needed to established the desired profile. A total of 152 blood samples were collected for the purposes of the Athlete Biological Passport. These blood controls were conducted in the following sports: athletics, skating, triathlon, cycling and swimming. The number of ABP controls more than doubled by comparison with 2015, when 67 samples were taken.

Mobile doping control station

The Doping Authority has a mobile doping control station at its disposal with facilities for collecting blood samples. It can be used at locations where it is difficult to establish a permanent doping control station or where doping control stations do not comply with the relevant criteria. The mobile doping control station was used in 2016 for, among other sports, outdoor sports such as cycling and equestrian sports, and for climbing and mountaineering.

Findings

In 2016, 88 files with adverse (analytical and non-analytical) findings were registered with the Doping Authority. In 86 cases, the adverse findings related to A urine samples; the finding was non-analytical in two cases.

The incidence of adverse findings (including non-analytical findings) – 88 in 2,788 controls – was 3.2%. Adverse findings accounted for 3.5% of the urine controls conducted (excluding the blood controls). The first percentage was 2.3% lower than in 2015 (5.5%), primarily because of a decline in the number of files for which specific follow-up investigations were required (see below).



Files for which specific follow-up investigations were required

Of the 86 registered files with adverse findings for the A urine samples, 61 involved atypical findings for which specific follow-up investigations were required with the aim of determining whether there had been a possible doping violation. This was 43% less than in 2015 (107 files). This decrease is a result of the introduction of the use of ADAMS by the Doping Authority in 2016 and the access to global longitudinal information about athletes, as well as the introduction of the steroids passport.

Fifty cases involved a testosterone/epitestosterone ratio higher than 4. There were also eleven cases of an adverse passport finding. In all these cases, the Doping Authority initiated the isotope ratio mass spectrometry analysis (IRMS) and/or additional doping controls in 2016. The follow-up investigations showed that the atypical result was not attributable to exogenous factors and the Doping Authority therefore classified the results as non-adverse findings.

Files closed on the grounds of therapeutic use exemptions

In three cases, it was found that a therapeutic use exemption had already been granted prior to the doping control for the therapeutic use of the prohibited substance found. These files were therefore closed and did not result in proceedings with the disciplinary committee of the sports association in question.

In four cases, before the binding result was reported to the association by the Doping Authority, the TUE Committee granted an exemption after all for the use of the substance found (the athletes in question were not in the Doping Authority's Registered Testing Pool). These files were therefore closed and did not result in proceedings with the sports association in question.

Table 3.5: Adverse analytical results in 2016 justified by a therapeutic use exemption and/or closed by

the Doping Authority for another reason; situation at time of closure of the annual report (31 January 2016)

Sport	Finding/substance	Number	Subsequent action
Bowling	hydrochlorothiazide	1	therapeutic use exemption granted after the event (not TP), file closed
Darts	atenolol	1	therapeutic use exemption granted after the event (not TP), file closed
Korfball	prednisone and prednisolone	1	therapeutic use exemption present, file closed
	clomiphene/clomiphene		
Power lifting	metabolite	1	therapeutic use exemption granted after the event (not TP), file closed
Cycling	metabolite of methylphenidate	1	therapeutic use exemption present, file closed
Swimming	metabolite of methylphenidate	1	therapeutic use exemption present, file closed
Swimming	metabolites of tamoxifen	1	therapeutic use exemption granted after the event (not TP), file closed
Total		7	

Classification according to the WADA Prohibited List

Upon classification at the group level in accordance with the 2016 WADA Prohibited List, a prohibited substance (or metabolite of such a substance), a high T/E ratio, or an atypical steroid profile was found a total of 110 times in the 86 adverse A urine samples referred to above.

One urine sample contained seven prohibited substances and/or metabolites; one sample contained five prohibited substances and/or metabolites, two samples contained three prohibited substances and/or metabolites and ten samples contained two prohibited substances and/or metabolites.

There were findings in the category of anabolic substances in 79 of the 110 cases. On six occasions, these were glucocorticosteroids, and hormone and metabolic modulators and/or metabolites were found on seven occasions. Peptide hormones, growth factors, related substances and/or metabolites were found twice. The numbers in the last three categories were higher than in 2015.

The percentage in the category of anabolic substances fell by comparison with 2015 by approximately 29%. This fall was attributable to the lower number of urine samples with a T/E ratio exceeding 4 and/or with an atypical steroid profile. However, the number of substances found in this category more than tripled by comparison with 2015.

Table 3.6: Detected substances and initial adverse findings

Detected substances	2015	2016
Anabolic substances	112	79
(T/E ratio >4)	(103)	(50)
(Atypical steroid profile)	(4)	(11)
(substances found)	(5)	(18)
Peptide hormones, growth factors and related substances	0	2
Beta-2 agonists	1	0
Hormone and metabolic modulators	1	7
Diuretics / masking substances	8	5
Stimulants	13	9
Cannabinoids	2	1
Glucocorticosteroids	4	6
Beta-blockers	2	1
Total	143	110

Cases resulting in proceedings

In two cases in 2016, the Doping Authority made a proposal regarding a sanction to the athletes in question before initiating proceedings with the sports associations in question. Both athletes accepted the proposal.

In 2016, the Doping Authority initiated proceedings with sports associations in 14 cases (2015: 17) in ten different sports because of possible violations of the regulations of the sports association involved. A total of 14 different people were involved (13 men and 1 woman). Power lifting accounted for the highest number of cases (three).

In addition, the Doping Authority handled three violations noted by NADO Flanders and one violation noted by the French NADO (AFLD), bringing the total number of disciplinary procedures in which the Doping Authority was involved to 20.

The percentage of cases in which proceedings were initiated pursuant to controls conducted on Dutch territory by the Doping Authority as part of the national programme was 0.8% (16 cases subject to national anti-doping regulations resulting from

2,061 doping controls conducted as part of the national programme). This percentage is below the stated target for 2016 of a maximum of $1%$ positive cases in Dutch athletes.

Table 3.7: Adverse analytical findings and non-analytical findings in 2016; situation when the annual report was closed (IF = International Federation, ISR = Institute for Sports Law)

