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Nonimaging Optics: Efficient Design for Illumination and Solar Concentration IX

Roland Winston
Jeffrey M. Gordon
Editors

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Introduction

Welcome to the 2012 Nonimaging Optics conference. The first conference convened in 1991, so this represents our 21st year.

The conference had more submissions and more attendees than in the recent past, which is a good indicator of the vitality of the field. From the beginning, the subject was differentiated from classical optics. In the first book on nonimaging optics in 1978, the great Walter T. Welford of Imperial College London inserted the Stefan-Boltzmann law of radiation by a black body on page one. When an optics book starts with a thermodynamic relation, you know something interesting is going to happen, and it has! From the beginning, concepts like maximum etendue, concentration, and thermodynamic efficiency were common themes. The connections between information and entropy inspire the design of optimal nonimaging optics devices. And that is why the fusion of the science of light (optics) with the science of heat (thermodynamics), is where much of the excitement is today.

So on behalf of Jeffrey Gordon and myself, please enjoy the next two days of exciting new contributions to this vibrant field of nonimaging optics.

Roland Winston
Jeffrey M. Gordon