

SUPPLEMENTARY REPORT:

598A & 598B Blaxland Road Eastwood. Lots A & B DP 396644. Local Development Application for construction of a part 3/part 4 storey residential apartment building containing 12 apartments with associated basement parking for 13 vehicles. LDA2018/90.

Reference is made to Agenda Item No 4 of the Ryde Local Planning Panel held on 12 July 2018.

Item 4 was for LDA 2018/90 for the construction of a part 3/part 4 storey residential apartment building and at this meeting the Panel deferred the matter for electronic determination, pending a supplementary report addressing drainage solutions.

Background:

LDA 2018/90 was recommended as a deferred commencement approval subject to an easement to drain water to be acquired through 13 Ball Avenue, Eastwood (adjoining western property). The Deferred Commencement Conditions read as follows:

1. **Drainage Easement.** An easement to drain stormwater must be established over the downstream property(ies) in order for the development to legally drain via gravity to the downstream public drainage infrastructure in Ball Avenue. The easement is to be located generally as shown on the concept plan ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 dated 2 February 2018 & C4.01 dated 31 Jan 2018). The drafted terms of the drainage easement are to be submitted to Council for approval prior to registration and are to include the Council as the authority in which to have authority to vary the terms of the easement. Documentary evidence of registration of the drainage easement with the Land & Property Information Authority, including the terms of the drainage easement and its location on the burdened lot(s), must be submitted to Council to demonstrate the requirements of this condition have been satisfied, prior to the activation of this Development Consent.
2. **Stormwater Management.** To ensure the discharge of stormwater is undertaken in an appropriate manner, the following matters are to be addressed. Documentation demonstrating compliance with these items must be submitted to Council for approval prior to the issue of the development consent;
 - (a) The stormwater drainage plan by ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 dated 2 February 2018 & C4.01 dated 31 Jan 2018) is to be amended to detail the full extent of the easement and the point of discharge to Ball Avenue.

The design must be compliant with the Council's DCP Part 8.2 (*Stormwater and Floodplain Management*).

However at the meeting, the applicant advised that they have started preparation works to acquire an easement through 596 Blaxland Road, Eastwood (the adjoining southern property) rather than 13 Ball Avenue as stipulated in Deferred Commencement Condition 1. It was also noted that the stormwater plans referred in the Deferred Commencement Condition 2 above was not in accordance with revised plans and flood study sent to Council on 15 May which showed the easement through 596 Blaxland Road. The applicant advised that the easement through 596 Blaxland Road is the preferred option and proceedings had begun in the Land & Environment Court to obtain the easement via 596 Blaxland Road. Figure 1 below illustrates the proposed location of the easement at 13 Ball Ave, as required by the original deferred commencement condition, shown marked in red. The preferred easement through 596 Blaxland Road is shown marked in blue.

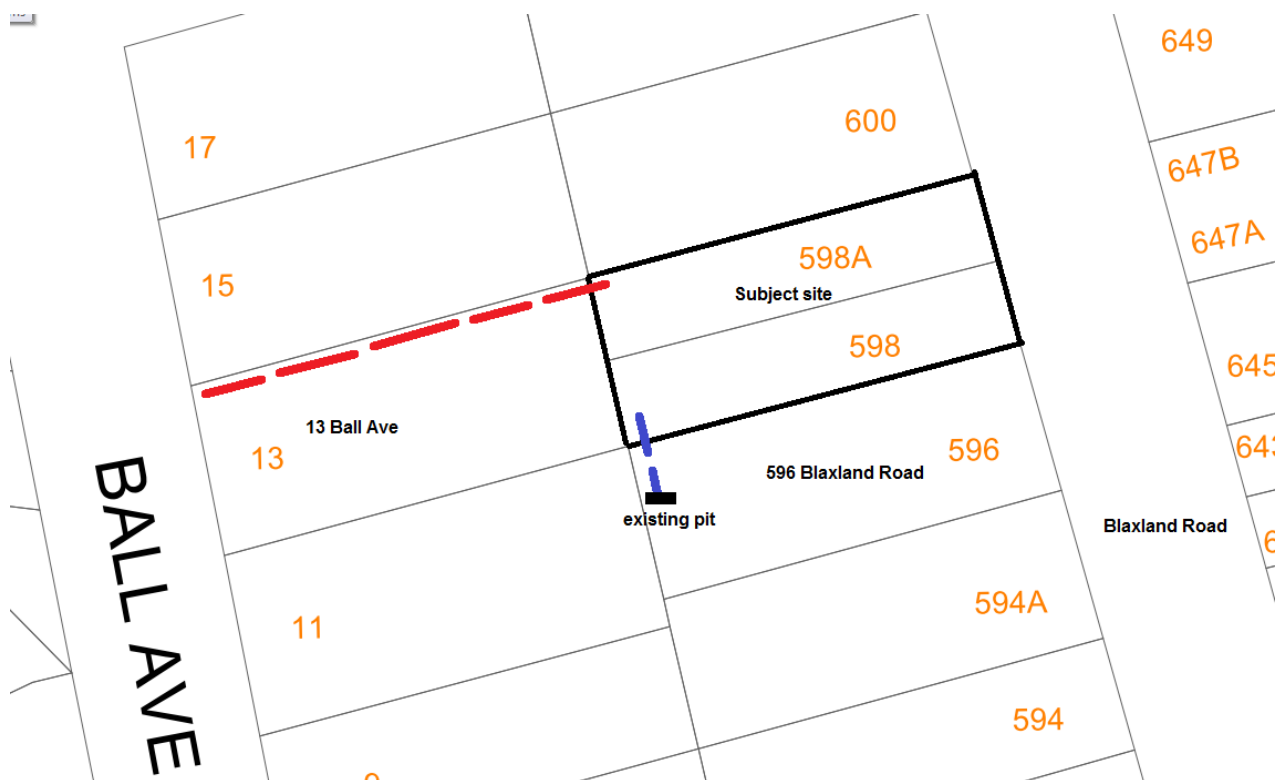


Figure 1: Proposed easement as required by deferred commencement condition 1, marked in red and the applicant's preferred easement shown in blue.

In order for Council to review the suitability of the easement via 596 Blaxland Road, additional information and levels were required to be submitted to Council.

Assessment:

The applicant submitted the required information, including amended stormwater plans to Council on 7 August 2018.

Drainage:

The proposal was referred to Council's Senior Coordinator Development Engineering Services who reviewed the amended plans and has provided the following comments:

The revised stormwater management plans have diverted the alignment of the proposed easement route so as to now discharge to the public inground drainage infrastructure traversing the adjoining property at 596 Blaxland Road (just south of the subject lot). A review of the revised plans notes;

- The nominated angle of connection to the new junction pit is not hydraulically efficient with the angle of discharge against the dominant flow of the public drainage line. This could be redressed by having the realignment of the line undertaken at the point of discharge (within the confines of the easement) however will lead to significant hydraulic loss in the system. Considering the stormwater management system incorporates an onsite detention device which will restrict the rate of runoff to a degree which is well below the capacity of the discharge line the configuration does not warrant concern.*
- The design of the OSD system has not considered the potential for a submerged outlet anticipated to occur during extreme storm events. The invert of the OSD control point (orifice) is RL63.62m, the invert of the discharge point is RL63.51m and the anticipated 100yr ARI flood level at the point of discharge is anticipated to be RL64.19m. As such, the detention storage is unlikely to drain during extreme storm events, thereby making the OSD system ineffective. A review of the architectural plans notes that the area in which the tank is to be located (COMMUNAL OPEN SPACE) is to have a finished level of 64.90m. There is then provision to convert the area to an onsite detention basin by bunding the area (implementation of a small impermeable wall, similar to a garden bed around the perimeter of the area), effectively raising the discharge control such to be above the flood event. To prevent nuisance ponding occurring for smaller storm events, provision can be made for rainwater tank storage to be provided under the terrace to unit 1 and unit 2. The configuration presents an improved outcome in that there is a reduction in hardstand area (presented by the footprint of the below ground tank), it facilitates an increased level of landscaping and increases the degree of water permeation over the lot. This matter is addressed by condition of consent.*

The following matters have also been noted in the review;

- It appears that the proposed pedestrian entry point to the basement garage on the southern side of the development has not been identified by Councils Stormwater Catchment and Asset section in the review of flood levels in this region. It is noted the applicant's consultant has estimated that the flooding and overland flows are to be diverted along the southern boundary of the neighbouring site due to the presence of small structures at the front setback of the neighbouring property, close to the northern boundary. This is entirely reliant on the presence of this landform and structures and is therefore considered a*

very optimistic assumption. Ideally the stairs should be relocated however this would require significant reconfiguration of the plans. As the doorway is noted to swing outwards, there is potential the door could be sealed to act as a floodgate. The hydrostatic force to the external face of the door would prevent the door being inadvertently opened by occupants during a catastrophic event and enhance the waterproof seal at the time. This matter is addressed by condition.

- *As noted in the initial Development Engineering review, a bund on the driveway is provided with a crest level equivalent to the 100yr ARI flood level plus 150mm. This differs from the DCP controls which require this level to be at the PMF event. Council's PMF analysis estimates there to be sheet flow in this area of levels 100-200mm above the boundary alignment which happens to generally comply with the nominated level.*

Recommendation

A review of the realigned drainage easement notes;

- *The angle of the discharge line at the point of connection is not ideal though is still effective given the rate of discharge from the OSD system and the potential the connection alignment could be configured to address this shortfall.*
- *The nominated level of the OSD tank is unfortunately below the anticipated flood level over the site. This would result in the OSD discharge outlet to be submerged during an extreme storm event, making the system ineffective. A review of the plans notes this can readily be addressed by reconfiguring the OSD storage as an above ground basin by implementing bunding wall around the perimeter area. This would appear as a 300mm high impermeable dwarf wall (like a garden bed) around the area. As noted in the comments above, the reconfiguration of the system to a basin has other significant advantages which include the increase in deep soil landscaping area, increased level of water permeation back into the surface and opportunities for additional landscaping aside from grass, including small shrubs and trees.*

There are no objections to the proposed development with respect to the engineering components, subject to the application of the following conditions being applied to any development consent being issued for the proposed development. (Note: Changes required to the previous conditions of consent have been identified in red).

Deferred Commencement:

1. **Drainage Easement.** *An easement to drain stormwater must be established over adjoining property(ies) in order for the development to legally drain via gravity to public drainage infrastructure. The easement is to be located generally as shown on the concept plan ACOR Consultants Pty Ltd. (Refer to Project No. SY170208 Dwgs C2.01 Rev J dated 7 August 2018), and is noted to discharge over No. 596 Blaxland Road (SP7549).*

The drafted terms of the drainage easement are to be submitted to Council for approval prior to registration and are to include the Council as the authority in which to have authority to vary the terms of the easement.

Documentary evidence of registration of the drainage easement with the Land & Property Information Authority, including the terms of the drainage easement and its location on the burdened lot(s), must be submitted to Council to demonstrate the requirements of this condition have been satisfied, prior to the activation of this Development Consent.

- 2. Stormwater Management.** *To ensure the discharge of stormwater from the development is undertaken in an appropriate manner, the stormwater drainage plan by ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 dated 2 February 2018 & C4.01 dated 31 Jan 2018) is to be amended as follows;*
 - a. The proposed alteration to the public inground drainage infrastructure at the point of discharge will require the assessment and approval of Councils Stormwater Asset and Catchment Section. The proposed junction pit is to be cast in situ (not a proprietary product) and incorporate a sealed access lid. The civil construction plans are to clearly detail the works and are to depict, as a minimum, existing and proposed surface levels, invert levels of crucial sections of the infrastructure, a plan view of the connection and cross-section details. Full civil specifications relating to the works are to be incorporated on the plans. Any variation to the scope of works or modifications to this that may be required such as, arising due to site conditions, as identified in the detailed assessment or a requirement in Council's DCP, are to be undertaken at the direction or discretion of Council's Stormwater Asset and Catchment section.*
 - b. The discharge line must be configured at the point of connection to ensure that it is no less than 45degree with the dominant flow of stormwater runoff in the public drainage infrastructure.*
 - c. In accordance with control (a) in Section 1.3.7 of the Technical Manual associated with the DCP Part 8.2 (Stormwater and Floodplain Management), the proposed basement pump holding well is to be increased in volume such to accommodate a 100yr ARI 3 hour storm event.*
 - d. The proposed below ground onsite detention storage is to be redesigned as an above ground basin in the region of the communal play area. This is due to the nominated OSD system having insufficient elevation above anticipated flood events, thereby being ineffective during such periods (ie a submerged outlet). The discharge level of the basin must therefore be elevated above the 100yr ARI (a discharge outlet of RL64.32m is estimated) and the basin designed in accordance with the requirements of the DCP, with exception to the following variations;*
 - The 20% increase required by the basin is not required considering the nature and use of the area in which the basin is located will be maintained for the serviceable life of the development.*

- *A portion of the detention storage is to be accommodated in a minimum 5,000L rainwater tank, placed adjoining the northern boundary to the lot, so as to prevent nuisance ponding in the basin.*

The design is to be submitted to Council for approval prior to the activation of this Development Consent.

