



DECLARATION OF PERFORMANCE No. 30

1. Unique identification code of product type:

Sandwich panel with X-PIR polyisocyanurate core

SP2B 100 X-PIR	SP2E 120 X-PIR
SP2B 110 X-PIR	SP2E 140 X-PIR
SP2B 120 X-PIR	SP2E 160 X-PIR
SP2B 150 X-PIR	SP2E 180 X-PIR
SP2B 100 X-PIR B	SP2E 200 X-PIR
SP2B 110 X-PIR B	SP2E 120 X-PIR B
SP2B 120 X-PIR B	SP2E 140 X-PIR B
SP2B 150 X-PIR B	SP2E 160 X-PIR B
SP2B 100 X-PIR ENERGY	SP2E 120 X-PIR ENERGY
SP2B 110 X-PIR ENERGY	SP2E 140 X-PIR ENERGY
SP2B 120 X-PIR ENERGY	SP2E 160 X-PIR ENERGY
SP2B 150 X-PIR ENERGY	SP2E 180 X-PIR ENERGY
SP2B 100 X-PIR B ENERGY	SP2E 200 X-PIR ENERGY
SP2B 110 X-PIR B ENERGY	SP2E 120 X-PIR B ENERGY
SP2B 120 X-PIR B ENERGY	SP2E 140 X-PIR B ENERGY
SP2B 150 X-PIR B ENERGY	SP2E 160 X-PIR B ENERGY

2. Intended use: Self-supporting metal faced insulating panels for use in buildings; external walls, internal walls and ceilings.
- Detailed intended use refers to the sandwich panel type – information in attachments to this declaration.
3. Manufacturer: Ruukki Polska Sp. z o.o.
ul. Jaktorowska 13, 96-300 Żyrardów, Poland
Oborniki branch
ul. Łukowska 7, 64-600 Oborniki, Poland
4. Authorized representative: not applicable
5. AVCP level: reaction to fire, fire resistance: 3; other properties: 4
- 6a. Harmonised standard: EN 14509:2013 "Self-supporting double skin metal faced insulating panels. Factory made products. Specifications"
- Notified body: Instytut Techniki Budowlanej (ITB) (1488)
FIRES S.R.O. (1396)
Eurofins Expert Services Oy (0809)

7. Declared performances: Technical product characteristics of specified product configuration are available in attachments to this Declaration of Performance.

The performance of the product identified above is in conformity with the set of declared performances. This declaration of performance is issued, in accordance with Regulation (EU) No 305/2011, under the sole responsibility of the manufacturer identified above.

This Declaration of Performance is available on Ruukki web page:

<https://www.ruukki.com/building-envelopes/services-support/sandwich-panel-support/declaration-of-performance-for-sandwich-panels>

Signed for and on behalf of the manufacturer by:



Elżbieta Płaza
Certification Manager
Ruukki Construction

Helsinki, 08.06.2026

Declared technical characteristics of specified type of sandwich panel are available on the following pages:

ENERGY PANELS:

SP2B X-PIR Energy	Page 4
SP2B X-PIR B Energy	Page 5
SP2E X-PIR Energy	Page 6
SP2E X-PIR B Energy	Page 7

OTHER PANELS:

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SP2E X-PIR	Page 10
SP2E X-PIR B	Page 11

