

BUILDING CODE OF AUSTRALIA COMPLIANCE ASSESSMENT REPORT

Proposed school building

Snowy Mountains Grammar School, Jindabyne

DATE ► 8/02/2021

REPORT NO. ► PROJECT 10878 - REV 3.0

PREPARED FOR ► Munns Sly Moore Architects

PREPARED BY ► AE&D



AEDGROUP

Innovation & expertise in building regulations

CONTENTS

1.0	EXECUTIVE SUMMARY AND RECOMMENDATIONS	3
1.1	RECOMMENDATIONS	3
2.0	INTRODUCTION	8
2.1	BASIS OF REPORT	8
2.2	PURPOSE OF THE REPORT.....	8
2.3	LIMITATIONS OF THE REPORT.....	8
3.0	BCA ASSESSMENT DATA	10
3.1	LOCATION OF FIRE SOURCE FEATURES	11
3.2	SUMMARY OF FIRE SERVICES REQUIRED.....	12
4.0	BCA ASSESSMENT SUMMARY	13
5.0	CONCLUSION	66
6.0	ATTACHMENT A - INSPECTION & MAINTENANCE	67
6.1	FIRE SAFETY MEASURES.....	67
6.2	GOOD HOUSEKEEPING	67
7.0	TYPE B FIRE-RESISTING CONSTRUCTION	68
8.0	SANITARY FACILITY CALCULATIONS	71

REVISION STATUS				
REVISION	DATE	STATUS	WRITTEN	CHECKED
10878 - Rev 1.0	16.12.20	DRAFT FOR COMMENT	BM	TJ
10878 - Rev 2.0	08.02.21	FINAL	BM	TJ
10878 - Rev 3.0	08.02.21	FINAL - UPDATED	BM	TJ

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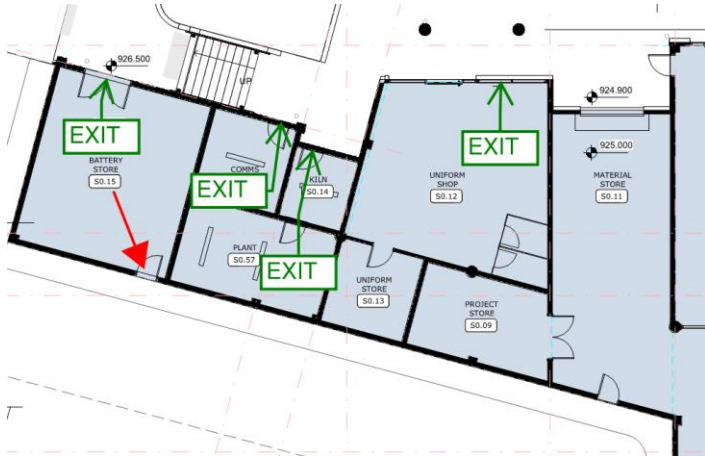
1.0 EXECUTIVE SUMMARY AND RECOMMENDATIONS

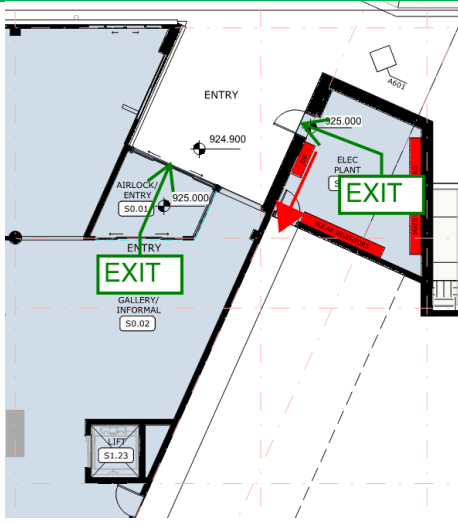
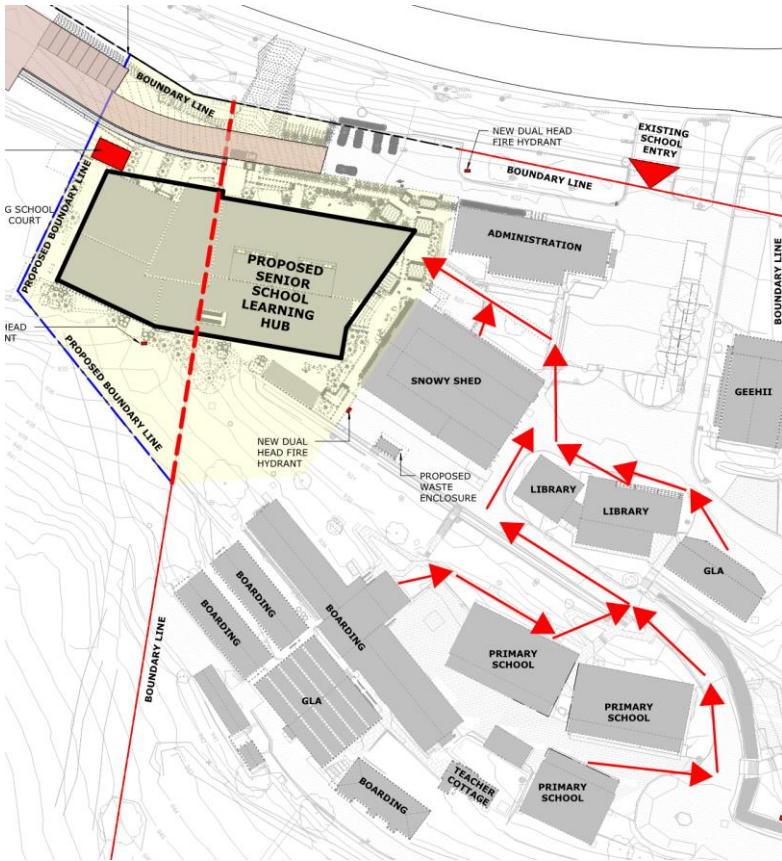
This report provides a Building Code of Australia (BCA) 2019 Amendment 1 assessment of the proposed school building and associated external works, to be located at Snowy Mountains Grammar School, 6339 Kosciuszko Rd, Jindabyne NSW.

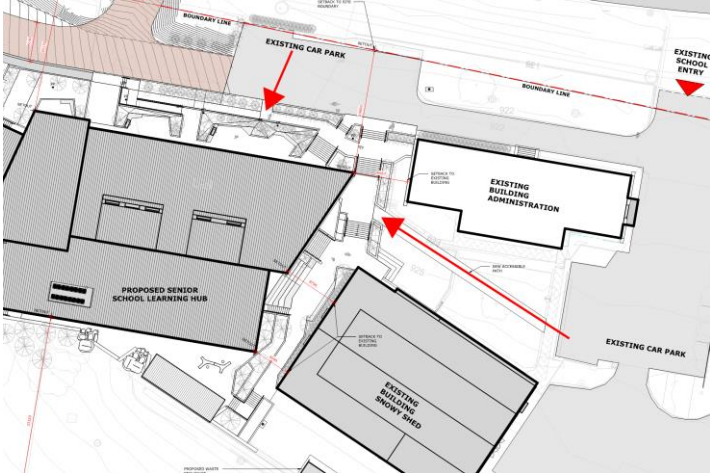
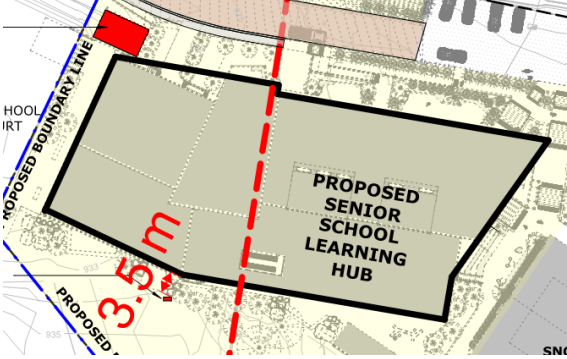
The primary purpose of this report is to identify the non-compliance matters contained in the proposed design against the current Deemed-to-Satisfy (DTS) **Provisions** of the BCA and to provide compliance recommendations to overcome the DTS non-compliances.

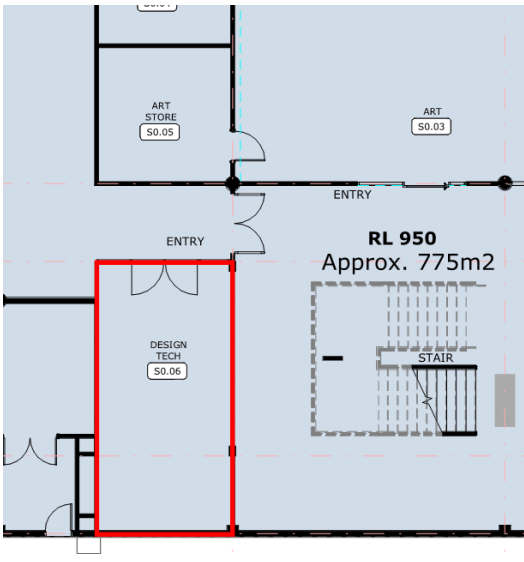
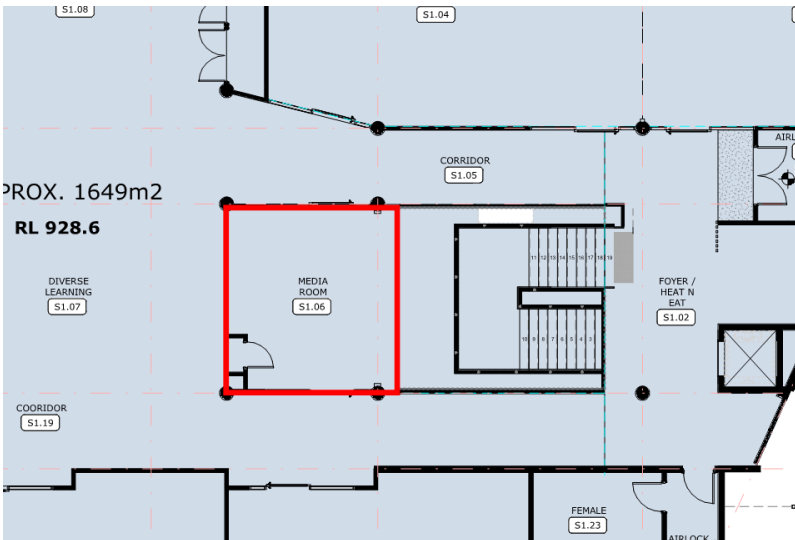
1.1 Recommendations

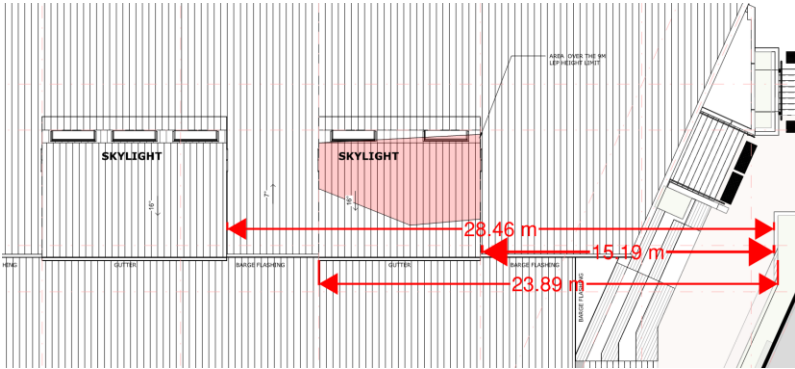
The following is a list of Deemed-to-Satisfy Provisions that should be addressed either by design amendments, additional information **OR** by way of an Alternative Solution:

BCA Clause	Deemed-to-Satisfy Provision to be addressed
D1.2 Number of Exits required	<p>Ground Floor</p> <ul style="list-style-type: none"> - Battery room – egress through the Spoon Drain area (red arrow in snapshot below) is required for access to a second access to comply with the DTS provisions. - Comms – only 1 exit is provided from the comms room. <i>It is recommended that this is addressed by a Fire Engineered Performance Solution</i> - Plant & Kiln – only 1 exit is provided from the comms room. <i>It is recommended that this is addressed by a Fire Engineered Performance Solution</i> - Uniform Store & Uniform Shop – only 1 exit is provided from the comms room. <i>It is recommended that this is addressed by a Fire Engineered Performance Solution.</i>  <ul style="list-style-type: none"> - Electrical plant – egress through the Spoon Drain area (red arrow in snapshot below) is required for access to a second access to comply with the DTS provisions.

BCA Clause	Deemed-to-Satisfy Provision to be addressed
	
<p>D3.2 Access to buildings</p>	<p>Confirmation is required that an accessway in accordance with AS 1428.1-2009 is provided from other accessible buildings on the allotment to assess compliance</p>  <p>Confirmation is required that accessible carparking spaces are located at the northern carpark to assess compliance.</p>

BCA Clause	Deemed-to-Satisfy Provision to be addressed																				
																					
D3.7 Hearing augmentation	As schools have an inbuilt amplification system (PA), a hearing augmentation system in accordance with this clause is required.																				
E1.3 Fire Hydrants	<p>The southern hydrant is located within 10 m of the building it is protecting which does not comply with Clause 3.2.2.1 of AS 2419.1-2005.</p> <p>Exact location and coverage for compliance is to be determined at CC stage.</p> 																				
F2.3 Facilities for Class 3 to 9 Buildings	<p>Refer to Part 8.0 of this report for details of sanitary compartments provided in the school.</p> <p>AED assessment.</p> <table><tr><th colspan="4">Staff (teachers)</th></tr><tr><th></th><th>CP</th><th>U</th><th>WB</th></tr><tr><td>Male – 20</td><td>1</td><td>4* 0</td><td>2* 1</td></tr><tr><td>Female - 20</td><td>2* 1</td><td>-</td><td>2* 1</td></tr><tr><td>Accessible</td><td>1</td><td></td><td></td></tr></table> <p>* In calculating the number of sanitary facilities, a unisex accessible sanitary compartment is counted once for each sex.</p> <p>Therefore, 1 accessible sanitary facility for use of the teachers is required to be provided. Please note, teachers and students are not permitted to share (F2.3(d)).</p>	Staff (teachers)					CP	U	WB	Male – 20	1	4* 0	2* 1	Female - 20	2* 1	-	2* 1	Accessible	1		
Staff (teachers)																					
	CP	U	WB																		
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Female – 125	6 5	-	4* 3																		
Accessible	1																				
F4.2 Methods and extent of natural lighting	<p>Ground – The Design Tech room is not provided with natural light in accordance with this clause.</p> <p>Please note borrowed natural light under F4.3 cannot be applied to Class 9b buildings.</p> <p><i>It is recommended this is addressed by a Performance Solution.</i></p> <div></div> <p>First Floor – The seminar room is not provided is not provided with natural light in accordance with this clause.</p> <div></div>																				

BCA Clause	Deemed-to-Satisfy Provision to be addressed
	<p>Please note the skylights are not provided to provide direct natural light to the Media Room and as borrowed light cannot be applied to Class 9b rooms, it is a DTS non-compliance.</p> <p><i>It is recommended this is addressed by a Performance Solution.</i></p> 

2.0 INTRODUCTION

This report provides a Building Code of Australia (BCA) 2019 Amendment 1 assessment of the proposed school building and associated external works, to be located at Snowy Mountains Grammar School, 6339 Kosciuszko Rd, Jindabyne NSW.

This report provides a BCA assessment table in Section 3.0 that summarises the identified non-compliance matters and offers specific recommendations.

2.1 Basis of Report

The key basis of this report is to address compliance with the Building Code of Australia (BCA) 2019. The scope of services is limited to Sections C – “Fire Resistance”, Section D – “Access & Egress”, Section E – “Services & Equipment”, Section F “Health and Amenity” and Section J “Energy Efficiency”

This report is based on a desktop assessment of the proposed plans, with specific reference to the following:

- Architectural plans prepared by Munns Sly Moore Architects – Project 4186, Drawing Numbers:

Drawing Title	Drawing No.	Revision	Dated
Master Plan	DA 007	1	08.02.21
Site Plan - Proposed	DA 008	1	08.02.21
Senior School – Ground	DA 009	1	08.02.21
Senior School – Level 1	DA 010	1	08.02.21
Senior School – Roof Plan	DA 011	1	08.02.21
Senior School – Elevations	DA 012	1	08.02.21
Senior School – Elevations	DA 013	1	08.02.21

- The Building Code of Australia 2019 Amendment 1, prepared by the Australian Building Codes Board.
- The Guide to the BCA 2019 Amendment 1, prepared by the Australian Building Codes Board.

2.2 Purpose of the Report

The purpose of this report is to assess the following:

- Assessment under the current Building Code of Australia 2019 Amendment 1 and list any departures from the BCA 2019 Amendment 1.
- Provide recommendations to address identified non-compliances, and/or identify potential alternative solutions

2.3 Limitations of the Report

This report does not assess the following:

- Access and facilities for people with disabilities is addressed however compliance with Disability Discrimination Act 1992 (DDA) is outside the scope of this report. It should be noted that BCA compliance does not necessarily meet the requirements of the Disability Discrimination Act (DDA).
- Reporting on hazardous materials, OH&S matters or site contamination
- Assessment of any structural elements or geotechnical matters relating to the building, including any structural or other assessment of the existing fire resistant levels of the building
- Consideration of any fire services operations (including hydraulic, electrical or other systems)
- Assessment of plumbing and drainage installations, including stormwater
- Assessment of mechanical plant operations, electrical systems or security systems

- Heritage significance
- Consideration of energy or water authority requirements
- Consideration of Council's local planning policies
- Environmental or planning issues
- Requirements of statutory authorities
- Pest inspection or assessment building damage caused by pests (general/visual pest invasion or damage will be reported, however invasive or intrusive inspections have not been carried out)
- Sections G, H or I of the BCA are not considered.
- Provision of any construction approvals or certification under Part 4A or Part 5 of the Environmental Planning & Assessment Act 1979.
- Glazing, shading, lighting calculations and the like required by Section J of the BCA not been carried out
- This assessment excludes BCA clauses D3.0-3.12 (Inclusive), E3.6 and F2.4. Refer to separate access consultant's report.
- BCA 2019 Amendment 1 does not directly specify slip-resistance classification(s) for all *accessible paths of travel*; however, we highlight the need under AS 1428.1-2009 for all *accessible paths of travel* to have a slip-resistant surface. We recommend you should seek surface finish advice from an independent specialist slip safety consultant.

