

# 12360 - North Penrith Stages 2B & 2C Development Application

## RESPONSE TO AGENCY SUBMISSIONS



Response	
DEPARTMENT OF PLANNING AND INFRASTRUCTURE	
<ul style="list-style-type: none"> <li>Section 6.1 of the EIS for Stages 2B &amp; 2C state zonings for Stages 2B and 2C only include General Residential (R1) and Public Recreation (RE1). However, land use zones included in Stage 2B also include Local Centre (B2) zoning and Light Industry (IN2). Please include these zones in the EIS for Stage 2B &amp; 2C and discuss permissibility of the proposal in consideration of the objectives of these zones.</li> </ul>	<ul style="list-style-type: none"> <li>The Executive Summary within the Stage 2B and 2C EIS notes that the site is located in zones R1 General Residential, RE1 Public Recreation and IN2 Light Industrial under the <i>Penrith City Centre Local Environment Plan 2008</i>. The EIS states the proposal is permissible with development consent and meets the objectives of the zonings.</li> <li>In addition, a small section of the Stage 2B proposed roads is located within the B2 Local Centre Zone. The proposed development is permissible with consent in the B2 zone and is consistent with the objectives of the zoning in that it will provide a range of uses to serve the needs of people who live, work and visit the area and will facilitate public transport as well as encouraging walking and cycling.</li> </ul>
<ul style="list-style-type: none"> <li>The Statement of Commitments includes a commitment to provide 'direct and safe cycle and pedestrian routes from Coreen Avenue to Penrith Station (north side)'. However, the present proposal removes the cycle lane on Combewood Avenue, between Coreen Avenue and Thornton Drive. Please provide a plan of the entire site but in particular Stages 2B, 2C, 2D and 3B that clarifies the cycle lanes or shared pathways from Coreen Avenue to Penrith Station.</li> </ul>	<ul style="list-style-type: none"> <li>A dedicated cycleway from Coreen Avenue is provided through Stage 1 and will ultimately connect to Penrith Station through Stage 3A. This cycleway services the residential catchment to the north-east of the site with the most direct cycle route to the station. Refer to Plan No 9470/DA90.</li> <li>There is an existing cycleway on Castlereagh Road and it was determined that it was safer and more efficient to link the development to this cycleway via Thornton Drive. This route will provide access to the station from catchments to the west of the site. Also, Combewood Avenue is constrained by an existing 15 metre road reservation outside the site boundary and this restricts the ability to safely integrate a cycleway.</li> </ul>

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PENRITH CITY COUNCIL	
Access, Traffic and Transport	
<ul style="list-style-type: none"> <li>The proposed right turn bay length on Grace Drive for the turning movement onto Castlereagh Road should be extended to cater for traffic growth. Current storage is insufficient and the North Penrith development will generate a need for extending turning provision. In this regard, the current median should be fully utilised to cater for traffic growth.</li> </ul>	<ul style="list-style-type: none"> <li>The design for the right turn bay had been modified in response and a revised plan no. 9470/DA03 is included as part of the revised engineering drawings.</li> </ul>
<ul style="list-style-type: none"> <li>It is unclear if a shared path is provided on Thornton Drive into estate. A minimum 2.5m wide shared path is required connecting the existing Grace Drive to Thornton Drive. It is preferable that this is provided on the northern side.</li> </ul>	<ul style="list-style-type: none"> <li>The configuration of cycle and pedestrian access on Thornton Drive has been modified to include a 2.5m shared path on the northern side.</li> </ul>
<ul style="list-style-type: none"> <li>Concern that the intersection of Combewood Avenue and Thornton Drive will not cater for short to medium term traffic volumes. A give-way controlled median island arrangement is not considered sufficient, and a roundabout controlled intersection should be provided in order to cater for traffic growth of the development and to provide adequate residential amenity.</li> </ul>	<ul style="list-style-type: none"> <li>This matter has been comprehensively addressed in the Concept Plan and Traffic and Transport Assessment submitted with the EIS. The configuration of the intersection is consistent with the approved Concept Plan.</li> <li>Parsons Brinckerhoff have undertaken traffic analysis of this intersection using the SIDRA Intersection modelling software for the 2026 future year ultimate design scenario. The results indicate that the proposed give-way controlled intersection has ample traffic capacity to cater for future growth.</li> </ul>
<ul style="list-style-type: none"> <li>The creation of a right turn bay from Richmond Road into Coreen Avenue and the installation of a seagull treatment on Coreen Avenue at the eastern intersection with Coombes Drive is requested up front to cater for anticipated traffic movements associated with the development.</li> </ul>	<ul style="list-style-type: none"> <li>The Coreen Avenue / Richmond Road intersection is currently being discussed with RMS.</li> <li>The timing of the seagull intersection treatment at Coreen Avenue and Coombes Drive is linked to Stage 3A under the approved Concept Plan (note reference to Stage 2A in Concept Plan now modified to Stage 3A). This will be addressed as part of the application for Stage 3A.</li> </ul>

