Design Guidelines and Public Improvement Standards

Prepared for:

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GENERAL CONCRETE NOTES

1. ALL CONCRETE SHALL BE CLASS 3 (5 SACK MIN.) CONCRETE UNLESS OTHERWISE SPECIFIED.
2. CLASS 2 CONCRETE SHALL CONTAIN NOT LESS THAN 590 POUNDS OF PORTLAND CEMENT PER CUBIC YARD WITH 1 INCH AGGREGATE. 5 INCH MAXIMUM SLUMP. 3000 P.S.I. AT 28 DAYS.
3. CLASS 3 CONCRETE SHALL CONTAIN NOT LESS THAN 505 POUNDS OF PORTLAND CEMENT PER CUBIC YARD WITH 1 INCH AGGREGATE. INCH MAXIMUM SLUMP. 2500 P.S.I. AT 28 DAYS.
4. CLASS 4 CONCRETE SHALL CONTAIN NOT LESS THAN 420 POUNDS OF PORTLAND CEMENT PER CUBIC YARD WITH 1 INCH AGGREGATE. 5 INCH MAXIMUM SLUMP. 2500 P.S.I. AT 28 DAYS.
5. WHEN MAXIMUM DAYTIME TEMPERATURE EXCEEDS 50° F. ALL NEWLY PLACED CONCRETE SHALL BE SPRAYED UNIFORMLY WITH A CURING COMPOUND. CURING COMPOUND SHALL BE APPLIED AT A NOMINAL RATE OF ONE GALLON PER 150 SQUARE FEET, UNLESS OTHERWISE SPECIFIED.
6. ALL WORK CONSTRUCTED BY THESE STANDARDS SHALL BE IN COMPLIANCE WITH ALL CURRENT ADA REGULATIONS.
7. WHERE REBAR IS USED, CONTRACTOR SHALL INSTALL WIRE TIES SECURELY AT ALL REBAR CROSSINGS. CONCRETE BLOCK OR CHAIRS AS APPROVED BY THE CITY ENGINEER SHALL BE INSTALLED PRIOR TO CONCRETE INSTALLATION TO KEEP REBAR IN THE PROPER LOCATION.

CURBS AND GUTTERS

1. ALL CURB AND GUTTER, VEE GUTTER, MEDIAN CURB AND LANDSCAPE CURB SHALL BE CLASS 3 CONCRETE (5 SACK MIN.).
2. BARRIER TYPE CURB AND GUTTER SHALL HAVE A MINIMUM GRADIENT OF 0.20 FEET PER 100 FEET OR AS APPROVED BY THE CITY ENGINEER.
3. BARRIER TYPE CURB AND GUTTER ON THE CURVE OF CUL-DE-SACS AND STREET BULBS SHALL HAVE A MINIMUM GRADIENT OF 0.35 FEET PER 100 FEET OR AS APPROVED BY THE CITY ENGINEER.
4. ROLL TYPE CURB AND GUTTER SHALL HAVE A MINIMUM GRADIENT OF 0.35 FEET PER 100 FEET OR AS APPROVED BY THE CITY ENGINEER.
5. VEE GUTTER SHALL HAVE A MINIMUM GRADIENT OF 0.25 FEET PER 100 FEET OR AS APPROVED BY THE CITY ENGINEER.
6. ALL CURB AND GUTTER, VEE GUTTER, MEDIAN CURB AND LANDSCAPE CURB SHALL BE PLACED ON 6 INCH MOIST AND COMPACTED CLASS 2 AGGREGATE OVER 6 INCH MOIST AND COMPACTED BASE MATERIALS. 95 PERCENT MINIMUM RELATIVE COMPACTION.
7. ALL CURB AND GUTTER, VEE GUTTER, MEDIAN CURB AND LANDSCAPE CURB SHALL HAVE A LIGHT BROOM FINISH.
8. ALL CURB AND GUTTER AND VEE GUTTER SHALL HAVE WEAKENED PLANE JOINTS CONSTRUCTED AT 20 FOOT CENTERS. MEDIAN CURB AND LANDSCAPE CURB SHALL HAVE WEAKENED PLANE JOINTS CONSTRUCTED AT 10 FOOT CENTERS. WEAKENED PLANE JOINTS SHALL BE A MINIMUM OF 1-1/2 INCHES IN DEPTH AND SHALL BE FINISHED WITH A SCORING TOOL LEAVING THE EDGES ROUNDED.
9. ALL EXPOSED SURFACES OF CURB AND GUTTER, VEE GUTTER, MEDIAN CURB AND LANDSCAPE CURB SHALL NOT VARY IN EXCESS OF 0.02 FEET WHEN A 10 FOOT STRAIGHT EDGE IS PLACED ON THE SURFACE, EXCEPT AT GRADE CHANGES OR CURVES.
10. ALL CURB AND GUTTER AND VEE GUTTER SHALL BE WATER TESTED FOR FLOW.
11. ALL CURB AND GUTTER, VEE GUTTER, MEDIAN CURB AND LANDSCAPE CURB SHALL BE CURED IN ACCORDANCE WITH THE PROVISIONS IN THE GENERAL CONCRETE NOTES IN THESE IMPROVEMENT STANDARDS.

City of Lindsay

CITY SERVICES DEPARTMENT

CONCRETE STANDARDS

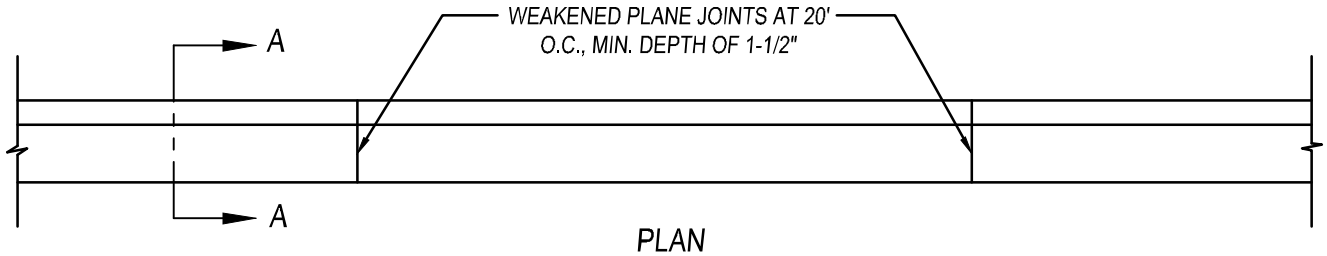
MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	C-1
			DATE	03/06/25	1 OF 2

SIDEWALKS AND RAMPS

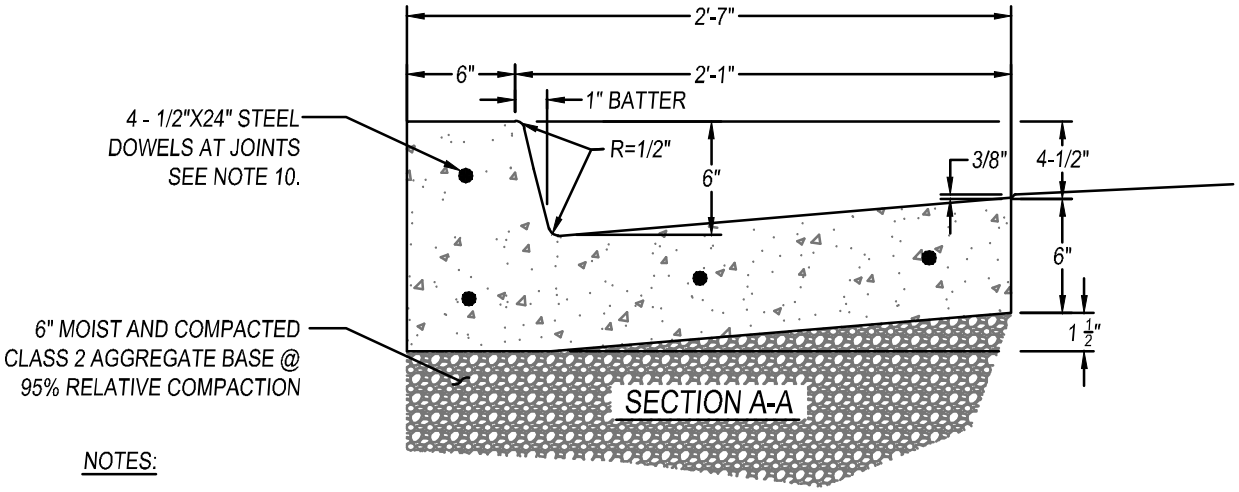
1. ALL SIDEWALKS AND RAMPS SHALL BE CLASS 3 CONCRETE.
2. SIDEWALKS AND RAMPS SHALL BE PLACED ON 6 INCH MOIST AND COMPACTED BASE MATERIALS. 90 PERCENT RELATIVE COMPACTION UNDER SIDEWALKS. 95 PERCENT RELATIVE COMPACTION UNDER RAMPS AND SIDEWALKS AT CURB RETURNS.
3. SIDEWALKS AND RAMPS SHALL BE STEEL TROWELED AND HAVE A LIGHT BROOM FINISH UNLESS OTHERWISE NOTED. RAMPS SHALL HAVE A HEAVY BROOM FINISH ACROSS THE SLOPE OF THE RAMP.
4. SIDEWALKS AND RAMPS SHALL HAVE WEAKENED PLANE JOINTS CONSTRUCTED AT 10 FOOT CENTERS AND WHERE SHOWN IN THESE IMPROVEMENT STANDARDS. WEAKENED PLANE JOINTS SHALL BE A MINIMUM OF 1 INCH IN DEPTH AND SHALL BE FINISHED WITH A SCORING TOOL LEAVING THE EDGES ROUNDED.
5. ESTABLISHED SIDEWALK PATTERN IN BLOCK SHALL BE MATCHED.
6. SPECIAL SIDEWALK DESIGNS AND MATERIALS SHALL BE SUBJECT TO APPROVAL BY THE CITY ENGINEER.
7. SIDEWALK INSTALLED IN INFILL OR EXISTING AREAS SHALL BE SUBJECT TO THE APPROVAL OF THE CITY ENGINEER.
8. ALL SIDEWALKS AND RAMPS SHALL BE CURED IN ACCORDANCE WITH THE PROVISIONS IN THE GENERAL CONCRETE NOTES OF THESE IMPROVEMENT STANDARDS.
9. DETECTABLE WARNING SURFACES SHALL BE INSTALLED PER THESE IMPROVEMENT STANDARDS AND AS REQUIRED BY THE CITY ENGINEER.

