

## **MASM: A LOOK BACK AND A PEEK AHEAD**

John Fowler

Arizona State University  
W. P. Carey School of Business

Tempe, AZ 85287-5906 USA

### **ABSTRACT**

The first Winter Simulation Conference (WSC) papers on the use of simulation in semiconductor manufacturing appeared in the late 1980s and then appeared regularly throughout the 1990s. The first WSC track on semiconductor manufacturing was in 1996 and it was repeated in most WSCs over the next decade. The first Modeling and Analysis of Semiconductor Manufacturing (MASM) conference took place in 2000. The focus of the MASM conference was the use of operations research and statistical tools and techniques (including but not limited to discrete event simulation) aimed at improving semiconductor manufacturing operations. In 2008, MASM became a conference within WSC, keeping its focus that is broader than just discrete event simulation applications. In this talk, the history of modeling and simulation of semiconductor manufacturing from the early days to the present time will be discussed. This will include the separate efforts of WSC and MASM and the current combined efforts. Finally, the future of MASM and the possibility of adding some formal structure to the MASM community will be proposed.

### **AUTHOR BIOGRAPHY**

**JOHN FOWLER** is the Motorola Professor and Chair of the Supply Chain Management Department at Arizona State University, Tempe AZ. He has published over 100 journal articles and over 100 conference papers in discrete event simulation, deterministic scheduling, and multi-criteria decision making, among others areas. He is a Fellow of the Institute of Industrial Engineers (IIE). He was the Founding Chair of the first MASM Conference in 2000.