

CLINKER ROOF TILES



ABOUT US

We, the ABC Klinker Group, are a family-owned business in the brick and tile industry in Germany and can look back on around 130 years of experience. Today, our ABC Klinker Group is in the fifth generation and manufactures various brick products at six locations in Germany. Our product portfolio includes facing bricks, brick slips, ceramic facades, clay pavers, clinker roof tiles and floor ceramics.

SUSTAINABILITY

We produce sustainable natural building materials as environmentally friendly as possible. For this reason, we focus on low energy consumption in production with gentle, efficient use of resources and low material consumption.

The natural slate clay of the Tecklenburger Land forms the basic material of our ABC products - a valuable, genuine natural product!

VISIT OUR SHOWROOM „RINGOFEN“ IN HÖRSTEL

In our showroom, the Ringofen, Dornierstr. 11 in Hörstel, we offer you numerous suggestions and various possibilities for your house construction. For an individual consultation we are available Monday to Friday from 08.30 am to 05.30 pm and Saturday from 09.00 am to 01.00 pm. For an appointment, you can reach us by phone at +49 (0) 54 59 / 93 43 11 or by e-mail at ausstellung@abc-klinker.de.





Features of our products



Frost-resistant



Weatherproof



Environmentally friendly



Fire behavior: euroclass A1



Water absorption $\leq 3\%$



Standardized



Colourfast



Graffiti removable



Flat roof tile Modena 11



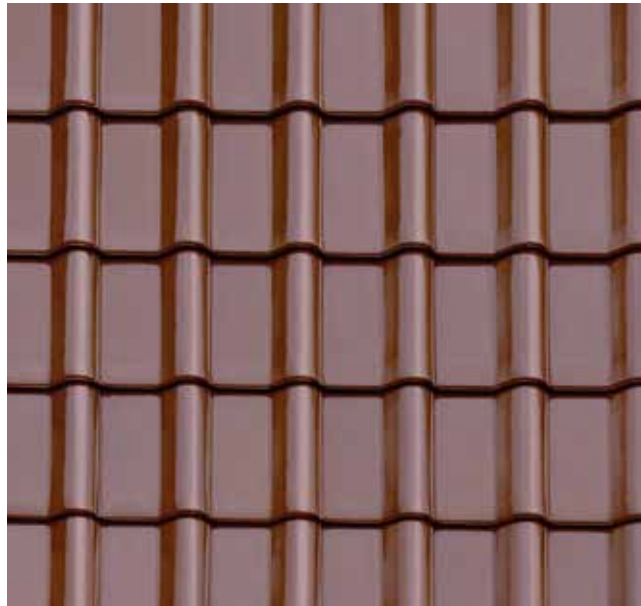
Copper-brown (Engobe)



Nut-brown (Engobe)



Nature-red



Amarena (Noble engobe)



Palisander-brown (Glaze)

Variations in colour, play of colours and proportions may be possible due to production/printing reasons.



Modena 11 Palisander-brown | Photo: Espendiller+Gnegel Designer

Flat roof tile Modena 11



Basalt-grey (Noble engobe)



Slate-black (Engobe)



Graphite-metallic (Noble engobe)



Diamant-black (Noble engobe)



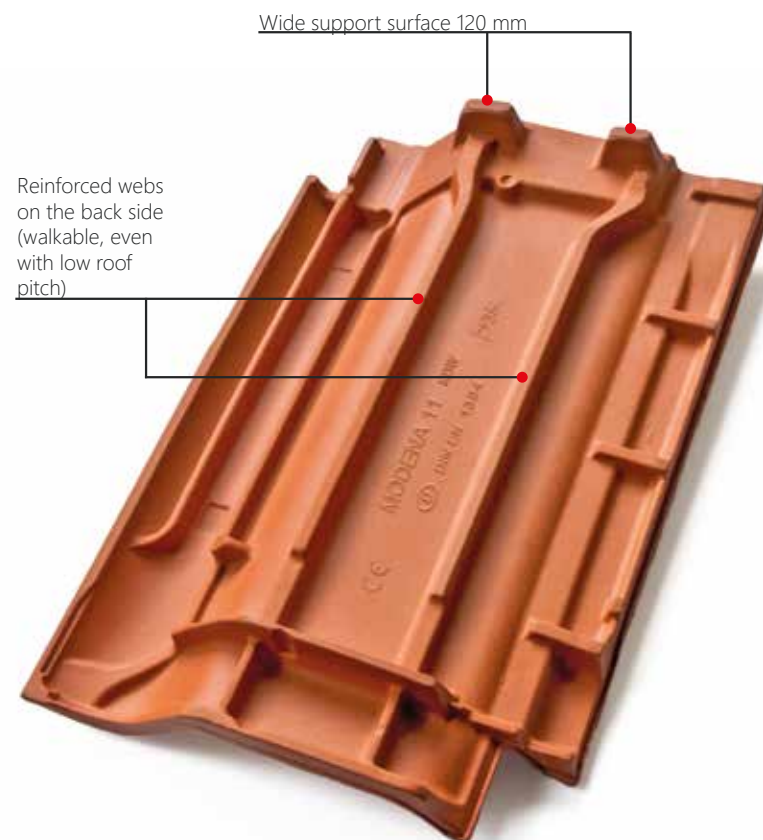
Brilliant-black (Glaze)

Variations in colour, play of colours and proportions may be possible due to production/printing reasons.



