

The Thirtieth Annual
Honor Awards Program

United States
Department of Commerce

1978

Program

October 23, 1978/3:00 P.M.

Department of Commerce Auditorium

Fourteenth Street
between E Street and
Constitution Avenue, N.W.
Washington, D.C.

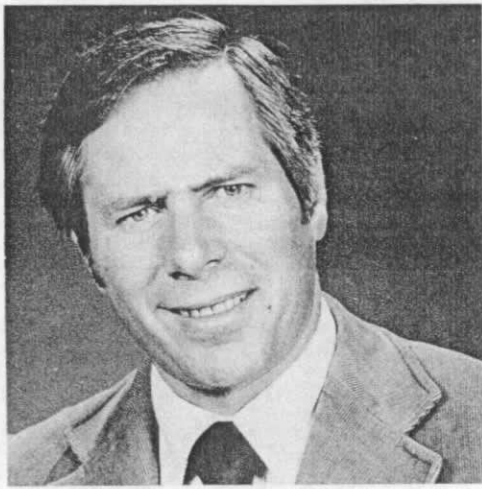
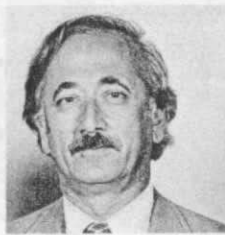
MUSIC	U.S. Merchant Marine Academy Regimental Band
INTRODUCTION	Joseph C. Brown <i>Acting Director of Personnel</i>
PRESENTATION OF COLORS	U.S. Merchant Marine Academy Color Guard
NATIONAL ANTHEM	Band
ADDRESS	Juanita M. Kreps <i>Secretary of Commerce</i>
ANNOUNCEMENT OF AWARDS	Elsa A. Porter <i>Assistant Secretary for Administration</i>
PRESENTATION OF SILVER MEDALS	Secretary of Commerce <i>Assisted by Departmental Officials</i>
MUSICAL SELECTION	Band
PRESENTATION OF GOLD MEDALS	Secretary of Commerce <i>Assisted by Departmental Officials</i>
CLOSING REMARKS	Assistant Secretary for Administration



Raymond E. Tanner

*Special Assistant for Indian Affairs
Economic Development Administration*

The Indian Economic Development Program within the Department of Commerce, formulated and administered by Mr. Tanner, has contributed significantly to fulfilling the Federal Government's commitment of assisting American Indians achieve an accelerated rate of economic growth through their own self determination. Coordination with other Federal agencies has been a key factor in bringing maximum economic impact to Indian country. Innovation has also played a large part in the success of the program, beginning with the concept that Indian people, themselves, must make the plans and critical decisions controlling their own destiny. Mr. Tanner has approached the problem on a reservation-by-reservation basis so that comprehensive programs to achieve self-sustained economic growth can be fulfilled. He has been instrumental in ensuring that plans developed by Indians are implemented including the approval of many innovative projects. He devised a formula whereby small tribes could fully participate in the Local Public Works Program.



George T. Karras

Deputy Assistant Secretary for Operations

Walter G. Farr, Jr.

Chief Counsel

Ward Miller, Jr.

Director, Local Public Works Program

Anthony D. DeAngelo

Deputy Director, Local Public Works Program

Economic Development Administration

Messrs. Karras, Farr, Miller, and DeAngelo played a critical role in implementing the \$4 billion Round II Local Public Works (LPW) Program carried out by the Economic Development Administration (EDA) during FY '77. Under this program, EDA approved a record-breaking 8,555 projects in less than 3 months, providing funds for public works facilities in those communities with highest unemployment in every state. The projects were distributed equitably among states, counties, cities, townships, school districts, Indian tribes, and various special purpose districts. As part of the program, EDA administered the unprecedented requirement that 10 percent of each LPW grant be expended with minority business enterprises. The accomplishments recorded under this program will stand as a landmark in the history of Federal public works programs and will serve as a guide for public works efforts for years to come.

Walter Braun

*Research Chemist
National Measurement Laboratory
National Bureau of Standards*

Dr. Braun has made outstanding contributions to modern gas kinetics (the study of the mechanisms and rates of processes in the gas phase). His development of flash photolysis resonance fluorescence is now recognized as one of the key developments in this area, opening up for study a whole range of reactions which has hitherto been inaccessible. They are of particular importance for the understanding and control of important gas phase processes such as air pollution and combustion. Concrete evidence of significance is furnished by the fact that a majority of the rate constants used in assessing the effect of SSTs and Freons have been determined by this method. Dr. Braun is a leader in the study of laser augmented processes, being among the first to demonstrate laser enhanced bimolecular processes. In the area of infrared laser multiphoton induced decomposition of polyatomic molecules, he has played a role in the drive to elucidate the mechanism of this unique phenomenon. Through his technical skill and enthusiasm he has inspired, supported, and guided a whole generation of Bureau scientists and is responsible for the leading role that the Bureau has and is expected to play in gas kinetics.



Thomas D. Coyle

*Chief, Chemical Stability and Corrosion
Division
National Measurement Laboratory
National Bureau of Standards*

Dr. Coyle's work on reaction methods was directed to form new inorganic compounds, to develop new and improved ways to determine their structure, and to improve structural systemation of compound formation. Work under his direction included one of the first successful demonstrations of laser isotope separation, determination of reactive intermediates in the action of flame retardants, and determination of high temperature vapor phase corrosion processes. Other significant program areas included mechanisms of molecular transformation involving toxic metals and improved nuclear magnetic resonance techniques for molecular characterization. Success in laser-assisted isotope concentration points the way to preparation of many non-radioactive marker isotopes as well as providing guidance to nuclear fuel preparation techniques. Reactive intermediates are the key to flame retardation; the development of measurement methodology provides a way of determining the principal rate-controlling steps and thus encourages improvements in flame retardation. The specific molecular chemical form is crucial to many aspects of materials processing, materials corrosion, and environmental pollution. Advanced Nuclear Magnetic Resonance techniques and standards for the use of these techniques are key factors in advancing knowledge and control in these fields.



Judson C. French

*Director, Center for Electronics and
Electrical Engineering
National Engineering Laboratory
National Bureau of Standards*

Mr. French is recognized for his unique and outstanding leadership in organizing and building the Bureau's research activities in solid-state electronics into a comprehensive program covering semiconductor materials, processing techniques, and devices. This program has been acclaimed by both public and private sector organizations for making invaluable contributions toward solving measurement-oriented programs that affect national defense, productivity, and trade. Under his direction the Semiconductor Technology Program has assumed a preeminent role in providing the much needed measurement bases for the semiconductor electronics industry and its customers. Under his management, the Bureau's efforts in this area have grown from a \$0.9 million program with 26 professionals in 1968 to over \$3.5 million, 50 professionals, and specialized research facilities covering the range of measurement problems. In 1977, he received national recognition from the largest professional society in the world by his election to the grade of Fellow of the Institute of Electrical and Electronic Engineers for leadership in developing metrology for semiconductor devices, materials, and fabrication processes.



Kurt F. J. Heinrich

*Supervisory Research Chemist
National Measurement Laboratory
National Bureau of Standards*

Dr. Heinrich is recognized for his outstanding contributions to the Federal Government and the Nation through the development of state-of-the-art measurement methods and standard materials for use in electron and ion probe microanalysis. He originated and directed the laboratory work leading to a series of glass fibers and spheres in the micrometer size range that have made possible quantitative measurement of trace element impurities in semiconductor materials and air and water particulates. Dr. Heinrich has organized a series of workshops that have defined the current state-of-the-art of a number of measurement techniques used in microanalysis and in the determination of asbestos. He is a member of the Commission on Microchemistry and Trace Analysis of the International Union of Pure and Applied Chemistry. Dr. Heinrich has served in a number of other scientific groups concerned with microanalysis and x-ray fluorescence techniques. He is recognized throughout the world as one of the foremost scientists in his field.



