



History of Neurosurgery with Movement Disorders

—Developed under the leadership of Prof. Joachim K. Krauss, Hannover, Germany, Past-Chair of MDS Neurosurgery Task Force (now Special Interest Group); Special recognition for developing this content and coordinating the project belongs to Dr. Karl Sillay, Dr. Kelly Foote and Dr. Marwan I. Hariz.

Neurosurgical contributions to Movement Disorders surgery

Definition of Stereotactic and Functional Neurosurgery

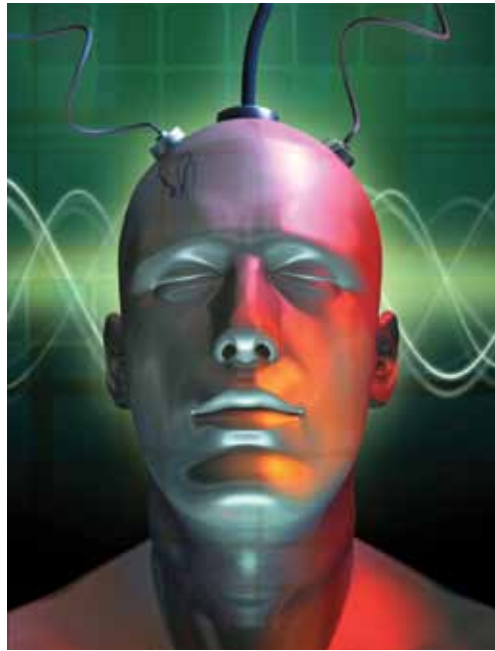
Neurosurgeons treating disorders of brain function by inactivating or stimulating the nervous system often referred to as functional neurosurgeons. Early neurosurgeons performing procedures with a Stereotactic Frame (described later) were often referred to as Stereotactic or Stereotaxic neurosurgeons. The term Functional and Stereotactic Neurosurgery has been associated with those neurosurgeons performing such procedures as deep brain stimulation (DBS).

More formally defined, “Stereotactic and Functional Neurosurgery is a branch of neurosurgery that utilizes dedicated structural and functional neuroimaging to identify and target discrete areas of the nervous system and to perform specific interventions (for example neuroablation, neurostimulation, neuromodulation, neurotransplantation, and others) using dedicated instruments and machinery in order to relieve a variety of symptoms of neurological and other disorders and to improve function of both the structurally normal and abnormal nervous system.” (Blond, Broggi, Gildenberg, Hariz, Krauss, Lazorthes and Lozano)

Brief history of neurosurgery for Parkinson's disease

Surgical intervention for Parkinson's disease (PD) began with ablative surgery. In 1942, Dr. R. Meyers first reported the effects of ablative surgery of the basal ganglia in a Parkinson's patient when he performed partial caudate resections for control of parkinsonian unilateral tremor (Meyers, 1942; Gildenberg, 1998). In the 1950s, Dr. Cooper reported an accidental finding during a planned mesencephalic pedunculotomy. Dr. Cooper ligated the anterior choroidal in the process of aborting the surgery, and observed reduction in tremor and rigidity without the loss of motor strength. Lesions produced by this procedure variably included parts of the thalamus, globus pallidus, or internal capsule.

Human stereotaxy was introduced in 1947 by Spiegel and Wycis (Spiegel et al., 1947), providing a reproducible method of navigating



to an intended surgical target. Dr. Hassler described lesioning of the ventral intermediate nucleus of the thalamus for parkinsonian tremor using stereotaxy in 1954 (Hassler and Riechert, 1954). Surgery for movement disorders was then widely performed until Dr. Cotzias introduced in 1968 a clinically practical form of levodopa therapy (Cotzias, 1968), which temporarily suspended the apparent need for movement disorders surgery.

Lesional stereotactic surgery for PD re-emerged in the 1990s for patients experiencing complications of levodopa therapy. Stereotactic targets included the: ventrolateral thalamus, globus pallidus internus (GPi), and subthalamic nucleus (STN) (Starr et al. 1998). Early in the development of stereotactic lesional surgery, neurostimulation was observed to reduce parkinsonian tremor (Hassler et al., 1960). These observations led to the development of

implantable electrical stimulation devices as an alternative to stereotactic lesional surgery for Parkinson's disease.

The first permanent implant subthalamic nucleus stimulator to treat all cardinal signs of Parkinson's disease was performed by Dr. Alim Benabid in Grenoble, France in 1993 (Limousin et al., 1995). Today, deep brain stimulation (DBS) has become the “gold standard” for the surgical treatment of PD. Unlike ablation, DBS is relatively safe, non-destructive, reversible, and adjustable.

Current and Emerging Surgical Treatments / Challenges with Specific Mention of Contributions of Neurosurgeons (Neuromodulation)

Early Investigations in Neurostimulation

Electrical Stimulation was described as early as 15 AD when Scribonius used an electric torpedo fish for gout pain treatment.¹ In the 1770's both Benjamin Franklin² and Galvani³ noted electrical stimulation caused muscle contraction. One hundred years later, cortical stimulation was described first in an animal,⁴ and in an awake patient with exposed motor cortex after debridement for osteomyelitis.⁵ Intraoperative stimulation was described in 1884 by Sir Victor



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We are quickly approaching the major event for the Society; the annual International Congress, which will be held this year in the lively city of Dublin (*Gaelic: Baile Átha Cliath*). The comprehensive program includes some new exciting features introduced by the Congress Scientific Program Committee, led by David J. Burn and Timothy Lynch. During the five days, more than 170 speakers from 25 countries will help us to understand the new directions in basic and clinical research on Parkinson's disease and other basal ganglia disorders. In addition, the day before the Congress (which is by chance the 16th of June, and the so-called *Bloomsday*, a daylong celebration of the Ulysses route), a second edition of the Basic Movement Disorders Course will be held in Dublin at the Royal College of Physicians of Ireland. This will be extraordinary chance for those new in the field, to have a *crash course* on movement disorders given by some of the best world experts.

This issue of *Moving Along* also contains all the usual features, plus a new one which we introduced to celebrate the talent and willingness to emerge from some of our younger colleagues. This series of witty short interviews will be called "My Generation". The first one is with Maria Stamelou, MD, PhD, of the University College London, Institute of Neurology. With others to follow, we will be reporting on the life and early career of young neurologists from all over the world. We also continue to invite all readers to suggest topics or volunteer to write a contribution for future issues. We hope you will enjoy this issue of *Moving Along* and we will see you all in Dublin.



Carlo Colosimo, MD



Mark Stacy, MD



The *Movement* Disorder Society

For this first issue of *Moving Along* in 2012, I am pleased to look back on a highly successful year for The *Movement* Disorder Society (MDS). The accomplishments of the Society depend heavily on the participation of its membership, which reached an all-time high in 2011 to over 3,700 members from 97 countries.

This active participation was seen at the 15th International Congress of Parkinson's Disease and Movement Disorders held in Toronto, Canada in June 2011, attended by over 3,700 enthusiastic delegates from 74 countries. Record numbers also attended regional educational programs organized by the MDS Asian and Oceanian Section, the MDS European Section and by the MDS Pan American Section.

The success of the Society and the growing enthusiasm from members around the world lead the Society to expand the number of committees and task forces exploring scientific developments in our field and working to enhance physicians' knowledge of Movement Disorders.

New Task Forces Appointed

Society task forces are appointed to accomplish specific tasks and remain in place until completion of the tasks.

The MDS Tremor Task Force, chaired by Rodger Elble, was appointed to review the evidence for the interventions for the treatment of tremors; develop a new classification for tremors; and develop a new MDS Tremor Rating Scale.

The MDS Task Force on the Definition of Parkinson's Disease, chaired by Daniela Berg and Ron Postuma, will begin the dialogue to redefine Parkinson's disease to more accurately reflect our current state of knowledge. From a research perspective, this is important in order to advance our understanding of the disease and develop therapeutic strategies that affect both the onset and progression of neurologic symptoms.

The MDS Task Force on Telemedicine, chaired by Ray Dorsey, is charged with developing a plan for how the Society could facilitate the use of telemedicine to increase access to Movement Disorder specialists.

The MDS Task Force on the Classification of Genetic Movement Disorders, chaired by Christine Klein and Connie Marras, is charged with the development of an improved classification system. The Task Force will create distinct lists for clinical and research purposes, create more informative locus symbols, distinguish disease-causing mutations from risk factors, raise the threshold of evidence prior to assigning a locus symbol, pay strict attention to the predominant phenotype when assigning symbols lists and will have a formal system for reviewing and continually revising the list that includes input from both clinical and genetics experts. Certainly this activity needs to be harmonized with existing classification systems.

Looking forward to the remainder of 2012, I expect this excitement and activity to continue. Our MDS Committees are hard at work and a number of new programs are planned and will be available shortly.

