

## ELASTIC AND INELASTIC SCATTERING OF ${}^7\text{Li} + {}^{11}\text{B}$

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Angular distributions of the  ${}^7\text{Li} + {}^{11}\text{B}$  elastic and inelastic scattering were measured at  $E_{\text{lab}}({}^{11}\text{B}) = 44$  MeV for the transitions to the ground and excited states of  ${}^7\text{Li}$  and  ${}^{11}\text{B}$ . These data and those known from literature only at  $E_{\text{lab}}({}^7\text{Li}) = 34$  MeV were analyzed within the optical model and coupled-reaction-channels method. The elastic and inelastic scattering, reorientations of  ${}^7\text{Li}$  and  ${}^{11}\text{B}$  in ground and excited states as well as the prominent one- and two-step transfers were included in the channels-coupling-scheme. The  ${}^7\text{Li} + {}^{11}\text{B}$  optical potential parameters for ground and excited states of  ${}^7\text{Li}$  and  ${}^{11}\text{B}$  as well as deformation parameters of these nuclei were deduced. The energy dependence of  ${}^7\text{Li}^{(*)} + {}^{11}\text{B}^{(*)}$  optical potential parameters was studied.