



sareenstone

INSTALLATION GUIDE

WALL CLADDING

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Natural Stone Wall Cladding is available in the form of a variety of materials, such as limestone, sandstone, granite, porphyry and more. It is installed on a built structure, either indoor or outdoor wall, as a part of an architectural design. Wall Cladding embraces the variation of natural stone and the applications vary dramatically.

PRODUCT VARIATION

As stone wall cladding is a natural quarried product, every piece is unique and carries the markings of its formation history. No two pieces will be the same and that is the beauty of natural stone. Variation is intrinsic in natural stone and ensures that every installation is unique.

Our goal is to set realistic expectations with our clients. Before ordering, ensure considerations have been made to understand what variation is to be expected with this product.

SAREEN STONE STANDARDS

We specialise in the import of premium-quality natural stone. In operation since 2003, with our industry experience, we've established close relationships with quarries and suppliers from around the world. This enables us to source and develop products that meet the unique needs of our clients.

CONSIDERATIONS

Every installation must consider the on-site conditions and refer to the relevant Australian Standards for trade practices, and manufacturer's installation and usage guides. As every site and conditions can differ, this document is to be used as a guide only.

Your trade professional, contractor and /or Specifier will be able to advise if the following recommendations are appropriate or need to be adjusted. The advice in this document is a guide only and is not to replace the services of professionals.

DELIVERY AND STORAGE

Wall cladding, corners and capping are packed in timber crates. Once your product has arrived, please check the order for correct product and quantity. It is important to establish if any additional product is required quickly as new batches may vary. Please note, stone is sometimes packed wet and will appear darker than expected. As stone dries it can lighten in colour.

We suggest crates are stored out of direct sunlight and rain, single stacked and on a level surface.

SUBSTRATES

The base wall structure must be structurally sound, stable and rigid for the intended weight of the stone cladding. It should also be clean, free of oil, waxes or any other bond inhibiting contaminants. If in doubt consult a structural engineer.

For concrete, block work or brickwork walls, the surface needs to be even and true, with variance of no more than 2mm every 4m. If the wall is not true, a render should be applied. For tilt-up concrete panels, it is necessary that all residues from release agents are removed from the panel prior to the application.

New concrete must be allowed to cure for 6 weeks, should have a wood float finish and be free of any laitance.

Note: Engineer's advice is recommended when considering concrete substrates. Contractors also need to consider drainage and / or waterproofing issues to minimise the risk of rising humidity, which can bring salts contained in the soil or in the bedding layers to the surface.

CONTROL JOINTS

Movement or control joints are an essential component of any substrate and walling area, they should be used in the following areas:

- Over movement joints in the background and over weakened plane joints;
- At a junction between different background materials;

- At fixtures interrupting the stone surface;
- At internal vertical corners;
- At all horizontal and vertical joints.

Contractors should ultimately decide the location and carry out effective movement joints. Specific structural engineering advice might be needed for unusual sites. Control and Movement Joints should be carried out in accordance with AS3958.

WATER PROOFING

Correct waterproofing should be used as a part of overall installation system to promote longevity of the walling project.

PRIOR TO INSTALLATION

Prepare pieces by firstly removing any loose material from the back, and ensure it is clean and free from dust. Minor marking and chipping is not structural and not considered as defective. A few pieces may have chips or marks and these can be used for cuts. An allowance of 10% is added to allow for wastage, cuts and continuation of batch. Installation of the product constitutes acceptance of the product.

Prior to installation it is advisable to blend from different crates to achieve a congruent appearance.

When installing natural stone, it is imperative that the correct system and products are used to ensure you receive the best possible result.

PRE SEALING

Pre-sealing prior to laying should be considered depending on the stone selected and the environment it is to be installed. When pre-sealing, ensure the product used is appropriate to work in conjunction with the selected tile adhesive.

WEATHER CONDITIONS

Avoid laying stone in extreme weather conditions or if rain is expected.

It is not advisable to lay stone on days above 30 degrees Celsius as this can affect the bonding of the adhesive with the stone.

INSTALLATION

Installation methods will vary depending on factors such as the size of the stone, the moisture sensitivity and where it is to be installed.

Adhesives: All natural stone is porous to some degree, so a moisture sensitive adhesive specifically for natural stone must be used. It is essential to read and follow the manufacturer's advice. 100% adhesive coverage is required.

MECHANICAL FIXING

When installing wall cladding, you may need to seek the advice of an engineer. Mechanical fixing may be a consideration as part of the installation process.

LAYING

When working with a Free Form stone or Linear pattern, it is best to create a control panel, also known as a dry lay, of your stone pieces on the ground before you start adhering the cladding to the substrate.

When fixing natural stone, it is necessary to start the bottom row on a level line to maintain a consistent level as you work up the wall. It is also important that they rest on a secure base such as a concrete floor or footing to help carry the weight and ensure the level stays consistent until the adhesive is cured.

Use a generous amount of recommended adhesive and apply it to the back of each piece or tile, and to the wall. It is important to use a notched trowel to apply the adhesive on to the wall, as would normally be the application method used for laying tiles. It is just as important to back butter each piece of stone to ensure maximum adhesion.

This ensures the maximum possible adhesion to your wall surface, because all the gaps, voids and cracks between the back of the stone and the wall substrate are filled. This is critical to ensure that a strong bond is formed between the stone and the wall.

Depending on your preference, you may like to keep the joints tight between each piece of stone as this will provide a neat appearance or you may prefer to install with a wider gap.

