

INTERNATIONAL MAGNETICS CONFERENCE



SAN DIEGO, CALIFORNIA, MAY 8-12, 2006

GENERAL CHAIRMAN

Romel D. Gomez
Electrical and Computer Engineering
University of Maryland
College Park, MD, USA
rdgomez@eng.umd.edu

PROGRAM CO-CHAIRS

Shan X. Wang
Department of MSE and EE
Stanford University
Stanford, CA, USA
sxwang@ee.stanford.edu

Bruce Terris
Hitachi Global Storage Technologies
San Jose Research Center
San Jose, CA, USA
Bruce.Terris@hitachigst.com

TREASURER

Doug Lavers
Electrical and Computer Engineering
University of Toronto
Toronto, ON, Canada
lavers@ece.utoronto.ca

PUBLICATION CHAIR

Robert Shull
Division of Metallurgy
National Institute of Standards and
Technology
Gaithersburg, MD, USA
rdshull@nist.gov

PRINTING AND PUBLICITY CHAIR

Petri Andrei
Electrical and Computer Engineering
Florida State University and
Florida A&M University
Tallahassee, FL, USA
pandrei@eng.fsu.edu

INDUSTRIAL LIAISON AND EXHIBITS CHAIR

Liesl Folks
Hitachi Global Storage Technologies
San Jose Research Center
San Jose, CA, USA
Liesl.Folks@HitachiGST.com

FACILITY MANAGEMENT CHAIR

Charles Kraft
Laboratory for Physical Sciences
College Park, MD, USA
kraft@lps.umd.edu

CONFERENCE ADMINISTRATION

Diane Melton
Courtesy Associates
Washington, DC, USA
Intermag2006@courtesyassoc.com

Dear Colleague,

It gives me great pleasure in inviting you to participate in the International Magnetics Conference, Intermag 2006, which will be held from Monday, May 8 to Friday, May 12, 2006, at the Town and Country Resort and Conference Center in San Diego, California. Intermag is the premier conference on applied magnetics and information storage technologies. Members of the international scientific and engineering communities interested in magnetics and associated technologies will benefit greatly from the exciting and informative set of invited talks, tutorial sessions, oral and poster presentations, and exhibitions reviewing the latest developments in these fields.

With this Call for Papers, we invite you to attend the Conference and contribute to one or more of its technical sessions. We are now soliciting contributed papers in all areas of applied magnetics, magnetic recording technologies, and related fields. Please review the attached list of technical categories. Interested authors are requested to submit a two page digest online at <http://intermag.abstractcentral.com>, on or before **December 19, 2005**. The web site will contain detailed instructions on digest preparation and submission procedures. All accepted oral presentations are to be made using LCD projectors connected to the author's personal computer. I also urge you to visit the continually-updated Conference web site which will provide information on the Conference location, the City of San Diego, Conference registration, hotel reservations, and other Conference related announcements.

On behalf of the Management Committee of Intermag 2006, I look forward to seeing you all in San Diego and your contributions to an exciting conference.

