

## 亲水性等级

Hydrophilic REOSIL

等级名 Grade	QS-09	QS-10 QS-10LS	QS-102	CP-102	QS-20 QS-20LS	QS-25	QS-30	QS-40
外观 Appearance	白色微细粉末 White powder							
BET 比表面积 (m <sup>2</sup> /g) BET surface area (m <sup>2</sup> /g)	90±20	140±20	200±20	200±20	220±20	260±30	300±30	380±30
平均一次粒子直径 (nm) Primary particle(nm)	22	15	12	12	12	10	7	7
堆积密度 (g/L) Bulk density (g/L)	50	50 40	50	100	50 40	50	50	50
水分(干燥减量法、%) <sup>1)</sup> Moisture content(Dry up,%) <sup>1)</sup>	<1.0	<1.5	<1.5	<1.5	<1.5	<2.0	<2.0	<2.0
pH(4% 悬浮液) pH(4% suspension)	4.2	4.2	4.2	4.2	4.2	4.2	4.2	4.2
SiO <sub>2</sub> (%)	>99.9	>99.9	>99.9	>99.9	>99.9	>99.9	>99.9	>99.9
Cl (ppm)	<50	<50	<50	<50	<50	<50	<50	<50
Fe (ppm)	<20	<20	<20	<20	<20	<20	<20	<20
Al (ppm)	<20	<20	<20	<20	<20	<20	<20	<20
44um筛残 (%) 44um residue (%)	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
纸袋包装重量 (kg) Packaging(kg)	10	10	10	15	10	10	10	10

## 疏水性等级

Hydrophobic REOSIL

(Import From Japan except PM-grades)

等级名 Grade	MT-10 MT-10C	DM-10 DM-10C	DM-30	DM-30S	KS-20SC	HM-20L	HM-30S	PM-20 PM-20L
外观 Appearance	白色微细粉末 White powder							
BET 比表面积 (m <sup>2</sup> /g) BET surface area (m <sup>2</sup> /g)	120±20	120±20	230±20	230±20	160±20	150±20	200±20	100±20
平均一次粒子直径 (nm) Primary particle(nm)	15	15	7	7	12	12	7	12
含炭量 (%) Carbon content (%)	0.9	0.9	1.7	2.2	2.0	2.5	3.5	5.5
堆积密度 (g/L) Bulk density(g/L)	50 100	50 100	50	50	100	40	50	50 40
水分(干燥减量法、%) Moisture content(Dry up,%)	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
pH(4% 悬浮液) <sup>3)</sup> pH(4% suspension) <sup>3)</sup>	4.8	4.8	4.5	4.5	5.1	6.0	6.6	5.2
Cl (ppm)	<100	<100	<100	<100	-	-	-	-
Fe (ppm)	<20	<20	<20	<20	<20	<20	<20	<20
Al (ppm)	<20	<20	<20	<20	<20	<20	<20	<20
纸袋包装重量 (kg) Packaging(kg)	MT-10:10 MT-10C:15	DM-10:10 DM-10C:15	10	10	15	10	10	10

1) 出货时

When leaving plant

2) 在水中滴入甲醇、二氧化硅完全湿润时的甲醇浓度。值越大，疏水性越好。

M value indicates the titrimetric amount of methanol when silica was completely dipped into methanolic aq.

3) 在水/甲醇的混合液中测定。

In a mixture of water and methanol



## 高性能消光粉

## High-performance matting agent

REOLOSIL FM 系列是由高纯四氯化硅在氢氧焰中水解制备的无定形超细二氧化硅粉末，其外观蓬松，可作为高性能消光粉用于多种油漆涂料体系。

REOLOSIL FM 系列产品的纯度高、粒径与聚集体结构可控。

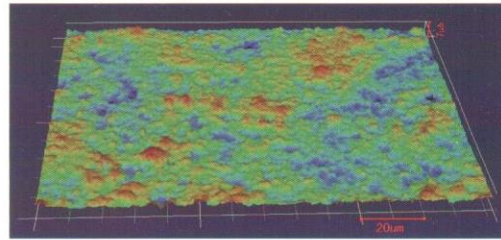
REOLOSIL FM 系列产品具有优异的消光效果、卓越的透明性以及易均与分散的特点。

