NSW GOVERNMENT

Transport Access Program

Denistone Station Upgrade

Supporting Studies

Artist's impression of the proposed Denistone Station Upgrade, subject to detailed design

December 2021

iris

Denistone Station Access Upgrade

Landscape and Visual Impact Assessment

NSW Government | Transport for NSW

Document Control

Denistone Station Access Upgrade – Landscape and Visual Impact Assessment

Job No: 189-2021

Date	Version:	Prepared by	Checked by	Approved by
18/11/2021	Final for issue	Suzie Rawlinson Flora Wehl	Jarryd Barton	Suzie Rawlinson

Contents

List of Tables

List of Figures

TABLE 1-1 ABBREVIATIONS

Term	Meaning
CCTV	Closed Circuit TV
CPTED	Crime Prevention Through Environmental Design
DCP	Development Control Plan
DDA	*Disability Discrimination Act 1992*
DSAPT	*Disability Standards for Accessible Public Transport* (2002)
LEP	Local Environmental Plan
LSPS	Local Strategic Planning Statement
Tactile	Tactile ground surface indicators
TfNSW	Transport for New South Wales

TABLE 1-2 DEFINITIONS

Term	Meaning
Concept design	The concept design is the preliminary design presented in the Review of Environmental Factors Report (dated November 2021) and architectural drawings (dated 30/09/2021), which would be refined by the Contractor (should the Proposal proceed) to a design suitable for construction (subject to TfNSW acceptance).
Detailed design	Detailed design broadly refers to the process that the Contractor undertakes (should the Proposal proceed) to refine the concept design to a design suitable for construction (subject to TfNSW acceptance).
Out of hours work	Defined as works *outside* standard construction hours (i.e. outside of 7.00 am to 6.00 pm Monday to Friday, 8.00 am to 1.00 pm Saturday and no work on Sundays/public holidays).
Sensitive receivers	Land uses which are sensitive to potential noise, air and visual impacts, such as residential dwellings, schools and hospitals.
The Proposal	The construction and operation of the Denistone Station Access Upgrade.

1. Introduction

1.1. Overview

Denistone Station has been identified for inclusion in the Transport for NSW (TfNSW) Transport Access Program (TAP) for an accessibility upgrade, as it currently does not accommodate mobility impaired access to rail services or meet key requirements of the *Disability Standards for Accessible Public Transport* (DSAPT) or the Commonwealth *Disability Discrimination Act 1992* (DDA).

IRIS Visual Planning + Design has been engaged by Transport for NSW (TfNSW) to undertake a visual impact assessment of the proposed accessibility upgrade at Denistone Station.

Denistone Station Access Upgrade ('the Proposal') would include provision of two new lifts and associated landings, accessed by regraded platforms (including tactiles), upgraded stairs (including handrailing, tactiles and nosing) and a widened station entry concourse from the existing road bridge at Gordon Crescent. A new awning and facia would be added to the main station concourse building, reflecting historic design of the station. Two new weather canopies would be installed at the existing boarding assistance zones on Platform 1/2 and Platform 3/4. Platform buildings (including the existing toilets and station office) would also be upgraded to include accessible amenity facilities.

The existing commuter car park along Gordon Crescent would be upgraded. This would include the conversion of two existing parking spaces into one DSAPT compliant parking space and upgrade of the existing footpaths including widening and provision of ramps between the station entrance and commuter car park. A new, shared school service bus stop and kiss and ride bay would be installed beside the car park, in Gordon Crescent.

1.2. Study scope

This visual impact assessment identifies the potential visual impacts of the proposal on views to the station from surrounding areas. The study area for this proposal extends generally from Gordon Crescent and East Parade in the north, east to Symons Reserve, south to West Parade and Miriam Road, and west to Darrall Park and the rail corridor.

This assessment is based upon a viewpoint assessment, identifying and assessing views that represent the range of publicly accessible views to the proposal. The potential views from neighbouring properties have been inferred from these views and site observations. This assessment includes representative views from surrounding residential areas, parks, footpaths and streets, and Denistone Railway Station.

The visual assessment begins by identifying the existing character of the site and includes a description of the visual character of the proposal, followed by an individual representative viewpoint assessment.

The viewpoint assessment includes a description of the sensitivity of each view and the magnitude of change that would be experienced in each view. These factors are then combined to determine a level of impact.

The assessment has identified the potential visual impacts of the proposal during the day and night, throughout construction and in operation.

The assessment then considers the urban design and landscape impacts of the proposal in terms of its consistency with relevant TfNSW urban design principles and City of Ryde Council planning policy documents.

This landscape and visual impact assessment has considered the current architectural drawings prepared by DesignInc (dated 30/09/2021) which includes general arrangement plans, sections, perspectives, and artist's impressions showing the features of the Proposal.

1.3. Site location

Denistone Station is located on the T1 Northern Line, about 20 kilometres north west of Central Station. The Station is located between East and West Parades, in a quiet suburban area, away from main arterial road corridors and commercial or industrial precincts. The station is accessed via the station concourse along the Gordon Crescent road bridge. There are two island platforms which are currently accessible by stairs only. The location of the Proposal within the regional context is shown on

Figure 1-1 and the site location is shown in Figure 1-2.

