

*Planning and Environment Act 1987*

**Panel Report Addendum**

# Whittlesea Planning Scheme Amendment C241wsea Shenstone Park Precinct Structure Plan

**9 March 2021**

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### How will this report be used?

This is a brief description of how this report will be used for the benefit of people unfamiliar with the planning system. If you have concerns about a specific issue you should seek independent advice.

The planning authority must consider this report before deciding whether or not to adopt the Amendment. [section 27(1) of the *Planning and Environment Act 1987* (the Act)]

For the Amendment to proceed, it must be adopted by the planning authority and then sent to the Minister for Planning for approval.

The planning authority is not obliged to follow the recommendations of the Panel, but it must give its reasons if it does not follow the recommendations. [section 31 (1) of the Act, and section 9 of the *Planning and Environment Regulations 2015*]

If approved by the Minister for Planning a formal change will be made to the planning scheme. Notice of approval of the Amendment will be published in the Government Gazette. [section 37 of the Act]

### *Planning and Environment Act 1987*

Panel Report Addendum pursuant to section 25 of the Act

Whittlesea Planning Scheme Amendment C241wsea

Shenstone Park Precinct Structure Plan

9 March 2021



Sarah Carlisle, Chair



Colin McIntosh, Member



Annabel Paul, Member

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## Addendum

The Panel issued its report Whittlesea PSA C241wsea [2021] PPV on 19 February 2021 (Panel Report). A copy is contained in Appendix A.

On 2 March 2021 the Panel received a memo from the Victorian Planning Authority (VPA) seeking clarification in relation to a number of aspects of the Panel Report. A copy is contained in Appendix B.

The clarifications sought and the Panel's responses are set out below. Some of the clarifications require adjustments to the Panel's consolidated recommendations. Updated consolidated Recommendations are set out below. The changes are consequential on the Panel's original Recommendations, and do not change the intent or the effect of the Recommendations.

This Addendum Report is to be read together with the Panel Report. Terms and abbreviations defined in the glossary of the Panel Report have the same meaning in this Addendum Report.

### Recommendation 2

#### (i) Clarification sought

The VPA's memo states:

##### **Matter**

The Panel has recommended the deletion of the HO to 1030 Donnybrook Road. However, there is no mention of deleting other heritage provisions in UGZ7. This includes application requirements in Section 3.0 in relation to Subdivision Residential Development and Heritage Places.

##### **Clarification sought**

VPA seeking clarification whether the intent is to delete additional heritage provisions in UGZ7 relating to 1030 Donnybrook Road.

#### (ii) Panel's response

Those provisions in the Part C UGZ7 (Document 275(a)) relating directly to the application of the HO to 1030 Donnybrook Road are no longer required and should be deleted. Delete:

- the eighth dot point under the heading 'Subdivision – Residential Development'
- the provisions under the sub-heading 'Heritage Places' and the sub-heading.

Refer to new Recommendation 31 below.

### Recommendation 9

#### (i) Clarification sought

The VPA's memo states:

##### **Matter**

The Panel recommended amending the UGZ7 application requirement and decision guideline to that specified in the VPA's Part A UGZ. The Panel also supported the approach in the VPA's Part B submission in relation to the guideline contained within the PSP. It then also made a recommendation to amend this guideline as per the Part

C PSP. The Panel Report also makes commentary about the Beveridge North West Panel's recommendation, which the Panel supported taking a consistent approach with. It is noted however, that as per the Part A and Part B Submissions Summary Table, the VPA acknowledged they were awaiting the Beveridge North West Panel Report and therefore the position put forward during the Part A and Part B are inconsistent with that of the Beveridge North West Panel Report.

**Clarification sought**

VPA seeking clarification on whether the provisions within UGZ7 and PSP guidelines should be consistent with the recommendations of the Beveridge North West Panel Report, or the VPA's Part A/B version presented as part of the Shenstone Park Panel.

**(ii) Panel's response**

The UGZ7 and PSP guidelines should be consistent with the recommendations of the Beveridge North West Panel. The affordable housing provisions in the VPA's Part A UGZ7 were consistent with the recommendations of the Beveridge North West Panel, but the Guidelines in its Part A PSP were not. Accordingly, the Panel has recommended a new consolidated Guideline based on that recommended by the Beveridge North West Panel. No changes are required to the Panel's consolidated Recommendations.

**Recommendation 14**

**(i) Clarification sought**

The VPA's memo states:

**Matter**

The Panel has recommended updating Plan 3 Future Urban Structure (FUS) with a number of items. A recommendation should also be inserted to amend Plan 1 (Section 1.0) of UGZ7 to be consistent with the recommendations of Recommendation 14.

**Clarification sought**

VPA seeking clarification on whether Plan 1 (Section 1.0) of the UGZ7 is to be amended to be consistent with Recommendation 14.

**(ii) Panel's response**

Plan 1.0 in the UGZ7 (which extracts the FUS) should be amended consistent with the amendments to the FUS. Consolidated Recommendation 14 has been updated accordingly (see below).

**Recommendation 14(a)**

**(i) Clarification sought**

The VPA's memo states:

**Matter**

The Panel recommended amending the FUS to reduce the eastern expansion area. There is no subsequent recommendation to change the zoning map to be consistent with this extent of extractive industry, i.e. to change the extent of the Special Use Zone 4 area to UGZ7.

**Clarification sought**

VPA seeking clarification on whether the zoning map is to be amended to be consistent with Recommendation 14a.

**(ii) Panel's response**

Zoning boundaries (and those of the Incorporated Plan Overlay Schedule 9 (IPO9), which is to apply to the future extractive industries area) should reflect the amended boundaries of the future extractive industries area as recommended by the Panel. Recommendation 14(a) refers to the northern extent of the 'future extractive industries' area. Recommendation 14(b) refers to the eastern extent of the 'future extractive industries' area. The SUZ4 and IPO9 boundaries should be updated to align with both. Refer to new Recommendation 33 below.

**Recommendation 15(b)**

**(i) Clarification sought**

The VPA's memo states:

**Matter**

The Panel recommended amending the boundaries of Conservation Area 28 as approved by DELWP. The Panel does not include a recommendation to amend the zoning map to reflect this change too. Noting that the additional Conservation Area 28 should be zoned as Schedule 1 to the Rural Conservation Zone (RCZ1) and the area to be deleted to be in UGZ7. The same applies for the application of Schedule 9 to the Incorporated Plan Overlay (IPO9) map which needs to be amended to reflect these changes.

**Clarification sought**

VPA seeking clarification as to the Panel's recommendations associated with updates required to the zoning and IPO map as a result of the recommendation relating to amended boundary of Conservation Area 28.

**(ii) Panel's response**

Zoning boundaries (and those of the IPO8, which is to apply to the Conservation Areas) should reflect the amended boundaries of Conservation Area 28. Refer to new Recommendation 34 below.

**Recommendation 17(d)**

**(i) Clarification sought**

The VPA's memo states:

**Matter**

The Panel recommended removing publicly accessible areas such as roads, cycle and pedestrian paths and open space along drainage corridors from within the Blast Buffers.

**Clarification sought**

VPA seeking clarification on whether the word remove be changed to relocate. That is, relocate publicly accessible areas outside the 200m blast buffer.

As a consequence of 17d, does this mean that shared use paths should not follow the drainage corridor if the drainage corridor is inside the blast buffer? Does this also mean the shared use trail is preferred to be located to bisect developable employment land?

**(ii) Panel's response**

If the VPA accepts the Panel's consolidated Recommendation 17(d), and amends the location of the drainage corridor within the Blast Buffer, the relevant sections of the shared user path and publicly accessible open space that were proposed to be collocated with the drainage corridor will need to be realigned. The realignment of the shared user path and the open space are matters for the VPA, and the Panel makes no recommendations about alternative alignments. No changes are required to consolidated Recommendation 17(d).

**Recommendation 19**

**(i) Clarification sought**

The VPA's memo states:

**Matter**

The Panel recommended amending Table 1 Applied Zones of UGZ7. There is no indication to change the designation of the utility facility in this table. It is noted later in the report, but not specifically recommended at any point. In addition, the recommendation should demonstrate that the applied zone for the utility facility west of Langley Park Drive be Industrial 3 Zone (IN3Z) and the applied zone for the utility facility east of Langley Park Drive be Industrial 1 Zone (IN1Z).

**Clarification sought**

VPA seeking clarification as to whether to amend Table 1 Applied zones in the UGZ7 to update the designation of the utility facility, and the appropriate applied Industrial zones.

**(ii) Panel's response**

The Panel recommended in Chapter 6.3 that the Yarra Valley Water land in Langley Park Drive be designated as 'public utility' on the FUS (consolidated Recommendation 14(e)). Consequently, the land will need be shown as 'public utility' on Plan 1.0 in the UGZ7. See updated consolidated Recommendation 14.

As a consequence, an additional entry in Table 1 of the UGZ7 will be required for land shown as 'public utility' on Plan 1.0.

The Panel did not recommend any change to the applied zone for the Yarra Valley Water land in Langley Park Drive, notwithstanding the change in designation to 'public utility' on the FUS. The reasons for this are set out in Chapter 6.6. Accordingly, the new entry in Table 1.0 will need to note the applied zone for the public utility land on the east side of Langley Park Drive as IN1Z, and for the public utility land on the west side of Langley Park Drive as IN3Z. Refer to new recommendation 32 below.

**Recommendation 21**

**(i) Clarification sought**

The VPA's memo states:

**Matter**

The Panel recommended including the Phillips Quarry blast buffer within the application of the blast buffer permit trigger of UGZ7. VPA understands this to ensure that

development of the Wollert Recycled Water Treatment Plant is not compromised by blast buffer provisions in the UGZ7. The VPA also notes that the Phillips Quarry blast buffer also applies to area to the south of the precinct comprising the conservation area, a small portion of industrial land and land set aside to provide for the connection between the two quarries.

The treatment plant is located outside of the PSP area and the UGZ7 area, located within the RCZ1, and therefore the blast buffer provision does not apply to this land. It is noted however, that the southern extent of the Phillips Quarry blast buffer will impact on land within the PSP, and the recommended provisions would apply to those areas.

#### **Clarification sought**

VPA seeking clarity as to whether the Panel acknowledges that the UGZ7 blast buffer permit trigger within the Phillips Quarry blast buffer only applies to a small area of land to the south of the precinct, and not to land identified as the Wollert Recycled Water Treatment Plant outside of the precinct.

The VPA also seeks clarification on recommendations of how it can within the powers and extent of the current amendment implement this provision to the land where the water treatment plan is proposed, if that is the intent.

#### **(ii) Panel's response**

The precise location of the future Wollert Recycled Water Treatment Plant is not yet known.

It could be located outside the precinct on the land zoned RCZ1 to the south of the Woody Hill Quarry (which appears likely but not certain on the basis of the information presented to the Panel), or it could be on land within the PSP. The latter possibility seems to be contemplated by the VPA's Part C schedule to Clause 66.04, which provides for a referral of the permit application for the treatment plant to DJPR under the UGZ7 (which only applied within the precinct).

Both the Woody Hill Quarry Blast Buffer and the Phillips Quarry Blast Buffer apply to land within the precinct, and land outside the precinct. The treatment plant (or part thereof) could be located within either or both Blast Buffers.

The intention of the Panel's consolidated Recommendations 21 and 29 is as follows (assuming that the treatment plant will be located partly or wholly within either Blast Buffer, and whether it is located within or outside the precinct):

- The construction of the treatment plant should not be prohibited by virtue of being located within either Blast Buffer.
- The permit application for the treatment plant should be referred to the Secretary of DJPR, so that impacts of blasting can be considered.

If, as current information suggests, the treatment plant is ultimately located outside the precinct, the prohibition in Clause 2.5 of the UGZ7 would not apply. However, if it is located within the precinct, the exemption for utility installation in Clause 2.5 provided for in the VPA's Part C version needs to extend to both the Woody Hill Quarry Blast Buffer and the Phillips Quarry Blast Buffer. Hence consolidated Recommendation 21.

On the VPA's Part C drafting of the schedule to Clause 66.04, referral to DJPR would only be triggered under the UGZ7 if the treatment plant is located within the precinct. Referral would not be triggered if the treatment plant is located on the RCZ1 land. Further, the VPA's Part C drafting did not refer to the Blast Buffers. The Panel considers referral is only required if the

treatment plant is within the Blast Buffers – not if it is located outside the Blast Buffers. Hence consolidated Recommendation 29.

The Panel does not consider that extending the referral requirement in the VPA's Part C version of the schedule to Clause 66.04 to the RCZ1 as well as the UGZ7 would be beyond the scope of the Amendment, or transform the Amendment. The issue was well ventilated at the Hearing, and the only parties likely to be affected are Yarra Valley Water, Council and DJPR. Yarra Valley Water and Council were present at the Hearing. The VPA presented a whole of government position, which included DJPR.

No changes to the Panel's consolidated Recommendations are required.

## **Recommendation 22**

### **(i) Clarification sought**

The VPA's memo states:

#### **Matter**

The Panel recommended amending the acoustic application area application requirement to be named as an acoustic report for development within the Woody Hill and Phillips Sensitive Use Buffer. The provision as drafted for the Part C version is that the application requirement is applicable to the acoustic application area (beyond the Woody Hill Sensitive Use Buffer), where uses such as accommodation, child care centre, display home, hospital, hotel or bar are permissible under the UGZ7 and the applied zone. However, the Panel has recommended in this instance that the acoustic report apply to development (for those uses listed above) within the Woody Hill Sensitive Use Buffer. The VPA notes however, that these uses under UGZ7 and the applied zones in this area (i.e. IN1Z, IN3Z and C2Z) are not permissible, and hence the provision is redundant with respect to the Woody Hill Sensitive Use Buffer. Noting that the Phillips Quarry Sensitive Use Buffer allows for these uses and therefore the matter for clarification is only in relation to the Woody Hill Sensitive Use Buffer.

#### **Clarification sought**

VPA seeking clarity as to whether the acoustic report application requirement is required for development (as listed) within the Woody Hill Sensitive Use Buffer.

### **(ii) Panel's response**

The intent behind consolidated Recommendation 22 is that any application for a listed sensitive use within either Sensitive Use Buffer be accompanied by an acoustic report. If none of the listed uses are permissible within the Woody Hill Sensitive Use Buffer, the provision need only refer to the Phillips Quarry Sensitive Use Buffer. However on the Panel's review of the applied zones within the Woody Hill Quarry Sensitive Use Buffer, several of the listed sensitive uses are not listed in Section 1 or Section 3, and are therefore Section 2 (permissible) uses. No change to the Panel's consolidated Recommendations are required.

## **Updated consolidated recommendations**

The Panel has updated the consolidated recommendations in the Panel Report to reflect the above clarifications. Changes are highlighted in yellow.

### General recommendations

1. **Adopt Whittlesea Planning Scheme Amendment C245wsea based on the Part C version of the Amendment documents (Document 275), subject to the specific recommendations in this report. [Chapter 4.2]**
2. **Do not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook. [Chapter 10.2]**
3. **Review the buffers as part of each five yearly review of the Precinct Structure Plan having regard to the latest information about the status of the quarry approvals (including extraction limits and activity boundaries), staging and operations. [Chapter 5.8]**

### Changes to the Part C Precinct Structure Plan - text

4. **Update Clause 2.1 Vision to read: [Chapter 9.4]**

The Shenstone Park precinct has been designed taking into account the presence of strategic extractive resources within the Woody Hill and Phillips quarries. The PSP adopts a precautionary, protective approach to avoid encroachment of incompatible land uses that would limit the availability of stone resources. The precautionary, protective approach has been adopted in recognition of the quality and value of the resource being such that the ability to efficiently extract the resource must take precedence over incompatible conventional urban development.

In order to avoid encroachment of incompatible land uses, employment land use has been planned surrounding the Woody Hill Quarry including its potential northern extension. The employment land will act as a 'land use buffer' between the quarry and the sensitive land uses that are planned further north.

The Phillips Quarry lies outside the precinct, but its presence and extraction potential is recognised by the PSP. The PSP seeks to ensure that the southerly extent of urban development (adjacent to conservation area reserve no. 28) will not constrain the opportunity to maximise the extraction of resources in the Phillips Quarry.

5. **Update Clause 2.2 Objectives to include 'Natural Resources' as a separate subsection which includes Objectives O10 and O15 (renumbered as required). [Chapter 9.4]**

6. **Update Objective O15 to read: [Chapter 9.4]**

To provide for the ongoing operation of the Woody Hill Quarry and the establishment and ongoing operation of the Phillips Quarry.

7. **Update Table 1 (Summary Land Use Budget) and section 4.1 (Parcel Specific Land Budget) to remove Properties 1, 2, 3, 7 and 8 (the Yarra Valley Water land in Langley Park Drive, Donnybrook) from the net developable area. [Chapter 16.5]**

8. **Replace Requirement R3 with the following: [Chapter 8.5]**

Subdivision, engineering, landscape design and buildings and works must provide a sensitive response to current landforms and minimise the need

for excavation and cut and fill earthworks and manage the risks posed by sodic soils.

9. Replace Guidelines G14 and G15 (relating to affordable housing) with a single consolidated guideline (renumbered as required) that reads as follows: [Chapter 10.4]

An application for subdivision of land into residential lots or development of land for residential or mixed use purposes should provide affordable housing as defined by the *Planning and Environment Act 1987*. The affordable housing should be located within the walkable catchment and provide for a range of housing typologies to meet demonstrated local need.

10. Delete Requirement R20 (relating to applications in the Future Residential Area). [Chapter 5.6]
11. Amend Requirement R45 (relating to public land buffers around Conservation Areas) to add “unless otherwise agreed to by the Department of Environment, Land, Water and Planning” to the end of the first sentence. [Chapter 13.5]
12. Include a new guideline in section 3.7.1 (Integrated Water Management & Utilities) which reads: [Chapter 8.5]
- Subdivision and development in areas identified as being affected by sodic and dispersive soils should be managed to avoid or mitigate the potential risk of erosion, both during construction and on an ongoing basis.
13. Remove the Local Convenience Centre East from Tables 4 and 5 and make any other necessary adjustments. [Chapter 11.5]

#### Changes to the Part C Precinct Structure Plan - plans

14. Amend Plan 3 (Future Urban Structure) **and Plan 1.0 in the Part C Urban Growth Zone Schedule 7** to:
- align the northern extent of the ‘future extractive industries’ area with the southern extent of the Woody Hill Sensitive Use Buffer as drawn in accordance with consolidated Recommendation 17(a) [Chapter 4.4]
  - align the eastern extent of the ‘future extractive industries’ area with the land identified as the ‘Southern Access Road and Bund Area’ and the ‘Northern Bund Area’ in Annexure D of Document 164 [Chapter 4.5]
  - locate the future Wollert Recycled Water Treatment Plant in the location shown on draft Plan of Subdivision PS 741631 (Document 244) [Chapter 6.3]
  - include the following note: [Chapter 6.5]
- The future Wollert Recycled Water Treatment Plant may generate odour. This should be taken into account in any application for a sensitive use within the vicinity of the future Wollert Recycled Water Treatment Plant.
- show all of the Yarra Valley Water land in Langley Park Drive, Donnybrook as ‘public utility’, and delete the cross hatching and ‘potential future water storage – holding ponds for treated recycled water’ in the key on Plan 3 (and any other plans on which it appears) [Chapter 6.6]

- f) reduce the extent of the employment land to align with the Woody Hill Sensitive Use Buffer redrawn in accordance with consolidated Recommendation 17(a), with residential land beyond the extent of the buffer to the east [Chapter 7.5]
  - g) designate the land at 910 Donnybrook Road, Donnybrook as follows: [Chapter 7.5]
    - all land to the north of the connector street and waterway as 'business' with an applied Commercial 2 Zone
    - all land to the south of the connector street and waterway (including the land in the Woody Hill Blast Buffer) as 'industry' with an applied Industrial 1 Zone.
15. Amend Plan 8 (Native Vegetation Retention and Removal) to: [Chapter 13.5]
- a) show Trees 23 and 162 as 'tree able to be removed' on Plan 8
  - b) amend the boundaries of Conservation Area 28 as approved by the Department of Environment, Land, Water and Planning (make the same change on other plans as required).
16. Amend Plan 10 (Street Network) to:
- a) show the southern east west connector as a trunk connector (and include a suitable cross section if required) [Chapter 14.3]
  - b) show the section of the east west connector street across the northern part of the Barro land as 'future connection once quarrying ceases' [Chapter 14.5]
  - c) delete the north south local access street along the eastern boundary of the Barro land [Chapter 14.5]
  - d) show the proposed quarry and trade supplies access on Donnybrook Road, Donnybrook as a fully directional access [Chapter 14.5]
  - e) show the proposed access between Woody Hill and Phillips Quarries [Chapter 14.5]
  - f) show the alternative road alignment on 910 Donnybrook Road, Donnybrook proposed by 910 Donnybrook Road Pty Ltd and Retzos as shown in Figure 16, save that the east-west connector road and the Merri Creek Tributary should be located outside the Woody Hill Blast Buffer. [Chapter 14.6]
17. Amend Plan 15 (Buffers, Noise Amenity Area and Measurement Length) to:
- a) show a Woody Hill Sensitive Use Buffer of 500 metres drawn: [Chapter 5.4]
    - other than as noted below, 500 metres from the proposed Extraction Limits of WA 492 and WA 6437 as shown on Figure 3 in this report
    - from a line 51 metres south of the boundary of 910 Donnybrook Road, Donnybrook
  - b) show a Phillips Quarry Sensitive Use Buffer of 500 metres drawn from the proposed Extraction Limits of WA 6852 as shown on Figure 4 in this report [Chapter 5.4]
  - c) show the 200 metre Blast Buffers drawn from the Extraction Limits (ie from the same points as the Sensitive Use Buffers in accordance with consolidated Recommendation 17(a) and 17(b)) [Chapter 5.7]

- d) remove publicly accessible areas such as roads, cycle and pedestrian paths and open space along drainage corridors from within the Blast Buffers [Chapter 5.7]
  - e) remove reference to the Acoustic Application Area [Chapter 5.4]
  - f) remove reference to the 300 metre Phillips Noise Buffer [Chapter 5.4]
  - g) remove the odour buffer around the future Wollert Recycled Water Treatment Plant. [Chapter 6.5]
18. As a consequence of consolidated Recommendation 2 (to not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook): [Chapter 10.2]
- a) remove Requirement R9
  - b) give further consideration to whether 1030 Donnybrook Road, Donnybrook should be retained as open space (in which case it should be credited), or released for development
  - c) make any necessary adjustments to the Part C Precinct Structure Plan, including Plan 3 (Future Urban Structure), Plan 4 (Land Use Budget), Plan 5 (Image Character Housing and Heritage), Table 1 (Summary Land Use Budget) and Appendix 4.1 (Parcel Specific Land Budget).

#### Changes to the Part C Urban Growth Zone Schedule 7

19. Amend Table 1 (Applied zones) in the second entry to delete 'and local convenience centre (east)'. [Chapter 11.5]
20. In Clause 1.0, amend the Table of Uses as follows:
- a) in Section 1, amend the condition for Accommodation, Dwelling and Medical Centre to read: [Chapter 5.6]
    - Must not be on land within the 'Phillips Quarry Sensitive Use Buffer' identified on Plan 15 in the incorporated *Shenstone Park Precinct Structure Plan*.
  - b) in Section 1, amend the condition for Utility installation to read: [Chapter 6.6]
    - Must be on land identified as 'public utility' on Plan 3 in the incorporated *Shenstone Park Precinct Structure Plan*.
  - c) in Section 2, amend the condition for Informal Outdoor Recreation to read: [Chapter 5.6]
    - On land within the 'Phillips Quarry Sensitive Use Buffer' identified on Plan 15 in the incorporated *Shenstone Park Precinct Structure Plan*.
  - d) in Section 2, remove the condition relating to the odour buffer and consider whether Caretaker's house, Education centre (other than Employment training centre or Tertiary institution) and Hotel should be Section 1 or Section 2 uses, and what conditions (if any) they should be subject to. [Chapter 6.5]
21. In Clause 2.5, amend the provision related to the prohibition of buildings within the Woody Hill Blast Buffer to add 'or the Phillips Quarry Blast Buffer' after 'Woody Hill Blast Buffer' in the heading and the second last line. [Chapter 6.4]
22. In Clause 3.0, amend the application requirement relating to Woody Hill Quarry noise assessment as follows: [Chapter 5.4]

- a) replace the heading 'Woody Hill Quarry noise assessment' with 'Acoustic Report'
- b) replace 'Acoustic Application Area' with 'the Woody Hill Sensitive Use Buffer or the Phillips Quarry Sensitive Use Buffer'.

23. In Clause 4.0, replace the Land Management Cooperative Agreement provision with the following: [Chapter 13.5]

A permit to subdivide land containing a 'conservation area' as shown in the Shenstone Park Precinct Structure Plan must include the following condition:

Before a statement of compliance is issued for the last stage of the subdivision containing unencumbered land, the owner of the land must do one of the following to the satisfaction of the Secretary to the Department of Environment, Land, Water and Planning (DELWP) unless a notice of acquisition has been served under the *Land Acquisition and Compensation Act 1989* for the compulsory acquisition of the conservation area:

- Vest the conservation area with Council as a reserve; or
- Vest the conservation area with Melbourne Water as a reserve for drainage purposes; or
- Enter into an agreement with the Secretary to DELWP to transfer or gift that land to:
  - the Secretary to DELWP;
  - the Minister for Environment and Climate Change; or
  - another statutory authority; or
- Enter into a Land Management Co-operative Agreement with the Secretary to DELWP under section 69 of the *Conservation Forests and Lands Act 1987*, that provides for:
  - the conservation and management of the conservation area to the satisfaction of DELWP
  - the owner to pay the reasonable costs of the Secretary to DELWP for the preparation, execution and registration of the agreement; and
  - an application to be made to the Registrar of Titles to register the agreement on the title to the land.

24. In Clause 6.0, replace the decision guideline relating to the 'Phillips Quarry Sensitive Use Buffer' with the following: [Chapter 5.6]

Before deciding on an application for a sensitive use or development associated with a sensitive use within the 'Phillips Quarry Sensitive Use Buffer' shown on Plan 15 of the incorporated *Shenstone Park Precinct Structure Plan*, in addition to the decision guidelines in Clause 37.07-14 and Clause 65, the responsible authority must consider, as appropriate:

- Any effect that emissions of noise, vibration, odour, dust and grit from Phillips Quarry may have on the proposed use or building.
- The potential for the proposed use or development within the 'Phillips Quarry Sensitive Use Buffer' to impact on the ability of

the quarry operator to obtain approvals for extraction (if approvals have not yet been obtained).

- Whether the proposed use or development will adversely impact the current or future operations of the Phillips Quarry, having regard to any requirements of any approvals for the quarry, including any approved extraction boundary.
- The staging of extraction and whether stone resources close to the residential areas have been extracted and works have moved to the south.
- The views of the Secretary to the Department administering the *Mineral Resources (Sustainable Development) Act 1990*.

25. In Clause 6.0, remove the decision guideline relating to the Future Wollert Recycled Water Treatment Plant. [Chapter 6.5]

#### Changes to the Part C Schedule to Clause 66.04

26. Amend the first entry in the table relating to Schedule 7 to Clause 37.07 (UGZ) under 'Kind of application' to add "or the Phillips Quarry Sensitive Use Buffer" after the words "Woody Hill Quarry Sensitive Use Buffer". [Chapter 5.6]
27. Remove the second entry in the table relating to Schedule 7 to Clause 37.07 (UGZ). [Chapter 5.6]
28. Delete the third last entry in the table requiring referral of applications within the odour buffer to the Environment Protection Authority. [Chapter 6.5]
29. Amend the final entry in the table as follows: [Chapter 6.4]
- a) amend the first column to refer to the Rural Conservation Zone Schedule 1 as well as the Urban Growth Zone Schedule 7
  - b) amend the second column to read:

An application to develop land within the Woody Hill Blast Buffer or the Phillips Quarry Blast Buffer identified on Plan 15 of the incorporated *Shenstone Park Precinct Structure Plan* for the purpose of a utility installation.

#### Changes to the Part C Incorporated Plan Overlay Schedule 9:

30. In Clause 3.0, replace the Land Management Cooperative Agreement provision with the provision in consolidated Recommendation 23. [Chapter 13.5]

#### **Further changes to the Part C Urban Growth Zone Schedule 7**

- 31. As a consequence of consolidated Recommendation 2 (to not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook), amend Clause 3.0 to delete the following provisions: [Addendum Report]**

- **Where relevant, demonstration of how the subdivision will respond sensitively to the heritage significance of 1030 Donnybrook Road (Heritage Overlay – HO187) and its surrounding area;**

**Heritage Places**

**An application to subdivide land or to demolish a building or to construct a building or construct and carry out works on land at 1030 Donnybrook Road, Donnybrook must include the following:**

- **a Heritage Conservation Management Plan (HCMP);**
- **A statement that takes into account the approved HCMP and explains how the significance of the identified heritage features has been considered in the design of the development, including:**
  - **incorporation within open space/public realm;**
  - **design of perimeter fencing;**
  - **surrounding residential interfaces;**
  - **interpretive signage, information boards relating to buildings that have been retained, restored, rebuilt or removed.**

**All to the satisfaction of the responsible authority.**

**32. As a consequence of consolidated Recommendation 14(e) (to show the Yarra Valley Water land in Langley Park Drive as 'public utility' on the Future Urban Structure), amend Table 1: Applied zone provisions to include the following: [Addendum Report]**

Land on the east side of Langley Park Drive shown on plan 1 of this schedule as Public Utility	Applied zone provisions Clause 33.01 - Industrial 1 Zone
Land on the west side of Langley Park Drive shown on plan 1 of this schedule as Public Utility	Applied zone provisions Clause 33.03 - Industrial 3 Zone

**Changes to the zoning and overlay maps**

**33. As a consequence of consolidated Recommendations 14(a) and 14(b), change the boundaries of the Special Use Zone Schedule 4 and the Incorporated Plan Overlay Schedule 9 to align with the amended boundaries of the 'future extractive industries area' as recommended by the Panel in consolidated Recommendations 14(a) and 14(b). To avoid doubt, land within the future extractive industries area is to be in the Special Use Zone Schedule 4 and Incorporated Plan Overlay Schedule 9, and the balance of the land is to be in the Urban Growth Zone Schedule 7. [Addendum Report]**

**34. As a consequence of consolidated Recommendation 15(b), change the boundaries of the Rural Conservation Zone Schedule 1 and the Incorporated Plan Overlay Schedule 8 to align with the amended boundaries of Conservation Area 28 as recommended by the Panel in consolidated Recommendation 15(b). To avoid doubt, land within Conservation Area 28 is to be in the Rural Conservation Zone Schedule 1 and Incorporated Plan Overlay Schedule 8, and the balance of the land is to be in the Urban Growth Zone Schedule 7. [Addendum Report]**

## **Appendix A Panel report dated 19 February 2021**

*Planning and Environment Act 1987*

**Panel Report**

**Whittlesea Planning Scheme Amendment C241wsea  
Shenstone Park Precinct Structure Plan**

**19 February 2021**

**How will this report be used?**

This is a brief description of how this report will be used for the benefit of people unfamiliar with the planning system. If you have concerns about a specific issue you should seek independent advice.

The planning authority must consider this report before deciding whether or not to adopt the Amendment. [section 27(1) of the *Planning and Environment Act 1987* (the Act)]

For the Amendment to proceed, it must be adopted by the planning authority and then sent to the Minister for Planning for approval.

The planning authority is not obliged to follow the recommendations of the Panel, but it must give its reasons if it does not follow the recommendations. [section 31 (1) of the Act, and section 9 of the *Planning and Environment Regulations 2015*]

If approved by the Minister for Planning a formal change will be made to the planning scheme. Notice of approval of the Amendment will be published in the Government Gazette. [section 37 of the Act]

*Planning and Environment Act 1987*

Panel Report pursuant to section 25 of the Act

Whittlesea Planning Scheme Amendment C241wsea

Shenstone Park Precinct Structure Plan

19 February 2021



Sarah Carlisle, Chair



Colin McIntosh, Member



Annabel Paul, Member

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## Glossary and abbreviations

BCS	Biodiversity Conservation Strategy
CA[number]	Conservation Area [number]
Council	Whittlesea City Council
DELWP	Department of Environment, Land, Water and Planning
DoT	Department of Transport
DJV	Donnybrook Joint Venture
DSS	Development Services Schemes (for drainage)
EIIA	Extractive Industry Interest Area
EPA	Environment Protection Authority
EPA 1518	EPA Publication 1518 <i>Recommended separation distances for industrial residual air emissions</i> (2013)
ERR	Earth Resources Regulation Division of the Department of Jobs, Precincts and Regions
ESO[number]	Environmental Significance Overlay Schedule [number]
FUS	Future Urban Structure
G[number]	Guideline [number]
GRZ	General Residential Zone
HO187	Heritage Overlay Schedule 187
ICP	Infrastructure Contributions Plan
IN-[number]	Intersection [number]
IPO[number]	Incorporated Plan Overlay Schedule [number]
IRAEs	Industrial Residual Air Emissions
IWMP	Integrated Water Management Plan
LCC East	Local Convenience Centre East
LTC	Local Town Centre
MCMC	Merri Creek Management Committee
MICLUP	Melbourne Industrial and Commercial Land Use Plan
MRSD Act	<i>Mineral Resources (Sustainable Development) Act 1990</i>
O[number]	Objective [number]
PAO	Public Acquisition Overlay
PE Act	<i>Planning and Environment Act 1987</i>
PIP	Precinct Infrastructure Plan

Planning Scheme	Whittlesea Planning Scheme
PPN [number]	Planning Practice Note [number]
PPV	Peak Particle Velocity
PSP	Shenstone Park Precinct Structure Plan
R [number]	Requirement [number]
RB-[number]	retarding basin-[number]
RGZ	Residential Growth Zone
RWTP	proposed Wollert Recycled Water Treatment Plant
SEPP N-1	<i>State Environment Protection Policy – Control of Noise from Commerce, Industry and Trade</i> No. N-1, Victorian Government, 1989
Statement of Significance	<i>1030 Donnybrook Road Statement of Significance</i> , September 2019
SUZ [number]	Special Use Zone Schedule [number]
UGZ7	Urban Growth Zone Schedule 7
VPA	Victorian Planning Authority
WA [number]	Work Authority [number]

## Overview

### Amendment summary

<b>The Amendment</b>	Whittlesea Planning Scheme Amendment C241wsea
<b>Common name</b>	Shenstone Park Precinct Structure Plan
<b>Brief description</b>	<p>Implements the Shenstone Park Precinct Structure Plan (PSP) by:</p> <ul style="list-style-type: none"> <li>- inserting Schedule 7 to the Urban Growth Zone (UGZ7) and rezoning the majority of the precinct to UGZ7</li> <li>- rezoning land for the future expansion of the Woody Hill Quarry to Special Use Zone</li> <li>- applying a Heritage Overlay to 1030 Donnybrook Road</li> <li>- making changes to the Overlays applying to the land in relation to Conservation Areas</li> <li>- making changes to referral requirements for applications within the quarry buffers and the odour buffer for the proposed Wollert Recycled Water Plant</li> <li>- making changes to notice requirements for applications within the measurement length of the high pressure gas pipeline</li> <li>- making changes to referral requirements for applications on land identified as 'station car parking'</li> <li>- incorporating the PSP and the Statement of Significance for 1030 Donnybrook Road into the Planning Scheme</li> </ul>
<b>Subject land</b>	See Figure 1
<b>The Proponent and Planning Authority</b>	Victorian Planning Authority
<b>Exhibition</b>	10 October to 15 November 2019
<b>Submissions</b>	<p>Number of Submissions: 32</p> <p>Submissions requesting changes: 27</p> <p>2 submissions were superseded by subsequent submissions, and 3 submissions were withdrawn after exhibition</p> <p>See Appendix A</p>

### Panel process

<b>The Panel</b>	Sarah Carlisle (Chair), Colin McIntosh, Annabel Paul
<b>Directions Hearing</b>	31 August 2020 by video conference
<b>Panel Hearing</b>	16 November to 23 December 2020 by video conference
<b>Site inspections</b>	Unaccompanied, 11 November 2020
<b>Parties to the Hearing</b>	See Appendix B
<b>Citation</b>	Whittlesea PSA C241wsea [2021] PPV
<b>Date of this Report</b>	19 February 2021

## Executive summary

Whittlesea Planning Scheme Amendment C241wsea (the Amendment) seeks to implement the Shenstone Park Precinct Structure Plan into the Whittlesea Planning Scheme, to facilitate the urban development of the precinct generally in accordance with the PSP. It proposes to do this by (among other things) introducing a new Schedule 7 of the Urban Growth Zone (UGZ7) and applying it to most of the developable land within the precinct.

The precinct is roughly 628 hectares, bound by Donnybrook Road to the north, the Sydney to Melbourne railway line to the west, the Urban Growth Boundary to the east and the future Northern Quarries PSP area to the south. The precinct has been largely cleared for agriculture, but contains several areas of remnant native vegetation. It contains two named waterways, and two Conservation Areas protected under the Biodiversity Conservation Strategy.

The precinct contains Woody Hill Quarry, an existing operational quarry located in the southwestern part of the precinct. The current operator, Barro Group, proposes to expand the Woody Hill Quarry to the north and east, but is yet to obtain the statutory approvals to allow it to do so. Another quarry, Phillips Quarry (also owned by Barro) is located directly south of the precinct. Phillips Quarry is not yet fully approved.

The PSP envisages a mixed residential and employment precinct of around 3,660 homes and 4,570 jobs, with residential development in the east and employment land (industrial, light industrial and commercial land) in the west. Development will progress alongside the quarries, with buffers in place to ensure separation between the quarries and incompatible use and development, including sensitive uses.

The Woody Hill Quarry buffers are largely taken up by employment land, utility land and Conservation Areas. The Phillips Quarry buffers are largely taken up by a Conservation Area, with land within the buffer north of the Conservation Area designated as a 'Future Residential Area'. The exhibited PSP stated that residential development cannot proceed in the Future Residential Area until the Department of Jobs, Precincts and Regions determines that the earth resources in the Phillips Quarry have been extinguished, or the buffer is no longer required.

The Wollert Recycled Water Treatment Plant (RWTP) is proposed to be located just to the south of Woody Hill Quarry, producing Class B recycled water that will be stored in storage ponds located within the precinct along Langley Park Drive. The facility is proposed to supply recycled water to the northern growth corridor. The exhibited PSP proposed an odour buffer around the RWTP that extends into the precinct.

Submissions raised five key issues:

- quarry buffers and land uses and development within buffers
- the extent of the extractive expansion area identified for the Woody Hill Quarry
- the treatment of the RWTP and associated storage ponds
- the extent of employment land
- sodic and dispersive soils and the risk of erosion.

The VPA categorised other issues raised by submissions into eight broad areas, corresponding to the headings in the PSP:

- Vision, outcomes and general matters

- Image, character, heritage and housing
- Town centres and employment
- Open space, community facilities and education
- Biodiversity and bushfire management
- Transport and movement
- Integrated water management and utilities
- Precinct infrastructure and staging.

### **Overall assessment**

In an overall sense, the Amendment is generally consistent with the strategic policy framework, including the North Growth Corridor Plan. The Panel finds that the Amendment is strategically justified and should be supported, subject to the specific findings and recommendations in this report.

### **Quarry buffers and the Woody Hill expansion**

The strategic justification for buffers extending onto third party land not owned or controlled by the quarry operator was a key issue. A significant portion of the Hearing was dedicated to this issue.

While the policy framework does not prioritise the protection of stone resources above all other policy considerations, it emphasises the need to protect stone resources from encroachment for the long term benefit of the Victorian community. In many cases, that will require external buffers.

The evidence and submissions put to the Panel gave many examples of external (or partly external) quarry buffers that have been applied elsewhere. In most (if not all) of these cases, the buffers were applied around existing operating quarries rather than proposed (and as yet unapproved) quarries as is the case here. The notable exception was the recent Beveridge North West PSP Panel, which recommended buffers be applied around a partly approved but not yet operational quarry. The Panel acknowledged that the land in the buffers would likely not all be owned or controlled by the quarry operator.

The policy framework seeks to protect all known valuable stone resources – not just those that are approved and currently being exploited. The fact that the necessary approvals and zoning are not yet in place to allow the extraction of the resource does not change the Panel's view that external buffers can be consistent with State policy, and objectives for fair and orderly planning.

The justification for external buffers does not stop with the need to protect a known and valuable stone resource. Several other factors need to be considered, including the extent to which buffers will impact on the development potential of the adjoining land, the strategic justification for the alternate use of the adjoining land and the importance and value of the alternate use to the community.

The buffers proposed for Shenstone Park will impact on the development potential of the affected land, particularly the developable land in the Blast Buffers. However this impact will not be permanent. Rather, development will be delayed (albeit potentially for several decades). There was no suggestion in the evidence that delaying the development of the employment land within the Blast Buffers will cause supply constraints – in fact, the opposite was suggested. No evidence put to the Panel establishing that delaying development of the

residential land within the Phillips Quarry Sensitive Use Buffer is likely to result in supply constraints of residential land in the North Growth Corridor. On the other hand, if urban development is allowed to encroach into the buffers, the ability to efficiently extract the resource is likely to be permanently lost.

The Panel was not persuaded that the value to the community of protecting the full development potential of the land in the buffers in the short term outweighs the value to the community of protecting the stone resource in the quarries in the longer term. It finds that external quarry buffers are strategically justified in this case.

The Panel's findings on other key issues relating to the quarries and quarry buffers are:

- The Vision statement and objectives in the PSP should be updated to clarify the strategic importance of the Woody Hill and Phillips quarries and the role they have in influencing land use and development within the precinct.
- The extent of the northern expansion of the Woody Hill Quarry is constrained by the residential development underway in the Donnybrook Woodstock PSP. The limit of expansion should be drawn so that the Woody Hill Quarry Sensitive Use Buffer does not extend further than the north side of Donnybrook Road.
- The eastern expansion of the Woody Hill Quarry is highly unlikely to extend beyond the land currently (or soon to be) owned or controlled by Barro. Barro has no intent of extracting beyond this point, and any further expansion is actively opposed by the neighbouring landowner. The limit of the eastern expansion should reflect this.
- Based on the information known to date about the quarries and likely future operations, the Sensitive Use Buffers should be 500 metres measured from the activity boundary at the quarry sites, which generally aligns with the approved and proposed extraction limits (other than the northern expansion of Woody Hill, which is limited by the residential development north of Donnybrook Road). The Blast Buffers should be 200 metres measured from the extraction limits. Buffers should be radial, not directional.
- Residential use within the Future Residential Area in the Phillips Quarry Sensitive Use Buffer should be discretionary, guided by a decision guideline in the UGZ7 to provide clear guidance for the responsible authority assessing applications.
- The proposed controls on use and development within the Blast Buffers, although highly restrictive, are appropriate. The evidence was that land within the Blast Buffers would be exposed to significant impacts from blasting (including safety risks) and on that basis the Panel finds that it would not be appropriate to reduce the extent of the Blast Buffers or allow for further discretion within them beyond what is already contemplated.
- The buffers should be regularly reviewed as part of the 5 yearly review of the PSP, in light of the latest information about the status of the quarry approvals (including extraction limits and activity boundaries), staging and operations.
- The Future Urban Structure Plan (FUS) in the PSP should not show publicly accessible areas such as roads, cycle and pedestrian paths and open space surrounding drainage corridors within the Blast Buffers. That said, the Panel has no in principle objection to locating roads and drainage corridors within the Blast Buffers if, at the permit application stage, a landowner is able to satisfy the responsible authority that the risks associated with blasting could be appropriately managed.

- There is no justification for the inclusion of an Acoustic Application Area that extends beyond the Woody Hill Sensitive Use Buffer. The Acoustic Application Area should be removed, and instead noise controls should apply within both Sensitive Use Buffers.
- The Woody Hill Quarry should not be included in the land budget. Nor should the PSP seek to foreshadow the future use and development of the land following the ceasing of quarrying operations, given the lifespan of the quarry is likely to exceed that of the PSP.

### **The Recycled Water Treatment Plant and storage ponds**

The RWTP is a strategically important asset for the North Growth Corridor, and its future development (including location) is relatively settled. It is a compatible land use with the quarries, and the Panel is satisfied that it can be designed and constructed to withstand impacts from blasting at the quarries. The Panel supports showing the RWTP on the FUS, in the location of the land Yarra Valley Water proposes to acquire from Golina Holdings. It does not support shifting the location to the south outside the Blast Buffers, or showing it as an indicative asterisk.

It would be premature for the PSP to include an odour buffer for the RWTP. While its location may be relatively settled, the odour control measures are not yet finalised and may not be for some time until the detailed design of the RWTP is undertaken. The odour buffer should therefore be removed from the PSP, with a note added to the FUS drawing attention to possible odour impacts from the RWTP.

The Yarra Valley Water land in Langley Park Drive should be shown on the FUS as public utility rather than industry. Use of the land for recycled water storage ponds should not require a permit. While the Panel does not see the need for a general buildings and works permit trigger for the storage ponds, the proposed bulk earthworks permit trigger should apply to ensure that the impacts of sodic soils are properly taken into account in the design and construction of the storage ponds.

The storage pond land should have an applied zone of Industrial 1/Industrial 3 as exhibited. The land can be rezoned to the Public Use Zone when the plans for the facility are closer to being finalised.

All of the Yarra Valley Water land should be excluded from the land budget.

### **The extent of employment land**

The location and extent of employment land has been strongly influenced by providing a buffer to the Woody Hill Quarry. The Panel was not persuaded that designating land for employment beyond that needed for buffers was strategically justified. The amount of employment land should therefore be revised (reduced) in accordance with the revised buffers.

### **Sodic and dispersive soils**

The Panel is satisfied that sufficient investigations into the extent and impacts of sodic and dispersive soils in the PSP area have been conducted to allow the Amendment to proceed, subject to controls being included in the PSP and the UGZ7 which manage the risks associated with sodic soils. It will be incumbent on planning permit applicants to prepare soil

management plans and for the responsible authority to assess, approve and administer these plans to ensure that the PSP requirements are met.

### **Other matters**

In relation to heritage matters, the Panel finds:

- The milking shed and associated farming infrastructure at 1030 Donnybrook Road does not meet the threshold for local significance. The Heritage Overlay should not be applied. Consequential adjustments will need to be made to the PSP, including consideration of whether 1030 Donnybrook Road should be retained as open space (in which case it should be credited), or released for development.
- The permit exemptions for the removal of dry stone walls are appropriate, and should not be extended. The Panel supports the VPA's proposed Part A additions to the PSP and UGZ7 with respect to dry stone walls.

In relation to housing densities, walkable catchments and affordable housing, the Panel finds:

- There is no justification for adjusting the walkable catchment boundaries shown in the revised PSP.
- The densities proposed within and outside the walkable catchment are appropriate.
- The Panel supports the VPA's proposed approach of replacing the exhibited guidelines in the PSP (which referred to a 10 percent affordable housing contribution) with a guideline that encourages the provision of affordable housing within the walkable catchment in accordance with the Act, without specifying a particular target. This is consistent with the approach taken by the recent Beveridge North West Panel.

In relation to town centres and associated educational and community facilities, the Panel finds:

- The location of the Local Town Centre and associated facilities including the school proposed in the Part A FUS is appropriate. It should not be shifted further south into the precinct as proposed by Donnybrook Joint Venture.
- The Panel supports the removal of the Local Convenience Centre East, as agreed to by the VPA in their Part C revisions.

In relation to traffic, transport and road network issues, the Panel finds:

- The transport and movement network proposed by the VPA is generally suitable, capable of accommodating anticipated traffic volumes, and meets strategic objectives and policies for an efficient and sustainable transport and movement network. On balance, the Panel was not persuaded that the Donnybrook Joint Venture alternative road network represented a better planning outcome or that the Part A road network was not appropriate.
- The southern east west connector, for which daily volumes of 8,290 vehicles are predicted, should be upgraded to a trunk connector.
- The PSP should show the proposed quarry and trade supplies access on Donnybrook Road as a fully directional access, and should also show the proposed access between the Woody Hill and Phillips quarries. The section of east west connector street through the Barro land should be shown as a future connection once quarrying ceases. The north south local access street along the eastern boundary of the Barro land should be deleted.

- The Panel generally supports the alternative road alignment on 910 Donnybrook Road proposed by that submitter, save that (as noted above) publicly accessible areas like roads and open space along the Merri Creek Tributary should not be shown as located within the Blast Buffers.
- It is premature to show Langley Park Drive as a made road all the way to the southern boundary of the PSP area.

In relation to drainage and waterway issues, the Panel finds:

- It generally supports the VPA's proposed changes to the drainage and waterway network in its Part A and Part C versions of the PSP.
- The remaining drainage issues are likely able to be managed as part of the detailed design stage through permit applications, subject to Melbourne Water's approval. The Panel supports the VPA's proposed note on Plan 12 in the PSP, which will provide more flexibility in relation to drainage changes during the detailed design phase.

### **Consolidated recommendations**

The following recommendations have been consolidated and restructured into general recommendations and recommendations relating to the PSP (text and plans), the UGZ7 and the Incorporated Plan Overlay Schedule 9. They therefore appear in a different order to the recommendations in the relevant issue chapters. Chapter references have been provided for the reader's convenience.

Based on the reasons set out in this Report, the Panel recommends:

### **General recommendations**

- 1. Adopt Whittlesea Planning Scheme Amendment C241wsea based on the Part C version of the Amendment documents (Document 275), subject to the specific recommendations in this report. [Chapter 4.2]**
- 2. Do not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook. [Chapter 10.2]**
- 3. Review the buffers as part of each five yearly review of the Precinct Structure Plan having regard to the latest information about the status of the quarry approvals (including extraction limits and activity boundaries), staging and operations. [Chapter 5.8]**

### **Changes to the Part C Precinct Structure Plan - text**

- 4. Update Clause 2.1 Vision to read: [Chapter 9.4]**

**The Shenstone Park precinct has been designed taking into account the presence of strategic extractive resources within the Woody Hill and Phillips quarries. The PSP adopts a precautionary, protective approach to avoid encroachment of incompatible land uses that would limit the availability of stone resources. The precautionary, protective approach has been adopted in recognition of the quality and value of the resource being such that the ability to efficiently extract the resource must take precedence over incompatible conventional urban development.**

**In order to avoid encroachment of incompatible land uses, employment land use has been planned surrounding the Woody Hill Quarry including**

its potential northern extension. The employment land will act as a 'land use buffer' between the quarry and the sensitive land uses that are planned further north.

The Phillips Quarry lies outside the precinct, but its presence and extraction potential is recognised by the PSP. The PSP seeks to ensure that the southerly extent of urban development (adjacent to conservation area reserve no. 28) will not constrain the opportunity to maximise the extraction of resources in the Phillips Quarry.

5. Update Clause 2.2 Objectives to include 'Natural Resources' as a separate sub-section which includes Objectives O10 and O15 (renumbered as required). [Chapter 9.4]
6. Update Objective O15 to read: [Chapter 9.4]

To provide for the ongoing operation of the Woody Hill Quarry and the establishment and ongoing operation of the Phillips Quarry.
7. Update Table 1 (Summary Land Use Budget) and section 4.1 (Parcel Specific Land Budget) to remove Properties 1, 2, 3, 7 and 8 (the Yarra Valley Water land in Langley Park Drive, Donnybrook) from the net developable area. [Chapter 16.5]
8. Replace Requirement R3 with the following: [Chapter 8.5]

Subdivision, engineering, landscape design and buildings and works must provide a sensitive response to current landforms and minimise the need for excavation and cut and fill earthworks and manage the risks posed by sodic soils.
9. Replace Guidelines G14 and G15 (relating to affordable housing) with a single consolidated guideline (renumbered as required) that reads as follows: [Chapter 10.4]

An application for subdivision of land into residential lots or development of land for residential or mixed use purposes should provide affordable housing as defined by the *Planning and Environment Act 1987*. The affordable housing should be located within the walkable catchment and provide for a range of housing typologies to meet demonstrated local need.
10. Delete Requirement R20 (relating to applications in the Future Residential Area). [Chapter 5.6]
11. Amend Requirement R45 (relating to public land buffers around Conservation Areas) to add "unless otherwise agreed to by the Department of Environment, Land, Water and Planning" to the end of the first sentence. [Chapter 13.5]
12. Include a new guideline in section 3.7.1 (Integrated Water Management & Utilities) which reads: [Chapter 8.5]

Subdivision and development in areas identified as being affected by sodic and dispersive soils should be managed to avoid or mitigate the potential risk of erosion, both during construction and on an ongoing basis.

