ALUMINIUM SYSTEMS

Ponzio®

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ALUMINIUM SYSTEMS

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- **IFT ROSENHEIM** (Germany)
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- **UBAtc** (Belgium)
- **IRcCOS** (Italy)
- **GIORDANO** (Italy)

Potential of Ponzio Poland

Technical Department	*responsible for both R&D and technical support for joinery manufacturers*
Project Management Department	*cooperates with design studios and supports architects*
Production Department	*equipped with modern, automated coating lines, thermal break assembly lines and profile bending machinery*
Quality Control Department	*guarantees the highest quality of manufactured systems*
Sales Department	*provides customer care for the large network of our Customers – joinery manufacturers*
Logistics Department	*coordinates our transport fleet and takes care of on-time deliveries in Poland and abroad*
Acquisitions Department	*responsible for dealing with suppliers and stock replenishment*
High-bay Warehouses	*among the largest in the industry*

Ponzio®

About Ponzio

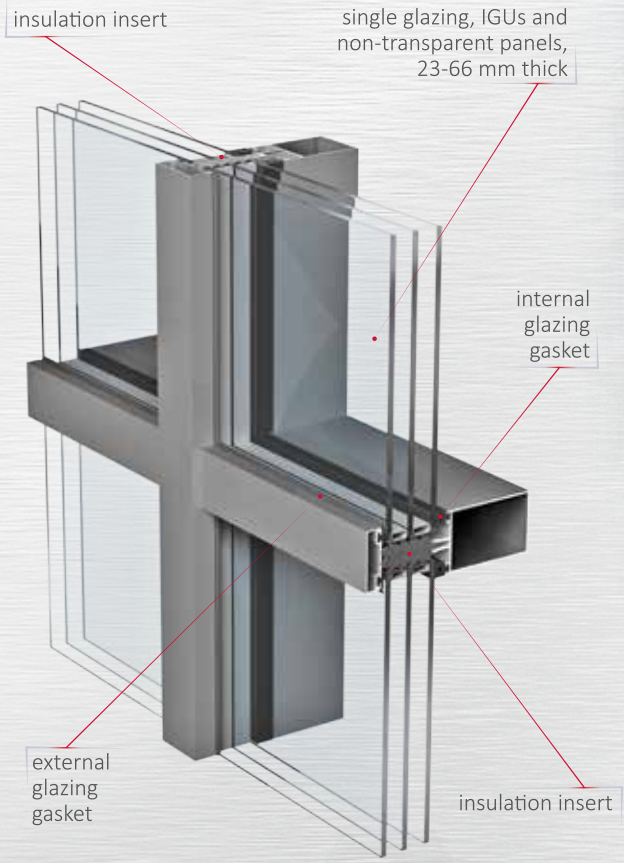
The Ponzio Group is one of the leading manufacturers of aluminium profile systems. This position was achieved by implementing a consistent strategy and with the help of a team of professionals which forms the core of our company. Raw materials and components are purchased from internationally renowned suppliers. The whole manufacturing process is handled by top-of-the line, automated machinery and undergoes strict quality control at every stage. We also have our own laboratory which is used for testing the performances of aluminium constructions.

Innovation is one of the main goals of Ponzio. Our aluminium profile systems are designed to fulfill the most stringent requirements. The wide array of system solutions inspire architects to design modern and functional buildings. Many interesting works of architecture located all around the world are the result of our cooperation with designers and investors.

On-time deliveries are coordinated by our advanced logistics centre. Our very own fleet of transport vehicles ensures efficient deliveries to any place in Europe.

CURTAIN WALL SYSTEMS

Ponzio PF152HI



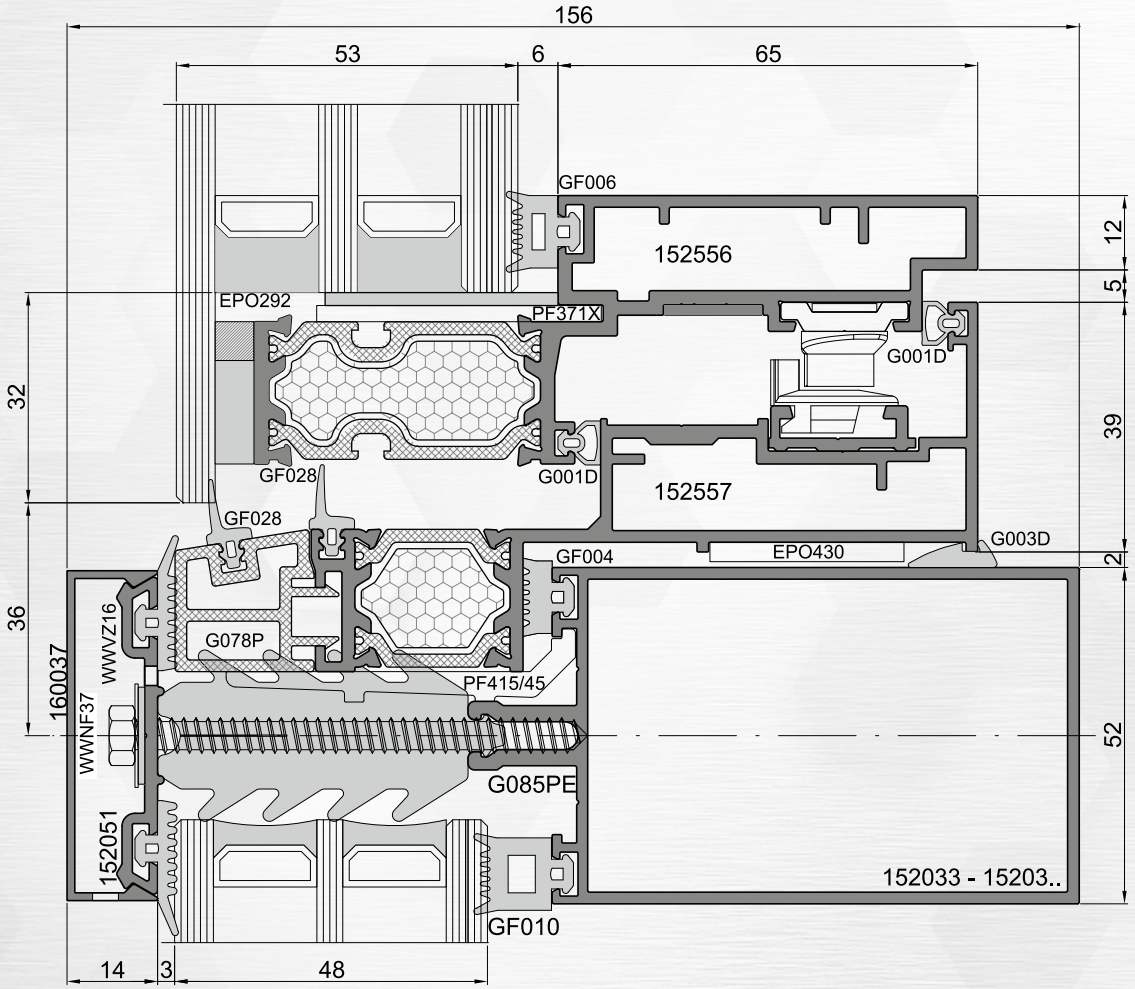
U_{cw} = 0.62 W/m²K

*reference construction dimensions: L 1200 x H 2500 mm
U_g = 0.5 W/m²K, triple glazing

A mullion-transom system designed for the construction of curtain walls, roofs, rooflights with improved thermal characteristics.

- *high thermal insulation, sound reduction, watertightness and resistance to wind load performance values*
- *the Ponzio PF152HI PASSIVE variant is certified by the Passivhaus Institut in Darmstadt (phA class)*
- *solutions for steel and wooden subconstructions*
- *fire-resistant spandrel solutions available (EI60 class)*
- *external cover profile width - 51 mm*
- *wide range of possible geometrical designs and colours*
- *several types of external decorative elements available*
- *"horizontal" or "vertical" line constructions*
- *profile bending possible*
- *Ponzio system windows may be used as filling*
- *interconnected with other Ponzio systems*

Ponzio PF152HI

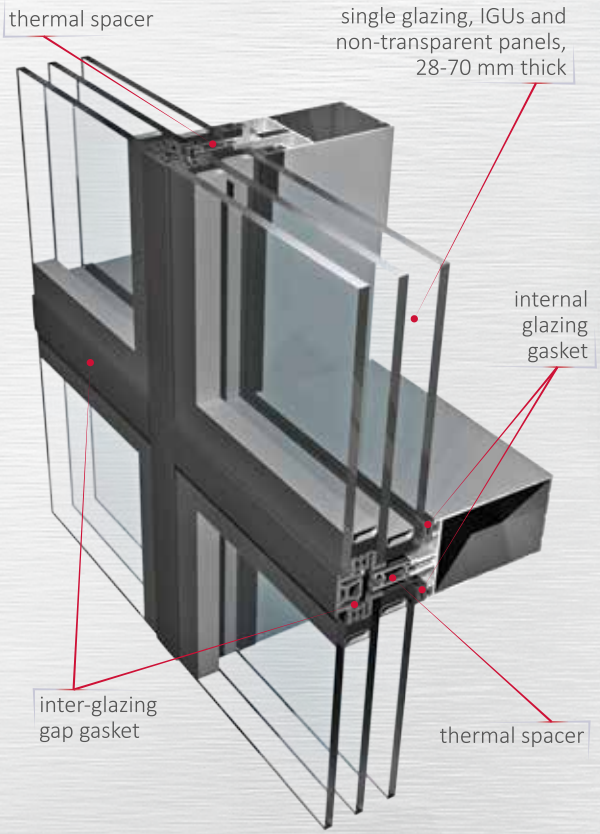


Technical parameters

Filling thickness	*23-66 mm for curtain walls, 24-60 mm for windows*
Mullion and transom width	*52 mm*
Thermal insulation	*U_f from 1,0 W/m²K*
Thermal insulation	*U_{cw}/U_w from 0,62 W/m²K*
Air permeability	*class AE 1200*
Watertightness	*class RE 1200*
Sound reduction	*R_w = 41dB*
Resistance to impact	*class E5/I5*
Resistance to wind load	*class 1600 Pa, E 2400 Pa*
Resistance to burglary	*class RC2, RC3 in acc. with PN - EN 1627*
Filling fixing method	*using pressure plates and cover profiles*
Certification	*ITT in acc. with PN-EN 13830, certified by the Passivhaus Institut in Darmstadt*

CURTAIN WALL SYSTEMS

Ponzio PF152ESG



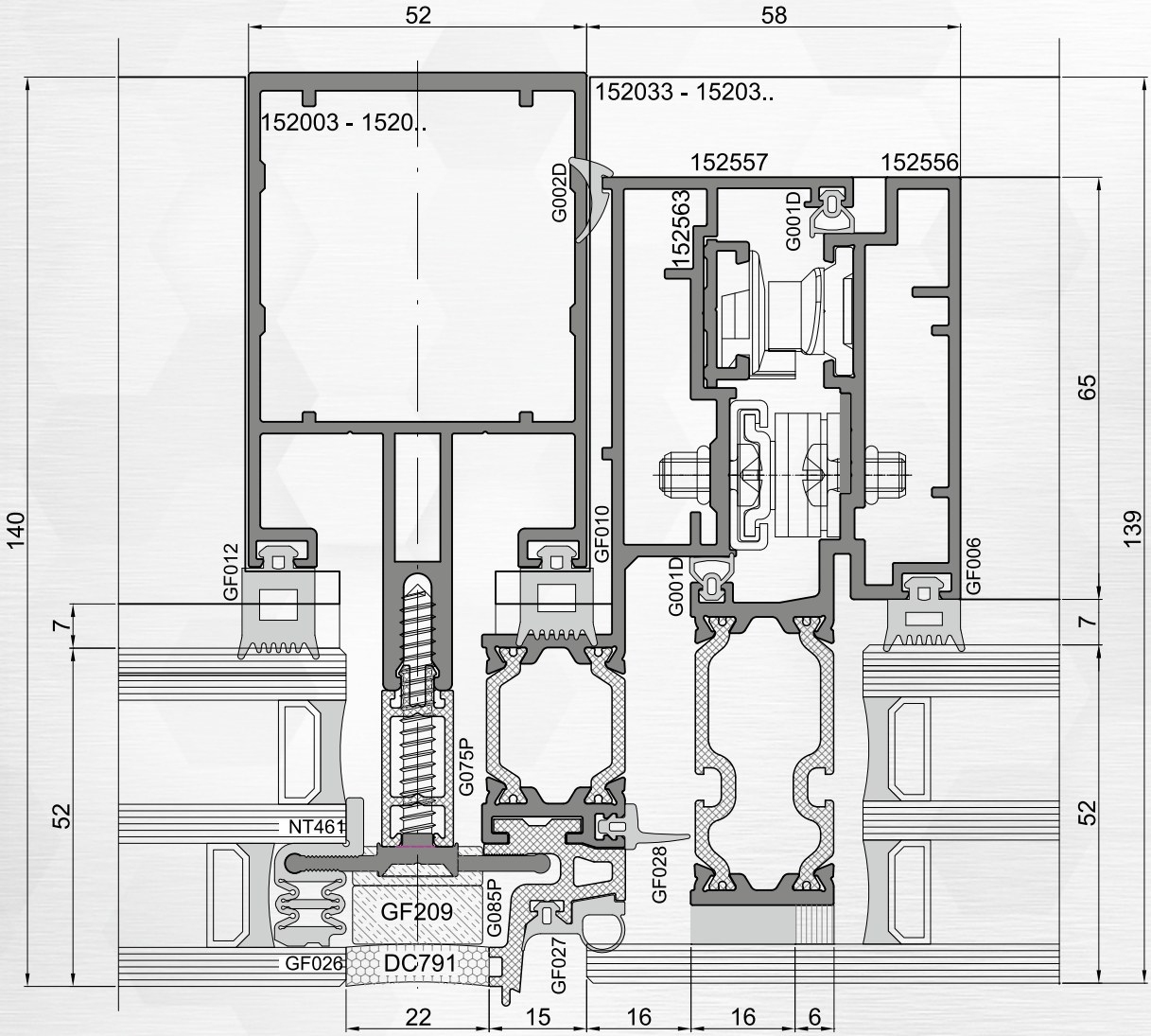
U_{cw} = 0.64 W/m²K

*reference construction dimensions: L 1200 x H 2500 mm
U_g = 0.5 W/m²K, triple glazing

A system designed for the construction of curtain walls and other spatial structures.

- *the external surface is a flat glazed surface, divided with vertical and horizontal lines – 22 mm wide (using weather-proof silicone) or 28 mm wide (using system glazing gaskets)*
- *shares the mullion-transom load bearing structure of the Ponzio PF152 curtain wall system, including a wide selection of profiles*
- *Ponzio system windows may be used as filling*
- *independently opening awning windows placed alongside each other possible*
- *triple glazing may be used (up to 70 mm thick)*
- *profile bending possible*

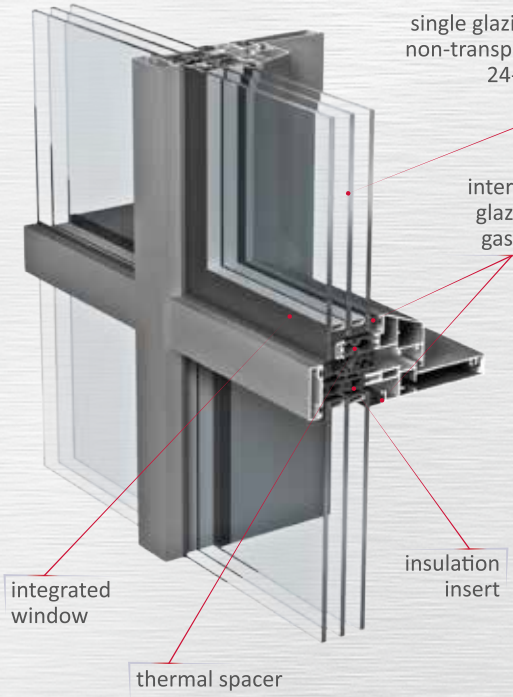
Ponzio PFI52ESG

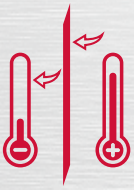


Technical parameters

Filling thickness	*28-70 mm for curtain walls, 24-60 mm for windows*
Thermal insulation	*U_f from 1.3 W/m²K*
Thermal insulation	*U_{cw}/U_w from 0.64 W/m²K*
Air permeability	*class A4*
Watertightness	*class 9A*
Certification	*ITT in acc. with PN-EN 13830*

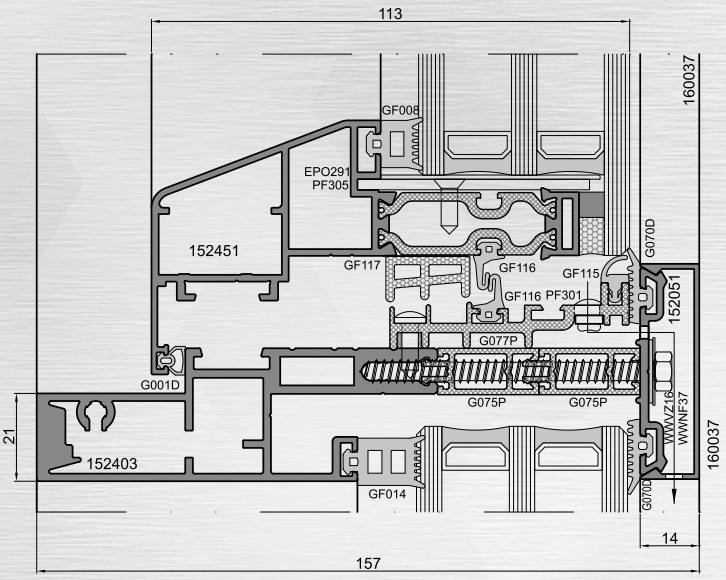
Ponzio PF152IW





U_{cw} = 0.91 W/m²K

*reference construction dimensions: L 1200 x H 2500 mm
U_g = 0.5 W/m²K, triple glazing



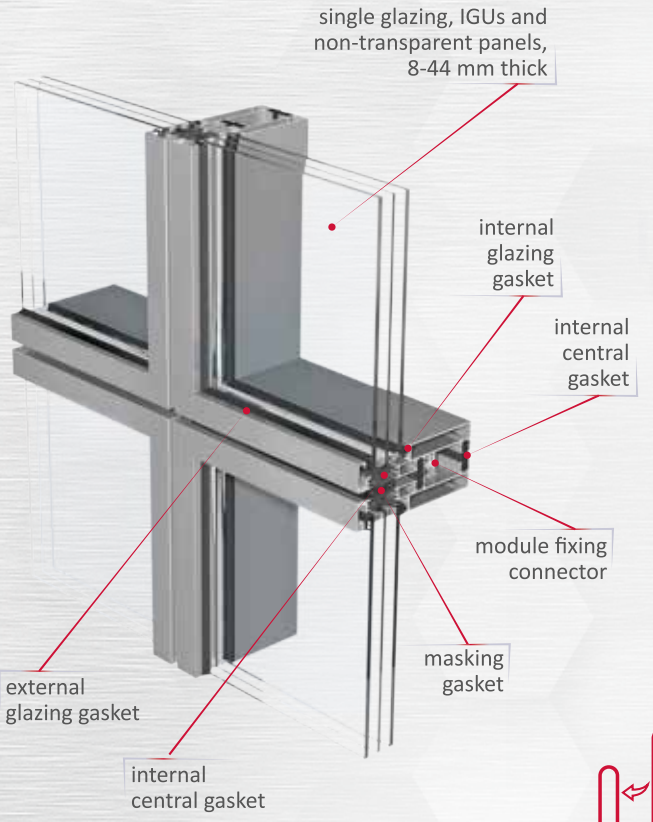
Technical parameters

Filling thickness	*24 - 56 mm*
Sash depth	*77 mm or 101 mm*
Mullion and transom depth	*76 mm, 100 mm, 124 mm*
Mullion and transom width	*21 mm*
Thermal insulation	*U_f from 2.1 W/m²K*
Thermal insulation	*U_{cw}/U_w from 0.91 W/m²K*
Certification	*ITT in acc. with PN-EN 13830*

A system designed for the construction of curtain walls with structural glazing.