3.0 BCA ASSESSMENT DATA

The following data is provided in respect to review of the building under the Building Code of Australia 2019 in respect to the compliance assessment of the proposed school building and associated external works, to be located at Snowy Mountains Grammar School, 6339 Kosciuszko Rd, Jindabyne NSW.

BCA Building Classifications:	9b (assembly building)
Building rise in storeys:	2 (determined in accordance with C1.2 of the BCA).
Type of Construction:	B (determined in accordance with C1.1 of the BCA)
General Floor area limitations:	<5,500m ² ; and <33,000m ³
Effective Height (m):	3.6m (928.600 - 925.000)
Climate Zone (Thermal Design)	7 (determined in accordance with ABCB Climate Zone Map, dated Sep 2019)

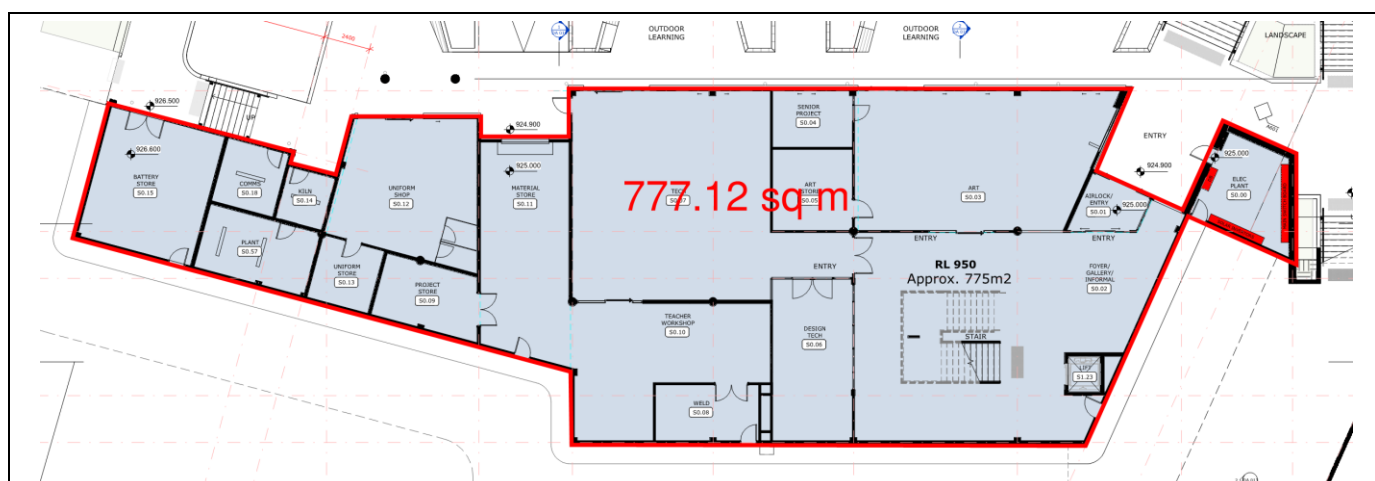


Figure 1: Ground Floor floor area

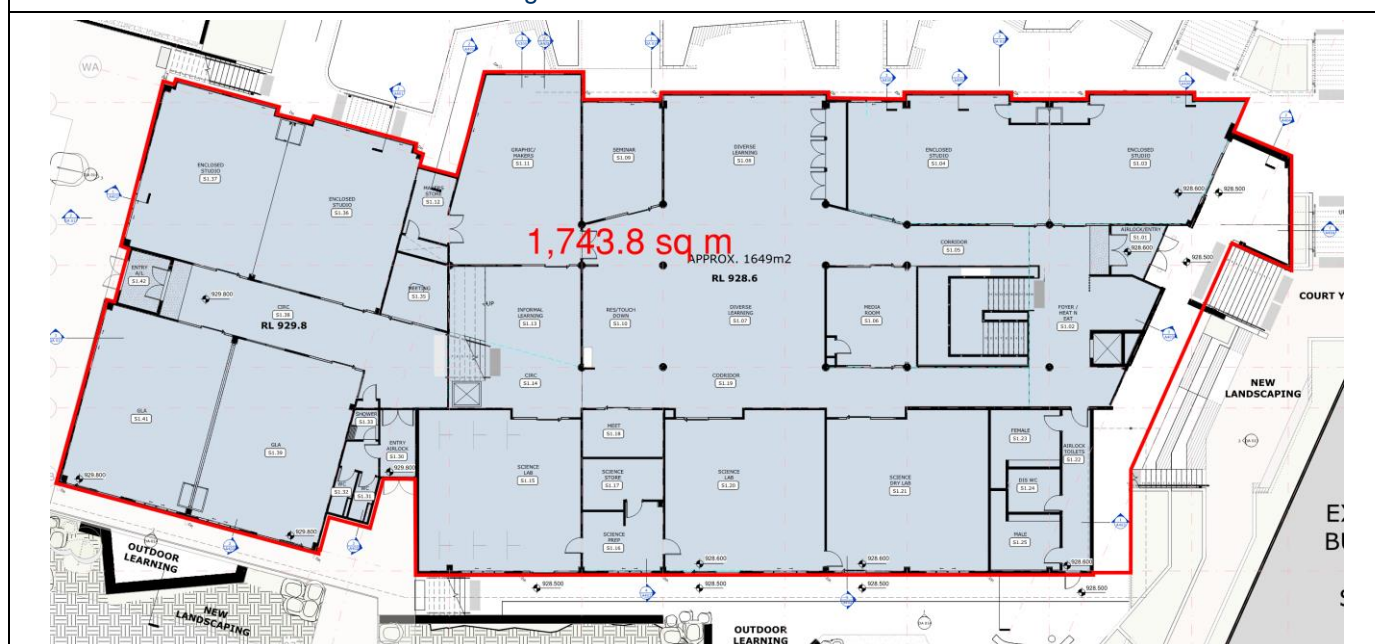
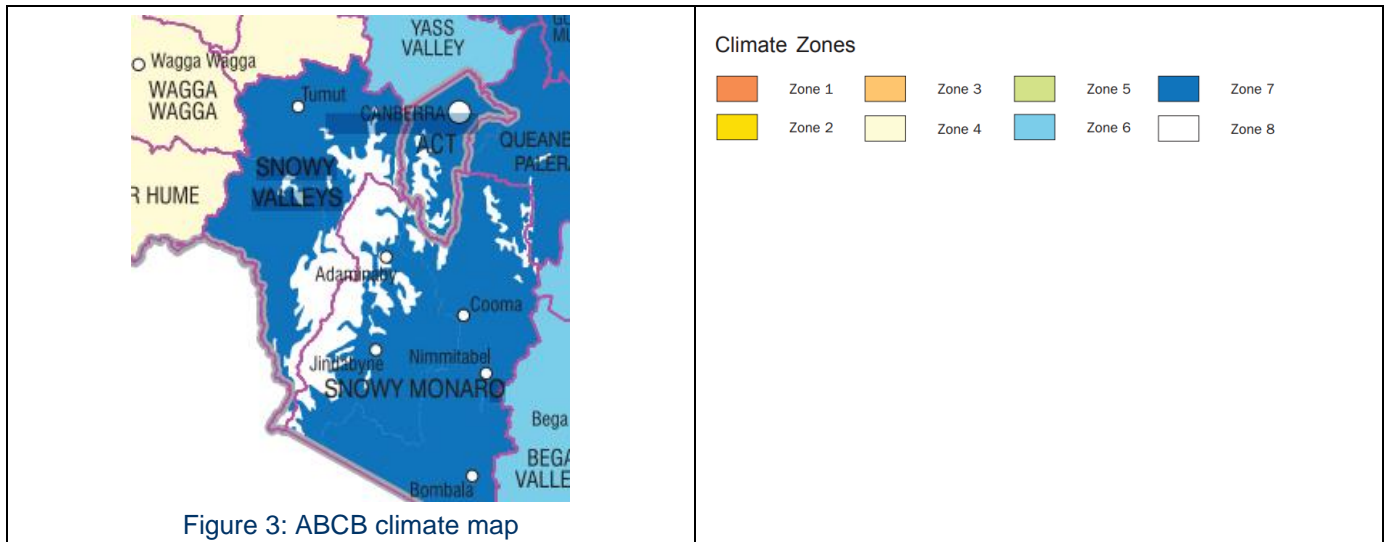


Figure 2: First Floor floor area

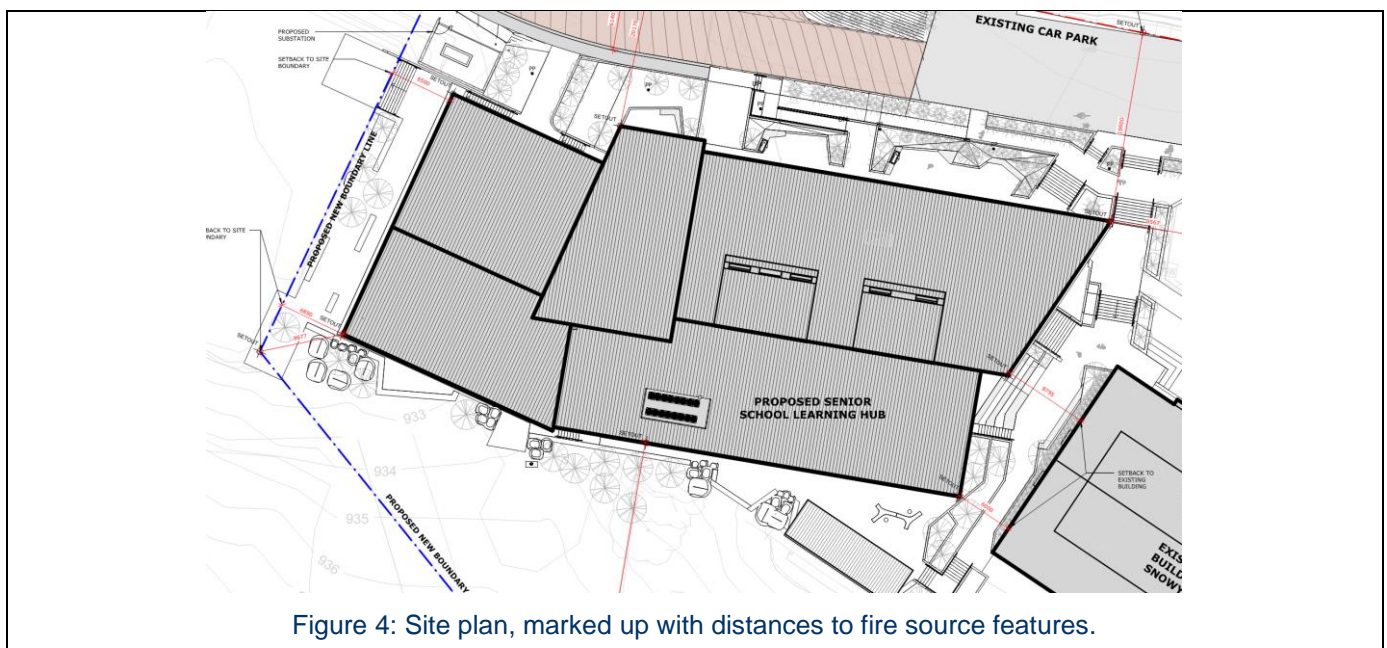


3.1 Location of Fire Source features

The potential *fire source features* to be considered for this building are the external wall of another building on the allotment which is not a Class 10 building, the side or rear of the allotment boundary or the far side of the road.

In this instance the following setbacks are determined in respect to the fire source features applicable to the building

- North – Far side of Kosciuszko Road, more than 6m.
- South – Proposed boundary line, more than 3m, being 8.6m.
- East – Snowy Shed and Administration, more than 6m, being 9m & 12m respectively.
- West – Proposed boundary line, more than 3m, being 8m.



3.2 Summary of Fire Services Required

Summarised below are the BCA deemed to satisfy fire services required for the building which has an effective height of more than 50m:

- Fire hydrants are required to serve all areas and be provided in accordance with BCA E1.3 and AS 2419.1-2005 as applicable to a building exceeding 50m in effective height.
- A fire hose reel system complying with BCA E1.4 and AS 2441-2005 must be provided to serve all areas other than class 3 SOUs. Note: FHR's no longer required to serve a Class 3 building, however additional fire extinguishers are required in all class 3 parts.
- Portable fire extinguishers must be provided in accordance with BCA E1.6 & Table E1.6 and must be selected, located and distributed in accordance with Sections 1, 2, 3 and 4 of AS 2444-2001.
- An emergency lighting system must be installed throughout the building in accordance with BCA E4.2 of the BCA and AS 2293.1-2018.
- Exit signs must be installed throughout the building in accordance with BCA E4.5 and AS 2293.1-2018.

4.0 BCA ASSESSMENT SUMMARY

The following table details the BCA compliance of the assessed design.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
SPECIFICATION A1.1 FIRE PROTECTED TIMBER					
Specification A1.1 has been introduced to allow fire-protective timber construction utilising a non-combustible fire protective covering for buildings not exceeding 25m which are sprinkler protected.					
2.1 General requirements			X		Not applicable. No fire protected timber proposed.
2.2 Massive Timber			X		Not applicable. No fire protected timber proposed.
SECTION B STRUCTURE					
Part B1: Structural Provisions				X	<ul style="list-style-type: none"> ❖ Structural engineer to provide structural drawings/details and accompanying structural design certificate to demonstrate that all building elements will comply with Section B of the BCA. ❖ Glazing must comply with AS1288-2006 and AS2047-2014. ❖ Termite control must comply with AS3660.1-2000 where any primary building elements are timber. ❖ If the building is in a flood hazard area it is required to comply with BCA clause B1.6. <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification (and structural details)</i></p>
SECTION C FIRE RESISTANCE					
Part C1 - Fire Resistance & Stability					
C1.1 Type of Construction Required				X	<p>Refer to Spec C1.1 and Attachment B for Schedule of FRLs for Type B Construction. These are to be certified by the architect and structural engineer as having been met, based on the proposed design.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification (and structural details)</i></p>

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	Informational	NA or Required	COMMENTS
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Table 4 Type B construction: FRL of building elements

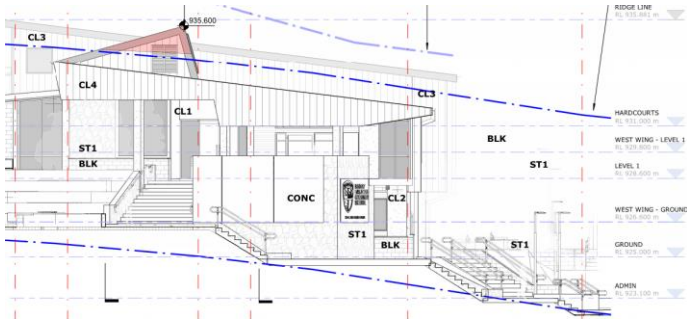

Building element	Class of building—FRL: (in minutes)			
	Structural adequacy/Integrity/Insulation			
		5, 7a or 9		
EXTERNAL WALL (including any column and other building element incorporated within it) or other external building element, where the distance from any <i>fire-source feature</i> to which it is exposed is—				
For <i>loadbearing</i> parts—				
less than 1.5 m		120/120/120		
1.5 to less than 3 m		120/ 90/ 60		
3 to less than 9 m		120/ 30/ 30		
9 to less than 18 m		120/ 30/—		
18 m or more		—/—/—		
For non- <i>loadbearing</i> parts—				
less than 1.5 m		—/120/120		
1.5 to less than 3 m		—/ 90/ 60		
3 m or more		—/—/—		
EXTERNAL COLUMN not incorporated in an <i>external wall</i> , where the distance from any <i>fire-source feature</i> to which it is exposed is—				
For <i>loadbearing</i> columns—				
less than 18 m		120/—/—		
18 m or more		—/—/—		
For non- <i>loadbearing</i> columns—				
For non- <i>loadbearing</i> columns—		—/—/—		
COMMON WALLS and FIRE WALLS—		120/120/120		
INTERNAL WALLS—				
<i>Fire-resisting</i> lift and stair <i>shafts</i> —				
<i>Loadbearing</i>		120/120/120		
<i>Fire-resisting</i> stair <i>shafts</i> —				
Non- <i>loadbearing</i>		—/120/120		
Bounding <i>public corridors</i> , public lobbies and the like—				
<i>Loadbearing</i>		120/—/—		
Non- <i>loadbearing</i>		—/—/—		
Between or bounding <i>sole-occupancy units</i> —				
<i>Loadbearing</i>		120/—/—		
Non- <i>loadbearing</i>		—/—/—		
OTHER LOADBEARING INTERNAL WALLS and COLUMNS—		120/—/—		
ROOFS		—/—/—		

