Chronic low back pain: block vertebra

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DESCRIPTION

A 52-year-old woman came to our rehabilitation department with a history of chronic low back pain radiating to both the legs. Her history was uneventful except for well-controlled depression and occasional pain killers for last 4 years. Examination revealed considerable postural asymmetry with right hip higher than left and right shoulder lower than left, paraspinal muscle fullness in the lumbar region, decreased lumbar lordosis, tenderness in L2–L5 lumbar vertebrae and in gluteal region. There was significant pain on lateral bending and spinal rotation which increased while coming from flexion to hyper-extension. Manual muscle testing revealed weakness in abdominals, hip flexors (3/5) and quadriceps (4/5). Straight leg raising test was positive bilaterally and so was the prone lumbar instability test.

X-Ray showed Grade 1 anterolisthesis (figure 1) of L3 over L4, block vertebrae of L4 and L5 and degenerative changes are predominantly involving L5 and S1 vertebrae.

Considering it to be a case of block vertebra with chronic low back pain with radiculopathy, she was educated about her problem and various pain

relieving positions. Guidance was given on proper posture maintenance and body mechanics with regular strengthening exercises. Modalities like moist heat and cryotherapy were recommended to relax muscles and reduce pain. The presence of lumbar block vertebrae is less common,¹ but if present, it results in premature degenerative changes owing to altered biomechanics.² Thus early diagnosis of these anomalies and thorough workup will be helpful in establishing primary diagnosis and documenting long-term changes owing to these conditions. Also timely education of the patient to change life style can help keep various complications at bay.

Learning points

- ▶ Congenital blocked lumbar vertebra is a less common developmental disorder.
- ▶ Thorough workup of the patient is important to pin point affected areas.
- ▶ Patient education and life style modifications play a vital role.

Figure 1 Grade 1 anterolisthesis of L3 over L4, block vertebrae of L4 and L5 and degenerative changes are predominantly involving L5 and S1 vertebrae.

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Contributors DK supervised the overall patient management, NB helped in carrying out patient assessment, and PA and GK helped in differential diagnosis of the patient.

Competing interests None.

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