Johanna M. H. Levelt Sengers

*Physicist
National Measurement Laboratory
National Bureau of Standards*

Dr. Levelt Sengers is recognized for her outstanding contributions in condensed matter physics in the field of critical phenomena and, in particular, for her research on scaling, universality, and the application of these to solve problems in engineering processes. Dr. Levelt Sengers' incisive analyses of experimental data have led to the first confirmation of the scaling hypothesis which indicates how thermodynamic properties of materials depend on the independent variables as their point is approached. This work is internationally recognized as having provided a major breakthrough toward a fundamental description of thermal properties. Dr. Levelt Sengers' investigations have also led to important applications in predicting the equation of state of widely used substances such as ethylene and steam. Her worldwide leadership has made National Bureau of Standards a center of distinction in critical phenomena.



Leonard W. Snellman

*Chief, Scientific Services Division
National Weather Service
National Oceanic and Atmospheric
Administration
Salt Lake City, Utah*

Mr. Snellman has made outstanding contributions of major significance in science and technology to the Department of Commerce by bridging the gap between theoretical and applied meteorology, exemplified by improved weather forecasts. Notably, he continually provides clinical meteorological instruction to forecasters, raising their standards of performance in the science of weather prediction; he championed the use of computer technology by professional forecasters; he promoted the use of weather satellite information to improve operational weather forecasts; he provided productive feedback for operational improvement of numerical products from the National Meteorological Center; he provided professionalism to TV weather presentations; and he spearheaded videotape training programs within the Region attracting national recognition. Mr. Snellman occupies a position of eminence in the American Meteorological Society, making contributions to the meteorological society at large in the science of prediction. He serves as an Adjunct Assistant Professor at the University of Utah.



Clifton W. Green

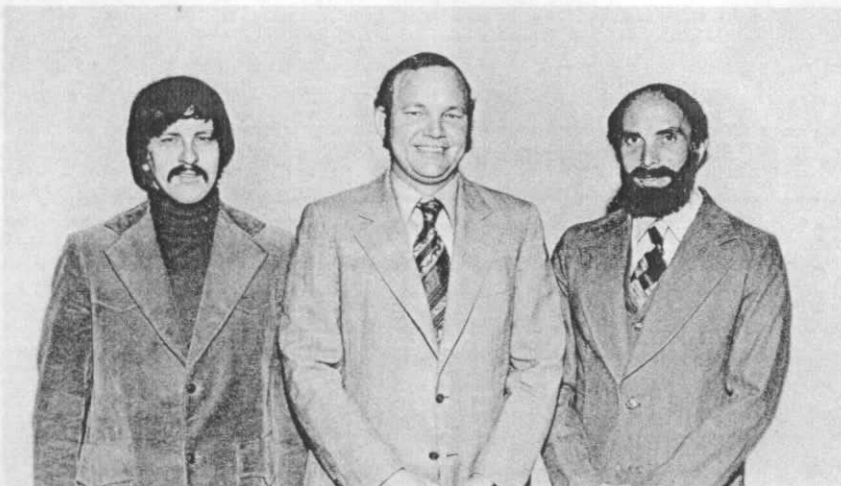
*Supervisory Meteorologist
Jackson, Mississippi*

Earl W. Estelle

*Supervisory Meteorologist
National Weather Service
National Oceanic and Atmospheric
Administration*

Messrs. Green and Estelle are recognized for their remarkable leadership in implementing the Weather Radio Program utilizing Federal-state cooperative agreements that take advantage of state offers to provide antenna and transmitter space, electronics maintenance, and operator support. Mr. Green originated the idea of a cooperative agreement with the State of Mississippi in 1978 whereas Mr. Estelle extended the concept to many other states. As of the spring of 1978, the National Weather Service had entered into agreements with 24 states and Puerto Rico; and active negotiations are underway with ten more states. The resulting ten year savings to the Federal Government have been projected to be on the order of several million dollars.





Donald E. Barrick

Supervisory Electronics Engineer

Michael W. Evans

Physicist

Dr. Barrick, Mr. Evans, and Dr. Weber are collectively responsible for the creation of the unique CODAR (Coastal Ocean Dynamics Application Radar) system. The CODAR system provides, for the first time, an ability to map, continuously in time and space, surface flows over 2,000 square kilometers of ocean as far as 70 kilometers from a coastline. Dr. Barrick first recognized the possibility of mapping surface currents remotely in coastal waters using two small, portable High Frequency Doppler radars. Mr. Evans successfully led a team of research engineers in the design, construction, and testing of the

Bob L. Weber

*Electronics Engineer
National Oceanic and Atmospheric
Administration
Boulder, Colorado*

radars. Dr. Weber developed the sophisticated signal processing and computer software required to extract from the radar echoes the components of velocity and to superimpose the data in such a way as to provide, in almost real time, maps of the ocean surface currents. The CODAR system has been demonstrated successfully in Florida, in the measurement of Gulf Stream currents, and in Alaska, in measurement of lower Cook Inlet tidal flows in connection with environmental assessment of potential oil lease sites.



Norton Strommen

*Meteorologist
Columbia, Missouri*

Sharon LeDuc

*Statistician
Columbia, Missouri*

Clarence Sakamoto

*Meteorologist
Columbia, Missouri*

Drs. Strommen, LeDuc, Sakamoto, Yao, and Mr. Reid are recognized for unique and outstanding contributions to national programs to mitigate the impact of climatic fluctuations on world food supplies. Together they developed an operational global climate/crop modeling, monitoring, assessment, and early warning system essential for planning and implementing national strategies for grain reserves and to dampen the economic impact of unfavorable environmental events. This is the only known operational global system linking climate and climate change to food production. It furnishes statistically derived pre-harvest crop yield estimates which are 90 percent accurate, an accomplishment unmatched by any other operational



Augustine Yao

Meteorologist

Malcolm Reid

*Meteorologist
Environmental Data and
Information Service
National Oceanic and
Atmospheric Administration*

program in the United States, probably worldwide. It also provides weekly worldwide crop/climate qualitative assessments, using a Center for Climatic and Environmental Assessment developed global monitoring system that is the most advanced and most effective yet developed. The Department of Agriculture has adopted the technology developed by the group in its own crop estimation program and sought the group's assistance in developing a similar crop/climate early warning and assessment program for the Department of Agriculture—its number one priority for 1978.



Peter M. McManamon

*Supervisory Electronics Engineer
National Telecommunication and
Information Administration
Boulder, Colorado*

Dr. McManamon is recognized for outstanding technical leadership in the development of programmatic contributions to Data Communications Standards, Direct Satellite Communications, Department of Commerce, and concept studies for Electronic Message Services System, U.S. Postal Service. These contributions have done much to bridge the gap between engineering applications and policy analysis. This is accomplished through recognition of the importance and feasibility of using user-oriented performance criteria in preparation of communication system specifications. As a result, the tradeoffs between the user's initial perception of needs and the costs of the communication system required to meet these needs can be systematically studied. Use of this technique then allows the specification of communication systems which will meet the real requirements at minimum cost.



