

Modular 'madness'

A modular home turned out to be the best solution for this would-be owner builder

BY ANGELA FINNEY

As the spring starts to infuse the atmosphere I reflect on how I ended up in a new house perched on a ridge here in Toronto with a wide deck three metres from the ground that gives me a bird's eye view of the block.

The block

I built this house after a tortuous process, which started with the need to move house and realising that anything within my price range would need another \$100,000 spent to make it habitable. In the end I decided that I would have to buy a block of land and build. I spent many hours over several weeks trawling the internet and taking trips on Sundays. Eventually I came across a 1700m² battleaxe block on the very edge of a new development.

It appealed to me straight away because it was on a ridge; the top section was flat and the rest fell away reasonably steeply. The slope faced south (which suited me because I like the southerlies) and the north side of the building would collect the north easterlies off the lake. The vegetation had largely escaped being razed by the developer; a large stand of mature Gynea Lilies (*Doryanthes excelsa*) and many grass trees covered the ground and a number of good trees remained.

It was an interesting block to me but for most people, impossible to build on conventionally. During the purchase negotiations the brick covenant was removed because I already had a good idea of the sort of house I was going to build.

The dream

We all start off with the desire to build the house of our dreams, which for me was a pavilion-style kit home



from Bush & Beach, with breezeways and expanses of glass looking down into the bush.

I started to look into the process of becoming an owner builder but soon realised that given that I live alone, work from home and don't earn a squillion dollars, owner building was going to be far too hard, so I would have to find another way of getting the sort of house that suits me. I was living in Cooranbong and had to sell my house there before I could even think about building so I went back to the beginning again.

I stumbled around all the websites of the project home builders for hours, hating everything until I found a company called Parkwood Homes at Somersby near Gosford who build 'modular' homes with simple floor designs. This was a revelation; I had never heard of such a thing.

The house

I decided to build 'The Milson,' which was designed by an architect for a special project on behalf of NSW Sport and Recreation at Milson Island in the Hawkesbury. Its layout appealed to me: a large living area, a generous main bedroom with walk-in wardrobe and ensuite on one side and two more good

bedrooms with a bathroom between on the other. My 'lifestyle' fits with an open layout for entertaining and playing music.

Although I had my heart set on the Bush & Beach pavilions, there was no way I could manage the owner builder process, particularly having to move out of my Cooranbong house to rent somewhere with three cats until the house was ready, which would probably take at least two years because I also had to earn a living somehow. The Parkwood Homes solution was the next best thing and would give me a house that sits lightly on the earth, at a price I could afford and in an acceptable timeframe. They also supply homes at frame stage only so that if you still want to do the internal work and fit out you can; basically they will build from frame onwards to any stage you want.

Modular building makes a lot of sense to me because:

- All the building is done in one location so builders' rubbish is generated there and stays there.
- Bad weather doesn't stop the building process.
- There is no need for temporary fencing on-site.
- The construction means that the floor is suspended rather than a concrete slab.
- The tradespeople are employed by the company and are on-site every day so at any time there can be a dozen people working on one house.
- The price quoted is rock solid; no hidden extras.
- The house is ready to occupy within two or three weeks of delivery.

Environmentally friendly factors of this house:

- The house is positioned to take advantage of summer southerlies and north easterlies blowing in from the lake.
- Walls, ceiling and floor are all fully insulated.
- The walls and roof are all *Colorbond* steel, which is very low maintenance and technically recyclable.
- The house is raised above the ground, which means that there is cool air underneath during summer.
- Winter sun penetrates the glazing on the north side to warm the floor, especially the tiles at the entry.
- The landscaping is natural and hard surfaces are minimised.
- Overflows from the rainwater tanks and the garage roof run-off are channelled across the ground rather than into stormwater.

The process begins

I sold my house at Cooranbong within five days of putting it on the market through an online sale site; on Saturday 16 October I exchanged contracts with the purchaser and the transaction was settled nine weeks later!

At the time of exchange I had not even submitted the Development Application so I had to get cracking. I was able to rent the house back from the new owners from settlement day to the end of February, which would have to be enough time to get the new house ready. I made it by the skin of my teeth; on the day the removal truck rolled up the tradespeople were still finishing off and continued to do so for another two weeks.

The Development Application went through for the garage and the house together without too much trouble (just the usual silly bureaucratic stuff) and Parkwood Homes were able to start building a bit before Christmas 2009.

The basic design of the house was modified in some details to suit me:

- The back deck was extended along the whole width.
- The southern bedroom windows were replaced by sliding glass doors.
- A bath was added to the bathroom on the west.
- A fitted laundry bench replaced the freestanding tub.

