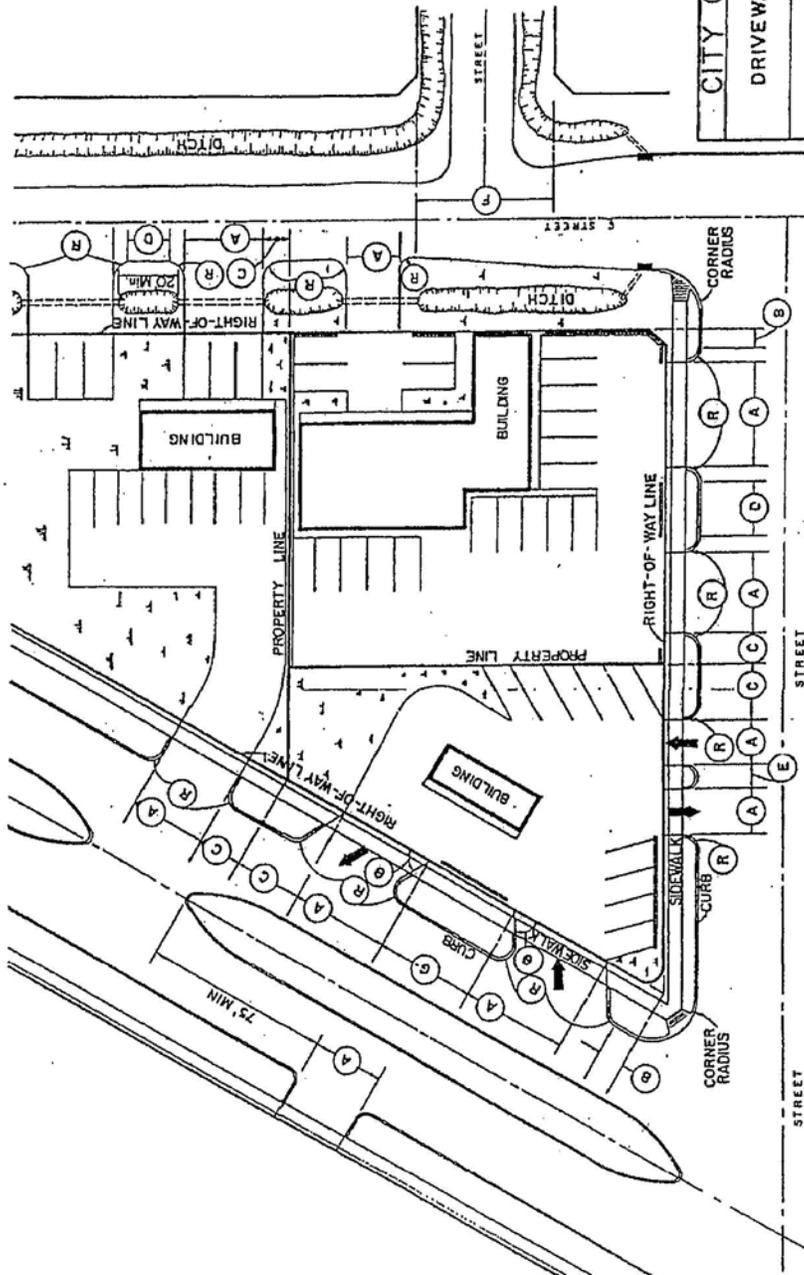


DRIVEWAY GEOMETRICS



CITY OF HOUSTON
DRIVEWAY GEOMETRICS

Approved: *Richard C. Stanley*
Dept. of Traffic and Transportation
Date: May 85 Rev. May 88 DWG. 2156

DRAWING 31-1

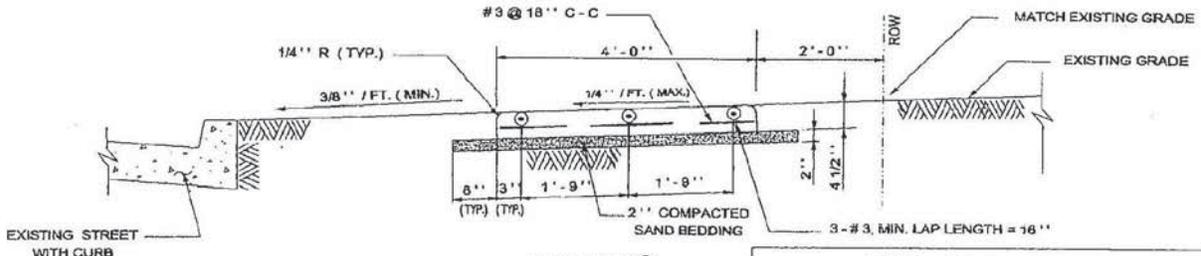
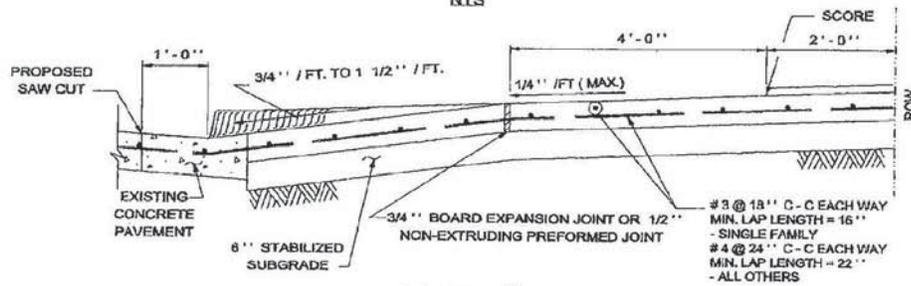
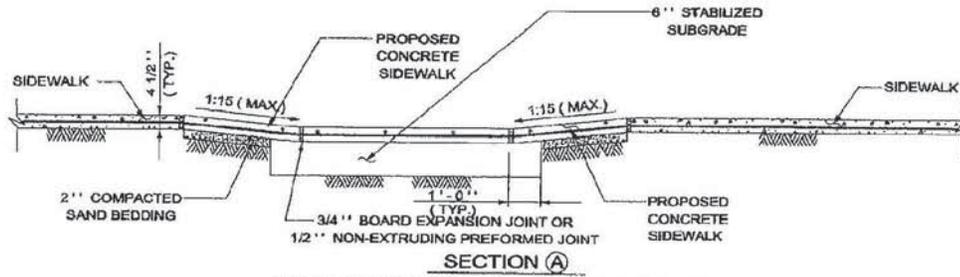
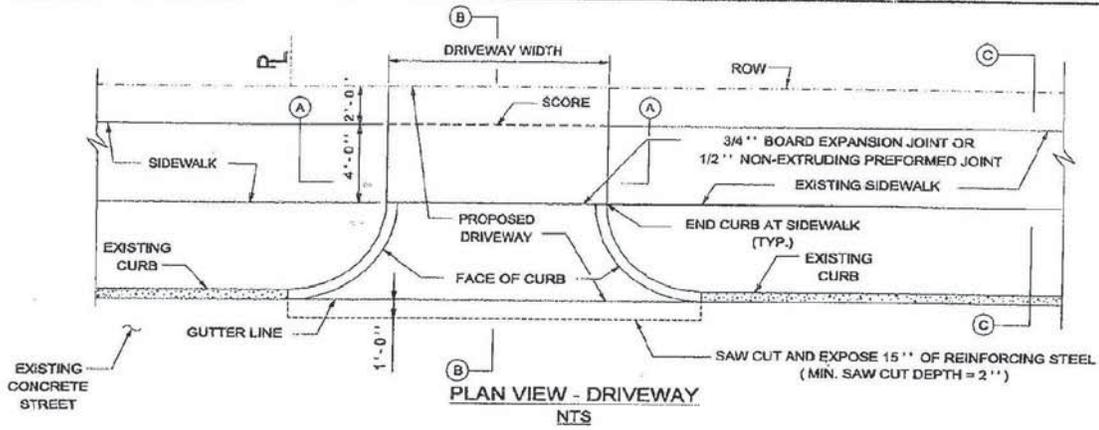
Notes to Drawing 31-1

		RESIDENTIAL	ALL OTHERS
Dimension ○---	Driveway Width : (1), (2) one - way two - way	$\frac{10' + 2'}{12'}$ min. - 20' max. 12' min. - 24' max.	15' min. - 20' max. 24' min. - 35' max.
Dimension ○---	corner r-o-w line (3)	20' min.	30' min.
Dimension ○---	side property line (3)	- R min.	- R min.
Dimension ○---	two-way (3)	N/A	10' min.
Dimension ○---	one-way (perpendicular)	20' min. (4)	5' min. 20' max.
Dimension ○---	one-way (angular)	20' min.	30' min.
Dimension ○---	Driveway Radius	<u>24'</u> min. 15' max.	10' min. $\frac{15' + 25'}{2}$ max.
Dimension ○---	Minimum Angle (4)	45 deg.	45 deg.

Dimension ○---

Driveway opening shall not be permitted withing the limits of any intersection with the exception that special consideration will be given to major thoroughfare with existing esplanades and streets primarily used for residential use.

