

## **Spine vs. Lateral Spine vs. Femoral Neck vs. Total Hip vs. Forearm**

If you ask us to measure a patient's spine bone density, we automatically measure the whole vertebrae, vertebral bodies, and also (at no additional cost) the femoral neck and total hip. Estrogen deficiency, androgen deficiency, and glucocorticoid excess each affect trabecular bone before cortical bone, and the bone loss caused thereby is first apparent in the vertebral bodies (lateral spine), later in the whole vertebrae (PA spine), then in the femoral neck, and last in the total hip and radius shaft. □□

Hyperparathyroidism and hyperthyroidism, in contrast, affect cortical bone before trabecular bone, so the bone loss they cause is apparent first in the radius shaft and total hip, and only later in the femoral neck and vertebrae. □□ When patients have conditions that threaten both types of bone loss (trabecular + cortical), physicians should order measurement of both the spine and arm.