

**Sports as a means to improve the quality of life and prevent diseases**

**Mammeri maroua\***

**Abdelhamid Ibn Badis University**

**Institute of Physical Education and Sports, Mostaganem**

**adapted physical activity and health**

**Maroua.mammeri.etu@univ-mosta.dz**

**Received:04/06/2024**

**Accepted : 09/07/2024**

**Abstract:**

Our daily lives are becoming less physically active, the average energy consumption increases, creating a surplus in it. Consequently, we are seeing an increasing number of people suffering from overweight, which is a strong cause of health problems. This paper explores the multifaceted relationship between sports participation and disease prevention, emphasizing both physical and mental health benefits. Despite the well-documented advantages of regular physical activity, participation in organized sports can also present risks, including injury. This analysis aims to examine how sports can serve as

---

\***Corresponding author:** Mammeri maroua' Maroua.mammeri.etu@univ-mosta.dz

a preventive measure against various diseases while addressing the associated challenges that may hinder their effectiveness.

**Keywords: Physical activity, Prevention, Treatment,**

**Introduction:**

Regular physical activity helps prevent and treat noncommunicable diseases (NCDs) such as heart disease, stroke, diabetes and breast and colon cancer. It also helps prevent hypertension, overweight and obesity and can improve mental health, quality of life and well-being. (OMS, 2024)

**I- physical activity and health:**

The increasing prevalence of lifestyle-related diseases, such as obesity, diabetes, and cardiovascular disorders, has led to a growing emphasis on the importance of physical activity in public health discourse. Sports, as a structured form of physical activity, offer significant potential for disease prevention. However, the relationship between sports participation and health outcomes is complex and warrants thorough examination. This paper aims to critically analyze how sports contribute to disease prevention while considering the barriers and risks associated with sports participation.

**Exercise is beneficial for your health**

According to the World Health Organization (WHO) definition, physical activity (PA) includes any movement that requires the expenditure of energy and involves skeletal muscle. (OMS, 2024) This includes not only traditional

sports such as walking, cycling and active recreation, but also a wide range of games and activities that can be enjoyed at different levels.

The positive and direct effects of regular physical activity are particularly evident in the prevention of many chronic diseases, including: cardiovascular disease, diabetes, cancer, high blood pressure, obesity, depression, and osteoporosis. As such, promoting physical activity forms a cornerstone of the WHO Global Action Plan for Prevention and Control of Non-Communicable Diseases as physical activity has been used in the treatment and prevention of a variety of chronic conditions. (OMS, 2024)

Sport can develop adaptively, taking into account personal abilities, social status, and the biological and psychological maturity of the practitioners, so that it has a positive impact on the physical, psychological, social aspects and lasting health. Recent research suggests that modest increments in energy expenditure due to physical activity (~1000 kcal per week) or an increase in physical fitness of 1 MET (metabolic equivalent) is associated with lowering mortality by about 20% (Myers J, 2004) *Physically inactive middle-aged* women (engaging in less than 1 h of exercise per week) experience a 52% increase in all-cause mortality, a doubling of cardiovascular-related mortality, and a 29% increase in cancer-related mortality when compared with physically active ones (Hu FB, 2004)

### **Results of previous studies on the effect of physical activity in preventing and treating stroke:**

The Northern Manhattan Stroke Study (R L Sacco 1, 1998), a retrospective

case-control study that found leisure-time physical activity to be protective against stroke, was recently followed by a prospective study in the same topic (Willey, 2009). The results were that moderate to high intensity physical activity, such as jogging, swimming or tennis, was associated with a lower risk of stroke. However, light activity (such as walking) does not provide the same benefit. The protective effect was observed in men only. **The American Heart Association (AHA) recommends that stroke survivors should do the following:**

strength training to increase independence in activities of daily living, flexibility training to increase range of motion and prevent deformities, and training to enhance balance and coordination. The American Heart Association (AHA) recommends that each of these exercise methods should be performed two or three times a week to improve functional outcomes after stroke. Moderate-intensity aerobic exercise should be performed at least three days a week for 20 to 60 minutes each time, in order to increase the capacity for physical activity, improve walking and independence, and reduce the risk of cardiovascular disease. (N. F. Gordon, 2004)

### **III RESULTS AND DISCUSSION**

The limitations identified in previous research examining the role of exercise in stroke prevention hinder the ability to draw definitive conclusions regarding the optimal type, frequency, and intensity of exercise necessary to achieve a protective effect. While some studies have included data on

hemorrhagic stroke, the predominant evidence pertains to ischemic stroke, and the literature on the relationship between physical activity and hemorrhagic stroke remains limited. Future research should prioritize defining the optimal intensities and durations of exercise that would yield the most significant reduction in stroke risk, applicable to both primary and secondary prevention. Additionally, it is essential to investigate the frequency of exercise sessions, the impact of gender on risk reduction through exercise, and the duration of the observed benefits. For individuals with a history of stroke, identifying and addressing barriers to exercise implementation may enhance the adoption of exercise prescriptions within this demographic. Furthermore, the long-term effects of regular physical activity on the risk of recurrent stroke in patients with a prior stroke require additional investigation.