Attachment 1 to Declaration of Performance 30

Panel type	SP2B X-PIR ENERGY				
Reference to harmonized standard:	EN 14509:2013				
Intended use:	Internal or external walls				
Panel name:	SP2B 100 X-PIR ENERGY	SP2B 110 X-PIR ENERGY	SP2B 120 X-PIR ENERGY	SP2B 150 X-PIR ENERGY	Reference
Year when CE mark was affixed:	15	20	23	24	
Thickness of external facing:	0,5 - 0,6				mm (EN 10143)
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095 S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)
External facing profile:	L25, L, M, F, R28, R275, R550				
Thickness of internal facing:	0,4* - 0,6				mm (EN 10143)
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095 S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)
Internal facing profile:	L25, L, F				
Core material:	PIR				
Density of core material:	36				kg/m ³
Nominal panel thickness:	100	110	120	152.5	mm
Mass:	12.4	12.7	13.0	14.1	kg/m ²
Mechanical resistance:					
Tensile strength:	0.10	0.10	0.10	0.10	MPa
Shear strength:	0.09	0.09	0.09	0.09	MPa
Reduced long term shear strength:	0.036	0.036	0.036	0.036	MPa
Shear modulus (core):	3.00	3.00	3.00	2.65	MPa
Compressive strength (core):	0.09	0.09	0.09	0.10	MPa
Creep coefficient t=2000h:	NPD				
Creep coefficient t=100000h:	NPD				
Wrinkling strength (external face) at profiling L25:					
- in span	165	165	165	165	MPa
- in span, elevated temperature	150	150	150	150	MPa
- at internal support	115	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	103	MPa
Wrinkling strength (external face) at profiling L, M:					
- in span	145	145	145	140	MPa
- in span, elevated temperature	130	130	130	125	MPa
- at internal support	115	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	103	MPa
Wrinkling strength (external face) at profiling F, R28, R275, R550:					
- in span	90	90	90	90	MPa
- in span, elevated temperature	81	81	81	81	MPa
- at internal support	90	90	90	90	MPa
- at internal support, elevated temperature	81	81	81	81	MPa
Wrinkling strength (internal face) at profiling L25:					
- in span	165	165	165	165	MPa
- at internal support	115	115	115	115	MPa
Wrinkling strength (internal face) at profiling L:					
- in span	145	145	145	140	MPa
- at internal support	115	115	115	115	MPa
Wrinkling strength (internal face) at profiling F:					
- in span	90	90	90	90	MPa
- at internal support	90	90	90	90	MPa
Other properties:					
Thermal transmittance, U _{g,ext} :	0.22	0.20	0.18	0.14	W/m ² K
Thermal conductivity of the core, λ _{Declared} :	0.022				W/mK
Reaction to fire:	B-s1, d0				Class (EN 13501-1)
Fire resistance (wall, horizontal):	EI 15				Class (EN 13501-2)
Fire resistance (wall, vertical):	EI 15				Class (EN 13501-2)
External fire performance:	Not applicable				
Water permeability:	A				Class (EN 12865)
Air permeability, pressure (per 1m ²):	n = 0,4812, C = 0,000972				(EN 12114)
Air permeability, suction (per 1m ²):	n = 0,1976, C = 0,00261				(EN 12114)
Water vapour permeability:	Impermeable				
Airborne sound insulation, R _w (C; C ₂):	24 (-2; -4)				dB (EN ISO 717-1)
Sound absorption, α _w :	0.10				(EN ISO 11654)
Durability:	Pass - all colours				

* 0,4 mm facing is available only in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 2 to Declaration of Performance 30

Panel type	SP2B X-PIR B ENERGY				
Reference to harmonized standard:	EN 14509:2013				
Intended use:	Internal or external walls				
Panel name:	SP2B 100 X-PIR B ENERGY	SP2B 110 X-PIR B ENERGY	SP2B 120 X-PIR B ENERGY	SP2B 150 X-PIR B ENERGY	Reference
Year when CE mark was affixed:	19	20	23	24	
Thickness of external facing:	0,5 - 0,6				mm (EN 10143)
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095 S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)
External facing profile:	L25, L, M, R500, R250, R28, F				
Thickness of internal facing:	0,4* - 0,6				mm (EN 10143)
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095 S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)
Internal facing profile:	L25, L, F				
Core material:	PIR				
Density of core material:	36				kg/m ³
Nominal panel thickness:	100	110	120	152.5	mm
Mass:	12.4	12.7	13.1	14.1	kg/m ²
Mechanical resistance:					
Tensile strength:	0.10	0.10	0.10	0.10	MPa
Shear strength:	0.09	0.09	0.09	0.09	MPa
Reduced long term shear strength:	0.036	0.036	0.036	0.036	MPa
Shear modulus (core):	3.00	3.00	3.00	3.00	MPa
Compressive strength (core):	0.09	0.09	0.09	0.09	MPa
Creep coefficient t=2000h:	NPD				
Creep coefficient t=100000h:	NPD				
Wrinkling strength (external face) at profiling L25:					
- in span	165	165	165	165	MPa
- in span, elevated temperature	150	150	150	150	MPa
- at internal support	115	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	103	MPa
Wrinkling strength (external face) at profiling L, M:					
- in span	145	145	145	140	MPa
- in span, elevated temperature	130	130	130	125	MPa
- at internal support	115	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	103	MPa
Wrinkling strength (external face) at profiling R500, R250, R28, F:					
- in span	90	90	90	90	MPa
- in span, elevated temperature	81	81	81	81	MPa
- at internal support	90	90	90	90	MPa
- at internal support, elevated temperature	81	81	81	81	MPa
Wrinkling strength (internal face) at profiling L25:					
- in span	165	165	165	165	MPa
- at internal support	115	115	115	115	MPa
Wrinkling strength (internal face) at profiling L:					
- in span	145	145	145	140	MPa
- at internal support	115	115	115	115	MPa
Wrinkling strength (internal face) at profiling F:					
- in span	90	90	90	90	MPa
- at internal support	90	90	90	90	MPa
Other properties:					
Thermal transmittance, U _{g,ext} :	0.22	0.20	0.18	0.14	W/m ² K
Thermal conductivity of the core, λ _{Declared} :	0.022				W/mK
Reaction to fire:	B-s1, d0				Class (EN 13501-1)
Fire resistance (wall, horizontal):	EI 15				Class (EN 13501-2)
Fire resistance (wall, vertical):	EI 15				Class (EN 13501-2)
External fire performance:	Not applicable				
Water permeability:	A				Class (EN 12865)
Air permeability, pressure (per 1m ²):	n = 0,4812, C = 0,000972				(EN 12114)
Air permeability, suction (per 1m ²):	n = 0,1976, C = 0,00261				(EN 12114)
Water vapour permeability:	Impermeable				
Airborne sound insulation, R _w (C; C ₂):	24 (-2; -4)				dB (EN ISO 717-1)
Sound absorption, α _w :	0.10				(EN ISO 11654)
Durability:	Pass - all colours				

