

IEEE Robotics and Automation Society AdCom Meeting Minutes
Holiday Inn, San Diego, CA
Dec. 14, 1997

LIST OF ATTENDEES

G. A. Bekey, President
T. Fukuda, President Elect; Chair, Long Range Planning Comm.; etc.
R. D. Klafter, Past President; Co-Chair, Awards Comm.
D. E. Orin, Vice President for Finance
W. R. Hamel, Vice President for Member Activities
Y. F. Zheng, Vice President for Technical Affairs and Prog. Chair, 1999 Conference
M. B. Leahy Jr., Vice President for Publications and AdCom member
A. A. Maciejewski, Secretary
M. K. Masten, Division X Director
R. A. Volz, Editor of Transactions
R. Snyder, Managing Editor of Magazine
N. Caplan, Chair, Conference Board
T. J. Tarn, Chair, Nominations Committee and Neural Networks Liaison
R. W. Harrigan, General Chair, 1997 Conference
G. Giralt, General Chair, 1998 Conference and AdCom member
P. Dario, Prog. Chair, 1998 Conf.; AdCom; Co-Chair, Medical Robotics Tech. Comm.
H. Akeel, General Chair, 1999 Conference
B. Carlisle, General Chair, 2000 Conference
O. Khatib, Prog. Chair, 2000 Conference
S. Hsia, Co-Chair, Awards Committee and AdCom member
P. Khosla, Chair, Education Committee
P. J. Eicker, Chair, Robotics and Intelligent Machines Coordinating Council
H. Moraff, Co-Chair, Long Range Planning Committee
J. Slater, Chair, Standards Committee
A. A. Goldenberg, AdCom member
B. Siciliano, AdCom member

A. K. Bejczy, AdCom member
 J. D. Crisman, AdCom and Co-Chair, Human-Robot Interface & Coord. TC
 V. J. Lumelsky, AdCom member
 S. Yuta, AdCom member
 K. Y. Goldberg, AdCom member
 K. Kosuge, AdCom and Co-Chair, Human-Robot Interface & Coord. Tech. Comm.
 S. Lee, Chair, Assembly & Task Planning TC; Co-Chair, Comp. Int. Robot TC
 C. S. G. Lee, AdCom and Co-Chair, Comp. Int. Robot Tech. Comm.
 A. C. Sanderson, Chair, RAS/SMC Merger/Cooperation Committee
 R. Wangeman, guest
 W. A. Gruver, guest
 J. Tien, guest
 N. Xi, guest
 A. J. Koivo, guest
 E. Grant, guest
 A. Kusiak, guest

1. APPROVAL OF AGENDA

The meeting was called to order by President Bekey at 12:34 p.m. A motion to accept the agenda and the minutes of the April 21, 1997 AdCom meeting without any changes was passed by the AdCom.

2. DIVISION X DIRECTOR REPORT

Masten, the Division X Director, gave a report on the items under discussion by the Board of Directors. He indicated that the directors had started the long range planning process to identify goals for the next five year time frame. Some of these included making IEEE publications the “brand of choice” by marketing the value of peer review (with a goal of achieving a two month turn around time from submission to delivery by using electronic technology) and broadening the scope of membership development. He then provided some brief highlights of other “hot” issues under discussion including a revision in the procedure for approving new publications and the distribution of the All Society Periodicals Package.

3. REPORT ON STATUS OF THE SOCIETY

Bekey opened his report by giving the names of the six newly elected AdCom members: Paolo Dario, Ken Goldberg, Oussama Khatib, Kazuhiro Kosuge, C. S. George Lee,

and Sukhan Lee, who were heartily congratulated by the entire AdCom. He also introduced Jim Slater who is the new Chairman of the Standards Committee. Bekey then gave a brief overview of the status of the Society noting that (1) membership is steady at about 6,000 with 54% outside the U.S., (2) finances are doing very well with a \$100K surplus in 1997 and reserves of \$500K, and (3) the Society has increased its connections with other professional societies both within and outside of IEEE.

