ANS NEWSLETTER

AUGUST 2002

RADIATION PROTECTION AND SHIELDING DIVISION

http://rpsd.ans.org

OFFICERS AND CHAIRS OF STANDING COMMITTEES

Chair

Jeffrey O. Johnson Phone 865-574-5262 Fax 865-574-9619 johnsonjo@ornl.gov

Vice-Chair / Chair-Elect

John D. Court
Phone 505-665-5057
Fax 505-665-3046
davec@lanl.gov

Secretary

Larry F. Miller Phone 865-974-5048 Fax 865-974-0668 Ifmiller@utk.edu

Treasurer

Laurie S. Waters
Phone 505-665-4127
Fax 505-665-2897
lsw@lanl.gov

Immediate Past Chair / Nominating

Larry F. Miller Phone 865-974-5048 Fax 865-974-0668 lfmiller@utk.edu

Program

David R. Anderson
Phone 860-433-6584
Fax 860-433-0420
danders3@ebmail.gdeb.com

Membership

Chairman's Message (Jeffrey O. Johnson)

I would like to express my sincere appreciation for all of your support and contributions to the Radiation Protection and Shielding Division (RPSD). I look forward to serving as the chairman of the division for the coming year. I would also like to extend an invitation to our program and executive committee meetings at the ANS Winter Meeting in Washington D.C in November 2002. The Program Committee meeting will be in Room 252 of the Omni Shoreham Hotel, Monday, Nov. 18, 2002 from 5:00 to 6:00 p.m. This meeting is followed immediately by the Executive Committee meeting in the same room from 6:00 to 8:00 p.m. These program committee meetings offer you a chance to participate in the planning of our division's technical exchanges via Topical meetings and technical session at National meetings. The executive committee meeting offers you a chance to be directly involved with how we do business in RPSD and what directions we should take to insure the future growth of our division. These meetings are generally productive and well attended. If you cannot make the meetings and have suggestions you wish to be considered, contact one of the officers or committee chairs and they will bring the suggestion/request up for you.

There are several upcoming meetings mentioned in the Program Committee section below that I want to call your attention to. We had a very successful 2002 topical in Santa Fe and the organizers from the Local

W. Mark Blumberg Phone 301-415-1083 WMB1@nrc.gov

Benchmarks

Hamilton T. Hunter Phone 865-574-6297 Fax 865-574-6182 hunterht@ornl.gov

Honors & Awards

Bernadette L. Kirk Phone 865-574-6176 Fax 865-574-6182 kirkbl@ornl.gov

Standards Liaison

Bill Hopkins Phone 301-869-3705 Fax 301-869-7084 wchopkins@prodigy.net

Blizard Scholarship

Dan Ingersoll
Phone 865-574-6102
Fax 865-574-9619
ingersolldt@ornl.gov

ANS Trinity Section, especially Tom Hirons and Bob Little, deserve a hearty congratulations for a job well done. We also have several upcoming topical meetings we are either sponsoring or co-sponsoring that I encourage you to participate in. Two of these are international meetings, so be aware and make your plans early to support the technical exchange of your work at these meetings.

There are a couple of issues that were brought up at our last executive committee meeting in Hollywood Florida that I wish to call your attention to. First, the Professional Engineering Exam for Nuclear Engineering is in danger of being dropped due to lack of participation. With the potential for a growth in the nuclear industry, this could not come at a worse time. I am unclear as to what RPSD as a division can do to prevent this action, but I assure you the Executive committee will stay abreast of the situation. I welcome any suggestions you might have. Secondly, in the section under standards below, Bill Hopkins informed the committee that two of the ANS standards that our division has been supporting were dropped due to lack of revision or re-submittal. These are important standards for our work and Bill outlined what we need to do to get them re-instated. The division needs volunteers to help in this endeavor. Please contact, Bill Hopkins, Nolan Hertel, or Andy Hodgdon to help get these two standards re-instated. Finally, we are in need of a web page manager to maintain our web page. Bernadette Kirk has done this for us in her spare time (and we all know what spare time is) and is now ready to pass this task on to someone else. I would like to express my appreciation to Bernadette for her past efforts since I know "spare time" moments are few and far between. If someone is interested in taking over this task, please contact me. My understanding is that ANS National will help in getting the page up and running on the ANS server, and they may even have a template to use or modify for the information to put in. They will not, however, put any information in the page for the division. That task falls to us. So please, if you are interested in working on any of these issues contact me, or a member of the executive committee, and we will get you in contact with the right people.