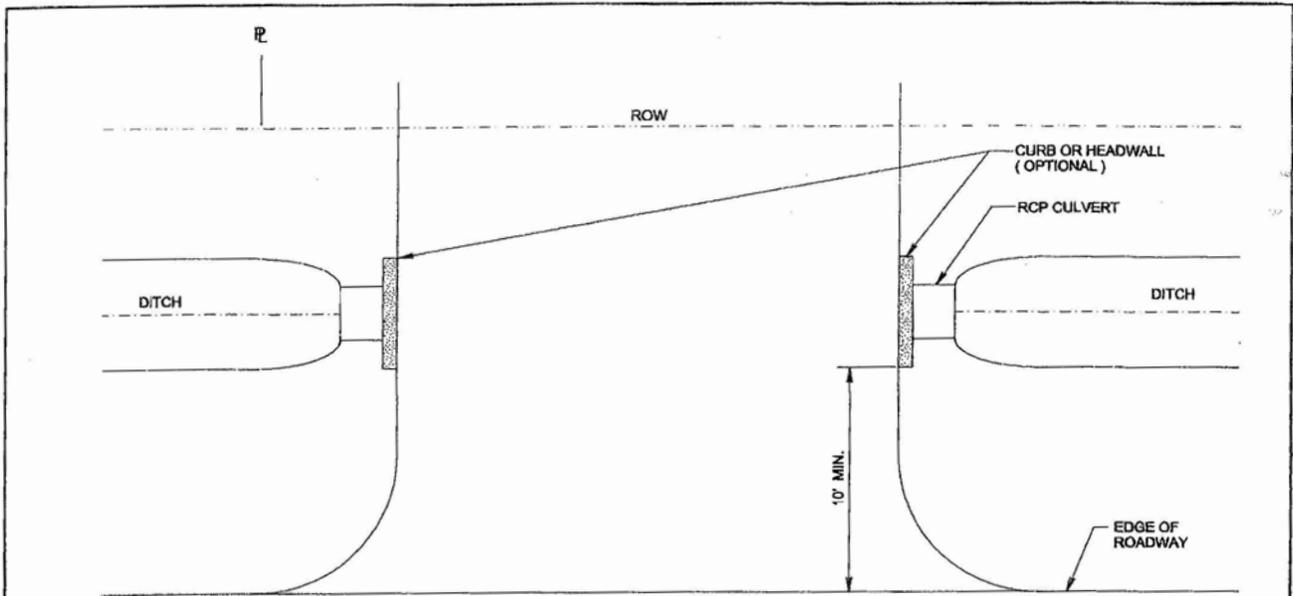
1. Where off-street "back-in" type truck loading docks/wells are constructed on local streets, the width of the driveway opening may be increased to a maximum of 50 feet.
2. The two sides of a driveway shall be parallel within the right-of-way limits.
3. In no case shall the driveway radius encroach on abutting property or corner radius.
4. Driveways may be skewed at those locations where streets are one way or divided without median opening.



NOTES:

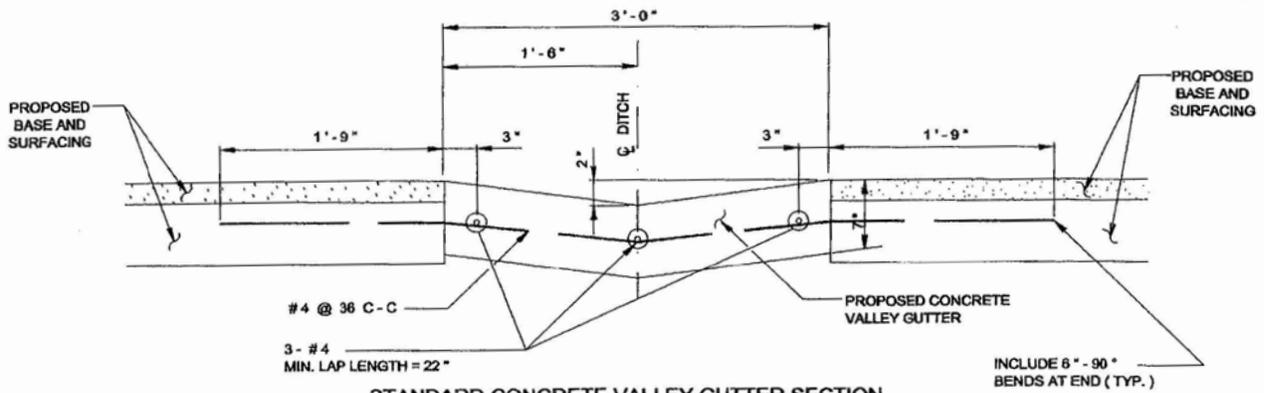
- 1 - DRIVEWAYS SHALL BE 6" THICK FOR SINGLE FAMILY USE AND 7" THICK FOR ALL OTHERS (I. E. COMMERCIAL, INDUSTRIAL, ETC.)
- 2 - DRIVEWAYS AND SIDEWALKS SHALL BE CONSTRUCTED WITH PORTLAND CEMENT CONCRETE AND INCLUDE 5 - 1/2 SACKS OF CEMENT PER CUBIC YARD OF CONCRETE.
- 3 - 6 X 6 - W 2.9 X W 2.9 WELDED WIRE FABRIC MAY BE USED IN LIEU OF THE REINFORCING STEEL.
- 4 - EXPANSION & CONSTRUCTION JOINTS ALONG SIDEWALKS SHALL BE ACCORDING TO DRAWING NO. 02752-02

CITY OF HOUSTON	
DEPARTMENT OF PUBLIC WORKS AND ENGINEERING	
REINFORCED CONCRETE DRIVEWAY AND SIDEWALK DETAILS ON CURBED TYPE STREETS	
APPROVED BY: <i>Shaudagin</i> CITY ENGINEER	APPROVED BY: <i>Tom C. [Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
DATE: 05 - 23 - 03	
DWG NO: 02754 - 01	



STANDARD OPEN DITCH DRIVEWAY - PLAN

NTS

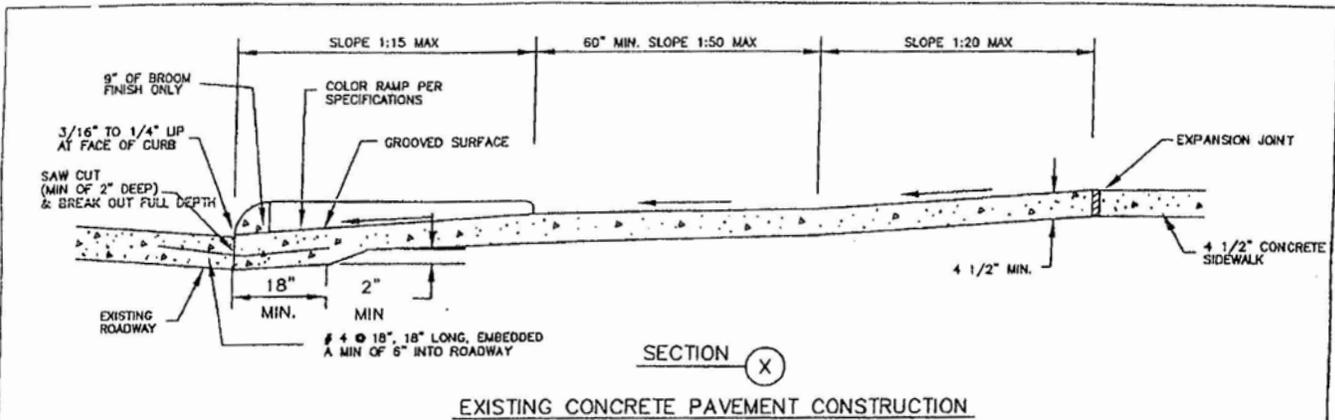


STANDARD CONCRETE VALLEY GUTTER SECTION

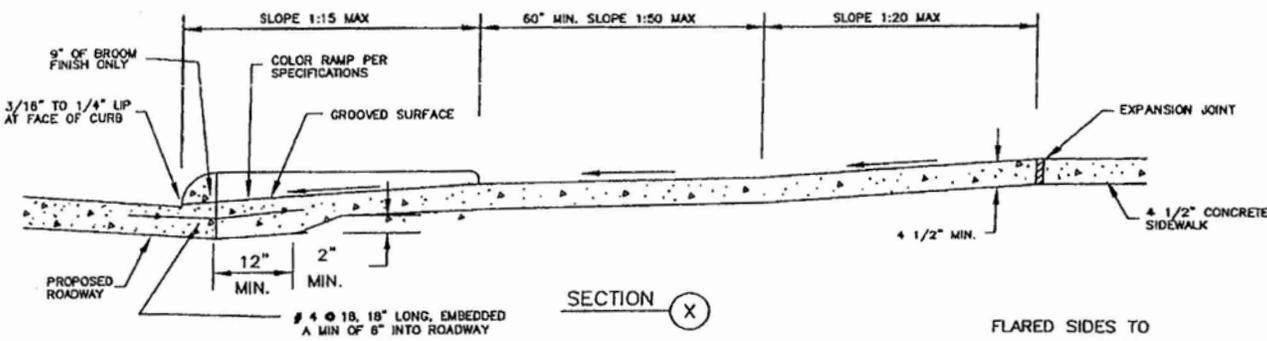
NTS

1. REINFORCED CONCRETE PIPE (RCP) CULVERTS AND CONCRETE VALLEY GUTTER GRADES SHALL BE SET BY CITY ENGINEER. PROFILE SHOWING THE PROPOSED AND EXISTING DITCH FLOWLINE WILL BE REQUIRED WHERE CONCRETE VALLEY GUTTERS ARE TO BE CONSTRUCTED IN LIEU OF CULVERTS.
2. CULVERT SIZE WILL BE APPROVED BY CITY ENGINEER WITH ³⁴18" DIAMETER MINIMUM.
3. SPACING OF TYPE "D" OR "D-1" INLETS SHALL BE DETERMINED BY CITY ENGINEER. SEE DRAWING NO. 02632 - 07 FOR TYPE "D" OR DRAWING NO. 02632 - 08 FOR TYPE "D-1".
4. DRIVEWAY MAY BE CONCRETE, ASPHALT OR ANY OTHER MATERIAL WHICH WILL NOT PERMIT WIND OR WATERBORNE EROSION.
5. A 3 - FOOT CONCRETE VALLEY GUTTER SECTION SHALL BE CONSTRUCTED THROUGH THE PROPOSED DRIVEWAY WHERE THE CITY ENGINEER DETERMINES THE INSTALLATION OF DITCH CULVERTS TO BE IMPRACTICAL DUE TO INSUFFICIENT DEPTH. THE VALLEY GUTTER SECTION WILL BE CONSTRUCTED OF 5 - 1/2 SACK CEMENT PER CUBIC YARD OF CONCRETE.