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Water Cycle Management	
<ul style="list-style-type: none"> <li>The development shall be undertaken in accordance with the proposed management actions outlined in the '<i>North Penrith Stages 2B-3B Water Cycle Management Strategy Report Incorporating Water Sensitive Urban Design Techniques</i>' dated 17 October 2012 and prepared by J. Wyndham Prince</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> <li>An updated report is included in this response at <b>Appendix D</b> of the Response to Submissions.</li> </ul>
<ul style="list-style-type: none"> <li>No details provided regarding the proposed GPTs. Council recommend they are not visible and that access for maintenance is appropriate for Council's maintenance fleet. Design considerations should include but not limited to the following:                             <ul style="list-style-type: none"> <li>All GPTs should be sized to ensure that they can treat the 3 month to 1 year ARI flow.</li> <li>As the GPTs are to be designed for the pre-treatment of a wetland, it is important that they be designed to remove coarse sediment loads.</li> <li>All GPTs should be designed to ensure there is no risk of increased flooding upstream of the GPT.</li> </ul> </li> <li>Council should be given an opportunity to review and approve the proposed GPTs so that life cycle costs and maintenance issues can be considered. The proponent should provide Council with a detailed operation and maintenance manual which includes estimated costing.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. This matter can be dealt with through the Department's standard conditions of consent.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed channel is likely to have limited water quality benefits due to its design and lack of vegetation.</li> </ul>	<ul style="list-style-type: none"> <li>The central water feature and wetland have been designed as an integrated system to meet relevant water quality targets, as detailed and confirmed by the Water Cycle Management report.</li> </ul>
<ul style="list-style-type: none"> <li>There is likely to be an issue with sedimentation of the channel which will ultimately result in long term management issues with regard to algae growth. Detention ponds such as the one propose are commonly associated with algae management and unwanted vegetation management issues. The proposed water reticulation system and reliability of aerators will be critical to effective management of the canal and failure would likely result in management issues.</li> </ul>	<ul style="list-style-type: none"> <li>The inclusion of GPT's at all discharge points into the central water feature will reduce the sediment load entering the system. The system has been designed with best practice management principles and is considered to be a robust and functional system to manage algal growth.</li> </ul>

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<ul style="list-style-type: none"> <li>The channel is also likely to act as a sediment basin; adequate access is essential for maintenance and to enable removal of sediment and other materials. Measures to remove floating litter and other waste material should also be factored into the detailed design stage and final construction.</li> </ul>	<ul style="list-style-type: none"> <li>The design has incorporated locations where floating litter can be collected collect and can be easily removed.</li> <li>Maintenance access has already been incorporated into the design and is detailed on drawing 9474/ DA18.</li> </ul>
<ul style="list-style-type: none"> <li>A detailed operational and management manual for the operation of the pumps, aerators, reticulation systems and management of the canal should be submitted to Council for approval before the handover of the assets.</li> </ul>	<ul style="list-style-type: none"> <li>An operational and management manual will form part of the CC documentation for the works. All manufacturer's operational and maintenance information will be provided to Council at the completion of works.</li> </ul>
<ul style="list-style-type: none"> <li>To ensure that the macrophyte zone functions efficiently, flows that pass through the vegetation must be evenly distributed. Dense vegetation growth is also required to dissipate flows and to support efficient filtration. Appropriate outlet structures are required to accommodate flow and water level variations and maximum velocities.</li> </ul>	<ul style="list-style-type: none"> <li>It is anticipated that velocity within the central water feature will likely be less than 2 m/s. The design already includes appropriate measures (flow split) to ensure the distribution of flows into the macrophyte zones. Outlet structures are already included in the design.</li> </ul>
<ul style="list-style-type: none"> <li>The wetland should be constructed to achieve a 72 hour detention time; the macrophyte zone outlet orifice must be sized accordingly. In order to demonstrate that adequate detention time is achieved within the wetland, monitoring should be undertaken to assess the performance of the wetland during the three year period prior to handover to Council. The wetland should also be constructed and managed to eliminate mosquito habitat and to encourage mosquito predators. Details of the proposed management strategies should also be provided in the operation and maintenance plan.</li> </ul>	<ul style="list-style-type: none"> <li>The design already includes a 72 hour detention time.</li> <li>The circulation of water through the wetland as part of the operation of the integrated system will assist in restricting mosquitos.</li> <li>Maintenance and operation is discussed in further detail below.</li> </ul>
<ul style="list-style-type: none"> <li>Adequate access should be provided to ensure that maintenance of the wetland can be undertaken. A detailed operation and maintenance plan should be developed and it should outline how operation and maintenance issues have been appropriately considered in the development of the WSUD strategy.</li> </ul>	<ul style="list-style-type: none"> <li>Maintenance access already forms part of the design and is detailed on drawing 9474/DA19.</li> <li>An operational and management manual will form part of the CC documentation for the works. All manufacturer's operational and maintenance information will be provided to Council at the completion of works.</li> </ul>

