

## Editorials

### Warm up

Staying alive but wearing out. One half of the journal is about the benefits of exercise in prolonging life, but the other deals with injuries related to degeneration. There is a certain irony in using pathological studies to demonstrate the benefits of exercise, but dead cyclists have fewer atherosclerotic changes than controls (p 328). Perhaps the controls would have lived longer if they had exercised. We publish another study confirming improvements in risk factors associated with exercise (p 322), but no one is quite sure how much exercise we should do and how it should be encouraged. Roy Shepherd discusses the evidence and suggests how exercise can be best promoted (p 277). Getting people active is not easy, and a number of models are suggested. Practice nurses may hold the key to promoting exercise in the community (p 308), but general practitioners may not be very enthusiastic if they risk being sued. We asked a representative of one of the medical defence bodies to consider this issue (p 266). Changing the public perception of the benefits of exercise and getting people active is

also difficult if people are afraid that exercise can kill. Sudden death does occur in sport and always makes headlines. Sports related death in the young is particularly tragic, though thankfully very rare (p 269).

If people are physically active, they risk wearing out. If we jump we get jumper's knee, and the management of this is not straightforward (p 332). Our Achilles tendons rupture, and there is no clear evidence that surgery is better than conservative management (p 285). If we replace joints we are not sure if we can return to sport, though preliminary reports are encouraging (p 319). If we exercise our muscles get sore, and homoeopathy offers no effective treatment (p 304). Hold on! Homoeopathy in a sports medicine journal! But, this is a double blind randomised controlled trial, the gold standard in research methodology. Other studies cover a variety of sports: swimming, athletics, badminton, soccer, and rugby. With such heterogeneity, it is important that we emphasise consistency in statistical methods used in sports medicine (p 314).

### Return to Athens, the odyssey

The Olympics are going home. The recent announcement that the Olympics will be staged in Athens should please those with a sentimental streak. After all the disappointment when the centenary Olympics were awarded to Atlanta, there is a certain satisfaction that the Games are returning to their spiritual home. Faced with another sporting scandal, drug abuse revelation, or crass commercial exploitation, we usually return to the image portrayed by the media of an Olympic ideal where all is clean, fair, and honest. In medicine too we have many links with ancient Greece, and a common perception that the ideals of the early Greek physicians and philosophers are superior to our own. In any medical controversy, Hippocrates is still the referee.

Sports medicine remains centre stage. Combining the two disciplines of sport and medicine, as did the early physicians and philosophers, we currently attract both the high profile of international sport and increasing interest from the universities and royal colleges. But, history has a better memory for good times, and we may forget that even in ancient Greece it was not all fun and games and academic excellence. After more than 2000 years the controversies have an uncanny familiarity.

The best known of the Greek physicians, Hippocrates (490–370 BC), a doctor teacher on Cos, emphasised the importance of physical wellbeing, fitness, and a healthy active lifestyle.<sup>1</sup> Modern medicine echoes many of the principles of Hippocrates and his contemporaries in the Greek school. What is now a popular catch phrase "Mens sana in corpore sano" is attributed to Plato, a contemporary of Hippocrates. Belief in the benefits of exercise is clearly not a 20th century phenomenon. Physical activity was an integral part of education. Most education took place at the gymnasium. Plato's Academy was named after Akademos, a gymnasium, and Aristotle's school was located at Lyceum, another gymnasium. The traditions of Greek sport are recorded in many works of art, sculptures, and reliefs where boxing, wrestling, and gymnastics were most popular, although others depict athletes and, perhaps

the most famous, the discus thrower of Myron. Sport was promoted particularly among the youth who took part in the many athletic festivals, including the Panhellenic games at Olympia, Delphi, Isthmia, and Nemea. These festivals were held every four years, but Olympia was the most important. At first these festivals were dominated by the upper social classes, but the value of the prizes increased and athletes could then afford to prepare themselves full time: the professional athlete was born. And then the trouble started. The philosophers, who promoted physical activity for health, held the professional athlete in low esteem. Hippocrates, in "Nutriment" states "The condition (diathesis) of the athlete is not natural. A healthy state (hexis) is superior to all". He encouraged moderation. Galen (about 200–129 BC) also recognised the benefits of moderate exercise and promoted exercise for the health of body and mind and had little regard for the professional athlete.<sup>2</sup> He states "Athletes live a life quite contrary to the precepts of hygiene, and I regard their mode of living as a regime more favourable to illness than to health".

There was a considerable difference in outlook between the athletic trainers, known as paedotribes, and medical opinion. The professional athletic trainers learnt practical physiology and the principles of academic training empirically and the medical philosophers did not always agree. Two academic disciplines evolved: "Health science" was the discipline practised by the trainers, whereas the physicians practised a new subject "Hygiene". Terms which are still used in many of our academic institutions.

The Olympics in Athens should be a cause for celebration for both sport and medicine, but it should also act as a reminder that the original Olympics ultimately fell into disrepute.

DOMHNALL MACAULEY

1 Lyons AS, Petrucelli RJ. In: Harvey N Abrams. *Medicine. An illustrated history*. New York: 1978.

2 Smith WD. *The hippocratic tradition*. New York: Cornell University Press, 1979.