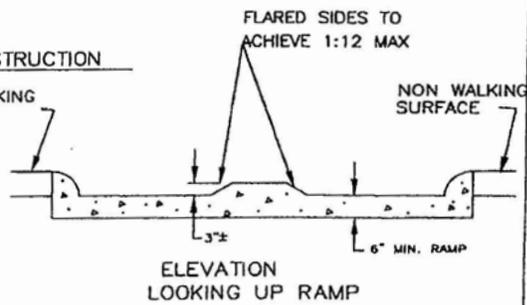
CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING	
DRIVEWAYS WITH CULVERTS OR VALLEY GUTTERS ON OPEN DITCH TYPE STREETS	
APPROVED BY:  CITY ENGINEER	APPROVED BY:  DIRECTOR OF PUBLIC WORKS AND ENGINEERING
DATE: 05 - 23 - 03	
DWG NO: 02754 - 02	



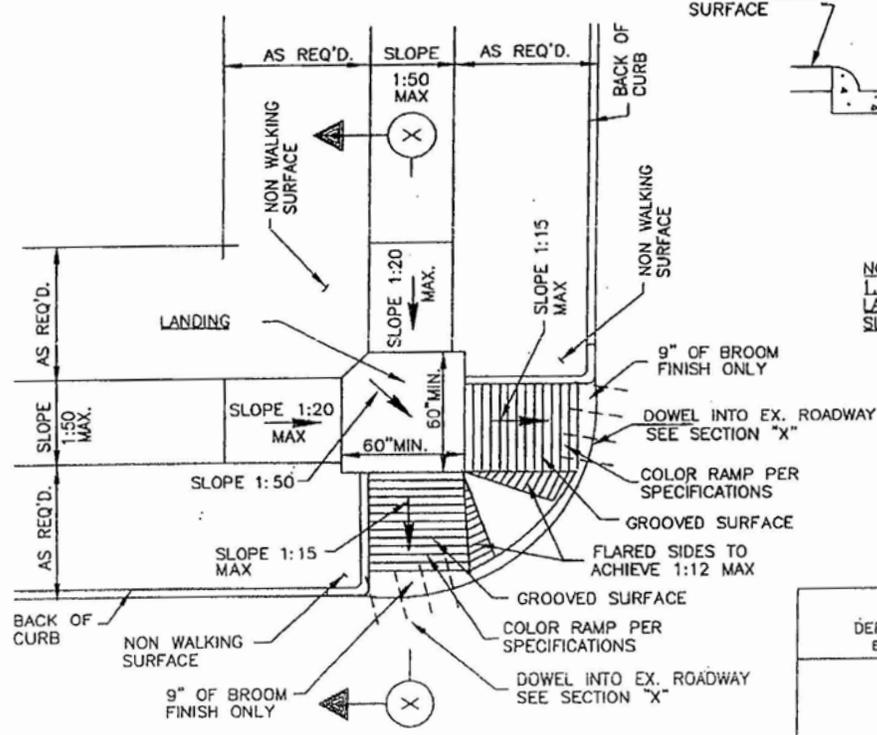
SECTION X
EXISTING CONCRETE PAVEMENT CONSTRUCTION



SECTION X
NEW CONCRETE PAVEMENT CONSTRUCTION



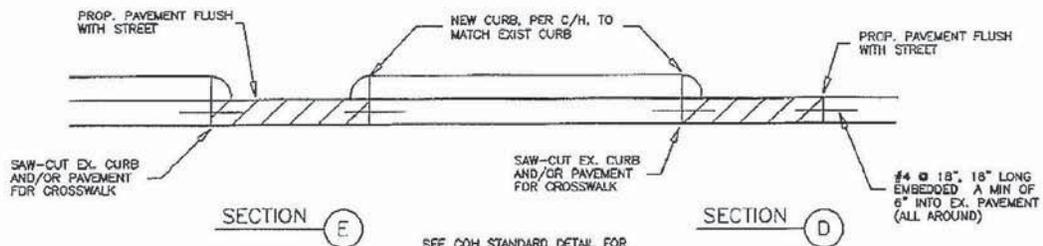
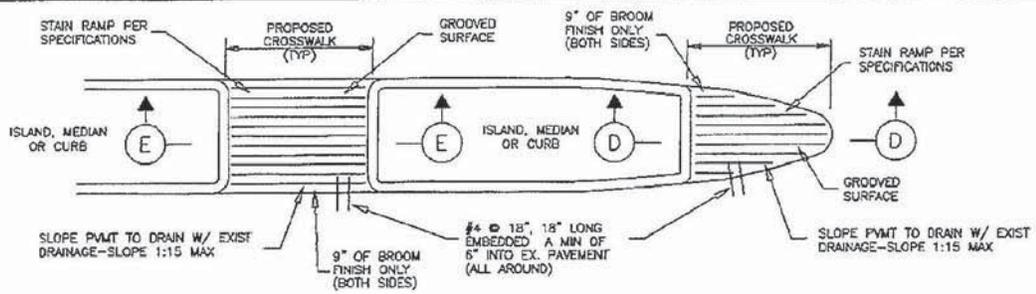
NOTES:
1. REPLACE EXISTING SIDEWALK FROM EL LANDING AS NECESSARY TO ACHIEVE 1:20 SLOPE



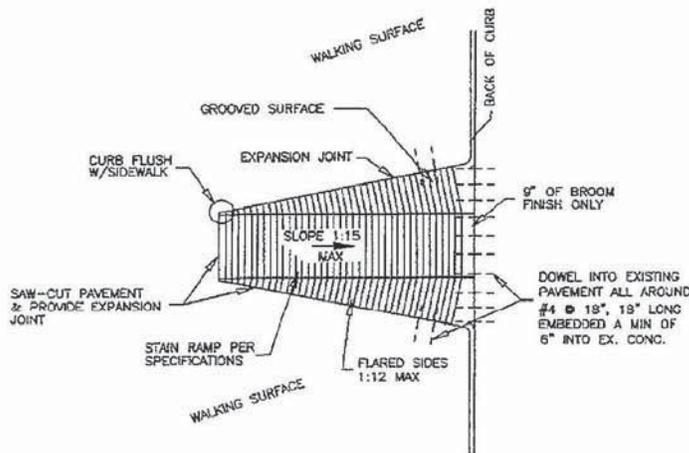
STREETS WITH NON-WALKING SURFACE BEHIND CURB

N.T.S.

CITY OF HOUSTON	
DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
WHEEL CHAIR RAMP DETAILS (NOT TO SCALE)	
APPROVED BY: <i>John A. Polosky</i> CITY ENGINEER	APPROVED BY: <i>Shirley M. ...</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: Sep-15-04	DWG NO: 02775-02

