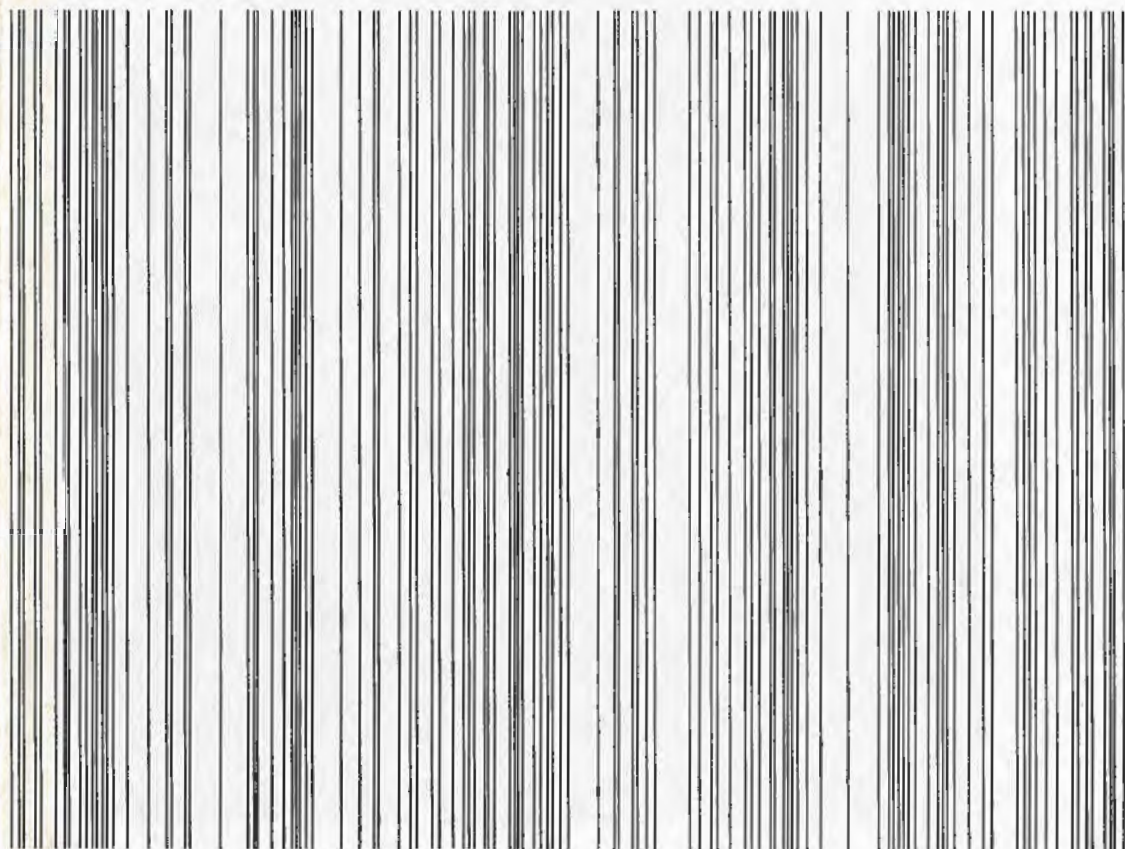

ALUMNI NEWSLETTER

SCHOOL OF CHEMICAL SCIENCES

UNIVERSITY OF ILLINOIS at Urbana-Champaign



NO. 12, WINTER 1977-78



The State of the Union

(Comments by Professor H. S. Gutowsky, director of the School of Chemical Sciences)

In recent years the lead article in these newsletters has traditionally been devoted to a summary of the parts of the most recent annual report of the School of Chemical Sciences that are not covered elsewhere in the newsletter. That tradition is continued this year. More details on the subjects can be found in the *1976-77 Annual Report* of the School of Chemical Sciences, copies of which are available on request.

Before discussing the state of the school, I would like to take this opportunity to make a pitch for membership in the Alumni Association of the University of Illinois. You undoubtedly have received literature from the association about the activities that are supported by the membership dues and the personal benefits of membership. In addition, association members who are graduates of the School of Chemical Sciences automatically become members of the school's alumni constituent association and part of their dues are made available to support activities associated with the school's alumni. In recent years this constituent's fund has been used to partially support the costs of this newsletter and alumni events such as social hours at national American Chemical Society meetings. Currently, of the 7200 living alumni of the school, only about 1400 are members of the alumni association and our constituents group. Thus, there is a considerable number of potential members among our alumni whose support of the association could help preserve and possibly expand the alumni activities of the school. If you would like further information about the alumni and constituent associations, it can be obtained from the University of Illinois Alumni Association, 227 Illini Union, Urbana, Illinois. Now, on to the state of the school.

Enrollments

Although total undergraduate enrollments on the campus have been stabilized at about 25,000 for several years, students majoring in biochemistry and chemical engineering continued to increase in 1976-77. Biochemistry has gone from 100 to 220 in five years and chemical engineering from 155 to 365. The increased enrollments in chemical engineering are placing an impossible demand upon the faculty, facilities, and resources available for them. By reallocation of funds within the school, the number of teaching

assistants has been doubled for them. Also, the College of Liberal Arts and Sciences has provided \$15,000 towards a new faculty position in the department. However, sharply increased enrollments elsewhere in the school, largely in general and organic chemistry, have limited the amount of internal allocation that's feasible.

Graduate enrollments of majors in the school's programs were up to 440 in the fall of 1976, the largest ever. Those in chemistry and chemical engineering have been about 300 and 60, respectively, with modest fluctuations over the last decade. Biochemistry has experienced an increase from 60 to 85 over the past five years, due mainly to faculty expansion in connection with the School of Basic Medical Sciences. Graduate admissions in chemistry were down (58 new students) from last year's banner yield (87), probably mainly because our stipend levels have lagged behind those of our competition. However, the total enrollments for 1977-78 will be at about the levels given above for 1976-77. Industrial funds for the recruitment and continued support of the top level applicants for graduate admission remain in short supply. Many of the applications we receive are encouraged by our alumni throughout the world; we need and are grateful for their help.

The degrees granted continued pretty much at the previous high levels, most changes being in the baccalaureate degrees. Over the past several years the Bachelor of Arts and Bachelor of Science degrees for science and letters majors in chemistry are down from 60 to 40 while those in biochemistry are up from zero (no separate program) to about 35. In chemical engineering the increased enrollments are beginning to show in the degrees granted, the numbers being 35, 37, 51, and 61 for the past four years.

Instructional Programs

As mentioned above, the curriculum in chemical engineering has become overcrowded and in order to provide an equitable way to restrain the increase, a 3.5 (C+) minimum grade point average has been reinstated for juniors and seniors in the curriculum. Also, transfer students will need a 4.0 (A = 5.0) average for admission to it. Other curricular changes in the school were small; the most significant was probably the rejection of a proposal that some civil engineering undergraduates be permitted to take general chemistry without the laboratory.

