Abstract

Background: The pattern of stroke displays ethnic and geographical variations. In Sub-Saharan Africa there is scarcity of data from Eastern and Central Africa.

Objective: To describe the characteristics of patients with ischemic cortical stroke in a Kenyan referral hospital.

Study design and set up: Retrospective study at Kenyatta National Hospital, Nairobi Kenya.

Patients and methods: Records of adult black Kenyan patients seen with ischemic cortical stroke at Kenyatta National Hospital, Nairobi, Kenya between January 2007 and December 2011 were examined for age, sex, site, comorbidities and outcome. Only files with complete data were included. Data were analyzed by SPSS version 17.0 for Windows and presented in tables and bar charts.

Results: Three hundred and seven cases of ischemic cortical stroke were analyzed. Mean age was 54.7 years, with 20.6% of cases occurring below 40 years. The male: female ratio was 1:1.2 with female predominance in all age groups. Brain regions most commonly affected were fronto-parietal (32.8%) and parietal (31.6%), while 11.6% involved extensive regions of the cerebral cortex. Predominant single comorbidities were hypertension (64.1%), smoking (19.2%), alcohol (13.4%), HIV infection (6.8%) and bacterial infections (6.8%). Multiple risk factors were implicated in 42.4% cases. Two hundred (65.1%) suffered paralysis; 70 (22.8%) clinically recovered and 37 (12.1%) died within 90 days.

Conclusion: Ischemic cortical stroke occurs in young individuals in over 20% of the study population and is female predominant. Hypertension, cigarette smoking and infections including HIV are the leading comorbidities, and it causes high morbidity. Control measures comprising regulation of blood pressure, reduction of smoking and prudent management of infections should be instituted from early in life.