PART 2 - The conditions in the following sections of this consent shall apply upon satisfactory compliance with the above requirements and receipt of appropriate written confirmation from Council.

GENERAL

75. **Stormwater Management.** Stormwater runoff from the development shall be collected and piped by gravity flow to Ball Avenue, generally in accordance with the plans by *ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 dated 2 February 2018 & C4.01 Rev J dated 7 August 2018)* subject to any variations required by Council in addressing the condition of deferred commencement.

The detailed plans, documentation and certification of the drainage system must be submitted with the application for a Construction Certificate and prepared by a chartered civil engineer and comply with the following;

- The certification must state that the submitted design (including any associated components such as WSUD measures, pump/ sump, absorption, onsite dispersal, charged system) are in accordance with the requirements of AS 3500.3 (2003) and any further detail or variations to the design are in accordance with the requirements of Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures.
 - The submitted design is consistent with the approved architectural and landscape plan and any revisions to these plans required by conditions of this consent.
 - The subsurface drainage system must be designed to preserve the pre-developed groundwater table so as to prevent constant, ongoing discharge of groundwater to the public drainage network, as well as avoid long term impacts related to the support of structures on neighbouring properties.
78. **Flood and Overland Flow Protection.** The property has been identified as being susceptible to flooding and overland flow during large storm events. In accordance with Council's Floodplain Risk Management controls, the following measures are required to be implemented in the development.
- a) The floor levels must not be less than the estimated flood depth adjoining entry points plus required freeboard, as specified in the FLOOD_REF.
 - b) *The pedestrian access entry to the basement garage on the southern side of the development poses a risk of inundation to the basement level. As per Council's DCP, the basement garage is to be protected from inundation arising from the PMF event. To address this, the door is to be designed as a waterproof seal and is to be structural adequate to withstand hydrostatic flows which may arise during the PMF event. A sign must be installed on the inside*

of the door advising that it is to be closed at all times as it may be subject to floodwaters arising from an extreme storm event.

- c) *All structures subject to flooding and overland flows must be constructed of flood compatible building components (refer to Schedule 3 of Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures,*
- d) *External structures subject to flooding and overland flows must be structurally designed to withstand the forces imposed by these flows, including forces imposed by floating debris and buoyancy. To achieve this, the structure must be designed and certified by a suitably qualified structural engineer to comply with this condition.*
- e) *All new fencing constructed in the overland flowpath shall be constructed such to prevent the damming/ blockage of flood waters, which would adversely change flood behaviour or increase flood levels. To address this, the underside of all new fences must provide a clearance equivalent to the 100yr flood level. The clearance may be infilled with pool fencing or a louvre/ gate system.*

Certification of the structural design and details complying with this condition must be submitted to the Accredited Certifier for approval prior to the issue of a Construction Certificate.

118. **Stormwater Management - Construction.** *The stormwater drainage system on the site must be constructed in accordance with the Construction Certificate version of the Stormwater Management Plan by ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 Rev J dated 7 August 2018) submitted in compliance to the condition labelled "Stormwater Management." and the requirements of Council in relation to the connection to the public drainage system.*

The applicant has reviewed the amended conditions and has raised no objections to the amended conditions. The amended conditions of consent have been incorporated into the draft conditions contained in Attachment 1.

Section 7.11 Contribution

Condition 39 of the draft conditions of consent required Section 7.11 contribution of \$111, 098.32. This S7.11 contribution were calculated using the most recent CPI available at the time of preparing the report, which was the May quarter.

New CPI figures were released in late July 2018 that became effective on 1 August 2018 and as a result it is necessary to make an adjustment to the S7.11 contribution Condition 39. Accordingly, it is requested that Condition 39 be amended to read:

39. **Section 7.11.** A monetary contribution for the services in Column A and for the amount in Column B shall be made to Council as follows:

A – Contribution Type	B – Contribution Amount
Community & Cultural Facilities	\$ 23,597.24

Open Space & Recreation Facilities	\$58,091.50
Civic & Urban Improvements	\$19,758.06
Roads & Traffic Management facilities	\$2,695.16
Cycleways	\$1,683.48
Stormwater Management Facilities	\$5,351.00
Plan Administration	\$ 453.88
The total contribution is	\$ 111,630.32

These are contributions under the provisions of Section 94 of the Environmental Planning and Assessment Act, 1979 as specified in Section 94 Development Contributions Plan 2007 Interim Update (2014), effective from 10 December 2014.

The above amounts are current at the date of this consent, and are subject to **quarterly** adjustment for inflation on the basis of the contribution rates that are applicable at time of payment. Such adjustment for inflation is by reference to the Consumer Price Index published by the Australian Bureau of Statistics (Catalogue No 5206.0) – and may result in contribution amounts that differ from those shown above.

The contribution must be paid **prior to the issue of any Construction Certificate**. Payment may be by EFTPOS (debit card only), CASH or a BANK CHEQUE made payable to the **City of Ryde**. Personal or company cheques will not be accepted.

A copy of the Section 7.11 Development Contributions Plan may be inspected at the Ryde Customer Service Centre, 1 Pope Street Ryde (corner Pope and Devlin Streets, within Top Ryde City Shopping Centre) or on Council's website <http://www.ryde.nsw.gov.au>.

Land & Environmental Court Appeal

It should be noted that the owner of the subject site lodged a deemed refusal appeal in the Land & Environmental Court. Council has requested an extension of time for the submission of the Statement of Facts and Contentions pending the determination of the application by the Ryde Local Planning Panel.

Council has recently become aware of the implications of Section 8.15(4) of the Environmental Planning and Assessment Act, 1979 which provides that:

“If the determination or decision appealed against under this Division was made by a Sydney district or regional planning panel or a local planning panel, the council for the area concerned is to be the respondent to the appeal but is subject to the control and direction of the panel in connection with the conduct of the appeal. The council is to give notice of the appeal to the panel.”

This has implications in respect of how Council would process and manage any appeal lodged in respect to an application that has been determined by the RLPP.

Section 2.20(8) of the Environmental Planning and Assessment Act allows Local Planning Panels to delegate any of their functions to the General Manager or other

staff of Council. To ensure Council can properly manage the appeal in respect of this development application within the time frames identified by the Court, it is proposed to amend the recommendation for LDA2018/090 so that the Panel grant delegation to Council staff to control and direct any subsequent appeal for this DA.

RECOMMENDATION

Pursuant to Section 4.6 of the Environmental Planning and Assessment Act, 1979, the following is recommended:

- a. That the Local Planning Panel grant consent to development application LDA2018/90 for the construction of a residential apartment building development at 598A & 598B Blaxland Road, Eastwood subject to the Conditions of Consent in Attachment 1 of this report; and
- b. That those persons making a submission in the second round of notification be advised of the decision.
- c. Roads and Maritime Services be advised of determination.
- d. That pursuant to Section 2.20(8) of the Environmental Planning & Assessment Act, the Ryde Local Planning Panel delegate its functions with regard to the control and direction of the appeal in respect to LDA2018/90 to the following Council Officers:
 - The General Counsel; and
 - The Director City Planning & Environment.

Attachments

1. Amended Draft Conditions of Consent
2. Previous report considered by the Panel at its's meeting held on 12 July 2018
3. Amended drainage plans and previous architectural plans.

Report prepared by:

Sandra McCarry
A/ Senior Coordinator – Major Development.

Report approved by:

Sandra Bailey
Manager Assessment

Liz Coad
Director – City Planning and Development

Amended Conditions for LDA 2018/90

PART 1 - The following are the Deferred Commencement condition(s) imposed pursuant to Section 80(3) of the Environmental Planning & Assessment Act 1979.

DEFERRED COMMENCEMENT

The following condition is a Deferred Commencement condition imposed pursuant to Section 80(3) of the Environmental Planning and Assessment Act 1979.

1. **Drainage Easement.** An easement to drain stormwater must be established over adjoining property(ies) in order for the development to legally drain via gravity to public drainage infrastructure. The easement is to be located generally as shown on the concept plan ACOR Consultants Pty Ltd. (Refer to Project No. SY170208 Dwgs C2.01 Rev J dated 7 August 2018), and is noted to discharge over No. 596 Blaxland Road (SP7549).

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2. **Stormwater Management.** To ensure the discharge of stormwater from the development is undertaken in an appropriate manner, the stormwater drainage plan by ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 dated 2 February 2018 & C4.01 dated 31 Jan 2018) is to be amended as follows;
 - a. The proposed alteration to the public inground drainage infrastructure at the point of discharge will require the assessment and approval of Councils Stormwater Asset and Catchment Section. The proposed junction pit is to be cast in situ (not a proprietary product) and incorporate a sealed access lid. The civil construction plans are to clearly detail the works and are to depict, as a minimum, existing and proposed surface levels, invert levels of crucial sections of the infrastructure, a plan view of the connection and cross- section details. Full civil specifications relating to the works are to be incorporated on the plans. Any variation to the scope of works or modifications to this that may be required due to site conditions, as identified in the detailed assessment or a requirement in Council's DCP, are to be undertaken at the direction or discretion of Council's Stormwater Asset and Catchment section.
 - b. The discharge line must be configured at the point of connection to ensure that it is no less than 45degree with the dominant flow of stormwater runoff in the public drainage infrastructure.

- c. In accordance with control (a) in Section 1.3.7 of the Technical Manual associated with the DCP Part 8.2 (Stormwater and Floodplain Management), the proposed basement pump holding well is to be increased in volume such to accommodate a 100yr ARI 3 hour storm event.
- d. The proposed below ground onsite detention storage is to be redesigned as an above ground basin in the region of the communal play area. This is due to the nominated OSD system having insufficient elevation above anticipated flood events, thereby being ineffective during such periods (ie a submerged outlet). The discharge level of the basin must therefore be elevated above the 100yr ARI (a discharge outlet of RL64.32m is estimated) and the basin designed in accordance with the requirements of the DCP, with exception to the following variations;
 - The 20% increase required by the basin is not required considering the nature and use of the area in which the basin is located will be maintained for the serviceable life of the development.
 - A portion of the detention storage is to be accommodated in a minimum 5,000L rainwater tank, placed adjoining the northern boundary to the lot, so as to prevent nuisance ponding in the basin.

The design is to be submitted to Council for approval prior to the activation of this Development Consent.

PART 2 - The conditions in the following sections of this consent shall apply upon satisfactory compliance with the above requirements and receipt of appropriate written confirmation from Council.

