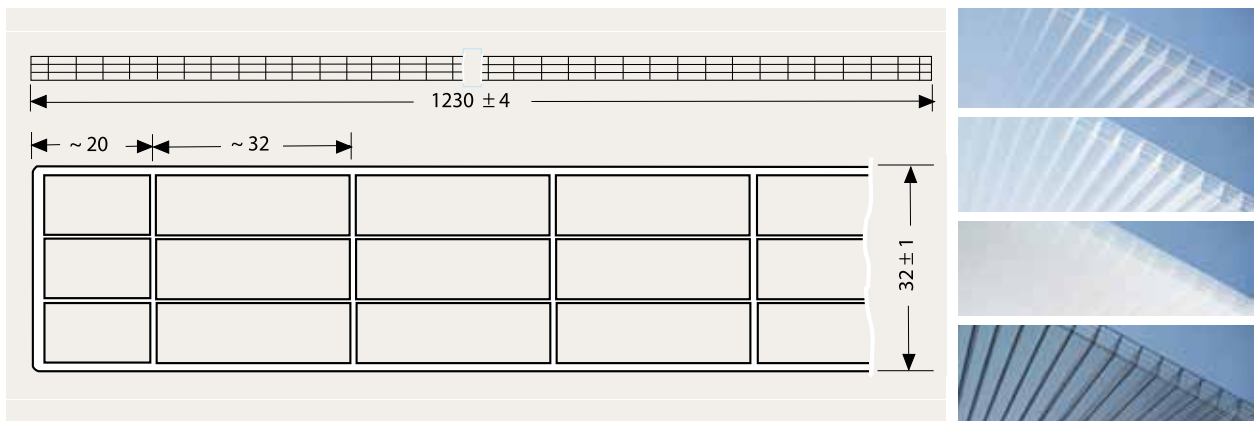


# PLEXIGLAS RESIST®

## S4P 32/1230-32

### Product Description

## Technical Information



Section of PLEXIGLAS RESIST® S4P 32 (dimensions in mm)

### Product and Benefits

PLEXIGLAS RESIST® \*) S4P 32 is a quadruple-skin sheet of impact-modified acrylic (polymethyl methacrylate, PMMA). It is highly heat-insulating and light transmitting, and durably weather-resistant.

#### PLEXIGLAS RESIST® S4P 32 is suitable for

- patio roofs
- conservatories
- carports
- skylights
- porch roofs
- façades
- balconies
- etc.
- greenhouses

#### Advantages of PLEXIGLAS RESIST® S4P 32

- is extraordinarily UV-resistant and includes a 30-year guarantee against yellowing\*\*)
- offers excellent protection against excessive amounts of harmful UV radiation
- is very safe to handle
- helps save energy and minimize CO<sub>2</sub> emissions
- is hail-resistant, with a 10-year guarantee for withstanding hailstones with a kinetic energy of 1 joule.
- is available in a range of colors.

#### Heat Insulation

Thanks to its excellent U-value, this sheet satisfies the requirements of the German Energy Conservation Regulation (EnEV). It is therefore suitable for highly heat-insulating glazing in private construction as well as factory units and sports halls.

### Loadbearing Capacity

Owing to its high rigidity, this sheet can be used for large spans. Few supports are required- and no additional cross-members at all for loads of up to 1,000 N/m<sup>2</sup>- which produces fewer shadows indoors and reduces construction costs.

### NO DROP coating

The water-dispersing NO DROP\*\*\*) coating applied on one side of the sheet causes any surface water to form a thin, continuous film. When the sheet is installed with the NO DROP coating on the outside of the roof, the coating can support the natural cleaning of the roof by rainwater. When the coating is on the inside, it contributes toward preventing any condensed water from forming drops and thus averts the damage caused by dripping.

The NO DROP coating is covered by a protective layer applied during manufacture. The protective layer can be washed off by sponging or hosing down with water; this activates the NO DROP coating.

\*) European Patent 733 754

\*\*) Applies for clear PLEXIGLAS® multi-skin sheeting as in the guarantee statement

\*\*\*) European Patent 149 182



The sheet is protected from UV radiation by Naturally UV-Stable technology.



## Technical Data (Typical Values)

Available lengths	2,000 to 7,000 mm	
Light transmittance $\tau_{D65}$	Clear 00721 NO DROP	ca 76 %
	Clear 00721 C	ca 74 %
	White WA012	ca 64 %
	Grey 7RS22 NO DROP	ca 36 %
Total energy transmittance $g$	Clear 00721 NO DROP	ca 71 %
	Clear 00721 C	ca 69 %
	White WA012	ca 60 %
	Grey 7RS22 NO DROP	ca 50 %
Heat transfer coefficient $k$	1.6 W/m <sup>2</sup> K	
Coefficient of linear thermal expansion $\alpha$	0.09 mm/m °C	
Possible expansion due to heat and moisture	ca 6 mm/m	
Max. permanent service temperature without load	70 °C	
Weighted sound reduction index (estimated)	ca 24 dB	

## Fire Behavior

- The fire behavior of PLEXIGLAS® is rated as European Class E according to DIN EN 13501.
- PLEXIGLAS® burns almost entirely without smoke according to DIN 4102 and is easily extinguished.
- The smoke gases produced by PLEXIGLAS® are neither acutely toxic according to DIN 53436 nor corrosive according to DIN VDE 0482-267.
- Roof surfaces glazed with PLEXIGLAS® open up by melting in the event of fire, allowing smoke and heat to escape.

## Guarantee

The guarantee conditions for this and other products are available at [www.plexiglas.net](http://www.plexiglas.net).

## Loadbearing Capacity

### Support spacing

For loads of up to 1000 N/m<sup>2</sup>, PLEXIGLAS RESIST® S4P 32-1230 quadruple-skin sheet supported evenly on all four sides requires no additional cross-members.

For higher loads, the spacings shown in the table apply.

The loadbearing capacity of PLEXIGLAS RESIST® S4P 32-1230 is determined in accordance with ETAG 010 (the European Technical Approval Guidelines for self-supporting translucent roof kits), with a clamping depth of 20 mm being assumed for the sheet in the glazing system.

For lower clamping depths the spacing of the supports is to be reduced accordingly.

Load [N/m <sup>2</sup> ]	Support spacing [m]
750	No cross-members
1,000	No cross-members
1,250	5.7
1,500	4.2
1,750	3.7
2,000	3.3
2,250	3.1
2,500	2.9
2,750	2.7
3,000	2.6

® = registered trademark

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Evonik Röhm GmbH is certified to DIN EN ISO 9001 for quality management and to DIN EN ISO 14001 for environmental management.

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