

LA/OC SMTA is Proud to Present
Chapter Dinner Meeting Presentation

Avoiding Assembly Pitfalls at the Bare Board Design Stage

A discussion of factors that drive PCB and assembly costs
which should be considered early in the design phase to save your company \$\$\$.

PRESENTED BY
Julie Ellis
Field Applications Engineer
TTM Technologies, Inc.

SPEAKER PROFILE

Julie Ellis is a Field Applications Engineer, or as her LinkedIn profile simply states, "PCB Problem Solver." Julie's qualifications include a BSEE and an IPC Master Trainer certificate, not to mention being a survivor of the Viasystems/TTM merger and the other ups and downs our industry has experienced since she began her career as a student-engineer at Hughes Aircraft in 1982. Julie's work as a student and then as an engineer at Hughes gave her great hands-on experience in RF/analog electronics and coaxial cable design, assembly, and test. After Hughes, she pursued technical sales as a manufacturer's rep for semi-conductors and circuit boards and represented Nan Ya PCB Corporation for ten years before rounding out her career in contract electronics manufacturing as a sales engineer and then global PCB commodity manager. She managed a fabricator's ISO 9001 quality system and was a technical consultant and process and quality auditor for PCB, CM, and automotive customers before joining TTM. Julie is a Certified IPC Trainer for acceptability of both circuit boards (IPC-A-600) and electronic assemblies (IPC-A-610). She really enjoys teaching students to understand the requirements and apply the standards to accept product with full confidence.

PRESENTATION ABSTRACT

A designer is faced with many challenges when planning their layout to achieve a balance of performance, quality and reliability versus cost. In this presentation, Julie will discuss common PCB-related assembly factors that contribute to cost and explore the trade-off considerations for design optimization. She will explore panel utilization, IPC Classes 2 and 3, design geometries and spacing, via protection, solder mask-defined pads and dams, and surface finishes. By thinking "Outside the Board," assemblers can avoid pitfalls of unintended design consequences.

AGENDA

6:00PM, Social Hour
7:00PM, Dinner/Presentation

MENU

[http://www.laocsmta.org/images/SMTA Dinner Menu.pdf](http://www.laocsmta.org/images/SMTA_Dinner_Menu.pdf)

COST

\$15, Members
\$35, Nonmembers
\$100, Vendor Table

Please Contact Any Board Member if
Your Organization is Interested in a Vendor Table

LOCATION

JT Schmid's Restaurant & Brewery
2610 E. Katella Avenue
Anaheim, California 92806
714.634.9200

<http://www.jtschmids.com/>

RESERVATIONS

<http://www.laocsmta.org/reservation.php>