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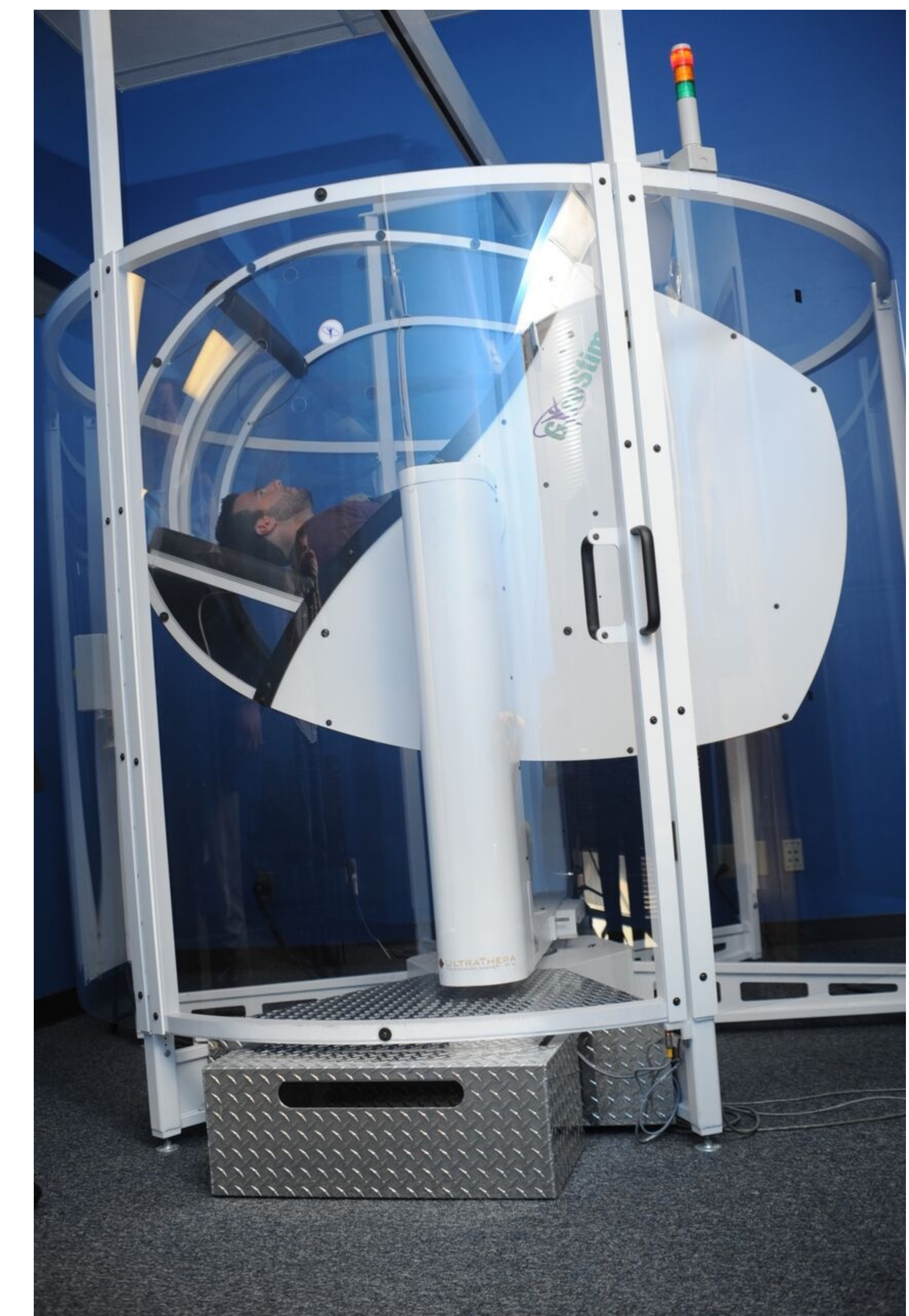
**HISTORY/PE:** A 25-year-old male rugby player presented with persistent symptoms related to an on-field injury. Six months prior he sustained a concussive type impact injury. Upon presentation he suffered with headaches, dizziness, confusion and disturbed sleep patterns. He was unable to complete return to play protocol and had a medical history of multiple concussions.

**DDX:** Post Concussive Syndrome, Chronic Traumatic Encephalopathy, Functional Neurologic Symptom Syndrome, and Post Traumatic Stress Disorder.

**WORKING DX:** Post Concussive Syndrome

**TREATMENT:** Management involved a tailored plan utilizing chiropractic manipulation, functional neurology, optometric rehabilitation and off vertical axial rotation (OVAR).

**TEST RESULTS:** Convergence weakness prompted video-oculography testing which showed horizontal and vertical saccadic inaccuracies. Leftward saccades showed an average accuracy of 84%, downward showed an average accuracy of 86% and upward at 75%. In addition to saccadic deficiencies, Optokinetic Testing (OPK) showed an average gain of 0.80 leftward, 0.69 downward, and 0.56 upward. Postural balance was stable but dysmetria was present bilaterally with Finger-to-Nose testing. C3 Logix Graded Symptom Score was 60/162.



**RESULTS:** A two-week trial was necessary to reach expected outcomes. Following the trial, leftward saccades improved to an average accuracy of 94%; downward saccades improved to an accuracy of 94% and upward improved to 98%. Optokinetic deficiencies improved to an average gain of .90 leftward, .86 downward, and .80 upward. Headaches, dizziness, confusion, and sleep patterns were resolved. C3 Logix Graded Symptom Score reduced to 3/162. The athlete was able to begin return to play protocol.