



## **BUILDING CODE OF AUSTRALIA ASSESSMENT**

---

**I-MED Radiology Brookvale**  
660-664 Pittwater Road,  
Brookvale NSW 2100  
Lot 1 on DP877292

**Date:** 11<sup>th</sup> July 2024  
**Prepared for:** Y-Squared Pty Ltd

Date	Rev No	No. of Pages	Issue or Description of Amendment	Assessed By	Approved By	Date Approved
27.06.24	A	10	For Client Review	Danny Espulso	Paul Curjak	02.07.24
11.07.24	B	12	Update	Danny Espulso	Paul Curjak	11.07.24

#### Document Disclaimer

This document has been prepared solely for the use of our client in accordance with our current professional standards and as per our agreement for providing compliance consulting services. Although all due care has been taken in the preparation of this document, no warranty is given, nor liability accepted (except that required by law) in relation to the information contained within this document.

This document represents the opinions of McKenzie Group Consulting based on the facts and matters known at the time of preparation of this document. Opinions, judgments and recommendations detailed in this document, which are based on our understanding and interpretation of current statutory and regulatory obligations and standards, should not be construed as legal opinions.

## 1.0 INTRODUCTION

McKenzie Group (NSW) Pty Ltd have been engaged by Y-Squared Pty Ltd to undertake a Building Code of Australia Review of the existing tenancy for a proposed [medical centre](#) fit-out for I-MED Radiology Network - Brookvale, with consideration of the *State Environmental Planning Policy (Exempt and Complying Codes) 2008 (note 1) and BCA*.

The site is located on the ground floor, 660-664 Pittwater Road, Brookvale NSW 2100, and will consist of the internal fitout to part of the ground floor and the establishment of a [medical centre](#) and Tenancy T2 cold shell.

This report is based upon a review of the design documentation listed in Appendix A of this Report. The report is intended as an overview of the relevant provisions of the Building Code of Australia and relevant State Environmental Planning Policies.

**Please Note:** *The purpose of this report is a BCA report for a DA application, not a CDC.*

The following information/documentation will be required for further review by the Registered Certifier:

No.	Items for review	Responsibility
1.	Modified Fire Services design documentation	Applicant
2.	Modified Mechanical Ventilation design documentation	Applicant
3.	Exit/Directional Signs and Emergency Layout	Applicant
4.	Energy Efficiency	Applicant
5.	Fire Hazard Properties	Applicant
6.	Annual Fire Safety Statement	Applicant
7.	Modified Accessible Sanitary Compartment	Applicant

### 1.1 Current Legislation

The applicable legislation governing the design of buildings is the Environmental Planning and Assessment Act 1979. This Act requires that all new building works must be designed to comply with the BCA.

The version of the BCA applicable to the development, is version that in place at the time of the application to the Certifying authority for the Complying Development Certificate [or Construction Certificate](#). For the purposes of this Report, BCA 2022 has been utilised as the version of the BCA applicable at the time of preparation this Report.

## 2.0 PRELIMINARIES

### 2.1 Building Assessment Data

For the purpose of the BCA, the building works have been assessed as follows:

Part of Project	
Classification	5
Building Use	Office / <a href="#">Medical Centre</a>
Floor area of Part	Tenancy T1 - Approx. 873m <sup>2</sup> Tenancy T2 – Approx. 414m <sup>2</sup>
Affected Storey	Groud Floor

## 2.2 Structural Provisions (BCA B1)

Any new structural works are to comply with the applicable requirements of AS/NZS 1170.1.

- Following the review of the plans provided it does not appear that any structural works are proposed as part of the scope

Following the confirmation received: 09/07/2024 – Y Squared Pty Ltd – No Structural Works are proposed as part of the scope of works.

## 3.0 FIRE PROTECTION

### 3.1 Fire Hazard Properties (BCA C2D11)

The fire hazard properties of fixed surface linings and mechanical ductwork will also need to be addressed within the detailed documentation phase pursuant to specification C2D11 Building Code of Australia.

