

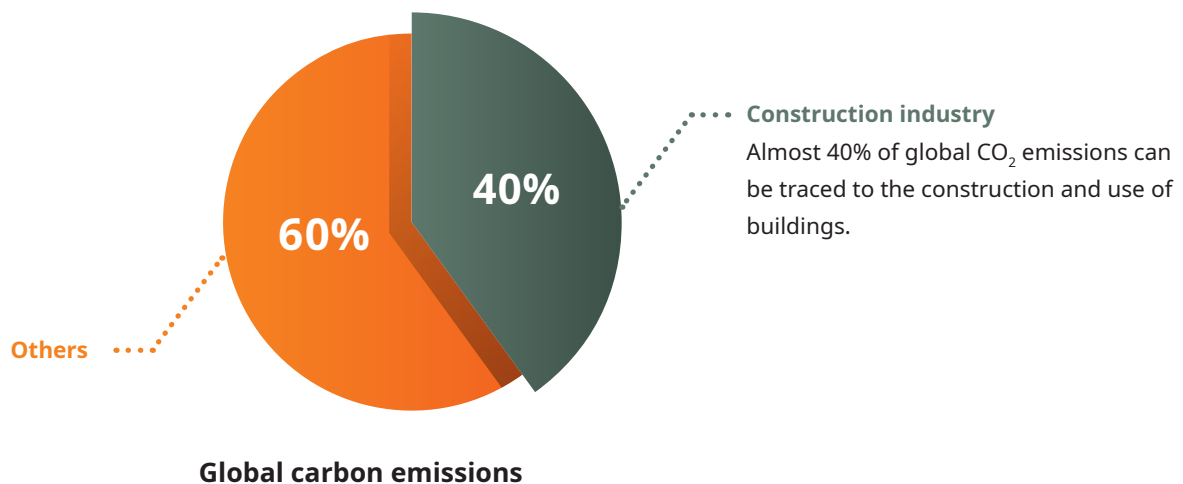


**How to improve the CO₂
emissions** of your insulating
glass units with SWISSPACER

SWISSPACER
The edge of tomorrow.

DECARBONISING INSULATING GLASS UNITS WITH SWISSPACER

REDUCING CARBON EMISSIONS AND MINIMISING THE NEED FOR RESOURCES – THAT COMES RIGHT AT THE TOP OF THE AGENDA IN THE CONSTRUCTION INDUSTRY. WITH A PRODUCT PORTFOLIO TO MATCH, MANUFACTURERS HAVE THE OPPORTUNITY TO PLAY A KEY ROLE IN ACHIEVING THESE TARGETS.



Using SWISSPACER makes an important contribution to the decarbonisation of insulating glass units. That supports you as a manufacturer in securing your position on a market that already aims at creating a sustainable construction industry and will do so even more strongly in the future.

Through the introduction of numerous regulations, guidelines and initiatives, governments and institutions are targeting the necessary promotion of sustainability. Green Building certifications are also contributing to the trend of sustainability within the industry. In order to meet the regulatory requirements and certification criteria, low-carbon construction products are needed.

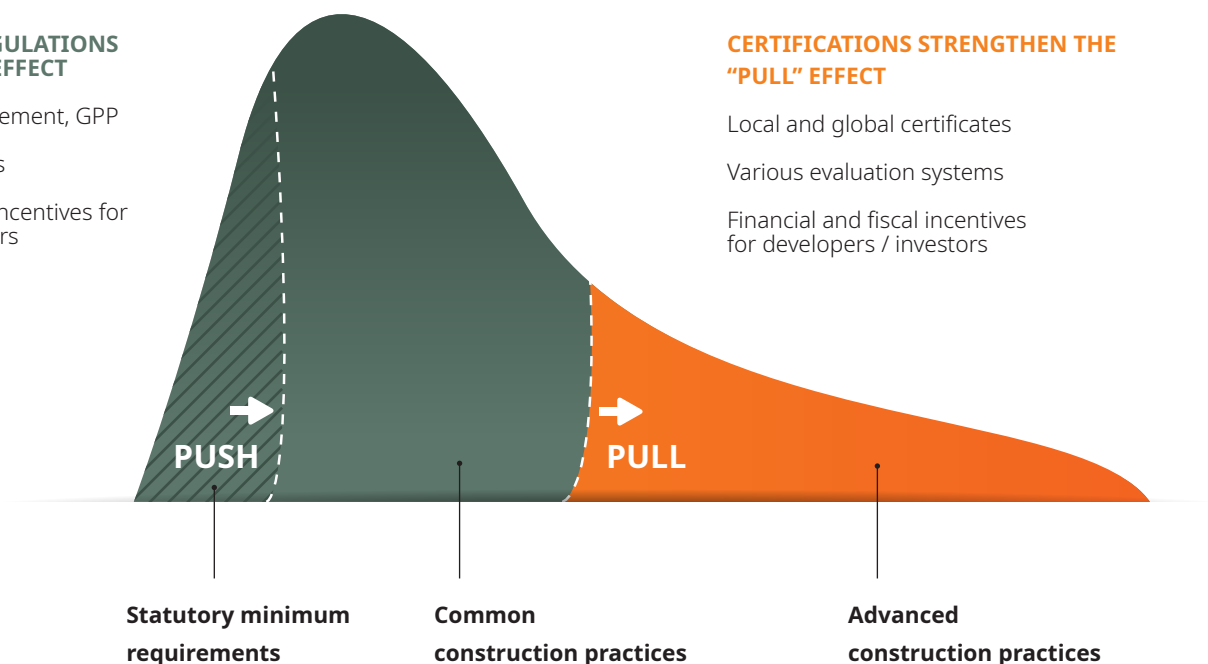
ARCHITECTS, DEVELOPERS AND OTHER STAKEHOLDERS EXPECT THE MARKET TO PROVIDE THEM WITH SUSTAINABLE PRODUCTS WITH A LOW CARBON FOOTPRINT