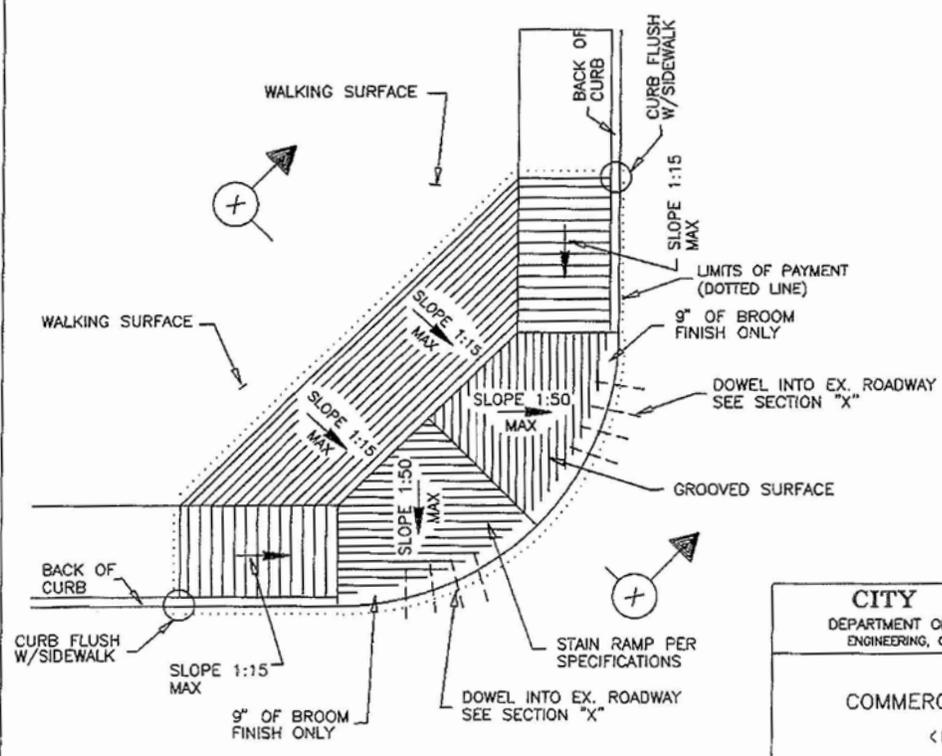
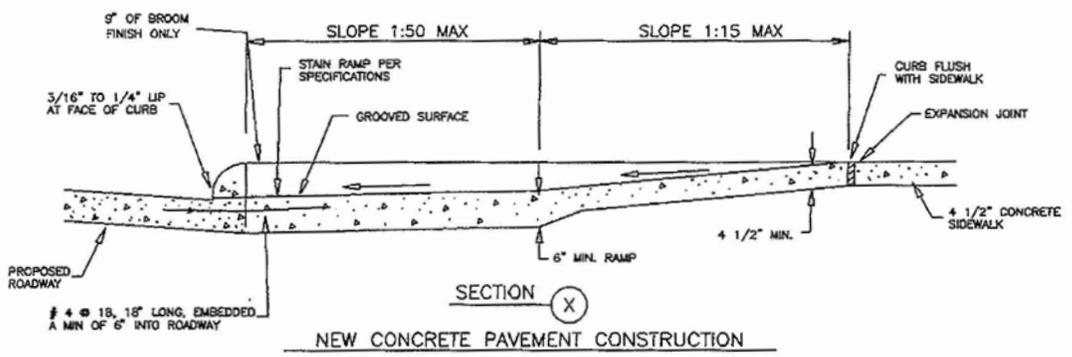
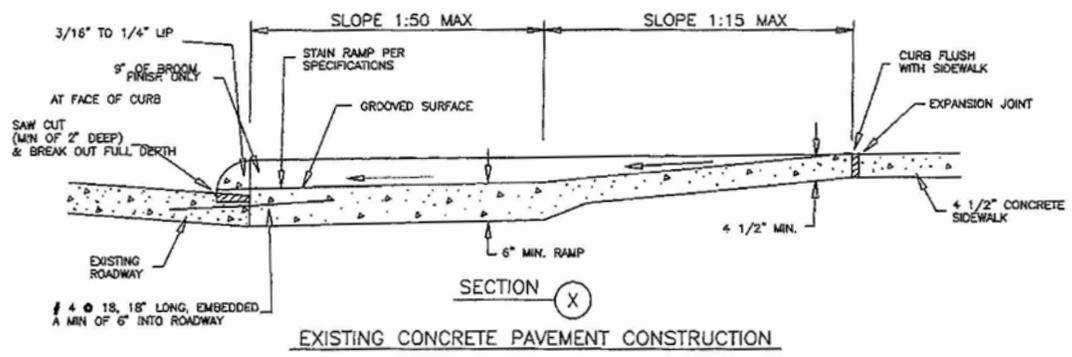


FOR ISLAND, MEDIAN, OR CURB MODIFICATIONS FOR CROSSWALKS



RAMP CONSTRUCTION FOR EXISTING SIDEWALK

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE GROUP	
CURB MODIFICATIONS FOR WHEEL CHAIR RAMPS & CROSSWALKS (NOT TO SCALE)	
APPROVED BY: <i>Wanda J. ...</i> CITY ENGINEER	APPROVED BY: <i>[Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: NOV-05-01	DWG NO: Q2775-04

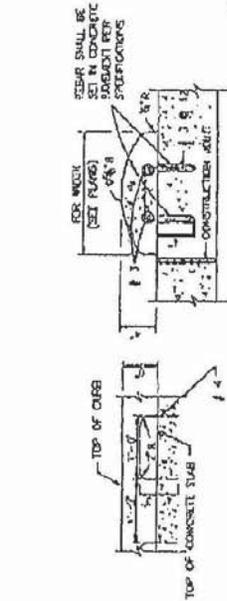


COMMERCIAL & HIGH DENSITY CONDITIONS
N.T.S.

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
COMMERCIAL CURB RAMP DETAIL (NOT TO SCALE)	
APPROVED BY: <i>[Signature]</i> CITY ENGINEER	APPROVED BY: <i>[Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002	DWG NO: 02775-05

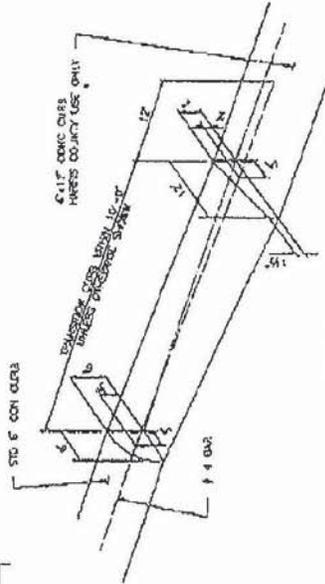
3'-1 1/2" MONOLITHIC AND TRANSITION CURB NOTES:

1. 6-INCH CONCRETE CURB TO BE CONSTRUCTED ON ALL CITY-MAINTAINED, NEARBY HIGH-RESIDENTIAL STREETS, AND RESIDENTIAL STREETS.
2. TRANSITIONS FROM 6-INCH CONCRETE CURB TO 4-INCH x 12-INCH MONOLITHIC CURB TO BE ACCOMPANIED WITH 10 FEET, UNLESS OTHERWISE SHOWN ON THIS 10-FOOT TRANSITION CURB IS NOT PAIRED MONOLITHIC WITH THE PAIRED, HIGH PERFORMANCE STEEL AS SHOWN IN 4'-11" HIGH x 12'-0" TRANSITION CURB IS TO BE INSTALLED.

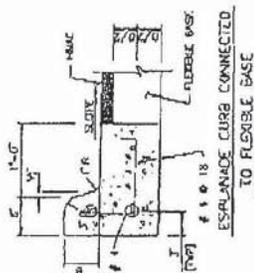


ADJUSTABLE CURB

ALTERNATE CONCRETE CURB REINFORCEMENT

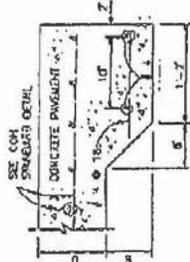


CURB TRANSITION



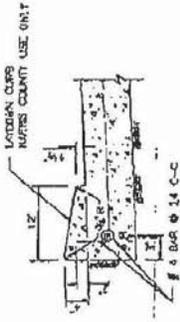
ESPAÑADE CURB CONNECTED TO CONCRETE BASE

ESPAÑADE CURB CONNECTED TO FLEXIBLE BASE

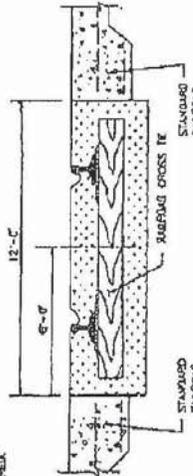


STANDARD CONCRETE PAVING HEADER

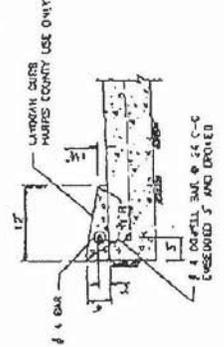
STANDARD RAILROAD HEADER



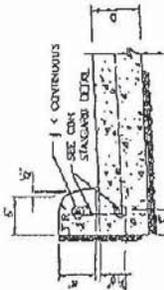
4-INCH x 12-INCH MONOLITHIC CURB



STANDARD RAILROAD CROSSING - SINGLE TRACK

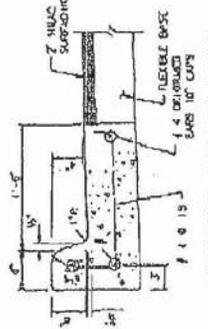


4-INCH x 12-INCH LAYDOWN CURB



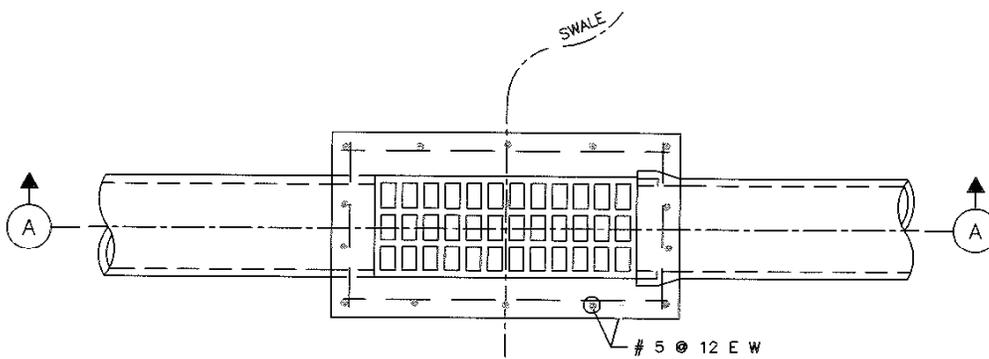
CONCRETE CURB

NOTE: WHEN CONCRETE CURB IS TO BE PLACED EXISTING CONCRETE USE BASE 6'-0" x 18'-0" LONG, DOWELLED AND SET IN EXISTING GROUT. SET #1 BARS AT 17'-0" ON CENTER WHEN PAVED ON EXISTING PAVEMENT.

