

ISOKINETIC TESTING AND DATA INTERPRETATION

sample curves

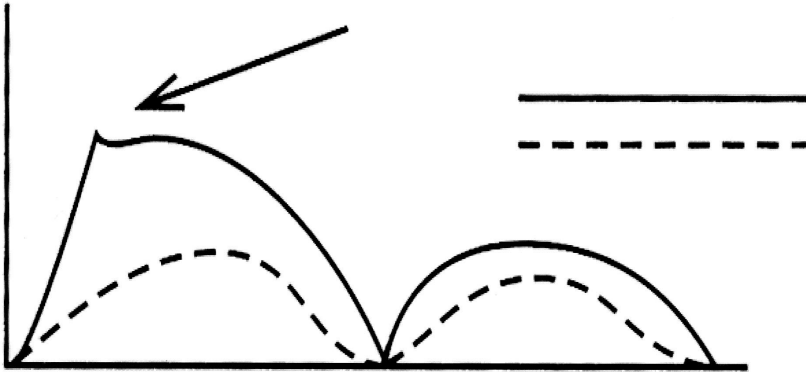


Figure 3-1. Isokinetic Torque Curves

Normal torque curves represented in normal line
Atrophic torque curves represented by dashed lines

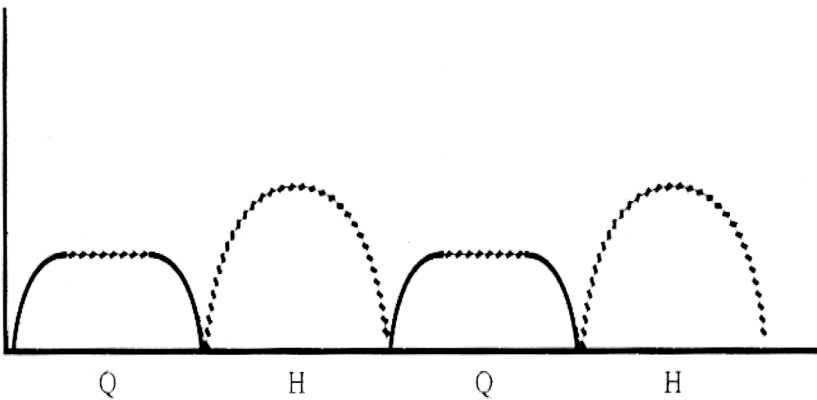


Figure 3-2. CHONDROMALACIA PATELLA*

- Characteristics:
 1. Decreased torque
 2. Plateau through mid ROM
 3. Irregularity (waviness) in torque curve

* Davies, G, (1992). A compendium of isokinetics in clinical usage and rehabilitation techniques (4th Edition). Onalaska, WI: S&S Publishers pp. 71-81.

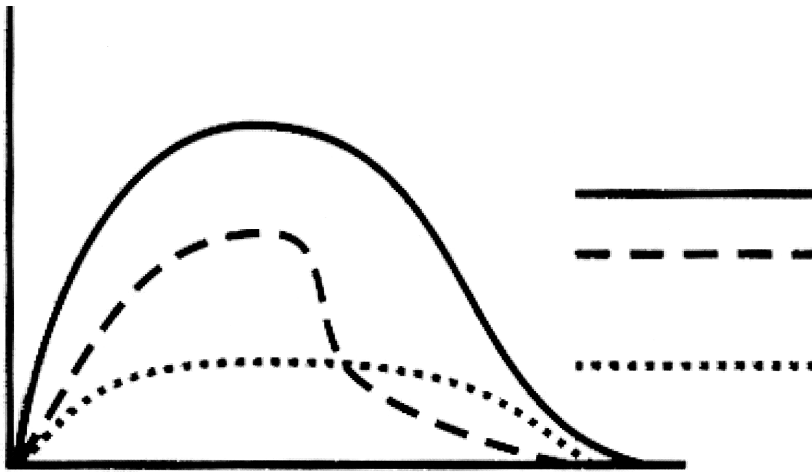


Figure 3-3. FEMORAL SHAFT FRACTURES

- Characteristics:
 - Proximal Femoral Shaft Fracture (— dashes)
 1. Rapid force decay rate (FDR)
 - Distal Femoral Shaft Fracture (..... Dots)
 1. Poor torque
 2. Poor Time rate of tension development (TRTD)

