

Poster 556**Feasibility of Peak Potential, an Adaptive Rock Climbing Program for Children with Cerebral Palsy and Physical Disabilities.**

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Disclosures: P. D. Bolikal, No Disclosures: I Have No Relevant Financial Relationships to Disclose.

Objective: To test the hypothesis that participation in Peak Potential- a structured, volunteer-run adaptive indoor rock climbing program- will be feasible and will improve quality of life (QOL) of children with cerebral palsy (CP) and physical disabilities.

Design: Prospective repeated measures study.

Setting: Indoor rock climbing gym.

Participants: Thirty children between the ages of 4-17 have completed the study and preliminary data has been analyzed for the first 20 participants. Eighty-five percent of the participants had CP, 90% were minorities, 70% were male, and 65% were from low-income families.

Interventions: Weekly 1-hour climbing sessions for 12 weeks.

Main Outcome Measures: QOL was measured at baseline, after week 6, and at completion of the program using the PedsQL scale, a standardized measure of QOL for children. Change in QOL was assessed using a within-subjects, repeated-measures analysis of variance (ANOVA). Self efficacy, as measured by the Perceived Physical Ability Scale for Children, was included in the analyses as a covariate. Rock climbing participation and progress were recorded weekly. Volunteer participation was also tracked.

Results or Clinical Course: There was a small but non-significant increase in measures of self efficacy, and no statistically significant change in QOL. The participants collectively completed 760 climbs. Volunteers contributed 475 hours. The participant attendance rate was 77%.

Conclusions: A 12 week adaptive rock climbing program for children with CP and physical disabilities is feasible with a good attendance rate. Although the data showed no significant change in QOL, the participants subjectively enjoyed the program and applied for more sessions. The lack of significance may be related to the small sample size and the relatively infrequent intervention (one session per week.) This is a pilot analysis of 20 children; further data will be available for analysis when more children have completed the program.

Poster 557**Acute Onset of Unilateral Pain and Weakness Caused by Os Odontoideum: A Case Report.**

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Disclosures: D. Rustom, No Disclosures: I Have No Relevant Financial Relationships to Disclose.

Case Description: The patient presented after experiencing an acute onset of pain and weakness of her left lower

extremity while participating in a color guard competition. Initially she was thought to simply have a muscle strain. However, she noticed progressive weakness involving her left upper extremity the following morning, prompting a visit to her PCP, and subsequently to the ER. In the emergency room, she was found to have isolated left sided 4/5 motor strength, hyperreflexia, clonus, a positive Babinski, and difficulty ambulating. This prompted an evaluation for an acute intracranial process, and MRI/MRA of the head and neck was obtained, which demonstrated Os Odontoideum with associated severe cervical spinal canal stenosis, cord compression and myelomalacia. Neurosurgical evaluation was obtained and the patient underwent fusion from the occiput to C2, with intraoperative placement of halo vest and craniocervical immobilization. Post-operatively, she continued to display weakness with associated functional deficits, so was admitted to the inpatient rehabilitation unit.

Setting: Tertiary care children's hospital.

Results or Clinical Course: On admission to the rehabilitation unit, the patient was deemed to require moderate to maximum assistance with bed mobility and transfers and maximum to total assistance for grooming. She required minimal physical assistance to ambulate 20 feet. Upon discharge from the rehabilitation unit, she had improved functionally to require only minimum assistance to supervision/ set up for most activities of daily living and was ambulating 200 feet with supervision.

Discussion: Although Os Odontoideum has been described in the literature as causing immediate spinal cord injury with paralysis, it has rarely been shown to present as unilateral pain and weakness, mimicking an intracranial lesion.

Conclusions: Serious complications can ensue, including paralysis, in patients with Os Odontoideum, and this should be considered in patients presenting with acute onset of unilateral pain or weakness.

Poster 559**Atypical Presentation of Transverse Myelitis in a 13-Year-Old Boy: A Case Report.**

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Disclosures: M. Battikha, No Disclosures: I Have No Relevant Financial Relationships to Disclose.

Case Description: The patient is a 13-year-old previously healthy male who presented with bilateral upper limb weakness that progressed over a course of 48 hours. On admission he was unable to move his right upper limb and had little movement in his left upper limb. He developed respiratory insufficiency requiring intubation. Magnetic resonance imaging (MRI) demonstrated a gray matter lesion extending from C1-T10. CSF findings revealed mild pleocytosis. Workup did not demonstrate a positive Neuromyelitis Optica Antigen, intracranial lesions, or any infectious etiology. Due to the non-segmented type lesion he has been diagnosed with Transverse Myelitis (TM).

Setting: Tertiary Pediatric Hospital.

Results or Clinical Course: On physical examination the patient's presentation was atypical for TM. Our physical