

Abstract Submitted
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Utilization of Neutron Bang-time CVD diamond detectors at the Z Accelerator GORDON CHANDLER, KELLY HAHN, CARLOS RUIZ, BRENT JONES, PERRY ALBERTO, JOSE TORRES, MATTHEW GOMEZ, ERIC HARDING, ADAM HARVEY-THOMPSON, MARK HESS, PATRICK KNAPP, Sandia Natl Labs, GARY COOPER, JEDEDIAH STYRON, University of New Mexico, KEN MOY, IAN MCKENNA, Special Technologies Laboratory, VLADIMIR GLEBOV, Laboratory for Laser Energetics, DAVID FITTINGHOFF, MARK J. MAY, LUCAS SNYDER, Lawrence Livermore National Laboratories — We are utilizing Chemical Vapor Deposited (CVD) Diamond detectors at ~ 2.3 meters on the Z accelerator to infer neutron bang-times from Magnetized Liner Inertial Fusion (MagLIF) sources yielding up to 3×10^{12} DD neutrons and to bound the neutron time history of Deuterium Gas Puff loads producing 5×10^{13} DD neutrons. The current implementation of the diagnostic and initial results will be shown as well as our future plans for the diagnostic.

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