

23 October 2024

Brett Crowther
C/O - Mackenzie Architects International (**MAI**)
Attn: Maria Musar

By email

Dear Maria,

RE: VEHICLE GROUND CLEARANCE ASESMENT: 1 – 3 GONDOLA RD, NORTH NARRABEEN, NSW

1 OVERVIEW

Martens and Associates (**MA**) have prepared this letter to present the results of a ground clearance assessment in response to the traffic engineer referral response (comment no.14) by Northern Beaches Council (**NBC**) (DA2024/0460, dated 09/08/2024).

2 PROPOSED DEVELOPMENT

MA understands from provided architectural plans that the development will include construction of a new three storey mixed-use building. The development has a ground floor with a finished floor level of 4.4 mAHD and one level of basement carpark with a finished floor level of 1.4 mAHD.

3 GROUND CLEARANCE ASSESSMENT

The ground clearance assessment was undertaken in accordance with AS 2890.1-2004 using a B99 vehicle based on architectural plans (**MAI** 2024) and survey plans (GSS 2017).

A total of six ground clearance checks were carried out and no bottom scraping was found for B99 vehicle.

- Vehicle ingress along southern edge of ground floor ramp (see Figure 1).
- Vehicle egress along southern edge of ground floor ramp (see Figure 2).
- Vehicle ingress along northern edge of ground floor ramp (see Figure 3).
- Vehicle egress along northern edge of ground floor ramp (see Figure 4).
- Vehicle ingress along centre line of basement ramp (see Figure 5).
- Vehicle egress along centre line of basement ramp (see Figure 6).

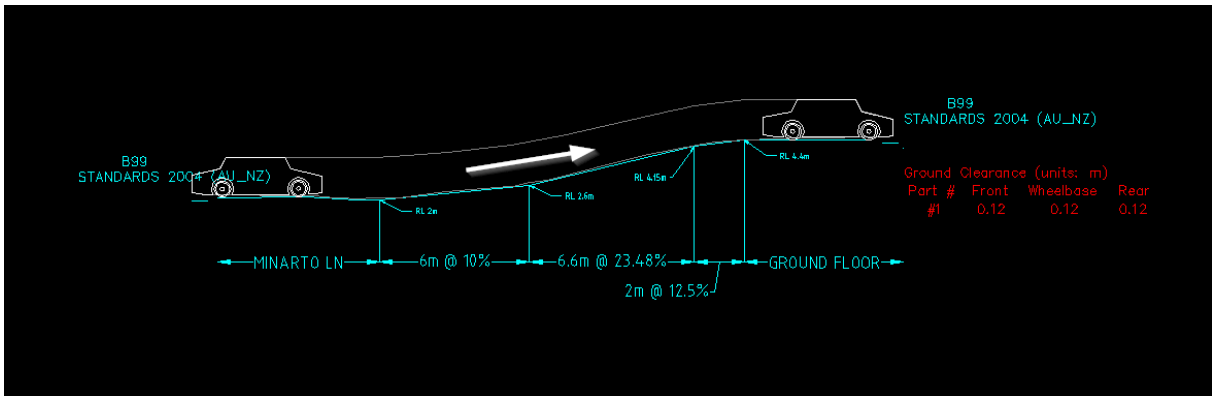


Figure 1: Vehicle ingress along southern edge of ground floor ramp.

