

WALL LINING | METAL FRAME WALL LINING USING METAL STUDS



This is a type of wall lining system constructed by fixing a metal frame structure made of ceiling profiles to the wall using fasteners, and by screwing Intreme/Intreme Fit Ultralight boards onto one side of the metal studs.

FEATURES

- Allows the construction of higher lining walls.
- Provides a smooth surface quickly
- Allows insulation material to be placed in the cavity between the existing wall and the lining wall and providing high sound and thermal insulation.
- Improves the fire resistance of the structural components covered by the wall lining system.
- Allows electrical and mechanical services to be routed through the cavity between the existing wall and the lining wall.

USAGE AREAS

- Renovation Works
- Residential Buildings
- Business and Shopping Centers
- Hotels
- Hospitals
- Cinemas, Theaters and Sports Halls

■ APPLICATION

- The location of the lining wall to be constructed in accordance with the architectural plan is determined and the line on which the U profiles will be fixed is marked on the floor and ceiling.
- U profiles are cut according to the length of the lining wall to be constructed. C profiles are 10 mm shorter than the ceiling height.
- Before installation, sound insulation tape is applied to the bottom of the U profiles.
- U profiles are fixed to the floor and ceiling using anchors and screws at maximum 600 mm centre to centre spacing.
- The line on where the brackets will be fixed is marked on the existing wall surface at maximum 2100 mm vertical spacing and according to the specified stud spacing horizontally (600 mm or 400 mm centre to centre).
- If the U profile cannot be fixed directly to the ceiling, an additional row of brackets shall be fixed 50 mm below the ceiling.
- C profiles are inserted between U profiles.
- The brackets are fixed to the base of the C profiles with bracket screws.
- Before starting the cladding works, all installation works (electrical, mechanical, etc.) shall be completed and the insulation materials shall be tightly fitted between the c profiles without gaps.
- Plasterboards are cut 10-15 mm shorter than the floor -to- ceiling height using a utility knife.
- The front face paper shall be scored with a utility knife so that the blade penetrates into the core.
- The plasterboard is snapped at the scored line by hand pressure and the back face paper shall then be cut using a utility knife.
- The plasterboard is fixed with its upper edge as close to the ceiling as possible, leaving a 10-15 mm gap above the floor.
- Installation shall begin with a full plasterboard panel and continue with the full panels wherever possible.
- Chamfered edges are formed on cut sides and short edges of the plasterboards using suitable tools before fixing.
- Plasterboards are fixed to the C and U profiles with 25 mm drywall screws at maximum 300 mm centre-to-centre spacing
- After screw fixing is completed, screw heads are covered with ABS Joint Filler for Plasterboard and any gaps up to 5 mm are pre-filled.
- Self-adhesive fiberglass joint tape is applied centrally to the joints.
- The first coat of ABS Joint Filler for Plasterboard is applied generously over the tape to a width of 100 mm using a spatula, and smoothed with a steel trowel.
- After at least 2 hours, the second coat of ABS Joint Filler for Plasterboard shall be applied with a steel trowel to a width of approximately 200 mm.