Modena 11 Slate-black | Photo: Esendiller+Gnegel Designer

Flat roof tile Modena 11



Gauge	34 - 36,5 cm
Recommended gauge	35,5 cm
Coverage width	23,2 - 23,8 cm
Recommended coverage width	23,5 cm

System dimensions verge tile left	14,5 cm
System dimensions verge tile right	17,5 cm
Requirement per m ²	11,4 - 12,3 units
Average requirement per m ²	approx. 11,5 units

Weight per unit	3,5 kg
Average standard weight	40,5 kg/m ²
Standard pitch	18°
Water absorption	≤ 3%

Advantages

Finest hard clinker quality

- slate clay - the best raw material

Adjustable gauge

- adjustable roof tile with batten spacing tolerance of 25 mm

Storm-proof

- every roof tile can have storm-proof fastening – easy, secure and cost-effective

Very economical

- with an average of only 11.5 roof tiles per m²

Harmonious roof appearance

- balanced roof appearance without disturbing joint lines

Fast and watertight

- easy, single-handed roofing installation
- waterproof 4-tile corner
- double head and side grooves
- rainfall resistance very good
- reinforced webs on the back side (walkable, even with low roof pitch)

Environmentally friendly

- no subsequent siliconisation

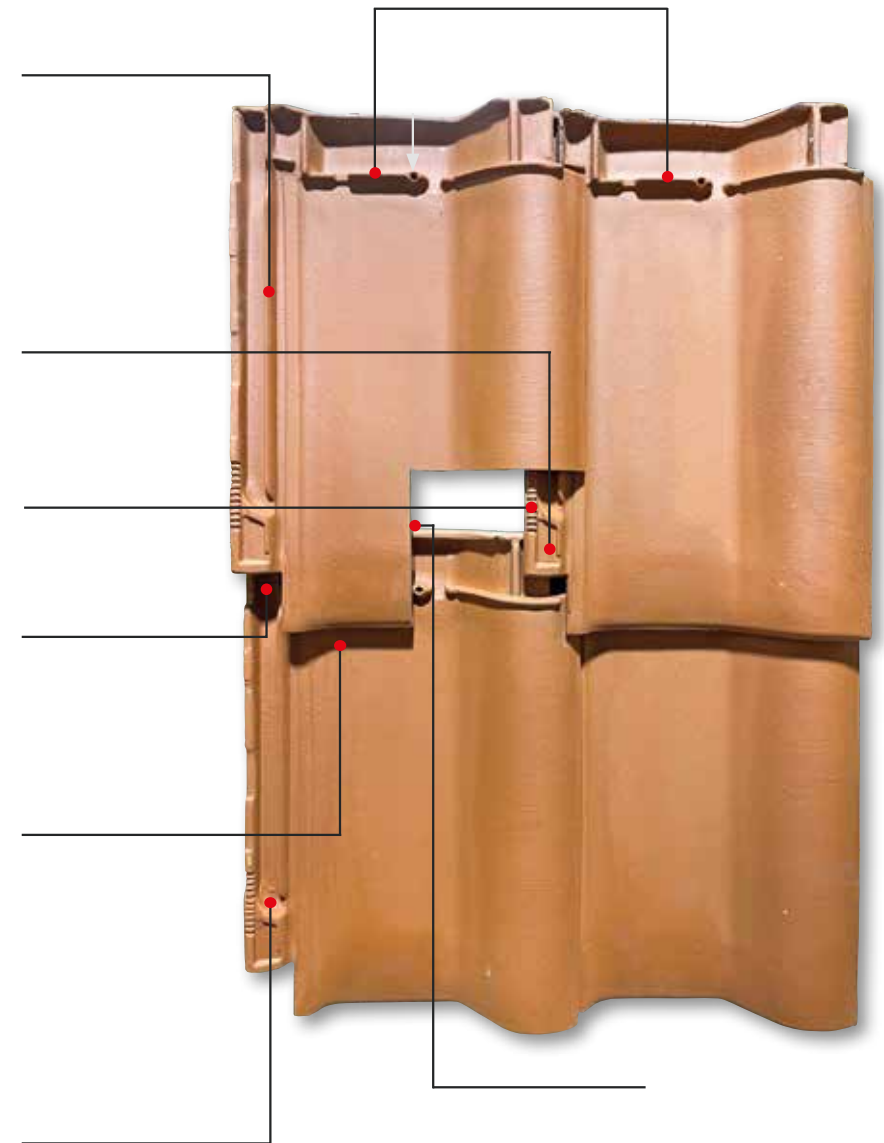
Low algae growth

- algae and moss like it damp - ABC clinker roof tiles with low water absorption of less than 3%

Low roof slope

- at roof slopes of 14° Modena 11 can be laid with a rainproof subroof

Technical Data



The tile dimensions must be checked in accordance with DIN 1304 and the roofing rules of the German Roofing Trade Association before roofing.

Großhohlfalzziegel TG10



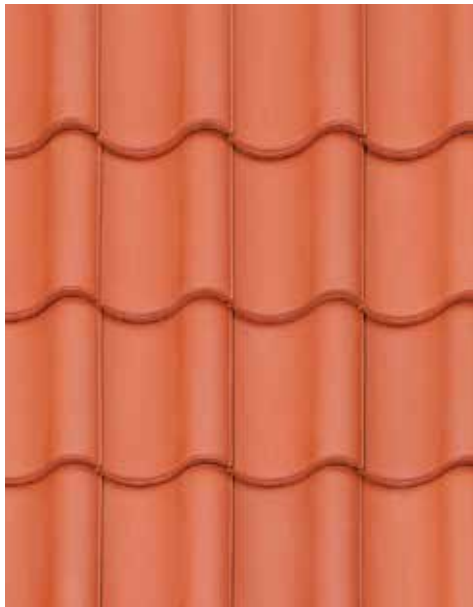
Slate-black (Engobe)



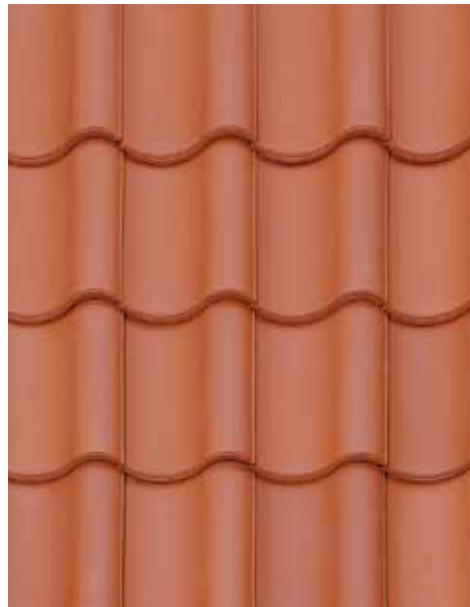
Diamant-black (Noble engobe)



Noble-black (Noble engobe)



Nature-red



Copper-brown (Engobe)



Amarena (Noble engobe)



Nut-brown (Engobe)

Variations in colour, play of colours and proportions may be possible due to production/printing reasons.