* 0,4 mm facing is available only in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 3 to Declaration of Performance 30

Panel type		SP2E X-PIR ENERGY						
Reference to harmonized standard:		EN 14509:2013						
Intended use:		Internal or external walls						
Panel name:	SP2E 120 X-PIR ENERGY	SP2E 140 X-PIR ENERGY	SP2E 160 X-PIR ENERGY	SP2E 180 X-PIR ENERGY	SP2E 200 X-PIR ENERGY	Reference		
Year when CE mark was affixed:	15							
Thickness of external facing:	0,5 - 0,6						mm	(EN 10143)
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095							(EN 10346)
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²							(EN 10169)
External facing profile:	L25, L, M, F, R28, R275, R550							
Thickness of internal facing:	0,4* - 0,6						mm	(EN 10143)
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095							(EN 10346)
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²							(EN 10169)
Internal facing profile:	L25, L, F							
Core material:	PIR							
Density of core material:	36	37			38			kg/m ³
Nominal panel thickness:	120	140	160	180	200		mm	
Mass:	13.1	13.9	14.6	15.4	16.2		kg/m ²	
Mechanical resistance:								
Tensile strength:	0.10	0.10	0.10	0.10	0.10		MPa	
Shear strength:	0.09	0.09	0.09	0.09	0.09		MPa	
Reduced long term shear strength:	0.036	0.036	0.036	0.036	0.036		MPa	
Shear modulus (core):	3.00	3.00	2.65	2.47	2.30		MPa	
Compressive strength (core):	0.09	0.10	0.10	0.10	0.10		MPa	
Creep coefficient t=2000h:								NPD
Creep coefficient t=100000h:								NPD
Wrinkling strength (external face) at profiling L25:								
- in span	165	165	165	165	165		MPa	
- in span, elevated temperature	150	150	150	150	150		MPa	
- at internal support	115	115	115	115	115		MPa	
- at internal support, elevated temperature	103	103	103	103	103		MPa	
Wrinkling strength (external face) at profiling L, M:								
- in span	145	145	135	130	130		MPa	
- in span, elevated temperature	130	130	120	115	115		MPa	
- at internal support	115	115	103	103	103		MPa	
- at internal support, elevated temperature	103	103	92	92	92		MPa	
Wrinkling strength (external face) at profiling F, R28, R275, R550:								
- in span	90	90	90	90	90		MPa	
- in span, elevated temperature	81	81	81	81	81		MPa	
- at internal support	90	90	90	90	90		MPa	
- at internal support, elevated temperature	81	81	81	81	81		MPa	
Wrinkling strength (internal face) at profiling L25:								
- in span	165	165	165	165	165		MPa	
- at internal support	115	115	115	115	115		MPa	
Wrinkling strength (internal face) at profiling L:								
- in span	145	145	135	130	130		MPa	
- at internal support	115	115	103	103	103		MPa	
Wrinkling strength (internal face) at profiling F:								
- in span	90	90	90	90	90		MPa	
- at internal support	90	90	90	90	90		MPa	
Other properties:								
Thermal transmittance, U _{g,ext} :	0.18	0.16	0.14	0.12	0.11		W/m ² K	
Thermal conductivity of the core, λ _{Declared} :	0.022							W/mK
Reaction to fire:	B-s1, d0							Class (EN 13501-1)
Fire resistance (wall, horizontal):	EI 30							Class (EN 13501-2)
Fire resistance (wall, vertical):	EI 30							Class (EN 13501-2)
External fire performance:	Not applicable							
Water permeability:	A							Class (EN 12865)
Air permeability, pressure (per 1m ²):	n = 1,1439, C = 0,000128							(EN 12114)
Air permeability, suction (per 1m ²):	n = 0,5712, C = 0,00775							(EN 12114)
Water vapour permeability:	Impermeable							
Airborne sound insulation, R _w (C; C ₂):	24 (-2; -4)							dB (EN ISO 717-1)
Sound absorption, α _w :	0.10							(EN ISO 11654)
Durability:	Pass - all colours							

