

## **Dr. David B. Williams, FASM Trustee (2014-2017)**



**Dr. David B. Williams, FASM  
Dean, College of Engineering  
The Ohio State University  
Columbus, Oh**

Dr. David B. Williams is the Monte Ahuja Endowed Dean's Chair, Executive Dean of the Professional Colleges, and Dean of the College of Engineering at The Ohio State University. Williams oversees the education of more than 10,000 undergraduate and graduate students, leads a research program that expends \$120M annually, and oversees the administration of 950 combined faculty, research scientists, and staff.

Williams serves on the boards of ASM International, the State of Ohio's Third Frontier Advisory Board, the American Lightweight Materials Manufacturing Innovation Institute, Columbus 2020, Metro High School, EWI, Ohio Aerospace Institute, Ohio Aerospace & Aviation Council, and the Transportation Research Center. He is a member of the Global Engineering Dean's Council, the American Society for Engineering Education, and the Ohio Engineering Dean's Council. He is also a fellow of several national and international professional societies in the areas of materials and microscopy.

Prior to Ohio State, Williams served as the fifth president of the University of Alabama in Huntsville from 2007 to 2011. Prior to that role, Williams spent 31 years at Lehigh University in Bethlehem, Pennsylvania, where he was professor of materials science and engineering. His research and administrative experiences were supported by many federal agencies, including NSF, DOE, NASA, and the U.S. Army. From 1980 to 1998, he directed Lehigh's Electron Microscope Laboratory and the Microscopy School. He chaired Lehigh's Materials Science and Engineering Department from 1992 to 2000, and was vice provost for research from 2000 to 2007.

Dr. Williams has co-authored and edited 11 textbooks and conference proceedings, including the world's leading text on Transmission Electron Microscopy. He has published over 220 refereed journal papers and 200 abstracts/conference proceedings in the general areas of analytical/transmission electron microscopy and their application to studies of metals and alloys. He has given 280 invited presentations at universities, conferences, and research laboratories in 28 countries. Williams holds B.A., M.A., Ph.D., and Sc.D. degrees from the University of Cambridge.

## **Abstract - Reflections on Microscopy & Analysis: From Viewing the Small World to Leading on a Larger Stage**

**David B. Williams, Trustee**



**Dr. David B. Williams, FASM  
Dean, College of Engineering  
The Ohio State University  
Columbus, Oh**

It is 150 years since Henry Sorby first viewed an alloy structure under a visible-light microscope and also invented micro-spectroscopy, the first combination of imaging and analytical techniques. I have spent my academic life studying alloys with various microscopy and spectroscopy techniques and recently was honored by the Henry Clifton Sorby Lifetime Achievement Award of the International Metallographic Society.

“Lifetime” is a somewhat sobering adjective, so this award prompted me to think what I had learned in my professional life that might be of use to others, particularly younger academics and researchers early in their careers. By some standards, I have had a successful career spanning the range from assistant professor to president of a Carnegie Tier-I research university. So, rather than focusing on a historical microscopy talk (which is about all I qualified to deliver) I will present lessons I have learned in the ‘bright field’ of microscopy/materials research and the ‘dark field’ of university administration and how each side can benefit from the other.