final Draft

Resource Management Committee Proposal

28 January 1991

I. Preamble

Whereas it is a goal of the Department of Electrical Engineering to excel in education and research activities,

And whereas the Department must continually invest in itself to achieve the level of excellence to which it aspires,

The Department of Electrical Engineering does hereby establish a mechanism by which all faculty members are able to make and be acknowledged for their particular professional contribution mix of classroom teaching, one-on-one direction of undergraduate and graduate student projects, theses, and dissertations, administrative service, professional service, and by release time exchange through external salary support.

II. Department Resource Fund

Money provided to the department by release time exchange will be put in a Department Resource Fund managed by the chair. Half the fund will be discretionary by the the chair and half the fund will be non-discretionary.

The non-discretionary distribution priorities are:

1) Recruitment of outstanding graduate students.
2) Recruitment of outstanding faculty.
3) Departmental development (e.g., seed money, facilities, research brochure).
4) Increased levels of technical and administrative support of the faculty.
5) Equipment matching money.
6) Seminars and visits by distinguished national and international engineers and scientists.
7) filling gaps in research funding.

III. Baseline Policy

The baseline work load policy sets forth a variety of proto-typical workload profiles among which the faculty can choose. Faculty choice must be negotiated with the chairperson. Other profiles consistent with the preamble and example profiles may be individually negotiated as well.

Example Profiles

5 course mix
4 course mix, significant administrative or professional service

4 course mix, active research program
3 course mix, new faculty in first years of service.
3 course mix, significant service, active research program, 11% release time
3 course mix, very active research program, 11% release time
3 course mix, very significant administrative or professional service
2 course mix, very active research program, 22% release time

In the above profiles, there is no distinction between a 3 or 4 hour course, no distinction between a graduate or undergraduate course, no distinction between new preparations and old preparations. All of these distinctions make some difference and should be equitably incorporated into the mix. The active research program aspect recognizes the additional work a faculty member must do to obtain continuous funding and the large amount of time spent on one-on-one graduate student interaction associated with projects and courses such as 500, 599, 600, 700, and 800. Having an active research program, however, does not necessarily require external funding. The service aspect recognizes the time spent on internal departmental service activities such as associate chairperson, major committee chairperson or coordinator or comparable university service work. The service aspect also recognizes the time spent on leadership in external professional activities such as conference organizations, IEEE TC executive committee participation and other IEEE service, and paper or proposal reviewing.

B. Release Time Through External Salary Support

1) 11% of academic year salary can release time exchange one course. Less than or more than one course can be exchanged, pro-rated.

2) Release time exchange is possible for continuing education courses, special seminars, or workshops based on net dollar return to department, in accordance with (1).

3) Release time exchange is possible for obtaining grants supporting the undergraduate or graduate instructional program or grants buying instructional lab equipment. The amount of the release time exchange produced by such grants is negotiated between the PI and department chair.

IV. Accounting and Banking

To provide a long term memory for credits and debits, so that accounts do not have to be exactly balanced each year, an accounting and banking system will be established. This system will permit the possibility, on a quarter-by-quarter basis, of paying ahead in dollars or work credit hours.

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING FT-10

March 17, 1992

TO: Professors Darling, Helms, Johnson, Marks, Moritz, Somani and Tsang

FROM: Alistair Holden AH

SUBJECT: Collection of Materials from Your Class for ABET Review

Tom Seliga (Memo dated January 15, 1992) asked each of you to collect samples of student homework, exams and handouts (including class outlines) for ABET accreditation review. I have also contacted you individually. Thanks for your help.

Please pass on these materials to Valerie in EEB 211.

cc: Tom Seliga
Jean-Loup Baer
Frank Alexandro

Ruth,

1. Make one copy each of the attached blocking out name only on copy.
2. Put originals of D on table outside with the other tests.
3. (Read other side of this paper) Give copies to Eddie. Tell her class was to big to grade homework. Grade was based only on three tests.

University of Washington Correspondence

INTERDEPARTMENTAL

TO: Endrik Noges

FROM: Robert J. Marks II

SUBJECT: EE468

DATE: January 16, 1992

I am getting to the point where a grader would be quite helpful in EE468.

I need someone for a maximum of 10 hours per week.

Please let me know if this is possible.

Thanks!

University of Washington Correspondence

INTERDEPARTMENTAL

January 13, 1992

TO: Thomas A. Seliga, Chair

FROM: R. J. Marks

SUBJECT: Support for Ms. Wagner

Secretarial support is needed immediately to process the qualifying exam. Ruth has agreed to do the bulk of the work. Dr. Atlas has given permission for her to do so.

I hereby request from you authorization to pay Ruth for up to two weeks salary from departmental funds for service up to the faculty meeting where test results are decided. An hourly sheet will be submitted with the final request.

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

Department of Electrical Engineering, FT–10
Telephone: (206) 543–2150

January 3, 1992

J. Deller, Editor-in-Chief
Signal Processing Magazine
Dept. of Electrical Engineering
Michigan State University
260 Engineering Building
East Lansing, MI 48824

Dear Dr. Deller:

Enclosed is camera ready copy for a workshop sponsored by the IEEE Signal Processing Society. I request that it be published in Signal Processing Magazine.

Sincerely,

Robert J. Marks II

Robert J. Marks II
Professor

Enclosure

From Mailer-Daemon Tue Jan 14 15:42:53 1992
From: Mailer-Daemon (Mail Delivery Subsystem)
To: <wagner>
Subject: Returned mail: User unknown
Date: Tue, 14 Jan 92 15:42:44 PST

```
   ----- Transcript of session follows -----
Connected to lagos.ee.washington.edu:
>>> RCPT To:<ee_faculty@lagos.ee.washington.edu>
<<< 550 aggoune... User unknown: No such file or directory
550 <ee_faculty@ee.washington.edu>... User unknown

   ----- Unsent message follows -----
Return-Path: <wagner>
Received: from essex.ee.washington.edu by uw-isdl.ee.washington.edu (4.1/SMI-4.1
)
        id AA05159; Tue, 14 Jan 92 15:42:44 PST
Date: Tue, 14 Jan 92 15:42:44 PST
From: wagner (Ruth Wagner)
Message-Id: <9201142342.AA05159@uw-isdl.ee.washington.edu>
To: ee_faculty@lagos.ee.washington.edu


----- Begin Included Message -----

>From marks@u.washington.edu Mon Jan 13 20:46:52 1992
Return-Path: <marks@u.washington.edu>
Received: from milton.u.washington.edu by essex.ee.washington.edu (4.0/SMI-4.0)
        id AA06462; Mon, 13 Jan 92 20:46:50 PST
Received: by milton.u.washington.edu
        (5.65/UW-NDC Revision: 2.1 ) id AA07819; Mon, 13 Jan 92 20:46:43 -0800
Date: Mon, 13 Jan 92 20:46:43 -0800
From: Robert Marks <marks@u.washington.edu>
Message-Id: <9201140446.AA07819@milton.u.washington.edu>
Sender: marks@milton.u.washington.edu
To: ee_faculty@ee.washington.edu
Subject: QUALS
Cc: marks@milton.u.washington.edu, wagner@essex.ee.washington.edu
Status: R



Dear Friends:

There are 32 students taking the qualifying exam. As a function of supply
and demand, each of us will give from three to thirteen tests.  Here's the
breakdown in terms of groups.  A 'typical' number is given for each group.
Each member of this group gives this number of tests, plus or minus one. The
'major' number is the number of students who have declared this group as their
major.

Group                          typical         major
1. Energy & Power Systems      8               4
2. Electronics & VLSI          3               0
3. Solid State & Photonics     4               2
4. Fields & Waves              6               5
5. Computers                   11              11
6. Circuits & Control Systems  7               4
7. Communication & SP          12              7
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Notes:

1. Each student was given their top two choices for their major. In all except two cases, each student was also given their top choice for their minors.
2. I have been advised by departmental PhC's that much talking goes on betwwen exams. This may be why the students taking your exam later in the week do better than those at first. Consider variation of your questions, or simply ask the student whether they have discussed your exam.
3. Exams are for 25 minutes each. The students are responsible for setting the time with you.
4. The exam period is from January 21 through noon on January 24.
5. Your grades are due by noon on January 27. Please put them in my box, or give them to Ruth Wagner in EE408.
6. The faculty will meet in executive session on Feb 4th to make the Solomonian judgements.
7. A few of you will be on travel during the exam period. Please consider testing early, or leaving a written exam that your RA can procter.

Happy testing.

Bob Marks

----- End Included Message -----

University of Washington Correspondence

INTERDEPARTMENTAL

TO: Prof. Seliga, Chairman

FROM: Prof. Atlas Leo. Atlas

RE: A very strong Faculty applicant

FROM: January 27, 1992

I know of the work of the attached junior Faculty applicant and he has a technique which at this point in time is frankly beating the time-frequency resolution of our techniques. This result, combined with his future interest in image coding and analysis, is about the strongest recommendation I could give to recruit him.

cc: Profs. Marks and Riskin

University of Illinois
at Urbana-Champaign

Coordinated Science Laboratory

1101 West Springfield Avenue
Urbana, IL 61801
USA

217 244-1764 *fax*
5101011969 UI TELCOM URUD *telex*

January 18, 1992

Prof. Prof. L. Atlas
Department of Electrical Engineering
FT-10
University of Washington
Seattle, WA 98195

Dear Prof. Atlas:

Since stranger things have happened than having several researchers interested in time-frequency analysis at one school, I thought I would apply to the University of Washington for a faculty position. I will receive my Ph.D. in Electrical and Computer Engineering from the University of Illinois in the summer of this year. Besides sending a copy of my vita to the Faculty Search Committee of your department, I have enclosed a copy for you, since you are more familiar with my work.

As you will note in my vita, my research has been in the general area of signal and image processing. A summary of my Ph.D. research is included at the end of my vita. In the future, I plan to apply my techniques to image coding and analysis and to investigate the connections between wavelets and human vision and hearing.

I have taken a large number of classes in both systems theory (signal processing, communications, control) and mathematics. With this background, I would feel comfortable teaching any systems course at the graduate level, as well as virtually any undergraduate level class.

I hope that my qualifications are of interest to you and would welcome an opportunity to visit your school in person. Thanks!

Sincerely,

Richard G. Baraniuk

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering

December 22, 1992

MEMO TO: Robert Marks

FROM: Thomas A. Seliga
Chairman

RE: 91-92 Indirect Cost Return

The Department has just received the latest and presumably final distribution of its indirect cost return for 1991-92. The University has again changed its policy on the return of indirect costs this year. Essentially, the College received return on only those projects that paid full University indirect costs.

The Department received a distribution from the College amounting to $63,417, or 6.78% of applicable indirect costs. As in the past, the Department will retain 20% of this or $12,683 for Department needs.

The E. E. Resource Allocation Committee has considered the change in the UW policy and has approved an allocation in accordance with UW policy; that is, only those grants or contracts that have paid full indirect costs will receive returns.

Those projects that recovered full indirect costs on your sponsored programs in 1991-92 amounted to $43,298 in indirect costs. Therefore, the amount distributed for your use **prior to June 30, 1993 (due to the end of the biennium)** is $2,349.77. Please note that the balance in your sub-account may be more or less than this amount due to prior expenditures. A full accounting is available in the Business Office. Your sub-account balance must be fully expended by June 30, 1993.

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

Department of Electrical Engineering, FT-10
Telephone: (206) 543-2150
FAX: (206) 543-3842

December 11, 1992

Embassy of France
Scientific Mission
Emeka Ngwube
4101 Reservoir Road NW
Washington, DC 20007-2176

To whom it may concern:

Subject: Christophe Bas

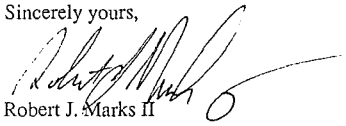
I have known Mr. Bas for over two years. I first met him during a visit to IRESTE University, affiliated with the University of Nantes, France. Nantes is a sister city to Seattle, and the University of Nantes is a sister university to the University of Washington.

In Nantes, I gave a series of lectures on neural computing and time frequency characterizations. Of all the students, Mr. Bas' enthusiasm for the subject was the highest. He frequently stayed after class to ask questions and discuss the finer points of the presentation. I invited him to the United States to work with me on neural network research. He studied under my supervision for three quarters.

Mr. Bas' research was application of neural networks to detection theory. He showed, remarkably, that a layered perceptron neural network performed nearly as well as an optimal detector. His results were published in the Proceedings of the International Joint Conference on neural Networks in Singapore last year (1991).

Mr. Bas is quite bright. His English is flawless. He writes extremely well (better than some of my American born students). I would personally welcome him to perform his Ph.D. work with me. He, unfortunately, has chosen to do otherwise.

Sincerely yours,



Robert J. Marks II
Professor

Wed, Dec 9, 4:45 pm

Christophe called and needs a letter to get out of the military service in France - this letter is missing from his file in Washington DC

1 - who you are
2 - what worked on and how long
3 - result of projected worked on
4 - Satisfied with work

Good news! file

University of Washington Correspondence

INTERDEPARTMENTAL

STAFF PERSONNEL, JA-10

November 23, 1992

TO: Ruth A. Wagner
Secretary Senior
Electrical Engineering, FT-10

FROM: Mary Ann Bill Mary Ann Bill/kw
Area Personnel Representative
Staff Personnel Office, JA-10

SUBJECT: Acknowledgement of Receipt of Position Review Request

A request for review of your position has been received in the Staff Personnel Office. I will be contacting you and your supervisor to schedule an appointment to discuss the duties and responsibilities assigned to your position. Position reviews should be completed within sixty days of receipt of a completed position description form and normally are completed within forty-five days. Should you have any questions regarding the status of the position review, please contact me at 543-2333.

MAB:kw
cc: Robert J. Marks ✓
Les Atlas

file

University of Washington Correspondence

INTERDEPARTMENTAL

DATE: November 18, 1992

TO: Thomas A. Seliga, Chair

FROM: Robert J. Marks II RJMII

SUBJECT: Adjunct appointment of Dr. Thomas A. Furness III

I request that Dr. Thomas A. Furness III be considered by the faculty for appoint as Adjunct Professor in our department with subsequent appointment to the Graduate Faculty. Dr. Furness currently has an appointment of Professor in Industrial Engineering and serves as the Director of the Human Interface Technology Laboratory.

Professor Furness' CV is attached.

THOMAS A. FURNESS III
7359 58th Ave. NE
Seattle, WA 98115
(206) 527-9910

PRESENT POSITIONS

Professor
Industrial Engineering Program FU-20
University of Washington
Seattle, WA 98195

Director, Human Interface Technology Laboratory FJ-15
Washington Technology Center
University of Washington
Seattle, WA 98195

EDUCATION

Ph. D. Engineering and Applied Science, University of Southampton, England, 1981
Dissertation Title: "The Effects of Whole Body Vibration on the Perception of the Helmet-Mounted Display"

Graduate Studies in Electrical Engineering, Ohio State University, 1967-70

B.S. Electrical Engineering, Duke University, 1966

EXPERIENCE

September 1989 to present: Professor (with tenure), Industrial Engineering Program, College of Engineering, University of Washington, Seattle, WA

July 1989 to present: Director, Human Interface Technology Laboratory (HITL) FU-20, Washington Technology Center, University of Washington, Seattle, WA

April 1974 to June 1989: **Supervisory Electronics Engineer (GM-15), Chief, Visual Display Systems Branch, Human Engineering Division, Armstrong Aerospace Medical Research Laboratory, Wright-Patterson AFB, Ohio **(except for the period of August 1977 to October1979 as noted below)

October 1978 to September 1979: Electronics Engineer (GS-14), Flight Systems Department, Royal Aircraft Establishment, Farnborough, England

September 1977 to September 1978: Electronics Engineer (Long Term/Full Time Training), Human Factors Research Unit, Institute of Sound and Vibration Research, University of Southampton, Southampton, England

September 1971 to March 1974: Electronics Engineer (GS-13/14), Performance Requirements Branch, Human Engineering Division, 6570th Aerospace Medical Research Laboratory, Wright-Patterson AFB, Ohio

September 1966 to September 1971: Research Engineer (Lieutenant/Captain, USAF), Performance Requirements Branch (Human Engineering Division), 6570th Aerospace Medical Research Laboratory, Wright-Patterson AFB, Ohio

HONORS AND AWARDS

Department of the Air Force, Meritorious Civilian Service Award (1986)

Sustained Superior Performance Award (July 1986 - June 1987)
Sustained Superior Performance Award (July 1985 - June 1986)
Sustained Superior Performance Award (July 1984 - June 1985)
Sustained Superior Performance Award (July 1983 - June 1984)
Sustained Superior Performance Award (July 1981 - June 1982)

United States Air Force Graduate Fellowship, University of Southampton, Southampton,England (1977-1978)

Air Force Systems Command Scientific Achievement Award (1970)

Nominated by the USAF for "America's Ten Outstanding Young Men for 1970"

Nominated by the USAF for "America's Ten Outstanding Young Men for 1969"

Human Engineer of the Year, Air Force Aerospace Medical Research Laboratory (1969)

Junior Officer of the Year, Aerospace Medical Division, Air Force Systems Command

Junior Officer of the Year, Air Force Aerospace Medical Research Laboratory, 1968
Selected as LEAP (Lieutenant's Education Application Program) officer upon assignment to USAF at Wright-Patterson AFB (1966).

PATENTS

Personal Eyewear Display, U.S. Patent Awarded

Virtual Retinal Display, U.S. Patent pending

PROFESSIONAL ACTIVITIES

Membership in Technical Societies:

Institute of Electrical and Electronics Engineers
Human Factors Society
Association of Computing Machinery-Special Interest Group on Graphics
Society for Information Display

Membership on Panels, Boards, Committees:

Founder and President, Virtual World Society
General Chairman, IEEE Virtual Reality Annual International Symposium, Seattle, WA 18-22 September 1993
Member, Science Council, Pacific Science Center, Seattle, WA (1992)
Board of Directors, Virtual Vision, Woodinville, WA (1992 to present)
Board of Directors, Oz International Ltd., Seattle, WA (1992 to present)
Board of Directors, Insight Inc., Woodinville, WA (1988 to present)
Technical Advisory Board, Virtual Reality Inc., Pleasantville, NY (1992)
Technical Advisory Board, Kopin Corporation, Boston, MA (1992)
Workshop on Strategic Computing in the Public Sector (1988)
National Science Foundation Panel on Micromechanical Machines (1988)
Workshop on the Psychology of System Design (1986)
Air Force Systems Command Project Forecast II (1985-86)
Aeronautical Systems Division Futurist Conference (1985)
Biotechnology in the Year 2000 Study Group (1982)
Unconstrained Night Attack Program Study Group (1981)
Tri-Service Panel for Night Vision Technology (1976-77)
Reconnaissance/Strike Evaluation Group (1977)
Optical Weapons Delivery Committee (1972)
Laser Applications Study Group (1971-72)
Helmet Sight/Displays Study Group (1970)
Displays for Night Attack Committee (1969)
TRIM Instrumentation Board (1969-70)

Positions Held:

Adjunct Professor, Wright State University, Department of Biomedical and Human Factors Engineering (1988-89)

Chairman of Sensors Panel, ASD Futurist's Conference (1985)

Project Custodian, Air Standardization Coordination Committee, Working Party 61, Project 113: Aeromedical Aspects of Vision in Air Operations (1978 -1984)

Chairman, Tri-Service Panel for Displays (Night Vision Technology) (1976-77)

Executive Committee, Dayton Section, IEEE Society for Engineering Management (1975-77)

Short Courses Taught:

Virtual Interface Technolgy, UCLA Extension (Oct. 1991, April 1992, April 1993)

Furness, T., Bricken, W., Bricken, M., "Virtual Interface Technology", SIGGRAPH '91 Tutorial.

Advanced Cockpit Controls and Displays, UCLA Extension (1989; 1990, 1991, 1992)

Human Factors Design Course, University of Dayton (1990)

User Interface Strategies '93, National Technology University, Dec. 1992

Consulting Activities:

Virtual Reality Inc., Pleasantville, NY
Insight Inc., Woodinville, WA
Omeda Inc., Madison, WI
Microelectronics and Microcomputer Corporation (MCC), Austin, TX
U.S. Navy
Cybernet Inc.
Illusion Engineering Inc.

STUDENT SUPERVISION

Students Supervised at the University of Washington

Chris Byrne, Ph.D., Industrial Engineering, December 1994*
Lawrence Baer, M.S., Industrial Engineering, March 1993*
Daniel Henry, M.S., Interengineering, Dec 1992*

Mark Takacs, M.S., Interengineering, June 1993*
Max Minkoff, M.S., Interengineering, June 1993*
Dav Lion, M.S., Interengineering, June 1993*
Ari Hollander, M.S. Interengineering, September 1993*
Jerry Prothero, M.S. Interengieering, September 1993*
Jeffrey James, M.S. Interengineering, September 1993*

Student Committees

Craig Rosenberg, Ph.D., Industrial Engineering, 1994*
Geofrey Coco, M.S., Computer Science, March 1993*
Karen Jones, M.S., Industrial Engineering, December 1992*
Craig Rosenberg, M.S., Industrial Engineering, December 1991

*expected completion date

COURSES TAUGHT

INDE 455: User Interface Design (taught w/ Prof. Barfield), Spring 90,91,92

INDE 495: Industrial Engineering Design, Spring 90, 91

INDE 352: Workstation Design, Spring 92

INDE 599: Virtual Interface Technology, Winter, 90, 91, 92

GRANTS AND CONTRACTS

Human Interface Technology Laboratory, Washington Technology Center; 1991-93 Biennium: $325,000; 1989-90: $250,000

Sun Microsystems Gift, 1992, $25,000

Boeing Corporate Grant, 1992-95: $1,000,000 (pending)

National Science Foundation, "Virtual Information System Environment", 1993-96, $1,001,097 (pending)

AFOSR, "Communicating Situation Awareness in Virtual Environments", 1993-96, $3,989,529 (pending)

U.S. West Foundation Gift, 1991-92: $500,000

Virtual Worlds Consortium, 1991-92: $425,000 (funds); $1,000,000 (equipment/software)

Boeing Computer Services (Advanced Technology Center), Protospace Development Program, 1990-91: $267,000

Boeing Computer Services, Extended Range Tracking System, Phase 3, 1992, $75,000

Boeing Computer Services, Extended Range Tracking System, 1991: $150,000

Boeing Military Airplanes, Spatial Displays for Cockpits, 1990-91: $120,000

USAF Equipment Transfer, 1991: $3,000,000 (pending)

Boeing Corporate Grant, 1990: $10,000

Hughes Research Laboratory Gift, 1991: $25,000

Digital Equipment Corporation, Equipment Grant: 1990-92, $2,500,000.

U.S. Navy, Virtual Interfaces for Undersea Applications: 1991: $100,000.

PUBLICATIONS AND PAPERS

Co-editor of Presence, MIT Press (1991 to present)

Furness, T., "Configuring Virtual Space for the 'Super Cockpit'". Medecine Aeronautique et Spatiale, Tome XXVII -No. 110, (published by the Societe Francaise de Medicine Aerospatiale) 1989, pp. 104-110.

Furness, T., "'Super Cockpit' Amplifies Pilot's Senses and Actions". Government Computer News, 15 August 1988, pp. 76-77.

Furness, T., "Harnessing Virtual Space". Keynote Address, Society for Information Display 1988 International Symposium, 23-27 May 1988.

Furness, T., "Designing in Virtual Space". Chapter in System Design, eds. W. B. Rouse and K. R. Boff, North Holland 1987.

Furness, T., "The 'Super Cockpit' and its Human Factors Challenges". Proceedings of the Human Factors Society Symposium, November 1986.

Furness, T., "Fantastic Voyage". Popular Mechanics, December 1986.

Furness, T., Kocian, D., "Putting Humans into Virtual Space". Proceedings of the Society for Computer Simulation, Aerospace Conference, January 1986.

Furness, T., "Virtual Panoramic Display for the LHX". Army Aviation, 30 June1985, pp 63-66.

Furness, T., "Virtual Concepts for Crew Member/Computer Integration", American Association for the Advancement of Science Annual Meeting, May 29, 1985.

Furness, T., "Helmet-Display Reading Performance During Whole-Body Vibration". Presented at the.52nd Annual Meeting of the Aerospace Medical Association, San Antonio, Texas, 4-7 May 1981.

Furness, T., "The Effects of Whole-Body Vibration on the Perception of the Helmet-Mounted Display". Ph.D. Thesis, University of Southampton, England 1981.

Furness, T., "The Effects of Whole-Body Vibration on the Perception of Target Imagery Presented on a Helmet-Mounted Display'. Presented to the United Kingdom Informal Group on Human Response to Vibration, Royal Aircraft Establishment, Farnborough, England, September 1979.

Furness, T. "The Use of Visually-Coupled systems in High Vibration and Buffeting Environments". Presented at the Symposium on Aeromedical Considerations of Low Level Flight and Long Duration Missions, 19th Meeting of the Air Standardization Coordination Committee (Working Party 61), Canberra, Australia, November 1978.

Furness, T., Lewis, C., "Helmet-Mounted Display Reading Performance under Whole-Body Vibration". Presented at the United Kingdom Informal Group Meeting on Human Response to Vibration, Silsoe, Bedfordshire, England, September 1978.

Furness, T., "Visually-Coupled Information Systems". ARPA Conference on Biocybernetic Applications for Military Systems, Chicago, Illinois, 5-7 April 1978.

Furness, T., Task, H., and Verona, R., "Current Status and Performance of Helmet-Mounted Displays". Presented at the Symposium on Night Vision Devices and Displays, U.S. Army Night Vision Laboratory, Ft. Belvoir, Virginia, November 1974.

Brindle, J., Furness, T., "Visually-Coupled Systems in Advanced Air Force Applications". National Aerospace Electronics Conference, Dayton, OH, May 1974.

Birt, J., Furness, T., "Visually-Coupled Systems". Air University Review 20(3), pp. 28-40, April 1974.

Slocum, G., Furness, T., "Airborne Multisensor Design". Presented at the International Symposium on Man-Machine Systems, September 1969.

Furness, T., "Helmet-Mounted Displays and Their Aerospace Applications". National Aerospace Electronics Conference, Dayton, OH, May 1969.

Furness, T., "The Application of Helmet-Mounted Displays to Airborne Reconnaissance and Weapon Delivery". Proceedings of the Symposium for Image Display and Recording, Air Force Avionics Laboratory, Wright-Patterson AFB, Ohio, Technical Report TR-69-241, April 1969, AD 700515.

MEDIA PRESENTATIONS

CBC, Virtual Reality Special, November 1991

BBC, "Colonizing Cyberspace", July 1991

ABC Evening News, Peter Jennings, June 1991

NOVA, "Top Gun and Beyond", March 1988

CBS Evening News, March 1987

CNN Technology Review

INVITED PRESENTATIONS

Keynote Address, Northcon '92, Seattle, WA (19 October 1992)

Keynote Address, National Teachers Training Institute, Seattle, WA (22 August 1992)

Keynote Address, National Marine Educators, Portland, OR (5 August 1992)

Keynote Address, Washington Vocational Agricultural Teachers Association Summer Conference, Olympia, WA (26 June 1992)

Invited Speaker, Broadcast Promotion & Marketing Association together with the Broadcast Design Association, International Conference, Seattle, WA (15 June 1992)

Invited Speaker, Bellevue Rotary, Bellevue, WA (16 June 1992)
Keynote Address, Resource Center for the Handicapped, Seattle, WA (26 June 1992)

Invited Speaker, Washington Vocational Agricultural Teachers Association, Olympia, WA (26 June 1992)

Invited Speaker, Everett Chamber of Commerce, Everett, WA (28 May 1992)

Community Lecture, Santa Fe Institute, Santa Fe, NM (20 May 1992)

Keynote Address, "Learning Virtually", Educational Computing Organization of Ontario, Toronto, Ontario, Canada (6 May 1992)

Technical Presentation, Hughes Research Laboratory, Malibu, CA (16 April 1992)

Invited Speaker, Special Library Association, "Virtual Museums, Knowbots and the End of Steelcase", University of Wasington (2 April 1992)
Keynote Address, NorwesCon, Tacoma, WA (28 March 1992)

Keynote Address, Washington Science Teachers Association, Seattle, WA (21 March 1992)

Keynote Address, Junior Science and Humanities Symposium, Seattle Pacific University (20 March 1992)

Keynote Address, Pacific Science Center Corporate Sponsors, Seattle, WA (3 March 1992)

IEEE Plenary, San Francisco, CA (27 February 1992)

Invited Speaker, Society for Information Management, Bellevue, WA (19 February 1992)

Invited Speaker, Seattle Chamber Community Development Roundtable, Seattle, WA (27 January 1992)

Guest Lecturer, Students; Teacher In-Service, Teachers; Presentation to Parents, Waterville School District, WA (23 January 1992)

Keynote Address, NICCOGRAPH, Tokyo, Japan (November 1991)

Keynote Address, Computer Using Educators, "Learning Virtually", Vancouver, BC (8 November 1991)

Keynote, DreamCon 6, Everett, WA (2 November 1991)

Keynote Address, Technology in Education, Pacific Science Center, Seattle, WA (29 October 1991)

Invited Speaker, Student Chapter of IEEE, "Virtual Interface: What Kind of a World do You Want?", University of Washington (15 October 1991)

Keynote Address, Future of Education and Technology, Seattle, WA (22 June 1991)

Guest Lecturer, Evergreen State College, Olympia, WA (31 May 1991

Closing Plenary, "Exploring Virtual Worlds", Closing Plenary, SIGCHI 1991 New Orleans, LA (May 1991)

Tutorial, Interface '91, Seattle (23 April 1991)

Keynote Address, President's Special Interest Group, Washington Software Association, Kirkland, WA (22 April 1991)

Invited Speaker, International Colloquium on Acoustics, Bochum, West Germany (April 1991)

Guest Speaker, Bellecore Technical Council (13 March 1991)

Keynote Speaker, Washington Association of School Administrators, Wenatchee, WA (6 March 1991)

Host and Featured Speaker, First Industry Symposium on Virtual Worlds Technology, University of Washington (21-22 February 1991)

Guest Lecturer, Industrial College of the Armed Forces, Fort McNair, VA., (January 1989, February 1990, March 1991)

Keynote Speaker, Washington Horticultural Society Annual Meeting (January 1991)

Speaker, Homecoming Festivities, University of Washington, Seattle, WA (10 November 1990)

Keynote Address, Washington State Science Teachers Conference, (27 October 1990)

Speaker, DIS Forum, Olympia, WA (23 October 1990)
Keynote, Windows of Opportunity Conference, Evergreen State College, WA (10 October 1990)

Speaker, "Cobwebs in a Virtual Attic",.Cyberthon, San Francisco, CA, (6 October 1990)

Speaker, ASIS, Seattle, WA (29 September 1990)

Speaker, Economic Development Council Board, Seattle, WA (9 September 1990)

Banquet Speaker, Science Fiction Writers of America, Annual Meeting and Nebula Award Presentation, San Francisco, CA., (25 April 1990)

Keynote Speaker, University of Washington College of Engineering Open House, (25 April 1990)

Session Chairman and Speaker, Aerospace and Military Graphics, National Computer Graphics Association International Symposium, Anaheim, NC, (21-22 March 1990)
Guest Lecturer, Computer Science Department, University of North Carolina Chapel Hill, NC (23 February 1990)

Invited Speaker, Washington Tree Fruit Research Commission, Wenatchee, WA., (16 February 1990)

Invited Speaker, University of Washington Student Nanotechnology Group, (8 February 1990)

Dinner Speaker, Puget Sound Chapter of the Human Factors Society, Bellevue, WA., 31 January 1990

Guest Speaker, Computer Applications in Landscape Architecture Conference, College of Architecture, University of Washington, Seattle, WA (26 January 1990)

Invited Speaker, Institute of Industrial Engineering, Puget Sound Chapter, Seattle, WA (9 November 1989)

Special Speaker/Consultant to State of Utah--Governor's Committee on Technology Development--Three Dimensional Imaging, Salt Lake City, UT (31 July 1989)

Banquet Speaker, Texas Association of Computing in the Public Sector, Austin,TX, (24 July 1989)

Banquet Speaker, Advanced Cockpit Systems Short Course, University of Dayton, Dayton, OH (22 June 1989)

Invited Speaker, Combat Aircraft and the Super Cockpit, 7th Meeting on Aeronautics and Space Medicine, Paris Air Show (12 June 1989)

Guest Lecturer, Industrial College of the Armed Forces, Ft. McNair, VA (23 February 1989)

Seminar Speaker, Wright State University, College of Engineering, Dayton, OH (11 January 1989)

Guest Lecturer, University of Washington, College of Engineering, Seattle, WA, (6 December 1988)

Guest Lecturer, Brigham Young University, College of Engineering, Provo, UT (1 December 1988)

Luncheon Speaker, Dayton Area Technology Network, Dayton Engineer's Club, Dayton, OH, 22 November 1988

Keynote Speaker, "Putting Pilots into Virtual Space", Institute of Electrical and Electronic Engineers, FALLCON '88, Cedar Rapids, IA (17 Nov. 1988)

Luncheon Speaker, Harvard University, JFK School of Government, Workshop on Emerging Technologies, Strategic Computing in the Public Sector Program, Cambridge, MA (10 November 1988)

Guest Lecturer, University of Utah, College of Engineering, Center for Engineering Design (September 1988)

Banquet Speaker, Advanced Cockpit Systems Short Course, University of Dayton, Dayton, OH (2 March 1988)

Guest Seminar Speaker, Apple Computer Inc., Cupertino, CA (September 1988)

Invited Speaker, Conference on Decision Making and Information Processing: Contextual Influences, School of Management, State University of New York at Buffalo (9-10 June 1988)

Banquet Speaker, Workshop on Human Performance in Design, University of Dayton, Dayton, OH (June 1988)

Guest Lecturer, Carnegie-Mellon University, Department of Computer Science, Software Engineering Institute (March 1988)

University of Washington Correspondence

INTERDEPARTMENTAL

DATE: November 18, 1992

TO: Thomas A. Seliga, Chair

FROM: Robert J. Marks II

SUBJECT: Adjunct appointment of Dr. Thomas A. Furness III

I request that Dr. Thomas A. Furness III be considered by the faculty for appoint as Adjunct Professor in our department with subsequent appointment to the Graduate Faculty. Dr. Furness currently has an appointment of Professor in Industrial Engineering and serves as the Director of the Human Interface Technology Laboratory.

Professor Furness' CV is attached.

file

UNIVERSITY OF WASHINGTON
The Graduate School

November 10, 1993

Professor Jeng-Nang Hwang , Chairperson

Professor R. Douglas Martin , Graduate Faculty Representative, Statistics
Professor Linda Shapiro
✓Professor Robert Marks
Professor James Ritcey

Dear Colleagues:

I am writing to ask you to serve as members of the Supervisory Committee for Tsung-Yen Chen who wishes to enter the doctoral program leading to the degree of Doctor of Philosophy in the field of Electrical Engineering.

It will be your responsibility as a committee (a) to approve a course of study which will fulfill the general course requirements of the student's major and supporting fields; (b) to conduct the student's General Examination; (c) to approve the Candidate's dissertation proposal; (d) to approve the Candidate's dissertation and (e) to conduct the Candidate's Final Examination. The Graduate Faculty Representative is a voting member of the Committee and participates fully in carrying out all of the responsibilities listed above. For additional information you may refer to Graduate School Memorandum #13, "Supervisory Committees for Graduate Students."

The Supervisory Committee Chairperson is responsible for scheduling conferences and examinations and for informing all members of the Committee of the appropriate times and places. At least four members of the Committee, including the Chairperson and the Graduate Faculty Representative, must be in attendance at all conferences and examinations. At least three weeks prior to the agreed upon examination date, the Chairperson should ask the Dean of the Graduate School to approve the application for the examination and to announce it in The University Week. The Supervisory Committee must be convened by the Chairperson, whether the examinations are oral or written, and formal judgment on the Candidate's performance must be indicated on the warrant, dated and forwarded immediately to the Graduate School.

Members of the Supervisory Committee of a doctoral aspirant undertake a serious charge. They are responsible to the student and to their colleagues of the Graduate Faculty for the quality of the degree being sought.

Sincerely,

Gene L. Woodruff
Dean

GLW:ja
cc: Graduate Student: Tsung-Yen Chen
Graduate Program Coordinator: Professor S.S. Venkata
Student file

January 20, 1993

file

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@u.washington.edu

November 2, 1992

TO: Thomas A. Seliga, Chair
FROM: Robert J. Marks II, Professor
SUBJECT: Adjunct Appointment of Ceon Ramon

I request that Dr. Ceon Ramon be presented to the faculty for purposes of appointment as an Adjunct Research Assistant Professor. He currently holds the title of Research Assistant Professor in Bioengineering.

I have been working with Dr. Ramon in a number of research projects. It is appropriate that he serve on the committees of those EE students who are involved in this research.

A copy of Dr. Ramon's *curriculum vitae* is attached.

cc: Dr. Lee Huntsman, Director
Bioengineering

1. Copy of everything for file
2. Huntsman does not need CV
3. Send original to Seliga

revised October, 1992

CURRICULUM VITAE

CEON RAMON

ADDRESS: Center for Bioengineering, FT-10
University of Washington, Seattle, WA 98195
Telephones: (206) 543-6832, 543-6833, *FAX: (206) 685-3300*
E. mail: ceon@uwavm.u.washington.edu

CITIZENSHIP: U.S. citizen.

EDUCATION:

Ph.D.: March 1973, Electrical Engineering, University of Utah

B.E.(Honors): August 1966, Electrical Engineering, Indian Institute of Science, Bangalore, India

RESEARCH/PROFESSIONAL APPOINTMENTS

1989-present	University of Washington, Seattle, WA. Research Assistant Professor, Center for Bioengineering, May 1992-present; Research Engineer, Center for Bioengineering, April 1990-April 1992; Associate Director, Biomagnetics Imaging Initiative, Center for Bioengineering, 1989-present;
1980-89	Senior Scientist 1984-89; Research Associate 1980-84; Institute of Applied Physiology and Medicine, Seattle, WA.
1981-82	Assistant Professor, Department of Electrical Engineering, Seattle University, Seattle; joint appointment.
1979-80	Research Associate, Cardiology Division, Children's Hospital and Medical Center, Seattle, WA.
1978-79	Visiting Assistant Professor, Department of Electrical Engineering, State University of New York/Stony Brook.

AFFILIATIONS:

Eta Kappa Nu, Sigma Xi, Bioelectromagnetic Society (BEMS), Institution of Electrical and Electronics Engineers (IEEE)

CURRENT RESEARCH WORK:

Biomagnetic inverse problem and biomagnetic imaging. Current work is on software development to localize electrical sources from the measured magnetic field and its applications in cardiology.

PATENTS:

Noninvasive Magnetic Pacemaker, U.S. Patent, July, 1992.

Noncontact Fiber-optic Remote sensor for electrical currents; in preparation for submission, 1992

TEACHING AND STUDENT ADVISING AT THE UNIVERSITY OF WASHINGTON

Teaching

Spring 1991 Bioeng 562 Bioelectromagnetics

Winter 1992	Bioeng 599A	Readings in Instrumentations; Instructors: L. Pagliaro, C. Ramon, F. A. Spelman
Fall 1992	Bioeng 599G	Mathematical Foundations of Image Reconstructions (New Course)

Student Advising and Thesis Supervision

1990-1991 M. G. Meyer, M.S. thesis in Electrical Engineering, "Application of projection theorem in biomagnetic computed tomography,"; joint supervisor with R,. J. Marks II.

1990- P. Yamshiro, doctoral candidate in Bioengineering, subject area: biomagnetic imaging of cardiac functions under exercise; supervisor.

1992- Robert Kipp, doctoral candidate in Electrical Engineering; part of the advisory committee

PUBLICATIONS LIST OF DR. CEON RAMON:

I. Refereed Journal Articles and Book Chapters

1. C. Ramon, "Studies of the tunability of stimulated Raman effect due to the polaritons in GaP and KDP crystals," Ph.D. thesis, 1973.

2. C. Ramon and R.W. Grow, "Raman susceptibility measurements and stimulated Raman effect," Optics Comm., 8, 82, 1973.

3. C. Ramon, C.H. Wang and R.W. Grow, "Temperature dependent Raman study of KDP in paraelectric phase," Chem. Phys. Lett., 26, 157, 1974.

4. C. Ramon and C.H. Wang, "Breakdown of selection rules in the Raman spectra of KDP, " J. Chem. Phys., 26, 3439, 1975.

5. C. Ramon, C.H. Wang and R.W. Grow, "Angular dependent Raman scattering of KH_2PO_4," Chem. Phys. Lett., 35, 264, 1975.

6. C. Ramon and E.A. Rauscher, "Superluminal transformation in complex Minkowski space," Found. Phys., 10, 661, 1980.

7. C. Ramon, M. Ayaz and D. D. Streeter, Jr., "Inhibition of the growth rate of Escherichia coli induced by low frequency magnetic fields," Bioelectromagnetics, 2, 285, 1981.

8. D.D. Streeter, Jr. and C. Ramon, "Muscle pathway Geometry in the Heart Wall," Jour. Biomech. Engr., 105, 367, 1983.

9. D.D. Streeter, Jr. and C. Ramon, "An Engineering Analysis of Muscle Fibers in the Heart Wall," In: Estructura y Mecanica de Corazon, ed., F. Torrent Gausp, Barcelona, Spain, GRASS Ediciones, 1987, pp. 176-193.

10. C. Ramon, M.R. Powell and J. Martin, "Field Induced Growth Modulation of B. Subtlis Bacteria," Bioelectromagnetics, 8, 275, 1987.

11. C. Ramon and M.R. Powell, "Modification of heart rate under the influence of low intensity pulsed magnetic fields," Bioelectromagnetics, accepted for publication; to appear in March/April, 1992 issue.

12. C. Ramon, M.G. Meyer, A.C. Nelson, F.A. Spelman and J. Lamping, "Simulation studies of biomagnetic computed tomography," submitted to the IEEE Transactions on Biomedical Engineering, June 1991.

13. S. Oh, C. Ramon, M.G. Meyer, and R.J. Marks II, "Resolution enhancement of the biomagnetic images using the method of alternating projections," accepted for publication in the IEEE Transactions on Biomedical Engineering, December 1991.

14. M.G. Meyer, C. Ramon, S. Oh, R. J. Marks II, and F.A. Spelman, "Conductor localization and current quantification in biomagnetic computed tomography," under revision for publication in the IEEE Transactions on Medical Imaging, December 1991.

15. P.K. Yamashiro, S.M. Yamashiro, C. Ramon, D.B. Kynor, "High resolution magnetocardiography during exercise," under revision for submission, October 1992.

16. R. Rempt, C. Ramon, "Detection of cardiac magnetic field with fiber-optic magnetic gradiometer," submitted to the Photonics Technology Letters, October 1992.

II. Proceedings of Refereed Conferences

1. C. Ramon and R.W. Grow, "Theory of tunable stimulated Raman effect using Polariton modes in anisotropic crystals," J. Opt. Soc Amer., 60, 1542, 1970.

2. C. Ramon and K. Varma, "Light scattering functions of single micron size irregularly shaped dust grains," International Radiation Symposium, August 11-16, 1980, Colorado State University, Fort Collins, Colorado.

3. D.D. Streeter, Jr. and C. Ramon, "Computer Graphic Equations of the Muscle Pathways in the Heart Wall," Proc. Tenth Ann. Northeast Bioengineering Confr., March 1982, pp. 253-256.

4. M.G. Meyer, C. Ramon, A.C. Nelson, F.A. Spelman and J. Lamping, "Biomagnetic image reconstruction in three-dimensions," 8th International Conference on Biomagnetism, Münster, Germany, Aug. 18-24, 1991, Book of Abstracts, pp. 331-332,

5. M.G. Meyer, C. Ramon. A.C. Nelson, F.A. Spelman and J. Lamping, "Application of the projection theorem in Biomagnetic Computed Tomography," 13th Annual International Conference of the IEEE Engineering in Medicine and Biology, October 31 - November 3, 1991, Orlando, Florida, vol. 13, pp. 51-52.

6. C. Ramon, S. Oh, M.G. Meyer, R.J. Marks, "Biomagnetic image

reconstruction using the method of alternating projections," SPIE conference, February 24-27, 1992, New Port Beach, CA; Medical Imaging IV: Image Processing, vol. 1652, pp. 131-139.

7. F.A. Spelman, J. Nelson, C. Ramon, "Noninvasive magnetic measurements of gut motility," 14th Annual International Conference of the IEEE Engineering in Medicine and Biology, October 29-November 1, 1992, Paris, France.

8. R. D. Rempt, C. Ramon, " Fiber-optic sensor for detection of cardiac magnetic field," SPIE Biomedical Optics "93 Conference, 16-22 January 1993, Los Angeles, CA; paper to be published in SPIE Proceedings on Fiber Optic Sensors in Medical Diagnostics, vol. 1886, 1993.

III. Conference Abstracts

1. C. Ramon, M. Ayaz and D.D. Streeter, Jr., "Effect of low frequency weak magnetic field on Escherichia coli," Second Annual Bioelectromagnetic Society Meeting, September 14-18, 1980, San Antonio, Texas.

2. C. Ramon and D.D. Streeter, Jr., "Theoretical models of the interaction of the low frequency weak magnetic fields with microorganisms," Third Annual Bioelectromagnetic Society Meeting, August 10-12, 1981, Washington, D.C.

3. C. Ramon, M.R. Powell and J. Martin, "Electromagnetic field induced growth modulation of B. Subtilis bacteria," Bioelectromagnetic Society Meeting, June 12-16, 1983, Boulder, Colorado.

5. J. Nelson, F. Spelman, C. Ramon, J. Star, "Noninvasive intestinal motility assessment using ingested magnet and bipolar magnetometer," paper presented at the American Gastroenterological Association meeting, May 10-13, 1992, San Francisco, CA.

cv\cvtotal

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

October 26, 1992

TO: E. E. Faculty

FROM: Eddie E.

RE: MSEE and PhD Supervisory Committee Lists

Attached are updated lists indicating MS and PhD students and their supervisory committees for Autumn Quarter 1992.

Please return your copy if you have any corrections.

Att.

MSEE STUDENT LIST
October 1992

*New Autumn 92

STUDENT	CHAIR	COMMITTEE MEMBERS
ANDERSON, Michael (TIE)*		
AFLAKIAN, Ramin (TIE)	Lauritzen	Andersen, Liu
ALEXANDRO, V. (TIE)	Noges	Clark, Andersen
ALLEMAN, Andrew	Kim	Soma, Hwang
ASGEIRSSON, A.	Shapiro	Hwang, Haralick
ATTERI, R.	Venkata	Christie, Sumic
AU, Chad (TIE)	Chan	Tsang, Ishimaru
BAGHAI, Mehran (TIE)	Shapiro	Soma, Notkin
BARTLETT, Janet*		
BELANGER, Bradley	Liu	Damborg
BERNS, Hans-Gerd	Porter	
BHATTI, Pamela	Hannaford	Soma, Andersen
BJERKE, Kelly (TIE)	Tsang	Ishimaru, Chan
BLADEK, Anthony	Belcher	Somani, Katz
BODYFELT, Clark		
BONJOUR, Barbara (TIE)		
BOWERS, Russell (TIE)	Chan	Ishimaru, Tsang
BRADLEY, Schuyler	Ritcey	Afromowitz, Meditch
BROCKSCHMIDT, K.	Soma	
BROWN, Richard*		
BURNS, John (TIE)	Lytle	
BUSH, John (TIE)	Kim	Riskin, Shapiro
BYRNE, Molly Jo*		

CABRAL, James	Kim	White, Spelman
CALDWELL, James (TIE)	Lytle	Afromowitz, Noges, Guildford
CECIL, James (TIE)	Kim	Tanimoto, Shapiro
CHANDAK, Sanjeev*		
CHEN, Tsung-Yen	Hwang	Ritcey, Lee
CHINN, Crispin	Pinter	Ritcey
CHIU, Peter (TIE)	Andersen	Helms, Soma
CLAYTON, Craig*		
COLLINS, Cary*	Kim	
COREY, Steven*		
COSTA, Wendy	Lewellen	Kim, Nelson
CRAWFORD, Mathew*		
CUMMINGS, Will (TIE)	Somani	Kim, Lytle
CZAPSKI, Piotr	Seliga	Tsang, Chan
DABELSTEIN, Donald (TIE)		
DALY, Douglas*		
DANSET, Paul		
DAVIS, Bryan (TIE)	Darling	Helms, Afromowitz
DAVIS, Mark (TIE)	Tsang	Peden, Ishimaru
DEFRANZA, Mark*		
DEGUZMAN, Dennis*		
DEVARAYANADURG, G.		
DONG, Michael	El-Sharkawi	Helms, Damborg
DU, Huong	Ritcey	Hwang, Anderson
DUONG, Ngoc-Truc*		
EDWARDS, Douglas	Christie	Venkata

ELSON, John	Chan	Ishimaru, Tsang
EMERY, Robert*		
ENG, Jimmy	Holden	Hwang
ERWIN, Grant	Helms	Soma, Atlas
FAN, Dashen		
FINK, Kevin*		
FLETCHER, Robert (TIE)*		
FRAZIER, Michael (TIE)	Clark	Damborg, Albrecht
GAILLY, Alexandre*	Yang	
GELLNER, Jeffrey*		
GEORGE, George (TIE)	Tsang	Chan
GRIEP, Karl	Ritcey	Atlas, Belcher
HAFF, Andrew*		
HALVERSEN, Gary (TIE)	Chan	Tsang, Kuga
HAMASAKI, George (TIE)		
HANSEN, James*		
HAYES, Keith L.	Andersen	
HEALY, Thomas	Kim	Atlas
HENDRICKSON, Steven	El-Sharkawi	Clark, Leondes
HESTER, Jeffrey (TIE)		
HOLCOMB, Thomas	Kim	Soma
HUANG, Xiao	Soma	Chan, Dow
Il, Mutsuya (TIE)	Kim	Atlas, Shapiro
ISLAM, Tamal*		
JAHROMI, Babak (TIE)	Somani	Shapiro, Zick

JOHNSON, Lloyd (TIE)*		
JOHNSON, Roger (TIE)		
JOHNSON, Mary*		
JOHNSTON, Kyle*		
JUDD, Randall R.	Luby	Lytle, Jackson
KAGALAWALA, Raxit	Venkata	El-Sharkawi, Lauritzen
KARASU, Sinan	Haralick	Shapiro, Ritcey
KIM, Gary	Ishimaru	Afromowitz, Tsang
KITICHOTPANIT, B.	Kuga	Tsang, Ishimaru
KORN, Eric (TIE)	Lytle	Atlas, Alexandro
KUTZ, Harold (TIE)	Soma	Yang, Yee
LAMAY, Brian (TIE)	Damborg	Clark, Noges
LEE, Chuan V.	Shapiro	Holden, Haralick
LEE, Mike (TIE)	Yang	Lytle, Andersen
LI, Hang	Hwang	Holden, Riskin
LIEU, Brian (TIE)	Hwang	Ritcey, Marks
LIN, Chyou-Jong*	Liu	
LIU, Yu	Yang	Soma, Chan
LONG, Bo*		
LU, Haijin	Helms	Anderson
LUU, Sujen	Liu	Venkata, Damborg
MACDONALD, Hillary	Afromowitz	Carey, Young
MAHADEV, P.	Christie	Venkata, Ramey
MALMBERG, Jane	Soma	Helms, Andersen
MANNING, Clyde (TIE)		
MAR, Mimi*		

McCormick, Sherman (TIE)	Noges	Damborg, Clark
McLAUGHLIN, Lynn	Christie	
MERCER, Roderick (TIE)	Atlas	Marks, Riskin
MERKEL, Kristian*		
MILLER, Stephen (TIE)		
MINAHAN, Michael	Venkata	
MONROY, Hector	Seliga	
NAKAHARA, Mike	Kim	Soma, Helms
NELSON, Eric	Winebrenner	Ishimaru, Tsang
NILSON, Christopher	Darling	Soma, Atlas
NORDENG, Arnold (TIE)	Lauritzen	Andersen, Dow
NORTHROP, Michael	Seliga	
NOVAK, Mark (TIE)		
NOVEL, Craig	Pinter	Spelman, Gunteroth
OLSEN, Clinton		
OWSLEY, Lane		
PARSONS, David*		
PETERSON, Roy (TIE)	Atlas	Hwang, Beach
PHAN, Tuan	Somani	Holden, Haralick
QUINN, Michael (TIE)	Soma	Helms
RAJESH, Ramnath	Albrecht	Somani
RAJU, N-Ravisekhav	Venkata	El-Sharkawi, Christie
RAMAMOORTHY, S.(TIE)		
RAY, Joshua (TIE)		
REEVE, Jeffrey*		
RICE, Daniel	Kuga	Ishamaru, Chan

ROSENWALD, Gary*		
RYAN, Patrick	Sahr	Chan, Porter
SANDADI, Upender	Somani	Soma, Ritcey
SENGSON, John*		
SEPP, Kalev*		
SHARMA, Nigel*		
SHEA, Kevin (TIE)	Hwang	Atlas
SHERIDAN, John (TIE)	Ishimaru	Sigelman, Dow
SHIN, Kevin (TIE)		
SHOEMAKER, Melani	Hannaford	Damborg, Hwang
SHRINIDHI, Nandini	Kim	Chan, Haynor
SIDERIUS, Thomas	Porter	
SINN, Tak Yen	Kim	Soma, Hwang
SMITH, David*		
SMOKOFF, Timothy		
SON, Kyungim*		
STAFFORD, John (TIE)*		
SZOFRAN, John*		
TAYLOR, Cynthia*		
TENG, Chia-Chi (TIE)	Shapiro	Riskin, Hwang
TO, Michael (TIE)	Liu	Anderson, Lytle
TOLMIE, Richard		
TSE, Robert (TIE)	Noges	
TUCKER, Thomas*		
UPPALA, Sathya	Sahr	Atlas, Ritcey
VENDETTI, Dino (TIE)	Ritcey	Sahr

VENEMA, Steven	Hannaford	Hwang, Noges
VO, Danh	Damborg	Clark
WELTON, Kevin	Hannaford	
WEN, Nuan	Haralick	Swartzman
WILSON, Bruno (TIE)		
WOLFE, Larry (TIE)	Kim	Soma
WOOLSEY, Kevin (TIE)	Chan	Tsang
WU, Wei	Haralick	Hwang
XIONG, Yuhong	Kim	Hwang, Soma
XU, Haichen*		
YOUNG, Joseph*		
ZHONG, Hang	Christie	Liu, Venkata
ZIMMERMAN, David	Pinter	Helms, Spelman

PH.D. STUDENTS
AUTUMN QUARTER 1992

STUDENT	CHAIR	COMMITTEE MEMBERS	G.F.R.
AL-ALUSI, Mazin	Darling	Afromowitz, Tsang, Pearsall Lamoreaux	Stern
ALKURD, Azmi	Porter	Atlas, Hannaford, Chan, Lytle	Percival
ARABSHAHI, Payman	Marks	Meditch, El-Sharkawi, Caudell, Choi	Fetz
ARYAL, Sushi	Meditch	Ritcey, Hwang, Somani	Zahorian
BAILEY, David			
BARNES, Stephen			
BAYER, Stephen			
BUDIHARDJO, I.	Lauritzen	Yee, Yang, Darling	Garbini
BUSHBECK, Mark	Chan	Tsang, Ishimaru	
CHANG, Yu-Hsu			
CHANSUNGSAN, C.	Tsang	Yee, Yang, Darling	Stern
CHAROENROOK, A.			
CHEN, Chung-Ho	Somani	Hwang, Shapiro, Baer	Plumb
CHEN, Julie			
CHEN, Shyng-Duan	Helms	Darling, Dow, Andersen	Spelman
CHEN, Su			
CHEN, Zhengxiao	Tsang	Ishimaru, Kuga, Hwang	Martin
CHIANG, Meei-Ling			
CHIOU, Greg			
CHOU, Ching Ping	Hannaford		
CONNOR, Jerome	Atlas	Hwang, El-Sharkawi, Martin	Fetz
COSTA, Mauro	Shapiro		

CURRY, Clifford			
DAI, Liming			
DALLABETTA, K. (TIE)			
DAVIS, Daniel			
DESOTO, Larry	Kim	Afromowitz, Nelson, Haynor	Levy
DIETZE, William	Darling	Yee, Tsang, Kuhn	Olmstead
DITTMER, G.			
DRUFFNER, G.(TIE)			
ELLIS, Grant	Peden	Lytle, Tsang	Booker
FANG, Jing	Atlas	Riskin, Pinter, Bernard	Martin
FOLSOM, Tyler	Pinter	Atlas, Holden	Olavarria
FOX, Warren	Luby		
FRANK-MOLNIA, D.			
FURA, David	Somani	Shapiro, Soma, Shaw	Borriello
GAO, Xiaoping	Yee		
GOLDSCHNEIDER, J.	Meditch	Ritcey, Soma, Somani	Zahorjan
GREEN, J.			
GREENE, F. M.	Holden	Lytle, Riskin, Hwang	Spelman
GU, Goson			
GUAN, Bingzhong			
GUPTA, Alok			
HA, Jaekyu	Haralick		
HENLING, Brian	Soma	Somani, Shapiro	Baer
HINZ, Robert			
HOLM, John	Ritcey	Atlas, Lytle, Tsang	Joppa
HSIEH, Jimmy	Liu	Lauritzen, Soma, Yang	Palmer
HSU, Jer-Jaw	Sechen		

HUANG, Shyh-Jier			
HUANG, Tony	El-Sharkawi	Marks, Ritcey, Alexandro	Vagners
HWANG, Dal-Yeon			
IYENGAR, Gita U.			
JAISHIMA, M.Y.	Haralick		
JONG, Jing-Ming			
JORGENSON, Ralph	Yee	Afromowitz, Kuhn, Tsang, Vogel	Burns
JOUGHIN, Ian	Winebrenner	Ritcey, Tsang	Percival
JUNG, Chuck	Yee	Kuhn, Darling, Afromowitz	Olmstead
JUNG, Souhwan			
KACZKOWSKI, P.	Thorsos	Jackson, Ishimaru, Tsang	Sorensen
KANUNGO, Tapas	Haralick		
KIA, Arash	Darling	Kuhn, Tsang, Yee	Olmstead
KIM, Dong-Lok	Kim	Hwang, Shapiro, Riskin	Rowberg
KIPP, Robert	Chan	Ishimaru, Ritcey, Soma	Ramon
LAM, Lawrence			
LAMPING, Jeff	Spelman		
LAY, Shyh-Rong	Hwang	Lytle, Holden, Lippman	Martin
LAYBOURN, Loren			
LEE, Changkyu	Haralick	Shapiro, Sheehan	Pollack
LEE, Chung Nan	Haralick	Liu, Marks, Shapiro	Tanimoto
LEE, Hee-Sub	Kim	Riskin, Lytle, Rowberg	Baer
LEE, Shinhak	Hwang		
LEE, Woobin	Kim		
LI, Li	Chan		

LI, Tsung-Lung	Kuhn	Darling, Tsang, Chan	Mattick
LI, Zhi	Marks	Atlas, El-Sharkawi, Ritcey	Cramer
LIM, Yong Je			
LIN, Pao-Yi			
LIN, Po-Jung	Meditch	Hwang, Ritcey, Somani	Ladner
LIOU, Kan-Lee	Liu	Venkata, Damborg, Christie	Burke
LIU, Hain-Ching			
LIU, Le-Chin	Yang		
LIU, Xufei	Haralick		
MA, Cliff	Lauritzen	Venkata, Yang, Darling	Corlett
MA, Ta-Kang	Liu	Damborg, Venkata, Christie	Palmer
MARBOT, Pierre	Hannaford		
MARTY, William	Spelman	Soma, Helms, Smith	Feigl
McLAUGHLIN, John			
MELLEMA, Garfield			
MIAO, Hanjin	Liu		
MIYAOKA, Robert	Lewellen	Darling, Afromowitz, Graham	Nelson
MODAYUR, Bharath	Shapiro		
MOEHRING, Mark	Ritcey	Ishimaru, Hwang	Beach
MOON, Seok Yong	Hwang	Hannaford, Holden, Atlas	Percival
MOORE, Victor	Pinter		
NARAYANAN, S.B.			
NGUYEN, A. (TIE)	Lytle		
PAK, Kyung			
PHU, Phillip	Ishimaru	Tsang, Peden, Kuga	Martin
PITTON, James	Atlas	Burns, Percival	Bernard

RACKSON, Michael			
RAHIMI, Kambiz			
RAMESH, V.	Haralick	Shapiro, Atlas	Anderson
REED, Russell	Marks	El-Sharkawi, Hwang, Holden	Fetz
RIVERA, C.	Atlas	Ritcey, Percival, Lytle, Meditch	Music
RODENHISER, K.	Spelman		
ROEHR, Christian	Atlas		
ROY, Kalapi	Sechen		
RYSTROM, Larry	Haralick and Katz	Shapiro, Ritcey	Percival
SARNAIK, Tushar	Somani	Moritz, Soma, Marks	Baer
SAVAGE, J.	Holden		
SCHIMPF, Paul			
SCHOEMIG, Ewald	Clark	Noges, Ly, Vagners	Berg
SENGERS, Adriaan	Tsang	Darling, Kuhn, Yee	Olmstead
SENGERS, Lynn	Ishimaru	Winebrenner, Kuga	Grenfell
SHEN, Li			
SHIN, Hong-Sup	Lytle	Alexandro, Marks	Martin
SONG, Bonggee			
SONG, Ki-Sang	Somani	Meditch, Zick, Riskin	Plumb
SRINIVAS, B.	Meditch		
STREIFEL, R.			
SUGIYAMA, S.	Moritz		
SUN, Wern-Jieh	Sechen		
SURI, Jasjit	Haralick		
THORNTON, Ken	Haralick		
TRIDANDAPANI, S.	Meditch	Kim, Lytle, Somani	Zahorjan

TSAI, Men Shen	Liu	Damborg, Venkata, Ritcey	Palmer
TSENG, Yen-Hao			
WANG, Chien-Jen	Hwang		
WANG, Frank	Darling	Pearsall, Yee, Kuhn	Thouless
WANG, Ren-Yuh	Riskin	Atlas, Hwang, Shapiro	Ladner
WANG, Shihming	Liu	Damborg, El-Sharkawi, Hwang	Palmer
WANG, Wei-Chih	Yee		
WANG, Xiaodong	Yee	Afromowitz, Hwang, Soma	Kowalski
WEI, Xinguo	Venkata	Damborg, Christie, Sumic	Snyder
WEMPLE, Ivan			
WEN, Qian	Ritcey		
WEST, Richard	Tsang		
WITTENBRINK, C.	Somani	Haralick, Shapiro, DeRose	Ganter
XING, Jian	El-Sharkawi	Damborg, Lauritzen, Alexandro	Garbini
YAO, Tzu-Wen	Yang	Chan, Soma, Sechen	Weld
YAO, Yung-Hsi	Haralick	Shapiro, Somani, Hwang	Hunt
YAPP, Lawrence			
YEH, Erh-Chun	Venkata	Liu, Christie, Sumic	Nyerges
YU, Qicheng	Sechen		
ZHANG,Xining			
ZURK, Lisa Marie			

file

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

November 2, 1992

TO: Office of Graduate Admissions, AD-10

FROM: S. S. Venkata, Professor
Graduate Program Coordinator

RE: Bongee SONG #9125890

Please issue a new I-20 for the above student. Mr. Song is a full-time Ph.D. graduate student in the Department of Electrical Engineering. He has passed his Qualifying Examination and set up his Supervisory Committee. The Department has awarded Mr. Song with a teaching assistantship beginning September 16 through December 15, 1992. Remuneration is $1047 per month.

If you have any questions, please do not hesitate to contact me at 3-2157 or his advisor, Professor Marks at 3-6990.

SSV:ew
Att.
cc: Professor R. Marks

file

University of Washington Correspondence

INTERDEPARTMENTAL

October 30, 1992

MEMO TO: EE Faculty and Staff

FROM: Sharon Schlittenhard Sharon

RE: U-WATS Long Distances Charges

Attached for your review are your U-WATS long distance charges for the period April - August, 1992, on Budget No. 06-1030. Please check to be sure that you recognize all the calls, indicate any calls not authorized by you, and indicate any calls that should be charged to a sponsored programs budget by writing the budget number next to the charge. Please return all items as appropriate to me.

Thank you.

UWATS CALLS FOR: MARKS FT10 ROBERT

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
04/01/92	10:37 AM	D	908-562-3861	DUNELLEN	NJ	6	1.40	C
04/01/92	03:19 PM	D	503-681-0118	HILLSBORO	OR	2	.39	A
04/01/92	05:52 PM	E	216-663-5610	MONTROSE	OH	26	3.75	C
04/02/92	10:17 AM	D	818-354-9038	PASADENA	CA	3	.69	A
04/02/92	01:29 PM	D	404-447-4747	NORCROSS	GA	2	.47	A
04/02/92	01:32 PM	D	919-541-7123	DURHAM	NC	3	.70	A
04/02/92	01:36 PM	D	908-562-3920	DUNELLEN	NJ	5	1.16	A
04/02/92	09:18 PM	E	206-776-8995	HALLS LAKE	WA	7	1.33	D
04/03/92	11:50 AM	D	615-372-3759	COOKEVILLE	TN	21	4.88	A
04/03/92	02:28 PM	D	206-477-5073	RENTON	WA	3	.72	D

TS01L

BILLING DATA FOR BUDGET NUMBER 06-1030 FOR APRIL 1992

UWATS CALLS FOR: MARKS FT10 ROBERT

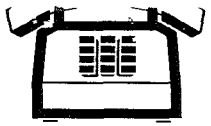
DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
04/03/92	02:31 PM	D	206-543-6990	SEATTLE	WA	2	.48	D
04/03/92	06:12 PM	E	206-543-6112	SEATTLE	WA	35	6.65	D
04/03/92	06:14 PM	D	086571776568	CHINA PEOP		3	8.74	A
04/04/92	06:09 PM	N	206-543-6112	SEATTLE	WA	50	8.00	D
04/06/92	01:38 PM	D	212-705-7366	NEW YORK	NY	2	.47	A
04/06/92	01:52 PM	D	212-705-7356	NEW YORK	NY	2	.47	C
04/06/92	02:02 PM	D	301-394-2042	SILVER SPG	MD	3	.70	C
04/06/92	04:43 PM		206-277-0262	RENTON	WA	1	.00	C
04/07/92	08:47 AM	D	212-705-7366	NEW YORK	NY	4	.93	A
04/07/92	09:56 AM	D	033140794425	FRANCE		2	2.77	A
04/08/92	11:09 AM	D	305-348-3704	MIAMI	FL	45	10.46	A
04/08/92	12:24 PM	D	602-396-1268	MESA	AZ	32	7.32	C
04/08/92	01:09 PM		206-865-3763	BELLEVUE	WA	38	.00	C
04/08/92	01:49 PM		206-823-8628	KIRKLAND	WA	22	.00	C
04/08/92	02:18 PM	D	303-530-4562	BOULDER	CO	14	3.20	C
04/09/92	09:35 AM		206-483-5595	BOTHELL	WA	17	.00	A
04/09/92	11:16 AM	D	303-530-4562	BOULDER	CO	4	.92	A
04/10/92	01:18 PM	D	908-562-3998	DUNELLEN	NJ	12	2.79	C
04/10/92	01:37 PM	D	212-705-7356	NEW YORK	NY	3	.70	C
04/12/92	08:42 PM		206-823-8628	KIRKLAND	WA	8	.00	C
04/13/92	09:35 AM	D	908-562-1571	DUNELLEN	NJ	2	.47	A
04/13/92	12:41 PM	D	919-541-7123	DURHAM	NC	22	5.12	C
04/14/92	10:19 AM	D	305-348-3704	MIAMI	FL	22	5.12	A
04/14/92	05:50 PM	E	216-663-5610	MONTROSE	OH	80	11.53	A
04/15/92	08:24 AM	D	908-562-3906	DUNELLEN	NJ	3	.70	A
04/15/92	12:49 PM	D	512-939-8895	FLOURBLUFF	TX	40	9.15	C
04/15/92	01:36 PM	D	919-922-1633	OLDTOWN	NC	2	.47	C
04/15/92	01:47 PM	D	619-453-6222	LA JOLLA	CA	10	2.29	C
04/15/92	02:24 PM	D	619-453-6222	LA JOLLA	CA	23	5.26	C
04/15/92	03:36 PM		206-392-9180	ISSAQUAH	WA	3	.00	C
04/16/92	09:11 PM		206-823-8628	KIRKLAND	WA	11	.00	C
04/17/92	09:30 AM	D	207-581-2532	ORONO	ME	2	.47	A
04/17/92	11:35 AM	D	303-530-4562	BOULDER	CO	4	.92	A
04/20/92	11:03 AM	D	908-562-3871	DUNELLEN	NJ	8	1.86	C
04/20/92	11:14 AM	D	512-834-7230	AUSTIN	TX	46	10.52	C
04/20/92	02:23 PM	D	404-447-4747	NORCROSS	GA	2	.47	A
04/21/92	11:29 AM	D	404-447-4747	NORCROSS	GA	2	.47	A
04/21/92	12:35 PM	D	812-877-1511	TERREHAUTE	IN	4	.92	A
04/21/92	06:13 PM	E	216-663-5610	MONTROSE	OH	19	2.74	A
04/22/92	09:32 AM	D	314-935-7552	ST LOUIS	MO	3	.69	A
04/22/92	09:40 AM	D	619-453-6222	LA JOLLA	CA	7	1.60	A
04/22/92	02:25 PM	D	619-535-3880	LA JOLLA	CA	2	.46	A
04/22/92	05:03 PM	E	216-663-5610	MONTROSE	OH	5	.72	A
04/22/92	05:57 PM	E	619-755-7210	DEL MAR	CA	18	2.54	A
04/22/92	06:15 PM	E	619-755-7210	DEL MAR	CA	53	7.49	A
04/23/92	03:31 PM	D	812-877-8258	TERREHAUTE	IN	3	.69	A
04/23/92	06:09 PM	E	206-747-5126	BELLEVUE	WA	4	.76	D
04/24/92	09:32 AM	D	619-453-6222	LA JOLLA	CA	4	.92	C
04/24/92	10:36 AM	D	212-705-7356	NEW YORK	NY	2	.47	C
04/24/92	12:25 PM	D	202-767-5028	WASHINGTON	DC	2	.47	C
04/24/92	12:56 PM	D	908-562-3850	DUNELLEN	NJ	65	15.11	C

BILLING DATA FOR BUDGET NUMBER 06-1030 FOR APRIL 1992

UWATS CALLS FOR: MARKS FT10 ROBERT

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
04/27/92	01:34 PM	D	313-577-3966	DETROIT	MI	10	2.33	C
04/28/92	06:01 PM	E	919-481-4269	CARY	NC	37	5.33	A
04/29/92	09:21 AM	D	202-767-5028	WASHINGTON	DC	2	.47	C
04/29/92	10:18 AM	D	908-981-9667	DUNELLEN	NJ	2	.47	A
04/29/92	11:47 AM		206-865-3763	BELLEVUE	WA	21	.00	C
04/29/92	02:35 PM	D	615-372-3759	COOKEVILLE	TN	28	6.51	A
04/30/92	03:58 PM	D	919-481-4269	CARY	NC	4	.93	A
04/30/92	04:02 PM	D	919-481-4269	CARY	NC	14	3.26	A
04/30/92	07:09 PM	E	216-663-5610	MONTROSE	OH	4	.58	A

TOTAL UWATS CHARGES FOR: MARKS FT10 ROBERT 180.37



BILLING DATA FOR BUDGET NUMBER 06-1030 FOR MAY 1992

UWATS CALLS FOR: MARKS ROBERT FT10

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
05/05/92	12:32 PM	D	212-705-7356	NEW YORK	NY	2	.47	A
05/05/92	12:38 PM	D	908-562-3877	DUNELLEN	NJ	12	2.79	A
05/05/92	12:46 PM		206-392-9180	ISSAQUAH	WA	1	.00	A
05/05/92	01:17 PM		206-823-8628	KIRKLAND	WA	29	.00	A
05/06/92	11:37 AM		206-865-3038	BELLEVUE	WA	12	.00	C
05/06/92	11:52 AM		206-865-3038	BELLEVUE	WA	10	.00	C
05/06/92	03:18 PM		206-823-8628	KIRKLAND	WA	15	.00	C
05/07/92	03:19 PM		206-823-8628	KIRKLAND	WA	4	.00	A
05/08/92	08:06 AM		206-823-8628	KIRKLAND	WA	3	.00	C
05/08/92	02:23 PM		206-823-8628	KIRKLAND	WA	2	.00	C
05/08/92	02:26 PM		206-823-8628	KIRKLAND	WA	2	.00	C
05/11/92	10:46 AM		206-823-8628	KIRKLAND	WA	30	.00	C
05/11/92	11:28 AM		206-637-9567	BELLEVUE	WA	8	.00	C
05/11/92	01:58 PM	D	201-386-6346	WHIPPANY	NJ	2	.47	A
05/11/92	04:47 PM		206-823-8628	KIRKLAND	WA	1	.00	C
05/11/92	05:46 PM		206-823-8628	KIRKLAND	WA	41	.00	C
05/19/92	09:53 AM	D	515-294-7745	AMES	IA	2	.46	A
05/19/92	10:10 AM	D	919-541-7123	DURHAM	NC	18	4.19	A
05/19/92	04:41 PM	D	619-453-6222	LA JOLLA	CA	4	.92	A
05/19/92	04:46 PM	D	303-530-4562	BOULDER	CO	5	1.14	A
05/20/92	01:40 PM		206-823-8628	KIRKLAND	WA	1	.00	C
05/20/92	06:40 PM		206-228-6003	RENTON	WA	1	.00	C
05/21/92	10:26 AM	D	212-705-7421	NEW YORK	NY	2	.47	A
05/21/92	11:48 AM	E	070953660394	USSR		3	5.29	A
05/21/92	11:52 AM	E	070953660394	USSR		3	5.29	A
05/21/92	12:14 PM	D	212-705-7356	NEW YORK	NY	2	.47	A
05/21/92	06:04 PM	E	310-320-3088	TORRANCE	CA	14	1.98	A
05/22/92	10:21 AM	D	305-348-3704	MIAMI	FL	8	1.86	A
05/22/92	01:59 PM	D	619-453-6222	LA JOLLA	CA	3	.69	A
05/27/92	02:50 PM	D	303-530-4562	BOULDER	CO	7	1.60	C
05/28/92	10:10 AM	D	410-659-7300	BALTIMORE	MD	2	.47	A
05/28/92	02:25 PM	D	318-231-6854	LAFAYETTE	LA	3	.70	A
05/28/92	04:02 PM	D	206-356-6287	EVERETT	WA	3	.39	A
05/28/92	05:56 PM	E	619-459-6577	LA JOLLA	CA	2	.28	A
05/28/92	05:59 PM	E	619-459-6577	LA JOLLA	CA	88	12.44	A
05/29/92	01:27 PM	D	619-453-6222	LA JOLLA	CA	3	.69	A
05/29/92	01:55 PM		206-637-9567	BELLEVUE	WA	10	.00	A
05/29/92	02:05 PM		206-823-8628	KIRKLAND	WA	1	.00	A
05/29/92	04:49 PM		206-823-8628	KIRKLAND	WA	6	.00	A

TOTAL UWATS CHARGES FOR: MARKS ROBERT FT10 43.06

UWATS CALLS FOR: MARKS ROBERT FT10

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
06/01/92	09:49 AM	N	008525268436	HONG KONG		3	3.79	A
06/01/92	07:41 PM		206-527-7911	SEATTLE	WA	17	.00	C
06/03/92	11:36 AM	D	201-386-4289	WHIPPANY	NJ	4	.93	A
06/03/92	12:28 PM	D	615-372-3759	COOKEVILLE	TN	26	6.05	A
06/04/92	07:48 AM	N	318-231-6854	LAFAYETTE	LA	3	.36	A
06/04/92	07:51 AM	N	407-994-0555	BOCA RATON	FL	2	.24	A
06/04/92	10:58 AM	D	619-455-5530	LA JOLLA	CA	2	.45	A
06/04/92	01:34 PM	D	619-453-6222	LA JOLLA	CA	3	.67	A
06/04/92	02:11 PM	D	410-539-8400	BALTIMORE	MD	4	.93	A
06/04/92	02:35 PM	D	919-922-1633	OLDTOWN	NC	2	.47	A
06/04/92	03:29 PM	D	919-922-1633	OLDTOWN	NC	22	5.12	A
06/04/92	03:59 PM	D	619-455-5530	LA JOLLA	CA	60	13.39	A
06/05/92	10:40 AM	D	310-320-3088	TORRANCE	CA	2	.45	C

TS01L

BILLING DATA FOR BUDGET NUMBER 06-1030 FOR JUNE 1992

UWATS CALLS FOR: MARKS ROBERT FT10

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
06/08/92	02:48 PM	D	212-355-7300	NEW YORK	NY	3	.70	A
06/09/92	09:08 PM	E	206-543-6112	SEATTLE	WA	33	6.27	D
06/10/92	08:19 PM	E	206-543-6112	SEATTLE	WA	9	1.71	D
06/13/92	05:05 PM		206-823-8628	KIRKLAND	WA	64	.00	C
06/14/92	09:40 PM		206-277-0262	RENTON	WA	11	.00	C
06/15/92	06:55 PM		206-747-5126	BELLEVUE	WA	1	.00	C
06/16/92	01:12 PM	D	202-416-1932	WASHINGTON	DC	3	.70	A
06/17/92	09:24 AM	D	303-530-4562	BOULDER	CO	3	.67	C
06/17/92	09:32 AM	D	407-994-0555	BOCA RATON	FL	2	.47	C
06/17/92	05:49 PM		206-747-5126	BELLEVUE	WA	22	.00	A
06/17/92	05:59 PM	E	919-766-6210	WINSTN SAL	NC	18	2.51	A
06/18/92	03:48 PM		206-823-8628	KIRKLAND	WA	15	.00	C
06/19/92	10:00 AM		206-392-9180	ISSAQUAH	WA	2	.00	C
06/19/92	04:14 PM		206-392-9180	ISSAQUAH	WA	1	.00	C
06/21/92	08:21 PM		206-624-1740	SEATTLE	WA	1	.00	C
06/22/92	10:02 AM	D	305-348-3704	MIAMI	FL	11	2.56	A
06/24/92	03:42 PM		206-477-5071	RENTON	WA	1	.00	C
06/24/92	03:44 PM		206-865-3763	BELLEVUE	WA	17	.00	C
06/25/92	11:55 AM	D	305-348-3704	MIAMI	FL	10	2.33	A
06/25/92	12:09 PM		206-865-3763	BELLEVUE	WA	8	.00	C
06/26/92	04:20 PM	D	304-598-1068	MORGANTOWN	WV	2	.47	A
06/29/92	01:34 PM	D	212-460-1500	NEW YORK	NY	2	.47	A
06/30/92	09:36 AM	D	619-453-6222	LA JOLLA	CA	3	.67	A
06/30/92	09:40 AM	D	212-705-7356	NEW YORK	NY	8	1.86	A
06/30/92	09:48 AM	D	415-346-1875	SAN FRAN	CA	12	2.57	A
06/30/92	10:01 AM	D	202-663-1451	WASHINGTON	DC	8	1.86	A
06/30/92	05:14 PM		206-823-8628	KIRKLAND	WA	5	.00	A

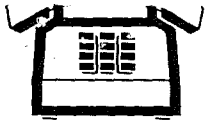
TOTAL UWATS CHARGES FOR: MARKS ROBERT FT10 58.67

BILLING DATA FOR BUDGET NUMBER 06-1030 FOR JULY 1992

UWATS CALLS FOR: MARKS ROBERT FT10

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
07/06/92	10:01 AM	D	303-530-4562	BOULDER	CO	3	.67	A
07/06/92	10:06 AM	D	919-541-7123	DURHAM	NC	3	.70	A
07/06/92	11:17 AM	D	219-555-1212	DIR INFO		1	.60	A
07/06/92	11:17 AM	D	812-555-1212	DIR INFO		1	.60	A
07/06/92	11:19 AM	D	219-239-5530	SOUTH BEND	IN	2	.45	A
07/06/92	11:31 AM	D	202-357-7051	WASHINGTON	DC	6	1.40	A
07/06/92	01:58 PM	D	515-555-1212	DIR INFO		1	.60	A
07/06/92	01:59 PM	D	515-294-4111	AMES	IA	4	.89	A
07/06/92	02:07 PM	D	619-453-6222	LA JOLLA	CA	2	.45	A
07/06/92	02:24 PM	D	904-474-2784	PENSACOLA	FL	2	.47	A
07/09/92	01:15 PM	D	619-453-6222	LA JOLLA	CA	2	.45	A
07/09/92	02:57 PM	D	619-535-3880	LA JOLLA	CA	5	1.12	A
07/09/92	03:02 PM	D	919-833-1217	RALEIGH	NC	6	1.40	A
07/09/92	05:01 PM	E	919-834-9900	RALEIGH	NC	2	.28	A
07/09/92	06:02 PM	E	619-459-6577	LA JOLLA	CA	143	19.95	A
07/10/92	01:17 PM	D	908-562-3851	DUNELLEN	NJ	2	.47	A
07/12/92	03:58 PM		206-823-8628	KIRKLAND	WA	25	.00	C
07/12/92	08:39 PM		206-823-8628	KIRKLAND	WA	11	.00	C
07/13/92	11:36 AM	D	212-460-1610	NEW YORK	NY	7	1.63	A
07/13/92	11:43 AM	D	212-460-1610	NEW YORK	NY	3	.70	A
07/14/92	10:20 PM		206-643-5880	BELLEVUE	WA	60	.00	C
07/16/92	09:11 AM	D	212-460-1511	NEW YORK	NY	3	.70	A
07/21/92	10:17 AM	D	908-562-3910	DUNELLEN	NJ	7	1.63	A
07/21/92	10:34 AM	D	702-358-4771	RENO	NV	3	.64	A
07/21/92	01:13 PM	D	212-460-1610	NEW YORK	NY	4	.93	A
07/21/92	02:25 PM	D	702-358-4771	RENO	NV	2	.43	A
07/22/92	04:56 PM		206-277-0262	RENTON	WA	1	.00	C
07/23/92	08:31 AM	D	212-460-1610	NEW YORK	NY	6	1.40	A
07/27/92	01:11 PM	D	404-364-2882	ATLANTA	GA	3	.70	A
07/27/92	01:22 PM	D	305-348-3704	MIAMI	FL	2	.47	A
07/28/92	10:27 AM	D	908-562-3861	DUNELLEN	NJ	4	.93	A
07/28/92	03:59 PM	D	206-342-7401	EVERETT	WA	2	.26	A
07/28/92	04:43 PM	D	206-342-7401	EVERETT	WA	3	.39	A
07/29/92	11:23 AM	D	202-416-1925	WASHINGTON	DC	2	.47	A

TOTAL UWATS CHARGES FOR: MARKS ROBERT FT10 41.78



BILLING DATA FOR BUDGET NUMBER 06-1030 FOR AUGUST 1992

UWATS CALLS FOR: MARKS ROBERT FT10

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
08/06/92	05:19 PM	E	206-833-2606	AUBURN	WA	3	.33	A
08/07/92	08:57 AM	D	619-453-6222	LA JOLLA	CA	2	.45	A
08/10/92	11:34 AM	D	305-348-3704	MIAMI	FL	23	5.35	A
08/11/92	12:20 PM		206-392-9180	ISSAQUAH	WA	3	.00	A
08/13/92	10:34 AM	D	201-386-3000	WHIPPANY	NJ	2	.47	A
08/13/92	11:01 AM	D	415-202-9800	OAKLAND	CA	6	1.28	A
08/13/92	11:18 AM	D	415-202-9800	OAKLAND	CA	3	.64	A
08/13/92	01:15 PM	D	908-562-5500	DUNELLEN	NJ	4	.93	A
08/13/92	05:58 PM	E	215-968-4977	NEWTOWN	PA	17	2.37	A
08/17/92	12:04 PM	D	305-348-3704	MIAMI	FL	16	3.72	A
08/18/92	11:52 AM	D	412-487-8336	GLENSHAW	PA	97	22.55	A
08/19/92	10:26 AM		206-865-3568	BELLEVUE	WA	1	.00	A
08/21/92	08:31 AM	D	908-562-3905	DUNELLEN	NJ	3	.70	A
08/21/92	01:08 PM	D	619-453-6222	LA JOLLA	CA	2	.45	A
08/21/92	01:17 PM	D	404-364-2882	ATLANTA	GA	2	.47	A
08/21/92	01:34 PM	D	404-364-2882	ATLANTA	GA	6	1.40	A
08/21/92	01:37 PM		206-392-9180	ISSAQUAH	WA	8	.00	S
08/24/92	12:00 PM	D	615-372-3759	COOKEVILLE	TN	24	5.58	A
08/24/92	03:13 PM	D	209-227-5417	FRESNO	CA	2	.43	A
08/28/92	12:46 PM	D	206-846-2224	GRAHAM	WA	2	.26	S
08/28/92	09:35 PM	E	714-476-0153	IRVINE	CA	2	.28	A

TOTAL UWATS CHARGES FOR: MARKS ROBERT FT10 60.62

UWATS CALLS FOR: MARKS ROBERT FT1O

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
08/03/92	02:41 PM		206-823-8628	KIRKLAND	WA	1	.00	C
08/05/92	08:43 AM	D	044718365454	UK G BRITA		7	7.08	A
08/06/92	09:29 AM	D	415-202-9800	OAKLAND	CA	8	1.71	A
08/06/92	09:37 AM	D	415-202-9800	OAKLAND	CA	8	1.71	A
08/06/92	01:48 PM	D	619-453-6222	LA JOLLA	CA	11	2.46	A

TSO1L

University of Washington Correspondence

INTERDEPARTMENTAL

TO: Endrik Noges

FROM: Robert J. Marks II

SUBJECT: EE468

DATE: January 16, 1992

I am getting to the point where a grader would be quite helpful in EE468.

I need someone for a maximum of 10 hours per week.

Please let me know if this is possible.

Thanks!

University of Washington Correspondence

INTERDEPARTMENTAL

January 13, 1992

TO: Thomas A. Seliga, Chair

FROM: R. J. Marks

SUBJECT: Support for Ms. Wagner

Secretarial support is needed immediately to process the qualifying exam. Ruth has agreed to do the bulk of the work. Dr. Atlas has given permission for her to do so.

I hereby request from you authorization to pay Ruth for up to two weeks salary from departmental funds for service up to the faculty meeting where test results are decided. An hourly sheet will be submitted with the final request.

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

Department of Electrical Engineering, FT–10
Telephone: (206) 543–2150

January 3, 1992

J. Deller, Editor-in-Chief
Signal Processing Magazine
Dept. of Electrical Engineering
Michigan State University
260 Engineering Building
East Lansing, MI 48824

Dear Dr. Deller:

Enclosed is camera ready copy for a workshop sponsored by the IEEE Signal Processing Society. I request that it be published in Signal Processing Magazine.

Sincerely,

Robert J. Marks II

Robert J. Marks II
Professor

Enclosure

From Mailer-Daemon Tue Jan 14 15:42:53 1992
From: Mailer-Daemon (Mail Delivery Subsystem)
To: <wagner>
Subject: Returned mail: User unknown
Date: Tue, 14 Jan 92 15:42:44 PST