* 0,4 mm facing is available for 120-160 mm thick panels in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 4 to Declaration of Performance 30

Panel type	SP2E X-PIR B ENERGY			
Reference to harmonized standard:	EN 14509:2013			
Intended use:	Internal or external walls			
Panel name:	SP2E 120 X-PIR B ENERGY	SP2E 140 X-PIR B ENERGY	SP2E 160 X-PIR B ENERGY	Reference
Year when CE mark was affixed:	19			
Thickness of external facing:	0,5 - 0,6			mm (EN 10143)
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095			(EN 10346)
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²			(EN 10169)
External facing profile:	L25, L, M, R500, R250, R28, F			
Thickness of internal facing:	0,4* - 0,6			mm (EN 10143)
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095			(EN 10346)
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²			(EN 10169)
Internal facing profile:	L25, L, F			
Core material:	PIR			
Density of core material:	36	37		kg/m ³
Nominal panel thickness:	120	140	160	mm
Mass:	13.2	14.0	14.7	kg/m ²
Mechanical resistance:				
Tensile strength:	0.10	0.10	0.10	MPa
Shear strength:	0.09	0.09	0.09	MPa
Reduced long term shear strength:	0.036	0.036	0.036	MPa
Shear modulus (core):	3.00	3.00	2.65	MPa
Compressive strength (core):	0.09	0.10	0.10	MPa
Creep coefficient t=2000h:	NPD			
Creep coefficient t=100000h:	NPD			
Wrinkling strength (external face) at profiling L25:				
- in span	165	165	165	MPa
- in span, elevated temperature	150	150	150	MPa
- at internal support	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	MPa
Wrinkling strength (external face) at profiling L, M:				
- in span	145	145	135	MPa
- in span, elevated temperature	130	130	120	MPa
- at internal support	115	115	103	MPa
- at internal support, elevated temperature	103	103	92	MPa
Wrinkling strength (external face) at profiling R500, R250, R28, F:				
- in span	90	90	90	MPa
- in span, elevated temperature	81	81	81	MPa
- at internal support	90	90	90	MPa
- at internal support, elevated temperature	81	81	81	MPa
Wrinkling strength (internal face) at profiling L25:				
- in span	165	165	165	MPa
- at internal support	115	115	115	MPa
Wrinkling strength (internal face) at profiling L:				
- in span	145	145	135	MPa
- at internal support	115	115	103	MPa
Wrinkling strength (internal face) at profiling F:				
- in span	90	90	90	MPa
- at internal support	90	90	90	MPa
Other properties:				
Thermal transmittance, U _{g,s} :	0.18	0.16	0.14	W/m ² K
Thermal conductivity of the core, λ _{Declared} :	0.022			W/mK
Reaction to fire:	B-s1, d0			Class (EN 13501-1)
Fire resistance (wall, horizontal):	EI 30			Class (EN 13501-2)
Fire resistance (wall, vertical):	EI 30			Class (EN 13501-2)
External fire performance:	Not applicable			
Water permeability:	A			Class (EN 12865)
Air permeability, pressure (per 1m ²):	n = 1,1439, C = 0,000128			(EN 12114)
Air permeability, suction (per 1m ²):	n = 0,5712, C = 0,00775			(EN 12114)
Water vapour permeability:	Impermeable			
Airborne sound insulation, R _w (C; C ₅₀):	24 (-2; -4)			dB (EN ISO 717-1)
Sound absorption, α _c :	0.10			(EN ISO 11654)
Durability:	Pass - all colours			

