



SPECIFICATION FOR THE INSTALLATION OF THE ENVIROWALL EXTERNAL WALL INSULATION SYSTEM TO MASONRY SYSTEM WITH ACRYLIC OR SILICONE GRAINED FINISH

GENERAL INFORMATION REQUIREMENTS

DESCRIPTION OF THE WORK: The work shall consist of the provision the **ENVIROWALL** external wall insulation system, together with all trims and accessories, obtained from Envirowall Ltd, Orchard House, Aire Valley Business Centre, Keighley, West Yorkshire, BD21 3DU. Tel: 01535 661633. Fax: 01535 661 933. e-mail info@envirowall.co.uk .

SYSTEM COMPONENTS

ADHESIVE MORTAR – Envirowall HP12 polymer modified adhesive or Granol –G Highly Polymer modified adhesive mortar. 25kg bags

INSULATION – Envirowall Polystyrene, Mineral wool or Phenolic insulation thickness to meet specified U-Value.

FIXINGS – Envirowall TID or TDK dependant on result of pull out tests. Length of fixing dependant on insulation thickness and ensuring 40mm embedment.

BASE COAT - Envirowall HP12 polymer modified base coat or Granol –G Highly Polymer modified base coat, 25kg bags.

TOP COAT – Granol Silicone or Acrylic top coat to be applied and finished to an even texture. Colour and grain size to be confirmed

PROFILES – Envirowall Aluminium trims with UPVC meshed corner profiles.

DRAWINGS: The installation shall be carried out to the specification that follows, detailed in accordance with the Architects drawings as appropriate.

PROTECTION: All doors, windows, frames, fascias and other areas of the existing structure not forming part of this section of the works shall be fully protected by means of masking tape and polythene sheet or other acceptable alternative means.

All areas of existing paths and paved areas and landscaped works shall be adequately covered to avoid damage by all external Insulation works including scaffolding erected in connected therewith.

Any damage caused by the specialist External Insulation installer to the existing surface of the windows, and/or the paved and landscaped areas during the execution of the works shall be made good, cleaned off or replaced entirely at his expense, to the satisfaction of the architect, before practical completion.

PLANTS AND SHRUBS: Where practical, and in consultation with the occupants, all plants and shrubs shall be carefully pulled away from the walls and netted to allow the work to proceed, and reinstated on completion.

TEMPORARY WORKS: During the progress of the external insulation works temporary diversions to the existing gutters (after temporary removal of the rainwater pipes) must be provided and maintained, such diversions shall be to the architects satisfaction and must not impede the erection of the scaffolding or the progress of the works.

STORAGE AND HANDLING: Care shall be taken in off-loading, storage, hoisting and placing in the final fixed positions of panels, fittings and fixtures. The Contractor must ensure adequate and proper protection to all materials in storage.

Any damage suffered to the panels, fittings and fixtures whilst on site shall be the responsibility of the contractor.

INCLEMENT WEATHER: All work shall be executed with due regard to the prevailing/anticipated weather conditions.

External rendering shall not be carried out during frosty weather or if the temperature falls below 3°C (unless sheeted protection and heating is provided) or if the substrata is frozen or there is a risk of frost damage before the render has had it's initial set.

In hot and windy weather rendering should be carried on elevations which have received the sun. If this is impractical, spraying with water or hanging a protective sheet over the work should be carried out to prevent premature curing.

INSPECTION: All work shall be subject to regular inspection and acceptance by the Architect or his representative, and by the manufacturers technical representatives.

All work to be executed in compliance with the employers requirements, good practice and in strict accordance with the systems instructions.

Any work failing to comply with any of the above shall be taken down and refixed, at the contractors own expense, to comply with any of the above.

REMOVAL OF RUBBISH: Remove and dispose of all debris, surplus material and redundant protective material during the course of the work.

PREPARATORY WORK: Prior to the installation it is essential that on-site investigation and tests be carried out to determine the type and quantity of anchors that are used. Results of these tests shall be made available to the architect, the Main Contractor and the system designer.