- **Please provide fire test reports for all floors, walls, ceiling linings and rigid / flexible air handling ductwork for review and assessment prior to the issuance of the [construction certificate \(CC\)](#).**

### 3.2 Separation of Equipment (BCA C3D13)

Battery systems or UPS Batteries (a battery system) being installed as part of the works must not exceed to following parameters; or they are required to be separated from the remainder of the building via construction achieving an FRL of not less than 120/120/120 FRL:

- A total voltage of 12 volts or more; and
- A storage capacity of 200kWh or more.

Following the confirmation received: 09/07/2024 – Y Squared Pty Ltd – UPS Batteries exceeding the allowable specifications above are not proposed as part of the scope of works.

### 3.3 Openings in Floors & Ceilings for Services & Openings for Services Installations (BCA C4D13 & C4D15)

All services penetrating a building required to have a fire resistance level (FRL) must be passive fire treated in accordance with **Part C4D15**. All Tested System details must be provided.

**Please Note:** From 1<sup>st</sup> May 2022 test reports must reference the current version of AS1530.4 & AS4072 in lieu of the older versions.

**Please provide supporting documentation for the proposed tested systems being utilised; alternatively this may form as part of the conditions of the [construction certificate \(CC\)](#).**

## 4.0 EGRESS PROVISIONS

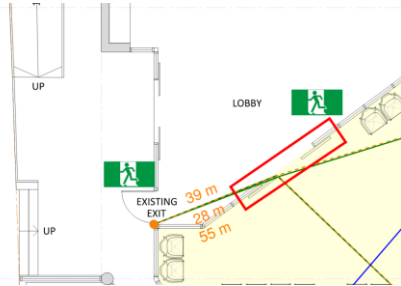
### 4.1 Provisions for Escape (BCA D1)

The egress provisions from the existing tenancy are provided by:

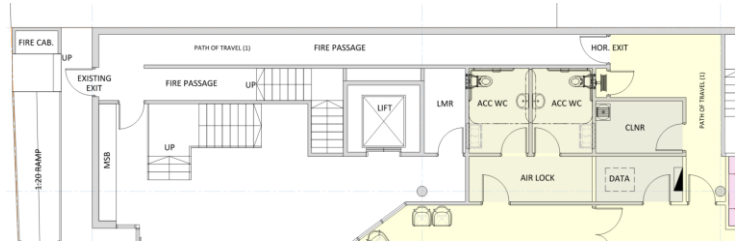
- The swing door providing egress from the lobby area; and/or
- Via the rear fire isolated passageway.

Following the above, it can be confirmed that compliance appears to be demonstrated.

