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CHICAGO SECTION · IEEE · INSTITUTE OF ELECTRICAL & ELECTRONICS ENGINEERS

FEBRUARY, 1973

Now We Can Tell You!

Now it can be told! Showtime on Sunday, February 11 will feature "Suddenly Last Summer," starring Sylvia Sidney and Katharine Houghton. You can't afford to miss this exciting Tennessee Williams drama at the Ivanhoe Theatre.

So take your wife or girl-friend--or your husband or boyfriend--and come down to the Ivanhoe Restaurant for the IEEE get-together at 4:30 p.m. Dinner will be served at 5:00 p.m., and the play starts at 7:00 p.m.

Reservations are limited to 450. Last year many people were turned away. Don't be disappointed and discover you can't be accommodated. Send your check for \$12.50 per person for dinner and the play today to IEEE Showtime, Box 9295, Chicago, Illinois, 60690. Remember to include your name and full mailing address, as well as the number of tickets you wish.

After the play, join many of us at the Catacombs Bar at the Ivanhoe. Or try the folk cafes of New Town just a few blocks away. Anyway you look at it, Sunday, February 11, should be a day to remember.

Sylvia Sidney (Mrs. Venable) is one of our country's most accomplished actresses, having distinguished herself in both films and the theater. She has appeared on Broadway in many productions, including "Angel Street," "Anne of The Thousand Days," "The Four Poster,"



Sylvia Sidney

and "Enter Laughing." Her screen credits include "Street Scene," "Dead End," "The Wagons Roll at Night," and "Blood on the Sun." The versatile Miss Sidney also designs prize-winning needlepoint and is the author of a best-selling book on the subject. She is also owned by three prize-winning pug dogs, which graciously allow her to appear in plays.

Katharine Houghton (Catherine) is probably best known to most of us for her role as the daughter in the movie "Guess Who's Coming to Dinner," which starred Spencer Tracy, Katharine Hep-



Katharine Houghton

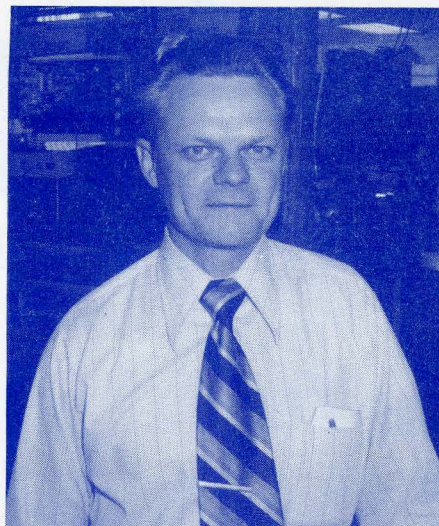
burn, and Sidney Poitier. She made her Broadway debut with Ruth Gordon in "A Very Rich Woman," and has since appeared in the Broadway revival of "Front Page," starring Robert Ryan. She won the Theatre World Award in 1969 for Best Off-Broadway Actress of the season for her role in "A Scent of Flowers." She has appeared in many regional and university productions, and recently spent the summer teaching at the University of Northern Colorado, where she also starred in the university theatre.

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A Message

From Scanfax



And now for a few words on **SCANFAX** and our Chicago Section Office. This isn't a commercial but is intended to fill you in on some of the behind the scenes action and background information on both of the operations.

First **SCANFAX**, the Chicago Section News bulletin. **SCANFAX** dates back to the 1940's where it served the same purpose for the Institute of Radio Engineers as it does for us today. It is a separately chartered, non-profit corporation in Illinois. Its directives emanate from the Section executive committee which serves on the board of directors and its budget is submitted and approved by the same body. As regards to the budget we are working to make **SCANFAX** self-supporting through the sale of advertising. For us, advertising takes the form of publicity for our conferences and Section-sponsored activities as well as the conventional paid-for ads. Any help from our members will be greatly appreciated.

