## Microcephaly and CranioSacral Therapy

**By: Cloe Couturier**

**Patient Name: Michael**
**Dates of Treatment: May 3 - 7, 2004**

**Medical History**
Michael is a 3 1/2-year-old male who presents with the following medical history:
At 1 ½ -months-old, Michael had a lumbar puncture with five attempts at 4-months which induced coma due to pneumonia. At 6-months, Michael had a hernia operation. Started showing signs of developmental delays around 1-year old and was diagnosed with microcephaly at 18-months.

**Current Level of Function:** Michael does not speak and he walks with a walker.

**Patient/Family Goals:** They want Michael to start speaking and walk independently without a walker.

**Summary:** "CranioSacral Therapy is a gentle, hands-on method of enhancing the flow of cerebrospinal fluid, blood and lymph. Thus, it facilitates the body's natural healing. It's positive effects are most apparent in the brain and spinal cord, the immune and hormonal systems and in the alleviation of chronic dysfunction and pain." John E. Upledger, D.O., O.M.M. Reductions in structural restrictions and imbalance contribute greatly to enhanced function. Michael has made 60%, moderate progress in the reduction of adverse adaptive strain patterns of the craniosacral, musculoskeletal and lymphatic systems during the Intensive Program. There have been improvements in the following areas as well: Michael seems to be integrating many pieces very fast during his last sessions. He was imitating smiles, making more prolonged eye contact. Both his mom and his grandma heard him say "stop" and "mom". He was much more responsive, present and willing to work.
The enhanced motion and balance of the craniosacral rhythm contributes to improved structural, functional and integrative performance of bodily systems. It aids the creation of positive change by facilitating the mobilization of adverse patterns and by encouraging new levels of motion and balance to occur. The craniosacral rhythm is the key element used during treatment. It's motion and the body's response to the fluctuating pressure changes within the craniosacral system are used both by the therapist to help you facilitate change and by your body to continue creating levels of improvement. CranioSacral Rhythm has improved 75%.
Transverse fascial diaphragms are areas of the body that have a higher percentage of fascia that is transversely oriented than other regions. The fascial network of the body is an integrated full body connective tissue system that is found head to toe and superficial to deep. It covers all body structures from the large to the minute. It is designed to provide separation, support and ease of motion among structures. Compromise of motion caused by fascial restrictions may lead to diminished structural and functional levels due to the strain placed upon local structures. The effect of this strain may remain local and/or place strain upon distant regions of the body. Increased fascial mobility leads to heightened levels of structural integrity thereby enhancing function. Transverse fascial diaphragms have improved 60%.
There are five primary components which comprise the central nervous system: the osseous structures (cranium and spinal column), the meningeal system (cranial and dural components), the cerebrospinal fluid and related production and drainage structures, the vascular system (arterial and venous) and neural tissue (cranial and spinal). A restriction of mobility of any of these elements can easily translate force upon any or all of the related

elements. This may produce a wide range of negative effects upon the central nervous system, the autonomic nervous system, endocrine, musculoskeletal, vascular, lymphatic and respiratory systems. The cranium's integrity, freedom and balanced motion are necessary to allow optimal function among particular as well as interrelated systems. The cranial osseous structural interrelationship and mobility has improved 50%.

The intracranial membrane system is the cranial component of the meningeal system. It forms the direct environment of the brain. Adverse strain within it may place harmful force upon neural tissue causing far-reaching dysfunction. This may have wide ranging negative effects throughout the entire body. It may also restrict the free mobility of the cranial bones as well as the dural and spinal components thus leading to dysfunction. The unencumbered motion of the intracranial membrane system greatly aids the structure and function of the components comprising the central nervous and related systems thereby positively influencing all body systems. The Intracranial membrane system mobility has improved 60%.

The dural tube is the spinal component of the meningeal system. It forms the direct environment of the spinal nerve tissue. Strain upon this component may place dysfunctional force upon nerve tissue. Expression of this strain may be in many forms such as referred pain patterns, spinal stenosis and facilitated spinal segments leading to end organ dysfunction. This force may also translate to the cranium, spinal segments, the sacrum or other parts of the body causing distortion and dysfunction. The Dural Tube mobility has improved 50%.

The facial bones, hard palate and teeth may place strain upon the craniosacral system thereby causing adverse tension and dysfunction within that system and/or others, i.e. restriction of the maxilla may cause scoliosis. Restriction in free mobility and balanced motion patterns may also lead to local dysfunction. The mobility of the facial bones, hard palate and teeth has improved 40%.

Cranio = cranium, Sacral = sacrum; the two ends of the CranioSacral system. The free mobility of the sacrum is critical to the optimal function of the system as a whole as well as its central role as keystone of the pelvic girdle. Sacral adverse adaptive strain patterns may negatively affect osseous and soft tissue structures as well as the craniosacral system and other fluid systems. The sacrum has improved 60%.

