

IPC Offers Steady Guidance for Engineering Students

Story of Raviteja Boyana for Indian Emerging Electronics Engineers

“I am a graduated mechanical engineer with a specialization in electronics packaging (assembly) and reliability of electronics from the University of Maryland, College Park, USA. I have been associated with IPC.

In my first semester, while I was transitioning myself from the mechanical engineering background to the semiconductor manufacturing industry, I was looking for opportunities to connect and learn from industry professionals about their journey in the electronics industry and how they benefited by being members of IPC.

During my time at the University of Maryland, I joined IPC as a student member and benefited from IPC’s scholarship program. I also took up a leadership role as the secretary of communications for my university’s student chapter during the academic year, 2020-21.

I was asked to share some insights for the new engineers looking to make their way into the electronics industry.

During my second semester, I took one course that introduced me to the semiconductor fabrication processes and the packaging industry. The course was slightly overwhelming, yet I was intrigued by the depth of information. During the course, I got involved in the tear-down and cross-sectional analysis of different chips used in the iPhone 6. One of these was a front-end power amplifier module by Qorvo, a manufacturer of RF chips and modules. The project helped me gain a lot of insight about the technology being used in the industry.”

Ravi graduated in 2020 with a master’s degree in chemical engineering, along with a minor in electronics packaging. He is very passionate about the semiconductor manufacturing industry and has a 5-month internship experience with the Advanced Packaging team at Qorvo. Ravi’s areas of expertise include but are not limited to electronics packaging, semiconductor manufacturing, reliability testing, failure analysis, DFMEA, Design for Reliability and quality.

According to Indian industry, young engineers who join companies without practical experience and exposure, takes time to thoroughly get involved in production and quality process. Newcomer engineers often confront challenges on the shop floor, when introduced to new technologies and processes which were not part of theoretical curriculum of the University.

Engineers involved in electronics manufacturing make critical decisions every day that have an impact on end products. Many companies are hiring new engineers and technical staff into DFM, Product, Manufacturing, Process, and Quality Engineering roles to support the ramp up in printed circuit board assembly (PCBA) production for both current and new products.

IPC India has sought to fill this gap with a new “Electronics Assembly for Engineers” online course targeted at recently hired or final year engineering students. The course builds upon years of manufacturing experience to place new engineers a step ahead of the curve. The Certificate course will highlight how new engineers can speed up on practical key concepts, tools, materials and processes without physical training & Instructor.

For details, connect with <https://www.ipcindia.org.in/ipc-india-regional-team/>

