



1 A modern interpretation on infill in Sydney. This terrace's footprint is just 69 square metres.

# Sydney infill

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PHOTOGRAPHY Aimee Crouch

**ARCHITECTURE@ALTITUDE HAVE MADE THE MOST OF** limited space to build a light-filled and compact two-storey inner-urban home in Glebe, Sydney.

A modern rendering of a traditional terrace house, it emphasises durability through the primary use of brick, concrete and steel. The home is designed for passive solar energy with eaves and perforated aluminium shading controlling the seasonal entry of sunshine. Ventilation is a key element of the design to mitigate Sydney's warm and humid climate: windows are positioned for effective cross-ventilation, rotary (whirlybird) roof ventilators and slotted soffit eaves help keep the home cool in summer. A ventilation tower also draws cool air up through the building to create internal air movement.

Clever design elements include a stair balustrade beside the kitchen that doubles as storage and provides a warming contrast to the concrete floor and painted brick walls, and an

upper-level narrow deck that gives ample room for clothes drying and privacy.

The house addresses a number of sustainability issues the firm has been working on for some time, explains architect Hamish Holley. Sustainable design should be about pragmatic responses that are cost effective and within everybody's reach, he adds.

With this approach in mind, the walls of the two-bedroom plus study home are insulated with R2.0 batts and foil-backed sarking. The ceiling is also insulated with R2.0 batts and an air gap. Rainwater tanks collect roof water to be reused to flush toilets, wash clothes and water the garden. Surface water is directed towards the garden. Other environmental features include the insulation of the concrete slab with recycled polystyrene, recycled brick courtyard paving and joinery made from E0 (low formaldehyde emissions) plywood finished with natural plant oils. 5



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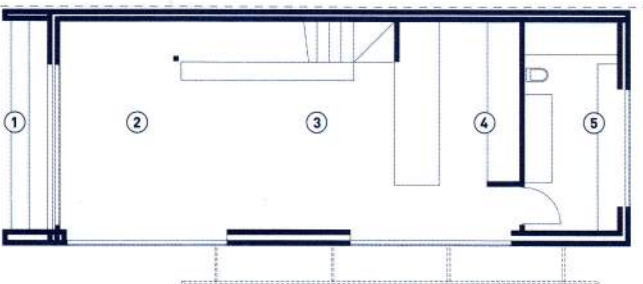
**"We resolved to build small, like buildings from the 1950s that have an economy combined with an optimistic generosity of spirit."**

Architect Hamish Holley

#### FLOOR PLAN



#### UPPER LEVEL



#### LOWER LEVEL

#### LEGEND

- ① Courtyard
- ② Living
- ③ Dining
- ④ Kitchen
- ⑤ Laundry/WC
- ⑥ Bedroom
- ⑦ Bathroom
- ⑧ Study
- ⑨ Stairs
- ⑩ Deck

# Glebe house

## —Specifications

### Credits

#### DESIGN

Virginia Wong See & Hamish Holley,  
Architecture@Altitude

#### ENGINEER

Damian Hadley, Cantilever Engineers

#### BUILDER

Hamish Holley

#### PROJECT TYPE

New build

#### PROJECT LOCATION

Glebe, Sydney

#### COST

Approx \$420,000

#### SIZE

House footprint 69 sqm, house area  
138 sqm, site 123 sqm

### Features

- Ground floor slab insulated with recycled polystyrene
- Perforated aluminium shading controls solar access to the west
- Cross-ventilation maximised through window positioning, slotted soffits and roof ventilators
- Walls are insulated with R2.0 batts and foil-backed sarking
- R1.6 foil-backed roofing blanket, ventilated ceiling cavity and R2.0 batts for the ceiling
- Rainwater tanks and water-efficient plumbing fixtures
- E0 plywood joinery is finished with Livos natural oils
- Recycled bricks used for courtyard paving.