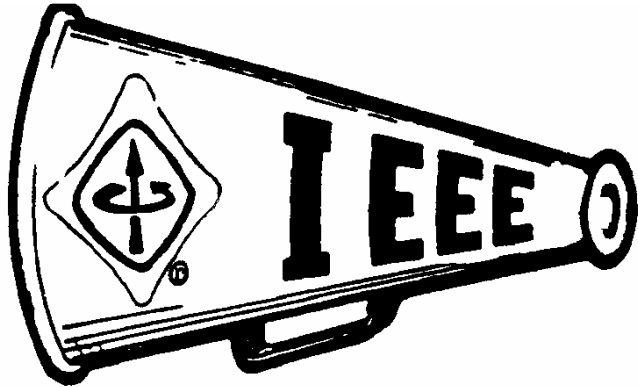


The Valley Megaphone



Newsletter of the
**Institute of Electrical and
Electronics Engineers, Inc.**
Phoenix Section
July 2006, Volume XX, Number 7

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IEEE Phoenix Section Executive Committee meeting minutes can be found at: <http://www.ieee.org/phoenix>

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The Valley Megaphone is the newsletter of the Phoenix Section of the Institute of Electrical and Electronics Engineers. It is published monthly and reaches about 4000 members. Submit articles, advertisements, and announcements to Eric Palmer at the above email address. Deadline for announcements and advertisements is the third Friday of the month prior to publication. Advertising Rates: Full page: \$200, 3/4page: \$125, 1/2 page: \$75, 1/3 page: \$50, 1/4 page: \$25. Change of address/email? Call toll free 1-800-678-IEEE. Please allow 6-8 weeks. Section Web Page is: <http://www.ieee.org/phoenix>

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Phoenix Section Executive Committee Meeting – First Tuesday of the month.

Time: 6:00 pm to 8:30 pm

Place: Phoenix Airport Hilton, 2435 South 47th Street
Phoenix, AZ, 85034
Phone: 480-804-6017

Directions: From 143, exit University Ave, go west, turn right on 47th street.

More Info: Meetings held first Tuesday of month. No meetings in July and August. All interested IEEE members are welcome to attend.

Contact: Rao Thallam, Phoenix Section Chairman, ph: (602) 236-5481 or e-mail: thallam@ieee.org



THE INSTITUTE OF ELECTRICAL AND ELECTRONICS ENGINEERS, INC.



IEEE Components, Packaging and Manufacturing Technology Society
Phoenix Chapter
Wednesday, July 19th, 2006 Meeting

Optoelectronics is Again Vibrant and Penetrating Many New Markets...

Dr. Michael Lebby
President and Chief Executive Officer (CEO)
Optoelectronics Industry Development Association (OIDA)
Washington, DC, USA

Abstract

The OIDA perspective on the global optoelectronics markets and technology vectors will be reviewed in this presentation. In particular, the talk will give the OIDA view on the global HBLED, laser diode, communications, solar cell, image sensor and display industries with major technological trends. The talk will include technology roadmaps, applications and future opportunities. In particular the talk will give an update on the results from OIDA's 2006 roadmap forums on artificial vision, high power lasers and nitride based materials. In addition, the talk will discuss the upcoming roadmap forums on 100Gbps data-rates, silicon photonics and optoelectronic packaging & miniaturization for that will be held later in 2006.

Biography

Dr. Michael Lebby received his D. Eng., Ph.D., MBA and B. Eng. (Hons.) from the University of Bradford, England in 2004, 1987, 1985 and 1984, respectively. More recently, Dr. Lebby received an honorary Doctorate (D. Eng) by the University of Bradford in 2004 for his contributions to the field of optics, optoelectronics, and fiber optic packaging. Since 1977, he has been employed by the British Government, AT&T Bell Laboratories, Motorola, and AMP (now Tyco) in senior technical and business optoelectronic and fiber optic roles. In 1999, Dr. Lebby joined Intel as a venture capitalist and was instrumental in a number of private equity deals in optoelectronic components and networking. In 2001 he founded a new fiber optics company, Ignis Optics, where he served as CEO and Board member. He successfully raised two rounds of financing (with step-ups) that exceeded \$30M during 2001 (also in risk adverse environment) and the company was subsequently acquired by Bookham Technology in October 2003, where he was responsible for corporate and technical strategy. Dr. Lebby is now the president and CEO of OIDA (Optoelectronics Industry Development Association) based in Washington DC. He is growing OIDA into a stronger marketing, technology, and governmental body for its membership. OIDA is known for its technology roadmaps, workshops, industry networking, and government policy. Dr. Lebby frequently provides tutorial lectures, speeches, and courses to senior executives on the dynamics, both economically and technologically, on the optical networking environment. He also advises at the Board level at a number of optical component start-ups in both Europe and the United States. A Fellow of IEEE, Dr. Lebby also holds more than 170 issued US patents and has published and presented regularly in the optoelectronics field. Including international issued (over 57) and pending patents (over 39), the number totals well over 250.

Date: Wednesday, July 19th, 2006
Location: Group Conference Room, Freescale Semiconductor, Inc., 2100 E Elliot Rd. Tempe, Arizona
Enter the facility through the Main (South) lobby, by the flag poles; you will be escorted to the meeting venue.
Time: 5:30-6:00 Social/Refreshments, 6:00-7:00 Presentation, 7:00 Dinner
(Pizza and Soda are being provided by the IEEE CPMT Phoenix Chapter)

IEEE members and non-members all are welcome to attend. Those who plan to attend should be at the facility entrance no later than 6:00 pm, as there will be no escorts available after that.

