A Word From Our Director

As you can see from my new picture, I am proudly wearing the MS Walk tee shirt designed by our very own Dr. Tracy DeAngelis and Dr. Krupa Pandey. Those who walked with us received them and they are now collectors’ items. We did a great job, thanks to the hard work of our team leaders, Tova Epstein and Aliza Ben-Zacharia. By the time you receive this newsletter all of the contributions will have been counted, but at last count, we were almost at $40,000. We thank everyone who walked with us, supported us through your contributions, or who cheered us on.

Continued on page 2

Keynote Article
Basic Research at the Corinne Goldsmith Dickinson Center for MS

Gareth John, Ph.D, is an Assistant Professor in Neurology at Mount Sinai, and a member of the Corinne Goldsmith Dickinson Center for Multiple Sclerosis. The research in his laboratory is part of the basic science program at the Center that complements its clinical activities. This program focuses on analyzing factors relevant to lesion formation and repair in MS using modern high-throughput screening techniques, with the long-term goal of identifying novel treatments that encourage protection and regeneration of the brain. In this way, it may be possible to protect patients from new relapses and the development of new symptoms, while allowing them to recover from symptoms that they already possess. The research in Dr. John’s laboratory is currently supported by grants from the National Institutes of Health, the National MS Society, and private benefactors.

Here, we will focus on two research projects in Dr. John’s laboratory.

1 Interleukin-11 and oligodendrocyte protection. Results from experiments by Dr. Yueting Zhang, a National MS Society Fellow working in Dr. John’s laboratory, have identified the soluble mediator interleukin-11 (IL-11) as an important survival factor for oligodendrocytes. These cells are the major population targeted for destruction within MS lesions in the early stages of the disease, and factors relevant to their protection and survival are of great interest to the MS research community.

Continued on page 3
A Word From Our Director
Continued from page 1
EJ, who usually led our team has begun her own foundation, MS Hope for A Cure, and while we miss her leadership and her fabulous fundraising abilities for this walk, we congratulate her on her new endeavor. Thanks to MS Hope for a Cure, we have been awarded a three-year grant that is supporting Psychiatric Care for MS Patients. We are looking forward to this pioneering grant and welcome back Dr. Jennifer Finkel, who will once again be able to share her expertise with our MS patients.

As you will read in this edition of MS Interactions, we have been quite busy since our last newsletter. Dr. Gareth John has written an article about the research he and his lab are performing. Rebecca Straus Farber, the medical student who has spent almost a full year with us, and leaves us at the end of July, has written an article about her MRI Study. Our hope is that she will come back to us when she settles on Neurology and MS as her specialty.

There have also been three births in our office. Mothers and babies are all doing well. We have a little baby gallery inside and are pleased to share the good news and great baby pictures. We would also like to introduce you to two new members of our research team, Ruthie Perez and Christine Hannigan.

This has also been a busy time for the Center in terms of raising awareness about MS and for benefiting from the generosity of many of our friends. In addition to MS Awareness Week, March 10-17th, we had the 2008 MS Walk, for which money is raised for the National Multiple Sclerosis Society, who helps MS patients, their families and MS Centers in New York; we had our Sixth Annual Dance Party at The Rainbow Room, co-chaired by Joan Noto and Alessandra Noto Carlin; and a new event—a Live and Silent Auction--was initiated and co-sponsored by Joan Noto and Cindy Koppelman, at Miller Motorcars in Greenwich, Connecticut to help raise additional funds for the Center's many valuable programs. Thanks to everyone who helped make this such a special year.

We usually suspend our After-Hours Seminars after May, since many people take the summer off, but we have three exciting June Seminars planned—June 12th, 19th and 26th—a series of talks, sponsored by Bayer Pharmaceuticals, which are described inside, under the title: MS Demystified.

Our After-Hours Seminars are continuing in September, and we have a stimulating line-up of lectures planned, beginning with a presentation by Richard Cohen, who recently finished Strong at the Broken Places, in which he spends time with one individual with five different disease and discusses the impact of these five chronic illnesses. His book was on the New York Times' bestseller list for weeks, and Mr. Cohn has agreed to share his thoughts with us for our first Seminar of the 2008-2009 Season (Please see the complete list on page 8 and join us, if you are able).

As always, we look forward to sharing our news and accomplishments. We hope everyone has a good summer and look forward to seeing many of you in June and even more in September when our After-Hours Seminars begin again.

