2025 Methodology Review
Draft Report Addendum - Transport Assessment

Tasmanian Government Submission

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Department of Treasury and Finance

Tasmanian Government

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1 Introduction

On 1 August 2024, the Commonwealth Grants Commission (Commission) provided an addendum to its Draft Report for the 2025 Methodology Review (Draft Report) pertaining to the transport assessment (transport addendum).

This document provides Tasmania's response to the proposed transport methodology laid out in the transport chapter of the Draft Report and in the transport addendum.

The Commission has flagged its intention to issue a further addendum to the Draft Report for the mining revenue assessment. Tasmania will comment on this assessment category in a subsequent submission once the addendum has been provided.

Tasmania is broadly supportive of the Commission's proposed changes to the transport assessment. Tasmania also notes the Commission's recognition of states' concerns with the current urban transport model and supports its intention to seek external advice on the transport assessment prior to the next review.

2 Transport

The Tasmanian Government Submission to the transport consultation paper included comments on the Commission's proposals relating to population-weighted density and the blending ratio.

In the transport addendum, the Commission has proposed to apply the following changes to the transport assessment:

- replace the current Australian Bureau of Statistics (ABS) Statistical Area 1 (SA1) based measure of population-weighted density with a measure based on the square kilometre grid;
- adjust 2016 passenger numbers using Bureau of Infrastructure, Transport and Research Economics (BITRE) data on passenger kilometres;
- use a regression to model passenger numbers;
- temporarily increase the blending ratio by 10 percentage points to 65 per cent urban centre characteristic and 35 per cent urban population for recurrent expenses to account for data issues related to COVID-19. Once fit for purpose 2026 Census data become available in 2028, the blending ratio will return to the 75:25 split;
- retain the current blending ratio of 75 per cent urban centre characteristic and 25 per cent urban population for the urban transport investment assessment; and
- re-classify pipeline transport to the non-urban transport category.

The transport assessment is split into urban and non-urban components. Tasmania supports the Commission's proposal to retain the 2020 methodology for assessing non-urban transport and is broadly supportive of the Commission's proposed changes to the urban transport assessment methodology.

2.1 Urban transport model - recurrent expenses

In the 2020 Methodology Review, the Commission introduced a regression model to identify the urban centre characteristics which drive state and territory (state) expenditure on urban transport. The identified characteristics included demand for public transport, transport supply by mode, unique jurisdictional characteristics, topography and network complexity.

2.1.1 Population-weighted density

The urban centre characteristics model uses population-weighted density as a proxy for public transport demand. In its response to the Commission's Tranche 1 consultation paper, Tasmania expressed concerns with the population-weighted density variable as it may overstate urban transport expenses for larger cities. Tasmania argued that the significantly higher population-weighted densities in larger cities such as Sydney and Melbourne could result in lower per capita urban transport costs due to economies of population density. That is, per capita costs fall as the population-weighted density of an area rises.

In the draft 2025 transport methodology, the Commission has proposed to move to a square kilometre grid to calculate population density. This will address the issue of volatility

in SA1 land areas and provide a consistent measure of population density by ensuring the geographic area remains constant and only the population varies. Thus, it ensures that the population-weighted density measure is not altered over time because of changes in the size of the geographic area.

This may to some extent address Tasmania's concern that the current population density variable potentially overestimates urban transport need in larger cities.

> *The Commission notes that the proposed change to the method used to calculate population-weighted density will provide a more consistent measure of density across urban centres and will mitigate the influence of Sydney in the regression.*[1]

Tasmania therefore supports the Commission's position to change the geographic area for determining population density from the current SA1-based measure to a square kilometre grid.

2.1.2 Blending ratio

The current methodology blends the effects of urban centre characteristics with state shares of urban area population. Urban centre characteristics are given a weight of 75 per cent and urban population share is given a weight of 25 per cent.

Two key inputs into the urban centre characteristics model have been significantly impacted by COVID-19. These inputs include urban transport net expense data and passenger numbers by mode of transport (heavy rail, light rail and bus).

