

# Finishing Facts

## AESF Congratulates These Professionals for Attaining Advanced CEF Status

Seven individuals have completed important certification levels, advancing them toward the status of "Master Surface Finisher." (Click on "certification" on [www.aesf.org](http://www.aesf.org).)

**Eric Ellison**, CEF-2, Fountain Plating, West Springfield, MA

**Jeffery Hotham**, CEF-3, Fountain Plating, West Springfield, MA

**Terrence LaRace**, CEF-2, Fountain Plating, West Springfield, MA

**Serge Labbé**, CEF-3, Heroux Devtek, Inc., Longueuil, Canada

**Cody Laycock**, CEF-4, SYN Res, Colorado Springs, CO

**Angela Vawter**, CEF-2, Burns & McDonnell, Kansas City, MO

**Brian Cavanaugh**, CEF-2, Scientific Control Labs, Chicago, IL

## Automotive Electronics Is Focus of Munich Event

With automotive electronics expected to drive nearly all future vehicle innovations, "electronica 2002" is set to bring together key leaders of the industry to address the global market. The exhibit and conference will be held November 12–15 in Munich, Germany.

The event, which will feature special automotive electronics and technical sessions, is expected to draw about 85,000 visitors. The show will feature about 3,000 exhibitors.

For information on travel and accommodations, call toll-free 1-866/674-3476. For information on the event, go to [www.munichtradefairs.com](http://www.munichtradefairs.com).

## PMA Officials Say Steel Tariffs Hurt U.S. Businesses

Reeling from the effects of steel tariffs on their businesses, officials of the Precision Metal Forming Association met with government officials in July to discuss the impact that tariffs are having on their businesses. Leaders say their supply lines have been strangled by a

### Mass Finishing

1. Barrel finishing uses a rotary barrel. The sliding movement of an upper layer of tumbling parts provides the finishing action. The barrel is loaded with a mixture of parts, \_\_\_\_\_, \_\_\_\_\_ and \_\_\_\_\_ (Three other items).
2. In vibratory finishing, vibratory frequency may range from \_\_\_\_\_ to \_\_\_\_\_ cycles/min. Amplitudes range from \_\_\_\_\_ to \_\_\_\_\_ in.
3. Vibratory finishing utilizes an open-topped (3):
  - a. straight channel
  - b. rounded tub
  - c. box
  - d. torus
  - e. bowl
4. Finishing media may be selected from among the following materials:
  - a. corncobs
  - b. crushed stone
  - c. steel
  - d. walnut shells
  - e. sintered aluminum oxide
5. Mass finishing is used for:
  - a. descaling
  - b. drilling
  - c. getting a uniform surface finish
  - d. sizing
  - e. deburring

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poorly conceived program of steel tariffs that is sacrificing steel-consuming jobs in a doomed effort to save the domestic steel industry.

"Tariffs are an unfair, artificial penalty against American manufacturing companies that have found ways to compete successfully against foreign competition," said Jim Giarrusso, CFO at United Tool and Stamping of West Paterson, NJ.

Ed May, consultant to the metalworking industry and chairman of the New York/

New Jersey PMA District, said: "The damage being done by these tariffs is real and immediate. The 2001 steel tariffs will drive local steel service centers and metal stampers out of business this year, unless rectified now."

The association has held a series of meetings around the country to draw attention to the plight of metalworking companies caused by the tariffs.

## Study Shows Corrosion Costs Are Enormous

A two-year study released by NACE International (The Corrosion Society), Houston, TX, estimates the annual direct cost of corrosion in the U.S. to be \$276 billion. The study estimates that 25-30 percent of the total (\$70-\$80 billion) could be saved by using state-of-the-art corrosion management practices.

The study identified the direct cost of corrosion in five sectors of the economy—infrastructure, utilities, transportation, production and manufacturing, and government. Of these five, utilities represent the largest direct cost—nearly 35 percent of the total. That is followed by transportation at 22 percent, infrastructure at 16 percent, government at 15 percent, and production and manufacturing at 13 percent.

NACE said the study will be used by public policymakers for years to come to help guide infrastructure decision making.

## New Officers Elected for PCI

Tony Mazzarella, business manager of Powder Coating Intermediates and Colorants for Bayer Corporation, was recently elected president of the Powder Coating Institute (PCI), Alexandria, VA. Steve Houston of DuPont Powder Coatings USA, Inc., was installed as vice president, and Ken Kreeger of Nordson Corporation, was elected secretary-treasurer.

