

Žiga Šmit

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Žiga Šmit is retired full professor at the Faculty of Mathematics and Physics of the University of Ljubljana. His research work is conducted at the Jožef Stefan Institute in Ljubljana. His general field of interest are atomic collisions with light ions. He studied ionization mechanisms of inner shells by proton impact in semiclassical approximation and proposed corrections beyond the first step models. At the same time, he developed numerical models for practical applications of induced X-ray for chemical analysis and produced several methods for application of PIXE on historic materials, like analysis of archaeological metals, differential PIXE for the analysis of layered samples, a combined PIXE-PIGE algorithm for the analysis of historic glasses.