13. Remove the Local Convenience Centre East from Tables 4 and 5 and make any other necessary adjustments. [Chapter 11.5]

#### Changes to the Part C Precinct Structure Plan - plans

14. Amend Plan 3 (Future Urban Structure) to:
  - a) align the northern extent of the 'future extractive industries' area with the southern extent of the Woody Hill Sensitive Use Buffer as drawn in accordance with consolidated Recommendation 17(a) [Chapter 4.4]
  - b) align the eastern extent of the 'future extractive industries' area with the land identified as the 'Southern Access Road and Bund Area' and the 'Northern Bund Area' in Annexure D of Document 164 [Chapter 4.5]
  - c) locate the future Wollert Recycled Water Treatment Plant in the location shown on draft Plan of Subdivision PS 741631 (Document 244) [Chapter 6.3]
  - d) include the following note: [Chapter 6.5]

The future Wollert Recycled Water Treatment Plant may generate odour. This should be taken into account in any application for a sensitive use within the vicinity of the future Wollert Recycled Water Treatment Plant.
  - e) show all of the Yarra Valley Water land in Langley Park Drive, Donnybrook as 'public utility', and delete the cross hatching and 'potential future water storage – holding ponds for treated recycled water' in the key on Plan 3 (and any other plans on which it appears) [Chapter 6.6]
  - f) reduce the extent of the employment land to align with the Woody Hill Sensitive Use Buffer redrawn in accordance with consolidated Recommendation 17(a), with residential land beyond the extent of the buffer to the east [Chapter 7.5]
  - g) designate the land at 910 Donnybrook Road, Donnybrook as follows: [Chapter 7.5]
    - all land to the north of the connector street and waterway as 'business' with an applied Commercial 2 Zone
    - all land to the south of the connector street and waterway (including the land in the Woody Hill Blast Buffer) as 'industry' with an applied Industrial 1 Zone.
15. Amend Plan 8 (Native Vegetation Retention and Removal) to: [Chapter 13.5]
  - a) show Trees 23 and 162 as 'tree able to be removed' on Plan 8
  - b) amend the boundaries of Conservation Area 28 as approved by the Department of Environment, Land, Water and Planning (make the same change on other plans as required).
16. Amend Plan 10 (Street Network) to:
  - a) show the southern east west connector as a trunk connector (and include a suitable cross section if required) [Chapter 14.3]
  - b) show the section of the east west connector street across the northern part of the Barro land as 'future connection once quarrying ceases' [Chapter 14.5]
  - c) delete the north south local access street along the eastern boundary of the Barro land [Chapter 14.5]

- d) show the proposed quarry and trade supplies access on Donnybrook Road, Donnybrook as a fully directional access [Chapter 14.5]
  - e) show the proposed access between Woody Hill and Phillips Quarries [Chapter 14.5]
  - f) show the alternative road alignment on 910 Donnybrook Road, Donnybrook proposed by 910 Donnybrook Road Pty Ltd and Retzos as shown in Figure 16, save that the east-west connector road and the Merri Creek Tributary should be located outside the Woody Hill Blast Buffer. [Chapter 14.6]
17. Amend Plan 15 (Buffers, Noise Amenity Area and Measurement Length) to:
- a) show a Woody Hill Sensitive Use Buffer of 500 metres drawn: [Chapter 5.4]
    - other than as noted below, 500 metres from the proposed Extraction Limits of WA 492 and WA 6437 as shown on Figure 3 in this report
    - from a line 51 metres south of the boundary of 910 Donnybrook Road, Donnybrook
  - b) show a Phillips Quarry Sensitive Use Buffer of 500 metres drawn from the proposed Extraction Limits of WA 6852 as shown on Figure 4 in this report [Chapter 5.4]
  - c) show the 200 metre Blast Buffers drawn from the Extraction Limits (ie from the same points as the Sensitive Use Buffers in accordance with consolidated Recommendation 17(a) and 17(b)) [Chapter 5.7]
  - d) remove publicly accessible areas such as roads, cycle and pedestrian paths and open space along drainage corridors from within the Blast Buffers [Chapter 5.7]
  - e) remove reference to the Acoustic Application Area [Chapter 5.4]
  - f) remove reference to the 300 metre Phillips Noise Buffer [Chapter 5.4]
  - g) remove the odour buffer around the future Wollert Recycled Water Treatment Plant. [Chapter 6.5]
18. As a consequence of consolidated Recommendation 2 (to not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook): [Chapter 10.2]
- a) remove Requirement R9
  - b) give further consideration to whether 1030 Donnybrook Road, Donnybrook should be retained as open space (in which case it should be credited), or released for development
  - c) make any necessary adjustments to the Part C Precinct Structure Plan, including Plan 3 (Future Urban Structure), Plan 4 (Land Use Budget), Plan 5 (Image Character Housing and Heritage), Table 1 (Summary Land Use Budget) and Appendix 4.1 (Parcel Specific Land Budget).

#### Changes to the Part C Urban Growth Zone Schedule 7

- 19. Amend Table 1 (Applied zones) in the second entry to delete 'and local convenience centre (east)'. [Chapter 11.5]
- 20. In Clause 1.0, amend the Table of Uses as follows:
  - a) in Section 1, amend the condition for Accommodation, Dwelling and Medical Centre to read: [Chapter 5.6]

**Must not be on land within the ‘Phillips Quarry Sensitive Use Buffer’ identified on Plan 15 in the incorporated *Shenstone Park Precinct Structure Plan*.**

- b) in Section 1, amend the condition for Utility installation to read: [Chapter 6.6]  
**Must be on land identified as ‘public utility’ on Plan 3 in the incorporated *Shenstone Park Precinct Structure Plan*.**
- c) in Section 2, amend the condition for Informal Outdoor Recreation to read: [Chapter 5.6]  
**On land within the ‘Phillips Quarry Sensitive Use Buffer’ identified on Plan 15 in the incorporated *Shenstone Park Precinct Structure Plan*.**
- d) in Section 2, remove the condition relating to the odour buffer and consider whether Caretaker’s house, Education centre (other than Employment training centre or Tertiary institution) and Hotel should be Section 1 or Section 2 uses, and what conditions (if any) they should be subject to. [Chapter 6.5]
21. In Clause 2.5, amend the provision related to the prohibition of buildings within the Woody Hill Blast Buffer to add ‘or the Phillips Quarry Blast Buffer’ after ‘Woody Hill Blast Buffer’ in the heading and the second last line. [Chapter 6.4]
22. In Clause 3.0, amend the application requirement relating to Woody Hill Quarry noise assessment as follows: [Chapter 5.4]
- a) replace the heading ‘Woody Hill Quarry noise assessment’ with ‘Acoustic Report’
- b) replace ‘Acoustic Application Area’ with ‘the Woody Hill Sensitive Use Buffer or the Phillips Quarry Sensitive Use Buffer’.
23. In Clause 4.0, replace the Land Management Cooperative Agreement provision with the following: [Chapter 13.5]
- A permit to subdivide land containing a ‘conservation area’ as shown in the *Shenstone Park Precinct Structure Plan* must include the following condition:**
- Before a statement of compliance is issued for the last stage of the subdivision containing unencumbered land, the owner of the land must do one of the following to the satisfaction of the Secretary to the Department of Environment, Land, Water and Planning (DELWP) unless a notice of acquisition has been served under the *Land Acquisition and Compensation Act 1989* for the compulsory acquisition of the conservation area:**
- Vest the conservation area with Council as a reserve; or
  - Vest the conservation area with Melbourne Water as a reserve for drainage purposes; or
  - Enter into an agreement with the Secretary to DELWP to transfer or gift that land to:
    - - the Secretary to DELWP;
    - - the Minister for Environment and Climate Change; or
    - - another statutory authority; or

- Enter into a Land Management Co-operative Agreement with the Secretary to DELWP under section 69 of the *Conservation Forests and Lands Act 1987*, that provides for:
    - -the conservation and management of the conservation area to the satisfaction of DELWP
    - -the owner to pay the reasonable costs of the Secretary to DELWP for the preparation, execution and registration of the agreement; and
    - -an application to be made to the Registrar of Titles to register the agreement on the title to the land.
24. In Clause 6.0, replace the decision guideline relating to the 'Phillips Quarry Sensitive Use Buffer' with the following: [Chapter 5.6]
- Before deciding on an application for a sensitive use or development associated with a sensitive use within the 'Phillips Quarry Sensitive Use Buffer' shown on Plan 15 of the incorporated *Shenstone Park Precinct Structure Plan*, in addition to the decision guidelines in Clause 37.07-14 and Clause 65, the responsible authority must consider, as appropriate:
- •Any effect that emissions of noise, vibration, odour, dust or grit from Phillips Quarry may have on the proposed use or building.
  - •The potential for the proposed use or development within the 'Phillips Quarry Sensitive Use Buffer' to impact on the ability of the quarry operator to obtain approvals for extraction (if approvals have not yet been obtained).
  - •Whether the proposed use or development will adversely impact the current or future operations of the Phillips Quarry, having regard to any requirements of any approvals for the quarry, including any approved extraction boundary.
  - •The staging of extraction and whether stone resources close to the residential areas have been extracted and works have moved to the south.
  - •The views of the Secretary to the Department administering the *Mineral Resources (Sustainable Development) Act 1990*.
25. In Clause 6.0, remove the decision guideline relating to the Future Wollert Recycled Water Treatment Plant. [Chapter 6.5]

#### Changes to the Part C Schedule to Clause 66.04

26. Amend the first entry in the table relating to Schedule 7 to Clause 37.07 (UGZ) under 'Kind of application' to add "or the Phillips Quarry Sensitive Use Buffer" after the words "Woody Hill Quarry Sensitive Use Buffer". [Chapter 5.6]
27. Remove the second entry in the table relating to Schedule 7 to Clause 37.07 (UGZ). [Chapter 5.6]
28. Delete the third last entry in the table requiring referral of applications within the odour buffer to the Environment Protection Authority. [Chapter 6.5]

- 29. Amend the final entry in the table as follows: [Chapter 6.4]**
- a) amend the first column to refer to the Rural Conservation Zone Schedule 1 as well as the Urban Growth Zone Schedule 7**
  - b) amend the second column to read:**
    - An application to develop land within the Woody Hill Blast Buffer or the Phillips Quarry Blast Buffer identified on Plan 15 of the incorporated *Shenstone Park Precinct Structure Plan* for the purpose of a utility installation.**

**Changes to the Part C Incorporated Plan Overlay Schedule 9:**

- 30. In Clause 3.0, replace the Land Management Cooperative Agreement provision with the provision in consolidated Recommendation 23. [Chapter 13.5]**

# 1 Introduction

## 1.1 The Amendment

### (i) Amendment description

The purpose of the Amendment is to implement the *Shenstone Park Precinct Structure Plan*, September 2019 (PSP) into the Whittlesea Planning Scheme (Planning Scheme), to facilitate the urban development of land in the precinct generally in accordance with the PSP.

Specifically, the Amendment proposes to:

- insert Schedule 7 to the Urban Growth Zone (UGZ7) and rezone the majority of the precinct to UGZ7
- rezone:
  - a portion of Farming Zone land to Special Use Zone Schedule 4 (SUZ4) to enable the expansion of the Woody Hill Quarry
  - a portion of Rural Conservation Zone land to UGZ7 to reflect changes to the boundary of Biodiversity Conservation Strategy (BCS) Conservation Area 28
  - a portion of Farming Zone land to Rural Conservation Zone to correct an error in the zoning map and to reflect the correct BCS boundary
  - a portion of Rural Conservation Zone land within the transmission line easement to Special Use Zone Schedule 11 (SUZ11)
- make changes to the Environmental Significance Overlay (ESO):
  - delete the ESO4 from land within the precinct
  - apply the ESO6 to land within the BCS
- make changes to the Incorporated Plan Overlay (IPO):
  - insert Schedule 8 and apply the IPO8 to the RCZ land within the BCS
  - insert Schedule 9 and apply the IPO9 to the SUZ land within the precinct (the existing and expanded Woody Hill Quarry and land within the transmission line easement)
- make changes to the Heritage Overlay (HO):
  - include a new entry HO187<sup>1</sup> relating to 1030 Donnybrook Road, Donnybrook
- include exemptions in the Schedules to:
  - Clause 52.17 to identify native vegetation exempt from requiring a planning permit for its removal
  - Clause 52.33 to identify dry stone walls exempt from requiring a planning permit for demolition, removal or alteration
- make changes to the Schedule to Clause 66.04 to require referral of:
  - an application for subdivision, use or buildings and works on land within the 'Woody Hill Sensitive Use Buffer' shown on Plan 15 of the PSP to the Secretary to the Department administering the *Mineral Resources (Sustainable Development) Act 1990* (MRSD Act)

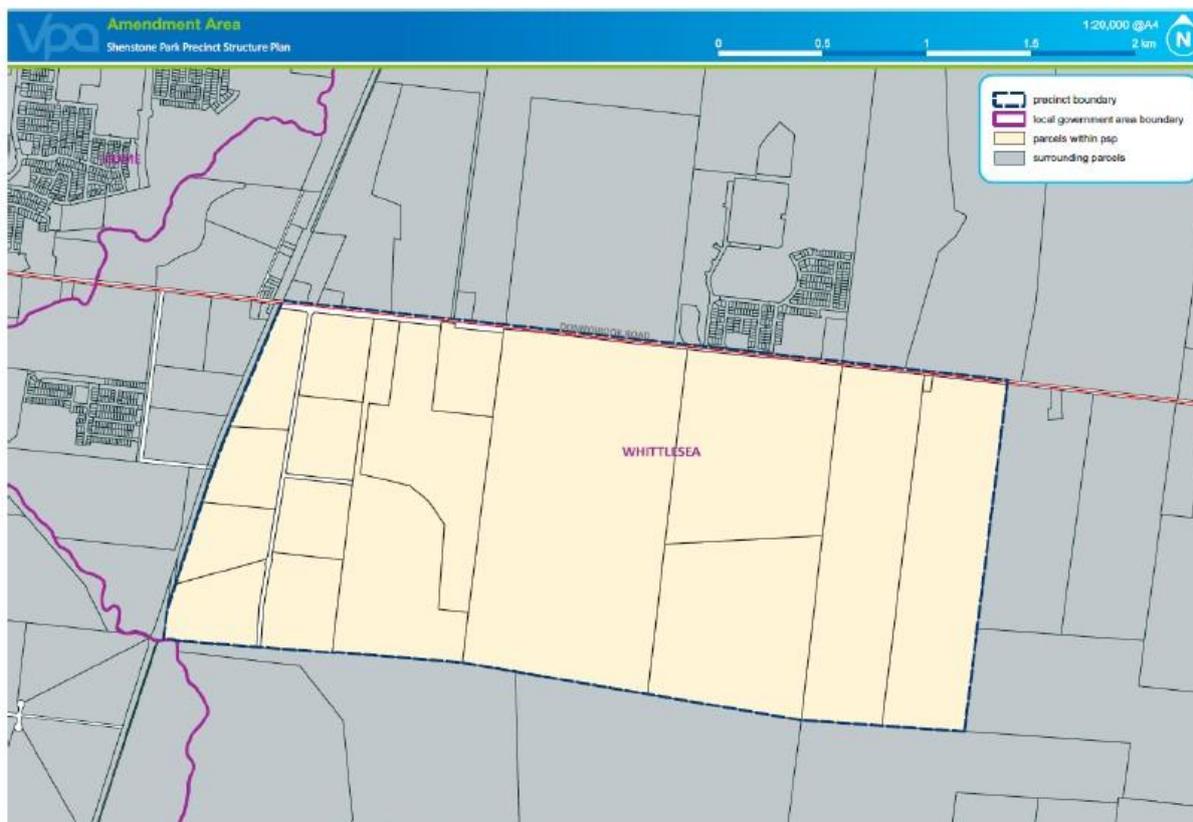
<sup>1</sup> HO187 was the overlay number assigned prior to exhibition. However, this overlay number has now been included in the Planning Scheme as the overlay applying to a different property. References to HO187 have been retained for consistency with the exhibited material, however it is anticipated that the Amendment will be gazetted with an updated overlay number.

- an application for use or buildings and works on land in the 'Sewage treatment plant odour buffer' shown on Plan 15 of the PSP to the Environment Protection Authority (EPA)
- an application for subdivision, use or buildings and works on land identified as 'station car parking' on Plan 3 of the PSP to the Department of Transport (DoT)
- an application for subdivision, use or buildings and works associated with certain uses on land identified as 'Future Residential Area' on Plan 3 of the PSP and within the 'Phillips Quarry Sensitive Use Buffer' on Plan 15 to the Secretary to the Department administering the MRSD Act
- make changes to the Schedule to Clause 66.06 to require notice of:
  - applications for certain uses within the '590 metre measurement length' shown on Plan 15 of the PSP to the gas pipeline licensee under the *Pipelines Act 2005*
- make changes to the Schedule to Clause 72.04 to incorporate the following documents into the Planning Scheme:
  - the PSP
  - *1030 Donnybrook Road Statement of Significance*, September 2019 (the Statement of Significance).

## (ii) The subject land

The Amendment applies to the whole of the Shenstone Park precinct, shown in Figure 1.

Figure 1 Subject land



Source: Explanatory Report

## 1.2 The precinct and surrounds

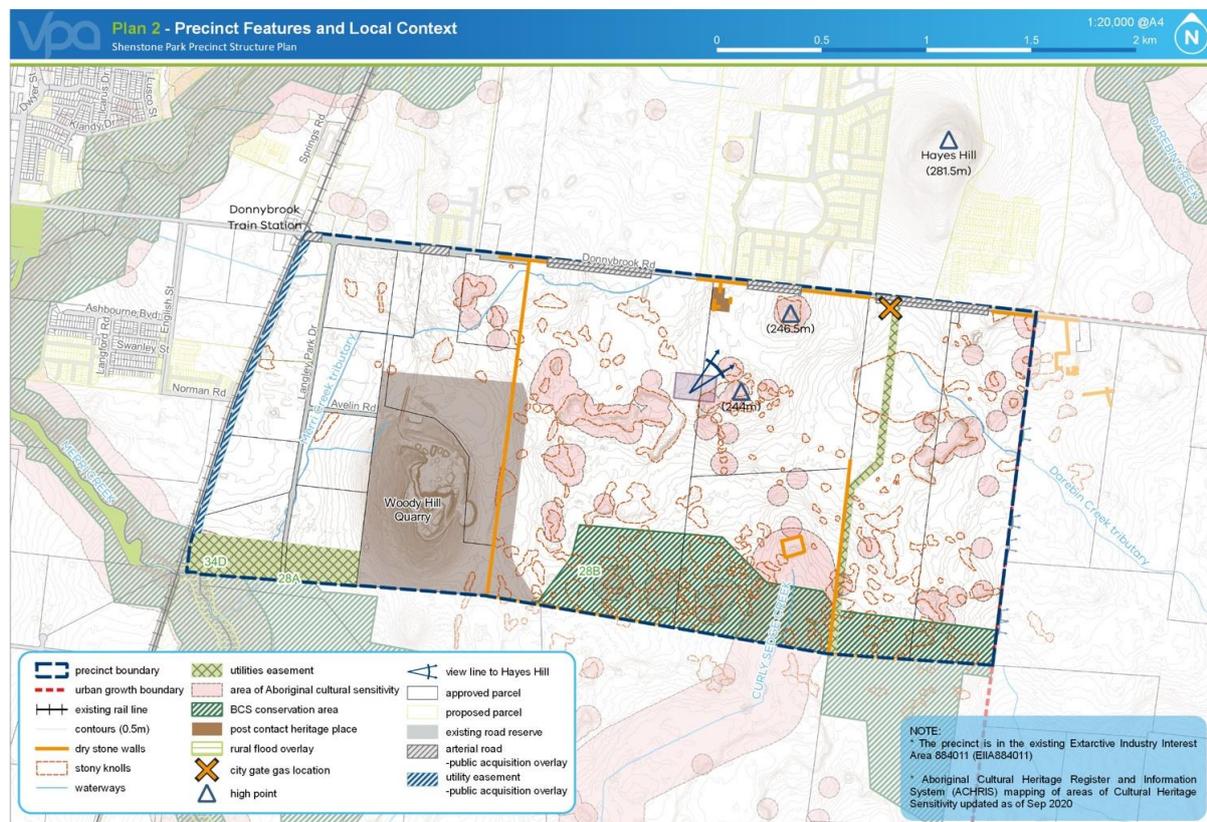
### (i) The precinct

The precinct is roughly 628 hectares and is bound by Donnybrook Road to the north, the Sydney to Melbourne railway line to the west, the Urban Growth Boundary to the east and the future Northern Quarries PSP area to the south.

The precinct has been largely cleared for agriculture, but contains several areas of remnant native vegetation. Key existing features of the precinct are shown on Figure 2. They include:

- the existing Woody Hill Quarry in the south western part of the precinct
- stony knolls (rises) distributed throughout the landscape
- two waterways which flow in a southerly direction through the precinct:
  - Tributary of Merri Creek on the northern and western sides
  - Tributary of Darebin Creek in the north western corner
- dry stone walls of varying significance throughout the eastern side of the precinct
- the remains of a former dairy farm at 1030 Donnybrook Road
- Conservation Areas 28 and 34:
  - CA28 is located along the southern boundary of the precinct, east and west of Woody Hill Quarry. The key rationale for CA28 is the protection of River Red Gums, Plains Grassy Woodland and Plains Grassland ecology.
  - CA34 is for the protection of Growling Grass Frogs along Merri Creek.

Figure 2 Key features of the PSP area



Source: Shenstone Park PSP Plan 2, Part C version

**(ii) The surrounding area**

Key features of the surrounding area include:

- North:
  - The Donnybrook/Woodstock PSP area. This is largely residential, with limited commercial land and no industrial land. Development has commenced.
- West and north west:
  - The English Street PSP area is to the west, separated by the Sydney to Melbourne railway corridor which limits connectivity between the two precincts. The English Street precinct is predominantly residential with a commercial precinct in the north eastern corner fronting Donnybrook Road. Development has commenced.
  - The Lockerbie PSP area is to the north east. Lockerbie is a mixed residential and commercial PSP, with areas of high and medium density residential development and Donnybrook Station to the immediate north west of the Shenstone Park precinct. A large town centre will be located adjacent to the potential future Lockerbie station. Development has commenced.
- South and south west:
  - The proposed Phillips Quarry is to the immediate south west of the Woody Hill Quarry.
  - The Wollert Recycled Water Treatment Plant (RWTP) is proposed to be located to the immediate south of the Woody Hill Quarry.
  - The Craigieburn North Employment PSP area is to the south and west (surrounding the English Street PSP Area).
  - The future Northern Quarries PSP area is to the south. While planning has not commenced, it is anticipated that this precinct will have an industrial focus.
- East:
  - The eastern boundary of the precinct is the Urban Growth Boundary, beyond which is green wedge land.

**(iii) The quarries**

Woody Hill Quarry is located in the south west of the precinct. Barro Group (operator of the quarry) is currently extracting primarily mudstone from the existing quarry. It proposes to expand quarry operations to the south, and to the east and north. The expansion areas are all fully contained within the precinct.

Phillips Quarry is located directly south of the precinct, just to the south east of Woody Hill Quarry. Extraction has not yet commenced at Phillips Quarry.

Barro proposes to operate the Woody Hill Quarry (including the expanded areas) and Phillips Quarry as an integrated operation, with resources extracted from Phillips Quarry processed at the processing plants located on the Woody Hill Quarry. An access road and bund are proposed to be constructed between the two quarries, on land currently owned by Donnybrook Joint Venture (DJV). Barro and DJV have entered into an agreement for DJV to transfer the land required for the access road and bund to Barro (Document 164).

Woody Hill Quarry has been identified as a State significant resource, and is on the State Government's Priority Projects List.

**(iv) The recycled water treatment plant and storage ponds**

Yarra Valley Water proposes to establish the RWTP to the south of Woody Hill Quarry, just outside the precinct. Sewage will be treated to Class B recycled water standard at the RWTP, and then pumped to storage ponds for distribution in the northern growth corridor. The storage ponds are proposed to be located within the precinct along Langley Park Drive and Avelin Road, to the west of Woody Hill Quarry and within the quarry buffers.

The North Growth Corridor Plan identifies the RWTP, albeit in a slightly different location (on the storage pond land). It refers to the importance of the RWTP as providing recycled water to the North Growth Corridor.

Yarra Valley Water does not currently own the land to the south of Woody Hill Quarry, where the RWTP is proposed to be located. Negotiations with the landowner (Golina Holdings) are advanced. Yarra Valley Water owns the land on which the storage ponds are proposed to be located.

In the leadup to the Hearing, Yarra Valley Water provided updated information in relation to the proposed location and siting of the RWTP and storage ponds (Document 117), which generally accords with the Future Urban Structure (FUS) on Plan 3 in the exhibited PSP. The exhibited PSP also proposed an odour buffer around the RWTP.

**(v) Key approvals and applications**

**Woody Hill Quarry**

The existing operations at Woody Hill Quarry are approved under Work Authority 492 (WA 492). The proposed expansions are under an amendment to WA 492 (approved), and WA 6437 (yet to be approved). The work authority boundaries and existing and proposed extraction limits are shown in Figure 3.

**Figure 3** Woody Hill Quarry – work authority boundaries and existing and proposed extraction limits under WA 492 and WA 6437



Source: Barro Reply Submission (Document 287)

The existing quarry does not have a planning permit, and operates under existing use rights. Quarrying is currently occurring to the extraction limit approved under WA 492 in 2003. The proposed expansion to the south was approved in February 2020 by a variation to WA 492.

The proposed expansion to the north and east will require a new Work Authority under the MRSD Act. The northern and eastern expansion area has been allocated WA number 6437. At the time of writing, the first step in the statutory approvals for the northern and eastern

expansion (statutory endorsement of a work plan) is complete. Barro has applied for, but has not yet been granted, WA 6437.

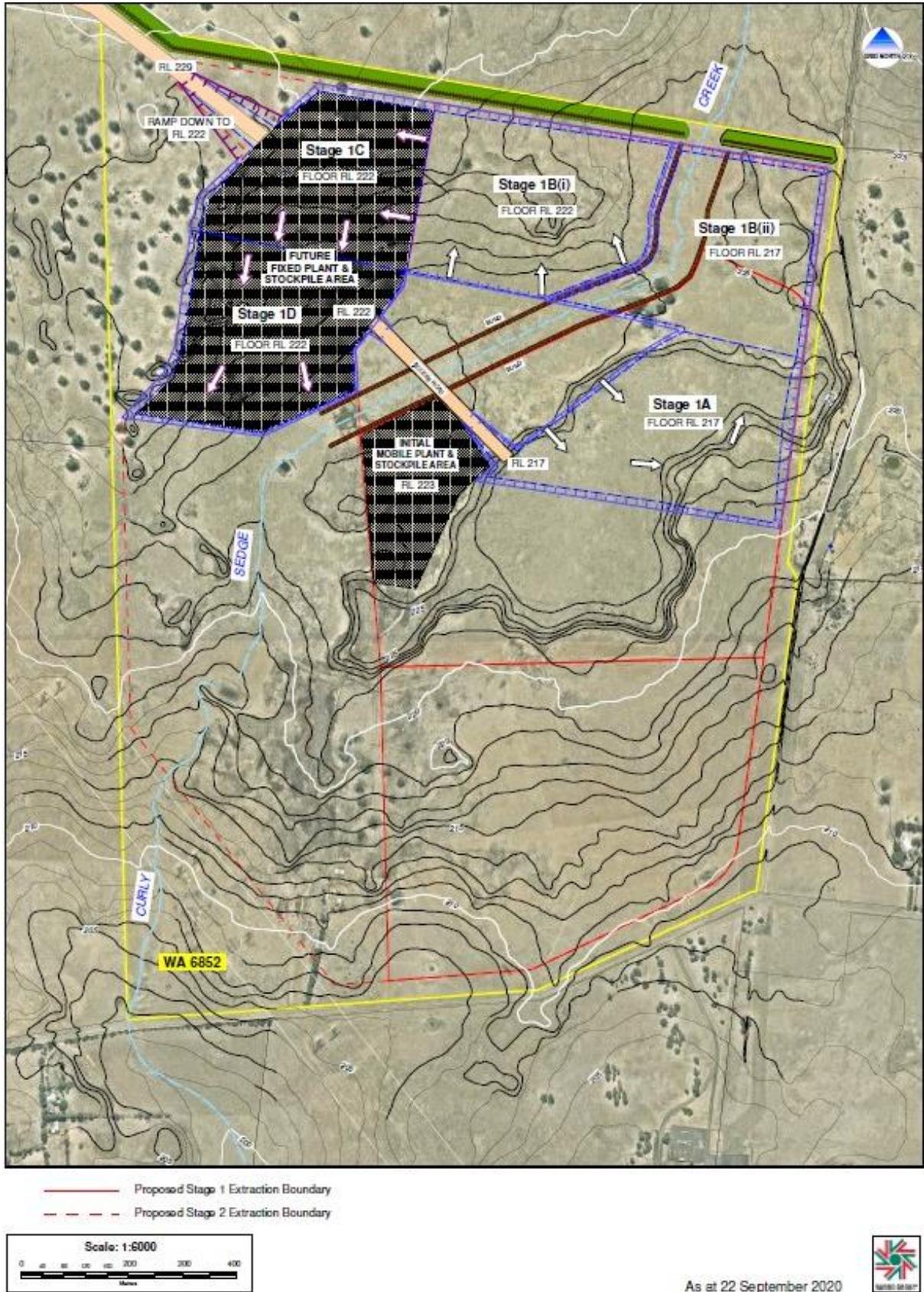
Planning permits for plant and operations related to the Woody Hill Quarry include:

- Permit 710157, which allows the use and development a concrete batching plant. The batching plant is located at the northern end of the WA 492 area, and is currently operating.
- Permit 715902, which allows the use and development the land for (among other things) trade supplies. That use is yet to commence and the permit has been extended so that development must commence by 30 October 2021.

### **Phillips Quarry**

Extraction at Phillips Quarry has not yet commenced. Barro is in the process of seeking a Work Authority for Phillips Quarry (proposed WA 6852). The proposed work authority boundaries and extraction limits are shown in Figure 4.

**Figure 4 Phillips Quarry – proposed work authority boundaries and extraction limits under proposed WA 6852**



Source: Document 18, Annexure 6(e)(ii)

Phillips Quarry has a current planning permit (704901), but does not have current Work Authority. WA 160 previously allowed extraction at Phillips Quarry, but was surrendered by the former quarry operator after Barro acquired the rights to extract. Barro advised that it intends to apply for a new Work Authority for an area slightly larger than that covered by WA 160. The proposed WA area has been allocated WA 6852, although an application for WA 6852 has not yet been lodged.

Permit 704901 was issued in 1999, and has since been extended to require development to commence by July 2024. Whittlesea City Council (Council) advised that the permit will require amending in accordance with the Work Authority, once approved.

### **Subdivision application for the access road and bund**

As noted above, Barro proposes to operate Phillips Quarry and Woody Hill Quarry as an integrated operation, with resource extracted from Phillips Quarry processed on the plants located at Woody Hill Quarry. This will require the construction of an access road between the two quarries.

Barro has entered into an agreement with DJV for DJV to transfer land to Barro Group along the eastern boundary of Woody Hill Quarry and the northern boundary of Phillips Quarry, to allow for the construction of the access road and a bund (Document 164). The access road and part of the bund are shown in Figure 3 above.

Planning Permit Application No. 7188990 was submitted to Council on 23 October 2019. It seeks to re-subdivide land between the Woody Hill Quarry land and the DJV land and realign the common boundary between the two properties. The Panel understand that the purpose of this subdivision and boundary realignment is to provide for the access road between the quarries.

## **1.3 Background**

The initial PSP was prepared by Council in December 2017. The VPA took carriage of the project in February – March 2019.

### **(i) Background reports**

The PSP is supported by a series of background documents prepared on behalf of Council or the VPA:

- Background Summary Report
- Aboriginal Cultural Heritage Assessment
- Arboriculture Assessment
- Bushfire Development
- Community Infrastructure & Open Space Needs Assessment
- Economic Assessment
- Geomorphology and Vegetation Values Assessment – Drainage
- Hydrologic Regime – Drainage
- Land Capability – Environmental Contamination Assessment
- Post Contact Heritage Assessment
- Quarry Impact Assessment and Addendum
- Strategic Transport Modelling Assessment
- Utility Services Infrastructure Assessment

- Visual Character Assessment.

These were exhibited with the Amendment.

## **(ii) Infrastructure Contributions Plan**

A working draft Shenstone Park Infrastructure Contributions Plan (ICP) has been prepared to specify infrastructure contributions to be levied for infrastructure needed as a result of the development of the precinct. The VPA advised that at present, the ICP looks to be a standard levy ICP with no supplementary levy proposed. The VPA intends that the ICP will be introduced through a separate planning scheme amendment, intended to be submitted for approval concurrently with the Amendment.

## **1.4 Summary of issues raised in submissions**

Submissions raised five key issues:

- quarry buffers and land uses and development within the buffers
- the northern extractive expansion area identified for the Woody Hill Quarry
- the RWTP and associated storage ponds
- the extent of employment land to the east and north-east of the Woody Hill Quarry
- sodic and dispersive soils and the risk of erosion.

The VPA categorised other issues into eight broad areas, corresponding to the headings in the PSP:

- Vision outcomes and general matters
- Image, character, heritage and housing
- Town centres and employment
- Open space, community facilities and education
- Biodiversity and bushfire management
- Transport and movement
- Integrated water management and utilities
- Precinct infrastructure and staging.

The Panel has adopted the VPA's characterisation of the issues in structuring its report.

## **1.5 Proposed post-exhibition changes**

### **(i) Part A version**

Having considered submissions, the VPA proposed a number of changes to the Amendment. The VPA tabled an amended PSP and updated planning scheme provisions in the leadup to the Hearing (Document 25, referred to in this report as the Part A version). In summary, the VPA proposed:

#### **Mapping changes**

- amend the extent of the SUZ4 to reflect proposed changes to the FUS
- delete the IPO9 from land zoned SUZ4
- amend the extent of the RCZ applied to 960 Donnybrook Road to reflect amended boundaries to CA28 approved on 1 October 2020
- amend the extent of the Public Acquisition Overlay Schedule 2 (PAO2) along Donnybrook Road to reflect the correct alignment.

**Proposed changes to the FUS and PSP**

- change the footprint of the RWTP to an indicative asterisk and relocate it outside the blast buffers for the quarries
- remove the odour buffer for the RWTP
- remove the blast restriction zone around the RWTP and make consequential adjustments to the Woody Hill Quarry expansion area
- remove the indicative access between the Woody Hill Quarry and the Phillips Quarry
- re-designate the Yarra Valley Water storage pond land in Langley Park Drive from utility facility to industry and light industry.

**Proposed changes to the UGZ7**

- update Plan 1 to reflect the updated FUS
- delete utility facility from Table 1: Applied zone provisions to be consistent with the updated FUS
- make the following changes to the specific provisions land use table:
  - change the reference to the high pressure gas pipeline measurement length to 495 metres
  - exempt utility installation from a permit, subject to conditions to facilitate any future use of the Yarra Valley Water land along Langley Park Drive for holding ponds
  - delete Education centre as requiring a permit within the 'Future Residential Area' and within the Phillips Quarry Sensitive Use Buffer
  - include Place of assembly uses and Informal outdoor recreation as requiring a permit within the Woody Hill Sensitive Use Buffer
  - delete the prohibition of Caretaker's house, Education centre and Hotel within the RWTP odour buffer
- include a permit trigger for earthworks for land identified as being subject to sodic or dispersive soils
- change the specific provision 'No buildings within Woody Hill Blast Buffer' to allow for buildings associated with an extractive industry
- changes to application requirements:
  - change the subdivision – residential development requirement to refer to Head, Transport for Victoria and a Bushfire Site Management Plan
  - Environmental Site Assessment changed to a Preliminary Site Investigation as well as amended wording
  - change the Traffic Impact Assessment requirement to refer to Head, Transport for Victoria
  - include a Sodic and Dispersive Soils Management Plan
  - include an Affordable Housing Assessment
  - include a Dry Stone Wall Management Plan
- changes to permit conditions:
  - Environmental Site Assessment changed to Environmental Audit as well as amended wording
  - include a requirement for a Sodic Soil Management Plan
- changes to decision guidelines:
  - delete the Sewage Treatment Plant decision guideline
  - include an Affordable Housing decision guideline.

**Proposed changes to the SUZ11**

- changes to ensure consistency between the proposed SUZ11 and the underlying Industrial 1 Zone which was updated by Amendment VC175 (gazetted on 26 May 2020)
- changes to allow for buildings associated within an extractive industry within the Woody Hill Blast Buffer.

**Proposed changes to referral and notice provisions**

- changes to referrals to the Secretary to the Department administering the MRSD Act for applications within the 'Future Residential Area'
- delete the referral to the EPA for applications within the 'sewage treatment plant odour buffer'
- changes reference to the measurement length to 495 metres.

**Proposed changes to the heritage Statement of Significance**

- updated wording.

With some exceptions, these changes were largely uncontroversial and were not the subject of submissions or discussion at the Hearing. The Panel has reviewed the Part A versions and generally supports the changes shown, except where explicitly stated otherwise in this report.

**(ii) Part C version**

The VPA tabled further revisions to the PSP and planning scheme provisions in advance of its closing submission (Document 275, referred to in this report as the Part C version). In summary, the main changes in the Part C version were:

**PSP**

- changes to the extent of the northern expansion of Woody Hill Quarry
- changes to the quarry buffers
- update the Vision statement to better reflect the significance of the quarries
- changes to Requirements R19/R20 relating to development within the 'Future Residential Area'
- changes to the location of RWTP to reflect the updated information provided by Yarra Valley Water in Document 117, plus reinstatement of the odour buffer
- remove the Local Convenience Centre East from the FUS
- changes to the Guidelines relating to affordable housing
- changes to allow additional trees to be removed
- minor changes to the road network and access points
- minor changes to the location of certain drainage assets.

**UGZ7**

- minor changes to the wording of the Table of Uses and the heritage provisions to reflect recommendations from John Glossop
- new wording for the provisions relating to Land Management Cooperative Agreements for the Conservation Areas, to reflect updated wording provided by DELWP (the same change was proposed to the IPO8)
- updated decision guidelines in relation to residential development within the 'Future Residential Area'

**Referral provisions**

- changes to require referral of an application for the RWTP to the Secretary of the Department of Jobs, Precincts and Regions (DJPR), as the RWTP was relocated back within the quarry blast buffers.

The Panel has reviewed the Part C versions and generally supports the changes shown, except where explicitly stated otherwise in this report. The Panel's recommendations are based on the Part C versions.

**1.6 Procedural issues****(i) Requests for production of quarry approvals and the agreement regarding the access road between the quarries**

At the Directions Hearing, 1100 Donnybrook Rd Pty Ltd sought directions requiring DJPR to produce copies of the Work Authorities and Work Authority Applications for the quarries. Yarra Valley Water supported the request. Barro and DJPR objected on the basis that Work Authorities and Work Authority Applications contain information that is sensitive and commercial in confidence.

The Panel determined to direct that Barro provide detailed information about current and future quarry operations (Direction 6), and copies of any Work Authority or Work Authority Application on which it intended to rely (Direction 7). It also directed the production of a Quarry Statement identifying (among other things) identify key factual information about the Woody Hill Quarry and the Phillips Quarry (for example, the nature of the resource, status of current approvals and applications etc) (Direction 14). The Panel indicated that it would make a further assessment of whether it should direct the production of the Work Authorities after it received the information required from Barro, and the Quarry Statement. The Panel's Directions are contained in Document 4.

1100 Donnybrook Rd made a further request for directions for the production of documents relating to the quarries, and to an agreement and terms sheet between Barro and DJV relating to the transfer of land and construction of the access road and bund between the quarries (Documents 21, 22, and 31). 910 Donnybrook Road Pty Ltd made similar requests (Document 38). Barro provided some further information in response to the request, but otherwise opposed the request, including on the ground that the request covered material that was commercial in confidence (Documents 23, 24, 30, 32, 33).

The Panel determined to grant the request in part, including directing the production of the agreement and terms sheet between Barro and DJV. The Panel's further directions are in Documents 46 and 157. DJV subsequently produced these documents (Documents 164 and 201).

**(ii) The Part C Amendment documents**

As noted above, the VPA tabled Part C versions of the PSP and UGZ7 (among other documents) toward the end of the Hearing. DJV objected to the production of what it considered to be new material late in the Hearing, after parties had concluded their cases and had limited opportunity to respond (Document 290). The Panel issued directions providing all parties with the opportunity to provide written comments on the Part C versions after the conclusion of

the Hearing, as well as an opportunity for the VPA to make any further written comments in reply. These have been considered by the Panel in its deliberations.

## **1.7 The Panel's approach**

The Panel considered all written submissions made in response to the exhibition of the Amendment, observations from site visits, and submissions, evidence and other material presented to it during and after the Hearing. It has reviewed a large volume of material, and has had to be selective in referring to the more relevant or determinative material in the Report. All submissions and materials have been considered by the Panel in reaching its conclusions, regardless of whether they are specifically mentioned in the report.

## **2 Precinct Structure Plan**

### **2.1 Role and function of the PSP**

The Shenstone Park PSP is a long term plan that provides high level guidance for future planning and development of the area. It outlines the infrastructure and essential services required to support the proposed land uses and to meet the needs of the future community. The resulting urban environment will be a logical extension of the development profile to be established generally in accordance with neighbouring PSPs.

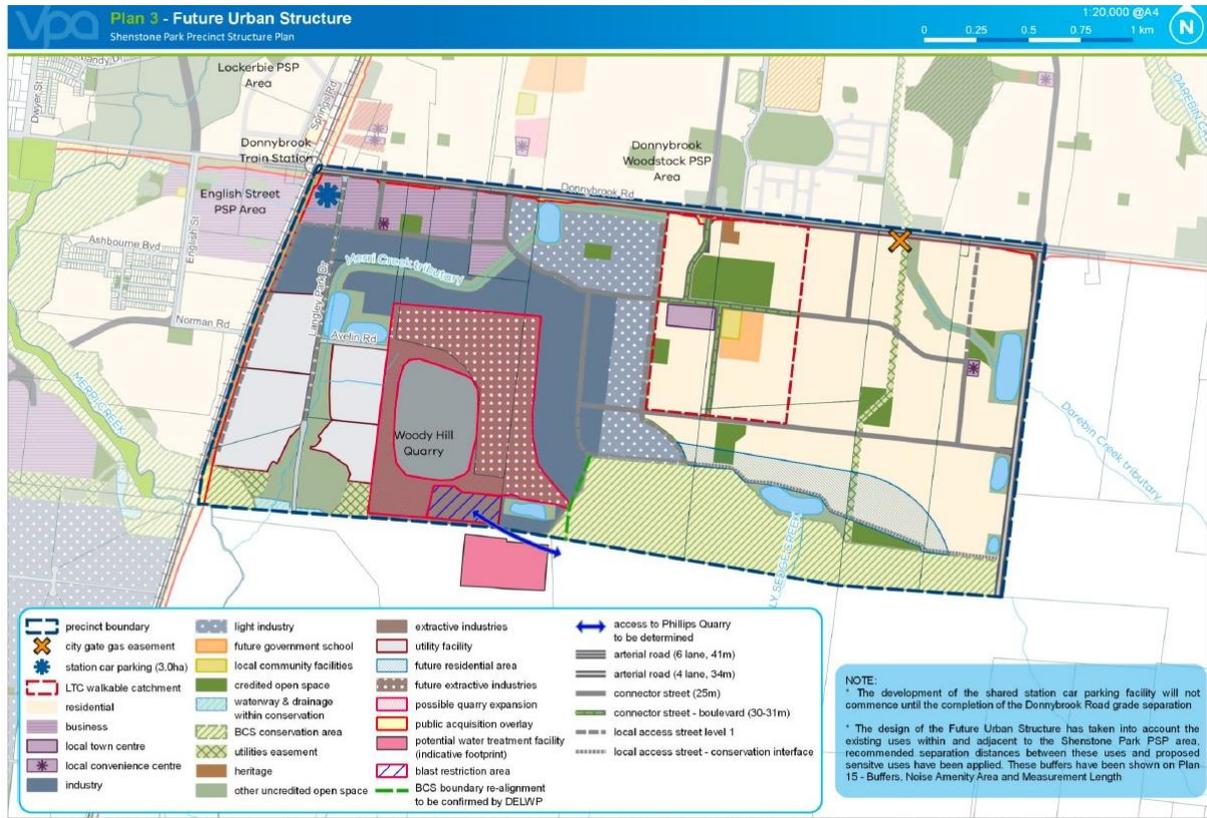
The PSP includes a Precinct Infrastructure Plan (PIP) detailing infrastructure to be included in the Shenstone Park ICP, giving certainty about future development requirements of the precinct.

### **2.2 The Future Urban Structure**

The FUS is shown in Plan 3 of the PSP. The exhibited FUS is extracted in Figure 5, and the updated FUS tabled by the VPA prior to the Hearing (the Part A version, Document 25) is extracted in

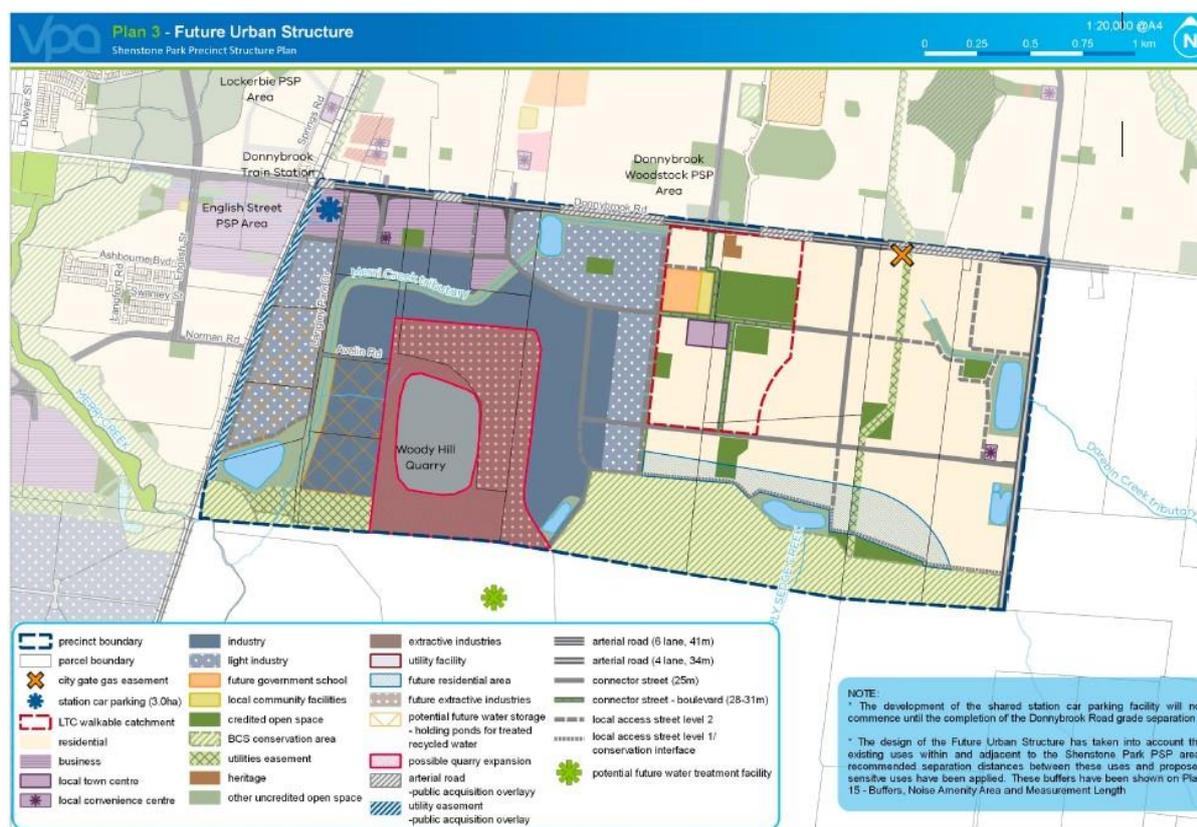
Figure 6.

Figure 5 Exhibited Future Urban Structure



Source: Exhibited PSP

Figure 6 Part A Future Urban Structure



Source: Part A PSP (Document 25(a))

The main changes between the exhibited and Part A versions are summarised in Chapter 1.5(i).

## 2.3 Vision and objectives

### (i) Vision

The PSP envisages a mixed residential and employment precinct of around 3,660 homes and 4,570 jobs. Development will progress alongside the existing Woody Hill and proposed Phillips quarries, with buffers in place to ensure separation between the quarries and sensitive uses. Key elements of the vision for the precinct are:

- a high quality urban environment that celebrates natural features and is supported by landscaping, strong connections to transport and community facilities
- a self-sufficient precinct that delivers a wide range of housing types, employment opportunities and uses
- an urban extension to the Donnybrook Woodstock and English Street precincts
- a Local Town Centre that anchors the precinct, and serves a variety of roles and functions to promote self-sufficiency for residents in meeting daily retail and convenience shopping needs, community uses and recreation opportunities
- diverse housing choices, including higher densities within the Local Town Centre's walkable catchment and adjacent to some open space

- a permeable network of pedestrian friendly streets and paths and off-road paths and on-road bicycle links, integrated with the Principal Public Transport Network including links to Donnybrook Train Station
- a road network that emphasises connections to surrounding communities, particularly Donnybrook-Woodstock, with Donnybrook Road and Koukoura Drive identified as key arterial connections
- development that responds to nationally significant conservation areas which provide buffers to key existing economic and employment generators, including Woody Hill Quarry and Phillips Quarry.

## **(ii) Objectives**

The PSP outlines 24 objectives in clause 2.2, which include:

- Implement the North Growth Corridor Plan.
- To achieve a high-quality gateway to the City of Whittlesea by ensuring urban design of the area along Donnybrook Road considers and enhances the Donnybrook train station.
- Deliver high quality interfaces between residential, employment land and utilities (including the proposed sewerage treatment plant) to minimise impacts of industrial and commercial uses on residential amenity, and to ensure the viability of industrial and commercial land uses.
- Identify, retain and celebrate cultural heritage places and Aboriginal cultural heritage places by integrating them into the design of new areas through place making.
- Deliver approximately 3,600 new homes across the precinct and promote increased housing choice and density within a walkable catchment of town centres, high amenity areas and public transport.
- To deliver a high amenity Local Town Centre catering to the daily needs of surrounding residents, along with creating local employment opportunities and help create a sense of place, identity and local character.
- To design a Local Town Centre that can adapt and evolve over time, while also encouraging commercial and residential uses above ground to support Local Town Centre activity.
- To ensure appropriate separation distances between industry/utilities and sensitive uses.
- Deliver employment land for a variety of sectors through industrial and commercial precincts that allow the continued operation and expansion of the Woody Hill quarry and commencement and expansion of the Phillips Quarry.
- To provide open space that is safe and accessible to all which offers active and passive recreation opportunities, including developing recreation opportunities along waterways and the gas pipeline.
- To develop a network of local parks, sports reserves and community hubs that provide access to education, recreation and health services across the Shenstone Park Precinct that are connected and accessible via walking, cycling and public transport.
- To contribute to the long-term conservation of significant flora and fauna species through the protection of habitat, particularly of Biodiversity Conservation Strategy conservation areas, River Red Gums and other remnant indigenous trees.
- Ensure that bushfire protection measures are considered in the layout and design of development including the local street network.
- To establish an integrated, safe, sustainable and permeable transport network that reduces car dependency, maximises access to public transport and encourages walking and cycling within and between neighbourhoods.