4. VICE PRESIDENT FOR TECHNICAL AFFAIRS REPORT

Zheng, Vice President for Technical Affairs, provided a report on the activities of the technical committees (Attachment A). He opened by discussing the Distinguished Lecture Program and then presented the results of the New Technology Directions survey. The six “one-liners” that were reported to TAB were: (1) personal robotics, (2) surgical and tele-surgical robotics, (3) micro robotics, (4) service robotics, (5) intelligent vehicle and highway automation, and (6) human-robot coordination. He noted that there were two new technical committees: Manufacturing Automation, chaired by Kok-Meng Lee and Automatic Identification Technology, co-chaired by Theo Pavlidis and Larry O’Gorman. In addition, Howie Choset was appointed as co-chair of the Mobile Robots Technical Committee. Zheng then presented an overview on the individual activities of each technical committee (Attachment A). He concluded his report by providing the criteria for removing a technical committee: If a technical committee does not provide a report for a period of one year, then the chair will be replaced. If the technical committee does not provide a report in the subsequent year, then that technical committee will be removed.

5. VICE PRESIDENT FOR MEMBER ACTIVITIES REPORT

Hamel, Vice President for Member Activities, opened his report (Attachment B) by commenting on several miscellaneous items including the availability of Society membership data, updated monthly, on a diskette. Next he gave an update on the status of the Affiliate Membership Initiative (a list of approved societies is in Attachment B) and reiterated his request for the names of contact people in other societies who he could approach concerning affiliate membership. He then presented an overview of Society membership data noting that there appears to be a slight long-term decline in membership, however, the data prior to June of 1996 is suspect. (The short-term declines in October of 1996 and May of 1997 are due to the IEEE Terminator Program, which should disappear as members return their renewal forms.) Over the period from 1996-1997, the IEEE overall gained 1% in membership whereas Division X lost 2.9%. Hamel closed his report by providing a “systems” diagram of the membership process and made the following recommendations for increasing membership: (1) Continue campaign to recruit affiliates, graduating students, and the 40% of IEEE members who are not members of any society; (2) Recruit and involve leadership, especially from industry; and (3) Modify our products to attract more members.

6. VICE PRESIDENT FOR FINANCE REPORT

Orin, Vice President for Finance, provided a financial report (Attachment C) that included information in five areas: (1) 1996 surplus and net worth, (2) 1997 income and

expenses, (3) 1998 budget, (4) long term investments, and (5) unbudgeted expenses. He opened his report by noting that 1996 resulted in the first net surplus in 5 years, due primarily to an excellent ICRA surplus and a very good return on investments. (The surplus was \$92.5K, even better than previously reported.) This returned out net worth back to near \$500K. The 1997 projections indicate that it will be the best year ever (\$150K+) due primarily to an exceptional surplus of \$120K from ICRA. In addition, several items produced incomes that were over budget, e.g., MEMS '97, and expenses that were under budget, e.g., AdCom expenses. For 1998 there is a total budgeted surplus of \$58K, with a budgeted surplus of \$66K from ICRA.

Orin then reported in detail on the Society's long term investments. He noted that IEEE has only two investment options: short term (cash at T-Bill rates) and long term (stock, bonds, etc.) and that any annual surplus is automatically placed into short term investments. Funds can be transferred between the short term and long term investments only at each quarter of the year. After providing detailed data on the history of both short term and long term investments, Orin presented a recommendation from the Financial Activities Board that \$125K of the assets for the Robotics and Automation Society be transferred from the short term funds to the IEEE long term investment funds during the next investment window (Jan. 1, 1998). A motion to that effect was made by Orin, seconded by Klafter, and unanimously approved by the AdCom.

Orin then presented a motion (from the Financial Activities Board) for approval of the following six unbudgeted expenses: (1) Travel for an RAS representative to IEEE TAB ITS Committee meetings (\$1.5K), (2) Travel for presidential advisor to IEEE TAB meetings (\$2K), (3) External support for Financial Activities and other Society Boards/Committees (\$3K), (4) Travel for Conference Board (\$5K), (5) Travel for Transactions on Mechatronics management committee (\$3K), (6) Travel for NSF travel grant author to ICRA '98 (\$3K). The motion was seconded by Fukuda and unanimously approved by the AdCom.

