

2017 Injuries in Football Course
Andrews Institute
April 28, 2017 8:20am
Pensacola, FL

Linking The Hips to the Shoulder Complex

*Kevin E Wilk, DPT, FAPTA
Champion Sports Medicine
Birmingham, AL*

- I. Introduction:
 - A. Sport movements are a full body activity
 1. Throwing is an entire body activity
 - a. Over 60% of the kinetic energy comes from the legs/trunk
 - b. Legs/hips help rotate the shoulder/arm
 2. Consider other sport movements:
 - a. Golf
 - b. Tennis
 - c. Swinging a bat
 - d. Volleyball

Engaging the Hips & Core Uses the Legs/Hips/Core to Drive the Arms

- II. Evidence to Support the Hip/Shoulder Relationship:
 - A. Numerous level 5 articles recommend assessing the hips/legs when evaluating the throwers shoulder joint complex
 1. single leg squat or step down test
 - Wilk et al: PMR '16*
 - Rubin & Kibler: Arthroscopy '02*
 - Kibler et al: BJSM '12*
 - B. Several articles discuss training the hips/legs in the overhead thrower
 - Wilk et al: PMR '16*
 - Wilk et al: Clin Sports Med '15*
 - Wilk et al: JOSPT '09*
 - Wilk et al: AJSM '02*
 - C. Scapular dyskinesia & poor hip control
 - Beckett et al: AJSM '14*
 - D. **Key Points:**
 - *Posture & flexibility*
 - *Activation of specific muscles*
 - *Endurance – fatigue results in poor posture & control*
 - *Proprioception*

III. Examples of Exercises & Drills we Utilize for the Overhead Athlete

- A. Specifics Drills & Exercises
- B. Lateral Lunges
 - a. Lateral lunges with arms

- b. Lateral lunges with stabilization
- c. Lateral lunges with ball
- d. Lateral lunges with ER
- e. Lateral lunges with fast reversals
- f. Lateral lunges with jumps
- C. Side Planks with ER
 - a. Side plank w/ ER dumbbell
 - b. Side planks w/ CLX
 - c. Side plank w/ CLX & RS
 - d. Side plank w/ plyos
- D. Front Step Downs (single leg squats)
 - a. Front step downs weighted
 - b. Front step downs with ball catches
 - c. Front step downs unbalanced bar balances
- E. Stability Ball Exercises:
 - a. Advanced throwers ten program
 - b. Prone on stability ball during scapular exercises
- F. Planks & Push-Ups
 - a. Unstable surface (rocker board)
 - b. Rhythmic stabilization drills (RS) - perturbations
- G. Monster Walks with CLX
- H. Softball windmill style throws w/ CLX
- I. Golf swings with fluid flow
- J. Unbalanced bar balance drills

IV: Conclusion & Key Points:

A: Key Points:

1. Integrate legs/hips/core into your shoulder rehab programs
2. Combined movements
3. Functional movement patterns
- 4. *Weak hips – poor scapular control***
5. Train for a stable base & foundation

KEW: 4/2017