

Traffic Engineer Referral Response

Application Number:	DA2021/1341
Date:	10/03/2022
Responsible Officer	
Land to be developed (Address):	Lot 17 DP 6040 , 3 Brookvale Avenue BROOKVALE NSW 2100

Officer comments

Revised referral comments 10/3/21

The amended plans have incorporated a widening of the driveway at the the property boundary. The widening is of sufficient width to allow for a B99 vehicle to pass a B85 vehicle and will adequately serve the intended function as a passing bay.

The swept path plots provided with the amended traffic report have satisfactorily demonstrated that access to and from the carpark and parking spaces within it can be achieved

the development is now supportable from a traffic perspective

Original comments 3/9/21

The development proposes the demolition of the existing dwelling on the site and construction of a 4 x 3 bedroom residential unit development with 9 offstreet spaces accessed via a single car width driveway.

Parking:

The offstreet parking supply of 9 spaces is excess of the DCP requirement of 7 spaces (6 residential spaces and a visitor space). The development therefore satisfies the DCP requirement. All spaces are sized in accordance with the minimum dimensions outlined in AS2890.1

Traffic Generation:

The traffic generation from the site has been estimated from the RMS Guide to Traffic Generating Development using rates for medium density development and for larger units. This is appropriate. Using these rates it is estimated that the development will generate up to 26 daily vehicle trips and around 3 trips in the peak hours. Given that the existing dwelling on the site would also generate up to 9 daily trips and 1 peak hour trip the increase in traffic generated from the site will be insignificant.

Vehicular Access:

The development proposed access via a driveway of 3.8m in width. This width is insufficient to cater for passing of two vehicles. The driveway is around 32m in length between the kerb alignment and the entry point to the basement carpark. AS2890.1 section 3.2.2 suggests that where the driveway is more than 30m in length or sight distance from one end to the other is restricted that it be widened to 5.5m for at least the first 6m inside the property boundary. As the driveway gradient over most of its length is on a steep 1 in 4 gradient and as the vehicle crossing is located on a bend with poor sight lines it is considered that the widening to 5.5m is appropriate in this instance.

It is noted that the applicants traffic report suggests that the lack of any provision for passing can be overcome by the use of a convex mirror and waiting bay within the basement carpark however this is considered an inadequate solution as the waiting bay is sited where it:

- a) blocks access to/from 3 basement car spaces
- b) would be difficult to access and
- c) requires a very tight manoeuvre from an entering vehicle to pass a vehicle stopped in the waiting bay.

It is also noted that the intersection between the ramp and the carpark circulation aisle has been designed to cater for access by the B85 vehicle. AS2890.1 section 2.5.2 c) requires that these type of locations should be designed for access by a B99 vehicle. Given that access for a B85 vehicle past a waiting vehicle is tight it is anticipated that safe access for a B99 vehicle would not be possible.

Given the above concerns, the current arrangements for vehicular access are considered unsatisfactory and require review and resubmission of amended plans

Pedestrian sight line triangle:

It is noted that the point where the driveway meets the property boundary does not make provision for a compliant pedestrian sight line triangle as per AS2890.1 section 3.2.4(b). This issue would be addressed if the driveway were widened to 5.5m at the boundary as noted above.

The proposal is therefore supported.

Note: Should you have any concerns with the referral comments above, please discuss these with the Responsible Officer.

Recommended Traffic Engineer Conditions:

DEVELOPMENT CONSENT OPERATIONAL CONDITIONS

Parking Enclosure

No parking spaces, or access thereto, shall be constrained or enclosed by any form of structure such as fencing, cages, walls, storage space, or the like, without prior consent from Council.

Reason: To ensure accessibility is maintained.

CONDITIONS TO BE SATISFIED PRIOR TO THE ISSUE OF THE CONSTRUCTION CERTIFICATE

Construction Traffic Management Plan

As a result of the site constraints, limited vehicle access and parking, a Construction Traffic Management Plan (CTMP) and report shall be prepared by an RMS accredited person and submitted to and approved by the Northern Beaches Council Traffic Team prior to issue of any Construction Certificate.