#### Tenancy T1:

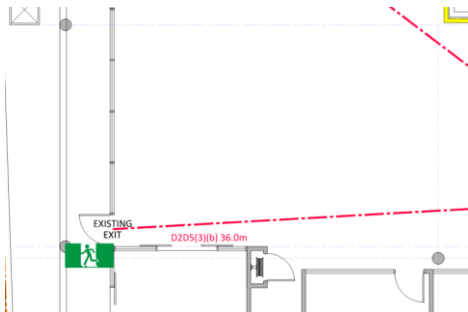


Front Lobby Entrance

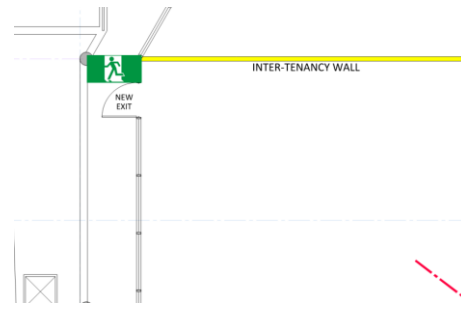


Rear Fire Isolated Passageway

#### Tenancy T2:



Front Lobby Entrance



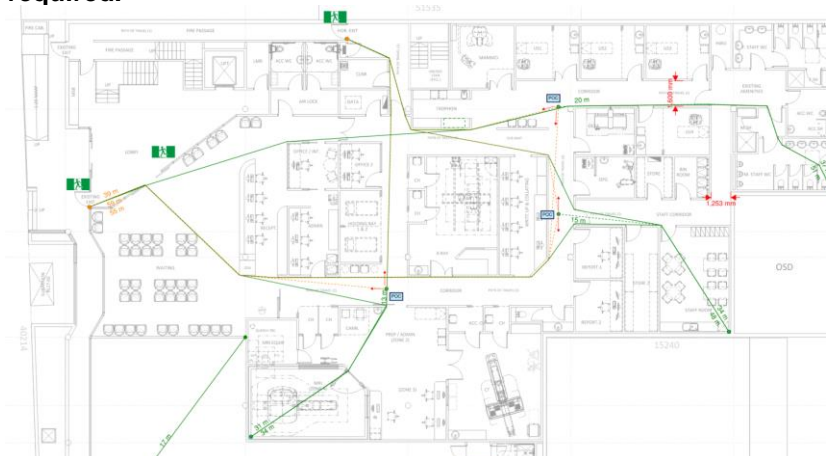
Front Lobby Entrance

### 4.2 Exit Travel Distances & Distances between Alternative Exits (BCA D2D5 & D2D6)

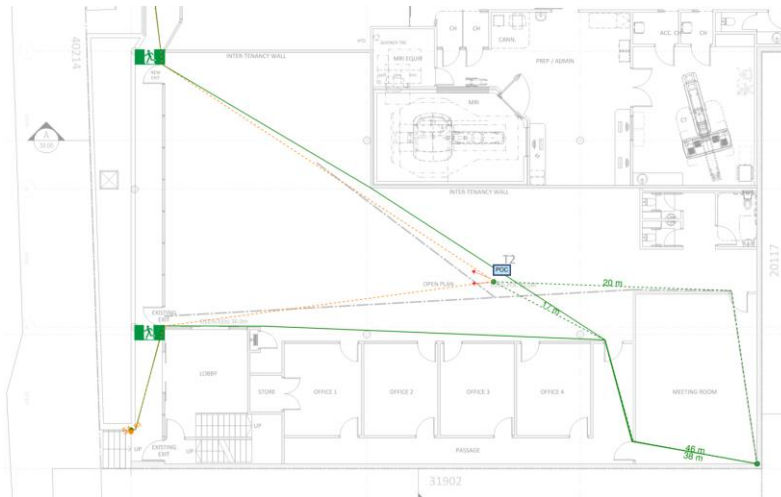
The travel distances to exits should not exceed:

- 20m to a single exit or point of choice and where two exits are provided, a maximum of 40m to one of those exits; and
- Exits shall be located to be not more than 60m apart and not closer than 9m

Following the review of the plans provided the proposed layout appears to demonstrate compliance – No further action required.



### Tenancy T1



### Tenancy 2

#### 4.3 Width of Exits & Paths of Travel to Exits (BCA D2D8)

The required exit or path of travel to an exit:

- The unobstructed width between of a path of travel to an exit should not diminish further than 1000mm.
- The total aggregate unobstructed width of the required exit (the two existing Fire-isolated exits) will affect the total population number for the whole storey including the 'Other Tenancy'.

**Following the review of the plans provided the proposed layout appears to demonstrate compliance – No further action required.**

#### 4.4 Operation of latch (BCA D3D26)

A door in a required exit, forming part of a required exit or in the path of travel to a required exit must be readily openable without a key from the side that faces a person seeking egress.

- **Please provide a door schedule for further review and assessment and to ensure compliance is achieved.**

*Alternatively, please confirm if this item is to be conditioned within the [construction certificate \(CC\)](#).*

## 5.0 ACCESS FOR PEOPLE WITH DISABILITIES

### 5.1 General Building Access Requirements (BCA D4D2)

Access for people with disabilities shall be provided to and within the building in accordance with the requirements of Clause D4D3, D4D4 and D4D5 of the BCA 2022. Parts of the building required to be accessible shall comply with the requirements of:-

- AS1428.1-2009 General Requirements for Access – New Building Work;
- AS1428.4-2009 Tactile Ground Surface Indicators

Access for persons with a disability is to be provided as follows:-

- To and within all areas normally used by the occupants

Following the review of the plans provided it can be confirmed that the proposed fit-out plans indicate that compliance with the provisions of BCA Part D4 generally appear to be achieved.