DRIVE APPROACHES

1. ALL DRIVE APPROACHES SHALL BE CLASS 3 CONCRETE UNLESS OTHERWISE NOTED.
2. SINGLE FAMILY RESIDENTIAL DRIVE APPROACHES SHALL BE PLACED ON 6 INCH MOIST AND COMPACTED CLASS 2 AGGREGATE BASE OVER 6 INCH MOIST AND COMPACTED BASE MATERIALS. 95 PERCENT RELATIVE COMPACTION.
3. MULTI-FAMILY RESIDENTIAL, OFFICE AND COMMERCIAL DRIVE APPROACHES SHALL BE PLACED ON 6 INCH MOIST AND COMPACTED CLASS 2 AGGREGATE BASE OVER 6 INCH MOIST AND COMPACTED BASE MATERIALS. 95 PERCENT RELATIVE COMPACTION.
4. MAJOR COMMERCIAL DRIVE APPROACHES SHALL BE PLACED ON 6 INCH MOIST AND COMPACTED CLASS 2 AGGREGATE BASE OVER 6 INCH MOIST AND COMPACTED BASE MATERIALS. 95 PERCENT RELATIVE COMPACTION.
5. DRIVE APPROACHES SHALL BE STEEL TROWELED AND HAVE A LIGHT BROOM FINISH.
6. 1/2" LIP, MAXIMUM, IS REQUIRED AT ALL DRIVEWAY DEPRESSIONS.
7. DRIVE APPROACHES SHALL HAVE A WEAKENED PLANE JOINT CONSTRUCTED AT EACH EDGE AND AT THE CENTERLINE. WEAKENED PLANE JOINTS SHALL BE A MINIMUM OF 1-1/2 INCH IN DEPTH AND SHALL BE FINISHED WITH A SCORING TOOL LEAVING THE EDGES ROUNDED.
8. NOT MORE THAN 50 PERCENT OF PROPERTY FRONTAGE SHALL BE USED AS DRIVE APPROACH.
9. DRIVE APPROACHES ON STATE ROUTES ARE SUBJECT TO APPROVAL BY CALTRANS.
10. ALL EXPOSED SURFACES OF DRIVE APPROACHES AND FLOW LINES SHALL NOT VARY IN EXCESS OF 0.02 FEET WHEN A 10 FOOT STRAIGHT EDGE IS PLACED ON THE SURFACE, EXCEPT AT GRADE CHANGES OR CURVES.
11. ALL DRIVE APPROACHES SHALL BE CURED IN ACCORDANCE WITH THE PROVISIONS IN THE GENERAL CONCRETE NOTES OF THESE IMPROVEMENT STANDARDS.



PLAN



SECTION A-A

NOTES:

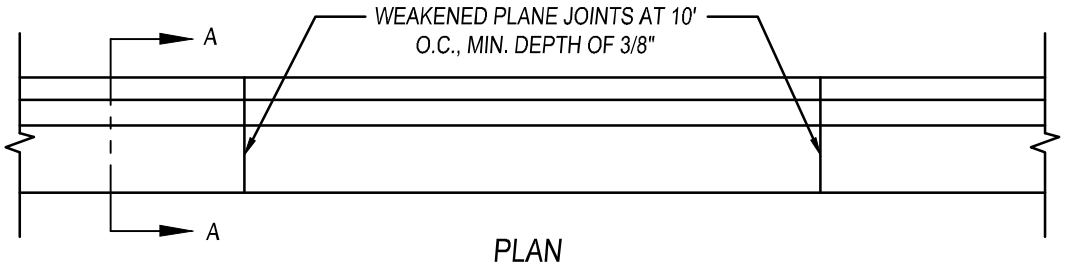
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE (5 SACK MIN.).
2. A WEAKENED PLANE JOINT OR COLD JOINT SHALL BE INSTALLED AT THE END OF CURB RETURNS AND AT THE CENTERLINE OF PROPOSED DRIVE APPROACHES.
3. CALTRANS FACILITIES REQUIRE STATE STANDARD CURB AND GUTTER.
4. WHERE ADA ACCESSIBLE PATH CROSSES GUTTER PAN, SLOPE IN THE DIRECTION OF TRAVEL SHALL BE 4% MINIMUM AND 5% MAXIMUM.
5. CURB AND GUTTER SHALL HAVE A GRADIENT OF 0.20% MINIMUM.
6. WEAKENED PLANE JOINTS (DEEP JOINTS) SHALL BE REQUIRED AT 20' O.C.; THE DEFINITION OF WEAKENED PLANE JOINTS SHALL BE 1" MINIMUM DEPTH AND SHALL BE FINISHED WITH A SCORING TOOL, LEAVING THE EDGES ROUNDED.
7. TOP AND FACE OF CURB SHALL HAVE A LIGHT BRUSH FINISH, GUTTER SHALL HAVE A LIGHT BROOM FINISH.
8. FINISHED SURFACES SHALL BE TREATED WITH A CURING COMPOUND APPROVED BY CITY ENGINEER.
9. CONTRACTOR SHALL FILL AREA BETWEEN NEW GUTTER AND EXISTING STREET SURFACE WITH SAME TYPE OF MATERIAL AS EXISTING STREET TO A MINIMUM SECTION OR 2" ASPHALT CONCRETE TYPE B OVER 4" CLASS 2 BASE OR AS DIRECTED BY ENGINEER. APPLY PRIME COAT TO NEW GUTTER AND EXISTING STREET AS DIRECTED BY ENGINEER.
10. STEEL DOWELS ARE REQUIRED AT COLD JOINTS ONLY. 1/2" DIAMETER X 24" LONG EMBEDDED 12" INTO EACH SECTION OF CURB AND GUTTER. A TOTAL OF 4 DOWELS (2 IN CURBING, 2 IN GUTTER PAN) ARE REQUIRED. EXPANSION FELT SHALL BE REQUIRED AT COLD JOINTS ALSO.

City of Lindsay

CITY SERVICES DEPARTMENT

BARRIER TYPE CURB & GUTTER

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-2
			DATE 03/06/25	



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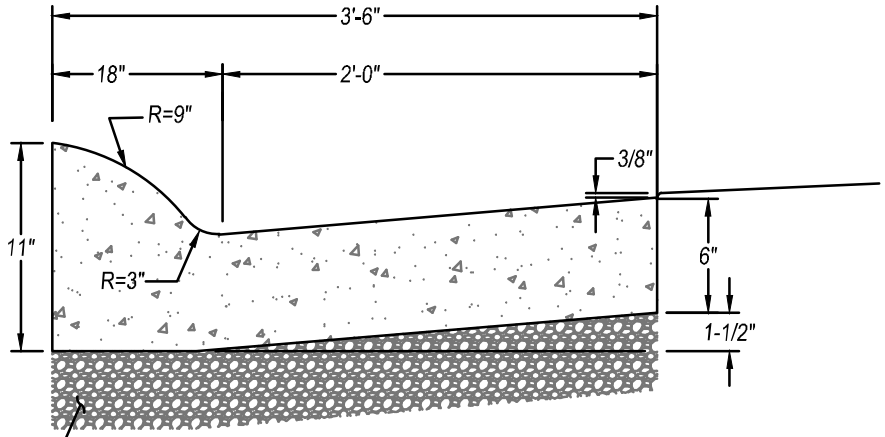


SECTION A-A

6" MOIST AND COMPACTED CLASS 2 AGGREGATE BASE @ 95% RELATIVE COMPACTION

NOTES:

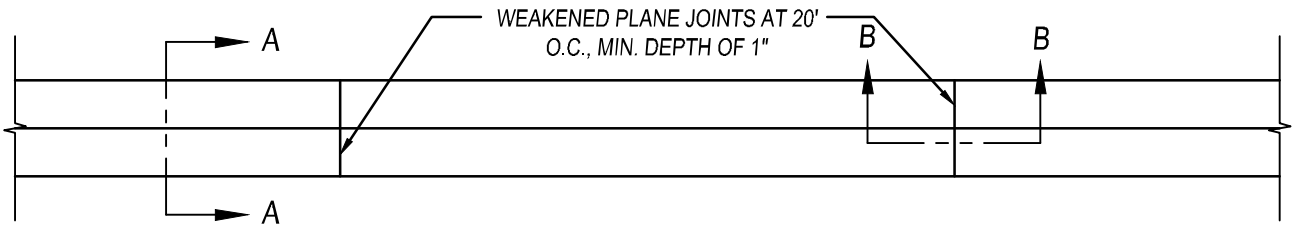
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE (5 SACK MIX).
2. ALL CONCRETE SHOULD HAVE A LIGHT BROOM FINISH.
3. 1/2" EXPANSION JOINT AT END OF CURVE AND BEGINNING OF CURVE OF WALK RETURNS, DRIVEWAY APPROACHES AND AT INTERVALS OF 40' O.C. (MAX.).
4. WEAKENED PLANE JOINTS SHALL BE CONSTRUCTED AT 10' CENTERS AND SHALL BE A MINIMUM DEPTH OF 3/8" AND SHALL BE FINISHED WITH A SCORING TOOL LEAVING THE EDGES ROUNDED.
5. FINISHED SURFACES SHALL BE TREATED WITH CURING COMPOUND APPROVED BY CITY ENGINEER.
6. ROLL TYPE CURB AND GUTTER SHALL NOT BE CONSTRUCTED EXCEPT TO COMPLETE A BLOCK WITH EXISTING ROLL TYPE CURB AND GUTTER OR TO REPLACE EXISTING DAMAGED ROLL CURB.

