

## Tin Oxide Nanoparticles TOP1901

### Description:

Tin Oxide ( $\text{SnO}_2$ ) or stannic oxide is one of the most important semiconductor ( $E_g=3.6 \text{ eV}$ ) can be used as photocatalyst for degradation of organic compounds. Tin oxide nanoparticles have good transparent mirror which can be use as anti-reflection coatings.

Characterization	
CAS	18282-10-5
Stock No.	TOP1901
Molecular formula	$\text{SnO}_2$
Molecular weight (g/mol)	150.71
Form	Powder
Color	Gray
Morphology	Spherical
Size range (nm)	<100
Total impurity (%)	<1
Density (g/cm <sup>3</sup> )	6.95
Solubility	Insoluble



Image of Tin oxide nanopowder (TOP1901)

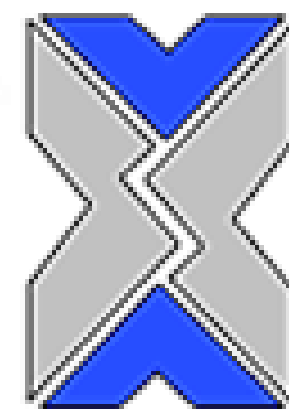
**Note:** product specifications are subject to amendment and may change over time.

### Applications (but not limited to the following):

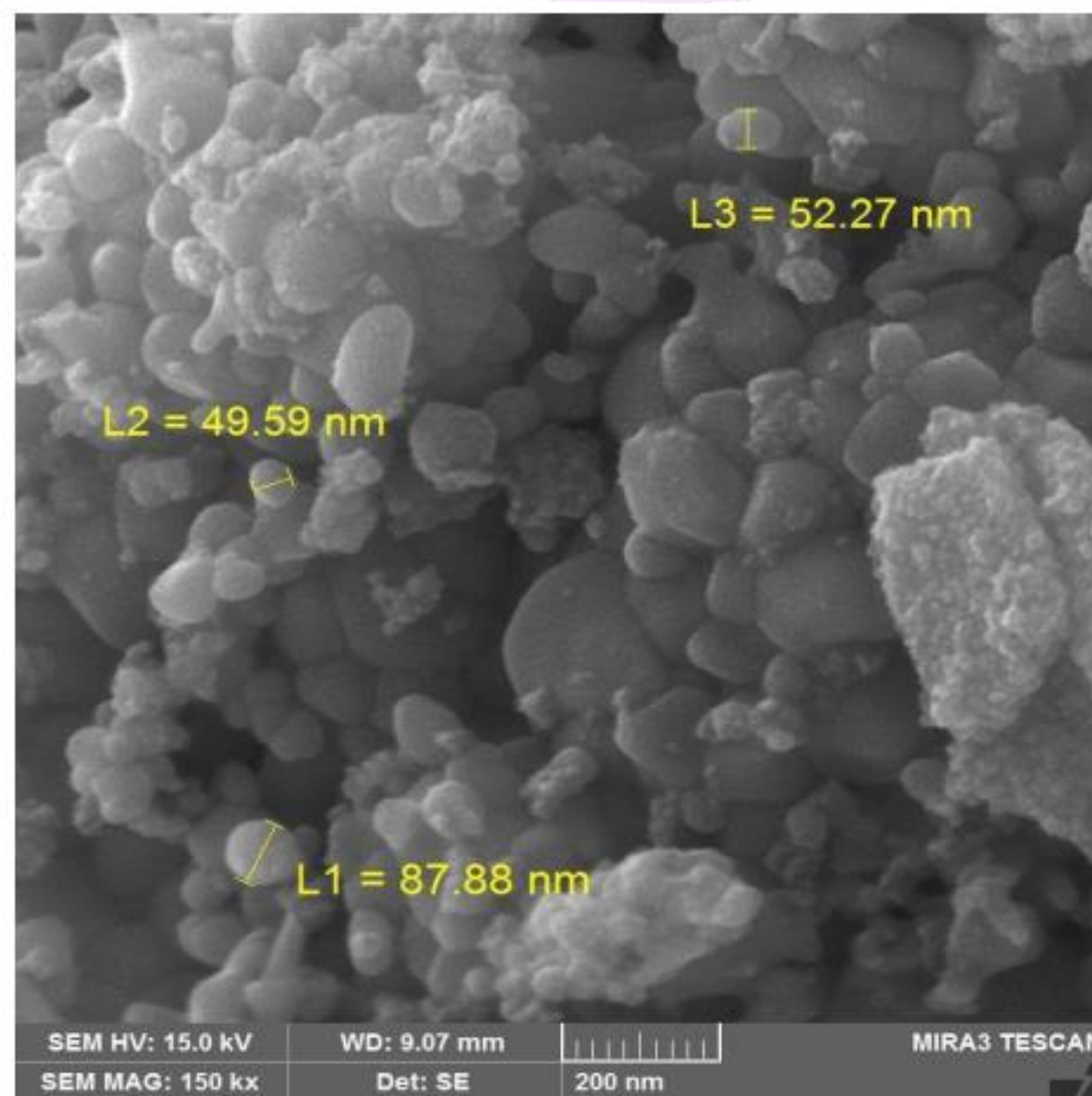
Solar cell , photocatalytic applications, anti static coatings, anti reflection coatings, humidity sensors, lithium ion batteries, thermocatalytic and semiconductor gas sensor, solar energy storage, manufacturing of gas sensors, preparation of electrocatalysts and photocatalysts.