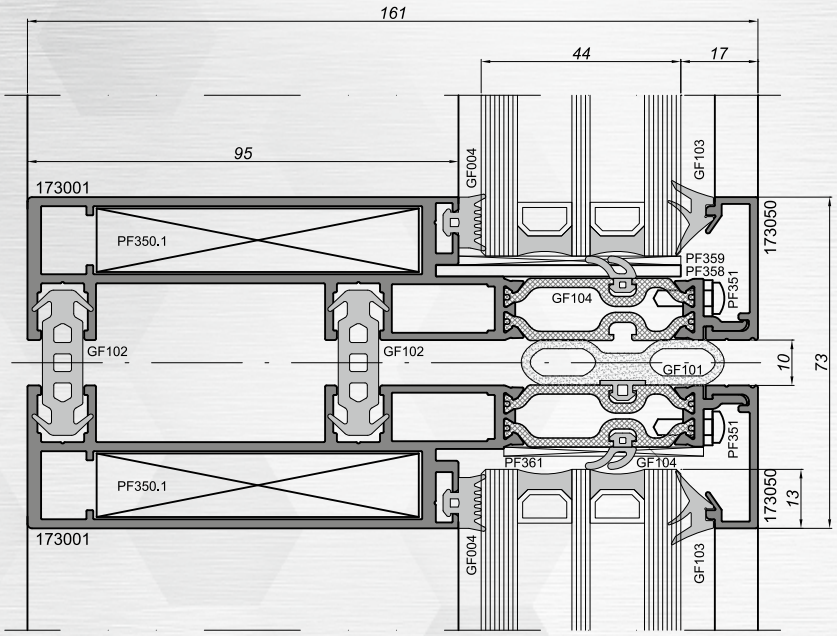
- *a Ponzio PF152/PF152ESG variant with seemless, inward opening windows*
- *the frame and sash construction is not visible from the outside*
- *flat constructions possible*
- *several possible window-frame connection solutions:*
  - *standard Ponzio PF152 cover profile,*
  - *gasket variant,*
  - *Ponzio PF152ESG silicone joint*
- *high thermal insulation and sound reduction performance due to ABS thermal spacers and EPDM cavity gaskets*

Ponzio PFI73



U_{cw} = 0.74 W/m²K

*reference construction dimensions: L 1200 x H 2500 mm
U_g = 0.5 W/m²K, triple glazing



Technical parameters

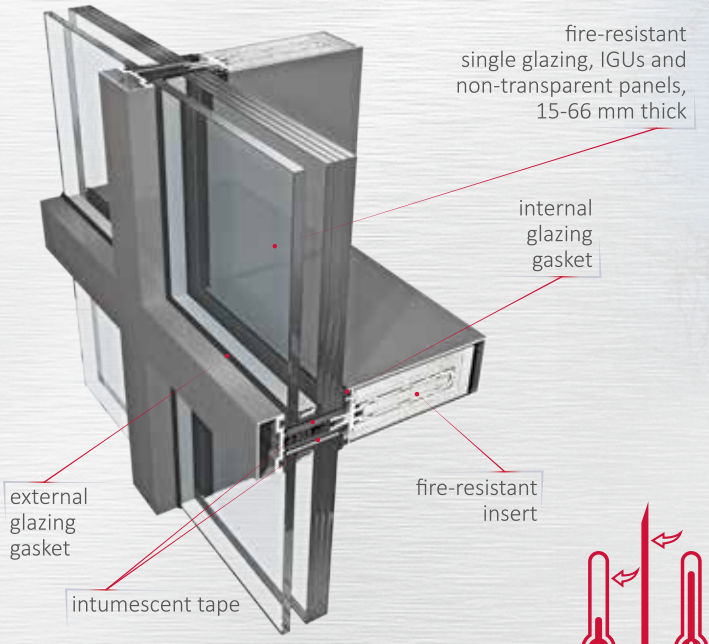
Filling thickness	*8 - 44 mm*
Frame depth	*95 mm*
Frame width	*31,5 mm*
Transom width	*73 mm*
Thermal insulation	*U_f from 2.1 W/m²K*
Thermal insulation	*U_{cw}/U_w from 0.74 W/m²K*

A system designed for the construction of curtain walls consisting of prefabricated modules mounted to the load-bearing structure of the building.

- *elements prefabricated in the workshop - high precision*
- *ready-made modules fixed to the building*
- *interconnected with other Ponzio systems*

CURTAIN WALL SYSTEMS

Ponzio PF152 FIRE-RESISTANT VERSION EI30, EI60

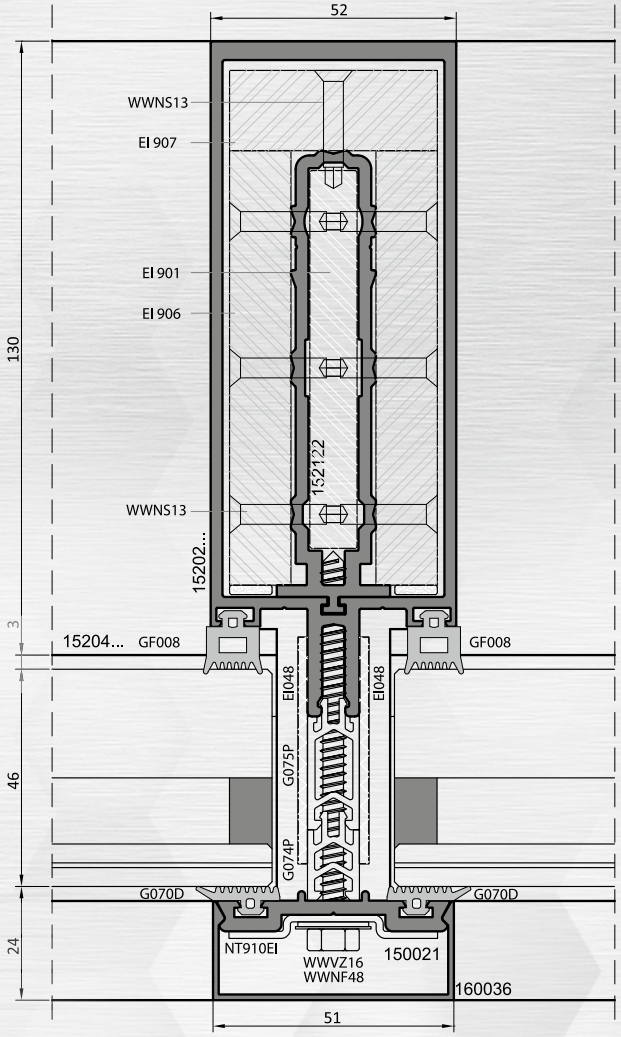


U_{cw} = 0.78 W/m²K

*reference construction dimensions: L 1200 x H 2500 m
U_g = 0.5 W/m²K, triple glazing

Technical parameters

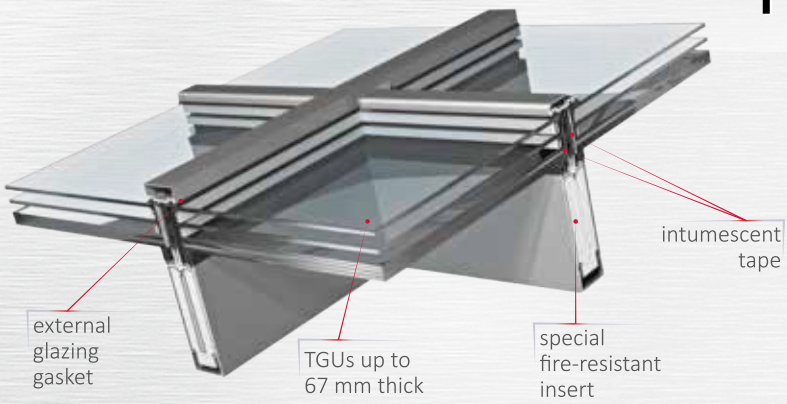
Filling thickness	*15 - 66 mm*
Mullion depth	*85 - 196 mm*
Transom depth	*91 - 201 mm*
Mullion and transom width	*52 mm*
Thermal insulation	*U_0 from 1.7 W/m²K*
Thermal insulation	*U_{cw}/U_w from 0.78 W/m²K*
Air permeability	*class AE 1200*
Watertightness	*class RE 1200*
Classification	*fire resistance: LBO-576-K/14*
Certification	*1. classification 01-01561/16/R79NZE 2. 01561/16/R83NZP "Assessment of fire propagation along Ponzio PF152 walls and roof coverings" 3. 1561/16/R82NZP "Fire resistance classification of Ponzio PF152 full and part configuration curtain walls manufactured by Ponzio Polska Sp. z o.o."*



A fire-resistant variant of the Ponzio PF152 curtain wall system, classified EI30 and EI60.

- *fire-resistant curtain walls with glazed and non-transparent spandrels*
- *external cover profile width - 51 mm*
- *overall construction width and height not limited*
- *single and double PE78EI fire-resistant windows and doors may be mounted in the curtain wall*
- *thermal spacers protected with intumescent tapes*
- *tight seal of frame-filling connections*
- *load-bearing capability during fire ensured by internal aluminium reinforcing profiles with fire-resistant inserts and special mullion-transom joints*

Ponzio PF152 FIRE-RESISTANT VERSION kl. REI30/RE45

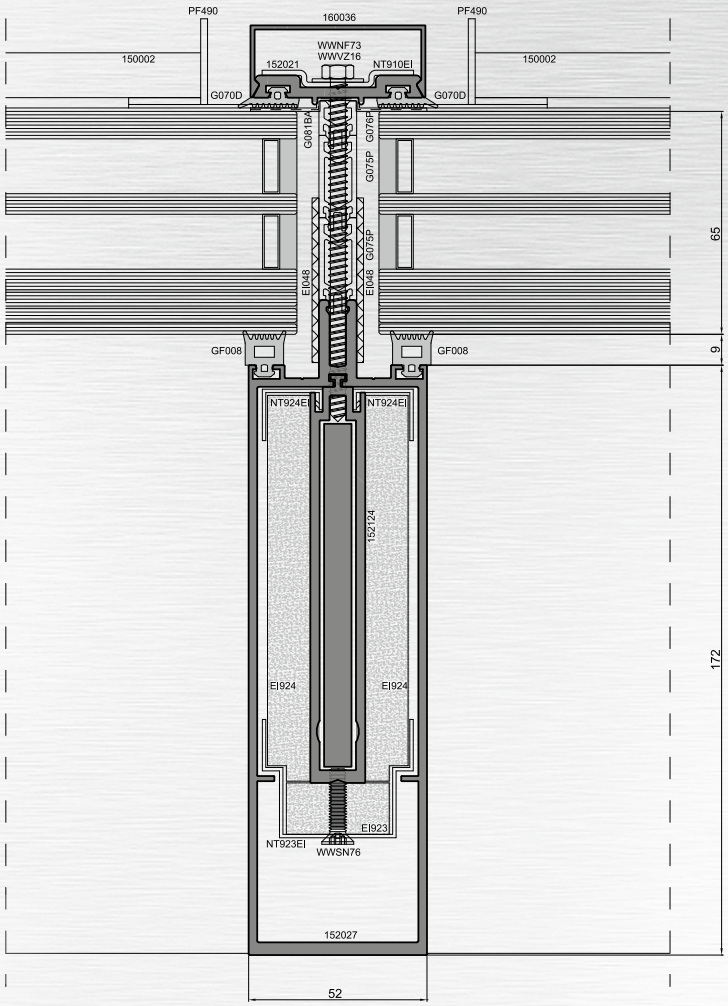


$U_w = 1.1\ W/m^2K$

*reference construction dimensions: L 3000 x H 4300 mm
$U_g = 0.7\ W/m^2K$, triple glazing

Technical parameters

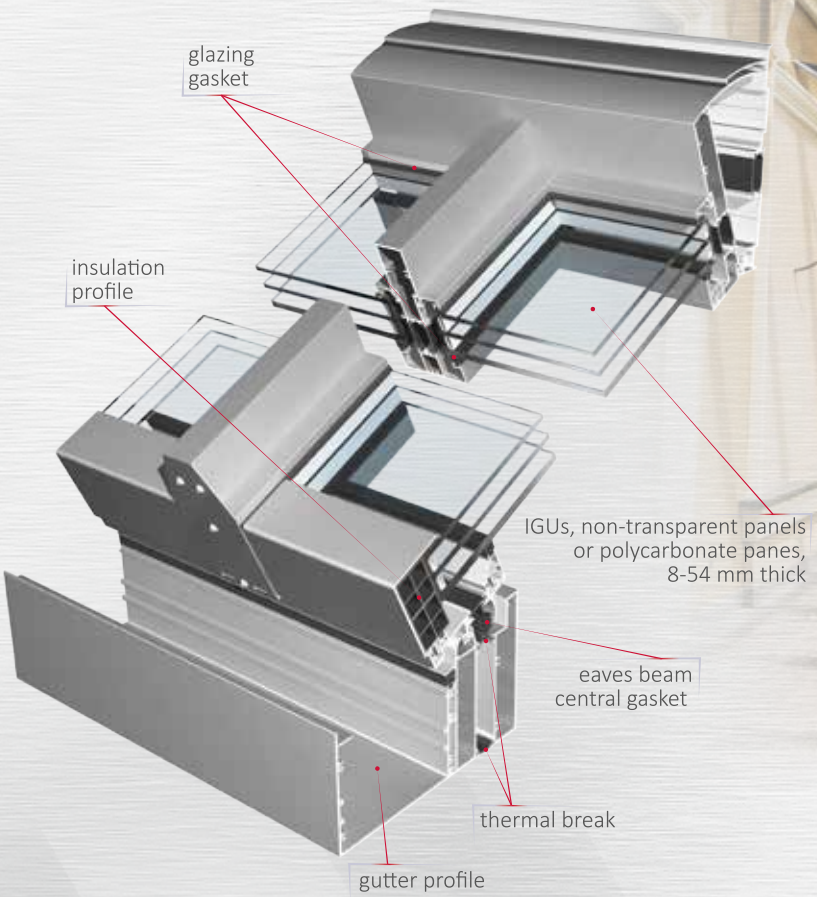
Filling thickness	*up to 67 mm*
Mullion depth	*85 - 196 mm*
Transom depth	*91 - 201 mm*
Mullion and transom width	*52 mm*
Thermal insulation	*U_f from 1.9 W/m^2K*
Thermal insulation	*U_{CW}/U_w from 1.1 W/m^2K (dla U_g=0.7 W/m^2K i konstrukcji o wym. 3.0x4.3m)*
Classification	*REI30/RE45*
Certification	*1. ITB fire resistance classification 01577.2/17/Z00NZP* *2. classification reports 1577.1/17/Z00NZP and 1577.1/17/Z00NZP/ENG* *3. 01561/16/R83NZP "Assessment of fire propagation along Ponzio PF152 walls and roof coverings"*



A variant of the Ponzio PF152 curtain wall system designed for the construction of rooflights resistant to internal fire REI30/RE45 in acc. with PN-EN 13501-2:2016.

- *0° - 80° roof slopes available*
- *a variable load (e.g. snow load) of 0.24 kN/m^2 was simulated during the test*
- *maximum glazing size 900x2000 mm or 988x1500 mm*
- *triangular and trapezoid glazing shapes possible*
- *no limit to roof width, the size of the roof is only limited by maximum rafter and purlin stress*
- *TGUs up to 67mm thick may be used*

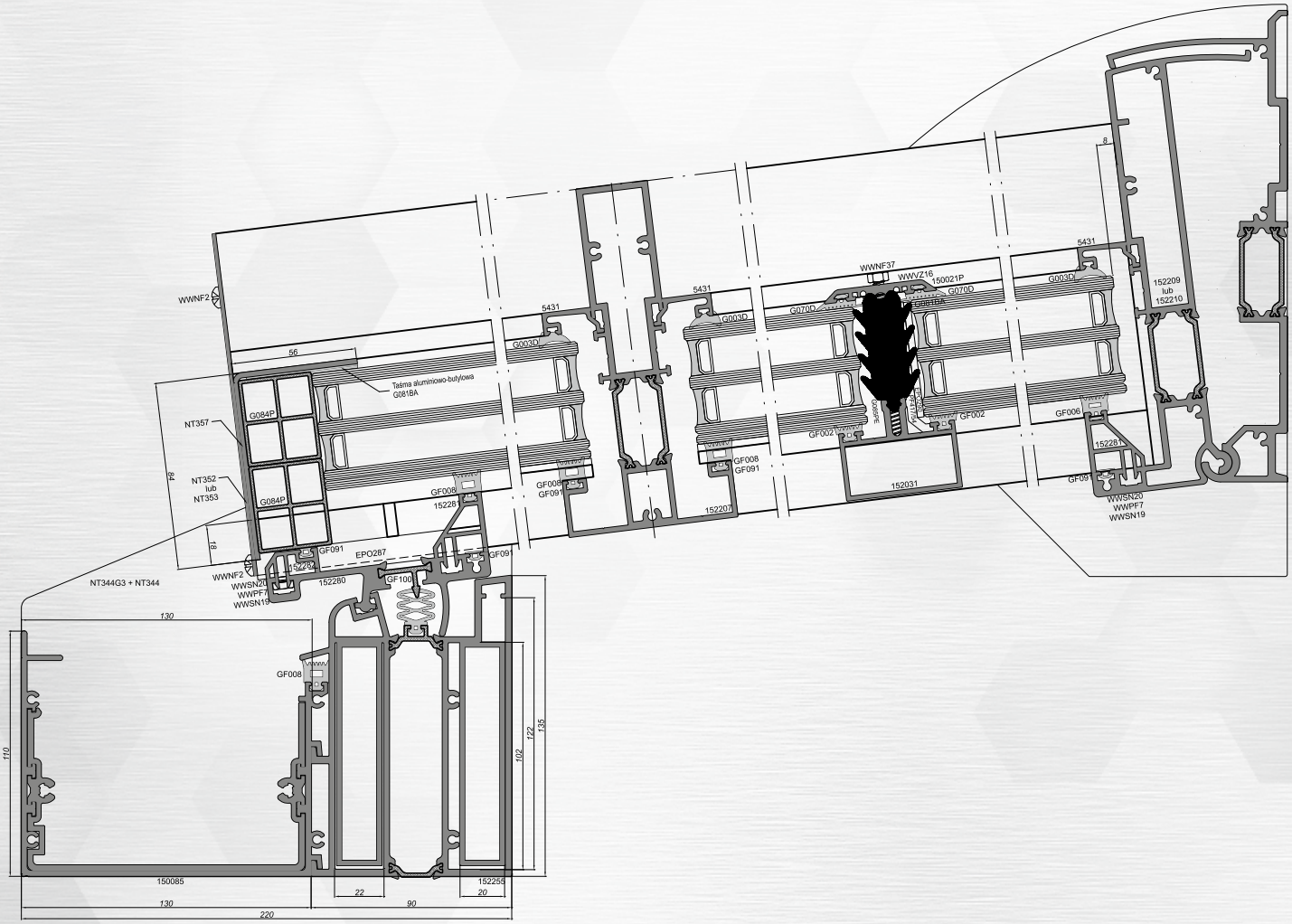
Ponzio PF152WG



A system designed for the construction of winter gardens and other spatial structures.

- *roof slope construction consisting of PF152 system profiles or PF152WG reverse rafter profiles*
- *roof structure placed on curtain wall mullions, door-and-window system profiles or reinforced PF152WG mullions*
- *the rafter system enables the use of standard glazing beads from door-and-window systems*
- *identical rafter-transom connections as in PF152 curtain walls*
- *roof slopes mounted using a hinge joint on the wall beams and system joints on the eaves beam (includes a gutter profile)*
- *interconnected with other Ponzio systems*
- *roof slopes of 7° - 45° available*

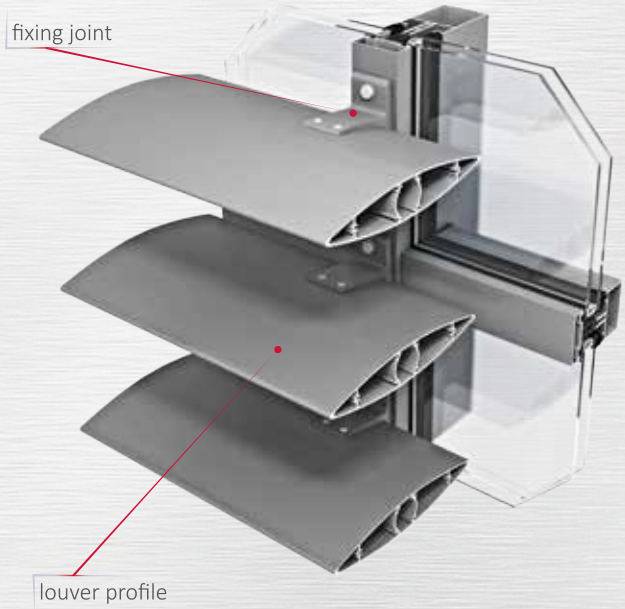
Ponzio PF152WG

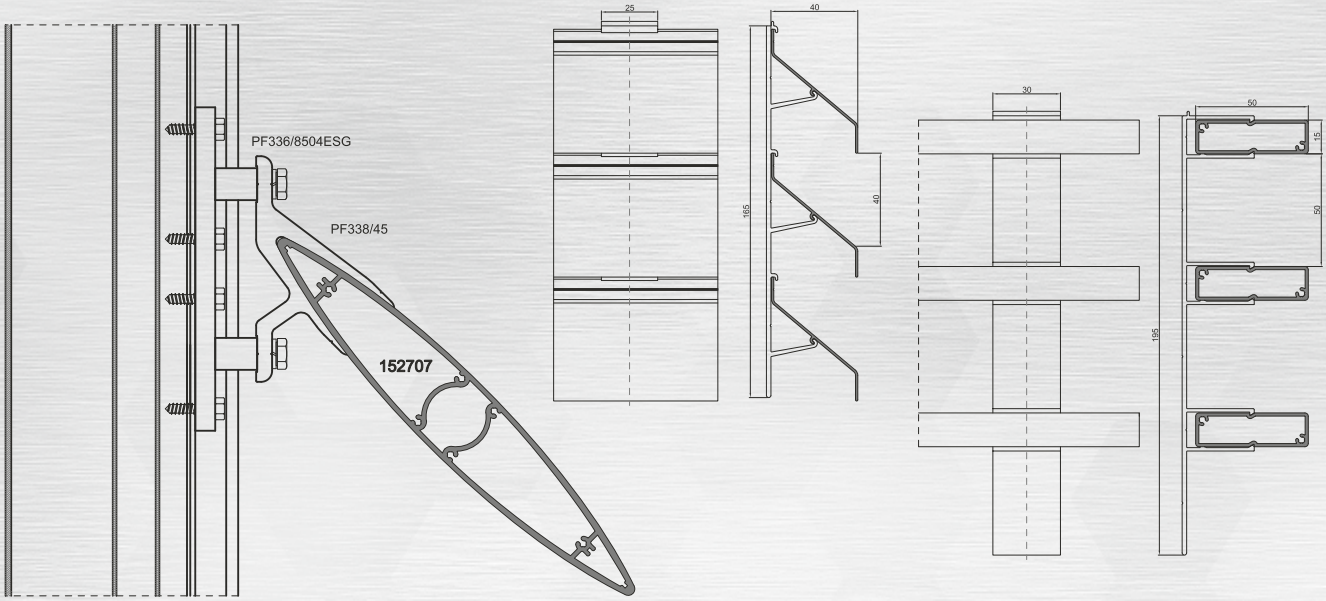


Technical parameters

Filling thickness	*8 - 54 mm*
Type of filling	*IGUs, non-transparent panels, polycarbonate panes*

PONZIO SUN PROTECT

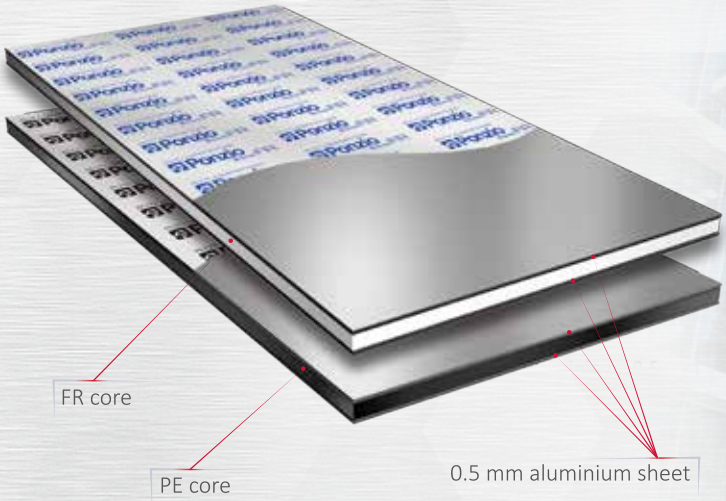




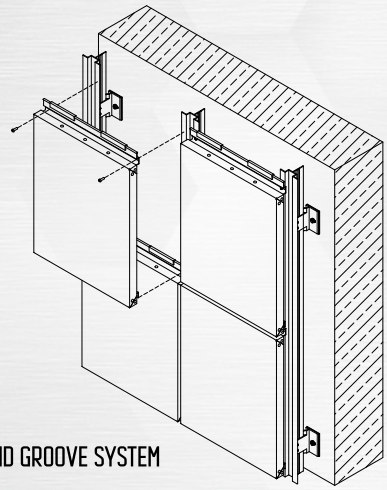
A modern solution for protecting buildings from excessive sunlight.