C1.2 Calculation of Rise In Storeys			X		Refer to Section 2.0 of this report for further details
C1.3 Buildings of Multiple Classifications			X		Not applicable. Whole building is Class 9b only.
C1.4 Mixed Types of Construction			X		Not applicable. Type B only.
C1.5 Two Storey Class 2, 3 or 9c buildings			X		Not applicable. Not a Class 2, 3 or 9c building.
C1.6 Class 4 Parts			X		Not applicable. Not Class 4 proposed.
C1.7 Open Spectator Stands			X		Not applicable. No open spectator stands proposed



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
C1.8 Lightweight Construction			X		<p>(a) Where it is proposed to use <i>lightweight construction</i> (within the meaning of the BCA) this must comply with Specification C1.8 if it is used in a wall system—</p> <p>(i) that is required to have an FRL; or</p> <p>(ii) for a lift shaft, stair shaft or service shaft or an external wall bounding a public corridor including a non fire-isolated passageway or non fire-isolated ramp.</p> <p>(b) If lightweight construction is used for the fire-resisting covering of a steel column or the like, and if —</p> <p>(i) the covering is not in continuous contact with the column, then the void must be filled solid, to a height of not less than 1.2 m above the floor to prevent indenting; and</p> <p>(ii) the column is liable to be damaged from the movement of vehicles, materials or equipment, then the covering must be protected by steel or other suitable material.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
C1.9 Non - combustible building elements				X	<p>(a) In a building <i>required</i> to be of B construction, the following building elements and their components must be <i>non-combustible</i>:</p> <p>(i) External walls and <i>common walls</i>, including all components incorporated in them including the facade covering, framing and insulation.</p> <p>(ii) The flooring and floor framing of lift pits.</p> <p>(iii) <i>Non-loadbearing internal walls</i> where they are <i>required</i> to be <i>fire-resisting</i>.</p> <p>(b) A shaft, being a lift, ventilating, pipe, garbage, or similar shaft that is not for the discharge of hot products of combustion, that is non-loadbearing, must be of non-combustible construction in—</p> <p>(i) a building required to be Type B construction, subject C2.10, in-</p> <p>(A) a 9 building</p> <p>(c) A <i>loadbearing internal wall</i> and a <i>loadbearing fire wall</i>, including those that are part of a <i>loadbearing shaft</i>, must comply with Specification C1.1.</p> <p>(d) The requirements of (a) and (b) do not apply to gaskets, caulking, sealants, termite management systems, glass including laminated glass, thermal breaks associated with glazing systems, damp-proof courses.</p> <p>(e) The following materials may be used wherever a <i>non-combustible</i> material is <i>required</i>:</p> <p>(i) Plasterboard.</p> <p>(ii) Perforated gypsum lath with a normal paper finish.</p>



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(iii) Fibrous-plaster sheet.</p> <p>(iv) Fibre-reinforced cement sheeting.</p> <p>(v) Pre-finished metal sheeting having a <i>combustible</i> surface finish not exceeding 1 mm thickness and where the <i>Spread-of-Flame Index</i> of the product is not greater than 0.</p> <p>(vi) Sarking type materials that do not exceed 1mm in thickness and have a Flammability Index not greater than 5.</p> <p>(vii) Bonded laminated materials where—</p> <p>(A) each lamina, including any core, is <i>non-combustible</i>; and</p> <p>(B) each adhesive layer does not exceed 1 mm in thickness and the total thickness of the adhesive layers does not exceed 2mm; and</p> <p>(C) the <i>Spread-of-Flame Index</i> and the <i>Smoke-Developed Index</i> of the bonded laminated material as a whole do not exceed 0 and 3 respectively.</p> <p>The proposed cladding and all components incorporated in the external wall is required to be non-combustible.</p>   <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
C1.10 Fire Hazard Properties				X	<p>(a) The fire hazard properties of the following internal linings, materials and assemblies must comply with Specification C1.10 by way of test reports / certificates provided from a <i>registered testing authority</i> (within the meaning of the BCA):</p> <p>(i) Floor linings and floor coverings.</p> <p>(ii) Wall linings and ceiling linings.</p> <p>(iii) Air-handling ductwork.</p> <p>(iv) Lift cars.</p>



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<ul style="list-style-type: none">(vii) Sarking type materials.(viii) Attachments to floors, ceilings, internal walls and the internal linings of external walls.(ix) Other materials including insulation materials other than sarking type materials. <p>(c) The requirement s of (a) do not apply to a material or assembly if it is –</p> <ul style="list-style-type: none">(i) plaster, cement render, concrete, terrazzo, ceramic tile or the like; or(ii) a fire protective covering; or(iii) a timber framed window; or(iv) a solid timber handrail or skirting; or(v) a timber-faced door; or(vi) an electrical switch, socket-outlet, cover plate or the like; or(vii) a material used –<ul style="list-style-type: none">(A) a roof insulating material applied in continuous contact with a substrate; or(B) an adhesive; or(C) a damp-proof course, flashing, caulking, sealing, ground moisture barrier or the like; or(viii) a paint, varnish, lacquer or similar finish, other than nitro-cellulose lacquer; or(ix) a clear or translucent roof light of glass fibre-reinforced polyester if –<ul style="list-style-type: none">(A) the roof in which is is installed forms part of a single storey building required to be Type C construction; and(B) the material is used as part of the roof covering; and(C) it is no closer than 1.5m from another roof light of the same type; and(D) each roof light is not more than 14m² in area; and(E) the area of the roof lights per 70m² of roof surface is not more than 14m² in area; or(x) a face plate or neck adaptor of supply and return air outlets of an air handling system; or(xi) a face plate or diffuser plate of light fitting and emergency exit signs and associated electrical wiring and electrical components; or(xii) a joinery unit, cupboard, shelving or the like; or(xiv) Timber treads, risers, landings and associated supporting framework installed in accordance with D2.25 where the Spread-of-Flame Index and the





BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					Smoke-Developed Index of the timber does not exceed 9 and respectively; or (xv) Any other material that does not significantly increase the hazards of the fire. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
C1.11 Performance of External Walls in Fire			X		Not applicable. No tilt-up and pre-cast concrete proposed.
C1.12 *****			X		Clause deleted.
C1.13 Fire protected timber: concession			X		Not applicable. No fire-protected timber proposed.
C1.14 Ancillary elements			X		<p>An <i>ancillary element</i> must not be fixed, installed or attached to the internal parts or external face of an <i>external wall</i> that is <i>required</i> to be <i>non-combustible</i> unless it is one of the following:</p> <ul style="list-style-type: none">(a) An ancillary element that is non-combustible.(b) A gutter, downpipe or other plumbing fixture or fitting.(c) A flashing.(d) A grate or grill not more than 2m² in an area associated with a building service.(e) An electrical switch, socket outlet, cover plate or the like.(f) A light fitting.(g) A <i>required</i> sign.(h) A sign other than one provided under (a) or (g) that –<ul style="list-style-type: none">(i) Achieves a group number 1 or 2; and(ii) Does not extend beyond one storey; and(iii) Does not extend beyond one fire compartment; and(iv) Is separated vertically from other signs permitted under (h) by at least 2 storeys.(i) An awning, sunshade, canopy, blind or shading hood other than one provided under (a) that –<ul style="list-style-type: none">(i) Meets the requirements of Table 4 of Specification C1.10 as an internal element; and(ii) Serves a storey –<ul style="list-style-type: none">(A) At ground level; or(B) Immediately above a storey at ground level; and(iii) Does not serve an exit, where it would render the exit unusable in a fire.(j) A part of a security, intercom or announcement system.

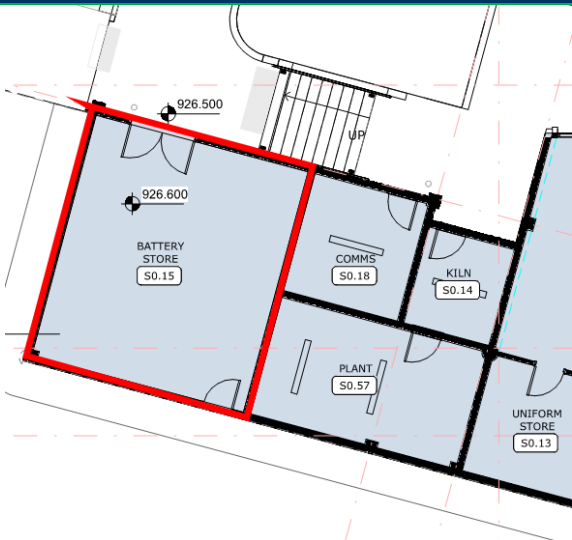
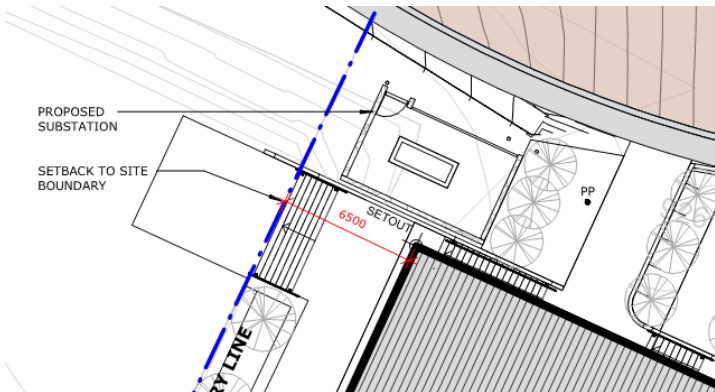


BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					(k) Wiring. (l) A paint, lacquer or similar finish, (m) A gasket, caulking, sealant or adhesive directly associated with (a) to (k). <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
Part C2 - Compartmentation & Separation					
C2.1 Application of Part			X		Information clause only. C2.2, C2.3 and C2.4 do not apply to a carpark provided with a sprinkler system (other than a FPAA101D or FPAA101H system complying with Specification E1.5, an open-deck carpark or an open spectator stand.
C2.2 General Floor Area & Volume Limitations	X				The fire compartment does not exceed the relevant maximum floor area and maximum volume set out in Table C2.2 & C2.5.
C2.3 Large Isolated Buildings			X		Not applicable. Not a large isolated building.
C2.4 Requirements for Open Space			X		Not applicable. Not a large isolated building.
C2.5 Class 9a & 9c Buildings			X		Not applicable. Not a Class 9a and 9c building.
C2.6 Vertical Separation of openings in external walls			X		Not applicable. Not Type A.
C2.7 Separation by Fire Walls			X		Not applicable. No fire walls are proposed or required.
C2.8 Separation of Classifications in the same storey			X		Not applicable. Whole building is Class 9b.
C2.9 Separation of Classifications in different storeys			X		Not applicable. Whole building is Class 9b.
C2.10 Separation of lifts shafts			X		Not applicable. Lift does not connect more than 2 storeys.
C2.11 Stairways and lifts in one shaft			X		Not applicable. Neither lift nor stairway is required to be fire-isolated.
C2.12				X	(a) Equipment other than that described in (b) and (c) must be separated from the remainder of the building with



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Separation of Equipment					<p>construction complying with (d), if that equipment comprises –</p> <ul style="list-style-type: none">(i) lift motors and lift control panels or(ii) Emergency generators used to sustain emergency equipment operating in the emergency mode; or(iii) Central smoke control plant; or(iv) Boilers; or(v) A battery system installed in that building that has a total voltage of 12 volts or more and a storage capacity of 200kWh or more. <p>(b) Equipment need not be separated in accordance with (a) if the equipment comprises-</p> <ul style="list-style-type: none">(i) Smoke control exhaust fans located in the air stream which are constructed for high temperature operation in accordance with Specification E2.2b; or(ii) Stair pressurizing equipment installed in compliance with AS 1668.1; or(iii) A lift installation without a machine room; or(iv) Equipment otherwise adequately separated from the remainder of the building. <p>(c) Separation of onsite fire pumps must comply with the requirements of AS2419.1.</p> <p>(d) Separating construction must have –</p> <ul style="list-style-type: none">(i) Except as provided by (ii) –<ul style="list-style-type: none">(A) An FRL is required by Specification C1.1, but not less than 120/120/120; and(B) Any doorway protected with a -/120/30 self-closing fire door; or(ii) When separating a lift shaft and lift motor room, an FRL not less than 120/-/-.



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					 <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification.</p>
C2.13 Electrical Supply				X	<p>(d) where emergency equipment is required in a building, all switchboards in the electrical installation, which sustain the electricity supply to the emergency equipment, must be constructed so that emergency equipment switchgear is separated from non-emergency equipment switchgear by metal partitions designed to minimise the spread of a fault from the non-emergency equipment switchgear.</p> <p>(e) For the purposes of (d), emergency equipment includes but it is not limited to –</p> <p>(i) Fire hydrant booster pumps</p>  <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
C2.14 Public corridors in Class 2 & 3 Buildings			X		Not applicable. No Class 2 or 3 parts.



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Part C3 - Protection of Openings					
C3.1 Application of Part			X		<p>Informational.</p> <p>(a) The DTS provisions of this Part do not apply to-</p> <p>(i) Control joints, weep holes and the like in external walls of masonry construction and joints between panels in external walls of pre -cast concrete panel construction if, in all cases they are not larger than necessary for the purpose; and</p> <p>(iii) Openings in the vertical plane formed between building elements at the construction edge or perimeter of a balcony or verandah, colonnade, terrace, or the like and</p> <p>(b) For the purposes of DTS provisions of this Part, openings in building elements required to be fire resisting include doorways, windows (including any associated fanlight), infill panels and fixed or openable glazed areas that do not have the required FRL.</p> <p>(c) For the purposes of the DTS provisions of this part, openings other than those covered under (a)(iii), between building elements such as columns, beams and the like, in the plane formed at the construction edge of the perimeter of the building, are deemed to openings in the external wall.</p>
C3.2 Protection of openings in external walls	X				<p>(a) Openings in an external wall that is required to have an FRL must be protected in accordance with C3.4:</p> <p>(i) if the distance between the opening and the fire-source feature is less than 3 m from a side or rear boundary; or</p> <p>(ii) less than 6 m from the far boundary of a road, river, lake or the like adjoining the allotment, if not located in a storey at or near ground level; or</p> <p>(iii) less than 6 m from another building on the allotment that is not Class 10;</p> <p>If wall wetting sprinklers are to be used they are to be located externally.</p> <p>(b) if required to be protected under (a), not occupy more than 1/3 of the area of the external wall of the storey in which it is located unless they are in a Class 9b building used as an open spectator stand.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
C3.3 Separation of external walls and associated openings in different fire compartments			X		Not applicable. No different fire compartments in the same building.
C3.4			X		(a) Where protection is required to doorways and windows and other openings they must be protected as follows:



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Acceptable Methods of Protection					<p>(i) Doorways</p> <ul style="list-style-type: none"> ❖ Internal or external wall wetting sprinklers as appropriate used with doors that are self-closing or automatic closing; or ❖ -/60/30 fire doors that are self-closing or automatic closing <p>(ii) Windows</p> <ul style="list-style-type: none"> ❖ Internal or external wall wetting sprinklers as appropriate used with windows that are automatic closing or permanently fixed in the closed position or; ❖ -/60- fire windows that are automatic closing or permanently fixed in the closed position or ❖ -/60- automatic closing fire shutters. <p>(iii) Other openings –</p> <ul style="list-style-type: none"> ❖ Excluding voids – internal or external wall wetting sprinklers as appropriate or ❖ Construction having a FRL not less than -/60/-. <p>(b) Fire doors, fire windows and fire shutters must comply with Specification C3.4.</p>
C3.5 Doorways in Fire Walls			X		Not applicable. No fire walls are proposed or required.
C3.6 Sliding Fire Doors			X		<p>Sliding fire doors normally held open, must fail safe closed in the event of power failure to the door, upon activation of heat or smoke detectors, and upon activation of sprinklers located in either fire compartment separated by the fire wall.</p> <p>Sliding fire door may be proposed for protection of doorway to comply with BCA Clause C3.4.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
C3.7 Protection of Doorways in horizontal exits			X		Not applicable. No horizontal exits proposed or required.
C3.8 Openings in fire isolated exits			X		Not applicable. No fire-isolated exits proposed or required.
C3.9 Service Penetrations in fire-isolated exits			X		Not applicable. No fire-isolated exits proposed or required.
C3.10 Openings in Fire isolated lift shafts			X		Not applicable. No fire-isolated exits proposed or required.
C3.11			X		Not applicable. No Class 2, 3 or 4 parts proposed.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Bounding Construction: Class 2, 3 buildings and 4 Parts					
C3.12 Openings in floors and ceilings for services			X		Not applicable. No floors and ceilings are required to be fire resisting.
C3.13 Openings in Shafts			X		Not applicable. Not Type A construction.
C3.15 Openings for Service Installations			X		Not applicable. No building elements within the building are required to be fire-resisting.
C3.16 Construction Joints				X	<p>Construction joints, spaces and the like in and between building elements required to be fire-resisting with respect to integrity and insulation must be protected in a manner identical with a prototype tested in accordance with AS 1530.4 to achieve the required FRL.</p> <p>The requirements above do not apply where joints, spaces and the like between fire protected timber elements are provided with cavity barriers in accordance with Specification C1.13.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
C3.17 Columns protected in lightweight construction to achieve an FRL			X		<p>Any column protected by lightweight construction to achieve an FRL which passes through a building element that is required to have an FRL or a resistance to the incipient spread of fire, must be installed using a method and materials identical with a prototype assembly of construction which has achieved the required FRL or resistance to the incipient spread of fire.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
SECTION D					
ACCESS & EGRESS					
Part D1 - Provision for Escape					
D1.1 Application of Part			X		The DTS provisions of this Part do not apply to the internal parts of a sole occupancy unit in a Class 2 or 3 building or Class 4 part of a building.
D1.2 Number of Exits required		X			<p>(a) All buildings — Every building must have at least one exit from each storey.</p> <p>(d) Class 9 buildings — In addition to any horizontal exit, not less than 2 exits must be provided from the following:</p> <p>(v) Each storey in a primary or secondary school with a rise in storeys of 2 or more.</p> <p>(vi) Any storey or mezzanine that accommodates more than 50 persons, calculated under D1.13.</p>



