

P-1457 - ASSOCIATION BETWEEN MENTAL HEALTH PROBLEMS DURING THE SECOND TRIMESTER OF PREGNANCY AND BIRTH LENGTH OF THE NEWBORN

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Introduction: Studies have shown that mental health problems during pregnancy have adverse effects on fetal growth. The impact of depressive and anxiety symptoms during pregnancy on the fetus have not yet been examined in Singapore.

Objectives: To examine the association between mental health problems during the second trimester of pregnancy on the quality of the pregnancy, reflected by birth weight and birth length of the newborn.

Aims: This study aims to understand the importance of mental health during pregnancy on the development of the child in an Asian population.

Methods: Preliminary data of a prospective cohort study of pregnant women (GUSTO), were followed from pregnancy onwards. At 26 weeks of the pregnancy, the Edinburgh Postnatal Depression Scale (EPDS), the Beck Depression Inventory (BDI) and the State Trait Anxiety Inventory (STAI) were administered. Data on birth parameters were collected from medical records.

Results: Linear regression analyses of preliminary data show negative correlations between depressive symptoms measured with EPDS (n=1025, P=0.54), BDI (n=1012, P=0.001), and anxiety symptoms measured with STAI (n=1023, P=0.002) and birth length (corrected for gestational age and gender). No associations were found for birth weight.

Conclusions: There is an association between depressive and anxiety symptoms reported at the end of the second trimester of the pregnancy and birth length, but not birth weight, of the newborn. As it is known that fetal length increases mainly in the second trimester, it suggests that stress of the mother influences the development of the fetus during this trimester.