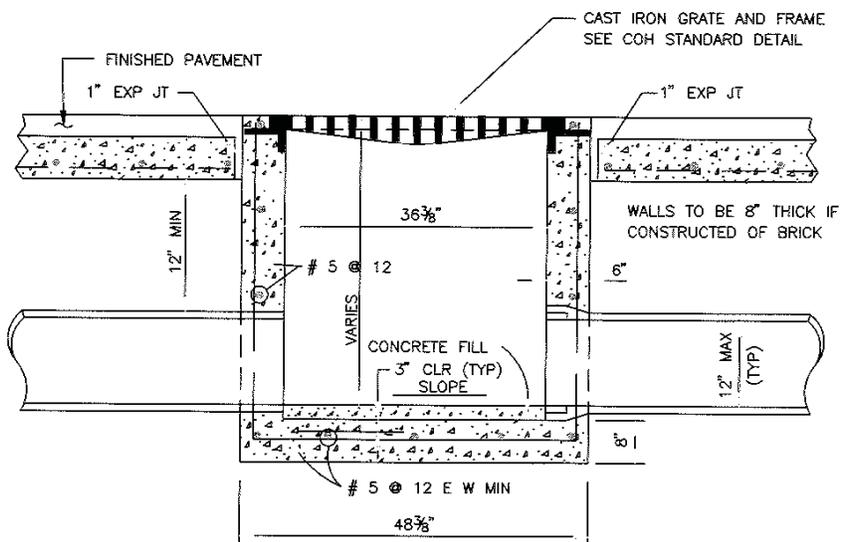


MONOLITHIC CURB AND GUTTER

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND INFRASTRUCTURE PLANNING, CONSTRUCTION AND REAL ESTATE DIVISION	
CURB, CURB AND GUTTER AND HEADER DETAILS (NOT TO SCALE)	DRAWN BY: [Signature] CHECKED BY: [Signature] DATE: OCT-01-2002 SHEET NO: 02771-01



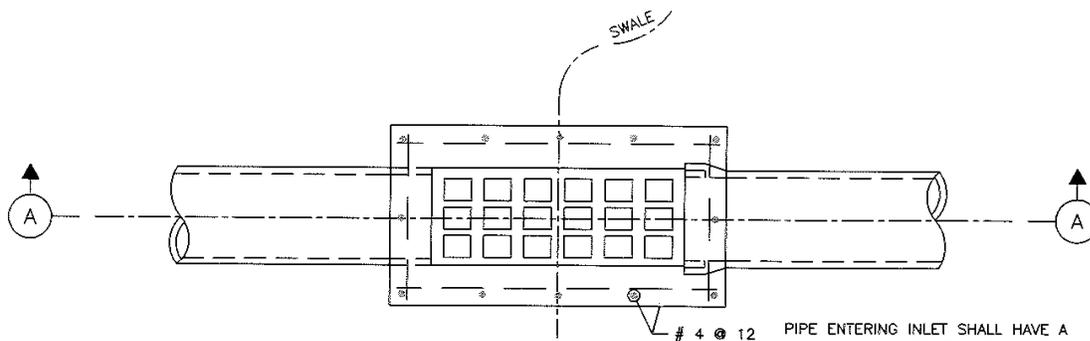
PLAN



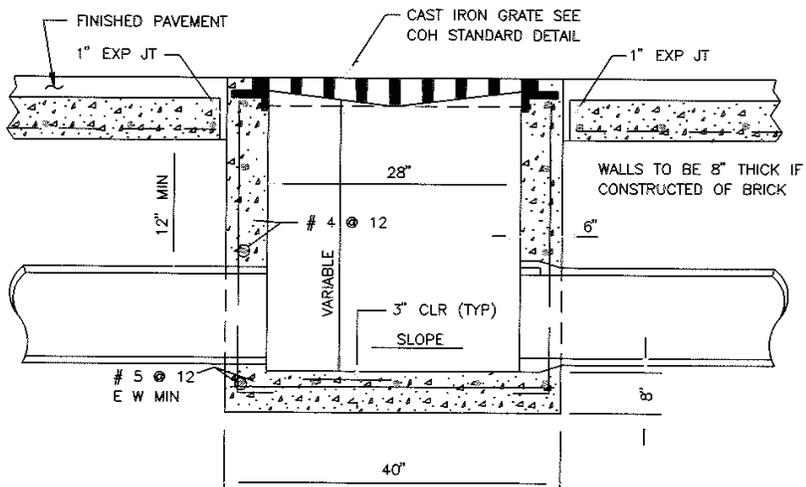
SECTION A

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
STORM SEWER TYPE "D" INLET (NOT TO SCALE)	
APPROVED BY: <i>Saadafin</i> CITY ENGINEER	APPROVED BY: DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002	DWG NO: 02632-07

COH



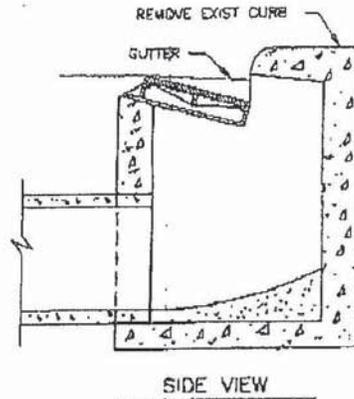
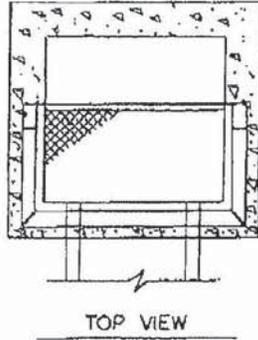
PLAN



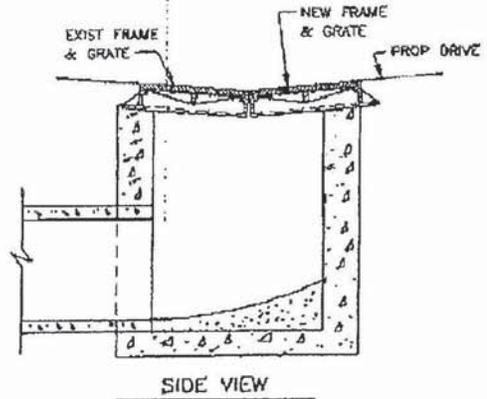
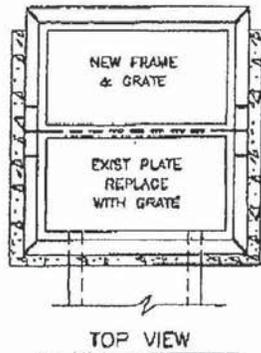
SECTION A

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
STORM SEWER TYPE "D-1" INLET (NOT TO SCALE)	
APPROVED BY: <i>S. Audapin</i> CITY ENGINEER	APPROVED BY: <i>[Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002	DWG NO: 02632-08

STEP: 1 EXIST TYPE "B" INLET

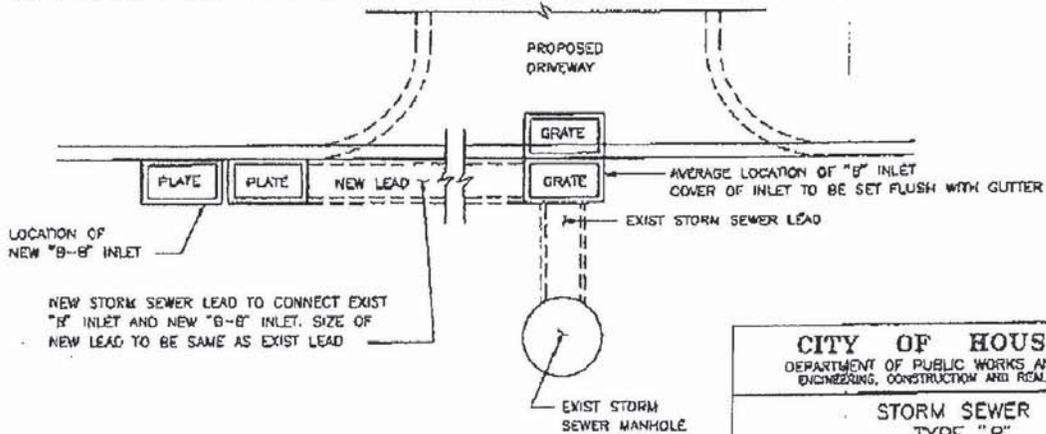


STEP: 2



1. AFTER REMOVING EXIST CURB, RAISE EXIST FRAME TO GUTTER GRADE.
2. REPLACE EXIST PLATE WITH A GRATE.
3. ADD NEW FRAME AND GRATE NEXT TO EXIST FRAME.
4. BACKFILL INLET TO A POINT ONE FOOT BEHIND THE CURB WITH 1 SACK/TON CEMENT STABILIZED SAND.

