

RECURRENCE OF CEREBROVASCULAR EVENTS AND CASE FATALITY IN PATIENTS WITH SLEEP BREATHING DISORDERS AND ISCHEMIC STROKE OR TRANSIENT ISCHEMIC ATTACKS: A FOLLOW-UP STUDY

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Aim: The aim of the study was to assess the morbidity and case-fatality as well as functional outcome in patients with ischemic stroke or TIA and SBD as compared with patients with stroke or TIA without SBD. **Methods:** 89 patients (mean age 65.2 ± 10.3 ; 77 males 12 females, 69 patients with stroke and 20 patients with TIA) without previously diagnosed SBD, were screened for SBD in the first 7 days after transient ischemic attack or ischemic stroke. The clinical status was assessed with National Institute of Health Stroke Scale (NIHSS), the functional outcome was evaluated with Rankin and Barthel scales. The patients were stratified according to AHI into groups without SBD ($AHI \leq 5$) and with SBD ($AHI > 5$). We analyzed case-fatality rates and rates of TIA or stroke recurrence within 2 years of observation, as well as clinical (NIHSS) and functional outcome (Barthel and Rankin scales) in 3 and 24 months follow up. Clinical parameters: age, BMI, cardiovascular risk factors and fibrinogen plasma level were also analyzed. Statistical comparisons were performed with one-way non parametric ANOVA followed by Dunn's post hoc test and with chi-square tests. **Results:** SBD ($AHI > 5$) were present in 61 (68.5%) patients with stroke or TIA. The rate of recurrence of TIA or stroke in patients with SBD was significantly higher (12 patients-19.7%) as compared with patients without SBD (3 patients – 10.7%) within two years of observation, $p < 0.05$. Case fatality rates were not significantly different between these two groups (4 patients - 7% with SBD and 2 patients – 6.8% without SBD). There were no significant differences in neurological status (NIHSS) between patients with and without SBD (NIHSS 2.08 ± 1.6 and 1.96 ± 1.4 respectively; $p > 0.05$) during 3 months' follow-up. We did not find any differences either in the functional outcome (Barthel and Rankin scales) during 3 and 24 months' follow-up between patients with and without SBD. **Conclusions:** Our data show that SBD significantly increased the incidence and risk of recurrent TIA or ischemic stroke in patients with TIA or stroke during two years' follow-up. SBD in patient with stroke or TIA did not influence the clinical and functional outcome of stroke in the long term observation.