

CPCCBC6001

APPLY BUILDING CODES AND STANDARDS TO THE CONSTRUCTION PROCESS FOR LARGE BUILDING PROJECTS

ASSESSMENT SUMMARY

The assessment activities for CPCCBC6001 Apply building codes and standards to the construction process for large building projects cover all aspects of the unit of competency. For Apprentices/Trainees, this includes supervisor completion of the Apprentice/Trainee Record (ATR).

Participants must read all the information given before starting any assessment task. The assessment tasks are intended to be fair, flexible, valid and reliable. If a Participant has any questions or requires alternative arrangements to be made such requests should be directed to their Trainer/Assessor, who should note such arrangements in the 'Assessor Comments' on the affected assessment. If a Participant feels they are not yet ready to be assessed, they should discuss their options with their Trainer/Assessor.

To satisfactorily complete the assessment, the Participant is required to answer all questions correctly and demonstrate their skills to industry standards. If a Participant does not answer all questions or perform all tasks, they will be deemed 'Not Satisfactory' for the task and 'Not Yet Competent' for the unit of competency.

The Trainer/Assessor can provide the Participant with additional information on interpreting the assessment outcomes and guide the Participant's options. If a Participant is still deemed 'Not Satisfactory' they will have the opportunity to undertake a supplementary assessment or appeal the result as per the process in the Student Handbook.

By signing below, the Participant acknowledges:

- They understand the assessment instructions and requirements, and consent to being assessed.
- The work submitted is to be their own work – with the work of/with others needing to be clearly acknowledged and documented.
- They consent to any photo/video recording of their work that occurs during assessment.

Participant name	BLAT ELDERED
Participant signature	

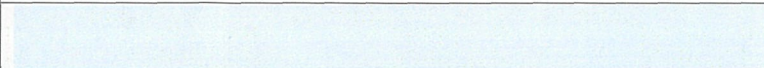
Pre-requisite unit(s) to be achieved and authenticated prior to undertaking assessment

☐ Not applicable

Task	Date completed	Assessment Results	
Theory Exam	Select Date.	☐ Satisfactory	☐ Not Satisfactory
Workbook	Select Date.	☐ Satisfactory	☐ Not Satisfactory
Practical Assessment	Select Date.	☐ Satisfactory	☐ Not Satisfactory
Outcome for CPCCBC6001	Select Date.	☐ Competent	☐ Not Yet Competent

Evidence requirements checklist (ticked by assessor and evidence supplied to RTO)

- | | |
|---|---|
| ☐ Theory Exam | ☐ Workplace Quality document/s and/or Quality Assurance Template |
| ☐ Workbook | ☐ Existing building fire protection checklist |
| ☐ Practical Assessment | ☐ Site and Working Plans |

Assessor name	
Assessor signature	

CPCCBC6001

APPLY BUILDING CODES AND STANDARDS TO THE CONSTRUCTION PROCESS FOR LARGE BUILDING PROJECTS

THEORY EXAM

Participant name	Brett Eckert
------------------	--------------

FOR THE PARTICIPANT

Instructions

- You will complete written questions as outlined on the following pages. You must attempt all questions and provide enough detail in your responses to demonstrate your knowledge.
- It is anticipated that you should complete this assessment within two (2) hours, but additional time may be allowed upon negotiation with the Assessor.
- You must complete all questions unassisted by the Assessor or other personnel but may refer to reference material as needed. All questions must be answered correctly for a 'Satisfactory' assessment outcome to be awarded.
 - An oral examination may be allowed under certain circumstances, whereby your answers will be documented by another party.
 - Any written questions that are incomplete, or not answered satisfactorily will need to be completed again after further training support.
 - If you answer a question incorrectly but modify your response, put your initials next to the written change (or the Assessor must initial a verbal change).

Resources required

Pen

FOR THE ASSESSOR

Instructions

- Where oral examination has occurred, ensure that this is acknowledged in writing (e.g. FT001 and Assessor Comments)
- All questions must be satisfactorily demonstrated by the Participant for a Satisfactory determination (indicated by an Assessor tick to the right of the question).
- Assessors are to complete marking in pen of a different colour to the Participant.
- If the Participant verbally modifies their response, write in the modified response verbatim and put your initials next to the written change.

ASSESSOR COMMENTS

As necessary, outline:

- Details on reattempts, alternative arrangements or reasonable adjustments made.
- Where a Participant is deemed 'Not Satisfactory', provide recommendations for future training.

Q1. Explain why it is important to understand references the NCC makes to Australian Standards.

Answer

Assist you to do your work safely
& ensure work is compliant with
relevant Aust Standard



Q2. You have been asked to develop a tender proposal for a large government building in your State/Territory. Discuss in depth any legislation and Codes your submission must comply with?

Answer

The building will need to comply with
the applicable Australian Standards, ensure
compliance with the National Building Code
& any specific state by state requirements
within & then any local laws req by
assessment or Building Approval. Building &
plumbing laws required by the State need to
be adhered to.



Q3. Describe the listed NCC compliance assessment methods used to determine compliance using a Performance Solution pathway.

Answer

Assessment method	Description
Evidence of suitability	Issuing a statement from Supplier or manufacturer confirming & demonstrating compliance to Standards & performance NCC codes, ensuring suitable provisions through documented evidence.
Verification methods	Verification methods are tests & calculations prescribing a way to comply with the NCC Performance Requirements.
Comparison with DTS Provisions	A comparison with DTS provision allows a comparison between the DTS provision and a building or plumbing & drainage solution.
Expert Judgement	Expert Judgement is the judgement of a person who has the qualifications & experience necessary to determine whether a building or plumbing & drainage solution complies with the Performance Requirements.



Q4. Discuss the importance of documenting quality assurance and quality control processes relevant to the build.

Answer

A robust quality assurance & control process ensures that minimum requirements are documented and captured to allow completion of a project in line with fit for purpose outcomes, aligns with Australian Standards and NCC codes & ensure effectiveness of design & workmanship in line with guidance docs/standards/codes. A QA process allows assessment of the performance of process & work products against process description, principles & methods, ensures any non compliance issues are tracked & closed & tended to.



Q5. Discuss the basic principles of structural design and how stress or strain occurs.

Answer

A building must be designed to provide strength, stability, serviceability and durability & must be able to withstand loads effectively. The design principles of any structure that is under the influence of stress, strain, compression, bending, or combined actions mainly depend upon three factors.

- 1) Structural Safety: design methods to prevent collapse.
- 2) Serviceability: Design so that the masses can use structure in a certain time or period
- 3) Value Engineering: Use of material or methods at affordable costs.



Q6. Discuss compressive and tensile stresses on buildings?

Answer

Compression is a force that pushes the particles of a material close together. A column supporting a load may "shorten". Bending condition in a structure is squashed & bent from some point like the middle & end.



Q7. Describe considerations you make when writing workplace procedures.

Answer

When writing workplace procedures, careful consideration must be given to workplace safety standards and alignment to WHS/OHS Acts & obligations, licensing requirements, Codes of Practice, Aust Standards, SWMS, Operation Manuals & MSDS & Acts, regulations.



Q8. Discuss the listed levels found in the NCC Performance Hierarchy.

Answer

Performance Hierarchy	Description
Objectives	Describes the communities expectations for building under the objectives section
Functional statements	Explains how the buildings will meet the goals.
Performance requirements	Defines the minimum requirements / levels of performance that a building must achieve to accomplish the objectives & Functional statements.
Building Solutions	BCA building solutions are performance based & achievement of compliance. 1) by complying with prescriptive reg's (PTS) 2) by assessing a "Performance Solution" by satisfying the applicable "Performance Reg" using verification defined in BCA 3) A hybrid of the two approaches.



Q9. Discuss two (2) properties, two (2) characteristics and two (2) limitations of concrete when used for buildings.

Answer

	Concrete
Properties	- Strength - Compressive Strength - Durability & Workability
Characteristics	- Fineness of cement - Sandness - Strength - Setting time.
Limitations	Tensile strength is very low & it develops cracks over time



Q10. Discuss three (3) benefits of using glass in buildings?

Answer

1. Architecturally pleasing - provides an aesthetic characteristic that ensures building is visually pleasing
2. Natural lighting influx. - Glass allows more transmission of natural light into building
3. Acoustic Benefit: Vary solutions of glass & frame make up to provide a varying range of acoustic solutions.



Q11. Describe information you can determine from the working drawings and specifications when organising the excavation for the site of a three (3) storey unit block with underground parking.

Answer

Working drawings & specifications provide dimensions, & details to fabricate, assemble build & install construction elements by including plans, sections, details & technical requirements to be met.



Q12. Who would you discuss materials and plans with to ensure compliance with NCC Performance Requirements and site safety. Provide two (2) and explain your answers.

Answer

1) Architect: ensure selection of materials and development of plans to suit NCC, site, project & to achievement of compliance.

2) Certifier (Building) to ensure & confirm what aspects of NCC need to be applied to the project and how/confirm how these will be achieved.



Q13. Why may you need to use a combination of Performance Solutions and Deemed-to-Satisfy (DtS) solutions to comply with the Performance Requirements of the NCC

Answer

There may be situations where a single performance requirement applies to many elements within a structure. A mix of solutions used to demonstrate compliance.
Sec 3.5.



CPCBC6001

APPLY BUILDING CODES AND STANDARDS TO THE CONSTRUCTION PROCESS FOR LARGE BUILDING PROJECTS

WORKBOOK

Participant name	Brett Elwood
------------------	--------------

FOR THE PARTICIPANT

Instructions

- You will complete written activities as outlined on the following pages. You must attempt all questions and provide enough detail in your responses to demonstrate your knowledge.
- The timeframe for these tasks will be established by your Assessor or Training Plan, but additional time may be allowed upon negotiation with the Assessor.
- You must complete all questions unassisted by the Assessor or other personnel but may refer to reference material as needed. All questions must be answered correctly for a 'Satisfactory' assessment outcome to be awarded.
 - An oral examination may be allowed under certain circumstances, whereby your answers will be documented by another party.
 - Any written questions that are incomplete, or not answered satisfactorily will need to be completed again after further training support.
 - If you answer a question incorrectly but modify your response, put your initials next to the written change (or the Assessor must initial a verbal change).