TG10 Slate-black

Großhohlfalzziegel TG10



Advantages

Finest hard clinker quality

- slate clay - the best raw material

Storm-proof

- every roof tile can have storm-proof fastening – easy, secure and cost-effective

Very economical

- with an average of only 10.5 roof tiles per m²

Harmonious roof appearance

- balanced roof appearance without disturbing joint lines

Fast and light

- easy, single-handed roofing installation
- uniquely low weight 3.8 kg/p. i. m.
- waterproof 4-tile corner
- double head and side grooves
- rainfall resistance very good
- reinforced webs on the back side (walkable, even with low roof pitch)

Environmentally friendly

- no subsequent siliconisation

Low algae growth

- algae and moss like it damp - ABC clinker roof tiles with low water absorption of less than 3%

Technical Data

Gauge	37,5 - 39 cm
Recommended gauge	38 cm
Coverage width	24,9 - 25,4 cm
Recommended coverage width	25,1 cm

System dimensions verge tile left	16 cm
System dimensions verge tile right	18 cm
Requirement per m ²	10,2 - 11 units
Average requirement per m ²	approx. 10,5 units

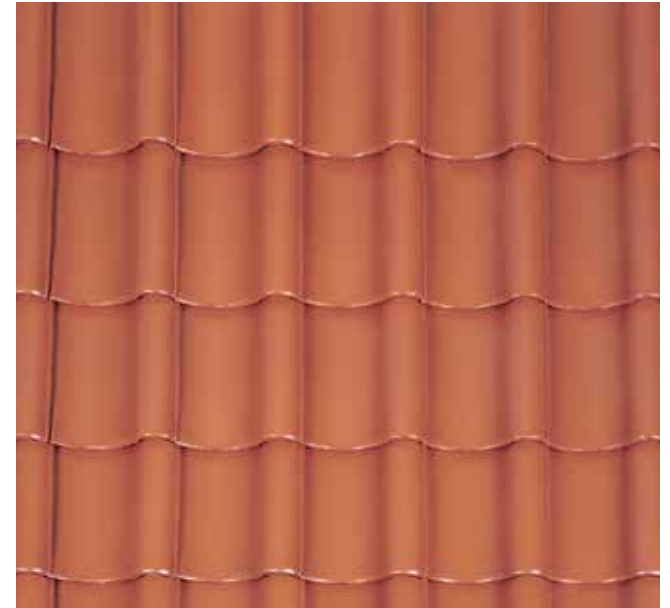
Weight per unit	3,8 kg
Average standard weight	39,9 kg/m ²
Standard pitch	22°
Water absorption	≤ 3%

The tile dimensions must be checked in accordance with DIN 1304 and the roofing rules of the German Roofing Trade Association before roofing.

Hohlfalzziegel



Nature-red



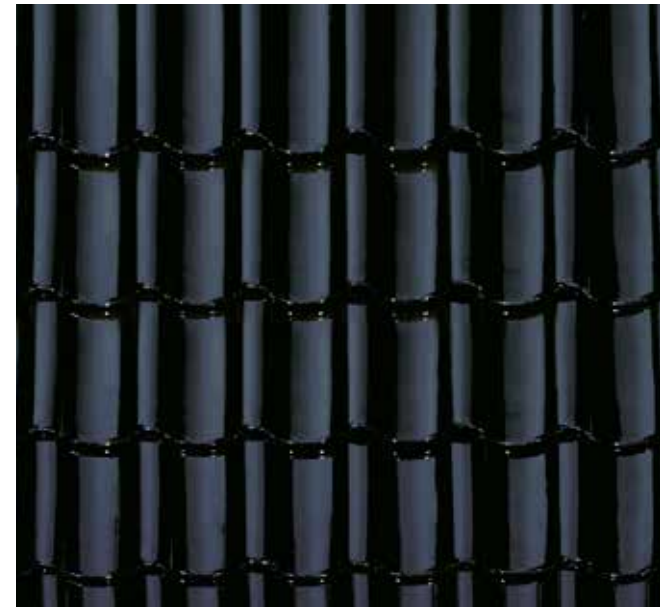
Copper-brown (Engobe)



Slate-black (Engobe)



Diamant-black (Noble engobe)

