Low Energy Elastic Electron Scattering from Gaseous Isopropanol¹ AMOS JO, ALEXANDER GAUF, JOSHUA TANNER, LEIGH R. HARGREAVES, MURTADHA A. KHAKOO, California State University Physics, Fullerton, CA 92834, CARL WINSTEAD, B. VINCENT MCKOY, Caltech Physical Chemistry, Pasadena, California 91125, MARCIO H.F. BETTEGA, Federal University of Parana, Curitiba, Parana, Brazil — Normalized absolute experimental electron scattering differential cross-sections (DCS) for electron energies of 1.5eV to 30eV and scattering angles from 10° to 130°, for elastic electron scattering from isopropyl alcohol will be presented. The experimental method employs the relative flow method using an aperture gas collimator source of isopropanol and helium as the calibration gas. It also employs a moveable source arrangement to accurately determine the experimental background. The theory is a multi-channel Schwinger method with polarization effects included. On average, agreement between theory and experiment is found to be very good.

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