

Case Study in Attention Deficit Hyperactive Disorder:
The Corrective Aspect of Craniosacral Fascial Therapy

By

Dr. Barry R. Gillespie

drbarryrg@mac.com

Submitted to Explore for publication: February 28, 2008

For verification of this report, please contact:

Riley Hoekstra's mother and father

Joanna and Jason Hoekstra

96 Ridge Road

Phoenixville, Pa. 19460

610-733-9810

jrk8664@yahoo.com

His treating medical doctor is:

Penn Care for Kids

Dr. Amy Klein

824 Main Street Suite 100A

Phoenixville, Pa. 19460

610-935-1330

INTRODUCTION

ADHD is a range of pediatric behavioral disorders, including such symptoms as poor concentration, hyperactivity, and impulsivity. Approximately 1,600,000 or 7% of American children from ages six to eleven have been diagnosed with ADHD.¹ The prevalence of ADHD is three times more in boys than in girls.¹

Conventional treatment consists of the long-term administration of methylphenidate. An alternative method of care can include the evaluation and treatment of the child's craniosacral fascial system, which is an integration of the craniosacral and fascial or connective tissue components.

LITERATURE REVIEW

In 1899, William Sutherland D.O. discovered the craniosacral concept when he found that the brain had a slight "breathing" motion.² In the 1980s John Upledger D.O. discovered that cranial strain from trauma was primarily held in the meninges around the brain and not in the cranial bones.³ While physical trauma caused chronic conditions such as ADHD, manipulative therapy could restore normal neurophysiology and health to an individual.⁴

The fascial or connective tissue component of the craniosacral fascial system is a full body web that intertwines and infuses with every structural cell including nerves, muscles, blood and lymph vessels, organs, and bones.⁵ John Barnes P.T. found in trauma the fascia can become strained, leading to many diverse symptoms and conditions.⁵ These strain patterns can pull anywhere in the body, including the craniosacral structures, at up to 2,000 pounds per square inch.⁶

Anatomically in the craniosacral fascial system, the cerebrospinal fluid begins in the choroid plexus of the ventricles, gently fluctuates through the craniosacral tissues, and flows within the cranial and spinal nerve sheaths out into the fascial collagen tubules.⁷ Researchers confirmed this whole body system upon discovering cerebrospinal fluid in these tubules with surprisingly no ordinary ground substance, blood, or lymph present.⁸

THE GOAL OF CRANIOSACRAL FASCIAL THERAPY

The primary goal of therapy is to relieve the causative strain patterns around the brain. Traumas can occur anytime after conception, most notably due to the natural pressures and/or the mechanical intervention of birth. The brain cycle, the amount of seconds the brain inherently expands and contracts, is the best indicator to measure the function of the craniosacral fascial system.⁹

The clinical goal is a minimum brain cycle of fifty seconds, twenty-five seconds in the expansion phase and twenty-five seconds in the contraction phase. As brain cycles may go well over one hundred seconds, it appears that the longer the brain "breathes" and the easier the cerebrospinal fluid flows, the better the brain can function. Over the years

methylphenidate has helped millions of children with ADHD, but now clinicians can directly address and correct a possible neurological root of the problem.

CASE PRESENTATION

History

A twenty-seven-month-old boy presented on November 8, 2006 for evaluation. His mother said his extreme hyperactive behavior necessitated the visit. He also had ear pain and frequent rashes.

Five months into her pregnancy she started to have Braxton Hicks contractions, which her doctor did not consider serious. When her contractions became intense at seven months, he admitted her into the hospital overnight and gave her magnesium sulfate to stop the birth. At eight months she was injured in a minor automobile accident, which did not appear to affect her fetus. At thirty-seven weeks since she had high blood pressure, could not sleep, and started heavy contractions again, her physician induced her.

When the fetus crowned, the doctor manually turned the head around to a more natural position. When the child was two days old, his body shook and he did not eat. When his blood sugar dropped precipitously, he spent an extra day in the neonatal intensive care unit to recover.

His parents first noticed unusual behavior at eighteen months of age when he started to screech and bang his head. As time went on, he became easily distracted, would not listen, and could not focus on any task. He often pulled his painful ears although he never had an ear infection.

