Sight Loss Services, Inc. Cape Cod and Islands "The CandleLight" Newsletter June 2017

"It always seems impossible until it's done."

- Nelson Mandela

Adaptive Sports

Spaulding Adaptive Sports Centers are open to all members of the community who are living with disabilities, including vision loss. Staff members help participants find the most appropriate activities for his or her interests, capabilities, and needs. Spaulding's new facility, the McGraw Center, opens this summer at Nickerson State Park in Brewster. The activities offered in Brewster are: Cycling, Kayaking, Fishing, Paddle Boarding, and Hiking (or) Walking. Cost: \$20 per session. Spaulding also has a 3 session program for adaptive golf on Cape Cod. The cost for golf is \$40 per 3 week session held Tuesdays from 4-6 pm on July 11, 18, and 25th at the Dennis **Highlands Golf Course. Pre-registration is** required. For information contact Spaulding at (508) 833-4000 or register online at: https://sasc.spauldingrehab.org/login.aspx

Research

Kevin Houston (O.D., M.Sc.), a vision rehabilitative specialist at Mass. Eye and Ear, (also an Instructor in Ophthalmology at Harvard Medical School) has been granted funding which will allow him to advance his research of eye lid paralysis through the "Boston Blink-etic Project." His team has successfully treated patients using a non-surgical approach of embedding a magnet in biocompatible material and adhering it to the eye lid skin. He plans to continue to improve this technology in order to increase patient comfort and quality of life.

http://www.masseyeandear.org/news/

What are Meibomian (Oil) Glands?
Meibomian glands are the tiny oil glands which line the margin of the eyelids (the edges which touch when the eyelids are closed). These glands secrete oil which coats the surface of our eyes and keeps the water component of our tears from evaporating. Together, the water and the oil layer make up the tear film.

The tear film lubricates and keeps the surface of our eyes healthy; it also affects how clearly we see. If either the water or oil layer is decreased, or is of poor

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quality, we may have symptoms of irritation and/or blurred vision.

Meibomian gland dysfunction (MGD) refers to the condition where the glands are not secreting enough oil or when the oil they secrete is of poor quality. Often, the oil gland openings get plugged up so that less oil comes out of the glands. The oil that does make it out of the glands can be crusty or otherwise abnormal, and can cause irritation. MGD is very common but if left untreated, MGD can cause or exacerbate dry eye symptoms and eyelid inflammation. Chronically clogged glands eventually become unable to secrete oil which results in permanent changes in the tear film and dry eyes.

Treatment consists of eyelid/eyelash hygiene to clear off the dead skin, oil and bacteria which build up. The eyelid skin is extremely delicate, so please be gentle. Warm compresses on the eyelid margin will increase oil production and melt the "crusty" oil that has solidified in the glands. Use a warm (not too hot) wet washcloth to apply heat on the eyelids for four minutes or more. This warms the oil, allowing it flow more freely, and helps soften lash debris.

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This should be done twice a day when there are active symptoms, and once a day for maintenance.

Lid scrubs help to remove oil, bacteria and debris which block the oil gland openings. Use your fingers or a warm washcloth on the tips of your fingers to gently scrub along the lash line on the top and bottom eyelids. Use a mild soap like cetaphil or CeraVe or dilute baby shampoo (a few drops in a small cup of water)- something which will not burn or irritate the eyes. Ask your doctor if you have questions about what to use. Lid scrubs should be done once a day.

https://aapos.org/terms/conditions/141

Study Finds Macular Degeneration could be arrested by switching to low-glycemic diet

A study in mice finds that development of age-related macular degeneration (AMD) could be arrested by switching from a high-glycemic diet (starches as are found in white bread) to a low-glycemic (starches found in whole grains). For the same amount of total carbohydrate, high-glycemic diets release sugar into the blood stream more rapidly than low-glycemic diets.

Researchers at the Jean Mayer USDA

Human Nutrition Research Center on Aging

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at Tufts University also believe that the study points to potential biomarkers of AMD. These can be used to predict when a person is at risk for this disease. The researchers observed that a high-glycemic diet resulted in the development of many AMD features, including loss of function of cells at the back of the eye called retinal pigmented epithelial atrophy (RPE) and of the cells that capture light, called photoreceptors precursors to dry AMD - whereas a lowglycemic diet did not. Importantly, switching from a high-glycemic diet to a low-glycemic diet arrested damage to the retina. These findings add to a growing body of research on the relation between dietary carbohydrate control and the development of AMD, led by senior author Allen Taylor, Ph.D., senior scientist and director of the **Laboratory for Nutrition and Vision Research** at the Jean Mayer USDA Human Nutrition **Research Center on Aging at Tufts University.**

http://www.news-medical.net/news/20170516/Age-related-macular-degeneration-could-be-arrested-by-switching-to-low-glycemic-diet-study-finds.aspx