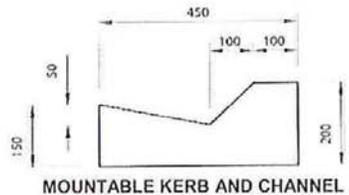
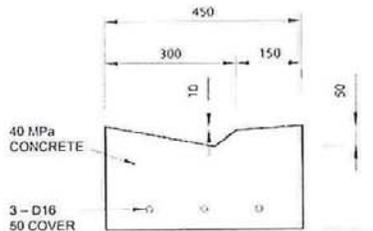


STANDARD KERB AND CHANNEL

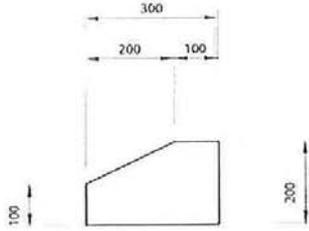


MOUNTABLE KERB AND CHANNEL

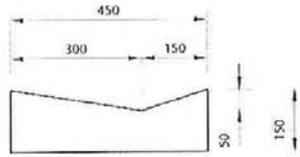


HEAVY DUTY VEHICLE CROSSING KERB AND CHANNEL

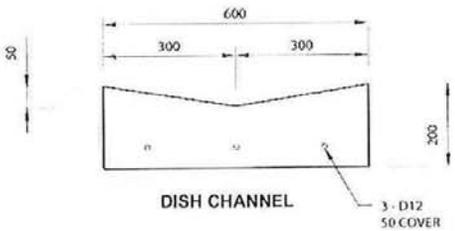
FOR USE WITH PAVED OR ASPHALT FOOTPATHS ONLY NOT FOR USE WITH CONCRETE FOOTPATHS



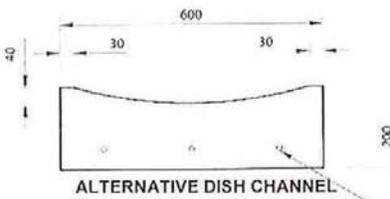
MOUNTABLE NIB KERB



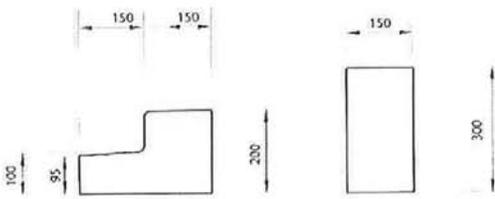
PRAM CROSSING KERB AND CHANNEL



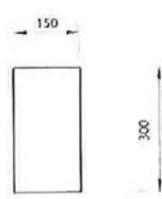
DISH CHANNEL



ALTERNATIVE DISH CHANNEL

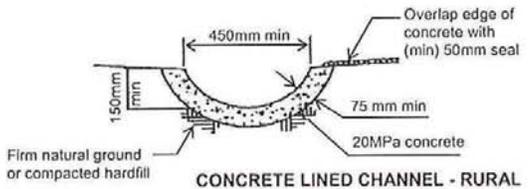


STANDARD KERB ONLY



NIB KERB

- NOTES:**
1. All concrete shall be Ordinary Grade 20 MPa if cast insitu & 25 MPa (slip formed) at 28 days.
 2. Crack control joints to be formed at maximum of 3 metre intervals.
 3. Profiles may be modified slightly to suit kerbing machine provided that the same strength is achieved.
 4. All kerbs and channels shall be underlain by a minimum 75mm of compacted AP 40 pavement aggregate.
 5. Pavement drains and channels are required whenever the channel can collect water.
 6. Channels and drains may be omitted if the carriageway slopes away from the kerb perpendicular to the road centerline.



CONCRETE LINED CHANNEL - RURAL

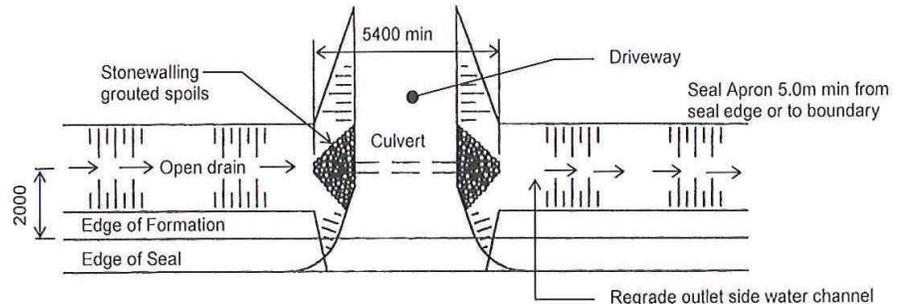
FAR NORTH DISTRICT COUNCIL ENGINEERING STANDARDS

No.	AMENDMENTS	DATE

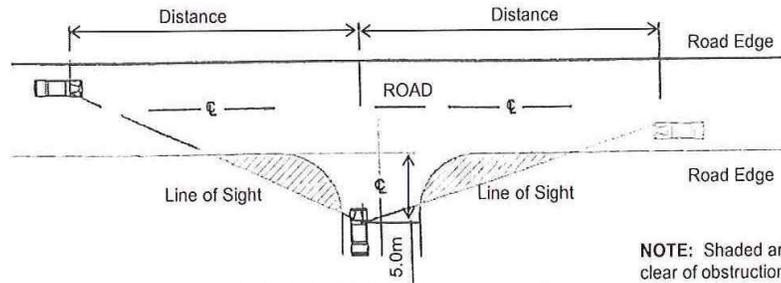
KERB & CHANNEL, DISHED CHANNELS, MOUNTABLE KERB & CHANNEL

DATE
JULY 2007

FNDC / S / 3



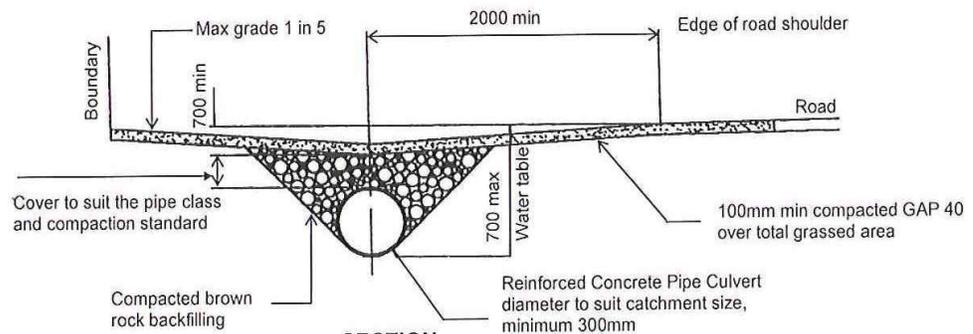
PLAN – TYPE 1 CROSSING AND DRAINAGE



PLAN – TRAFFIC SIGHT LINES NTS

ROAD OPERATING SPEED (km/h)	50	60	70	80	90	100
MINIMUM SIGHT DISTANCE (m)	65	75	95	115	140	170

MINIMUM SIGHT DISTANCE



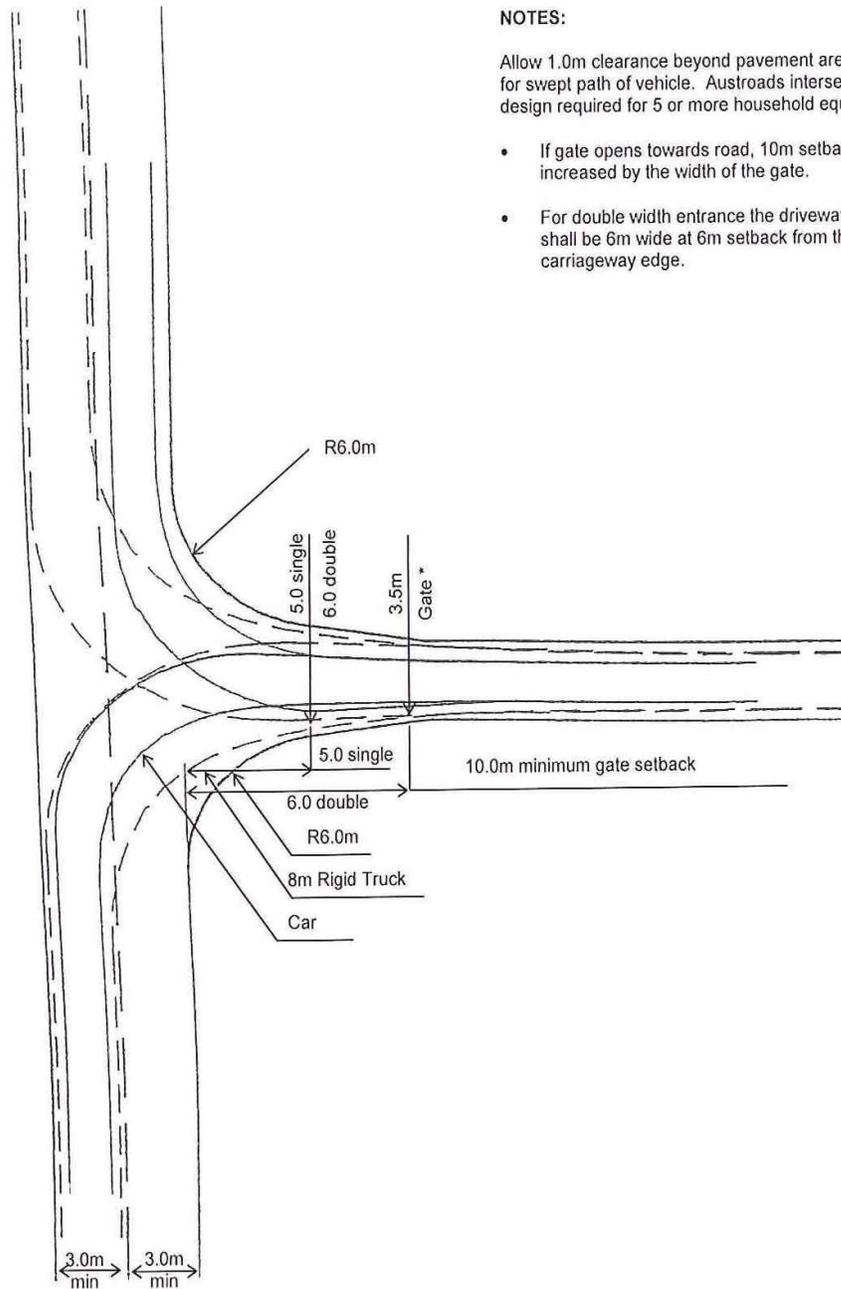
SECTION

NOTES:

1. Width sufficient to allow a vehicle to turn in from the left on an 8 metre inside radius without crossing the centerline. On commercial vehicle crossings (including farms), this radius shall be increased to 15 metres.