The general chemistry program continues to be an innovative leader in chemical education as well as an excellent training ground for visiting faculty who are interested in undergraduate teaching. In most such cases, we are able to place them in positions with responsibility for general chemistry programs at other institutions. National conferences and meetings on chemical education have featured presentations on our videotape program for lectures and labs in the main service track (Chemistry 101-2) and on our orientation and training program for new teaching assistants. The development, testing, and use of PLATO lessons in chemistry, largely by Professor Stanley Smith in organic and general chemistry, has attracted international interest.

Efforts to improve the quality of the instruction we offer are varied and continuing. They include a four-day orientation program for new teaching assistants in the fall (with an added stipend of \$150), a salary merit increase for one-third of the continuing teaching assistants, a comprehensive Course Evaluation Questionnaire (CEQ) program, and school awards for teaching excellence (in addition to the campus awards). The CEQ program appears to be the most comprehensive on the campus, largely through the past efforts of Professor P. E. Yankwich and his ad hoc committee, who developed and operated it. At least there are no others in which careful attention has been paid from the outset to the varieties of instructional experience that students have.

This year for the first time the Office of Instructional Resources (OIR) made our forms available for use elsewhere on campus. It is gratifying that their use by others at the first opportunity exceeded the use of OIR's own CEQ on the campus! Cooperation by our faculty, teaching assistants, and students in the evaluations has generally been excellent, and the results have been useful, mainly as a guide to self-improvement by the instructors. School teaching awards (\$500 each), funded by Eastman Kodak Company and the DuPont Company were presented in August, 1977, to Professors Larry Faulkner and John Shapley and to teaching assistants Daniel S. Foose, Nancy Gallick, and Karl E. Wieggers. Campus awards (\$1,000 each) were made in the spring to Professor John M. Clark of biochemistry and Daniel S. Foose, a teaching assistant in chemistry.

On another front this year, the placement and undergraduate advising office was successful in establishing a cooperative education program for the Department of Chemistry. Seven of our upper-class undergraduate chemists already have been placed with Dow Chemical, Eastman Kodak, and Monsanto. These students will spend alternating semesters working for the company and pursuing their academic studies at the University. Generally it will take a total of five years for such students to complete their baccalaureate degree requirements. Several other companies have expressed an interest in our new chemistry cooperative education program and we expect that it will continue to grow over the coming years.

Beginning in the fall of 1977, the placement and undergraduate advising office also began to administer the chemical engineering cooperative education program previously handled by the College of Engineering. No substantial change is expected in the current level of about ten chemical engineering students who are participating in the cooperative program. The formal course mechanism for these cooperative programs has been established and approved (new courses numbered 201 and 202, 0 credit, each cross-listed as chemistry and chemical engineering).

Affirmative Action — Graduate Student Recruiting

Our recruitment of minority students continued as in the past by contacting 33 predominantly black schools by letter and by telephone. Several schools were visited this year including Jackson State University, Central State

University, Georgia Institute of Technology, and Texas Southern University. These visits were made by faculty members Ana Jonas, Galen Stucky, and Peter Beak, and graduate student John Covington. Professors John Katzenellenbogen and Galen Stucky took part in a local seminar on increasing minority registration in graduate education in which representatives of minority schools were invited to the University of Illinois campus and given an opportunity to talk with graduate students and faculty and view the facilities. Dr. Bernard H. Johnson of Central State University and Professor Jim Perkins of Jackson State University, who are both heads of their departments of chemistry, visited the Department of Chemistry at the University of Illinois in conjunction with this program. Our primary competition for minority graduate students still appears to be the health-related professions.

The recruitment of women graduate students continues to be a strong component of our program. This year, in chemistry we had 50 women applicants, 5 of whom were minority women, and 19 minority applicants, 7 of whom were black. Fourteen women, one of whom is black, one black male, and one additional minority applicant accepted appointments for 1977-78. The number of women students in chemical engineering continues to increase. There are 17 freshmen, 23 sophomores, 8 juniors, and 8 seniors who are women, that is, 56 out of about 350. Two graduate students are women and two more accepted appointments for 1977-78. The number of minority students remains low; one senior is black.

Administrative Matters

The school continues to be sorely troubled by increased enrollments that have increased our share of the load in the College of Liberal Arts and Sciences by 40 percent in nine years, while our constant fraction of the college's state budget has lagged increasingly behind inflation. The Chemistry Library needs more space to function, chemical engineering needs more faculty and space in order to teach the 2.5 times increase in undergraduate enrollments, and obsolete and dangerous research labs in Noyes Laboratory need major remodeling to better serve inorganic and physical chemistry. More industrial grants are necessary if we are to continue to compete for the best graduate students in chemistry and chemical engineering.

On the positive side, federal support is up a bit including a National Science Foundation grant to set up a laser research facility for the school. Also, the biochemistry and chemical engineering departments passed with flying colors a self-evaluation sponsored by the Council on Program Evaluation of the campus. Chemical engineering was complimented on its "exceptional record of research productivity" and the need for added resources to handle the increased enrollments was validated. Chemistry is scheduled for the same sort of review in 1977-78.

Finally, I would like to note the retirement of one of our longtime staff members. Ruth Power, chemistry librarian for 27 years, who retired in August 1977. Her devoted service in establishing and maintaining a superior

collection in our library has been an essential component in the school's research accomplishments. Lucille Wert has been appointed as Ruth's successor.

National Medal of Science to Professor Gutowsky

Professor H. S. Gutowsky, director of the School of Chemical Sciences and head of the Department of Chemistry, was one of fifteen scientists who received the National Medal of Science this year. The medal, which was presented by President Carter at a White House ceremony in November, is the nation's highest award for achievement in engineering or science. Professor Gutowsky is the sixth person from the University of Illinois to receive the award and the third from the School of Chemical Sciences. Roger Adams and William C. Rose were recipients in 1964 and 1966, respectively. Gutowsky was honored for "his pioneering studies in the field of nuclear magnetic resonance (nmr) spectroscopy," work that was started in 1947 and con-



H. S. Gutowsky, recipient of the National Medal of Science.

tributed to the rapid rate at which nmr became the important tool that it is today in chemical and biochemical research.

P. W. Bridgman Award to Professor Drickamer

Professor Harry G. Drickamer has been named the recipient of the first P. W. Bridgman Award of the International Association for the Advancement of High Pressure Science and Technology (AIRAPT). The award, named for the late Nobel laureate, is made to recognize outstanding achievement at the forefront of research in high pressure. Drickamer, honored for his use of high pressure to study electronic phenomena in condensed systems, received the award at the Sixth AIRAPT Conference held in Boulder, Colorado, in July, 1977.