New Resources Available in 2012

During the first half of 2012, the Society will be launching:

- Podcasts of *Movement Disorders* journal abstracts;
- Tablet and mobile phone applications for the MDS Unified Parkinson's Disease Rating Scale (MDS-UPDRS);
- Additional modules for Coffee Break CME;
- Online Unified Dyskinesia Rating Scale (UDysRS) training and certification;
- Additional grants to support scientific meetings

As you know, our shared goal is to enhance patient care by advancing scientific and medical knowledge in our field. By working together, it is possible for us to achieve this worthwhile goal. Thank you for your ongoing participation in The *Movement* Disorder Society and best wishes for another successful MDS year in 2012.

Günther Deuschl, MD
MDS President 2011-2013

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16th International Congress Updates

Planning is well underway for The *Movement* Disorder Society's 16th International Congress of Parkinson's Disease and Movement Disorders, to be held June 17-21, 2012 in Dublin, Ireland.

Congress Registration and Housing Reservations

Register by April 20 to receive reduced rates! It is highly recommended to choose your ticketed sessions in advance, as ticket selections cannot be guaranteed onsite due to space limitations. To register, please view our website at:

www.mdscongress2012.org/registration/

If you wish to reserve a hotel room, please view our website at:

www.mdscongress2012.org/housing/

2012 Theme: "The perils and promises of genetics in movement disorders"

The Congress Scientific Program Committee selected "The perils and promises of genetics in movement disorders" as the theme for this year's International Congress. The theme will be highlighted in two Plenary Sessions, five Parallel Sessions, three Skills Workshops, two Video Sessions and one Teaching Course. International experts will serve as faculty, and the presentations will run the gamut of the field, from new research to practical applications. Meeting participants can elect to attend any or all of the sessions.

Scientific Sessions

The 2012 Scientific Program will incorporate Therapeutic Plenary Sessions, Plenary and Parallel Sessions, Teaching Courses, Video Sessions, Skills Workshops, Guided Poster Tours and Blue Ribbon Highlights.

Sessions will focus on the latest developments in:

- Genetics in Movement Disorders
- Movement Disorder topics, including, but not limited to, ataxia, chorea, dystonia, myoclonus, Parkinson's disease, restless legs syndrome, spasticity, stereotypies, tics and tremors
- Basic Science issues, including, but not limited to, genetics, neuroimaging, neuropharmacology, surgical therapy and transplantation
- Other less common clinical conditions

Abstracts

Although the regular abstract submission deadline has passed, the Late-Breaking Abstract submission deadline is April 2, 2012. A late-breaking abstract is any abstract reporting information that became available for public dissemination after the deadline of the regular abstract submission. It must be of critical importance to the clinical and/or scientific community and/or the public and should be newsworthy. Previously published material could also be considered a Late Breaking Abstract only if, in addition to the published material, the abstract contains additional, unpublished, new information, rectification, clarification, and/or correction of critical importance to the clinical and/or scientific community and/or the public and which became available for public dissemination after the deadline of the regular abstract submission. This is not designed to favor investigators who inadvertently missed the deadline for the regular abstract submission.

Events

Welcome Ceremony

All International Congress attendees are warmly invited to meet friends and colleagues during the traditional International Congress Welcome Ceremony at the Convention Centre Dublin. This event is open to all registered delegates. Guests are welcome to purchase a Welcome Ceremony Pass during the registration process that will allow them admission to this event.

MDS Video Games

Please join Masters of Ceremony Anthony Lang and Kapil Sethi as they host a world-renowned panel of Movement Disorders experts in guiding participants through unique Movement Disorder cases. The cases will be presented by representatives from Movement Disorder Centers around the world and discussed by the two teams of Experts. Awards will be given for the most interesting and challenging cases and the teams of Experts will compete for the highest number of correct diagnoses that they make. Country pride will add an enjoyable spirit of competition to this event. The goal of this session is for attendees to learn from a series of unusual, very interesting patients and see how senior experts approach these types of challenging cases.

The two teams of Experts are:

Team 1:

Alberto Espay, *Cincinnati, OH, USA*

Daniel Healy, *Dublin, Ireland*

Christine Klein, *Lübeck, Germany*

Marcello Merello, *Buenos Aires, Argentina*

Team 2:

Bastiaan Bloem, *Nijmegen, Netherlands*

Hubert Fernandez, *Cleveland, OH, USA*

Thomas Warner, *London, United Kingdom*

Ruey-Meei Wu, *Taipei, Taiwan*

Following the International Congress, the cases presented could be developed further for publication in the Journal or presentation on the Society's website. This event is open to all registered delegates. For more information about the MDS Video Games, please contact Sarah Smith at ssmith@movementdisorders.org.



Upcoming Deadlines

April 2, 2012 – Late-Breaking Abstract Deadline

April 20, 2011 – Early Registration Deadline

May 30, 2011 – Final Registration Deadline

June 17-21, 2012 – 16th International Congress of Parkinson's Disease and Movement Disorders

Ipsen's Commitment to Improving Patient Care Helps MDS Disseminate Knowledge about Movement Disorders

The *Movement Disorder Society* (MDS) has a long tradition of providing the highest quality evidence-based medical education. That tradition would not be possible without the help of the Society's many supporters, including Ipsen Pharma SAS. As a partner dedicated to improving patient care through education and research, Ipsen has made a multi-year commitment to MDS educational programming. This ongoing relationship helps MDS plan several years into the future and reach new geographic areas.

- Ipsen's support at the Platinum Plus level helped make the 2011 MDS International Congress a great success with 3,750 attendees from 74 countries. Eighty-five percent of the 213 learning objectives in 71 courses or workshops in the Congress scientific program met the established threshold of effective learning.
- Ipsen helped support the MDS-European Section 2011 Summer School in Naples, where 86% of attendees rated their ability in the

topics as excellent or above average after the activity, compared to an average of 37% before the activity.

- Ipsen helped support the Diagnosis and Treatment of Dystonia Syndromes course in Milan (September, 2011), where 56% of attendees rated their ability in the topics as excellent or above average after the activity, compared to an average of 10% before the activity.
- Ipsen helped support the Botulinum Toxins in Neurological Practice Workshop in Liverpool (October, 2011), where 43.2% of attendees rated their ability in the topics as excellent or above average after the activity, compared to an average of 18.5% before the activity.

In addition, Ipsen has made multiple future support commitments which will help MDS plan future educational activities.



The *Movement Disorder Society*

Bloomsday Basic Movement Disorders Course

Recommended Audience and Course Description

This course is specially designed for family physicians, general neurologists, internists, trainees and other clinicians interested in acquiring a basic understanding of and a clinical approach for the evaluation and management of common movement disorders. The Bloomsday Basic Movement Disorders Course will provide a foundation for participants also attending the 16th Annual International Congress of Parkinson's Disease and Movement Disorders beginning the next day.

Bloomsday, June 16, 2012

DUBLIN, IRELAND

Venue: Royal College of Physicians of Ireland

Proudly supported by the Royal College
of Physicians of Ireland.



ROYAL COLLEGE OF
PHYSICIANS OF IRELAND

Topics Include

Phenomenology of Movement Disorders
Diagnosis and differential diagnosis of Parkinson's disease
Management of early Parkinson's disease
Management of advanced Parkinson's disease
Tremors
Dystonia
Chorea, athetosis and ballism
Myoclonus
Restless legs syndrome and movement disorders in sleep

Registration

Regular Registration Fee \$225

*Junior Registration Fee \$125

Regular Registration with purchase of Congress \$200

*Junior Registrants with purchase of Congress \$90

**Junior Members of MDS, those born after January 1, 1982, residents, fellows and those still in training. Please fax or e-mail a copy of official document indicating age or a letter from your employer stating training status to be eligible for this discount. Without documentation, delegate will be charged the non-member rate.*

(Fax: +1 514-380-5378 or E-mail: mdscongress@showcare.com within one week of submitting registration.)

Please note that if your residence is outside of the United Kingdom and Ireland, you must register for both the Basic Movement Disorders Course and The 16th International Congress of Parkinson's Disease and Movement Disorders.

For more information and how to register, please visit:

www.movementdisorders.org/education/

Call for 2012 Supported Meeting Applications!

The *Movement* Disorder Society is currently accepting applications from meeting organizers who wish to receive financial support for scientific meetings in the year 2012. MDS will be offering a total amount of \$70,000 USD to support scientific meetings in 2012, with an additional \$30,000 USD in funding available for request only by meeting organizers who belong to a group with MDS Affiliate Member status.

To apply, meeting organizers must submit a proposed program, including lecture topics, faculty, and a detailed budget for the meeting along with the completed Supported Meetings application which is available on the MDS website:

http://www.movementdisorders.org/announcements/supported_and_endorsed/

The goal of the Supported Meetings program is to support new and novel meetings rather than repeated occurrences of previous meetings, however support for general movement disorders meetings will be considered when there is a clear educational need and high likelihood that obtaining funding would be difficult, as in developing countries for example.

