

WORLD NEUROLOGY

The Newsletter of the World Federation of Neurology

VOLUME 22, NUMBER 2, JUNE 2007



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Tentative Topics

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Controversies in Neurology
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Emergency/Critical care in Neurology
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History in Neurology
Innovations in Neurology

Interventions in Neurology
Mitochondrial medicine
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Neuroimaging
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Neurological consequences of blast injuries
Neurological disorders associated with pregnancy
Neurology resources
Neuronal Stem Cells
Neuro-oncology
Neuro-ophthalmology/Neuro-otology
Neuropharmacology/Pharmacogenetics

Neurorehabilitation
Neurosonology
Neurovirology
Tropical Neurology/ CNS Infection

ALSO IN THIS ISSUE:

- Editorial
- President's Column
- WFN Nigeria Education Programme
- Synopsis of WFN Africa Meeting
- Minutes of JNS Editorial Board Meeting
- Summary of Articles published in JNS
- Report on WFN-IBRO Sponsored Symposium
- Review of Special Issue of Journal of History of Neurosciences
- Calendar

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CONTENTS

19th World Congress of Neurology: Tentative Topics	1
Editorial	3
WFN Nigeria Education Programme	3
President's Column	4
Synopsis of Africa Meeting, London	5
JNS Editorial Board Meeting	8
Pictures of WFN Boston Meetings	10
Summary of Articles Published in JNS	11
WFN-IBRO Sponsored Symposium on 'Brain Ageing and Dementia in Developing Countries'—A Report	12
Journal of History of Neurosciences: Review of Special Issue	13
Calendar	14
Elsevier Advertisement	15-16

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EDITORIAL

The countdown for the 19th World Congress of Neurology in Bangkok, Thailand has started and the salient features of the First Announcement are printed in this issue. This is the Mega Event of WFN and you are requested to block these days in your personal diary. It is most likely that an academic programme to everybody's liking and interest will be included in the Scientific Programme, quite apart from the scenic beauty and places of tourist interest in this city and country.

This is the year of the Golden Jubilee of

WFN which was founded in Brussels in 1957 during the First International Congress of the Neurological Sciences in the same city. WFN is celebrating its 50 years at Brussels this year by organising a special Symposium during the Annual Conference of the European Federation of Neurological Societies (EFNS). Please come to Brussels in August to celebrate this unique event.

The WFN is taking a special interest in Africa where only half of the nations have their own neurological associations and many are without a single neuro-



logist. There has been much discussion regarding the WFN approach to training neurologists in African countries. It is advisable that neurological training be either in the particular country itself or in those Regional Neurological Centres in Africa which are well developed in the neurosciences. Such a process will stem the Brain Drain of trained neurologists to the well developed Western Countries which needs to be discouraged.

Readers of this issue of *World Neurology* may have noticed that it has a slightly new look. There is some change in the layout settings for easier reading with a more legible font and improved spacing. I shall be grateful for the feedback on this minor change.

Jagjit S. Chopra
Editor-in-Chief



Africa Project Meeting held on 01.05.2007 at Boston

WFN Nigeria Education Programme



Dr. Mrs Oluchi Ekenze collecting her CME certificate from Dr. Mrs Esther Ofoegbu who is Head of the Department of Medicine UNTH Enugu. The Nigeria Country Coordinator Dr Ikenna Onwuekwe is on the right of the picture

Report on the Presentation

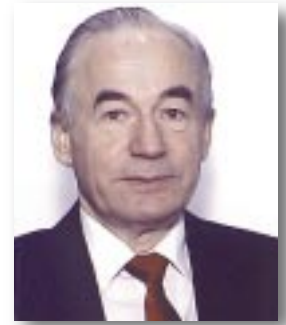
The certificates were presented during a conference of the Department of Medicine of the University of Nigeria Teaching Hospital (UNTH) Enugu, Nigeria on Tuesday 24 April 2007 by the Head of Department Dr. Mrs Esther Ofoegbu.

Three of the awardees received their certificates personally (Drs Ezeala-Adikaibe, Ekenze and Anyanwu). Dr. Emeka Anidi's certificate was collected on his behalf by a colleague. Unfortunately Dr. Anyanwu's picture did not turn out well enough to be published.

The Nigeria CME Country Coordinator Dr Ikenna Onwuekwe was present at the presentation.

PRESIDENT'S COLUMN

World Federation of Neurology 50 years: Heritage shapes the future



Neurology was a major topic at the 17th World Congress of Medicine, which was held in London in August 1913. Joseph Babinski lectured about cerebellar symptoms, Gordon Holmes on thalamic symptoms, Jules Dejerine on motor aphasia and Herrmann Oppenheim on myopathic disorders. But the London Congress of Medicine became the last of its kind. From then on, the international congresses became more specialized.

One international congress of Psychiatry, Neurology and Psychology had already been organised, in Amsterdam 1907. The second was held in Bern in 1931, the next in London 1935, Copenhagen 1939, Paris 1949 and in Lisbon in 1953 (1). The First International Congress of the



Some eminent Neurologists at the First International Congress of Neurological Sciences

Neurological Sciences was held in Brussels in 1957, and it was during that congress that the World Federation of Neurology was founded (1,2).

The Brussels congress was a joint meeting for neurology, neurosurgery, and neuroradiology and of the International League against Epilepsy. An invitation had been sent in advance to neurological societies throughout the world to send a delegate to an organisational meeting to be held during the congress. At that meeting, the World Federation of Neurology was formed. Ludo van

Bogaert was elected the first President, but Houston Merritt and Pearce Bailey were important powers behind the establishment of the World Federation of Neurology. A grant of US\$ 126,190 annually for five years from NIH was essential in order to get the organisation started.

