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**Original article:**

**Association of Hypertension and Cerebral Venous Thrombosis among the Women in the Puerperal Period – A Prospective Study**

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**Abstract**

**Background:** Pregnancy and puerperium are important risk factors for CVT. CVT can be caused by a number of prothrombotic states and disorders of clotting system such as inherited cause is Protein C resistance secondary to Factor V Leiden polymorphism, Protein C and S resistance, and antithrombin III deficiency. Pre-existing hypertension, pregnancy induced hypertension, pre-eclampsia and eclampsia were considered as independent risk factors in the development of CVT among the antenatal and puerperal mothers.

**Aim:** To assess the association between hypertension and CVT among the antenatal and puerperal mothers and also to analyse the clinical profile and the outcome of all those patients with CVT.

**Methodology:** A prospective study was carried out over a period of three years in the Neurology department of Coimbatore medical college. Pregnancy and puerperium associated CVT patients whom were confirmed by magnetic resonance imaging (MRI), MR venogram , plain/contrast CT were included in the study. A total of 102 patients were enrolled for the study in the period of 3 years. The patients demographic details including the diabetic and hypertensive status along with their family history was obtained by using a detailed questionnaire.

**Results:** Majority of them were between the age group of 18 - 25 years. CVT was more common among the multipara with the birth order of 2 or more when compared to the primi mothers. Headache was found to be the most common symptom followed by nausea/vomiting and seizures. 70% of the patients with CVT had either a history of pre-existing hypertension, pregnancy induced hypertension or being detected as a new case of hypertension.

**Conclusion:** Regular screening of blood pressure and early identification of high blood pressure and effective intervention both in the form of pharmacological management and life style modification will bring down the incidence of CVT due to hypertension.

**Keywords:** cerebral venous thrombosis, puerperium, antenatal, hypertension, anticoagulant