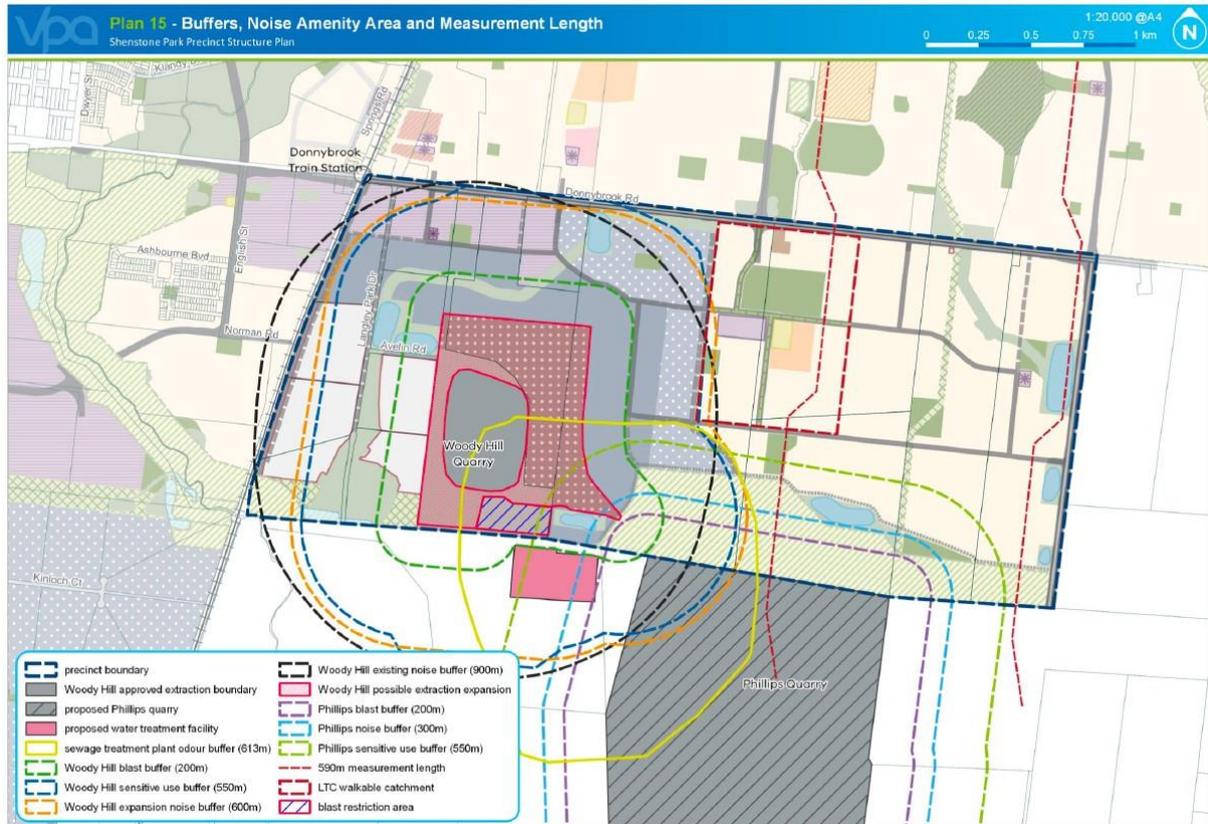
- To deliver an integrated water management system that reduces reliance on reticulated potable water, increases the re-use of alternative water, responds to local soil types, minimises flood risk, ensures waterway health and contributes towards a sustainable and green urban environment.

## 2.4 Buffers

### (i) Plan 15

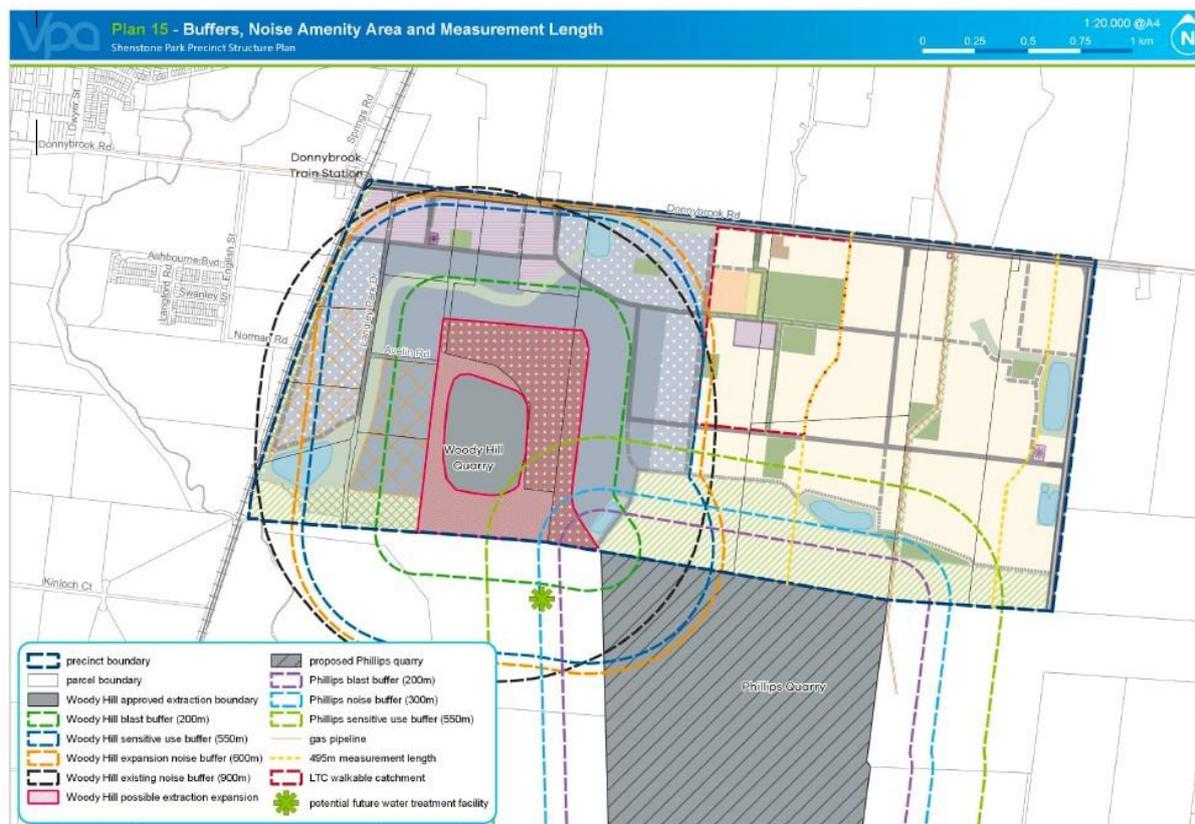
The exhibited PSP applies a number of buffers which are shown on Plan 15. Figure 7 shows the exhibited buffer plan, and Figure 8 shows the Part A buffer plan (Document 25). The key changes are the removal of the odour buffer around the proposed Wollert Recycled Water Treatment Plant (RWTP), and the extension of the Woody Hill Blast Buffer into the area formerly shown as the indicative footprint of the RWTP. There were also some minor adjustments to the south eastern corner of the Woody Hill buffers to facilitate connection with the Phillips Quarry.

Figure 7 Exhibited Buffer Plan



Source: Exhibited PSP

Figure 8 Part A Buffer Plan



Source: Revised Part A PSP (Document 25(a))

The main changes between the exhibited and Part A versions are summarised in Chapter 1.5(i).

The PSP deals specifically with the buffers in section 3.8.4:

The PSP responds to the current operation of the Woody Hill Quarry and allows for its future expansion. Buffers for noise, sensitive use and blasting are shown on Plan 15, calculated from the maximum possible extent of expansion, given known constraints. The Phillips Quarry has also been shown on Plan 15 as its future operation impacts the development of residential land in the south east of the PSP area. These two quarries are of strategic importance to the State and the earth resources in these locations need to be protected and utilised. These resources take precedence over private development and the buffers shown on Plan 15 are intended to ensure the quarries can operate while protecting amenity and human health and safety.

The Wollert Sewerage Treatment Plant (STP) has also been shown on Plan 15. While it sits outside the PSP area and is only in early stages of planning, when constructed it will have an odour buffer of 613m (directional) and this impacts the PSP area. Sensitive uses within the odour buffer are not permitted.

## (ii) Requirement R19/R20

The PSP contains one Requirement in relation to the buffers (exhibited as R19, changed to R20 in the Part A version), which was one of the more controversial issues in the Hearing.

The 'Future Residential Area' represents the otherwise developable residential land that is contained within the Phillips Quarry Sensitive Use Buffer. R19 restricts development in the future residential area. The exhibited version of R19 read:

Development (including subdivision) is not permitted in the “future residential area” identified on Plan 3, until such time as DJPR determines that the earth resources in the Phillips Quarry have been extinguished, or that the Sensitive Use Buffer is no longer required.

The VPA provided revised wording in Document 196:

Development (including subdivision) in the “future residential area” identified on Plan 3 must not reduce the efficiency and practicality of:

- the opportunity to extract stone resources within 500\* metres of the future residential area within 15 years of gazettal of the PSP; or
- any approved stone extraction operation for the Phillips Quarry.

(The asterisk referred to a note stating that the buffer distance was subject to evidence).

The VPA provided further revised wording for the Requirement (now R20) in the Part C version:

Development (including subdivision) in the “future residential area” identified on Plan 3 should not unreasonably reduce the ability to:

- extract stone resources within 480 metres of the future residential area within 15 years of gazettal of the PSP; or
- carry out any approved stone extraction operation for the Phillips Quarry.

## 3 Planning context

### 3.1 Victorian planning objectives

Section 4 of the *Planning and Environment Act 1987* (the PE Act) sets out the objectives of planning in Victoria:

- (a) to provide for the fair, orderly, economic and sustainable use, and development of land
- (b) to provide for the protection of natural and man-made resources and the maintenance of ecological processes and genetic diversity
- (c) to secure a pleasant, efficient and safe working, living and recreational environment for all Victorians and visitors to Victoria
- (d) to conserve and enhance those buildings, areas or other places which are of scientific, aesthetic, architectural or historical interest, or otherwise of special cultural value
- (e) to protect public utilities and other assets and enable the orderly provision and co-ordination of public utilities and other facilities for the benefit of the community
- (f) to facilitate development in accordance with the objectives set out in paragraphs (a), (b), (c), (d) and (e)
- (fa) to facilitate the provision of affordable housing in Victoria
- (g) to balance the present and future interests of all Victorians.

### 3.2 Ministerial Directions and Planning Practice Notes

#### (i) The Strategic Assessment Guidelines

*Ministerial Direction 11 – Strategic Assessment of Amendments* and the associated *Planning Practice Note 46 – Strategic Assessment Guidelines for preparing and evaluating planning scheme amendments* (PPN46) are particularly important in the consideration of the Amendment.

PPN 46 confirms that the Planning Policy Framework and the objectives of planning must be taken into consideration when preparing and evaluating a planning scheme amendment. It acknowledges that there may be competing objectives that need to be balanced in favour of net community benefit and sustainable development. It also highlights the need for environmental, social and economic effects to be considered.

The exhibited Explanatory Report outlines how the Amendment meets the relevant requirements of Ministerial Direction 11 and PPN 46. That discussion is not repeated here.

#### (ii) Ministerial Direction 12 – Urban Growth Areas

Ministerial Direction 12 applies to amendments that incorporate a PSP in a planning scheme. It requires that the amendment implements the relevant Growth Area Framework Plan (in this case, the North Growth Corridor Plan).

#### (iii) Planning Practice Note 89 – Extractive Industry and Resources

*Planning Practice Note 89 – Extractive Industry and Resources* (PPN 89), updated in February 2020, provides information and guidance about protecting Victoria's extractive resources and

the initiatives the Victorian Government is taking to improve the regulation and protection of extractive industry and resources. It provides a useful overview of the importance of protecting Victoria's extractive resources, stating (Panel's emphasis):

The building materials used in construction – concrete, road base, asphalt, aggregates, bricks and paving – are all made from stone, sand, clay, most of which come from quarries across Victoria. These raw extractive resources are the foundation of Victoria's built environment, contributing to the State's economic development, jobs, liveability and community wellbeing.

A study commissioned by the Victorian Government to identify the future areas of highest demand and the future sources of extractive resources estimated that demand is expected to almost double between 2015 and 2050 to about 88 million tonnes annually (the Extractive Resources in Victoria, Demand and Supply Study 2015 – 2050 is available on the ERR website).

Extractive resources are expensive to transport, so it is important to be able to source them close to where they will be needed the most, particularly around Melbourne's growth areas and major regional centres across Victoria. This helps to keep construction costs down. Minimising the distances that trucks transporting these resources need to travel also helps to reduce traffic congestion, protect the amenity of local areas, reduce wear and tear on roads, and reduces the carbon footprint.

In the past, urban areas have been allowed to expand close to operating extractive industries or over land with potential for further extractive resource development. As a result, many quality extractive resources close to potential markets in the Melbourne metropolitan area are no longer available for extraction. If not managed, urban encroachment, rural residential expansion and other incompatible development will constrain the operations of existing quarries and curtail future supplies of extractive resources.

Extractive industries have been and will continue to be pivotal to Victoria's future prosperity and so it is necessary to identify and protect extractive resources for future extraction.

PPN 89 refers to other information available in relation to the protection and expansion of extractive resources in Victoria, including:

- *Joint Ministerial Statement on Extractive Resources* (July 2018)
- *Helping Victoria Grow: Extractive Resources Strategy* (June 2018)
- *Helping Victoria Grow: Extractive Resources in Victoria, Demand and Supply Study, 2015-2050* prepared by Pricewaterhouse Coopers in May 2016.

### 3.3 Growth area planning

#### (i) Growth Corridor Plans

*Growth Corridor Plans: Managing Melbourne's Growth* (June 2012) provides a policy framework to guide the planning of new communities in each of the four growth corridors. The Growth Corridor Plans guide and inform future decisions regarding urban development and infrastructure that may be required to service these new communities over the long term. They identify:

- the intended long term pattern of land use and development
- committed transport networks as well as network options for investigation
- committed regional open space networks as well as investigation sites
- opportunities for creating green corridors.

Page 7 of the Growth Corridor Plans states:

Before development can commence, detailed planning for each precinct must occur in the form of individual Precinct Structure Plans (PSPs), which must be 'generally in accordance' with the Growth Corridor Plans.

A PSP is a consultative process and allows all stakeholders the opportunity to participate in the detailed planning of a precinct.

PSPs fill in the detail of the broader picture presented by the Growth Corridor Plans. They set the pattern for neighbourhood development and ensure that individual developments, which may occur over a number of years, effectively fit together to create an attractive, convenient and sustainable local community.

Eight principles underpin the Growth Corridor Plans. These principles inform the preparation of the plans and guide the preparation of PSPs. PSPs are the primary vehicle for the implementation of the Growth Corridor Plans.

Principle 7, 'Plan for Environmental Sustainability', sets out factors that should be considered in the preparation of Growth Corridor Plans and PSPs, including:

#### 3.7.4 Maintaining local quarrying potential

The Growth Corridors contain significant mineral resources and a number of operating quarries. To avoid the need to transport construction materials substantial distances it is important to enable the continued operation of these quarries and for appropriate buffers to be maintained from the working surfaces of all quarries.

### (ii) North Growth Corridor Plan

The North Growth Corridor Plan (Figure 9 below) identifies the strategic context of the Shenstone Park precinct. It identifies the precinct as:

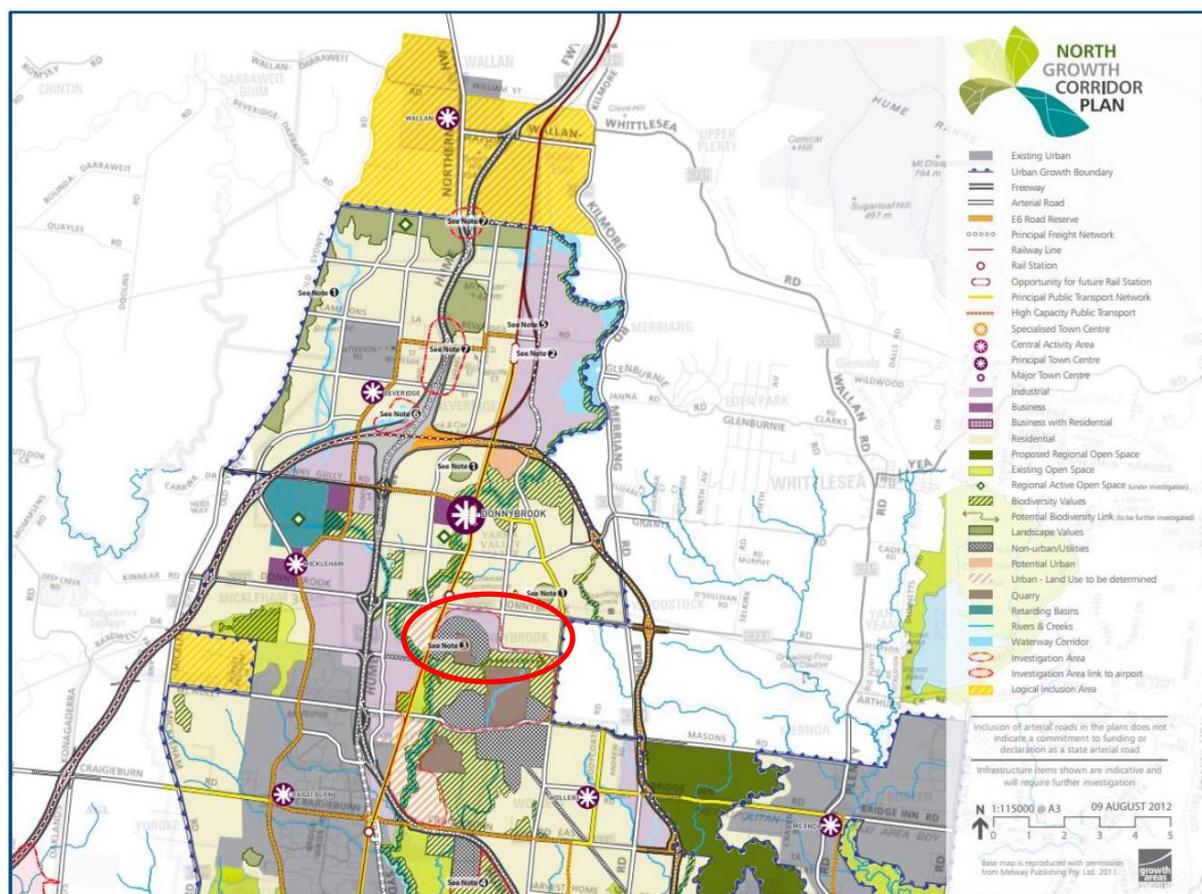
- quarry, non-urban/utilities and industrial land uses in its western half, within an 'Urban Development Investigation Area'
- residential land uses and biodiversity values in the eastern half.

Clause 5.8 expands on the Urban Development Investigation Area which includes the western part of the precinct. It refers to complex environmental and connectivity issues, and the need for buffers to existing quarries or future utility uses. It states:

... Further investigation at the PSP level in relation to quarrying, drainage, suitability of land use types and yields, buffers and access will need to be undertaken to determine the sites development potential ...

The eastern boundary of the precinct shows a future north-south arterial road as part of the Principle Public Transport Network. This is Koukoura Drive. Note 3 on the plan indicates a Sewerage Treatment Plant to the south of the precinct (the Wollert RWTP), with its boundary and size to be determined.

Figure 9 Northern Growth Corridor Plan



Source: VPA's Part A submission (Document 48), with the Panel's annotation

### 3.4 Extractive industry policy

At the Panel's Direction, the VPA provided a Quarry Statement in the leadup to the Hearing which was developed in consultation with DJPR, Barro, Council, Yarra Valley Water and the EPA (Document 36). The Quarry Statement was required to (among other things) identify statements of government policy, including state and local planning policy, and any other relevant adopted State policy around resource protection and extraction. The Quarry Statement provides a comprehensive summary and analysis of the extractive industry policy framework, which is not repeated here.

### 3.5 Other relevant planning strategies and policies

#### (i) Plan Melbourne

*Plan Melbourne 2017-2050* sets strategic directions to guide Melbourne's development to 2050, to ensure it becomes more sustainable, productive and liveable as its population approaches 8 million. It outlines a target of 1.6 million new homes and 1.5 million new jobs over the next 35 years, and reinforces the use of PSPs to guide the development of land within the Urban Growth Boundary.

Plan Melbourne is structured around seven Outcomes, which set out the aims of the plan. The Outcomes are supported by Directions and Policies, which outline how the Outcomes will be achieved. Outcomes that are particularly relevant to the Amendment are set out in Table 1.

**Table 1** Relevant parts of Plan Melbourne

Outcome	Directions	Policies
1 - Melbourne is a productive city that attracts investment, supports innovation and creates jobs	1.4 – Support the productive use of land and resources in Melbourne’s non-urban areas	1.4.2 – Identify and protect extractive resources (such as stone and sand) important for Melbourne's future needs
2 - Melbourne provides housing choice in locations close to jobs and services	2.1 – Manage the supply of new housing in the right locations to meet population growth and create a sustainable city	2.1.1 – Maintain a permanent urban growth boundary around Melbourne to create a more consolidated, sustainable city
	2.2 – Deliver more housing closer to jobs and public transport	2.2.5 – Require development in growth areas to be sequenced and staged to better link infrastructure delivery to land release
	2.5 – Provide greater choice and diversity of housing	2.5.2 – Provide a range of housing types in growth areas
5 - Melbourne is a city of inclusive, vibrant and healthy neighbourhoods	5.1 – Create a city of 20-minute neighbourhoods	5.1.1 – Create mixed-use neighbourhoods at varying densities

Policy 1.4.2 specifically references the need to appropriately sequence the extraction of natural resources and urban development within the Urban Growth Boundary. The text states (Panel’s emphasis):

There are a small number of extractive industry interest areas within Melbourne’s urban growth boundary—such as Boral at Ravenhall. The sequencing of urban development in growth areas should allow strategic resources such as stone and sand to be extracted ahead of establishing urban areas, with provision for these areas to proceed outside defined buffer zones that can be subsequently in-filled by other urban land uses. If not managed, urban encroachment, rural residential expansion and other incompatible development will constrain the operations of existing quarries and curtail future supplies of extractive resources — endangering Melbourne’s medium- to long-term growth prospects. To secure a long-term supply of extractive resource materials at competitive prices, current extractive industries must be protected and future extractive resource areas must be identified.

## (ii) Melbourne Industrial and Commercial Land Use Plan

The Melbourne Industrial and Commercial Land Use Plan (MICLUP) was publicly released by DELWP in 2020. It builds on the relevant policies and actions of Plan Melbourne and the Plan Melbourne 2017-2050 Five-Year Implementation Plan.

MICLUP provides an overview of current and future needs for industrial and commercial land across metropolitan Melbourne, and puts a planning framework in place that will enable state and local government to more effectively plan for future employment and industry needs, and better inform strategic directions.

The plan states:

Shenstone Park includes approximately 280 hectares of regionally significant industrial land identified through the North Growth Corridor Plan and PSP process. This land provides an important buffer to existing and proposed quarry operations, a proposed sewerage treatment plant to the south, and nearby residential land uses. This precinct has good access to the Hume Freeway from Donnybrook Road.

### **(iii) Precinct Structure Plan Guidelines**

The Precinct Structure Plan Guidelines (2013) provide a tool for designing and delivering better quality communities in growth areas. They set out the key objectives of growth area planning and include a step by step guide to preparing PSPs that will deliver on the identified objectives.

## **3.6 Planning scheme provisions**

A common purpose of all zones and overlays is to implement the Planning Policy Framework.

### **(i) Zones**

#### **Urban Growth Zone**

Large parts of the precinct are currently within the UGZ. The UGZ applies to land that has been identified for future urban development and is used to manage the transition of non-urban land into urban land.

The application of the UGZ does not, by itself, allow urban use and development to proceed. A PSP must be prepared and applied to the land before this can occur.

Other purposes of the UGZ include:

- To provide for a range of uses and the development of land generally in accordance with a precinct structure plan
- To provide for the continued non-urban use of the land until urban development in accordance with a precinct structure plan occurs
- To ensure that, before a precinct structure plan is applied, the use and development of land does not prejudice the future urban use and development of the land.

Until a PSP is prepared and a bespoke UGZ Schedule is introduced, the table of uses at Clause 37.07-1 under *'Part A – Provisions For Land Where No Precinct Structure Plan Applies'* apply.

The zone allows for a range of new uses to be considered, and specifically prohibits uses that are likely to impact the long term realisation of urban development in the precinct. Extractive industry is a contemplated use in the UGZ.

#### **Rural Conservation Zone**

The southern parts of the precinct, including CA28 and CA34, are currently zoned RCZ. The Amendment proposes to adjust the RCZ boundaries to reflect the Conservation Area boundaries. Relevant purposes of the RCZ include:

- To conserve the values specified in a schedule to this zone.
- To protect and enhance the natural environment and natural processes for their historic, archaeological and scientific interest, landscape, faunal habitat and cultural values.
- To protect and enhance natural resources and the biodiversity of the area.

- To encourage development and use of land which is consistent with sustainable land management and land capability practices, and which takes into account the conservation values and environmental sensitivity of the locality.
- To provide for agricultural use consistent with the conservation of environmental and landscape values of the area.
- To conserve and enhance the cultural significance and character of open rural and scenic non urban landscapes.

### **Special Use Zone**

The Woody Hill Quarry (and the Phillips Quarry) are currently zoned SUZ4. The Amendment proposes to rezone the Woody Hill Quarry expansion area from Farming Zone to SUZ4, which will facilitate the northern and eastern expansion of the quarry. The purposes of the SUZ4 are:

- To recognise or provide for the use and development of land for earth and energy resources industry.
- To encourage interim use of the land compatible with the use and development of nearby land.
- To encourage land management practice and rehabilitation that minimises adverse impact on the use and development of nearby land.

### **(ii) Overlays**

#### **Environmental Significance Overlay**

Land within the precinct is currently subject to the ESO4. The Amendment proposes to delete the ESO4, and apply the ESO6. The ESO4 and ESO6 are specifically tailored to protect Conservation Areas identified in the BCS. The ESO4 applies to 'Rural Conservation Areas', and the ESO6 applies to 'Urban Conservation Areas'. The purposes of the ESO are to identify areas where the development may be affected by environmental constraints, and to ensure that development is compatible with identified environmental values.

#### **Heritage Overlay**

The Amendment proposes to apply the HO to the remnants of the dairy at 1030 Donnybrook Road. The purposes of the HO are:

- To conserve and enhance heritage places of natural or cultural significance.
- To conserve and enhance those elements which contribute to the significance of heritage places.
- To ensure that development does not adversely affect the significance of heritage places.
- To conserve specified heritage places by allowing a use that would otherwise be prohibited if this will demonstrably assist with the conservation of the significance of the heritage place.

#### **Incorporated Plan Overlay**

The Amendment proposes to apply the IPO8 to the Conservation Areas, and the IPO9 to the SUZ land, including Woody Hill Quarry and the transmission easement. The purposes of the IPO are to identify areas which require the form and conditions of future use and development to be shown on an incorporated plan before a permit can be granted to use or develop the land.

## **4 Strategic justification**

### **4.1 The issues**

The issues are:

- is the Amendment generally strategically justified?
- are external quarry buffers strategically justified?
- is the 'future extractive industries' northern extent strategically justified?
- is the 'future extractive industries' eastern extent strategically justified?

The strategic justification for the amount of employment land is dealt with in Chapter 7.

### **4.2 General strategic justification**

#### **(i) Evidence and submissions**

No party (or submission) challenged the general strategic justification for the Amendment. All submissions generally supported the Amendment, although several submissions expressed reservations about key strategic issues including the justification for external buffers around the quarries, and the justification for the amount of employment land shown in the FUS. These issues are dealt with separately in Chapters 4.3 and 7.

The VPA submitted that the Amendment has addressed:

- environmental effects, as the pattern of land use and development was guided by studies of the area relating to flora and fauna, flooding and drainage
- social and economic effects, as it provides for additional housing and community facilities and local employment opportunities.

The VPA called Mr Glossop to give planning evidence (Document 120). He undertook a comprehensive analysis of the strategic context for the Amendment and assessed it against the Victorian planning objectives, the Strategic Assessment Guidelines and applicable Ministerial Directions and Planning Practice Notes. He concluded that overall, the Amendment is strategically sound. No other planning witnesses challenged this overall assessment.

#### **(ii) Discussion**

The Panel is satisfied that overall, the Amendment is strategically justified. The FUS shown in the PSP, and the associated applied zones in the UGZ7, are generally consistent with the North Growth Corridor Plan in terms of land use mix and overall layout. The FUS appropriately provides for a town centre, school and other community facilities to serve local needs.

#### **(iii) Conclusion and recommendation**

The Panel concludes:

- In an overall sense, the Amendment is generally consistent with the strategic policy framework, including the North Growth Corridor Plan. Subject to the remaining findings and recommendations in this report, the Amendment is strategically justified and should be supported.

The Panel recommends:

**Adopt Whittlesea Amendment C241wsea based on the Part C version of the Amendment documents (Document 275), subject to the specific recommendations in this report.**

### 4.3 External buffers

#### (i) Evidence and submissions

##### The VPA

The VPA submitted that Plan Melbourne looks to growth area planning, and in particular precinct structure planning to manage land use conflicts. Competing policies in favour of allowing urban development in a growth area and protecting extractive industries must be balanced in favour of net community benefit and sustainable development. It submitted that the policy context supports the protection of the resources in the quarries, and the potential for future expansions of the quarries.

The VPA highlighted various policy statements which seek to protect extractive resources, including:

- Plan Melbourne seeks to avoid an outcome where urban encroachment endangers the long term supply of extractive materials, and supports the sequencing of urban development to *“allow strategic resources such as stone and sand to be extracted ahead of establishing urban areas”*.
- PPN 89 recognises the importance of protecting extractive resources, and states that *“If not managed, urban encroachment ... will constrain the operations of existing quarries and curtail future supplies of extractive resources”*.
- *Helping Victoria Grow: Extractive Resources Strategy* recognises the need to ensure continued supply of extractive resources in Whittlesea, which is within the top 20 strategic resources local government areas identified in the Strategy.

Mr Glossop’s planning evidence for the VPA was that the policy framework generally supports the long term protection of stone resources (particularly those on the Priority Projects List, of which Woody Hill is one) where consistent with overall planning objectives. He stated:

In my view, there is a planning logic in (a) planning for the exploitation of this significant resource and (b) using the quarry buffer land for employment purposes or other uses that are compatible with the purposes of the buffer.

Mr Glossop considered that the Woody Hill buffers were appropriate. He was less comfortable with the Phillips Quarry buffers – in particular, the restrictions within the Future Residential Area.

Mr Glossop did not consider it would be ‘orderly’ planning to allow for residential development within the Future Residential Area, as it would potentially cause land use conflict and/or impede the quarry’s ability to extract the resource. However he did not consider that it would be ‘fair’ to blight the Future Residential Area for an unspecified length of time with no certainty that the resource would be extracted and with no certainty around the review process to change the extent of the buffer. His evidence was:

While I consider it is appropriate to protect the resource and the maximum extent of its buffer, my support for this approach is not unequivocal. The ordinance and the PSP need to recognise that if quarrying or approvals for quarrying do not commence in a reasonable amount of time, there needs to be a mechanism to allow for some

adjustment. Notionally, R19 allows for this to be achieved to some degree, in the event that the buffer was “no longer required”. However, it leaves the decision solely at the discretion of the DJPR. I do not think it is appropriate for DJPR to be the sole arbiter of that decision and that a different strategic process of reviewing the buffer should be undertaken periodically – over a period of every 10 years, for instance.

This review should consider the rock resource, the strategic need to protect the resource and review any demand for housing within the northern growth corridor.

Alternatively, the ordinance could be amended to allow the responsible authority to approve housing within the buffer area, after a certain period of time, in consultation with DJPR, but with the responsible authority having the discretion.

Subject to these comments, I support the VPA’s position.

Mr Glossop considered that the buffers should be ‘sunsetting’ when quarrying activity ceases.

### **Barro**

Barro submitted that the Amendment “*rightly prioritises extraction of major sources of raw materials over standard urban development in this location*”. It submitted:

Ultimately, facilitation of the private interests of submitters is not the purpose of this exercise; rather, the Amendment should maximise the community benefit of the future users of this precinct and the broader community.

Barro submitted that urban growth requires raw materials, and the Woody Hill and Phillips quarries are well located to provide essential raw materials for the growth that will occur over the next few decades in the north of Melbourne. It pointed out that while there is flexibility in where residential development can go, there is no flexibility in where an exploitable resource exists. Further, the buffers would not prevent urban development – rather they would delay it.

Barro submitted that it was not suggesting that policy for the protection of natural resources should be weighed above all other planning imperatives, but that “*there is so much policy support for the protection of natural resources that, in the balancing exercise, it has more weight than other planning imperatives such as provision of employment land*”.

Barro supported the application of buffers to protect the stone resource, but submitted that they should not be “*overly conservative*”. It considered that the buffers as exhibited were generally larger than they needed to be, and that the Blast Buffer in particular is a “*blunt tool*”. It submitted that there should be more flexibility to allow for appropriate uses and developments within the Blast Buffer.

Barro called Mr de Silva to give planning evidence (Document 104). He considered that it was “*highly relevant*” that planned urban development was effectively encroaching on land that has been previously identified and/or approved for extractive purposes. He advocated the following approach in respect of both quarries:

- Existing and proposed land uses should not be assessed ‘competitively’ – there should be no need to establish the value of the resource nor to identify support for extraction from a policy or strategy perspective (notwithstanding that such support clearly exists) - extractive interests must take priority;
- The extent of potential extraction must not be limited by the planned introduction of sensitive uses;
- Attention must be directed toward ensuring that necessary buffers are properly determined and are well maintained where the emphasis must be placed on ensuring that planned land uses do not limit potential for extraction as opposed to assessing the impact of quarry buffers on planned land uses; and

- Any operational requirements of the quarries that are relevant to the PSP process should be resolved with certainty such that the resource can be extracted efficiently and without the risk of future conflict.

## Council

Council supported in principle the application of buffers to protect the quarries, but expressed some concern over the level of restriction on use and development of land within the Blast Buffer. Council's position was that the exhibited controls effectively sterilised the land within the Blast Buffer from development for some time, and that the land should therefore be identified as 'Future Industrial' and removed from the PSP's land budget.

### 1100 Donnybrook Rd

1100 Donnybrook Rd has interests in a substantial portion of land to the north of the Phillips Quarry. Part of this land is within the 'Future Residential Area' in which development is restricted by Requirement R19 (see Chapter 2.4(ii)). 1100 Donnybrook Rd submitted that the buffer would result in that part of the land being blighted for a very significant period of time, and that the Panel should conclude that the buffer *"is not a necessary, reasonable or fair imposition on the 1100 Land"*.

1100 Donnybrook Rd highlighted the following strategies in Clause 14.03-1S (Panel's emphasis):

Ensure planning permit applications clearly define buffer areas appropriate to the nature of the proposed extractive uses, which are to be owned or controlled by the proponent of an extractive industry.

Use of land within the buffer areas is not limited by adverse effects created by the extractive activities.

It submitted that these strategies support internal buffers for quarries, and internal buffers should be the starting point when defining quarry buffers. It submitted:

The strategy is hardly surprising. The planning system does not (other than in exceptional cases) allow for a landowner to make use of, blight, or acquire another person's land.

...

The VPA is therefore pursuing an outcome in this PSP that is contrary to these (and other) strategies, and which was once considered to be both *'totally inappropriate'* and *'unacceptable in planning terms'* [quoting to the Panel Report *Planning Permit No. 704078 – City of Whittlesea Planning Scheme* (18 October 1998)].

It is pursuing an outcome that seeks to shift the entire burden of providing adequate separation distances for a future Phillips Quarry onto other landowners.

It proposes that Barro bear no responsibility whatsoever to provide any form of buffer on the Phillips Quarry land, with the result that Barro will have effectively acquired rights over another's land for no cost whatsoever.

It submitted that requiring internal buffers in the northern part of the quarry, or modifications to quarrying practices (such as limited blasting in the northern part of the quarry), would have an immaterial impact on the overall extraction of resource from the quarry, given the size of the quarry and the amount of rock available for extraction.

1100 Donnybrook Rd called Mr Barnes to give planning evidence (Document 124). He considered that the key question was whether the Phillips Quarry buffer should be mandatory

or discretionary. In other words, should residential development be prohibited in the buffer, or should permit applications be allowed to be considered? His evidence was:

The role of the PSP in responding to a planned quarry on adjoining land to the south, should be to draw attention to it by way of a general buffer (discretionary), to ensure that proper planning consideration is given to determining if it is appropriate for a residential development to proceed on the land the time an application for residential development is made. That assessment would take into account matters such as:

- Whether a work authority had been granted and the operation details of the quarry are known.
- Whether works had commenced.
- The approved extraction boundaries.
- The actual buffers required, based on expert advice based on the approved operational details of the quarry.
- The staging of excavation and whether land close to the residential areas had been excavated and excavation had moved south.

If that assessment determined that it was not appropriate to allow residential development to proceed at that time, the planning permit would be refused. Otherwise a planning permit would be granted.

Mr Barnes considered that internal buffers were consistent with State policy, but recognised that internal buffers were not always possible. He stated:

I acknowledge that it is not always possible for the whole of a buffer to be owned by quarry operator, especially in relation to an existing quarry. However, on basis of equity and fairness, it is reasonable to expect that the responsibility to provide a buffer to a use with off-site amenity impacts, should primarily be placed on the proponent of the use, not on adjoining property owners.

In relation to a 'proposed' quarry such as the Phillips Quarry, which does not yet have an approved work authority and for which excavation has not yet commenced, the opportunity exists to consider the ability to provide at least part of the required buffer within the site itself.

1100 Donnybrook Rd submitted that the VPA had failed to take account of the value of urban land in applying external buffers. Population forecasts for Melbourne have been consistently underestimated, and residential land within the Urban Growth Boundary is a finite and valuable resource for the Victorian community. It submitted that a proper balance and net community benefit assessment requires consideration of the cost of indefinitely 'locking up' the Future Residential Area, which had not been considered by the VPA.

1100 Donnybrook Rd called Mr Hrelja to give evidence on the economic cost of 'locking up' the Future Residential Area (Documents 61 and 255). His evidence was that the Future Residential Area (which he estimated to be 17.5 hectares of net developable area) has potential to contribute a significant level of investment and employment if and when it can be developed. It could:

- accommodate approximately 300 dwellings and 920 residents
- support direct construction investment of \$112 million in the PSP area
- support 47 ongoing jobs within the PSP area and a further 74 ongoing jobs in other locations at full development
- support \$11.3 million of retail spending per annum across the retail economy
- support around 610 square metres of retail space in the PSP area, which equates to six to eight speciality shops

- support approximately 8 percent of the PSP's retail, commercial and community floorspace
- contribute approximately \$3.8m to ICP funds.

His evidence was that the Phillips Quarry buffer would not make the PSP or the Local Town Centre unviable in economic terms, but it would delay achievement of the PSP's full potential until the buffer is removed.

1100 Donnybrook Rd concluded:

The evidence clearly demonstrates that there is no reason to be concerned that the removal of the Buffer will have any material impact on the ability of Barro to successfully exploit the stone resource at the Phillips Quarry, assuming that it receives the necessary approvals to do so and that it is in its own commercial interests to do so.

In simple terms, the evidence demonstrates that the community can 'have its cake and eat it too'.

The Phillips Quarry will be able to extract stone for hundreds of years, and the areas identified in the PSP for urban, residential development on the 1100 Land will also be able to be developed for that purpose. The amenity of the homes that are created can, and will, be protected – and Barro will have no difficulty in managing its operations to ensure that this occurs.

In response, Barro submitted that:

- 1100 Donnybrook Rd was the agent of change in relation to the Phillips Quarry and is required to respond to the quarry, not the other way around
- until recently, CA28 extended further north into the 1100 Donnybrook Rd land and its reduction represented a windfall gain to 1100 Donnybrook Rd in terms of residential yield, which was a relevant factor when considering the fairness of the external buffer
- if residential land turns out to be in short supply, the Urban Growth Boundary can be shifted, or more dense development can be allowed within the Urban Growth Boundary. Stone, on the other hand, is a truly finite resource – particularly stone that is well located to markets
- Mr Hrelja proceeded on the assumption that there is 17.5 hectares of net developable area within the Future Residential Area. On the basis of Barro's preferred buffers (500 metres measured from a 45 metre setback from the northern boundary of the Philips Quarry), the net developable area within the Future Residential Area is in the order of 4.17 hectares. Barro submitted that *"the costs of delaying residential development of such a small area of land would be inconsequential in the scheme of the overall precinct"*.

### **910 Donnybrook Road Pty Ltd and Retzos**

910 Donnybrook Road Pty Ltd and Retzos (910 Donnybrook Road) did not take issue with the PSP's treatment of the existing Woody Hill Quarry (WA 492), but disputed that it struck the right balance with respect to protecting extraction to the north (in the WA 6437 area). It submitted that it does not constitute fair and orderly planning to protect the stone resource above all other considerations when key decisions about the extraction of the resource (including whether, when and at what rate to extract) are entirely a matter for the quarry operator:

The Melbourne market for these stone products is entirely at the mercy of the quarry operator's decisions which will only ever be in its own economic interest. That is a far cry from all of the lofty policy encouraging the protection of natural resources.

...

The quarry should not be permitted to simply do as it pleases, as though it is operating in a rural area. This is a new quarry in the middle of an area that is also designated for urban development. Quarries within designated growth areas, have an obligation to work not only with the relevant authorities, but also surrounding landowners and should be required to do as much as possible to mitigate their impacts.

910 Donnybrook Road noted that Barro has not been prepared to commit to any sequencing and extraction timeline, which it submitted "*goes to the heart of the assessment of net community benefit*". The extraction of the resource can only provide a benefit to the community if it is in fact extracted and sold to the market at reasonable rates.

It submitted that a number of factors should be considered in determining whether the buffers are justified, including:

- the quality of the resource (evidence suggested that the quality of resource in the WA 6437 area was less than the resource at the Phillips Quarry)
- the extent of the resource (Phillips Quarry is a much larger resource)
- the extent of current permissions (neither a Work Authority nor a planning permit have yet been obtained for the WA 6437 area and there is no certainty as to whether or when they would be obtained)
- the extent to which buffers will impact on the development potential of adjoining land (the Blast Buffer would essentially prevent development of its part of land)
- the importance and value of the alternate use of the adjoining land (its land, with frontage to Donnybrook Road and proximity to Donnybrook Station, is among the most desirable employment land in the PSP area).

In support of internalising the Blast Buffer, 910 Donnybrook Road submitted:

Surely, in circumstances where blasting poses as great a risk as has been suggested, then control of the land 200m from the blasting area [by the quarry operator] is more than desirable, it is in fact a necessity and should be the usual course.

### **Other submitters**

DJV did not oppose external buffers, and accepted that the land along its western boundary within the Woody Hill buffer was appropriately identified as industry. Mr Milner (who gave planning evidence for DJV – Document 112)) considered that this was an appropriate treatment of the land within the buffer. DJV's main issue was the extent of the buffer, and whether land immediately beyond the buffer should be residential rather than industrial. These issues are dealt with in Chapters 5 and 7.

Prattico Construction submitted that the Blast Buffer affected approximately 60 percent of its land. While it did not oppose external buffers in principle, it submitted that the Blast Buffer should be measured from the extraction limit rather than the zone boundary, and greater flexibility should be allowed in relation to use and development within the buffer. It concluded:

Our Client is not arguing that the waterway or blast buffer should be located off their property entirely, but are expecting a fair and reasonable outcome that balances the needs of the quarry vs our Client's desire to maximise the site's development potential

...

Donnybrook Road Unit Trust did not make any submissions at the Hearing specifically about the buffers. However its expert planning witness Ms Horsfield addressed the appropriateness of external buffers in her evidence. She did not consider that an approach which transfers the whole of the buffer obligation to land outside the property boundary (as proposed in the exhibited PSP) is consistent with the fair and orderly planning of the area. She considered that this places an unreasonable burden on surrounding land that has otherwise been identified in the North Growth Corridor Plan for urban growth. She considered that a more reasonable approach would be to partially internalise the buffer, by measuring it from the extraction limit under WA 6852 (yet to be approved).

## **(ii) Discussion**

The strategic justification for external buffers (as well as their extent and what should be allowed within the buffers) was a key issue in submissions. A significant portion of the Hearing was dedicated to this issue.

The policy balance between protecting stone resources and facilitating urban development within growth areas was most recently considered by the Beveridge North West Panel, which stated:

While the policy framework around extractive industries and resource protection has arguably been poor in recent decades, since perhaps 2016, Government has been far more active in extractive resources policy ... No one policy suggests that WA1473 must be protected above other resources, but the need for extractive resources to support the long term growth of Melbourne is being more strongly encouraged.

It went on to state:

... If planning foresees land use conflict, it can plan for it. This does not mean that conflict must always be avoided by not undertaking a particular use or development. Rather, it can be managed, using buffers, infrastructure or technology or other means.

The Beveridge North West Panel found that the Beveridge North West PSP (and the related Amendment C106mth) was not strategically justified, because it failed to provide for the extraction of an identified stone resource prior to urban development. In effect, the exhibited Beveridge North West PSP prioritised urban development over protection of the stone resource. The Beveridge North West Panel noted that allowing urban development to proceed without planning for the quarry would effectively result in the stone resource being permanently lost.

This PSP addresses the concerns of the Beveridge North West Panel. It seeks to protect the opportunity to extract stone resources, while allowing for urban development of the surrounding land, albeit with restrictions on the development of land within the buffers.

There is clear support for the extraction of the stone resource in planning policy. While the protection of stone resources is not prioritised above all other policy considerations (as is the case with bushfire policy relating to the protection of human life), policy emphasises the need to protect stone resources from encroachment, for the benefit of the Victorian community. In many cases, that will require external buffers.

The 2016 report by Pricewaterhouse Coopers *Demand and supply study of extractive resources in Victoria, 2015-2050* (the PwC report) commissioned by the then Department of Economic Development, Jobs, Transport and Resources demonstrates that there is a clear demand for high quality stone resource in Victoria, to supply development associated with its

ongoing growth and large infrastructure program. According to the PwC report, supply shortages are predicted across Melbourne by 2050. The PwC report identifies Whittlesea as the fourth most supply challenged local government area.

The Panel is satisfied on the evidence of Ms Drochmann, Mr Mitas and Mr Hall that high quality stone resources are present in both the WA 6437 and the WA 6852 areas. The expanded Woody Hill and Phillips quarries are proposed to be operated in conjunction with the existing Woody Hill operations, allowing the production of a wider range of higher quality grades of crushed rock and aggregates. The resources are well located to the Victorian market, and the combined quarry operation will result in efficiencies in the cost of extraction that will benefit the Victorian market.

Buffers are an effective and well recognised tool to protect stone resources, and to protect the surrounding community from the adverse safety and amenity impacts of quarrying. That said, buffers restrict the development potential of the land, and in an ideal world buffers would be on land owned or controlled by the quarry operator.

However the Panel does not consider that the policy framework demands internal buffers. In many cases, internal buffers would compromise the ability to fully extract the available resource, which would be contrary to the policy framework.

Many examples of external (or partly external) buffers were put to the Panel, including in the relatively recent Mt Atkinson and Tarneit Plains and Sunbury South PSPs. The Panel acknowledges that in most (if not all) of these cases, the buffers were applied around existing operating quarries rather than proposed (and as yet unapproved) quarries.

However the policy framework seeks to protect all known valuable stone resources – not just those that are approved and currently being exploited. The fact that the necessary approvals and (in the case of WA 6437) zoning and are not yet in place to allow the extraction of the resource does not change the Panel's view that external buffers are consistent with State policy, and objectives for fair and orderly planning.

The Panel accepts that the justification for external buffers does not stop with the need to protect a known and valuable stone resource. Several other factors need to be considered, including the extent to which buffers will impact on the development potential of the adjoining land, the strategic justification for the alternate use of the adjoining land and the importance and value of the alternate use to the community.

The buffers will impact on the development potential of the affected land, particularly the land in the Blast Buffer. However this impact will not be permanent. Development will be delayed, potentially for a significant period time (even several decades). However, there was no suggestion in the evidence that delaying the development of the employment land within the Blast Buffers will cause supply constraints – in fact, the opposite was suggested, as discussed in Chapter 7. Nor was any evidence put to the Panel that delaying the development of the residential land within the Phillips Quarry Sensitive Use Buffer would result in supply constraints of residential land in the North Growth Corridor.

On the other hand, if urban development is allowed to encroach into the buffers, the ability to efficiently extract the resource is likely to be permanently lost.

The Panel was therefore not persuaded that the value to the community of protecting the full development potential of the land in the buffers in the short term outweighs the value to the community of protecting the stone resource in the quarries in the longer term.

The Panel acknowledges that there is a very significant amount of resource in the Phillips Quarry, and that an internal buffer in the northern part of the quarry may not materially impact on the overall amount of stone able to be extracted over the life of the quarry. It also acknowledges that the northern part of the quarry is subject to constraints including the high pressure gas pipeline and the Curly Sedge Creek that may make it difficult for stone to be extracted in the north eastern corner of the quarry.

However it is not clear on the basis of the evidence and material before the Panel whether or what impacts these constraints may have. Other constraints exist, such as cultural heritage and the transmission easement in the south western part of the quarry that may also impact on the ability to fully extract the resource. The Panel considers that for the time being, the ability to extract the resource in the northern part of the quarry should be protected. If, through the granting of quarry approvals, it becomes clear that extraction will not be possible in the northern part of the quarry (or that its amenity impacts can be successfully managed), then the buffer should be revisited.

The Panel acknowledges that the sequencing and manner of extraction of the stone resource is up to the quarry operator. There is no guarantee when (or indeed whether) Barro or another operator will extract the resource. But this is the case with all extractive industry. That does not, in the Panel's view, undermine the strong policy support for protecting known resources. Nor does it alter the Panel's conclusion that the protection of the resource delivers a net community benefit.

### **(iii) Conclusion**

The Panel concludes:

- As a matter of principle, external buffers are strategically justified to protect the stone resource in the Woody Hill and Phillips quarries.

## **4.4 Northern extent of 'future extractive industries' area**

The exhibited FUS shows a future extractive industries area extending north and east of the existing Woody Hill Quarry (WA 492). The future extractive industries area extends north into the WA 6437 area, but not to the full extent of this work authority area. Barro submitted it should be expanded to cover the full extent of WA 6437, while 910 Donnybrook Road (whose land is located directly north of WA 6437) submitted it should be retracted so that the Blast Buffer did not encroach into its land.

### **(i) Evidence and submissions**

The VPA submitted:

The VPA's position on both the northern and eastern expansion areas is that the PSP should plan for the area of extraction to increase to the extent permissible while maintaining an appropriate separation distance from sensitive uses, and in particular the residential land in the eastern part of the PSP and within the Donnybrook and Woodstock PSP. This is consistent with the configuration of land uses shown in the exhibited and Part A FUS.

It submitted:

- WA 492 is on the extractive industry Priority Project List, which “*elevates the status of the resource by recognising it at the state level*”
- evidence (of Ms Drochmann and Mr Mitas) demonstrates that the expanded quarry would provide valuable materials, with the quality of the stone resource improving as the quarry expands north and east into the stony rises basalt unit
- substantial efficiencies are achieved through the expansion of an existing quarry
- planning policy for the protection of the resource aligns with the economic efficiencies realised through allowing quarry expansion and the types of high quality products able to be won through expansion to the north and east.

The VPA did not support extending the northern expansion to the full extent of the WA 6437 area because buffers are likely to adversely impact uses in the commercial area of the Shenstone Park PSP and sensitive residential uses in the Donnybrook Woodstock PSP. It submitted:

The latter PSP is an approved and gazetted PSP in which residential development is currently occurring – it follows that these land use conflicts are a constraint of the PSP’s context and the only tool open to this PSP to address this conflict is to restrict the extent of northern expansion.