Louis O. Maassel

*Practices and Procedures Specialist
Office of Assistant Commissioner for
Patents
Patent and Trademark Office*

Mr. Maassel is recognized for his leadership role in the planning which led to the implementation of the Patent Cooperation Treaty on June 1, 1978. He is responsible for the steps taken to plan for the implementation of the Treaty, enabling the United States to participate in the first worldwide agreement simplifying and expediting the filing of patent applications on the same invention in different countries. Mr. Maassel also made a significant contribution in developing the new internal Office procedures and changes in published rules necessary to implement the Treaty. In addition, he is also cited for his contribution in explaining the Treaty, its implications, and its operation to United States industry, the Patent Bar, and the public. Mr. Maassel is widely recognized for his expertise relating to the Treaty, which he has freely shared with the public through meetings and publications, thus reflecting favorably on the Department and its programs.



Herbert Magil

*Examiner-in-Chief
Patent and Trademark Office*

Mr. Magil's unique knowledge of all phases of patent practice and law has enabled him to contribute significantly to the administration and interpretation of the United States patent law in a wide variety of ways over an extended period of time. He was instrumental in the writing of the first official Manual of Patent Examining Procedure. He was a consultant to the drafters of Title 35 of the United States Code, the current patent law. His extensive knowledge of the patent laws, his keen insight into legal and technical matters, and his superior judicial temperament provide guidance and inspiration to his Office colleagues and members of the Patent Bar. Successive Commissioners of the Patent and Trademark Office have called upon him to perform special duties and to serve upon a variety of committees and task forces. These duties have ranged from authoring decisions on petitions to the Commissioner filed by aggrieved patent applicants to the development of additional procedures for the more efficient administration of the patent laws.



Mark M. Newman

*Director, Patent Examining Group 350
Patent and Trademark Office*

Mr. Newman is recognized for his uniquely outstanding leadership, involvement, and accomplishment in the administration of the major program of the Patent and Trademark Office—the examination of patent applications and the issuance of valid patents within a reasonable period of time. His untiring efforts and creative approach to the management of the over 90 people comprising the professional and clerical workforce in the patent examining group under his direction have produced results of major significance to the Patent and Trademark Office and the Department. His unusual knowledge and capabilities have led to the establishment of standards for the various clerical activities that are involved in the processing of patent applications and the revision and strengthening of patent examiner programs directed to the grant of signatory authority and recognition of examiners as experts in their fields.



Emanuel A. Lipscomb

*Chief, Foreign Trade Division
Bureau of the Census*

The need for more timely and accurate trade data to serve as a basis for national policymaking has required new and imaginative direction in the management of the Nation's trade statistical program. Mr. Lipscomb has demonstrated exceptional leadership and technical competence in the management and implementation of new and innovative programs affecting the collection, processing, and dissemination of statistical data relating to export and import trade. Through his direction, he accomplished the implementation of revised classification systems, improving both export and import trade without adversely affecting the regular ongoing work of his division. In order to improve the timeliness of U.S. imports, as well as to enhance the usefulness of import data in analyzing such trade-related events, he successfully directed the conversion of import data to reflect the actual month of importation without disruption of the regular release of the important monthly trade data. He has maintained the highest standard of professional excellence and contributed significantly to the effectiveness of the Federal Government's statistical program and to the usefulness of trade statistics for both government and business.

Ruth H. Mills

*Survey Statistician
Bureau of the Census*

Mrs. Mills has made outstanding and invaluable contributions to the 1970 Census of Population and Housing and the upcoming 1980 Census of Population and Housing. The population census is now the Bureau's most important and visible product impacting on the entire political and social fabric of our society; its results must be highly credible and above reproach. Combining skill and ingenuity, she has assured that disparate contributions of the various components involved in census-taking viz field, geography, population, systems, and processing, fit together in a coherent, effective system for carrying out a census; and she has kept efforts focused on the main objective i.e., providing highly reliable population data, both totals and characteristics. Her comprehensive knowledge of census objectives, her imaginative dedication to making the census a success, and her unique ability to master an infinite variety of essential details and relate them correctly to the major objective have been major contributions in providing assurance that the final product will reflect the full array of subject-matter interest, albeit balanced by operational considerations.

**Silver Medal
Award
Winners**



John A. Gorman

*Assistant Chief, National Income and
Wealth Division
Bureau of Economic Analysis*

Mr. Gorman has made major contributions to the definitions, estimates, and statistical methodology of the U.S. economic accounts. His leadership, expert knowledge, and unique skills have been major factors in adding substantially to the usefulness of the accounts. He has achieved this result by contributing to significant improvements in the design of the existing accounts, to the extension of the accounts into new areas, and to increases in the reliability of the estimates in the accounts.

Roy C. Gootenberg

*Director, Special Activities Division
Bureau of Export Development
Industry and Trade Administration*

Through his innovative leadership, Mr. Gootenberg has enabled the Department of Commerce to provide American industry with a variety of significant international trade promotion techniques designed to increase U.S. exports such as Industry-Organized Government-Approved Trade Missions, In-Store Promotions, Specialized Trade Missions, and Video Tape Catalog Exhibitions. These activities continue to represent vital elements of the U.S. Export Expansion Program. As a result, thousands of American manufacturers and suppliers have found new markets abroad; and many millions of dollars in export sales and jobs have been added to the Nation's economy.

Kent N. Knowles

*Deputy Assistant General Counsel for
Industry and Trade
Office of the General Counsel*

Mr. Knowles has consistently demonstrated initiative and has superbly contributed to the advancement of Department activities involving industry and trade through sound legal counsel. His professional abilities have been significant factors in the effective administration of vital national programs conducted under authority of the Export Administration Act of 1969 and related Departmental regulations. His overall knowledge and organizational capabilities have enabled Departmental programs, particularly those relating to Export Administration, to be administered in an effective and efficient manner. His cooperation with governmental agencies, offices of the legislative and judicial branches of government, trade associations, lawyers, business executives, and members of the public has been consistently outstanding.

Francis J. O'Connor, Jr.

*Director, Bureau of Field Operations
Boston District Office
Industry and Trade Administration
Boston, Massachusetts*

Mr. O'Connor has demonstrated exceptional leadership in planning and administering Department of Commerce and Industry and Trade Administration programs in the States of Maine, New Hampshire, Vermont, Massachusetts, and Rhode Island. These services have resulted in significant assistance to the business community which has increased exports and stimulated domestic trade with special aid being given to the New England Fishing Industry.

Frank B. Case

*Chief, Division of National Security Plans
Maritime Administration*

Mr. Case has achieved major program advances in planning for operation of U.S. shipping and port facilities in the event of a national emergency. As a result of his efforts, the U.S. will be assured of prompt and adequate emergency sealift support from our North Atlantic Treaty Organization (NATO) allies if needed during a national emergency. Mr. Case prepared the U.S. position on this matter for submission to NATO approving authorities in such logical, persuasive and irrefutable terms that it was approved by the Senior Civil Emergency Planning Committee of NATO virtually without debate or amendment. Mr. Case's work has brought great credit to the Department and has solidified his reputation as one of the most highly respected and influential national advisers of all the NATO delegations dealing with civil preparedness.

John J. Garvey

*General Engineer
Office of Advanced Ship Development
Maritime Administration*

Mr. Garvey is recognized for his outstanding performance since 1970 as manager of the National Shipbuilding Research Program which, through his initiative, skill, and perseverance, has become one of the Maritime Administration's (MarAd) most effective programs. His personal efforts have given the MarAd research and development program high credibility throughout the industry and have brought about increased private sector participation and substantial benefits to the Government and the U.S. shipbuilding industry. His enthusiasm for the task assigned and his management skill have combined to create a cooperative Government-industry program which has effectively removed many long-standing institutional barriers to innovation in shipbuilding.

