Report on 104th Technical Conference and Equipment Exhibit Washington, D.C., November 10-15, 1968

Over 800 SMPTE members and guests registered for the 104th Technical Conference and Equipment Exhibit, November 10-15, at the Washington Hilton Hotel, Washington, D.C. This Conference, like the three preceding ones, was under the official management of E. B. (Mike) McGreal, SMPTE Conference Vice-President. Editorial Vice-President Rodger J. Ross is officially responsible for the papers programs.

From all over the country and many parts of the world, engineers, scientists, technicians and executives of the motion-picture and television industry heard over 70 technical papers in 11 topic areas and visited 75 exhibits. The Conference proved to be an outstanding one from the point of view of quality of papers, the technical programs and the participation of the exhibitors.

There was general agreement that the Conference events went off smoothly due to the careful planning and coordination of all the chairmen and committees involved. General Arrangements for the Conference were handled by Arthur Rescher, Byron Motion Pictures, Inc., Washington, D.C., and his committee. The Exhibit Chairman, Wesley R. Sandell, Kodak Processing Lab, Rockville, Md., supervised the Exhibit arrangements before, after and during the Exhibit. Program Chairman E. D. Llerena, Eastman Kodak Co., Washington, D.C., and his committee coordinated efficiently all of the format planning and supporting details that go toward making the technical sessions successful.

Registration began Sunday afternoon with the greater number registering at that time. On Sunday over 500 persons joined for a gourmet buffet dinner at the new L'Enfant Plaza Communications Centre. Following the dinner was a Premiere Showing of the new MGM release *The Shoes of the Fisherman,* starring Anthony Quinn and Oscar Werner. The evening was reported as most enjoyable by all who participated.

Get-Together Luncheon

The Get-Together Luncheon was preceded by a reception for the guest speaker, Maurice B. Mitchell, Chancellor of the University of Denver. SMPTE President G. Carleton Hunt presided over the Luncheon, which had an attendance of over 450. In his brief remarks before introducing Dr. Mitchell, Mr. Hunt stated his belief in the growing usefulness of the Society, not only to the industry but indirectly benefiting the nation as a whole. As new developments in motion-picture and television technology continue to amass, these developments have helped to strengthen the worldwide communications link.

President Hunt stated that his term as President of SMPTE had proven interest-

President Hunt presiding over the Get-Together Luncheon.

ing and he was looking forward to the opportunity of sitting back for a while and watching the SMPTE from a new perspective.

The Guest Speaker, Dr. Maurice B. Mitchell, directed his remarks to the "Real Revolution in Education." He stressed the significance of revolution as it applies to the use of audio-visual aids and retrievable systems.

Dr. Mitchell stated that during the past ten years audio-visual aids have progressed from classroom curiosities to an integral part of the classroom teaching situation. As the designs of A-V equipment have improved over the years, so have the programs for which they have been used. Slides and films have allowed the student to go deeper into the study of subject matter which formerly was filtered to him through words and occasional pictures.

The recent development of retrievable systems for use in schools and universities has speeded up access to slides and film strips and reduced the amount of time a teacher must spend glossing through catalogs to find the correct material. New A-V centers have allowed the individual student to do his own research work more quickly and efficiently.

Dr. Mitchell concluded his remarks saying that the real revolution in education is the promise that films, television and slides bring to the classroom for a more thorough education for the individual student.

Maurice B. Mitchell, Guest Speaker at the Get-Together Luncheon.

Awards Program

Following Dr. Mitchell's address President Hunt presented the Society's Annual Awards. The Awards were as follows: The Progress Medal Award to Dr. Charles R. Fordyce, Eastman Kodak Co. (ret.), Rochester, N.Y.; The Honorary Membership Award to Dr. Harold E. Edgerton, EG&G, Inc., Bedford, Mass.; the Herbert T. Kalmus Gold Medal Award to Walter A. Fallon, Eastman Kodak Co., Rochester, N.Y.; the 1967 E. I. Du Pont Gold Medal Award to I. S. Marshak, Electric Lamp Works, Moscow; the 1968 E. I. Du Pont Gold Medal Award to Dr. Frank Früngel, Impulsphysik GmbH, Hamburg; Eastman Kodak Gold Medal Award to Dr. Edgar Dale, Ohio State University; the Journal Award to J. H. Altman, Eastman Kodak Co., Rochester, N.Y. Journal Awards in the Honorable Mention category were given to: Dr. George Leslie Clark, Aerojet General Corp., Azusa, Calif.; Dr. Abe M. Zarem, Xerox Corp., Los Angeles, Calif.; William N. Fitzgerald; Robert C. Lovick; Howard F. Ott; and Phillip A. Ripson, all of Eastman Kodak Co., Rochester, N.Y.

President Hunt addressing the Luncheon audience.

Citations for each of the awards are quoted below from the 1968 Awards Program brochure.

The Progress Medal Award

Dr. Charles R. Fordyce: The Progress Medal Award for 1968 is presented to Dr. Charles R. Fordyce in recognition of his many significant contributions to the development of cellulose materials for photographic film and his work on film dimensions, stability and other problems of projection.

