Installing timber decking
Gun nailing and tight edge-butting of timber decking is not recommended by BRANZ. Tight edge-butting of timber with an unknown moisture content may mean the timber will swell (increase in size – both length and width) and buckle off the deck and/or close the 12 mm drainage gap required between any decking timber and the adjacent wall cladding.
The use of gun nails in dry decking may cause the decking to split and splinter around the nails. Also, the gun nails may not be sufficiently durable when used externally and also with treated timbers. If gun nails are used, they should be stainless steel or a verified quality hot-dipped galvanised – see BRANZ Appraisals for fixings that have been appraised.
BRANZ recommends that decking is laid as described in BRANZ Bulletin 489 and NZS 3604:1999 with gaps between boards. It is also considered good practice that all fixings (not just at the board end joints) are pre-drilled before hand nailing to minimise the risk of splitting.

IGUs
IGUs (insulating glass units), commonly called double glazing) come on site with labelling that describes the type of glass used and the filling used within the unit, such as argon gas. If the labels are removed on site and it is possible to remove them intact, do so and keep them to give to the owner or specifier for their records. Special care needs to be taken where some of the IGUs have different specifications. If there is a mixture of IGU types used on the project, be sure to also note the window designation from the plans for each of the units. If labels can't be successfully removed intact, photograph and identify them as a record. This is a lot easier than trying to prove later what was supplied and installed, particularly where higher performance units have been supplied (for example, low-E glass or argon filled). Note that, if all else fails, there is a test that can be carried out after installation to identify if a unit is argon filled.

Cladding
When fixing cladding to timber or steel framing, make sure you are aware of and follow the cladding supplier's specific requirements. Recently we were informed of timber weatherboards being gun nailed to steel framing which is not the way it should be done. Manufacturers or suppliers should have their fixing requirements in their technical data sheets - if not make sure you obtain them.
Fixing cladding or cavity battens to steel frames is usually done using "Wingtek" type screws. Thermal breaks between the cladding and the frame are typically secured in place when the cladding is fixed.

Building product substitution – it can affect performance
The unauthorised substitution of a specified item (in one case, the specified wall underlay was replaced without approval with a foil that was then installed to the outside of the framing) is a breach of the contractual requirements. To make matters worse, the builder in this case didn't understand the performance issues that were generated by his unauthorised change.
Foil must never be installed:

- **as a substitute for a specified wall underlay**
- **on the outer (cold) face of the framing.**

If a vapour barrier is placed on the cold side of a wall, condensation may form on its surface because it is a vapour barrier and not permeable to moisture vapour (it can't breathe), and this moisture can cause mould, rot and structural damage. BRANZ research has also shown that vapour barriers are not necessary in New Zealand domestic buildings.
The installation of a vapour barrier must be subject to a specific design regime, and it is generally only required as a component of a moisture control strategy in spaces with excessive moisture levels (such as an indoor swimming pool or a wet processing area) or in a building in extremely cold conditions (such as a mountain ski lodge). Such installations are usually in buildings where mechanical ventilation to control humidity is required.

It's that (Christmas) time again
The end of year has snuck up on us again. For many in the industry – those who have managed to remain within it – the past year has not been the easiest, particularly with residential building consents at a very low level.
While we might reflect and commiserate on the past year and while maintaining forward work is going to be difficult for many, there are also going to be some challenges over the next year as well:

- Coming to grips with the new versions of NZS 3604 and E2/AS1 – BRANZ is planning a significant seminar programme to explain the changes.
- A revised Building Act.
- Getting on top of the assessment, solution design and repair of leaky buildings – while the number of buildings to be repaired is depressing, it also presents a challenge for those designers and builders who take the opportunity to develop skills and become involved in this aspect of the building industry as there is a significant amount of future design and construction work in this area.

- The LBP scheme is another year closer – it's time for those wishing to be licensed to get organised so that they will be ready for the March 2012 implementation date. A number of those already licensed are seeing the marketing benefit of being able to say that they are a licensed building practitioner.
- A parliamentary election with all those television advertisements.

From the BRANZ team that puts together and distributes *Guideline*, have a safe and very merry Christmas.

BRANZ Seminars
NZS 3604:2011 Seminar – to be held in 34 locations around the country in April 2011. Dates and further information will be available early next year.

Distance learning CPD – courses from the Open Polytechnic of New Zealand and BRANZ are open for enrolment now:

- Building Controls
- Weathertight Design
- Plumbing Inspection
- Domestic Sprinkler Design

Full details are available at www.openpolytechnic.ac.nz/professional-development/continuing-professional-development-for-the-building-industry.

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