Resources required

Pen

FOR THE ASSESSOR

Instructions

- Where oral examination has occurred, ensure that this is acknowledged in writing (e.g. FT001 and Assessor Comments)
- All questions must be satisfactorily demonstrated by the Participant for a Satisfactory determination (indicated by an Assessor tick to the right of the question).
- Assessors are to complete marking in pen of a different colour to the Participant.
- If the Participant verbally modifies their response, write in the modified response verbatim and put your initials next to the written change.

ASSESSOR COMMENTS

As necessary, outline:

- Details on reattempts, alternative arrangements or reasonable adjustments made.
- Where a Participant is deemed 'Not Satisfactory', provide recommendations for future training.

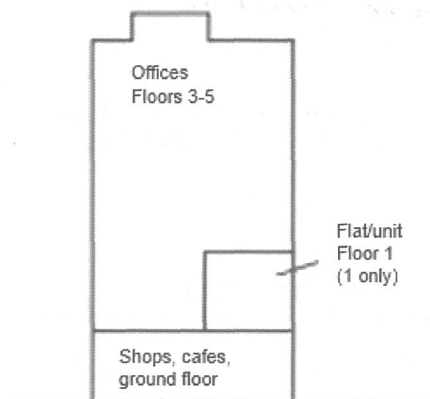
NOTE

At times, you will be provided with a specific business context to which you must respond, otherwise it is anticipated that you will use a workplace of your choosing (your own, or hypothetical) to provide the context to the task.

At all times, the responses in your assessment must reference **Australian** (Queensland or Federal) documentation, including legislation, regulations, codes of practice, standards and guidance publications.

ACTIVITY 1

Access the NCC via the internet to determine the Building Classification/s that apply to the building diagram below. The building is to contain offices in the upper floors, one caretaker flat on the first floor and shops and cafes on the ground floor. Explain your findings below.



Answer

- office floors 3-5 = Class 5, utilized for business or professional purposes
- Flat/Unit Floor = Class 4 - as it is part of a building that is a dwelling or residence within a non-residential building
- Shops/cafes on ground floor = Class 6 given it's a shop or other structure used for retail sale of goods or provisions of services.

Satisfactory
Outcome



ACTIVITY 2

Access the NCC via the internet to locate the requirements applicable to a building development in the Brisbane area, containing 6 sole-occupancy units, two (2) on each level, each being a separate dwelling.
This building includes one (1) basement level designated for car parking.
The proposed building structure requires reinforced concrete floors and columns.
Document your findings or where in the NCC the information can be located.

Building Description

Classification
Basement = class 10 6x sole occupancy units = Class 2. class A construction C1.1
Rise in Storeys
3 - above ground C1.2
Number of Storeys
3 - C1.2 at NCC
Type of construction
Class A.
Climate Zone and description
Climate Zone 2 = warm, humid summer, mild winter climate zone map = ABCB

Fire resistance and stability

Locate fire resistance information
Part C1.1 - Fire Resisting Construction 2) a part of a building element is exposed to a fire source feature if any of the horizontal straight lines between that part & the fire source feature or vertical projection of the feature is not obstructed by another part of the building that 1) has an FRL of not less than 30/-/- 2) is neither transparent nor translucent.

Reinforced concrete requirements relative to Australian Standards

Part 3.2.5 Vol 2 NCC amendment 1

Part 3.2.3 - concrete & reinforcing

- 3.2.3.1 concrete
- 3.2.3.2 - reinforcement.

Glazing requirements specifically for windows, sliding doors with frames and balconies.

Part 3.6 - Glazing

3.6.4.1 - Doors

9

ACTIVITY 3

The building discussed in ACTIVITY 2 includes one (1) basement level designated for car parking.

Provide information required for

- Bored piling to retain the soil and enable basement walls.
- Work Health and Safety
- Water proofing
- Water ingress

Document your findings or where the information can be located.

Bored piling to retain soil and enable basement walls

- As 2159 - Piling - Design + Installation
sets out minimum req for design & install
& testing for bored footings.

Work Health and Safety

Workplace Health & Safety Act 2011.
provides a balanced & nationally consistent
framework for health + safety & ensuring a
safe & healthy working environment

Water proofing

Waterproofing As't Standard As 3740.2021,
Part 10.2 of NCC
- Ensure install/application of waterproofing to details
to keep water out & from impacting foundations

Water ingress

Water ingress to basement can impact structural finishes
& undermine structural & architectural elements.
COP & Australian Standards should be referred to
to determine appropriate construction methodologies
& reduce/eliminate water ingress. Structural & architectural specification,
& design would dictate methods to manage ingress

Satisfactory
Outcome



CPCBC6001

APPLY BUILDING CODES AND STANDARDS TO THE CONSTRUCTION PROCESS FOR LARGE BUILDING PROJECTS

PRACTICAL ASSESSMENT

Participant name	BLETT ELDRED
------------------	--------------

FOR THE PARTICIPANT

Instructions

- The tasks outlined on the following pages will require performance of normal workplace activities, as a result of a structured activity set by an Observer in the workplace or a simulated activity set by your Assessor/Observer.
- The timeframe for these tasks will be established by your Assessor/Observer, in consideration of location conditions and industry requirements.
- You must complete all tasks unassisted by the Assessor or other personnel, unless the steps note this assistance.
- You must attempt all tasks (and itemised steps) for a 'Satisfactory' assessment outcome to be awarded.
 - For any observation conducted that is incomplete, or without satisfactory performance, the observation will need to be completed again after further training support.

FOR THE ASSESSOR/OBSERVER

Instructions

- The following observation record should be used to judge and record your observations of the Participant as they complete the task(s) set. You must record your observations of the Participant's performance.
 - For each occasion, indicate the task performed and whether it was a simulation or workplace-based task.
 - Any simulated assessment must ensure the Participant still performs under workplace conditions which reflect industry standards.
 - In the comments, provide clear detail regarding the task that the Participant was required to do (e.g. PPE used, materials handled, attachments connected, plant types).
- All steps must be satisfactorily demonstrated by the Participant for a 'Satisfactory' determination (indicated by an Assessor tick to the right of each itemised step, or an Observer tick to the right of each itemised step, and confirmation by an Assessor in the Assessor Comments).
 - Where you have determined that one or more task steps have not been satisfactorily demonstrated, provide the Participant with additional support and outline details of such assistance in the Assessor/Observer Comments. Allow the Participant two (2) further opportunities to demonstrate the task again to allow an opportunity for a 'Satisfactory' assessment outcome to be achieved.
 - If after three (3) attempts the Assessor determines that the Participant cannot demonstrate the required steps, a 'Not Satisfactory' outcome is to be determined.

TASK OUTCOME					
Task	Date	Task Type (Tick)	Location	Task outcome (Tick)	
				Satisfactory	Not Satisfactory
Task 1	Select Date.	☐ Workplace ☐ Simulation		☐	☐

ASSESSOR COMMENTS: GENERAL

As necessary, outline:

- Details on reattempts, alternative arrangements or reasonable adjustments made.
- Where a Participant is deemed 'Not Satisfactory', provide recommendations for future training.

ASSESSOR COMMENTS: PRACTICAL TASK 1

- ☐ Individual student (as named on cover page)
☐ Multiple students [☐ All from Attendance Report, ☐ Specific students involved – identify students]

Task	Provide detail
1.1A.	Specify how scope of work was determined:
1.1A.	Specify how general requirements and prescriptive requirements of the NCC were determined and documented:
1.1B.	How were relevant Australian Standards identified and located:
1.2A. 1.2B. 1.3A. 1.3H. 1.5C. 1.5D.	Specify (✓) where building classifications, criteria requirements and performance solutions were documented: ☐ Workplace Quality document ☐ Quality Assurance Template ☐ Other (please specify): ☐ Document attached as evidence
1.3F.	Specify (✓) who was consulted regarding compliance options: ☐ Project management ☐ Relevant tradesperson ☐ Builder ☐ Supplier ☐ Other (please specify):
1.4A. 1.4B.	Specify (✓) where NCC requirements for passive and active fire protection and performance solutions were documented: ☐ Workplace Quality document ☐ Quality Assurance Template ☐ Other (please specify): ☐ Document attached as evidence

ASSESSOR COMMENTS: PRACTICAL TASK 1	
1.4C.	Specify existing buildings checked for compliance with active fire protection requirements: ☐ Is checklist used attached as evidence?
1.5A. 1.5B.	Specify (✓) communication methods applied to manage construction and other trades compliance: ☐ Emails ☐ Schedule ☐ Memos ☐ Daily meetings ☐ Site induction ☐ Other (please specify):
1.5E.	Specify how non-confirming building materials and products were managed using evidence of suitability:

CPCCBC6001

APPLY BUILDING CODES AND STANDARDS TO THE CONSTRUCTION PROCESS FOR LARGE BUILDING PROJECTS

Practical Task 1

Description of task:

The participant must demonstrate the skills and knowledge to make a range of critical decisions in relatively complex situations while applying building codes and standards to one (1) building project over three (3) storeys, with below ground construction to meet the requirements of the National Construction Code (NCC) prior to the build commencing. The participant must also inspect existing buildings for fire compliance. Assessor and observer will be looking for evidence including:

- Interpret relevant codes and standards' requirements.
 - Determine the scope of works and NCC general requirements and Performance Requirements to achieve a DtS solution.
 - Identify Australian Standards referenced in the NCC Relevant to the build and confirm the requirements.
- Classify the building/s.
 - Determine the use and arrangement of the building and apply the appropriate NCC classification/s.
 - Locate and document NCC requirements for multiple classifications.
- Apply solutions to construction problems.
 - Determine the range of NCC criteria required to ensure project compliance.
 - Identify alternative, compliant solutions for construction problems to comply with NCC Performance Requirements.
 - Meet the Performance Requirement of the NCC by applying a Performance Solution supported by one or a combination of the Assessment Methods.
 - Use a Deem-to-Satisfy (DTS) solution supported by one or a combination of Assessment Methods to meet NCC compliance.
 - Use a combination of Performance Solutions and DTS solutions to comply with the Performance Requirements of the NCC.
 - Discuss compliance options with relevant construction personnel to ensure compliance with NCC Performance Requirements.
 - Identify and complete relevant documentation to meet Performance Requirements of the NCC.
- Apply fire protection requirements.
 - Read the NCC requirements to determine fire resistance required for all classes and types of buildings.
 - Identify and apply NCC requirements with respect to passive and active fire protection to all classes and types of buildings.
 - Check existing buildings for compliance with passive and active fire protection requirements according to NCC requirements. (See HO2 and NCC to create checklist)
- Implement strategy to manage construction compliance.
 - Establish strategies to manage construction compliance of large, complex and high-rise buildings with the NCC.
 - Implement and coordinate the work of professionals involved in the development and management of the building process.
 - Seek effective design solutions for buildings of more than three storeys to meet the needs of clients and ensure compliance with the NCC.
 - Design and implement quality assurance processes to ensure effective and compliant management of the construction process.
 - Detect non-conforming building materials and products and manage the evidence of suitability as required in the NCC.

