



deccatiling

A division of the total tile group

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BULDER: Buildcorp Commercial
ATT: Zane Petkovic
PROJECT: The Village Apartments - Cheltenham
SUBJECT: CLEANING AND MAINTENANCE MANUAL

**Please find below the correct cleaning procedures and maintenance manuals for the tiles laid in the above project.*

Glazed tiles:

When cleaning glazed tiles, a damp cloth is usually all it takes to bring back the gloss of the tiles. A routine clean with window cleaner may remove moderate stains and a stronger solution is necessary for heavily soiled surfaces. A mild solution of hot water and all purpose liquid cleaner or soap-less detergent is excellent for cleaning wall and floor tiles.

When cleaning it is important to remember:

Do not use powder based cleaners that may scratch the surface.
Do not use soap to clean as it leaves a film which can dull the gloss of glazed tiles and also encourages the growth of bacteria and mould in damp areas. All cleaning solution must be thoroughly removed from the tiles by rinsing with clean water. To clean grouting, a plastic bristle brush is recommended.

**Steel wool pads should not be used as they leave steel particles, which may later rust leaving brown stains.*

Natural Stone (Travertine, Bluestone, etc):

When cleaning Natural Stone, a damp cloth is usually all it takes to bring back the surface sheen. Floors should be regularly vacuumed to remove loose material and washed with warm water and a neutral detergent or a specialist natural stone cleaner specifically designed for the application, Lithofin MN Easy Care is such a cleaner and should be used strictly in accordance with the manufacturer's recommendations.

Do not use any acidic based or alkaline cleaners – these will rapidly deteriorate the sealer applied to the travertine.

Shower recesses should be wiped down after use.

Mechanical damage should be referred to a specialist stone contractor for rectification or replacement.

When cleaning it is important to remember:

Do not use powder based cleaners that may scratch the surface.

Do not use soap to clean as it leaves a film which can dull the gloss of glazed tiles and also encourages the growth of bacteria and mould in damp areas. All cleaning solution must be thoroughly removed from the tiles by rinsing with clean water.

To clean grout, a neutral detergent and plastic bristle brush is recommended.

**Steel wool pads should not be used as they leave steel particles, which may later rust leaving brown stains. They can also scratch through the stone sealer or the glaze on ceramic tiles*

Shower areas:

Due to the constant use of shower areas, tiled surfaces need a different cleaning procedure to remove the hard water deposits, soap scum and body oils that build up.

To avoid extra heavy cleaning, weekly cleaning is advised to maintain the level of hygiene and to remove dirt before it builds up into hard deposits. Routine build up can be removed with most all purpose cleaners while hard water deposits can be eliminated by a solution of white vinegar and water. A plastic scouring pad is most useful for this kind of cleaning.

With the damp nature of shower recesses, bacteria and mould can develop where there is little ventilation. This can be removed by spraying or wiping with a chlorine bleach such as White King. This should be allowed to stand for 3 minutes and later rinsed with clear water.

**Caution should be taken when using bleach and it should never be mixed with ammonia.*

Unglazed tiles:

Cleaning recommendations for unglazed tiles are the same as those for glazed tiles. Powder cleaners should not be used, as undissolved particles might remain and develop a haze distracting from the naturalness and beauty of unglazed or terracotta tiles.

Lobbies/corridors:

Small public areas such as lobbies and corridors can be easily cleaned by a daily mopping with warm water and a neutral cleaner.

Public Areas: (Porcelain / Ceramic) *Not applicable to stone/travertine/terrazzo

Large public areas such as shopping centres, malls and auditoriums may be cleaned with self propelled scrubbing machines using detergents as follows:

1. For daily cleaning, a detergent with a pH in the range of 7-9 should be used.
2. For heavy cleaning, an organic acid cleaner with a pH about 2, but containing no mineral acids, or an alkaline cleaner with a pH of up to 11 may be used provided its sodium or potassium hydroxide content is less and 0.01% when diluted. Both should be diluted with water as recommended by the chemical manufacturer. The cleaner should be liberally applied and quickly removed from the floor by squeegee and suction as recommended by the chemical manufacturer.
3. For heavy duty scrubbing of small areas higher alkaline cleaners up to pH 13.5 may be used provided the sodium or potassium hydroxide content is less than 2% in the concentrate and is diluted to at least 100 to 1 with water, but they should be removed from the surface with copious quantities of water. They should not be used in routine daily maintenance as residual cleaner will attack the tile surface and cause the grout to blacken.