* 0,4 mm facing is available only in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 5 to Declaration of Performance 30

Panel type	SP2B X-PIR				
Reference to harmonized standard:	EN 14509:2013				
Intended use:	Internal or external walls, ceilings				
Panel name:	SP2B 100 X-PIR	SP2B 110 X-PIR	SP2B 120 X-PIR	SP2B 150 X-PIR	Reference
Year when CE mark was affixed:	15	20	23	24	
Thickness of external facing:	0,5 - 0,6				mm (EN 10143)
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)
External facing profile:	L25, L, M, F, R28, R275, R550				
Thickness of internal facing:	0,4* - 0,6				mm (EN 10143)
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)
Internal facing profile:	L25, L, F				
Core material:	PIR				
Density of core material:	36				kg/m ³
Nominal panel thickness:	100	110	120	152.5	mm
Mass:	12.4	12.7	13.0	14.1	kg/m ²
Mechanical resistance:					
Tensile strength:	0.10	0.10	0.10	0.10	MPa
Shear strength:	0.09	0.09	0.09	0.09	MPa
Reduced long term shear strength:	0.036	0.036	0.036	0.036	MPa
Shear modulus (core):	3.00	3.00	3.00	2.65	MPa
Compressive strength (core):	0.09	0.09	0.09	0.10	MPa
Creep coefficient t=2000h:	2.4	2.4	2.4	2.4	
Creep coefficient t=100000h:	7.0	7.0	7.0	7.0	
Wrinkling strength (external face) at profiling L25:					
- in span	165	165	165	165	MPa
- in span, elevated temperature	150	150	150	150	MPa
- at internal support	115	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	103	MPa
Wrinkling strength (external face) at profiling L, M:					
- in span	145	145	145	140	MPa
- in span, elevated temperature	130	130	130	125	MPa
- at internal support	115	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	103	MPa
Wrinkling strength (external face) at profiling F, R28, R275, R550:					
- in span	90	90	90	90	MPa
- in span, elevated temperature	81	81	81	81	MPa
- at internal support	90	90	90	90	MPa
- at internal support, elevated temperature	81	81	81	81	MPa
Wrinkling strength (internal face) at profiling L25:					
- in span	165	165	165	165	MPa
- at internal support	115	115	115	115	MPa
Wrinkling strength (internal face) at profiling L:					
- in span	145	145	145	140	MPa
- at internal support	115	115	115	115	MPa
Wrinkling strength (internal face) at profiling F:					
- in span	90	90	90	90	MPa
- at internal support	90	90	90	90	MPa
Resistance to repeated access load:	Passed				
Resistance to point load:	1.2 kN 5.0m		1.2 kN 6.0 m		
Other properties:					
Thermal transmittance, U _{g,s} :	0.22	0.20	0.18	0.14	W/m ² K
Thermal conductivity of the core, λ _{Declared} :	0.022				W/mK
Reaction to fire:	B-s1, d0				Class (EN 13501-1)
Fire resistance (wall, horizontal):	EI 15				Class (EN 13501-2)
Fire resistance (wall, vertical):	EI 15				Class (EN 13501-2)
Fire resistance (ceiling):	NPD				
External fire performance:	Not applicable				
Water permeability:	A				Class (EN 12865)
Air permeability, pressure (per 1m ²), panels with gasket:	n = 0,4812, C = 0,000972				(EN 12114)
Air permeability, suction (per 1m ²), panels with gasket:	n = 0,1976, C = 0,00261				(EN 12114)
Air permeability, panels without gasket:	NPD				
Water vapour permeability:	Impermeable				
Airborne sound insulation, R _w (C; C ₂):	24 (-2; -4)				dB (EN ISO 717-1)
Sound absorption, α _w :	0.10				(EN ISO 11654)
Durability:	Pass - all colours				

