Unusual complication of coronary angiography with retroperitoneal hemorrhage

A 58 year-old female referred to our outpatient clinic for effort angina and exertional dyspnea. She had a history of coronary artery bypass surgery which was 7 years ago and treated with aspirin, metoprolol, atorvastatin and ramipril. After evaluation of her angina she underwent elective coronary angiography. The vascular access for catheterization was the right femoral artery. A normal 7F size, J type guide wire could not negotiate a diffusely diseased and tortuous right iliac artery. Therefore a hydrophilic guide wire was used. There was no significant stenosis in her by-pass grafts and coronary arteries distal to grafts. A few minutes after the end of the coronary angiography, the patient started to complain of severe pain in her right flank. Urgent abdominal spiral computed tomography (CT) scan revealed a large right retroperitoneal hematoma, extending from the right peripheral space to the iliopsoas muscle (Fig. 1A, 1B). Abdominal CT angiography confirmed extravasation of contrast to the retroperitoneal space (Fig. 2).

Where is the origin of bleeding in this patient?

A. Right femoral artery
B. Hepatic artery
C. Right renal artery
D. Abdominal aorta