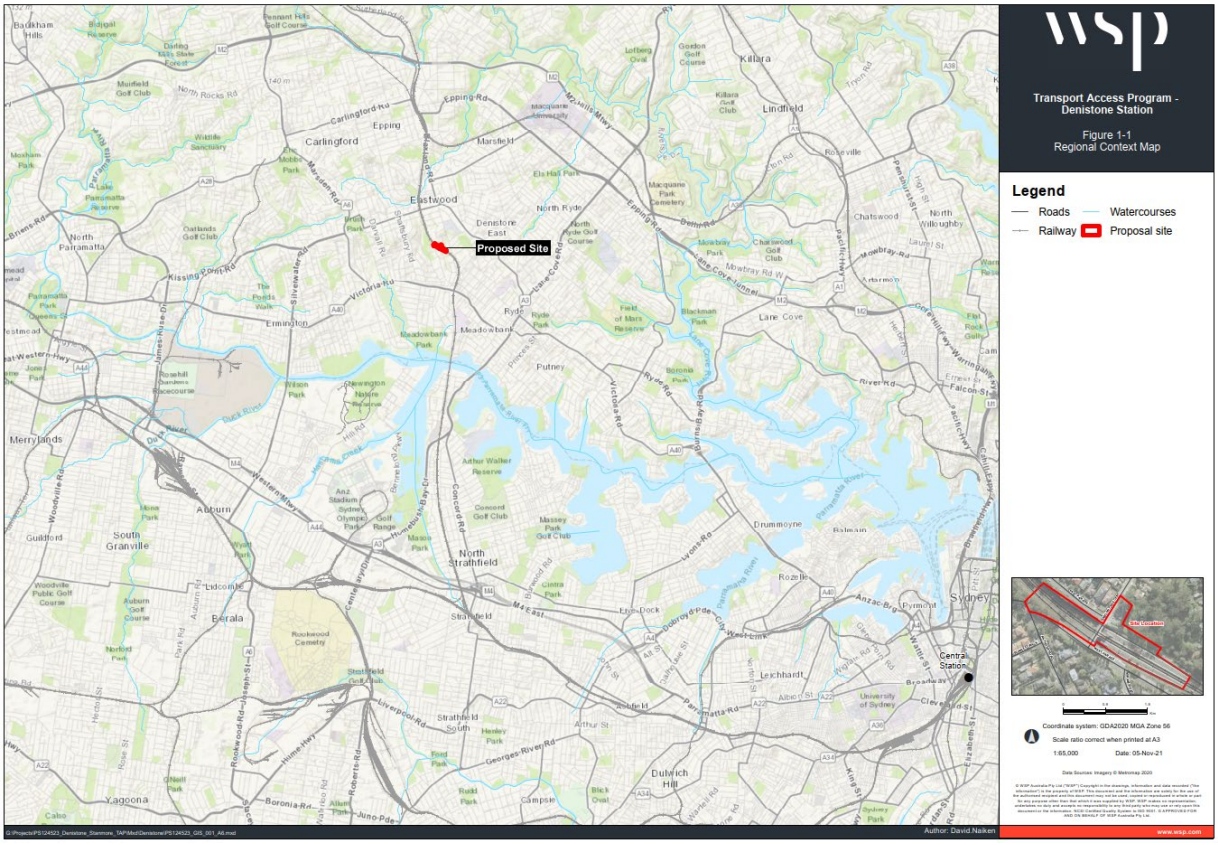


FIGURE 1-1 REGIONAL CONTEXT MAP

FIGURE 1-2 SITE LOCALITY MAP

2. The Proposal

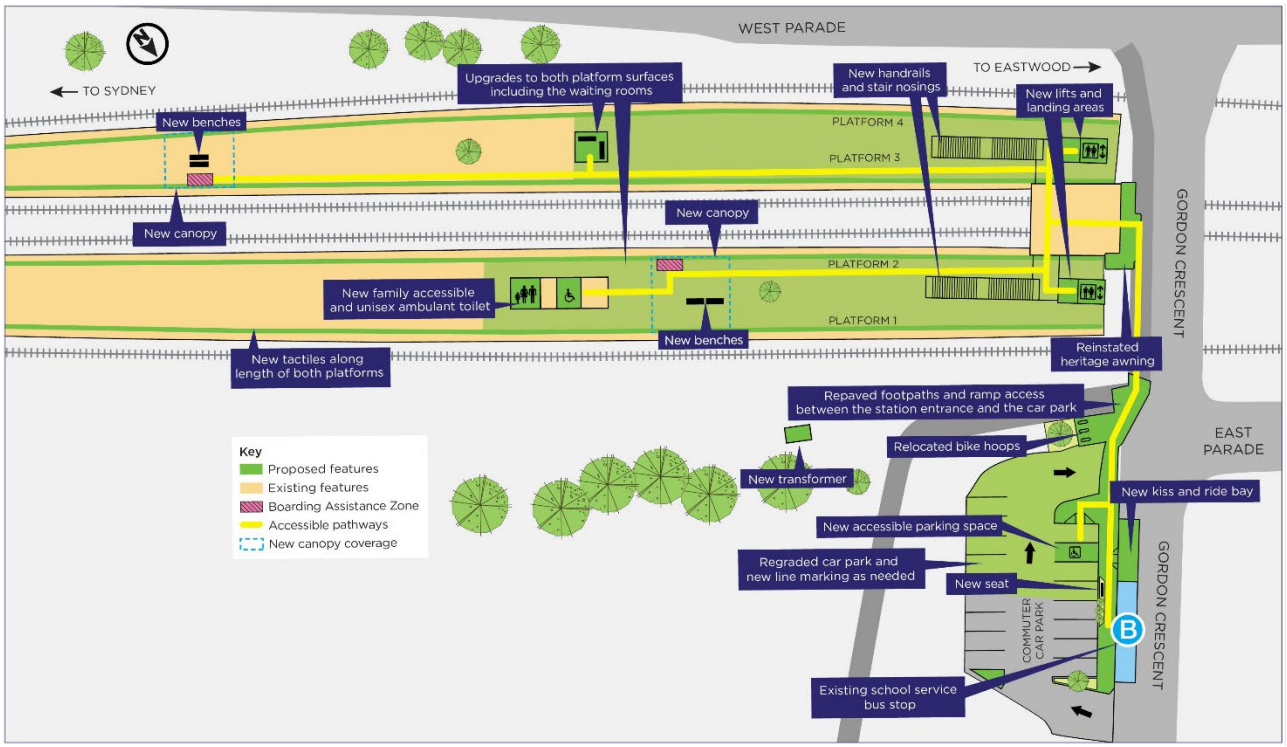
2.1. Proposal components

The Proposal would provide:

- two new lifts and landings to provide access between the existing station concourse and the platforms
- reconfiguration of the existing bathrooms on Platform 1/2 to accommodate:
    - a new family accessible toilet
    - a unisex ambulant toilet
    - a store room
- alterations to the existing waiting room on Platform 1/2 to provide DDA / DSAPT compliant access and a cabinet for the main electrical switch board
- a lowered floor within the Platform 3/4 waiting area to provide compliant access (existing seating to be reinstated)
- provision of new canopies and seating at the boarding assistance zones on Platform 1/2 and 3/4
- upgrade of the existing stairs to include adjustment of stair nosings, new compliant handrails and tactile ground surface indicators (tactiles)
- regrade the existing platform surfaces as required, to provide accessible paths from the new lifts to the station amenities and improve accessibility at the base of the existing stairs
- reinstatement of the original art deco style awning on the station concourse building facing Gordon Crescent
- installation of a new concrete slab on the northern side of the station entrance to extend across the current void space to allow for relocation of the existing bins. New perforated metal screens would also be installed to surround the new area of concrete
- station interchange upgrades including:
    - upgrade of the existing footpaths including regrading and widening paths between the station entrance and existing Gordon Crescent car park
    - one new DDA car space in the existing Gordon Crescent commuter car park and adjustment and regrading of the car park surface, including new line marking as required
    - a new kiss and ride bay with new kerb ramp, bench and landscaping
- minor work including adjustments to station lighting, relocation of electronic ticketing (Opal readers), relocation or replacement of existing customer facilities (drinking fountain, vending machine, waste and recycling bins and seating), improvement to station communications systems (including CCTV cameras), hearing loops, wayfinding signage and installation of yellow lines and tactiles.

Subject to approval, construction is expected to commence in early 2022 and take around 18 months to complete. A detailed description of the Proposal is provided in Chapter 3 of this REF.

An overview of the Proposal is shown in Figure 2-1.



(Indicative only, subject to detailed design)

FIGURE 2-1 KEY FEATURES OF THE PROPOSAL

FIGURE 2-2 ARTIST'S IMPRESSION OF THE PROPOSAL, VIEW EAST FROM GORDON CRESCENT (PREPARED BY DESIGN INC, INDICATIVE ONLY, SUBJECT TO DETAILED DESIGN)

FIGURE 2-3 ARTIST'S IMPRESSION OF THE PROPOSAL, VIEW WEST FROM WITHIN THE STATION (PREPARED BY DESIGN INC, INDICATIVE ONLY, SUBJECT TO DETAILED DESIGN)

FIGURE 2-4 ARTIST'S IMPRESSION OF THE PROPOSAL, VIEW FROM NORTH OF THE STATION (PREPARED BY DESIGN INC, INDICATIVE ONLY, SUBJECT TO DETAILED DESIGN)

FIGURE 2-5 ARTIST'S IMPRESSION OF THE PROPOSAL, VIEW WEST ALONG SOUTHERN ISLAND PLATFORM (PREPARED BY DESIGN INC, INDICATIVE ONLY, SUBJECT TO DETAILED DESIGN)

2.2. Construction

The majority of work required for the Proposal would be undertaken during standard (NSW) Environment Protection Authority (EPA) construction hours, which are as follows:

- 7.00 am to 6.00 pm Monday to Friday
- 8.00 am to 1.00 pm Saturdays
- no work on Sundays or public holidays.

Certain work may need to occur outside standard hours and would include night work and work during routine rail shutdowns.

Temporary construction compounds would be required to accommodate construction activities associated with the Proposal including a site office, amenities, laydown and storage area for materials, construction plant and equipment.

Three areas have been identified for proposed construction compounds as shown in Figure 2-6 and include:

- the existing cleared areas within the rail corridor and between the tracks to the north of the station platforms below the Gordon Crescent road bridge to be used for construction laydown (typically during possession periods only)
- an area of existing rail corridor land adjacent to Symons Reserve, to the north west of Platform ½ to be used for construction laydown and stockpiling
- a portion of the existing commuter car park located to the north west on the corner of West Parade and Anthony Road.

The area nominated for the compounds are on land owned by the NSW Transport Asset Holding Entity (rail corridor areas) and City of Ryde Council (car park near corner of West Parade and Anthony Road).

Subject to approval, construction is expected to commence in early-2022 and take up to around 18 months to complete.

FIGURE 2-6 LOCATION OF CONSTRUCTION COMPOUNDS AND LAYDOWN AREAS

3. Planning context

There are several state and local government planning documents which provide relevant guidance as to the landscape character, visual values, and desired planning outcomes of the study area. These are summarised in the following paragraphs.

3.1. State and regional planning documents

3.1.1. Greater Sydney Regional Plan: A Metropolis of Three Cities, NSW Greater Sydney Commission

The *Greater Sydney Regional Plan* sets a 40-year vision (to 2056) and establishes a 20-year plan to manage growth and change for Greater Sydney in the context of social, economic and environmental matters (NSW Greater Sydney Commission, 2018a). It identifies three key cities in Greater Sydney, including the 'Eastern Harbour City' centred around Sydney CBD, which includes Denistone (p.20-21).

Denistone Station is located in the northern suburbs of Sydney. It is not identified as a strategic centre, part of a transit-oriented development site, an urban renewal area, or within the Eastern Economic Corridor. Therefore, the residential character of the study area would be maintained.

The Regional Plan recognises the '*dual function of streets as places for people and movement*' as being '*paramount'* to the design and management of '*great places'* (p.73). Amenity is to be prioritised, including the provision of '*safe, direct and comfortable pathways for all people*' (p.74). The '*protection of the amenity of public spaces from overshadowing'* is also identified as important (p.101).

The region's '*green infrastructure'*, including street tree plantings, are identified as valued assets for Greater Sydney (p.156). '*Expanding urban tree canopy in the public realm*' is a priority for Greater Sydney along streets, in parks and other public spaces, and on privately owned land, in Strategy 30.1 (p.164).

3.1.2. North District Plan, NSW Greater Sydney Commission

Greater Sydney's three cities, identified in the *Greater Sydney Regional Plan: A Metropolis of Three Cities* (NSW Greater Sydney Commission, 2018a), extend across five districts, including the North District, which is a part of the Eastern Harbour City.

Denistone is located in the southern part of the North District, south of Epping. It is located between Eastwood and West Ryde, which are both identified as local centres. Denistone is primarily a suburban area, comprising low density residential development and open space. Denistone is not identified as a local centre with the existing train station servicing the local residential community (p.39).

The station is located near to several parkland reserves, which include mature bushland, including the Symons Reserve and Darvall Park. Protecting and enhancing scenic and cultural landscapes, which includes '*urban bushland'*, is a priority in the North District Plan (Planning Priority N17, p.105). Increasing urban tree canopy cover is also a key priority in the Plan (Planning Priority N19, p.108).