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<ul style="list-style-type: none"> <li>A water monitoring program should be developed by UrbanGrowth, approved by Council, and implemented during the period prior to the handover of assets to Council. The program should include monthly sampling and regular reports should be furnished to Council. Details of the required indicator's are identified in Council's submission.</li> </ul>	<ul style="list-style-type: none"> <li>UrbanGrowth NSW is willing to undertake an appropriate water quality monitoring program, however the specific requirements proposed by Council are considered excessive.</li> <li>The following condition is proposed: 'The applicant will implement a water quality monitoring program during the maintenance period. The monitoring program is to be prepared by a suitably qualified expert and details of the program are to be submitted to Council for comment prior to commencement of the maintenance period.</li> </ul>
<ul style="list-style-type: none"> <li>An operation and maintenance plan which includes details on the proposed water quality monitoring program should be provided to Council for consideration and approval prior to the handover of the assets to Council. Details of the plan's content are identified in Council's submission.</li> </ul>	<ul style="list-style-type: none"> <li>An operational and management manual will form part of the CC documentation for the works. All manufacturer's operational and maintenance information will be provided to Council at the completion of works.</li> </ul>
<ul style="list-style-type: none"> <li>Handover of assets to Council should not occur before a minimum of 3 years have passed.</li> </ul>	<ul style="list-style-type: none"> <li>The Mitigation Measures confirm UrbanGrowth NSW's commitment to maintain any local drainage and stormwater infrastructure for a period of 36 months from the date of practical completion of the works.</li> <li>The commitment to hold local infrastructure is also confirmed by the Maintenance Schedule submitted with the approved Concept Plan.</li> </ul>
<b>Environmental Matters</b>	
<ul style="list-style-type: none"> <li>The development has a number of contamination protocols in place and the overall issues of contamination will be overseen by a Site Auditor. As such, no concerns are raised in relation to land contamination for this development.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>Council considers that noise and vibration issues during construction are adequately dealt with through the adopted Construction Environmental Management Plan for the development.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>

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<ul style="list-style-type: none"><li>Clarification should be provided on how road and railway noise is going to be managed for the future dwellings and buildings within this development. In particular:<ul style="list-style-type: none"><li>road traffic noise from the new internal roadways on future dwellings; and</li><li>railway noise on future dwellings within the development.</li></ul></li></ul>	<ul style="list-style-type: none"><li>The Development Near Rail Corridors and Busy Roads – Interim Guidelines were considered during preparation of the EIS. The nature of development for which consent is sought has not triggered those Guidelines.</li><li>Section 3.8(6) of the approved North Penrith Design Guidelines also require future dwellings in close proximity to the railway corridor and Coreen Avenue to include design measures to achieve internal noise targets of 35 dBA) LAeq in sleeping areas and 40 dBA) LAeq in other living areas.</li><li>The detailed design of future dwellings will therefore need to address Section 3.8(6) of the Design Guidelines and where necessary incorporate mitigation measures such as glazing and screening to achieve the target noise levels.</li></ul>
<ul style="list-style-type: none"><li>The CEMP is comprehensive and satisfactorily addresses the key environmental management aspects of the development. However, the following additional information should be incorporated into the CEMP:<ul style="list-style-type: none"><li>additional procedures should be added to the CEMP to address reports received by Council that following storm events the site dewater heavily sediment laden water into the stormwater system.</li><li>clarification as to how often the environmental audits identified in the CEMP will be undertaken.</li></ul></li></ul>	<ul style="list-style-type: none"><li>The CEMP can be updated prior to construction commencing. This can be addressed as a condition of consent.</li></ul>
<ul style="list-style-type: none"><li>There does not seem to be any information or assessment regarding the potential conflict between the proposed residential dwellings on the north-west part of the site and the adjoining Mobil fuel storage depot.</li></ul>	<ul style="list-style-type: none"><li>This is not relevant for Stages 2B and 2C as the Mobil fuel storage depot site does not extend to the north-west boundary of the Stage 2C site. The Mobil fuel depot abuts the Stage 2D site. Please refer to the Stage 2D EIS for further assessment.</li></ul>