S. Thomas Romeo

*Trade Specialist
Office of Market Development
Maritime Administration*

Mr. Romeo is recognized for his outstanding contribution to the United States Merchant Marine and his leadership in initiating an imaginative approach to the implementation of the requirements of the United States cargo preference laws. His efforts have been directed to programs administered by many civilian government agencies, agencies of the Department of Defense, foreign government embassies, freight forwarders, and U.S. and foreign manufacturers involved in contracts subject to the cargo preference laws. He has introduced an entirely new approach to the resolution of cargo preference compliance problems which in the past seemed insurmountable. The benefits to the U.S. Merchant Marine in the area of new cargoes and increased freight revenues will continue for many years because of the permanent changes he has initiated in government regulations and policies involving the U.S. Merchant Marine.

Martin J. Aronoff

*Operations Research Analyst
Institute for Computer Sciences and
Technology
National Bureau of Standards*

Mr. Aronoff is recognized for the exceptional leadership he has given to the development of computer data services for nationally important projects. Over the past 4 years, he has led the design and implementation of two major computer systems. One system supported the American Revolution Bicentennial Commission in coordinating the 1976 national celebration. The second system, developed since 1976, is helping the Bureau's Center for Building Technology and the Department of Housing and Urban Development to advance the use of residential solar energy systems in the national energy conservation effort. Because of superior technical management by Mr. Aronoff, substantial difficulties have been overcome; and these complex technical systems have been completed successfully, exceeding the sponsor's expectations.

Daniel B. Butrymowicz

Metallurgist

*National Measurement Laboratory
National Bureau of Standards*

Dr. Butrymowicz as Director of the Diffusion in Metals Data Center has been responsible for the development of a unique, internationally-recognized diffusion information activity, highly valuable to both industry and science. He has made major contributions to the comprehensive review and critical evaluation of alloy diffusion data as well as to effective dissemination of information concerning diffusion-controlled processes. Through his preparation and publication of expert reviews on diffusion in important commercial and scientific alloys, he has provided a unique contribution to standard reference data, the field of metallurgy, and U.S. industry in this area.

Burton H. Colvin

*Director, Center for Applied Mathematics
National Engineering Laboratory
National Bureau of Standards*

Dr. Colvin is recognized for significant contributions to the solution of national problems through the application of the mathematical sciences. His unusual mathematical expertise, combined with highly developed management skills, has resulted in the interdisciplinary acceptance and use of the mathematical sciences within Bureau programs that meet public needs. Dr. Colvin's supervision of the group that performed such studies as the Daylight Saving Time Study, the Alaska Pipeline Project, and the study of cost-constrained network optimization for railroads has confirmed the Bureau's reputation for high technical quality. His long-range planning efforts are expected to provide fundamental strengthening of research on fluid flows and will contribute significantly toward reducing loss of life and property caused by unwanted fires. Dr. Colvin's paper on the Bureau's role in support of measurements needed for regulatory purposes is serving as the basis for extended program planning.

John R. Dise

*Manager, Materials Reference Laboratories
National Engineering Laboratory
National Bureau of Standards*

Mr. Dise is recognized for his significant technical contributions to and administrative leadership of two Bureau Reference Laboratories, the Cement and Concrete Reference Laboratory and the American Association of State Highway and Transportation Officials Materials Reference Laboratory. Under his outstanding leadership, 19 scientists and engineers inspect and evaluate for conformance to standard specifications over 600 construction materials testing laboratories throughout the U.S., Canada, and Puerto Rico. For this work in 1972, Mr. Dise was selected by the Board of Directors of the American Society for Testing and Materials (ASTM) to receive one of its highest honors, its Award of Merit. Since that time, he has received additional commendations from ASTM as well as nationwide recognition from such organizations as the American Concrete Institute and the American Association of State Highway and Transportation Officials.

Joseph E. Fones

*Supervisory Budget Analyst
Office of the Associate Director for
Programs, Budget and Finance
National Bureau of Standards*

Mr. Fones is recognized for his outstanding contributions to the National Bureau of Standards (NBS) as Executive Officer of the former Institute for Basic Standards. He assured the fiscal integrity of a large and diverse research and development organization by establishing a management reporting system that kept management informed of the fiscal and personnel status and budget projections of 12 operating divisions. Mr. Fones' expertise has been in demand in other parts of NBS, and he has served as chairperson and member of Bureau-wide committees dealing with administrative reform. He has been responsible for the training of a large number of administrative personnel who have taken positions throughout NBS. Mr. Fones has also performed a key role in coordinating all fiscal aspects of the NBS reorganization.

James A. Grundl

*Physicist
National Measurement Laboratory
National Bureau of Standards*

Dr. Grundl is recognized for his development of a system of standard neutron fields, reference fissionable deposits, and fission ionization chambers to provide the basis for neutron measurements in nuclear power reactors needed for electric power for the Nation and for the dissemination of these standards to the United States and internationally through a vigorous program of management quality assurance. This work has led to greatly improved measurements of the neutron fields existing in power reactors, leading to improved efficiency and safety. The community served by this measurement base includes both government laboratories and industry and, while primarily national in scope, through cooperative efforts is now worldwide.

Robert J. Hocken

*Supervisory Physicist
National Engineering Laboratory
National Bureau of Standards*

Dr. Hocken is recognized for outstanding technical contributions to the accurate measurement of three dimensional objects. Dr. Hocken used his unique expertise and unusual skills to develop a method to provide an accurate cross-checked set of consistent measurements essential in insuring proper equity in national and international trade. The application of his measurement methodology to shipboard liquefied natural gas (LNG) tank calibrations is expected to result in a yearly custody exchange net loss or gain for the nine U.S. ships of under \$80,000 as compared to the original exchange error of a possible \$1.7 million. The application of his measurement methodology to the dimensional characterization and computer control of manufacturing machinery will reduce manufacturing costs by permitting manufacturers to use less expensive machine tools in the manufacturing process.

Charles P. Howard

*Supervisory General Engineer
National Engineering Laboratory
National Bureau of Standards*

Mr. Howard is recognized for outstanding technical contributions to the development of test methods for the measurement of energy consumption and to the establishment of energy efficiency improvement targets for ten categories of appliances identified as National Bureau of Standards responsibilities under the Energy Conservation and Production Act of 1976. His dedicated efforts, overall technical competence, and excellent managerial skills resulted in the development of a set of test methods and energy improvement targets which under law the manufacturing industry must use to measure energy efficiency improvements and to develop annual energy consumption figures. As a result, Mr. Howard's work is reducing the energy consumed by ten categories of household appliances.

Clayton Huggett

*Chief, Office of Extramural Fire Research
National Engineering Laboratory
National Bureau of Standards*

Dr. Huggett is recognized for outstanding contributions in focusing Bureau research on the fundamental problems of unwanted fires and for developing a major part of the current Center for Fire Research's scientific competence in this field. Dr. Huggett was instrumental in developing a collaborative inter-Institute relationship that led to the discovery of a new phosphorus species important in flame inhibition. His current management of a program that distributes over \$2 million of Federal funds annually is making significant progress in converging the fire research capabilities of universities and of the private sector with research in the Federal Government. Through his activities, Dr. Huggett has added significantly to the Center for Fire Research's reputation of being the leader in the field of fire research in the United States.

