

FROM THE EDITOR

Special Issue: Current Practice in Pediatric Biofeedback and Hypnosis

Editor in Chief: Donald Moss, PhD, BCB, BCN

Introduction to the Special Issue

This special issue is dedicated to Judson B. Reaney, MD, shown on the front cover. Judson Reaney completed a medical fellowship in the 1970s in behavioral and developmental pediatrics at Minneapolis Children's Hospital. There he worked with Karen Olness, who encouraged him in the use of hypnosis and biofeedback for children. Reaney became a pioneer and leader in integrative pediatric care. A South Dakota native, he spent much of his professional life in Minneapolis. Judson Reaney died February 24, 2012, with the love and respect of friends, family, and colleagues. I include here (with permission) an excerpt from a memorial written by his friend and colleague, Daniel P. Kohen, MD:

Dr. Reaney was the first Fellow of the Department of Pediatrics' Developmental-Behavioral Pediatrics Fellowship Program, now in its 34th year. With the mentorship of the founding Director, Dr. Karen Olness, he fashioned a Fellowship called "Ambulatory/Developmental/Behavioral Pediatrics" and went on to later become Board Certified in Developmental-Behavioral Pediatrics when the subspecialty was first accredited by ACGME in 2002. He was also certified in Biofeedback, an expert in Pediatric Clinical Hypnosis, and awarded a Bush Fellowship in the area of physician renewal, during which time he had the opportunity to study with Rachel Naomi Remen (*Kitchen Table Wisdom*, amongst others) and author Parker Palmer of the Center for Courage and Renewal. He also spent a semester in Boston studying world religions. Though he would never have said it, he most surely was our region's expert in children's spirituality, and selflessly shared his wisdom in this realm.

This Special Issue explores "Current Practice in Pediatric Biofeedback and Hypnosis." Children are natural subjects for biofeedback, although biofeedback techniques have to be adapted to the developmental age of the child participating in training. Researchers and clinicians have reported since the early days of biofeedback that children often master

biofeedback more quickly and effectively than adults (Attanasio, Andrasik, Burke, Blake, Kabela, & McCarran, 1985).

Children are delighted to discover that they can control their bodies, and they respond positively to computer- and technology-oriented games involving physiological control (Moss, in press). On the other hand, children have shorter attention spans than adults, bore more quickly, and need stimulating biofeedback displays to sustain their engagement. Fortunately, today's biofeedback animations and biofeedback-based games guide children wonderfully toward complex neural and physiological self-control.

Several leading figures have promoted the application of biofeedback with children, alone and in combination with hypnosis. Karen Olness (1996, 2008), Timothy Culbert, Judson Reaney, Daniel Kohen, and Rebecca Kajander have promoted the use of biofeedback and hypnosis as cyber-physiologic (self-steering) strategies that facilitate emotional and physiological self-regulation in children. Culbert, Reaney, and Kajander served as guest editors to past issues of *Biofeedback* (Moss, Culbert, Kajander, & Reaney, 2003; Moss, Culbert, Reaney, & Kajander, 1998) dedicated to pediatric biofeedback and hypnosis. Culbert, Kajander, and Reaney (1996) and Culbert, Reaney, and Kohen (1994) also provided key articles establishing a paradigm for voluntary control training, using biofeedback and hypnosis, for children's medical and emotional disorders.

Professional Issues

An article by Judy Crawford and Fredric Shaffer highlights the educational mission of the Biofeedback Certification International Alliance (BCIA). BCIA provides *Blueprints of Knowledge*, which articulates standards for the minimum knowledge which a practitioner should master before being certified as competent for practice. There are three BCIA blueprints covering general biofeedback, neurofeedback, and pelvic muscle dysfunction biofeedback. BCIA also accredits providers of continuing education, to ensure that rigorous academic standards are met, and that the

educational programs cover the relevant blueprints of knowledge. Finally, BCIA directly provides biofeedback continuing education, including the opportunity to gain continuing education credit for reading articles in *Biofeedback*, and an increasingly broad array of teleseminars on current topics in biofeedback and neurofeedback.

Special Issue Articles: Current Practice in Pediatric Biofeedback and Hypnosis

Jeffrey Bolek and Jennifer Yost introduce one of the areas where biofeedback provides intervention for children for whom there is little or no medical remedy—neuromuscular re-education. Their article provides a case study of a 13-year-old victim of a drive-by shooting, who suffered severe injury to the brain. The injuries produced severe cognitive deficits and loss of postural control for her head. Bolek and Yost utilized surface electromyography to retrain a series of muscles, enabling her to regain control of the head.

