

IS 15644 : 2006 – Safety of electrical Toys

Children are often unaware of the dangers of using toys which may present hazards to their health and well being. These **hazards** may be in the form of electrical shocks, mechanical impact, exposure to toxic substances, choking hazards etc. Therefore, **safety of the toys** is of paramount importance for preventing injury to children, especially when they are electrically powered.

The Indian Standard 15644 deals with the **safety aspects** of Electrical Toys. It recognizes Toys as **Electrical Toys** which have, at least one function that is dependent on electricity. The supply of electricity to the toy can be through **rechargeable or non-rechargeable batteries**, or through a **transformer connected** to supply mains. The transformer toys are not intended for use by children below 3 years of age. Further, the standard also specifies that the **working voltage** between any two accessible parts of the toys shall not exceed 24V when the toy is supplied its rated voltage.

The various safety aspects of Electrical Toys covered in this Indian Standard include the ability of toys to withstand Heating and Abnormal Operation, Electric Strength at Operating Temperature, Moisture Resistance, Mechanical Strength, Protection of Cords and Wires, Clearance and Creepage Distances, Resistance to Heat and Fire, Radiation, Toxicity and similar Hazards etc.

The standard also provides information on the sequence in which these applicable tests are to be carried out. Through these specified tests applicable to Electrical Toys, assessment is done to check compliance to the safety requirements.