Sport	Finding/substance	Number	Action taken by sports organisation
Athletics	metabolites of stanozolol	1	sanction proposed by Doping Authority accepted: four- year suspension
Athletics	human chorionic gonadotropin (hCG)	1	doping control and result management by NADO Flanders
Athletics	prednisone and prednisolone	1	result management by IF
Basketball	hydrochlorothiazide	1	a therapeutic use exemption was granted after proceedings were initiated; the sports association was requested to close the file
Basketball	metabolite of tetrahydrocannabinol (THC)	1	proceedings instituted with sports association
Billiard sports	hydrochlorothiazide/metabolites of hydrochlorothiazide	1	a therapeutic use exemption was granted after proceedings were initiated; the sports association was requested to close the file
Bodybuilding	Clenbuterol, oxandrolone/metabolites of oxandrolone, metabolite of tamoxifen	1	doping control and result management by NADO Flanders
Bowling	methyleendioxymetamphetamine/metabolites of methyleendioxymetamphetamine (MDMA)	1	ISR Appeals Committee: two-year suspension
Darts	evasion	1	proceedings instituted with sports association
Baseball	prednisone and prednisolone	1	ISR disciplinary committee: two-year suspension
Ice hockey	metabolite of drostanolone	1	result management by Doping Authority
Ice hockey	19-norandrosterone, 19-nore!!tiocholanolone	1	doping control and result management by NADO Flanders
Korfball	cocaine/metabolites of cocaine	1	proceedings instituted with sports association
Power lifting	metabolite of stanozolol	1	ISR Appeals Committee: four-year suspension
Power lifting	metabolite of stanozolol	1	ISR disciplinary committee: four-year suspension
Power lifting	metabolite of stanozolol	1	ISR Appeals Committee: four-year suspension
Skating	recombinant human erythropoetin	1	proceedings instituted with sports association
Cycling	metabolite of methylphenidate	1	doping control and result management by AFLD
Cycling	administration	1	ISR disciplinary committee: lifetime ban
Swimming	19-norethiocholanolone, nandrolone, boldenone (and metabolites), metabolite of stanozolol, metabolites of tamoxifen	1	sanction proposed by Doping Authority accepted: exclusion: 3 years and 3 months
Total		20	

Chapter 4 Intelligence & Investigations

Introduction

Pursuant to Article 20 of the Dutch National Doping Regulations, the Doping Authority investigates possible doping violations both in the Netherlands and other countries. *Intelligence & Investigations* is one of the resources used for this purpose. The Doping Authority has an Intelligence Officer. The work of the Intelligence Officer includes collating information in the context of investigations of doping violations, drafting reports, conducting interviews and taking statements, organising and processing confidential data in an automated system, and the development of procedures and protocols. The current World Anti-Doping Code and the International Standard for Testing and Investigations (ISTI) refer explicitly to Intelligence & Investigations as a means of tackling the problem of doping. To establish a clearer picture of the extent of that problem and to make sound decisions about the approach to, and investigation of, doping violations, the Doping Authority is following the example of many investigation services by working with a more intelligence-based approach.

Intelligence-based approach

Adopting an intelligence-based approach allows the Doping Authority to optimise the implementation of its enforcement and investigation role. The intelligence process consists of four phases – collection, registration, working up and analysis – which have to be implemented meticulously. Much of the relevant information is collected during doping controls. Information such as observations and findings from DCOs and other Doping Authority staff is recorded in secure systems. These data are worked up and interpreted. The information is then combined with other existing intelligence and data (scientific and otherwise). This can help to produce insights that can be used by the Enforcement & Investigations department for the purposes of the planning and implementation of doping controls.

The collected and analysed intelligence can be indispensable for the acquisition of more in-depth and supplementary information and it can serve as input for other working procedures at the Doping Authority.

Results in 2016

Intelligence was collected and worked up in the context of a range of disciplinary proceedings in 2016. That intelligence was used in the bi-weekly case management consultations and, where necessary, in disciplinary proceedings. In addition, intelligence was collected and analysed for the purposes of planning doping controls (intelligence-driven testing). Through to the end of August 2016, there was an additional emphasis on doping controls for the group of athletes in the Registered Testing Pool, and the athletes who had qualified or had a good chance of qualifying for the Olympic or Paralympic Games in Rio de Janeiro.

Closed cases

A Dutch professional road cyclist received a doping ban of four years in Belgium for the use of the prohibited substances nandrolone and amphetamine. During the appeal in Belgium in 2016, the athlete stated that his father had administered nandrolone on four occasions when the athlete was still a minor. The athlete stated that he had thought that these were vitamin injections. The appeal resulted in a reduction of the sanction for this athlete by the Belgian disciplinary authority to a

period of two years. Pursuant to the decision of the appeal committee, the Doping Authority initiated an investigation. Additional information for the investigation was obtained by the Doping Authority through the Vertrouwenspunt Sport (the Confidential Phone Service of the NOC*NSF). After the completion of the investigation, the KNWU instigated proceedings against the father, a KNWU member, for the administration of doping to a minor. The Doping Authority reported this as a case of child abuse to the Dutch Youth and Family Foundation because the athlete was a minor when the substance was administered by his father. The ISR arrived at a decision in this case on 4 October 2016. The father received a lifetime ban. The decision was published by the KNWU on its website.

Case of possible identity fraud

Pursuant to an investigation beginning in 2015 of a possible doping violation, the suspicion arose that a criminal offence had been committed that was not a doping violation. When suspicions of this kind arise, the Doping Authority is obliged to share the information with the authorities that are competent to investigate matters of this kind. In this case, the report containing the relevant findings was supplied to the Dutch Ministry of Security & Justice. The investigation report containing the relevant findings was supplied to the immigration department of the police for further investigation and to the Dutch Immigration and Naturalisation Service (IND). The IND then conducted further investigations that were completed in mid-2016.

Doping Hotline

A Doping Hotline was established in 2016 based on the following principles:

- reporting on the website www.dopingautoriteit.nl;
- low threshold for reporting;
- the registration, the follow-up and the confidentiality of the incoming reports should be safeguarded, as well as the privacy of the person submitting the report.

The Doping Hotline was opened on 1 July 2016 for athletes, support staff and the general public. Visitors to the website www.dopingautoriteit.nl can use a 'quick link' to submit reports or obtain information about the procedure and the subjects for reporting. People submitting reports can complete a web form and, if they wish, report on a completely anonymous basis. Technical measures have been taken to ensure that anonymity is safeguarded as much as possible. Follow-up to reports received by the Doping Hotline are coordinated by the Intelligence Officer and evaluated periodically.



Reports received

Twenty-five reports about possible doping violations were received by the Doping Authority in 2016. That is three times the number of reports received in 2015.¹ The reports related to thirteen different sports and they came from different sources: athletes, coaches, sports associations, Vertrouwenspunt Sport, Doping Hotline and foreign NADOs. The reports were made by telephone, in writing and in emails. Thirteen reports related to suspicions of doping, two to suspicions of manipulation, two to suspicions of administration, one case to a suspicion of facilitating doping, two to suspicions of trafficking and five to conduct that did not constitute a doping violation (such as the use of drugs out of competition without the intention of enhancing performance).

¹ Number of reports in 2015: 8

All reports were investigated and the results of those investigations were discussed in the discussions about cases under investigation in the Enforcement & Investigations department. On the basis of those discussions, testing strategies were drawn up where relevant for each case and decisions were made about the focus of subsequent intelligence gathering.

The sharing of information and collaboration with investigation and/or government services/other ADOs

The I&I information supplied by the Doping Authority is classified using an international system that rates the information in terms of the reliability of the information and the reliability of the source. In 2016, we provided information to the Health Care Inspectorate (IGZ), the Food and Consumer Product Safety Authority (VWA), the police, the Immigration and Naturalisation Service (IND), the Youth and Family Foundation, the Belgian Police (Hormones cell), and to other ADOs (UKAD, NADO Flanders) and the IAAF. There were exploratory talks last year in the context of future collaboration or exchanges of information with several parties, including the NVWA, the Public Health Inspectorate and the Fiscal Intelligence and Investigation Department (FIOD).