These tasks may be simulated or real. The Participant is to gather evidence of how they have completed each component of the Practical Task, which is to be submitted with this Practical Assessment sheet. Evidence includes site plan and workplace documents covering the information required. A template is available.

Practical Task 1	
The Observer is to provide detailed comments on the tasks completed by the Participant (on the Observer Comments, overleaf). The Assessor is to verify the Observer's comments, noting their findings in the Assessor Comments (on the back of the Practical Assessment cover page) and provide the assessment outcome.	
Resources required: Construction schedules, plans, drawings and specifications for one (1) building project over three (3) storeys, with below ground construction; workplace quality policies and procedures; technology to access building and related industry codes, standards and manufacturer product information and materials specifications; Technology to access the NCC and current relevant Acts and Regulations. PPE as required.	
Observer details	
Name of observer:	
Role of observer (Confirm suitability to sign)	
Email address of observer	
Signature of observer:	
Date:	Select Date.

When completing the task, did the Participant:	Tick if satisfactorily completed. Provide comments if left unticked.
1 Interpret relevant codes and standards' requirements	
1.1A. Determine the scope of works and NCC general requirements and Performance Requirements to achieve a DTS solution.	☐
1.1B. Identify Australian Standards referenced in the NCC Relevant to the build and confirm the requirements.	☐
2 Classify the building	
1.2A. Determine the use and arrangement of the building and apply the appropriate NCC classification/s.	☐
1.2B. Locate and document NCC requirements for multiple classifications.	☐
3 Apply solutions to construction problems	
1.3A. Determine the range of NCC criteria required to ensure project compliance.	☐
1.3B. Identify alternative, compliant solutions for construction problems to comply with NCC Performance Requirements.	☐
1.3C. Apply a Performance Solution supported by one or a combination of the Assessment Methods to meet the Performance Requirement of the NCC.	☐
1.3D. Use a Deem-to-Satisfy (DTS) solution supported by one or a combination of Assessment Methods to meet NCC compliance.	☐
1.3E. Use a combination of Performance Solutions and DTS solutions to comply with the Performance Requirements of the NCC.	☐
1.3F. Discuss compliance options with relevant construction personnel to ensure compliance with NCC Performance Requirements.	☐
1.3G. Lead discussions to explore solutions to complex design problems with relevant construction personnel.	☐
1.3H. Identify and complete relevant documentation to meet Performance Requirements of the NCC.	☐

When completing the task, did the Participant:	Tick if satisfactorily completed. Provide comments if left unticked.
4 Apply fire protection requirements	
1.4A. Read the NCC requirements to determine fire resistance required for all classes and types of buildings.	☐
1.4B. Identify and apply NCC requirements with respect to passive and active fire protection to all classes and types of buildings.	☐
1.4C. Check existing buildings for compliance with passive and active fire protection requirements according to NCC requirements. <i>(See HO2 and NCC to create checklist)</i>	☐
5 Implement strategy to manage construction compliance	
1.5A. Establish strategies to manage construction compliance of large, complex and high-rise buildings with the NCC.	☐
1.5B. Implement and coordinate the work of professionals involved in the development and management of the building process.	☐
1.5C. Seek effective design solutions for buildings of more than three storeys to meet the needs of clients and ensure compliance with the NCC.	☐
1.5D. Design and implement quality assurance processes to ensure effective and compliant management of the construction process.	☐
1.5E. Detect non-conforming building materials and products and manage the evidence of suitability as required in the NCC.	☐

Quality Assurance Plan Template

Project Name: Woodford Youth Detention Centre	
Project address: Woodford	Site Plan attached: Yes
Prepared by: Brett Eldred	
Date: 21/04/24	
Description of project: Green field site that is to be cut to bring site to correct building RL. Building project includes preparation of site to cut site to BEL, installation of services prior to the construction of multiple detention buildings including support and education facilities. Buildings will be a mixture of accommodation, training and education and administration and clerical offices.	
Site Classification/s: Extract from Civil Specification addressing basis of site classification	



GEOTECHNICAL REPORT: Proposed Youth Detention Centre

Neurem Road

Woodford

Phillips Smith Conwell

March 2024

PG-10024

Version 2



Site Geotechnical Investigation Report

A site investigation has been conducted by Pacific Geotech Consulting Geotechnical Engineers, and copies of the following reports are included in the specification documents:

- Preliminary geotechnical report - ref: pg-10024,2023-04-05, gr ver 1, dated 12/04/2023, by pacific geotech.

The soil classification descriptions and field tests were carried out in general accordance with Australian Standards.

AS 1726 Geotechnical Site Investigations

AS 1289 Methods of Testing Soils for Engineering Purposes

Extract from Geotechnical Report

Description and Classification Methods

The description and classification of soils and rocks used in this report are based on AS 1726.

Soil types are described according to the predominating particle size and behaviour as set out in the attached Unified Soil Classification Table qualified by the percent of

9.0 SITE CLASSIFICATION

Site investigation and laboratory test results indicate the development site would be classified Class 'P' in accordance with AS 2870-2011 'Residential Slabs and Footings' due to the depth of fill.

Documentation of design and construction (suitability or evidence of suitability)

Site preparation

Site preparation	NCC / Australian Standards requirements	Compliant Performance solution
------------------	---	--------------------------------

Earthworks	Australian Standards All materials, components, methods, and labour used in the work shall comply with the requirements of current versions of the following standards: ▶ AS 1289 Methods of testing soil for engineering purposes ▶ AS 1726 Geotechnical site Investigations ▶ AS 3600 Concrete Structures ▶ AS 3798 Guidelines on earthworks for commercial and residential developments Comply with all other current relevant standards. This compliance includes all amendments issued at the date of the Contract signing.	
Site preparation		
Site preparation	NCC / Australian Standards requirements	Compliant Performance solution
Earth retaining structures	TRADE PACKAGE Specification for Concrete Piling Works REF: SPC-S-CONCRETE PILING ISSUE: A 1.3 REFERENCES All materials, components, methods and labour used in the work shall comply with the requirements of current versions of the following standards (including all amendments issued at the date of the Contract signing):- ▶ AS 1012 Concrete Testing (series) ▶ AS 1379 Specification and Supply of Concrete ▶ AS 1726 Geotechnical Investigations ▶ AS 2159 Piling - Design and Installation ▶ AS 3600 Concrete Structures ▶ AS 4678 Earth Retaining structures	

Drainage	PRINCIPAL DESIGN CONSULTANT PHILLIPS SMITH CONWELL ABN 94 009 866 862 46 Berwick St Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipssmithconwell.com.au	PROJECT Woodford Youth Detention WYDC
	CONSULTANT ADG ABN 63 131 876 143 596 Milton Road TOOWONG QLD 4066 PO Box 1492 TOOWONG BC QLD 4066 T 1300 657 402 adgce.com	
	CLIENT Queensland Government Department of Youth Justice, Employment, Small Business and Training	FOR Queensland Government Department of Energy and Public Works
	FOR TENDER / CONSTRUCTION Design Manager: _____ Cost Planner: _____ Consultant: _____	TRADE PACKAGE Specification for Civil Works REF: SPC-C-CIVIL ISSUE: 06
	AMENDMENT / ISSUE RECORD	

	All materials, components, methods and labour used in the work shall comply with the requirements of current versions of the following standards (including all amendments issued at the date of the Contract signing): › AS 1289 Methods of Testing Soils for Engineering Purposes › AS/NZS 1254 PVC pipes and fittings for storm and surface water applications. › AS 1289 Methods for testing soils for engineering purposes (All parts) › AS/NZS 3500.3 Plumbing and Drainage – Stormwater Drainage › AS/NZS 3725 Loads on buried concrete pipes › AS/NZS 3996 Access covers and grates › AS/NZS 4058 Precast concrete pipes. › AS 4139 Fibre reinforced concrete pipes and fittings. Comply with all other current relevant standards, specifications in Building Code and/or Local Council publications and manufacturers recommendations.	
Site preparation	NCC / Australian Standards requirements	Compliant Performance solution
Termite risk management		