In addition to the grant monies, MDS will promote all Supported Meetings in the Society's publications, including the *Movement Disorders* journal, the *Moving Along* newsletter, and on the MDS website. In return, meeting organizers who receive grants must agree to:

1. Credit The *Movement* Disorder Society for its support of the meeting in all meeting publications and announcements, including promotional brochures, website, and in newsletters when applicable.
2. Provide MDS with copies of all meeting literature including program, abstracts, proceedings and promotional materials as well as a list of recent meeting attendees including both mailing and e-mail addresses when available.
3. Provide complimentary space for The *Movement* Disorder Society to display the MDS exhibit booth and literature during the meeting.
4. Provide one complimentary page in the meeting program for an advertisement provided by The *Movement* Disorder Society and include International Congress promotional material in the meeting registration bag.


5. Submit a final report including attendance numbers and reconciled budget within 60 days of completion of the meeting.
6. In the case of excess revenues being realized, the meeting organizers will arrange repayment of the seed grant to MDS.
7. The *Movement* Disorder Society will have the right to review scientific content of the meeting and make suggestions if necessary. Organizers agree to provide any information requested by The *Movement* Disorder Society.

For further information regarding Supported Meetings or to request an application form, please contact:

The *Movement* Disorder Society (MDS)
Attn: Supported Meetings Program
555 East Wells Street, Suite 1100
Milwaukee, WI 53202-3823 USA
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The Movement Disorder Society



Coffee Break CME

ANNOUNCING A NEW CME PROGRAM FROM THE MOVEMENT DISORDER SOCIETY!

THE FIRST MODULES OF COFFEE BREAK CME ARE:

TREMOR MODULE 1: *Essential, Kinetic, Postural, and Rest Tremors*

TREMOR MODULE 2: *Cerebellar, Cortical, Dystonic, Holmes', Orthostatic, and Primary Writing Tremors*

TREMOR MODULE 3: *FXTAS, Palatal, Peripheral Neuropathy Associated, Psychogenic, and Vocal Tremors*

www.mdscoffeebreakcme.org

COURSE DESCRIPTION
Coffee Break CME is The Movement Disorder Society's first online CME program specially designed for the busy clinician. For physicians who care for Parkinson's disease (PD) and movement disorders patients, continuing education is critical to providing the best care possible. This program is designed to provide this information in a modular format where each module is focused on a single topic that can be completed in a short period of time and provide the clinician with updated information that is relevant to their practice. Both standard approaches and new advances are highlighted.


Each module is broken into sub-topics that are discussed in a short article and demonstrated in 1-5 case study videos. The scope of this project includes modules on: parkinsonism, tremor, dystonia, chorea, restless legs syndrome, and other topics as identified. These modules will be rolled out over several months, beginning with three modules covering tremors. After users have registered for a module, they are able to log in to the site as many times as needed to view all the material. At the beginning and completion of each module, participants are asked content-related questions to gauge their learning. MDS is accredited by the ACCME to certify 2.0 AMA PRA Category 1 Credits™ for each module.


LEARNING OBJECTIVES
The overall learning objectives for the Coffee Break CME program are:

1. List common movement disorders categories
2. List features to differentiate diagnoses and guide your history
3. Describe and/or be able to demonstrate physical examination maneuvers to establish the diagnosis
4. List established and emerging treatments for common movement disorders
5. List side effects of treatments and be able to fully inform your patients regarding expected benefits and possible complications of therapy

REGISTRATION RATES
MDS Members: Free
Non-Members: \$50 per module

FOR MORE INFORMATION CONTACT:
MDS International Secretariat
Email: education@movementdisorders.org
Phone: +1 (414) 276-2145

TITLE SPONSOR This activity is supported by an educational grant from Teva Neuroscience 

GOLD SPONSOR This activity is supported by an unrestricted grant from Novartis 

MDS-2012-001

Health Professionals (Non-Physician) Special Interest Group Sets Goals for Outreach, Education and Research

—Meg Morris, PhD, Melbourne University, Victoria, Australia

—Ruth Hagestuen, RN, MA, National Parkinson Foundation, Minneapolis, MN USA

The Health Professionals (Non-Physician) Special Interest Group was officially formed after the 2011 Congress in Toronto, and its beginnings date back to 2008. At that time, a small group of dedicated volunteers had a mission to encourage MDS health professional members to become more involved in the Society. Today, that mission is becoming a reality as the number of MDS Health Professionals (Non-Physician) has grown to 145 members.

Beginning in 2012, the mandate of the group is to:

- Convene a meeting of interested members at the MDS International Congress
- Represent the views of their group to the Membership and Public Relations Committee and, if appropriate, to the MDS Officers
- Propose educational topics/sessions for the MDS International Congress (via the online submission process)
- Maintain a presence on the MDS Website for our special interest area
- Recruit new Society members
- Survey MDS members periodically to gauge their interests
- Generate proposals for activities

The group's core founders, Carol Moskowitz, APRN-C, Mariella Graziano, MSc, BSc (Hons) Orna Moore, RN, MA, have guided the development of a webpage on the MDS website to inform and engage members, as well as developing a Needs Assessment Survey to gauge the interests and educational needs of non-physician health professionals caring for patients with movement disorders.

In December 2011, a new Chair and Co-Chair were named and approved by MDS leadership. Meg Morris, PhD, and Ruth Hagestuen, RN, MA will guide the activities of the growing group, which will incorporate the following three areas:

Outreach

The first group goal is recruitment, also known as "outreach," of non-physician health professionals who are currently not MDS members. In order to attract new membership, Health Professional (Non-Physician) dues have been kept at \$100 per annum. We use the term "outreach" so as to promote a broadened approach of Society participation and the further development of our Health Professional (Non-Physician) Special Interest Group.

Thus far, we have divided the world into regions and disciplines. Therefore, some outreach team members will concentrate on recruiting from Health Professional disciplines in South America, while others will focus on recruiting advanced practice nurses in the UK, US, Africa or Asia Pacific Rim. In addition, all MDS members are encouraged to recruit non-physician Health Professionals working within their practices or directly with their patients as we continue to build our inter-professional group dedicated to education, research and the subsequent delivery of evidence-based care.



Education

The second goal is education in many forms:

- a) Increasing poster presence, especially at MDS congresses
- b) Increasing the number of topics suggested to the Congress Scientific Program Committee. Professor Lynn Rochester is leading this for the Dublin 2012 Congress and it would be good to think about the 2013 Congress and beyond. The online submission deadline for symposia and workshops is usually in the week immediately following the Congress.
- c) Increasing the number of parallel sessions, workshops and panel discussions at future Congresses – next in Dublin in 2012 and then Sydney in 2013.
- d) Featured Articles: uploading to the webpage one carefully selected, peer-reviewed article with a brief commentary to broaden the scope of Health Professionals and their neurologist colleagues. Your suggestions are welcome; please send the reference or the link to Heidi Friedrichs, Website Manager, at hfriedrichs@movementdisorders.org.

Research

At the Dublin Congress in June 2012 we shall be having a meeting of members and a strategic planning session where the research direction and research strategy shall be discussed, taking into account the world wide distribution of our clinical researchers and the need for research training and research advocacy. We welcome your participation in this new and growing group and look forward to working together to further our goals in 2012.

Updates on the MDS-UPDRS

The *Movement* Disorder Society (MDS) currently licenses the Unified Parkinson's Disease Rating Scale (MDS-UPDRS) and trains raters through an online program. However, there are now new opportunities to use the MDS-UPDRS for personal use, patient care, and clinical studies.

Translations

MDS is pleased to announce that there are now official translations of the MDS-UPDRS available on the MDS website. Due to the diligence and hard work of various language translation teams, members and non-members can license the MDS-UPDRS in Spanish, Italian and Estonian. Other non-English translations are in progress, as well.

In addition to licensing the MDS-UPDRS in non-English languages, the MDS-UPDRS Online Training and Exercise Program is also available in Italian and Spanish. If you are interested in taking this certificate program online in either language, simply visit www.movementdisorders.org/updrs and select your language preference after logging in with your MDS username and password. If you have questions about the translations or would like information on applying to participate in the non-English Translation Program, please contact Jen McTavish at jmctavish@movementdisorders.org.

Mobile Applications

Coming soon to an Apple iPad®, iPhone®, iPod Touch® or Android™ powered phone near you: the MDS-UPDRS!

MDS Affiliate Member: Czech Movement Disorders Society (Czech MDS)

—Martin Bares, MD, PhD; Chair, Czech Movement Disorders Society; Professor of Neurology, St. Anne's Hospital School of Medicine, Masaryk University Brno, Czech Republic



The Czech Movement Disorders Society was founded in 2001, and in 2011 we celebrated the 10-year anniversary of the Society. Currently, the number of active members in the Czech Movement Disorders Society is 84, with members coming from movement disorders centers and neurology departments, as well as from out-patient departments of neurology. The list of members was updated in 2011, and the processing of membership has been revisited.

