



TMAP Study

**Concept Plan Application and staged Project
Application for the Nepean Hospital Precinct Parker
Street and Great Western Hwy, Kingswood**

Addendum Report

traffix
traffic & transport planners

po box 1061
potts point nsw 1335
t: +61 2 8324 8700
f: +61 2 9380 4481
w: www.traffix.com.au
abn: 66065132961



Reference: 09 234 Addendum Report_v1

traffix
traffic & transport planners

po box 1061
potts point nsw 1335
t: +61 2 8324 8700
f: +61 2 9380 4481
w: www.traffix.com.au
abn: 66065132961



Document Verification

Job Number:	09 234			
Project:	Nepean Hospital Kingswood Concept Plan and Stage 1 Project Applications			
Client:	Aesthete No. 3 Pty. Limited			
Revision		Initials	Date	Signature
Addendum Report V01	Prepared by:	GP/TL	30 April 2011	
	Checked by:			
	Approved by:	GP	03 May 2011	

traffix
traffic & transport planners

po box 1061
potts point nsw 1335
t: +61 2 8324 8700
f: +61 2 9380 4481
w: www.traffix.com.au
abn: 66065132961



Contents

1. Introduction	1
2. Preferred Concept Plan Application	3
3. Response to Issues	4
4. Conclusions	9



1. Introduction

Traffix was previously commissioned by Aesthete No. 3 Pty. Limited to undertake a Transport Management Accessibility Plan (TMAP) assessment in support of a Concept Plan and Staged Project Plan Application for a site bounded by Barber Avenue, Parker Street and the Great Western Highway (part of the Nepean Hospital Precinct).

A Concept Plan Application was subsequently submitted to the NSW Department of Planning (DoP) which was notified and was the subject of a number of responses from relevant Government authorities, including the RTA, NSW Transport/Centre for Transport Planning and Product Development and Penrith City Council.

In this regard, the proposal has been amended (reduced in size) to respond to concerns as raised; which has resulted in a fundamental reduction in the level of traffic activity associated with the site. This report documents the findings of our further investigations in relation to the amended plans which respond to concerns raised generally, but particularly those of Council and the Roads and Traffic Authority.

The development intensity has been substantially informed by the limited capacity of the road system to accommodate future traffic volumes, so that every effort has been taken to moderate car travel. This includes the elimination of the supermarket, with the predominant use being residential units, together with ancilliary commercial and retail uses that are of a local nature and will involve extensive walking trips, including trips associated with the residents and employees who reside within the Nepean Hospital Precinct generally. The retail uses will also benefit from moderated trip rates due to the presence of multi-purpose and linked trips.

Furthermore, it is emphasised that further Project/Development Applications will subsequently be submitted which will provide more accurate details of impacts associated with individual development applications. That is, the level of investigations undertaken in this report is consistent with what would be expected based on a master plan/concept plan.



The report is structured as follows:

- Section 2: Describes the changes to the concept plan application
- Section 3: Discusses the responses to issues raised
- Section 4: Presents the conclusions.



2. Preferred Concept Plan Application

A comparison of the Original Concept Plan and Preferred Concept Plan is provided in Table 1 of the Preferred Project Report (MP09_0197) prepared by Cityscape Planning + Projects dated April 2011. The main changes that impact on traffic and transport planning matters are as follows:

- A 15.5% reduction of overall GFA from 42,293m² to 35,750m².
- The elimination of the 1,531m² GFA supermarket.
- A 43% reduction in ancilliary retail area of 2,519m² (from 5,828m² to 3,309m²).
- A reduction of 4 serviced apartments (from 80 to 76).
- A 25% reduction in residential area of 2,605m² (from 10,154m² - 106 units to 7,544m² – an assumed 80 units based on a proportional reduction in yield); and
- A 4% increase in commercial area of 873m² (from 20,189m² to 21,062m²).

The traffic and transport implications associated with the now proposed development are discussed in more detail in Section 3. Reference should also be made to the amended plans provided separately.



3. Response to Issues

Several issues have been raised by the Department of Planning in its letter dated 9th March 2011. The following is a response to the relevant traffic and transport planning matters raised.

