Abstract Submitted for the DNP16 Meeting of The American Physical Society

State Univ, NPDGAMMA COLLABORATION — The NPDGamma experiment measures the parity-violating prompt gamma asymmetry with respect to neutron spin in the capture of polarized cold neutrons on a liquid hydrogen target. The parity-violating prompt gamma directional asymmetry is sensitive to the $\Delta I=1$ weak potential and is therefore a measure of the strength of the hadronic interaction due to weak pion exchange. Analysis of the data uncovered an issue with the background target composition which led to new direct measurements of the hydrogen vessel material in the first half of 2016. This talk will motivate and describe the new background subtraction strategy and discuss the current status of its implementation.

David Blyth Arizona State Univ

Date submitted: 01 Jul 2016 Electronic form version 1.4