PRINCIPAL DESIGN CONSULTANT		PROJECT													
 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipssmithconwell.com.au		Woodford Youth Detention Centre WYDC													
CONSULTANT															
 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipssmithconwell.com.au															
CLIENT		FOR													
 Queensland Government Department of Energy and Public Works		 Queensland Government Department of Youth Justice, Employment, Small Business and training													
FOR TENDER / CONSTRUCTION		TRADE PACKAGE													
Design Manager:		Termite Treatment													
Cost Planner:															
 Jan Robinson Project Director		REF: TP-290 ISSUE: A													
AMENDMENT / ISSUE RECORD		6400336-TP-290 Termite Treatment.docx													
<table border="1"><thead><tr><th>AMD</th><th>DESCRIPTION</th><th>INT</th><th>DATE</th></tr></thead><tbody><tr><td>A</td><td>ISSUED FOR TENDER QA DOCUMENT REVIEW</td><td>KK/R</td><td>15.03.24</td></tr></tbody></table>		AMD	DESCRIPTION	INT	DATE	A	ISSUED FOR TENDER QA DOCUMENT REVIEW	KK/R	15.03.24	<table border="1"><thead><tr><th>AMD</th><th>DESCRIPTION</th><th>INT</th><th>DATE</th></tr></thead><tbody></tbody></table>		AMD	DESCRIPTION	INT	DATE
AMD	DESCRIPTION	INT	DATE												
A	ISSUED FOR TENDER QA DOCUMENT REVIEW	KK/R	15.03.24												
AMD	DESCRIPTION	INT	DATE												
290.1(b) Reference Documents Reference Documents within this specification appear in <u>Blue Italic Underlined Type</u>. Refer to the following separate documents: - <u>Preliminaries</u> - <u>General Requirements</u> - <u>General Standards</u>, in particular: - Termite barriers: To AS 3660.1. - See AS 3660.2 for termite management in existing buildings and AS 3660.3 for assessing the effectiveness of proposed systems. For timber pest inspections of existing buildings, see AS 4349.3. - <u>General Metalwork</u> - <u>Architectural Legend</u> - <u>Structural Documentation</u> - Drawings as determined by Managing Contractor															

Materials	PRINCIPAL DESIGN CONSULTANT  ABN 94 009 866 862 46 James Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillips@smithconwell.com.au CONSULTANT  ABN 94 009 866 862 46 James Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillips@smithconwell.com.au CLIENT  Queensland Government Department of Energy and Public Works FOR TENDER / CONSTRUCTION Design Manager: _____ Cost Planner: _____  Consultant: _____ AMENDMENT / ISSUE RECORD PROJECT Woodford Youth Detention Centre WYDC FOR  Queensland Government Department of Youth Justice, Employment, Small Business and training TRADE PACKAGE General Requirements REF: TP-G02 ISSUE: C
-------------------------	--

G02.4(b) **Materials and Workmanship**
All materials and workmanship shall be best quality throughout and subject to the approval of the Managing Contractor and generally in accordance with the SAA and BSI Codes. Unless otherwise specified or directed, all materials shall be new.

Footings and slabs	Project No. PG-10024 March 2024 Ref: PG-10024_2024-02-23_GN VER 2 <u>Phillips Smith Concept</u> – Geotechnical Investigation - Proposed Youth Detention Centre, Neurem Road, Woodford Page 16 tolerate settlement, characteristic ground surface movements and construction considerations. 11.2High-Level Footings A high level footing system could be adopted for the support of the proposed structures, founding through the surficial fill material, sands and water affected clays and into the stiff or better clays or rock. The design of high-level footings can be based on the allowable bearing pressures presented in Table 3 below. TABLE 3 ALLOWABLE DESIGN PARAMETERS FOR HIGH LEVEL FOOTINGS <table><tr><th colspan="2">Material⁽¹⁾</th><th>Allowable Bearing Pressure (kPa)⁽³⁾</th></tr><tr><td colspan="2">Controlled Fill⁽²⁾</td><td>100</td></tr><tr><td rowspan="4">Natural Clay</td><td>Stiff</td><td>100</td></tr><tr><td>Stiff to Very Stiff</td><td>150</td></tr><tr><td>Very Stiff</td><td>200</td></tr><tr><td>Hard</td><td>400</td></tr><tr><td rowspan="3">HW Rock</td><td>Extremely/Very Low Strength</td><td>500</td></tr><tr><td>Low Strength</td><td>600</td></tr><tr><td>Medium Strength</td><td>1000</td></tr><tr><td>MW/SW/Fr Rock</td><td>High/Very Strength</td><td>2000</td></tr></table> Notes: 1. All founding material should be verified by a suitably qualified geotechnical engineer or engineering geologist during construction. 2. In accordance with AS3798-2007. 3. Based on a factor of safety of 3.0.	Material ⁽¹⁾		Allowable Bearing Pressure (kPa) ⁽³⁾	Controlled Fill ⁽²⁾		100	Natural Clay	Stiff	100	Stiff to Very Stiff	150	Very Stiff	200	Hard	400	HW Rock	Extremely/Very Low Strength	500	Low Strength	600	Medium Strength	1000	MW/SW/Fr Rock	High/Very Strength	2000	
	Material ⁽¹⁾		Allowable Bearing Pressure (kPa) ⁽³⁾																								
Controlled Fill ⁽²⁾		100																									
Natural Clay	Stiff	100																									
	Stiff to Very Stiff	150																									
	Very Stiff	200																									
	Hard	400																									
HW Rock	Extremely/Very Low Strength	500																									
	Low Strength	600																									
	Medium Strength	1000																									
MW/SW/Fr Rock	High/Very Strength	2000																									
Footings and slabs	NCC / Australian Standards requirements	Compliant Performance solution																									

Moisture Barrier

PHILLIPS
SMITH
CONWELL

ABN 94 009 866 862
46 Berwick Street,
Fortitude Valley
PO Box 479 Fortitude Valley
QLD 4006 AUSTRALIA
T +617 3257 1167
phillipssmithconwell.com.au

CONSULTANT

PHILLIPS
SMITH
CONWELL

ABN 94 009 866 862
46 Berwick Street,
Fortitude Valley
PO Box 479 Fortitude Valley
QLD 4006 AUSTRALIA
T +617 3257 1167
phillipssmithconwell.com.au

CLIENT



Queensland
Government

Department of Energy and Public Works



Queensland
Government

Department of Youth Justice, Employment,
Small Business and training

FOR TENDER / CONSTRUCTION

Design Manager:

Cost Planner:


Min Robinson
Project Director

AMENDMENT / ISSUE RECORD

AMD	DESCRIPTION	INT	DATE
A	ISSUED FOR TENDER QA DOCUMENT REVIEW	KK/R	28.03.24

Woodford Youth
Detention Centre
WYDC

FOR

TRADE PACKAGE

Waterproofing

REF: TP-313 ISSUE: A

6400336-TP-313 Waterproofing.docx

AMD	DESCRIPTION	INT	DATE

Page 10 of 46

CSTC Pty Ltd_RTO#0699_v1-0_10/02/2023

	313.4 EXTENT OF WORK 313.4(a) Waterproof Membrane to Blockwork / OFC Walls & Footings To locations noted below, supply and install membrane system as described below: Location: - Typical: Behind all concrete block or precast retaining walls and associated footings. - Pits & Trenches: Across blinding slab and up behind slab edge and OFC pit/trench walls - Excludes <u>Electrical and Lift Pits</u> (see below). Refer <u>Structural</u> for water stops. System description: Green Star Compliant rapid curing, high solids, low VOC, moisture cure modified polyurethane waterproofing membrane that can be applied to "Green" (24 hour old) concrete. - Elongation: 313 % (AS 4654.1) - Thickness: 1.4mm min dry film thickness - Free: Pitch & bitumen free - Solids: Solids content >85% - VOC: Low VOC, 250g/L max Proprietary Item: TREMproof 250GC or equal approved, installed in accordance with the manufacturer's directions and to suit waterproofing system. Installation: In accordance with manufacturer's directions, including proprietary corner joints. 313.4(b) Waterproof Membrane to Electrical and Lift pits To locations noted below, <u>supply and install</u> waterproofing system as described below: Location: To bottom and sides of electrical and lift pits as indicated on <u>Plans</u> and <u>Details</u>. System description: A pre-applied waterproof membrane to exterior and hydrophilic strip in the concrete pour joints. WOODFORD NEW YOUTH DETENTION CENTRE Major Projects/ Department of Energy and Public Works for Department of Youth Justice, Small Business and Training PHILLIPS SMITH CONWELL ARCHITECTS Date: 28.03.24 Spec: A Page: 4 of 5 313 WATERPROOFING - Membrane: Multi-layer sheet membrane waterproofing system consisting of a self-sealing, expandable layer of bentonite laminated to an impermeable, high-density polyethylene (HDPE).	
Materials	System description: Green Star Compliant rapid curing, high solids, low VOC, moisture cure modified polyurethane waterproofing membrane that can be applied to "Green" (24 hour old) concrete. - Elongation: 313 % (AS 4654.1) - Thickness: 1.4mm min dry film thickness - Free: Pitch & bitumen free - Solids: Solids content >85% - VOC: Low VOC, 250g/L max Proprietary Item: TREMproof 250GC or equal approved, installed in accordance with the manufacturer's directions and to suit waterproofing system.	
Concrete and reinforcement		
Concrete and reinforcement	NCC / Australian Standards requirements	Compliant Performance solution

Concrete and reinforcement	PRINCIPAL DESIGN CONSULTANT	PROJECT
	 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au	Woodford Youth Detention Centre WYDC
	CONSULTANT	
	 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au	
	CLIENT	FOR
	 Queensland Government Department of Energy and Public Works	 Queensland Government Department of Youth Justice, Employment, Small Business and training
FOR TENDER / CONSTRUCTION	TRADE PACKAGE	
Design Manager: Cost Planner:  Ian Robinson Project Director Consultant:	Concrete and Insitu Concrete Finishes REF: TP-312 ISSUE: A	
AMENDMENT / ISSUE RECORD	6400336-TP-312 Concrete & Insitu Finishes.docx	

311.8 REINFORCEMENT

311.8(a) Reinforcement

Locations:

To all 150 and 200 series walls

Description:

Refer [Structural Details](#)

311.8(b) Bending Schedule

Take responsibility for the preparation of bar bending schedules and for the correctness and completeness thereof.

311.8(c) Bending and Splicing

Bend or straighten reinforcement in a manner that will not damage it.