```
   ----- Transcript of session follows -----
Connected to lagos.ee.washington.edu:
>>> RCPT To:<ee_faculty@lagos.ee.washington.edu>
<<< 550 aggoune... User unknown: No such file or directory
550 <ee_faculty@ee.washington.edu>... User unknown

   ----- Unsent message follows -----
Return-Path: <wagner>
Received: from essex.ee.washington.edu by uw-isdl.ee.washington.edu (4.1/SMI-4.1
)
        id AA05159; Tue, 14 Jan 92 15:42:44 PST
Date: Tue, 14 Jan 92 15:42:44 PST
From: wagner (Ruth Wagner)
Message-Id: <9201142342.AA05159@uw-isdl.ee.washington.edu>
To: ee_faculty@lagos.ee.washington.edu


----- Begin Included Message -----

>From marks@u.washington.edu Mon Jan 13 20:46:52 1992
Return-Path: <marks@u.washington.edu>
Received: from milton.u.washington.edu by essex.ee.washington.edu (4.0/SMI-4.0)
        id AA06462; Mon, 13 Jan 92 20:46:50 PST
Received: by milton.u.washington.edu
        (5.65/UW-NDC Revision: 2.1 ) id AA07819; Mon, 13 Jan 92 20:46:43 -0800
Date: Mon, 13 Jan 92 20:46:43 -0800
From: Robert Marks <marks@u.washington.edu>
Message-Id: <9201140446.AA07819@milton.u.washington.edu>
Sender: marks@milton.u.washington.edu
To: ee_faculty@ee.washington.edu
Subject: QUALS
Cc: marks@milton.u.washington.edu, wagner@essex.ee.washington.edu
Status: R



Dear Friends:

There are 32 students taking the qualifying exam. As a function of supply
and demand, each of us will give from three to thirteen tests.  Here's the
breakdown in terms of groups.  A 'typical' number is given for each group.
Each member of this group gives this number of tests, plus or minus one. The
'major' number is the number of students who have declared this group as their
major.