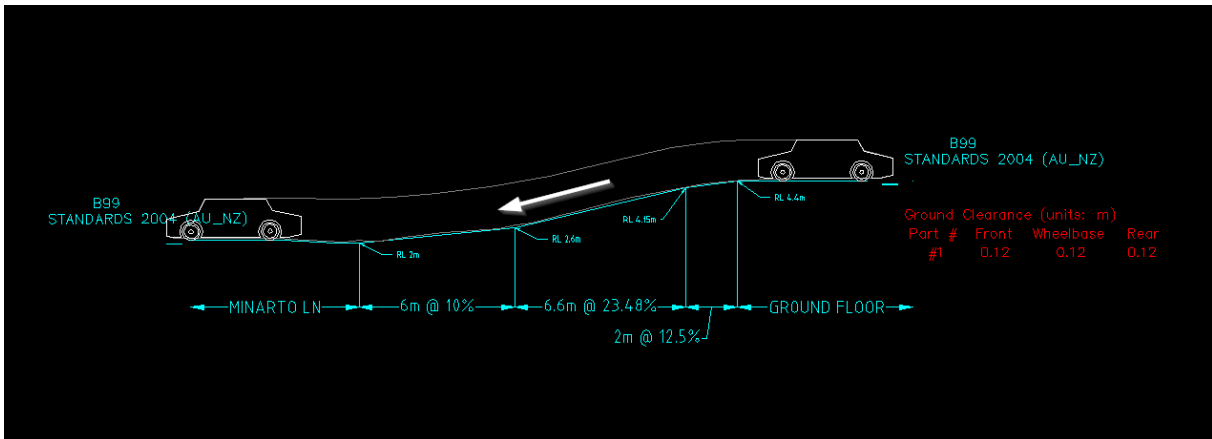


Figure 2: Vehicle egress along southern edge of ground floor ramp.

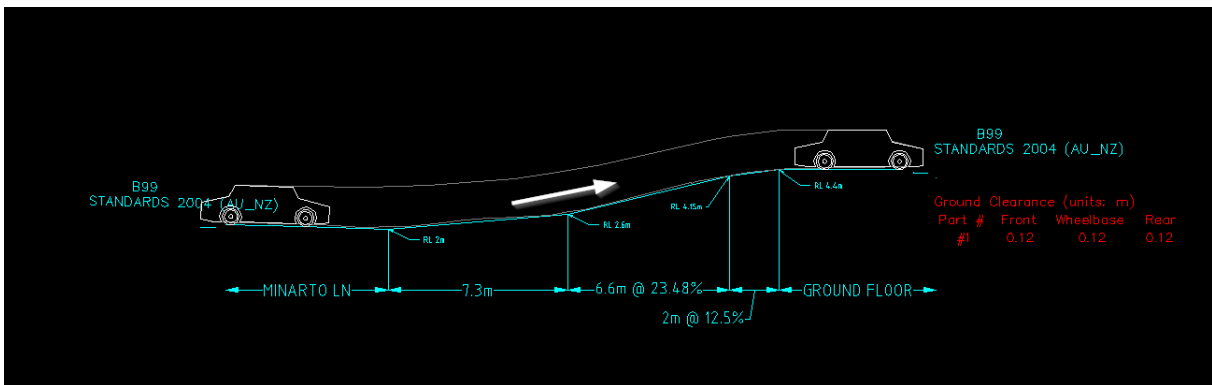


Figure 3: Vehicle ingress along northern edge of ground floor ramp.

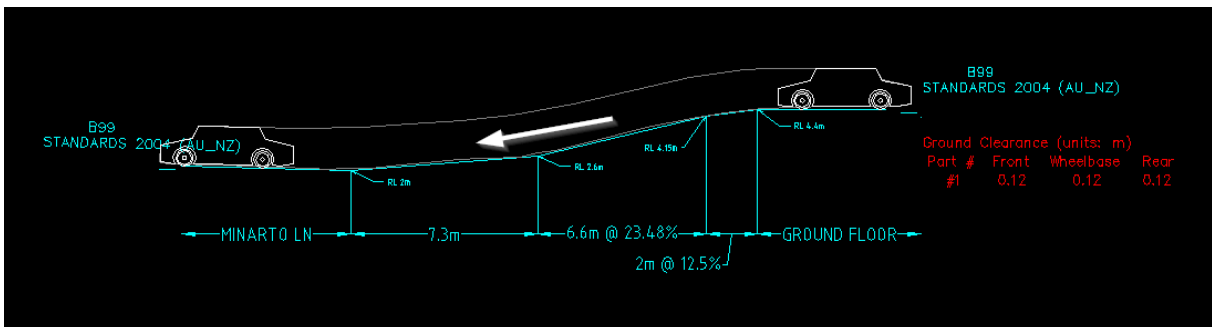


Figure 4: Vehicle egress along northern edge of ground floor ramp.

