



THE

# CHESAPEAKE CHEMIST

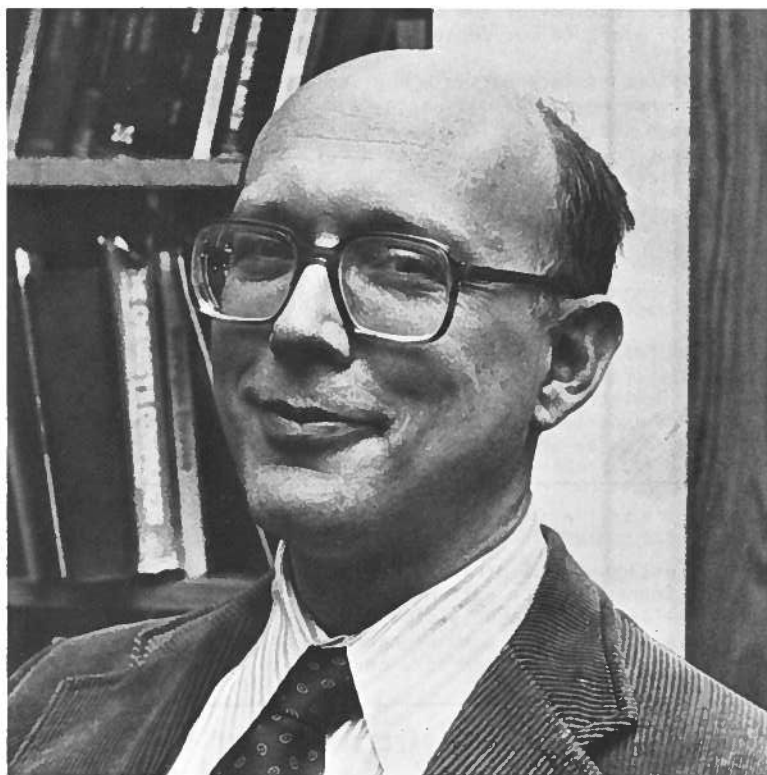
MARYLAND SECTION  
AMERICAN CHEMICAL SOCIETY

VOL. XXXIX

MAY, 1983

NUMBER 5

## 1983 REMSEN AWARD



**GEORGE M. WHITESIDES**

## THE EDITOR NOTES

Our lecture series for this season reaches its climax this month with the 38th Remsen Memorial Lecture. We congratulate Chuck Rowell on an excellent series. Recent sponsors of our social hour bar also deserve to be recognized and thanked once more: W. R. Grace, Fisher Scientific, American Scientific Products, VWR Scientific and Morgan Scientific.

We look forward to the offerings of Nolan Phillips for our new season which will begin in September at the W. R. Grace Research Center, with tentative plans for an October meeting at the National Aquarium in Baltimore.

Our September meeting attendance has been poor the last two years. In 1981 a disappointingly small crowd appeared to hear Nobel Laureate Herbert C. Brown at Towson State, and in 1982 the September meeting at Grace was also lightly attended. The meeting at W. R. Grace had consistently been one of our most popular when held in October of previous years.

We know we have been plagued with late deliveries of *The Chesapeake Chemist*, sometimes three or even four weeks after mailing. On some occasions they are all late, while at other times the problem seems to be isolated in one or two zip codes. We understand that we do not pay first class postage, but we feel that delays of this length cannot be justified, so we have filed complaints with the Post Office. We have also advanced our mailing date somewhat, but we feel limited here, considering that our production deadline is already two months in advance of the meeting date.

We also suspect, however, that many members may not have made the transition from their summer routines by the beginning of September, so we urge everyone to be especially alert to our September meeting.

Initial expressions of interest in a meeting at the aquarium, coupled with the experience of other organizations which have held meetings there, suggest that, even though the cost will be considerably higher than our usual dinner cost, such a meeting will be rapidly sold out, so we recommend that you prepare to make reservations quickly when that meeting is announced.

Until next September - everybody have a good summer.

## GOUCHER COMPUTER PROGRAM

Goucher College has announced a summer computer program for ninth through twelfth graders. Four courses will be offered over a four week period beginning June 20. Registration will be limited in order to provide students with as much hands-on experience as possible. Additional information is available from the Goucher Center at 337-6200.

## SCIENCE FAIR WINNERS

The Maryland Section of ACS presented awards for the best chemistry entries in the Baltimore County Science Fair held in late March at Towson State University. The winner in the senior division was Hugo Gonzalez while the junior division winner was Ihor Lys. Both winners are from Timonium and each received a U. S. Savings Bond in addition to a certificate and a letter of recognition.