City of Lindsay

CITY SERVICES DEPARTMENT

ROLL TYPE CURB & GUTTER

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-3
			DATE 03/06/25	



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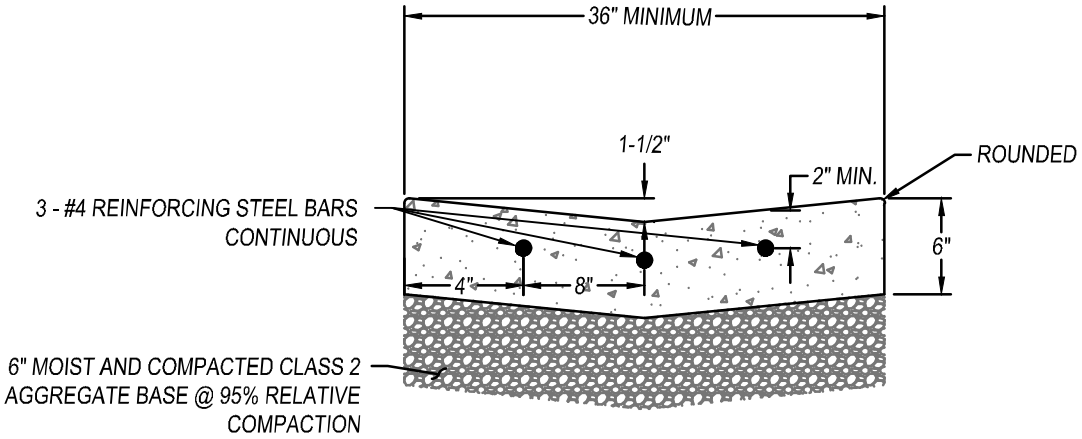

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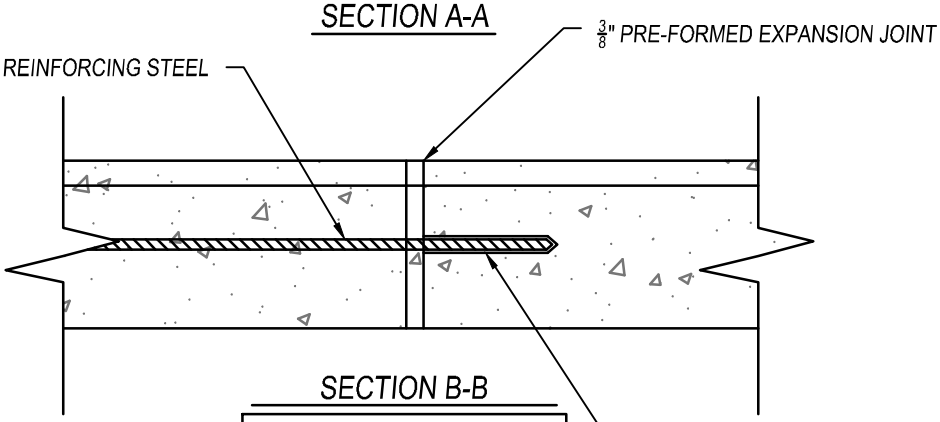


SECTION B-B

CONSTRUCTION JOINT

NOTES:

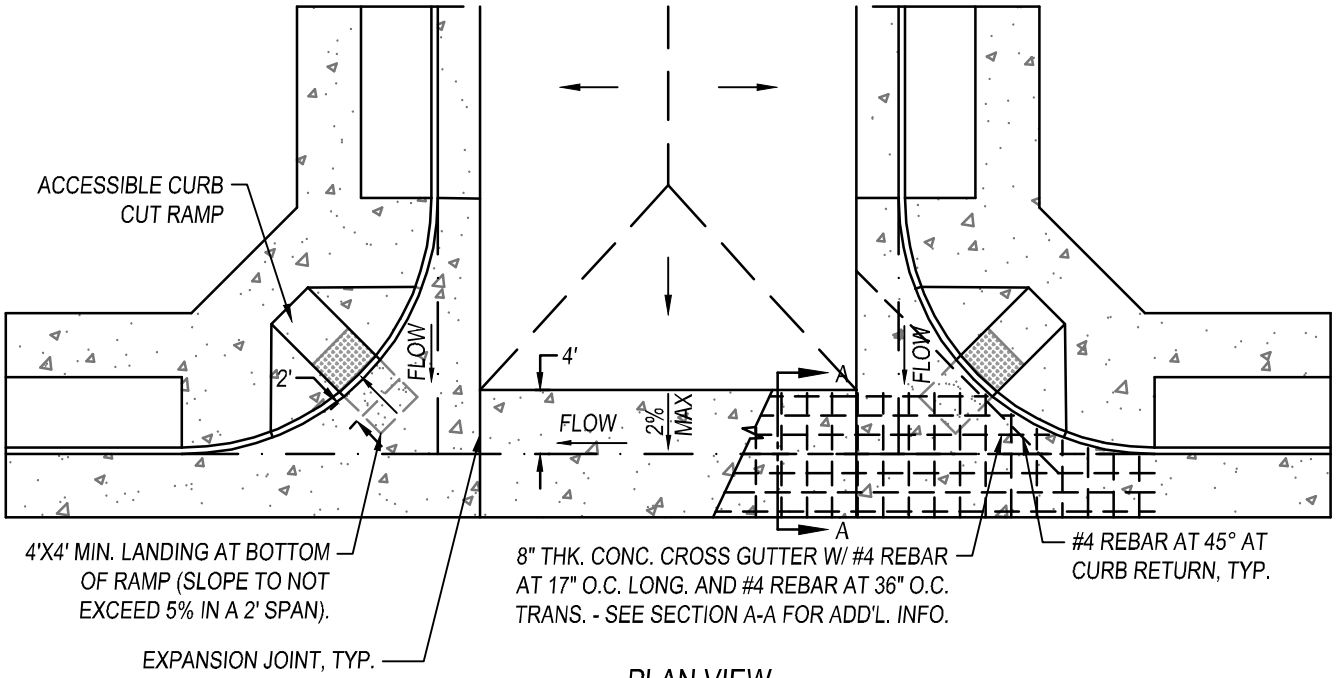
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. REBAR SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REBAR SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
3. REBAR SHALL HAVE A MINIMUM OF 2" OF CLEAR COVERAGE.
4. WHERE ADA ACCESSIBLE PATH CROSSES GUTTER PAN, SLOPE IN THE DIRECTION OF TRAVEL SHALL BE 4% MINIMUM AND 5% MAXIMUM.

City of Lindsay

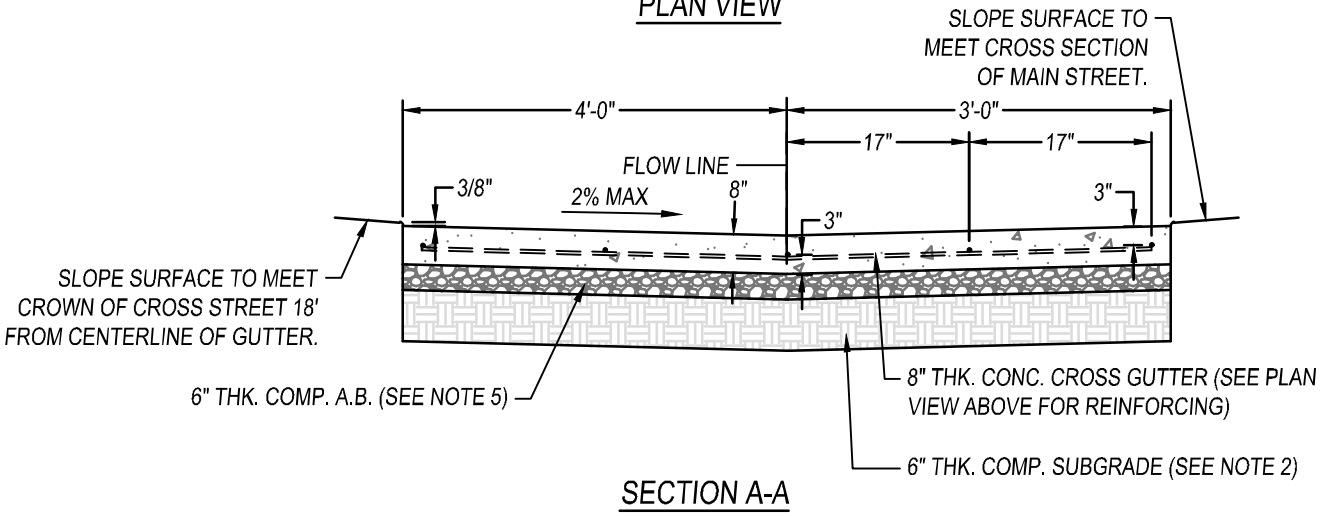
CITY SERVICES DEPARTMENT

VEE GUTTER

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-4
			DATE 03/06/25	



PLAN VIEW



SECTION A-A

NOTES:

