



SCHOOL OF OCEAN AND EARTH SCIENCE AND TECHNOLOGY

Press Release

Wednesday April 16, 2008

Karl to deliver 20th Annual C. B. Van Niel Memorial Lecture

Honolulu, HI – David M. Karl, Professor of Oceanography and Director of the Center for Microbial Oceanography: Research and Education (C-MORE) at the University of Hawaii at Manoa (UHM) has been invited to deliver this year's Van Niel Memorial Lecture. The presentation, "Microbial Oceanography: A Sea of Opportunity" will be given at Stanford University's Hopkins Marine Station in Pacific Grove, California on April 18th, 2008. This is the 20th annual lecture in the series, established shortly after the death of Cornelius Bernardus Van Niel, perhaps the most influential microbiologist and educator in the 20th century. Previous speakers in this lecture series have included two Nobel laureates and many other distinguished scientists.

George Somero, Director of the Hopkins Marine Station, says that Karl's work, like van Niel's, is opening up new frontiers. "Dave's studies of the relative abundances of Bacteria and Archaea in the marine water column have caused microbiologists and marine scientists in general to take a whole new look at the nature of marine microbiology," says Somero. "And, like van Niel, Dave has been a major driver in initiating new programs in research and education and in fostering the types of collaborations that lead to new breakthroughs."



C. B. Van Niel was a pioneer in general microbiology and comparative biochemistry, and along with others from the "Delft School" in the Netherlands, introduced novel concepts and understanding about the role of microorganisms in energy capture, nutrient cycling and their role in the habitability of our planet. His most lasting contribution was his research on photosynthetic bacteria, showing a common biochemical mechanism with green plants. Through painstaking laboratory experiments, he demonstrated the process of photosynthesis could be expressed as a series of biochemical reactions not unlike the sequential steps that had already been shown for respiration. His work provided a fundamental understanding of energy flow in the biosphere and led to numerous subsequent discoveries. In 1930, he organized a summer training course at Hopkins Marine Station that was designed to provide training in general microbiology, which was otherwise not available in university curricula at that time. Over the next three decades his intensive course became a proving ground for the development of American Microbiology as a unique scientific discipline. He was revered as a teacher and mentor, and in 2004 the American Society for Microbiology designated Hopkins Marine Station and Van Niel's laboratory and classroom building as a "Milestone in Microbiology" site.

David Karl joined UH in March 1978. In the early 1980s he established the Laboratory for Microbial Oceanography which, over the years, grew into a comprehensive research and training facility. In 1988, along with Roger Lukas and others, he established the Hawaii Ocean Time-series (HOT) program, an ongoing research program to investigate climate-related impacts on marine ecosystem dynamics. In 2005, Karl was named a Gordon and Betty Moore Foundation Investigator in Marine Microbiology and in 2006 he was elected to the U.S. National Academy of Sciences.

For more information on the Van Niel Memorial Lecture, please see the Hopkins Marine Station of Stanford University web site: <http://www-marine.stanford.edu/memorialelectures.htm>

For Interviews contact:

David Karl, Professor, Department of Oceanography, School of Ocean and Earth Science and Technology, University of Hawaii, dkarl@hawaii.edu, (808) 956-8964 <http://hahana.soest.hawaii.edu/lab/dkarl.html>

SOEST Media Contact: Tara Hicks Johnson, (808) 956-3151, hickst@hawaii.edu