The VPA submitted that the future extractive industries boundary would not necessarily prevent quarrying to the north of that line if the quarry operator was able to demonstrate that impacts could be managed when it sought a permit for the northern expansion. It submitted that the PSP was flexible, and permits are only required to be ‘generally in accordance with’ the PSP.

Barro submitted that the northern expansion should cover the full extent of the WA 6437 area. It submitted that the Panel “*should avoid allowing the PSP process to pre-empt or overtake other statutory processes that will be required for the development of the quarries*”. It noted that a work plan has already been statutorily endorsed for WA 6437, so while a Work Authority and permit have not yet been obtained, the extraction limits are known and the PSP should reflect those limits.

910 Donnybrook Road submitted that extending the future extractive industries area further north as proposed by Barro would be unfair. This would result in the Blast Buffer extending further into its land, effectively sterilising 30 to 40 percent of its land. It submitted that the land north of the quarry is the most attractive employment land within the PSP given its exposure along Donnybrook Road, and that:

The quarry should not be permitted to opportunistically undermine the desirability of the employment precinct along Donnybrook Road or to significantly affect the development potential of adjoining land.

910 Donnybrook Road queried the strategic justification for any northern expansion of the Woody Hill Quarry. It submitted that when it acquired an interest in the land, it was not foreseeable that the quarry would expand to the north, because:

- the strategic planning (such as the North Growth Corridor Plan) has never previously contemplated a northern extension of the quarry
- the quarry did not participate in the Donnybrook Woodstock PSP Panel Hearing, notwithstanding that amendment has impacted on the quarry’s ability to expand north

- the land in the WA 6437 area has been in the Farming Zone since 2010, and quarrying cannot commence unless and until the land is rezoned
- all of the recent strategic planning for the Shenstone Park area has identified land north of the existing quarry, plus a buffer area, as being designated for urban uses
- the majority of that land has been in the UGZ since 2010, creating a reasonable expectation that the land would be permitted for urban use in a timely manner.

It submitted that the proposed WA 6437 is a new quarry, not on the Priority Project List. The application for WA 6437 is occurring after much of the strategic planning for the area has been done, and the quarry should be required to respond to that planning.

910 Donnybrook Road called Mr Woodland to give planning evidence (Document 108). He considered that while it is important to consider the merits of setting all of the land within WA 6437 aside for quarrying, this would not be appropriate. He supported the exhibited northern extent of the future extractive industry area.

In his view, the agent of change in respect of the northern expansion of Woody Hill Quarry was the quarry. The North Growth Corridor Plan sets the strategic planning for the area, and has been implemented by the gazettal of the Donnybrook Woodstock PSP. He considered that it was appropriate for the northern expansion to respond to this strategic framework. He concluded:

In summary it is my view that setting [aside] all of the land within WA 6437 for quarrying purposes would not provide sufficient separation distances to nearby sensitive uses, would prevent the orderly and timely development of adjoining employment land, and would not be consistent with the overall planning considerations for this location as set out in the Northern Growth Corridor Plan and the approved Donnybrook-Woodstock PSP.

In its Part C version of the PSP (Document 275), the VPA proposed that the northern expansion (and the Special Use Zone) should extend as far as the southern side of the tributary of Merri Creek (submitting that the creek forms a natural barrier to the further expansion of the quarry to the north).

## **(ii) Discussion**

The Panel acknowledges that the North Growth Corridor Plan does not show a northern or eastern expansion of the quarry. Its extent is limited to WA 492, with the surrounding 500 metres shown as 'Non-urban/utilities'. However the PSP only needs to be generally in accordance with the North Growth Corridor Plan. The northern expansion of the quarry is not so radical a departure from the North Growth Corridor Plan to no longer be 'generally in accordance with' it.

The Panel supports the protection of the ability of the Woody Hill Quarry to expand to the north for the reasons set out in Chapter 4.3. The question is, how far should the northern expansion be depicted?

The Panel accepts Mr Woodland's evidence that, with respect to the Donnybrook-Woodstock PSP and residential development on the north side of Donnybrook Road, the quarry is the agent of change. The expansion of the quarry must respond to this existing context. To allow the buffer to extend into that emerging residential area would cause potential land use conflict, and would not constitute orderly planning.

The position is different with regard to the employment land within the Shenstone Park PSP north of the quarry, including the 910 Donnybrook Road land. The strategic direction for this land is not yet fixed, and development has not started. Rather, the strategic direction for this land is being set through this PSP process. Now is the appropriate time to balance and weigh up the relative strategic merits and community benefit of the development of the employment land, and the protection of the resource within WA 6437.

The exhibited PSP proposes a relatively minor encroachment of the Blast Buffer into the 910 Donnybrook Road land. The Panel recognises that the land north of the quarry is the 'prime' employment land within the PSP. However it does not consider that the minor encroachment of the Blast Buffer will unreasonably limit the development potential of the land, or tip the balance in terms of community benefit.

The Panel does not consider that the exhibited extent of the future extractive industries area will necessarily prevent extraction in the northern strip of WA 6437 that extends beyond the future extractive industries area. This land is shown as industry in the PSP, with an applied Industrial 1 Zone. Extractive industry is a permitted use under that zone, and the Panel considers that extraction in this area would be generally in accordance with the PSP. The quarry operator would, however, need to demonstrate that the impacts on surrounding land uses could be appropriately managed when seeking approvals to extract in this area.

### (iii) Conclusions and recommendations

The Panel concludes:

- The northern expansion of the Woody Hill Quarry is the agent of change in relation to the residential development in the Donnybrook Woodstock PSP, and must respond accordingly.
- It is not, however, the agent of change in relation to the employment land within the PSP.
- The future extractive industry area should therefore extend as far north as it is able to without the buffers extending beyond the northern side of Donnybrook Road.

The Panel recommends amending the Part C Precinct Structure Plan as follows:

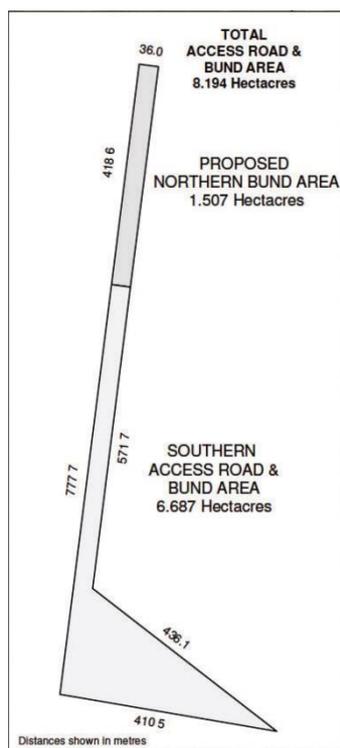
#### **Amend Plan 3 (Future Urban Structure) to:**

- a) **align the northern extent of the 'future extractive industries' area with the southern extent of the Woody Hill Sensitive Use Buffer as drawn in accordance with consolidated Recommendation 17(a).**

## **4.5 Eastern extent of 'future extractive industries' area**

The exhibited FUS shows the future extractive industries area extending 80 to 100 metres east of the WA 6437 and WA 492 boundaries. The Amendment also proposes to extend the SUZ4 to this area. The VPA explained that this is the maximum extent possible without the buffers encroaching into the residential areas further east of the quarry.

Barro and DJV (owner of the land east of Woody Hill Quarry) submitted that the eastern expansion area should not extend beyond the 36 metre wide strip of land (plus the splay at the southern end) that DJV has agreed to transfer to Barro for the purposes of the bund and access road (shown in Figure 10).

**Figure 10** Access road and bund land

Source: Document 164 Annexure D

### (i) Evidence and submissions

Barro submitted that the extraction of the stone requires the alignment of an exploitable resource in the right location, ownership of the land by an entity wishing to and having the financial capacity to extract it, and strategic support to facilitate extraction. It submitted that there was no point in extending the future extractive industries area onto land that Barro does not own or control, and has no intention of extracting.

The VPA submitted current work authority boundaries and title boundaries are relevant in determining the extent of the eastern expansion of Woody Hill Quarry, but not determinative:

... Strategic decision makers make decisions which reflect a future ultimate desired framework outcome, strategic decisions are not bound by the shorter term development intents of persons currently controlling land.

The VPA submitted that quarries commonly evolve over time through extensions, which is generally more efficient than establishing a new quarry given the lengthy approval process and high establishment costs. The VPA submitted that it was “*sound planning*” to identify not just the stone resources currently covered by a work plan, but also those adjacent to an existing quarry operation. It submitted that this was consistent with the approach in the Strategic Extractive Resource Areas Pilot Project, which proposes to apply a new State Resource Overlay both over existing quarries with Work Authorities in place, and future potential expansion of those quarries that are not the subject of a current Work Authority.

DJV accepted the high level policy support for protecting stone resources, but submitted that it does not translate to the extent of eastern expansion proposed by the VPA:

... a much better outcome, consistent with all of the VPA’s arguments, is to facilitate the extraction of the Phillips Quarry resource in accordance with the Barro/DJV agreement.

It noted that the North Growth Corridor Plan does not show an eastern expansion of the quarry, and that there is no proven stone resource beyond the WA 6437 area. It submitted that it was *“remarkable that a parcel of land is to be set aside for extraction without any investigation of the resource”*. It acknowledged Ms Drochmann’s evidence that the land is likely to have good quality stone, but submitted:

... this might warrant investigating whether it does in fact, but it is thin justification for putting the land into an extractive industry zone. This is especially so having regard to the extent of basalt resources in the area.

Relying on Mr Maltby’s evidence, DJV submitted that there is no utility in expanding the quarry beyond the 36 metre wide strip identified in the agreement. Quarrying the narrow strip of land beyond the bund is, practically speaking, not possible. DJV submitted:

Rather than the theoretical and imprecise designation of the eastern expansion area, DJV and Barro have taken it on themselves to provide a practical and positive support for the expansion of extraction activity, whilst protecting the opportunity for other uses.

The DJV/Barro agreement facilitates vehicle access for Phillips Quarry with Donnybrook Road. This ‘unlocks’ that resource, allowing its extraction to commence in the short term. It facilitates substantial efficiencies. It provides certainty for a proven resource that is advanced in the approvals process.

This is a very significantly greater benefit to the community than designating the eastern expansion area for an extraction that may never occur, and preventing that land from being put to other productive use. It is most disappointing that, to date, the VPA has not recognised this.

## **(ii) Discussion**

The Panel accepts that, in principle, strategic planning should not be dictated by title boundaries or private commercial agreements between landowners. However in this case, there seems little utility in extending the future extractive industries area beyond the land identified in the agreement between Barro and DJV.

Both Barro and DJV made their intentions clear that neither has any interest in extraction extending beyond the WA 6437/WA 492 boundaries. Even if Barro (or a future quarry operator) changed its mind, extraction would not be possible without securing the land. Barro has no intention of seeking to secure the land, and DJV has no intention of transferring it.

Mr Maltby’s evidence demonstrates the impracticability of quarrying beyond the bund and access road once they are constructed. The VPA submitted that these practical difficulties could be avoided if the bund and access road were constructed on the outer extent of the expansion area. However this ignores the practical realities that Barro has no legal rights enabling it to do so, and no intention of seeking those rights. If the land to the east of the strip identified in the agreement were designated as future extractive industries, there is a risk that it would not be developed for industrial purposes and would be sterilised. This would be a poor planning outcome.

The Panel also notes that Ms Drochmann’s evidence was that the high quality basalt stone resource was likely to extend east across the entire PSP area. The VPA’s proposed eastern extent of the future extractive industries area appears not be to defined by the extent of the resource. Rather, it appears to align with the split between employment land and residential land shown in the North Growth Corridor Plan. The Panel does not consider that the North

Growth Corridor Plan, being a high level strategic document, should be regarded as setting the precise extents of the different land uses in the PSP area.

For completeness, the Panel notes that the dimensions of the splay at the southern end of the strip differ in both the exhibited and revised PSPs from that shown in Figure 10. The Panel understands that this is because DELWP was (at that stage) yet to approve the adjustment to the boundaries of the adjacent CA28. DELWP's approval has since been secured (Document 54(e)).

**(iii) Conclusion and recommendation**

The Panel concludes:

- The eastern extent of the future extractive industries area should align with the land identified in the agreement between Barro and DJV.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 3 (Future Urban Structure) to:**

- b) align the eastern extent of the 'future extractive industries' area with the land identified as the 'Southern Access Road and Bund Area' and the 'Northern Bund Area' in Annexure D of Document 164**

## 5 Quarry buffers

### 5.1 Introduction and context

The PSP provides for buffers around the quarries. The buffers were informed by background reports prepared by GHD Ltd:

- *Quarry Impact Assessment*, December 2017
- *Shenstone Park Impact Assessment Woody Hill Addendum*, April 2018
- *Quarry Impact Assessment Addendum*, September 2019.

#### (i) Woody Hill Quarry buffers

The exhibited and Part A PSP showed four buffers surrounding the Woody Hill Quarry (Plan 15):

- Sensitive Use Buffer (550 metres from the WA492 boundary and the edge of the 'future extractive industries' area)
- Blast Buffer (200 metres from the WA492 boundary and the edge of the 'future extractive industries' area)
- existing noise buffer (900 metres from the WA 492 boundary)
- expansion noise buffer (600 metres from the edge of the 'future extractive industries' area).

The Part C PSP proposed:

- reducing the Sensitive Use Buffer to 480 metres and the Blast Buffer to 180 metres, allowing for a 20 metre internal setback for extraction
- replacing the noise buffers with an 'Acoustic Application Area' (which applies to all sensitive uses west of the LTC eastern boundary).

The Woody Hill Quarry buffers are largely taken up by employment land.

#### (ii) Phillips Quarry buffers

The exhibited and Part A PSP showed three buffers surrounding the Phillips Quarry (Plan 15):

- Sensitive Use Buffer (550 metres from the title boundary)
- Blast Buffer (200 metres from the title boundary)
- noise buffer (300 metres from the title boundary).

The Part C PSP/Part C submission proposed:

- reducing the Sensitive Use Buffer to 480 metres from the title boundary (again allowing for a 20 metre internal setback for extraction in accordance with Clause 52.09-6)
- removing the noise buffer.

The Phillips Quarry buffers are largely taken up by CA28, with the Future Residential Area to the north of CA28 and small amounts of industrial land in the western portion of the buffer.

#### (iii) The purpose of the buffers

The Part C PSP reduced the number of buffers to two types – a Sensitive Use Buffer and a Blast Buffer. The length and point of origin of the buffers have important implications for land use within the PSP area.

Sensitive Use Buffers are primarily driven by amenity issues that might impact on sensitive uses, including residential. These include dust, vibration and airblast overpressure. These (and noise impacts) can be caused by blasting, but also by other operations at the quarries such as trucks using haul roads, rock crushing plants and the like.

Blast Buffers serve a different purpose. They are primarily driven by the need to manage impacts from blasting activities at locations closer to where blasting occurs, including vibration, airblast and flyrock. These impacts of blasting significantly influence the level of development that may occur in the Blast Buffer. For example, under the UGZ7, buildings are prohibited within the Blast Buffer (except if related to extractive industry and with some other exceptions).

Blasting at quarries enables large quantities of rock to be extracted for processing into various grades of aggregate for sale. A series of holes are drilled into the rock to be excavated which are partially filled with explosives. The explosives in each hole are detonated in a sequence designed to push the shattered rock forward into the quarry.

The energy of the explosives produces ground vibration waves that radiate from each blast hole. Measurement of the environmental impact of ground vibration from blasting operations is based on the Peak Particle Velocity or PPV. Generally speaking, the PPV is higher closer to the blast location. Ground vibration at high levels can impact the stability of structures on and under the ground. At lower levels, ground vibration can impact on human comfort levels.

A proportion of a blast's energy is also released as airblast (overpressure) which may be heard and/or felt. Airblast impacts may startle people and, like ground vibrations, can also cause structures to rattle or in extreme cases cause damage. Airblast is measured in decibels using the linear frequency-weighting (dBL).

'Flyrock' is any rock fragments thrown beyond the blasting face. The term is typically used to describe rock that is thrown beyond the normal heave distance.

## **5.2 The issues**

The issues are:

- what are the appropriate buffer distances, and where should they be measured from?
- should dust buffers be directional?
- should residential use be discretionary in the Future Residential Area, or prohibited?
- what, if any, use and development should be allowed in the Blast Buffers?
- should the buffers be rolling (to move with quarrying activity) or time limited?

## **5.3 Relevant guidelines**

### **(i) EPA Guideline 1518**

EPA Guideline 1518 *Recommended separation distances for industrial residual air emissions* (2013) (EPA 1518) guides amenity interface and buffer issues relating to dust and odour emissions from industry. It is referenced in the Planning Scheme at Clause 17.03-2S (Sustainable industry) as a policy guideline that must be considered in planning.

EPA 1518 lists recommended minimum separation distances from a range of industries, with the aim of minimising off-site impacts on sensitive land uses arising from unintended odour and dust emissions. The distances for quarries are extracted in Table 2.

**Table 2 EPA Publication 1518 recommended separation distances for quarries**

Industry type	Industry activity/definition	Scale and industry description	Recommended separation distance (metres)
Quarry	Quarrying, crushing, screening, stockpiling and conveying of rock	Without blasting	250
		With blasting	500
		With respirable crystalline silica	500

Source: EPA Publication 1518

EPA 1518 states that separation distances “*should be determined by measuring from the activity boundary of the industrial activity to the nearest sensitive land use*”. The activity boundary is the area that “*includes all current or proposed industrial activities (including the plants, buildings or other sources)*” from which Industrial Residual Air Emissions (IRAEs) may arise. The guidelines also state:

The recommended separation distances are EPA’s default minimum in the absence of a detailed, site specific assessment for a proposed industrial or sensitive land use.

**(ii) SEPP N-1**

Industries including quarries are required to meet noise criteria based on the *State Environment Protection Policy – Control of Noise from Commerce, Industry and Trade No. N-1*, Victorian Government, 1989 (SEPP N-1). The policy is applicable to noise sources in the Melbourne metropolitan area.

**(iii) Clause 52.09**

The purposes of Clause 52.09 are:

- To ensure that use and development of land for extractive industry does not adversely affect the environment or amenity of the area during or after extraction.
- To ensure that excavated areas can be appropriately rehabilitated.
- To ensure that stone resources, which may be required by the community for future use, are protected from inappropriate use and development.

Clause 52.09-6 provides guidance on the minimum internal setback distance of quarrying from the boundary of a quarry site:

Except in accordance with a permit, no alteration may be made to the natural condition or topography of the land within 20 metres of the boundary of land. This does not apply to driveways, drains, bund walls or landscaping.

## 5.4 Buffer distances and measurement points

### (i) Evidence and submissions

Eleven of the thirty two submissions raised issues in relation to the quarry buffers, and many parties provided expert witness statements providing commentary on the buffers (refer to Table 3).

**Table 3** List of experts who addressed quarry buffers

Expert/Company	Client	Dust	Noise	Vibration	Airblast	Flyrock
Michael Asimakis, GHD (Document 85)	VPA	Yes				
Dr Valeri Lenchine, GHD (Document 82)	VPA		Yes	Yes	Yes	Yes
Adrian Moore, Terrock (Documents 72 and 211)	Barro			Yes	Yes	Yes
Dr Ian Cowan, ERP (Documents 72, 206, 212 and 260a)	Barro	Yes				
Darren Tardio, Enfield Acoustics (Document 88)	Barro		Yes			
Jim Antonopoulos, SLR Consulting (Document 93)	DJV		Yes	Yes	Yes	
Peter Ramsay, Peter J Ramsay (Documents 96, 174 and 175)	DJV	Yes	Yes	Yes	Yes	Yes
Christophe Delaire, Marshall Day (Document 62)	1100 Donnybrook Rd		Yes			
Tim Marks, Marshall Day (Documents 65 and 167)	1100 Donnybrook Rd			Yes		

Barro's submission to the Amendment (Submission 24) asserted that the work undertaken by GHD on behalf of the VPA to determine the buffers:

... does not accurately reflect the current and proposed operations on the Barro Group land and consequently does not accurately reflect potential off-site amenity impacts and associated buffer distances.

It was particularly concerned about the extent of the northern and eastern expansions of Woody Hill Quarry, which are discussed in Chapters 4.4 and 4.5.

Most submitters with interests in land within the buffers (DJV, Satterley Property Group, 1100 Donnybrook Rd, 910 Donnybrook Road, Donnybrook Road Unit Trust and Golina Holdings) queried the basis on which the buffers were measured, noting that the exhibited buffers were larger than those recommended in EPA 1518 and submitting that buffers should be measured

from the extraction limit (as provided for in the GHD background reports) rather than the property or zone boundary (as shown in the exhibited PSP).

All the expert reports listed in Table 3 considered the appropriate size of the buffers and where they should be measured from.

Three expert conclaves were held – for Dust, Noise and Vibration/Airblast.

### **Dust**

The Dust Conclave Statement (Document 140) records unanimous agreement that the relevant document relating to Sensitive Use Buffers was EPA 1518. The three experts at the Dust Conclave (Mr Asimakis, Dr Cowan and Mr Ramsay) all agreed that:

- the default buffer for quarries with blasting was 500 metres unless an environmental risk assessment had been conducted confirming that a site specific variation was appropriate
- the 500 metres should be drawn from the extraction boundary or activity boundary and not the property or Works Authority boundary.

All the experts at the Dust Conclave considered that the default 500 metre buffer should apply to both quarries, with Dr Cowan and Mr Ramsay affirming the 500 metres radial buffer and Mr Asimakis supporting a 500 metre directional buffer.

Dr Cowan, who gave dust and odour evidence for Barro (Documents 72 and 212), conducted a form of environmental risk assessment. His evidence was that there was a risk of residual air emissions from the following upset conditions at the quarries:

- Breakdown of the crushing plant;
- Breakdown of mobile plant;
- Breakdown of the water cart;
- Breakthrough of the concrete batching plant bag house; and
- Unusual meteorological conditions.

Dr Cowan used emission estimation techniques to calculate dust emissions from each source on an hourly basis. He assumed no upset conditions would give rise to increased levels of emissions other than upset meteorological conditions, as in his view:

- if any of the machinery or plant broke down, it would cease operating until it was fixed (thereby effectively eliminating the source of the dust for the period of the breakdown)
- if the water cart used to suppress dust on unsealed roads broke down, a replacement would be readily available.

The estimated emission levels can be adjusted based on what dust controls are implemented. Dr Cowan assumed a Level 2 watering of unsealed roads. This is the highest level of control for dust suppression by watering on unmade roads, with a 75 percent reduction in dust emissions over that for a non-watered unsealed road.

This information was used in an atmospheric dispersion model to assess the air quality impact to the surrounding land as a result of the continuing and future quarry operations. This formed the basis of his environmental risk assessment which considered non-upset or routine operational conditions over five years of meteorological conditions (he considered that a period of five years would potentially capture unusual or what might be regarded as ‘upset’ meteorological conditions).

Dr Cowan concluded that a separation distance of 500 metres was sufficient to prevent impact to sensitive land use for both quarries. He did note that if the Woody Hill Quarry expanded to the very northern extent of the WA 6437 area, there is potential for impact extending into the residential areas in the Donnybrook-Woodstock PSP, however he considered that this could be easily mitigated (for example by limiting blasting on high wind days).

His modelling of the extent of the area required to contain likely future ambient air quality standards to acceptable concentrations showed the impacted area extended about 400 metres north of the Phillips Quarry (to the northern edge of CA28, but not into the Future Residential Area). Relying on that evidence, 1100 Donnybrook Rd submitted that the 500 metre buffer was not justified, and should be reduced so that it does not extend beyond CA28. However at the Dust Conclave Dr Cowan agreed with the other experts that the 500 metre default buffer should be applied, albeit reviewed and possibly reduced at some future date:

In the future at Phillips Quarry the mobile crushing plant will be replaced with a fully enclosed permanent crushing plant. This piece of equipment will have a higher standard of control and therefore the recommended separation distance may be able to be reduced, once blasting activities have moved south enough for this this to be considered.

Mr Asimakis (for the VPA) agreed that the environmental risk assessment approach can be used to derive a site specific buffer, but did not consider the scenarios modelled by Dr Cowan were based on plant upset conditions or abnormal events and hence should not be used as a basis to adjust the default buffer. At the Dust Conclave, he provided an example of an upset condition of a failure to use a water cart to water unsealed haul roads during strong winds.

Mr Ramsay (who gave buffer evidence for DJV – Documents 96, 174 and 175) identified haul roads as the largest potential dust source from quarries in response to questions from the Panel. Mr Ramsay also stated that the modelling undertaken by Dr Cowan is a predictive tool and provides an estimation only.

To allay concerns about the Woody Hill Sensitive Use Buffer extending into the residential area to the north of Donnybrook Road, Barro stated in its Reply Submission (Document 287):

Barro Group is prepared to accept a buffer measured 500m from the northern side of Donnybrook Road, which would have the effect of moving the extraction boundary an additional 31 m (for a total of 51m) to the south of the title boundary shared with 910 Donnybrook Road.

The revised buffer proposed by Barro is shown on Figure 3.

Barro submitted that the Phillips Quarry Sensitive Use Buffer should be 500 metres measured from the proposed extraction limits for the WA 6852 area (which propose internal setbacks of 45 metres from the northern boundary and 20 metres from the eastern boundary, as shown on Figure 4).

The VPA in its Part C submission (Document 288) concluded that the weight of evidence favours:

- a. the calculation of buffers from the extraction boundary
- b. a radial 200 metre blast buffer
- c. a radial 500 metre Sensitive Use Buffer.

## Noise

The various experts agreed that noise and vibration should be considered in prescribing a Sensitive Use Buffer.

Dr Lenchine, who have noise and vibration evidence for the VPA (Document 82), supported the assessments in the GHD background reports, which reflected the noise buffers in the Part A PSP. He noted that:

The operational noise buffer is predicted based on the most conservative operation scenario, which assumes that the noisiest onsite activities are confined to the day time period. Results of predictions are affected by assumed environmental conditions, terrain, acoustic characteristics of the noise sources, and the operational scenario.

The evidence of Mr Ramsay in his revised Witness Report (Document 175) was:

The operational noise buffers proposed by GHD and adopted in the PSP have not considered any mitigating factors such as the presence of new bunding embankments, vegetation screens or other mitigation measures. These separation distances have been modelled on incomplete information, have not been validated by field observation, are much larger than what is in place for many similar quarry operations, and have not included consultation with the quarry operator.

Mr Delaire gave noise evidence for 1100 Donnybrook Rd (Document 62). He focused on noise impacts from the proposed Phillips Quarry. He noted in his report:

At the time of preparing the GHD Report, limited information was available to assess noise from the Phillips Quarry. As such noise modelling assumptions obtained from the Woody Hill Quarry assessment by GHD were used for predicting noise levels from the Phillips Quarry.

Mr Delaire modelled the predicted noise emissions from the Phillips Quarry, and his modelling showed that SEPP N-1 noise limits for the day period can be met within the GHD nominated 300 metre buffer, which could be reduced.

Mr Tardio gave noise evidence for Barro (Document 88). He examined existing noise emissions from the Woody Hill Quarry and modelled future noise emissions from both quarries, and concluded that Barro would comply with SEPP N-1 noise levels at 500 metres from the extraction boundaries, subject to no rock breakers operating outside of the 'Day' period. This was based on his observation that *"rock breaking is clearly the highest noise emission which occurs from the site, both in level and character"*. He considered it reasonable that +2dB impulsive adjustment (subjective assessment) should be made in accordance with SEPP N-1 methodologies when the rock breaker was in use. While he considered that noise limits may be able to be met at closer distances, he considered it prudent to provide a 500 metre buffer given full operational details of the future quarries are not known at this time.

Mr Tardio concluded in regard to the Phillips Quarry that:

It would be prudent to increase the noise buffer to 500m at 1100 Donnybrook Rd and 1150 Donnybrook Road, to account for subjective character assessments of noise.

Mr Antonopoulos gave noise evidence for DJV (Document 93). He examined the noise impact on the DJV land at 960 Donnybrook Road from current operations at the Woody Hill Quarry and proposed operations at both quarries. Mr Antonopoulos' evidence was that predicted noise limits for the night and evening periods should be based on the actual hours of operation of the quarry, and not averaged over the entire 24 hour period (which was what he believed

GHD had done) given the quarry does not operate 24 hours. His statement contained an extract from SEPP N-1 which states:

“Background level” for a day, evening or night period means the arithmetic average of the LA90 levels for each hour of that period for which the commercial, industrial or trade premises under investigation normally operates. The background level shall include all noise sources except noise from commercial, industrial or trade premises which appears to be intrusive at the point where the background level is measured.

As a consequence, Mr Antonopoulos considered the noise limits derived by GHD may have been overly conservative, and lower than SEPP N-1 would require.

The Noise Conclave Statement (Document 169) records that Mr Tardio agreed with Mr Antonopoulos’ position. Dr Lenchine did not agree that only background noise levels from the part period of operation of any plant should be used to determine the SEPP N-1 noise limits.

Mr Antonopoulos was not able to conduct a site inspection due to Covid-19 restrictions, and therefore could not offer an opinion on whether any character adjustments to the modelled noise levels were applicable. He based his own noise modelling on the noise measurements of the existing plant at the Woody Hill site on noise measurements conducted by Mr Tardio. He concluded:

My noise modelling ... indicates that residential development could be provided in areas closer to the quarry boundary than indicated in the PSP.

## Vibration

Blasting at quarries produces ground vibrations which may render an impacted area unsuitable for sensitive uses. The vibration levels (measured in PPV) vary depending on the size of the charge and the ‘site constant’ value which is determined by the surrounding geology.

The 2018 GHD Addendum background report attached to Dr Lenchine’s witness statement (Document 82) recommended a 550 metre vibration buffer to sensitive uses based on the assumption that the maximum instantaneous charge used at the Woody Hill Quarry would not exceed 100 kg. The 550 metre separation distance was based on achieving the long term regulatory goal of 2 mm/s PPV.

Five experts (Mr Antonopoulos, Dr Lenchine, Mr Marks, Mr Moore and Mr Ramsay) attended the Vibration/Airblast Conclave. The Conclave Statement (Document 172) noted:

It was agreed that 5 mm/s PPV (peak particle velocity for 95% of blasts) is an appropriate criterion for ground vibration from blasting to sensitive receivers. Valeri Lenchine noted that previous GHD reports have nominated a 2 mm/s PPV criterion as a long-term goal as per ANZEC guidelines, however 5 mm/s (for 95% of blasts) is considered more appropriate at Shenstone Park. Higher limits would apply to commercial and industrial uses.

The size of explosive charges used and site constants (which are determined on a case-by-case basis using site testing results) were not known to GHD and Dr Lenchine when GHD calculated vibration levels. GHD therefore used the default site constants specified in *Australian Standard 2187.2 – 2006, Explosives – Storage and use, Part 2: Use of explosives*. The 2018 GHD Addendum Report noted that:

The standard recommends a site constant of  $K=1,140$  and site exponent of  $B=1.6$  for average conditions when blasting is to be carried out in free face conditions, however the resulting vibration predictions are a median value with 50% probability of

exceedance and actual vibration levels may vary from 40 percent to 400 percent of the predictions.

Mr Moore's evidence for Barro (Document 71) provided the most detailed explanation of blasting at the current Woody Hill Quarry and most likely blasting methodology for the proposed Woody Hill expansion and the future Phillips Quarry. He noted in his report that he adopted a more conservative site constant value of  $K=1,200$  based on blast monitoring data from the Woody Hill Quarry and from other data collected from similar basalt quarries in the Newer Volcanics region.

Mr Marks' evidence for 1100 Donnybrook Rd (Documents 65 and 167) focused on vibration impacts from the Phillips Quarry. Like GHD, he did not have access to site constant data for the Phillips Quarry. He derived site constants from a quarry site in Tasmania where Dolerite is extracted, and calculated vibration levels using the same formula as Dr Lenchine and Mr Moore. Mr Marks derived the 95<sup>th</sup> percentile confidence level of vibration levels below 5 mm/s PPV for a 60 kg charge. He calculated a necessary separation distance of 392 metres for sensitive uses, as shown in his supplementary evidence (Document 167). Relying on this evidence, 1100 Donnybrook Rd submitted that there was no justification for a 500 metre Sensitive Use Buffer.

Mr Marks' distance calculation (392 metres) can be benchmarked against that determined by Mr Moore and Dr Lenchine for a 60 kg charge (238 metres and 231 metres respectively). The Panel questioned Mr Marks regarding the disparity between his and Mr Moore's vibration calculations. He ascribed the difference to Mr Moore using site constants based on the 50<sup>th</sup> percentile whereas he (Mr Marks) had used the 95<sup>th</sup> percentile and hence derived a higher result. Mr Moore disputed this.

The Vibration/Airblast Conclave Statement concluded:

A 500 metre buffer is appropriate for compliance with 5 mm/s PPV vibration criteria, when using the site constants defined in Adrian Moore's report.

It was noted that:

- Ground vibration buffer will likely be less than 500 m given that charge sizes are less than 100 kg.
- The density and character of the rock, and wave speeds will play a large part in defining the site constants and therefore the buffer size.

The Conclave Statement also noted that Mr Antonopoulos, Mr Moore and Mr Ramsay agreed that the buffer should be measured from the nearest blasting or extraction areas. Mr Marks and Dr Lenchine considered that it should be measured from the Works Authority boundary.

1100 Donnybrook Rd submitted that the ability to excavate and blast in the north eastern corner of the Phillips Quarry may be limited by constraints imposed by Curly Sedge Creek and vibration controls to protect the high pressure gas pipeline. Consequently, the submission contended that Barro will not be able to extract stone with blasting for some distance from its eastern boundary, and the Phillips Quarry Sensitive Use Buffer should reflect that.

The evidence of Mr Moore, who through oral evidence confirmed he had been involved in the negotiations with pipeline manager (although this was not noted in his written evidence), was that:

A suitable PPV limit for the gas main east of Phillips Quarry requires further negotiations with the asset owner. When a limit is determined, a more detailed approach to blasting near the eastern boundary can then follow

### **Airblast**

The airblast limits quoted by the experts and set by ERR at sensitive locations are:

- below 115 dBL for 95 percent of all blasts
- below 120 dBL at all times.

The 2018 GHD Addendum Report contained calculations of airblast overpressure using the distance relationship formula in AS 2187.2 – 2006, and concluded that a 550 metre buffer was sufficient to protect sensitive uses from airblast impacts.

Mr Moore's evidence was that due to range of site constant values, the airblast formula in AS2187.2-2006 has "*limited practical application but may be suitable for broad guidance*". His evidence described the model developed by Terrock based on field observations showing airblast levels are not uniformly radiated but are elliptical due to the geometry of quarries. Higher levels are experienced in front of the face compared to the sides and behind the face.

Mr Moore was the only person to calculate actual levels of airblast with charge size information provided by Barro. The calculations by Mr Moore showed airblast levels would be below 115 dBL within 500 metres of the blast.

### **(ii) Discussion**

The principal document for determining separation distances between industry and sensitive uses in terms of dust impacts is EPA 1518. All three air quality experts agreed that the default buffer recommended for a quarry where blasting occurs is 500 metres as per EPA 1518. The air quality experts also agreed that this distance should be measured from the activity boundary to the nearest sensitive use. The issue then arises as to how to define the activity boundary for potential quarry sites that do not have statutory approvals yet in place.

The VPA's Part C submission stated:

In the absence of a currently approved work authority, the VPA submits that a point 20m inside the zone boundary should be adopted as the 'extraction boundary' for the purpose of calculating buffers in the PSP. This point is adopted as an outermost point extraction could reach while providing the 20m setback in line with clause 52.09-6 of the Planning Scheme.

While broadly agreeing with this view, the Panel recognises that other factors and constraints can define the activity boundary for the purposes of defining a separation distance start or end point, such as:

- the agreement between Barro and DJV that Barro will not extract within 45 metres of the northern boundary of the Phillips Quarry (Document 164)
- Barro's acquisition from DJV of the 36 metre wide strip of land along the eastern boundary of the Woody Hill Quarry for the purposes of providing access to Phillips Quarry and building a bund (also Document 164)
- Barro's concession that in order to satisfy the 500 metre separation distance to existing sensitive uses on the northern side of Donnybrook Road, that it would retract the northern extraction boundary by 51 metres from the northern extent of the WA 6437 area

- Barro's public statements at the Hearing that it does not intend to extract beyond the extraction limits shown on Plan 3B attached to its Reply Submission, on DJV land that it (Barro) does not own or have any control over (Plan 3B is extracted in Figure 3).

The VPA expressed the view that it does not consider the agreement between Barro and DJV to be determinative of the extraction limits or the buffer measurement points. As stated in Chapter 4.5, the Panel accepts that, in principle, strategic planning should not be dictated by private commercial agreements. However in this case, there seems little point in assuming that extraction will go beyond the points at which Barro has agreed (and publicly stated) it will stop extraction.

The next issue is whether a greater or lesser distance than the default 500 metre separation distance is required in order to protect the amenity of sensitive uses.

The evidence to the Panel was that:

- In regard to dust impacts, two of the three air quality experts supported a radial separation of 500 metres between quarrying and sensitive uses, measured from the extraction boundary. The exception was Mr Asimakis, who supported a directional dust buffer which extended beyond 500 metres in some directions (a directional dust buffer is discussed in detail in the following section).
- Acceptable vibration and airblast levels would occur within 500 metres of the blasting and most likely even at lesser distances.
- Other than Dr Lenchine, all the acoustic experts agreed that SEPP N-1 noise levels would be met at a distance of not more than 500 metres from the quarries.

The Panel is mindful that the environmental risk assessment conducted by Dr Cowan in relation to dust impacts did not consider that any plant upset conditions at the quarries could cause an increase in dust emissions. The Panel was not persuaded by Dr Cowan's view that there is no prospect of upset conditions occurring in relation to watering of unsealed roads. Both Mr Ramsay and Mr Asimakis considered that the failure to water unsealed roads is a potential major source of dust from quarries. Further, Dr Cowan agreed at the Dust Conclave that a 500 metre default buffer was appropriate notwithstanding his modelling results (although he did concede in cross examination by 1100 Donnybrook Rd that the full 500 metres may not be required).

While all of the experts agreed that vibration and airblast limits could be met at 500 metres (in some cases less), none of them supported a reduction of the buffer in the Vibration/Airblast Conclave.

The noise experts differed in their opinions on whether noise buffers of less than 500 metres were appropriate. Mr Antonopoulos considered that for Woody Hill the limits could be met at between 450 and 500 metres from the extraction boundary. Mr Delaire and Mr Antonopoulos considered that for Phillips Quarry the limits would be met at between 200 and 300 metres from the extraction boundary. Mr Tardio, however, expressed the view in the Noise Conclave that 500 metres was more appropriate for both buffers as:

Some allowance should be made for character adjustments under SEPP N-1. 500m recommended to extraction boundary. Buffer distance can be revisited in the future if conditions change under section R19 of the PSP.

The Panel notes that the evidence from Mr Tardio and Mr Antonopoulos was informed by a better understanding of the actual operations currently conducted by Barro at the Woody Hill

Quarry and the proposed operations at the expanded Woody Hill Quarry and Phillips Quarry. Mr Tardio was also able to measure equipment noise levels at the Barro site which he supplied to Mr Antonopoulos, so both were able to model noise emissions with actual data which should provide a more accurate assessment of potential noise levels.

For these reasons the Panel gives greater weight to the modelling evidence of Mr Tardio and Mr Antonopoulos in determining whether noise amenity is adversely impacted 500 metres or more beyond the quarry activity boundary. This is no criticism of GHD or Mr Delaire, whose modelling was necessarily based on limited information, requiring a number of assumptions to be made.

Overall, in relation to the Sensitive Use Buffers, the Panel agrees with the VPA's view in its Part C submission:

Contrary to the view of GHD in the exhibited background report, the evidence before the Panel suggests that the buffer does not need to be greater than 500 metres. However, in the absence of an approved operating model being locked in, the Panel should be cautious to place weight on evidence suggesting a lesser distance is appropriate.

The Panel is mindful that at this stage there is limited information available in relation to future operations at the quarries. While Barro has publicly committed to not extract beyond the limits shown in Figure 3 and Figure 4, what happens within those extraction limits, including staging of extraction, charge sizes, the positioning of plant and equipment, the location of haul roads and so on, is not yet known. The Panel thinks it would not be prudent to reduce the default 500 metre buffer in the absence of this type of operational detail.

The Panel acknowledges that there may be some uncertainty in regard to the extent of possible extraction in the north eastern corner of the Phillips Quarry, due to the location of the Curly Sedge Creek and the high pressure gas pipeline. What limitations the presence of the high pressure gas pipeline impose – or indeed any mitigation measures that may be used to extract to the proposed extraction boundary of the Phillips Quarry – are unknown. In these circumstances, the Panel is not in a position to determine that the actual extraction boundary of the Phillips Quarry will likely be any different to that currently proposed by Barro (shown in Figure 4).

For these reasons, the Panel does not support reducing the Sensitive Use Buffers for either quarry to less than the default 500 metres.

Finally, the Panel notes the VPA's proposal in the Part C PSP to remove the noise buffers, but to apply an Acoustic Application Area for all sensitive uses applies west of the Local Town Centre eastern boundary (which extends beyond 500 metres from the extraction limits). This is not justified on the evidence. The Panel considers that the Acoustic Application Area should be removed, and instead noise controls should apply within the 500 metre Sensitive Use Buffers.

### **(iii) Conclusions and recommendations**

The Panel concludes:

- Based on the information available at this time about future operations at the quarries, a 500 metre separation distance is appropriate to protect sensitive uses from amenity issues due to residual dust emissions, noise, vibration and airblast from

current and future quarry operations at both the Woody Hill Quarry and the Phillips Quarry.

- The Sensitive Use Buffers should be measured from the activity boundary at the quarry sites which generally aligns with the approved and proposed extraction limits.
- There is no justification for the inclusion of an Acoustic Application Area that extends beyond the Woody Hill Sensitive Use Buffer. The Acoustic Application Area should be removed, and instead noise controls should apply within both Sensitive Use Buffers.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 15 (Buffers, Noise Amenity Area and Measurement Length) to:**

- show a Woody Hill Sensitive Use Buffer of 500 metres drawn:**
  - other than as noted below, 500 metres from the proposed Extraction Limits of WA 492 and WA 6437 as shown on Figure 3
  - from a line 51 metres south of the boundary of 910 Donnybrook Road, Donnybrook
- show a Phillips Quarry Sensitive Use Buffer of 500 metres drawn from the proposed Extraction Limits of WA 6852 as shown on Figure 4**
- remove reference to the Acoustic Application Area**
- remove reference to the 300 metre Phillips Noise Buffer.**

**The Panel recommends amending the Part C Urban Growth Zone Schedule 7 as follows:**

**In Clause 3.0, amend the application requirement relating to Woody Hill Quarry noise assessment as follows:**

- replace the heading ‘Woody Hill Quarry noise assessment’ with ‘Acoustic Report’**
- replace ‘Acoustic Application Area’ with ‘the Woody Hill Sensitive Use Buffer or the Phillips Quarry Sensitive Use Buffer’.**

## 5.5 Directional dust buffers

EPA 1518 provides that the default separation distances can be varied if there are exceptional circumstances at the site that justify a site specific variation. Table 4 of EPA 1518 list six criteria that may justify a variation to the default separation distances. These are extracted in Table 4.

**Table 4** Table 4 from EPA Publication 1518 – Criteria for site specific variation

Criteria	Explanation
Transitioning of the industry	Existing industry has formally indicated that it will transition out of an area and over a specified timeframe.
Plant equipment and operation	The industrial plant and equipment have an exceptional high standard of emission control technology.
Environmental risk assessment	An environmental risk assessment of IRAEs has been completed that demonstrates a variation is justified.
Size of the plant	The plant is significantly smaller or larger than comparable industries.

Topography or meteorology	There are exceptional topographic or meteorological characteristics which will affect dispersion of IRAEs.
Likelihood of IRAEs	Particular IRAEs are either highly likely or highly unlikely to occur.

Source: EPA Publication 1518 Table 4

Where site specific variations are sought, EPA 1518 states that:

... a detailed assessment and a resultant proposal that satisfies EPA will be required before a variation can be given planning approval.

### (i) Evidence and submissions

In its submission to the exhibited Amendment (Submission 1), EPA noted:

The use of directional buffers is generally considered problematic, however as the proposed separation distances [exhibited at 550 metres] are larger than those listed in EPA Publication 1518 – *Recommended Separation Distances for Industrial Residual Air Emissions* for the land proposed to be used for sensitive uses this was not considered an issue.

Other than Mr Asimakis for the VPA, all relevant experts agreed that the Sensitive Use Buffers for the quarries should be the default radial buffer rather than a directional buffer. Mr Asimakis considered that for dust, a variation to the default radial buffer was appropriate based on meteorology and topography. This included the influence of the Kilmore Gap located to the north of the quarries on prevailing wind directions. He considered that the fifth criterion from Table 4 in EPA 1518 applied. He considered that a radial buffer should only be used when there is no information on local meteorology, stating in his oral evidence *“Everywhere in Victoria is exceptional meteorology”*.

He described the method of determining a directional buffer as:

... dispersion modelling can be conducted using a nominal air source emission rate to assess the directional change in extent from a default radial buffer.

The buffer so formed is sized to have the same enclosed area as the radial default buffer and is termed a directional buffer. So, the directional 500 m buffer will have the same enclosed area as the default 500 m buffer.

Based on Mr Asimakis’ modelling, due to prevailing westerly and southerly winds an extension of the default radial buffer occurred to the east and northeast into the PSP, while the default radial buffer retracted in the west.

Dr Cowan considered there is nothing unusual about the meteorology or the topography at the quarry sites to justify a directional buffer. Mr Ramsay expressed a similar view:

I note that most of Melbourne, indeed most of Victoria is subject to a predominance of westerly rather than easterly winds. Therefore, this is not an exceptional condition. Also, the topography is not considered exceptional.

Mr Ramsay’s evidence in regard to the rationale behind the default separation distances was that:

The EPA recommended separation distances have been determined through reviewing a large set of empirical data for odour and dust emissions from a range of industries.

**(ii) Discussion**

The directional buffer approach adjusts the footprint of the radial default buffer, retracting and extending it in the directions of poor and good dispersion.

Two of the three air quality experts did not consider that the local meteorology or topography was exceptional so as to justify a directional buffer.

Aside from whether the meteorology or topographical conditions justify a directional buffer, an assessment in support of varying the default radial buffer should still demonstrate that residual dust emission impacts are likely to extend beyond the default radial buffer in the direction of the 'bulge', and conversely, would not impact sensitive uses located in the areas where the default buffer has been retracted.

To extend or retract a plume dispersion contour plot centred over the emission source until it has the same area contained within its boundaries as the default radial buffer is not in itself evidence that impacts from residual emissions will extend that far or will not occur beyond the contracted boundary. At best, it provides some measure of the likely direction of impacts, but does not guarantee that impacts would still not occur beyond a directional buffer.

The default radial separation distances are based on EPA experience over a long period of time, including as to the range at which complaints are received in the event of an upset condition occurring. This data factors in a variety of weather conditions at emission sources. The Panel also notes that EPA did not approve the directional buffer, but as the exhibited buffer (drawn radially at 550 metres) was larger than the default radial buffer, EPA did not object. This cannot be inferred as an EPA endorsement of a directional buffer in this case.

The Panel was not persuaded that the directional buffer proposed by Mr Asimakis was appropriate.

**(iii) Conclusion**

The Panel concludes:

- It is not appropriate for the Sensitive Use Buffer to be drawn as a directional buffer.

**5.6 Discretionary residential use in the Future Residential Area**

As noted above, the Future Residential Area represents the otherwise developable residential land that is contained within the Phillips Quarry Sensitive Use Buffer.

**(i) Evidence and submissions**

As outlined in Chapter 4.3 Mr Glossop (who gave planning evidence for the VPA) did not consider that it would be orderly planning or consistent with policy to allow residential development within the Phillips Quarry Sensitive Use Buffer in the short term, given the potential impact on the quarry's ability to extract the resource. However, he also did not consider it fair to 'blight' the land for an unspecified time with no certainty that the resource would be extracted and no certainty around a review process to change the buffer.

He therefore supported the 'short term' prohibition of residential use within the Future Residential Area, but recommended that if quarrying or approvals for quarrying do not commence in a reasonable amount of time, there be a mechanism for adjustment. Mr Glossop

also did not support the exhibited mechanism (Requirement R19) that left the discretion solely to DJPR. He preferred a different approach, suggesting:

- a periodic strategic review of the buffer, say every 10 years
- alternatively, amending the UGZ7 to convert the future residential area into a discretionary buffer after a certain period of time, with the discretion resting with the responsible authority in consultation with DJPR.

Mr de Silva's evidence for Barro was that extractive interests must take priority, and must be protected from urban encroachment. He supported the prohibition of residential use and development in the Future Residential Area until such time as extraction has moved to the south.

Mr Barnes, who gave evidence for 1100 Donnybrook Rd (Document 124), recommended that residential development within the Phillips Quarry Sensitive Use Buffer be discretionary. He did not consider that it was appropriate to prohibit residential development in the buffer given the uncertainty about the future operations of the quarry (with a lack of current approvals) and the actual extent of buffers that may ultimately be required. He considered that the UGZ7 should trigger a planning permit for residential development within the Future Residential Area having regard to:

- Whether a work authority had been granted and the operational details of the quarry
- Whether works had commenced
- The approved extraction boundaries
- The actual buffers required, based on expert advice on the approval operational details of the quarry
- The staging of extraction and whether land close to the residential areas had been extracted and works had moved south.

If that assessment determined that it was not appropriate to allow residential development to proceed at that time, the planning permit would be refused. Otherwise a planning permit would be granted.

Mr Milner, who gave planning evidence for DJV (Document 112), also supported the concept of a discretionary buffer. While his written evidence did not directly address this issue as it didn't affect the DJV land, in cross examination and questions from the Panel he agreed that it was better to regulate development within the Sensitive Use Buffers (where there are amenity considerations such as dust), rather than prohibit development (which may be more appropriate where there is a need to protect human life, such as from a major hazard). He also agreed with Mr Barnes that at a permit application stage there could be more detailed and precise information about the Phillips Quarry operations to base a decision on, including matters such as approved extraction boundaries. Mr Milner also considered that residential land was a finite resource that should be optimised.

Barro supported a mandatory prohibition on sensitive uses within the Future Residential Area for 15 years following gazettal of the Amendment, following which applications could be made for sensitive uses, with applications referred to DJPR as a determining referral authority and notice to the owner and operator of the Phillips Quarry. Barro noted that the evidence of Mr Barnes was that development of the southern portion of 1100 Donnybrook Road would not occur for at least 10-15 years in any event, so a 15 year prohibition would not necessarily blight the land within the buffer.

In its Part C submission, the VPA stated:

R19 has been a key issue in dispute throughout the hearing. The VPA accepts expert planning evidence to the effect that exhibited R19 did not strike an appropriate balance between extractive resources and urban development. The VPA after consideration of the written evidence with DJPR agrees that there should be no prohibition on the making of a planning permit application for land within the PSP from the time of gazettal of the PSP and ICP. This was reflected in the draft wording first circulated to the parties on 26 November 2020.

1100 Donnybrook Rd did not support the alternative wording of R19 (now R20) in the Part C PSP, primarily on the basis that the evidence did not support the need for a Sensitive Use Buffer that extended beyond CA28 (refer to Chapter 5.4).

## **(ii) Discussion**

The question of how to treat residential use within the Phillips Quarry Sensitive Use Buffer was a significant issue at the Hearing.

While there were different approaches, generally all planning experts agreed that planning policy around the protection of extractive industries had strengthened in recent years. As such, experts generally agreed that the Amendment should allow the opportunity for the quarry to gain its approvals and commence operations, and then allow for residential development to occur when it could be demonstrated that it would not unreasonably impinge on the quarry's operations.

Mr de Silva and Mr Glossop considered that the stone resources should be extracted first, and any change to the buffer to allow for future residential development should come at a later stage when it did not interfere with the quarry operations – either via a statutory timeframe, or a later strategic review of the need for the buffers.

