

Council Guideline

Bus Layover Parking

Version 1



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Introduction

Bus layover parking is a place where driver's park buses between services and may be situated on-street or off-street. The time a bus spends in a layover can vary from a few minutes to approximately an hour depending on the purpose of the layover.

The location of bus layover parking, as well as the number of layover spaces at each location, has a direct impact on how the bus network is scheduled. The more options for layover the more efficient a network schedule can be.

As more buses are added to the network there is an increased demand for layover space. At the same time, development, deliveries and increasing traffic are competing for on-street space.

Changes to the public transport network, such as the introduction of on-demand services, will impact on scheduling, and therefore, layover requirements. In order to adapt to a changing network environment, bus layover parking will need to be responsive.

Purpose

The Planning for Bus Layover Parking Guidelines has been developed to provide guidance to the community, operators and Council staff on how to plan and design bus layover areas, including preferred locations for these facilities.

Scope

This Guideline covers:

- strategic principles for planning layover areas
- the types of bus layover areas and when they are required
- guidance on design and location of layover areas
- the review and evaluation of the guideline

Guidelines

Strategic Principles

The strategic principles provide an overarching framework for the performance of bus layover parking, with a focus on flexibility and adaptability to cater for future requirements. Further considerations may need to be made for individual sites.

The location of the bus layover supports productive places

Bus layover is required where a service terminates, where recovery time is scheduled, or where a meal break is scheduled. The location of bus layover can have a direct impact on the amenity, liveability and economic success of places.

The location of bus layover should support productive places. Consideration should be given to locating layover areas outside of economic centres, where compact form and walkability are key features. Where layover is located within an economic centre, it should be located away from streets with high levels of active frontages and areas of high pedestrian activity.

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Within economic centres, options to minimise the footprint of the layover should be thoroughly investigated.

Layover is a function of service delivery

Bus layover exists to enable service delivery. The customer and service requirements should be established first, with bus layover requirements determined to enable service delivery.

Bus layover requirements need to be reviewed each time the bus network is reviewed.

Transport Operators are required to undertake bus layover planning and requirements as part of their contractual agreement with Transport for NSW. Council can provide an advocacy role in sharing any bus layover issues or concerns with transport operators and Transport for NSW.

Layover areas are flexible and adaptable for future requirements

The needs for bus layover areas change depending on land use changes, increased demand for land in some areas, and the changing nature of the bus network. While permanent layover may always be required in some locations, layover should remain flexible and adaptable.

Types of bus layover areas

Layovers range from on-street with no facilities, to off-street with dedicated facilities. There are three main reasons for layover areas, which will inform the type of layover required:

- short term: generally used for 1 to 15 minutes between services, required for recovery time and facilitates service reliability. Access to facilities is advantageous.
- meal breaks: a minimum of 30 minutes for the purpose of the driver taking a rest break for driver safety. Facilities are required.
- stand by: a place for stand by buses to wait until called into service, primarily used for demand management and service reliability, e.g. major events.

Buses may layover at bus stops or bus zones at commencement and termination stops only. Where considered necessary, on-street bus layover parking can be provided at other locations with the use of appropriate signage. Alternatively, off-street layover may be used. The need for bus layover areas may be temporary or permanent.

When is a layover required?

Layover is necessary when a bus is required to wait between services, either for recovery or meal breaks. Buses can layover at commencement and termination stops, when this does not cause disruption to other services.

When disruption may occur as a result of services laying over at a stop, alternate layover options should be considered. On-street bus layover parking, with signage, is appropriate where sufficient space can be allocated to accommodate the number of buses likely to operate from the location and local amenity is not adversely affected.

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On-street layover should be minimised along streets with busy, active street frontages and best reflect the requirements of the location. Off-street layover is used where sufficient on-street layover cannot be provided or is not appropriate. Layover requirements may be met through a combination of on-street and off-street layover. Layover should make the most productive use of the space and this may change based on the day and the time of day.

Temporary layover may be required during major construction projects, for example when buses replace rail services during rail closures or on an ad hoc basis, such as special events.

Design and location of layover areas

Location of layover areas

The location of layover has a significant impact on service delivery. The location of layover influences service arrangements and network design, as well as resources required to operate the service. To determine the optimal location of layover and capacity requirements, an unconstrained network design needs to be developed.

Bus network solutions are developed with known constraints taken into consideration, such as location of existing layover and number of layover spaces. An unconstrained solution will identify the optimal location of layover, and the number of spaces required. From an unconstrained solution it is possible to identify options for layover and realistic solutions.