Sincerely,
R. D. Gomez
General Chairman
September 2005



FINAL CALL FOR PAPERS



DIGEST SUBMISSION DEADLINE

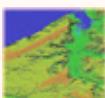
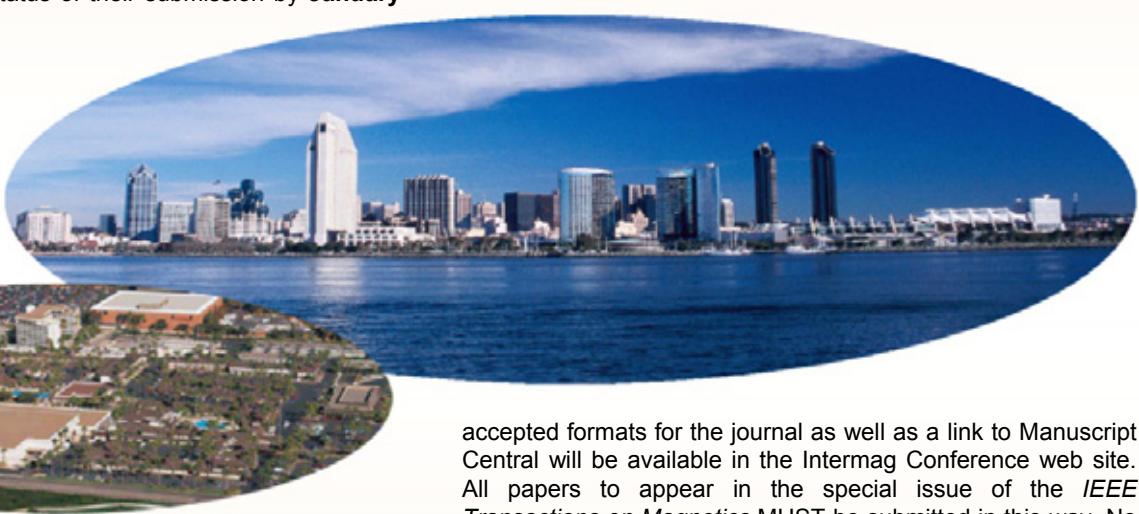
Digest submission will start on **November 7, 2005**.

- Digests must be submitted no later than the **December 19, 2005**, deadline. This deadline will be strictly observed.
- All digests must be submitted via the WEB submission system ONLY. Digests sent via e-mail, fax, or regular mail, will not be processed or acknowledged.
- Digest submission should be in the form of a two (2) page summary. More details about the format will be posted on the Conference web site.
- Read and follow the submission procedures, which will be available at each step of the process. If you have questions about this procedure, please contact Intermag 2006 Secretariat by e-mail: intermag2006@courtesyassoc.com or use the help menu on the web site.
- Digest acceptances will be announced via e-mail. Authors will be informed of the status of their submission by **January 23, 2006**.



PUBLICATIONS

Selected papers from the Conference will be published in a special issue of the *IEEE Transactions on Magnetics*. Detailed instructions on the preparation of manuscripts for submission to the journal will be available in the Conference web site for authors whose papers are accepted for presentation at the Conference. The maximum paper length is six journal pages for invited papers and three journal pages for contributed papers. All manuscripts must be received no later than **March 13, 2006**. This deadline will be strictly observed. Postdeadline manuscripts will not be accepted nor forwarded for review. Authors are reminded that the review standards will mirror those used for regular articles in *IEEE Transactions on Magnetics*, and that, because of the time constraints, a second review will not be possible for resubmitting papers that were initially rejected. In order to be published in the Proceedings, papers must be presented at the Conference by an author registered at the Conference. All manuscripts will be submitted at the IEEE web submission system, Manuscript Central. Instructions for submission and



LOCATION

The City of San Diego offers a wide variety of things to see and do as well as a climate that is mild and pleasant all year. For complete information about traveling to San Diego visit the web site at: www.sandiego.org. There you can obtain a travel and vacation planning guide, current weather information, and maps of the area of both the downtown and the area surrounding the Town and Country Resort and Conference Center where Intermag 2006 will be held.

The Town and Country is located in San Diego's Mission Valley, and is served by the new lightrail trolley system. Complimentary parking is also available. All Conference activities are located on one level, with easy access for all. The Intermag Conference sleeping room rates will be \$139/single or \$149/double plus tax. More complete information and room reservation forms will be available on the Intermag Conference web site in January 2006.

accepted formats for the journal as well as a link to Manuscript Central will be available in the Intermag Conference web site. All papers to appear in the special issue of the *IEEE Transactions on Magnetics* MUST be submitted in this way. No paper manuscripts will be accepted. Reviewing and revisions will all be handled through the online system. Information about the IEEE system will be available online in the near future.



