



21.07.2019 / **NSW Department Of Education**
Marsden Park New Primary School
Preliminary Construction Management Plan
**MPNPSPCMP-4/
10667**

CREATING CERTAINTY.

ontoit.

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1. Introduction

1.1 Overview

This Preliminary Construction Management Plan has been prepared by Ontoit on behalf of Schools Infrastructure NSW (SINSW) (the Applicant). It accompanies an Environmental Impact Statement (EIS) in support of State Significant Development Application (SSD-9809) for the Marsden Park New Primary School at the corner of Northbourne Drive (to the east) and a proposed future road (to the north) within the Elara Estate, Marsden Park (the site).

The site is legally described as Lot 2889 in Deposited Plan 1230906. The development footprint does not include a portion of the site to the west as this is reserved for a future alternative use.

The Marsden Park New Primary School will cater for 1,000 primary school students at completion. The proposal seeks consent for:

- Construction Stage 1 (Temporary School): a temporary school facility constructed within the western portion of the development site located on the future sports grounds. This temporary school facility is to accommodate a maximum of 500 students at any given time. Should the permanent school progress as per the program, the temporary school will not be required.
- Construction Stage 2 (Construction of Permanent School Facility): a permanent consolidated two storey courtyard building with capacity to accommodate a maximum of 1,000 students. This new school building is to comprise
 - 40 teaching spaces;
 - A canteen;
 - Library;
 - Multipurpose hall;
 - Office and administration space;
 - Staff and student amenities; and
 - Out of school hours care accommodation.
- Multi-purpose sporting facilities and outdoor play spaces;
- Associated site landscaping and public domain improvements;
- An on-site car park for 48 parking spaces and a drop-off and pick-up area; and

- Construction of ancillary infrastructure and utilities as required.

The purpose of this Preliminary Construction Management Plan (PCMP) is to provide a broad overview of the construction management methodology, construction staging, and environmental management measures. A more detailed CMP will be developed following DA approval and appointment of the construction contractor.

Response to SEARs

The Preliminary Construction Management Plan (PCMP) may be required by the Secretary's Environmental Assessment Requirements (SEARs) for SSD-9809. This table identifies the SEARs and relevant reference within this report.

Table 1 – SEARs and Relevant Reference

SEAR's requirements	Where addressed if stated
Not Stated	Project description – Section 2 Construction staging – Section 2.3 Environmental management - Section 3 Vehicle routes - Section 1 Size of vehicles - Section 1 Hours of operation – Section 2.4 Access arrangements – Section 1 Traffic control measures – Section 1

A Preliminary Construction Traffic Management Plan (PCTMP) which identifies the proposed vehicular routes, points of access/egress and vehicular and pedestrian controls is provided as a separate document.

1.2 Reliance

This report: has been prepared by Ontoit for the NSW Department of Education and compiled using data provided by the NSW Department of Education.

2. Project description

2.1 Site description

The proposed development includes:

- **40 teaching spaces;**
- **A canteen;**
- **Library;**
- **Multipurpose hall;**
- **Office and administration space;**
- **Staff and student amenities; and**

- **Out of school hours care accommodation.**
- **Multi-purpose sporting facilities and outdoor play spaces;**
- **Associated site landscaping and public domain improvements;**
- **An on-site car park for 48 parking spaces and a drop-off and pick-up area; and**
- **Construction of ancillary infrastructure and utilities as required.**

2.2 Site layout

A site layout is shown on the site plan in Appendix A.

2.3 Project construction stages- Option 1 – Temporary School

The expected stages of construction are outlined below.

2.3.1 Preparatory Activities

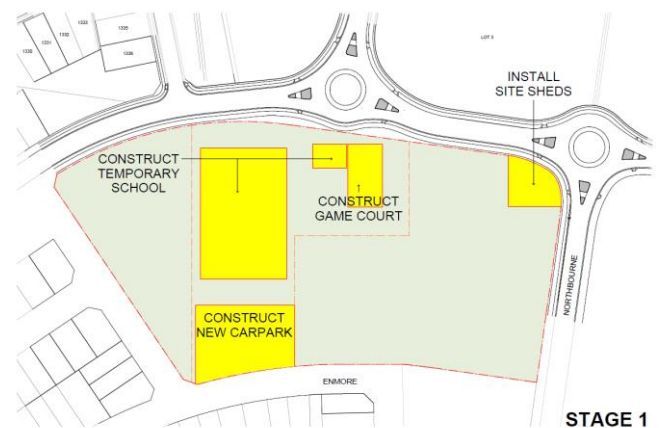
Preparatory Activities will be ongoing across the School Site throughout the Stage 1 development. These activities include:

