

Ensuring Safe Water: The Indian Standard for Chlorine Tablets (IS 9825:2003)

The **IS 9825:2003 standard** specifies the requirements for **chlorine tablets**, which are used as **disinfecting agents** for chlorinating small quantities of water. These **water purification tablets** are commonly used in homes, hospitals, hotels, and offices where safe drinking water may not be readily available. They are formulated with stable **bleaching powder** and edible diluents like sodium chloride or iodized salt. Each tablet size is designed to treat a specific amount of water with a concentration of **1.25 mg/L chlorine** for effective disinfection.

It lays parameters such as **chlorine tablets for water treatment** to dissolve quickly, provide uniform distribution of chlorine, and effectively disinfect water. The tablets should have a **shelf life** of at least six months while retaining **75% of available chlorine**. Additional quality attributes include uniform size, ease of use, **low moisture content**, and safe packaging to maintain product integrity. It also recommends clear instructions on dosage, compatibility with potable water, and safe storage guidelines.

The IS 9825:2003 standard ensures that **chlorine tablets** meet consumer expectations by defining stringent specifications. It specifies the use of stable raw materials (e.g., bleaching powder conforming to IS 1065), limits the moisture content to **2.0%** to enhance shelf life, and ensures uniform tablet size for consistent chlorine dosing. The standard mandates **air-tight packaging** in amber-colored glass or plastic containers to protect the tablets from moisture and heat. Shelf life is explicitly addressed, requiring tablets to retain at least **75% of their chlorine content** for six months. The standard also provides methods for testing parameters such as available chlorine and moisture content to ensure consistent quality.