Best,

Fred D. Lublin, MD
Saunders Family Professor Neurology
Director, The Corinne Goldsmith Dickinson Center for Multiple Sclerosis
Keynote Article
Basic Research at the Corinne Goldsmith Dickinson Center for MS

More recently, Blake Gurfein, a student in the laboratory, has shown that mice treated with IL-11 exhibit clinical protection in experimental autoimmune encephalomyelitis (EAE), a model of MS, while mice lacking the receptor for IL-11 show more severe disease. These results are the first to implicate IL-11 as a survival and maturation factor for oligodendrocytes in the inflamed CNS. Therapies aimed at improving oligodendrocyte survival may be a good way to limit the size of MS plaques, and also improve their capacity for repair.

• Publications: Zhang et al., J. Neurosci. 2006; 26:12174-85

VEGF-A and MS lesion formation.

Work by Dr. Azeb Tadesse Argaw, a postdoctoral fellow in the laboratory, has implicated the soluble growth factor VEGF-A in MS lesion formation. VEGF contributes to lesion pathogenesis by disrupting the barrier that normally exists between the brain and the systemic circulation. Under normal circumstances, this barrier provides a selective interface that provides an optimized environment for efficient nerve function in the brain. Disruption of the barrier, which is one of the first detectable signs of a new MS lesion, leads to loss of this optimized environment, and also allows entry of potentially harmful inflammatory mediators and antibodies. Further work by Dr. Argaw has shown that VEGF-A disrupts the barrier by shutting down expression of one of its central components, called claudin-5 (CLN-5). These results are the first to implicate VEGF-induced loss of CLN-5 as a significant mechanism in barrier breakdown in MS lesions. They suggest that inhibition of VEGF-A may be a useful avenue for treatments designed to restrict the formation of new MS plaques, and prevent the expansion of ones that already exist.

• Publications: Argaw et al., J Immunol. 2006; 177: 5574-84, and ( cover to the left).

Update on the CGD Cognition Study
Rebecca Straus Farber

Over the course of the past year, many of our Corinne Goldsmith Dickinson Center for Multiple Sclerosis (CGD) patients have participated in a study examining the relationship between cognition and MRI in multiple sclerosis. We are happy to report that, thanks to the enthusiasm and cooperation of our patients, this study has been making progress and at this point we have some interesting initial results. This study grew out of the fact that some patients with MS report experiencing difficulty with various types of thinking and memory, but that it is difficult to predict or understand these difficulties based on conventional types of MRI. Researchers at the CGD Center therefore decided to team up with neuroradiologists at Mount Sinai to investigate a newer type of MRI called a diffusion tensor MRI. This technology is based on the fact that water diffuses differently in intact brain regions as compared to regions of the brain that are demyelinated and have had nerve axons disrupted. In intact brain regions the motion of water molecules is limited and tends to occur in a single direction, whereas in disrupted brain regions, the movement of water molecules is increased and tends to be more disorganized. With this study, we want to determine whether diffusion tensor technology can detect areas of the brain that correlate with, and perhaps are responsible for, difficulties with cognition.

Participants in the study have been undergoing diffusion tensor MRI (a sequence that takes an additional 2 minutes) on the same day as their usual, “standard-of-care” MRI, and participating in a session in which they engage in pencil-and-paper activities meant to assess different kinds of cognition, such as concentration, verbal fluency, verbal memory, and visual-spatial memory. Initial analysis with the first group of patients revealed that a wide variety of cognitive tests tend to be impaired in those individuals with abnormalities in a region of the brain called the corpus callosum, a white matter (heavily myelinated) tract that connects the two hemispheres of the brain. This is a region of the brain that tends to be frequently affected in MS. Although these results are preliminary, we hope to continue collecting and further analyzing study results. Our hope is that results from this study will shed light on the nature and origin of cognitive dysfunction in MS, as well as the potential for uses of this new technology in following MS disease.
The Center’s Growing Family

Please Meet Ruthie A. Perez, MS

Ruthie A. Perez graduated Cum Laude in 2003 from the College of Mount Saint Vincent in Riverdale, New York with a BS and MS in Allied Health Studies, with concentrations in Health Care Administration & Management and Health Care Systems & Policy. She began her career at Robert Wood Johnson University Hospital in New Brunswick, New Jersey as an Administrative Assistant/Medicare Billing Manager in the Home Care Department. She recently joined Mount Sinai Medical Center and our CGD Team as an Administrative Assistant/Project Coordinator. She will be working on CombiRx contracts, CombiRx finances and coordination of the Annual CombiRx Conference. In her free time, she enjoys watching baseball and “Dancing with the Stars”, coordinating events for her family and friends and spending time vacationing with her family and friends.

