Congratulations New CEF-SEs & ESCs

Congratulations to these surface finishing professionals for completing the requirements to earn the designation of Certified Electroplater-Finisher—Specialist in Electronics (CEF-SE) or Electronics Specialist Certified (ESC):

Ken Mantle, CEF-SE, Gold Tech Industries, Phoenix Branch
Allen M. Clague, CEF-SE, AMP, Inc., Colonial Virginia Branch
Linda R. Borowski, CEF-SE, Rockwell Automation, Milwaukee Branch
Robert C. Denny, ESC, Honeywell, Inc., Pittsburgh Branch
Erik Miller, ESC, Coors Electronic Package Company, North Alabama Branch

OSHA Proposes Extension For Methylene Chloride Users

The Occupational Safety and Health Administration (OSHA) has issued a proposal to extend compliance deadlines for many methylene chloride users (63 *Federal Register* 24501, May 4, 1998). The proposal extends the deadline for compliance with the 8-hr time weighted average (TWA) permissible exposure limit (PEL) of 25 ppm (using respirators or engineering controls) for companies in:

- General aviation aircraft stripping.
- Furniture refinishing.
- Polyurethane foam manufacture.
- Foam fabrication.
- Product formulation.
- Adhesives for boat building and repair.
- Recreational vehicle manufacture.
- Van conversion or upholstery.
- Construction work (including restoration and preservation of building, painting and paint removal, cabinet making, or floor refinishing and resurfacing).

For additional information, contact the Halogenated Solvents Industry Alliance (HSIA), 2001 L Street, NW, Suite 506A, Washington, DC 20036 (Phone: 202/775-0232 or 888/594-4742; fax: 202/833-0381).

Test Your Plating I.Q. #339

By John Laurilliard, CEF

Cleaning (true or false)

1. Cleaners high in caustic soda or caustic potash are desirable for removing soils from aluminum and zinc diecasting. oT oF

2. Cathodic electrocleaning releases twice as much gas as anodic cleaning. oT oF

3. Anodic cleaning of nickel and stainless steel may cause adhesion problems because of oxide film formation. oT oF

4. Large objects should be transferred as quickly as possible from a hot cleaner to the rinse tank and allowed to cool to the rinsewater temperature before transferring to an acid activator. oT oF

5. Normally, it is desirable to use a soak cleaner following electrocleaning to minimize build-up of soil in the soak cleaner. oT oF

Answers are on page 65.

New Magazines SAE Launches Auto Body International

The Society of Automotive Engineers, Inc. has introduced *Automotive Body International*, a quarterly magazine. The publication will explore the latest methods for faster and more efficient product development with the goal of reducing development time and costs. Published in April, June, September and December, the magazine has a circulation of more than 20,000. For information, contact SAE Subscription Hotline (phone: 724/776-1383; fax: 724/776-1615; e-mail: circulation@sae.org).

AWS Launches Inspection Trends

The American Welding Society (AWS) has started a new magazine for materials inspection and testing personnel. *Inspection Trends* will be a sister publication to *AWS Welding Journal.*

The first issue of the quarterly will be published in July. The publication will focus on metal examination and testing and related materials issues. The initial circulation will be 18,000. For more information, contact AWS (phone: 800/443-9353, ext. 274; e-mail: petroski@aws.org).

1998 Buyers' Guide Published by AEC

The Aluminum Extruders Council (AEC) has published the 1998 edition of its *Shapemakers Buyers' Guide.*

The 36-page publication features a directory of the council's members. It lists locations, contact names, press sizes, maximum circle size and forms produced, as well as types of services offered by each extruder. It also specifies whether an extruder is ISO or QS certified.

To request a copy, contact AEC at 1000 N. Rand Road, Suite 214, Wauconda, IL 60084 (phone: 847/526-2010; fax: 847/526-3993; e-mail mail@aec.org).

Call for papers: ASTM Symposium

Papers are invited for the 31st National Symposium on Fatigue and

Fracture Mechanics, sponsored by the American Society for Testing Materials (ASTM) Committee E-8 on Fatigue and Fracture. The symposium will be held June 29–July 1, 1999, in Cleveland, OH.