## CORRECTION

In Chairman Chuck Rowell's recent letter to the Section's members, his home telephone number was given incorrectly. The correct number is (301) 647-9452.



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*The Chesapeake Chemist* is published monthly September through May by the Maryland Section of the American Chemical Society. Address editorial comments to the Editor. Send advertising copy and inquiries to the Business Manager. The Maryland Section is not responsible for opinions expressed herein. Editorials express the opinions only of their authors. The Editor is responsible for all unsigned material.

## THE 38th REMSEN LECTURER

GEORGE M. WHITESIDES

George M. Whitesides was born August 3, 1939 in Louisville, Kentucky. He received an A.B. degree from Harvard University in 1960 and a Ph.D. from the California Institute of Technology in 1964. He was an Assistant Professor of Chemistry at the Massachusetts Institute of Technology from 1963 to 1969, an Associate Professor from 1969 to 1971, a Professor from 1971 to 1975, Arthur C. Cope Professor from 1975 to 1980 and Haslam and Dewey Professor from 1980 to 1982. He is now Professor of Chemistry at Harvard University.

Professor Whitesides received an Alfred P. Sloan Fellowship in 1968, the American Chemical Society Award in Pure Chemistry in 1975, the Harrison Howe Award (Rochester Section of the American Chemical Society) in 1979, and the Alumni Distinguished Service Award (California Institute of Technology) in 1980. He is a member of the American Academy of Arts and Sciences and the National Academy of Sciences, and a Fellow of the American Association for the Advancement of Science. He belongs to the American Chemical Society and the Chemical Society (London).

His present research interests include organometallic chemistry, applied enzymology, surface chemistry and catalysis.

### ORGANIC SYNTHESIS USING ENZYMES AS CATALYSTS

Although enzymes catalyze almost all reactions occurring *in vivo*, and are thus responsible for large numbers of interconversions of interest in biological and medicinal chemistry, they are relatively seldom used as catalysts *in vitro*. This talk will outline techniques which permit the use of enzymes as practical catalysts in organic synthesis, and will discuss the place of this type of catalysis in the broad range of advanced biological techniques (recombinant DNA technology, "classical" microbiology and fermentation, tissue culture) now entering organic synthesis.

### W. R. GRACE FERMENTATION PILOT PLANT

Chemapac, Inc., of Woodbury, New York, a subsidiary of the Swiss Chemap AG, has announced through its chief executive officer, Rene F. Loser, that it will supply all fermentation equipment for a \$3.1 million fermentation pilot plant at the W. R. Grace research center in Columbia. The pilot plant is scheduled to go on stream in 1983.

The Grace pilot plant is for development and scale-up of a line of pharmaceutical grade amino acids to be used for formulating drugs and other products designed for the relief of nutritional problems.

W. R. Grace also has a five-year \$8.5 million contract with the Massachusetts Institute of Technology to study microorganisms which can be used to produce amino acids.

### CHANGES OF ADDRESS

It is not necessary to notify *The Chesapeake Chemist* of address changes. We obtain our mailing labels each month from the ACS, so you need only inform the ACS of your address change and we will automatically receive labels with your new address.

## THE 38th REMSEN LECTURE

### DATE AND TIME:

Wednesday, May 18, 1983  
7:45 pm

### PLACE:

Remsen Hall, Room 101  
Homewood Campus of  
The Johns Hopkins University

### SPEAKER AND TOPIC:

Dr. George M. Whitesides  
Harvard University  
"Organic Synthesis Using  
Enzymes as Catalysts"

Dinner price \$11.00 per person, but  
retired chemists and students may  
attend the dinner for \$9.00

### COCKTAILS AND DINNER:

The Johns Hopkins University  
Glass Pavilion  
Cocktails: 6:00 pm  
Dinner: 6:30 pm

Dinner reservations should be made  
by mailing checks, payable to  
Maryland Section of ACS, to

Charles Rowell  
Department of Chemistry  
U. S. Naval Academy  
Annapolis, MD 21401

by May 9. Late reservations may  
be made by calling Linh Cheong  
(x 208) or Cheryl Manger (x 358)  
at

(301) 355-3600

by May 11.

It is not necessary to be a member of the American Chemical Society to attend. You may attend the lecture without attending dinner.

### THE REMSEN AWARD

The annual Remsen Memorial Lectures were inaugurated in May, 1946 by the Maryland Section of the ACS to honor Ira Remsen, first Professor of Chemistry and second President of The Johns Hopkins University. The Remsen Memorial Lecturers are chemists of outstanding achievement, in keeping with Ira Remsen's long and devoted career as an exponent of the highest standards in teaching and research in chemistry.

