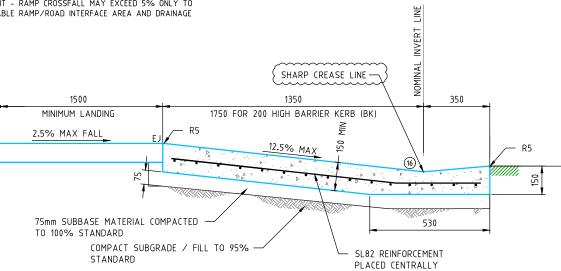
# (11) VARIFS ΕJ -SHARP CREASE LINE BACK OF KERB (13) 9 DG -NOMINAL KERB LINE 7. -LIP OF KERR (16) (5) (1) KERB RAMP WIDTH (15) SUBURBAN KERB RAMP ON STRAIGHT

## **KEY DESIGN PRINCIPLES**

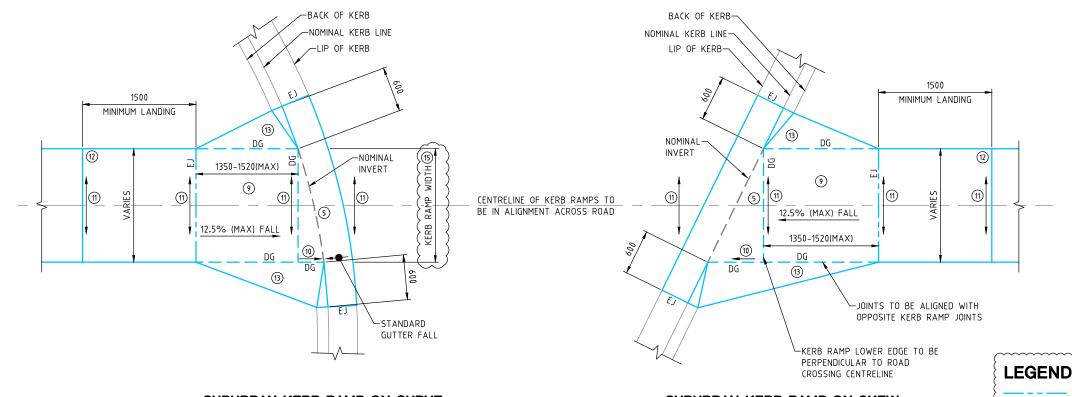
- SUBURBAN KERB RAMPS ARE TO BE USED IN SUBURBAN LAND USE CONTEXT AREAS AS DEFINED IN MISOS 3.3. ALSO IN OTHER LAND USE CONTEXT AREAS WHERE ACCESS TO THE CROSSING IS NOT REQUIRED VIA THE TRIANGULAR SPLAY
- 2. ENSURE RAMPS ARE ALIGNED ACROSS ROADS, KERBS RAMPS MAY BE OF A DIFFERENT TYPE ON EACH SIDE OF A ROAD CROSSING
- DIRECTION GROOVES TO BE SHARP FOLDS FOR VISION IMPAIRED PEOPLE TO USE FOR DIRECTIONAL SHORELINE GUIDANCE WITH A CANE
- 4. FOR THE SAFETY AND COMFORT OF USERS OF WHEEL CHAIRS, PRAMS AND TROLLEYS THE RAMP SECTION IS TO BE A SINGLE RECTANGULAR PLANE, WITH GRADES AND CROSSFALL STRICTLY AS SPECIFIED. CROSSFALL OF RECTANGULAR PLANE IS TO MATCH THE LONGITUDINAL FALL OF THE
- THE ENTIRE KERB RAMP IS TO BE FORMED UP AND POURED AS A SINGLE INTEGRAL SLAB
- LOCATE KERB RAMPS TO AVOID INSTALLATION ON CURVES OR SKEWS
- IN ESTATE DEVELOPMENT RAMP CROSS FALL SHOULD NOT EXCEED 5% MAXIMUM. IN RETROFIT RAMP CROSSFALL MAY EXCEED 5% ONLY TO ALLOW FOR ACCEPTABLE RAMP/ROAD INTERFACE AREA AND DRAINAGE