In 2011, the Czech Movement Disorders Society, an Affiliate Member of The *Movement* Disorder Society (MDS), organized several important local and national seminars and symposia to spread the knowledge on this topic. Among these were the dystonia conference in Olomouc, Czech and Slovak National neurological Congress in Brno, and other local meetings. The Czech Movement Disorders Society continued the discussion on a new website for the society, as

well as searching for funding resources. The new website is expected to launch in the spring of 2012. The society also made final steps towards the non-profit foundation for patients with movement disorders. This foundation is anticipated to be active sometime in 2012.

The executive committee (EC) of the society provided longitudinal expertise for the Czech Neurological Society, health care providers (insurance companies), and other relevant bodies on different topics ranging from the public health care system to the different therapeutics (antiparkinsonian drugs, botulinum toxin, etc.) The EC prepared the concept of centers of spasticity throughout the Czech Republic, and this concept was approved by the Czech Neurological Society. One other important issue covered by EC is continuous awareness about Movement Disorders throughout the neurological community in Czech Republic via different lectures for health-care professionals, as well as for patients.

MDS Obtains Investment Management Services to Improve Financial Outlook of the Society

MDS has recently utilized the services of Veritable Investment Consultants, LP to provide financial portfolio management for the Society. Based outside of Philadelphia, PA, USA, Veritable is an independent registered investment advisor who provides unbiased investment solutions to individuals and entities. By generating investment income, MDS has been able to increase funding to its grant programs, including travel grants, supported meetings, educational fund for underserved regions, visiting professor programs and ambassador programs. For more information on Veritable, please visit the website at www.veritablelp.com.

My Generation: Dr. Maria Stamelou

—Maria Stamelou, MD, PhD, University College London, Institute of Neurology, Queen Square

—Kailash Bhatia, MD, DM, FRCP, University College London, Institute of Neurology, Queen Square



Dr. Maria Stamelou, born in 1979, tells us about her family, education, hobbies and early medical career:

Dr. Stamelou: I grew up in Corinth, a city by the sea in Peloponnese, South Greece, and am the daughter of two mathematicians. Their interests were far beyond mathematics and I grew up in a house full of books, music and discussions. My mother taught me sensibility, to respect my dreams and pursue them, and my father, an eternal dreamer, taught me to also consider the undefined, the undetermined, to search beyond what is known. My brother is a lawyer and his independent, innovative spirit was always an inspiration to me. My parents gave me all opportunities to learn the piano, ballet, poetry and theater, which remain my main interests apart from medicine until now. I enjoy reading literature and have recently read *The Home and the World*, by Rabindranath Tagore and *Le Rouge et le Noir*, by Stendhal. I also enjoy singing with our vocal ensemble, Opus Femina, from Corinth. Rehearsing and performing with these girls was one of my nicest experiences.

I don't exactly remember when or how I chose medicine; my parents do remember me as a child pretending to write prescriptions. Inspired by my teachers Prof. Mylonas and Prof. Taskos, I chose neurology by the end of medical school at the University of Thessaloniki, Macedonia, Greece. There is nothing more fascinating than the brain, as our brain is what we are, from the physical to the philosophical aspect. I decided to study neurology in Germany, as I was impressed by my experience as an Erasmus student in Freiburg. I chose Movement Disorders, as I was excited by the indisputable diagnostic strength of a skilled neurological examination in these disorders, and admired clinicians that had this knowledge. Professors W.H. Oertel and G.U. Hoeglinger gave me the great opportunity to finish my training and my PhD at Philipps-University in Marburg, and offered me the opportunity to get involved in the MDS, which helped me to know more about the field by participating in MDS activities. In fact, it was in one of the MDS Congresses that I first heard a talk by Prof. Bhatia, and I was fascinated by his knowledge and his charismatic teaching. It was then that I decided to go to Queen Square to work with him.

While in Germany, Dr. Stamelou focused her research on clinical and therapeutic aspects of progressive supranuclear palsy. Now in London, she continues working on parkinsonism and dystonia.

Prof. Bhatia: My first impression when I interviewed Maria Stamelou for a clinical fellowship was that behind the pleasant shyness there was bright young woman with a quiet ambition to excel. During her fellowship it became clear that she was insightful as a clinical academic soaking up information and also exceptionally productive on the academic side with a spate of publications within the first six months itself. I am sure Maria will be one of the stars of this young generation of movement disorders neurologists. Outside work she is delightful company in the Friday pub evenings, laughing and recounting anecdotes but also will hold her own when discussions get a bit serious or philosophical and will argue her case with passion only Mediterranean's possess but also with the precision of a stereotactic surgeon using logic and knowledge as tools. Just don't get her started on the Greek economy!

Dr. Stamelou: If I should compare practicing in Greece, Germany and UK, I would say that this reflects the socioeconomic niveau of each country. Practicing in Greece is a challenge. I respect the Greek colleagues as they are called to do their job properly under very difficult circumstances, and they are trained to be excellent clinicians, as there are not frequently resources for sophisticated investigations available. In Germany, sophisticated investigations are available and used broadly for the benefit of the patients. The better words to characterize practicing medicine in Germany for me are consistency, reliability and reward of one's effort. In the UK, despite having sophisticated investigations, they use them only based on a well-defined clinical ground, and I am impressed by the way they are teaching young doctors.

Despite the difficult times that Greece has gone through, for me it is still the most beautiful place in the world. I would like to go back home, where my family and my friends are. And I would also like to have the chance to practice what I have learned in Germany and the UK, so that I may be of service to my country and to the patients in Greece.



Werner Poewe, MD

Chair, MDS-ES

The major themes for our recent activities have been our collaboration with the European Federation of Neurological Societies and our portfolio of educational projects, and there have been interesting developments on both fronts.

The Section was delighted that once again we attracted capacity audiences for our Basic Clinical and Advanced Movement Disorders Teaching Courses during the 2011 EFNS Congress in Budapest. Special thanks go to MDS member Dr. David Breen, who stepped in at short notice as a replacement speaker and gave a first class presentation on transplantation and stem cell research in Movement Disorders in our Main Topic session. Our European Basal Ganglia Club Invited Lecturer was Andrew Lees, who selected as his theme 'The Nosology of Parkinson's disease' – as usual, the hall was packed for this popular session, and there was much discussion in the video session that followed Andrew's superb lecture.

Myself, Olivier Rascol, Chair-Elect and Marie Vidailhet, Secretary of the European Section, met the leadership of the EFNS in Budapest in September to review the MDS-ES/EFNS collaboration as the EFNS and ENS are now set to merge into a single new society – the European Academy of Neurology - in 2015. It was made clear that the EFNS leaders continue to value our collaboration most highly, and the current agreement between EFNS and MDS-ES, which ends in December 2012, will be reviewed when plans for the first joint EFNS and ENS Congress in 2014 are finalized. It is hoped and anticipated that MDS-ES will be invited to organize the Movement Disorders program for the 2014 joint Congress, while collaborative activities with the European Academy will have to be defined once that new entity has been formally established.

Because the World Congress of Neurology will be held in Europe (Vienna) in 2013, the EFNS will not organize a separate congress in that year. This poses both challenges and new opportunities for the MDS-ES. The section leadership is going to put

special emphasis on broadening the scope of educational events in that particular year – possibly including new educational offerings in North Africa. A meeting was held in Marrakesh during the World Congress of Neurology, where Günther Deuschl, Olivier Rascol and myself met Movement Disorders specialists from North Africa to discuss potential collaborations and educational programming in that region.

Other educational highlights have been two Visiting Professor Programs, in Armenia, where we were represented by Niall Quinn and Giovanni Fabbrini, and in Georgia, where Eduardo Tolosa and Evžen Růžička were the MDS faculty members.

I greatly enjoyed serving as faculty for the MDS-ES Summer School for Young Neurologists organised in Naples in July by Paolo Barone and Alfredo Berardelli, which was an outstanding success. In view of the high demand for places for the annual Summer Schools the first Winter School was piloted in Innsbruck, 24-26th February, 2012. Demand has again outstripped supply, with a record of 128 applications being received for the 48 places. It is rewarding to see that the Section has identified such an important educational need in our region, and that the clinical management of Movement Disorders patients, and the understanding of our sub-specialty throughout the young neurologists' community, is being enhanced through this program.

European Section membership now stands at 1,387 members, and I extend a warm welcome the 359 new members who are included in this number.

Werner Poewe, MD
Chair, MDS-ES



Call to Host the MDS-ES Summer & Winter Schools

Since 2008, MDS-ES held an Annual Summer School for Young Neurologists, educating over 150 young neurologists in the diagnosis and treatment of movement disorders. To meet the increased number of applicants, we introduced an Annual Winter School for Young Neurologists on February 24-26, 2012 in Innsbruck, Austria. The next Summer School is scheduled for Paris, France, July 6-8, 2012.

MDS-ES now seeks potential hosts for future Summer and Winter Schools from 2013 onwards. A major attraction of the Schools is that students are given an opportunity to examine at least 12 different patients with a movement disorder, each under the supervision of an international movement disorders expert.