Please Meet Christine Hannigan

Christine Hannigan graduated from Hofstra University in 2003 with a Bachelors of Science degree in Community Health and has been a part of Mount Sinai for almost 3 years. She previously worked on the Healthy Aging study in the Department of Psychiatry in conjunction with the Bronx Veterans Affairs Medical Center, where she conducted neuropsychological testing on elderly veterans. Recently joining the CGD team as a Senior Clinical Research Coordinator, Christine will be working on several projects including CombiRx, Novartis and BioBank as well as beginning to get some new trials off the ground. Christine’s future plans include graduate school in pursuit of a Masters of Public Health degree. She is very excited to have joined the team and looks forward to becoming an integral part of the CGD family.
Friends, supporters, and auto enthusiasts rallied in Greenwich, CT on April 24th at a fabulous live and silent auction benefiting the CGD Center. The “Challenge MS” event raised more than $250,000, and was lovingly organized by the indefatigable Joan A. Noto and her colleagues. The evening’s bounty featured bidding opportunities for exotic travel, glamorous jewels, and two Smart Cars donated by Miller Motorcars, Inc., where the event was held in its Ferrari showroom.

Dan Marino (c.), legendary former quarterback of the Miami Dolphins, autographed footballs and gear for the highest bidder, as Cyndi M. Koppelman, co-organizer of the event, encouraged the bidding.

Dr. Fred Lublin, Director of the Center, thanked the gathering for their generosity in helping provide needed equipment for the Center including a power-driven medical exam table, MRI work station, and ongoing funding for educational activities. Special thanks to the benefit committee which also included Pari Kreutter Hirsch, MaryLou Evans, Betty Hauptman, and Holly Adams; and to Russell and Missy Sternlicht for donating the wonderful champagne for the event.

Joan Noto, sporting an orange scarf for MS, is shown with daughter Alessandra (c.), and her husband Stephen Carlin (2nd from right), and friends.
Sixth Annual Dance Party—March 6, 2008

Here are a few pictures from our Sixth Annual Dance party. We are pleased to announce that with everyone’s kind support and overwhelming generosity, we raised $735,000! The picture to the right is of Dr. Fred Lublin and Clifford Goldsmith, one of our founding sponsors and the father of Corinne Goldsmith Dickinson after whom the Center was named.

The picture on top left is a picture of Katherine and Clifford Goldsmith with Joan Noto the co-chairperson for this event, and the picture on the top right is a picture of Dr. and Mrs. Aaron Miller with Joan Noto, who went out of her way to make sure everyone had a wonderful time at the Dance Party.

Social Workers’ Tip of the Month: Family Leave

The Family and Medical Leave Act of 1993 is a labor law that allows an employee to take unpaid leave due to a serious health problem of that person or of a family member, which makes that person unable to perform his or her job.

An eligible employee is entitled to up to 12 weeks of leave for certain medical/family reasons during a 12-month period.

While this is a brief note, future newsletters will discuss this issue in greater detail. For more information, please go to www.dol.gov/elaws
Patients with MS receive information on their disease process from a wide variety of sources. Often, what patients understand about their diagnosis comes less from their physician, and more from ancillary sources such as pamphlets, websites, chat rooms, and even hearsay. In part because of the wealth of available information about MS, patients must often piece together their understanding of the disease on their own.

“MS Demystified” is a three-session evening educational program that will be led by Drs. DeAngelis and Krieger, and NPs Aliza Ben-Zacharia and Jennifer Decker. These sessions promise to be a dynamic, interactive learning environment, specifically designed to present a unified framework for patients to understand their disease process and the mechanisms of action of available and upcoming therapeutics. Our goal is to clarify many common misconceptions about MS and help our patients understand the disease, its treatment, and the future of MS therapy.

Please join us for one or all of the three seminars in June. RSVPs can be made to Susan Alter, at (212) 241-7393. The seminars will be held in Annenberg, Room 20-01, located at 1468 Madison Avenue at 100th St. MS DEMYSTIFIED is free and open to the public, sponsored by an unrestricted educational grant from Bayer HealthCare Pharmaceutical; refreshments will be provided.