Ethan Benore and Gerard Banez report on the results of a survey they conducted on professionals providing biofeedback to children. The authors acknowledge that only a small number of those contacted actually responded to the survey, and those included a preponderance of early career practitioners. Nevertheless, their survey provides some perspective on pediatric biofeedback practice today. The authors expressed concern that one-third of the respondents rarely or never followed a specific protocol in biofeedback treatment, and over one-third never followed evidence-based practices or were unsure if they were doing so. Seventy percent reported no formal training in biofeedback, and 81% were not certified.

Leah Lagos provides an article on the “physiologically gifted child.” Lagos is a sport psychologist, pediatric clinical psychologist, and biofeedback practitioner, and has observed a pattern of heightened physiological reactivity in children she labels as “physiologically gifted.” She observes that these children carry both special gifts—perceptual and empathic sensitivity, and special vulnerabilities—sensitivity to put-downs and self-esteem injury. She provides a case history to exemplify the children she is describing, and to communicate her approach to assisting these children with biofeedback.

Shari Shamsavari St. Martin provides a report on an intervention project in Mexican towns along the U.S./Mexican border. These towns are stricken with violence due to the drug wars, and the children are at risk for joining gangs and participating in criminal activities. St. Martin describes a project, Alcanzando Niños en la Frontera, to provide children with a program of self-regulation training, education, and music and arts-based activities to support

positive socioemotional and cognitive development and reduce the risk of criminal activity.

Linda Thomson introduces an approach to using hypnosis, imagination, and diaphragmatic breathing with children to improve self-regulation and address a wide variety of medical and emotional disorders. Thomson, the author of two volumes of therapeutic stories featuring *Harry the Hypno-potomus* (2005, 2009), addresses misconceptions about hypnosis, and describes hypnotic approaches for both younger and older children. She also provides specific guidelines for children with somatic complaints.

Lena Santhirasegaram, Lynda Thompson, Andrea Reid, and Michael Thompson provide a case study to exemplify their approach in the neurofeedback treatment of children with Attention Deficit/Hyperactivity Disorder (ADHD). Neurofeedback for ADHD was recently given a rating of “Level 1 efficacy” by the American Academy of Pediatrics, but the success of this approach depends on clinicians conducting the treatment in accordance with current best practices. The authors, based at the ADD Centre and Biofeedback Institute of Toronto, emphasize use of a careful assessment to define training parameters and monitoring of progress with learning curves for each session.

References

- Attanasio, V., Andrasik, F., Burke, E. J., Blake, D. D., Kabela, E., & McCarran, M. S. (1985). Clinical issues in utilizing biofeedback with children. *Clinical Biofeedback and Health, 8*, 134–141.
- Culbert, T. P., Kajander, R. L., & Reaney, J. B. (1996). Biofeedback with children and adolescents: Clinical observations and patient perspectives. *Journal of Developmental and Behavioral Pediatrics, 17*, 342–350.
- Culbert, T. P., Reaney, J. B., & Kohen, D. P. (1994). Cyberphysiologic strategies for children: The clinical hypnosis/biofeedback interface. *International Journal of Clinical and Experimental Hypnosis, 42*, 97–117.
- Moss, D. (In press). The use of biofeedback and neurofeedback in pediatric care. In R. Anbar (Ed.), *Functional disorders in pediatrics: A clinical guide*. New York, NY: Springer.
- Moss, D., Culbert, T., Kajander, R., & Reaney, J. (2003). Special issue: Pediatric integrative medicine. *Biofeedback, 31*(1).
- Moss, D., Culbert, T., Reaney, J., & Kajander, R. (1998). Special issue: Biofeedback and applied psychophysiology for children and adolescents. *Biofeedback, 26*(1).
- Olness, K. (1996). Hypnosis and biofeedback with children and adolescents: Clinical, research, and educational aspects. Introduction. *Journal of Developmental and Behavioral Pediatrics, 17*, 299.
- Olness, K. (2008). Helping children and adults with hypnosis and biofeedback. *Cleveland Clinic Journal of Medicine, 75*(Suppl 2), S39–S43.

Thomson, L. (2005). *Harry the Hypno-potamus: Metaphorical tales for the treatment of children*. Bethel, CT: Crown House Publishing.

Thomson, L. (2009). *Harry the Hypno-potamus: More metaphorical tales for children*. Bethel, CT: Crown House Publishing.



Donald Moss

Proposal and Abstracts

Authors are invited to submit manuscripts on any topic in applied psychophysiology and biofeedback. Articles are welcome presently for a special issue on The Science and Practice of HRV Biofeedback for Fall 2013.