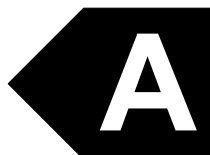
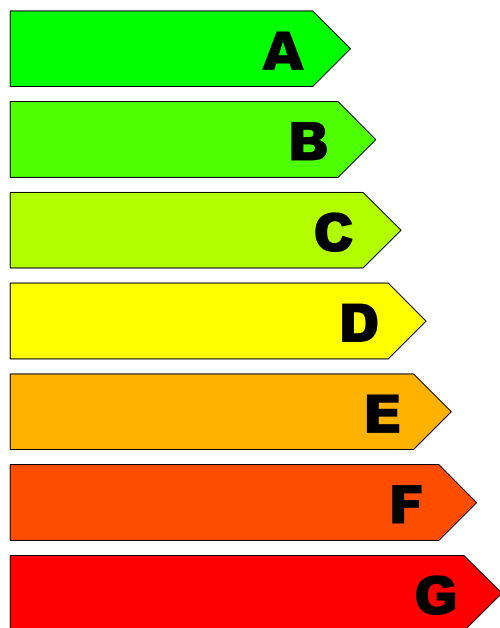


WER: Window Energy Performance Certificate

WER Window Energy Rating - In accordance with Approved Document L



Company

**Swadlincote
Windows Company
Ltd.**

Date

13 Nov 2025

BFRC System

SC010

BFRC Manufacturer

M1107

BFRC Simplified Energy Licence

SEL 6167

WER: Window Energy Rating:
 $196.74((1-f) \times g_{\text{glass}}) - 68.5 \times (U + (0.0165 \times A_L))$ **1.1 kWh/m²/Year**

Thermal Transmittance: WER U Value of Window calculated using the methods and conventions set out in BR443
Whole Window U Value with frame, glazing and glass spacer bar combined.
Standard Window configuration set out in BR443/GGF 2.3
U Window: $0.496 + 0.604 + 0.119$ **1.219 W/m²K**

Frame: Supplier: Smart Architectural Aluminium
System: Alitherm 400
Outer Frame: ETC4110F (1.556)
Vent Frame: ETC4129F (2.218)
Transom Mullion: ETC4130F (2.112)
Heat Transfer: $U_f 2.024 \text{ W/m}^2\text{K} \times (24.5\% \text{ Frame})$ **0.496 W/m²K**

Glazing: Supplier: Saint Gobain
Specification: 6.8/10/4/12/4 Lam Ext + Planitherm Ctr + Planitherm Int + Argon Fille
Centre Pane, g Value: $0.80 \text{ W/m}^2\text{K}, 0.57$
Heat Transfer: $CP 0.80 \text{ W/m}^2\text{K} \times (75.5\% \text{ Glass})$ **0.604 W/m²K**

Spacer: Supplier: Thermoseal
Spacer Bar: Thermobar
Heat Transfer: $Psi 0.029 \text{ W/mK} \times (4.092 \text{ m/m}^2)$ **0.119 W/m²K**

U Value: Window U Value:
Calculation to Document L 2021 $1.23 \text{ m}(\pm 25\%) \times 1.48 \text{ m}(-25\%)$ **1.2 W/m²K**

