



MAER Newsletter

Association for Education and Rehabilitation of the Blind and Visually Impaired
Michigan Chapter

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President's Message

Kathi Konow

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I can't believe it's almost time for our MAER conference. Your board has been working hard to give you the best speakers and presentations for this year's conference. Under the theme, "Expanding Boundaries," we will meet on April 26 and 27 at the Marriot Hotel at Laurel Park in Livonia.

The Thursday keynoter is Dr. L. Penny Rosenblum, a former presenter and a noted motivational speaker. In her topic, "Mom, Do Chicken Nuggets have Knuckles?", she will share with us key points that professionals need to consider in working with children and adults with visual impairments.

The Friday keynote speaker will be Bill Barkeley, who likes to live "Life without Limits"; and is the first deaf-blind person to climb Mount Kilimanjaro, a currently inactive strato-volcano in northern Tanzania, near the border with Kenya.

Other topics of interest offered by the conference include: Environmental Literacy, Functional Braille, Make and

Take Games, Technology and more. A special session will be held on dealing with diabetes from a real-life perspective. Individuals with diabetes will talk about every day dealings with the illness. It is the hope that participants will go home with a better understanding of their clients thinking and feelings about their life struggles.

Pat Love-Sypho will present a session on teaching social skills to students with visual impairments. This will include strategies and techniques on how to help students develop awareness of their bodies, families and environments as they understand the importance of good social skills and its impact upon self-esteem, independent living skills, friendships and safety issues.

The MAER board is hoping to see you in April at our conference. Questions, call me at 616-458-1187.

Eye Condition: Leber's Congenital Amaurosis

Alicia Li

Leber's congenital amaurosis (LCA), a rare genetic eye disorder, was first defined by Theodor Leber in the 19th century. It typically becomes evident at birth or in the first few years of life and primarily affects the retina. This condition should not be confused with Leber's hereditary optic neuropathy. Since LCA is associated with multiple genes (more than ten different genes), the presentation of LCA may vary. Infants, who are detected early with this disorder, frequently have severe visual impairments. Patients with LCA, who remain partially sighted, may show nystagmus, strabismus, photophobia, cataracts, hyperopia and/or keratoconus. Visual acuity is rarely better than 20/200. Although the condition may worsen very slowly over time, the visual impairment tends to be stable. Most children with LCA have normal intelligence; however, in some cases, LCA is associated with developmental delay, epilepsy, deafness, motor skill impairment and renal abnormalities (Foundation Fighting Blindness, 2012; Kanski, 1989).

LCA is usually passed through families by the autosomal recessive pattern of inheritance. According to Kanski (1989), its fundus findings vary considerably and may be responsible for incorrect diagnosis. The retinas of infants with LCA may initially appear normal, but electroretinogram (ERG) tests detect very little, if any, activity in the retina. ERG tests can be very helpful in establishing the cause of poor vision in a child with normal fundi such as LCA.

Clinical research trials of gene replacement therapy for LCA caused by mutations in certain genes (e.g., RPE 65) have been conducted. These studies provide extraordinary promise for patients with LCA. Routine examinations by an ophthalmologist are recommended by the American Association for Pediatric Ophthalmology and Strabismus (AAPOS) to diagnose/treat other eye problems and prescribe glasses, if necessary. Low vision aids, educational programs, and support agencies for the visually impaired (and family) are also recommended (AAPOS, 2012).

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Michigan Parents of Children with Visual Impairments (MPVI)

Amy Shepherd, President

"What do you want to be when you grow up?" It's a question we begin asking our kids long before we send them off to their first day of school. We take for granted a basic civil liberty, the freedom to pursue a career of choice and to become a contributing member of society.

As a parent and a former teacher, I believe that the main goal of an education is to provide students with the skills necessary to become literate, independent and employed members of their community. Students who are visually impaired must have full access to the general education curriculum, including quality instruction in literacy (Braille, large print, or other communication modes), orientation and mobility, life skills, social skills, career planning and assistive technology.

I had the unique opportunity last month to participate in a Braille Literacy Workshop hosted by the Michigan Department of Low Incidence Outreach. I was one of a few parents surrounded by a full room of teachers for the visually impaired, orientation and mobility specialists and college students pursuing their VI and O & M certifications. The energy in the room, brought on by the solidarity of being united with so many others working toward the same goal, was contagious.

The goal is to teach students with visual impairments the skills they need to exit the educational system and become the leaders, firefighters, inven-

tors, actors, lawyers, professional athletes, and teachers of their dreams.