Papers are sought in the following areas:

- Advances in analysis and predictive capability
- Behavior of new and emerging materials
- Design tools and approaches to control failures
- Accelerated testing involving interactions
- Assessment of the risk and remaining durability of aging systems
- Integrity and durability in the range of industrial applications, including: Transportation systems/subsystems; turbomachinery/pressure vessels and piping; off-highway construction equipment; civil and off-shore structures; and medical and consumer products.

Prospective authors should submit a title, 250–300 word preliminary abstract, and ASTM submittal form by August 28, 1998 to Dorothy Savini, Symposia Operations, ASTM, 100 Barr Harbor Dr., West Conshohocken, PA 19428-2959 (phone: 610/832-9677).

Symposium Planned On Hard Anodizing

The International Hard Anodizing Association, Moorestown, NJ, has planned its technical symposium for October 11–14, at the Westgate Hotel, San Diego, CA. Technical sessions will be held October 12–13. A complete list of speakers and topics, as well as registration information, is available from the association at P.O. Box 579, Moorestown, NJ 08057 (phone: 609/234-0330; fax: 609/727-9504; e-mail 74117.554@compuserve.com).

Steel Shipments Up 7.1 Percent

For the first two months of 1998, U.S. steel mills shipped 17,875,963 net tons, an increase of 7.1 percent over the same period in 1997, according to the American Iron and Steel Institute (AISI). The report said steel shipments are into a seventh year of consecutive growth. The largest increase was in construction and contractors' products, which increased 13.1 percent.

Company News

o **Enthone-OMI** has completed the construction of a new "cleanroom" at its research facility in Orange, CT. The room contains two state-of-the-art EEJA plating machines used to electroplate metals onto computer chips. Production is focused on developmental projects in support of chip manufacturing customers.

The 400 ft^2 room is rated at Class 1000, indicating there are less than 1000 particles of contamination per m^3 in the confines of the pressurized environment. Protective suits and head gear are required to enter the room.

Enthone-OMI provides specialty coatings technology to the electronics and metal finishing industries throughout the world.

o **Ausimont USA, Inc**., a large manufacturer of PVDF resins for use in the architectural coatings and a member of the **Montedison Group**, has announced a major expansion of the company's manufacturing facility in Thorofare, NJ. Already underway, the expansion will increase manufacturing capacity by 25 percent for the company's proprietary family of coatings.

The completed facility will be one of the largest and most modern in the world for producing PVDA resins, including the latest advances in copolymer enhancement.

o **U.S. Filter Corporation** is celebrating 10 years of producing its patented continuous deionization systems. The systems use ion exchange membranes, ion exchange resins and electricity to continuously produce high-purity water. U.S. Filter installed its first industrial system in February 1988. Since then, 1,200 systems have been installed in various markets.

U.S. Filter is one of the world's largest manufacturers of water and wastewater treatment systems, specializing in water management and resource recovery services for industrial, commercial and municipal customers. Based in Palm Desert, CA, the company has 600 locations worldwide.

o **Metal Arts Company, Inc**., Rochester, NY, working in cooperation with the **New York State Energy Research and Development Authority** (NYSERDA), has been awarded a $400,000 grant from the **U.S. Department of Energy** (DOE). The grant will be used to further develop a patented process for finishing aluminum products. Metal Arts and NYSERDA previously collaborated on a project to develop and demonstrate the electroless nickel plating process on rigid memory disks for computers. The process can also be used to manufacture other chromium/nickel/copper-plated aluminum products.

o **Duraline Abrasives**, Lockport, NY, a manufacturer of coated abrasives products for the metalworking industry, has moved into a new facility. The move doubled its size to provide service for coated abrasives users throughout the U.S. and Canada.

o **Radiance Laboratories, Inc**., South Burlington, VT, has been awarded a $140,000 Phase 1 Evaluation Contract by the **United States Display Consortium** (USDC). The two companies will jointly evaluate the Radiance Process for cleaning glass substrates used for manufacturing flat panel displays.

o **AIMCOR Metals Group** headquarters and three of its production plants have received ISO 9002 registration. Headquartered in Coraopolis, PA, AIMCOR is a supplier of metallurgical process materials to the North American steel and foundry industries.

