The Future of Semiconductor Industry - A Foundry's Perspective

F. C. Tseng

TSMC, Taiwan

The semiconductor industry is in an extended period of moderate and steady growth. In this stage, many technologies are made to work together to deliver benefits that are greater than the sum of their individual parts. Economy of scale provides for steady cost reduction and constantly widening markets. The adoption of communication, computer and consumer products is spreading across the world in both advanced and developing economies. Opportunities are global and not concentrated on any one specific region. New applications and technologies now globally serve billions of people.

Meantime, the semiconductor industry is facing several economic, design and technology challenges. Solutions need to be developed in order to continue the industry growth. Foundry and IC companies must develop a much deeper and broader partnership. With end-to-end collaboration from design, wafer manufacturing to assembly and test, IC companies could fully leverage foundry’s new technology offerings and capacity support in order to create the product differentiation in their end market. TSMC is committed to the long-term investment in leading edge technology development and GigaFab capacity expansion needed to enable the industry growth.