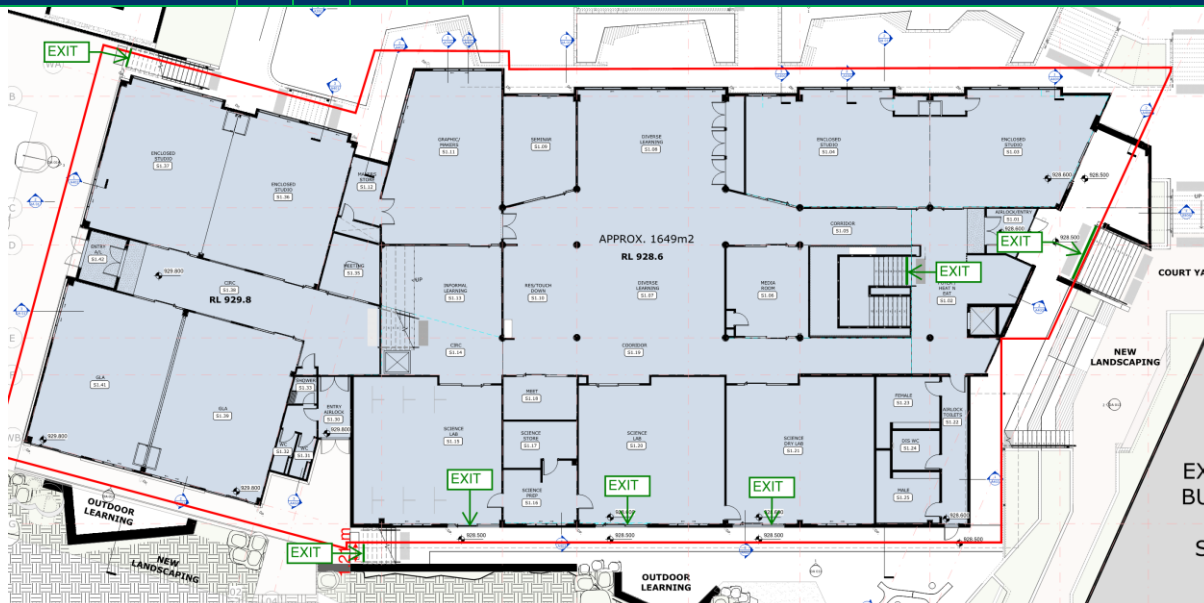
BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(g) Access to exits — Without passing through another sole-occupancy unit every occupant of a storey or part of a storey must have access to—</p> <p>(i) an exit; or</p> <p>(ii) at least 2 exits, if 2 or more exits are required.</p> <div><p>Exit means—</p><p>(a) any, or any combination of the following if they provide egress to a road or open space:</p><p>(i) An internal or external stairway.</p><p>(ii) A ramp.</p><p>(iii) A fire-isolated passageway.</p><p>(iv) A doorway opening to a road or open space.</p><p>(b) A horizontal exit or a fire-isolated passageway leading to a horizontal exit.</p><p>Open space means a space on the allotment, or a roof or similar part of a building adequately protected from fire, open to the sky and connected directly with a public road.</p></div> <p>DTS non-compliance</p> <p>Ground Floor</p> <ul style="list-style-type: none">- Battery room – egress through the Spoon Drain area (red arrow in snapshot below) is required for access to a second access to comply with the DTS provisions.- Comms – only 1 exit is provided from the comms room. <i>It is recommended that this is addressed by a Fire Engineered Performance Solution</i>- Plant & Kiln – only 1 exit is provided from the comms room. <i>It is recommended that this is addressed by a Fire Engineered Performance Solution</i>- Uniform Store & Uniform Shop – only 1 exit is provided from the comms room. <i>It is recommended that this is addressed by a Fire Engineered Performance Solution.</i>



Ground Floor Exit locations.

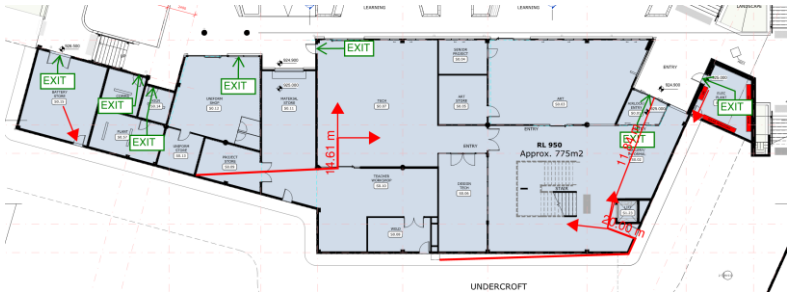



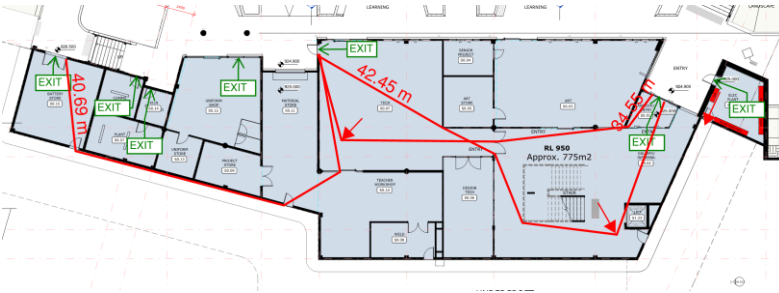

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
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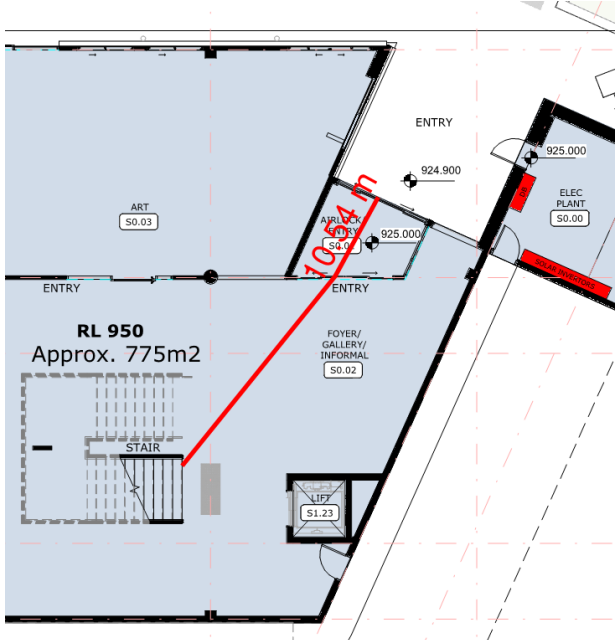
First Floor exit locations (red line details roof).

D1.3 When Fire Isolated exits are required				X	<p>Informational.</p> <p>(b) Class 9 buildings — Every stairway or ramp serving as a required exit must be fire-isolated unless—</p> <p>(iii) in any other case, it connects, passes through or passes by not more than 2 consecutive storeys and one extra storey of any classification may be included if—</p> <p>(A) the building has a sprinkler system (other than a FPAA101D system) complying with Specification E1.5 installed throughout; or</p> <p>(B) the required exit does not provide access to or egress for, and is separated from, the extra storey by construction having—</p> <p>(aa) an FRL of –/60/60, if non-loadbearing; and</p> <p>(bb) 60/60/60 for Type B construction, if loadbearing; and</p> <p>(cc) no opening that could permit the passage of fire or smoke.</p> <p>Stairway connects 2 storeys and therefore not required to be fire-isolated.</p>
D1.4 Exit Travel Distances	X				<p>(c) Class 5, 6, 7, 8 or 9 buildings — Subject to (d), (e) and (f)—</p> <p>(i) no point on a floor must be more than 20 m from an exit, or a point from which travel in different directions to 2 exits is available, in which case the maximum distance to one of those exits must not exceed 40 m; and</p>

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(f) Assembly buildings — In a Class 9b building other than a school or early childhood centre, the distance to one of the exits may be 60 m if—</p> <ul style="list-style-type: none"> (i) the path of travel from the room concerned to that exit is through another area which is a corridor, hallway, lobby, ramp or other circulation space; and (ii) the room is smoke-separated from the circulation space by construction having an FRL of not less than 60/60/60 with every doorway in that construction protected by a tight fitting, self-closing, solid-core door not less than 35 mm thick; and (iii) the maximum distance of travel does not exceed 40 m within the room and 20 m from the doorway to the room through the circulation space to the exit. <p>- Ground Level travel distance calculations (DTS compliant)</p>  <p>- First Floor travel distance calculations (DTS compliant)</p> 
D1.5 Distance Between Alternative Exits	X				<p>Exits that are required as alternative means of egress must be—</p> <ul style="list-style-type: none"> (a) distributed as uniformly as practicable within or around the storey served and in positions where unobstructed access to at least 2 exits is readily available from all points on the floor including lift lobby areas; and (b) not less than 9 m apart; and (c) not more than— <ul style="list-style-type: none"> (iii) in all other cases — 60 m apart; and

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(d) located so that alternative paths of travel do not converge such that they become less than 6 m apart.</p>  <p>Ground Floor distance between alternative exit calculations (DTS compliant).</p>  <p>First Floor distance between alternative exit calculations (DTS compliant).</p>
<p>D1.6</p> <p>Dimensions of Exits and paths of Travel to Exits</p>				X	<p>In a required exit or path of travel to an exit—</p> <ul style="list-style-type: none"> (a) the unobstructed height throughout must be not less than 2 m, except the unobstructed height of any doorway may be reduced to not less than 1980 mm; and (b) the unobstructed width of each exit or path of travel to an exit, except for doorways, must be not less than— <ul style="list-style-type: none"> (i) 1 m; or (c) if the storey or mezzanine accommodates more than 100 persons but not more than 200 persons, the aggregate unobstructed width, except for doorways, must be not less than— <ul style="list-style-type: none"> (i) 1 m plus 250 mm for each 25 persons (or part) in excess of 100; or (ii) 1.8 m in a passageway, corridor or ramp normally used for the transportation of patients in beds within a treatment area or ward area; and (d) if the storey or mezzanine accommodates more than 200 persons, the aggregate unobstructed width, except for doorways, must be increased to—

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<ul style="list-style-type: none"> (i) 2 m plus 500 mm for every 60 persons (or part) in excess of 200 persons if egress involves a change in floor level by a stairway or ramp with a gradient steeper than 1 in 12; or (ii) in any other case, 2 m plus 500 mm for every 75 persons (or part) in excess of 200; and (f) the unobstructed width of a doorway must be not less than— <ul style="list-style-type: none"> (iii) the unobstructed width of each exit provided to comply with (b), (c), (d) or (e), minus 250 mm; or (v) in any other case except where it opens to a sanitary compartment or bathroom — 750 mm wide; and (g) the unobstructed width of a required exit must not diminish in the direction of travel to a road or open space, except where the width is increased in accordance with (b)(ii) or (f)(i); and (h) the required width of a stairway or ramp must— <ul style="list-style-type: none"> (i) be measured clear of all obstructions such as handrails, projecting parts of balustrades or other barriers and the like; and (ii) extend without interruption, except for ceiling cornices, to a height not less than 2 m vertically above a line along the nosings of the treads or the floor surface of the ramp or landing. (i) to determine the aggregate unobstructed width, the number of persons accommodated must be calculated according to D1.13; and <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
D1.7 Travel via Fire Isolated Stairs			X		Not applicable. No fire-isolated stairway is proposed or required.
D1.8 External Stairways or ramps in lieu of Fire Isolated Stairs			X		Not applicable. No fire-isolated stairway is proposed or required.
D1.9 Travel by non-fire-isolated stairs	X				<ul style="list-style-type: none"> (a) A non-fire-isolated stairway or non-fire-isolated ramp serving as a required exit must provide a continuous means of travel by its own flights and landings from every storey served to the level at which egress to a road or open space is provided. (c) In a Class 5, 6, 7, 8 or 9 building, the distance from any point on a floor to a point of egress to a road or open space by way of a required non-fire-isolated stairway or non-fire-isolated ramp must not exceed 80 m.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(e) In a Class 5 to 8 or 9b building, a required non-fire-isolated stairway or non-fire-isolated ramp must discharge at a point not more than—</p> <ul style="list-style-type: none"> (i) 20 m from a doorway providing egress to a road or open space or from a fire isolated passageway leading to a road or open space; or (ii) 40 m from one of 2 such doorways or passageways if travel to each of them from the non-fire-isolated stairway or non-fire-isolated ramp is in opposite or approximately opposite directions. 
D1.10 Discharge from Exits				X	<ul style="list-style-type: none"> (a) An exit must not be blocked at the point of discharge and where necessary, suitable barriers must be provided to prevent vehicles from blocking the exit, or access to it. (b) If a required exit leads to an open space, the path of travel to the road must have an unobstructed width throughout of not less than— <ul style="list-style-type: none"> (i) the minimum width of the required exit; (ii) or 1 m, whichever is the greater. (c) If an exit discharges to open space that is at a different level than the public road to which it is connected, the path of travel to the road must be by— <ul style="list-style-type: none"> (i) a ramp or other incline having a gradient not steeper than 1:8 at any part, or not steeper than 1:14 if required by the Deemed-to-Satisfy Provisions of Part D3; or (ii) a stairway complying with the Deemed-to-Satisfy Provisions of the BCA. (d) The discharge point of alternative exits must be located as far apart as practical.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(g) The number of persons accommodated must be calculated according to D1.13.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D1.11 Horizontal Exits			X		Not applicable. No horizontal exits proposed or required.
D1.12 Non-required stairways, ramps or escalators			X		Not applicable. No escalator, moving walkway or non-required non-fire-isolated stairway or pedestrian ramp are proposed.
D1.13 Number of Persons Accommodated Note NSW Table D1.13 Area per person according to use			X		<p>For the purpose of the Deemed-to-Satisfy provisions, the number of persons accommodated in a storey, room or mezzanine must be determined with consideration to the purpose for which it is used and the layout of the floor area by—</p> <ul style="list-style-type: none"> (a) calculating the sum of the numbers obtained by dividing the floor area of each part of the storey by the number of square metres per person listed in Table D1.13 according to the use of that part, excluding spaces set aside for— <ul style="list-style-type: none"> (i) lifts, stairways, ramps and escalators, corridors, hallways, lobbies and the like; and (ii) service ducts and the like, sanitary compartments or other ancillary uses; or (b) reference to the seating capacity in an assembly building or room; or (c) any other suitable means of assessing its capacity. <p><i>Refer NSW Table D1.13 to calculate area per person according to use.</i></p> <p>The school is required to determine the number of occupants in the building. this number will be used to determine aggregate egress widths (D1.6) and sanitary facility numbers (F2.3).</p>
D1.14 Measurement of Distances			X		<p>Informational.</p> <p>The nearest part of an exit means in the case of—</p> <ul style="list-style-type: none"> (a) a fire-isolated stairway, fire-isolated passageway, or fire-isolated ramp, the nearest part of the doorway providing access to them; and (b) a non-fire-isolated stairway, the nearest part of the nearest riser; and (c) a non-fire-isolated ramp, the nearest part of the junction of the floor of the ramp and the floor of the storey; and (d) a doorway opening to a road or open space, the nearest part of the doorway; and (e) a horizontal exit, the nearest part of the doorway.
D1.15 Method of Measurement			X		<p>Informational.</p> <p>The following rules apply:</p>

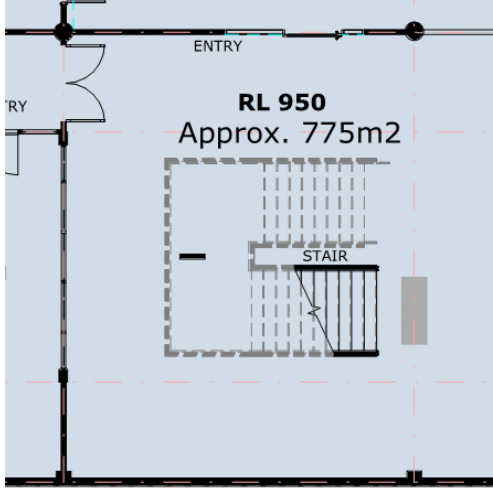


BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(a) In the case of a room that is not a sole occupancy unit in a Class 2 or 3 building or Class 4 part of a building, the distance includes the straight-line measurement from any point of the floor of the room to the nearest part of the doorway leading from it, together with the distance from the part of the doorway to the single required exit or point from which travel in different directions to 2 required exits is available.</p> <p>(b) Subject to (d), the distance from the doorway of a sole occupancy unit in a Class 2 or 3 building is measured in a straight line to the nearest part of the required single exit or point from which travel in different directions to 2 required exits is available.</p> <p>(c) Subject to (d), the distance between exits is measured in a straight line between the nearest parts of those exits.</p> <p>(d) Only the shortest distance is taken along a corridor, hallway, external balcony or other path of travel that curves or changes direction.</p> <p>(e) If more than one corridor, hallway, or other internal path of travel connects required exits, for the purposes of D1.5(c) the measurement is along the path of travel through the point at which travel in different directions to those exits is available, as determined in accordance with D1.4.</p> <p>(f) If a wall (including a demountable internal wall) that does not bound –</p> <p>(i) A room; or</p> <p>(ii) A corridor, hallway or the like, causes a change in direction in proceeding to a required exit, the distance is measured along the path of travel past the wall.</p> <p>(iii) If permanent fixed seating is provided, the distance is measured along the path of travel between the rows of seats.</p> <p>(iv) In the case of a non-fire isolated stairway or non-fire isolated ramp, the distance is measured along a line connecting the nosings of the treads, along the slope of the ramp, together with the distance connecting those lines across any intermediate landing.</p>
D1.16 Plant Rooms and lift Motor Rooms: Concession			X		<p>(a) A ladder may be used in lieu of a stairway to provide egress from—</p> <p>(i) a plant room with a floor area of not more than 100 m²; or</p> <p>(ii) all but one point of egress from a plant room, a lift machine room or a Class 8 electricity network substation with a floor area of not more than 200 m².</p> <p>(b) A ladder permitted under (a)—</p> <p>(i) may form part of an exit provided that in the case of a fire-isolated stairway it is contained within the shaft; or</p>