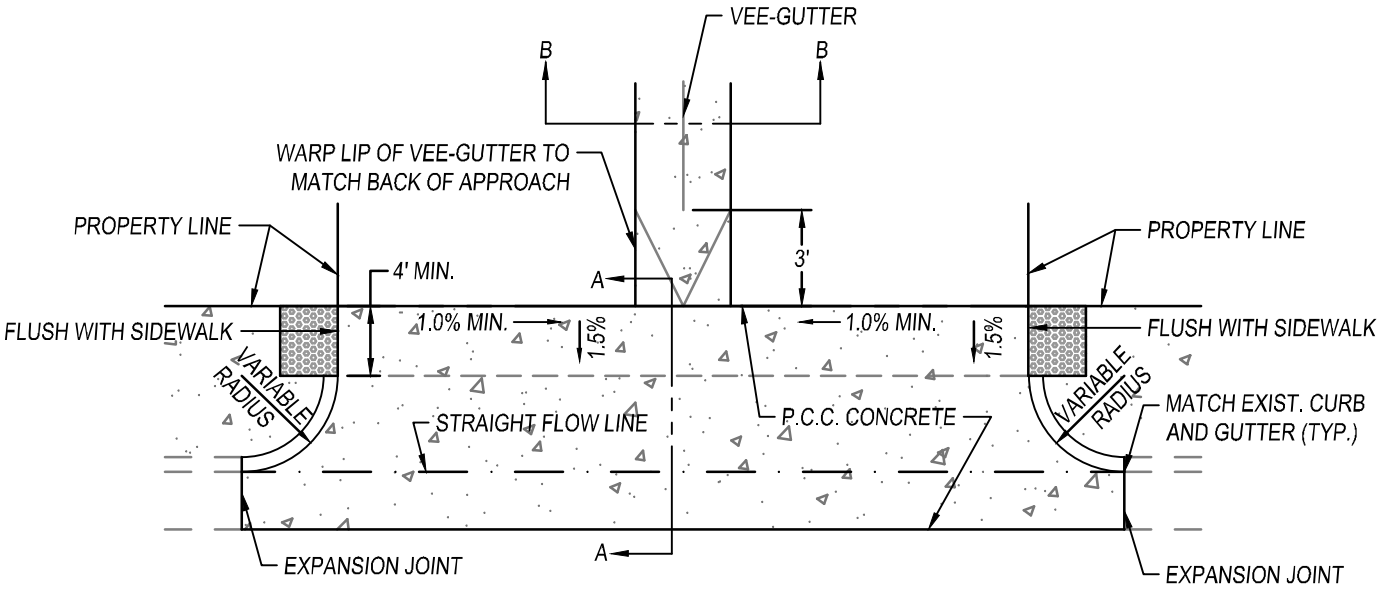
1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. SUBGRADE SHALL BE THOROUGHLY WATERED AND ROLLED OR TAMPED TO 95% RELATIVE COMPACTION.
3. WIDER CROSS GUTTER MAY BE REQUIRED UPON APPROVAL OF CITY ENGINEER.
4. THE VALLEY GUTTER SHALL HAVE A MINIMUM SLOPE 0.0030 FT/FT IN THE DIRECTION OF FLOW.
5. BASE SHALL BE 6 INCHES CLASS 2 AGGREGATE BASE, TO 95% RELATIVE COMPACTION (ASTM D1557).
6. CURB AND CROSS GUTTER SHALL BE POURED MONOLITHICALLY, SEPARATELY FROM RAMPS.
7. #4 BARS TO EXTEND 12" BEYOND CONSTRUCTION JOINT. EXTENSION TO BE WRAPPED WITH A KRAFT TYPE PAPER TO ALLOW MOVEMENT.

City of Lindsay

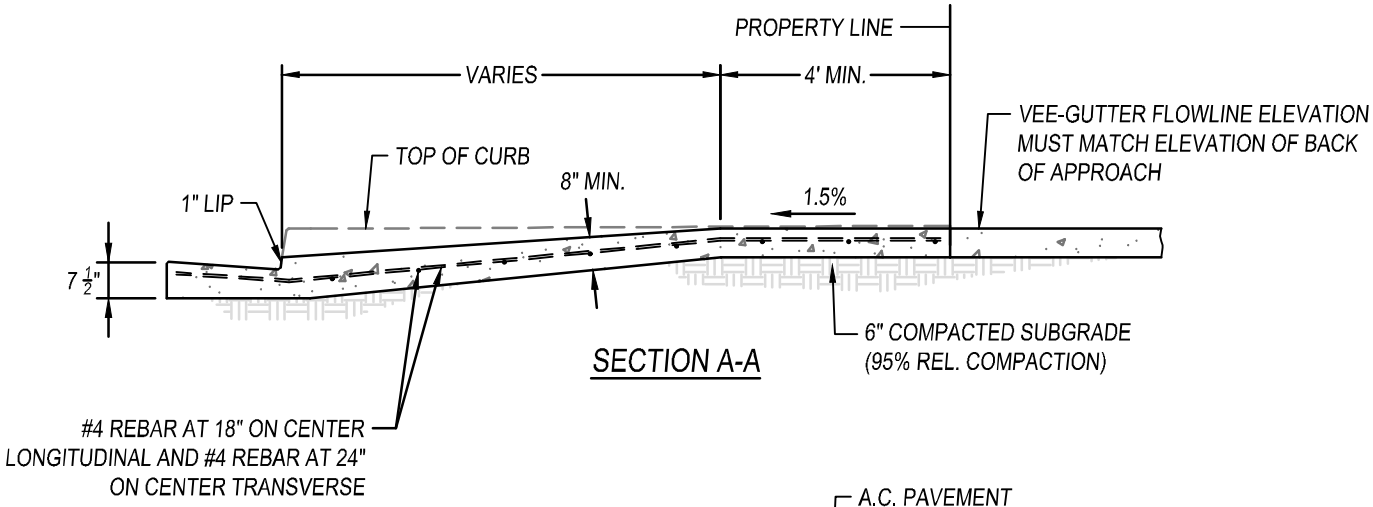
CITY SERVICES DEPARTMENT

CROSS GUTTER

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-5
			DATE 03/06/25	



PLAN VIEW



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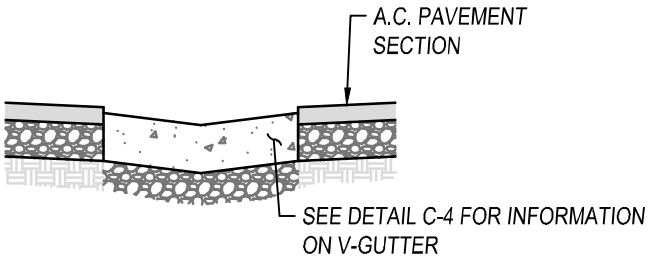


SECTION B-B

NOTES:

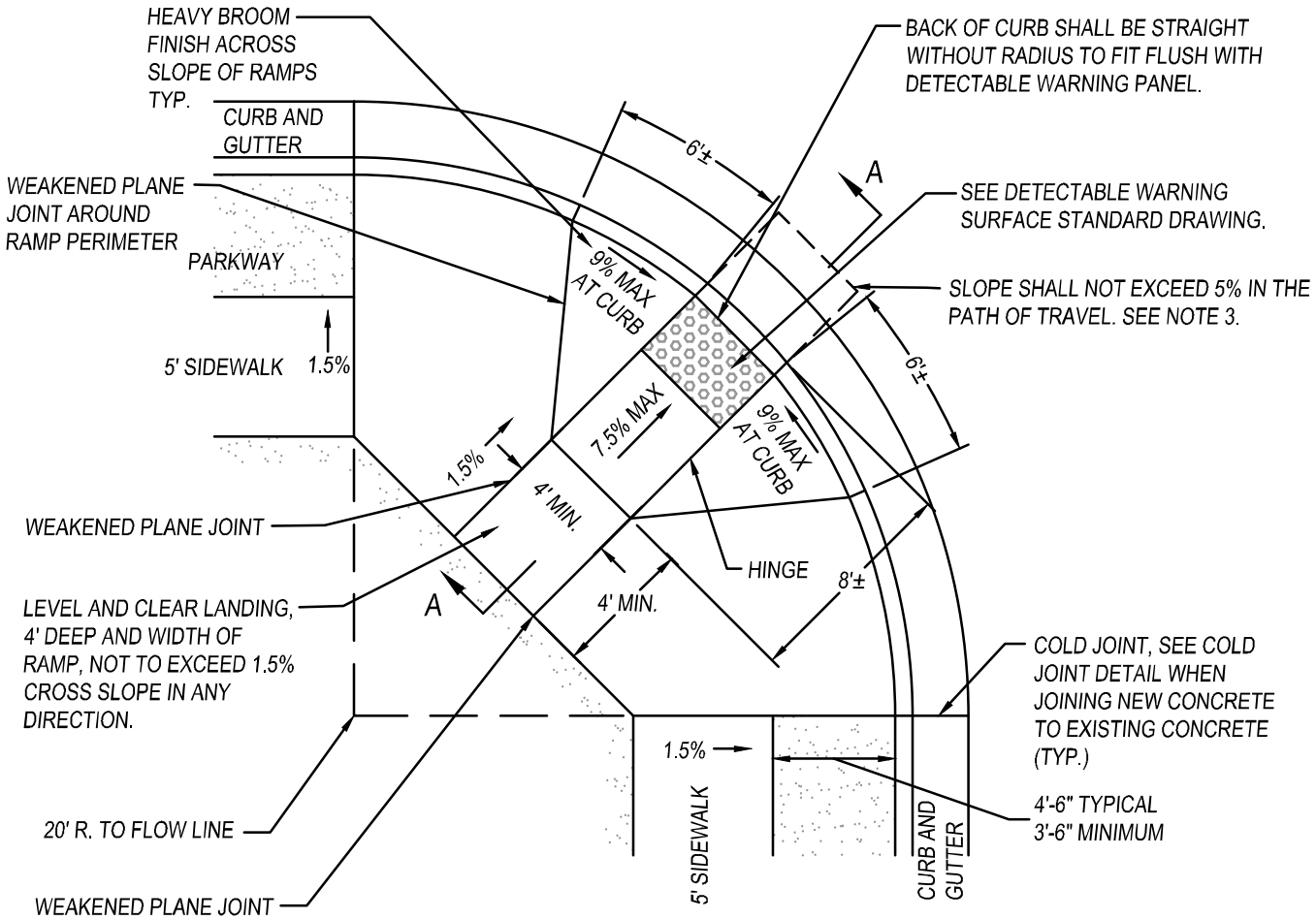
1. THE UPPER 6" OF SUBGRADE SHALL BE COMPACTED TO 95% RELATIVE COMPACTION (ASTM D1557).
2. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
3. CURB AND GUTTER SECTIONS SHALL CONFORM TO CITY OF LINDSAY STANDARD CURB AND GUTTER.