- *louvers are recommended for use in conjunction with large glazed constructions in order to reduce sunlight exposure of interior spaces*
- *the system includes: 100-400 mm aerofoil blade profiles as well as 40 and 80 mm "Z" shaped profiles*
- *louvers mounted to walls, curtain walls as well as windows*
- *joints for mounting profiles at 15°, 30° and 45° degrees relative to the horizontal plane*
- *movable louver variant - automatically controlled position*

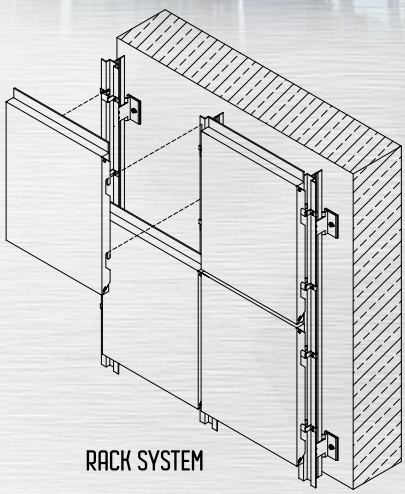
PONZIO BOND



FIXING METHODS



TONGUE AND GROOVE SYSTEM



RACK SYSTEM

A light, ventilated façade system consisting of composite panels and mounting profiles and accessories.

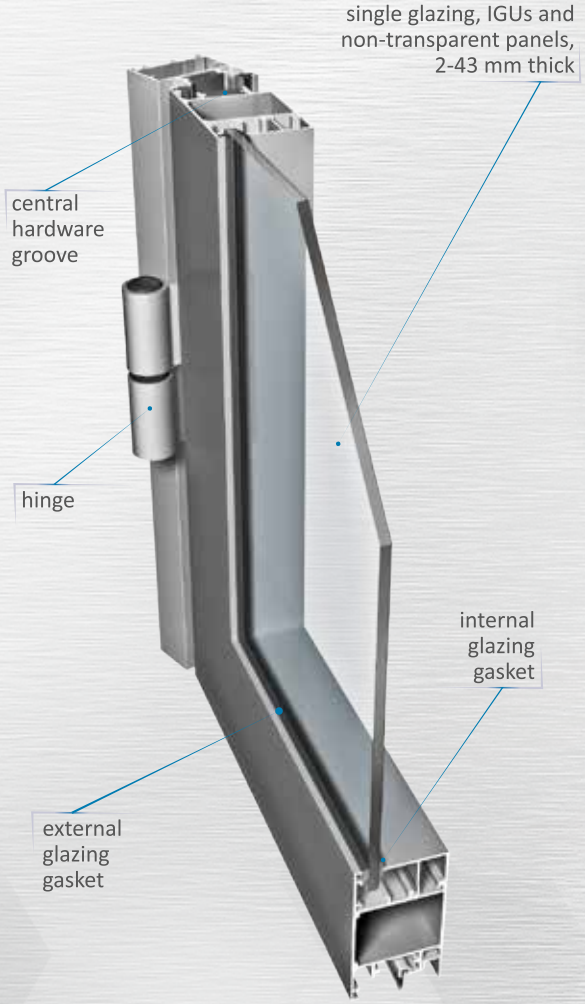
- *two panel types:*
  - PONZIOBOND PE consisting of a plastic core sandwiched between two aluminium sheets
  - PONZIOBOND FR - fire-retardant panels - the plastic core is mixed with a mineral filling
- *advanced optimisation possibilities due to large panel sizes*
- *easy mounting*
- *short working time*
- *functional and aesthetic - gives architects a wide range of possible applications*
- *light, rigid and stable*
- *good resistance to weather conditions*
- *many different shapes possible*
- *wide range of colours available (including wood-like)*

Technical parameters

Certification	*AITB Technical Approval AT-15-9374/2014 "PONZIOBOND FR and PONZIOBOND PE composite panels". ITB Certificate of Compliance - 2332/W*

INTERNAL WINDOWS AND DOORS

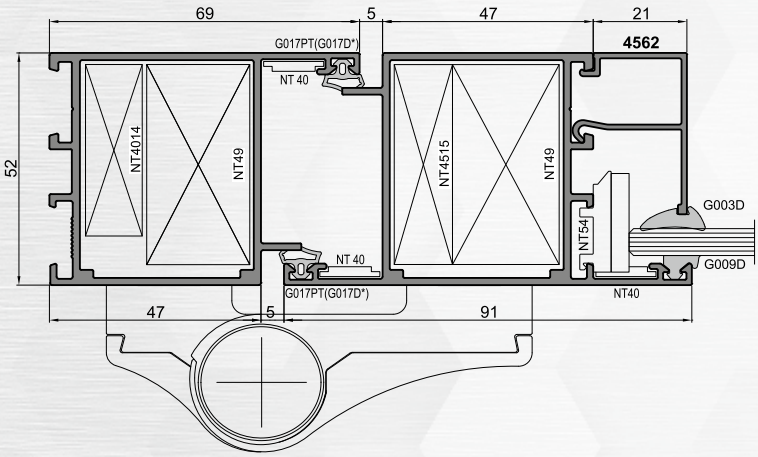
Ponzio PE50

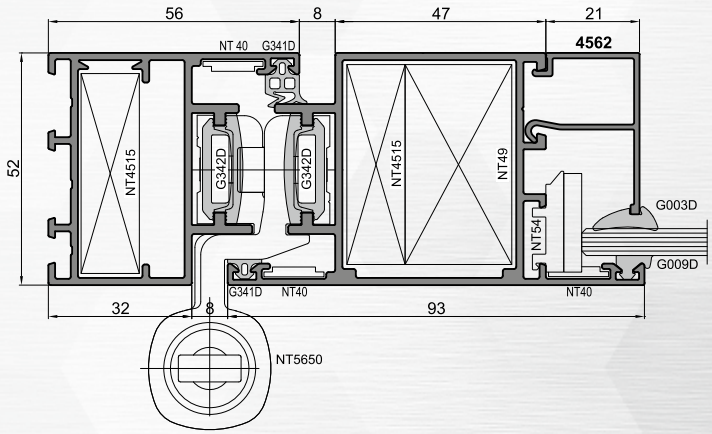


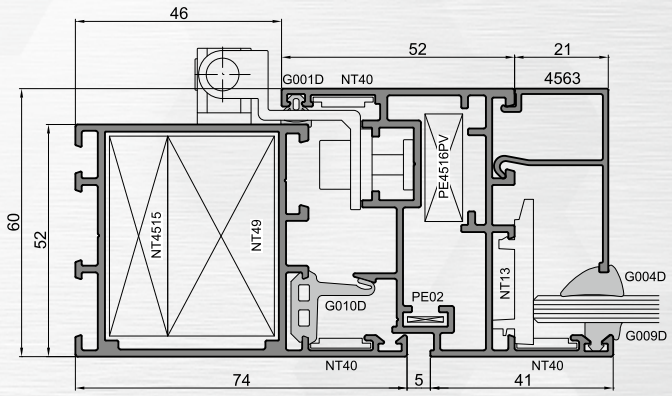
A non-insulated aluminium profile system designed for the manufacturing of internal constructions: glazed partitions, windows and doors.

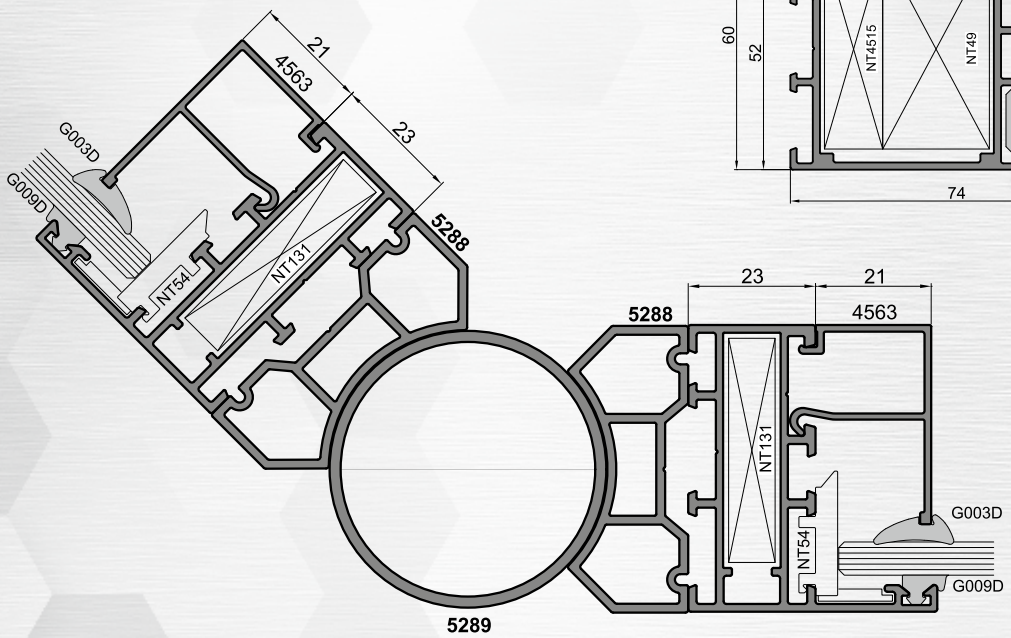
- *Euro hardware groove in door profiles*
- *window sashes with PVC hardware groove available*
- *wide range of possible constructions: coplanar doors, doors with a central hardware groove, glass doors, manual and automatic sliding doors, swing doors, windows and glazed partitions*
- *wide range of available hardware*
- *window sashes flush with the frame on the outside*
- *sliding doors can be either manual or automatic*
- *wide choice of possible door leafs - with or without kickplate, with or without threshold*
- *interconnected with other Ponzio systems*
- *screwed and crimped joints available*

Ponzio PE50





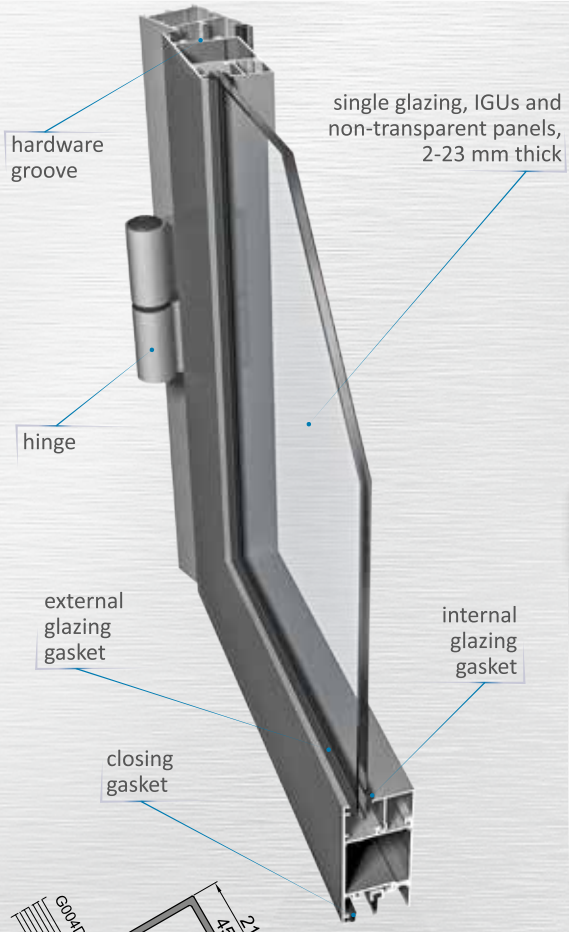




Technical parameters

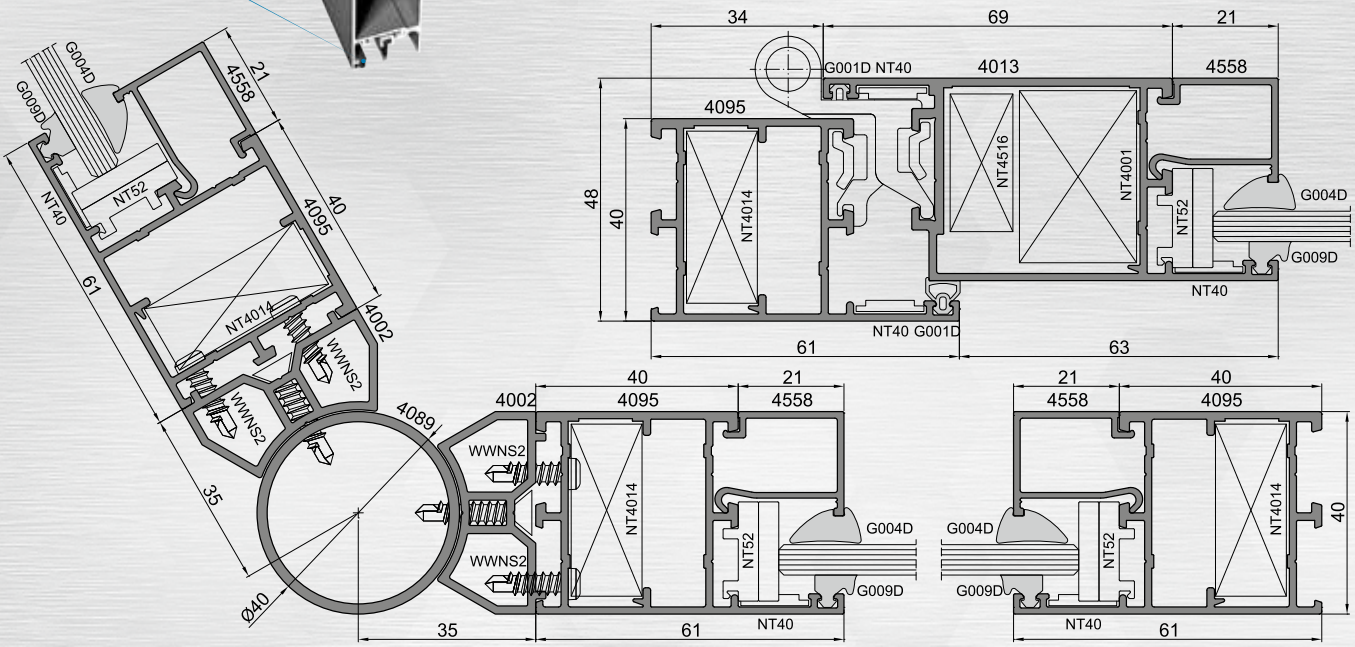
Filling thickness	*doors and partitions: 2 - 35 mm; windows: 5 - 43 mm*
Profile depth	*52 mm*
Type of filling	*single glazing, IGUs and non-transparent panels*
Smoke control	*class S_a and S_{200} in acc. with PN-EN 13501-2:2016*
Certification	*National Technical Assessment ITB-KOT-2018/0621*

Ponzio PE40



Technical parameters

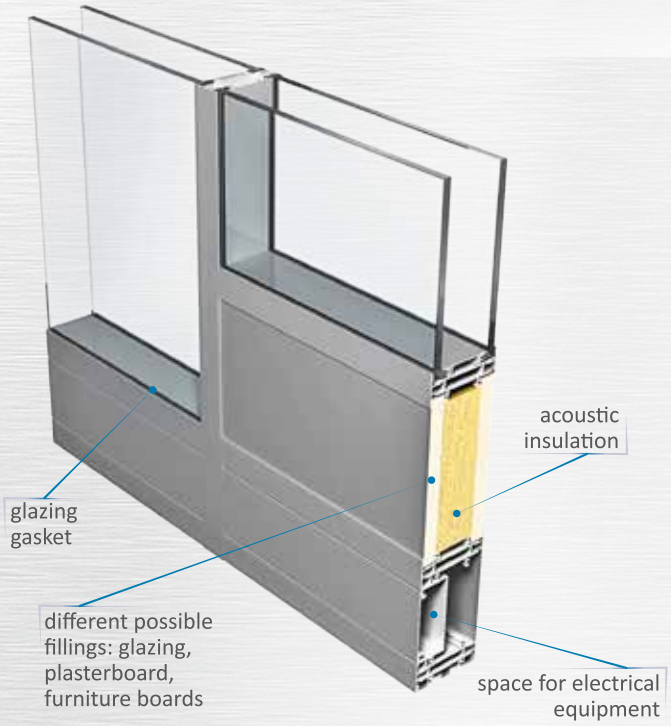
Filling thickness	*2 - 23 mm*
Profile depth	*40 mm*
Type of filling	*single glazing, IGUs and non-transparent panels*
Certification	*Technical Approval ITB AT-15-8114/2015* *"Ponzio PE40 internal doors and partition kit"*

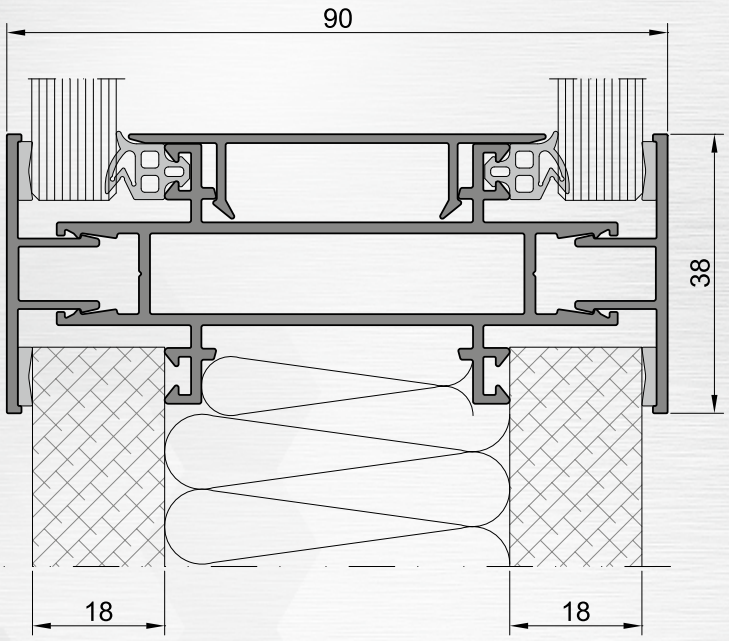


A non-insulated aluminium profile system designed for the manufacturing of internal constructions: glazed partitions and single and double doors.