Frederick C. Johnson

*Chief, Mathematical Analysis Division
National Engineering Laboratory
National Bureau of Standards*

Dr. Johnson is recognized for his distinguished contributions in improving the management of Pacific Northwest salmon fisheries by the development of large-scale mathematical modeling techniques for evaluating the biological and economic effects on the salmon industry of changes in regulatory policy, production enhancement, and environmental conditions. His brilliant work contributed to rational discussion of sensitive Indian fishery treaty questions between the State of Washington and the Federal Government and served as a fundamental tool in implementing fishing regulatory policy. His modeling techniques are being adapted for the analysis of anadromous fishery management problems of the Columbia River system, to the long-range development plans for fishery management for the State of Alaska, and to the resolution of international fishery problems.

George E. Kelly

*Mechanical Engineer
National Engineering Laboratory
National Bureau of Standards*

Dr. Kelly is recognized for his outstanding technical contributions to the development of energy efficiency labels for central residential heating and cooling equipment. In fulfilling some of the responsibilities assigned to the Bureau under the Energy Policy and Conservation Act of 1975, Dr. Kelly directed a team of engineers and technicians in setting energy efficiency targets, developing test methods, and calculating procedures for determining the seasonal performance factors for residential central air conditioners, heat pumps, furnaces, and boilers. As a result of his work, manufacturers throughout the U.S. are able to publish certified energy-use ratings for each of their models. In addition, every homeowner in the U.S. is able to make a more energy-prudent purchase involving central heating and cooling equipment.

Ernest G. Kessler, Jr.

*Physicist
National Measurement Laboratory
National Bureau of Standards*

Dr. Kessler is recognized for his outstanding contribution in establishing a new class of accuracy of gamma-ray standards. In this effort he has extended and improved the state-of-the-art in fundamental metrology to a very significant degree. The results of this work are already in wide use in several fields of nuclear spectroscopy and meson physics. The impact of the new standards, which represent at a minimum a fortyfold improvement on previous state-of-the-art, has been widespread. It has served already to resolve historically very significant discrepancies and permitted the establishment of improved values for the mass of the pi-meson. This work required outstanding diligence, mature competence, and scientific integrity of the highest order.

Neil T. Larsen

*Physicist
National Engineering Laboratory
National Bureau of Standards
Boulder, Colorado*

Mr. Larsen is recognized for major contributions to the science of measuring microwave power. He designed a control system for the basic Bureau standard for microwave power that won a position of world leadership in microwave measurements which account for a quarter of all Bureau measurement and calibration services. He developed a microwave power meter that is considerably more accurate and less expensive than previous ones and it is now widely used in metrology laboratories in the Department of Defense, the aerospace industry, and the Bureau. Recently he developed another microwave power meter of radically improved design that made it possible to make the very precise measurements needed to determine the performance of satellite communication ground stations.

George P. Lewett

*Chief, Office of Energy-Related Inventions
National Engineering Laboratory
National Bureau of Standards*

Mr. Lewett is recognized for leadership in organizing and managing the Bureau's Office of Energy-Related Inventions (OERI) established under the Federal Nonnuclear Energy Research and Development Act of 1974. Mr. Lewett developed the OERI program and guided it from its inception in March 1975 to its present status of a well-recognized, highly respected source of competent and impartial analysis of new energy technology that serves as an avenue of Federal support for individual inventors and small companies. As Chief of OERI, Mr. Lewett managed creatively and effectively in a complicated environment requiring good technical judgment, an awareness of the latest technologies and the patience to deal with individual inventors on a day-to-day basis. To date 7,000 of the 8,000 inventions received have been reviewed and 58 forwarded to the Department of Energy for support. Of the 58, 11 have been awarded nearly \$1 million for further development.

Sharon G. Lias

*Research Chemist
National Measurement Laboratory
National Bureau of Standards*

Dr. Lias is recognized for her exceptional scientific skill in exploring and explaining the chemical and thermodynamic properties of electrically charged molecules. Her work has advanced the development of chemical lasers and the understanding of flames, plasmas, and the high energy radiation on matter. Her pioneering studies of the reactions of ions in liquids and gases have made possible the development of the analytical method known as "chemical ionization mass spectrometry". She has applied a new experimental tool, ion cyclotron resonance, to the study of the energetics of and equilibria in reactions of ions with molecules and has improved the quantitative interpretation of the thermodynamics of these processes. Both innovative and thorough, Dr. Lias has played a major role in establishing the Bureau as a leading center for research in ion kinetics and thermochemistry.

Gordon E. Lyon

*Computer Scientist
Institute for Computer Sciences and
Technology
National Bureau of Standards*

Dr. Lyon is recognized for original research and outstanding authorship in computer science. He has distinguished himself as editor of the Bureau's Software Engineering Handbook, working diligently over an extended time with international authorities to provide technical guidance to computer programmers. He has pioneered as an individual researcher of software engineering methods, publishing new results on fundamental computing procedures. His discoveries open an important new approach for standardization of computer algorithms that will improve quality in government computer programs. His work is a model for advancing computer software practices, and it enhances the scientific competence of the Bureau and the Department in the government-wide standards effort.

Harold E. Marshall

*Chief, Applied Economics Program
National Engineering Laboratory
National Bureau of Standards*

Dr. Marshall is recognized for his outstanding leadership that resulted in the development within the Bureau of a strong core competence that has skillfully applied economics research to the solution of prominent national problems in energy conservation, pollution abatement, rehabilitation of buildings, and new technologies. Under his direction, Dr. Marshall's staff developed two major energy conservation documents that have brought the Department and the Bureau national recognition: (1) "Making the Most of Your Energy Dollars", a brochure that gives homeowners a method for determining the most profitable energy conservation improvements for their homes, and (2) a set of guidelines that Federal, State, and local governments are using to make economic evaluations of alternative energy conservation investments in new and existing buildings.

Taki Negas

*Research Chemist
National Measurement Laboratory
National Bureau of Standards*

Dr. Negas has made significant contributions to knowledge of the chemistry of complex multicomponent oxides, especially those containing variable valence elements or elemental substitutions producing local structural changes. Dr. Negas' work centers in the newly developing field of local structures and associated chemistry in the region of chemical variation between extended disordered defects and well-ordered secondary structures. This region is of great scientific interest for the structural chemistry involved. It is of great technical interest for the range of magnetic, electronic, ion-transport, and catalyst properties possible and because this region of intermediate defect structures is involved in some forms of corrosion. This field requires careful control of chemical activities to achieve true equilibrium.

Arthur V. Phelps

*Senior Scientist
National Measurement Laboratory
National Bureau of Standards
Boulder, Colorado*

Dr. Phelps is cited for his efforts and effectiveness in transferring results of fundamental research in atomic and molecular physics to technological communities concerned with (1) development of high power and ultraviolet lasers in industry and government; (2) development of efficient coal burning energy conversion devices; (3) prediction of disturbed ionospheric properties for defense and communications; (4) development of higher-efficiency, good-color, more easily used lighting; and (5) development of miscellaneous industrial devices such as ozonizers. Dr. Phelps' own fundamental research establishes him among the best in the field; and he has over 50 scientific publications, many of "landmark" significance. He has gone beyond this in understanding and modeling how fundamental processes contribute collectively to the behavior of the world around us, most particularly in the area denoted above.

Darrell H. Reneker

*Supervisory Physicist
National Measurement Laboratory
National Bureau of Standards*

Dr. Reneker is recognized for his important contributions to the understanding of the structure and properties of plastics. These cover a broad range of crystal morphologies and structures, crystal defects, measurement techniques and properties. Using his research into the structure, morphology, and spectroscopic properties of crystalline plastics, he developed the concept of a point dislocation which can translate a polymer molecule along its axis with a minimized energy. This key conceptual development has been taken up and applied by many to the physical performance of plastics. It is known as the "Reneker Defect". Through lectures and publications, he has presented this and other results concerned with nondestructive testing and migration in plastics to industrial and governmental user groups for application to national problems.

