To the Editor: We would like to record an unusual presentation of rupture of an internal carotid artery (ICA) aneurysm with carotido-tympanic leak presenting as a middle ear mass, profuse bloody otorrhoea and anterior and posterior epistaxis, resulting from the minor trauma of ear syringing for impacted wax. This is a rare major complication from a very minor procedure.

A 32-year-old man with wax impaction was treated with routine syringing. A few hours later, he presented as an emergency with profuse bleeding from the right ear and massive epistaxis which was very difficult to control. The haemoglobin concentration dropped to <6 g/dl, requiring several blood transfusions. Radiological investigations (magnetic resonance angiography (MRA), computed tomography (CT) and angiogram) revealed a 6 cm × 4 cm right proximal petrous (carotido-tympanic) internal carotid pseudo-aneurysm eroding the right petrous-mastoid bone, carotid canal, middle ear cavity and mastoid air cells. It is of note that the patient was HIV-negative. The aneurysm was successfully treated with a coated coronary stent; 18 months later, the patient was well.

Aneurysms of the petrous part of the ICA are rare.1 They are thought to arise because of developmental weaknesses in the arterial wall of the sites of origin of regressed embryonic arteries including the carotido-tympanic, pterygoid, vidian and stapedial arteries or the hyoid vessel. Histologically, there is degeneration of the internal elastic lamina and medial aplasia, as in intracranial berry aneurysms.1,2 The carotidotympanic artery, a vestige of the embryonic hyoid artery, is a small branch that arises near the genu of the petrous ICA and passes superiorly through the stapes to supply the middle ear cavity.3 The true incidence of carotido-tympanic petrous internal carotid aneurysm is not reflected in the literature but may account for 25% of extracranial ICA aneurysms.2 Most are congenital, but trauma and infections have been implicated.3 In addition, iatrogenic injury during myringotomy and temporal bone surgery has been reported.1,4

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REFERENCES