- *manual and automatic sliding doors and angled partitions available*
- *Euro hardware groove - wide range of available accessories*
- *mortise hinges available - easier installation and lower costs*
- *interconnected with other Ponzio systems*
- *wide choice of possible door leafs - with or without kickplate, with or without threshold*
- *screwed and crimped joints available*
- *profile bending possible*

Ponzio OF90

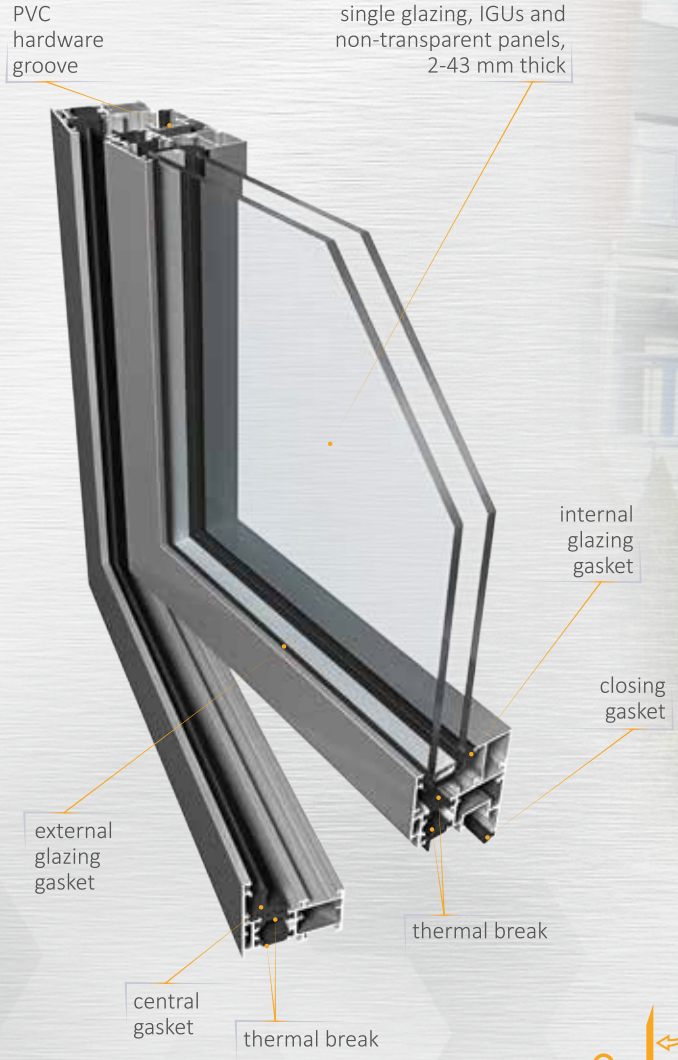




A door, glazed wall and window set system designed for the construction of partitions in modern office spaces.

- *visually light constructions with good sound reduction performance*
- *profile dimensions: pressure plate width - 38 mm, construction depth - 80 or 90 mm*
- *fillings: glazing or non-transparent panels 3-18 mm thick (fixed using pressure plates and glazing gaskets)*
- *a wide variety of possible constructions, tailored for the customer's needs*
- *angles available 90°- 270°*
- *„T" and „L" shaped connections*
- *integrated electrical and office equipment mounting*
- *internal blinds may be installed with glass fillings*

Ponzio PE52



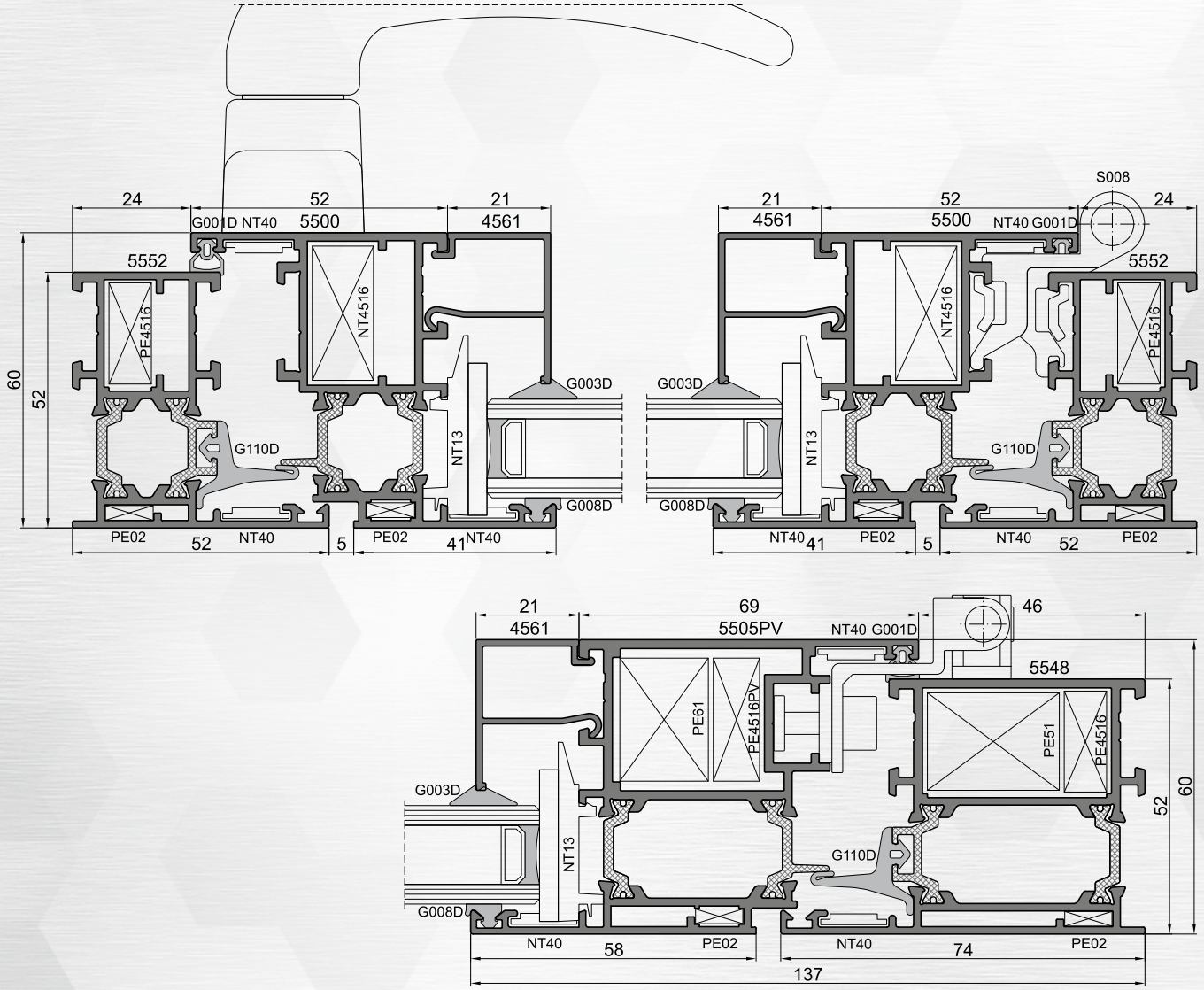
U_w = 1.3 W/m²K

*reference construction dimensions: L 1230 x H 1480 mm
U_g = 0.6 W/m2K, triple glazing

An economic insulated aluminium profile system with the Euro hardware groove as well as the PVC hardware groove in window sash profiles.

- *large-dimension constructions possible*
- *interconnected with other Ponzio systems*
- *Euro and PVC hardware grooves available*
- *profile bending available*
- *screwed and crimped corner connections available*
- *sash and frame profiles flush on the outside*

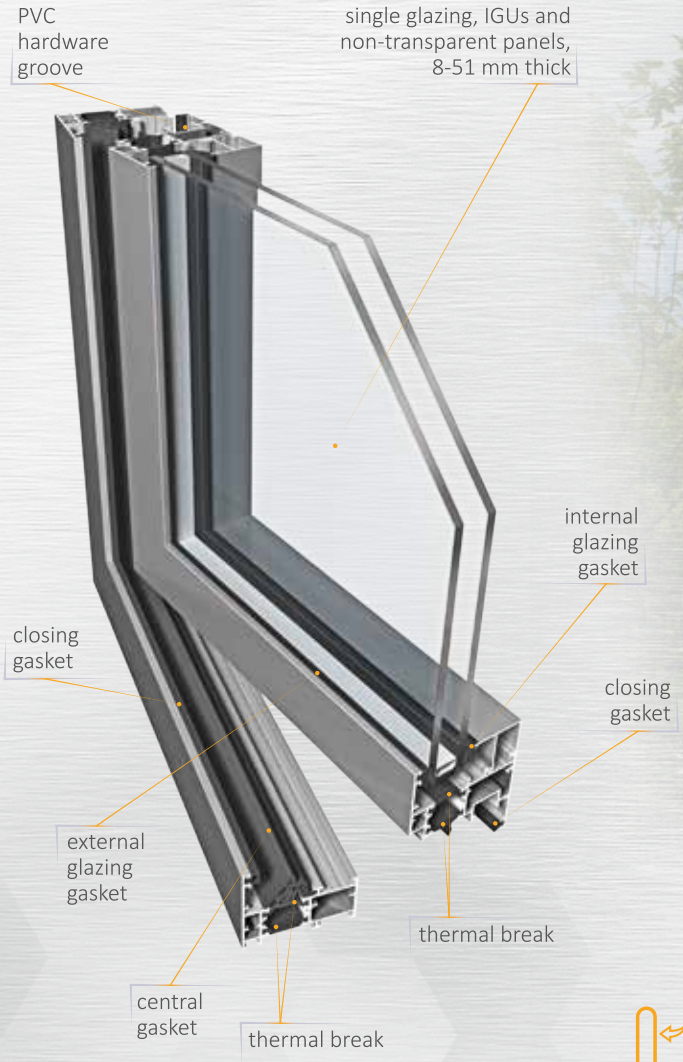
Ponzio PE52



Technical parameters

Filling thickness	*2 - 43 mm*
Frame depth	*52 mm*
Sash depth	*60 mm*
Type of filling	*single glazing, IGUs and non-transparent panels*
Thermal insulation	*frame heat transfer coefficient U_f from 2.1 W/m²K*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

Ponzio PE60



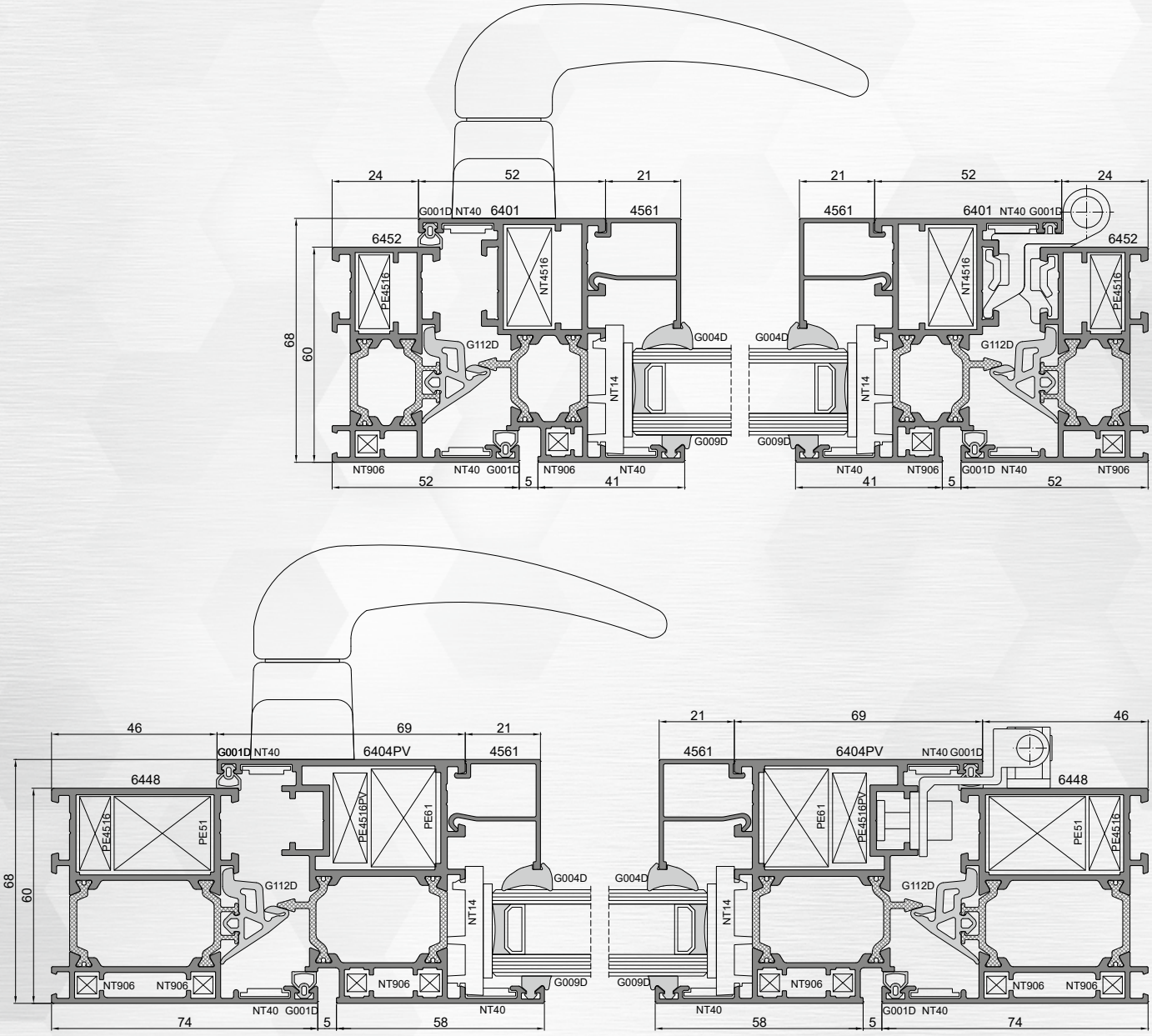
$U_w = 1.1\ W/m^2K$

*reference construction dimensions: L 1230 x H 1480 mm
$U_g = 0.5\ W/m^2K$, triple glazing

An insulated aluminium profile system with the Euro hardware groove as well as the PVC hardware groove in window sash profiles.

- *24 mm thermal break and central gasket ensure high thermal performance*
- *wide range of hardware results in easier installation*
- *large-dimension constructions possible*
- *interconnected with other Ponzio systems*
- *window sashes flush with the frame on the outside*
- *profile bending available*
- *wide variety of corner joint solutions*

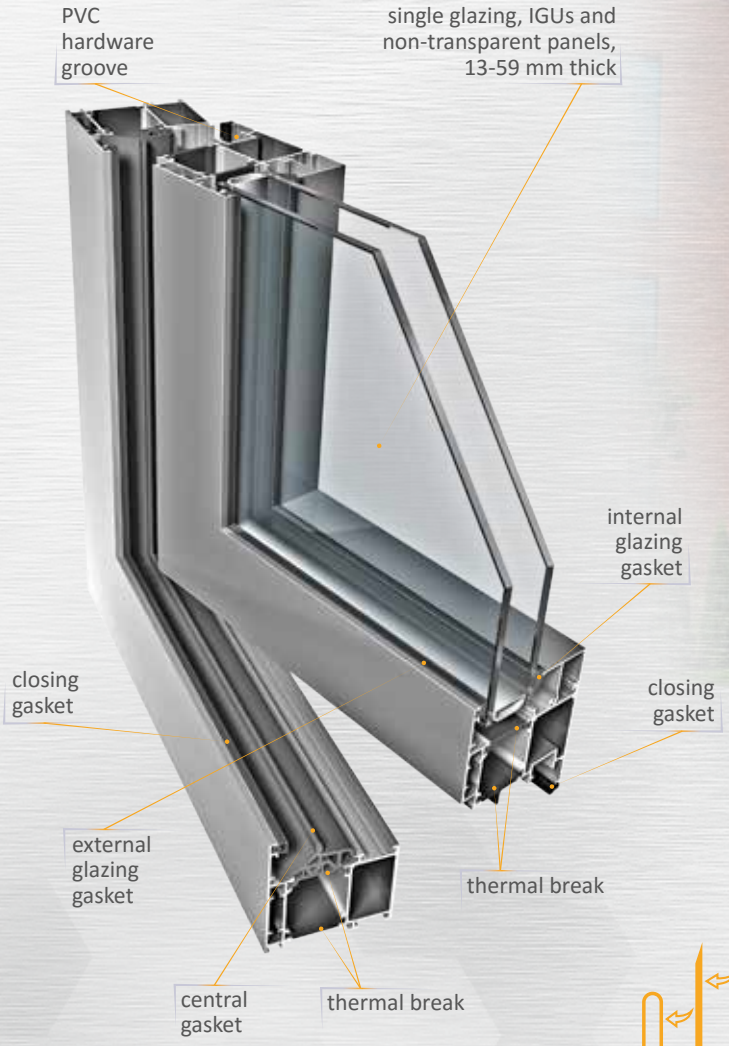
Ponzio PE60



Technical parameters

Filling thickness	*8 - 51 mm*
Frame depth	*60 mm*
Sash depth	*68 mm*
Type of filling	*single glazing, IGUs and non-transparent panels*
Thermal insulation	*frame heat transfer coefficient U_f from 2.0 W/m²K*
Certification	*ITT in acc. with PN - EN 14351-1 + A1* *resistance to burglary testing: class RC2 in acc. with PN - EN 1627*

Ponzio PE68 WINDOWS



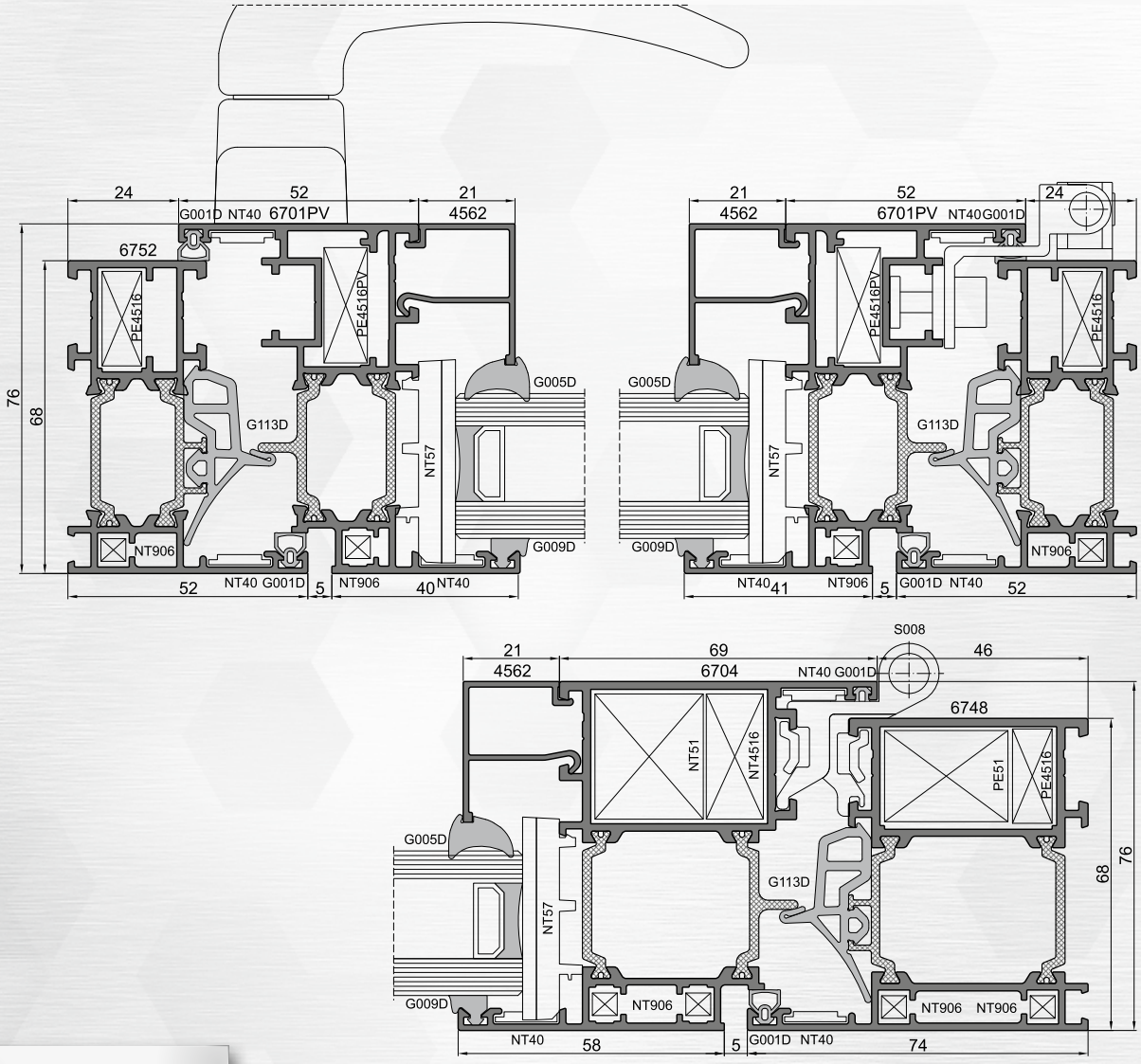
$U_w = 0.93\ W/m^2K$

*reference construction dimensions: L 1480 x H 2180 mm
$U_g = 0.5\ W/m^2K$, triple glazing

An insulated aluminium profile system with the Euro hardware groove as well as the PVC hardware groove in window sash profiles featuring very high thermal performance.

