## State code 5: Development in a state-controlled transport tunnel environment

Table 5.2.1: Development in a state-controlled tunnel environment

| **Performance outcomes** | **Acceptable outcomes** | **Response** |
| --- | --- | --- |
| Buildings and structures | | |
| PO1 The location of buildings, structures, infrastructure, services and utilities does not cause damage to a state-controlled transport tunnel, or obstruct state-controlled transport tunnel infrastructure. | **AO1.1** Buildings, structures, infrastructure, services and utilities are not located on land identified as a state-controlled transport tunnel.  AND | *Complies with PO# / AO#*  *Use this column to indicate whether compliance is achieved with the relevant PO or AO (or if they do not apply), and explain why* |
| AO1.2 Buildings, structures, infrastructure, services and utilities can be maintained without requiring access to land identified as a state-controlled transport tunnel. |  |
| **PO2** Buildings, structures, infrastructure, services and utilities do not interfere with, or result in damage to, infrastructure or services in a state-controlled transport tunnel.  Note: Information on the location of services and public utilities in a state-controlled transport tunnel can be obtained from the railway manager and/or Dial Before You Dig service.  Where development will impact on a service or public utility plant in a state-controlled transport tunnel, such that the service or public utility plant will need to be relocated, an applicant should contact the relevant service or public utility plant provider for standards and design specifications for the alternative alignment. Any costs of relocation are to be borne by the developer. | No acceptable outcome is prescribed. |  |
| **PO3** Buildings, structures, infrastructure, services and utilities do not add or remove loading that will cause damage to a state-controlled transport tunnel or state-controlled tunnel infrastructure.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO4** Buildings, structures, infrastructure, services and utilities do not cause ground movement or vibration impacts that would cause damage or nuisance to a state-controlled transport tunnel or state controlled transport tunnel infrastructure.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO5** Buildings, structures, infrastructure, services and utilities do not cause ground water disturbance on land for a state-controlled transport tunnel.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment, is provided. | No acceptable outcome is prescribed. |  |
| Filling, excavation and retaining structures | | |
| **PO6** Filling, excavation and retaining structures do not interfere with, or result in damage to, infrastructure or services in a state-controlled transport tunnel.  Note: Information on the location of services and public utilities in a state-controlled transport tunnel can be obtained from the railway manager and/or Dial Before You Dig service.  Where development will impact on a service or public utility plant in a state-controlled transport tunnel, such that the service or public utility plant will need to be relocated, an applicant should contact the relevant service or public utility plant provider for standards and design specifications for the alternative alignment. Any costs of relocation are to be borne by the developer. | No acceptable outcome is prescribed. |  |
| **PO7** Filling, excavation, building foundations and retaining structures do not undermine or cause subsidence of land for a state-controlled transport tunnel.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO8** Excavation, boring, piling or fill compaction during construction of a development does not result in ground movement or vibration impacts that would cause damage or nuisance to a state-controlled transport tunnel.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO9** Development does not involve blasting. | No acceptable outcome is prescribed. |  |
| **PO10** Filling and excavation, building foundations and retaining structures do not cause damage to a state-controlled transport tunnel by adding or removing loading.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO11** Filling and excavation, building foundations and retaining structures do not cause ground water disturbance to a state-controlled transport tunnel corridor.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO12** Fill material from a development site does not result in contamination of a state-controlled transport tunnel corridor. | **AO12.1** Fill material is free of contaminants including acid sulfate content.  Note: Soil and rocks should be tested in accordance with AS 1289 – Methods of testing soils for engineering purposes and AS 4133 2005 – Methods of testing rocks for engineering purposes.  AND |  |
| **AO12.2** Compaction of fill is carried out in accordance with the requirements of AS 1289.0 2000 – Methods of testing soils for engineering purposes. |  |
| **PO13** Filling and excavation in the vicinity of a state-controlled transport tunnel portal does not cause wind-blown dust nuisance in a state-controlled transport tunnel. | **AO13.1** Compaction of fill is carried out in accordance with the requirements of AS 1289.0 2000 – Methods of testing soils for engineering purposes.  AND |  |
| **AO13.2** Dust suppression measures are used during filling and excavation activities such as wind breaks or barriers and dampening of ground surfaces. |  |
| **PO14** Filling and excavation material does not cause damage, obstruction or nuisance in a state-controlled transport tunnel corridor. | **AO14.1** Development does not store fill, spoil or any other material in a state-controlled transport tunnel corridor. |  |
| Stormwater and drainage | | |
| **PO15** Development does not result in an actionable nuisance or worsening of stormwater, flooding or drainage impacts in a state-controlled transport tunnel corridor or a state-controlled transport tunnel. | No acceptable outcome is prescribed. |  |
| **PO16** Run-off from the development site during construction of development does not cause siltation of stormwater infrastructure affecting a state-controlled transport tunnel. | **AO16.1** Run-off from the development site during construction is not discharged to stormwater infrastructure for a state-controlled transport tunnel. |  |
| **PO17** Development does not cause damage to tunnel drainage structures. | No acceptable outcome is prescribed. |  |
| Access | | |
| **PO18** Vehicular access to a development is not from a state-controlled transport tunnel. | No acceptable outcome is prescribed. |  |
| **PO19** Development does not obstruct or impede existing access to a state-controlled transport tunnel. | **AO19.1** Development is designed and sited to ensure existing authorised access points and access routes for maintenance and emergency works to a state-controlled transport tunnel are clear from obstructions at all times. |  |
| Network safety | | |
| **PO20** Development involving dangerous goods adjacent to a state-controlled transport tunnel corridor does not adversely impact on the safety or operations of a state-controlled transport tunnel.  Note: Development involving dangerous goods, or hazardous chemicals above the threshold quantities listed in table 5.2 of the Model Planning Scheme Development Code for Hazardous Industries and Chemicals, Office of Industrial Relations, Department of Justice and Attorney-General, 2016, should demonstrate that impacts on a state-controlled transport tunnel from a fire, explosion, spill, gas emission or dangerous goods incident can be appropriately mitigated. | **AO20.1** Development does not involve handling or storage of hazardous chemicals above the threshold quantities listed in table 5.2 of Model Planning Scheme Development Code for Hazardous Industries and Chemicals, Office of Industrial Relations, Department of Justice and Attorney-General, 2016. |  |
| Air and light | | |
| **PO21** Development involving an accommodation activity located near a state-controlled transport tunnel portal minimises air quality impacts from a state-controlled transport tunnel in outdoor spaces for passive recreation. | **AO21.1** Each dwelling has access to an outdoor space for passive recreation which is shielded from a state-controlled transport tunnel portal by a building, solid gap-free fence, or other solid gap-free structure. |  |
| **PO22** Development involving a:   1. child care centre; or 2. educational establishment   located near a state-controlled transport tunnel portal minimises air quality impacts from a state-controlled transport tunnel in outdoor education areas and outdoor play areas. | **AO22.1** Each outdoor education area and outdoor play area is shielded from a state-controlled transport tunnel portal by a building, solid gap-free fence, or other solid gap-free structure. |  |
| **PO23** Development involving an accommodation activity or hospital located near a state-controlled transport tunnel portal minimises lighting impacts from a state-controlled transport tunnel. | **AO23.1** Buildings for an accommodation activity or hospital are designed to minimise the number of windows or transparent/translucent panels facing a state-controlled transport tunnel portal.  OR |  |
| **AO23.2** Windows facing a state-controlled transport tunnel include treatments to block light from state-controlled transport tunnel portal. |  |