3.1.3. Better Placed, Office of the NSW State Government

The office of the NSW State Government Architect has prepared a suite of documents under the title of '*Better Placed*' which aims to improve the urban design quality of places in NSW. These documents include:

- *Better Placed: An integrated design policy for the built environment of NSW, State Government Architect NSW* (2018)
- *Better Placed: Draft Good Urban Design Strategies for realising Better Placed objectives in the design of the built environment, State Government Architect NSW* (2018)
- *Better Methods: Evaluating Good Design, Implementing Better Placed design objectives into projects* (2018).

These documents are intended to inform those involved in the design, planning, and development of the built environment in NSW. The overriding policy establishes the objectives and expectations in relation to design and creating good places.

The policy includes seven objectives for the design of the built environment, which are:

- Better fit – Contextual, local and of its place
- Better performance – Sustainable, adaptable and durable
- Better for community – Inclusive, connected, and diverse
- Better for people – Safe, comfortable and liveable
- Better working – Functional, efficient and fit for purpose
- Better value – Creating and adding value
- Better look and feel – Engaging, inviting and attractive.

These objectives are expanded upon in the Strategy and Evaluation documents. The principles identified in the *'Better Methods, Evaluating good design'* paper have generally informed the evaluation of the urban design impacts of the Proposal.

3.2. Local government planning documents

Denistone Station is located in the City of Ryde local government area. While the following planning documents do not apply to this Proposal, they contain the planning intent and context for areas surrounding the station. Relevant clauses from *Ryde Local Strategic Planning Statement 2020* (LSPS), *Ryde Local Environmental Plan 2014* (LEP) and *Ryde Development Control Plan 2014* (DCP) are summarised in the following sections.

3.2.1. Ryde Local Strategic Planning Statement

The LSPS for Ryde (City of Ryde, 2020) outlines the vision for land use planning over the next 20 years and is intended to guide future planning decisions.

Denistone is not identified as a 'local centre' or an 'emerging hub / retail centre' in the centres structure plan and it is intended that the existing suburban setting of the station will be maintained.

The LSPS includes several key themes, including Liveability and Sustainability, which are relevant to this assessment.

The key theme of Liveability – Design Excellence & Place-making (Part 3), focusses on '*design quality*' and '*place-making*'. It aims to ensure that: '*All development activity in the City of Ryde will showcase design excellence, contributing positively to the natural, cultural, visual and architectural character of the City*' (s.3.5.1).

A key action is to ensure new development has '*compatibility with existing and future character*' of town centres and residential areas, such as Denistone (s.3.5.5, Table 25, Action D2.2), and to ensure that public spaces, such as Denistone Station, '*contribute positively to a sense of local identity*' (s.3.5.5, Table 26, Action D4.1).

The key theme of Sustainability – Environment (Part 5), prioritises an increase in '*urban tree canopy cover*' through actions such as implementing the City of Ryde Street Tree Master Plan (City of Ryde, 2013) (s.5.2.5, Table 31, Action E2.1).

3.2.2. Ryde Local Environmental Plan 2014

This LEP aims to '*preserve and improve the existing character, amenity and environmental quality of the land*' in the Ryde local government area, including Denistone Station (cl.1.2).

Land use zoning

The majority of the proposal site is zoned SP2 Infrastructure. The objectives of this zone include: *'To provide for infrastructure and related uses'* and *'to ensure the orderly development of land so as to minimise any adverse effect of development on other land uses'.*

The northern part of the proposal site along Gordon Crescent, including the commuter car park, is zoned RE1 Public Recreation. An objective of this zone is to '*provide a range of recreational settings and activities and compatible land uses*'. The car park adjoins Symons Reserve, which is zoned E2 Environmental Conservation, which aims to '*prevent development that could destroy, damage or otherwise have an adverse effect on*' the values of the reserve, including *'aesthetic values'*.

The station is surrounded mainly by areas of low density residential development (R2 Low Density Residential zoning) with a range of built form, including a concentration of heritage listed homes and gardens within the Darvall Estate heritage conservation area, to the south of the station. In addition to Symons Reserve, the suburb includes a number of established parks and reserves near the station including Darvall Park (zoned E2 Environmental Conservation and RE1 Public Recreation), located to the west of the station.

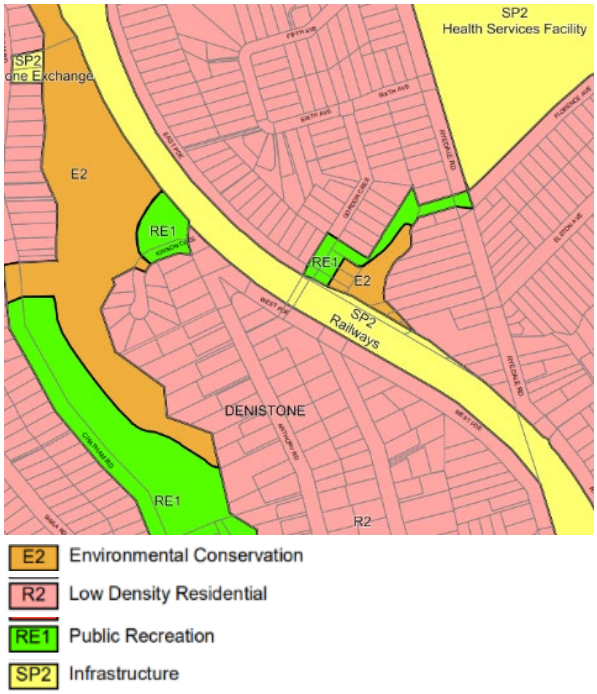


FIGURE 3-1 RYDE LEP ZONING

Potential building heights

Development in the suburban area surrounding the station is permitted to reach maximum building heights of 9.5 metres. This reflects the desire to maintain the low-rise residential character in this area.

Although the rail corridor and station are not subject to a building height restriction under the LEP, the height of buildings clause 4.3(1) has the following objectives:

- *'to ensure that street frontages of development are in proportion with and in keeping with the character of nearby development'*
- *'to minimise overshadowing and to ensure that development is generally compatible with or improves the appearance of the area'*
- *'to minimise the impact of development on the amenity of surrounding properties'*
- *'to emphasise road frontages along road corridors'.*

Heritage

Denistone Station is listed on the s.170 NSW State Agency heritage register. It is also recommended for nomination to the NSW State Heritage Register (SHR) (17/02/2017). Although it does not currently appear on the SHR list of nominated places, best practice recommends that where there is uncertainty, the item should be treated as though it is on, or nominated to, the SHR until conclusively confirmed otherwise.

Other heritage items and heritage conservation areas in and around the station include:

- Darvall Park, a local heritage place, considered to be 'of aesthetic significance as an important area of remnant urban bushland' (OEH, 2013)
- Darvall Estate heritage conservation area, including 'streetscapes and landscaping' that 'contribute to the amenity of the area with wide roads and mature street trees' (City of Ryde Council, 2019)
- Denistone House (former house), Ryde Hospital (refer to Figure 5-9).

A key objective of the heritage conservation clause is '*to conserve the heritage significance of heritage items and heritage conservation areas, including associated fabric, settings and views'* (clause 5.10).

Further consideration of the heritage nature, and potential impacts of the Proposal, are considered in the *Statement of Heritage Impacts* prepared by Artefact Heritage (2021) supporting the assessment of the Proposal.

3.2.3. Ryde Development Control Plan 2014

The Ryde DCP provides further detail to support the provisions in the LEP. The DCP aims to '*enhance the existing amenity and character of the City of Ryde'* and '*ensure new development is appropriate for its site and context'* (cl.1.5).

The DCP places importance on the appearance and compatibility of development with the surrounding context. The following provisions in the DCP are of relevance.

Design and character

The DCP contains several '*Special Areas*' (Part 5) and '*Specific Sites'* (Part 6) which identify the existing character, and strategy and development controls for new development in each area/site. Denistone Station is not located in any of these areas/sites, nor does the Proposal fall under any of the '*Development Types*' prescribed in part 3, such as '*Multi dwelling housing (for Low Density Residential Zone)*'.

Tree preservation

Vegetation, particularly mature trees, contribute significantly to an area's character. In particular they have '*amenity value'* including '*visual amenity and canopy coverage'*, providing shade and comfort (Part: 9.5). The station setting contains a leafy character, established through the interconnection of the mature canopy trees distributed across road reserves, parks, bushland areas and private property.

The DCP aims to '*maximise'* the '*Urban Forest canopy across the City of* Ryde', such as Symons Reserve, and '*ensure all new development considers existing trees on the development site'* (Part: 9.5).

As identified in the *Arboricultural Impact Assessment and Tree Protection Plan* prepared by Tree Survey (2021) supporting the assessment of the Proposal, no trees are proposed to be removed as part of the Proposal.

3.2.4. City of Ryde Street Tree Master Plan

This document informs and directs all street tree planting and aids the Council and community in managing and increasing the extent of urban forest in Ryde (City of Ryde, 2013). It divides Ryde into eight precincts, '*informed by the landscape character, topography and urban fabric'* (Page 9), with each precinct comprising unique street typologies and associated tree species.

Denistone Station is located in the central part of Precinct 4: Denistone (refer to Figure 3-2). Priorities for this precinct include:

- 'Maintain the distinct character of Denistone with selection of species appropriate to the Blue Gum High Forest species adjacent to remnant stands' (including at Symons Reserve) 'and the planting of exotic species'
- Increase infill tree planting in residential streets such as East Parade and West parades (high priority), and Gordon Crescent (low priority)
- Maintain using Brush Box trees in heritage precincts such as Darvall Estate and where remnant trees occur (Precinct 4, Pages 54-56).