3.1.1 Construction Traffic Impacts

It is anticipated that detailed Construction Traffic Management Plans will be prepared as part of individual Project/Development applications, taking due account of proposed development stages, and in response to a condition of consent. As a general principle, the Plan will need to be prepared in consultation with the appointed builder. It will need to address requirements during each stage (site preparation, excavation, construction, fit-out and landscaping) and will need to include consideration of times of operation, truck access routes, site access, average truck frequencies, truck sizes, parking for construction workers, work zone requirements, pedestrian control, traffic management plans and any road occupancy applications. These are matters that cannot be addressed at this time although in principle, there are considered to be no obvious constraints to the preparation of a safe and efficient Management Plan, with all access focussed on the use of Barber Avenue.

3.1.2 Travel Demand Initiatives (RTA)

The RTA has queried the extent of parking 'suppression' for the development, which was an approach that was adopted as a general policy position aimed specifically at encouraging alternate travel modes, involving a 22.5% reduction in parking overall. In response, the amended development (refer to Table 2 of the Preferred Project Report) provides an increased parking rate, with 761 spaces now proposed in total, for a demand of 800 spaces based on the application of Council's DCP. This is only a 5% reduction and this recognises the relative level of car-dependency associated with the site, while also making some allowance for the ability of the non-residential parking to be shared.

The elimination of the supermarket overcomes the RTA's concerns in relation to the low level of parking proposed for the supermarket.

Finally, the reduced intensity of development as now proposed will also contribute towards reduced travel demand generally. The Original Concept Plan application was predicted to generate 450 veh/hr



during the critical PM peak period. The Preferred Concept plan is expected to result in a substantial reduction of 35% in trips during the critical PM peak (to 290 veh/hr) as shown in Table 1 below, based on the same trip rates as applied in the original TMAP study.

table 1: comparison of PM peak traffic generation for concept plan

Use	GFA (m ²) or Units	Original		Preferred	
		Weekday PM Peak		Weekday PM Peak	
		IN	OUT	IN	OUT
General Retail	3,309 (GFA)	56	56	40	40
Supermarket	Nil	61	61	0	0
Commercial	21,062	48	112	50	116
Residential	80 units	26	6	19	5
Serviced Apartments	76 units	20	4	19	4
TOTAL		211	239	125	165
		450		290	

These reduced trips are substantial and are due principally to the removal of the supermarket. The resultant impacts on critical intersections will similarly be beneficial and result in acceptable performance. As with the original Concept Plan application, the intersection of Parker Street with the Great Western Highway will operate with increased delays, but not to the same extent as previously modelled.



3.1.3 Pedestrian and Bicycle Linkages (RTA)

A pedestrian fence is to be installed along the Parker Street site frontage as requested by the RTA and this can be conditioned. This will ensure that pedestrians cross at controlled locations, maximising safety.

The issue raised by the RTA concerning the need to integrate with the Penrith Bicycle Plan is noted. In this regard, the status of future bicycle linkages remains uncertain although it is expected that any future off-road facility would occur on the northern side of the GWH in this locality, within vacant lands between the Highway and the western rail corridor. The subject site would provide access to any such facility via the signal-controlled pedestrian crossing of the GWH at Parker Street. In addition, there are internal bicycle/pedestrian connections within the site, together with end-user facilities for cyclists including shower/change room facilities and bicycle storage facilities

Council's Urban Design Panel has evidently raised the issue of bicycle connectivity to the Hospital lands to the south of the subject site. In this regard, connections are already available via the grade-separated (elevated) walkway across Barber Avenue; while crossings are also available at-grade generally along Barber Avenue, which is a low-order local access road. In this regard, the 'warrant' for a midblock marked footcrossing is not expected to be met, there being no strong desire-line across the road. Nevertheless, a pedestrian refuge island within Barber Avenue at Parker Street is considered justified, which would assist both pedestrians and cyclists and this is recommended for adoption. This is a minor matter that can be conditioned and would require the approval of Council's Traffic Committee.

