

# Analysis of Electrostatic Environment and Discharge Models

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*Abstract*—Interferences produced by the electrostatic discharges (ESD) events are sources of multiple failures and malfunction of electric and electronic equipment. To reduce the negative impact, a clarification of ESD processes is proposed. The paper deals with the analysis of charging/discharging processes and the establishing methods to reduce the risk of electrostatic discharge. For the contact electric charging, a comparative analysis of the material properties is done. Different ESD models are discussed and, waveforms of discharge current for these models are obtained, as basis for designing the standard testing simulators.