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Public Health Matters	
<ul style="list-style-type: none"> <li>▪ Council's submission contains recommended conditions of consent to address: <ul style="list-style-type: none"> <li>▪ temporary food stalls and mobile food vendors within recreation areas;</li> <li>▪ the need for water from fountains is potable and the fountains are maintained in good working order and in a clean condition; and</li> <li>▪ specification and management of aeration devices as part of the water feature to aide against legionella dispersal.</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. UrbanGrowth NSW has reviewed Penrith City Council's recommended conditions of consent and generally has no objection to the matters covered by Council's recommended conditions being dealt with through the Department's standard conditions of consent.</li> </ul>
Safety, Security and Crime Prevention	
<ul style="list-style-type: none"> <li>▪ Residential lot designs should provide natural surveillance of rear laneways by ensuring buildings have windows facing the laneways and public spaces</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. This matter will be dealt with individual Development Applications for dwellings.</li> </ul>
<ul style="list-style-type: none"> <li>▪ Surfaces throughout (stairs, retaining walls, promenade, etc) shall be anti-graffiti coated or made of materials suitable for graffiti removal (i.e. surfaces that won't erode if high pressure cleaned). Sandstone clad walls present a challenge in terms of graffiti removal and erosion and should be appropriately anti-graffiti coated.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. To be addressed in construction certificate</li> </ul>
<ul style="list-style-type: none"> <li>▪ Pedestrian walkways shall provide good sight lines and be clear of obstruction to maximise natural surveillance and minimise entrapment spots or opportunities to hide. As the walkways will be at a lower elevation to the adjacent street, clear sight lines down the slope of the land are critical.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. To be addressed in construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>▪ If walkways are intended for night time use, adequate pedestrian level lighting will be required.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. To be addressed in construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>▪ All vegetation alongside pedestrian networks shall have high canopies or be low in height to maximise surveillance.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. To be addressed in construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>▪ Clear definition and good access control between public space and residential space is important, particularly where the boundaries are close.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted. To be addressed in construction certificate.</li> </ul>

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<ul style="list-style-type: none"> <li>Surfaces throughout shall be anti-graffiti coated or made of materials suitable for graffiti removal.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. To be addressed in construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>All shelters shall be located in positions with good surveillance from surrounding properties, whilst protecting the amenity of nearby residents.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. To be addressed in construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>All public art and public furniture (benches, barbeques, etc) shall be made of durable, vandal resistant materials with anti-graffiti coating applied.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. To be addressed in construction certificate.</li> </ul>
<b>Social Planning Matters</b>	
<ul style="list-style-type: none"> <li>Council welcomes Landcom's commitment to deliver 44 affordable housing dwellings, 44 adaptable housing dwellings and 100 dwellings for older people at the North Penrith site.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>No objection is raised to the proposed delivery approach which involves Landcom selecting an aged housing provider at the next stage of planning. Council supports the idea that the size and specific location of the site for aged housing will depend on the housing and care delivery model of the selected provider.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>Council's Community and Cultural Development staff has ample knowledge and understanding of the housing needs of older people in Penrith and would welcome the opportunity to work closely with Landcom during the planning process. The expertise and local knowledge of Council staff will assist Landcom in achieving the best outcome for the project.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. UrbanGrowth NSW is committed to working collaboratively with Penrith City Council and will continue to discuss the project with Council in due course.</li> </ul>
<ul style="list-style-type: none"> <li>The delivery of 44 affordable rental dwellings in North Penrith to be managed by a community housing provider is supported. It is recommended that the 44 affordable housing dwellings will be different housing types to suit the diverse housing needs of families.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The location and distribution of these 44 dwellings need to be carefully considered. It is strongly recommended that the dwellings be evenly distributed and located across the whole development. The concentration of all of these dwellings within one location is not recommended.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>



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Public Art	
<ul style="list-style-type: none"> <li>The public art works will require foundation and structural engineering details for approval.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. To be addressed in construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>Council's submission identifies particular specifications for glass elements.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. Appropriate details will be provided as part of the construction certificate. The inclusion of these items as conditions of consent is considered unnecessary and could unduly constrain the design process for the public art.</li> <li>Council should take comfort it will be the certifying authority for the public art.</li> </ul>
Flooding	
<ul style="list-style-type: none"> <li>The Department is reminded of Council's submissions regarding the proposal to alter the approved Penrith Lakes Scheme, particularly the reduction in the number of interface weirs. Council has urged the Department to ensure that the delivery of the Penrith Lakes Scheme does not compromise the Flood Planning Levels for surrounding lands including those that have been established for the North Penrith site. It is critical that this issue is taken into account as part of any project approval relating to these stages of the North Penrith development.</li> </ul>	<ul style="list-style-type: none"> <li>The application complies with flood planning levels approved under the Concept Plan.</li> <li>Any issues relating to the Penrith Lakes Scheme are not relevant to this application.</li> </ul>
Engineering Matters	
<ul style="list-style-type: none"> <li>One corner of the Coreen Avenue roundabout is to be widened to accommodate turning for large vehicles. The boundary of the Mobil fuel storage depot site encroaches into the vicinity of this area and hence some land acquisition is required to widen the corner of the roundabout.</li> </ul>	<ul style="list-style-type: none"> <li>The requirement for potential widening of this roundabout is related to the future supermarket within the Stage 3A area and is therefore not relevant to this application. This matter will be dealt with as part of the Stage 3A application.</li> <li>However, it must be noted that UrbanGrowth NSW cannot be required to acquire private land for road widening.</li> </ul>
<ul style="list-style-type: none"> <li>Council's submission contains recommended conditions of consent.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. This matter can be dealt with through the Department's standard conditions of consent.</li> </ul>