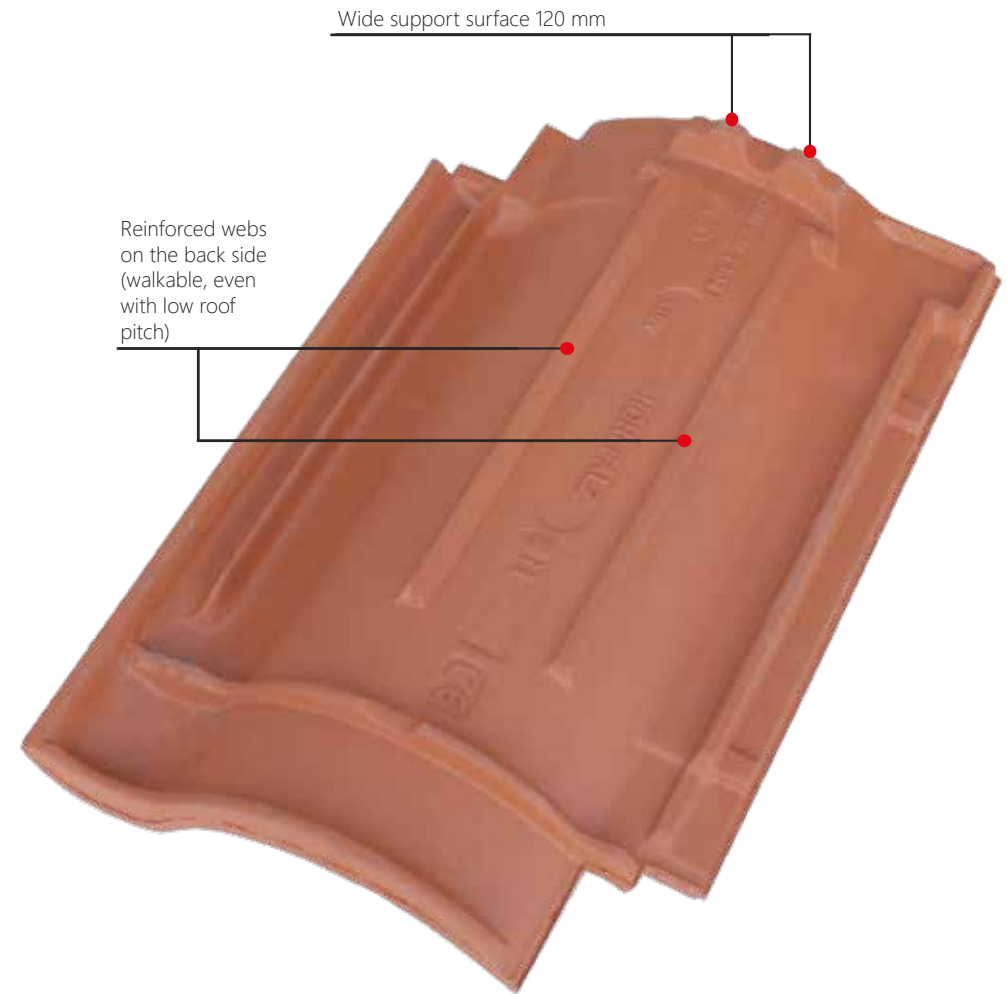
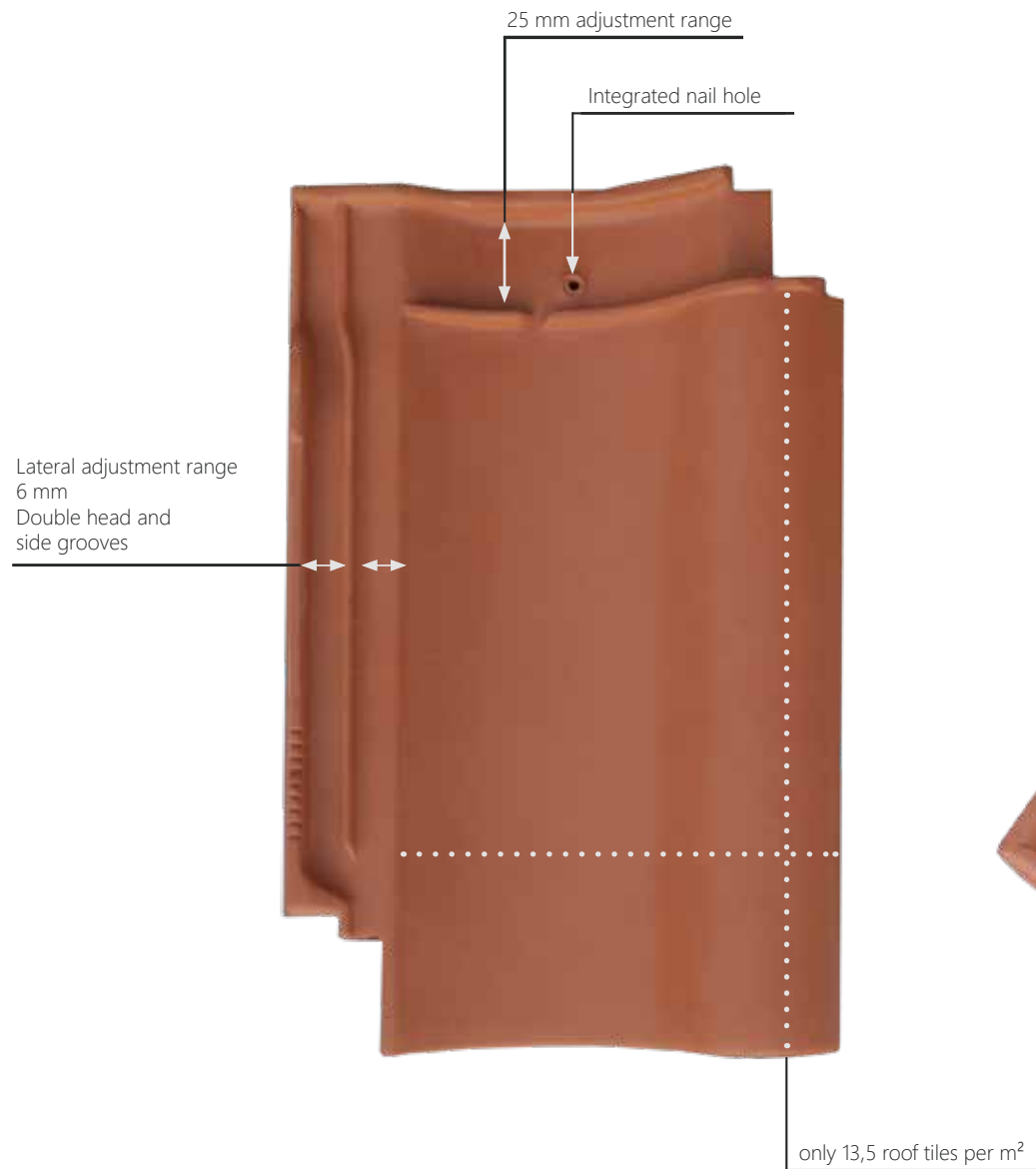


Brilliant-black (Glaze)

Variations in colour, play of colours and proportions may be possible due to production/printing reasons.



Hohlfalzziegel



Advantages

Finest hard clinker quality

- slate clay - the best raw material

Adjustable gauge

- adjustable roof tile with batten spacing tolerance of 25 mm

Storm-proof

- every roof tile can have storm-proof fastening – easy, secure and cost-effective

Very economical

- with an average of only 13.5 roof tiles per m²

Harmonious roof appearance

- balanced roof appearance without disturbing joint lines

Fast and watertight

- easy, single-handed roofing installation
- waterproof 4-tile corner
- double head and side grooves
- rainfall resistance very good
- reinforced webs on the back side (walkable, even with low roof pitch)

Environmentally friendly

- no subsequent siliconisation

Low algae growth

- algae and moss like it damp - ABC clinker roof tiles with low water absorption of less than 3%