7. PUBLICATIONS COMMITTEE REPORT

Leahy, Vice President for Publications, opened his report by announcing that Rosalyn Snyder would be stepping down as the Managing Editor of the Magazine. He then presented a motion that the Society agree to Technical Sponsorship of the Haptics-E Journal, an electronic publication. The motion was seconded by Bejczy and unanimously passed by the AdCom. Bill Hamel then presented a report on the Transactions on Mechatronics. He noted that 1996 was a successful year with 2,572 subscriptions, income of \$99K, and a surplus of \$26.7K. Conservative projections for 1997 are for 3150 subscriptions, income of \$109K, and a surplus of \$27K. He then presented the following motion: "It is moved that the Transactions on Mechatronics Management Committee plan to restructure the financial organization of the transactions in the 1998 budget year to a single IEEE cost center in which financial gains/liabilities are equally shared and owned among RAS, IES, and the ASME." The motion was seconded by Fukuda and unanimously passed by the AdCom.

7.1 **Magazine** Leahy gave a brief report for Kimon Valavanis, Editor of the Magazine, on the status of the Magazine (Attachment D).

7.2 **Transactions** Richard Volz, Editor of the Transactions, gave a brief report on the status of the Transactions including statistics on submissions, review time, and page charges (Attachment E). He opened his report by summarizing IEEE's objections to the financial aspects of the new Transactions proposal which was rejected. He noted that he was in the process of establishing a committee to explore the options on how to proceed with future publications. He then gave a quick update on the state of the IEEE electronic publication project. Volz then gave an overview of the submission statistics, noting that the submission rate is increasing and that the special issue on "Virtual Reality" is in progress. In an effort to reduce review time, he discussed some review procedure changes that took advantage of electronic communication, such as obtaining commitments from potential reviewers by email prior to sending out manuscripts. Volz closed his report by noting that the number of pages for 1997 was right on target at 960 and that both mandatory and voluntary page charges were up.

Bekey then closed the publications report with a couple of information items from the IEEE TAB meeting. First, he noted that he strenuously objected to the Industrial Electronics Society's information item concerning a new transactions on factory automation. Second, he reported on a TAB rule that new transactions would not receive any income from the All Society Periodicals Package for three years.

8. CONFERENCE BOARD REPORT

Caplan, Chair of the Conference Board, reviewed the four categories of the Society's involvement in conferences and highlighted some of the activities of the Conference Board, noting the proliferation of non-ICRA conferences. He also acknowledged Ning Xi for his work in setting up a database for tracking all the various conferences. Finally, he expressed his appreciation for all of the hard work of the Conference Liaisons, T. J. Tarn and Steve Hsia.

8.1 **1997 Conference.** Ray Harrigan, the General Chair for the 1997 Conference, provided a detailed written final report on the 1997 Conference (Attachment F). The bottom line was that the conference was a huge success with 801 attendees and a surplus of \$120K from an income of \$462K and expenses of \$342K. Harrigan closed his presentation by noting that the final report also included an analysis of what items could be improved to make the the conference even more successful.

8.2 **1998 Conference.** Georges Giralt, the General Chair for the 1998 Conference, gave a brief progress report on the 1998 conference to be held in Leuven, Belgium on May 16-21. He noted that registration would be handled by IEEE and that the proceedings would be available in both CD ROM (included with registration) and bound versions (available for \$80). He then gave an overview of the support being provided by various industries and institutions from many different countries. Finally, he closed his report by noting that a block of rooms were being

reserved for the AdCom at the Holiday Inn in Leuven. Paolo Dario, the Program Chair for the 1998 Conference, then presented his report on the technical program. There were 970 papers submitted and it is projected that there will be 576 papers accepted for 12 parallel session (an acceptance rate of approximately 60%). There were 14 workshops and tutorials accepted from a total of 20, and 29 videos have been submitted. There will be five awards presented, four for papers and one for best video. Dario then gave an overview of the paper review process. He concluded his report by listing some of the highlights planned for the conference such as the plenary sessions, invited speakers, special sessions, panels, and roundtables.

8.3 1999 Conference. Hadi Akeel, the General Chair for the 1999 Conference, gave a brief status report on the 1999 Conference to be held in Detroit on May 10-15. He noted that Bruno Siciliano and Shin'ichi Yuta were named as Program Vice-Chairs and that approximately one third of the program committee had been determined. He closed his report by emphasizing the Conference's focus on closer collaboration between industry and academia.