- *high thermal performance due to the optimised 32 mm thermal break and central gaskets (mono- or bi-component)*
- *easy installation of a wide range of hardware*
- *the three-cavity design of profiles ensures good mechanical durability, thus enabling large constructions*
- *window sashes flush with the frame on the outside*
- *profile bending available*
- *wide variety of corner joint solutions*
- *wide variety of possible constructions: turn-tilt, outward opening, concealed sash, pivoting etc.*
- *different thermal insulation variants with different insulation inserts: PE68+, PE68HI*

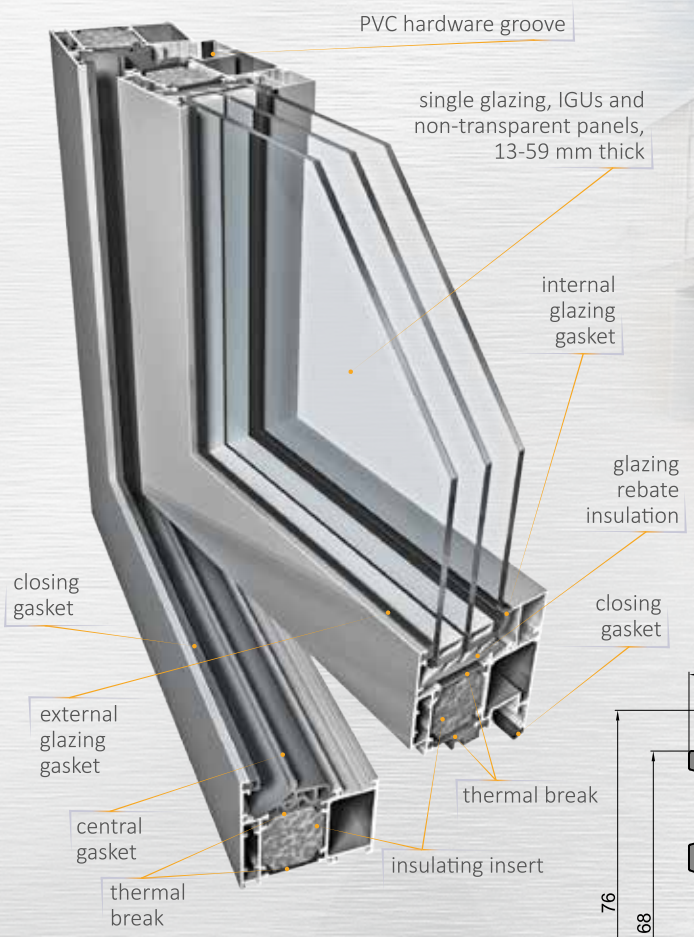
Ponzio PE68 WINDOWS

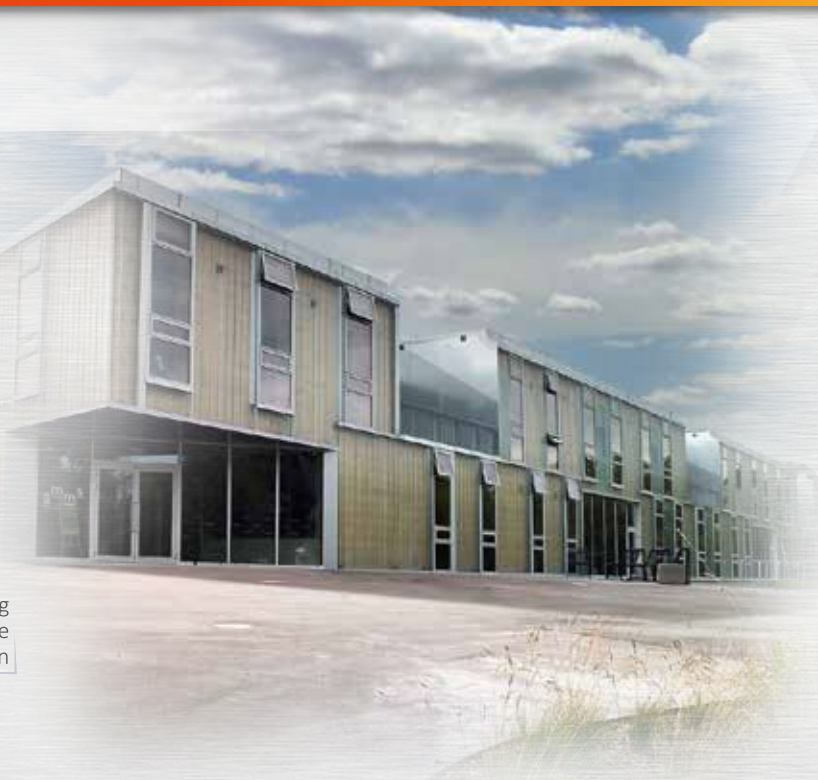


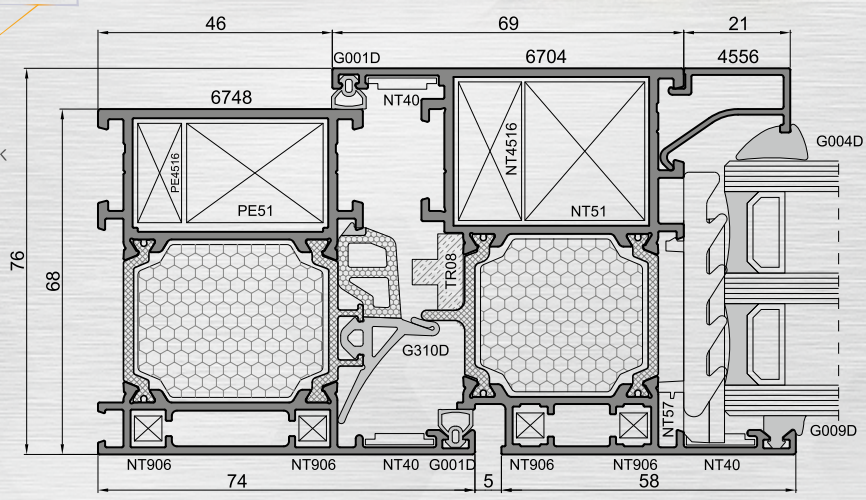
Technical parameters

Filling thickness	*frame: 13-51 mm, sash: 21-59 mm*
Frame depth	*68 mm*
Sash depth	*76 mm*
Maximum sash dimensions	*L 1550 x H 2200 mm, L 1200 x H 2400 mm*
Maximum sash weight	*200 kg*
Air permeability	*class 4*
Watertightness	*class E1500*
Thermal insulation	*frame heat transfer coefficient U_f from 1.8 W/m²K, U_w from 0.93 W/m²K*
Resistance to wind load	*class C5*
Resistance to burglary	*class RC2, RC3 in acc. with PN - EN 1627*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

Ponzio PE68HI WINDOWS







Technical parameters

Filling thickness	*frame: 13-51 mm, sash: 21-59 mm*
Frame depth	*68 mm*
Sash depth	*76 mm*
Maximum sash dimensions	*L 1550 x H 2200 mm, L 1200 x H 2400 mm*
Maximum sash weight	*200 kg*
Air permeability	*class 4*
Watertightness	*class E1500*
Thermal insulation	*U_f from 1.4 W/m²K, U_w from 0.84 W/m²K*
Resistance to wind load	*class C5*
Resistance to burglary	*class RC2, RC3 in acc. with PN - EN 1627*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

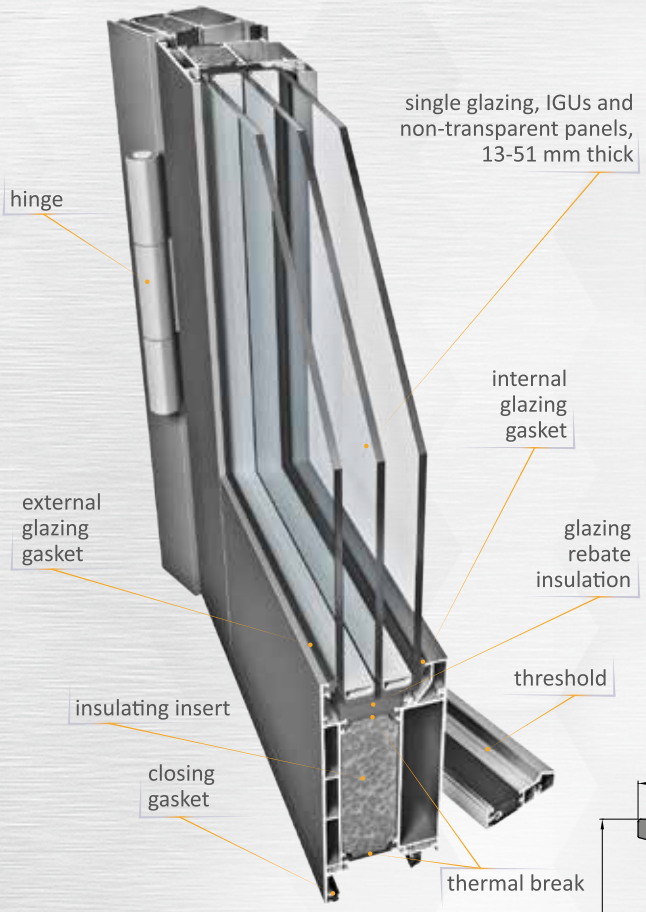
U_w = 0.84 W/m²K

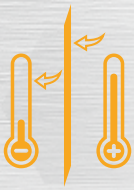
*reference construction dimensions: L 1480 x H 2180 mm, U_g = 0.5 W/m²K, triple glazing

A variant of the PE68 insulated aluminium profile system with the Euro hardware groove as well as the PVC hardware groove in window sash profiles.

- *this variant is characterised by improved thermal performance due to the special insulation inserts used*
- *the PE68HI variant features glazing rebate and profile cavity inserts resulting in U_f values as low as 1.4 W/m²K*

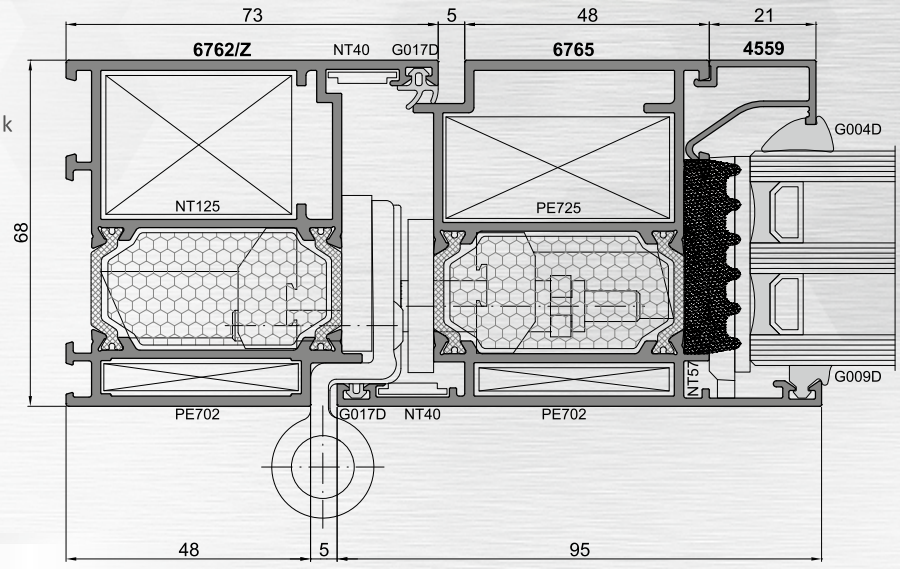
Ponzio PE68/PE68HI DOORS





U_d = 1.06 W/m²K

*reference construction dimensions: L 1230 x H 2180 mm, U_g = 0.5 W/m²K, triple glazing



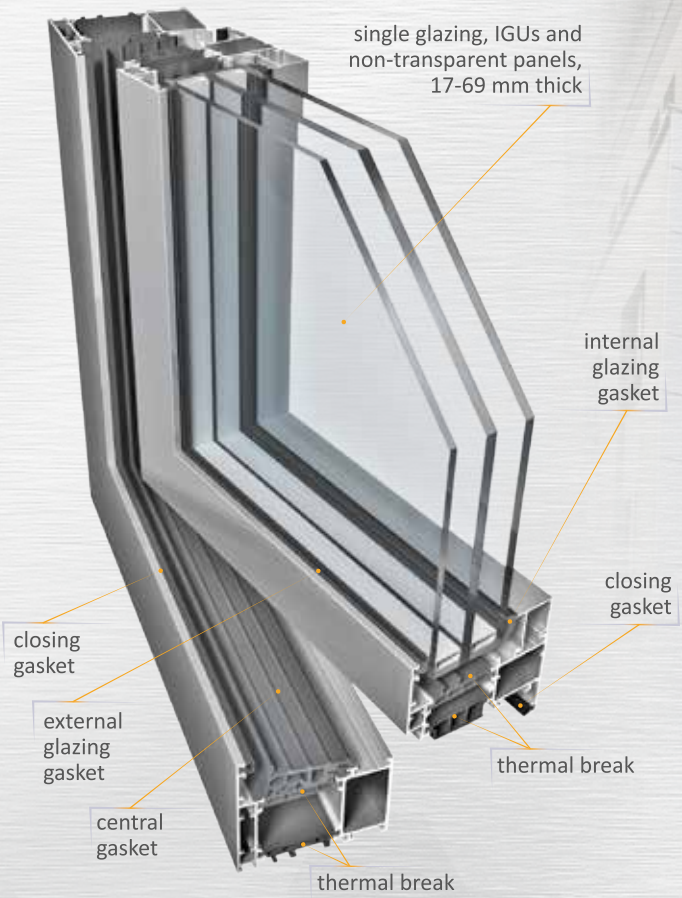
Technical parameters

Filling thickness	*13 - 51 mm*
Frame and leaf depth	*68 mm*
Maximum leaf dimensions	*L 1350 x H 2500 mm*
Maximum leaf weight	*210 kg*
Air permeability	*class 3*
Watertightness	*class 8A*
Thermal insulation	*PE68: U_f from 2.1 W/m²K PE68HI: U_f from 1.8 W/m²K*
Thermal insulation	*PE68: U_d from 1.13 W/m²K PE68HI: U_d from 1.06 W/m²K*
Resistance to wind load	*class C2/B3*
Resistance to burglary	*class RC2, RC3 in acc. with PN - EN 1627*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

An insulated, three-cavity profile system designed for the construction of doors.

- *coplanar construction (frame-leaf gap - 18 mm)*
- *Euro groove glazing beads*
- *profiled 24 mm thermal breaks*
- *doors easily incorporated in window sets due to special modifier profiles*
- *DGUs and TGUs up to 51 mm thick can be used*
- *door leafs flush with the frame*
- *large-dimension constructions possible*
- *wide variety of corner joint solutions*
- *profile bending available*
- *wide range of available hardware*
- *different thermal insulation variants with different insulation inserts: PE68+, PE68HI*

Ponzio PE78N WINDOWS



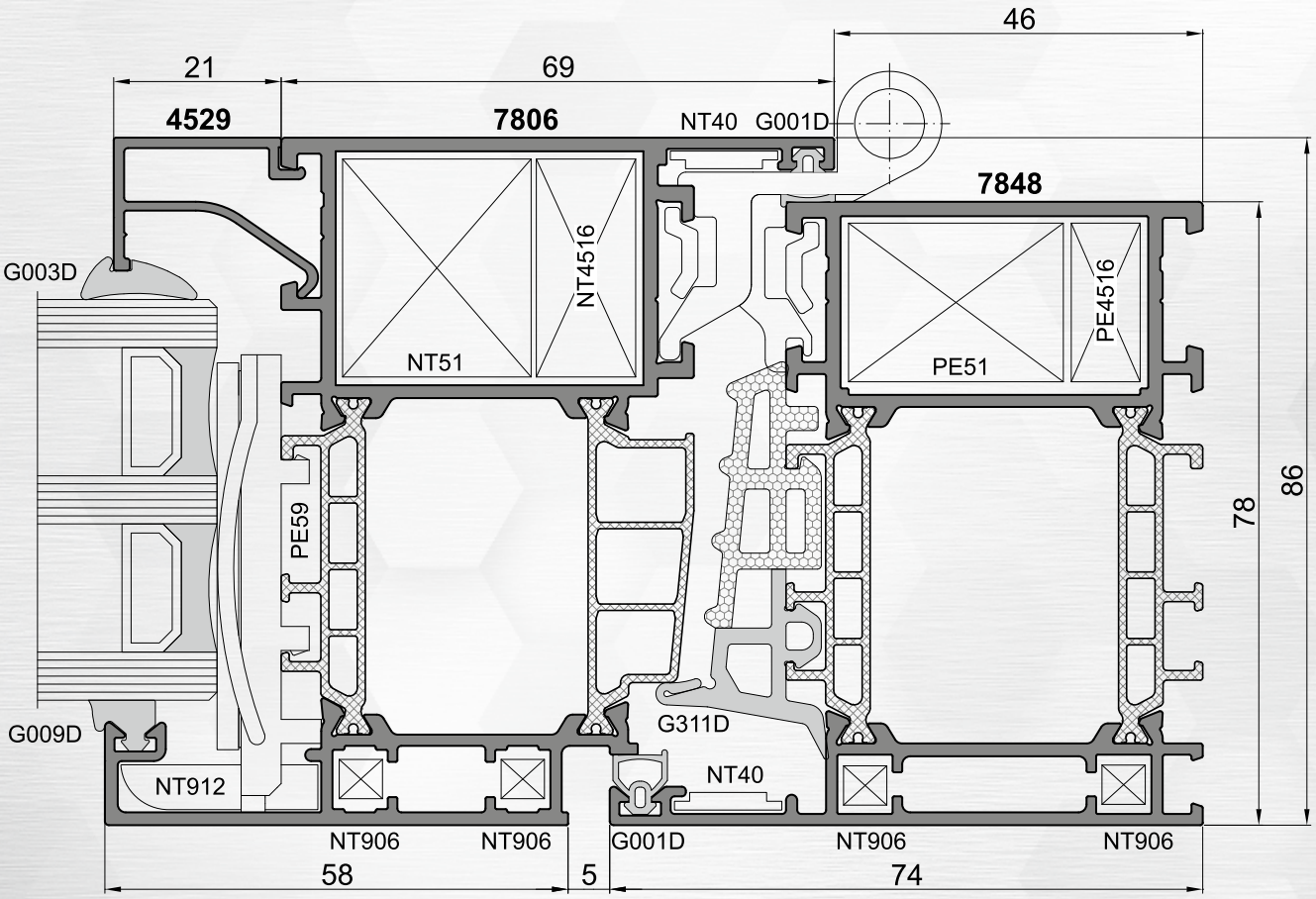
$U_w = 0.88\ W/m^2K$

*reference construction dimensions: L 1480 x H 2180 mm
$U_g = 0.5\ W/m^2K$, triple glazing

An insulated aluminium profile system with the Euro hardware groove as well as the PVC hardware groove in window sash profiles, designed for the construction of very high thermal performance windows.

- *high thermal performance due to the multi-cavity 42 mm thermal break and bi-component central gasket*
- *large-dimension constructions possible*
- *wide range of available hardware*
- *window sashes flush with the frame on the outside*
- *profile bending available*
- *wide variety of corner joint solutions*
- *different thermal insulation variants with different insulation inserts: PE78N+, PE78NHI, PE78NHI+*
- *wide variety of possible constructions: turn-tilt, outward opening, concealed sash etc.*

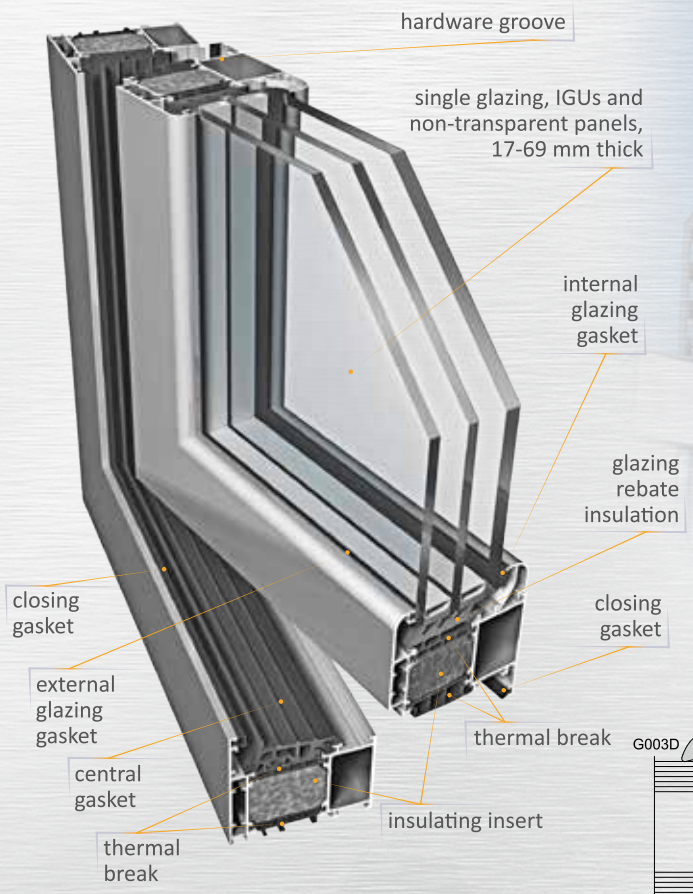
Ponzio PE78N WINDOWS

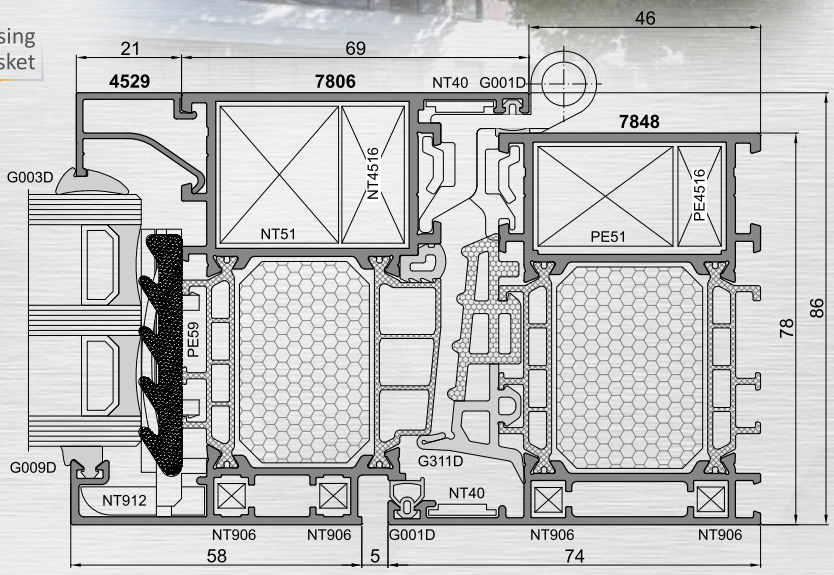


Technical parameters

Filling thickness	*frame: 17-61 mm, sash: 25-69 mm*
Frame depth	*78 mm*
Sash depth	*86 mm*
Maximum sash dimensions	*L 1700 x H 2200 mm, L 1300 x H 3000 mm*
Maximum sash weight	*200 kg*
Air permeability	*class 4*
Watertightness	*class E1650*
Thermal insulation	*frame heat transfer coefficient U_f from 1.7 W/m²K, U_w from 0.88 W/m²K*
Resistance to wind load	*class C5*
Resistance to burglary	*class RC2, RC3 in acc. with PN - EN 1627*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