Chapter 5 Disciplinary proceedings

Introduction

In the Netherlands, the disciplinary proceedings relating to possible doping violations are the responsibility of the sports associations. A number of sports associations have their 'own' disciplinary and appeals committees but a large, and increasing, number of associations call in the Institute for Sports Law (ISR), which now makes decisions in doping proceedings on behalf of approximately 80% of the associations.

The position of the Doping Authority in disciplinary procedures

The disciplinary and appeals committees arrive at their decisions independently of the Doping Authority. This does not mean that the Doping Authority is not closely involved in disciplinary proceedings relating to possible doping violations. Clearly, the Doping Authority's task is to ensure that disciplinary proceedings for doping cases in the Netherlands are conducted correctly in accordance with the World Anti-Doping Code and Dutch doping regulations based on that code. The Doping Regulations of the sports associations and the ISR describe and determine the various tasks incumbent upon the Doping Authority in disciplinary procedures. Those tasks involve, on the one hand, supporting and advising the disciplinary bodies in the interpretation and application of the doping regulations and, on the other, correcting decisions that do not comply with those regulations. The auxiliary role is seen primarily in the contributions made by the Doping Authority during the disciplinary procedures: the Doping Authority is cognisant of the case, states written arguments in which all the relevant regulatory factors are discussed and explained, and also speaks at hearings it attends.

The corrective role is seen primarily in the right to appeal that the Doping Authority has in all doping cases, both with national appeals committees and with the Court of Arbitration for Sport (CAS) in Lausanne. Furthermore, the Doping Authority is competent to initiate proceedings with the disciplinary committee of an association independently without calling in the board of the association. The Doping Authority did not submit any appeals to the CAS in 2015. The CAS did rule in a case in which the Doping Authority had submitted an appeal in 2014.

During the year under review, the Doping Authority did submit written arguments in all disciplinary proceedings in the first instance, with in some cases additional arguments when required by the subsequent proceedings. The Doping Authority attended almost all the hearings in these proceedings. When athletes and/or associations appealed against decisions, supplementary statements of arguments were written in all cases.

Reporting to WADA and International Sports Federations

The Doping Authority reports on the disciplinary proceedings in doping cases to WADA, which is also entitled to appeal against decisions in those cases. The reports take the form of sending the written decision to WADA, answering supplementary questions upon request, and producing supplementary documents and translations of relevant parts of a file. The Doping Authority also reports upon request to international sports federations but only if the Dutch sports association in question does not do so or fails to do so in full. International federations are also entitled to make appeals in Dutch doping proceedings but no decision was given in 2016 in the case in which an international federation appealed against a decision made by a Dutch disciplinary body.

Reporting on disciplinary decisions

With effect from 2013, the Doping Authority reports on disciplinary proceedings in doping cases in its own annual report. In that way, the Doping Authority will be reporting – as described above – on procedures in which the Doping Authority is indeed very closely involved but for which the primary responsibility resides elsewhere (in other words, with the sports associations). The decision to proceed in this way was based primarily on the dissolution of the Doping Affairs Audit Committee, a board committee of the NOC*NSF, which published periodical reports prior to 2013 about disciplinary proceedings relating to all cases of doping in the Netherlands.

The table below lists all ten decisions made by the Dutch disciplinary and appeals bodies in doping proceedings during 2016 (inclusion in the table depends upon the date of the decision).

Table 5.1: Disciplinary decisions in doping proceedings made by Dutch disciplinary bodies

			Year of	
Sport	Finding/substance	Decision	violation	Details
				Decision in appeal after appeal made by
Boxing	Metabolite of stanozolol	4 years	2015	Doping Authority
				Decision in appeal after appeal made by
Bowling	Metabolite of MDMA	2 years	2016	athlete
Baseball	Prednisone and prednisolone	2 years	2016	
Power				Decision in appeal after appeal made by
lifting	Metabolite of stanozolol	4 years	2016	athlete
Power				
lifting	Metabolite of stanozolol	4 years	2016	
Power				
lifting	Metabolite of stanozolol	4 years	2016	Appeal made by athlete
Rugby	Metabolite of cannabis	2 years	2015	
Skiing	Evasion	4 years	2015	
				Decision in appeal after appeal made by
Football	Metabolite of cannabis	9 months	2015	athlete
Cycling	Administration	Lifetime ban	2015	

Where decisions were made in the same case in 2015 in both the first instance and in appeal, the report includes only the appeal decision. If a decision was made pursuant to an appeal, this is stated in the final column together with an indication of which party or parties submitted the appeal. If a doping violation was transferred by an organisation from another country to the Netherlands for disciplinary proceedings, this is also stated.

Finally, this chapter concludes with a table listing four decisions by foreign disciplinary bodies involving athletes with the Dutch nationality.

Table 5.2: Disciplinary decisions in doping proceedings of foreign disciplinary bodies in which the person concerned had Dutch nationality

			Year of	
Sport	Finding/substance	Decision	violation	Details
Bodyb	Clenbuterol, oxandrolone/metabolites of	4 years	2016	Disciplinary Committee of NADO Flanders
uilding	oxandrolone, metabolite of tamoxifen			
Cycling	Nandrolone, amphetamines	2 years	2015	Disciplinary Council of NADO Flanders. Decision
		-		in appeal after appeal made by athlete
Cycling	Evasion	1 year	2015	Disciplinary Council of NADO Flanders. Decision
		,		in appeal after appeal made by athlete

Chapter 6 International Affairs

WADA

General

Over the course of 2016, there were many, wide-ranging, contacts with WADA. There were almost daily consultations about the correct management of Dutch doping violations, which is monitored by WADA. Collaboration with WADA is close and structural.

Prohibited list

Like every year, a <u>response to the draft version of the prohibited list</u> was sent to WADA in the summer. The Doping Authority coordinates the Dutch response on behalf of the NOC*NSF, the NOC*NSF Athletes Committee and the Ministry of Health, Welfare and Sport. Once again, it was pointed out that the prohibited list must have a sound practical and scientific basis. We also participated in a meeting of the scientific advisory group in the context of the Council of Europe convention on this subject.

WADA Education Committee

Bart Coumans has been appointed to the WADA Education Committee for three years (2016-2018). This committee met on 31 March and 1 April in Montreal. In addition, there was a teleconference on October 6 for the funding of research projects as part of the WADA Social Science Research Programme.

WADA Athletes Committee

Chiel Warners, the chair of the NOC*NSF Athletes Committee and a member of the NOC*NSF board, was appointed – in part pursuant to his nomination by the Doping Authority – to the WADA Athletes Committee for a period of three years (2017-2019). Chiel Warners and the Doping Authority have made agreements about exchanges of information and support from the Doping Authority.

WADA Prohibited List Expert Group

Cees-Rein van den Hoogenband, the chief medic of NOC*NSF and TeamNL was – in part pursuant to his nomination by the Doping Authority – appointed to the Expert Group that formulates advice and recommendations annually for the WADA board about the global Prohibited List. This appointment is – for the time being – for one year (2017). Cees-Rein van den Hoogenband and the Doping Authority have made agreements about exchanges of information and support from the Doping Authority.