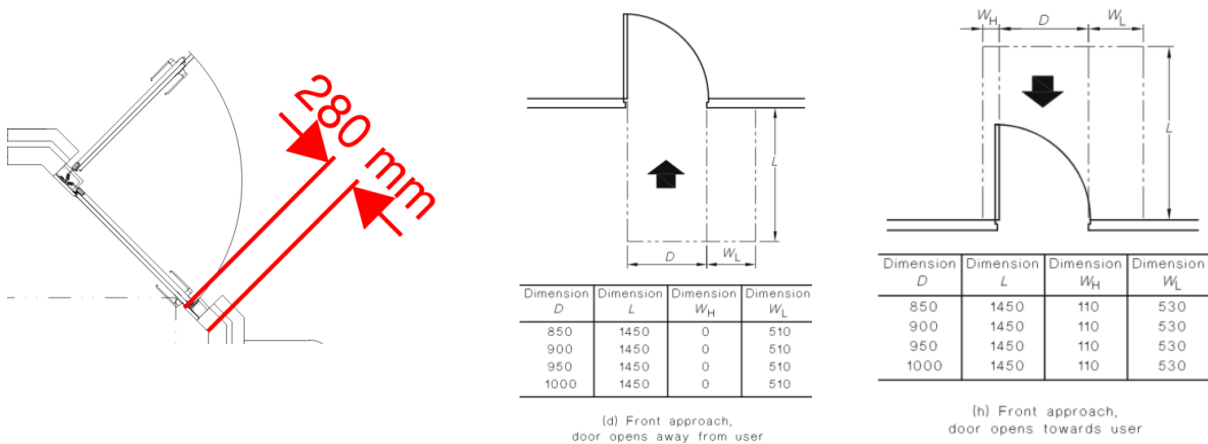
Further assessment is to be carried out by the Registered Certifier for details pertaining to fixtures, fittings, amenities fitout and colour contrasting etc.

**The nature of the space (office premises) requires a fully accessible path of travel to and within all areas used by building occupants.**

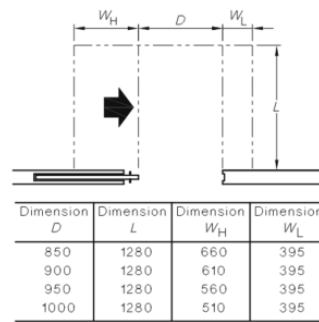
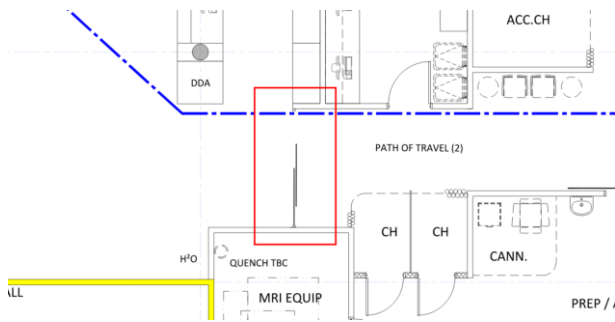
**The nature of the space (medical centre) requires a fully accessible path of travel to and within all areas used by building occupants, except where clause D4D5 is permissible and the area is not required to be accessible.**

Following the review of the plans provided the following accessible issues have been identified:

- The door circulation spaces provided to the MRI Room within Tenancy T1 does not achieve compliance with AS1428.1-2009 as a latchside clearance of not less than 530mm on approach and/or 510mm upon exit from the room does not appear to be provided:



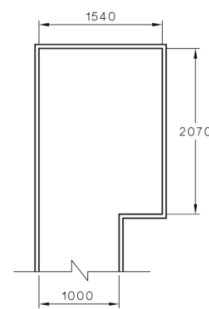
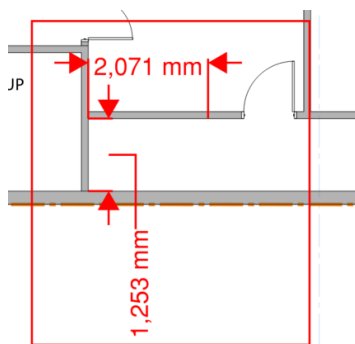
- The sliding door providing access through the centre of Tenancy T1 does not appear to be provided with sliding door circulation spaces in accordance with AS1428.1-2009 – [Following the confirmation received: 09/07/2024 – Y Squared Pty Ltd – It is acknowledged that this sliding door is proposed as being a power operated door; therefore, compliance appear to be demonstrated.](#)