The history of the World Federation of Neurology has been described in recent publications (2, 3), and will not be repeated here. Instead, I will try to delineate how the social and scientific development over the last 50 years has influenced its evolution. The winds of change have also swept over neurology. The World Federation of Neurology was created to develop international and interdisciplinary research projects in the neurosciences. Neurological research has now become international, and a global network exists between universities and research institutions. One important mission of the World Federation of Neurology is to implement international congresses of neurology. The quadrennial meetings of the World Congresses of Neurology now serve as the most effective venue for presenting scientific achievements and interacting with delegates of varied backgrounds and perspectives.

Regional neurological organisations have been established, most of them with a well developed infrastructure, with annual meetings allowing for strong personal and scientific ties across boundaries. They now have the opportunity to collaborate with the regional and national levels of WHO to ensure implementation of "health-for-all" strategies at their level. Each professional neurological association may initiate and assist in the identification of

areas where there exists a need for campaigns aimed at the prevention of neurological disease.

The prime intention behind organising an international federation of the national neurological associations was not only to promote international collaboration in research, but also to promote standards of neurological care in developing countries, enabling neurologists in developed countries to assist their colleagues in places with fewer resources to promote high standards of neurological care and to develop improved services (2).

The main conclusion from the Neurology Atlas, published by the World Health Organization (WHO) and the World Federation of Neurology in 2005, is that the available resources for neurological disorders in most countries of the world are insufficient compared with the known significant burden associated with these disorders, and that the situation is worst for Africa. Only half of the responding countries in Africa have a national neurological association and some of them do not have a single neurologist. To the World Federation of Neurology, the development of neurology in Africa is therefore a leading vision. The national health authorities in each country correspond with WHO, not with World Federation of Neurology. The World Federation of Neurology has now developed a close co-operation with WHO within the context of global health issues as identified by WHO. Appropriate strategies for the prevention and control of non-communicable and communicable neurological diseases should be part of clinical neurology. If World Federation of Neurology wants to convince health planners to give brain disorders a higher priority, we have to work through the WHO. Our goal is to develop standards of neurological

care in developing countries, partly through the WHO, and partly as a direct mission.

The mission of our Research Committee, chaired by Roger Rosenberg, is to improve the health of patients with neurological disease, particularly in developing countries, through the formation and support of international Research Groups, many of them with their own journals and own scientific congresses. The Research Groups also serve by exchange of views and information and by advising the Organising Committee for each World Congress of Neurology. The Research Committee has also launched new initiatives to disseminate up-to-date information on recent advances in therapy. Entitled "Research Advances in Neurology", this section of the WFN website covers current research advances in clinical and basic neuroscience in areas of various research groups. These reviews emphasize neurotherapeutics, including those treat-

ments available and affordable in developing countries. They are intended to provide neurologists everywhere with an electronic syllabus on important new therapies that will be up-dated every six months.

The Education Committee, chaired by Ted Munsat, also focuses on global concerns and advocates implementing programmes for the improved care of patients with neurological disorders through the education of physicians worldwide. The Education Committee encourages and assists in the education of young neurologists in the hope of improving patient care where needed (4). An important part of the mission of the World Federation of Neurology is the Continuous Medical Education Programme, conducted with national neurological societies utilizing group discussions of Continuum, generously donated by the American Academy of Neurology, and Seminars in Clinical Neurology that the World Federation of Neurology publishes periodically. The

World Federation of Neurology has expanded from 21 countries in 1957, to 96 member countries in 2007. When neurology is established in more African countries, and neurology can cross borders, the World Federation of Neurology will become a true global organisation.

Literature:

- (1) Poser CM. The World Federation of Neurology: the formative period 1955-1961. Personal recollections. *J Neurol Sci* 1993;120:218-227.
- (2) Walton J. The World Federation of Neurology. Pp 573-588 in. *The Spice of Life. From Northumbria to World Neurology.* Roy Soc Med Services, London 1993.
- (3) Aarli J.A. World Federation of Neurology. *J Neur Sci* 2007 (in press)
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Johan A. Aarli

World Federation of Neurology Synopsis of Africa Meeting, London

15th December 2006

The Way Forward?: (WHO-Dr Bertholote) Integration of neurological care into primary care. Give training to general health care staff; increase the number of neurologists; increase the number of neuropaediatricians; increase the number of neurosurgeons.

Major Concerns: Cost effectiveness; brain drain; how much does it cost to train a neurologist? Not just to train neurologists but also how to bring neurological care to people. There is a tendency for people, once trained, to leave and go abroad. In Africa almost half speak English; half French; some speak Portuguese; also local languages. Language in training is very important. If you want to reach people, English, French etc may not be sufficient.

Education Committee recommendations:

- The WFN Plan should be formulated

in great part by neurologists who practise in the region.

- A careful and detailed needs assessment should be done before the program is formulated.

- The initiative should be constructed in concert with WHO.

- The currently effective WFN educational programs should be extended into new countries and expanded in those currently involved. These should include countries with established training programmes; countries in which training programmes can be established; and countries where there is no neurologist.

- Much more involvement by French neurologists.

Each point would require comprehensive analysis and careful decision-making. Dr Hachinski suggested that the term "Task Force" should be applied and that it should be overseen by the President. Within this there

would be smaller sub-groups.