Bend reinforcement cold, except that when permitted by the Managing Contractor, bars of grade 230 S and 230 R may be bent at a temperature not exceeding 850 degrees Celsius.

Do not re-bend bars within 20 bar diameters of any weld.

When splices not already shown on the drawings are found necessary, submit details of the proposed splices to the Managing Contractor for approval. Proprietary lines of mechanical/welded bar splices will only be permitted if specifically provided for and clearly noted on the drawings or accepted by the Managing Contractor for use in particular locations.

311.8(d) Fabrication Tolerances

Cut and bend reinforcement to the tolerances given in AS 3600.

311.8(e) Fixing Tolerances

Place and maintain reinforcement in position within the tolerances listed in Table 6.6.2. of AS 3600 such that the nominal cover specified on the drawings is not encroached upon.

Reinforcement having bends not required by the Contract Document, kinks and similar defects will be rejected.

312.3(b) Concrete Finishes

Location:

As shown on the Drawings.

Description:

Typically, all new external pedestrian surfaces will be Nylon Broom (NB) finish UNO on the Drawings. All internal concrete finishes to be steel trowelled UNO.

Tolerance classes:

Tolerance classes noted on the Structural Drawings, determined by a straight edge placed anywhere on the surface in any direction.

Finish Type:	Description:
Off-form finishes	As specified in AS 3610.
Class A	Maximum deviation from a 3m straight edge: 3mm.
Class B	Maximum deviation from a 3m straight edge: 6mm
Class C	Maximum deviation from a 600mm straight edge: 6mm
Screeding	Finish slab surface with a screed to finished levels. In the absence of anything to the contrary, produce surface to Class B.
Machine floated finish	Finish the screeded surface with approved power driven equipment to a uniform smooth texture. Hand float in locations inaccessible to the machine float.
Steel trowelled finish (Code: ST)	After screeding, produce the final finish with steel hand trowels, free of trowel marks, uniform in texture and appearance
Wood float finish	After screeding, produce the final finish with a wood float
Scored finish / Nylon Broom finish (Code: NB)	Refer Nylon Broom Finish below
Surface Finish Class to AS3610:	Concrete Element:
Class 2	All exposed OFC
Class 4	All concealed OFC

Painted:

Painted finish by others – refer [Painting](#).

Line Marking:

Line Marking by others – refer [Painting](#).

	 PHILLIPS SMITH CONWELL 46 Berwick St Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillips@smithconwell.com.au CONSULTANT  ABN 63 131 876 143 596 Milton Road TOOWONG QLD 4066 PO Box 1492 TOOWONG BC QLD 4066 T +61 1300 657 402 Adgce.com CLIENT  Queensland Government Department of Youth Justice, Employment, Small Business and Training FOR TENDER / CONSTRUCTION Design Manager: _____ Cost Planner: _____ Consultant: _____ AMENDMENT / ISSUE RECORD <table border="1"> <thead> <tr> <th>AMD</th> <th>DESCRIPTION</th> <th>INT</th> <th>DATE</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>ISSUED FOR SCHEMATIC DESIGN</td> <td>DF</td> <td>16/06/2023</td> </tr> <tr> <td>2</td> <td>MANAGING CONTRACTOR ISSUE</td> <td>DF</td> <td>01/09/2023</td> </tr> <tr> <td>3</td> <td>50% DEVELOPED DESIGN</td> <td>DF</td> <td>29/09/2023</td> </tr> <tr> <td>4</td> <td>80% DEVELOPED DESIGN</td> <td>DF</td> <td>27/10/2023</td> </tr> <tr> <td>5</td> <td>100% DEVELOPED DESIGN</td> <td>DF</td> <td>24/11/2023</td> </tr> <tr> <td>6</td> <td>TENDER ISSUE</td> <td>DF</td> <td>20/12/2023</td> </tr> <tr> <td>A</td> <td>CONSTRUCTION ISSUE</td> <td>DF</td> <td>31/01/2024</td> </tr> </tbody> </table>	AMD	DESCRIPTION	INT	DATE	1	ISSUED FOR SCHEMATIC DESIGN	DF	16/06/2023	2	MANAGING CONTRACTOR ISSUE	DF	01/09/2023	3	50% DEVELOPED DESIGN	DF	29/09/2023	4	80% DEVELOPED DESIGN	DF	27/10/2023	5	100% DEVELOPED DESIGN	DF	24/11/2023	6	TENDER ISSUE	DF	20/12/2023	A	CONSTRUCTION ISSUE	DF	31/01/2024	Woodford Youth Detention Centre WYDC FOR PROJECT MANAGER  Queensland Government Department of Energy and Public Works TRADE PACKAGE Specification for Concrete Piling Works REF: SPC-S-CONCRETE PILING ISSUE: A
AMD	DESCRIPTION	INT	DATE																															
1	ISSUED FOR SCHEMATIC DESIGN	DF	16/06/2023																															
2	MANAGING CONTRACTOR ISSUE	DF	01/09/2023																															
3	50% DEVELOPED DESIGN	DF	29/09/2023																															
4	80% DEVELOPED DESIGN	DF	27/10/2023																															
5	100% DEVELOPED DESIGN	DF	24/11/2023																															
6	TENDER ISSUE	DF	20/12/2023																															
A	CONSTRUCTION ISSUE	DF	31/01/2024																															

	1.2 RELATED SPECIFICATIONS Refer to and comply with all relevant sections of the project specification including the following specification sections unless modified in later clauses of this section: - Reinforced Concrete - Reinforcement 1.3 REFERENCES All materials, components, methods and labour used in the work shall comply with the requirements of current versions of the following standards (including all amendments issued at the date of the Contract signing):- - AS 1012 Concrete Testing (series) - AS 1379 Specification and Supply of Concrete - AS 1726 Geotechnical Investigations - AS 2159 Piling - Design and Installation - AS 3600 Concrete Structures - AS 4678 Earth Retaining structures Comply with all other current relevant standards, specifications in Building Code and/or Local Council publications and manufacturers recommendations. The Provisions of this Specification shall take precedence over code requirements, where such provisions exceed the code requirements.	
--	--	--

Materials	2 MATERIALS 2.1 CONCRETE Concrete in piles shall generally conform to the requirements of AS 1379, with the following exceptions: ■ Cement content shall be a minimum of 320kg/m³ unless specified otherwise on the contract documents. ■ Concrete placed by tremie shall have a minimum slump of 150mm and a minimum cement content of 400kg/m³. ■ For cast-in place bored reinforced concrete piles, use only self-compacting concrete or high workability concrete. The fresh properties of the proposed concrete must suit the actual site conditions. 2.2 REINFORCEMENT Reinforcing materials and supports shall comply to: ■ Steel reinforcing materials AS/NZ 4671 ■ Reinforcement construction requirements AS 3600 Cl 17.2 ■ Bar chairs AS/NZS 2425 Use templates when fabricating the reinforcement cages to ensure that the required reinforcement distribution is maintained.	
Masonry		
Masonry	NCC / Australian Standards requirements	Compliant Performance solution

Masonry

PRINCIPAL DESIGN CONSULTANT		PROJECT	
 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au		Woodford Youth Detention Centre WYDC	
CONSULTANT			
 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au			
CLIENT		FOR	
 Queensland Government Department of Energy and Public Works		 Queensland Government Department of Youth Justice, Employment, Small Business and training	
FOR TENDER / CONSTRUCTION		TRADE PACKAGE	
Design Manager:		Blockwork	
Cost Planner:			
 Ian Robinson Project Director		REF: TP-311 ISSUE: B	
AMENDMENT / ISSUE RECORD		6400336-TP-311 Blockwork.docx	
311.1(d) Tests - Durability Mortar: Mortar durability tests are required. Conformance: Test to verify conformance as follows: - Standard: To AS 3700 Appendix E - Acceptance criteria: - Class M2: 0.5 mm. - Class M3: 0.3 mm. - Class M4: 0.1 mm.			
311.1(e) Special Blockwork Conformance Test to verify conformance with the following: - Compressive strength: To AS 3700 Appendix C. - Flexural strength: To AS 3700 Appendix D.			
311.1(f) Tolerances Conform to AS 3700 Table 12.1.			
311.1(g) Shop Drawings Contractor to submit marked-up building plans indicating proposed type and location of Cleanout blocks for comment.			

Moisture Barrier	311.2(b) Blocks Generally: Concrete blocks shall comply with AS 4455 and AS 4456 and shall be first quality, machine made, well cured and matured, hard, sound, uniform in shape and size, square and sharp on the arrises. Blocks shall be free from cracks and chips. Order blocks in sufficient quantity to permit stacking on site with a minimum of handling and to ensure adequate curing prior to use. Block strength: All concrete blocks shall have a minimum characteristic unconfined compressive strength (f_{uc}) of 15MPa in accordance with the Aust Standard Finish: Refer Extent of Work section Coloured Blocks: Refer Coloured Concrete Blocks below. Special Blocks: Provide as necessary all part size, jamb, lintel, corner pier, and similar blocks all of the same manufacture type and finish as adjacent wall blocks. 'H' Blocks: Where 200mm core filled blockwork is nominated on the Structural Engineers drawings, the block shall be a 20.48 'H' block or equal approved. Control joint block: Where control joints in 200 blockwork are nominated on the Structural Engineers dwgs use 20.09 and 20.10 Control Joint blocks as detailed. Half height blocks: Provide half height blocks where shown in details. Sill Blocks: To Duty Building – Refer Drawing 83-A061 Window Details. Soldier course: Provide soldier courses where shown in details. 311.2(c) Aluminium Core Flashings & Damp Proof Courses Description: Unless noted otherwise, 90% (min.) pure aluminium core, core thickness 0.46mm, bitumen coated on both sides and edges, finished with mica flakes, and to AS/NZS 2904. Installation: In accordance with manufacturer's directions unless noted otherwise. Use long lengths and do not cut to width but select from standard widths available. Shall be lapped full widths of walls at angles and intersection & not less than 150mm. 311.2(d) Liquid Applied Damp Proof Course Description: Hydroflex General Purpose Waterproofing Membrane (as manufactured by Chemind), or equal approved Installation: Installed in accordance with manufacturer's directions. 311.6 FLASHING & DAMPCOURSES 311.6(a) Generally Provide and build in adequate flashings and damp-proof courses in accordance with AS/NZS 2904 wherever required to render the whole of the building permanently waterproof. 311.6(b) Flashings Fold and interlock end joints to aluminium core flashings. Take particular care to lap adequately and correctly horizontal and vertical flashings and their junctions, so that water penetration is positively prevented. Keep flashings clean of all mortar droppings. 311.6(c) Dampcourses Provide liquid applied dampcourses to the base of internal and external walls. Dampcourse shall be as previously specified.	
--------------------------------	---	--