- Spatial Surveys
- Service investigations
- Contamination Pre-Clearance Surveys
- Site Security

2.3.2 Stage 1 – Site Office, Temporary School & Carpark Construction

- Clearing of vegetation from site and disposal to licensed green waste facilities
- Establishing stormwater drainage systems to divert clean stormwater around cleared areas and construction zones
- Erosion and sediment controls to prevent sediments from leaving site
- Construction of temporary berms to prevent excess stormwater run off to adjacent residential sites
- Establishing internal site construction access roads, laydown areas and a dedicated construction management compound with temporary offices and site facilities
- Connecting temporary site services to the construction compound
- Bulk earthworks to create the general levels for buildings, outdoor recreational areas,

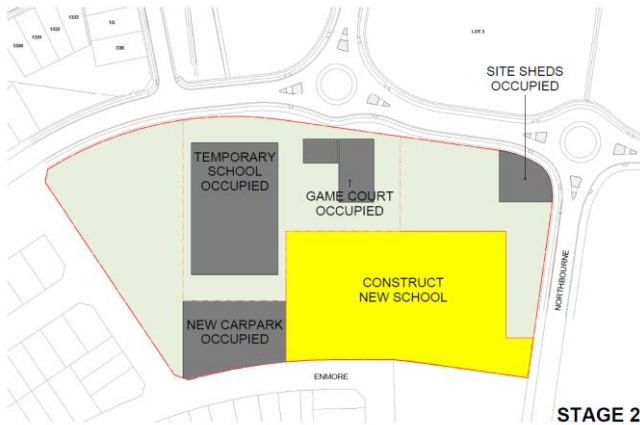
- Stockpiling and conditioning of existing topsoils
- Site reprofiling including construction of retaining walls and batters to create building pads
- Provision of services to the site including sewerage connection, water, gas,
- Telecommunications
- Excavations associated with temporary buildings
- Provision of below ground temporary building services including plumbing and drainage
- Temporary building construction
- Temporary walls, windows and roofing
- Internal services (power, lighting)
- Internal fit out of buildings
- Laying temporary stormwater drainage pipes and placing pits
- Construction of Game Court
- Paving of carparks
- Constructing curbs and gutters for roads



2.3.3 Stage 2- New School Construction

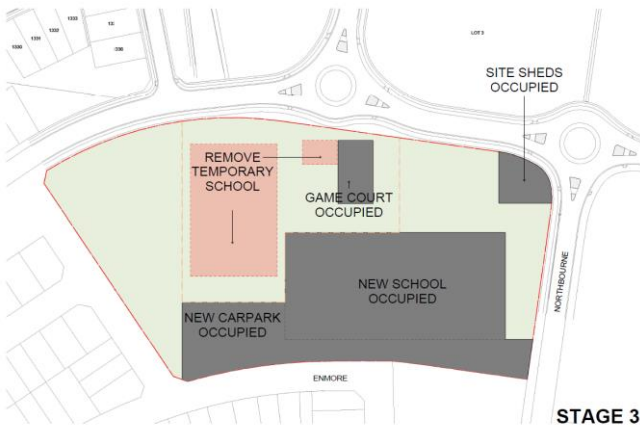
- Excavations associated with building foundations and slabs
- Provision of below ground building services including plumbing and drainage
- Building slab construction
- Building framing
- Walls, windows and roofing
- Internal services (power, lighting)
- Internal fit out of buildings

