

Cervical spine stenosis and myelopathy secondary to posterior longitudinal ligament ossification

Dokponou Yao Christian Hugues^{*1}, Yehouenou Tessi Romeo Thierry² and Gazzaz Miloud³

¹Department of Neurosurgery, Mohammed V Military Teaching Hospital, Rabat, Morocco

²Department of Radiology, Mohammed V Military Teaching Hospital, Rabat, Morocco

Abstract

Posterior longitudinal ligament ossification is one of etiology of cervical myelopathy. We report in this article image a case of 80-years-old man with bilateral neuralgia with C6 root palsies. CT scan is the gold standard imagery for the diagnosis. The treatment depends on many parameters dealing with the level of compression as well as the severity of the symptoms

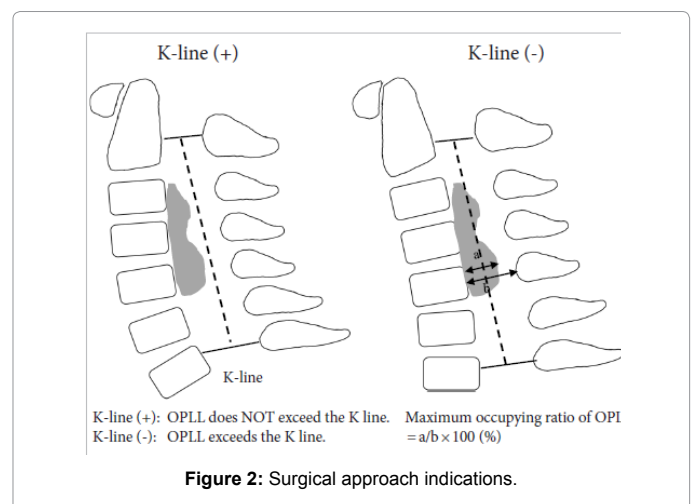
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Text

Ossification of the posterior longitudinal ligament (OPLL) is an important cause of cervical myelopathy that results from bony ossification of the cervical or thoracic posterior longitudinal ligament (PLL). It has been estimated that nearly 25% of patients with cervical myelopathy will have features of OPLL [1]. We report a case of 80-years-old man admitted in the neurological surgery department for cervico-brachial neuralgia with bilateral C6 root palsies. There were no other neurological findings associated. His past medical history was unremarkable. Cervical CT-Scan, sagittal view, shows a continuous type of OPLL extending over C2-C3-C4-C5-C6. The lesion is spontaneously hypodense with a broken sign, visible as a crack in ossification of the posterior longitudinal ligament plaque and also a hill-shape type (beak type) of OPLL at the C4-C5 level (Red arrow) Figure 1. The continuous type represents 25.97% of OPLL. The decision to treat these lesions is challenging. Various radiological parameters are used to evaluate cervical OPLL and to determine the surgical strategy Figure 2 [2]. For example, Fujiyoshi et al.[3] suggested that in the K-line (-) group, posterior decompression surgery would be unable to achieve a satisfactory posterior shift of the spinal cord and thus satisfactory neurologic improvement. Our patient is in this group. Moreover, looking at the patient advanced age, the decision for treatment or conservative management is very tricky. But the good news is that



Figure 1: Cervical CT-Scan, sagittal view, shows a continuous type of OPLL spontaneously hypodense extending over C2-C3-C4-C5-C6 with hill-shape type (beak type) of OPLL at the C4-C5 level (red arrow).



many other possibilities such as the anterior resection for OPLL with or without wide corpectomy and fusion or anterior and posterior combined surgery may be considered.

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***Corresponding author:** YEHOUENOU TESSI Romeo Thierry, Department of Radiology, Mohammed V Military Teaching Hospital, Mohammed V University, Morocco, Tel: 0613211125; E-mail: nactessi@yahoo.fr; nactessi2@gmail.com

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