The CTMP must address following:

- The proposed phases of construction works on the site, and the expected duration of each construction phase
- The proposed order in which works on the site will be undertaken, and the method statements on how various stages of construction will be undertaken
- Make provision for all construction materials to be stored on site, at all times
- The proposed areas within the site to be used for the storage of excavated materials, construction materials and waste containers during the construction period
- The proposed method of access to and egress from the site for construction vehicles, including access routes and truck routes through the Council area and the location and type of temporary vehicular crossing for the purpose of minimising traffic congestion and noise in the area, with no access across public parks or reserves being allowed
- The proposed method of loading and unloading excavation and construction machinery, excavation and building materials, formwork and the erection of any part of the structure within the site. Wherever possible mobile cranes should be located wholly within the site
- Make provision for parking onsite. All Staff and Contractors are to use the basement parking once available
- Temporary truck standing/ queuing locations in a public roadway/ domain in the vicinity of the site are not permitted unless approved by Council prior
- Include a Traffic Control Plan prepared by a person with suitable RMS accreditation for any activities involving the management of vehicle and pedestrian traffic
- The proposed manner in which adjoining property owners will be kept advised of the timeframes for completion of each phase of development/construction process. It must also specify that a minimum Fourteen (14) days notification must be provided to adjoining property owners prior to the implementation of any temporary traffic control measure
- Include a site plan showing the location of any site sheds, location of requested Work Zones, anticipated use of cranes and concrete pumps, structures proposed on the footpath areas (hoardings, scaffolding or shoring) and any tree protection zones around Council street trees
- Take into consideration the combined construction activities of other development in the surrounding area. To this end, the consultant preparing the CTMP must engage and consult with developers undertaking major development works within a 250m radius of the subject site to ensure that appropriate measures are in place to prevent the combined impact of construction activities, such as (but not limited to) concrete pours, crane lifts and dump truck routes. These communications must be documented and submitted to Council prior to work commencing on site
- The proposed method/device to remove loose material from all vehicles and/or machinery before entering the road reserve, any run-off from the washing down of vehicles shall be directed to the sediment control system within the site
- Specify that the roadway (including footpath) must be kept in a serviceable condition for the duration of construction. At the direction of Council, undertake remedial treatments such as patching at no cost to Council
- The proposed method of support to any excavation adjacent to adjoining properties, or the road reserve. The proposed method of support is to be designed and certified by an appropriately qualified and practising Structural Engineer, or equivalent
- Proposed protection for Council and adjoining properties
- The location and operation of any on site crane

The CTMP shall be prepared in accordance with relevant sections of Australian Standard 1742 – “Manual of Uniform Traffic Control Devices”, RMS’ Manual – “Traffic Control at Work Sites”.

All fees and charges associated with the review of this plan is to be in accordance with Council’s Schedule of Fees and Charges and are to be paid at the time that the Construction Traffic Management Plan is submitted.

Reason: To ensure public safety and minimise any impacts to the adjoining pedestrian and vehicular traffic systems.

Removal of Redundant Driveways

All redundant driveways shall be removed and reinstated to Council standard kerb and gutter. Suitably prepared plans shall be submitted to for an approval under and approved by Council prior to the issue of the Construction Certificate. All costs associated with the works shall be borne by the applicant.

A plan checking fee (amount to be advised) and lodgement of a performance bond may be required from the applicant prior to the release of the approval.

Reason: To maximise on street car parking by removing driveways that are no longer needed in accordance with Council policy.

Pedestrian sight distance at property boundary

A pedestrian sight triangle of 2.0 metres by 2.5m metres, in accordance with AS2890.1:2004 is to be provided at the vehicular access to the property and where internal circulation roadways intersect with footpaths or other pedestrian access areas. Details demonstrating compliance are to be submitted to the Certifying Authority prior to the issue of the Construction Certificate.

Reason: To maintain pedestrian safety.

CONDITIONS THAT MUST BE ADDRESSED PRIOR TO ANY COMMENCEMENT

Work Zones and Permits

Prior to commencement of the associated works, the applicant shall obtain a Work Zone Permit where it is proposed to reserve an area of road pavement for the parking of vehicles associated with a construction site.

A separate application is required with a Traffic Management Plan for standing of construction vehicles in a trafficable lane

Reason: To ensure Work zones are monitored and installed correctly.

Demolition Traffic Management Plan

As a result of the site constraints, limited vehicle access and parking, a Demolition Traffic Management Plan (DTMP) shall be prepared by an suitably accredited person and submitted to and approved by the Northern Beaches Council Traffic Team prior to commencing any demolition work.