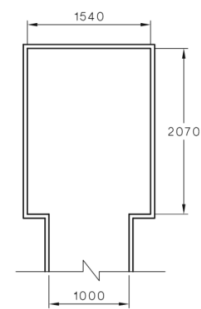
Dimension D	Dimension L	Dimension W <sub>H</sub>	Dimension W <sub>L</sub>
850	1280	660	395
900	1280	610	395
950	1280	560	395
1000	1280	510	395

(a) Slide-side approach

- c) The passageway at the rear of Tenancy T2 does not appear to facilitate a person in a wheel chair means of completing a 180 degree turn at the end of the corridor in accordance with AS1428.1-2009 as a circulation space of 1,540mm x 2,070mm does not appear to be provided:



(a) Space required in corridor



(b) Space required in corridor

Following the confirmation received: 09/07/2024 – Y Squared Pty Ltd – it is understood that this corridor is existing; therefore, providing no works are proposed to this corridor, it can remain 'Status Quo'.

## 5.2 Signage (BCA D4D7)

In a building required to be accessible, braille and tactile signage complying with Specification 15 and AS1428.1-2009 is required to be provided to the following locations:

- All toilets (Male/Female/Disabled/Ambulant)
- Required exit doors – displaying 'Exit' and which level the door is located (Level 1 etc.)

**Please provide signage specifications for further review and assessment to ensure compliance is achieved; alternatively, this item will form as a condition of the [construction certificate \(CC\)](#).**

## 5.3 Glazing on Accessways (BCA D4D13)

On an accessway, a **Solid** (opaque) 75mm glazing motif/glazing decal must be provided that is located between 900mm and 1,000mm above the FFL and extends for the full width of the glazing.

All glazing motif/decals proposed are required to achieve a luminance contrast of not less than 30% when viewed against a floor surface within 2m of the glazing.

**Please Note:** Frosted glazing motif/decals do not achieve compliance as they are not deemed to be opaque.

**Please provide a signage specification for further review and assessment to ensure compliance is achieved; alternatively, this will form as part of the conditions of the [construction certificate \(CC\)](#).**

## 5.4 AS1428.1-2009 – Clause 13.1

All doorways must have a luminance contrast of 30% provided between the following:

- Door Leaf & Door Jamb; OR
- Door Leaf & Adjacent Wall; OR



- c) Architrave & Wall; OR
- d) Door Leaf & Architrave; OR
- e) Door Jamb & Adjacent Wall.

The minimum width of the area of luminance contrast must be not less than 50mm.

**Please provide a signage specification for further review and assessment to ensure compliance is achieved; alternatively, this will form as part of the conditions of the [construction certificate \(CC\)](#).**

## 6.0 FIRE SERVICES AND EQUIPMENT

### 6.1 Fire Hydrants (E1D2)

Internal Fire Hydrant Coverage is required to be achieved in accordance with AS2419.1 via the following:

- A 45m hose – *If DtS Travel Distances (D2D5) are achieved; and/or*
- A 40m hose – *if Travel Distances exceed DtS (D2D5); and*
- Fire Hydrant Hose must enter all rooms not less than 1m.

Following the review of the plans provided, fire hydrant locations have not been provided within the plans; therefore, an assessment has not taken place for this aspect.

**It is anticipated that street hydrant coverage is proposed. A formal Sydney Water Pressure and Flow test is required to be obtained to confirm if this is capable of use.**

### 6.2 Fire Hose Reel (E1D3)

Fire Hose Reel Coverage is required to be achieved in accordance with AS2441 via the following:

- A 36m hose with a 6m spray; and
- Fire hose reel must enter all rooms not less than 1m.
- Coverage must not require the hose to pass through a fire or smoke wall.

Following the review of the plans provided, it can be confirmed that the fire hose reel coverages appear to achieve compliance throughout – **No further action is required.**

### 6.2 Fire Extinguisher (E1D14)

Portable fire extinguishers are required to be provided in accordance with Part E1D14 and AS2444.

