## Rehabilitation

## A quick easy breakdown for MA students

Body mechanics is the practice of using certain key muscle groups together w/ good body alignment and proper body positioning to reduce risk for injury to both pt and caregiver

How to lift using good body mechanics:

- Get help if it is too heavy
- Make pathway safe
- Face object/pt
- Back straight
- Feet shoulder width apart
- Bend from hips and knees
- Hold object close to body and always pivot

Assisting falling pts: Usually, a single person cannot hold up someone who becomes dead weight. The best option in this case is to ease the pt to the floor to prevent injury

- 1. Ease the pt to the floor
- 2. Keep your back straight
- 3. Bend at your knees
- 4. Have provider examine them
- 5. Document

If you are supporting the pt from behind as they begin to fall backwards, grasp them under the arms, put one leg back w/ the foot at a right angle, slide the other leg forward under the pt, and ease them to slide the other leg forward under the pt, and ease them to slide down your leg onto the floor. If you are walking beside the pt and they begin to fall forward, grasp them around the waist, extend your leg farthest from the pt forward, bend at the knees, and slowly lower the pt to the floor. You must be careful to avoid injuring your own back by trying to support too much weight

Indications for mobility devices

- Sprains, fractures, and dislocations may require a sling, cast, or splint
- A stroke pt may lose use of extremities or be unsteady
- Surgical procedures may require temporary supportive devices
- Pts w/ debilitating illnesses frequently use supportive devices
- Cane or crutches can reduce discomfort for an arthritis sufferer
- Walker or cane can help stabilize an elderly pt
- Physical disabilities may require supportive devices

The standard sling is about 55 in across the base and 36-40 in along the sides

A pt who needs only a cane for support should have one that is the proper length to fit comfortably in the hand w/ the arm hanging naturally at the side and the elbow flexed at about 25 to 30 degree angle, w/ the handle just below hip level. An older adult pt usually has less trouble w/ a quad-base cane

When using crutches, the weight of the body should be on the hands and never on the axillary area because, over time, prolonged pressure on the axillary nerves can cause nerve damage. 5 gait walks are commonly used:

- Two point: matches the crutch to the opposite foot, moving them together
- Three point: positions both crutches and the left foot forward and then brings up the right foot
- Four point: right crutch is positioned first, followed by moving the left foot. Then the left crutch is moved forward, followed by the right foot
- Swing: crutches are moved forward simultaneously, weight is transferred, and both feet swing through the crutches, stopping slightly in front

Other varieties of crutchers are designed for special situations. The Lofstrand / Canadian crutch, move commonly referred to as the forearm crutches, eliminates axillary pressure, and w/ the forearm cuff, is more stable. This type would be used for long term rehabilitation. The platform crutch is used when a pts hand or forearm is not able to bear the pts weight

A walker is useful for pts who, because of age or physical condition, cannot safely use crutches. The pt must be cautioned not to step too far into the walker because this makes it difficult to maintain balance. The pt should move the walker while leaning slightly forward

In addition to the use of mobility devices, pt can benefit greatly by improving their strength and flexibility. Regular exercise improves circulation and muscle tone and relieves tension. For pts who cannot engage in strenuous exercise, walking and range-of-motion (ROM) exercises are suggested to improve circulation and flexibility and promote muscle tone. A ROM exercise is defined as any body action involving muscles, joints, and natural directional movement such as abduction, adduction, extension, flexion, pronation, and rotation. Such exercises are usually applied actively or passively in the treatment of orthopedic deformities, assessment of injuries and deformities, and athlete conditioning. These movements help move each joint through its full range

## Summary

- Body mechanics is the practice of using certain key muscle groups together w/ good body alignment and proper body positioning to reduce the risk for injury to both pt and caregiver
- Pts and their families must be informed of the importance of maintaining a safe home environment for people using ambulatory aids
- ROM is defined as any body action involving muscles, joints, and natural directional movements such as adduction, abduction, extension, flexion, pronation, and rotation. Such exercises are usually applied actively or passively in the treatment of orthopedic deformities, assessment of injuries and deformities, and athlete conditioning