

# Product Data Sheet

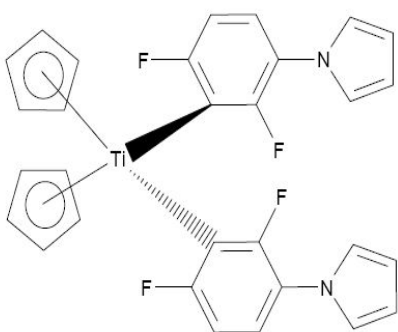
## Chemacure VIS-813

### General

Chemacure VIS-813 is an extremely reactive, orange colored solid photoinitiator for radical polymerisation of unsaturated resins upon exposure to visible light (daylight) or UV light. It is especially suited for the curing of photopolymers for imaging or information storage applications.

### Properties

#### Chemical Structure



Bis(eta-5-2,4-cyclopentadien-1-yl)-bis(2,6-difluoro-3-(1H-pyrrol-1-yl)-phenyl) titanium

Molecular weight	:	534.4
CAS No.	:	125051-32-3

### Physical properties

Appearance	:	yellow to orange powder
acetone	:	~ 30 *
hexanedioldiacrylate (HDDA)	:	10
Melting Point (°C)	:	160-170°C
methylethylketone	:	~ 30 *
toluene	:	10
trimethylolpropanetriacrylate (TMPTA)	:	5

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## *Chemacure VIS-813*

### Applications

Chemacure VIS-813 may be used, after adequate testing, for UV and/or visible light curable formulations based on chemically unsaturated systems - such as those based on a prepolymer - e.g. acrylates – in combination with mono- and multifunctional monomers as reactive thinners. Best curing performance of this product can only be achieved in the absence of oxygen. Its unique absorbance properties together with its outstanding reactivity make Chemacure VIS-813 especially suited for use in photopolymers, e.g. resists, printing plates and other information storage devices such as optical layers, holograms, laser direct imaging, stereolithography. Curing can be performed either using UV light, visible light (blue-green part of the spectrum) or even light from suitable laser devices, e.g. Ar- Laser (488nm) or FD-Nd/YAG-Laser (532nm). Best performance is obtained if oxygen is excluded from the resin system during curing. Applications in coatings, inks or adhesives may be of further interest. The amount of Chemacure VIS-813 required for optimum performance should be determined in trials covering a concentration range.

### Storage Conditions

Do not expose to direct sunlight. Store at room temperature between 5 ° C and 50 ° C. Avoid contact with alkaline additives and water. The product is stable for 2 years, in original, tightly closed containers and stored under the above mentioned conditions.

### Safety & Handling

Chemacure VIS-813 should be handled in accordance with good industrial practice. Detailed information is provided in the Safety Data Sheet. For more detailed information, especially with respect to recommended conditions during warehousing and transportation, please refer to the Safety Data Sheet of Chemacure VIS-813. Chemacure VIS-813 is sensitive to visible light and any exposure to sunlight should be avoided. Opened drums should be closed after use to