Session Four: Sports 2
Moderator: Timothy R. Daniels, MD

1:30 – 1:40 pm  
Recurrent Peroneal Tendon Ruptures: Tendon Transfers vs Put in a Dead One ... Really?
Mark E. Easley, MD

Overview:

- Poorly defined indications for tendon transfer or reconstruction
  - 50% poor tendon quality is arbitrary
  - Probably best to use surgeons best judgment

- Options
  - Tenodesis of one peroneal tendon to the other
    - Side-to-side
    - Pulvertaft weave
  - Tendon transfer
    - FHL tendon optimal
      - Originates from posterolateral tibia and IOM
      - In straight line to lateral foot
      - In phase as a peroneals tendons and FHL are flexors
      - Anchor to base of 5th MT
    - PTT transfer
      - With associated cavovarus foot alignment
      - Weakens varus force and should help to realign foot
  - Allograft reconstruction
    - Allograft choice
      - Peroneal tendons
      - Semitendinosus tendon
      - Anecdotally that gracilis typically too small
      - May attempt to reconstruct both tendons if both are problematic
      - In my experience successful with single tendon reconstruction to lateral foot, particularly when correcting cavovarus foot alignment
        - In this case, no reconstruction of peroneus longus as it is a deforming force with plantarflexion of the 1st ray
        - Distal fixation
          - Residual distal native peroneus brevis
          - Anchor to 5th MT base
        - Proximal fixation
          - Pulvertaft weave to the both the residual proximal native peroneal tendons
  - Combination
Occasionally combinations of the above procedures may need to be considered

Considerations

- Status of the peroneal muscles
  - For successful reconstruction the peroneal muscles must have excursion, suggesting that they are functional
  - Reconstruction will simply be a tenodesis if muscles are without excursion, ie, are myofibrosed
- Cavovarus foot alignment
  - As noted above, consider PTT transfer
  - Plantar fascia release
  - May need bony realignment
    - Valgus-producing calcaneal osteotomy
    - Dorsiflexion 1st MT osteotomy

References:


