



Modeling of the Bremsstrahlung process in connection to Terrestrial gamma-ray flashes

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Terrestrial gamma-ray flashes (TGF) are short pulses of gamma rays produced by high energy electrons through the bremsstrahlung process. In order to advance our understanding of the production mechanisms of TGFs it is useful to model the bremsstrahlung process as exact as possible. Therefore, we have developed a Monte-Carlo model of the bremsstrahlung process using interaction cross sections for the electrons calculated directly from the Sommerfeldt-Maue eigenfunctions. We will present the method and the first results from this modeling.