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Subdivision Matters	
<ul style="list-style-type: none"> <li>Penrith City Council shall be appointed as the PCA for the subdivisions and related works.</li> </ul>	<ul style="list-style-type: none"> <li>Noted and agreed. UrbanGrowth NSW is committed to continuing its strong working relationship with Penrith City Council and will appoint Council as the PCA for the subdivision and related works.</li> </ul>
<ul style="list-style-type: none"> <li>Council's submission contains recommended conditions of consent.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. UrbanGrowth NSW has reviewed Penrith City Council's recommended conditions of consent and generally has no objection to the matters covered by Council's recommended conditions being dealt with through the Department's standard conditions of consent.</li> </ul>
Landscape and Public Domain	
<ul style="list-style-type: none"> <li>A maintenance plan shall be provided for any Construction Certificate approval for landscape elements for general maintenance and asset renewal purposes. Costs should also be included.</li> </ul>	<ul style="list-style-type: none"> <li>UrbanGrowth NSW prepared and submitted a maintenance schedule during preparation of the approved Concept Plan</li> <li>The Schedule confirms UrbanGrowth NSW's intention to fund the initial set up (construction and embellishment) costs, and subsequently maintain open space areas. Accordingly, UrbanGrowth NSW will hold the associated maintenance costs for a period of 36 months. The Maintenance Schedule indicates that the ongoing costs to Council will be minimal post handover. Council has previously reviewed the Schedule and advised that the costings are acceptable.</li> </ul>
<ul style="list-style-type: none"> <li>In relation to the Castlereagh Road intersection works, the proposal to remove screen planting should be replaced by an alternative treatment to screen the sub-station site.</li> </ul>	<ul style="list-style-type: none"> <li>A shared path has been on the northern side of Thornton Drive. This means that the proposed cycleway on the southern side is not required and there is no need to remove the existing screening vegetation.</li> </ul>
<ul style="list-style-type: none"> <li>There are no details provided of the upgrade of the existing Coreen Avenue roundabout.</li> </ul>	<ul style="list-style-type: none"> <li>This is linked to Stage 3A and will be dealt with as part of that application.</li> </ul>

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<ul style="list-style-type: none"> <li>Street cross sections are inconsistent with Council standards. Council's standard is 1.5m, however this path in a 3.6m verge means there is insufficient space for street trees. Also, there are both 3.8m and 3.9m verge widths.</li> </ul>	<ul style="list-style-type: none"> <li>The proposed street cross sections are consistent with those approved under the Concept Plan Approval. There are only minor adjustments where new street cross sections need to integrate with existing conditions (such as on Thornton Drive and on Combewood Avenue at the interface with the commuter car park).</li> <li>1.5m footpaths are provided in all locations, and street trees are still provided within the 3.6 verge.</li> </ul>
<ul style="list-style-type: none"> <li>Street trees should take into account and not compromise the levels of lighting from street lights.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>In relation to Water's Edge, details of tree species and their planting method are required for Council's assurance that the root zones of the maturing trees will not damage retaining wall, planter wall, canal wall and path infrastructure.</li> </ul>	<ul style="list-style-type: none"> <li>Tree species have already been selected with consideration of non-invasive root systems. The planting methodology will be further investigated as part of the construction certificate design.</li> </ul>
<ul style="list-style-type: none"> <li>Fencing details should be provided. Council requires assurance that opportunities for graffiti are minimised and surrounding streetscape amenity is not compromised by the height and scale of fencing.</li> </ul>	<ul style="list-style-type: none"> <li>The area within Staged 2B and 2C that is fenced is the perimeter of the wetland area. Fencing is shown in the new landscape plans provided as part of this Response to Submissions Report. Detail design of the fencing will be provided at Construction Certificate.</li> </ul>
<ul style="list-style-type: none"> <li>Combewood Avenue may not require a footpath on the western side, south of Thornton Drive, as it will not connect to an existing path at the Fire Museum site. The design for Combewood Avenue should integrate with existing conditions adjacent to the car park site in terms of street tree species and paths and shared cycleway.</li> </ul>	<ul style="list-style-type: none"> <li>The footpath on the western side of Combewood Avenue has been removed as per this comment as shown on Plan No 9470/DA09.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed plant species selected for the Woodrow Way median requires detailed consultation with Council.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>Council generally supports a mix of native and exotic species. Council requests more native species be included in the planting palettes for the development to respond to the locality, assist native birdlife and add to biodiversity generally.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. To be addressed in construction certificate.</li> </ul>

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### RESPONSE TO AGENCY SUBMISSIONS