Group                          typical         major
1. Energy & Power Systems      8               4
2. Electronics & VLSI          3               0
3. Solid State & Photonics     4               2
4. Fields & Waves              6               5
5. Computers                   11              11
6. Circuits & Control Systems  7               4
7. Communication & SP          12              7
```

Notes:

1. Each student was given their top two choices for their major. In all except two cases, each student was also given their top choice for their minors.
2. I have been advised by departmental PhC's that much talking goes on betwwen exams. This may be why the students taking your exam later in the week do better than those at first. Consider variation of your questions, or simply ask the student whether they have discussed your exam.
3. Exams are for 25 minutes each. The students are responsible for setting the time with you.
4. The exam period is from January 21 through noon on January 24.
5. Your grades are due by noon on January 27. Please put them in my box, or give them to Ruth Wagner in EE408.
6. The faculty will meet in executive session on Feb 4th to make the Solomonian judgements.
7. A few of you will be on travel during the exam period. Please consider testing early, or leaving a written exam that your RA can procter.

Happy testing.

Bob Marks

----- End Included Message -----

University of Washington Correspondence

INTERDEPARTMENTAL

TO: Prof. Seliga, Chairman

FROM: Prof. Atlas Leo. Atlas

RE: A very strong Faculty applicant

FROM: January 27, 1992

I know of the work of the attached junior Faculty applicant and he has a technique which at this point in time is frankly beating the time-frequency resolution of our techniques. This result, combined with his future interest in image coding and analysis, is about the strongest recommendation I could give to recruit him.

cc: Profs. Marks and Riskin

University of Illinois
at Urbana-Champaign

Coordinated Science Laboratory

1101 West Springfield Avenue
Urbana, IL 61801
USA

217 244-1764 *fax*
5101011969 UI TELCOM URUD *telex*

January 18, 1992

Prof. Prof. L. Atlas
Department of Electrical Engineering
FT-10
University of Washington
Seattle, WA 98195

Dear Prof. Atlas:

Since stranger things have happened than having several researchers interested in time-frequency analysis at one school, I thought I would apply to the University of Washington for a faculty position. I will receive my Ph.D. in Electrical and Computer Engineering from the University of Illinois in the summer of this year. Besides sending a copy of my vita to the Faculty Search Committee of your department, I have enclosed a copy for you, since you are more familiar with my work.

As you will note in my vita, my research has been in the general area of signal and image processing. A summary of my Ph.D. research is included at the end of my vita. In the future, I plan to apply my techniques to image coding and analysis and to investigate the connections between wavelets and human vision and hearing.

I have taken a large number of classes in both systems theory (signal processing, communications, control) and mathematics. With this background, I would feel comfortable teaching any systems course at the graduate level, as well as virtually any undergraduate level class.

I hope that my qualifications are of interest to you and would welcome an opportunity to visit your school in person. Thanks!

Sincerely,

Richard G. Baraniuk

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering

December 22, 1992

MEMO TO: Robert Marks

FROM: Thomas A. Seliga
Chairman

RE: 91-92 Indirect Cost Return

The Department has just received the latest and presumably final distribution of its indirect cost return for 1991-92. The University has again changed its policy on the return of indirect costs this year. Essentially, the College received return on only those projects that paid full University indirect costs.

The Department received a distribution from the College amounting to $63,417, or 6.78% of applicable indirect costs. As in the past, the Department will retain 20% of this or $12,683 for Department needs.

The E. E. Resource Allocation Committee has considered the change in the UW policy and has approved an allocation in accordance with UW policy; that is, only those grants or contracts that have paid full indirect costs will receive returns.

Those projects that recovered full indirect costs on your sponsored programs in 1991-92 amounted to $43,298 in indirect costs. Therefore, the amount distributed for your use **prior to June 30, 1993 (due to the end of the biennium)** is $2,349.77. Please note that the balance in your sub-account may be more or less than this amount due to prior expenditures. A full accounting is available in the Business Office. Your sub-account balance must be fully expended by June 30, 1993.

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

Department of Electrical Engineering, FT-10
Telephone: (206) 543-2150
FAX: (206) 543-3842

December 11, 1992

Embassy of France
Scientific Mission
Emeka Ngwube
4101 Reservoir Road NW
Washington, DC 20007-2176

To whom it may concern:

Subject: Christophe Bas

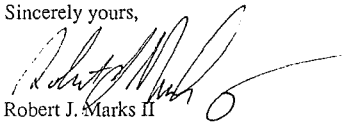
I have known Mr. Bas for over two years. I first met him during a visit to IRESTE University, affiliated with the University of Nantes, France. Nantes is a sister city to Seattle, and the University of Nantes is a sister university to the University of Washington.

In Nantes, I gave a series of lectures on neural computing and time frequency characterizations. Of all the students, Mr. Bas' enthusiasm for the subject was the highest. He frequently stayed after class to ask questions and discuss the finer points of the presentation. I invited him to the United States to work with me on neural network research. He studied under my supervision for three quarters.

Mr. Bas' research was application of neural networks to detection theory. He showed, remarkably, that a layered perceptron neural network performed nearly as well as an optimal detector. His results were published in the Proceedings of the International Joint Conference on neural Networks in Singapore last year (1991).

Mr. Bas is quite bright. His English is flawless. He writes extremely well (better than some of my American born students). I would personally welcome him to perform his Ph.D. work with me. He, unfortunately, has chosen to do otherwise.

Sincerely yours,



Robert J. Marks II
Professor

Wed, Dec 9, 4:45 pm

Christophe called and needs a letter to get out of the military service in France - this letter is missing from his file in Washington DC

1 - who you are
2 - what worked on and how long
3 - result of projected worked on
4 - Satisfied with work

Good news! file

University of Washington Correspondence

INTERDEPARTMENTAL

STAFF PERSONNEL, JA-10

November 23, 1992

TO: Ruth A. Wagner
Secretary Senior
Electrical Engineering, FT-10

FROM: Mary Ann Bill Mary Ann Bill/kw
Area Personnel Representative
Staff Personnel Office, JA-10

SUBJECT: Acknowledgement of Receipt of Position Review Request

A request for review of your position has been received in the Staff Personnel Office. I will be contacting you and your supervisor to schedule an appointment to discuss the duties and responsibilities assigned to your position. Position reviews should be completed within sixty days of receipt of a completed position description form and normally are completed within forty-five days. Should you have any questions regarding the status of the position review, please contact me at 543-2333.

MAB:kw
cc: Robert J. Marks ✓
Les Atlas

file

University of Washington Correspondence

INTERDEPARTMENTAL

DATE: November 18, 1992

TO: Thomas A. Seliga, Chair

FROM: Robert J. Marks II RJMII

SUBJECT: Adjunct appointment of Dr. Thomas A. Furness III

I request that Dr. Thomas A. Furness III be considered by the faculty for appoint as Adjunct Professor in our department with subsequent appointment to the Graduate Faculty. Dr. Furness currently has an appointment of Professor in Industrial Engineering and serves as the Director of the Human Interface Technology Laboratory.

Professor Furness' CV is attached.

THOMAS A. FURNESS III
7359 58th Ave. NE
Seattle, WA 98115
(206) 527-9910

PRESENT POSITIONS

Professor
Industrial Engineering Program FU-20
University of Washington
Seattle, WA 98195

Director, Human Interface Technology Laboratory FJ-15
Washington Technology Center
University of Washington
Seattle, WA 98195

EDUCATION

Ph. D. Engineering and Applied Science, University of Southampton, England, 1981
Dissertation Title: "The Effects of Whole Body Vibration on the Perception of the Helmet-Mounted Display"

Graduate Studies in Electrical Engineering, Ohio State University, 1967-70

B.S. Electrical Engineering, Duke University, 1966

EXPERIENCE

September 1989 to present: Professor (with tenure), Industrial Engineering Program, College of Engineering, University of Washington, Seattle, WA

July 1989 to present: Director, Human Interface Technology Laboratory (HITL) FU-20, Washington Technology Center, University of Washington, Seattle, WA

April 1974 to June 1989: **Supervisory Electronics Engineer (GM-15), Chief, Visual Display Systems Branch, Human Engineering Division, Armstrong Aerospace Medical Research Laboratory, Wright-Patterson AFB, Ohio **(except for the period of August 1977 to October1979 as noted below)

October 1978 to September 1979: Electronics Engineer (GS-14), Flight Systems Department, Royal Aircraft Establishment, Farnborough, England

September 1977 to September 1978: Electronics Engineer (Long Term/Full Time Training), Human Factors Research Unit, Institute of Sound and Vibration Research, University of Southampton, Southampton, England

September 1971 to March 1974: Electronics Engineer (GS-13/14), Performance Requirements Branch, Human Engineering Division, 6570th Aerospace Medical Research Laboratory, Wright-Patterson AFB, Ohio

September 1966 to September 1971: Research Engineer (Lieutenant/Captain, USAF), Performance Requirements Branch (Human Engineering Division), 6570th Aerospace Medical Research Laboratory, Wright-Patterson AFB, Ohio

HONORS AND AWARDS

Department of the Air Force, Meritorious Civilian Service Award (1986)

Sustained Superior Performance Award (July 1986 - June 1987)
Sustained Superior Performance Award (July 1985 - June 1986)
Sustained Superior Performance Award (July 1984 - June 1985)
Sustained Superior Performance Award (July 1983 - June 1984)
Sustained Superior Performance Award (July 1981 - June 1982)

United States Air Force Graduate Fellowship, University of Southampton, Southampton,England (1977-1978)

Air Force Systems Command Scientific Achievement Award (1970)

Nominated by the USAF for "America's Ten Outstanding Young Men for 1970"

Nominated by the USAF for "America's Ten Outstanding Young Men for 1969"

Human Engineer of the Year, Air Force Aerospace Medical Research Laboratory (1969)

Junior Officer of the Year, Aerospace Medical Division, Air Force Systems Command

Junior Officer of the Year, Air Force Aerospace Medical Research Laboratory, 1968
Selected as LEAP (Lieutenant's Education Application Program) officer upon assignment to USAF at Wright-Patterson AFB (1966).

PATENTS

Personal Eyewear Display, U.S. Patent Awarded

Virtual Retinal Display, U.S. Patent pending

PROFESSIONAL ACTIVITIES

Membership in Technical Societies:

Institute of Electrical and Electronics Engineers
Human Factors Society
Association of Computing Machinery-Special Interest Group on Graphics
Society for Information Display

Membership on Panels, Boards, Committees:

Founder and President, Virtual World Society
General Chairman, IEEE Virtual Reality Annual International Symposium, Seattle, WA 18-22 September 1993
Member, Science Council, Pacific Science Center, Seattle, WA (1992)
Board of Directors, Virtual Vision, Woodinville, WA (1992 to present)
Board of Directors, Oz International Ltd., Seattle, WA (1992 to present)
Board of Directors, Insight Inc., Woodinville, WA (1988 to present)
Technical Advisory Board, Virtual Reality Inc., Pleasantville, NY (1992)
Technical Advisory Board, Kopin Corporation, Boston, MA (1992)
Workshop on Strategic Computing in the Public Sector (1988)
National Science Foundation Panel on Micromechanical Machines (1988)
Workshop on the Psychology of System Design (1986)
Air Force Systems Command Project Forecast II (1985-86)
Aeronautical Systems Division Futurist Conference (1985)
Biotechnology in the Year 2000 Study Group (1982)
Unconstrained Night Attack Program Study Group (1981)
Tri-Service Panel for Night Vision Technology (1976-77)
Reconnaissance/Strike Evaluation Group (1977)
Optical Weapons Delivery Committee (1972)
Laser Applications Study Group (1971-72)
Helmet Sight/Displays Study Group (1970)
Displays for Night Attack Committee (1969)
TRIM Instrumentation Board (1969-70)

Positions Held:

Adjunct Professor, Wright State University, Department of Biomedical and Human Factors Engineering (1988-89)

Chairman of Sensors Panel, ASD Futurist's Conference (1985)

Project Custodian, Air Standardization Coordination Committee, Working Party 61, Project 113: Aeromedical Aspects of Vision in Air Operations (1978 -1984)

Chairman, Tri-Service Panel for Displays (Night Vision Technology) (1976-77)

Executive Committee, Dayton Section, IEEE Society for Engineering Management (1975-77)

Short Courses Taught:

Virtual Interface Technolgy, UCLA Extension (Oct. 1991, April 1992, April 1993)

Furness, T., Bricken, W., Bricken, M., "Virtual Interface Technology", SIGGRAPH '91 Tutorial.

Advanced Cockpit Controls and Displays, UCLA Extension (1989; 1990, 1991, 1992)

Human Factors Design Course, University of Dayton (1990)

User Interface Strategies '93, National Technology University, Dec. 1992

Consulting Activities:

Virtual Reality Inc., Pleasantville, NY
Insight Inc., Woodinville, WA
Omeda Inc., Madison, WI
Microelectronics and Microcomputer Corporation (MCC), Austin, TX
U.S. Navy
Cybernet Inc.
Illusion Engineering Inc.

STUDENT SUPERVISION

Students Supervised at the University of Washington

Chris Byrne, Ph.D., Industrial Engineering, December 1994*
Lawrence Baer, M.S., Industrial Engineering, March 1993*
Daniel Henry, M.S., Interengineering, Dec 1992*

Mark Takacs, M.S., Interengineering, June 1993*
Max Minkoff, M.S., Interengineering, June 1993*
Dav Lion, M.S., Interengineering, June 1993*
Ari Hollander, M.S. Interengineering, September 1993*
Jerry Prothero, M.S. Interengieering, September 1993*
Jeffrey James, M.S. Interengineering, September 1993*

Student Committees

Craig Rosenberg, Ph.D., Industrial Engineering, 1994*
Geofrey Coco, M.S., Computer Science, March 1993*
Karen Jones, M.S., Industrial Engineering, December 1992*
Craig Rosenberg, M.S., Industrial Engineering, December 1991

*expected completion date

COURSES TAUGHT

INDE 455: User Interface Design (taught w/ Prof. Barfield), Spring 90,91,92

INDE 495: Industrial Engineering Design, Spring 90, 91

INDE 352: Workstation Design, Spring 92

INDE 599: Virtual Interface Technology, Winter, 90, 91, 92

GRANTS AND CONTRACTS

Human Interface Technology Laboratory, Washington Technology Center; 1991-93 Biennium: $325,000; 1989-90: $250,000

Sun Microsystems Gift, 1992, $25,000

Boeing Corporate Grant, 1992-95: $1,000,000 (pending)

National Science Foundation, "Virtual Information System Environment", 1993-96, $1,001,097 (pending)

AFOSR, "Communicating Situation Awareness in Virtual Environments", 1993-96, $3,989,529 (pending)

U.S. West Foundation Gift, 1991-92: $500,000

Virtual Worlds Consortium, 1991-92: $425,000 (funds); $1,000,000 (equipment/software)

Boeing Computer Services (Advanced Technology Center), Protospace Development Program, 1990-91: $267,000

Boeing Computer Services, Extended Range Tracking System, Phase 3, 1992, $75,000

Boeing Computer Services, Extended Range Tracking System, 1991: $150,000

Boeing Military Airplanes, Spatial Displays for Cockpits, 1990-91: $120,000

USAF Equipment Transfer, 1991: $3,000,000 (pending)

Boeing Corporate Grant, 1990: $10,000

Hughes Research Laboratory Gift, 1991: $25,000

Digital Equipment Corporation, Equipment Grant: 1990-92, $2,500,000.

U.S. Navy, Virtual Interfaces for Undersea Applications: 1991: $100,000.

PUBLICATIONS AND PAPERS

Co-editor of Presence, MIT Press (1991 to present)

Furness, T., "Configuring Virtual Space for the 'Super Cockpit'". Medecine Aeronautique et Spatiale, Tome XXVII -No. 110, (published by the Societe Francaise de Medicine Aerospatiale) 1989, pp. 104-110.

Furness, T., "'Super Cockpit' Amplifies Pilot's Senses and Actions". Government Computer News, 15 August 1988, pp. 76-77.

Furness, T., "Harnessing Virtual Space". Keynote Address, Society for Information Display 1988 International Symposium, 23-27 May 1988.

Furness, T., "Designing in Virtual Space". Chapter in System Design, eds. W. B. Rouse and K. R. Boff, North Holland 1987.

Furness, T., "The 'Super Cockpit' and its Human Factors Challenges". Proceedings of the Human Factors Society Symposium, November 1986.

Furness, T., "Fantastic Voyage". Popular Mechanics, December 1986.

Furness, T., Kocian, D., "Putting Humans into Virtual Space". Proceedings of the Society for Computer Simulation, Aerospace Conference, January 1986.

Furness, T., "Virtual Panoramic Display for the LHX". Army Aviation, 30 June1985, pp 63-66.

Furness, T., "Virtual Concepts for Crew Member/Computer Integration", American Association for the Advancement of Science Annual Meeting, May 29, 1985.

Furness, T., "Helmet-Display Reading Performance During Whole-Body Vibration". Presented at the.52nd Annual Meeting of the Aerospace Medical Association, San Antonio, Texas, 4-7 May 1981.

Furness, T., "The Effects of Whole-Body Vibration on the Perception of the Helmet-Mounted Display". Ph.D. Thesis, University of Southampton, England 1981.

Furness, T., "The Effects of Whole-Body Vibration on the Perception of Target Imagery Presented on a Helmet-Mounted Display'. Presented to the United Kingdom Informal Group on Human Response to Vibration, Royal Aircraft Establishment, Farnborough, England, September 1979.

Furness, T. "The Use of Visually-Coupled systems in High Vibration and Buffeting Environments". Presented at the Symposium on Aeromedical Considerations of Low Level Flight and Long Duration Missions, 19th Meeting of the Air Standardization Coordination Committee (Working Party 61), Canberra, Australia, November 1978.

Furness, T., Lewis, C., "Helmet-Mounted Display Reading Performance under Whole-Body Vibration". Presented at the United Kingdom Informal Group Meeting on Human Response to Vibration, Silsoe, Bedfordshire, England, September 1978.

Furness, T., "Visually-Coupled Information Systems". ARPA Conference on Biocybernetic Applications for Military Systems, Chicago, Illinois, 5-7 April 1978.

Furness, T., Task, H., and Verona, R., "Current Status and Performance of Helmet-Mounted Displays". Presented at the Symposium on Night Vision Devices and Displays, U.S. Army Night Vision Laboratory, Ft. Belvoir, Virginia, November 1974.

Brindle, J., Furness, T., "Visually-Coupled Systems in Advanced Air Force Applications". National Aerospace Electronics Conference, Dayton, OH, May 1974.

Birt, J., Furness, T., "Visually-Coupled Systems". Air University Review 20(3), pp. 28-40, April 1974.

Slocum, G., Furness, T., "Airborne Multisensor Design". Presented at the International Symposium on Man-Machine Systems, September 1969.

Furness, T., "Helmet-Mounted Displays and Their Aerospace Applications". National Aerospace Electronics Conference, Dayton, OH, May 1969.

Furness, T., "The Application of Helmet-Mounted Displays to Airborne Reconnaissance and Weapon Delivery". Proceedings of the Symposium for Image Display and Recording, Air Force Avionics Laboratory, Wright-Patterson AFB, Ohio, Technical Report TR-69-241, April 1969, AD 700515.

MEDIA PRESENTATIONS

CBC, Virtual Reality Special, November 1991

BBC, "Colonizing Cyberspace", July 1991

ABC Evening News, Peter Jennings, June 1991

NOVA, "Top Gun and Beyond", March 1988

CBS Evening News, March 1987

CNN Technology Review

INVITED PRESENTATIONS

Keynote Address, Northcon '92, Seattle, WA (19 October 1992)

Keynote Address, National Teachers Training Institute, Seattle, WA (22 August 1992)

Keynote Address, National Marine Educators, Portland, OR (5 August 1992)

Keynote Address, Washington Vocational Agricultural Teachers Association Summer Conference, Olympia, WA (26 June 1992)

Invited Speaker, Broadcast Promotion & Marketing Association together with the Broadcast Design Association, International Conference, Seattle, WA (15 June 1992)

Invited Speaker, Bellevue Rotary, Bellevue, WA (16 June 1992)
Keynote Address, Resource Center for the Handicapped, Seattle, WA (26 June 1992)

Invited Speaker, Washington Vocational Agricultural Teachers Association, Olympia, WA (26 June 1992)

Invited Speaker, Everett Chamber of Commerce, Everett, WA (28 May 1992)

Community Lecture, Santa Fe Institute, Santa Fe, NM (20 May 1992)

Keynote Address, "Learning Virtually", Educational Computing Organization of Ontario, Toronto, Ontario, Canada (6 May 1992)

Technical Presentation, Hughes Research Laboratory, Malibu, CA (16 April 1992)

Invited Speaker, Special Library Association, "Virtual Museums, Knowbots and the End of Steelcase", University of Wasington (2 April 1992)
Keynote Address, NorwesCon, Tacoma, WA (28 March 1992)

Keynote Address, Washington Science Teachers Association, Seattle, WA (21 March 1992)

Keynote Address, Junior Science and Humanities Symposium, Seattle Pacific University (20 March 1992)

Keynote Address, Pacific Science Center Corporate Sponsors, Seattle, WA (3 March 1992)

IEEE Plenary, San Francisco, CA (27 February 1992)

Invited Speaker, Society for Information Management, Bellevue, WA (19 February 1992)

Invited Speaker, Seattle Chamber Community Development Roundtable, Seattle, WA (27 January 1992)

Guest Lecturer, Students; Teacher In-Service, Teachers; Presentation to Parents, Waterville School District, WA (23 January 1992)

Keynote Address, NICCOGRAPH, Tokyo, Japan (November 1991)

Keynote Address, Computer Using Educators, "Learning Virtually", Vancouver, BC (8 November 1991)

Keynote, DreamCon 6, Everett, WA (2 November 1991)

Keynote Address, Technology in Education, Pacific Science Center, Seattle, WA (29 October 1991)

Invited Speaker, Student Chapter of IEEE, "Virtual Interface: What Kind of a World do You Want?", University of Washington (15 October 1991)

Keynote Address, Future of Education and Technology, Seattle, WA (22 June 1991)

Guest Lecturer, Evergreen State College, Olympia, WA (31 May 1991

Closing Plenary, "Exploring Virtual Worlds", Closing Plenary, SIGCHI 1991 New Orleans, LA (May 1991)

Tutorial, Interface '91, Seattle (23 April 1991)

Keynote Address, President's Special Interest Group, Washington Software Association, Kirkland, WA (22 April 1991)

Invited Speaker, International Colloquium on Acoustics, Bochum, West Germany (April 1991)

Guest Speaker, Bellecore Technical Council (13 March 1991)

Keynote Speaker, Washington Association of School Administrators, Wenatchee, WA (6 March 1991)

Host and Featured Speaker, First Industry Symposium on Virtual Worlds Technology, University of Washington (21-22 February 1991)

Guest Lecturer, Industrial College of the Armed Forces, Fort McNair, VA., (January 1989, February 1990, March 1991)

Keynote Speaker, Washington Horticultural Society Annual Meeting (January 1991)

Speaker, Homecoming Festivities, University of Washington, Seattle, WA (10 November 1990)

Keynote Address, Washington State Science Teachers Conference, (27 October 1990)

Speaker, DIS Forum, Olympia, WA (23 October 1990)
Keynote, Windows of Opportunity Conference, Evergreen State College, WA (10 October 1990)

Speaker, "Cobwebs in a Virtual Attic",.Cyberthon, San Francisco, CA, (6 October 1990)

Speaker, ASIS, Seattle, WA (29 September 1990)

Speaker, Economic Development Council Board, Seattle, WA (9 September 1990)

Banquet Speaker, Science Fiction Writers of America, Annual Meeting and Nebula Award Presentation, San Francisco, CA., (25 April 1990)

Keynote Speaker, University of Washington College of Engineering Open House, (25 April 1990)

Session Chairman and Speaker, Aerospace and Military Graphics, National Computer Graphics Association International Symposium, Anaheim, NC, (21-22 March 1990)
Guest Lecturer, Computer Science Department, University of North Carolina Chapel Hill, NC (23 February 1990)

Invited Speaker, Washington Tree Fruit Research Commission, Wenatchee, WA., (16 February 1990)

Invited Speaker, University of Washington Student Nanotechnology Group, (8 February 1990)

Dinner Speaker, Puget Sound Chapter of the Human Factors Society, Bellevue, WA., 31 January 1990

Guest Speaker, Computer Applications in Landscape Architecture Conference, College of Architecture, University of Washington, Seattle, WA (26 January 1990)

Invited Speaker, Institute of Industrial Engineering, Puget Sound Chapter, Seattle, WA (9 November 1989)

Special Speaker/Consultant to State of Utah--Governor's Committee on Technology Development--Three Dimensional Imaging, Salt Lake City, UT (31 July 1989)

Banquet Speaker, Texas Association of Computing in the Public Sector, Austin,TX, (24 July 1989)

Banquet Speaker, Advanced Cockpit Systems Short Course, University of Dayton, Dayton, OH (22 June 1989)

Invited Speaker, Combat Aircraft and the Super Cockpit, 7th Meeting on Aeronautics and Space Medicine, Paris Air Show (12 June 1989)

Guest Lecturer, Industrial College of the Armed Forces, Ft. McNair, VA (23 February 1989)

Seminar Speaker, Wright State University, College of Engineering, Dayton, OH (11 January 1989)

Guest Lecturer, University of Washington, College of Engineering, Seattle, WA, (6 December 1988)

Guest Lecturer, Brigham Young University, College of Engineering, Provo, UT (1 December 1988)

Luncheon Speaker, Dayton Area Technology Network, Dayton Engineer's Club, Dayton, OH, 22 November 1988

Keynote Speaker, "Putting Pilots into Virtual Space", Institute of Electrical and Electronic Engineers, FALLCON '88, Cedar Rapids, IA (17 Nov. 1988)

Luncheon Speaker, Harvard University, JFK School of Government, Workshop on Emerging Technologies, Strategic Computing in the Public Sector Program, Cambridge, MA (10 November 1988)

Guest Lecturer, University of Utah, College of Engineering, Center for Engineering Design (September 1988)

Banquet Speaker, Advanced Cockpit Systems Short Course, University of Dayton, Dayton, OH (2 March 1988)

Guest Seminar Speaker, Apple Computer Inc., Cupertino, CA (September 1988)

Invited Speaker, Conference on Decision Making and Information Processing: Contextual Influences, School of Management, State University of New York at Buffalo (9-10 June 1988)

Banquet Speaker, Workshop on Human Performance in Design, University of Dayton, Dayton, OH (June 1988)

Guest Lecturer, Carnegie-Mellon University, Department of Computer Science, Software Engineering Institute (March 1988)

University of Washington Correspondence

INTERDEPARTMENTAL

DATE: November 18, 1992

TO: Thomas A. Seliga, Chair

FROM: Robert J. Marks II

SUBJECT: Adjunct appointment of Dr. Thomas A. Furness III

I request that Dr. Thomas A. Furness III be considered by the faculty for appoint as Adjunct Professor in our department with subsequent appointment to the Graduate Faculty. Dr. Furness currently has an appointment of Professor in Industrial Engineering and serves as the Director of the Human Interface Technology Laboratory.

Professor Furness' CV is attached.

file

UNIVERSITY OF WASHINGTON
The Graduate School

November 10, 1993

Professor Jeng-Nang Hwang , Chairperson

Professor R. Douglas Martin , Graduate Faculty Representative, Statistics
Professor Linda Shapiro
✓Professor Robert Marks
Professor James Ritcey

Dear Colleagues:

I am writing to ask you to serve as members of the Supervisory Committee for Tsung-Yen Chen who wishes to enter the doctoral program leading to the degree of Doctor of Philosophy in the field of Electrical Engineering.

It will be your responsibility as a committee (a) to approve a course of study which will fulfill the general course requirements of the student's major and supporting fields; (b) to conduct the student's General Examination; (c) to approve the Candidate's dissertation proposal; (d) to approve the Candidate's dissertation and (e) to conduct the Candidate's Final Examination. The Graduate Faculty Representative is a voting member of the Committee and participates fully in carrying out all of the responsibilities listed above. For additional information you may refer to Graduate School Memorandum #13, "Supervisory Committees for Graduate Students."

The Supervisory Committee Chairperson is responsible for scheduling conferences and examinations and for informing all members of the Committee of the appropriate times and places. At least four members of the Committee, including the Chairperson and the Graduate Faculty Representative, must be in attendance at all conferences and examinations. At least three weeks prior to the agreed upon examination date, the Chairperson should ask the Dean of the Graduate School to approve the application for the examination and to announce it in The University Week. The Supervisory Committee must be convened by the Chairperson, whether the examinations are oral or written, and formal judgment on the Candidate's performance must be indicated on the warrant, dated and forwarded immediately to the Graduate School.

Members of the Supervisory Committee of a doctoral aspirant undertake a serious charge. They are responsible to the student and to their colleagues of the Graduate Faculty for the quality of the degree being sought.

Sincerely,

Gene L. Woodruff
Dean

GLW:ja
cc: Graduate Student: Tsung-Yen Chen
Graduate Program Coordinator: Professor S.S. Venkata
Student file

January 20, 1993

File

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@u.washington.edu

November 2, 1992

TO:	Thomas A. Seliga, Chair
FROM:	Robert J. Marks II, Professor
SUBJECT:	Adjunct Appointment of Ceon Ramon

I request that Dr. Ceon Ramon be presented to the faculty for purposes of appointment as an Adjunct Research Assistant Professor. He currently holds the title of Research Assistant Professor in Bioengineering.

I have been working with Dr. Ramon in a number of research projects. It is appropriate that he serve on the committees of those EE students who are involved in this research.

A copy of Dr. Ramon's *curriculum vitae* is attached.

cc: Dr. Lee Huntsman, Director
Bioengineering

1. Copy of everything for file
2. Huntsman does not need CV
3. Send original to Seliga

From wagner Fri Oct 23 09:23:37 1992
From: wagner (Ruth Wagner)
To: marks@milton
Cc: wagner
Subject: list of addresses
Date: Fri, 23 Oct 92 09:23:31 PDT

Prof. Boualem Boashash
School E&ESE
QUT, Gardens Point
GPO Box 2434
Brisbane, Australia
Phone: 61-07-864-2111
FAX: 61-07-864-1748

Prof. Dan Hammerstrom
Adaptive Solutions, Inc.
1400 NW Compton Drive, Ste. 340
Beaverton, OR 97007
Phone: 503-690-1236
FAX: 503-690-1249

Dr. Clifford Lau
ONR Code 1114 SE
800 N. Quincy Street
Arlington, VA 22217-5000
Phone: 703-696-4961 or 703-696-4214
FAX: 703-696-2611

Dr. Richard P. Lippman
MIT Lincoln Laboratory, B-349
P. O. Box 73
Lexington, MA 02173
Phone: 617-981-2711

Prof. Dijan Sobajic
Dept. of Electrical Engineering
Case Western Reserve
Glenman Boulevard 519-D
Cleveland, Ohio 44106

Steve Suddarth
AFOSR/NE
Building 410
Bolling AFB
Washington, DC 20332-6448

Dr. Paul J. Werbos
Program Director
Neuroengineering, Room 1134
Div. of Emerging Eng. Tech.
National Science Foundation
Washington, DC 20550
Phone: 202-357-9618

Prof. Bernard Widrow
Department of EE, Durand 139
Stanford University
Stanford, CA 94305-4055
Phone: 415-857-723-4949

Prof. W. J. Williams
EECS Department
University of Michigan
Ann Arbor, MI 48109
Phone: 313-764-8516

file

UNIVERSITY OF WASHINGTON
The Graduate School

October 20, 1992

Professor Robert Marks , Chairperson

Professor Eberhard Fetz , Graduate Faculty Representative, Physiology & Biophysics
Professor Mohamed El-Sharkawi
Professor Eve Riskin
Professor Jai Choi
Professor Thomas Caudell

Dear Colleagues:

I am writing to ask you to serve as members of the Supervisory Committee for Bonggee Song who wishes to enter the doctoral program leading to the degree of Doctor of Philosophy in the field of Electrical Engineering.

It will be your responsibility as a committee (a) to approve a course of study which will fulfill the general course requirements of the student's major and supporting fields; (b) to conduct the student's General Examination; (c) to approve the Candidate's dissertation proposal; (d) to approve the Candidate's dissertation and (e) to conduct the Candidate's Final Examination. The Graduate Faculty Representative is a voting member of the Committee and participates fully in carrying out all of the responsibilities listed above. For additional information you may refer to Graduate School Memorandum #13, "Supervisory Committees for Graduate Students."

The Supervisory Committee Chairperson is responsible for scheduling conferences and examinations and for informing all members of the Committee of the appropriate times and places. At least four members of the Committee, including the Chairperson and the Graduate Faculty Representative, must be in attendance at all conferences and examinations. At least three weeks prior to the agreed upon examination date, the Chairperson should ask the Dean of the Graduate School to approve the application for the examination and to announce it in The University Week. The Supervisory Committee must be convened by the Chairperson, whether the examinations are oral or written, and formal judgment on the Candidate's performance must be indicated on the warrant, dated and forwarded immediately to the Graduate School.

Members of the Supervisory Committee of a doctoral aspirant undertake a serious charge. They are responsible to the student and to their colleagues of the Graduate Faculty for the quality of the degree being sought.

Sincerely,

Gene L. Woodruff
Dean

GLW:ja
cc: Graduate Student: Bonggee Song
Graduate Program Coordinator: Professor S.S. Venkata
Student file

November 3, 1992

October 2, 1992

To: Steve

From: Ruth for Prof. Marks

Here are the names in Prof. Marks alias list that may have anything to do with your project.

alias ceon ceon@uwavm.u.washington.edu

alias bob steifel@milton.u.washington.edu

alias irene peden@nsf.gov

alias jandrall jandrall@milton.u.washington.edu

alias oh sehooh@milton.u.washington.edu

alias reed russreed@milton.u.washington.edu
alias payman payman@milton.u.washington.edu

file

DEPARTMENT OF ELECTRICAL ENGINEERING
University of Washington

PH.D. GENERAL EXAMINATION

PAYMAN ARABASHI

Professor R. Marks, Chair ✓
Professor J. Meditch
Professor T. Caudell
Professor M. El-Sharkawi
Professor J. Choi
Professor E. Fetz
Graduate Faculty Representative

"FUZZY ADAPTATION OF SEARCH PARAMETERS"

Abstract: Many nonlinear optimization algorithms, or classification procedures, utilize heuristics that are in general not well specified and are thus to some degree fuzzy. It is therefore natural to attempt to apply fuzzy set theory to such algorithms and techniques with the hope of improving their performance. We will illustrate parameter adaptation in neural systems by application to the layered perceptron and ART 1. Applications to other search/classification algorithms such as random search and Kohonen networks, as well as performance issues will be discussed.

Thursday, October 1, 1992

10:30PM -12:30PM

EEB420

All faculty and students are invited to attend.

file

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

September 29, 1992

To: All EE Faculty

From: Thomas A. Seliga, Chairman

Subject: Professional Leave Requests

This is a reminder that Professional Leave Requests by faculty must be submitted "at least nine months before the date on which the leave is to begin." The First Review for the 1993-94 period will be in early November; therefore, please give your Application for Leave of Absence, in accordance with the attached instructions, to Valerie before October 30, 1992. **Please note that availability of professional leave depends on a fixed allocation of quarters to the College of Engineering.**

INSTRUCTIONS FOR APPLYING FOR PROFESSIONAL LEAVE

The faculty member who wishes to take a professional leave shall file his/her application at least nine months before the date on which the leave is to begin. The application shall be submitted to the departmental chairperson in the following form:

A. The Application for Leave of Absence, Form No. UW 1038, which may be obtained from either the departmental office, Academic Personnel Records Office or the Dean's Office. Any information about outside funds which is available at the time that the application is prepared should be included on the form.

B. The original and five copies of a letter stating the following facts:

1. A detailed statement of the applicant's plans for utilizing the time requested. This statement should include such information as the time sequence for completion of any project or plan.

2. The names of foundations or institutions, if any, with which the applicant expects to be affiliated during the leave, an outline of special resources available for the proposed work, and the source and amount of any supplementary grants or salary.

3. A statement of evidences of productivity in scholarly or creative work and a brief review of professional activities.

4. A statement regarding the value of the applicant's project in terms of benefit to the institution upon return from professional leave.

C. Two copies of his/her bibliography of publications.

D. If the applicant so desires, he/she may submit supporting letters from faculty members of the rank of associate or full professor, or from any other appropriate individual not necessarily associated with the University. These also should be submitted in five copies (original and four copies, in each case.)

Upon receipt of an application for professional leave, the departmental chairperson shall prepare either a letter of recommendation approving of the leave and stating the merits of the applicant's program, his ability to accomplish it successfully, the benefits which will accrue to the University as a result of the proposed leave and the means for covering the increased work load in the unit; or a letter disapproving of the leave and stating his/her reasons for disapproval. The chairperson shall forward the first six copies of the application and the original and four copies of his/her recommendation to the Dean's Office, who in turn shall make a recommendation to the President for administrative action.

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

August 20, 1992

To: All EE Faculty and Staff

From: Thomas A. Seliga, Chairman TAS

Subject: **NEW POSTING REQUIREMENTS**

We have received a memorandum from the Provost via the College detailing new posting requirements for all faculty appointments, including research positions. These new requirements are based on the Immigration Act of 1990 and impose new internal posting requirements which must be met for us to proceed to acquire permanent residence status for international faculty. We are attaching a copy of the new regulations for your information. Please read them carefully; "it is imperative that adherence to the posting requirements be followed within the College."

Most new appointments are handled in my office; however, there are occasions when individual faculty may find it necessary to process the paperwork. When this is the case, please ensure the attached regulations are followed.

Thank you for your attention to this requirement.

UNIVERSITY OF WASHINGTON Correspondence

INTERDEPARTMENTAL

College of Engineering, Office of the Dean FH-10 3-6689

July 23, 1992

To: Thomas A. Seliga, Chair
Electrical Engineering, FT-10

From: Marlene Davidson
Personnel Administrator

Re: Internal Posting Requirements of the Immigration Act of 1990

For your information and review, the attached letter from Steven Olswang outlines the changes in federal immigration and naturalization laws. I call to your attention in particular to the paragraph on internal posting requirements. It is imperative that adherence to the posting requirements be followed within the college.

Effective immediately all new position recruitment announcements at the Assistant Professor or Research Assistant Professor levels or above must be posted for a minimum of 10 business days at the facility or location of employment (internally, we require the posting to be outside the Department Chair's Office). The posting must be clearly visible and unobstructed in order that U.S. workers can read the posted notice. In all cases, the following statement is to be added at the bottom of the announcement:

> A competitive recruitment and selection process is being conducted and if a U.S. worker or permanent resident is not selected pursuant to this process, an application for Alien Employment Certification may be filed on behalf of an alien to fill the job opportunity. Interested persons should submit an application to (designated search committee chair).

At the conclusion of the 10 day posting period, the posted notice is to be signed by the chair of the search committee, indicating the exact dates, location and results of said posting (e.g. "There was no application/inquiry as a result. . ." or "X applications were received as a result of the in-house posting.") Should the search result in the selected candidate being a non-U.S. citizen, this posted notice, signed as described above, will become part of the appointment papers submitted with the successful candidate's application for permanent residence in the United States.

Please be sure to note the paragraphs describing the required appointment procedures.

MD/mn
Attachment
c: Sharon Schlittenhard
J. Ray Bowen
Mary Melanson

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

Office of the Provost

June 15, 1992

Deans, Directors, and Chairs

Dear Colleagues:

As you know, over the past several years, the University has put into effect processes and staff to assist departments and colleges when non-U.S. citizens are identified for faculty appointments. I write again to apprise you of these processes, as I have done in the past, so that you might become more familiar with our structures for ensuring compliance with federal Immigration and Naturalization laws. The most recent Immigration Act of 1990 (IMMACT90) has imposed added requirements on our ability to obtain both the temporary visas and permanent residence for faculty.

The University has designated key individuals to assist departments and faculty when issues arise regarding visas or permanent residence for non-U.S. citizens. Mr. Gary Ausman, International Services Office Director, assists in acquiring temporary visas and processing renewals for such visas. Ms. Jean Reitan, Permanent Residence Coordinator, assists in processing labor certifications and permanent residence applications for individuals being appointed as full time (1.0 FTE) faculty at the Assistant Professor and Research Assistant Professor levels or above.

Internal Posting Requirement. The Immigration Act of 1990 (IMMACT90) imposes new internal posting requirements which must be met for us to proceed to acquire permanent residence status for international faculty. Since we never know whether the successful applicants for faculty positions may or may not be U.S. citizens, all searches must follow these procedures. The following are the posting requirements for newly instituted searches at the Assistant Professor or Research Assistant Professor levels or above.

All new position recruitment announcements at the Assistant Professor or Research Assistant Professor levels or above must be posted for a minimum of 10 business days at the facility or location of employment (internally, we require the posting to be outside the Department Chair's office). The posting must be clearly visible and unobstructed in order that U.S. workers can read the posted notice. In all cases, the following statement is to be added at the bottom of the announcement:

> "A competitive recruitment and selection process is being conducted and if a U.S. worker or permanent resident is not selected pursuant to this process, an application for Alien Employment Certification may be filed on behalf of an alien to fill the job opportunity. Interested persons should submit an application to (designated search committee chair)."

At the conclusion of the 10 day posting period, the posted notice is to be signed by the chair of the search committee, indicating the exact dates, location and results of said posting (e.g. "There was no application/inquiry

UNIVERSITY OF WASHINGTON
ALIEN EMPLOYMENT CERTIFICATION AND PERMANENT RESIDENCE
APPLICATION PROCEDURES FOR FACULTY MEMBERS

An application for Permanent Residence is based on an offer of permanent full time (1.0 FTE) employment and is available for appointments in a University of Washington academic department at the Assistant Professor or Research Assistant Professor levels or above. Applications for Employment Certification and Permanent Residence for alien faculty are processed through the Office of the Provost. Upon selection of a non-resident alien for a regular or research faculty position, a department should contact the Permanent Residence Coordinator (685-3247 or 543-1830), who will direct the Permanent Residence process. Departments which normally recruit from the international market place may wish to contact the Permanent Residence Coordinator in order to assure that the wording in the advertisement meets the strict criteria of the Immigration and Naturalization Service and the Department of Labor.

The new Immigration Act of 1990 (IMMACT90) recognizes "Dual Intent" (permitting the application for both a temporary visa and permanent residence simultaneously). Thus, there is no need to appoint new international faculty as "Acting" (unless for other reasons), and moving expenses can be paid at time of hire. The UW's policy is to begin the permanent residence process as soon as possible after an individual's regular or research appointment is approved by the Board of Regents. Because of the differences in the amount of time it takes to obtain employment authorization based on a permanent residence application and the time it takes to obtain an H-1B visa, the following options are available:

1. In order for the candidate to begin employment immediately, the hiring department should obtain an H-1B temporary work visa through the International Services Office (ISO) even though processing for the permanent residence has started.

2. If a new hire will continue to reside outside the country for a period, the permanent residence process should be started upon regental confirmation of the appointment. When the employment start date approaches, the department applies for an H-1B through the ISO, and the person enters the U.S. with a temporary visa; OR, the permanent residence process is started, the person adjusts status in her/his home country and s/he arrives in the U.S. as a permanent resident.

3. If a new hire waits within the U.S. (possibly because of a commitment at another U.S. institution), the permanent residence process begins as soon as the faculty appointment is approved by the Board of Regents. If the person is eligible to adjust to permanent resident status before his/her employment date, there is no need for an H-1B. (Please note,

available workers, wages, working terms and conditions, and any other that is felt to be pertinent) to:

Employment Security Dept. AEC Unit, MS KG-11 Olympia, WA 98504-5311	U.S. Dept. of Labor Certifying Officer 1111 Third Ave, Suite 900 Seattle, WA 98101-3212

At the conclusion of the 10 day posting period, the posted notice is to be signed by the chair of the search committee, indicating the exact dates, location and results of said posting (e.g. "There was no application/inquiry as a result..." or "X applications were received as a result of the in-house posting."). This information is to be included in the Detailed Description of the Search Procedure prepared to support the permanent residence position.

The first step in the permanent residence filing process is the completion of the Application for Alien Employment Certification (AEC), Form ETA 750, Parts A and B. These forms are submitted to the Employment Security Department of the State of Washington (ES) on behalf of the hiring department. This application packet must be submitted within 18 months of the offer of employment. Part A is signed by the Provost; Part B signed by the alien. Both parts of the form are completed in duplicate by the Permanent Resident Coordinator and must have original signatures.

In order to complete the application packet, the hiring department prepares the following attachments:

Detailed Description of the Search Procedure signed by the search committee chair with a concurrence line for the Provost's signature;

Evaluation of qualifications of the alien hired;

List of each applicant considered, by name, and the job related reasons why each was not as qualified as the alien hired. These reasons must directly relate to the requirements as stated in the advertisement. If there were originally a large number of applicants, state how many and how the field was narrowed to the finalists. List these finalists and the job related reasons for non-selection of each candidate.

Copies of the advertisement(s) placed in professional journal(s) and/or the Chronicle of Higher Education. These ads must specifically state the rank, duties that include teaching, and the requirements for the position.

Appointment letters from the chair to the Dean, from the Dean to the President recommending the appointment, and the final appointment letter from the President. Appointments must be

3. PERMANENT RESIDENCE APPLICATION PROCESS

The U.S. Department of State indicates availability of priority dates each month based on the number of applicants and the number of immigrant visas available. The Permanent Residence Coordinator obtains the availability information by the 15th of each month.

A. Aliens outside the U.S. are sent the original Approval of Employment Based Second Preference Status. When their priority date becomes available, they should contact the American Consulate in their country to adjust to permanent residence status. In most countries, the Consulate will also contact the alien. However, since the procedures vary from country to country, the alien should obtain the guidelines and necessary forms from the Consulate. The alien will be supplied with the required employment support documents to be filed with the application. The other documents are the alien's responsibility.

B. An alien residing in the U.S. (or residing outside the U.S., but preferring to adjust status in the U.S.) will be supplied the forms noted below with detailed instructions. The Permanent Residence Coordinator is available to assist the applicant (and any dependents) in completing these forms. The Section 245 Adjustment packet, completed by the alien and submitted to INS, consists of the following documents:

- Form I-485, Application for Permanent Residence (Fee: $120.00)
- Form G-325A, Biographic Information
- Form FD-258, Fingerprint Chart ($5.00 charge at Public Safety Bldg.)
- Visa Photographs (specific instructions provided)
- Form I-693, Medical Examination (at only specific listed providers)
- Birth Record
- Employment Verification Letter from Provost
- Marriage documents, if applicable
  (See Detailed Document List for any additional documents required.)
- Passport and I-94 (Passport is returned; I-94 is retained by INS)
- Form I-765, Application for Employment Authorization (Fee: $60.00)

All INS applications' fees are subject to change. All fees must be paid by check made out to the INS stating "Submission of I-____ Form for _____." INS will accept one check for all packets submitted. All vendor charges vary and are the responsibility of the applicant.

PERMANENT RESIDENCE PROCESS for OTHER THAN FACULTY

Schedule A, Group I. Nurses and Physical Therapists. Special Department of Labor and INS guidelines for the Permanent Residence process are in place for these occupations, having been deemed by Congress to be in short supply. The Permanent Residence process also is available to individuals hired into the Clinical Technologist classification.

As a general rule, the University will not support permanent residence application processes for other occupational classifications in the University. However, the Provost's Office will, in very unusual cases, consider other requests for permanent residence on an individual basis.

Revision of Operations Manual D 41.0
June 12, 1992

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

Office of International Services
459 Schmitz Hall, PB-12

H-1B NONIMMIGRANT STATUS FOR VISITING FOREIGN FACULTY AND RESEARCHERS AT THE UNIVERSITY OF WASHINGTON

The H-1B is a nonimmigrant status held by a foreign national who will be coming to the U.S. temporarily to perform services in a "specialty occupation". A specialty occupation is one which requires the theoretical and practical application of a body of highly specialized knowledge to fully perform the occupation, and the attainment of a bachelor's or higher degree in the specific specialty as a minimum for entry into the occupation in the U.S. This status can appropriately be used for visiting faculty, researchers and other professionals, and members of the medical professions (teaching and research only).

Regulations of the U.S. Immigration and Naturalization Service have established a six-year cap on the number of consecutive years a foreign national may be present in the U.S. as an H-1B. Initial admission can be up to three years; extensions of stay may be granted in up to three year increments. Note that the Immigration Service may hold the petitioning department liable for costs of return transportation abroad if the H-1B worker is dismissed from employment by the employer before the end of the period of authorized stay.

The petitioning academic department should begin the application process as early as four months before the proposed employment will begin. Ample lead time is critical since the beneficiary cannot apply for an H-1 visa until the Immigration Service sends a notice of approval to the U.S. embassy or consulate in the beneficiary's home country; similarly, beneficiaries presently in the U.S. applying for change of status to H-1B, or seeking to continue in H-1B status under new employment, cannot start work or receive pay for services prior to receiving authorization from the Immigration Service.

Procedures for obtaining H-1B status for a prospective employee, or an extension of stay for a currently-employed H-1B worker, are outlined below. Questions about this process, or requests for information on the status of the H-1B petition, should be directed to the International Services Office (ISO) - please do not contact the Immigration Service.

IF REQUESTING H-1B STATUS FOR A NEW EMPLOYEE:

I. The Visa Request

The petitioning department begins the application process by completing UW Form 1025 "Visa Request for University of Washington Temporary Foreign Faculty or Staff Appointment". The 1025 form is available from the ISO. Return this form, signed by the department chair and appropriate dean, to the ISO. Include with the visa request the required fees, and three copies each of the support documents listed below:

A. A letter from a responsible officer of the petitioning department (usually the chair) addressed to the U.S. Immigration and Naturalization Service, Northern Service Center, 100 Centennial Mall North, Room B-26, Lincoln, Nebraska 68508-3898. The letter should include a description of the position, minimum qualifications necessary for performing the work and how the beneficiary meets those qualifications, dates of employment, and salary (which must be at least at the floor of the Faculty Salary Schedule for the rank, but no less than step "0" for Research Associates).

file

University of Washington Correspondence

INTERDEPARTMENTAL

August 10, 1992

TO: Professor Marks

FROM: Michelle Byrd
EE Advising

The following students are registered for independent study or thesis credits with you for Summer Quarter 1992.

Please let us know if there are any discrepancies with your records. This list should be retained for use in preparing the faculty activity analysis.

Thank you.

Student Name	Class Enrolled	Credits Attempted
Arabshahi_ Payman	EE800	5
Reed_ Russell Deryl	EE800	3
Song_ Bongee	EE800	9

Note: If you sponsored more than ten students, you will recieve multiple copies of this letter."

file

Received: from UWAVM by UWAVM.U.WASHINGTON.EDU (Mailer R2.08 R208004) with
BSMTP id 3587; Wed, 19 Aug 92 16:31:26 PDT
Received: from bashful.u.washington.edu by UWAVM.U.WASHINGTON.EDU
(IBM VM SMTP V2R1) with TCP; Wed, 19 Aug 92 16:31:25
PDT Received: from note2.nsf.gov by bashful.u.washington.edu
(5.65/UW-NDC Revision: 2.22) id AA20854; Wed, 19 Aug 92 16:31:59 -0700
Received: from prelay by Note2.nsf.gov id aa20363; 19 Aug 92 19:07 EDT
From: psauer@nsf.gov
To: Mohamed <MELSHARK@u.washington.edu>
Subject: Re: New NSF Program Director
Date: 19 Aug 92 18:56 EST
Message-Id: <9208191907.aa20363@Note2.nsf.gov>

Mohamed - Your proposal was mailed to 9 people and 7 reviews have been returned. The ratings are 0 Excellent, 3 Very Good, 1 Good, 3 Fair. The 3 Fairs are a problem. My budget is fully committed for FY 92. I will be talking to Art Bergen about your proposal as well as others that are still pending. In all liklihood, he will be making the decision later in the year.

Pete

DEPARTMENT OF ELECTRICAL ENGINEERING
University of Washington

PH.D. FINAL EXAMINATION

PATRICK J. LOUGHLIN

Professor L. Atlas, Chair
Professor James Luby
Professor R. Marks
Professor Gary Bernard
Professor Don Percival, GFR

TIME-FREQUENCY ENERGY DENSITY FUNCTIONS: THEORY AND SYNTHESIS

Abstract: The spectrogram, which was developed in the mid-1940s, is currently the principal tool for time-frequency analysis. The goal of this analysis is to describe the distribution of spectral energy as a function of time for nonstationary (i.e., time-varying) signals. Since its inception, the spectrogram, as well as other members of a more general class of time-frequency distributions introduced by Cohen in 1966, have provided a wealth of information about the time-varying frequency content of many signals (most notably speech in the case of the spectrogram). This success with the time-frequency analysis of many signals has also had the circular effect of strongly influencing our expectations of what constitutes a joint, time-frequency distribution or energy density function. However, as is demonstrated in this dissertation, the spectrogram and other bilinear time-frequency representations in Cohen's general class (e.g., the Wigner distribution) are not legitimate, joint, time-frequency energy density functions. While Cohen and Posch have shown that such density functions do exist, a systematic procedure for generating them for any physical signal has, until now, been lacking.

In this dissertation, the synthesis of legitimate time-frequency energy density functions is viewed as a problem of inductive inference, for which the principle of minimum cross-entropy is uniquely suited as the method of solution. Examples of minimum cross-entropy time-frequency distributions (MCE-TFDs) of many different signals are presented, through which insights into time-frequency distributions are revealed. For example, it is observed that spectrograms, while not proper distributions, share a qualitative, visual similarity with the conditional MCE-TFDs $Q(f|t)$ and $Q(t|f)$ (as opposed to the joint MCE-TFD $Q(t,f)$. More fundamentally, it is demonstrated that some of the ideas previously developed via analyses of spectrograms and other bilinear time-frequency representations, as well as some of the properties postulated as desirable in a time-frequency distribution, are in fact inconsistent with proper time-frequency energy density functions.

Thursday, August 20, 1992

10:30AM - 12:30PM

EEB 420

All faculty and students are invited to attend

file

Electrical Engineering Department Correspondence
University of Washington

INTRADEPARTMENTAL

Date: 4 August, 1992

To: EE Faculty

From: Mark J. Damborg
Associate Chairman

Re: Guidelines for Teaching Assignments

As I become more familiar with the task of making teaching assignments for the year, I want to share the guidelines I will be using. The statements below are what the Department has been using for some time. Hence, my intent is to proceed with no fundamental changes.

1. For faculty active in research, the normal course load is 4 courses per year. Research activity is primarily recognized by the supervision of graduate students and the conduct of sponsored research. Faculty without research activities will be expected to teach more than four courses per year.

2. The normal expected load for new faculty in their first year is 3 courses.

3. Individual circumstances may justify a reduction in teaching load. Examples include unusually heavy professional responsibility, special curriculum development activity and administrative responsibility. All such arrangements must be approved by the Department Chairman.

4. Faculty requiring additional time for research activities may "buy-back" their time at the usual rate of 45% of one quarter's salary for each course reduction in load.

5. Seminar courses (EE 500) are considered a part of a faculty member's research and not part of the departmental course load.

6. If the Department's teaching requirements are met without all faculty teaching "full loads" according to these guidelines, the Associate Chairman will distribute these light loads among different faculty from year to year.

cc: T.A. Seliga

file
CHANGE

UNIVERSITY OF WASHINGTON
The Graduate School

July 31, 1992

Professor Robert Marks , Chairperson

Professor Eberhard Fetz , Graduate Faculty Representative, Physiology/Biophysics
Professor Jamee Meditch
Professor Mohamed El-Sharkawi
Professor Thomas Caudell
DR. ~~Professor~~ Jai Joon Choi

Dear Colleagues:

I am writing to ask you to serve as members of the Supervisory Committee for Payman Arabshahi who wishes to enter the doctoral program leading to the degree of Doctor of Philosophy in the field of Electrical Engineering.

It will be your responsibility as a committee (a) to approve a course of study which will fulfill the general course requirements of the student's major and supporting fields; (b) to conduct the student's General Examination; (c) to approve the Candidate's dissertation proposal; (d) to approve the Candidate's dissertation and (e) to conduct the Candidate's Final Examination. The Graduate Faculty Representative is a voting member of the Committee and participates fully in carrying out all of the responsibilities listed above. For additional information you may refer to Graduate School Memorandum #13, "Supervisory Committees for Graduate Students."

The Supervisory Committee Chairperson is responsible for scheduling conferences and examinations and for informing all members of the Committee of the appropriate times and places. At least four members of the Committee, including the Chairperson and the Graduate Faculty Representative, must be in attendance at all conferences and examinations. At least three weeks prior to the agreed upon examination date, the Chairperson should ask the Dean of the Graduate School to approve the application for the examination and to announce it in The University Week. The Supervisory Committee must be convened by the Chairperson, whether the examinations are oral or written, and formal judgment on the Candidate's performance must be indicated on the warrant, dated and forwarded immediately to the Graduate School.

Members of the Supervisory Committee of a doctoral aspirant undertake a serious charge. They are responsible to the student and to their colleagues of the Graduate Faculty for the quality of the degree being sought.

Sincerely,

Gene L. Woodruff
Dean

GLW:ja
cc: Graduate Student: Payman Arabshahi
Graduate Program Coordinator: Professor S.S. Venkata
Student file

August 14, 1992

UNIVERSITY OF WASHINGTON
The Graduate School

May 8, 1992

Professor Robert Marks, Chairperson

Professor Eberhard Fetz, Graduate Faculty Representative, Physiology/Biophysics
Professor Mohamed El-Sharkawi
Professor Jenq-Neng Hwang
Professor Alistair Holden

Dear Colleagues:

I am writing to ask you to serve as members of the Supervisory Committee for Russell Deryl Reed who wishes to enter the doctoral program leading to the degree of Doctor of Philosophy in the field of Electrical Engineering.

It will be your responsibility as a committee (a) to approve a course of study which will fulfill the general course requirements of the student's major and supporting fields; (b) to conduct the student's General Examination; (c) to approve the Candidate's dissertation proposal; (d) to approve the Candidate's dissertation and (e) to conduct the Candidate's Final Examination. The Graduate Faculty Representative is a voting member of the Committee and participates fully in carrying out all of the responsibilities listed above. For additional information you may refer to Graduate School Memorandum #13, "Supervisory Committees for Graduate Students."

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Members of the Supervisory Committee of a doctoral aspirant undertake a serious charge. They are responsible to the student and to their colleagues of the Graduate Faculty for the quality of the degree being sought.

Sincerely,

Gene L. Woodruff
Dean

GLW:ja
cc: Graduate Student: Russell Deryl Reed
Graduate Program Coordinator: Professor S.S. Venkata
Student file

May 21, 1992

From wagner Wed Jul 29 11:55:00 1992
From: wagner (Ruth Wagner)
To: marks@milton.u.washington.edu
Cc: wagner
Subject: phone call - Dr. Emery
Date: Wed, 29 Jul 92 11:54:57 PDT

At the end of last week Dr. Emery called asking if you had received Prof. Snyder's draft/solicitation letter for promotions. I said I open your mail and did not recall seeing it. He said, "I'll see that another copy is sent." I have been waiting for a copy to arrive but have not seen it. Do you know to what he was referring - do you have it or shall I try to get a copy for you.

Ruth

DATE: July 16, 1992

TO: Mark Damborg, Associate Chair

FROM: Robert J. Marks II

SUBJECT: TA-ship recommendation for Bong-Gee Song

Bong-Gee, as you know, has applied for a position of a teaching assistant in our department. The purpose of this memo is to express my support for Mr. Song, and to encourage you to award the position to him.

I have been working with Mr. Song. He is quite good. As you know, he passed the quals on his first try. We have generated a superb paper on adaptive fuzzy estimation which will be presented at the Beijing International Joint Conference on Neural Networks in November. We are busily working on another.

I am currently supporting on RA and a post doc. When funds become available, Mr. Song will be the next to be supported. He is quite good.

In the mean time. Bong-Gee is in dire need of support. I have little doubt he will perform superbly as a teaching assistant. I hope you will consider him favorably.

file

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

July 14, 1992

To: Robert B. Pinter

From: Thomas A. Seliga, Chairman

Subject: Promotion Review Committee for Dr. Darrell R. Jackson

Professor Robert J. Marks II has notified me that he prefers not to participate on departmental P&T committee this year, since he will be Chairman of the College P&T Committee.

Accordingly, this is to request your service on this ad hoc Promotion Review Committee for Dr. Darrell R. Jackson in place of Professor Marks. A copy of my previous correspondence to Professors Haralick, Marks and Holden on this subject is attached for your examination.

cc: Robert M. Haralick
Alistair D.C. Holden
Robert J. Marks II

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@milton.u.washington.edu

July 10, 1992

TO: Thomas A. Seliga, Chair
FROM: Robert J. Marks II
SUBJECT: Departmental Review Committee for Darrell Jackson

I will be Chairing the P&T Committee for the College next year. My preference is not to serve on departmental P&T committees during this period. I feel that it is not appropriate for the same person to participate as a committee member at two different levels of review for P&T cases.

I therefore request that you remove me from this committee.

file

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

May 13, 1992

To: Professors Robert J. Marks II, Mani Soma and Blake Hannaford

From: Thomas A. Seliga, Chairman TAS

Subject: Virtual Reality: HIT Lab

I was delighted to learn of your participation, with Dr. Tom Furness, in the planning for the First Annual IEEE International Conference on Virtual Reality Technology. Tom has done an extraordinary job in taking the HIT Lab from a concept to a working reality at UW over a very short time period. Your cooperation with him in this conference will not only ensure its success but also help him move the Lab on to a next phase in its development — greater integration of the Lab with other programs in the College and University and more meaningful involvement with other faculty.

Best wishes for a most successful Conference.

cc: Tom Furness

University of Washington Correspondence

File

INTERDEPARTMENTAL

DATE: June 30, 1992

TO: Seho Oh, Payman Arabshahi

FROM: R. J. Marks II RJM II

The attached paper should be of interest in the test pruning work.

Attachment

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

June 16, 1992

To: Robert J. Marks II

From: Thomas A. Seliga, Chairman

Subject: Endrik Noges

Thanks for the info on Endrik's visit to Alaska. I've referred it to Marty Afromowitz for possible inclusion in next Fall's edition of EE Alumni Newsletter.

University of Washington Correspondence

INTERDEPARTMENTAL

6-16-92

To: Thomas A. Seliga, EE Chair
From: Robert J. Marks II, College of Engineering P&T Committee
Subject: Dr. Leondis

The Promotion and Tenure Committee of the College of Engineering requests that you identify a EE faculty member to present the case of Dr. Leondis. This person should be an advocate for Dr. Leondis. The P&T Committee will be meeting at 4:00 PM in the meeting room on the third floor of Loew Hall on Wednesday, June 17. The presentation of Dr. Leondis' case will be heard at this time.

Dr. Leondis' case is the only current business before the Committee. Please inform Dr. Larry Snyder, P&T Chair, and me of your selection as soon as poosible. If you are unable to identify a spokesperson for Dr. Leondis, please let us know. The meeting will then be posponed.

Ruth,
Please call
Val about
this ASAP.
- Bob -

University of Washington Correspondence

INTERDEPARTMENTAL

file

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

June 8, 1992

To: All EE Faculty

From: Thomas A. Seliga, Chairman

Subject: Special Faculty Meeting

There will be a **SPECIAL EXECUTIVE SESSION** of the Faculty at 1:00 p.m. this afternoon (June 8, Monday) in Room 321 EEB. The subject is an announcement by the Chairman.

University of Washington Correspondence

INTERDEPARTMENTAL

R. Marks

file

May 19, 1992

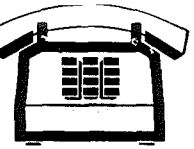
MEMO TO: EE Faculty and Staff

FROM: Sharon Schlittenhard Sharon

RE: U-WATS Long Distances Charges

Attached for your review are your U-WATS long distance charges for the period January-March, 1992, on Budget No. 06-1030. Please check to be sure that you recognize all the calls, and indicate any calls that should be charged to a sponsored programs budget by writing the budget number next to the charge. Any personal calls should be paid by a check made payable to the University of Washington Please return all items as appropriate to me.

Thank you.



BILLING DATA FOR BUDGET NUMBER 06-1030 FOR MARCH, 1992

UWATS CALLS FOR: MARKS FT10 ROBERT

DATE	TIME	RATE CATEGORY	NUMBER CALLED	LOCATION		MIN	CHARGE	SOURCE
03/07/92	05:34 PM	N	206-685-4933	SEATTLE	WA	20	3.20	D
03/09/92	11:26 PM	N	206-685-4933	SEATTLE	WA	13	2.08	D
03/09/92	11:55 PM	N	206-543-6112	SEATTLE	WA	9	1.44	D
03/10/92	08:21 AM	D	804-555-1212	DIR INFO		2	.60	A
03/10/92	08:23 AM	D	804-924-3931	CHARLOTSVL	VA	3	.70	A
03/10/92	10:51 PM	E	206-776-8995	HALLS LAKE	WA	51	8.43	D
03/11/92	01:38 PM	D	206-543-6112	SEATTLE	WA	76	18.24	D
03/12/92	11:07 AM	D	212-705-7900	NEW YORK	NY	3	.70	A
03/12/92	11:51 AM	D	033140794425	FRANCE		2	2.77	A
03/12/92	01:07 PM	D	206-543-6112	SEATTLE	WA	27	6.48	D
03/13/92	11:34 AM	D	212-705-7356	NEW YORK	NY	5	1.16	A
03/16/92	09:08 AM	D	212-705-7356	NEW YORK	NY	9	2.09	C
03/16/92	09:11 AM	D	619-453-6222	LA JOLLA	CA	7	1.60	C
03/17/92	10:12 AM	D	919-748-3908	WINSTN SAL	NC	11	2.56	C
03/17/92	10:16 AM	D	206-676-3290	BELLINGHAM	WA	3	.39	A
03/17/92	11:15 AM	D	919-748-3908	WINSTN SAL	NC	44	10.23	C
03/17/92	11:15 AM		206-392-9180	ISSAQUAH	WA	43	.00	C
03/17/92	12:04 PM	D	919-541-7123	DURHAM	NC	34	7.91	C
03/17/92	12:38 PM	D	212-705-7356	NEW YORK	NY	3	.70	C
03/17/92	12:44 PM	D	619-453-6222	LA JOLLA	CA	11	2.52	C
03/17/92	01:28 PM	D	812-877-8219	TERREHAUTE	IN	7	1.60	C
03/17/92	03:37 PM	E	000657913665	SINGAPORE		2	3.54	A
03/17/92	03:40 PM	D	415-856-6621	PALO ALTO	CA	3	.64	A
03/17/92	05:05 PM	E	919-481-4269	CARY	NC	24	3.46	C
03/17/92	05:33 PM	E	216-663-5610	MONTROSE	OH	45	6.49	C
03/18/92	07:44 PM	E	505-884-2500	ALBUQURQUE	NM	2	.28	A
03/19/92	09:06 AM	N	000657913665	SINGAPORE		2	2.97	A
03/19/92	11:23 AM	D	919-541-7123	DURHAM	NC	31	7.21	C
03/19/92	01:15 PM	D	919-541-7123	DURHAM	NC	2	.47	C
03/19/92	05:20 PM	E	505-884-2500	ALBUQURQUE	NM	2	.28	C
03/20/92	03:21 PM	D	408-553-2948	SAN JOSE	CA	3	.64	A
03/21/92	01:10 PM		206-477-5073	RENTON	WA	15	.00	C
03/23/92	02:25 PM	D	614-292-0351	COLUMBUS	OH	2	.47	A
03/23/92	04:13 PM	D	919-481-4269	CARY	NC	10	2.33	C
03/24/92	01:14 PM	D	415-855-2544	PALO ALTO	CA	2	.43	A
03/25/92	08:47 AM		206-865-3763	BELLEVUE	WA	1	.00	C
03/25/92	08:49 AM		206-865-3568	BELLEVUE	WA	1	.00	C
03/25/92	08:51 AM		206-865-3763	BELLEVUE	WA	2	.00	C
03/25/92	09:11 AM	D	919-541-7123	DURHAM	NC	14	3.26	C
03/25/92	09:11 AM		206-865-3763	BELLEVUE	WA	21	.00	C
03/25/92	10:10 AM	D	908-562-3946	DUNELLEN	NJ	2	.47	C
03/25/92	10:42 PM		206-391-7167	ISSAQUAH	WA	1	.00	C
03/26/92	11:44 AM	D	908-562-3946	DUNELLEN	NJ	3	.70	A
03/26/92	01:09 PM	D	908-562-1571	DUNELLEN	NJ	2	.47	A
03/28/92	08:31 AM	N	602-926-1550	MESA	AZ	48	5.94	C
03/30/92	12:27 PM		206-828-7412	KIRKLAND	WA	3	.00	C
03/31/92	09:23 AM	D	619-453-6222	LA JOLLA	CA	2	.46	A
03/31/92	09:53 AM	D	041216935263	SWITZERLAN		4	5.21	A
03/31/92	10:57 AM	D	908-562-3861	DUNELLEN	NJ	5	1.16	A
03/31/92	04:09 PM	E	033140794425	FRANCE		2	2.19	A

TOTAL UWATS CHARGES FOR: MARKS FT10 ROBERT 126.93

DEPARTMENT OF ELECTRICAL ENGINEERING

UNIVERSITY OF WASHINGTON

FACULTY MEETING May 12, 1992
Room EEB 108

PRESENT: Afromowitz, Albrecht, Alexandr tlas, Chan, Damborg, Dow, Helms, Hsu, Kuga, Lytle, Noges, Riskin, ; ;a, Emeritus Professor Bjorkstam

ABSENT: Andersen, Cheung, Christie, Clark, Darling, El-Sharkawi, Hannaford, Haralick, Holden, Hwang, Ishimaru, Kim, Kuhn, Lauritzen, Leondes, Liu, Marks, Meditch, Moritz, Pearsall, Peden, Pinter, Porter, Ritcey, Sahr, Shapiro, Soma, Somani, Spindel, Tsang, Venkata, Yang, Yee, Zick

The meeting was called to order at approximately 3:40 p.m.

MINUTES

The minutes of the April 14, 1992 meeting were approved unanimously as written.

CHAIRMAN'S REPORT

The Chairman announced the appointment of a new Dean of Undergraduate Education and Vice Provost, Dr. Fred Campbell.

Dr. Seliga gave special thanks to John Sahr, Blake Hannaford and Bob Albrecht, J.N. Hwang et. al. for helping make the College Open House a great success this year. The Department's contributions were especially noteworthy.

The Chairman announced that Professor Robert J. Marks II had been appointed as Editor of the *IEEE Transactions on Neural Networks* journal.

The WTC is sponsoring the 1992 Northwest Workshop on Design and Verification of Advanced Microelectronic Circuits and Systems. Andrew Yang is the Technical Program Coordinator and Department participants include Chi Chan, Carl Sechen, Andrew Yang and Mani Soma, June 25-26 at the Bellevue Athletic Club. This is in association with the WTC.

The Chairman presented data on the 1990-91 Student Evaluations of Teaching of Departmental Courses and compared them to the University and the College. He also noted that the students want every course evaluated. They will be bringing this proposal before the faculty at a future date. Some discussion followed.

ASSOCIATE CHAIRMAN'S REPORT

Dr. Endrik Noges, the Associate Chairman, has been asked by Testing Services for his comments on procedures for testing. Mark Damborg will bring this before the Undergraduate Studies Committee. Anyone wishing to add to this study should contact the Committee.

There have been complaints on some courses; they are being taught by different faculty, covering different material. If the courses serve as a prerequisite for other courses, faculty do not have the right to change the content of these courses. If they are not happy with the course as it stands and want to make some changes, they must take the issue before the respective professional group and/or committee.

The process is underway for sorting out TA's for Summer Quarter. Faculty should make their needs known as soon as possible.

Undergraduate Studies Committee

No report this meeting; however, a number of items will be coming up regarding the New Curriculum.

Graduate Studies and Research Committee (GSRC)

Dr. Seliga mentioned the issue of recruitment of new graduate students. So far we have admitted approximately 140 students. These students are outstanding; their average GRE score may exceed 2,000. He presented a breakdown of how this score is reached. This is the time to peruse the list to determine if any of these individuals would fit into our research programs. Faculty are encouraged to contact prospects directly, particularly if there is a possibility of awarding them an RA.

Professor Yasuo Kuga made a presentation regarding a proposed new course EE-524. There was some discussion. A motion was made to offer EE-524 alternate years beginning Fall Quarter 1993. Motion carried.

FACULTY ANNOUNCEMENTS

Professor Eve Riskin announced an upcoming speaker in EE. Ms. Lisa Holtby will be talking on gender issues, i.e., What is it like to be a member of an underrepresented group and, if you are in the majority, how do you become more sensitive or aware of these issues?

Professor Les Atlas requested faculty be careful in assigning projects to the Department's HP workstations. They were overloaded and overused. Some sort of system should probably be instituted to ensure care is exercised in use of memory.

OLD BUSINESS

Professor Martin Afromowitz reminded faculty about the Industrial Affiliates Program on May 21 and requested faculty to let him know ASAP whether they would be attending or not. The response from industry was slow so far, and it would be helpful to know just how many faculty were planning on being there.

Professor Damborg received a memorandum from Professor El-Sharkawi suggesting that faculty had agreed Ph. D. Qualifying Examinations would be oral only. The consensus of those present indicated that this is not the case and Professor El-Sharkawi will be so informed.

Professor Daniel Dow raised the issue of voting for a Department representative on the Faculty Senate. He gave a brief rundown about past procedures. We have received no response from two e-mail messages. He will send out a Memorandum to all faculty. Dr. Seliga noted that representation on the Senate was important to the Department and College.

NEW BUSINESS

Professor Riskin noted she had a list of women graduate students. She would like to have more names; if anyone knew of other women graduate students they should send her e-mail.

There was a very short discussion about a reception after graduation. Efforts will be made to investigate the situation and meet with Eta Kappa Nu student representatives to determine their interest in helping prepare for a reception.

Professor Robert Albrecht expressed concern that faculty did not have access to all laboratories in the EE Building at any time. There was general agreement with this concern, and a motion was made to instruct the Department Administration to work on resolving this problem. Motion carried.

NEW BUILDING

Professor Damborg noted some points on the new building. A schedule of future meetings for the schematic design phase has been sent to all faculty. These meetings will attempt to determine how labs, floors, space and buildings will be designed, as well as issues about how services are provided. The last meeting was very lively. He urged faculty to attend all subsequent meetings if they don't want to be left out of the picture when the final determinations are made. Their input is especially important at this stage of design.

On Wednesday, May 13 Helen Somers, State Representative on the Capital Budgets Committee, will be visiting the Department for a couple of hours. The goal is to increase her understanding of the project and solicit her support and help with the Legislature. She will also tour the building

The meeting adjourned to Executive Session at approximately 4:32 p.m.

University of Washington Correspondence

INTERDEPARTMENTAL

DATE: June 4, 1992

TO: Dr. Robert Center, Director
Washington Technology Center

FROM: Robert J. Marks II, Professor Bob Marks II

I spoke with Lloyd W. Peterson, Senior Assistant Attorney General in the University's Attorney General Division. I was assured that Professors are indeed indemnified by the University when they sign nondisclosures with outside companies if the interaction relates to University business. There are exceptions in the case of blatant violations. Mr. Peterson indicated that, during his tenure, he is aware of only a single case where indemnification was withheld from a UW employee.

cc: Sally Jandrall, WTC
L. W. Peterson
Peter Odabashian, WTC

University of Washington Correspondence

INTERDEPARTMENTAL

File

DATE: May 6, 1992

TO: Thomas A. Seliga

FROM: Robert A. Marks II Bob Marks RM

SUBJECT: Summer Salary

I plan to work a full three months this summer supported by grant money and teaching. As required by University policy, I solicit your permission to do so.

cc: Sharon Schlittenhard

1 month - teaching

1/2 month - 62-7153 Inverse Problems - NSF

1 1/2 months - 09-1051 WTC (2 weeks 1991-1992 budget; 4 weeks 1992-1993)

OK Seliga 5/26/92

file

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

May 5, 1992

To: All EE Faculty and Staff

From: Thomas A. Seliga, Chairman TASeliga

Subject: Professor Robert J. Marks II

I am pleased to inform you that Bob Marks has recently received the 1992 Distinguished Alumni Award from Rose-Hulman Institute of Technology. I am sure you join with me in congratulating him for a well-deserved honor.

cc: Professor Robert J. Marks II
J. Ray Bowen, Dean
College of Engineering

ROSE-HULMAN
INSTITUTE OF TECHNOLOGY
5500 Wabash Ave., Terre Haute, IN 47803 • (812) 877-8441

NEWS BUREAU

Contact: David Piker

For Release: Upon Receipt
April 28, 1992

UW PROFESSOR RECEIVES ALUMNI AWARD

Terre Haute, Ind.--Robert Marks, professor of electrical engineering at the University of Washington, will receive the 1992 Distinguished Alumnus Award from Rose-Hulman Institute of Technology on May 2.

Marks will be honored for his contributions to engineering education when he and four other Rose-Hulman alumni receive the alumni award during the college's annual Parents' Day Honors and Awards banquet.

He received his bachelor's and master's degrees in electrical engineering from Rose-Hulman in 1972 and 1973. He earned the Ph.D. in electrical engineering from Texas Tech University in 1977.

Marks has been a member of the University of Washington faculty since 1978.

He is a fellow in the Optical Society of America and has received numerous awards from the Institute of Electrical and Electronics Engineers (IEEE). Marks currently serves as an IEEE Distinguished Lecturer.

April 13, 1992 fil

THE UNIVERSITY OF WASHINGTON

The Graduate School

Professor Robbert Marks II, Chairperson

Professor Mohamed El-Sharkawi

Professor Ramasamy Krishnan

Dear Colleagues:

I am writing to ask you to serve as members of the Reading Committee for Zhi Li and to determine the appropriateness of the Candidate's dissertation as a basis for issuance of a warrant to hold the Final Examination.

The Reading Committee is charged primarily with reporting briefly on the distinctive aspects of the Candidate's research, including the methods used and the results. However, it should also satisfy itself that the dissertation meets the requirements that it be a significant contribution to knowledge and is an acceptable piece of scholarly writing. Reading Committee Report forms are available from the Graduate School and one signed copy of the report must accompany the two copies of the dissertation which are submitted to the Graduate School.

Once the Reading Committee has read a draft of the dissertation and has determined that the Candidate is prepared to schedule the Final Examination, a Request for Final Examination form is submitted to the Graduate School at least three weeks prior to the scheduled examination date. This form is intended to indicate that, except for minor alterations, the dissertation is ready for final defense.

I hope that you will be able to serve on this committee. If you have any questions, please call Graduate Student Services at 3/7115 or 5/2630.

Sincerely,

Gene L. Woodruff

Gene L. Woodruff
Dean

GLW:ja
cc: Graduate Student: Zhi Li
Graduate Program Coordinator: Professor S. S. Venkata April 22, 1992
Student file

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

May 6, 1992

TO: Professors Christie, El-Sharkawi, Venkata, Damborg, Liu, Dow, Helms, Lauritzen, Pinter, Soma, Yang, Afromowitz, Bjorkstam, Darling, Kuhn, Pearsall, Yee, Chan, Ishimaru, Kuga, Porter, Sahr, Seliga, Tsang, Haralick, Holden, Kim, Shapiro, Somani, Zick, Albrecht, Alexandro, Andersen, Clark, Hannaford, Hsu, Noges, Atlas, Hwang, Lytle, Marks, Meditch, Riskin, Ritcey

FROM: M. El-Sharkawi, Professor M. E. ew

RE: May 18-22 noon, 1992 Ph.D. Qualifying Examination

The following students will be contacting you for scheduling their Ph.D. Qualifying Examination. Please return the attached score sheet to Eddie/Michelle as soon as possible for tabulation. Faculty will meet June 2.

BUGUNER, Yucel	PALNITKAR, Samir
DAI, Liming	RAHAMI, Kam
DU, Huong	✓ RAJU, N. Ravisekhar
✓ HAN, Sang	✓ SAVAGE-CARMONA, Jesus
KAGALWALA, Raxit	✓ STREIFEL, Robert
LAM, Lawrence	✓ TING, Ming-Yuan
LEE, Jee-ming	WANG, Chien-Jen
✓ LEE, Shinhak	WEMPLE, Ivan
✓ MAHADEV, Pramod	WEN, Qian
MEI, Lin-Tien	✓ ZHONG, Hang
✓ MONROY, Hector	ZURK, Lisa
MOORE, Victor	

ew
Atts.

Please fill out & submit. Attach test sheet. To make copies of test for each student

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

College of Engineering, FH–10
Office of the Dean

May 18, 1992

Professor Robert J. Marks II
Electrical Engineering, FT-10

Dear Professor Marks:

I would like to invite you to a reception honoring your 15 years of service in the College of Engineering. It will take place on Tuesday, June 9, 1992 at 3:30 p.m. in the Walker-Ames Room, Kane Hall. This recognition will be at a reception which also honors the 1992 College of Engineering retirees.

If you are unable to attend, please contact Marylee Natkin.

Sincerely yours,

Ray

J. Ray Bowen
Dean

JRB:jb

cc: Thomas A. Seliga

I will be on travel (Dinner at UN!) Call Marylee with my regrets. – Bob

jc:\jrb\invite1.doc

Telephone: (206) 543–0340

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

May 5, 1992

To: All EE Faculty and Staff

From: Thomas A. Seliga, Chairman

Subject: Professor Robert J. Marks II

I am pleased to inform you that Bob Marks has recently received the 1992 Distinguished Alumni Award from Rose-Hulman Institute of Technology. I am sure you join with me in congratulating him for a well-deserved honor.

cc: Professor Robert J. Marks II
J. Ray Bowen, Dean
College of Engineering

ROSE-HULMAN
INSTITUTE OF TECHNOLOGY
5500 Wabash Ave., Terre Haute, IN 47803 • (812) 877-8441

NEWS BUREAU

Contact: David Piker

For Release: Upon Receipt
April 28, 1992

UW PROFESSOR RECEIVES ALUMNI AWARD

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He received his bachelor's and master's degrees in electrical engineering from Rose-Hulman in 1972 and 1973. He earned the Ph.D. in electrical engineering from Texas Tech University in 1977.

Marks has been a member of the University of Washington faculty since 1978.

He is a fellow in the Optical Society of America and has received numerous awards from the Institute of Electrical and Electronics Engineers (IEEE). Marks currently serves as an IEEE Distinguished Lecturer.

April 22, 1992

TO: Thomas A. Seliga, Chair

FROM: Robert J. Marks II

SUBJECT; Overtime, Tuesday, April 22, 1992

I would like to request permission for Ruth Wagner to work overtime to take minutes at a meeting to set up an IEEE conference. I anticipate the meeting to last two and a half to three hours. She will be paid from IEEE secretarial monies.

To Eddie W
from RJ Marks

D. W. Lytle. Communication and stochastic systems analysis, marine acoustics.

R. J. Marks. ~~Optical information processing,~~ fuzzy systems artificial neural networks, signal analysis, statistical communication theory, optical processing

J. S. Meditch. Digital communication networks, switching and traffic theory, broadband ISDN, multimedia communications.

A. Nelson (Adjunct, Department of Bioengineering). Biophysics, imaging.

E. A. Riskin. Data compression, image processing, pattern recognition.

J. A. Ritcey. Communications, detection and estimation. Statistical signal processing for radar, underwater acoustics and biomedicine.

Electromagnetics, Optics, and Acoustics

J. Bjorkstam (Emeritus). Electromagnetic properties of materials, magnetic resonance spectroscopy.

C. H. Chan. Computational electromagnetics, microwave integrated circuits, scattering and antennas, bioengineering.

A. Guy. (Emeritus) (Adjunct, Department of Bioengineering). Biological effects and medical applications of electromagnetic fields.

A. Ishimaru. Electromagnetics, optics, acoustics, applied mathematics, scattering theory.

D. Jackson. (Research). Underwater acoustics.

University of Washington Correspondence

INTERDEPARTMENTAL

March 23, 1992

TO: Alistair Holden (via Valerie Higgins)

FROM: Robert J. Marks II

SUBJECT: Materials from class for ABET Review

Attached is work from three different students. The class was too large to grade homework. Grade was based on the attached three tests.

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

April 28, 1992

TO: Members of the Graduate Studies Committee

FROM: S. S. Yee, Professor ew

RE: EE546

BALLOT: FOR _____ AGAINST X

SSY:ew
Atts.

Copy returned 5/1/92

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

April 28, 1992

Confirming e.mail message to all Graduate Studies Committee members from Professor Yee

Course Approval of EE546

The Committee discussed the requests of Professor Albrecht on EE546 and EE599 in today's (April 28, 1992) meeting. However in the process of the discussion, the motion was tabled.

I talked with Professor Albrecht about the EE599 self-paced teaching, and asked why the students who are interested in the proposed EE599 materials could not enroll as an independent study instead of enrolling in a course as proposed? Professor Albrecht is now asking the Committee to approve the proposed EE546. I am asking Eddie to distribute the outline of the proposed EE546 "Mobile Robot Systems Integration" to each of your mailboxes and then based on the materials available to you, vote whether you want to approve the proposed EE546--"Special topic course of the Control System Group"--by sending me a "yes" or "no" vote to Eddie no later than Thursday, April 30, 1992.

As far as the EE599, we will invite Professor Albrecht to discuss all the issues raised in today's meeting at our next Graduate Studies Meeting (I don't know when the next meeting will be scheduled as yet).

Please vote so that I can transmit the decision of the Committee to Professor Albrecht as soon as possible. Thank you for your cooperation.

cc: Professor Albrecht

Marks

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

April 24, 1992

TO: Professor S. Yee, Chair
Graduate Studies Committee

FROM: Professor F. Alexandro F. A

RE: EE 599, and EE 546

The Circuits and Controls Systems group approved the enclosed course offerings.

FA:mb

Proposed course: Could this be briefly discussed (and approved) on 4/17 meeting Bob G

MOBILE ROBOT SYSTEMS INTEGRATION

EE 546

Winter 1993

3 credit hours

Prerequisite EE 599 (Robotics (Albrecht))

Four class hours. Two hours of lecture plus two hours of discussion/demonstrations in the mobile robots laboratory

The objectives of EE 546 are:

1) to become familiar with the multitasking on-board operating system, LLAMA, to use it for commanding robot motion, downloading macros, and programming various robot performances.

2) to become familiar with the various modules available for high level robot control using the G2 expert system.

3) to explore research issues from the literature and to recast the methods and results into the local environment of the mobile robots program in the EE Department for the purpose of preparing to do graduate research in this field.

a) reading assignments in the G2 reference manual and in the LLAMA reference manual

b) reading assignments from selected recent literature in the area of mobile robot planning, navigation, piloting, control, cartography, surveying, and exploring

Course outline:

Week	Material
1	Introduction to LLAMA
2	LLAMA programming and macros
3	Interfacing between LLAMA and G2, the Controller module
4	Skills, performances, and performance orders in G2
5	The Cartography and Surveyor modules
6	The Planner and Navigation modules
7	The Pilot and Explorer modules
8	Review of recent literature on mobile robot modules
9	Student presentations on literature
10	Student presentations and research projections

From marks@u.washington.edu Sat Apr 25 00:04:48 1992
From: Robert Marks <marks@u.washington.edu>
To: marks@milton.u.washington.edu, wagner@uw-isdl.ee.washington.edu
Subject: Re: equipment at home
Date: Sat, 25 Apr 92 00:03:07 -0700

