

## **ABSTRACT**

Adolescents form 20% of the world's population, with 85% living in developing countries. In Kenya, they comprise 23.8% of the population. Nutritional status of adolescent girls has been reported to influence future maternal and infant health. Most studies in developing countries have focused on nutritional status and food security among children under 5 years as well as breastfeeding and pregnant mothers; while little attention has been given to nutrition in adolescents. Globalization, rapid urbanization and economic growth have led to changed trends in lifestyles and eating habits particularly among adolescents in developing countries that are likely to affect their nutrition status. However it is not clear whether eating habits reported in the West also exist in developing country contexts, or whether, as in the West, they may influence nutritional status of adolescent girls. This study aimed to assess the relationship between eating habits and nutritional status among school going adolescent girls in Kisumu, the third largest City in Kenya, open to Western influence on eating habits. Specific objectives were to: identify eating habits practiced by adolescent girls in Kisumu City; establish factors determining their eating habits; and assess the relationship between eating habits and their nutritional status. Anthropometric measurements were taken to determine nutritional status, and data on household and cultural factors, eating habits, and psychosocial factors measured on a 10-item Rosenberg scale and adapted Eating Attitude Test-26, was collected using a structured questionnaire; in a cross-sectional survey conducted among 235 randomly selected school-going adolescent girls aged 14 to 19 years, from 3 randomly selected mixed schools in Kisumu City. Logistic and linear regressions were used to assess relationships between eating habits; and between eating habits and nutritional status. Prevalence of overweight, obesity and underweight were 29.2%, 4.9% and 4.4%, respectively. Skipping meals, snacking, binge eating –all negative eating habits; and vegetable and fruit consumption-positive habits, were practised by the adolescent girls. Skipping meals, especially breakfast was the most common eating habit (62.8 %), while fruit consumption was the least common (41.2%). Vegetable consumption was associated with a 0.19 (95% CI: 0.02, 2.46;  $p=0.005$ ) increase in BMI. The prevalence of overweight and obesity is high in school-going adolescents in Kisumu; and although eating habits identified in the West exist in this group, they are compensatory mechanisms to cater for missed meals or limited time to prepare and consume breakfast, rather than a conscious decision to reduce food intake as seen in developed countries. Ministry of health and school administrations should enhance healthy eating habits through nutrition education, and sensitise parents on the importance of breakfast for the girls; and influence the food options sold in *kiosks* around schools in joint efforts with County government authorities