

**The 7th Conference on Health Care of the Chinese in North America**  
**Epidemiology of Cerebrovascular Disease Among Chinese-Canadians**



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**Abstract**

Orientals are generally known to have more intracranial vascular stenosis and a lower incidence of carotid stenosis than Caucasians. The following is a retrospective analysis of 121 stroke patients seen at a private Neurologic practice in Toronto between 1990 and 1992.

There were 30 Orientals and 91 Caucasians. 24/30 of the Orientals were of Chinese descent while 5/30 were Vietnamese Canadians and one was Filipino. Their mean age was 67 (range 27-87) years. The average duration of symptom was 1.95 years. There were 4 severe, 14 moderate, 12 mild cases with one death. 19/30 had left hemispheric and 8/30 right hemispheric involvement; 3 were bilateral. 90% of the cases in the Oriental group were cerebral infarctions while 10% were intracranial or intraventricular hemorrhage. 74.1% were in the carotid territory and 25% were in the vertebrobasilar territory.

In the Oriental group, 80% of the infarctions were subcortical while it was only 52.2% in the Caucasians ( $p < 0.01$ ). Hypertension was present at 76.7% in the Orientals and at 55.5% in Caucasians ( $p < 0.05$ ). Carotid stenosis is far more common in Caucasians (27.5%) than in Orientals (10%) with  $p < 0.05$ . There was no statistical significance in the incidence of diabetes mellitus, coronary artery disease, peripheral vascular disease among the two groups.

It can be concluded that Chinese-Canadians have a higher incidence of subcortical lacunar infarctions due to intracranial vascular stenosis and a lower incidence of extracranial carotid stenosis than Caucasians. This difference could be related to higher incidence of hypertension among Orientals as a result of their higher dietary salt intake. Reduced meat and fat in their diet has been hypothesized in the contribution of intracranial small vessel disease.