* 0,4 mm facing is available only in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 6 to Declaration of Performance 30

Panel type		SP2B X-PIR B				
Reference to harmonized standard:	EN 14509:2013					
Intended use:	Internal or external walls, ceilings					
Panel name:	SP2B 100 X-PIR B	SP2B 110 X-PIR B	SP2B 120 X-PIR B	SP2B 150 X-PIR B	Reference	
Year when CE mark was affixed:	19	20	23	24		
Thickness of external facing:	0,5 - 0,6				mm (EN 10143)	
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)	
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)	
External facing profile:	L25, L, M R500, R250, R28, F					
Thickness of internal facing:	0,4* - 0,6				mm (EN 10143)	
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095				(EN 10346)	
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²				(EN 10169)	
Internal facing profile:	L25, L, F					
Core material:	PIR					
Density of core material:	36				kg/m ³	
Nominal panel thickness:	100	110	120	152.5	mm	
Mass:	12.4	12.7	13.1	14.1	kg/m ²	
Mechanical resistance:						
Tensile strength:	0.10	0.10	0.10	0.10	MPa	
Shear strength:	0.09	0.09	0.09	0.09	MPa	
Reduced long term shear strength:	0.036	0.036	0.036	0.036	MPa	
Shear modulus (core):	3.00	3.00	3.00	3.00	MPa	
Compressive strength (core):	0.09	0.09	0.09	0.09	MPa	
Creep coefficient t=2000h:	2.4	2.4	2.4	2.4		
Creep coefficient t=10000h:	7.0	7.0	7.0	7.0		
Wrinkling strength (external face) at profiling L25:						
- in span	165	165	165	165	MPa	
- in span, elevated temperature	150	150	150	150	MPa	
- at internal support	115	115	115	115	MPa	
- at internal support, elevated temperature	103	103	103	103	MPa	
Wrinkling strength (external face) at profiling L, M:						
- in span	145	145	145	140	MPa	
- in span, elevated temperature	130	130	130	125	MPa	
- at internal support	115	115	115	115	MPa	
- at internal support, elevated temperature	103	103	103	103	MPa	
Wrinkling strength (external face) at profiling R500, R250, R28, F:						
- in span	90	90	90	90	MPa	
- in span, elevated temperature	81	81	81	81	MPa	
- at internal support	90	90	90	90	MPa	
- at internal support, elevated temperature	81	81	81	81	MPa	
Wrinkling strength (internal face) at profiling L25:						
- in span	165	165	165	165	MPa	
- at internal support	115	115	115	115	MPa	
Wrinkling strength (internal face) at profiling L:						
- in span	145	145	145	140	MPa	
- at internal support	115	115	115	115	MPa	
Wrinkling strength (internal face) at profiling F:						
- in span	90	90	90	90	MPa	
- at internal support	90	90	90	90	MPa	
Resistance to repeated access load:	Passed					
Resistance to point load:	1.2 kN 5.0m		1.2 kN 6.0 m			
Other properties:						
Thermal transmittance, U _{0,2} :	0.22	0.20	0.18	0.14	W/m ² K	
Thermal conductivity of the core, λ _{Declared} :	0.022				W/mK	
Reaction to fire:	B-s1, d0				Class (EN 13501-1)	
Fire resistance (wall, horizontal):	EI 15				Class (EN 13501-2)	
Fire resistance (wall, vertical):	EI 15				Class (EN 13501-2)	
Fire resistance (ceiling):	NPD					
External fire performance:	Not applicable					
Water permeability:	A				Class (EN 12865)	
Air permeability, pressure (per 1m ²), panels with gasket:	n = 0,4812, C = 0,000972				(EN 12114)	
Air permeability, suction (per 1m ²), panels with gasket:	n = 0,1976, C = 0,00261				(EN 12114)	
Air permeability, panels without gasket:	NPD					
Water vapour permeability:	Impermeable					
Airborne sound insulation, R _w (C; C ₂):	24 (-2; -4)				dB (EN ISO 717-1)	
Sound absorption, α _w :	0.10				(EN ISO 11654)	
Durability:	Pass - all colours					

* 0,4 mm facing is available only in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 7 to Declaration of Performance 30