The Honorary Membership Award

Dr. Harold E. Edgerton: In recognition of a lifetime of outstanding work in the field of high-speed photography and illumination and his tireless efforts on behalf of the research and design of electronic flashtubes, Honorary Membership has been bestowed on Dr. Harold E. Edgerton.

The Herbert T. Kalmus Gold Medal Award

Walter A. Fallon: The Herbert T. Kalmus Gold Medal is awarded to Walter A. Fallon, Manager of the Film Emulsion and Plate Manufacturing Division of Kodak Park, who has played an important role in the development and manufacture of color motion-picture films. During the past twenty years there has been a great technological expansion in color motion-picture films. Throughout this period Mr. Fallon has been deeply involved in the development work which has led to new products, first in a position of direct responsibility for the programs, and recently as Manager of the Manufacturing Division.

His leadership and inspiration have led to the solution of a vast array of problems culminating in a continuous stream of new products covering the entire motion-picture area. Of particular significance has been his insistence on achieving and maintaining the highest quality possible with existing technology and advancing this quality level as new knowledge and understanding have developed.

Dr. Mitchell and SMPTE Financial Vice-President, Kenneth M. Mason, at the pre-luncheon reception.

The E. I. du Pont Gold Medal Award – 1967

I. S. Marshak: The E. I. du Pont Gold Medal Award for 1967 is presented to I. S. Marshak in recognition of his contributions to the understanding of the detailed processes that go on in electronic flashtubes. He has investigated the influence of the various parameters on the operation and efficiency of such tubes. He has published widely both in Russian literature and in the West. His work has been an inspiration to a whole generation of research workers in all parts of the world.

The E. I. du Pont Gold Medal Award – 1968

Dr. Frank Früngel: The E. I. du Pont Gold Medal Award for 1968 is presented to Dr. Frank Früngel for his outstanding contributions to the field of high-speed photography, and particularly for his work in high power, high repetition rate stroboscopes and multiple flash sources. He has in addition designed and produced high repetition rate Kerr cell equipment, x-ray equipment and laser light sources. He is stimulating and inventive and is the moving spirit in the

firm of which he is head in Hamburg, Germany. Each year the range and variety of the instrumentation for which he is responsible increases considerably. Not only has he contributed himself a great deal to the research literature and to the patent files in Europe and America, but he has inspired many others with the brilliance and originality of his work.

The Eastman Kodak Gold Medal Award

Dr. Edgar Dale: The Eastman Kodak Gold Medal Award for 1968 is given to Dr. Edgar Dale in recognition of his fundamental, pioneering contributions to promoting the use of film and other audio-visual materials and techniques for the purposes of education.

Fellow Membership Award

Elevation to Fellow of the Society is an honor bestowed upon those Active Members who have, by their proficiency and contributions, attained an outstanding rank among engineers or executives in the motion picture, television or related industries.

Fifteen members were elevated to the rank of SMPTE Fellow, each of whom was presented with a certificate. A list of the newly elevated Fellows, along with some biographical notes for each, follows:

Dr. August Arnold — President, Arnold and Richter KG, Munich, Germany. Dr. Arnold received his Doctorate in Engineering from the Technische Hochschule in Munich. He has worked in developing the Arriflex 35 and 16mm Cameras, developing and printing machines and studio lighting equipment. Dr. Arnold was presented the Oscar Messter Award in 1953, Verdienst-Laterna Magica Award in 1953, Diesel Award in 1965 and Grosses Verdienstkreuz der Bundesrepublik Deutschland in 1968. He is currently President of the Head Organization of the German Film Industry.

Walter L. Farley, Jr. — Regional Sales Manager, Eastman Kodak Co., Hollywood, Calif. Mr. Farley graduated from Dartmouth College, Hanover, N.H. He worked on the development of the original Kodachrome process, and is currently responsible for 20 sales and engineering personnel covering the motion-picture and education markets for all of the Western States. Mr. Farley is a member of the Academy of Motion Picture Arts and Sciences and the American Society of Cinematographers.

Thomas Walker Hope — Market Analyst, Eastman Kodak Co., Rochester, N.Y. attended the University of Texas at El Paso, where he received the degree in Business Administration and Journalism, and the University of Minnesota. He was formerly a film producer, director and cameraman, served as U.S. Army Photo Officer and Head of the Army Motion Picture School, and was awarded the Army Bronze Star for photo coverage of the Allied drive leading to the surrender of Germany. He was consultant on films to the French Republic under the Marshall Plan. Mr. Hope is Vice-President of CINE (Council on International Non-theatrical (Film) Events), member of the Advisory Council for Mass Media for the United Presbyterian Church USA, Past 1st Vice-President and Charter Member of the Industrial Audio-Visual Association, founder of the Rochester Audio-Visual Association and a member of the University Film Club. For the past 10 years Mr. Hope has been responsible for preparing a detailed market report and analysis for the SMPTE *Journal* covering the financial and statistical developments of the

Society Fellow Award winners (left to right): Paul Klingenstein accepting for Dr. August Arnold and Dr. Robert Richter, Kenneth Mason accepting for Walter L. Farley, Jr., A. Alan Jackson, Thomas W. Hope, Raymond J. Wulf, Earl W. Kage, Frank V. Papalia, A. Earl Quinn, Roland J. Zavada, Kurt E. Kanis, Howard F. Ott, Charles F. LoBalbo and President Hunt.

