

BOULDER DAMAGE SYMPOSIUM

October 26 - 28, 1987

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11. ABSTRACT <i>(A 200-word or less factual summary of most significant information. If document includes a significant bibliography or literature survey, mention it here)</i> The Nineteenth Annual Symposium on Optical Materials for High-Power Lasers (Boulder Damage Symposium) was held at the National Institute of Standards and Technology in Boulder, Colorado, October 26-28, 1987. The Symposium was held under the auspices of ASTM Committee F-1, Subcommittee on Laser Standards, with the joint sponsorship of NIST, the Defense Advanced Research Project Agency, the Department of Energy, the Office of Naval Research, and the Air Force Office of Scientific Research. Over 190 scientists attended the Symposium, including representatives of the United Kingdom, France, Japan, India, Canada, and the Federal Republic of Germany. The Symposium was divided into sessions concerning Materials and Measurements, Mirrors and Surfaces, Thin Films, and, finally, Fundamental Mechanisms. As in previous years, the emphasis of the papers presented at the Symposium was directed toward new frontiers and new developments. Particular emphasis was given to materials for high power systems. The wavelength range of prime interest was from 10.6 μm to the uv region. Highlights included surface characterization, thin film substrate boundaries, and advances in fundamental laser-matter threshold interactions and mechanisms. The scaling of damage thresholds with pulse duration, focal area, and wavelength was discussed in detail. Harold E. Bennett of the Naval Weapons Center, Arthur H. Guenther of the Air Force Weapons Laboratory, David Milam of the Lawrence Livermore National Laboratory, Brian E. Newnam of the Los Alamos National Laboratory and M. J. Soileau of the University of Central Florida were co-chairmen of the Symposium. The Twentieth Annual Symposium is scheduled for October 26-28, 1988, at the National Institute of Standards and Technology, Boulder, Colorado.			
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