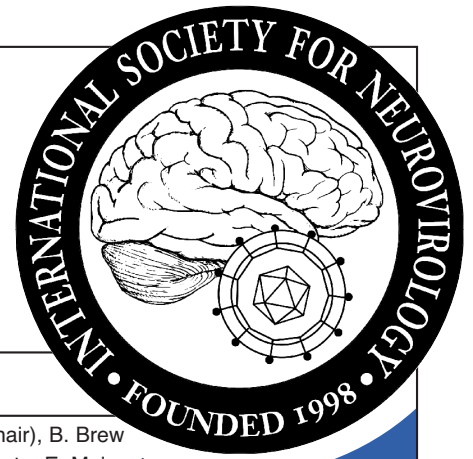


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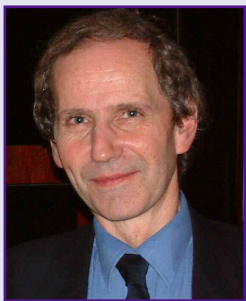
International Society for NeuroVirology

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Message from the President

Peter G. E. Kennedy, M.D., Ph.D. • Glasgow, UK



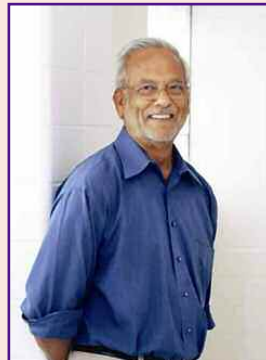
This last year has been another good one for the Society, and we have now been in existence for nearly 10 years. The Society's membership has slightly increased to about 320, but we still aspire to increase it above 400 at least, and I invite all our members to encourage their colleagues to consider joining. The direct personal approach is always the most compelling in my experience. A real highlight of 2007 was the highly successful 8th International Symposium on NeuroVirology, which took place in San Diego during October 29th-November 2nd. There were 270 delegates to the meeting, which was one of the most stimulating and enjoyable to date, one that was enhanced by the very agreeable climate and fine meeting venue and city. I wish to again extend my sincere thanks to all the people who worked so hard to make it such a success, in particular to Igor Grant, the meeting Chair, Brian Wigdahl, the Chair of the ISNV meetings subcommittee, and Jennifer Gordon and Kamel Khalili for their tireless work on the organisational aspects.

We are also very grateful to our sponsors, including the National Institutes of Health. The meeting was also successful because of the excellence of the scientific presentations and the delegates' participation and close engagement in the discussions. The Paradigm Builder Lecture was given by Peter Palese, who gave a superb presentation on the past and future of influenza virus pandemics. The Women in Neuroscience award was given this year to the distinguished scientist Dr. Gabriele Zu Rhein for her work on the viral aetiology of PML. This year's Pioneer in NeuroVirology award was given to Dr. Donald

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Remembering Bill Narayan

Janice Clements, Ph.D. • Baltimore, MD



Bill Narayan, a pioneer in Neurovirology, died on Christmas Eve 2007. Bill spent 40 years studying viral pathogenesis and the neurovirology of lentiviruses, starting his career as Dr. Richard T. Johnson's first postdoctoral fellow in the laboratory of NeuroVirology at Johns Hopkins School of Medicine in 1970. From 1972 through 1993, he developed his research and was promoted at Johns Hopkins to Professor in the Division of Comparative Medicine and founded the Retrovirus Biology Laboratories in 1988. Since 1993, Dr. Narayan has served as Chair of the Department of Microbiology, Molecular Genetics, and Immunology at the University of Kansas Medical Center, Kansas City, KS, USA. He also served as the Marion Merrell Dow Foundation Distinguished Professor and Director of the Marion Merrell Dow Laboratory of Viral Pathogenesis at the University of Kansas Medical Center.