Essential Criteria

Due to the highly interactive nature of the Summer and Winter School programs, a number of important criteria need to be met by potential host centers.

1. The host institution must be able to provide 12 examination areas in close proximity to each other, to accommodate the easy rotation of 12 groups of 4 students between cases.
2. There must be sufficient local staff able to translate into English to assist in each examination room, or local patients who are able to speak English.
3. The institution should be able to recruit a wide range of patients with different movement disorders to attend to participate in the examinations.
4. There should be space to hold catered tea/coffee and lunch breaks for up to 100 people (faculty, students, staff, patients and caregivers).
5. A lecture theater should be available for 70 people for presentations and video sessions.
6. There should be easy access to an international airport.
7. Reasonably priced hotel accommodation (maximum EUR 80 per night) should be available for 70 people, in reasonable proximity to the host institution.

If your institution would be able to meet these criteria and you would like to be considered to host a future Summer or Winter School, please contact Catherine Breckenridge, cbreckenridge@movementdisorders.org, to register interest.

European Network for the Study of Dystonia Syndromes

—Prof. Alberto Albanese, Professor of Neurology at the Istituto Neurologico C. Besta, Milan, Italy

This European Action approved in 2011 by the European Cooperation in Science and Technology (COST) committee held its kick-off meeting in Brussels in November 2011. The main objective is to foster the creation of an interdisciplinary network of experts to promote genetic studies of dystonia syndromes, develop experimental animal models, standardize and harmonize patient care and educate the public and professionals about the disorder. It will create a unified platform for sharing expertise and exchanging procedures among centers in Europe. The Action will organize short-term scientific missions, training schools and workshops particularly dedicated to early-stage scientists and will facilitate the exchange of personnel among European centers. Further details can be found on the Action webpage at: www.cost.esf.org/domains_actions/bmbs/Actions/BM1101

The network, chaired by Alberto Albanese (Milan) and co-chaired by Marie Vidailhet (Paris), is currently funded for 4 years with an € 450,000 grant. There are four working groups setting the network priorities: genetics, animal models, clinical practices, e-infrastructure. Twenty European countries (including Israel) have already joined the network, which is open to the cooperation of any interested scientist from the participating countries. Scientists who wish to join are invited to contact the Action chair. The 2012 general meeting of the network is planned to take place in Dublin in conjunction with the MDS International Congress.

Visiting Professor Program – Yerevan, Armenia, September 16-17, 2011

—Visiting Professors: Niall Quinn and Giovanni Fabbrini

—Host: Armenian Movement Disorders Group

The *Movement Disorder Society's* Visiting Professor Program was conducted in Armenia for the second time, in September 2011. Considering the success of the previous program in 2008 and great positive feedback from participants, MDS was keen to sustain this valuable relationship. The program covered similar themes but was updated with new topics as proposed by the Armenian Movement Disorders Group (Dr. Zaruhi Tavadyan, President, and Dr. Samson Khachatryan, Chairman of the Local Organizing Committee) and approved by the MDS Education Committee. Yerevan municipality supported the activity by promoting the program and allowing out-patient clinic neurologists to participate in the meeting.

Expert Professors Niall Quinn and Giovanni Fabbrini were the MDS Visiting Professors. Comprehensive presentations on the treatment of Parkinson disease, differential diagnosis of parkinsonian syndromes and tremors, dystonias, tics, paroxysmal disorders in childhood, restless legs syndrome and others were delivered by the speakers. The course format, which consisted of a variety of different sessions including “live patient” case histories, didactic lecture, and interactive discussion, proved to be effective in achieving the educational goals. There were approximately 150 participants. Videos shown by the Visiting Professors were extremely good teaching tools and participants enjoyed the interactive way of learning - participating through their questions and comments.

Clinical case discussions opened new ways of thinking in the field of Movement Disorders. The neurologists had a chance to discuss complex cases and examine real patients with the respected Professors and receive their expert opinions and advice. A major highlight of the program was the inclusion of topics on pediatric movement disorders, generating a significant interest from pediatric neurologists on the second day of the program.

Following the program, the Visiting Professors were invited to take a guided tour of several important sites in Yerevan to briefly experience different aspects of Armenian culture and history.

The meeting was successful and productive on all counts and both the Visiting Professors and Hosts were appreciative of the collaboration.



Prof. Niall Quinn speaks at the 2011 VPP in Yerevan, Armenia



The Movement Disorder Society – European Section

8th Annual

EUROPEAN SUMMER SCHOOL FOR YOUNG NEUROLOGISTS

JULY 6-8, 2012 | PARIS

RECOMMENDED AUDIENCE

This course is recommended for young neurologists within five years of their completion of general neurological training who are interested in specializing in Movement Disorders and young neurologists who are already training in Movement Disorders.

CONTACT

If you have questions, do not hesitate to contact the MDS International Secretariat at:
education@movementdisorders.org
 Phone: +1 (414) 276-2145

APPLICATION

Applications are due by April 16, 2012. Apply online by visiting www.movementdisorders.org/education. Upon acceptance applicants will need to register for the course.



APPLICATION DEADLINE
APRIL 16 2012

REGISTRATION FEES:

€150 EUR for MDS Junior Members and Waived Dues Members

€200 EUR for MDS Non-Members

The Summer School registration fee includes accommodation for the nights of July 5, 6 and 7, as well as meals onsite. Additionally, non-members will receive one year of MDS Junior Membership.

A limited number of bursaries are available for applicants residing in Eastern Europe, North Africa and the Middle East.

Diagnosis and treatment of dystonia syndromes – Milan, Italy, September 22-23, 2011

—Prof. Alberto Albanese, Professor of Neurology at the Istituto Neurologico C. Besta, Milan, Italy

On September 22-23, 2011, a total of 60 neurologists from 17 countries in Europe, the Middle East and Asia gathered at the Università Cattolica del Sacre Cuore in Milan, Italy, to attend the first course on dystonia syndromes hosted by the European Section of The *Movement Disorder Society*.

The primary goal of the course was to enhance the skills of participants in the identification of the different presentations of dystonia syndromes, and in the diagnostic and therapeutic management of dystonia patients.

The first day of the course was devoted to phenomenology and diagnosis of dystonia syndromes, with a review of primary and secondary forms, classification and diagnostic procedures. At the end of the day, two hours were devoted to video case demonstrations highlighting diagnostic and classification issues.

The second day was dedicated to treatment of dystonia syndromes: medications, including oral drugs and focal injections of botulinum toxins, surgical treatments and comprehensive patient management. At the end of the day case demonstrations illustrated clinical issues and outcomes of medical and surgical procedures.

MDS would like to thank Allergan, Ipsen, Merz, Medtronic Inc., and the Neureca Foundation for their support of this course.



Pictured (left to right), Dr. Susanne Schneider, Prof. Alberto Albanese, Prof. Joaquim Ferreira, and Prof. Marie Vidailhet and course participants.



MDS Visiting Professor Program – Tbilisi, Georgia, October 14-15, 2011

—Irine Khatiaashvili and Marika Megrelishvili, Georgian Society for Parkinsonism and Movement Disorders and S. Khechinashvili University Clinic

The *Movement Disorder Society* Visiting Professor Program was held on October 14-15, 2011 in Tbilisi, Georgia. The local organizer was the Georgian Society for Parkinsonism and Movement Disorders headed by Irine Khatiaashvili and Marika Megrelishvili. The invited MDS Professors were Prof. Eduardo Tolosa (Spain) and Prof. Evžen Růžička (Czech Republic). The objectives of the course were to discuss the etiology, pathogenesis and epidemiology of Parkinson's disease; the diagnosis and differential diagnosis of Parkinson's disease and atypical parkinsonian disorders; the symptomatic treatment of early and late stages and disease-modifying strategies of Parkinson's Disease; the phenomenology, classification, etiology and treatment of tremors; and the neurophysiology, biomechanics, clinical assessment and differential diagnostics of balance and gait disorders.

There were more than 80 participants: neurologists in training, medical students whose interest is neurology, neurologists from hospitals, outpatient departments, and specialists from the Neurological Department of Tbilisi State Medical University and Javakhishvili Tbilisi State University Department of Medicine. This course was designed with lectures and video sessions, and was given in a practical and interactive way, full of clinical examples and discussions on how to examine patients and review symptoms. The participants had the opportunity to listen to the opinions of invited professors on video cases presented by local faculty as well as participate actively in discussion. Simultaneous translation was provided.

The feedback from participants was excellent. They found the course very interesting, exciting and helpful for their clinical practice, which was particularly important for neurologists in training who are currently deciding if they will specialize in neurology.



Visiting Professor Program Organizers, Faculty and Participants

The Georgian Society for Parkinsonism and Movement Disorders was pleased to invite Prof. Tolosa and Prof. Růžička to the Khechinashvili University Clinic where they examined selected patients and provided important advice.

