Aetiology/risk factor and disability assessment in children with stroke presented to Stroke Unit, National Hospital of Sri Lanka.

Introduction: Aetiology for stroke in children may vary between different communities and geographical locations. The risk factors for stroke in children are numerous and differ greatly from adults; a thorough diagnostic evaluation can identify aetiology/risk factors in most patients. Further assessment of disability associated with such an event was not evaluated in many paediatric studies.


Method: The data of children aged 1 to 16 with stroke presented to stroke unit from January 2005 to June 2007 were analysed. Disability assessment was performed at the using the Barthel index for daily activities.

Results: There were 30 patients with an age range of 1-16 years (mean age 8.5 years). Boys 53%. There were 25 (83%) ischaemic and 5(17%) intracerebral haemorrhages. Possible aetiology was detected in 25(83%). Of the intracranial haemorrhages two presented with AVM’s and one each with haemophilia, low platelets and trauma. Commensest cause for stroke was cardioembolic (20%) followed by unknown causes (17%). Extra cranial carotid dissections, infective/inflammatory causes and Moya moya disease accounted for 7% each. Following snakebite one child had a stroke. Barthel index calculated at the onset of the event ranged between 3-15, while on follow up at 6 months it improved to 14-20.

Conclusions: Ischemic stroke is the commonest cause for paediatric stroke in the present series, an aetiology for ischemia was detected in 83%. Cardioembolic was the commonest cause identified. In 17% of patients no cause was identified despite extensive investigations. Disability assessment revealed that most children had an improvement in their daily activity scores over time.