Now for the editor's dilemma, or how to hold the presses until the last detail on all of the meetings scheduled for the issue is available, and still get it to you on the first day of the month. Meeting planners always need another day (how well I remember from my days as chairman of the Communications Society) and also want the issue out on time. As a result of some changes in our operation we have managed to reduce our lead time from six weeks last year to about four weeks this year. The last week is dedicated to delivery of the issue. Since we use a second class post office permit we feel a week for delivery is necessary, particularly when you consider the cost of an eight cent mailing to our nearly 5,000 members. If **SCANFAX** isn't received within the allowed five to seven days the problem has to be with the post office. In some cases as many as three post offices

will handle the issue before it is delivered to you. As to late deliveries, (some have been reported as late as 12 days) give us a call or drop us a line. We need your zip code plus the date you received the issue. We are working with the main post office people on this problem.

Now for some information on our IEEE office. This is a joint SPE, IEEE, ASCE operation. The office is at Room 532, 55 East Washington Street in Chicago. Rosemary Salsinger handles the details, which include answering the telephone. Our telephone is a separate line into the office (each of the other societies noted above have separate lines). She also forwards post office returned change of addresses to New York; directs incoming calls to appropriate section, sub-section, society or group officers, sorts and forwards mail (some 100 to 150 pieces a week); takes meeting reservations (as many as 200 a month), and mails out membership applications, insurance information and **SCANFAX** advertising brochures. I am sure there are several things I have missed, but these are in addition to her duties for the other organizations sharing the office. Incidentally as to reservations, the best hours to call are from 9:30 to 12:30 and 2:00 to 4:30.

In connection with the office operations since Rosemary does it all, it is to be expected that unavoidable situations will occur, which can cause delays in her answering. Yet, I am sure that better service results when you can call and talk to someone in person. We at **SCANFAX** and the IEEE office appreciate your comments and suggestions. This feedback tells us how we are serving you and how we might serve you better.

*George Mack,
Scanfax President*

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CALLS FOR PAPERS

NEC

The 1973 National Electronics Conference will be held on October 8, 9, 10, 1973, at the Regency Hyatt House, Chicago, Illinois. NEC will have as a central theme Communications. Preference will be given to those papers which are tutorial and stress the communication aspect. Suggested topics include: electronic switching systems, mobile radio systems, digital data systems, integrated circuits, audio, instrumentation, reliability, signal processing, microwaves, education, testing, satellite communications, paging systems, medical electronics, computers, ultrasonics, optical electronics, control systems, power systems, catv, coding, automotive electronics.

The invited papers, displays, new technology seminars, new product disclosures and engineering executive seminars, as well as the general papers will all focus on this important topic.

An award for the best tutorial paper and an award for the best technical paper will be presented.

A 75 word abstract and a 500 word summary (15 copies each) are required by April 1, 1973. Authors will be notified by May 15, 1973. Final manuscripts are due by July 15, 1973. Both abstract and summary must include authors name, business affiliation, phone number, and mailing address. Send to: Dr. Roger Camp, Electrical Engineering Department, Iowa State University, Ames, Iowa 50010.

Chicago Spring Conference

The 1973 Chicago Spring Conference will be held at the Marriott Motor Hotel in Chicago on June 11 and 12, 1973. Papers that are of particular interest to the Consumer Electronics Industry are invited. Special consideration will be given to papers that present innovative concepts and techniques related to consumer product designs.

A certificate, plaque and \$100 prize money will be awarded for the best paper of the conference.

The deadline for paper summaries is March 2, 1973. Potential authors are requested to submit a 50-100 word summary. The paper title, author(s), company affiliation and position should also be included. Papers should be limited to 2500 words and the presentation to twenty minutes.

The schedule required for participation in the conference and publication in the IEEE Transactions on Broadcast and Television Receivers is as follows.

March 2, 1973: Deadline for submission of summary of proposed paper. March 30, 1973: Authors will be advised of acceptance by this date. Biographical information requests and instructions for preparation of final copy will be mailed. May 9, 1973: Three advance copies corrected for IEEE Review Committee. (Rough drafts with corrections are acceptable.) June 6, 1973: Final copy in camera-ready format for offset reproduction.