FIGURE 3-2 PRECINCT 4: DENISTONE STREET TREE MASTER PLAN

4. Methodology

4.1. Guidance for landscape and visual assessment

While there are no specific legislative requirements for the methodology of an assessment such as this in New South Wales, the industry typically refers to the guidance offered by:

- *Guidance note EIA-N04 Guidelines for Landscape Character and Visual Impact Assessment*, TfNSW 2020)
- *The Guidance Note for Landscape and Visual Assessment* (GNLVA), Australian Institute of Landscape Architects Queensland (2018).

The methodology used for this assessment conforms generally with the direction offered by these guidelines.

4.2. Approach

This assessment includes a visual impact assessment as well as a landscape and urban design assessment.

The landscape and visual impact assessment has identified potential impacts during construction and operations of the Proposal, day and night.

The process involved the identification of:

- existing conditions
- visual and landscape sensitivity
- magnitude of change
- visual and landscape impact
- mitigation opportunities.

The potential visual impacts have been classified according to the impact significance criteria set out in this methodology.

4.3. Method

4.3.1. Identification of existing conditions

The key landscape features of the site have been identified, described and located on a plan.

A number of viewpoints have been selected to illustrate the visual influence and character of the site. These views represent publicly accessible viewpoints from a range of locations and viewing situations. Particular attention was paid to views from places where viewers are expected to congregate such as the station platforms, parkland, as well as views to and from the adjacent streets to capture the types of views that would be appreciated from nearby residences.

4.3.2. Visual sensitivity

Visual sensitivity is the nature, quality and duration of views. Locations from which a view would potentially be seen for a longer duration, where there are higher numbers of potential viewers and where visual amenity is important to viewers, can be regarded as having a higher visual sensitivity. In addition, any views recognised by local, state or federal planning regulations would, by nature of their recognition in these documents, increase the sensitivity level of the view.

In order to ensure the assessment of impact is reasonable, the sensitivity of a viewpoint is considered in the broadest context of possible views, from those of national importance through to those which are of neighbourhood importance. For this reason, the following terminology is used to describe the level of visual sensitivity, see Table 4-1.

TABLE 4-1 VISUAL SENSITIVITY LEVELS

Visual sensitivity	Description
National	Heavily experienced view to a national icon, e.g. view to Sydney Opera House from Circular Quay or Lady Macquarie's Chair, view to Parliament House Canberra along Anzac Parade.
State	Heavily experienced view to a feature or landscape that is iconic to the State, e.g. view along the main avenue in Hyde Park.
Regional	Heavily experienced view to a feature or landscape that is iconic to a major portion of a city or a non-metropolitan region, or an important view from an area of regional open space, e.g. an identified view corridor to a state heritage listed item.
Local	High quality view experienced by concentrations of residents and/or local recreational users, local commercial areas, and/or large numbers of road or rail users, e.g. view from a local park or gathering space, such as Symons Reserve and Denistone Station.
Neighbour-hood	Views where visual amenity is not particularly valued by the wider community such as views from local streets and residences.

4.3.3. Magnitude of change

Magnitude describes the extent of change resulting from the Proposal and the compatibility of these new elements with the surrounding landscape. There are some general principles which determine the magnitude of change; these include elements relating to the view itself such as distance, landform, backdrop, and contrast. There are also characteristics of the Proposal itself which are: scale, form and line/alignment. Change can result in an improvement or reduction in visual amenity.

A high magnitude of change would result if the development contrasts strongly with the existing characteristics of the view. A low magnitude of change occurs if there is a high level of integration of form, line, shape, pattern, colour or texture values between the Proposal and the environment in which it is located.

In some circumstances, there may be a visible change to a view which does not alter the amenity of the view, this would be due to the compatibility of the Proposal and capacity of the view to absorb the change. Table 4-2 lists the categories used to describe the magnitude of change.

TABLE 4-2 MAGNITUDE LEVELS

Magnitude	Description
Considerable reduction or improvement in visual amenity.	Substantial part of the view is altered. The Proposal contrasts substantially with surrounding landscape, is not compatible, or substantially detracts from the amenity of the view. Or the proposal substantially enhances the amenity of the view.
Minor reduction or improvement in visual amenity.	Alteration to the view is clearly visible. The Proposal contrasts somewhat with surrounding landscape, is somewhat compatible or detracts somewhat from the amenity of the view. Or the proposal somewhat enhances the amenity of the view.
Neutral change in visual amenity	Either the view is unchanged or if it is, the change in the view is unlikely to be perceived by viewers, or the Proposal is compatible with the surrounding landscape and causes no reduction in the amenity of the view.

4.3.4. Identifying night-time visual impacts

The assessment of night-time impact has been carried out with a similar methodology to the daytime assessment. This assessment method also draws upon the guidance contained within *AS4282 Control of the obtrusive effects of outdoor lighting* (2019).

AS4282 identifies four main potential effects of lighting, which are, the effects on residents, transport system users, transport signalling systems and astronomical observations. Of relevance to this assessment is the effects of lighting on the visual amenity of residents and transport system users.

AS4282 identifies environmental zones which are useful for categorising night-time landscape settings. The following assessment will use these environmental zones to describe the existing night-time visual condition and assign a sensitivity to these settings.

These zones are:

- A0 / A1: Dark / Intrinsically dark landscapes – national parks, state forests etc.
- A2: Low district brightness areas – rural, small village, or relatively dark urban locations
- A3: Medium district brightness areas – small town centres or urban locations
- A4: High district brightness areas – town/city centres with high levels of night-time activity.

Specific features of the lit landscape can be described in terms of:

- sky glow – the brightening of the night sky
- glare – condition of vision in which there is discomfort or a reduction in ability to see
- light spill ('trespass') – light emitted by a lighting installation that falls outside of the design area.

The level of impact on the precinct has been described according to the impact levels that are identified in Table 4-4.

The setting of the Denistone Station is considered to be an area of **medium district brightness (A3)**. At the station there is lighting associated with the existing station, commuter car park, surrounding street lights and lit pathways. Surrounding the station, there are further, less brightly lit residential areas with street lights and illuminated residences.

4.3.5. Assigning impact levels

An assessment of visual impact has been made on a range of representative viewpoints. A visual impact level has been determined by combining the sensitivity and magnitude level according to the matrix presented in Table 4-3.

Similarly, a night-time impact has been determined by combining a sensitivity and magnitude level according to the matrix presented in Table 4-4.

4.3.6. Mitigation measures

Following the identification of potential landscape and visual impacts, opportunities for mitigation were identified (to minimise impacts where they were identified). Mitigation measures considered included opportunities to avoid, reduce and/or manage potential adverse impacts during construction and operation of the Proposal.

4.3.7. Photomontages and artists impressions

Photomontages have been prepared to illustrate the massing and scale of the Proposal. This combines the architectural 3D model with a photograph using a 3D model and photo editing techniques to create a photorealistic impression of the Proposal.

The photomontage locations were selected In consultation with TfNSW to illustrate typical views toward the Proposal from publicly accessible locations. The photomontage locations were selected to illustrate the massing and scale of the main components of the Proposal and their setting within the Denistone Station precinct.

TABLE 4-3 VISUAL IMPACT LEVELS

		Sensitivity				
		National sensitivity	State Sensitivity	Regional sensitivity	Local sensitivity	Neighbourhood sensitivity
Magnitude of change	Considerable reduction	Very high adverse	Very high adverse	High adverse	Moderate adverse	Minor adverse
	Minor reduction	Very high adverse	High adverse	Moderate adverse	Minor adverse	Negligible
	Neutral	Negligible	Negligible	Negligible	Negligible	Negligible
	Minor improvement	Very high benefit	High benefit	Moderate benefit	Minor benefit	Negligible
	Considerable improvement	Very high benefit	Very high benefit	High benefit	Moderate benefit	Minor benefit

TABLE 4-4 NIGHT-TIME VISUAL IMPACT LEVELS

		Sensitivity			
		A0/A1: Dark / Intrinsically dark landscapes	A2: Low district brightness	A3: Medium district brightness	A4: High district brightness
Magnitude of change	Considerable reduction	Very high adverse	High adverse	Moderate adverse	Minor adverse
	Minor reduction	High adverse	Moderate adverse	Minor adverse	Negligible
	Neutral	Negligible	Negligible	Negligible	Negligible
	Minor improvement	High beneficial	Moderate beneficial	Minor beneficial	Negligible
	Considerable improvement	Very high beneficial	High beneficial	Moderate beneficial	Minor beneficial

4.3.8. Assessment of Urban Design and Landscape Character Impacts

An assessment of urban design and landscape character impacts of the Proposal was undertaken in two steps. These were:

- a response to state and local government urban design considerations, and
- a general urban design and landscape character impact assessment.

While the local government planning documents (including the LSPS, DCP and LEP) are not directly relevant to the approval of the Proposal, these documents have been considered in the assessment of impact on urban design and landscape character.

A general assessment of urban design considerations has also been undertaken, based on the themes identified in relevant national and state guidance for urban design. This includes the NSW State Government Architect's Better Placed suite of documents, the Federal Government's National Urban Design Protocol, and best practice urban design principles.