<ul style="list-style-type: none"> <li>More detail is required in relation to the materials palette, and particularly pavement materials. Specifications and construction details require Council sign off and are also required for asset renewal and maintenance programs. Alternative materials to timber for the boardwalk and deck are to be considered as Council consistently encounters fire vandalism to timber structures in the LGA.</li> </ul>	<ul style="list-style-type: none"> <li>The proposed materials palette and specifically the incorporation of timber viewing decks and boardwalks is consistent with the approved Concept Plan and also works now delivered as part of Stage 1. It is important to maintain a continuity of materials across all stages for the overall cohesiveness of the public domain.</li> <li>Notwithstanding the above, UrbanGrowth NSW will explore opportunities to reduce the extent of timber decking during the detailed construction certificate design.</li> </ul>
<ul style="list-style-type: none"> <li>In relation to the furniture palette, Council does not support lighting bollards (ineffective lighting levels and vandalism). Bollards should include luminance contrast strips (as required by AS 1428). An adequate proportion of seats with backs should also include arm rests. Council does not support timber as a material used in shelters (fire vandalism). Throughout the LGA, Council has adopted and is implementing stainless or galvanised steel circular hoops as attachments to street posts as a form of cycle rack and this should be considered for North Penrith.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. These matters can be addressed as part of the construction certificate.</li> </ul>
<ul style="list-style-type: none"> <li>Council's submission contains recommended conditions of consent.</li> </ul>	<ul style="list-style-type: none"> <li>The recommended conditions include a requirement that the 'applicant shall also provide to Council a deed of agreement indemnifying Council for the duration of the maintenance period (36 months) plus an additional 12 months. This condition is vague as it is unclear as to what UrbanGrowth NSW would be indemnifying Council for, and it is also unreasonable for any indemnity to extend beyond the duration of the maintenance period. The following wording is proposed as an appropriate condition: 'The applicant will provide a deed of agreement to Council that details public liability insurance to a minimum of \$20 million and indemnities for personal and property loss for the duration of the maintenance period'.</li> <li>Notwithstanding the above, UrbanGrowth NSW generally has no objection to the matters covered by Council's recommended conditions being dealt with through the Department's standard conditions of consent.</li> </ul>

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## RESPONSE TO AGENCY SUBMISSIONS

Heritage	
<ul style="list-style-type: none"><li>The recommendations of the Non-Indigenous Archaeological Testing Results prepared by Casey &amp; Lowe and dated October 2012 shall be implemented as part of Stage 2B.</li></ul>	<ul style="list-style-type: none"><li>Noted.</li></ul>
NSW HERITAGE BRANCH	
<ul style="list-style-type: none"><li>An updated Heritage Interpretation Study should be undertaken by an appropriately qualified interpretation specialist and be subject to review prior to approval of this project by DPI.</li></ul>	<ul style="list-style-type: none"><li>A detailed Heritage Interpretation Strategy forms part of the approved Concept Plan. The author of the Interpretation Strategy has remained involved in the project and reviewed each stage for consistency with the Strategy. Heritage interpretation is being successfully implemented across the site is being achieved by virtue of street and open space naming, public art and creation of view corridors. The preparation of an updated Heritage Interpretation is unnecessary and unwarranted.</li></ul>
NSW OFFICE OF WATER	
<ul style="list-style-type: none"><li>The Geotechnical Report for Stages 2B and 2C confirm the construction of the wetland and canal water feature should not intersect with groundwater but note they will be constructed with an impervious lining to avoid any interaction between water bodies and ground water (see page 10).</li><li>However, if groundwater is proposed to be intercepted or extracted, the applicant will be required to hold sufficient licensed entitlement to account for the annual volume within the groundwater source in accordance with the Water Sharing Plan and the trading rules for Hawkesbury Alluvium Groundwater Source.</li></ul>	<ul style="list-style-type: none"><li>UrbanGrowth NSW confirms that there is no intention to intercept or use groundwater during either the construction or operation of the proposed Stage 3B development. The EIS had simply sought to recognise that in the very unlikely event that groundwater was unexpectedly intercepted, UrbanGrowth NSW understood that it would be required to obtain an approval under the Water Management Act, 2000.</li><li>Further design undertaken since exhibition of the EIS has now confirmed that drilling and piling will not encounter groundwater. This will be confirmed by the Construction Certificate documentation, when finalised and submitted to the Private Certifying Authority, prior to commencement of works.</li></ul>

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## RESPONSE TO AGENCY SUBMISSIONS

