



## CALENDAR

### JANUARY 10-14

TWI, Inc., Vibration Analysis, Alignment and Balancing Workshop. Uptime/Hane Industrial Training Facility, Milwaukee, WI. Workshop for mechanics, maintenance personnel and operators. Covers diagnosis, measurement, and other vibration, alignment and balancing basics. For more information, contact Uptime, Inc., (812) 234-0007 or fax (812) 232-3978.

### JANUARY 23-26

American Society of Mechanical Engineers 17th Annual Energy Sources Technology Conference & Exhibition. Clarion Hotel, New Orleans, LA. Papers and presentations on drilling and emerging energy technologies, energy and environmental management, fossil fuel combustion, hydrocarbon processing, internal combustion engines, materials and design, and more. For more information call ASME Petroleum Division, (214) 746-4901 or fax (214) 746-4902.

### FEBRUARY 21-24

Center for Industrial Heat Treating Processes, University of Cincinnati, Heat Treating Workshops, Clarion International at O'Hare, Chicago. **February 21-22, Applied Induction Heat Treating Workshop**, covering fundamentals including electromagnetic induction, equipment and power supplies, metallurgy, coil design, quenching, quality control and troubleshooting, and **Quenching Processes, Part Distortion and Residual Stress Analysis in Heat Treating**,

covering importance of distortion and stresses, control of distortion and stress in *quenching, gas carburizing and carbonitriding*, straightening distorted parts, and controlling distortion. **February 23-24, Applied Gas Carburizing in Heat Treatment**, covering fundamentals of gas carburizing process, furnaces and atmosphere control, instrumentation, pre- and post-heat treating, quality control and part distortion, and **Applied Metallurgy for Heat Treating Industries**, which covers material selection, characterization, measurement of mechanical properties, solidification, corrosion and more. For more information, contact Dr. A. H. Soni (513) 556-2710 or fax (513) 556-3390.

### MARCH 3-5

AGMA 1994 Annual Meeting, Marriott Marco Island Resort, Marco Island, FL. The theme of the meeting will be "Perspective On World Class Manufacturing." Jerry Flaherty, Group President of Caterpillar, will be the keynote speaker. Note: This meeting is **two months earlier** than previous meetings. For more information, contact AGMA at (703) 684-0211 or fax (703) 684-0242.

### MAY 9-10

Penn State University National Center for Advanced Gear Manufacturing Technologies Advanced Gear Manufacturing Symposium. Penn State University, State College, PA. Speakers from government, academia and industry discussing current gear manufacturing technology and research. For more information, contact Greg Johnson at (814) 865-8207.

### CALL FOR PAPERS

The Gear Research Institute is planning an international conference on Induction Hardened Gears and Precision Components to be held in Indianapolis, IN, on **May 15-17, 1995**. The conference will cover materials

processing, quality assurance and engineering performance of induction hardened gears and precision components. The Institute is looking for papers on the following topics: distortion control, case depth (optimization and control), cost factors, quenching and quenchants, materials selection, pretreatment (microstructure control), principles of coil design, bending fatigue, scoring, contact fatigue, influence of carbon and alloy content, machinability, residual stress, environmental impact and extreme applications. For more information contact Sharon Schaefer at GRI, (708) 241-0660, or fax (708) 241-0662.

### GEAR SCHOOLS AND WORKSHOP

AGMA has announced the dates for its 1994 Training School for Gear Manufacturing sessions. The dates are **Jan. 10-14, Mar. 7-11, May 16-20, Sept. 12-16 and Nov. 14-18**. All sessions will be held at Daley College in Chicago, IL. The 1994 curriculum is designed to teach novice operators — those with less than one year's experience — how to maximize the output from the machines they operate. The sessions are also useful for sales engineer training, new employee orientation and refresher courses for veteran operators. Contact AGMA at (703) 684-0211 for a registration packet or more information.

**The Falk Corporation**, Milwaukee, WI, offers a series of four-day workshops dedicated to the theory, operation and maintenance of speed reducers and flexible shaft couplings. It covers installation, alignment, maintenance and failure analysis procedures. Contact Ron Nimmers at The Falk Corporation, (800) 852-3255, or by fax at (414) 937-4359 for the 1994 workshop schedule.