Some concern was expressed that WFN should accurately follow WHO regions and there should be no confusion with, for instance, the Arab countries in the Northern part of the continent. However, Prof Diop also had close contacts with North African countries, and the African public health crisis was predominately in Sub-Saharan Africa.

- **Organisation:** WFN should help African neurologists organise themselves and become members of the WFN. WFN would have to look closely at how the Federation could be enlarged.

- **Training:** This was the greatest need at all levels. WFN had some very special products.

- **Guidelines:** Implementation and evaluation. This was something that was badly needed. Most of the guidelines published were suitable only for certain countries. It was important to listen to those whom WFN wanted to help and, in

terms of training, this meant small-scale local meetings not congresses. For example, the impact of holding something in Ethiopia and awarding a small scholarship for people from the local area to attend would be far more helpful.

■ *It was agreed that a Task Force should be established immediately. Dr Aarli would be the Chair, and Prof Diop would be Co-Chair.* Prof Diop would be the person to represent a link to the local WHO Office, while Dr Aarli would be the link to WHO in Geneva.

Fellowships Dr Hacke proposed a combination of the following three types:

- Travel Fellowships
- Short-term: 3-6 weeks, like EFNS
- Year-long fellowships

Some people preferred a model where the candidate stayed in his/her country, travelling for, say, two months of the year overseas and then returning. They were less likely to leave permanently. For example, 2 months could be spent studying EMG/EEG followed by a return home to implement what had been learnt. On the next occasion something different would be studied.

At present the WFN offered 10 Junior Travelling Fellowships each year but these were to attend international conferences. They were not for specific meetings but for any meetings approved by the WFN. In the past 20 Fellowships used to be on offer including 10 from GlaxoSmithKline; but regrettably funding from that source had ceased. Dr Hacke said that EFNS were unable to give out all the fellowships they had available, and Dr Kaji said it was the same for IFCN. There were never any applications from Africa. Dr Carroll said they had not been able to fill all the fellowships available for Sydney either. He thought £1,000 was probably not enough to attend congresses, and there was also the problem of obtaining visas these days.

Dr Aarli agreed that there were different types of fellowships that could be offered. Maybe a start should be made by discussing Travelling Fellowships, perhaps in collaboration with AAN or

IBRO. Dr Kalaria had said he would match, dollar for dollar, what WFN was able to give.

Communications in Africa would be an obstacle to everything WFN tried to do. It had been learnt that some might have e-mail access but they did not have the time or opportunity to acquire information from the Internet.

What was needed was a decision on which type of education exercises WFN wanted to be involved in, e.g. small conferences; training of clinical officers etc. These should be developed where they were needed and extended to other areas if successful.

Dr Rosenberg recommended going back to Prof Diop and his colleagues to ask them what they wanted. What kind of fellowships would be best for them? Nothing should be prejudged. The initiative should originate with them. An amendment was suggested to the term applied to the whole project. Not 'the WFN Africa Project' but '*The Africa-WFN Project*'.

Epilepsy was very important in Africa. The Centers for Disease Control and Prevention (CDC) was another group involved in many projects in Africa. Malaria in Kenya was a major cause of the wide spread of HIV. The Walter Reed Army Medical Center would be very happy to work with the WFN.

Dr Munsat reminded the meeting that the Education Committee had run pilot studies which could perhaps be applied in Africa: (i) Neurology where there is no neurologist. This had been very successful in Zambia. (ii) Honduras: which had entailed assisting a group of well-trained neurologists to improve their own existing training programme. This too had been very successful. (iii) Pilot trials of help for different countries that had established training programmes and now needed WFN to put together a small group of people to go there and carry out an evaluation.

Regional Teaching Courses Dr Aarli said that EFNS would be willing to organise a teaching course in Africa if WFN did likewise. A realistic date to

start would probably be 2008. Professor Diop should be asked to suggest two countries where this might work best. It would be important to have the views of Dr Haimanot, Professor Diop and their colleagues on what was needed. Dr Hachinski had asked Dr Haimanot and Professor Diop to provide information for the Trustees to review. He had also talked with Dr Bertholote from WHO who was interested in why WFN was keen on Ethiopia in particular. Dr Munsat referred to the success of the WFN CME Programme using Continuum as a way of bringing colleagues together.

First, agreement had to be reached with EFNS on the need for a teaching course in Africa. Then Professor Diop should be asked to propose two countries. Finally, together with the EFNS, WFN should try to decide on who would go there and set a budget for 2008.

Dr Shakir agreed this would be a very good idea and suggested the countries were likely to be Ethiopia and Senegal who should say what subjects the training needed to cover. 3 people could probably be sponsored to hold teaching courses for 2 days. Dr Hacke thought that 2-3 local people should also be involved so that not everything was imported.

WFN—Japanese Neurological Association Fellowship Dr Kaji had been thinking about what Japan could do for the Africa Project. Japan had schemes that were mostly funded by the government and their availability was not generally known to the African people. He suggested perhaps neurosurgeons might be interested in visiting Africa. WFN could be very flexible in endorsing some of these activities which would help raise the Federation's profile. It would not involve a great deal of expenditure. For example, Dr Kaji currently had a Mongolian Fellow in his department who was receiving 4 years' training. It had proved possible to obtain money from the pharmaceutical companies to fund his flight and the department had been able to fund the costs of his stay. Someone like that could be given a title such as 'WFN Fellow' or 'Japanese Neurological Society—WFN Fellow'. To clarify, if WFN funded travel expenses,

Japan could take care of the rest. Dr Hachinski suggested that Dr Kaji's department should enter into an agreement with a specific African department.

