



YOUR EXTENDED HOME

High performance glazing specifically designed to maximise the comfort of your home.



YOUR EXTENDED HOME CONTENTS

- 3** Your comfort
- 4-5** How does glass affect the comfort of my home?
- 6-7** Glazing for large areas
- 8-9** Glazing for roofs & lanterns
- 10** Making the world a better home



YOUR COMFORT

Renovating or extending your home is a great way to improve and add value to your property. It also creates the opportunity to design a multi-purpose space to complement the way we live today.

Light and open spaces are proven to have a positive impact on our health and wellbeing. Typically, we now spend over 80% of our time indoors so incorporating large expanses of glazing to create larger and brighter internal spaces should be a crucial element of your build design.

Whether it's bi-fold or sliding doors, picture frame windows, lanterns, or a fully glazed roof, your glass choice matters.

Saint-Gobain Glass incorporates a range of technical coatings that can reduce your energy bills, prevent overheating and maximise natural light.

This brochure will help you understand these coatings and choose the glass option that is right for you.

HOW DOES GLASS AFFECT THE COMFORT OF MY HOME?

Did you know, it's the glass within your windows and doors which makes a huge difference to how your home feels?

The technical coatings on our glass can help minimise your energy bills, reduce external noise or maximise daylight without overheating or fading furniture.

Choosing the right glass can support you in creating a flexible and versatile living space that is usable all year round.

This section highlights the important factors to consider when designing your new space.



RETAINING INTERNAL HEAT

Our glass options all encompass coatings with varying properties that help stop heat escaping. This means that your glazing will retain the heat provided by radiators, for example, so that your room remains warmer in the winter months. Not only that, but you will use less energy in doing so.



Ask your glass supplier about u-values.

U-values indicate how well an insulated glass unit will retain internal heat. The lower the number, the more heat is retained inside your home.



REDUCING OVERHEATING

Rooms with lots of glass will give you a great view of the outdoors, but the warmth from natural daylight can sometimes make it uncomfortably hot on sunny days. Each of our glazing options has technically advanced solar control coatings designed to limit the amount of heat that passes through the window, resulting in a more comfortable living space.



Ask your glass supplier about g-values.

G-values measure the amount of heat that ends up in your room from the sun. The lower the g-value, the less heat transmits through the glass.

EASY TO CLEAN

Spend less time cleaning and more time enjoying your surroundings with our "BIOCLEAN®" coating which makes those hard to reach areas, such as roofs and lanterns, easier to clean.

BIOCLEAN® low-maintenance glass combines the natural action of the sun and rain to keep glass cleaner for longer. It will reduce how often you need to clean your windows meaning you will use less water, lowering your water bills and being kinder to the planet.



TOP TIP

Ask your glass supplier about our BIOCLEAN® range...

...which is available in a choice of coloured tints to complement your framing system or enhance your view of the world.



SECURITY, UV PROTECTION AND FURNITURE FADE

Larger glazed areas create amazingly bright rooms but at times can raise concerns around security and also the effects of UV rays on the inside of your home.

Opting for laminated glass with a 0.8mm interlayer helps protect against burglary and vandalism. Designed to meet the official police security standard* "Secured by Design" and Building Regulations (Doc. Q), the laminated interlayer makes your glazing much tougher to break through than standard glass.

As an added bonus, the layer also blocks over 99%** of UV rays, helping protect your furnishings and decor from fading.

* When used in conjunction with a compliant framing system.
** Calculated from UV transmittance in accordance with EN 410.



TOP TIP

Ask for "STADIP® PROTECT", Saint-Gobain's laminated glass with a 0.8mm interlayer.



REDUCING NOISE

Unwanted noise can be intrusive and have a big impact on general wellbeing and comfort within the home.

You can enhance your windows further by choosing a built-in interlayer that not only has all the benefits of laminate, but in addition provides 26%* better noise reduction values than traditional double glazing.

* Comparing a 4mm/16mm air cavity/4mm DGU with 4mm/16mm argon cavity/6.8mm STADIP® SILENCE DGU calculated in accordance with EN ISO 140 & EN ISO 717.



TOP TIP

Ask for "STADIP® SILENCE", Saint-Gobain's laminated glass with acoustic properties.



GLAZING FOR LARGE AREAS

Redesigning or extending your home is a major decision, with considerations around usage, size and design. Above all else, the comfort of your new space is paramount and it's here where the glass you choose can make all the difference.

Saint-Gobain Glass has two products specially designed for large glazed areas within the home such as bi-fold and sliding doors or picture frame windows.



PLANITHERM ONE T

High performance glazing designed to keep your home comfortable all year round.

Helping to eliminate cold areas around windows, PLANITHERM® ONE T has the ability to keep your living and working areas warmer in the winter months. Through its thermal insulation properties, less heat escapes from your home, consequently lowering your energy costs.

The high light transmission of the glass lessens the requirement for interior lighting during daylight hours, supporting your energy bills further and helping you reduce your carbon footprint.

The coating is also designed to control solar heat gain in summer, reducing overheating and allowing you to maximise the use of your home all year round. PLANITHERM® ONE T can transform refurbishment projects by delivering more appealing interior spaces that you will want to spend time in from dawn until dusk.



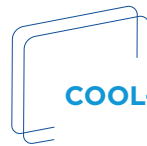
ENERGY SAVING



WINTER COMFORT



SUMMER COMFORT



COOL-LITE SKN 176 II

Superior glass providing year-round comfort with exceptional properties to prevent overheating.

With a neutral appearance and exceptional light transmission properties, COOL-LITE® SKN 176 II lets daylight flow into your home, supporting your personal wellbeing by bringing the outdoors in.

For sunnier days when you want to maximise natural light but still maintain a comfortable temperature inside, the coating helps significantly reduce the amount of heat from the sun entering your room, preventing overheating in the summer months.

COOL-LITE® SKN 176 reduces the need for expensive air conditioning in the summer months and expensive heating in the winter months. The high light transmission also reduces the requirement for interior lighting during the day. All combined, energy consumption is significantly lower, positively impacting your energy bills and carbon footprint.



ENERGY SAVING



REDUCES OVERHEATING



SUMMER COMFORT



DESIGN



WINTER COMFORT

Both products can be combined with laminated inner panes:

● STADIP PROTECT

Saint-Gobain's laminated glass with a 0.8mm interlayer, provides security, safety and furniture fade protection.

● STADIP SILENCE

All the benefits of STADIP® PROTECT plus noise reduction benefits.

PERFORMANCE DATA*

	PLANITHERM® ONE T	COOL-LITE® SKN 176 II
u-value (Thermal Insulation) Top Tip: the lower the number, the less heat escapes from your home	1.0	1.0
g-value (Reducing Overheating) Top Tip: the lower the g-value, the less solar heat penetrated through the glass	0.45 (55% of heat blocked)	0.37 (63% of heat blocked)
TL (Light Transmission) Top Tip: the higher the percentage, the more daylight transmitted through the glass	67%	70%

* All performance data is based on a unit configuration of 4mm outer pane, 16mm argon filled cavity, 4mm inner pane. To achieve these performance values, coatings must be on face 2 of the unit.



GLAZING FOR ROOFS AND LANTERNS

Our roof glass options encompass a special transparent coating embedded into the outer surface called **BIOCLEAN®**, helping the glass stay cleaner for longer.

BIOCLEAN® works by utilising daylight's ultraviolet rays to break down any dirt into smaller particles. The rain or waterjet then naturally washes the dirt away.

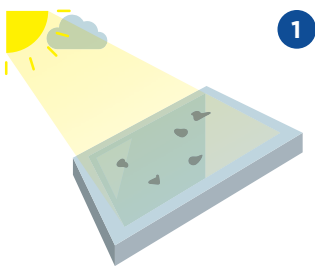
Due to the nature of the coating, BIOCLEAN® performs when on a gradient, allowing the water to flow across the glass and avoiding any streaks formed by water droplets.

HOW DOES IT WORK?

SGG BIOCLEAN® acts **100% naturally** by exploiting the dual action of daylight and rainwater.



Watch the demo.



BIOCLEAN® is activated by the sun's UV rays creating a photocatalytic process that breaks down dirt present on the surface of the glass.



BIOCLEAN®'s hydrophilic properties then help the water run off the glass surface easily, washing away the dirt, leaving your windows clean.

BENEFITS FOR YOUR CUSTOMERS



Time-saving



Easier to clean, and less often



Ideal for hard to reach places

CARE FOR THE ENVIRONMENT

- 100% natural action
- 100% recyclable glazing
- Glazing composed of up to 40% recycled glass
- Lower use of water and detergents



BIOCLEAN® is available on a range of tinted glass, specially selected to complement your frames, or enhance your view to the outside world.

Along with enhanced aesthetics, tinted glass also helps reduce overheating, making your space comfortable all year round. For maximum comfort, particularly in the summer months, choose our BIOCLEAN®+ range which has additional properties to minimise overheating.

BIOCLEAN®

MARIANA

Dark grey tinted roof glass, perfect for anthracite frames.



AZURA

Blue tinted roof glass designed to enhance any skyline.



SOLARA

Bronze tinted roof glass designed to complement wooden frames.



BIOCLEAN®+

NATURA+

Clear roof glass designed to see the world in its natural beauty.



AQUA+

Green tinted roof glass perfect for complementing nature.



AZURA+

Blue tinted roof glass designed to enhance any skyline.



All images are for illustration purposes only. Please request a sample.

Glass Type	Tint	u-value (the lower the number the more internal heat remains in the home)	g-value (the lower the number the less heat transmitted into your home)	TL (the % of light entering the room)
Mariana	Ultra Grey	1.0	0.08 (99% of heat blocked)	7%
Azura	Blue	1.0	0.33 (67% of heat blocked)	47%
Solara	Bronze	1.0	0.34 (66% of heat blocked)	43%
Natura+	Clear	1.0	0.30 (70% of heat blocked)	38%
Aqua+	Green	1.0	0.18 (82% of heat blocked)	28%
Azura+	Blue	1.0	0.17 (83% of heat blocked)	23%

Each of our roof glass options is combined into an insulated glass unit with BIOCLEAN® on the outer pane (face 1) and PLANITHERM® ONE T on the inner pane (face 3). Figures are based on 4mm-16mm-4mm DGU configuration.





**MAKING
THE WORLD
A BETTER
HOME**

Saint-Gobain Glass is Europe's leading manufacturer of flat glass for the UK. Our vision is to be the reference for innovation and service, achieved by putting the customer at the heart of everything we do to offer unrivalled products and services.

Our purpose is "Making the world a better home". Together with and for our customers, we design, manufacture and distribute materials and solutions that have a positive impact on everyone's life and provide well-being, quality of life and performance, while caring for the planet.

Saint-Gobain's 350 years of history have been an ongoing film of change and adaptation, demonstrating that industry is movement.



WE RECYCLE OLD WINDOWS

Our commitment to sustainability enables us to develop innovative, effective products and solutions that meet the challenge of protecting the environment.

Flat glass is constantly evolving in response to the new uses and environmental requirements which are increasingly important within the construction industry.

In particular, the recovery of glass at the end of its life cycle and the use of recycled glass

(cullet) in the manufacturing process make it possible to conserve resources and limit CO₂ emissions.

Saint-Gobain Glass currently operates the UK's largest cullet return scheme, recycling in excess of 55,000 tonnes of glass annually. Since the introduction of cullet use in the manufacture of float glass, we have been able to increase the amount of recycled glass utilised to as much as 41% in some cases, which is a significant step towards reducing our environmental impact.





SAINT-GOBAIN GLASS

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