

# Titanium Dioxide

## Specification Sheet

**Description:** White pigment of crystalline structure with a high refractive index & great inertness able to reflect & scatter light. Derived from the naturally occurring mineral ilmenite. Synonyms: cosmetic white, rutile, brookite, tipaque, zopaque, titanic anhydride. Primary particle size 200-250 nm, purity >98%, pH 7-8 (10% concentration). White powder, characteristic odor. Gives white suspension in water or oil (but is insoluble).

**CAS:** 13463-67-7

**INCI Name:** Titanium dioxide (CI 77891)

**Benefits:**

- Reflects sunlight (UVB rays)
- Widely used in makeup powders to lighten shades

**Use:** Can be added to formulas as-is, recommended concentration 2-25 %. For external use only. Store light-protected.

**Applications:** Sun care products, color cosmetics with or without sun protection.

**Country of Origin:** USA

**Raw material source:** Ilmenite

**Manufacture:** Titanium dioxide is made from the mineral ilmenite and sulfuric acid to produce synthetic rutile which consists then of more than 90% of titanium dioxide.

**Animal Testing:** Not animal tested

**GMO:** GMO free (does not contain plant-derived components)

**Vegan:** Does not contain animal-derived components

**Regulatory Information:** Sunscreens are registered as API (Active Pharmaceutical Ingredient) or OTC-drug with the FDA. This means that, if you want to sell products containing a sunscreen, your facility must be registered with the FDA and operate under cGMP guidelines. Further information about the FDA regulation of sunscreens can be found [here](#).