Ponzio PE78NHI WINDOWS





Technical parameters

Filling thickness	*frame: 17-61 mm, sash: 25-59 mm*
Frame depth	*78 mm*
Sash depth	*86 mm*
Maximum sash dimensions	*L 1700 x H 2200 mm, L 1300 x H 3000 mm*
Maximum sash weight	*200 kg*
Air permeability	*class 4*
Watertightness	*class E1650*
Thermal insulation	*U_f from 0.9 W/m²K, U_w from 0.74 W/m²K*
Resistance to wind load	*class C5*
Resistance to burglary	*class RC2, RC3 in acc. with PN - EN 1627*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

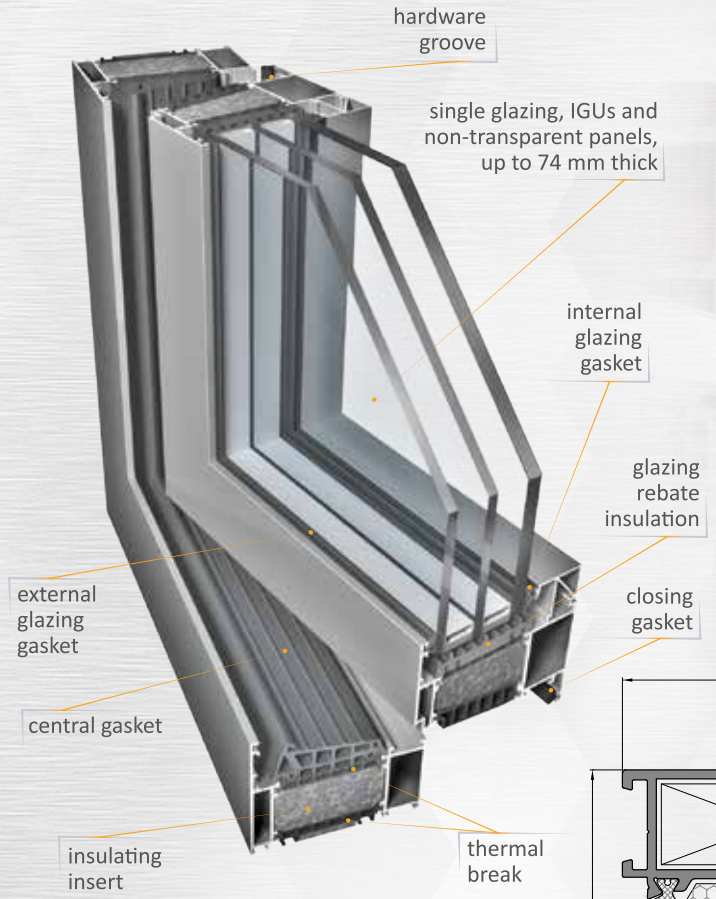
$U_w = 0.74$ W/m²K

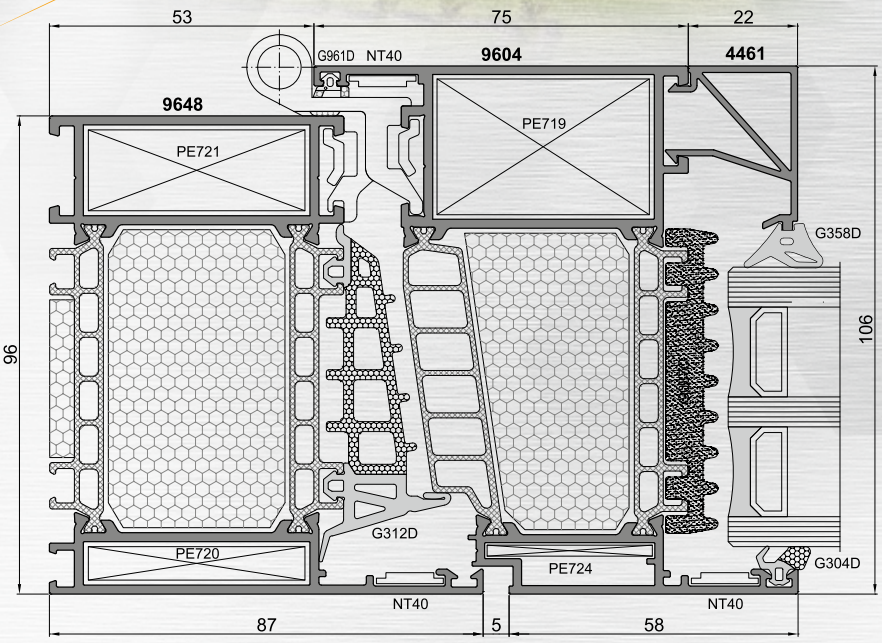
*reference construction dimensions: L 1480 x H 2180 mm, $U_g = 0.5$ W/m²K, triple glazing

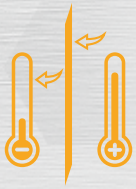
A variant of the PE78N profile system for exceptionally high thermal performance requirements.

- *the value of the heat transfer coefficient depends on the type of insulating inserts used*
- *the warmer PE78NHI variant features glazing rebate and profile cavity inserts resulting in U_f values as low as 0.9 W/m²K*
- *the warmest PE78NHI+ variant features glazing rebate insulation and aerogel profile cavity inserts resulting in U_f values as low as 0.7 W/m²K*

Ponzio PE96 Passive







U_w = 0.66 W/m²K

*reference construction dimensions: L 1480 x H 2180 mm, U_g = 0.5 W/m²K, triple glazing

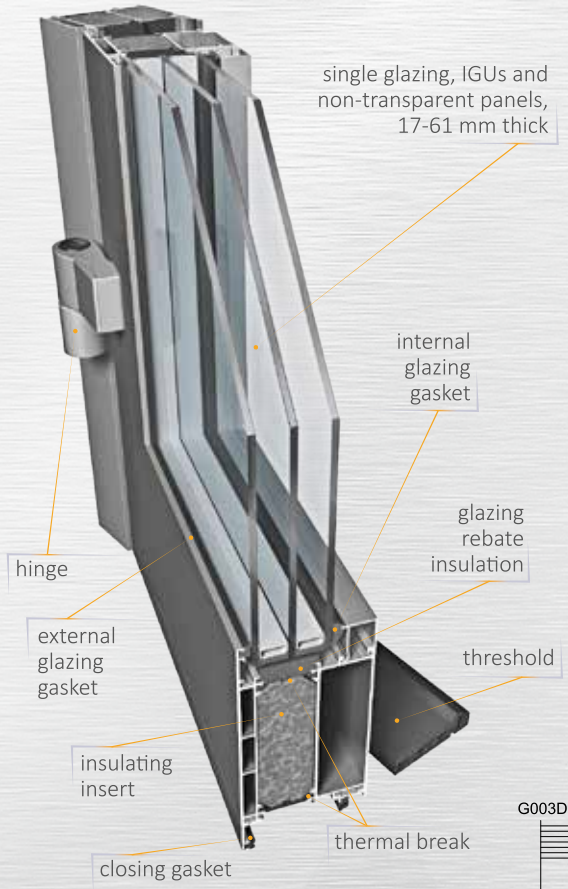
Technical parameters

Filling thickness	*frame: 39-62 mm, sash: 39-74 mm*
Frame depth	*96 mm*
Sash depth	*106 mm*
Maximum sash dimensions	*L 1700 x H 2300 mm*
Maximum sash weight	*180 kg*
Air permeability	*class 4*
Watertightness	*class E1950*
Resistance to wind load	*class C5*
Thermal insulation	*U_f from 0.82 W/m²K* *U_w from 0.66 W/m²K*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

A window system fulfilling the highest thermal performance requirements - designed for energy efficient and passive construction (U_w < 0.8 W/m²K).

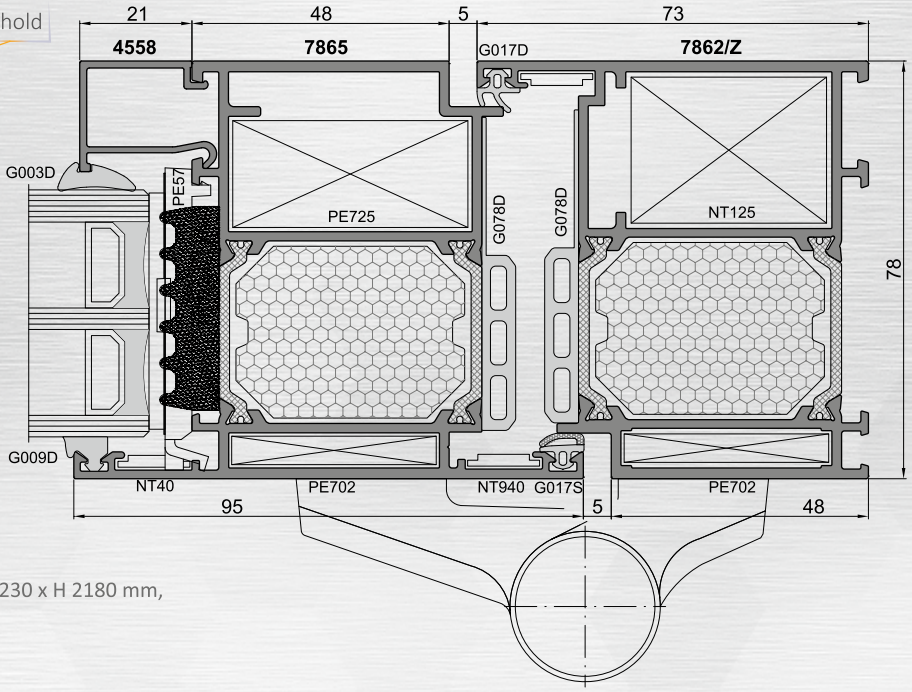
- *high thermal insulation due to the multi-cavity 62 mm thermal breaks and bi-component central gaskets*
- *large-dimension constructions possible*
- *window sashes flush with the frame on the outside*
- *wide variety of corner joint solutions*
- *22 mm and 28 mm high glazing beads*

Ponzio PE78N/PE78NHI DOORS



An insulated, three-cavity profile system designed for the construction of doors.

- *coplanar construction (frame-leaf gap - 18 mm)*
- *Euro groove glazing beads*
- *profiled 34 mm thermal breaks*
- *doors easily incorporated in window sets due to special modifier profiles*
- *door leafs flush with the frame*
- *large-dimension constructions possible*
- *wide variety of corner joint solutions*
- *profile bending available*
- *wide range of available hardware*
- *different thermal insulation variants with different insulation inserts: PE78N+, PE78NHI, PE78NHI+*



U_w = 0.93 W/m²K

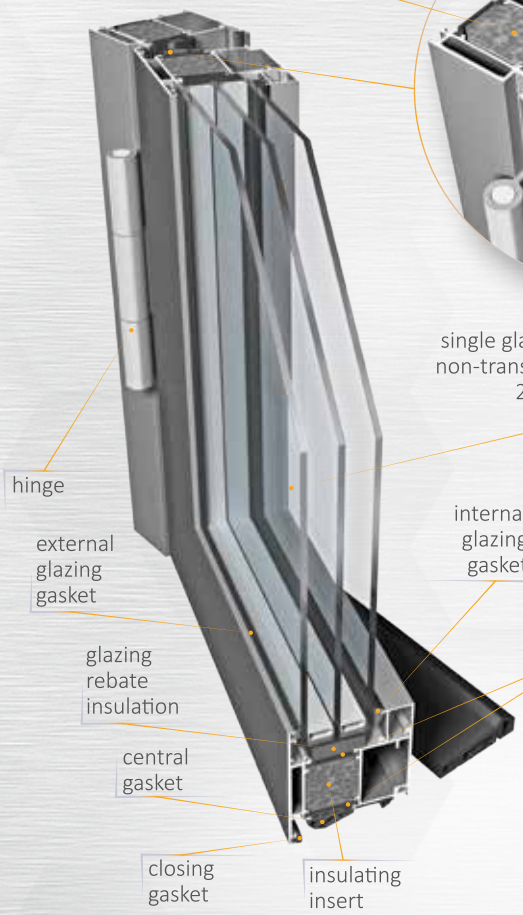
*reference construction dimensions: L 1230 x H 2180 mm, U_g = 0.5 W/m²K, triple glazing

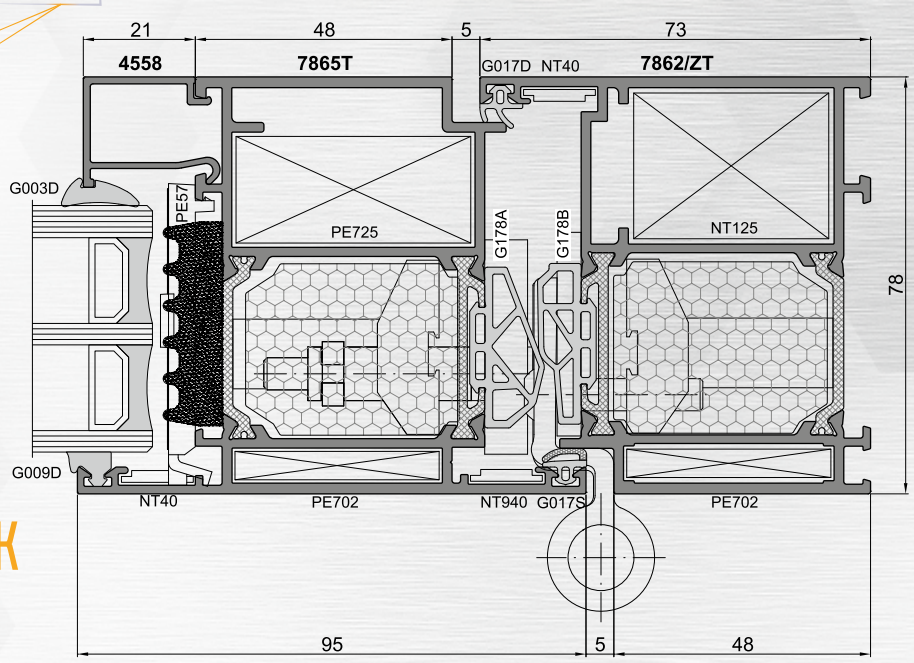
Technical parameters

Filling thickness	*leaf: 17-61 mm*	**Thermal insulation**	*PE78N: U_f from 2.1 W/m²K PE78NHI: U_f from 1.5 W/m²K*
Frame and leaf depth	*78 mm*	**Thermal insulation**	*PE78N: U_d from 1.10 W/m²K PE78NHI: U_d from 0.93 W/m²K*
Maximum leaf dimensions	*L 1400 x H 3000 mm*	**Resistance to wind load**	*class C2/B3*
Maximum leaf weight	*210 kg*	**Resistance to burglary**	*class RC2, RC3 in acc. with PN - EN 1627*
Air permeability	*class 3*	**Certification**	*ITT in acc. with PN - EN 14351-1 + A1*
Watertightness	*class 9A*		

Ponzio PE78NHI

DOORS WITH CENTRAL SEALING





U_w = 0.89 W/m²K

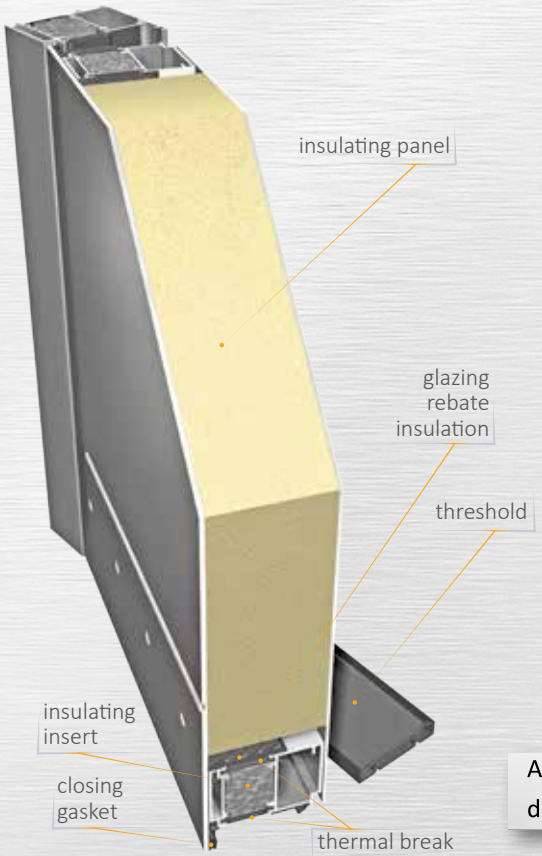
*reference construction dimensions: L 1230 x H 2180 mm, U_g = 0.5 W/m²K, triple glazing

A variant of the Ponzio PE78N system with additional central gaskets resulting in improved Uf values.

- *gasket mounted on a bespoke thermal break (available also in anti-bimetal versions)*
- *special corners for gaskets - easier installation and improved corner sealing*
- *new external closing gasket with a wide range of movement compensates for prefabrication and assembly errors*
- *euro groove glazing beads*
- *large-dimension constructions available*
- *profiled thermal breaks*
- *door leafs flush with frame*
- *doors easily incorporated in window sets due to special modifier profiles*
- *wide variety of corner joint solutions*

Ponzio PE68/PE78N

PANEL DOORS

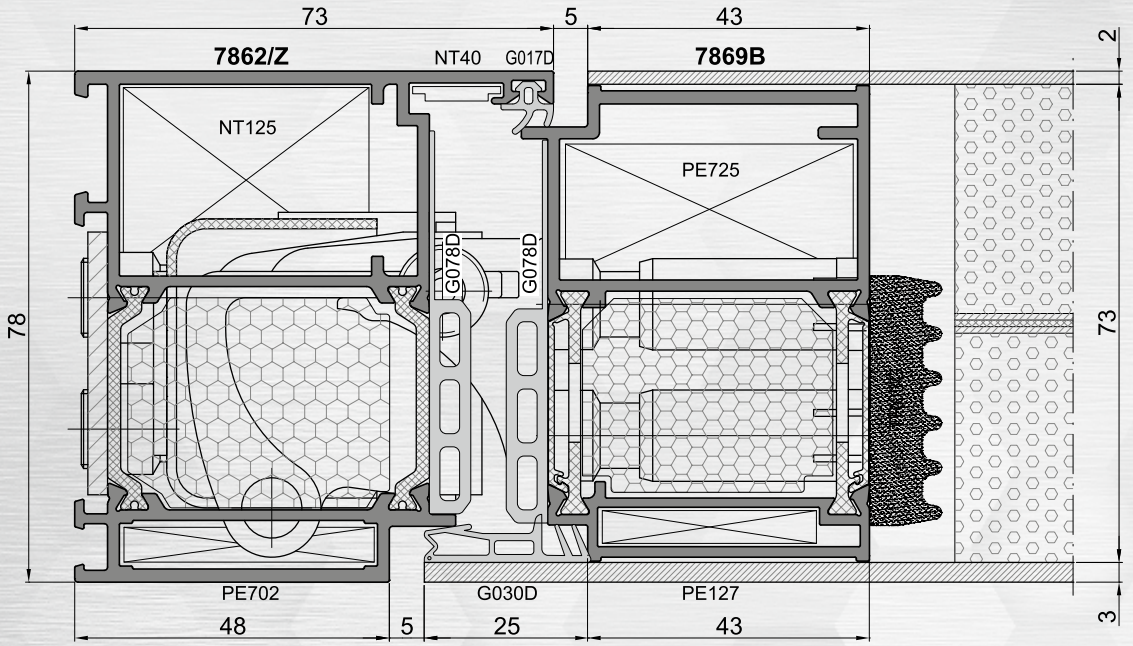


A solution for the most demanding customers, designed for the construction of doors with flush visible surfaces.