GOVERNMENT REGULATIONS CREATE A "PUSH" EFFECT

Green Public Procurement, GPP
Stronger regulations
Financial and fiscal incentives for developers / investors

CERTIFICATIONS STRENGTHEN THE "PULL" EFFECT

Local and global certificates
Various evaluation systems
Financial and fiscal incentives for developers / investors



The degree of sustainability of their construction products will increasingly influence the position of bidders – as forecast by a wide range of institutes and trend researchers.

SWISSPACER SPACER BARS OFFER A VERY SIMPLE WAY TO REDUCE THE CARBON FOOTPRINT OF INSULATING GLASS UNITS.

Why?

Manufacturing SWISSPACER spacer bars produces only 0,88 kg of CO₂ for a frame with a total length of 4 metres (i.e. a 1 m² insulating glass unit). By comparison: Manufacturing the aluminium to produce the material needed for an identical spacer bar frame alone emits 1.5 kg of CO₂ – without taking into consideration the further processing of the material into a hollow spacer bar profile*. That's 88% more!

Not to forget that the trend towards lighter insulating glass units (e.g. 3-16-3) means that the relative proportion of the CO₂ emissions of the spacer bar as part of the overall unit increases still further.

* Figures are taken from the life cycle assessment (LCA) software GaBi.

THE EXTRAPOLATIONS FOR VARIOUS STRUCTURES ALSO SHOW: **SWISSPACER IS THE MOST SUSTAINABLE SPACER BAR OPTION FOR YOUR INSULATING GLASS UNITS.**



Single-family house

30 m² double insulating glass unit

Swisspacer 26.4 kg CO₂

Hybrid spacer bar 37.5 kg CO₂

Aluminium 45 kg CO₂



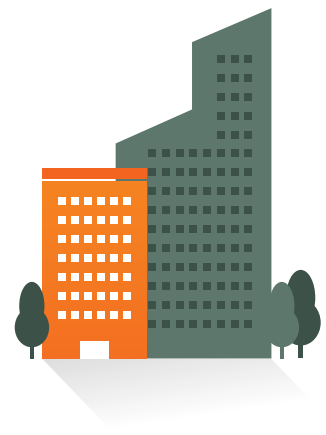
Multi-family house

150 m² double insulating glass unit

Swisspacer 132 kg CO₂

Hybrid spacer bar 187.5 kg CO₂

Aluminium 225 kg CO₂



Office building

300 m² double insulating glass unit

Swisspacer 264 kg CO₂

Hybrid spacer bar 375 kg CO₂

Aluminium 450 kg CO₂



IN A SINGLE-FAMILY HOUSE WITH **30 M²** OF DOUBLE GLAZING, THE SWISSPACER SPACER BARS NEUTRALISE YOUR OWN PRODUCTION EMISSIONS AFTER JUST **2.5 MONTHS**

Our spacer bars help to save on heating costs. They therefore gradually offset your production emissions.

But what does that mean in numbers? Let's consider a single-family house with 30 m² of insulating glass units. Manufacturing the necessary SWISSPACER spacer bar frames produces a CO₂ equivalent of 26.4 kg.

This figure compares with significant CO₂ savings during the utilisation phase: Compared to aluminium spacer bars, the lower heating energy with SWISSPACER ULTIMATE reduces CO₂ emissions for the example single-family house by 11.7 kg of CO₂ per month*. This means that after 2.5 months, the production emissions are neutralised by the positive CO₂ effects of our spacer bars.

* The example refers to a low-energy house with double glazing or a passive house in a cool temperate climate.

See 8% study of the Passive House Institute:

<https://en.swisspacer.com/8percent>



APART FROM THE LOW CO₂ EMISSIONS, THE HIGH-PERFORMANCE SWISSPACER WARM EDGE OFFERS EVEN MORE ADVANTAGES.

U_w⁺

The SWISSPACER warm edge is the most efficient way to improve the U_w value of a window.



The SWISSPACER warm edge is aesthetically appealing thanks to

- the wide colour pallet
- parallel frames in triple glazing units
- perfectly right-angled corners
- a matt surface with discreet laser marking



The SWISSPACER warm edge is the most efficient way to lower energy costs and save money.