His mother observed that he broke out in a rash while eating wheat cereal and upon exposure to certain chemicals around his home. He continually picked the skin of his arm to the point where it became raw. The only medication he had was an occasional infant's acetaminophen in drop form (eight-tenths of one milliliter) for his ear pain. He was up-to-date on his immunizations.

She questioned his pediatrician about his bizarre behavior. His doctor was primarily concerned about a possible obsessive-compulsive disorder when day care sent home a report saying that he spent one hour washing his hands. The physician ordered a Developmental Assessment of Young Children Test that showed he was cognitively seven months behind his peers. The county health department then referred physical and occupational therapists to his home for weekly treatment.

There was no institutional pressure to calm him down with methylphenidate. But after he became totally disruptive one day by biting other children and screeching that could shatter fine crystal, his mother called me frantically saying that he had been "kicked out of day care!" Can she bring him for an evaluation as soon as possible?

Clinical Findings

When I held his cranium, I could not feel *any* perceptible motion. His brain cycle was zero seconds; his tight cranial bones, sacrum, and dural tube were restricting the normal motion of his entire craniosacral fascial system. His left temporal bone was internally or medially rotated, and his right temporal bone was externally or laterally rotated. His oral structures were not a factor.

I explained to his mother that he had severe craniosacral fascial strain, which was totally restricting the motion of his brain. I outlined a series of thirty-minute visits to return his system to normal. At this point his desperate mother was ready to try any non-invasive approach.

Treatment and Results

The goal of his first treatment visit on November 8, 2006 was to help free his brain from the zero second state. His brain cycle opened to fifteen seconds as his cranium shifted to a more symmetrical position. His parents noticed that he behaved better the following week. During that time the allergy specialist also put him on a wheat-free diet. At the end of the second visit his cycle was at forty seconds, excellent progress from zero motion.

At his third visit the fascial strains from the craniosacral fascial system contributing to his brain tightness started to release from the rest of his body. When therapy mitigated these strains over the next five visits, his cycle opened to an acceptable seventy seconds. In between these visits he broke out in rashes as his body appeared to clear toxins through his skin. At the end of therapy his craniosacral fascial system was in synchronicity, and his head shape was symmetrical.

His mother said he became a different child. He was calmer and more attentive and ceased his head banging, screeching, and ear pulling. He also stopped biting other children and picking at his arm. His speech improved dramatically after the first three visits by enunciating his words more clearly and speaking in coherent sentences. She was able to now touch his head with activities such as hair washing and combing.

At his new day care center his teachers did not believe that he ever had a behavioral problem. He followed directions and participated in group functions like the other children. His physical and occupational therapists did not believe the change in his demeanor. He did not abuse his older sister, and there was now peace in the home.

About four months later on the morning of May 17, 2007 he fell approximately two feet from a table at school directly on the left side of his frontal bone. He was incoherent for about ten seconds, started to gag four or five times, and then screamed for five minutes, louder than anyone at school had ever heard him. When his left eye started to droop and redden, the emergency room physician ordered a CAT scan, which was normal.

For the next ten days his behavior became more challenging at home; he started biting his sister again, screeched, and had conduct issues at the dinner table. When he also had more trouble at school being rough with his classmates, yelling, not listening to directions, and not taking naps, his mother called me requesting a check-up visit.

Because of his previous therapy, the cranial dural meninges quickly released from his zero brain cycle in one visit, opening to an amplitude of one hundred seconds. She took him directly back to school without mentioning the nature of his appointment to anyone.

The next day his teacher told her that he was a completely different little boy. He used words more than actions in conflicts and noticeably thought of things before just doing them. He also took the longest nap he has ever taken that day. In the following weeks he behaved better at home, talked more, and slept well. He stopped biting his older sister, and peace returned once again.

Over the next nine months, I treated him within days after he had three separate injuries. Boys will be boys, as they jump off sofas and run outside and fall. In each case he presented with a single digit brain cycle with the accompanying issues, and each time left the office symptom-free with over a one hundred second brain cycle. The quality of his brain motion appeared to directly mirror his neurophysiological state; as long as his brain was “breathing” well, he was healthy and happy.

DISCUSSION

Three important aspects appeared to contribute to his recovery. First he avoided the toxic chemicals that were causing his skin rashes. Secondly, his mother eliminated wheat products, which the allergist said irritated his immune system. Lastly, craniosacral fascial therapy released the pressure around his brain, spinal cord, and fascial system to achieve neurophysiological homeostasis.