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<ul style="list-style-type: none"> (ii) may discharge within a storey in which case it must be considered as forming part of the path of travel; and (iii) for a plant room must comply with AS 1657; and (iv) for a lift machine room, where access is provided from within a machine room to a secondary floor, a fixed rung type ladder complying with AS 1657 may be used, provided that— <ul style="list-style-type: none"> (A) the height between the floors is not more than 2800 mm; and (B) the ladder is inclined at an angle to the horizontal not less than 65 degrees nor more than 75 degrees; and (C) the distance between the front face of the ladder and any adjacent obstruction is not less than— <ul style="list-style-type: none"> (aa) 960 mm, where the ladder is inclined 65 degrees to the horizontal; or (bb) 760 mm, where the ladder is inclined 75 degrees to the horizontal; or (cc) a distance that is determined by interpolating the values in (aa) and (bb), where the ladder is inclined at any angle between 65 degrees and 75 degrees to the horizontal; and (D) a clear space not less than 600 mm exists between the foot of the ladder and any equipment. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D1.17 Access to lift pits			X		Not applicable. Lifts pit is not proposed.
Part D2 - Construction of Exits					
D2.1 Application of Part			X		Not applicable. No Class 2 or 3 Parts.
D2.2 Fire-Isolated stairways and ramps			X		Not applicable. No fire-isolated stairways or ramps proposed.
D2.3 Non-fire Isolated stairways and ramps			X		Not applicable. Rise in storeys is not more than 2.
D2.4 Separation of Rising and Descending Stairs			X		Not applicable. No rising stairways from the basement proposed.
D2.5 Open Access ramps and balconies			X		Not applicable. Open access ramps or balconies are not proposed to meet the smoke hazard management requirements.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
D2.6 Smoke Lobbies			X		Not applicable. Smoke lobbies are not required by D1.7
D2.7 Installations in Exits and Paths of Travel				X	<p>(a) Access to service shafts and services other than to fire-fighting or detection equipment as permitted in the Deemed-to-Satisfy Provisions of Section E, must not be provided from a fire-isolated stairway.</p> <p>(b) An opening to any chute or duct intended to convey hot products of combustion from a boiler, incinerator, fireplace or the like must not be located in any part of a required exit or any corridor, hallway, lobby or the like leading to a required exit.</p> <p>(c) Gas or other fuel services must not be installed in a required exit</p> <p>(d) Services or equipment comprising –</p> <ul style="list-style-type: none"> (i) Electricity meters, distribution boards or cuts; or (ii) Central telecommunications distribution boards or equipment; or (iii) Electrical motors or other motors service equipment in the building, <p>May be installed in –</p> <ul style="list-style-type: none"> (i) A required exit, except for fire-isolated exits specified in (a); or (ii) In any corridor, hallway, lobby or the like leading to a required exit, <p>If the services or equipment are enclosed by non-combustible construction or a fire-protective covering with doorways or openings suitably sealed against smoke spreading from the enclosure</p> <p>(e) Electrical wiring may be installed in a fire-isolated exit if the wiring is associated with;</p> <ul style="list-style-type: none"> (i) A lighting, detection, or pressurization system serving the exit; or (ii) A security, surveillance or management system serving the exit; or (iii) An intercommunication system or an audible or visual alarm system in accordance with D2.22; or (iv) The monitoring of hydrant or sprinkler isolating valves. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D2.8 Enclosure of Space Under Stairs and ramps			X		Not applicable. The space under the non-fire-isolated stairway does not form a cupboard.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					
D2.9 Width of Stairs			X		<p>Informational.</p> <p>A required stairway or ramp that exceeds 2 m in width is counted as having a width of only 2 m unless it is divided by a handrail, balustrade or other barrier continuous between landings and each division has a width of not more than 2 m.</p>
D2.10 Pedestrian Ramps				X	<p>(b) A ramp serving as a required exit must –</p> <p>(i) Where the ramp is also serving as an accessible ramp under Part D3, be in accordance with AS1428.1; or</p> <p>(ii) In any other case, have a gradient not steeper than 1:8.</p> <p>(c) The floor surface of a ramp must have a slip-resistance classification not less than that listed in Table D2.14 when tested in accordance with AS4586.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D2.11 Fire-Isolated Passageways			X		Not applicable. No fire-isolated stairways are proposed or required.
D2.12 Roof as Open Space			X		Not applicable. Roof is not open space.
D2.13 Goings & Risers				X	<p>(a) A stairway must have—</p> <p>(i) not more than 18 and not less than 2 risers in each flight; and</p> <p>(ii) going (G), riser (R) and quantity (2R + G) in accordance with Table D2.13, except as permitted by (b) and (c); and</p> <p>(iii) constant goings and risers throughout each flight, except as permitted by (b) and (c), and the dimensions of goings (G) and risers (R) in accordance with (a)(ii) are considered constant if the variation between—</p>



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<ul style="list-style-type: none">(A) adjacent risers, or between adjacent goings, is no greater than 5 mm; and(B) the largest and smallest riser within a flight, or the largest and smallest going within a flight, does not exceed 10 mm; and(iv) risers which do not have any openings that would allow a 125 mm sphere to pass through between the treads; and(v) treads which have—<ul style="list-style-type: none">(A) a surface with a slip-resistance classification not less than that listed in Table D2.14 when tested in accordance with AS 4586; or(B) a nosing strip with a slip-resistance classification not less than that listed in Table D2.14 when tested in accordance with AS 4586; and(vi) treads of solid construction (not mesh or other perforated material) if the stairway is more than 10 m high or connects more than 3 storeys; and(vii) in a Class 9b building, not more than 36 risers in consecutive flights without a change in direction of at least 30°; and(viii) in the case of a required stairway, no winders in lieu of a landing.(ix) conspicuous edges to the treads of steps in a Class 9b building used as an entertainment venue; and(x) in a Class 9b building used as an entertainment venue, not more than one helical stairway serving as a required exit and that stairway must—<ul style="list-style-type: none">(A) have a width of not less than 1500 mm; and(B) be of constant radius; and(C) be constructed so that each tread, when measured 500 mm in from its narrow end, has a width of at least 280 mm; and(xi) in a Class 9b building used as an entertainment venue, in a curved stairway serving as a required exit— an internal radius of not less than twice the width of the stair. <p>(b) In the case of a non-required stairway—</p> <ul style="list-style-type: none">(i) the stairway must have—<ul style="list-style-type: none">(A) not more than 3 winders in lieu of a quarter landing; and(B) not more than 6 winders in lieu of a half landing; and(ii) the going of all straight treads must be constant throughout the same flight and the dimensions of





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					<p>goings (G) is considered constant if the variation between—</p> <p>(A) adjacent goings, is no greater than 5 mm; and</p> <p>(B) the largest and smallest going within a flight, does not exceed 10 mm; and</p> <p>(iii) the going of all winders in lieu of a quarter or half landing may vary from the going of the straight treads within the same flight provided that the going of all such winders is constant.</p> <p>(c) Where a stairway discharges to a sloping public walkway or public road—</p> <p>(i) the riser (R) may be reduced to account for the slope of the walkway or road; and</p> <p>(ii) the quantity (2R+G) may vary at that location.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
D2.14 Landings				X	<p>In a stairway</p> <p>(a) Landings having a maximum gradient of 1:50 may be used in any building to limit the number of risers in each flight and each landing must –</p> <p>(i) Be not less than 750 mm long, and where this involves a change in direction, the length is measured 500 mm from the inside edge of the landing; and</p> <p>(ii) Have –</p> <p>(A) A surface with a slip-resistance classification not less than that listed in Table D2.14 when tested in accordance with AS4586; or</p> <p>(B) A strip at the edge of the landing with a slip-resistance classification not less than that listed in Table D2.14 when tested in accordance with AS4586, where the edge leads to a flight below; and</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
D2.15 Thresholds				X	<p>The threshold of a doorway must not incorporate a step or ramp at any point closer to the doorway than the width of the door leaf unless—</p> <p>(c) in a building required to be accessible by Part D3, the doorway—</p> <p>(i) opens to a road or open space; and</p> <p>(ii) is provided with a threshold ramp or step ramp in accordance with AS 1428.1; or</p> <p>(e) in other cases—</p>





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					<ul style="list-style-type: none">(i) the doorway opens to a road or open space, external stair landing or external balcony; and(ii) the door sill is not more than 190 mm above the finished surface of the ground, balcony, or the like, to which the doorway opens. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D2.16 Balustrades and other Barriers Note NSW D2.16				X	<ul style="list-style-type: none">(a) A continuous barrier must be provided along the side of—<ul style="list-style-type: none">(i) a roof to which general access is provided; and(ii) a stairway or ramp; and(iii) a floor, corridor, hallway, balcony, deck, verandah, mezzanine, access bridge or the like; and(iv) any delineated path of access to a building, if the trafficable surface is 1 m or more above the surface beneath.(b) The requirements of (a) do not apply to—<ul style="list-style-type: none">(iii) a retaining wall unless the retaining wall forms part of, or is directly associated with a delineated path of access to a building from the road, or a delineated path of access between buildings; or(iv) a barrier provided to an openable window covered by D2.24. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D2.17 Handrails				X	<ul style="list-style-type: none">(a) Except for handrails referred to in D2.18, handrails must be—<ul style="list-style-type: none">(i) located along at least one side of the ramp or flight; and(iii) located along each side if the total width of the stairway or ramp is 2 m or more; and(iii) in a Class 9b building used as a primary school—<ul style="list-style-type: none">(A) have one handrail fixed at a height of not less than 865 mm; and(B) have a second handrail fixed at a height between 665 mm and 750 mm, measured above the nosings of stair treads and the floor surface of the ramp, landing or the like; and(iv) in any other case, fixed at a height of not less than 865 mm measured above the nosings of stair treads and the floor surface of the ramp, landing, or the like; and(v) continuous between stair flight landings and have no obstruction on or above them that will tend to break a hand-hold; and





BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(vi) in a required exit serving an area required to be accessible, designed and constructed to comply with clause 12 of AS 1428.1, except that clause 12(d) does not apply to a handrail required by (a)(iii)(B).</p> <p>(c) Handrails required to assist people with a disability must be provided in accordance with D3.3.</p> <p>(e) The requirements of (d) do not apply to—</p> <p>(i) handrails referred to in D2.18; or</p> <p>(ii) a stairway or ramp providing a change in elevation of less than 1 m; or</p> <p>(iii) a landing; or</p> <p>(iv) a winder where a newel post is installed to provide a handhold.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification.</p>
D2.18 Fixed Platforms, walkways and ladders				X	<p>A fixed platform, walkway, stairway, ladder and any going and riser, landing, handrail or barrier attached thereto may comply with AS1657 in lieu of D2.13, D2.14 D2.16 and D2.17 if it only serves:</p> <p>(a) Machinery rooms, boiler houses, lift machine rooms, plant-rooms and the like; or</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification.</p>
D2.19 Doorways & Doors				X	<p>(b) A doorway serving as a required exit or forming part of a required exit—</p> <p>(i) Must not be fitted with a revolving door; and</p> <p>(ii) Must not be fitted with a roller shutter or tilt-up door unless –</p> <p>(A) It serves a Class 6, 7 or 8 building or part with a floor area not more than 200m²; and</p> <p>(B) The doorway is the only required exit from the building or part; and</p> <p>(C) It is held in the open position while the building or part is lawfully occupied; and</p> <p>(iii) Must not be fitted with a sliding door unless –</p> <p>(A) It leads directly to a road or open space; and</p> <p>(B) The door is able to be opened manually under a force of not more than 110 N; and</p> <p>(iv) If fitted with a door which is power-operated –</p> <p>(A) It must be able to be opened manually under a force of not more than 110 N if there is a malfunction or failure of the power source; and</p> <p>(B) If it leads directly to a road or open space it must open automatically if there is a power failure to the</p>





BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>door or on the activation of a fire or smoke alarm anywhere in the fire compartment served by the door.</p> <p>(c) A power-operated door in a path of travel to a required exit must be able to open manually under a force of not more than 110 N if there is a malfunction or failure of the power source.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification.</i></p>
D2.20 Swinging Doors				X	<p>A swinging door in a required exit or forming part of a required exit –</p> <p>(a) Must not encroach –</p> <p>(i) At any part of its swing by more than 500mm of the require width (including any landings) of a required –</p> <p>(A) Stairway; or</p> <p>(B) Ramp; or</p> <p>(C) Passageway,</p> <p>If it is likely to impede the path of travel of the people already using the exit; and</p> <p>(ii) When fully open, by more than 100 mm on the required width of the required exit, and</p> <p>The measurement of encroachment in each case is to include door handles or other furniture or attachments to the door; and</p> <p>(b) Must swing in the direction of egress unless</p> <p>(i) It serves a building part with a floor area not more than 200m², it is the only required exit from the building part and it is fitted with a device for holding it in the open position; or</p> <p>(ii) It serves a sanitary compartment or airlock (in which case it may swing in either direction; and</p> <p>(c) Must not otherwise impede the path or direction of egress.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification.</i></p>
D2.21 Operation of Latch				X	<p>(a) 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 by –</p> <p>(i) A single hand downward action or pushing action on a single device which is located between 900mm and 1.1 m from the floor and if serving an area required to be accessible by Part D3 –</p>

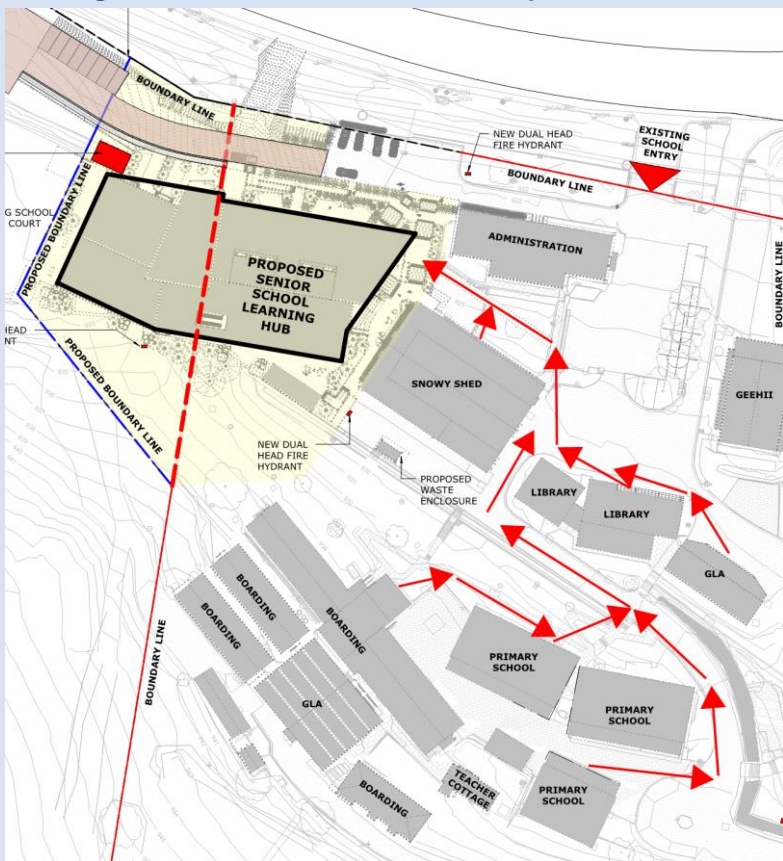


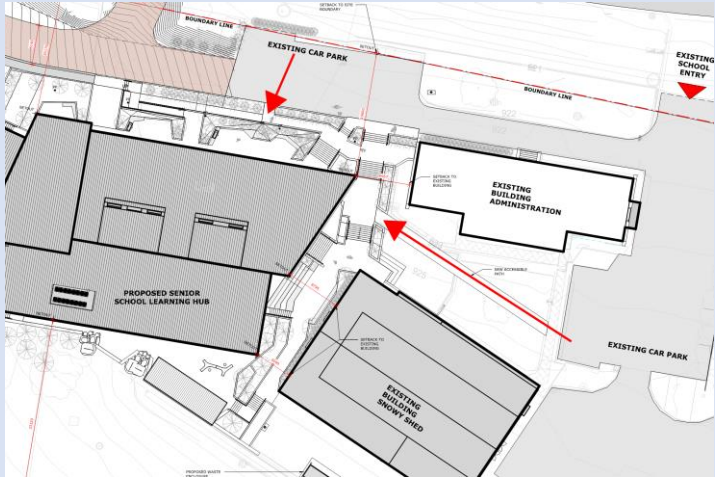


BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(A) be such that the hand of a person who cannot grip will not slip from the handle during the operation of the latch; and</p> <p>(B) have a clearance between the handle and the back plate or door face at the center grip section of the handle of not less than 35mm and not more than 45mm; or</p> <p>(ii) a single hand pushing action on a single device which is located between 900mm and 1.2m from the door; and</p> <p>(iii) where the latch operation device referred to in (ii) is not located on the door leaf itself –</p> <p>(A) manual controls to power operated doors must be at least 25mm wide, proud of the surrounding surface and located –</p> <p>(aa) not less than 500mm from an internal corner; and</p> <p>(bb) for a hinged door, between 1m and 2m from the door leaf in any position; and</p> <p>(cc) for a sliding door, within 2m of the doorway and clear of a surface mounted door in the open position.</p> <p>(B) Braille and tactile signage complying with Clause 3 and 6 of Specification D3.6 must identify the latch operation device.</p> <p>(b) The requirements of (a) do not apply to a door that –</p> <p>(i) Serves a vault, strong-room, sanitary compartment, or the like; or</p> <p>(ii) Serves only, or is within –</p> <p>(D) A space which is otherwise inaccessible to persons at all times when the door is locked; or</p> <p>(iii) Serves –</p> <p>(iv) Is fitted with a fail-safe device which automatically unlocks the door upon the activation of any sprinkler system (other than a FPAA101D system) complying with Specification E1.5, or smoke, or any other detector system deemed suitable in accordance with AS1670.1 installed throughout the building, and is readily operable when unlocked; or</p> <p>(c) The requirements of (a) do not apply in a Class 9b building (other than a school, an early childhood centre or a building used for religious purposes) to a door in a required exit, forming part of a required exit or in the path of travel to a required exit serving a storey or room accommodating more than 100 persons, determined in accordance with D1.13, in which case it must be readily openable—</p>



