IEEE Awards

Uno Lamm High Voltage Direct Current Award

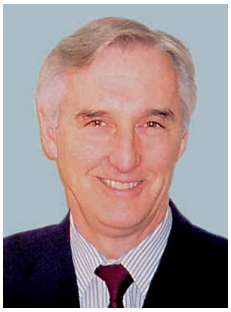
Dennis A. Woodford

2004 Recipient

The IEEE Power Engineering Society awards the **Uno Lamm High-Voltage Direct-Current (HVDC) Award** to recognize outstanding contributions to HVDC technology. The technology has developed into an effective power system tool for long-distance energy transport, ac network interconnections, and system stability enhancement. These developments have come from the work of dedicated engineers and scientists in many countries throughout the world.

The award consists of a bronze medal, an engraved certificate, and an honorarium of $1,000. The award is named for the man most responsible for the research and development that led to the first practical application of an HVDC connection between ac systems.

The 2004 receipient of this award is Dennis Woodford.



Dennis Woodford received his B.E degree in 1967 from the University of Melbourne and his M.Sc. degree in 1973 from the University of Manitoba. Following four years with the English Electric Company he was Special Studies Engineer in the System Planning Department of Manitoba Hydro. In 1986 he joined the newly-formed Manitoba HVDC Research Centre as Executive Director. He held that post until 2001 when he and a colleague formed Electranix Corporation where he is president.

His key contribution to HVDC technology was his development of the initial software and subsequent leadership of the team that developed EMTDC, one of the world's most widely used transient simulator programs. In the early 1970s the only practical way to perform electromagnetic transient studies on a dc system was with an analog simulator. Set-up time and accuracy of results were major concerns. In carrying out studies on the newly-developing Nelson River HVDC system, Dennis Woodford became convinced that future studies could be conducted more accurately and efficiently if done digitally. Using the concept of the BPA Transients Program developed by Hermann Dommel (later known as the EMTP) he wrote new code for decoupled portions of the network, created control modules, and developed an interface to the base code. He subsequently led the development of a graphical user interface which resulted in the commercial development of the PSCAD/EMTDC package, now used world wide.

Other contributions include leading the work that resulted in the world's first commercial real-time digital simulator for power system studies; building the Manitoba HVDC Research Centre into a successful, self sustaining research establishment; and presently through Electranix Corporation studying the integration of wind farms into ac networks.

Dennis Woodford has been an active member of IEEE and CIGRE with over 70 publications and numerous committee and working group activities. He currently is Chair of the DC and Flexible AC Transmission Subcommittee of the PES Transmission and Distribution Committee. He is a registered Professional Engineer in the Province of Manitoba and an Adjunct Professor at the University of Manitoba. He is the recipient of the Nikola Tesla Award from Westinghouse (1981) and the Merit Award from the Association of Professional Engineers of the Province of Manitoba (1985).

International Teaching Award

Professor Parham Aarabi

2004 Recipient

The Mac Van Valkenburg Early Career Teaching Award, named after a former Princeton professor, recognizes outstanding contributions to teaching by faculty in the first ten years of their careers. The international teaching award is given by the Institute of Electrical and Electronics Engineers' (IEEE) Education Society.

The award is based upon evidence of distinction in teaching by faculty at an early stage in their careers, including teaching performance, development of new teaching methods, and curricular innovation, in fields of interest to the Education Society.

The award consists of a $1,000 stipend, a commemorative plaque, and paid registration to the Frontiers in Education (FIE) conference.

Professor Parham Aarabi, of The Edward S. Rogers Sr. Department of Electrical and Computer Engineering (ECE) at the University of Toronto, has been named the inaugural recipient of an international teaching award given by the Institute of Electrical and Electronics Engineers' (IEEE) Education Society.

The award was given to Aarabi on October 22, 2004 at the IEEE Frontiers in Engineering Education conference in Savannah, Georgia.

Aarabi, now 28, is one of the youngest academics to join the Faculty - he was only 24 when he began teaching at UofT in 2001 after completing his doctoral degree at Stanford University in only two years. Letters of support from Aarabi's students played a role in his selection by an expert committee.

He holds the Canada Research Chair in Multi-Sensor Information Systems and has made headlines around the world for developing "talking" robots carrying a customized microchip and four-way speakers that are able to navigate a venue such as a museum and act as guides, or that could be deployed in hazardous environments such as chemically contaminated buildings.

Aarabi has previously distinguished himself in UofT lecture halls by receiving the Early Career Teaching Award from the Faculty of Applied Science and Engineering in 2003. Students in the ECE Department also voted him "Professor of the Year" in 2002 and 2003.

IEEE Technical Activities Vice-President Elect 2005

Congratulations to **Celia Desmond** on being elected as IEEE Technical Activities Vice-President Elect for 2005. Celia was elected to serve as vice president-elect of IEEE Technical Activities. She will succeed 2005 Technical Activities Vice President John Vig on 1 Jan. 2006.