Table 5.2.2: Development impacting on a future state-controlled tunnel environment

| **Performance outcomes** | **Acceptable outcomes** | **Response** |
| --- | --- | --- |
| **PO24** Development does not impede the delivery of a future state-controlled transport tunnel. | AO24.1 Development is not located on land identified as a future state-controlled transport tunnel corridor.  OR | *Complies with PO# / AO#*  *Use this column to indicate whether compliance is achieved with the relevant PO or AO (or if they do not apply), and explain why* |
| AO24.2 Development is sited and designed so that permanent buildings, structures, infrastructure, services or utilities are not located on land identified as a future state-controlled transport tunnel. |  |
| OR all of the following acceptable outcomes apply:  AO24.3 Structures and infrastructure located on land identified as a future state-controlled transport tunnel are able to be readily relocated or removed without materially affecting the viability or functionality of the development.  AND |  |
| AO24.4 Development does not involve filling and excavation of, or material changes to, land identified as a future state-controlled transport tunnel.  AND |  |
| AO24.5 Land is able to be reinstated to the pre-development condition at the completion of the use. |  |
| **PO25** Filling and excavation, building foundations and retaining structures do not obstruct, undermine, or cause subsidence of land for a future state-controlled transport tunnel.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided, prepared in accordance with volume 3 of the Road Planning and Design Manual 2nd edition, Department of Transport and Main Roads, 2016. | No acceptable outcome is prescribed. |  |
| **PO26** Filling and excavation, building foundations and retaining structures do not cause damage to land for a future state-controlled transport tunnel by adding or removing loading.  Note: To demonstrate compliance with this performance outcome, it is recommended a RPEQ certified geotechnical assessment is provided. | No acceptable outcome is prescribed. |  |
| **PO27** Fill material from a development site does not result in contamination of land for a future state-controlled transport tunnel. | **AO27.1** Fill material is free of contaminants including acid sulfate content.  Note: Soil and rocks should be tested in accordance with AS1289 – Methods of testing soils for engineering purposes and AS4133 2005 – Methods of testing rocks for engineering purposes.  AND |  |
| **AO27.2** Compaction of fill is carried out in accordance with the requirements of AS1289.0 2000 – Methods of testing soils for engineering purposes. |  |
| **PO28** Development does not result in an actionable nuisance or worsening of stormwater, flooding or drainage impacts on land for a future state-controlled transport tunnel. | No acceptable outcome is prescribed. |  |