Martin R. Shaver

*Supervisory Computer Systems Analyst
Office of the Director of Administrative
and Information Systems
National Bureau of Standards*

Mr. Shaver is recognized for his sustained leadership and distinguished contributions to the advancement of central computer services. His efforts have contributed significantly to the improved effectiveness of the central computer facility which, in part, has enabled the Bureau to accelerate its mission accomplishments in a wide variety of technical and supporting activities. His competence, dedication, and initiative have provided the working-level leadership which was essential to the achievement of new operational levels of capacity, performance, and reliability that equal or exceed the state-of-the-art. Mr. Shaver's outstanding contributions have markedly enhanced the prestige of the central computer facility and strengthened the leadership of the Bureau and the Department in the management and utilization of computers.

George A. Uriano

*Deputy Chief, Office of Standard Reference Materials
National Measurement Laboratory
National Bureau of Standards*

Mr. Uriano is recognized for his contributions, both technical and managerial, to the Standard Reference Materials Program (SRM). He was instrumental in organizing and implementing the National Reference System in Clinical Chemistry, a national undertaking aimed at establishing the scientific base upon which improved accuracy and reliability of clinical measurements in the Nation may be assured. His development and implementation of a unique inventory control model for minimizing long term costs of producing SRM's will lead to savings of more than \$22 million over the next 20 years. Finally, as a result of his efforts, two government/industrial cooperative agreements aimed at expanding SRM production have been reached.

James H. Winger

*Supervisory Mechanical Engineer
National Engineering Laboratory
National Bureau of Standards*

Mr. Winger is recognized for significant contributions to improved public safety by reducing fire hazards through the development of flammability standards for products in the home. Under his outstanding leadership, the flammability standard for mattresses, currently under consideration by the Consumer Product Safety Commission, was developed. Mr. Winger supervised the development of the proposed flammability standard for upholstered furniture. He also directed the laboratory development of the two children's sleepwear standards, currently in effect; a flammability standard for flight attendants uniforms; and a proposed standard for the flammability of general wearing apparel.

J. Michael Rowe

Research Physicist

John J. Rush

*Supervisory Chemist
National Measurement Laboratory
National Bureau of Standards*

Drs. Rowe and Rush are recognized for their outstanding contributions through creative research to an understanding of the microscopic effects of hydrogen in metals and alloys. Impact areas of their work include: embrittlement of structural and refractory metals, durability of many products, hydrogen storage of energy, energy transmission, and the use of metals in gas purification technology. During the last decade they have led the way in the U.S. in the development and application of neutron scattering methods for understanding the detailed behavior of metal-hydrogen systems at the atomic level. Their pioneering work, resulting in a series of classic scientific papers and invited lectures, has received international recognition in the scientific community and has established the Bureau as one of the world leaders in the field. This work is specifically referred to as an area of excellence in the recent National Academy Science Report on Neutron Scattering in the Condensed Matter Sciences.

P. Thomas Olsen

Physicist

Edwin R. Williams

Physicist

*National Measurement Laboratory
National Bureau of Standards*

Mr. Olsen and Dr. Williams are recognized for their outstanding determining of the proton gyromagnetic ratio to the unprecedented accuracy of two parts in ten million, a factor of twenty improvement over the best previous value. In combination with the values of other fundamental physical constants, this result has yielded a value for the fine-structure constant with an accuracy of one part in ten million. This, in turn, has enabled theoretical physicists to critically and unequivocally compare their quantum electrodynamic theoretical calculations of various fundamental quantities, such as the anomalous magnetic moment of the electron, with the experimentally determined values. Such comparisons are of crucial importance to the testing of the validity of quantum electrodynamics, one of the most important and accurate theories of physics.

Robert J. Celotta

Physicist

Daniel T. Pierce

Physicist

*National Measurement Laboratory
National Bureau of Standards*

Drs. Celotta and Pierce have made outstanding contributions to experimental electron physics through the development of new and greatly improved sources, detectors, and measurement methods for low-energy spin-polarized electron beams. Their new source of polarized electrons is 100 to 1,000 times as intense as previous sources. Their new detector will be at least 100 times as efficient as previous detectors. Their new spin-modulation technique obtains data in minutes instead of days and weeks. Many new types of polarized electron measurements are now possible. The imaginativeness and impact of these developments by Drs. Celotta and Pierce have made the Bureau one of the leading centers in the world in polarized electron research.

Robert P. Blanc

*Staff Assistant for Computer Utilization
Programs*

Robert Rosenthal

Electronic Engineer

Shirley W. Watkins

Computer Scientist

*Institute for Computer Sciences and
Technology
National Bureau of Standards*

Messrs. Blanc, Rosenthal, and Mrs. Watkins, have made outstanding technical contributions in their pioneering work in the creation, development, demonstration, and application of a new technique that makes computer networks significantly easier to use. Their accomplishment is a major breakthrough in making Federal computer networks readily available to all authorized users. The results of this work are improving the effectiveness, efficiency, and economy of the Federal Government's use of computer technology. These individuals have become widely recognized for this achievement, both in terms of the concept and its practical application. They have reflected credit on the Department of Commerce and strengthened the Department's role in the rapidly growing field of computer technology.

Joe H. Allen

*Geophysicist
Environmental Data and Information
Service
National Oceanic and Atmospheric
Administration
Boulder, Colorado*

Mr. Allen has shown outstanding leadership and accomplishment in promoting international multidisciplinary cooperation in the International Magnetospheric Study (IMS) as head of the IMS Central Information Exchange (IMSCIE) Office. This Office has provided a focus for the crucial information collection and distribution task that has made possible effective self-coordination of the worldwide IMS satellite, rocket, balloon, aircraft, ship and ground-based experiment programs. Since January 1976, the IMSCIE Office has served as a clearinghouse to dependent experimenters for the prompt relay of information about program changes. Timely communications by telephone, telex, letter, and monthly IMS Newsletters have served to unify the community of scientists participating in the IMS and have gained their cooperation and praise.

Harold G. Beard

*Geodetic Technician
National Ocean Survey
National Oceanic and Atmospheric
Administration*

Mr. Beard is recognized for planning, coordinating, and directing of field survey operations for the Southern California Releveling Program (SCRIP) which involved 13 Federal, State, regional, and local agencies. The purpose of the project was to obtain an "instantaneous" picture of elevation in the Southern California area in support of the Federal Earthquake Hazards Reduction Program and other scientific and engineering studies. The project involved nearly 3,000 miles of leveling over a period of 4 months by the largest group of leveling teams ever assembled for a single project.

Willette M. Carlton

*Mathematician
National Weather Service
National Oceanic and Atmospheric
Administration*

Ms. Carlton is being recognized for her exceptional skills in designing, developing, and implementing sophisticated systems for operating the National Meteorological Center's (NMC) numerical prediction models. As the principal scientist involved in these tasks, she has made significant contributions to the Center's primary weather support mission by increasing model run efficiency. Her actions have assured timely delivery of products to national and international users who depend on NMC products for basic guidance in world-wide weather forecasting operations.