DIGEST GUIDELINES

Authors should make every effort to present their work clearly, accurately, and completely. It is important to convey information effectively to colleagues, as there has been an increase in the number of submitted digests in recent years. To maximize your chances of acceptance, please strictly follow the guidelines and keep in mind the digest acceptance criteria used by the Program Committee. For details, please refer to the Conference web site at:

<http://www.intermagconference.com/intermag2006>.

FINAL CALL FOR PAPERS



PRESENTATION OF CONTRIBUTED PAPERS

Contributed papers accepted for the Conference will be presented either orally or by poster. Oral presentations will be in the conventional format of a twelve-minute talk by the registered author using a PC projector, followed by a three-minute discussion period. Presenters should bring their own PC. It is advised bringing a USB flash memory backup. For poster presentations, clear descriptive visual material should be arranged within the designated board size (to be announced later). The author must be present to provide details and answer questions during the poster session. Authors are requested to indicate their preference for oral or poster presentations in the field provided on the electronic form. The Program Committee will make the final decision on the assignment of papers to the sessions and on the presentation format for each session. In the e-mail notice of acceptance, authors will be notified of the type of session for their presentations. They will also receive a URL for detailed rules and instructions for an effective presentation.



STUDENT TRAVEL GRANT

The IEEE Magnetics Society will award travel grants of up to \$750 each to a limited number of students working in basic and applied magnetism. These grants are intended to partially offset travel costs to attend Intermag 2006. Support is for current graduate students only, including Ph.D. candidates and students in Masters only programs. Postdoctoral fellows, undergraduates or non-students are not eligible. Preference will be given to students who are Student Members of the Magnetics Society, nearing completion of their graduate studies and presenting Conference papers. Preference will also be given to student's whose advisors are members of the Magnetics Society. Students who have previously received travel support from the Magnetics Society are not eligible. Shortly after the Conference grant recipients must submit a short account of their experience for possible inclusion in the Magnetics Society Newsletter. To apply, forms and instructions will be available at

www.intermagconference.com/intermag2006. The student's advisor must write a brief letter of endorsement for the student. Two brief letters of endorsement from full members of the Magnetics Society are also required (one may be the advisor's endorsement if the advisor is a member). Applications AND all letters of endorsement must be submitted before February 28, 2006. Inquiries should be sent to the Student Travel Grant Co-Coordinators: Matthew J. Carey, Hitachi GST, San Jose, CA (matthew.carey@hitachigst.com) and Sara Majetich, Carnegie Mellon University, Pittsburgh PA (sm70@andrew.cmu.edu). Visit the Magnetics Society web site at www.ieemagnetics.org.

EXHIBITS AND SPONSORSHIPS

Intermag Conference Partners and Exhibitors support the Intermag Conference because of the exceptional opportunities it provides for the education, development, and growth of the Magnetism industry. The Partners' contributions directly offset Conference costs such as Program Committee expenses, beverage services, and audiovisual equipment enabling the organizers to keep the registration fees as low as possible without compromising the quality of the technical and social programs. Intermag Conference Partners also enjoy access to the latest results in the field of Magnetism, and the quality and diversity of our Conference attendees provides our Partners with exceptional marketing and public relations opportunities. To obtain information on becoming a Partner, Exhibitor or Sponsor, please contact the Exhibits Coordinator at: intermag2006@courtesyassoc.com.



VISA REQUIREMENTS FOR ENTRY INTO THE USA

Citizens of other countries must carry a valid passport and current visa to enter the USA. Foreign participants should contact the United States Embassy, Consulate, or Office of Tourism in their home country as soon as possible to determine their particular visa requirements. If you need a personal letter of invitation to attend Intermag 2006, please contact Courtesy Associates at intermag2006@courtesyassoc.com. You must provide your full name and complete mailing address. An original, signed letter will be sent to you via standard mail service since only an original copy (not faxed or e-mail version) will be accepted with the visa application. Please note that the Intermag Conference cannot and will not contact or intervene with any U.S. Embassy or Consulate office on a participant's behalf. We strongly urge you to begin the process immediately to obtain a visa.