This assessment includes consideration of impacts the project would have on the urban design functionality of the Proposal, including:

- accessibility, legibility and permeability
- direct impacts on trees, open space and public realm areas
- changes to the level of shade and comfort to public areas
- access to sunlight and the effect of overshadowing.

5. Assessment of visual impacts

5.1. Existing conditions

Denistone Station is located on the Northern line (T9 Service), about 20 kilometres by rail from Central Station. The Proposal site for the Denistone Station Upgrade includes the existing Denistone Station and at-grade commuter car park to the north, along Gordon Crescent (refer to Figure 5-9).

Denistone Station is of local heritage significance as it is in near-original condition and retains all of its key elements from the opening of the station in 1937, including the station concourse and platform buildings, island platforms and brick retaining walls which form the edge of the railway corridor (refer to Figure 5-1). It is listed on the RailCorp s170 register and has been nominated for the State Heritage Register.

The station is located in a small cutting and consists of two island platforms extending east of the Gordon Crescent road bridge. Each platform contains a small low set brick building with sheltered waiting areas and amenities. There are small shade trees and further seating to either side of the platform buildings (refer to Figure 5-1 and Figure 5-2). The platforms are accessed via two wide sets of stairs that connect to the road bridge and station concourse building on Gordon Crescent (refer to Figure 5-1 and Figure 5-3).

FIGURE 5-1 VIEW NORTHWEST ALONG THE STATION PLATFORMS

The road bridge (refer to Figure 5-4) includes two lanes of traffic (one in each direction) and a narrow footpath on the eastern side (station side) of the bridge. It provides north-south access over the rail corridor for vehicles and pedestrians, between West Parade and Gordon Crescent. The pathway on the eastern side of the bridge also provides access between the station and the existing commuter car park. The brick retaining walls along the bridge and extending along the rail corridor boundary are a local visual feature in views from within the station and surrounding areas (refer to Figure 4-5).

The station is surrounded by predominantly low density suburban areas. Suburban areas to the north of the station mostly contain single and double storey detached houses, located on wide streets and set of large suburban lots, with established gardens.

FIGURE 5-2 VIEW SOUTHEAST ALONG STATION PLATFORMS

FIGURE 5-3 VIEW FROM THE ELEVATED STATION CONCOURSE, ACROSS THE STATION PLATFORMS

FIGURE 5-4 VIEW TO STATION CONCOURSE BUILDING AT GORDON CRESCENT ROAD BRIDGE

Suburban areas to the south of the station are of a similar character, including a concentration of early twentieth century houses with '*high aesthetic values*' (City of Ryde Council, 2019), located on land gently sloping away from Denistone Station, towards West Ryde to the south. This area includes the Darvall Estate heritage conservation area (Ryde LEP 2014) (refer to Figure 5-7).

The streets contain a large number of mature brush box trees (refer to Figure 5-7), which characterise much of the Denistone suburban area, possibly planted as part of a council beautification scheme in the 1930s (City of Ryde Council, 2019). The wide street and trees '*contribute to the amenity of the area*' (City of Ryde Council, 2019). The slope of the landscape also provides an '*attractive leafy outlook from the crest of the hill over the trees and private gardens of the streets*' (City of Ryde Council, 2019).

There are several parkland reserves located near the station, including the Symons Reserve to the northeast and Darvall Park to the northwest. Both reserves include mature trees and provide a leafy landscape setting to the station and surrounding areas.

The mature trees in Symons Reserve provide visual separation between the station and nearby residences (refer to Figure 5-5). Symons Reserve is located beside the Denistone Station commuter car park, located on Gordon Crescent.

To the northwest of the station, Darvall Park (refer to Figure 5-6), also a local heritage place (Ryde LEP 2014), contains a large area of mature trees beside the rail corridor and is considered to be '*of aesthetic significance as an important area of remnant urban bushland*' (OEH, 2013).

Other vegetation in the vicinity of the station includes mature trees and shrubs along the verges of East and West parades, which provide visual separation between adjacent suburban areas and the rail corridor and station (refer to Figure 5-8). Views to and from the station are mostly enclosed by vegetation along the rail corridor, street trees, trees within the adjacent reserves and in established gardens of nearby residences.

FIGURE 5-5 SYMONS RESERVE

FIGURE 5-6 VIEW TO DARVALL PARK AND CAR PARK

FIGURE 5-7 VIEW ALONG MIRIAM ROAD, DARVALL ESTATE HERITAGE CONSERVATION AREA

FIGURE 5-8 VIEW ALONG EAST PARADE TOWARDS THE RAIL CORRIDOR

FIGURE 5-9 LANDSCAPE AND VISUAL FEATURES OF THE SITE AND SURROUNDS

5.2. Assessment of Representative Viewpoints

The following viewpoints were selected to represent the range of views to the Proposal:

- Viewpoint 1: View northwest from station platform
- Viewpoint 2: View southeast from East Parade
- Viewpoint 3: View southwest from Symons Reserve
- Viewpoint 4: View northwest from West Parade
- Viewpoint 5: View southeast from West Parade.

The location of these viewpoints is shown on Figure 5-10, and an assessment of each viewpoint has been summarised on the following pages.

FIGURE 5-10 VIEWPOINT LOCATION PLAN

5.2.1. Viewpoint 1: View northwest from station platform

FIGURE 5-11 VIEWPOINT 1: VIEW NORTHWEST FROM STATION PLATFORM

Existing view: This view is from the eastern end of Platform¾4. The small brick platform buildings, seating, lighting, signage and several small trees can be seen on each island platform, in the middle ground of the view. The rail corridor is located in a small cutting, with a mixture of vegetated batters, brick retaining walls and timber fencing along the edges of the track, providing enclosure to this view. The Gordon Crescent road bridge can be seen in the background of this view, extending over the rail corridor, between East and West parades. The station concourse building is centred on the road bridge, above the rail corridor. The stairs can be seen connecting the concourse to the northern platform.

There is a glimpse to the commuter car park and residential dwellings to the north of the station (right of view), through the existing mature trees in Symons Reserve and along the rail corridor.

Visual sensitivity: This view would be experienced by local commuters using Denistone Station and is of **local visual sensitivity**.

Visual impact during construction: A construction site would be established in the middle and foreground of this view, extending along the western half of each platform. The station would remain open for use, with temporary fencing enclosing areas under construction. There would be works to upgrade the existing stairs, including new balustrades and landings either side of the concourse building. Two new lift structures would be constructed, behind the stairs, located either side of the station concourse building. This construction activity would include the use of cranes and works would be seen rising above the stairs and level of the road bridge.

The western half of the platforms would be regraded, including the removal and replacement of some areas of asphalt and new tactiles would be installed along the edge of each platform. There would be a new platform canopy constructed on Platform 1/2, between the stairs and platform building. A similar canopy would also be constructed on Platform 3/4 east of the existing overhead gantry (left of view). These works would not impact on the existing platform trees.

There would be construction activity at the commuter car park (right of view) and a laydown area in the existing cleared area adjacent to the reserve, to the north of the station.

Overall, the construction activity, including use of large-scale machinery, would be prominent, extending across much of this view and located in close proximity to customers using the station. This would be a **considerable reduction** in the amenity of this view, which is of local sensitivity, resulting in a **moderate adverse visual impact**.

Visual impact during operation: Two new lift structures would be visible adjacent to the existing concourse building. These structures would be located behind the existing stairs and rise above the road bridge level. The lifts would remain below the height of the concourse building roofline and not reduce the visual prominence of this existing building. There would be new asphalt across most of the visible platform area and tactiles parallel to the platform edge. The existing stairs would also be upgraded with new balustrades.

While the new lift structures would have a contemporary character, with glazing, steel and metal faming, the base of the shafts would be clad with brick, complementing the character of the existing platform buildings. The lift would be located behind the existing stairs and would recede in this view. The lift would also have some transparency with the lift structure glazing and steel mesh throw screens, reducing the visual mass of these structures.

The unsympathetic fencing and balustrades on the eastern side of the concourse building, facing the platforms, would have been removed and there would be new steel mesh throw screens along the elevated concourse. There would also be new balustrades on the stairs. Together these additions would present a more coherent architectural form and higher quality finish than what currently exists.

There would be a new platform canopy structure on Platform 3/4 in the foreground of this view, partly enclosing the view with a roof and shading the platform.

There would be a second canopy on Platform 1/2, beyond the platform building. This structure would add some visual clutter to the station platform, in the middle ground of this view. Minor adjustments to the Platform 1/2 building, including removal of the existing air lock walls on the south-eastern side, would open up the view to the south eastern façade of the heritage platform building, improving this area of the view. The character of the platforms would be refreshed by new pavements, furniture, lighting and signage.

Overall, the scale of the proposed built form would not contrast with the existing structures, there would be both additional structures as well as improvements to the station platform building and platform finishes. On balance, this would result in **a neutral change** to the amenity of this view, which is of local sensitivity, and would result in a **negligible visual impact**.

5.2.2. Viewpoint 2: View southeast from East Parade

FIGURE 5-12 VIEWPOINT 2: VIEW SOUTHEAST FROM EAST PARADE

Existing view: This view is located to the north of the station, near the corner of East Parade and Gordon Crescent. The landform in this view slopes in a southerly direction, towards the station. The station concourse building is visible in the centre, middle ground of this view, located on the Gordon Street road bridge. There are brick walls along the road bridge, partially screening views to the concourse building, station stairs and platforms below. The station platforms and trains would be seen in this view, passing through the station, in the background of view.