Conversely, Mr Barnes and Mr Milner considered that the Amendment should allow discretionary residential development within the Future Residential Area from the outset. They considered that this would allow for consideration of residential uses once more detail was known about the Phillips Quarry operations, and also for a balanced consideration between the value of the resource and the value of housing within the North Growth Corridor at the time the application was made.

As outlined in Chapter 4.3, the Panel accepts that the stone resource should be prioritised, at least in the short to medium term, and urban development should follow once the resource has been extracted or where there would be no unreasonable impact on quarrying operations. While residential development may be delayed, this opportunity will not be foregone.

The Panel agrees that until further detail is known about the Phillips Quarry operations via approved work plans and an amended planning permit setting an extraction boundary and placing conditions on operations, it is difficult to be definitive about the likely extent of off-site impacts. As the VPA stated in its Part C submission:

The Phillips quarry is also subject to constraints that may reduce the ability for the entire resource to be realised, with such factors including cultural heritage, electrical transmission and gas pipeline easements, groundwater and waterways. These factors may moderate the extraction of the inferred and actual resource.

In this context, the Panel considers it would be unfortunate to 'fix' a buffer that would prohibit residential development in the Future Residential Area, only to find that the extraction boundary or nature of operations ultimately approved would have safely allowed for residential development to occur. As noted in the preceding chapters, the buffers established

by this Panel process are based on the information known to date. They may vary with approvals, once more detail is known about matters such as required setbacks from the high pressure gas pipeline or any constraints of the Curly Sedge Creek, for example.

While the Panel accept the view of Mr Barnes and others that it may be 10 to 15 years before there is demand for residential development within the Future Residential Area, there are also a range of factors that may influence this timeframe. The time frames for the quarry approvals and commencement of operations are unknown, and while various time frames were suggested to allow 'clean air' for approvals to establish and works to commence, these were only 'best guesses' and did not have a strong basis in evidence. On this basis, the Panel does not support a statutory timeframe for a prohibition on residential development within the Future Residential Area.

The Panel agrees that residential land use within the Future Residential Area should be discretionary from the outset. The Panel generally accepts the VPA's wording in the Part C UGZ7, with changes to require the responsible authority to have regard to quarry approvals or applications for approvals including extraction limits. The Panel considers that the additional wording will ensure that there is proper consideration of the actual impacts of the quarry on the Future Residential Area, rather than allowing for open ended considerations of the impact of sensitive uses on quarry operations and vice versa. The Panel agrees that DJPR should be a determining referral authority, as provided for in the Part C controls.

Some minor drafting changes are required to the UGZ7 and the Schedule to Clause 66.04 as a consequence of these changes. These include that the affected land should not be referred to as the 'Future Residential Area' in either the PSP or the UGZ7 – rather, it should simply be referred to as land within the Sensitive Use Buffer.

The Panel considers that R19/R20 in the PSP is no longer required. The new decision guideline in the UGZ7 does the work that R19/R20 was designed to do, and the UGZ7 is the more appropriate location for this decision guideline.

The Panel does however caution that it would be contrary to policy and an unfortunate impact on resources if residential development within the Sensitive Use Buffer was approved prematurely, and in a way that limits extraction of the resource. If applications for residential development are made before the quarry approvals are in place, decision makers should exercise great caution about approving residential use that might constrain the quarry operations and curtail future supplies of extractive resources.

### **(iii) Conclusions and recommendations**

The Panel concludes:

- Residential use within the Future Residential Area should be discretionary, with modified wording of the decision guideline within the UGZ7 to provide clearer guidance for the responsible authority assessing applications. Recommended wording is set out below.
- Requirement R19/R20 in the PSP is no longer required, and should be deleted.

**The Panel recommends:**

**Amend the Part C Precinct Structure Plan as follows:**

**Delete Requirement R20 (relating to applications in the Future Residential Area).**

**Amend the Part C Urban Growth Zone Schedule 7 as follows:**

**In Clause 1.0, amend the Table of Uses as follows:**

- a) in Section 1, amend the condition for Accommodation, Dwelling and Medical Centre to read:

**Must not be on land within the ‘Phillips Quarry Sensitive Use Buffer’ identified on Plan 15 in the incorporated *Shenstone Park Precinct Structure Plan*.**

- b) in Section 2, amend the condition for Informal Outdoor Recreation to read:

**On land within the ‘Phillips Quarry Sensitive Use Buffer’ identified on Plan 15 in the incorporated *Shenstone Park Precinct Structure Plan*.**

**In Clause 6.0, replace the decision guideline of relating to the ‘Phillips Quarry Sensitive Use Buffer’ with the following:**

**Before deciding on an application for a sensitive use or development associated with a sensitive use within the ‘Phillips Quarry Sensitive Use Buffer’ shown on Plan 15 of the incorporated *Shenstone Park Precinct Structure Plan*, in addition to the decision guidelines in Clause 37.07-14 and Clause 65, the responsible authority must consider, as appropriate:**

- **Any effect that emissions of noise, vibration, odour, dust or grit from Phillips Quarry may have on the proposed use or building.**
- **The potential for the proposed use or development within the ‘Phillips Quarry Sensitive Use Buffer’ to impact on the ability of the quarry operator to obtain approvals for extraction (if approvals have not yet been obtained).**
- **Whether the proposed use or development will adversely impact the current or future operations of the Phillips Quarry, having regard to any requirements of any approvals for the quarry, including any approved extraction boundary.**
- **The staging of extraction and whether stone resources close to the residential areas have been extracted and works have moved to the south.**
- **The views of the Secretary to the Department administering the *Mineral Resources (Sustainable Development) Act 1990*.**

**Amend the Part C Schedule to Clause 66.04 as follows:**

**Amend the first entry in the table relating to Schedule 7 to Clause 37.07 (UGZ) under ‘Kind of application’ to add “or the Phillips Quarry Sensitive Use Buffer” after the words “Woody Hill Quarry Sensitive Use Buffer”.**

**Remove the second entry in the table relating to Schedule 7 to Clause 37.07 (Urban Growth Zone).**

## 5.7 Use and development in the Blast Buffers

### (i) Evidence and submissions

As noted above, the Blast Buffers are essentially intended to manage flyrock risk and vibration and airblast impacts from blasting at closer distances. The Woody Hill Blast Buffer affects third party industrial land, but no residential land. The Blast Buffer was of particular concern to those submitters because of the highly restrictive controls on use and development of land within the Blast Buffer. These submissions are discussed in more detail in Chapter 4.3.

#### Vibration

The experts agreed that there is no accepted regulatory standard for vibration for non-sensitive uses in place in Victoria. Mr Antonopoulos referred to Table J4.5(A) in AS 2187.2-2006, which provides the following guidance for commercial and industrial premises:

25 mm/s maximum unless agreement is reached with occupier that a higher limit may apply. For sites containing equipment sensitive to vibration, the vibration should be kept below manufacturer's specifications of levels that can be shown to adversely affect the equipment operation.

This limit was generally accepted as appropriate by the other experts.

As noted in Chapter 5.4, three experts (Dr Lenchine, Mr Moore and Mr Marks) calculated predicted ground vibration levels from blasting at various distances from the blast face. They used different site constant values, but essentially the same methodology for calculating predicted vibration levels. Irrespective of site constant data, the modelling conducted by the various experts all predicted that vibration levels would be less than 25 mm/s at 200 metres from the blast site. At 100 metres from the blast, in the middle of the Blast Buffer, the predicted vibration levels ranged from 30 to 50 mm/s.

Mr Moore considered, based on predicted vibration levels, that there was potential for commercial or industrial development within the Blast Buffer. However:

While the limits to prevent damage to industrial and heavy commercial type buildings are shown as 50 mm/s (from AS2187.2-2006 criteria), some owners and occupants of buildings are likely to raise complaints and damage concerns even where substantially lower levels occur. If the previous human comfort limit of 25 mm/s for occupied industrial and heavy commercial premises is considered, the separation distances for such developments from extraction limit blasting is around 100m.

#### Airblast

Table J5.4(A) of AS 2187.2 – 2006 offers guidance for airblast limits for human comfort in non-sensitive sites such as factories and commercial premises:

125 dBL maximum unless agreement is reached with the occupier that a higher limit may apply. For sites containing equipment sensitive to vibration, the vibration should be kept below manufacturer's specifications or levels that can be shown to adversely affect the equipment operation.

Mr Moore's evidence was that AS 2187.2 – 2006 lists 133 dBL as a non-damaging airblast limit for structures, though he noted the Standard states such damage is "*improbable below 140 dBL*". He stated:

A 200m buffer would also help reduce potentially high levels of airblast and ground vibration at non-sensitive sites such as factories or commercial outlets. While PPV and airblast limits for industrial and commercial premises are not currently specified in

current ERR guidelines (other than a mention that “... *less stringent standards may be appropriate*”), human comfort limits from previous regulations were 25 mm/s and 120 dBL for all blasting.

Mr Moore calculated that at 200 metres from the blast site, the predicted airblast would range from 120 to 125 dBL – within the limits for human comfort (125 dBL) and damage to structures (133 dBL) suggested by AS 2187.2-2006.

Mr Antonopoulos concluded that, based on vibration and airblast calculations performed by Mr Moore:

The 200 m blast buffer is reasonable as indicated in the PSP for any development, although it would be possible to have industry closer than this (150 m) and still achieve airblast and vibration criteria nominated in AS 2187.2.

## Flyrock

In regard to flyrock, the 2018 GHD Addendum Report stated:

Generally, through carefully implemented control measures, most fly rock can be contained within the active pit area to approximately 50 m in front of the face. Industry practice is to allow at least a factor of four times this distance as a safety factor.

Mr Moore’s evidence noted that ERR guidelines do not specify flyrock clearance distances, and that shot blasters are required by their licences to ensure that all flyrock is contained within the quarry boundaries. His evidence was:

The risk posed by *excessive flyrock* (where rock fragments are thrown well beyond anticipated distances) is largely mitigated by establishing appropriate clearance zones at blast times. For blasts near quarry boundaries, clearance zones may extend into neighbouring land areas.

Mr Moore was the only expert to calculate potential flyrock throw distances for the blast specifications. Mr Moore noted that a safety factor of 2 applied to quarry plant, equipment and unoccupied buildings and a safety factor of 4 applied to quarry personnel, members of the public and occupied buildings. He allowed for a safety factor of 4, which he said was the standard safety factor commonly applied to basic conservative throw calculations. He calculated the minimum flyrock clearance distances shown in Table 5.

**Table 5 Minimum flyrock clearance distances on maximum throw calculation (Moore)**

	Woody Hill existing + southern expansion (WA 492)		Woody Hill – Northern Operations (WA 6437)		Phillips Quarry (WA 6852)	
	Front of face (m)	Behind/side of blast (m)	Front of face (m)	Behind/side of blast (m)	Front of face (m)	Behind/side of blast (m)
Max. Throw	59	38	40	26	59	38
Safety Factor 2	118	76	80	52	118	76
Safety Factor 4	236	152	160	104	236	152

Mr Moore’s evidence was that development could potentially occur in the Blast Buffers if clearance zones can be established to evacuate occupants during blasting:

It is current industry practice to establish radial clearance zones around individual blast sites at blast times and no blast may be fired until the shotfirer receives several confirmations that the clearance area is free of people. Clearance zones need only be established for around 30 minutes on blast days and due to the relative infrequency of quarry blasting (once or twice per month at the existing quarry and up to once per week

at Phillips Quarry at full production), a permanent flyrock buffer/clearance zone around quarries is not warranted. Therefore, the blast restriction area is not required and the risk of flyrock can be adequately mitigated under standard industry practice and arrangements for the clearance procedures to be observed at blast times.

Notwithstanding, Mr Moore concluded in his report:

... prohibiting development within 200m of a quarry extraction area may be appropriate for other reasons. Blast clearance in areas outside a quarry relies on the cooperation of the occupants of neighbouring properties and this cannot be guaranteed at all times.

The Vibration/Airblast Conclave noted:

There may be potential for non-sensitive infrastructure, such as for selective commercial or industrial uses, to be developed within the 200 m fly rock buffer with the proviso that all personnel have evacuated the area prior to blasting. Valeri Lenchine, and Tim Marks disagree with the allowance of any commercial or industrial developments within the fly rock buffer based on safety rationales.

The VPA in its Part C submission supported that view:

The VPA also questions the practicalities of use configurations which may require substantial areas and developments to be evacuated during blasting. Obtaining the cooperation of surrounding landowners would represent a constraint on the quarries operation and limit the ability for this resource to be extracted in realisation of policy.

910 Donnybrook Road provided alternative wording for the UGZ7 prohibition on buildings within the Woody Hill Blast Buffer that effectively:

- limited the prohibition to 5 years unless extraction had lawfully commenced and required building restrictions within the Blast Buffer
- converted the Blast Buffer to a discretionary buffer, allowing consideration of applications for buildings and works subject to a risk assessment in the form of a Quarry Interface Assessment that demonstrates the land is appropriate for development to the satisfaction of the responsible authority.

Barro supported the 910 Donnybrook Road drafting, but considered that the period should be 10 years rather than 5 years given the length of time it normally takes to obtain statutory approvals for quarrying.

## **(ii) Discussion**

The modelling of vibration impact of the quarries by Dr Lenchine, Mr Moore and Mr Marks demonstrates that, with the most likely explosive charge mass as per Mr Moore's tabulation (based on information provided by Barro), ground vibration levels beyond the 200 metre Blast Buffer will be below 25 mm/s (the human comfort level for non-sensitive uses).

The Panel notes that vibrations levels at 100 metres from the blasting site were predicted to be 30 or 50 mm/s, depending on the model assumptions. As noted in Chapter 5.4, the calculations by Mr Moore and Mr Marks used the same methodology but differed in regard to the values of site constants used.

The Panel does not need to resolve these issues. It is satisfied that, even accepting the lower (less conservative) calculations of Mr Moore, a significant portion of the Blast Buffer would experience vibrations levels in excess of 25 mm/s. The Panel also notes that predicted airblast levels exceed 125 dBL and 130 dBL within about 150 metres and 100 metres from the blast site respectively. At these levels, the Panel considers vibration and airblast impacts would be problematic for all but very limited development within the Blast Buffer.

On that basis, the Panel supports Blast Buffers of 200 metres (measured from the extraction limit which is the 'activity boundary' for blast impacts), and supports the restrictions on use and development of third party owned land within the Blast Buffers. While it notes the suggestions from 910 Donnybrook Road that development within Blast Buffers should be discretionary subject to a risk assessment, it was not persuaded that this is practical or appropriate. No evidence was put to the Panel about how the permit applicant would access the information needed from the quarry operator for a proper risk assessment to be undertaken, or how the responsible authority would assess the adequacy of the Quarry Impact Assessment.

Some submitters, including 910 Donnybrook Road and Pratico Constructions, suggested reconfiguring the FUS to place roads and/or drainage corridors within the Blast Buffers, to allow for a more efficient use of the remaining parts of their land. While these proposals have some appeal in terms of the efficient use of the land, they would potentially introduce publicly accessible areas (roads, an off-road bike path and potentially pedestrian paths along the Merri Creek Tributary) within the Blast Buffer.

The Panel recognises that there are safety concerns associated with bringing people and vehicles closer to the quarry. Mr Moore's evidence was that evacuation zones would be required to clear the Blast Buffers of people during blasting operations. Both Dr Lenchine and Mr Marks disagreed with allowing any commercial or industrial developments within the Blast Buffer due to safety concerns relating to fly rock. In response to questions from the Panel, Mr Glossop expressed reservations about placing public roads within the Blast Buffers, although other witnesses noted other examples of roads within blast buffers (including Hopkins Road, which is located within the blast buffer indicated in the Mount Atkinson and Tarneit Plains PSP).

The Panel agrees with the view expressed by VPA that requiring the co-operation of building occupants to vacate the Blast Buffer area during blasting represents a practical constraint on the operation of the quarry, and may be difficult to implement. The same might be said of requiring evacuation of other publicly accessible areas such as roads, cycle and pedestrian paths and open space surrounding drainage corridors.

For that reason, the Panel supports the VPA's proposal in its Part C submission to amend the FUS to reposition connector roads outside the Blast Buffer. Applying the same reasoning, the Panel does not support amendments to the FUS that would locate other publicly accessible areas in the Blast Buffers.

That said, if at the permit application stage a landowner was able to demonstrate that the risks associated with placing a road or drainage corridor in the Blast Buffer was manageable, the Panel would not be opposed to locating these uses within the Blast Buffer. These adjustments to the road and drainage alignments would be relatively minor, and would still in the Panel's view be 'generally in accordance with' the PSP.

### **(iii) Conclusions and recommendation**

The Panel concludes:

- Blast Buffers of 200 metres measured from the extraction limit are appropriate.
- The Part C version of the UGZ7 applies appropriate restrictions on use and development within the Blast Buffers.

- The FUS should not show publicly accessible areas such as roads, cycle and pedestrian paths and open space surrounding drainage corridors within the Blast Buffers.
- That said, the Panel has no in principle objection to locating roads and drainage corridors within the Blast Buffers if, at the permit application stage, a landowner was able to satisfy the responsible authority that the risks associated with blasting could be appropriately managed.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 15 (Buffers, Noise Amenity Area and Measurement Length) to:**

- a) show the 200 metre Blast Buffers drawn from the Extraction Limits (ie from the same points as the Sensitive Use Buffers in accordance with consolidated Recommendation 17(a) and 17(b))**
- b) remove publicly accessible areas such as roads, cycle and pedestrian paths and open space along drainage corridors from within the Blast Buffers.**

## **5.8 Rolling buffers and time limited buffers**

### **(i) Evidence and submissions**

Several witnesses suggested that the quarry buffers should be rolling, retracting as quarrying moves south, or that buffers should be subject to a time limit. For instance, Mr Glossop stated:

I agree with submitters that the ordinance should sunset the restriction when quarrying activities cease. Buffers, by their nature, should be dynamic. It is appropriate for the planning scheme to be amended from time to time to update the buffer distances, based on the area identified for active quarrying activities, including blasting. The mechanism for achieving this should be explored appropriately and perhaps similar text to R20 would assist.

In relation to the Phillips Quarry Sensitive Use Buffer, Mr Glossop stated:

The ordinance and the PSP need to recognise that if quarrying or approvals for quarrying do not commence in a reasonable amount of time, there needs to be a mechanism to allow for some adjustment.

He suggested that the buffer should be periodically reviewed every 10 years, having regard to the rock resource, the strategic need to protect the resource and the demand for housing within the North Growth Corridor. He suggested that alternatively, after a certain period of time the buffer could be converted to a discretionary buffer, with the responsible authority having the discretion to approve housing within the Sensitive Use Buffer in consultation with DJPR.

Mr de Silva supported the prohibition on development for sensitive uses within the Phillips Quarry buffer *“until such time as extraction has moved to the south”*. Mr Moore supported rolling blast buffers, suggesting a progressive sunset clause when the buffer is no longer relevant because extraction or blasting has moved to more distant areas of the quarries.

As noted in the previous section, 910 Donnybrook Road submitted that the prohibition on buildings within the Blast Buffer should automatically sunset if quarrying in the WA 6437 area had not lawfully commenced within 5 years. Barro supported the concept, but submitted that the sunset period should be 10 years.

In reply the VPA made it clear that it does not support the use of rolling buffers, stating in its Part C submission:

The concept of rolling buffers has been suggested by submissions and witnesses in principle, without any witness advancing a coherent set of controls which could deliver this outcome. It is noted that evidence from experts in extractive industries disciplines acknowledged that (while in contrary to logical and orderly planning principles) extraction may cease for a time at a level, but may later return under amended work plans to extract stone from formally abandoned areas. For these reasons, the VPA does not support the concept of rolling buffers.

In relation to a periodic review of buffers, the VPA submitted:

The rate of progress in obtaining statutory approvals is uncertain and the current process has not been assisted by the state of available information regarding the Woody Hill and Phillips quarries. However, the VPA submits that in 5 to 10 years' time further information will be known and this will enable a thorough review of the blast buffer to occur and if, at that point the prohibition is no longer required, the review would be an appropriate mechanism for that to be addressed.

## **(ii) Discussion**

As a principle, rolling buffers that move with the quarrying activity have some appeal. They provide protection for the extractive operations (or the opportunity to extract) while it is needed, and avoid unnecessarily sterilising the land in the buffers after quarrying has moved on. They also avoid the need for a strategic review (and a planning scheme amendment) to remove the buffer or change its boundaries.

However, the drafting of a rolling buffer is challenging. The Panel asked each of the planning witnesses how rolling buffer provisions might be drafted. All admitted that it would be difficult, and none provided any drafting suggestions. The Panel is also mindful of the possibility that an area in which the first bench is exhausted may still contain valuable resources at deeper levels that might be extracted in future. If the buffer has 'moved on' (or been removed entirely), the ability to extract that resource may be compromised.

A provision that automatically sunsets the buffer after a certain period of time elapses without quarrying commencing, such as that suggested by 910 Donnybrook Road, is problematic. Many factors need to come together for quarrying to commence – a resource needs to be identified, and a willing and capable operator needs to acquire rights over the land. Finance needs to be obtained, as do the necessary approvals. Obtaining the approvals can take years. Market conditions need to be right to make it worth the operator's while to commence extraction. These factors may not come together in 5 (or even 10) years, but that doesn't mean the resource is no longer of strategic importance to the community.

The Panel is also wary of provisions (like the exhibited R19) that sunset a quarry buffer when it is 'no longer required'. Who decides whether the buffer is required, and on what basis? Should the decision be left in the hands of the quarry operator, an extractive industry regulator, or a planning authority or responsible authority? What information is required to make that decision, and who should be consulted?

In this case, the Panel does not consider that there is a need to undertake the mental gymnastics required to draft rolling or sunsetting buffers. If the Panel's recommendations in previous sections of this Chapter are adopted, the buffers will be less extensive and less restrictive. In particular, the Panel has recommended that while the Phillips Quarry is operating, residential use and development proposals in the Phillips Quarry Sensitive Use Buffer should be discretionary rather than prohibited. The Panel considers that the buffers recommended by the Panel strike a more reasonable balance between the interests of the

quarry and the need to protect the stone resource for the benefit of the community, and the ability of the impacted landowners to use and develop their land.

The Panel supports a regular strategic review of the buffers, in light of the latest information about the status of the quarry approvals (including extraction limits and activity boundaries), staging and operations. This should form part of the 5 yearly review of the PSP.

**(iii) Conclusions and recommendation**

The Panel concludes:

- Rolling buffers or time limited buffers are not considered necessary or justified.
- Buffers should be regularly reviewed as part of the 5 yearly review of the PSP, in light of the latest information about the status of the quarry approvals (including extraction limits and activity boundaries), staging and operations.

The Panel recommends:

**Review the buffers as part of each five yearly review of the Precinct Structure Plan having regard to the latest information about the status of the quarry approvals (including extraction limits and activity boundaries), staging and operations.**

## 6 The recycled water treatment plant

### 6.1 Introduction and context

In Yarra Valley Water's submission to the Panel (Document 246) it indicated that the RWTP will include underground and above ground structures and equipment, mechanical and electrical infrastructure, car parking and staff facilities, and so on. The precise siting of structures and activities will be determined at the detailed design stage some years in the future.

The exhibited PSP showed:

- an indicative footprint for the RWTP, located to the south of Woody Hill Quarry just outside the southern boundary of the PSP (on the FUS and on Plan 15)
- a 'blast restriction zone' in the south east corner of Woody Hill Quarry, to enable the development of the RWTP without the impact of a Blast Buffer (on the FUS)
- a 613 metre radial odour buffer around the RWTP (on Plan 15)
- the land on which the proposed storage ponds are to be located as 'Utility Facility' (on the FUS).

The Part A PSP (Document 25(a)):

- relocated the RWTP further south outside the Blast Buffers and replaced the indicative footprint with an asterisk
- removed the Woody Hill blast restriction area and extended the Woody Hill Blast Buffer to the south
- removed the odour buffer.

The Part C versions of the controls proposed:

- changes to the FUS to:
  - reinstate the indicative footprint of the RWTP in its original location within the Blast Buffer
  - reinstate the odour buffer, but revise its size and shape in accordance with the evidence of Mr Pollock
  - include a note on Plan 15 which states the underlying assumptions (volume) of the RWTP
- changes to the UGZ7 to exclude a utility installation from the building prohibition within the Woody Hill Blast Buffer.

### 6.2 The issues

The issues are:

- how should the RWTP be shown on the PSP?
- should the RWTP be located within the Blast Buffers?
- should the PSP show an odour buffer, and should the odour buffer be directional?
- what zone should apply to the storage pond land?

## 6.3 How should the recycled water treatment plant be shown?

### (i) Submissions

Yarra Valley Water submitted that the concept design of the RWTP was relatively well advanced. It is in the process of acquiring the land on which the RWTP will be located (currently owned by Golina Holdings), and negotiations in relation to what land is to be acquired are essentially resolved. A draft Plan of Subdivision has been prepared but not yet registered, and the footprint of the RWTP is relatively settled.

Yarra Valley Water submitted:

The location of the RWTP is the product of many years of strategic planning – in both utility servicing and land use planning contexts – and of substantial technical work to satisfy Yarra Valley Water that the location is appropriate and achievable.

Its location is appropriate to service the northern growth corridor suburbs, and its siting takes advantage of topography and the location of other existing and proposed assets. Yarra Valley Water has sought technical advice that the location of the RWTP and associated pipes within the Blast Buffer will not be problematic, and that vibration and other impacts from blasting can be managed. The RWTP does not need to be shifted south.

The VPA proposed in its Part C submission to replace the green asterisk in the Part A version of the PSP with an indicative footprint, and to update the description of the RWTP to ‘future Wollert Recycled Water Treatment Plant’ rather than ‘potential future water treatment facility’. Yarra Valley Water supported these changes.

### (ii) Discussion

The Panel notes that the issue of how the RWTP should be shown in the PSP was largely resolved by the time the Hearing concluded. The Panel acknowledges the ongoing efforts of Yarra Valley Water and the VPA in reaching resolution on these issues. The Panel is satisfied that the location of the RWTP is strategically justified, and that its future construction is a relative certainty. It supports the VPA’s proposal to revert to showing an indicative footprint for the RWTP in the PSP rather than an asterisk, and the changes to its description as a ‘future’ RWTP rather than a ‘potential future’ RWTP. The location of the footprint should reflect that shown on the draft Plan of Subdivision tabled by Yarra Valley Water (Document 244).

### (iii) Conclusion and recommendation

The Panel concludes:

- It supports showing the RWTP as ‘future Wollert Recycled Water Treatment Plant’ with an indicative footprint, rather than an indicative asterisk as shown in the Part A version.
- The location of the RWTP should reflect that shown on the draft Plan of Subdivision tabled by Yarra Valley Water (Document 244), rather than the asterisk.

The Panel recommends amend the Part C Precinct Structure Plan as follows:

#### **Amend Plan 3 (Future Urban Structure) to:**

- a) **locate the future Wollert Recycled Water Treatment Plant in the location shown on draft Plan of Subdivision PS 741631 (Document 244).**

## 6.4 Location in the Blast Buffers

### (i) Evidence and submissions

DJPR's submission to the Amendment (Submission 27) requested:

- amend the exhibited FUS to relocate the RWTP outside the buffer areas for both the Woody Hill and Phillips quarries, which would also remove the need for a blast restriction area for Woody Hill quarry
- alternatively, delay the establishment of the RWTP until after the nearby quarries have completed any production in the areas that would be encroached by the facility.

Yarra Valley Water's submission to the Amendment (Submission 18) expressed concern that the Woody Hill Blast Buffer extended over the only means of access to the RWTP. It requested that blasting be restricted so that it could gain access to its site.

Yarra Valley Water submitted at the Hearing that it had undertaken substantial work and determined that the RWTP could be safely delivered on its intended site. It said this view was based on a consideration of vibration, airblast and flyrock issues arising from the quarries. Having regard to these issues Yarra Valley Water submitted that it could:

- (i) design the plant to manage the manageable risk associated with damage to property; and
- (ii) implement simple operational measures such that there is no risk to human safety associated with blasting at its nearest point – which is expected to be more than 130m from the likely location of any building;

with only marginal increase to construction and operating costs and no risk to safety or operational ability.

Yarra Valley Water submitted that water treatment plants are generally operated by between zero to three staff and the RWTP is intended to be designed with remote control and automation so there may not be staff at the plant for several days per week. It concluded that:

As a land use, the RWTP is inherently compatible with quarrying.

Mr Moore also expressed the opinion that the RWTP was a compatible use with the quarries:

Standard blasting can be conducted up to the proposed extraction limits without adverse effects to water treatment plant infrastructure or presenting an unacceptable risk to plant personnel.

The VPA stated in its Part C submission that DJPR should be a determining referral authority for an application to develop land for the purpose of the RWTP, given its location within the Blast Buffers.

### (ii) Discussion

In the absence of any other views or evidence to the contrary, the Panel accepts that the proposed RWTP is compatible with the quarry operations, and that it can be designed and managed so as to withstand impacts from blasting including vibration and flyrock risk. Its location within the Blast Buffers, and the exemption of a utility installation from the prohibition on buildings within the Blast Buffers, therefore do not concern the Panel.

A permit will be required for the RWTP under the Rural Conservation Zone Schedule 1 that applies to the RWTP land. The Panel considers that if the plant is to be located wholly or partly

within the Blast Buffers, the permit application should be referred to DJPR as a determining referral authority. The Part C version of the Schedule to Clause 66.04 should be amended to ensure that this occurs (recommended wording is provided below).

The Panel notes that an access track has been marked on the Wollert Recycled Water Treatment Plant Constraints Plan prepared by Jacobs (Document 243) connecting the RWTP to the local road system. The southern length of the access track on the RWTP land is within the Woody Hill Blast Buffer. The Panel considers that suitable arrangements could be put in place to manage the risk posed from blasting on Yarra Valley Water personnel who might be using the access track. This could be dealt with in the conditions on the buildings and works permit for the RWTP.

Finally, the Panel notes that as a consequence of consolidated Recommendation 17(c) (to show the Blast Buffers on Plan 15) and consolidated Recommendation 14(c) (to show the RWTP on Plan 3), the RWTP may be located within the Blast Buffers for both quarries. Consequential amendments to the UGZ7 may be required as a result.

### **(iii) Conclusion and recommendations**

The Panel concludes:

- The future Wollert Recycled Water Treatment Plant is not an incompatible use within the Blast Buffers.
- If an application for the plant is made on land within the Blast Buffers, it should be referred to DJPR as a determining referral authority.

**The Panel recommends amending:**

- **the Part C Urban Growth Zone Schedule 7 as follows:**

**In Clause 2.5, amend the provision related to the prohibition of buildings within the Woody Hill Blast Buffer to add 'or the Phillips Quarry Blast Buffer' after 'Woody Hill Blast Buffer' in the heading and the second last line.**

- **the Part C Schedule to Clause 66.04 as follows:**

**Amend the final entry in the table the Part C as follows:**

- a) **amend the first column to refer to the Rural Conservation Zone Schedule 1 as well as the Urban Growth Zone Schedule 7**
- b) **amend the second column to read:**

**An application to develop land within the Woody Hill Blast Buffer or the Phillips Quarry Blast Buffer identified on Plan 15 of the incorporated *Shenstone Park Precinct Structure Plan* for the purpose of a utility installation.**

## **6.5 Odour buffer**

### **(i) Evidence and submissions**

Yarra Valley Water submitted that the RWTP will be a key component of servicing the North Growth Corridor with non-drinking water. The size of the RWTP is described as:

The Wollert RWTP is planned to bring its 20 ML/d capacity online by 2029-2030. It is expected that the Wollert RWTP will achieve a recovery rate of 70% – that is, the volume

of non-drinking water produced by the plant will be 70% of the volume mined from the Amaroo sewer, and the balance will be 'lost' (i.e. returned to sewer). Accordingly, to provide for a production rate of 20 ML/d, a sewage inflow rate of approximately 28.5 ML/d will be required.

In regard to design and performance of the RWTP, Yarra Valley Water submitted that:

The next ten years can be expected to bring advances in technology. Yarra Valley Water will use the highest practical standard of technology of the Wollert RWTP in the interest of efficiency and mitigating odour production.

Mr Pollock gave odour evidence for Yarra Valley Water (Document 115). His witness statement (Document 115) states that if the conservative value of 150 l/d per person is used then the equivalent population, upon which the separation distance is based, would be 190,000 and this corresponds to a separation distance of 575 metres.

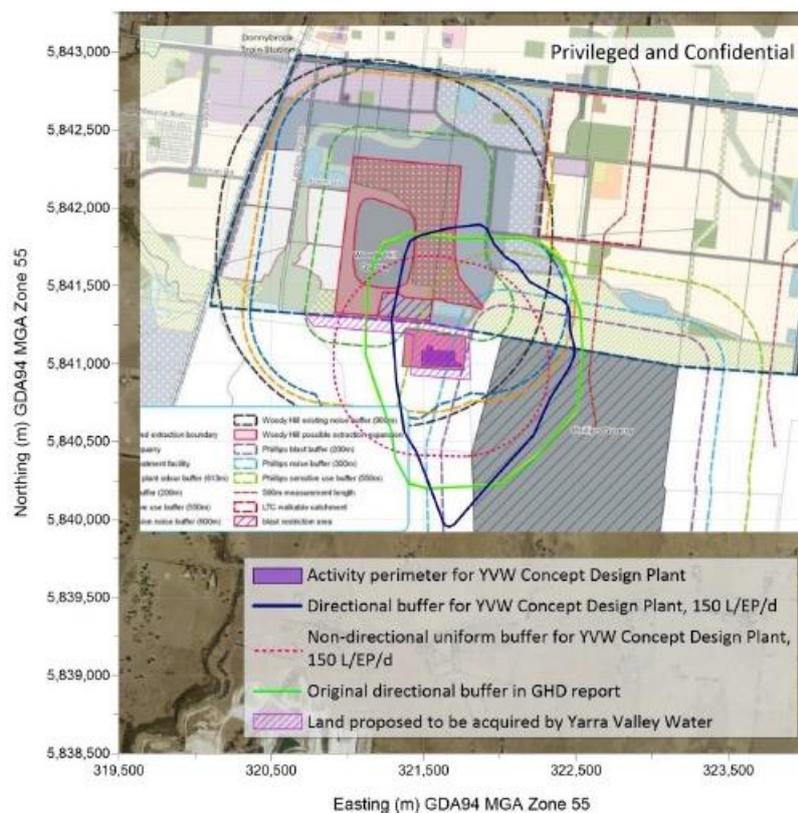
Mr Pollock referred to EPA 1518 and the provisions pertaining to determining the separation distance for a sewage plant which state:

The recommended separation distance for sewage treatment plants should be determined in consultation with EPA. Wind regimes, topography, waste loading, treatment/disposal methods and design capacity should be taken into account.

During questioning from the Panel, Mr Pollock agreed that the word 'exceptional' is not used in association with wind and hence it is appropriate to consider wind regimes in prescribing a buffer for a sewage plant. This may result in a directional buffer.

Mr Pollock's evidence was that based on the dominant wind directions which are predominantly along the north south axis, a directional buffer was appropriate, as shown in Figure 11 in blue:

Provided the non-radial buffer encloses the same area as does the default fixed radius buffer then the same area of land is sequestered from sensitive land use. In this manner the degree of protection in the event of an 'industrial residual air emission (IRAE) can be made the same, independent of the direction of the sensitive land use from the source.

**Figure 11 RWTP Odour buffer recommended by Mr Pollock**

Source: Mr Pollock's witness statement (Document 115)

Mr Asimakis confirmed that GHD's earlier advice on the odour buffer should be corrected as it was based on assumptions about the size of the RWTP which are no longer valid:

Given separation distances for sewage treatment plants are given as a function of the size of the population they serve and the type of treatment process in EPA Publication 1518 information regarding size of plant is a key factor in calculating the default buffer distance for the plant.

His evidence was that in the absence of detailed design, the appropriate means to determine the buffer is to use the formula contained in EPA 1518 based on the equivalent population (as Mr Pollock had done). For a sewage treatment plant with a capacity of 20 ML/day (equivalent population of 117,650) he determined the appropriate buffer was 490 metres. He also recommended:

... the effects of local meteorology also be taken into account in the form of a directional buffer.

During his presentation to the Panel he indicated that he agreed with Mr Pollock's buffer calculations, as Mr Pollock had used more current information in regard to plant size. He also supported Mr Pollock's directional buffer approach.

Mr Ramsay disagreed that a directional odour buffer was appropriate for the RWTP as:

... nothing that has been shown to be exceptional about the meteorological or topographic conditions in the vicinity of the proposed RWTP.

Mr Ramsay said that the worst-case odour scenarios are inversions at night and still conditions or light winds. Mr Asimakis also stated that light winds and still early morning conditions are worse for odour.

Dr Cowan noted in his evidence that:

The design of the sewage treatment plant can be adapted to reduce the required separation distance using the options for adjusting separation distances contained in EPA Publication 1518. It is therefore considered that a separation does not need to be set at the current time as so little is known about the plans for the treatment plant.

In regard to the suitability of the intended site for the RWTP, Yarra Valley Water submitted:

As a land use, the RWTP is inherently compatible with quarrying. Whether its odour buffer takes the form of that identified by Mr Pollock and supported by Mr Asimakis, or the 'radial' buffer preferred by Mr Ramsay and Dr Cowan, it instantiates why the RWTP site is so desirable from a land use planning perspective. Impacts are limited to co-locate with those of the quarries in precisely the way MICLUP anticipates.

The VPA submitted in its Part C submission that the odour buffer should be included on Plan 15 of the PSP, in line with the evidence of Mr Pollock, but subject to a note setting out the underlying assumptions (volume) of the facility. That way, if the volume changes, the odour buffer could be adjusted as necessary.

## **(ii) Discussion**

EPA 1518 states that the separation distance for sewage treatment plants should be determined in consultation with EPA.

The buffer has been calculated by Mr Pollock to be about 575 metres. The calculation does not consider the level of technology employed to manage odours, as this level of detail is not known at this stage.

The Panel considers the derived buffer to be indicative of that which may ultimately be required when approvals are sought to construct the RWTP. It is only at the detailed design stage – when the exact plant footprint is known and the level of odour control is defined – that a more exact determination of the buffer could be undertaken.

Based on Mr Pollock's buffer calculations shown in Figure 11, the likely footprint of the odour buffer will be contained within the existing buffers required for the quarries, even with reduced quarry buffers recommended by the Panel. Indications are that the odour buffer would not overlay any areas designated for sensitive uses.

Further, the Panel is not aware that the EPA has been consulted in relation to Mr Pollock's buffer, including whether a directional buffer should apply.

For these reasons, the Panel considers it would be premature to include an odour buffer in the PSP at this stage.

That said, attention should be drawn to the potential for odour impacts from the RWTP in the (albeit unlikely) event that an application is made for a sensitive use within the area which could be affected by odour. The footprint of the RWTP in the FUS, and the discussion of the RWTP in the PSP, may be sufficient to inform landowners and developers that odour from the future RWTP may need to be taken into account. However the Panel considers that a note should be added to the FUS to further highlight the odour impacts associated with the RWTP.

Some consequential changes will be required to the Amendment documentation to reflect the removal of the odour buffer, including the referral requirement to the EPA proposed in the VPA's Part C Schedule to Clause 66.04.

**(iii) Conclusion and recommendations**

The Panel concludes:

- It would be premature for the PSP to include an odour buffer for the RWTP.

The Panel recommends amending:

- the Part C Precinct Structure Plan as follows:

**Amend Plan 3 (Future Urban Structure) to:**

**a) include the following note:**

**The future Wollert Recycled Water Treatment Plant may generate odour. This should be taken into account in any application for a sensitive use within the vicinity of the future Wollert Recycled Water Treatment Plant.**

**Amend Plan 15 (Buffers, Noise Amenity Area and Measurement Length) to:**

**b) remove the odour buffer around the future Wollert Recycled Water Treatment Plant**

- the Part C Urban Growth Zone Schedule 7 as follows:

**In Clause 1.0, amend the Table of Uses as follows:**

**a) in Section 2, remove the condition relating to the odour buffer and consider whether Caretaker's house, Education centre (other than Employment training centre or Tertiary institution) and Hotel (currently section 2 uses within the odour buffer) should be Section 1 or Section 2 uses, and what conditions (if any) they should be subject to.**

**In Clause 6.0, remove the decision guideline relating to the Future Wollert Recycled Water Treatment Plant.**

- the Part C Schedule to Clause 66.04 as follows:

**Delete the third last entry in the table requiring referral of applications within the odour buffer to the Environment Protection Authority.**

**6.6 Appropriate zone for the storage pond land**

In the exhibited FUS, the storage pond land was shown as 'utility facility'. This was changed to 'industry' in the Part A version, but with a designation of 'potential future water storage – holding ponds for treated recycled water'.

The applied zone for the storage pond land is Industrial 1 on the east side of Langley Park Drive, and Industrial 3 on the west side of the road (in the exhibited, Part A and Part C versions). The storage ponds (being a 'utility installation') would require a use permit under the Industrial 1 and 3 Zones.

**(i) Evidence and submissions**

Yarra Valley Water submitted that the storage pond land should be zoned Public Use Zone 1, meaning that neither the use nor the development of the land for storage ponds would trigger a permit. Yarra Valley Water submitted that this is appropriate, given the certainty that the land will be used for Class B recycled water storage "*with no realistic prospect of amenity impacts*".

The VPA did not support a Public Use Zone, but did revise the Part A UGZ7 to make utility installation a section 1 (no permit required) use on land designated as ‘potential future water storage’ on the FUS. Yarra Valley Water supported this as an alternative to a Public Use Zone, but submitted that the UGZ7 should also exempt buildings associated with a utility installation from any prohibition or control associated with the Woody Hill Blast Buffer.

Yarra Valley Water also submitted that the storage pond land should be described as ‘future’ storage ponds rather than ‘potential future’ storage ponds:

The “potential” is absolute: the land’s only foreseeable future is its development and use by Yarra Valley Water for its utility purposes. It has no future as employment land. Yarra Valley Water’s expectation is it will not have excess land with the capacity to be used for other purposes.

It would therefore be inappropriate for the PSP to leave any question as to the future use of the Langley Park Drive land, or to suggest any future capacity for development.

In its Part C submission the VPA submitted:

It is the VPA’s view that at this level of certainty it would be inappropriate to place all the land within a Public Use Zone at this time. The proposed uses are section 1 uses and no permit will be required. It is appropriate that any ancillary land is utilised for appropriate urban purposes and that this land has no advantage to other land within the PSP.

## **(ii) Discussion**

As a general principle, where land is owned by a public utility and is used (or to be used) for a public use, it is appropriate to apply the Public Use Zone. The Panel accepts that the future use of the land for storage ponds is certain, although the timing of the construction of the storage ponds may not be. The Panel therefore considers that the land should be shown on the FUS as ‘public utility’, not industrial.

The Panel accepts that there is minimal prospect that the use of the land for storing Class B water could cause any amenity impacts. It therefore agrees that the use of the land for storage ponds should not require a permit. The Part C version of the UGZ7 already provides for the use of land for a utility installation on land shown as ‘Future Wollert Recycled Water Treatment Plant’ as a section 1 use.

The Part C UGZ7 also already includes an exemption for ‘utility installation’ from the prohibition on buildings and works within the Woody Hill Blast Buffer. Construction of the storage ponds within the Blast Buffer will therefore not be prevented. While there is no permit trigger for buildings and works under the Part C UGZ7, the construction of the storage ponds will presumably require bulk earthworks (which do trigger a permit). The land to the west of the Woody Hill Quarry is subject to highly sodic soils (refer to Chapter 8). The Panel therefore considers that the permit trigger for bulk earthworks should continue to apply.

On balance, the applied zone should remain Industrial 1/Industrial 3 as exhibited. The land can be rezoned to Public Use Zone once Yarra Valley Water’s plans for the land are finalised.

## **(iii) Conclusions and recommendations**

The Panel concludes:

- The Yarra Valley Water land in Langley Park Drive should be shown on the FUS as public utility.

- The land should have an applied zone of Industrial 1/Industrial 3 as exhibited, but with permit exemptions for the use of the land for a utility facility.
- There is currently no permit trigger for buildings and works associated with a utility facility (which is appropriate), but the permit trigger for bulk earthworks should continue to apply so that sodic soils are taken into account.

**The Panel recommends amending:**

- **the Part C Precinct Structure Plan as follows:**

**Amend Plan 3 (Future Urban Structure) to:**

- a) show all of the Yarra Valley Water land in Langley Park Drive as ‘public utility’, and delete the cross hatching and ‘potential future water storage – holding ponds for treated recycled water’ in the key on Plan 3 (and any other plans on which it appears).**

- **the Part C Urban Growth Zone Schedule 7 as follows:**

**In Clause 1.0, amend the Table of Uses as follows:**

- a) in Section 1, amend the condition for Utility installation to read:**

**Must be on land identified as ‘public utility’ on Plan 3 in the incorporated *Shenstone Park Precinct Structure Plan*.**

## 7 Extent of employment land

### 7.1 Introduction and context

The exhibited FUS provided for employment land (comprised of business, light industry and industry) within the western part of the FUS, surrounding the Woody Hill Quarry. It nominated Yarra Valley Water's storage pond land to the west of the quarry as 'utility facility'.

The Part A FUS replaced the land shown as 'utility facility' with additional industrial and light industrial land, while still recognising the future use of this land for recycled water storage ponds. This increased the supply of employment land from 131 hectares in the exhibited PSP to 171 hectares in the Part A PSP.

The PSP was informed by a background report by Ethos Urban titled *Shenstone Park Precinct Structure Plan Retail and Employment Needs Economic Assessment (2019)*.

### 7.2 The issues

The issues are:

- is the amount of employment land strategically justified?
- will the PSP result in an oversupply of industrial land?
- will the industrial land face competition from other nearby industrial areas?
- should industrial uses to the east of Woody Hill Quarry extend further than required for buffers?
- would a reduction in industrial land, and a corresponding increase in residential land be inconsistent with the North Growth Corridor Plan and MICLUP?

### 7.3 Evidence and submissions

#### The VPA

The VPA submitted that the extent of employment land was informed by the background economic assessment (Ethos Urban 2019), the North Growth Corridor Plan, MICLUP and the need to provide appropriate buffers to the Woody Hill Quarry. It submitted that the Corridor Plan outlines a clear boundary between industrial and residential use, and that the boundary in the exhibited FUS is consistent with this line.

The VPA called Dr Spiller to give evidence on the employment land provisions of the PSP (Document 84). Dr Spiller supported the extent of employment land nominated in the exhibited PSP (being some 131 ha) on basis that it provides:

- Protection of the Wood Hill Quarry as a strategic economic asset
- Provision of sufficient land to provide for projected demand for commercial, industrial, warehousing and logistics and particular forms of retail found in quasi industrial locations (such as Bulky Goods), and
- Achieving consistency with the economic vision for the host region, as reflected in the North Growth Corridor Plan and Metropolitan Industrial and Commercial Land Use Plan (MICLUP).

Dr Spiller noted that the extent of land designated for employment uses broadly aligned with the various buffers determined to be required for both the existing and proposed expansion

of Woody Hill Quarry, and accepted that the quarry was recognised in government policy as a strategic economic resource.

In relation to projected demand for commercial and industrial uses, Dr Spiller noted that the Part A PSP demonstrated that allocated employment land (excluding town centres) could accommodate up to 5,150 jobs, with approximately 3,600 of these being located on land outside the Blast Buffer (he assumed land within the Blast Buffer would not be available for development other than in the long term). His assessment predicted that by 2051:

- approximately 350 ‘industry’ jobs would be taken up within the precinct (10 percent of the capacity)
- if considering a broader range of jobs, such as bulky goods retailing and other commercial uses, this would expand to approximately 790 jobs (around 22 percent of the capacity).

Dr Spiller’s evidence was that this did not necessarily signify an over provision of land despite the significant difference between capacity and demand over the next 20 to 30 years, given:

- the modelling does not reflect competitive strengths of land, and factors such as good access to public transport (Donnybrook train station) and arterial roads (Donnybrook Road) and the freeway network, that may make the land more attractive
- a ‘tight fit’ between supply and projected demand is not recommended for industrial land and ‘freeboard’ is required to enable factors such as non-traditional industrial uses, structural shifts in the economy, customised developer responses and the potential for new economic drivers.

Dr Spiller also considered that the North Growth Corridor Plan and MICLUP set the vision for the economy in this region, and he considered that the PSP process should not “*re-litigate long term economic and planning visions for the corridor*”.

Dr Spiller did not consider that the re-designation of the storage pond land from ‘utility’ to ‘industrial’ in the Part A FUS would materially change his assessment.

### **Donnybrook Joint Venture**

DJV proposed an alternative version of the FUS (Document 54(a), refined in Document 227). The DJV FUS (among other things) reduced the extent of employment land and increased the area of residential land. While DJV took no issue with providing employment land within the quarry buffers (which it submitted should be no more than 500 metres from the extraction limit), it opposed employment land outside the buffers. It also opposed the extent of the eastern expansion of the quarry onto its land (see Chapter 4.5). Overall the DJV FUS proposed a reduction in employment land from 171 hectares (Part A FUS) to 139 hectares.

Dr Spiller did not support the DJV proposal to re-designate some employment land on the eastern side of the quarry to residential use. His evidence was that the opportunity to ever get that land back for employment purposes would be lost. He also regarded it as inconsistent with high level strategic planning documents.

Mr Quick gave economic evidence for DJV (Document 69). Mr Quick’s evidence was that there did not appear to be any strategic justification for the extent of employment/industrial land allocated in the PSP, other than a response to quarry buffers. He noted that the extent of employment land had changed considerably over the years and appeared to be directly in

response to changed buffer distance requirements and quarry expansion plans, rather than in response to a demand for employment use in this location.

Mr Quick did not consider the employment land at Shenstone Park to be necessary in achieving enough industrial supply in the northern region to meet demand over the next 40 years and beyond. He considered Shenstone Park a secondary location for industrial uses given the relatively small area, lack of direct highway access and separation from the North State Significant Industrial Precinct. Instead, his evidence was that there was a significant oversupply of employment land in the PSP, that may see an extended period of underdevelopment, resulting in potentially large areas of vacant land.

Mr Quick's evidence was that the Shenstone Park land is likely to be best suited to more peripheral business and service offerings and small industrial uses serving the local area, rather than large format industrial uses. He considered that Donnybrook Road frontage would provide some exposure required by a range of service businesses, commercial showrooms or bulky goods facilities. Other uses such as workshops, storage space, showrooms, car repairs and the like that service a more local market are also likely.

Mr Quick supported the DJV FUS. He considered the reduction in the amount of employment land proposed by DJV as "*inconsequential*" in terms of the broader supply of employment land in the PSP and the region. Mr Quick considered the DJV FUS a superior outcome in economic terms given:

- it would still align with quarry buffers (assuming the eastern expansion area was not taken up)
- the extent of employment land would still be higher than as provided for in the exhibited PSP (139 hectares proposed compared to 131 hectares in the exhibited PSP)
- the likely job reduction would be minor
- demand for employment land is anticipated to be modest compared to supply and therefore a reduction would be appropriate.

Overall, DJV submitted that while VPA had relied on the North Growth Corridor Plan to support the location of employment land, the Corridor Plan allocated just 100 hectares (gross) of employment land – significantly less than the net areas proposed in the Part A FUS and the DJV FUS. DJV submitted that it was inappropriate to rely on the boundary line between employment and residential land as shown in the Corridor Plan, given it is a high level strategic document with detailed land use designation a matter for the PSP. DJV submitted this was evident in other areas of the PSP where there were variations from the Corridor Plan, such as changes to the quarry area and the location of the RWTP.

DJV also submitted that there was no explanation in MICLUP as to the 280 hectares of employment land identified, noting that it included quarry land, conservation area, utility land, waterways and so on. DJV submitted that MICLUP, like the Corridor Plan, should not be applied rigidly.

The VPA responded in its Supplementary Submission (Document 202) that if the extent of the eastern buffer to the Woody Hill Quarry was reduced, the land should not be designated for residential purposes, but rather should remain employment land to be consistent with MICLUP and Plan Melbourne.