STEP: 3 CONSTRUCT NEW TYPE "B-B" INLET ON CURB RETURN OF PROPOSED DRIVEWAY



CITY OF HOUSTON
DEPARTMENT OF PUBLIC WORKS AND ENGINEERING
ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION

STORM SEWER
TYPE "B"
INLET RELOCATION
(NOT TO SCALE)

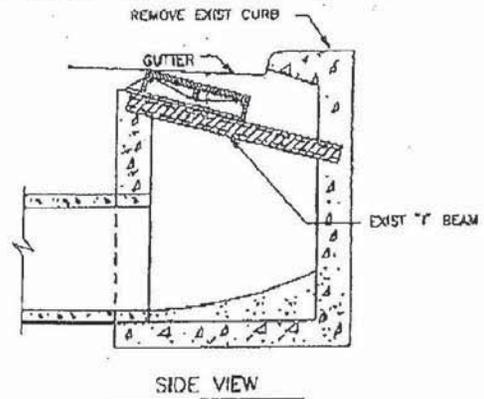
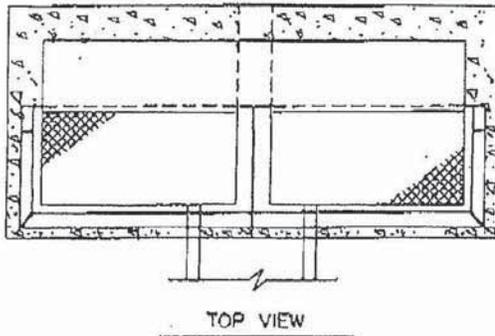
APPROVED BY
[Signature]
CITY ENGINEER

APPROVED BY
[Signature]
DIRECTOR OF PUBLIC
WORKS AND ENGINEERING

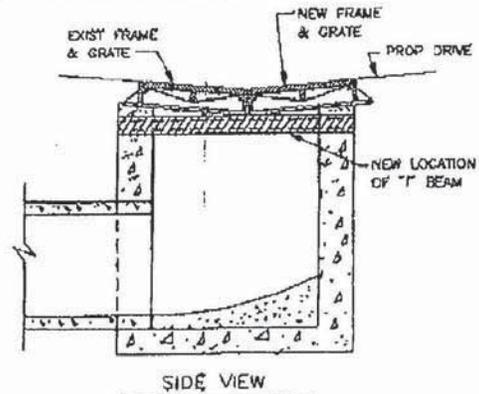
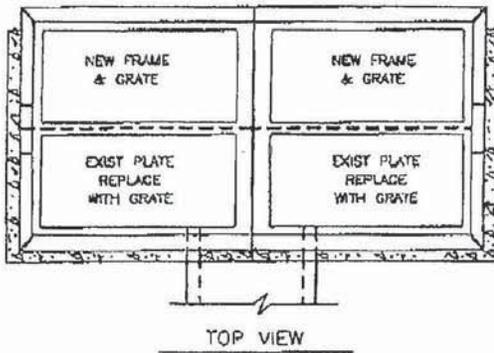
EFF DATE: OCT-01-2002

DWG NO: 02632-0.3

STEP: 1 EXIST TYPE "B-B" INLET

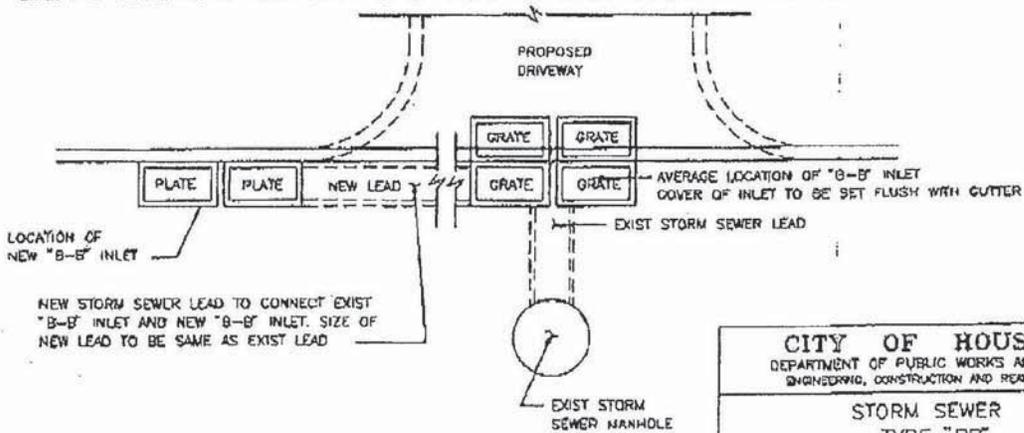


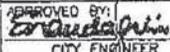
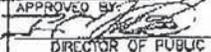
STEP: 2

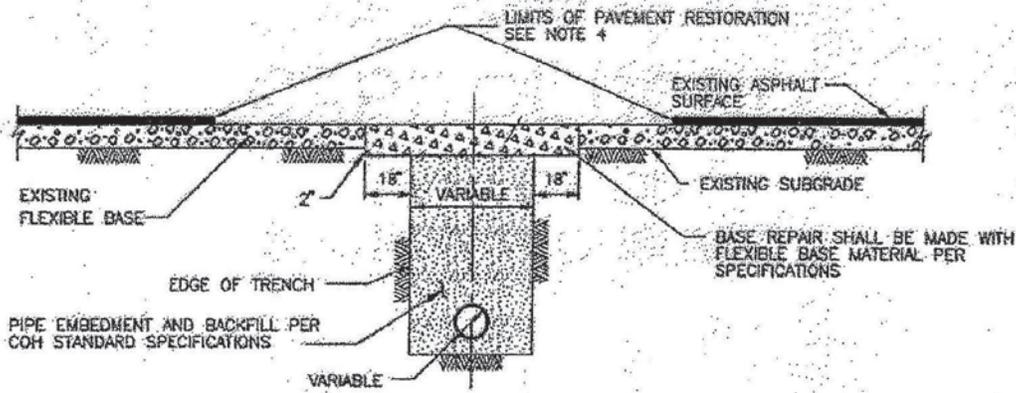


1. AFTER REMOVING EXIST CURB, RAISE EXIST "T" BEAM TO GRADE AND RESET EXIST FRAMES.
2. REPLACE EXIST PLATES WITH GRATES.
3. ADD NEW FRAMES AND GRATES NEXT TO EXIST FRAMES.
4. BACKFILL INLET TO A POINT ONE FOOT BEHIND THE CURB WITH 1 SACK/TON CEMENT STABILIZED SAND.

STEP: 3 CONSTRUCT NEW TYPE "B-B" INLET ON CURB RETURN OF PROPOSED DRIVEWAY

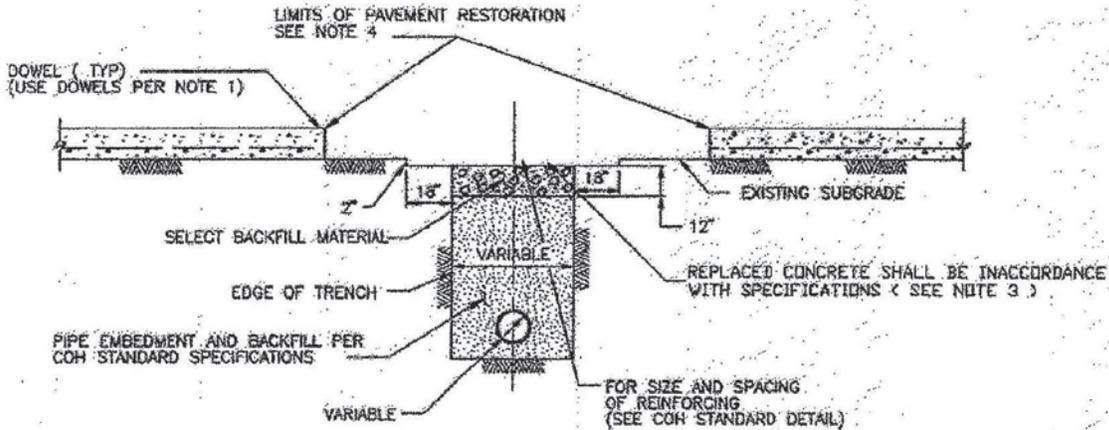


CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
STORM SEWER TYPE "B-B" INLET RELOCATION (NOT TO SCALE)	
APPROVED BY:  CITY ENGINEER	APPROVED BY:  DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002 DWG NO: 02632-05	



SECTION (A)

REPAIR OF FLEXIBLE BASE PAVEMENT



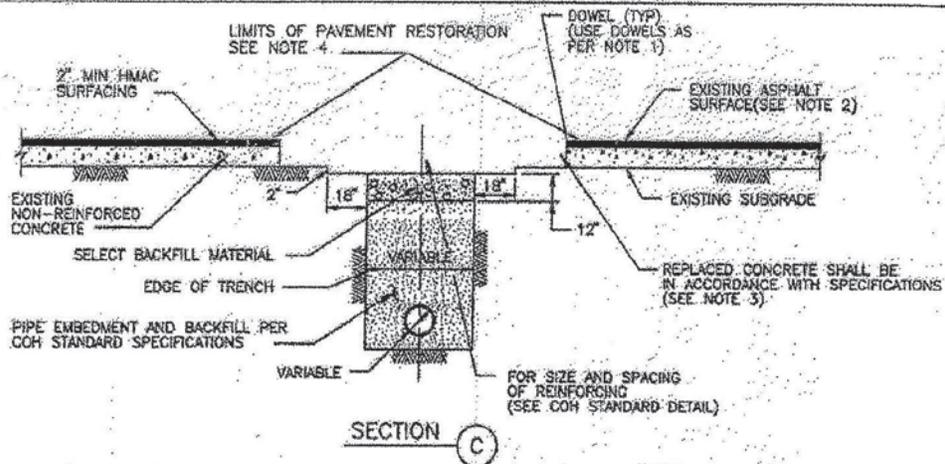
SECTION (B)

REPAIR OF REINFORCED CONCRETE PAVEMENT

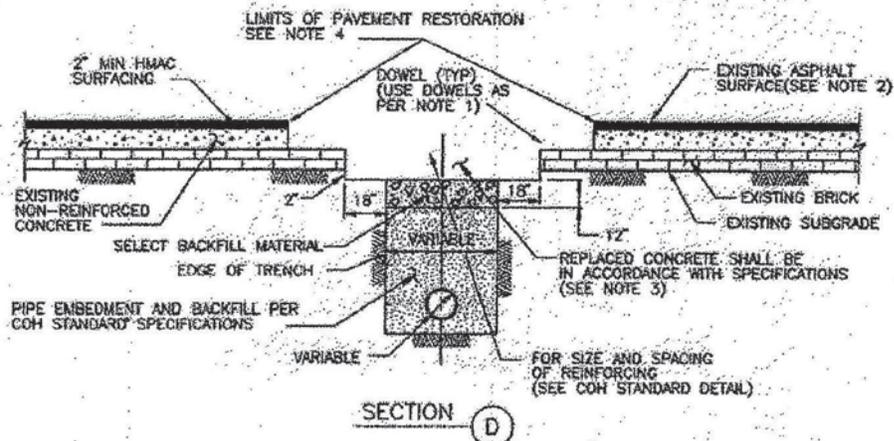
NOTE:

1. EXPOSE 15" OF REINFORCING STEEL AT PROPOSED SAWED JOINT. IF NO REINFORCING STEEL EXISTS, USE HORIZONTAL DOWELS. HORIZONTAL DOWELS SHALL BE # 6 BARS, 24" LONG, 24" C-C, DRILLED AND EMBEDDED 8" INTO THE CENTER OF THE EXISTING SLAB. WITH "PO ROC" OR EQUAL.
2. IF REINFORCED CONCRETE IS OVERLAYED WITH ASPHALT, REPLACE WITH 2" MIN HMAC SURFACING.
3. REFER TO STANDARD DETAIL 02751-01 FOR REINFORCING STEEL REQUIREMENTS.
4. REFER TO STANDARD DETAIL 02951-01 FOR PAVEMENT RESTORATION LIMITS.