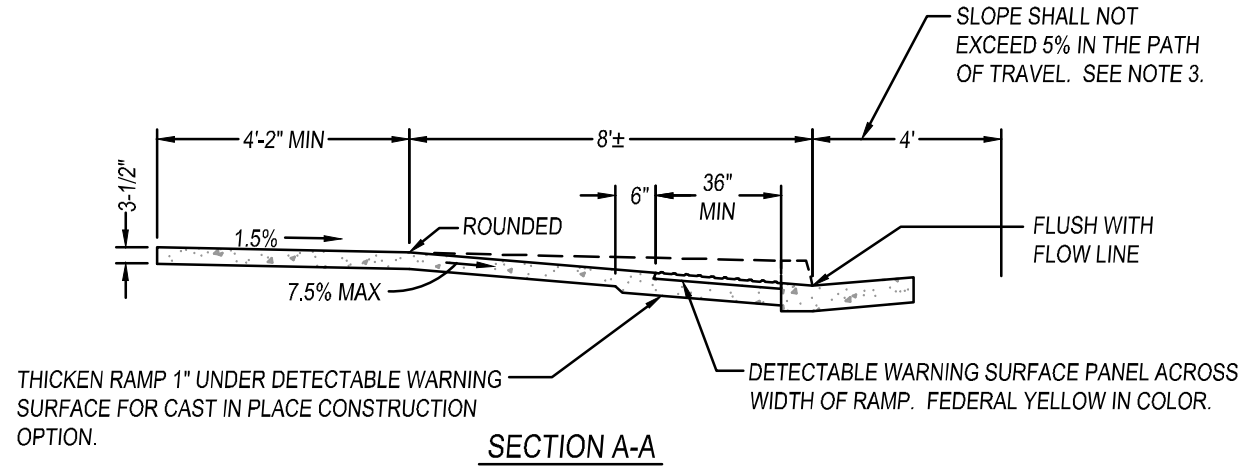
City of Lindsay

CITY SERVICES DEPARTMENT

ALLEY CROSS GUTTER

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-6
			DATE 03/06/25	





SECTION A-A

NOTES:

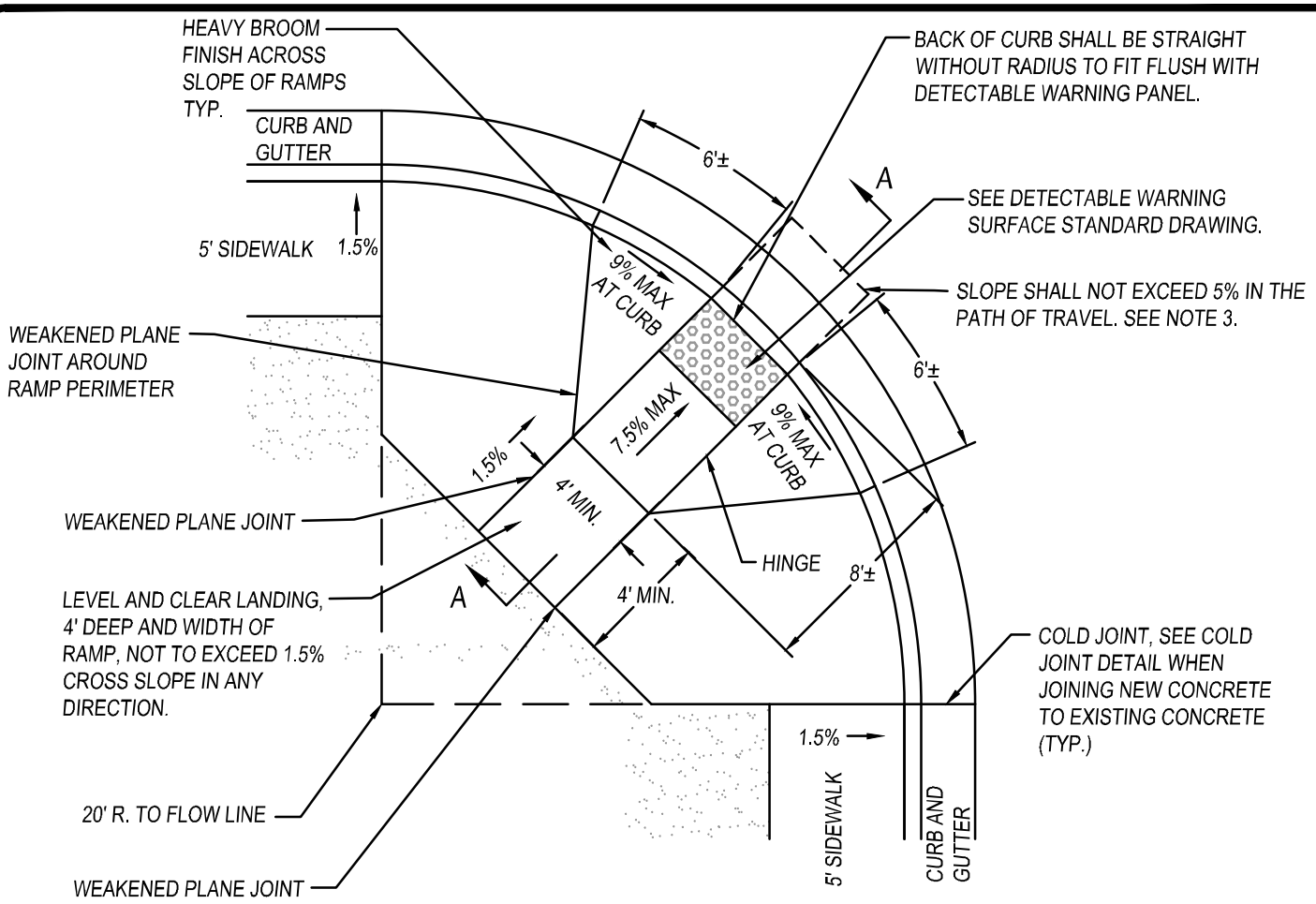
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. APPLICABLE TO LOCAL STREET INTERSECTIONS IN RESIDENTIAL AND OFFICE ZONES.
3. MAXIMUM SLOPES OF ADJOINING GUTTERS, THE ROAD SURFACE IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
4. NO CROSS SLOPE IN THE PATH OF TRAVEL TO EXCEED 1.5%.

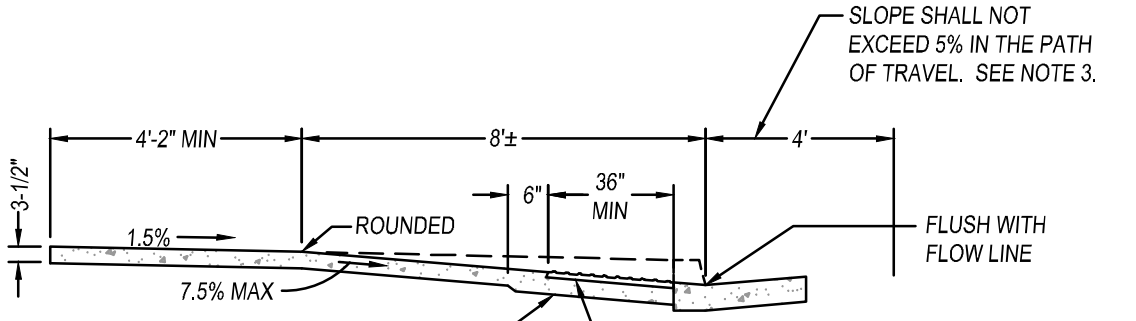
City of Lindsay

CITY SERVICES DEPARTMENT

20' RADIUS CURB RETURN WITH SIDEWALK CONNECTION - DETAIL 1

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-7
			DATE 03/06/25	1 OF 3





SECTION A-A

NOTES:

