



青岛巨富玻璃有限公司

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HEXAD

Hexad Group Co.,Ltd.
Qingdao Hexad Glass Co.,Ltd.

Color The World & Inspire The Future

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HEXAD GLASS

Float Glass



浮法玻璃



Float glass is produced with silica sand, soda ash, dolomite and other raw materials according to a certain proportion. After being melted at high temperature in a melting furnace, the glass liquid flows continuously from the kiln, floats on the tin bath and spreads into uniform thickness. Then glass ribbon is cooled, hardened and separated from the tin bath, and annealed and cut into transparent flat glass.

浮法玻璃是用硅砂、纯碱的云石等原料，按一定比例配制，经熔窑高温熔融，玻璃液从池窑连续流至并浮在锡槽金属液上，摊成厚度均匀平整、经火抛光的玻璃带，冷却硬化后脱离金属液，再经退火切割而成的透明平板玻璃。

HEXAD GLASS

CLEAR FLOAT GLASS 透明浮法玻璃

Clear float glass is made by advanced float glass production technique. It is colorless and transparent in appearances. It is a kind of high-quality glass products with excellent physical, mechanical and optical properties. These features make it seen in a broad range of applications with good market prospects.

Product Characteristics:

- 1. High Light Transmittance;
- 2. High Chemical Stability;
- 3. Good Mechanical Properties;
- 4. Flat Surface and Uniform Thickness;
- 5. Stable Quality;
- 6. Large and Extra-Thick Sheets Available.

Applications:

Clear float glass can be applied in coating, tempering, insulating, decorative or other deep processing. The deeply processed products can be used in building, furniture, decorative, car, mirror and optical instruments, etc.

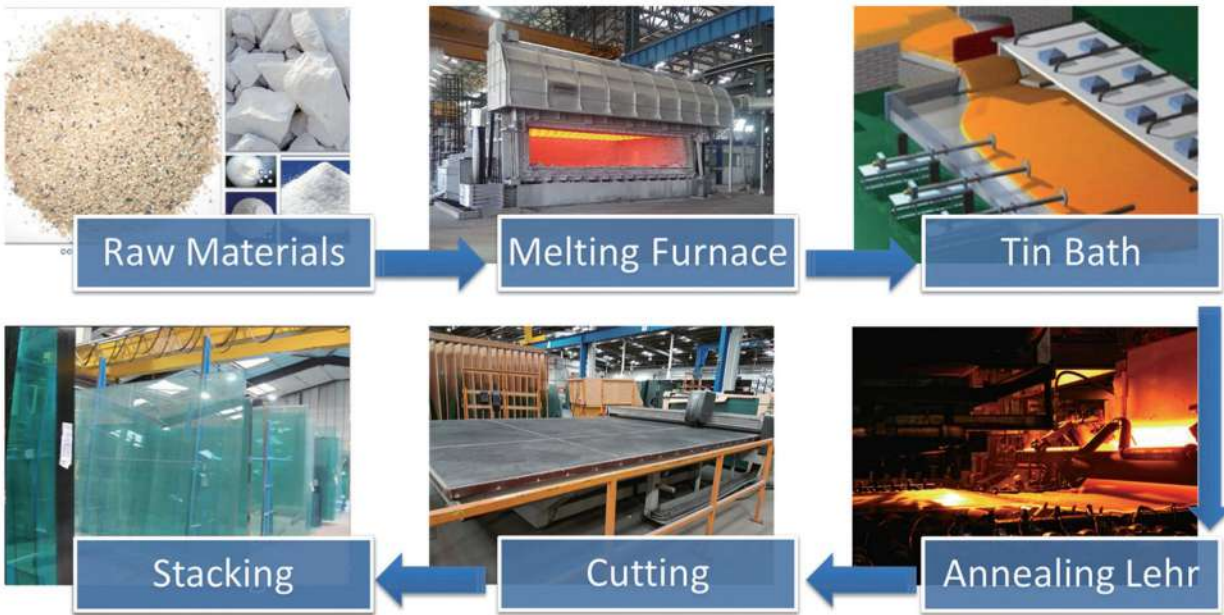
无色透明玻璃，精选优质原料并严格控制，采用先进的浮法生产工艺制成。它具有无色、透明的外观特征，是一种高品质的玻璃产品，具有优越的物理、机械及光学性能。其通透无色的外观特性和优异品质使它拥有广阔的应用空间和市场前景。

产品特点:

- 1. 具有透光率高，具有良好的采光效果；
- 2. 化学稳定性高，能长期存放；
- 3. 机械性能良好，易切裁等特性；
- 4. 表面平整、厚度均匀，再加工后反射影响失真小；
- 5. 质量稳定，应力均匀消除，钢化自爆率低；
- 6. 可提供大版面超厚玻璃，具有强度高、抗风压强、视野开阔的特点。

适用范围:

无色透明玻璃基片适用于镀膜、钢化、中空、装饰等平板玻璃深加工领域；深加工产品广泛用于建筑、汽车、家具、装饰用、镜板、光伏、文旅、光学仪器、电子等。



Product specification

Minimum Size:1220x914mm
Maximum Size: 4880x3660mm
Other customized size are available
Thickness Range:1.6-19mm

产品规格

最小尺寸：1220x914mm
最大尺寸：4880x3660mm
还提供其他定制尺寸
厚度范围：1.6-19mm

Clear Float Glass Performance Data							
厚度 Thickness	可见光Visible light		太阳光Solar energy (300nm-2500nm)		遮蔽系数 Shading Coefficient	太阳光近红外直接透射比 TIR% solar infrared direct transmittance	紫外透射比 TUv% UV transmitta nce
	透射比 Transmittance Te%	玻面反射比 Spherical reflectance Re%	直接透射比 Direct transmittance Te%	玻璃面直接反射比 Surface direct reflectance Re%			
1.8mm	90.9	8.3	88.6	8.9	1	6.0	27
3mm	90.3	8.3	86.2	8.3	1	5.9	28
4mm	90	8	85	8	1	5.8	29
5mm	90	8	83	8	0.99	5.7	30
6mm	89	8	80	7	0.97	5.7	31
8mm	88	8	77	7	0.94	5.7	33
10mm	87	8	74	7	0.92	5.6	34
12mm	86	8	72	7	0.9	5.5	36
15mm	85	8	69	7	0.88	5.4	38
19mm	83	8	62	6	0.82	5.3	40

HEXAD GLASS

Tinted Float Glass 本体着色浮法玻璃

Tinted float glass is a heat-absorbing tinted glass . Its good heat-absorbing reduces the solar direct transmittance, makes good effects of energy saving. Providing modern architecture with a pleasant decoration performance. This product serves as an excellent substrate for coated glass.

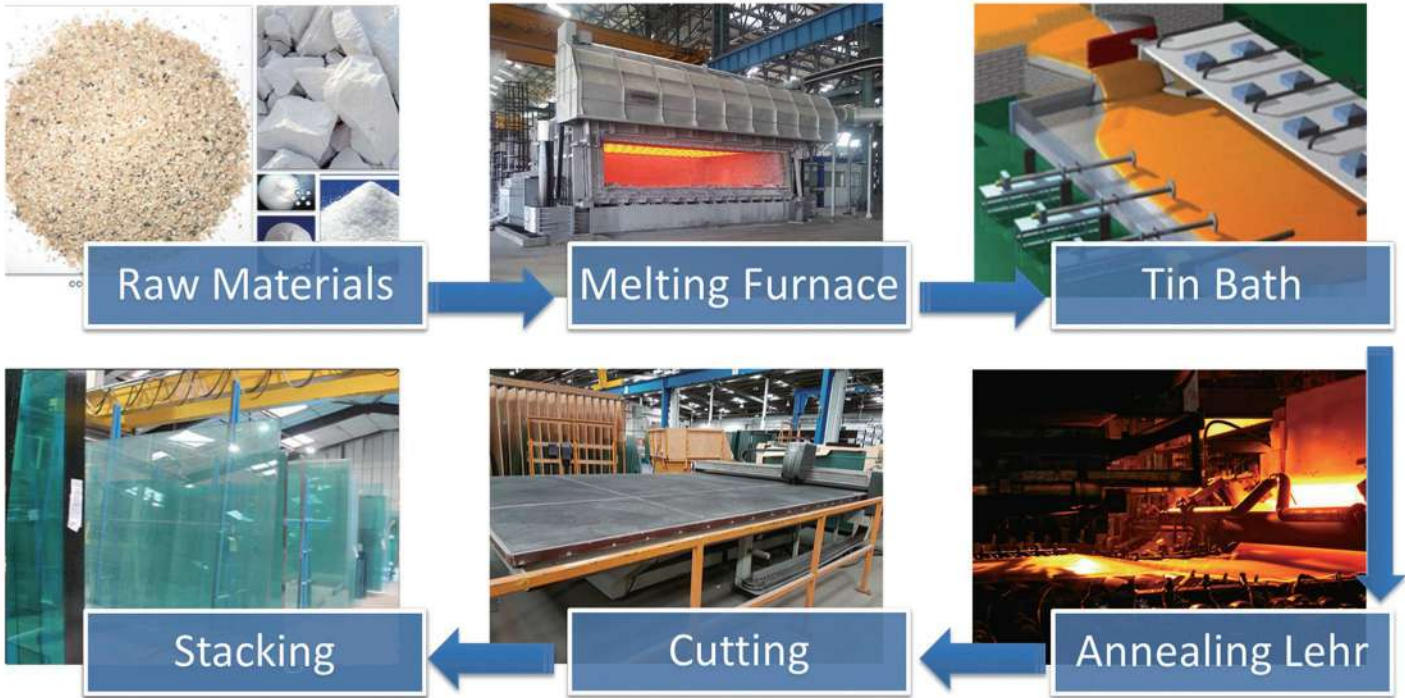
浮法彩色玻璃是采用本体着色工艺制得的吸热玻璃产品。该产品良好的吸热功能，可降低太阳光的直接透射比，收到一定的节能效果；颜色的多彩性，赋予现代建筑愉悦的装饰功能。该产品又可作为镀膜玻璃的优良基板。

Product specification

Minimum Size: 2100x1500mm
Maximum Size: 3660x2740mm
Other customizad sizas are available
Thickness Range:1.6-12mm

产品规格

最小尺寸：2100x1500mm
最大尺寸：3660x2740mm
还提供其他定制尺寸
厚度范围：1.6-12mm



Technical parameters of Colored float glass										
产品名称 Product name	紫外线透射比(%) Ultraviolet Transmittance	可见光透射比(%) Visible Light Transmittance	可见光反射比(%) Visible Light Reflectivity	太阳光直接透射比(%) Solar Transmittance	太阳光直接反射比(%) Solar Reflectivity	遮光系数 Sc	辐射率 Emissivity	太阳热获得系数 SHGC	K值 (Kcal/m ² ·h·°C) 夏季白天 Summer	K值 (Kcal/m ² ·h·°C) 冬季夜晚 Winter
5mm金茶原片 Golden Bronze	13.17	46	5	47	5	0.66	0.84	0.63	5.272	5.843
5mm欧洲灰 Euro Grey	32.85	51	5	53	6	0.68	0.84	0.592	5.243	5.808
5mm水晶灰 Crystal Grey	34.06	68	6	60	6	0.64	0.84	0.623	5.272	5.843
5mm福特蓝原片 Ford Blue	27.06	60.68	6.9	50.35	6.6	0.69	0.84	0.582	5.243	5.808
6mm福特蓝原片 Ford Blue	24.15	55.5	6.79	44.68	6.52	0.64	0.84	0.592	5.243	5.808
5mm现代灰原片 Modern gray	20.29	51.66	6.63	49.19	6.48	0.68	0.84	0.623	5.272	5.843
6mm现代灰原片 Modern gray	16.47	45.24	6.06	42.98	6.15	0.63	0.84	0.582	5.243	5.808
5mm世纪灰原片	34.9	64.79	7.17	60.58	6.86	0.76	0.836	0.7	5.241	5.814
6mm世纪灰原片	31.08	60.64	6.87	55.98	6.55	0.74	0.836	0.669	5.211	5.779
5mmF绿原片 F Green	24.54	74.86	8.03	48.75	6.07	0.68	0.84	0.619	5.272	5.843
6mmF绿原片 F Green	20.22	71.36	7.66	43.72	6.35	0.64	0.84	0.586	5.243	5.808
5mm欧洲茶原片 Euro Bronze	14.52	51.94	6.44	51.78	6.69	0.7	0.84	0.64	5.272	5.843
6mm欧洲茶原片 Euro Bronze	11.83	47.15	6.73	46.87	6.76	0.66	0.83	0.606	5.243	5.808

HEXAD GLASS

On-line Solar Control Reflective Glass 本体着色镀膜玻璃

On-line solar control reflective glass is produced by the chemical vapor deposition (CVD) coating technique, which introduces silicon coating materials in gaseous form onto the glass surface at high temperature to form a silicon film. This product has good sunlight control and sunshade effect, can be applied in a variety of curtain walls, doors and windows, etc.

Product Characteristics:

- 1. Excellent light and thermal properties;
- 2. Excellent chemical stability;
- 3. Excellent abrasion resistance;
- 4. Uniform color, soft color, elegant;
- 5. Since the film is forming under high temperature chemically, it has several hot working performance, such as easy for tempering, heat bending, etc.

There are more than a dozen products in color series, such as blue green, gray, bronze, silver etc. Users can choose glass of different colors and performances according to the requirements of regional environmental characteristics.

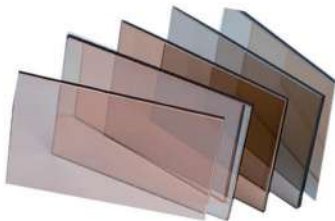
在线阳光控制镀膜玻璃是采用化学汽相沉积（CVD）镀膜工艺，将硅系镀膜原料以气体的形态引入高温玻璃的表面进行热解而形成一层硅质膜。该产品对于太阳光具有良好控制作用和优良的遮阳功能，其高温成膜工艺赋予该产品稳定的物化性能，可广泛应用于各类建筑幕墙、门窗等。

产品特点：

- 1. 优良的光、热学性能；
- 2. 优良的化学稳定性；
- 3. 极强的耐磨性；
- 4. 颜色均匀、色泽柔和、典雅；
- 5. 高温化学成膜，轻松的钢化、热弯等热加工性能。

产品色系有蓝、绿、灰、茶、银白等十几个产品，用户可依据地区环境特点的要求，选用不同色彩及性能的玻璃。

Product specification
Minimum Size:2100x1500mm
Maximum Size: 3660x2740mm
Other customizad sizas are available
Thickness Range:3-12mm



产品规格
最小尺寸：2100x1500mm
最大尺寸：3660x2740mm
还提供其他定制尺寸
厚度范围：3-12mm



在线阳光控制镀膜玻璃技术参数一 On-line sunlight control coating glass technical parameters (一)								
产品名称 Product name	K值 (Kcal/m ² ·h·°C)	遮阳系数 Sc	太阳能总透射比 SHGC	太阳红外热辐射透射比 grr	可见光透射比% Visible Light Transmittance	可见光反射比(前) % Visible Light Reflectivity	太阳能总透射比 Solar Transmittance	紫外光透射比 Ultraviolet Transmittance
5mm福特蓝膜 Ford Blue	5.51	0.53	0.46	0.52	25	21	0.3	0.06
6mm福特蓝膜 Ford Blue	5.49	0.48	0.42	0.47	21	21	0.24	0.04
5mm自然绿膜 Dark Green	5.39	0.46	0.4	0.4	28	24	0.23	0.06
6mm欧洲茶膜 Euro Bronze	5.51	0.59	0.52	0.59	32	21	0.39	0.07
6mm欧洲茶膜 Euro Bronze	5.49	0.56	0.49	0.57	24	14	0.33	0.04
5mmF绿膜 F Green	5.39	0.53	0.46	0.5	34	28	0.31	0.06
5mm现代灰膜 Modern gray	5.51	0.57	0.5	0.56	27	13	0.34	0.07
6mm现代灰膜 Modern gray	5.48	0.51	0.45	0.51	19	13	0.27	0.04
5mm银白膜 Silvery white	5.39	0.74	0.65	0.77	50	28	0.59	0.14
6mm银白膜 Silvery white	5.36	0.67	0.58	0.71	42	33	0.51	0.12
5mm宝石蓝膜 Dark blue	5.39	0.61	0.53	0.66	21	11	0.4	0.1
6mm宝石蓝膜 Dark blue	5.36	0.5	0.43	0.49	20	10	0.27	0.04
5mm深灰膜 Dark grey	5.39	0.46	0.4	0.4	28	24	0.23	0.06
5mm粉红膜 Pink	5.51	0.59	0.52	0.59	32	21	0.39	0.07

在线阳光控制镀膜玻璃技术参数二 On-line sunlight control coating glass technical parameters (二)								
产品名称 Product name	K值 (Kcal/m ² ·h·°C)	遮阳系数 Sc	太阳能总透射比 SHGC	太阳红外热辐射透射比 grr	可见光透射比% Visible Light Transmittance	可见光反射比(前) % Visible Light Reflectivity	太阳能总透射比 Solar Transmittance	紫外光透射比 Ultraviolet Transmittance
5mm福特蓝膜+12A+5mm白玻(Air)	2.7	0.41	0.36	0.41	23	22	0.26	0.05
5mm福特蓝膜+12A+6mm白玻(Air)	2.69	0.36	0.31	0.35	19	21	0.2	0.04
6mm福特蓝膜+12A+5mm白玻(Air)	2.66	0.35	0.31	0.29	26	25	0.2	0.05
5mm自然绿膜+12A+5mm白玻(Air)	2.7	0.49	0.42	0.49	30	21	0.33	0.06
5mm欧洲茶膜+12A+5mm白玻(Air)	2.69	0.44	0.38	0.45	23	15	0.27	0.03
6mm欧洲茶膜+12A+6mm白玻(Air)	2.66	0.42	0.37	0.39	32	29	0.27	0.05
5mmF绿膜+12A+5mm白玻(Air)	2.7	0.45	0.39	0.44	25	14	0.28	0.06
6mm现代灰膜+12A+5mm白玻(Air)	2.69	0.39	0.34	0.39	18	13	0.22	0.04
5mm银白膜+12A+5mm白玻(Air)	2.7	0.6	0.53	0.64	42	40	0.46	0.12
6mm银白膜+12A+6mm白玻(Air)	2.65	0.58	0.5	0.6	39	34	0.43	0.1
5mm宝石蓝膜+12A+5mm白玻(Air)	2.66	0.49	0.43	0.55	20	12	0.33	0.08
6mm宝石蓝膜+12A+6mm白玻(Air)	2.65	0.38	0.33	0.38	19	10	0.22	0.04

HEXAD GLASS

ULTRA CLEAR FLOAT GLASS 超白玻璃

Ultra clear glass is a kind of low iron and ultra transparent glass with light transmittance more than 91%, It has the characteristics of low spontaneous breakages, high purity, noble elegance and crowned as 'crystal prince' of the glass family.Hexad ultra-clear float glass presents a higher visible light transmittance of 0.4 percentage more than GB standard and better looking through property. The iron content is as low as under 130ppm.The provided thickness of glass runs from 1.3mm to 19mm, and the length of glass could go 18m long

Product Characteristics:

- 1. High safety □
Multiple measures to purify impurities,low self-detonation rate, security application guarantee.
- 2. High aesthetics □
More beautiful than clear float glass, with a jewel-like blue edge.
- 3.High transmittance □
visible light transmittance more than 91%.6% higher than clear float glass.
- 4.Friendly environment □
Has obtained certificates of CE,SGS, REACH.

超白玻璃是一种透光率大于 91% 的低铁超白玻璃，具有低自发破损、高纯度、高贵典雅、被誉为玻璃家族的“水晶王子”等特点。Hexad 超白浮法玻璃具有比 GB 标准高 0.4 个百分点的可见光透过率和更好的外观性能。铁含量低至 130 ppm 以下。所提供的玻璃厚度从 1.3 毫米到 19 毫米，玻璃长度可达 18 米长。

产品特点:

- 1. 高安全性：多重措施提纯杂质，自爆率极低，安全应用保障。
- 2. 高美观性：比普通玻璃更美观，具有宝石般的蓝边。□
- 3. 高透过率：可见光透过率 91% 以上，比普通玻璃高 6%。
- 4. 高环保性：已通过国际权威的 CE、SGS、REACH 认证。



Ultra Clear Float Glass optical technical parameters

厚度 Thickness	可见光透射率Visible Light Transmittance	可见光反射率 Visible Light Reflectivity	太阳辐射热 Solar Radiant Coefficient				遮阳系数 Shading Coefficient			U 值 U Value (W/m²K)	隔音 Sound Insulation		紫外光透射率 UV penet Ration
			直接透过 Direct Penetration	反射 Reflecti vity	吸收 Absorb	总透过 Total Penetration	短波 Short Wave	长波 Long Wave	总体 Total		Rm (dB)	Rv (dB)	
3mm	0.916	0.08	0.9	0.08	0.01	0.91	1.05	0.01	1.05	5.8	26	30	0.76
3.2mm	0.915	0.08	0.9	0.08	0.02	0.91	1.03	0.01	1.05	5.8	26	30	0.75
4mm	0.914	0.08	0.9	0.08	0.02	0.91	1.03	0.01	1.05	5.8	27	30	0.73
5mm	0.913	0.08	0.9	0.08	0.02	0.9	1.03	0.01	1.03	5.8	29	32	0.71
6mm	0.911	0.08	0.89	0.08	0.03	0.9	1.02	0.01	1.03	5.7	29	32	0.7
8mm	0.91	0.08	0.88	0.08	0.04	0.89	1.01	0.01	1.02	5.7	31	34	0.68
40mm	0.906	0.08	0.88	0.08	0.04	0.89	1.01	0.02	1.02	5.6	33	36	0.66
12mm	0.904	0.08	0.87	0.08	0.05	0.88	1	0.02	1.01	5.5	34	37	0.64
15mm	0.901	0.08	0.86	0.08	0.06	0.87	0.99	0.02	1	5.5	35	38	0.61
19mm	0.897	0.08	0.84	0.08	0.07	0.86	0.97	0.02	0.99	5.5	37	40	0.59
22mm	0.896	0.08	0.82	0.08	0.09	0.85	0.95	0.02	0.97	5.5	38	43	0.58
25mm	0.89	0.08	0.81	0.08	0.09	0.84	0.93	0.02	0.95	5.5	39	45	0.56

Ultra Clear Float Glass Physical Parameters

Product specifications

minimum size:2100*1500mm
Maximum size:3660*2740mm
Provide customized sizes
Thickness interval:3-12mm



产品规格

最小尺寸：2100x1500mm
最大尺寸：3660x2740mm
还提供其他定制尺寸
厚度范围：3-19mm

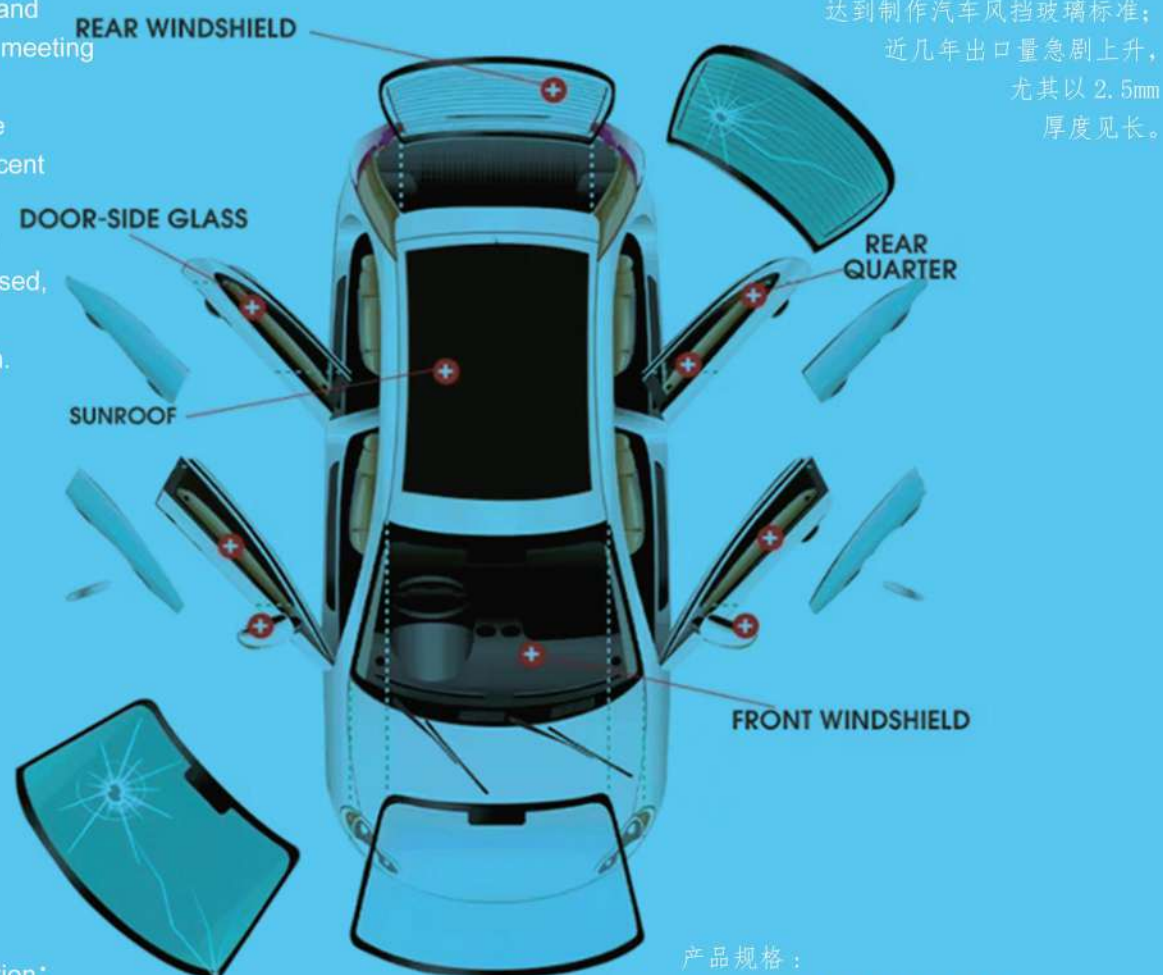
弹性模数 Elasticity Modulus	73.1Gpa
折断模数(最终抗张强度) Rupture Modulus(Tensile Strength-ultimate)	41.4 Mpa
努氏硬度 Knoop Hardness	456kgf/mm²
密度 Density	2.5076 g/cm²
线性膨胀系数 20-300℃ Linear Coefficient of Expansion 20-300 °C	9.28x10- /°C
线性膨胀系数 20-450℃ Linear Coefficient of Expansion 20-450°C	9.75x10-9/°C
转化温度 Transformation Temperature	556°C
软化温度或屈服点 Intenerate Temperature or Yield Point	606°C
软化点 Softening Point	710°C
退火点 Annealing Point	547°C
应力点 Strain Point	513°C
高温粘度 log2 High Temperature Viscosity log2	1392°C
高温粘度 log3 High Temperature Viscosity log3	1152°C
高温粘度log4 High Temperature Viscosity log4	996°C
液相温度 Liquid Phase Temperature	1008°C

HEXAD GLASS



Automobile Glass 汽车玻璃

Selected high-quality raw materials and made using advanced float production technology, it has a colorless and transparent appearance, making it a high-quality glass product with superior physical, mechanical, and optical properties; Its transparent and colorless appearance characteristics and excellent quality make it have broad application space and market prospects, meeting the standards for making automotive windshields; In recent years, the export volume has sharply increased, especially with a thickness of 2.5mm.



Product Specification:
Other customized sizes are available
Thickness Range: 1.6mm, 1.8mm, 2mm, 2.1mm, 2.3mm, 2.5mm, 3mm, 3.2mm, 3.5mm, 4mm

精选优质的原材料，采用先进的浮法生产工艺制成，它具有无色、透明的外观特征，是一种高品质的玻璃产品，具有优越的物理、机械及光学性能；其通透无色的外观特性和优异品质使它拥有广阔的应用空间和市场前景，达到制作汽车风挡玻璃标准；近几年出口量急剧上升，尤其以 2.5mm 厚度见长。

产品规格：
可根据客户要求提供定制尺寸
厚度范围：1.6 mm, 1.8 mm, 2 mm, 2.1 mm, 2.3 mm, 2.5 mm, 3 mm, 3.2 mm, 3.5 mm, 4 mm

HIGH PERFORMANCE ELECTRONIC GLASS 高性能电子玻璃

High performance electronic glass has the advantages of high hardness, ultra-flexibility and glass thickness ranging from 0.2 ~ 4.0 mm, mainly applied to the protective cover for Windows and touch, namely mobile phones, laptops, smart watches, vehicle-mounted central control, education and medical treatment, protective patches, digital accessories and other fields.

Product Characteristics:

1. Transmittance: >92%.
2. Scratch Resistance Performance: Pencil Hardness >9H, Vickers Hardness >700N/mm².
3. Chemical Strength Performance: initial CS >950MPa, DOL >45μm
4. Mechanical Strength: Ball drop >1J (1.1mm), 4PB >600MPa (1.1mm)

高性能电子玻璃，其优点是硬度高，超柔韧性能，玻璃厚度从 0.2~4.0mm，主要应用于视窗及触控用保护盖板，即手机、笔电、智能手表、车载中控、教育医疗、保护贴片、数码配件等多个领域。

产品特点：

1. 可见光透过率：>92%
2. 抗划伤性能：涂层硬度 >9H，
维氏硬度 >700N/mm²
3. 化学强化性能：初始 CS 值高达 950MPa，
DOL 可大于 45 μm
4. 机械强度：落球强度大于 1 焦耳，
4 点弯曲强度高于 600MPa (1.1mm 厚度)

Applications:

It is mainly applied to the protective cover for Windows and touch, namely mobile phones, laptops, smart watches, vehicle-mounted central control, education and medical treatment, protective patches, digital accessories and other fields

适用范围：

主要应用于视窗及触控用保护盖板，即手机、笔电、智能手表、车载中控、教育医疗、保护贴片、数码配件等多个领域。

Low-emissivity Coated Glass

低辐射镀膜玻璃



Low-emissivity coated glass,also known as Low-E glass, is former by coating one or more layers of metal or compound films with low-emissivity functions on the surface of the glass, so that the emissivity E the glass is reduced from 0.84 to below 0.15. The surface has a very high far infrared reflectivity, so as to achieve the purpose of heat preservation compared with ordinary glass and traditional architectural coated glass it has better thermal insulation effect and good visual effect.