Last year's Remsen Lecturer was Harden McConnell of Stanford. Previous lecturers were:

1981 Koji Nakanishi  
1980 Roald Hoffman  
1979 Harry B. Gray  
1978 John Charles Polanyi  
1977 Ronald Breslow  
1976 William N. Lipscomb, Jr.  
1975 Henry Taube  
1974 Elias J. Corey  
1973 Frank H. Westheimer  
1972 Charles H. Townes  
1971 George C. Pimentel  
1970 George S. Hammond  
1969 Albert L. Lehninger  
1968 Har G. Khorana  
1967 Marshall W. Nirenberg  
1966 Paul H. Emmett  
1965 James R. Arnold  
1964 Paul D. Bartlett

1963 Harold C. Urey  
1962 George Porter  
1961 Herbert C. Brown  
1960 Henry Eyring  
1959 Edward Teller  
1958 Robert B. Woodward  
1957 Melvin Calvin  
1956 Farrington Daniels  
1955 Willard F. Libby  
1954 Vincent du Vigneaud  
1953 Edward L. Tatum  
1952 W. Mansfield Clark  
1951 Hugh S. Taylor  
1950 Edward C. Kendall  
1949 Joel H. Hildebrand  
1948 Elmer V. McCollum  
1947 Samuel C. Lind  
1946 Roger Adams

## CHEMISTRY COURSE OFFERINGS

### SUMMER 1983

June 13 to July 29

#### CHEM. 1905.350 PRINCIPLES OF BIOCHEMISTRY (5 credits)

Meets: Lecture MW 7 - 9:50 p.m., Laboratory TuTh 7 - 10:50 p.m.

Instructor: Dr. Richard S. Preisler, Department of Chemistry,  
Towson State University

#### CHEM 1905.361 CHEMICAL AND BACTERIOLOGICAL STUDIES ON WATER POLLUTION (3 credits)

Meets: MW 7 - 9:50 p.m.

Instructor: Dr. Max Eisenberg, Department of Health & Mental Hygiene,  
State of Maryland

### FALL 1983

August 29 to December 15

#### CHEM 1905.342 PHYSICAL CHEMISTRY LECTURE - STRUCTURE AND KINETICS (3 credits)

Meets: W 7 - 9:50 p.m.

#### CHEM 1905.367 FORENSIC CHEMISTRY (3 credits)

Meets: Th 7 - 9:50 p.m.

Instructor: Professor John J. Tobin, Maryland State Police  
Crime Lab

**Towson State University**

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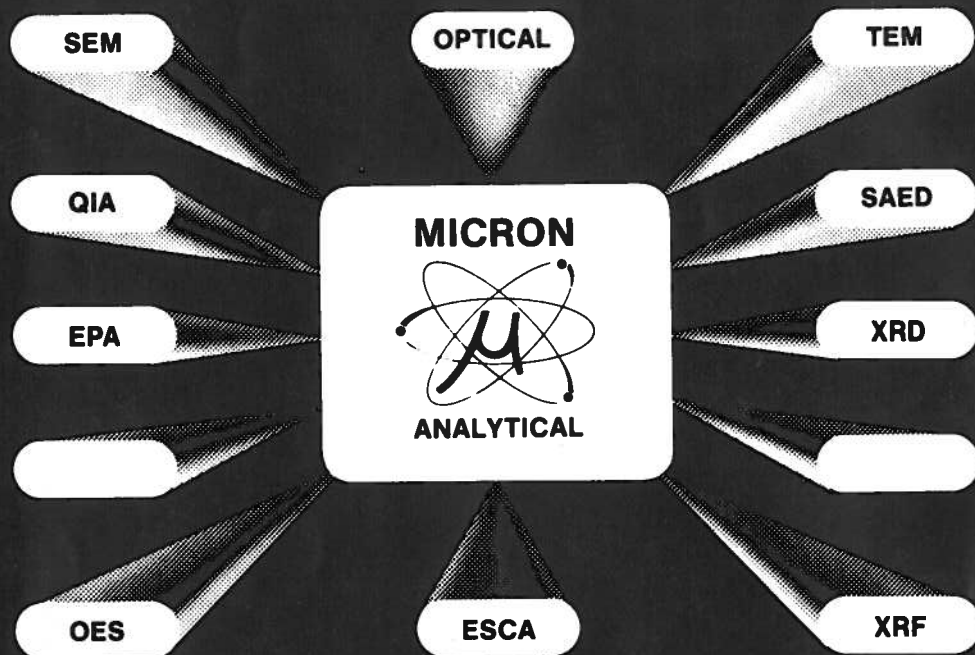
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