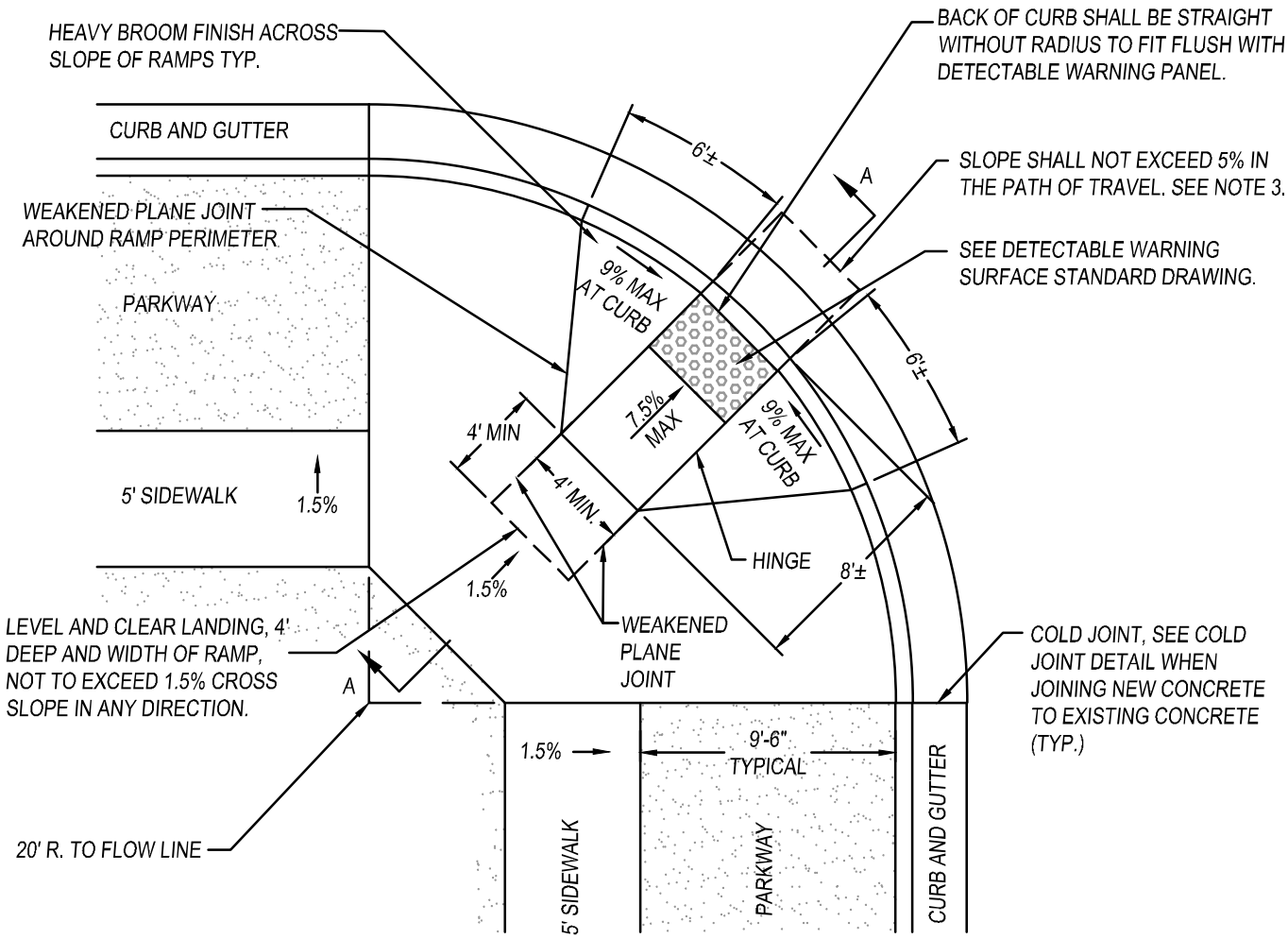
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. APPLICABLE TO LOCAL STREET INTERSECTIONS IN RESIDENTIAL AND OFFICE ZONES.
3. MAXIMUM SLOPES OF ADJOINING GUTTERS, THE ROAD SURFACE IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
4. NO CROSS SLOPE IN THE PATH OF TRAVEL TO EXCEED 1.5%.

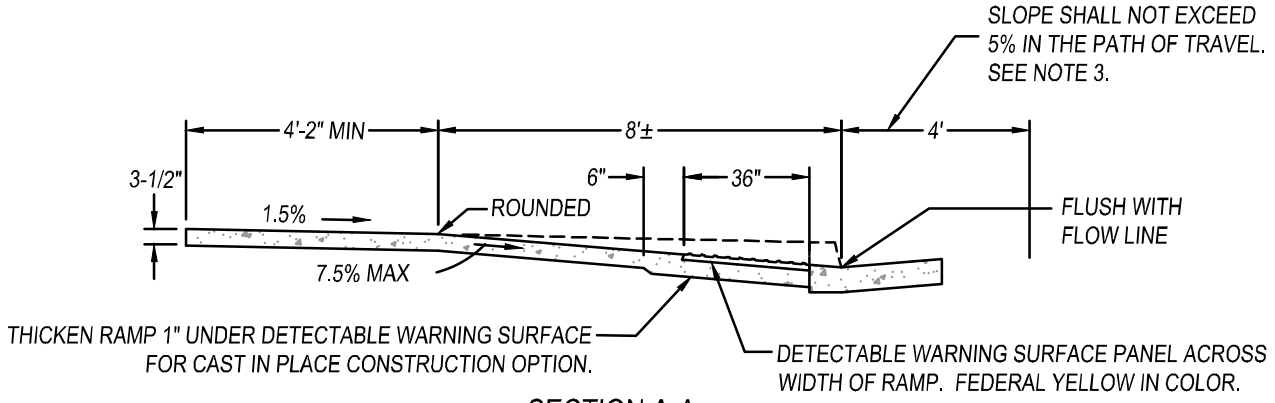
City of Lindsay

CITY SERVICES DEPARTMENT

20' RADIUS CURB RETURN WITH SIDEWALK CONNECTION - DETAIL 2

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-7
			DATE 03/06/25	2 OF 4





SECTION A-A

NOTES:

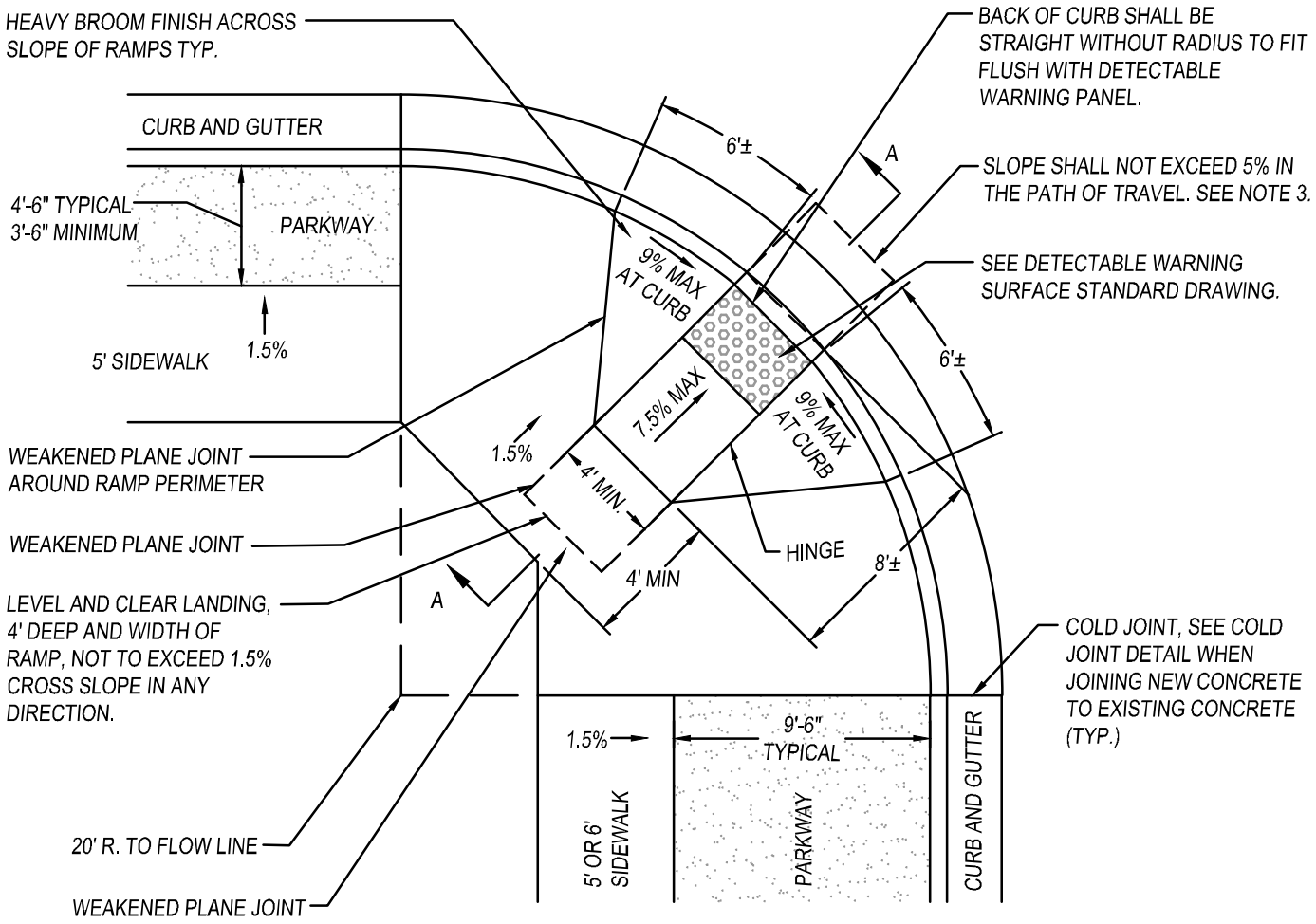
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. APPLICABLE TO LOCAL STREET INTERSECTIONS IN RESIDENTIAL AND OFFICE ZONES.
3. MAXIMUN SLOPES OF ADJOINING GUTTERS, THE ROAD SURFACE IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
4. NO CROSS SLOPE IN THE PATH OF TRAVEL TO EXCEED 1.5%.

