



# DECEMBER

*Part of the Month*

## 5-Axis Foray

Earlier this year we jumped into the world of 5-axis machining, and December's Part of the Month is the first piece to go through production utilizing this technology. Starting out as a  $\text{\O}4\frac{1}{2}$ " billet of aluminum, the features shown in the bottom of the part (pictured, below) are machined first. The part is then flipped over to machine the features on the top surface (pictured, left). This is the only time the part has to be repositioned during machining. This greatly reduces setup and production times over typical 3-axis machining which would require many more setups to achieve a finished part. Send your inquiries today and let us show you the cost savings available with 5-axis technology.



### Complete Assembly, Sheet Metal, Machined and Welded Components.

- > ISO 9001 certified Quality Management System.
- > Certified Welding to MIL-STD-1595a for process DTAW Group 1b, 1a.
- > 100% in-process inspection.
- > Certified inspection reports.

### All CAD Formats:

Solidworks (sldprt, sldasm), AutoCAD (dwg, dxf), Inventor, Pro/E, CATIA 4/5, Unigraphics, Parasolid, ACIS SAT, iges, step, ckd, prt, stl

### Problem:

There are 8 match sticks in a pyramid as shown in the figure. Now move 4 sticks to form five equilateral triangles.



### Quiz:

Where did the song "Have Yourself a Merry Little Christmas" originally appear?

- Miracle on 34th Street
- It's A Wonderful Life
- Meet Me in Saint Louis

\* Please be sure to check our website for answers to all previous months Problems and Quizzes! Go to [www.metalwork.com](http://www.metalwork.com) and click on Problem of the Month link.

### Quote:

"One of the most glorious messes in the world is the mess created in the living room on Christmas day. Don't clean it up too quickly."

[www.metalwork.com](http://www.metalwork.com)  
**Come Visit Us!**  
102D Park Drive Montgomeryville, PA  
P: 215.654.7778 F: 215.654.7779  
E: [potm@metalwork.com](mailto:potm@metalwork.com)