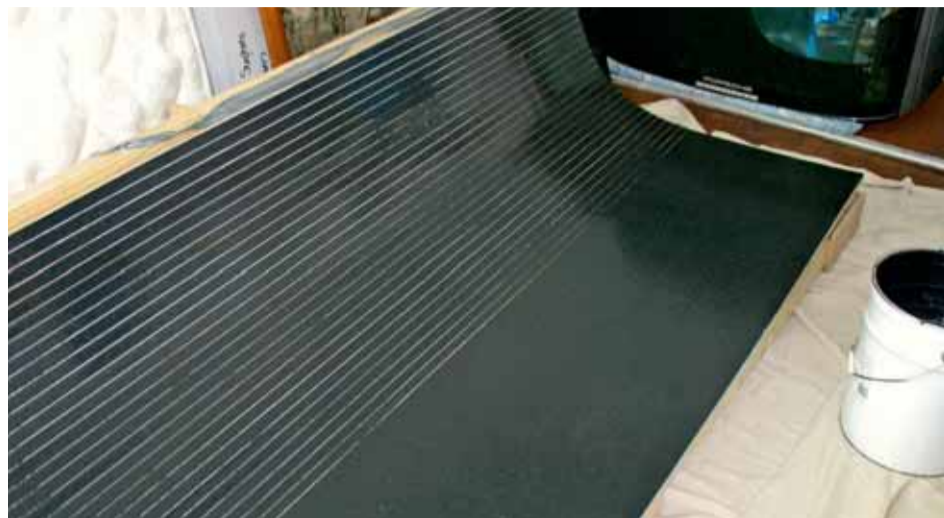


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Application In Action



MultiPanel

When a curved façade was required to help lessen the boxy feel of a terrace, a solution came in the form of panels which can be heat moulded to specifications. **Stephanie McDonald** reports.

When Rolf Ockert, principal at Rolf Ockert Design, was designing the oceanfront house in Coogee, Sydney, he decided to create a curved and free flowing element to the terrace house to lessen its boxy appearance. He eventually designed two areas where the flowing shapes penetrated the façade and continued as external shapes.

The internal parts are clad in timber veneer, but finding a product which could be bent and have a timber veneer finish proved problematic. Unable to find a suitable product that could be curved, Ockert ended up specifying marine plywood with an external grade coating. "The specified coating had good protection properties but resulted in a 'plasticity' appearance," Ockert says.

Shortly before installation of the marine plywood cladding

was due, he came across MultiPanel at a trade show. "I became interested in using this material after I found out that it could be heat-bent to any shape and finished with pretty much any material, including Tasmanian Oak veneer to match the chosen interior finish," Ockert says.

Around 36 sqm of MultiPanel was used as a feature to the front façade. MultiPanel organised for the sheets to be finished by Gunns in Launceston in selected Tasmanian Oak timber veneer and glued with external grade adhesive.

The inside of the panels were finished with B-grade veneer to prevent bending, with the panels also sent to A&I Coatings and coated with its Vitreflon 700 two-pack finish. The back of the panels were also coated with waterproofing to protect the back veneer.

After delivery on-site, Tim

Cassidy, director at Buildscene, routed strips in the back of the panel to remove material where the bends were to be tight. These panels were then heat-bent over simple templates to ensure the right radius.

Three Buildscene staff installed the MultiPanel. "The structure behind the panel consisted of 110 mm of brick work laid to internal and external radii set out during construction of the building. There was a concrete lid poured on top of the curved brickwork and the masonry structure was then waterproofed with a UV stabilised membrane," Cassidy says.

"Top hats were then installed to the face of the masonry structure. These top hats ran vertically and were installed to let rain water run behind the sheet as the masonry structure stood proud of the glass façade and roof of the building."

Once the top hats were installed, Cassidy made up templates to follow the curves in the masonry structure. "We then made a series of cradles that would support the length of the sheet so we could achieve an even curve for the length of the sheet. The back of the sheet was then routed with lines following the length of the sheet. We did this to weaken the MultiPanel in this area so we could achieve the curves required," Cassidy says.

The sheet was then laid in the cradle and heat was applied using heat guns to the back of the sheet until the panel was hot enough and could be bent to follow the shape of the cradle. Once the sheet was bent Cassidy placed weights on the sheet to hold it until it cooled and set.

The finished panels were adhered with Sikaflex to fur-

ring channels over the substrate walls. The curved MultiPanel sheets were lifted into position and stuck in place, with clamps used until the Sikaflex took hold. After installation, all edges were protected with small aluminium angles and all joints sealed with colour-matched silicone.

Cassidy says if the marine ply that was originally specified was used, there would have been exposed fixings. But with the MultiPanel, "The sheet held the desired curved and was easy to hold and stick into position," he says.

The only problem he encountered was once the sheets had been installed for a few months, it shrunk a few millimetres, opening the vertical butt joint between sheets. Cassidy says: "To resolve this problem we filled the butt joints with a coloured Sikaflex joint."

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