

## **DOES A CEREBRAL ANGIOSPASM POSE A PROBLEM IN ENDOVASCULAR PROCEDURES OR NOT?**

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Cerebral angiospasm (CA) was supposed as one of the complications after endovascular treatment (ET). Purpose of the study: to estimate incidence of CA during ET, to reveal possible causes of its development and its role in postoperative complications.

Material and methods: 59 patients were investigated (32 men and 27 women) for ET: internal carotid transluminal balloon angioplasty with stenting (TBAS) in symptomatic stenosis about 70% – 17 patients (the first group), selective embolization of afferents and stroma in arteriovenous cerebral malformation (AVM) with glue mix – 12 patients (the second group), endovascular exclusion of cerebral arterial aneurysms – 30 patients (the third group).

Results: CA detected with the use of cerebral angiography and transcranial Doppler sonography was revealed in 16 (27,1%) patients. In most cases (93,8%) CA had mild and moderate severity and transient nature (no more than 15 minutes). CA developed in conditions of active and durable procedures in different segments of cerebral arteries by technical difficulties. Persistent residual neurologic deficiency was noted in 2 (3,4%) patients, however, without CA. In the first group CA was revealed in 29,4% of the cases, thereby 1 patient developed ischemic stroke (IS) of embolic origin. In patients of the second group CA was detected in 16,7% of the cases. In the third group CA rate was 30,0%, and 1 patient had an IS as a result of acute thrombosis.

Conclusions: CA was an often event during endovascular treatment and did not followed by persistent residual neurologic deficiency.