- A cupboard on the right hand side of the entry was replaced by a window.

The total cost of the house was \$205,000 including all the internal fitout, which included everything through to sheer curtains on the front windows. The garage was built separately and included my studio at the rear. The only additional costs were for the crane and external connections to water, sewer, electricity and telephone.

Building timeline

I drew up a timeline of all the things that needed to be done and in what order. Early in November two ponds were excavated, while access was relatively easy. The Development Application was through on 4 November and the garage was erected straight away so that I could start fitting out my studio at the back. The walls were insulated and lined, the floor carpeted, air conditioning, lighting and a ceiling fan installed. I am still in the process of finishing off the studio.

In early December the house building process began. The main differences between conventional and modular house building are the steel chassis on which the house is built, the extra rigidity in the walls (sheets of plywood) so that the building withstands transport, and the fact that the components are assembled off-site and then transported.

Despite the Christmas break, the frames were already up and the roof on by 22 January and two weeks later the *Colorbond* external cladding was being attached. During the first week of February the footings were put in on-site and a week later I saw the almost complete house at the factory. The wiring and plumbing were complete, the exterior boards above the *Colorbond* painted, the kitchen and bathrooms fitted out, door handles in place at the height I specified and decking timbers screwed down. By 16 February the house was ready to break into four pieces and deliver to site.

D-Day

Delivery day was 19 February; the weather was fine and not too hot for once. I will never forget driving over to the site at around 10.30am and, on approaching the street, seeing the massive crane jib towering over the neighbouring houses. I am paying for that monster, I thought.

I was just in time to see the first section dropped into place with amazing precision. The other three followed patiently and with such gentleness it was hard to believe it was a 60-tonne crane doing the job. Each piece was winched into place to close the remaining 15mm gap and bolted onto the piers, then slivers of compressed cement sheeting were hammered in as wedges where necessary to make the sections perfectly level. Once it was all assembled, a swarm of tradies started to add the finishing touches. There were balustrades to make, steps, painting, trim, plasterboard to install where the centre join was and umpteen other details to attend to.

Finishing

Two days later, two professional painters (friends) and I started painting the inside, which was already under-coated. This was part of the deal; I have done all my own painting for years.

Despite the soaring temperatures during the ensuing week the finishing work continued. On Tuesday the electricity was connected and I vacuumed the floor in preparation for the carpet to be laid the next day.

On Thursday 25 February I moved in to my new house amidst total chaos of painting, fixing and cleaning. The barbecue table was almost immediately occupied for lunch by the workers.