- Laying stormwater drainage pipes and placing pits



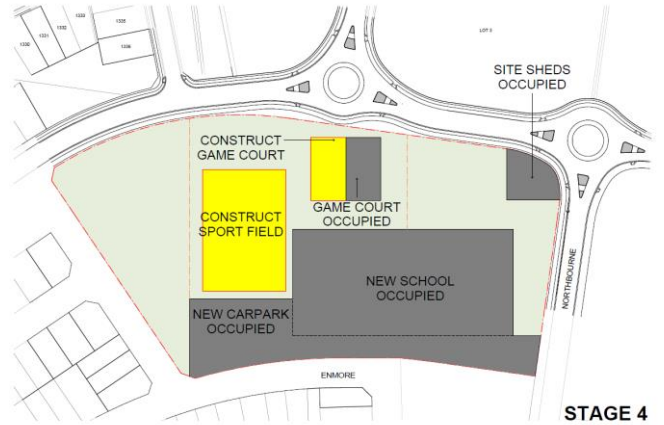
2.3.4 Stage 3 – Temporary School Removal

- Removal of temporary school
- Removal of temporary services
- Removal of temporary stormwater
- Removal of temporary walkways



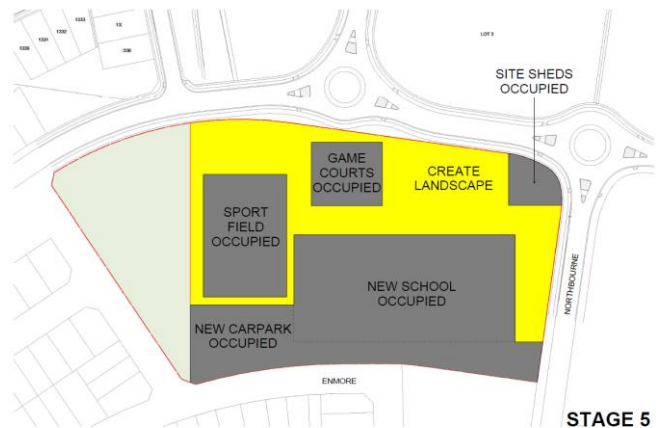
2.3.5 Stage 4 – Sports field construction

- Utilisation of stored topsoil for sports field
- Sports field preparation
- Planting
- Paving of pedestrian areas
- Sports field construction
- Construct Game Court
- Landscaping



2.3.6 Stage 5 – Landscaping construction

- Utilisation of stored topsoil for garden beds
- Planting
- Paving of pedestrian areas
- Playground construction
- Vegetable garden area construction
- Landscaping of nature plan area



2.3.7 Stage 6 – Site Office Removal

- Removal of site office
- Removal of site office services
- Removal of site office stormwater
- Removal of site office walkways



2.3.8 Stage 7 - Final Landscaping construction

- Utilisation of stored topsoil for garden beds
- Planting
- Paving of pedestrian areas



2.4 Hours of operation for construction

The proposed working hours for this project option are as follows:

Monday to Friday- 7:00am to 5:00pm

Saturdays- 7:00am to 1:00pm

Sundays and Public Holidays - No work

If required, after hours permits will be sought from the relevant authorities.

2.5 Construction Programme

The anticipated programme of works is as follows:

- Stage 1 – Site office, temporary school and carpark construction – completion and handover December 2020
- Stage 2 – Permanent school construction – completion and handover April 2021
- Stage 3 – Temporary School Removal – completion and handover May 2021

- Stage 4 – Sports field construction – completion and handover July 2021
- Stage 5 – Landscaping construction – completion and handover July 2021
- Stage 6 – Site office removal – completion and handover July 2021
- Stage 7 – Final landscaping construction – completion and handover July 2021

2.6 Project construction stages- Option 2 – New School

The expected stages of construction are outlined below.

2.6.1 Preparatory Activities

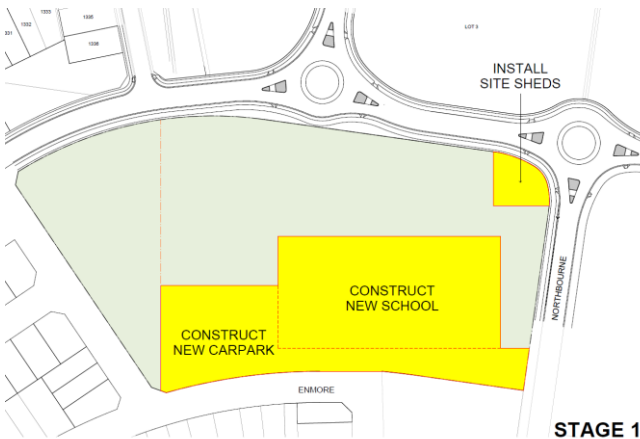
Preparatory Activities will be ongoing across the School Site throughout the Stage 1 development. These activities include:

