

## Construction panels

**TIMBER FRAME HOUSES**

CEWOOD Cemented Wood Wool Panels are EU made, natural, environment and health-friendly material. The panels are produced of smoothest wood wool, bonded by highest quality cement. Due to the natural ingredients, the panels ensure the pleasant micro-climate, typical for the wood-made premises.

**Benefits**

CEWOOD Construction panels don't change their properties during the exploitation period. The material has been tested in Europe for over than 100 years and has proven itself to have high heat inertia, that helps to preserve the premises from rapid temperature fluctuations.

**Ecology** – the material is produced in a nature-friendly way

**Health** – provides a human-friendly, favourable environment

**Lifetime** – withstands deformation, are not damaged by rodents and insects

**Handiness** – easy to transport and assemble

**Insulation** – excellent insulation properties

**Acoustics** – excellent sound insulating and absorbing properties

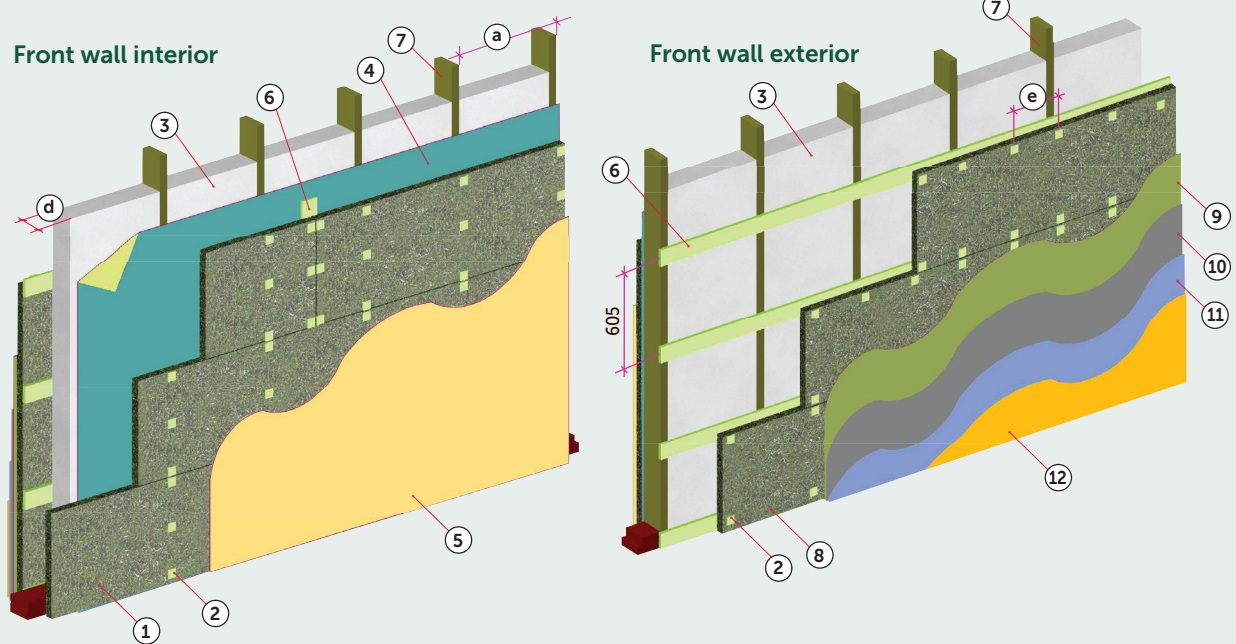
**Tehchnical data**

CEWOOD Construction panels are made from 3,0 mm wide wood wool, the panel sizes are 2400x600 mm. The possible panel thicknesses are 25, 50, 75 un 100 mm.

CEWOOD code		CW-G25R115	CW-G50R195	CW-G75R280	CW-G100R360
Thickness	mm	25 (±2)	50 (±2)	75 (±2)	100 (±2)
Length	mm	2400 (+3/-2)	2400 (+3/-2)	2400 (+3/-2)	2400 (+3/-2)
Width	mm	600 (±2)	600 (±2)	600 (±2)	600 (±2)
Weight	kg/m <sup>2</sup>	11,50	19,50	28,00	36,00
Thermic:					
• Thermal resistance (Ro)	m <sup>2</sup> -K/W	0,35	0,75	1,10	1,50
• Thermal conductivity (λD)	W/m-K	0,066	0,066	0,066	0,066
• Specific heat capacity (c)	J/(kg-K)	2100	2100	2100	2100
Minimal strength values:					
• Bending value (EN 12089)	kPa	≥ 1300	≥ 700	≥500	≥300
• Compression value (EN 826)	kPa	≥300	≥ 200	≥150	≥100
Reaction to fire (EN 13501-1:2007)		B-s1, d0	B-s1, d0	B-s1, d0	B-s1, d0

## TIMBER FRAME HOUSES

### Assembly



- ① CEWOOD Construction plate 50 mm
- ② Wood screw with a widened head or nail with washer  $d \geq 20$  mm
- ③ Thermal insulation – mineral wool or eco wool
- ④ Vapour barrier
- ⑤ Plaster (ex. Knauf MP 75 L)
- ⑥ Board 21x100 mm
- ⑦ Building's supportive framework
- ⑧ CEWOOD Constructive panel 25 mm
- ⑨ Cement or mortar (ex. Sakret CLP+, ZM or Pmsuper) 3–4 mm layer or 5–7 kg/m<sup>2</sup>
- ⑩ Plaster (ex. Sakret CLP+) 15 mm layer
- ⑪ Fiberglass mesh (ex. SSA 1363-4) in adhesive (ex. Sakret BAK) – 4–5 kg/m<sup>2</sup>
- ⑫ Decorative plaster, colouring
- Ⓐ Distance (step) between the frame racks. According to the requirements of wooden frame, as well as the specification of the mineral wool. Usually  $\leq 1$  m.
- Ⓔ Distance between moundings if wood screws or nails with washer are used – on facade  $\leq 400$  mm, indoors  $\leq 600$  mm, if wood screws with a widened head –  $\leq 250$  mm.
- Ⓓ Thickness of heat insulation layer. Approximately 180–200 mm.

### Important

For mounting on the facade 25 and 50 mm thick CEWOOD panels should be used, assembled to horizontally placed boards using electroplated wood screws (45x4,5 mm) or nails with washer ( $d \geq 20$  mm).

The boards add the wooden frame extra resistance, which is very important for the frame to be stable, and for the plaster to avoid flaws.

For the interior use 50 mm and thicker CEWOOD panels should be used, as they ensure higher heat capacity.

To avoid forming of „floating ends”, on the inside of the wall the panels should be mounted to the board using wood screws (see 6).