2. On arterial roads, vehicle access to properties which generate more than 60 vehicles per day shall be in accordance with Diagram D of the Transit NZ document "planning for a Safe and Efficient State Highway Network Under the Resource Management Act".

FAR NORTH DISTRICT COUNCIL ENGINEERING STANDARDS

No.	AMENDMENTS	DATE	RESIDENTIAL VEHICLE CROSSINGS UNKERBED ROADS	DATE
				JULY 2007
				FNDC / S / 6



NOTES:

Allow 1.0m clearance beyond pavement area shown for swept path of vehicle. Austroads intersection design required for 5 or more household equivalents.

- If gate opens towards road, 10m setback shall be increased by the width of the gate.
- For double width entrance the driveway width shall be 6m wide at 6m setback from the road carriageway edge.

FAR NORTH DISTRICT COUNCIL ENGINEERING STANDARDS

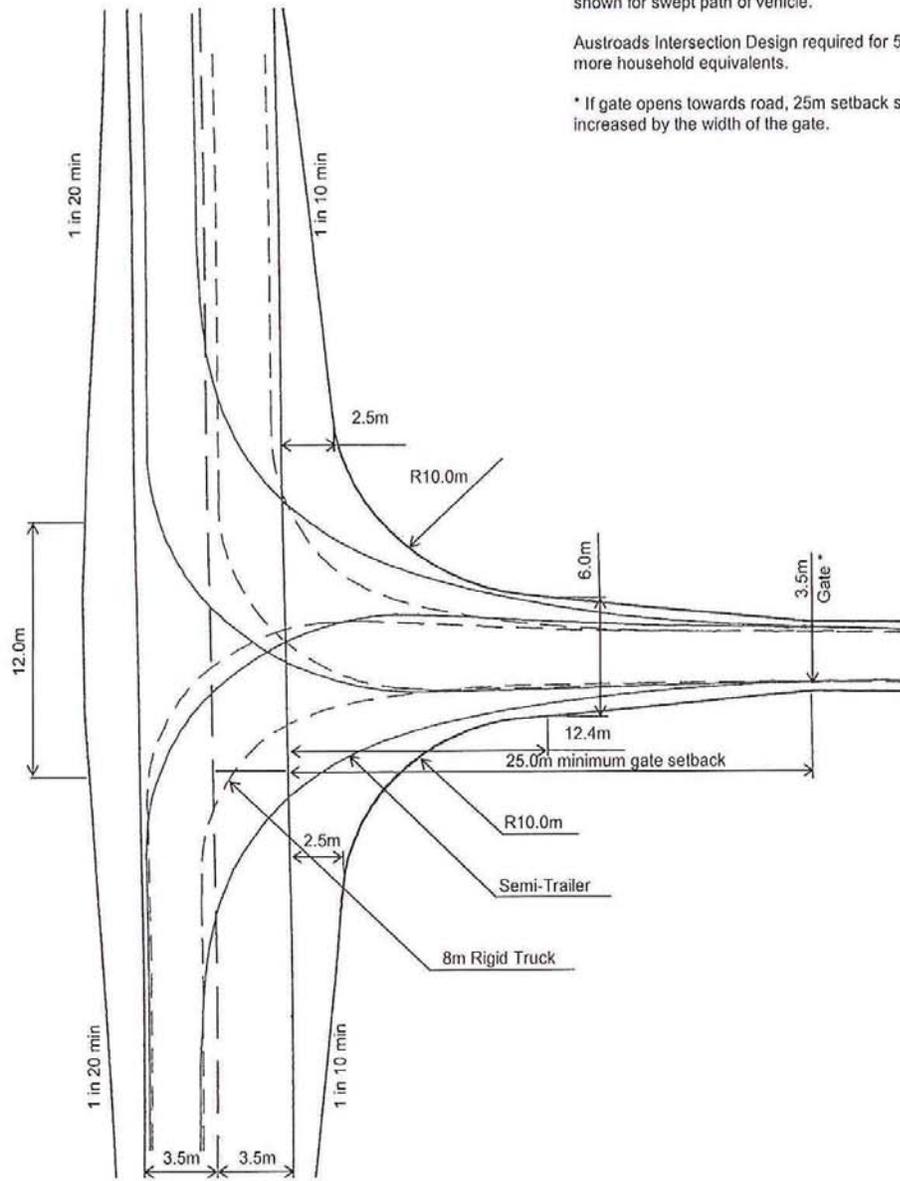
No.	AMENDMENTS	DATE	DOMESTIC CROSSING LAYOUT (RURAL OR UNKERBED ROAD)	DATE JULY 2007