```
        From wagner@uw-isdl.ee.washington.edu Fri Apr 24 15:38:30 1992
        Received: from edison.ee.washington.edu by milton.u.washington.edu
                (5.65/UW-NDC Revision: 2.22 ) id AA04255; Fri, 24 Apr 92 15:38:2
8 -0700
        Received: from uw-isdl.ee.washington.edu by edison.ee.washington.edu
                (5.61/UW-NDC Revision: 2.6 ) id AA28431; Fri, 24 Apr 92 15:41:28
 -0700
        Received: from essex.ee.washington.edu by uw-isdl.ee.washington.edu (4.1
/SMI-4.1)
                id AA06188; Fri, 24 Apr 92 15:39:58 PDT
        Date: Fri, 24 Apr 92 15:39:57 PDT
        From: wagner@uw-isdl.ee.washington.edu (Ruth Wagner)
        Message-Id: <9204242239.AA06188@uw-isdl.ee.washington.edu>
        To: marks@milton.u.washington.edu
        Subject: equipment at home
```

The following memo was in your box:

"Thanks for informing me of the University property that is at your resi dence and for identifying the items and their use. The latter is reasonable and acceptable in that the items clearly support Departmental/University-related ac tivities." (signed) Thomas A. Seliga

/\
\/

Ruth,

Great.

Let's get an ok for the typewriter (same reason as other stuff)

What is status of the file cabinate. Will it be delivered to my home?

Bob

University of Washington Correspondence

INTERDEPARTMENTAL

April 22, 1992

TO: Thomas A. Seliga, Chair

FROM: Robert J. Marks II

SUBJECT; Overtime Wednes., April 22, 1992

I would like to request permission for Ruth Wagner to work overtime to take minutes at a meeting to set up an IEEE conference. I anticipate the meeting to last two and a half to three hours. She will be paid from IEEE secretarial monies.

OK
RJM
4/22/92

Marie
Bob
Sally
Payman
Jai

3/10/92.

Hello Ruth:

I mailed the invitation to: (last March 25 Vidia - 865-3568)

Donald Snow: Applied Precision SJ

Thomas Caudell: Boeing. 865-3763 RW msg

Pranab Baruah: Boeing. yes(1) RW ~~yes~~ (1)

and faxed invitations to:

Chak-Yoon AW UW

John Bennett L-Squared SS

Richard Betts Eldec 743-8445 no (was going to) RW msg

Bryan Buchanan Boeing 657-8052 no RW no

John Evans Eldec/CDADIC yes (2)

Terry Larson Schlumberger yes (3)

Rich Nelson Fluke/CDADIC yes (4)

Russ Shull Boeing 657-5610 No conflict RW msg

Warren Snapp 657-9994 657-8167 FAX SJ

John Cole Silicon Designs SJ

~~Chak Yoon Aw~~ UofW

Attached also are the cover page of the fax w/ message confirmations as back up.

Sincerely,

Kim Chun
685-1920.

From marks@u.washington.edu Sat Mar 7 00:57:55 1992
From: Robert Marks <marks@u.washington.edu>
To: wagner@essex.ee.washington.edu
Cc: marks@u.washington.edu
Date: Sat, 7 Mar 92 00:58:26 -0800

Please call Sally with the Changes.
Bob

> From marks Sat Mar 7 00:57:47 1992
> Received: by milton.u.washington.edu
> (5.65/UW-NDC Revision: 2.22) id AA29547; Sat, 7 Mar 92 00:57:45 -0800
> Date: Sat, 7 Mar 92 00:57:45 -0800
> From: Robert Marks <marks@u.washington.edu>
> Message-Id: <9203070857.AA29547@milton.u.washington.edu>
> Sender: marks@milton.u.washington.edu
> To: jandrall@milton.u.washington.edu
> Subject: Announcement
> Cc: marks
>
> Sally,
>
> Ruth has the announcement. It looked quite good! There were a few minor
> changes.
>
> Bob

From marks@u.washington.edu Sat Mar 7 17:40:36 1992
From: Robert Marks <marks@u.washington.edu>
To: jandrall@milton.u.washington.edu, soma@ee.washington.edu, wagner@essex.ee.washington.edu
Cc: marks@u.washington.edu
Subject: WTC invitees
Date: Sat, 7 Mar 92 17:41:05 -0800

Three from Boeing Computer services.

Dr. Tom Caudell
P.O. Box 24346
MS 7L-22
Seattle, WA 98124

Drs. Jai J. Choi & Pranab Baruah at the same address
as above EXCEPT with different mail stop: MS 6C-04

(Note: it is Mr. Baruah)

Gleen phone from following:

> From dwunsch@atc.boeing.com Sat Mar 7 14:24:57 1992
> Received: from atc.boeing.com by milton.u.washington.edu
> (5.65/UW-NDC Revision: 2.22) id AA07435; Sat, 7 Mar 92 14:24:54 -0800
> Received: by atc.boeing.com on Sat, 7 Mar 92 14:20:36 PST
> Date: Sat, 7 Mar 92 14:20:36 PST
> From: Don Wunsch <dwunsch@atc.boeing.com>
> Message-Id: <9203072220.AA07283@atc.boeing.com>
> To: dwunsch@atc.boeing.com, marks@u.washington.edu
> Subject: Re: Address
> Cc: wagner@essex.ee.washington.edu
> Status: O
>
> Bob,
>
> Here's the infor you requested for you and Ruth:
>
> Pranab Baruah
> Senior Principal Scientist
> Boeing Computer Services
> PO Box 24346, MS 6C-04
> Seattle, WA 98124-0346
>
> Phone: (206) 477-0862
> FAX: (206) 477-1001
>
> Email is not impossible, but it would take a true guru to get it to him. He doesn't get his e-mail on a UNIX node, and although there is a patch to his machine, it would be tricky to access outside of Boeing. Maybe later we can try to figure it out--it would be interesting.
>
> Don

From marks@u.washington.edu Fri Mar 6 18:46:12 1992
From: Robert Marks <marks@u.washington.edu>
To: wagner@essex.ee.washington.edu
Cc: marks@u.washington.edu
Date: Fri, 6 Mar 92 18:46:42 -0800

Ruth,
Please do this.
Bob

> From marks Fri Mar 6 18:46:03 1992
> Received: by milton.u.washington.edu
> (5.65/UW-NDC Revision: 2.22) id AA12480; Fri, 6 Mar 92 18:46:01 -0800
> Date: Fri, 6 Mar 92 18:46:01 -0800
> From: Robert Marks <marks@u.washington.edu>
> Message-Id: <9203070246.AA12480@milton.u.washington.edu>
> Sender: marks@milton.u.washington.edu
> To: jandrall@milton.u.washington.edu, soma@ee.washington.edu
> Subject: List
> Cc: marks, wagner@essex.ee.washington.edu
>
> I have 2 to add from the list, both from Boeing.
>
> Mr. Pranab Baruah
> Dr. Tom Caudell
>
> Ruth will e-mail the addresses to you.
>
> Bob

From wagner Mon Mar 2 15:14:52 1992
From: wagner (Ruth Wagner)
To: marks@milton.u.washington.edu
Cc: jandrell@u.washington.edu, soma@u.washington.edu, wagner@isdl
Subject: Mtg at Faculty Club
Date: Mon, 2 Mar 92 15:14:47 PST

Following is information on meeting with lunch at the Faculty Club

Thursday, 3/26 - Music Room can use existing stuffed couches or have conference table with chairs around - 12-15 will be comfortable, 20 will be tight. No charge.

The Conference Room would have a $12.50/hour charge.

University Catering would serve a cold lunch. All prices for food is plus a 10% charge.
Some of the selections would be:

Salad, sandwich, brownie and beverage	$6.95
Croissant sandwich, salad, brownie and beverage	7.95
Salads with roll, butter, and beverage:	
Pineapple boat - curried chicken	8.25
Cobb	7.25
Sesame honey chicken	7.75
Shrimp	8.25
Taco	6.25

If you want a wider selection, I can get it.

Catering needs 2 weeks notice about the meal(s). The bill can be put on one Faculty Club Card or on a U budget on which food can be charged.

The Music Room and Dining Room are reserved in Marks name.

You can put three words on "Reader Board" to direct people. What would you want?

Bob - what account would we be charging? – Sally will e-mail

Ruth

From marks@u.washington.edu Fri Mar 6 05:19:20 1992
From: Robert Marks <marks@u.washington.edu>
To: wagner@essex.ee.washington.edu
Cc: marks@u.washington.edu
Subject: Woops!
Date: Fri, 6 Mar 92 05:19:50 -0800

Ruth,
Last message was spose to be this one.
Bob

```
        From jandrall@u.washington.edu Mon Mar  2 11:22:23 1992
        Received: from blake.u.washington.edu by milton.u.washington.edu
                (5.65/UW-NDC Revision: 2.22 ) id AA09567; Mon, 2 Mar 92 11:22:21
 -0800
        Received: from edison.ee.washington.edu by blake.u.washington.edu
                (5.65/UW-NDC Revision: 2.1 ) id AA20354; Mon, 2 Mar 92 11:22:13
-0800
        Received: from milton.u.washington.edu by edison.ee.washington.edu
                (5.61/UW-NDC Revision: 2.6 ) id AA03109; Mon, 2 Mar 92 11:24:03
-0800
        Received: by milton.u.washington.edu
                (5.65/UW-NDC Revision: 2.22 ) id AA09493; Mon, 2 Mar 92 11:22:12
 -0800
        Date: Mon, 2 Mar 92 11:22:12 -0800
        From: Sally Jandrall <jandrall@u.washington.edu>
        Message-Id: <9203021922.AA09493@milton.u.washington.edu>
        Sender: jandrall@milton.u.washington.edu
        To: marks@ee.washington.edu
        Subject: budget number for Executive Briefing
        Status: O

        the number to use is # 09-1162.  When are your going to get your stuff t
o me?

        Also, I'm not going to have time to meet with the guys from American Pio
neer.
        I'll call them and tentatively schedule something o for when I get back
from
        New Zealand!

        Sally
```

Budget Coordinator
Randy Tanser

From marks@u.washington.edu Fri Mar 6 05:16:33 1992
From: Robert Marks <marks@u.washington.edu>
To: wagner@essex.ee.washington.edu
Cc: marks@u.washington.edu
Date: Fri, 6 Mar 92 05:17:04 -0800

```
        From jandrall@u.washington.edu Tue Mar  3 10:39:35 1992
        Received: from blake.u.washington.edu by milton.u.washington.edu
                (5.65/UW-NDC Revision: 2.22 ) id AA03980; Tue, 3 Mar 92 10:39:31
 -0800
        Received: from edison.ee.washington.edu by blake.u.washington.edu
                (5.65/UW-NDC Revision: 2.1 ) id AA21844; Tue, 3 Mar 92 10:39:20
-0800
        Received: from milton.u.washington.edu by edison.ee.washington.edu
                (5.61/UW-NDC Revision: 2.6 ) id AA07382; Tue, 3 Mar 92 10:41:12
-0800
        Received: by milton.u.washington.edu
                (5.65/UW-NDC Revision: 2.22 ) id AA03924; Tue, 3 Mar 92 10:39:18
 -0800
        Date: Tue, 3 Mar 92 10:39:18 -0800
        From: Sally Jandrall <jandrall@u.washington.edu>
        Message-Id: <9203031839.AA03924@milton.u.washington.edu>
        Sender: jandrall@milton.u.washington.edu
        To: jandrall@milton.u.washington.edu, marks@ee.washington.edu,
                soma@maxwell.ee.washington.edu
        Subject: Re: workshop info
        Status: O

        well, I need a title!  I'll do up the other stuff and fax it to you for
your
        approval.  As soon as I get the mailing list from you (or give it to Kim
 if
        it's next week.  I've informed her of what you're doing) we can send it
out.
        Would it be ok if I added a few names on it too?

