



Article

Epidemiology of Musculoskeletal Disorders among the Teaching Staff of the University of Douala, Cameroon: Association with Physical Activity Practice

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Citation: Tami, A.M.; Bika Lele, E.C.; Mekoulou Ndongo, J.; Ayina Ayina, C.N.; Guessogo, W.R.; Lobe Tanga, M.-Y.; Owona Manga, L.J.; Temfemo, A.; Bongue, B.; Mandengue, S.H.; et al. Epidemiology of Musculoskeletal Disorders among the Teaching Staff of the University of Douala, Cameroon: Association with Physical Activity Practice. *Int. J. Environ. Res. Public Health* **2021**, *18*, 6004. <https://doi.org/10.3390/ijerph18116004>

Academic Editors: Bert Staal and Veronique Billat

Received: 3 February 2021
Accepted: 27 April 2021
Published: 3 June 2021

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Abstract: The aim of this study was to assess the epidemiology of musculoskeletal disorders (MSDs) among the teaching staff of the University of Douala and determine their association with physical activity (PA) practice. The Nordic questionnaire was used to assess MSDs. Ricci–Gagnon questionnaire was used to determine the level of PA. We recruited 104 participants mean-aged 42 ± 8 years, 80% male. Previous 7 days and 12 months prevalence were 56.7% and 80.8%, respectively. The most affected body regions were neck, shoulders and lower back. No significant association was found between MSDs and PA. Celibacy was significantly associated with previous 7-days MSDs ($p = 0.048$) while age ≥ 45 years and job seniority ≥ 10 years were significantly associated with a reduced risk of previous 12-months MSDs ($p = 0.039$ and $p = 0.016$, respectively). The prevalence of MSDs among university of Douala teaching staff showed no significant effect with the practice of PA.

Keywords: musculoskeletal disorders; physical activity; university teachers

1. Introduction

Musculoskeletal disorders (MSDs) are considered one of the most prevalent occupational health problems [1]. The World Health Organization (WHO) defines MSDs as any disorder affecting muscles, bones, joints, tendons and ligaments [2]. The musculoskeletal system is tough, but when exposed to infections, aging, heavy work load, repetitive stress, metabolic disorders and other factors, this causes tissue injuries [2–4]. These injuries lead initially to an inflammatory response then to pains and loss of motor function as an end result [4]. According to the WHO, in 2019 musculoskeletal conditions were the leading cause of disabilities worldwide and accounted for the greatest proportion of loss of productivity at the workplace [2].

The prevalence of MSDs worldwide is 20% to 33% [2]. It varies according to the type of activity [5–10] and affects both adolescents [11] and adults [5]. Teachers frequently present higher prevalence of MSDs, ranging from 39% to 95% [10,12]. Studies carried

Epidemiology Of Musculoskeletal Disorders

G Psacharopoulos



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