CASE STUDY
November 2022

ecoply®

PROJECT SPECIFICATIONS

PRODUCTS:

Ecoply® Structural Plywood

PROJECT CREDITS:

Architect: Breathe
Construction: XFrame

PROJECT:

ANZ Retail Space

CarterHoltHarvey Plywood

1800 338 463
www.ecoply.com.au

XFrame helps Breathe create a circular store fitout for ANZ

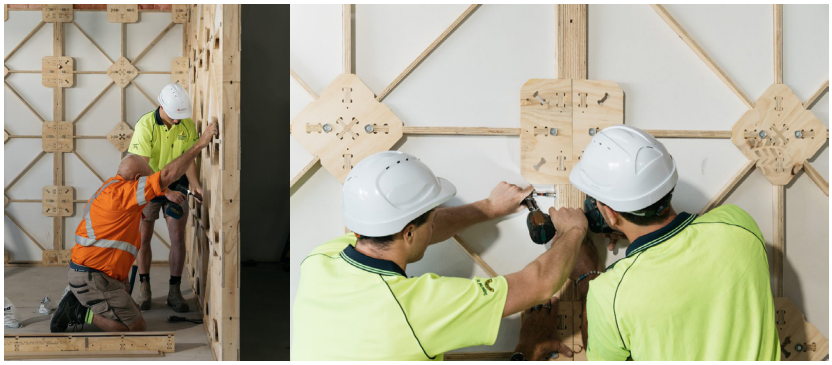
The new ANZ retail space designed by Breathe Architects takes advantage of the XFrame reusable building system. Customised for this project, the XFrame modular walls and ceiling incorporating Ecoply® structural plywood framing, were assembled off-site and quickly installed in-situ in a matter of days. The meeting spaces, kitchen and customer areas can all be reconfigured as required in the future, with walls being reused without damage to extend the life of the materials and reduce waste.

"XFrame is all about the reusability and circularity," explained Carsten Dethlefsen, Managing Director of XFrame.

XFrame was designed to efficiently use the whole sheet of plywood with as little waste as possible. Each project needs different thicknesses of ply to meet the size and load requirements. Specifications are run through proprietary software to map out the most efficient layout for cutting the components.

"It's so efficient," explains Carsten, "there's between three and five percent waste per sheet. Essentially just sawdust."

The design and construction of the frame means that out of one sheet of plywood, 1.9 square metres of framing is produced. It's an incredibly economical use of material. For projects in Australia, the production and supply of Ecoply from the Myrtleford mill in Victoria also means fewer carbon miles compared to imported products.



Easy to put together, easy to dismantle and re-use.

Architectural Graduate Ged Finch created and developed XFrame as part of his Masters of Architecture Thesis research. Finch was inspired to create a reusable, efficient, low-waste building system in response to concerns about the significant amount of waste produced every year by the construction industry.

Keen to develop a system based on circular economy principles, Ged created the elements of the reusable structural plywood wall frame with clip-on components for cladding, so every piece can be dismantled without damage and reused.

The resource-efficient materials selected for use within the XFrame system also need to be locally and sustainably produced as well as durable for reuse. For the frame itself, Ecoply structural plywood ticked a number of boxes. It's locally produced from sustainably grown Australian and New Zealand Plantation Radiata Pine, available Forest Stewardship Council® (FSC®) certified (FSC® C012019) upon request, and it's able to be CNC milled.

With a reusable XFrame fitout such as the ANZ retail space, materials are used efficiently, carbon is sequestered and waste is reduced. As more businesses commit to becoming carbon neutral, XFrame is gaining interest and enquiries.

As a business, XFrame is not resting on its laurels. The team are working with markets overseas to set up local suppliers and materials as well as refining and perfecting the current system.

When asked what's next for XFrame and the building industry, Carsten replied, "We're always challenging ourselves to see what we can deliver." And deliver they will.