        Sally
```

file
(General Corr)

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

April 2, 1992

To: Professor Cornelius T. Leondes

From: Thomas A. Seliga, Chairman TASeliga

Subject: Peer Review of Teaching

In accordance with College of Engineering policies, it is necessary for the Department to conduct a peer review of your teaching this academic year. The Department procedures for this are attached.

Accordingly, you are requested to select three reviewers by Friday April 10. You will then be responsible for contacting your reviewers and working with them to perform their evaluation by no later than May 1, 1992.

Thank you for participating in this very important activity.

To Tom Seliga

With respect to the above I wish to select as my 3 reviewers

Jim Modestad, Chairman

Bob Haralick

Bob Marks

Cony Leondes

LEONDES, CORNELIUS (SP'91)
Professor

E E 549 A

Autumn 1991
*

Electrical Engineering

Engineering

University of Washington
FT-10

STUDENT EVALUATION of TEACHING

This course was rated by 5 students.
(All percentages are based on the number of students who rated each item.)

GENERAL EVALUATION:	PERCENTAGES E	VG	G	F	P	VP	MEAN	DECILE RANK Institution	DECILE RANK College/Division
1. Course as a whole was:	60	0	40	0	0	0	4.20	7	3
2. Course content was:	40	20	40	0	0	0	4.00	5	3
3. Instructor's contribution to the course was:	60	0	40	0	0	0	4.20	5	6
4. Instructor's effectiveness in teaching the subject matter was:	60	0	40	0	0	0	4.20	6	6
MEAN OF ITEMS 1-4							4.15	6	4

FEEDBACK TO INSTRUCTOR:	E	VG	G	F	P	VP	MEAN		
1. Course organization was:	0	60	20	20	0	0	3.40	2	3
2. Clarity of instructor's voice was:	60	40	0	0	0	0	4.60	9	9
3. Explanations by instructor were:	50	25	0	25	0	0	4.00	4	7
4. Instructor's ability to present alternative explanations was:	60	0	40	0	0	0	4.20	8	7
5. Instructor's use of examples and illustrations was:	60	40	0	0	0	0	4.60	9	9
6. Quality of questions or problems raised by instructor was:	60	20	20	0	0	0	4.40	8	9
7. Student confidence in instructor's knowledge was:	60	40	0	0	0	0	4.60	8	9
8. Instructor's enthusiasm was:	80	20	0	0	0	0	4.80	9	9
9. Encouragement given students to express themselves was:	80	0	20	0	0	0	4.60	7	9
10. Answers to student questions were:	60	0	40	0	0	0	4.20	8	5
11. Availability of extra help when needed was:	20	60	0	20	0	0	3.80	4	3

INFORMATION TO OTHER STUDENTS:	E	VG	G	F	P	VP	MEAN		
1. Use of class time was:	0	60	40	0	0	0	3.60	3	4
2. Instructor's interest in whether students learned was:	40	20	40	0	0	0	4.00	6	4
3. Amount you learned in the course was:	60	0	20	20	0	0	4.00	6	8
4. Relevance and usefulness of course content is:	40	20	20	20	0	0	3.80	3	9
5. Evaluative and grading techniques (tests, papers, projects) were:	100	0	0	0	0	0	5.00	9	9
6. Reasonableness of assigned work was:	60	40	0	0	0	0	4.60	9	9
7. Clarity of student responsibilities and requirements was:	60	40	0	0	0	0	4.60	9	9

WANTED TO TAKE COURSE:
- Yes------ 80
- No------- 0
- Neutral-- 20
- Omit----- 0

COURSE WAS:
- Major requirement---------- 80
- Minor/program requirement-- 0
- Distribution requirement--- 20
- Elective------------------- 0
- Other---------------------- 0
- Omit----------------------- 0

CLASS COMPOSITION:
- Freshman--- 0
- Sophomore-- 0
- Junior----- 0
- Senior----- 0
- Graduate--- 100
- Other------ 0
- Omit------- 0

GRADE EXPECTED:
- A (3.6-4.0)--100
- B (2.6-3.5)-- 0
- C (1.6-2.5)-- 0
- D (0.7-1.5)-- 0
- E (0.0)------ 0
- Pass--------- 0
- Omit--------- 0

OPTIONAL ITEMS

	E	VG	G	F	P	VP	Mean
#1							
#2							
#3							
#4							

	0	1	2	3	4	5	6	7	8	9
#5										
#6										
#7										
#8										

Survey Number: UW-AU91-1052
Printed: 11/13/91
Batch: AAA-0641, Form A
Enrollment: 20 students
INSTRUCTOR COPY
DEPARTMENTAL COPY ALSO REQUESTED.
CIDR booklet included.

MEAN RATING SCALE

E	excellent	-5
VG	very good	-4
G	good	-3
F	fair	-2
P	poor	-1
VP	very poor	-0

INSTRUCTIONAL ASSESSMENT SYSTEM
Office of Educational Assessment
University of Washington

UNIVERSITY OF VIRGINIA

YACOV Y. HAIMES
LAWRENCE R. QUARLES PROFESSOR OF SYSTEMS ENGINEERING
AND CIVIL ENGINEERING, AND CENTER DIRECTOR

February 24, 1992

Professor Thomas A. Seliga, Chairman
Department of Electrical Engineering
University of Washington
Seattle, Washington 98195

Dear Professor Seliga:

Thank you for your letter of February 6, 1992 concerning the reappointment of Professor C.T. Leondes. I am pleased to share with you my evaluation of the exceptional accomplishments of Professor Leondes.

The reputation of a university is a process that evolves over the years. And this reputation is built on many attributes, the most important of which is its select faculty members who have distinguished themselves by their outstanding teaching, their innovative and exceptional scholarly work, and their lifetime commitment to public service. Unquestionably, Professor Cornelius T. Leondes is one of these select distinguished faculty.

I first met Professor Leondes during the spring of 1966 when I enrolled as a graduate student at UCLA in one of his classes. Today, 26 years later and after I have advanced through the academic ranks, I am even more appreciative and in awe of C. T. Leondes as a teacher--for the love, generosity, dedication, respect, and commitment he gives his students. Furthermore, his commitment to his students seems to be limitless--not only for the duration of their tenure as students, but for subsequent years as well. Indeed, Professor Leondes epitomizes to me the warm and personal commitment of professors at high quality universities, such as the University of Washington, the University of Virginia, and UCLA.

When one attempts to quantify or measure, for meritorious purposes, the contribution of an individual to research and scholarly work, many norms come to mind. I believe that Professor Leondes has excelled and distinguished himself in his research and scholarly work under any measurable criterion. His contribution to the advancement of control engineering is so wide and profound that his work with his students is cited in almost every important archival paper on the subject of control of dynamic systems. The outstanding caliber of the cadre of graduate students that he has advised and worked with, in particular the very large number of these students, is the envy of most of us. The fact that numerous technical committees and other private and government organizations seek his counsel and advice

CENTER FOR RISK MANAGEMENT OF ENGINEERING SYSTEMS
OLSSON HALL, CHARLOTTESVILLE, VA. 22903 TELEPHONE 804-924-3803, 924-0960
982-HEAR (TDD)

is an explicit tribute to his knowledge, vision, and resourcefulness. The welter of articles and books written by Professor Leondes and with his students on the subject of process control and the control of dynamic systems constitute an authoritative mini-encyclopedia in the field. And finally, the high honors awarded Professor Leondes, most notably the IEEE Baker Prize, constitute not only a measure of appreciation by the professional community for his lifelong contribution to the profession, but also a loud statement declaring to the world the high esteem that his peers hold for him.

In terms of his public service--both to the professional community and to the defense establishment--Professor Leondes has made himself a legend. He is probably one of the few who have so decisively and markedly contributed to the advancement of the control of numerous defense systems in the U.S. In addition to his diverse consulting activities, he has volunteered his time and energy to many other public service activities.

When students enter a high quality university, they discover its greatness through distinguished faculty of the caliber of Professor Leondes. Then they leave the university inspired, better educated, and significantly more mature and enriched because of their association with faculty of the eminence of Professor Leondes. His lasting inspiration will continue to guide and influence my own career.

I wholeheartedly support the reappointment of Professor Leondes in the Department of Electrical Engineering at the University of Washington.

Sincerely yours,

Yacov Y. Haimes
Quarles Professor of Engineering and
Director of Center for Risk Management
of Engineering Systems

YYH/sg

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10

C O N F I D E N T I A L

Date: April 8, 1992

To: Bob Haralick
Bob Marks
Jim Meditch (Chairman)

From: Corny Leondes

Subject: The Enclosed Item with Respect to the Peer Review Process

Dear Friends:

I am asking you to serve as my peer review committee with Jim Meditch as my chairman. In this regard, I would like to note that:

1. While I still have my sanity and my health I plan to leave here at the end of this quarter, and I will submit my resignation to Ray Bowen (not Tom Seliga) at that time.

2. I came up here with enthusiasm and total commitment, and I have been amazingly productive, producing 40 volumes in 2 years (the first 20, of that which have been published thus far, have the UW on the title page), 10 technical articles (mostly in archival journals, per year, etc.

3. But, this place does not recognize or appreciate excellence or dedication. Ed Stear was "driven off" and now I am being "driven off".

4. With regard to the peer review process itself, I have no teaching this quarter, and my presence here will be "skimpy" from now on.

5. Therefore, I would ask you to forward your peer review evaluation based on:

(1) My teaching evaluations. My most recent one is enclosed, and you will see that I am heavily into the 90% decile rank. But that is the way I have always been.
(2) I am always rated very high in enthusiasm, and that has always been the case. For instance, in the enclosed I am rated 90% in decile ranking in this category in the college.
(3) I have a long and rather unique record in teaching, and very few have produced as many graduate students as I have. The bond between me and my students, past and present, is exemplified by the enclosed letter from Yacov Haimes.

In conclusion, therefore, I ask you to submit your peer review report based on the above strong evidence, and I wish to forego a meeting because, again, I expect my presence here to be "skimpy" until I resign on July 1.

Corny

P.S. Please treat my plans with the strictest confidence until I forward my resignation.

University of Washington Correspondence

INTERDEPARTMENTAL

April 15, 1992

TO: Les Atlas

FROM: Robert J. Marks II

SUBJECT: Royalty Research Review

For me to review proposal #131 is a severe conflict of interest.

I hope that no one in this department is reviewing my proposal.

INDEPENDENT STUDY

Name PAYMAN ARABSHAHI Quarter SPRING 92

Professor R. J. MARKS II has agreed to be my advisor for

1 credits of (circle one) EE 599, 600A, 600B, 700A, 800A.

Signature of Professor Robert J Marks II

600A= Independent Study or Research
600B=Master's non-thesis project-a minimum of 4 credits must be completed in one quarter
700=Master's Thesis

UNIVERSITY OF WASHINGTON
DEPARTMENT OF ELECTRICAL ENGINEERING FT-10
SEATTLE, WASHINGTON 98195 USA
FAX: (206) 543-3842

FAX Cover Sheet

ATTENTION: Ad Department - Classified

NAME OF FIRM: Chronicle of Higher Education

LOCATION: Washington, DC

FAX TELEPHONE NUMBER: 202-296-2691

FROM: Ruth Wagner PHONE: 206-543-6061

This transmission, including this cover page, contains 1 pages

DATE: March 30, 1992 TIME: 9:50 am

Please call (206) 543-6061 if you do not receive all of the pages.

Please place the following ad in your April 8 issue in the classified section.

The Dept. of Electrical Engineering at the University of Washington anticipates a Research Assistant Professorship position opening in the area of intelligent systems and signal processing. The position requires expertise in neural networks, fuzzy systems, and time frequency representation as applied to power systems and medical imaging. It also requires working with and supervising graduate students. To apply, send a resume and references by May 11, to Prof. R.J. Marks, Dept. of Electrical Engineering, FT-10, University of Washington, Seattle WA 98195.

I calculate the charges to be 82 words @$1.25/word to be $101.25. Please bill to the

University of Washington
Accounts Payable, ND-30
3917 University Way N.E.
Seattle, WA 98105

Reference: PO #142725

If you have any questions, or there is some problem in placing this in the April 8 issue, please call me. Thanks!

UNIVERSITY OF WASHINGTON
DEPARTMENT OF ELECTRICAL ENGINEERING FT-10
SEATTLE, WASHINGTON 98195 USA
FAX: (206) 543-3842

FAX Cover Sheet

ATTENTION: Ad Department - Classified

NAME OF FIRM: Chronicle of Higher Education

LOCATION: Washington, DC

FAX TELEPHONE NUMBER: 202-296-2691

FROM: Ruth Wagner PHONE: 206-543-6061

This transmission, including this cover page, contains 1 pages

DATE: 4/1/92 TIME: 1:25 pm

Please call (206) 543-6061 if you do not receive all of the pages.

I have been asked to have you confirm that the ad for the Dept. of Electrical Engineering at the University of Washington will appear in the April 8 issue.

Would you please send me a FAX or call to verify the issue.

Thanks!

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

March 18, 1992

To: EE Faculty

From: Valerie Higgins

Subject: Annual Boeing Endowment for Excellence Report

Attached is a copy of our report for last year to give you an idea of what the College will be looking for in the way of information. We would like to be able to submit our report on time this year and so are starting the process ahead of time; we're usually frantically scurrying about in July for a report that was due in June before the end of Spring Quarter.

Your assistance would be much appreciated. Please take a look at our submission for last year and send me your contributions for the 1991-92 year. Thank you.

DEPARTMENT OF ELECTRICAL ENGINEERING

BOEING ENDOWMENT FOR EXCELLENCE ANNUAL REPORT 1990-91

I. INTERACTION BETWEEN THE COLLEGE AND THE BOEING COMPANY:

A. Associate Professor Les E. Atlas

1. A development contract with Boeing Commerical, *Advanced Time-Frequency Display and Interpretation System* (Les Atlas, P.I.), was funded for $139,000 for 1991. So far, there have been five quarterly reports, software, and plots representing data interpretation delivered to the sponsors. There also has been a large amount of interaction between the Boeing Commercial Sensors Group and us. This interaction has included:

   a. Participation of Gary Bernard and Rama Chandran of Boeing in weekly project meetings at the UW. Dr. Bernard is also an Affiliate Faculty member of EE.

   b. Demonstrations of developed sensor interpretation software at Professor Atlas' UW lab and at Gary Bernard's Auburn facility.

   c. Parallel design of data interpretation systems has been done to make Boeing Commercial Sensors Group's computer system fully compatible with the system designed by Professor Atlas and his students.

2. James Pitton, who is a Ph.D. student working with Professor Atlas, is spending Summer 1991 as a full-time employee of Boeing Commercial. One of Jim's tasks is to collect data for future use by Professor Atlas' project.

B. Assistant Professor Chi-Hou Chan

Supervising eight graduate students from Boeing during the 1990-91 Academic Year:

Chad Au (M.S. Thesis)
Mark Bushbeck (M.S. Thesis)
Russell Bowers (M.S. Thesis)
Donald Dabelstein (M.S. Thesis)
Kyle Dallabetta (M.S. Thesis)
Paul Jeroma (Ph.D. Dissertation)
Brian Peterson (M.S. Thesis)
Kevin Burket (M.S. Project - graduated Summer 1990)

During the 1990-91 Academic Year, a contract entitled *Dichroic Surface Designs for Reflector Antenna Applications* was awarded to Professor Chan by Boeing Aerospace to design dichroic surface using artificial neural networks. Technical discussions are conducted on a biweekly basis. He also delivered a one-hour seminar on high-frequency interconnects at Boeing.

C. Professor Irene C. Peden

John Brew obtained his M.S. through the TIE Program. Grant Ellis spent a year's sabbatical leave in residence at the University of Washington funded by Boeing to work on his Ph.D. dissertation. He substantially completed his experimental work associated with the research during the year.

D. Professor Endrik Noges

As an outgrowth of consulting and analysis work with the Flight Technology Development Organization of Boeing Aerospace and Electronics in the area of navigation, guidance and control, a research program in GPS Integrity Studies was initiated. This program is partially supported by Boeing in the form of the full use of computer facilities and involvs two M.S.E.E.thesis research projects.

E. Professor Robert B. Pinter

Professor Pinter presented a lecture on biological neural networks on October 2, 1990 at Boeing. This lecture was repeated on October 7, 1990.

F. Professor Alistair D.C. Holden

Professor Holden advises one Ph.D. student supported by Boeing. He is also a member of the Ph.D. Committee for Don Wunsch. Dr. Wunsch has just completed his final exam. He is fully supported by Boeing.

G. Professor Peter O. Lauritzen

1. February 28, 1991 - Contacted Tony Vu and Herb Hiegel of Boeing Aerospace and Electronics. Presented seminar to EE 534 Power Electronics class and Energy group entitled *Computer Model for Three-Phase Motor and Motor Fin Control System for Aerospace Applications.*

2. March, 1991 - Two consultations with Tony Vu of Boeing Aerospace and Electronics on modeling electric motors used in EE 534 term projects. Also consultated on the power MOSFET research project.

3. April - June, 1991 - Consulted with David McLean, Boeing Aerospace and Electronics, instructor for EE 452, Power Electronics Design.

H. Center for the Design of Analog and Digital Circuits (CDADIC)

Boeing has three divisions as industry members in the Center. CDADIC has arranged for research seminars at Boeing, where Center faculty present their results and work directly with Boeing technical staff.

II. 1991-92 BOEING ENDOWMENT FOR EXCELLENCE GRADUATE FELLOWSHIP AWARDS:

None

III. UPDATED INFORMATION OF PREVIOUS FELLOWS:

None

IV. FACULTY OR PROJECTS SUPPORTED DURING 1990-91 FROM THE BOEING ENDOWMENT FOR EXCELLENCE:

Reported Separately

Dr. Robert Haralick, Boeing Clairmont Egtvedt Professor of Electrical Engineering.
Dr. Cornelius Leondes, Boeing Professor in Aerospace Controls.
Dr. Thomas Pearsall, Boeing Professor of Semiconductor Electronics.

V. FACULTY OR PROJECTS TO BE SUPPORTED FROM THE BOEING ENDOWMENT DURING 1991-92:

Reported Separately

Dr. Robert Haralick, Boeing Clairmont Egtvedt Professor of Electrical Engineering.
Dr. Cornelius Leondes, Boeing Professor in Aerospace Controls.\
Dr. Thomas Pearsall, Boeing Professor of Semiconductor Electronics.

PROPOSALS SUBMITTED AND AWARDED:

See Attached.

University of Washington Correspondence

INTERDEPARTMENTAL

March 24, 1992

TO: Prof. Leung Tsang

FROM: Robert J. Marks II

SUBJECT: Summer Salary

Would you please notify Bob Boggs to encumber 2 weeks summer salary for me from the NSF Grant on Remote Sensing. Thank you.

University of Washington Correspondence

INTERDEPARTMENTAL

March 23, 1992

TO: Lynn M. Fleming

FROM: Robert J. Marks II

SUBJECT: Patent Disclosure

I submitted a patent disclosure for your signature on February 3, 1992. I have not yet received a response. Please be advised that we are proceeding with publication. A decision of whether or not to pursue a patent should be made soon.

cc: Thomas A. Seliga
Robert E. Center
Peter Odabashian
Thomas Caudell
Jai Choi
Seho Oh
Payman Arabshahi
File

From wagner Thu Mar 19 10:14:24 1992
From: wagner (Ruth Wagner)
To: riskin
Cc: wagner
Subject: arabshahi to FUZZ-IEEE
Date: Thu, 19 Mar 92 10:14:23 PST

Payman originally told me that you were covering his plane ticket ($258). He has given me a full expense acct for an additional $468.38 - a total of $726.38. Okay?

Ruth

From myting Thu Mar 19 11:08:06 1992
To: wagner
Status: RO

Hi Ruth,

We, ming and alex, are prof. Riskin's students, and we would be glad to talk to the visitor Jeff O'nail today. Both of us are free from 3:30 to 4:30. If the time is also good for him, could you arrange a 30-minute meeting for 3 of us.

Sorry about this last minute notice.

ming

University of Washington Correspondence

INTERDEPARTMENTAL

Date: 12 March 1992

To:

M. Kurosaka	FS-10
T. Horbett	BF-10
L. Ricker	BF-10
D. Stensel	FX-10
R. Marks	FT-10
T. Furness	FJ-15
I. Aksay	FB-10
D. Pratt	FU-10
N. McCormick	FU-10
P. Bereano	FH-40

From: L. Snyder, Chair
P&T Committee

Subj: Leveson Vote

Thank you for your rapid responses on the previous memo. The committee approved both items -- processing this case by mail and my chairing the case. I am interpreting eveyone's willingness to process this case in this manner as suggesting a favorable outcome. Accordingly, I propose to proceed as outlined below. If there are any objections to this process, please raise them with me -- we can still have a meeting.

(1) Please vote on the following motion: "The Committee recommends the CSE Department's request, to make an offer of a Full Professor position to Nancy Leveson, be approved."

(2) PROCEDURAL INSTRUCTIONS: Place your vote in an envelope and seal it. Return that envelop in a second envelop which you sign so Merike Nichols can keep track of who has voted (and dun those who haven't.). RETURN YOUR VOTE IMMEDIATELY TO MERIKE. I will see and open only the inner envelops, thereby assuring anonymous voting.

FH-10

(3) Additionally, you may wish to comment on the draft of a brief note that I will send to the Dean assuming the committee votes strongly in favor.

Ret'd 3/16/92

University of Washington Correspondence

INTERDEPARTMENTAL

Date: 12 March 1992

To: J. Ray Bowen, Dean
College of Engineering

From: Lawrence Snyder, Chair
Advisory Committee on Promotion and Tenure

Subj: Request to make offer to N. Leveson

The Advisory Committee on Promotion and Tenure of the College of Engineering received notice from Prof. Jean-Loup Baer, Chair of the Department of Computer Science and Engineering, that he will be seeking your approval to make an offer to Prof. Nancy Leveson of UC Irvine at the rank of Full Professor.

The committee received (a) the letter from Prof. Baer, outlining the case and reporting the CSE vote, (b) Leveson's CV and (c) a sampling of her more important technical papers. The committee members reviewed the materials privately and determined that they could decide the case by mail ballot. The motion, "The committee recommends the CSE Department's request, to make an offer of a Full Professor position to Nancy Leveson, be approved," received XXXX "Yes" votes, YYYY "No" votes and ZZZZ abstentions. Based on this information, the committee recommends you approve the request.

cc: M. Kurosaka (A&A), T. Horbett (BioE), L. Ricker (ChE), D. Stensel (CE), L. Snyder (CS&E), R. Marks (EE), T. Furness (IE), D. Pratt (ME), N. McCormick (NucE), P. Bereano (TC)

file

University of Washington Correspondence

INTERDEPARTMENTAL

March 16, 1992

MEMO TO: EE Faculty and Staff

FROM: Sharon Schlittenhard Sharon

RE: U-WATS Long Distances Charges

Attached for your review are your U-WATS long distance charges for the period October-December, 1991, on Budget No. 06-1030. Please check to be sure that you recognize all the calls, and indicate any calls that should be charged to a sponsored programs budget by writing the budget number next to the charge. Any personal calls should be paid by a check made payable to the University of Washington Please return all items as appropriate to me.

Thank you.

file

University of Washington Correspondence

INTERDEPARTMENTAL

January 13, 1992

TO: Thomas A. Seliga, Chair

FROM: R. J. Marks

SUBJECT: Support for Ms. Wagner

Secretarial support is needed immediately to process the qualifying exam. Ruth has agreed to do the bulk of the work. Dr. Atlas has given permission for her to do so.

I hereby request from you authorization to pay Ruth for up to two weeks salary from departmental funds for service up to the faculty meeting where test results are decided. An hourly sheet will be submitted with the final request.

This is great. I will help alleviate problems in the Advising Office, given the absence of Jean Shore. Thanks.

1/13/92

University of Washington Correspondence

INTERDEPARTMENTAL

TO: Thomas Seliga, Chair

FROM: Bob Marks

DATE: January 9, 1992

SUBJECT: Article in "IEEE Spectrum"

The attached is FYI.

Attachment

The specialties

- **Neural-network–fuzzy-logic nexus shows promise**
- **Quality-color costs decline for word processing and publishing**
- **Electromagnetic compatibility acquires a higher profile**
- **Engineering education up for major changes**

Neural networks are being coupled to fuzzy systems...new publishing and word-processing software can work in full color...methods of measuring electromagnetic compatibility (EMC) have improved...important changes in undergraduate engineering education are imminent. These comments on some of the more specialized branches of electrical engineering come from the IEEE Neural Networks Council, the IEEE Professional Communication Society, the IEEE Electromagnetic Compatibility Society, and the IEEE Education Society.

Robert J. Marks II, president of the IEEE Council on Neural Networks, calls the networks an extraordinary engineering tool, which is here to stay. They are already currently viable in a number of applications and useful, dedicated hardware is available. A promising area, he said, is the coupling of neural networks to fuzzy systems. "Layered perceptrons [feedforward artificial neural networks] can be taught fuzzy membership functions from raw data. Rules are thereby empirically learned."

A related discipline, Marks pointed out, is the genetic algorithm and associated evolutionary programming. The terminology, he said, "relates only loosely to the biological counterpart, not unlike reference to 'rabbit ears' or an 'electronic eye.' Genetic algorithms perform a highly parallel search of use in, say, the design and optimization of neural network architectures." But, Marks emphasized, as a technology, genetic algorithms and fuzzy nets are where neural networks were about a decade ago.

COLOR TAKEOVER. Prices have dropped and quality has surged in color scanners, color printers, and film recorders, according to David L. McKown, a member of the administrative committee of the IEEE Professional Communication Society. "Publishing (and even word-processing) software capable of working either full or 'spot' color is becoming readily available," he said. Today self-publishers can "afford to collect peripherals for scanning images in 256 colors, displaying them on monitors capable of 2000-by-2000 resolution or more, editing them using the unbelievably rich palette of colors of 24-bit systems, and printing them, unfortunately, on relatively low-resolution (100-dot-per-inch) printers."

But these tools encounter patches of ignorance, McKown emphasized. Few self-publishers (as compared with publishing houses) are trained in the intricacies, principles, and effects of color on an audience, so the color piece produced is too often "the design equivalent of ransom note typography." For another, what will the self-publisher do with the printed output? The original will have to be sent to a professional printer for color separation and printing, in which case "300-dpi resolution is usually unacceptably low."

The professional publisher faces many of the same problems. "The professional designer who used to specify colors on a tissue overlay and had a trusted printer implement them," McKown said, "now may use the software to change the colors in as many ways as are imaginable." But, he asked, "how accurately does the system monitor portray printed colors? How true to ink is the proof printer? How dependent will the designer become on the world of color created by electrons impinging on phosphorus and how estranged from the real world of pigments on paper?"

TAMING EMC. Electromagnetic compatibility has matured as a technology over the past several years, reported H. R. Hofmann, newly elected president of the IEEE Electromagnetic Compatibility Society. "Methods of performing EMC measurements have been enhanced with the aid of more sophisticated receivers including improved spectrum analyzers and antennas. The importance of accurate antenna factors has hit home, and techniques for measuring antenna factors have been widely disseminated."

Hofmann also said that the ability to make more repeatable measurements has spread with the publication of IEEE and ANSI standards on EMC measurement techniques and procedures. And, he maintained, new Federal Communications Commission rules on emissions have forced designers to deal with EMC early in the design process or else provide expensive, last-minute Band-Aid types of fixes.

William E. Cory of the administrative committee of the Society, said that, as an aid to the deliberations of the International Special Committee on Radio Interference, several countries reported on the incidence and causes of their electromagnetic interference (EMI). A first look, he said, showed that the number of occurrences reported is approximately proportional to the country's population.

In Japan and Norway, broadband noise from electric power distribution and motor-based appliances were said to be the major sources of EMI. In the United States, radio transmissions formed over two-thirds of the EMI sources.

ENGINEERING EDUCATION TRENDS. We are on the threshold of innovative changes in undergraduate engineering education, maintained Chalmers F. Sechrist Jr., president of the IEEE Education Society. One reason, he said, is the recommendations prepared during the 1980s by six entities: the IEEE Centennial Forum, the National Science Board, the American Society for Engineering Education (ASEE) Quality of Engineering Education Project, plus the Accreditation Board for Engineering and Technology National Congress on Engineering Education, the ASEE Task Force on a National Action Agenda for Engineering Education, and the National Science Foundation (NSF) Disciplinary Workshops on Undergraduate Education. Another reason is the increased NSF funding for innovative courses and curricula in undergraduate education in science, engineering, and mathematics.

Specific trends pointed out by Sechrist include:

- Engineering courses for nonengineers and, for engineering students, more interdisciplinary courses.
- More emphasis on engineering design, manufacturing, and concurrent engineering.
- Computer and design experiences in the freshman year.
- More emphasis on computer-aided instruction, education at a distance over communications links, and laboratory simulations.
- More use of engineering workstations.
- Improved student retention and advising.

Innovative programs incorporating those trends are taking shape at several universities, Sechrist reported, including Drexel, Cornell, Texas A&M, Maryland, Pennsylvania State, Texas Tech, and Vanderbilt, as well as at Rose-Hulman Institute of Technology and New Jersey Institute of Technology. ◆

Ronald K. Jurgen Senior Editor

0018-9235/92/$3.00©1992 IEEE

file

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10

February 25, 1992

To: J. Ray Bowen, Dean
College of Engineering

From: Thomas A. Seliga, Chairman

Subject: Visiting Scholar - Mr. David A. Kearney

This is to recommend Mr. David A. Kearney as a Visiting Scholar in the Department of Electrical Engineering for a two-month period from June 22, 1992 to August 15, 1992. Mr. Kearney is expecting his M.E. from the University of South Australia in March 1992. Professors Robert J. Marks II and Mohamed A. El-Sharkawi will act as host professors during Mr. Kearney's stay and his appointment has been approved by the Department of Electrical Engineering Visiting Scholar Committee. Space is being provided by Dr. Marks. The appointment would be at no cost to the University.

Mr. Kearney wishes to come to the University of Washington to study the real time simulation of transients in power systems. Attached is a copy of Mr. Kearney's summary for his research in the U.S. The study is intended to provide a foundation for advanced work in the simulation of transient stability in real time using modern computational hardware and software.

It is expected that Mr. Kearney's stay here will be highly beneficial to him, and will help establish a dialog with the University of South Australia.

cc: Sharon Schlittenhard
Professor Robert J. Marks II
Professor Mohamed A. El-Sharkawi

Mr. D Kearney

Focus of Study Program 1992

Objective

To study the real time simulation of transients in power systems.

Summary

The operation modern power systems is increasingly being constrained by transient stability. This has arisen by the increasing attractive alternative of interconnecting large power grids to achieve economies of scale and to allow a better load profile. This trend has become apparent in Australia in recent years by the interconnection of the South Australian grid with the Eastern States System and the recent moves to create an Eastern States Power Grid Operating Entity. In the United States this interconnection has been occurring for a number of years and the problems of the operation of such interconnected have been more widely examined. For many years the simulation of such systems in real time has been realized as a worthy objective to allow engineers operating such systems to better examine the development of stability problems. However it is only in the last few years that computational resources able to deliver real time performance in transient simulations have been seen to be feasible. Now that this objective is in sight there is a need to develop a comprehensive approach to the algorithms and computer architectures for transient stability simulations. The study leave is intended to provide a foundation for advanced work in the simulation of transient stability in real time using modern computational hardware and software.

University of Washington Correspondence

INTERDEPARTMENTAL

February 25, 1992

TO: Ms. Bhatti

FROM: Prof. Marks

RE: Test samples

Please keep xerox copies of poor, average, good and excellent tests.

(See attached memo from Jean-Loup Baer re preparation of ABET review for Computer Engineering.)

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Computer Science and Engineering, FR-35 September 27, 1991

To: T. Seliga, Chairman
Electrical Engineering

F. Alexandro, Undergraduate Advisor
Electrical Engineering

From: Jean-Loup Baer, Chairman
Computer Science and Engineering

Re: Preparation of ABET review for Computer Engineering

As you may remember in 1989 the ABET accreditation for the Computer Engineering Program was renewed for 3 years. Therefore, the program will be reviewed again in Autumn 1992. I would like to enlist your collaboration for this review and, in particular, ask for the preparation of the documentation that will be necessary to review the EE courses that are required from Computer Engineering students.

The following EE courses are currently required from Computer Engineering students:

EE 231, EE 310, EE 333, EE 355, EE 356, EE 383, and EE 471.

Also EE 372 and EE 479 are still accepted as "required" courses.

Could you impose on the faculty teaching these courses to collect the following information:

- The titles of the textbooks used (I gather that these textbooks will be available for inspection next Autumn)
- Samples of examination statements and student examination papers and homework in each course to include work graded from "poor" to "good"
- Samples of laboratory instructions and students' laboratory reports in each course to include work graded from "poor" to "good"

A typical sample should be one of the "best", one of the "middle", and one of the "worst". These samples should be copied and the names of the students will be erased so that their privacy rights won't be violated.

Alistair Holden will be in charge of collecting these documents at the end of each quarter (and I'll send you a reminder memo at the beginning of each quarter).

Thank you very much in advance for helping us.

cc: Gaetano Borriello
Alistair Holden
Marilyn Kramp

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

January 15, 1992

TO: Professors Darling, Helms, Johnson, Marks, Moritz, Somani and Tsang,

FROM: T. A. Seliga by

RE: ABET Review for Computer Engineering

Computer Engineering is scheduled for ABET review Autumn 1992. You are teaching one of the courses on their list of required courses. Please collect the information requested on the enclosed memo from Jean-Loup Baer. Alistair Holden will collect the information from you.

Please give this matter your full cooperation.

FA:mb

cc: Jean-Loup Baer
Alistair Holden
Frank Alexandro

file

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

College of Ocean and Fishery Sciences
Office of the Dean, HN–15

January 24, 1992

Dr. Robert J. Marks II
Department of Electrical & Computer Engineering
FT-10

Dear Dr. Marks:

The Chair of the Washington Technology Center's Board of Directors and the Provost of the University of Washington are pleased to announce that Dr. Robert E. Center has been appointed Executive Director of the WTC.

Please accept my thanks for your application for this position and my apologies for the inordinately protracted character of this search. The combination of a large number of constituencies with divergent expectations of the Executive Director and an evolving view of the nature of the position have postponed a final selection. I recognize and regret that the long duration of the search has engendered a significant level of frustration in both applicants and the Search Committee.

I appreciate your interest in the position. Your application was reviewed carefully and on more than one occasion. I also appreciate your willingness to tolerate a series of delays that none of us expected and that all of us regret.

Best wishes for your future endeavors.

Sincerely,

G. Ross Heath

G. Ross Heath
Chairman, WTC Search Committee

GRH/mjh
cc: Search Committee
Laurel L. Wilkening
Chair, WTC Board

Electrical Engineering Department Correspondence
University of Washington

INTRADEPARTMENTAL

Date: January 6, 1994

To: EE Faculty

From: Mark J. Damborg Mark Damborg, cy

Re: TEACHING PREFERENCE

Please indicate your first two choices of courses to instruct for each quarter of the 1994-95 academic year. This information will supplement the coordination of teaching provided by the professional groups. Where discrepancies exist, final assignments will be made in consultation with the group chairs and faculty.

Name Bob MARKS

AUTUMN '93	WINTER '94	SPRING '94	SUMMER '94
			EE 505

We need to maintain a list of instructors available to teach the core courses. Please identify at least one core course that you would like to teach.

CORE COURSE: 235

Thank you.

Department of Electrical Engineering
Graduate Student Continuation Policy

Bob Marks
June 11, 1993
(revised 11/93)

This policy provides guidelines and requirements to assure each graduate student in the Department of Electrical Engineering is making progress towards his/her degree and is in compliance with the continuation policy of the Graduate School. It applies to all graduate students with the exception of those who (1) are enrolled in special graduate programs, such as TIE, (2) are departmentally approved part-time students or (3) are nonmatriculating students.

1 Annual Review

Each graduate student's progress towards his/her degree will be reviewed annually in the Winter quarter. The review will be coordinated by the student's advisory committee who will submit a written report for insertion in the student's record. The review will be coordinated by the Graduate Program Coordinator if the student has no advisor.

If a student's progress is other than satisfactory, a copy of the report will be given to the Graduate Program Coordinator with a recommendation to take one of the following actions.

1. No Action
2. Warn
3. Probation
4. Final Probation
5. Drop

2 Grade Point Average

A graduate student whose cumulative or quarterly GPA falls below 3.0 will, for the first incident, be placed on probation. A second occurrence will result in being placed on final probation. The student will be dropped from the program upon a third occurrence. The quarters need not be successive.

3 Degree Progress

3.1 Master's Degree

MS students will coordinate the formation of an advisory committee and be responsible for obtaining committee approval of their degree plan before completion of nine credits towards their degree.

Unless he/she does not hold an undergraduate degree in electrical engineering, an MS student will complete their degree in no more than six quarters of matriculation. An extension of up to one additional quarter can be approved by the MS student's advisor. MS students who do not have EE undergraduate degrees can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the MS student's degree plan. Such extensions are for the purpose of allowing the MS student to establish subject familiarization commensurate with that of an undergraduate degree in electrical engineering. All other extensions can be obtained only by petition to the Graduate Studies Committee by the student's advisor.

3.2 Ph.D. Degrees

Students admitted to the Ph.D. program will form an advisory committee within one calendar year of their admission to the program

Students in the Ph.D. program may take the qualifying examination twice. A third attempt will be allowed in unusual circumstances by approval of the Qualifying Evaluation Subcommittee of the Graduate Studies Committee upon petition by the student's advisor. All students are required to complete the qualifying examination within five registered quarters excluding Summers. Ph.D. students holding a degree in Electrical Engineering are expected to pass the qualifying examination within one year from admission to the program. Ph.D. students who do not have an Electrical Engineering degree can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the Ph.D. student's degree plan. Such extensions are for the purpose of allowing the student to establish subject familiarization commensurate with that required for an Electrical Engineering degree.

Ph.D. students are required to take the general examination within two years of passing the qualifying examination. Extensions to either examination will be allowed in unusual circumstances by approval of the Graduate Studies Committee upon petition by the student's advisor.

From marks@u.washington.edu Fri Nov 26 09:48:02 1993
From: Robert Marks <marks@u.washington.edu>
To: wagner@essex.ee.washington.edu
Cc: marks@u.washington.edu
Date: Fri, 26 Nov 93 09:52:39 -0800

The text has been typed. Could you format and print?

THanks!

Bob

```
        From bdarling@maxwell.ee.washington.edu Wed Nov 24 11:08:14 1993
        Return-Path: <bdarling@maxwell.ee.washington.edu>
        Received: from walker.u.washington.edu by carson.u.washington.edu
                (5.65/UW-NDC Revision: 2.29 ) id AA23809; Wed, 24 Nov 93 11:08:1
2 -0800
        Received: from edison.ee.washington.edu by walker.u.washington.edu
                (5.65/UW-NDC Revision: 2.29 ) id AA27766; Wed, 24 Nov 93 11:08:1
0 -0800
        Received: from maxwell.ee.washington.edu by edison.ee.washington.edu
                (5.65/UW-NDC Revision: 2.6 ) id AA00376; Wed, 24 Nov 93 11:01:12
 -0800
        Received: by maxwell.ee.washington.edu
                (1.37.109.4/UW-NDC Revision: 2.26 ) id AA27246; Wed, 24 Nov 93 1
1:08:04 -0800
        From: R. Bruce Darling <bdarling@maxwell.ee.washington.edu>
        Message-Id: <9311241908.AA27246@maxwell.ee.washington.edu>
        Subject: revised continuation policy
        To: elsharkawi@ee.washington.edu, eddie@ee.washington.edu,
                martha@ee.washington.edu, marks@ee.washington.edu,
                jdsahr@ee.washington.edu
        Date: Wed, 24 Nov 93 11:08:04 PST
        Mailer: Elm [revision: 70.85]
        Status: O

        Mohamed, Eddie, Martha, Bob, & John:

        Here is the complete text of section 3.2 of the
        continuation policy for Ph.D. students that was
        approved (with edits) in the faculty meeting of
        1993/11/23:

        [begin policy]

        Students admitted to the Ph.D. program will form
        an advisory committee within one calendar year of
        their admission to the program.