Presentation of SMPTE Awards by President Hunt (usual order), President Hunt, Charles R. Fordyce, Harold E. Edgerton, Walter A. Fallon, Geoffrey Courtney-Pratt (accepting for I. S. Marshak), Frank Frungel, Edgar Dale, and J. H. Altman.

nontheatrical motion-picture and audio-visual fields in the United States.

A. Alan Jackson — General Manager, MGM Laboratories, Inc., Culver City, Calif. Mr. Jackson has personally directed the engineering and technical staff of MGM Laboratories for the past nine years in developing an improved wet gate printing process as used in the 35mm/70mm blow-up printing operation; instituted high-speed processing and printing methods in both black-and-white and color release prints; devised a cue analog device, eliminating the need for notching negatives for control of printing lights and hues; designed and fabricated a scanning device for use in obtaining information for deanamorphing the present anamorphed negatives; and modified an optical printer to use tape information to print 35mm or 16mm negatives. Mr. Jackson is presently working on a feasible process for putting color onto black-and-white negatives. He is a member of the American Society of Cinematographers and the American Cinema Editors.

Marvin B. Jacobs — Optical Engineer (retired), American Broadcasting Co., Hollywood, Calif. Mr. Jacobs was a newsreel cameraman and did freelance optical engineering. During the 18 years he was with ABC-TV he was the optical engineer and designed and constructed all optical effects and special lenses for TV and in addition maintained all optical equipment on the Hollywood lot. In 1956 he was nominated for the Engineering Achievement Emmy award for his design for the "Big Jake" 100-in lens. Mr. Jacobs is a member of the Optical Society of America.

Earl W. Kage — Manager, Research Studios of the Kodak Research Laboratories, Rochester, N.Y. As manager of the studios, Mr. Kage is responsible for evaluation of experimental films and techniques under practical conditions as well as the production of in-laboratory pictures. Mr. Kage is a member of the Society of Photographic Scientists and Engineers, the National Audio-Visual Association and the Rochester Audio-Visual Association.

Kurt E. Kanis — Vice-President in Charge of New York Operations, DeLuxe-General Laboratories. Mr. Kanis attended New York University and Columbia. He started with Consolidated Film Laboratory, Fort Lee, N.J. in 1929, and in 1949 was the plant manager of the industry's only continuous printing plant. From 1949 to 1954 he was plant manager of Pathé Laboratories of New York. In 1954 he was promoted to Sales Manager and in 1958 to Vice-President in Charge of New York Operations. In 1964 he was employed by DeLuxe-General. Mr. Kanis is a member of the Society of Photographic Scientists and Engineers, the Society of Motion Picture Pioneers and the American Manufacturers Association.

Charles Francis Lo Balbo — Manager, Motion Picture and Television Sales, Philip A. Hunt Chemical Corp., Palisades Park, N.J. Mr. Lo Balbo received his B.S. and Ph.G. from Fordham University, New York. He was a Motion Picture Technical Advisor, and Chief Chemist for Pathé Laboratories, Inc. from 1941 to 1953. He is currently Technical Sales Advisor on the use of chemicals in color and black-and-white motion-picture film processing. He represented the SMPTE in the United States of America Standards Institute and is a member of the National Microfilm Association, Society of Reproduction Engineers, Society for Industrial Microbiology and the New York Academy of Sciences.

Robert A. Morris — Technical Associate, Eastman Kodak Co., Rochester, N.Y. Mr. Morris received his B.S. degree in physics from the University of Michigan, Ann Arbor, Mich. He was with the Kodak Research Laboratories from 1935 to 1942 and holds a patent on a dye bleaching process for color photography. He was associated with the Manhattan Project, Columbia University, 1942–45, and has since been with Eastman Kodak Co. as a writer on and teacher of color photography. From 1945 to 1954 he was a consultant on color and colorimetry for *Webster's Third New International Dictionary*. Mr. Morris is a member of the Optical Society of America and the Society of Photographic Scientists and Engineers.

Howard F. Ott — Technical Associate, Photographic Technology Div., Eastman Kodak Co., Rochester, N.Y. Mr. Ott received his B.S. in physics from Case School of Applied Science and his M.S. in physics from the University of Illinois. He has been active in development work including equipment for the motion-picture industry. He is probably best known in the industry for his design of the Venturi air squeegee. He holds several patents in the field of optics and photography and has authored a number of papers concerning photographic equipment. Mr. Ott is still active in equipment design and is a member of the Rochester Section of the Optical Society of America.

Frank V. Papalia — General Manager, Precision Film Laboratories, New York, N.Y. Mr. Papalia graduated from the Technical School of Raffaele Piria and the Institute Technique (Engineering) in Italy and attended the Consolidated School of Advanced Photographic Science. He collaborated in the construction of one of the first motion-picture developing machines, and assisted in the development of the technique of printing 16mm Kodachrome dupes. In 1942 he assisted in establishing the processing section of the U.S. Naval Photographic Laboratory, Anacostia, D.C. and trained the necessary personnel. He conceived the idea for and assisted in the manufacture of the first mechanical cleaning machine. Mr. Papalia is a member of the Motion Picture Pioneers.

