

**LOCATION:**

Haywards BBQ  
11051 S Antioch  
Overland Park, KS 66210  
[www.haywardsbbq.com](http://www.haywardsbbq.com)

Map and directions posted on  
[www.heartlandsmta.com](http://www.heartlandsmta.com)



**Heartland**  
**SMTA**  
Surface Mount Technology Association

Sep 27 '11  
5:00 - 8:30 PM

**Haywards BBQ**



**COST (includes BBQ Dinner):**

\$ \$20 SMTA Members  
\$ \$10 Full Time Students  
\$ \$30 Non-Members  
(cash or check to Heartland SMTA  
or PayPal at [www.heartlandsmta.com](http://www.heartlandsmta.com))

**RSVP By Sep 23<sup>rd</sup>**

**Sonia Hembree**  
shembree@lorenzsales.com  
(email preferred)  
(913) 469-1312

**Understanding Flexible Circuits – Products, Materials, and Assembly**

**By Mike Nytes, Sales and Application Engineer**  
**All Flex Flexible Circuits, Northfield, Minnesota**

Mike will discuss the materials used in flexible circuitry as it is somewhat different than the standard hardboards. He will then discuss how to assemble components to flexible circuitry product, and the unique differences in assembly of flex versus hardboard product.

**Outline:**

- Introduction
- Flexible Circuitry product types
- Flexible Circuitry standard materials
- Pre-treatment of flex prior to assembly
- Solder stencil considerations
- Through hole component assembly
- Surface mount component assembly
- Mixed form factor assembly (through hole and surface mount on the same part)
- Post Clean of flex circuitry
- Packaging of assemblies

**About the Speaker:**

Mike was born, raised, attended college, and lived in Minnesota all his life. He started working with flexible circuitry in 1973 and has been involved since in engineering and sales positions for over 38 years. He has been with All Flex Flexible Circuits for over five years as a sales and application engineer. In his current position he works with customers on design related questions such as materials, finishes, flexibility and assembly questions. He also prepares quotations for customers for the fabrication of the product.

***Door opens at 4:30 - come early and network!***

**Please post this announcement**