The SWISSPACER warm edge is a perfect way to strengthen the position of an insulating glass unit manufacturer or window maker on the market and to boost sales.

ENERGY EFFICIENCY IS AT THE HEART OF THE COMPANY. SWISSPACER HAS SET ITSELF THE GOAL OF REDUCING ITS OWN CARBON FOOTPRINT THROUGH A RANGE OF DIFFERENT MEASURES.

SWISSPACER products reduce the carbon footprint of buildings – both with regard to the emissions produced when manufacturing the insulating glass units as well as through the energy savings achieved while the units are in use in the building.

SWISSPACER products therefore help to lower the energy costs of buildings. In addition, they increase thermal well-being and thus living comfort.

SWISSPACER implements various measures aimed at improving its own environmental performance. Recording the data required to obtain the EPDs is an important basis for being able to evaluate and optimise the emissions of the products and of the company.

SWISSPACER – THE COMPANY

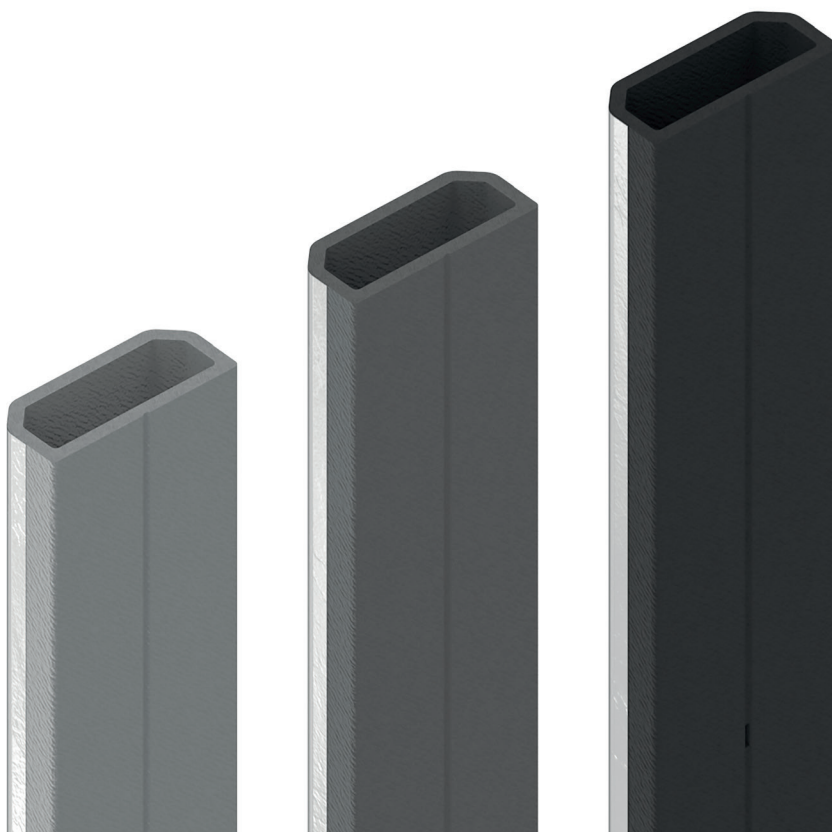
SWISSPACER operates globally and is a leader in the innovation of warm edge spacer bars. The products impress with their excellent functional and aesthetic properties. The product portfolio is supplemented with the component SWISSPACER AIR, which enables the equalisation of pressure inside the insulating glass unit. Founded in 1998, the company belongs to the Saint-Gobain Group.

The company's headquarters with production, R&D and administrative offices are located in Switzerland. There are further production sites in Germany and Poland. With our storage sites in Germany, Poland and the UK, we guarantee our customers particularly efficient logistics and optimal reach.

ABOUT SAINT-GOBAIN

Saint-Gobain develops, manufactures and sells materials and services for the construction industry and for a wide range of industrial applications. The group is a world leader in the area of lightweight and sustainable construction. The system solutions of Saint-Gobain for the construction of new and the renovation of existing public and private buildings, the lightweight construction

and decarbonisation of the construction sector and of industry in general are developed in a process of continuous innovation. They offer sustainability and performance. Pointing the way for the engagement of the Saint-Gobain Group is its purpose of "MAKING THE WORLD A BETTER HOME". The group employs more than 167,000 people and is represented in 75 countries.

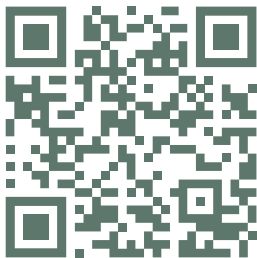


DID YOU KNOW?

THE SWISSPACER EPDS ARE ONLINE!

Environmental product declarations (EPD) are based on a life cycle analysis (LCA) and supply detailed information about a product's environmental impacts. Using the transparent and verified data provided by the EPDs makes it possible to select low-emission products. EPDs help to achieve the highest environmental standards for buildings, such as LEED, BREEAM and DGNB, and therefore give you, as a manufacturer of insulating glass units, additional sales arguments.

You can find the full set of precise figures and values on the environmental balance of our products in our EPDs: <https://en.swisspacer.com/downloads>



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