Expenditure data for urban transport are provided by states to populate the dependent variable in the urban centre characteristics model. The current methodology incorporates three years of data from 2013-14 to 2015-16.

Under ordinary circumstances, expenditure data would be updated using the most recently available data on state activities. However, the Commission considers that state data from 2019-20 to 2021-22 are unlikely to reflect typical urban transport expenses and are therefore unsuitable for use in the urban centre characteristics regression model.

As such, in the transport addendum, the Commission has re-estimated the regression based on the proposed methodology and a single year of state expenditure data for 2022-23.

However, the Commission has acknowledged that the effects of COVID-19 may still be apparent in the 2022-23 data and provided the following comment:

> *The Commission recognises some issues remain regarding the reliability and comparability of state-provided data on expenses in each Significant Urban Area. For example, total reported expenses in 2022-23 are only around 55 per cent of the Government Finance Statistics estimate of urban transport expenses. However, these remain the best available data, and the Commission considers that the proposed assessment captures the differences in state needs for urban transport spending more appropriately than any identified alternative.*[2]

To mitigate this issue, the Commission has stated its intention to collect 2023-24 net expense data and incorporate it into the model in the 2026 Update.

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[1] Commonwealth Grants Commission 2025 Methodology Review - Draft Report, Transport Chapter, Paragraph 126.
[2] Commonwealth Grants Commission 2025 Methodology Review - Draft Report, Addendum - transport assessment, Paragraph 8.

Passenger numbers are incorporated into the urban centre characteristics model to capture the supply or level of public transport services and as a proxy for urban congestion. Actual public transport passenger numbers are sourced from ABS census journey to work data.

The 2021 Census was conducted during the COVID-19 pandemic, at a time when stay-at-home restrictions affected a significant portion of the population. The Commission and all states have agreed that 2021 Census journey to work data are not fit for purpose.

To overcome this data issue, the Commission has proposed to index 2016 Census passenger data using BITRE data on passenger kilometres travelled. BITRE data on passenger kilometres travelled are collected quarterly on a national basis. The Commission considers that the adjustment will help account for changing public transport use patterns following COVID-19 until 2026 Census data become available.

In the draft 2025 transport methodology, the Commission considers there to be a case to temporarily moderate the impact of the urban centre characteristics model until fit for purpose passenger data become available. Accordingly, the Commission has proposed a temporary adjustment to the blending ratio that would reduce the weight placed on the urban centre characteristics model by 10 percentage points, with a corresponding increase in the weight placed on urban population shares. Once passenger numbers have been updated using 2026 Census data (most likely as part of the 2028 Update), the Commission will consider whether the temporary increase in blending should be removed.

Tasmania notes that the data issues arising from COVID-19 are likely to have ongoing impacts on the transport assessment until the next Methodology Review. Passenger numbers will be impacted until at least the 2028 Update, when 2026 Census data are likely to be available. Net expense data will be impacted until the Commission is able to collect three years of fit for purpose expense data from states, which is unlikely to occur until the next Methodology Review.

Tasmania supports the Commission's proposal to temporarily adjust the blending ratio. However, Tasmania would suggest that, given the issues with 2022-23 expenditure data and the inability to use three years of reliable data in the regression model during this review period, it may be prudent to retain the increased blending ratio until the next Methodology Review.

2.2 Urban transport model - investment expense

The urban transport investment assessment is a blended assessment of state shares of the square of urban population and the urban centre characteristics model developed for the assessment of urban transport recurrent expenses.

Under the current methodology, urban population squared is given a weight of 25 per cent and urban centre characteristics are given a weight of 75 per cent.

Tasmania supports the Commission's proposal to retain the existing 25 per cent and 75 per cent blending proportions.

3 Acronym Table

Acronym	Definition
ABS	Australian Bureau of Statistics
BITRE	Bureau of Infrastructure, Transport and Research Economics
SA1	Statistical Area 1