Dr Aarli would write to African contacts referring them to the Honduras training programme as a model, and asking if they had an existing programme in their own country. A letter of invitation should be sent, possibly from Professor Diop. It needed to be discussed and agreed with him.

Specific instructions from Professor Diop and his colleagues were needed. It also had to be remembered that only a few African countries were members of the WFN. Dr Aarli concurred and cited Nigeria as a huge country which should be a member of the WFN.

Dr Hacke: There were so many parallel activities. The larger picture was seldom known, only bits and pieces. Would it be possible for Mr Newton to contact other societies to obtain a general overview of whether each organisation had something dedicated to Africa or whether they could set aside something? Examples of organisations were: EFNS, ENS, IBRO, ISS etc.

In Dr Aarli's view, early action on Africa was vital. He asked Dr Munsat to explain further to the meeting about the manuals produced by Dr Birbeck. Dr Munsat said these had been developed with support from the WFN and the Education Committee had helped review them. He mentioned Dr Ddumba, a neurologist in Uganda who had produced a similar manual. Dr Munsat just needed a directive from the Trustees as to which country he should target, who would be the contact person there and what staff support would be available. Gretchen Birbeck could be asked for her ideas on appropriate countries. If Ethiopia were used as a pilot for the Africa Project, several things could be done there without necessarily entering into any commitment to spread them into other countries. Alternatively, several countries could be identified. Dr Munsat favoured a pilot study in Ethiopia alone. Dr Aarli said the request to help in Ethiopia for areas where there were no neurologists or

even doctors had come from Dr Saraceno at WHO.

Professor de Visser asked whether existing CME programmes in Malawi, Uganda etc would still continue? It was confirmed that they would. Dr Aarli would contact Professor Diop to see if he agreed and ask him to contact Dr Munsat.

South Africa Question:

Dr Aarli believed that WFN should assist in South Africa and referred to the system of Supernumerary Residents. South Africa had a strong case for help in that a Consultant Neurologist could have only two Residents. However, they could have one or two more if they came from outside South Africa. Dr Pierre Bill should be asked to work with the South African Delegate to WFN (Kevin Rosman) to obtain his agreement.

If WFN could sponsor a Travelling Fellowship to South Africa, they would be willing to take him.

Regional Training Centres: It was probably not enough to have a centre in a French-speaking area; there should also be one in an English-speaking area. As for the Portuguese-speaking countries, the political situation in Mozambique and Angola was unstable.

Research Projects: The Alaska programme had been cited as a model of health care distribution. Professor Diop should perhaps be asked to pick rural areas in two or three countries in Africa where it might also work. He would have to work with his colleagues in those countries. Dakkar would probably be the place to start to see how things went and then, if successful, it might perhaps be extended to other cities in Senegal; and from there maybe to a neighbouring country. This too should be discussed with Professor Diop.

CONCLUSIONS

WFN Africa Task Force A Task Force—Africa would be established; Dr Aarli to co-chair with Dr Diop; its Co-Chairman to be invited to participate in Trustees' Meetings as appropriate. Consider what the mechanisms for its work would be.

Create Africa Fellowships

■ Possible creation of specific Fellowships for African neurologists. There were 10 WFN Junior Travelling Fellowships per year at present. Should a specific one for Africa be introduced?

■ Together with the Japanese Neurological Association a Fellowship of some kind would be developed where WFN would cover travel expenses and Japan would cover other expenses.

Collaborate with EFNS and AAN in sponsoring Travelling Fellowships

■ How should WFN collaborate with the EFNS and AAN in sponsoring Travelling Fellowships? Dr Sergay had said he would see what the AAN could do. IBRO would be an important partner; they had said they would match sponsorship dollar for dollar.

Together with EFNS, Regional Teaching Courses

■ Could be organised in 2008 in collaboration with the Africans and other partners.

■ Congrex possibly to be asked to assist.

Sponsored Department to Department Partnerships

■ These had been very successful with the EFNS. It would be necessary to say how many departments should be in the programme and to nominate departments in countries such as Canada, the USA and Japan. With the EFNS, participation was for 6 weeks; should the WFN have the same period or not? Dr Wolfgang Grisold to be requested to produce similar ideas for the WFN Africa Project.

■ Together with Drs Pierre Bill and Kevin Rosman, exchange programmes with South Africa, and the problem of supernumerary residents, to be discussed.

Regional Teaching Centres

■ This idea had been endorsed by Prof Diop. Would WFN sponsor these centres? What sort of sponsorship would be on offer? Who would carry out evaluation etc? Should the programme begin with a single centre, such as that being set up in Morocco?

Develop and promote Neurology Clinical Officer Programme

■ How should the *Neurology Clinical Officer Programme* be developed, as suggested by Gretchen Birbeck? Drs Ted Munsat and Gretchen Birbeck to be asked to work on a manual designed for countries where there were no neurologists. With Professor Diop's agreement, the focus would be on Ethiopia.

■ Training programmes to be established and evaluated.

Research directed at neurological care delivery

■ As suggested by Dr Rosenberg. How would this be done? An example of a suitable topic might be the healthcare distribution system used in Alaska to be considered as a possible model for Senegal.

Specific Web links to African neurology

■ Dr Piero Antuono and the Publications & Website Committee to be asked to establish a weblink programme for Africa.