低辐射镀膜玻璃又叫 Low-E 玻璃，是在玻璃表面镀制层或多层具有低辐射功能的金属或化合物的薄膜，玻璃的辐射率E由 0.84 降低到 0.15 以下形成的，使玻璃表面具有极高的远红外线反射率，从而达到隔热保温的目的。与普通玻璃及传统的建筑用镀膜玻璃相比，具有更优异的隔热效果和良好的视觉效果。

Color

Blue, grey, crystal grey, blue grey, green, light green, yellow, etc.

颜色

蓝色、灰色、水晶灰、蓝灰、绿色、浅绿、黄色等。

Product Features

High visible light transmittance, natural lighting, clear appearance;

Good thermal insulation performance, can effectively reduce indoor heat loss and create a warm and comfortable indoor environment;

Lower heat transfer coefficient, effectively reducing heating costs in winter;

Low sunshade coefficient, low direct transmittance of solar infrared heat, good heat insulation in summer;

Can not be used singly, and can only be used for synthetic insulating glass.

产品特性

- 较高的可见光透过率，自然采光，外观清澈；
- 表面辐射率E值越低，吸收外来能量的能力小，从而再辐射出的热能少，良好的保温性能，有效降低室内热量散失营造温暖舒适的室内环境；
- 较低的遮阳系数和较低的传热系数，有效降低冬季采暖费用；
- Low-E 玻璃的遮阳系数Sc调整范围大，根据需要控制太阳能的透过量，以适应不同地区的需要，对进入室内的太阳直接辐射能有有效的控制；
- 通过降低玻璃的U值，限制远红外热辐射透过玻璃从而达到降低对流导热能透过玻璃的目的；
- 不可单片使用，只能合成中空玻璃使用。

Product Specification

Minimum Size: 300x300mm

Maximum Size:6000x3300mm

Other different sizes are available according to customer demands.

Thickness Range

2-12mm

规格范围

最小尺寸:300x300mm

最大尺寸: 6000x3300mm

客户也可定制其他尺寸

厚度范围

2-12mm

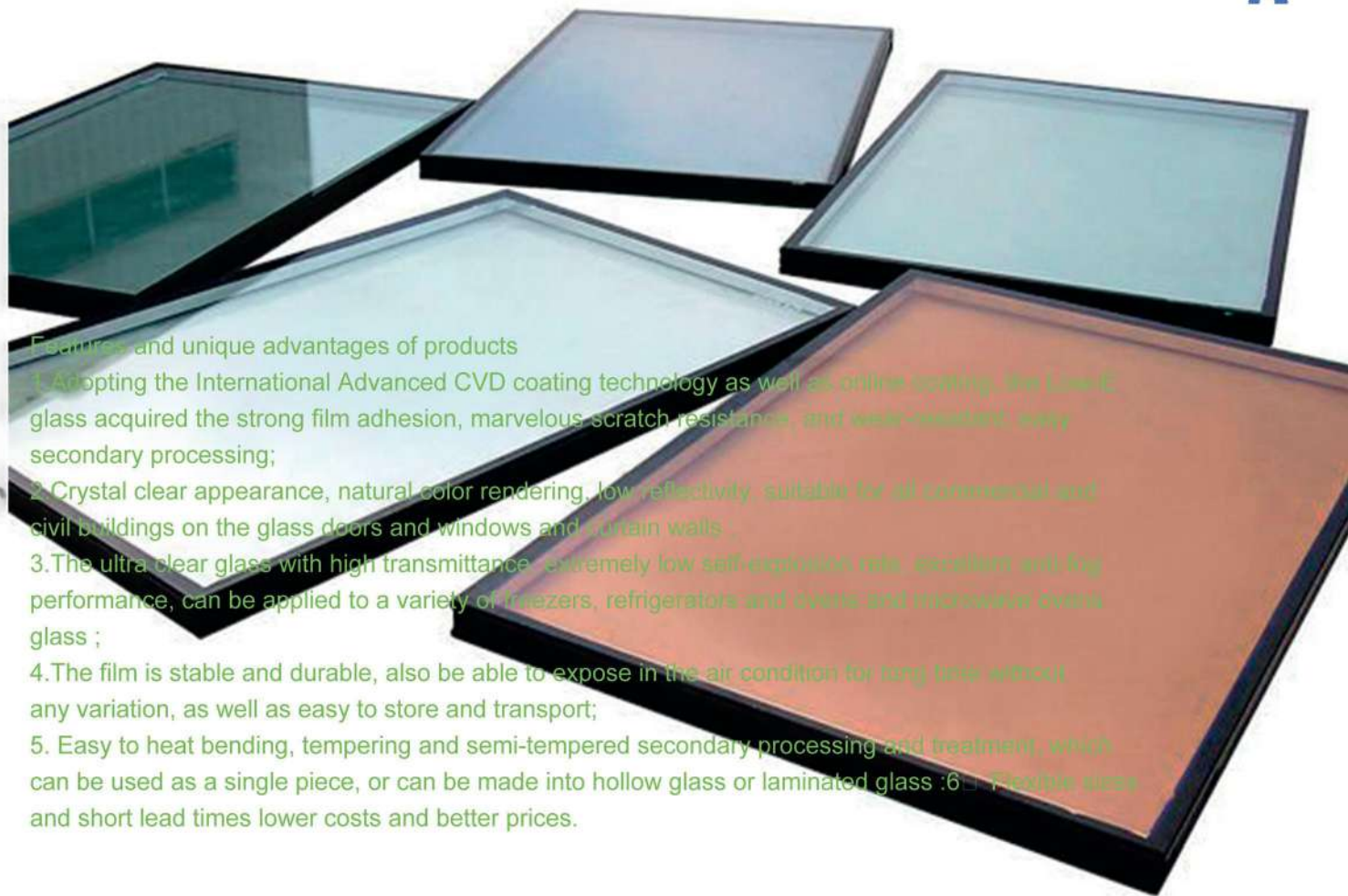
HEXAD GLASS

On-line Low-E Glass 在线 Low-E 玻璃

Hexad on-line Low-E glass is manufactured based on the advanced online coating technology. Function material are prepared by adopting high-temperature chemical vapor deposition (CVD) technology in the tin bath of the float line, and then carrying out annealing and cooling process to obtain a high-integrated single unit, then form coating film, which acquired excellent chemical and mechanical stability, and simultaneously achieving a perfect balance of transmittance, conductivity and haze. Owing to excellent product property, the Hexad ultra clear online Low-E energy-saving glass can be widely used in the interior and exterior decoration of the commercial and civil building and the household appliances. Quality originates from professionalism, perfect details achievements, Through years of dedicated research and innovative breakthroughs, the scientific research team of Hexad Research & Development Center, the research team has achieved extensive and precise modulation of coating radiation and sheet resistance, and providing the tailor-make as well as high-quality coating products and solutions to effectively meet the needs of customers in related industries.

膜层颜色 Film color	基片颜色 Substrate color	厚度 Thickness	尺寸 Sizes
净色 Clear	超白、普白 Ultra Clear、Clear	3.2mm、4mm、5mm、6mm、8mm、10mm、12mm	2134mm*3300mm 2440mm*3300mm 6000mm*3300mm

Hexad 在线 LOW-E 玻璃采用业界最前沿的在线镀膜技术，通过高温化学气相沉积（CVD）工艺在浮法线的锡槽内将功能材料镀覆到玻璃表面，退火冷却后与玻璃烧结成一体，形成致密的薄膜，具有出色的化学稳定性和机械稳定性，同时产品的透射率、电导率及雾度达到完美的优化平衡。可广泛应用于商用、民用建筑室内外装饰以及家用电器等领域。品质源于专业，细节成就完美。Hexad 研发中心的科研团队凭借多年的潜心攻关，创新突破，实现了辐射率和电阻率的广泛及精准调制，可以为客户进行量身定制，提供优质的镀膜产品和解决方案，有效地满足不同领域的客户需求。



Features and unique advantages of products

1. Adopting the International Advanced CVD coating technology as well as online coating, the Low-E glass acquired the strong film adhesion, marvelous scratch resistance, and wear-resistant, easy secondary processing;
2. Crystal clear appearance, natural color rendering, low reflectivity, suitable for all commercial and civil buildings on the glass doors and windows and curtain walls;
3. The ultra clear glass with high transmittance, extremely low self-explosion rate, excellent anti-fog performance, can be applied to a variety of freezers, refrigerators and ovens and microwave ovens glass;
4. The film is stable and durable, also be able to expose in the air condition for long time without any variation, as well as easy to store and transport;
5. Easy to heat bending, tempering and semi-tempered secondary processing and treatment, which can be used as a single piece, or can be made into hollow glass or laminated glass;
6. Flexible sizes and short lead times lower costs and better prices.

产品特点 and 优势

- 1、采用先进的 CVD 镀膜技术，在线镀膜，膜层附着能力强，不易划伤且耐磨，易于二次加工；
- 2、外观晶莹剔透，显色自然，反射率低，可用于所有商用、民用建筑上的玻璃门窗和幕墙；
- 2、超白玻璃透光度高，自爆率极低，防雾性能出色，可应用各种冰柜、冷柜以及烤箱、微波炉的玻璃；
- 4、膜层稳定，持久耐用，可长期暴露在空气中，便于储存、运输；
- 5、易于热弯、钢化 and 半钢化等二次加工和处理，既可单片使用，也可做成中空玻璃或夹胶玻璃使用；
- 6、尺寸灵活，供货周期短，成本更低，价格更优。

Applications

Architectural Field: glass curtain of commercial buildings, office buildings, high-level architecture, high-level door and windows, etc.
Industrial field: household appliances, freezers and coolers, etc.

应用领域

建筑领域：商用建筑、写字楼、高等建筑的玻璃幕墙、室内高档门窗
工业品领域：家用电器、冰柜及冷柜等

HEXAD GLASS

Off-line Low-E Glass 离线 Low-E 玻璃

Low-E energy-saving glass is a coated glass coated with multi layer compound medium layer and functional and non-functional metal film on the glass surface, so that it has high transmittance of visible light and high infrared reflectivity.

Hexad introduce the world's most advanced offline Low-E coating production line from Leybold Germany, with annual capacity of 20 million square meters, which can provide customers with the high performance triple silver, double silver, single silver Low-E glass.

Low-E 节能玻璃，是在玻璃表面镀上多层化合物介质层及功能性和非功能性金属薄膜，使其对可见光具有较高透过率，对红外线有较高反射率的镀膜玻璃。Hexad 引进德国莱宝光学离线 Low-E 镀膜生产线，年产量 2000 万平米，可为客户提供高性能的三银、双银、单银 Low-E 节能玻璃。

产品系列 | Product Series

高性能单银 High-performance single silver	多品种双银 Multiple varieties of double silver	异地可钢化三银 Off-site temperable triple silver
S1系列: S1.0/1.1P1us/1.16 S系列: S83/70/60/50	UD系列: UD80/68/60/57/49 D系列: D80/68/60/57/49	72/70/60

产品规格 | Specification

常规尺寸 Standard Size	最大尺寸 Max Size	产品厚度 Thickness
3300*2440 3300*4880 3300*6000	12000*3300mm	3-19mm



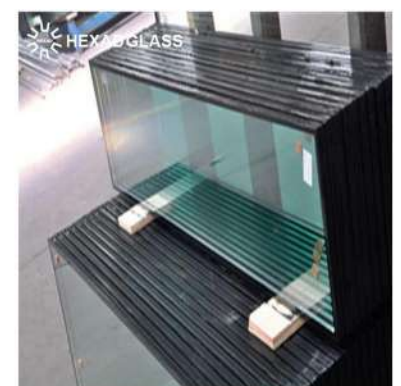
Low-E Glass Specialized for Extra Low Energy Building 超低能耗建筑用 LOW-E 玻璃

Ultra-low energy buildings refer to buildings that adapt to climate characteristics and site conditions, minimize building heating, air conditioning and lighting requirements through passive building design, significantly improve the efficiency of energy equipment and system through active technical measures, make full use of renewable energy, and provide a comfortable indoor environment with less energy consumption, and its indoor environmental parameters and energy efficiency indicators meet the building of "Near zero Energy Technical standards" (GB/T51350-2019)

Hexad Low-E glass has excellent product performance, while ensuring sufficient visible light transmittance, but also has a very low heat transfer coefficient, is the ideal choice for ultra-low energy buildings.

超低能耗建筑是指适应气候特征和场地条件，通过被动式建筑设计最大程度降低建筑供暖、空调、照明需求，通过主动技术措施较大幅度提高能源设备与系统效率，充分利用可再生能源，以较少的能源消耗提供舒适室内环境，且其室内环境参数和能效指标符合《近零能耗技术标准》(GB/T51350-2019) 的建筑。

Hexad Low-E 玻璃具有卓越的产品性能，在保证充足可见光透过率的同时，又具有极低的传热系数，是超低能耗建筑的理想选择。



性能参数表 | Performance Data

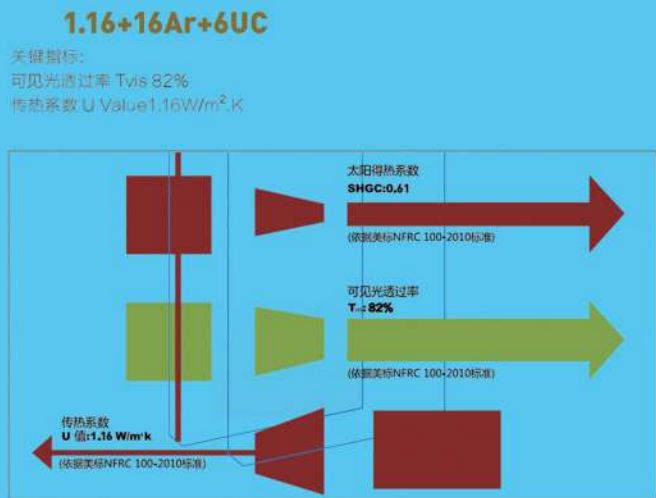
常见设计要求 Common design requirements	产品方案推荐 Product proposal recommendation	可见光 Visible(%)			太阳能 Solar(%)		中国门窗标准 JGJ151		
		透过 Transmittance	室外反射 Out Rvis%	室内反射 In Rvis%	透过 Tsol%	反射 Rsol%	传热系数(K值)	Sc	g
可见光透光率 Tvis>60% 遮阳系数 Sc> 0.60 传热系数 K ≤ 0.8W/m2.K	5C+12Ar+5S1.16#3+12Ar+5S1.16#5	72	16	16	43	27	0.78	0.6	0.52
	5C+12Ar+5S1.16#3+19Ar+5S1.16#5	72	16	16	43	27	0.77	0.6	0.52
	5UC+12Ar+5S1.16#3+12Ar+5S1.16#5	74	16	16	46	34	0.78	0.63	0.55
	5UC+12Ar+5S1.16#3+19Ar+5S1.16#5	74	16	16	46	34	0.77	0.63	0.55
可见光透光率 Tvis>60% 遮阳系数 Sc ≥ 0.6 0传热系数 K ≤ 1.1W/m2.K	5S1.16#2+12Ar+5C+12Ar+5C	73	16	19	47	26	1.1	0.64	0.55
	5S1.16#2+12Ar+5C+19Ar+5C	73	19	19	47	26	1.08	0.64	0.55
	5US1.16#2+12Ar+5C+12Ar+5C	74	19	19	50	32	1.1	0.67	0.58
	5US1.16#2+12Ar+5C+19Ar+5C	74	19	19	50	32	1.08	0.67	0.58



Offline Single Silver Low-E Glass
离线单银 Low-E 玻璃

产品特点 |Product Characteristics:

1. High visible light transmittance, and the visible light transmittance of IGU is 82%.
2. Lower U value, and the lowest U value of IGU can be 1.0W/m².K.
3. Natural lighting and bright quality with a crystal view.
- 1、高透过。中空可见光透过率高达 82%;
- 2、低U值。单 Low-E 中空 U 值最低达 1.0 W/m. K;
- 3、自然质感，纯净天然，一览无余；



适用范围 |Applications

High-end household doors and windows, Super-low energy consumer point architectures ,Industrial products

高档家用门窗、超低能耗建筑、工业制品

Applied area: freezing and cold areas

应用区域：严寒及寒冷地区

性能参数表 |Performance Data

产品结构 Product Configuration	反射色 Colour	可见光				太阳光 Sunlight		美标 NFRC 2010							国标 JGJ151		
		透射比 Tvis%	反射比 Rvis%		透过 Tsol%	反射 Rsol%	U值 U-value (W/m².K)				遮阳系数 SC	得热系数 SHGC	光热比LSG	K值 K-value		遮阳系数 SC	
			室外 Out	室内 In			空气 Air		氩气 Argon					空气 Air	氩气 Argon		
							冬季 Winter	夏季 Summer	冬季 Winter	夏季 Summer							
6SL0Pro+12A+6C	中性 Neutral	71	21	20	40	30	1.63	1.57	1.32	1.21	0.53	0.46	1.54	1.64	1.33	0.55	
6SL0Pro+16A+6C	中性 Neutral	71	21	20	40	30	1.68	1.30	1.38	1.00	0.53	0.46	1.54	1.69	1.39	0.55	
6SL1PPlus+12A+6C	中性 Neutral	78	15	14	47	26	1.67	1.62	1.40	1.31	0.61	0.53	1.47	1.68	1.41	0.64	
6SL1PPlus+16A+6C	中性 Neutral	78	15	14	47	26	1.72	1.37	1.45	1.10	0.61	0.53	1.47	1.73	1.47	0.63	
6SL16+12A+6C	中性 Neutral	80	13	13	50	24	1.72	1.69	1.45	1.39	0.65	0.57	1.40	1.73	1.46	0.68	
6SL16+16A+6C	中性 Neutral	80	13	13	50	24	1.76	1.44	1.51	1.16	0.65	0.57	1.40	1.77	1.52	0.68	
6SL10Pro#2+12A+6U on-line#4	中性 Neutral	73	22	20	46	39	1.32	1.22	1.09	0.98	0.56	0.49	1.49	1.38	1.25	0.58	
6SL1Pus#2+12A+6U on-line#4	中性 Neutral	80	15	14	53	35	1.35	1.25	1.14	1.05	0.65	0.56	1.43	1.42	1.20	0.67	
6SL116#2+12A+6U on-line#4	中性 Neutral	81	14	13	56	31	1.39	1.29	1.17	1.08	0.68	0.60	1.35	1.45	1.23	0.71	

Ultra Clear Double Silver Low-E Glass
超白双银 LOW-E 玻璃

产品特点 |Product Characteristics

- 1.Extremely high safety performance, near zero self-explosion, first choice for ultra high buildings;
- 2.Excellent color rendering performance, more vividly and authentically exhibit the original design of the architects;
- 3.Higher transparency, beautiful view Diamond splendid crystal clear;
- It solves the contradiction between light transmission and shading, and gives consideration to heat preservation and insulation.

- 1、高安全性，近零自爆，超高层建筑安全选择；
- 2、高保真色彩，还原建造师设计创想；
- 3、钻石般璀璨，水晶般剔透；
- 4、解决了透光与遮阳的矛盾、兼顾保温和隔热。

适用范围 |Applications

Super high-rise buildings and all-glass facade buildings

超高层建筑及全玻璃幕墙建筑

Applied region : cold regions, hot-summer and cold-winter regions

应用区域：寒冷及夏热各冷地区

性能参数表 |Performance Data

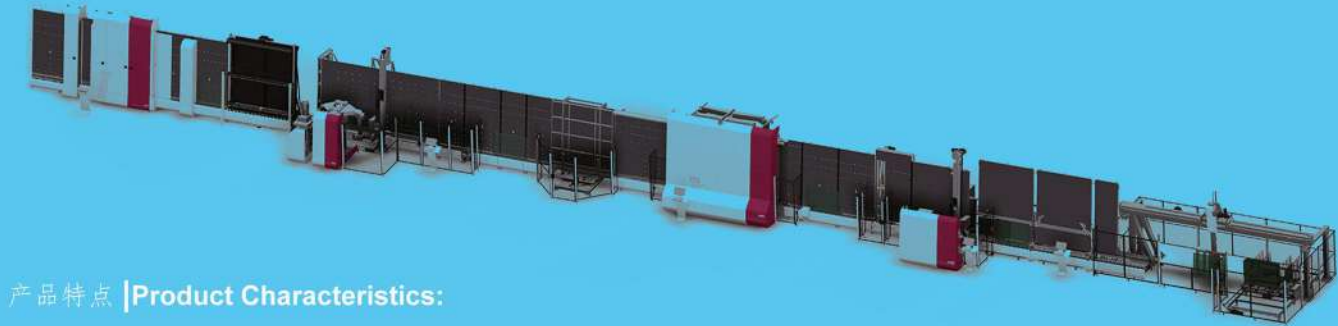
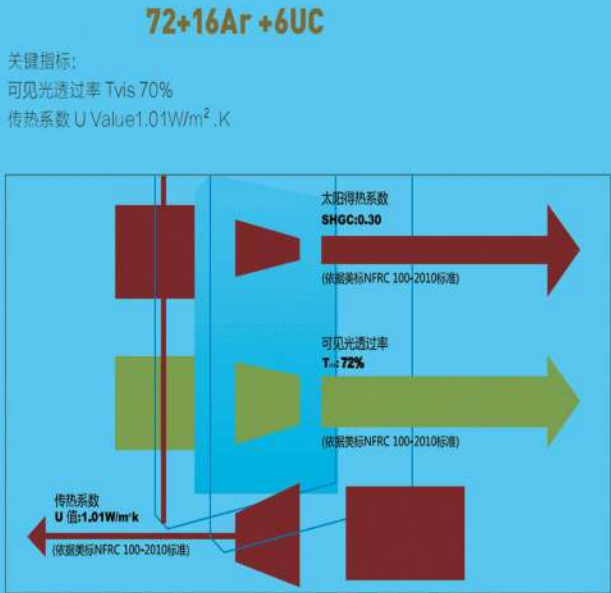
产品结构 Product Configuration	反射色 Colour	可见光 Visible light			太阳光 Sunlight		美标 NFRC 2010							欧标 EN673		国标 JGJ151		
		透射比 Tvis%	反射比 Rvis%				U值 U-value (W/m².K)				遮阳系数 SC	得热系数 SHGC	光热比 LSG	U值 U-value (W/m².K)		K值 K-value (W/m².K)		遮阳系数 SC
			室外 Out	室内 In			空气 Air		氩气 Argon					空气 Air	氩气 Argon	空气 Air	氩气 Argon	
					冬季 Winter	夏季 Summer	冬季 Winter	夏季 Summer										
UD80+12A+6UC	中性 Neutral	72	13	14	38	41	1.66	1.6	1.38	1.29	0.45	0.39	1.85	1.6	1.27	1.66	1.39	0.49
D80+12A+6C	中性 Neutral	70	12	13	33	31	1.66	1.6	1.38	1.29	0.44	0.38	1.84	1.6	1.27	1.66	1.39	0.48
UD68+12A+6UC	浅蓝灰 Powder Blue	63	18	21	40	28	1.74	1.67	1.44	1.37	0.5	0.43	1.47	1.66	1.34	1.71	1.45	0.52
D68+12A+6C	浅蓝灰 Powder Blue	60	17	20	34	22	1.71	1.67	1.44	1.37	0.46	0.4	1.5	1.66	1.34	1.71	1.45	0.48
UD60+12A+6UC	中性灰 Neutral Grey	56	15	20	34	38	1.67	1.62	1.4	1.31	0.42	0.36	1.56	1.62	1.3	1.68	1.41	0.44
D60+12A+6C	中性灰 Neutral Grey	53	14	19	28	27	1.68	1.63	1.4	1.32	0.39	0.34	1.56	1.62	1.3	1.68	1.41	0.42
UD57+12A+6UC	浅灰色 Light Grey	53	15	14	26	42	1.69	1.64	1.41	1.34	0.34	0.29	1.83	1.63	1.31	1.69	1.43	0.36
D57+12A+6C	浅灰色 Light Grey	51	15	13	23	30	1.69	1.64	1.41	1.34	0.33	0.28	1.82	1.63	1.31	1.69	1.43	0.35
UD49+12A+6UC	蓝灰 Bluish Grey	48	15	13	23	44	1.69	1.64	1.41	1.34	0.3	0.26	1.85	1.63	1.31	1.69	1.43	0.33
D49+12A+6C	蓝灰 Bluish Grey	46	15	13	21	32	1.69	1.64	1.41	1.34	0.3	0.26	1.77	1.63	1.31	1.69	1.43	0.32

HEXAD GLASS

Triple Silver Low-E Glass 异地可钢三银 Low-E 玻璃

The triple Silver Low-E coated glass is a low radiation coated glass with three silver layers, which can filter the sunlight into a cold light source to the maximum extent. High visible light transmittance, natural lighting. Low heat transfer coefficient, effectively reducing the flow of heat inside and outside the room, keeping the indoor temperature constant. Extremely low sunshade coefficient, effectively reduce the heat gain from solar radiation, and areal reducing the cooling cost in summer. Suitable for occasions with high requirements for lighting and shading.

三银低辐射镀膜玻璃是具有三个银层的低辐射镀膜玻璃产品，是种能将太阳光最大程度地过滤成冷光源的产品。较高的可见光透过率，自然采光。较低的传热系数，有效降低室内外热量流动，保持室内温度恒定。极低的遮阳系数，有效降低太阳辐射得热，大幅降低夏季制冷费用。适合用于对采光和遮阳要求极高的场合。



产品特点 | Product Characteristics:

- 1. Excellent shielding function for infrared thermal, greatly improve the indoor comfort;
- 2. Advanced technology, mature application by over 30 years;
- 3. LSG value can be 2.4, perfect combination of heat control and visible light transmission;
- 4. Excellent processability, can be bent inward or outward, and can be laminated.

- 1. 卓越的红外热屏蔽功能，极大提升室内舒适度；
- 2. 先进的技术，成熟运用三十年；
- 3. 光热比达 2.4，得热控制与可见光透过的完美结合；
- 4. 优越的可加工性能，可内弯、外弯，可夹胶。



适用范围 | Applications

应用区域：夏热冬冷及夏热冬暖地区

推荐应用：绿色建筑

Applied area: tropical & sub-tropical areas

Recommended application: green buildings



性能参数表 | Performance Data

产品结构 Product Configuration	反射色 Colour	可见光 Visible light			太阳光 Sunlight		美标 NFRC 2010							欧标 EN673		国标 JCJ151		
		透射比 Tvis%	反射比 Rvis%				U值 U-value (W/m². K)				遮阳系数 SC	得热系数 SHGC	光热比 LSG	U值 U-value (W/m². K)		K值 K-value (W/m². K)		遮阳系数 SC
			室外 Out	室内 In	通过 Tsol%	反射 Rsol%	空气 Air		氩气 Argon					空气 Air	氩气 Argon	空气 Air	氩气 Argon	
							冬季 Winter	夏季 Summer	冬季 Winter	夏季 Summer								
72+12A+6UC	灰 Greye	70	16	16	27	56	1.66	1.6	1.38	1.29	0.33	0.29	2.4	1.6	1.27	1.63	1.35	0.37
72+16A+6UC	灰 Greye	70	16	16	27	56	1.7	1.34	1.44	1.08	0.33	0.29	2.4	1.35	1.14	1.66	1.41	0.36
70+12A+6C	灰 Greye	68	14	15	26	37	1.65	1.6	1.38	1.28	0.35	0.3	2.3	1.59	1.26	1.61	1.32	0.38
70+16A+6C	灰 Greye	68	14	15	26	37	1.7	1.34	1.44	1.07	0.34	0.3	2.3	1.35	1.13	1.62	1.37	0.38

HEXAD GLASS



Silver-Free Low-E Glass 无银 Low-E 镀膜玻璃

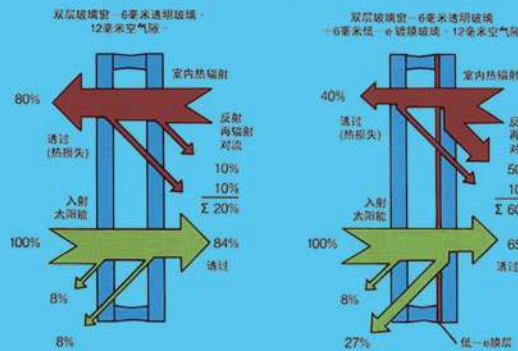
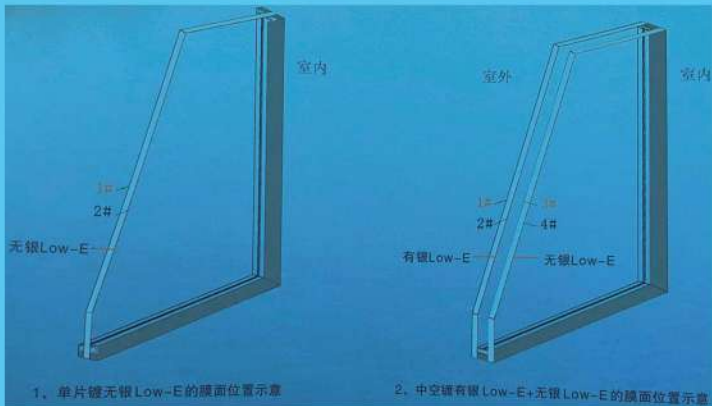
Silver-free Low-E coated glass, referred to as silver free Low-E, is a new type of energy-saving glass, with good electrical conductivity and infrared reflection properties. High-quality float glass is used as substrate, coated with hard semiconductor oxide films by vacuum magnetron sputtering process. Using oxide films instead of metallic silver films as functional layer the glass has good transparency, low emissivity characteristics and thermal insulation functions, while maintaining its advantages such as high film hardness, wear resistance, and oxidation resistance etc.

无银 Low-E 镀膜玻璃，简称无银 Low-E，是一种新型节能镀膜玻璃。以优质浮法玻璃为基片，利用真空磁控溅射工艺，在玻璃表面镀制硬质的半导体氧化物膜，具有良好的导电性能与红外反射性能。使用氧化物代替金属银，赋予玻璃良好的透光性、低辐射特性、保温隔热功能的同时，使其保持高的膜层硬度、耐磨性、抗氧化等优势。

产品特点 | Product Characteristics:

- 1.High visible light transmittance and excellent lighting performance;
- 2.Low emissivity,comparable to the ordinary silver Low-E;
- 3.Excellent processing performance, easy for hot bending, tempering and laminating, no need to cut coating of edge during the hollow processing;
- 4.Suitable for being used as a single piece, or used as the outer surface of hollow or laminated glass;
- 5.Long shelf life and long-term storage;
- 6.Silver-free Low-E can be applied to fields such as skylight glass, curtain wall glass, and appliance glass etc.

