

**IEEE AEROSPACE & ELECTRONIC & SYSTEMS, COMMUNICATIONS  
&  
LASER & ELECTRO-OPTICS, SOCIETY CHAPTER, INDIA**

**Major Technical Activities - 2003**

**AWARDS AND RECOGNITIONS**

- 1. IEEE-Communications Society, USA, has awarded 2003 Chapter Achievement Awards to the IEEE Delhi Communication Chapter.**
- 2. IEEE Aerospace Electronics System Society, USA, has recognized IEEE AES COM LEO SOCIETY CHAPTER INDIA as the 2002 Outstanding IEEE-AESS Chapter.**
- 3. The Chapter Chair has been nominated as Vice Chair for the APB Chapters' Coordination Committee of IEEE Communications Society.**
- 4. The Chapters have their Annual General Meeting. The New executive committee initiated his activity by felicitating Dr. DPS Seth and Sh. H.L. Bajaj for achieving the highest post in their respective profession. Dr. Seth and Mr. Bajaj have given the brief overview of the developments in the field of Communication and Power sector respectively.**

**LECTURES**

- 5. The Chapter has initiated along with Department of Information Technology “ A Series on Current Topics of Interests in IT Sector by Eminent Experts “ under the**

**Distinguishing Lecture Programme. The lecture is arranged once in every month.**

**During 2003, the following lectures were arranged: -**

- **Software AND Silicon – Opportunities for India** By Prof.S.Sadagopan, IIT, Bangalore and Mr. Kiran Karnik, President, NASSCOM
- **Innovation and Technology in Education** by Shri Rajendra S.Pawar, CMD, NIIT
- **E-Government: Opportunities and Challenges in India** by Prof.S.C.Bhatnagar, IIM, Ahmedabad
- **IT Roadmap for India** By Prof.D.B.Phatak, IIT, Mumbai
- **Soft Computing, Machine Intelligence and Data Mining** by Prof.Shankar K.Pal, ISI, Kolkata
- **India – A Global R&D Destination** by Shri Hanumant Talwar, Vice President, GE Capital.
- **Status of Bioinformatics in India** by Prof. Ashok Kolaskar, VC Pune University.
- **Neuroinformatics: linking molecules to behaviour** by Prof. Vijayalakshmi Ravindranath, Director, National Brain Research Center
- **International Space Station Communication System** by Prof. Zafar Taqvi, Professor, Communications and Tracking, International Space Station, The Boeing Company, USA and Professor at University of Houston Clear Lake
- **Information Storage: Where are we heading far** by Prof. D.K.Pandya, IITDelhi

**The average an attended during these lectures were 125 with 25 members from IEEE. The details of presentations on the above lectures can be seen at**

**[www.mit.gov.in](http://www.mit.gov.in)**

- 6. The Chapter supported Celebrations of World Telecommunication Day with a theme “Helping all of the World’s people to communicate” along with the Institute of Telecommunication Engineers – India on May 16, 2003 at New Delhi.**
- 7. The Chapter arranged in cooperation with Institution of Electronic Data Processing a Lecture on “INDIA: E-READINESS ASSESSMENT” by Mr. S. Ramakrishanan, DIT New Delhi on July 5,2003.**
- 8. The Chapter arranged in cooperation with Institution of Electronic Data Processing a Lecture on “Info Tech to Knowledge Management Road A Head by Mr. C S Arora on October 18,2003 at New Delhi.**
- 9. The Chapter organized a lecture on “Quantum Well and Quantum Dot Intermixing for Optoelectronic Device Integration” by Professor Chennupati Jagadish, Australian National University on DECEMBER 23<sup>rd</sup>, 2003 at University of Delhi South Campus, New Delhi.**
- 10. The Chapter arranged a lecture under Distinguishing lecture programme under the series on lectures on Current Topics of Interests in IT by eminent experts by Prof. Zafar Taqvi, Professor, Communications and Tracking, International Space Station, The Boeing Company, USA and Professor at University of Houston Clear Lake on “International Space Station Communication System” on 29th December, 2003, at Department of Information Technology New Delhi.**
- 11. The Chapter supported the lecture organized to mark the National Technology Day on “Next Generation Internet” by Mr. S. Ramakrishanan, DIT New Delhi at IIC on May 12,2003.**

## CONFERENCES/WORKSHOPEs

12. The Chapter has arranged and participated in ELITEX'2003 (Electronics & IT Exposition) – an annual event of the Department of Information Technology. Shri Arun Shourie, Hon'ble Minister of Communications & Information Technology and Disinvestments inaugurated the event. Dr.R.Chidambaram, Principal Scientific Adviser to the Government, delivered the keynote address. Both the Hon'ble Speakers mentioned the importance of R&D and initiatives required to position INDIA as a Global destination for R&D. The role of close association between Academia, R&D institutions and industries emerged clearly and emphasized. The Hon'ble Minister has announced the establishment of new institutions in the area of microelectronics and nano technologies and assured his full support for the R&D activities in the frontier areas of technologies. During the inauguration, the following products/technologies were released: -

