

# The Simultaneous Evaluation of the Standards and Other Cross Sections of Importance for Technology<sup>a</sup>

by

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## Abstract

The simultaneous evaluation of the cross sections of  ${}^6\text{Li}(n, \alpha)$ ,  ${}^6\text{Li}(n, n)$ ,  ${}^{10}\text{B}(n, \alpha_0)$ ,  ${}^{10}\text{B}(n, \alpha_1)$ ,  ${}^{10}\text{B}(n, n)$ ,  ${}^{197}\text{Au}(n, \gamma)$ ,  ${}^{238}\text{U}(n, \gamma)$ ,  ${}^{235}\text{U}(n, f)$ ,  ${}^{239}\text{Pu}(n, f)$ , and  ${}^{238}\text{U}(n, f)$  and the thermal constants was part of the evaluation of these data for ENDF/B-VI. The FORTRAN codes and the data files used for the simultaneous evaluation are documented in the present report. Corrections for some data reported in the literature and the addition of several new data sets results in negligible changes except for the fission cross sections where minor changes occur relative to the evaluation for ENDF/B-VI.

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