

Flood Compatible Materials Guide

For Construction Certificate Applications

In order to ensure that structures which are located on flood prone land are structurally compatible with flood water during and after a 100yr Average Recurrence Interval (ARI) Flood Events, Council specifies a list of materials which are less likely to be prone to water damage.

The list below is not exhaustive and materials that are listed (which may be only mildly affected by immersion) may be eligible for use if Council deems them to be adequate.

Key components	Suitable materials/construction	Unsuitable materials/construction
Roof	<ul style="list-style-type: none"> • Timber trusses with galvanised connections • Reinforced concrete • Galvanised metal 	<ul style="list-style-type: none"> • Traditional timber roof frame construction • Inaccessible flat roofs • Non-galvanised structural steelwork or connections • Unsecured roof tiles
Bolts, nails, hinges and fittings	<ul style="list-style-type: none"> • Brass • Nylon • Stainless steel • Galvanised steel • Hinges with removable pins 	<ul style="list-style-type: none"> • Mild steel
Windows	<ul style="list-style-type: none"> • Aluminium frames with stainless steel or brass rollers 	<ul style="list-style-type: none"> • Timber with PVA glues • Mild steel fittings
Walls	<ul style="list-style-type: none"> • Concrete walls • Cavity brick walls • Galvanised steel frames • Stainless steel frames • Aluminium frames • Timber frames in areas not subject to forces from fast flowing water • Bracing of galvanised steel or marine grade plywood 	<ul style="list-style-type: none"> • Timber frames in areas that are subject to forces from fast flowing water
Floor, sub-floor structure	<ul style="list-style-type: none"> • Reinforced concrete slab • Suspended timber floor • Masonry walls • Marine grade plywood • Galvanised steel piers/columns • Masonry piers/columns 	<ul style="list-style-type: none"> • Foundation must not be prone to failure due to erosion (located on fill) • Particle board flooring • Standard grade plywood • Engineered timbered products (unless certified by the manufacturer as being resistant to the effects of repeated immersion for periods in excess of one week)

Flood Compatible Material Submission List for Construction Certificate Application

The 100yr ARI Flood Level which affects this structure is:

RL _____ m AHD

Please find a list of all Structural Building Materials to be used in the development below the 100yr ARI Flood Level.

Key Components	Lowest level of component (AHD) *	Is this component affected? *	List of materials to be used #
Roof	RL _____ m	<input type="checkbox"/> Yes <input type="checkbox"/> No	1 _____ 2 _____ 3 _____ 4 _____
Bolts, nails, hinges and fittings	RL _____ m	<input type="checkbox"/> Yes <input type="checkbox"/> No	1 _____ 2 _____ 3 _____ 4 _____
Windows	RL _____ m	<input type="checkbox"/> Yes <input type="checkbox"/> No	1 _____ 2 _____ 3 _____ 4 _____
Load bearing walls	RL _____ m	<input type="checkbox"/> Yes <input type="checkbox"/> No	1 _____ 2 _____ 3 _____ 4 _____
Floor, sub-floor structure	RL _____ m	<input type="checkbox"/> Yes <input type="checkbox"/> No	1 _____ 2 _____ 3 _____ 4 _____

* Fill out columns for all components

Fill out only if affected



This document contains important information.
If you do not understand it, contact the
Telephone Interpreter Service on 131 450.



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May 2016