- Spatial Surveys
- Service investigations
- Contamination Pre-Clearance Surveys
- Site Security

2.6.2 Stage 1 – Site Office and New School Construction

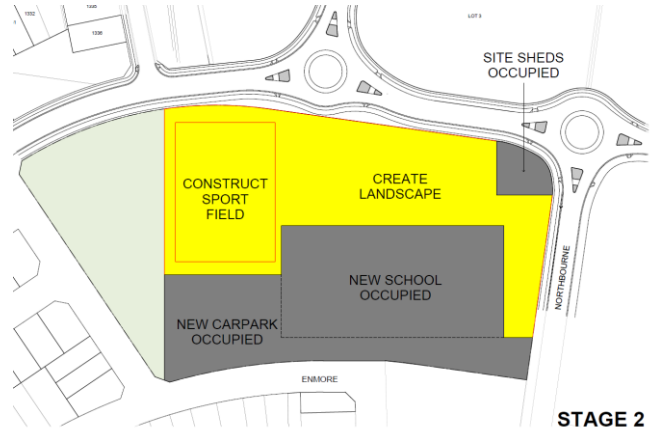
- Clearing of vegetation from site and disposal to licensed green waste facilities
- Establishing stormwater drainage systems to divert clean stormwater around cleared areas and construction zones
- Erosion and sediment controls to prevent sediments from leaving site
- Construction of temporary berms to prevent excess stormwater run off to adjacent residential sites
- Establishing internal site construction access roads, laydown areas and a dedicated construction management compound with temporary offices and site facilities
- Connecting temporary site services to the construction compound
- Bulk earthworks to create the general levels for buildings, outdoor recreational areas,
- Stockpiling and conditioning of existing topsoils
- Site reprofiling including construction of retaining walls and batters to create building pads

- Provision of services to the site including sewerage connection, water, gas,
- Telecommunications
- Excavations associated with buildings
- Provision of below ground building services including plumbing and drainage
- Excavations associated with building foundations and slabs
- Building slab construction
- Building framing
- Building construction, walls, windows and roofing
- Internal services (power, lighting)
- Internal fit out of buildings
- Laying stormwater drainage pipes and placing pits
- Constructing kerbs and gutters for roads
- Paving of carparks



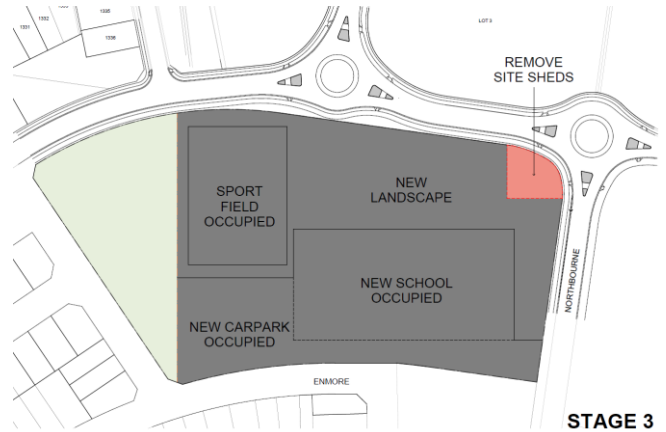
2.6.3 Stage 2 – Landscape & Sports field construction

- Utilisation of stored topsoil for garden beds and sports field
- Sports field preparation
- Planting
- Paving of pedestrian areas
- Netball/basketball court construction
- Playground construction
- Vegetable garden area construction
- Landscaping of nature plan area
- Landscaping