GENERAL

1. **Approved Plans/Documents.** Except where otherwise provided in this consent, the development is to be carried out strictly in accordance with the following plans (stamped approved by Council) and support documents:

Document Description	Date	Plan No/Reference
Site Plan	08/05/2018	17_038 DA-A-010
Level C1	08/05/2018	17_038 DA-A-100
Level 0	03/08/2018	17_038 DA-A-101
Level 1	03/08/2018	17_038 DA-A-102
Level 2	08/05/2018	17_038 DA-A-103
Level 3	08/05/2018	17_038 DA-A-104
Roof	08/05/2018	17_038 DA-A-105
Adaptable Unit	08/05/2018	17_038 DA-A-150
North & South Elevations	08/05/2018	17_038 DA-A-200
East & West Elevations	08/05/2018	17_038 DA-A-201
Sections	08/05/2018	17_038 DA-A-202
Finishes & Material Palette	08/05/2018	17_038 DA-A-901
Landscaping	24/05/18	L01, L02 & L03 Rev E

Prior to the issue of a **Construction Certificate**, the following amendments shall be made and submitted to Council for approval:

- (a) **Driveway (RMS).** The driveway is to be amended so that there is no right turn movements to/from the site. Accordingly, the driveway is to be designed to restrict any right turn movement to/from the site onto Blaxland Road. All vehicles are to be wholly contained on site before being required to stop and in this regard the driveway could be splayed to accommodate this movement and all vehicles are to enter and exit the site in a forward direction.
- (b) **Northern setback.** Units 2, 6 & 10 living room and balconies are to have a minimum 4.5m setback to the northern boundary with the northern window of Bedroom 1 orientated to the west (facing the rear).
- (c) **Privacy Screen.** So as to minimise overlooking to the bedroom windows directly opposite, a privacy screen is to be provided on the rear balconies of Units 1,5 & 9.
- (d) **Amendment to Landscaping:**
 - i. **Planting – face brick walls.** Climbing plants are to be provided between the face brick walls and stepping stone pathways on the northern and southern side of the building. This is to include systems fixed to the walls which allow climbing plants to attach to the walls however still maintain pedestrian access.
 - ii. **Northern landscaping strip.** The Landscaping strip along the northern boundary is to be continued with 600mm planter adjacent to the boundary fence.

Details of compliance are to be shown on the plans for Construction Certificate.

The Development must be carried out in accordance with the amended plans approved under this condition.

- 2. **Building Code of Australia.** All building works approved by this consent must be carried out in accordance with the requirements of the Building Code of Australia.
- 3. **BASIX.** Compliance with all commitments listed in BASIX Certificate(s) numbered 885946M_02, dated 24 May 2018.
- 4. **Roads and Maritime Services (RMS).** All buildings and structures, together with any improvements integral to the future use of the site are to be wholly within the freehold property (unlimited in height or depth) along the Blaxland Road boundary.
- 5. **RMS.** Any redundant driveway(s) along Blaxland Road boundary shall be removed and replaced with kerb & gutter matching existing. The design and construction of the kerb and gutter crossing on Blaxland Road shall be in accordance Roads and Maritime requirements. Details of these requirements should be obtained from

Roads and Maritime Services, Manager Developer Works, State Wide Delivery, Parramatta (telephone 9598 7798).

Detailed design plans of the proposed kerb and gutter are to be submitted to Roads and Maritime for approval prior to the issue of a Construction Certificate and commencement of any road works.

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 approved road design plans by Roads and Maritime.

6. **RMS.** In accordance with AS 2890.1- 2004 (Parking Facilities, Part 1: Off-street car parking), the driveway shall be a minimum of 5.5 metres in width for a minimum distance of 6 metres from the property boundary. The driveway should be designed to restrict any right turn movements.
7. **RMS.** Sight distances from the proposed vehicular crossing to vehicles on Blaxland Road are to be in accordance with the Austroads '*Guide to Traffic Engineering Practice, Part 5: Intersections at Grade, Section 6.2 – Sight Distance*' and AS 2890. Vegetation and landscaping / fencing must not hinder sight lines to and from the vehicular crossings to motorists, pedestrians and cyclists.
8. **RMS.** The developer is to submit design drawings and documents relating to the excavation of the site and support structures to Roads and Maritime for assessment, in accordance with *Technical Direction GTD2012/001*.

The developer is to submit all documentation at least six (6) weeks prior to commencement of construction and is to meet the full cost of the assessment by Roads and Maritime.

Details and any enquiries should be forwarded to Mr Suppiah Thillai at Suppiah.Thillai@rms.nsw.gov.au or Phone at 8849 2114.

If it is necessary to excavate below the level of the base of the footings of the adjoining roadways, the person acting on the consent shall ensure that the owner/s of the roadway is/are given at least seven (7) day notice of the intention to excavate below the base of the footings. The notice is to include complete details of the work.

9. **RMS.** Detailed design plans and hydraulic calculations of any changes to the stormwater drainage system in Blaxland Road are to be submitted to Roads and Maritime for approval, prior to the commencement of any works.

Details should be forwarded to: Suppiah.Thillai@rms.nsw.gov.au

A plan checking fee will be payable and a performance bond may be required before Roads and Maritime approval is issued. With regard to the Civil Works requirement please contact the Roads and Maritime Project Engineer, External Works Ph: 8849 2114 or Fax: 8849 2766.

10. **RMS.** All demolition and construction vehicles are to be contained wholly within the site and vehicles must enter the site before stopping. A construction zone will not be permitted on Blaxland Road.
11. **RMS.** A Road Occupancy Licence should be obtained from Transport Management Centre for any works that may impact on traffic flows on Blaxland Road during construction activities.
12. **Traffic Management.** Traffic management procedures and systems must be in place and practised during the construction period to ensure safety and minimise the effect on adjoining pedestrian and vehicular traffic systems. These procedures and systems must be in accordance with AS 1742.3 1985 and City of Ryde, Development Control Plan 2006: - Part 8.1; Construction Activities.
13. **Support for neighbouring buildings.** If the development involves excavation that extends below the base of the footings of a building on adjoining land, the person having the benefit of the development consent must, at the person's own expense:
 - (a) Protect and support the adjoining premises from possible damage from the excavation, and
 - (b) Where necessary, underpin the adjoining premises to prevent any such damage, in accordance with relevant Australian Standards.
14. **Hours of work.** Building activities (including demolition) may only be carried out between 7.00am and 7.00pm Monday to Friday (other than public holidays) and between 8.00am and 4.00pm on Saturday. No building activities are to be carried out at any time on a Sunday or a public holiday.
15. **Hoardings.**
 - (a) A hoarding or fence must be erected between the work site and any adjoining public place.
 - (b) Any hoarding, fence or awning erected pursuant this consent is to be removed when the work has been completed.
16. **Illumination of public place.** Any public place affected by works must be kept lit between sunset and sunrise if it is likely to be hazardous to persons in the public place.
17. **Development to be within site boundaries.** The development must be constructed wholly within the boundaries of the premises. No portion of the proposed structure shall encroach onto the adjoining properties. Gates must be installed so they do not open onto any footpath.
18. **Public space.** The public way must not be obstructed by any materials, vehicles, refuse, skips or the like, under any circumstances, without prior approval from Council.

19. **Public Utilities.** Compliance with the requirements (including financial costs) of any relevant utility provider (e.g. Energy Australia, Sydney Water, Telstra, RMS, Council etc) in relation to any connections, works, repairs, relocation, replacements and/or adjustments to public infrastructure or services affected by the development.
20. **Design and Construction Standards** – All engineering works shall be carried out in accordance with the requirements as outlined within Council’s DCP 2014 Part 8.5 *Public Civil Works* and relevant Development Control Plans except as amended by the conditions herein.
21. **Service Alterations.** All mains, services, poles, etc., which require alteration due to works associated with the development, shall be altered at the applicant’s expense.
22. **Construction Staging.** For any staging of the public domain works, the applicant shall provide a detailed construction management and staging plan.
23. **Public areas and restoration works.** Public areas must be maintained in a safe condition at all times. Restoration of disturbed road and footway areas for the purpose of connection to public utilities, including repairs of damaged infrastructure as a result of the construction works associated with this development site, shall be undertaken by the Applicant in accordance with Council’s standards and specifications, and DCP 2014 Part 8.5 *Public Civil Works*, to the satisfaction of Council.
24. **Roads Act.** Any works performed in, on or over a public road pursuant to this consent must be carried out in accordance with this consent and with the Road Opening Permit issued by Council as required under section 139 of the Roads Act 1993.
25. **Mechanical ventilation of rooms.** If the airborne noise level with windows and doors open exceeds the above noise criteria by more than 10dBA, an approved system of mechanical ventilation must be provided so that the building occupants can leave the windows and doors closed.
26. **Fresh air intake vents.** All fresh air intake vents must be located in a position that is free from contamination and at least 6 metres from any exhaust air discharge vent or cooling tower discharge.
27. **Exhaust air discharge vents.** All exhaust air discharge vents must be designed and located so that no nuisance or danger to health will be created.
28. **Carpark exhaust vent.** The carpark exhaust vent must be located at least 3 metres above ground level or any pedestrian thoroughfare and:
 - (a) at least 6 metres from any fresh air intake vent or natural ventilation opening;
and
 - (b) at least 6 metres or, where the dimensions of the allotment make this impossible, the greatest possible distance from any neighbouring property boundary.

29. **Plumbing and drainage work.** All plumbing and drainage work must be carried out in accordance with the requirements of Sydney Water Corporation and the NSW Department of Fair Trading.
30. **Design and Construction Standards.** All engineering plans and work inside the property shall be carried out in accordance with the requirements of the relevant Australian Standard. All Public Domain works or modification to Council infrastructure which may be located inside the property boundary, must be undertaken in accordance with Council's 2014 DCP Part 8.5 (Public Domain Works), except otherwise as amended by conditions of this consent.
31. **Service Alterations.** All mains, services, poles, etc., which require alteration shall be altered at the applicant's expense.
32. **Restoration.** Public areas must be maintained in a safe condition at all times. Restoration of disturbed road and footway areas for the purpose of connection to public utilities will be carried out by Council following submission of a permit application and payment of appropriate fees. Repairs of damage to any public stormwater drainage facility will be carried out by Council following receipt of payment. Restoration of any disused gutter crossings will be carried out by Council following receipt of the relevant payment.
33. **Tree Protection.** All tree protection works including installation of any fencing is to be undertaken prior to any demolition or site clearing works on site.
34. **Tree Protection Fencing.** All protective fencing and signage around TPZs must be located in accordance with AS4970: Protection of trees on development sites. In this regard, any fencing required to be constructed around the TPZ is to be in accordance with AS4687 Temporary fencing and hoardings.
35. **Stormwater Trench/Pit Locations.** The alignment of stormwater infrastructure is to be located as far away from existing trees to be retained as practical. Should the excavation for the stormwater pits and trenches conflict with any major structural roots (greater than >25 mm diameter) of existing trees, their location and alignment is to be modified in consultation with the Project Arborist to avoid impact. Under no circumstances should roots be severed or cut without prior approval from the Project Arborist.
36. **Underground Utilities.** Any utility services to be located underground within the TPZ are to be undertaken utilising excavation techniques that prevent or minimise damage to structural roots (roots greater than >25 mm diameter). To prevent soil compaction and root damage these works should be conducted with non-motorised hand tools or directional drilling.
37. **Excavation within TPZ.** Any excavation or grading/re-grading within the identified TPZs of trees to be retained shall be carried out by hand using manual, non-motorised hand tools. Roots greater than 25mm are not to be damaged or severed without the prior written approval of the Project Arborist.

38. Certification. A Tree Protection Schedule, as indicated below, which provides a logical sequence of hold points for the various development stages including pre construction, construction and post construction and a checklist of various hold points that are to be signed and dated by the Project Arborist. This is to be completed progressively and included as part of the final certification. A copy of the final certification is to be made available to the City of Ryde Council prior to the issue of any Occupation Certificate.

1.	Indicate clearly (with spray paint on trunks) trees approved for removal only	Principal Contractor	Project Arborist	Prior to demolition and site establishment
2.	Establishment of tree protection fencing	Principal Contractor	Project Arborist	Prior to demolition and site establishment
3.	Supervise all excavation works proposed within the TPZ	Principal Contractor	Project Arborist	As required prior to the works proceeding adjacent to the tree
4.	Inspection of trees by Project Arborist	Principal Contractor	Project Arborist	Bi-monthly during construction period
5.	Final inspection of trees by project Arborist	Principal Contractor	Project Arborist	Prior to issue of Occupation Certificate

PRIOR TO CONSTRUCTION CERTIFICATE

A Construction Certificate must be obtained from a Principal Certifier to carry out the relevant building works approved under this consent. All conditions in this Section of the consent must be complied with before a Construction Certificate can be issued.

Council Officers can provide these services and further information can be obtained from Council’s Customer Service Centre on 9952 8222.

Unless an alternative approval authority is specified (eg Council or government agency), the Principal Certifier is responsible for determining compliance with the conditions in this Section of the consent.