As parents, we put our trust, our hopes and our children's dreams into the hands of our teachers for the visually impaired. They are our direct link to ensuring that our child has access to the general education curriculum. As such, it is imperative that we communicate and collaborate with each other, despite personal dynamics that might threaten our relationships. Every student is different just as every teacher and every parent is different. We all bring with us personality traits that can make or break a relationship. Yet, our kids don't have time for broken relationships. As parents and educators we have to find a way to work together, because when we do the rewards are immeasurable.

Together we can:

- Express high expectations and seek accountability so our students develop literacy at the same rate as their peers and avert the historical danger of "falling through the cracks."

- Model skills of advocacy so that others understand the challenges for Braille readers and students with low vision and the strategies and tools needed for them to access the classroom and curriculum.

- Create opportunities for students to practice social skills and to learn about career options and the skills needed to perform a variety of jobs.

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MPVI (cont.)

Children who are blind have the same basic needs as all children...a climate of opportunity. The most important thing schools can do for students who are visually impaired is to create communities that welcome diversity, promote acceptance of diverse abilities and educate all students based on their individual learning styles. This shouldn't have to be a dream. Together we can make this happen.

Amy Shepherd is the newly elected President of Michigan Parents of Children with Visual Impairments (MPVI). She has a MS in Elementary Education from Northwestern University and is a part-time tennis teaching professional. Her volunteer efforts include the MDE-LIO Independent Living Skills Committee, the Ann Arbor Public Schools Parent Advisory Committee to Special Education, and the Ann Arbor Disability Awareness Workshops. She lives in Ann Arbor with her husband, Andy and her two boys, 17-year-old Drew, and 12-year-old Austin, who has a visual impairment.

Technology

Scott Ford

Apple iOS - What is the hype? Perhaps, it is the “moderate novelty principle” being demonstrated again.

Everywhere we turn, we hear about another new app for Apple's iPhone or iPad. What is the latest app of the week, or to put it another way, “What is all this hype?” From the perspective of someone with a severe visual impairment, I have never seen an off-the-shelf piece of technology that is 100 percent accessible straight out-of-the box. This means no extra software, no need of sited assistance to make it work, and even more significantly, no extra expenses to make it accessible. Something else that is really quite exciting is that many teachers are being approached by their supervisors to implement the devices into their curriculum, rather than the teachers pleading with their administrators for the new technology. Many of the teachers I

have been working with are rapidly seeking out ways to embrace the technology and learn ways that they can implement the hardware into their classrooms. Adaptive Information Technology, Inc. and Low Incidence Outreach are answering the call by providing workshops and one-on-one training on Apple technology.

The “moderate novelty principle” was developed in the early 1900s by the Swiss psychologist, Jean Piaget, who focused his research on children and what factors most held their attention. In his most basic study, Piaget's experiment contained three scenarios. The first offered toddlers a familiar toy, for example, a wooden building block. The second offered them that same toy with some small variant innovation, for instance, a building block with knobs and holes that could be attached to other building blocks. The third offered



Technology (cont.)

the toddlers the same toy, but with a significant addition of some technology. Something like a building block that could change shape by the way it was twisted or turned. For us, none of these toys would set itself apart. But in a huge majority of cases, that is exactly what happened; children preferred, by significant odds, the second toy. From this study, along with further experimentation, Piaget concluded that children were wired to prefer things that are new, yet still have an element the children understood and with which they were familiar.

You may be asking yourself how a building block study with toddlers could possibly relate to the Apple IOS devices. Let's take a critical look at the relevant factors with each case. We have had many attempts by software and hardware companies to bring us a tablet computer for more than two decades, huge fortune 500 companies that include Microsoft and Hewlett Packard are among the failures. These tablets included the capabilities of the standard clam shell design of the common notebook computer, with a significant addition that included the capability to fold the lid over the keyboard and then write on the display with a stylus or one's finger. There were several variants, none of which ever took hold with consumers. Then the iPad comes along and utterly rocks the industry. What did they do so right that the other companies did so wrong? What is the magic that made Apple's pad device work where the competition failed?

Let's begin with the basic building block or the basic technology device. In our case, we will consider the popular devices such as computers, cell phones, and mp3

players as the basic building blocks. These devices grew from the old clunky beige box that is relegated to the back room or the Motorola star tack brick and CD players of yesterday. Today the notebook computer, smart phone, and mp3 player have quietly moved onto our laps or into our pockets in the evening while we are looking at Facebook or checking our mail. The technology is changing the way that we do much of our work and spend our time in pleasure related tasks. This is evident in the popularity of Facebook, Google and You Tube. Just ask your son or daughter how to do something pertaining to media or the gathering of information, just sit back and observe what they reach for first. Computers, smart phones, and mp3 players are today's basic building block.