Materials	311.1(d) <u>Tests - Durability</u> Mortar: Mortar durability tests are required. Conformance: Test to verify conformance as follows: - Standard: To AS 3700 Appendix E - Acceptance criteria: - Class M2: 0.5 mm. - Class M3: 0.3 mm. - Class M4: 0.1 mm. 311.1(e) <u>Special Blockwork Conformance</u> Test to verify conformance with the following: - Compressive strength: To AS 3700 Appendix C. - Flexural strength: To AS 3700 Appendix D. 311.1(f) <u>Tolerances</u> Conform to AS 3700 Table 12.1. 311.1(g) <u>Shop Drawings</u> Contractor to submit marked-up building plans indicating proposed type and location of Cleanout blocks for comment.	
Framing		
Framing	NCC / Australian Standards requirements	Compliant Performance solution
Framing		

PRINCIPAL DESIGN CONSULTANT  ABN 94 009 866 862 46 Berwick St Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au CONSULTANT  ABN 63 131 876 143 596 Milton Road TOOWONG QLD 4066 PO Box 1492 TOOWONG BC QLD 4066 T +61 1300 657 402 Adgce.com CLIENT  Queensland Government Department of Youth Justice, Employment, Small Business and Training FOR TENDER / CONSTRUCTION Design Manager: Cost Planner: Consultant: 1.3 REFERENCES All materials, components, methods and labour used in the work shall comply with the requirements of current versions of the following standards (including all amendments issued at the date of the Contract signing): - AS/NZS 1170 - Structural design actions. - AS/NZS 1170.2 - Wind actions. - AS 3623 - Domestic metal framing. - AS/NZS 4600 - Cold-formed steel structures. Comply with all other current relevant standards, specifications in Building Code and/or Local Council publications and manufacturers recommendations. The Provisions of this Specification shall take precedence over code requirements, where such provisions exceed the code requirements.	PROJECT Woodford Youth Detention Centre WYDC FOR  Queensland Government Department of Energy and Public Works TRADE PACKAGE Specification for Structural Light Steel Wall Framing 6400336-SPC-S- STRUCTURAL LIGHT STEEL FRAMING REF: ISSUE: 6
---	---

	3	DESIGN AND PERFORMANCE	
	3.1	PERFORMANCE	
		General	
		Provide installations to achieve the performance required in each case.	
	3.2	STRUCTURAL DESIGN	
		Design the light steel wall members to suit the design wind loads and other relevant loads in accordance with the design criteria nominated below.	
	3.3	DESIGN CRITERIA	
		The external stud wall framing system shall be designed in accordance with AS 4600 to safely resist the following loads:	
		Dead and Live loads determined in accordance with AS 1170 Part 1 – Dead & Live loads including loads from wall linings and wall mounted fixtures.	
		Dead and live loads from services plant and equipment and associated platforms and walkways.	
	Wind loads determined in accordance with AS 1170.2 – Wind Loads using the following design parameters.		
	Region	B1	
	Terrain Category	2.0	
	M _s	1.0	
	M _t	1.09	
	Importance Level	3	
	C _{p,e}	In accordance with AS 1170.2	

	C_{pi} +0.3 or -0.3 Maximum serviceability deflection (for walls): Stud height/240 for flexible cladding Stud height/360 for rigid cladding Stud height/480 for shelves Nogging shall be designed to provide lateral and torsional restraints to the vertical studs. The nogging shall also be designed to support an imposed concentrated load of 1.1kN placed anywhere on the span to produce the maximum design action effects. MATERIALS AND COMPONENTS .1 STRUCTURAL STEEL FRAMING he following work is specified in the STRUCTURAL STEELWORK specifications: - Primary framing of Structural Steelwork. - Secondary framing of Purlins, Girts and the like. .2 LIGHT STEEL FRAMING rovide complete light steel wall framing systems comprising studs, noggings, plates, lintels and other sections required to complete system. Corrosion Protection inc coated steel, coating class: Z275. EXECUTION .1 CONSTRUCTION GENERALLY abrication ength: Cut members accurately to length so that they fit firmly against abutting members. ervice holes: Form holes by drilling or punching. - Bushes: Provide plastic bushes or arommets to site cut holes	
--	--	--

Materials	4 MATERIALS AND COMPONENTS 4.1 STRUCTURAL STEEL FRAMING The following work is specified in the STRUCTURAL STEELWORK specifications: - Primary framing of Structural Steelwork. - Secondary framing of Purlins, Girts and the like. 4.2 LIGHT STEEL FRAMING Provide complete light steel wall framing systems comprising studs, noggings, plates, lintels and other sections required to complete system. Corrosion Protection Zinc coated steel, coating class: Z275.	
Roof and Wall Cladding		
Roof and wall cladding	NCC / Australian Standards requirements	Compliant Performance solution

Roof and wall cladding	PRINCIPAL DESIGN CONSULTANT	PROJECT
	 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipssmithconwell.com.au	Woodford Youth Detention Centre WYDC
	CONSULTANT	
	 ABN 94 009 866 862 46 Benwick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipssmithconwell.com.au	
	CLIENT	FOR
	 Queensland Government Department of Energy and Public Works	 Queensland Government Department of Youth Justice, Employment, Small Business and training
FOR TENDER / CONSTRUCTION	TRADE PACKAGE	
Design Manager: _____	Roofing & Metal Cladding	
Cost Planner: _____		
Consultant:  Ian Robinson Project Director		
AMENDMENT / ISSUE RECORD	REF: TP-360 ISSUE: B	
	6400336-TP-360 Roofing & Metal Cladding.docx	

	360.1(a) <u>Seismic Design</u> Where required, provide relevant parts, components and fastenings to resist seismic loads in accordance with Section 8 of AS 1170.4, to the design criteria as described in the structural engineering documentation. 360.1(b) <u>Fire Hazard Indices</u> Ensure fire indices are achieved to relevant areas in accordance with the Fire Engineering Report: Ceilings: SFI = 0 SDI = 3 Walls: SFI = 2 SDI = 5 360.2 MATERIALS & WORKMANSHIP 360.2(a) <u>Environmentally Sustainable Design (ESD)</u> Refer General Requirements 360.2(b) <u>Performance</u> Structural Requirements: Refer General Requirements, Design Criteria. Foot Traffic: The roofing material shall not suffer any permanent damage or deformation due to traffic on it. 360.2(b) <u>Performance</u> Structural Requirements: Refer General Requirements, Design Criteria. Foot Traffic: The roofing material shall not suffer any permanent damage or deformation due to traffic on it. 360.2(c) <u>Testing</u> The Contractor shall test the gutter systems to gutter overflow height for a minimum period of 1 hour. Provide documentation of testing and results to Managing Contractor. 360.2(d) <u>Protection/Cleaning</u> Protect the roofing materials and roofing system from damage throughout the work under the Contract. Keep the roof surface clear of debris and loose material throughout the work and leave it clean on completion. Keep the rainwater systems free of foreign matter and leave them unobstructed on completion. 360.2(e) <u>Metal Separation</u> Prevent direct contact between incompatible metals and between green hardwood or chemically treated timber and aluminium or coated steel. Use table 3.2 of AS 1562 as a guide to compatibility of metals. 360.2(f) <u>Thermal Movement</u> Provide for thermal movement in the roof installation, including movement in joints and fastenings. Make the provision sufficient to prevent harmful effects from stress and fatigue, such as openings of joints, tearing and buckling of sheet metals and thin sections, and the like. Use Table 3.1 of AS 1562 as a guide to the thermal expansion of various metals. 360.2(g) <u>Sundries</u> Provide all incidental components including rivets, clouts, screws, straps, collars, connections, etc., compatible with materials specified.	
--	---	--