Details of compliance with the conditions, including plans, supporting documents or other written evidence must be submitted to the Principal Certifier.

39. Section 7.11. A monetary contribution for the services in Column A and for the amount in Column B shall be made to Council as follows:

A – Contribution Type	B – Contribution Amount
Community & Cultural Facilities	\$ 23,597.24
Open Space & Recreation Facilities	\$58,091.50
Civic & Urban Improvements	\$19,758.06
Roads & Traffic Management facilities	\$2,695.16
Cycleways	\$1,683.48
Stormwater Management Facilities	\$5,351.00
Plan Administration	\$ 453.88
The total contribution is	\$ 111,630.32

These are contributions under the provisions of Section 94 of the Environmental Planning and Assessment Act, 1979 as specified in Section 94 Development Contributions Plan 2007 Interim Update (2014), effective from 10 December 2014. The above amounts are current at the date of this consent, and are subject to **quarterly** adjustment for inflation on the basis of the contribution rates that are applicable at time of payment. Such adjustment for inflation is by reference to the Consumer Price Index published by the Australian Bureau of Statistics (Catalogue No 5206.0) – and may result in contribution amounts that differ from those shown above.

The contribution must be paid **prior to the issue of any Construction Certificate**. Payment may be by EFTPOS (debit card only), CASH or a BANK CHEQUE made payable to the **City of Ryde**. Personal or company cheques will not be accepted. A copy of the Section 7.11 Development Contributions Plan may be inspected at the Ryde Customer Service Centre, 1 Pope Street Ryde (corner Pope and Devlin Streets, within Top Ryde City Shopping Centre) or on Council's website <http://www.ryde.nsw.gov.au>.

40. **Compliance with Australian Standards.** The development is required to be carried out in accordance with all relevant Australian Standards. Details demonstrating compliance with the relevant Australian Standard are to be submitted to the Principal Certifier prior to the issue of the **Construction Certificate**.
41. **Structural Certification.** The applicant must engage a qualified practising structural engineer to provide structural certification in accordance with relevant BCA requirements prior to the release of the **Construction Certificate**.
42. **Security deposit.** The Council must be provided with security for the purposes of section 4.17(6) of the *Environmental Planning and Assessment Act 1979* in a sum determined by reference to Council's Management Plan prior to the release of the **Construction Certificate**. (category: other buildings with delivery of bricks or concrete or machine excavation)
43. **Fees.** The following fees must be paid to Council in accordance with Council's Management Plan prior to the release of the **Construction Certificate**:
- (a) Infrastructure Restoration and Administration Fee
 - (b) Enforcement Levy

44. **Long Service Levy.** Documentary evidence of payment of the Long Service Levy under Section 34 of the Building and Construction Industry Long Service Payments Act 1986 is to be submitted to the Principal Certifier prior to the issuing of the **Construction Certificate**.
45. **Flood Level.** Prior to issue of Construction Certificate, a design certificate shall be provided to the Principal Certifying Authority confirming that the crest level of the basement carpark driveway is designed above the PMF (Probable Maximum Flood) event.
46. **Ground Anchors** - The installation of permanent ground anchors into public roadway is not permitted. The installation of temporary ground anchors may be considered subject to an application to Council's City Works and Infrastructure Directorate, and approval obtained as per the provisions of Section 138 of the Roads Act, 1993. The application for consent must include detailed structural engineering plans prepared by a Chartered Structural Engineer (registered on the NER of Engineers Australia), clearly nominating the number of proposed anchors, minimum depth below existing ground level at the boundary alignment and the angle of installation. The approval will be subject to:
- a. Advice being provided to the relevant Public Utility Authorities of the proposed anchoring.
 - b. the payment of all fees in accordance with Council's Schedule of Fees & Charges at the time of the application, and
 - c. the provision of a copy of the Public Liability insurance cover of not less than \$20million with Council's interest noted on the policy. The policy shall remain valid until the de-commissioning of the ground anchors.
47. **Public domain improvements** - The public domain is to be upgraded for the full width of the development site frontage on Blaxland Road in accordance with the City of Ryde Development Control Plan DCP 2014 Part 8.5 Public Civil Works. The work is to include paving of footpath, new grass verge, construction of new driveway crossing, relocation of power pole and upgrading of street light and must be completed to Council's satisfaction at no cost to Council, prior to the issue of any Occupation Certificate.

A public domain design for the following works shall be submitted to, and approved by Council's City Works & Infrastructure, prior to the issue of any Construction Certificate.

- (a) Footpath paving and construction of driveway crossing as specified in the condition of consent for public infrastructure works.
- (b) Street trees.

Note: In designing the street tree layout, the consultant shall check and ensure that all new street trees are positioned such that there are no conflicts with the proposed street lights, utilities and driveway accesses. The proposed street lights will have priority over the street trees.

- (c) Relocation of the existing power pole near the proposed driveway and upgrading of street lights will be required. The new location of the power pole shall be a minimum 1.0m from the proposed driveway crossing wing.
- (d) Street lighting using LED luminaires is to be designed and installed to Australian Standard AS1158:2010 Lighting for Roads and Public Spaces, with vehicular luminance category V3 and pedestrian luminance category P3 along the Blaxland Road frontage of the development site. The street lighting will remain on the Ausgrid street lighting network. Lighting design plan prepared by a qualified lighting design consultant shall be submitted to Council for approval prior to any submissions to Ausgrid.

The ASP3 design plans are to be prepared by an Ausgrid accredited designer for decommissioning the existing network and constructing the new network; and are to be submitted to, and approved by Council and relevant utility authorities, prior to commencement of work. The extent of works required in order to achieve this outcome may involve works beyond the frontage of the development site.

48. Public Infrastructure Works – Public infrastructure works shall be designed and constructed as outlined in this condition of consent. The approved works must be completed to Council's satisfaction at no cost to Council.

Engineering drawings prepared by a Chartered Civil Engineer (registered on the NER of Engineers Australia) are to be submitted to, and approved by Council's City Works and Infrastructure prior to the issue of any Construction Certificate. The works shall be in accordance with City of Ryde DCP 2014 Part 8.5 - Public Civil Works, and DCP 2014 Part 8.2 - Stormwater Management, where applicable.

The drawings shall include plan view, sections with existing and finished surface levels, existing and proposed signage and other relevant details for the new works. The drawings shall also demonstrate the smooth connection of the proposed works into the remaining street scape.

The Applicant must submit, for approval by Council as a Road Authority, full design engineering plans and specifications for the following infrastructure works:

- (a) The reconstruction of footpath and grass verge for the entire frontage of the proposed development, including transition works, in accordance with the City of Ryde DCP 2014 Part 8.5 - *Public Civil Works*.
- (b) The replacement of both redundant vehicular crossings with new kerb, gutter and the construction of the proposed layback, including restoration of the adjacent road pavement, shall be designed for construction in accordance with the standards and specifications of the Roads and Maritime Services.
- (c) Signage and line marking details.
- (d) The relocation/adjustment of all public utility services affected by the proposed works. Written approval from the applicable Public Authority shall be submitted to Council along with the public domain plans submission. All the requirements of the Public Authority shall be complied with.

Notes:

1. The Applicant is advised to consider the finished levels of the public domain, including new or existing footpaths, prior to setting the floor levels for the proposed building.
 2. Depending on the complexity of the proposed public domain works, the Council's review of each submission of the plans may take a minimum of six (6) weeks.
 3. Prior to submission to Council, the Applicant is advised to ensure that the drawings are prepared in accordance with the standards listed in the City of Ryde DCP 2014 Part 8.5 - *Public Civil Works*, Section 5 "*Standards Enforcement*". A checklist has also been prepared to provide guidance, and is available upon request to Council's City Works & Infrastructure Directorate.
 4. City of Ryde standard drawings for public domain infrastructure assets are available on the Council website. Details that are relevant may be replicated in the public domain design submissions; however Council's title block shall not be replicated.
49. **Driveway Access and Boundary Alignment Levels.** The applicant shall apply to Council for site specific driveway access and boundary alignment levels prior to preparation of the required design for Public infrastructure works. The application shall be accompanied by preliminary engineering plans of civil works along the frontage of the development site. The Council issued levels shall be incorporated into the detail design plans for the public domain improvements and infrastructure works, and the design of the internal driveway, car parking areas, landscaping and stormwater drainage plans. Fees are payable in accordance with Council's Schedule of Fees & Charges at the time of the application.
50. **Vehicle Footpath Crossings.** To protect the footpath from damage resulting from the vehicular traffic, the footpath crossing/s shall be designed and constructed in accordance with the City of Ryde Development Control Plan 2014 Part 8.3 *Driveways* and Part 8.5 - *Public Civil Works*, and all relevant Australian Codes and Standards (AS2890.1). The crossings shall match the paving style along the frontages of the development site.
- In order to avoid the access driveway looking like a public road, kerbs shall not be returned to the boundary alignment line.
- The applicant shall provide Council with certification from a Chartered Civil Engineer (registered on the NER of Engineers Australia) confirming that the vehicle footpath crossing and driveway design meet Council requirements and the relevant standards, prior to the issue of the Construction Certificate.
51. **Public Domain Works – Defects Security Bond.** To ensure satisfactory performance of the public domain works, a defects liability period of twelve (12) months shall apply to the works in the road reserve following completion of the development. The defects liability period shall commence from the date of issue by Council, of the Compliance Certificate for the external (public domain) works. The

applicant shall be liable for any part of the work which fails to perform in a satisfactory manner as outlined in Council's standard specification, during the twelve (12) months' defects liability period. A bond in the form of a cash deposit or unconditional Bank Guarantee of \$50,000 shall be lodged with the City of Ryde prior to the issue of a Construction Certificate to guarantee this requirement will be met. The bond will only be refunded when the works are determined to be satisfactory to Council after the expiry of the twelve (12) months defects liability period.

52. **Engineering plans assessment and works inspection fees.** The applicant is to pay to Council fees for assessment of all engineering and public domain plans and inspection of the completed works in the public domain, in accordance with Council's Schedule of Fees & Charges at the time of the issue of the plan approval, prior to such approval being granted by Council.

Note: An invoice will be issued to the Applicant for the amount payable, which will be calculated based on the design plans for the public domain works.

53. **Sydney Water – Building Plan Approval.** The plans approved as part of the Construction Certificate must also be approved by Sydney Water prior to excavation or construction works commencing. This allows Sydney Water to determine if sewer, water or stormwater mains or easements will be affected by any part of your development. Please go to www.sydneywater.com.au/tapin to apply.

54. **Detailed site investigation report.** The proponent must submit a detailed site investigation report to Council for consideration before the issue of a Construction Certificate. The detailed site investigation report must comply with the *Guidelines for Consultants Reporting on Contaminated Sites* (EPA, 1997) and demonstrate that the site is suitable for the proposed use, or that the site can be remediated to the extent necessary for the proposed use.

If remediation is required, the report should also set out the remediation options available for the site and whether the work is considered to be category 1 or category 2 remediation work.

55. **Remediation of land following detailed site investigation.** If required by the detailed site investigation report, the land must be remediated to the extent necessary for the proposed use and a copy of the site validation report must be submitted to Council for consideration. The site validation report must comply with the *Guidelines for Consultants Reporting on Contaminated Sites* (EPA, 1997) and demonstrate that the site is suitable for the proposed use.

No Construction Certificate is to be issued for any building work on the land until Council has confirmed in writing that it is satisfied that the land is suitable for the proposed use, without the need for further remediation.

56. **Notice of remediation work.** Before commencing remediation work written notice must be submitted to Council in accordance with clause 16 of *State Environmental Planning Policy No. 55 - Remediation of Land*.

57. **Remediation work.** All remediation work must be carried out in accordance with the requirements of:

- a. *State Environmental Planning Policy No. 55 - Remediation of Land*;
- b. any relevant guidelines published by the NSW Environment Protection Authority; and
- c. any council policy or development control plan relating to the remediation of land.

58. **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 Council prior to issue of any Construction Certificate.