The entrance to the commuter car park is visible to the north (left of view). Large trees in Symons Reserve (left of view) frame this view to the station, and the trees within the streets and gardens of the suburban areas to the south of the station form a leafy backdrop to this view.

Visual sensitivity: This view would be experienced by local residents and their visitors, including commuters approaching Denistone Station and nearby school service bus stops on East Parade and Gordon Crescent. This view is of **local visual sensitivity**.

Visual impact during construction: A construction site would be established on the eastern side of Gordon Crescent, extending from the Gordon Crescent commuter carpark (left of view) to the station concourse building (right of view). The site would be enclosed by temporary site fencing and there would be construction vehicles accessing the site via the carpark entry and travelling across this view. Beyond the carpark, there would be glimpses to materials and equipment within a laydown area, that would be located in the existing cleared area adjacent to the north of the station adjacent to the reserve.

The station concourse building would be modified, with works to install an awning and fascia seen from this location. The brick wall along the road bridge would remain and works to install a lift structure, including the use of cranes, would be seen rising above the brick wall, in front of the concourse building. There would be works to alter the pathway linking the station with the commuter car park, a bus stop and kiss and ride bay in front of the car park. The commuter car park would also be partly regraded and resurfaced and a DDA parking space installed.

FIGURE 5-13 VIEWPOINT 2: VIEW SOUTHEAST FROM EAST PARADE, DETAIL VIEW

FIGURE 5-14 VIEWPOINT 2: VIEW SOUTHEAST FROM EAST PARADE, DETAIL VIEW, PHOTOMONTAGE

Overall, the construction activity, including use of large-scale machinery, would be prominent and would be a **considerable reduction** of the amenity of this view, which is of local sensitivity, resulting in a **moderate adverse visual impact**.

Visual impact during operation: The original art deco style awning and fascia of the station concourse building would be reinstated, improving the original heritage character of the station entry in this view.

There would be two rectangular shaped lift structures which would rise above street level, either side of the station entry, rising above the brick walls along the road bridge, which would be retained. These lifts would remain below the height of the existing concourse building roofline but obstructing the view to part of the existing roof of the heritage character station concourse building. The upper portion of the lift would have glazing around the lift lobby, visually lightening the structure.

The commuter car park would be party resurfaced and existing trees surrounding the car park in Symons Reserve would be retained. New areas of landscaping along Gordon Crescent would refresh and improve the visual appearance of the street.

While the lifts would add further built form to this view and partly obstruct the view to the station concourse building, the Proposal would improve the prominence of the station entry, with the reinstated awning and facia and improvements to the streetscape. Overall, these factors would balance and there would be a **neutral change** to the amenity of this view, which is of local visual sensitivity, and a **negligible visual impact**.

Figures 5-13 and 5-14 provide a comparison between the existing view and the proposed view (photomontage) for this viewpoint.

5.2.3. Viewpoint 3: View southwest from Symons Reserve

FIGURE 5-15 VIEWPOINT 3: VIEW SOUTHWEST FROM SYMONS RESERVE

Existing view: This view from a footpath within the Symons Reserve includes several mature trees in in the fore and middle ground of the view. The station platforms (left of view) are generally level with this viewing location and there are glimpses to the platform buildings through the existing vegetation. This footpath gently rises towards Gordon Crescent and the existing commuter car park (right of view). A steep grass embankment provides visual separation between this path and the car park. The tiled rooftop of the station concourse building is visible in the background of this view.

Visual sensitivity: This view from a footpath through Symons Reserve and would be experienced by recreational users and people accessing Denistone Station and the nearby school service bus stops. The trees within Symons Reserve are a local visual feature and improve the amenity of this view. This view is of **local visual sensitivity**.

Visual impact during construction: A construction site would be established within the rail corridor, along the island platforms, in the middle ground of this view, and also across the existing car park (right of view).
A construction laydown area would be seen along the northern side of the rail corridor, in the vicinity of the existing access gates (left of view). Site fencing and hoarding would be installed along the construction site, partially blocking views to the platform upgrade works.

Works to construct the northern lift structure would be seen in the background of view, partly obstructed by the intervening slope, and the view of the existing station concourse building roof. This work would include the use of large-scale machinery and equipment including cranes.

While the construction activity would contrast with this otherwise leafy view, it would be partly obstructed by the intervening vegetation and filtered through trees. Overall, there would be a **minor reduction** in the amenity of this view, which is of local sensitivity, and this would result in a **minor adverse visual impact**.

Visual impact during operation: A new lift structure would be visible in front of the station concourse building. The lift would be seen rising above the intervening landform but remaining below the height of the existing tiled rooftop of the concourse building. The new lifts would be contemporary in character, including glazing and metal sheet roofing, contrasting somewhat with the heritage character building. The presence of the new lift would increase the visual prominence of the station entrance somewhat.

There would be a new station platform canopy visible in the background of view, along Platform 1/2, to the west of the platform building. This canopy would be a simple structure and also remain below the height of the platform building.

While the lift and platform canopy would add further built form to this view, they would not overwhelm or detract from the character of the existing station buildings. Overall, there would be **neutral change** in the amenity of this view, which is of local visual sensitivity, and would result in a **negligible visual impact**.

5.2.4. Viewpoint 4: View northwest from West Parade

FIGURE 5-16 VIEWPOINT 4: VIEW NORTHWEST FROM WEST PARADE

FIGURE 5-17 VIEWPOINT 4: VIEW NORTHWEST FROM WEST PARADE, PHOTOMONTAGE

Existing view: This view is located to the south of Denistone Station, near the intersection of Miriam Road and West Parade. The landform in this location slopes south and away from the station, towards the adjacent low density suburban area, including Darvall Estate heritage conservation area (Ryde LEP 2014). The station is located in a cutting, with the existing platform buildings partially visible through vegetation along West Parade. The Gordon Crescent road bridge and station concourse building can be seen in the centre of view, through a gap in vegetation, with a set of stairs connecting to each island platform. The trees within the Symons Reserve and along the northern side of the rail corridor provide a leafy backdrop to the view.

Visual sensitivity: This view is from Darvall Estate heritage conservation area (Ryde LEP 2014), which increases its importance in terms of visual amenity. It would also be experienced by local residents approaching the station. This view is of **local visual sensitivity**.

Visual impact during construction: A construction site would be established in the middle ground of this view, alongside and surrounding the station concourse building and extending east along the station platforms. There would be temporary fencing enclosing the areas under construction.

Construction of two new lift structures would be located either side of the station concourse building. This work would include the use of large scale machinery, including cranes, to install the lift structures. While this large scale equipment would likely be restricted to a short period of time, it would contrast with the otherwise leafy residential backdrop of this view. There would also be works to upgrade the stairs and landings, including replacement of the stair handrails and throw screens would be installed along the eastern frontage of the existing concourse building.

There would also be construction activity on the platforms including works to regrade the platform and installation of a new canopies on Platform 1/2, between the stairs and platform building and on Platform 3/4 between the platform building and southern end of the platform.

While this construction activity would contrast with the heritage character and otherwise leafy view, it would be partly screened by the intervening landform and vegetation.

Overall, there would be a **minor reduction** in the amenity of this view, which is of local sensitivity, and would result in a **minor adverse visual impact**.

Visual impact during operation: There would be two new lift structures located either side of the existing concourse building. These would remain below the height of the hipped roof of the concourse building but may rise above the backdrop of vegetation. These new lift structures would have a contemporary character, being a steel frame with glazing, louvres and metal roofing. These materials would create visual lightness and transparency to the upper portion of these structures, reducing their prominence. The lower section of these lifts would be brick, however mostly out of view from this location. This treatment would be in keeping with the character of the heritage buildings and visually unobtrusive as they would be located behind the existing stairs.

There would be new steel mesh throw screens along the elevated concourse screening the southern façade of this building. Minor additions to the platform a would be seen, including new canopies on Platform 1/2 and 3/4, which would not be prominent at this distance and mostly absorbed into the setting of the station.

The changes to the elevated concourse building would alter the character of the station, somewhat, increasing the amount of built form which is visible. The heritage listed station concourse building, including its red hipped roof, would remain visible, flanked by the new lift structures. The Proposal would replace unsympathetic elements, such as the white fencing, and also introduce further contemporary elements which would increase the built structures seen in close proximity to the heritage buildings. Notwithstanding this, the scale of the station would continue to be consistent with the prevailing scale and character of the built form in the locality.

On balance, there would be a **neutral change** to the amenity of this view, and a **negligible visual impact** during operation.

Figures 5-16 and 5-17 provide a comparison between the existing view and the proposed view (photomontage) for this viewpoint.

5.2.5. Viewpoint 5: View southeast from West Parade

FIGURE 5-18 VIEWPOINT 5: VIEW SOUTHEAST FROM WEST PARADE

FIGURE 5-19 VIEWPOINT 5: VIEW SOUTHEAST FROM WEST PARADE, PHOTOMONTAGE

Existing view: In this view to the Station from the northwest, the landform rises steeply as West Parade approaches the Gordon Crescent road bridge. The station concourse building can be seen in the left, middle ground of this view, flanked by existing brick walls. The red hipped roof is a local visual feature, identifying the station at the terminus of this view.

