Rupture of vertebral artery dissection aneurysm during 3D DSA

A 60-year-old man with a history of headache and vomiting had a subarachnoid hemorrhage on CT scan. On 2-dimensional (2D) digital subtraction angiography (DSA), a possible dissection aneurysm of the vertebral artery was seen (video 1 on the *Neurology*[®] Web site at Neurology.org). During 3D DSA, the aneurysm suddenly ruptured (video 2), with intracranial hemorrhage. The pressure of contrast was 200 psi, the rate was 2 mL/s, with a total volume of 12 mL. The patient was transferred to the intensive care unit but died of brain herniation and vasospasm. Few dissection aneurysms rupture during 3D DSA, but the risk is likely attributable to continuous contrast hyperperfusion at high pressure.

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