A. Earl Quinn — Senior Development Engineer, High-Speed Photography, Eastman Kodak Co., Rochester, N.Y. Mr. Quinn attended the University of Rochester and the Rochester Institute of Technology. He was a member of the original High-Speed Committee initiated by SMPE and the SMPE subcommittee on lighting. He was a photographer in a quality control studio aimed at evaluation of color products from 1936 to 1941. During W.W. II he worked for the Office of Scientific Research and Development and The Massachusetts Institute of Technology making high-speed instrumentation studies for the Weapons Evaluation Program. Mr. Quinn was Chairman of the Unsteadiness Subcommittee resulting in Recommended Practice, "Unsteadiness High Speed Camera." He is currently head of the High-Speed Photoinstrumentation Committee and a member of the newly formed Information Affairs Committee for Photoinstrumentation within SMPTE. Mr. Quinn is a member of the Society of Photographic Scientists and Engineers and the Society of Photographic Instrumentation Engineers.

Dr. Robert Richter — General Manager and Director of Engineering, Arnold and Richter KG, Munich, Germany. Mr. Richter is a graduate engineer from the Technische Hochscule in Munich and Doctor of Political Economy. He has done work in developing the Arriflex cameras and

A Technical Session in progress.

the Arri processing machines. Dr. Richter won an Academy Award in 1966. Laterna Magica Award — 1960, Diesel Award — 1965, and the Oscar Messter Award in 1967.

Raymond John Wulf — Chief Engineer, M.P.E.M., East Coast Div., Eastman Kodak Co., New York, N.Y. Mr. Wulf received the A.A.S. from the Rochester Institute of Technology and the B.S. degree in chemical engineering from New York University. He has had 14 years of engineering service work in motion pictures, and has worked at Cape Kennedy for Eastman Kodak in motion-picture service work. He was heavily engaged in the service effort to install color processing at local TV stations. Currently Mr. Wulf coordinates all engineering requirements for Eastman Kodak motion-picture film and equipment items for the entire East Coast area. Mr. Wulf is a member of Tau Beta Pi Honorary Engineering Society.

Roland J. Zavada — Senior Products Engineer, Film Services Div., Eastman Kodak Co., Rochester, N.Y. Mr. Zavada received the B.S. degree in chemistry from Purdue University, a diploma in photography from the Rochester Institute of Technology and the M.S. degree in marketing from the University of Rochester. Mr. Zavada, as Senior Products Engineer, works on motion-picture products and aids in the coordination of activities of various film manufacturing departments in the development of new film products, maintenance of quality and prevention of waste. He analyzes technical problems of the customer relating to the film system, and maintains contact with customers through the marketing organization. He is a member of the Film Dimensions and Standards Committees. He is currently Chairman of the Society's 16mm and 8mm Engineering Committee. He is a member of the SMPTE Progress Committee and was elected Secretary-Treasurer for the Rochester Section for 1968. He was a delegate to the 6th Plenary meeting of the ISO (International Organization for Standardization) in Moscow, and Chairman of its Technical Committee 36 Working Group 5 on 8mm Type S film. Mr. Zavada is a member of the Photographic Society of America, Society of Amateur Cinematographers and President-Elect, Kodak Camera Club.

Papers Program

E. D. Llerena, Eastman Kodak Co., Washington, D.C., was chairman of the Papers Program and was responsible for the high quality of the Program. He and his Topic Chairmen put together a program that was praised for its high interest level and technical comprehensiveness. The support of the SMPTE Papers Committee Chairman, Allan L. Williams, Eastman Kodak Co., Rochester, N.Y., was also helpful for the success of the papers program.

The Program Chairman has the job of preparing months in advance the topics to be covered and then going about getting the papers for the program. The job is a very large one and takes a great deal of time and perseverence. Llerena and his Topic Chairmen planned the program and requested papers on topics that would be of a high interest level to SMPTE members. Associate Program Chairman was Edward A. Winkler.

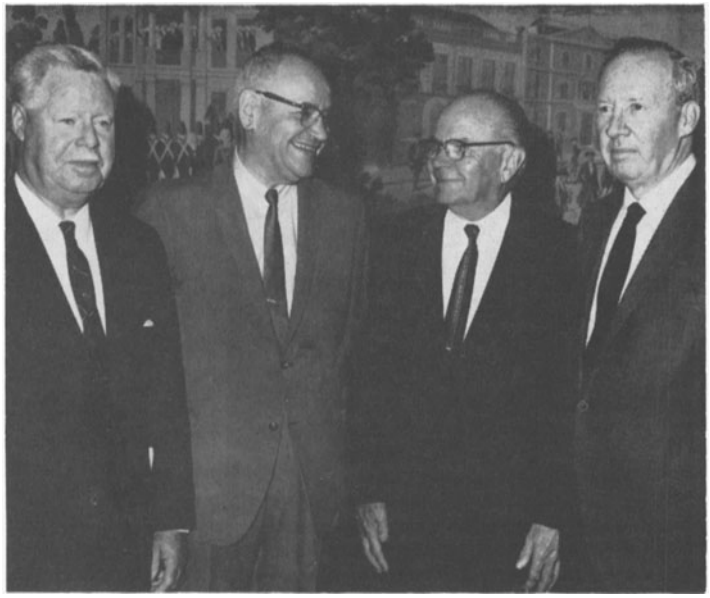
Arrangements Chairman Arthur Rescher and Program Chairman E. D. Llerena.