3.1.4 Servicing (RTA)

The RTA's concerns relate to the movement of trucks associated with the supermarket. As this has been deleted from the proposal, these concerns have been resolved. The amended proposal will generate only moderate servicing demands that can be accommodated within the dock provided. This will include access by vans, small trucks and a standard service truck as defined in AS 2890.2 (an 8.8m MRV).

The possibility of occasional servicing from within the set-down/pick-up area is recognised. However, this is a management issue and can be addressed through the preparation of a Loading Dock



Management Plan as a condition of consent. It is also recommended that the set-down area be signposted as “No Standing” so that vehicles are not left unattended at any time.

3.1.5 State Plan 2010 Objectives (NSW Transport)

This Plan post-dates the Concept Plan documentation. Nevertheless, the key objectives of the Plan are met by the Preferred Concept Plan, through the moderated parking supply and the elimination of the supermarket, which it is acknowledged had some (albeit limited) potential to attract patronage from beyond the local neighbourhood. The proposed land uses are also complementary to the existing Hospital uses, with which they have a synergy. That is, many residents will have an affinity with the Hospital (and can walk to work); while residents and Hospital staff will use the retail areas that are provided and will also walk. Finally, many of the commercial areas will be hospital-related, which will overcome the need for Hospital patients to travel to remote locations for many services. These factors, when combined, will ‘contain’ travel demand to a very significant extent, which is an important objective of the Plan.

3.1.6 Parking Provision (NSW Transport)

As discussed above, the development now proposes 761 spaces for a ‘nominal’ demand of 800 spaces (i.e. one derived through the cumulative addition of individual land use components).

The retail/commercial/serviced apartment (i.e. non residential) demand for 705 spaces under the DCP is met by the provision of 666 spaces. This is a reduction of 6% overall which is appropriate having regard for the mixed use nature of the development. The specific allocation of these 666 spaces to individual uses should remain flexible in order to allow the development to respond to changing conditions over time. Accordingly, this is best dealt with in the context of the Transport Access Guide, which can similarly be updated over time.

The requirement for 95 spaces for the residential use is fully met, comprising 78 resident spaces and 17 visitor spaces. It is proposed that these will be within a secure area to ensure availability. However, extensive additional visitor parking will be available outside peak times of retail demand. This will ensure that on-street visitor parking does not occur, which in any event would be less convenient.



3.1.7 Excessive Reliance on Travel demand Strategies (Penrith Council)

The extent of reduction sought to Council's Parking Policy (DCP) is substantially reduced, from 22.5% to only 5%. Accordingly, the reliance on travel demand strategies (to make up the difference) is now a relatively modest task. Notwithstanding, promotion of alternate travel modes remains a worthwhile objective for all trip types. Accordingly, the preparation of a Transport Access Guide remains a valid policy initiative and can be prepared in response to a suitable condition of consent.

3.1.8 Options for Vehicle Access through the Hospital (Penrith Council)

While the benefits associated with an alternative link to Somerset Street are desirable and would improve traffic distributions, the reduced traffic generation (35% in the critical PM peak) results in an outcome that is supportable. Nevertheless, such an alternative has been pursued over many years and cannot be delivered having regard for site constraints. It is also noteworthy that as a matter of design principle, it may be a superior outcome to maintain traffic to the perimeter of the Hospital precinct (as proposed) to enable improved internal pedestrian connectivity and amenity. This would be compromised by a through-site vehicular link.

3.1.9 Barber Avenue Taxi Rank

No rank is proposed in Barber Avenue. All taxi activities will occur within the set-down/pick-up area.

3.1.10 Capacity of GWH/Parker Street Intersection

The reduced traffic generation as discussed above reduces the imperative to implement the improvements discussed in the TMAP study. The required improvements at the intersection are in response to strategic road planning requirements (background traffic growth generally) and do not arise solely from this application.



4. Conclusions

The Preferred Concept Plan and Project Application are considered supportable and respond appropriately to all matters raised during the notification process. The traffic generating intensity is substantially reduced, while parking supply is proportionately increased, reducing pressure on alternate travel modes.

There are several matters that have been raised that are appropriately addressed through relevant conditions of consent.

It is therefore concluded that the proposed development concept envisaged under the amended Concept Plan is supportable on traffic planning grounds and the proposed development will operate satisfactorily.