Please submit proposed papers to: Howard F. Jirka, Papers Committee, Zenith Radio Corporation, 6101 W. Dick-

The Minicomputer In Data Acquisition And Process Control

On Wednesday, February 7, the Fox Valley Subsection will hold a joint meeting with the IEEE Computer Society. Dr. Lloyd Kusak, Hewlett-Packard, will be the featured speaker.

In his talk, Dr. Kusak will discuss "Practical Applications of the Minicomputer in Data Acquisition and Process Control." He will discuss typical operating systems, including software and hardware tradeoffs.

Lloyd Kusak received his PhD in chemical engineering from Cornell University. His experience in the computer industry includes optimization and simulation of refinery process using linear programming and other simulation methods, installation of process control systems in a number of industries, and acting as an advisor in the application of minicomputer systems. He is manager of Hewlett-Packard's Midwest Region Data Center.

The meeting will be at Stevens Steak House in Elmhurst. Social hour, 6:00 p.m.; dinner, 7:00 p.m.; meeting, 8:00 p.m. For reservations, please call 263-3776.

A special meeting of the Fox Valley Subsection, joint with the ASME, SAE, and ISPE, will be held during Engineers' Week. The Wankel Rotary Engine will be discussed at this meeting on February 21. Details elsewhere in this issue.

ens Avenue, Chicago, Illinois 60639; (312) 745-4904

IEEE OFFICE: 263-5954

Chicago IEEE Calendar

February 4	Electromagnetic Compatibility Group—Menard's Black Steer Restaurant, 6446 W. North Avenue. Dinner at 7 p.m.; meeting at 8. For reservations, contact Howard Wolfman, 982-2240. (See page 3.)
February 11	SHOWTIME — Ivanhoe Theatre. Tickets \$12.50 per person. Send check to IEEE Showtime, Box 9295, Chicago, Ill. 60690.
February 13	Executive Committee Meeting. Please try to attend. Call IEEE office for details.
February 14	IAS/IEC meeting at Nielsen's Village, 7330 W. North Avenue. Seminar on oil and vacuum switches.
February 21	Fox Valley meeting at Gaslite Manor, 2485 Church Road, Aurora. Rotary Combustion Engine for Snowmobiles.
February 21	G-1 Audio & Acoustics joint meeting with Chicago Audio and Acoustics Society. Air Cushion Restraint Systems - Charles Weber, Fischer Body Division, General Motors. A demonstration is planned. Call IEEE office for particulars.
February 27	Washington Award Dinner - Western Society of Engineers. 5:30 p.m. Pick-Congress Hotel — \$14.50 per person.

Welcome To Chicago Section

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Modern Oil & Vacuum Switches

The February 14 meeting of the Chicago Chapter of IAS/IECI will feature a seminar on "Modern Oil and Vacuum Switches." Participants, all from G & W Electric Specialty Company, are: K.G. Darrow, manager, Engineering; K.P. Banas, manager, product engineering, switchgear; and G.O. Perkins, manager, research and development, switchgear.

Darrow will speak on "General Switch Design Considerations." He will provide a general discussion of underground switch design parameters as they relate to safe, economical, and reliable installation and operation.

Banas will cover "Modern Oil Switch Design." He will describe modern oil switches and their application in underground systems.

Perkins will discuss "Modern Vacuum Switch Design." He will cover designs incorporating the most up-to-date switching techniques, as well as discuss application advantages. Following the presentations, the speakers will entertain questions from the floor.

K.G. Darrow received a BS in mechanical engineering from Ohio State University in 1937. He joined General Electric the same year and served in various engineering and managerial capacities in the switchgear operation until he joined G&W Electric Specialty Company in his present capacity in 1967. He is a senior member of IEEE, a member of the EEI-NEMA Joint Committee on Underground Switches, and a registered Professional Engineer in Illinois and Pennsylvania.