        Students in the Ph.D. program may take the qualifying
        examination twice.  A third attempt will be allowed in
        unusual circumstances by approval of the Qualifying
        Evaluation Subcommittee of the Graduate Studies
        Committee upon petition by the student's advisor.
        All students are required to complete the qualifying
        examination within five registered quarters excluding
        Summers.  Ph.D. students holding a degree in
        Electrical Engineering are expected to pass the
        qualifying examination within one year from admission
```

to the program. Ph.D. students who do not have an Electrical Engineering degree can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the Ph.D. student's degree plan. Such extensions are for the purpose of allowing the student to establish subject familiarization commensurate with that required for an Electrical Engineering degree.

Ph.D. students are required to take the general examination within two years of passing the qualifying examination. Extensions to either examination will be allowed in unusual circumstances by approval of the Graduate Studies Committee upon petition by the student's advisor.

[end policy]

---Bruce Darling

University of Washington Correspondence

INTERDEPARTMENTAL

Ruth,
Please make these changes and gimme a copy - Bob

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

November 16, 1993

TO: Members of the Graduate Studies & Research Committee: Professors Afromowitz, Andersen, Darling, Hwang, Kuga, Marks, Meldrum, Pinter, Porter and Sahr

FROM: M. A. El-Sharkawi/Sahr JDS.

RE: Minutes for November 16, 1993 Meeting

Present: Professors Andersen, Darling, Hwang, Kuga, Marks, Porter and Sahr
Absent: Professors Afromowitz, El-Sharkawi, Meldrum, Pinter

Graduate Studies & Research Committee met on Tuesday, November 16, 1993. Approved record of November 9, 1993 meeting.

Discussed the one year issue in the Continuation Policy.

Continuation Policy reads as follows:
3.2 Ph.D. Degrees:
Second paragraph, Third Sentence:
"Unless he/she does not hold a degree in electrical engineering, Ph.D. students are expected to pass the qualifying examination within one year from admission to the program." Following discussion, motion was presented by Professor Marks to add the following: ; "however, all students should not exceed five quarters excluding summers." Professor Porter seconded the motion. Motion passed unanimously. Friendly amendment to the motion was presented by Professor Marks to change the word "should" to "must", Professor Andersen seconded the amendment. Following discussion, formal motion presented by Professor Marks to change the word "must" to "are required", seconded by Professor Kuga. Motion now reads, "however, all students are required to complete the Qualifying Examination within five registered quarters excluding summers." Motion passed unanimously and will be taken to the faculty for their consideration.

Last paragraph of the Continuation Policy was also discussed. Professor Marks motioned that the paragraph be changed to read as follows:

"Ph.D. students are required to take the general examination within two years of passing the qualifying examination.

Extensions to either examinations will be allowed in unusual circumstances by approval of the Graduate Studies Committee upon petition by the student's advisor."

Motion seconded by Professor Porter. Motion passed unanimously.

Meeting adjourned.

JDSahr:ew
cc: G. Zick
M. Damborg

file

University of Washington Correspondence

INTERDEPARTMENTAL

December 17, 1993

MEMO TO: EE Faculty and Staff

FROM: Sharon Schlittenhard Sharon!

RE: U-WATS Long Distances Charges

Attached for your review are your U-WATS long distance charges for the period July, 1993 - October, 1993 on Budget No. 06-1030. Please check to be sure that you recognize all the calls, identify any unrecognized charges, and indicate any calls that should be charged to a sponsored programs budget by writing the budget number next to the charge. Please return all items as appropriate to me.

Thank you.

file

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@u.washington.edu

December 13, 1993

DRAFT

Greg,

Here is a draft that addresses the issue raised. Any comments would be appreciated.

Bob

TO

TO: Greg Zick, Chair
FROM: Robert J. Marks II
SUBJECT: M-D Systems and FNN

Following, as requested, is an update on my outside professional work for compensation activities.

The documentation in my November 12, 1992 memo to Dr. Seliga is still valid. Some additional developments are

a. A portion of the work of FNN has been supported by the WTC. Graduate students have been supported by this grant. Technology transfer activities with WTC and OTT are currently underway. The involvement of FNN is contractually fixed in an agreement with WTC. A disclosure of technology developed has been filed with OTT.

b. I have been spending approximately six hours per week (of a typical sixty hour work week) on FNN. I have spent no time on marketing, capitalization, or administration of FNN. On occasion, I have offered my thoughts on how the business should be run. The vast majority of my time (>90%) is spent on technology research and development.

c. I am working with IEEE to hold the first 'International Symposium on Computational Intelligence in Financial Engineering' to be held in New York in May 1995. I consider this a service activity and do not include it in my weekly hours.

(4 PAGES TOTAL)

UNIVERSITY OF WASHINGTON

MEMORANDUM

WRITE IT ▪ DATE IT ▪ SIGN IT

Transmitted for your ☐ APPROVAL ☐ DISPOSITION ☐ INFORMATION ☐ COMMENT ☐ REPLY (Return Information Copy) ☐ FILES

TO: Greg Zick

FROM: Paul Young

TELEPHONE:

DATE: 12/2/93

Message, Comment, or Reply

1. This requires an updated justification. (If only to say that nothing has changed.)

2. It also does not say how much time will be spent.

3. According to S. Olswang, one can not take off one day a week to work for their own company. (Is that what's happening here?)

PY

☐ PLEASE RETURN

UoW 1130 (10/90) UNIVERSITY STORES # 1033-090

file

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@u.washington.edu

December 20, 1993

TO: Greg Zick, Chair
FROM: Robert J. Marks II
SUBJECT: Conference Phone & Schlittenhard memo (attached)

Concerning the attached memo, I would prefer to receive a reversal of your decision from you rather than Ms. Schlittenhard. You had indicated purchase of the speaker phone was approved. If circumstances have changed, so be it.

In regard to Sharon's memo, telecommunications speaker phone rental is unreliable and bureaucratic. I have never had success with them. I have tried to use UWATTS once for a conference call with disasterous results. The operator simply was not a professional and did not know what to do. The conference call was posponed for a week. AT&T was then used. Because of the limitation to the use of UWATTS, I consider the Feature phone therefore to be an unacceptable alternative to a speaker phone.

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering

Decembet 15, 1993

MEMO TO: Bob Marks
Ruth Bennett

FROM: Sharon Schlittenhard Sharon

RE: Conference Call Phone

In response to your memo of December 15, 1993 regarding a speaker phone for Room 420, I spoke with Telecommunications about the Shure ST-2500. Telecommunications has a Shure ST-2500 available on a rental basis @ $30.00 per occasion. They deliver and provide installation. They would need a maximum of 5 days lead time to provide the phone, but on an emergency basis, could provide one on same-day notice. The other option would be an S730 Feature Phone which would cost $15.00 to install with a monthly charge of $3.50. The phone would be restricted to U-WATS only. In view of the current financial climate, the Department cannot spend the estimated $1,400 to purchase the Shure ST-2500, but would be able to install the S730 Feature phone if there were sufficient faculty interest.

cc: Greg Zick

University of Washington Correspondence

INTERDEPARTMENTAL

Date: December 15, 1993

To: Sharon Schlittenhard

From: Bob Marks, Electrical Engineering FT-10

Subject: Special phone for conference call

Greg Zick told me to proceed in obtaining a speaker phone with good acoustical quality for conference calls in Room 420. Working with Telecommunications I have found the procedure would be to

1 - Order a Shure ST-2500 from GBH Distributing, Inc. for $1349 (Telecommunications recommendation)

2 - Request telecommunications to have another jack put in below the current phone. It would be for the same line as is currently in 420 so there would be no additional monthly charge.The jack installation would cost $50.

Because of the price of the phone, I would suggest that it be kept in a locked place. To use it one would simply plug into the jack and electrical outlet (which is already available).

Would you please let Ruth know what budget this would be charged to so she can place the order.

University of Washington Correspondence

INTERDEPARTMENTAL

College of Engineering, Office of the Dean, FH-10 October 13, 1993

To: G. Zick, Chair
Electrical Engineering

From: Paul Young
Associate Dean Research and Facilities

Re: Conflict of Interest Oversights

In reviewing our files, I can find no request for approval of outside professional work or summary of professional and outside activities for Bob Marks. In view of his various activities, you should probably check with him to see whether this is an oversight and whether any new forms need to be filed.

cc: Robert Marks

PY/dk

file: College/conflict2.tex

University of Washington Correspondence

INTERDEPARTMENTAL

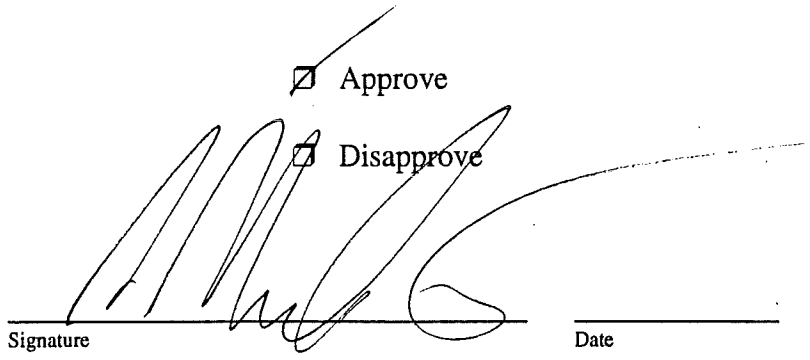
ELECTRICAL ENGINEERING DEPARTMENT, FT-10

July 27, 1993

EE 595 "Wavelets: Theory, Computation and Applications"

☑ Approve

☐ Disapprove



Signature Date

Please return to Eddie by July 30, 1993.

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGNEERING, FT-10

July 27, 1993

TO: Members of the Graduate Studies & Research Committee: Professors Afromowitz, Darling, Hwang, Marks, Pinter, Sechen, Tsang, Porter and Yang

FROM: S.S. Venkata, Chair & Graduate Program Coordinator

RE: EE 595

The Signal Processing group would like to see the attached course, EE 595 "Wavelets: Theory, Computation and Applications" offered this fall quarter.

As the Graduate Studies Committee will not be meeting until Fall, could you please either approve or disapprove by signing attached ballot and returning ballot to Eddie by July 30.

SSV:EW:dad
Att.

University of Washington

STATISTICS

Statistics 578B*

Fall Quarter, 1993

Time and Place: Tuesdays and Thursdays 3:30-5:00 in Sieg 227

WAVELETS: THEORY, COMPUTATION AND APPLICATIONS

During recent years there has been a rapidly developing research activity on "Wavelets" and their application to signal and image processing, and statistical signal estimation. On the one hand the evolving theory of wavelets involves exciting developments in applied mathematics. On the other hand, wavelets lend themselves quite naturally to important applications such as detection of signal discontinuities, edge detection in images, mulitiresolution analysis of images, and optimal statistical estimation of non-smooth signals in additive noise. This course will provide a basic introduction to wavelets which is intended to be accessible to graduate students in Electrical Engineering, Computer Science, Statistics and other fields of engineering and science. The course will include the following coverage: the basic theory of wavelets, computational algorithms for wavelet transforms, applications to image and signal processing, recent results on robust estimation of non-smooth signals in noise, time-frequency methods, data compression, statistical aspects of wavelets, relationship to sub-band coding techniques, further applications in engineering and science. An important part of the course will consist of application of wavelet transforms and analysis to real and simulated signal and image data sets, using the S+Wavelets toolkit, a toolkit based on the S-PLUS language and system for data analysis, mathematical computing and graphics.

Instructor: R. Douglas Martin
Department of Statistics, B-317 Padelford Hall
Summer phone: 283-8802 x229
Summer e-mail: doug@statsci.com

*It is possible that this class may be offered jointly as an EE special topics class.

file

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

July 22, 1993

To: EE Faculty

From: Gregory L. Zick, Chairman

As the new Chair of our department, I look forward to working with you towards our common goals of excellence in research, teaching and community service. I see my first tasks as chair to be 1) to understand your activities in more detail, 2) set up the department infrastructure to be ready for the coming academic year and 3) prepare material for presentation to the outside world on the quality and opportunities in our department .

In order to better understand your activities and to get your input, I am asking Val to set up appointments with each of you over the next two months. I look forward to talking with you.

file

UNIVERSITY OF WASHINGTON
SEATTLE, WASHINGTON 98195

College of Engineering
Interdisciplinary Engineering Studies

July 22, 1993

Faculty of the College of Engineering

Dear Colleagues:

I am pleased to announce that Greg L. Zick, Professor of Electrical Engineering and Associate Dean for Computing, has accepted the position of Chair of the Department of Electrical Engineering, effective July 16, 1993.

Associate Dean Keith A. Holsapple assignments have been expanded to include the duties of the Associate Dean for Computing position vacated by Greg Zick. Professor Holsapple's new title will be Associate Dean for Computing Support, Televised Instruction, and Engineering Professional Programs, effective July 16, 1993.

Join me in welcoming each to his new role in the College.

Sincerely yours,

J. Ray Bowen
Dean

JRB:mln

cc: Greg L. Zick
Keith A. Holsapple
Paul Young
Ashley F. Emery
Mary Melanson
Marlene Davidson
Joan O'Brien
Bill Rogers
Neil Uhlman
Helge Nason

file

The Washington Technology Center

300 Fluke Hall, FJ-15, University of Washington, Seattle, WA 98195

Headquarters Office
(206) 685-1920
FAX: (206) 543-3059

June 21, 1993

Robert Marks
University Of Washington
Electrical Engineering, FT-10
Seattle, WA 98195

Reference Proposal No. C29

Dear Robert: Bob

I am sorry to inform you that WTC has insufficient funds in the coming biennium to support your WTC proposal. Although we were able to fund only 50% of the submitted proposals it is difficult to have to say "no" to long-term WTC supporters and participants.

The Research Advisory Committee had a difficult task in reviewing the proposals because of the high overall quality, which was due in part to the pre-screening of the pre-proposals. Unfortunately, their task was made even more difficult by the 20% reduction in state funding which was finalized in May, and resulted from the state revenue shortfall which put enormous pressure on all state budgets. It is doubly unfortunate that WTC was unable to take advantage of all the industrial commitments for matching funding for the submitted proposals. Depending on available funding, I anticipate some dollars available for new starts in the second year of the biennium and you may wish to be alert for any future RFP announcements.

We are very appreciative of your past commitment and interest in the application of technology to benefit industry in this state, and of your efforts in support of WTC. We look forward to future opportunities for interaction and extend to you our best wishes in your future research activity.

Sincerely,

Bob

Robert E. Center
Executive Director

cc: *Group director*

Logo: "The Raven" . . . a Northwest Coast Indian design symbolizing the raven as a bringer of knowledge. A computer chip and DNA chain are held in the raven's beak. Artist: Bill Holm.

File

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

June 4, 1993

To: J. Ray Bowen, Dean
College of Engineering

From: Mark J. Damborg, Acting Chairman

Subject: Appointment of Dr.Seho Oh to the Position of Affiliate Assistant Professor in Electrical Engineering

The faculty of the Department of Electrical Engineering by secret mail ballot voted to recommend the appointment of Dr. Seho Oh to the position of Affiliate Assistant Professor in Electrical Engineering on a twelve-month basis, effective June 1, 1993 to May 31, 1994. The results of the ballot are as follows:

Eligible to Vote	43
Affirmative Votes	30
Negative Votes	3
Abstentions	4
Not Participating	6

Dr. Oh is a former Research Associate with the Department of Electrical Engineering and has resigned that position. Dr. Oh will be working with Professor Robert J. Marks II. His research area is fuzzy logic and neural networks. His appointment is at no cost to the Department and carries no space requirements. Copies of his curriculum vitae, University Biographic Forms and letters of recommendation are enclosed.

You will note that two of the letters of reference cite Dr. Oh's position as Research Assistant Professor. When the letters were requested, it was intended to appoint Dr. Oh to the research faculty. The Electrical Engineering faculty approved that appointment; however, due to a change of plans, Dr. Oh accepted a position outside the University. To maintain the opportunity to interact with Dr. Oh, the Department wishes now to appoint him as an Affiliate Assistant Professor.

cc: Professor Robert J. Marks II

University of Washington Correspondence

INTERDEPARTMENTAL

DRAFT file

DEPARTMENT OF ELECTRICAL ENGINEERING FT-10

May 27, 1993

To: Mark Damborg, Acting Chairman

From: Program Review Committee for Associate Professor James Ritcey

Robert Haralick
Robert Marks II
Dean Lytle, Chair

Jim Ritcey was promoted to Associate Professor in September 1990. The committee feels that in general Jim is making good progress in his present position and is a valuable member of our faculty. As indicated in his Faculty Biography and Summary of Activities (appended), his teaching record is good, his research is strong, well supported, and nicely documented in archival journals. Jim has supervised more than thirty graduate students and is presently supervising 6 Ph.D. and 4 MS students. Jim's record of service both within and outside the University is quite strong.

The committee has some specific advice for Jim which we feel will enhance his chances for a timely promotion to full professor. First, he should make an effort to strengthen his national and international reputation as a scholar. This advice is in recognition of the importance this university places on national and international reputation as reflected in letters of recommendation. Beside the obvious importance of archival publications, Jim could be well advised to enlarge his profile by taking part in more national and international activities of the IEEE, such as committees and conferences.

A second piece of advice concerns the Ph.D. students that Jim supervises. Of the eight he has supervised, two have received their degrees and six are in the mill. We feel that Jim should increase his effort to facilitate his students' progress towards the Ph.D. degree. We realize this is easier said than done. Furthermore, Jim's production of MS degrees is very good. But, we still feel that this is an area where more production could be very important to Jim's eventual promotion.

University of Washington Correspondence

INTERDEPARTMENTAL

June 2, 1993

TO: Mark Damborg, Acting Chair

FROM: Robert J. Marks II

RE: Summer Salary

I am planning to work three months this summer supported by research funds and request your permission to do so.

University of Washington Correspondence

INTERDEPARTMENTAL

June 2, 1993

TO:

FROM: Ceon Ramon

RE: Salary Encumbrance for Robert J. Marks II

Budget #

Please encumber two weeks summer salary for Prof. Marks for the first two weeks of September. Thank you.

Department of Electrical Engineering
Graduate Student Continuation Policy

DRAFT #2 by Mark Damborg and Bob Marks
May 18, 1993

This policy provides guidelines and requirements to assure each graduate student in the Department of Electrical Engineering is making progress towards his/her degree and is in compliance with the continuation policy of the Graduate School. It applies to all graduate students with the exception of those who (1) are enrolled in special graduate programs, such as TIE, (2) are departmentally approved part-time students or (c) are nonmatriculating students.

1 Annual Review

Each graduate student's progress towards his/her degree will be reviewed annually in the Winter quarter. The review will be coordinated by the student's advisory committee who will submit a written report for insertion in the student's record. The review will be coordinated by the Graduate Program Coordinator if the student has no advisor.

If a student's progress is other than satisfactory, a copy of the report will be given to the Graduate Program Coordinator with a recommendation to take one of the following actions.

1. No Action
2. Warn
3. Probation
4. Final Probation
5. Drop

2 Grade Point Average

A graduate student whose cumulative or quarterly GPA falls below 3.0 will, for the first incident, be placed on probation. A second occurrence will result in being placed on final probation. The student will be dropped from the program upon a third occurrence. The quarters need not be successive.

3 Degree Progress

3.1 Master's Degree

MS students will coordinate the formation of an advisory committee and be responsible for obtaining committee approval of their degree plan before completion of nine credits towards their degree.

Unless he/she does not hold an undergraduate degree in electrical engineering, an MS student will complete their degree in no more than four quarters of matriculation. An extension of one additional quarter can be approved by the MS student's advisor. MS students who do not have EE undergraduate degrees can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the MS student's degree plan. Such extensions are for the purpose of allowing the MS student to establish subject familiarization commensurate with that of an undergraduate degree in electrical engineering. All other extensions can be obtained only by petition to the Graduate Studies Committee by the student's advisor.

3.2 Ph.D. Degrees

Students admitted to the Ph.D. program will form an advisory committee within one calendar year of their admission to the program

Students in the Ph.D. program may take the qualifying examination twice. A third attempt will be allowed in unusual circumstances by approval of the Qualifying Evaluation Subcommittee of the the Graduate Studies Committee upon petition ~~(of)~~ by the student's advisor. Unless he/she does not hold a degree in electrical engineering, Ph.D. students are expected to pass the qualifying examination within one year from admission to the program. Ph.D. students who do not have a electrical engineering degree can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the Ph.D. student's degree plan. Such extensions are for the purpose of allowing the student to establish subject familiarization commensurate with that required for an electrical engineering degree.

Ph.D. students are required to take the general examination within two years of passing the qualifying examination. An extension will be allowed in unusual circumstances by approval of the Graduate Studies Committee upon petition ~~(of)~~ by the student's advisor.

Department of Electrical Engineering Graduate Student Continuation Policy

DRAFT #2 by Mark Damborg and Bob Marks

May 18

March 2, 1993

This policy provides guidelines and requirements to assure each graduate student in the Department of Electrical Engineering is making progress towards his/her degree and is in compliance with the continuation policy of the Graduate School. It applies to all graduate students with the exception of those who (1) are enrolled in special graduate programs, such as TIE, (2) are departmentally approved part time students or (c) are nonmatriculating students.

1 Annual Review

Each graduate student's progress towards his/her degree will be reviewed annually in the Winter quarter. The review will be coordinated by the student's advisory committee who will submit a written report for insertion in the student's record. The review will be coordinated by the Graduate Program Coordinator if the student has no advisor.

If a student's progress is other than satisfactory, a copy of the report will be given to the Graduate Program Program Coordinator with a recommendation to take one of the following actions.

OMIT

1. No Action
2. Warn
3. Probation
4. Final Probation
5. Drop

2 Grade Point Average

A graduate student whose cumulative or quarterly GPA falls below 3.0 will, for the first incident, be placed on probation. A second occurrence will result in

being placed on final probation. The student will be dropped from the program upon a third occurrence. The quarters need not be successive.

3 Degree Progress

3.1 Master's Degree

MS students will coordinate the formation of an advisory committee and be responsible for obtaining committee approval of their degree plan before completion of nine credits towards their degree.

Unless he/she does not hold an undergraduate degree in electrical engineering, an MS student will complete their degree in no more than four quarters of matriculation. An extension of one additional quarter can be approved by the MS student's advisor. MS students who do not have EE undergraduate degrees can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the MS student's degree plan. Such extensions are for the purpose of allowing the MS student to establish subject familiarization commensurate with that of an undergraduate degree in electrical engineering. All other extensions can be obtained only by petition to the Graduate Studies Committee by the student's advisor.

3.2 Ph.D. Degrees

Students admitted to the Ph.D. program will form an advisory committee within one calendar year of their admission to the program.

Students in the Ph.D. program may take the qualifying examination twice. A third attempt will be allowed in unusual circumstances by approval of the Graduate Studies Committee upon petition of the student's advisor. Unless he/she does not hold a degree in electrical engineering, Ph.D. students are expected to pass the qualifying examination within one year from admission to the program. Ph.D. students who do not have an electrical engineering degree can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the Ph.D. student's degree plan. Such extensions are for the purpose of allowing the student to establish subject familiarization commensurate with that required for an electrical engineering degree.

Ph.D. students are required to take the general examination within two years of passing the qualifying examination. An extension will be allowed in unusual circumstances by a approval of the Graduate Studies Committee upon petition of the student's advisor.

University of Washington Correspondence

INTERDEPARTMENTAL Graduate Student Services, AG-10

TO: Graduate Program Coordinators

FROM: Elizabeth L. Feetham
Associate Dean for Graduate Student Services, AG-10

SUBJECT: Low Scholarship Report for Autumn Quarter 1992

Enclosed are two copies of the Low Scholarship Report for Autumn Quarter 1992. The students appearing on this list have a quarterly and/or cumulative grade point average of less than 3.00 after the first run of grades. Please arrange for a complete review of the status and progress of the graduate students on this list, including any revised grade reports, and determine appropriate action to be recommended for each student. (Refer to Graduate School Memorandum #16, "Continuation or Termination of Students in the Graduate School," for guidelines to use in determining change-of-status action.) Record recommendations on both copies of the list in the last column and return the signed copy to me. If you have low scholarship recommendations for students whose names do not appear on this list, please enter the graduate student's name, student number, and your recommendation on the copy of the list which is to be returned to me, as well as on the copy you retain for your files.

In recommending scholarship action for a student for reason of UNSATISFACTORY PROGRESS, rather than low grade point average, again please enter the student's name, number, and your recommendation on both copies of this list. Also, please submit a well-documented statement of the circumstances involved, including any relevant correspondence with the student, indicating that the action requested is supported by the majority of the Graduate Faculty or Supervisory Committee involved.

DUE TO THE IMPORTANCE OF PROMPLTY NOTIFYING STUDENTS, PARTICULARLY THOSE FOR WHOM "DROP" ACTION IS RECOMMENDED, WE ASK THAT YOU OBSERVE THE FOLLOWING DEADLINES:

1. DROP (from the program) recommendations must be accompanied by a statement which describes the student's academic problems and provides an explanation for the recommended action by the Graduate Faculty or the Supervisory Committee involved. Copies of any previous correspondence with the student concerning his/her academic status should also be included to provide support for the recommendation. DROP recommendations should be received in the Graduate School no later than January 15, 1993 Any DROP recommendations received after this date will be effective Spring Quarter, 1993.

2. Recommendations of NO ACTION, WARN, PROBATION and/or FINAL PROBATION should be received in the Graduate School no later than January 22, 1993. FINAL PROBATION recommendations for reasons of scholarship must be accompanied by a statement explaining the recommended action, and a copy of the letter which is sent to the student by the graduate unit. The purpose of this letter is to inform the student of what must be accomplished to continue in the program, including what length of time the faculty will tolerate sub-standard performance. NOTE: a student is normally on FINAL PROBATION for one quarter only. After that quarter he/she should either be removed from FINAL PROBATION or dropped from the program.

ELF:mm

Enclosures

University of Washington
The Graduate School

GRADUATE SCHOOL MEMORANDUM NO. 1
(Revised December 14, 1982)

Continuation or Termination of Students in the Graduate School

Admission to the Graduate School allows students to continue graduate study and research at the University of Washington only as long as they maintain satisfactory performance and progress toward completion of their graduate degree program. The definition of satisfactory performance and progress toward completion of the degree program may differ among degree offering units; therefore, it is imperative that each graduate unit has these requirements in writing, and distributes them to each graduate student. The following information should be included:

1. General expectations for graduate student performance within the academic unit, including, but not limited to, required coursework and length of time allowed for completion of various phases of the program.

2. The identification of persons in departments, colleges, schools, and groups who are responsible for both the evaluation of graduate student progress and for informing students about the fulfillment of these requirements, and when such evaluations are to be made.

3. Criteria by which performance and progress are to be evaluated, including areas which may or may not be negotiated.

4. Under what circumstances the graduate unit will recommend to the Dean of the Graduate School the alteration of a student's standing--i.e., conditions that warrant warn, probation, and final probation (see Suggested Guidelines for Change of Status Action), and length of time the academic unit will tolerate low scholarship or unsatisfactory performance and progress.

5. Procedures for appealing evaluations recommended to the Graduate School by the graduate program.

Review Process for Low Scholarship and Unsatisfactory Progress

Review of students who maintain a 3.0 grade point average (GPA) is at the discretion of the graduate unit and is expected to be undertaken at least annually. Students whose cumulative or quarterly GPA falls below a 3.0 must be reviewed quarterly and be provided with an explanation of performance expectations and a timetable for correction of deficiencies. Doctoral program students are to be reviewed by their Doctoral Supervisory Committee, or by a committee of graduate faculty in the unit appointed or elected for this purpose in consultation with the student's Supervisory Committee. Pre- and postmaster students are to be reviewed by supervisory committees, if such committees have been appointed, or by the graduate faculty members who have been designated to oversee such students' programs. See Graduate School Memorandum No. 13 (Supervisory Committees for Graduate Students) for an explanation of the role and responsibilities of supervisory committees. In evaluating the student's performance and progress, all of the following should be reviewed:

1. Grade reports: cumulative and quarterly GPA's computed on those courses taken while the student is enrolled in the University of Washington Graduate School. Computation is based only on courses numbered 400-599; courses

graded I, S/NS, and CR/NC are excluded, as are the 600-800 series.

2. Performance during informal coursework and seminars.

3. Research capability, progress, and performance.

4. Any other information relevent to graduate program academic requirements.

A determination of satisfactory performance and progress may be made upon review of the factors indicated above and consideration of the student's progress relative to other students (part-time/full-time) in the program or to an individually negotiated schedule.

LOW SCHOLARSHIP

Low Grade Point Average

The Graduate School provides the Graduate Program Advisor of each degree-offering unit with a quarterly Low Scholarship Report which lists the names of graduate students whose GPA's fall below 3.0 either cumulatively or for that quarter. Instructions and deadlines for completing the review and transmitting the recommendations are provided with the report.

Graduate Program Advisors and the graduate faculty who supervise these students are expected to review the status of each student whose name appears on the low scholarship printout and to transmit to the Dean of the Graduate School a specific recommendation--i.e. no action, warn, probation, final probation, or drop--for each case. Final probation and drop recommendations must be accompanied by a statement which describes the student's academic problems and provides an explanation for the recommended action by the graduate faculty or supervisory committee involved.

Graduate programs deciding that either "no action" or "warn" is the appropriate action to be taken based on the student's performance, may initiate contact with the student without such action appearing on the student's permanent record. The Registrar will record only those actions recommending probation, final probation, and drop.

UNSATISFACTORY PROGRESS

Unsatisfactory Performance and Progress

To determine satisfactory performance or progress, the following criteria should be used:

1. Performance in the fulfillment of degree program requirements.

2. Performance during informal coursework and seminars.

3. Research capability, progress, and achievements.

When review of a student's performance and progress result in a determination that it has been unsatisfactory, the name of the student and recommendation for action--i.e. warn, probation, final probation, or drop--should be transmitted by the Graduate Program Advisor or the head of the graduate unit to the Dean of the Graduate School by the appropriate deadline dates. All recommendations of unsatisfactory

performance and progress must be accompanied by a well-documented statement of the circumstances involved and evidence that the action requested is supported by the majority of the graduate faculty, delegated representatives, or supervisory committee involved. Students should receive written notification of this action which includes information regarding the necessary steps the student must take to maintain their graduate student status in good standing.

SUGGESTED GUIDELINES FOR CHANGE OF STATUS ACTION

Suggested guidelines for determining the action to be recommended for low grade point average or unsatisfactory performance and progress are given below:

No Action — May be recommended for those students whose cumulative GPA is above 3.0 but whose most recent quarter's work is below 3.0, if the review has determined that this condition is not cause for immediate concern.

Warn — (1) May be recommended for those students whose cumulative GPA has dropped slightly below 3.0--i.e. 2.99-2.95.

(2) May be recommended for those students who have failed to meet expectations for performance and progress as determined by the graduate program.

ACTION TAKEN AS INDICATED ABOVE WILL BE INITIATED BY THE GRADUATE PROGRAM, AND REPORTED TO THE GRADUATE SCHOOL, BUT WILL NOT APPEAR ON THE STUDENT'S PERMANENT RECORD.

Probation — (1) May be recommended for those students who have not corrected the deficiency which caused the warn action within the time limit specified by the graduate program.

(2) May be recommended for those students who depart suddenly and substantially from scholarly achievement as defined by the graduate program. (A previous warn recommendation is not necessary).

Programs may determine the length of probationary status. (The Graduate School recommends no less than one quarter and no more that three quarters of probationary status). Students should be informed of the current program policy regarding the length of the probationary period.

Final Probation — (1) May be recommended for those students who have not corrected the condition(s) that caused the probation recommendation within the time limit specified by the graduate program.

(2) May be recommended for those students who fail to progress toward completion of the graduate program. A student will be carried on final probation status for one quarter before being changed to drop, probation, or some other status.

Drop — Final action to be recommended. A drop recommendation means immediate drop from the University of Washington. Therefore, this recommendation must be received in the Graduate School soon after the beginning of the quarter following the quarter on which the decision is based.

Recommendations for action on low grade point average or unsatisfactory performance and progress will be reviewed by the Dean of the Graduate School, and students will be informed of a change in status by letter from the Dean.

Appeals

Students may appeal change of status, as explained above, directly to the Chairperson of the graduate degree granting unit. Appeals beyond this point should follow the process outlined in Graduate School Memorandum No. 33, Academic Grievance Procedure.

Electrical Engineering Department Correspondence
University of Washington

INTRADEPARTMENTAL

Date: 18 May, 1993

To: EE Faculty and Staff

From: Mark J. Damborg, Acting Chair

Re: 93-95 Biennium Budget

Discussions in the College Executive Committee this past week have begun to clarify the budget situation for the next biennium although there is still some uncertainty in the details. The University must reduce its operating budget by $32.3 million or about 4%. Dean Bowen stated in his letter yesterday that this reduction has translated to the College operating budget to become a 5.0% cut, the basic justification being that the College of Arts and Sciences should take a smaller than average cut due to their heavy obligation to undergraduate education. Finally, the College has asked the EE Department to take a 5.1% ($492 thousand) cut since "these cuts cannot be distributed uniformly across College departments because Engr prefix courses and small academic programs need to be shielded somewhat." University guidelines require that these reductions be permanent, i.e. reflected in the carry-forward budgets to the next biennium, and that half of the reductions come from the faculty and TA/RA budgets. It may result that this 50/50 requirement can be adjusted somewhat and those discussions are underway.