Robert R. Freeman

*Deputy Director, Environmental Science
Information Center
Environmental Data and Information Service
National Oceanic and Atmospheric
Administration*

Mr. Freeman is recognized for outstanding contributions to major state, national, and international programs for environmental information and for advancing the application of current technology in the information field. He conceived and implemented the Oceanic and Atmospheric Scientific Information System (OASIS), a program for improving access to environmental information through computerized information retrieval, data bases, and information centers. Through his efforts, the OASIS program has contributed major marine and atmospheric data bases to the national scientific and technical information system. The OASIS concept of information centers has been incorporated into the Regional Coastal Information Center Program. Internationally, he initiated and negotiated U.S. participation in the global Aquatic Sciences and Fisheries Information System and was instrumental in its automation and the expansion of its coverage to include nonliving resources, marine technologies, and ocean policy and economics. He has also increased public access to and application of scientific information through his advisory role to the Model Interstate and Scientific and Technical Information Clearinghouse operated by the National Conference of State Legislators.

Leon R. LaPorte

*Physical Scientist
Environmental Data and Information Service
National Oceanic and Atmospheric
Administration*

Mr. LaPorte is recognized for invaluable contributions to the public and exchange of scientific data and information resulting from the International Decade of Ocean Exploration (IDOE) and the International Cooperative Investigation of the Tropical Atlantic (ICITA). He is responsible for the IDOE Progress Report series published for the National Science Foundation (NSF). This series owes its existence and character primarily to Mr. LaPorte's efforts and has been characterized as "a new standard for information exchange in large environmental research projects" by the Head of the NSF Office for the IDOE. Mr. LaPorte also was the major catalyst in the production of the two-volume ICITA Atlas, published in four languages and distributed throughout the world by the United Nations Educational, Scientific, and Cultural Organization. This Atlas is the definitive analytical summary of ICITA.

Elliot A. Macklow

*Chief, Motion Picture Service
Office of Public Affairs
National Oceanic and Atmospheric
Administration*

Mr. Macklow is an extremely talented and creative filmmaker. His films have won major awards in six international and one national film festival in the past 12 months. His productions, viewed by millions of persons annually, present vital National Oceanic and Atmospheric Administration (NOAA) programs to a wide public in a manner not only useful but compelling and entertaining. His output is extremely high, especially in view of the fact that he supervises every production detail of every film. He is now at work on five films simultaneously, with several more in the planning stage. His contribution to NOAA and to the Nation, through his art, has been substantial. Through his efforts, Americans of all ages have become familiar with the work of NOAA.

Ray E. Moses

*Manager, Marine Data Systems Project
National Ocean Survey
National Oceanic and Atmospheric
Administration*

Under Captain Moses' direction, the development of computer-assisted nautical charting operations has been greatly expedited and these techniques implemented throughout the nautical charting system. Other government agencies and several countries have adopted many of the features developed under his leadership. Captain Moses' outstanding program management and technical leadership will make possible the timely and accurate production of nautical charts for the Nation's maritime users at an expected multimillion dollar cost avoidance. His innovative training techniques and use of part-time high school students have resulted in major cost savings to the project while maintaining planned program schedules.

Frank T. Quinlan

*Chief, Climatological Analysis Division
Environmental Data and Information Service
National Oceanic and Atmospheric
Administration
Asheville, North Carolina*

Mr. Quinlan is cited for outstanding leadership in conducting studies of climate/solar energy relationships critical to major national energy programs. He rehabilitated solar radiation data essential to the development of a national energy program and developed the Test Reference Year (TRY) concept for calculating building heating and cooling energy loads. Mr. Quinlan served on the Department of Energy's Proposal Evaluation Panel responsible for evaluating contracts for solar energy research and training sites. The statistical techniques developed by him provided the Department of Energy with climatic data designed to monitor heating fuel consumption in the Nation. Mr. Quinlan has also contributed significant climatic data for application to the design of energy conserving buildings.

Kenneth Sherman

*Fishery Biologist
National Marine Fisheries Service
National Oceanic and Atmospheric
Administration
Narragansett, Rhode Island*

After the oil spillage by the ARGO MERCHANT in December 1976, Mr. Sherman designed and directed a research effort to analyze and evaluate the ultimate consequences of the environmental contamination. He and his assistants rapidly and reliably produced the necessary information on the effect of the oil on zooplankton and fish eggs, the transmission of the oil through food chains, and the impact of the oil on future fish populations. He also masterfully coordinated the work of the Northeast Fisheries Center with the work of academic institutions, scientific institutions, state agencies, and other Federal agencies. None of this would have been possible had not Mr. Sherman so significantly manifested a strong sense of team responsibility and quality workmanship within his scientific staff.

Carroll I. Thurlow

*Deputy Chief, Oceanographic Division
National Ocean Survey
National Oceanic and Atmospheric
Administration*

Through his outstanding skill in the development and management of the Federal-State Cooperative Marine Boundary Program, Mr. Thurlow has significantly enhanced the services of the Federal Government. In particular, he has perfected a relationship between the Department of Commerce and the coastal states which requires the technical support of the National Ocean Survey. Mr. Thurlow has distinguished himself by displaying exceptional leadership in the implementation of the program. His performance has made a valuable contribution to State government and private industry and has improved the Federal and State cooperative roles.

Philip Williams, Jr.

*Chief, Meteorological Services Division
National Weather Service
National Oceanic and Atmospheric
Administration
Salt Lake City, Utah*

Mr. Williams has had a long and illustrious career serving as forecaster; research meteorologist; Assistant Chief, Scientific Services Division; and Chief, Meteorological Services Division. During his career, he has made numerous contributions in the improvement of weather services. Included among these are the improvement and expansion of the fire weather service in the West; strong stewardship in weather service to marine interest; strong support and expertise in the establishment of the Weather Radio program in the West; and accomplishments in improving the posture and services in Agricultural Meteorology. Mr. Williams has been an outstanding and effective administrator. He has distinguished himself through meritorious authorship and is a Fellow of the American Meteorological Society.

NOAA Ship RUDE NOAA Ship HECK

*National Ocean Survey
National Oceanic and Atmospheric
Administration
Norfolk, Virginia*

LCDR Robert V. Smart, LTJG Kenneth G. Vadnais, ENS Samuel P. DeBow, Jr., Messrs. William N. Brooks, Johnnie B. Davis, James S. Eamons, Kenneth M. Jones, Frank Krusz, Jr., Anthony W. Styron, and Elijah J. Willis of the NOAA Ship RUDE and LCDR Thomas W. Ruzsala, LTJG Charles E. Gross, and Messrs. Mark Aldridge, Horace B. Harris, Charles J. Gentilcore, Dennis S. Brickhouse, Robert T. Lindton, Arnold K. Pedersen, Joseph Wiggins, and James P. Taylor of the NOAA Ship HECK are recognized for rescuing the crew and scientists from the burning vessel M/V MIDNIGHT SUN and saving the vessel from total loss. The crew of the NOAA Ship RUDE safely took aboard all 20 crew members of the burning vessel who were afloat in life rafts near the vessel. First aid was administered, and the crew members of the disabled ship were transported safely to shore. The crew of the NOAA Ship HECK demonstrated outstanding seamanship through their efforts over 20 consecutive hours to fight the fire. The actions of the two ships' crew members demonstrated superior performance and exceptional courage in a maritime emergency beyond the call of duty.

Richard E. Aegerter

*Supervisory Patent Examiner
Patent and Trademark Office*

Mr. Aegerter has demonstrated outstanding skill and ability in the performance of official duties over a long period of time which have contributed to the advancement of the Department and Patent and Trademark Office program of reducing the pendency of applications in the Office. He has demonstrated outstanding leadership as a Supervisory Patent Examiner and has inspired subordinates to improve both the quality and quantity of their work which has contributed toward advancing Departmental and Patent and Trademark Office goals.