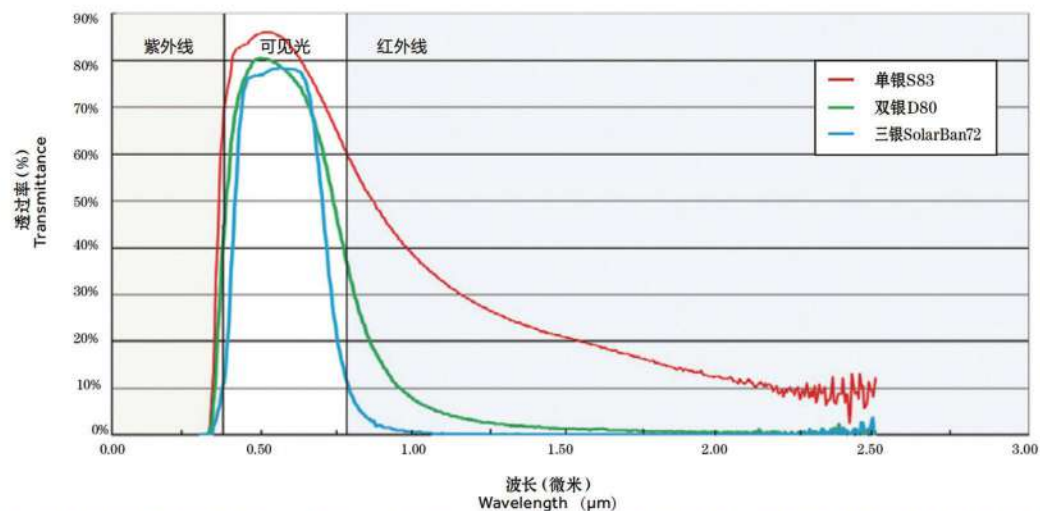
- 1、较高的可见光透过率，采光性能优良；
- 2、低的辐射率，与普通含银 Low-E 相媲美；
- 3、优异的加工性能，易于热弯、钢化、夹胶等工艺，合中空等加工时无需边部除膜；
- 4、可单片使用，或用于中空、夹胶结构的外表面；
- 5、保质期长，也长期存放；
- 6、无银 LoW-E 可应用于天窗玻璃、幕墙玻璃、家电玻璃等领域。



无银 Low-E 产品性能参数

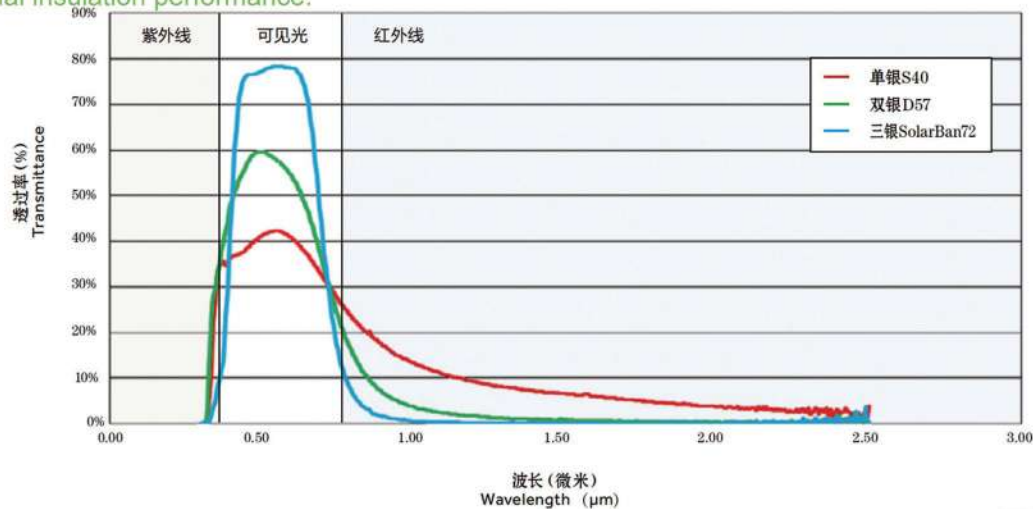
产品系列	类型 Type	玻璃结构 Glass structure	透光率 %	传热系数 K-值 W/(m²·K)	遮阳系数 Sc	太阳红外热辐射总透射比 g _{ir}
单片及夹层	白玻单片	6	89	5.36	1.01	84.2
	镀膜单片	6M(BW88N)#2	88	3.8	0.93	70.7
	单夹层镀膜	6/1.52PVB/6M(BW88N)#2	87	3.63	0.84	62
单中空	空气	6+12A+6	81	2.67	0.9	73.7
	空气	6M(三银LoW-E)#2+12A+6	62	1.64	0.36	4.6
	氩气	6M(三银Low-E)#2+12Ar+6	62	1.38	0.36	4
	氩气	6M(三银 LoW-E)#2+12Ar+6M(BW88N)#2	61	1.22	0.35	3.6
双中空	空气	6+12A+6+12A+6	73	1.76	0.81	65.2
	空气	6M(三银Low-E)#2+12A+6+12A+6	56	1.24	0.33	3.9
	空气	6M(三银LoW-E)#2+12A+6+12A+6M(BW88N)#2	55	1.12	0.32	3.5
	氩气	6M(三银Low-E)#2+12Ar+6+12Ar+6M(BW88N)#2	55	0.96	0.32	3.2
	三银Low-E+保温膜系	6M(三银Low-E)#2+12Ar+6+12Ar+6M(三银 Low-E)#2+12Ar+6M(BW88N)#2	42	0.67	0.26	1.9
	双三银Low-E+保温膜系	6M(三银Low-E)#2+12Ar+6M(三银 Low-E)#2+12Ar+6M(BW88N)#2	42	0.67	0.26	1.9

HEXAD GLASS



图中是三款可见光透过率相近的单银、双银、三银 Low-E 太阳光谱透过曲线，图中竖线中间是可见光（380-780nm）区域，三款 Low-E 透光率相近。竖线右侧是红外线（780-2500nm）区域，由于热量绝大部分都是由红外线带入，因而该区域曲线下包容面积大小反映太阳透过玻璃的热能。单银 Low-E 包容的面积最大，双银 Low-E 次之，三银 Low-E 包容的面积最小，因此透过的太阳热能最少，隔热性能最好。

In the graph, these are three solar spectral transmittance curve of triple, double, single silver Low-E glass with similar visible light transmittance. The middle area of the vertical line is the area of visible light (380-780 nm), and the visible light transmittance of the three kinds of Low-e is similar. The right area of the vertical line is infrared ray area (780-2500 nm). Since most of the heat is carried by infrared rays, the area under the curve reflects the heat energy which the solar energy goes directly through the glass. The single silver Low-e contains the largest area, double silver Low-E takes second place, and the triple silver Low-e takes the smallest area which means the least heat goes through the glass, and best thermal insulation performance.



图中是三款太阳能得热系数（SHGC）值相近的单银、双银、三银 Low-E 玻璃太阳光谱透过曲线。SHGC 值相近意味着 380-2500nm 波长下这三条曲线包容的面积相当，但可见光部分，三银的透过率最高，双银其次，单银最低。由此可见，三银在对红外热辐射有较高屏蔽能力的同时，具有较高的可见光透过率，可实现遮阳、采光的舒适效果。

In the graph, these are three solar spectral transmittance curve of triple, double, single silver Low-E glass with similar SHGC value within 380-2500 nm. The SHGC value is similar, which means the contained area of the three coated glass is similar but the visible light part, triple silver transmittance of the highest, followed by double silver, single silver of the lowest. It can be seen that triple silver has a high shielding ability for infrared thermal radiation, and has a high visible light transmittance, which can achieve the comfortable effect of shading and lighting.

Low-E Glass Specialized for Passive House 被动式建筑用 LOW-E 玻璃

Hexad Low-E glass specialized for passive house has superior product performance, and it can guarantee high visible light transmittance. It also has an extremely lower U-value (K-value), optional shading coefficient (SC), making it an ideal choice for passive buildings.

Hexad 高性能被动式建筑专用 Low-E 玻璃具有卓越的产品性能，在保证充足可见光透过率的同时，又具有极低的传热系数，可选择的遮阳系数，是被动式建筑的理想选择。

性能参数表 Performance Data

产品结构 Product Configuration	可见光透射比 Tvis%	U 值 U-value(W/m².K)			遮阳系数 SC	得热系数 SHGC	光阳比 LSG
		美标 NFRC2010		欧标 EN673			
		冬季夜晚 Winter	夏季白天 Summer	冬季夜晚 Winter			
50ptilite S1.16+12Ar+5C+12Ar+50ptilite S1.16	73	0.78	0.82	0.79	0.57	0.5	1.46
50ptilite S1.16+16Ar+5C+16Ar+50ptilite S1.16	73	0.75	0.68	0.65	0.57	0.5	1.46
50ptilite S1.16+18Ar+5C+18Ar+50ptilite S1.16	73	0.77	0.64	0.6	0.58	0.5	1.46
50ptisolar D80+12Ar+5C+12Ar+50ptilite S1.16	64	0.77	0.81	0.77	0.4	0.35	1.83
50ptisolar D80+16Ar+5C+16Ar+50ptilite S1.16	64	0.74	0.67	0.64	0.4	0.35	1.83
50ptisolar D80+18Ar+5C+18Ar+50ptilite S1.16	64	0.76	0.63	0.59	0.4	0.35	1.83
5 Solarban 70XL+12Ar+5C+12Ar+50ptilite S1.16	63	0.75	0.78	0.75	0.32	0.28	2.25
5 Solarban 70XL+16Ar+5C+16Ar+50ptilite S1.16	63	0.73	0.64	0.62	0.32	0.28	2.25
5 Solarban 70XL +18Ar+5C+18Ar+50ptilite S1.16	63	0.74	0.59	0.57	0.32	0.28	2.25



1、青岛中德生态园被动房技术体验中心
Qingdao Sino-German ecological park passive
house technology experience center



2、山东华建大酒店
Shandong Huajian Grand Hotel

HEXAD GLASS



Paint Glass 烤漆玻璃

Paint glass, also known as painted glass or back-painted glass, is a type of glass that has been coated on one side with a layer of paint. This process creates a decorative and functional surface that can be used in a variety of applications.

烤漆玻璃，也称为烤漆玻璃或背面烤漆玻璃，是一种在一面涂上一层油漆的玻璃。这一过程创造了一个可用于各种应用的装饰性和功能性表面。

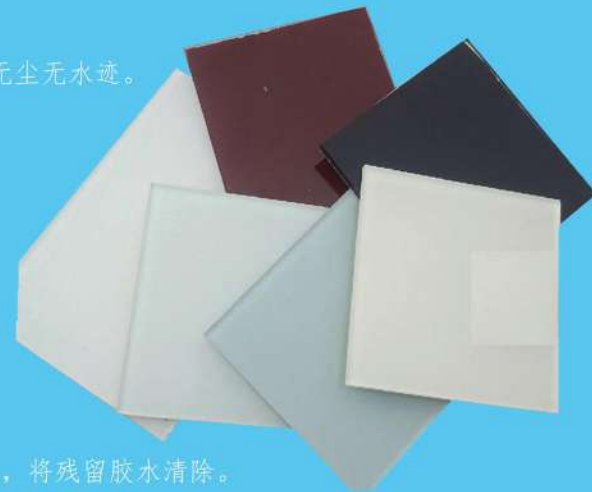
The production process of Paint glass:

- (1) Glass cleaning: Use professional cleaning agents and fabrics to thoroughly clean the surface of the glass, ensuring no dust or water stains.
- Gluings: Stick double-sided adhesive paper on the back of the glass to prevent paint water from penetrating.
- (2) Paint application: Spray the baking paint on the front of the glass, control the uniformity and coating area of the paint, and ensure uniform coating thickness.
- (3) Airing: Leave the painted glass to air for a period of time to allow the paint to dry thoroughly, avoiding blistering, cracking, and other issues during paint baking treatment.
- (4) Baking paint treatment: Use a baking paint treatment machine to heat the glass, allowing the paint water to solidify into baking paint, enhancing adhesion and wear resistance.
- (5) Drying: Put the painted glass into a UV dryer to accelerate the curing and drying of the paint surface, improve glossiness and texture.
- (6) Remove adhesive: Peel off the double-sided adhesive paper, gently wipe the back of the glass with cleaning agent or alcohol, and remove any remaining adhesive.
- (7) Inspection: Inspect the glass after construction to eliminate defects and quality issues, ensuring that the product is perfect and flawless.



烤漆玻璃的制造工艺:

- (1) 玻璃清洗: 使用专业的清洗剂和布料，彻底清洗玻璃表面，确保无尘无水迹。
- 涂胶: 将双面涂胶纸贴在玻璃背面，防止漆水渗透。
- (2) 施漆: 将烤漆喷涂在玻璃正面，掌握喷漆的均匀度和涂覆面积，保证涂层厚度均匀。
- (3) 晾干: 将涂好漆的玻璃晾置一段时间，让漆水充分干燥，避免烤漆处理时出现起泡、龟裂等情况。
- (4) 烤漆处理: 使用烤漆处理机对玻璃进行加热处理，使漆水固化成为烤漆，增强附着力和耐磨性。
- (5) 烘干: 将烤漆处理后的玻璃放入UV干燥机，加速漆面固化和烘干，提高光泽度和质感。
- (6) 去胶: 将双面涂胶纸撕去，用清洗剂或者酒精轻柔擦拭玻璃背面，将残留胶水清除。
- (7) 检查: 对施工后的玻璃进行检查，排除瑕疵和品质问题，确保产品完美无缺。



Paint Glass 烤漆玻璃

The characteristics of paint glass:

- (1) Rich in colors: We can produce products with different colors and patterns according to customer needs.
- (2) Beautiful appearance: The surface of the paint glass is smooth and flat, with a good texture.
- (3) Good chemical stability: Painted glass undergoes minimal changes under the corrosion of acids, alkalis, fats, and other substances.
- (4) Environmentally friendly and healthy: Painted glass uses environmentally friendly coatings that do not contain harmful substances and are harmless to the human body.

烤漆玻璃的特点:

- (1) 颜色丰富: 可以根据客户需求制作不同颜色和花纹的产品。
- (2) 外观美观: 烤漆玻璃的表面光滑平整，质感好。
- (3) 化学稳定性好: 烤漆玻璃在酸、碱、油脂等物质的腐蚀下变化较小。
- (4) 环保健康: 烤漆玻璃使用的是环保型涂料，不含有害物质，对人体无害。

The thickness of painted glass: 4 mm—19 mm

Size of painted glass: customized according to actual needs.

烤漆玻璃的厚度: 4 mm - 19 mm

烤漆玻璃的尺寸: 根据实际需要定制

Application



HEXAD GLASS

Mirror

镜子



Our company introduces advanced production line of silver mirror, which is processed with high quality float glass through cleaning, polishing, sensitization, silver plating, copper plating, two-layer protection painting and drying. High-quality float glass is used as original glass sheet to ensure that the flatness, high brightness, and clear and true imaging effects of silver mirror. Special protective paint for mirror is adopted as the double-layer back painting of silver mirror to ensure the product is waterproof and corrosion-resistant. Back paint color of silver mirror is dark grey and light grey.

我公司引进先进银镜生产线，由浮法玻璃经清洗、抛光、敏化、镀银、镀铜、淋涂两层保护漆并烘干等工序加工而成。
玻璃原片采用优质浮法玻璃以保证玻璃镜面平整、亮度高、成像效果清晰、真实。双层镜背漆采用镜面专用保护漆以保证产品防水、耐腐蚀，镜背漆颜色为深灰色、浅灰色。



产品规格：
银镜最大尺寸:2440x3660
主要规格:2440*1830mm,
2140*3300/3660mm
2250*3300mm,
2440*3300/3660mm



Product Specifications:
Maximum size of silver mirror:2440x3660
Main specifications:2440*1830mm,
2140*3300/3660mm
2250*3300mm□
2440*3300/3660mm

HEXAD GLASS



Aluminum Mirror 铝镜

Aluminum mirror, also known as reflector, refers to a mirror surface coated with aluminum on glass. It not only has good reflective performance, lightweight and high-strength, but also moisture-proof and anti-corrosion, with a long service life. Widely used in home, public places, vehicles and other fields, it is one of the most common types of mirrors in the current market.

铝镜也称为反光镜，是指在玻璃上镀一层铝镜面。它不仅具有很好的反光性能，轻质高强，还防潮防腐，使用寿命长。广泛用于家居、公共场所、车辆等领域，是目前市场上最常见的镜子类型之一。



Common thickness of aluminum mirrors: 1. 8mm - 6mm

Available dimensions:

1500×2000	2200×1600	1830×2440
3300×2140	3660×2140	3660×2440

铝镜常用厚度: 1. 8mm - 6mm

可能的尺寸:

1500×2000	2200×1600	1830×2440
3300×2140	3660×2140	3660×2440

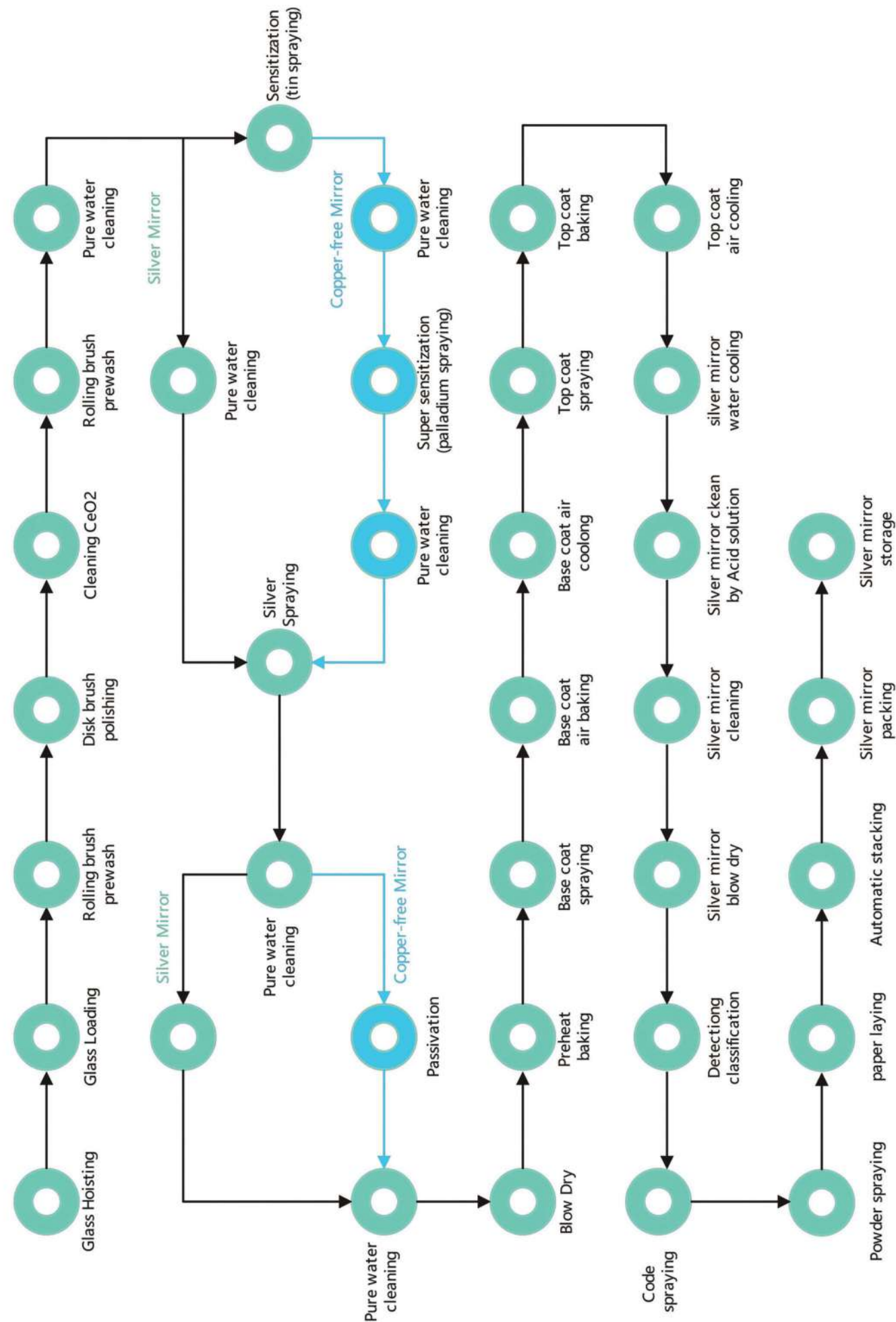


Production process steps for aluminum mirrors:

1. Glass cleaning: First, cut the glass into designated sizes and thoroughly clean its surface to ensure that the aluminum layer can tightly adhere to the glass surface.
2. Primer coating: Apply primer to the surface of glass, which can improve the adhesion of the aluminum layer and enhance the wear and corrosion resistance of the mirror surface.
3. Aluminum plating: Put the glass into a vacuum coating machine and deposit the aluminum film on the surface of the glass at high temperature. Normally, the thickness of the aluminum layer is around 0.01mm-0.02mm.
4. Coating: Coatings are generally divided into two types: organic coatings and inorganic coatings. Organic coatings have good corrosion resistance and high anti fouling performance, but their optical properties are slightly inferior; Inorganic coatings have good optical properties, but their corrosion resistance is not as good as organic coatings.
5. Packaging: After the above process, the aluminum plated mirror is sent to the packaging process for paper clamping, packaging, etc.

铝镜生产工艺步骤:

1. 玻璃清洗: 首先将玻璃切割成指定大小, 并对其表面进行彻底清洗, 以确保铝层能紧密地附着到玻璃表面。
2. 底漆涂布: 将底漆涂布于玻璃表面, 底漆能够提高铝层附着力, 同时增强镜面的耐磨性和耐腐蚀性。
3. 镀铝: 将玻璃放入真空镀膜机中, 在高温下使铝薄膜沉积在玻璃表面。通常情况下, 铝层厚度为 0.01mm-0.02mm 左右。
4. 涂层: 涂层一般分为有机涂层和无机涂层两种。有机涂层具有较好的耐腐蚀性和较高的防污性能, 但光学性能略差; 无机涂层的光学性能好, 但耐腐蚀性不如有机涂层。
5. 包装: 经过上述工艺处理后, 镀铝镜被送入包装环节, 进行夹纸、包装等。



Copper-free Silver Mirror 无铜银镜

Our company introduces advanced production line of silver mirror, which is processed with high quality float glass through cleaning, polishing, sensitization, hyper sensitization, silver plating, passivation, two-layer protection painting and drying. High-quality float glass is used as original glass sheet to ensure that the flatness, high brightness, and clear and true imaging effects of silver mirror. Special protective paint for mirror is adopted as the double-layer back painting of silver mirror to ensure the product is waterproof and corrosion-resistant. Back paint color of silver mirror is light green and dark green. Copper-free silver mirrors are environmentally friendly (no lead, no copper), strong in optical performance and adhesion, wear resistant and corrosion resistant (its edge grinding and corrosion resistance is three times that of ordinary silver mirror), and high in reflectivity.

我公司引进先进银镜生产线，由浮法玻璃经清洗、抛光、敏化、超敏化、镀银、钝化、淋涂两层保护漆并烘干等工序加工而成。玻璃原片采用优质浮法玻璃以保证玻璃镜面平整、亮度高、成像效果清晰，真实。双层镜背漆采用镜面专用保护漆以保证产品防水、耐腐蚀，镜背漆颜色为浅绿色、深绿色。无铜银镜具有环保（不含铅、不含铜）、光学性能强、耐磨、附着力强、耐腐蚀（边部磨边耐腐蚀能力是普通银镜的三倍）、反射率高等特点。



产品规格 Product Specifications

无铜银镜最大尺寸 Maximum size of silver mirror: 2440x3660

主要规格 Main specifications: 2440*1830mm, 2140*3300/3660mm

2250*3300mm, 2440*3300/3660mm

HEXAD GLASS



Antique Mirror 仿古镜

HEXAD Antique Mirror retains the appealing and subtly hypnotic magic, with its markings and opacities created by the passing time, reflecting a profound, uncertain, fascinating and slightly mysterious image. The face we see is still our own, in its essence, but the image seems to be filtered by time, by a past that is part of our image. As if the depths of the mirror can retain our past aces together with slightly mysterious memories.



HEXAD 仿古镜保留了吸引力和微妙的催眠魔术，其标记和不透明创造的时间流逝，反映了一个深刻的，不确定的，迷人的和略微神秘的形象。从本质上说，我们看到的面孔仍然是我们自己的，但是图像似乎被时间过滤了，被我们图像的一部分过去过滤了。仿佛镜子的深处可以保留我们过去的王牌和略带神秘的记忆。

Solar mirror 光热镜子

Flat mirror 2mm-4mm thickness, max size 3220*2250mm, solar reflectivity (300-2500nm)>94.5%, 3 layers protective.
平面光热反射镜，应用于塔式和线菲光热发电，厚度范围 2mm-4mm，最大规格 3210*2250mm，太阳光反射率 (300-2500nm)>94.5%，具有高反射率，极佳耐候性等特点。



Parabolic trough mirror 4mm thickness, type size RP3, RP4, SNT2 and ST 8.2, focal length 1710mm and customizable.

槽式反射镜，厚度 4mm，可供应型号为 RP3、RP4、SNT2、ST8.2 等太阳光反射率 (300-2500nm)>94.0%，焦距 1710mm 或按需定制生产，具有高反射率、高曲率精度等特点。

Cutting mirrors 切割镜子

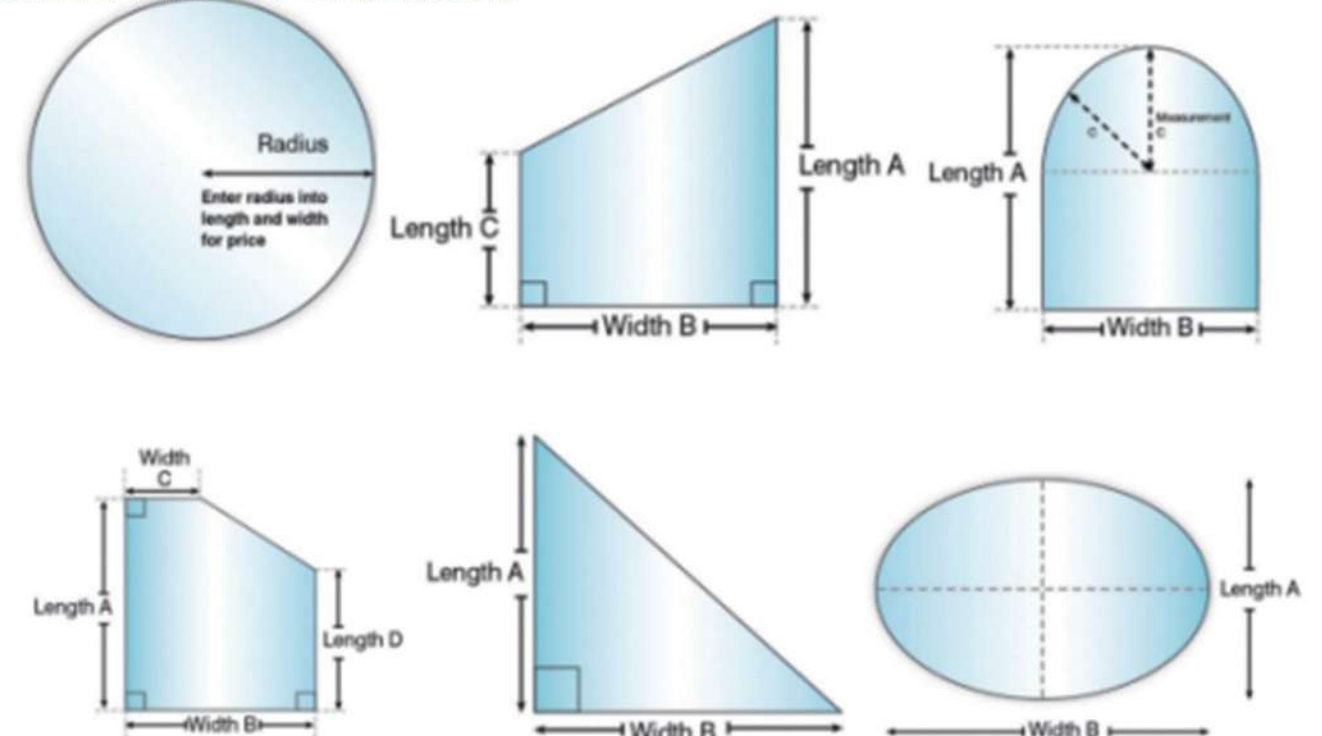
For bathrooms or other wet areas we recommend 6mm copper free, lead free, low iron mirror. If using standard mirror in a bathroom, mirror edges and holes must be sealed using a low modulus neutral cure silicon to prevent deterioration of the mirror. If fitting with a mechanical fixing, e.g mirror screws we strongly recommend selecting safety backing. High quality 6mm silver mirror to EU standards that can be cut to size, safety backed, polished, drilled and cut out for sockets etc. If fitting with adhesive do not choose safety backing as it will not fix the mirror to the wall. Only use recognised mirror adhesive as other adhesive may deteriorate the mirror. For commercial gyms we recommend 6mm mirror glass with safety backing and polished edges hung with J channels.

对于浴室或其他潮湿区域，我们建议使用 6 毫米无铜、无铅、低铁镜子。如果在浴室中使用标准镜子，则必须使用低模量中性固化硅胶密封镜子边缘和孔，以防止镜子变质。如果使用机械固定装置（例如镜子螺丝），我们强烈建议选择安全背衬。符合欧盟标准的高品质 6 毫米银镜，可按尺寸切割、安全背衬、抛光、钻孔和切割插座等。如果使用粘合剂安装，请勿选择安全背衬，因为它不会将镜子固定在墙上。仅使用公认的镜子粘合剂，因为其他粘合剂可能会损坏镜子。对于商业健身房，我们建议使用 6 毫米镜面玻璃，配有安全背衬和抛光边缘，并悬挂 J 型槽。

产品规格 | Product specification

Mirror hot thickness: 4-6mm, Size: Customize according to your needs.

