

Vitamins A and E deficiencies among pregnant women attending antenatal care at general hospital Dawakin Kudu, northwest Nigeria

Ngozi Duru and Emmanuel Ugwa
Zoputa Clinic and Maternity Ltd, Nigeria

Vitamin A and E malnutrition is prevalent in developing countries and their levels are low in pregnancy. This study was undertaken to determine the serum vitamins A and E status among pregnant women attending antenatal care at a General Hospital in Dawakin Kudu, Kano and to provide the necessary information needed to suggest the supplementation of vitamin A and E during pregnancy. This was a prospective study of 200 pregnant women at various maternal ages, gestational ages and parities. Ethical approval was obtained. Research structured questionnaire was administered to 200 respondents which showed age and parity distributions. Determination of Serum Vitamin A and E was done using appropriate biochemical methods. Data obtained were analyzed using SPSS version 16 statistical software. Descriptive statistics was done. Mean serum vitamins A and E concentration between trimesters were compared using two-way ANOVA and $p < 0.05$ was considered statistically significant. Majority of the women were aged 20-39 years with mean of 23.67 ± 6.11 . Most were in the 1-4 parity range. Mean birth weight was 2.42 ± 0.74 kg. Above 65% were deficient while 34.5% had normal levels of vitamin A and 51% were deficient of serum vitamin E. Serum vitamins A and E levels showed a marked reduction from first through third trimester. The differences were statistically significant ($p < 0.05$). There is a significant reduction in the serum vitamins A and E concentration throughout the period of pregnancy with the highest levels in the first trimester. Further studies should evaluate the value of vitamin A and E supplementation during pregnancy.

zoputaclinic74@gmail.com

Notes: