as Trustee for C & B Unit Trust ABN 27 623 918 759

Our Ref: TR/11186/jj

19 September, 2019

Transport Planning
Traffic Studies
Parking Studies

Fabcot Pty Ltd c/- Woolworths Limited PO Box 8000 BAULKHAM HILLS NSW 2153

Attention: Angus White

Email: <u>awhite I @woolworths.com</u>;

Dear Sir,

RE: NORTH PARRAMMATA PLANNING PROPOSAL TRAFFIC REVIEW

- I. As requested, we have undertaken a review of the traffic effects of the planning proposal to permit development of a supermarket and associated retail/bulky goods within the existing building on the site located on the north eastern corner of Windsor Road and North Rocks Road, North Parramatta. The site location is shown on Figure 1.
- 2. Our review is set out through the following sections:
 - site location;
 - existing traffic conditions;
 - proposed development;
 - public transport;
 - parking;
 - access and internal circulation;
 - traffic effects; and
 - summary

Site Location

3. The site is located on the north eastern corner of Windsor Road and North Rocks Road, North Parramatta and is occupied by a large vacant building (some

7,000m²) located on the northern part of the site. The building was previously occupied by Bunnings. Some 300 parking spaces are provided at-grade with the majority located on the southern part of the site and the balance adjacent to the building. Primary access is provided via a traffic signal controlled access on North Rocks Road (all movements permitted), with a secondary access to Windsor Road (left in/left out). The site is located in area that provides a mix of retail, bulky goods and employments uses. James Ruse Drive is located on the northern boundary of the site, with residential development to the north.

Existing Traffic Conditions

- 4. The site is bounded by North Rocks Road to the southeast, Windsor Road to the south west and James Ruse Drive to the north. North Rocks Road connects Windsor Road at North Parramatta with Pennant Hills Road at Carlingford. Adjacent to the site it provides one northbound lane and two southbound lanes. As noted above, access to the site from North Rock Road is traffic signal controlled.
- 5. James Ruse Drive is major arterial road connecting Parramatta Road at Granville with Old Windsor Road at Westmead. It provides two to three lanes of traffic in each direction within a dual carriageway. The intersection with Windsor Road is grade separated, with James Ruse Drive passing underneath Windsor Road.
- 6. Windsor Road is major arterial road connecting Windsor with Parramatta. Adjacent to the site it provides three to four lanes in each direction (including bus lanes) in dual carriageway. The intersections of Windsor Road with North Rocks Road and the James Ruse Drive on/off ramps are traffic signal controlled. Between these two intersections, access to The Junction Centre is provided via a traffic signal controlled intersection. Thus there are three traffic signal controlled intersections located in close proximity (some 300 metres).
- 7. Surveys of traffic flows through the intersections along Windsor Road (between James Ruse Drive and North Rocks Road) were undertaken in late June 2019 during the weekday afternoon peak period. These found that traffic flows on:
 - the James Ruse Drive on/off ramps were some 800 to 1,400 vehicles per hour (one way);
 - Windsor Road were some 2,800 to 3,500 vehicles per hour (two way);
 and
 - North Rocks Road were some 1,300 vehicles per hour (two way).

- 8. Observations of traffic flows along Windsor Road in the weekday afternoon peak period noted the interchange of Windsor Road/James Ruse Drive operates at capacity, with queues extending south past North Rocks Road and extensive queuing on the westbound off ramp from James ruse Drive. This affects the operation of the intersection with North Rocks Road and Windsor Road (in particular northbound traffic on Windsor Road and traffic turning out of North Rocks Road). It was noted that the majority of traffic turning right onto Windsor Road from North Rocks Road does so from the kerb side lane (in order to turn left into Boundary Street or James Ruse Drive). This blocks the left turn onto Windsor Road.
- 9. The operation of the intersections along Windsor Road were analysed using a SIDRA network model. The SIDRA analysis confirmed the observations that Windsor Road (from James Ruse Drive to North Rocks Road) operates at capacity in the afternoon peak hour, due to extensive southbound queues on Windsor Road and the westbound off ramp from James ruse Drive.

Proposed Development

10. The planning proposal would allow for a supermarket (some 3,800m²) within the ex-Bunnings building on the site. The balance of the building (some 4,105m², including some 500m² outdoor area and 590m² office located on a mezzanine level) could be used as a potential warehouse/distribution centre). The existing parking area will be reconfigured to provide some 256 spaces. The primary access to North Rocks Road would be retained and the secondary access to Windsor Road closed.

Public Transport

- 11. The site is well located to existing public transport services with bus stops located along both the North Rocks Road and Windsor Road frontages of the site. Services that operate past the site include:
 - route 549: Parramatta to Epping via North Rocks;
 - route 600: Parramatta to Hornsby;
 - route 601: Parramatta to Rouse Hill Station via Hills Showground;
 - route 603: Parramatta to Rouse Hill Station via Glenhaven;
 - route 604: Parramatta to Dural via Castle Hill:
 - route 606: Parramatta to Winston Hills; and
 - route 706: Parramatta to Blacktown via Winston Hills

- 12. Thus the site provides opportunities for people to travel to the site by means other than car, with the proposal therefore being consistent with the following government objectives and planning principles of:
 - (a) improving accessibility to employment and services by walking, cycling, and public transport;
 - (b) improving the choice of transport and reducing dependence solely on cars for travel purposes;
 - (c) moderating growth in the demand for travel and the distances travelled, especially by car; and
 - (d) supporting the efficient and viable operation of public transport services.

Parking

- 13. As noted above the existing parking area will be reconfigured to provide some 256 spaces. Parking requirements for the site are set out in the Hills Shire DCP 2012 which suggests the following rates:
 - I space per 18.5m² for supermarkets;
 - I space per 50m² for warehouse/industrial; and
 - I space per 25m² for office.
- 14. Applying these rates, the proposed development would require 299 spaces (205 supermarket spaces, 70 warehouse spaces and 24 office spaces). However for other recent projects with good access to public transport Council has accepted RMS rates for supermarkets (4.2 spaces/100m²) and office (1 space per 40m²) development. Applying these rates the proposed development would require 245 spaces (160 supermarket spaces, 70 warehouse spaces and 15 office spaces). The provision of some 256 spaces satisfies this requirement.
- 15. Appropriate accessible, bicycle and motor cycle spaces will be provided in accordance with Council requirements.

Access and Internal Layout

16. Apart from the closure of the secondary access to Windsor road, only minor changes would be required to the existing access arrangements, service arrangements and parking layouts. The site was previously serviced by articulated trucks.

Traffic Effects

- 17. The previous Bunnings on the site was surveyed by the RMS and found to generate some 200 vehicles per hour (two way) in the weekday afternoon peak hour.
- 18. Based on surveys of similar supermarkets and RMS guidelines for warehouses and offices, the proposed development would generate some 420 vehicles per hour (two way) in the weekday afternoon peak hour. Given the sites location and heavy traffic flows on the adjacent road network, during the afternoon peak period, a high proportion of trips will be passing trade. Taking this into account, the increase in traffic on the surrounding road network compared to the previous Bunnings is likely to be some 100 vehicles per hour (two way). When distributed to the surrounding road network, increases in traffic on North Rocks Road and Windsor Road will be minor at some 20 to 50 vehicles per hour (two way).
- 19. As noted previously, the intersections along Windsor Road from James Ruse Drive to North Rocks Road operate at capacity in the weekday afternoon peak hour (with extensive southbound queues on Windsor Road and the westbound off ramp from James Ruse Drive). Options were considered to improve the operation of the Windsor Road/James Ruse Drive interchange. The most practical was to provide a third lane on the westbound off ramp (similar to the configuration of the eastbound off ramp, two right turn lanes and a separate left turn lane). Provision of this additional left turn lane results in reduced delays/queues on the westbound off ramp as well as the ability to reallocate green time to the through movements on Windsor Road. Increased green time for the through movements on Windsor Road reduces queuing on the southern approach. This in turn allows for additional traffic to turn onto Windsor Road from North Rocks Road.
- 20. With the provision of the third lane on the westbound off ramp from James Ruse Drive and reallocation of green time, the SIDRA network model was rerun with development traffic in place. The analysis found that queues on the surrounding road network would reduce, which would improve traffic conditions.

Summary

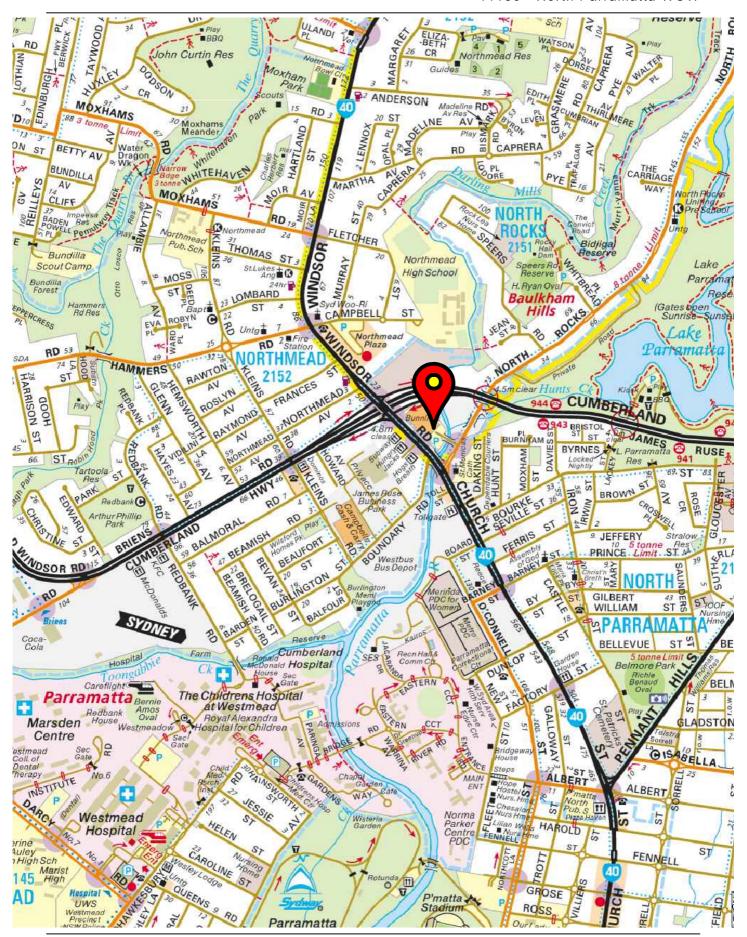
- 21. In summary our traffic review has found the following:
 - the site was previously occupied by a Bunnings;

- the adjacent road network operates at capacity in the weekday afternoon peak hour;
- the planning proposal would allow for a supermarket within the ex-Bunnings building;
- the site is accessible by public transport;
- the proposed parking provision of some 256 spaces is appropriate for the proposed development;
- only minor changes are proposed to the existing access, internal layout and service arrangements;
- with provision of an additional lane on the westbound off ramp from James Ruse Drive, queues on the surrounding road network would reduce, which would improve traffic conditions.
- 22. We trust the above provides the information you require. Finally, if you should have any queries, please do not hesitate to contact us.

Yours faithfully,

COLSTON BUDD ROGERS & KAFES PTY LTD

T. Rogers
Director



Click: https://goo.gl/maps/kcTgLgL4prGrST1S6

Location Plan