Now we add the enhanced block to the study or the Apple iPad. The iPad has all of the same elements that we are completely familiar with such as the computer's desktop with icons or in apple talk the spring board, don't forget the Apple Store with enough apps to boggle anyone's mind. This device includes significant network and cellular connectivity, along with holding thousands of movies and songs, for any road warrior. The device has a very simple and intuitive interface that is enjoyable to navigate. The transition from other technology, such as computers, cell phones, and mp3 players are subtle, but significant. The device is simple, however at the same time providing that element of novelty, providing a measure of comfort and familiarity that everyone can understand.

Now we have that radical new block with the shape-changing technology that is built into the toy, or in another words, the failed

Technology (cont.)

tablet computers. In fact, some of these tablets could radically change shape from the familiar standard notebook computer to fold over and become a thick tablet. The differences were different; however they were sometimes so different that people were put off. At the same time the devices did not afford any true advantages to the user that a standard notebook provides. The amount of software that took advantage of this form factor was very limited, and did not work well. Most required the use of a stylus, because they did not have a multi-touch screen like iOS devices have. The list goes on, and the point is that they were not accepted by consumers and thus deemed a failure.

The first Apple iPad the device was quite limited in its capabilities, such as the enhanced block with a few differences that provide the novelty aspect that draws attention, however does not scare people away. Apple has subsequently built on this and carried the technology, as well as the masses of consumers along with them, with the release of the second iPad. In the debut of the latest release of the iPad Apple has again introduced the block that everyone was familiar with and adding several new features so that it is just a little bit better, at the same time sticking with people comfort levels. While this wave washes over mainstream consumers, the consumer with a disability was not left high and dry. Apple has made these devices completely accessible for people who have a variety of disabilities, such as visu-

al, hearing and tactile impairments. No fortune 500 company has ever adopted accessibility features as strongly as Apple has done in this author's memory.

This is where Adaptive Information Technology, Inc. and Low Incidence Outreach (LIO) have stepped up to provide support and workshops for students and teachers so that they can get ahead of the wave, poising them to be ready to ride the crest of the next big surf that is just over the horizon. Please visit the LIO website to see when the next scheduled workshop will be near you. In future articles, I look forward to diving into some of these incredible features in more detail, providing tips, tricks and some magic tricks that just about pop off the screen and amaze our ears.

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MSU Demmer Shooting Sports, Education and Training Center

Alicia Li

At the first glance, no one would think that shooting sports such as archery and air rifle would have anything to do with individuals with visual impairments. Indeed, a full access to those sports will not become a reality for the blind if no modifications are made to the current feedback systems that involve distance. However, while we are waiting for it to happen, shooting sports can still be an excellent experience for the visually impaired, especially when there is a well-equipped facility with highly trained staff. MSU Demmer Shooting Sports, Education and Training Center is such a place that fits perfectly under the notion of “a well-equipped facility with highly trained staff.” It is a year-round facility which houses both indoor and outdoor archery ranges, and state-of-art firearms ranges.

The Demmer Center, which provides people with a fun, educational and safe shooting experience, is open to the public and offers various activities to accommodate people of various skill levels. In other words, even individuals without any experience are welcome and will be

taught by patient, courteous certified instructors, either in large or small groups. A small fee is charged for frequent and non-frequent users (members and non-members), e.g., \$8 per session (1-1.5 hours) for indoor/beginner range and \$14/session for firearms range (non-members). Michael Galella, the director of the Center, has the interest and is working on finding more complete feedback and aiming systems for the blind. Mike Hudson, the director of RCPD (Resource Center for Persons with Disabilities) at MSU, commented on the Demmer Center: “An important ingredient here is that the director and staff are very passionate about their sport and are working collaboratively to expand possibilities [for the blind] at their facility. Attitude is more than half the battle. I know this will end up successfully.”

For more information, please visit: <http://demmercenter.msu.edu>



Bulletin Board

Sensory Safari

Students with visual impairments do not want to miss this excellent opportunity to learn wildlife through their senses. Sensory Safari, presented by the Detroit chapter of the Safari Club International and hosted by ROPARD, is free of charge to any child who is visually impaired and their accompanying family. Through this activity, children with visual impairments will be able to “see” wildlife through their sense of touch and hearing. They can also explore the animals that are full mounts, their skins, skulls and horns. Sensory Safari will be held at the Sterling Inn Hotel in Sterling Heights, Michigan on Saturday, April 28, 2012.

For questions, please contact info@ropard.org