The CTMP must:-

- i. Make provision for all construction materials to be stored on site, at all times.
- ii. Specify construction truck routes and truck rates. Nominated truck routes are to be distributed over the surrounding road network where possible.
- iii. Make provision for parking onsite once basement level is constructed. All Staff and Contractors are to use the basement parking once available.
- iv. 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 are not permitted unless approved by Council's Public Works.
- v. Include a Traffic Control Plan prepared by an RMS accredited traffic controller for any activities involving the management of vehicle and pedestrian traffic.
- vi. 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.
- vii. 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.
- viii. 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.
- ix. Specify spoil management process and facilities to be used on site.
- x. 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.
- xi. 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”, Council’s DCP 2014 Part 8.1 (Construction Activities) and Council’s CTMP checklist. A copy of Council’s CTMP checklist shall be obtained from Council’s Traffic, Transport and Development Department prior to submission of CTMP.

- xii. 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.

Note: This condition is to ensure public safety and minimise any impacts to the adjoining pedestrian and vehicular traffic systems. The CTMP 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.

- 59. **Evidence of connection by gravity flow.** Documentary evidence from a professional hydraulic engineer or other suitably qualified person demonstrating that all sanitary fixtures will be connected to the sewerage system by gravity flow must be submitted with the application for the Construction Certificate.
- 60. **Acoustic Protection.** The development must be acoustically designed and constructed in accordance with the acoustical treatments recommended in the Acoustical Assessment Report by Acoustic Logic dated 11 November 2017 and any related project documentation must be implemented. Written endorsement of compliance with these requirements must be obtained from a suitably qualified person.
- 61. **Road traffic noise criteria for sensitive developments.** The building must be designed and constructed so that the road traffic noise levels inside the building(s) comply with the noise criteria specified in *Development Near Rail Corridors and Busy Roads – Interim Guideline* (Department of Planning, 2008).
- 62. **Compliance with Access Report.** The development is to comply with the requirements contained in the Accessibility Report prepared by Access Consultant dated 23 January 2018. The development is to comply with the Access to Premises Standard 2010, BCA 2014 and Australian Standard AS 1428.1 – 2009 Design for Access and Mobility – General Requirements For Access -New Building Work. Australian Standard AS 4299 – 1995 Adaptable Housing. Details demonstrating compliance are to be submitted on the Construction Certificate plans.
- 63. **Reflectivity of materials.** Roofing and other external materials must be of low glare and reflectivity. Details of finished external surface materials, including colours and texture must be provided to the Principal Certifying Authority prior to the release of the **Construction Certificate**.
- 64. **Fencing.** Fencing is to be in accordance with Council's DCP 2014: Part 3.3 – Dwelling Houses and Dual Occupancy (attached) – Section 2.16 - Fences. Please note: the northern and southern front return fence is to be reduce in height to be not to than 900mm so as to allow for adequate sightline. Details of compliance are to be provided in the plans for the **Construction Certificate**.

65. **Lighting of common areas (driveways etc).** Details of lighting for internal driveways, visitor parking areas and the street frontage shall be submitted for approval prior to issue of the **Construction Certificate**. The details to include certification from an appropriately qualified person that there will be no offensive glare onto adjoining residents.
66. **Fibre-ready facilities and telecommunications infrastructure.** Prior to the issue of any Construction Certificate satisfactory evidence is to be provided to the Certifier that arrangements have been made for:
- (i) The installation of fibre-ready facilities to all individual lots and/or premises in a real estate development project so as to enable fibre to be readily connected to any premises that is being or may be constructed on those lots. Alternatively, demonstrate that the carrier has confirmed in writing that they are satisfied that the fibre ready facilities are fit for purpose.

And

- (ii) The provision of fixed-line telecommunications infrastructure in the fibre-ready facilities to all individual lots and/or premises in a real estate development project demonstrated through an agreement with a carrier.

(Note real estate development project has the meanings given in Section 372Q of the Telecommunications Act).

67. **Soil Depth over Structures.** Where planting is proposed over a structure, the development is to achieve the minimum standards for soil provision suitable to the proposed planting, as contained within the Apartment Design Guide. Information verifying that the development complies with these requirements to be provided on the Construction Certificate plans.
68. **Irrigation.** An automatic watering system is to be supplied to all landscape areas including common areas, private open spaces to ensure adequate water is available to lawns and vegetation. Irrigation systems shall be fully automated and capable of seasonal adjustments. Details are to be submitted prior to the issue of Construction Certificate.
69. **Adaptable Units.** One (1) adaptable apartment, each with an allocated disabled parking space, are to be provided within the development. These apartments are to comply with all of the requirements as outlined in AS4299. Details demonstrating compliance is to be provided on the Construction Certificate plans. Prior to the issue of the Construction Certificate, a suitably qualified access consultant is to certify that the development achieves the requirements of AS4299.
70. **Storage.** Each residential unit is to be provided with the minimum internal storage area as required by the Apartment Design Guide. Details of the location of the storage and dimensions of the storage areas are to be provided on the Construction Certificate plans. The architect is to verify in writing that the development complies prior to the issue of the Construction Certificate.

71. **Vehicular entry.** The vehicular entries are to have high quality finishes and detailing to the walls and ceiling. Service ducts or pipes are to be covered and not visible from any public domain. Details demonstrating compliance is to be submitted on the Construction Certificate plans.

72. **Design verification in respect of SEPP 65.** Prior to a Construction Certificate being issued with respect to this development, the Principle Certifying Authority is to be provided with a written Design Verification from a qualified designer. This statement must include verification from the designer that the plans and specification achieve or improve the design quality of the development to which this consent relates, having regard to the design quality principles set out in Part 2 of State Environmental Planning Policy No. 65 – Design Quality of Residential Flat Development. This condition is imposed in accordance with Clause 143 of the Environmental Planning and Assessment Regulation 2000.

73. **Vehicle Access & Parking.** All internal driveways, vehicle turning areas, garages and vehicle parking space/ loading bay dimensions must be designed and constructed to comply with the relevant section of AS 2890 (Offstreet Parking standards).

With respect to this, the following revision(s) must be undertaken;

- a) The crest at the vehicle entry point (required for flood protection of the development) must be designed as a vertical curve commencing from the front boundary alignment to the main grade of the ramp. The vertical curve must attain a crest threshold of 150mm above the boundary alignment and is to incorporate rates and gradient transitions complying the Australian standard 2890.1

These amendment(s) must be clearly marked on the plans submitted to the Accredited Certifier prior to the issue of a Construction Certificate.

74. **Traffic Signal System.** To prevent conflicting traffic flows at the point of the single lane driveway entry, an internal traffic signal system must be installed to warn a driver entering the access of any vehicles exiting from the opposite direction.

The signal system must;

- Be clearly visible from either approach and is to indicate to an approaching driver, by way of red light or wording, that a vehicle is approaching on the single lane access in the opposite direction,
- Default to green for entering traffic.
- Provide demarcated waiting bays (linemarked) for the waiting vehicle to stand. These are to be located clear of the swept turning path of the opposing vehicle to allow the vehicle to pass.

The system is to be operational prior to the issue of any Occupation Certificate. Details of the system, including the system operation, components and placement within the development, must be detailed by a practising Traffic Engineer. This engineer is to submit these details and certify that the system has been installed

accordingly, to the Accredited Certifier prior to the issue of the Final Occupation Certificate

75. **Stormwater Management.** Stormwater runoff from the development shall be collected and piped by gravity flow to Ball Avenue, generally in accordance with the plans by ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 dated 2 February 2018 & C4.01 Rev J dated 7 August 2018) subject to any variations required by Council in addressing the condition of deferred commencement.

The detailed plans, documentation and certification of the drainage system must be submitted with the application for a Construction Certificate and prepared by a chartered civil engineer and comply with the following;

- The certification must state that the submitted design (including any associated components such as WSUD measures, pump/ sump, absorption, onsite dispersal, charged system) are in accordance with the requirements of AS 3500.3 (2003) and any further detail or variations to the design are in accordance with the requirements of Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures.
- The submitted design is consistent with the approved architectural and landscape plan and any revisions to these plans required by conditions of this consent.
- The subsurface drainage system must be designed to preserve the pre-developed groundwater table so as to prevent constant, ongoing discharge of groundwater to the public drainage network, as well as avoid long term impacts related to the support of structures on neighbouring properties.

76. **Vehicle Footpath Crossing(s).** Concrete footpath crossings and associated gutter crossovers must be constructed fronting the approved vehicle access location(s). The crossing(s) must be constructed in plain reinforced concrete with location, design and construction shall conform to Council requirements and AS 2890.1 – 2004 (Offstreet Parking). Accordingly, prior to issue of Construction Certificate an application shall be made to Council for driveway crossing alignment levels. These issued levels are to be incorporated into the design of the driveway access and clearly delineate on plans submitted with the Construction Certificate application.

77. **External Engineering Works.** To facilitate satisfactory and safe access to and from the proposed development, the following public infrastructure works shall be constructed at no cost to Council along the entire public road frontage of the site.

- a) Construction of concrete footpath paving and replacement of all damaged kerb and gutter etc.
- b) Construction of any other associated structures across the footway if required by Council's Civil Infrastructure & Integration Department.
- c) Relocation or adjustments of any services within the footpath area if required due to proposed works

Detailed engineering plans prepared by a qualified and experienced civil engineer in accordance with Development Control Plan 2014 Part 8.5 - Public Civil Works are to be submitted to, and approved by Council.

Engineering plans assessment and inspections fee associated with this work are payable in accordance with Council's Schedule of Fees and Charges prior to approval being issued by Council.

78. **Flood and Overland Flow Protection.** The property has been identified as being susceptible to flooding and overland flow during large storm events. In accordance with Council's Floodplain Risk Management controls, the following measures are required to be implemented in the development.
- a) *The floor levels must not be less than the estimated flood depth adjoining entry points plus required freeboard, as specified in the FLOOD_REF.*
 - b) *The pedestrian access entry to the basement garage on the southern side of the development poses a risk of inundation to the basement level. As per Council's DCP, the basement garage is to be protected from inundation arising from the PMF event. To address this, the door is to be designed as a waterproof seal and is to be structurally adequate to withstand hydrostatic flows which may arise during the PMF event. A sign must be installed on the inside of the door advising that it is to be closed at all times as it may be subject to floodwaters arising from an extreme storm event.*
 - c) *All structures subject to flooding and overland flows must be constructed of flood compatible building components (refer to Schedule 3 of Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures,*
 - d) *External structures subject to flooding and overland flows must be structurally designed to withstand the forces imposed by these flows, including forces imposed by floating debris and buoyancy. To achieve this, the structure must be designed and certified by a suitably qualified structural engineer to comply with this condition.*
 - e) *All new fencing constructed in the overland flowpath shall be constructed such to prevent the damming/ blockage of flood waters, which would adversely change flood behaviour or increase flood levels. To address this, the underside of all new fences must provide a clearance equivalent to the 100yr flood level. The clearance may be infilled with pool fencing or a louvre/ gate system.*

Certification of the structural design and details complying with this condition must be submitted to the Accredited Certifier for approval prior to the issue of a Construction Certificate.

79. **Geotechnical Design, Certification and Monitoring Program.** The proposed development involves the construction of subsurface structures and excavation that has potential to adversely impact neighbouring property if undertaken in an inappropriate manner. To ensure there are no adverse impacts arising from such works, the applicant must engage a suitably qualified and practicing Engineer having experience in the geotechnical and hydrogeological fields, to design, certify and oversee the construction of all subsurface structures associated with the development.

This engineer is to prepare the following documentation;

- a) Certification that the civil and structural details of all subsurface structures are designed to;

- provide appropriate support and retention to neighbouring property,
 - ensure there will be no ground settlement or movement during excavation or after construction (whether by the act of excavation or dewatering of the excavation) sufficient to cause an adverse impact to adjoining property or public infrastructure, and,
 - ensure that the treatment and drainage of groundwater will be undertaken in a manner which maintains the pre-developed groundwater regime, so as to avoid constant or ongoing seepage to the public drainage network and structural impacts that may arise from alteration of the pre-developed groundwater table.
- b) A Geotechnical Monitoring Program (GMP) to be implemented during construction that;
- is based on a geotechnical investigation of the site and subsurface conditions, including groundwater,
 - details the location and type of monitoring systems to be utilised, including those that will detect the deflection of all shoring structures, settlement and excavation induced ground vibrations to the relevant Australian Standard;
 - details recommended hold points and trigger levels of any monitoring systems, to allow for the inspection and certification of geotechnical and hydro-geological measures by the professional engineer; and;
 - details action plan and contingency for the principal building contractor in the event these trigger levels are exceeded.
 - Is in accordance with the recommendations of any approved Geotechnical Report.

