ABSTRACT

Anticardiolipin antibodies in Jamaican women: The relationship to thromboembolic disorders and pregnancy.

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Anticardiolipin antibodies (aCL) are a heterogeneous group of antiphospholipid antibodies associated with recurrent arterial and venous thrombosis, recurrent pregnancy loss and thrombocytopenia. This thesis examines the role of aCL as a risk factor for thromboembolic disease, their seroprevalence and effects in pregnancy.

This study has: (1) A case-control study in which aCL were measured in young women with venous thromboembolism (VTE), Stroke (CVA) or myocardial infarction (MI) and in age-matched controls. (2) A prevalence survey of aCL and pregnancy outcome among primiparous women.
Serum samples were assayed for both $\beta_2$ glycoprotein 1 dependent and $\beta_2$ glycoprotein 1 independent aCL using enzyme linked immunosorbent assays (ELISA).

In the case-control study of cardiovascular diseases, aCL were present in 16/50 (32%) of cases compared to 25/148 (17%) of controls ($p=0.02$). The unadjusted odds ratio (OR) and 95% confidence interval (95% CI) for thromboembolic disease associated with aCL was 2.32 (1.10-4.87). Other significant risk factors were hypertension and a history of other heart diseases. $\beta_2$ glycoprotein 1 dependent aCL were an independent risk factor for thromboembolic disease 4.56 (1.76-17.83). In subgroup analysis, the adjusted OR (95% CI) associated with aCL in cases of MI and stroke was 1.76 (0.46-6.73) and 3.32 (1.15-9.54) for VTE.

Among the primiparae, 49/924 (5.3%) were positive for aCL on at least one occasion and 32/671 (4.8%) were positive on two occasions. Three of thirty two primiparae were positive for $\beta_2$ glycoprotein 1 dependent aCL.
aCL are a risk factor for thromboembolic disease in Jamaican women. They confer a strong independent risk for venous thromboembolism. The prevalence of aCL in primiparous women was low and not associated with abnormal pregnancy outcome.

**Key words:** Eulalia Kahwa, anticardiolipin antibodies, stroke, antiphospholipid antibodies, myocardial infarction, venous thromboembolism, primiparae, Jamaican Women.