NOTES:

Allow 1.0m clearance beyond pavement area shown for swept path of vehicle.

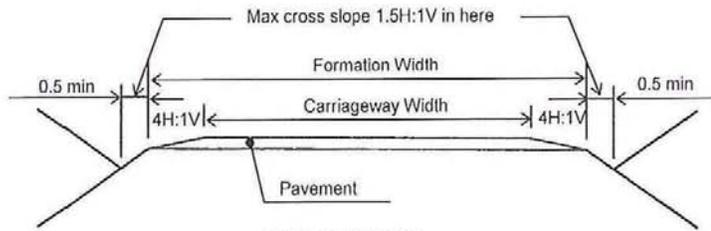
Austroads Intersection Design required for 5 or more household equivalents.

* If gate opens towards road, 25m setback shall be increased by the width of the gate.

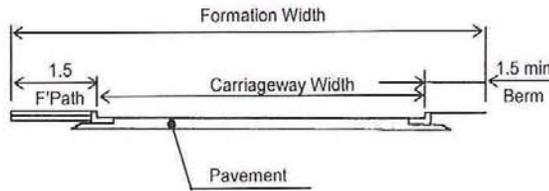


FAR NORTH DISTRICT COUNCIL ENGINEERING STANDARDS

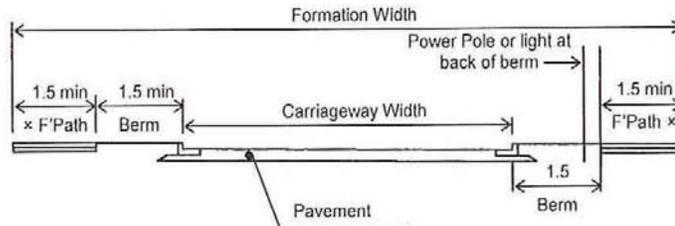
No.	AMENDMENTS	DATE	FARM / COMMERCIAL CROSSING LAYOUT ARTERIAL / COLLECTOR ROAD	DATE
				JULY 2007
			FNDC / S / 6D	



RURAL ROADS



TYPE A URBAN ROADS



TYPE B TO D URBAN ROADS

* Required one side only in Type B Roads

NOTES:

1. Kerb shall be non-mountable with a 75mm depth of compacted basecourse and sub-soil drains underneath. It shall include a 300mm wide channel unless on the high side of the super elevation.
2. The entire upper subgrade surface shall have a minimum 4% slope perpendicular to the road surface. This shall slope away from the road under unsealed shoulders.
3. Footpaths and/or berms shall be placed on the most suitable side of the road (if not required on both sides). All berms and footpaths shall have a 3% to 5% cross-fall towards the carriageway.
4. The widths of Type A and Type B roads can be reduced under certain conditions. Refer to table 3.1A Road Cross Section Standards of the Engineering Standards and Guidelines.

FAR NORTH DISTRICT COUNCIL ENGINEERING STANDARDS

No.	AMENDMENTS	DATE	ROAD STANDARDS AND DEFINITIONS	DATE
				FNDC / S / 7