Finally, I would like to introduce and welcome our

ANS National Board liaison. Each division has a member of the ANS National Board of Directors assigned to that division to act as a liaison. The National Board of Directors choose their divisions, and Sophie Gutner chose RPSD. If you have ideas or issues for the ANS national BOD, let Sophie know and she will either help answer the request for the board or bring the issue before the board on our behalf. This represents one additional avenue for interaction between the division and National to get our concerns heard and addressed. Welcome Sophie. I look forward to seeing all of you at the upcoming meetings and feel it is an honor to serve as your division chair.

EXECUTIVE COMMITTEE

2003

Stan L. Anderson

Phone 412-374-5165 Fax 412-374-5099 anderssl@westinghouse.com

Margaret B. Emmett

Phone 865-574-5276 Fax 865-574-3527 emmettmb@ornl.gov

Kimberlee Kearfott

Phone 734-763-9117 Fax 734-763-4540 kearfott@umich.edu

2004

David R. Anderson

Phone 860-433-6584 Fax 860-433-0420 danders3@ebmail.gdeb.com

Stephanie C. Frankle

Phone 505-665-6461 Fax 505-665-3046 frankles@lanl.gov

Nolan E. Hertel

Phone 404-894-3601 Fax 404-894-9325 nolan.hertel@me.gatech.edu

2005

Program Committee (David Anderson)

2002 RPSD Topical Meeting Report, Santa Fe New Mexico, April 14-18

The 2002 shielding topical meeting was held at the La Fonda Hotel, in Santa Fe, New Mexico. Congratulations to Tom Hirons, Bob Little and the entire organizing committee for putting on a very successful meeting. The Conference attracted a total of 248 registrants. Four half-day Workshops were held on Sunday. There were a total of 49 people in attendance at the Workshops (minimum of 9, maximum of 19).

The Conference opened on Monday morning with 5 speakers at the Plenary Session. Starting Monday afternoon and continuing through Thursday afternoon, four parallel technical sessions were held during each time period. A total of 182 papers were presented during these session (out of 218 papers originally accepted by the Technical Program Committee).

ANS Past-President Jim Lake was the speaker at the Monday luncheon. A memorial award to the late Charles Thomas was presented during the luncheon. In addition to the luncheon, there was a reception on Sunday evening, a banquet on Tuesday evening, and an exhibitor reception on Wednesday. Six vendors had displays in the Exhibitor area, near the Conference Registration desk. There were two Guest Tours (one of

John S. Bennion

Phone 208-282-3351 Fax 208-282-4538 jbennion@isu.edu

Don J. Dudziak

Phone 919-515-1465 Fax 919-515-5115 dudziak@ncsu.edu

Michele Sutton Ferenci

Phone 404-385-1736 Fax 404-894-9325 michele@radonc.emory.org

Ex-Officio

Don R. Hoffman

Phone 301-984-4400 Fax 301-984-7600 donaldh@excelsvcs.com

ANS Board Liaison

Sophie I. Gutner
Phone 804-747-7689
s_gutner@yahoo.com

ANS Staff Liaison

Sharon S. KerrickPhone 708-579-8230 Fax 708-352-0499

Santa Fe and the other to Los Alamos) and on the Friday after the meeting, over 50 attendees traveled to the Trinity Site in Southern New Mexico.

The Paper Review was conducted electronically, using the ANS Paper Review Web site (hosted by COS). A hard-copy abstract book was published and distributed at the Conference. Full papers were combined on a CD to form the Conference Proceedings, which also were distributed at the Conference. The large attendance at RPSD 2002 coupled with relatively low costs for publishing combined to make the Conference sizably profitable. Final details of the budget are still in process and should be completed during June or July.