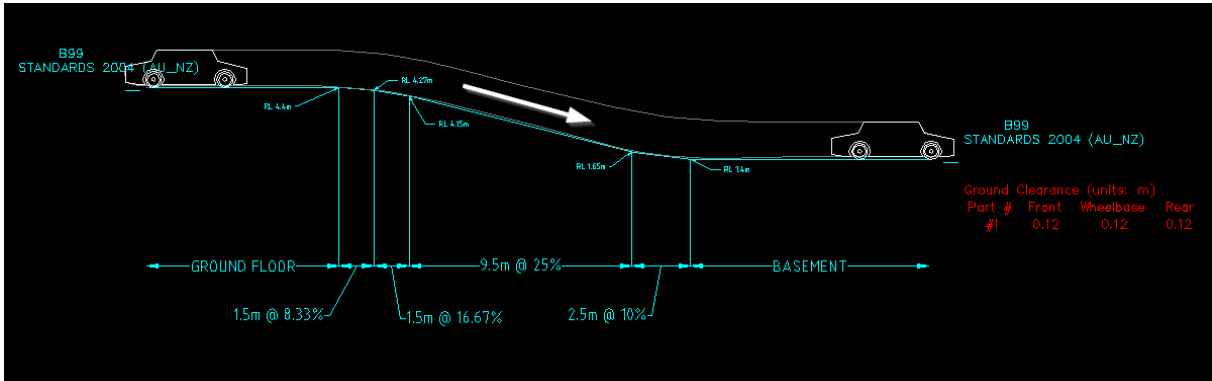


Figure 5: Vehicle ingress along centre line of basement ramp.

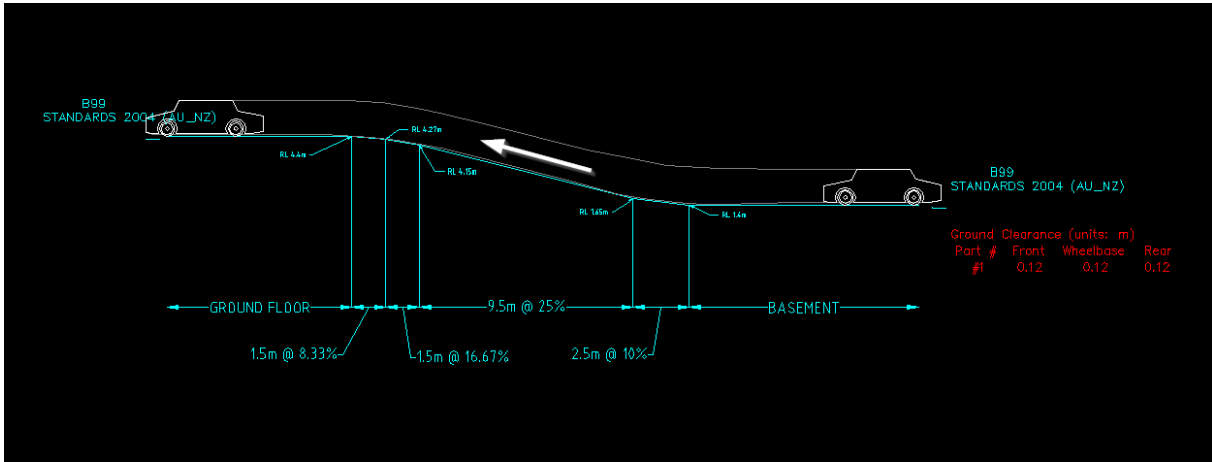


Figure 6: Vehicle egress along centre line of basement ramp.

4 CONCLUSION

The assessment indicates that scraping will not occur at the driveway / road junction or at any point along the driveway and carpark ramps for travel by a B99 vehicle based on architect plans (MAI 2024). Hence the development satisfies the **NBC** traffic engineer referral response (comment no.14 DA2024/0460, dated 09/08/2024).

If you require any further information, please do not hesitate to contact our offices.

For and on behalf of

Martens & Associates Pty Ltd

GRAY TAYLOR

Principal Engineer / Senior Project Manager

5 REFERENCES

- Australian Standard (AS 2890.1) Parking facilities – off-street car parking (2004).
- Geographic Solutions Surveyors (2017) 1 Gondola Road North Narrabeen. *Project No. 3212, dated 27/03/2017.* (GSS 2017)
- Mackenzie Architects International (2021). Basement Plan. *Project No. 15/19, Drawing No. A1001, issue C – WIP, date received 18/10/2024.* (MAI 2024)
- Mackenzie Architects International (2021). Ground Floor Plan. *Project No. 15/19, Drawing No. A1002, issue C – WIP, date received 22/10/2024.* (MAI 2024)