

Lumbar Extradural Synovial Cyst: An Uncommon Cause Of Cauda Equina Syndrome

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INTRODUCTION:

Extradural synovial cysts may be asymptomatic or may cause compression of neural structures and hence associated clinical symptoms. Most of the patients present with radicular pain and neurological deficits. They may be unilateral or bilateral and at one or multilevel. MRI is considered for the characterization of synovial cysts and for preoperative planning.

MATERIAL AND METHODS:

A 73-year-old man complained of low back pain with bilateral painful radiculopathy for a period of two months. Two years ago, he fell and subsequently worsening. He also complained of weakness and neurogenic claudication of both legs. He did not have incontinence of the bowel or the bladder. The straight-leg-raise test on the right side is positive. There was diminished sensation to light touch in the distribution of the L3 and L4 dermatomes. MRI showed an obvious L4 intracanal synovial cyst with L1/2 to L4/5 posterior disc bulge with L3/4 & L4/5 bilateral exit foramina stenosis and L4/5 spinal canal stenosis (Figure 1). The posterior elements from L3 to L5 were exposed and a 2cm x 2cm synovial cyst was visualized at the left lateral aspect of the spinal cord (Figure 2). It was excised and subsequent histological examination revealed to be consistent with synovial cyst. Posterior instrumentation and decompression was done. (Figure 3)

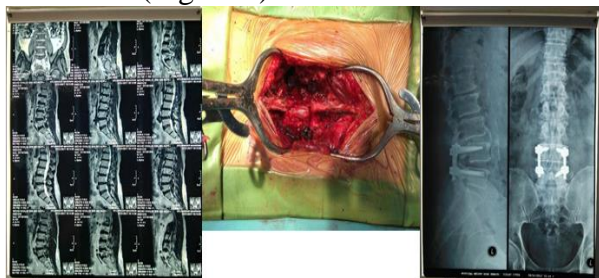


Figure 1

Figure 2

Figure 3

DISCUSSION:

Spinal cysts are commonly found at L4-5 level, the site of maximum instability. Synovial cysts in the spine occur predominantly in the lumbar as compared to thoracic and cervical areas. Clinically it is difficult to distinguish between extradural lumbar cyst and prolapsed intervertebral disc as both conditions may present in the same manner. In this particular patient a diagnosis of prolapsed intervertebral disc with spinal stenosis is possible to be considered as patient is above age of 50 years old. Other differential diagnosis such as arachnoid cyst, epidermal cyst, dermoid cyst and teratomatous cyst should be rule out. A MRI of lumbosacral spine and post-operative histopathological examination of the cyst confirmed it to be synovial cyst in this case.

CONCLUSION:

There is conservative management such as bed rest, analgesic, physiotherapy, corset, steroid injection or direct cyst puncture. Synovial cysts resistant to conservative therapy should be treated surgically. As seen in this case, posterior instrumentation and decompression with fusion remains the best option for this patient.

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