Assisting Llerena and Winkler as Program Topic Chairmen were: Aerospace — V. D. Armstrong; Cinematography — William J. Reddick; Education — Albert J. Rosenberg; Instrumentation and High-Speed Photography — Bernard E. Drimmer; International Papers — Hans Chr. Wohlrab; Laboratory Practices — Arthur L. Foster and Garland C. Misener; Medicine — Malcolm S. Ferguson; Oceanography — Thomas G. Lantzas and Joseph A. Cestone; Photographic and Allied Sciences — Fred W. Gerretson; Small-Format Films — Everett C. Hall; Television — Charles L. Chester and Adrian B. Ettlinger; Theater Presentation and Projection — Frank H. Riffle; and Video Tape and Audio — George W. Bartlett. The major responsibility for the program was carried by these Topic Chairmen each operating within one specific area.

Papers listed in the Final Program that had to be cancelled before presentation were: An Electronic Device for Converting Subtractive Into Additive Printing Data; Television Applications of Gevachrome T9.02; the Development and Application of the Rolling Loop; Combed Aperture Equalization for Color Television Cameras; Some Practical Aspects of Lens Designing by Computer; A Coherent Light Image Data System; and F-Number vs. Illumination for the Drive-In Theater. Papers added to the Conference Program but not included in the Final Program booklet were "Quad 8 — A Versatile Film Laboratory System" by Edgar A. Schuller,

From left to right: Richard Goldberg, William Hyzer, Max Beard, Dick O'Brien, William Wintringham, Geoffrey Courtney-Pratt, Vice-Presidents of SMPTE.

Cine Magnetics, Inc., Mamaroneck, N.Y.; "Determining TV Image Distortions by Means of Moire Patterns" by John C. McKechnie, Naval Training Device Center, Orlando, Fla.; "Interchange of Time and Frequency in Television Displays" by A. Korpel, S. N. Lotsoff and R. L. Whitman, Zenith Radio Corp., Chicago, Ill.; "An Engineering Approach to Color Telecine" by F. David E. Corley, D. and S. Corley Ltd., Islington, Ontario; and "CBS Political Conventions — Mobile Color Television Broadcasting Center" by G. I. Benkowsky, CBS TV Network, New York.



Editorial Vice-President Rodger J. Ross; Sections Vice-President Wilton R. Holm; President-Elect Deane R. White and Conference Vice-President E. B. McGreal.

Panel Discussion of TV Color Standards

NTSC Color Standards was the subject for a panel discussion held on Thursday afternoon. Some refinements in NTSC color standards could improve what viewers see on their color receivers. The most significant step in upgrading color TV pictures, it was agreed, would be the establishment of standards for several vital elements in the chain of electronic steps that take place from the time a scene is televised on a TV camera, through the transmission process, to the display of the scene on a color receiver.

The panel, moderated by Malcolm Burleson, Metromedia, Inc., consisted of Norman Grover, Canadian Broadcasting Corp.; John Serafin, ABC; Henry A. Ahnemann, AT&T; C. Robert Gross, WCAU-TV, Philadelphia; Norman Parker, Motorola; and Frank Fleming, Visual Electronics, Inc. The call for standardization was made by Mr. Grover, who urged the establishment of accepted criteria for color monitors, for studio and remote cameras and for receivers. He also asked for a standard test film for use by telecasters for all programs. All of this, Mr. Grover said, should be adopted by broadcasters and receiver manufacturers as soon as possible.

Mr. Gross declared that stations can produce and transmit excellent color TV although he agreed it costs money in equipment and in hiring proper personnel. He urged the adoption of an industry-accepted vertical-interval test color bar and, most important better test equipment. Mr. Serafin said networks have agreed among themselves on some standards for general transmission, and that there is a likelihood that general standards will be adopted soon. Mr. Fleming suggested that manufacturers could do more to establish recommendations for antennas and lead-ins for color TV set installation. The problem with variations in color, Mr. Parker maintained, was people. Viewers, he observed, turn the chroma controls on a color set beyond their limits, resulting in birlliant colors but also a saturated picture that makes too obvious the little aberrations in the picture. The production of a color TV receiver is a result of compromises: better color but less brightness, for example.

The possibility of federal regulation for TV setmakers may soon be put into effect because some manufacturers omit a dc restorer. C. B. B. Wood, British Broadcasting Corp., who delivered a paper on color techniques, told the audience that in Britain a reference receiver has been developed to which all stations are adjusted. When improvements are made in receiver design, he said, this standard receiver can be revised.