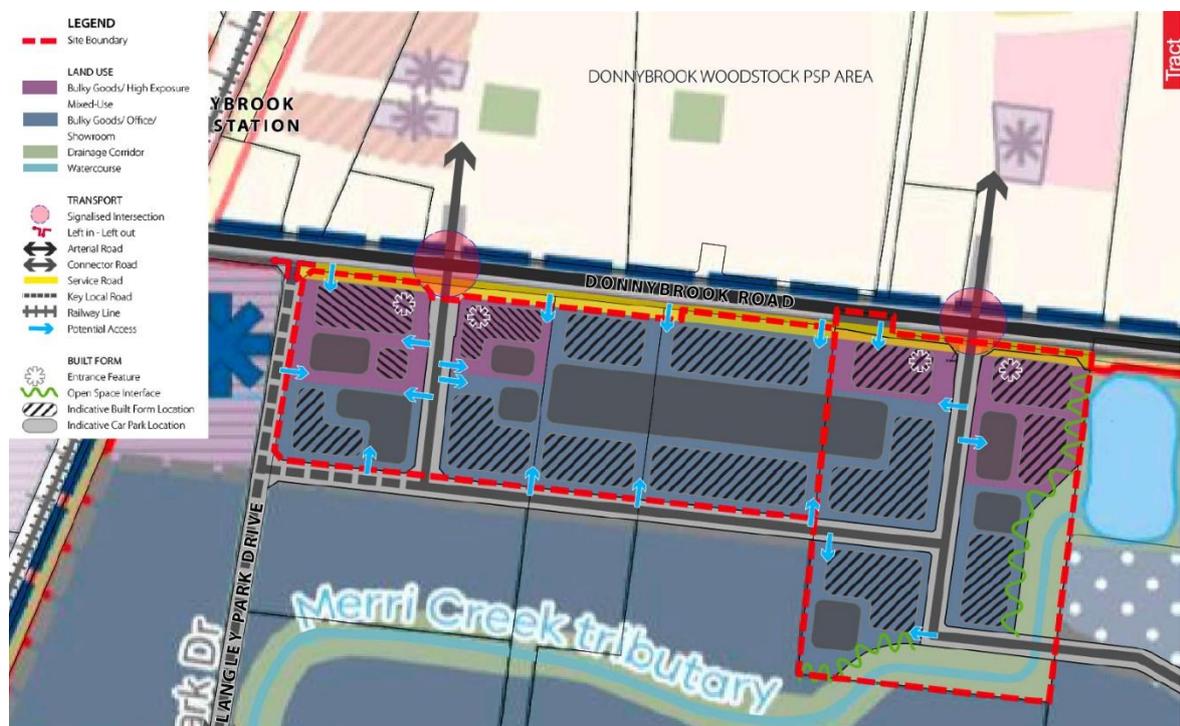
### 910 Donnybrook Road

910 Donnybrook Road is located to the north of the Woody Hill Quarry and approximately 900 metres east of Donnybrook Railway Station, with a frontage to Donnybrook Road. The 12.14 hectares site is shown in the Part A FUS as being within three different employment zones:

- ‘Business’ (C2Z) for the western portion of the site, including approximately half the frontage to Donnybrook Road
- ‘Light industry’ (INZ3) within most of the eastern part of the site
- ‘Industry’ (INZ1) in the south-eastern corner of the site, closer to Woody Hill Quarry.

910 Donnybrook Road’s submission to the Amendment (Submission 7) sought a rationalisation of the employment uses across the site into ‘Business’ (C2Z), as shown on a Land Use Concept Plan prepared by Tract and extracted in Figure 12.

**Figure 12 Tract Land Use Concept Plan for 910 Donnybrook Road**



Drawing Title	Project Name	Drawing No.	Revision	Date	Drawn	Checked	Project Principal	Scale
Land Use Concept Plan	910 Donnybrook Road	318-0203-00 DR02	00	12.11.2019	NC	NC	JS	1:5000 (A4) 0 50 100 200

Source: Submission 7

Mr Quick gave economic evidence for 910 Donnybrook Road (Document 67). His evidence was that the designation of three different zones across the site would create unnecessary fragmentation of a parcel of land that would be expected to support similar uses across the entire property. He supported a single ‘Business’ or C2Z for the entire site as a more feasible and logical outcome.

The reasons for this support echoed much of his evidence as outlined above for DJV, including that the extent of land in his view relates primarily to the need for buffers rather than due to an identified need for more industrial land or job creation in the region, and any reduction of industry would be inconsequential in the context of the broader industrial land supply. He noted that the quantum of employment land would not change under the Tract plan.

Mr Quick considered that the mix of uses likely to emerge in Shenstone Park, being a secondary location for industrial uses, is more consistent with a C2Z. He considered that the Donnybrook Road frontage, with its associated level of exposure, would make it suitable to businesses that rely on passing traffic, such as bulky goods, trade supplies, commercial showrooms and the like. These are uses consistent with the C2Z.

Mr Woodland gave planning evidence for 910 Donnybrook Road (Document 108). He supported the C2Z across the entire land holding on the basis it would better enable the creation of:

- a high quality commercial gateway to the precinct
- an eastern bookend to the business precinct
- a higher internal demarcation between the industrial and business precincts.

Mr Woodland considered the Tract plan, including the proposed realignment of roads and the Merri Creek Tributary, would achieve a more functional and attractive employment precinct, with land use efficiencies and opportunities to capitalise on a waterway asset. The realignment of the waterway would avoid isolating the south-eastern part of the site from the balance of the land.

The VPA responded that it did not oppose in principle an increase in the area of ‘business’ or the realignment of roads and the waterway (contingent on Melbourne Water’s agreement). However, it submitted that any realignment of the connector road would need to be outside the Blast Buffer, resulting in a narrow strip of industrial land between the southern property boundary and the road. The VPA did not support commercial land on the southern side of the connector road given that it would be partly within the Blast Buffer.

## **7.4 Discussion**

### **(i) Role of employment land**

The parties generally agreed that one of the roles of the employment land was to protect the strategically significant Woody Hill Quarry. The Panel agrees that both the quantum and location of employment land has been strongly determined by the need to provide a buffer to the quarry operations. This is confirmed in the range of strategic documents that have informed the FUS, including the Ethos Urban background report which states:

The Melbourne North Growth Corridor Plan (2012) and constraints to potential land uses associated with buffer areas from the Woody Hill Quarry are two major influences for the designation of land in the FUS as employment.

The North Growth Corridor Plan notes that:

... it ensures that approved and operational quarries are protected from encroachment by sensitive land uses. It also locates industrial or commercial development adjacent to existing quarry sites within/adjacent to the [Urban Growth Boundary].

MICLUP states (at page 64):

To the north on Donnybrook Road, the Shenstone Park PSP area includes approximately 280 hectares of industrial land identified through the North Growth Corridor Plan and PSP process. This land provides an important buffer to existing and proposed quarry operations, a proposed sewerage treatment plant to the south, and nearby residential land uses. This precinct has good access to the Hume Freeway from Donnybrook Road.’

Finally, Objective O8 of the PSP states:

Deliver employment land for a variety of sectors through industrial and commercial precincts that allow the continued operation and expansion of the Woody Hill quarry and commencement and expansion of the Phillips Quarry.

The Panel considers it entirely appropriate that the final extent of buffers for the Woody Hill Quarry, determined as a result of this PSP process, play a strong role in determining the extent and location of employment land in the FUS.

That said, the Panel does accept that providing a buffer is not the sole purpose of the employment land. The PSP's Vision is to create a self-sufficient precinct. The PSP Guidelines and other high level strategic planning documents seek to provide for a good job to dwelling ratio in the growth corridors and to improve the range and diversity of jobs in the employment market.

Both Dr Spiller's and Mr Quick's evidence was that there was a very significant supply of employment land in the precinct, well beyond demand for the life of the PSP. Dr Spiller estimated that only 10 to 22 percent of the employment land will be taken up in the next 30 years, and Mr Quick's evidence was that even if no employment land was provided in Shenstone Park, there would be adequate supply in the northern region for the next 40 plus years.

While the Panel accepts Dr Spiller's evidence that a 'tight fit' between supply and projected demand should be avoided, based on the evidence there is ample 'freeboard' in the exhibited and Part A FUS as well as the DJV FUS. The Panel agrees with Mr Quick that were the DJV FUS to be adopted, a proposed reduction of some 32 hectares would be immaterial in the context of this supply.

The Panel also notes that over time there has been considerable variation in the overall area dedicated for employment land in Shenstone Park:

- the North Growth Corridor Plan envisaged approximately 100 hectares gross
- the Northern Quarries Investigation Area Addendum envisaged approximately 187 hectares gross
- the 2017 initial draft of the PSP envisaged approximately 154 hectares net
- the exhibited PSP envisaged approximately 131 hectares net
- MICLUP envisaged approximately 280 hectares gross
- the Part A PSP envisaged approximately 171 hectares net.

While some of these variations are based on net versus gross areas, and in the case of MICLUP also include the quarry land, some conservation areas and utility land, these variations demonstrate that the quantum of employment land has not been determined on a detailed projected demand analysis, but rather has varied depending on other factors such as quarry buffers and the location and extent of utilities.

## **(ii) Consistency with strategic plans**

Dr Spiller relied heavily on the Corridor Plan and MICLUP as setting the strategic basis for the extent of employment land, and he considered that this high level strategic planning should not be varied at the PSP stage. The Panel does not consider that this is the correct way to interpret these strategic policy plans.

The intent of the Corridor Plan is to provide a high level strategic basis for a future integrated land use and transport plan within a broader region, and then for the PSP stage to provide for a refined FUS for smaller areas within the region, based on more detailed assessments. MICLUP is also recognised as a ‘high level’ strategic plan, that provides an overview of current and future needs for industrial and commercial land across metropolitan Melbourne. MICLUP states that it is to be used to guide more place-specific plans such as PSPs.

As noted above, the PSP has never sought to deliver a fixed supply of employment land. Rather, it has primarily sought to provide an appropriate land use within the quarry buffer, and also to provide for local and regional jobs. Over time, the extent of employment land for the precinct has varied across a range of regional planning documents, and even between versions of the PSP. The Panel does not consider that a variation in the order proposed by DJV would undermine the high level objectives of the Corridor Plan or MICLUP.

The Panel also does not consider that the boundary between employment and residential uses as shown in the Corridor Plan should be regarded as determinative. The VPA indicated that it based the FUS on this alignment, with residential land uses to the east and employment to the west. The Panel was told that this influenced the decision to provide for the proposed easterly expansion of the Woody Hill Quarry, despite neither Barro nor DJV supporting an expansion in this location.

The Corridor Plan shows 100 hectares of employment land in the precinct, and a significant area of land around the Woody Hill Quarry as ‘non-urban/utilities’. This land, together with land between the railway line to the west and the Urban Growth Boundary to the east, extending south to Summerhill Road was noted as an ‘Investigation Area’. Mr Woodland was Strategic Planning Director of the Growth Areas Authority at the time the Corridor Plan was prepared. He usefully explained that this ‘Investigation Area’ indicated the broad area where investigations were being undertaken in relation to the siting of the future RWTP for the region as well as taking into account a number of other land use constraints such as conservation areas, quarry buffers, utility easements and so on.

As such, the Panel does not consider that the Corridor Plan necessarily contemplated employment land for the entire western part of the PSP, as the VPA submits. Furthermore, it is not uncommon for there to be some variations from Corridor Plans, based on detailed investigations at the PSP stage. This is evident in other changes between the PSP and the Corridor Plan (for example, changes to the Conservation Areas, changes to the location of the RWTP, and changes to the extent of the Woody Hill Quarry). The Panel considers that a variation to the point at which employment uses transition to residential as shown in the DJV FUS is still generally consistent with the Corridor Plan.

### **(iii) 910 Donnybrook Road**

The Panel accepts the evidence of Mr Quick and Mr Woodland that a single C2Z applying across the site is appropriate, subject to the proviso that an applied C2Z is not appropriate within the Blast Buffer. That portion of the land remaining within the Blast Buffer should remain with an applied Industrial 1 Zone. If this would result in a small and unusable strip of C2Z land between the Blast Buffer and the road and waterway (depending on the final alignment of the road and waterway), that land should remain in the Industrial 1 Zone. The Panel addresses the realignment of the roads in Chapter 14.6, and the realignment of the waterway in Chapter 15.

## 7.5 Conclusions and recommendations

The Panel concludes:

- The location and extent of employment land has been strongly influenced by providing a buffer to the Woody Hill Quarry and therefore a revision based on the revised buffers is appropriate.
- There is ample supply of employment land, well beyond the life of the PSP, and a reduction of some 32 hectares as proposed by DJV will not have any material impact.
- A reduction in employment land as proposed by DJV would not be inconsistent with the North Growth Corridor Plan, MICLUP and other high level strategic planning documents.
- The land at 910 Donnybrook Road should be rationalised to contain a single 'business' designation with an underlying C2Z for the land to the north of the final alignment of the waterway (to be determined in consultation with Melbourne Water) and the connector street. The land south of the connector street and waterway should remain in the Industrial 1 Zone.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 3 (Future Urban Structure) to:**

- b) reduce the extent of the employment land to align with the Woody Hill Sensitive Use Buffer redrawn in accordance with consolidated Recommendation 17(a), with residential land beyond the extent of the buffer to the east**
- c) designate the land at 910 Donnybrook Road, Donnybrook as follows:**
  - **all land to the north of the connector street and waterway as 'business' with an applied Commercial 2 Zone**
  - **all land to the south of the connector street and waterway (including the land in the Woody Hill Blast Buffer) as 'industry' with an applied Industrial 1 Zone.**

## 8 Sodic and dispersive soils

### 8.1 Introduction and context

Sodic soils contain elevated levels of sodium attached to clay particles. When wet they swell and the soil loses its cohesion which can lead to significant erosion and turbidity increases in waterways.

The exhibited PSP and UGZ7 contained no mention of sodic soils. Sodic soils were raised as an issue in relation to the Beveridge North West PSP, prompting the VPA to retain Jacobs to undertake an investigation in relation to sodic soils in the North Growth Corridor, including in the Shenstone Park precinct. Sodic soils were the subject of discussion at the Beveridge North West Panel Hearing (Mitchell C106mith).

In response, the VPA proposed the following changes to the Part A PSP and UGZ7 for Shenstone Park:

- insert a new Requirement in the PSP to include the protection of sub soil layers
- insert new Guidelines in the PSP regarding the management of subdivision, development and stormwater to avoid or mitigate the potential risk of erosion
- amend the UGZ7 to:
  - include a permit trigger specific to earthworks where the land is identified as being subject to sodic or dispersive soils
  - include an application requirement for a sodic/dispersive soils management plan
  - include a mandatory permit condition requiring the preparation of a site management plan to manage sodic/dispersive soils during subdivision and earthworks.

### 8.2 The issues

The issues are:

- has the prevalence of sodic and dispersive soils in the precinct been sufficiently investigated and the associated erosion risks identified to allow development to proceed broadly in accordance with the PSP?
- are there adequate controls within the PSP and UGZ7 to ensure sodic and dispersive soils will be effectively managed during the development of the PSP?

### 8.3 Evidence and submissions

The Merri Creek Management Committee (MCMC) provided a submission to the Amendment (Submission 25) and a submission to the Panel (Document 249). The basis of its original submission was that a detailed investigation of soil sodicity and dispersiveness should be undertaken early in the process of preparing a PSP to enable effective planning controls to be put in place to manage erosion and turbidity issues.

MCMC submitted a series of photographs of erosion and turbidity issues in the north metropolitan area, highlighting the need to appropriately manage sodic soils during construction and drainage works. Two key messages from the MCMC submission were:

- the drainage Development Services Schemes (DSS) needs to take sodic and dispersive soils into account

- the subdivision construction phase and the building phase present significant risks.

MCMC stated that it welcomed the proposed planning controls outlined in the Part A versions.

Melbourne Water (Submission 19) also commented on the need to have a better understanding of soil types and their sensitivity to the land uses proposed. The VPA's Part B submission attached a letter from Melbourne Water responding to Expert Witness Statements. The letter states, in regard to works to drainage and waterways, that the following information will need to be provided:

Geotechnical assessment which clearly indicates the soil types within this catchment, including identification of the erosion potential and appropriate mitigation measures.

Dr Sandercock gave evidence about sodic soils for the VPA (Document 119). He stated that he relied on the Jacobs Report attached to his statement – *Sodic Soils Assessment Shenstone Park Precinct Area* dated 6 November 2020 of which he was the lead author. He described the field sampling program undertaken in October 2020 where samples were collected using a gridded sampling program, with approximately one sampling site per 10 hectares of land. The Woody Hill Quarry land was not sampled. In regard to the adequacy of the sampling program, Dr Sandercock considered:

... the samples collected allowed for a suitable representation of the range of geological conditions for use in interpolating data and providing an indication of variability of soil characteristics across the Precinct.

The total number of sites inspected was 46, with the number of samples collected recorded at 101, including 41 at depths between 30 and 40cm, and 14 deeper samples at 60 to 130cm.

The Jacobs Report used a vulnerability assessment approach to assess the risk associated with sodic soils in urban development for two scenarios – the construction phase and the future developed land use. The key findings of the Jacobs Report were:

- Soils were predominantly classified as Sodosols.
- Soils are predominantly sodic throughout the B horizons (30 to 40cm depth).
- Vertosols were also identified. These are clay soils with shrink-swell properties that exhibit strong cracking when dry and at depth.
- Areas to the west of the quarry have topsoil with moderate to high Exchangeable Sodium Percentage (ESP) values (7 to 10 percent) and subsoils with very high to extreme ESP values (more than 15 percent).
- Areas east of the quarry generally have topsoils with low ESP values (less than 5 percent) and subsoils with moderate to very high ESP values (7 up to 15 percent).
- Dispersion and erosion are likely to occur when these subsoils are exposed to fresh rainfall or runoff. Deeper subsoils are deemed highly sodic, with an average ESP of 16.9 percent.

The vulnerable areas were assessed as:

- waterways, retarding basins and wetlands
- the area west of Woody Hill Quarry with high to extreme sodicity values
- areas with steep slopes.

In regard to the Merri Creek Tributary, Dr Sandercock's evidence was:

Significant engineering works are likely to be required to stabilise this waterway so that it is resilient to stormwater runoff from future land development.

Dr Sandercock's findings in regard to the risk posed by sodic soils was:

Erosion risks associated with sodic and dispersive soils can be managed by appropriate planning. The Jacobs report concurs with the planning requirements and guidelines documented in the Shenstone Park Precinct Structure Plan that relate to Integrated Water Management.

Dr Sandercock's evidence was unchallenged.

As noted above, the VPA proposed changes in the Part A versions of the PSP and UGZ7 to deal with sodic soils, which it submitted were consistent with the changes presented to, and ultimately recommended by, the Beveridge North West Panel.

## **8.4 Discussion**

The evidence presented to the Panel shows that sodic and dispersive soils are prevalent across the precinct. MCMC highlighted that major earthworks and construction activities pose a significant risk of soil erosion and turbid runoff affecting water quality of waterways within and downstream of the precinct. The Panel was provided with several examples of poor outcomes where urban development on areas with sodic and dispersive soils had failed to manage soil erosion and the quality of water runoff. These examples are a stark reminder of the risks of developing on areas of sodic and dispersive soils. The Panel notes however that those works occurred before the introduction of specific planning controls at the subdivision stage to manage the risks posed by sodic soils.

The Panel considers that sufficient work on assessing the soil conditions in the precinct has been done to provide a way forward. The Jacobs Report provides a sound basis for the inclusion of the controls added to the Part A PSP and UGZ7. It is nonetheless not an exhaustive investigation of the potential impacts of specific development proposals and more detailed work may be needed as permit applications are considered for subdivision and works in the precinct.

On the basis of Dr Sandercock's evidence, the Panel agrees with the VPA that the constraints posed by sodic and dispersive soils can be appropriately managed during and post development to realise the development of the PSP area. The Panel is satisfied that the controls included in the Part A UGZ7 are sensible and appropriate.

That said, the Panel would like to see a greater connection between the requirements in the PSP and the conditions contained in the UGZ7 relating to the management of sodic soils. The PSP does not explicitly mention that sodic soils are present within the precinct or that they must be managed to reduce erosion and turbidity risks. The Panel has recommended appropriate wording for the PSP requirements and guidelines below.

## **8.5 Conclusions and recommendations**

The Panel concludes:

- Sufficient investigations into the extent and impacts of sodic and dispersive soils in the PSP area have been conducted to allow the Amendment to proceed, subject to controls being included in the PSP and the UGZ7.
- It will be incumbent on planning permit applicants to prepare soil management plans and for the responsible authority to assess, approve and administer these plans to ensure that the PSP requirements are met.

- Broadly speaking, the Part A PSP and UGZ7 provide a sound framework to achieve effective management of the impacts of sodic and dispersive soils. Some modifications are recommended to the requirements and guidelines of the PSP to better link them to the requirements of the UGZ7.

The Panel recommends amending the Part C Precinct Structure Plan as follows:

**Replace Requirement R3 with the following:**

**Subdivision, engineering, landscape design and buildings and works must provide a sensitive response to current landforms and minimise the need for excavation and cut and fill earthworks and manage the risks posed by sodic soils.**

**Include a new guideline in section 3.7.1 (Integrated Water Management & Utilities) which reads:**

**Subdivision and development in areas identified as being affected by sodic and dispersive soils should be managed to avoid or mitigate the potential risk of erosion, both during construction and on an ongoing basis.**

## 9 Vision, outcomes and general matters

### 9.1 The issues

Submissions and evidence in relation to Vision, Outcomes and General Matters within the PSP were limited. The main issue is:

- should the Vision be amended to more clearly recognise that strategic planning prioritises extractive industries over urban development?

### 9.2 Evidence and submissions

Mr de Silva gave planning evidence for Barro (Document 104). As set out in Chapter 4.3, his evidence was that extractive interests must take priority over urban development. He recommended that the Vision of the PSP be revised to include the following additional text in place of the first paragraph:

The Shenstone Park precinct has been designed taking into account the presence of State significant extractive resources within the Woody Hill and Phillips quarries. In accordance with the direction that is set out in the North Growth Corridor Plan that acknowledges the presence of the resources, the PSP adopts a precautionary, protective approach to avoid encroachment of incompatible land uses.

The precautionary, protective approach has been adopted in recognition of the quality and value of the resource being such that the ability to efficiently extract the resource must take precedence over private development. In order to avoid encroachment of incompatible land uses, industrial land use has been planned surrounding the Woody Hill Quarry. The industrial land will act as a 'land use buffer' between the quarry and the sensitive land uses that are planned further to the east. The planned extent of the industrial land has been designed to take into account the ability to extract resources to the maximum extent possible under existing and future extractive approvals for the Woody Hill Quarry.

The Phillips Quarry lies outside the precinct but its presence and extraction potential is recognised by the plan. The plan limits the southerly extent of residential development (adjacent to conservation area reserve No.28) until such time as quarrying activity has moved further south.

Mr de Silva supported Objective O10 that states:

Deliver employment land for a variety of sectors through industrial and commercial precincts that allow the continued operation and expansion of the Woody Hill quarry and commencement and expansion of the Phillips quarry.

However, he considered without an updated Vision, O10 lacks clarity. He also considered O15 should be updated.

In its Part C submission, the VPA agreed to update the Vision to assist the interpretation of the PSP and further contextualise the PSP's approach to extractive resources. Its suggested wording was:

The Shenstone Park precinct has been designed taking into account the presence of strategic extractive resources within the Woody Hill and Phillips quarries. The PSP adopts a precautionary, protective approach to avoid encroachment of incompatible land uses that would limit the availability of stone resources. The precautionary, protective approach has been adopted in recognition of the quality and value of the resource being such that the ability to efficiently extract the resource must take precedence over incompatible conventional urban development.

In order to avoid encroachment of incompatible land uses, employment land use has been planned surrounding the Woody Hill Quarry including its easterly and northern potential extensions. The employment land will act as a 'land use buffer' between the quarry and the sensitive land uses that are planned further to the east and north.

The Phillips Quarry lies outside the precinct but its presence and extraction potential is recognised by the plan. The PSP seeks to ensure that the southerly extent of urban development (adjacent to conservation area reserve No.28) in the east of the plan and within 480 metres of the zone boundary, will not constrain the opportunity to maximise the extraction of the resources.

Various submitters commented on this wording:

- 1100 Donnybrook Rd sought to alter the last sentence to state that the quarry can be managed such that the required buffer for the Phillips Quarry does not extend beyond the conservation reserve.
- DJV proposed modified wording to remove reference to the easterly expansion of the Woody Hill Quarry and instead reference areas subject of an endorsed Work Authority or Work Authority application, and also to alter the setback from the Phillips Quarry to 455 metres.
- Donnybrook Road Unit Trust considered that the wording needed to reflect the position put by Barro in relation to setbacks from the Phillips Quarry.

### 9.3 Discussion

The Panel agrees with Mr de Silva that the PSP would benefit from further wording in the Vision statement about the importance of the quarries. Both the exhibited and Part A PSP made relatively scant reference to the quarries, and the Buffer Plan is the last plan in the PSP, contained at the back of the document. The Panel found this surprising given the importance of the quarries and the buffers in shaping the FUS, and the continuing influence they will have on development in the precinct over the life of the PSP.

The Panel agrees that additional wording in the Vision will improve the understanding of the importance of the quarries and the influence these have had on the FUS. The Panel generally accepts the VPA wording, that is based on Mr de Silva's suggestions, with the exception of reference to the eastern expansion of the Woody Hill Quarry (for reasons discussed in Chapter 4.5). The Panel has deleted reference to the setback distance from the Phillips Quarry given that this is a Vision statement only.

The Panel also considers that the objectives relating to Natural Resources should be separated from the sub-headings 'Employment and Town Centres' and 'Community Facilities, Open Space and Natural Resources', and that Objectives O10 and O15 be included in a new subsection Natural Resources (and renumbered accordingly). Objective 15 should be updated to read:

- To provide for the ongoing operation of the Woody Hill Quarry and the establishment and ongoing operation of the Phillips Quarry.

### 9.4 Conclusions and recommendations

The Panel concludes:

- The Vision statement should be updated to clarify the importance of the Woody Hill and Phillips quarries and the role they have in the precinct.

- The objectives should be amended to provide a separate set of objectives relating to Natural Resources and the wording slightly changed, to better reflect the significance of these natural resources.

The Panel recommends the following changes to the Part C PSP:

**Update Clause 2.1 Vision to read:**

**The Shenstone Park precinct has been designed taking into account the presence of strategic extractive resources within the Woody Hill and Phillips quarries. The PSP adopts a precautionary, protective approach to avoid encroachment of incompatible land uses that would limit the availability of stone resources. The precautionary, protective approach has been adopted in recognition of the quality and value of the resource being such that the ability to efficiently extract the resource must take precedence over incompatible conventional urban development.**

**In order to avoid encroachment of incompatible land uses, employment land use has been planned surrounding the Woody Hill Quarry including its potential northern extension. The employment land will act as a 'land use buffer' between the quarry and the sensitive land uses that are planned further north.**

**The Phillips Quarry lies outside the precinct, but its presence and extraction potential is recognised by the PSP. The PSP seeks to ensure that the southerly extent of urban development (adjacent to conservation area reserve No 28) will not constrain the opportunity to maximise the extraction of resources in the Phillips Quarry.**

**Update Clause 2.2 Objectives to include 'Natural Resources' as a separate sub-section which includes Objectives O10 and O15 (renumbered as required).**

**Update Objective O15 to read:**

**To provide for the ongoing operation of the Woody Hill Quarry and the establishment and ongoing operation of the Phillips Quarry.**

## 10 Image, character, heritage and housing

### 10.1 The issues

The issues are:

- post contact heritage matters:
  - should the Heritage Overlay be applied to 1030 Donnybrook Road?
  - are the dry stone wall protections appropriate?
- are the housing densities within the walkable catchments appropriate, and should the walkable catchment boundaries be extended?
- are the guidelines and requirements relating to affordable housing appropriate?

### 10.2 Post contact heritage

#### (i) Introduction and context

The Amendment proposes to apply a Heritage Overlay to 1030 Donnybrook Road, Donnybrook (HO137) which contains an old milking shed, along with remnants of associated farming infrastructure such as cattle ramps and dry stone walls.

**Figure 13** Photograph of the milking sheds at 1030 Donnybrook Road



Source: Bryce Raworth's witness statement (Document 109)

1030 Donnybrook Road is the only site identified as a post contact heritage place on Plan 5 (Image, Character, Housing and Heritage) in the PSP. As such, Requirement R9 in the PSP

requires it to be investigated for potential adaptive re-use for a residential or suitable commercial or community use.

The PSP identifies dry stone walls on Plan 5, along with their retention value (low, moderate, high, very high or unknown). The PSP includes a series of requirements around the protection and retention of dry stone walls, particularly those with a retention value of moderate or above. The Amendment proposes to amend the schedule to Clause 52.33 (Post Boxes and Dry stone Walls) to allow removal of dry stone walls of low retention value without a planning permit.

The VPA's Part A version of the PSP and UGZ7 added a requirement for a dry stone wall management plan requiring moderate or above retention value walls to be retained unless agreed to by the Responsible Authority after considering the overall design response and advice from a suitably qualified person about the condition of the wall.

## (ii) Evidence and submissions

### Heritage Overlay on 1030 Donnybrook Road

Council and DJV presented opposing submissions, and led contradictory evidence, regarding the heritage values of 1030 Donnybrook Road.

Relying on the evidence of Mr Helms (Document 101), Council submitted that when proper heritage principles are applied, there can be "*no doubt*" that the Heritage Overlay should be applied. It submitted that the primary consideration is whether the site is of sufficient cultural significance to warrant the application of the Heritage Overlay:

According to proper analysis, we submit that the site clearly meets the threshold of local significance as a rare example of a large commercial dairy that supplied milk to greater Melbourne. This is entirely demonstrative of one of the key thematic elements in a number of Council's historic studies ... As such the heritage fabric should be afforded the Heritage Overlay as is proposed by the Amendment. We further submit, although we agree it is a matter for later decisions, that the site should as a priority be protected and incorporated into the future urban fabric of Shenstone Park. Properly planned, it could become a key place making feature much in the same way that other dairy farm remnant fabric has in other parts of the municipality.

Mr Helms' evidence was that the site is of local heritage significance to the City of Whittlesea and satisfies HERCON Criteria A, B and E (well established criteria for assessing heritage significance):

- for its associations with dairying industry, which was an important theme in the historic development of Whittlesea, and as an illustration of the role of this area in supplying fresh milk to Melbourne from the nineteenth to the early twentieth century (Criterion A – Importance to the course, or pattern of our cultural or natural history)
- as a rare example of the large commercial dairies that were among the main suppliers of fresh milk to Melbourne (at its peak, Baker's Dairy Farm supplied 500 gallons of fresh milk per day to Melbourne via the nearby Donnybrook station, and was described in 1911 as 'probably the largest of its kind in Victoria') (Criterion B – Possession of uncommon, rare or endangered aspects of our cultural or natural history)
- as a distinctive farm building complex within a related setting (Criterion E – Importance in exhibiting particular aesthetic characteristics).

Mr Helms considered that the following buildings and features contribute to the significance of the place:

- the milking shed, including the twin-gabled corrugated iron clad buildings and the two gabled structures attached on the east side, with significant internal features including the bluestone paved floor, cement lined tank and brick cistern
- a stone cobbled yard to the north of the milking sheds
- dry stone walls to the north and south of the milking sheds, and along part of the west boundary and the Donnybrook Road frontage
- a stone cattle loading ramp, forming part of one of the dry stone walls.

Mr Helms recommended that HO187 be amended to apply internal controls to the milking shed. He also recommended amendments to the Statement of Significance.

Relying on the evidence of Mr Raworth (Document 109), DJV opposed the application of the HO187 to 1030 Donnybrook Road. It submitted that to qualify for protection, the remaining structures need to be *“a very good, or rare, example of a dairy farm in the local context”*, assessed against a threshold set by a comparative analysis of other similar places. It submitted:

It is difficult to make a case for inclusion here because so little remains of the dairy farm and what does remain is relatively nondescript. There are many better examples in the local area. Compared to those places, the remnant structures are, as put by Mr Raworth, *a pale shadow of a dairy farm of the period.*

Mr Raworth’s evidence was that the milking shed has limited potential to provide useful information that might be unique to this site, because most of the internal fixtures and fittings, such as the cow bails and other milking equipment, have been removed. Further, the original outbuildings, farmhouse and other accommodation has not survived, making it difficult to read the milking shed as part of a more intact farm complex. Mr Raworth considered that there were several more intact and superior dairying complexes in Whittlesea protected under the Heritage Overlay, and that this one rated poorly in a comparative analysis. He expressed some doubt as to whether the brick cistern was original, noting that it appeared to be constructed of the same bricks as a mid-century structure constructed near the milking shed. He concluded:

Having regard for all the above, it is my view that the former farm buildings and associated structures at 1030 Donnybrook Road, Donnybrook do not warrant a Heritage Overlay control ...

DJV submitted that Mr Helms’ comparative analysis was flawed, as several of the comparative examples were identified for their connection with German settlement, rather than just an association with dairying. Further, the threshold should be whether the structures, having regard to the recognised significance of the other places, is a very good example of the historic use – not whether they merely demonstrate the historic use of the site.

The VPA supported the position of the Council, submitting that the Heritage Overlay will ensure a subsequent more detailed analysis is conducted regarding the future re-use or removal of the heritage buildings, which is an appropriate use of the overlay in the circumstances.

## Dry stone walls

Donnybrook Road Unit Trust sought revisions to the exhibited and Part A Amendment that would allow dry stone walls of medium retention value to be removed without a permit. A medium retention value dry stone wall is located on its property within the PAO2 for the widening of Donnybrook Road. Donnybrook Road Unit Trust submitted that the wall will have to be removed due to road widening, and exempting its removal from a permit removes an unnecessary administrative burden. Its planning witness, Ms Horsfield, stated in her evidence:

In my view there is merit in amending the schedule to Clause 52.33 to avoid the need for a permit process that is simply a formalisation of the wall's removal. However, I consider that rather than referring to walls of moderate retention value (which may capture other walls in the PSP that are not required to be removed), the clause could be modified as follows:

“All land except land shown as dry stone wall with a ‘low’ retention value or land shown as dry stone wall that is contained in a Public Acquisition Overlay for road widening purposes in the incorporated Shenstone Park Precinct Structure Plan”

The VPA agreed with Ms Horsfield that there is a danger that, in permitting all walls of medium retention value to be removed, walls may be removed unnecessarily. However, it did not agree that dry stone walls within the PAO2 ought to be exempt. It submitted that a permit application would be only a small part of the design process for the Donnybrook Road upgrade, but would encourage the retention and preservation of walls where possible. It submitted:

... unnecessary removal should not be fostered whether by private or public bodies.

Council supported the VPA's position, including its Part A amendments.

### (iii) Discussion

#### Heritage Overlay on 1030 Donnybrook Road

On balance, the Panel prefers the evidence of Mr Raworth to that of Mr Helms. It notes that Mr Raworth had the opportunity to undertake a site inspection from within the site (including internally in the milking shed). Due to Covid-19 restrictions, Mr Helms was only able to do a site inspection from the adjacent road.

On the basis of the comparative analyses of the two experts, the Panel was not persuaded that the milking shed and associated infrastructure are sufficiently intact to meet the threshold for local significance. While some elements of the buildings remain, many (such as the cow bails) have been removed. Further, few original elements of the surrounding farming complex remain. This compromises the ability to read the milking shed as part of a dairying complex. In the Panel's view, the structures on 1030 Donnybrook Road did not compare sufficiently favourably with the other examples in the comparative analyses of Mr Helms and Mr Raworth (Documents 233 and 234) in terms of intactness or aesthetic characteristics to meet the threshold for local significance.

For completeness, in relation to other issues raised in submissions and evidence:

- The Panel accepts Mr Helms' evidence that the dairy on 1030 Donnybrook Road was one of the larger commercial dairies supplying milk to Melbourne – perhaps even a rare example of such a large commercial dairy in the local area. However the lack of intactness of the remaining structures makes it difficult to read it as such.

- The Panel accepts Council's submissions that the dilapidated condition of the property, and the asserted difficulty in finding a suitable adaptable re-use, are not relevant considerations for whether a Heritage Overlay should apply. These considerations are relevant to the permit application stage.
- The fact that the site may not have been identified in previous municipal wide heritage studies is of little relevance.

1030 Donnybrook Road is identified in the land budget plan and land budget table as uncredited open space. As no submissions were made to the Panel on this point, it is unclear whether it was identified as open space in order to facilitate the preservation of some or all of the heritage elements on the site, or because it is particularly suitable as open space. The VPA should consider this further, and confirm whether or not the site should be retained as open space, or released for development. If it is retained as open space, it should be credited.

### **Drystone walls**

On balance, the Panel agrees with the VPA that the permit exemptions for removing dry stone walls should not be extended to moderate retention value walls, even with the qualification proposed by Ms Horsfield. Dry stone walls can make an important contribution to the character of the new Shenstone Park community, and they should be retained where their condition allows. This applies equally to dry stone walls located within the PAO2. The Panel supports the VPA's proposed additions to the Part A PSP and UGZ7 with respect to dry stone walls.

### **(iv) Conclusions and recommendations**

The Panel concludes:

- The milking shed and associated farming infrastructure at 1030 Donnybrook Road does not meet the threshold for local significance. The Heritage Overlay should not be applied.
- In light of the above conclusion:
  - Requirement R9 of the PSP is no longer required
  - the VPA should give further consideration to whether 1030 Donnybrook Road should be retained as open space (in which case it should be credited), or released for development.
- The permit exemptions for the removal of dry stone walls should not be extended.
- The Panel supports the VPA's proposed Part A additions to the PSP and UGZ7 with respect to dry stone walls.

The Panel recommends:

**Do not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook.**

**As a consequence of consolidated Recommendation 2 (to not apply the Heritage Overlay to 1030 Donnybrook Road, Donnybrook), amend the Part C Precinct Structure Plan to:**

- remove Requirement R9**
- give further consideration to whether 1030 Donnybrook Road, Donnybrook should be retained as open space (in which case it should be credited), or released for development**
- make any necessary adjustments to the Part C Precinct Structure Plan, including Plan 3 (Future Urban Structure), Plan 4 (Land Use Budget), Plan 5**

(Image Character Housing and Heritage), Table 1 (Summary Land Use Budget) and Appendix 4.1 (Parcel Specific Land Budget).

### 10.3 Walkable catchments

#### (i) Introduction and context

The walkable catchment is shown by a red dashed line on the Future Urban Structure. It generally (although not precisely) reflects a 400 metre distance from the Local Town Centre (LTC). The walkable catchment boundary was amended in the Part A PSP to reflect the high pressure gas pipeline measurement length derived through the finalised Safety Management Study (refer to Figure 14).

Figure 14 Exhibited and revised walkable catchments



Source: Part A PSP (Document 25)

The PSP seeks to deliver densities of 25 dwellings per net developable hectare within the walkable catchments (through Requirement R16), and densities of 17 dwellings per net developable hectare outside the walkable catchment. The applied zone within the walkable catchment is the Residential Growth Zone, whereas the General Residential Zone is applied outside the walkable catchment.

#### (ii) Evidence and submissions

The VPA explained that the intended purpose of the walkable catchment provisions is to deliver an average population density of 20 dwellings per hectare across the PSP, and encourage greater residential densities within walkable distance to local services and public transport, consistent with Plan Melbourne.

Several submitters sought to increase the extent of the walkable catchment boundaries and/or amend the density requirements within the walkable catchment, including by:

- removing the walkable catchment or amend the requirements and guidelines to allow a flexible approach to walkable catchment boundaries at the permit stage
- allowing residential areas abutting water catchments, open space and fronting onto connector roads to have the same density as the walkable catchment area (minimum average density of 25 dwellings per hectare)

- showing a walkable catchment around the railway station.

Ms Horsfield's evidence (for Donnybrook Road Unit Trust – Document 99) was that the density targets in the new draft PSP guidelines (that were the subject of recent public consultation) ought to be preferred. She considered that an increase in the permitted densities would:

- further support the viability of the LTC and Local Convenience Centres (LCCs)
- support the affordable housing requirements which may require a greater proportion of small lot housing than might otherwise be the case
- maximise the benefits of areas with high levels of amenity, including adjacent to open space and within the walkable catchment of potential bus routes along Donnybrook Road and Koukoura Drive
- provide greater certainty to Council, developers and the community in the future implementation of the PSP.

The VPA submitted that there are two key constraints preventing the expansion of the walkable catchment boundaries – the Woody Hill Quarry Sensitive Use Buffer to the west and the pipeline measurement length to the east. The VPA submitted that it would be inappropriate to promote higher densities within the pipeline measurement length because of safety concerns associated with the high pressure gas pipeline. It is not appropriate to apply a walkable catchment near the train station as the land use in this area is employment based.

### **(iii) Discussion**

The Panel was not persuaded that there is any justification for amending the walkable catchment boundaries as shown in the Part A PSP. It agrees with the VPA that it would not be appropriate for higher residential densities to extend within the pipeline measurement length or the quarry buffer. The pipeline measurement length precludes extending the walkable catchment around the bus routes on Donnybrook and Koukoura Drive. A walkable catchment around the train station would not be appropriate, as this land is designated as employment land, not residential land.

The draft PSP guidelines contemplate minimum densities of 20 dwellings per hectare across PSPs, with increased minimum densities of 30 dwellings per hectare within an 800 metre walkable catchment of an activity centre or principal public transport network. Adopting the density targets in the draft PSP guidelines would mean:

- increasing minimum densities within the walkable catchment from 25 to 30 dwellings per hectare
- increasing minimum densities elsewhere in the PSP from 17 to 20 dwellings per hectare.

The Panel considers that it would be premature to adopt the higher densities prior to the new guidelines being finalised and adopted by the VPA. Further, as Council pointed out, the PSP and the infrastructure needs have been planned on the basis of a population derived from the current density targets. Adopting higher densities could require a reassessment of infrastructure needs. The Panel also notes that the densities specified in the PSP are minimum densities. Nothing would prevent a developer from seeking higher densities through permit applications.

**(iv) Conclusions**

The Panel concludes:

- There is no justification for adjusting the walkable catchment boundaries shown in the revised PSP.
- The densities proposed within and outside the walkable catchment, based on the current PSP Guidelines, are appropriate. It would be premature to adopt the higher densities in the new draft PSP guidelines.

**10.4 Affordable housing****(i) Introduction and context**

Guideline G14 of the exhibited PSP states:

Subdivision of land should provide up to 10% of the NDA for the provision of affordable housing as defined by the *Planning & Environment Act 1987* (as amended).

G15 states that land for affordable housing should be provided within walkable catchments, and should provide for a range of housing typologies to meet demonstrated local need.

In its Part B submission the VPA indicated that it proposed to replace G14 and G15 with a guideline drafted consistently with the recommendations of the Beveridge North West Panel (Mitchell C106mith), although alternative drafting was not provided.

The exhibited UGZ7 did not include affordable housing provisions. The VPA's Part A version included the following, based on the Beveridge North West Panel's recommendations:

- an application requirement for an Affordable Housing Assessment that includes:
  - the anticipated demographic characteristics and household composition of the suburb
  - the proportion of housing to be provided for very low, low and moderate income range households
  - a response to matters addressed in the Ministerial Notice under 3AA(2) of the Act (which sets out requirements for affordable housing)
- a decision guideline requiring consideration of:
  - whether the proposal will contribute towards the provision of affordable housing
  - the matters in the Ministerial Notice.

**(ii) Relevant policy guidelines**

Clause 16.02-1L of the Planning Scheme includes the following policy guideline:

- Achieving the inclusion of 5 per cent social housing and 10 per cent affordable housing (that is not social housing) in the structure planning of any established or greenfield housing development.

**(iii) Evidence and submissions**

The VPA submitted that the affordable housing provisions are appropriate as the Planning Policy Framework supports the provision of affordable housing, and the provisions are consistent with the affordable housing provisions in the Act. Based on the income ranges specified for very low, low and moderate income households, affordable housing will be provided through the anticipated development in the PSP.

In relation to the 10 percent target in the exhibited G14, the VPA submitted that the target is arbitrary and not linked to any previous study or background report. A revised G14 consistent with the recommendations of the Beveridge North West Panel:

... provides a clear nexus between the quantum of affordable housing to be delivered and the anticipated needs of the community (i.e. demand). In doing so the proposed guideline provides a logical rationale that will remain flexible and responsive over time (noting the long life of the PSP document).

As noted in Chapter 10.3, Ms Horsfield recommended increasing the densities within the residential areas of the PSP, in part to support the affordable housing target.

#### **(iv) Discussion**

This Panel echoes the comments of the Beveridge North West Panel:

There is clear and unambiguous policy support for the delivery of affordable housing in Victoria. The VPA and other parties must be commended for working together during the Hearing and proposing an untested and new approach to deliver on this policy intent in a growth area context.

The Panel strongly supports the delivery of affordable housing that will meet the needs of the future community of Beveridge North West but is not satisfied that these needs have been identified. Nor has a clear delivery mechanism for affordable housing been identified or agreed.

The Panel notes the VPA's submission that the exhibited G14 with a 10 percent target metric is not strategically justified in the absence of a proper needs assessment. However, unlike the Mitchell Planning Scheme (considered by the Beveridge North West Panel), the Whittlesea Planning Scheme contains explicit policy support for a 5 percent social housing contribution and a 10 percent affordable housing contribution in greenfield housing developments. While no submissions or evidence was put to the Panel on this point, the Panel presumes that the policy is supported by some form of background study or needs assessment.

Nevertheless, a revised guideline based on the Beveridge North West Panel's recommendations would encourage the provision of affordable housing within the walkable catchment, without specifying a particular target. This Panel supports a consistent approach here.

While no submissions or evidence were put to the Panel on this point, the Panel expects that much of the housing stock to be delivered in Shenstone Park will likely be affordable to moderate income households as defined in the Act and the Ministerial Notice. It is less clear whether housing is likely to be affordable for low and very low income households. The revised guideline, combined with the proposed application requirement and decision guideline in the Part A UGZ7, will at least enable Council to negotiate the delivery of a broad range of appropriate affordable housing in the precinct.

#### **(v) Conclusions and recommendation**

The Panel concludes:

- The Panel supports the approach outlined in the VPA's Part B submission of replacing the exhibited guidelines with a guideline that encourages the provision of affordable housing within the walkable catchment in accordance with the Act, without specifying a particular target.

- A revised guideline, combined with the application requirement and decision guideline specified in the Part A UGZ7, will enable Council to more effectively negotiate the provision of appropriate affordable housing contributions.

The Panel recommends amending the Part C Precinct Structure Plan as follows:

**Replace Guidelines G14 and G15 with a single consolidated guideline (renumbered as required) that reads:**

**An application for subdivision of land into residential lots or development of land for residential or mixed use purposes should provide affordable housing as defined by the *Planning and Environment Act 1987*. The affordable housing should be located within the walkable catchment and provide for a range of housing typologies to meet demonstrated local need.**

# 11 Town centres

## 11.1 Introduction and context

The exhibited FUS located the Local Town Centre, together with a government school, local community facilities and public open space, at the intersection of the northern east-west connector street and the extension of Patterson Drive, approximately 400 metres south of Donnybrook Road. The Part A FUS slightly re-positioned the LTC and associated facilities, moving the government school to the north side of the connector street adjacent to the proposed light industrial area. The facilities remained in the north-western part of the residential area of the PSP.

The exhibited FUS also shows two local convenience centres, LCC East and LCC West, to complement the more centrally located LTC. The LCC East is proposed on 0.4 hectares of land, which would comprise around 1,000sqm of retail floorspace and approximately 200 square metres of commercial floorspace.

The exhibited FUS located the LCC East adjacent to public open space on 1150 Donnybrook Road. The Part A FUS relocated it further south east, at the corner of a connector road and local street, close to Koukoura Drive. The primary reason for this relocation was to move it outside the 495 metre measurement length associated with the high pressure gas pipeline.

## 11.2 The issues

The issues are:

- is the location of the LTC and associated facilities appropriate?
- should the LCC East be relocated or removed from the FUS?

## 11.3 Evidence and submissions

### (i) Local Town Centre

DJV's preferred FUS (Document 54(a), updated in Document 227) sought to relocate the LTC, school, open space and community facilities to a more south-eastern location, at the intersection of two connector streets but closer to the southern end of the precinct, adjacent to CA28. Refer to Figure 15 below (the LTC is shown in purple).

Figure 15 DJV preferred location of the Local Town Centre (left) compared to VPA preferred location (right)



Source: DJV preferred FUS (Document 227) and VPA Part A PSP (Document 25)

DJV called Mr Sheppard to give urban design evidence (Document 113). He preferred the DJV FUS, and in particular the alternative location of the LTC, because he considered it:

- maximised the walkable catchment of each component of the LTC, lessening the need and tendency for residents to drive to local shops, school, community facilities and the park
- is more likely to be well serviced by public transport, with a bus route along the single east-west connector street
- best facilitates the creation of a unique sense of place by capitalising on the natural setting of CA28.

Mr Milner, who gave planning evidence for DJV (Document 112), also preferred the DJV location of the LTC and associated facilities because it:

- places a larger residential population around the community facilities
- removes the school from a position adjacent to industrial land use
- orders and connects the town centre and CA28 using public open space as a transition and extension to CA28
- places the town centre marginally deeper and in his view more centrally to the community it will serve
- consolidates the local and active open space areas in a consolidated parcel of land rather than separating them with a connector street
- provides a more direct and functional connection between the LTC and Donnybrook Road and Patterson Drive
- does not materially change the walkable catchment.

The VPA did not support the revised DJV layout. It opposed the movement of the LTC, school and community facilities on the basis of constraints of topography (including location of stony knolls) which could increase the costs and ability to efficiently deliver the facilities. It also raised issues with Aboriginal cultural heritage (due to the presence of stony knolls), a desire

to locate the school with at least two road frontages, bushfire issues associated with the interface with CA28 and possible impacts on Merri Creek.

Mr Sheppard responded by noting that based on Plan 2 in the PSP, both the VPA's preferred location and DJV's preferred location appeared to be clear of areas of Aboriginal cultural heritage sensitivity. He did not consider there to be a material difference in the topography of the two locations, other than some stony knolls in the location of the public open space. In oral evidence he considered that these could contribute to the attractiveness of the open space, or alternatively suggested that the park could be relocated to the west of the school.

Council maintained that the northern location of the LTC was 'far preferable' to the southern location and did not consider that DJV had made a compelling reason to shift the centre. Council submitted that having the LTC closer to the exposure and traffic along Donnybrook Road would create a more optimal town centre, than a 'back' or southern location adjacent to the conservation reserve. Council considered that being located closer to Donnybrook Road would likely ensure the LTC was delivered earlier in the stages of development.

#### **(ii) Local Convenience Centre East**

Mr Lee gave economic evidence for Donnybrook Road Unit Trust (Document 89) relating to the LCC East. His economic assessment concluded that it would be difficult to secure a full-line supermarket at the LTC, and the establishment of a LCC has potential to adversely affect the ability to create a successful LTC by drawing away retail business that should be encouraged to be directed to the LTC.

Mr Lee also concluded that there was little likelihood that a viable centre of 1,000 square metres of retail floorspace could be established at the location of the LCC East given:

- the site has limited passing traffic
- the site lacks co-location with other uses such as medical centre, childcare or other community facilities to generate sufficient visitation
- the catchment is insufficient, particularly given its location close to the Urban Growth Boundary (which runs along Koukoura Drive), resulting in effectively a one-sided catchment.

On this basis he recommended removal of the LCC East.

Ms Horsfield gave planning evidence for Donnybrook Road Unit Trust (Document 99). She had concerns about the LCC East on planning grounds, namely that the Part A relocation had removed the centre from co-location with open space that might help establish an attractive setting for the centre, and given its had been pushed so far east it reduced its accessibility and convenience. She also noted it did not have visibility from main roads.

Ms Horsfield considered other locations (subject to the constraint that it could not be located west of the gas pipeline measurement length). She considered the corner of Donnybrook and Koukoura Drive, and the intersection of the east-west connector street and Koukoura Drive. She preferred the latter option, however did not consider that the removal of the LCC would be a poor planning outcome. If the LCC East was to remain, she considered there should be the option for the LCC to revert to residential in the event that its establishment proved unviable.

