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Time-of-flight neutron testing of an LGB detector using a digitizer JOHN E. ELLSWORTH¹, LAWRENCE B. REES, Brigham Young University, Department of Physics and Astronomy — Lithium gadolinium borate cerium crystal embedded in plastic scintillator promises to enhance low flux neutron spectroscopy through paired-pulse scintillation. To help calibrate this detector it was taken to the Los Alamos Neutron Science Center (LANSCE) and exposed to neutrons from a gated fission chamber. Reported here are experience and issues in doing this experiment using a pulse wave-form digitizer.

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