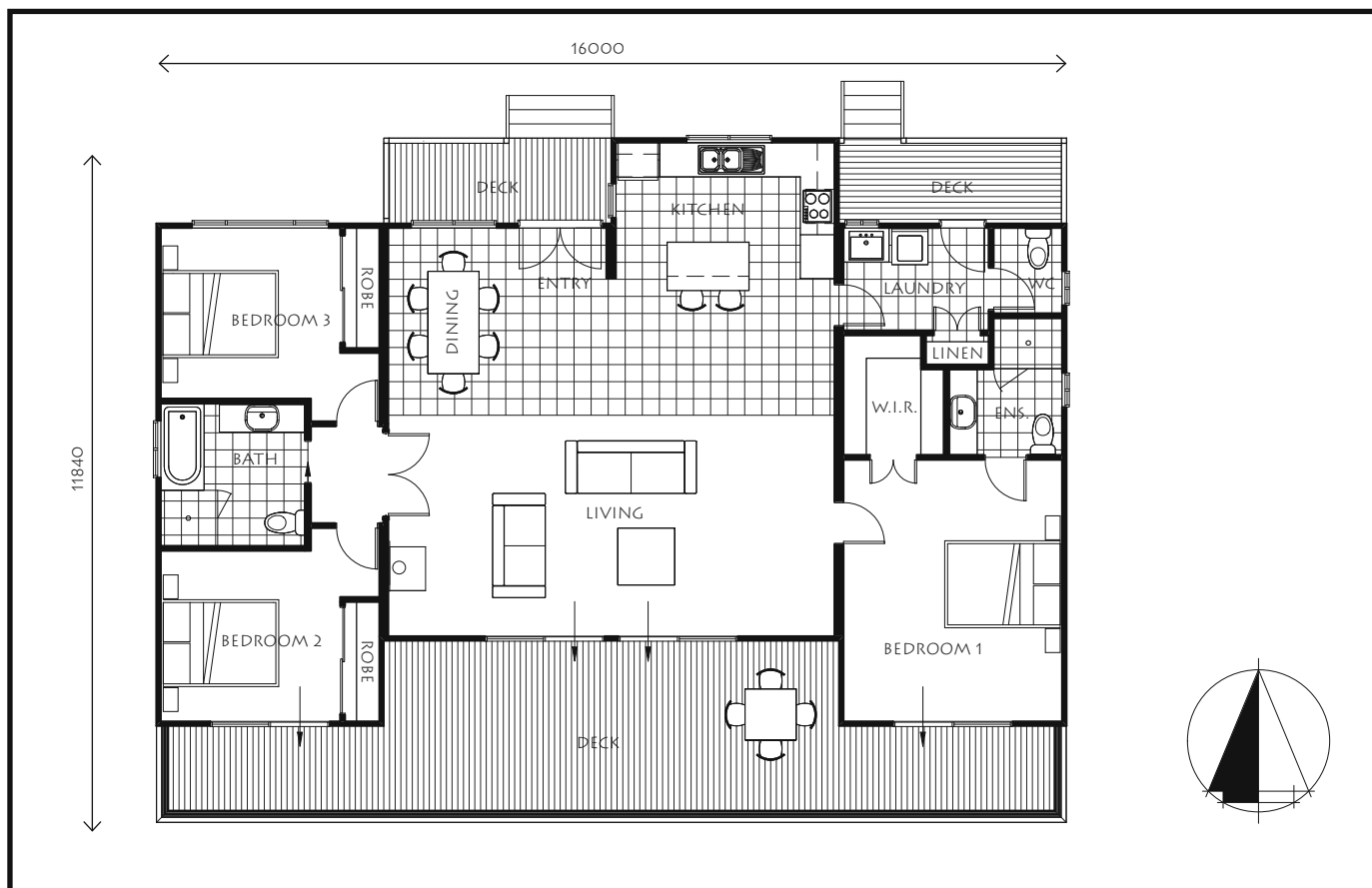
Finishing continued for a couple of weeks; rainwater tanks, connections, external painting, handrails, replacing a cracked tile etc. I still have to finish painting the architraves, doors and skirtings but I will do that on days when it's too hot to work in the garden.

Settled

My vegetable gardens were the most important factor so I created a series of raised beds along the front of the house, bringing in soil because the ground is solid clay with river pebbles through it. Three year old asparagus crowns were the first to go in along with lettuce, white radish, broccoli, kale, sugar snap peas, broad beans, spinach, carrots and raddicchio, all of which are now producing well. I have planted two clementines, a lemon, a black genoa fig and an avocado so far. Most of the heavy work has been done during the cooler months leaving some paving to be finished.







PLANS COURTESY OF PARKWOOD HOMES

The ponds also had to be finished and stocked with weed and fish I brought with me from Cooranbong. I now have a resident pair of wood ducks and a couple of generations of frogs (at least two species). Where the ground had been dug over for services, the clay was exposed so I managed to acquire two large truckloads of mulch (for nothing) and I have spread it thickly wherever it's needed. My ideal landscaping does not include lawns; I am happy to have a natural landscape I can walk around in where I can observe native fauna and flora.

I watch conventional construction taking place around me; it seems to take a very long time to build a house and I don't see how I could have afforded to do it any other way. I made one move rather than having to rent for up to a year while the building took place. I can't imagine that many people can afford to build a new house before selling the one they occupy. For me the building process took barely two months despite Christmas coming in the middle of it.

A modular building proved to be the perfect solution in my particular situation. ■

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• **Parkwood Homes**

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02 4340 4077, www.parkwoodhomes.com.au

• **Bush & Beach**

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• **Hunter Organic Growers Society**

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www.hunterorganicgrowerssociety.org.au

My wish list:

- Gas-boosted solar water heating.
- *Sun Lizard* solar-powered ventilation to draw cool air from under the house to the interior during the summer.
- Increase rainwater storage by 20,000 litres and connect the washing machine and shower.
- Photo-voltaic cells on the roof to generate direct-to-grid electricity.
- A device to recirculate the cold water I have to run off from a tap before the hot water comes through.
- More fruit and nut trees, including a finger lime, kiwi fruit, grapes, macadamia and pecan.
- A shed for storing firewood.
- A permanent place for raising seedlings etc.
- Naturalise flannel flowers and Christmas bells on-site (they were endemic in the area at one time).
- Install drip irrigation throughout the vegetable beds along with a sunshade device.