Optical properties of the dense xenon plasma

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Investigation of the optical plasma properties is of great interest due to the wide areas of practical application. In this work the reflectivity of the dense xenon plasma with taking into account the density profile of the shock wave front was investigated. Calculations were conducted in the framework of the effective interaction potentials [1-3] (that take into account the static and dynamic screening effects and diffraction effect). Reflectivity was calculated on the basis of the Fresnel formula using the dielectric function. Results were compared with experimental data [4].

References