8.4 2000 Conference. Brian Carlisle, the General Chair for the 2000 Conference, gave a very brief update on the 2000 Conference to be held in San Francisco on April 23-28. He noted that the hotel contract had been signed and that the conference theme was, "Robotics and Automation: The Next Generation."

9. RAS/SMC COOPERATION/MERGER COMMITTEE REPORT

Art Sanderson, Chair of the RAS/SMC cooperation/merger committee, gave a summary on the background of this committee and some of its recent discussions (Attachment G). There were four major issues considered with respect to a possible merger: (1) Membership, e.g., would a merger address the slow erosion in both societies' membership, (2) Financial, e.g., would the immediate financial loss due to overlap in membership be offset by any potential efficiency, (3) IEEE influence, e.g., will the short-term loss of one vote be compensated by the increased leverage due to a larger size, and (4) Technical, e.g., would the diversified portfolio of technical areas result in the sum of the two societies being greater than its parts. Sanderson then listed several mutually beneficial steps for closer cooperation between the societies that were not dependent on a merger. These included (1) co-sponsoring of conferences, such as possibly CIRA '99, (2) shared publications, such as possible joint publication of the IEEE Transactions Part C and the RA Magazine, (3) shared staff, for example, for meetings services, and (4) shared conference tracks, e.g., a robotics track at SMC '98. Sanderson then presented a motion from the committee that stated, "The existing RAS/SMC Cooperation/Merger Committee should continue its discussion on the implications of a merger and that they be asked to draft a proposal for the merged societies for discussion by the SMC AdCom in April and the RA AdCom in May." The proposal was seconded by Klafter and after several minutes of discussion was unanimously passed by the AdCom.

10. NOMINATIONS COMMITTEE REPORT

Tarn, Chair of the Nominations Committee, provided the following three nominations for officers to continue in their current positions: Dave Orin for Vice President of Finance, Yuan Zheng for Vice President of Technical Affairs, and Mike Leahy for Vice President of Publications. There were no further nominations and all three candidates were approved by acclamation. Kazuhiro Kosuge was then nominated for Vice President of Member Activities. There were no further nominations and the AdCom voted unanimously to elect Kosuge. Tony Maciejewski was then appointed by Fukuda as Secretary. Tarn then presided over the election of the President Elect. The Nominations Committee (consisting of all Past Presidents) nominated Steve Hsia and Pradeep Khosla. Tarn then opened the floor for additional nominations. No additional nominations were received and a motion by Klafter to close the nominations was unanimously passed. The two candidates then each provided a brief presentation on their qualifications and visions for the Society. The two candidates were then asked to leave the room and several members commented on the nominees, noting that the Society was fortunate to have two such highly qualified candidates. Through a closed ballot vote, Steve Hsia was elected as President Elect.

11. SOCIETY INFORMATION ITEMS

Bekey provided information on several items of interest to the Society. First, he called on Peter Luh to discuss proposed changes to the Field of Interest statement of the Society. In the interest of efficiency, Bekey suggested forming a committee to develop the exact wording of the statement. A sub-committee of the Long Range Planning Committee consisting of Moraff, Luh, and Lumelsky agreed to take on this task. Second, with regard to changing the Society's name, the overwhelming sentiment of the AdCom was that no change was necessary. Bekey then provided several informational items including (1) the Society is now an affiliate member of the International Federation of Robotics, (2) Memorandums of Agreement with industrial robotics societies in other countries are moving forward (already signed with Australia and pending with Japan), (3) Jim Slayter was appointed as Chair of the Standards Committee, and (4) the Philips Award has been approved for three years (renewable) thanks to the help of Damion Lyons. Bekey closed his report by requesting a motion to support the Intelligent Transportation Systems Council. A motion to that effect was made by Lumelsky, seconded by Hsia, and unanimously passed by the AdCom.