镜子热厚度 4-6mm，尺寸：根据您的需要定制。



HEXAD GLASS

Safety Mirror 安全镜

A safety mirror, also known as a film mounting mirror, is a type of mirror mounting machine that applies a layer of plastic protective white smooth film or woven mesh film on the back of a glass mirror, ensuring that the plastic protective film is firmly adhered to the back of the mirror. When the mirror breaks, the fragments do not splash randomly, but still adhere to the original position, thereby avoiding injury; This type of film safety mirror is suitable for use in public areas, sliding doors, furniture, and interior decoration.

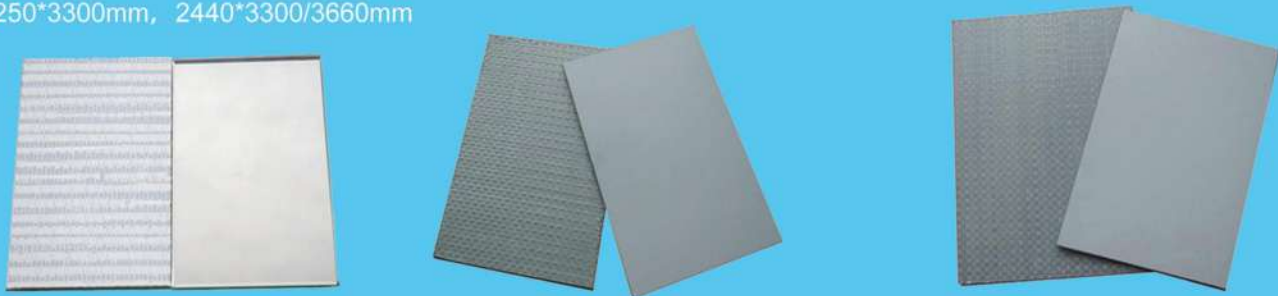
安全镜子又称贴膜镜子，系用镜子贴膜机在玻璃镜子背面贴一层塑料保护白色光滑膜或者编织丝网膜，使塑料保护薄膜牢固的粘贴在镜子背面，在镜子破碎时，碎片不乱溅射，而仍然粘附在原处，从而避免伤害；此种贴膜安全镜子适合在公共区域，滑道门，家具以及室内装修使用。

产品规格 Product Specifications

安全最大尺寸 Maximum size of safety mirror: 2440x3660

主要规格 Main specifications: 2440*1830mm,2140*3300/3660mm

2250*3300mm, 2440*3300/3660mm



Item	Description
Product Name	High Quality Safety Mirror Glass for Decorative
Size	1220*1830 mm, 1524*2134 mm, 1830*2440 mm, 2134*3050 mm, 2134*3300 mm, 2134*3660 mm, 2250*3300 mm or produce according to customer's requirement.
Glass Thickness	2mm-6mm
PVB Thickness	0.38MM, 0.76MM, 1.52MM
Type	Silver Coated Mirror, Aluminium Coated Mirror, Float Glass Mirror, She et Glass Mirror, Clear Mirror, Tinted Mirror, Safety Mirror and so on.
Payment Term	T/T, L/C,D/P
Certificate	ISO9001
Delivery	2-3 weeks
Packing	Sea worthy wooden crate with interlayer paper or powder.



Tempered Mirror 钢化镜子

The tempered mirror uses high-quality float tempered glass that meets international standards as the substrate,undergoes strict coating process and heat treatment, and can withstand temperatures up to 220 degrees Celsius, making it a safer and stronger safety mirror. Mainly used for high-speed rail, airplanes, glass mirror doors, glass furniture, bars, hotels, gyms, etc.

钢化镜子采用符合国际标准的优质浮法钢化玻璃作为基材，经过严格的镀膜工艺、热处理，耐高温高达 220 摄氏度，是安全强度更高的安全镜。主要用于高铁、飞机、玻璃镜门、玻璃家具、酒吧、酒店、健身房等。

Mirror hot thickness: 4-8mm

Maximum size3660*2440

Colors: ultra white, plain white, brown, blue, etc

镜子热厚度 4-8mm

最大尺寸 3660*2440

颜色：超白、普白、茶色、蓝色等

Tempered glass mirror more safe and durable



The Tempered glass broken into honeycomb shaped small pieces without splashing.



Non -tempered lens Broken block is sharp Easy to cause injuries.



Tempered mirror without black edge HD, long service life.

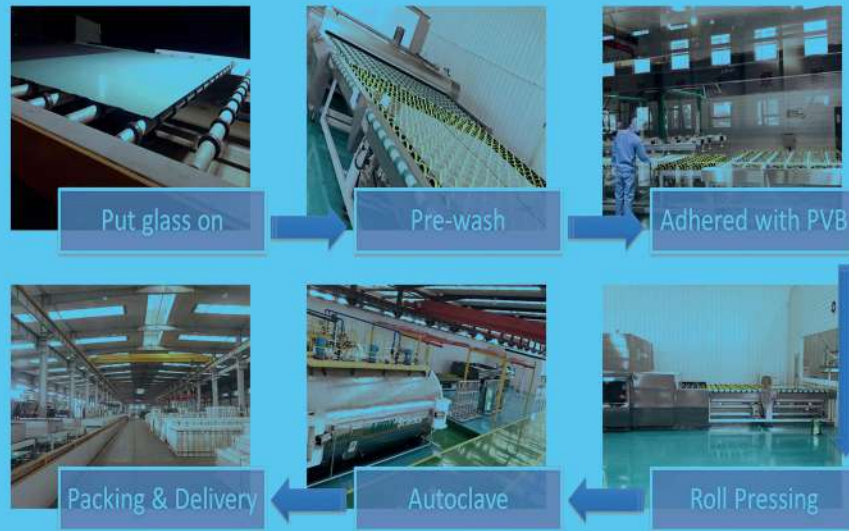


Ordinary glass Easy to oxidize black edges, unclear and short service time.

HEXAD GLASS

Laminated Glass

夹胶玻璃

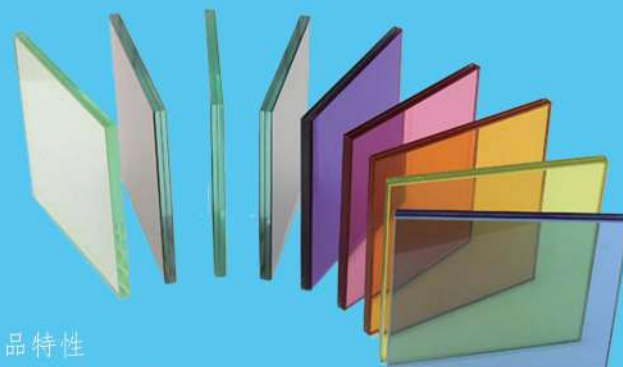


Laminated glass is a kind of high-grade safety glass made of two or more sheets of glass laminated with a polyvinyl (PVB) film based on inter layer through high temperature and high pressure. Even if the glass is broken the fragments will be stuck to the film, which has a great protection effect on the human body and property. It has the characteristics of transparency, high mechanical strength, light resistance, cold resistance, heat resistance, sound insulation and UV protection.

夹层玻璃是一种在两片或多片玻璃之间夹以 PVB 薄膜，经过高温高压制成的高级安全玻璃。玻璃即使碎裂，碎片也会被粘在薄膜上，对人体和财产具有较大的保护作用。具有透明、机械强度高、耐光、耐寒、耐热、隔音和防紫外线特性。

Product Features

- Safety: PVB film has high adhesion, when the glass is impacted by external force, the fragments will be tightly bonded to the film;
- Anti-theft: PVB laminated glass is very tough, even if the glass is cracked, it still maintains its integrity, making it impossible for people to enter the room;
- Explosion-proof: With multiple interlayers, various levels of bulletproof and explosion-proof glass can be manufactured;
- Sound insulation: PVB film has the function of absorbing sound waves which can effectively suppress the transmission of noise;
- UV resistance: PVB film can absorb more than 99% of UV rays;
- Decorative: PVB has excellent transmittance, and different colors of PVB film make laminated glass more beautiful.



产品特性

- 安全性: PVB 膜具有很高的粘结性，玻璃在受到外力冲击时，碎片会和胶膜紧紧粘结；
- 防盗性: PVB 夹层玻璃非常坚韧，即使将玻璃敲裂，仍保持整体性，使人无法进入室内；
- 防爆性: 采用多夹层可制造多种级别的防弹、防爆玻璃
- 隔音性: PVB 薄膜具有对声波的吸收功能，能有效地抑制噪音的传播；
- 防紫外线性能: PVB 薄膜能吸收掉99%以上的紫外线装饰性: PVB 具有优良的透过性，可选用不同颜色的PVB膜，使夹层玻璃更加美观。



Product Specification

Max thickness of flat laminated glass: 32mm
Minimum Size: 100x100mm
Maximum Size: 5900x2200mm
Max thickness of bend laminated glass: 26mm
Minimum Size: 500x500mm
Maximum Size: 3660x2400mm
minimum bending radius: R=450mm

产品规格

平夹胶最大厚度 : 32mm
最小尺寸 : 100x100mm
最大尺寸 : 5900x2200mm
弯夹胶最大厚度 : 26mm
最小尺寸 : 500x500mm
胶最大尺寸 : 3660x2400mm
最小弯曲半径 : R=450mm

应用领域:

广泛应用于采光顶、建筑幕墙、水族馆、高压设备的观测窗、银行的防弹防爆窗等。

Application

Widely used in skylights, building curtain walls, aquariums, observation windows of high-voltage equipment, bulletproof and explosion-proof windows of banks, etc.

HEXAD GLASS

PVB LAMINATED GLASS PVB 夹层玻璃

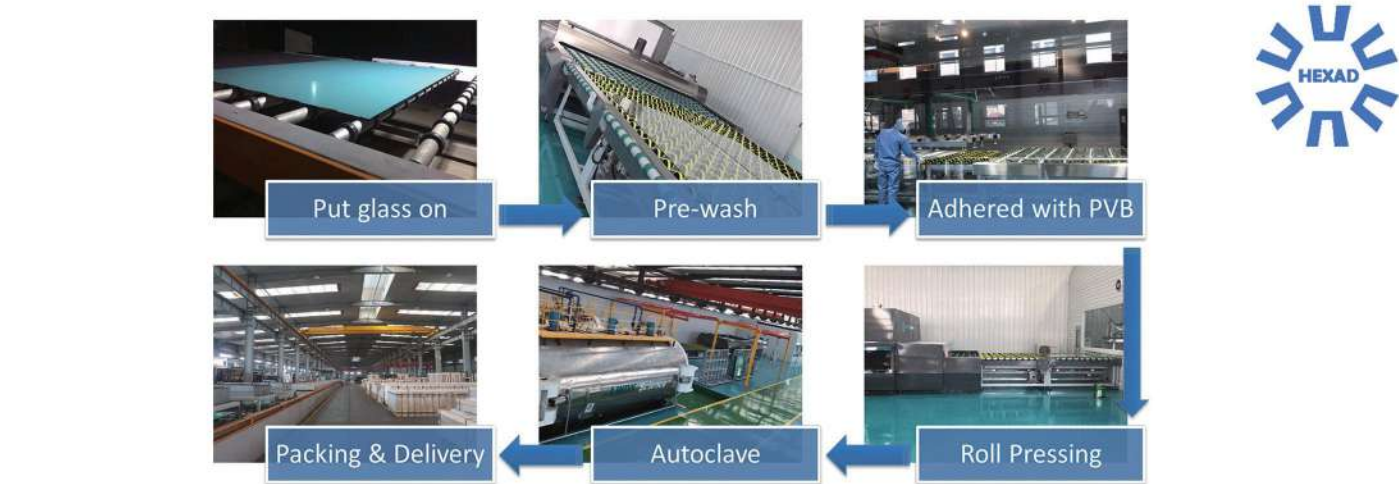
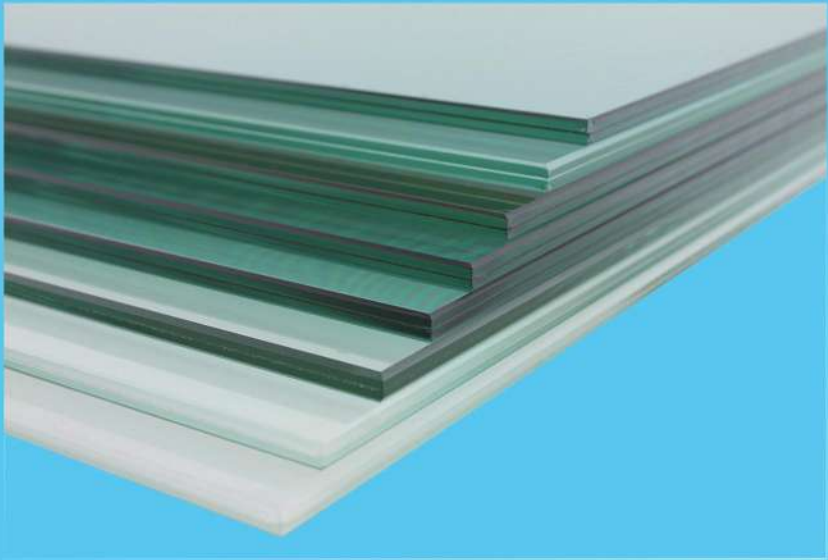
产品特点 | Product Characteristics:

- 1.Safety:No fragments splashed and only cracks after broken
- 2.Noise reduction: PVB film can absorb acoustic wave andreduce noise pollution.
- 3.Resistance of UV:Effectively resist 99% UV light and no lose of VL, and avoid indoor decorations and furniture color fading.
- 4.Bullet resistance:Complex by different thicknesses of PVB and several pieces of glass, could be bullet resistant and some other high strengthened decorative glass.
- 5.Color variety:Any color or design products according to customers' requests.
- 6.Sunshine shielding:Effectively reduce transmit of heat, reduce energy of refrigeration.

- 1、安全性：当遭受外力玻璃破坏，只产生裂痕，但不会碎片飞溅。
- 2、降噪性：PVB膜能有效吸收声波，减低噪音污染。
- 3、防紫外性：在不损失可见光的同时，有效阻隔近99%的紫外线进入，防止室内装饰品及家俱的褪色老化。
- 4、防弹性：通过不同厚度的PVB和数片玻璃的复合，可制成防弹玻璃和一些高强度装饰玻璃。
- 5、色彩多样性：可以根据客户的需求，制作各种色彩或图案的产品，满足设计要求。
- 6、阳光遮蔽性：有效减弱热能的透射，降低制冷能耗。

产品规格 | Product specification

Minimum Size:300x300mm
Maximum Size: 3300x2000mm
最小尺寸 :300x300mm
最大尺寸 :3300x2000mm



性能参数表 | Performance Data

配置 Configuration	可见光 Visible light			太阳总透射比 Total sun power transmission rate		遮阳系数(S.C)		相对热增益 RGT, W/m²	传热系数(U值W/m²·k)Heat transfer coefficient				
	透射比 Tr.	反射比 (室外) Light reflectance (outdoor)	反射比 (室内) Light reflectance (indoor)	中国 JGJ/T151-2008	美国 NFRC100-2004	中国 JGJ/T151-2008	美国 NFRC100-2004	美国 NFRC100-2004	中国 JGJ/T151-2008		美国 NFRC100-2004		欧洲EN673 EU standard EN673
									夏季白天 Day in summer	冬季夜晚 Night in Winter	夏季白天 Day in summer	冬季夜晚 Night in Winter	
3+0.38PVB+3	89	8	8	0.83	0.83	0.95	0.96	645	5.2	5.14	5.19	5.7	5.7
3F镀膜+0.38PVB+3	81	7	7	0.66	0.67	0.76	0.77	526	5.2	5.14	5.19	5.7	5.7
6+0.76PVB+6	86	8	8	0.75	0.75	0.86	0.87	587	5.02	4.95	4.98	5.5	5.4
6F镀膜+0.76PVB+6	72	7	7	0.54	0.56	0.62	0.65	448	5.02	4.95	4.98	5.5	5.4
6蓝+0.76PVB+6	63	6	6	0.58	0.6	0.67	0.69	474	5.02	4.95	4.98	5.5	5.4

隔音性能比较 | Acoustics Performance Comparison

Type	配置 Configure	传声等级(STC)
夹层 Lamination	3+0.76PVB+3	35
	5+0.76PVB+5	36
	6+0.76PVB+6	38
	6+1.52PVB+6	39
	12+1.52PVB+12	41
夹层中空 Laminated Insulation	3+0.38PVB+3+12A+6	38
	5+0.38PVB+5+12A+8	39
	5+0.76PVB+5+12A+8	40
中空 Insulation	6+9A+6	34
	6+12A+6	35
	6+16A+6	35
单片 Single Piece	6	31
	12	36

HEXAD GLASS

LAMINATED GLASS- WITH METAL MESH 金属网夹层玻璃

产品结构 |Product structure:

- 1.Laminated glass with synthetic fabric specially coated with metal coating or metal mesh inside inter layer film; Intense color of metal surface on the outside with visibility and natural daylight from the inside;
- 2.Total comfort inside: solar shading and natural light;
- 3.Different materials allows to achieve different color or image,includes stainless steel,aluminium; bronze,copper, brass,bronze and so on;
- 4.Offers unique aesthetic appeal with greater impact resistance and added security;
- 5.Unlimited design possibilities with combination of different types of glass, fabrics and metal coatings.



- 1. 夹胶玻璃内用不同胶片夹层喷有金属涂层的混合纤维或者金属网；室外面显示强烈的金色色彩，室内面较好的光线采集；
- 2. 舒适的室内光线且有较好的遮阳效果；
- 3. 不同颜色和材质选择：不锈钢网，铝网，茶色网，铜网，黄铜网等；
- 4. 不仅有独一无二的美学外观，而且有较强的防冲击作用提高安全性；
- 5. 与不同玻璃类型，纤维和金属镀层结合，带来无限的设计可能性。



Bulletproof glass 防弹玻璃

产品结构 |Product structure

- 1. Bearing Layer: the first layer to withstand the impact and break, generally using the thickness of large, high-strength glass, can destroy the warhead or change the shape of the warhead, make it lose the ability to continue moving forward.
- 2. Transition layer: generally using organic adhesive materials, strong adhesion, good light resistance, can absorb part of the impact, Impact Energy, change the direction of bullet.
- 3. Safety protection layer: this layer is made of high strength glass or high strength transparent organic material, with good elasticity, flexibility and toughness, can absorb most of the impact energy,and ensure that bullets can not pass through this layer.
- 1. 承力层：该层首先承受冲击而破裂，一般采用厚度大、强度高的玻璃，能破坏弹头或改变弹头形状，使其失去继续前进的能力。
- 2. 过渡层：一般采用有机胶合材料，粘接力强、耐久性好，能吸收部分冲击能，改变子弹前进方向。
- 3. 安全防护层：这一层采用高强度玻璃或高强透明有机材料，有较好的弹性和韧性，能吸收绝大部分冲击能，并保证子弹不能穿过此层。

National standard for Bulletproof Glass Products GB17840-1999

防弹玻璃国家标准 GB17840-1999

适用范围 |Applications

The Bulletproof glass can withstand gunfire and provide maximum protection. In finance, banking, commerce, cultural relics, jewelry stores and security departments and aviation, water and ground military equipment facilities are widely used.

防弹玻璃能抵御枪弹射击，最大限度地保护人身安全。在金融、银行、商业、文物、珠宝店及安防等部门和航空、水上和地面军用装备设施都有 广泛的应用。

生产参数 |Production parameters

1.Product type 产品种类

Composite Bulletproof glass F79B-20-GLIII, F54B-23GLII, F79B-25-GLI 复合型防弹玻璃 F79B-20-GLIII F54B-23GLII F79B -25-GLI

2.Product specification 产品规格

Minimum Size:300×300
Maximum Size:2200×6000
最小规格：300×300 mm
最大规格：2200×6000 mm

3.Specification performance| 规格性能

型号 Type	规格 specification	防弹级别 Bulletproof Level
F54B-23-GLII 型	5mm+0.76PVB+12mm+0.76PVB+5mm	防五四钢芯弹Anti 54 steel core bullets
F79B-25-GLI 型	5mm+1.52PVB+12mm+1.52PVB+5mm	防七九微冲Anti 79 miniature submachine gun
F79B-20-GLIII 型	5mm+0.76PVB+10mm+1.52PU+3mmP	防七九微冲Anti 79 miniature submachine gun





General rules for PVB thickness design of laminated glass 夹层玻璃 PVB 厚度设计选用通则

PVB is one of the most widely used intermediate materials for laminated glass. According to the material characteristics and processing requirements, reasonable selection and use of PVB thickness, the product quality and service life of laminated glass will be greatly affected.

PVB 作为夹层玻璃使用最广泛的中间材料之一，依据材料特性和加工工艺要求，合理的选择和使用 PVB 的厚度，对夹层玻璃的产品质量和使用寿命将产生重要影响。

1.Plain laminated glass

普通平面夹层玻璃

Laminated glass is made of annealed float glass. It does not include Bulletproof glass glass, aquarium glass and laminated glass. Minimum PVB thickness of normal laminated glass.

普通夹层玻璃是指做成夹层玻璃的基片为经退火处理的浮法玻璃，不包括防弹玻璃、水族馆用玻璃及多层夹层玻璃。

Minimum PVB thickness of normal laminated glass:

普通夹层玻璃最小 PVB 厚度：

玻璃种类 Glass Type	基片玻璃厚度(mm) Thickness of glass (mm)	PVB膜厚度 (mm) PVB film thickness (mm)	
		短边≤800mm Short edge ≤ 800mm	短边>800mm Short edge >800mm
普通夹层玻璃Laminate Glass	≤6mm	0.38	0.38
	8mm	0.38	0.76
	10mm	0.76	0.76
	12mm	1.14	1.14
	15mm、19mm	1.52	1.52

2.Tempered and thermally reinforced laminated glass

钢化及热增强平面夹层玻璃

Tempered or semi-tempered (heat-reinforced) laminated glass products, due to the tempering (semi-tempered) process will inevitably produce glass waveform and bow deformation, the gap between the glasses caused by this deformation will be filled by PVB film.

钢化或半钢化（热增强）夹层玻璃产品，由于在钢化（半钢化）过程中会产生不可避免的玻璃波形和弓形变形，这种变形引起的玻璃之间的空隙将由 PVB 膜来填补。

Minimum PVB thickness of flat tempered or semi-tempered (heat-reinforced) laminated glass:

平钢化或半钢化（热增强）夹层玻璃最小 PVB 厚度：

玻璃种类 Glass Type	基片玻璃厚度(mm) Thickness of glass (mm)	PVB膜厚度 (mm) PVB film thickness (mm)		
		短边<800mm Short edge < 800mm	800mm<短边≤1500mm 800mm<Short edge≤1500mm	短边≥1500mm Short edge≥1500mm
平钢化或半钢化(热增强)夹层玻璃 Tempered Laminated Glass	≤6mm	0.76	1.14	1.52
	8~12mm	1.14	1.52	1.52
	≥15mm	1.52	2.28	2.28

3.Bent tempered, bent semi-tempered (heat-reinforced) laminated glass and hot-bent laminated glass

弯钢化、弯半钢化（热增强）夹层玻璃和热弯夹层玻璃

Bending tempered and heat-strengthened glass because the glass itself after heat bending deformation of a certain radian, by the equipment deformation radian precision limit, its coincidence error is far greater than the plane strengthened glass, the internal stress of PVB film needs to be relaxed by PVB after bonding. PVB thickness selection should follow the strict principle.

弯曲钢化、热增强玻璃因玻璃本身经过热弯变形一定的弧度，受设备变形弧度精度限制，其吻合度误差远大于平面强化玻璃，PVB 胶片粘合后内应力需要 PVB 予以松弛。PVB 厚度选用应遵循较严原则。

Minimum PVB thickness of bending tempered, heat-reinforced and heat-bent laminated glass:

弯曲钢化、热增强玻璃、热弯夹层玻璃最小 PVB 厚度：

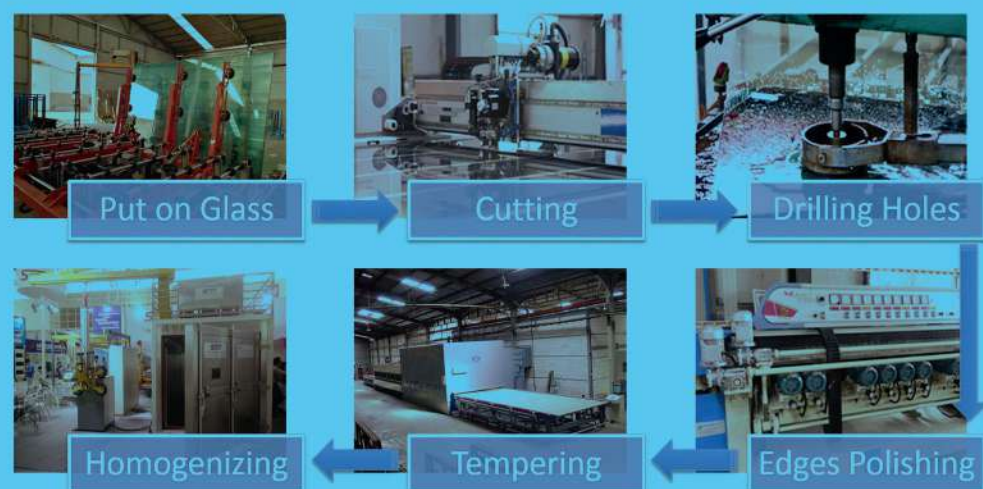
玻璃种类 Glass Type	基片玻璃厚度(mm) Thickness of glass (mm)	PVB膜厚度 (mm) PVB film thickness (mm)	
		曲率半径R>3m	曲率半径R≤3m
弯钢化夹层玻璃 Bent tempered laminated glass	≤8mm	2.28	3.04
	≥10mm	3.04	3.04
热弯玻璃 Hot bent glass	≤6mm	0.76	1.14~1.52
	≥8mm	1.14	1.52

HEXAD GLASS

Tempered Glass

钢化玻璃

Tempered glass is float glass sheet through heating and rapid cooling treatment, so that the glass surface presents uniform stress, and the glass interior presents uniform tensile stress, thus the flexibility of the glass is better, the strength is increased, and the safety is greatly enhanced. It can be widely used in the fields of architecture, automobile, airplane, ship, instrument, instrument and furniture. The surface stress of tempered glass is 69-168MPa.



钢化玻璃是浮法玻璃原片通过加热并急剧冷却处理，使玻璃表面呈现均匀的应压力，玻璃内部呈现均匀的张应力，从而使玻璃的柔性更好，强度增加，安全性能大幅增强。可广泛用于建筑、汽车、飞机、船舶、仪器、仪表及家具等领域。钢化玻璃表面应力为:69-168MPa。

Product Features

Safety: Once the glass is broken, the pieces are in particle shape with obtuse angles so as to protect people from being injured;

High strength: generally 4 times and above the strength of ordinary glass;

Deflection: 3 to 4 times that of ordinary glass. Such as the deflection of glass 6x1200x350mm can reach 100mm. The bending strength of 6mm tempered glass can reach 1700kg/cm²;

Heat stability: The temperature difference that tempered glass can withstand is 2.5 to 3 times that of annealed glass, and the maximum operating temperature is close to 300°

产品特性

安全性: 破裂后呈碎小钝角颗粒，对人体不会造成重大伤害；

高强度: 一般是普通玻璃强度的4倍及以上；**挠度:** 是普通玻璃的3~4倍。如: 6x1200x350 (mm) 的玻璃，其挠度可达100mm。6mm的钢化玻璃其抗弯强度可达 1700kg/cm²；

热稳定性: 良好的热稳定性。钢化玻璃能经受的温差是退火玻璃的 2.5~3倍，最高使用温度则接近 300℃。

Product Specification

Minimum Size: 250x150mm

Maximum Size: 6000x2440mm

Thickness Range: 3.2-19mm

产品规格

最小尺寸: 250x150mm

最大尺寸: 6000x2440mm

厚度范围: 3.2-19mm



HEXAD GLASS

Tempered glass with super large size Flat

超大平钢化玻璃

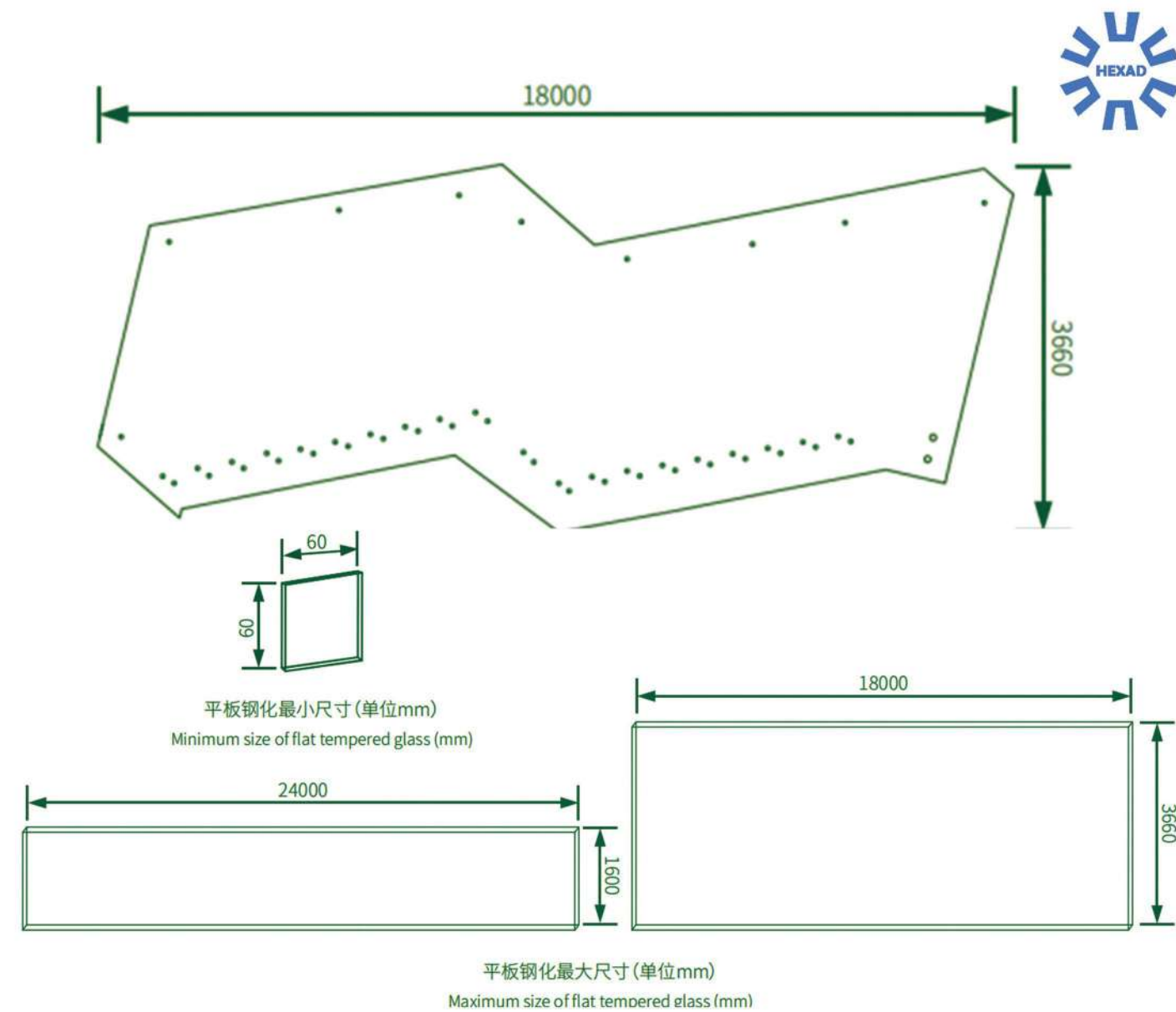
Tempered glass is actually a kind of pre-stressed glass, in order to increase the strength of the glass, usually the method of tempered glass processing is to change the glass arc according to the requirements, and at the same time form a compressive stress on the glass surface, when the glass is subjected to external forces, the surface stress is first offset, thus increasing the carrying capacity and enhancing the glass's own wind pressure, cold and heat resistance, impact and so on. super large size flat tempered glass maximizes the machining dimensions on the basis of normal-sized flat and curved tempered glass, and its performance remains unchanged.