Bill studied the pathogenesis of lentiviruses before the emergence of HIV, and his studies predicted the neuropathogenesis of HIV, the inability of antibody to control lentiviruses, antigenic variation within the infected host, and the difficulty in protecting the host with vaccine strategies. He had done all this before HIV was identified. When HIV was identified as the cause of AIDS, Bill made a conscious decision to study the pathogenesis of the simian immunodeficiency virus in the macaque model. His research provided the foundation for the early studies of the pathogenesis of the human immunodeficiency virus and its effects on the immune and nervous systems. His long-term contributions established the SIV model for studies of

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The Nebraska Center for Virology: Research, Training, Education and Outreach

Charles Wood, Ph.D. • Omaha, NE

In the seven years since its inception, the Nebraska Center for Virology (NCV) has extended its reach into new frontiers of research and new areas of the globe. Established in 2000 as a National Institutes of Health Center of Biomedical Research Excellence, the NCV won a \$10.6 million, five-year renewal grant from NIH/National Center for Research Resources in 2005. The NCV provides infrastructure support for researchers at the University of Nebraska-Lincoln (UNL), the University of Nebraska Medical Center (UNMC), and Creighton University – Nebraska's three major biomedical research institutions. Research carried out in the center focuses on viral diseases of human, animal, and plant, which include AIDS, neurodegenerative diseases, and malignancies. Researchers in the Center study a number of different viruses, ranging from HIV and herpesviruses to Porcine Reproductive and Respiratory Syndrome virus and the Chlorella viruses. The Center has 37 faculty members and is directed by Dr. Charles Wood, a molecular virologist, with co-directors Drs. Howard Gendelman and James Van Etten, and Associate Director Dr. Clinton Jones. There were a number of new scientists hired in the past seven years, and they have expanded NCV research into the study of human papilloma virus, a major cause of cervical cancer; the Epstein Barr virus and vesicular stomatitis virus, and new arenas of HIV research, including the evolution and transmission of the widely-spread subtype C HIV-1 in Africa and creation of a novel mouse model that can be used in vaccine development.



The Center also is broadening its international work. Wood and his colleagues conduct extensive research programs in Zambia focusing on the transmission of HIV from mothers to their infants, the relationship between HIV and Kaposi's sarcoma associated herpesvirus, which is linked to cancer, and the evolution of HIV. As a part of this work, the Nebraska team has built a laboratory and clinic at the Teaching Hospital of the University of Zambia and developed close ties with scientists there.

Training the next generation of virologists, both in the U.S. and abroad, is a critical component of the NCV's mission and continues to grow. There is an ongoing highly successful program funded by the Fogarty International Program to train Zambian and Chinese researchers on AIDS and associated cancer viruses. The program brings researchers to UNL and UNMC for training and provides in-country workshops. Training focuses on laboratory techniques, clinical disease management and behavioral interventions. The NCV also has established a research training program in comparative viral pathogenesis, funded by NIH, to recruit and train U.S. graduate students, particularly those from minority and underrepresented groups.

The NCV's educational mission extends beyond the scientific community. The Center's work on HIV evolution is included in a National Science Foundation-funded project called Explore Evolution that includes a permanent exhibit at the Nebraska State Museum, traveling museum exhibits that are touring the U.S., and an outreach program for 4-H students in five states. Another project, World of Viruses, recently funded by the NIH Science Education Partnerships Award program, is a multi-faceted educational outreach program that will feature NCV research in public radio documentaries and in "flexibits" distributed through public libraries and to 4-H programs in 22 states.

Dr. Gabriele Zu Rhein receives Outstanding Women in Neuroscience Lectureship

Jennifer Gordon, Ph.D. • Philadelphia, PA

The Outstanding Women in Neuroscience Lectureship Award was presented to Gabriele Zu Rhein at the 8th International Symposium on NeuroVirology during the awards ceremony at the Pioneer Gala Dinner. Dr. Zu Rhein, Professor Emeritus in the Department of Pathology and Laboratory Medicine at the University of Madison-Wisconsin, received her training in neuropathology in Munich, Germany and came to the University of Madison-Wisconsin early in her career. Her ground breaking electron microscopy studies more than 30 years ago provided the first evidence that the demyelinating disease, PML, could be caused by a virus (JC virus), a concept that was very controversial at the time. It is a concept that remains controversial for other diseases such as multiple sclerosis. As the 2007 Pioneer in Neurovirology, Don Gilden, mentioned in his acceptance speech, he and others continue to strongly support the case for a viral etiology in MS. In addition, Dr. Zu Rhein's elegant work in the hamster model gave us the first clues of the broad range of tumors that could be induced by JC virus and laid some of the groundwork for current studies on the association between polyomaviruses and human cancer. Dr. Zu Rhein thanks her collaborators, both male and female, over the years in the Department of Veterinary Science at the University of Madison Wisconsin whose research influenced her thoughts. She has been an inspiration to the field for her outstanding contributions during an era when few women were able to reach such achievements. We congratulate her again for her many accomplishments.