The VPA submitted that having considered the evidence, it proposed to remove the LCC East from the PSP due to the forecast low retail demand and difficulty in attracting tenants.

Council opposed the removal of the LCC East, considering that it would forever remove the potential for a small convenience centre to be established in this vicinity. Council submitted that a preferable outcome would be to show the LCC East with some flexibility about its location, and if it was not delivered within a reasonable period of time, then allow for other forms of development. It submitted that this was more consistent with Clause 17.02-1S that includes strategies to provide for new convenience shopping facilities to provide for the needs of the local population and provide for small scale shopping opportunities that meet the needs of local residents and workers in convenient locations.

## **11.4 Discussion**

### **(i) Local Town Centre**

The key advantage of the DJV preferred location of the LTC was an increased walkable catchment. However this relied on the DJV FUS re-designating employment land outside the quarry buffers as residential. DJV conceded that if this were to occur on the Part A FUS, the advantage in the DJV plan as to the walkable catchment largely evens out. The Panel recommends an increased residential area based on a reduced eastern expansion to the quarry and reduced corresponding buffer (refer to consolidated Recommendation 14(f)). If this recommendation is accepted, there is little difference between the plans in relation to walkable catchment.

The Panel notes that both Council and the VPA resisted relocating the LTC. The VPA's resistance was in part based on the views of the Victorian School Building Authority, which expressed concern that the steeper topography in the DJV preferred location would make building the school more difficult and costly. Other reasons that the VPA and Council did not support the DJV proposed location (including topography and potential bushfire risk being adjacent to the conservation area) were not fully resolved.

The Panel was not persuaded that the Part A FUS represented an unacceptable outcome, or that the other reasons put forward by DJV for its relocation were sufficient to justify the relocation. On this basis, the Panel accepts that the LTC is appropriately sited in the Part A FUS.

### **(ii) Local Convenience Centre East**

The Panel accepts the evidence of Mr Lee that the LCC East is unlikely to be viable, and also has the potential to adversely impact on the success of the LTC. The location is heavily constrained by being so close to the Urban Growth Boundary, significantly reducing the catchment. The attributes of being co-located with open space have been removed in the Part A FUS.

The alternative locations suggested by Ms Horsfield would be unlikely to improve the viability of the LCC East. The experts considered that these locations may encourage a service station or fast food outlet, rather than local convenience facilities accessed on foot by surrounding residents as encouraged by the PSP.

While acknowledging Council's desire to see local convenience retail in the eastern part of the precinct, the Panel notes that the underlying GRZ would not exclude the opportunity for a local shop or café from establishing. 'Convenience shop' and 'Food and drink premises' are both section 2 uses within the zone. The Panel considers that the establishment of such a

facility in a residential area would still be generally in accordance with the PSP. While Council considers that this is unlikely to eventuate without express nomination for such a facility in the FUS, the Panel considers that this confirms the unlikely viability of such a centre in this location.

## **11.5 Conclusions and recommendation**

The Panel concludes:

- The LTC is appropriately sited in the Part A FUS.
- It supports the removal of the LCC East.

The deletion of the LCC East from the FUS will require a number of other changes to the Part C PSP, including removing it from Tables 4 and 5, and changes to the UGZ7.

**The Panel recommends:**

- **amending the Part C Precinct Structure Plan as follows:**
  - Remove the Local Convenience Centre East from Tables 4 and 5 and make any other necessary adjustments.**
- **amending the Part C Urban Growth Zone Schedule 7 as follows:**
  - Amend Table 1 (Applied zones) in the second entry to delete 'and local convenience centre (east)'.**

## 12 Education and community facilities and open space

### 12.1 The issues

The issues are:

- is the school appropriately sited and is a non-government primary school is required within the precinct?
- should the community facilities be reduced in size?
- should various areas of open space be amended or removed?

### 12.2 Evidence and submissions

#### (i) Education facilities

There were two submissions in relation to education facilities.

The Victorian School Building Authority submitted that the exhibited location of the government primary school was not appropriate due to topography, cultural heritage and site orientation. In response, the VPA adjusted the location slightly in the Part A FUS as noted in the previous Chapter. This change also triggered a relocation of the LTC and open space that have been designed to be co-located. The revised location is also outside quarry buffers and the gas pipeline measurement length, and was agreed to by the Victorian School Building Authority and Council.

Catholic Education Melbourne initially requested a non-government primary school within the precinct, however withdrew this submission on the basis that it was not required.

#### (ii) Community facilities

DJV and Satterley Group submitted that the community centre should be reduced in size from 1.23 hectares to 0.8 hectares, to recognise the reduction in net residential area compared to the consultation draft PSP issued in 2017. The VPA did not support any reduction in size.

The Victorian School Building Authority raised concerns with the site orientation and connection from the school to the community centre in the exhibited PSP, however these issues were resolved with the alternative Part A FUS.

#### (iii) Open space

Various submitters raised issues with the siting and design of local parks:

- Barro group requested the removal of LP-01 (which is in the location of the Woody Hill Quarry haul road) from Property 9
- Council requested the relocation of LP-08
- 1100 Donnybrook Rd submitted that the location and size of LP-05 and LP-07 on property 15 be amended, but did not pursue this submission at the Hearing
- Satterley Group requested a local park be created on top of the stony knoll at the exhibited location of the government primary school). VPA agreed to this with the relocation of the school.

- Donnybrook Road Unit Trust sought changes to the location and size of LP-04, which the VPA supported.

Barro submitted that the inclusion of LP-01 did not adequately consider the impact on existing and future operations of the Woody Hill Quarry. Mr Harvey gave ecological for Barro (Document 103). He noted that given the land identified for LP-01 was used by heavy vehicles, it appeared inappropriate to nominate this area for open space. He acknowledged that LP-01 was sited to protect some existing significant scattered native trees (River Red Gums), but noted that the trees have successfully existed alongside the quarry operations for many years.

The VPA submitted that LP-01 should remain and that inclusion of the local park in the PSP does not constrain the existing operational use of the quarry site. It would only be required to be provided at the time that Barro (or a future operator) wish to redevelop the land for an urban use.

The VPA submitted that the linear open space LP-08 provides a landscape buffer between the light industry and residential area, and also provides open space connectivity between the north and south of the precinct. The VPA noted that the relocation of the school on the alignment of the open space further stretched the connectively opportunities for this 'green link'.

Council sought the removal of LP-08 on the basis that it did not constitute a useable area of public open space, and at the dimensions proposed, could not be considered creditable. Council supported the intention to create a landscape buffer between employment land and residential land, but considered it should be incorporated into a widened road reserve. Alternatively Council submitted that:

- the width should be expanded to a minimum of 10 metres, being consistent with Council's minimum width for linear reserves (Small Local Links) in its Open Space Strategy
- LP-08 should include a 3 metre wide shared path instead of a 1.6 metre wide footpath as proposed.

### **12.3 Discussion**

While the Part A FUS resolved the Victorian School Building Authority's issues with the exhibited PSP, as outlined in Chapter 11, the Authority had concerns that the DJV plan sited the school on steeper topography and construction of the school would require greater earthworks and costs. As noted in Chapter 11, the Panel is satisfied that the Part A siting is appropriate and considers that potential issues with the relocation as proposed by DJV were not resolved.

The issue of the size of community facilities was not raised during the Hearing and the Panel is satisfied that the Part A FUS is appropriate.

The Panel agrees with the VPA that the nomination of LP-01 on the Barro land will be a long term proposition and will not interfere with the quarry operations. The objective of protecting the significant scattered trees can occur both while the quarry is in operation and then in the longer term within a dedicated area of local open space.

The Panel accepts that LP-08 will function primarily as a green link and was not persuaded that the cross section for Local Access Street Level 2, with the interface between industrial and residential land, is unacceptable.

## **12.4 Conclusion**

The Panel concludes:

- The Part A FUS in relation to the location and configuration of schools, community facilities and open space is acceptable.

## 13 Biodiversity

### 13.1 Introduction and context

Plan 8 of the PSP shows native vegetation and scattered trees to be retained and those permitted to be removed. Requirements R45 to R50 and Guidelines G38 to G40 guide the management of trees and vegetation within the PSP area, and manage development adjacent to Conservation Areas.

### 13.2 The issues

The issues are:

- are certain trees on 1150 Donnybrook Road identified on Plan 8 with the correct retention value?
- are the Land Management Cooperative Agreement provisions in the UGZ7 appropriately drafted?
- should there be a secondary consent mechanism to allow a variation to the minimum 20 metre public land buffer to Conservation Areas?

### 13.3 Evidence and submissions

Donnybrook Road Unit Trust called Mr Galbraith to give evidence in relation to his assessment of the health of various trees on 1150 Donnybrook Road (Document 100). Mr Galbraith's evidence was that:

- Tree 162 in the exhibited PSP is an over mature extensively decayed and hollowed out structurally poor Swamp Gum
- Tree 23 in the exhibited PSP is an over mature Yellow Box hybrid in very poor health with extensive die-back and prominent branch shed history
- both have low worth for retention in any redevelopment of the site due to the high risks they pose of major branch shed or total collapse.

Both trees are identified on Plan 8 as scattered trees, not as trees able to be removed.

Mr Galbraith provided extensive photographic evidence in support of his assessment. The VPA did not challenge Mr Galbraith's assessment.

Donnybrook Road Unit Trust also raised issues regarding the wording of the requirement in the UGZ7 to enter into a Land Management Co-operative Agreement providing for the conservation and management of the Conservation Areas. It submitted that once an agreement has been entered into, there is no incentive for DELWP to acquire the land, as it is effectively being managed by the landowner for conservation purposes at no cost to DELWP. Donnybrook Road Unit Trust submitted that the provision should be reworded to add an additional dot point at the end of the provision:

The requirement for a Land Management Co-operative Agreement in this clause does not apply to land of any lot or part of a lot within the conservation area shown on Plan 3 of the incorporated Shenstone Park Precinct Structure Plan as a conservation area, that:

- is to be voluntarily purchased by the Crown, transferred for a reduction in certain habitat compensation obligations or compulsorily acquired by the Crown.

The VPA responded that the exhibited provision is a standard provision required by DELWP's Melbourne Strategic Assessment Unit. DELWP provided revised wording which was included in the Part C version, which effectively outlined four options:

- vest the Conservation Area with Council as a reserve
- vest the Conservation Area with Melbourne Water as a drainage reserve
- enter into an agreement to transfer or gift the land to DELWP, the Minister for Environment and Climate Change or another statutory authority
- enter into a Land Management Cooperative Agreement.

Barro considered variation to Requirement R45 may be required to enable the construction of the bund along the eastern boundary of Woody Hill Quarry and the northern boundary of Phillips Quarry. R45 states:

Development must provide for a minimum 20 metre public land buffer between Conservation Area 28 boundaries and the nearest residential, commercial, or industrial lot.

The VPA supported providing a secondary consent mechanism after consulting with DELWP's Melbourne Strategic Assessment Unit.

### **13.4 Discussion**

Mr Galbraith's assessment of the health of Trees 23 and 162 was unchallenged. The Panel supports changing the classification of these trees on Plan 8 to 'tree able to be removed'.

The Panel generally supports DELWP's revised wording of the Land Management Cooperative Agreement provision, with some minor drafting changes to improve the clarity of the provision.

As noted in Chapter 4.5, DELWP's approval has now been secured to formally amend the boundaries of CA28 to accommodate the access between the quarries (Document 54(e)). The VPA explained that it had reached an agreement with Yarra Valley Water to provide additional land to the south of Langley Park Drive to ensure no net loss in the total area of CA28. The VPA proposed in its Part C submission to reflect the new agreed boundaries in the final PSP, but had not yet included the change in the Part C version. The Panel supports this change.

The VPA made several other minor changes in the Part A version of the PSP and the UGZ7 to address various matters of detail raised by DELWP's Melbourne Strategic Assessment Unit, including updating the tree mapping on Plan 8. The Panel has no reason to question the appropriateness of these changes.

### **13.5 Conclusions and recommendations**

The Panel concludes:

- Trees 23 and 162 should be reclassified on Plan 8 as 'tree able to be removed'.
- DELWP's revised wording of the Land Management Cooperative Agreement provision in the UGZ7 is broadly supported, subject to some minor drafting changes to improve clarity. This requires changes to both the UGZ7 and the Schedule to the IPO9.
- The plans in the Part C PSP should be updated to reflect the new boundaries of CA28 approved by DELWP.
- The other minor changes to the PSP and UGZ7 made in response to the DELWP submission are supported.

- Requirement R45 in the Part C version of the PSP should be subject to secondary consent of DELWP.

**The Panel recommends:**

- amending the Part C Precinct Structure Plan as follows:

**Amend Plan 8 (Native vegetation Retention and Removal) to:**

- a) show Trees 23 and 162 as 'tree able to be removed' on Plan 8
- b) amend the boundaries of Conservation Area 28 as approved by the Department of Environment, Land, Water and Planning (make the same change on other plans as required).

**Amend Requirement R45 (relating to public land buffers around Conservation Areas) to add "unless otherwise agreed to by the Department of Environment, Land, Water and Planning" to the end of the first sentence.**

- amending the Part C Urban Growth Zone Schedule 7 as follows:

**In Clause 4.0, replace the Land Management Cooperative Agreement provision with the following:**

**A permit to subdivide land containing a 'conservation area' as shown in the Shenstone Park Precinct Structure Plan must include the following condition:**

**Before a statement of compliance is issued for the last stage of the subdivision containing unencumbered land, the owner of the land must do one of the following to the satisfaction of the Secretary to the Department of Environment, Land, Water and Planning (DELWP) unless a notice of acquisition has been served under the *Land Acquisition and Compensation Act 1986* for the compulsory acquisition of the conservation area:**

- Vest the conservation area with Council as a reserve; or
- Vest the conservation area with Melbourne Water as a reserve for drainage purposes; or
- Enter into an agreement with the Secretary to DELWP to transfer or gift that land to:
  - the Secretary to DELWP;
  - the Minister for Environment and Climate Change; or
  - another statutory authority; or
- Enter into a Land Management Co-operative Agreement with the Secretary to DELWP under section 69 of the *Conservation Forests and Lands Act 1987*, that provides for:
  - the conservation and management of the conservation area to the satisfaction of DELWP
  - the owner to pay the reasonable costs of the Secretary to DELWP for the preparation, execution and registration of the agreement; and
  - an application to be made to the Registrar of Titles to register the agreement on the title to the land.

- **amending the Part C Incorporated Plan Overlay Schedule 9 as follows:**

**In Clause 3.0, replace the Land Management Cooperative Agreement provision with the provision in consolidated Recommendation 23.**

## 14 Transport and movement

### 14.1 Introduction and context

The transport planning for the PSP was underpinned by a Strategic Transport Modelling Assessment Report prepared by GTA in November 2019 and updated on 15 October 2020. The GTA modelling report relied on, among other things, the Victorian Integrated Transport Model North Growth Corridor Model Version 2012 and subsequent updates. The modelling was used to test the suitability of the proposed road network.

The proposed street network for the PSP is shown on Plan 10. The Part A version contemplates:

- two arterial roads – Donnybrook Road (which will ultimately be a 6 lane duplicated primary arterial) and Koukoura Drive (which will ultimately be a 4 lane duplicated secondary arterial)
- two east-west connector streets through the residential part of the precinct
- one east-west connector street through the employment part of the precinct, north of Woody Hill Quarry
- a series of north-south connector streets, including the upgrade of Langley Park Drive to a connector street
- seven intersections along Donnybrook Road – four four-way signalised intersections which connect into Donnybrook Woodstock (IN-01, IN-02, IN-03 and IN-05), one signalised T-intersection and two left in left out T-intersections
- three intersections along Koukoura Drive – two left in left out T-intersections connecting to local access streets and one signalised T-intersection connecting to the southern east-west connector street
- a 3 hectare future station carpark in the north west corner of the precinct.

Donnybrook Road, Koukoura Drive and connector streets will have dedicated off road cycle paths and separate footpaths on one or both sides of the road. Off road paths are proposed along the creek tributaries and the high pressure gas easement. These will provide walking and cycling connections to bus services along Donnybrook Road, the station carpark and the pedestrian crossing on Donnybrook Road located near the station.

The LTC and active open space is proposed to be located at the intersection of two connector streets. The north-south connector street will constitute an extension of Patterson Drive which will connect Donnybrook Woodstock to Shenstone Park via Intersection IN-03.

Intersections IN-01, IN-02, IN-03 and IN-05 are part funded under the Donnybrook-Woodstock ICP and will be part funded under the Shenstone Park ICP. Intersections IN-04 and IN-06 (T-intersections on Donnybrook Road and Koukoura Drive) will be fully funded under the Shenstone Park ICP. The left in left out intersections providing local access to Donnybrook Road and Koukoura Drive are noted on Plan 10 as part of the street network, but will be funded and delivered as developer works.

### 14.2 The issues

The issues are:

- is the road network generally suitable?

- is the DJV alternative road network more suitable?
- Barro issues – should the PSP show:
  - the quarry and trade supplies access?
  - an east west connector through the Barro land?
  - the north south local access street along the eastern boundary of the Barro land?
- are sufficient connections to the south proposed, and should Langley Park Drive be extended to the southern boundary of the precinct?
- is the alternative alignment of roads on 910 Donnybrook Road proposed by that submitter more suitable?

### 14.3 General suitability of the road network

#### (i) Evidence and submissions

The VPA called Mr Humphreys of GTA to provide traffic evidence (Document 81). He considered that the network is consistent with the objectives of the *Transport Integration Act 2010*, providing at least one bus capable route through the precinct, and a range of transport options for its users. The network includes walking and cycling routes connecting key activity centres, schools, recreation and local town centres, and connections to Donnybrook Station and the proposed station car park in the precinct as well as the station carpark on the north side of Donnybrook Road. He considered that the network was also consistent with the DoT Strategic Plan, the North Growth Corridor Plan and the requirements of Clause 56.06 for an arterial road network generally based on a one mile grid, with adequate reservation width to accommodate long term demand.

Mr Humphreys concluded that the modelling demonstrated that all parts of the road network would comfortably accommodate the anticipated traffic volumes, but suggested that the southern east west connector be classified as a ‘trunk connector’.

The Part A version of the PSP included more employment land capable of accommodating roughly 570 additional jobs. Mr Humphreys’ evidence was that the higher employment yields will increase the level of demand and traffic movement to the PSP, but the road network will have sufficient capacity to accommodate the increase.

#### (ii) Discussion

The Panel is satisfied that the proposed transport and movement network is generally suitable. It is capable of accommodating anticipated traffic volumes by a comfortable margin, and meets strategic objectives and policies for an efficient and sustainable transport and movement network. It includes a comprehensive network of safe and sustainable off road walking and cycle paths within and through the precinct, providing permeability, connectivity and encouragement of alternative transport modes.

According to the Engineering Design and Construction Manual for Subdivision in Growth Areas (VPA, December 2019), the target volume for a connector street is 3,000 to 7,000 vehicles per day, and for a trunk connector is 7,000 to 12,000 vehicles per day. The modelling predicts daily traffic volumes of 8,290 vehicles per day on the southern east west connector. The Panel therefore agrees with Mr Humphreys that it should be upgraded to a trunk connector.

**(iii) Conclusions and recommendation**

The Panel concludes:

- The proposed transport and movement network is generally suitable, capable of accommodating anticipated traffic volumes, and meets strategic objectives and policies for an efficient and sustainable transport and movement network.
- The southern east west connector, for which daily volumes of 8,290 vehicles are predicted, should be upgraded to a trunk connector.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 10 (Street network) to:**

- a) show the southern east west connector as a trunk connector (and include a suitable cross section if required).**

**14.4 DJV alternative road network**

DJV's preferred FUS (Document 54(a), updated in Document 227) shows an alternative road network that, among other things:

- removes one of the east west connectors through the residential part of the precinct and realigns the remaining east west connector more centrally between Donnybrook Road and CA28
- straightens the north-south connector that is the extension of Patterson Drive.

**(i) Evidence and submissions**

DJV called Mr Walsh of Traffix Group to provide evidence in relation to the DJV alternative road network (Document 87). His evidence was that because of the limited connectivity through the precinct, most traffic to and from the precinct will be via Donnybrook Road. This could be the situation for some time, as the southern portion of Koukoura Drive is not flanked by developable land and is unlikely to be delivered as works in kind by a developer. He considered that in this context, it is particularly important that the north-south connector network provides convenient access to and from Donnybrook Road.

Mr Walsh considered that the main north south connection through the residential part of the precinct (the extension of Patterson Drive from IN-03) does not provide convenient access to Donnybrook Road, as it has too many turns and intersections. He preferred the DJV alignment, which provides a straighter and more direct route.

Mr Walsh considered that the exhibited and Part A network 'over prescribed' the east west connector streets. He noted that the PSP Guidelines encourage connector streets at 800 metre spacings. The distance from Donnybrook Road to CA28 is between 1,200 metres and 1,400 metres, which requires only one east west connector to achieve the 800 metre spacing.

Other points made by Mr Walsh were:

- from a traffic perspective, the LTC would be best placed at the intersection of the Patterson Drive extension and the DJV proposed east west connector, as this is located on a bus route and provides the most convenient accessibility from the north (Donnybrook Road) and east (Koukoura Drive)
- the PSP should indicate appropriate treatments for internal cross intersections, most logically roundabouts

- more detail should be provided to allow a proper assessment of the proposed changes to the PAO along Donnybrook Road
- more detailed plans of the ultimate layout of the Donnybrook Road intersections should be provided to allow a proper assessment of the proposed land take in the PSP.

The VPA opposed the removal of one of the east west connectors, primarily on the basis that it reduced flexibility for future bus routes through the PSP. It considered that if development proceeds north to south as anticipated, the delivery of a single east west connector located further south as proposed by DJV could be delayed. Under cross examination, Mr Walsh maintained that a single east west connector was appropriate, as:

- the modelled volumes on the northern east west connector are low, and there is not sufficient demand to justify two separate east west connectors
- it meets the desired 800 metre spacing and is bus capable
- it is located within 400 metres of Donnybrook Road (which will also accommodate buses), and residents will therefore have convenient access to public transport
- it provides a logical connection to both Donnybrook Road and Koukoura Drive that would be a suitable bus route
- sufficient walking and cycling routes would still be provided via the single east west connector, Donnybrook Road, the dedicated off road paths within the PSP area and local access streets.

Mr Humphreys was not asked by the VPA to specifically consider the DJV alternative road network. In response to questions put to him by DJV in cross examination and questions from the Panel, he indicated that:

- while more direct road alignments are generally preferable, the kinks and turns in the Patterson Drive extension could be straightened out in the detailed design phase
- the predicted traffic volumes did not require two east west connectors, but that two could nevertheless be accommodated
- the DJV road network would still provide a bus capable route through the PSP, within 400 metres of most of the residential area
- the DJV road network would be preferable if the school and town centre were located in the DJV preferred locations.

## **(ii) Discussion**

In the Panel's view, both the VPA's alignment and the DJV alignment would deliver acceptable outcomes that are consistent with the PSP Guidelines and relevant policy objectives. That said, the DJV road alignment is linked to its proposed FUS, including the proposed relocation of the LTC, school and community facilities. The Panel does not support the relocation of the LTC and associated facilities, for the reasons set out in Chapters 11 and 12.

On balance, the Panel considers that it would be preferable to retain the two east west connectors through the residential part of the precinct. This provides greater permeability and more convenient access for future residents to the employment areas and station facilities to the west (particularly those who are walking or cycling). It allows more flexibility for the future selection by DoT of a bus route through the precinct. Further, an east west connector is more likely to be delivered early if it is located closer to the northern edge of the precinct where development will logically start.

The straighter alignment of the Patterson Drive extension proposed by DJV may have some advantages. Mr Humphreys conceded as much in cross examination. However the Panel considers that the minor adjustments required to straighten the alignment shown on Plan 10 in the PSP would be 'generally in accordance with' the PSP. The final alignment can be resolved at the detailed design stage in future subdivision applications.

The Panel notes that more recent PSPs, including Donnybrook-Woodstock, often but not always specify the treatment of internal cross intersections. The Panel sees no harm in doing so, but does not consider that this is necessary in this case, particularly as these intersections will be delivered (and funded) as developer works rather than as part of the Precinct Infrastructure Plan in the PSP.

No detailed PAO plans were put before the Panel which demonstrated one way or the other whether the proposed changes to the PAO along Donnybrook Road are appropriate. The VPA provided ultimate layout plans of the Donnybrook Road intersections (Document 143), but no evidence was put before the Panel as to whether the land budget table in the PSP accurately records the land take required for the intersections. The Panel makes no findings in relation to these issues.

### **(iii) Conclusions**

The Panel concludes:

- The Panel was not persuaded that the DJV alternative network represented a clearly better planning outcome. In particular:
  - Two east west connector streets through the residential part of the precinct are not strictly necessary to accommodate traffic volumes or provide the desired spacing. However the Panel supports the retention of both east west connector streets, as it provides greater permeability, connectivity and flexibility.
  - While the DJV preferred alignment of the Patterson Drive extension may have some advantages, the alignment shown in the VPA's network plan could be adjusted and straightened and remain 'generally in accordance with' the PSP.
- While there is no harm in showing internal cross intersection treatments in the PSP, this is not necessary.
- The Panel makes no findings in relation to the appropriateness of the proposed changes to the PAO, or the accuracy of the land take for the ultimate Donnybrook Road intersections.

## **14.5 Barro issues**

Access to Woody Hill Quarry is currently provided via an unmade haul road that connects into Donnybrook Road between proposed intersections IN-01 and IN-02. The intersection is fully directional, allowing quarry traffic to turn left or right onto Donnybrook Road.

The trade supplies permit requires a new fully directional access to be constructed slightly to the east of the current access. The new access will service traffic to and from the quarry, trade supplies and concrete batching plant. The new access will divert to the existing haul road near the location of the existing weighbridge and will be sealed from Donnybrook Road to the point where it connects into the existing haul road.

Plan 10 in the PSP (both the exhibited and Part A versions) shows a new east west connector street through the northern section of the employment part of the precinct, linking the land to the west and the east. This street would cross the quarry's haul road. A new north south local access street is also shown along the eastern boundary of the Barro land, which would connect the east west connector to Donnybrook Road via a left in left out intersection.

**(i) Evidence and submissions**

Barro called Mr Walsh to give traffic evidence (Document 73). His evidence was that it was desirable to maintain a separation between quarry related traffic and future PSP traffic, noting that this was consistent with DoT submission to the VPA which stated:

The PSP does not outline any interim arrangements for the access to Woody Hill Quarry during the development of the PSP area. DoT's preference is for Woody Hill Quarry related vehicles to utilise a single dedicated intersection only so that it is not distributed around other intersections. It is essential that the design and operation of this intersection consider the safety and movement of other transport modes at this intersection.

Mr Walsh recommended that the PSP plans be amended to:

- show the proposed quarry and trade supplies access (as fully directional) and internal haul road
- remove the section of the east west connector street through the Barro land and reposition local park LP-01, as they are traversed by the existing haul road
- remove the north south local access street along the eastern boundary of the Barro land
- note the agreed access road between the Woody Hill and Phillips quarries through the south west corner of the DJV land. The VPA agreed to this in its Part C submission.

Mr Walsh's evidence was that there is sufficient separation between the proposed quarry and trade supplies access and the intersections on either side (IN-01 and IN-02) for the quarry access to operate safely. He did not consider it necessary to relocate IN-01 or IN-02, and was comfortable that there was sufficient separation to IN-01 and IN-02 (both of which are to be signalised) to allow the future signalisation of the quarry access when Donnybrook Road is duplicated. He considered that future signalisation will be necessary to allow quarry related traffic to turn right into Donnybrook Road as well as left. If all quarry related traffic is forced to turn left, trucks would be required to take a circuitous route to travel east.

Mr Walsh's evidence was that removing the section of the east west connector shown on the Barro land:

- will not materially impact the accessibility of land to the east or west as they are accessible by IN-01 and IN-02 along Donnybrook Road
- will not preclude bus accessibility – land to the west of the quarry could be serviced by a loop along Langley Park Drive via IN-01, and buses servicing land to the east would divert along Donnybrook Road
- will not preclude pedestrian and bicycle accessibility, which would be provided via Donnybrook Road or the path along the Merri Creek Tributary (although he noted that the tributary path is unlikely to be delivered until the abutting land within the Woody Hill Blast Buffer is developed).

Mr Walsh considered that the north south local access street provides limited benefit as the business land along Donnybrook Road (including the northern part of the Barro land) will be accessed via a service road.

In response, the VPA submitted:

- the east-west connector and north-south access street represent an appropriate and logical full development scenario road network and should be shown on the PSP (noting that Barro is not required to construct these roads unless and until the land is redeveloped)
- Mr Humphreys supports the inclusion of the east west road for broader road network resilience and planning reasons
- while Donnybrook Road will provide a functional connection to the east, it affords a low level of amenity for pedestrians and cyclists, and the east west connector within the PSP will be a better route for access to the train station, and employment areas within the PSP
- while a signalised, multi-directional intersection at the proposed quarry and trade supplies access may be possible, it is not supported by DoT due to the limited spacing between it and intersections IN-01 and IN-02, and is not a desirable outcome for the road network.

## **(ii) Discussion**

The Panel agrees with Mr Walsh and DoT that it is highly desirable to maintain as much separation between quarry related traffic and PSP traffic as possible.

Showing the section of east west connector and the north south local access street on the Barro land would not create conflict between quarry traffic and PSP traffic, as these roads would not get delivered unless and until the Barro land redevelops. This is unlikely while the quarries remain operational.

That said, the Panel does not consider it appropriate to include these proposed roads on the PSP as currently shown. Barro has indicated that the life of the Woody Hill Quarry is 50 plus years – more than the life of the PSP. The PSP's road network should be planned on the basis that access across the Barro land will likely not be available during the life of the PSP.

The section of the east west connector across the Barro land should be shown as a future connection once quarrying ceases. In the meantime, the Panel is satisfied that a satisfactory (if not ideal) level of connectivity between the eastern and western parts of the precinct will be maintained via Donnybrook Road.

The Panel sees no particular value in the north south access street along the eastern boundary of the Barro land, and considers that it should be deleted entirely. Local access streets, if required, can be provided at subdivision stage, by which time the local access needs of the northern portion of the Barro land (and the adjoining land at 910 Donnybrook Road) will be clearer.

On balance, the Panel agrees with Mr Walsh that the PSP should show the proposed quarry and trade supplies access on Donnybrook Road. While the PSP represents future development patterns rather than current uses, the quarries are likely to continue operating and using this access for the life of the PSP and beyond. Future planning, including of Donnybrook Road

upgrades, would be assisted by a clear indication of the quarry access arrangements in the PSP.

The quarry and trade supplies access should be shown in the PSP as fully directional. This reflects the current arrangement. The Panel makes no finding as to whether the intersection should be signalised in future when Donnybrook Road is duplicated (this will be a matter for DoT), but it seems likely that signalisation will be required to ensure the safe and efficient use of the road network by quarry traffic.

The Panel agrees that the PSP should show the proposed access between the Woody Hill and Phillips quarries, as it is critical for the quarries to be able to operate in an integrated way, and for stone extracted from Phillips Quarry to be delivered to market.

### **(iii) Conclusions and recommendations**

The Panel concludes:

- The section of east west connector through the Barro land should be shown as a future connection once quarrying ceases.
- The north south local access street along the eastern boundary of the Barro land should be deleted.
- The PSP should show the proposed quarry and trade supplies access on Donnybrook Road as a fully directional access.
- The PSP should show the access between the Woody Hill and Phillips quarries.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 10 (Street Network) to:**

- a) show the section of the east west connector street across the northern part of the Barro land as ‘future connection once quarrying ceases’**
- b) delete the north south local access street along the eastern boundary of the Barro land**
- c) show the proposed quarry and trade supplies access on Donnybrook Road, Donnybrook as a fully directional access**
- d) show the proposed access between the Woody Hill and Phillips quarries.**

## **14.6 Road alignments on 910 Donnybrook Road, Donnybrook**

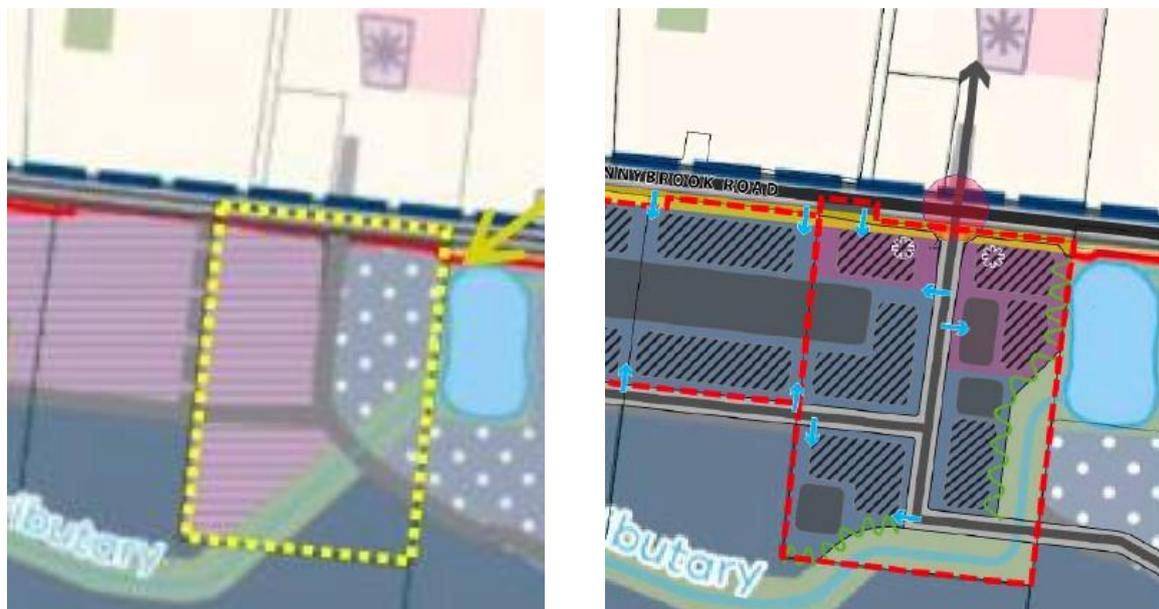
### **(i) Evidence and submissions**

The exhibited alignment of the north-south connector street through 910 Donnybrook Road curves to the east and is ultimately aligned in an east-west direction beyond the 910 Donnybrook Road land. Relying on the evidence of Mr Turnbull, 910 Donnybrook proposed that:

- the connector street have a more rectilinear alignment to allow for more regular lots either side, and a more efficient use of the land
- the east west section of the connector street be aligned further south on the land, adjacent to the realigned Merri Creek Tributary.

The two alternatives are shown in Figure 16.

**Figure 16** Alternative road alignments on 910 Donnybrook Road (exhibited PSP on left - alternative on right)



Source: Henry Turnbull's evidence for 910 Donnybrook Road (Document 68)

910 Donnybrook Road submitted that a 90 degree bend in the road would provide an improved traffic engineering outcome (which Mr Turnbull supported). It would also locate the road within the Woody Hill Blast Buffer, allowing the land to be used and developed more efficiently, "*reduc[ing] the unreasonable and unfair impact on the Land*".

Mr Turnbull also suggested that access to buildings fronting Donnybrook Road should be able to be provided from a service road and proposed minor changes to the description in the relevant cross section. The VPA agreed to these changes in its Part C submission.

In response, the VPA submitted:

- it does not support the alternative alignment, which is contingent on the realignment of the Merri Creek Tributary
- curvilinear roads are acceptable (and the particular curvature proposed is well within the accepted margins as Mr Turnbull acknowledged during cross examination)
- changes to 'square up' the road network following detailed drainage design may be contemplated at the subdivision stage.

## **(ii) Discussion**

While the Panel accepts that the curvilinear road alignment shown in the exhibited PSP is acceptable from a traffic management perspective, the exhibited road layout does not, in the Panel's view, allow for the most efficient use and development of the land. With one qualification, the Panel supports the alternative alignment presented by 910 Donnybrook Road and considers that it represents a better planning outcome.

The qualification relates to locating a publicly accessible road within the Blast Buffer. The Panel has some reservations about the safety aspects of this, as discussed in Chapter 5.7. As stated in that Chapter, the Panel does not consider that it would be appropriate for the PSP to show publicly accessible areas such as roads within the Blast Buffers. That said, the Panel has no in principle objection to locating roads within the Blast Buffers if, at the permit

application stage, a landowner was able to satisfy the responsible authority that the risks associated with blasting could be appropriately managed. The Panel considers that shifting the road to within the Blast Buffer at permit application stage would remain 'generally in accordance with' the PSP.

The Panel accepts that the alternative road alignment may be dependent on the realignment of the Merri Creek Tributary. As discussed in Chapter 15, the Panel supports the realignment of the tributary subject to detailed drainage design and Melbourne Water support, and subject to the Panel's reservations about introducing publicly accessible areas (such as the proposed pedestrian and cycle path along the tributary) into the Blast Buffers. Again, shifting the creek within the Blast Buffer at permit application stage would remain 'generally in accordance with' the PSP.

### **(iii) Conclusion and recommendations**

The Panel concludes:

- While it supports the alternative road alignment on 910 Donnybrook Road proposed by that submitter, it has reservations about showing publicly accessible areas like roads and open space along the Merri Creek Tributary located within the Blast Buffers.

**The Panel recommends amending the Part C Precinct Structure Plan as follows:**

**Amend Plan 10 (Street Network) to:**

- a) show the alternative road alignment on 910 Donnybrook Road, Donnybrook proposed by 910 Donnybrook Road Pty Ltd and Retzos as shown in Figure 16, save that the east-west connector road and the Merri Creek Tributary should be located outside the Woody Hill Blast Buffer.**

## **14.7 Connections to the south, and extension of Langley Park Drive**

In the exhibited PSP, Langley Park Drive was shown as a local access street terminating at the southern boundary of 95 Langley Park Drive. A 'paper road' continued all the way to the southern boundary of the PSP area, but it was not shown as a made road.

The Part A PSP made some changes to Langley Park Drive:

- it was upgraded to a connector street for most of its length
- it terminated slightly to the north of the exhibited extent, but a local access street was added to connect the southern end of the road to the local access street running north south adjacent to the railway line.

### **(i) Evidence and submissions**

Golina Holdings, Landream and Austral Bricks submitted that Langley Park Drive should be upgraded to a connector street (which was shown in the Part A PSP) and continued through CA28 to the southern boundary of the PSP area to facilitate a connection to the future Northern Quarries PSP. Golina Holdings called evidence from:

- Mr Hunt (Document 75), who supported the opportunity for an extension to facilitate road connections to the south
- Mr Organ (Document 152), who concluded that while the extension would impact two remnant scattered River Red Gums and may impact the drainage line, these

impacts are not so significant as to provide a constraint to the extension on ecological grounds.

Mr Organ noted that approval would need to be sought from DELWP for the proposed changes to the boundaries of CA28, and the land lost to the road would have to be offset elsewhere in CA28. He noted that DELWP had already approved an adjustment to the boundaries of CA28 to accommodate the access between the Woody Hill and Phillips quarries. His evidence was that any potential impacts to ground-dwelling fauna movement between Merri Creek and the open grassland and woodland areas to the east can be mitigated through providing appropriate crossing structures at strategic locations and other measures along the proposed road.

The VPA submitted that no traffic engineering reason was put forward to support extending Langley Park Drive to the southern boundary at this time. The extension faced some significant constraints, including CA28 and CA34 (which extended south of the precinct boundary), the transmission easement and existing trees located within the exhibited drainage corridor. It submitted that showing a conceptual alignment for the extension rather than a made road did not preclude its future extension, which could be considered in detail when the Northern Quarries PSP is prepared. The VPA proposed adding the following note on Plan 10 in the Part C PSP:

Possible future connection if required to support development to south, subject to approval by the Responsible Authority and DELWP MSA. Cost of development for road south of connector to be fully apportioned to development south of the PSP.

## **(ii) Discussion**

There is presently no need to provide road connections to the south of the PSP area, as the land to the south is not currently developed. Large parts of the land to the south are taken up by Conservation Areas and Phillips Quarry. While the Yarra Valley Water RWTP is likely to be constructed at some future point, Yarra Valley Water owns the land on either side of Langley Park Drive and can facilitate its own connections to the RWTP.

The extension of the road to the southern boundary would require resolution of a number of issues, including impacts on vegetation, boundary adjustments to CA28 and impacts on fauna. The Panel agrees that unless and until there is a traffic engineering reason to extend the road all the way to the southern boundary, the appropriate approach is to show it as a potential future extension rather than as a made road. None of the submitters provided evidence of having asked for (or secured) DELWP's in principle agreement to the southern extension and the associated adjustment to the boundaries of CA28 that will be required. The Panel therefore agrees with the VPA that it would be premature to show Langley Park Drive as a made road all the way to the southern boundary of the PSP. It supports the proposed note on Plan 10 outlined in the VPA's Part C PSP.

## **(iii) Conclusions**

The Panel concludes:

- It is premature to show Langley Park Drive as a made road all the way to the southern boundary of the PSP area
- It supports the VPA's proposed note on Plan 10.

## 14.8 Resolved issues

For completeness, the Panel notes Mr Shipp's evidence that the apportionment of the intersections along Donnybrook Road between the Donnybrook Woodstock ICP and the proposed Shenstone Park ICP is appropriate. This was not challenged in submissions.

The Panel supports for the following changes to the road network that were sought by submitters and agreed to by the VPA:

- an additional left in left out access to Donnybrook Road to the east of the gas easement
- an additional left in left out access to Koukoura Drive via the northern east west connector street
- straightening the alignment of the northern east west connector street at the eastern end (as shown in the Part A PSP) to provide a more direction connection to Koukoura Drive.

These changes were either included in the Part C Plan 10 (in Document 275), or were noted for inclusion in the final version.

## 15 Integrated water management and utilities

### 15.1 Introduction and context

Plan 12 in the PSP shows the proposed location and alignment of drainage assets, including retarding basins, creeks and drainage lines/waterways which include tributaries of Darebin Creek and Merri Creek. It also shows that the PSP area is affected by three DSSs – Lockerbie East Drainage Scheme, Woodstock West Drainage Scheme and Northern Quarries Drainage Scheme.

Melbourne Water is the regional floodplain management and drainage authority and caretaker of river health for Greater Melbourne. It is responsible for the DSSs.

Several parties made submissions to the Amendment requesting minor adjustments to the location or configuration of certain drainage assets. Many of these were resolved prior to the Hearing, but some remained outstanding and the subject of evidence and discussion at the Hearing.

### 15.2 The issue

The issue is:

- what, if any, changes should be made to the exhibited PSP provisions relating to drainage and waterways networks?

### 15.3 Evidence and submissions

The VPA advised in its Part A submission that in order to make changes to the drainage assets in the PSP, it requires confirmation from Melbourne Water that the changes proposed are in accordance with the DSSs developed by Melbourne Water for the area. The VPA also needs to consider whether the proposed changes to the DSSs are in accordance with the PSP.

#### (i) Prattico Constructions

The exhibited PSP proposed locating two retarding basins (collectively RB-03) and part of the Merri Creek Tributary on Property 6 at 75 Langley Park Drive. Property 6 is also impacted by the Woody Hill Blast Buffer, which extends down the eastern side of the property.

Prattico Constructions (owner of Property 6) requested that RB-03 and the tributary be relocated within the Blast Buffer. Melbourne Water (Submission 19) suggested that RB-03 be relocated to co-locate with an 'Area of Strategic Importance' for Growling Grass Frog. Based on information provided by Melbourne Water, the VPA supported the proposal. This was reflected in the Part A version of Plan 12, which relocated RB-03 to Property 1 (part of Yarra Valley Water's storage pond land).

Prattico Constructions called Ms Mag, who provided an expert witness statement (Document 97) in support of realigning the tributary to the east. Her opinion was that it was feasible, but may require the realignment of the tributary further south over the Yarra Valley Water storage pond land. Her preliminary design included two right angle bends for the realigned tributary. She acknowledged that while it is preferable to not have right angle bends in waterways, the waterway reserves may allow sufficient space to reduce the severity of the bends in the waterway.

The VPA Part B submission contained a response from Melbourne Water on the potential relocation of the tributary (Document 149(c)). Melbourne Water considered the design by Ms Mag was preliminary in nature, and for Melbourne Water to consider an alternative alignment that there would need to be:

... a more detailed assessment of the proponent's preferred waterway alignment to ensure that it aligns with Melbourne Water's relevant guidelines and requirements, and to complete consultation with any other impacted land-owners.

The submission from Yarra Valley Water (Document 246) stated that Ms Mag's proposed relocation of the tributary on its land:

... is incompatible with YVW's use of its land for water storages as required. The proposed alignment shown in the (amended) PSP is the result of discussions between YVW and Melbourne Water and should be retained.

The VPA Part C submission indicated that it was not opposed to some easterly realignment of the tributary, but that waterways and drainage matters are primarily to be resolved between Melbourne Water and landowners. The VPA noted in its Part C submission that it did not consider it necessary to change the depiction of the tributary location as:

Utilising the alignment above would not prevent alternate, more easterly, alignments being subjected to detail design and consultation at the development stage, with construction governed by the flexibility afforded by the principle of 'generally in accordance'.

**(ii) 910 Donnybrook Road Pty Ltd**

910 Donnybrook Road Pty Ltd also requested that the tributary to the Merri Creek be realigned along the eastern and southern boundaries of its site, into the area covered by the Blast Buffer. No design details were submitted to support the technical aspects of the realignment of the waterway. The VPA noted in its Part C submission that Melbourne Water has requested further design work and information to support the requested revision to the PSP and DSS alignment.

**(iii) Barro**

Barro submitted that the indicative position shown on Plan 12 of the Merri Creek Tributary with its linear open space each side may impact its current and future quarrying operations. It submitted that the alignment shown on Plan 12 is inconsistent with the alignment shown in the DSS, which did not show the tributary dipping into the top of the WA 6437 area. It noted in its Reply Submission (Document 287) that:

Melbourne Water took no issue with Barro's submission that the Merri Creek Tributary might be relocated to the north, and off WA6437

**(iv) Yarra Valley Water**

Yarra Valley Water's submission to the Amendment (Submission 18) noted that it has been developing an Integrated Water Management Plan (IWMP) for the Upper Merri Creek Catchment and that the PSP area falls within this IWMP sub-catchment area. It submitted that reference should be made to the IWMP in Integrated Water Management section of the PSP.

Guidelines G55 and G56 of the VPA's Part A PSP include a requirement to comply with any relevant approved IWMP.

**(v) Donnybrook Joint Venture**

DJV's submission to the Amendment (Submission 23) proposed an alternative location for RB-06 depicted in the south western corner of its property at 960 Donnybrook Road, to allow for the construction of the bund and access way between the quarries. The VPA Part C submission indicated that after discussion with Melbourne Water, it would support aligning the wetland in a largely east-west orientation (rather than a north-south orientation as exhibited) in the general area proposed by DJV, whilst ensuring the footprint is located outside CA28. The VPA submitted that with this proposed alignment, the road located along the eastern boundary of the wetland would be retained to achieve bushfire requirements.

**(vi) VPA response**

In response to the various requested changes to drainage and waterways, the VPA submitted that the DSSs provide flexibility in the design of assets at the time of subdivision. The VPA proposed revisions to the wording in the PSP regarding waterways to provide greater flexibility to the concept of 'generally in accordance' for waterways, and in turn allow a greater departure from the PSP alignment to be approved at the subdivision stage, subject to the approval of Melbourne Water.

**15.4 Discussion**

The Panel agrees with the VPA regarding the realignment of the tributary of the Merri Creek in regard to both 75 Langley Park Drive and 910 Donnybrook Road. The Panel is not opposed to the relocation of this tributary within the Blast Buffer (subject to the important proviso that the landowners are able to satisfy the responsible authority that safety risks could be appropriately managed), but recognises that the detailed design has not been undertaken and that it would need to be to the satisfaction of Melbourne Water.

Similarly with the potential realignment of the tributary of the Merri Creek within the Woody Hill Quarry site, the Panel considers that the final alignment should be resolved with Melbourne Water.

The note proposed by the VPA to be added to Plan 12 in the PSP provides guidance on the approach, including the practice of allowing variations to the DSSs at the subdivision application stage where developer-proposed alternative schemes satisfy a DSS's functional and cost requirements.

In regard to the design of drainage culverts, the Panels believes these are subject to detailed design to the satisfaction of Melbourne Water and the responsible authority. No changes are required to the PSP in relation to this issue.

**15.5 Conclusions**

The Panel concludes:

- The changes to the PSP proposed by the VPA to the drainage waterway network in its Part A and Part C versions are appropriate.
- The remaining drainage issues raised are likely able to be managed as part of the detailed design stage through permit applications, subject to Melbourne Water's approval. The Panel supports the VPA's proposed note on Plan 12, which will provide

more flexibility in relation to drainage changes during the detailed design phase, but otherwise makes no specific recommendations.

## **15.6 Resolved issues**

For completeness:

- Mirvac (Submission 4) sought clarification on whether the drainage plans have been updated following its discussions with Melbourne Water about the location of drainage assets in the Donnybrook-Woodstock PSP area that connect into those in Shenstone Park. The VPA confirmed in its response to submissions (Document 48(a)) that the plans shown in the PSP have been updated based on Melbourne Water advice.
- In its submission to the Amendment, 1100 Donnybrook Rd requested the removal of the uncredited open space designation along the Darebin Creek tributary adjacent to the City Gate gas easement in the northern portion of its site. In its submission to the Panel (Document 273), it noted the satisfactory resolution of the issue, observing that the matter had been rectified in the VPA's Part B submission.

## 16 Precinct infrastructure and staging

### 16.1 Introduction and context

The VPA advised in its Part A submission that the ICP will be introduced through a separate planning scheme amendment, intended to be submitted for approval concurrently with the PSP. It will be a standard levy ICP.

### 16.2 The issues

The issues are:

- should the Yarra Valley Water land on Langley Park Drive be included in the land use budget?
- should the Woody Hill Quarry be included in the land use budget?
- should a future (post extraction) development layout be shown on the Woody Hill land?
- is the design of IN03 appropriate, and will it be adequately funded by the ICP?
- will the infrastructure be required ahead of infrastructure contributions being collected?

### 16.3 Evidence and submissions

Yarra Valley Water submitted that it would be inappropriate for the PSP to include the storage pond land in Langley Park Drive as developable employment land in the land budget:

It paid many millions of dollars for the land, and will pay many more in developing the RWTP, for the purposes of servicing this precinct and the balance of the North Growth Corridor. An outcome that saw it funding ICP items, with no profit on its development or benefit flowing to it from the items it would fund, would be perverse – unfair, uneconomic, and entirely contrary to the orderly provision and co-ordination of public utilities for the benefit of the community.

Council submitted that this land should not be exempted from contributions, as there may be a shortfall between the contributions collected and the cost of the infrastructure to be provided.

The VPA responded in its Part C submission:

Following a sensitivity analysis, the VPA is satisfied that even with the absence of development in the 200-metre blast buffer and the Yarra Valley Water land, there will be enough contributions to fund infrastructure identified in the Precinct Infrastructure Plan.

It went on to submit:

The land identified as holding ponds by Yarra Valley Water (as shown in Document 117) will be excluded from infrastructure contributions. The remainder of Yarra Valley Water's holdings on Langley Park Drive will be liable for infrastructure contributions. If additional land is required for holding ponds, there can be an exemption to the monetary levy, but they will still be required to pay any Land Equalisation amounts.

The VPA explained that the Woody Hill Quarry was not included in the land use budget as the extraction life is currently not known. Estimates for the extraction life are between 20 and 50 years, which may exceed the life of the PSP and ICP. For similar reasons, the VPA submitted

that it would not be appropriate to show any future post extraction development profile of the Woody Hill Quarry:

Put simply, the end of extraction will be at such a distant and uncertain date that to include any future development profile would embed an imagined proposal with little reality to future needs.

