Cardiac angiosarcoma: a race against time

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Introduction: Primary heart tumors are rare, with the majority being benign. The most prevalent malignant cardiac tumor is angiosarcoma. It is characterized by aggressive growth and broad spectrum of clinical manifestations. The primary treatment approach for cardiac angiosarcoma primarily involves surgical excision, as it tends to exhibit significant resistance to chemo and radiation therapy.1,2

Case report: We present a 63-year-old female who reported chest discomfort three days prior to her hospital admission. An echocardiogram unveiled a tumor mass in the left atrium, measuring 37x74 mm, which extended into the left ventricle. Additionally, there were two smaller tumor masses located at the apex of the left ventricle and an additional mass in the left ventricular outflow tract, measuring 22x13 mm. Initially, there was no compromise in circulation. However, during initial hospitalization and subsequent evaluation, the patient developed obstructive shock due to the tumor masses. Urgent surgical resection was performed, which involved the removal of the masses. The pathology examination confirmed that the masses were consistent with cardiac angiosarcoma. The initial recovery was promising as echocardiography indicated the absence of intracavitary masses. However, a subsequent CT scan unveiled secondary lesions within the mesenteric soft tissue. Following a multidisciplinary consensus, chemotherapy involving paclitaxel was promptly initiated. Despite intensive treatment efforts, on the eleventh day following the surgical procedure, an echocardiogram revealed a tumor mass in the left atrium that extended into the left ventricle, closely resembling the original mass in size, causing the mitral stenosis with a mean pressure gradient of 22 mmHg. Regrettably, the patient chose to discontinue treatment, which ultimately resulted in a fatal outcome shortly after being discharged from the hospital.

Conclusion: Cardiac angiosarcomas are exceptionally rare tumors, often displaying diverse clinical presentations. Despite diligent diagnostic and therapeutic efforts, their rapid growth and destructive nature can be challenging to grasp, acting discouraging for both physicians and patients. Nevertheless, it remains crucial to report cases of angiosarcoma to achieve improved treatments in the future.

LITERATURE