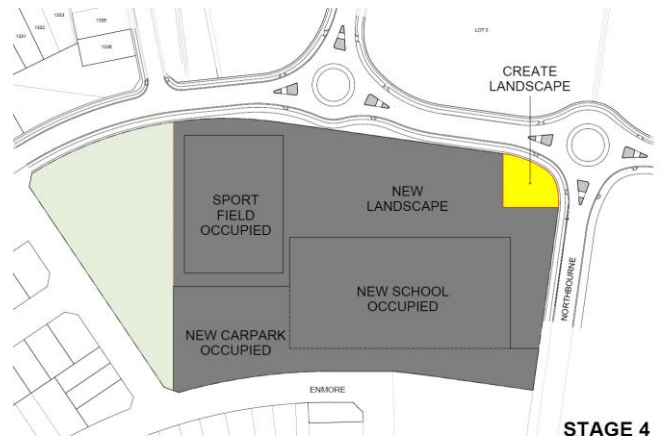
2.6.4 Stage 3 – Site Office Removal

- Removal of site office
- Removal of site office services
- Removal of site office stormwater
- Removal of site office walkways



2.6.5 Stage 4 - Final Landscaping construction

- Utilisation of stored topsoil for garden beds
- Planting
- Paving of pedestrian areas



2.7 Hours of operation for construction

The proposed working hours for this project option are as follows:

Monday to Friday- 7:00am to 5:00pm

Saturdays- 7:00am to 1:00pm

Sundays and Public Holidays - No work

If required, after hours permits will be sought from the relevant authorities.

2.8 Construction Programme

The anticipated programme of works is as follows:

- Stage 1 – Site office and new school construction – completion and handover August 2020
- Stage 2 – Landscaping construction – completion and handover November 2020
- Stage 3 – Site office removal – completion and handover December 2020
- Stage 4 – Final landscaping construction – completion and handover January 2021

3. Environmental management (by Contractor)

3.1 Public safety

Signage and fencing will be used to restrict Work on site will be undertaken in accordance with the requirements of Workcover NSW as well as relevant standards and codes of practice. Contractors will be required to undertake site inductions prior to entering the site. On-site safety briefings will be held as the site works proceed.

3.2 Dust control

An Air Quality Management Plan will be implemented to minimise dust emissions during construction works. This will include measures such as watering down roads and short term stockpiles, and temporary revegetation of long term stockpiles.

3.3 Stormwater

An erosion and sediment control plan will be implemented on site. This will include establishing stormwater drainage systems to divert clean stormwater around cleared areas and construction of temporary berms to prevent

excess stormwater run off to adjacent residential sites.

3.4 Noise and vibration

A Construction Noise Management Plan will be implemented on site. This will include a number of mitigation measures, as outlined below:

Construction hours and notification

Noise generating construction activities should be undertaken in accordance with the Interim Construction Noise Guideline (DECC, 2009). The standard hours for construction work should be in accordance with the Guideline:

- 7:00 am – 6:00 pm Monday to Friday
- 8:00 am – 1:00 pm Saturdays
- no work on Sundays or Public Holidays.
- Work outside normal hours should only comprise:
 - the delivery of materials outside normal hours requested by police or other authorities for
 - safety reasons
 - emergency work to avoid the loss of lives and/or property

Residences within 500 m of the site should be notified as to the timing and duration of the construction works and provided with a contact phone number for any complaints or concerns during the construction period.

Site inductions

Inductions for the work crew would include the specific noise issues and mitigation measures required for the site. The induction would include:

- all relevant standard noise mitigation measures
- relevant license and approval conditions
- permissible hours of work
- location of any sensitive receivers that may exceed the construction noise management level
- construction employee parking areas
- designated loading/ unloading areas and procedures
- site opening/closing times (including deliveries)
- behavioral practices that minimise noise: such as avoiding dropping materials from height

- and avoiding metal to metal contact on material.

Other measures

The distance between plant and equipment and any sensitive receiver should be maximised where practicable.

Vehicles, plant and equipment would be regularly maintained and kept in good operating condition. Machines found to produce excessive noise should be removed from site or stood down until repairs or modifications can be made.

Vibration

Should any buildings be identified that are located within the structural damage vibration buffer distances, a property condition report should be prepared for the premises before and after undertaking the work.

Compliance vibration monitoring should also be undertaken during high vibration generating activities where buildings are located within the structural damage buffer distances to confirm vibration criteria are not exceeded.

3.5 Traffic

A Construction Traffic Management Plan will be prepared by the contractor once appointed to identify the proposed vehicular routes, points of access/egress and vehicular and pedestrian controls. A preliminary version of this plan is provided as a separate document.

3.6 Waste

A Waste Management Plan has already been produced for this project. According to the plan, wastes generated on site would be managed and minimised by a combination of waste planning and on site controls.

