CLADDING · ENGINEERING SPECIFICATION

Terraco Textured Coatings

This specification covers Terraco Textured Coatings - ready-mixed acrylic/silicone resin-bound decorative render finishes applied by Technopol SA as the reinforced, weatherproof outer skin of an EIFS wall over separate EPS insulation.

Verified technical data

Property	Value	Standard
Product type / build-up	Ready-mixed acrylic/silicone resin-bound textured render; reinforced weatherproof outer skin of an EIFS wall (Terracoat topcoat over Styrobond DP basecoat + Terramesh mesh on EPS board)	—
Finish grades & grain (texture) size	Excel / Granule / Sahara — 0.8 to 3 mm	—
Thermal conductivity (λ) / R / U	Not applicable — the coating is the finish skin, not the insulation; λ belongs to the separate EPS board	—
Specific gravity (wet coating)	1.65–1.70 (Excel 1.70; Granule / Sahara 1.65)	—
Adhesion / pull-off bond strength	>2.0 N/mm²	—
Water resistance	Sd <0.10 m (vapour-permeable); W24 <0.15 kg/m²·h^0.5 (liquid-water uptake)	—
Reaction to fire (coating itself)	Flame Spread Class 0	ASTM E84
Fire performance (full EIFS system)	PASS — temperature, flame-spread & mechanical criteria (facade fire-spread; a reaction-to-fire result, not a fire-resistance rating)	SANS/BS 8414-2:2017
Material consumption / coverage	1.5–4.5 depending on grade (Technopol calc ~2.0; 25 kg pack ≈ 12.5 m²) kg/m²	—

Scope

1.0 This specification covers the Terraco finish and reinforcement layers of a wet-applied EIFS (External Insulation Finishing System) wall - the Styrobond DP basecoat, Terramesh reinforcing mesh, primer and Terracoat Sil / Gravitex textured topcoat.

2.0 The coatings are the finish coat only and are not an insulation product; the insulation is a separate Technopol EPS (LiteCel) board specified elsewhere and outside this section.

3.0 Thermal design of the wall (lambda, R, U) is governed by the separate insulation board and is excluded from this specification.

4.0 The verified technical property values in this specification are those of the Terracoat Sil finish coat; the acrylic (non-silicone) Terracoat and Gravitex are not covered by the available datasheet.

Materials

5.0 The headline finish shall be Terracoat Sil, a ready-mixed acrylic/silicone resin-bound textured coating supplied in Excel (alpine/scratch), Granule (granular) and Sahara finishes with grain sizes of 0.8 to 3 mm.

6.0 The reinforced basecoat shall be Terraco Styrobond DP, applied at approximately 5 mm (1.7 kg/m2 per mm of thickness).

7.0 The reinforcement shall be Terraco Terramesh glass-fibre mesh, fully embedded in the basecoat, supplied in 50 m x 1 m rolls (approximately 45 m2 per roll).

8.0 A substrate-penetrating primer (Terraco P Primer) shall be applied between basecoat and topcoat.

9.0 The EPS board shall be bonded with Terraco Styrofix adhesive and secured with mechanical fasteners (plastic fasteners with plastic or steel pin dowels).

10.0 The wider distributed Terraco range includes Gravitex Standard textured acrylic, Terracoat Granule Filled, Styrobond embedding mortar, Weathercoat/Flexicoat waterproofing and Handycoat fillers/crack-repair plasters.

11.0 Terracoat Sil is supplied in 25 kg packs in 50 standard colours, with a 12-month shelf life in original, unopened containers.

Performance

12.0 Terracoat Sil wet-coating specific gravity shall be 1.70 (Excel) or 1.65 (Granule / Granule Filled / Sahara) - a dimensionless wet-coating value, not an insulation density.

13.0 Adhesion / pull-off bond strength shall be greater than 2.0 N/mm2.

14.0 Water vapour permeability shall be Sd less than 0.10 m (vapour-permeable) and liquid water transmission W24 less than 0.15 kg/m2.h^0.5.

15.0 Viscosity shall be 35,000-45,000 cps and drying time 3-4 hours.

16.0 Material consumption shall be 1.5-4.5 kg/m2 by grade (Technopol calculator basis approximately 2.0 kg/m2; 25 kg pack approximately 12.5 m2).

17.0 No thermal conductivity (lambda), R-value or U-value applies to or is published for the coating; thermal performance belongs to the separate EPS / mineral-wool insulation board.

18.0 No single total-render-thickness figure is established; the render comprises an approximately 5 mm Styrobond DP basecoat plus a 0.8-3 mm textured topcoat grain.

19.0 No structural / load-bearing performance is claimed for the render skin.

Fire

20.0 Terracoat Sil carries an ASTM E84-81H 'Flame Spread Class 0' reaction-to-fire (surface-spread-of-flame) classification for the coating only.

21.0 The complete Terraco EIFS Alpha System passed the temperature, flame-spread and mechanical criteria of BR 135:2013, LPS 1852:2014 and AS 5113:2016 when tested to SANS/BS 8414-2:2017 (report FTC 21/033, Issue 1, 22 June 2021).

