
Editorial

This special issue of the *Journal of Materials Engineering and Performance* (JMEP) contains selected papers from the third decadal symposium on beta titanium alloys organized by the TMS Titanium Committee. These symposiums—the first held in Atlanta, Georgia, in March 1983, the second in February, 1993, in Denver, Colorado—have, from their origin, been designed to provide a summary of the progress made during the past decade in understanding the fundamental behavior of these alloys as well as their application.

Beta titanium alloys (as well as the more heavily β -stabilized α/β -alloys such as Ti-5Al-5Mo-5V-3Cr) are continuing to receive more attention with application in the late 1990s on the Boeing 777, and more recently on the Boeing 787 and Airbus A-380. They also find application in the business and commuter jet sectors, as well as in military helicopters.

These alloys, because of their low modulus and high strength, have also found application for automotive and motorcycle suspensions. Finally, the breadth of alloy compositions available with the beta titanium alloy family allows tailoring of low-modulus, biocompatible medical devices that have the potential of both decreasing health care costs and enhancing the patient's quality of life.

Papers from throughout the international scientific community are included in this special issue with representation from Belgium, France, Germany, Japan, Russia, and the Ukraine, as well as the United States. Applications and potential applications, including dental, automotive, prosthetics, armor, and recreation arenas, in addition to aerospace (airframes and engines) were discussed. Participants were from industry, universities, and government labs, representing the entire value chain.

The symposium organizers are most grateful to Dr. Jeffrey Hawk, Editor, JMEP, and most notably Ms. Laura Cameron, JMEP staff, without whose assistance the publication of these symposium papers would not have been possible.



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