Improve Clinical Outcomes with Nutrition Awareness

Dianne Lazer, MA/CCC-SLP/COM



Newtown Square, PA 19073 dlazer@mac.com; www.diannelazer.com

OBJECTIVE:

Provide relevant information why nutrition therapy should be addressed first before starting central auditory processing disorder (CAPD) therapy

- Therapeutic interventions don't work effectively on a weak biological base
- Irritants and missing nutrients are the two major areas that impact the child's diet which, in turn, causes illnesses and reduces learning capacity
- Evaluating and strengthening the patient's diet improves their clinical response to therapy

Five Warning Signs that Nutrition Intervention Might Be Useful

- 50% or more of the diet is made up of processed grains that are high in sugar (foods that are easily meltable by saliva such as breads, crackers, chips, etc. or what is often called a "white diet" or one that is nutrient deficient (empty calories)
- Prefers drinking rather than chewing or eating healthy, whole foods like fruits, vegetables and/or meats
- Parents refer to them as picky eaters
- Has frequent colds and illnesses
- Diagnosed with reflux and/or colic



BACKGROUND INFORMATION:

Nutrition therapy works in two main ways:

1 Take away what's bothering the patient (usually this will be a food sensitivity that is bothering the patient's GI tract but can also cause symptoms that occur in the skin and the immune system). One example is when the stomach is irritated. This creates mucus that travels up the pharynx, into the airway and/or the eustachian tube and is a breeding ground for infections. If this is a very young infant or toddler, the culprit is usually dairy foods since they are mostly what the child is eating.

Common clinical symptoms of dairy protein intolerance or sensitivity include:

- ear infections
- constipation
- eczema
- frequent upper respiratory infections
- chronic congestion
- bad breath and/or
- snoring

Common clinical symptoms of a lactose sensitivity (or the sugar part of dairy):

- stomach aches
- loose stools
- flatulence or gassiness

Peptide Theory associated with casein (dairy) and gluten

Peptides are proteins. "Casein and gluten are complicated proteins and some people may be short on the enzyme needed to break them down completely. When this happens, the protein may turn into an unusual, incompletely processed molecule with a structure similar to morphine. In the nervous system, the receptor sites for endorphins (natural painkillers) mistakenly accept the alien compound, thereby activating a painkilling but also addictive neurological response...When the irritating food is eliminated from the diet, after a short adjustment period, some children snap out of their dietary daze and suddenly are more open to trying new foods." (Dorfman, 2013, p. 244)

*Taking away what's irritating the system can take pressure off the already overloaded sensory system and improve its functioning.

- 2 Close the gap of nutritional deficiency. Supplements may be needed to close the gap between what a child can or will eat and what they need for optimum development during critical developmental milestone periods. For example:
 - Eating highly processed foods can result in low levels of zinc, magnesium, Vitamins A, E, C as well as other trace minerals.
 - Low zinc intake is associated with poor taste and smell acuity which further contributes to a
 preference for sweet and salty snack foods.

*"Children may not look "malnourished" because they are gaining weight but the calories they are eating are not providing the nutrients they need for optimal development. The lack of nutrients in their diet could cause permanent damage to their neurological system and, therefore, are a possible cause of the sensory, learning and regulation difficulties they present." (Dorfman, 2013)



Nutrition-related treatment strategies for closing the gap of nutrient deficiency:

With the supervision of clinical nutritionist Kelly Dorfman, my patients take a combination of supportive nutrients that often include probiotics, fish oils and therapeutic doses of multivitamins/minerals as the first step.

- The probiotics help improve digestive functions.
- Therapeutic multiple vitamins and minerals can help improve appetite and improve the immune system.
- Fish oil contains fat necessary for operating the nervous system.

Since sensory processing difficulties stem from immaturity in neurological development, giving the patient the right kind of fat found in fish oils is critical in improving the neurological system and for improving brain development.

*Once the child has the nutritional support in place and GI and/or respiratory issues have resolved, a specific feeding program is designed to improve variety, texture and volume of healthy solid foods into the patient's diet. Then, CAPD therapy can commence.

Understanding there is a biochemistry to learning:

For learning to be successful, the neurons in the brain change in a number of ways to accommodate the new information. The myelin thickens. New receptor sites accept new connections from other neurons. The electrical potential shifts so the neuron can fire more easily with less stimulation the next time the information is needed, etc. However, if the needed nutrients are not available, this chemical process may not work effectively; the person may have the experience but he is not able to convert the information into learning. For example, the child could hear a new word over and over but not increase his vocabulary or he may require many more repetitions than is usually necessary in order to create the chemical changes required in the brain for learning to take place.

Nutrition-related treatment strategies that help improve the biochemistry of learning

With the supervision of clinical nutritionist Kelly Dorfman, additional nutrients may be included to help improve the biochemistry of learning such as the following examples:

- Magnesium (ADD/ADHD kids tend to be low in magnesium; helps to calm the sensory system and helps with constipation issues as well)
- Phosphatidylserine (a structural nutrient to improve memory and brain functions)
- DMAE (Dimethylaminoethanol; version of choline to help with motor planning issues)
- 5HTP (promotes serotonin, a neurotransmitter, involved in sending messages in the brain; works with the fish oil in taking the edge off and giving the feeling that things are easier and less anxious about every day things)
- Phosphatidyl choline (another structural nutrient that helps improve function in the brain)
- Piracetam (Helps left and right brain communicate better. Also helps motor coordination and cognition. Helps to process information faster too)