The rail corridor is located in a cutting, so that the intervening vegetation, fencing, landform and built form screens any view to the station platforms below. There would be views to the upper portion of trains, travelling along the rail corridor, seen below the road bridge where there is a break in the trees.

There is a narrow footpath along the eastern side of West Parade, lined with safety bollards (left of view). The vegetation along the western side of the road, visually separates the station from the residential dwellings to the south of the station (right of view). Mature trees in Symons Reserve (left of view), provide a leafy backdrop to this view.

Visual sensitivity: This view is from Darvall Estate heritage conservation area (Ryde LEP 2014), which increases its importance in terms of visual amenity. It would also be experienced by local residents approaching the station. This view is of **local visual sensitivity**.

Visual impact during construction: A construction site would be established in the middle ground of this view, including in areas surrounding the existing station concourse building. Temporary fencing or hoarding would be seen along the eastern edge of the road bridge, extending north of the station and blocking views to the station.

There would be construction work at the station concourse building to install an awning and fascia. The works to install two new lift structures, either side of the concourse building, would also be visible, rising above the road bridge. This work would include the use of cranes for part of the time.

Construction vehicles may be seen in this view, travelling along West Parade to access a construction laydown area at the commuter carpark to the northwest of this location on Anthony Road (behind the viewpoint photo).

The construction activity would be seen prominently on the rise in the centre of this view and would contrast with the otherwise heritage character and leafy view. Overall, there would be a **minor reduction** in the amenity of this view, which is of local sensitivity, resulting in a **minor adverse visual impact**.

Visual impact during operation: In this view, the upgraded station entrance would be partly visible in the middle ground of the view, centred on the road bridge. The original art deco style awning and fascia of the station concourse building would be reinstated, improving the character and increasing the prominence of the station entrance slightly. The brick walls along either side of the Gordon Road bridge would be retained and would block a substantial portion of the view of the station. There would be two new lift structures, one either side of the concourse building, visible rising above the walls. These structures would remain below the level of the concourse building roofline and the lift lobby would be glazed, creating a somewhat visually light structure.

Overall, the lifts would neatly fit within the station entry, framing the existing concourse building and having a bulk and scale that would be absorbed into this view without detracting from the prevailing low density, heritage character of the locality. This would result in a **neutral change** to the amenity of this view, which is of local sensitivity, and would result in a **negligible visual impact** during operation.

Figures 5-18 and 5-19 provide a comparison between the existing view and the proposed view (photomontage) for this viewpoint.

5.3. Summary of visual impacts

The following summarises the findings of this viewpoint assessment.

5.3.1. Summary of daytime visual impact during construction

During construction, there would be **moderate adverse visual impacts** experienced in views from the station platforms and on approach to the station from East Parade and Gordon Crescent. This is due to the scale and extent of the works that would be seen at the station road bridge and along the station platforms.

There would be **minor adverse visual impacts** during construction in locations where views to the station are screened by existing mature trees, intervening landform and other built form, including in West Parade and Miriam Road, to the south and southwest of the station and from Symons Reserve in the north.

Similarly, there may be **minor** to **moderate adverse visual impacts** experienced from residential properties which overlook the station and construction site and where the construction work rises above or would be seen through gaps in vegetation and built form.

5.3.2. Summary of daytime visual impact during operation

Overall, there would be a **negligible visual impact** experienced in views from the vicinity of the road bridge, where views to the upgraded station concourse would be seen. This is due to a balanced effect of the increase in built form in close proximity to the heritage concourse building together with the improvements of the station entry, with the reinstatement of art deco style awning and fascia on the station concourse building and upgraded entry concourse.

From areas of West Parade to the south east of the station, there would also be a **negligible visual impact.** In these views there would be some obstruction of the eastern façade of the existing heritage character station concourse building with new steel mesh throw screens along the station concourse,. The new lift structures would add further built form adjacent to the heritage building but remain below the height of the hipped roofline of the heritage concourse building.

There would be a **negligible visual impact** experienced in views from the station platforms as the alterations to the eastern façade of the station concourse building and Platform 1/2 building and additional visual clutter added to the station with additional canopies on the platforms, would be balanced by the relatively small scale of the proposed built form as well as improvements to the station platform building and platform finishes.

There would also be **negligible visual impacts** in views from West Parade to the northwest of the station and Darvall Park, where the proposed lifts are set back and would be partly screened from view by existing vegetation, landform and existing buildings. In these views the lift structures and associated public realm works would not detract from the prevailing character of the locality and improve the local prominence of the station entry.

There would be a **negligible visual impact** in views from Symons Park, where the Proposal would be partly screened from view by existing vegetation within the park and the local landform. In these views the lift structures and associated public realm works would not be prominent, and where seen, they would complement the character of the station and improve the local prominence of the station entry.

The following table (Table 5-1) summarises the impacts identified in the viewpoint assessment.

TABLE 5-1 SUMMARY OF VIEWPOINT ASSESSMENT

			Construction		Operation	
	Viewpoint number and location	Sensitivity	Magnitude	Visual impact	Magnitude	Visual impact
1	View northwest from station platform	Local	Considerable reduction	Moderate adverse	Neutral	Negligible
2	View southeast from East Parade	Local	Considerable reduction	Moderate adverse	Neutral	Negligible
3	View southwest from Symons Reserve	Local	Minor reduction	Minor adverse	Neutral	Negligible
4	View northwest from West Parade	Local	Minor reduction	Minor adverse	Neutral	Negligible
5	View southeast from West Parade	Local	Minor reduction	Minor adverse	Neutral	Negligible

5.4. Views at night

Existing conditions: Areas in the vicinity of the Denistone Station, including the Proposal site, are considered to be of **medium district brightness (A3)**. This is due to the combination of surrounding land uses, which includes relatively high light levels within the station, and moderate light levels along Gordon Crescent, including the commuter car park, and lower light levels in the surrounding residential areas, parks and reserves. The brightly lit environment of the station is mostly contained by surrounding landform and vegetation. Also, the light emitted from the surrounding streets and residential properties are partly contained by the densely vegetated setting.

Visual impact during construction: The work areas and construction compounds would be lit at night for security. It is unlikely that these areas would be used on an ongoing basis for construction activity during evening hours (other than for specific activities or where works are undertaken during possession periods).

Generally, the character of the construction works at the station concourse, platforms and construction compound areas at night would be absorbed into the surrounding brightly lit environment of the station and enclosed by the existing vegetation which surround the station.

There may be some lighting visible from nearby residential properties which overlook the site, such as near the corner of Gordon Crescent and East Parade, near the West Parade and Miriam Road intersection and near the site office compound area.

Overall, the works would result in a **minor reduction** in the amenity of views at night and a **minor adverse visual impact** during construction.

Visual impact during operation: During operation, the station would continue to be brightly lit for security and safe use at night (as is currently experienced). The upgraded station concourse, including two new lift structures, would be seen in the context of the existing station and streetlights along Gordon Crescent. This area of the station may be more prominent in views from residences directly overlooking the station, where the new lifts and upgraded station concourse would be seen. However, the lifts would be lower than the existing station concourse building and would not introduce lighting to a higher level than the existing station concourse.

There would be additional lighting provided for the kiss and ride bay and DDA compliant parking space on Gordon Crescent. This additional lighting would be seen in the context of the existing commuter car park and would be set back from residential properties.

Overall, the upgraded station would be likely to create minor additional sky glow above the site due to the additional built form. There is not expected to be any additional direct light spill (trespass) onto private properties to the north and south of the station, as the neighbouring residential properties are separated from the station by existing vegetation, which would be retained.

The final design of lighting for the station would ensure that it is consistent with the requirements of the Australian Standards for the control of obtrusive lighting effects. Generally, the character of the proposed station upgrade at night would be absorbed into the surrounding brightly lit environment.

Overall, this would result in **no perceived change** in the amenity of views at night, resulting in a **negligible visual impact** at night during operation.

TABLE 5-2 SUMMARY OF VISUAL IMPACT AT NIGHT

			Construction		Operation	
	Location	**Sensitivity**	**Magnitude**	**Visual impact**	**Magnitude**	**Visual impact**
1	Views at night	Medium district brightness	Minor reduction	Minor adverse	No perceived change	Negligible

6. Assessment of urban design and landscape character

6.1. Response to local urban design and landscape character considerations

Whilst the requirements of the local government planning documents (including the LSPS, LEP and DCP) are not applicable to this approval, the requirements of these planning instruments have been used as a guide to ensure locally appropriate urban design outcomes are achieved.

Table 6-1 provides a summary of how the Proposal has responded to the landscape and urban design considerations identified in section 3 (Planning contest) of this report.

TABLE 6-1 RESPONSES TO URBAN DESIGN AND LANDSCAPE CHARACTER CONSIDERATIONS

Consideration	Response
Ryde Local Strategic Planning Statement 2020	
Part 3: Liveability – Design Excellence & Place-making	
All development activity in the City of Ryde will showcase design excellence, contributing positively to the natural, cultural, visual and architectural character of the City (s.3.5.1).	The Proposal would not detract from the character of the station and enhance the streetscape environment through improvements to the station entrance and platforms. This would include a more spacious station entry with new lifts, new paving, balustrades, furniture, signage and lighting. The original the art deco style awning and fascia design of the station concourse building would be reinstated, improving the visual and architectural character of the station entrance.
Part 5: Sustainability – Environment	
To increase '*urban tree canopy cover*' through actions such as implementing the City of Ryde Street Tree Master Plan (City of Ryde, 2013) (s.5.2.5, Table 31, Action E2.1).	The Proposal would not require the removal of any trees. This includes the existing trees and gardens on the platforms which would remain. The Proposal includes the provision of two new trees that would be located at the commuter car park, contributing to an increase in the tree canopy in this location.