Thursday, June 12th, 5:30 pm–7 pm: MS Demystified, Part I: “An Overview of the Immune System and Multiple Sclerosis,” will provide a look at the normal function of the immune system, the immune system dysfunction that underlies MS, and the mechanisms of action of the approved therapies for MS. This session will be run by Tracy DeAngelis, MD and Aliza Ben-Zacharia, ANP-BC.

Thursday, June 19th, 5:30 pm–7 pm: MS Demystified, Part II: “MS Mythbusters,” will deconstruct many of the common misconceptions about MS that we encounter daily at our Center. This promises to be a lively session where we will address topics of great interest and confusion. We will run this session as a “Top 10 List,” and then open it up to discussion, where patients can ask any and all questions that they may not feel comfortable asking in the context of an office visit. This session will be run by Stephen Krieger, MD and Jennifer Decker, ANP.

Thursday, June 26th, 5:30 pm–7 pm: MS Demystified, Part III: “Future MS Therapies on the Horizon,” will cover the steps required to develop and test new drugs for MS, including the purpose of Phase I/II/III trials. This seminar will include a description of several novel therapeutics currently under investigation, including combination strategies, oral agents for MS, and upcoming monoclonal antibodies. This session will be run by Tracy DeAngelis, MD and Stephen Krieger, MD.
The Corinne Goldsmith Dickinson Center for Multiple Sclerosis

A few words about waiting ---
We are sorry, and thank you for your understanding.

When we schedule appointments, we intend to see you at the appointed time.
There are days when traffic is bad or transportation is slow and people are late.
There are days when there are emergencies and people are fit into the schedule.
There are days when a case is complicated and a regularly scheduled visit takes longer than expected.
Please know that we value our patients and their time.
We will always do our best to see you when you expect to see us and
when there is a wait, to explain the circumstances to you.

We appreciate your understanding and look forward to your feedback on the Satisfaction Surveys on the Reception Counter.

Thank you.

The CGD Center for MS After Hours Seminars 2008-2009

Fourth Wednesday of Each Month (except when noted)
5:30-7 PM, CGD Conference Room

**********************************************

Special Seminars Planned for June 2008: MS Demystified
Thursdays at 5:30 PM—June 12, 19, 26

<table>
<thead>
<tr>
<th>Date</th>
<th>Topic</th>
<th>Speaker</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sept 24</td>
<td>Strong at the Broken Places</td>
<td>Richard Cohen</td>
<td>RE: Chronic Illness</td>
</tr>
<tr>
<td>Oct 22</td>
<td>To be Announced (TBA)</td>
<td>Dr. Jonathan Vapnek</td>
<td>Prominent Urologist</td>
</tr>
<tr>
<td>Nov 19**</td>
<td>Disclosure in Personal &amp; Professional Life</td>
<td>Donna Siegal &amp; Dr.</td>
<td>Confidentiality issues</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Stephen Krieger</td>
<td></td>
</tr>
<tr>
<td>Jan 28 2009</td>
<td>TBA</td>
<td>Dr. Tracy DeAngelis</td>
<td></td>
</tr>
<tr>
<td>Feb 25</td>
<td>Exploring MS</td>
<td>Dr. Fred Lublin</td>
<td></td>
</tr>
<tr>
<td>Mar 25</td>
<td>MS Therapy Update</td>
<td>Dr. Aaron Miller</td>
<td></td>
</tr>
<tr>
<td>April 29</td>
<td>Sexuality &amp; MS</td>
<td>Aliza Ben-Zacharia,</td>
<td>Sex Therapist</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Jennifer Decker</td>
<td></td>
</tr>
<tr>
<td>May 27</td>
<td>The Basics of Research</td>
<td>Dr. Gareth John</td>
<td>From the Bench to the</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Bedside—MS Research</td>
</tr>
</tbody>
</table>

Please call to sign up as soon as possible—212-241-6854, option 6.
Free to Attend—Light Refreshments and Drinks provided

What’s Going On?

Construction has started for the much awaited Bendheim Center for Parkinson’s Disease, under the umbrella of the Division of Movement Disorders.
The reason you do not see a long hallway anymore is because construction has truly begun.
Please bear with us, for it will be not too long before the Neurology Department unveils this new Center.

MS Interactions is a quarterly publication of the Corinne Goldsmith Dickinson Center for Multiple Sclerosis, 5 East 98th Street, New York, NY 10029.

Complimentary Subscriptions:
Call (212) 241-6854, option 6

How to donate:
Kim Woodward
Director of Development
(212) 659-1594

Comments & Questions:
Donna Polisar
CGD Center Administrator
(212) 241-6854, option 6