This Transactions volume contains the best technical papers of all those presented in 2007. Each has been reviewed according to the established review procedures of the Engineering Meetings Board of SAE. These are the best quality SAE Materials and Manufacturing papers presented in 2007 and have been judged by technical experts to be worthy of preserving in the permanent technical literature.

The reviewing procedures require a technical review of all SAE papers by at least four well-qualified individuals who are technically competent within the scope of the papers’ subject/discipline and who are experienced in reviewing papers.

Each paper is evaluated in four areas – long term reference value; presentation of technically new and innovative materials or constructive and in-depth review; professional integrity; and clarity of presentation. Based on the results of this review process, papers are selected for publication.

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