Craniosacral fascial trauma may also cause many other conditions such as asthma, headache, otitis media, strabismus, dysphagia, rhinitis, epilepsy, gastroesophageal reflux, otitis media, and colic.^{9, 10} Many children can experience correction of these illnesses as the craniosacral fascial strains are released over a series of visits.

After treating hundreds of children over thirty years with zero brain cycles, I have found that craniosacral fascial therapy is a key factor in the healing of the central nervous system. The slight physiological motion of the brain, affecting the flow of cerebrospinal fluid, has a tremendous influence on its function.¹¹ Many children, like this child, may be instinctively pulling their ears and banging their heads just to free up their own craniosacral fascial systems.

This severely restricted state has a predilection to take a slightly moving brain that may more commonly cause asthma, otitis media, and headache to the brain-injured depths of poor concentration, impulsiveness, hyperactivity, epilepsy, autism, and/or

cerebral palsy. The quality of cerebrospinal fluid flow may be the key.^{12, 13} Going from minor flow with minuscule brain motion to stagnation with no palpable movement may be a huge leap into the abyss of clinical neuropathology.

Another hypothesis suggests that if a child has severe restriction in his midbrain area involving the aggregate of his basal ganglion (putamen, substantia nigra, caudate nucleus, globus pallidus, and subthalamic nucleus), cerebellum, thalamus, and/or hypothalamus, physicians may commonly diagnose him with ADHD. With so little known in relating the quality of brain motion to pediatric neurophysiology, basic science research is urgently needed.

This child may have fallen through the cracks of the health care system as early as the birth. To help prevent ADHD and the other chronic pediatric diseases, birthing professionals must evaluate the craniosacral fascial system and treat newborns at the very beginning of life. Healthcare practitioners must also check them at well-visits to mitigate the normal bumps and bruises of childhood that may cause craniosacral fascial restriction.

SUMMARY

The effectiveness of craniosacral fascial therapy for children with ADHD merits a research group to follow up with a pilot study. With this new piece of the neurological puzzle, the answer to ADHD and other central nervous system illnesses may be closer at hand.

REFERENCES

1. Vital Health Statistics 10. Center for Disease Control and Prevention, National Center for Health Statistics, Hyattsville, Md. 2006 Dec; (231): 1-84.
2. Sutherland, W. The Cranial Bowl. Mankato, Minn: Free Press Company, 1939.
3. Upledger, J., Vredevoogd, J. Craniosacral Therapy. Chicago: Eastland Press, 1983.
4. Magoun, H. Osteopathy in the Cranial Field. 3rd edition. Kirksville, Mo: Journal Printing Company, 1976.
5. Barnes, J. Myofascial Release: The Search for Excellence. Paoli, Pa: Rehabilitation Services T/A Myofascial Release Treatment Centers and MFR Seminars, 1990.
6. Katake, K. The strength for tension and bursting of human fascia. *Journal of Kyoto Professional Medical University* 1961; 69: 484-488.
7. Juhan, D. Job's Body: A Handbook for Bodywork. Barrytown, New York 12507: Station Hill Press, 2003, page 73.
8. Kessel, R., Kardon, R. Tissues and Organs: A Text-Atlas of Scanning Electron Microscopy. San Francisco: W. H. Freeman and Company, 1979, page 15.

9. Gillespie, B. Case study in pediatric asthma: the corrective aspect of craniosacral fascial therapy. *Explore: The Journal of Science and Healing*. January 2008 Vol. 4, Issue 1, pages 48-51.
10. Gillespie, B. Healing Your Child. Philadelphia: Productions for Children's Healing, 1999.
11. Gillespie, B. Brain Therapy for Children and Adults. Philadelphia: Productions for Children's Healing, 2000.
12. Still, A. The Philosophy and Mechanical Principles of Osteopathy. Kansas City: Hudson-Kimberly Publishing Company, 1902, page 39.
13. Netter, F. The Ciba Collection of Medical Illustrations Volume 1 Nervous System Part 1 Anatomy and Physiology. West Caldwell, N.J. 07006: CIBA Pharmaceutical Company, 1983, page 31.