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Comments, criticisms, and suggestions are invited, and should be forwarded to ASM International.
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Preface

The online proceedings contains extended abstracts of presentations made at the 27th ASM Heat Treating Society Conference and Exposition in Indianapolis, Indiana, USA, September 16–18, 2013. The event shared location with AGMA's Gear Expo and Fall Technical Meeting, so many of the presentations focused on heat treatment and surface engineering of gears. Heat treating is a value added step in the manufacture of parts, especially for critical parts such as gears, bearings, and shafts. The many presentations covered a wide variety of hardening and surface treatment processes, atmosphere technologies, brazing processes, heating innovations, global and environmental issues, quenching and cooling technology, vacuum technology, and emerging heat treating technologies.

On behalf of the Heat Treating Society Technology and Programming Committee, we want to thank the authors of these extended abstracts and papers for their submissions. These articles help the Heat Treating Society (HTS) in many ways. First, they provide reference material for the attendees to aid in their understanding and retention of presented materials. Second, they help HTS reach people who were unable to attend the conference but want to stay abreast of what is happening in our industry. Third, they collectively provide direction to our industry in terms of identifying needs, current technical and equipment capabilities, and point toward future developments.

Extended abstracts are more than abstracts. They contain key statements, figures, tables and conclusions in a concise format. They represent the latest in state-of-the-art heat treating materials, processes, products, equipment, and methodology. The topics cover the depth of our industry and will be a valuable reference for years to come. Please see the fall issue of ASM International's Journal of Materials Engineering and Performance (JMEP) as it contains full papers for many of these extended abstracts.

This conference was a joint effort and we wish to especially thank the members of the Heat Treating Society Board, the Heat Treating Society Technology and Programming Committee, and the Exposition Committee for their inspiration, guidance and tireless efforts to identify, solicit, and encourage industry experts to share their knowledge and expertise with the heat treating world. We as individuals and as an industry profit from the effort of these volunteers and the many hours they devote to advancing the science and business of heat treating.

The opportunity to Co-Chair this Conference and Exposition as well as to bring you the 2013 Heat Treating Proceedings has truly been our pleasure and privilege. Thank you for allowing us this opportunity.

27th ASM Heat Treating Society Conference and Exposition Co-Chairmen

B. Lynn Ferguson  
Deformation Control Technology, Inc.

Rob Goldstein  
Fluxtrol, Inc.
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