- Release of e-Readiness report for INDIA
- Digital Mobile Library
- “Digital Set Box” developed by C-DAC, Noida
- “C-Crypto” – software tool developed by C-DAC, Noida
- “Urdu Nashir” – Word Processor developed by C-DAC, Pune
- “Single Chip Phone IC” developed by SCL
- Vishva Bharti – Release of CD containing all the volumes of “Vishva Bharti”. A publication from DIT giving the latest development in the field of multilingual technology.
- Angla-Hindi-Web based Translation

The Seminar Sessions were held on the theme of ELITEX'2003 was “*Moving up the Value Chain: India – A Global Destination for R&D*”, Technology Incubation, Global IP Protection & Partnership, Emerging Growth areas, Innovation to enhance

**Digital Unite, R&D Led Success Stories and Human Resource Development Initiatives. Seminar Sessions also covered Enhancing e-Readiness as well as Technologies developed under DIT in Electronics and IT. All the sessions attracted large participants. Besides creating awareness about DIT technologies, ELITEX'2003 promoted R&D industry linkages essential for the absorption of indigenous technology by the industry and for stimulating innovations. Further details on ELITEX are available at**

**[www.elitexindia.com](http://www.elitexindia.com)**

- 13. The Chapter provided technical support to ISMOT-2003 held in Ostrava, Czech Republic from August 11-15, 2003.**
  
- 14. The Chapter sponsored a five day Lecture Course on Synthetic Aperture Radar and its Applications by Professor Siva Prasad Gogineni (Deane E. Ackers Distinguished Professor of Electrical Engineering and Computer Science at the University of Kansas, USA) during 27-31 January 2003 at The Vasavi College of Engineering, Hyderabad. Thirty-one participants, including 12 students (7 of whom are IEEE Student Members) attended this workshop. Course outline consisted of the radar fundamentals, real aperture radar, synthetic aperture radar, SAR design and review of some results from earlier SARs, SAR applications, and current and future research in this area. Each of the five days consisted of two hours of lecture, 30 minutes formal discussion, and practical demonstrations during after-noon sessions. Feedback received was positive.**
  
- 15. The Chapter technically supported two weeks' course on multimedia technology and applications at Aligarh Muslim University during January 2004.**

- 16. The Chapter supported 5th International Workshop IWDC'2003 at Calcutta during 27-30 Dec. 2003 jointly organized by IIM-Cal with Jadavpur University.**
- 17. The Chapter provided technical support to “e Information Systems, Security and Audit Association-2003 Conference” - Advisory Committee. At New Delhi July 24<sup>th</sup> 26,2003.**
- 18. The Chapter supported and organized 34th Mid Term Symposium on "WIRELESS AND WIRELINE FUTURE SCENARIO" on 3rd and 4th April 2003 in Mumbai.**
- 19. The Chapter provided technical support to the International Conference on Advanced Optoelectronics and Lasers (CAOL'2003) Alushta, Crimea, Ukraine, (September 16 to September 20, 2003) and 5th International Workshop on Laser and Fiber-Optical Networks Modeling (LFNM'2003) as an Advisory Member to the Committee.**
- 20. The Chapter provided the technical support in arranging a talk of Prof. Yakkov Bar-Shalom, an expert in Target Tracking and Data Fusion, who is a Distinguished Lecturer of IEEE and a Fellow, under DLT programme at Bangalore during International Radar Symposium 2003 (IRSI) during 2-5th December 2003.**
- 21. The Chapter sponsored the National Symposium on Microwaves and Lightwaves held in October 11-14, 2003 at South Campus, University of Delhi.**
- 22. The Chapter provided technical support to the SIMPOTIC'2003 held at SLOVAKIA during October 26-28, 2003.**

- 23. The Chapter technically sponsored Indian National Academy of Engineering (INAE) Conference on Nanotechnology (ICON-2003) held at Central Scientific Instruments Organisation (CSIO), Chandigarh, India on December 22 – 23, 2003**
  
- 24. The Chapter supported for conducting a Workshop for Teachers of Engineering and Science Colleges and Polytechniques on Fibre Optics and Networking at Bangalore in October 2003.**
  
- 25. The Chapter provided technical support for a workshop on "Densed Wavelength Division Multiplexing (DWDM) and Optical Networking. Program" conducted from 28th to 30th November 2003 at Bangalore.**
  
- 26. The Chapter provided and sponsored INCEMIC 2003 held at SAMEER Madras during December 2003.**
  
- 27. The Chapter technically supported the 38th National convention of CSI in Delhi from October 9-11, 2003 at New Delhi on the theme " ICT for Prosperity of Mankind".**
  