Low roof slope

- at roof slopes of 14° Modena 11 can be laid with a rainproof subroof

Technical Data

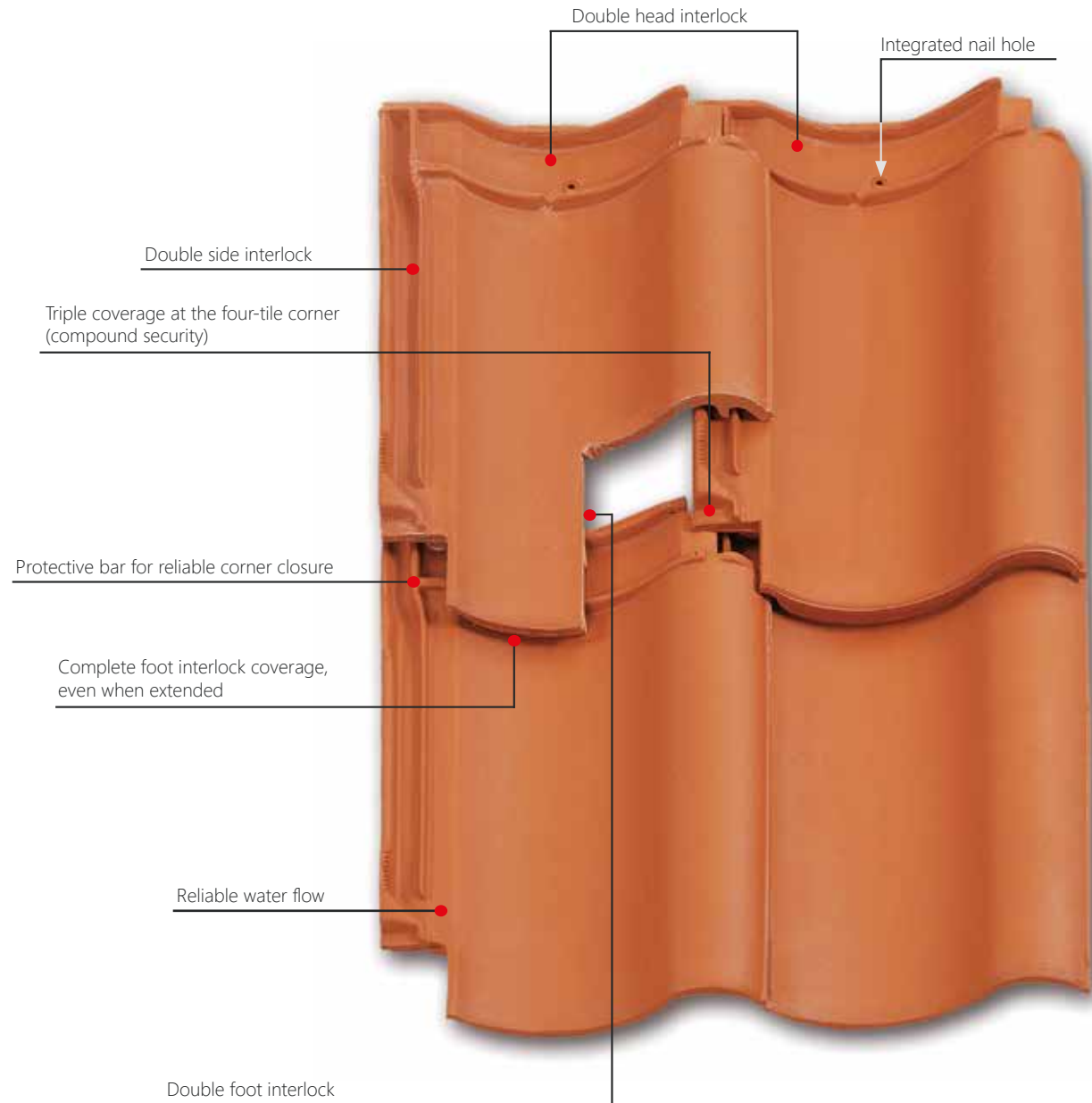
Gauge	32,5 - 35 cm
Recommended gauge	33,5 cm
Coverage width	22,1 - 22,7 cm
Recommended coverage width	22,4 cm

System dimensions verge tile left	13,5 cm
System dimensions verge tile right	17 cm
Requirement per m ²	12,5 - 13,8 units
Average requirement per m ²	approx. 13,5 units

Weight per unit	3,6 kg
Average standard weight	47,25 kg/m ²
Standard pitch	22°
Water absorption	≤ 3%

The tile dimensions must be checked in accordance with DIN 1304 and the roofing rules of the German Roofing Trade Association before roofing.

Special features Hohlfalzziegel



Straight cut

Field of application

- optimises and preserves valuable historic building substance
- corresponds to the shape and profile of historic roof tiles
- system advantages of today's roof tiles
- variable cover length and triple overlap with optimum bond security are compatible with renovation of old buildings

The straight cut provides the typical laying pattern of a historic roof

- a straight edge can be seen at the lower end
- the front sealing rib of the roof tiles is offset upwards on the underside
- the overlapping area of the roof tiles visually floats above the roof tile surface



Straight cut



The tile dimension must be checked in accordance with DIN 1304 and the roofing German Roofing Trade Association before roofing.

Quality of the clinker



Clinker roof tiles



Concrete roof tile

Advantages of clinker roof tiles

- clinker roof tiles offer protection against algae, moss and lichen
- long life
- very high material density
- colour fastness and colour stability
- low water absorption



Harzer Pfanne, Concrete roof tile



Clinker roof tiles

System components for roof tiles

					
Verge tile (right)	Verge tile (left)	Outer verge tile (right) TG10	Outer verge tile (left) TG10	Ventilation system (one piece)	Flue element/ base plate (100 + 125 mm ø) can be used as aerial tile in combination with rubber sleeve
					
Ridge ventilator end tile plus	Hip starter	Roof ventilator for Modena 11 and TG10	Double roll tile	Solar tile	Conical Hip cap
					
Hip cap	Hipp cap 4-core	Shed roof tile	Conical ridge	Conical Ridge starter tile	



Ridge ventilator
(semi-circle)