Before using these products (1, 2, & 3) get professional written advice from the chemical manufacturer as to the suitability, application and frequency of use of their product on fully vitrified porcelain tiles.

Showers/Toilets:

Where hygiene is of paramount importance, such as in commercial showers and toilets, a commercial cleaner is the best application where cleaning should be performed daily. Organic acid cleaners that do not contain mineral acids may be used here.

Kitchens:

For commercial kitchen areas where the grease build up is constant and oil spills occur, organic acid cleaners, pH about 2, dilution rates should be used as specified by the chemical manufacturer. This method of cleaning is appropriate also for dining areas in fast food cafeterias and for food and beverage spills.

Exterior areas:

Exterior tile surfaces can be washed with a soapless detergent in the pH range 7-11 and rinsed with fresh water. Where harder grime occurs, a soft bristle brush can remove build up.

Balconies/Terraces/Decks:

An occasional wash down with a hose spray eliminates normal build up on decks. If these are more stubborn then cleaners for kitchen and exterior areas may be used.

Do not use any acidic based or alkaline cleaners – these can compromise the integrity of the waterproof membrane below.

Efflorescence is a cosmetic issue only and whilst its occurrence requires regular cleaning to remove, will not of itself, cause leaks, instability or delamination of the tiles or deterioration of the grout joints.

Efflorescence is inherent when products containing lime (cement based screeds and grouts) are used. The presence of water, sun and lime will result in efflorescence in any normal situation.

When it appears it is simply a maintenance exercise to remove it using hot water, a tile cleaner designed for the purpose and a broom or scrubbing brush.

It is detrimental efflorescence is cleaned off when it appears. If it is left unattended for prolonged periods of time the efflorescence may calcify and cause permanent staining.

Hygiene:

Due to the nature of ceramic tiles, their surfaces, glazed or unglazed, are perfectly hygienic. They do not retain odors or absorb liquid, fumes or smoke. In this way, tiles are excellent for domestic applications where hygiene is essential and where dirt and hard wear are inevitable. Tiles are also an easy floor surface to clean. In commercial applications, this hygiene is imperative for bathrooms, kitchens, hospitals and school toilet areas and their ease of maintenance, essential for lobbies, shopping malls, eating areas, building and industrial areas.

Initial cleaning:

Recommendations for initial cleaning and maintenance of fully vitrified porcelain tiles

Adherence to the following cleaning procedures will enable you to take maximum advantage of the properties of the selected floor tile range.

The materials and methods recommended are the outcome of many years experience and, when used in association with a regular cleaning routine, will enable the floor to be maintained to a high standard of cleanliness, slip resistance, hygiene and appearance.

The speed and efficiency of cleaning depend among other things on the ease with which the cleaning agents can reach the stains. For this reason, tiles having rough or uneven surfaces are at a disadvantage.

Cleaning equipment:

1. Manual Cleaning
Mop and bucket. Nylon or natural bristle scrubber
2. Mechanical Cleaning
Large areas of plain or textured surface tiles are most readily cleaned with rotary cylindrical or reversing mechanical scrubbing machines. The scrubbing machine speed ideally should be 150 to 250 rpm. Brushes used should be selected so that they effectively clean the tiles but do not damage the tile surface in any way. Scrubbing machines should be provided with a suction drying facility.
3. High Velocity Water Jets are sometimes available for general use and/or for removal of stubborn dirt. These will not damage the tiles, but may erode the grout in the joints if used regularly. Check with the equipment manufacturer before using. If oil or grease is present, use the jet with warm or hot water & with neutral detergent.

Once the tiles have been laid and grouted, they must be thoroughly cleaned of all residual cement and grout smears, silicone leaching and soils after a few days when both the flooring itself and the joints have completed their aging process.

1. Operate in 10m² sections to ensure greater control over the finished result.
2. Sweep floor to remove all loose debris.
3. Saturate the grout joints with water.
4. Warm to hot water and apply neutral cleaner to the floor to be cleaned. Allow solution to work on the tiles for 5-6 minutes to break down excess grout, dirt and grease.
5. Scrub tiles with a brush or mechanical scrubbing machine (suction facility switched off) to lift the dirt.
6. Remove dirt with wet vacuum cleaner or scrubbing machine (suction facility switched on).
7. Re pass again with clean solution if necessary.
8. Finally, before allowing the area to dry, rinse thoroughly several times, with cold clean water, agitating with the scrubbing brush or with the scrubbing machine (suction facility switched off) to ensure complete removal before using wet-vac to remove excess water from the surface.
NOTE: IF THE SURFACE IS INADEQUATELY RINSED OR DRIED UP BEFORE RINSING, AN OFF-WHITE DEPOSIT OR PRECIPITATE MAY BE LEFT ON THE TILE AND IT WILL BECOME MORE DIFFICULT TO REMOVE THAN THE ORIGINAL DEPOSIT.
9. Dilute cleaning detergent according to chemical manufacturer's instruction for high concentration in warm water and apply using a mechanical scrubbing machine (suction