Vectors form the major energetic structure of the body (akin to an energetic stick figure). Distortions in the form such as acute angles, twists and breaks may have severe negative impact in the area of the distortion, distant from it or on the body as a whole. Increased vector integrity will energize and integrate deficient and dysfunctional regions of the body as well as the body as an interrelated whole. The vector system has improved 50%.

Energy cysts are areas of the body that are using vital energy to encapsulate energy that the body has deemed as harmful and/or chaotic. It is the body's attempt to isolate disruptive energy so that it does not have a full body negative affect. This may be due to many causes such as physical trauma, emotional trauma, bacterial or viral infection - even some medications have been found to create energy cysts. The release of energy cysts allows the body to use the energy it has been consuming in maintaining the energy cyst for other positive purposes. It also allows the strain the energy cyst has been placing upon adjacent and/or distant structures to abate. Energy cysts were not noted. There exist in the body a higher percentage of fascial fibers possessing a longitudinal orientation (in relationship to the transverse fascia mentioned above). This is part of the same network as the transverse fascia and carries with it the capacity to compromise structure and function. The longitudinal fascial mobility has improved 75%.

CranioSacral Therapy views the body as a tremendously intelligent, conscious and interrelated whole possessing an enormous capacity to change and to heal. The avenues of change are known within the body/mind/spirit of each of us as individuals. The changes that you have created while in the Intensive program will continue to produce higher levels of change leading to increased function and an enhanced natural ability to heal and adapt.

**Treatment**
Services provided included:
CranioSacral Therapy
Neuromuscular Re-education
Myofascial Release
SomatoEmotional Release
Visceral Manipulation
Kinetic Activities
Osteopathic intervention
Acupuncture
Vibrational therapy
Lymphatic Drainage
Patient/Family Education
Autogenic training, visualization, progressive relaxation
Other: Qi Gong

**Recommendations:** To continue with your CST therapist at home.
It is suggested that in 4-6 weeks that your OT, PT or Speech Therapist re-evaluate your current program
Return to the IP as needed

**Clinical Observations/Assessment**
**CranioSacral Rhythm**
Initial: Symmetry: Severe restriction on right side, lateral torsion; Quality: rapid; Amplitude: mild restriction; Rate: 16 cycles per minute
Post: Symmetry: better symmetry; Quality: normal regular rhythm; Amplitude: 30% more amplitude; Rate: 8 cycles per minute

**Transverse Diaphragms**
Initial: Pelvic: right side, moderate-severe torsion; Respiratory: right side, moderate-severe torsion; Thoracic: right side, moderate torsion; Hyoid: severe restriction; OCB: severe restriction
Post: Pelvic: greatly improved, still some restriction; Respiratory: greatly improved Thoracic: greatly improved; Hyoid: greatly improved, still some restriction; OCB: greatly improved

**Dural Tube**
Initial: Restrictions: severe left, posterior aspect of lumbars; Facilitated Segments: left kidney and left lung
Post: Restrictions: great improvement, mild restriction still present; Facilitated Segments: mostly Released

**Intracranial Membrane System**
Initial: medial strain of left tentorium cerebelli
Post: mostly released

**Cranial Vault**
Initial: Frontal: left lateral strain, severe restriction, severe compression; Left Parietal: moderate restriction; Right Parietal: mild restriction; Sphenoid: mild left side restriction, severe compression; Left Temporal: severe restriction; fight Temporal: mild restriction in flexion; Occiput: severe restriction

Post: Frontal: mostly released, still some restriction remaining; Left Parietal: mostly released; Right Parietal: mostly released; Sphenoid: mostly released, still some compression; Left Temporal: mostly released; Right Temporal: mostly released; Occiput: mostly released

**Facial Bones/Hard Palate/Teeth**
Initial: Left Zygoma: moderate anterior strain, severe extension lesion; Right Zygoma: balanced; Left Maxilla: balanced; Right Maxilla: balanced; Vomer: balanced; Left Palatine: balanced; Right Palatine: balanced; Left Nasal: balanced; Right Nasal: balanced; Mandible: balanced; TMJ: very restricted with grinding of teeth; Teeth: no dysfunction
Post: Left Zygoma: no dysfunction; Right Zygoma: no dysfunction; Left Maxilla: no dysfunction; Right Maxilla: no dysfunction; Vomer: no dysfunction; Left Palatine: no dysfunction; Right Palatine: no dysfunction; Left Nasal: no dysfunction; Right Nasal: no dysfunction; Mandible: no dysfunction; TMJ: still restricted, great improvement, needs more work with local CST practitioner

**Sacrum**
Initial: severe right torsion with moderate right side bending
Post: moderate torsion

**Body Chart**
Vectors
Initial: no dysfunction
Post: no dysfunction

**Energy Cyst(s)**
Initial: no dysfunction
Post: no dysfunction

**Fascial Glide Restrictions**
Initial: solar plexus, left side
Post: balanced, normalized

**Other Observations**
Post: Michael seems to be integrating many pieces very fast during his last session. He was imitating smiles, making eye contact and both his mom & grandma heard him say, "stop" and "mom".