Ridge closure plate



Big ridge closure plate



Ridge ventilator
starter tile



Ridge ventilator
end tile



Ridge ventilator
starter tile plus



Wrasen ventilator
150 mm Ø



Tone exhaust pipe
with removable cover



Thermal passage
(150 mm Ø) for steep and flat roofs



Universal shed roof ridge



Starter plate for
shed roof ridge



End plate for
shed roof ridge



Conical Ridge
end tile



Conical Hip starter



Hohlfalz
Ridge connection tile



Modena Antenna tile
for steep and flat roofs



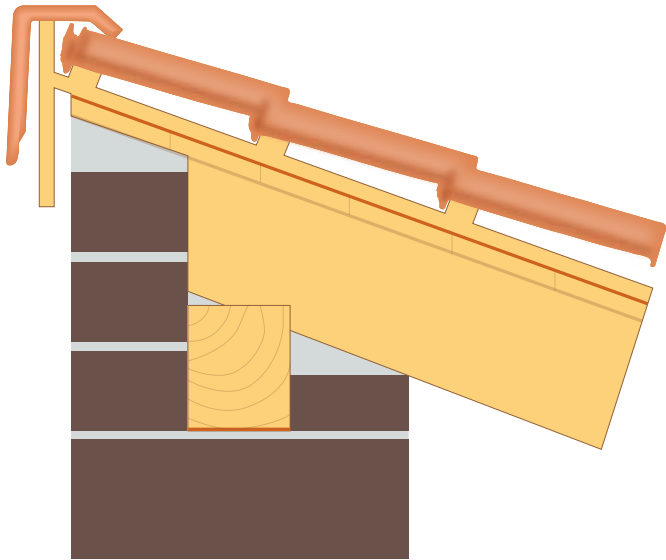
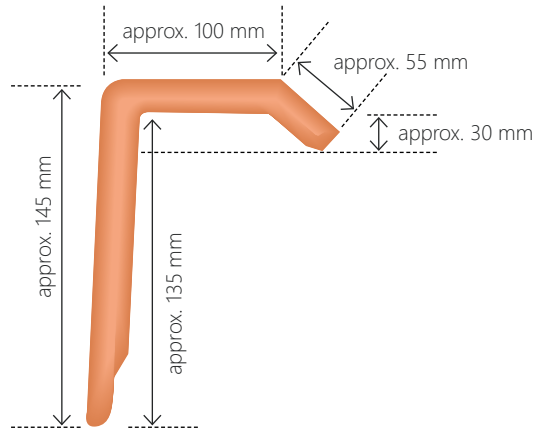
Modena
Articulated roof tile
positive



Modena
Articulated roof tile
negative

Universal shed roof ridge

Requirement: 3 units per linear metre



Additional measures¹

RDN 18°	RDN 22°	Additional requirements² use · construction · climate conditions			
Modena 11	Hohlfalz, TG10	no additional requirement²	one additional requirement²	two additional requirements²	three additional requirements²
≥ 18°	≥ 22°	class 6 sheathing	class 6 sheathing	class 5 overlapping/folded membrane	class 4 welded/blended membrane
≥ 16°	≥ 18°	class 4 welded/blended membrane	class 4 welded/blended membrane	class 3 seam and perforation secured membrane	class 3 seam and perforation secured membrane
≥ 14°	≥ 14°	class 3 seam and perforation secured membrane	class 3 seam and perforation secured membrane	class 3 seam and perforation secured membrane	class 2 rainproof sub-roof
≥ 10°	≥ 10°	class 2 rainproof sub-roof	class 2 rainproof sub-roof	class 1 waterproof sub-roof	class 1 waterproof sub-roof

¹ The additional measures listed in the table are minimum measures and refer to the regulations in Germany by the German Roofing Trade DDH.

² For particularly high requirements and / or special local regulations a higher-value additional measure is to choose.

(Instruction sheet for sub-roofs, sub-coverings, sub-spanings, Table 1, DDH trade rules).

Generally higher-value additional measures can also be used instead of the minimum measures.

The minimum roof slope under rules of the Central Association of the German Roofing Trade ZVDH for roof tiles is 10 degrees.