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					<ul style="list-style-type: none"> (i) without a key from the side that faces a person seeking egress; and (ii) by a single hand pushing action on a single device such as a panic bar located between 900 mm and 1.2 m from the floor; and (iii) where a two-leaf door is fitted, the provisions of (i) and (ii) need only apply to one door leaf if the appropriate requirements of D1.6 are satisfied by the opening of that one leaf; and (iv) where the door is a door in a path of travel providing re-entry to the building from a balcony, terrace or the like, it may be fitted with key-operated fastenings only, the tongues of which must be locked in the retracted position whenever the building is occupied by the public, so the door can yield to pressure. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D2.22 Re-entry from Fire isolated exits			X		Not applicable. No fire-isolated stairways are proposed or required.
D2.23 Signs on Doors			X		Not applicable. No doorways subject to this provision are proposed or required.
D2.24 Protection of openable windows			X		Not applicable. Not a Class 2, 3 or childcare centre.
D2.25 Timber stairways concession				X	<ul style="list-style-type: none"> (a) Notwithstanding D2.2(a), timber treads, risers, landings and associated supporting framework which – <ul style="list-style-type: none"> (i) has a finished thickness of not less than 44mm: and (ii) has an average density of not less than 800kg/m³ at a moisture content of 12%, may be used within a required fire isolated stairway or fire isolated passageway constructed from fire-protected timber in accordance with C1.13 subject to – <ul style="list-style-type: none"> (iii) the building being protected throughout by a sprinkler system complying with specification E1.5 which extends to within the fire isolated enclosure; and (iv) fire protection being provided to the underside of stair flights and landings located immediately above a landing level which- <ul style="list-style-type: none"> (A) is at or near the level of egress: or (B) provides direct access to a carpark. (b) Fire protection required by (a) must be not less than one layer of 13mm fire protective grade plasterboard fixed in accordance with the system requirements for a fire protective covering.

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					<i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
Part D3 - Access for People with Disabilities					
D3.1 General building access requirements		X			Access for people with a disability is required <u>"To and within all areas normally used by the occupants"</u> .
D3.2 Access to buildings				X	<p>AS 1428.1-2009 compliant accessway:</p> <ul style="list-style-type: none"> ❖ from the main points of a pedestrian entry at the allotment boundary; and ❖ from other accessible buildings on the same allotment; and ❖ from any required accessible carparking space on the allotment. <p>Confirmation is required that an accessway in accordance with AS 1428.1-2009 is provided from other accessible buildings on the allotment to assess compliance</p> 

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>Confirmation is required that accessible carparking spaces are located at the northern carpark to assess compliance.</p>  <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
<p>D3.3</p> <p>Parts of the building required to be accessible</p>				X	<p>In a building required to be accessible—</p> <ul style="list-style-type: none"> (a) every ramp and stairway, except for ramps and stairways in areas exempted by D3.4, must comply with— <ul style="list-style-type: none"> (i) for a ramp- clause 10 of AS 1428.1; and (ii) for a stairway- clause 11 of AS 1428.1; and (a) every passenger lift must comply with E3.6; and (b) accessways must have— <ul style="list-style-type: none"> (i) passing spaces complying with AS 1428.1 at maximum 20 m intervals on those parts of an accessway where a direct line of sight is not available; and (ii) turning spaces complying with AS 1428.1— <ul style="list-style-type: none"> (A) within 2 m of the end of accessways where it is not possible to continue travelling along the accessway; and (B) at maximum 20 m intervals along the accessway; and (c) an intersection of accessways satisfies the spatial requirements for a passing and turning space; and (d) a passing space may serve as a turning space; and (e) clause 7.4.1(a) of AS 1428.1 does not apply and is replaced with 'the pile height or pile thickness shall not exceed 11 mm and the carpet backing thickness shall not exceed 4 mm'; and (f) the carpet pile height or pile thickness dimension, carpet backing thickness dimension and their combined dimension shown in Figure 8 of AS 1428.1 do not apply and are replaced with 11 mm, 4 mm and 15 mm respectively.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p><i>Note: BCA 2019 does not directly specify slip-resistance classification(s) for all accessible paths of travel; however, we highlight the need under AS 1428.1-2009 for all accessible paths of travel to have a slip-resistant surface. We recommend you should seek surface finish advice from an independent specialist slip safety consultant.</i></p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification.</p>
D3.4 Exemptions			X		<p>The following rooms are exempt from access with disabilities provisions:</p> <ul style="list-style-type: none"> - Battery store; - Comms room; - Plant rooms.
D3.5 Carparking			X		Not applicable. No carparking proposed.
D3.6 Signage				X	<p>Braille and tactile signage complying with Specification D3.6 to identify:</p> <ul style="list-style-type: none"> ❖ sanitary facilities; and ❖ a space with hearing augmentation; and ❖ each door required by Clause E4.5 to be provided with an exit sign, inclusive of the requirement to state "EXIT" and "Level" followed by the floor level number on such doors. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D3.7 Hearing augmentation				X	<p>Hearing augmentation system where an inbuilt amplification system, other than one used for emergency warning, is installed in a room in a Class 9b building.</p> <p>As schools have an inbuilt amplification system (PA), a hearing augmentation system in accordance with this clause is required.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
D3.8 Tactile indicators				X	<p>Tactile ground surfaced indicators complying with AS/NZS 1428.4.1-2009 to:</p> <ul style="list-style-type: none"> ❖ a stairway, other than a fire-isolated stairway; and ❖ a ramp, other than a fire-isolated ramp, step ramp, kerb ramp, or swimming pool ramp; and ❖ warn of overhead obstructions; and ❖ warn of an accessway that intersects with a vehicular way adjacent to any pedestrian entrance to a building. <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>



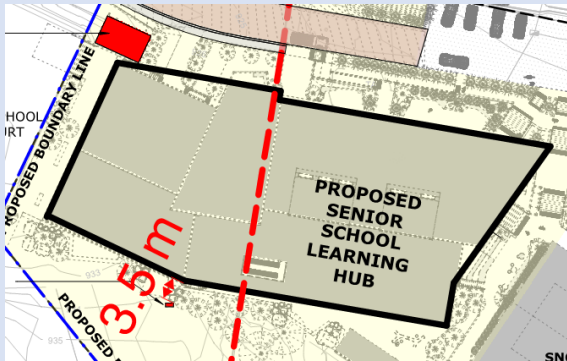
BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
D3.9 Wheelchair seating spaces in Class 9b assembly buildings			X		Information relevant to the number and grouping requirements for wheelchair seating spaces required in a class 9b assembly building. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
D3.10 Swimming Pools			X		Not applicable. No swimming pool
D3.11 Ramps			X		On an accessway— (a) a series of connected ramps must not have a combined vertical rise of more than 3.6 m; and (b) a landing for a step ramp must not overlap a landing for another step ramp or ramp <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
D3.12 Glazing on an accessway			X		On an accessway, where there is no chair rail, handrail or transom, all frameless or fully glazed doors, sidelights and any glazing capable of being mistaken for a doorway or opening, must be clearly marked in accordance with AS 1428.1. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>

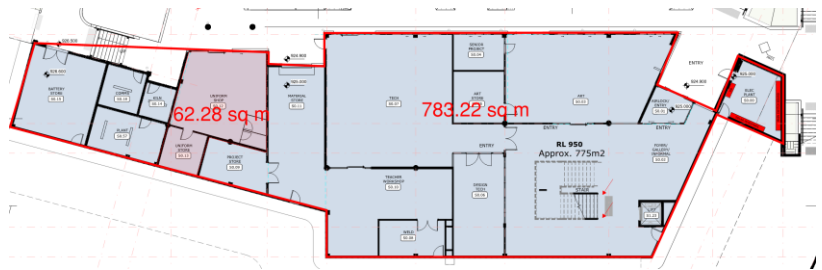
SECTION E SERVICES & EQUIPMENT

Part E1 - Fire Fighting Equipment

E1.3 Fire Hydrants				X	<p>(a) A hydrant system must be provided to serve a building –</p> <p>(i) Having a total floor area greater than 500m²; and</p> <p>(ii) Where a fire brigade station is –</p> <p>(A) No more than 50 km from the building as measured along roads; and</p> <p>(B) Equipped with equipment capable of utilising a fire hydrant.</p> <p>(b) The fire hydrant system-</p> <p>(i) Must be installed in accordance with AS2419.1, except –</p> <p>(A) A Class 8 electricity network station need not comply with clause 4.2 of AS 2419.1 if –</p> <p>(aa) it cannot be connected to town main supply; and</p> <p>(bb) one-hour water storage is provided for fire-fighting; and</p> <p>(B) Where a sprinkler system is installed throughout a building in accordance with AS 2118.1, AS 2118.4, AS 2118.6, FPAA101H or FPAA101D the fire</p>
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BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>hydrant booster protection requirements of Clause 7.3(c)(ii) and 7.3(d)(iii) of AS 2419.1 do not apply, and</p> <p>(C) A fire hydrant booster assembly may be located between 3.5m and 10m of the building, and need not comply with Clause 7.3(d)(iii) of AS 2419.1 where the assembly is protected by an adjacent fire rated freestanding wall that –</p> <p>(aa) achieves an FRL of not less than 90/90/90; and</p> <p>(bb) extends not less than 1m each side of the outermost fire hydrant booster risers within the assembly and is not less than 3m wide; and</p> <p>(cc) extends to a height of not less than 2m above finished ground level; and</p> <p>(ii) Where internal fire hydrants are provided, they must serve only the storey on which they are located except that a sole occupancy unit –</p> <p>(A) In a Class 2 or 3 building or Class 4 part may be served by a single fire hydrant located at the level of egress from the sole occupancy unit; or</p> <p>(B) Of not more than 2 storeys in a Class 5, 6, 7, 8 or 9 building may be served by a single fire hydrant located at the level of egress from that sole occupancy unit provided the fire hydrant can provide coverage to the whole of the sole occupancy unit.</p> <p>❖ <i>An external street or feed hydrant capable of providing the required system flow is located within 60m of the hydrant booster connection.</i></p> <p><u>DTS non-compliance</u></p> <p>The southern hydrant is located within 10 m of the building it is protecting which does not comply with Clause 3.2.2.1 of AS 2419.1-2005.</p> <p>Exact location and coverage for compliance is to be determined at CC stage.</p> 

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS												
					Hydraulic Services Design Certification and associated plans must be incorporated into the construction certificate specification												
E1.4 Fire Hose Reels			X		<p>Not applicable. Classrooms and associated corridors in a primary or a secondary school.</p> <p>Uniform shop & Uniform store is less than 10% of the floor area and therefore takes on the classification of the rest of the level.</p> 												
E1.5 Sprinklers			X		Not applicable. No sprinkler is required as per Table E1.5.												
E1.6 Portable Fire Extinguishers				X	<p>(a) Portable fire extinguishers must be –</p> <p>(i) Provided as listed in Table E1.6;</p> <p>Table E1.6 Requirements for extinguishers</p> <table><tr><th>Occupancy class</th><th>Risk class (as defined in AS 2444)</th></tr><tr><td>General provisions—Class 2 to 9 buildings (except within <i>sole-occupancy units</i> of a Class 9c building).</td><td>(a) To cover Class AE or E fire risks associated with emergency services switchboards. <i>Note 1</i></td></tr><tr><td></td><td>(b) To cover Class F fire risks involving cooking oils and fats in kitchens.</td></tr><tr><td></td><td>(c) To cover Class B fire risks in locations where flammable liquids in excess of 50 litres are stored or used (not including that held in fuel tanks of vehicles).</td></tr><tr><td></td><td>(d) To cover Class A fire risks in normally occupied <i>fire compartments</i> less than 500 m² not provided with fire hose reels (excluding <i>open-deck carparks</i>).</td></tr><tr><td></td><td>(e) To cover Class A fire risks in classrooms and associated corridors in primary and secondary schools not provided with fire hose reels.</td></tr></table> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>	Occupancy class	Risk class (as defined in AS 2444)	General provisions —Class 2 to 9 buildings (except within <i>sole-occupancy units</i> of a Class 9c building).	(a) To cover Class AE or E fire risks associated with emergency services switchboards. <i>Note 1</i>		(b) To cover Class F fire risks involving cooking oils and fats in kitchens.		(c) To cover Class B fire risks in locations where flammable liquids in excess of 50 litres are stored or used (not including that held in fuel tanks of vehicles).		(d) To cover Class A fire risks in normally occupied <i>fire compartments</i> less than 500 m ² not provided with fire hose reels (excluding <i>open-deck carparks</i>).		(e) To cover Class A fire risks in classrooms and associated corridors in primary and secondary schools not provided with fire hose reels.
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E1.8 Fire Control Centre			X		Not applicable. Effective height is more than 25m; and total floor area of more than 18,000m ² .												
E1.9 Fire Precautions during construction				X	<p>In a building under construction –</p> <p>(a) not less than one portable fire extinguisher to suit Class A, B and C fires and electrical fires must be provided at all times on each storey adjacent to each required / temporary exit; and</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>												
E1.10 Provision for Special Hazards			X		Not applicable. Not a special hazard.												

Part E2

Part E2

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Smoke Hazard Management					
E2.2 General Requirements (inclusive of Table E2.2a / Table E2.2b & NSW amendments)			X		Not applicable. No smoke hazard management is required. Class 9b building does not have a rise in storeys greater than 3.
E2.3 Provision for Special Hazards			X		Not applicable. Not a special hazard.
Part E3 - Lift Installations					
E3.1 Lift installations				X	An electric passenger lift installation and an electrohydraulic passenger lift installation must comply with Specification E3.1 <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
E3.2 Stretcher Facility in Lifts			X		Not applicable. An emergency lift is not required by E3.4; or effective height more than 12 m,
E3.3 Warning Against the use of lifts in Fire				X	A warning sign must— (a) be displayed where it can be readily seen— (i) near every call button for a passenger lift or group of lifts throughout a building; except (ii) a small lift such as a dumb-waiter or the like that is for the transport of goods only; and (b) comply with the details and dimensions of Figure E3.3 and consist of— (i) incised, inlaid or embossed letters on a metal, wood, plastic or similar plate securely and permanently attached to the wall; or (ii) letters incised or inlaid directly into the surface of the material forming the wall. “DO NOT USE LIFTS IF THERE IS A FIRE” <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
E3.4 Emergency Lifts			X		Not applicable. Effective height is not more than 25m and not a 9a building.
E3.5 Landings				X	Access and egress to and from lift-well landings must comply with the Deemed-to-Satisfy Provisions of Section D. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
E3.6 Facilities for People with Disabilities				X	In an accessible building, every passenger lift must be one of the types specified in Table E3.6a, have accessible features in accordance with Table E3.6b, and not rely on a constant pressure device for its operation if the lift car is fully enclosed. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
E3.7 Fire Service Controls			X		Not applicable. Effective height less than 12m.
E3.8 Residential Care Buildings			X		Not applicable. Not a residential care building.
E3.9 Fire service recall operation switch				X	Information relevant to specific fire service recall control switch requirements. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
E3.10 Lift car fire service drive control switch				X	Information relevant to specific lift car fire service drive control switch requirements. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
Part E4 - Visibility in an Emergency, Exit signs and Warning Systems					
E4.2 Emergency Lighting Requirements				X	An emergency lighting system must be installed— (a) in every fire-isolated stairway, fire-isolated passageway or fire-isolated ramp; and (b) in every storey of a Class 9 building where the storey has a floor area more than 300 m ² — (i) in every passageway, corridor, hallway, or the like, that is part of the path of travel to an exit; and (ii) in any room having a floor area more than 100 m ² that does not open to a corridor or space that has emergency lighting or to a road or open space; and (iii) in any room having a floor area more than 300 m ² ; and (d) in every required non-fire-isolated stairway; and (f) in every room or space to which there is public access in every storey in a Class 6 or 9b building if— (i) the floor area in that storey is more than 300 m ² ; or (ii) any point on the floor of that storey is more than 20 m from the nearest doorway leading directly to a stairway, ramp, passageway, road or open space; or (iii) egress from that storey involves a vertical rise within the building of more than 1.5 m, or any vertical rise if the storey concerned does not admit sufficient light; or

