

Conference

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Title

Hemorrhagic Cervical Synovial Cyst with Atypical Chest Pain Presentation

Authors

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Case Diagnosis

Cervical Hemorrhagic Synovial Cyst

Case Description

A 58-year-old male with a 5-month history of tingling in his right shoulder region, radicular pain in his right arm and increased pain on the right chest wall that worsened with lying supine down. The patient was diagnosed with a right-sided hemorrhagic synovial cyst at the C7-T1 level. Physical exam showed cervical spine motion was limited in all planes and elicited right forearm and medial hand pain in flexion, medial arm pain with right lateral rotation and right chest wall pain with right side bending. Tactile sensation response was decreased in the right medial hand, fourth and fifth digits. Cervical spine MRI demonstrated hemorrhagic synovial cyst at right C7-T1 level with severe right zygapophysial joint degenerative changes and severe ligamentum flavum thickening causing severe right foraminal stenosis and mild to moderate central canal narrowing. He underwent a C7-T1 laminoforamintomy and cyst removal with total resolution of his pain and symptoms.

Discussion

Cervical hemorrhagic synovial cysts are rare. In addition, we have a unique presentation of chest pain when lying down from a Musculoskeletal or neurological etiology instead of a cardiac etiology. The patient's chest pain worsened in the supine position. Our hypothesis for this contradictory presentation is related to the relative neck flexion that occurred when lying down with the neck supported. Based on the position of the synovial cyst in relation to the right C8 nerve root, this small amount of motion would have a more dramatic impact.

Conclusions

Documented cases of cervical synovial cysts are rare, and hemorrhagic cervical synovial cysts are extremely rare. To the best of our knowledge, this is the seventh documented case. We describe the hypothesis and potential pathophysiology of this unique noncardiac chest pain presentation.