平钢化玻璃其实是一种预应力玻璃,为提高玻璃的强度,通常钢化的方法,在玻璃表面形成压应力,玻璃承受外力时首先抵消表层应力,从而提高了承载能力,增强玻璃自身抗风压性,寒暑性,冲击性等。超大平钢化玻璃在普通平钢化玻璃的基础上将加工尺寸做到最大化,而其性能不变。

复合工艺 Composite processing technology	数码打印 Digital printing glass	平弯钢化 Flat and curved tempered glass	夹层玻璃 Laminated glass	中空玻璃 Insulated glass
可加工最大尺寸 Maximum processing size	平板钢化:3660×18000mm Flat tempered glass:3660×18000mm			
最大负载量 Maximum load	700KG/m ²			
最小U值w/m ² ·°C Minimum U value w/m ² ·°C	0.76			
优势 advantage	结合平弯钢化工艺,将玻璃图案、造型与建筑造型贴合,凸显设计构思。 The glass pattern, shape and building shape are fitted together to highlight the design concept by combining the flat and curved tempered process.	将玻璃尺寸最大化,体现玻璃的通透性和整体性,可做平弯工艺处理。 The permeability and integrity of the glass is reflected by maximizing the size of the glass done by flat and curved tempered glass.	良好安全性能,具有耐震、防盗、防弹、防爆、隔音、通透和美观性能等。 Good safety performance, with shock-resistant, anti-theft, bulletproof, explosion-proof, soundproof, transparent and aesthetic performance.	具有良好的隔热、隔音、美观适用,并可降低建筑物的自重的节能环保材料。 Good thermal insulation, sound insulation, aesthetic application, and can reduce the self-weight of the building energy saving and environmental protection materials.
我们的优势 Our advantages	拥有6年超大玻璃生产经验的专业团队。 With 6 years production experience professional team for over-sized flat and curved tempered glass.			

产品用途 | Product application

品牌形象店、写字楼、高端概念酒店、地标性建筑等。
Brand image stores, office buildings, high end concept hotels, landmark buildings and so on.



可加工工艺 The glass can be further processed by the following processes

单银Low-玻璃 Single silver low-e glass	双银Low-E玻璃 Double silver low-e glass	三银Low-E玻璃 Triple silver low-e glass	数码打印 Digital printing glass
平弯钢化 Flat and curved tempered glass	PVB夹层玻璃 Laminated glass with PVB in the layer	SGP夹层玻璃 Laminated glass with SGP in the layer	中空玻璃 Insulated glass

工程应用案例 迪拜购物中心水族馆 Project Application Case-Dubai Shopping Center Aquarium



HEXAD GLASS

Single curved tempered glass 单曲弯钢化玻璃

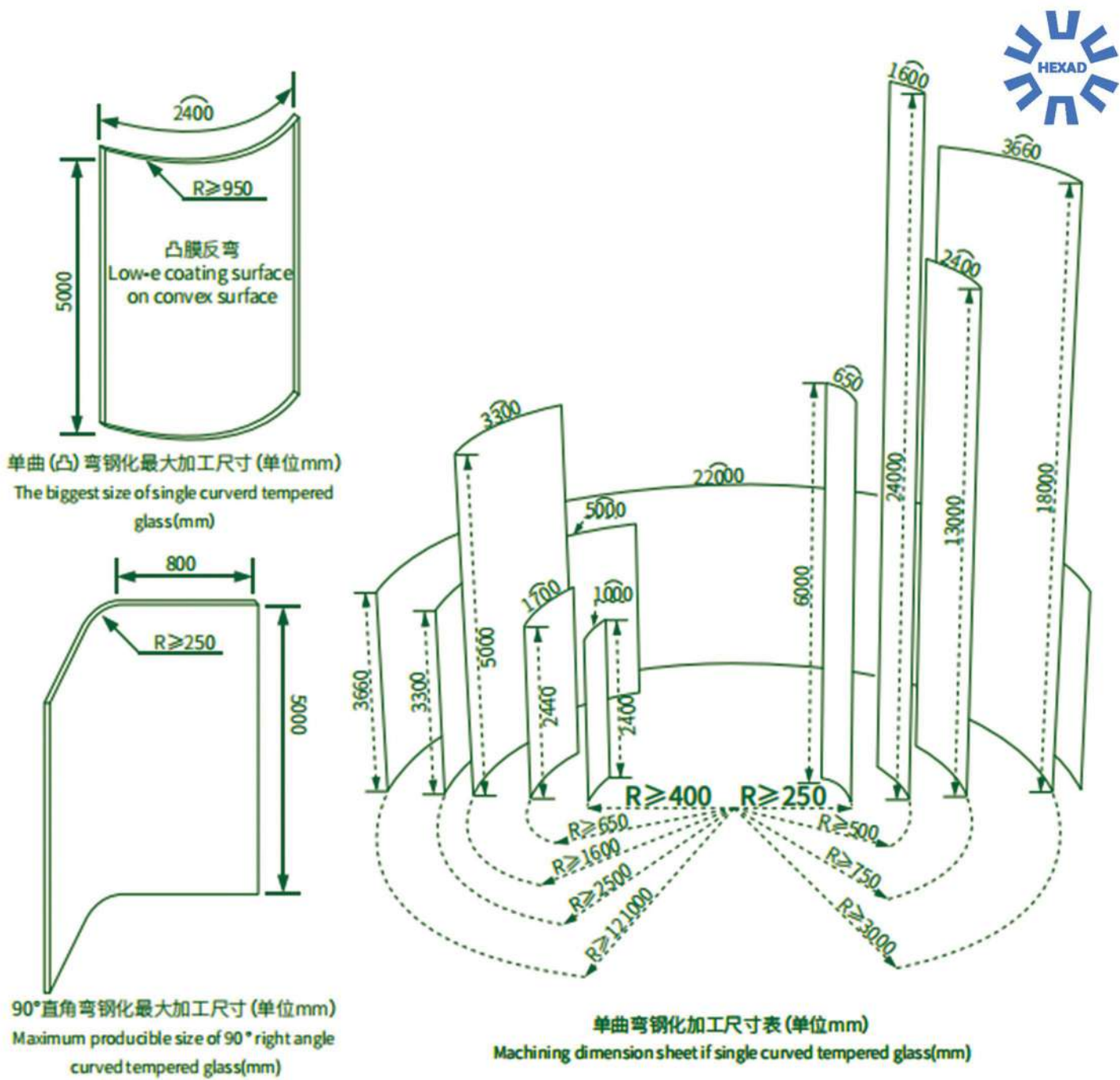
Single curved glass is also a kind of pre-stressed glass, the usual method of tempering is changing the curved radii of the front and back on the basis of the same direction of the glass according to the requirements, thus to better fit the requirements of the design for aesthetic functionality.

单曲弯钢化玻璃也是一种预应力玻璃，通常钢化的方法，按照要求改变玻璃一个方向上正反弯弧度，从而更加贴合设计美观性功能性的要求。

复合工艺 Composite processing technology	 数码打印 Digital printing glass	 平弯钢化 Flat and curved tempered glass	 夹层玻璃 Laminated glass	 中空玻璃 Insulated glass
可加工最大尺寸 Maximum processing size	3660×18000mm			
最大负载量 Maximum load	700KG/m ²			
最小U值w/m ² ·°C Minimum U value w/m ² ·°C	0.76			
优势 advantage	更能将玻璃图案、造型与建筑造型相贴合，凸显设计师的构思理念。 It can better match glass patterns, shapes and architectural shapes to highlight the designer's concept.	单曲弯钢化玻璃，更适合应用于转角处，更具整体性、通透性的优点等。 Single curved tempered glass is more suitable for using at corners, and has the advantages of integrity and transparency.	拥有良好的安全性能，具有耐震、防盗、防弹、防爆、隔音的性能等。 It Has good safety performance, shock-resistant, anti-theft, bulletproof, explosion-proof, soundproof performance, etc.	具有良好的隔热、隔音、美观适用，并可降低建筑物的自重的节能环保材料。 Good thermal insulation, sound insulation, aesthetic application, and can reduce the self-weight of the building energy saving and environmental protection materials.
我们的优势 Our advantages	将单曲玻璃半径做到建筑玻璃的最全面化，展现最靓丽的光学性。 Make the radius of single curved glass the most comprehensive of the architectural glass, showing the most beautiful optical properties.			

产品用途 | Product application

Brand image stores, office buildings, high-end concept hotels, landmark buildings and so on.
品牌形象店、写字楼、高端概念酒店、地标性建筑等。



工程应用案例 —
国家大剧院
Project Application
Case-National
Grand Theatre



HEXAD GLASS

Multi-curved tempered glass 多曲弯钢化玻璃

The multi-curved tempered glass is also a kind of pre-stressed glass.the method of tempering is changing the curved radians of the front and back on the basis of two or more directions of the glass according to the requirements, thus to better fit the requirements of the aesthetic function of the design.

多曲弯钢化玻璃也是一种预应力玻璃，使用钢化的方法，按照要求改变玻璃两个或者两个以上方向上向下的弧度，从而更加贴合设计美观性功能性的要求。

复合工艺 Composite processing technology	 数码打印 Digital printing glass	 平弯钢化 Flat and curved tempered glass	 夹层玻璃 Laminated glass	 中空玻璃 Insulated glass
可加工最大尺寸 Maximum processing size	3300×10000mm			
最大负载量 Maximum load	700KG/m²			
最小U值w/m²·°C Minimum U valuew/m²·°C	0.76			
优势 advantage	更能将玻璃图案、造型与建筑造型相贴合，凸显设计理念。 It can better match glass patterns, shapes and architectural shapes to highlight the design concept.	根据贴合性、玻璃的形状与建筑物相得益彰。 The fit and shape of the glass complement the building.	良好安全性能，具有防震、防盗、防弹、防爆、隔音、通透和美观性能等。 Good safety performance, with shock-resistant, anti-theft, bulletproof, explosion-proof, soundproof, transparent and aesthetic performance and so on.	具有良好的隔热、隔音、美观适用，并可降低建筑物的自重的节能环保材料。 Good thermal insulation, sound insulation, aesthetic application, and can reduce the self-weight of the building energy saving and environmental protection materials.
我们的优势 Our advantages	专注的科技团队，不断构思改进创造新造型，将成型误差控制在±3mm内。 Professional technology team, constantly conceive of improvements to create new designs, and control the tolerance within ± 3mm.			

产品用途 | Product application

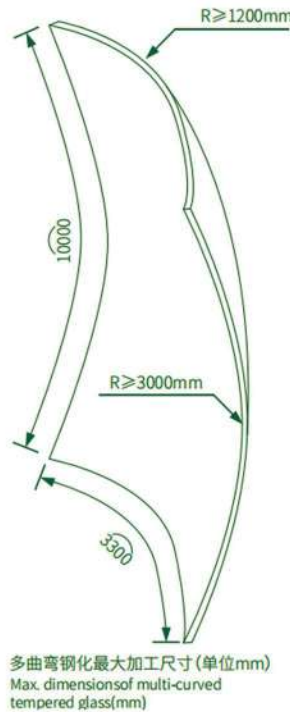
Brand image stores, office buildings, high-end concept hotels, landmark buildings and so on.
品牌形象店、写字楼、高端概念酒店、地标性建筑等。



双S多曲弯钢化
Double S and multi-curved tempered



工程应用案例——江苏启东文体中心
Project Application Case-Jiangsu Qidong culture and Sports Center



多曲弯钢化最大加工尺寸(单位:mm)
Max. dimension of multi-curved tempered glass(mm)



China Ru Porcelain Museum

HEXAD GLASS

Heat strengthened glass 半钢化玻璃

Heat Strengthened Glass, its manufacturing process is similar to the Tempered Glass made by quickly cooling the annealed float glass when it is heated near to its softening point. During the cooling procedure, both the pressure of the cooling air and cooling speed are lower and slower than the Tempered Glass.

Heat strengthened glass is significantly better than ordinary glass in mechanical strength, wind pressure resistance, impact resistance and thermal shock resistance.

半钢化玻璃的生产采用当钢化玻璃类似的工艺方法，只是冷却速度较慢，因此其表面应力略小于钢化玻璃。

半钢化玻璃在机械强度，抗风压性能，抗冲击性能和抗热震性能方面明显优于普通玻璃。

复合工艺 Composite processing technology	 数码打印 Digital printing glass	 平弯钢化 Flat and curved tempered glass	 夹层玻璃 Laminated glass	 中空玻璃 Insulated glass
可加工最大尺寸 Maximum processing size	平板半钢化: 3660×18000mm 单弯半弯钢化 3660×18000mm Flat Heat-strengthened glass: 3660×18000mm Single Curved Heat-strengthened glass 3660×18000mm			
最大负载量 Maximum load	700KG/m ²			
最小U值w/m ² ·°C Minimum U value w/m ² ·°C	0.76			
优势 advantage	将玻璃图案、造型与建筑造型贴合，凸显设计构思。 The glass pattern, shape and building shape are fitted together to highlight the design concept.	将玻璃尺寸最大化，体现玻璃的通透性和整体性，可做平弯工艺处理。 The permeability and integrity of the glass is reflected by maximizing the size of the glass done by flat and curved tempered glass.	良好安全性能，具有防震、防盗、防弹、防爆、隔音、通透和美观性能等。 Good safety performance, with shock-resistant, anti-theft, bulletproof, explosion-proof, soundproof, transparent and aesthetic performance.	具有良好的隔热、隔音、美观适用，并可降低建筑物的自重的节能环保材料。 Good thermal insulation, sound insulation, aesthetic application, and can reduce the self-weight of the building energy saving and environmental protection materials.
我们的优势 Our advantages	展现最佳的影物光学效果。 Shows the best shadow optical effects.			

产品用途 | Product application

Brand image stores, office buildings, high-end concept hotels, landmark buildings and so on.

品牌形象店、写字楼、高端概念酒店、地标性建筑等。

- 产品特征 | Product features
1. Twice the strength of ordinary glass;
 2. It can effectively resist the effect of thermal stress and avoid thermal cracking of glass; Won't be spontaneous breakage,
 3. Better flatness than tempered glass.
- 1、强度为普通玻璃的2倍；
- 2、可以有效地抵抗热应力的作用，避免玻璃的热炸裂；不会自爆；
- 3、相比钢化玻璃具有更好的平整度。



Hot curve glass

热弯玻璃

Thermally bent glass and bent laminated glass it is the glass heated to near the softening point, and through a variety of specific mold glass into a non-planar shape of the product.

Hot curve(bending) glass is to place flat glass on a predetermined mold. Put the mold into the heating furnace, use electric or gas heating, and slowly heat the flat glass to the softening temperature (580~620 degrees). The softened glass will naturally bend along the mold due to its own weight. After the glass is bent, the heating is stopped, and the glass is slowly cooled in the furnace while removing the distortion and deformation generated on the glass surface during the heating process.

热弯玻璃和弯夹层玻璃它是将玻璃加热到接近软化点，并通过种种特定的模具使玻璃成为具有非平面形状的产品。

热弯玻璃是将平板玻璃放置在预定型的模具上。将模具送入加热炉中，使用电气或煤气加热，缓缓将平板玻璃加热至软化温度(580~620度)。软化后的玻璃由于自重的原因会沿着模具自然弯曲。玻璃弯曲后停止加热，在炉内缓慢冷却，同时去除在加热过程中玻璃表面产生的扭曲变形。

产品用途 | Product application

Brand image stores, office buildings, high-end concept hotels, landmark buildings and so on.

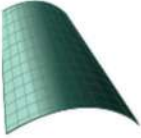
品牌形象店、写字楼、高端概念酒店、地标性建筑等。

产品特征 | Product features

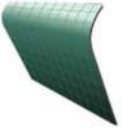
Because the heating and cooling process is very slow, the product has almost no improper distortion or reactive force, and the surface is smooth;. Different curved shapes can be processed, including conical curved surfaces, spherical curved surfaces, S-shaped curved surfaces, U-shaped curved surfaces, straight lines + curved surfaces etc., to meet the architect's aesthetic requirements for architectural curved glass.

因加热、冷却过程十分缓慢，产品几乎无不当扭曲变形及反作用力，表面平整度好；可加工不同弯曲形状，包括锥形曲面，球形曲面，S形曲面，U形曲面，直线+弯曲面等等，满足建筑师对建筑弯曲玻璃的美学要求。

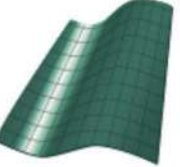
A: 单半径热弯
A: One radius throughout



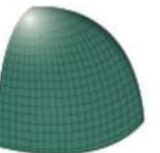
B: 单半径+一边直边延长热弯
B: Lengthened straight on one side



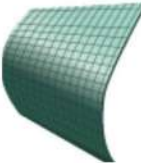
C: S形状热弯
C: S shaped



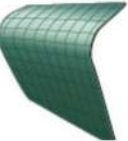
D: 球形热弯
D: Spherical



E: 多半径热弯
E: Different Radii



F: 单半径+双边延长热弯
F: Lengthened straight on two sides



G: 圆锥形热弯
G: Conical



H: Spherical



HEXAD GLASS

Ceramic Frit Glass

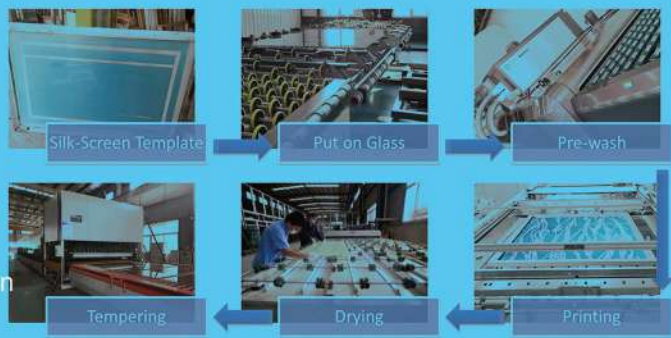
彩釉玻璃

The glass is coated with a layer of inorganic glaze on the surface of float glass through screen printing, roller brush, digital printing, etc. After drying and high-temperature treatment, the glaze is sintered on the glass surface to achieve the expected decorative effect. It is rich with colorization and stunning appearance, have excellent shielding and great thermal control. Patterns can be designed according to customers needs.

彩釉玻璃是在浮法玻璃表面通过丝网印刷、辊刷、数码打印等印刷方法涂制一层无机釉料，经过烘干，高温处理，使釉料烧结在玻璃表面，使玻璃达到预期的装饰效果。彩釉玻璃颜色丰富、色泽亮丽，可根据客户需求另行设计花纹。具有绝佳的遮蔽性和优良的阳光控制作用。

产品特征 |Product features

- 1.High mechanical strength,light resistance, heat resistance. Cold resistance.UV protection. Etc
- 2.Decoration:rich colors and patterns.
- 3.Can be customized according to customer requirements to achieve the desired decorative effect.
- 4.Energy saving: It can absorb and reflect sunlight to a certain extent and has shading effect.



- 1、机械强度高、耐光、耐热、耐寒、防止紫外线等性能；
- 2、装饰：色彩、图案丰富；
- 3、可根据客户要求定制达到预期的装饰效果；
- 4、节能：对阳光有一定的吸收和反射作用，具有遮阳效果。

产品用途 |Product application

Widely used for exterior wall decoration

广泛用于外墙装饰

Product specification

Product Specification
Minimum Size:300x300mm
Maximum Size:6000x2500mm

Other customizad sizas are available
Thickness Range:5-19mm

产品规格

最小尺寸：2100x1500mm
最大尺寸：3660x2740mm
还提供其他定制尺寸
厚度范围：1.6-12mm



Digital printing glass 数码打印玻璃

Digital printing glass is made by spraying nano-level ceramic ink onto the glass surface through the equipment, and to make the ink super attached to the glass through the high-temperature toughening process to achieve the designer's design requirements. Its characteristics are easy to achieve any pattern, design and unlimited color range, the pattern has super durability and precision.

数码打印玻璃就是将纳米级陶瓷油墨通过设备喷绘到玻璃表面，并通过高温钢化工艺使之超强附着到玻璃上，来实现设计师对图案设计的要求。其特点易于实现任何图案、设计及无局限的色彩范围，图案具有超强的持久性和精准性。

复合工艺 Composite processing technology	数码打印 Digital printing glass	平弯钢化 Flat and curved tempered glass	夹层玻璃 Laminated glass	中空玻璃 Insulated glass
可加工最大尺寸 Maximum processing size	平板钢化:3660×18000mm 单弯钢化:3660×18000mm Flat tempered glass:3660×18000mm Single-curved tempered glass :3660×18000mm			
最大负载量 Maximum load	700KG/m²			
最小U值w/m²·°C Minimum U valuew/m²·°C	0.76			
优势 advantage	色彩艳丽，耐腐蚀，耐刮擦，室外20年不褪色，钢化后可做复合工艺产品。 Beautiful in Colors, corrosion resistance, scratch resistance, 20 years non-fading outdoors, can be further processing after tempering .	图案根据玻璃形状改变,使得图案更具立体之美,融入建筑内,凸显设计之美。 The pattern changes according to the shape of the glass, which making the pattern more three-dimensional beauty, integrated into the building, highlighting the beauty of the design.	应用到室内外,具有装饰性、安全性能等。 Applied indoor and outdoor, with decorative, safety performance and so on.	数码打印结合中空应用到外墙,节能效果更好,同时,装饰性更强。 IGU glass with digital printing applied to external wall for better energy saving effect and stronger decoration.
我们的优势 Our advantages	DIP TECH最新打印设备,进口陶瓷油墨;专业设计团队,用美妙的图案满足设计构思,将造型与建筑相结合;稳定的生产团队,多种复合玻璃的再加工。 DIP TECH updated printing equipment, imported ceramic ink; Professional design team, with wonderful patterns to meet the design ideas, combining modeling with architecture; Stable production team, a variety of composite glass further reprocessing.			

产品用途 |Product application

Brand image stores, office buildings, high-end concept hotels, landmark buildings, glass sky-way ,shower rooms, indoor partitions, commodity propaganda walls, churches, etc..

品牌形象店、写字楼、高端概念酒店、地标性建筑、玻璃栈道、淋浴房、室内隔断、商品宣传墙、教堂等

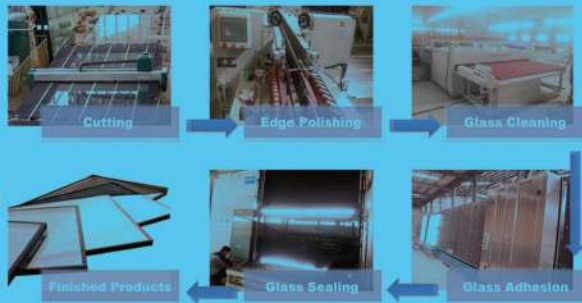


HEXAD GLASS

Insulating glass

中空玻璃

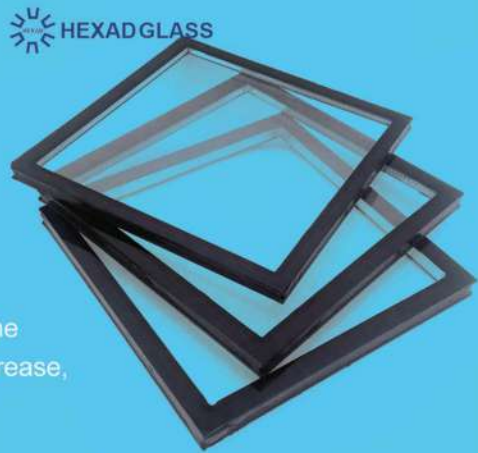
Insulating glass is a kind of new building material with good heat insulation, sound insulation, beautiful application and can reduce the self-weight of buildings, the high-performance sound-insulating and heat-insulating glass is made by bonding the glass sheet with the aluminum alloy frame containing desiccant. The main materials are glass, aluminum spacer, corner joint, butyl rubber, silicone sealant, desiccant.



中空玻璃是一种良好的隔热、隔音、美观适用、可降低建筑物自重的新型建筑材料，是以两片或多片玻璃使用高强度、高气密性复合粘结剂，将玻璃片与内含干燥剂的铝合金框架粘结，制成的高效能隔音隔热玻璃。其主要材料是玻璃、铝间隔条、插角接头、丁基胶、硅酮密封胶、干燥剂。

产品特点 |Product features

- 1.heat insulation, heat preservation: insulating glass sealed state with very low thermal conductivity and heat transfer coefficient, so that the whole glass products have good heat preservation performance, to create a comfortable living environment;
- 2.sound insulation: insulating glass has a good sound insulation effect, up to 30 decibels or more;
- 3.anti-condensation: because the insulating glass inside the existence of water molecules can adsorb the desiccant, the gas is dry, in the temperature drop, at the same time, the dew point on the outer surface of the insulating glass will also increase, and the dew point will be lower than -40 ° C to prevent the indoor and outdoor temperature difference from dewing
- 4.Improving the strength of anti-wind pressure: the curtain wall mainly bears the wind load, the anti-wind pressure becomes the main index of the curtain wall. The strength of insulating glass is 1.5 times as strong as that of single glass.
- 5.glass is not easy to self-explode: the production method of insulating glass is bonding method, which is cold processing, glass is not easy to self-explosion;
- 6.decoration: insulating glass can be composite coating, laminated, colored glaze and other varieties of glass, with good decorative effect.



- 1、隔热、保温：中空玻璃密封状态下具有很低的导热和传热系数，使整个玻璃制品具有良好的保温性能，创造一个舒适的居住环境；
- 2、隔音：中空玻璃具有良好的隔音效果，达 30 分贝以上；
- 3、防结露：由于中空玻璃内部存在着可以吸附水分子的干燥剂，气体是干燥的，在温度降低时，中空玻璃的内部也不会产生凝露的现象，同时，在中空玻璃的外表面结露点也会升高，露点低于 -40℃，防止室内外温差导致结露；
- 4、抗风压强度提高：幕墙主要承受风荷载，抗风压成为幕墙的主要指标。中空玻璃的抗风压强度是单片玻璃的 1.5 倍；
- 5、玻璃不易自爆：中空玻璃生产方法为粘结法，为冷加工，玻璃原片内应力不改变，四周以弹性材料密封，玻璃不易自爆；
- 6、装饰：中空玻璃可以复合镀膜、夹层、彩釉等其他品种玻璃，具有良好的装饰效果。



产品用途 |Product application

It can be used for doors and windows of high-grade buildings, ceilings schools, hospitals, stadiums, TV and radio recording rooms that need sound insulation, and can also be used in the fields of refrigeration appliances, aircraft, ships ,locomotives, etc.