Communications—the need for improvement was underlined.

World Federation of Neurology

Journal of the Neurological Sciences

Editorial Board Meeting Minutes

May 1, 2007, Boston, USA

Members Present:

P. F. Bakker, Senior Publishing Editor, J. Dirkmaat, Marketing Manager, R. P. Lisak, Editor, S. E. Hutton, Administrator and Supporting Editor, R. Lewis and P. Dore-Duffy, Deputy Editors, J. F. Toole, Editor Emeritus, A. Tselis, Book Review Editor, and Associate Editors M. F. Beal, H. Feldman, M. S. Freedman, F. Gerstenbrand, A. B. Guekht, V. Hachinski, E. Hogan, J. Jankovic, D. Jeffery, A. Koeppen, A. Korczyn, N. Newman, J. D. Pollard, A. Portera-Sanchez, R. Rangel-Guerra, E. S. Roach, R. Rosenberg, A. Rostami, A. Siva, I. Steiner, and D. Truong

ITEM: Editor's Report presented by Robert P. Lisak, M.D.

Submissions to JNS for 2006 exceeded 2005 by 42%. 573 manuscripts were submitted compared to 405 in 2005. 225 manuscripts were accepted for publication; 305 were rejected. As of January 1, 2007, 207 manuscripts remain in progress. 328 articles were published in 14 issues in 2006, including 10 double issues and a Cumulative Author/Subject Index included in the December issue. This significant increase in submissions was a direct result of the electronic submission system (EES) implemented in May 2006. Since May the journal has accepted only papers submitted electronically. Dr. Lisak stated that the electronic online submission and peer reviewing system (EES) is very effective. It has received positive responses from both authors and reviewers.

Three special issues and one special section were published in 2006. These included issue 242.1-2 (March) "Advances and Current Concepts in Neuromuscular Disease: A Special Issue

in Honour of the Careers of Robert E. Lovelace, M.D., FRCP and Jack Patajan, M.D., PhD." Guest editors were A. Gordon Smith and Louis H. Weimer. Issue 245.1-2 (June) "Cognitive Decline in Multiple Sclerosis: Biological, Clinical and Therapeutic Aspects" at the European Charcot Foundation Symposium in Italy, 2004. Guest editor was O. R. Hommes. Issue 248.1-2 (October) "Dementia in Parkinson's Disease" at the International Symposium, Salzburg, Austria, 2004. Guest editors were A. D. Korczyn, D. Calne, and E. C. Wolters. Special section in 249.1 (November) "Terrorism for the Neurologist: A Seminar Presented at the World Congress of Neurology," Sydney, Australia, 2005. Guest editor was L. D. Prockop.

The geographic distribution of manuscripts received and accepted has remained constant for the last nine years. Japan with 21% and the USA with 20.5% continue to dominate the submissions.

Submissions continue to be tracked by disease type and discipline, both of

which are relative and sometimes arbitrary classifications. The dominant disease type categories remain essentially the same as in past years: cerebrovascular, neurodegenerative, inflammatory/MS, movement disorders, and peripheral nerve. Clinical research continues to dominate; only 9% of all submissions were basic research (experimental animal based) which is consistent with prior years.

The peer-review process continued to improve in 2006. 10.6% of the manuscripts were accepted with no revision; 66.7% required one revision; 22.7% required two or more revisions. Language issues and incomplete responses to reviewers' comments accounted for the extended review process. The electronic submission EES has helped to expedite the overall review process. Reviewers decline quickly which allows the selection of other reviewers with less delay. Reviews and revisions are also submitted more quickly through the electronic system.

Ad hoc reviewers were acknowledged in the April issue, 243. In addition to

board members 399 reviewers were used in 2006.

Changes to the editorial board include the following. A. Tselis assumed the role of book review editor in addition to his role as liaison with *World Neurology* for which he periodically submits synopsis of articles from JNS to be featured. A. Koeppen was recognized for his service as book review editor. D. Truong and A. Siva were both recognized as new members of the board.

Editorials and review articles continue to be developed. Dr. Lisak suggested that reviewers can provide these when they submit their reviews by simply checking the box that says "subject for editorial." Often the review of the paper can be developed into an editorial. Dr. Lisak also invited board members to submit review papers since these have a positive effect on the journal's impact factor. The goal is to have 1-2 review articles in each issue.

Dr. Lisak closed with a discussion of triaging. Since submissions have dramatically increased as a result of the electronic submission, he feels that the editor needs to reject the number of clinical short reports, thereby reducing the number of requests to reviewers. He also introduced the idea of requiring authors to submit a list of 2 or more potential reviewers for their paper. Currently JNS suggests that authors do this but does not require it. Some board members had a problem with this indicating that it could impact the objectivity of the review. Dr. Lisak responded that no more than one reviewer suggested by an author would be considered for any one paper.

ITEM: Senior Publishing Editor's Report presented by Peter F. Bakker

Peter Bakker announced that 2006 was a good year for JNS. He too noted the increase in the number of submissions. As his detailed report indicates, publishing time (total time from receipt by editor to issue being sent to subscribers) has improved. The first four months of 2007 continue this trend with a production time of 11.6 weeks. This improved

turn around time helps the reputation of the journal.

Special issues were noted. These help the journal's impact factor, especially the issue with the Charcot Foundation. Peter Bakker indicated that there are currently four special issues and two supplements planned for 2007/2008.

