

EFFECT OF ORAL CONTRACEPTIVES AND INJECTABLE CONTRACEPTIVES ON VARIOUS BIOCHEMICAL PARAMETERS

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This study was carried out to determine the biochemical effects of oral contraceptive (OC) and the injectable contraceptive (IC) on the users. These two routes of administration are more commonly used in our country. For this experiment three groups each consisting of twenty (20) subjects were selected from Jaffna Municipality area. Tests were done in all three groups (OC users, IC users and non users). Serum ascorbic acid levels were significantly decreased in both the OC and IC users compared with the controls. Catecholamine excretion was determined by the amount of VMA excreted in 24 h urine sample. There was a significant increase in OC users. Serum protein, iron, iron binding capacity, triacylglycerol and uric acid levels were significantly increased in both the OC and IC users. There was no significant difference between both types of contraceptive users and non-users in serum bilirubin, calcium, free fatty acids, glutamate oxaloacetate transaminase, glutamate pyruvate transaminase, blood glucose, and glucose tolerance. These results indicate that the use of contraceptives oral or injectable, had significantly increased serum protein, triacylglycerol, iron, iron binding capacity levels and nucleic acid metabolism.

Result

The main tool of our investigation relies on the representation of $\int_D dy P_D(x, y; t)$ as a Wiener probability $P_{X, D}(T > t)$ that a Brownian motion $B(\cdot)$ with $B(0) = X$ does not leave D until t :

$$P_{X, D}(T > t) = \int_D dy P_D(x, y; t). \quad [3]$$

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