

**'DOCK/  
CHEMICALS**

SEMICONDUCTORS DECISION

TiCl<sub>4</sub>

Titanium precursor for CVD

'MO-CVD

BP: 136°C/276°F/1013 hPa

'TiCl<sub>4</sub> - TITANIUMTETRACHLORIDE

PRODUCT DATASHEET

# TiCl<sub>4</sub> - TITANIUMTETRACHLORIDE

## IDENTIFICATION

<b>CAS-No:</b>	7550-45-0
<b>EC-No:</b>	231-444-5
<b>EG-Index-No.:</b>	022-001-00-5
<b>Other name:</b>	-

MO-CVD

## PHYSICAL PROPERTIES

<b>Vapor pressure equat.:</b>	$\log_{10}(P_{\text{ Torr}}) = 6.79094 - (1348.56 / (T_{\text{ °C}} + 208.52))$
<b>Relative Density:</b>	1.73 g/cm <sup>3</sup>
<b>Molweight:</b>	189.68 g/mol
<b>Melting point:</b>	-25 °C / -13 °F
<b>Boiling point:</b>	136 °C / 276 °F / 1013 mbar

## CHEMICAL PROPERTIES

<b>Stability:</b>	Stable under inert gas
<b>State of matter:</b>	Liquid

## SAFETY & TRANSPORT

<b>Toxicity:</b>	Toxic by inhalation, Corrosive
<b>Explosion limit Vol%:</b>	n.a.
<b>Auto ignition temp. °C:</b>	n.a.
<b>ADR/RID</b>	
<b>ADR/RID-class:</b>	6.1 Sec-Risk. (8)
<b>UN-no:</b>	1838
<b>IMDG</b>	
<b>IMDG -class:</b>	6.1 Sec-Risk. (8)
<b>UN-no:</b>	1838
<b>ICAO/IATA</b>	
<b>ICAO/IATA-class:</b>	6.1 Sec-Risk. (8)
<b>UN-no:</b>	1838 – AIR FREIGHT FORBIDDEN

For further details please refer to Safety Data Sheet (SDS)

## PACKAGING & STANDARD FILLING VOLUMES

<b>TiCl<sub>4</sub>.100.DOCK/10.150</b>	100g / 150ccm cyl.
<b>TiCl<sub>4</sub>.230.DOCK/10.150</b>	230g / 150ccm cyl.
<b>TiCl<sub>4</sub>.600.DOCK/10.400</b>	600g / 400ccm cyl.
<b>TiCl<sub>4</sub>.900.DOCK/10.600</b>	900g / 600ccm cyl.
<b>TiCl<sub>4</sub>.1500.DOCK/10.1000</b>	1500g / 1000ccm cyl.
<b>TiCl<sub>4</sub>.4600.DOCK/10.3000</b>	4600g / 3000ccm cyl.

**DOCK/  
CHEMICALS**

SEMICONDUCTORS DECISION

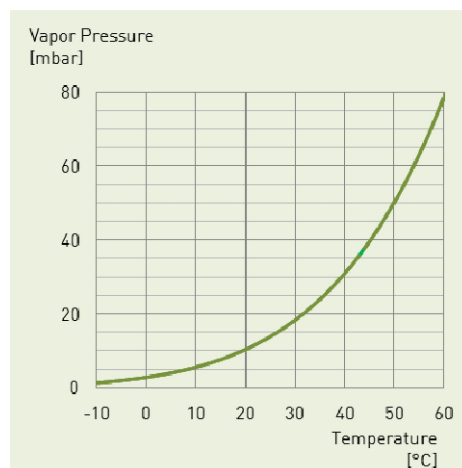
### Dockweiler Chemicals GmbH

Emil-von-Behring-Strasse 76 35041 Marburg Germany  
T +49 6421 396 -380 | F +49 6421 396 -381  
sales@dockchemicals.com

## QUALITY STANDARDS

<b>EG</b>	<b>Electronic Grade</b>
<b>3N</b>	<b>99.9% Purity</b>

## VAPOR PRESSURE CURVE



## APPLICATION

CVD and ALD precursor

**PRODUCT DATASHEET**

www.dockchemicals.com