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>(iv) the storey provides a path of travel from any other storey required by (i), (ii) or (iii) to have emergency lighting; and</p> <p>Electrical Design Certification must be incorporated into the construction certificate specification</p>
E4.3 Measurement of Distance			X		<p>Informational.</p> <p>Distances, other than vertical rise, must be measured along the shortest path of travel whether by straight lines, curves or a combination of both.</p>
E4.4 Design and Operation of Emergency Lighting				X	<p>The emergency lighting system must comply with AS/NZS 2293.1-2018.</p> <p>Electrical Design Certification must be incorporated into the construction certificate specification</p>
E4.5 Exit Signs				X	<p>An exit sign must be clearly visible to persons approaching the exit, and must be installed on, above or adjacent to each—</p> <ul style="list-style-type: none"> (a) door providing direct egress from a storey to— <ul style="list-style-type: none"> (i) an enclosed stairway, passageway or ramp serving as a required exit; and (ii) an external stairway, passageway or ramp serving as a required exit; and (iii) an external access balcony leading to a required exit; and (b) door from an enclosed stairway, passageway or ramp at every level of discharge to a road or open space; and (c) horizontal exit; and (d) door serving as, or forming part of, a required exit in a storey required to be provided with emergency lighting in accordance with E4.2. <p>Electrical design plans and certification must be incorporated into the construction certificate specification</p>
E4.6 Direction Signs (inclusive of NSW E4.6)				X	<p>If an exit is not readily apparent to persons occupying or visiting the building, then exit signs must be installed—</p> <ul style="list-style-type: none"> (a) in appropriate positions in corridors, hallways, lobbies, foyers, auditoria, and the like, indicating the direction to a required exit; and (b) in a Class 9b building used as an entertainment venue — in any external egress path to a road where the exit does not open directly onto a road <p>Electrical Design Certification must be incorporated into the construction certificate specification and directional exit sign locations must be illustrated on the architectural floor plans</p>
E4.7 Class 2 & 3 Buildings & Class 4 Parts: Exemption			X		<p>Not applicable. Not a Class 2, 3 or 4 building.</p>

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
E4.8 Design & Operation of Exit Signs				X	Exit signs must comply with: (a) AS/NZS 2293.1-2018; or (b) For a photoluminescent exit sign, Specification E4.8. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
E4.9 Emergency Warning & Intercom Systems			X		Not applicable. The Class 9b building used as a school does not have a rise in storeys of more than 3.
SECTION F					
HEALTH & AMENITY					
Part F1 - Damp & Weatherproofing					
F1.0 Deemed -to-Satisfy Provisions				X	Performance Requirements FP1.4, for the prevention of the penetration of water through external wall, must be complied. There are no Deemed -to Satisfy Provisions for this Performance Solution in respect to external walls. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F1.1 Stormwater Drainage				X	Stormwater drainage must comply with AS/NZS 3500.3-2018. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F1.4 External above ground membranes				X	Any external above ground membranes must be waterproofed as per AS 4654 Parts 1 and 2-2012. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F1.5 Roof coverings				X	A roof must be covered with metal sheet roofing complying with AS 1562.1. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F1.6 Sarking				X	Sarking-type materials used for weatherproofing must comply with AS/NZS 4200.1 and AS 4200.2. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F1.7 Waterproofing of wet area				X	(b) In a Class 9 building, building elements in the bathroom or shower room or sanitary compartment must— (i) be water resistant or waterproof in accordance with Table F1.7; and (ii) comply with AS 3740, (c) Where a slab or stall type urinal is installed—

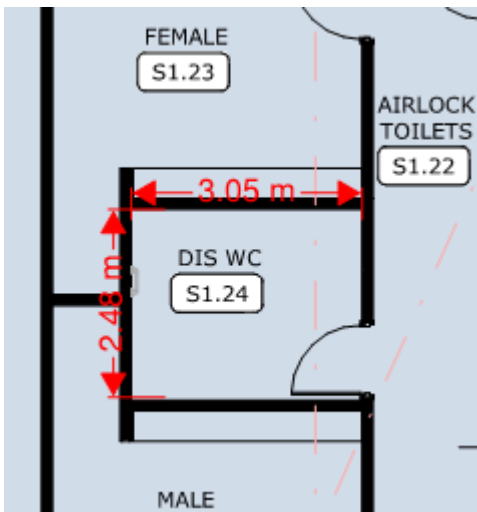


BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<ul style="list-style-type: none">(i) the floor surface of the room containing the urinal must—<ul style="list-style-type: none">(A) be an impervious material; and(B) where no step is installed—<ul style="list-style-type: none">(aa) be graded to the urinal channel for a distance of 1.5 m from the urinal channel; and(bb) the remainder of the floor be graded to a floor waste; and(C) where a step is installed—<ul style="list-style-type: none">(aa) the step must have an impervious surface and be graded to the urinal channel; and(bb) the floor behind the step must be graded to a floor waste; and(ii) the junction between the floor surface and the urinal channel must be impervious. <p>(d) Where a wall hung urinal is installed—</p> <ul style="list-style-type: none">(i) the wall must be surfaced with impervious material extending from the floor to not less than 50 mm above the top of the urinal and not less than 225 mm on each side of the urinal.(ii) the floor must be surfaced with impervious material and graded to a floor waste. <p>(e) In a room with timber or steel-framed walls and containing a urinal—</p> <ul style="list-style-type: none">(i) the wall must be surfaced with an impervious material extending from the floor to not less than 100 mm above the floor surface; and(ii) the junction of the floor surface and the wall surface must be impervious. <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
F1.9 Damp-proofing				X	<p>Where a damp-proof course is required, it must consist of a material that complies with AS/NZS 2904-1995; or impervious sheet material in accordance with AS 3660.1-2000</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
F1.10 Damp-proofing of floors on the ground				X	<p>If a floor of a room is laid on the ground or on fill, moisture from the ground must be prevented from reaching the upper surface of the floor and adjacent walls by the insertion of a vapour barrier in accordance with AS 2870-2011 (N/A to areas that do not require weatherproofing – refer specific clause exemptions).</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
F1.11 Provision of Floor Wastes			X		Not applicable. Not a Class 2, 3 or 4 building.
F1.12 Sub Floor Ventilation			X		Not applicable. No sub-floor spaces.
F1.13 Glazed Assemblies				X	Glazed assemblies within external walls in accordance with AS 2047-2014. <i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i>
Part F2 - Sanitary & Other Facilities					
F2.1 Facilities in residential buildings			X		Not applicable. Not a residential building.
F2.2 Calculation of number of occupants and fixtures			X		Informational clause. ❖ The number of persons accommodated must be calculated according to D1.13 if it cannot be more accurately determined by other means. ❖ Unless the premises are used predominantly by one sex, sanitary facilities must be provided on the basis of equal numbers of males and females. ❖ In calculating the number of sanitary facilities to be provided under F2.1 and F2.3, a unisex facility required for people with a disability may be counted once for each sex. ❖ For the purposes of this Part, a unisex facility comprises one closet pan, one washbasin and means for the disposal of sanitary towels.
F2.3 Facilities for Class 3 to 9 Buildings				X	(a) Except where permitted by (b), (c), (f), F2.4(a) and F2.4(b), separate sanitary facilities for males and females must be provided for Class 3, 5, 6, 7, 8 or 9 buildings in accordance with Table F2.3. (b) If not more than 10 people are employed, a unisex facility may be provided instead of separate facilities for each sex. (c) If the majority of employees are of one sex, not more than 2 employees of the other sex may share toilet facilities if the facilities are separated by means of walls, partitions and doors to afford privacy. (d) Employees and the public may share the same facilities in a Class 6 and 9b building (other than a school or early childhood centre) provided the number of facilities provided is not less than the total number of facilities required for employees plus those required for the public. (e) Adequate means of disposal of sanitary towels must be provided in sanitary facilities for use by females.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS																																								
					<p>(f) Separate sanitary facilities for males and females need not be provided for patients in a ward area of a class 9a building.</p> <p>Refer to Part 8.0 of this report for details of sanitary compartments provided in the school.</p> <p><u>AED assessment.</u></p> <table><tr><th colspan="4">Staff (teachers)</th></tr><tr><th></th><th>CP</th><th>U</th><th>WB</th></tr><tr><td>Male – 20</td><td>1</td><td>4* 0</td><td>2* 1</td></tr><tr><td>Female - 20</td><td>2* 1</td><td>-</td><td>2* 1</td></tr><tr><td>Accessible</td><td colspan="3">1</td></tr></table> <p>* In calculating the number of sanitary facilities, a unisex accessible sanitary compartment is counted once for each sex.</p> <p>Therefore, 1 accessible sanitary facility for use of the teachers is required to be provided. Please note, teachers and students are not permitted to share (F2.3(d)).</p> <table><tr><th colspan="4">Students</th></tr><tr><th></th><th>CP</th><th>U</th><th>WB</th></tr><tr><td>Male – 125</td><td>3</td><td>3* 2</td><td>4* 3</td></tr><tr><td>Female – 125</td><td>6 5</td><td>-</td><td>4* 3</td></tr><tr><td>Accessible</td><td colspan="3">1</td></tr></table>	Staff (teachers)					CP	U	WB	Male – 20	1	4* 0	2* 1	Female - 20	2* 1	-	2* 1	Accessible	1			Students					CP	U	WB	Male – 125	3	3* 2	4* 3	Female – 125	6 5	-	4* 3	Accessible	1		
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F2.4 Facilities for People with Disabilities				X	<p>In a building required to be accessible— SA F2.4(a)</p> <p>(a) accessible unisex sanitary compartments must be provided in accessible parts of the building in accordance with Table F2.4(a); and</p> <p>(b) accessible unisex showers must be provided in accordance with Table F2.4(b); and</p> <p>(c) at each bank of toilets where there is one or more toilets in addition to an accessible unisex sanitary compartment at that bank of toilets, a sanitary compartment suitable for a person with an ambulant disability in accordance with AS 1428.1 must be provided for use by males and females; and</p> <p>(d) an accessible unisex sanitary compartment must contain a closet pan, washbasin, shelf or bench top and adequate means of disposal of sanitary towels; and</p> <p>(e) the circulation spaces, fixtures and fittings of all accessible sanitary facilities provided in accordance with Table F2.4(a)</p>																																								

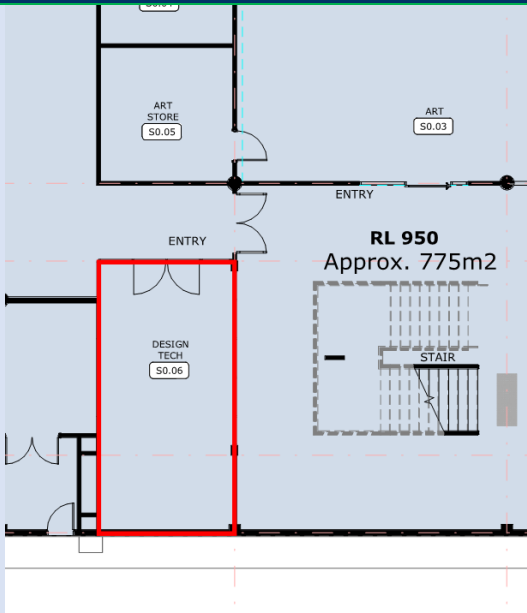
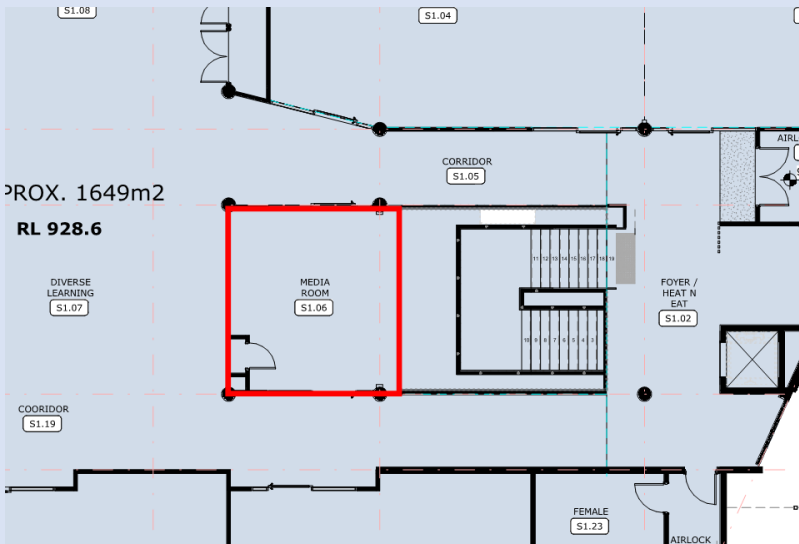
BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>and Table F2.4(b) must comply with the requirements of AS 1428.1; and</p> <p>(f) an accessible unisex sanitary facility must be located so that it can be entered without crossing an area reserved for one sex only; and</p> <p>(g) where two or more of each type of accessible unisex sanitary facility are provided, the number of left and right handed mirror image facilities must be provided as evenly as possible; and</p> <p>(h) where male sanitary facilities are provided at a separate location to female sanitary facilities, accessible unisex sanitary facilities are only required at one of those locations; and</p> <p>(i) an accessible unisex sanitary compartment or an accessible unisex shower need not be provided on a storey or level that is not required by D3.3(f) to be provided with a passenger lift or ramp complying with AS 1428.1.</p> 
F2.5 Construction of Sanitary Compartments				X	<p>Sanitary compartments must have:</p> <p>(a) Doors and partitions that separate adjacent compartments; and</p> <p>(b) the door to a fully enclosed sanitary compartment must open outwards, or slide, or be removable from outside of the compartment, unless there is a clear space of at least 1.2m between the closet pan within the compartment and the doorway.</p> <p>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</p>
F2.6 Interpretation: Urinals and washbasins			X		Information relevant to urinal and washbasin design.
F2.7 Microbial Control			X		N/A Clause deleted in NSW.

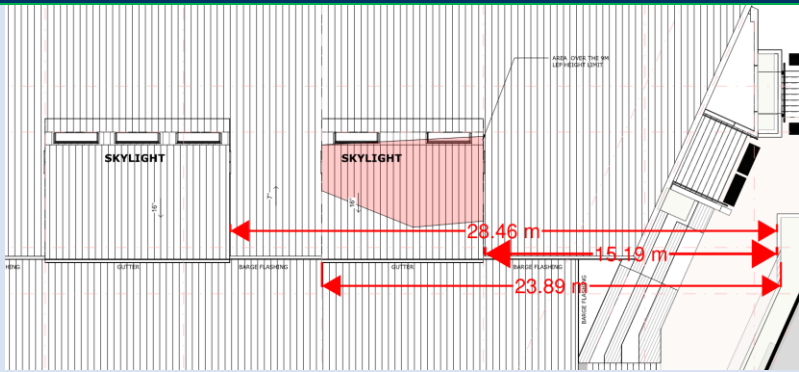
BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Note NSW F2.7 (Clause Deleted)					
F2.8 Waste Management			X		Not applicable. Not a Class 9a & 9c.
F2.9 Accessible adult change facilities			X		Not applicable. Not a Class 6 Class 9b sporting venues and other public buildings such as museums, theatres and airport of a specified size.
Part F3 Room Sizes					
F3.1 Height of Rooms and other spaces				X	<p>The ceiling height must be not less than—</p> <p>(d) in a Class 9b building—</p> <ul style="list-style-type: none"> (i) a school classroom or other assembly building or part that accommodates not more than 100 persons — 2.4 m; and (ii) a assembly building or part that accommodates more than 100 persons — 2.7 m; and (iii) a corridor— <ul style="list-style-type: none"> (A) that serves an assembly building or part that accommodates not more than 100 persons — 2.4 m; or (B) that serves an assembly building or part that accommodates more than 100 persons — 2.7 m; and (iv) the number of persons accommodated must be calculated according to D1.13; and <p>(f) In any building—</p> <ul style="list-style-type: none"> (i) a bathroom, shower room, sanitary compartment, airlock, tea preparation room, pantry, store room, garage, car parking area, or the like — 2.1 m; and (ii) a commercial kitchen & required accessible change room facility — 2.4 m; and (iii) above a stairway, ramp, landing or the like — 2 m measured vertically above the nosing line of stairway treads or the floor surface of the ramp, landing or the like.
Part F4 - Light & Ventilation					
F4.1 Provision of natural light				X	<p>Natural lighting must be provided to:</p> <ul style="list-style-type: none"> ❖ Class 9b buildings – to all general-purpose classrooms in primary and secondary schools and all playrooms or the like for the use of children in an early childhood centre. <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
F4.2		X			(a) Required natural lighting must be provided by—



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Methods and extent of natural lighting					<p>(i) windows, excluding roof lights, that—</p> <p class="list-item-l1">(A) have an aggregate light transmitting area measured exclusive of framing members, glazing bars or other obstructions of not less than 10% of the floor area of the room; and</p> <p class="list-item-l1">(B) are open to the sky or face a court or other space open to the sky or an open verandah, carport or the like; or</p> <p>(ii) roof lights, that—</p> <p class="list-item-l1">(A) have an aggregate light transmitting area measured exclusive of framing members, glazing bars or other obstructions of not less than 3% of the floor area of the room; and</p> <p class="list-item-l1">(B) are open to the sky; or</p> <p>(iii) a proportional combination of windows and roof lights required by (i) and (ii).</p> <p>(b) In a Class 9 building a required window that faces a boundary of an adjoining allotment or a wall of the same building or another building on the allotment must not be less than a horizontal distance from that boundary or wall that is the greater of—</p> <p class="list-item-l1">(i) generally — 1 m; and</p> <p class="list-item-l1">(iii) 50% of the square root of the exterior height of the wall in which the window is located, measured in metres from its sill.</p> <p><u>DTS non-compliance</u></p> <p>Ground – The Design Tech room is not provided with natural light in accordance with this clause.</p> <p>Please note borrowed natural light under F4.3 cannot be applied to Class 9b buildings.</p> <p><i>It is recommended this is addressed by a Performance Solution.</i></p>



