



E3/AS1 Internal Moisture Code Change

TO: Architects, Designers, Builders and Specifiers

As from the 5th of November 2021 the acceptable solution E3/AS1 for internal moisture no longer allows for timber-based flooring in areas that contain sanitary fixtures or sanitary appliances, this summary will include:

- Bathrooms
- Kitchens
- Laundries
- Toilets
- Any other wet area that includes a basin, tap, toilet or sink.

Effective 5th November 2021

E3/AS1 Internal Moisture Code Change

This change has come about by redefining the definition of impervious and easily cleaned floor surfaces as below on page 16 (scan QR code on last page to review), that now only includes Tiles and Sheet Vinyl. What that means is these materials only are acceptable solutions under the building code and will be automatically approved.

There is also an obscure approval for slab on grade concrete as well as for laundries in a garage or an outside toilet.

Wood & Water Don't Mix!

Wood based flooring like laminates are now excluded as flooring options in wet areas.

INTERNAL MOISTURE

3.0 Watersplash

3.1 Lining materials

3.1.1 Floors

The following finishes to floors satisfy the performance for *impervious* and easily cleaned surfaces in spaces containing *sanitary fixtures* or *sanitary appliances*. In open plan spaces this surface shall extend at least 1.5 m from all *sanitary fixtures* and *sanitary appliances*:

COMMENT

The requirement for *impervious* and easily cleaned floor surfaces applies to spaces such as kitchens, bathrooms, laundries and toilet facilities. This requirement applies regardless of whether containment is required by Paragraph 2.0.

Amend 7
Nov 2020

a) Integrally waterproof sheet material (e.g. polyvinylchloride) with sealed joints and sealed or coved at edges where watersplash may occur.

Amend 7
Nov 2020

b) Ceramic or stone tiles having 6% maximum water absorption, waterproof grouted joints, and bedded with an adhesive specified by the tile manufacturer as being suitable for the tiles, substrate material and the environment of use. Edges of the tiled area where watersplash may occur must be sealed or coved, and tiles must be laid on a continuous impervious substrate or a membrane specified by the manufacturer as being suitable for the tiles, substrate material and the environment of use.

Other flooring types which will include all the following will need to get approval as an alternative solution and unless this is BRANZ approved or similar architects and specifiers are unlikely to want to go through the risk or hassle of trying to be a guinea pig to get the product across the line.

So the following floor types are excluded unless there is an alternative solution and timber based materials due to water absorption and longevity issues are unlikely to be approved by councils or by BRANZ.

- Solid timber flooring
- Laminate Flooring
- Engineered wood flooring
- Hybrid flooring that has wood or cellulose

Under the code it is very clear that bathrooms, laundries and toilets will need full waterproofing and tiling over the top.

- For open plan rooms (e.g. kitchens/living areas) waterproofing/containment under clause 2.1b is required at least 1.5 metres from all sanitary fixtures and sanitary appliances in open plan rooms need waterproofing
- Bathrooms need to be fully tanked/waterproofed
- Laundries need to be waterproofed but only 1.5 metres from the sanitary fixtures and appliances, but logic is you would waterproof the whole floor to contain a flood
- Separate toilets need to be waterproofed floors but not fully tanked at only 1.5 metres from the sanitary fixtures and appliances, but logic is you would waterproof the whole floor.

Note: Separate central floor wastes are only required in laundries and kitchens if sanitary fixtures and appliances do not have an integrated overflow in accordance with 2.0.2

IN SUMMARY

This is a reset for the New Zealand building industry as no longer will wood-based products be automatically included in wet areas where they inherently do not perform, and it will be highly unlikely any council will approve wood and water as they will become liable for the outcomes .

Click together floating floor systems promoted as waterproof will no longer be an acceptable system for areas requiring full waterproofing as the Joints, depending on installation and movement, will open and Silicon around the perimeter will always break down with differential horizontal and vertical movement.

Click together laminates should never be approved (as alternative solutions) or promoted as suitable, as wood and water never mix, and the voids between the floating floor and the waterproofing will encourage fungal growth which is at odds with the Code.

So architects, group building companies, specifiers and Interior and kitchen designers will need to rethink what is specified and used in single level and multisite developments to ensure conformance to code and ease of permitting for their clients, they will also need to think through flooring suppliers who will misrepresent and overpromise the performance of wood based flooring in wet areas.

We are very fortunate as we have the preferred acceptable solution under the code (Tile and Stone) to help you design and specification to meet code.

We have multiple designs and sizes in the following formats:

- Timber looking porcelains in 1200x200mm
- Large format tile in 800x800mm, 1000x1000mm or 600x1200mm: exceptional design alongside compliance with code.
- Ecologically-friendly solutions, that last the test of time as they are inert when coming into contact with moisture.

Please visit our website to view ranges that will assist you in designing with tile in accordance with this NZ Building code amendment.

The Team @ Tile Warehouse



Scan this QR code for detailed information.