Social Science Research

In cooperation with the Doping Authority, Radboud University Nijmegen is conducting a two-year study of the effect of ethical training on anti-doping attitudes among up-and-coming athletes. This study was launched officially on 1 April 2016. A pilot project was conducted among up and coming athletes in 2016, the first steps were taken towards the development of the interventions and athletes were recruited for the study. The actual study will begin in 2017.

WADA – ADO Symposium

The Doping Authority attended the annual WADA - ADO Symposium in Lausanne. The symposium covered a wide range of topics and there were a large number of other meetings and events in the fringes of the symposium. The Doping Authority was a member of a panel on cooperation between International Federations and National Anti-Doping Organisations. The ADO Symposium has evolved into the annual event at which most of the world's anti-doping organisations meet to discuss and promote developments in the field.

Sociological research

As part of WADA's 'Sociological Research Programme', a research proposal was submitted and approved in 2013 in collaboration with four other NADOs with supervision from the University of Potsdam. The study focuses on potential performance indicators for NADOs. The researchers from Potsdam have run into delays and so the project had not yet been completed at the end of 2016. On behalf of all the NADOs concerned, the Doping Authority plays an advisory and coordinating role.

International collaboration on Intelligence & Investigations

The international Intelligence & Investigations working group established in 2014 at the initiative of WADA continued its work in 2016. The group consists mainly of intelligence officers and/or intelligence analysts. At the meetings organised in previous years at the initiative of WADA, the members of the group informed one another about new developments and initiatives relating to Intelligence & Investigations and exchanged the latest information. A range of cases were also discussed and agreements were made about the collection and exchange of intelligence relating to doping investigations and international collaboration on those investigations. Because not all anti-doping organisations are structured on the same lines and/or have the same statutory competencies, the group's work includes a very strong emphasis on how the information is used and the legal implications of sharing and using information. The smaller group has been established on the basis of the international Intelligence & Investigations working group. That smaller group consists of leading organisations that have extensively structured the Intelligence & Investigations process. The group consists of intelligence officers from the Doping Authority, NADA, AEPSAD, ADN, USADA, UKAD, CADF and WADA. WADA began in 2016 on the implementation of a Whistleblower Policy (WBP) and the implementation of software to record intelligence so that it can be linked and accessed at the global level. The intention is to share experience with the WBP and the software with the international I&I members.

WADA NADO Working Group

The Doping Authority is represented on this working group, which advises on developments at WADA that affect the interests and the position of NADOs. The views and opinions of the working group are reported to the Foundation Board and many of them are included in the policies of WADA. The working group met twice in 2016, once in Montreal and once in London.

WADA Think Tank

The doping problems in Russia and in international athletics, which emerged in part due to the efforts of WADA, also led to many questions about how WADA had acted in this respect and about the WADA administrative structure. There is broad consensus that the present WADA administrative structure (with a board consisting of sports organisations and governments on a 50/50 basis) merits scrutiny. In order to accelerate the discussion in this respect, WADA established a Think Tank on which the Doping Authority was also represented. The Think Tank organised a day for discussing a range of issues on the basis of various presentations.

WADA Compliance Questionnaire Working Group

In the years to come, WADA will be focusing extensively on the extent to which the various stakeholders (Anti-Doping Organisations) comply with the requirements set out in the World Anti-Doping Code. WADA has established a compliance team for this purpose. An important instrument in this area is a detailed questionnaire for the assessment of compliance by the ADOs. The Doping Authority was involved in intensive collaboration on the development of this questionnaire.

COUNCIL OF EUROPE

CAHAMA and Monitoring Group

Once again in 2016, the Doping Authority was very active on the international stage. The activities of the Doping Authority target two objectives in this area: the Doping Authority wants to collect up-to-date current knowledge and to influence the international anti-doping policy.

We attended three meetings of the CAHAMA (Ad hoc European Committee for the World Anti-Doping Agency). The CAHAMA mission is:

- 1. To examine the issues concerning relations between the Council of Europe, its Member States and the World Anti-Doping Agency (WADA), and to decide on a common position, when possible, on these issues;
- 2. To draw up, if necessary, opinions for the Committee of Ministers of the Council of Europe on these issues, including the budgetary elements;
- 3. To periodically revise the mandate of members of the WADA Foundation Board appointed by the Council of Europe. The work of CAHAMA in 2016 focused mainly on decision-making pursuant to the publication of the reports of the Independent Commission and the Independent Person (in other words, the first McLaren report) on doping practices in Russia. In addition, the plans of WADA for a new testing method, including the associated sanctions, with respect to compliance with the Code, and the plans of the IOC for the establishment of an Independent Testing Authority, were high on the agenda.

The Doping Authority also attended two meetings of the Monitoring Group, which focuses on monitoring the implementation of the Anti-Doping Convention of the Council of Europe, and developing and improving anti-doping systems and structures.

Advisory Groups

In the context of the 'Expert Group on Education' of the Council of Europe, the Doping Authority attended the meetings on 22-23 February (Bonn) and 12-13 October (Malta).

The Doping Authority also participated in the 'Advisory Group on Legal Issues' of the Council of Europe in Bonn on 24 February 2016 and the 'Advisory Group on Compliance' of the Council of Europe in Cyprus on 3 November 2016.

Monitoring visit

An evaluation chaired by the Doping Authority was conducted on behalf of the Council of Europe in 2016 of the anti-doping policy of the United Kingdom. Like the Netherlands, the United Kingdom has ratified the Anti-Doping Convention of the Council of Europe. Member states are free to submit a request to assess whether the country meets all the obligations under the Convention. The UK NADO asked for an evaluation of this kind. A team of experts talked to a range of stakeholders in the United Kingdom and subsequently reported to the Council of Europe.

Ad Hoc Expert Group on Independent Doping Panels

The Council of Europe wants to contribute to the independence of the disciplinary proceedings in doping cases and to the quality of the disciplinary proceedings. An Expert Group that included the Doping Authority was formed for that purpose. The Expert Group formulated a number of recommendations and presented them to the Council of Europe.

INADO

Institute for National Anti-Doping Organisations - iNADO

The Doping Authority joined iNADO immediately after this umbrella organisation was established in 2012. In 2016, iNADO continued to develop its role as the knowledge institute and the representative of the National Anti-Doping Organisations affiliated to it. The Doping Authority contributed in many ways to the work of iNADO and it has also been a member of the board since 2016. We attended the iNADO meeting in Lausanne preceding the WADA – ADO Symposium.

IADA

International Anti-Doping Arrangement - IADA

The Doping Authority was present at the annual meeting of this group of countries. In early 2016, South Africa decided to leave the arrangement, since when IADA has included ten countries. The present Arrangement will be in place from 2015 to 2018.

OTHER MATTERS

NADO Leaders Summits

After the publication of the second report on Russian doping practices (written by Richard McLaren, who was appointed as the Independent Person in this matter by WADA), a number of developed NADOs decided to meet to discuss the implications of this report. The first meeting took place in Copenhagen and the meeting ended with the issuing of a detailed statement on behalf of the thirteen NADOs present about the steps these NADOs deemed necessary to tackle the problems that had been identified. A second meeting followed in the autumn, this time in Bonn, to discuss developments since the first meeting. A press release was issued at the end of this meeting on behalf of the nineteen NADOs present on this occasion. The joint position was extensively quoted in media around the world and the influence on the policy of sports organisations is evident.