facility switched off) or manually with a heavy scrubbing brush. The water/detergent mixture must be allowed to remain on the floor for sufficient time (5-15 minutes) to allow it to penetrate and emulsify the dirt. It is important that the cleaning detergent is completely removed by a final rinsing with clean water. Remove excess water from the surface with a wet-vac or mechanical scrubbing machine (drying facility switched on).

IT IS THE RINSING PROCESS THAT REMOVES THE DIRT.

10. Repeat procedure (9) weekly or as required to prevent soil build up on the ceramic tiles.

Routine cleaning:

1. Dilute cleaning detergent according to chemical manufacturers' instructions for lower concentration in warm water and apply using a mechanical scrubbing machine or manually with a clean mop and bucket. It is important that the cleaning detergent is completely removed either by a final rinsing with clean water or by the squeegee vacuum action of a mechanical cleaner.
2. Spillage of oil, fat or material likely to stain or cause a slipping hazard, should be removed immediately by using detergent and hot water, followed by rinsing with clean water.

General remarks:

1. Whatever method is chosen, remember the three golden rules:
Rule A: Try a small inconspicuous area first.
Rule B: Rinse off well with clean water afterwards.
Rule C: Avoid high concentration of cleaners for prolonged periods.
2. The sooner cleaning is carried out, the easier the stain is removed.
3. Protect the floor if construction or overhead work is taking place.
4. Locations which are permanently wet (e.g. swimming pools, showers etc) may attract a build up of body fat, oils, soap residue, hard water deposits and in humid conditions, organic growth (algae). To remove this, a more acidic cleaning agent used regularly is preferable because alkaline cleaners can react with body fats to make surfaces slippery. A plastic scouring pad is the most useful device for this type of cleaning. Before using these products get professional written advice from the chemical manufacturer as to the suitability, application and frequency of use of their product on fully vitrified porcelain tile.
5. Powder cleansers should not be used, as undissolved particles may remain and develop a haze distracting from the naturalness and beauty of Granito™ tiles.
6. Steel wool pads should not be used as they may leave steel particles which can rust and leave brown stains.
7. One source of problems with unglazed tiles is regular cleaning with alkaline detergent of greater than pH 9 with high concentrate of sodium or potassium hydroxide. These should not be used unless the residue can be neutralised and thoroughly rinsed away with clean water, otherwise reaction can cause a glossy and potentially slippery surface.
8. The pH of the material is the measure of acidity or alkalinity. It is a logarithmic scale and pH 7 is the neutral point. Below pH 7, the material is progressively more acidic and above pH 7, more alkaline (i.e. pH 8 is 10 x more alkaline than pH 7).
9. The regular use of detergents and other cleaning agents which are excessively acidic or alkaline with excess sodium or potassium hydroxide can cause irreversible damage to the tile surface. Acidity being less damaging than alkalinity. All products used must be recommended by the chemical manufacturer.
10. Many degreasing agents which contain wax, sodium, silicate or other additives which leave a sticky deposit on the floor and thus retain dirt on the surface, must also be avoided. Like any material these tiles tend to become slippery when wet. We recommend that care be taken to keep the surface dry.
11. Please always refer to the chemical manufacturer's instructions. If you need more information about the use of cleaning products and the manufacturing agents in your state, please contact the Technical Services Department of the chemical manufacturers.
12. Detergents build up with prolonged use and if not properly rinsed. This build up of detergents will hold in dirt, make the tile look dirty and make it slippery.

13. Signage must be adequately displayed when cleaning tiles to warn the public or other users of the area that the tiles are wet and care should be taken.
14. Before using these products, get professional written advice from the chemical manufacturer as to the suitability, application & frequency of use of their product on fully vitrified porcelain tile.

Regards,

A handwritten signature in blue ink, appearing to read 'Andrew Rivelli', enclosed within a large, loopy oval flourish.

Andrew Rivelli
Manager