Drickamer has been at the University of Illinois for 31 years; he is currently professor of chemical engineering and physical chemistry, as well as a member of the Center for Advanced Studies. His research has centered about the use of high pressure as a tool to investigate the electronic behavior of solids and liquids. By the use of very high pressures, the electronic



Professor H. G. Drickamer, right, is holding the medal for the first P. W. Bridgman Award of the International Association for the Advancement of High Pressure Science and Technology. The gold medal features a border of synthetic diamonds made by a high pressure technique. To the left is Dr. L. H. D. Pugh of Glasgow, Scotland, president of AIRAPT, and in the center, Bridgman's daughter, Mrs. Jane Bridgman Koopman.

energy levels of materials are altered, permitting both the investigation of the electronic structure of existing materials and also the creation of new phases inaccessible at normal pressures. The research has had implications for fields as diverse as solid state physics, solid earth geophysics, the physical chemistry of luminescence, organic photochemistry, and protein biochemistry.

Awards and Honors to Other Faculty Members

This year's Irving Langmuir Award in Chemical Physics has been awarded to Professor **Rudolph A. Marcus** of the Department of Chemistry for his theoretical work in chemical kinetics. The award, sponsored by the General Electric Foundation and awarded in alternate years by the American Chemical Society and the American Physical Society, recognizes the impact that Marcus' work has had on experimentalists and theorists in such fields as unimolecular reactions, electron transfer reactions at electrodes, and, most recently, inelastic and reactive collisions as treated by a semiclassical approach. Marcus received his Ph.D. degree from McGill University and served on the faculty of the Polytechnic Institute of Brooklyn before coming to Urbana in 1964.



R. A. Marcus



R. A. Schmitz

The 1977 George Westinghouse Award of the American Society for Engineering Education has been presented to Professor **Roger Schmitz** of the Department of Chemical Engineering. This annual award is presented to "young engineering teachers of outstanding ability to recognize and encourage their contributions to the improvement of teaching methods for engineering students." Schmitz received his bachelor's degree from Illinois in 1959 and returned here in 1962 after completing his Ph.D. at the University of Minnesota.

An honor of a somewhat different variety has been bestowed on Professor **Peter E. Yankwich** of the Department of Chemistry who was named the University's new vice president for academic affairs in August. As such, he will have responsibilities involving the academic programs on all three campuses of the University. Yankwich, who has been on the faculty here since 1948, has been particularly active in the Urbana-Champaign senate and, since 1975 has devoted a portion of his duties as a special faculty assistant to his predecessor, Vice President Eldon Johnson, directing an evaluation of academic administration within the university.



P. E. Yankwich



W. C. Rose

A national lectureship in biochemistry honoring Professor Emeritus **William C. Rose** of the Department of Biochemistry was announced last April on the occasion of his ninetieth birthday. The Nutrition Foundation of New York will administer the lectureship, established by a group chaired by **Julius E. Johnson** of Midland, Michigan, who received his doctorate under Professor Rose in 1943. The first lecture is expected to be given here this fall.

Other notable recognition recently accorded faculty and staff members of the School of Chemical Sciences is as follows:

Professor **John M. Clark, Jr.**, of the Department of Biochemistry was one of six faculty members on the campus who received \$1,000 awards in recognition of their excellence in undergraduate teaching.

Professors **Robert Gennis**, **Eric Oldfield**, and **John Shapley** of the Department of Chemistry were recently awarded A. P. Sloan Research Fellowships beginning this coming September.

Professor **Nelson Leonard** of the Departments of Biochemistry and Chemistry has been honored by election to the Polish Academy of Sciences.

Professor **John A. Katzenellenbogen** was one of seven campus recipients of **John Simon Guggenheim Memorial Fellowships** this year.

Professor **I. C. Gunsalus** of the Department of Biochemistry was elected president of the Federation of American Scientists for Experimental Biology.

Professor **Gregorio Weber** of the Department of Biochemistry was named

a European Molecular Biology Lecturer (lectures in Oxford, Paris, Rome, and Israel).

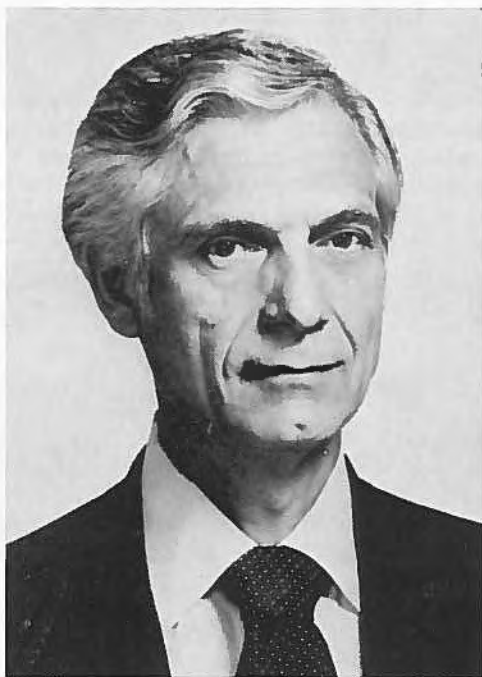
Professor **Larry R. Faulkner** of the Department of Chemistry received the Young Author's Award of the Electrochemical Society.

Larry G. Hess, manager of the school's business office served as president of the Society of Research Administrators during 1977.

Gardner Stacy Is Twentieth Illini to Head ACS

The new president-elect of the American Chemical Society is **Gardner W. Stacy**, a professor at Washington State University. Stacy will advance to the presidency of the 115,000-member society in 1979. He received his Ph.D from Illinois in 1946 working under the direction of Professor **Charles C. Price** who in 1965 was also president of the ACS.

Professor Stacy is the twentieth person with connections to the University of Illinois who has been chosen to head the ACS. The first was Pro-



G. W. Stacy

fessor **William McMurtie** in 1900. The next, in 1920, was Professor **William A. Noyes, Sr.**, for whom Noyes Laboratory is named. His son, **William A. Noyes, Jr.**, an Illinois alumnus, was president in 1947.

In 1935 the ACS president was Professor **Roger Adams**, for whom Roger Adams Laboratory is named. Five ACS presidents were graduate students under him: **Ernest H. Volweiler**, president in 1950; **Clifford F. Rassweiler**, 1958; **Wallace R. Brode**, 1969; **Byron Riegel**, 1970; and **Bernard S. Friedman**, 1974.

Professor **Carl S. Marvel**, ACS president in 1945, was a student under Noyes, and in turn has seen three of his own students become president: **William J. Sparks**, 1966; **Charles G. Overberger**, 1967; and **William S. Bailey**, 1975.

Other ACS presidents connected with the UI were Professors **Samuel W. Parr**, 1928; **Edward Bartow**, 1936; and **John C. Bailar, Jr.**, 1959; and alumni **Albert L. Elder** (Ph.D., 1928) in 1960 and **Karl A. Folkers** (B.S., 1928) in 1962.

Awards and Honors to Alumni and Former Staff

Dr. John H. Sinfelt (Ph.D., 1954), of the Exxon Research and Engineering Company, has received the 1976 Dickson Prize in recognition of his work in the field of heterogeneous catalysis. This research has led to much new work and the development of a commercial reforming catalyst (KX-130) which produces high-octane, low-lead gasoline. The Dickson Prize, which is accompanied by \$10,000, is given each year by Carnegie-Mellon University.



