DEPARTMENT OF EDUCATION (NSW)

#### SYDNEY OLYMPIC PARK NEW HIGH SCHOOL ELECTRICAL AND COMMUNICATION SITE INFRASTRUCTURE REPORT

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#### Sydney Olympic Park new high school Electrical and Communication Site Infrastructure Report

Department of Education (NSW)

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## 1 REPORT PURPOSE

WSP has been engaged by the Department of Education NSW to undertake the Concept design of the mechanical and electrical services design of the 'Sydney Olympic Park new high school' project.

This Consultant Advice aims to provide a desktop overview of the existing electrical and communication services infrastructure surrounding the site and to highlight any upgrade works required to serve the new facility. The following sources of information have been used for this Consultant Advice:

- $\rightarrow$  Proposed Group GSA concept architectural layouts dated 26/02/2021.
- → Utility drawings obtained from "Dial Before You Dig" on 09/04/2021
- $\rightarrow$  No visual inspections have been completed

The advice provided in this document is based on preliminary planning solutions and layouts and is subject to change during the projects detailed design stage.

### 2 INTRODUCTION AND BACKGROUND

#### 2.1 Proposal

The proposed development is for the construction of a school whereby the project is known as Sydney Olympic Park new high school. The school is to be developed in two stages. The SSD application will seek consent for both Stage One and Stage Two. While Stage Two is submitted as part of this proposal, construction is subject to approval of additional funding.

Stage One will provide for a Stream 5 high school, catering for up to 850 students. Stage Two will bring the school up to a stream 9 school capability catering up to 1,530 students.

The design features a six storey building. To the north of the site, a hall building (for sports and performance) is proposed.

The play space required to meet the need of students for Stage One can be generally accommodated onsite, within the 9,511sqm available. Additional play space may be required to accommodate the increased student numbers anticipated during Stage 2. The proposed adjoining play space comprises an area of around 8,800sqm, and will be subject to a Joint Use Arrangement and available for public use outside school hours. The future Wentworth Point Peninsula Park will result in an open space area of approximately 4 ha.

The remainder of the peninsula (TfNSW land) is under review and will be subject to a separate approval process. Redevelopment of this land will include the new access road proposed off Burroway Road along the eastern boundary of the subject site and is proposed to include car parking, drop-off zones and delivery zones.

#### 2.2 Site Description

The proposed development is located within the peninsula of Wentworth Point at 7-11 Burroway Road, Wentworth Park across parts of three lots; Lot 202 DP1216628, Lot 203 DP1216628 and Lot 204 DP1216628. The site forms part of the Wentworth Point Planned Precinct, which was rezoned in 2014 for the purposes of high density residential, public recreation, school and business purposes.

The site is approximately 9,511sqm in area, with a frontage of approximately 91m to Burroway Road. It currently contains vacant land, which is cleared of all past development, and almost entirely cleared of native vegetation.

The surrounding area is generally characterised by high rise residential and mixed-use developments. The site is directly adjacent to the Wentworth Point Peninsula Park and immediately east of Wentworth Point Public School.



Figure 2 Site Aerial Map

## **3 ELECTRICAL INFRASTRUCTURE**

The preliminary maximum demand calculation completed for the school indicates the site load will be around 1,300A 3PH. This is inclusive of air conditioning power requirements and the 15% spare required by the EFSG. An application for connection has been submitted to Ausgrid to identify what augmentation works are required to the Ausgrid network to provide power to the new high school. Ausgrid's response indicates that a new kiosk substation will be required.

The Ausgrid drawings obtained from Dial Before You Dig indicate that two Ausgrid pillars appear to be connected to the existing site (to be confirmed with Ausgrid). These services will need to be removed as part of the demolition works. Alteration works may also be required to facilitate installation of the new school carpark driveway and kiss and ride zone.



Figure 1 Ausgrid Dial Before You Dig Plan Showing Network assets

### 4 NBN INFRASTRUCTURE

The NBN Co drawings obtained from Dial Before You Dig indicate that there are existing NBN services installed on Burroway Road. New lead in conduits will be provided from the existing manhole on Burroway Road to new high school's campus distribution room / main communications room. Alteration works may be required to facilitate installation of the new school carpark driveway and kiss and ride zone.

A department of education representative will need initiate and enter into a contract between themselves and the telecommunications carrier before any lead-in cabling infrastructure will be installed or any telecommunications services be provided.



Figure 2 NBN Dial Before You Dig Plan Showing Network assets

### 5 EXISTING TELSTRA INFRASTRUCTURE

The Telstra drawings obtained from Dial Before You Dig indicate that Telstra does not own the pit and pipe infrastructure installed within the area. It is understood that this infrastructure is NBN owned as indicated in section 3 of this document. The Telstra drawing indicates that there are some existing connections to the site which appear to originate from the NBN manhole on Burroway Road. These connections are considered to be redundant and will need to be removed as part of the demolition works.



