

Sensory Stacking!

A New Approach to Balance Training

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Session Description

The seemingly simple tasks of balancing on one leg or walking across a room are actually complex, integrated, multi-sensory undertakings, with stimulation coming from the eyes, ears, joints, and feet. Join Dr. Emily as she explores the latest research on how sensory processing is heightened when more than one sensory input system is stimulated (known as sensory stacking), and how it may be challenged when sensory input is removed (sensory conflict). Gain insight into the ways multi-sensory stimulation can enhance sensory processing for movement optimization.

Introduction to Body Schema

Gravity as the only constant in the world. Provides pressure on our shoulders and resistance to push against. It is the most important proprioceptive stimulation we can use to connect to our movement.

Sensory Input Systems

Visual – most dominant input system
Vestibular – first to develop in utero
Audition – powerful in finding rhythm in movement
Proprioceptive – joint position sense is the most common feedback
Tactile (Haptic) – the underappreciated input system

Multi-Sensory Processing

Sensory stacking as a concept allows us to better upregulate the somatosensory complex and therefore impact movement.

Proprioceptive + Tactile
Visual + Tactile
Visual + Tactile + Audition

Sensory Conflict Training

Successful sensory conflict training client must have the capacity to create alternative strategies. To help in create successful strategies integrate balance hacks or sensory stacking.

Step 1 | Set Your Base

Foot Tripod
Toes spread and wide
Neutral foot
Purchase with digits

Step 2 | Activate Your Base

Short foot / foot to core
Breath to diaphragm connections

Step 3 | Challenge and Conflict