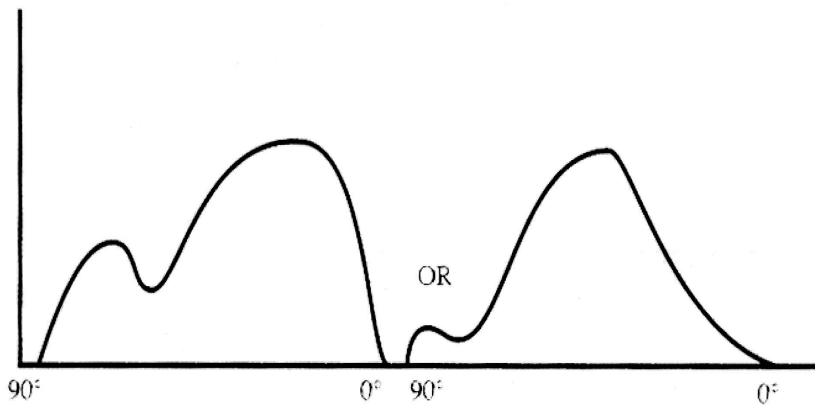


Figure 3-4. PLICA SYNDROME

- Characteristics:
 1. Double-hump curve
 2. Second hump is always higher than first
 3. Commonly a decrease in the down slope of curve or rapid force decay rate

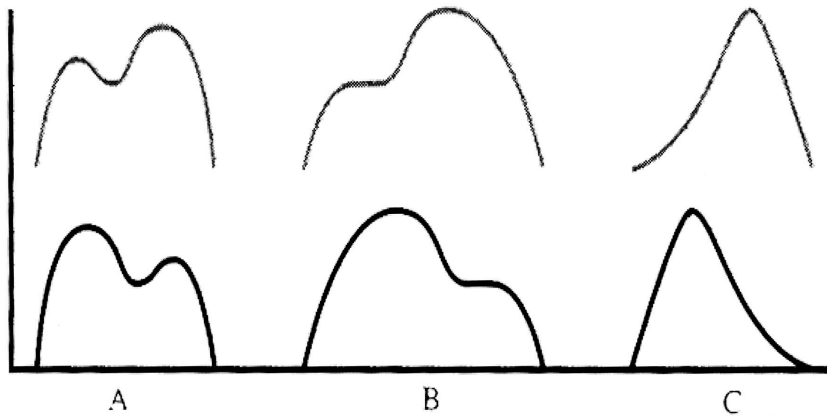


Figure 3-5. PATELLA SUBLUXATION

- Characteristics:
 1. Double-humped curve
 2. First hump always higher

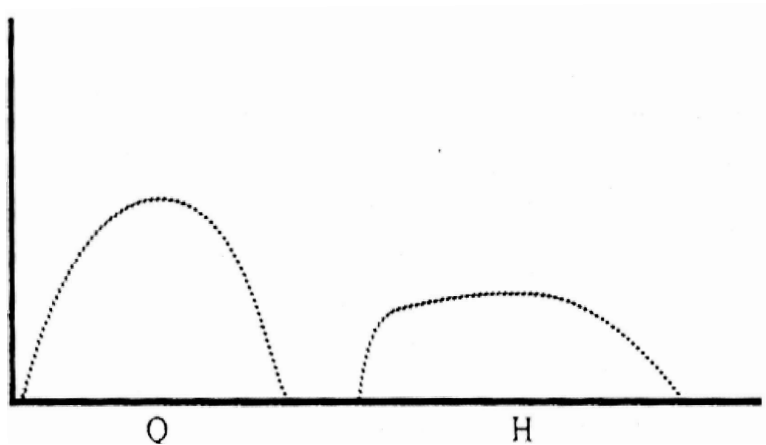


Figure 3-6. MUSCULO-TENDINOUS STRAINS

- Characteristics:
 1. The torque curve simulates the shape of the normal curve
 2. Irregularity (waviness) in the curve
 3. Decreased torque production

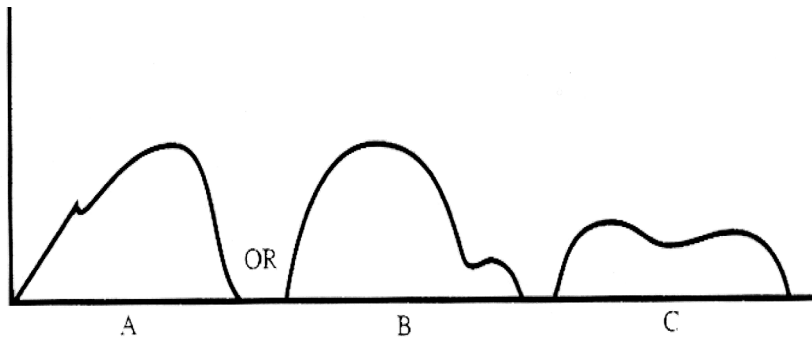


Figure 3-8. CAPSULAR/LIGAMENTOUS INSUFFICIENCIES

- Characteristics:
 1. Simulates shape of normal curve
 2. Significant anterior instability seen as an irregular dip on the upslope (Curve A).
 3. Positive pivot shift will show a dip in the down slope of the curve (Curve B).
 4. General ligamentous insufficiency or ACL deficit (Curve C).



Figure 3-9. MENISCUS LESIONS

- Characteristics: