

See the world differently

Pilkington **Mirai™**



Overview

Introducing Pilkington **Mirai™**, our new low carbon glass offering a market leading 52% less CO₂e* vs our standard glass product.

By combining nearly 200 years of glass making expertise, the development of Pilkington **Mirai™** was made possible through a series of technical world firsts and a holistic approach to sustainability.

Mirai, meaning 'future' in Japanese, was developed to mark the start of the next generation of low carbon glass products to help meet stricter sustainability requirements in the built environment.

Achieved using a combination of alternative fuel, high recycled glass content, and green electricity sources, Pilkington **Mirai™** offers identical quality, performance, and aesthetics as Pilkington **Optifloat™** Clear, but with only half the impact on the environment.

Features at a glance

- 52% less embodied carbon* compared to our standard float glass
- A low Global Warming Potential (GWP**) of only 5 kg CO₂e per m²
- Manufactured using a combination of alternative fuel, high recycled glass content, and 100% renewable electricity
- Identical neutral aesthetics, exceptional quality, and performance as our standard product, manufactured in accordance with EN 572-2

Circular economy

The building sector is responsible for more than one third of the EU's carbon emissions with buildings accounting for over 40% of the energy consumed. With more focus than ever on lowering the embodied carbon in construction, demand for low carbon building materials is increasing. Even though glass is an endlessly recyclable material, as a leading glass manufacturer, we have a significant opportunity and responsibility to make **change™** in our industry and support the built environment by developing low carbon products such as Pilkington **Mirai™** as part of the wider solution.

Range

Available in 4, 6, and 8 mm in standard stock sizes. For other thicknesses please contact your Sales Representative.

Pilkington **Mirai™** can also be offered in combination with our high performance low-e and solar control coating ranges such as Pilkington **Optitherm™**, Pilkington **Suncool™** including laminated and acoustic variants and has been designed for both commercial and residential segments.

Performance & aesthetics

Pilkington **Mirai™** is a base glass substrate and when further coated or laminated, offers the same appearance, performance and quality as our standard products.

Coating	Light		Solar Radiant Heat				U _g -value [W/m ² K]	Performance inc. Acoustic Light Transmittance g-value (R _w)
	Transmittance	Reflectance	Direct Transmittance	Reflectance	Absorptance	Total Transmittance (g-value)	Argon (90%)	
Outer pane specified below – 16 mm 90% argon filled cavity – 4 mm Pilkington Mirai™ inner pane								
4 mm Pilkington Mirai Suncool™ 70/35	0.71	0.16	0.36	0.38	0.26	0.38	1.0	71/38 (31 dB)
Outer pane specified below – 16 mm 90% argon filled cavity – 6 mm Pilkington Mirai™ inner pane								
6 mm Pilkington Mirai Suncool™ 70/35	0.70	0.16	0.34	0.35	0.31	0.37	1.0	70/37 (31 dB)
4 mm Pilkington Mirai™ outer pane – 16 mm 90% argon filled cavity – Inner pane specified below								
4 mm Pilkington Mirai Optitherm™ S1 Plus	0.66	0.25	0.41	0.42	0.17	0.48	1.0	66/48 (31 dB)
6 mm Pilkington Mirai™ outer pane – 16 mm 90% argon filled cavity – Inner pane specified below								
6 mm Pilkington Mirai Optitherm™ S1 Plus	0.65	0.24	0.39	0.39	0.22	0.47	1.0	65/47 (31 dB)

* Compared with our standard 4 mm Pilkington **Optifloat™** Clear (European baseline).

** As per Environmental Product Declaration (EPD S-P-11498) for Pilkington **Mirai™** verified by an independent third party.

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UK CA Marking confirms that a product meets the requirements of its relevant UK-designated standard and can be placed on the market in Great Britain. The UK CA Marking Declaration of Performance for each product can be found at www.pilkington.com/ukca



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Towards a sustainable future