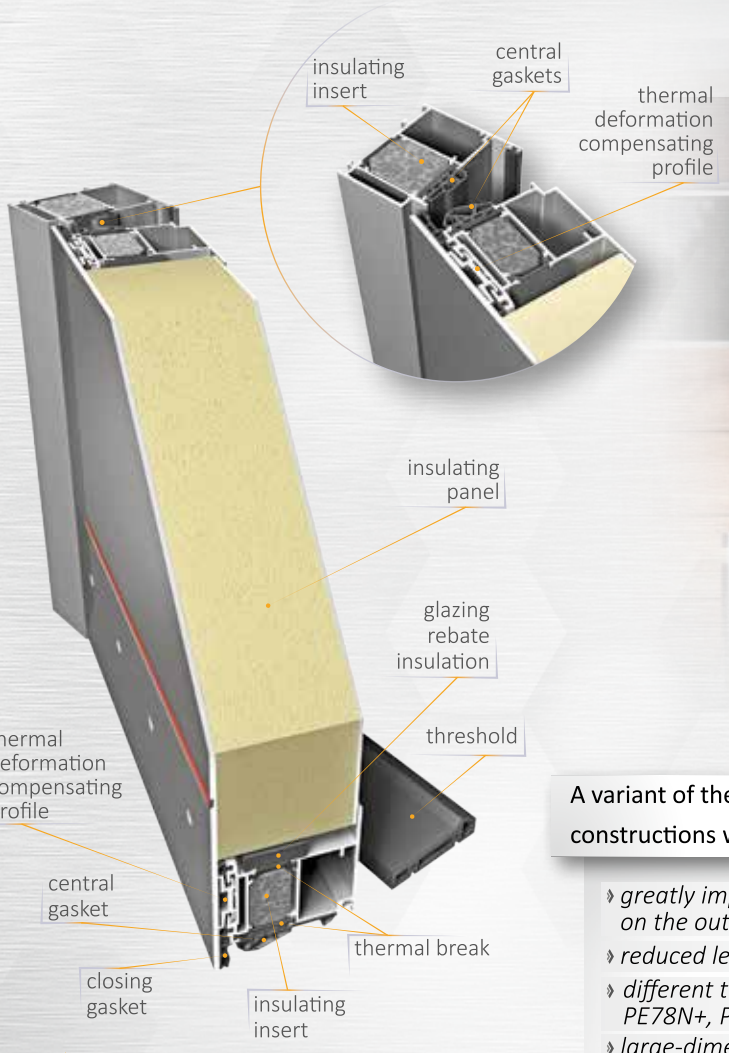
- *door leaf flush with window frame*
- *light yet rigid door structure*
- *wide variety of panel designs available*
- *uniform appearance of door*
- *concealed construction elements*
- *smooth, elegant, modern design*
- *available hinges include: surface hinges, concealed hinges, roll hinges*

U_d = 0.82 W/m²K

*reference construction dimensions: L 1230 x H 2180 mm, U_p = 0.45 W/m²K, insulating panel



Ponzio PE78NHI
FLOATING PANEL DOORS

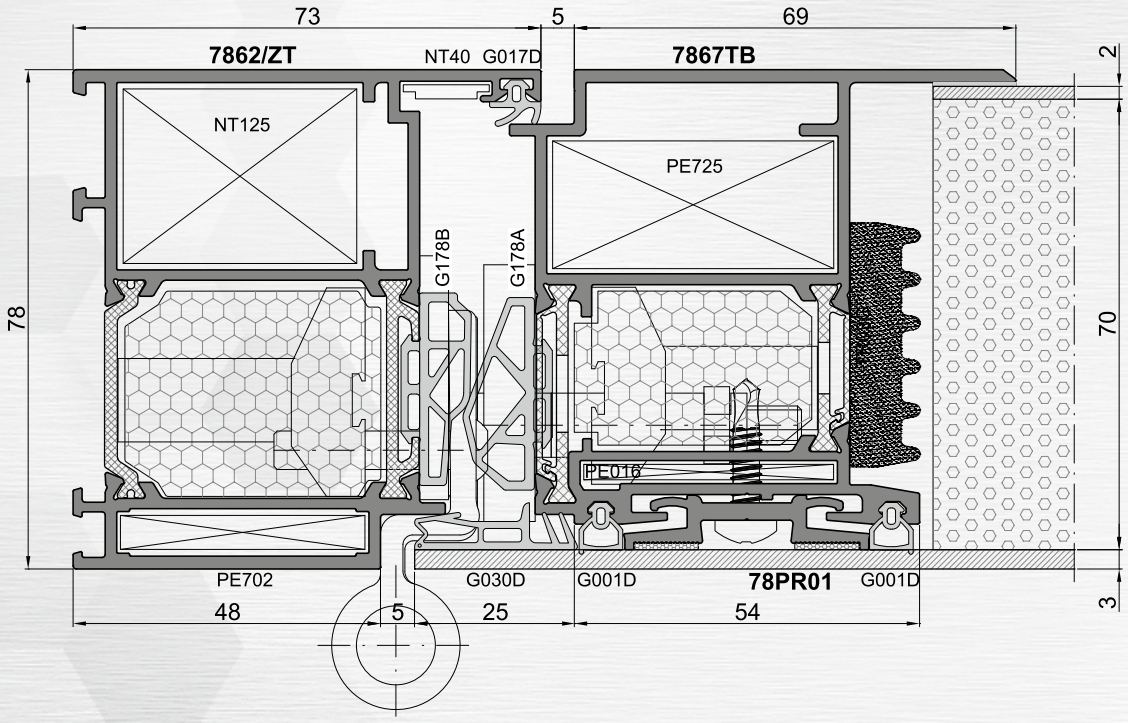


A variant of the PE78NHI system designed for the construction of panel doors - constructions with flush visible surfaces.

- *greatly improved thermal performance due to the floating panel mounted on the outer surfaces of three-cavity profiles*
- *reduced leaf deflection resulting from temperature changes*
- *different thermal insulation variants with different insulation inserts: PE78N+, PE78NHI, PE78NHI+*
- *large-dimension constructions available*
- *profiled thermal breaks*
- *door leafs flush with frame*
- *doors easily incorporated in window sets due to special modifier profiles*
- *wide variety of corner joint solutions*

$U_d = 0.82\ W/m^2K$

*reference construction dimensions: L 1230 x H 2180 mm, U_p = 0.45 W/m²K, insulating panel



Ponzio PE78EI

EI15, EI30, EI45, EI60, EI90, EI120

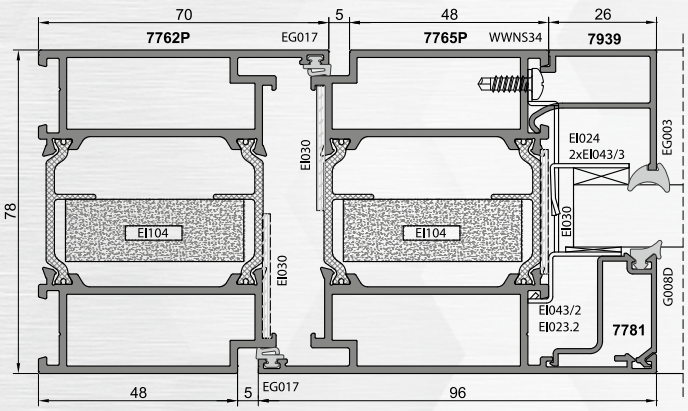
An insulated profile system designed for the construction of internal and external fire-resistant joinery.

- *profiles with special fire-resistant inserts, selection depending on the fire resistance class of the joinery: EI15, EI30, EI45, EI60, EI90, EI120*
- *single and double, inward and outward opening doors with several different threshold solutions as well as partitions up to 4000 mm high available*
- *35 and 46 mm thermal breaks ensuring good thermal insulation*
- *easy hardware and accessories installation shortens construction time*
- *large-dimension constructions available*
- *Design Line system variant (glazing with beads on only one side)*
  - glazing and profiles form a nearly flush surface
  - decreased production and assembly time compared to systems with glazing beads on both sides
- *interconnected with other Ponzio systems*
- *smoke control doors available*
- *arched constructions available*
- *three types of fire-resistant inserts: gypsum, aluminosilicate and poured*

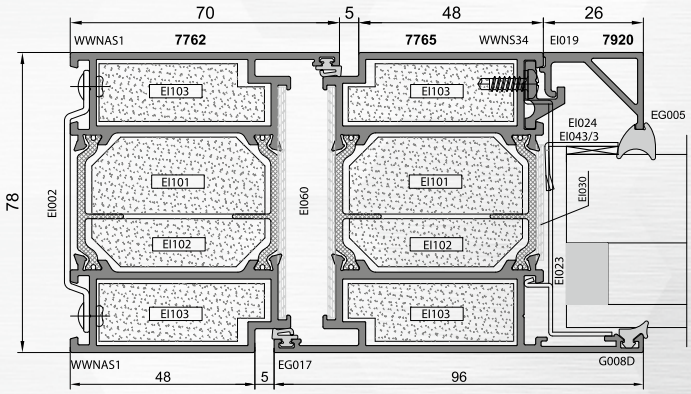
Ponzio PE78EI

EI15, EI30, EI45, EI60, EI90, EI120

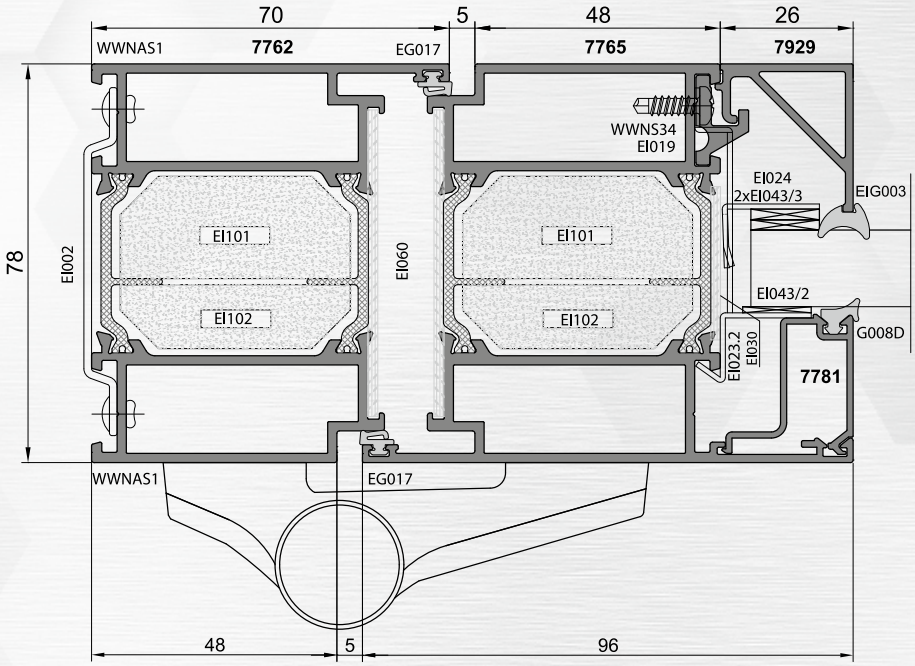
Class EI30 Design Line, economy version



Class EI60 Design Line



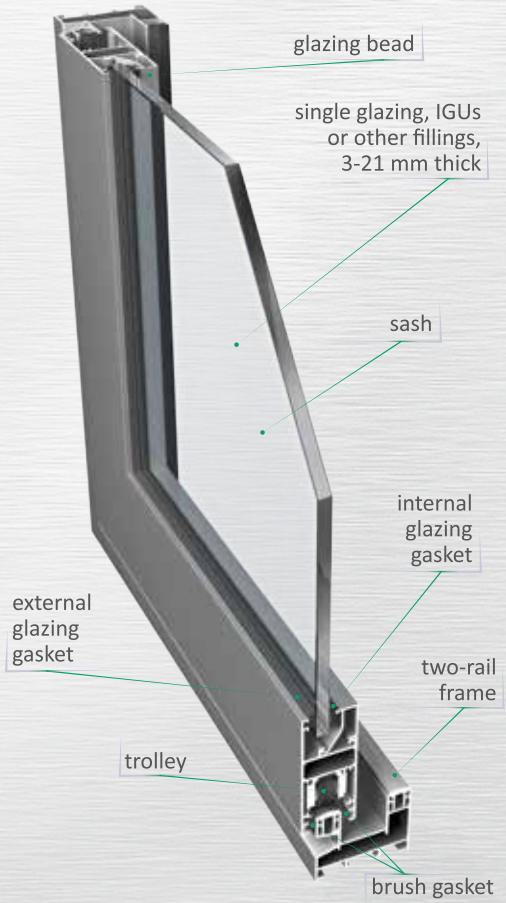
Class EI30



Technical parameters

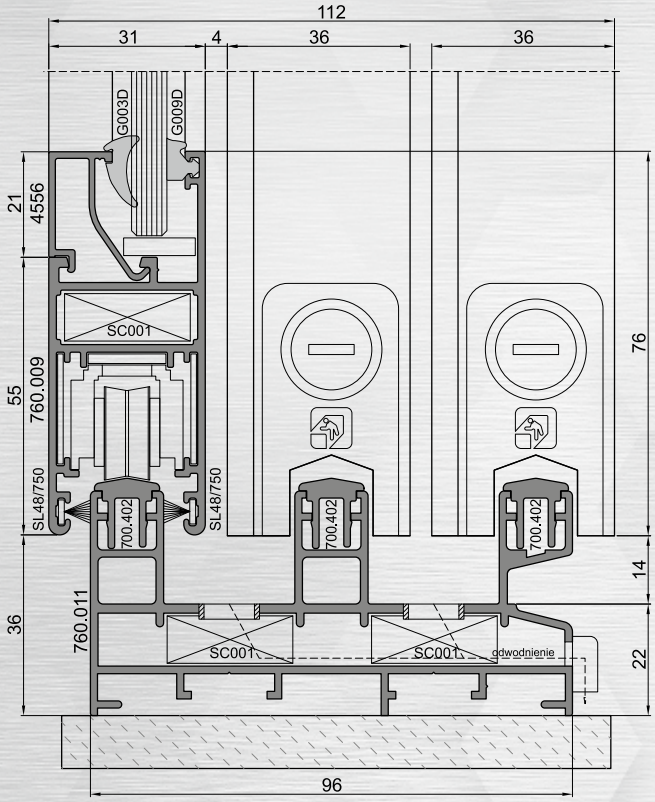
Filling thickness	*8 - 62 mm (55 - 73 mm for EI 120)*
Frame and leaf depth	*78 mm (89 mm for EI120)*
Type of filling	*fire-resistant single glazing, IGUs: PN-EN1279-1, PN-EN 1279-5 non-transparent panels: in acc. with the Technical Approval or the National Technical Assessment*
Gaskets	*EPDM, in acc. with PN-EN 12365-1*
Smoke control	*class S_a and S_{200} in acc. with PN-EN 13501-2*
Sound reduction	*R_{A1} – 35 dB, R_{A2} – 30 dB, R_W – 37 dB (Swissflam 17 mm fire-resistant single glazing)*
Fire resistance classification	*EI15, EW30, EI30, EI45, EI60, EI90, EI120*
Technical Approval	*ITB Technical Approval AT-15-7540/2016 "PONZIO PE78EI fire-resistant doors and internal and external fire-resistant partition kits using aluminium profiles with thermal breaks"*
National Technical Assessment	*1. ITB-KOT-2017/0351 - "PONZIO PE78EI internal fire-resistant and/or smoke control doors, internal fire-resistant windows and internal and external fire-resistant partition kit using aluminium profiles with thermal breaks"* *2. ITB-KOT-2018/0529 - "PONZIO PE78EI internal fire-resistant full-glass partition kit using aluminium profiles with thermal breaks"*

Ponzio SL600



A non-insulated aluminium profile system designed for the construction of internal and external joinery, including sliding partitions and balocny constructions.

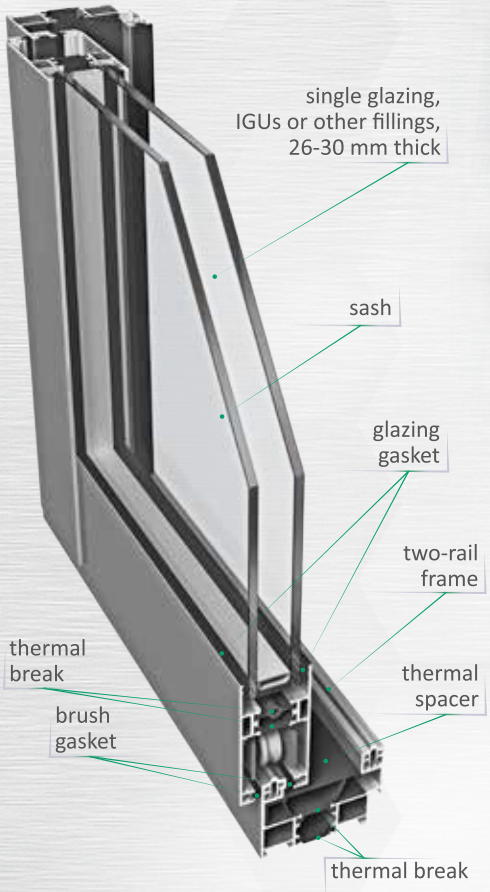
- *two- and three-rail frames available*
- *constructions with several sashes possible*
- *interconnected with other Ponzio systems*
- *Ponzio system hardware*

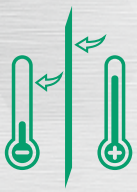


Technical parameters

Filling thickness	*2 - 23 mm*
Sash depth	*31 mm*
Frame depth	*55 mm two-rail frame* *95.5 mm three-rail frame*
Maximum sash dimensions	*L 1500 x H 2500 mm*
Maximum sash weight	*120 kg*

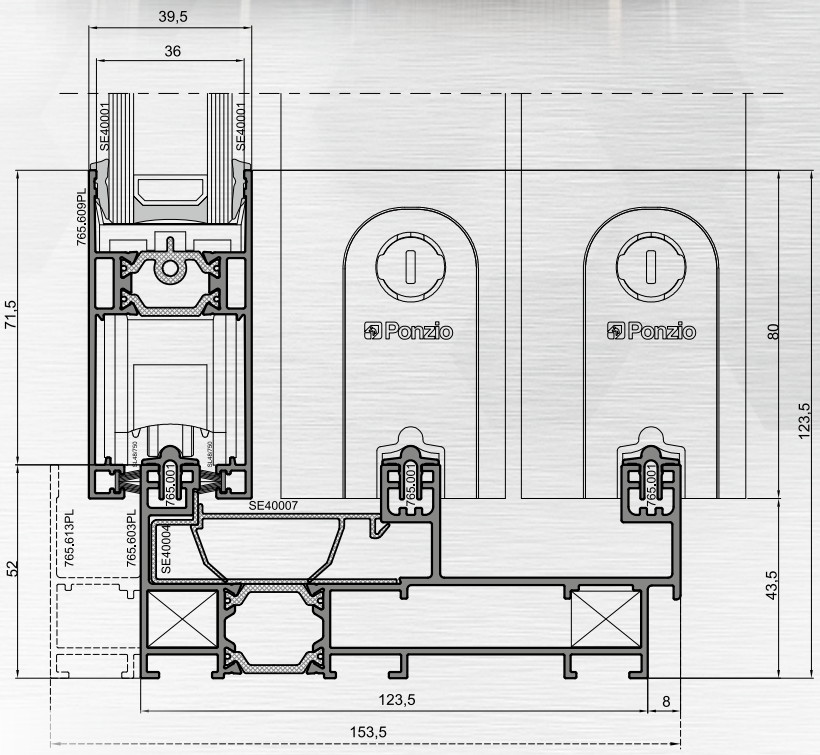
Ponzio SL600ttEVO





U_w = 1.5 W/m²K

*reference construction dimensions: L 2400 x H 2400 mm, U_g = 1.0 W/m²K, double glazing



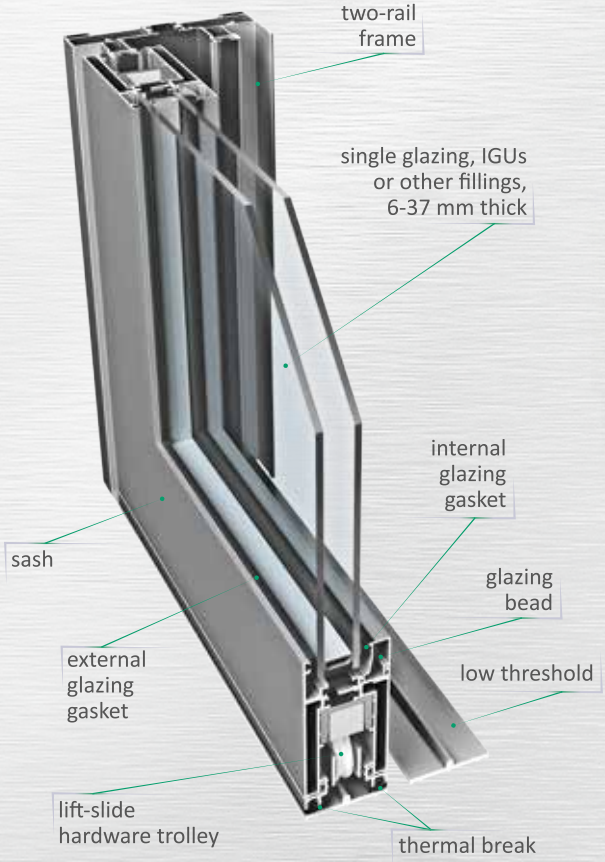
Technical parameters

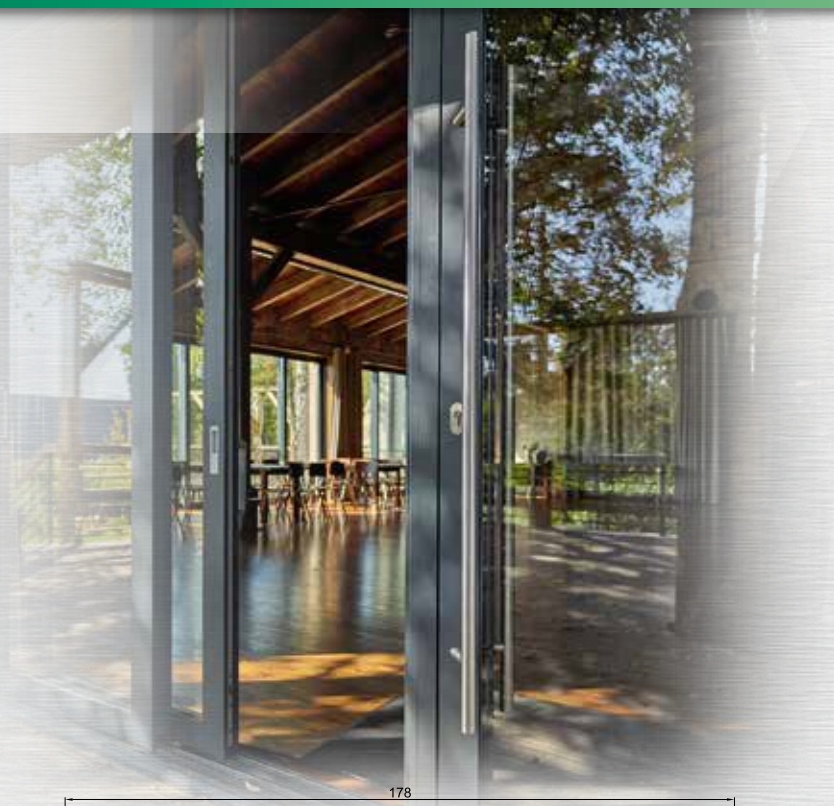
Filling thickness	*26 - 30 mm*
Sash depth	*46 mm*
Frame depth	*73/95,5 mm two-rail frame* *131,5/153,5 mm three-rail frame*
Maximum sash dimensions	*L 2000 x H 3000 mm*
Maximum sash weight	*220kg*
Air permeability	*class 4*
Watertightness	*class 7A*
Resistance to wind load	*class C3/B3*
Thermal insulation	*U_f from 3.1 W/m²K* *U_w from 1.5 W/m²K (U_g =1,0)*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*

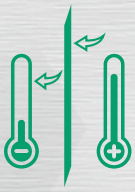
An insulated aluminium profile system designed for the construction of sliding windows and spatial constructions such as balcony and loggia structures.