**Please provide the proposed fire extinguisher locations; alternatively, this will form part of the conditions of the [construction certificate \(CC\)](#).**

### 6.3 Emergency Lighting Requirements & Design & Operation of Emergency Lighting (E4D2 & E4D4)

Emergency Lighting is required to be provided and maintained in accordance with AS/NZS 2293.1.

**Please provide electrical services plans and electrical certification prior to the issuance of the [construction certificate \(CC\)](#).**

### 6.4 Exit Signs & Direction Signs & Design & Operation of Exit Signs (E4D5 & E4D6 & E4D8)

Emergency Lighting is required to be provided and maintained in accordance with AS/NZS 2293.1.

**Please provide electrical services plans and electrical certification prior to the issuance of the [construction certificate \(CC\)](#).**

## 7.0 HEALTH & AMENITY

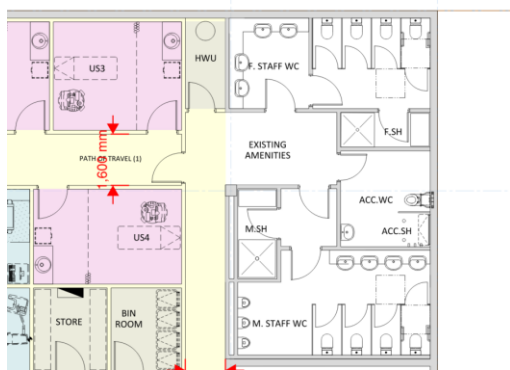
### 7.1 Wet Area Construction (F2D2)

Waterproofing of wet areas is required to be provided in accordance with Part F2D2, Specification 26 and AS3740.

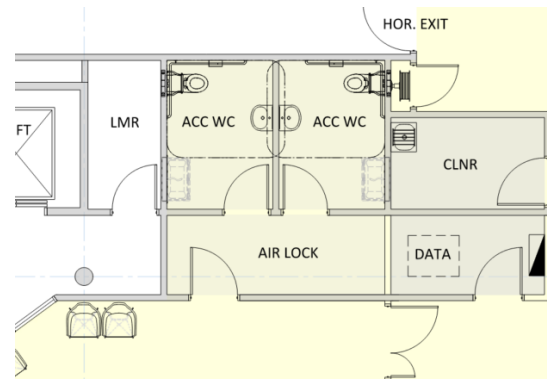
**Please Note:** Wet Areas for the purposes of the BCA include the following areas:

- Bathrooms
- Showers
- Laundries
- Sanitary Facility Compartments

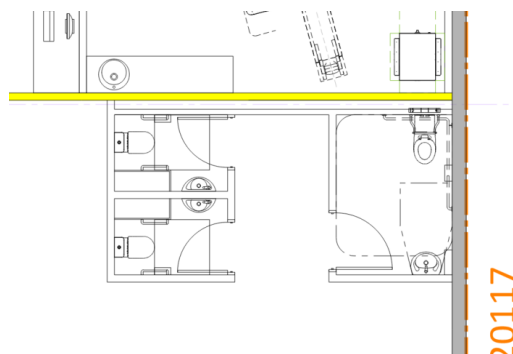
Following the review of the plans provided it appears that a number of sanitary facilities are proposed as part of the works:



Tenancy 1 – T1 – Existing Amenities



Tenancy 1 – T1 – New 'Non-Required' Facilities



Tenancy 2 – T2 – New Facilities

### 7.2 Calculation of Number of Occupants & Facilities & Facilities in Class 2-9 Buildings (F4D3 & F4D4)

Sanitary facilities must be provided in accordance with **Tables F4D4a to F4D4i** (Previously Table F2.3) as applicable.

The Tenancy 1 – T1 – Current floor plan is provided with existing male and female toilets. The number of the toilet fixtures together with the aggregate unobstructed exit widths will determine the number person accommodate for the entire floor.

User Group	Closet Pan	Urinals	Washbasins	Total
Male	4	3 (1 + Accessible Sanitary Closet Pan)	3	80 M
Female	4	--	4	60 F

Following the above, it is identified that the current number of sanitary facilities provides for a total occupancy of 80 Males and 60 Females with a Total Occupancy of up to 140 Occupants.

The Tenancy 2 – T2 – appears to be provided with a new bank of sanitary facilities. The number of the toilet fixtures together with the aggregate unobstructed exit widths will determine the number person accommodate for the entire floor.