J. H. Sinfelt



J. M. Straley

James M. Straley (B.S., 1932) has been named the 1977 recipient of the Olney Medal, which is presented annually by the American Association of

Textile Chemists and Colorists for achievement in textile chemistry. The gold medal is accompanied by a scroll and a \$1,000 honorarium. Dr. Straley retired two years ago from the Eastman Kodak Company, where he spent nearly all of his career. He is particularly noted for the discovery and development of dyes for hydrophobic fibers and of fast dyes for permanent press polyesters, for which he holds more than one hundred patents.

The American Gas Association has given its research award for 1976 to **Robert C. Weast** (Ph.D., 1943) for his management of the research of the Consolidated Natural Gas Service Company. The award is underwritten by Textron and consists of \$1,000, a plaque, and a watch. In addition to his regular work, Dr. Weast heads up the technical committee of the newly created Gas Research Institute of the American Gas Association. He is also well known as the editor of the Handbook of Chemistry and Physics.



R. C. Weast



T. W. Mastin

Dr. **Thomas W. Mastin** (Ph.D., 1942) has received the 1977 Honor Award of the Commercial Development Association in recognition of his work as a member of the staff of Lubrizol, Inc., of which he is now chairman and chief executive officer. Lubrizol has grown steadily over the years, which Mastin attributes to its policies on research and development, and which the sponsors of the award attribute, to a great extent, to Mastin.

Dr. **Robert L. Metcalf** (B.A., 1939; M.A., 1940), now professor of entomology on the Urbana campus, has received the eighth annual "Recognition Award" of the Entomological Society of America, sponsored by the Ciba-Geigy Corporation. The award recognizes his development of a laboratory ecosystem to test new pesticides for environmental safety and for the development of insecticides that are safer than DDT, but equally effective.

Professor **E. J. Corey** (Staff, 1951-59) has been awarded the William H. Nichols Medal of the New York Section of the American Chemical Society for "contributions to organic chemistry, in particular in the technology, art, and logic of organic synthesis." Dr. Corey, who is now on the staff of Harvard University, has accomplished the total syntheses of several complex

natural products, especially in the prostaglandin area, and has done pioneering work in the use of computer analyses for synthetic design.

This year's recipient of the Eli Lilly Award in Biological Chemistry was **Robert G. Roeder** (M.S., 1965). The award is sponsored by the Division of Biological Chemistry of the American Chemical Society. Roeder is currently a professor at Washington University in St. Louis.



E. J. Corey



W. E. Morrell

Dr. **W. E. Morrell** (Staff, 1942-58) was honored by a symposium held in his honor by the Division of Chemical Education of the American Chemical Society in New Orleans at the spring meeting of the society. Dr. Morrell directed the first National Science Foundation summer institute in chemistry, and after leaving the University of Illinois, became the NSF program director for summer institutes.

Dr. **Darrell Berlin** (Ph.D., 1958), professor of chemistry at Oklahoma State University, is the 1977 recipient of the Oklahoma Chemist Award. This award recognizes Berlin's work in toxic compounds used in pesticides as well as his recent discovery of the cyclization of a variety of B-alkyl-substituted phosphorus compounds.

Professor **Bassam Shkhashiri** (Postdoctorate, 1967; Staff, 1968-70), now coordinator of the general chemistry program at the University of Wisconsin (Madison) has been given the Kiekhofler Award for excellence in teaching at the university. The award is accompanied by a cash gift of \$1,000.

Professor **C. S. Marvel** (M.S., 1916; Ph.D., 1920; Staff, 1920-65), now at the University of Arizona in Tucson, has been elected to honorary membership in the Illinois State Academy of Science in recognition of his outstanding work in organic chemistry, particularly in polymers.

Harry W. McCullough, Jr. (B.S., Ch. E., 1935) has received the ASTM Award of Merit, and was named a Fellow of the American Society for Testing and Materials for "long and distinguished service rendered in the voluntary standardization of specifications and methods of testing for electrical insulating liquids and gases, and effective leadership in furthering the ob-

jectives of ASTM Committee D-27." Mr. McCullough is staff engineer, Research and Development, Shell Oil Company, in Houston, Texas.

Harry H. Sisler (Ph.D., 1939), dean of the Graduate School of the University of Florida, has been granted an honorary Doctor of Science degree by the Adam Mickiewicz University in Poznan, Poland. This honor recognizes Dr. Sisler's work in developing and maintaining an extensive exchange of students and faculty between the University of Florida and Adam Mickiewicz University.

School of Chemical Sciences Funds

The alumni and friends of the School of Chemical Sciences have shown their loyalty in many ways, not the least of which has been through financial contributions to various funds which support the work of the school. Of special interest are the Roger Adams Fund, the Illini Chemists Fund, the John and Florence Bailar Fund, the R. C. Fuson Fund, the W. H. Rodebush Fund, and the L. F. Audrieth Fund. Contributions to these funds have totalled over \$15,000 during the past year, the vast majority of which has come from alumni.

The purposes of these funds are many and varied but so far they have been used primarily to support undergraduate scholarships and awards (the Adams, Fuson, Rodebush, and Audrieth funds), special lectures (the Bailar and Fuson funds), and the publication of the annual *Alumni Newsletter* (the Illini Chemists Fund). We hope that our alumni and friends will continue to help us out in these activities. With respect to the *Alumni Newsletter*, it should be noted that contributions to the Illini Chemists Fund have not kept pace with the increasing publication and postage charges in the last couple of years. If this situation continues, it may be necessary to consider some major changes in the *Alumni Newsletter* format and/or distribution policy.

To aid in identifying and sending contributions, we have enclosed a form and a return envelope for your use. Checks should be made payable to the University of Illinois Foundation and sent to the School of Chemical Sciences, or to the foundation directly, if you prefer. Be sure to indicate to which funds(s) you want your gift to go.

The form also has space on it that can be used to report address changes or to provide comments on your reactions to the *Alumni Newsletter* or about your professional activities. We try to maintain an up-to-date list of company and university affiliations and we are particularly interested in learning about the current positions and employers of any graduates, post-doctorates, and former faculty who aren't on our mailing list.

Alumni at academic institutions have been especially helpful to us in our

efforts to recruit top-flight graduate students and postdoctorates. We thank them warmly! Also, lists of alumni currently employed by different companies have been an impressive argument in our efforts to enlist grants from the chemical industry.

Placement of Graduates

The following discussion is adapted from the annual report for 1976-77 of the school's placement and undergraduate advising office, prepared by Georgan Arsons who has directed the activities of the office since August 1974.

In general, the job situation appeared to be better in 1976-77 than for several years. There were fewer cancellations of interviews by companies, and several expanded their schedules and extended their visits in order to talk to more students. This is shown by the following interview statistics for 1975-76 and 1976-77.