可用于高档建筑物的门窗、天棚、需要隔音的学校、医院、体育场馆、电视及广播录音室等场所，也可应用于制冷电器、飞机、船舶、机车等领域。



产品规格 |Product specification

Minimum Size:300x300mm
Maximum Size:6000x2500mm
Other customizad sizas are available
Thickness Range:5-19mm

最小尺寸：2100x1500mm
最大尺寸：3660x2740mm
还提供其他定制尺寸
厚度范围：1.6-12mm

产品配置	可见光%			太阳光%		太阳热 获得系 数 SHGC	遮阳系 数 SC	NFRC 美国U值W/(m²·K)		欧洲U值 W/(m²·K) EN 673
	透射比	反射比 (外侧)	反射比 (内侧)	透射比	反射比 (外侧)			夏季	冬季	
6YNE0175(2#)+12A+6	67	11	12	34	30	0.4	0.46	1.64	0.69	1.6
*6YNE0175(2#)+12A+6YEA(4#)	62	12	15	32	31	0.37	0.43	1.24	0.34	1.4
6YNE0175(2#)+12Ar+6	67	11	12	34	30	0.39	0.45	1.37	1.44	1.4
*6YNE0175(2#)+12Ar+6YEA(4#)	62	12	15	32	31	0.37	0.43	1.07	1.17	1.2
6YTE0170(2#)+12A+6	62	11	13	26	36	0.3	0.35	1.58	1.64	1.6
6YNE0152(2#)+12A+6	46	15	17	21	31	0.26	0.3	1.6	1.65	1.6
*6YNE0152(2#)+12A+6YEA(4#)	42	15	18	19	31	0.25	0.28	1.21	1.32	1.4
6YNE0175(2#)+16Ar+6YNE0175(4#)+16Ar+6YEA(6#)	46	13	17	20	32	0.29	0.33	0.68	0.75	0.7

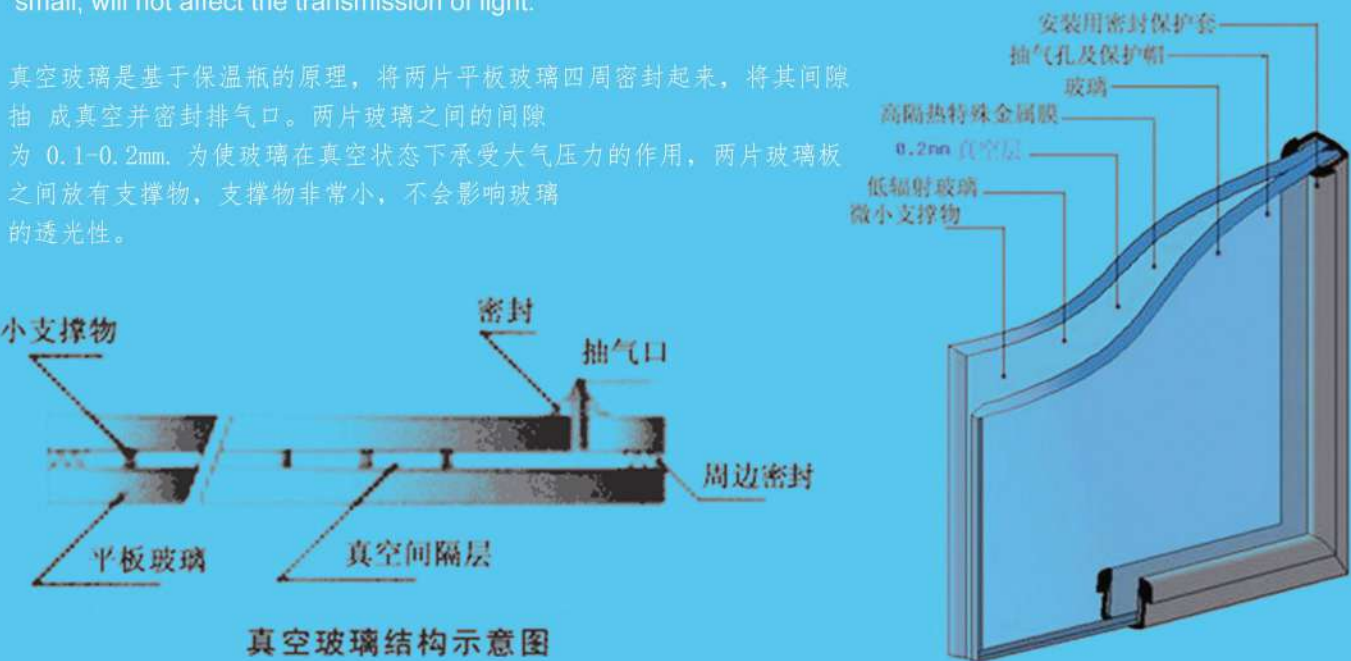
HEXAD GLASS

Vacuum glass

真空玻璃

Vacuum glass is based on the principle of the thermos bottle, the two pieces of flat glass around the sealing up, its gap into a vacuum and seal the vent. The gap between the two pieces of glass is 0.1-0.2 mm. In order to make the glass bear the effect of atmospheric pressure in vacuum, a support is placed between two glass plates, the support is very small, will not affect the transmission of light.

真空玻璃是基于保温瓶的原理，将两片平板玻璃四周密封起来，将其间隙抽成真空并密封排气口。两片玻璃之间的间隙为 0.1-0.2mm。为使玻璃在真空状态下承受大气压力的作用，两片玻璃板之间放有支撑物，支撑物非常小，不会影响玻璃的透光性。



与中空对比Comparison with the structure of insulating glass

项目Items	间隙层 Gap	空隙尺寸 Gapsize	四周密封方式 Sealing method	总厚度 Thickness
真空玻璃Vacuum glass	真空vacuum	0.1-0.2	玻璃密封 Glass sealing	几乎为两片玻璃的厚度 最薄 6mm
中空玻璃Insulating glass	空气或氩气 Air&Ar	6-18	铝合金框加树脂胶粘剂 Aluminum alloy frame with resin adhesive	最薄 12mm Thinnest 12mm



Anti-glare glass

镜框玻璃、防眩目玻璃

Anti-glare glass,also known as non reflective glass or anti-reflection glass, Made by etching or coating one or both surfaces of glass, providing a uniform surface for high-resolution applications. so as to improve the visual angle of screen, reduce interference from ambient light, reduce the reflective screen.

防眩光玻璃，又称无反射玻璃或抗反射玻璃，通过在玻璃的一个或两个表面上进行酸蚀或涂层而制造的，为高分辨率应用提供均匀的表面，从而提高屏幕的视觉角度，减少周围光线的干扰，减少反射屏幕。

产品特征 |Product features

- 1.Reduce reflection .
 - 2.Clear And Soft performance .
 - 3.Visible light transmittance greater than 88% .
 - 4. Visible light Reflected less than 1% Anti glare glass can lower the influence of surrounding light, improve the visible range and light level of monitor,and reduce the reflectance. In this way, the images become clearer, more colorful, and better saturation.
 - 5.Low reflection, high resolution, superior durability and anti-newton ring. Can be heat tempered, laminated or chemical strengthened. Does not become highly reflective as a result of oily fingerprints like anti-reflective coated glass or untreated surfaces .
1. 减少反射
2. 清晰柔和的性能
3. 可见光透射率大于 88%
4. 可见光反射小于 1%防眩光玻璃可以降低周围光的影响，提高监视器的可视范围和光照度，并降低反射率。这样，图像变得清晰，色彩更丰富，饱和度更好。
5. 低反射、高分辨率、优越的耐用性和抗牛顿环、可钢化、层压或化学强化、不会因油性指纹（如防反射涂层玻璃或未经处理的表面）而变成高反射。



HEXAD GLASS

Anti-reflection Glass

减反射玻璃

Anti-reflection glass (Anti-Reflection glass), also known as Anti-Reflection glass, its main function is to reduce or eliminate the reflection of the glass surface, improve the transmittance of glass. The principle is that multi-layer optical film is plated on the glass surface to cancel the interference of reflected light, so that the glass has excellent visual perspective effect. When observing the object through the glass, the influence of reflection glare can be eliminated to the maximum extent, so that the object looks clearer and the color is fuller. Early antireflection glasses were mainly used in optical lenses for cameras and microscopes, at present, anti-reflection glass is widely used in high-end display windows, museum display case glass, airport tower glass, viewing room glass, picture frame glass, etc. .

减反射玻璃 (Anti-Reflection), 亦称增透膜玻璃, 它的主要功能是减少或消除玻璃表面的反射光, 提升玻璃的透光率。其原理是在玻璃表面镀多层光学膜使反射光干涉相消, 从而使玻璃具有出色的视觉透视效果。透过玻璃观察物体时可最大限度地消除反射眩光的影响, 使物体看上去更清晰、色泽更丰满。早期减反射玻璃主要应用于照相机及显微镜的光学镜头, 目前大面积的减反射玻璃多用于高端陈列橱窗、博物馆展示柜玻璃、机场塔台玻璃、观景厅玻璃、画框玻璃等需消除玻璃反射眩光影响的领域。

产品用途 |Product application

High-definition display environment, such as the use of products require a high degree of clarity, rich color, clear hierarchy, eye-catching. For example, watch TV to see high-definition 4K, picture quality to clear, color to rich color dynamic, reduce color loss or color differences can reach the place, such as museum cabinets, displays; In the field of optical instruments, telescopes, digital cameras, medical apparatus and equipment; machine vision includes image processing, optical imaging, sensors, analog and digital video screen technology, computer technology, etc. , there are exhibition glass, watches and so on.

高清显示环境, 如产品的使用要求高度清晰、富有色彩、层次清晰、吸引眼球。比如, 看电视想要看高清 4K, 画质要清晰, 颜色要富有色彩动态, 减少色彩损失或者色差目所能及的地方, 如博物馆的展柜、陈列; 光学仪器领域的望远镜、数码相机、医疗器械设备; 机器视觉包括的图像处理、光学成像、传感器、模拟与数字视屏技术、计算机技术等, 还有画展玻璃、手表等等□。

产品参数 |Optical Parameters

产品Product	透光率 (%)Light Transmittance	反射率 (%)Refle ctivity	显色指数 (%)Colo r Renderi ng Index	紫外透过率 (%)UV Transmittance
3.2mm双面减反射玻璃3.2mm Double Side AR Glass	98.7	0.9	≥99.5	50.10
6mm单面减反射玻璃6mm Single Side AR Glass	94.5	5	≥99.5	56.6



产品特征 |Product features

- 1.The highest peak visible light transmittance is 99%
The average transmittance of visible light exceeds 95%, significantly improving the original brightness of LCD and PDP, and reducing energy consumption.
2. An average reflectivity of less than 4% and a minimum reflectivity of less than 0.5% can effectively reduce the whitening of the image caused by the bright light behind it and enjoy a clearer image quality
3. The color is more bright, the contrast is stronger makes the image color contrast is stronger, the scenery is clearer.
- 4, anti-uv, effective protection of the eye UV spectral transmittance greatly reduced, can effectively block the UV damage to the eye.
5. High temperature resistant AR glass can resist temperature > 500 °C (general acrylic can only resist temperature 80 °C) , in addition, AR glass is almost negligible in hot and cold deformation, suitable for all kinds of environments; at the same time, AR Glass has glass, the appearance is more beautiful.
6. The hardness of AR glass film with strong anti-scraping and abrasion resistance is equal to that of glass, more than 7h, (the hardness of PC board is about 2H to 3h) .
- 7, can withstand all kinds of detergent cleaning acid, alkali cleaning agent wipe, film is not damaged.
8. The impact resistance of glass with thickness of 3mm is equal to that of 6mm acrylic.
9. Keep the angle of view. Generally, the angle of view of acrylic will decrease after installation, while the angle of view of AR glass will not decrease.
- 10.The surface smoothness of appearance AR glass is much better than coating acrylic, and the larger the size, the more obvious the difference.



Anti-reflection frame glass Ultra white frame glass



Anti-reflection frame glass Ultra white frame glass

- 1、可见光透过率最高峰值 99%
可见光平均透过率超过 95%, 大幅提高 LCD、PDP 原有亮度, 降低了能耗。
 - 2、平均反射率低于 4%, 最低值小于 0.5%
可有效削弱因背后强光导致画面变白之缺憾, 享受更清晰的影像画质。
 - 3、色彩更艳丽、对比更强
使图像色彩对比更强烈, 景物更清晰。
- 4、抗紫外线, 有效保护眼睛紫外线光谱区透过率大幅降低, 可有效阻绝紫外线对眼睛的伤害。
 - 5、耐高温, AR 玻璃耐温 >500 度 (一般压克力只能耐温 80 度), 另外 AR 玻璃冷热变形几乎可以忽略不计, 适用于各类环境; 同时, AR 玻璃具有琉璃感, 外观更漂亮。
 - 6、具有较强防刮耐磨性, AR 玻璃膜层硬度与玻璃相当, 大于 7H, (一般 PC 板硬度约为 2H 至 3H)。
 - 7、可耐各种清洁剂清洗, 耐酸、碱清洗剂之擦拭, 膜层不受损坏。
 - 8、抗冲击性强, 3mm 厚度玻璃的冲击性能相当于 6mm 压克力。
 - 9、保持视角, 一般压克力在安装后, 视角会变小; 而 AR 玻璃装上后, 视角不会变小。
 - 10、外观
AR 玻璃表面平整度远远优于镀膜压克力, 并且尺寸越大, 相差越明显。

HEXAD GLASS

Energy-Saving Glass

节能玻璃



High Transmittance Float Glass 高透玻璃

High transmittance float glass is a kind of high quality float glass with visible light transmittance ratio higher than 91% and visible light absorption ratio lower than 1%, containing a special anti-UV factor.

Portfolio of high permeability glass is the first choice for energy-saving in cold areas. High transmittance glass pursue maximum light transmission. It has visible light transmittance ratio higher than 91%, and visible light absorption ratio under 1%, compared to that of ordinary float glass of 5%.

Let more visible light stay in the room so that electric lighting can be reduced to achieve energy saving target. High transmittance glass has high total solar infrared energy transmittance which means more solar heat could pass into the room and thus increase room temperature. If used in long cold winter or cold areas, high transmittance glass will reduce heating cost and energy consumption.

High transmission glass can block at least 30% of ultraviolet passing into the room, compared to the traditional ultra-clear glass which could not filter out UV.

The product contains very low amount of impurity particles such as nickel sulfide and elemental silicon. Its tempered product has a very low explosive rate of less than 2/10,000 (for normal tempered glass, it is higher than 3/1,000).

If applied in large-area of curtain walls, it will greatly enhance the building safety and reduce maintenance costs.

产品名称	K值	遮阳系数Sc	太阳能总透射比SHGC	太阳红外热辐射透射比g	可见光透射比%	可见光透射比(前)%	太阳直接透射比	紫外线透射比
5mm高透玻璃	5.39	1.03	0.90	0.90	91	8	0.89	0.54
5mm高透+12A+5mm高透(空气)	2.68	0.94	0.82	0.82	83	15	0.8	0.41
5mm高透+12A+5mmLXTB180(空气)	1.81	0.76	0.66	0.48	72	12	0.51	0.33
5mm高透+12A+5mmLXTB180(氩气)	1.56	0.77	0.67	0.49	72	12	0.51	0.33
5mm高透+12A+5mm水晶蓝(空气)	2.17	0.86	0.75	0.72	74	18	0.64	0.37
5mm高透+12A+5mm水晶蓝(氩气)	1.96	0.86	0.75	0.73	74	18	0.64	0.37
5mm高透+12A+5mm高透+12A+5mmLXTB180(空气)	1.3	0.71	0.62	0.46	67	19	0.47	0.27
5mm高透+12A+5mm高透+12A+5mmLXTB180(氩气)	1.11	0.72	0.62	0.47	67	19	0.47	0.27

高透玻璃是可见光透射比 $\geq 91\%$ 、可见光吸收比 $\leq 1\%$ 、含有特殊抗紫外线因子、精细控制玻璃原料组成和生产工艺，制造的高质量浮法玻璃。

高透玻璃的产品组合是严寒、寒冷地区建筑节能的必选。质本洁来还洁去，纯净通透、无瑕疵是玻璃的天然本质。CNG高透玻璃本着回归的理念，追求玻璃透光的极致。高透玻璃可见光吸收比不到1%，相比于普通浮法玻璃可见光吸收比约5%，高透玻璃将对光的吸收降低了80%，以晶莹剔透的质感和透光性能优异的内涵，诠释了玻璃“高透节能”和“天然采光”的品质。

可见光是大自然恩赐给人类的宝贵能源，让更多的可见光留在室内，留给照明，可以缩短电力照明时间，节电是重要的节能指标之一；高透玻璃的太阳红外热能总透射比高，对太阳热吸收少，意味着有更多的太阳辐射热进入室内，可使房间温度升高，在冬季漫长的严寒和寒冷地区应用，能够降低采暖负荷，节能并省钱。

由于含有特殊的抗紫外线因子，高透玻璃可降低50%以上的紫外线进入室内，解决了超白玻璃不阻挡紫外线的问题。得益于特殊的生产工艺，硫化镍、单质硅等杂质颗粒的含量极低，高透钢化玻璃的自爆率小于万分之二（普通钢化玻璃自爆率高于千分之三），应用于大面积玻璃幕墙，可使幕墙安全性得到极大提升，并可减少建筑物的维护费用。

HEXAD GLASS

Insulating Glass 保温玻璃

Thermal insulation glass is mainly used in severe cold weather. It adopts a special coating technology with several coating layers combined as a "quilt" on the glass surface which retain indoor heat. It feels warm inside the house even in freezing winter.

Energy efficiency parameters: visible light transmittance, heat transfer coefficient K, and solar infrared heat transmittance GIR. Visible light transmittance should be high to ensure sufficient natural lighting and comfort. The lower K value, the better heat insulation function; GIR value should be high so that solar radiation could pass into the building even at low solar altitude in winter.

采用特有的镀膜工艺，为玻璃附着数层牢固耐用、融合一体的“棉被”，使得室内采暖设备、人体等低温热体发出的热量不再象普通玻璃那样被“流”到室外。寒冷的冬季，室外滴水成冰，室内温暖如春。
本系列玻璃典型的节能指标：可见光透射比、传热系数K、太阳红外热能总透射比 gir。可见光透射比要高，可见光是宝贵的采光能源，我们希望高透，享受天然采光的舒适；K值越低保温功能越好；gir值要高，严寒和寒冷地区，冬季太阳高度角小，渴望太阳辐射热更多的进入室内，身居室内即可感受阳光的亲切和温暖，玻璃成为人与自然和谐相拥的“煤桥”。

玻璃结构	K W/m ² ·k	可见光 透射比%	可见光 反射比%	太阳红外热 能总透射比	建筑节能率
5mm白玻+9A+5mmLXTB180+真空+5mm白玻	0.63	65	18.00	30.00	0.9
5mm高透LXTB180+15Ar+5mm高透LXTB180+15Ar+5mm高透	0.82	60	14	27	
5mmLXTB180+15Ar+5mmLXTB180+15Ar+在线LOW-E	0.74	50	14	21	
5mm高透+12A+5mm高透+5mmLXTB180	1.3	67	19	46	0.75
5mm高透+12Ar+5mmLXTB180	1.56	72	12	67	
6mm白玻+12Ar+6mm在线LOW-E	1.69	71	16	70	
5mmLXTB180+12A+5mm在线LOW-E	1.51	63	12	30	
5mm高透+12A+5mmLXTB180	1.81	72	12	48	0.65
6mm白玻+12A+6mm在线Low-E	1.93	72	15.00	64.00	



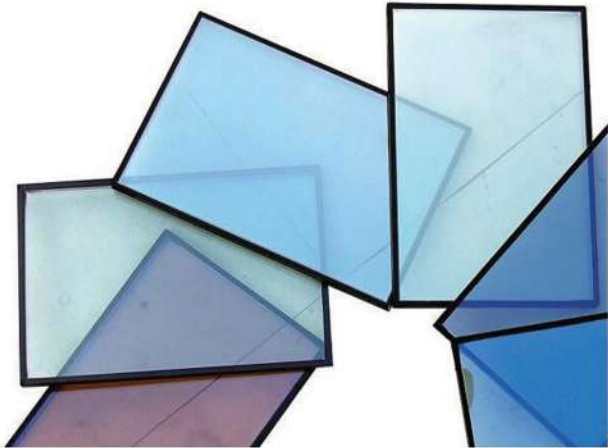
Soundroof Glass 隔音玻璃

Soundproof glass is used for sound insulation. As noise pollution becomes a growing concern in cities with busy transportation and expanding construction, there is an increasing demand for the type of glass to protect people from the considerable stress that it causes.

Noise comes from vibration which is spread through ground and air. Windows are the main medium for noise to travel. Our soundproof products incorporate specially coated glass into windows which can filter out medium and high frequency sound, saving a quiet and peaceful indoor environment for inhabitants. The product has thermal insulation and sunshade effect, and achieves energy efficiency by reducing indoor-to-outdoors heat exchange.

Parameters: sound insulation(measured in db value; higher db value means low noise level), heat transfer coefficient K, visible light transmittance, total solar infrared energy transmittance gIR.

玻璃结构	综合隔声量	K w/m ² ·k	可见光透射比 %	太阳红外热能总透射比 gir %	适合范围
5mmLXTB180+12A+5mm白玻	35	1.8	72.00	34.00	学区
6mmLXTB II 167+12A+6mm白玻	35	1.7	61	13	
(5mm白玻+0.76+5mm白玻)+12A+5mmLXTB180	40	1.78	70	38	老人生活房
5mm白玻+9A+5mmLXTB180+0.16v+5mm白玻	37	0.63	65	30	机场房/办公房



隔音玻璃是对外界噪音具有较好屏蔽效果的功能玻璃。噪音污染日趋严重，交通、高音喇叭、建筑装修、熙熙攘攘人流等噪音让人烦恼。孩子们学习需要安静，老人们睡眠需要安静，忙碌工作的人们也渴望安静的环境。
□室外各种噪音是由振动产生，并通过地面和空气介质传播，玻璃窗是传递噪音的“主要祸首”。隔音玻璃的诞生，解除了人们的困扰，还一个安宁的世界。该产品是将镀有功能膜的玻璃，通过特殊的设计和结构配置，做成建筑窗，将室外各种声源产生振动发出的噪音逐次衰减，有效地滤除中、高频噪音，使得进入室内的只有少量低频音，居室一下子安静柔和、舒适多了，身处闹市，体验古人“结庐在人境，而无车马喧”的意境。
采用我公司的中空、中空夹胶、中空复合真空玻璃产品制成的隔音玻璃，同时还具有保温遮阳性能，可以减少房间里冬季的暖气、夏季的冷气与外界环境的热交换，从而达到节能的效果。
这款系列玻璃典型指标：隔声量、传热系数K、可见光透射比、太阳红外热能总透射比 gIR。□隔声量表示对空气声的隔绝能力，单位 dB，该值越大，表示进入室内的噪声越小。

HEXAD GLASS

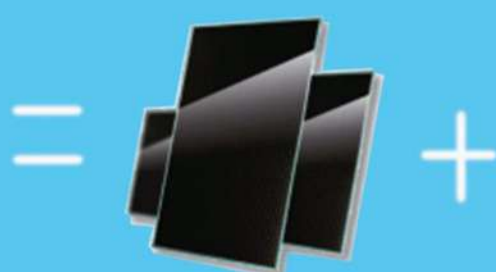
Building Integrated Photovoltaic Glass BIPV 玻璃

BIPV (Building Integrated Photovoltaics) is a technology that integrates solar power generation into buildings. BIPV glass incorporates photovoltaic power generation into glass products that serve as building envelope structures, allowing windows and curtain wall glass to provide both energy-saving and energy-generating functions..

BIPV 是一种将太阳能发电集成到建筑上的技术。BIPV 玻璃即在承担建筑围护结构功能的玻璃产品上植入光伏发电功能，使门窗幕墙玻璃兼具节能和造能效果的玻璃。BIPV 是一种将太阳能发电集成到建筑上的技术。BIPV 玻璃即在承担建筑围护结构功能的玻璃产品上植入光伏发电功能，使门窗幕墙玻璃兼具节能和造能效果的玻璃。



BIPV GLss



Thin film battery chip



Low E Glass

Product Features

Safety: Made with safety glass to meet building safety requirements.

Energy Efficiency: Perfectly combined with Low-E glass to meet stricter building energy-saving standards.

Light Transmission: Capable of producing products with various light transmittance levels to meet the different light transmission needs of building windows and curtain walls.

Decorative Effect: Can achieve rich decorative effects using processing methods such as Low-E coating, dielectric films, and ceramic frit.

Energy Generation: Capable of converting solar energy into electrical energy, meeting the requirements for green building materials.

产品特征

安全性：采用安全玻璃制备，满足建筑安全性的要求

节能性：与 Low-E 玻璃完美结合，满足更严格的建筑节能要求。

透光性：可生产制造各种透光率的产品，满足建筑门窗幕墙不同的透光性需求

装饰性：可用 Low-E、介质膜、彩釉等加工方式达到丰富的装饰效果

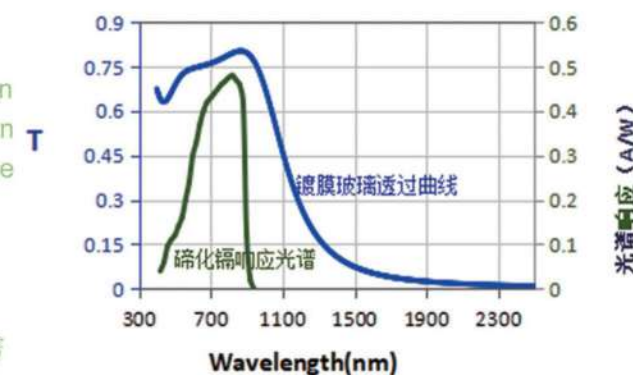
造能性：具有将太阳能转换成电能的功能，满足绿色建材要求

PERFORMANCE& ADVANTAGES

Good Light Transmission and Customizable Appearance:
Products such as the LOW-E and dielectric films developed by Hexad can ensure that BIPV meets the required light transmission needs while maximizing the full-spectrum photoelectric conversion efficiency of thin-film solar cells. Additionally, these products make the thin-film BIPV glass modules uniformly colored, satisfying diverse aesthetic requirements.

透光性好、可定制化外观：

Hexad 开发的 LOW-E 膜和介质膜等产品，可保证 BIPV 适当透光性需求的前提下，最大程度地符合薄膜电池全光谱的光电转化要求并使得薄膜 BIPV 玻璃组件色彩均匀，满足多元化的审美需求



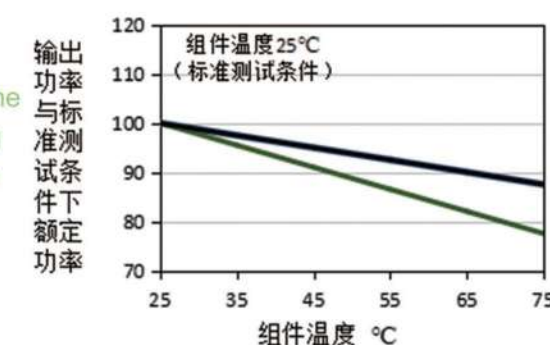
Good Low-Light Performance:

Thin-film solar cells have the advantage of generating power under low-light conditions, making them suitable for buildings with various orientations and adaptable to different regional and climatic conditions.

弱光效应好：薄膜电池具有弱光发电的优点，适应建筑物多朝向特征，也满足不同区域和气候条件下的建筑应用。

Low Power Temperature Coefficient:

The power temperature coefficient refers to the percentage decrease in the output power of a photovoltaic cell for every 1°C increase in the operating environment temperature. The power temperature coefficient of cadmium telluride cells is approximately 0.25%/°C, which helps reduce the loss of output power due to the temperature increase of the glass in BIPV applications.



功率温度系数低：

功率温度系数是指光伏电池的工作环境温度每上升 1°C，组件输出功率降低的百分比。碲化镉电池功率温度系数约为 0.25%/C 左右，能够减少在 BIPV 建筑使用过程中因玻璃升温导致的输出功率降低。

Low Hot Spot Effect:

The characteristics of cadmium telluride cells determine that their BIPV glass module products have a good hot spot effect. This helps prevent excessive rear-end thermal stress caused by high temperatures due to shadow shading during product use.

热斑效应小：

碲化镉的电池特征决定其 BIPV 玻璃组件产品具有良好的热斑效应。可避免产品在使用过程中由于阴影遮蔽造成的温度过高产生后部热应力。

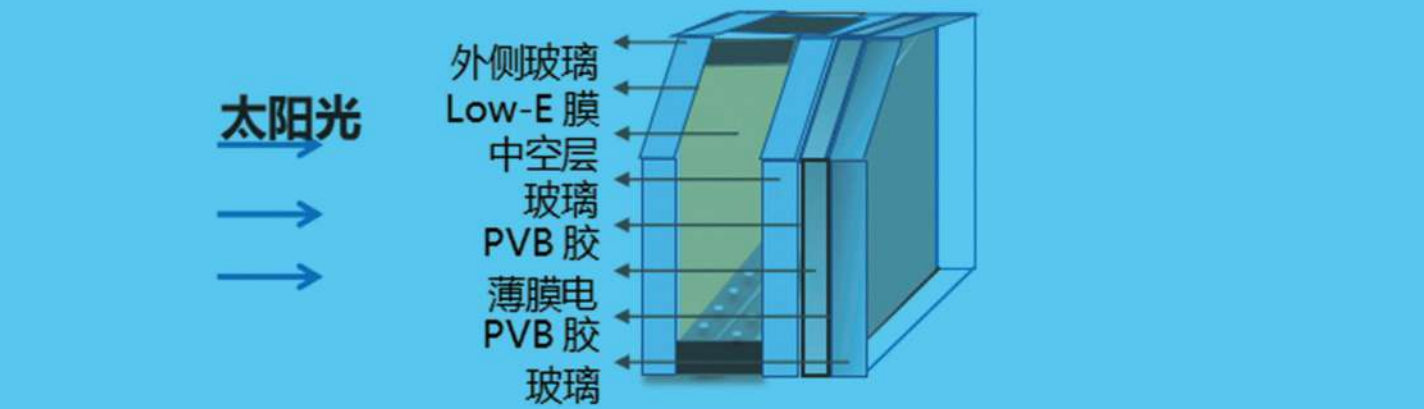
HEXAD GLASS



Inner Sandwich Chip Low-E Insulating Glass 内夹层芯片 Low-E 中空玻璃

The outer layer of the insulating glass uses Low-E coated glass suitable for thin-film solar cells. The glass thickness varies according to the design load requirements. While meeting the requirements for energy efficiency, lighting, safety, and decoration, this structure minimizes the absorption of solar infrared radiation by the thin-film solar cell chips. This ensures that the product maintains its energy-saving performance without hindering the transmission of light waves needed for power generation and prevents the chips from overheating. This type of product is suitable for use in most climate regions

中空外侧玻璃采用适合薄膜电池发电的 Low-E 镀膜玻璃，玻璃厚度根据设计载荷采用不同的型号。在满足节能、采光、安全和装饰的前提下，该结构最大程度地规避了太阳能红外热辐射给薄膜电池芯片带来的热吸收。从而使产品保持节能指标的同时，不影响发电光波透过，并防止芯片过热。该类产品适用于绝大部分气候地区使用



结构参数（碲化镉电池芯片）			
结构	6mmLow-E镀膜玻璃+12A+6mm玻璃+1.52PVB +3.2mm碲化镉电池 +1.52PVB+6mm玻璃		
芯片尺寸	1200*600mm	接线方式	背接/侧接，接线缆2.5mm ² ，650±10mm，
	1200*1600mm		

内夹层Low-E中空玻璃光热性能及电气参数						
BIPV-80 膜系			BIPV-74 膜系			
芯片覆盖率 (%)	100.00	60	40.00	100.00	60	40
可见光透射比 (%)	0	32	48	0	30	44
室外可见光反射比 (%)	10.6	11.7	12	9.3	9.8	10
传热系数 (W/m ² ·K)	1.84	1.84	1.84	1.68	1.68	1.68
遮阳系数 (Sc)	0.1	0.34	0.47	0.06	0.23	0.31
单位面积额定功率 (W/m ²)	108	65	43	96	58	38
开路电压 (V)	120.00	120	120.00	120.00	120	120
短路电流 (A)	2	1.2	0.8	2	1.2	0.8

测试条件：1000W/m²，AM1.5，25℃（碲化镉电池芯片）

Super Energy-Saving Insulating Glass 超级节能中空玻璃

Super energy-saving insulating glass is made by combining online low-e and single-layered low-e glass. The on-line low-e glass coating faces inside of the room reflecting the indoor infrared radiation with low k value, comparable to the double-silver layered low-e insulating glass. Meanwhile it also has off-line Low-E glass advantages in rich color ranges and outstanding performances. A wide range of appearance and performance options are available. It is the best energy-saving glass that can be used in any climate conditions. This product has outstanding thermal insulation properties. It can replace insulation glass which has three layers of glass and minimize the glazed area of buildings.