#### **IV. CONCLUSION**

While sports offer significant potential for disease prevention through physical and mental health benefits, it is essential to address the challenges and risks associated with sports participation. A balanced approach that promotes healthy engagement in sports, ensures accessibility, and prioritizes well-being over competition is crucial for maximizing the preventive health benefits of sports. Further research and policy initiatives are necessary to create an inclusive environment that fosters both participation and health among diverse populations. Exercise is so beneficial for health that it should be considered as a drug. As for any other drug, dosing is very important. Otherwise, unfavourable side effects may occur. Some of the favourable effects of exercise apply to the general population. Prominent amongst these

are its role in prevention of many diseases and in the promotion of healthy longevity

1-OMS,physical activity,2024

2- Myers J, Kaykha A, George S, Abella J, Zaheer N, Lear S *et al.* (2004).Fitness versus physical activity patterns in predicting mortality in men. *Am J Med* 117: 912–918

3- Hu FB, Willett WC, Li T, Stampfer MJ, Colditz GA, Manson JE (2004). Adiposity as compared with physical activity in predicting mortality among women. *N Engl J Med* 351: 2694–2703

4- R L Sacco<sup>1</sup>, R Gan, B Boden-Albala, I F Lin, D E Kargman, W A Hauser, S Shea, M C Paik, Leisure-time physical activity and ischemic stroke risk: the Northern Manhattan Stroke Study, national library of medicine, 10.1161/01.str.29.2.380.

5- Joshua Z Willey, Prestroke physical activity is associated with severity and long-term outcome from first-ever stroke,national library of medicine, 18;73(7):572-3,2009

6- N. F. Gordon, M. Gulanick, F. Costa et al., “Physical activity and exercise recommendations for stroke survivors: an American Heart Association scientific statement from the Council on Clinical Cardiology, Subcommittee on Exercise, Cardiac Rehabilitation, and Prevention; the  
1324

**Wisdom Journal For Studies And Research volume 04 Issue 04(18) 15/07/2024~**

**ISSN print/ 2769-1926 ISSN online/ 2769-1934**

Council on Cardiovascular Nursing; the Council on Nutrition, Physical Activity, and Metabolism; and the Stroke Council,” *Stroke*, vol. 35, no. 5, pp. 1230–1240, 2004

## الرياضة كوسيلة لتحسين نوعية الحياة والوقاية من الأمراض

معمري مروى

جامعة عبد الحميد ابن باديس

معهد التربية البدنية و الرياضية مستغانم

Maroua.mammeri.etu@univ-mosta.dz

### ملخص:

أصبحت حياتنا اليومية أقل نشاطاً بدنياً، ويزداد متوسط استهلاك الطاقة، مما يخلق فائضاً فيها. وبالتالي، فإننا نشهد عدداً متزايداً من الأشخاص الذين يعانون من الوزن الزائد، وهو سبب قوي للمشاكل الصحية. تستكشف هذه الورقة العلاقة متعددة الأوجه بين المشاركة الرياضية والوقاية من الأمراض، مع التركيز على فوائد الصحة البدنية والعقلية. على الرغم من المزايا الموثقة جيداً للنشاط البدني المنتظم، فإن المشاركة في الألعاب الرياضية المنظمة يمكن أن تشكل أيضاً مخاطر، بما في ذلك الإصابات. ويهدف هذا التحليل إلى دراسة كيف يمكن للرياضة أن تكون بمثابة إجراء وقائي ضد الأمراض المختلفة مع معالجة التحديات المرتبطة بها التي قد تعيق فعاليتها ولهذا، يمكن أن تكون الرياضة بمثابة منصة لتعزيز خيارات نمط الحياة الصحي والتدابير الصحية الوقائية. يمكن للمبادرات التعليمية ضمن البرامج الرياضية أن ترفع مستوى الوعي حول التغذية والوقاية من الإصابات وأهمية الفحوصات الطبية المنتظمة.

الكلمات المفتاحية: الوقاية، العلاج، النشاط البدني