



## Checklist for Clinical Examination of the Lumbar and Thoracic Spine

### History

Ask questions pertaining to the following:

- ☐ Chief complaint
- ☐ Mechanism of injury
- ☐ Unusual sensations of numbness, tingling, or burning pain into the lower extremities
- ☐ Bowel or bladder dysfunction
- ☐ Type, quality, and location of pain or symptoms
- ☐ Previous injury (number of prior episodes and comparison with current episode)

*If chronic, ascertain the following:*

- ☐ Onset and duration of symptoms and pain patterns over time
- ☐ Aggravating and easing factors
- ☐ Irritability of symptoms

### Observation

- ☐ Visible facial expressions of pain
- ☐ Swelling, deformity, abnormal contours, or discoloration
- ☐ Ability to sit and stand comfortably; freedom of movement versus guarding
- ☐ Overall position, posture, and alignment
- ☐ Muscle development—are there areas of muscular spasm or atrophy? (Compare bilaterally.)

### Differential Diagnosis

- ☐ Squat test
- ☐ Sacroiliac dysfunction

### Range of Motion

- ☐ Active ROM for forward flexion, extension, lateral flexion, and rotation
- ☐ Passive ROM for the same motions if active ROM is not painful
- ☐ Costovertebral motion

### Strength Tests

- ☐ Active ROM against gravity and weight of trunk for trunk flexion (abdominals), lateral flexion, and extension

### Neurological Tests (if pain or symptoms are below the gluteal fold)

- ☐ Sensory for L2-S1
- ☐ Motor for L2-S2
- ☐ Reflex (patellar and Achilles tendons)

### Special Tests

- ☐ Neuropathy tests (Valsalva, straight-leg raise and well straight-leg raise, and slump tests)
- ☐ Spinal cord lesion tests (as indicated)
- ☐ Stork standing test (pars fracture)
- ☐ Passive Spring test (screen for SI joint dysfunction)

### Joint Mobility Examination

- ☐ Central PA pressure over spinous processes
- ☐ Unilateral PA pressure over transverse processes

### Palpation

Palpate for increased temperature, pain, tenderness, spasm, and restricted mobility:

- ☐ Bony: spinous processes, interspaces and interspinous ligament, ilium, sacrum, sacroiliac joint, sacrotuberous ligament, ischial tuberosities
- ☐ Soft tissue (superficial to deep): paraspinals, quadratus lumborum, abdominals, latissimus dorsi, lower trapezius, hip rotators (piriformis), gluteals

### Functional Tests

- ☐ Check for normal and unrestricted movement.
- ☐ Check ability to bend, turn out, cut, twist, run, and stride.
- ☐ Check for postactivity pain and spasm.