ISNV Highlight - Pooja Jain, Ph.D.

Dianne Langford, Ph.D. • Philadelphia, PA

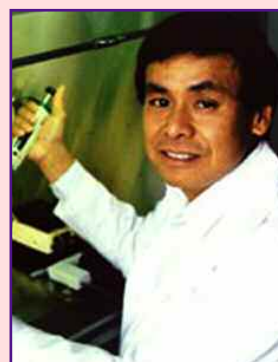
Dr. Pooja Jain is an Assistant Professor in the Department of Microbiology and Immunology at the Drexel University College of Medicine (DUCOM). Pooja's work, which focuses on the human T cell leukemia virus type 1 (HTLV-1), has shown that the transactivator protein, Tax modulates DC maturation and functions leading to an antigen-specific immune response (Ahuja et al., J Neurovirol, 2006; Jain et al., J Leukocyte Biol, 2007). In addition, Dr. Jain and colleagues have described Tax nucleocytoplasmic shuttling and secretion as a potential pathogenic mechanism involved in the progression of HAM/TSP (Alefantis et al., J Biol Chem, 2005; Jain et al., J Biol Chem, 2007). Pooja earned her PhD in 2001 from the Central Drug Research Institute in India and completed postdoctoral training at the Texas Tech University Health Sciences Center and DUCOM. With over 20 peer-reviewed articles and one international patent to her credit, she has been honored with a number of achievement awards. In addition to her research, Pooja has a strong commitment to teaching and mentoring students. Dr. Jain is an active member of the Center for Molecular Virology and Neuroimmunology at the Institute for Molecular Medicine and Infectious Disease, DUCOM and belongs to several professional societies including, ISNV, International Society for Neuroimmunology, American Society of Microbiology, and American Society of Virology.



ISNV Highlight - Charles Wood, PhD

Dianne Langford, Ph.D. • Philadelphia, PA

After earning his PhD in Microbiology from Columbia University in 1981 and post-doctoral training at the Basal Institute of Immunology and MIT, Dr. Wood became Associate Professor and Director of the Division of Neurovirology in the Departments of Microbiology, Immunology and Neurology at the University of Miami in 1992. Dr. Wood joined the University of Nebraska in 1996 as Lewis Lehr/3M Professor in the School of Biological Sciences and in 2000 became the founding Director of the Nebraska Center for Virology (NCV). Since this time, the NCV has focused on research, training, education, and outreach by providing infrastructure support for researchers at the University of Nebraska-Lincoln, the University of Nebraska Medical Center, and Creighton University. Researchers in the Center study a number of viruses, including HIV, herpes, porcine reproductive and respiratory syndrome virus and the chlorella viruses. Under the direction of Dr. Wood, the Center boasts 37 faculty members and is co-directed by Drs. Howard Gendelman and James Van Etten, and Associate Director Dr. Clinton Jones. Specifically, Dr. Wood's research has been on HIV and Kaposi's sarcoma (KS) associated herpes virus (KSHV), which has been linked to KS in AIDS patients. Projects range from HIV and KSHV transmission to HIV neuropathogenesis. Recent findings show that the replication and transcription activator (RTA) KSHV is key in maintaining the balance between latency and lytic replication. Specifically, the KSHV-RTA binding protein (K-RBP) was shown to suppress RTA-mediated transactivation and KSHV lytic replication (Yang and Wood, Journal of Virology, 2007). Identification of the protein utilized by KSHV to control replication will contribute to the development of strategies in preventing the virus from going through the lytic replication cycle leading to KS disease.