超级节能中空玻璃是用在线 Low-E 与离线 Low-E 组合成中空玻璃，巧妙的利用“在线 Low-E 玻璃”膜层稳定耐久、非常坚硬，可以直接暴露在自然环境下长期使用而不会有任何衰减变性的特点，布置“在线 Low-E 玻璃”的膜面直接朝向建筑室内，直接反射来自室内的红外线辐射，使得整个中空玻璃传热系数 K 值，节能效果可与比同配置双银低辐射镀膜中空玻璃媲美。同时又能充分发挥“离线低辐射镀膜玻璃”性能优异和颜色丰富的特点，通过选择不同色系和型号的低辐射镀膜玻璃产品，满足不同色彩、透、反射率和遮阳性能的要求。因此超级节能玻璃是一款适用任何气候条件下的最佳节能玻璃产品。

由于超级节能中空玻璃具有极其优异的隔热保温性能，在满足相同隔热保温节能条件下，其可替代三玻两腔的中空玻璃配置，使得建筑上玻璃及型材用料最少，结构自重最轻。

超级节能中空玻璃技术参数								
产品名称	K 值	遮阳系数 SC	太阳能总透射比 SHGC	太阳红外热辐射透射比 g _{ir}	可见光透射比 %	可见光反射比 (前) %	太阳直接透射比	紫外线透射比
净色5mmLXTB180+12A+5mm在线LOW-E (空气)	1.51	0.58	0.50	0.30	63	12.00	0.42	0.29
净色5mmLXTB180+12Ar+6mm在线LOW-E (氩气)	1.32	0.58	0.51	0.31	63	12	0.42	0.29
浅蓝6mmLXTB160+12A+6mm在线LOW-E (空气)	1.54	0.46	0.4	0.25	48	15	0.32	0.27
浅蓝6mmLXTB160+12Ar+6mm在线LOW-E (氩气)	1.36	0.46	0.40	0.25	48	15.00	0.32	0.27
蓝灰6mmLXTB150+12A+6mm在线LOW-E (空气)	1.45	0.38	0.33	0.2	40	29	0.26	0.2
蓝灰6mmLXTB150+12A+6mm在线LOW-E (氩气)	1.26	0.38	0.33	0.2	40	29	0.26	0.2

玻璃结构	LowE类型 膜面位置	可见光透射比	K W/m ² ·k	太阳能总透射比 SHGC	太阳红外热辐射透射比 g _{ir}	遮阳系数 SC	光热比 LSG	适用气候 带	节能率%
5LOW-E#2+15Ar+5LOW-E#4+15A1+5LOW-E#6	单银2/单银4/在线6	0.51	0.74	0.41	0.21	0.47	1.24	严寒地区	被动房用92% 被动房用92%
5LOW-E#2+12Ar+5LOW-E#4+12A1+5LOW-E#6	单银2/单银4/在线6	0.51	0.77	0.41	0.21	0.47	1.24	严寒地区	75%以上
5LOW-E#2+12A+5LOW-E#4+12A+5LOW-E#6	单银2/单银4/在线6	0.51	0.93	0.41	0.21	0.47	1.24		75%以上
5 SUN-E#2+12Ar+5LOW-E#4+12Ar+5LOW-E#5	sun-E 2/单银4/在线5	0.52	0.93	0.47	0.32	0.54	1.11	严寒地区	75%以上
5 SUN-E#2+12A+5LOW-E#4+12Ar+5LOW-E#5	sun-E 2/单银4/在线6	0.52	1.12	0.47	0.32	0.54	1.11		75%以上
6高透LOW-E#2+12Ar+6LOW-E#3	高透单银2/单银3	0.63	1.45	0.51	0.27	0.58	1.24	寒冷地区	75%以上
6高透LOW-E#2+12A+6LOW-E#3	高透单银2/在线3	0.63	1.71	0.51	0.27	0.58	1.24		75%以上
6高透LOW-E#2+12Ar+6LOW-E#3	高透单银2/在线3	0.63	1.48	0.52	0.33	0.6	1.21	寒冷地区	75%以上
6高透LOW-E#2+12A+6LOW-E#3	高透单银2/在线3	0.63	1.74	0.52	0.33	0.6	1.21		75%以上
6LOW-E#2 +12Ar+6LOW-E#3	单银2/单银3	0.61	1.45	0.51	0.27	0.58	1.2	寒冷地区	75%以上
6LOW-E#2 +12A+6LOW-E#3	单银2/单银3	0.61	1.71	0.51	0.27	0.58	1.2		75%以上
6LOW-E#2 +12Ar+6LOW-E#3	单银2/在线3	0.61	1.48	0.52	0.33	0.6	1.17	寒冷地区	75%以上
6LOW-E#2 +12A+6LOW-E#3	单银2/在线3	0.61	1.74	0.52	0.33	0.6	1.17		75%以上
6 SUN-E#2 +12Ar+6LOW-E#3	Sun-E 2 /单银3	0.62	1.52	0.56	0.4	0.65	1.11	夏热冬冷 夏热冬暖	75%以上
6 SUN-E#2 +12A+6LOW-E#3	Sun-E 2 /单银3	0.62	1.78	0.56	0.4	0.65	1.11		75%以上
6 SUN-E#2 +12Ar+6LOW-E#3	Sun-E 2/在线3	0.62	1.61	0.63	0.56	0.72	0.98	夏热冬冷 夏热冬暖 温和地区	75%以上
6 SUN-E#2 +12A+6LOW-E#3	Sun-E 2/在线3	0.62	1.85	0.63	0.56	0.72	0.98		75%以上
6 Sun-R (威海蓝)+12Ar+6LOW-E#3	Sun-R2/单银3	0.44	1.55	0.38	0.24	0.44	1.16	夏热冬冷 夏热冬暖 温和地区	75%以上
6 Sun-R (威海蓝)+12A+6LOW-E#3	Sun-R2/单银3	0.44	1.8	0.38	0.24	0.44	1.16		75%以上
6 Sun-R (威海蓝)+12Ar+6LOW-E#3	Sun-R2/在线3	0.45	1.69	0.42	0.34	0.48	1.07	夏热冬冷 夏热冬暖 温和地区	75%以上
6 Sun-R (威海蓝)+12A+6LOW-E#3	Sun-R2/在线3	0.45	1.92	0.42	0.34	0.48	1.07		75%以上

HEXAD GLASS

Smart & privacy glass
智能 & 隐私玻璃



Patterned Glass 压花玻璃

Patterned glass, also known as textured glass or rolled glass, is a type of flat glass manufactured using the rolling method.

压花玻璃又称 花纹玻璃或滚花玻璃，也做轧花玻璃，是采用压延方法制造的一种 平板玻璃

Pattern on patterned glass



Mistlite



Floral



karatachi



Nashiji



Diamond



May Flower



Oceanic



Kasumi



Rain



Aqualite



Golden Fish



Chinchilla

HEXAD GLASS

Acid Etched Glass 蒙砂玻璃

HEXAD acid-etched glass products creates a translucent satin appearance which obscures view while maintaining a high level of light transmittance, with consistent quality, durability and rich look of Textures products.

HEXAD 蒙砂玻璃产品创造了半透明的缎面外观，在保持高透光率的同时遮挡视线，具有纹理产品的一致质量、耐用性和丰富外观。



Acid-etched glass

Cleaning and drying: First, the flat glass intended for producing acid-etched glass is washed with water to remove dust and stains, then dried.

Installation: The cleaned and dried flat glass is mounted onto a suspension rack. The contact points between the suspension rack and the glass are cushioned with serrated rubber supports. The glass is positioned vertically with a certain distance between each piece, and then lifted using a crane.

Etching: The flat glass, together with the suspension rack, is immersed into an acid solution tank, fully submerging the glass. After a period of time, the glass is lifted out of the tank with the crane and rinsed to remove residual acid.

Softening: After rinsing off the residual acid, the acid-etched glass still retains some residue. It is placed into a softening tank where it is submerged in a softening solution to remove the residue.

Washing: Due to the chemical residues from the etching and softening processes, the acid-etched glass must undergo thorough cleaning. The glass is placed onto a conveyor belt of a washing machine, where it is moved through the machine while being sprayed with water and brushed with rotating brushes. Once the acid-etched glass exits the washing machine via the conveyor belt, the cleaning process is complete.

Drying: The cleaned acid-etched glass is allowed to air dry, resulting in single-sided or double-sided acid-etched glass.

酸洗玻璃

- (1) 清洗烘干：首先对要将生产磨砂玻璃的平板玻璃用水进行清洗，去除灰尘、污渍，然后烘干；
- (2) 吊装：将清洗烘干后的平板玻璃装入吊装架上，吊装架与玻璃相接触的部分用齿形橡胶支架垫起，玻璃立式排放，玻璃与玻璃之间相距一定的距离，用吊车吊起；
- (3) 腐蚀：将平板玻璃连同吊装架一同浸入腐蚀池中，浸没玻璃，一段时间后用吊车吊起后，淋掉残液；
- (4) 软化：淋掉残液后，磨砂玻璃上面附着一层残留物，放入软化池中软化，采用软化液浸没玻璃，软化去掉残留物；
- (5) 清洗：由于腐蚀与软化使磨砂玻璃体带有很多化学物质，所以必须清洗，把磨砂玻璃放入冲洗机的滑道上，滑道带动磨砂玻璃进入清洗机，清洗机一边喷入清水，一边转动毛刷，当磨砂玻璃被清洗机滑道带出清洗机后，磨砂玻璃清洗结束
- (6) 清洗后的磨砂玻璃晾干，即成单面或双面磨砂玻璃。

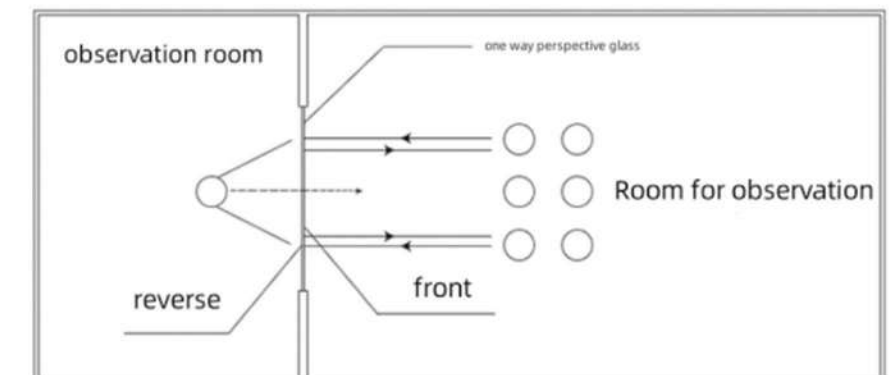
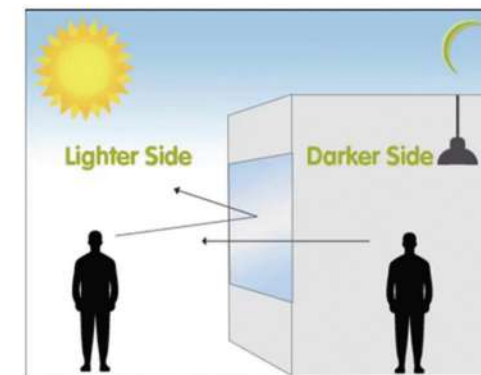


One-way perspective glass 单向玻璃

One-way perspective glass is a glass that looks like a mirror in a well-lit room, but looks like an ordinary colored glass from the other side. It is also widely used in the protective glass cover outside the surveillance camera. One-way perspective mirrors are ideal for multiple image "infinite" mirror effects or for decorating offices, schools, Internet cafes, entertainment venues, interrogation rooms, buildings, etc.

The One Way Glass is usually being used as a regular glass in bright room, with a much darker room on the other side. People on the bright side can see only their reflection and it looks like regular mirror. People on the dark side can see through it, almost like through transparent window.

Conventional unidirectional glass, suitable for most places such as classrooms and observation rooms. Unconventional one-way glass, suitable for use in public security bureaus, prisons and other places with high confidentiality requirements. Hexad's one way perspective glass, do your life assistant and make your life more convenient!



单向透视玻璃是一种在光线充足的房间里看起来像镜子的玻璃，但从另一边看却像普通的彩色玻璃。它还广泛应用于监控摄像头外部的玻璃保护罩中。单向透视镜是多图像“无限”镜像效果或装饰办公室、学校、网吧、娱乐场所、审讯室、建筑物等的理想选择。

单向玻璃通常被用作明亮房间的普通镜子，而另一边则是黑暗得多的房间。光明面上的人只能看到他们的倒影，它看起来像普通的镜子。黑暗面上的人可以透过它看到，几乎就像透过透明的窗户一样。

传统的单向玻璃，适用于大多数地方，如教室和观察室。非常规单向玻璃，适用于公安局、监狱等保密要求较高的场所。

Hexad的单向透视玻璃，做你的生活助手，让你的生活更方便！



Police Office



Interrogation Room



Building Use



Toilet Use

HEXAD GLASS

Switchable Transparent Glass 调光玻璃

It is a new type of special photoelectric glass product, which combines liquid crystal film into two layers of glass and is integrated into laminating structure after high temperature and high pressure gluing. The user can control the transparent and opaque of glass by controlling whether the current is on or off.

调光玻璃是一款将液晶膜复合到两层玻璃中间，经高温高压胶合后一体成型的夹层结构的新型特种光电玻璃产品，使用者通过控制电流的通断与否控制玻璃的透明与不透明状态。

Application

It is widely used in the spaces that need privacy, such as sanitary space, commercial space, projection screen, science and technology residence, exhibition space, etc.

应用领域

广泛应用于需隐私性的卫浴空间、商业空间、兼具投影荧幕、科技住宅、展览空间等。

Product specification

Minimum Size: 1830x1220mm
Maximum Size: 6000x3660mm
Other customized sizes are available
Thickness Range: 2-12mm

产品规格

最小尺寸: 2100x1500mm
最大尺寸: 3660x2740mm
还提供其他定制尺寸
厚度范围: 3-12mm



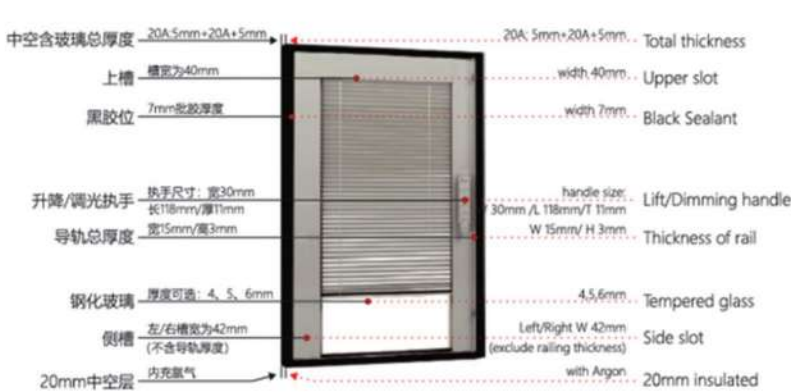
项目Items		模式Models	参数Parameters
光学参数 Optical parameters	可见光透过率 Visible transmittance	通电Power on	>65%
		断电Power off	>42%
	雾度Fog degree	通电Power on	<4%
		断电Power off	>90%
电学参数 Electrical parameters	可视角度Viewing angle	通电Power on	>160°
	工作电压Load voltage	通电Power on	48V AC
	响应时间 Response time	断电→通电 Power off→Power on	<200ms
		通电→断电 Power on→Power off	<10ms
环境参数 Environment parameters	功耗Power consumption	通电Power on	<5W/M²
	工作温度working temperature		-10℃~65℃
	使用寿命Service life	通电>10年 power on>10 years	
开关次数Switching frequency		>8000万次 >80 million times	



INTERGRAL BLINDS 中空百叶窗

Integral blinds within double glazing and a manual or automatic control system.

中空百叶玻璃是传统的遮阳产品，一般采用人工在中空玻璃内饰采用磁力来控制中空玻璃内的百叶窗帘



20A internal manual shutter DGU glass (Sixth)
20A internal manual shutter DGU glass;
The latest warm edge system;
The right handle controls the turning and dimming and lifting of the shutters

20A 内置手动百叶中空玻璃 (第六代)
20A 内置手动百叶中空玻璃;
采用最新的暖边系统;
右边执手控制百叶翻动调光和升降。

中空玻璃规格 Insulating Glass Specifications	单幅百叶规格 Single-Slat Blinds Specifications			
	最大面积 Maximum area	最大 Max	最小 Min	
5mm+20A+5mm	2m²	宽度 Width 1.8m	高度 High 2.5m	宽度 Width 0.32m 高度 High 0.43m

21A internal electric shutter DGU glass

21A insulated spacer;

The curtains are available in a variety of colors to suit your taste;

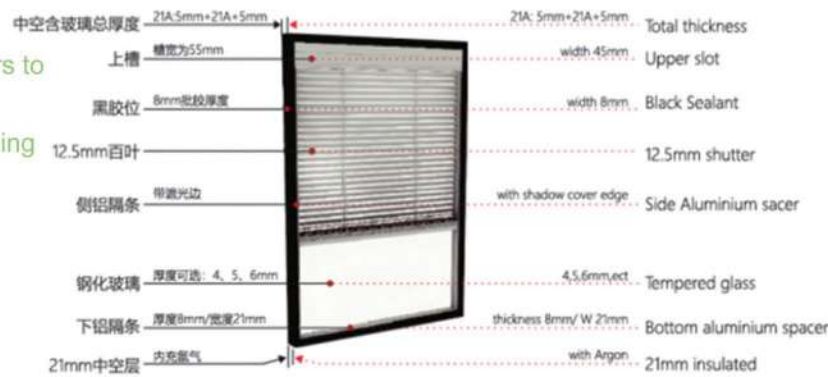
Providing a plurality of control systems, enabling wall switch, a wireless receiver and a remote control louver movements, dimming.

21A 内置电动百叶中空玻璃

21mm 中空层;

帘片有多种颜色可选择，更符合您的品味；

提供多种控制系统，可实现墙体开关、无线接收器和遥控器控制百叶升降、调光。



中空玻璃规格 Insulating Glass Specifications	单幅百叶规格 Single-Slat Blinds Specifications			
	最大面积 Maximum area	最大 Max	最小 Min	
5mm+21A+5mm	5.5m²	宽度 Width 2.2m	高度 High 3.0m	宽度 Width 0.53m 高度 High 0.3m

HEXAD GLASS

Borosilicate Glass

硼硅玻璃

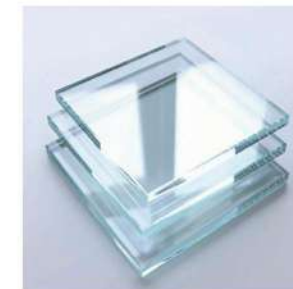


Borosilicate 2.6 Float Glass 硼硅 2.6 浮法玻璃 (BG26)

产品用途 | Product application

1. Borosilicate 2.6 is a high-performance functional glass material;
2. Suitable for high-end multi-burner induction cooker panels, stove top glass;
3. Heat-resistant fireplace observation window;
4. Substitute for some high-energy consumption, highly polluting Ceramic Glass.

- 1、硼硅 2.6 是一种性能优异的功能性玻璃材料；
- 2、适用于高端多灶头的电磁炉面板；
- 3、耐热冲击壁炉观察窗；
- 4、替代部分高能耗高污染的微晶玻璃。



产品参数 | Technical Parameters

1. Softening temperature: 880°C;
 2. Thermal shock resistance 500°C;
 3. Coefficient of thermal expansion: $2.6 \times 10^{-6}/K$;
 4. Light transmittance 90~92%;
 5. Alkali extraction on glass surface $< 70 \mu g / m^2$.
- 1、软化温度 : 880°C;
 - 2、抗热冲击 500°C;
 - 3、热膨胀系数 : $2.6 \times 10^{-6}/K$;
 - 4、透光率 90~92%;
 - 5、玻璃表面碱析出量 $< 70 \mu g / m^2$ 。



产品特征 | Product features

Due to its low coefficient of thermal expansion, strong resistance to thermal shock, and excellent heat resistance, it becomes the preferred choice in applications requiring superior temperature resistance.

由于其热膨胀系数低、抗热冲击性强以及耐温性良好使它在需要优良耐温性能的应用领域中成为首选。

产品规格 | Product specification

Regular size: 1150x850mm 1200x800mm
1600x1200mm 1700x1150mm
Other customized sizes are available
Thickness Range: 3-12mm

1150x850mm 1200x800mm
1600x1200mm 1700x1150mm
还提供其他定制尺寸
厚度范围: 3-12mm

后续加工 | Further Processing

Cutting, edging, drilling, coating, semi-tempering, screen-printing, etc.

切割、磨边、钻孔、镀膜、半钢化、丝印等。

HEXAD GLASS



Borosilicate 3.3 Tinted Glass 硼硅 3.3 浮法玻璃 (BG33)

产品用途 |Product application

- 1.Borosilicate glass 3.3 is a material that is truly versatile and widely used ;
- 2.Home appliance (panel for oven and fireplace, microwave tray, stove, etc.);
- 3.Environmental engineering and chemical engineering (resistant lining, chemical reactor, safety mirror);
- 4.Lighting (protective glass for spotlights and high-power floodlight fixtures) ;
- 5.Solar energy regeneration (solar cell base plate);
- 6.Precision instruments (optical filters);
- 7.Semi-conductor technology (LCD disc, display glass);
- 8.Medical technique and bio-engineering;
- 9.Safety protection (bullet proof glass).

- 1、硼硅 3.3 是一种真正全能，广泛应用的材料；
- 2、家用电器（烤箱内部的玻璃面板，微波炉托盘，火炉面板等）；
- 3、环境工程 化学工程（抵抗性衬层，化学反应釜，安全视镜）；
- 4、照明（聚光灯和大功率泛光照明灯具的保护玻璃）；
- 5、太阳能发电（太阳能电池基板）；
- 6、精密器械（光学滤光片）；
- 7、半导体技术（晶片，显示玻璃）；
- 8、医学技术 生物工程；
- 9、安全防护（防弹玻璃）。

产品参数 |Technical Parameters

- 1.Density (g/cm³) (at 25°C): 2.23±0.02;
- 2.Coefficient of expansion (20-300°C): 3.3±0.1×10⁻⁶K⁻¹;
- 3.Softening point (°C): 820±10;
- 4.Temperature difference on one piece (K): 100 > 300 (enhanced type);
- 5.Thermal shock resistance: ≤ 240°C;
- 6.Maximum working temperature (°C): ≤ 450°C;
- 7.Refractive: n_d: 1.47384;
- 8.Light transmission: 92% (thickness ≤ 4mm) 91% (thickness ≥ 5mm);
- 1、密度 (g/cm³) (at 25°C): 2.23±0.02
- 3、膨胀系数 (20-300°C): 3.3±0.1×10⁻⁶K⁻¹
- 3、软化点 (°C): 820±10
- 4、同片温差性能 (增强型) (K): 100 >300 (增强型)
- 5、抗热冲击性: ≤ 240°C
- 6、最高工作温度 (°C): ≤ 450 °C
- 7、折射率 n_d: 1.47384
- 8、透过率: 92% (厚度 ≤ 4mm) 91% (厚度 ≥ 5mm)

产品特征 |Product features

- Great heat resistance performance, stable chemical property
- High light transmission
- Various thicknesses for you to choose
- Wide optical application
- 良好的耐高温性能，化学性能稳定
- 极佳的透过率
- 有多种厚度可供选择
- 可用于多种光学用途

产品规格 |Product specification

Regular size: 1150×850mm 1700×1150mm	150×850mm 1700×1150mm
1200×800mm 1600×1200mm	1200×800mm 1600×1200mm
Other customizad sizas are available	还提供其他定制尺寸
Thickness Range:2-25mm	厚度范围：2-25mm

后续加工 |Further Processing

- Cutting, edging, drilling, coating, semi-tempering, screen-printing, etc.
- 切割、磨边、钻孔、镀膜、半钢化、丝印等。



HEXAD GLASS



Borosilicate 3.3 Tinted Glass 硼硅 3.3 颜色玻璃

产品用途 |Product application

1.Borosilicate 3.3 tinted glass is a high-performance functional glass material;

2.It is widely used in heat-resistant kitchenware, stoves, and other household appliances.

1、硼硅 3.3 颜色玻璃是一种性能优异的功能性玻璃材料

2、多用于耐热厨具、灶具等家用电器

产品参数 |Technical Parameters

Thermal expansion coefficient $3.2\sim3.3\times10^{-6}\cdot K^{-1}$

Visible light transmittance ratio: 11% (Thickness 3.8mm)

Visible light reflectance ratio: 3.9% (Thickness 3.8mm)

Thermal shock resistance: above 240°C

Softening point: 806°C

Transmittance color difference: 0.4

Reflectance color difference: 0.5

Boron content: 13.65%

Water resistance: For every gram of glass beads, the consumption of concentrated hydrochloric acid with a concentration of 0.01 mol/L is 0.01 mL.

The amount of alkali precipitated per gram of glass beads (expressed in sodium hydroxide mass) is 3.1μg.

Acid resistance: 87μg/d m²

Alkali resistance: 63mg/d m²

热膨胀系数 $3.2\sim3.3\times10^{-6}\cdot K^{-1}$

可见光透射比: 11% (厚度 3.8mm)

可见光反射比: 3.9% (厚度 3.8mm)

抗热冲击: 240°C以上

软化点: 806°C

透射色差: 0.4

反射色差: 0.5

硼含量: 13.65%

耐水性能: 每克玻璃颗粒消耗浓度 0.01mol/L 盐酸溶液: 0.01mL

每克玻璃颗粒析出碱的量 (以氧化钠质量表示): 3.1 μg

耐酸性能: 87 μg/d m²

耐碱性能: 63mg/d m²



产品特征 |Product features

1.Presently, all borosilicate tinted glass available in the market is produced using subsequent screen printing, lacking inherently colored products. The technology for the inherent coloring of borosilicate tinted glass is at an advanced level domestically;

2.The inherent coloring of borosilicate tinted glass, distinct from the ink layer of screen-printed products which is susceptible to peeling, provides better uniformity and durability

1、目前市场上的硼硅颜色玻璃皆为后续丝印生产，无本体着色产品，硼硅颜色玻璃本体着色工艺技术居于国内先进水平。

2、硼硅颜色玻璃的本体着色，不同于硼硅玻璃丝印产品的油墨层易脱落，本体着色有着更好的均匀性和耐用性。

产品规格 |Product specification

Regular size: 1150×850mm 1200×800mm

1150×850mm 1200×800mm

1600×1200mm 1700×1150mm

1600×1200mm 1700×1150mm

Other customizad sizas are available

还提供其他定制尺寸

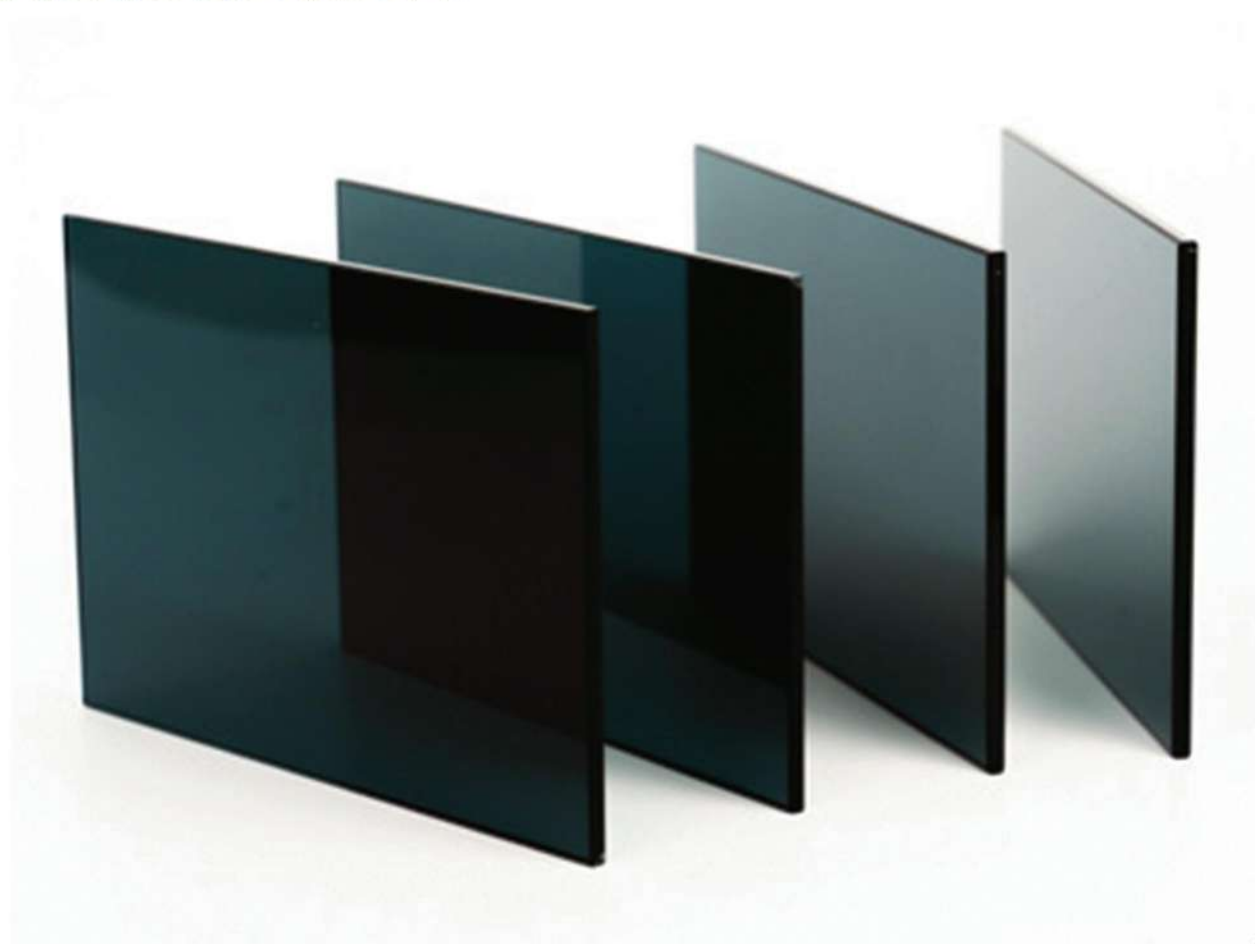
Thickness Range:3-12mm

厚度范围: 3-12mm

后续加工 |Further Processing

Cutting, edging, drilling, coating, semi-tempering, screen-printing, etc.

