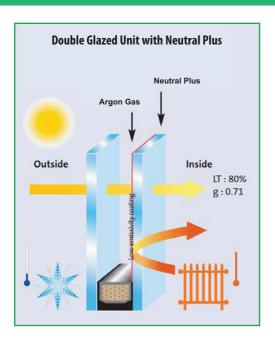
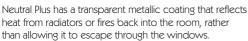
Improve the energy efficiency of your windows and help reduce your heating bills





At the same time it allows free heat and light from the sun (known as passive solar heat gain) to pass through the glass, warming your home and further contributing to the energy efficiency of your windows.





Performance

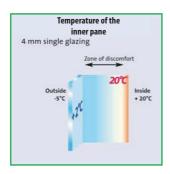
Improved thermal insulation - reduces heat loss more effectively than traditional low-E coatings.

Promotes passive solar heat gain - free heat from the sun passes easily through the glass helping to warm your home.

Improved energy efficiency - reduced need for heating helps to save energy and protect the environment whilst saving you money on heating bills.

More comfortable rooms - improved thermal insulation means fewer cold spots and drafts near windows and doors

Less condensation - the inner surface of the glass stays warmer reducing internal condensation and prolonging the life of your window.







Neutral Appearance

No unsightly tint - Unlike traditional low-E coatings that suffer from an unsightly yellow tint, Neutral Plus looks very clear. This means your curtains or Georgian Bars will not look dirty or discoloured.

More light - less tint also means more light can enter the room, making it more comfortable and luminous.

No 'haze' effect - Neutral Plus does not suffer from the unsightly haze commonly associated with traditional low-E products.



NEUTRAL PLUS

High Performance
Sealed Units

About Argon Gas

What does argon gas do for a window?

Argon gas increases the windows ability to insulate. Because argon gas does not conduct heat as readily as air, its thermal conductivity is 30% lower than air. It helps keep heat in during the winter.

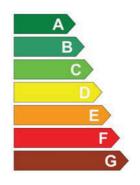
How long will the gas stay in the sealed unit?

Numerous studies show that gas typically leaks out less than 1% a year. Over twenty years the window will have 80% of the gas still trapped inside it.

Is argon gas dangerous?

An emphatic no! – argon gas exists naturally in the air you breathe. It is both non toxic and inert. Is it only for energy saving? Whilst energy savings are important, the real "comfort" benefit of gas filling is the increase in the inner glazing temperature. Raising the inner glass temperature eliminates or substantially reduces condensation on the glass. A "warmer" surface is also more comfortable to be near.

Helping to Achieve WERs (Window Energy Ratings)



The overall performance of a window is dependent on the combined effect of the frame and glazing components and the air-tightness of the finished window. Ratings may be improved by decreasing thermal losses and/or by increasing solar gains.

Neutral Plus sealed units combine excellent thermal insulation with high solar heat gain, making them one of the most energy efficient glazing products available, ideal for helping achieve higher WERS.

U Value Comparison

Existing Product	U Value	Replaced With	Value	% Thermal Improvement
Single Glass	5.8 W/m²K	Neutral Plus (Argon Filled)	1.2 W/m²K	79%
Standard Unit (Air Filled)	2.8 W/m ² K	Neutral Plus (Argon Filled)	1.2 W/m ² K	57%
Standard Low E Unit (Air Filled)	1.7 W/m²K	Neutral Plus (Argon Filled)	1.2 W/m²K	29%
Standard Brick Cavity Wall (No Insulation)	1.6 W/m ² K	Neutral Plus (Argon Filled)	1.2 W/m ² K	25%
Standard Low E Unit (Argon Filled)	1.5 W/m²K	Neutral Plus (Argon Filled)	1.2 W/m ² K	20%

U Value Explained

The U Value of a material is the measure of air-to-air heat transmission due to thermal conductance and the difference in indoor and outdoor temperatures. As the U Value decreases, so does the amount of heat that is transferred through the sealed unit. The lower the U Value, the more effective the sealed unit is.

Less Heat Loss So Lower Fuel Bills

Neutral Plus sealed units are nearly 60% more efficient than a standard clear float double glazed unit and nearly 30% more efficient than a unit containing "hard" coated Low-E glass. It will also substantially reduce condensation because of the warmer internal surface.

High Light Transmittance

Neutral Plus sealed units offer the maximum amount of light transmittance at 79%. Unlike "hard" coated low emissivity glasses there is no haze visible in certain lighting conditions. It produces a more natural and attractive appearance.

Product Usage Guide

Application	Sealed Unit Configuration	I	% Solar Heat Gained	Value	Permanent Self -Cleaning	Virtually Eliminates External Condensation
	Outer Pane	Inner Pane				
Side Walls	Neutral Plus	Neutral Plus	71%	1.2 W/m ² K		
Side Walls & Roof	SGG Bioclean	Neutral Plus	67%	1.2 W/m²K	V	V

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