Transport operators are responsible for determining optimal locations for bus layover areas.

The following factors should be considered when determining the location of a layover:

- aim to minimise bus circulation
- stand by layovers need to be in close proximity to the location it is serving
- cost and efficiency
- where on-street layover is used, smaller layover in a number of locations may better support productive places
- Layover locations must be safe and minimise the impact on traffic and pedestrian movements
- Within the layover area, safe walking routes must be provided for staff
- Layover areas must be sensitive to local land use
- Buses are permitted to idle for two minutes, after which they are required to turn off their engines
- Layover locations should consider future land use changes

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Minimising layovers in economic centres

It is desirable to minimise layover areas within economic centres, however the requirement for movement needs to be considered alongside the amenity of the area to achieve an appropriate balance. Changes to service scheduling should be considered to reduce the need for layover areas in these critical locations.

Services can be scheduled to 'through run' in economic centres. Consideration needs to be given to the impact of 'through running'.

Factors to consider include:

- road network
- type of service
- service reliability
- service length
- operational cost
- impact to recovery time

Through running also needs to consider whether services are operating in a contra-peak direction for any part of the trip. The cost of running a contra-peak service with no passenger benefit, in order to layover at the terminating stop, may not be justifiable. For short term layover, a number of smaller layover spaces constructed in multiple locations might be more advantageous than a single large layover within an economic centre.

On-Street Layover requirements

Where considered necessary, on-street bus layover parking can be provided at locations other than the bus stop with the use of appropriate signage. The length of the bus layover parking to be provided should be decided based on the number of buses likely to operate from the location. Similarly, the route commencement or termination bus stop or bus zone length should also consider the likely demand for the layover.

The minimum lengths for draw in and draw out are shown in the table below.

Table: Minimum Bus Draw In and Draw Out Lengths

Type of bus	Length (metres)	Min. draw-in length (metres)	Min. draw-out length (metres)	Length for one bus (metres)
Standard	12.5	11.5	6.0	30.0
(inc double decker)				
Long Rigid	14.5	14.0	6.5	35.0
Articulated	18.0	14.0	8.0	40.0

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Glossary

bus layover	Where drivers park buses and prepare services between journeys
bus stop	A place where public buses stop to pick up or set down passengers
contra-peak	Refers to public transport services running in the opposite direction to the direction of the highest passenger volumes
layover	A scheduled break for driver and vehicle between trips, and the recovery time scheduled to ensure on-time departure.
layover parking	A place to park buses during scheduled breaks, between services and during scheduled recovery time
meal break	National driving hour regulations require bus drivers to have minimum periods of rest based on the number of hours they are working – these are generally referred to as meal breaks and most bus driver awards require a minimum of 30 minutes in order to be classified as an unpaid meal break.
recovery time	A planned time allowance between the arrival time of a trip and the departure time of the next trip to allow the service to return to schedule if traffic, loading or other conditions have made the trip arrive late
sensitive receptors	Areas where the occupants are more susceptible to the adverse effects of exposure to pollutants. Sensitive receptors include, but are not limited to, hospitals, schools, day-care facilities, housing for the elderly and convalescent facilities.
stand by bus	A bus located strategically to be immediately called into service to 'work as directed'. Generally associated with major events.
through running	Services travelling into centres continue through the centre and out again as a different route or as an extension to an existing route. This negates the need for layover in centres

Review and evaluation

This guideline will be reviewed every two years to ensure it is up to date with changes to bus layover requirements and community expectations.

Feedback on the guideline will be collated over time and considered during the evaluation and review period.

The review and evaluation will be completed in consultation with transport operators and aligned with any relevant changes to other government policy.

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Controlled Document Information

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Related Document Information, Standards & References

Related Legislation:	(Legislation Name)	(Relationship/Context)	
Related Policies: (Policy Name)		(Relationship/Context)	
Related Procedures, Guidelines, Forms, WHS Modules/PCD's, Risk Assessments, Work Method Statements:	(Document Name)	(Relationship/Context)	
Standards, COP's & (Standard, COP or Other References) Other References		(Relationship/Context)	

Definitions

Term / Abbreviation	Definition

Consultation (update for each version created)

Key Departments, Teams,	Councillor Portfolios: Shared Decision Making and Mobility and Accessibility
Positions, Meetings:	

Version History

Version No	Date Changed	Modified By	Details and Comments
1	August 2020	Karen Partington	New guideline created

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