切割、磨边、钻孔、镀膜、半钢化、丝印等。



HEXAD GLASS

Borosilicate Fire-resistant Glass 4.0 (BG40) 硼硅 4.0 防火玻璃 (BG40)

产品用途 |Product application

- 1.Fire-resistant glass
- 2,Fire partition
- 3.Insulating glass
- 4.Curtain walls
- 5.Fire-resistant glass for ceiling, floor
- 6.Safety glass (Bullet-proof)

产品参数

Technical Parameters

Density (at 25°C): $2.28 \pm 0.02 \text{g/cm}^3$

Coefficient of expansion (20-300°C): $4.0 \pm 0.1 \times 10^{-6} \text{K}^{-1}$

Softening point: $845^\circ\text{C} \pm 5^\circ\text{C}$

Integrity: C class | item ($\geq 120\text{min}$)

产品特征 |Product features

- 1.Excellent in visual effect
- 2.Good fire resistance
- 3.High resistance to thermal shock
- 4.Without self-explosion

产品规格 |Product specification

Regular: $3660 \times 2440 \text{mm}$

Other customizad sizas are available

Thickness Range:4-12mm

后续加工 |Further Processing

Cutting, edging, drilling, coating, semi-tempering, screen-printing, etc.

切割、磨边、钻孔、镀膜、半钢化、丝印等。

- 1、防火玻璃
- 2、防火隔断
- 3、中空玻璃
- 4、幕墙玻璃
- 5、有防火要求的天棚、地板

密度 (at 25°C): $2.28 \pm 0.02 \text{g/cm}^3$

膨胀系数 (20-300°C): $4.0 \pm 0.1 \times 10^{-6} \text{K}^{-1}$

软化点: $840^\circ\text{C} \pm 5^\circ\text{C}$

防火等级: C 级 | 类 ($\geq 120\text{min}$)

- 1、极佳的视觉效果
- 2、超强的防火性
- 3、优异的耐热冲击性能
- 4、无需均质处理，自爆率低

$3660 \times 2440 \text{mm}$

还提供其他定制尺寸

厚度范围: 4-12mm

后续加工 |Further Processing

Cutting, edging, drilling, coating, semi-tempering, screen-printing, etc.

切割、磨边、钻孔、镀膜、半钢化、丝印等。

执行标准 |Standard

GB15763.1-2001

注意事项 |Notice

The glass cannot be used in places where there is a clear requirement to have heat insulation or heat radiation protection;

The glass is a specially treated safety glass. After processing, it cannot be further processed such as cutting; During handling and installation, attention shall be paid to avoid scratches on surface.

硼硅单片防火玻璃不能使用在有明确要求具有隔热或防热辐射功能的场合。

硼硅单片防火玻璃是经过特殊处理的安全玻璃，加工成形后，不能进行切割等深加工。

搬运和安装时应注意避免硼硅单片防火玻璃表面划伤。



HEXAD GLASS

Composite fire-resistant glass 复合型防火玻璃

产品用途 |Product application

- 1.Fire partition

2.fireproof glass door

3.Curtain walls

4.Subway fire screen doors

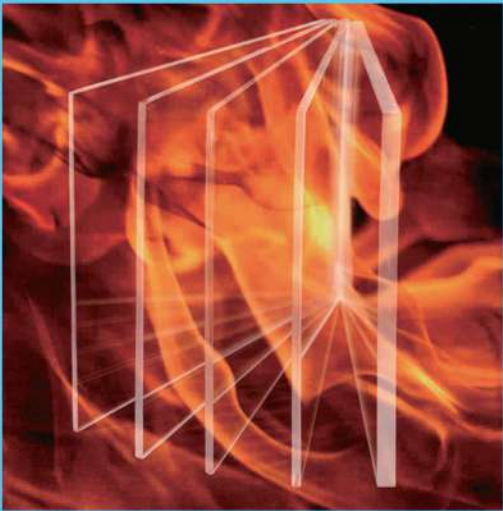
5.Fireproof glass flooring
- 1、防火隔断

2、防火玻璃门

3、幕墙玻璃

4、地铁防火屏蔽门

5、防火玻璃地板



产品参数 |Technical Parameters

Insulating Fire-resistant Glass Performance Data								
Type	Thickness (mm)	Fire resistance(min)		Transmittance (%)	Shading Coefficient	Unit weight (kg/m²)	sound- insulation value(dB)	Edge width (mm)
		Integrity	Heat insulation					
A-0.5h	17	30	30	85	0.73	36	30	15
A-1.0h	32	60	60	83	0.68	53	35	15
A-1.5h	40	90	90	81.4	0.59	67	37	15
A-2.0h	50	120	120	78	0.53	80	39	20
A-3.0h	70	180	180	75	0.5	106	40	20

产品特点 |Product features

- 1.Excellent in visual effect

2.Good fire resistance

3.Good weather resistance

4.Good stability

5.UV resistant
- 1、极佳的视觉效果

2、超强的防火性

3、超强的耐候性

4、稳定性好

5、耐紫外线



后续加工 |Further Processing

Cutting, edging, drilling, coating, semi-tempering, screen-printing, etc.
切割、磨边、钻孔、镀膜、半钢化、丝印等。

执行标准 |Standard

GB15763. 1-2009

注意事项 |Notice

Composite fire-resistant glass is a safety glass that has undergone special treatment. After processing and forming, it cannot be deeply processed such as cutting.
Glass should be placed slightly tilted and upright on a bracket made of wood strips or other non abrasive materials.
Glass should be placed in a dry environment.
During transportation and installation, attention should be paid to avoiding scratches on the surface of borosilicate single piece fire-resistant glass.

复合防火玻璃是经过特殊处理的安全玻璃，加工成形后，不能进行切割等深加工。
玻璃应当略微倾斜地直立放置在木条或其他非磨损性材料制成的托架上。
玻璃应放在干燥的环境中。
搬运和安装时应注意避免硼硅单片防火玻璃表面划伤。



HEXAD GLASS

Microcrystalline glass

微晶玻璃



Microcrystalline glass 微晶玻璃

Microcrystalline glass is made by adding microcrystalline agents to ordinary glass and firing it at high temperatures. The properties of microcrystalline glass include environmental protection, no radioactive pollution, heat resistance, corrosion resistance, high hardness, etc.

Reprocessing: capable of cutting, drilling, grinding, polishing, etc.

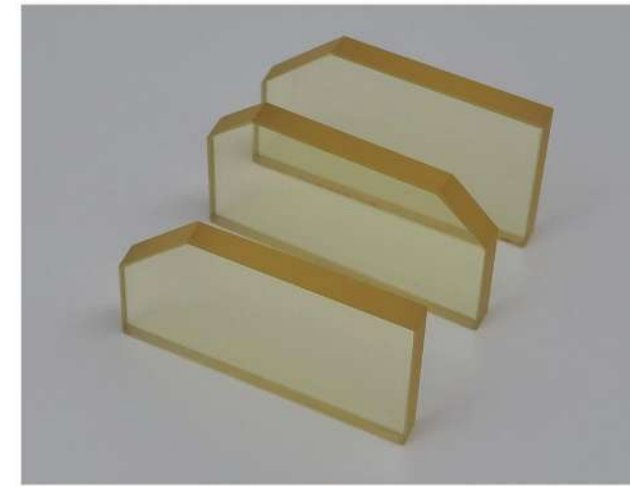
Application fields: architecture, electronics, chemical industry, military industry, aerospace, biology, and new optics.

微晶玻璃是在普通玻璃的基础上加入了微晶剂，经过高温烧制而成。

微晶玻璃的性能：环保、无放射性污染，耐热性，耐腐蚀性，高硬度等。

再加工：可以切割、打孔、研磨、抛光等。

应用领域：建筑，电子，化工，军工，航空航天，生物和新型光学等领域。



Parameters of microcrystalline glass:

The refractive index of microcrystalline glass ranges from 1.48 to 1.50

The thermal expansion coefficient of microcrystalline glass is $(5.7-6) \times 10^{-6}/^{\circ}\text{C}$

The density of microcrystalline glass is about 2.5 g/cm^3 , which is higher than that of ordinary glass and has a higher mass density

The thermal conductivity of microcrystalline glass ranges from 0.9 to $1.1 \text{ W/m} \cdot \text{K}$, indicating good insulation

performanceMicrocrystalline glass has good light transmittance, with a transmittance of over 90% in the wavelength range of 400 nanometers to 2500 nanometers

微晶玻璃的参数：

微晶玻璃的折射率在 1.48~1.50 之间

微晶玻璃的热膨胀系数为 $(5.7-6) \times 10^{-6}/^{\circ}\text{C}$

微晶玻璃的密度约为 2.5 g/cm^3 ，比一般玻璃偏高，具有较高的质量密度

微晶玻璃的热导率在 $0.9 \sim 1.1 \text{ W/m} \cdot \text{K}$ 之间，具有较好的绝缘性能

微晶玻璃透光性好，其透光率在 400 纳米~2500 纳米的波长范围内达到 90% 以上

HEXAD GLASS

Home Appliance Glass Product

家电玻璃



产品用途 | Product application

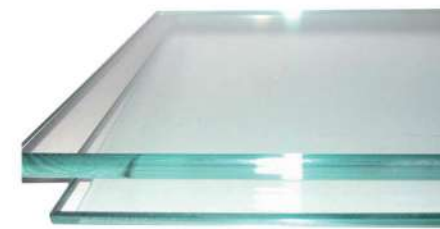


Raw Materials

The property of raw material will determine the property of our final products to a great extent, and high quality raw material is the first step for us to work out the environmental friendly and safe products.

We cooperate with the raw material manufacturer who has ISO9000 quality management System and passed CE certification only. All the raw material glass we are buying are comply with "ROHS" standard.

原材料的性能很大程度上直接决定了最终产品的性能，优质的原材料是做出安全和环保产品的第一步，我们只选择那些已经通过 ISO9000/14001 体系认证和 CE 认证的厂家进行合作，采购的原材料符合“ROHS”标准。



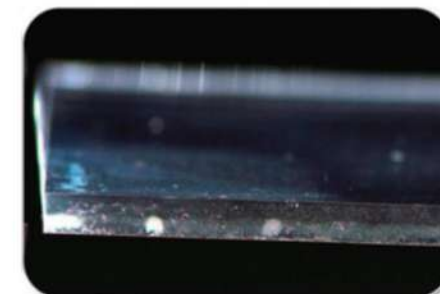
透明浮法玻璃 Clear Float Glass



透明浮法玻璃 Clear Float Glass



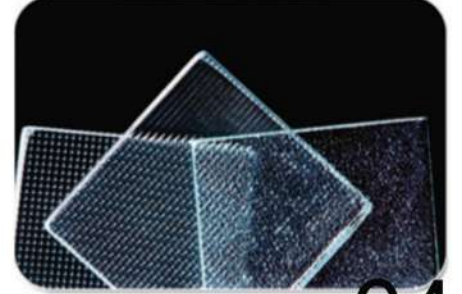
微晶玻璃 Glass Ceramic



高硼硅玻璃 Borosilicate Glass



茶色玻璃 Glass Ceramic



压花玻璃 Patterned Glass

HEXAD GLASS



Gas Stove Glass 灶炉玻璃

Gas Stove glass won't be deformed in high temperature, nor exploded or cracked, can withstand 300 degree high temperature.
Safely tempered glass is easy cleaning, oxidation, resisting, safe and environmental friendly.
Variety of styles can be customized, single or more holes are available. Colors are bright and beautiful after printed.
Background and graphics drawing are silk screen printed with black, white, grey or any other color of paint requested by clients, clear fonts. Beautiful appearance, with safe and reliable performance.

炉灶玻璃可以在高温下不变形，不会炸开或裂开，可承受 300 度高温。
安全钢化更容易清洗、抗氧化、安全更环保。
款式多样，可做单孔多孔，印刷后效果更亮丽。
背景和图文根据客户要求用丝网印刷黑色、白色、灰色或其他颜色，字体清晰，产品外形优美，性能安全可靠。



Range Hood Glass 油烟机玻璃

Safety tempered glass is easy cleaning, oxidation resisting, corrosion resisting, safe and environmental friendly.
Tempered glass has good plasticity, so consumers could choose shapes of curved, flat, internal-grooving, external-grooving according to their own preferences.
After printing, colors are bright and beautiful, fully show the elegance and comfort when installed in the kitchen.

安全钢化玻璃更易清洗，抗氧化、耐腐蚀、安全、环保。
钢化玻璃可塑性好，用户可根据各自爱好选择弧形、平板、内开槽、外开槽的形状。
经印刷处理后色泽亮丽，安装于厨房内可彰显高雅舒适的气度。



HEXAD GLASS

Oven Glass 烤箱玻璃

Oven glass has good mechanical strength and bending strength .
It is heat resistant,could withstand the long-term baking with high temperature and not broken.
Heat resistant and environmental printing coolshave good chemical stability, and they are corrosion resisting, environmental friendly and artstic.

烤箱玻璃具有良好的机械强度和抗弯强度
耐热温度高，可承受高温烤箱的长期烘烤而不会炸裂。
高温环保油墨印刷化学稳定性好，耐腐蚀、环保美观。



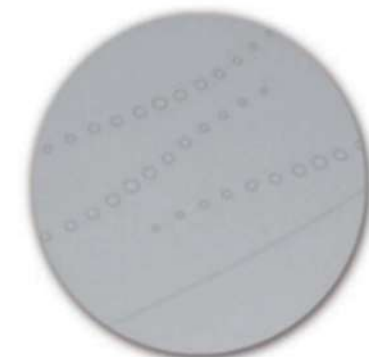
Refrigerator Glass 冰箱玻璃

Tempered glass panels for refrigerator are clean environmental friendly, safe. Transparent texture fully shows spirituality of the product.
Glass panels for refrigerator could be processed to various shapes ,curved, flat, etc. After printing or filming, colors are bright and beautiful, fully show the nobility and elegance.
Size accuracy of products processed by CNC is $\pm 0.2\text{mm}$.

冰箱面板钢化玻璃清洁、环保、安全。通透的质感，尽显产品灵性。
冰箱面板玻璃可制作成各种形状，有弧形、平板形等。印刷或覆膜处理后，色泽亮丽，彰显高贵典雅。
CNC加工，产品尺寸精度达 $\pm 0.2\text{mm}$



控制面板印刷图案
Printing Patterns Of Control Panel



冰箱玻璃印刷图案
Printing Patterns Of Refrigerator GLass

HEXAD GLASS



Disinfection cabinet glass 消毒柜玻璃

The glass of the disinfection cabinet can withstand the high temperature of the disinfection cabinet without deformation, explosion or cracking. The internal temperature of the disinfection cabinet can reach up to 200 degrees Celsius in working condition.

The glass panel is oil proof, waterproof, and has a beautiful appearance. High transparency ultra white glass, light colored brown glass, or other colored glass can also be used according to customer needs.

The transparent glass door body makes the working status of the machine clear at a glance during operation

消毒柜玻璃可以承受消毒柜的高温而不变形也不会炸开或开裂，消毒柜在工作状态下内部温度可高达 200 摄氏度。玻璃面板放油，防水，造型美观，也可根据客户需要使用高透光的超白玻璃，色泽淡雅的茶色玻璃或其他有色玻璃。透明玻璃门体让机器在运行过程中的工作状态一目了然。



Washing Machine Glass 洗衣机玻璃

Safety tempered glass is easy cleaning, Oxidation resisting, corrosion resisting, safe and environmental friendly.

Elegant printing effects showcase noble quality.

The semi transparent window effect makes the washing process clear and visible.

透明的钢化玻璃视窗，摒弃了普通塑料易划伤，易老化的缺点，安全、环保、美观。

典雅的印刷效果，尽显高贵品质。

半透的视窗效果，使洗衣过程清晰可见。



曲面盖板
Curved cover plate

HEXAD GLASS



Refrigerator Vacuum Glass 冷藏柜真空玻璃

The glass of the electrical door body of the refrigerator needs to have both light transmission, visibility, and cold insulation functions. Due to the large temperature difference between the inside and outside of the electrical door glass, condensation often occurs, resulting in energy waste. Vacuum glass has a lightweight structure and good insulation performance, which can perfectly solve problems such as condensation on electrical doors and energy waste.

冷藏柜电器门体玻璃需要兼具透光可视性及保冷隔热的功能。由于电器门体玻璃内外两侧温差较大，会经常产生凝露现象，并造成能耗浪费。真空玻璃具备轻薄的结构和良好的保温性能，可以完美解决电器门体凝露、能耗浪费等问题。



Refrigerator Low-E missivity Glass 冷藏柜 Low-e 玻璃

Good appearance texture, neutral appearance, high visible light transmission, good transparency, excellent insulation effect, reduced condensation, reduced energy consumption, and reduced operating costs.

外观质感好，中性外观，较高的可见光透过，通透性好，卓越的保温隔热效果，减少结露现象，降低能耗，降低运行成本。



HEXAD GLASS

Freezer Glass 冷冻柜玻璃

Tempered glass and laminated glass have high strength and pressure resistance, and are not easily broken.
Tempered glass and laminated glass have high heat resistance and can withstand high temperature differences.
The transparency of glass is high, which can display the products inside the cabinet and improve the display effect
The crushing properties of tempered glass can prevent scratches and cuts, ensuring the safety of employees and consumers.

钢化玻璃和夹层玻璃具有较高的强度和耐压性，不易破碎。
钢化玻璃和夹层玻璃具有较高的耐热性，可以承受较高的温度差异。
玻璃的透明度高，可以展示柜内的商品，提高展示效果。
钢化玻璃的破碎性质可以避免划伤和割伤，确保员工和消费者的安全。



High temperature resistant glass 耐高温玻璃

The high-temperature resistant glass on the fireplace is both beautiful and energy-saving, with high thermal conductivity, which can effectively transfer heat to the indoor environment.
The size of the flame inside the furnace door can be effectively observed through glass windows, which has a significant energy-saving effect.
Fireplace glass has the superior performance of heat and cold resistant ,heat resestant 750 °C-800 ° C.

壁炉上的耐高温玻璃既美观又节能，导热率高，可将热量有效传递至室内。
透过玻璃窗能有效观测炉门内火焰大小，节能效果明显。
壁炉玻璃具有优越的耐冷热，耐热750° C-800° C。



HEXAD GLASS

Neutral Borosilicate Pharmaceutical Glass

药用中硼硅玻璃

Neutral borosilicate pharmaceutical glass, also known as 5.0 glass. With excellent chemical stability and thermal stability, It can be widely used in containing biological products, blood derivative products, freeze-dried preparations, vaccines and other high value-added drugs and special drugs with high PH value.

药用中硼硅玻璃也称 5.0 玻璃，具有优异的化学稳定性和热稳定性，主要应用于盛装生物制品、血液制品、冻干制剂、疫苗等附加值较高的药品和 PH 值较高的特殊药品

中硼硅药用玻璃性能 Performance of Neutral Borosilicate Pharmaceutical Glass

	单位
线膨胀系数Linear expansion coefficient	(3.5~6.1) ×10-6K-1(20℃~300℃)
三氧化二硼Diboron trioxide	不小于8%Noless than 8%
121℃颗粒耐水性Water resistance of particle at 121℃	符合1级Meet level 1
98℃颗粒耐水性Water resistance of particle at 98℃	符合HGB1级Meet level HGB1
内表面耐水性inner surface hydraulic resistance	符合HC1级Meet level HC1
耐酸性Acid resistance	符合1级 Meet Level1
耐碱性Alkali resistance	不低于2级No less than level 2
砷、锑、铅、镉浸出含量限度 The leaching limit of arsenic, antimony, lead and cadmium	As≤0.07mg/L;Sb≤0.7mg/L Pb≤0.8mg/L;Cd≤0.07mg/L



Stained GLass

教堂玻璃

Stained glass is a form of art and craftsmanship that involves creating designs using pieces of colored glass. These designs are often used in windows, particularly in churches and other significant buildings, to create beautiful and intricate patterns that can tell stories or depict scenes.

彩色玻璃是一种艺术和工艺，包括使用彩色玻璃片进行设计。这些设计经常用于窗户，尤其是教堂和其他重要建筑的窗户，以创造美丽而复杂的图案，讲述故事或描绘场景。

Step① - choose the best color:

Step② - Cut according to the drawing:

First make 1:1 paper drawings according to the customer's drawings. According to the actual size, different shapes of glass are cut from the template

Polish the cut glass, then cover the edges with copper foil

After finishing the different colors of glass and copper foil, place them separately for use

Step③ - Put the corresponding color at right position:

Step④ - After applying the flux, start soldering:

Step⑤ - Clean, air-dry, oxidize in air, synthesize insulating glass:

After double-sided soldering, the glass has residue and stains on the surface. After cleaning, apply anti-rust oil. → Place the cleaned glass in the air to oxidize the solder

After the solder oxidizes to black, clean it again and prepare hollow sheet → In order to strengthen the strength of glass, hollow plate is made

We have these colors:



HEXAD GLASS

Specific Terms

常见玻璃术语



Specific Terms 常见玻璃术语

太阳能透射比 (TSOL)

In the range of solar spectrum (300nm to 2500 nm), the ratio of solar energy intensity directly transmitting glass to incident solar energy intensity. Includes the transmission degree of ultraviolet, visible and near infrared energy, but does not include the portion of energy that the glass transmits to the outward secondary after the direct incident solar energy.

在太阳光谱 (300nm 至 2500nm) 范围内, 直接透过玻璃的太阳能强度对入射太阳能强度的比值。它包括了紫外线、可见光和近红外能量的透射程度, 但不包括玻璃吸收直接入射的太阳光能量后向外界二次传递的能量部分。

太阳能反射比 (RSOL)

In the range of solar spectrum (300nm to 2500 nm), the ratio of solar energy intensity reflected by glass to incident solar energy intensity.

在太阳光谱 (300nm 至 2500nm) 范围内, 玻璃反射的太阳能强度对入射太阳能强度的比值

太阳得热系数 (SHGC)

The ratio of total solar radiation energy through glass to incident solar radiation energy is also called solar factor

透过玻璃的太阳辐射总能量与入射太阳辐射能之比, 也称太阳因子 (Solar Factor)。其实它就是太阳能总透射比 g , 中国基础标准中采用 g 表示, 建筑热工应用标准中多用 SHGC。 $q = 0.875g$ (式中 0.87 为标准 3mm 透明玻璃的太阳能总透射比)

太阳红外热能总透射比 (g_{ir})

In the near infrared band of the solar spectrum of 790-2500 nm, the ratio of the sum of the solar radiation intensity directly transmitted through the glass and the part of the glass absorbing solar energy and then passing through the secondary heat transfer to the incident solar radiation intensity in the wavelength range, expressed as a percentage.

在太阳光谱的近红外波段 790-2500 纳米范围, 直接透过玻璃的太阳辐射强度和玻璃吸收太阳能再经二次传热透过的部分之和与该波长范围入射太阳辐射强度的比值, 以百分比表示。该部分太阳能进入室内后直接引起物体升温, 是夏季空调制冷的主要负荷。太阳红外热能总透射比是衡量 Low-E 玻璃隔热性能最直接和最准确的指标, 越低越好。

HEXAD GLASS

Specific erms 常见玻璃术语

可见光透射率 (LT):

The ratio of the amount of visible light that penetrates to the amount of incident light in the 380 to 780 nm spectral range when the D65 light source is used to irradiate the glass. The higher the number, the more light penetrates the glass, but it does not determine the color of the glass.

是指用 D65 的光源照射玻璃时，光谱范围在 380 至 780 纳米的可见光线的穿透量与入射量的比率。数值越高，穿透玻璃的光越多，但并不决定玻璃的颜色。

可见光反射率 (LR)

The ratio of the amount of reflected light to the amount of incident light in the 380 to 780 nanometers spectrum when the glass is illuminated by a D65 light source.

是指用 D65 的光源照射玻璃时，光谱范围在 380 至 780 纳米的可见光线的反射量与入射量的比率。

面电阻 (R)

Surface resistance, also known as film resistance and square resistance, is used to indirectly characterize the thermal infrared properties of film layer, glass coating layer, etc. , the value can be directly converted into thermal infrared emissivity. Its size is independent of the size of the sample and is expressed in Ω/port .

面电阻又称膜电阻、方块电阻，是用于间接表征薄膜膜层、玻璃镀膜膜层等样品上膜层的热红外性能的测量值，该数值的大小可直接换算为热红外辐射率。其大小与样品的尺寸大小无关，单位为 $\Omega/\square$ 。

雾度 (H)

A cloudy or cloudy appearance on the interior or surface of a transparent or semitransparent material caused by light diffusion. Expressed as a percentage of the diffused luminous flux to the luminous flux through the material. Haze illuminates transparent or semitransparent film, sheet and plate vertically with a parallel light of the standard "C" light source. Because of the internal and surface scattering of the material, the percentage of $T_d/T_{\perp 2}$ of the incident direction greater than 2.5° is an important parameter for the optical transparency of transparent or semitransparent materials.

透明或半透明材料的内部或表面由于光漫射造成的云雾状或混浊的外观。以漫射的光通量与透过材料的光通量之比的百分率表示。Haze 用标准 "c" 光源的一束平行光垂直照射到透明或半透明薄膜、片材、板材上，由于材料内部和表面造成散射，使部分平行光偏离入射方向大于 2.5° 的散射光通量 T_d 与透过材料的光通量 T_2 之比的百分率，是透明或半透明材料光学透明性的重要参数。



传热系数 (U值)

The K value (or U value) is the heat transfer coefficient of the glass, indicating that the heat passes through the center of the glass without considering the edge effect. Under steady-state conditions, the unit air temperature difference, the unit air temperature difference of the two sides of the glass passes through the unit area of heat per unit time.

K值 (或 U值) 即玻璃的传热系数，表示热量通过玻璃中心部位而不考虑边缘效应，稳态条件下，玻璃两面单位空气温度差，单位时间内，通过单位面积的热量。单位是: 瓦每平方米每开尔文 ($\text{W}/\text{m}^2 \cdot \text{K}$)。K值的测量有欧洲 EN673 标准 (ISO10292)、美国 NFRC100、美国 ASHRAE 标准。中国采用 JG《门窗幕墙热工性能计算》标准。对同一款产品，我国标准的 K 值与美国标准的 U 冬季值相等或相当，欧洲标准的 U 值最小。

辐射率 (E)

It is the ratio of the radiant heat per unit area of an object to the radiant heat of a blackbody at the same temperature and under the same conditions. It is a physical measure of how much energy an object radiates, Kirchhoff's circuit laws that the rate of radiation of an object in a thermodynamic equilibrium state is equal to its rate of absorption. Therefore: the lower the emissivity of the object, the lower its ability to absorb heat, the stronger the ability to reflect heat.

是某物体单位面积辐射的热量同黑体在相同温度、相同条件下辐射热量之比,黑体的辐射是最强的，因此辐射率取值在 0-1 之间。它是衡量物体辐射能量强弱(能力)的物理量;基尔霍夫定律:在热力学平衡状态下物体的辐射率等于它的吸收率。因此:物体的辐射率越低，其吸收热量的能力也越低，反射热量能力越强

相对湿度 (RH)

Refers to the water vapor pressure in the air and the same temperature at the saturation of water vapor pressure is saturated in the air, saturated when 100% Rh. The higher the humidity, the lower the relative humidity. Similarly, the higher the surface temperature of the outer glass, the less likely it is to condense.

指空气中水汽压与相同温度下饱和水汽压的百分比，是水蒸气在空气中达到饱和的程度，饱和时为 100%RH。当绝对湿度不变时温度越高相对湿度越小，同理外层玻璃表面温度越高，越不容易凝露。

可见光透射比 (TVIS)

Percentage of reflected light intensity on glass surface in the visible spectrum (wavelength: 380-780 nm)。

在可见光光谱(波长: 380-780nm)范围内，玻璃表面反射光强度的百分比。

可见光反射比 (RVIS)

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COMPANY PROFILE

HEXAD GLASS CO.,LTD., as a specialized and leading manufacturer and supplier of various glass products in China, aims to provide advanced one-stop glass solution to construction, decoration, transportation, defence, leisure & sports and so on.

We are proud of our strong competitiveness which is from advanced technology and strict quality control. We have always been devoted to the research and development of advanced manufacture techniques and implemented strict quality control through each step to guarantee qualified products. As one of the leading enterprises, HEXAD can supply a comprehensive range of products with top quality at competitive prices.

Besides advanced technology and strict quality control, HEXAD's strong competitiveness also comes from cordial and professional service. HEXAD's experienced and professional team can surely provide essential and necessary support and after-sale service to guarantee that all customers' requirements, no matter big or small, can be promptly and efficiently satisfied.

HEXAD, a partner you can trust ! HEXAD, a contribute to better life !



WORKSHOP SHOW



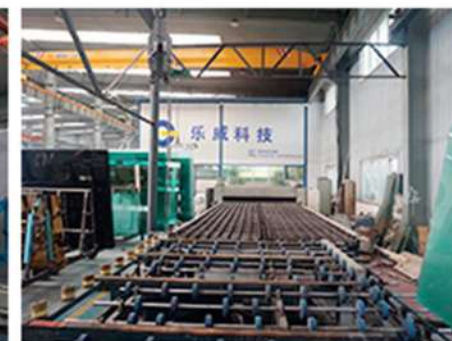
PRODUCTION LINE



Float Glass Line



Insulated Glass Line



Laminated Glass Line



Mirror Glass Line



Reflective Glass Line



Tempered Glass Line



OUR CERTIFICATE

