# SPORTS MEDICINE FOR THE GENERAL PRACTITIONER



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Wayne Derman is Past President of the South African Sports Medicine Association. He was the Chief Medical Officer of the National Olympic Committee of South Africa for the Sydney 2000 Olympic Games and has been appointed as Chief Medical Officer for Athens 2004.

Sports medicine is practised by those who care for the exercising individual, whether s/he is an elite competitor or a recreational athlete. Sports medicine comprises the impact of injury on healthy individuals and those affected by disease states, as well as the effects of exercise on the body in an altered physiological or environmental state, e.g. at high altitude or in heat. Like other areas of medicine, sports medicine (especially during the past 15 years) has advanced rapidly. When I first started reading about sports medicine and attending sports medicine meetings, the subject matter was primarily 'gym changing-room' medicine. The 'science' consisted of anecdotes, and articles were mainly testimonials and observations. The following 15 years saw involvement growing into the multidisciplinary team approach, incorporating sports physicians, physiotherapists, biokineticists, orthopaedic surgeons, exercise physiologists, cardiologists, dietitians, sports psychologists and many others in the professional practice of a more evidence-based approach to sports medicine. As the scope broadened, research into previously unresearched populations also grew. While it initially focused almost exclusively on competitive athletes, the field has expanded to include recreational athletes and patients with illness.

Recently the emphasis on regular physical activity and its role in the prevention of many chronic disease states including coronary artery disease, respiratory disease, cancer, hypertension, obesity, osteoporosis, diabetes and depression have come to the fore. This means that there are a greater number of patients donning their exercise kits and adopting exercise as an important part of their lifestyle. This has resulted in two important events. Firstly, the number of patients who report to their GPs with exercise-related complaints has increased dramatically. Indeed, recent surveys have indicated that nearly 10 - 15% of all consultations in general practice in some way relate to exercise activity. Secondly, it follows that the demand on the GP to have an understanding of the subject has increased, resulting in an increase in the need for sports medicine training.

In 1990 the first MPhil Sports Medicine training programmes started at the University of Cape Town. Currently sports medicine programmes are available at the Universities of Cape Town, Pretoria and KwaZulu-Natal. The University of the Witwatersrand will be starting a sports medicine programme in the not too distant future. The demand for these training programmes is high and it is envisaged that a diploma course in sports medicine will be started at the University of Cape Town in 2005.

The aim of this edition of CME is to provide information to GPs on topics in sports medicine where diagnosis, treatment or intervention guidelines have recently changed. Articles deal with relevant common and practical topics. A number of excellent practitioners and researchers in the field have contributed their expertise to this edition of CME.

It is estimated that during one year nearly 10% of all schoolboys who play rugby will have head trauma. Also that at some time during their school rugby partici-

pation 50% of schoolboys will have a head injury. The majority of these young people will be evaluated by a GP for possible concussion. In the past the assessment and management of the patient with concussion has been an enigma. Dr Ryan Kohler discusses the recent changes to the guidelines related to the management of concussion and describes the Internet-based tools for the neuropsychological assessment of concussed players, which take the guesswork out when making a clinical decision. Most importantly, he provides return-to-play guidelines that can be applied to these patients when difficult questions in this regard arise.

By far the most common sports injury seen in general practice is the sprained ankle. Dr Christa Janse van Rensburg from the University of Pretoria discusses the grading and management of this injury.

Constantino and Derman tackle the issue of exercise-induced asthma. This condition is often responsible for poor performance and for many of the respiratory symptoms that occur in young people participating in sport. It is a condition often incorrectly diagnosed and poorly managed. Their article focuses on the evaluation of the patient and provides a diagnostic algorithm as a tool for the GP to diagnose this condition. Current therapeutic interventions are also discussed.

Perhaps one of the most common questions I have been asked by GPs is what one should include in the medical bag when one is responsible for a sports team on the road. Perhaps the most travelled of South Africa's sports physicians, Dr Philda de Jager, tackles this issue with an excellent article on the ideal contents of a team physician's bag. This article will form the basis of a checklist for travelling physicians for a long time to come.

Each specialty within sports medicine can boast of key advances that have propelled the field and even revolutionised medical practice. The recent advances in high-quality radiography, high-resolution ultrasound, helical multi-sliced CT and high-sealed-strength MRI have now been able to demonstrate the musculoskeletal system as never before. But GPs often ask which investigation to use when assessing a sports injury, and this question is addressed in detail by Drs De Villiers and Koenig, who are spearheading the development of sports imaging in South Africa.

In 'More about . . . sports medicine for the general practitioner' the focus falls on areas within sports medicine in which there have been major advances or changes in the past year or two. Dr Shuaib Manjra from the Institute of Drug-free Sport discusses the most recent changes to the list of banned substances from the World Anti-Doping agency (WADA) and therapeutic use exemption (TUE) certification, which will become a reality in sport this year. Professor Noakes discusses recent advances he has been responsible for spearheading with regard to fluid replacement during endurance exercise. His pioneering work in this area has led to the change in the international guidelines regarding fluid replacement. Finally, Meltzer and her colleagues tackle the issue of nutritional supplementation for athletes. The authors specifically refer to dealing with the athlete requesting information regarding nutritional ergogenic aids from the doctor. A useful list of recommendations to advise the athlete is provided.

I hope that you find this edition of *CME* both practical and useful and that it will enhance your patient management in this rapidly growing field of medicine.

## SINGLE SUTURE

#### **RISKY PHONING**

It's nice to know that ours is not the only country in which people ignore the law surrounding mobile phone use in the car. A study in Australia looked at whether mobile phone use among Melbourne drivers was a preventable injury risk. Commenting on the study, Suzanne McEvoy and Mark Stevenson pointed out that it raised two questions. First, does mobile phone use while driving affect road safetly, and second, if so, do hands-free devices reduce the risk? Their examination of the literature suggests that there is not yet enough evidence to answer the first question unequivocally, but that there is some evidence that hands-free devices do not in fact reduce any risk associated with talking on the phone while driving. They are currently carrying out two large epidemiological studies in Perth involving about 2 000 drivers over an 18-month period. I await the results with interest.

(McEvoy SP, Stevenson MR. MJA 2004; **180:** 43-45.)