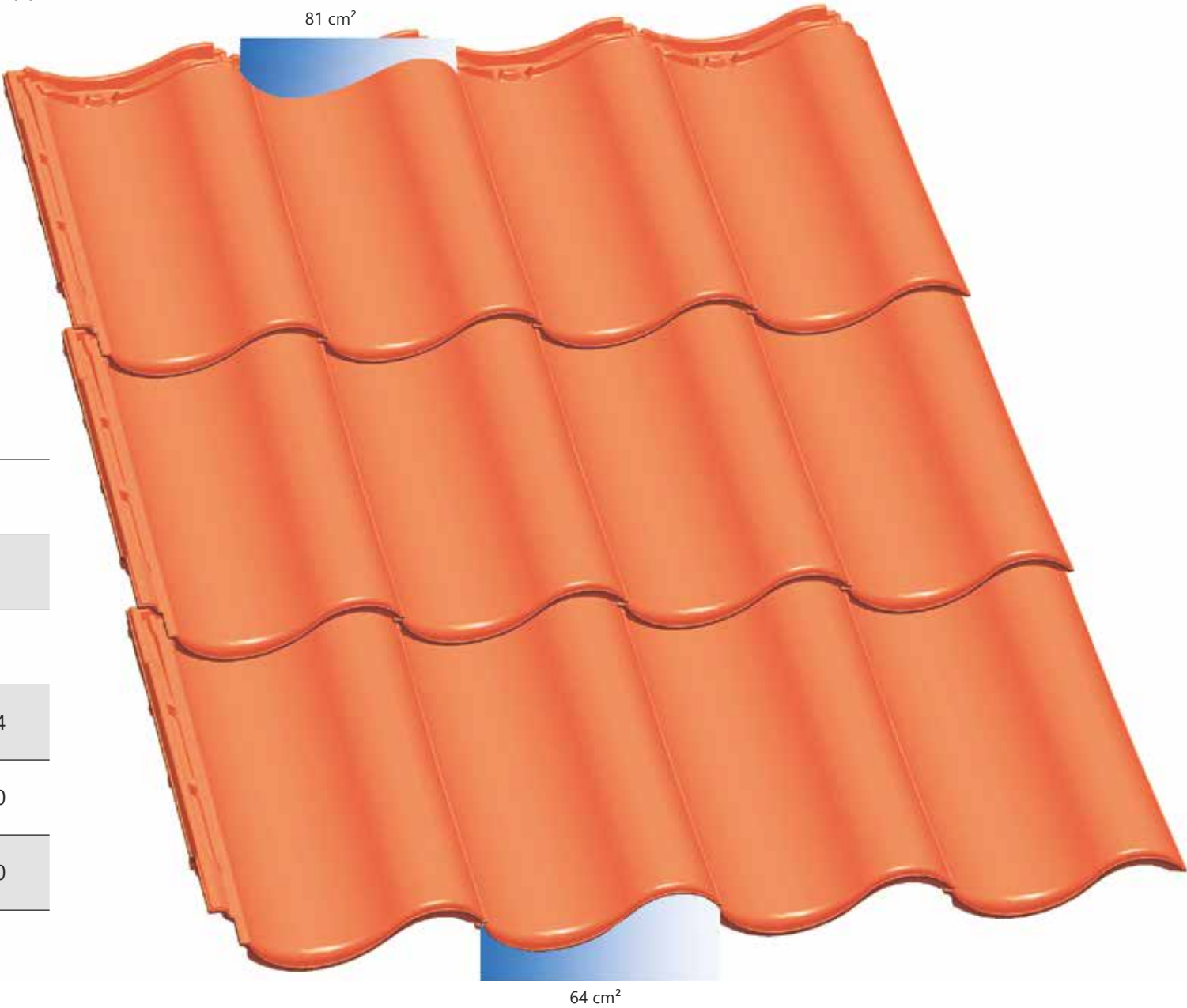
Eave and ridge ventilation

Ventilation system

Our roof tile models have the following minimum ventilation cross sections per meter of eaves and ridge.

Ventilation cross-section in cm²

	per tile		per metre	
	Eave	Ridge	Eave	
TG10	64	81	256	324
Hohlfalz	46	59	202	260
Modena 11	46	59	202	260



Wind zones and clips

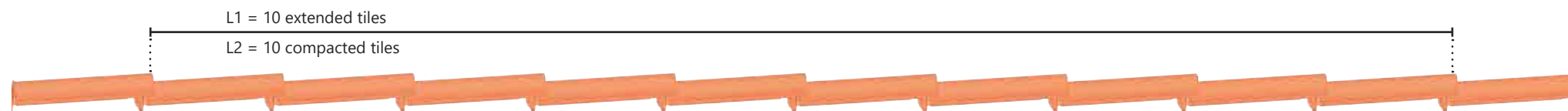
For proper clipping of roof tiles, please check the roof installation in accordance with the trade rules of the German Roofing Trade Association.

An uplift calculation can be obtained at: www.fos.de

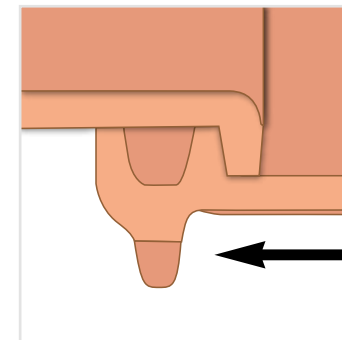
The average gauge

The average gauge/batten distance is determined from the average of a lengthwise row of 12 tiles. The dimension must be measured at the suspension lugs. (see sketch).

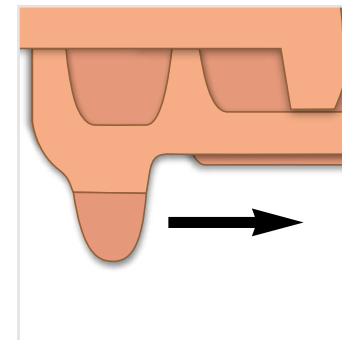
$$\text{Formula: Average gauge} = \frac{L1 + L2}{10 \times 2}$$



Extended L1



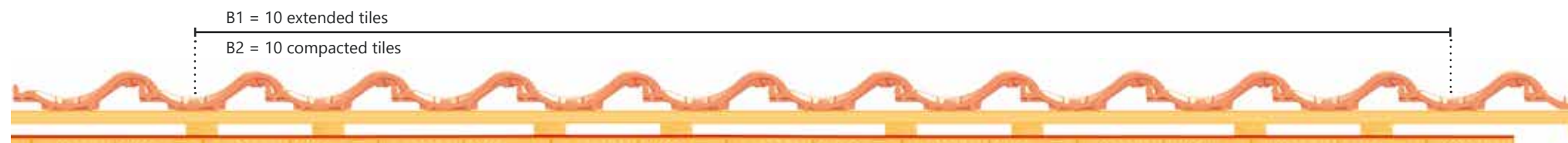
Compacted L2



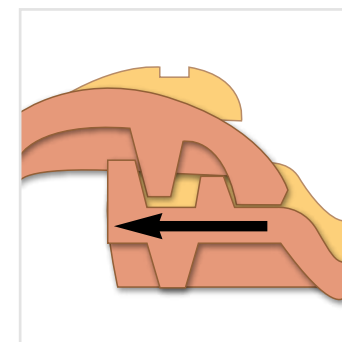
The average coverage with

The average coverage width is determined from the average of a transverse row of 12 tiles. In the process, the tiles are laid on their backs on battens (see sketch).

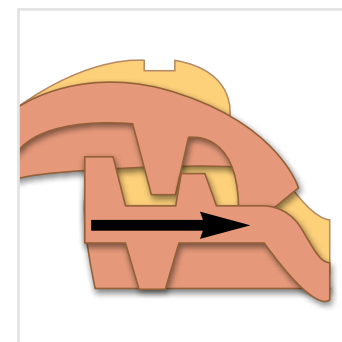
$$\text{Formula: Average coverage with} = \frac{B1 + B2}{10 \times 2}$$



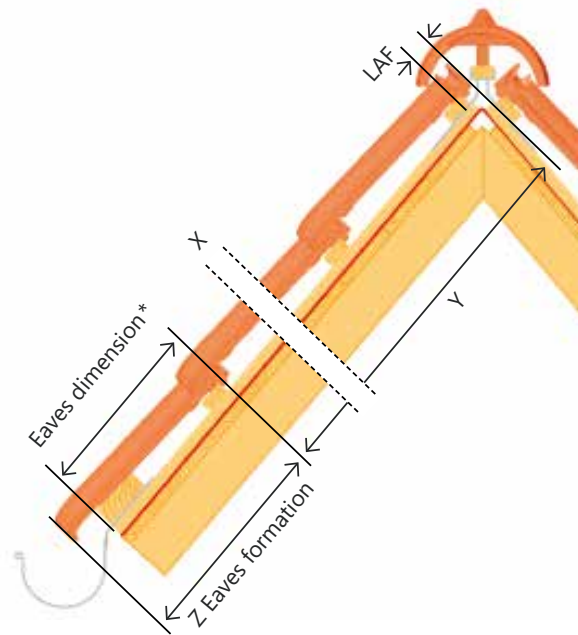
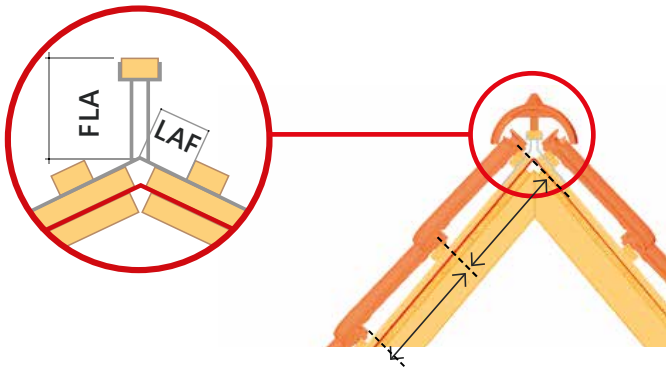
Extended B1



