

BASIX[®]Certificate

Building Sustainability Index www.basix.nsw.gov.au

Single Dwelling

Certificate number: 1064451S

This certificate confirms that the proposed development will meet the NSW government's requirements for sustainability, if it is built in accordance with the commitments set out below. Terms used in this certificate, or in the commitments, have the meaning given by the document entitled "BASIX Definitions" dated 06/10/2017 published by the Department. This document is available at www.basix.nsw.gov.au

Secretary

Date of issue: Thursday, 05 December 2019

To be valid, this certificate must be lodged within 3 months of the date of issue.



Project summary		
Project name	GJG - Shane & Christie O'neill	
Street address	8 Monash Parade Dee Why 2099	
Local Government Area	Northern Beaches Council	
Plan type and plan number	deposited 315635	
Lot no.	1	
Section no.	n/a	
Project type	separate dwelling house	
No. of bedrooms	6	
Project score		
Water	 40	Target 40
Thermal Comfort	 Pass	Target Pass
Energy	 52	Target 50

Certificate Prepared by

Name / Company Name: CHAPMAN ENVIRONMENTAL SERVICES PTY LTD

ABN (if applicable): 58601921108

Description of project

Project address

Project name	GJG - Shane & Christie O'Neill
Street address	8 Monash Parade Dee Why 2099
Local Government Area	Northern Beaches Council
Plan type and plan number	Deposited Plan 315635
Lot no.	1
Section no.	n/a

Project type

Project type	separate dwelling house
No. of bedrooms	6

Site details

Site area (m ²)	714
Roof area (m ²)	260
Conditioned floor area (m2)	293.5
Unconditioned floor area (m2)	18.1
Total area of garden and lawn (m2)	452

Assessor details and thermal loads

Assessor number	n/a
Certificate number	n/a
Climate zone	n/a
Area adjusted cooling load (MJ/m ² .year)	n/a
Area adjusted heating load (MJ/m ² .year)	n/a

Project score

Water	✓ 40	Target 40
Thermal Comfort	✓ Pass	Target Pass
Energy	✓ 52	Target 50

Schedule of BASIX commitments

The commitments set out below regulate how the proposed development is to be carried out. It is a condition of any development consent granted, or complying development certificate issued, for the proposed development, that BASIX commitments be complied with.

Water Commitments	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
Fixtures			
The applicant must install showerheads with a minimum rating of 3 star (> 6 but <= 7.5 L/min) in all showers in the development.		✓	✓
The applicant must install a toilet flushing system with a minimum rating of 4 star in each toilet in the development.		✓	✓
The applicant must install taps with a minimum rating of 4 star in the kitchen in the development.		✓	
The applicant must install basin taps with a minimum rating of 4 star in each bathroom in the development.		✓	
Alternative water			
Rainwater tank			
The applicant must install a rainwater tank of at least 3000 litres on the site. This rainwater tank must meet, and be installed in accordance with, the requirements of all applicable regulatory authorities.	✓	✓	✓
The applicant must configure the rainwater tank to collect rain runoff from at least 100 square metres of the roof area of the development (excluding the area of the roof which drains to any stormwater tank or private dam).		✓	✓
The applicant must connect the rainwater tank to: - all toilets in the development - the cold water tap that supplies each clothes washer in the development - at least one outdoor tap in the development (Note: NSW Health does not recommend that rainwater be used for human consumption in areas with potable water supply.)		✓ ✓ ✓	✓ ✓ ✓

Thermal Comfort Commitments	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
General features			
The dwelling must not have more than 2 storeys.	✓	✓	✓
The conditioned floor area of the dwelling must not exceed 300 square metres.	✓	✓	✓
The dwelling must not contain open mezzanine area exceeding 25 square metres.	✓	✓	✓
The dwelling must not contain third level habitable attic room.	✓	✓	✓
Floor, walls and ceiling/roof			
The applicant must construct the floor(s), walls, and ceiling/roof of the dwelling in accordance with the specifications listed in the table below.	✓	✓	✓

Construction	Additional insulation required (R-Value)	Other specifications
floor - concrete slab on ground	nil	
external wall - framed (weatherboard, fibre cement, metal clad)	2.00 (or 2.40 including construction)	
ceiling and roof - flat ceiling / pitched roof	ceiling: 3.45 (up), roof: foil backed blanket (55 mm)	3 wind-driven ventilator(s) + eave vents; medium (solar absorptance 0.475-0.70)

Note	• Insulation specified in this Certificate must be installed in accordance with Part 3.12.1.1 of the Building Code of Australia.
Note	• In some climate zones, insulation should be installed with due consideration of condensation and associated interaction with adjoining building materials.