Erasmus Project FAIR

The Doping Authority is a partner in a three-year (2017-2019) project entitled 'Forum for Anti-Doping in Recreational Sports' (FAIR). The project was initiated by <u>Europe Active</u>. The focus is on improving prevention programmes in fitness/recreational sport and the regulation of sports nutrition supplements in European countries.

Chapter 7 Legal Affairs

Revision of National Doping Regulations

A new version of the World Anti-Doping Code entered into force on 1 January 2015. This Code is implemented in the Netherlands through the National Doping Regulations (NDR). The text of the NDR was adopted by individual associations or by the Institute for Sports Law (for associations affiliated to the ISR). The text was amended again in 2016 in response to the proposed introduction of the Dutch Anti-Doping Policy Implementation Act (Wuab). Although it is unclear when the Wuab will enter into force, it is certain that the Doping Authority will become an independent governing body (ZBO) when it does so. Since the new ZBO will carry out tasks that are – on the basis of the NDR – currently the responsibility of the present Doping Authority, it was necessary to introduce an amendment to the NDR in this respect to include references to the ZBO and its remit and competences.

This development associated with the new law meant that all the Dutch elite sports associations, as well as the ISR, had to amend their Doping Regulations in 2016.

The amended NDR also includes a number of additions that had proved desirable pursuant to the practical implementation of regulations since 1 January 2015.

Another new element in the NDR is the position of the prosecutor. A version of the NDR has been produced for sports associations who wish to draw on the services of a prosecutor. This version allows a prosecutor to take over a number of tasks from an association board. In doping proceedings, a prosecutor cannot decide not to prosecute and cannot propose settlements related to the acceptance of sanctions. These competences reside with the Doping Authority as the National Anti-Doping Organisation (NADO).

Contributions to doping proceedings

The involvement of the Doping Authority in disciplinary proceedings relating to doping is anchored in the NDR. This role consists primarily of submitting arguments in doping proceedings and attending hearings. The possibility of submitting arguments gives the Doping Authority the opportunity to discuss the file and the relevant provisions from the NDR and to respond to the defence put forward by the athlete or another person. The Doping Authority has submitted written arguments in all proceedings managed by disciplinary bodies in 2016, including appeals, followed in some cases by additional arguments. The Doping Authority was also present at hearings in almost all cases.

The Anti-Doping Policy Implementation Bill (Wuab)

The Anti-Doping Policy Implementation Bill (Wuab), together with the associated explanatory memorandum, was submitted to the Lower House of the Dutch Parliament on 19 September 2016. The Doping Authority made further contributions to the substance of this bill and the explanatory memorandum in 2016.

There was also a review of the impact of the switch from the current foundation structure of the doping authority to the new independent governing body, and of the impact of the implementation of, among other legislation, the General Administrative

Law Act (AWB), the Open Government (Public Access) Act (WOB; the future Open Government Act (Woo)) and the EU General Data Protection Regulation (which will come into force on 25 May 2018) on the ZBO.

Structural activities and operations

Our structural operations in 2016 included the provision of general legal services and support within the organisation. This involved preparing and reviewing contracts, letters, memoranda and policy memoranda, and advice for the various departments of the Doping Authority and management.

The structural activities in 2016 also included education and advice for sports associations and, in isolated cases, athletes with respect to the substance, operation and application of the Doping Regulations.

Chapter 8 Scientific research

The scientific activities of the Doping Authority consists of the following:

- a continuous survey of the scientific literature based on the identification of doping-related relevance;
- conducting and initiating research that serves the purposes of the national and international anti-doping policy; and
- the dissemination of scientific doping expertise both inside and outside the organisation.

Survey of scientific literature

To ensure it is informed about the latest developments, the Doping Authority keeps a close eye on new publications of doping-related scientific literature and saves copies of the relevant articles in its archives. Just over 130 relevant articles were added to these archives in 2016. All the articles are available in digital format and the most important are posted on the website www.doping.nl. In addition, a network with a range of scientists is constantly being maintained in order to keep up-to-date with the latest developments in all sorts of areas relevant to doping (Haematology, Cardiology, Endocrinology, Physiology, Sociology, Health Education, Ethics, Sports Medicine, Gene Therapy and Detection/analysis).

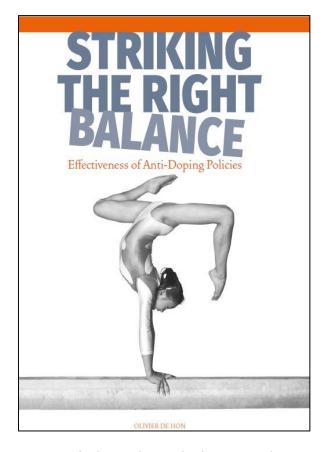
We acted as referees on three occasions for peer-reviewed scientific journals. In addition, we supervised, and assessed the work of, two students who looked in greater depth at a doping topic as a part of their Forensic Chemistry course at the University of Amsterdam.

The information from the available literature is actively distributed and serves as a basis for internal advice for the Enforcement & Investigations and Prevention departments, the legal officer (in the context of specific doping cases) and the CEO (for, among other things, his contacts with the press). This information is also used to answer specific scientific questions from people outside the organisation such as doctors, lawyers, journalists, students and other interested parties.

Scientific research

The doctorate thesis 'Striking the right balance - effectiveness of anti-doping policies' was successfully defended at Utrecht University in November 2016. It was the culmination of several years of research looking at the effectiveness of doping policy. The promotor was Maarten van Bottenburg, Professor of Sports Development. The thesis concluded that this important aspect of the national and international policy has received too little attention in recent years but that there are opportunities to assess the policy in both quantitative and qualitative terms. The thesis can be found on

http://www.doping.nl/filter/doc:4269/Striking%20the%20right%20balance%20%3A%20effectiveness%20of%20Anti-Doping%20Policies



Cover of Olivier de Hon's doctorate thesis

Other scientific affairs

There is a working party for exchanging experiences with seven other scientific members of staff working for the national anti-doping organisations of Switzerland, Norway, Denmark, Great Britain, Germany, the United States, and New Zealand. There are periodical telephone meetings about ongoing studies and specific scientific doping issues. There were three meetings in 2016. The chair revolves at each meeting.

Endocrinologist Pim de Ronde has set up a polyclinic in the Spaarne hospital in Haarlem (the former Kennemer Gasthuis) targeting people with health problems caused by anabolic steroids. The Doping Authority has an advisory role. The polyclinic continued work in 2016 on a longitudinal study in which 100 users of (among other things) anabolic steroids will be studied

during and after their course of steroids. The study, which is known as the HAARLEM study (health risks of anabolic androgen steroid use by male amateur athletes), is primarily funded by private sources from the Spaarne hospital and it is expected to last one year.