Intersection IN03 is a four leg cross intersection, with one leg (the southern leg) being fully funded under the Shenstone Park ICP and the remaining three legs being funded under the Donnybrook-Woodstock ICP. The VPA submitted that ultimate designs had been obtained from the developer in Donnybrook-Woodstock PSP (Mirvac) who is delivering IN-03, to ensure that the southern leg aligns with the proposed intersections under development.

Council raised concerns about the staging of development and the relationship between the flow of infrastructure contributions and the delivery of infrastructure (the concern being that infrastructure may be required ahead of the collection of funds to pay for that infrastructure, particularly given that some of the land in the buffers may not be developed for some time). The VPA responded that the Donnybrook Road intersections constitute enabling infrastructure, and would likely be delivered by developers as works in kind as they develop their land. Assuming development proceeds from the north to the south, there is unlikely to be a short term need for Koukoura Drive to be delivered.

Council further submitted that including land in the buffers (which is effectively undevelopable) in the land budget makes the management of the land contribution model problematic. Council may not receive the land equalisation payments payable in respect of the land in the buffers until well after it is required to pay out land credit amounts on other developable land within the PSP. The VPA responded that this is an issue of cash flow management for Council, rather than a shortfall. It is an issue that Council will need to manage *“the same as every other DCP and ICP in the planning scheme”*.

## **16.4 Discussion**

The Panel accepts Yarra Valley Water’s submission that there is little to no prospect of any of the Langlely Park Drive land being used for employment purposes. While the Panel accepts that Document 117 does not show a resolved design of the proposed storage ponds, most of the land outside the Blast Buffer will be taken up with the ponds or the drainage corridor. With the exception of the small section of land in the northern part of Property 3, any land left over would be difficult to access and is unlikely to be developed for any purpose other than utility purposes. Further, the VPA indicated that sufficient contributions will be collected to fund the infrastructure in the Precinct Infrastructure Plan without the Yarra Valley Water land being included. The Panel therefore considers that none of that land should be included in the land budget.

The Panel agrees with the VPA that it is not appropriate to provide for a future layout of the Woody Hill Quarry. By all estimates the life of the quarry is likely to continue beyond that of the PSP, and it would not be appropriate for the PSP to seek to guide its redevelopment. The future use and development of the land should be assessed at the time quarrying ceases. Further, the infrastructure identified in the Precinct Infrastructure Plan is to serve the needs of the future community at Shenstone Park, not the ongoing operation of the quarry. Therefore, it should not be included in the land budget and should not be required to pay contributions toward the cost of that infrastructure.

The Panel is satisfied on the basis of the VPA's submission that the design of Intersection IN-03 has appropriately considered Mirvac's proposals for the north, east and west legs of the intersection. It is also satisfied on the basis of Mr Shipp's evidence that the allocation of the costs of IN-03 between Donnybrook Woodstock ICP and the future Shenstone Park ICP is appropriate.

While the Panel acknowledges Council's concerns about the possible disconnect between the staging of development, the need for infrastructure and the collection of contributions, it is satisfied on the basis of the VPA's explanation that this is unlikely to be a problem in practice. In any event, the Panel is not sure that this is a problem that is able to be addressed through the PSP process. The timing of the collection of infrastructure contributions (and land equalisation payments) is necessarily linked to the decisions of the landowners as to when to develop. The PSP is not able to influence those decisions.

## **16.5 Conclusions and recommendation**

The Panel concludes:

- All of the Yarra Valley Water land should be excluded from the land budget.
- The Woody Hill Quarry should not be included in the land budget. Nor should the PSP seek to foreshadow the future use and development of the land following the ceasing of quarrying operations.
- The design and cost allocation of Intersection IN-03 between the Donnybrook-Woodstock ICP and the future Shenstone Park ICP is appropriate.

The Panel recommends amending the Part C Precinct Structure Plan as follows:

**Update Table 1 (Summary Land Use Budget) and section 4.1 (Parcel Specific Land Budget) to remove Properties 1, 2, 3, 7 and 8 (the Yarra Valley Water land in Langley Park Drive) from the net developable area.**

## Appendix A Submitters to the Amendment

No.	Submitter	No.	Submitter
1	Environment Protection Authority	18	Yarra Valley Water
2	APA	19	Melbourne Water
3	Prattico Construction	20	1100 Donnybrook Rd Developments P/L
4	Mirvac	21	Catholic Education Melbourne
5	(Withdrawn/superseded)	22	Satterley Property Group P/L
6	Golina Holdings	23	Donnybrook JV P/L
7	910 Donnybrook Road P/L	24	Barro Group P/L
8	(Withdrawn/superseded)	25	Merri Creek Management Committee
9	(Withdrawn/superseded)	26	960 Blueways Development P/L
10	Retzos Group	27	Department of Jobs, Precincts and Regions
11	(Withdrawn/superseded)	28	Victorian School Building Authority
12	Donnybrook Road Unit Trust	29	Country Fire Authority
13	Landream and Austral Brickworks	30	Department of Transport
14	(Withdrawn/superseded)	31	G Mammone
15	Sarah Davies	32	City of Whittlesea
16	Lavender Rain P/L		
17	Department of Environment, Land, Water and Planning		

## Appendix B Parties to the Panel Hearing

Submitter	Represented by
VPA	Greg Tobin of Harwood Andrews, who called expert evidence on: <ul style="list-style-type: none"> <li>- planning from John Glossop of Glossop Town Planning</li> <li>- extractive resource operations from John Mitas of John Mitas Consulting</li> <li>- extractive resources from Tylah Drochmann of Geological Survey of Victoria</li> <li>- noise and vibration from Dr Valerie Lenchine of GHD</li> <li>- air quality from Michael Asimakis of GHD</li> <li>- transport from Reece Humphreys of GTA</li> <li>- employment land supply from Dr Marcus Spiller of SGS Economics and Planning</li> <li>- sodic soils from Dr Peter Sandercock of Jacobs</li> </ul>
Whittlesea City Council	Terry Montebello of Maddocks and Lenice White of Council, who called expert evidence on: <ul style="list-style-type: none"> <li>- heritage from David Helms of David Helms Heritage Planning</li> </ul>
Barro Group	Jeremy Gobbo QC and Emily Porter of Counsel, instructed by Ponte Business Lawyers, who called expert evidence on: <ul style="list-style-type: none"> <li>- planning from Chris de Silva of Mesh Consultants</li> <li>- extractive industry from Garret Hall of Golder</li> <li>- noise from Darren Tardio of Enfield Acoustics</li> <li>- air quality from Dr Iain Cowan of ERM</li> <li>- blasting, flyrock, vibration and airblast from Adrian Moore of Terrock</li> <li>- traffic from Jason Walsh of Traffix Group</li> <li>- conservation from Aaron Harvey of Biosis</li> <li>- infrastructure contributions from Paul Shipp pf Urban Enterprise</li> </ul>
Donnybrook Joint Venture Pty Ltd	Stuart Morris QC and Paul Chiappi of Counsel, instructed by Gadens, who called expert evidence on: <ul style="list-style-type: none"> <li>- planning from Rob Milner of Kinetica</li> <li>- urban design from Mark Sheppard of Kinetica</li> <li>- quarry operations from David Maltby of Zone Environmental</li> <li>- buffers from Peter Ramsay of Peter J Ramsay and Associates</li> </ul>

	<ul style="list-style-type: none"> <li>- noise and vibration from Jim Antonopoulos of SLR Consulting</li> <li>- economics from Rhys Quick of Urbis</li> <li>- traffic from Jason Walsh of Traffix Group</li> <li>- heritage from Bryce Raworth of Bryce Raworth Pty Ltd</li> </ul>
Donnybrook Road Unit Trust	<p>John Cicero and Eliza Minney of Best Hooper, who called expert evidence on:</p> <ul style="list-style-type: none"> <li>- planning from Sarah Horsfield of Ratio Consultants</li> <li>- economics from Matthew Lee of Deepend Services</li> <li>- arboriculture from Rob Galbraith of Galbraith and Associates</li> <li>- traffic from Steve Hunt of Ratio Consultants</li> <li>- drainage from Luke Cunningham of Rain Consulting*</li> </ul>
Prattico Constructions Pty Ltd	<p>Lorenzo Rigoni and Gabrielle Sesta of Terrain Consulting Group, who called expert evidence on:</p> <ul style="list-style-type: none"> <li>- drainage from Val Mag of Stormy Water Solutions</li> </ul>
Landream	Kate Matthews of Tract Consultants
910 Donnybrook Road Pty Ltd and Retzos	<p>Jennifer Trewhella of Counsel instructed by Herbert Smith Freehills, who called expert evidence on:</p> <ul style="list-style-type: none"> <li>- planning from Mark Woodland of Echelon Planning</li> <li>- economics from Rhys Quick of Urbis</li> <li>- traffic from Henry Turnbull of Traffix Group</li> </ul>
Yarra Valley Water	<p>Peter O'Farrell and Robert Forrester of Counsel, instructed by Norton Rose Fulbright, who called expert evidence on:</p> <ul style="list-style-type: none"> <li>- odour from Tim Pollock of Pollock Environmental Consulting</li> </ul>
Melbourne Water	Lawrence Newcombe
Merri Creek Management Committee Inc	Luisa Macmillan
1100 Donnybrook Rd Pty Ltd	<p>Nick Tweedie SC and Daniel Robinson of Counsel, instructed by Hall and Willcox, who called expert evidence on:</p> <ul style="list-style-type: none"> <li>- planning from David Barnes of Hansen Partnership</li> <li>- economics from Alex Hrelja of Hill PDA</li> <li>- traffic from Henry Turnbull of Traffix Group</li> <li>- noise from Christophe Delaire of Marshall Day Acoustics</li> <li>- vibration from Tim Marks of Marshall Day Acoustics</li> <li>- drainage from John Yalden of Taylors*</li> </ul>
Golina Holdings Pty Ltd	<p>John Cicero and Eliza Minney of Best Hooper, who called expert evidence on:</p>

- 
- ecology from Aaron Organ of EHP
  - traffic from Steve Hunt of Ratio Consultants
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\* witness provided written evidence but was not called at the Hearing

## Appendix C Document list

No.	Date	Description	Presented by
1	24/07/2020	C241wsea Notification letter and draft procedural directions	Planning Panels Victoria (PPV)
2	31/08/2020	Email: Request from Hall and Wilcox for Order for Department of Jobs, Precincts and Regions (DJPR) to provide documents	1100 Donnybrook Rd
3	27/08/20	VPA suggested outline of pre-hearing steps	VPA
4	04/09/2020	C241wsea Directions, Distribution List and Timetable Version 1	"
5	09/09/2020	Letter: Request from Ponte to be allocated time to present closing submissions	Barro
6	"	Letter: Response from Harwood Andrews to Document 5	VPA
7	"	Letter: Hall and Wilcox seeking clarification on Direction 7 and responding to Document 5	1100 Donnybrook Rd
8	11/09/2020	Letter: Response from Ponte to Document 7	Barro
9	"	Letter: Response from Ponte to Document 6 and 7	"
10	"	Letter: Harwood Andrews advice regarding Hubshare access and Location Plan	VPA
11	14/09/2020	Letter: Response from Harwood Andrews to Document 9	"
12	"	a) Location Plan overlayed on colour coded properties b) Location Plan overlayed on exhibited Future Urban Structure	"
13	18/09/2020	Letter: Harwood Andrews to Panel and all parties regarding directions 5b, 6, 7 and 12	VPA
14	24/09/2020	Letter: Panel to all parties addressing various procedural matters	PPV
15	"	Distribution List and Timetable Version 2	"
16	29/09/2020	a) Email: Harwood Andrews attaching updated submitter maps b) Map of Submitters c) Map of Submitters with FUS	VPA
17	30/09/2020	Letter – Harwood Andrews to Panel and all parties regarding timeframes for drone footage	"
18	02/10/2020	Letter: Barro Group response to directions 6 & 7 with annexures	Ponte for Barro
19	"	a) Letter – Maddocks to PPV and Parties re direction 7 b) List of permits and endorsed plans	Whittlesea City Council

No.	Date	Description	Presented by
20	“	Letter – PPV to parties – further directions re drone footage and aerial photography	PPV
21	05/10/2020	Letter – Hall and Wilcox to PPV – response to directions 6 & 7	1100 Donnybrook Rd
22	09/10/2020	Email – PPV to Hall and Wilcox regarding draft order	PPV
23	12/10/2020	Letter from Barro Group to PPV re draft order	Barro
24	“	Annotated page 1 of letter from Hall and Wilcox dated 05.10.20 a) Hall and Wilcox – form of direction – 13.10.20	“
25	“	Letter from Harwood Andrews to PPV and Parties re direction 5b materials a) Updated Draft Future Urban Structure, PSP – Track changes Panel version -12.10.20 b) Schedule 7 to Clause 37.07 – tracked changes	VPA
26	13/10/2020	Further directions 5b documents uploaded a) Explanatory Report b) Part of Planning Scheme Map 4 Zone c) Part of Planning Scheme Map 4IPO d) Schedule 11 to Clause 37.01 – tracked changes e) Schedule to Clause 66.04 – tracked changes f) Schedule to Clause 66.06 – tracked changes	“
27	“	Letter from Maddocks to PPV re Direction 7	Whittlesea City Council
28	“	Updated Permit Application spreadsheet	“
29	“	Relevant permits and endorsed plans a) 704901 – 430 Summerhill Road, Wollert -Permit & Extension of Time b) 704901 – 430 Summerhill Road, Wollert, Endorsed Plan c) 710157- 870 Donnybrook Road Amended Permit Signed d) 710157- 870 Donnybrook Road Amended Signed permit e) 714169- 821 Donnybrook Road Endorsed Plans (1) f) 714169- 821 Donnybrook Road Signed Amended Permit - issued 17 Oct 2013 g) 714908- 1100 Donnybrook Road Signed Permit h) 715386-1145 Donnybrook Road Signed Permit i) 715902 – 870 Donnybrook Road Extension of time letter	

No.	Date	Description	Presented by
		j) 715902- 870 Donnybrook Road Permit	
		k) 716265 1145 Donnybrook Road Endorsed Plans	
		l) 716265 1145 Donnybrook Road Signed Planning Permit	
		m) 716330- 65 English Street Permit Amended – Section 72	
		n) 716330- 65 English Street Endorsed Amended Subdivision Layout – Condition 1	
		o) 716351- 80 English Street Endorsed Plan – Condition 1	
		p) 716351- 80 English Street Permit Amended – Section 72	
		q) 716775- 40 Langley Park Drive Endorsed Plans	
		r) 716775- 40 Langley Park Drive Signed Permit	
		s) 717121 – Amended Planning Permit – 1025 Donnybrook Road, Donnybrook	
		t) 717121 Amended Endorsed Subdivision Layout Plan – Condition 1	
		u) 717126 – 875 Donnybrook Road, Donnybrook	
		v) 717126 – Endorsed plans – 875 Donnybrook Road, Donnybrook	
		w) 717158 – 1025 Donnybrook Road, Donnybrook	
		x) 717158 – AMENDED Endorsed Plan – 1025 Donnybrook Road, Donnybrook	
		y) 717349 – 1145 Donnybrook Road, Donnybrook	
		z) 717349 – 1145 Donnybrook Road Endorsed Plans	
		aa) 717783- 1145 Donnybrook Road Signed Permit	
		bb) 717819- 25 Norman Road Endorsed Condition 1 Plan Subdivision Plan	
		cc) 717819- 25 Norman Road Permit	
		dd) 718907- 910 Donnybrook Road Refusal	
		ee) 718907- 910 Donnybrook Road Signed Permit	
		ff) 719283- 960 Donnybrook Road Signed Refusal	
		gg) 719284 – 1030 Donnybrook Road, Signed Refusal 20200522	
		hh) 719376- 960 Donnybrook Road Signed Endorsed Dry Stone Wall Removal Plan	
		ii) 719376- 960 Donnybrook Road Signed Permit	
30	14/10/2020	Letter from Gadens to PPV – Proposed Directions requiring production of Barro DJV Agreement	DJV
31	15/10/2020	Email from Hall & Wilcox re proposed Directions requiring production of agreement	1100 Donnybrook Rd

No.	Date	Description	Presented by
32	“	Email from Ponte re proposed Directions requiring production of agreement	Barro
33	“	Letter from Ponte to PPV re aerial photography with plans	“
34	“	Email from PPV to Parties – information regarding quarry	PPV
35	16/10/2020	Letter from Maddocks to PPV and Parties – Request for Panel Direction to produce document relevant to the Amendment	Whittlesea City Council
36	“	Quarry Statement	VPA
37	“	Strategic Transport Modelling Assessment Report – GTA Consultants	“
38	19/10/2020	Letter from Herbert Smith Freehills to PPV re DJV Agreement	910 Donnybrook Road
39	“	Email from Gadens to PPV and Parties re Barro DJV Agreement	DJV
40	“	Email from PPV to parties re Whittlesea City Council request regarding Tardis Heritage Report	PPV
41	20/10/2020	Email from Harwood Andrews to PPV requesting extension re Direction 16b	VPA
42	“	Memo from VPA re response to Direction 16b	“
43	22/10/2020	Email letter from Ponte re Directions 6 and 7 re draft orders and attachments	Barro
44	“	Tardis Heritage Report dated 30 November 2019	DJV
45	“	Email letter from Hall & Wilcox to PPV and Parties re change of experts	1100 Donnybrook Rd
46	“	Letter – PPV to parties – further directions re consideration of requests and responses	PPV
47	“	Email letter from Harwood Andrews to PPV and Parties re expert evidence	VPA
48	“	Part A Submissions a) Appendix 1 – Submissions response table b) Appendix 2 – Shenstone Park PSP track changes c) Appendix 3 – Shenstone Park PSP – clean copy d) Appendix 4 – Shenstone Park Ordinance – track changes e) Appendix 5 – Shenstone Park Ordinance – clean copy	VPA
49	“	Part A supporting document – Shenstone Park Safety Management Strategy – June 2020	“

No.	Date	Description	Presented by
50	26/10/2020	Letter from Ponte to PPV and Parties re October 22 directions	Barro
51	"	Endorsed Plans a) 710157 Endorsed Plans 270308_Redacted b) 710157 Endorsed Plans 280109_Redacted	"
52	27/10/2020	Email from Gadens to PPV re request for extension for conclave evidence	DJV
53	"	Letter from Gadens to PPV re Support Documents – Direction 8	"
54	"	Supporting documents – Direction 8: a) DJV Preferred FUS b) Northern Quarries Investigation Area – Draft Addendum c) Draft Shenstone PSP – December 2017 d) Email from Melbourne Water – in principal consent to re-siting of RB-06 e) DELWP letter of agreement – BCS 28 f) Interim Designs – IN-03 g) Proposed Development Layout Plan	"
55	28/10/2020	Email from Best Hooper Lawyers to PPV – supporting request for extension of time for filing conclave evidence	Donnybrook Road Unit Trust & Golina Holdings
56	"	Letter from Norton Rose Fulbright to PPV and parties re expert evidence	Yarra Valley Water
57	"	Email from Ponte to PPV re conclave evidence	Barro
58	"	Email from PPV re evidence extension requests	PPV
59	"	Letter from PPV to Gadens re extension request decision	"
60	"	Email from Gadens to PPV re expert evidence	DJV
61	"	Evidence – Mr Alex Hrelja, Economics	1100 Donnybrook Rd
62	"	Evidence – Mr Christophe Delaire, Acoustics	"
63	"	Evidence Mr Henry Turnbull, Traffic	"
64	"	Evidence – Mr John Yalden, Drainage	"
65	"	Evidence – Mr Tim Marks, Vibration	"
66	"	Letter from Herbert Smith Freehills to PPV re expert evidence	910 Donnybrook Road
67	"	Expert Report of Mr Rhys Quick, Urbis	"

No.	Date	Description	Presented by
68	“	Expert Report of Mr Henry Turnbull, Traffix Group	“
69	“	Expert Witness Statement – Economics – Rhys Quick of Urbis	DJV
70	“	Letter from Ponte to PPV re direction 19(a) – witness reports	Barro
71	“	Expert report – Blasting – Adrian Moore, Terrock	“
72	“	Expert report – Dust Odour- Iain Cowan, ERM	“
73	“	Expert report – Traffic – Jason Walsh, Traffix	“
74	“	Letter from PPV to Parties regarding various matters relating to circulation of evidence	PPV
75	“	Expert evidence of Steve Hunt, Ratio – Traffic Engineering	Golina Holdings Pty Ltd
76	“	Email from Harwood Andrews to PPV and Parties re witness statements and memorandum	VPA
77	“	Clarification request 22.10.2020 Memo for Panel	“
78	“	Memo – A – Proposed changes (Numbered) – Shenstone Park Future Urban Structure	“
79	“	Memo B-1 – Table of Changes – FUS	“
80	“	Memo B-2 – Table of Changes – Plan 15	“
81	“	Witness Statement – Traffic – Reece Humphreys	“
82	“	Witness Statement – Noise and vibration buffers – Dr Valeri V. Lenchine	“
83	“	Witness Statement – Geology and Quarry Operations – Tylah Drochmann	“
84	“	Witness Statement – Economics – Dr Marcus Spiller	“
85	“	Witness Statement – Air Quality Buffers – Michael Asimakis	“
86	“	Witness Statement – Extractive Industry and Operations - John Mitas	“
87	“	Expert Witness Statement – Traffic – Jason Walsh of Traffix Group	DJV
88	29/10/2020	Expert Witness Statement – Acoustics – Darren Tardio of Enfield Acoustics	Barro
89	“	Expert Evidence Statement – Economics – Matthew Lee of Deep End Services	Donnybrook Road Unit Trust
90	“	Expert Evidence Statement – Traffic Engineering – Steve Hunt of Ratio Consultants	“
91	“	Email from Terrain Consulting Group to PPV requesting extension re drainage evidence	Prattico Construction

No.	Date	Description	Presented by
92	“	Email from Best Hooper re clarification regarding drainage evidence	Donnybrook Road Unit Trust & Golina Holdings
93	“	Expert Witness Statement – Acoustics & Vibration – Jim Antonopoulos of SLR Consulting	DJV
94	30/10/2020	Email from PPV to Parties re drainage evidence	PPV
95	“	Expert Evidence Statement – Drainage – Luke Cunningham of Rain Consulting	Donnybrook Road Unit Trust
96	“	Expert Witness Statement – Buffers – Peter Ramsay of Peter J Ramsay & Associates	DJV
97	2/11/2020	Expert Witness Report – Drainage – Valerie Mag of Stormy Water Solutions	Prattico Construction
98	5/11/2020	Letter from PPV to Parties – Panel Directions – Conclaves REVISED	PPV
99	6/11/2020	Expert Evidence Report – Planning – Sarah Horsfield of Urbis	Donnybrook Road Unit Trust
100	“	Expert Evidence Report – Arboriculture – Rob Galbraith of Galbraith & Associates	“
101	“	Expert Evidence Report – Heritage – David Helms of David Helms Heritage Planning	Whittlesea City Council
102	“	Letter from Ponte to PPV & Parties re Direction 19(b)	Barro
103	“	Expert Witness Report – Ecology – Aaron Harvey of Biosis	“
104	“	Expert Witness Report – Planning – Chris De Silva of Mesh	“
105	“	Expert Witness Report – ICP – Paul Shipp, Urban Enterprise	“
106	“	Expert Witness Report – Extractive Resource Policy – Garrett Hall of Golder	“
107	“	Letter from Herbert Smith Freehills to PPV and Parties re expert evidence	910 Donnybrook Road
108	“	Expert Witness Statement – Planning – Mark Woodland of Echelon Planning	“
109	“	Expert Witness Statement – Heritage – Bryce Raworth of Bryce Raworth Pty Ltd	DJV
110	“	Addendum to Buffer Expert Witness Statement – Odour – Peter Ramsay of Peter J Ramsay & Associates	“
111	“	Expert Witness Statement – Quarry Operations – David Maltby of Zone Environmental	“

No.	Date	Description	Presented by
112	“	Expert Witness Statement – Town Planning – Rob Milner of Kinetica	“
113	“	Expert Witness Statement – Urban Design – Mark Sheppard of Kinetica	“
114	“	Letter from Norton Rose Fulbright to PPV and parties filing evidence	Yarra Valley Water
115	“	Annexure A. YVW – Witness Statement – Tim Pollock – 6 November 2020	“
116	“	Annexure B. YVW – Jacobs siting and risk assessment report draft – extracts provided to T Pollock	“
117	“	Annexure C. YVW – Shenstone Park PSP Plan 15 (updated FUS) with directional buffer 6.11.2020	“
118	“	Expert Witness Statement – Odour – Michael Asimakis of GHD	VPA
119	“	Expert Witness Statement – Soils – Dr Peter Sandercock of Jacobs	“
120	“	Expert Witness Statement – Planning – John Glossop of Glossop Planning	“
121	“	Drone Coordinate Maps	“
122	“	Flightpaths	“
123	“	JPG Proofs	“
124	“	Expert Witness Evidence – Planning – David Barnes of Hansen Partnership	1100 Donnybrook Rd
125	9/11/2020	Email from Harwood Andrews to PPV and Parties re technical error fixed and flightpath drone footage	VPA
126	“	Email letter from Harwood Andrews to the PPV and Parties – conclaves and cross examination	VPA
127	“	Email from Maddocks to PPV and Parties regarding extension for Direction 37	Whittlesea City Council
128	“	Email from Ponte to PPV re Direction 37 - cross examination	Barro
129	“	Letter from Herbert Smith Freehills to PPV and Parties re cross examination	910 Donnybrook Road
130	“	Email from PPV to parties re extension request for advice on cross examination	PPV
131	“	Version 3 Timetable and Distribution List	“
132	“	Email from PPV to Best Hooper re late evidence	“

No.	Date	Description	Presented by
133	“	Letter from Hall & Wilcox to PPV requesting further directions	1100 Donnybrook Rd
134	“	List of parties and witnesses to be cross-examined	“
135	“	Email from Merri Creek Management Committee to PPV re cross examination	Merri Creek Management Committee
136	“	Letter from Gadens to PPV – cross examination of witnesses – Direction 37	DJV
137	12/11/2020	Email from Ponte to PPV – Response to Hall & Wilcox email of 11 November, 2020	Barro
138	“	Email from PPV to Hall & Wilcox re production of agreement	PPV
139	“	Email from HA to PPV re conclave statements	VPA
140	13/11/2020	Dust Conclave Statement – Michael Asimakis	“
141	”	Letter from Mirvac re submission on Woody Hill Quarry expansion proposal	Mirvac Victoria Pty Ltd
142	“	Email from Maddocks re anticipated duration of expert witness cross examination	Whittlesea City Council
143	“	Letter from Harwood Andrews regarding Intersection designs <ul style="list-style-type: none"> <li>a) Ultimate intersection concept plans (IN01)</li> <li>b) Ultimate intersection concept plans (IN02)</li> <li>c) Ultimate intersection concept plans (IN03)</li> <li>d) Ultimate intersection concept plans (IN04)</li> <li>e) Ultimate intersection concept plans (IN05)</li> </ul>	VPA
144	“	Letter from Gadens to PPV – Hall & Wilcox request for Barro DJV Agreement <ul style="list-style-type: none"> <li>a) Attachment – Letter from Contour to VPA re access to Phillips Quarry</li> <li>b) Attachment – Letter from Contour to VPA re quarry activities at 960 Donnybrook Road</li> </ul>	DJV
145	“	Email from Harwood Andrews to PPV - indicative VPA witness order	VPA
146		Letter from Herbert Smith Freehills re response on proposed plans for ultimate designs	910 Donnybrook Road
147	“	Letter from Norton Rose Fulbright re cross examination	Yarra Valley Water
148	“	Email from Harwood Andrews to PPV re Vibration Conclave	VPA
149	“	Part B – Submissions	“

No.	Date	Description	Presented by
		a) Appendix 1 – PPV Submissions Table – Part B b) Appendix 2 – VPA response to DJV FUS c) Appendix 3 – Melbourne Water	
150	16/11/2020	Late submission filed on behalf of Giuseppe and Rosa Mammone	Giuseppe Mammone
151	“	Email from Ponte to PPV re Errata to Document 72 a) Shenstone Park Separation Distance Errata b) Stage 2 c) Annexure 6 (e) (ii) Staging Plan for WA 6852	Barro
152	“	Expert Evidence – Ecology - Aaron Organ of Ecology and Heritage Partners	Golina Holdings Pty Ltd
153	“	Email from Gadens to PPV re document 54(e)	DJV
154	“	Addendum to Rob Milner’s Town Planning Evidence dated 16 November 2020	“
155	“	Revised version of the DJV FUS in CAD format	“
156	“	Revised version of the DJV FUS in pdf format	“
157	“	Email from PPV – Panel Directions	PPV
158	“	Opening presentation to Panel	VPA
159	“	Shenstone Park Sodic Soils Assessment presentation	“
160	“	Vic Soil Map	“
161	“	Jim Antonopoulos materials: a) Bund Annexures A b) Email from Darren Tardio – 7 October 2020 c) Email from Darren Tardio – 12 October 2020 d) Email from Rachel Yard – 12 October 2020 e) Email from Darren Tardio – 27 October 2020 f) Email with folder of documents – 29 September 2020	DJV
162	“	Email from PPV to Harwood Andrews - Recall of Dr Sandercock on Day 2	PPV
163	“	Email from Ponte to PPV re instructions to Iain Cowan a) Letter to Dr. Iain Cowan dated August 25, 2020 b) Redacted email to Dr. Iain Cowan dated September 4, 2020	Barro
164	“	Email from Ponte to PPV – agreement between Barro Group and Donnybrook JV a) Counterpart Barro DJV Agreement dated 30 August, 2020	“

No.	Date	Description	Presented by
165	17/11/2020	Email from Ponte re further instructions to Iain Cowan a) Email to Dr. Iain Cowan dated 21 September, 2020. b) Email to Dr. Cowan dated 14 October, 2020. c) Email to Dr. Cowan dated 22 October, 2020. d) Email to Dr. Cowan dated 23 October, 2020. e) Email to Dr. Cowan dated 10 August, 2020 f) CAD file – WA_6437 g) CAD file – Topo_0516 h) CAD file – Stage1_5 Annotation i) VIC EPA Monitoring Data j) Site notes - Wyndhamvale_Barro k) Site notes – Donnybrook_Road_Quarry	“
166	“	Email from Hall & Wilcox re supplementary vibration evidence of Mr Timothy Marks and distribution list	1100 Donnybrook Rd
167	“	Supplementary statement of evidence (addendum) prepared by Mr Timothy Marks of Marshall Day Acoustics	“
168	“	Email from Harwood Andrews to PPV - indicative VPA witness order Day 2	VPA
169	“	Noise Conclave Statement	“
170	“	Email from Reece Humphreys to Harwood Andrews dated 11 November 2020	“
171	18/11/2020	Email from Gadens to PPV re Addendum to Peter Ramsay's Expert Witness Statement	DJV
172	“	Vibration/Airblast Conclave Statement	VPA
173	“	Evidence Presentation of John Glossop, Glossop Town Planning	“
174	“	Addendum to Peter Ramsay's Expert Witness Statement	DJV
175	“	Revised version of Peter Ramsay's Expert Witness Statement dated 30 October 2020	“
176	“	Permit 704901 – Application for extension of time (July 2019)	1100 Donnybrook Rd
177	“	Permit 704901 – Delegate report (November 2019)	“
178	“	Plan of Subdivision PS832731T	DJV
179	“	Chain of emails between representatives of DJV and the VPA concerning the boundary realignment between 8 July and 21 July 2020	“
180	19/11/2020	DoT Submissions	Department of Transport

No.	Date	Description	Presented by
181	“	Submission on behalf of City of Whittlesea	City of Whittlesea
182	20/11/2020	Panel Report – Whittlesea Planning Scheme Amendment C230wsea 25 Vearings Road, Epping	VPA
183	“	Whittlesea Planning Scheme 21.02 – Municipal Profile	“
184	“	PPN 89 – Extractive industry and resources (February 2020)	“
185	“	Extract - Delivering Melbourne’s Newest Sustainable Communities – Report for Public Consultation, Urban Growth Boundary Review (June 2009)	“
186	“	Growth Corridor Plans – Managing Melbourne’s Growth (June 2012)	“
187	“	Precinct Structure Planning Guidelines – Part one	“
188	“	Joint Ministerial Statement – Extractive Resources – Rock Solid Foundations for Victoria’s Growth	“
189	“	Draft Strategic Extractive resource areas: Planning Controls	“
190	“	Strategic Extractive Resource Areas Pilot Project – Draft Report	“
191	“	Extractive Resources in Victoria: Demand and Supply Study 2015-2020 – Final Report (May 2016)	“
192	“	Plan Melbourne Policy 1.4.2	“
193	“	Clause 14.03-1S – VPA mark up	“
194	“	Clause 11.03-2S – VPA mark up	“
195	“	Clause 52.09 – VPA mark up	“
196	23/11/2020	VPA Memo - R19 proposed draft rewording - for discussion	“
197	“	Evidence in chief presentation - Mr Chris De Silva of Mesh Planning	Barro
198	24/11/2020	a) Email - Michael Asimakis to Harwood Andrews 23-11-20 - Re Quarry separation distance question b) Emails - Paul Torre and Michael Asimakis - Re Quarry separation distance question	VPA
199	“	Brief to Mr. Garrett Hall - Extractive Industries expert 10.09.20	Barro
200	“	PowerPoint presentation - Mr Aaron Harvey	“
201	25/11/2020	Email from Ponte to PPV – agreement signed and exchanged a) Term sheet agreement – 18.11.2020 (redacted)	“
202	“	Supplementary submission	VPA
203	26/11/2020	PowerPoint presentation - Dr. Iain Cowan	Barro

No.	Date	Description	Presented by
204	“	Phillips staging plans collection	1100 Donnybrook Rd
205	“	Email pursuant to which Barro Group’s response to Directions 6 & 7 (including Annexure 6 (e) (ii)) was provided to the Barro Group experts	Barro
206	27/11/2020	Email from Terrock Pty Ltd to I McLeod dated 28 October 2010	VPA
207	“	Boral - blasting evidence - Adrian Moore of Terrock - Mt Atkinson Amendment (Melton C162) - 2 September 2016	“
208	“	Terrock recommendations (28 October 2010)	“
209	“	Mount Atkinson Panel Report (Melton C162) - 9 December 2016	“
210	“	Email from Ponte to PPV re Darren Tardio follow-up matters from giving evidence on 26 November 2020: a) Email from Ponte to Tardio email dated 12 March, 2020 b) Email from Ponte to Tardio email dated 21 September, 2020 c) Draft WA6852_Stage 1_0920 Plan	Barro
211	“	Email from Ponte to PPV re Mr Adrian Moore re additional information a) BAC advice on WA6437 b) BAC advice on WA492 c) BAC advice on Phillips Quarry	“
212	“	Email from Dr Iain Cowan providing additional information on number of haul trucks on haul roads and setback from Phillips Quarry	“
213	“	a) Further Submission – response to request for information Lockerbie East DSS b) Attachment to submission - Lockerbie East DSS	VPA
214	29/11/2020	Email from Ponte to PPV re NDA Plans requested by Mr. Montebello: a) NDA: Boot/SUZ4 b) NDA: 200 metre Extraction Buffer	Barro
215	“	Submissions on behalf of Barro Group	“
216	30/11/2020	Approved boundary change for Biodiversity Conservation Area 28	“
217	“	PowerPoint Presentation - Overview of DJV FUS	DJV
218	“	PowerPoint Presentation - Mark Sheppard - Kinetica	“
219	01/12/2020	1992 Map of Phillips Access	“

No.	Date	Description	Presented by
220	“	Email from Ponte enclosing replacement document 215a a) NDA: Boot/SUZ4 <a href="#">BCA 01/12/2020</a>	Barro
221	02/12/2020	Contour Plan - Shenstone Park PSP Area	DJV
222	“	Contour Plan overlaid on the DJV FUS	“
223	“	Lockerbie East Drainage Service Scheme (DSS) Plan	“
224	“	Wetland RB-06 siting drawing with contours	“
225	“	Email from Ponte re redactions to CHMP a) Cultural Heritage Management Plan	Barro
226	“	Employment Land Calculation - Shenstone Park and NGCP?	DJV
227	“	Revised DJV FUS – November 2020	“
228	04/12/2020	DJV Closing Submissions	“
229	“	Draft Melbourne Industrial & Commercial Land Use Plan (MICLUP) - Summary of Submissions - April 2020	“
230	“	Submission on behalf of Donnybrook Road Unit Trust a) Appendix 1 – Table of issues raised in initial submission b) Appendix 2 – Original submission c) Appendix 3 - CHMP d) Appendix 4 – Allaf and evidence e) Appendix 5 – Title re-establishment survey	Donnybrook Road Unit Trust
231	07/12/2020	Email from Best Hooper to PPV re amendment to Appendix 1: a) Updated Appendix 1 (document 230a)	“
232	“	PowerPoint presentation prepared by Mr Luke Cunningham of Rain Consulting	“
233	“	Heritage citations – Raworth comparisons	DJV
234	“	Heritage citations – Helms comparisons	“
235	08/12/2020	Terrain Consulting Group - Submission for Prattico Construction	Prattico Construction
236	09/12/2020	Submission on behalf of Landream	Landream
237	“	Mark Woodland – Expert Evidence presentation	910 Donnybrook Road
238	“	Submissions on behalf of 910 Donnybrook Road Pty Ltd with attachments	“
239	11/12/2020	PowerPoint presentation prepared by Mr Tim Pollock	Yarra Valley Water

No.	Date	Description	Presented by
240	“	Yarra Valley Water’s Integrated Water Management Submission dated August 2020	“
241	“	Imagery of the Wallan and Aurora Treatment plants	“
242	“	Wollert Recycled Water Treatment Plant Service Area Plan dated 20 May 2014	“
243	“	Wollert Recycled Water Treatment Plant Constraints Plan prepared by Jacobs	“
244	“	Draft Plan of Subdivision PS741631E dated 10 September 2019	“
245	14/12/2020	Yarra Valley Urban Water Strategy 2017	“
246	“	Submission of Yarra Valley Water	“
247	“	Melbourne Water Response to Expert Witness Statement dated 14 December 2020	Melbourne Water
248	“	Email from PPV to Parties – key drafting issues	PPV
249	15/12/2020	Submission on behalf of Merri Creek Management Committee <ul style="list-style-type: none"> <li>a) Appendix I – GDE and Hydrology of Upper Merri and Darebin Creek</li> <li>b) Appendix II – DELWP Upper Merri Creek Regional Parklands agenda dated 25 February 2020</li> <li>c) Appendix – Kerb Inlet Sediment Traps</li> </ul>	Merri Creek Management Committee
250	“	Email from Panel regarding proposed directions	PPV
251	“	Letter from Minister of Planning regarding fast-track program dated 03 August 2020	VPA
252	“	Email from PPV to Hall & Wilcox - order of witnesses	PPV
253	“	Email from Hall & Wilcox - order of witnesses	1100 Donnybrook Rd
254	“	Email from Gadens regarding proposed directions	DJV
255	16/12/2020	Addendum 1 – Alex Hrelja – Economic Value of Future Residential Area	1100 Donnybrook Rd
256	“	Quarry Buffer Plans: <ul style="list-style-type: none"> <li>a) Plan 1</li> <li>b) Plan 2</li> <li>c) Plan 3</li> <li>d) Plan 4</li> </ul>	“
257	“	Letter to Department of Transport dated 14 December 2020	“
258	“	Email from DoT to Henry Turnbull dated 15 December 2020	“

No.	Date	Description	Presented by
259	“	Email from PPV to Parties – various matters	PPV
260	17/12/2020	Submissions on behalf of 1100 Donnybrook Rd: a) Attachment A – Cowan XN, slides b) Attachment B – Cowan XXN c) Attachment C – Asimakis XXN	1100 Donnybrook Rd
261	“	Whittlesea Epping Basalt Quarry Permit 704078 (Call-In)	“
262	“	Mitchell C106mith - Beveridge North West PSP Panel Report[2020] PPV 73	“
263	“	Plan_Melbourne_2017-2050_Strategy	“
264	“	Melton C162 - Mt Atkinson and Tarneit Plains PSP Panel Report [2016] PPV 154 (9 December 2016)	“
265	“	Greater Geelong C372 - Hams Road, Waurn Ponds subdivision Panel Report [2019] PPV 58	“
266	“	Hume C207 and C208 - Sunbury South and Lancefield Road PSPs Panel Report [2017] PPV 138	“
267	“	Hume Planning Scheme Clause 37.07, Schedule 9 (UGZ9)	“
268	“	Moorabool C81 - Bacchus Marsh District UGF Panel Report [2018] PPV 83	“
269	“	Whittlesea C188 - Quarry Hills PSP Panel Report [2016] PPV 44	“
270	“	EPA Guideline 1518 Recommended separation distances for industrial residual air emissions (2013)	“
271	“	Zumpano v Banyule City Council [2016] VSC 420	“
272	“	Email from Hall & Wilcox regarding submissions	“
273	“	Corrected submissions on behalf of 1100 Donnybrook Rd	“
274	18/12/2020	Email from Harwood Andrews to PPV and parties re without prejudice Part C ordinance and PSP	VPA
275	“	Without prejudice Part C – tracked changes: a) Schedule 7 to Clause 37.07 – Urban Growth Zone – tracked changes b) Schedule to Clause 66.04 – Referral of permit application under local provisions – tracked changes c) Schedule 8 to Clause 4.03 – Incorporated plan overlay – tracked changes	“
276	“	Submitter proposed wording change to Planning Scheme ordinance and PSP	“
277	21/12/2020	Submission on behalf of Golina Holdings Pty Ltd a) Appendix 1 – Table of issues raised in initial submission	Golina Holdings Pty Ltd

No.	Date	Description	Presented by
		b) Appendix 2 – Certificate of Title and Plan of Subdivision	
278	“	Email from PPV to Parties re Closing submission for Council	PPV
279	22/12/2020	Donnybrook Unit Trust response to Part C materials circulated by the VPA	Donnybrook Road Unit Trust
280	“	Golina Holdings Pty Ltd response to Part C materials circulated by the VPA	Golina Holdings Pty Ltd
281	“	Covering memo and contour map prepared by Mr Tim Marks	1100 Donnybrook Rd
282	“	Submission in reply on behalf of Whittlesea City Council	Whittlesea City Council
283	“	Affordable Housing Policy Whittlesea Planning Scheme	“
284	“	Proposed wording and change to PSP and Planning Scheme Ordinance on behalf of submitter 3	Prattico Construction
285	“	1100 Donnybrook Rd proposed wording changes to planning scheme ordinance and PSP	1100 Donnybrook Rd
286	“	Head Transport for Victoria Supplementary Submission	DoT
287	“	Barro Group Reply Submissions (with attachments)	Barro
288	23/12/2020	VPA Part C submission: <ul style="list-style-type: none"> <li>a) Attachment 1 Beveridge North West PSP Panel Hearing Document 266 – Sodic Dispersive Soils Development Precedents</li> <li>b) Attachment 2 Mountain View Quarry Extension Assessment under Environment Effects Act 1978 Minister for Planning September 2009</li> <li>c) Attachment 3 Joint Ore Resources Committee (JORC) Code 2012 Edition</li> <li>d) Attachment 4 Letter from DJPR to VPA – Resource Groups Submission, 4 April 2019</li> <li>e) Appendix 1 Submissions Response Table</li> </ul>	VPA
289	“	Barro Group proposed wording changes to PS and PSP	Barro
290	“	Email from Gadens to PPV and Parties expressing concern about introduction of new matters	DJV
291	“	DJV response to Part C Documents	“
292	“	910 Donnybrook - Proposed wording changes to Planning Scheme ordinance and PSP Part C: <ul style="list-style-type: none"> <li>a) Attachment A - indicative Part C buffer impact 910 Donnybrook Road</li> </ul>	910 Donnybrook Road
293	“	City of Whittlesea proposed wording or changes to Planning Scheme ordinance and PSP	Whittlesea City Council

No.	Date	Description	Presented by
294	“	1030 Donnybrook Road Part C response	Satterley Property Group
295	“	1030 Donnybrook Road - Submitter 22 - approved CHMP	“
296	“	Yarra Valley Water’s response to the VPA’s Part C documents	Yarra Valley Water
297	12/01/2021	PSP - VPA without prejudice drafting response	VPA
298		Ordinance – VPA without prejudice drafting response	“

## **Appendix B Memo from VPA**

**From:** Stuart Moseley (VPA) <[Stuart.Moseley@vpa.vic.gov.au](mailto:Stuart.Moseley@vpa.vic.gov.au)>  
**Sent:** Tuesday, March 2, 2021 12:41 pm  
**To:** Kathryn A Mitchell (DELWP)  
**Cc:** Tess Pickering; Dana Kushnir  
**Subject:** Whittlesea Amendment C241wsea - Shenstone Park Precinct Structure Plan (PSP) - Panel Report – Matters Requiring Clarification

Dear Kathy

I refer to the recent report of Planning Panels Victoria (PPV) of the Whittlesea Amendment C241wsea Shenstone Park PSP to the Victorian Planning Authority (VPA).

The VPA thanks the Panel for the timely completion of the report.

I take this opportunity to ask whether the Panel is willing to clarify some minor matters relating to the recommendations contained within the Panel Report as listed in **Attachment 1**.

This would assist the VPA to ensure that the Panel's recommended changes are understood, and can be readily implemented, in their entirety.

Should you have any further questions, do not hesitate to contact me or Dana Kushnir, Planner – Planning Services on 9651 9664 or at [dana.kushnir@vpa.vic.gov.au](mailto:dana.kushnir@vpa.vic.gov.au).

Thank you for your consideration of this request.

Regards

Stuart

**Stuart Moseley | Chief Executive Officer**

I am working remotely and am available to connect on MSTeams or other platforms.

T: 03 9651 9620 | M: 0418 844 934



The VPA acknowledges the Traditional Owners of Country throughout Victoria and pay our respects to them, their Elders past and present. My personal commitment is to plan for great places that are welcoming and inclusive of all people.

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**ATTACHMENT 1****AMENDMENT C241WSEA SHENSTONE PARK PSP PANEL REPORT:  
MATTERS REQUIRING CLARIFICATION**

<b>Matter</b>	<b>Clarification requested</b>
<b>Recommendation 2</b> – The Panel has recommended the deletion of the HO to 1030 Donnybrook Road. However, there is no mention of deleting other heritage provisions in UGZ7. This includes application requirements in Section 3.0 in relation to Subdivision Residential Development and Heritage Places.	VPA seeking clarification whether the intent is to delete additional heritage provisions in UGZ7 relating to 1030 Donnybrook Road.
<b>Recommendation 9</b> – The Panel recommended amending the UGZ7 application requirement and decision guideline to that specified in the VPA’s Part A UGZ. The Panel also supported the approach in the VPA’s Part B submission in relation to the guideline contained within the PSP. It then also made a recommendation to amend this guideline as per the Part C PSP. The Panel Report also makes commentary about the Beveridge North West Panel’s recommendation, which the Panel supported taking a consistent approach with. It is noted however, that as per the Part A and Part B Submissions Summary Table, the VPA acknowledged they were awaiting the Beveridge North West Panel Report and therefore the position put forward during the Part A and Part B are inconsistent with that of the Beveridge North West Panel Report.	VPA seeking clarification on whether the provisions within UGZ7 and PSP guidelines should be consistent with the recommendations of the Beveridge North West Panel Report, or the VPA’s Part A/B version presented as part of the Shenstone Park Panel.
<b>Recommendation 14</b> – The Panel has recommended updating Plan 3 Future Urban Structure (FUS) with a number of items. A recommendation should also be inserted to amend Plan 1 (Section 1.0) of UGZ7 to be consistent with the recommendations of Recommendation 14.	VPA seeking clarification on whether Plan 1 (Section 1.0) of the UGZ7 is to be amended to be consistent with Recommendation 14.
<b>Recommendation 14a</b> – The Panel recommended amending the FUS to reduce the eastern expansion area. There is no subsequent recommendation to change the zoning map to be consistent with this extent of extractive industry, i.e. to change the extent of the Special Use Zone 4 area to UGZ7.	VPA seeking clarification on whether the zoning map is to be amended to be consistent with Recommendation 14a.
<b>Recommendation 15b</b> – The Panel recommended amending the boundaries of Conservation Area 28 as approved by DELWP. The Panel does not include a recommendation to amend the zoning map to reflect this change too. Noting that the additional Conservation Area 28 should be zoned as Schedule 1 to the Rural	VPA seeking clarification as to the Panel’s recommendations associated with updates required to the zoning and IPO map as a result of the recommendation relating to amended boundary of Conservation Area 28.

<p>Conservation Zone (RCZ1) and the area to be deleted to be in UGZ7. The same applies for the application of Schedule 9 to the Incorporated Plan Overlay (IPO9) map which needs to be amended to reflect these changes.</p>	
<p><b>Recommendation 17d</b> – The Panel recommended removing publicly accessible areas such as roads, cycle and pedestrian paths and open space along drainage corridors from within the Blast Buffers.</p>	<p>VPA seeking clarification on whether the word remove be changed to relocate. That is, relocate publicly accessible areas outside the 200m blast buffer.</p> <p>As a consequence of 17d, does this mean that shared use paths should not follow the drainage corridor if the drainage corridor is inside the blast buffer? Does this also mean the shared use trail is preferred to be located to bisect developable employment land?</p>
<p><b>Recommendation 19</b> – The Panel recommended amending Table 1 Applied Zones of UGZ7. There is no indication to change the designation of the utility facility in this table. It is noted later in the report, but not specifically recommended at any point. In addition, the recommendation should demonstrate that the applied zone for the utility facility west of Langley Park Drive be Industrial 3 Zone (IN3Z) and the applied zone for the utility facility east of Langley Park Drive be Industrial 1 Zone (IN1Z).</p>	<p>VPA seeking clarification as to whether to amend Table 1 Applied zones in the UGZ7 to update the designation of the utility facility, and the appropriate applied Industrial zones.</p>
<p><b>Recommendation 21</b> – The Panel recommended including the Phillips Quarry blast buffer within the application of the blast buffer permit trigger of UGZ7. VPA understands this to ensure that development of the Wollert Recycled Water Treatment Plant is not compromised by blast buffer provisions in the UGZ7. The VPA also notes that the Phillips Quarry blast buffer also applies to area to the south of the precinct comprising the conservation area, a small portion of industrial land and land set aside to provide for the connection between the two quarries.</p> <p>The treatment plant is located outside of the PSP area and the UGZ7 area, located within the RCZ1, and therefore the blast buffer provision does not apply to this land. It is noted however, that the southern extent of the Phillips Quarry blast buffer will impact on land within the PSP, and the recommended provisions would apply to those areas.</p>	<p>VPA seeking clarity as to whether the Panel acknowledges that the UGZ7 blast buffer permit trigger within the Phillips Quarry blast buffer only applies to a small area of land to the south of the precinct, and not to land identified as the Wollert Recycled Water Treatment Plant outside of the precinct.</p> <p>The VPA also seeks clarification on recommendations of how it can within the powers and extent of the current amendment implement this provision to the land where the water treatment plan is proposed, if that is the intent.</p>
<p><b>Recommendation 22</b> – The Panel recommended amending the acoustic application area application requirement to be</p>	<p>VPA seeking clarity as to whether the acoustic report application requirement is</p>

<p>named as an acoustic report for development within the Woody Hill and Phillips Sensitive Use Buffer. The provision as drafted for the Part C version is that the application requirement is applicable to the acoustic application area (beyond the Woody Hill Sensitive Use Buffer), where uses such as accommodation, child care centre, display home, hospital, hotel or bar are permissible under the UGZ7 and the applied zone. However, the Panel has recommended in this instance that the acoustic report apply to development (for those uses listed above) within the Woody Hill Sensitive Use Buffer. The VPA notes however, that these uses under UGZ7 and the applied zones in this area (i.e. IN1Z, IN3Z and C2Z) are not permissible, and hence the provision is redundant with respect to the Woody Hill Sensitive Use Buffer. Noting that the Phillips Quarry Sensitive Use Buffer allows for these uses and therefore the matter for clarification is only in relation to the Woody Hill Sensitive Use Buffer.</p>	<p>required for development (as listed) within the Woody Hill Sensitive Use Buffer.</p>
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