Is the posterior cerebral artery worth endovascular treatment?

Teresa P. Morais¹, Catarina Perry da Câmara¹, Carolina Pinheiro¹, Isabel Fragata¹, Patrícia Ferreira², Ana Paiva Nunes², and João Reis¹

From the Lisbon Stroke Summit, Lisbon, Portugal. 6–7 April 2018.

Abstract

Background: Between 5% and 10% of all acute ischemic strokes occur in the posterior cerebral artery (PCA) territory. Endovascular treatment (EVT) in small vessels like PCA is still controversial regarding efficacy and safety.

Results: We report a case of a 87-year-old man with previous history of carotid endarterectomy, ischemic heart disease and atrial fibrillation, treated with dabigatran, who presented at ER with persisting feeling of being unwell for 2h. Neurologic examination revealed deviation of the eyes and head to the right, left homonymous hemianopsia, a left central facial palsy, dysarthria, left superior limb plegia and left inferior limb paresis and left sided hemihypoesthesia, scoring 15 points in NIHSS.

Computed tomography (CT) showed no signs of acute lesion and CT-angiography revealed right PCA P1 occlusion. MRI was contraindicated due to cardiac pacemaker. There was an absolute contraindication for the use of t-PA because the patient was under anticoagulation, so after multidisciplinary discussion we opted for emergent endovascular clot aspiration. A TICI 3 was obtained in the end of the procedure (294 minutes after symptoms), with no complications. The 24h-control CT showed a hypodense lesion in the right lenticular nucleus, the posterior limb of the internal capsule and the right anterior thalamus.

The patient was discharged 10 days after the intervention, with slight gait disturbance, scoring 1 point in NIHSS and a mRS of 1. Assuming this was a cardioembolic stroke we decided to switch the anticoagulant to apixaban 2,5mg, 2id, due to age over 80 years and weight under 60 kg.

Conclusions: PCA occlusion may present with significant neurologic disability. EVT is useful for acute PCA occlusion and might improve outcome in selected patients.