2002 Winter Meeting, Washington, DC, November 17-21, 2002

The winter meeting will be held this year at the Omni-Shoreham Hotel. This hotel is next door to the Marriott where previous DC meetings have been held and can be easily reached from the same Woodley Park Metro stop. There are a number of special sessions planned for the winter meeting. Paper summaries were due to be submitted no later than July 8, 2002, through the ANS on-line paper submittal and review system. Paper review was scheduled for July 9-21. The RPSD sessions listed in the Call for Papers and the track numbers are:

- 7a Radiation Protection and Shielding: General
- 7c Radiation Sterilization
- 7d Detection and Dose Assessment for Alpha Emitters
 - 7f Highlights of RPSD 2002
- 7g History and Current Development in Dose Conversion
 - 8k Radiation Treatment Planning
 - 81 Radon and Lung Cancer

In addition, the winter meeting has two embedded topical meetings - The Eighth Emergency Response and Preparedness Topical Meeting and the Fifteenth Technology of Fusion Energy Topical Meeting.

2003 Annual Meeting

The 2003 Annual meeting will again be held at the Town and Country Hotel in San Diego. There are 4 special sessions planned for the meeting as of this writing:

- (1) Pressure Vessel Embrittlement
- (2) Radiation Based Non-Destructive Testing Techniques and Applications
- (3) Overview of Radiation Protection and Methodology on Research Reactors in Mexico
 - (4) ANS Joint Benchmark Effort

If you have an interest in any of these topics please consider submitting a summary for the meeting and presenting a paper in San Diego.

2004 RPSD Topical Meeting, Funchal, Madeira, Portugal.

The 2004 topical meeting will be combined with the 10th International Conference on Radiation Shielding (ICRS-10). Pedro Vaz (ITN-Portugal) and myself, David Anderson (Electric Boat Corporation, USA) are the Co-General Chairs of the combined topical meeting. Bernadette Kirk (RIAS/ORNL, USA), Laurence Miller (UT, USA), Takashi Nakamura (Tohoku Univ., Japan), and Enrico Sartori (OECD/NEA, International Co-ordinator) have agreed to serve as Co-Scientific Program Chairs. Letters of invitation have recently been sent to potential track leaders/session organizers asking for their involvement.

Preliminary arrangements have been made with a hotel in Funchal, Madiera, and the meeting received ANS Calendar Placement at the ANS Screening Committee Meeting June 10, 2002.

The combination of two conferences on radiation shielding, coupled with an outstanding location promise to make this a good conference. Please consider submitting a paper for this meeting. More details will be released as they become available. Meanwhile, please contact David Anderson danders3@ebmail.gdeb.com or Pedro Vaz PedroVaz@itn.pt if you have any questions or suggestions.

Upcoming ANS Meeting Schedule

2002 ANS Winter Meeting, Nov 17-21, Washington, DC 2003 ANS Annual Meeting, June 1-5, San Diego, CA 2003 ANS Winter Meeting, Nov 9-13, New Orleans, LA (ANS/ENS International Meeting)
ICRS-10/RPS2004, May 9-14, Funchal, Madeira, Portugal

As always, if you have any questions, suggestions or would like to help on program committee work, please contact me at any time.

RPSD Co-Sponsor of M&C 2003 (Bernadette Kirk & Yousry Azmy)

Preparations for M&C 2003 are progressing very well, and before too long our website will be open for accepting paper submittals. Please begin preparing the papers you intend to submit, and encourage your colleagues to do the same. Templates for preparing your papers will soon be posted on the web. Please remember that the deadline for submitting papers is October 21, 2002.

The unique setup for this conference, entitled *Nuclear Mathematical and Computational Sciences: A Century in Review, A Century Anew*, promises to provide an exciting and unprecedented opportunity for students and professionals in the field to learn about its rich intellectual heritage from leading figures. The *Review* section of the conference is comprised of eight lectures on selected topics of common interest to the membership of the Mathematics and Computation Division, the primary sponsor of the meeting, as well as cosponsors, including the Radiation Protection and Shielding Division. The *Anew* section of the meeting will include contributed and invited papers on standard topics in this series of conferences. Please refer to the conferences web site http://meetingsandconferences.com/MC2003/ for details on the lectures series and lecturers, a list of topics for contributed papers and special sessions, as well as author instructions, and general information about the conference.