It is possible that the Department could meet these reductions without losing any faculty or staff apart from positions open at the start of the biennium. This may not be the best strategy. Since we have no open faculty positions, we would have to give up 13 TA/RA positions to meet the requirement that half the cut come from academic salaries. Such a cut would have major implications on teaching loads and on the quality of education that we can provide in the time-intensive laboratory and quiz sections. I am using this argument to try to gain a reduction in this mandate. The rest of the cut could come from open staff positions which would leave us terribly under served in computer support, the business office and secretarial support.

Because these functions still must be performed, we need to develop a plan to support them. One approach is to hire staff from the operations budget. The difficulty with this approach is that the operations budget is chronically overspent. Consequently, we need to look for savings. The operating costs on 06-1030 for this biennium to date (30 April) excluding salaries are $533 thousand. The cost categories where we may be able to achieve some economies are:

Telephone equipment rental	$56 K
Telephone tolls	20 K
Freight and express mail	6 K
Software licenses	13 K
Duplicating/printing	37 K
Postage	38 K
Miscellaneous supplies	94 K
	$264K

By no means do I suggest we can eliminate these costs. After all, these services and materials allow us to do our jobs. But we need to seek ways to reduce them since this is our only area of budget flexibility. I am soliciting your suggestions and suspect this will be a continuing topic at faculty and staff meetings this spring and fall. I will initiate this discussion at the next faculty meeting on 25 May and at a staff meeting in the near future. Meanwhile some suggestions for your consideration and discussion are:

Perform a telephone equipment inventory to identify unnecessary rentals and rentals that should/could be transferred to research budgets.

Limit telephone tolls to a monthly quota with excess to be recharged to research budgets.

Limit express mail to categories with rigid deadlines such as proposals and papers with other material to be charged to research budgets.

Using the Copy Centers and ASUW Lecture Notes to reduce the Department costs for course handouts.

Examine the current practices of supplies purchases to identify opportunities for savings.

A few comments are in order before we get all tied up in the details. First, most of us do not care about all this stuff. We just want the system to allow us to do our job and provide what we need. Second, none of us want to police a system full of quotas and allowances. So I come to this discussion with little enthusiasm. I think the faculty and staff of the Department should all be informed of the situation and have an opportunity to contribute to our management of it. The intent is to reduce the pain as much as possible while considering everyone's needs.

Other results of the State budget reductions which are of interest to us are:

no salary increases in 93-95
tuition increases of 9% the first year and 22% the second
reduction in the WTC budget of 21%
no equipment money.

The EE/CSE initiative money planned for the biennium is preserved which, for EE, consists of

1/2 of a staff position
$250 K for equipment
$108 K for operations.

pd 5/18/93

UNIVERSITY OF WASHINGTON
Petty Cash Voucher

Date of Purchase 5/14/93 No. _____

Name of Fund ELECTRICAL ENGINEERING PETTY CASH

Department ELECTRICAL ENGINEERING, FT-10

Budget to be Charged 75-1030 ICRR

Purchased From University Book Store

Purchased By R.T. Charles

Purpose Reference

Description of Items Purchased	Amount
1. 2 Books - Doc Preparation System LATEX	$
2. Chaos & Fractals	$
3.	$
4.	$
5.	$
6.	$
7.	$
TOTAL	$ 86.56

Payment Received _____
Signature

Voucher Submission Date 5/17/93

• 27667

Reimburse
from
Petty
Cash-
(Indirect)
-Bob-

4842 0308 1164 5317

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ROBERT J MARKS II DR

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AUTHORIZATION NUMBER

DATE
MONTH DAY YEAR

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	5/14/93	6	BANK CARD	TTL 86.

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REFERENCE NO. | CLERK | TAX 6.56

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A Document Preparation System

LaTeX

Leslie Lamport

Do you write technical documents — articles, books, manuals, reports, theses? Do you use a computer for writing? Is the professional appearance of your work important?

If you answered *yes* to any of these questions, then LaTeX may well be of interest to you.

LaTeX is a special version of Donald Knuth's TeX program for computer typesetting, a program particularly suited for producing high-quality documents with mathematical text. LaTeX is actually a collection of high-level commands, called "macros," which simplify the use of TeX and make typesetting relatively easy. With LaTeX, users can concentrate more on their writing than on formatting detail, and still benefit from the sophisticated functionality of Knuth's system.

Leslie Lamport's development of the LaTeX system began three years ago. It has since gone through several revisions and is currently installed at a large number of TeX sites around the world. There are LaTeX implementations for a wide variety of mainframe and minicomputers, and versions are even available for microcomputers.

LaTeX: A Document Preparation System describes the final version of LaTeX. The book is, at once, a definitive user's guide and a reference manual for LaTeX. It introduces readers to LaTeX, shows them how to get started with it, then gradually leads them through more advanced techniques. The book contains numerous examples that help explain system particulars. It also includes appendices on how to prepare slides (SLiTeX) and a bibliography database (BIBTeX), and how to use Knuth's own Plain TeX commands. Like Knuth's guide and manual, *The TeXbook,* also published by Addison-Wesley, this one is delightfully illustrated by Duane Bibby.

LaTeX: A Document Preparation System was typeset by the author with LaTeX.

Leslie Lamport is a computer scientist specializing in the area of parallel processing. Currently, he works at Digital Equipment Corporation in Palo Alto, California. Prior to this, he was at SRI

Heinz-Otto Peitgen Hartmut Jürgens Dietmar Saupe

Chaos and Fractals

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University of Washington Correspondence

INTERDEPARTMENTAL

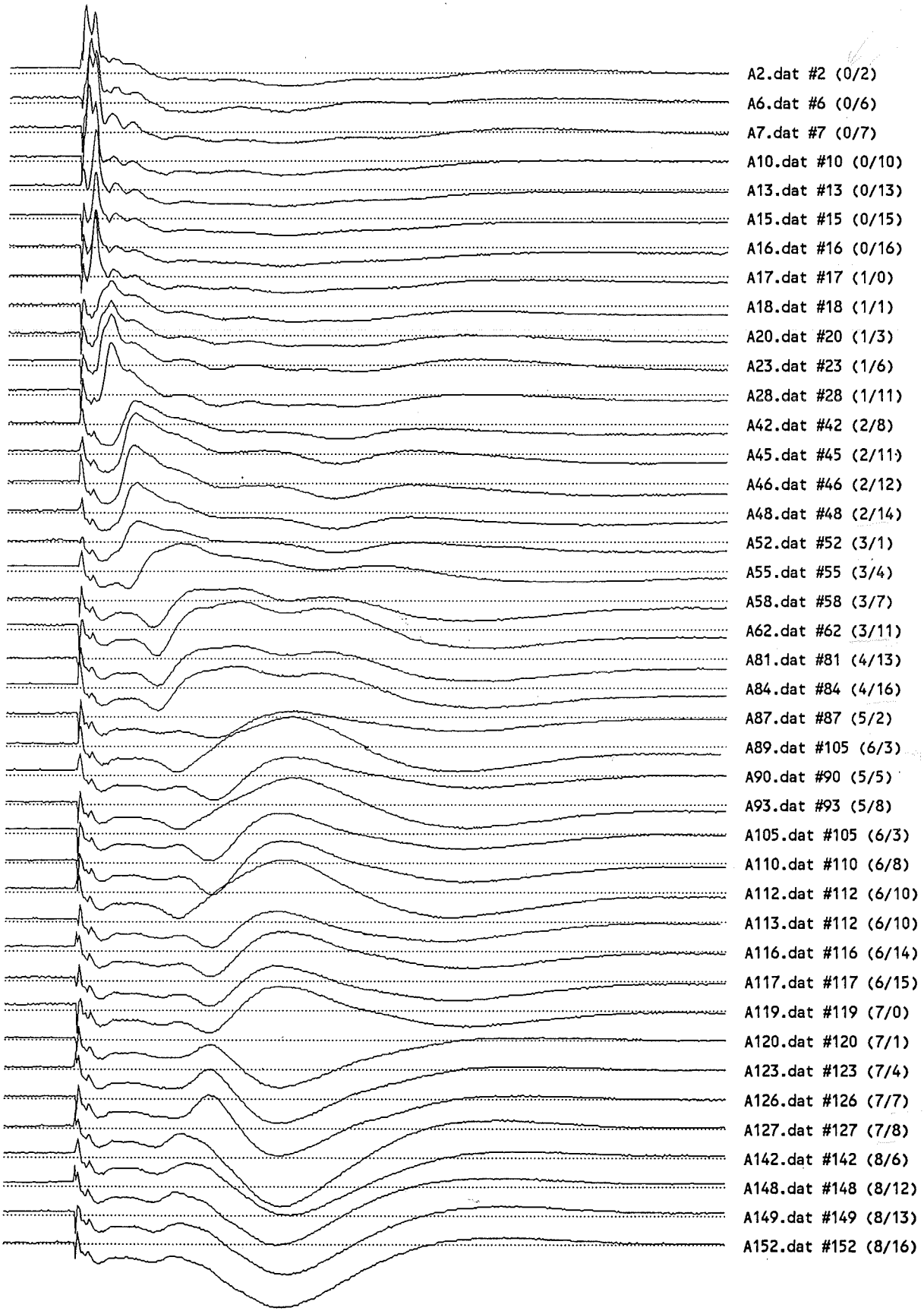
Date: **May 17, 1993**

To: M. A. El-Sharkawi
Steve Hwang
Seho Oh
George Andexler

From: R. J. Marks II, Electrical Engineering FT-10

Russ Reed plotted the rotor signals
A160.dat#160 (9/7) means turn
160, 9 + 1 = 10th coil, 7 + 1 = 8th coil in in 10th term.

Look at 119 vs 120. Did we reverse leads?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A6.dat #6 (0/6)
A7.dat #7 (0/7)
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A13.dat #13 (0/13)
A15.dat #15 (0/15)
A16.dat #16 (0/16)
A17.dat #17 (1/0)
A18.dat #18 (1/1)
A20.dat #20 (1/3)
A23.dat #23 (1/6)
A28.dat #28 (1/11)
A42.dat #42 (2/8)
A45.dat #45 (2/11)
A46.dat #46 (2/12)
A48.dat #48 (2/14)
A52.dat #52 (3/1)
A55.dat #55 (3/4)
A58.dat #58 (3/7)
A62.dat #62 (3/11)
A81.dat #81 (4/13)
A84.dat #84 (4/16)
A87.dat #87 (5/2)
A89.dat #105 (6/3)
A90.dat #90 (5/5)
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A126.dat #126 (7/7)
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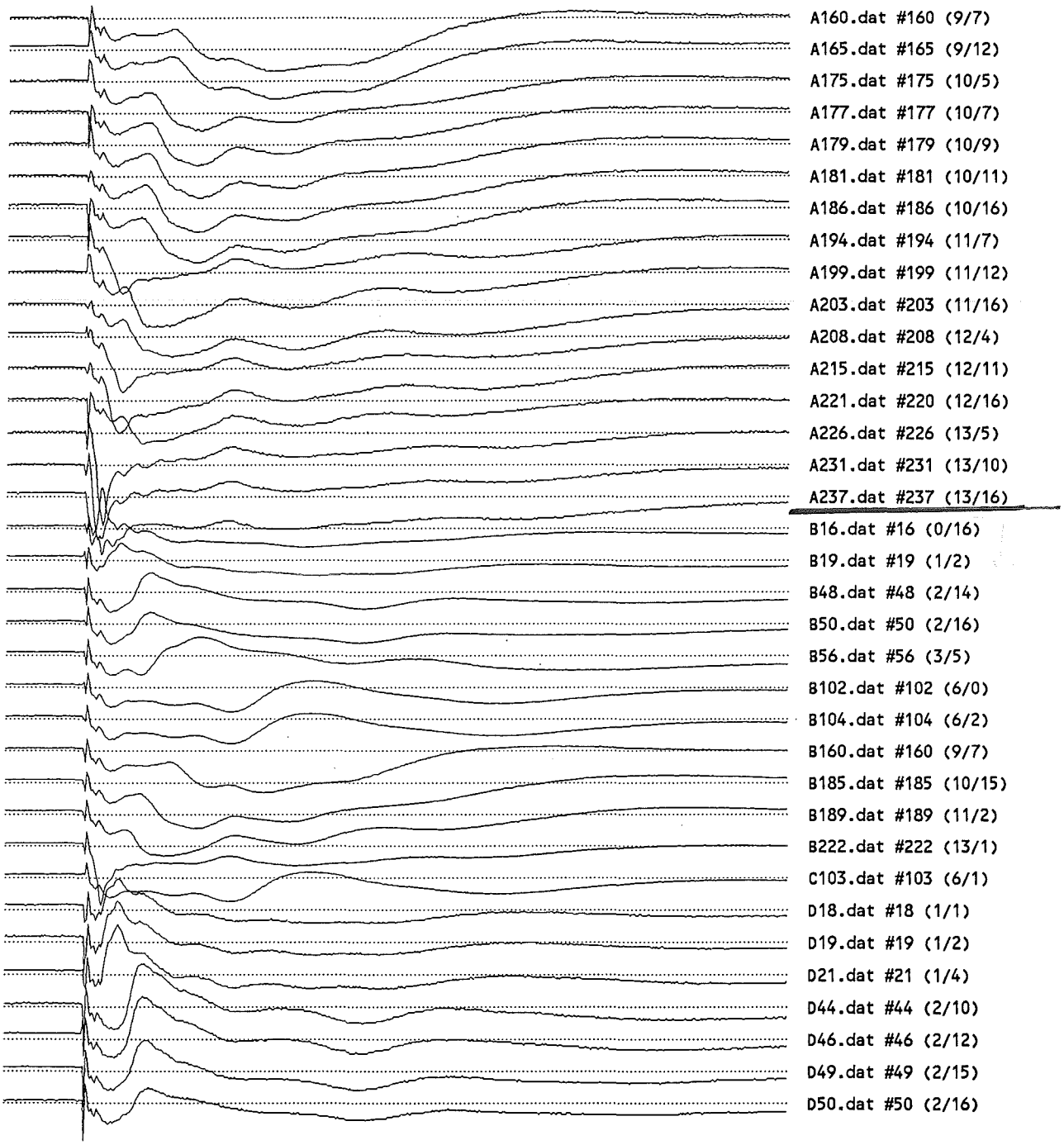
A149.dat #149 (8/13)
A152.dat #152 (8/16)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D49.dat #49 (2/15)
D50.dat #50 (2/16)

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@u.washington.edu

May 14, 1993

TO: Leung Tsang
Yasuo Kuga
FROM: Robert J. Marks II
SUBJECT: Review Committee for Assistant Professor Jenq-Neng Hwang

Here is, I believe, the final draft. I have put the positive stuff up front. I was correctly corrected on the teaching ratings. The comments have been appropriately changed.

If you like this, please sign.

If not, make changes on copy.

Thanks!

University of Washington Correspondence

INTERDEPARTMENTAL

Department of Electrical Engineering, FT-10;
(206) 543-6990, 543-6061 or 543-2150; FAX (206) 543-3842; marks@u.washington.edu

May 11, 1993

TO: Mark Damborg
FROM: Robert J. Marks II
SUBJECT: Overnight

I write in regard to the attached memo.

The amount is sufficiently negligible, that I am willing to pay the amount if you can assure me, in writing, the attached memo is not in any department files, including Sharon's. I want to make certain there is no record implying I inappropriately used department resources. I did not.

Memos such as you wrote keep people from being appointed to posts such as Attorney General!

The use of overnight mail, charged to the department, I feel, was appropriate. I arrived home late Friday from a California trip and caught a plane to Chicago on Sunday AM. The overnight package was from Ruth and contained information I needed - some related to departmental and college matters and some concerning the ISCAS conference I am Chairing in Seattle in 1995. It arrived at my home on Saturday.

I also request, in the future, that you collegially afford me the courtesy of asking 'why' before sending me such a bill.

University of Washington Correspondence

INTERDEPARTMENTAL

DEPARTMENT OF ELECTRICAL ENGINEERING, FT-10

May 3, 1993

To: Professor Robert J. Marks, II

From: Mark J. Damborg, Acting Chair

Subject: Express Mail

I believe this is an inappropriate item to charge to the Department budget. Please identify a contract that we can charge it to and if you have questions about this please come see me.

cc: Sharon Schlittenhard

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UNIVERSITY OF WASHINGTON
The Graduate School

April 12, 1993

Professor Jenq-Neng Hwang , Chairperson

Professor Eberhard Fetz , Graduate Faculty Representative, Physiology and Biophysics
Professor Deirdre Meldrum
Professor Linda Shapiro
Professor Robert Marks

Dear Colleagues:

I am writing to ask you to serve as members of the Supervisory Committee for Yen-Hao Tseng who wishes to enter the doctoral program leading to the degree of Doctor of Philosophy in the field of Electrical Engineering.

It will be your responsibility as a committee (a) to approve a course of study which will fulfill the general course requirements of the student's major and supporting fields; (b) to conduct the student's General Examination; (c) to approve the Candidate's dissertation proposal; (d) to approve the Candidate's dissertation and (e) to conduct the Candidate's Final Examination. The Graduate Faculty Representative is a voting member of the Committee and participates fully in carrying out all of the responsibilities listed above. For additional information you may refer to Graduate School Memorandum #13, "Supervisory Committees for Graduate Students."

The Supervisory Committee Chairperson is responsible for scheduling conferences and examinations and for informing all members of the Committee of the appropriate times and places. At least four members of the Committee, including the Chairperson and the Graduate Faculty Representative, must be in attendance at all conferences and examinations. At least three weeks prior to the agreed upon examination date, the Chairperson should ask the Dean of the Graduate School to approve the application for the examination and to announce it in The University Week. The Supervisory Committee must be convened by the Chairperson, whether the examinations are oral or written, and formal judgment on the Candidate's performance must be indicated on the warrant, dated and forwarded immediately to the Graduate School.

Members of the Supervisory Committee of a doctoral aspirant undertake a serious charge. They are responsible to the student and to their colleagues of the Graduate Faculty for the quality of the degree being sought.

Sincerely,

Carol M. Eastman

Carol M. Eastman
Dean

GLW:ja
cc: Graduate Student: Yen-Hao Tseng
Graduate Program Coordinator: Professor S.S. Venkata
Student file

April 15, 1993

file

UNIVERSITY OF WASHINGTON

Seattle, Washington 98195/Office of the President

MARKS, ROBERT

March 26, 1993

Pursuant to the authorization of the Board of Regents your appointment has been continued for the 1992-93 academic year on the following terms:

Title	Department
PROFESSOR	ELECTRICAL ENGINEERING

Salary on a 9.0 -month basis: $ 7602 per month

44.0 step on the 9 month schedule

You were on 43.0 step (9month schedule) during the last academic year.

This appointment is subject to sufficiency of funds, the applicable rules of the University of Washington, and the requirements of the applicable laws of the State of Washington.

Sincerely yours,

W P Gerberding

William P. Gerberding
President

PP07P

The Washington Technology Center

FU–20, University of Washington, Seattle, WA 98195

Human Interface Technology Laboratory

(206) 543–5075 (Voice)
(206) 543–5380 (FAX)
Network Address:
tfurness@max.acs.washington.edu

Dr. Thomas A. Furness III
Director

MEMORANDUM

DATE: April 5, 1993

TO: Professor Robert Marks
Dept of Electrical Engineering

FROM: Professor Tom Furness
Dept of Industrial Engineering

SUBJECT: Proposed Activities for Prof. Furness as Adjunct Professor in Electrical Engineering Department

As requested in our recent conversation, I have defined a number of duties and activities that I would be pleased to perform as Adjunct Professor in Electrical Engineering:

1] Provide research assistantships/associateships and supervise EE graduate students performing research in the Human Interface Technology Laboratory (HITL).

2] Serve on EE graduate student committees in areas related to controls/displays, electro-optics, computing and human factors. Chair graduate committees where appropriate.

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4] Participate in student recruiting and selection for the EE Department.

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Provide access to HITL computing, graphics and advanced interface facilities for EE students and faculty for collaborative research activities. HIT Laboratory research and development projects shown in Table 1.

7] Help teach courses in EE including seminar lectures.

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9] Advise student professional groups for the EE Department.

10] Work with faculty to prepare joint proposals NSF and other agencies.

TABLE 1

HITL MISSION

To empower humans by creating better ways of interacting with advanced computers.

- educate students
- conduct scholarly research
- develop pervasive technologies
- explore applications
- transition technology

AREAS OF FOCUS

Develop Virtual Interface Technologies to . . .

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- enhance creative abilities
- extend communications
- rapid information assimilation
- recapture "lost" world citizens

VIRTUAL WORLD CONSORTIUM

- nexus for coordinating the birth of a new global industry
- resources to the HITL to promote the development of crucial technologies
- industrial forum for guiding the research agenda of the Human Interface Technology Laboratory
- technology transfer in the form of technical reports/ industrial fellows
- gateway for further contracted research

CONSORTIUM MEMBERS

- Alias Research
- Boeing
- Microsoft
- Digital Equipment Corp
- Sun Microsystems
- Division Ltd.
- Virtual Reality Inc.
- Kopin Corp
- American Express
- Stratos
- Kubota-Pacific
- U S WEST Communications
- Fluke Manufacturing Co.
- Port of Seattle
- Franz Inc.
- Fujitsu
- Insight Inc.
- Ford Motor Company
- Sharp
- U S Navy
- VPL Research

HITL PRODUCTS

Virtual Environment Operating System (version 2.2)

Mercury (version 1.0)

Virtual Retinal Display-concept demonstration

RESEARCH AGENDA

software tools for virtual environments

test bed development

alternative control/display devices

human factors issues

multiparticipant/networked virtual environments

systems integration principles

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- one person
- $250K WTC seed money
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- educate practioners
- systems approach
- develop key technologies
  - virtual environment operating system
  - virtual retinal display
  - human factors
- leverage development through Virtual Worlds Consortium
- commercial products through start-up companies
  - --Virtual Vision Inc.--low cost multiplexed virtual displays
  - --OZ International Ltd.--training applications, chip engine
  - --Worldesign--applications development

CURRENT HITL PROJECT AREAS

HARDWARE DEVELOPMENT

SOFTWARE DEVELOPMENT

HUMAN FACTORS RESEARCH

APPLICATIONS DEVELOPMENT

HARDWARE DEVELOPMENT

- virtual retinal display
- extended range position tracker
- 3D sound generation
- Sound Raster
- speech recognition

SOFTWARE DEVELOPMENT

- Virtual Environment Operating System (VEOS)
- Mercury
- Sound Renderer
- World Building Toolkit
- Virtual Physics
- World Design

HUMAN FACTORS RESEARCH

- Virtual Navigation
- Participant/Perceptual Tracking System
- Presence
- Situation Awareness
- Biopotential Interfaces

APPLICATIONS DEVELOPMENT

- Manufacturing
- Architecture
- Visualization
- Surgery Simulation
- Endoscopy
- Education/Training
- International Virtual Information Community

HUMAN INTERFACE TECHNOLOGY LABORATORY

WRITE TO:

HUMAN INTERFACE TECHNOLOGY LABORATORY (FJ-15)
WASHINGTON TECHNOLOGY CENTER
UNIVERSITY OF WASHINGTON
SEATTLE, WA. 98195

Voice: (206) 543-5075
Fax: (206) 543-5380
email: tfurness@max.u.washington.edu

UNIVERSITY OF WASHINGTON
DEPARTMENT OF ELECTRICAL ENGINEERING FT-10
SEATTLE, WASHINGTON 98195 USA
FAX: (206) 543-3842

FAX Cover Sheet

ATTENTION: Anne Elias
NAME OF FIRM: HIT Lab - UW
LOCATION:
FAX TELEPHONE NUMBER: 3-5380
FROM: Rita Wagner Bennett PHONE: 3-6061
This transmission, including this cover page, contains 7 pages
DATE: 4/8/93 TIME:
Please call (206) 543-6061 if you do not receive all of the pages.

Anne –

The info Tom was to send Edie (in Advising) was a written statement that he would "hire" "sponsor" (?) some RA's that he was interested in

Rita

She's in a mtg today (saw her in the hall) but will be in her office tomorrow

Department of Electrical Engineering Graduate Student Continuation Policy

DRAFT #1 by Mark Damborg and Bob Marks

March 2, 1993

This policy provides guidelines and requirements to assure each graduate student in the Department of Electrical Engineering is making progress towards his/her degree and is in compliance with the continuation policy of the Graduate School. It applies to all graduate students with the exception of those who (1) are enrolled in special graduate programs, such as TIE, (2) are departmentally approved part time students or (c) are nonmatriculating students.

1 Annual Review

Each graduate student's progress towards his/her degree will be reviewed annually in the Winter quarter. The review will be coordinated by the student's advisory committee who will submit a written report for insertion in the student's record. The review will be coordinated by the Graduate Program Coordinator if the student has no advisor.

If a student's progress is other than satisfactory, a copy of the report will be given to the Graduate Program Program Coordinator with a recommendation to take one of the following actions.

1. No Action
2. Warn
3. Probation
4. Final Probation
5. Drop

2 Grade Point Average

A graduate student whose cumulative or quarterly GPA falls below 3.0 will, for the first incident, be placed on probation. A second occurrence will result in

being placed on final probation. The student will be dropped from the program upon a third occurrence. The quarters need not be successive.

3 Degree Progress

3.1 Master's Degree

MS students will coordinate the formation of an advisory committee and be responsible for obtaining committee approval of their degree plan before completion of nine credits towards their degree.

Unless he/she does not hold an undergraduate degree in electrical engineering, an MS student will complete their degree in no more than four quarters of matriculation. An extension of one additional quarter can be approved by the MS student's advisor. MS students who do not have EE undergraduate degrees can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the MS student's degree plan. Such extensions are for the purpose of allowing the MS student to establish subject familiarization commensurate with that of an undergraduate degree in electrical engineering. All other extensions can be obtained only by petition to the Graduate Studies Committee by the student's advisor.

3.2 Ph.D. Degrees

Students admitted to the Ph.D. program will form an advisory committee within one calendar year of their admission to the program.

Students in the Ph.D. program may take the qualifying examination twice. A third attempt will be allowed in unusual circumstances by approval of the Graduate Studies Committee upon petition of the student's advisor. Unless he/she does not hold a degree in electrical engineering, Ph.D. students are expected to pass the qualifying examination within one year from admission to the program. Ph.D. students who do not have an electrical engineering degree can have this time extended by approval of their advisory committee. All such extensions will be explicitly stated in the Ph.D. student's degree plan. Such extensions are for the purpose of allowing the student to establish subject familiarization commensurate with that required for an electrical engineering degree.

Ph.D. students are required to take the general examination within two years of passing the qualifying examination. An extension will be allowed in unusual circumstances by a approval of the Graduate Studies Committee upon petition of the student's advisor.

University of Washington Correspondence

INTERDEPARTMENTAL

DATE: April 7, 1993

TO: Mark Damborg, Acting Chair

FROM: R. J. Marks II

Attached is a statement of proposed activities for Professor Tom Furness. This should complete the material necessary to appoint Dr. Furness as an Adjunct Professor to our department. Please recall that our faculty also voted to have Dr. Furness appointed to the Graduate Faculty through his appointment in our department.

Attachments

The Washington Technology Center

FU–20, University of Washington, Seattle, WA 98195

Human Interface Technology Laboratory

(206) 543–5075 (Voice)
(206) 543–5380 (FAX)
Network Address:
tfurness@max.acs.washington.edu

Dr. Thomas A. Furness III
Director

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Dept of Electrical Engineering

FROM: Professor Tom Furness
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Voice: (206) 543-5075
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file

University of Washington Correspondence

INTERDEPARTMENTAL

March 4, 1993

MEMO TO: EE Faculty and Staff

FROM: Sharon Schlittenhard Sharon

RE: U-WATS Long Distances Charges

Attached for your review are your U-WATS long distance charges for the period September, 1992 - January, 1993 on Budget No. 06-1030. Please check to be sure that you recognize all the calls, and indicate any calls that should be charged to a sponsored programs budget by writing the budget number next to the charge. Please return all items as appropriate to me.

Thank you.

file

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

February 23, 1993

TO: E. E. Faculty

FROM: S. S. Venkata, Professor SSVenkata ew

RE: Autumn 1993 Admissions

Attached is the first set of 45 students recommended for admission into our graduate program for Autumn 1993. These have been selected out of 300 applications received from Graduate School. These are the potential set of students to whom you can consider offering new RA positions. As the list indicates, we have awarded TA offers to 18 of these students based on their high scholarship. You are free to make the RA offers to those selected for TA appointments since prospective graduate students prefer the former.

You will note that Mr. Robert Jones has been awarded a BOEING fellowship and we have recommended Mr. Kenneth Quon for an OSBERG fellowship award to the College of Engineering Fellowship Committee.

The Admissions Committee has had three evaluation meetings and we plan to continue the process. Since we have so many applications to consider, each applicant has been incorporated into the computer as quickly as possible. This does not necessarily mean that the file is complete, nor have we incorporated all the applicants. We are currently on number 431. If you are aware of any candidate who needs special attention in the admission process, please call Eddie.

Just for your information, considering to date from September 1992, we have mailed 1219 international and 1403 domestic graduate packets, a total of 2622. This breaks down to approximately 400 a month.

ew
Att.
cc: M. J. Damborg

University of Washington
Department of Electrical Engineering
Application for Admission to Graduate Program
Autumn 1993

	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q
1																	
2										A=Accepted R=Rejected							
3										C=Confirmed NC=Not Coming							
4										F=Foreign C=Citizen M=Minority							
5										Fe=Female							
6												F/C		C	TA		
7	NAME	PROG	UNIVERSITY	UG DEG	GPA	UNIVERSITY	G. DEG.	GPA	GRE	TFL	AREA OF INTEREST	M/Fe	A/R	NC	RA	FELL	REMARKS
8	AGGARWAL, Sanjeev	MSEE+PHD	BANARAS HINDU UNIV., INDIA	BTECH 93	3.13				V650 Q800 A730		MICROELEC. & VLSI	F					
9	AHN, Byungjun	PHD	HANYANG UNIVERSITY, KOREA	BSEE 2/84		HANYANG UNIVERSITY, KOREA	MSEE 2/86	3.74	V370 Q760 A510	553	COMM. & SIGN. PROC	F	R				
10	AHN, Heetah	MSEE+PHD	HANKUK AVAITION UNIVERSITY	BS 2/87	3.81				V300 Q740 A530	567	CONTROL SYSTEMS	F					
11	AHRENS, Tamara	MSEE	STANFORD	BS 6/93	3.2				V550 Q780 A750			C	R				
12	ALFREY, Karen	MSEE-PHD	CORNELL	BSEE 5/93	3.2				V690 Q780 A800		CONTROL SYSTEMS	C					
13	ALLISON, Phillip Edward	MSEE	UNIV. COLORADO, BOULDER	BA 8/86	3	UNIV. OF WA. GNM			V740 Q800 A780	EX	OPTICS	C					TRANSFER STUDENT
14	ALNAEMI, MOHAMMED	SUM&PHD	UNIV. OF BRIDGEPORT, CONN.	BS 6/89		UNIVERSITY OF FLORIDA	MS 12/92		V360 Q670 A490	EX	SIGN. PROCESSING	F					
15	ALUWIHARE, Assaji		CORNELL UNIV.	BS 5/92	3.43												
16	ANDERSON, Mark	MSEE+PHD	UNIV. OF NORTH DAKOTA	BSEE 5/90	3.96				V520 Q670 Q670	EX	MICROWV COMMUN.	C	A		TA		
17	ANSON, Scott	MSE	UNIVERSITY OF IOWA	BS 5/93					V360 Q710 A570	EX	TECH JAPANESE	C					TO TSUTSUI FH-10
18	ARBETTER, BARRY	MSEE	UNIV. OF ILLINOIS, URBANA	BS 5/85	3.73				V710 Q790 A760	EX	POWER SYSTEMS	C	A		TA		
19	ARTALEJO, Leopoldo	MSEE+PHD	RICE UNIVERSITY	BSEE 12/92	3.3				V570 Q760 A720	EX	ELEC. & COMPUTERS	C	H				
20	ARUNA, CHINTALAPATI	MSEE+PHD	BANGALORE INST. OF TECH.	BE 2/93						620	COMM. & SIGN. PROC	F					
21	ASHBY, DAVID	MSEE+PHD	UNIVERSITY OF ARIZONA	BS 5/93	3.75				V410 Q510 A540	EX	OPTICS	C					
22	AVADHANAM, Niranjan	PHD	JAWAH NEHRU TECH U., INDIA	BTECH 7/91	3.53	TEXAS TECH. UNIVERSITY	MS 8/93	3.85	V770 Q780 A680	EX	COMM. & SIGN. PROC	F					
23	AYALA, Roland Joseph	PHD	GEORGIA INSTITUTE OF TECH.	BME 6/89	3.5				V540 Q760 A650	EX	DIGITAL CIRCUIT	C	H				
24	BALASUBRAMANIAN, S.	MSEE+PHD	BHARATHAIR UNIV., INDIA	BENGR 4/90	3				V590 Q780 A610	607	POWER SYSTEMS	F					
25	BANSAL, Sumeet	MSEE+PHD	MICHIGAN TECH. UNIVERSITY	BS 8/93	3.51					EX	ELEC. & COMPUTERS	F					
26	BAO, Liewei	MSEE+PHD	UNIV. OF SCI. & TECH. OF CHINA	BS 6/93	3.16				V400 Q780 A710	587	COMM & SIGN. PROC.	F					
27	BARDHAN, Titash	MSEE+PHD	UNIV. OF CALIF.-BERKELEY	BA 12/92	3.76				V740 Q800 A800	EX	MATLS & DEVICES	PR					
28	BASOGLU, Christopher	MSEE	UNIVERSITY OF WASHINGTON	BS 6/93	3.88				V670 Q630 A580	EX	DIGITAL ELECTRONICS	C					
29	BEDEKAR, Anand	MSEE+PHD	IIT-BOMBAY, INDIA	BTECH 6/93	3.4				V770 Q780 A760	677	COMM & SIGN. PROC.	F	A				
30	BEHPOUR, KUROSH	PHD	CA. STATE. U., NORTHRIDGE	BSEE 5/88	3.56	UNIV. OF SOURTHERN CA.	CSCE 5/93	3.65	V480 Q710 A580	EX	DIGITAL DESIGN	C					
31	BELIAN, ANTHONY	MSEE	NEW MEXICO STATE UNIV.	BSEE 12/92	3.22				V480 Q670 A630	EX	CIRCUITS/ELECTRCS	C					
32	BELLAPU, Subbareddy	MSEE+PHD	SRI VENKATESWARA U., INDIA	BTECH 4/89		BIRLA INST. OF TECH., INDIA	MENGR 2/92	3.28	V330 Q670 A230	533	TELECOMM.	F	R				
33	BERGSET, OLE DAVID	PHD	CALTECH	BSEE 5/92	3.4				V550 Q690 A560	EX	COMMUNICATIONS	C					
34	BERNSTEIN, James	MSEE+PHD	RENSSELAER POLYTECHNIC	BSEE5/93	3.3				V500 Q640 A540	EX	ELECTROMAGNETICS	C					
35	BHADRI, NARASIMHA	MSEE+PHD	BIRLA INST. OF TECH., RANCHI	BE 5/92					V390 Q750 A540	MATLS & DEVICES		F					
36	BHATT, Neel	MSEE+PHD	UNIV. OF CALIF., L.A.	BS 6/92	3.46				V570 Q720 A710	EX	MATLS & DEVICES	PRFe					
37	BHATTACHARYA, SAIKA	PHD	INDIAN INST. OF TECHNOLOGY	BTECH 8/91		TEXAS A&M UNIVERSITY	MS 8/93	3.63	V630 Q800 A650	657	COMP.& ELECTRNCS	F					
38	BHURJI, PRABHJYAT	PHD	UNIV. OF BOMBAY, INDIA	MS 5/91	2.88				V500 Q710 A400		MATLS & DEVICES	F					
39	BJORK, CHRISTOPHER	MSEE+PHD	UNIV. OF CA., SANTA BARBARA	BS 6/93	2.71				V540 Q780 A680	EX	ELEC. & COMPUTERS	C					
40	BOE, Frederick	MSEE+PHD									CONTROL SYSTEMS	F					
41	BOSLAND, Kristofer	MSEE+PHD	SEATTLE UNIV.	BSEE6/93	3.87				V710 Q770 A800	EX	VIRTUAL REALITY	C	A		TA		
42	BRAYMAN, VLADIMIR	MSEE	MOGILEV MACHINE BUILDING INST.	BSEE 6/83							CONTROL SYSTEMS	F					
43	BRUNNER, James J.	PHD	UNIVERSITY OF WASHINGTON	BSEE 6/93	3.71				V660 Q720 A680	EX	ELECTROMAGNETICS	C	A		TA		
44	CADAMBI, Srihari	MSEE+PHD	INDIAN INST. OF TECH., MADRAS	BTECH 7/93	2.73				V560 Q790 A750	653	SOLID STATE	F					
45	CAI, Quian	MSEE+PHD	SHANGHAI JIAO TONG UNIV.	BS 7/92							ELECTRONICS & S.P.	F					

University of Washington
Department of Electrical Engineering
Application for Admission to Graduate Program
Autumn 1993

A = Accepted R = Rejected
C = Confirmed NC = Not Coming
F = Foreign C = Citizen M = Minority
Fe = Female

	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q
1																	
2																	
3																	
4																	
5																	
6												F/C		C	TA		
7	NAME	PROG	UNIVERSITY	UG DEG	GPA	UNIVERSITY	G. DEG.	GPA	GRE	TFL	AREA OF INTEREST	M/Fe	A/R	NC	RA	FELL	REMARKS
46	CHAN, Cheng-Chung	MSEE	NAT'L TAIWAN UNIV., TAIWAN	BSE 6/91	3.46				V470 Q800 A760	ND	OPTOELECTRONICS	F					
47	CHAN, Tsz King	MSEE+PHD	PORTLAND STATE UNIV.	BS 6/93	4				V440 Q780 A570	EX	OPTICS	F					
48	CHANG, Charles	MSEE	FU JEN CATHOLIC U., TAIWAN	BS 6/93	2.62				V450 Q790 A670	570	CONTROL SYSTEMS	F					
49	CHANG, Chuan-Cheng	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91							MATLS & DEVICES	F					
50	CHANG, Hsing-Chien	PHD	CHUNG-YUAN UNIVERSITY	BS 6/89	3.15	UNIV. OF S. CALIFORNIA, L.A.	MS 12/92		V390 Q800 A670	EX	SIGNAL PROCESSING	F					
51	CHANG, HUNG-MING	MSEE+PHD	NAT'L TSING HUA UNIVERSITY	BS 6/90					V310 Q800 A690	553	IMAGE PROCESSING	F					
52	CHANG, KUO-PIN	MSEE	FENG-CHIA UNIVERSITY	BENGR 6/90	1.92				V300 Q770 A630	557	COMMUNICATIONS	F					
53	CHANG, PETER	MSEE+PHD	BROWN UNIVERSITY	BS 5/93	3.1				V310 Q750 A620	EX	ELEC. & COMPUTERS	C/M					
54	CHANG, Tian Ge	PHD	MOUNT HOLYOKE COLLEGE	BA 5/93	3.93				V600 Q800 A670	EX	MATLS & DEVICES	F					
55	CHANG, Tsung Yuan	PHD	TATUNG INST OF TECH, TAIWAN	BS 6/88	3.62	SYRACUSE UNIV., NY	BS 12/92	3.95	V480 Q800 A650	EX	ELECTROMAGNETICS	F					
56	CHANG, Wen-Feng	MSEE+PHD	CHUNG YUAN CHRISTIAN U.	BE 7/90							COMPUTER NETWORK	F					
57	CHANG, Yi-Shing	MSEE	NAT'L TAIWAN UNIVERSITY	BS 6/92	3.19				V320 Q780 A690	533	ELEC. & COMPUTERS	F	R				
58	CHEN, Albert (Yi-Chih)	MSEE	UNIV. OF WI-MADISON	BS 5/93	3.59				V400 Q750 A540	EX	ELEC. & COMPUTERS	F	R				
59	CHEN, ALLAN JUNG-SHO	MSEE	UNIV. OF CA., DAVIS	BS 6/93	3.35				V450 Q790 A650	EX	COMM. & SIGN. PROC	C/M					
60	CHEN, Chang-Ho	PHD	DUKE UNIVERSITY	MS 12/92					V300 Q700 A500		SOLID STATE DEVICES	F					
61	CHEN, CHIH-MING	MSEE+PHD	CHUNG-YUAN CHRISTIAN U.	BS 6/92					V350 Q790 A640		VLSI DESIGN	F					
62	CHEN, FU-CHIARNG	PHD	NAT'L TAIWAN UNIVERSITY	BS 6/88		NAT'L TAIWAN UNIVERSITY	MS 6/90		V600 Q780 A560	647	ELECTROMAGNETICS	F					
63	CHEN, GANG	MSEE+PHD	TSINGHUA UNIV., BEIJING	BE 7/90					V560 Q800 A670	603	COMM. & SIGN. PROC	F					
64	CHEN, Hueng-Cheng	MSEE+PHD	CHUNGYUAN CHRSTN UNV.	BS 6/90	3.54				V420 Q790 A590	587	NEURAL NETWORKS	F					
65	CHEN, Jey-Hsin	MSEE+PHD	JOHNS HOPKINS UNIVERSITY	BS 5/93	3.65				V580 Q800 A740	EX	ELEC. & COMPUTERS	F					
66	CHEN, Jian	MSEE+PHD	TSINGHUA UNIVERSITY	BE 7/91	2.91				V460 Q800 A690	637	BIOENGR & SIGNAL PR	F	A				
67	CHEN, Jian	MSEE+PHD	UNIV. OF MINN., DULUTH	BS 8/92	3.6				V560 Q800 A730	EX	COMP. ENGINEERING	F					
68	CHEN, Lingji	PHD	U. OF SCIENCE & TECH., CHINA	BENGR. 7/9		U. OF SCIENCE & TECH., CHINA	MENGR. 7/9	3.89	V590 Q800 A640	650	CONTROL SYSTEMS	F	A				
69	CHEN, Mei	PHD	TSINGHUA UNIVERSITY	BE 7/91		TSINGHUA UNIVERSITY	MS 7/93		V600 Q800 A670		COMM & SIGNAL PRO	F					
70	CHEN, Qinghua	PHD	TSINGHUA UNIV. BEIJING	BE 7/90		TSINGHUA UNIV. BEIJING	MS 3/93	3.71	V560 Q800 A760	620	ELEC. & COMPUTERS	F	A				
71	CHEN, SZ-MU	PHD	NAT'L CHIAO TUNG UNIVERSITY	BS 6/86		TAMKANG UNIV., TAIWAN	ME 6/88	3.6	V390 Q800 A600	577	IMAGE PROCESSING	F					
72	CHEN, Tai-Ann	MSEE+PHD	NATIONAL TSING HUA UNIV.	BS 2/90					V430 Q800 A650	580	SIGNAL PROCESSING	F	A				
73	CHEN, TAO	PHD	UNIVERSITY OF NOTRE DAME	BSEE 5/93	3.85	UNIVERSITY OF NOTRE DAME	BSMATH	3.85	V430 Q790 A800	EX	COMM. & SIGN. PROC	F					
74	CHEN, Ti-Chih	PHD	NAT'L CHENG KUNG UNIV.	BS 6/90		UNIV. OF SOUTHERN CA.	MS 12/92				COMMUNICATION	F					
75	CHEN, Tong	PHD	TSINGHUA UNIVERSITY	B 7/90	2.73				V450 Q770 A670	587	ENERGY SYSTEMS	F					
76	CHEN, Wei-Yu	MSEE+PHD	NATL TSING HUA UNIV.	BS 6/92	3.57				V400 Q790 A620	583	COMP. & SOFTWARE	F					
77	CHEN, XIAOMIN	MSEE+PHD	ZHANGSHAN UNIVERSITY	BS 6/89		BOSTON UNIVERSITY	MA 9/92	3.9	V660 Q790 A770	627	MATLS & DEVICES	F					
78	CHEN, Xinyao	MSEE+PHD	TSINGHUA UNIV., CHINA	BENGR. 7/9	3.07				V610 Q800 A770	600	CONTROL SYSTEMS	F					
79	CHEN, YANYANG	MSEE+PHD	WUHAN UNIVERSITY, CHINA	BS 7/91					V490 Q750 A720	613	COMM. & SIGN. PROC	F					
80	CHEN, Yi-Peng	MSEE+PHD	NATL TSING HUA UNIV.	BS 6/91	3.12				V330 Q800 A580	573	COMM & SIGNAL PRO	F	R				
81	CHEN, Yu-Kai	MSEE	NAT'L CHIAO TUNG UNIV.	BS 6/92	2.9				V430 Q800 A590	ND	COMMUNICATIONS	F					
82	CHEN, Yuewu	MSEE+PHD	PEKING UNIVERSITY	BS 7/91	2.99				V510 Q800 A700	637	ELEC. & COMPUTERS	F	R				
83	CHEN, YUNG-SHUN	MSEE	NAT'L TSING HUA UNIVERSITY	BS 6/89					V360 Q790 A640		MATLS & DEVICES	F					

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6												F/C		C	TA		
7	NAME	PROG	UNIVERSITY	UG DEG	GPA	UNIVERSITY	G. DEG.	GPA	GRE	TFL	AREA OF INTEREST	M/Fe	A/R	NC	RA	FELL	REMARKS
84	CHEN, ZHAOHUI	PHD	UNIV. OF SCI. & TECH., CHINA	BE 7/90		U. OF ELECT. SCI. & TECH.	ME 5/93		V550 Q800 A660		COMM. & SIGN. PROC	F					
85	CHENG, Chaocheng	MSEE+PHD	NAT'L CHIAO TUNG UNIVERSITY	BS 6/91	2.93				V510 Q800 A610	587	COMMUNICATIONS	F					
86	CHENG, Che Hung	MSEE	UNIV. OF MANITOBA	BScEE 5/96	3.31						ELEC. & COMP. & CO	F					
87	CHENG, Chuan-Cheng	MSEE	NATL TAIWAN UNIV., TAIWAN	BS 6/91	3.81				V460 Q800 A710	543		F					
88	CHENG, JIA-CHING	PHD	TATUNG INSTIT. OF TECH.	BS 6/87		TATUNG INSTIT. OF TECH.	MS 6/89		V440 Q800 A600	587	COMM. & SIGN.PROC.	F					
89	CHHAYA, HARSHAL	MSEE+PHD	VJTI, UNIVERSITY OF BOMBAY	BE 6/93					V740 Q770 A800	677	COMM. & SIGN. PROC	F					
90	CHIANG, Wen-Lung	PHD	NATIONAL TAIWAN UNIV.	BS 6/86	3.72	PACE UNIVERSITY	MS 6/92		V430 Q800 A650	EX	COMPUTER ENGINEERI	F					
91	CHIEN, Jong Chih	PHD	SEATTLE UNIVERSITY	BSEE 12/88	3.56	PURDUE UNIV. - W. LAFAYETTE	MSEE 12/90	3.3	V600 Q780 A700	EX	NETWORKING	F	R				
92	CHITRE, MONICA	MSEE+PHD	BOMBAY UNIVERSITY	BSEE 8/93					V590 Q780 A770	653	ELEC. & COMPUTERS	F					
93	CHIU, Chao-Chih	MSEE+PHD	NATL CHENG KUNG UNIV.	BS 6/91	3.25				V460 Q760 A640	583	IC DESIGN	F					
94	CHOI, Byung	MSEE+PHD	U. OF MASSACHUSETTS	BSEE 5/93	3.5				V340 Q650 A530	EX	COMM & SIGNAL PRO	C	R				
95	CHOI, MUNSEORK	PHD	KOREA UNIVERSITY	BE 2/86		UNIVERSITY OF FLORIDA	MS 8/90	3.42	V490 Q790 A500	593	MATLS & DEVICES	F					
96	CHOU, ANGELA	MSEE	UNIV. OF BRITISH COLUMBIA	BASc 5/93					V410 Q690 A500	EX	COMM. & SIGN. PROC	F					
97	CHOU, Chuen-Huei	MSEE+PHD	NATL TSING HUA UNIV, TAIWAN	BS 6/91	3.1				V430 Q800 A690	613	COMM & SIGN PROC	F					
98	CHOY, Alan Pui Yin	PHD+MSEE	CHINESE UNIVERSITY, HONG KONG	BENGR 5/93	3.47				V440 Q780 A600	590	COMMUNICATIONS	F					
99	CHU, Kwok-Hin	MSEE	UTAH STATE UNIVERSITY	BSc 8/93	3.43					EX	COMMUNICATIONS	F					
100	CHUANG, SHU-CHUAN	MSEE	CHINESE CULTURE UNIVERSITY	BS 6/90					V330 Q780 A720		COMM. & SIGN. PROC	F					
101	CHUNG, KRISTINE	MSEE	UNIVERSITY OF WASHINGTON	BSEE 3/88	3.41				V350 Q720 A650	EX	COMM. & SIGN. PROC	C/M					
102	CHUNG, Vincent	MSEE+PHD	UNIV. OF WA.	BSEE 6/89	3.46				V430 Q800 A680	EX	MULTIMEDIA	PR					
103	CONG, Shan	PHD	NW POLYTECH, CHINA	BS 4/91		NW POLYTECH, CHINA	MS 1/91	3.47	V510 Q790 A680	643	CONTROL SYSTEMS	F					
104	CONNORS, Dennis	MSEE+PHD	SAN JOSE STATE UNIVERSITY	BS 12/92	3.2				V510 Q750 A690	EX	COMM. & SIGN.PROC.	C					
105	COURSE, DAN	MSEE+PHD	TULANE UNIVERSITY	BS 5/93	3.25				V410 Q730 A530	EX	COMMUNICATIONS	C					
106	CRADOCK, STEPHEN	MSEE+PHD	UNIV. COLLEGE DUBLIN, IRELAND	BE 6/93					V480 Q690 A670	EX	CONTROL SYSTEMS	F					
107	CRAIG, Mark	MSEE	UNIV. OF TEXAS, EL PASO	BSEE 5/93	3.98				V490 Q690 A610	EX	SOLID STATE ELECTR	C	A		TA		
108	DAOURA, Marc	MSEE+PHD	UNIVERSITY OF WASHINGTON	BSEE 6/93	3.34				V300 Q570 A370	EX	ROBOTICS	F					
109	DAS, DEBALEENA	MSEE+PHD	INDIAN INST. OF TECHNOLOGY	BTECH 8/93					V750 Q780 A800	670	MATLS & DEVICES	F					
110	DAS, KALLOL KUMAR	MSEE+PHD	INDIAN INST. OF TECHNOLOGY	BTECH							ENERGY SYSTEMS	F					
111	DASH, SUBRAT	MSEE+PHD	SAMBALPUR UNIVERSITY	BSE 8/89							ELEC. & COMPUTERS	F					
112	DE, DEBJANI	MSEE+PHD	LADY BRABOURNE COLLEGE	BS 9/89		U. COLLEGE OF TECHNOLOGY	BTECH 2/93		V570 Q730 A460		COMM. & SIGN. PROC	F					
113	DELGADO, LISTER	MSEE+PHD	BROWN UNIVERSITY	BS 5/93					V500 Q700 A630	EX	ELEC. & COMPUTERS	F					
114	DENG, Qi	PHD	PEKING UNIVERSITY	BS 7/91	3.47	UNIV. OF CINCINNATI	MS 7/93			EX		F					
115	DETLOFF, ROGER	MSEE	U. MICHIGAN - DEARBORN	BSEE 8/93	3.37				V500 Q520 A510	EX	SIGNAL PROCESSING	C					
116	DEVGAN, AMAN	MSEE+PHD	BELHI INST. OF TECHNOLOGY	BE 6/93					V660 Q800 A720	677	ELEC. & COMPUTERS	F					
117	DEWYSACKE, Glenn	MSEE+PHD	SEATTLE, UNIVERSITY	BS 6/93	3.95				V460 Q690 A610	EX	SIGNAL/IMAGE PROC.	C					
118	DEY, Joyoni	PHD	JADAVPUR UNIVERSITY, INDIA	BEE 6/91		U. OF SASKATCHEWAN	MS 8/93	3.66	V590 Q730 A680	653	COMM & SIGNAL PRO	FFe					
119	DEY, SUBHRAKANTI	PHD	INDIAN INST. OF TECHNOLOGY	BTECH 8/91		INDIAN INST. OF TECH.	MTECH 8/93		V590 Q800 A780	637	SIGNAL PROCESSING	F					
120	DHILLON, Navdeep	MSEE+PHD	ILLINOIS INSTITUTE OF TECH.	BSEE 5/93	3.5				V400 Q600 A490	EX	COMM & SIGNAL PRO	CM					
121	DONG, Yuan	MSEE+PHD	TIANJIN UNIVERSITY	BS 7/92	3.62				V340 Q750 A670	577	COMM & SIGNAL PRO	F					

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122	DORTA, ANTONIO	MSEE	UNIVERSITY OF WASHINGTON	BSEE 6/93	2.93				V350 Q520 A450	EX	ELEC. & COMPUTERS	F					
123	DRISCOLL, DAVID	MSEE+PHD	CORNELL UNIVERSITY	BA 5/93	3.3				V570 Q720 A640	EX	OPTICS	C					
124	DUAN, CHAO	MSEE+PHD	XI'AN JIATONG UNIVERSITY	BSEE 7/84					V470 Q790 A700		CONTROL SYSTEMS	F					
125	DUNG, LAN-RONG	PHD	FENG CHIA UNIVERSITY	BE 6/88		NAT'L CHIAO TUNG UNIV.	MS 6/90	3.36	V370 Q800 A730	557	ELEC. & COMPUTERS	F					
126	EGGEN, TRYM	PHD	NORWEGIAN INST. OF TECH.	GRAD12/87	3.95						COMM. & SIGN. PROC	F					
127	EHSAN, Khwaja Habib	MSEE+PHD	BANGLADESH U. OF ENGR&TECH	BSEE 9/92							COMM & SIGNAL PRO	F					
128	ELAHI, BIJAN	MSEE-TIE	IOWA STATE UNIVERSITY	BS 5/80	3.5				V430 Q810 A570	EX		C					
129	ENGEBRETSON, Kent	MSEE	U.S. AIRFORCE ACADEMY	BSEE	3.74				V650 Q770 A790	EX	COMM & SIGN PROC	C					HAS GOVT FUNDG
130	FAHRIOGLU, Murat	MSEE+PHD	MICHIGAN STATE UNIVERSITY	BS 5/93	3.79				V320 Q700 A650	EX	CONTROL SYSTEMS	F					
131	FAROUGHI, ARMIN	PHD	U.C. SANTA BARBARA	BS 6/90	3.25	U. OF CA., SANTA BARBARA	MS 12/92	3.36	V370 Q740 A520	577	COMP. ARCHITECTUR	F					
132	FENG, YUEPENG	PHD	ZHONGSHAN UNIVERSITY	BS 7/90		ZHONGSHAN UNIVERSITY	MS 7/93				ELEC. & COMPUTERS	F					
133	FENG, ZHONGYANG	PHD	NANJING UNIVERSITY, P.R.C.	BS 7/90					V580 Q790 A730	620	ELEC. & COMPUTERS	F					
134	FISCHER, MARK	MSEE	WASHINGTON STATE UNIV.	BSEE 5/92	2.8				V400 Q610 A540	EX	ELEC. & COMPUTERS	C					
135	FLYNN, PAUL	MSEE	UNIVERSITY OF DALLAS	BS 6/93	3.45				V680 Q680 A610	EX	CONTROL SYSTEMS	C					
136	FRIEFELD, ANDREW	PHD	UNIV. OF CA., SAN DIEGO	BSEE 6/90	2.9	C.S.U., CHICO	MSEE 5/93	3.74	V640 Q740 A720	EX	CONTROL SYSTEMS	C					