The Doping Authority also acts as an advisor for a scientific project in which marathon runners will receive support in their efforts to run this distance in less than two hours (see www.sub2hrs.com), for the British nutritional supplements testing system, Informed Sport, of the LGC company and for the US cycling Association USA Cycling.

A company from Leiden, CHDR, has conducted a study of the performance-enhancing and health-related effects of EPO use and, once again, the Doping Authority played an advisory role and helped actively in the search for well-trained trial subjects who may not participate in competitions for a longer period of time. Another advisory role focuses on a study of sewage water for the presence of prohibited substances conducted by a company from Utrecht, KWR Water Cycle Research Institute. Finally, we participated in a study by NOC*NSF of the risks of clenbuterol contamination in meat for the consumer market in some countries outside Europe.

As in previous years, we engaged in regular consultations with the Pharmaceuticals and Medical Technology directorate of the Ministry of Health, Welfare and Sport about counterfeit medical products. In a number of separate meetings, we also provided input for the discussion about the possibility of establishing a reporting centre for health problems caused by the use of fake medicines. Doping products are always prominent in this category and a reporting centre of this kind would be one way of implementing the recommendations of the Health Council's report on doping from 2010.

Further steps were made with respect to the survey of health effects that have actually been experienced as a result of the use of the prohibited substances. It emerged that this long-held wish was also shared by the National Institute for Public Health and the Environment (RIVM) and the Sport Knowledge Centre. The Doping Authority participates in these consultations. This work also fits in with recommendations made in the past by the Dutch Health Council (2010).

Finally, the Doping Authority visited four scientific conferences: 'Cooperation between NADOs and WADA Accredited Laboratories: How to Improve Testing' (February in Bonn), the 15th USADA Symposium entitled 'Anti-Doping Science - Recovery, Repair, and Regeneration: From Steroids to Stem Cells' (October in Seattle), the 7th Sports Research Day (November in Groningen) and the 13th Sports Medical Science Annual Conference of the Dutch Society for Sports Medicine (November in Ermelo). We participated in discussions about doping in Eastbourne (England) for the Cycling Weekly magazine and in Groningen at the local Kenniscafé.

Chapter 9 Knowledge management

Thanks to the support of our international umbrella organisation iNADO, it proved possible to further develop the Anti-Doping Knowledge Centre (ADKC) in 2016. The ADKC is the largest public database with doping-related information in the world, emphasising legal rulings, scientific research and educational materials. The ADKC is consulted worldwide and it was expanded in 2016 to include more than 800 'records'. It can be found on the website www.doping.nl.



Digital banner for promotion of doping.nl

Chapter 10 People & organisation

Board of Management

The Doping Authority has a board with three members: a chair, a secretary and a treasurer. The secretary is nominated by the NOC*NSF, and the treasurer is nominated by the Ministry of Health, Welfare and Sport. For an overview of the board members at the end of the year under review the reader is referred to Annex 2.

The board delegates the responsibility for day-to-day matters, and for policy preparation and implementation, to the CEO. In other words, the board provides 'overall' direction.

Advisory Board

Under its articles of association, the Doping Authority has an Advisory Board. At year-end 2016, the Advisory Board comprised seven members (meaning that the board is up to strength), who all represent specific interest groups or a specific area of expertise. The Athletes Committee has also decided to appoint a regular deputy who can, when required, take over from the regular Advisory Board member on behalf of the Athletes Committee. The task of the Advisory Board is to advise the board, either on request or at its own initiative. It meets a few times a year. A list of the members of the Advisory Board can be found in Annex 2.

Office staff

During the year under review, the Doping Authority had three departments (Prevention, Enforcement & Investigation and Support), and a legal officer. The three department heads and the legal officer constitute, together with the CEO, the Management Team. One extra person (a documentalist) has been added to the staff temporarily for the implementation of projects financed separately. In addition, another member of staff was appointed at the Enforcement & Investigations department given the expansion of the national doping control programme.

At year-end 2016, the office organisation comprised 19 people and 15.9 FTEs. For an overview, the reader is referred to Annex 3.

Doping Control Officials (DCOs)

In addition to the permanent staff, there were 19 part-time Doping Control Officials at the end of 2016 (eleven men and eight women, see Annex 4), who were appointed under 'minimum hours' contracts.

Quality

Quality is of paramount importance in anti-doping policy. Many doping organisations therefore work with quality systems. This is particularly relevant for the implementation of doping controls: the National Doping Regulations require ISO certification as a precondition for conducting controls. However, other tasks such as the granting of therapeutic use exemptions and prevention activities should, in our view, also meet ISO standards. The Doping Authority and its predecessors in law received ISO certification back in 1998. In September 2013, our organisation acquired a new ISO 9001:2008 certificate, which is valid for

three years. This certification expired in September 2016 and it was decided not to apply for a new certificate given the planned establishment of the Doping Authority as an independent governing body (which is expected on 1 January 2018). ISO certification will be addressed after the independent governing body has been established.

A Complaints Procedure was adopted and published on the website in May 2011. No complaints were processed using this procedure in 2016.

Therapeutic Use Exemption Committee (TUE committee)

One of the provisions in the doping regulations relates to the procedure for the use of prohibited medication. The Doping Authority has established, for the Dutch sports associations, a committee known as the Therapeutic Use Exemption Committee (TUE committee), which consists of ten independent doctors. The TUE committee works in two sub-committees that do the same work for two different groups of sports associations. The committee met in November 2016 for regular consultations.

TUE appeals committee

Athletes who disagree with decisions made by the TUE committee can appeal to the TUE Appeals Committee, which was established in 2016. The TUE Appeals Committee consists of three people. The committee was not required to take any action at all in 2016.

Compliance with Doping Sanctions Committee (CND)

The World Anti-Doping Code requires the Doping Authority to monitor the implementation of sanctions imposed for doping. If there is any failure to comply with a sanction correctly, the same sanction begins again after the end of the original sanction. The Compliance with Doping Sanctions Committee is responsible for determining whether there has been correct compliance with a sanction and whether there are any reasons to reduce a subsequent sanction.

Balance sheet as at 31 December 2016

Assets	2016		2015	
Fixed assets Tangible fixed assets		€ 84,291		€ 116,949
Current assets Debtors Liquid assets Total assets	€ 204,501 € 618,357	€ 822,858 € 907,149	€ 198,332 € 844,945	€ 1,043,277 € 1,160,226
Liabilities Foundation capital Other reserves Equalisation reserve, Ministry of Health, Welfare and Sport Earmarked funds for doping controls Special-purpose reserve Long-term liabilities	€ 183,958 € 0 € 95,604 € 31,621	€ 311,183	€ 251,947 € 0 € 302,792 € 31,621	€ 586,360
Current liabilities				
Amounts payable to suppliers Taxation and social security Other creditors, accruals and deferred income Total liabilities	€ 290,461 € 70,766 € 234,739	€ 595,966 € 907,149	€ 286,814 € 65,479 € 221,573	€ 573,866 € 1,160,226