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					 <p>RL 950 Approx. 775m2</p> <p>First Floor – The seminar room is not provided is not provided with natural light in accordance with this clause.</p>  <p>APPROX. 1649m2 RL 928.6</p> <p>Please note the skylights are not provided to provide direct natural light to the Media Room and as borrowed light cannot be applied to Class 9b rooms, it is a DTS non-compliance.</p> <p><i>It is recommended this is addressed by a Performance Solution.</i></p>

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					
F4.3 Natural light borrowed from adjoining room			X		Not applicable. Not a Class 2, 3 or 4 building.
F4.4 Artificial lighting				X	Artificial lighting in accordance with AS/NZS 1680.0-2009 to specific building areas. Electrical Design Certification must be incorporated into the construction certificate specification
F4.5 Ventilation of Rooms				X	All rooms to be provided with Clause F4.6 compliant natural ventilation OR a mechanical ventilation or air-conditioning system complying with AS 1668.2-2012. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F4.6 Natural Ventilation			X		(a) Natural ventilation provided in accordance with F4.5(a) must consist of permanent openings, windows, doors or other devices which can be opened— (i) with ventilating area not less than 5% of the floor area of the room required to be ventilated; and (ii) open to— (A) a suitably sized court, or space open to the sky; or (B) an open verandah, carport, or the like; or (C) an adjoining room in accordance with F4.7. (b) The requirements of (a)(i) do not apply to a Class 8 electricity network substation. Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification
F4.7 Ventilation borrowed from adjoining room			X		Natural ventilation to a room may come through a window, opening, ventilating door or other device from an adjoining room (including an enclosed verandah) if both rooms are within the same sole-occupancy unit or the enclosed verandah is common property, and— (b) in a Class 9 building— (i) the window, opening, door or other device has a ventilating area of not less than 10% of the floor area of

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
					<p>the room to be ventilated, measured not more than 3.6 m above the floor; and</p> <p>(ii) the adjoining room has a window, opening, door or other device with a ventilating area of not less than 10% of the combined floor areas of both rooms; and</p> <p>(c) the ventilating areas specified in (a) and (b) may be reduced as appropriate if direct natural ventilation is provided from another source.</p> <p><i>Details demonstrating compliance with this clause must be incorporated into the construction certificate plans / specification</i></p>
F4.8 Restriction of position of water closets and urinals			X		Not applicable.
F4.9 Airlocks			X		Not applicable. No air locks proposed or required.
F4.11 Carparks			X		Not applicable. No carpark.
F4.12 Kitchen local exhaust			X		Not applicable. No kitchen
Part F5 - Sound Transmission					
F5.1 Application of Part			X		Not applicable. Not a Class 2, 3 and 9c building.
F5.2 Determination of airborne sound insulation ratings			X		Not applicable. Not a Class 2, 3 and 9c building.
F5.3 Determination of impact sound insulation ratings			X		Not applicable. Not a Class 2, 3 and 9c building.
F5.4 Sound Insulation of floors between units			X		Not applicable. Not a Class 2, 3 and 9c building.
F5.5 Sound insulation of walls between units			X		Not applicable. Not a Class 2, 3 and 9c building.
F5.6 Sound insulation rating of services			X		Not applicable. Not a Class 2, 3 and 9c building.
F5.7 Sound isolation of pumps			X		Not applicable. Not a Class 2, 3 and 9c building.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
Part F6 – Condensation Management					
F6.1 Application of Part			X		Not applicable. Not a Class 2 and 4 building.
F6.2 Pliable building membrane			X		Not applicable. Not a Class 2 and 4 building.
F6.3 Flow rate and discharge of exhaust systems			X		Not applicable. Not a Class 2 and 4 building.
F6.4 Ventilation of roof spaces			X		Not applicable. Not a Class 2 and 4 building.
SECTION G ANCILLIARY PROVISIONS					
Part G1 - Minor Structures and Components					
G1.1 Swimming Pools			X		Not applicable. No swimming pool.
NSW G1.101 Provision for cleaning windows			X		Not applicable. No windows above 3.
G1.2 Refrigeration chambers, strong-rooms and vaults			X		Not applicable. A refrigerated or cooling chamber of sufficient size for a person.
G1.3 Outdoor play areas			X		Not applicable. Not a childcare centre.
Part G2 - Boilers, Pressure Vessels, Heating Appliances, Fireplaces, Chimneys and Flues					
G2.2 Installation of appliances			X		Not applicable.
G2.3 Open fire places			X		Not applicable.
G2.4 Incinerator rooms			X		Not applicable.
Part G3 - Atrium Construction					
G3.1 Application of Part			X		Not applicable. No atrium.
G3.2 Dimensions of atrium well			X		Not applicable. No atrium.
G3.3 Separation of atrium by bounding walls			X		Not applicable. No atrium.

BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
G3.4 Construction of bounding walls			X		Not applicable. No atrium.
G3.5 Construction at balconies			X		Not applicable. No atrium.
G3.6 Separation at roof			X		Not applicable. No atrium.
G3.7 Means of egress			X		Not applicable. No atrium.
G3.8 Fire and smoke control systems			X		Not applicable. No atrium.
Part G4 - Construction in Alpine Areas					
G4.1 Application of Part			X		Not applicable. Not an <i>alpine area</i> . Less than 1200m above the Australian Height Datum.
G4.3 External doorways			X		Not applicable. Not an alpine area.
G4.4 Emergency lighting			X		Not applicable. Not an alpine area.
G4.5 External ramps			X		Not applicable. Not an alpine area.
G4.6 Discharge of exits			X		Not applicable. Not an alpine area.
G4.7 External trafficable structures			X		Not applicable. Not an alpine area.
G4.8 Fire-fighting services and equipment			X		Not applicable. Not an alpine area.
G4.9 Fire orders			X		Not applicable. Not an alpine area.
Part G5 - Construction in Bushfire Prone Areas					
G5.1 Application of Part			X		Not applicable. Not a Class 2 or 3 building.
G5.2 Protection			X		Not applicable. Not a Class 2 or 3 building.
Part G6 - Occupiable Outdoor Areas					
G6.1 Application of Part			X		Not applicable. No outdoor occupiable areas that are subject to this clause.
G6.2 Fire hazard properties			X		Not applicable. No outdoor occupiable areas that are subject to this clause.
G6.3 Fire separation			X		Not applicable. No outdoor occupiable areas that are subject to this clause.



BCA DEEMED-TO-SATISFY PROVISION	COMPLIES	DOES NOT COMPLY	NA or Informational	Compliance Required	COMMENTS
G6.4 Provision for escape			X		Not applicable. No outdoor occupiable areas that are subject to this clause.
G6.5 Construction of exits			X		Not applicable. No outdoor occupiable areas that are subject to this clause.
G6.6 Firefighting equipment			X		Not applicable. No outdoor occupiable areas that are subject to this clause.



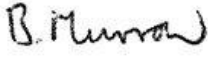
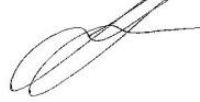
5.0 CONCLUSION

This report provides a Building Code of Australia 2019 Amendment 1 (BCA) assessment of the proposed school building and associated external works, to be located at Snowy Mountains Grammar School, 6339 Kosciuszko Rd, Jindabyne NSW.

The primary purpose of this report was to identify the non-compliance matters contained in the proposed design philosophy against the current Deemed-to-Satisfy (DTS) Provisions of the BCA and to provide compliance recommendations to overcome the DTS non-compliances.

This report provided a BCA assessment table in Section 3.0 that summarises the identified non-compliance matters and offers specific recommendations that are also outlined in the Executive Summary.

Further, if compliance with the deemed-to-satisfy provisions is not achievable or desirable, Alternative Solutions could be further developed and verified by an appropriately qualified BCA Consultant or Fire Safety Engineer.

<p>Report by</p>  <p>Ben Murrow for AE&D</p>	<p>Reviewed by</p>  <p>Trenton Jones for AE&D</p>
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6.0 ATTACHMENT A - INSPECTION & MAINTENANCE

6.1 Fire Safety Measures

The fire safety measures within the building must be maintained to ensure correct operation at all times the building is occupied. All firefighting equipment should be tagged when tested/inspected and log books kept up-to-date for all smoke detection, warning systems and sprinkler systems (where installed).

An annual fire safety certificate must be submitted to the local consent authority and the NSW Fire Brigade each year indicating satisfactory performance of the fire safety measures contained within the building. The annual fire safety statement should be displayed in a prominent place within the building (i.e. the main entry foyer)

The correct operation and maintenance of the buildings fire safety measures is critical in affording an adequate level of fire safety.

6.2 Good Housekeeping

The ongoing management of the building should ensure good housekeeping procedures. The following matters should be considered by building management:

- ❖ Ensure exits and paths of travel to exits remain unobstructed (in particular stairways)
 - ❖ Avoid storage of materials in unoccupied areas
 - ❖ Limit storage of flammable/combustible materials to designated and approved areas
 - ❖ Prevent chocking open fire/smoke doors
 - ❖ Prevent storage of materials that could hinder access to firefighting equipment
-

7.0 Type B Fire-Resisting Construction

4.1 Fire-resistance of building elements

In a building *required* to be of Type B construction—

- (a) each building element listed in Table 4, and any beam or column incorporated in it, must have an FRL not less than that listed in the Table for the particular Class of building concerned; and
- (b) * * * * *
- (c) if a stair shaft supports any floor or a structural part of it—
 - (i) the floor or part must have an FRL of 60/—/— or more; or
 - (ii) the junction of the stair *shaft* must be constructed so that the floor or part will be free to sag or fall in a fire without causing structural damage to the *shaft*; and
- (d) any *internal wall* which is *required* to have an FRL with respect to *integrity* and *insulation*, except a wall that bounds a *sole-occupancy unit* in the topmost (or only) *storey* and there is only one unit in that *storey*, must extend to—
 - (i) the underside of the floor next above if that floor has an FRL of at least 30/30/30; or
 - (ii) the underside of a ceiling having a *resistance to the incipient spread of fire* to the space above itself of not less than 60 minutes; or
 - (iii) the underside of the roof covering if it is *non-combustible* and, except for roof battens with dimensions of 75 mm x 50 mm or less or *sarking-type material*, must not be crossed by timber or other *combustible* building elements; or
 - (iv) 450 mm above the roof covering if it is *combustible*; and
- (e) a *loadbearing internal wall* and a *loadbearing fire wall* (including those that are part of a *loadbearing shaft*) must be constructed from—
 - (i) concrete; or
 - (ii) masonry; or
 - (iii) *fire-protected timber*, provided that—
 - (A) the building is—
 - (aa) a separate building; or
 - (bb) a part of a building—
 - (AA) which only occupies part of a *storey*, and is separated from the remaining part by a *fire wall*; or
 - (BB) which is located above or below a part not containing *fire-protected timber* and the floor between the adjoining parts is provided with an FRL not less than that prescribed for a *fire wall* for the lower *storey*; and
 - (B) the building has an *effective height* of not more than 25 m; and
 - (C) the building has a sprinkler system (other than a FPAA101D or FPAA101H system) throughout complying with Specification E1.5; and
 - (D) any insulation installed in the cavity of the timber building element *required* to have an FRL is *non-combustible*; and
 - (E) cavity barriers are provided in accordance with Specification C1.13; or
 - (iv) any combination of (i) to (iii); and
- (f) * * * * *
- (g) in a Class 5, 6, 7, 8 or 9 building, in the *storey* immediately below the roof, internal columns and *internal walls* other than *fire walls* and *shaft walls*, need not comply with Table 4; and
- (h) * * * * *
- (i) in a Class 2 or 3 building, except where within the one *sole-occupancy units*, or a Class 9a *health-care building* or a Class 9b building, a floor separating *storeys* or above a space for the accommodation of motor vehicles or used for storage or any other ancillary purpose, must—
 - (i) be constructed so that it is at least of the standard achieved by a floor/ceiling system incorporating a ceiling which has a *resistance to the incipient spread of fire* to the space above itself of not less than 60 minutes; or
 - (ii) have an FRL of at least 30/30/30; or

- (iii) have a *fire-protective covering* on the underside of the floor, including beams incorporated in it, if the floor is *combustible* or of metal; and
- (j) in a Class 9c building a floor above a space for the accommodation of motor vehicles or used for storage or any other ancillary purpose, and any column supporting the floor must—
 - (i) be constructed so that it is at least of the standard achieved by a floor/ceiling system incorporating a ceiling which has a *resistance to the incipient spread of fire* to the space above itself of not less than 60 minutes; or
 - (ii) have an FRL of at least 30/30/30; or
 - (iii) have a *fire-protective covering* on the underside of the floor, including beams incorporated in it, if the floor is *combustible* or of metal.

Table 4 Type B construction: FRL of building elements

Building element	Class of building—FRL: (in minutes)			
	<i>Structural adequacy/Integrity/Insulation</i>			
	2, 3 or 4 part	5, 7a or 9	6	7b or 8
EXTERNAL WALL (including any column and other building element incorporated within it) or other external building element, where the distance from any <i>fire-source feature</i> to which it is exposed is—				
For loadbearing parts—				
less than 1.5 m	90/ 90/ 90	120/120/120	180/180/180	240/240/240
1.5 to less than 3 m	90/ 60/ 30	120/ 90/ 60	180/120/ 90	240/180/120
3 to less than 9 m	90/ 30/ 30	120/ 30/ 30	180/ 90/ 60	240/ 90/ 60
9 to less than 18 m	90/ 30/—	120/ 30/—	180/ 60/—	240/ 60/—
18 m or more	—/—/—	—/—/—	—/—/—	—/—/—
For non-loadbearing parts—				
less than 1.5 m	—/ 90/ 90	—/120/120	—/180/180	—/240/240
1.5 to less than 3 m	—/ 60/ 30	—/ 90/ 60	—/120/ 90	—/180/120
3 m or more	—/—/—	—/—/—	—/—/—	—/—/—
EXTERNAL COLUMN not incorporated in an <i>external wall</i>, where the distance from any <i>fire-source feature</i> to which it is exposed is—				
For loadbearing columns—				
less than 18 m	90/—/—	120/—/—	180/—/—	240/—/—
18 m or more	—/—/—	—/—/—	—/—/—	—/—/—
For non-loadbearing columns—				
For non-loadbearing columns—	—/—/—	—/—/—	—/—/—	—/—/—
COMMON WALLS and FIRE WALLS—	90/ 90 / 90	120/120/120	180/180/180	240/240/240
INTERNAL WALLS—				
Fire-resisting lift and stair shafts—				
Loadbearing	90/ 90/ 90	120/120/120	180/120/120	240/120/120
Fire-resisting stair shafts—				
Non-loadbearing	—/ 90/ 90	—/120/120	—/120/120	—/120/120
Bounding public corridors, public lobbies and the like—				
Loadbearing	60/ 60/ 60	120/—/—	180/—/—	240/—/—
Non-loadbearing	—/ 60/ 60	—/—/—	—/—/—	—/—/—



Between or bounding <i>sole-occupancy units</i>—				
<i>Loadbearing</i>	60/ 60/ 60	120/—/—	180/—/—	240/—/—
<i>Non-loadbearing</i>	—/ 60/ 60	—/—/—	—/—/—	—/—/—
OTHER LOADBEARING INTERNAL WALLS and COLUMNS—	60/—/—	120/—/—	180/—/—	240/—/—
ROOFS	—/—/—	—/—/—	—/—/—	—/—/—



8.0 Sanitary Facility Calculations

The following calculations were provided by the architect by email dated 13.01.21

Toilets calculations.

Total for senior school (Snowy Shed + stage 1)

Male Students Senior 5M WC and 3U (6HB)

300WC, **250U**, 325HB

Total 250 Male

Female Students Senior 8FM WC (6HB)

250WC, 325HB

Total 250 Female

Building by building analysis

Administration Building – 40 staff

Male Staff 2M WC (2HB)

Total 20 Male

Female Staff 2FM WC (2HB)

Total 20 Female

Snowy shed – 100 Senior Students

Male Students Senior 2M WC and 1U (2HB) in Snowy

75WC, **50U**, 50HB

Total 50 Male

Female Students Senior 3FM WC (2HB) in Snowy

50WC, 50HB

Total 50 Female

Junior School – 100 students

Male Students Junior 2M WC (2HB) in Primary + Accessible

75WC, **50U**, 100HB

Total 50 Male

Female Students Junior 2FM WC (2HB) in Primary + Accessible

50WC, 100HB

Total 50 Female

Stage 1 Senior School – 40 staff – 250 students

Male Staff 1M WC (1HB)

Total 20 Male

Female Staff 1FM WC (1HB)

Total 20 Female

Stage 1- Male Students Senior 3M WC and 2U (4HB) + Accessible
150WC and 100U 200HB

Total 100 Male

Stage 1-Female Students Senior 5FM WC (4HB) + Accessible
150WC,200HB

Total 100 Female (Limited by 50:50 rule)

AED Assessment

Staff (teachers)			
	CP	U	WB
Male – 20	1	4* 0	2* 1
Female - 20	2* 1	-	2* 1
Accessible	1		

* In calculating the number of sanitary facilities, a unisex accessible sanitary compartment is counted once for each sex.

Therefore, 1 accessible sanitary facility for use of the teachers is required to be provided. Please note, teachers and students are not permitted to share (F2.3(d)).

Students			
	CP	U	WB
Male – 125	3	3* 2	4* 3
Female – 125	6 5	-	4* 3
Accessible	1		

* In calculating the number of sanitary facilities, a unisex accessible sanitary compartment is counted once for each sex.