DUBBING OUT: Where necessary, existing walls which are to receive the Envirowall insulated render system shall be dubbed out using dubbing mortar Ref **FC101**.

EXTERNAL PLUMBING: Modification of overflows shall be made to accommodate the new finish, which will have an overall thickness of 60mm.

Repairs to major defects and cracks in the surface of the existing structure are deemed to have been carried out prior to the application of the Envirowall system.

SYSTEM INSTALLATION

SURFACE PREPARATION:

BASE BEAD: Powder coated base beads with pvc nose, Ref **FC172** shall be fitted immediately above the dpc. Care must be taken to ensure a true horizontal line is maintained. The bead shall be carefully cut and formed into door reveals.

INSULATION FIXING: insulation boards, Ref shall be fitted starting from the base bead, vertical joints shall be staggered and no cut boards less than 200mm wide shall be used. Sheets together with all necessary standard accessories and fixings shall be fixed strictly in accordance with the Envirowall standard installation procedure. Fixing generally shall consist of one anchor in the centre of each board and one in each corner (a total of five anchors per board). Extra fixings are required round openings such as doors and windows, and at external corners. Please refer to the Envirowall fixing pattern drawing for further detail.

Expansion beads required shall be fitted after first cutting through the insulation to the substructure, prior to fixing the reinforcement. Any further beads such as corner angles, must be fitted **after** the reinforcement base coat is applied in order to maintain the full strength of the reinforcement at vulnerable areas.

EXPANSION BEADS: Powder coated expansion beads with pvc nose, Ref **FC119** shall be fitted as indicated on the drawings, after first cutting through the insulation as described above.

RENDER WORK: All work shall be carried out in strict accordance with B.S.5262 and B.S.8000 Part 10.

The renders are to be pre-bagged, with water only added on site, and mixed strictly in accordance with the manufacturers instructions. **No other additives are necessary or permitted.**

BASE COAT/SCRIM ADHESIVE: A 3-4mm coat of Envirowall base coat render Ref. **FC102** shall be applied and reinforcement mesh Ref. No **FC106** trowelled in with all joints overlapped by 100mm. Extra patches approximately 200mm by 600mm shall be applied diagonally at each corner of openings such as windows, doors and balanced flue outlets.

GRANOL ACRYLIC OR SILICONE FINISH: Supply and apply a thick coat of Granol primer with brush or lambs wool roller (diluted up to 10% with water) in the colour shade of the topcoat.

Supply and apply strictly in accordance with the manufacturers printed instructions, Granol silicone render (2.5mm grain size) scraped finish to approved colour.

Granol silicone is ready to use after stirring briefly. A small amount of water may be added (max. 2%) if required, due to the substrate or the climatic conditions.

Apply the Granol silicone with a stainless steel smoothing trowel in the thickness of the grain and rub with a plastic float in a circular motion. Granol silicone can also be applied with a suitable conveying pump with spraying equipment. Granol silicone dries naturally by water evaporation; the drying time may be increased in high air humidity and/or low temperatures.

All work shall be executed by competent tradesmen employed by the approved specialist contractor.

The rates quoted shall include for all the labours and additional materials where required, to form arises and finishing's against frames, cills and bell mouth to base bead.

SEALANTS: On completion of the base coat render application a 5mm bead of sealant Ref **FC140** must be applied to all junctions of the insulation render system and other buildings materials such as window and door frames, eaves and wall vents.

All work shall be executed by competent tradesmen employed by the approved specialist contractor, and who have completed the Envirowall training course.

The rates quoted shall include for all labours and additional materials where required, to form arises and finishings against frames, cills and bell mouth to base bead.

FINAL CLEANING: Remove masking tape and polythene sheeting, clean off all marks, blemishes and splashes and all traces of render and mastic from windows, door frames, cills and other affected surfaces and leave the works complete and to the satisfaction of the Architect.