For more information please call any of the following officers:

Vivek Gupta (480) 554-2195
Vasu Atluri (480) 554-0360

Debendra Mallik (480) 554-5328
Mali Mahalingam (480) 413-5368

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Victor Prokofiev (480) 552-0228

**15th Topical Meeting on
Electrical Performance of Electronic Packaging**

EPEP 2006

October 23–25, 2006

Scottsdale, Arizona

Sponsors:

IEEE Components, Packaging and Manufacturing Technology Society

IEEE Microwave Theory and Techniques Society

Call for Papers

The **general subject of the meeting** is the electrical modeling, design, analysis, and characterization of electronic interconnections and packaging structures. Authors are invited to submit papers describing new technical contributions in the areas broadly covered below:

- Current and future issues related to on-chip interconnections
- Router friendly models and modeling tools: accuracy & efficiency
- Modeling and design of high speed digital I/O circuits: signal propagation and reception
- On-chip power delivery and regulation
- Advances in modeling core switching noise, and design of novel solutions
- On-chip measurement techniques
- Package analysis, including numerical methods
- Electromagnetic analysis tools
- Advances in transmission-line techniques
- Power distribution and package resonance
- Long distance propagation in large switching complexes
- Switching noise in multi-layered systems
- Macromodeling techniques
- Signal integrity in mixed signal integrated circuits
- Electrical issues in MEMS packaging
- New and innovative interconnect packaging structures and their electrical performance
- RF/microwave packaging structures and their electrical performance
- MMIC modules and high density packaging
- Experimental characterization techniques
- EMC/EMI sources & effects
- Prediction/measurement of radiation from on-chip sources, interconnect structures and packages
- Electrical design implications for low cost, high volume packaging
- Packaging concerns for wireless communication: design and modeling
- Packaging solutions for on-chip radios: design and modeling
- Performance of packaging for automotive radar systems

Conference Co-chairs: Moises Cases, IBM; Paul Franzon, North Carolina State University

Conference Web Page: Detailed information can be found at <http://www.epep.org>

Paper Submission: Information for authors can be found on the conference web page. Electronic submissions of no more than four pages must be received no later than **July 10, 2006**.

Student Paper Award: Two awards will be presented to the best two papers submitted by students.

Short Courses/Workshops: On Sunday, October 22, 2006, a workshop entitled "Future Directions in Packaging" will be presented and short courses/tutorials will be offered.

Contacts:

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Paul Franzon, e-mail: paulf@ncsu.edu

Kelly Sutton, e-mail: epd@engr.arizona.edu

Power Engineering Society:

The Power Engineering Society is on summer break and will resume regular meeting in September. In the mean time, start planning on participating in the **Phoenix Chapter PES Golf Tournament** which will be held on Saturday September 23 at the Antelope Hills Golf Club in Prescott.

Check our web site later this summer for more details: <http://ewh.ieee.org/soc/pes/phoenix/>

IEEE Phoenix Area Consultants Network July Meeting:

Building the World's Largest Solar Power Plant

Date: Thursday, July 13, 2006

Time: Networking begins at 6:30 p.m.

Dinner begins at 7:00 p.m.

Program starts at 8:00 p.m.

Place: Denny's Restaurant

3315 N. Scottsdale Rd. (at Osborn)

Scottsdale, Arizona 85251

Abstract: Our July meeting will feature Lane Garret, founder of ETA Engineering, an Arizona leader in the field of renewable energy. Lane will speak about his latest venture – the construction of the world's largest photo-voltaic power plant to date, in Deming, New Mexico.

For more information, contact Vaughn Treude, vaughn@nakota-software.com, or see the IEEE PACN website, ieeepacn.com.



Institute of Electrical and Electronics Engineers, Inc. Phoenix Section

Components, Packaging and Manufacturing Technology Society Chapter
&
Waves and Devices Chapter

PRESENT AN ALL-DAY WORKSHOP ON

Convergence in Communication and Computing

Date: Friday, November 17th, 2006

Time: 7:00 A.M. – 5:00 P.M.

Location: Arizona State University, Tempe, Arizona – ASU Memorial Union (Arizona Room)

Abstract

The convergence of mobility, seamless connectivity, and broadband access are the underpinning of next-generation communication systems. Several new applications such as video-conferencing and wireless multimedia are emerging to leverage this capability. Many communication platforms (3G Cellular, WiMax, WLAN, etc.) compete to provide the best solutions for consumer needs in communication, computing and entertainment products. Technology challenges - component through system level - abound for realizing such opportunities at a marketable price point. This one day workshop will bring together experts from industry, academia, government labs, and the financial community to share market visions and to discuss technology issues, options, opportunities and emerging standards. The goal is to provide a comprehensive view of the challenges facing system, device, interconnect and packaging technologies. A panel discussion on the "Future of Convergence in Communications" will bring closure to the day's workshop. Vendors in the entire supply chain will display their products and services throughout the day.

Topics

- Vision – A View of the Future of Convergence
- Market – Current Status and Future Trends
- Business Model
- System and Architecture
- Communication Technology Options and Standards
- Device Technology – RF, Microwave, Analog, and Base Band / Graphic Processing
- Packaging – Mobile Products and Infrastructure
- Antenna / Propagation
- System Integration
- Panel discussion on the Future of Convergence in Communications

Vendor Displays

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