The panel agreed generally that the original color standards adopted by the FCC in 1953 still function well and leave little to be changed; however, some refinements could improve what viewers see. The adoption of these refinements, the panel agreed, would have to be done in an organized fashion calculated to the best interests of the viewers, the broadcasters and manufacturers. If such an agreement is to be reached, there will have to be some compromises made.

L'Enfant Plaza Demonstration and Papers

On Friday morning of Conference Week buses took over 150 registrants to the L'Enfant Plaza Communications Center in Southwest Washington to witness a series of five papers and a demonstration.

Al Bruch, Get-Together Luncheon Chairman, Program Chairman E. D. Llerena and Exhibit Chairman Wesley R. Sandell.

Papers Committee Chairman Allan L. Williams and Editorial Vice-President Roger J. Ross.

President Hunt and President-Elect Deane R. White.

R. R. E. Pulman, Chairman of the British Kinematograph, Sound and Television Society, discusses plans for Film '69 with President Hunt.

SMPTE Treasurer, Saul Jeffee and Financial Vice-President Kenneth M. Mason.

The program opened with a welcome by E. R. "Pete" Quesada, Lt. Gen. U.S. Air Force (Ret.), President of L'Enfant Plaza Corp. Charles E. Shutt, President of L'Enfant Plaza Communications Center spoke to the group on a new concept for hard-ticket theaters, in which he unfolded the plan for L'Enfant Plaza to function as a hard-ticket showcase theater during the evening, while during the day serving government, management and executives as a direct live link to their representatives around the world.

Mr. Shutt said, "The new concept here for our communications center/theater is versatility. Such a concept called for the engineering of approximately 10,000 ft^2 of space so that a multitude of communications uses could be accomplished in this same place at different times. We believe we have met these goals. A minimum of 10 reserved-seat motion-picture performances is scheduled each week. Here will be presented the finest motion pictures made. The remaining 138 hours each week will be available for a variety of communication purposes. Our auditorium will accommodate 826 people; an FM wireless translation system will handle foreign language meetings; permanent color TV lighting will assist in any TV press conference, as will the permanently installed color TV coaxial cable we have in our television control booth. A public-address system is interconnected with audience-response microphones that are strategically located in the auditorium floor. The TelePrompter-equipped lectern is also available. Composite and interlocked screening facilities will accommodate 16mm, 35mm and 70mm motion pictures. Slide projection and screening facilities will assist in multimedia presentations. Motion-picture, audio and still photographic services will be provided. There will be video-tape and audio replay and reproduction facilities."

"In addition, there is the MTS 360 unit which can project a 15 × 20 ft color television image from anywhere in the world. With these tools of communication we believe that this center may well serve such purposes as government news conferences, an industrial intercity sales meeting or product presentation, training seminars, and foreign language conferences. A space launch could be shown here for members of Congress; a visiting chief of state could describe his American visit back to his people by live color television, relayed from here via Comsat satellite to his own country. The versatility of the facilities at the center may well be a breakthrough in mass communication."

Following Mr. Shutt, Ed Chisholm, Chief Engineer, Century Projection Corp., demonstrated a Cine Focus and Automation System at the center. NASA's 70mm color film *A Bridge to Space,* showing the launching of an Apollo missile, was shown.

Following this, Robert White, Vice-President and Chief Engineer, Management Television Systems, spoke on the "Color TV Projection and Coordinated Systems of Multimedia Presentation." In this talk he demonstrated live-projected television. He spoke with the President of Management Television Systems, in Arlington, Va., who was projected on a screen 15 × 20 ft and answered questions. He also gave an explanation of the technical make-up of the facilities that go into live TV projection. He went on to say that telecasts of live TV via satellite were contemplated in the future, in the hopes that permanent centers such as L'Enfant Plaza Communications Center would be established throughout the world.

Equipment Exhibit

The Equipment Exhibit opened at 5 p.m. Monday afternoon, with ribbon-cutting ceremonies conducted by President Hunt, Vice Presidents Deane R. White and E. B. McGreal. A reception for guests followed the ceremonies. Exhibitors at the Conference were:

Aerojet Delft Corp.
Amega Corp.
Ampex Corp.
Angenieux Corp. of America
Arriflex Corp. of America
Atlantic Films Ltd.
Bach Auricon, Inc.
Bardwell & McAlister, Inc.
Bell & Howell Co.
Boston Insulated Wire & Cable
Canon U.S.A., Inc.
Century Lighting, Inc.

Opening the Exhibit, Exhibit Chairman Wesley R. Sandell, E. B. McGreal and President Hunt.

Exhibit Reception on Monday afternoon.

A well-attended Exhibit.