<ul style="list-style-type: none"> <li>Depending on the volumes encountered and the duration of the pumping, a license may be required under Part 5 of the <i>Water Act, 1912</i> in relation to the construction excavation/dewatering activities.</li> </ul>	<ul style="list-style-type: none"> <li>As above and noted.</li> </ul>
<b>EPA</b>	
<ul style="list-style-type: none"> <li>EPA's submission contains recommended conditions of consent.</li> </ul>	<ul style="list-style-type: none"> <li>UrbanGrowth NSW has reviewed the EPA's recommended conditions of consent and generally has no objection to the matters covered by the EPA's recommended conditions being dealt with through the Department's standard conditions of consent.</li> </ul>
<ul style="list-style-type: none"> <li>The development sewerage reticulation system ( including any main, sewerage pump stations and overflow structures) must be completed to the standard necessary to ensure that it would not compromise Sydney Water Corporation's capacity to satisfy the condition of its Penrith sewage treatment system environment protection licence.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<b>NSW OFFICE OF ENVIRONMENT AND HERITAGE</b>	
<ul style="list-style-type: none"> <li>It is recommended that protocols are developed in the event that evidence of Aboriginal occupation is encountered during works.</li> </ul>	<ul style="list-style-type: none"> <li>Noted. This forms part of the CEMP at Appendix P of the original EIS.</li> </ul>
<ul style="list-style-type: none"> <li>Development controls are needed for all development below the flood record (i.e. 1867 flood) or the 200 year flood level in order to limit or avoid structural and contents damage in residential development to an amount which can be endured by individual households, without reliance on flood insurance.</li> </ul>	<ul style="list-style-type: none"> <li>This comment is inconsistent with the flood levels established under the approved Concept Plan.</li> <li>Section 117 Direction issued by the Minister of Planning on 1 July 2009 required that: "A planning proposal must not impose flood related development controls above the residential flood planning level (i.e. 100 year flood level plus appropriate freeboard) for residential development on land, unless a relevant planning authority provides adequate justification for those controls to the satisfaction of the Director-General (or an officer of the Department nominated by the Director-General)." The requirement to impose development controls for "all development below the flood record (i.e. 1867 flood) or the 200 year flood level" is inconsistent with this Ministerial direction.</li> </ul>

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## RESPONSE TO AGENCY SUBMISSIONS

<ul style="list-style-type: none"> <li>▪ The site grading and road layout and road grading needs to provide for staged orderly retreat to high ground away from rising floodwaters.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Constant rising grades are impractical given the flat topography of the site. It is noted that the road network will provide access to higher areas to the east of the site, both via Coreen Avenue and also Mountain View Crescent (part of the approved Stage 2A).</li> </ul>
<ul style="list-style-type: none"> <li>▪ The SES should be consulted to help determine the acceptability of any car based flood evacuation strategy.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Noted.</li> </ul>
<b>ROADS AND MARITIME SERVICES</b>	
<ul style="list-style-type: none"> <li>▪ All works/regulatory signposting associated with the proposed development are to be at no cost to RMS.</li> </ul>	<ul style="list-style-type: none"> <li>▪ This comment appears to be a general statement and is inconsistent with arrangements for some intersection works under the approved Concept Plan.</li> <li>▪ The approved Concept Plan establishes proportional contributions for required intersection upgrades. In relation to this application, the Concept Plan establishes that UrbanGrowth NSW is responsible for 57% of the cost of upgrading the Castlereagh Road/Thornton Drive intersection. As the RMS is responsible for this intersection, RMS would be responsible for funding the balance of the cost.</li> <li>▪ UrbanGrowth NSW is currently negotiating with RMS to finalise arrangements for these works and UrbanGrowth NSW has proposed that its proportional contribution for a number of RMS intersections covered by the Concept Plan be aggregated to enable UrbanGrowth NSW to deliver a single package of works. Under this arrangement, UrbanGrowth NSW would fully fund the works to the Castlereagh Road/Thornton Drive intersection in lieu of making any contribution or undertaking any works at the Coreen Avenue/Richmond Road intersection.</li> <li>▪ It is suggested that this matter can be dealt with by a consent condition of consent as follows:  ‘The applicant will consult with RMS to finalise funding arrangements for the Castlereagh Road/Thornton Drive intersection works. The applicant is to advise the Department of the outcome of these discussions’.</li> </ul>

## 12360 - North Penrith Stages 2B & 2C Development Application



### RESPONSE TO AGENCY SUBMISSIONS

	<ul style="list-style-type: none"> <li>UrbanGrowth NSW notes that new internal roads and intersections within the development will be at no cost to the RMS.</li> </ul>
<ul style="list-style-type: none"> <li>The developer shall be responsible for all public utility adjustment/relocation work necessitated by the above work and as required by the various public utility authorities and/or their agents.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed design of the modified intersection and traffic signals shall be amended to provide a lengthened right turn lane to increase storage capacity in Grace Drive for traffic turning right into Castlereagh Road within the constraints of existing carriageway.</li> </ul>	<ul style="list-style-type: none"> <li>The design for the right turn bay had been modified in response and a revised plan is included.</li> <li>The modified design was tabled at a meeting with the RMS and RMS confirmed the revised design is acceptable.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed modifications to the Grace Drive/Castlereagh Road intersection shall be designed to meet RMS's requirements and endorsed by a suitably qualified practitioner. The design requirements shall be in accordance with AUSTRROADS and other Australian Codes of Practice.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The developer may be required to enter into a Works Authorisation Deed (WAD) for the abovementioned works.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>RMS fees for administration, plan checking, civil works inspections and project management shall be paid by the developer prior to the commencement of work.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>A Construction Traffic Management Plan (TMP) detailing construction vehicle routes, number of trucks, hours of operation, access arrangements and traffic control should be submitted to DPI and RMS for approval prior to the issue of Construction Certificate. The TMP must detail the traffic impact of the construction works on the local area and State Road network and the means proposed to manage construction works to minimise such impacts.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The car parking provision is to be to Council's satisfaction.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>



