ASSOCIATION OF INTAKE OF VITAMIN AND MINERAL SUPPLEMENTS WITH THE PREVALENCE OF STUNTING, WASTING, AND UNDERWEIGHT AMONG FILIPINO CHILDREN AGED 6-36 MONTHS

Mildred O. Guirindola, Ma. Lilibeth P. Dasco, Marie Alysya D. Pedraza and Ma. Lynell V. Maniego

Background:
Stunting, wasting and underweight have repeatedly been identified as contributors to morbidity and mortality among children. The use of vitamin and mineral supplements is one of the strategies being implemented worldwide to prevent these forms of malnutrition.

Objective:
The study determined the prevalence and the association of taking vitamin and mineral supplements with stunted, wasted and underweight Filipino children 6-36 months.

Materials and Methods:
This study was a cross-sectional analysis of the 2015 Updating of the Nutritional Status of Filipino Children and Other Population Groups Survey which included data of 4,788 children aged 6-36 months old. Descriptive statistics of the study population was done using descriptive and bivariate analyses while association of intake of vitamin and mineral supplements with stunting, wasting and underweight were tested using logistic regression analyses.

Results and Findings:
Intake of vitamin and mineral supplement were significantly associated with children’s age, maternal characteristics (education, working status, number of children, and pre-natal visits attended), household’s socio-economic status, food security status, and place of residence.

Results of the study showed a higher percentage of underweight (20.5%; p=0.0070) and stunted (32.0%; p=0.0003) children among those with no vitamin and mineral supplements compared to their counterparts. Binary logistic regression analyses revealed that children with intake of vitamin and mineral supplements were 22.0% less likely to be underweight (OR=0.78, p=0.007), and 25.0% less likely to be stunted (OR=0.75, p<0.001). No significant association was noted between wasting and intake of vitamin and mineral supplement.

Conclusion and Recommendations:
Considering that malnutrition substantially contributes to the global burden of disease, the results have shown that current programs on vitamin and mineral supplementation, nutrition education among mothers during pre-natal visits, and on reaching more poor households, most especially those who are food insecure and those who reside in rural areas need to be strengthened.