TABLE 6-2 RESPONSES TO URBAN DESIGN AND LANDSCAPE CHARACTER CONSIDERATIONS (CONTINUED)

Consideration	Response
Ryde Local Environmental Plan 2014	
Part 4, clause 4.3: Height of buildings	
The height of buildings clause 4.3(1) has the following objectives:	
To ensure that street frontages of development are in proportion with and in keeping with the character of nearby development.	The new lift structures would be lower in height and scaled in proportion with the existing station concourse building. Similarly, the new platform canopies would be of a similar scale and lighter visually than the existing station platform buildings. While the new lifts would have a contemporary character, they would have a brick base, reflecting the character of the station buildings and surrounding residential dwellings. The upper portion of the lift would also incorporate glazing, which would create visually light structures, that would not visually dominate the heritage station buildings.
To minimise overshadowing and to ensure that development is generally compatible with or improves the appearance of the area.	The Proposal would be contained within the station, which is also within a cutting, and set back from the surrounding residences and associated car park site. Due to this location, and the proposed lifts being in scale with the existing station buildings, there would not be any overshadowing of surrounding private dwellings. The original the art deco style awning and fascia of the station concourse building would be reinstated, restoring the historic character of the station, and improving the appearance from the station.
To minimise the impact of development on the amenity of surrounding properties.	During construction the Proposal would upgrade, rather than replace, the existing stairs, platforms, station concourse and platform buildings, and commuter car park, reducing the extent and scale of construction activity at and surrounding the station. During operation, the Proposal would not reduce the visual amenity of the surrounding properties due to the compatible scale and character of the built form.
To emphasise road frontages along road corridors.	The Proposal would improve the presence of the station on Gordon Crescent, improving the legibility of the station entry. This improved entry would include a slightly widened entrance and public realm improvements along this road corridor.

6.2. Urban design and landscape character impacts

The following contains a summary of the potential urban design and landscape character impacts of this Proposal.

Urban design and landscape character impacts during construction

During construction, there would be three main compound areas, some of which would be used as temporary laydown areas. One would be located in the rail corridor at the western end of the station platforms (typically only during possession periods), and another located beside the rail corridor, in Symons Reserve. The third would be located in a portion of an existing car park, near the corner of West Parade and Anthony Street. Construction in these areas would reduce public access to these areas during construction. There would be no vegetation removal, and local pedestrian routes in the local area, would be maintained.

The existing commuter car park to the north of the station in Gordon Crescent may also be temporarily closed during upgrade works (or have reduced customer parking spaces), temporarily further reducing the area of car parking available in close proximity to the station. There may, however, be some trimming of trees which overhang the construction site and compounds, which would be undertaken in accordance with Australian Standards if required.

Temporary pedestrian access arrangements and footpath diversions may potentially reduce the legibility and accessibility of the station. There would also be reduced amenity and comfort for pedestrians approaching the station from the north and south, particularly during the civil works and installation of the lifts, due to the use of large-scale machinery.

Overall, there would be a temporary, minor reduction in the landscape and urban design functionality of the station precinct during construction. This precinct is of local sensitivity and there would be a **minor adverse landscape impact**.

Urban design and landscape character impacts during operation

During operation, there would be substantial improvements to accessibility of the station precinct with the introduction of lifts at the station, upgrades to the footpaths and station entrances, upgrade of the commuter car park including provision of an accessible car parking space, kiss and ride bay and bus stop, and improvements to the platform surface and facilities within the platform buildings.

The Proposal would improve legibility within the station precinct through the increased visual prominence of the station entry on Gordon Crescent. The station entry would include a widened entrance and there would be public realm enhancements with new paving, furniture and signage, improving the appearance and accessibility of the station. The existing mature trees around the station would be maintained, including the trees within Symons Reserve, which frame views to the station.

There would be a new covered waiting area along each platform, providing sun and rain protection for customers at the station. The ornamental gardens along the platforms would also be retained, maintaining the level of shade and leafy character of the station.

The landscape character of the locality would be maintained with the Proposal not detracting from the prevailing low-rise heritage built form character and leafy setting of the locality.

Overall, there would be a noticeable improvement to the urban design functionality and landscape character of the station precinct. The station is of local sensitivity, and this would result in a **minor beneficial landscape impact** during operation.

7. Mitigation of impacts

The following mitigation measures would be implemented to further reduce and manage the visual and landscape character impacts of the Proposal:

- An Urban and Landscape Design Plan (ULDP) would be prepared by the Contractor, in consultation with City of Ryde Council and submitted to Transport for NSW for endorsement by the Precincts and Urban Design team, prior to finalisation of the detailed design. The UDP, at a minimum, would address the following:
    - the appropriateness of the proposed design with respect to the existing surrounding landscape, built form, behaviours and use-patterns (including consideration of Crime Prevention Through Environmental Design principles). This is to include but not be limited to:
        - site analysis
        - vision and objectives for the infrastructure
        - strategies that apply to ISC approved guidelines in accordance with Urb-1 (IS Rating Tool V 1.2)
    - connectivity with surrounding local and regional movement networks including street networks, other transport modes and active transport networks. Existing and proposed paths of travel for pedestrians and bicycles should be shown
    - integration with surrounding local and regional open space and or landscape networks. Existing and proposed open space infrastructure/landscape elements should be shown
    - integration with surrounding streetscape including street trees, entries, vehicle cross overs etc
    - integration with surrounding built form (existing or desired future) including building height, scale, bulk, massing and land-use
    - design detail that is sensitive to the amenity and character of heritage items located within or adjacent to the Proposal.
- All permanent lighting would be designed and installed in accordance with the requirements of standards relevant to *AS 1158 Road Lighting* and *AS 4282 Controlling the Obtrusive Effects of Outdoor Lighting.*
- The detailed design of the Proposal would comply with Crime Prevention Through Environmental Design principles.
- Worksite compounds would be screened with shade cloth (or similar material, where necessary) to minimise visual impacts from key viewing locations.
- Temporary hoardings, barriers, traffic management and signage would be removed when no longer required.
- During construction, graffiti would be removed in accordance with Transport for NSW's Standard Requirements.

In addition, the following mitigation measures should be considered:

- temporary access arrangements should be well signed and provide a visually legible route for pedestrians
- consolidate site equipment and facilities to maximise the area of useable public realm and maintain pedestrian access across the road bridge where possible.

8. References

Artefact Heritage, 2021, *Statement of Heritage Impacts.*

Australian Institute of Landscape Architects, 2018, *Guidance note for Landscape and Visual Assessment.*

City of Ryde Council, 2014a, *City of Ryde Development Control Plan 2014*, URL: https://www.ryde.nsw.gov.au/Business-and-Development/Planning-Controls/Development-Control-Plan (accessed 05/05/2021).

City of Ryde Council, 2014b, *Ryde Local Environmental Plan 2014*, URL: https://www.legislation.nsw.gov.au/view/html/inforce/current/epi-2014-0608 (accessed 05/05/2021).

City of Ryde Council, 2019, *Darvall Estate Heritage Conservation Area Heritage Data Form*, URL: https://www.ryde.nsw.gov.au/files/assets/haveyoursay/documents/environment-and-planning/hys-planning-proposals/heritage-planning-proposal/planning-proposal/4.0-appendix-a-extract-hca-darvell-estate.pdf?streamfile=true (accessed 05/05/2021).

City of Ryde Council, 2020, *Planning Ryde: Local Strategic Planning Statement 2020*, URL: https://www.ryde.nsw.gov.au/haveyoursay/Past-Have-Your-Say/Draft-Local-Strategic-Planning-Statement (accessed 05/05/2021).

NSW Government, Greater Sydney Commission, 2018a, *Greater Sydney Regional Plan: A Metropolis of Three Cities,* URL: https://www.greater.sydney/metropolis-of-three-cities (accessed 11/10/2021).

NSW Government, Greater Sydney Commission, 2018b, *Our Greater Sydney 2056 North District Plan – connecting communities,* URL: https://www.greater.sydney/north-district-plan (accessed 11/10/2021).

NSW Government, State Government Architect NSW, 2018, *Better Placed: An integrated design policy for the built environment of NSW.*

NSW Government, State Government Architect NSW, 2018*, Better Placed: Draft Good Urban Design Strategies for realising Better Placed objectives in the design of the built environment.*

NSW Government, State Government Architect NSW, 2018, *Better Methods: Evaluating Good Design, Implementing Better Placed design objectives into projects.*

NSW Government, Office of Environment and Heritage (NSW OEH), 2013, *Darvall Park*, URL: https://apps.environment.nsw.gov.au/dpcheritageapp/ViewHeritageItemDetails.aspx?ID=2340177 (accessed 05/05/2021).

Transport for NSW, 2020, *Guidance note EIA-N04 Guidelines for Landscape Character and Visual Impact Assessment.*

Tree Survey, 2021, *Arboricultural Impact Assessment and Tree Protection Plan*.