Peter Bakker indicated that the higher rate of submissions and acceptance resulted in 1868 printed journal pages for 2006. 911 printed journal pages have already been processed for the first four months of 2007. He expects to print 2200-2300 pages for 2007 thereby issuing bigger volumes. The journal's limit for the year is 3000 pages set by the sponsor WFN.

There is little change in the geographic distribution of manuscripts received at Elsevier from North America, Western Europe, and Asia.

The decline in the number of print subscriptions continues. Two-thirds of subscriptions are now electronic. A further drop of 20-30% in print subscriptions is expected in 2007.

Advertising in the journal was the next issue of discussion. JNS does not advertise. Peter Bakker said that Elsevier has been approaching the industry to advertise on line. The industry is still conservative. It likes the impact of the printed copy. Currently JNS has 4992 electronic user accounts.

The impact factor declined from 2006. Peter Bakker indicated that more review articles are needed to reverse this decline. He also indicated that the cover of the journal is currently being revised. Some board members felt that such a change was needed.

Marketing activities continue to be a priority. Efforts to increase the visibility of the journal are detailed in the report. These include coverage in the WFN quarterly newsletter, advertisements in other Elsevier journals, a direct mail campaign to 15,000 members of national societies worldwide, and online marketing activities including the Neurology e-newsletter sent out bi-monthly to a large data-

base of Neurology subscribers. JNS is also promoted at neurology meetings worldwide.

Peter Bakker's report lists the top 25 cited articles for JNS. Board members suggested that these authors should receive a letter indicating this ranking. Perhaps that would encourage them and their colleagues to submit other articles to the journal.

There being no further discussion, the meeting was adjourned at 9:00 am.



Robert Lisak
Editor-in-Chief

WFN Boston Meetings

April 28 to 2 May, 2007



WFN Research Committee Meeting held on 30.4.2007



WFN Research Committee Meeting held on 30.04.2007



Joint Meeting of WFN Education Committee & CME Coordinators held on 30.4.2007

Summary of Articles Published in JNS



Review of Treatment of Susac's Syndrome

Rennebohm R.M. and Susac J.O.

J. Neurol Sci xx (2007) xxx - xxx

The syndrome of Susac, consisting of encephalopathy, hearing loss and branch retinal artery occlusion, is likely more common than is supposed, and the characteristic triad is not always observed, when one aspect is dominant over the others. Thus, encephalopathy is very common and can be difficult to evaluate; the clinician may thus not notice a subtle hearing loss. Since this is a rarely studied disease, the pathogenesis is not known, pathologic findings are not well described and optimal management has not been determined.

In this timely and well organized review, Drs Susac and Rennebohm collect all the data on this disease from published cases and summarize well what is known about it and what is not. This information is synthesized to give a potential outline of the pathogenesis of the disease and provide structured (almost step-by-step) recommendations for its treatment using various immunosuppressive and immunomodulatory agents.

The pathologic findings and clinical course of this disease are very reminiscent of those seen in dermatomyositis. Both have monophasic, relapsing-remitting and chronic progressive courses. Muscle biopsy of patients with Susac's reveals a microangiopathy, affecting mainly the endothelium ("endotheliopathy"), very similar to that in dermatomyositis. This resemblance between the diseases has both pathogenetic and therapeutic implications. The therapy mainly consists of high dose corticosteroids, with supplementation by immunomodulators such as intravenous immunoglobulin and immunosuppressants such as cyclophosphamide and mycophenolate, as needed. Other possi-

bilities such as methotrexate, rituximab and plasmapheresis are also discussed.

Review of Brain mitochondrial dysfunction as a link between Alzheimer's disease and diabetes

Moreira P.I., Santos M.S., Sieca R., and Oliveira C.

J. Neurol Sci xx (2007) xxx - xxx

The connection between diabetes and dementing illness has long been suspected and, in the past few decades, documented. Certainly, diabetes predisposes strongly to cerebrovascular disease, which in turn leads to multiinfarct dementias with a more or less clearcut pathogenesis as well as the less well characterized ischemic leukoencephalopathies or "small vessel disease". However, a relationship to Alzheimer's disease has also been suspected, since some of the risk factors for diabetes are risk factors for Alzheimer's and the two seem to be associated more often than by mere chance.

Can the connection between diabetes and Alzheimer's be traced to a common molecular substrate? This paper explores the case to be made for this, and discusses the threads of evidence connecting the amyloid protein A β with mitochondrial damage. It is known that A β is metabolized in part in the mitochondria, where it can be detected along with various proteins to which it binds. Abnormalities in glucose metabolism and insulin in the brain also damage mitochondria. The effects of insulin are not necessarily mediated only through regulation of glucose metabolism. The evidence for the synergistic effects of A β and abnormal glucose and insulin on the mitochondria, the integrity of which is crucial for the function of the highly metabolically active brain, is carefully explored. Their interweaving effects suggest that Alzheimer's disease is in some cases a form of brain parenchymal

diabetes, or "type 3 diabetes." The implications for the early diagnosis, prevention and treatment of Alzheimer's are evident.

Review of A distinct subgroup of chronic inflammatory demyelinating polyneuropathy with CNS demyelination and a favorable response to immunotherapy



Pineda A.A.M., Ogata K., Osoegawa M., Murai H., Shigeto H., Yoshiura T., Tobimatsu S., Kira J.I.