Monte Carlo 2005 (Bernadette Kirk)

The ANS Knoxville/Oak Ridge Local Section will be sponsoring Monte Carlo 2005. This series is co-sponsored by the Radiation Safety Information Computational Center (RSICC) and the Nuclear Energy Agency Data Bank in collaboration with other European societies.

The Monte Carlo method and its applications have been frequently addressed at several major conferences and workshops organized in recent years. Monte Carlo topics have included radiation shielding, radiation physics, medical physics, and high energy physics. Past conferences specifically devoted to Monte Carlo issues related to radiation physics and transport include one held in 1993 in Saclay, France, under the title "Advanced Monte Carlo Computer Programs for Radiation Transport." In 1997, a one-day workshop "E=mc² – Elocutions on Monte Carlo in Monte Carlo" was held

in the city of Monte Carlo itself. Since then, significant developments have taken place in computational and data issues, resulting in "state-of-the-art" computer codes and tools. At the international conference "Monte Carlo 2000 - Advanced Monte Carlo for Radiation Physics, Particle Transport Simulation and Applications," held in Lisbon, Portugal in October 2000, all sessions were dedicated to Monte Carlo issues. To continue the tradition, the international organizers of Monte Carlo 2000 voted to hold the next event in the United States, with RSICC as the host. RPSD has voted to support this conference. Calendar placement will be requested at the 2003 ANS Winter Meeting to work around the M&C 2005 Topical meeting.

Standards (Bill Hopkins)

Bill Hopkins, Chair of ANS 6, reported that Suriya Ahmad, the new ANS Standards coordinator was notified that the American National Standards Institute administratively withdrew two ANS 6 standards due to the 10-year overage without re-affirmation or revision. These standards are,

ANSI/ANS-6.1.1-1991, Neutron and Gamma-Ray Fluence-To-Dose Factors. --working group chair -- Nolan Hertel (nolan.hertel@me.gatech.edu)

ANSI/ANS-6.4.3-1991, Gamma-Ray Attenuation Coefficients and Buildup Factors for Engineering Materials.

--working group chair -- Andy Hodgdon (adhodgdo@dukeengineering.com)

He also noted that there is still hope of resurrecting them because Suriya said the working groups could proceed along a track of "reaffirmation" from an ANS perspective by filling out a new "pins" charter form (this is on the ANS web page under standards); then reballoting under newly constituted committees to reaffirm. The working group chairmen need at least 3 more people -- contact them at their email addresses. After that ballot it will go through the regular ANS 6, N17 balloting. Then standards would be sent to ANSI which would treat them as a new standards.

Honors & Awards (Bernadette Kirk)

Congratulations to Yousry Y. Azmy for his new "Fellow" status. Dr. Azmy was recognized at the June 2002 summer meeting in Hollywood, Florida. He is a member of both RPSD and M&C.

This is a short plea to the general RPSD membership to nominate worthy individuals for the following awards:

The award for a Lifetime Achievement, or the Rockwell Award, is based on long-term contribution in research, development of technology, or education in radiation measurement, protection, shielding, and dosimetry

Professional Excellence Award

This award is given to one or more individuals in the Division each year on the basis of outstanding past or current professional contribution. The basis for this award would usually be a major contribution to the state of the art, an important publication, a major technical achievement, or a sustained record of significant accomplishment and technical excellence.

Service Recognition Award

This award is presented to one or more persons in the Division on an annual basis. The award is in recognition of outstanding past or current service to the Society and/or Division by a member of the Division. This award may be characterized as a distinguished service award or outstanding service award.

Submitted nominations will be considered at the next executive board meeting of RPSD in November 2002. In submitting nominations, please provide a short writer-up.

Please contact Bernadette L. Kirk (kirkbl@ornl.gov, 865-574-6176) regarding nominations.