The certification and the GMP is to be submitted for the approval of the Accredited Certifier prior to the issue of the Construction Certificate.

80. **Dilapidation Survey.** A dilapidation survey is to be undertaken that addresses all properties that may be affected by the construction work, namely 596 and 600 Blaxland Road. A copy of the dilapidation survey is to be submitted to the Accredited Certifier *and Council* prior to the release of the Construction Certificate.

81. **Erosion and Sediment Control Plan.** An Erosion and Sediment Control Plan (ESCP) must be prepared by a suitably qualified consultant, detailing soil erosion control measures to be implemented during construction. The ESCP is to be submitted with the application for a Construction Certificate. The ESCP must be in accordance with the manual *“Managing Urban Stormwater: Soils and Construction”* by NSW Department – Office of Environment and Heritage and must contain the following information;

- Existing and final contours
- The location of all earthworks, including roads, areas of cut and fill
- Location of all impervious areas
- Location and design criteria of erosion and sediment control structures,
- Location and description of existing vegetation
- Site access point/s and means of limiting material leaving the site
- Location of proposed vegetated buffer strips
- Location of critical areas (drainage lines, water bodies and unstable slopes)
- Location of stockpiles

- Means of diversion of uncontaminated upper catchment around disturbed areas
- Procedures for maintenance of erosion and sediment controls
- Details for any staging of works
- Details and procedures for dust control.

The ESCP must be submitted with the application for a Construction Certificate. This condition is imposed to protect downstream properties, Council's drainage system and natural watercourses from sediment build-up transferred by stormwater runoff from the site.

82. **Waste.** All waste storage areas which have a doorway must be wide enough to allow the bins allocated to the property or access for larger furniture items for bulky waste storage areas, to fit through opening including the door.
- 240L Bins – width 0.6m, depth 0.8m, height 1.1m
 - Safe easy access must be provided for waste collection vehicles to service the waste containers. Details demonstrating how safe access will be achieved must be approved by the City of Ryde Council prior to the issue of any Construction Certificate
83. **Garbage and recycling rooms.** All garbage and recycling rooms must be constructed in accordance with the following requirements:
- (a) The room must be of adequate dimensions to accommodate all waste containers, and any compaction equipment installed, and allow easy access to the containers and equipment for users and servicing purposes;
 - (b) The floor must be constructed of concrete finished to a smooth even surface, coved to a 25mm radius at the intersections with the walls and any exposed plinths, and graded to a floor waste connected to the sewerage system;
 - (c) The floor waste must be provided with a fixed screen in accordance with the requirements of Sydney Water Corporation;
 - (d) The walls must be constructed of brick, concrete blocks or similar solid material cement rendered to a smooth even surface and painted with a light coloured washable paint;
 - (e) The ceiling must be constructed of a rigid, smooth-faced, non-absorbent material and painted with a light coloured washable paint;
 - (f) The doors must be of adequate dimensions to allow easy access for servicing purposes and must be finished on the internal face with a smooth-faced impervious material;
 - (g) Any fixed equipment must be located clear of the walls and supported on a concrete plinth at least 75mm high or non-corrosive metal legs at least 150mm high;
 - (h) The room must be provided with adequate natural ventilation direct to the outside air or an approved system of mechanical ventilation;
 - (i) The room must be provided with adequate artificial lighting; and

- (j) a hose with a trigger nozzle must be provided in or adjacent to the room to facilitate cleaning
- (k) Garbage and recycling bins must always be stored on-site between collections.
- (l) All waste storage areas must be maintained in a clean and tidy condition at all times
- (m) All material in the bulky items/hard waste storage rooms is to be taken to the collection area stipulated by Council, by the staff or contractors. The material is to be placed in such a manner so that it will not impede the access to any bins from a side arm waste collection vehicle or pedestrian access”
- (n) Staff or contractors must be employed to take the waste containers from garbage and recycling room to the container emptying point for servicing and to return the containers to the garbage room after servicing.
- (o) The area surrounding the construction site must be maintained to reduce the incidence of illegal dumping and management of litter from the site and workers associated with the site must be undertaken.

PRIOR TO COMMENCEMENT OF CONSTRUCTION

Prior to the commencement of any demolition, excavation, or building work the following conditions in this Part of the Consent must be satisfied, and all relevant requirements complied with at all times during the operation of this consent.

84. Site Sign

- a. A sign must be erected in a prominent position on site, prior to the commencement of construction:
 - (i) showing the name, address and telephone number of the Principal Certifier for the work,
 - (ii) showing the name of the principal contractor (if any) or the person responsible for the works and a telephone number on which that person may be contacted outside working hours, and
 - (iii) stating that unauthorised entry to the work site is prohibited.
- b. Any such sign must be maintained while the building work, subdivision work or demolition work is being carried out, but must be removed when the work has been completed.

85. Excavation adjacent to adjoining land

- (a) If an excavation extends below the level of the base of the footings of a building on an adjoining allotment of land, the person causing the excavation must, at their own expense, protect and support the adjoining premises from possible damage from the excavation, and where necessary, underpin the adjoining premises to prevent any such damage.

- (b) The applicant must give at least seven (7) days notice to the adjoining owner(s) prior to excavating.
- (c) An owner of the adjoining allotment of land is not liable for any part of the cost of work carried out for the purposes of this condition, whether carried out on the allotment of land being excavated or on the adjoining allotment of land.

86. **Notice of Intention to Commence Public Domain Works.** Prior to commencement of the public domain works, a *Notice of Intention to Commence Public Domain Works* shall be submitted to Council's City Works and Infrastructure Directorate. This Notice shall include the name of the Contractor who will be responsible for the construction works, and the name of the Supervising Engineer who will be responsible for providing the certifications required at the hold points during construction, and also obtain all Road Activity Permits required for the works.

Note: Copies of a number of documents are required to be lodged with the Notice; no fee is chargeable for the lodgement of the Notice.

87. **Notification of adjoining owners & occupiers – public domain works** - The Applicant shall provide the adjoining owners and occupiers written notice of the proposed public domain works a minimum two weeks prior to commencement of construction. The notice is to include a contact name and number should they have any enquiries in relation to the construction works. The duration of any interference to neighbouring driveways shall be minimised; and driveways shall be returned to the operational condition as they were prior to the commencement of works, at no cost to the owners.

88. **Pre-Construction Dilapidation Report.** To ensure Council's infrastructures are adequately protected a pre-construction dilapidation report on the existing public infrastructure in the vicinity of the proposed development and along the travel routes of all construction vehicles is to be submitted to Council. The report shall detail, but not be limited to, the location, description and photographic record of any observable defects to the following infrastructure where applicable.

- (a) Road pavement,
- (b) Kerb and gutter,
- (c) Footpath,
- (d) Drainage pits,
- (e) Traffic signs, and
- (f) Any other relevant infrastructure.

The report is to be dated and submitted to, and accepted by Council's City Works & Infrastructure Directorate, prior to any work commencing.

All fees and charges associated with the review of this report shall be in accordance with Council's Schedule of Fees and Charges and shall be paid at the time that the Dilapidation Report is submitted.

89. **Road Activity Permits.** To carry out work in, on or over a public road, the Consent of Council is required as per the *Roads Act 1993*. Prior to the commencement of

the relevant works and considering the lead times required for each application, permits for the following activities, as required and as specified in the form "*Road Activity Permits Checklist*" (available from Council's website) are to be obtained and copies submitted to Council with the *Notice of Intention to Commence Public Domain Works*.

- a) Road Use Permit - The applicant shall obtain a Road Use Permit where any area of the public road or footpath is to be occupied as construction workspace, other than activities covered by a Road Opening Permit or if a Work Zone Permit is not obtained. The permit does not grant exemption from parking regulations.
- b) Work Zone Permit - 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. Separate application is required with a Traffic Management Plan for standing of construction vehicles in a trafficable lane. A Roads and Maritime Services Road Occupancy Licence shall be obtained for State Roads.
- c) Road Opening Permit - The applicant shall apply for a road-opening permit and pay the required fee where a new pipeline is to be constructed within or across the road pavement or footpath. Additional road opening permits and fees are required where there are connections to public utility services (e.g. telephone, telecommunications, electricity, sewer, water or gas) within the road reserve. No opening of the road or footpath surface shall be carried out without this permit being obtained and a copy kept on the site.
- d) Elevated Tower, Crane or Concrete Pump Permit - The applicant shall obtain an Elevated Tower, Crane or Concrete Pump Permit where any of these items of plant are placed on Council's roads or footpaths. This permit is in addition to either a Road Use Permit or a Work Zone Permit.
- e) Crane Airspace Permit - The applicant shall obtain a Crane Over Airspace Permit where a crane on private land is operating in the air space of a Council road or footpath. Approval from the Roads and Maritime Services for works on or near State Roads is required prior to lodgement of an application with Council. A separate application for a Work Zone Permit is required for any construction vehicles or plant on the adjoining road or footpath associated with use of the crane.
- f) Hoarding Permit - The applicant shall obtain a Hoarding Permit and pay the required fee where erection of protective hoarding along the street frontage of the property is required. The fee payable is for a minimum period of 6 months and should the period is extended an adjustment of the fee will be made on completion of the works. The site must be fenced to a minimum height of 1.8 metres prior to the commencement of construction and throughout demolition and/or excavation and must comply with WorkCover (New South Wales) requirements.

- g) Skip Bin on Nature Strip - The applicant shall obtain approval and pay the required fee to place a Skip Bin on the nature strip where it is not practical to locate the bin on private property. No permit will be issued to place skips.
90. **Temporary Footpath Crossing.** A temporary footpath crossing, if required, must be provided at the vehicular access points. It is to be 4 metres wide, made out of sections of hardwood with chamfered ends and strapped with hoop iron, and a temporary gutter crossing must be provided.
91. **Project Arborist.** A Project Arborist with minimum AQF level 5 qualifications is to be engaged to ensure adequate tree protection measures are put in place for all trees to be retained on the neighbouring allotments in accordance with AS4970-2009 Protection of trees on development sites. All trees are to be monitored to ensure adequate health throughout the construction period is maintained. Additionally, all work within the Tree Protection Zones is to be supervised by the Project Arborist throughout construction. Details of the Project Arborist are to be submitted to Council prior to the commencement of construction.
92. **Safety fencing.** The site must be fenced prior to the commencement of construction, and throughout demolition and/or excavation and must comply with Safework NSW requirements and be a minimum of 1.8m in height.
93. **Work Zones and Permits.** Prior to commencement of the relevant 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. Separate application is required with a Traffic Management Plan for standing of construction vehicles in a trafficable lane. A Roads and Maritime Services Work Zone Permit shall be obtained for State Roads.
94. **Footpath Paving Construction.** The applicant shall, at no cost to Council, construct standard concrete footpath paving across the frontage of the property. Levels of the footpath paving shall conform with levels issued by Council.

DURING CONSTRUCTION

Unless otherwise specified, the following conditions in this Part of the consent must be complied with at all times during the construction period. Where applicable, the requirements under previous Parts of the consent must be implemented and maintained at all times during the construction period.

95. **Critical stage inspections.** The person having the benefit of this consent is required to notify the Principal Certifier during construction to ensure that the critical stage inspections are undertaken, as specified under clause 162A(4) of the *Environmental Planning and Assessment Regulation 2000*.
96. **Noise management plan** - Where demolition or construction activities are likely to cause significant noise or vibration (eg. jackhammering ,rock breaking or impact piling) a noise management plan must be prepared by a suitably qualified acoustical consultant and be submitted to the Principal Certifying Authority before the work

commences. The plan must be prepared in accordance with the Interim Construction Noise Guideline (DECC, 2009) and include:

- (a) Identification of nearby affected residences or other sensitive receivers.
- (b) An assessment of the expected noise impacts.
- (c) Details of the work practices required to minimise noise impacts.
- (d) Noise monitoring procedures.
- (e) Procedures for notifying nearby affected residents.
- (f) Complaints management procedures.