J. Neurol Sci xx (2007) xxx - xxx

Inflammatory demyelinating diseases are commonly thought of as being confined to the central or peripheral nervous systems. Examples of the former include multiple sclerosis, optic neuritis, acute disseminated encephalomyelitis and transverse myelitis, and for the latter include Guillain-Barre syndrome and chronic inflammatory demyelinating polyneuropathy (CIDP). However, since many of the antigenic epitopes in peripheral myelin are the same as in central myelin, one would expect that in some cases peripheral and central demyelination would occur together. In patients with CIDP, such has been the case.

In this study of 18 consecutive Japanese patients with CIDP, CNS demyelination was looked for by somatosensory and motor evoked potentials as well as MRI of brain and spinal cord. Six of these patients had abnormalities indicating central demyelination, but only one had an MRI typical of MS.

Do the patients with subclinical central demyelination differ from those without? While the number of patients in this study is small, some significant dif-

ferences appear. The patients with sub-clinical CNS demyelination had statistically significantly less disability, and larger compound motor action potentials in the median nerve. There was a statistical trend to a male preponderance and greater responsiveness to immunologic therapies such as prednisone, plasmapheresis and intravenous immunoglobulin in the group with sub-clinical central demyelination. The authors speculate that in patients with both central and peripheral disease have more pure demyelination than the patients with peripheral disease, who may have greater axonal involvement which is known to be more severe and less responsive to therapy. Larger studies, repeated in the same and other populations would be of great interest. If these results are replicated, the pathogenetic implications are evident.

Review of Quantitative nested real-time PCR assay for assessing the clinical course of tuberculous meningitis.

Takahashi T, Tamuar M, Takahashi SN, Matsumoto K, Sawada S, Yokoyama E, Nakayama T, Mizutani T, Takasu T, Nagase H.

J Neurol Sci 225 (2007) 69-76

Tuberculous meningitis (TBM) is a not uncommon subacute meningitis which

is difficult to diagnose and treat, and for which there is no quantitative way to follow the effect of treatment. In a patient with preexisting tuberculosis, who develops headaches, difficulty in concentrating and cranial nerve palsies, with moderate pleocytosis, high CSF protein and hypoglycorrhachia, the diagnosis is reasonably certain, but this is not always the case. Further, once the diagnosis is made and antiTB therapy is instituted, there is no objective quantitative way to follow the disease, apart from serial neurological exams and repeat measurement of CSF parameters such as pleocytosis, protein and glucose levels. Direct measurement of bacterial load is not available - cultures and PCR are positive or negative.

In this study, 8 patients with TBM and 20 controls (other forms of meningitis, multiple sclerosis, lupus, lymphoma, neuroBehcet's) had CSF examinations, with serial testing in the TBM patients. CSFs had routine parameters measured, along with simple mycobacterium tuberculosis (MTB) PCR, nested PCR and quantitative nested real time (QNRT) PCR. Nested PCR is a more sensitive technique for detecting TB DNA, by using 2 stages of amplification. QNRT PCR is a sensitive and quantitative measure of bacterial cell (BC) burden, expressed as BC/mL of CSF.

For the TBM patients, CSF measurements were done before and at least once after 2 weeks of antiTB therapy.

The results were interesting. Simple PCR detected TB DNA in only one of the 8 TBM patients, while the more sensitive nested PCR was positive in 8 out of 8 patients. In the non TBM group, nested PCR was negative in all cases. In the TBM patients, the initial pretherapy CSF bacterial load was 2000-20,000 cells/mL. With continued antiTB therapy, the bacterial load dropped after several measurements, over a time scale of several weeks to a month or two. The drop in bacterial load correlated with clinical improvement, resolution of pleocytosis and normalization of CSF protein and glucose. Interestingly, in a few cases, the bacterial load initially increased just after therapy was started, before declining. In the one patient who died of TBM, the bacterial load increased continually.

While the number of patients in this study was small, the results are very intriguing and need to be developed further. This assay provides for the first time an objective quantitative measure of TB load in the CSF of TBM patients and may be useful in following the disease.



Thank you to Dr Alex Tselis for summerizing the papers

REPORT

WFN-IBRO Sponsored Symposium on 'Brain Ageing and Dementia in Developing Countries'

Held at Safari Park Hotel Confernece Centre, Nairobi, Kenya from 10th to 13th April 2007

Introduction

Worldwide, there is a demographic transition occurring characterized by progressive increase in the population of the elderly, much more in the developing than in the developed countries. Accompanying this is an increase in the prevalence of cardiovascular disorders such as hypertension, diabetes mellitus and ischemic heart disease as well as

neurological diseases including stroke, neurodegenerative dementias, vascular dementia and late-onset depression. This increase is occurring more in the poorer developing regions of the world where resources to cope with the growing burden are scarce.

With this background, this symposium on 'brain ageing and dementia in devel-

oping countries' was organized to review the size of the problem, the economic costs, protective and predisposing factors, current thoughts on aetiology including gene-gene and gene-environment interactions, treatment modalities including phytotherapy and new drugs under development as well as comparing research findings from developed and developing nations.

With sponsorship from the WFN, IBRO, WHO and some other funding agencies, about sixty researchers drawn from Europe, Africa, North America, Latin America and Asia-Pacific convened at the Safari Park hotel in Nairobi, Kenya between the 10th and 13th of April, 2007 to participate in this symposium. This report is a summary of the four-day event.