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
PAVEMENT REPAIR DETAILS FOR STREET CUTS (NOT TO SCALE)	
APPROVED BY: <i>[Signature]</i> CITY ENGINEER	APPROVED BY: <i>[Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002	DWG NO: 02902-01



SECTION C
REPAIR OF NON-REINFORCED CONCRETE PAVEMENT



SECTION D
REPAIR OF NON-REINFORCED CONCRETE PAVEMENT WITH BRICK

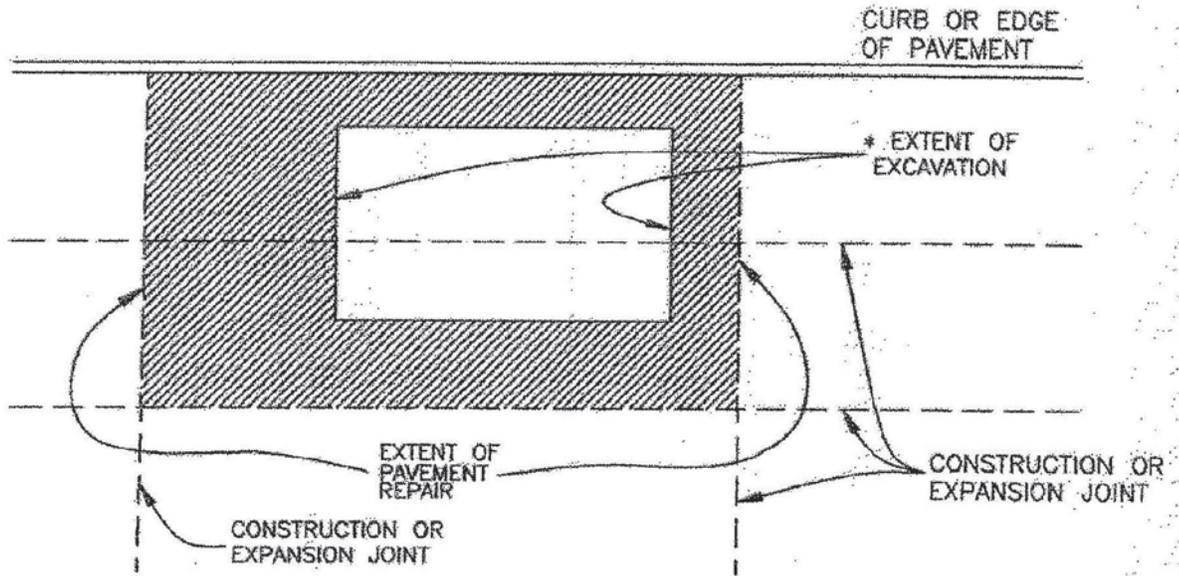
NOTE:

1. EXPOSE 15" OF REINFORCING STEEL AT PROPOSED SAWED JOINT. IF NO REINFORCING STEEL EXISTS, USE HORIZONTAL DOWELS. HORIZONTAL DOWELS SHALL BE # 6 BARS, 24" LONG, 24" C-C, DRILLED AND EMBEDDED 8" INTO THE CENTER OF THE EXISTING SLAB. WITH "PO ROC" OR EQUAL.
2. IF REINFORCED CONCRETE IS OVERLAYED REPLACE WITH SAME THICKNESS OF HMAc SURFACING.
3. REFER TO STANDARD DETAIL 02751-01 FOR REINFORCING STEEL REQUIREMENT
4. REFER TO STANDARD DETAIL 02951-01 FOR PAVEMENT RESTORATION LIMITS.

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
PAVEMENT REPAIR DETAILS FOR STREET CUTS NON REINFORCED CONCRETE AND BRICK PAVEMENT (NOT TO SCALE)	
APPROVED BY: <i>Eranda Jim</i> CITY ENGINEER	APPROVED BY: <i>[Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002	DWG NO: 02902-02

CONCRETE PAVEMENT RESTORATION

AGE OF PAVEMENT
LESS THAN OR EQUAL TO 5 YEARS



NOTES:

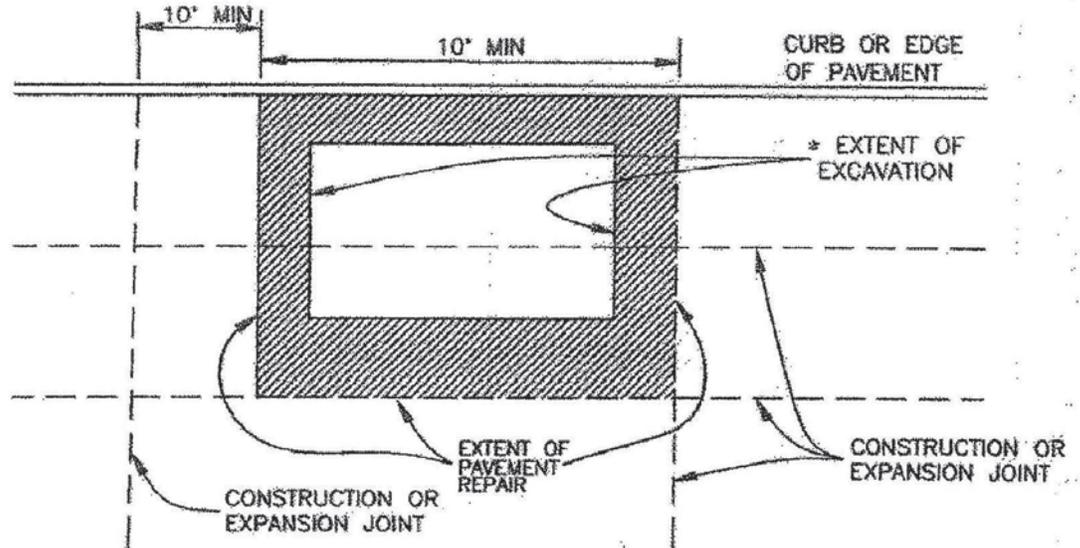
1. EXTENT OF PAVEMENT REPAIR SHALL BE PERPENDICULAR AND PARALLEL TO TRAVEL WAY.
2. REPLACE ENTIRE PANEL WIDTH AND LENGTH TO NEAREST CONSTRUCTION OR EXPANSION JOINT BEYOND EDGE OF EXCAVATION.
3. SAW CUT AND EXPOSE 15" OF REINFORCING STEEL WITHIN EXISTING PAVEMENT. PROVIDE HORIZONTAL DOWELS (PER SPECIFICATION SECTION 02902-01) IF EXISTING REINFORCING IS BROKEN OFF.
4. REPLACE CURB WHEN ADJACENT LANE IS REPLACED.
5. MAINTAIN EXPANSION JOINTS AT EXISTING LOCATIONS UNLESS OTHERWISE DIRECTED BY CITY ENGINEER.
6. SPECIALTY PAVEMENTS (IE: BRICK PAVERS) TO BE REPLACED WITH MATCHING PAVEMENT IN ALL CASES.
7. REPLACE PAVEMENT MARKINGS IN ACCORDANCE WITH CITY SPECIFICATIONS 02764 AND 02767.

* EXTENT OF EXCAVATION INCLUDES 18" OVERCUT AS SHOWN ON STANDARD DETAIL 02902-01.

