Physical Activity Among Adolescents in an East Malaysian Rural Indigenous Community: Exploring the Influence of Neighborhood Environmental Factors

Rosalia Saimon, PhD1, Wan Yuen Choo, PhD2, Kam Hock Chang, PhD1, Chirk Jenn Ng, PhD, MBBS2, and Awang Bulgiba, PhD, MBBS2

Abstract
This study explores the rural environmental factors that influence adolescents’ participation in physical activities (PA). Thirty-six indigenous adolescents, aged 13 to 17 years from rural communities of East Malaysia were involved in the photovoice procedures: photo-taking, selecting, contextualizing, and codifying themes. Despite being endowed with natural resources such as river, forest, hills, and so on, the adolescents and the community did not capitalize on these rich resources to promote and engage in PA. Poor maintenance of natural resources, the lack of pedestrian infrastructures and road safety, the lack of PA facilities, and negative perception of ancestors’ agricultural activities were among factors that constrained adolescents’ PA. Although basic amenities such as play spaces and pedestrian infrastructures are necessary to increase adolescents’ PA, any intervention should make the most of the natural resources, which are cheaper, environment friendly, and sustainable.

Keywords
physical activity, adolescents, indigenous, rural community, environmental factors, photovoice

Introduction
Physical activity (PA) has been associated with lower risk of blood lipids, blood pressure, metabolic syndrome, overweight and obesity, low bone mineral density, and depression in adolescents.1 PA consists of many structured and unstructured forms, including organized sport, recreational activities, motor skill development programs, dance, active transportation such as

1Universiti Malaysia Sarawak, Kuching, Sarawak, Malaysia
2University of Malaya, Kuala Lumpur, Malaysia

Corresponding Author:
Rosalia Saimon, Faculty of Medicine and Health Sciences, Universiti Malaysia Sarawak, Lot 77, KTLD, Jalan Tun Ahmad Zaidi Adruce, Kuching 93250, Sarawak, Malaysia.
Email: saimonrosalia@gmail.com