
Update/Le point

Sports and children: Consensus statement on organized sports for children*

FIMS/WHO Ad Hoc Committee on Sports and Children¹

This consensus statement was prepared by an Ad Hoc Committee on Sports and Children of the International Federation of Sports Medicine (FIMS) and WHO during a symposium on sports and children held in Hong Kong on 11–12 January 1997 and was reviewed by members of the WHO/Cardiovascular Disease Expert Advisory Panel and Members of the WHO Committee on Physical Activity, Sport, and Health.

Introduction

For children, regular physical activity and sport, together with a balanced diet, are essential to promote optimal growth and maturation and to develop sufficient physical fitness and mental vigour. The psychological and social benefits of regular physical activity help in coping with stress and anxiety, counterbalance the burden and symptoms of quiet sitting and mental concentration, and have a favourable influence on self-image and social relations. Participation in a variety of sports and exercises at a young age is important also for acquiring the necessary skills and experience to maintain regular exercise throughout life.

While children have participated in spontaneous sport and games since the dawn of recorded history, the organization by adults of competitive sports for children and adolescents is relatively recent. This development, however, has now spread worldwide and encompasses both developed and developing countries.

Although the overall goal of the International Federation of Sports Medicine (FIMS) and WHO is to encourage all children and young people, including the disabled, to become involved in regular physical activity, the present statement focuses on

the benefits and risks of organized sport for children, as one element of physical activity. Its specific purpose is to encourage sports governing bodies, health professionals, parents, coaches, and trainers to take opportune action to ensure the health and well-being of child athletes.

The statement focuses exclusively on competitive sports for children and adolescents within organized sports settings (clubs/associations), including schools.

Benefits of organized sports for children

In the organized sports setting it is possible to manage the amount of exercise taken by children and adolescents as well as the circumstances under which the exercise is administered. Sports-associated illness or injury can thus be minimized. Properly structured, organized sports for children can offer an opportunity for enjoyment and safe participation by all healthy children, regardless of age, sex or level of economic development, as well as those with disabilities or chronic diseases.

The potential benefits of organized sports for children and adolescents include improvement of health, enhancement of normal physical and social growth and maturation, as well as improvement of their motor skills and physical fitness, both health-related fitness and sports-specific fitness, particularly for those who are physically and mentally challenged. In addition, organized sports competitions for children and adolescents can, if properly structured, play an important role in socialization, self-esteem, and self-perception, as well as improving psychological well-being. Organized sports can also

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establish the basis for a healthy lifestyle and lifelong commitment to physical activity.

Risks of organized sports for children

The potential risks of organized sports include increased occurrence of illness or injury. At present, there is no clear evidence that the risk of acute traumatic injuries is greater in the organized sports setting than in similar exposures in free play activities. On the other hand, the potential for overuse injuries resulting from repetitive microtrauma appears to be specific to children participating in organized sports activities. Overuse injuries are very rare in children who participate in free play or uncontrolled sports activities.

There is also a potential for catastrophic injuries among children who participate in organized sports, e.g. cardiac arrest following chest wall impact, as well as head and neck injuries. Organization of children's sports activity by adults does have the potential for abuses to occur if those who set the amount of sports participation and the training regimen are inexperienced and use adult models. Concerns have been raised about the potential for excessive amounts of training and/or abnormal nutritional habits or unhealthy dietetic manipulation in the organized sports setting to interfere with normal growth and maturation of children and also to foster development of osteoporosis. There is also the potential risk of interference with overall health-related fitness by excessive emphasis on sport-specific training. Similarly, examples of pathological socialization or psychopathology, such as excessive anxiety or excessive stress, have been noted among children and adolescents who participate in organized sports. Unusual stress-related reactions, such as reflex sympathetic dystrophy, have been cited as potential risks following abnormal psychological settings in organized sports. Also, there is growing evidence that excessive, violent, and intensive training may increase the rate of overuse and of catastrophic injuries. Fortunately, the organized sports setting can decrease the rate or severity of such injuries by providing the opportunity for monitoring their risk factors and reducing them through rule changes, protective equipment, and alterations in technique or duration of play.

Recommendations

Although organized sports for children are of increasing importance, the growth of organized sports should not be at the expense of physical education or

general fitness activities, particularly those in which the family can be involved. Children worldwide must be given equal opportunities to participate in sports, regardless of age, sex, level of skill or economic status.

The specific recommendations shown below were made.

Sports governing bodies

- The following obligations apply to sports governing bodies:
 - they should be directly responsible for the safety and training of young athletes engaged in their particular sports;
 - they should institute systems to monitor the level of intensity and categories of competition in their sports;
 - they should be responsible for preparing and maintaining statistics of illness and injury for children and adolescents participating in their sports;
 - they should be responsible for certifying the credentials of coaches for this age level (including direct participation in coaching education, certification, and a reasonable assessment of the ethical and moral character of their coaches);
 - they should have the responsibility to determine standards for protective equipment, playing fields, and duration of competition appropriate for children; and
 - they should formulate the appropriate legislation related to organized sports for children.

Youth sports coaches

- Coaches should:
 - participate in special education programmes; and
 - have credentials that encompass the techniques and skills of youth sports; the specific safety risks of children's sports; the psychology and sociology of children and adolescents; and the physiology of growth and development related to physical activity during childhood and adolescence, as well as common medical related issues.

Health professionals

- Health professionals should take steps to improve their knowledge and understanding of the organized

sports environment as well as of the risk factors and safety factors inherent to this type of sports participation.

- Physicians should monitor the health and safety of children involved in organized sports whenever possible, in particular those involved in elite sports training.

Sports training

- Sports training for children and adolescents encompasses the age range 5–18 years. In the early stages of training, every emphasis should be placed on broad-based participation opportunities to enhance general motor development.
- Sports specialization should be avoided before the age of 10 years.
- During specialized training, there should be careful monitoring of the nutritional status of young athletes. In particular, care should be taken to ensure that child athletes are given adequate diets for the high-energy demands of sports. In addition, every effort should be made to avoid marginal dietary practices, in particular caloric deprivation to delay maturation of physical development during sports

training. Such dietetic manipulations must be viewed as a form of child abuse.

- Special attention should be paid to the volume and intensity of sports training of children and adolescents.

Parents

- The Ad Hoc Committee stresses the importance and responsibility of parental participation in the education process concerning the benefits and risks of sports training in childhood.
- Parents must increase their knowledge and awareness of the benefits and risks of competitive sport.
- Parents must be active participants in the process of the coaching and training of their children in sports.

Research

- More research is needed to identify the specific benefits and risks of organized sport for children. This information is essential to maximize the benefits, while minimizing the risks that children may incur in organized sports.