



Subject: Fire Service Access Requirements for Rear Lanes and Unit Complexes

Date: **28 January 2011**

Background

The last decade has seen an increase in medium density attached residences within new developments. When residences are attached on both sides, access to the rear of the property is provided by rear lanes. While considered a practical and economical use of residential land, these rear lanes pose inherent problems for emergency services.

Situation

In medium density residential developments of an attached or terrace style, access to garaging and rear yards is provided through lanes at the rear of the block. Currently, Territory planning instruments advise that rear lanes are not intended to be primary access for emergency services. Through analysing incident data from 1 September 2004 to 8 June 2010, the ACTFB has found that more than 40% of all fires occurring within a residential block are likely to require access to the rear of the residence in the first instance, suggesting that current policy in relation to the provision of rear lanes is inadequate.

Rear Lane Access Requirements

It is recommended that rear lanes be constructed to provide vehicular access for emergency services in all developments where access to the rear of the property is not available from the street front. Where lane are intended to be trafficable to emergency services vehicles, the following requirements apply;

- Lanes are preferred to be designed without corners.
 - Where corners are included, corners are to be constructed to allow a minimum vehicle turning circle of 18m.
- Minimum of 7.5m wide (1.5m-kerb, 5.5m-carriageway and 0.5m kerb) no parking is permitted within lanes
- Suitably constructed to allow travel by an “ Urban Pumper” style vehicle;
 - length of not less than 8.1m,
 - weighing a minimum of 14t
 - clear overhead for a minimum of 4.5m
 - with a minimum turning circle of 18m (minimum turn radius of 9m).

- Hydrant supply must be provided to a standard consistent with the rest of the development. Where roadside hydrants are not located within the required distance of travel, hydrants must be provided within the centre of the rear lane.
- It is preferred that rear lanes be clearways and actively patrolled by the relevant authority once development is complete to prevent residences and visitors parking within rear lanes, thereby preventing emergency access. Where rear lane parking is incorporated within project designs, parking should be indented and not provided within the 8m width of the rear lane.

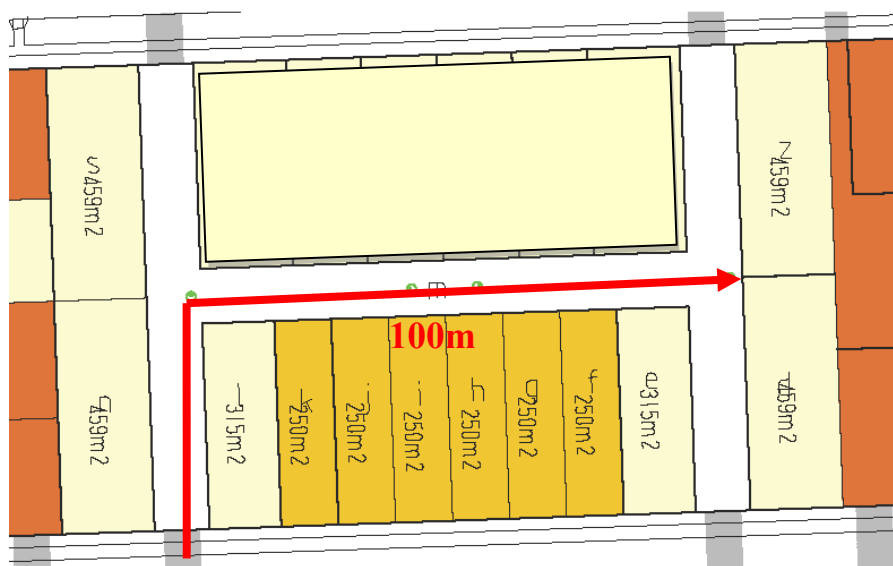
Where Proponents wish to provide emergency vehicle access to rear lanes, appropriate vehicle turning path diagrams will be required to be provided with any development application.

Proposed developments where emergency vehicle access is limited or not provided

In instances where emergency vehicle access is limited or not provided, Firefighters are restricted by technical limitations, operational efficiency and safety considerations. A maximum travel distance of 100m from any emergency services access point to the furthest point within the block or development serviced by the rear lane is required. As Rear lane designs vary throughout developments, applications of travel distance requirements are shown below;

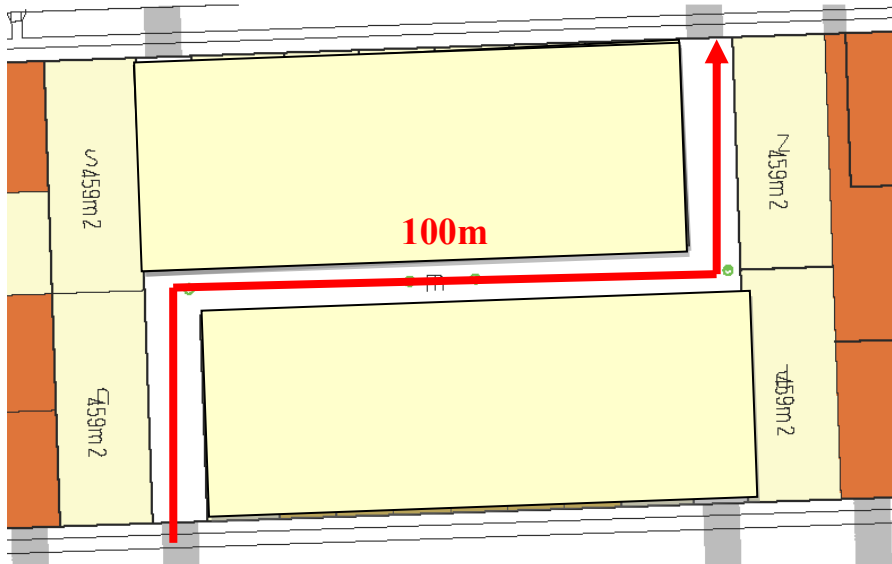
'H' Rear lanes

For 'H' style rear lanes, 100m measured from the kerb of the access road, to the furthest point of the furthest rear lane intersection.