	1975-76	1976-77
Number of employer visits scheduled	195	194
Number of cancellations	24	14
Number of employer visits completed	171	180
Number of employer visit days	232	337
Total number of student interviews	2759	3205
Average number of interviews/employer per day	11.9	9.5

As a prelude to the interviewing season, the placement and undergraduate advising office and Phi Lambda Upsilon cosponsored the usual prerecruiting workshops each semester. Representatives from Amoco, Rohm and Haas, Mead Johnson, and Union Carbide participated in a discussion on preparing for an interview and on the details of the campus interview and the plant visit. As a new dimension added to the preparation this year, we offered the American Chemical Society presentation (slide and cassette tape), "Chemistry: A Job or a Career?", one week prior to the workshop itself.

As far as the actual employment of our graduates was concerned, the industrial employment rate for our baccalaureate chemists remained fairly constant while there was a slight increase in the fraction of our Ph.D. candidates who accepted industrial offers. The chemical engineers at all degree levels continued to experience little difficulty in finding industrial employment.

Our survey of the 1977 baccalaureate graduates indicated that their future plans favored employment considerably more (75/159) than last year's graduates (60/165), continuing an earlier trend. This change is in large part due to the continued increase in size of the graduating class of chemical engineers. The data for 1976-77 are given below. Improvement in the em-

ployment picture is shown by the decreased number (7/159) still seeking employment this fall (1977) compared with the number (15/165) a year ago.

<i>Baccalaureate Graduates</i>	<i>Chem. Curric.</i>	<i>Science and Letters</i>	<i>Chemical Engineering</i>
Employed	12	15	48
Graduate/professional school	13	43	11
No information	1	7	2
Seeking employment	2	5	0
Military service	0	0	0
Totals	28	70	61

We had five students complete a master's degree in chemical engineering who accepted industrial employment. Also 9 out of 12 chemists who left with a master's degree accepted industrial offers.

Plans of chemists, biochemists, and chemical engineers completing the Ph.D. degree requirements during 1976-77 who worked through our placement and undergraduate advising office are as follows:

<i>Ph.D. Graduates</i>	<i>Chemistry</i>	<i>Biochemistry</i>	<i>Chemical Engineering</i>
Industrial/government employment	27	2	10
Academic employment	4	0	3
Postdoctoral research	12	2	0
Foreign, returning home or still looking	6	0	0
Totals	49	4	13

Information on the monthly salaries accepted by our graduates going into industrial employment is listed below:

<i>B.S. Graduates</i>	<i>Salary Range</i>	<i>Average Salary</i>
Chemistry curriculum	\$1205 — \$ 775	\$1064
Science and letters curriculum	1300 — 1083	1156
Chemical engineering	1500 — 1167	1376
<i>M.S. Graduates</i>		
Chemistry	1534 — 1291	1404
Chemical engineering	1600 — 1415	1530
<i>Ph.D. Graduates</i>		
Chemistry	1908 — 1450	1728
Chemical engineering	2083 — 1850	1919

Four Ph.D. chemists accepted academic employment. Salaries ranged from \$1555 to \$1125 per month for nine months with the average being \$1365.

Plans of the 62 postdoctoral people who had contact with this office during 1976-77 (given below) are similar to those for 1975-76, except that the

fraction still looking (2/62) is much less than the previous year (9/55), reflecting the increased fraction with employment elsewhere (21/62 vs. 9/55). The average salary for postdoctoral chemists who accepted industrial employment was \$1818 per month while that for academic employment was \$1593 per month for nine months.

<i>Postdoctorates</i>	<i>No.</i>	<i>Indus./ Govt.</i>	<i>Acad. Emplmt.</i>	<i>Post-doctorate</i>	<i>No Info.</i>	<i>Looking</i>	<i>Stay at U.I.</i>
Biochemistry	15	2	1	2	5	0	5
Chemical Engineering	3	2	0	0	1	0	0
Chemistry	44	11	1	2	9	2	19
Totals	62	15	2	4	15	2	24

In addition to the services made available to our graduating students each year, the placement and undergraduate advising office provides assistance to alumni of the school. Each month, the office sends a bulletin containing mini-resumes of alumni who are seeking employment to over 350 employers throughout the United States. In addition, a biweekly summary of employment opportunities that lists all industrial, governmental, and academic job opportunities that the office has been notified about is available to alumni upon request. These services, which have been very helpful to alumni seeking new jobs, are available by contacting the placement and undergraduate advising office, 107 Noyes Lab.

Special Lectures

The School of Chemical Sciences is fortunate to have several special lecture series each year to supplement the regular seminar programs conducted by the various areas within the school. These special series are funded by grants or trust funds specifically set up to make it possible to attract outstanding scientists to the campus to lecture on their specialties. The most recent programs in these series are described in the following paragraphs.

William Albert Noyes Lecture

Phi Lambda Upsilon, the sponsor of the William Albert Noyes Lecture, was founded in March of 1899 at the University of Illinois. On the occasion of the fiftieth anniversary of the society's founding, the Alpha Chapter initiated the Noyes Lecture series. Appropriately, William Albert Noyes, Jr., was the first speaker. The most recent speaker was H. Gobind Khorana from the Massachusetts Institute of Technology who spoke on the "Total Synthesis of a Biologically Functional Gene."

Krug Lecture

The third annual Krug Lecture sponsored by the local chapter of Alpha Chi Sigma was given in April by George B. Kistiakowsky of Harvard University. Kistiakowsky, a former science adviser in Washington, spoke on "Policy for Science and Science for Policy." The Krug Lecture is funded from a trust fund established by Mrs. Krug in honor of her husband, Louis C. Krug, who graduated from the University of Illinois in 1918.

Sherwin-Williams Lectures

For several years, we have enjoyed having internationally known scientists visit the School of Chemical Sciences under the sponsorship of the Sherwin-Williams Seminars in Chemistry grant. In June of this year, Professor Al Meyers of Colorado State University presented a series of three talks on synthetic organic chemistry. The titles were "New Methodology in Aromatic Substitution," "Progress Toward the Total Synthesis of Maytansine," and "Asymmetric Syntheses via Chiral Oxazolines."

Doisy Lecture

The Ada A. Doisy Lectureship in Biochemistry was established in 1970 by a gift from Dr. Edward A. Doisy in honor of his mother. Dr. Doisy, an alumnus of the University of Illinois, is a professor of biochemistry emeritus at St. Louis University and was a Nobel Prize winner in 1943. The latest Doisy Lecture was given by Dr. Luis F. Leloir. The topic of his lecture was "The Role of Dolichol Phosphate in Protein Glycosylation." Dr. Leloir is director of the Campomar Foundation Institute of Biochemical Research in Buenos Aires, Argentina, and was the recipient of the Nobel Prize for Chemistry in 1970 for his discovery of new phosphorylated intermediates, especially those involved in the synthesis of sugar, starch, and glycogen.

Bailar Lecture

The Bailar Lectureship was established in 1969 on the occasion of Professor Bailar's sixty-fifth birthday, when colleagues, friends, and former students established the supporting fund now known as the John and Florence Bailar Fund. This year's Bailar Lectures were presented in October by Professor Geoffrey A. Ozin of the University of Toronto. He presented two talks on "Naked Metallic and Bimetallic Clusters; the Molecular Metal Cluster — Bulk Metal Particle Interface," and "Modeling Catalytic Intermediates and Reactions on Transition Metal Atoms and Clusters; Do We Really Believe in Localized Bonding Models of the Chemisorbed State?"