Edward M. Drazdowsky

*Supervisory Patent Security Assistant
Patent and Trademark Office*

Mr. Drazdowsky is recognized for his contributions in the administration of patent statutes and regulations that affect the national security. His accomplishments in processing patent applications in which inventions may have been made under the Atomic Energy Act or the National Aeronautics and Space Act have been invaluable. His efforts to develop and implement procedures reducing pendency times of patent applications, consistent with national security interests, have resulted in highly efficient and effective utilization of the staff and time.

Lorenzo B. Hayes

*Primary Examiner
Patent and Trademark Office*

Mr. Hayes is the recognized expert in the technology of electroless coating. He has demonstrated an outstanding degree of competence in matters of patent law and practice, as well as developing others in the practice. His production record and performance have been exceptionally outstanding in every respect. His highly effective talents materially contributed to the accomplishment of the mission and goals of the Office. Mr. Hayes' expert ability has advanced the technology of compositions having metal plating on non-metallic and metallic surfaces. He is responsible for issuing most of the basic patents in this art. This art represents a technological breakthrough in the manufacture of highly significant materials such as printed circuits, photocircuits, non-peeling chrome plated materials like automobile bumpers, plated fiberglass, and a host of other non-corrosive surfaces basic to the automobile, electronic, aeronautical, and boating industries.

Joyce G. Hill

*Supervisory Patent Assistant
Patent and Trademark Office*

Miss Hill is recognized for her outstanding leadership and effectiveness in the administration of the Patent and Trademark Office Examining Corps—generalist program. Through her efforts and leadership a career ladder GS 1–5 for clerical employees in the Patent and Trademark Office has become a cost beneficial program, providing an effective upward mobility program for the Department.

Ralph S. Kendall

*Patent Examiner
Patent and Trademark Office*

Mr. Kendall has performed his duties as an Examiner for many years in such an expert and authoritative manner that he has exerted a substantial impact upon the patent community and, through it, upon technologies and industries throughout the world which have benefited from corrosion resistant and paint adherent metals. His contributions in the field of metal coating have led to the use of metals with improved corrosion resistance in automobiles, missiles, aircraft, food containers, military ammunition, and in many other applications with a tremendous economic saving. The use of metal coating processes which impart corrosion resistance without the use of chromium remove a threat to the environment.

Edward E. Kubasiewicz

*Associate Solicitor
Patent and Trademark Office*

Mr. Kubasiewicz is recognized for extraordinary and outstanding performance of duties which has resulted in valuable contributions to and significant advances in the programs of the Patent and Trademark Office. Mr. Kubasiewicz is cited for his unique contribution in providing for the efficient processing and evaluation of petitions to the Commissioner which are delegated to the Deputy Assistant Commissioner for decision, and the exceptional ability and skill that he has demonstrated as assistant to the Deputy Assistant Commissioner for Patents.

William I. Price

*Supervisory Patent Examiner
Patent and Trademark Office*

Mr. Price has established a record of extremely competent performance of official duties over a long period of time which has contributed to the advancement of the Department and Patent and Trademark Office program of reducing the pendency of patent applications. He has set an exceptionally fine example for other examiners and his subordinates by his inspiration to others and by his management abilities, which have encouraged other examiners and Mr. Price's subordinates to improve the quality and quantity of their work.

Robert J. Rish

*Director, Office of Patent and Trademark
Services
Patent and Trademark Office*

Mr. Rish is recognized for consistently outstanding ability to achieve significant and valuable advances in the administrative support operations of the Patent and Trademark Office. He is cited for the extraordinary managerial skill and ability he has displayed in solving complex operational problems and for the many important improvements in public services which he has implemented. As a direct result of his efforts, noteworthy gains in productivity and quality have been made which have permitted substantial reductions in resource requirements. Mr. Rish is also cited for his positive and extremely valuable assistance to a wide range of special groups that have a vested interest in the effectiveness and efficacy of the internal operations of the Patent and Trademark Office.

Al Lawrence Smith

*Supervisory Primary Examiner
Patent and Trademark Office*

Mr. Smith is recognized for outstanding performance of official duties and for many significant contributions to the administration of the Patent and Trademark Office throughout his career in the Examining Corps. His performance as an examiner and supervisor has been recognized by many awards over a period of years. He has served with dedication and distinction in a multitude of important administrative assignments and has been singularly responsible for a number of educational and procedural developments that have significantly improved the efficiency of the patent examining process.

Morris Gorinson

*Assistant Chief, Decennial Census Division
Bureau of the Census*

Mr. Gorinson is recognized for his outstanding achievements in various phases of the decennial censuses of population and housing over a number of years. Presently, he is making important and innovative contributions to the planning of the 1980 census. In the 1970 census, Mr. Gorinson was responsible for directing the many aspects of the processing systems design and coordination, and his professional expertise, initiative, and conscientiousness enabled his staff to fulfill their responsibilities successfully. The decennial census is a massive task, implemented under severe time pressures. The statistical output of the census is used for a great variety of critically important governmental and private programs. Mr. Gorinson has made, and continues to make, vitally significant contributions to this unique national program.

Kenneth W. Sprague

*Primary Examiner
Patent and Trademark Office*

Mr. Sprague is recognized for his outstanding skill and ability in the performance of duties which have contributed materially to the advancement of the Patent and Trademark Office program of reducing the pendency of applications in the Patent and Trademark Office. Mr. Sprague's application of expert knowledge has resulted in consistently outstanding production in his assigned docket, and his willingness to share this knowledge has greatly enhanced the production of his associates. Mr. Sprague's dedication to duty and his inspiration to others are worthy of special note.

Joseph J. Knott

*Supervisory Statistician
Population Division
Bureau of the Census*

Mr. Knott directs the Population Division's activities in the Administrative Records area, an ever-growing and significant part of the Bureau's work. He has made significant contributions to this program. By his staying on top of several complex facets of the job, various legislated allocation programs under the Administrative Records program are handled competently thus bringing credit to the Bureau. In addition, through his efforts in imaginative use of computers, the Bureau is continuing to expand the Federal statistical data base from a variety of merging and linking of large-scale Administrative Record files at minimum incremental costs.

Orvin L. Wilhite

*Chief, Agriculture Division
Bureau of the Census*

The Census of Agriculture is fundamental to the Nation's information system for policy formulation in both the public and private sectors. Mr. Wilhite has demonstrated outstanding leadership and unusual technical competence by revising the methodology for conducting the 1978 Census of Agriculture. Through his efforts, the 1978 census has been redesigned to include a farm identification survey, a supplementary area sample, utilization of sampling techniques to a maximum, and a significantly reduced report form. The program established by Mr. Wilhite will lead to a vast improvement in the quality and timeliness of the results while reducing the reporting burden for the Nation's farmers. He has maintained the highest standards of professional excellence and contributed significantly to the Federal Government's statistical program.

Conrad L. Alexander

Supervisory Survey Statistician

Sol D. Helfand

Survey Statistician

Lawrence R. Impett

Survey Statistician

Nash J. Monsour

*Supervisory Mathematical Statistician
Business Division
Bureau of the Census*

Messrs. Alexander, Helfand, Impett, and Monsour have demonstrated their leadership skills, expert knowledge, and technical competency in planning, developing, and implementing a major and comprehensive revision of the current statistical surveys of retail and wholesale trades and selected services industries. Through their combined efforts in different areas of responsibility, the revised business surveys have resulted in more comprehensive information, more accurate and precise estimates, and reduced respondent burden. Their success in this achievement has reflected credit on the Department of Commerce and has resulted in major improvements to the Federal Government's statistical program.

