



## Proximal basilar artery fenestration with bridging artery appearance

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The basilar artery develops during foetal life by fusion of the plexiform primitive longitudinal neural arteries. Failure of this process may result in anatomic variants along its course, most often in the proximal portion (Krings *et al.*, 2007). A 42-year-old woman with essential arterial hypertension was admitted to our department to investigate her first episode of migraine. Neurological examination was unremarkable. Transthoracic and transoesophageal echocardiograms were normal, excluding the presence of patent foramen ovale. Head MRI detected no abnormalities; MR-angiography revealed proximal basilar artery fenestration (Fig. 1). Proximal basilar artery variants occur in about 0.9% of the population (Songur *et al.*, 2008). No associations have been reported between this vascular abnormality and migraine, but this condition may represent a predisposing factor to saccular aneurysm formation at the vertebrobasilar junction (Kai *et al.*, 2006). Considering these findings, we suggested symptomatic therapy for migraine and we recommended annual MR-angiography follow-up to rule out possible aneurysm formation.

### REFERENCES

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FIG. 1. — MR-angiography: MIP view of the 3D-time of flight MRA shows type A basilar artery fenestration (bridging artery). Additionally an anatomical variant of Willis' circle is noted, with hypoplastic A1 segment of the right anterior cerebral artery, in the presence of dominant A1 on the left side. No other vascular abnormalities were detected.

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