stretching in two sessions 4 days apart. Visual analogue scale (VAS) of pain, heel tenderness index (HTI), and MSUS were performed at baseline, after 1st and 2nd session. Improvement was assessed clinically and by MSUS that showed rapid reabsorption of localized and diffuse oedema immediately after sessions.

**Discussion.** Our observations denote the ability of ultrasound to detect rapid effect of CRD in improving acute plantar fasciitis at structural level; this suggests that ultrasound can be used as an objective measure of therapeutic response [1].

**Reference**
http://dx.doi.org/10.1016/j.rehab.2014.03.384

P067-e

**Biomechanics analysis of the iliopsoas transfer related to the lumbosacral myelomeningocele**

P. Filipetti ∗, C. Schreiber, F. Moissenet, A. Remacle, F. Chantraine

CNRFR - Rehazenter, Laboratoire d’Analyse du Mouvement et de la Posture, Luxembourg, Luxembourg

*Corresponding author.

**Keywords:** Iliopsoas transfer; Myelomeningocele; Musculoskeletal model

**Background.** Iliopsoas (IP) transfer related to the lumbosacral myelomeningocele (LMMC) is realized during the first 4 years after birth in order to stabilize the hip and avoid joint subluxation [1]. The aim of this study was to demonstrate the extension capacity of IP after transfer during level gait.

**Methods.** A clinical gait analysis (CGA) was performed on one patient (35-years-old). Kinematics, kinetics and EMG data (including IP activity) were recorded during level walking. IP fiber length and lever arm around the flexion-extension axis of the hip were estimated using a lower limb musculoskeletal model (MSM).

**Results.** First, the hip kinematics and kinetics are almost normal during the gait cycle. Second, EMG records show that IP activity pattern is similar to the asymptomatic gluteus maximus pattern and that hip flexion is performed by secondary hip flexors (adductors and rectus femoris). Third, estimated IP fiber length and lever arm patterns vary in the same way as for an asymptomatic hip extensor.

**Discussion.** CGA and MSM results show that IP transfer related to LMMC allows to restore an efficient proximal propulsion and to avoid hip joint subluxation.

**Reference**
http://dx.doi.org/10.1016/j.rehab.2014.03.385

P068-e

**Medical rehabilitation in a syringomyelia case**

M.L. Ceveia ∗, D.L. Stoicănescu, N.R. Suciu

Psychoneuro Sciences and Rehabilitation Department, Faculty of Medicine & Pharmacy, University of Oradea, Oradea, Romania

Microscopic Morphology Department, University of Medicine and Pharmacy “Victor Babes”, Timisoara, Romania

*Corresponding author.

**Methods.** We present the case of a 68-years-old patient with cervico-dorsal syringomyelia, bilateral neuropathic scapulohumeral arthropathy and mixed dyslipidemia hospitalized in the Medical Rehabilitation Clinical Hospital Baile Felix, Romania.

**Results.** At admission she was complaining of paresthesias and motor upper limb weakness, rachialgia, difficulty in walking, thermal anesthesia, with no history of trauma. She had in 2012 decompression of craniospinal junction by median suboccipital craniectomy with foramen magnum opening and posterior C1 laminectomy, resection of right cerebellar tonsil and dura plasty. Neurological examination revealed brachial diplegia: upper limbs hypotrophy and distal amyotrophy with simian hand, abolished osteotendinous reflexes through peripheral motor neuron syndrome, spastic paraparesis of the lower limbs, exaggerated osteotendinous reflexes through pyramidal syndrome, paravertebral amyotrophy, loss of thermodgesic sensitivity. Scapulohumeral X-ray revealed humeral heads lysis. We assessed the degree of functional independence using FIM scale, obtained score was 95 from 126. The most affected were mobility and locomotion. Functional reeducation goals: pain alleviation, ameliorating movement disorders with regaining postural control, gait reeducation, establishment of movement patterns for upper limbs, regaining functional independence and reeducation of thermodgesic sensitivity. These were achieved by hydrokinetotherapy, occupational therapy, physotherapy, massage.

**Discussion.** The major principles underlying medical rehabilitation are represented by functional reeducation.

http://dx.doi.org/10.1016/j.rehab.2014.03.386