Profs. Tolosa and Růžička would like to thank the organizers for their generous hospitality and congratulate them on a very successful educational activity that furthered scientific exchange and lasting attachment. The Georgian Society for Parkinsonism and Movement Disorders would like to thank the MDS European Section for organizing this very interesting and helpful course and express hope for further collaboration.

Bringing Multiple System Atrophy (MSA) to the top of the research agenda: The first UK MSA Researchers' Meeting

—Clare Fowler, FRCP, Professor of Uro-Neurology, Institute of Neurology, Queen Square London, UK

Multiple system atrophy (MSA) is a sporadic and rapidly progressive neurodegenerative disorder that presents with parkinsonism or cerebellar ataxia, accompanied by symptoms of autonomic failure, uro-genital dysfunction in particular. At present, there are no effective treatments for this progressively disabling and fatal condition.

Although many people in the Movement Disorders community do have an interest in MSA, it is studied less than other illnesses. To raise awareness of MSA and discuss how to give further momentum to ongoing research, a group of UK researchers and invited international speakers met for the first time on November 4, 2011, at the Institute of Neurology, Queen Square, London. The meeting was funded by an unrestricted educational grant from Teva Pharmaceuticals and endorsed by the UK patient charity, the MSA Trust.

Over the course of the day's meeting, a number of research presentations were given – showcasing the ongoing work in neuropathology, genetics, pre-clinical (animal model), and clinical MSA research. Collectively, the presentations highlighted how far MSA research has already come in recent few years. For

example, the field now has collective trial experience, specific diagnostic criteria, a disease-specific outcome measure, and – very importantly – an interesting pipeline of potential agents currently in preclinical research. Another recurring theme in all of the presentations was the need for collaborative research, both nationally and internationally. In particular, Professors John Hardy and Henry Houlden (both from Queen Square) issued an urgent call for more genetics research into MSA. MSA has been classically perceived as a non-genetic disorder, but during the last decade, several studies have implicated variants in the SNCA locus as a risk factor in the pathogenesis of MSA. By working with international Brain Banks, an ongoing genome wide association study (GWAS) has been able to show that common variants in SNCA are not associated with MSA. Although the GWAS has found other potential hits, these need to be verified in a bigger sample size.

The key aim of the meeting was to provide momentum to ongoing UK MSA research by encouraging networking between the many researchers interested in MSA. Although a number of distinguished medical luminaries were at the meeting, including Sir Roger Bannister, it was also well attended by post-doctoral researchers and some PhD students. This meeting gave them the vital opportunity to present, interact and learn from 'old hands' in research. In addition, many of the Trustees of the MSA Trust were also at the meeting and gained useful insight into the direction of current research. Information about research activity into MSA will be reported back to patients and their caregivers, and hopefully it will be of some interest and comfort to them.

All delegates left the meeting with constructive comments and feedback on their ongoing research, as well as new research contacts. One direct result of the meeting was the generous offer of new samples from France for the GWAS, although more samples with a pathological diagnosis of MSA are still required. Another need was also identified, to establish a UK MSA registry, and discussions about this are now on-going. The second UK MSA researchers' meeting is now being planned for 2012.



From left to right: Prof. Clare Fowler, Prof. Gregor Wenning, Valentine Fleming Esq (MSA trust), Sir Roger Bannister, Lady Eileen Strathnaver OBE (MSA trust)



Ruey-Meei (Robin) Wu, MD, PhD
Chair, MDS-AOS

Dear Colleagues,

Greetings! I am pleased to report on our regional activities that have taken place in the past few months and our plan going forward in 2012.

A Visiting Professor Program was successfully organized by Dr. Sunethra Senanayake during the *First Annual Scientific Conference on Movement Disorders* in Sri Lanka, December 2-4, 2011. Prof. David Williams (Australia) and Dr. Shen-Yang Lim (Malaysia) were invited to conduct lectures during the meeting for approximately 150 participants. A Botulinum Toxin Training Course has been approved to be held in the Philippines under the direction of Dr. Raymond Rosales on August 24-25, 2012. Basic Movement Disorder Course series and Developing World Education Course series are in the planning stages for Thailand and India respectively in 2012. To increase the number of responses to the educational needs surveys we have translated the survey into Chinese (both traditional and simple) to post on the website and to hand out during future AOS courses. We are looking forward to more educational courses developing this year.

As you may know, one of the objects of our Section is to facilitate the training of movement disorders specialists in our region. Keeping this goal in mind, we have developed an AOS Traveling Fellowship Program. This program will be used to fund one traveling fellowship in the Asian and Oceanian Section per year. The proposal was announced on the website and we opened applications starting in January. The final application deadline will be in April. We hope this Traveling Fellowship Program will improve the quality of care at the home institution of the applicant and establish research links between AOS member sites.

Another ongoing objective of the AOS is to further develop the Section website to serve as a resource for members, providing information about educational exchange programs, clinical services, relevant expertise and research endeavors being undertaken at various sites within the AOS. I would like to thank Dr. Victor Fung, the Chief-Editor of the AOS website and AOS E-newsletter and Dr. Roongroj Bhidayasiri as the Co-Editor. AOS Members are encouraged to submit articles to the AOS website to share their experiences and opinions on how to promote movement disorders education in their countries.

Finally, a priority of the AOS Executive Committee is to encourage regional and national societies to become Affiliate Members of MDS and to increase the number of movement disorder societies in our regions. Currently there are six AOS MDS Affiliate Member Societies: the Hong Kong Movement Disorder Society; the Movement Disorder Society of Australia; the Movement Disorder Society of Japan; the Movement Disorder Society of the Philippines (MDSP); the Korean Movement Disorder Society; The Taiwan Movement Disorder Society; and the newest member, The Malaysian Movement Disorder Society. With the help of our Affiliate Member Societies, we are expecting a significant increase in Waived Dues membership in AOS developing countries in 2012.

Wishing you a healthy, happy and fruitful New Year!

Best Regards,

Ruey-Meei (Robin) Wu, MD, PhD
 Chair, MDS-AOS

Visiting Professor Program – Colombo, Sri Lanka, December 2, 2011

—Darshana Sirisena, MD Teaching Hospital Anuradhapura, Colombo, Sri Lanka

The VPP jointly organized by the Association of Sri Lankan Neurologists (ASN) and the MDS Asian & Oceanian Section was held on December 2, 2011 in Combo, Sri Lanka. This was organized as a pre-congress session of the 5th Annual Scientific Sessions of the ASN.

Two eminent movement disorder specialists from the region, Prof. David Williams from Melbourne, Australia and Dr. Shen-Yang Lim from Malaysia conducted the sessions together with a few other Sri Lankan Neurologists. The program was aimed at understanding the basic fundamentals in movement disorders.

The day's proceedings started with the lighting of the traditional oil lamp and the national anthem of Sri Lanka. ASN President welcomed the foreign delegates, thanked MDS for their support and hoped for a long term productive relationship with MDS in the future. Dr. Tissa Wijerathna, a Sri Lankan born neurologist from Melbourne, outlined the program in his introductory speech and introduced MDS noting how members could benefit from MDS through the Waived Dues membership, especially designed for countries like Sri Lanka.

The course material was discussed in depth with lectures and interactive video sessions from both the foreign and local experts. This was a novel and interesting experience to the audience as this was the first time such a program was conducted in the region. The program was well attended by 126 participants comprising of neurologists, post graduate trainees in neurology, internal medicine specialists and pediatricians.



Starting out the day with the lighting of the traditional oil lamp

A post-program evaluation was conducted for each topic and for the program as a whole. Results indicated positive learning with 76% of participants highly satisfied with the overall course content, and 83% agreeing that the program helped them to improve their knowledge about movement disorders. 100% were in favor of having similar programs conducted in the future.

There are several other positive outcomes from this VPP such as a substantial increase in Sri Lankan membership in MDS and more importantly a proposal that there be a Sri Lankan Movement Disorder Society in the near future that would work towards becoming an MDS Affiliate member. This Visiting Professor Program in Colombo fulfilled the intent of MDS by making a significant impact in a country that is underrepresented in the society and initiating a link between local specialists and international movement disorder specialists. Ultimately, this program helped to improve the quality of care to patients living with movement disorders who lack the resources of their counterparts in the developed world.



Visiting Professors, Dr. Shen-Yang Lim and Prof. David Williams with Course Directors



Botulinum Toxin Training Course MANILA, PHILIPPINES August 24-25, 2012



The Movement Disorder Society
Asian & Oceanian Section

COURSE DESCRIPTION

Despite increasingly widespread use of botulinum toxin (BoNT) for neurological rehabilitation and other disorders, there is rarely a recognized or regularly available training scheme on this topic in the Asian and Oceanian region. This two day workshop is intended to address this practice gap through didactic lectures from international experts, interactive case discussions, and a patient practicum.