	360.3(h) Metal Roof Sheeting (Code: MRS1) To locations noted, <u>supply and install</u> metal sheeting as described below: Location: To roof areas indicated on Roof Plans Description: Corrugated - Stramit, Lysaght Spandek, or equal approved UNO Thickness: 0.48mm BMT Colour: Prefinished Colorbond – Refer Finishes and Colour Schedule. Installation: Install in accordance with manufacturer's instructions using <u>cyclone washers, complete with all accessories for a watertight installation</u>. Lay roofing in single lengths from ridge to gutter except where indicated on drawings to incorporate expansion joints. Lay sheeting in true parallel lines at right angles to eaves. Lay to falls indicated on drawings. Cappings/Flashings: All metal roof sheeting cappings, flashings and the like to be colorbond to match roof sheeting. Provide Dektile, or equal approved, Roof Flashing around vent pipes and likes penetrating through roof sheeting. Support: Framing and fascia purlins - Refer Structural. Insulation: Refer Roof Insulation above. Expansion Joints: Install expansion joints as required. Edges: Varies between gutters and eaves locations: - At gutters: Extend sheeting 50mm min into gutters and turn down into gutter and up behind ridge and hip cappings. - At eaves (no gutters): Extend sheeting 100mm min past fascia purlin (UNO) Filler Strips: Unisil or equal approved, profiled foam filler strips under all exposed ends of roof sheeting and under all flashings and cappings except to unlined roofs. - Filler alternative: In lieu of filler strip it is acceptable to screw fix every crest under all exposed ends of roof sheeting. Vermin proof & weatherproof: To all exposed sheet edges. Fixings: Cyclonic washers Clase 4 Buildex Square-Lok or equivalent to crests and crest of sheet laps as per manufacturer's directions. Pierce fix at top of sheet under the flashing to stop sheeting sliding down the clips. Colour: Prefinished Colorbond – refer Finishes Schedule.	
Materials	360.3(b) Metal Wall Sheeting (Code: MWS1, MWS2) To locations noted, <u>supply and install</u> metal roof sheeting as described below: Location: To face of walls as indicated on Elevations, Sections and Details Description: - MWS1: Corrugated - Stramit Custom Orb, Bluescope Lysaght or equal approved, 0.48mm BMT - MWS2: Flat Panel - Architectural Cladding Suppliers Interlock 205 Flat Panel System or equal approved UNO, 8mm expressed joints, 0.7mm BMT. Finish: To all metal wall sheeting cappings, flashings and the like to match prefinished colour Fixings: Valley fix with 10 x 16 water head Tek screws. Colour match fixings to colorbond sheeting. In addition, fix all lapped joints at 300mm max centres. Installation: Install in accordance with manufacturer's instructions, complete with all accessories for a watertight and secure installation as applicable. Vertical: Lay in single lengths. Horizontal: Lay in long lengths as practicable Cappings/Trims: Finish at eaves, walls, changes of direction, and changes of height with cappings (finish to match adjacent sheeting), securely rivetted to metal sheeting with compatible rivets. Provide "U" cappings to all exposed edges of sheeting in matching finish. Support framing: Provide galv steel top hat sections fixed to substrate, sized and spaced to suit application and sheeting manufacturer's recommendations for support of sheeting. Additional framing: Provide all additional framing and/or packing as necessary to fully support the framing system. All additional framing/packing shall be galv steel or similar material not subject to corrosion. Substrate: Steel wall framing. Refer to Details and Structural Drawings. Insulation: Refer Wall Insulation above. Filler Strips: Unisil or equal approved, profiled foam filler strips under all ends of sheeting and under all flashings and cappings. Colours: Prefinished Colorbond – Refer Finishes and Colour Schedule.	
Glazing		

Glazing	NCC / Australian Standards requirements	Compliant Performance solution
Glazing	PRINCIPAL DESIGN CONSULTANT PHILLIPS SMITH CONWELL ABN 94 009 866 862 46 Borwick Street Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au CONSULTANT PHILLIPS SMITH CONWELL ABN 94 009 866 862 46 Borwick Street Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillipsmithconwell.com.au CLIENT  Queensland Government Department of Energy and Public Works FOR TENDER / CONSTRUCTION Design Manager: _____ Cost Planner: _____  Ian Robinson Project Director Consultant: _____ AMENDMENT / ISSUE RECORD PROJECT Woodford Youth Detention Centre WYDC FOR  Queensland Government Department of Youth Justice, Employment, Small Business and training TRADE PACKAGE General Glazing REF: TP-G04 ISSUE: C 6400336-TP-G04 General Glazing.docx	

	G04.2 MATERIALS G04.2(a) Glazing Generally Glazing shall be free from cracks, scratches, bubbles, blisters, and other defects which will interfere with the appearance and service. Optical distortion should be minimal. G04.2(b) Toughened Safety Glass (Code: T, TO, TT) To comply with AS 2208 and be float, sheet or patterned glass and have Grade A level of impact resistance, of thickness noted. Do not cut or work glass after toughening. Toughened safety glass to be of type selected from an approved manufacturer. Mark each piece of safety glazing material to be used permanently in accordance with AS 2208. (This includes stamping of each louvre blade). Thickness: 10mm minimum unless noted otherwise. Rw36 Minimum Rating. - T: Float glass - TO: Obscure glass – Viridian glass Décor Pattern – Spotswood or equal approved. Films are not acceptable. - TT: Tinted coloured glass – Viridian VFloat or equal approved. Green colour. Films are not acceptable.	
Materials	G04.2(d) Laminated Toughened Glass (Code: LTG) Laminated toughened glass with composition of toughened glazing and interlayer. Locations: Glazing used to the following locations UNO: - All viewing panels UNO - Non-Contact Window/wall Proprietary: Viridian Assault Guard or equal approved. Composition: 11.52mm thick. Rw35 Minimum Rating - 6mm toughened to attack side - 1.52mm Interlayer – Clear - 4mm Toughened to non-attack side. Refer: Refer Window Legend and Schedule for locations and nominated Attack sides. Installation: In accordance with manufacturers recommendations to achieve maximum protection. Encapsulation: Provide 25mm frame encapsulation	
Fire Safety		
Fire Safety	NCC / Australian Standards requirements	Compliant Performance solution

Fire Safety

6.3. Section C – Fire resistance and stability; Fire compartments and separation

6.3.1 Type C construction is applicable to the buildings.

6.3.2 For Type C construction building elements must comply with NCC/BCA Specification C1.1 Table 5.

Table 5 Type C 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—				
Less than 1.5 m	90/ 90/ 90	90/ 90/ 90	90/ 90/ 90	90/ 90/ 90
1.5 to less than 3 m	—/—/—	60/ 60/ 60	60/ 60/ 60	60/ 60/ 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—				
Less than 1.5 m	60/—/—	90/—/—	90/—/—	90/—/—
1.5 to less than 3 m	—/—/—	60/—/—	60/—/—	60/—/—
3 m or more	—/—/—	—/—/—	—/—/—	—/—/—
COMMON WALLS and FIRE WALLS—	90/ 90/ 90	90/ 90/ 90	90/ 90/ 90	90/ 90/ 90
INTERNAL WALLS—				
Bounding <i>public corridors</i> , public lobbies and the like—	60/ 60/ 60	—/—/—	—/—/—	—/—/—
Between or bounding <i>sole-occupancy units</i> —	60/ 60/ 60	—/—/—	—/—/—	—/—/—
Bounding a stair if <i>required</i> to be rated—	60/ 60/ 60	60/ 60/ 60	60/ 60/ 60	60/ 60/ 60
ROOFS	—/—/—	—/—/—	—/—/—	—/—/—

Performance Solution/Assessment/Building Approval

Job Details

Address: Neurum Road, WOODFORD QLD 4514

Building Details

Class: 3, 5, 9b Floor Area: 3000m² Effective Height: 9m
 Size of Largest Fire Compartment: 1000m² Rise in Storeys: 2
 Legislation: 01-07-20 (BCA2019 Amdt 1)

Assessment Details

Fire Engineering Report: QBuild QLD Government. Dept. of Energy & Public Works. WOODFORD YOUTH DETENTION CENTRE 100% Developed Design Fire Engineering Brief WSP project number: PS202533
 Issue 07 Final 30 January 2024

Performance Solution Components

Type of Special Fire Service

Fire Mains (including booster and/or pumps)

Assessment

Suitable

- achievement of specified performance
- location and suitability of booster connections and enclosures
- location and suitability of internal and roof hydrants and external hydrants including fire separation from adjacent buildings
- provisions for hard standing for fire appliances
- In accordance with Fire Engineering Report

Comments:

Required flow and pressure is 20 L/s @ 350 kPa (unassisted) and 20 L/s @ 700 kPa (boosted).

Item 18 : External fire hydrants may be closer than 10m from the Entry Building

- The complex is fully sprinkler protected. Minor departure.
- QFES has no objections

DtS Requirements

- A Form 71 (fire hydrant and sprinkler system commissioning) is to be provided prior to/at QFES' inspection.

QFES requires block plans for hydrant booster cabinets and hydrant pump rooms to be:

- Etched, engraved or printed on metal or plastic that is suitable for installation in an outdoor location (paper enclosed within a plastic or laminated cover is not acceptable);
- A minimum of A3 in size;
- Mechanically secured in the required location;
-

		<u>Sprinklers (General System (AS 2118.1))</u> <u>Suitable</u> • operation of direct fire service alarm and location of directional signs • operation of pump-set controls and status indications • provision of suitable fire protection for special hazards as mentioned in AS 2118 • the location of valve room, pump-sets, water alarm and booster point • In accordance with Fire Engineering Report Comments: Item 7 : Sprinkler and deluge installations are not provided with sprinkler alarm gongs • AS 2118.1-1999, Clause C3.3 'Local Alarm' states 'The purpose of the alarm indicator is to attract the attention of passers-by. It is not intended to alert occupants of the building.' • Fire brigade will not enter the detention centre until they are assured by the facility manager in charge that the centre is secured and all young persons are held in secure designated areas. They will be escorted around site and the location of the fire affected building would be identified prior to arrival of the fire brigade. Therefore, fire brigade would not be required to identify and locate the building of fire origin and will not impact on Fire Brigade intervention. • The sprinkler alarm gongs could alert young persons to an incident and cause undue disturbance • QFES has no Objections Item 8 : Omission of Sprinkler Protection where feasible with minimum risk, to selected roof overhangs, covered verandahs and walkways, subject to agreement of the Authority. Provisionally as follows : • Entry Building: External high level roof overhang at the main staff and public entry and exit
Access/Stairs/Lifts/Ramps		
Access/Stairs/Lifts/Ramps	NCC / Australian Standards requirements	Compliant Performance solution

Woodford Youth Detention Centre Design Development Review Report Building Surveying – QBuild



QBUILD QUEENSLAND GOVERNMENT
DEPARTMENT OF ENERGY AND PUBLIC WORKS

WOODFORD YOUTH DETENTION CENTRE

100% DEVELOPED DESIGN FIRE ENGINEERING BRIEF

FOR AUTHORITY APPROVAL

WSP PROJECT NUMBER PS202533
DOCUMENT ISSUE 07 FINAL
30 JANUARY 2024



WSP
Level 12, 900 Ann Street
Fortitude Valley QLD 4006
Tel: +61 7 3368 6600
Fax: +61 7 3368 6699

6.4. Section D – Access and Egress

6.4.1 Extended travel distances have been identified in the buildings, the **Developed Design Fire Engineering Brief PS 202533 Issue 6 by WSP**. The FEB has these extended travel distances identified.