New Faculty Members

Two new faculty members joined the School of Chemical Sciences this fall, both as assistant professors in the Department of Chemistry. They are Dr. Anthony J. Arduengo III and Dr. Clifford E. Dykstra.



New staff members C. E. Dykstra and A. J. Arduengo III.

Arduengo, an organic chemist, came here from the experiment station of the DuPont Company where he had been on the research staff for one year after completing his Ph.D. work at the Georgia Institute of Technology. His research interests involve the prediction and synthesis of unusual organic hypervalent bonding systems.

Dykstra, a University of Illinois graduate, went to the University of California at Berkeley for his Ph.D. work and a year of postdoctoral experience before returning to Urbana. A theoretical physical chemist, his research interests relate to the quantum mechanics of molecular electronic structure.

Undergraduate Honors and Awards

Freshman Scholarships of \$500 each were awarded to seven very promising students entering the University in August 1977, and planning a professional career in chemistry. Four of them are funded from the income of the Roger Adams Fund, one from the L. F. Audrieth Fund, and two by a grant from the Monsanto Company. The recipients were:

- Eva Dobrovolny, North Riverside (Monsanto Company)
- Annette M. Eftink, Cahokia (Roger Adams Fund)
- David C. Imig, Palatine (Roger Adams Fund)
- Stuart W. Peltz, Chicago (Roger Adams Fund)
- Rebecca D. Schelhorn, South Chicago Heights (Monsanto Company)
- Jean L. Schlicksup, Peoria (L. F. Audrieth Fund)
- Tevin R. Thompson, Morton Grove (Roger Adams Fund)

Agnes Sloan Larson Awards of \$200 each were given last fall to the five sophomores in the School of Chemical Sciences who achieved the highest grade point averages in their freshman year. These awards are made possible by an annual grant by Dr. Arthur W. Sloan (B.S., 1922) in honor of his sister, Mrs. Agnes Sloan Larson (B.S., 1919), who was a chemistry major and valedictorian of her class. The students who won these awards were:

- John D. Brofman, Deerfield
- Randall A. DeRuiter, Frankfort
- Ronald R. Lagnado, Glenview
- Mitchell A. Newman, Skokie
- Donald F. Rogers, Naperville

The **Elliott Ritchie Alexander Award**, sponsored by Phi Lambda Upsilon, honorary chemical fraternity, is given to the student in biochemistry, chemistry, or chemical engineering who in the first two years at the University has attained the highest scholastic average. The award is a book of the student's choice. The student's name is also inscribed on a plaque which is displayed in the Chemistry Library.

This year, six students had identical averages, so Phi Lambda Upsilon gave each a book. The students so honored were John D. Brofman of Deerfield, Stephen J. Elledge of Paris, Paul S. Hummel of Champaign, Mitchell A. Newman of Skokie, Gary A. Peltz of Chicago, and Donald F. Rogers of Naperville.

The **Illinois Institute of Chemists Awards** go each year to the graduating seniors in chemistry, chemical engineering, and biochemistry who are most outstanding in scholarship, personal integrity, and leadership. The award

is a certificate presented by the Illinois Institute of Chemists. This year the winners were:

Jay W. Ellison, Belleville
Patrick T. Horn, Tuscola
Thomas S. Wittrig, Danville

The **American Institute of Chemical Engineering (A.I.Ch.E.) Award**, which consists of a certificate, a two-year subscription to the *A.I.Ch.E. Journal*, and a pin, goes to the junior in chemical engineering who has attained the highest grade point average during the first two years. The winner this year is Henry A. Kroner of Homewood.

The **Reynold Clayton Fuson Award** went this year to Douglas J. Krajnovich of Villa Park. This prize is given to the student who, through the first semester of the senior year, has made the most outstanding academic improvement.

The **Worth Huff Rodebush Award** is a monetary award which is given to the most able senior who has demonstrated his intention to make a career in chemistry, biochemistry, or chemical engineering. The winner this year is Louis L. Scinto of Elmhurst.

The **Merck Award** consists of a copy of the *Merck Index*. Three such awards are made each year — one each to three outstanding seniors in the chemistry, chemical engineering, and biochemistry curricula. The 1976 awards went to Jay W. Ellison of Belleville (biochemistry), James L. Faltemier of Sainte Marie (chemical engineering), and Patrick T. Horn of Tuscola (chemistry).

The **Phi Lambda Upsilon Cup** stands in a case in the hall of Chemistry Annex. Each year the name of the sophomore who has the highest scholastic average among the students in the curricula of biochemistry, chemistry, and chemical engineering is engraved on the cup. This year four students had the same highest average: Peter S. Dardi of Park Ridge, Randall A. DeRuiter of Frankfort, Ronald R. Lagnado of Glenview, and John J. Staudt of Buffalo Grove.

The **Kendall Award** went to Jay W. Ellison of Belleville. This is a monetary award given each year to a student in biochemistry, chemistry, or chemical engineering who is a member of Phi Lambda Upsilon and shows the greatest promise in his or her chosen field.

The **Chemical Industries Council Scholarship** is a monetary award of \$750 given each year in statewide competition. The School of Chemical Sciences nominates junior level chemists, biochemists, and/or chemical engineers for outstanding curricular and extracurricular accomplishments and need. This year's winner is Stephen J. Elledge of Paris.

The **Donald E. Eisele Memorial Award** (Alpha Chi Sigma) is a cash award given annually to a senior in chemical engineering for scholastic achievement and service to his profession. This year's winner is Philip A. DaPrato of Des Plaines.

Freshman CRC Handbook Award. A copy of the *Handbook of Chemistry and Physics* is presented each year to the outstanding student in freshman chemistry. This year's winner is Kathryn L. Neville of Naperville.

Lisle Abbott Rose Memorial Award. Friends of Lisle Abbott Rose, former director of public information for the College of Engineering, established a fund in his memory from which an award of \$100 is made annually to recognize an outstanding senior student in engineering. It is awarded to a student who most nearly approaches the ideal of technical excellence combined with cultural breadth, depth, and sensitivity. This year's winner is Thomas S. Wittrig of Danville.

A new award made this year was the **Undergraduate Award in Analytical Chemistry** sponsored by the American Chemical Society. It recognizes a student who has displayed unusual aptitude for a career in analytical chemistry and it consists of a membership in the society's Division of Analytical Chemistry and a subscription to *Analytical Chemistry*. The winner this year was Bruce H. Newcome from Woodstock.