CUTTING

We recommend using a wet saw with the appropriate diamond blade to ensure a clean cut. The stone should be washed immediately after it is cut to avoid cutting paste drying and staining the surface of the product. The correct PPE should always be worn, and Work Health Safety conditions met. For WHS information refer to safeworkaustralia.gov.au

GROUT

If you choose to grout, the colour choice is personal, but the general rule of thumb is to choose a colour similar to the stone so that the stone is the hero, not the grout.

Dampen the stone and grout joints with a wet sponge. Apply the grout to the full depth of the joints, being careful not to leave any gaps or air pockets. Remove excess as you go and clean the entire surface with the wet sponge once the grout is touch dry, but before it completely hardens.

Ensure all grout residue is cleaned from the surface of the stone within the time limit as specified by the grout manufacturers' instructions.

CLEANING PRIOR TO SEALING

Once the grout has set the stone should be thoroughly cleaned to remove any dirt or residue. Firstly, use a broom to remove loose debris then apply a pH neutral cleaner (never acidic) and clean with a stiff broom or nylon pad. Rinse thoroughly.

SEALING

We recommend all stone be sealed to help protect against staining and to allow easier cleaning. Penetrating sealers do not form an impenetrable layer across the surface of the stone. They allow the stone to breathe while also changing the chemical nature near the surface to delay staining.

In general water-based sealers are better at repelling oil based stains but solvent-based sealers last longer outdoors.

We recommend the STONETECH® Professional range of sealers, cleaners and maintenance products. Please ask one of our natural stone specialists for the most suitable product for your particular application.

Engaging a cleaning and sealing specialist is always recommended for a professional result.

EFFLORESCENCE

Efflorescence is what occurs when water brings soluble salts to the surface. When the water dries, it leaves white calcium salts behind. Efflorescence should not be confused with grout haze, which is maintenance and cleaning issue.

Efflorescent stains should be scraped off with a paint scraper, swept up and disposed of before any stain removal starts. Once the efflorescence stains have been removed, fill any small holes in the grout and seal the paving again. If water is not getting in, then efflorescence won't be coming out.

PREVENTING EFFLORESCENCE

Avoiding efflorescence involves three key steps. Australian Standards recommend that a membrane is laid over a sand/cement screed to stop any soluble salts being brought to the surface and minimise water entry into the paving system, and to direct any water that does get in to an exit point where staining won't be obvious.

Cutting down on the entry of water involves good grouting, filling any small cracks and applying sealer. Hosing the surface can increase efflorescence so we advise to sweep instead.

ONGOING MAINTENANCE

Interior floors: Dust mop interior floors regularly using a clean, non-treated, dry dust mop. Sand, dirt and grit do the most damage to natural stone surfaces due to their abrasiveness. Mats or area rugs inside and outside an entrance will help to

minimize the potential damage from these particles.

Be careful when using a vacuum cleaner as the metal or plastic attachments or wheels may scratch the surface. Damp mop the stone floor with a diluted solution of a neutral cleaner designed for stone. Keep off floor until completely dry, as wet stone floors may be slippery.

Exterior surfaces: Should be swept and then washed with water or a pH neutral cleaner designed for stone.

Bathroom and other wet areas: Periodic use of a neutral stone cleaner will remove any soap scum or hard water deposits that may have formed. In the bath, or other wet areas, using a squeegee after each use can minimise soap scum and hard water deposit build-up.

What to do when a spill occurs: No matter how careful, spills can happen. A quick response and the right solutions can keep spills from damaging your stone or degrading the sealer.

TROUBLESHOOTING

Etch marks: Highly acidic substances such as orange juice, coffee, vinegar, wine, tomato products, mustard and many soft drinks will “etch” most marble, limestone and travertine. Sealing allows you time to wipe up a spill, but it cannot stop the chemical reaction that may leave a dull mark.

General cleaners not specifically designed for natural stone are not recommended. These may etch away the polish, discolour the surface, scratch the stone or degrade the sealer. Professional refinishing is the best way to permanently remove etch marks and restore your natural stone’s even finish.

Organic Stains: For most organic stains such as tannins from leaves, sawdust, food, moss, or mould, we advise to remove the remains of the stain and dry the area with a clean white cloth. Spray the area with a neutral stone cleaner and wipe off excess with a clean cloth.

Inorganic Stains: Most inorganic stains such as rust, vanadium, copper, and other metal, paint and chemical stains require an inorganic solvent, such as oxalic acid, paint stripper or solvent to remove them. These products should only be used by a professional.

Oily Stains: If you identify the stain as having an oil base (from foods like salad, cooking oils, butter or some cosmetics) you may be able to remove the stain using a poultice. A poultice will wick up the stain from deep within the stone.

Scratch Removal: Scratches in natural stone surfaces can occur but are not permanent. Surface scratches can often be removed with fine sandpaper or honing powders.

IMPORTANT WARNING: Do not use acidic cleaners on your natural stone as it may affect the colour and texture of your stone. We recommend seeking help from a professional prior to use. Contact your installation contractor or one of Sareen Stone’s Natural Stone specialists for further information.

Note: Above instructions are for reference purposes only. Please follow label directions on back of actual product.

Please note these Installation tips are provided in good faith and to the best of our knowledge and experience at the time of writing. Always check against the relevant Australian Standards for trade practices at the time of installation. In no way do these tips replace the services of professional contractors and / or consultants. The best advice is to always seek the services of a qualified professional when installing our products.