137	FU, Lei	PHD	PEKING UNIVERSITY	BS 7/90		ACADEMIA SINICA,GRAD SCHL	MS 6/93	3.86	V560 Q800 A770	620	SIGNAL PROCESSING	F	A				
138	FUKUDA, Mumehiro	PHD	U. OF TSUKUBA	BE 3/86		U. OF TSUKUBA	MS 3/88	3.49	V290 Q740 A520	557	ELEC. & COMPUTERS	F					
139	FUNG, SALLY	MSEE	UNIVERSITY OF TEXAS, AUSTIN	BSEE 12/92	3.4				V640 Q750 A650	EX	ELEC. & COMPUTERS	C/M					
140	GAO, Jingling	PHD	UNIV. OF SCIENCE& TECH/CHINA	BS 9/84	3.9				V340 Q730 A610	627	COMM & SIGNAL PRO	F					
141	GASMI, CHIRAZ	MSEE	FLORIDA INTL UNIVERSITY	BS 4/90	3.23					EX							
142	GEORGE, ANNIE	PHD	UNIVERSITYOF MADRAS	BE 1/91		UNIV. OF WOLLONGONG	ME 6/93		V570 Q560 A580	677	COMM. & SIGN. PROC	F					
143	GEORGE, Eric	MSEE	OHIO STATE UNIVERSITY	BSEE 6/91	3.4	CLEVELAND STATE			V530 Q740 A720	EX	SIGNAL PROCESSING	C					
144	GHADIALI, Muffaddal	MSEE+PHD	UNIVERSITY OF BOMBAY	BE ELCTNCS	3					ND	COMPUTER ARCHITEC	F					
145	GHOSH, Debnath	MSEE+PHD	IIT--KHARAGPUR, INDIA	BTECH 6/92	3.92				V650 Q790 A760	613	ART. NEURAL NETWO	F	A				
146	GHOSH, SUDESHNA	MSEE+PHD	JOHNS HOPKINS UNIVERSITY	BA/PSYCH	2.88	JOHNS HOPKINS UNIVERSITY	BSEE 5/93	2.86		EX	ELEC. & COMPUTERS	C					
147	GIBESCU, MADELEINE	MSEE+PHD	BUCHAREST POLYTECHNIC IST.	BS 6/93	4				V630 Q750 A620	640	ENERGY SYSTEMS	FFe					
148	GONG, Yi	MSEE+PHD	SOUTHWEST JIAOTONG UNIV.	BS 7/91	3.27				V530 A780 A690	617	CONTROL SYSTEMS	F					
149	GONG, Ying	MSEE	OHIO STATE UNIVERSITY	BSEE 3/93	3.3						DIGITAL, COMPUTERS	F	R				
150	GOVIND, GIRYA	MSEE+PHD	VASAVI COLLEGE OF ENGR.						V510 Q790 A520	583	ELEC. & COMPUTERS	F					
151	GRAY, Brian Edward	MSEE+PHD	NEW MEXICO STATE U.	BS 7/92	3.68				V470 Q670 A500	EX	ELECTROMAGNETICS	C					
152	GREIVELL, NANCY	MSEE+PHD	UNIVERSITY OF WISCONSIN	BS 8/82	3.48	UNIVERSITY OF WA.	BSEE 6/93	3.89	V490 Q680 A640	EX	BIOROBOTICS	C					
153	GRIBBLE, WILLIAM	MSEE+PHD	HARVEY MUDD COLLEGE	BSE 5/93	3.1				V770 Q800 A800	EX	ELEC. & COMPUTERS	C					
154	GRUBER, Michael	MSEE+PHD	GONZAGA UNIV.	BSEE 5/93	3.92				V720 Q790 A770	EX	CONTROL SYSTEMS	C	A		TA		
155	GUESS, Brent	MSEE	TEXAS TECH. UNIVERSITY	BSEE 5/93	3.76				V540 Q780 A650	EX	COMM & IMAGING	C	A		TA		
156	GUI, Xiang	MSEE+PHD	SHANGHAI JIAO TONG U., CHINA	BS 7/91	3.42					ND	ENERGY SYSTEMS	F					
157	GUILLAUME, BRADY	PHD	HARVEY MUDD COLLEGE	BS 5/86	2.52	CA. STATE. UNIV., L.A.	MS 6/93	3.5	V640 Q780 A740	EX	COMM. & SIGN. PROC	C					
158	GURBUZ, YASAR	PHD	ERCIYES UNIVERSITY	BSEE		VANDERBILT UNIVERSITY	MSEE 6/93	3.12		EX	MATLS & DEVICES	F					
159	GUTTIKONDA, R.	MSEE+PHD									ENERGY SYSTEMS	F					

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160	HABAN, Scott	MSEE+PHD	U. OF CINCINNATI	BSEE 6/93	3.58				V720 Q720 A710	EX	COMP. ARCH./VLSI	C	A				
161	HADDADIN, OSAMA	PHD	UNIVERSITY OF UTAH	BSEE 6/90	3.54	UNIVERSITY OF UTAH	MSEE 8/92	3.85	V360 Q800 A650	EX	COMM. & SIGN. PROC	F					
162	HAN, Gang	PHD	BEIJING U. OF POSTS & TELECM	BE 7/89		BEIJING U. OF POSTS & TELEC	ME 4/92		V460 Q800 A720		COMM & SIGNAL PRO	F					
163	HAN, HYOIL	PHD	KOREA UNIVERSITY	BE 2/84		KOREA INST. OF SCI. & TECH.	MS 2/89		V450 Q770 A560	600	ELEC. & COMPUTERS	F					
164	HAN, SONG	PHD	TSINGHUA UNIVERSITY	BE 7/86					V480 Q790 A630		IMAGE PROCESSING	F					
165	HAN, Te-Wei	PHD	NAT'L CHIAO-TUNG U., TAIWAN	BS 6/89		NAT'L CHIAO-TUNG U., TAIWA	MS 6/91	3.58		613	COMPUTER SYSTEMS	F					
166	HANSON, Aaron	MSEE	OREGON STATE UNIVERSITY	BSEE 6/87							COMM & SIGNAL PRO	C					
167	HAROON, RASHEED	PHD	REG'L ENGR. COLLEGE, INDIA	BTECH 12/9		REG'L ENGR. COLLEGE, INDIA	MTECH 12/9				ELEC. & COMPUTERS	F					
168	HASHTRUDI ZAD, S.	MSEE+PHD	SHARIF U. OF TECHNOLOGY	BS 2/89		SHARIF U. OF TECHNOLOGY	MS 6/91		V450 Q780 A640	610	CONTROL SYSTEMS	F					
169	HAYTON, ERIC	MSEE+PHD	U.C. BERKELEY	BS 12/92	3.55				V590 Q690 A630	EX	QUANTUM ELEC.	C					
170	HE, Ziqiang	PHD	WUHAN UNIVERSITY, CHINA	BS 7/85		WUHAN UNIVERSITY, HUBEI	MS 9/88	3.54	V520 Q740 A630	607	COMM & SIGNAL PRO	F					
171	HO, CHUNG MAN	PHD	VIRGINIA TECH.	BSEE 5/91		VIRGINIA TECH.	MSEE 5/93	3.81	V390 Q800 A680	EX	COMM. & SIGN. PROC	F					
172	HO, Grace	MSEE+PHD	STANFORD UNIVERSITY	BSEE 6/90	3.3				V660 Q740 A550	EX	COMPUTER ENGINEERI	C					
173	HO, Hon-Chong	PHD	JOHNS HOPKINS UNIVERSITY	BS 12/92	3.83				V550 Q760 A640	EX	IMAGE & SIGNAL PRO	F	A				
174	HOLZRICHTER, Michael	MSEE+PHD	COLORADO SCHL OF MINES	BS 12/86	3.72	GEOPHYSICAL ENGR	BS 12/86	3.72	V690 Q800 A710	EX	SIGNAL PROC	C					
175	HONG, Min-Cheol	PHD	YONSEI UNIVERSITY	BS 2/88		YONSEI, UNIVERSITY	MS 8/90		V490 Q790 A610	560	IMAGE PROCG	F					
176	HONG, MINGGUO	PHD	TSINGHUA UNIV., CHINA	BS 7/91	2.68	UNIV. OF MINNESOTA	MS 5/93	3.93	V450 Q770 A530	EX	ENERGY SYSTEMS	F					
177	HOOSEIN, Mazher	MSEE+PHD	CLARKSON COLL., NY	BSEE 5/93	3				V420 Q570 A510	EX	OPTICS/COMMUNICAT	F	R				
178	HOYER, Gregg	PHD	MICHIGAN TECH. UNIVERSITY	BS 11/92	4				V580 Q740 A670	EX	CONTROLS	C	A				
179	HSIA, Hsing-Kuo	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91	2.81				V480 Q790 A590	607	SOLID STATE	F					
180	HSIA, UING-HUI	MSEE+PHD	NAT'L CENTRAL UNIV., TAIWAN	NS 6/92	3.46				V360 Q790 A680	560	COMMUNICATIONS	F					
181	HSIANG, Shih-Ta	MSEE+PHD	NAT'L CHENG-KUNG UNIV.	BS 6/91	2.82				V510 Q780 A750	580	COMMUNICATIONS &	F					
182	HSIEH, Kaung-Yeu	MSEE+PHD	NAT'L CHENG KUNG UNIV.	BS 6/90						577	SIGNAL PROCG	F					
183	HSU, Chi-Feng	PHD	NAT'L CHIAO TUNG UNIV., TAIWA	BS 6/90	3.44	RUTGERS UNIVERSITY	MS 5/92	3.43	V320 Q780 A730	EX	TELECOMM.	F					
184	HSU, Nai-Jen	MSEE	UNIV. OF CALIF., SAN DIEGO	BS 6/93	3.04						COMPUTER ENGRG	F					
185	HSU, PEI-EN PAMELA	PHD	CHUNG-YUAN CHRISTIAN U.	BS 6/87	3.56	KANSAS STATE UNIV.	MS 5/92	3.6	V340 Q790 A650	EX	COMPUTER VISION	F					
186	HSU, Shun-Hsin	MSEE+PHD	FENG-CHIA UNIVERSITY	BS 7/90					V290 Q770 A600		MATERIALS AND DEVI	F					
187	HU, Chunyang	MSEE+PHD	BEIJING UNION UNIV., CHINA	BS 7/85		BEIJING UNION UNIV., CHINA	MENR 7/88	3.62	V480 Q760 A600	590	OPTOELECTRONICS/ D	F					
188	HU, Hsiang-Wen	MSEE+PHD	NATL CHENG KUNG UNIV.	BS 6/88		CASE WESTERN UNIV.	MS 5/93		V490 Q800 A750		COMM & SIGN PROC	F					HWANG INTERESTED
189	HU, Xiao Ming	MSEE+PHD	JIANGXI POLYTECHNIC UNIV.	BS 6/89		UNIVERSITY OF MARYLAND	MS 93		V590 Q800 A650		MACH. VIS. & SIGNAL	F					
190	HUANG, Chien-Yuan	PHD	NAT'L TAIWAN UNIVERSITY	BSE 6/98		NAT'L TAIWAN UNIVERSITY	MSE 6/91	3.43	V500 Q780 A580	600	COMM. & COMP. ENG	F					
191	HUANG, Jiantao	MSEE+PHD	TSINGHUA UNIV.	BE 7/90		CHINESE ACAD. OF SCIENS	MS 7/93		V530 Q800 A640	607	ELEC. MATLS/DEVS	F					
192	HUANG, Leibing	MSEE+PHD	UNIV.SCI.&TECH., CHINA	BS 6/90		UNIV. OF ALASKA		3.5	V330 Q780 A670	560	ELECTROMAGNETICS	F					
193	HUANG, Pao-Lu	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/89	2.77				V390 Q800 A760	ND	SOLID STATE ELECTR	F					
194	HUANG, Ying	PHD	SHANGHAI U. OF TECHNOLOGY	MS 6/87	3.76	CLEMSON UNIVERSITY	MS 5/93	4	V530 Q750 A610	EX	CONTROL SYSTEMS	F					
195	HUANG, YUAN-RU	MSEE	SOOCHOW UNIVERSITY	BS 6/90					V400 Q780 A620	590	MATLS & DEVICES	F					
196	HUI, Poming Alex	PHD	UNIVERSITY OF WINDSOR	BaSc 6/84	3.92	OKLAHOMA ST. UNIVERSITY	MS 12/91	3.9	V410 Q790 A600	EX	ELEC. & COMPUTERS	F					
197	HWANG, Being-Yuh	PHD	NAT'L CHENG KUNG UNIV.	BSEE 6/85		NAT'L CHENG KUNG UNIVER.	MSEE 6/87	2.73	V420 Q800 A600	560	COMPUTERS	F					

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7	NAME	PROG	UNIVERSITY	UG DEG	GPA	UNIVERSITY	G. DEG.	GPA	GRE	TFL	AREA OF INTEREST	M/Fe	A/R	NC	RA	FELL	REMARKS
198	HWANG, Yi-Ren W.	MSEE+PHD	NAT'L SUN YAT-SEN UNIV.	BSEE 6/90	3.74				V410 Q740 A600	633	OPTICS	F					
199	IMAM, NEENA	PHD	OHIO WESLEYAN UNIVERSITY	BA 4/92	3.73	CALIF. INST. OF TECH.	BS 6/93	3	V720 Q730 A730	EX	COMM. & SIGN. PROC	FFe					
200	IP, GORDON	MSEE	UNIVERSITY OF WASHINGTON	BSCE 6/93	3.63				V360 Q740 A560	EX	NEURAL NETWORKS	F					
201	ISHIDA, HIDEYOSHI	MSEE	KYOTO UNIVERSITY	BE 3/87		KYOTO UNIV., GRAD. SCHL	ME 3/89		V360 Q770 A550		ELEC. & COMPUTERS	F					
202	JANTZ, Steven	MSEE	U.S. AIRFORCE ACADEMY	BSEE	3.78				V570 Q800 A790	EX	IMAGING SYSTEMS	C					HAS GOVT FUNDG
203	JASKA, Esko	PHD	CORNELL UNIVERSITY	BS 5/87	3	CORNELL UNIVERSITY	ME 5/88	3.1	V650 Q800 A800	EX	ELECTROMAGNETICS	C	H				
204	JAZRAWI, WISSAM	PHD	UNIVERSITY COLLEGE DUBLIN	BE 6/93					V460 Q690 A550	EX	MATLS & DEVICES	F					
205	JI, Hanbing	PHD	SHANGHAI JIAO TONG UNIV.	BS 7/86		SHANGHAI JIAO TONG U. CHI	MSE 1/89	3.56		ND	NEURAL NETWORKS	F					
206	JIANG, HONG	PHD	U. OF SCI. & TECH. OF CHINA	BE 7/86		DARTMOUTH COLLEGE	MS 6/92		V420 Q770 A790	627	COMM. & SIGN.PROC.	F					
207	JIANG, Ning	MSEE+PHD	ARIZONA STATE UNIVERSITY	BSE 12/92	3.68				V440 Q720 A530	TSE	ACOUSTICS & ULTRA	F					
208	JIN, TAO	PHD	UNIV. OF SCI. & TECH., CHINA	BSEE 7/90		UNIV. OF MARYLAND	MS 5/93	3.52	V450 Q770 A670	EX	ELECTROMAGNETICS	F					
209	JOHNSON, MORGAN	MSEE+PHD	GEORGIA INST. OF TECH.	BSEE 6/93	3.4				V540 Q780 A690	EX	CONTROL SYSTEMS	C					
210	JONES, Dennis	MSEE	UNIVERSITY OF WASHINGTON	BS 12/77	3.14	UNIVERSITY OF WASHINGTON	BSEE 12/78	2.79	V570 Q610 A540	EX	MEDICAL INSTRUM.	C					
211	JONES, Robert	MSEE+PHD	BRIGHAM YOUNG UNIV.	BS 4/93	3.98				V660 Q790 A800	EX	COMPUTER ENGRG	C	A		TA	COLL	BOEING FELL $4000
212	JUAN, CHUAN-PING	MSEE+PHD	CHUNG YUAN CHRISTIAN U.	BS 6/88		NAT'L CHENG KUNG UNIV.	MS 6/91				COMM. & SIGN. PROC	F					
213	JUN, Yan	PHD	ZHEJIANG UNIVERSITY	BA 7/90		UNIVERSITY OF MISSISSIPPI	MS 12/92	4		EX	ELEC. & COMPUTERS	F					
214	JUWONO, IGOR	MSEE+PHD	BANDUNG INST. OF TECH.						V400 Q780 A580	580	IMAGE PROCESSING	F					
215	KALAVADE, Arundhati	PHD	GOV'T COLLEGE OF ENGR.,INDIA	BENGR 7/93	3.5				V600 Q800 A680	670	SIGNAL PROCESSING	F	A				
216	KANE, Laura	MSEE	VILLANOVA	BEE 5/93	3.58				V490 Q670 A600	EX	COMMUNICATIONS	CFe					
217	KANG, Porlin	MSEE+PHD	UNIVERSITY OF WASHINGTON	BSEE 6/93	3.9				V580 Q740 A780	EX	COMM. & SIGN. PROC	F					
218	KARIM, Zia Ul	MSEE+PHD	UNIV. OF ILLINOIS, URBANA	BSEE 8/89	3.4				V420 Q750 A520	EX	COMPUTER ENGINEERI	C					
219	KARIMILI, Yasmin	MSEE	UNIVERSITY OF WASHINGTON	BSEE 6/93	3.13				V360 Q740 A620	EX	ELECTROMAGNETISM	F					
220	KASATKIN, Dmitriy	MSEE+PHD	MOSCOW AVIATION INSTITUTE	BS 3/93	3.5				V400 Q640 A570	623	ENERGY SYSTEMS	F					
221	KERNS, Kevin	MSEE+PHD	US AIRFORCE ACADEMY, CO.	BS 6/88	3.67				V590 Q760 A710	EX	ELEC. & COMPUTERS	C	A		TA		
222	KHANTOUCHE, LEYTH	MSEE+PHD	PENN STATE UNIVERSITY	BS 5/93	3.43				V280 Q690 A530	560	SIGN. PROCESSING	F					
223	KHEMKA, Vishnu K.	MSEE+PHD	BIRLA INSTITUTE OF TECH.	BE 5/92	3.96				V540 Q800 A800	647	MATLS & DEVICES	F					
224	KIM, Jae-Young	PHD	YONSEI UNIVERSITY, KOREA	BS 2/86		KAIST, KOREA	MS 2/88	3.04	V410 Q780 A250	590	COMMUNICATIONS	F					
225	KIM, JeongKeun	PHD	YONSEI UNIVERSITY	BS 2/90		YONSEI UNIVERSITY	MS 2/92	3.35	V550 Q790 A510	587	ELEC. & COMPUTERS	F	R				
226	KIM, Joohan	MSEE+PHD	YONSEI UNIVERSITY, KOREA	BSEE 2/93					V450 Q770 A600		CAD/VLSI	F					
227	KLEINE, Stephan	MSEE+PHD	UNIV. OF NEBRASKA-OHMAHA	BET 5/93	3.72				V580 Q740 A730	EX	VLSI DESIGN	C	A		TA		
228	KOALA, Bertin	MSEE+PHD	UNIVERSITY OF WASHINGTON	BSEE 6/93	3.25				V460 Q620 A480		ENERGY SYSTEMS	M					GTE?
229	KOMIYA, Masato	MSEE	SOPHIA UNIV., TOKYO	B.ENGR. 3/8	3.52				V430 Q800 A520	643	POWER ELECTRONICS	F	A				
230	KOSCHORECK, Kevin	MSEE+PHD	UNIV. OF ILLINOIS (URBANA)	BS 5/93	3.68				V460 Q780 A690	EX	COMP. ARCHITECT.	C					
231	KOTSAS, Panagiotis	MSEE+PHD	ARISTOTELIAN UNIVERSITY	BSc 2/93	3.56				V450 Q750 A650	660	COMM & SIGNAL PRO	F					
232	KRISHNAMURTHY, R.	MSEE+PHD	BHARATHIASAN UNIV., INDIA	BE 4/93	3.59				V580 Q780 A760	ND	POWER SYSTEMS	F					
233	KRISHNASWAMY, M.	MSEE+PHD	UNIVERSITY OF ALBERTA	BS 12/92	3.33				V700 Q720 A680	657	COMM & SIGNAL PRO	F					
234	KU, Shyan	MSEE	MC GILL UNIVERSITY	BENGR 6/89	2.93				V640 Q800 A640	EX	HUMAN-MACH. INTER	PR					
235	KURTZ, DAVID	MSEE+PHD	UNIVERSITY OF VIRGINIA	BS 5/92	3.62				V570 Q740 A730	EX	OPTOELECTRONICS	C					

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236	KWON, Brian	MSEE+PHD	PURDUE UNIV.	BS 5/93	3.28				V470 Q770 A530	EX	COMMUNICATIONS	C					
237	LAHIRI, Ujjwal Kumar	MSEE+PHD	INDIAN INSTIT. OF TECH.	BTECH 8/91	3.7				V680 Q790 A710	677	POWER ELECTRONICS	F					
238	LAI, Wei-Cheng	MSEE+PHD	NAT'L TAIWAN UNIV., TAIWAN	BSE 6/91	3.52				V390 Q800 A670	580	COMPUTER ARCHITEC	F					
239	LAN, Hsueh-Ban	MSEE+PHD	NAT'L TSING HUA UNIVERSITY	BS 6/89		NAT'L TAIWAN UNIVERSITY	MS 6/91	3.45	V490 Q790 A710	563		F					
240	LEE, Byounghee	PHD	YONSEI UNIV., KOREA	BS 2/87		YONSEI UNIV., KOREA	MS 8/89	3.33	V410 Q770 A410	583	ELEC. MATRLS AND D	F	R				
241	LEE, Han-Ho	MSEE+PHD	CHUNGBUK NAT'L UNIV.	BA 2/93	3.08				V420 Q790 A270	577	DIGITAL SYSTEM	F	R				
242	LEE, Joon-Yong	MSEE+PHD	HONG-IK UNIVERSITY	BS 2/93	3.83				V380 Q760 A440	603	COMMUNICATIONS	F	R				
243	LEE, TEIK-MENG	MSEE+PHD	DENISON UNIVERSITY	BS 5/93	3.85				V550 Q760 A670	617	ELECTROMAGNETICS	F					
244	LEE, Yeeli	MSEE+PHD	WASHINGTON UNIVERSITY(MO)	BS 5/93							SIGN. PROC. & CONTR	F					
245	LEE, Yeeli	MSEE+PHD	WASHINGTON UNIVERSITY	BS 5/93	3.43				V460 Q750 A580	EX	SIGNAL PROCESSING	F					
246	LEWIS, Timothy	MSEE	UNIV. OF CALIF. DAVIS	BSEE 9/87	3.33				V470 Q760 A710	EX	ELECTRIC POWER	C					
247	LI, Bi-Lung	MSEE+PHD	NAT'L CHIAO TUNG UNIV.	BS 6/91	3.9				V510 Q770 A660	603	CONTROL SYS. & CIR	F	A				
248	LI, Chi-Chih	MSEE	NAT'L TSING HUA UNIVERSITY	BS 6/91	3.36				V460 Q800 A730	547	COMM & NEURAL NET	F					
249	LI, Hsiang-ling	PHD	NAT'L TAIWAN UNIVERSITY	BSEE 6/87	3.78	ARIZONA STATE UNIVERSITY	MSEE 5/90	3.82	V400 Q780 A670	EX	INTEG. SYSTEMS	F					
250	LI, Xiaodong	PHD	TSINGHUA UNIVERSITY	BENGR 7/90		SHANGHAI JIAOTONG UNIV.	MSE 7/92	3.94	V600 Q800 A800	643	COMM & SIGNAL PRO	F	A		TA		
251	LI, XIAOQUING	PHD	XIDIAN UNIVERSITY	BS 7/90		XI'AN JIATONG UNIVERSITY	MS 7/93	3.34	V410 Q780 A730	580	IMAGING & SIGNAL PR	F	A		TA		
252	LI, Yanbing	MSEE+PHD	TSINGHUA UNIV., CHINA	BS 7/92	3.15				V660 Q800 A790	ND	CONTROL SYSTEMS	F					
253	LI, ZHAOHONG	MSEE+PHD	CALIFORNIA INST. OF TECH.	BSEE6/91	3.7				V460 Q790 A610	EX	COMP. NETWORKS	F					
254	LIAO, Hui-Ya	MSEE	NAT'L CHIAO TUNG U., TAIWAN	BS 6/91	3.06				V450 Q790 A730	643	SIGNAL PROCESSING	F					
255	LIN, Chih-Mei	PHD	NAT'L TAIWAN UNIVERSITY	BS 6/92	3.39				V470 Q740 A590	593	ELEC. & COMPUTERS	F					
256	LIN, Liang-Chih	MSEE+PHD	FENG-CHA UNIVERSITY	BS 6/89	2.39				V350 Q770 A620	550	MATERIALS & DEVICE	F					
257	LIN, MENG-WEI	PHD	NAT'L TAIWAN UNIVERSITY	BS 6/88	3.47	U. OF SOUTHERN CAL.	MS 5/93	3.92	V370 Q800 A630	EX	ELEC. & COMPUTERS	F					
258	LIN, Shih-Yuan	PHD									COMM & SIGNAL PRO	F					
259	LIN, Yu-Mei	MSEE	NAT'L TAIWAN UNIVERSITY	BS 6/93	3.43				V510 Q800 A640	580	COMMUNICATION SY	F					
260	LIN, Yun-Ting	PHD	NAT'L TAIWAN UNIVERSITY	BSE 6/92	3.6				V510 Q800 A710	637	CAD/VLSI, DSP IN VLS	F	A				
261	LIN, Yung-Cheng	MSEE+PHD	CHUNG YUAN CHRISTIAN U.	BSMEE 6/86							COMP. ENGR. AND VL	F					
262	LINDSEY, DENNIS	MSEE	ORGEON STATE UNIVERSITY	BSEE 6/88	3.01				V470 Q710 A600	EX	ELEC. & COMPUTERS	C					
263	LIOU, Yuei-An	PHD	NAT'L SUN YAT-SEN UNIV.	BS 6/87	3.35	U MICHIGAN - ANN ARBOR	MSE 5/93	3.65	V410 Q800 A600	EX	ELECTROMAGNETICS	F	R				
264	LIU, Chung-Ho	MSEE+PHD	TSINGHUA UNIVERSITY	BS 6/90	3.24				V510 Q780 A700	ND	SIGNAL PROCESSING	F					
265	LIU, Henley	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91	3.21				V510 Q770 A730	627	OPTICS	F					
266	LIU, Hong	PHD	TSINGHUA UNIV., BEIJING	BE 7/90		GRAD. SCHL ACADEMIA SINICA	MS 7/93	3.86	V550 Q800 A690	603	SIGNAL PROCESSING	F	A				
267	LIU, Peng	MSEE	DLAIAN UNIV. OF TECHNOLOGY	BS 7/92						597	ELEC. & COMPUTERS	F					
268	LIU, Qingchong	PHD	PEKING UNIV	BS 7/90		PEKING	MS 7/93	3.22	V500 Q790 A610	EX	COMPUTERS	F					MS 5/93 NEW MEX 4.
269	LO, CHIEN-CHUNG	MSEE+PHD	NAT'L CHENG KUNG UNIV.	BS 6/90	3.34				V380 Q800 A570	613	COMM. & SIGN. PROC	F					
270	LO, Chien-Chung	MSEE+PHD	NATL CHENG KING	BS 6/90	3.34				V380 Q800 A570	613	SIGNAL PROCG	F					
271	LOH, Arthur	PHD	PURDUE UNIVERSITY	BSEE 5/92	3.07	PURDUE UNIVERSITY	MSEE 8/93		V460 Q800 A660	EX	SIGNAL PROCESSING	C					
272	LONG, Christopher	MSEE+PHD	UNIV. OF CALIF., LA	BS 6/93	3.84				V790 Q780 A750	EX	VIRTUAL ENVIRON.	C	A		TA		
273	LOPEZ, Richard	MSEE+PHD	NATIONAL UNIV. OF MEXICO	BS 75		OREGON STATE UNIVERSITY	MS 85				COMM & NEURAL NET						

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274	LOTLIKAR, Rohit	MSEE+PHD	INDIAN INST. OF TECH., BOMBAY	BTECH 5/93					V510 Q750 A620	630	ROBOTICS AND CONT	F					
275	LOU, Xiaoying	PHD	UNIV OF SCI & TECH, CHINA	BENGR 7/91		UNIV OF SCI & TECH, CHINA	MENGR 7/93	3.64	V460 Q800 A600	607	COMM & SIGNAL PRO	F	H				
276	LU, Shen	MSEE+PHD	TIANJIN UNIV., CHINA	BS 7/90	2.9				V420 Q790 A720	627	COMM & SIGNAL PRO	F					
277	LUI, Cheuk Kwan	MSEE	CALIFORNIA STATE U., FRESNO	BS 12/91	3.44				V350 Q770 A450	EX	COMM & SIGNAL PRO	F	R				
278	LUI, QINGCHONG	PHD	PEKING UNIVERSITY, CHINA	BS 7/90	3.22	NEW MEXICO STATE U.	MS 5/93	4	V500 Q790 A610	EX	ELEC. & COMPUTERS	F					
279	LUI, RICHARD H.	MSEE+PHD	NORTHEASTERN UNIV	BS 6/93	3.3				V410 Q720 A550	EX	ELECT. & COMPUTERS	PR					
280	LUI, Richard Hakching	MSEE+PHD	NORTHEASTERN UNIV	BS 6/93	3.3				V410 Q720 A550	EX	ELEC. & COMPUTERS	PR					
281	LUND, Mack	MSEE+PHD	BRIGHAM YOUNG UNIV	BS 8/93	3.97				V670 Q730 A630	EX	ELECTRS OR ENERGY	C	A		TA		
282	LUO, Shanping	PHD	HUAZHONG U. SCIENCE & TECH.	BE 7/82		INSIT. OF EE ACADEMIA SINICA	ME 3/89	3.44	V550 Q740 A630	617	CONTROL SYSTEMS	F					
283	LUO, Siqiang	PHD	HUNAN UNIVERSITY	BSEE 7/85		HUNAN UNIVERSITY	MSEE 5/88		V480 Q780 A510		POWER SYSTEMS	F					
284	LUO, Sy-Shann	MSEE	NAT'L CHIAO TUNG U., TAIWAN	BS 6/92	2.82				V360 Q800 A590	ND	COMM & SIGNAL PRO	F					
285	LUO, Xiaohui	PHD	TSHINGHUA UNIVERSITY	BENGR 7/90	3.56	REMOTE SNSNG APP INS,CHNA	MS 7/93	3.56	V660 Q800 A800	663	IMAGE/SIGNAL PROC	F	A				
286	LUO, Zuning	PHD	HEFEI UNIV. OF TECHNOLOGY	BS 7/85		SHANXI UNIVERSITY	MS 7/88		V790 Q800 A740	613	OPTICS AND MATERIA	F					
287	LYU, Jon Eu	MSEE-PHD	UNIVERSITY OF KANSAS	BS 12/92	3.6				V360 Q680 A390	EX	DIGITAL/VLSI SYS.	F					
288	MA, Chen	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/90					V410 Q800 A680	607	COMM & COMPUTERS	F					
289	MA, Xinyu	PHD	BEIJING UNIVERSITY	BS 7/90	3.47	UNIV. OF NEVADA	MS 5/93	3.8	V610 Q800 A740	EX	SIGNAL PROCESSING	F					
290	MAHATTANAKUL, J.	PHD	KING MONGKUT INSTIT OF TECH	BENG 4/90		FLORIDA INST. OF TECHNOLOG	MSEE 8/92					F					
291	McDORMAN, Doug	MSEE	QUEEN'S UNIV., KINGSTON	BScH 6/90						EX	ELEC. & COMPUTERS	F					
292	MEAGHER, Thomas	PHD	UNIVERSITY OF WASHINGTON	BSEE 3/76	3.87	UNIV. OF WASHINGTON	MSEE 8/81	3.6	V650 Q730 A710	EX	NEURAL NETWORKS	C	H				TO JA/HELMS
293	MELKOTE, Heman	MSEE+PHD	INDIAN INST. OF TECH., MADRAS	BTECH 6/93					V590 Q780 A680		POWER SYSTEMS	F					
294	MENG, Da	MSEE	FLORIDA ATLANTIC UNIV.	BS 5/93	3.72				V320 Q800 A420	EX	COMM & COMPUTERS	F	R				
295	MENGALE, Nitin	MSEE							V540 Q770 A630	613	MICROPROCESSOR AP	F					
296	MILLER-PASSAT, C.	MSEE	UNIV. OF CA. , RIVERSIDE	BSPHYS 6/9	3.88	U.W. TRANSFER - PHYSICS	MS		V500 Q800 A750	EX		C	H				ADMIT ONLY IF RA
297	MILLET, Sami Edmund	MSEE+PHD	SEATTLE UNIVERSITY	BSEE 12/93	3.41				V330 Q650 A450	EX	COMMUNICATION DE	F	R				
298	MONTEIRO, Jose	PHD	INSTITUTO SUPERIOR TECNICO						V510 Q790 A760	670	ELEC. & COMPUTERS	F					
299	MORIMOTO, N.	MSEE	KEIO UNIV., TOKYO	BACHELOR	3.08				V340 Q790 A580		IMAGE PROCESSING	F					
300	MUELLER, Jeffrey	PHD	DUKE UNIV	BSEE 5/88	3.86	UNIV. OF PENNSYLVANIA	MSEE 5/90	3.5	V580 Q740 A550	EX	CONTROL SYSTEMS	C					
301	MUN, KYUNG TAE	MSEE	U. OF TEXAS AT AUSTIN	BSEE 12/89	3.37				V420 Q790 A590	EX	ELEC. & COMPUTERS	C/M					
302	NADADUR, Desika	PHD	SRI VENKATESWARA U., INDIA	BTECH 8/91	3.08	GONZAGA UNIVERSITY	MSEE 5/93	3.5	V510 Q730 A610	EX	COMPUTER VISION	F					SEE HARALICK'S OFF
303	NAJAR, SANTOS	MSEE+PHD	CALIF. POLYTECH	BS 6/93	3				V450 Q570 A390	EX	COMMUNICATIONS	PRM					
304	NARAYAN, Vutrala	MSEE+PHD	INDIAN INST. OF TECH.	BTECH 5/89		INDIAN INST. OF TECH.	ME 4/92				MICROELECTRONICS	F					
305	NAYAK, Prashanth	MSEE+PHD	MANGALORE UNIV., INDIA	BE 6/92	4				V720 Q800 A800	ND	COMM. THEORY	F					
306	NEWSAM, Shawn	MSEE+PHD	UC BERKELEY	BS 12/90	3.53				V650 Q800 A790	EX	COMM. & SIGN. PROC	F					
307	NG, Hiok	MSEE+PHD	UNIV. OF WA.	BSEE6/93	3.51				V580 Q730 A610	EX	SOLID STATE ELECT.	F					
308	NG, Victor Wing-Tai	MSEE	UNIV. OF WISCONSIN-MADISON	B.S. 12/92	2.64					EX	COMP. ARCHITECTUR	F					
309	NGUYEN, Binh Ton		UNIVERSITY OF IOWA	BSEE 5/93						EX		M					
310	NGUYEN, Minh Chau	MSEE+PHD	RICE UNIVERSITY	BSEE	3.3					EX		C					
311	NOMURA, KAZUO	PHD	WASEDA UNIV., JAPAN	BS 3/74	3.91	CA. ST. U., SACRAMENTO	MS 5/93	4	V330 Q730 A510	EX	CONTROL SYSTEMS	F					

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7	NAME	PROG	UNIVERSITY	UG DEG	GPA	UNIVERSITY	G. DEG.	GPA	GRE	TFL	AREA OF INTEREST	M/Fe	A/R	NC	RA	FELL	REMARKS
312	NORIN, Michael	MSEE+PHD	UNIVERSITY OF ARIZONA	BSEE5/93	3.78				V510 Q740 A680	EX	COMM & SIGNAL PRO	C	A		TA		
313	NOURIE, JEFFREY	MSEE	NORTHEASTERN UNIVERSITY	MSEE 6/93	3.5				V460 Q570 A630	EX	CONTROL SYSTEMS	C					
314	OH, Yongsik	MSEE	KON-KUK UNIVERSITY	BE 2/89	3.58				V340 Q640 A250	500	SOLID STATE	F	R				
315	PAO, I-Ming	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91	3.31				V480 Q800 A800	607	ELECTROMAGNETICS	F					
316	PARK, Jong Il	PHD	KOREA MILITARY ACAD., KOREA	BS 3/86	3.66	STATE U. OF N.Y., BUFFALO	MS 9/90	3.67	V420 Q790 A460	EX	COMM. & SIGN. PROC	F					
317	PARK, Joshua	MSEE	CAL POLYTECH ST UNIV.	NSEE 3/93	3.3					EX	ENERGY SYSTEMS	C/M	R				
318	PARULEKAR, Subodh	MSEE+PHD	UNIV. OF POONA, INDIA	BENGR 7/93	3.5				V640 Q780 A730	633/	CONTROL SYSTEMS	F	A				
319	PATIL, Himanshu	MSEE+PHD	IIT-BOMBAY, INDIA	BTECH 7/92	3.43				V600 Q770 A630	620	CONTROL SYSTEMS	F					
320	PAUL, Prashanth	MSEE+PHD	B.I.T.S., INDIA	BE 6/93					V520 Q750 A700	657	ELEC. & COMPUTERS	F					
321	PETRIE, Craig	MSEE	BRIGHAM YOUNG UNIVERSITY	BS 8/93					V550 Q800 A690	EX	MATLS & DEVICES	C					
322	PHUNG, Hao Oai	MSEE+PHD	U. OF CALIFORNIA, BERKELEY	BS 5/93	3.33				V550 Q790 A730	EX	SIGNAL PROCESSING	C					
323	PRABHAKAR, G.	MSEE+PHD	BIRLA INST. OF TECH. & SCI.	BE 6/93							SIGNAL PROCESSING	F					
324	PRAKASSAM, R.	MSEE+PHD	INDIAN INST. OF TECHNOLOGY	BTECH 7/93					V570 Q800 A710	647	MATLS & DEVICES	F					
325	QIN, Ziwei	PHD	HUA ZHONG NORMAL U., CHINA	BS 7/83		DIALIAN UNIV. OF TECH., CHIN	MS 5/86	3.58		ND		F					
326	QUON, Kenneth	MSEE+PHD	BOSTON UNIVERSITY	BS 5/93	3.9				V750 Q800 A800	EX	SIGNAL PROCESSING	C	A		TA	COLL	OSBERG
327	RAHA, Prasun	MSEE+PHD	I.I.T., KHARAGPURI, INDIA	BTECH 6/93	3.79				V620 Q790 A730	650	MATLS & DEVICES	F					
328	RAMAKRISHNAN, S.	MSEE+PHD	PSG COLLEGE OF TECHNOLOGY	BE 4/93	3.91				V570 Q800 A760	643	ENERGY SYSTEMS	F					
329	RANADE, Abhay	PHD	INDIAN INST. OF TECH.	MTECH 5/90		MAKARASHTRA INST. OF TECH	BE 10/88				SIGNAL PROCESSSING	F					
330	RANKIN, Linda	PHD	UNIV. OF MARYLAND	MA 8/86	3.16	VILLANOVA UNIVERSITY	MSEE 5/93	3.75	V710 Q600 A670	EX	COMM & SIGNAL PRO	C	H				
331	RASMUSSEN, David	MSEE TIE	UNIV. OF WA.	BSEE 6/85	3.45				V540 Q620 A640	EX	ELECTROMAGNETICS	C					
332	REMLEY, Catherine	MSEE+PHD	OREGON STATE UNIV.	BSEE 6/93	3.72				V660 Q690 A710	EX	ELECTROMAGNETICS	CFe					
333	REN, Wenge	PHD	TSINGHUA UNIVERSITY	B ENG. 7/90		TSINGHUA UNIVERSITY	M ENGR 3/9	3.34	V410 Q780 A720	597	ELECTROMAGNETICS	F					
334	ROTH, Weston	MSEE+PHD	UNIVERSITY OF WASHINGTON	BSEE 6/93	3.62				V580 Q680 A760	EX	MATLS & DEVICES	C	A				
335	ROY, Arindam	MSEE+PHD	UNIV. OF BOMBAY	BE 8/93	3				V700 Q790 A800	660	FUZZY LOGIC	F					
336	SABAN, Stevan	MSEE+PHD	WESTERN WASHINGTON	BSPHY6/93	3.6				V590 Q700 A630	EX	MATLS & DEVICES	C					
337	SAITO, RICHARD	MSEE+PHD	UNIVERSITY OF WASHINGTON	BS 8 /93	3.88				V560 Q790 A710	EX	ELEC. & COMPUTERS	C					
338	SAITO, STEVEN	PHD	MASS. INST. OF TECH., MA	BS 6/91	3.9	CORNELL UNIVERSITY	MSE 6/93	2.8	V630 Q730 A650	EX	ELECTROMAGNETICS	C					
339	SANDHU, Sandip	MSEE+PHD	PANJAB ENGR. C.,CHANDIGARTH	BENGR 5/90	4				V550 Q790 A800	627	COMM & SIGNAL PRO	F					
340	SARKAR, Anindya	PHD	INDIAN INST. OF TECHNOLOGY	BTECH 7/93	2.89				V670 Q790 A710	623	POWER SYSTEMS	F					
341	SHI, Quan	PHD	BEIJING NORMAL UNIVERSITY	BS 7/86		BEIJING NORMAL UNIVERSITY	MS 7/89		V470 Q800 A670	573	COMM & SIGNAL PRO	F					
342	SHIH, Ching-Hsiu	MSEE+PHD	NAT'L CHENG KUNG UNIVER.	BS 6/91					V390 Q730 A630		COMP. ENGINEERING	F					
343	SHIH, Hsien-Te	MSEE+PHD	NAT'L CHENG KUNG U., TAIWAN	BS 6/89	2.84				V400 Q800 A730	583	MATLS & DEVICES	F					
344	SHIH, Shih-En	PHD	NAT'L TSING HUA UNIV., TAIWAN	BS 6/86		NAT'L TSING HUA UNIVERSITY	MS 6/88	3.56		607	ELECTROMAGNETICS	F					
345	SIGMOND, STEPHEN	MSEE+PHD	STANFORD	BS 6/93	3.75				V720 Q790 A770	EX	COMM. & SIGN. PROC	C					
346	SIKORA, Martina	MSEE+PHD	OAKLAND UNIV.	BSE 4/91	3.87	OAKLAND UNIV	MS 6/93	3.85	V730 Q750 A800	EX	CONTROL SYSTEMS	C					
347	SILVERTON, Geoffrey	PHD	BROWN UNIV	BS 6/91	3.77	UNIV. OF MICHIGAN	MS 6/93	3.75	V700 Q800 A800	EX	VIRTUAL ENVIRON.	C					
348	SLAWSON, SUSAN	PHD	UNIVERSITY OF HOUSTON	BSEE 12/89	3.8	JOHNS HOPKINS UNIVERSITY	MSE 5/92	3.8	V710 Q780 A800	EX	MEDICAL IMAGING	C					
349	SOMJI, Shiraz	MSEE+PHD	UNIVERSITY OF NOTRE DAME	BS 5/91	3.42				V600 Q760 A670	EX	SIGNAL PROCESSING	F					

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350	SONG, Xubin	MSEE+PHD	NANJING AERONAUTICAL INST.	BS 7/86		BEIJING INST. OF CONTRL DEV.	MS 12/88				CONTROL SYSTEMS	F					
351	SOOD, Ajay	PHD	INDIAN INST. OF TECH., KANPUR	BTECH 5/92					V580 Q790 A690	620	SOLID STATE	F					
352	SOON, MING HIN	PHD	SWARTHMORE COLLEGE	BSc 5/93	3				V570 Q680 A670	EX	CONTROL SYSTEMS	F					
353	STAUFENBERG, WILLIAM	MSEE	VANDERBILT UNIVERSITY	BE 5/93	3.3				V620 Q750 A77	EX	COMM. & SIGN. PROC	C					
354	STAY, Michael	MSEE+PHD	UNIV. OF MINN.,	BSEE 7/93	3.6				V560 Q630 A650	EX	ELEC. & COMPUTERS	C					
355	STENSLAND, Toby	MSEE	UNIVERSITY OF ILLINOIS	BS 5/93	3.2				V620 Q800 A700	EX	POWER & VEHIC SYST	C					
356	STROPE, BRIAN	MSEE+PHD	BROWN UNIVERSITY	BSc 5/89	3.92				V530 Q730 A630	EX	COMM. & SIGN. PROC	C					
357	SU, Ching-Fong	MSEE+PHD	NAT'L TSING-HUA U., TAIWAN	BS 6/91						597	SIGNALS AND SYSTE	F					
358	SUBRAMANIAM, S.	PHD	ANNA U, INDIA	BE 5/88	3.82	TULANE UNIVERSITY	MS 5/93	4	V740 Q800 A750	EX	IMAGING	F	A		RA		HARALICK
359	SUBRAMANIAN, V.	MSEE+PHD	INDIAN INST. OF TECH., MADRAS	BTECH 6/93						673	COMM & SIGNAL PRO	F					
360	SUDARSANAM, A.	PHD	CARNEGIE MELLON UNIV.	BS 5/93					V620 Q790 A720	EX	COMP. ARCHITECTUR	C	A		TA		
361	SUN, Chuang	MSEE	NANJING UNIV., CHINA	BS 7/88	3.66					ND		F					
362	SUN, Kuo-Tung	PHD	NAT'L CHENG KUNG U., TAIWAN	BS 6/88	3.27	NORTHERN ILLINOIS U.	MS 5/93	4	V320 Q790 A580	EX	CONTROL SYSTEMS	F	R				
363	SUN, Zhaohui	MSEE+PHD	U. OF SCI & TECH OF CHINA	BENGR 6/92	3.5				V510 Q780 A690	627	COMM & SIGNAL PRO	F	A				
364	TAN, Ying-Wei	PHD	NAT'L CHENG KUNG UNIVERSITY	BS 6/88		OHIO UNIVERSITY	BS 6/93	3.58		EX	ELEC. & COMPUTERS	F					
365	TANG, Xiadong	PHD	PEKING UNIVERSITY	BS 7/90	3.83	UNIVERSITY OF MARYLAND	MS 5/93	4	V570 Q800 A660	EX	COMMUNICATION	F	A				
366	TENG, Chia-Feng	PHD	SANTA CLARA UNIVERSITY, CA	MS 6/93	3.33				V380 Q790 A590	567	COMM & SIGNAL PRO	F					
367	TIDWELL, M. (SU93)	MSEE+PHD	GEORGIA INST. OF TECH.	BS 3/93	3.81				V580 Q740 A640	EX	IMAGING SYSTEMS	C	A		TA		
368	TODD, Henry	MSEE+PHD	UNIVERSITY OF WASHINGTON	BSEE 6/89	2.94				V500 Q650 A420	EX	DATA COMMUN.	C/M					GTE/TA FELL?
369	TONG, Tak Kit	MSEE+PHD	UNIVERSITY OF MARYLAND	BSc 5/93	3.82				V410 Q760 A650	EX	ELECTROMAGNETICS	F					
370	TRIVEDI, AKSHAYA	PHD	UNIV. OF CALIFORNIA, IRVINE	BS 6/93	3.68				V430 Q750 A540	EX	COMMUNICATIONS	F					
371	TRUDEAU, Brian	MSEE	UNIVERSITY OF WASHINGTON	BSEE 12/92	3.22				V470 Q660 A590	EX	POWER SYSTEMS	C					
372	TSAI, Chang-Hsi	MSEE+PHD	NAT'L CHENG KUNG UNIV.	BS 6/90					V380 Q780 A600		COMM & SIGNAL PRO	F					
373	TSAO, Jung-Chang	MSEE+PHD	NAT'L CHIAO TUNG UNIVERSITY	BSE 6/91	3.1				V510 Q770 A640	583	COMM & SIGNAL PRO	F	R				
374	TSAUR, Lih-Feng	PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91	3.35				V390 Q790 A640	573	ELECTROMAGNETICS	F					
375	TSENG, Hsiao-Ping	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91	2.98				V530 Q800 A640	580	ELECTROMAGNETICS	F					
376	TSENG, Hung-Ning	MSEE+PHD	CHUNG YUAN CHRSTN U.	BS 6/91	3.03				V380 Q780 A460	580	SIGNAL PROCESSING	F	R				
377	TSENG, Kuo-Feng	MSEE+PHD	NAT'L CHENG KUNG UNIV.	BS 6/91	3.92				V480 Q780 A610	557		F	A				
378	ULMER, Chris	PHD	CALIF. INST. OF TECHNOLOGY	BSEE 1/93	3.3				V560 Q740 A670	EX	ROBOTICS	C					
379	VAID, Gaurav	MSEE+PHD	BIRLA INSTIT. OF TECH. & SCI.	BE 6/93					V640 Q780 A800		COMMUNICATIONS	F					
380	VANOOSTEN, Daniel	MSEE+PHD	UNIVERSITY OF MICHIGAN	BSE 12/92	3.6					EX	ELECTROMAGNETICS	C	A				
381	VENKATESH, Arvind	MSEE+PHD	INDIAN INSTIT. OF TECH.	BTECH 6/93							ENERGY SYSTEMS	F					
382	VISHEGU, Ramesh	MSEE+PHD	COLLEGE OF ENGR., ANNA U.	BE 5/93					V420 Q720 A530	550	ENERGY SYSTEMS	F					
383	WAN, Yi	MSEE+PHD	XIAN JIAOTONG UNIV.	BS 7/92		XIAN JIAOTONG UNIV	MS 7/93	3.28	V570 Q800 A720	633	CONTROL & ENERGY	F					
384	WANG, Chia-Bin	MSEE	NAT'L CHIAO TUNG U., TAIWAN	BS 6/92	2.6				V470 Q780 A730	ND	COMM & SIGNAL PRO	F					
385	WANG, Chih-Hsi	MSEE	CHUNG YUAN CHRISTIAN U.	BS COMP E	3				V410 Q780 A580	580	ELECTROMAGNETICS	F					
386	WANG, Qingyan	MSEE+PHD	TSINGHUA UNIV	BE 7/92	3.48				V550 Q800 A680	600	COMPUTERS	F					
387	WANG, Sheng	MSEE	NAT'L TSING HUA UNIVERSITY	BSEE 6/91	3.12				V390 Q800 A690	607	COMM. & SIGN. PROC	F					

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388	WANG, Shi-Chang	PHD	TAMKANG UNIVERSITY	BS 6/89	3.59	SANTA CLARA UNIVERSITY	MS 6/93	3.83	V310 Q770 A630	EX	SIGNAL PROCESSING	F	R				
389	WANG, Yifeng	MSEE+PHD	FUDAN UNIVERSITY	BS 6/91		WEST VIRGINIA TECH.	MS 5/93	3.75	V590 Q800 A730		ELEC. & COMPUTERS	F					
390	WANG, Yusheng	MSEE+PHD	BEIJING U. OF POSTS&TELECOM	BENGR 7/88		BEIJING U. OF POSTS&TELECO	MENGR 4/91	3.78	V550 Q800 A590	603	CONTROL SYSTEMS	F					
391	WARE, Andrew	MSEE	HARVARD COLLEGE	SB 6/92	3.1				V630 Q720 A770	EX	SOLID-STATE ELECTR	C	H				
392	WARKE, Nirmal	MSEE+PHD	INDIAN INST OF TECH, BOMBAY	BTECH 5/93					V510 Q780 A650	650	AI IN POWER SYSTEM	F					
393	WATANABE, Akira	MSEE	WASEDA UNIV, JAPAN	BE 3/84	3.64				V320 Q800 A530	600	NETWORKS	F					
394	WEIER, William	MSEE+PHD	UNIV. OF ARIZONA	BSEE 12/92	3.38				V450 Q780 A620	EX	CONTROLLED SYSTEM	C					
395	WELZ, Jared	PHD	UNIV. OF CALIFORNIA, IRVINE	BS 6/93	3.47				V470 Q780 A640	EX	CONTROL SYSTEMS	C	A				
396	WEN, Feng	PHD	TSINGHUA UNIV., CHINA	BENGR 7/90		UNIV. SCIENCE & TECH., CHINA	MS 6/93	3.54	V560 Q800 A800	603	COMM & SIGNAL PRO	F					
397	WIGENT, Mark	MSEE+PHD	UNIV. OF VIRGINIA	BS 5/92	3.28				V650 Q800 A610	EX	ELECTROMAGNETICS	C					
398	WILLCOX, J. SCOTT	MSEE+PHD	MASSACHUSETTS INST. OF TECH.	BSEE 6/93	3.4				V730 Q790 A760	EX	ELEC. & COMPUTERS	C					
399	WU, Hao	MSEE+PHD	TSINGHUA UNIVERSITY	BE 7/92					V500 Q800 A720	630	COMM & SIGNAL PRO	F					
400	WU, Jie	MSEE+PHD	TIANJIN INST. OF TEXTILE SCI.						V450 Q790 A640			F					
401	WU, Qilin	MSEE+PHD	XIAMEN UNIVERSITY, CHINA	BE 7/90	3.73	UNIVERSITY OF ALABAMA	MS 8/92	3.5	V500 Q780 A600	EX	COMM & SIGNAL PRO	F					
402	WU, Yuwen	MSEE+PHD	TSINGHUA UNIV	BE 7/91	3.64				V610 Q800 A790	637	CONTROL SYSTEMS	F					
403	XIA, Ye	MSEE+PHD	HARVARD UNIVERSITY	BA 6/93	3.5				V560 Q800 A780	660	COMMUNICATIONS	F					
404	XIE, Wei Qun	MSEE	SHANG HAI TONG JI UNIV.	BA 7/87							CONTROL SYSTEMS	F					
405	XU, Shanshan	MSEE+PHD	SAN JOSE STATE	BS 12/89	3.65				V380 Q680 A400	EX	ELEC. & COMPUTERS	CM					
406	XU, Tong	MSEE+PHD	TSINGHUA UNIVERSITY	BE 7/91	3.25				V480 Q800 A670	610	SIGNAL PROCESSING	F					
407	XU, Zhihui	MSEE+PHD	U. OF SCI. & TECH. OF CHINA	BS 7/92	2.94				V480 Q780 A650	613	COMM & SIGNAL PRO	F					
408	YANG, Fan	PHD	PEKING UNIVERSITY	BS 7/90		PEKING UNIVERSITY	MS 7/93		V620 Q800 A760	647	OPTICS	F					
409	YANG, Kuo-Nan	PHD	TAMKANG UNIV., TAIWAN	BS 6/87		NAT'L CHIAO TUNG UNIV.	MS 6/89	2.77	V420 Q740 A600	547	OPTO-ELECTRONICS O	F					
410	YANG, Xun	MSEE+PHD	TSINGHUA UNIVERSITY	BE 7/92	3.77				V590 Q790 A750	650	CONTROL SYSTEMS	F					
411	YANG, Zhengsheng	MSEE+PHD	PEKING UNIVERSITY	BS 7/91	3.76				V490 Q800 A800	633	ELECTROMAGNETICS	F					
412	YE, Liujing	PHD	SOUTHEAST UNIVERSITY	BS 7/84		SOUTHEAST UNIVERSITY	MENGR 87	3.94	V590 Q740 A590	633	POWER SYSTEMS	F					
413	YEUNG, Wai-Ki	MSEE+PHD	UNIV. OF SOUTHERN CA., L.A.	BSEE 5/93							ELEC. & COMPUTERS	F					
414	YIN, Te-Kan	MSEE+PHD	NAT'L TAIWAN UNIVERSITY	BS 6/91	3.43				V590 Q790 A710	647	COMM & SIGN PROC	F	A				
415	YODER, Carleton	MSEE+PHD	PENNSYLVANIA STATE	BSEE 5/93	3.44				V580 Q680 A700	EX	SIGNAL PROCG	C					
416	YOUNG, Jerry	MSEE+PHD	OREGON STATE UNIVERSITY	BS 9/93	3.77				V460 Q770 A680	EX	CONTROL SYSTEMS	C/M	A				
417	ZAIDI, Mushtaq	MSEE	NED UNIVERSITY, PAKISTAN	BENGR 8/88	3.59				V590 Q750 A650	ND	POWER SYSTEMS	F					
418	ZHANG, Dongming	PHD	FUDAN UNIVERSITY	BS 7/88		CHINESE ACADEMY OF SCI.	MS 7/91		V510 Q790 A680		MATLS & DEVICES	F					
419	ZHANG, Hao	MSEE+PHD	BRIGHAM YOUNG UNIVERSITY	BSEE 4/93	3.87				V630 Q780 A660	660	VLSI DESIGN	F					
420	ZHANG, Jian	MSEE+PHD	SHANDONG UNIVERSITY	BS 6/84					V350 Q800 A630	570		F					
421	ZHANG, Ju	PHD	TSINGHUA UNIVERSITY	BENG 7/90					V560 Q800 A670	630	POWER SYSTEMS	F					
422	ZHANG, Wei	MSEE+PHD	ZHEJIANG UNIVERSITY						V550 Q790 A640		CONTROL SYSTEMS	F					
423	ZHANG, Yi	MSEE+PHD	WALLA WALLA COLLEGE, WA	BSEE 5/93	3.18					EX	MATLS & DEVICES	F					
424	ZHAO, Jianmin	MSEE+PHD	XIAN JIAOTONG UNIV., CHINA	BS 7/83		GONZAGA UNIVERSITY	MENGR 5/90	3.39	V470 Q760 A550	ND	ENERGY SYSTEMS	F					
425	ZHAO, Jiwen	MSEE+PHD	SICHUAN UNIVERSITY	BS 7/89		INST. OF PHYS. CHINESE ACAD	BS 8/92		V520 Q780 A650	590	MATLS & DEVICES	F					

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426	ZHENG, Guojun	MSEE	UNIV. CALIFORNIA-DAVIS	BS 6/92	2.89				V330 Q730 A380	EX	SOLID STATE ELEC	C/M					
427	ZHENG, Yong	PHD	NORTHERN JIAOTONG U.,PRC	BS 7/83		SOUTHWEST JIAOTONG UNIV.	MS 10/86		V560 Q780 A750	650	CONTROL SYSTMS	F					
428	ZHONG, Yan	MSEE+PHD	TSINGHUA UNIVERSITY, CHINA	BA 7/89	3.69	WESTERN MICHIGAN UNIV.	MS 7/93		V480 Q790 A610	600	VLSI DESIGN	F					
429	ZHOU, Jiangneng	PHD	HANGZHOU UNIV., CHINA	BS 7/86		TULANE UNIV., L.A.	MS 4/93	3.58	V510 Q800 A660	EX	CONTROL SYSTMS	F	A				
430	ZHU, Wenwu	PHD	NAT'L U. OF DEFENSE TECH.	BE 6/85	3.58	ILLINOIS INSTITUE OF TECH.	MSEE 6/93		V370 Q790 A670	EX	IMAGE PROCG	F	R				
431	ZOU, Liping	PHD	CHENGDU U. OF SCI & TECH.	BS 7/87		SOUTHWEST JIAOTONG UNIV.	MS 2/90	3.78	V430 Q780 A690	550	CONTROL SYSTMS	F					
432																	
433																	
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University of Washington Correspondence

INTERDEPARTMENTAL

College of Engineering, Dean's Office, FH-10

January 4, 1993

Electrical Engineering Faculty and Staff
Department of Electrical Engineering

RE: Resignation of Thomas A. Seliga, Chair of the Department of Electrical Engineering

Dear Colleagues:

I have received Professor Thomas A. Seliga's letter of resignation, effective December 31, 1992, which he submitted in order that he may return to teaching and research. In his tenure as Chair, he has made major contributions to your Department through his successful efforts to recruit outstanding young faculty, to develop extramural support for your instructional program and for faculty scholarship, to secure the promotion of faculty through the tenure ranks, and to advance the capital program for the proposed EE/CS&E Building. In accepting his resignation, I would like to express my appreciation for the work he has done and hope that you will also at the appropriate time.

As you know, the Woodruff Review Committee has not yet submitted its report. By copy of this letter, I am informing the Committee of Professor Seliga's action. On January 8th, I will meet with the Committee to discuss its next steps. Hopefully, the Committee, based upon its interviews, will agree to suggest a list of internal candidates. Shortly after my meeting with the Committee, I would like to have a meeting with the faculty of your Department to seek your advice.

In the interim, I am asking Professor Mark Damborg as Associate Chair of your Department to assume the duties of the Acting Chair, effective January 1, 1992. Professor Damborg has indicated to me that in his absence, Professor Frank Alexandro will assume the duties of Acting Chair.

While I do not wish to act with undue haste, circumstances are such that your Department should have a Chair in place as soon as possible.

Sincerely yours,

J Ray Bowen

J. Ray Bowen
Dean

JRB:mln
cc: Thomas A. Seliga
Steven G. Olswang
Gene L. Woodruff
Laurel L. Wilkening
Mark Damborg
Frank Alexandro
Electrical Engineering Review Committee

University of Washington Correspondence

INTERDEPARTMENTAL

ELECTRICAL ENGINEERING DEPARTMENT, FT-10

January 4, 1993

TO: Professors Christie, Venkata, Damborg, Liu, Dow, Helms, Lauritzen, Pinter, Sechen, Soma, Yang, Afromowitz, Bjorkstam, Darling, Kuhn, Pearsall, Chan, Ishimaru, Kuga, Porter, Sahr, Seliga, Tsang, Haralick, Holden, Kim, Shapiro, Somani, Zick, Albrecht, Alexandro, Andersen, Hannaford, Hsu, Meldrum, Noges, Atlas, Hwang, Lytle, Marks, Riskin, Ritcey

FROM: M. El-Sharkawi, Professor

RE: January 11-15, 1993 Ph.D. Qualifying Examination

The following students will be contacting you for scheduling their Ph.D. Qualifying Examination. Please return the examination verdict in writing to Eddie/Deborah for the Qualifying Examination Committee's tabulation as soon as possible after the examination. Each student participating in the examination will receive 8 scores (pass, uncertain or fail) each carrying equal weight. Faculty will meet January 19.

Students who selected Communications & Signal Processing as their major area:

P JUNG ✓
P LIM ✓
U MCLAUGHLIN ✓
P SCHIMPF ✓
F SRINIVAS ✓

Students who selected Communications & Signal Processing as their minor area:

P LI

ew

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DEPARTMENT OF ELECTRICAL ENGINEERING
University of Washington

Ph.D. GENERAL EXAMINATION

Russell Reed

Professor R.Marks, Chair✓
Professor M. El-Sharkawi
Professor J.-N. Hwang
Professor A. Holden
Professor E. Fetz,
Graduate Faculty Representative

"Generalization and Layered Neural Networks"

Abstract: Neural networks are usually trained with examples of a desired input-output relationship. For most interesting problems, it is impossible to provide examples of every input that might be seen during normal operation so an important issue is how well the system generalizes to patterns outside the training set. Usually, of course, the system will not generalize perfectly. Some factors influencing generalization are described, along with some techniques that have been tried in an effort to improve generalization. The focus is on artificial neural networks in general and feedforward "layered sigmoid perceptrons" in particular.

Friday, February 5, 1993
2:30-4:30pm, EEB 420

All faculty and students are invited to attend.

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University of Washington Correspondence

INTERDEPARTMENTAL

STAFF PERSONNEL OFFICE, JA-10

February 10, 1993

TO: Les Atlas, Associate Professor
Robert J. Marks, Professor
Electrical Engineering, FT-10

FROM: Mary Ann Bill M. Bill
Area Personnel Representative
Staff Personnel Office, JA-10

SUBJECT: Review of Secretary Senior Position

INCUMBENT:	Ruth A. Wagner
POSITION NUMBER:	0001
BUDGET NUMBER:	65-6485

A classification review of the above position has been completed.

Ms. Wagner coordinates and performs specialized clerical activities in support of the Auditory Research Program and the IEEE Neural Networks Council.

The duties and responsibilities of this position are best described by the Program Coordinator classification.

Accordingly, the position has been reclassified as follows:

NEW CLASSIFICATION:	Program Coordinator
CLASS CODE:	2256
NEW SALARY RATE:	$2180.00 - Range 37, Step H
EFFECTIVE DATE:	November 20, 1992
and will be:	($2245.00 - Range 37, Step H effective January 1, 1993)

Please submit a Personnel Action Form to effect the above change.

NEXT SCHEDULED INCREMENT: April 1, 1993

This memorandum serves as notice to Ms. Wagner that, as provided in Higher Education Personnel Board rule WAC 251-06-070, an appeal regarding this decision may be filed with the Higher Education Personnel Board within thirty (30) calendar days of service of this notice.

MAB:cp
cc: Ruth Wagner
Marlene Davidson

University of Washington Correspondence

INTERDEPARTMENTAL

September 29, 1992

TO: EE Faculty

FROM: Robert M. Haralick

CONCERNING: Resource Management Proposal

There was some discussion at the EE Department Retreat about what happened to the draft of the resource management proposal which had been worked on by the adhoc committee.

As requested by our chairman, this draft was delivered to him. My cover letter indicates that it was given to him on January 28, 1991.

Attached to this memo is a copy of that draft. Read it and let me know what comments you have. I can summarize the comments and prepare to discuss this at a regular faculty meeting. I have requested Valerie to put this topic on the agenda to the faculty meeting on October 13.

RMH