New Ph.D.'s from the School of Chemical Sciences

Ph.D. Recipients in January 1977

Akai, Jane Austin Physical Jiri Jonas
Department of Chemistry, University of Notre Dame, South Bend, Indiana
"High Pressure NMR Self-Diffusion Studies of Hydrogen Bonded and Related Liquid Systems"

Bieg, Kevin William Chemical Engineering H. G. Drickamer
Sandia Laboratories, Albuquerque, New Mexico
"Effects of High Pressure on the Luminescence of Impurity-doped Alkali Halides"

Brubaker, Gaylen Ray Organic Peter Beak
FMC Corporation, Princeton, New Jersey
"Part I. Enthalpy of Protonation Studies on Selected Organolithium Compounds. Part II. Dipole-stabilized Carbanions in N-Methyl Carboxamides"

Fretz, Edward Robert Organic R. M. Coates
FMC Corporation, Princeton, New Jersey
"Studies of Trishomocyclopropenyl and Bishomosquare Pyramidal Non-classical Carbonium Ions"

Gardner, William Dean Biochemistry H. E. Conrad
Scripps Clinic and Research Foundation, La Jolla, California
"The Aggregation of Chick Embryo Chondrocytes and the Characterization
of an Aggregation Factor Produced by Chondrocytes in Culture"

Kastrup, Rodney Verner Physical P. G. Schmidt
Department of Chemistry, University of Rochester, Rochester, New York
"Nuclear Magnetic Resonance Investigation of the Structure and Dynamics
of Valine Transfer Ribonucleic Acid (*Escherichia coli*)."

Liesch, Janice Brown Biochemistry O. Uhlenbeck
Department of Biochemistry, Princeton University, Princeton, New Jersey
"Structural Studies on Transfer Ribonucleic Acid"

McLane, Jerry Alan Biochemistry W. O. McClure
Washington University School of Medicine, St. Louis, Missouri
"Studies of Fast Axoplasmic Transport in Animals with Genetic Muscular
Dystrophy"

Mosberg, Henry Isaac Physical P. G. Schmidt
Department of Chemistry, University of Illinois, Urbana, Illinois
"A Proton Magnetic Resonance Relaxation Investigation of the Aspartate
Transcarbamylase Catalytic and Allosteric Mechanisms"

Newman, Bruce Alan Chemical Engineering C. A. Eckert
Conoco, Ponca City, Oklahoma
"Molecular Thermodynamics of Polar Reactions"

Sadler, William Charles Biochemistry R. L. Switzer
Beef Cattle Research Division, Ralston-Purina, St. Louis, Missouri
"Regulation of 5-Phosphoriboxyl-1-pyrophosphate Synthesis in *Salmonella*
typhimurium *in vivo*: Deductions from Pool Measurements"

Ph.D. Recipients in May 1977

Adzima, Leonard Joseph Organic J. C. Martin
Owens-Corning, Granville, Ohio
"Synthesis, Reactions, and Crystallographic Studies of New Spirosulfuranes
and Spirosulfurane Oxides"

Astrologes, Gary William Organic J. C. Martin
Halocarbon Products, Hackensack, New Jersey
"Syntheses and Reactions of Trialkoxy and Tetraalkoxysulfuranes"

- Babamov, Vasil Krum Chemical Physics R. A. Marcus
 Department of Chemistry, University of Illinois, Urbana, Illinois
 "Theory of Inelastic Atomic and Molecular Collisions"
- Cavender, Patricia Lee Organic R. M. Coates
 Schering Corporation, Bloomfield, New Jersey
 "The Stereochemistry of the Biosynthesis of Kaurene"
- Doubek, Dennis Lee Biochemistry L. P. Hager
 Department of Chemistry, Arizona State University, Tempe, Arizona
 "The Chemical Nature of Chloroperoxidase Compound I"
- Gracon, Brian Eugene Chemical Engineering R. C. Alkire
 E. I. DuPont de Nemours & Company, Orange, Texas
 "Experimental Studies of Flow-through Porous Electrodes"
- Heil, Timothy Gerald Chemical Physics D. Secrest
 Department of Chemistry, University of Houston, Houston, Texas
 "Atom-molecule Scattering: Close-coupled and Coupled States Calculations
 for Argon-methane Scattering"
- Henstock, William Howard Chemical Engineering T. J. Hanratty
 Union Carbide Corporation, South Charleston, West Virginia
 "The Effect of a Concurrent Gas Flow on Gas-liquid Mass Transfer"
- Nicksic, Terrence Daniel Biochemistry L. P. Hager
 University of California Medical School, San Francisco, California
 "Studies on the Mechanism of Colicin E₂ Killing"
- Pavlin, Mark Stanley Organic W. H. Pirkle
 Union Carbide Corporation, Wilmington, Delaware
 "Synthesis, Resolution, and Evaluation of New NMR Chiral Solvating
 Agents"
- Pfohl, William Frank Organic D. E. Applequist
 Monsanto Plastics & Resins Company, Indian Orchard, Massachusetts
 "The Stereochemistry of the 1,3-Elimination of Bromine from R-Meso- and
 S-Meso-3-methyl-2,4-dibromopentane"
- Rosenthal, Kenneth Steven Biochemistry D. Storm
 Sidney Farber Cancer Institute, Boston, Massachusetts
 "Studies on the Mechanism of Action of the Peptide Antibiotics, Polymyxin
 B, and EM 49. (Octapeptin)"

Blake, Robert Clayton Biochemistry L. P. Hager
Department of Biological Chemistry, University of Michigan, Ann Arbor,
Michigan
"Pyruvate Oxidase: Mechanism of Lipid Activation"

Bryant, Melton Frank Analytical H. V. Malmstadt
Department of Chemistry, University of Georgia, Athens, Georgia
"Spectrofluorometry: An Automated Dye Laser Spectrofluorometer for
Obtaining Corrected Excitation and Emission Spectra on the Nanosecond
Time Scale"

Burnham, Alan Kent Physical W. H. Flygare
Department of Chemical Engineering, Lawrence Livermore Laboratory,
Livermore, California
"Light Scattering and Electric Birefringence Studies of Gases and Liquids
and Magnetic Studies of Aromaticity"

Cantor, David Milton Analytical Jiri Jonas
Phillips Petroleum Company, Bartlesville, Oklahoma
"A Fully Automated System for Pulsed NMR Measurements"

Engelhard, Victor Henry Biochemistry D. Storm
Department of Biochemistry, Harvard University, Cambridge, Massachusetts
"Studies on the Interaction of Adenylate Cyclase with Animal Cell Plasma
Membranes"

Fieselmann, Benjamin Fredrick Inorganic G. D. Stucky
Air Products and Chemicals, Marcus Hook, Pennsylvania
"Synthetic, Structural and Electronic Studies of Dicyclopentadienyl Ti-
tanium and Vanadium Compounds"

Garrigan, Paul Clement Chemical Engineering R. A. Schmitz
Union-Camp, Inc., Princeton, New Jersey
"Oscillations in the Catalytic Oxidation of Hydrogen"

Gregory, Richard P., IV Analytical H. V. Malmstadt
Procter & Gamble Company, Cincinnati, Ohio
"Development and Application of a Microprocessor-controlled Multi-chan-
nel Pipetting System for Clinical/Analytical Chemistry"