Christie Electric Corp.
Compco Corp.
Eastman Kodak Co.
Electrodyne Corp.
F&B/Ceco, Inc.
Filmline Corp.
Fotovend Corp.
Frigidheat
Genarco, Inc.
General Enterprises, Inc.
Hazeltine Corp.
Karl Heitz, Inc.
Hollywood Film Co.
FF Impulsphysics Corp.
International Audio Visual, Ltd.
Kliegl Bros. Lighting
Macbeth Corp.
Magnasync/Moviola Corp.
D.B. Milliken, A Teledyne Co.
Minolta Corp.
Mole-Richardson Co.
Motion Picture Enterprises, Inc.
Nogra Magnetic Recorders, Inc.
Oxberry Corp.
Paillard, Inc.
Pako Corp.
PEK, Inc.
Peterson Enterprises, Inc.
Photomec Ltd.
Plastic Reel Corp. of America
Precision Laboratories
Prestoseal Mfg. Corp.
S.O.S. Photo-Cine-Optics, Inc.
Seiki Co., Ltd.
Shure Bros.
Strong Electric Corp.
Sylvania Electric Products, Inc.
TODD-AO Corp.
The Welch Scientific Co.
Westrex, Div. of Litton Ind.
Yardney Electric Corp.
Zoomar, Inc.

On Wednesday morning, Nov. 13, a special Exhibitors session was held in the Georgetown Ballroom. At that time, exhibitors presented papers or gave demonstrations of new equipment in the motion-picture and television fields. In all, twelve exhibitors gave presentations.

Exhibit Award

Atlantic Films Ltd., 2071 University St., Montreal, Canada, won the SMPTE Exhibit Award at the 104th Technical Conference and Equipment Exhibit. Announcement of the Award was made by SMPTE President G. Carleton Hunt at the close of the Exhibit on Thursday, November 14.

President Hunt and SMPTE President-elect Deane R. White, congratulated A. Jekste, President of Atlantic Films, at the Atlantic booth following the announcement. Atlantic Films manufactures continuous film looping devices, projection and television systems and acts as representatives for Zeiss Icon and xenon converters. The booth featured a variety of audio-visual projection equipment and demonstrations of film loop devices for 16, 35 and 70mm film.

The Atlantic booth was selected by a special Exhibit Awards Committee from among the 75 Exhibitors at the Conference. The basis for the semiannual award is originality of presentation and technical excellence.

A story on the presentation of the Award Plaque will appear in the March SMPTE *Journal*.

The President of the Exhibit Award winner, Atlantic Films and Electronics, Ltd., A. Jetske (center) is congratulated by Wesley R. Sandell, President Hunt, Deane R. White and E. B. McGreal.

Special Mid-Week Luncheon

The Special Luncheon on Education held in the International Ballroom on Wednesday, featured three prominent speakers in the field of education. Special invitations had been sent out, so many people were anxious to attend. Luncheon Chairman Albert J. Rosenberg, McGraw-Hill Films, New York, made a few brief remarks and then proceeded to introduce the speakers.

The first speaker, Mr. Robert E. Slaughter, President of McGraw-Hill Films, Inc., New York, spoke about the growing use of audio-visual aids and programed learning in the classroom. "The time has come," he said, "when semi-automation has made it possible for the average classroom teacher to devote more and more time to teaching and less and less time to small administrative details. "The time is coming," he went on, "when 60 to 70 percent of classroom teaching will be done by automated systems such as audio-visual and programed learning machines. The trick now is for teachers and engineers to get together to design equipment that will be especially suited for specific classroom procedures."

Dr. Sam M. Lambert, Executive Secretary of the National Education Association, was the second speaker. He stated that last month the number of TV receivers exceeded, for the first time, the number of film projectors in the nation's schools and that there are now 2,500 TV teachers in the U.S. who reach 12,000,000 children with their tele-lessons. Education is now traveling at the speed of light. As this trend advances, teachers will need to know more about technical equipment and the various uses to which it can be put.

Rev. John M. Culkin, S.J., Director of the Center for Communications at Fordham University, a speaker familiar to many of the persons in the audience, opened his address in the easy style for which he is known, and then went on to more serious matters. He stated that it was not only necessary for the development of new equipment for audio-visual aids but also for the development of new curricula and new ways of teaching. He stressed the importance of putting money into programs and personnel to carry out the tasks of education in the future.

Rev. Culkin stated that television, in itself, has had a far-reaching influence over

Participants at the Mid-Week Luncheon on Education, Don White, Sam M. Lambert, Robert G. Slaughter, Luncheon Chairman Albert J. Rosenberg, Father John M. Culkin and Program Chairman E. D. Llerena.

the average child who watches adult programs in preschool years. He quoted a recent study in which all of the modern mass media inventions such as telephone, radio and television were taken out of the home in order to see what effect this would have on a family. It was shown that the family could barely get on and that the children felt culturally deprived. Rev. Culkin closed by saying that in these times, when the stress on mankind has nearly reached the breaking point and the present, past and the future are all so close, education in general and media, in particular, have the responsibility of helping the individual to disentangle the threads of the complex society in which we live.

It is hoped that this Special Luncheon helped to promote better understanding between the men who design the machines and the people who use them. It was an occasion for exchanging and sharing of views. Chairman Albert J. Rosenberg stated that more such meetings between engineers and educators would further advancement of the industry and the field of education.

Local Arrangements

Working under the authority of Conference Vice-President E. B. ("Mike") McGreal, Conference Arrangements Chairman Arthur Rescher, Byron Motion Pictures, Washington, D.C., was in charge of overall arrangements and coordination of the work of the individual committees. Hotel Arrangements and Registration Chairman was Sam Gale, Capital Film Labs, Washington, D.C., who worked with the Washington Hilton staff to ensure that the needs of all the activities of the Conference were met.

