

LEED STATEMENT

ACOUSTIC PLASTER

LEED V4 CERTIFICATE CONTRIBUTION

LEED (Leadership in Energy and Environmental Design) is a global green building certification program developed by the US Green Building Council. To achieve LEED certification, projects must satisfy all the prerequisite and desired credit requirements.

The performance of the project, when measured against these criteria, determines a certification status of Silver, Gold, or Platinum.

Armourcoat is committed to sustainability across all aspects of its business. We strive to formulate all our products without VOC's or solvents and utilize recycled materials as widely as possible.

ENERGY AND ATMOSPHERE (EA)

OPTIMIZED ENERGY PERFORMANCE

EA Credit (1-20 points)

INTENT: to achieve increased energy performance and to reduce the environmental impact associated with excessive energy use and reduce stratospheric ozone depletion.

The Armourcoat Acoustic recycled glass wool panels and board coating provide excellent thermal insulation which contributes to the reduction of heating and cooling energy used.

The Armourcoat Acoustic panels provide the following U values:

28mm system – 1.35 w/m² K

48mm system - 0.72 W/m² K

MATERIALS AND RESOURCES (MR)

INTENT: to consider the entire life cycle of the building, from extraction and manufacturing, to transport, operations, maintenance and eventually the end of life, with the aim of minimizing the total embodied energy within a building.

ENVIRONMENTAL PRODUCT DECLARATIONS

MR Credit (1-2 points)

INTENT: to encourage the use of products and materials for which life cycle information is available and that have environmentally, economically, and socially preferable life cycle impacts.

APPLICATION: Armourcoat has undertaken a full life cycle analysis for the Acoustic Plaster System and has independently verified and published EPDs for the complete system.

SOURCING OF RAW MATERIALS

MR Credit (1-2 points)

INTENT: to encourage the use of products and materials for which life cycle information is available and that have environmentally, economically, and socially preferable life cycle impacts.

APPLICATION: Armourcoat has undertaken a full life cycle analysis for its Acoustic Plaster System and has independently verified and published EPD's for the complete system.

The Armourcoat Acoustic glass wool panels are made from general recycled glass and the board coating and acoustic undercoat contain more than 90% post-consumer recycled plate glass.

The Armourcoat Acoustic topcoat contains more than 94% pre-consumer recycled marble and has an organic content of less than 3%.

MATERIAL INGREDIENTS

MR Credit (1-2 points)

INTENT: to encourage the use of products and materials for which life cycle information is available and that have environmentally, economically, and socially preferable life cycle impacts.

APPLICATION: Armourcoat discloses all chemical product ingredients in the system and has a HPD Version 2.2 (Health Product Declaration) that confirm the absence of harmful substances.

All materials in the Armourcoat Acoustic System have been screened against the Living building Challenge (LBC) red list materials as part of the HPD generation. Ingredients screened down to 0.1% (1000 ppm).

CONSTRUCTION AND DEMOLITION WASTE MANAGEMENT

MR Credit (1-2 points)

INTENT: to reduce construction and demolition waste disposed of in landfills and incineration facilities through waste prevention and by reusing, recovering, and recycling materials and conserving resources for future generations.

APPLICATION: in a typical installation, less than 2% of the panels are discarded, as the small I as offcuts can be used in a patchwork and then overcoated with the undercoat to provide a flat surface for the topcoat.

Any unused panel scraps are accepted in mixed glass recycling facilities as both the panel and the board coating are more than 90% recycled glass.

Undercoat granules are supplied in recycled paper sacks rather than buckets and these can be recycled into wastepaper.

The plastic pails for Armourcoat Acoustic topcoat can be easily cleaned and recycled as plastic waste.

Any unused materials, other than the Armourcoat Acoustic topcoat that has been tinted to a non-standard colour, are saved for use on other projects.

INDOOR ENVIRONMENTAL QUALITY (EQ)

INTENT: to contribute to the comfort and well-being of all building occupants by establishing minimum standards for indoor air quality.

LOW EMITTING MATERIAL

EQ Credit (1-3points)

INTENT: to reduce the concentration of chemical contaminants that can damage air quality and the environment and to protect health, productivity and comfort of installers and building occupants.

APPLICATION: Armourcoat Acoustic topcoat plaster was tested for VOC content to ISO 11890-2 and achieved <1g/l which is below the limit of detection.

The Armourcoat Acoustic Plaster System was tested for Indoor Air Quality Emissions by Eurofins and achieved a pass.

The Armourcoat Acoustic Plaster System was tested in April 2021 following the requirements of CDPH Standard Method and is compliant with CA section 01350 and CDPH standard V1.2.

THERMAL COMFORT

EQ Credit (1 point)

INTENT: to promote occupant productivity, comfort and well-being by providing thermal comfort.

APPLICATION: the Armourcoat recycled glass wool panels and board coating provide excellent thermal insulation which contributes to the reduction of heating and cooling energy used and affords occupants greater thermal comfort in a conditioned space with lower heating and cooling energy use.

Armourcoat Acoustic panels provide the following U values:

28mm system – 1.35 w/m² K

48mm system - 0.72 W/m² K

INTERIOR LIGHTING

EQ Credit (1-2 points)

INTENT: to promote occupant productivity, comfort, and well-being by providing high quality lighting.

APPLICATION: the Armourcoat Acoustic topcoat made from fine recycled white marble granules, is an excellent reflective white surface which contributes to the reduction in lighting energy consumption. L value 90 (LAB).

ACOUSTIC PERFORMANCE

EQ Credit (1-2 points)

INTENT: to promote occupant productivity, comfort and well-being by reducing reverberation through effective acoustic design.

APPLICATION: the Armourcoat Acoustic Plaster System will significantly reduce the reverberation time across a wide range of frequencies due to its outstanding sound absorption qualities.

Tested to EN ISO 354 and ASTM C423-17:

Armourcoat 28mm system

NRC - 0.85

Alpha W - 0.80

SAA - 0.82

Armourcoat 48mm System

NRC - 0.95

Alpha W - 0.95

SAA - 0.2