#### **EXAMPLE OF SUBURBAN KERB RAMP**



## SUBURBAN KERB RAMP SECTION A-A



## SUBURBAN KERB RAMP ON CURVE

# SUBURBAN KERB RAMP ON SKEW

LIMITED TO RETROFIT ONLY WHEREVER POSSIBLE

### **NOTES**

- ALL CONCRETE TO BE CLASS N32 UNLESS NOTED OTHERWISE
- ALL KERBS, GUTTERS, INVERTS AND CROSSINGS TO BE CONSTRUCTED ON COMPACTED SUBBASE MATERIAL OF 75mm MINIMUM THICKNESS OR AS OTHERWISE
- EXPANSION JOINTS (EJ) TO BE FORMED WITH EXPANDABLE BITUMEN IMPREGNATED FIBREBOARD FOR THE FULL DEPTH OF THE SECTION AND CUT TO PROFILE. LOCATE EJS AGAINST ALL CONCRETE AND SEGMENTAL PAVEMENTS
- DIRECTION GROOVES (DG) TO BE 10mm WIDE BY 10mm DEEP. DIRECTION GROOVES SHALL BE FORMED USING A SUITABLE TOOL THAT PROVIDES A SHARP FOLD
- KERB RAMPS ARE TO BE INSTALLED SUCH THAT RAMP CENTRELINES LINE UP ACROSS THE ROAD INCLUDING WHEN THERE IS DIFFERING PATH WIDTHS EACH SIDE OF A ROAD CROSSING
- BROOMED FINISH TO BE APPLIED TO ALL KERB RAMPS. ALL OTHER EXPOSED SURFACES TO HAVE STEEL FLOAT FINISH
- ALL CONCRETE TO BE CURED IN ACCORDANCE WITH THE SPECIFICATION
- KERB RAMPS SHALL BE FORMED TO PROVIDE SHARP DIRECTION GROOVES (DG) BETWEEN THE RECTANGULAR KERB RAMP PLANE, THE TRIANGULAR SPLAYS, BOTTOM OF THE RAMP AND TOP OF RAMP (EJ). ALL KERB RAMPS INCLUDING SPLAYS SHALL BE REINFORCED WITH A LAYER OF SL82 MESH (CENTRALLY PLACED)
- TACTILE GROUND SURFACE INDICATORS (TGSIs) TO BE INSTALLED ON ACCESSIBLE PEDESTRIAN ROUTES (APRs) ONLY. TGSIs ARE TO BE IN ACCORDANCE WITH AS/NZS 1428.4.4:2009. REFER MIS05 5.2 FOR TGSI DETAILS. TGSIs SHALL NOT BE INSTALLED WITHIN KERB RAMPS UNLESS APPROVED BY THE ROAD AUTHORITY
- SHAPE GUTTER LANDING TO PROVIDE FREE DRAINING SURFACE (2.5% MAXIMUM, 1.0% MINIMUM AND 0.5% IN RETROFIT ONLY)
- THE DESIRABLE MAXIMUM RAMP CROSSFALL IS 2.5%. CROSSFALL ON KERB RAMP LOWER EDGE AND KERB RAMP TOP EDGE MUST BE EQUAL AND THEY SHOULD APPROXIMATE THE ROAD CROSSFALL PARALLEL TO THE KERB RAMP EDGE. GRADING OF KERB RAMP CROSSFALL SHOULD ENSURE THE GUTTER TRAY IS FREE DRAINING. TRANSITION OF CROSSFALL TO APPROXIMATE ROAD CROSSFALL SHOULD OCCUR ON THE PATH PRIOR TO THE LANDING HOWEVER TRANSITION MAY OCCUR THROUGH THE LANDING WHERE ROAD GRADE IS HIGH AND ADVERSE TO THE PATH APPROACH CROSSFALL
- PATH CROSSFALL SHOULD TRANSITION FROM THE BACK OF THE LANDING TO THE PATH CROSSFALL AT A RATE OF 1% CHANGE IN CROSSFALL PER METRE
- IN RETROFIT. THE FIXED 600mm TRIANGULAR SPLAY WIDTH KERB RAMP MAY BE ADJUSTED TO SUIT EXISTING INFRASTRUCTURE SUCH AS MANHOLES, LANDSCAPING, SIGNAGE ETC
- WHERE THERE IS AN EXISTING PATH ADJACENT TO THE KERB, AN INNER URBAN KERB RAMP IS TO BE USED AND THE PATH WIDENED AROUND THE RAMP TO THE FULL WIDTH OF THE THROUGH PATH
- ( IN ESTATE DEVELOPMENT KERB RAMP WIDTHS ARE TO MATCH PATH WIDTHS SHOWN IN MISO5 TABLE 5-8 FOR THE ROUTE HIERARCHY AS SHOWN ON THE ATIPT. FOR ACCESS COMMUNITY ROUTES KERB RAMPS ARE TO MATCH THE PATH WIDTH WITH A MINIMUM WIDTH OF 1.5m. WHERE THE KERB RAMP IS WIDER THAN THE PATH, TRANSITION THE PATH WIDTH FROM THE TOP OF THE KERB RAMP. KERB RAMPS AT PRIORITY CROSSINGS ARE TO BE A MINIMUM OF 3.0m WIDE

KERB RAMP WIDTHS MAY BE REDUCED TO SUIT EXISTING INFRASTRUCTURE WITH APPROVAL FROM THE ROAD AUTHORITY

A SHARP CREASE IS TO BE TOOLED ALONG THE LINE OF THE CHANGE OF GRADE

luthorised:

EJ - EXPANSION JOINT - REFER NOTE 3



# SUBURBAN **KERB RAMPS**

Latest Revision Details DIRECTION GROOVE NOTES 09/11/20 AMENDED BASED ON DRG DS3-02 28/09/18 Date

DG - RAMP DIRECTION GROOVE - REFER NOTE 4

ACTSD-0515