97. **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 the accredited certifier or Council on request.
98. **Hold Points during construction - Public Domain.** Council requires inspections to be undertaken by a Chartered Civil Engineer (registered on the NER of Engineers Australia), for the public domain, at the hold points shown below.

The Applicant shall submit to Council's City Works and Infrastructure, certification from the Engineer, at each stage of the inspection listed below, within 24 hours following completion of the relevant stage/s. The certificates shall contain photographs of the works in progress and a commentary of the inspected works, including any deficiencies and rectifications that were undertaken.

- a) Prior to the commencement of construction and following the set-out on site of the position of the civil works to the levels shown on the approved civil drawings.
 - b) Upon excavation, trimming and compaction to the subgrade level - to the line, grade, widths and depths, shown on the approved civil engineering drawings.
 - c) Upon compaction of the applicable sub-base course.
 - d) Upon compaction or construction of any base layers of pavement, prior to the construction of the final pavement surface (e.g. prior to laying any pavers or asphalt wearing course).
 - e) Upon installation of any formwork and reinforcement for footpath concrete works.
 - f) Final inspection - upon the practical completion of all civil works with all disturbed areas satisfactorily restored.
99. **Survey of footings/walls.** All footings and walls within 1 metre of a boundary must be set out by a registered surveyor. On commencement of brickwork or wall construction a survey and report must be prepared indicating the position of external walls in relation to the boundaries of the allotment.

100. **Sediment/dust control.** No sediment, dust, soil or similar material shall leave the site during construction work.
101. **Use of fill/excavated material.** Excavated material must not be reused on the property except as follows:
- (a) Fill is allowed under this consent;
 - (b) The material constitutes Virgin Excavated Natural Material as defined in the *Protection of the Environment Operations Act 1997*;
 - (c) the material is reused only to the extent that fill is allowed by the consent.
102. **Construction materials.** All materials associated with construction must be retained within the site.
103. **Site Facilities**
The following facilities must be provided on the site:
- (a) toilet facilities in accordance with Safework NSW requirements, at a ratio of one toilet per every 20 employees, and
 - (b) a garbage receptacle for food scraps and papers, with a tight fitting lid.
104. **Site maintenance**
The applicant must ensure that:
- a. approved sediment and erosion control measures are installed and maintained during the construction period;
 - b. building materials and equipment are stored wholly within the work site unless an approval to store them elsewhere is held;
 - c. the site is clear of waste and debris at the completion of the works.
105. **Work within public road.** At all times work is being undertaken within a public road, adequate precautions shall be taken to warn, instruct and guide road users safely around the work site. Traffic control devices shall satisfy the minimum standards outlined in Australian Standard No. AS1742.3-1996 "Traffic Control Devices for Work on Roads".
106. **Discovery of Additional Information.** Council and the Principal Certifying Authority (if Council is not the PCA) must be notified as soon as practicable if any information is discovered during demolition or construction work that has the potential to alter previous conclusions about site contamination.
107. **Identification and removal of hazardous materials.** Any hazardous materials, including asbestos, must be identified before demolition work commences and be removed in a safe manner.
108. **Storage and removal of wastes.** All demolition and construction wastes must be stored in an environmentally acceptable manner and be removed from the site at frequent intervals to prevent any nuisance or danger to health, safety or the environment.
109. **Contaminated soil.** All potentially contaminated soil excavated during demolition or construction work must be stockpiled in a secure area and be assessed and

classified in accordance with the *Waste Classification Guidelines Part 1: Classifying Waste* (EPA, 2014) before being transported from the site.

110. **Tip Dockets.** Tip Dockets identifying the type and quantity of waste disposed/recycled during construction are to be kept in accordance with the Site Waste Minimisation & Management Plan for spot inspections.
111. **Hold Points during construction – Drainage Works.** Construction inspections shall be required by Council’s Stormwater Engineer for the Council stormwater drainage connection works at the following hold points: -
 - Upon installation of pipes and other drainage structures.
 - Upon backfilling of excavated areas and prior to the construction of the final pavement surface.

An inspection fee is applicable for each visit, and at least 24 hours’ notice will be required for the inspections. Please contact Council’s Customer Service Section on 9952 8222 to book an inspection.

112. **Transportation of wastes.** All wastes must be transported in an environmentally safe manner to a facility or place that can lawfully be used as a waste facility for those wastes. Copies of the disposal docketts must be kept by the applicant for at least 3 years and be submitted to Council on request.
113. **Recyclable wastes.** All wastes intended for recycling must be transported to a facility where the wastes will be recycled or re-used.
114. **Asbestos.** Where asbestos is present during demolition/construction work, the work must be carried out in accordance with the guidelines for asbestos work published by Safework NSW. All asbestos wastes must be disposed of at a landfill facility licensed to receive asbestos waste.
115. **Construction requirements** - All acoustical treatments nominated in the acoustical assessment report and any related project documentation must be implemented during construction.
116. **Noise control measures** - All noise and vibration control measures nominated in the acoustical consultant’s report and any related project documentation must be implemented.
117. **Traffic Management.** Any traffic management procedures and systems must be in accordance with *AS 1742.3 1996* and City of Ryde, Development Control Plan 2014: - Part 8.1; Construction Activities. This condition is to ensure public safety and minimise any impacts to the adjoining pedestrian and vehicular traffic systems.

Accordingly, a detailed plan of traffic management prepared by a traffic engineer including certification indicating compliance are to be submitted with the Construction Certificate application.

118. **Stormwater Management - Construction.** The stormwater drainage system on the site must be constructed in accordance with the Construction Certificate version of the Stormwater Management Plan by ACOR Consultants (Refer to Project no. SY170208 Dwgs C2.01 Rev J dated 7 August 2018) submitted in compliance to the condition labelled “Stormwater Management.” and the requirements of Council in relation to the connection to the public drainage system.
119. **Stormwater Management – Works in the New Drainage Easement.** To ensure there is minimal imposition and loss of amenity to the owner/ occupants of the property burdened by the new drainage easement in construction of these drainage services, the builder/ developer must;
- (i) provide a minimum 3 weeks notification to the burdened property owner and occupants prior to the commencement of works in the neighbouring property.
 - (ii) ensure the works are completed in a timely manner.
 - (iii) ensure any structures adjacent the works are adequately supported at all times.
 - (iv) make provision to restore the work area so as to maintain the amenity of the land / minimise the imposition of works on the burdened land, should the works be delayed due to unforeseen events such as weather, service adjustments, etc.
 - (v) restore all areas on the burdened property disturbed by the construction works to a condition equivalent to the pre-developed state or otherwise as agreed by the owner of the burdened property.
 - (vi) comply with any terms agreed upon by both parties in regards to the construction of the drainage services and restoration of the land, in the granting of the easement.
120. **Erosion and Sediment Control.** The applicant shall install erosion and sediment control measures in accordance with the approved plan at the commencement of works on the site. Suitable erosion control management procedures in accordance with the manual “Managing Urban Stormwater: Soils and Construction“ by the NSW Department – Office of Environment and Heritage, must be practiced at all times throughout the construction. Where construction works deviate from the plan, soil erosion and sediment control measures are to be implemented in accordance with the above referenced document.
121. **Geotechnical Monitoring Program - Implementation.** The construction and excavation works are to be undertaken in accordance with the Geotechnical Report and Monitoring Program (GMP) submitted with the Construction Certificate. All recommendations of the Geotechnical Engineer and GMP are to be carried out during the course of the excavation. The applicant must give at least seven (7) days notice to the owner and occupiers of the adjoining allotments before excavation works commence.

PRIOR TO OCCUPATION CERTIFICATE

An Occupation Certificate must be obtained from a Principal Certifier prior to commencement of occupation of any part of the development, or prior to the commencement of a change of use of a building.

Prior to issue, the Principal Certifier must ensure that all works are completed in compliance with the approved construction certificate plans and all conditions of this Development Consent.

Unless an alternative approval authority is specified (eg Council or government agency), the Principal Certifier is responsible for determining compliance with conditions in this Part of the consent. Details to demonstrate compliance with all conditions, including plans, documentation, or other written evidence must be submitted to the Principal Certifier.

122. **BASIX.** The submission of documentary evidence of compliance with all commitments listed in BASIX Certificate(s) numbered 885946M_02, dated 24 May 2018.
123. **Landscaping.** All landscaping works approved by condition 1 are to be completed prior to the issue of the final **Occupation Certificate**.
124. **Sydney Water – Section 73 Compliance Certificate.** A compliance certificate must be obtained from Sydney Water, under Section 73 of the Sydney Water Act 1994. Sydney Water will determine the availability of water and sewer services, which may require extension, adjustment or connection to Sydney Water mains. A Section 73 Compliance Certificate must be completed before the issue of any Occupation Certificate. Sydney Water will assess the development and if required will issue a Notice of Requirements letter detailing all requirements that must be met. Applications can be made either directly to Sydney Water or through a Sydney Water accredited Water Servicing Coordinator.

Go to www.sydneywater.com.au/section73 or call 1300 082 746 to learn more about applying through an authorised WSC or Sydney Water.
125. **Public Domain Improvements and Infrastructure Works – Completion –** All public domain improvements and infrastructure works shall be completed to Council’s satisfaction, in accordance with the approved public domain plans and at no cost to the Council, prior to the issue of any Occupation Certificate.
126. **Restoration – Supervising Engineer’s Certificate.** Prior to the issue of any Occupation Certificate, the Applicant shall submit to Council a certificate from the Supervising Engineer confirming that the final restoration of disturbed road and footway areas for the purpose of connection to public utilities, including repairs of damaged infrastructure and replacement of any redundant vehicular crossings as a result of the construction works associated with this development site, have been completed in accordance with the Council’s standards and specifications, and DCP2014 Part 8.5 *Public Civil Works*, or the Roads and Maritime Services’ standards and specifications, where applicable.
127. **Compliance Certificates – Street Lighting.** Prior to the issue of any Occupation Certificate, the Applicant shall submit to Council, a *Certificate of Compliance - Electrical Work (CCEW)* from the Electrical Contractor, and certification from a qualified Electrical Engineering consultant confirming that the street lighting in the

public domain has been constructed in accordance with the Council approved drawings and City of Ryde standards and specifications.

128. **Compliance Certificate – External Landscaping Works.** Prior to the issue of any Occupation Certificate, the Applicant shall submit to Council, certification from a qualified Landscape Architect confirming that the public domain landscaping works have been constructed in accordance with the Council approved drawings and City of Ryde standards and specifications.
129. **Public Domain Works-as-Executed Plans.** To ensure the public infrastructure works are completed in accordance with the approved plans and specifications and that the assets to be handed over to Council are accounted for inclusion in Council's Assets Register, Works-as-Executed Plans shall be submitted to Council for review and approval. The Works-as-Executed Plans are to be prepared on a copy of the approved plans and certified by a Registered Surveyor, and shall contain notations in red, all departures from the Council approved details. Any rectifications required by Council shall be completed by the Developer prior to the issue of any Occupation Certificate.
130. **Supervising Engineer Final Certificate** – Prior to the issue of any Occupation Certificate, the Applicant shall submit to Council, a Final Certificate from the Supervising Engineer confirming that the public domain works have been constructed in accordance with the Council approved drawings and City of Ryde standards and specifications. The certificate shall include commentary to support any variations from the approved drawings.
131. **Post-Construction Dilapidation Report** – To ensure Council's infrastructures are adequately protected a post-construction dilapidation report on the existing public infrastructure in the vicinity of the completed development and along the travel routes of all construction vehicles is to be submitted to Council. The report shall detail, but not be limited to, the location, description and photographic record of any observable defects to the following infrastructure where applicable.
 - a. Road pavement,
 - b. Kerb and gutter,
 - c. Footpath,
 - d. Drainage pits and lintels,
 - e. Traffic signs, and
 - f. Any other relevant infrastructure.

The report shall include summary statement/s comparing the pre and post construction conditions of the public infrastructure. The report is to be dated and submitted to, and accepted by Council's City Works and Infrastructure Directorate, prior to issue of the Occupation Certificate. The report shall be used by Council to compare with the pre-construction dilapidation report, and to assess whether restoration works will be required prior to the issue of the Occupation Certificate.