22.0 The 8414-2 pass applies only to the exact tested assembly: pigment primer + Terraco Granule Filled 1.5 mm Sil over Styrobond DP + Terramesh on 50 mm Technopol LiteCel FRCel EPS (Grade FR100) with Technopol 130D StoneWool firebreaks on a fire-resistant LSF backing wall; the system may only be installed as tested.

23.0 Neither result is a fire-resistance (REI/FRR) rating; the inner wall shall separately achieve its required fire-resistance rating to SANS 10177-2.

24.0 EPS is a combustible material; the facade fire-spread pass reflects the whole assembly including the StoneWool firebreaks and fire-resistant backing wall, not the EPS or coating alone.

25.0 Installing on a masonry substrate is outside the tested scope and would require a separate SANS 8414-1 test; glazed openings, curtain walling and glass panels are excluded and shall comply with SANS 10400-T.

26.0 Report FTC 21/033 is valid for 5 years from 22 June 2021 (nominally lapsing about 22 June 2026) or until any change to the system composition, process or approved supplier.

Execution / installation

27.0 The EPS board shall be bonded with Styrofix adhesive and mechanically fastened at a rate of 5 EPS fasteners per m2 in addition to the adhesive.

28.0 The Styrobond DP basecoat shall be applied at approximately 5 mm and the Terramesh glass-fibre mesh fully embedded in it, followed by a penetrating primer.

29.0 The textured decorative topcoat shall be trowel-applied; the Granule finish may alternatively be spray-applied.

30.0 In fire-rated build-ups, StoneWool firebreaks shall be applied at each floor slab.

31.0 Waterproofing coatings (Weathercoat/Flexicoat) shall be measured and applied separately from the textured finish.

32.0 System profiles shall be used to strengthen and finish edges, window/door openings and sills.

Standards & compliance

33.0 SANS/BS 8414-2:2017 - full-system facade fire-spread test; the Terraco EIFS Alpha System passed against BR 135 / LPS 1852 / AS 5113 criteria (report FTC 21/033, 22 June 2021), within the scope stated above.

34.0 ASTM E84-81H - Terracoat Sil coating: Flame Spread Class 0 (reaction-to-fire of the coating).

35.0 Manufacturer (Technopol SA) holds ISO 9001:2015 (current); ISO 14001 and ISO 45001 lapsed in March 2026 - these are company management-system certifications, not product certifications for the coating.

36.0 No Agrement / BBA / ETA certificate in the corpus covers the Terraco textured coating or the EIFS render system; Agrement SA 2020/609 covers the LiteCore Building System only and shall not be presented as covering this product.

37.0 No EN 13501-1 / SANS 53501-1 Euroclass is assigned to the Terraco coatings in any reviewed document.

> **Specifier's notes — not established in Technopol sources.**
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> - Thermal conductivity (lambda), R-value and U-value are not established / not applicable for the coatings - obtain thermal performance from the separate EPS / mineral-wool board datasheet.
> - Total applied render thickness of the finished EIFS skin is not established as a single figure in the corpus (only an approximately 5 mm Styrobond DP basecoat plus a 0.8-3 mm textured topcoat grain) - confirm externally.
> - Terramesh mechanical properties (weight g/m2, aperture, tensile strength N/50 mm) are not established in any primary Technopol source - obtain the current manufacturer datasheet; brochure figures (e.g. 160 g/m2, 4x4 mm, 1500 N/50 mm) are uncorroborated and must not be used.
> - EN 13501-1 / SANS 53501-1 Euroclass (e.g. B-s1,d0) for the coating is not established / not assigned - only ASTM E84 'Flame Spread Class 0' is stated; obtain externally if a Euroclass is required.
> - Full datasheets for Gravitex, Styrobond DP, Weathercoat GP/412, Flexicoat, Handycoat Flex and P Primer (VOC, solids, tensile/elongation, MSDS) are not established in primary sources - obtain current manufacturer datasheets before detailed specification.
> - SG, adhesion and vapour-permeability data for the acrylic (non-silicone) Terracoat and for Gravitex are not established - the available datasheet is for Terracoat Sil only.

- Agrement / BBA / ETA certification specific to the Terraco render/coating or the EIFS system is not established / none found - obtain externally; Agrement SA 2020/609 covers LiteCore only.
- No fire-resistance rating (REI / minutes) is established for any wall using these coatings - the SANS 8414-2 result is reaction-to-fire / facade fire-spread only; establish the inner wall's FRR separately per SANS 10177-2.
- Colour fastness (delta-E) and grain-size dimensional tolerances are not established in any reviewed document - obtain externally if required.
- The current renewal/validity status of fire report FTC 21/033 beyond its stated 5-year window (nominally lapsing about 22 June 2026) is not established in the corpus - confirm before specifying.
- Report FTC 21/033 is correctly cited here as the Terraco EIFS Alpha System SANS 8414-2 test, but it must never be presented as testing the coating in isolation or any build-up other than the exact assembly tested.
- Unresolved contradiction: brochure figures for Terramesh and for total finish-render thickness (e.g. '3-4 mm PolyClad / 5-8 mm Alpha') are not corroborated by any primary source and have been excluded as unknowns.