Income statement for 2015

	2016		2015
Income		€ 2,865,387	€ 2,843,874
Expenses related directly to doping controls	€ 1,446,274	•	£ 1,063,211
General expenses	€ 1,676,831	€	1,762,229
Project expenses	€ 18,823		€ 120,750
		€ 3,141,928 -	€ 2,946,190
Salaries and wages	€ 921,751		€ 956,717
Social insurance contributions	€ 124,160		€ 125,129
Pensions	€ 83,907		€ 79,976
Depreciation of tangible fixed assets	€ 36,017		€ 39,272
Other staff expenses	€ 42,933		€ 37,055
Accommodation expenses	€ 84,650		€ 94,513
Office expenses	€ 129,398		€ 127,580
Car expenses	€ 15,047		€ 14,833
Sales expenses	€ 1,085		€ 3,055
General expenses	€ 50,470		€ 46,981
Staff expenses and overheads passed on to activities/projects	€ 1,489,418 -		€1,525,111
Total operating expenses		€ -	€ -
Balance of income and charges		€ 276,541 -	€ 102,316
Interest receivable and similar income	€ 2,363		€ 6,611
Interest payable and similar expenses	€ 999		€ 539
Financial income and expenditure		€ 1,364	€ 6,072
Result		€ 275,177 -	€ 96,244

Members of Board of Management, Advisory Board and committees (as at 31-12-2016)

Board of Management

Harro Knijff, chair

Marc Benninga, secretary (NOC*NSF nomination)

Paul Depla, treasurer (Ministry of Health, Welfare and Sport nomination)

Advisory Board

Henk-Jan Geelen (on behalf of the Dutch coaches)

Arnold Brons (Association for Sports Medicine, VSG)

Hinkelien Schreuder (NOC*NSF Athletes Committee) Francien Huurman (on behalf of Dutch athletes)

Annemieke Horikx (KNMP) Saskia Sterk (Rikilt)

Manuela de Jong (Statistics Netherlands)

Therapeutic Use Exemption Committee (TUE committee)

Marjon van Eijsden-Besseling

Edwin Goedhart

Leo Heere (chair)

Ed Hendriks (chair)

Jan Hoogsteen

Hans Keizer

Harry Koene

Hans Jurgen Mager

Huib Plemper

Hans Vorsteveld

TUE appeals committee

Babette Pluim

Marieke Becker

Françoise Broekhof

Compliance with Doping Sanctions Committee (CND)

Jan Loorbach (chair)

Dolf Segaar

Ella Adriaanse

Office staff (as at 31-12-2016)

Management

Herman Ram chief executive officer

Steven Teitler legal officer

Enforcement & Investigations department

Koen Terlouw head of department

Jeroen Brakels account manager/deputy head of department

Tineke Idema intelligence officer

Fienie Verhagen senior officer for doping controls

Angela Mols whereabouts officer / doping controls officer

Yvonne Kwakernaak doping controls officer Anuschka Rambhadjan doping controls officer Tamara Valentijn doping controls officer

Prevention Department

Bart Coumans head of department

Erik Duiven senior elite sport educator

Laila Spruijt elite sport educator

Hans Wassink grassroots sports educator

Support department

Olivier de Hon head of department / scientific policy officer

Frans Stoele information policy officer / documentation & TUE secretary

Astrid van der Goot secretary

Gerdi van Driel administration officer

Rien Tuk documentalist

List of Doping Control Officials (active as at 31-12-2016)

Boyan Bakhuizen Johan Bouman Margriet van Brummelen Ellen van de Bunt Sally Fischer Just van der Kroef Karin Lindhout Marlies Mielekamp Gonnie Monsieurs Cor Mouw Victor Niemeijer Geeta Ramdajal Hans Scholtz Cees Smid Jaap Stomphorst Fienie Verhagen Ton Verhagen

Alex Vermeulen Gerrit Vooren

Overview of scientific publications and presentations

Doctorate thesis

De Hon O., Striking the right balance – effectiveness of anti-doping policies. Defence on 18 November 2016 at Utrecht University. Arko Sports Media, Nieuwegein, 2016,

Articles

Duiven E. & de Hon O., Nog steeds veel doping in voedingssupplementen; 20-50% Nederlandse topsporters neemt risico's. Sportgericht 70(2): 23-6, 2016.

Ram H., Editorial Evaluating the Unintended Effects of Anti-Doping: INDR Special Issue. Performance Enhancement & Health 4(3-4): 77-9, 2016.

Duval A., Ram H., Viret M., Wisnosky E., Jacobs H.L. & Morgan M., The World Anti-Doping Code 2015: ASSER International Sports Law Blog symposium. International Sports Law Journal(16): 99–117, 2016.

De Hon O. & Stoele F., Doping, een stand van zaken. Geneesmiddelenbulletin 50(7): 75-83, 2016.

Contributions to books

De Hon O. & Pluim B.M., Contra-indicatie 100 – Sportbeoefening; doping. In: Commentaren Medicatiebewaking 2016/2017. Stichting Health Base, Houten, pages 1215-26, 2016.

Coumans B. & de Hon O., Doping. In: Leerboek Sportgeneeskunde (eds. R. Diercks, B. Pluim & E. Verhagen). Bohn Stafleu van Loghum, Houten, pages 189-98, 2016.

Abstracts

De Hon O., Effectiviteit van anti-dopingbeleid. In: Abstract Book DSO 2016, Hanzehogeschool Groningen, page 12, 2016.

Oral presentations

• Coumans B., 'Bigger than Big. The evolution of bodybuilding?'. Advisory Group on Education, Council of Europe, Bonn, 22 February 2016.

- De Hon O., 'Evaluating anti-doping policies: a Dutch example', Advisory Group on Science, Council of Europe, Bonn, 26 February 2016.
- Duiven E., 'Doping'. Chemistry & Crime minor, Hogeschool Rotterdam, 9 March 2016.
- De Hon O., 'The Anti-Doping Knowledge Center', Cycling Weekly Symposium, University of Brighton (Eastbourne), 29 March 2016.
- Coumans B., 'Doping'. IOC Programme in Sports Medicine. Amsterdam, 7 April 2016.
- De Hon O., 'Placepo?', NOC*NSF Master Class for Elite Sports Medics, Leende, 9 April.
- Coumans B., 'Doorlopende Leerlijn Dopingvrije Sport'. 25th anniversary conference of Stichting LOOT. Hilversum, 14 April 2016.
- De Hon O., 'De marathon onder de twee uur als wetenschappelijk project', Amsterdam Institute of Sport Sciences, Amsterdam, 12 May 2016.
 - Ram H., 'Doping: een kennismaking', Studievereniging Sirius, Utrecht University, 25 May 2016.
 - Ram H., 'Doping: een kennismaking', Sportnet25, Zoetermeer, 26 May 2016.
 - Ram H., 'Anti-doping in Europe: Goals, obstacles and perspectives', EU Presidency Police Conference 'Seizing the Spoils of Crime', Santpoort, 8 June 2016
 - Ram H., 'Nutritional supplements and doping: risks between food and drugs', European Working Community for Food Inspection and Consumer Protection (EWFC), Brussels, 9 June 2016.
 - Ram H., 'Doping en Fair Play', AISS Publiekslezing, Amsterdam Institute for Sport Science, Amsterdam, 9 June 2016.
- Duiven E., 'Tackling inadvertent doping: how the industry can help'. 6th Sports & Performance Nutrition 2016. Hoofddorp, 15 June 2016.
 - Coumans B., 'The role of prevention and ethics in anti-doping'. EU Anti-Doping Conference. Amsterdam, 15 June 2016. Duiven E., 'Tackling inadvertent doping: how the industry can help'. 4th Sports Nutrition Conference. Wageningen, 4 July 2016.
- De Hon O., 'Sport is te mooi voor doping', Toegepaste Inspanningsfysiologie, Faculteit der Gedrags- en Bewegingswetenschappen, VU-University Amsterdam, 10 October 2016.
- Teitler S., 'Seminar tuchtrecht'. Veilig sportklimaat. Nieuwegein, 2 November 2016.
- De Hon O., 'Striking the right balance effectiveness of anti-doping policies', Dag van het Sportonderzoek, Groningen, 10 November 2016.
- De Hon O., 'Striking the right balance effectiveness of anti-doping policies', Workshop 13e Sportmedisch Wetenschappelijk Jaarcongres, Ermelo, 24 November 2016.
- Duiven E., 'Doping'. Chemistry & Crime minor, Hogeschool Rotterdam, 22 November 2016.
 - Ram H., 'Doping: een kennismaking', Haagsche Schouw, The Hague, 1 December 2016