赋予皮革涂料高黑度。

赋予涂料丝滑表面。

REOLOSIL FM 系列产品的建议用途：

皮革涂料，木器漆，水性漆，塑胶漆，UV涂料等。



含FM-14涂层的激光扫描显微镜照片  
Laser microscope image of coating surface filled with FM-14

REOLOSIL FM Series are fine amorphous silica powder developed as high performance matting agents for a variety of paint and coating applications.

REOLOSIL FM Series have highly controlled properties of purity, particle size, and aggregation structure.

REOLOSIL FM Series are characterized by its outstanding matting effect, high transparency, and excellent dispersion.

for Synthetic leather    Deep black appearance.

for Paints                    Smooth & silky surface.

REOLOSIL FM Series are useful in many kind of coating systems;

**Leather coatings, Wood paints, Water-borne paints, Plastic paints, UV paints etc.**



## 等 级

## Grades

等级名 Grade	FM-14	FM-22	FM-30	FM-14LV
外观 Appearance	白色微细粉末 White powder			
平均粒径 ( 库尔特颗粒计数器MS3,微米 ) Average particle size (Coulter Multisizer3,µm)	1.5-2.4	2.4-3.3	3.3-4.2	1.5-2.4
BET 比表面积 (m <sup>2</sup> /g) BET surface area (m <sup>2</sup> /g)	215-295	215-295	215-295	175-255
堆积密度 (g/L) Bulk density (g/L)	50	50	50	50
水分 (干燥减量法, %) <sup>1)</sup> Moisture content(Dry up, %) <sup>1)</sup>	<8.0	<8.0	<8.0	<8.0
吸油值 (ml/100g) Oil absorption volume (ml/100g)	340	340	340	310
pH (4% 悬浮液) pH (4% suspension)	6.0-9.5	6.0-9.5	6.0-9.5	6.0-9.5
SiO <sub>2</sub> (%) <sup>2)</sup>	>99.8	>99.8	>99.8	>99.8
Al (%)	<0.1	<0.1	<0.1	<0.1
Fe (%)	<0.01	<0.01	<0.01	<0.01
纸袋包装质量(kg) Packaging (kg)	10	10	10	10

