

# TZ-32

# FACADE PROFILED STEEL SHEETING





- High quality, cold-formed trapezoidal profiled steel sheeting, made of certified structural steel.
- Metal facade cladding for industrial, commercial and sports facilities buildings.
- CE marked product according to EN 14782 and EN 1090 standards.
- Useful width with overlap of 1.05 m and manufacturing lenghts up to 14.9m.
- Spans up to 3.0m and loads up to 826 daN/m² in single span.







# TZ-32 Facade profiled steel sheeting

#### **DESCRIPTION AND APPLICATIONS**

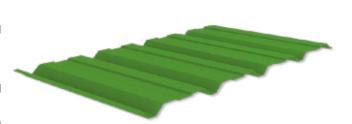
High-quality cold-formed trapezoidal steel profiled sheeting.

Manufacturing allowance for curved solutions.

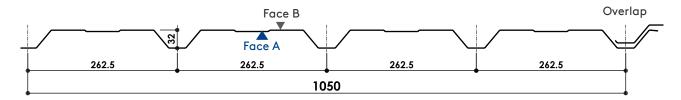
Suitable for acoustic control systems, with several possibilities of perforation patterns.

Metallic facade enclosures for industrial, commercial and sports facilities buildings.

Depending on the configuration, spans beween supports up to 3.0 m and loads up to 826  $daN/m^2$  can be attained in single span.



#### **PRODUCT DATA**



Useful width		1,050 mm					
Maximum manufacturing lenght		14.9 m ( >13.5 m requires special transport)					
Steel grade		Standard S220GD (other steel grades available on demand)					
Thicknesses		0.5 / 0.6 / 0.7 / 0.8 / 1.0 mm					
Coatings	Standard	Galvanised Z275 Galvanised & 25 microns lacquered in silicone polyester					
	Special	HD, HDS, HDX, PVDF, PET					

#### **Steel sheet Certifications**

Steel sheet to EN 10346 (galvanised) and to EN 10169 (organic coatings).

#### TZ-32 Profiled sheet Certifications

CE marking according to EN 14782:2006 and EN 1090-1:2009+A1:2011 standards.





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#### PROFILED SHEET TECHNICAL DATA

THICKNESS	SELF WI	EIGHT	SECOND MOMENT OF AREA	RESISTANT MODULUS	BENDING MOMENT		
(mm)	(kg/ml)	(kg/m²)	I (cm⁴/m)	Wmin (cm³/m)	Mf (kgf·m)		
0.5	4.90	4.67	6.679	2.758	44.13		
0.6	5.88	5.60	8.206	3.403	54.45		
0.7	6.86	6.54	9.714	4.032	91.53		
0.8	7.85	7.47	11.263	4.669	105.99		
1.0	9.81	9.34	13.876	5.713	129.69		

#### MAXIMUM ALLOWABLE PRESSURE LOADS (daN/m²)

#### SPAN BETWEEN SUPPORTS (m)

		STATE DELIVERY SOLIT SICIO (III)								
th (mm)	SUPPORTS	1.00	1.25	1.50	1.75	2.00	2.25	2.50	2.75	3.00
0.5	$\sqrt{-\lambda}$	353	182	106	73	55	42	32	25	20
	$\Delta$ $\Delta$ $\Delta$	848	437	254	160	108	79	64	52	42
	$\Delta$ $\Delta$ $\Delta$ $\Delta$	667	344	200	126	85	68	54	43	35
	$\wedge$	443	228	133	89	67	51	39	30	24
0.6	$\Delta$ $\Delta$ $\Delta$	1063	548	318	201	135	97	78	63	51
	$\triangle$ $\triangle$ $\triangle$ $\triangle$	837	431	250	158	106	82	65	52	42
	$\sqrt{-\lambda}$	535	276	160	106	79	59	45	35	28
0.7	$\Delta$ $\Delta$ $\Delta$	1287	663	385	243	163	116	92	74	60
	$\Delta$ $\Delta$ $\Delta$	1013	521	303	191	128	98	77	61	49
	$\overline{\Lambda}$	631	325	189	123	91	68	52	40	32
0.8	$\triangle$ $\triangle$ $\triangle$	1516	781	453	286	192	135	107	86	69
		1193	614	357	225	151	113	89	70	56
1.0	$\wedge$	826	426	247	158	115	86	65	50	39
	ΔΔΔ	1985	1022	594	375	251	177	136	108	87
	$\Delta$ $\Delta$ $\Delta$	1562	805	467	295	198	145	112	88	70