Discussion meetings and forums (external)

- Ram H., WADA ADO Symposium, World Anti-Doping Agency, Lausanne, 15 March 2016.
- Ram H., EU Presidency Doping Conference, Amsterdam, 15 June 2016.

- Ram H., European Group of Public Administration (EGPA) Conference; Workshop 'Sports and Integrity', Utrecht, 25 August 2016.
- Ram H., WADA Think Tank, Lausanne, 20 September 2016.
- De Hon O., Kenniscafé Doping & Topsport, Groningen, 22 September 2016

Secondary positions

Bart Coumans

- Member of the WADA Education Committee, Montreal
- Member of the Expert Group on Education (T-DO ED) of the Council of Europe, Strasbourg
- Chair of the 'Performance' theme and Steering Committee member of the Sport Research Programme (www.sportonderzoek.com), Utrecht

Herman Ram

- Chair of the Objections and Appeals Committee, Executive MBA Sportmanagement Wagner Group, Groningen
- Chair of the Foundation Board, Stichting Holland Skipool, The Hague
- Chair of the Fee Appeal Committee, Institute of National Anti-Doping Organisations iNADO, Bonn (until 14 March 2016)
- Board of Directors, Institute of National Anti-Doping Organisations iNADO, Bonn (with effect from 14 March 2016)
- Member of International Advisory Board, MA Ethics and Integrity, Swansea
- Member of the NADO Ad Hoc Working Group, World Anti-Doping Agency, Montreal
- Member of the WADA Think Tank, World Anti-Doping Agency, Montreal
- Member of the Compliance Questionnaire Pilot Group, World Anti-Doping Agency, Montreal
- Member of the Sport & Integrity Steering Group, NOC*NSF, Arnhem
- Member of the Doping Focus Group, NOC*NSF, Arnhem
- Member of the Ad Hoc Expert Group on Independent Doping Panels (T-DO IHP), Council of Europe, Strasbourg

Olivier de Hon

- Tourguide Amsterdam Olympic Stadium (volunteer)
- Advisor Polyclinic Anabolic Steroids at Spaarne Hospital in Haarlem
- Advisor Sub2Hrs project
- Advisor British supplement testing system Informed Sport (LGC)
- Advisor USA Cycling
- Member of the Avisory Board Stichting Health Base for the annual release "Commentaren Medicatiebewaking"

Steven Teitler

• Member of the Medical & Anti-Doping Commission, European Athletics, Lausanne

Abbreviations

ABP Athlete Biological Passport

ADAMS Anti-Doping Administration and Management System

ADN Anti-Doping Norway

ADO Anti-Doping Organisation

ADKC Anti-Doping Knowledge Centre

AEPSAD Agencia Española de protección de la salud en el deporte

AGM Annual General Meeting

AMC Amsterdam Medical Centre

ANP Algemeen Nederlands Persbureau

AWB Dutch General Administrative Law Act

BVO Professional Football Organisation

CADF Cycling Anti-Doping Foundation

CAHAMA The Ad Hoc European Committee for the World Anti-Doping Agency

CAS Court of Arbitration for Sport

CBS Statistics Netherlands

CIOS Centraal Instituut Opleiding Sportleiders

CHDR Centre for Human Drug Research

CTO Centre for Elite Sports and Education

DCO Doping control official

DLDS Ongoing Educational Module for Doping-Free Sport

EPO Erythropoietin

ESA Erytropoiesis Stimulating Agents

EU European Union

FAIR Forum for Anti-Doping in Recreational Sport

FIOD Fiscal Intelligence and Investigation Department

FTE Full-time equivalent

GH Growth hormone

GHRF Growth Hormone Releasing Factor

HAARLEM Health Risks of Anabolic Androgen Steriod Use by Male Amateur Athletes

HBOC Haemoglobin-Based Oxygen Carriers

IAAF International Association of Athletics Federations

IADA International Anti-Doping Arrangement

IF International Federation

IGZ Dutch Health Care Inspectorate

INADO Institute for National Anti-Doping Organisations

IOC International Olympic Committee

IOD Intelligence Intelligence and Investigation Department

IPC International Paralympic Committee

IRMS Isotope Ratio Mass Spectrometry

ISO International Organization for Standardization

ISR Institute for Sports Law

ISTI International Standard for Testing & Investigations

ITU International Triathlon Union

KNBB Royal Dutch Billiards Federation

KNMG Royal Netherlands Medical Society

KNMP Royal Netherlands Pharmaceutical Society

KNVB Royal Dutch Football Association

KNWU Royal Dutch Cycling Union

KNZB Royal Netherlands Swimming Association

NADA Nationale Anti-Doping Agentur (Germany)

NADO National Anti-Doping Organisation

NDR Dutch National Doping Regulations

NK Dutch Championships

NOC*NSF National Olympic Committee*Dutch Sports Confederation

NT National Talent

NTP National Testing Pool

NVWA Dutch Food and Commodities Authority

NZVT Dutch Safeguards System for Dietary Supplements in Elite Sport

RIVM National Institute of Public Health and Environmental Protection

ROC Regional Training Centre

RTO Regional Elite Sports Organisation

RTP Registered testing pool

SAP Strength and Physique

TDSSA Technical Document Sport Specific Analysis

T/E Testosterone/Epitestosterone

TP Testing Pool

TUE Therapeutic Use Exemption

UKAD United Kingdom Anti-Doping

USADA United States Anti-Doping Agency

VSG Association for Sports Medicine

VU VU-University of Amsterdam

VWS Ministry of Health, Welfare and Sport

WADA World Anti-Doping Agency

WADC World Anti-Doping Code

WBP Whistleblower Policy

WOB Dutch Government Information (Public Access) Act

WOO Dutch Open Government Act

WUAB Anti-Doping Policy Implementation Bill

ZBO Independent governing body

ZIO Cases under Investigation consultations