

Analyzing power in quasi-elastic proton-proton scattering at the beam energies of 200-650 MeV/nucleon

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Analyzing power of the quasi-elastic proton-proton scattering was obtained using a polarized deuteron beam and a polyethylene target at the Nuclotron Internal Target Station. The selection of useful events was performed using time and amplitude information from scintillation counters. The asymmetry on hydrogen was obtained by the carbon background subtraction. The analyzing power values were obtained at the beam energies of 200-650 MeV/nucleon and were compared with the predictions of the partial-wave analysis. The obtained values show the possibility of the deuteron beam vector polarization determination using this method.

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