A 58-year-old man with a past medical history of poorly controlled hypertension and type 2 diabetes, presented to the ICU for a cardiogenic shock complicating acute myocardial infarction.

Physical examination revealed reduced level of consciousness (Glasgow Coma Scale 10/15) and weak vital signs; a blood pressure of 80/50 mmHg, 80% of oxygen saturation, capillary blood glucose at 2.26 g/L, a heart rate over 125 bpm, and crackling in pulmonary auscultation.

Cardiovascular examination showed neither cardiac murmur nor signs of right heart failure.

ECG on admission showed normal sinus rhythm, with heart rate of 125 bpm and extended ST-elevation in anterior territory.

Laboratory results demonstrated Troponin I level of 6.41 ng/ml, creatinine kinase (CKMB) was 67 UI/L, Lactate deshydrogenase was 281 UI/L, glucose level 2.70 g/l, urea 0.40 g/l and creatinine 18.6 mg / L.

The patient was intubated and sedated, inotropic agents were started (norepinephrine 0.4µg/kg/min and dobutamine 20µg/kg/min).

Chest X-rays showed diffuse alveolar syndrome.

Transthoracic echocardiography revealed wall motion abnormalities namely extensive akinesis of anteroseptal, anterior, lateral and inferior walls, and severe left ventricular systolic dysfunction (ejection fraction of 29%).

Medical management was initiated; anticoagulant therapy for acute coronary syndrome was started (500 mg of acetylsalicylic acid and subcutaneous low-molecular-weight heparin (0.6ml of enoxaparin)) and patient was prepared for myocardial revascularization by coronary angioplasty.

Because of non-improvement of neurological status and occurrence of seizures, a brain CT was indicated and revealed infratentorial diffuse hemorrhage (Fisher grade III) (Figure 1).

Cerebral angiography confirmed a dissecting aneurysm of an anastomotic branch between left PICA and the V4 segment of left vertebral artery Figure 2 that was successfully embolized.

After 24 hours, the patient improved with withdrawal of vasoactive drugs in 24 hours.

Left hemicorporeal seizures persisted despite anticonvulsant treatment.

Control brain CT did not report rebleeding and angiography showed complete exclusion of the aneurysm while the EEG revealed a diffuse brain damage.

10 days after admission, the patient was discharged in stable condition but still suffers from amnesia.