CITY OF HOUSTON <small>DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE GROUP</small>	
Street Cut Pavement Replacement CONCRETE PAVEMENT LESS THAN 5 YRS IN AGE (NOT TO SCALE)	
APPROVED BY: <small>CITY ENGINEER</small>	APPROVED BY: <small>DIRECTOR OF PUBLIC WORKS AND ENGINEERING</small>
EFF DATE: JUNE 2002	DWG NO: 02951-01

CONCRETE PAVEMENT RESTORATION

AGE OF PAVEMENT
GREATER THAN 5 YEARS



NOTES:

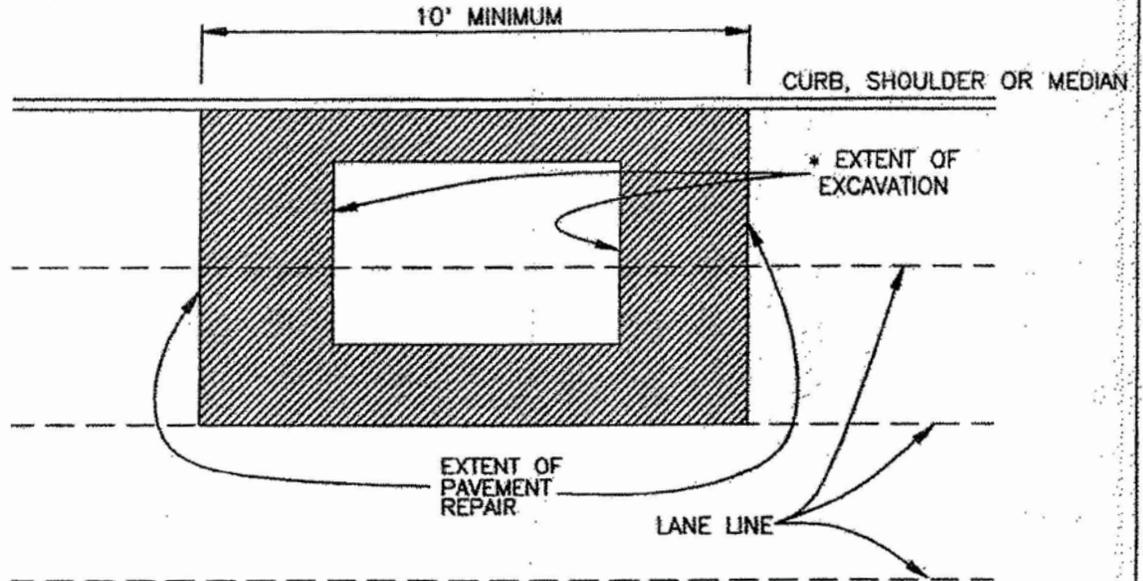
1. EXTENT OF PAVEMENT REPAIR SHALL BE PERPENDICULAR AND PARALLEL TO TRAVEL WAY.
2. WIDTH:
REPLACE PANEL WIDTH TO NEAREST CONSTRUCTION OR EXPANSION JOINT BEYOND EDGE OF EXCAVATION.
3. LENGTH:
 - a. MINIMUM LENGTH OF PAVEMENT REPAIR ALONG TRAVEL WAY IS 10' FROM THE NEAREST JOINT.
 - b. IF EDGE OF EXCAVATION IS LESS THAN 10" FROM EXISTING CONSTRUCTION OR EXPANSION JOINT, REPLACE PAVEMENT TO EXISTING JOINT.
4. SAW CUT AND EXPOSE 15" OF REINFORCING STEEL AROUND EDGE OF PANEL REPLACEMENT. PROVIDE HORIZONTAL DOWELS (PER SPECIFICATION SECTION 02902-01) IF REINFORCING IS BROKEN OFF OR DOES NOT EXIST.
5. REPLACE CURB WHEN ADJACENT LANE IS REPLACED.
6. MAINTAIN EXPANSION JOINTS AT EXISTING LOCATIONS UNLESS OTHERWISE DIRECTED BY CITY ENGINEER.
7. SPECIALTY PAVEMENTS (IE: BRICK PAVERS) TO BE REPLACED WITH MATCHING PAVEMENT IN ALL CASES.
8. REPLACE PAVEMENT MARKINGS IN ACCORDANCE WITH CITY SPECIFICATIONS 02764 AND 02767.

* EXTENT OF EXCAVATION INCLUDES 18" OVERCUT AS SHOWN ON STANDARD DETAIL 02902-01.

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE GROUP	
Street Cut Pavement Replacement CONCRETE PAVEMENT OVER 5 YRS IN AGE (NOT TO SCALE)	
APPROVED BY: CITY ENGINEER	APPROVED BY: DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: JUNE 2002	DWG NO: 02951-02

ASPHALT PAVEMENT RESTORATION

FOR PAVEMENT OF ALL AGES



NOTES:

1. EXTENT OF PAVEMENT REPAIR SHALL BE PERPENDICULAR AND PARALLEL TO TRAVEL WAY.

2. FLEXIBLE BASE:

REPLACE BASE TO SAME THICKNESS PLUS TWO INCHES (2") FOR EXTENT OF EXCAVATION. USE APPROVED BASE MATERIAL TYPE. *

3. SURFACE COURSE:

- A. WIDTH:
SURFACE MILL AND OVERLAY FULL WIDTH OF LANE(S) TO NEAREST LANE DIVIDER BEYOND EDGE OF EXCAVATION.
- B. LENGTH:
MINIMUM LENGTH OF SURFACE MILL ALONG TRAVEL WAY IS 10'.
- C. REPLACE PAVEMENT MARKINGS IN ACCORDANCE WITH CITY SPECIFICATIONS 02764 & 02767.

ADDITIONAL REQUIREMENTS FOR ASPHALT OVERLAY ON CONCRETE PAVEMENT:

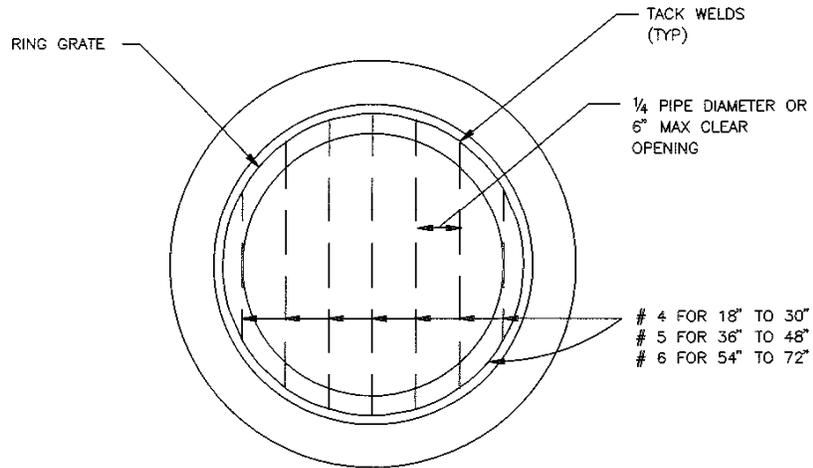
- 1. REPLACE CONCRETE FOR EXTENT OF EXCAVATION. REPLACE TO SAME THICKNESS PLUS TWO INCHES (2").
- 2. WIDTH:
IF EXCAVATION EXTENDS MORE THAN HALF OF A LANE, REPLACE ENTIRE LANE OF CONCRETE. OTHERWISE USE STANDARD DETAIL 02902-01.
- 3. SAW CUT AND EXPOSE 15" OF REINFORCING STEEL AROUND EDGE OF CONCRETE REPLACEMENT. IF NO REINFORCING STEEL EXISTS, USE HORIZONTAL DOWELS PER SPECIFICATION SECTION 02902.
- 4. REPLACE CURB WHEN ADJACENT LANE IS REPLACED.
- 5. MAINTAIN CONCRETE EXPANSION JOINTS AT EXISTING LOCATIONS UNLESS OTHERWISE APPROVED BY CITY ENGINEER.

* EXTENT OF EXCAVATION INCLUDES 18" OVERCUT AS SHOWN ON STANDARD DETAIL 02902-01.

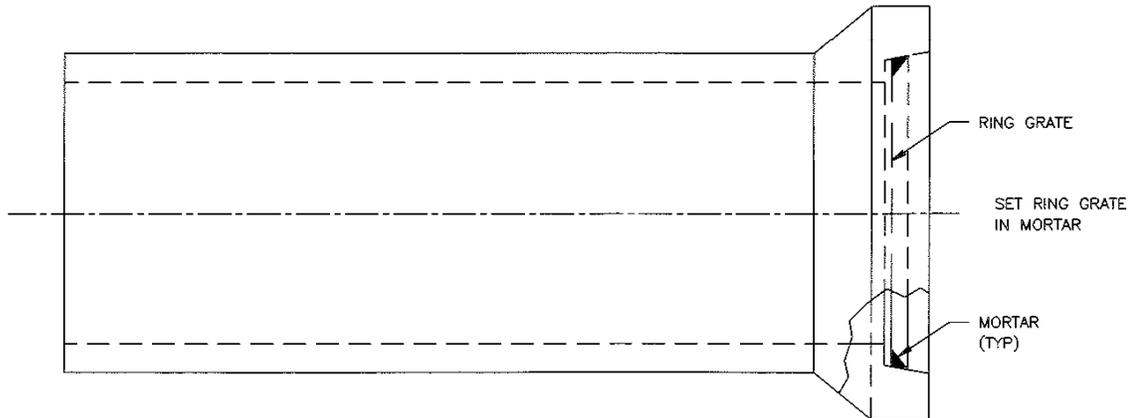
CITY OF HOUSTON <small>DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE GROUP</small>	
Street Cut Pavement Replacement ASPHALT PAVEMENT FOR PAVEMENT OF ALL AGES (NOT TO SCALE)	
APPROVED BY: <small>CITY ENGINEER</small>	APPROVED BY: <small>DIRECTOR OF PUBLIC WORKS AND ENGINEERING</small>
EFF DATE: JUNE 2002	DWG NO: 02951-03

NOTE:

- 1. GALVANIZE GRATE AFTER FABRICATION.



END VIEW



SIDE VIEW

CITY OF HOUSTON DEPARTMENT OF PUBLIC WORKS AND ENGINEERING ENGINEERING, CONSTRUCTION AND REAL ESTATE DIVISION	
STORM SEWER RING GRATE FOR OPEN END OF 18" TO 72" RCP STUBS TO DITCH (NOT TO SCALE)	
APPROVED BY: <i>[Signature]</i> CITY ENGINEER	APPROVED BY: <i>[Signature]</i> DIRECTOR OF PUBLIC WORKS AND ENGINEERING
EFF DATE: OCT-01-2002	DWG NO: 02084-11

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