NOTES:  $1 \text{ daN/m}^2 \approx 1 \text{ kp/m}^2$ 

- The values listed in the table are unfactored allowable loads, which should be compared with the sum of characteristic loads (without factoring) in each project.
- Tables calculated for a maximum deflection of L /200, where L is the span (distance between purlins).
- Tables valid for pre-design only. The designer must carry out the structural calculation according to the relevant standards in each country.
- For resistance verification according to EN 1993-1-3, or for other load cases, please contact our technical department. Kingspan | Teczone expressly declines any responsibility derived from the use of these tables.



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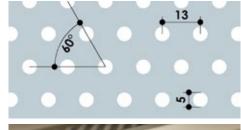
Steel cladding TZ



#### PERFORATIONS FOR ACOUSTIC CONTROL

**Uniform perforation**. For example type R5T13 pattern, with  $\varnothing$  5mm holes, 13mm between centres, staggered at 60°. Perforated area of 14% of total surface. Absortion coefficient  $\alpha_{\rm w}$  = 0.85 according to EN ISO 354:2004 for a in-situ sandwich system. Usual stock in 0.6mm White 1006. Request delivery term for other possibilities. Other types of uniform perforation are also available.

**TZ Pattern**. Perforated-ripped with a 36% area embedded in the profile lower flange. Represents a reduction of 7% of allowable loads with respect to the unperforated profile. Absortion coefficient  $\alpha_{_{\! \! W}}=0.50$  to EN ISO 354:2004 for in-situ sandwich system. Delivery time similar to that of the unperforated profile.





#### **AVAILABLE COATINGS**

Kingspan | Teczone has a wide range of high-performance, state-of-the-art coatings, selectable according to the type of installation environment, in order to guarantee the maximum durability of the TZ profiles:

	OUTDOOR ENVIRONMENT									INDOOR ENVIRONMENT			
	RURAL	URBAN / INDUSTRIAL		MARINE		RESISTANCE		NON-AGRESSIVE ENVIRONMENTS		AGGRESSIVE AND/OR	RESISTANCE		
	WITHOUT	Moderate	Severe	Between 3-20 km	< 3km <sup>(1)</sup>	Mixed	Outdoor Corrossion Category	UV	Low humidity	Medium humidity	VERY HUMID ENVIRON- MENTS	Indoor Corrosion Category	
Polyester 25µ	$\overline{\checkmark}$	V	!	!	×	×	į.	į	V	$\overline{\checkmark}$	Ai3 <sup>(2)</sup>	CPI3	
HDS 35μ	V	V	!	<b>V</b>	!	!	RC4	RUV4	V	$\checkmark$	Ai3	CPI4	
PVDF 35μ	<b>V</b>	<b>V</b>	i	<b>V</b>	ļ	!	RC4	RUV4	V	$\checkmark$	Ai3	CPI4	
HDX 55μ	V	V	V	V	V	!	RC5	RUV4	V	$\checkmark$	Ai3	CPI4	
PET 50μ	×	X	X	X	×	X	NA	NA	V	$\checkmark$	Ai5	CPI5	

- ✓ Suitable coating
- V Unsuitable coating
- NA Not applicable
- ! Check with Teczone

- (1) Please contact us for distances <300m.
- (2) Check conditions.

Not all coatings are available for all sheet thicknesses and colors.

Consult Teczone if you need any coating not included in the table.

#### **QUALITY AND SAFETY**

Both steel and its metallic or organic coatings are free from SVHC ("Substances of Very High Concern"), in accordance with the requirements of European regulation REACH.

Our Quality Management (ISO 9001), Environmental Management (ISO 14001) and Occupational Health and Safety (ISO 45001) systems are certified by AENOR and IQNet.

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