Thermal Comfort Commitments	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
Windows, glazed doors and skylights			
The applicant must install the windows, glazed doors and shading devices described in the table below, in accordance with the specifications listed in the table. Relevant overshadowing specifications must be satisfied for each window and glazed door.	✓	✓	✓
The dwelling may have 1 skylight (<0.7 square metres) which is not listed in the table.	✓	✓	✓
The following requirements must also be satisfied in relation to each window and glazed door: - For the following glass and frame types, the certifier check can be performed by visual inspection. - Aluminium single clear - Aluminium double (air) clear - Timber/uPVC/fibreglass single clear - Timber/uPVC/fibreglass double (air) clear - Overshadowing buildings/vegetation must be of the height and distance from the centre and the base of the window and glazed door, as specified in the 'overshadowing' column.	✓	✓	✓ ✓
	✓	✓	✓

Window/glazed door no.	Maximum height (mm)	Maximum width (mm)	Type	Shading Device (Dimension within 10%)	Overshadowing
North facing					
W05	1500	2700	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	>4 m high, 2-5 m away
W06	1500	900	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	>4 m high, 2-5 m away
W07	900	1600	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	>4 m high, 2-5 m away
W08	900	2400	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	>4 m high, 2-5 m away
W18	600	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	2-4 m high, 2-5 m away
W19	600	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	2-4 m high, 2-5 m away

Window/glazed door no.	Maximum height (mm)	Maximum width (mm)	Type	Shading Device (Dimension within 10%)	Overshadowing
W21	1000	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	2-4 m high, 2-5 m away
W22	1000	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	2-4 m high, 2-5 m away
East facing					
W04	1800	600	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
D02	2100	1690	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
W03	1800	600	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
D01	2100	1690	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
W02	1800	600	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
W01	1800	600	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
W16	1800	900	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
D05	2400	6250	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
W17	1800	900	aluminium, single, clear	eave 3245 mm, 640 mm above head of window or glazed door	not overshadowed
W20	1400	600	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
South facing					
W11	600	1500	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W12	1200	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W13	900	600	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed

Window/glazed door no.	Maximum height (mm)	Maximum width (mm)	Type	Shading Device (Dimension within 10%)	Overshadowing
W14	1200	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W15	900	600	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W26	900	1200	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W27	900	600	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W28	600	1800	aluminium, single, clear	eave 600 mm, 1440 mm above head of window or glazed door	not overshadowed
W29	600	1800	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
West facing					
D04	2100	3600	aluminium, single, clear	eave 3045 mm, 640 mm above head of window or glazed door	not overshadowed
W9	900	600	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W10	1200	2200	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	1-2 m high, <1.5 m away
W23	1200	2700	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W24	1200	1200	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed
W25	1200	1200	aluminium, single, clear	eave 600 mm, 640 mm above head of window or glazed door	not overshadowed

Energy Commitments	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
Hot water			
The applicant must install the following hot water system in the development, or a system with a higher energy rating: gas instantaneous with a performance of 5 stars.	✓	✓	✓
Cooling system			
The applicant must install the following cooling system, or a system with a higher energy rating, in at least 1 living area: 1-phase airconditioning; Energy rating: EER 3.0 - 3.5		✓	✓
The applicant must install the following cooling system, or a system with a higher energy rating, in at least 1 bedroom: 1-phase airconditioning; Energy rating: EER 3.0 - 3.5		✓	✓
The cooling system must provide for day/night zoning between living areas and bedrooms.		✓	✓
Heating system			
The applicant must install the following heating system, or a system with a higher energy rating, in at least 1 living area: 1-phase airconditioning; Energy rating: EER 3.0 - 3.5		✓	✓
The applicant must install the following heating system, or a system with a higher energy rating, in at least 1 bedroom: 1-phase airconditioning; Energy rating: EER 3.0 - 3.5		✓	✓
The heating system must provide for day/night zoning between living areas and bedrooms.		✓	✓
Ventilation			
The applicant must install the following exhaust systems in the development:			
At least 1 Bathroom: individual fan, ducted to façade or roof; Operation control: manual switch on/off		✓	✓
Kitchen: individual fan, ducted to façade or roof; Operation control: manual switch on/off		✓	✓
Laundry: natural ventilation only, or no laundry; Operation control: n/a		✓	✓
Artificial lighting			
The applicant must ensure that the "primary type of artificial lighting" is fluorescent or light emitting diode (LED) lighting in each of the following rooms, and where the word "dedicated" appears, the fittings for those lights must only be capable of accepting fluorescent or light emitting diode (LED) lamps:			
at least 7 of the bedrooms / study; dedicated		✓	✓

Energy Commitments	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
• at least 3 of the living / dining rooms; dedicated • the kitchen; dedicated • all bathrooms/toilets; dedicated • the laundry; dedicated • all hallways; dedicated		    	    
Natural lighting			
The applicant must install a window and/or skylight in the kitchen of the dwelling for natural lighting.			
The applicant must install a window and/or skylight in 4 bathroom(s)/toilet(s) in the development for natural lighting.			
Other			
The applicant must install a gas cooktop & electric oven in the kitchen of the dwelling.			
The applicant must construct each refrigerator space in the development so that it is "well ventilated", as defined in the BASIX definitions.			
The applicant must install a fixed outdoor clothes drying line as part of the development.			

Legend

In these commitments, "applicant" means the person carrying out the development.

Commitments identified with a  in the "Show on DA plans" column must be shown on the plans accompanying the development application for the proposed development (if a development application is to be lodged for the proposed development).

Commitments identified with a  in the "Show on CC/CDC plans and specs" column must be shown in the plans and specifications accompanying the application for a construction certificate / complying development certificate for the proposed development.

Commitments identified with a  in the "Certifier check" column must be certified by a certifying authority as having been fulfilled, before a final occupation certificate (either interim or final) for the development may be issued.