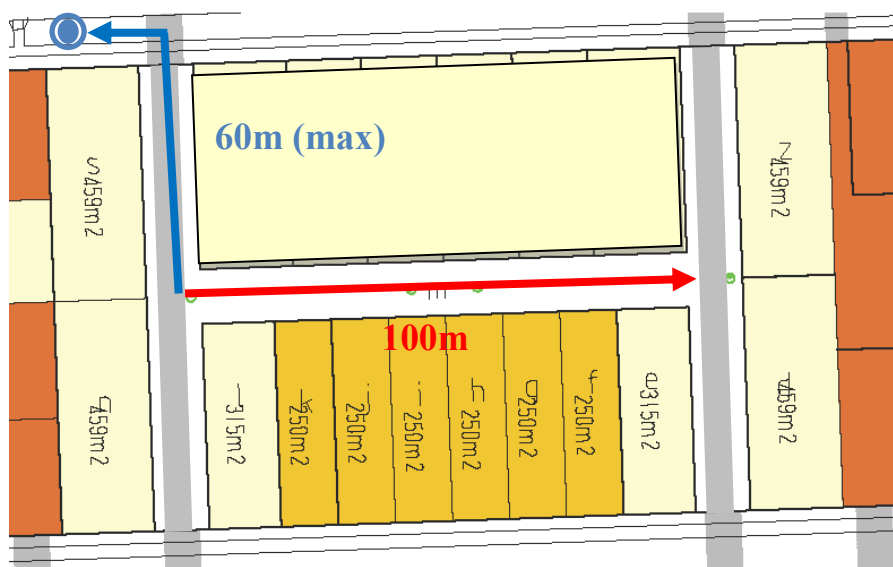
'S' Rear lanes

For 'S' style rear lanes, the maximum traversable length of 100m is measured from the kerb of the access road, to the kerb at the far end of the rear lane.



Partial access rear lanes

Where rear lane access is provided to part of the rear lane network, a maximum distance of 100m from the carriageway edge of the access lane to the carriageway of the next trafficable rear lane is required. Hydrants are to be located no further than 60m from the point where access is restricted



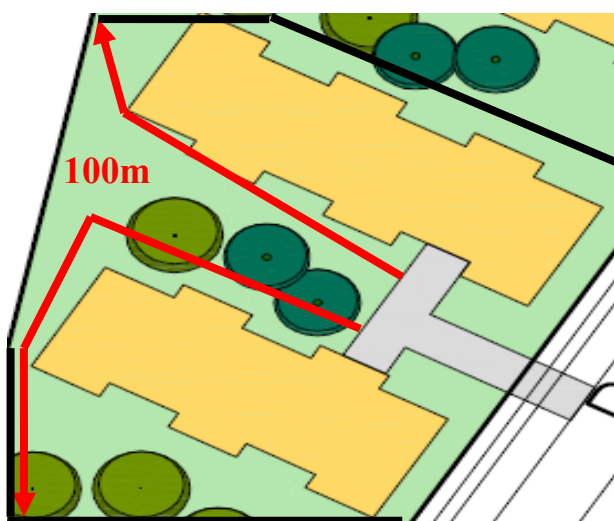
Unit Complexes

In attempts to provide privacy within a small area, access to unit complexes can present access challenges for emergency services. The following provides access requirements for unit developments.

Single level complexes – outdoor access

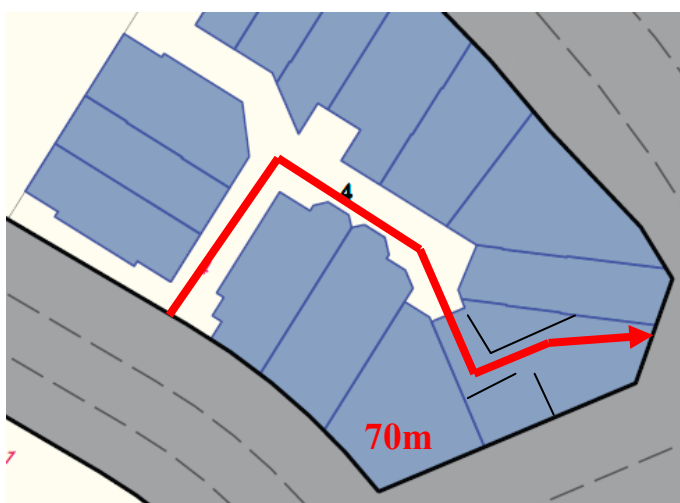
For single level medium density complexes, a distance of travel of no more than 100m, measured from the kerb of any access point to the furthest corner of the development.

The picture below indicates that the driveway of the complex is suitable for emergency vehicle access.



Single level complexes – internal access

When emergency access is restricted to any habitable structure within a complex, a distance of travel of less than **70m** from any access point, to the furthest point within a structure is required. The diagram below assumes that occupant access driveway/rear lane is unsuitable for emergency vehicles.



Other developments

Developments consisting of multiple levels or other contingencies may require special access provisions and will be assessed on a case by case basis considering; the provisions of the relevant Australian Standard, the BCA or approved engineered solution, in consideration of the operational contingencies of the ACTFB.

For further information on access requirements please contact ACTFB Planning on 6207 9277. For other building fire safety matters, please contact the ACTFB Fire Safety Section on 02 6207 8370.