The DTMP must:-

- Make provision for all construction materials to be stored on site, at all times.
- The DTMP is to be adhered to at all times during the project.
- Specify construction truck routes and truck rates. Nominated truck routes are to be distributed over the surrounding road network where possible.
- Provide for the movement of trucks to and from the site, and deliveries to the site. Temporary truck standing/ queuing locations in a public roadway/ domain in the vicinity of the site is not permitted unless prior approval is granted by Council's Traffic Engineers.
- Include a Traffic Control Plan prepared by an RMS accredited traffic controller for any activities involving the management of vehicle and pedestrian traffic.
- Specify that a minimum fourteen (14) days notification must be provided to adjoining property owners prior to the implementation of any temporary traffic control measures.

- Include a site plan showing the location of any site sheds, location of requested Work Zones, anticipated use of cranes, structures proposed on the footpath areas (hoardings, scaffolding or temporary shoring) and extent of tree protection zones around Council street trees.
- Take into consideration the combined construction activities of other development in the surrounding area. To this end, the consultant preparing the DTMP must engage and consult with developers undertaking major development works within a 250m radius of the subject site to ensure that appropriate measures are in place to prevent the combined impact of construction activities. These communications must be documented and submitted to Council prior to work commencing on site.
- Specify spoil management process and facilities to be used on site.
- Specify that the roadway (including footpath) must be kept in a serviceable condition for the duration of demolition. At the direction of Council, the applicant is to undertake remedial treatments such as patching at no cost to Council.

The DTMP shall be prepared in accordance with relevant sections of Australian Standard 1742 – “Manual of Uniform Traffic Control Devices”, RMS’ Manual – “Traffic Control at Work Sites”.

All fees and charges associated with the review of this plan is to be in accordance with Council’s Schedule of Fees and Charges and are to be paid at the time that the Demolition Traffic Management Plan is submitted.

Reason: This condition is to ensure public safety and minimise any impacts to the adjoining pedestrian and vehicular traffic systems. The DTMP is intended to minimise impact of construction activities on the surrounding community, in terms of vehicle traffic (including traffic flow and parking) and pedestrian amenity adjacent to the site.

CONDITIONS TO BE COMPLIED WITH DURING DEMOLITION AND BUILDING WORK

Implementation of Demolition Traffic Management Plan

All works and demolition activities are to be undertaken in accordance with the approved Demolition Traffic Management Plan (DTMP). All controls in the DTMP must be maintained at all times and all traffic management control must be undertaken by personnel having appropriate RMS accreditation. Should the implementation or effectiveness of the DTMP be impacted by surrounding major development not encompassed in the approved DTMP, the DTMP measures and controls are to be revised accordingly and submitted to Council for approval. A copy of the approved DTMP is to be kept onsite at all times and made available to the accredited certifier or Council on request.

Reason: To ensure compliance and Council’s ability to modify the approved Construction Traffic Management Plan where it is deemed unsuitable during the course of the project.

Implementation of Construction Traffic Management Plan

All works and construction activities are to be undertaken in accordance with the approved Construction Traffic Management Plan (CTMP). All controls in the CTMP must be maintained at all times and all traffic management control must be undertaken by personnel having appropriate RMS accreditation. Should the implementation or effectiveness of the CTMP be impacted by surrounding major development not encompassed in the approved CTMP, the CTMP measures and controls are to be revised accordingly and submitted to Council for approval. A copy of the approved CTMP is to be kept onsite at all times and made available to Council on request.

Reason: To ensure compliance of the developer/builder in adhering to the Construction Traffic Management procedures agreed and are held liable to the conditions of consent.

Ongoing Management

The applicant shall be responsible in ensuring that the road reserve remains in a serviceable state during the course of the demolition and building works.

Reason: To ensure public safety.

**CONDITIONS WHICH MUST BE COMPLIED WITH PRIOR TO THE ISSUE OF THE
OCCUPATION CERTIFICATE****Convex Mirror and signage at Ramps**

One (1) convex mirror is to be installed and maintained at the base of the ramp leading to the basement parking level to provide intervisibility between entering and exit vehicles. A sign shall also be installed at the base of the ramp advising exiting drivers to "Give Way to Entering Traffic". Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of any Occupation Certificate.

Reason: To minimise vehicular conflicts at ramps.

ON-GOING CONDITIONS THAT MUST BE COMPLIED WITH AT ALL TIMES**Sight lines within carparks**

The required sight lines to pedestrians and other vehicles in and around the carpark and entrance(s) are not to be obstructed by landscaping or signage.

Reason: To maintain unobstructed sight distance for motorists.