Korelasi antara kadar vitamin E plasma dengan jumlah limfosit CD4 penderita HIV/AIDS di RSPUN Dr Cipto Mangunkusumo

T. M. Marini, author

Abstrak

Tujuan : Mengetahui korelasi antara kadar vitamin E dengan jumlah limfosit CD4 penderita HIV/ AIDS

Tempat : Klinik Kelompok Studi Khusus AIDS Fakultas Kedokteran Universitas Indonesia/ RSUPN Dr. Cipto Mangunkusumo, Jakarta.

Metodologi : Penelitian potong lintang pada 52 penderita HIV/ AIDS , berusia 20-40 tahun. Data yang diambil meliputi data demografi, infeksi oportunistik, asupan energi asupan lemak dengan metode food recall 1x24 jam, asupan vitamin E dengan food frequency questionnaire (F Q) semikuantitatif, kadar vitamin E plasma dan hitung limfosit CD4. Analisis bivariat dilakukan dengan menggunakan uji korelasi Pearson.

Hasil : Subyek terdiri dari 44 orang laki-laki dan 8 orang perempuan, median usia 26 tahun, 75% berpendidikan sedang, 63,5% berpenghasilan di bawah UMP, 59,6% tidak merokok, 80,77% golongan IDU, 82,7% AIDS, 80,8% dengan IO. Rerata IMT 19,53 kg/m2 dan 53,8% termasuk normal , rerata asupan energi 1574,1 ± 198,48 kkal, rerata asupan lemak 31,17 ± 7,26%, median asupan vitamin E 10,00 ± 1,82 mg/ hari, dan 84,6% memiliki asupan vitamin E kurang. Nilai median kadar vitamin E plasma 22,59 (11,08-70,24) µmol/L dan 90,4% subyek memiliki kadar vitamin E normal. Didapatkan korelasi positif bermakna antara asupan lemak dengan kadar vitamin E plasma(r=0.307, p-0.027*) dan antara asupan vitamin E dengan jumlah CD4 (r=0.363, p=0.008*). Tidak ada korelasi antara IMT dengan limfosit CD4 (r-0.210, p=0.135), asupan vitamin E dengan kadar vitamin E plasma (r-0.222, p=0.114), kadar vitamin E plasma dengan jumlah limfosit CD4(r= 0.028, p'.843).

Kesimpulan : Tidak terdapat korelasi antara kadar vitamin E plasma dengan jumlah CD4 penderita HIV/ AIDS.

<hr>

<i>Objective : To investigate the correlation between plasma vitamin E concentration and the number of CD4 lymphocytes count in HIV/ AIDS patients

Method : This was a cross-sectional study involving 52 HIVIAIDS patients, aged 20-40 years in University of Indonesia AIDS Working Group (POKDIKSUS) Clinic at Dr Ciptomangunkusumo General Hospital Jakarta. Data were collected including demographic characteristic, energy and fat intake by the 24-hour dietary recall method, vitamin E intake using FFQ semi quantitative method, vitamin E plasma concentration and CD4 lymphocytes count. Statistical analysis was carried out using Pearson's correlation test to investigate the correlation between vitamin E plasma concentration and the number of CD4 lymphocytes count in HIVIAIDS patients.

Result : The subjects were comprised 44 men and 8 women with median of age 26 years. 75% of the subjects were in middle education level; 63.5% were earned under Jakarta's minimum wages; 59.6% were non-smoker; 80.77% were IDU; 82.7% were infected by AIDS; and 80.8% with opportunistic infection. The BMI mean was 19.53kg/m2 of which 518% were normal. The mean of daily energy intake was 1574.11 ± 198.48 kcal, the mean of fat intake was 31.17 ± 7.27%, the median of vitamin E intake 10.00 (7.67- 15.38) mgld and 84.6% had a low vitamin E intake. The median value of vitamin E plasma level was 22.59 (11.08-70.24) µmol/L and 90.4% of subjects had normal vitamin E plasma concentration. There was a significant correlation of fat intake with vitamin E plasma concentration (r=0.307, p=0.427*), also of vitamin E intake with CD4 lymphocytes count (r 0.363, p-0.008*). But, there was no correlation of BMI with CD4 lymphocytes count (r0.210, p=0.135), of vitamin E intake with vitamin E plasma concentration (r=0.222, p=0.114), also the concentration of vitamin E plasma with CD4 lymphocytes count (r= 0.028, p=0.843).

Conclusion: No correlation was found between plasma vitamin E concentration and CD4 lymphocytes count in HIV/ AIDS patients..</i>