

Abstract Submitted
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Development of Laser-Produced High-Energy X-ray Sources for Phase Contrast Imaging¹ JONATHAN WORKMAN, J. COBBLE, K. FLIPPO, D.C. GAUTIER, S. LETZRING, D.S. MONTGOMERY, Los Alamos National Laboratory, S. GAILLARD, University of Nevada Reno — Experiments performed on the TRIDENT-200TW facility show phase contrast effects from K-alpha x-ray sources produced from 2-ps laser pulses using 17-keV Mo backlighters. These low magnification images show high-spatial resolution and enhanced contrast on these 3-mm undriven CH disks. We will compare these results to some predictions and discuss plans to measure dynamic properties of shocked material on the OMEGA-EP facility. Results from pulse duration scaling on OMEGA-EP will also be presented.

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