Haber, Arthur Organic K. L. Rinehart
Department of Chemistry, University of Michigan, Ann Arbor, Michigan
"Part I. Carbon-13 and Carbon-14 Biosynthetic Study of Geldanamycin.
Part II. Carbon-13 Nuclear Magnetic Resonance Study of Phenazines.
Part III. Carbon-13 Nuclear Magnetic Resonance Study of Pactamycin"

Hockert, Eric Neil Chemical Engineering H. G. Drickamer
3M Company, St. Paul, Minnesota
"Effects of High Pressure on the Photochromism and Thermochromism
of the Anils"

Holmes, Brian Norman Organic N. J. Leonard
Warner-Lambert/Parke-Davis Research Center, Ann Arbor, Michigan
"Allylic Rearrangements of Purine Derivatives: C-5 Alkylpurines"

Hook, John William, III Physical H. G. Drickamer
Department of Chemistry, University of Rochester, Rochester, New York
"High Pressure Luminescence Studies"

House, Gary Lawrence Chemical Engineering H. G. Drickamer
Eastman Kodak Company, Rochester, New York
"Effects of High Pressure on the Luminescence Properties of Zinc Sulfide
Phosphors"

Kidd, Dennis Raymond Inorganic T. L. Brown
Natural Resources Building, University of Illinois, Urbana, Illinois
"The Photochemical Substitution of Dimanganese Decacarbonyl"

Knapp, Gayle Biochemistry O. Uhlenbeck
Department of Chemistry, University of California, San Diego, California
"Oligonucleotide Binding Studies of Transfer Ribonucleic Acid Structure:
Crystal and Solution"

Kuechler, Thomas Charles Inorganic R. S. Drago
Department of Chemistry, Colorado State University, Fort Collins, Colorado
"Nitroxide Radical-transition Metal Interactions and Mixed-metal Com-
plexes of Some Binucleating Ligands"

Lewis, Terry Warren Organic D. Y. Curtin
3M Company, St. Paul, Minnesota
"Dehydration Reactions in the Organic Solid State"

Linton, Richard William Analytical D. F. S. Natusch
Department of Chemistry, University of North Carolina, Chapel Hill, North
Carolina
"Physico-chemical Characterization of Environmental Particles Using
Surface Microanalytical Techniques"

- Liu, Don Kui Keong Analytical L. R. Faulkner
 Procter & Gamble Company, Cincinnati, Ohio
 "Flash Photolytic Studies of Delayed Fluorescence from Aromatic Hydrocarbons"
- Lovse, Daniel Wayne Analytical H. V. Malmstadt
 Owens-Corning Fiberglass Corporation, Technical Center, Granville, Ohio
 "A Microprocessor-controlled Photodiode Array Measurement System for Analytical Spectrometers"
- Mason, Robert William Organic R. M. Coates
 Olin Corporation, Lake Charles, Louisiana
 "The Geminal Dialkylation of Ketones: Synthesis of Gymnomitrol"
- Mink, Robert Ivan Inorganic G. D. Stucky
 Department of Chemistry, Cornell University, Ithaca, New York
 "Synthesis and Characterization of Amine-chelated Lithio Cyclopentadienyl Transition Metal Complexes and the 1,2,3,4-tetraphenylcyclobutenyl Monoanion"
- Neeley, Richard Lewis Organic J. A. Katzenellenbogen
 Department of Chemistry and Physical Science, Meredith College, Raleigh, North Carolina
 "Estrogens Containing Conjugated Ketones: Synthesis and Photoaffinity Labeling Studies"
- Nicolaidis, George Leonidas Chemical Engineering C. A. Eckert
 Department of Chemical Engineering, University of California, Santa Barbara, California
 "Optimal Measurement and Correlation of Binary Liquid Mixture Non-idealities"
- Nieva Gomez, Jose David Physical R. B. Gennis
 Department of Bacteriology, University of Wisconsin, Madison, Wisconsin
 "Changes in the Cell Envelope of *Escherichia coli* Occurring upon Variation of the Physiological State of the Cell"
- Perry, James Arthur Analytical H. V. Malmstadt
 DuPont de Nemours & Company, Wilmington, Delaware
 "Atomic Fluorescence and Absorption Spectrometry with a Micro-processor-controlled Dye Laser"

- Pfeffer, George Allen Physical D. Secrest
 Department of Chemistry, University of Illinois, Urbana, Illinois
 "The Calculation of the Scattering of Lithium Ions from Nitrogen Molecules"
- Pratt, Lawrence Riley Physical D. Chandler
 Department of Chemistry, Harvard University, Cambridge, Massachusetts
 "The Statistical Mechanics of Nonrigid Molecules in Condensed Phases"
- Reitz, David Bruce Organic Peter Beak
 Procter & Gamble Company, Cincinnati, Ohio
 "Studies of Dipole-stabilized Carbanions from Thioesters: Direct Thermodynamic Evidence for Dipole-stabilization"
- Richter, Steven I. Inorganic J. R. Shapley
 UOP Inc., Des Plaines, Illinois
 "Dynamic NMR Studies of Some Metal Carbonyl Cluster Complexes"
- Ryan, Judith Ann Biochemistry D. Storm
 Department of Biological Sciences, Stanford University, Stanford, California
 "The Solubilization and Partial Purification of Adenylate Cyclase from Rat Liver Plasma Membranes"
- Scherzinger, Ann Louise Physical D. Secrest
 Colorado University Medical Center, Denver, Colorado
 "Inelastic Scattering of Dissociable Molecules"
- Spitzer, Victor Michael Physical J. P. Hummel
 Department of Radiology, Colorado University Medical Center, Denver, Colorado
 "Positron Annihilation at the Chiral Center of Optically Active Compounds"
- Tachikawa, Mamoru Inorganic J. R. Shapley
 Department of Chemistry, Cornell University, Ithaca, New York
 "Reactions of Unsaturated Tiosmium Carbonyl Clusters"
- Theiler, Jane Berlin Organic N. J. Leonard
 Armour-Dial Corporation, Phoenix, Arizona
 "Synthesis of Purine Derivatives as Probes of Hormone Receptors"
- Tucker, William Bryant Analytical D. F. S. Natusch
 Department of Chemistry, Colorado State University, Fort Collins, Colorado
 "The Interactions of Trace Metals with Biological Compounds"

Tyner, Craig Edwin Chemical Engineering H. G. Drickamer
Sandia Laboratories, Albuquerque, New Mexico
"Effects of High Pressure on the Thermal Quenching of Luminescence"

Wieggers, Karl Eugene Organic S. G. Smith
Department of Chemistry, University of Illinois, Urbana, Illinois
"Kinetics and Mechanism of Lithium Aluminum Hydride Reductions of
Ketones"

Erratum

In last year's *Alumni Newsletter*, it was erroneously stated that the late Professor G. F. Smith was a coinventor of the aerosol spray can for whipped cream and that he and an assistant, Charles A. Goetz (Ph.D., 1938), patented this invention. This is not correct. The invention was made by Dr. Goetz, and the patent was issued in his name. Professor Smith recognized the potential of the process and was president of the company that was formed to market it.