12. MEETINGS COMMITTEE REPORT

Fukuda, Co-Chair of the Meetings Committee, opened his report by providing a hand-out with all of the information on the meetings that had been approved by the Meetings Committee for one of the four categories of sponsorship (Attachment H). He then went over the procedure for obtaining Sponsorship/Co-sponsorship or Technical Co-sponsorship/Cooperation (Attachment I). He closed his report by presenting the following motion from the Conference Board: "As a condition of co-sponsorship by the IEEE Robotics and Automation Society the (TITLE OF CONFERENCE) conference

agrees to pay a General and Administrative (G&A) fee of 5% of the Robotics and Automation Society's share of the total conference income budget. This fee will be paid to the Robotics and Automation Society no later than 30 days after the conference." The motion was made by Caplan, seconded by Hsia, and unanimously passed by the AdCom.

13. PRESIDENT ELECT REPORT

Fukuda, President Elect, opened his report by commenting on the importance of maintaining suitable financial reserves for the Society. He then presented a list of appointees for the various Society committee chairs. These included: Norm Caplan, Conference Board; Reid Kress and Shigeki Sugano, Meetings Committee; Kazuhiro Kosuge, International Affairs Committee; Jim Slater, Standards Committee; Aydan Erkmen and Robin Murphy, Education Committee; Dick Klafter, Awards Committee; Tony Maciejewski, Constitution and Bylaws Committee; George Bekey, Nominations Committee; Steve Hsia and Howard Moraff, Long Range Planning Committee; Pat Eicker, Robotics and Intelligent Machines Coordinating Council; T. J. Tarn and Gary Yen, Neural Network Liaisons; and Yilin Zhao, IEEE ITS Committee. A motion to accept all of these appointments was made by Klafter, seconded by Lumelsky, and unanimously passed by the AdCom. Since three elected members of the AdCom were now officers (Hsia, Leahy, and Kosuge), Fukuda made the following appointments to replace them: Heikki Koivo for Hsia, Andrew Kusiak for Leahy, and Hideki Hashimoto for Kosuge.

14. LONG RANGE PLANNING COMMITTEE REPORT

Moraff, Co-Chair of the Long Range Planning Committee, provided a report on the discussions in this committee. He noted that the emerging topic areas in robotics are different for the two different constituencies of the Society, i.e., scientists primarily in academia and engineers primarily in industry. He then gave a list of several mechanisms for better involving industry in the Society, including more participation in the RIA annual meeting, actively inviting industry representatives to RAS meetings, educating ourselves about industry needs, creating a new award for innovative industrial solutions, and establishing a long term exchange of problems and proposed solutions.

15. ROBOTICS AND INTELLIGENT MACHINES COORDINATING COUNCIL REPORT

Eicker, Chair of the Robotics and Intelligent Machines Coordinating Council, presented a brief report on the activities of RIMCC. He provided the highlights of the Congressional Exposition on Robotics and Intelligent Machines that was held on September 30, 1997 in Washington D. C. He noted that the exposition was a great success and that it prompted a letter from the Senate and House Task Forces on Manufacturing to the Secretaries of Defense, Energy, Commerce, director of NSF and administrator of NASA with guidance on how to proceed. Many more details on the exposition are available on the web at: www.sandia.gov/events/highbroc.htm

16. CONSTITUTION AND BYLAWS COMMITTEE REPORT

Maciejewski, Chair of the Constitution and Bylaws Committee, then presented a report on the proposed changes to the bylaws concerning the creation of a Vice President for International Affairs (Attachment J). The AdCom will vote on adopting these changes at the next meeting.

17. AWARDS COMMITTEE REPORT

Klafter, Chair of the Awards Committee, presented an update on the Awards Committee's activities. He gave the list of new IEEE fellows: H. Hemami, K. Ikeuchi, S. Lee, H. Moraff, and H. Seraji and encouraged the AdCom to nominate qualified candidates for the upcoming year. He also noted that the "Early Career" award had only one nominee this year and urged the AdCom to provide more nominations.

18. ADJOURNMENT

President Bekey presented some of his reflections on the past two years and expressed his appreciation for the support that he has received during his term as president. On our behalf, Dick Klafter expressed his appreciation for George's leadership over the past two years, and the AdCom followed with applause.

The meeting was adjourned at 5:55 p.m. to convene next on May 15, 1998 in Leuven, Belgium.