■ MATERIAL ANALYSIS



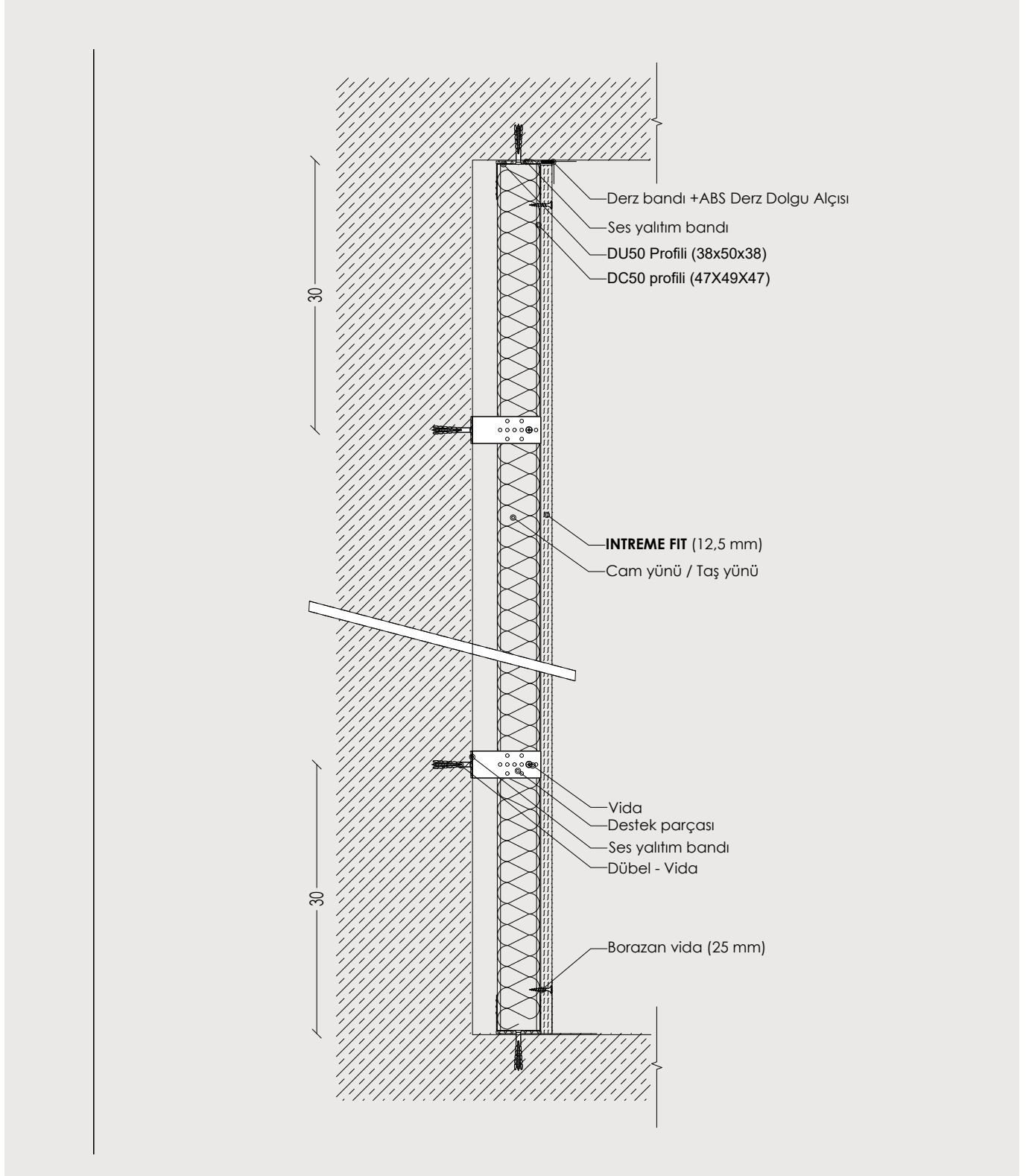
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MATERIAL ANALYSIS

5% wastage was taken into account for a 1 m² lining wall with a height of 2.75 m.
Quantities are approximate and may vary depending on project details.

Material Name *Centre to centre	Single Profile		Double Profile	
	60 cm	40 cm	60 cm	40 cm
Intreme/Intreme Fit Ultralight	1,05 m ²		2,10 m ²	
DU 50 Profile	0,80 m		0,80 m	
DC 50 Profile	2,10 m	2,90 m	2,10 m	2,90 m
Sound Insulation Tape	1,30 m			
Dowel-Screw	2,70 pcs			
Bracketed	1 pcs			
Bracketed Screw	2 pcs			
Drywall Screw 3,5x25	12 pcs	16 pcs	8 pcs	10 pcs
Drywall Screw 3,5x38			12 pcs	16 pcs
Joint Tape	1,60 m			
ABS Joint Filler for Plasterboard	0,40 kg			
ABS Saten Finishing Plaster	1 kg/m ² for every 1 mm thickness			
Insulation Material (Optional)	1,05 m ²			
Perforated corner profile corner tape	Depends on the result (floor height)x(number of corners)			

■ DETAIL DRAWINGS



■ SPECIFICATION

According to the project and detail drawings; Preparation of Wall U-profiles (U) and Wall C-profiles (C) made of galvanized steel in accordance with TS EN 14195; Applying sound insulation tape under U profiles; Fixing U profiles to the floor and ceiling using plastic wall plugs at 60 cm centre to centre; Cutting C profiles; Fixing the frame to the existing wall using plugs and screws at 60 cm (or 40 cm) horizontal centres and maximum 210 cm vertical spacing; Installing C profiles between U profiles and fixing the base to the brackets with bracket screws; Fixing Intreme/Intreme Fit Ultralight boards in accordance with TS EN 520 to U and C profiles using 25 mm drywall screws at maximum 30 cm centres: Pre-filling gaps wider than 5 mm with ABS Plasterboard Joint Filler Plaster; Covering screw heads with joint filler plaster; Applying self-adhesive fiberglass joint tape to plasterboard joints; The unit rate per m² shall include all materials, material waste, labour, loading at site, horizontal and vertical transportation, unloading, contractor's overheads and profit, and all other costs associated with constructing the partition wall, including the application of joint filler over the joint tape.

WARNINGS

- The vitrified ware hanger on which the sanitary ware will be fixed must be placed inside the partition wall in advance.
- Corner profile or corner tape should be used to ensure the verticality and smoothness of curtain wall corners and to increase impact resistance.
- Joint tape and joint filler plaster should be used on plasterboard joints.

STANDARDS

- TS EN 520 Plasterboards - Definitions, Requirements and Test Methods
- TS EN 13963 Joint Materials - For Plasterboards - Recipes, Requirements and Test Methods
- TS EN 14195 Metal Frame Components Used in Plasterboard Systems
- TS 1475-2 Gypsum plasterboard applications - Part 2: Lining wall application rules
- TS 1475-4 Gypsum plasterboard applications - Part 4: Finishing works application rules