Elected to the PCI Board of Directors for two-year terms were: Marc Fooksman, ITW Gema; Barry Keating, PPG Industries; and Dwight Murray, Calgary Powder Coatings.

## Chemical Coaters Name New Officers

The Chemical Coaters Association International recently elected officers for 2002-03. The organization elected Rodger Talbert, Talbert Consulting, president. Jerry Trostle, SBS, Inc., was named vice president, and Jeff Watson, Custom Chemicals of Texas, was elected secretary-treasurer.

## Company News

Palm International, Inc., and Sulfuric.com, Inc., have merged operations. Palm, a manufacturer of nickel solutions for the metal finishing and electronics industries, will now provide its customers with a full line of commodity metal finishing supplies and equipment through the Sulfuric.com e-commerce engine.

Bill Fields, who started Palm in the mid



*Precious Plate Florida of West Palm Beach is preparing a new literature package about the firm's products and manufacturing capabilities. In this photo, Chuck Frank (right), general manager, is shown consulting with the photographer. Frank is a member of the AESF South Florida Branch. Precious Plate Florida offers perforation of continuous strip steel and copper at exact tolerances, and also can anneal and electroplate continuous steel strip.*

1980s, will hold the office of CEO and chairman of the board of Palm, and will continue primary responsibility for sales and marketing. Jeff Peterson, former president of Sulfuric.com, will hold the office of president of COO of Palm, with responsibility for all phases of operations.

NIBCO, Inc., Elkhart, IN, has acquired the assets of Tolco, Inc., a manufacturer of pipe hangers, pipe supports, seismic bracing, framing channels, and fittings. Tolco has its headquarters in Corona, CA, with additional manufacturing locations in Sacramento and Houston, TX.

NIBCO is a provider of flow-control products to residential and commercial construction, industrial, and irrigation markets. The company has locations throughout the U.S. as well as Mexico and Poland.

NeXray, LLC, has been acquired by Thermo NORAN, A Thermo Electron business. NeXray is a global supplier of Microbeam X-ray Fluorescence (XRF) metrology tools that provide film thickness and composition measurement of metal layers and other structures. Thermo NORAN manufactures X-ray microanalysis and X-ray fluorescence products for materials characterization and electron microscopy markets.

Outsourcing is being used more and more by U.S. manufacturers looking for ways to become more competitive. The automotive industry began outsourcing years ago, including finishing operations for many

automakers.

It seems the aerospace industry is following suit to lower cost and focus on strengths that can gain a competitive edge. Boeing Corporation, for example, is involved in a major program of asset reduction and innovation management techniques to accomplish an improved competitive position against rival Airbus. Airbus is a European consortium of several countries that have combined resources to produce commercial aircraft. The bulk of the manufacturing operations are outsourced to subcontractors operating under Airbus specifications. The result has been to create a unique second source position in the industry.

Boeing is also restructuring in a similar manner, and has created two new entities—Boeing Ventures to create new value, and Boeing Realty to position non-core assets for sale.

Currently, several finishing and other manufacturing operations in the Boeing family are on the block. They include one state-of-the-art finishing operation that has multifaceted capabilities for finishing and inspection, with room for other manufacturing operations as well. Located inside the Boeing Kent complex, the shop's capabilities include electroplating, anodizing, chemical milling, painting and inspection systems.

Included in the offering is a 116,500 ft<sup>2</sup> building, a third of which is the finishing area. It features automated equipment, a variety of process capabilities, and a water recycle system that captures 85 percent of the process water, which is recovered for

use in electroplating processes. More information is available on Boeing's website: [www.boeing.com/special/realty](http://www.boeing.com/special/realty).

Wall Colmonoy Corporation, Dayton, OH, has expanded to include new coating capabilities and vacuum furnace brazing and heat treating. The expansion includes a variety of thermal spray coating technologies, such as HVOF, plasma, combustion and wire arc, on all types of metals, with special emphasis on furnace-fused coatings.

Wall Colmonoy has its headquarters in Madison Heights, MI, with five plants in the U.S. It also has affiliates in Canada, UK and France.

Jarchem Industries, Newark, NJ, has obtained ISO 9001:2000 certification. The company supplies speciality chemicals for the metal finishing industry.