Panel type	SP2E X-PIR						
Reference to harmonized standard:	EN 14509:2013						
Intended use:	Internal or external walls, ceilings						
Panel name:	SP2E 120 X-PIR	SP2E 140 X-PIR	SP2E 160 X-PIR	SP2E 180 X-PIR	SP2E 200 X-PIR	Reference	
Year when CE mark was affixed:	15						
Thickness of external facing:	0,5 - 0,6					mm	(EN 10143)
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095						(EN 10346)
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²						
External facing profile:	L25, L, M, F, R28, R275, R550						
Thickness of internal facing:	0,4* - 0,6					mm	(EN 10143)
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095, S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095						(EN 10346)
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²						
Internal facing profile:	L25, L, F						
Core material:	PIR						
Density of core material:	36	37		38		kg/m ³	
Nominal panel thickness:	120	140	160	180	200	mm	
Mass:	13.1	13.9	14.6	15.4	16.2	kg/m ²	
Mechanical resistance:							
Tensile strength:	0.10	0.10	0.10	0.10	0.10	MPa	
Shear strength:	0.09	0.09	0.09	0.09	0.09	MPa	
Reduced long term shear strength:	0.036	0.036	0.036	0.036	0.036	MPa	
Shear modulus (core):	3.00	3.00	2.65	2.47	2.30	MPa	
Compressive strength (core):	0.09	0.10	0.10	0.10	0.10	MPa	
Creep coefficient t=2000h:	2.4	2.4	2.4	2.4	2.4		
Creep coefficient t=100000h:	7.0	7.0	7.0	7.0	7.0		
Wrinkling strength (external face) at profiling L25:							
- in span	165	165	165	165	165	MPa	
- in span, elevated temperature	150	150	150	150	150	MPa	
- at internal support	115	115	115	115	115	MPa	
- at internal support, elevated temperature	103	103	103	103	103	MPa	
Wrinkling strength (external face) at profiling L, M:							
- in span	145	145	135	130	130	MPa	
- in span, elevated temperature	130	130	120	115	115	MPa	
- at internal support	115	115	103	103	103	MPa	
- at internal support, elevated temperature	103	103	92	92	92	MPa	
Wrinkling strength (external face) at profiling F, R28, R275, R550:							
- in span	90	90	90	90	90	MPa	
- in span, elevated temperature	81	81	81	81	81	MPa	
- at internal support	90	90	90	90	90	MPa	
- at internal support, elevated temperature	81	81	81	81	81	MPa	
Wrinkling strength (internal face) at profiling L25:							
- in span	165	165	165	165	165	MPa	
- at internal support	115	115	115	115	115	MPa	
Wrinkling strength (internal face) at profiling L:							
- in span	145	145	135	130	130	MPa	
- at internal support	115	115	103	103	103	MPa	
Wrinkling strength (internal face) at profiling F:							
- in span	90	90	90	90	90	MPa	
- at internal support	90	90	90	90	90	MPa	
Resistance to repeated access load:	Passed						
Resistance to point load:	1.2 kN 6.0 m						
Other properties:							
Thermal transmittance, U _{ds} *:	0.18	0.16	0.14	0.12	0.11	W/m ² K	
Thermal conductivity of the core, λ _{Declared} :	0.022						
Reaction to fire:	B-s1, d0					Class	(EN 13501-1)
Fire resistance (wall, horizontal):	EI 30					Class	(EN 13501-2)
Fire resistance (wall, vertical):	EI 30					Class	(EN 13501-2)
Fire resistance (ceiling):	EI 30					Class	(EN 13501-2)
External fire performance:	Not applicable						
Water permeability:	A						
Air permeability, pressure (per 1m ²), panels with gasket:	n = 1,1439, C = 0,000128						
Air permeability, suction (per 1m ²), panels with gasket:	n = 0,5712, C = 0,00775						
Air permeability, panels without gasket:	NPD						
Water vapour permeability:	Impermeable						
Airborne sound insulation, R _w (C; C _w):	24 (-2; -4)					dB	(EN ISO 717-1)
Sound absorption, α _w :	0.10						
Durability:	Pass - all colours						

* 0,4 mm facing is available for 120-160 mm thick panels in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.