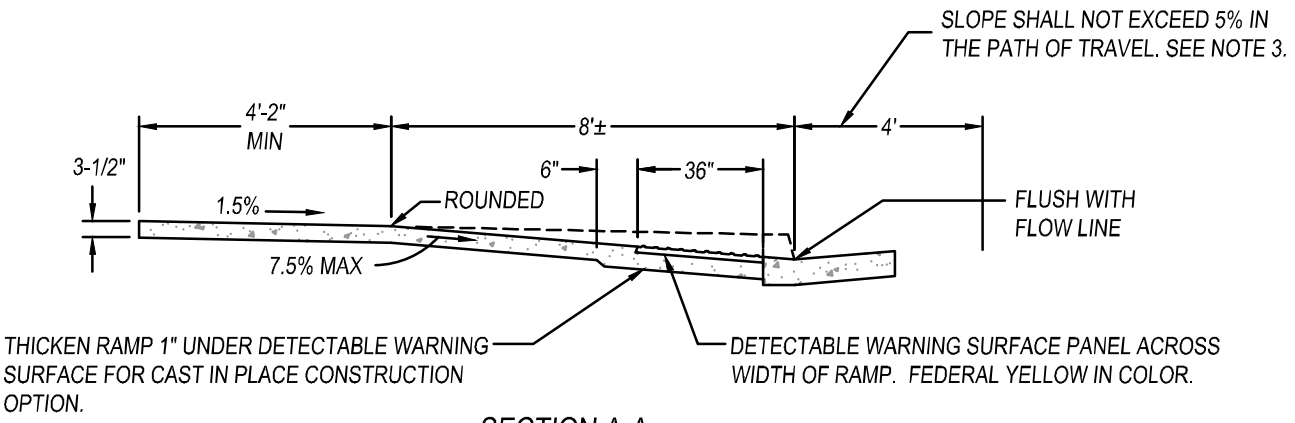
City of Lindsay

CITY SERVICES DEPARTMENT

20' RADIUS CURB RETURN WITH SIDEWALK CONNECTION - DETAIL 3

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-7
			DATE 03/06/25	3 OF 4





SECTION A-A

NOTES:

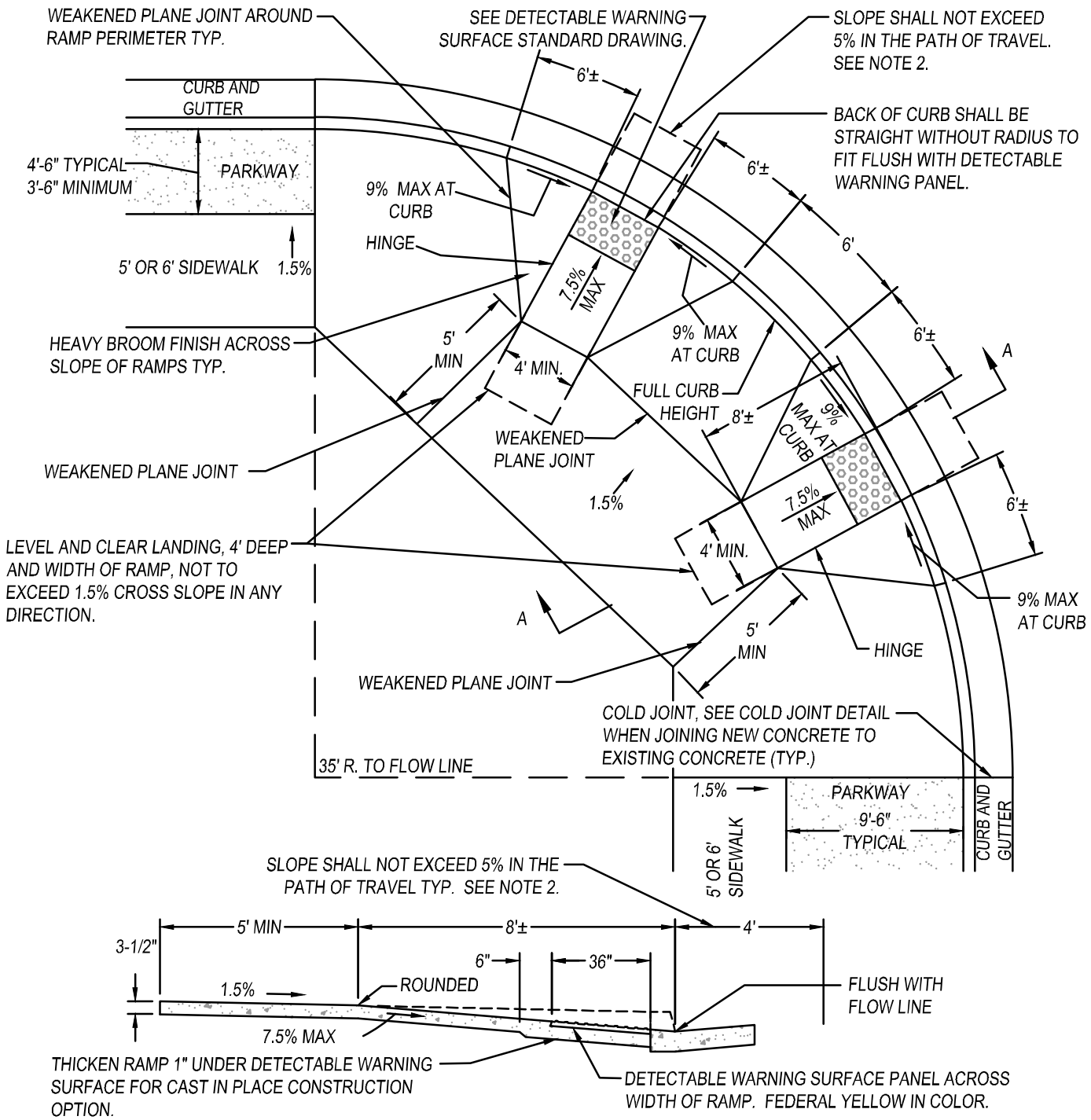
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. APPLICABLE TO LOCAL STREET INTERSECTIONS IN RESIDENTIAL AND OFFICE ZONES.
3. MAXIMUM SLOPES OF ADJOINING GUTTERS, THE ROAD SURFACE IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
4. NO CROSS SLOPE IN THE PATH OF TRAVEL TO EXCEED 1.5%.

City of Lindsay

CITY SERVICES DEPARTMENT

20' RADIUS CURB RETURN WITH SIDEWALK CONNECTION - DETAIL 4

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-7
			DATE 03/06/25	4 OF 4



SECTION A-A

NOTES:

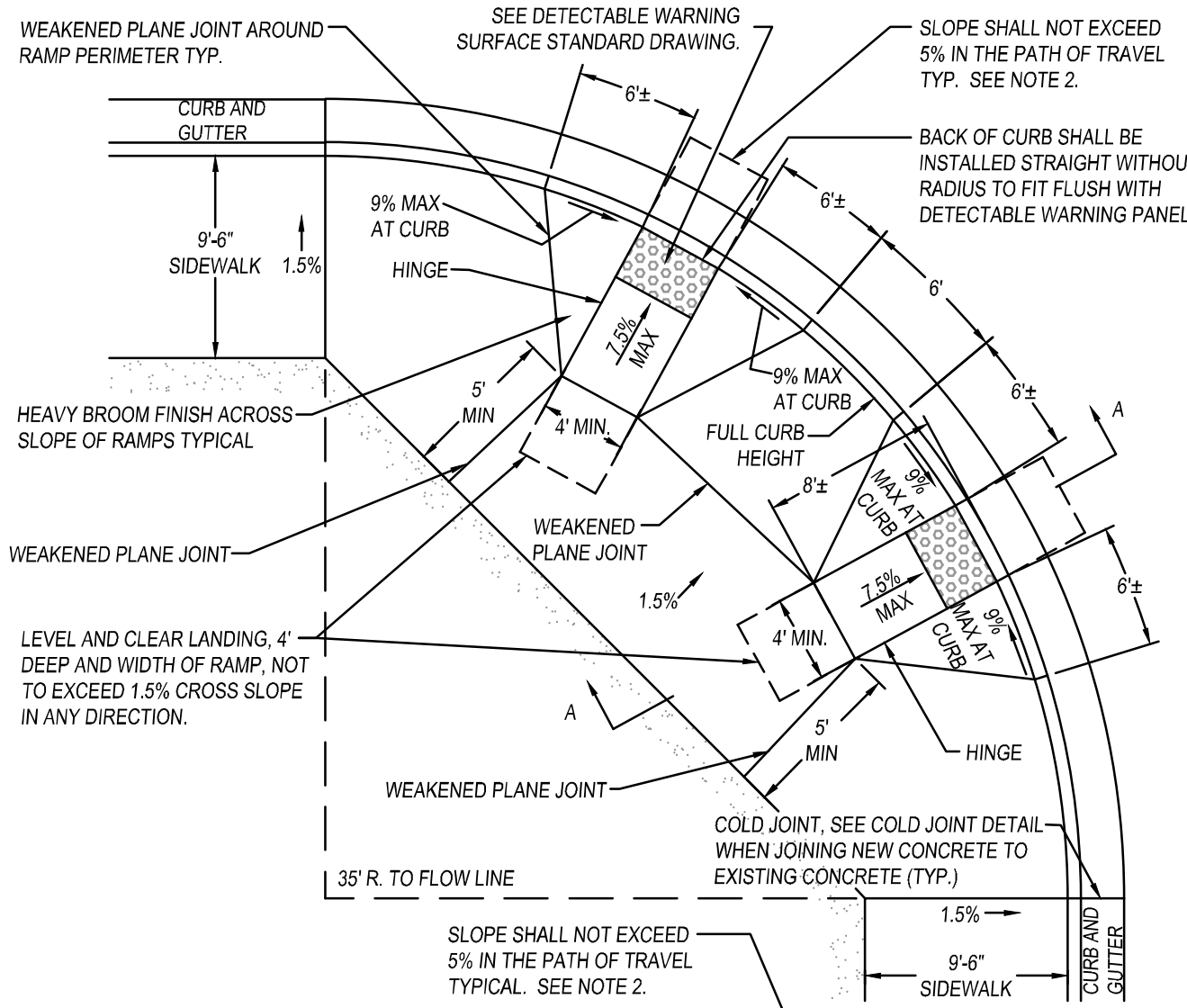
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. MAXIMUM SLOPES OF ADJOINING GUTTERS, THE ROAD SURFACE IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
3. NO CROSS SLOPE IN THE PATH OF TRAVEL TO EXCEED 1.5%.