3.6.1 Waste planning

Waste planning activities will include:

Designing buildings to minimise on site cutting of components, and maximising on site assembly tasks.

Careful ordering of materials such as sand and building products to match quantities with amounts required, and on time ordering rather than having materials stored on site for months before being used.

Segregating materials and providing weather protection for stored materials on site, to maximise their fitness for use.

Bringing in material such as sand in large bags rather than as bulk loads, to enable excess

materials to be easily picked up and used at other sites.

Encouraging bulk handling and use of reusable and returnable containers.

At the time of tendering, advise contractors and sub-contractors and suppliers of the requirements to minimise waste on site.

Include provision in the tender documentation for the client to monitor the use of waste and recycling bins on site.

Development of a Construction Waste Management Plan by the main site contractor, which includes all of the above elements

3.6.2 On site controls

On site controls would include:

Implementation by the main site contractor of a Construction Waste Management Plan.

Segregating wastes generated on site, using different skip bins for recycling and waste, with separate bins for different recyclable materials. Discussion about the site's waste management and recycling policies and practices with employees and subcontractors during site inductions and tool box talks.

Ensuring all waste disposal bins are clearly marked

Keeping records of quantities of waste and recycled materials disposed of, and the destinations of these materials

Ensuring that wastes are only disposed to licensed facilities

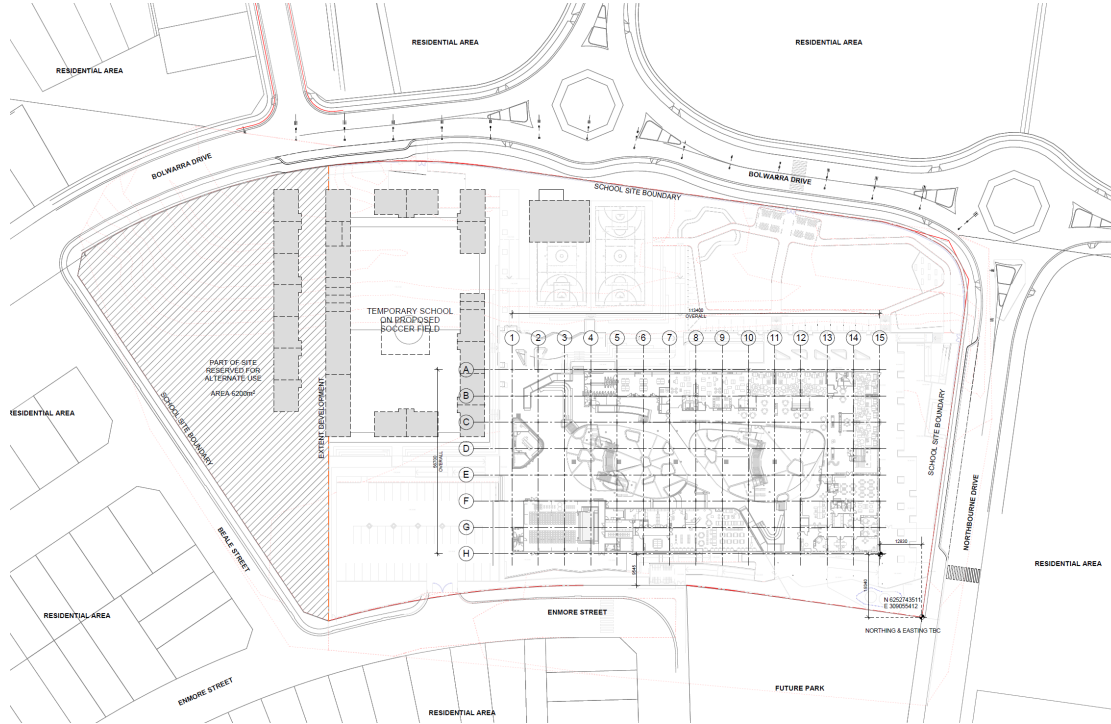
4. References

OntoIt, NSW Department of Education, Marsden Park New Primary School Acoustic Report, July 2019

OntoIt, NSW Department of Education Marsden Park New Primary School Waste Management Plan July 2019

5. Appendix A

5.1 Site Layout Plan



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