The **Visa Waiver Program** (VWP) enables nationals of certain countries to travel to the USA for stays of 90 days or less without obtaining a visa. Not all countries participate in the VWP, and not all travelers from VWP countries are eligible for this program. All travelers to the USA must now carry machine-readable passports. Those machine-readable passports issued after **October 25, 2005** require a digital photograph printed on the data page or an integrated chip with information from the data page. To determine if your passport is in order, and whether or not you require a visa, you must check locally with your country's embassy or consulate.



FINAL CALL FOR PAPERS



TECHNICAL SUBJECT CATEGORIES

Magnetic Recording

- 1a. Particulate media and ME tape
- 1b. Longitudinal recording media
- 1c. Perpendicular recording media
- 1d. Patterned media
- 1e. Inductive recording heads and materials
- 1f. MR-based heads (including GMR, spin-valves, MTJ, CPP, etc.)
- 1g. Recording physics, models and theory
- 1h. Head-media interface and tribology
- 1i. Recording systems, coding, servo, and channels
- 1j. Magneto-optic, hybrid, and novel recording

Spin Electronics and Applications (Non-Recording)

- 2a. GMR of multilayers, magnetic contacts, and constrictions
- 2b. Magnetic tunnel junctions
- 2c. Current induced switching
- 2d. Magnetoresistive oxides and semi-metallic materials
- 2e. Magnetic semiconductors
- 2f. Transport theory and spin injection
- 2g. MRAM
- 2h. Magneto-couplers, logic, and other magneto-electronic devices

Soft Magnetic Materials and Applications

- 3a. Crystalline, nanocrystalline, and amorphous materials
- 3b. Ferrites, magnetic oxides and other materials
- 3c. Magneto-dielectric materials or meta-materials
- 3d. Applications

Permanent Magnet Materials and Applications

- 4a. Intermetallic and other hard magnets
- 4b. Nanostructured hard magnetic materials
- 4c. Rare earth transition metal borides
- 4d. Hard magnet processing
- 4e. Applications

Magnetic Thin Films and Nanostructures

- 5a. Ultra-thin films and surface effects
- 5b. Multilayer films and superlattices
- 5c. Patterned films and elements
- 5d. Magnetic clusters and nanoparticles
- 5e. Exchange bias
- 5f. Fast switching of films and nanostructures

Other Magnetic Materials and Non-Recording Applications

- 6a. Microwave materials and devices
- 6b. Magneto-optic materials and devices
- 6c. Magneto-elastic materials and devices
- 6d. Molecular and novel magnetic materials

Modeling and Computational Magnetism

- 7a. Modeling and computational magnetism

Characterization and Imaging

- 8a. Magnetic and structural measurements and instrumentation
- 8b. Magnetic microscopy and imaging

Sensor, High Frequency, and Power Devices

- 9a. Magnetic sensors (other than for recording)
- 9b. Microwave and millimeter wave devices
- 9c. Magnetoimpedance and high frequency properties
- 9d. Electromagnetic compatibility
- 9e. Transformers and inductors
- 9f. MEMS
- 9g. Motors and actuators
- 9h. Power and control magnetics
- 9i. Magnetic fluids and separation
- 9j. Shielding, levitation, and propulsion

Life Sciences and Applications

- 10a. Bio and chemical magnetism
- 10b. Measurement and instrumentation
- 10c. Magnetic field effect

Physics and Interdisciplinary Topics

- 11a. Fundamental properties with relevance to applications
- 11b. Magnetic structure and domains
- 11c. Superconductivity
- 11d. Miscellaneous

November 7, 2005	Digest Submission Begins
December 19, 2005	Deadline for Digest Submission
January 30, 2006	Advance Registration Opens
March 13, 2006	Deadline for Manuscript Submission
April 10, 2006	Advance Registration Closes
April 10, 2006	Hotel Reservation Cutoffs