Holonyak To Receive Liebmann Award

The MORRIS N. LIEBMANN AWARD, which marks an important contribution to emerging technologies, will go to Nick Holonyak, Jr., "For outstanding contribution to the field of visible light emitting diodes and diode lasers," according to an announcement from IEEE headquarters.

Dr. Holonyak, Jr. has been a professor in the Department of Electrical Engineering and Materials Research Laboratories, University of Illinois, Urbana, since 1963. A Fellow in both IEEE and the American Physical Society, his most recent research work has been concerned with simulated emission on nitrogen trap transmissions in the semiconductor alloys GaAs_{1-x}P_x and In_xGa_{1-x}P. He is co-author of the book *Semiconductor Controlled Rectifiers*, editor of the Prentice-Hall series *Solid State Physical Electronics*, and is on the

vanian. Darrow holds a patent on vacuum metal-clad switchgear.

K.P. Banas received a BS in mechanical engineering from Valparaiso University in 1969. He joined G&W Electric Specialty Company as a product engineer, switchgear, in January, 1969, and was named to his present position last year. He is a member of IEEE, ASME, and an EIT with the Indiana Society of Professional Engineers.

G.O. Perkins received his BS in electrical engineering from Clemson College in 1943 and his MS in electrical engineering from the University of Pennsylvania in 1948. In 1966, he joined G&W Electric Specialty Company in his present capacity, after 20 years' experience in the switchgear industry with various manufacturers. He is a member of IEEE, a registered Professional Engineer in Pennsylvania, an individual member of CIGRE, member IEEE subcommittee on Power Switchgear Assemblies and High Voltage Fuses, NEMA Technical Committees on High Voltage Fuses and Automatic Circuit Reclosers, and an alternate on the EEI-NEMA Joint Committee on Underground Switches. He is the holder of ten patents relating to switchgear.

Dinner will be held at Nielsen's Village, 7330 W. North Avenue. Social hour, 5:30 p.m.; dinner, 6:15 p.m.; meeting, 7:15 p.m. Cost of dinner is \$7.00 to members; \$8.00 to non-members, but all who come for dinner will receive complimentary liquid refreshments. For reservations, call 263-5954.

editorial board of *Proceedings of the IEEE* and *Solid State Electronics*.

FCC Spectrum Management

On Wednesday, February 14, 1973, a meeting of the Group on Electromagnetic Compatibility, will be held at Menard's Black Steer Restaurant, 6446 West North Avenue. Dinner will be served at 7:00 and the meeting will start at 8:00 p.m.

William Tranavitch of the FCC, will present a paper on the FCC Regional Spectrum Management Program. Included will be engineering and data gathering methods and the impact on spectrum management in the Chicago region. Following the meeting, the FCC van used for data gathering will be demonstrated.

For reservations, contact Howard Wolfman, 982-2240.

February 21, 1973

Rotary Combustion Engine For Snowmobiles

A joint meeting of the Fox Valley Subsection, IEEE, Fox Valley Division, ASME; and the Salt Creek and DuKane County chapters of ISPE will feature a discussion of "Design and Development of a Rotary Combustion Engine for Snowmobiles," by Michael J. Griffith, Outboard Marine Corporation. The dinner meeting will be held at Gaslite Manor, 2485 Church Road (west of Farnsworth Avenue and north of the East-West Tollway), Aurora, Illinois. Social hour, 6:30 p.m., is sponsored by H-H Products Division, Kelsey-Hayes; Motorola Automotive Products, Inc.; Mobil Oil Corporation; and The Timken Company. Dinner, \$6.00, is at 7:00 p.m.; meeting at 8:00.

The first rotary combustion engine manufactured in the western hemisphere was put into production by Outboard Marine Corporation in 1972. This new rotary engine was designed and developed by OMC for one of their 1973 line snowmobiles. It is an air-cooled rotary combustion engine with a single rotor unit of 32 cubic inch displacement and develops 35 hp at 5500 rpm. The induction charge is used to cool the rotor and lubricate the bearings.