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## RESPONSE TO AGENCY SUBMISSIONS

<ul style="list-style-type: none"> <li>The layout of proposed car parking areas (including, driveways, grades, turn paths, sight distance requirements, aisle widths, aisle lengths, and parking bay dimensions) should be in accordance with AS 2890.1-2004 and AS 2890.2-2002 for heavy vehicle usage.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The swept path of the longest vehicle (including garbage trucks) entering and exiting subject site, as well manoeuvrability through the site, shall be in accordance with AUSTROADS. A plan shall be submitted to Council for approval demonstrating the development complies with this requirement.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<b>SYDNEY WATER</b>	
<ul style="list-style-type: none"> <li>Landcom should engage a Water Servicing Coordinator to get Section 73 Certificate.</li> </ul>	<ul style="list-style-type: none"> <li>UrbanGrowth NSW will engage a Water Servicing Coordinator to obtain a Section 73 Certificate.</li> </ul>
<ul style="list-style-type: none"> <li>The Southern portion of the subdivision will require an extension from the existing 150mm wastewater main traversing the site.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The northern portion of the development will require extensions from the mains constructed in Stage1. These reticulation mains drain to proposed SPS 1180, which must constructed prior to servicing of the subdivision.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed wastewater infrastructure for this development will be sized and configured according to the Sewerage Code Australia ( Sydney Water Edition WSA 02-2002.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>
<b>TRANSPORT FOR NSW</b>	
<ul style="list-style-type: none"> <li>TransportNSW requests proponent demonstrates that the appropriate management of construction traffic impacts is undertaken with regard to commuters accessing the commuter car park during the reconstruction phase of the existing commuter car park access road.</li> </ul>	<ul style="list-style-type: none"> <li>A draft CEMP was prepared for the EIS, which addresses construction traffic management measures and was provided at Appendix P of the exhibited EIS. The appointed contractor will be required to prepare a detailed CEMP prior to commencement of works which will identify the specific construction traffic issues and mitigation measures associated with the commuter car park, to ensure that development does not result in any adverse impacts. This matter can be dealt with through the Department's standard conditions of consent.</li> </ul>

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## RESPONSE TO AGENCY SUBMISSIONS

<ul style="list-style-type: none"> <li>Proponent is requested to consult with TransportNSW in the preparation of the Construction Traffic Management Plan prior to issue of the Construction Certificate to ensure that provision has been made for adequate information and signage to advise commuters to the temporary change to vehicular access arrangements during road reconstruction.</li> </ul>	<ul style="list-style-type: none"> <li>UrbanGrowth NSW will ensure that the appointed contractor liaises with TransportNSW during the preparation of the final CEMP. This matter can be dealt with through the Department's standard conditions of consent.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed roads and intersections as indicated in Appendix A - Revised Concept Plans of the Modification Report should be designed to accommodate overall bus manoeuvrability and swept paths of buses up to 14.5m in length such that there is no centre line crossing.</li> </ul>	<ul style="list-style-type: none"> <li>The public transport and the bus routes through the North Penrith site were approved under the Concept Plan following proactive investigations by UrbanGrowth NSW with the (then) Ministry of Transport and (then) Roads and Traffic Authority. The Concept Plan Approval provides immediate and long term outcomes to ensure bus routes passing through the North Penrith site link with existing bus connections (refer to Section 6.8.3 of the exhibited Concept Plan EAR). All roads within the North Penrith development are now being designed in accordance with the road typologies and dimensions approved under the Concept Plan.</li> </ul>
<ul style="list-style-type: none"> <li>The proposed widths of some of the roads (2.3-2.5m) and intersection layouts would permanently inhibit buses or larger service vehicles. It is important consideration be given to providing roads and intersections that can support bus manoeuvrability in accordance with the relevant standards.</li> </ul>	<ul style="list-style-type: none"> <li>As above.</li> <li>The relevant roads and intersections for the dedicated bus route approved in the Concept Plan are designed to accommodate bus movements.</li> </ul>
<b>NSW TRADE AND INVESTMENT RESOURCES &amp; ENERGY – MINERAL RESOURCES BRANCH</b>	
<ul style="list-style-type: none"> <li>The Mineral Resources Branch (MRB) has no objection to the North Penrith Mixed Use Development Stages 2A, 2B, 2C, 2D and 3B. Other divisions of NSW Trade and Investment including Agriculture, Fisheries and Forests NSW may provide advice in separate correspondence.</li> </ul>	<ul style="list-style-type: none"> <li>Noted.</li> </ul>