Along with expanding NCV research to study human papillomavirus (a major cause of cervical cancer), the Epstein Barr virus, and vesicular stomatitis virus, new areas of HIV research include the evolution and transmission of subtype C HIV-1 in Africa and development of a novel mouse model that can be used in vaccine development. Dr. Wood's research has broadened to the international arena, where extensive research programs in Zambia focus on the transmission of HIV from mothers to their infants, the relationship between HIV and KSHV, and the evolution of HIV. Important findings from these efforts include data showing that 30% of Zambia's normal female population is HIV+ and that 40% are infected by KSHV (He, J. et al., Journal of Infectious Disease, 1998). Thus, implications for transmission of infection from mothers to infants are enormous!

Dr. Wood views training the next generation of virologists, both in the U.S. and abroad, as a critical component of the NCV's mission. In this regard, a highly successful program funded by the Fogarty International Program to train Zambian and Chinese researchers on AIDS and associated cancer viruses is ongoing at the NCV.

The NCV also has established a research training program in comparative viral pathogenesis, funded by NIH, to recruit and train U.S. graduate students, particularly those from minority and under-represented groups.

We wish to thank these individuals for their contribution to the success of the 8th International Symposium on NeuroVirology held in San Diego in October 2007:

Betty Condran
Jennifer Gordon
Carla Ingle
Fred Krebs
Raphael Lukov
Michael Nonnemacher

Vanessa Pirrone
Nina Thakkar Rivera
Felicia Roston
Sandy Weiss
Members of the
Organizing Committee

Message from the President (continued)

Gilden of the Department of Neurology at the University of Colorado for his seminal and pioneering contributions to the field of NeuroVirology over 40 years, in particular his work on varicella-zoster virus neuropathogenesis and clinical manifestations, early work on LCMV, and more recent work on the pathogenesis of multiple sclerosis. As a longstanding friend and collaborator of Don's, it was a particular pleasure for me to present the award to him at the Gala Dinner. The next Pioneer Award will be announced at the 9th International Symposium on NeuroVirology, which is scheduled to take place in late Spring of 2009 in Miami in the United States. It was also a real pleasure to see the exceptionally high standard of the presentations of the Investigators-in-Training, which certainly augurs well for the future of our subject.

We are very keen to extend our membership to countries outside North America and Europe, in particular Asia, Africa, and the Far East. In order to facilitate our international presence and interactions, a new ISNV sub-committee has now been set up, called the International Interests Sub-Committee, which is chaired by Mahendra Kumar. We are very excited at this new direction for the Society. We wish Mahendra great success with this important remit!

Finally, I have to end on a sad note. As some of you may know, Dr. Opendra ("Bill") Narayan, the 2006 ISNV Pioneer awardee, died suddenly and unexpectedly in Kansas in late December 2007. This was a tragic loss for his family and for the subject, which he served so well, one that I personally feel particularly acutely as I was one of his trainees at Johns Hopkins University and admired him greatly. Bill was hugely popular, a staunch supporter of the ISNV and a superb scientist. He will be greatly missed, and in this Newsletter, Janice Clements pays tribute to the man and his career.

I wish all our members a most successful and happy 2008, and I look forward to many further successes and innovations for the Society and to meeting everyone in Miami next year.

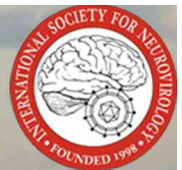
Remembering Bill Narayan (continued)



AIDS and CNS pathogenesis. More recently, Dr. Narayan focused major efforts on the development of a vaccine against HIV-1 using the simian/human immunodeficiency virus (SHIV) macaque model of AIDS. His contributions in SIV research are considerable, spanning pathogenesis, neuropathogenesis, and the development of a therapeutic SIV vaccine.

All of these accomplishments pale in comparison to his role as mentor and his ability to develop independent scientists. He trained over 40 scientists whom he taught to think critically about pathogenesis and become leaders in their fields. He always respected the training and background of his mentees and sought their ideas. He mentored by making you a trusted colleague and friend. All who knew him will miss him.

Mark your calendars for the
9th International Symposium on NeuroVirology
Miami, FL, USA • June 2-6, 2009



Organizing Committee

Mahendra Kumar, Co-Chair
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Steven Jacobson

Kamel Khalili
Ehud Lavi
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