LEARNING OBJECTIVES

At the conclusion of this activity, you should be able to accomplish the following:

- Explain how BoNT works in relation to movement disorders.
- Describe the BoNT therapy approaches in specific disorders such as dystonia and spasticity in adults and children.
- Describe the techniques of BoNT muscle injections from clinical localization to use of EMG and ultrasound.
- Identify the potential adverse events of BoNT following injections of specific body regions or during multi-level injections.
- Describe a treatment plan that incorporates medical-surgical therapies and chemodenervation for various movement disorders, including advantages of a multi-disciplinary team.

AUDIENCE

Medical practitioners in relevant fields with a working knowledge of the diagnosis and general management of various movement disorders.

REGISTRATION

MDS Member - \$50.00 USD
Non-Member - \$60.00 USD
Junior Members/Residents/Fellows/Waived Dues** - \$30.00 USD

*Registration rates include all sessions, course materials, lunch and breaks. For reference, registration fees are listed in US dollars. Conversion rates may be found at <http://www.xe.com/>.

**Applies to MDS Junior and Waived Dues Members, Residents, Fellows, and those training in healthcare or scientific research.

Visit www.movementdisorders.org/education or contact the MDS International Secretariat for more information or to register.
MDS International Secretariat education@movementdisorders.org +1 (414) 276-2145

MDS Case of the Month - Calling all Regional Section Cases!

—Hubert Fernandez, MD, Cleveland Clinic, Cleveland, Ohio USA, Web Editorial Board Medical Co-Editor

—Marcelo Merello, MD, PhD, FLENI, Buenos Aires, Argentina, Web Editorial Board Medical Co-Editor

As you may know, one of the Society's most popular features is the **Case of the Month**. This interactive educational tool, which first launched in 2008 on the MDS homepage, allows members to view an interesting patient video and answer questions about the educational case following a self-guided format.

Most of the cases featured thus far have come from North America. To reflect the global nature of our Society and to further strengthen our efforts to provide diverse educational materials relevant to our international membership, we are requesting your help in broadening the scope of this feature.

We would like you to ask your colleagues from the following regions - Pan American, Asian and Oceanian and European - to submit an interesting or challenging video case for possible publication on the MDS website. We encourage

submissions of video cases with interesting, unusual or educational phenomenology.

Your regional leadership will select the 2 best cases to represent your part of the world, which will also be published as a **Case of the Month** at the MDS website. The ultimate winner will be selected by the Web Editorial Board, and will be announced at the 16th International Congress in Dublin, Ireland in June 2012. The winner will receive an Amazon gift card, along with recognition from his or her peers and an announcement on the MDS website and in *Moving Along*. Simply visit www.movementdisorders.org to learn how to submit your case and video!

We hope you will consider our invitation to share your important work with the Society.





Jorge L. Juncos, MD

Chair, MDS-PAS Organizing Committee

The MDS Pan American Section (PAS) continues to meet the challenges and educational needs of our vast and diverse region. These challenges include distance, language and cultural variations and differences in how email, the Internet and social media tools like podcasts, Facebook and Twitter have penetrated the life of individuals, practices and associations. The PAS is trying to meet this challenge by making these tools more accessible and relevant to its membership. In Dublin, we are planning to update you on this progress and on the new educational tools that the Web Editors will have made available.

Through the Ambassador Program, the PAS supported a number of educational activities in 2011. Among these is the comprehensive symposium on movement disorders offered in Puebla, Mexico led by Dr. Guillermo Enriquez-Coronel (March). This annual activity has been enriched by the participation of outstanding regional and international faculty for several years. In 2011, the MDS-PAS was also able to support the participation of two Ambassadors during the *7th Brazilian Movement Disorders Meeting* in Minas Gerais, Brazil (August), hosted by Prof. Francisco Cardoso and one MDS Ambassador for the *International Symposium of Movement Disorders*, sponsored by the Society for Neurological Sciences of El Salvador and hosted by Dr. Ricardo Lopez-Contreras. All activities were well attended and, based on participant feedback, were timely and well received.

Beyond this, the PAS Education Committee organized several other courses. In November, the course *Surgical Management of Movement Disorders: DBS and Beyond* was held in Buenos Aires, Argentina, directed by Dr. Marcelo Merello. The course featured strong regional and international faculty. Registration filled up quickly with over 80 participants. Based on the positive feedback, we expect to offer it again in the future.

In October, we hosted the *Pan American School for Young Neurologists*. The three day course was held in São Paulo, Brazil under the direction of Prof. Francisco Cardoso and Dr. Carlos Rieder. This course was made possible by the contributions from movement disorder experts at the Universidade de São Paulo (USP), Universidade Federale de São Paulo (UNIFESP), and international faculty from Argentina, Colombia and the US. We would like to specially acknowledge the staff of both medical centers for their contributions, as well as their patients for sharing their time. As mentioned in the previous newsletter, the "School for Young Neurologists concept" was developed by members of the MDS European Section, but was skillfully adapted to accommodate the strengths of the

movement disorders specialty in Brazil. As a member of the faculty, I can report that the success of the activity was due to the careful orchestration of excellent faculty, the facilities, and the availability of a very large base of patients willing to help. Students had the opportunity to examine many patients with a wide array of signs and symptoms and were able to showcase personal cases using video and slide presentations. The latter learning experience was particularly valuable to all, including the faculty. Ample opportunity for interaction and socialization was provided during breaks and at dinner. The success of this program has led to the development of a similar program to be led by Dr. Pedro Chana-Cuevas in Santiago, Chile this December.

Also held this year was a highly successful US course series entitled "*Dopamine Transporter Imaging in Neurological Practice*." Three courses were organized from July through December in New Haven, CT (Course directors: Dr. Ken Marek, John Seibyl); Chicago, IL (Course director: Dr. Tanya Simuni); and Houston, TX (Course director: Dr. Joseph Jankovic). In March, the final course of this series will be offered in Santa Clara, CA directed by Dr. Caroline Tanner.

We would also like to highlight the following activity, *Update on the Pathogenesis and Treatment of Parkinson's Disease and Related Disorders*, held on March 4, 2012 in La Paz, Bolivia under the direction of Dr. Janeth Laguna. Note that this date coincided with the start of the week long *Pan American Congress of Neurology* sponsored by the World Federation of Neurology. We encouraged all participants attending the Pan American Congress to also take advantage of this carefully planned MDS course. MDS faculty participated in both activities, but there was no overlap in the topics covered at each meeting (see program at www.movementdisorders.org/education/update_on_pd/la_paz/).

In addition to excellent course directors, it is important to recognize that the above activities were made possible by virtue of the excellent support they receive from Danielle McLean and the rest of the MDS staff. Finally, we hope to see as many of you as possible this summer in Dublin, Ireland for the 16th International Congress of Parkinson Disease and Movement Disorders. The date for the PAS General Assembly will be made available prior to the meeting, but key on the agenda will be the 2013 PAS electoral process. We look forward to seeing you there!

Jorge L. Juncos, MD
Chair, PAS Organizing Committee

Pan American School for Young Neurologists – São Paulo, Brazil, October 28-30, 2011

The Pan American School for Young Neurologists was held in São Paulo, Brazil from October 28-30, 2011. Thirty student delegates from Brazil and nine others from across South America participated in the program which was modeled on the MDS-European Section's Summer School for Young Neurologists. The program was directed by Francisco Cardoso (Belo Horizonte, Brazil) and Carlos Rieder (Porto Alegre, Brazil). Another 10 faculty members agreed to deliver lectures (in Portuguese, English and Spanish) and run patient examination sessions throughout the program; Egberto Barbosa (São Paulo University), Orlando Barsottini (Federal University of São Paulo), Vanderci Borges (Federal University of São Paulo), William Fernandez (National University of Colombia), Henrique Ferraz (Federal University of São Paulo), Emilia Gatto (Sanatorio Trinidad Mitre), Monica Santoro Haddad (University of São Paulo), Jorge L. Juncos (Emory University), João Carlos Papaterra Limongi (University of São Paulo) and Helio Teive (Federal University of Parana).

The first day of the program focused on hypokinetic disturbances and the second day, on hyperkinetic disturbances, both in the morning plenary lecture sessions and in the afternoon patient examination sessions. The patients for the afternoon case studies were selected from São Paulo University and the Federal University of São Paulo, where the examinations were held. Fellows from these two facilities aided the patients throughout the examinations and provided clinical case-study information for the students each day. Students prepared PowerPoint presentations of case studies and videos which they presented in small groups during the second day of the program. These presentations were meant to encourage discussion of various movement



Prof. Francisco Cardoso and students from the Pan American School for Young Neurologists

disorders the participants encounter in their own clinics and to receive an expert opinion of their case from the course faculty.

The second day ended with a dinner sponsored by Roche, during which participants were encouraged to network with the faculty and their fellow colleagues. The Pan American School for Young Neurologists concluded the following day with lectures on patient investigation and management issues and a panel discussion.

Overwhelmingly positive feedback was given by students and faculty alike. Thank you to all for making the Pan American School for Young Neurologists such a success! MDS-PAS would also like to thank Roche for their generous support of this course.



