Abstract Submitted for the DPP16 Meeting of The American Physical Society

Full-Pulse Particle-in-Cell Simulations of Hot-Electron Generation in OMEGA Experiments 1 ELI BORWICK, JUN LI, CHUANG REN, RUI YAN, University of Rochester, SUXING HU, Laboratory for Laser Energetics, LAB-ORATORY FOR LASER ENERGETICS COLLABORATION — Using data from the LILAC hydrocode in conjunction with the particle-in-cell code OSIRIS, we now perform several simulations sampling a 1-ns pulse to determine the evolution of hot-electron generation as well as electron divergence during the pulse. The results will be compared with the OMEGA experiments that measured hot-electron generation and divergence. 2

¹This material is based upon work supported by the Department of Energy under Grant No. DE-SC0012316, the National Science Foundation under Grant No. PHY-1314734, and Laboratory for Laser Energetics. The research used resources of the National Energy Resea

²B. Yaakobi *et al.*, Phys. Plasmas **20**, 092706 (2013).

Eli Borwick University of Rochester

Date submitted: 15 Jul 2016 Electronic form version 1.4