Griffith will discuss many of the design concepts of the rotary combustion engine. He will cover engine performance, lubrication, noise control, the capacity discharge ignition system, and service techniques.

Michael J. Griffith received his BS in engineering from the University of Saskatchewan at Saskatoon, Canada, in 1964. He then joined the Curtiss Wright Corporation as a test engineer on their rotary combustion engine programs. In November 1966, he joined the Outboard Marine Corporation as a project engineer in the marine engineering group and worked on the development of the RC engine. His responsibilities included vehicle adaptation, horsepower development, and durability testing. He is a registered professional engineer in the State of Illinois, and a member of SAE.

After Griffith's presentation, a movie of the Indianapolis 500 Race will be shown. Be sure to make dinner reservations at least one week before the meeting. Call either A.W. Meyer, ES8-4100, ext. 593, identifying yourself as an IEEE member, or the IEEE office, 263-5954. Get your reservations in early! Because of the sponsorship by four societies, reservations will be limited.

Volpe To Receive Washington Award

John A. Volpe, Ambassador to Italy, former Secretary of Transportation, threetime governor of Massachusetts and the first Federal Highway Administrator has been selected the 1973 recipient of the Washington Award-conferred by six national and regional professional engineering societies and administered by the Western Society of Engineers. He will be the 50th person to be honored by the Washington Award Commission.

The annual award, which is given for preeminent service in promoting public welfare, will be bestowed on Volpe "for outstanding service to his country and mankind as Governor and United States Cabinet Secretary and for his dedication, leadership and achievements in transportation."

The presentation of the award will take place during Engineers' Week at the annual Washington Awards banquet at the Pick-Congress Hotel in Chicago, Tuesday, February 27. Milton Pikarsky, chairman of the Washington Award Commission and Commissioner of Public Works for the City of Chicago, will present one of the award symbols to Volpe who will address the audience on the topic, "The Human Side of Being an Engineer."

The Washington Award is named for the nation's first president, an engineer as well as soldier and statesman. It was established in 1916 by the late John W.

Alvord, past president of the Western Society of Engineers and was first made to Herbert Hoover in 1919. Other recipients have been Admiral Rickover, Henry Ford, Orville Wright, Charles Kettering and Thomas Otten Paine.

Volpe has had an outstanding career in the field of engineering construction since graduating from Boston's Wentworth Institute in 1930 with a major in architectural construction.

When World War II began, Volpe closed his firm and volunteered for duty with the Seabees. He left the Navy with the rank of Lieutenant Commander and returned to the building of schools, hospitals and office buildings. In 1953 he was appointed Massachusetts Commissioner of Public Works and in 1956 President Eisenhower appointed him the first Federal Highway Administrator. In 1960 he was elected governor of Massachusetts, and he was returned to office twice by the people.

President Nixon chose Volpe in 1969 as the nation's second Secretary of Transportation.

All IEEE members are invited to attend the Washington Award dinner February 27. Tickets are \$14.50 per person. Social hour 5:30 p.m., dinner 6:00 p.m. For tickets or reservations, call William R. Gerler or Rochelle Clements, Western Society of Engineers, 663-0220.



John A. Volpe

Midwest Acoustics Conference

Final arrangements are being completed for the 1973 Midwest Acoustics Conference, to be held at the new Norris Center of Northwestern University in Evanston, Illinois on April 7, 1973. The title of the Conference is "Loudspeaker Evaluation: Subjective versus Objective — Ear or Gear". The technical program will include technical sessions, panel discussions and product demonstrations.

The Midwest Acoustics Conference is sponsored annually by the IEEE; the Acoustical Society of America; the Audio Engineering Society, and the Chicago Acoustical and Audio Group.

Officers of the 1973 MAC are: Jose Pena, president; Henry Messerschmidt, vice-president; Peter Tappan, secretary; and Robert Schulein, treasurer.

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