1) 出货时

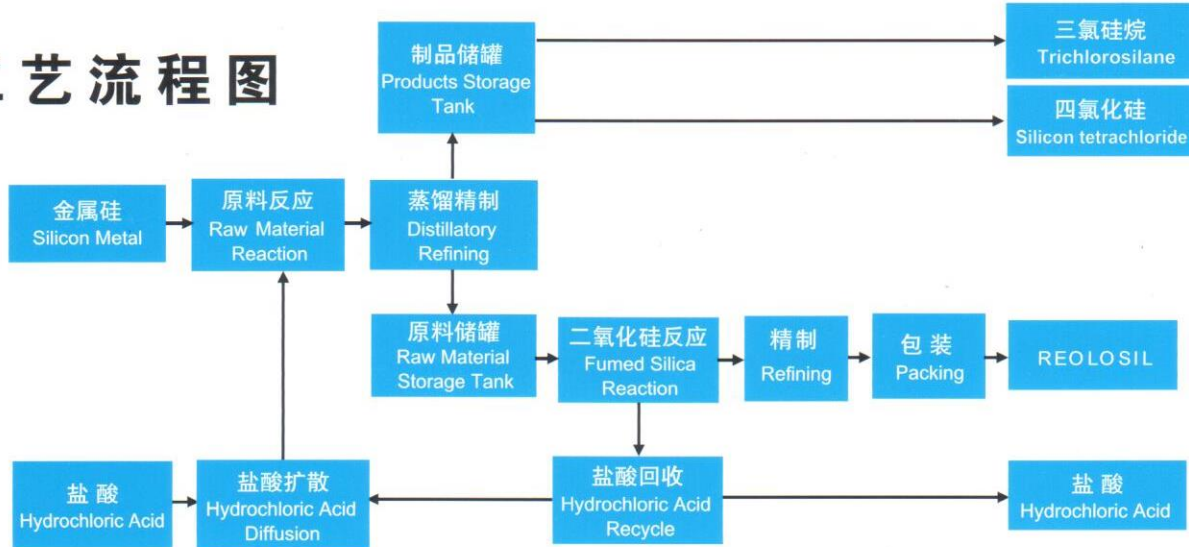
1) When leaving plant

2) 干燥后

2) After dry up



# 工艺流程图



# REOSIL 的用途





## 高纯度四氯化硅(SiCl<sub>4</sub>)

## High purity SiCl<sub>4</sub>

独有技术精制的高纯度四氯化硅，可满足各种不同客户的要求，应用于光纤、多晶硅、高纯石英等。

**SiCl<sub>4</sub>产品特性**  
Typical properties

SiCl <sub>4</sub> 纯度 SiCl <sub>4</sub> Purity	氢化不纯物 Hydride Impurity	金属不纯物 Metal Impurity			ppbwt ppbwt	
		Fe	Ni	Cr	Cu	Al
≥99.99%	<0.01%	≦10	≦10	≦10	≦10	≦10



## 高纯度三氯氢硅(SiHCl<sub>3</sub>)

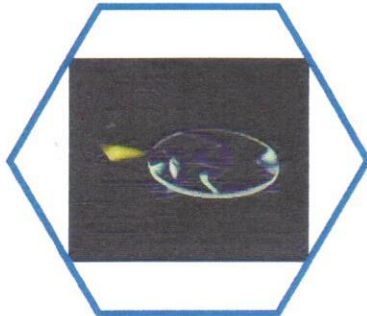
## High purity SiHCl<sub>3</sub>

高纯度三氯氢硅，杂质含量少，品质稳定，应用于高品质多晶硅。

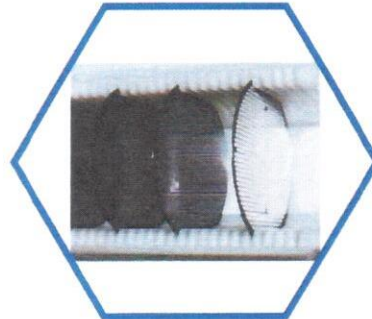
High purity SiHCl<sub>3</sub> has outstanding characteristics of very few impurities and stable qualities. It is used for the high grade polycrystalline silicon.

**SiHCl<sub>3</sub>产品特性**  
Typical properties

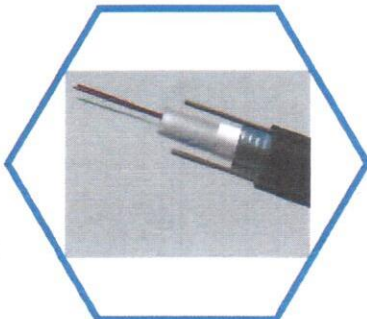
SiHCl <sub>3</sub> 纯度 SiHCl <sub>3</sub> Purity	氢化不纯物 Hydride Impurity	金属不纯物 Metal Impurity			ppbwt ppbwt		
		B	Fe	Ni	Cr	Cu	Al
≥99.99%	<0.01%	≦50	≦10	≦10	≦10	≦10	≦10



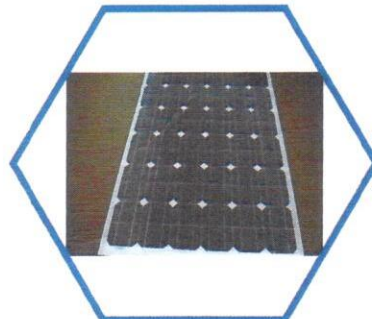
石英玻璃



半导体晶片



光纤预制棒



太阳能电池