Attachment 8 to Declaration of Performance 30

Panel type	SP2E X-PIR B			
Reference to harmonized standard:	EN 14509:2013			
Intended use:	Internal or external walls, ceilings			
Panel name:	SP2E 120 X-PIR B	SP2E 140 X-PIR B	SP2E 160 X-PIR B	Reference
Year when CE mark was affixed:	19			
Thickness of external facing:	0,5 - 0,6			
External facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095 S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095			
Coating of external facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²			
External facing profile:	L25, L, M, R500, R250, R28, F			
Thickness of internal facing:	0,4* - 0,6			
Internal facing - steel grade:	S280GD+Z275, S280GD+Z190, S280GD+ZA255, S280GD+Z100, S280GD+ZM140, S280GD+ZM120, S280GD+ZM100, S280GD+ZA095 S250GD+Z275, S250GD+Z190, S250GD+ZA255, S250GD+Z100, S250GD+ZM140, S250GD+ZM120, S250GD+ZM100, S250GD+ZA095			
Coating of internal facing:	Polyester, GreenCoat Hiarc max, GreenCoat Pural BT Satin, GreenCoat Pural BT Metallic or other colour coating with PCS ≤ 4,0 MJ/m ²			
Internal facing profile:	L25, L, F			
Core material:	PIR			
Density of core material:	36	37		kg/m ³
Nominal panel thickness:	120	140	160	mm
Mass:	13.2	14.0	14.7	kg/m ²
Mechanical resistance:				
Tensile strength:	0.10	0.10	0.10	MPa
Shear strength:	0.09	0.09	0.09	MPa
Reduced long term shear strength:	0.036	0.036	0.036	MPa
Shear modulus (core):	3.00	3.00	2.65	MPa
Compressive strength (core):	0.09	0.10	0.10	MPa
Creep coefficient t=2000h:	2.4	2.4	2.4	
Creep coefficient t=100000h:	7.0	7.0	7.0	
Wrinkling strength (external face) at profiling L25:				
- in span	165	165	165	MPa
- in span, elevated temperature	150	150	150	MPa
- at internal support	115	115	115	MPa
- at internal support, elevated temperature	103	103	103	MPa
Wrinkling strength (external face) at profiling L, M:				
- in span	145	145	135	MPa
- in span, elevated temperature	130	130	120	MPa
- at internal support	115	115	103	MPa
- at internal support, elevated temperature	103	103	92	MPa
Wrinkling strength (external face) at profiling R500, R250, R28, F:				
- in span	90	90	90	MPa
- in span, elevated temperature	81	81	81	MPa
- at internal support	90	90	90	MPa
- at internal support, elevated temperature	81	81	81	MPa
Wrinkling strength (internal face) at profiling L25:				
- in span	165	165	165	MPa
- at internal support	115	115	115	MPa
Wrinkling strength (internal face) at profiling L:				
- in span	145	145	135	MPa
- at internal support	115	115	103	MPa
Wrinkling strength (internal face) at profiling F:				
- in span	90	90	90	MPa
- at internal support	90	90	90	MPa
Resistance to repeated access load:	Passed			
Resistance to point load:	1.2 kN 6.0 m			
Other properties:				
Thermal transmittance, U _{ds} ⁽¹⁾:	0.18	0.16	0.14	W/m ² K
Thermal conductivity of the core, λ _{Declared} ⁽²⁾:	0.022			W/mK
Reaction to fire:	B-s1, d0			Class (EN 13501-1)
Fire resistance (wall, horizontal):	EI 30			Class (EN 13501-2)
Fire resistance (wall, vertical):	EI 30			Class (EN 13501-2)
Fire resistance (ceiling):	EI 30			Class (EN 13501-2)
External fire performance:	Not applicable			
Water permeability:	A			Class (EN 12865)
Air permeability, pressure (per 1m ²), panels with gasket:	n = 1,1439, C = 0,000128			(EN 12114)
Air permeability, suction (per 1m ²), panels with gasket:	n = 0,5712, C = 0,00775			(EN 12114)
Air permeability, panels without gasket:	NPD			
Water vapour permeability:	Impermeable			
Airborne sound insulation, R _w (C; C _v):	24 (-2; -4)			dB (EN ISO 717-1)
Sound absorption, α _w ⁽³⁾:	0.10			
Durability:	Pass - all colours			

* 0,4 mm facing is available only in L or L25 profiling

Detailed product/material specification is given on order confirmation or delivery documentation.