The Symposium

The symposium commenced with an opening session on the 10th of April, 2007. Prof Raj Kalaria, convener of the symposium, delivered an opening address welcoming all participants and highlighting the objectives of the symposium which was coming exactly one hundred years after Alois Alzheimer described his first case of the disease that later became eponymously named after him. An overview of the 10/66 dementia research group, a conglomerate of 100 researchers from 32 developing countries carrying out community-based dementia studies and an affiliate of the Alzheimer's Disease International (ADI), was provided.

This was followed by launching of the Alzheimer's Association of Kenya, a product of a vision conceptualized from the experiences of some individuals who have had to take care of relations with dementia. Supported by the African Mental Health Foundation (AMHF), the association was formed with the goals of gathering data on the burden of dementia in Kenya, creating public awareness to enhance early detection and risk reduction as well as facilitate support for caregivers of persons living with dementia.

The following session focused on the size of the worldwide problem of brain ageing and dementia. Acknowledging WHO reports on global ageing, the worldwide societal cost of dementia was reviewed. In 2005, based on an estimated population of 29 million persons living with dementia, the cost of care was estimated at US \$ 315 billion (direct cost US\$210 billion and informal cost US \$ 105 billion). Twenty three percent of the total cost was borne in developing countries which had 54% of the prevalent cases.

The chronic problem of paucity of trained manpower for mental and neurological health care delivery and research in the developing world also received some attention during this first session. In sub-Saharan Africa for instance, there is just one single neurologist to an average of 3 million people. Faced with the daunting challenges of high cost of training and brain drain, some of the solutions proffered include integrating basic neurological care into primary health care, empowering.

The subsequent session focused on diagnosis of mild cognitive impairment and dementia in diverse communities and risk factors. Several studies presented at the symposium identified risk factors for dementia such as vascular factors: hypertension, diabetes mellitus, obesity, raised cholesterol levels; physical and mental inactivity, urban living, poor social interaction and positive family history. While the role of apolipoprotein E gene in the pathogenesis of AD appears well established, several new candidate genes for late-onset AD and the frontotemporal dementias are being elucidated. Some of these cutting-edge research findings on genetics of dementia were presented

Care arrangements for people living with dementia should involve the family and other stakeholders in the context of culturally appropriate and acceptable methods. The results of a community-based epidemiologic survey of

Parkinson's disease and stroke in Tanzania, East Africa were presented as well as the profile of cognitive dysfunction in a cohort of Nigerian patients with PD. There was a unique presentation.

There were posters highlighting the epidemiology of dementia in Tunisia, Algeria, Senegal, Democratic Republic of Congo, Uganda and Ethiopia.

Benefits of the Symposium

This symposium has been quite beneficial having:

- provided an opportunity to interact with key players in the field of dementia care and research.
- provided an avenue to appraise progress since 2001 when the maiden edition of the symposium was organized.
- provided a forum to appraise the current status of dementia care and research especially in the developing countries.
- made possible establishment of relationships for possible future collaborative networking.
- brought to the fore the need for more public enlightenment on dementia.
- revealed the need for correct research priorities and good research as basis for evidence-based policy drives and advocacy for brain health in developing countries.

Dr. Rufus Olusola Akinyemi
Neurology Unit, Department of
Medicine, University College Hospital,
Ibadan, Nigeria.

Journal of the History of Neurosciences

Special Issue on the History of Russian Neuroscience

Editors: P.J. Koehler, M. Macmilland and S. Finger

ISSN: 0964-704 X

No. of Pages: 236

Publishers: Taylor & Francis

Price: US\$ 418-441

This Journal is representing the WFN Research Group of the History of Neurosciences and was founded by Frank Clifford Rose in the early 1990s. Frank, a well known neurologist of international repute, was Secretary

Treasurer General of World Federation of Neurology for around one decade and Editor-in-Chief of *World Neurology* for many years. History of Neurosciences has been very dear to him in addition to several books and monographs edited by him. This journal presents historical material on all branches of neurosciences from antiquity to recent times. It is also the official journal of The International Society for History of the Neurosciences. Publication is quarterly. Although

presently it is running on to 16th Volume, this issue has special significance. It is not only double in size but it significantly caters for the history of Russian Neuroscience which previously was an enigma. Readers will not only get a glimpse of past Russian/Soviet Union Neuroscience but will be enlightened as to the present development of the Neurosciences in Russia. There are

chapters on European influence on Russian neurology, I.M. Sechenov-The patriarch of Russian Physiology and the Scientific self-understanding, Moscow Clinic for Nervous Diseases, Beginning of Russian Psychiatry, Ivon Petrovich Pavlov, History of Kazan Neurological School, Russian Neurosurgery, The Moscow Brain Research Institute and many more chapters on the Russian

Neuroscientists, their discoveries and applications to human neurological diseases. This volume will not only interest the readers but will be a valuable treasure for the medical libraries around the globe.

Editor-in-Chief

CALENDAR

2007

VIII Congreso Colombiano de Neurología

August 17-19, 2007

Cali, Colombia

<http://congreso2007.acnweb.org/>

13th International Congress of Immunology

August 21-25, 2007

Rio de Janeiro, Brazil

<http://www.immunorio2007.org.br>

11th European Federation of Neurological Societies Congress

(incorporating WFN Council of Delegates Annual General Meeting and WFN 50th Jubilee Symposium)

August 25-28, 2007

Brussels, Belgium

<http://www.kenes.com/efns2007/>

World Federation of Sleep Research Societies World Congress 2007

September 1-8, 2007

Cairns, Australia

[http://www.icmsaust.com.au/](http://www.icmsaust.com.au/wfsrs2007/)

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