o **Nalco Chemical Company**, Naperville, IL, has acquired **Texo Corporation**, Cincinnati, OH, a manufacturer of specialty and performance chemicals. Nalco manufactures and markets water treatment and process chemical services worldwide.

o **Howmet Corporation's Cercast Montreal**, Quebec, operation is expanding and relocating its operations in early 1999. The plant will move out of its 107,000 ft^2 operation into a new 160,000 ft^2 facility. The Cercast Group is a large supplier of high-technology aluminum castings.

o **Metal Recovery Technologies, Inc**., a commercial zinc recycler, has announced it is receiving $3 million financing from **Zinc Investments, Inc**., Geneva, Switzerland, to totally revamp the dezincing plant in East Chicago, IN, and hire additional personnel. When improvements are made, the potential dezincing capacity will become 110,000 to 120,000 tons per year, giving the facility revenues of about $23 million annually. The company uses a patented process that removes zinc from galvanized steel scrap to produce 99.8 percent pure zinc, and a high-quality reusable "black" scrap steel. The technology was developed in partnership with the **Argonne National Laboratory** and the **U.S. Department of Energy**.

o **Nilfisk of America**, Malvern, PA, has changed its name to **Nilfisk-Advance America, Inc**. The company manufactures specialty industrial vacuum cleaners for critical environments, hazardous dust and fine powder. They are used in a variety of industries, including powder coating and semiconductor manufacturing.

o **Osmonics** has announced that its Minnetonka, MN, operation has received ISO 9001 certification. The location is the company's world headquarters and primary design and manufacturing facility for filters, membrane elements, pumps and machines used in fluid purification and separation.

Answers to quiz from page 63.

1. False. Aluminum and zinc are attacked by high caustic cleaners.
2. True.
3. True.
4. True, or acid attack may occur.
5. False. The reverse is true.

In Memoriam

Dr. Simon Wernick, 95, died on April 29, 1998, in England. He retired as secretary general of the International Union for Surface Finishing (IUSF) after serving 55 years, and was the retired editor of the United Kingdom's distinguished journal, *Transactions of the Institute of Metal Finishing.*

Dr. Wernick began his career in surface finishing as a chemist and eventually set up shop as a consultant for a large and impressive list of European companies. He conducted research on aluminum anodizing, nickel plating and many other areas. His contributions to surface finishing literature span better than half a century. He is a co-author of *Surface Treatment and Finishing of Aluminum and Its Alloys.*

A past president of the Institute of Metal Finishing (IMF), Dr. Wernick was instrumental in organizing the Interfinish Congress, which is held every four years under the sponsorship of the IUSF. In 1986, he was named the AESF Scientific Achievement Award recipient. The IUSF International Achievement Award in Surface Finishing is named in his honor.

AESF also recently learned that **Vairavan Manickam** of the Phoenix Branch died on February 1, 1998.

Powder Coater's Manual

Rodger Talbert, ed.;
Vincent Verlag, pub.
(Looseleaf; 11 chapters)
Order Number 10-065
Members/$262.00
Non-members/292.00

This new manual, designed to be a source of information and daily reference guide for all powder coaters, goes beyond the fundamentals by offering an in-depth look at the issues affecting the day-to-day operation of a powder coating system. Equipment options, process control issues and specific application guidance are included.

Each chapter is supported by charts, graphs, tables and illustrations for quick access of information on important issues. The manual also covers all of the subsystems and processes that are used in powder coating. The emphasis is on the application process and the different forces that affect efficiency. This manual will assist the operator with advice for application challenges such as Faraday cage effect, film build control, film texture, back ionization and control of surface defects.

Eleven chapters include: Powder coating materials; part preparation processes & equipment; powder application processes & equipment; powder booths & recovery systems; curing process & equipment; material handling; finished film testing; process control; system maintenance; troubleshooting; and cost analysis. Supplements of updated material will be shipped twice each year so that the operator can maintain an up-to-date manual. (Updates will be available at 50¢/page). All key issues in the manual are underlined and indexed for easy reference.

To order call the AESF Bookstore at 1-800/334-2052.