Al Bruch, Capital Film Labs, Washington, D.C., was Chairman of the Get-Together Luncheon. Don C. LeFebre, Westinghouse Defense Center, Baltimore, Md., was Banquet Chairman. The Wednesday evening Cocktail Party, Banquet and Dance had an attendance of over 400.

Adrian Borneman, American Film Institute, Washington, D.C., served as Hospitality Chairman to make sure that all who attended the Conference would feel at home and get acquainted with Washington. The Publicity Chairman, Paul

Hotel Arrangements Chairman Sam Gale and Arrangements Chairman Arthur Rescher.

Lyons, Images & Ideas Unlimited, Washington, D.C., made arrangements with local press and television for coverage of the Conference. Public address and recording arrangements were made by Nelson Funk, Rodell Productions, Washington, D.C. The Membership booth was manned by William E. Youngs, Projection Branch, USIA, Washington, D.C.

These local arrangements chairmen and their committees worked hard together to plan and coordinate the various functions of the Conference and to make sure that all events ran smoothly. Arrangements Chairman Arthur Rescher worked long hours and was always available for last-minute details.

Short Film Program

The Society was particularly honored this year to have available as short film subjects the best selections from the International CINE Golden Eagle winners of 1968. These were arranged by Chairman William E. Youngs with the assistance of James Culver. Films shown were: *Reacher* produced by the University of Wisconsin; *Film* produced by Ealing Corp.; *Scientist in the Sea* produced by the Oceanographic Dept. of the Navy; *A Day With Timmy Page* produced by Contemporary Films; *Space* produced by Schoenfield, Inc.; *To Sleep, Perchance to Dream* produced by National Educational Television; *Functional Anatomy of the Human Kidney* produced by Smith, Kline & French Laboratories; *Art of Art Forgery* produced by United Airlines; *The Redwoods* produced by the Sierra Club; and *Grisley* produced by Aetna Life Insurance Co. and Encyclopaedia Britannica.

An afternoon exhibit of prize-winning U.S. and foreign films was shown on Friday, November 15. Later that evening, the CINE Golden Eagle producers' reception was held in the Mayflower Hotel. SMPTE registrants were invited to attend both the afternoon exhibition and the program at the Mayflower.

Ladies Program

Ladies Program Chairman Pattie (Mrs. Al) Bruch and Ginny (Mrs. Dudley) Spruill hosted the wives to several busy days of sightseeing and shopping. Activities of the ladies included a tour of Historic Annapolis and a luncheon at the Harbor House, then shopping. They also banded together for a tour of the Capital and lunch at the Army-Navy Club and then, afterwards, had a special tour of the White House. On the final day there was shopping in Georgetown and lunch at Billy Martin's Carriage House.

Committee Meetings

The nine SMPTE Engineering Committees that met during Conference Week were: Sound, Color, Television, Standards, Photoinstrumentation, Laboratory Practices, Film Dimensions, Film Projection Practice, and 16 and 8 mm. On Tuesday and Wednesday of Conference Week Editorial meetings were held. Starting off was the Papers Committee. On Wednesday morning the Board of Editors and the Publications Advisory Committee met. Meetings were well attended and, on the whole, there was agreement that much was accomplished. In addition, the SMPTE Board of Governors convened on Sunday.

Acknowledgments

The Society expresses its thanks to the following companies and organizations for providing necessary services and equipment:

Projection Equipment: Wilson Gill
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Color Television Monitors: National Broadcasting Co.
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Secretarial Services: Eastman Kodak Co.
Photocopy Equipment and Supplies: 3M Co.

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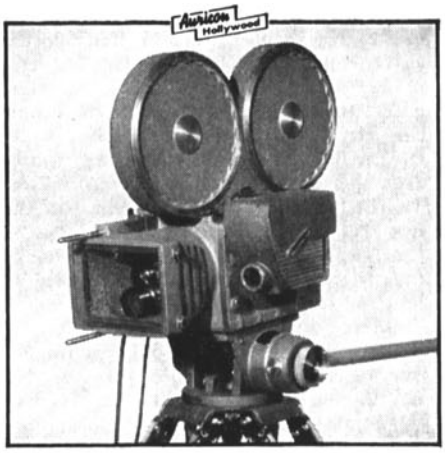

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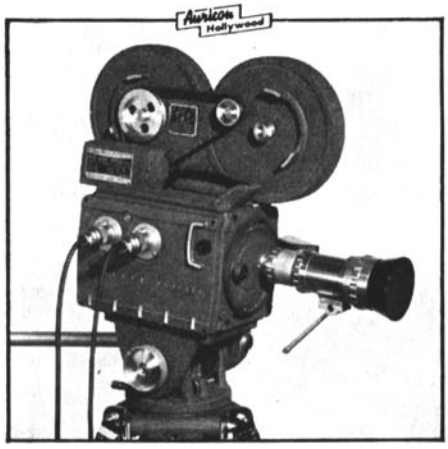

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