User Group	Closet Pan	Urinals	Washbasins	Total
Male	2	--	2	20 M
Female	2	--	2	15 F

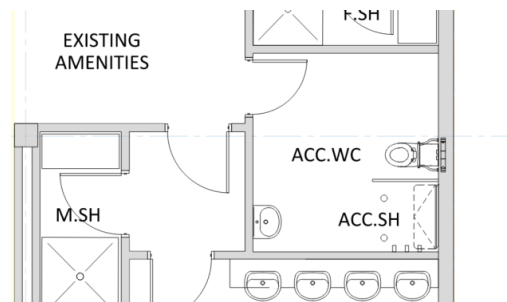
Following the above, it is identified that the current number of sanitary facilities provides for a total occupancy of 20 Males and 15 Females with a Total Occupancy of up to 35 Occupants.

### 8.0 Accessible Sanitary Facilities (BCA F4D5)

Where part of a building is required to be accessible, in Class 5, every storey containing a sanitary compartment is to be provided with an Accessible Sanitary facilities.

Under the State Environmental Planning Policy (SEPP) 2008 any works involving more than 500m<sup>2</sup> of floor area will require the existing Accessible Sanitary Compartment to be upgraded to meet the current requirements of AS1428.1-2009.

Following the review of the plans provided it appears that the fit-out plan does not indicate the existing dimensions of the sanitary compartment size or the installation of fixtures such as grab rails, washbasin and toilet seat. This item will need to be reviewed prior to issuing approval for construction ensuring meeting the requirements of AS1248.1-2009.



**Please provide detailed plans for further review and assessment to ensure compliance is achieved.**

## 9.0 Light and Ventilation (BCA Part F6)

### Class 5

All new artificial lighting must comply with AS/NZS1680.0-2009 and is to be incorporated with the final detailed design to be developed to confirm this.

Ventilation of a habitable room and other room occupied by a person for any purpose must have –

- (a) Natural ventilation complying with F4.6; or
- (b) Mechanical ventilation or air conditioning system complying with AS 1668.2 and AS/NZS 3666.1

The existing tenancy floor is provided with a mechanical ventilation system. For the proposed fit-out plans a modified mechanical ventilation layout is to be documented and endorsed by an appropriately qualified person in accordance with the Environmental Planning and Assessment Regulation 2000 and the Building and Development Certifiers Act 2020.

**Please provide mechanical services plans and mechanical services certification for further review and assessment to ensure compliance is achieved.**

## 10.0 ENERGY EFFICIENCY

The proposed development shall comply with Part J of the BCA.

The building can comply with the deemed-to-satisfy provisions of the BCA, relating to the following areas:

- Air Conditioning & Ventilation Systems (J5)
- Artificial Lighting & Power (J6)

**Please Note:** This is to be addressed by the design team where the above elements are affected.

Certification from the relevant Electrical and Mechanical designer shall be provided confirming compliance with Section J.

## 11. CONCLUSION

As per the submitted documentation referenced in Appendix A of the document, McKenzie Group (NSW) confirm that the proposed development is capable of achieving compliance with the BCA.

### Appendix A - Design Documentation

The following documentation was used in the assessment and preparation of this report:

Job/Drawing No.	Title	Revision	Prepared by
828-00.51	Site Plan	Issue 1	Y Squared Pty Ltd
828-10.01	Basement Plan Existing Conditions	Issue 1	Y Squared Pty Ltd
828-10.02	Ground Floor Plan Demolition	Issue 1	Y Squared Pty Ltd
828-10.03	First Floor Plan Existing Conditions	Issue 1	Y Squared Pty Ltd
828-10.10	Basement Plan – Option 1	Issue 1	Y Squared Pty Ltd
828-10.11	Ground Floor Plan – Lessee Fitout Works	Issue 1	Y Squared Pty Ltd
828-10.22	Ground Floor Plan GFA	Issue 1	Y Squared Pty Ltd
828-10.23	First Floor Plan GFA	Issue 1	Y Squared Pty Ltd
828-10.92	Ground Floor Plan NCC D2D5 & D2D6	Issue 1	Y Squared Pty Ltd