Pictured (left to right), Dr. Carlos Rieder, Dr. Vanderci Borges, Dr. Helio Teive, Dr. Henrique Ferraz, Dr. João Carlos Papaterra Limongi, Prof. Francisco Cardoso, Dr. Orlando Barsottini, Dr. Monica Haddad, Dr. William Fernandez, Dr. Jorge Juncos

Surgical Management of Movement Disorders – DBS and Beyond – Buenos Aires, Argentina, November 4-5, 2011

On November 4-5, 2011, the first MDS-sponsored course in Argentina took place at the Raul Carrea Institute for Neurological Research (FLENI) in Buenos Aires. The course, *Surgical Management of Movement Disorders: DBS and Beyond*, was directed by Dr. Marcelo Merello (Buenos Aires, Argentina) and was attended by over 80 participants from across the Pan American Section.

Joining Dr. Merello as faculty were Ron Alterman (New York, NY, United States), Francisco Cardoso (Belo Horizonte, Brazil), Robert Gross (Atlanta, GA, United States), Elena Moro (Toronto, ON, Canada), Jerrold Vitek (Minneapolis, MN, United States) and Jens Volkmann (Wuerzburg, Germany).

This one and a half day course focused on addressing the surgical treatment of Parkinson's disease and dystonia while also examining clear guidelines for patient selection, and outlining the process of establishing a surgical center. The six international faculty members delivered lectures on a range of topics including "Ablative Therapies," "Programming the DBS," and "Avoiding Motor Complications". These lectures were given in English and simultaneously translated into Spanish for participants. The



faculty also conducted two panel discussions regarding remote referral programming and surgical centers. With this, the course concluded as participants had the opportunity to ask questions about surgical centers in their own clinics and regions.

A special thanks to all faculty, the MDS Secretariat and Medtronic for their contributions to this course.

The Movement Disorder Society Task Force on Neurosurgery (Presently the Neurosurgery Special Interest Group)

—Joachim K. Krauss, MD, Professor of Neurosurgery, Medical University, MHH, Hannover, Germany; Past-Chair, MDS Neurosurgery Task Force

The Task Force on Neurosurgery was founded on June 16, 2004, during The Movement Disorder Society Congress in Rome, Italy, upon the initiative of Professors Andres Lozano and Alim Benabid. The initial driving force was to provide a way for more visibility and presentation of neurosurgeons within The Movement Disorder Society. Founding members were: Andres Lozano, Keyoumars Ashkan, Alim Louis Benabid, Michael Dogali, Kelly Foote, Marwan Hariz, Zvi Israel, Joachim K. Krauss, Steve Papavassiliou, and Hiroki Toda. The Task Force on Neurosurgery was chaired by Andres Lozano from 2004 – 2007. One of the milestones during that period was to have a neurosurgical representative on the Congress Scientific Program Committee.

From 2007 – 2011, the Task Force on Neurosurgery was chaired by Joachim K. Krauss. The group became larger, and met regularly during

the annual MDS Congresses. Also, neurologists with a special interest in surgery of movement disorders joined the group including Marcello Merello and Leo Verhagen. The group provided continuous input to the Congress Scientific Program Committee to develop sessions concentrating on neurosurgical topics. In addition, a brief history of functional neurosurgery was developed for The Movement Disorder Society website with eminent input from Drs. Sillay, Foote and Hariz. Another project was the initiation of a rating scale of complications in DBS surgery.

The Task Force on Neurosurgery was transformed by the President of The Movement Disorder Society in June, 2011, into its present format, the Neurosurgery Special Interest group, chaired by Phillip Starr.

History of Neurosurgery with Movement Disorders continued from cover

Horsley.⁶ Spiegel and Wycis used electrical stimulation in stereotactic procedures in the 1940's, however it was Hassler who first suggested the possibility of long term effects of stimulation.⁷

Permanent Stimulator Implants for Movement Disorders

In 1980 the term permanently implanted thalamic Deep Brain Stimulators (DBS) were reported by Cooper,⁸ Brice and McLellan's,⁹ and Benabid's groups.¹⁰ Next DBS of the pallidum was described by Siegfried and Lippitz¹¹ and STN DBS was reported.¹² Dystonia was treated beginning in the 1990's with pallidal stimulation in both cervical dystonia¹³ and generalized dystonia.^{14, 15} The Food and Drug Administration (FDA) in the United States approved thalamic DBS for Essential tremor, STN and pallidal DBS for Parkinson's Disease, and pallidal DBS for Dystonia 1997, 2002, and 2003 respectively.

Alternative Technical Approaches

New technologies in DBS placement include frameless neuronavigation,¹⁶ presurgical fabrication of an insertion platform designed to aim to the desired target, customized to the individual patients' anatomy (STarFix, FHC, Bowdoin, ME),¹⁷ and placement of

the lead using real-time high-field interventional MRI. The frameless neuronavigation and STarFix approaches allow the stereotactic imaging to be performed days before the surgery, which may improve efficiency on the day of surgery. Both require the implantation of bone-mounted fiducial markers. Pilot studies investigating the interventional MRI approach have been especially useful for patients unable to tolerate awake surgery for the DBS case.¹⁸

References

1. Stillings, D., *The first use of electricity for pain treatment* M.A.O. Electro-Stimulation, Editor. 1971.
2. Isaacson, W., *Benjamin Franklin. An American life*. 2003 New York: Simon and Schuster.
3. Pruel, M.C., A history of neuroscience from Galen to Gall, in A history of neurosurgery, D. Greenblatt S. H., T. F., Epstein, M. H., Editor. 1997, American Association of Neurological Surgeons: Park Ridge. p. 99-130.
4. Fritsch, G. and E. Hitzig, *Ueber die elektrische Erregbarkeit des Grosshims*. Arch. Anat. Physiol. Wiss. Med, 1870. 37: p. 300-332.
5. Morgan, J.P., *The first reported case of electrical stimulation of the human brain*. J Hist Med Allied Sci, 1982. 37(1): p. 51-64.
6. Vilensky, J.A. and S. Gilman, *Horsley was the first to use electrical stimulation of the human cerebral cortex intraoperatively*. Surg Neurol, 2002. 58(6): p. 425-6.
7. Hassler, R., et al., *Physiological observations in stereotaxic operations in extrapyramidal motor disturbances*. Brain, 1960. 83: p. 337-50.
8. Cooper, I.S., A.R. Upton, and I. Amin, *Reversibility of chronic neurologic deficits. Some effects of electrical stimulation of the thalamus and internal capsule in man*. Appl Neurophysiol, 1980. 43(3-5): p. 244-58.
9. Brice, J. and L. McLellan, *Suppression of intention tremor by contingent deep-brain stimulation*. Lancet, 1980. 1(8180): p. 1221-2.
10. Benabid, A.L., et al., *Long-term suppression of tremor by chronic stimulation of the ventral intermediate thalamic nucleus*. Lancet, 1991. 337(8738): p. 403-6.
11. Siegfried, J. and B. Lippitz, *Chronic electrical stimulation of the VL-VPL complex and of the pallidum in the treatment of movement disorders: personal experience since 1982*. Stereotact Funct Neurosurg, 1994. 62(1-4): p. 71-5.
12. Benabid, A.L., et al., *Acute and long-term effects of subthalamic nucleus stimulation in Parkinson's disease*. Stereotact Funct Neurosurg, 1994. 62(1-4): p. 76-84.
13. Krauss, J.K., et al., *Bilateral stimulation of globus pallidus internus for treatment of cervical dystonia*. Lancet, 1999. 354(9181): p. 837-8.
14. Coubes, P., et al., *Treatment of DYT1-generalised dystonia by stimulation of the internal globus pallidus*. Lancet, 2000. 355(9222): p. 2220-1.
15. Kumar, R., et al., *Globus pallidus deep brain stimulation for generalized dystonia: clinical and PET investigation*. Neurology, 1999. 53(4): p. 871-4.
16. Holloway, K.L., et al., *Frameless stereotaxy using bone fiducial markers for deep brain stimulation*. J Neurosurg, 2005. 103(3): p. 404-13.
17. Fitzpatrick, J.M., et al., *Accuracy of customized miniature stereotactic platforms*. Stereotact Funct Neurosurg, 2005. 83(1): p. 25-31.
18. Martin, A.J., et al., *Placement of deep brain stimulator electrodes using real-time high-field interventional magnetic resonance imaging*. Magn Reson Med, 2005. 54(5): p. 1107-14.

The entire History of Neurosurgery with Movement Disorders was published on the MDS website in 2011 and adapted for publication in this issue of Moving Along. To read the complete History of Neurosurgery with Movement Disorders, including a timeline of neurosurgical treatments and biographies of pioneer neurosurgeons, please visit the MDS website at: <http://www.movementdisorders.org/about/neurosurgery/>

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SAVE THE DATE

Early registration deadline: April 20, 2012

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16th International Congress
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