A 61-year-old man with prior history of atrial fibrillation, diabetes with poor metabolic control, hypertension, ischemic heart disease and peripheral arterial occlusive disease, underwent carotid artery stent (CAS) of left internal carotid artery. Five months after CAS he presented a left anterior circulation stroke syndrome (NIHSS 19) and was admitted at the hospital. Brain CT showed a left frontal operculum cortico-subcortical hypodensity. CT angiography revealed left carotid artery stent occlusion and a large intrastent pseudoaneurysm. Radiologic findings were corroborated by cerebral angiography, so coil embolization of pseudoaneurysm and a new stenting procedure in the left internal carotid artery was performed. Upon admission, the patient presented a high fever, blood cultures showed the presence of methicillin-resistant Staphylococcus aureus and vancomycin was initiated. Cerebrospinal fluid had a white blood cell count of 427/mL (60% polymorphonuclear neutrophils), a protein level of 194mg/dL and a glucose level of 23% of serum glucose. Infective endocarditis with septic meningoencephalitis was suspected and gentamicin was initiated; however, a transoesophageal echocardiogram excluded vegetations. Neck CT and MRI, performed 12 and 17 days after admission, demonstrated inflammatory changes of the pseudoaneurysm formation. Despite adequate antibiotic therapy the infection could not be controlled and the patient died. Infection involving endovascular devices are rare, particularly those associated with a carotid artery stent.