



**Pillar Development & Small Muscle Training for Athletics**

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### + Pillar of Strength

- In order to economically translate force into the ground, your body needs to be a good conductor of energy
- Pillar begins at the ankle
  - Flexibility and strength
  - Dorsiflexion & Plantarflexion, Inversion & Eversion
- Hips and "core" must be strengthened through functional means
- Develop muscular balance
- Greatest single determinant of ability is coordination

### + General Training concepts

- Closed Chain Exercises
- Open Chain Exercises
- Tonic Muscle
- Phasic Muscles

### + Muscles Prone to Tightness

- Gastrocnemius
- Soleus
- Tibialis Posterior
- Short Hip Adductors
- Hamstrings
- Rectus Femoris
- Iliopsoas
- Tensor Fasciae Latae
- Piriformis
- Erector Spinae
- Quadratus Lumborum
- Pectoralis Major
- Upper Trapezius
- Levator Scapulae
- Sternocleidomastoid
- Scaleni
- Flexors of Upper Limb
- Masticatories

### + Muscles Prone to Weakness

- Peronei
- Tibialis Anterior
- Vastus Medialis and Lateralis
- Gluteus Maximus, Medius and Minimus
- Rectus Abdominis
- Serratus Anterior
- Rhomboids
- Middle and Lower Trapezius
- Deep Neck Flexors
- Digastricus
- Extensors of Upper Limb


### + "Small Musculature Work"

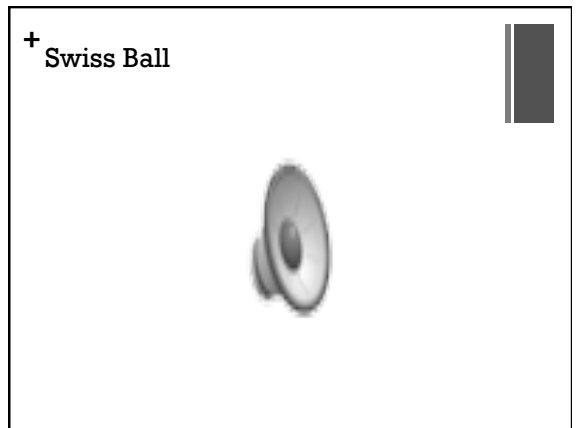
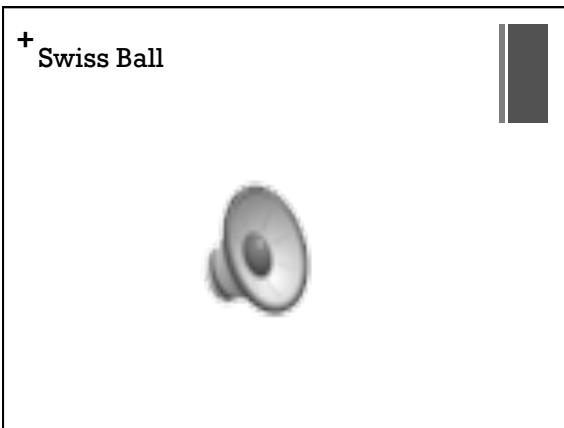
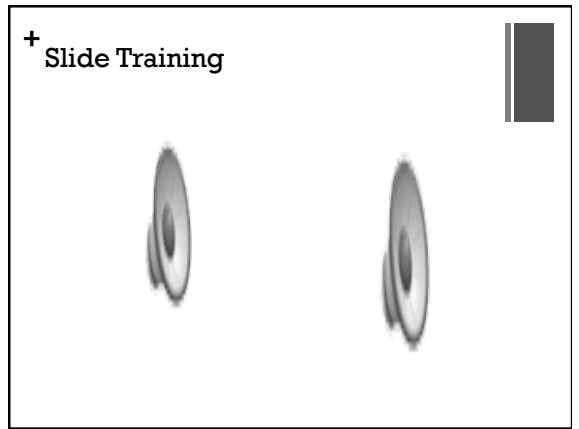
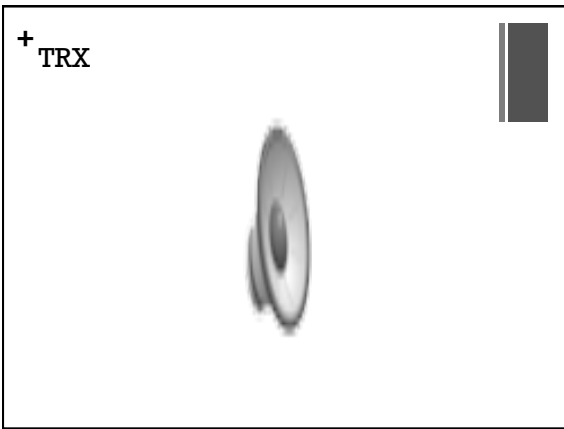
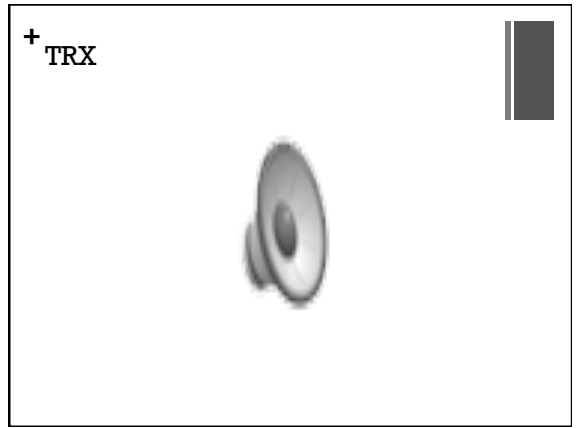
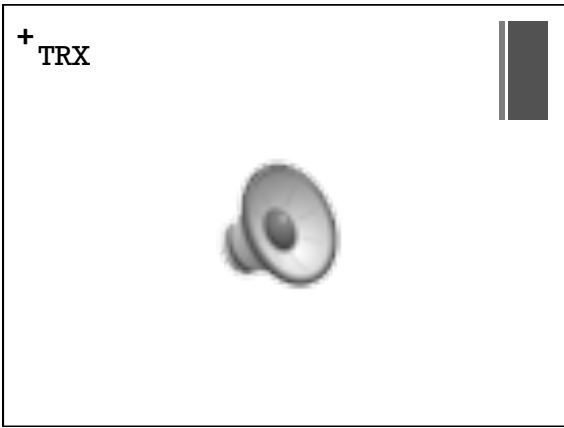
- 4 Areas of Core Development
  - Trunk Flexion
  - Trunk Extension
  - Trunk Rotation
  - Trunk Lateral Flexion
- General Principles
  - Slow controlled movements
  - Working ROM particularly the "ends" of the muscle
  - To be "Strong" you have to be flexible, or your dysfunction will catch up to you
  - Encourage multi joint / muscle movements
  - BREATHING

### + Planking

Develops Posture and Isometric Strength

Advanced planking required great amounts of core strength

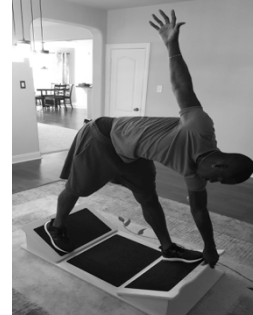




### + Speed Board

- Changing the Angle at the ankle greatly affects the Hip ROM
- Opens the Hip to allow blood flow and neural transmission
- Increase ROM in Ankle
- Development of Flexibility and Strength
- Neural Adaptation Exercises

### + Speedboard



### + Speedboard Flexibility



### + Speedboard Flexibility



### + Speedboard & Resistance Bands



### + Speedboard cont.