All fees and charges associated with the review of the report shall be in accordance with Council's Schedule of Fees and Charges, and shall be paid at the time that the Dilapidation Report is submitted.

132. **Decommissioning of Ground Anchors.** Prior to the issue of any Occupation Certificate, the Applicant shall provide Council with a certificate from a suitably qualified Structural or Geotechnical Engineer confirming that all approved temporary soil/ground anchors installed into the public road reserve, have been decommissioned and are not transferring any structural loads into the road reserve stratum.
133. **Stormwater Management - Work-as-Executed Plan.** A Work-as-Executed plan (WAE) of the as constructed Stormwater Management System must be submitted with the application for an Occupation Certificate. The WAE must be prepared and certified (signed and dated) by a Registered Surveyor and is to clearly show the constructed stormwater drainage system (including any onsite detention, pump/ sump, charged/ siphonic and onsite disposal/ absorption system) and finished surface levels which convey stormwater runoff.
134. **Stormwater Management – Positive Covenant(s).** A Positive Covenant must be created on the property title(s) pursuant to the relevant section of the Conveyancing Act (1919), providing for the ongoing maintenance of the onsite detention and pump/ sump components incorporated in the approved Stormwater Management system. This is to ensure that the drainage system will be maintained and operate as approved throughout the life of the development, by the owner of the site(s). The terms of the instrument are to be in accordance with the Council's standard terms for such systems, as specified in City of Ryde DCP 2014 - Part 8.4 (Title Encumbrances) - Section 7 and to the satisfaction of Council. The positive covenant must be registered on the title prior to the release of any Occupation Certificate for development works for which the system(s) serve.
135. **Restriction as to User - Floodway.** A restriction as to user is to be placed on the property title to prevent any works which would result in the alteration of the ground surface level or impose on overland flow due to stormwater runoff in the 100ARI, such to adversely impact flood protection of the approved dwelling or have an adverse impact on neighbouring properties. The terms of the restriction shall be generally in accordance with Council's draft terms for provision for overland flow, to the satisfaction of Council and must be registered on the title of the property prior to the release of any Occupation Certificate.
136. **Engineering Compliance Certificates.** To ensure that all engineering facets of the development have been designed and constructed to the appropriate standards, Compliance Certificates must be obtained for the following items and are to be submitted to the Accredited Certifier prior to the release of any Occupation Certificate. All certification must be issued by a qualified and practising civil engineer having experience in the area respective of the certification unless stated otherwise.
- a) Confirming that all components of the parking areas contained inside the site comply with the relevant components of AS 2890 and Council's DCP 2014 Part 9.3 (Parking Controls) and that the internal traffic signal system has been installed and functioning as required by the condition "*Traffic Signal System*".
 - b) Certification from a Hydraulic Engineer that the finished ground levels floor levels and basement parking bund (including the crest threshold) have been

constructed as per the conditions of this consent and that the overland flow path has been maintained as designed.

- c) Confirming that the constructed interallotment drainage system complies with the construction plan requirements and the Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures.
- d) Confirming that the Stormwater Management system (including any constructed ancillary components such as onsite detention) servicing the development complies with Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures, and has been constructed to function in accordance with all conditions of this consent relating to the discharge of stormwater from the site.
- e) Confirming that the footings adjacent to drainage easements are founded below the zone of influence of this infrastructure, in accordance with Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures.
- f) Confirming that erosion and sediment control measures were implemented during the course of construction and were in accordance with the manual *"Managing Urban Stormwater: Soils and Construction"* by the NSW Department – Office of Environment and Heritage and Council's DCP 2014 Part 8.1 (Construction Activities).
- g) Certification from a suitably qualified structural or geotechnical engineer confirming that any temporary soil/ rock anchors installed into public roadway, have been de-stressed and are no longer providing any structural support.
- h) Certification from a suitably qualified geotechnical engineer confirming that the Geotechnical Monitoring Program (GMP) was implemented throughout the course of construction and that all structures supporting neighbouring property have been designed and constructed to provide appropriate support of the neighbouring property and with consideration to any temporary loading conditions that may occur on that site, in accordance with the relevant Australian Standard and building codes.
- i) Compliance certificate from Council confirming that all external works in the public road reserve have been completed to Council's satisfaction.

137. **On-Site Stormwater Detention System - Marker Plate.** To ensure the constructed On-site detention will not be modified, a marker plate is to be fixed to each on-site detention system constructed on the site. The plate construction, wordings and installation shall be in accordance with Council's DCP 2014 Part 8.2 (Stormwater and Floodplain Management) and associated annexures. The plate may be purchased from Council's Customer Service Centre at Ryde Civic Centre (Devlin Street, Ryde).

138. **Final Inspection – Assets Handover** - For the purpose of the handover of the public infrastructure assets to Council, a final inspection shall be conducted in conjunction with Council's Engineer from City Works and Infrastructure Directorate following the completion of the external works. Defects found at such inspection shall be rectified by the Applicant prior to Council issuing the Compliance Certificate for the External Works. Additional inspections, if required, shall be subject to fees payable in accordance with Council's Schedule of Fees & Charges at the time.

A minimum 48 hours' notice will be required when booking for the final inspection.

139. **Compliance Certificate – External Works and Public Infrastructure Restoration**
– Prior to the issue of any Occupation Certificate, a compliance certificate shall be obtained from Council’s City Works and Infrastructure confirming that all works in the road reserve including all public domain improvement works and restoration of infrastructure assets that have been dilapidated as a result of the development works, have been completed to Council’s satisfaction and in accordance with the Council approved drawings. The applicant shall be liable for the payment of the fee associated with the issuing of this certificate.
140. **Compliance report** - A report from a qualified acoustical consultant demonstrating compliance with the relevant noise criteria must be submitted to the Principal Certifying Authority before the issue of an Occupation Certificate.
141. **Compliance report** - A report from a qualified acoustical consultant demonstrating compliance with the relevant noise and vibration criteria must be submitted to the Principal Certifying Authority (and Council, if Council is not the PCA) before the issue of an Occupation Certificate.
142. **Garbage Service.** Suitable arrangements must be made with the City of Ryde Council for the provision of garbage services to the premises prior to the issue of any Occupation Certificate. Council does not support the use of private contractors for the collection of domestic waste. All domestic waste will be collected by the Council waste collection contractor.
143. **CCTV Cameras.** CCTV cameras will be required to be installed throughout the site. The cameras should include the foyer area to the buildings including the area around the mail boxes. The cameras should also monitor the 50 metre vicinity outside the building including, but not limited to, the footpath area in front of the premises. CCTV cameras should also cover any communal areas, lifts, public spaces, pedestrian link and the basement car parks, including the entry and exit points to the car park. Recordings should be made twenty four (24) hours a day seven (7) days a week.

As a minimum, CCTV cameras at entry and exit points to the premises **MUST** record footage of a nature and quality in which it can be used to identify a person recorded by the camera. All other cameras **MUST** record footage of a nature and quality in which it can be used to recognise a person recorded by the camera. The time and date must automatically be recorded on all recordings made whilst it is recording. All recordings are to be kept for a minimum period of thirty (30) days before they can be reused or destroyed.

If requested by police, the applicant is to archive any recording until such time as they are no longer required. Recordings are to be made in a common media format such as Windows Media Player or similar, or should be accompanied by applicable viewing software to enable viewing on any windows computer.

The CCTV control system should be located within a secured area of the premise and only accessible by authorised personnel. If the CCTV system is not operational,

immediate steps are to be taken by the applicant to ensure that it is returned to a fully operational condition as soon as possible.

Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of an Occupation Certificate.

144. **Car parking security.** Vehicular entry to residential parking and visitor's parking areas is to be through a secured roller shutter with an intercom system for visitor's access. The doors are to be controlled by locksets such as remote or card operating electronic lock sets. The phasing of the roller door needs to minimise the opportunity for unauthorised pedestrian access after a vehicle enters/exits the car park. Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of an Occupation Certificate.

145. **Graffiti.** All surfaces on the street level that are not glass should use graffiti resistant paints and/or other surfaces that discourage graffiti. A maintenance policy should be established for graffiti to be painted over within two a week of the graffiti.

Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of an Occupation Certificate.

146. **Security.** To enhance the physical security of doors, all glass doors are to be laminated and the main entry/exit doors to individual units on the ground floor, including balcony doors and fire exit doors to the development are to be fitted with a single cylinder lockset (Australian and New Zealand Standard - Lock Sets), which comply with the Building Code of Australia. Windows to individual units on the ground floor should also be fitted with key operated locksets (Australia and New Zealand Standard - Lock Sets) to restrict unauthorized access to the unit.

Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of an Occupation Certificate.

147. **Intercom System.** Intercom facilities should be incorporated into these entry/exit points to enable residents to communicate and identify with people prior to admitting them to the development. An auxiliary lock set should also be incorporated into the design of each of the entry/exit points to enable emergency services to access the development particularly in emergency situations.

Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of an Occupation Certificate.

148. **Balcony doors to units.** Balcony doors to units are to be fitted with single cylinder locksets (Australian and New Zealand Standard – Lock Sets) to restrict unauthorised access to units. Details demonstrating compliance are to be submitted to the Principal Certifying Authority prior to the issue of an Occupation Certificate.

OPERATIONAL

149. **Parking Allocation.** Both the owner and occupier of the development must provide and maintain the minimum parking allocation as follows;
- Min. 10 residential spaces
 - 3 visitor spaces
 - 2 bicycle parking spaces.
150. **Letterboxes and street/house numbering.** All letterboxes and house numbering are to be designed and constructed to be accessible from the public way. Council must be contacted in relation to any specific requirements for street numbering.
151. **Waste Collection.** Council does not support the use of private contractors for the collection of domestic waste. All domestic waste will be collected by the Council waste collection contractor. .
152. **Signs within the garbage area.** Signs will be required to be placed within the bin area to encourage correct recycling and reduce contamination. City of Ryde will provide the required signage.
153. **Storage and disposal of wastes.** All wastes generated on the premises must be stored and disposed of in an environmentally acceptable manner. Waste storage areas must be maintained in a clean and tidy condition at all times.
154. **Waste containers.** An adequate number of suitable waste containers must be kept on the premises for the storage of garbage and trade waste. Garbage and recycling bins must always be stored on-site between collections.
155. **Recyclable wastes.** Wastes for recycling must be stored in separate bins or containers and be transported to a facility where the wastes will be recycled or re-used.
156. **Transfer of waste containers to emptying point.** Staff or contractors must be employed to take the waste containers from the garbage room or waste storage area to the container emptying point for servicing and to return the containers to the garbage room or waste storage area after servicing.

All material in the bulky items/hard waste storage rooms is to be taken to the collection area stipulated by Council, by the staff or contractors. The material is to be placed in such a manner so that it will not impede the access to any bins from a side arm waste collection vehicle or pedestrian access”

Staff or contractors must be employed to take the waste containers from garbage and recycling room to the container emptying point for servicing and to return the containers to the garbage room after servicing.

157. **Trade waste permit** - The applicant must contact Sydney Water Corporation to determine whether a Trade Waste Permit is required before discharging any trade wastewater to the sewerage system.

158. **Maintenance of waste storage areas** - All waste storage areas must be maintained in a clean and tidy condition at all times.
159. **Offensive noise** - The use of the premises must not cause the emission of 'offensive noise' as defined in the *Protection of the Environment Operations Act 1997*.
160. **Noise and vibration from plant or equipment** - Unless otherwise provided in this Consent, the operation of any plant or equipment installed on the premises must not cause:
- (a) The emission of noise that exceeds the background noise level by more than 5dBA when measured at, or computed for, the most affected point, on or within the boundary of the most affected receiver. Modifying factor corrections must be applied for tonal, impulsive, low frequency or intermittent noise in accordance with the *New South Wales Industrial Noise Policy* (EPA, 2000).
 - (b) An internal noise level in any adjoining occupancy that exceeds the recommended design sound levels specified in Australian/New Zealand Standard AS/NZS 2107:2000 *Acoustics – Recommended design sound levels and reverberation times for building interiors*.
 - (c) The transmission of vibration to any place of different occupancy.