DfS Clause	D1.4 (Class 3 Bldg) D1.9 c applied as a reasonable solution	Performance Requirements	DP4	Compliance and Assessment Methods	A0.3(x)(i) A0.5(y)(i)
Description	Extended travel distance in the roof space of 5 bed and 16 bed accommodation buildings of approximate distances to the plant room exit door at the top of the exit stairs are as follows: 5 Bed Building – Wing Unit A: 30.4 m 5 Bed Building – Wing Unit B: 36.4 m 16 Bed Building – Wing Unit A: 44.4 m 16 Bed Building – Wing Unit B: 51.3 m				
Analysis Methodology	Qualitative analysis method based on the safe evacuation of building occupants.				
Acceptance Criteria	Acceptance will be demonstrated where the extended travel distance in the roof space plantroom will not unduly impact on the safe evacuation of building occupants from the roof space.				

6.4.2 Access for people with disabilities to and within all areas normally used by the staff, and visitors is required and shall comply with the requirements of NCC/BCA Part D3 and AS1428.1 (2009). A full assessment of all parts of the project has not been made.

6.4.3 It is noted that the objectives of the Disability Discrimination Act (DDA) should also be taken into account and with this in mind the client should be aware that compliance with the deemed-to-satisfy provisions of the NCC/BCA is the minimum required and does not guarantee compliance with the DDA.

6.3 Security Controlled Doors in Paths of Egress

6.3.1 Introduction

The following assessment addresses departure **Item '3'**.

DfS Clause	D2.21	Performance Requirements	DP4	Compliance and Assessment Methods	A0.3(a)(i) A0.5(b)(ii)
Description	Security controlled doors in paths of egress and secured exit door hardware. Electronic controlled bedroom doors fail secure with manual key override – functional requirement.				
Analysis Methodology	Qualitative analysis method based on the safe evacuation of building occupants.				
Acceptance Criteria	Acceptance will be demonstrated where the egress of the occupants is not detrimentally affected.				

6.3.2 Relevant Fire Engineering Provisions

As part of the Performance Solution, the following is proposed:

- Bedroom doors are permitted to be fitted with electronic fail-secure door locks with a manual key override.
- In the event of a bedroom fire, door to the bedroom on fire is permitted to be automatically unlocked at **not later than 120 seconds** as to be agreed with the facility operator. All other bedroom doors are to remain locked and must be managed by Youth Workers through immediate response to unlock the bedrooms for evacuation in accordance with the deemed-to-satisfy provisions under Section D2.21(a)(iii) of the NCC.
- All other doors in paths of travel and exit doors that are fitted with fail secure locks must likewise be managed with immediate Youth Workers response to achieve manual key unlocking override to satisfy D2.21 (a)(iii) of the NCC.
- Specific Youth Worker supervised operational procedures with the door locking regime must be documented by the Facility Operator in the Management-In-Use procedures for each of the new building affected.

	PRINCIPAL DESIGN CONSULTANT ABN 94 009 866 862 46 Bernick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillips@smithconwell.com.au PROJECT Woodford Youth Detention Centre WYDC CONSULTANT ABN 94 009 866 862 46 Bernick Street, Fortitude Valley PO Box 479 Fortitude Valley QLD 4006 AUSTRALIA T +617 3257 1167 phillips@smithconwell.com.au CLIENT Queensland Government Department of Energy and Public Works FOR Queensland Government Department of Youth Justice, Employment, Small Business and training FOR TENDER / CONSTRUCTION Design Manager: _____ Cost Planner: _____ Jen Robinson Project Director Consultant: _____ TRADE PACKAGE Concrete and Insitu Concrete Finishes REF: TP-312 ISSUE: A AMENDMENT / ISSUE RECORD <table border="1" style="width: 100%; border-collapse: collapse; font-size: 8px;"> <thead> <tr> <th>AMD</th> <th>DESCRIPTION</th> <th>INT</th> <th>DATE</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>ISSUED FOR TENDER</td> <td>COMPLETE</td> <td>10/02/2023</td> </tr> </tbody> </table> 6400336-TP-312 Concrete & Insitu Finishes.docx <table border="1" style="width: 100%; border-collapse: collapse; font-size: 8px;"> <thead> <tr> <th>AMD</th> <th>DESCRIPTION</th> <th>INT</th> <th>DATE</th> </tr> </thead> <tbody> </tbody> </table>	AMD	DESCRIPTION	INT	DATE	1	ISSUED FOR TENDER	COMPLETE	10/02/2023	AMD	DESCRIPTION	INT	DATE	
AMD	DESCRIPTION	INT	DATE											
1	ISSUED FOR TENDER	COMPLETE	10/02/2023											
AMD	DESCRIPTION	INT	DATE											

	312.1(f) <u>Slip Resistance of Pedestrian Surfaces</u> 1. <u>Testing requirements</u> Provide slip resistance test reports for nylon broom finishes to pedestrian paths and apron slabs. Obtain slip resistance test results from NATA-accredited testing authorities. 2. <u>Standards</u> Conform to the relevant requirements of: - AS/NZS 4586. - AS/NZS 4663. - HB 197. - AS 1428.1 (clauses 5.8.3 and 12). - AS 1428.4 for tactile ground surface indicators. 3. <u>Minimum requirements</u> If slip resistance requirements are not specified, conform to the typical slip resistance requirements nominated in HB 197 (Tables 3, 4 and 5) for similar locations. 4. <u>Non-compliance</u> Submit all test results to the Managing Contractor. Surfaces not meeting specified slip resistance requirements shall be considered potentially hazardous and rejected. 5. <u>Certification after installation and before Practical Completion</u> Submit test results from a NATA-accredited testing facility, confirming that finished pedestrian surfaces meet specified slip resistance classifications to AS/NZS 4586. Certificates shall identify the materials tested, the test locations, and the number of tests conducted in each instance. Program site testing to accommodate necessary rectification work should any surface prove non-compliant, including having sufficient time to replace and retest the surface. Ensure that surfaces are completely finished and ready for pedestrian traffic before testing.	
--	---	--

	 BUILDING CERTIFIERS AUSTRALIA Developed Design Report Disability Access Review Reference: PSC Project 5960 Departure Schedule (Accessibility) Woodford Youth Detention Centre Neurum Road, Woodford 4514 Q For Major Projects Department of Energy & Public Work	
--	---	--

	Characteristic of buildings, site and layout Within each precinct, the staff office, programs, and vocational training will be on a single level. The gymnasium and open court will be on a similar level with slight fall to the accommodation buildings. We understand the intent is to provide compliant ~1:22 walkways without handrails for persons with disabilities. All buildings are shown to incorporate external access paths and circulation spaces designed to accommodate persons with disabilities (PWD). Beyond the requirements of the National Construction Code, specific areas such as visits, external pedestrian entrances into the entrance building, and any first-floor multi-agency administration areas are intended to feature unassisted access and adhere to "AS1428.2 "Design for Access and Mobility Part 2: Enhanced and additional requirements – Buildings and facilities". Due to the secure nature of youth detention centers and the force required to open/close doors, DYJESBT implements a policy of providing a carer for visitors, staff, and young people with disabilities to aid in navigating the facilities. Access to the ground floor of buildings within the secure perimeter and PWD youth facilities must adhere to AS 1428.1 standards. Central facilities and youth resource facilities are designed as single-story buildings to enable PWD staff access to staff, program, and vocational areas. Operational staff are required to be able-bodied to fulfill their task requirements. Therefore, staff areas, duty offices, and the Central Control Room have been requested to be exempt from the requirement to provide PWD facilities and accessibility. BW comments: A full detailed asses	
--	--	--

Woodford Youth Detention Centre

Vertical Transportation Specification

Date 12/04/2024

Prepared by: Clare Moore

Ref: 301050694

	Woodford Youth Detention Centre Vertical Transportation Services 1.5 General Scope of Work The general scope of work includes, but is not limited to, the following elements: • Design, manufacture, and supply of all VTS Equipment • Transport, Storage, Delivery to Site, Installation, testing and commissioning • All associated or ancillary or incidental works and materials which are necessary to produce a safe, efficient, and fully functional VTS Equipment installations as described by this specification • Training • Making Good • As Installed Drawings and Operating and Maintenance Manuals • Comprehensive Maintenance of all VTS Equipment from the date of handover of the first VTS Equipment for upgrade and continuing up to the date of Practical Completion • Comprehensive Maintenance of all VTS Equipment from the date of Practical Completion and continuing up to the date of Final Completion i.e. the Defects Liability Period Whether or not the words "supply and install" appear in this specification, drawing and schedules then unless clearly excluded, all equipment for the complete VTS Equipment installations is required and must be supplied, delivered to site, and installed. If there are any discrepancies between or within the clauses of this specification, then the more stringent requirements shall apply.	
Health and Safety		



Consultation
Policies

Procedures

Quality objectives aligned to workplace objectives and procedures				
Quality items	Measures for each quality item	Units to measure each item	Existing project tools that will provide quality data	Timing of measurement

Communication procedures and methods to be applied
Communication to Client: Use of document control software "Aconex" to control and manage all project related correspondence including all project correspondence to the client is used.
Communication to management: Communication to management will be via Aconex and at frequent weekly team meetings. Monthly cost reporting meetings held with senior management to communicate costs to date and cost to complete.
Communication to work teams: Communication with team is via Outlook and Aconex.
Communication Plan established:

Issues to be addressed and consultation				
Issue	Who to consult	Improvements for consideration	Feedback following consideration	Supporting Resources

Describe how each of the following aspects of quality management will be addressed on this project:

Quality Control

Control item	Measure	Project Stage

Quality Assurance processes used
Training
Monitoring and maintenance of information sources
Resource availability and access within timeframe
Records management
Quality Improvement / amendments to be instigated