### Safety:

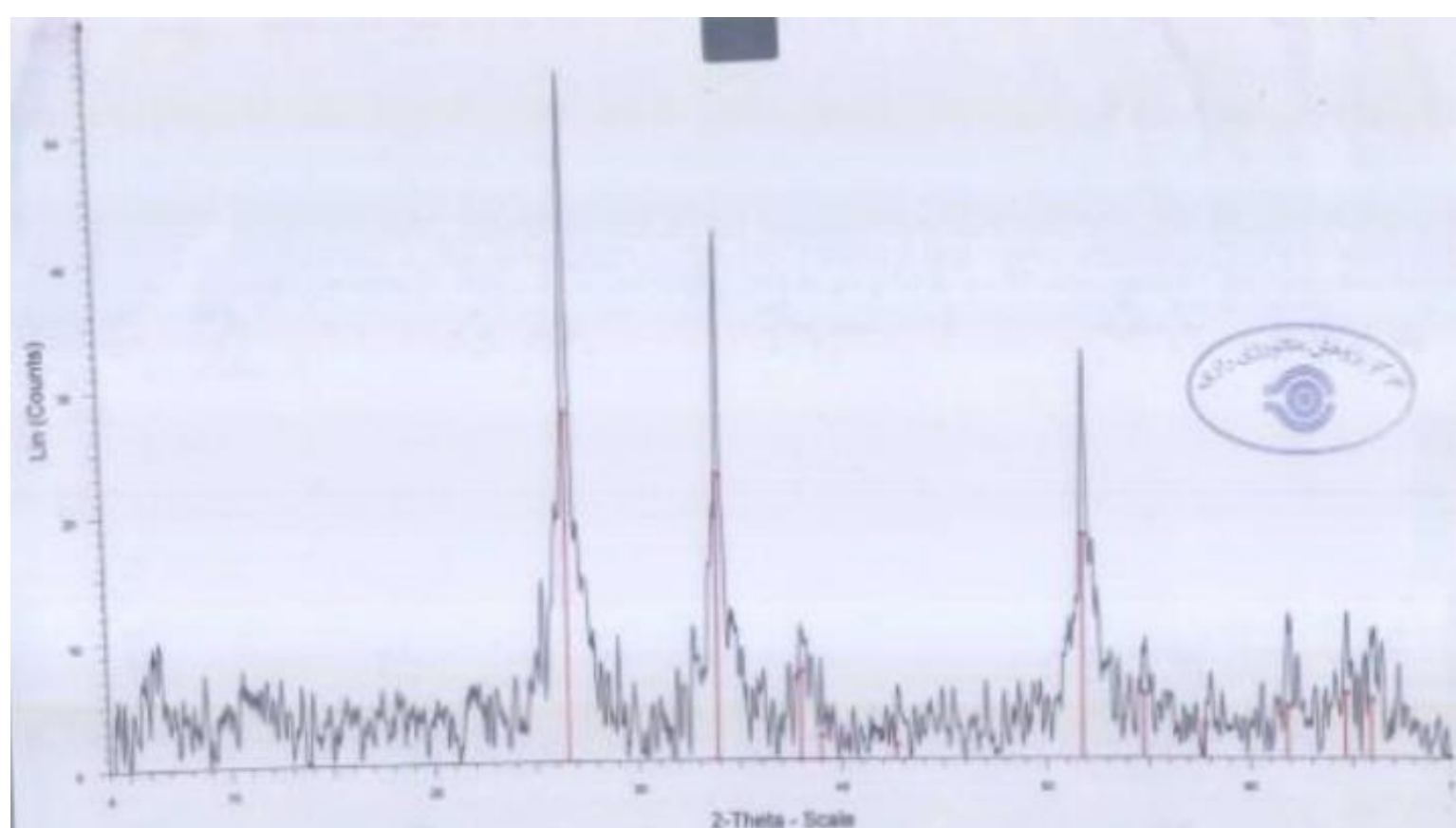
Avoid breathing dust.  
Always use protective gloves and safety glasses.  
Wash with soap and water after exposure.  
Refer to MSDS prior to handling this material.



## Tin Oxide Nanoparticles TOP1901



SEM image of TOP1901



XRD pattern of TOP1901

### Storage:

- Keep it in cool dry place.
- Avoid direct sunlight.
- Do not freeze.
- To disperse powder use sonication.

### Shelf life:

When stored as specified the product is stable for at least 12 months.