- 28. The Chapter technically supported IEEE TENCON 2003 Convergent Technologies for the Asia Pacific during Oct 14-17, 2003 at Bangalore sponsored by IEEE Region 10.**

## **STUDENTS ACTIVITIES SUPPORT**

- 29. The Chapter took initiatives to approach IEEE Foundation for initiating student's projects at State Engineering Colleges. The Chapter has also committed initial financial support to such projects.**
- 30. The Chapter sponsored the Students seminar on "Wireless Technologies" in February 2003 at IIT Delhi.**
- 31. The Chapter sponsored 25th Annual Festival, Rendezvous 2003 organized by the Students of IIT Delhi.**
- 32. The Chapter supported a National level Students Paper Presentation Competition at Sarvajanik College of Engineering and Technology, Surat, Gujarat.**
- 33. The Chapter has supported the IEEE – Jim's ENCONMIUM' 2003 All India Technical Festival organized by the Jamia Millia Islamia students Chapter.**
- 34. The Chapter has arranged Student Travel Grant for Presentation of paper during INTERMAG'2003 by IIT Delhi Students.**
- 35. The Chapter technically supported the Second Consecutive State Level Engineering Undergraduate Techno festival – KSHITIJ-2003 organized by Sarvajanik College of Engineering & Technology, Surat.**
- 36. The Chapter supported the activities of Student Branch of IEEE at Amity School of Engineering and Technology (ASET), New Delhi.**

**37. The Chapter has supported the IEEE – JMI's ENCONMIUM' 2003 All India Technical Festival organized by the Jamia Millia Islamia students Chapter.**

#### **PROMOTIONAL ACITIVITES**

**38. The Chapter has taken initiatives of form "IEEE Women Engineering Chapters". Three Chapters at Delhi, Pune and Bhopal has already started functioning.**

**39. The Chapter has taken initiatives of renewing the membership of some of the members after a gap of 5-10 years. These members had discontinued their interest in IEEE that has been revived.**

**40. The Chapter sponsored the names of Prof.K.Tyagrajan, Prof.Barothi Sinha, Prof. Chander Kumar Sarkar and Prof.Govind for the Distinguished Lectures Programme of LEOS and Communications Society.**

**41. The Chapter had sent its technical input to the Global Communications Newsletter, which have been published in IEEE Communications Magazine from time to time.**

**42. The Chapter has widely circulated the offers made by IEEE-LEOS Society for free membership and half year's free membership of the Communication Society to students. 34 applications in this regard were sent to LEOS Office.**

**43. The Chapter sponsored 15 applications for the elevation to IEEE Senior Members.**

**44. The Chapter coordinated the DLT Programmes arranged by the Communications Society in India.**

- 45. The Chapter has widely circulated the Notifications and New Conferences announcement from various societies of IEEE.**
- 46. The Chapter provided the proceedings of different conferences organized by IEEE in India to some of the developing countries free of cost.**
- 47. The Chapter motivated members from India to participate in the IEEE Annual Elections and also in the IEEE Communications Society and LEOS Society Elections.**
- 48. The Chapter provided functional support to IEEE Communications Society for maintaining the Sister Society cooperation with Institution of Electronics & Telecommunications Engineers, India.**
- 49. The Chapter provided technical support in reviewing some of the articles of IEEE Vehicular Technology Society News publication.**
- 50. The Chapter Chair had participated in the Annual LEOS Chapter Retreat held on 26 October, 2003 in Tucson, AZ. LEOS provided all financial support for the same.**
- 51. The Chapter provided necessary inputs for the publication of IEEE India Council Bulletin and Delhi Section Magazine (BECONS).**
- 52. The Chapter provided technical support in providing IT Education and training in Vietnam through the Indian Organization NIIT.**
- 53. The Chapter donated free publications of IEEE Magazines to some of the Engineering Colleges particularly the Women Engineering Colleges.**

## **COMMITTEMENTS**

- 54. The Chapter has committed to sponsor the forthcoming Asia-Pacific Microwave Conference 2004(APMC'04) scheduled for December 15-18,2004 organized by the University of Delhi, South Campus. New Delhi India.**
- 55. The Chapter committed to provide technical support to the International Conference on E-Business and Telecommunication Networks (ICETE-2004) to be held in Setúbal (Portugal) during August 25-28, 2004.**
- 56. The Chapter committed to provide technical support for a lecture on “Physics & Design of Low Noise Avalanche Photodiodes” by Dr. John P.R. David, University of Sheffield, U.K. at Delhi.**
- 57. The Chapter committed to provide technical support for the Inter-American Organization of Higher Education which includes about 400 universities, and EISTA's Organizing Committee to organize the International Conference on Education and Information Systems: Technologies and Applications EISTA 2004, to be held in Orlando, Florida, USA, in July 21 - 25, 2004.**