Compacted B2



Measures on the roof



LAF = batten distance from ridge intersection

FLA = ridge batten distance from ridge intersection

Exact dimensions based on the tiles must be determined on site!

Roof length

The following values are required to divide up the roof length:

X = leading eaves edge to ridge apex

Y = length of roof to be divided

Formula: $Y = X - \text{Taufmaß} - \text{LAF}$

The eaves dimension should be calculated on site based on the construction!

Eaves

Z = TG10 · 415 mm

Z = Holzfalzziegel · 400 mm

Z = Modena 11 · 410 mm

Dry ridge tile installation

TG10

	3 x 5 Latte				4 x 6 Latte			
	Ridge ventilator		Conical ridge		Ridge ventilator		Conical ridge	
DN	LAF	FLA	LAF	FLA	LAF	FLA	LAF	FLA
20°	30	125	30	125	30	125	30	135
25°	30	125	30	125	30	125	30	135
30°	30	120	30	125	30	120	30	130
35°	30	120	30	125	30	120	30	125
40°	30	110	30	120	25	120	25	120
45°	30	105	30	115	15	110	15	110
50°	25	105	30	115	15	110	15	110
60°	10	95	10	95	10	95	10	95

Modena

	3 x 5 Latte				4 x 6 Latte			
	Ridge ventilator		Conical ridge		Ridge ventilator		Conical ridge	
DN	LAF	FLA	LAF	FLA	LAF	FLA	LAF	FLA
20°	30	125	30	125	30	125	30	135
25°	30	125	30	125	30	125	30	135
30°	30	120	30	125	30	120	30	130
35°	30	120	30	125	30	120	30	125
40°	30	110	30	120	25	120	25	120
45°	30	105	30	115	15	110	15	110
50°	25	105	30	115	15	110	15	110
60°	10	95	10	95	10	95	10	95

HF

	3 x 5 Latte				4 x 6 Latte			
	Ridge ventilator		Conical ridge		Ridge ventilator		Conical ridge	
DN	LAF	FLA	LAF	FLA	LAF	FLA	LAF	FLA
20°	30	125	30	125	30	125	30	135
25°	30	125	30	125	30	125	30	135
30°	30	120	30	125	30	120	30	130
35°	30	120	30	125	30	120	30	125
40°	30	110	30	120	25	120	25	120
45°	30	105	30	115	15	110	15	110
50°	25	105	30	115	15	110	15	110
60°	10	95	10	95	10	95	10	95

Roof width

The following values are required to divide up the roof length:

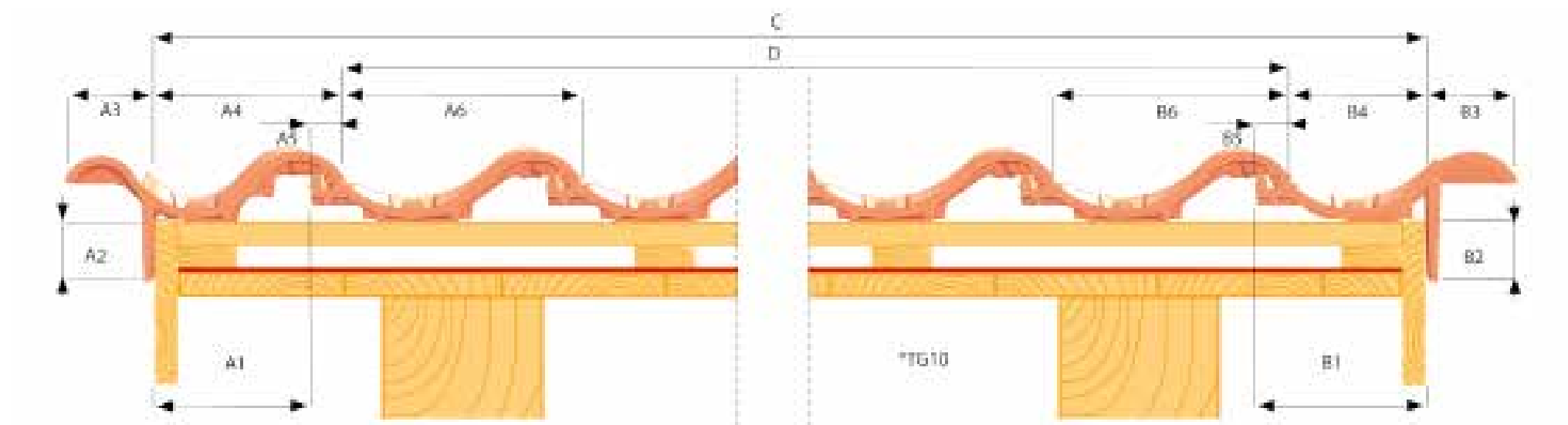
A1 = left-hand verge offset

B1 = right-hand verge offset

C = roof width

D = roof width to be divided

Formula: $D = C - A1 - B1$



Measures of the sketch in mm

	A1	A2	A3	A4	A5	A6	B1	B2	B3	B4	B5	B6
TG10	160	60	105	195	40	251	180	60	105	140	40	251
Hohlfalz	135	60	110	190	50	224	170	60	110	120	50	224
Modena 11	145	55	100	185	45	235	175	55	100	130	45	235

Our product range



Facing bricks



Brick slips



ABC-NORDIC®



Clay pavers



Clinker roof tiles



Floor ceramics





Headquarter

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