Crystal Finishing Systems, Inc., Schofield, WI, has received a Return on Environment® Partnership Award from GE Betz for improvements to its wastewater clarification program, which reduced sludge disposal while saving \$2,882 annually in operating costs. It all came about when Crystal Finishing increased production and also increased the flow to its wastewater treatment plant, adversely affecting the process for removing chrome from effluent with ferrous sulfate and a polymer. To correct the problem, the job-shop started using a proprietary polymeric coagulant, and a high molecular weight anionic polymer to produce a fast-forming and quick-settling floc. The products were recommended by GE Betz. After six months of the new treatment program, during which production had increased 19 percent, sludge generation was down by five percent, eliminating 1.5 tons of solid waste per year.

Jessup Engineering, Inc., Rochester Hills, MI, has appointed Gerald (Jerry) Romito director of engineering. He has been with the company for three years. Jessup manufactures customized, high-production, automatic hoist systems for the metal finishing industry.

Lambda Physik AG, Göttingen, Germany, has acquired 98 percent of the capital stock of Optomech, GmbH, a company operating the production of laser tubes under clean room conditions. The announcement said that Optomech will be recorded as a fully consolidated majority shareholder of Lambda Physik in the future. Lambda Physik is a world leader in the development and production of pulsed UV lasers.

## In Memoriam

**Arnold P. Parker**, 87, a long-time member of the Grand Rapids Branch, died in September 2001. A graduate of Michigan State University, he taught high school chemistry before starting a career in metal finishing at Dow Chemical Company. In 1948, he returned to his home town of Middleville, MI, to work for Middleville Engineering as a plating supervisor. In 1954, he went to work for Allied Chemical Company as a salesman, and later joined Walgren Company of Grand Rapids, where he retired as president in 1974.

**Anthony Preston**, 88, who belonged to the Grand Rapids Branch for more than 61 years, died in May 2002. He served as a chemist for a number of Grand Rapids firms during his career. He was one of the founders and president of Preston Products Company, a metal finishing firm. He was also the founder and owner of Reliable Equipment Company, a metal finishing equipment supply firm. Active in the Society throughout his career, Preston attended his last AESF meeting in April of 2002.

Electrochemical Products, Inc., New Berlin, WI, has hired Dina Borysenko as a chemist for their customer service metal finishing and plating laboratory.

The Loctite Corporation in the U.S. has officially changed its legal name to Henkel Loctite Corporation. The announcement said that Loctite companies around the world will soon follow suit. The Henkel Group, with headquarters in Düsseldorf, Germany, acquired Loctite in 1997. Loctite as a brand name will remain the same.

Southern Aluminum Finishing Company (SAF), Atlanta, GA, has announced the winners of its first aluminum finishing project photo contest. The company solicited photos of projects from its customers for the contest. Judging was based on several factors, including project importance, architectural appeal, and general interest.

First place was won by Mike Bivins of Tri-Tech, Inc., Anstell, GA. Bivins submitted photos of Tri-Tech's duranodic dark bronze anodized handrails installed on the grounds of the Alfred Murrah Federal Building Plaza in Oklahoma City, OK.

Second place was won by Don Coffey of Glass & Metal, Inc., Harrisonburg, VA. He sent photos of McLeod Hall at the University of Virginia that show clear anodized brake shapes installed at the bottom of the windows of the building.

Third place winners were Jack and Andrea Cline, Flagstaff, AZ. They sent photos of their home featuring aluminum gutters and cornice designed by SAF's Perimeter Systems Division.

The Electronic and Industrial Finishing Division of Shipley Company, LLC (Shipley EIF), Freeport, NY, has obtained a license from Lucent Technologies for various electroplating products, processes and services developed by the former Electroplating Chemicals & Services

(ECS) division of Lucent. The agreement includes electroplating tin and tin alloys, and precious metal finishes, such as palladium, palladium-nickel, gold and silver.

Enthone, Inc., West Haven, CT, has also obtained a license from Lucent Technologies that grants Enthone global rights to Lucent's tin, tin-alloy, gold, palladium, palladium alloys and rhodium electroplating technologies, processes and patents. The agreement encompasses more than 30 patents and 100 electroplating process chemistries developed by the former Electroplating Chemicals & Services (ECS) division of Lucent. *P&SF*

## Answers to I.Q. Quiz #376

1. tumbling media, finishing compound and water.
2. 900 to 3000 cycles/min; 1/16 to 3/8 in. Most standard equipment operates in the range of 1200-1800 cycles/min and 1/8 to 1/4 in.
3. b, d, e
4. All of them
5. a, c, e