- *37 mm width of central mullion - slender yet rigid constructions*
- *Ponzio system hardware*
- *glazing and brush gaskets*
- *interconnected with other Ponzio systems*
- *90° or 45° corner connections available*
- *vertical sliding pass-through windows available using dedicated hardware*
- *concealed sliding door solution*

Ponzio SLI200tt

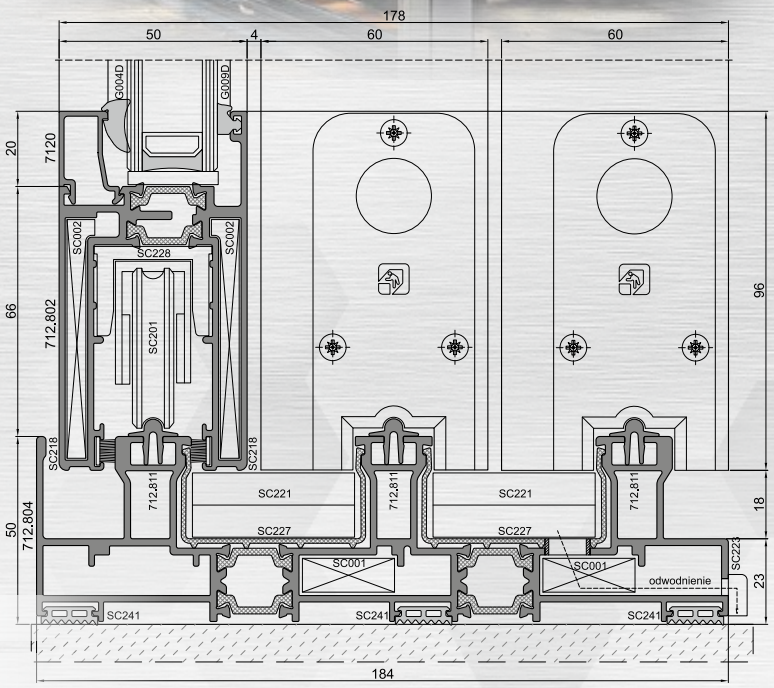






$U_w = 1.9\ W/m^2K$

*reference construction dimensions: L 2400 x H 2400 mm, U_g = 1.0 W/m²K, double glazing



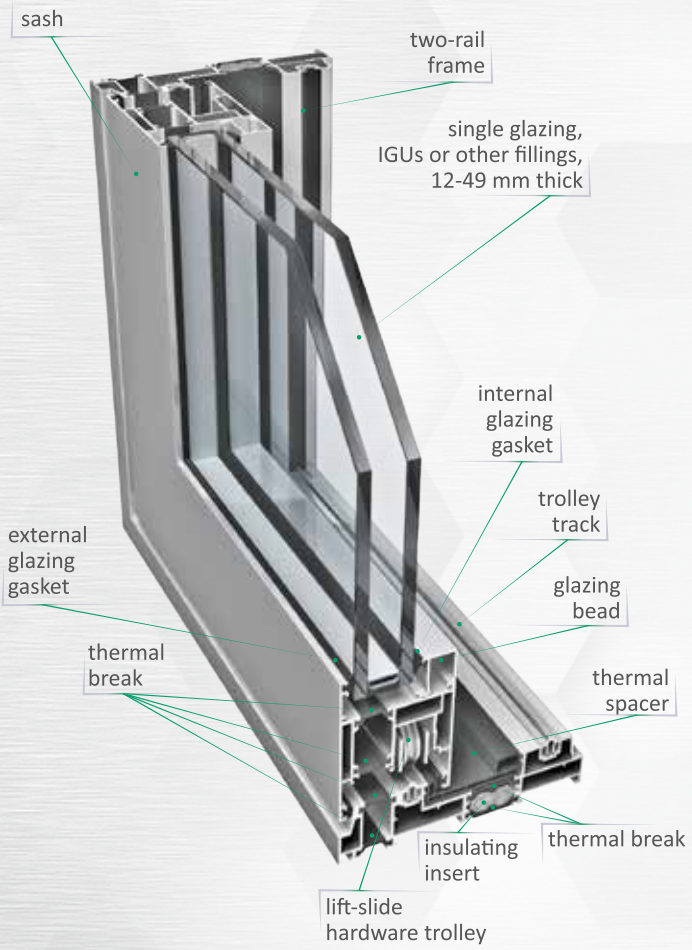
Technical parameters

Filling thickness	*6 - 37 mm*
Sash depth	*50 mm*
Frame depth	*120 mm two-rail frame* *184 mm three-rail frame*
Maximum sash dimensions	*L 2000 x H 2300 mm*
Maximum sash weight	*250kg*
Air permeability	*class 3*
Watertightness	*class 7A*
Resistance to wind load	*class B3*
Thermal insulation	*U_f from 3.4 W/m²K* *U_w from 1.9 W/m²K (U_g =1.0)*
Certification	*ITT in acc. with PN-EN* *PN - EN 14351-1 + A1*

An insulated aluminium profile system designed for the construction of external lift-slide joinery such as balcony and loggia structures.

- *interconnected with other Ponzio systems*
- *low threshold solution available*
- *two- to four-rail frames*

Ponzio SL1600tt



An insulated aluminium profile system designed for the construction of external lift-slide joinery.

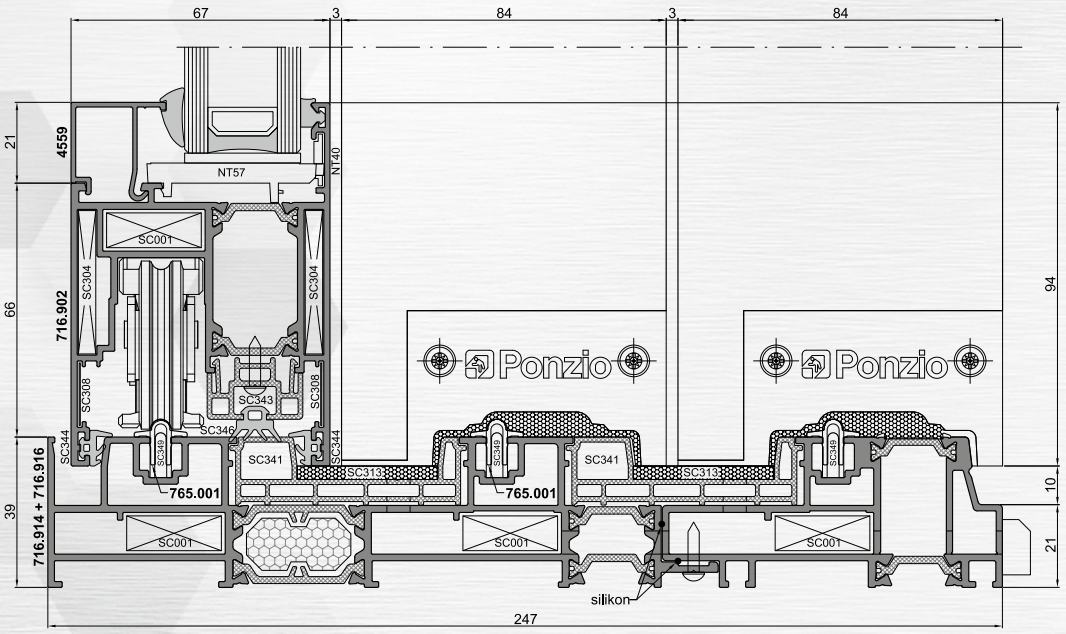
- *large-dimension constructions with up to 8 sashes possible*
- *high resistance to weather conditions*
- *automatic drives available*
- *corner floating mullion solution*
- *low threshold available*
- *different thermal insulation variants with different insulation inserts: SL1600tt, SL1600tt+, SL1600ttHI*

Technical parameters

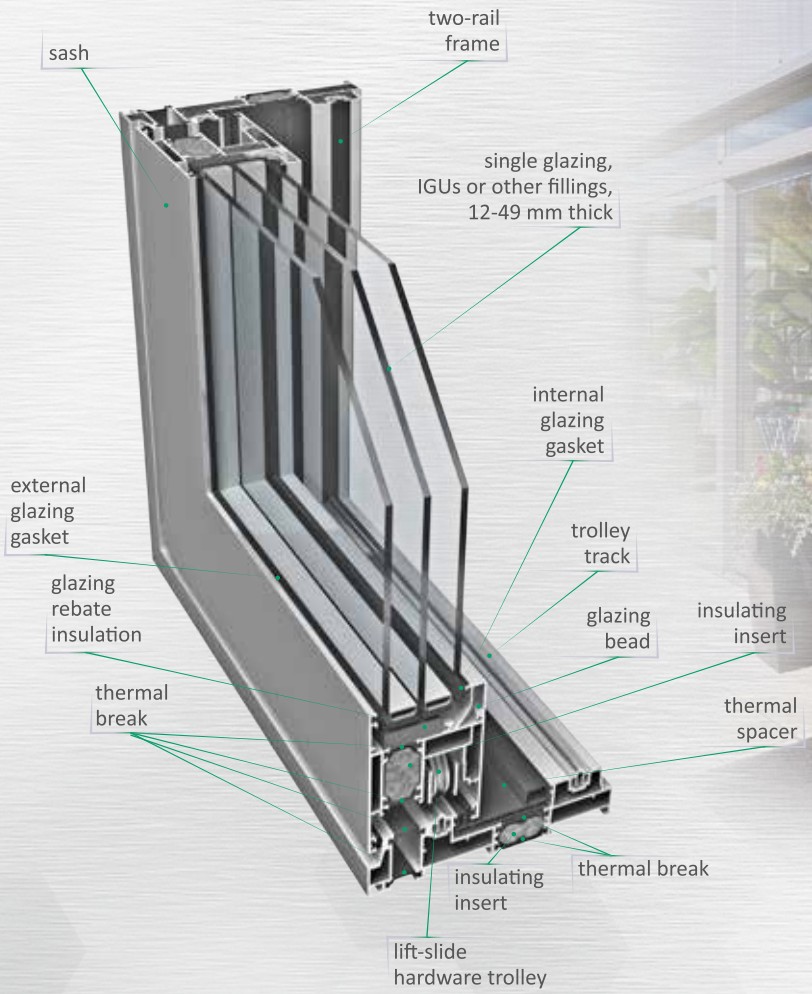
Filling thickness	*12 - 49 mm*
Sash depth	*67 mm*
Frame depth	*160/154 mm two-rail frame* *247/241 mm three-rail frame*
Maximum sash dimensions	*L 1800 x H 3200 mm*
Maximum sash weight	*300/400 kg*
Air permeability	*class 4*
Watertightness	*class 9A*
Resistance to wind load	*class C3/B5*
Thermal insulation	*U_f from 2.3 W/m²K* *U_w from 1.1 W/m²K*
Certification	*ITT in acc. with PN-EN 14351-1+A11*
Resistance to burglary	*class RC2 in acc. with PN-EN 1627*

$U_w = 1.1\ W/m^2K$

*reference construction dimensions: L 2400 x H 2400 mm, U_g = 0.5 W/m²K, triple glazing



Ponzio SL1600ttHI



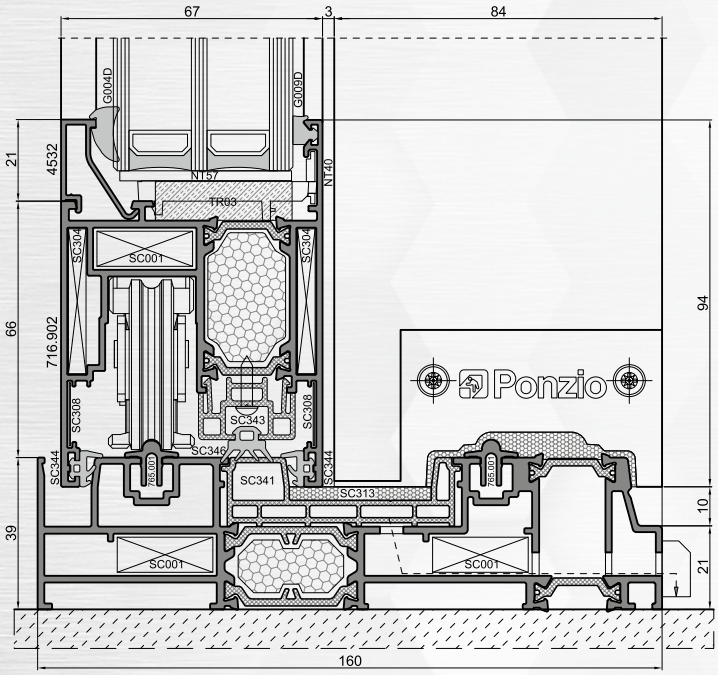
U_w = 1.0 W/m²K

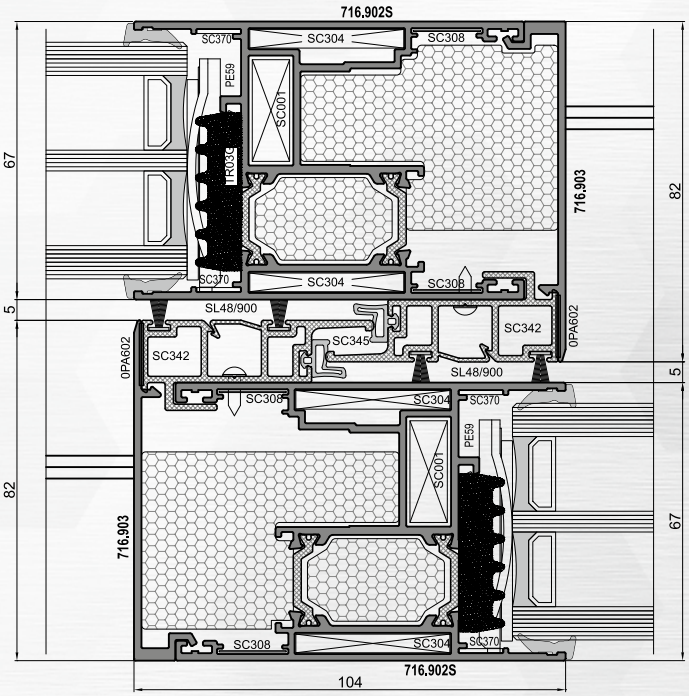
*reference construction dimensions: L 2400 x H 2400 mm, U_g = 0.5 W/m²K, triple glazing

A variant of the SL1600tt lift-slide system, designed for the construction of high thermal performance aluminium joinery.

- *PLUS version: U_f frame heat transfer coefficient as low as 2.1 W/m²K*
- *HI versionL: U_f frame heat transfer coefficient as low as 1.8 W/m²K*

Ponzio SL1600ttHI





Technical parameters

Filling thickness	*12-49 mm*
Sash depth	*67 mm*
Frame depth	*160/154 mm two-rail frame* *247/241 mm three-rail frame*
Maximum sash dimensions	*L 1800 x H 3200 mm*
Maximum sash weight	*300/400 kg*
Air permeability	*class 4*
Watertightness	*class 9A*
Resistance to wind load	*class C3/B5*
Thermal insulation	*U_f from 1.8 W/m²K* *U_w from 1.0 W/m²K*
Certification	*ITT in acc. with PN - EN 14351-1 + A1*
Resistance to burglary	*class RC2 in acc. with PN - EN 1627*

ADDITIONAL INFORMATION

The extensive range of Ponzio product offers a wide variety of interconnected solutions which have been designed to constitute a coherent and compatible system.

Technical solutions

A wide range of solutions optimised with regard to quality, static durability, weather resistance, fire resistance and energy efficiency (in prefabrication and installation and in everyday use due to good thermal performance).
Modern technologies and designs consistent with the latest architectural trends ensure durable, large-dimension constructions with large glazings and high comfort of use.
Efficient water drainage and ventilation solutions are guaranteed to function properly in even difficult weather conditions in different locations around the world.
Decades of experience in designing aluminium systems and our own R&D facilities allow short development times of bespoke solutions for the most demanding investors.

Aluminium profiles

EN AW – 6060 in acc. with PN-EN 573-3 temper T66 in acc. with PN-EN 515 Al Mg Si 0.5 F22 in acc. with DIN 1725 T1, DIN 17615 T1

Gaskets

EPDM synthetic rubber in acc. with DIN 7863 and ISO 3302-01,E2

Hardware and accessories

system elements and the best brands available on the market: SAVIO, ROTO, SOBINCO, FAPIM, GEZE, DORMA, SECURISTYLE

Fillings

single glazing, IGUs with any type of glass and non-transparent panels

Surface treatment

- polyester powder coating in acc. with Qualicoat available in all RAL colours; anodising and with wood-like appearance; anodizing in acc. with Qualanod in natural aluminium and coloured; wood-effect coating
- polyester powder coating fulfills high anti-corrosion requirements

Thermal insulation

Determined analytically in FEM calculations as well as through testing; individual frame heat transfer coefficients (U_f/U_o) for certain profile combinations as well as heat transfer coefficients for full constructions (U_w/U_{cw})

Certification

- ITT in acc. with PN-EN 14351 for window and door systems, in acc. with PN-EN 13830 for curtain wall systems
- ITB Technical Approvals
- ITB National Technical Assessments

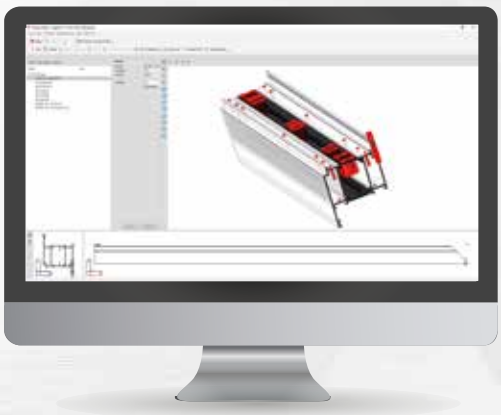
Ponzio offers dedicated software supporting the drawing, quotation and prefabrication processes for aluminium joinery. The software is regularly modified and updated to reflect the changes and improvements done in Ponzio systems.

PonzioTech

Based on the popular LiczOkno program used by aluminium joinery manufacturers, this is an advanced version dedicated for Ponzio products. Allows the design of complex window, door and curtain wall constructions and aids in profile selection with statics calculations.

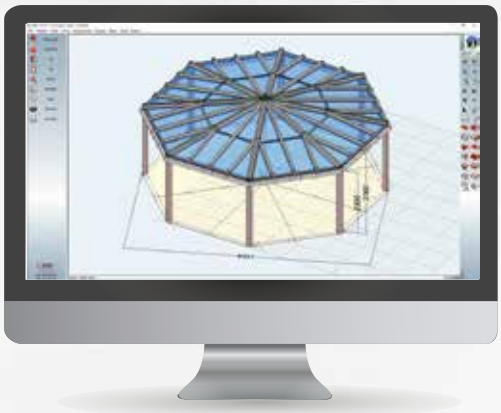
LogiKal

This program is delivered by OrgaData, a renowned company specialising in joinery manufacturing support software. LogiKal performs many necessary calculations, manages orders and prepares production plans. If the customer changes any dimension of the ordered product, each modification is stored in the order history. The program automatically creates construction cross-sections and is compatible with almost every type of CNC saw and machining centre available on the market.



Ponzio3D

Software delivered by KKP Soft-Ing Team. This program supports the 3D design process of winter gardens manufactured from PF152WG profiles. It generates clear cutting lists which indicate the position of each profile in the construction. Statical analysis of the construction is performed and possible alternative load-bearing elements are indicated. The program can also create visualisations of end-products using an imported background image.



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