City of Lindsay

CITY SERVICES DEPARTMENT

35' RADIUS CURB RETURN WITH SIDEWALK CONNECTION - DETAIL 1

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-8
			DATE 03/06/25	1 OF 2



SECTION A-A

NOTES:

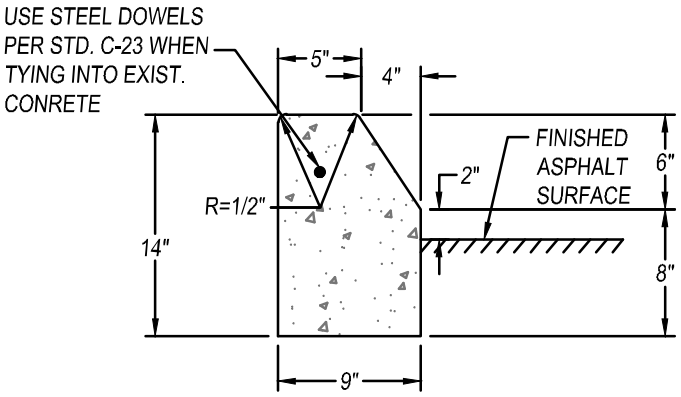
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. MAXIMUM SLOPES OF ADJOINING GUTTERS, THE ROAD SURFACE IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
3. NO CROSS SLOPE IN THE PATH OF TRAVEL TO EXCEED 1.5%.

City of Lindsay

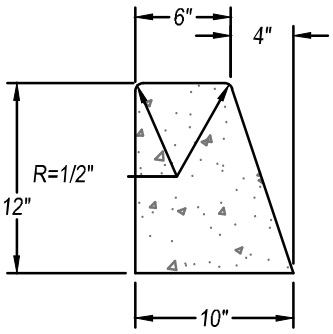
CITY SERVICES DEPARTMENT

35' RADIUS CURB RETURN WITH SIDEWALK CONNECTION - DETAIL 2

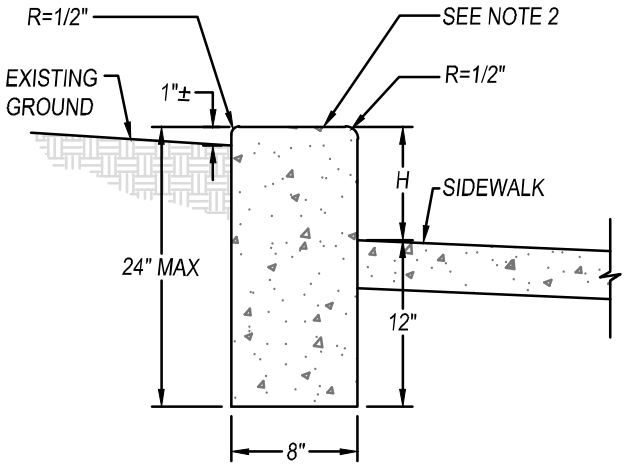
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-8
			DATE 03/06/25	2 OF 2



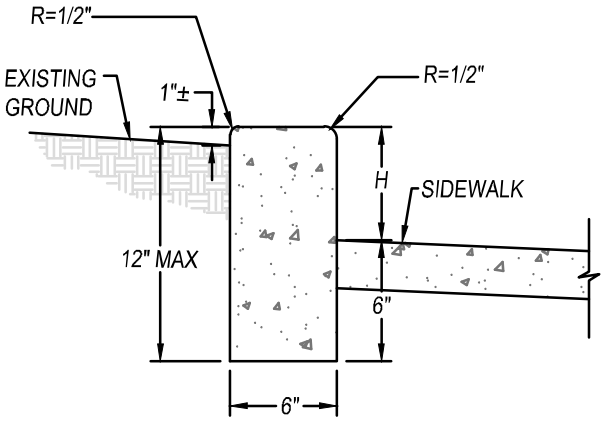
MEDIAN CURB TYPE B1-6
STREET APPLICATIONS



LANDSCAPE CURB
NON-STREET APPLICATIONS



RETAINING CURB
NON-STREET APPLICATIONS
USE WHEN 6"<H≤12"



RETAINING CURB
NON-STREET APPLICATIONS
USE WHEN H≤6"

NOTES:

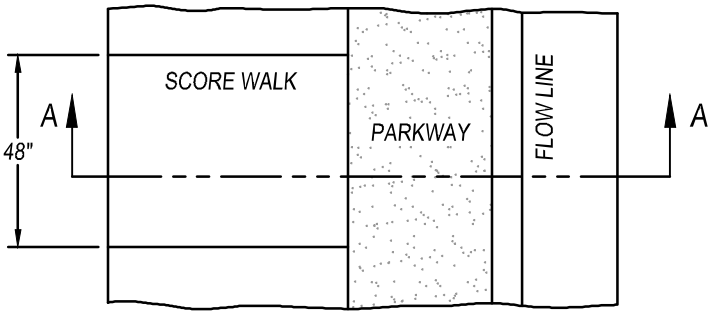
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. REBAR SHALL BE USED AT THE DISCRETION OF THE CITY ENGINEER.

City of Lindsay

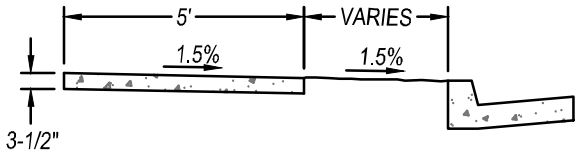
CITY SERVICES DEPARTMENT

MEDIAN CURB TYPE B1-6, RETAINING CURB & LANDSCAPE CURB

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-9
			DATE 03/06/25	



PLAN



SECTION A-A

NOTES:

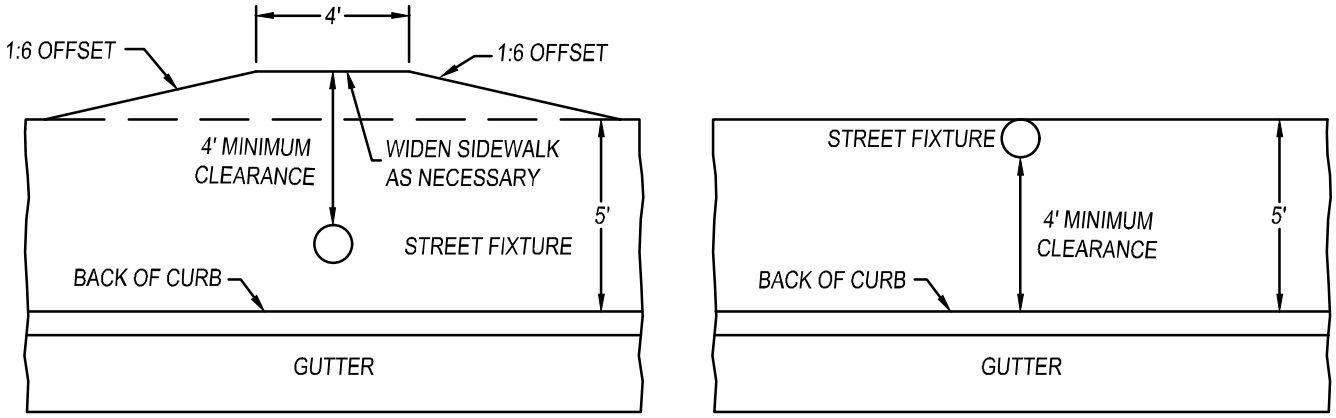
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.

City of Lindsay

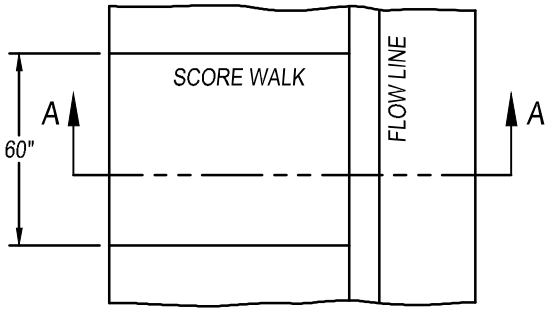
CITY SERVICES DEPARTMENT

SIDEWALK - RESIDENTIAL WITH PARKWAY

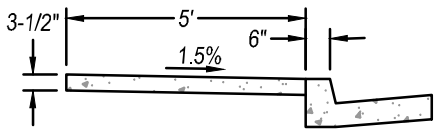
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-10
			DATE 03/06/25	



PLAN WITH STREET FIXTURE



PLAN



SECTION A-A

NOTES:

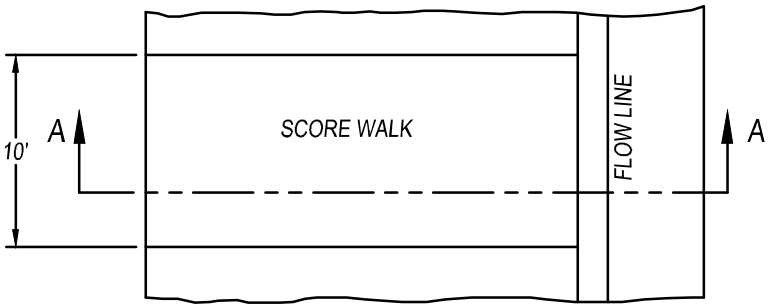
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. SIDEWALK SHALL BE WIDENED AT STREET FIXTURE LOCATIONS PROVIDING A MINIMUM CLEARANCE OF 4' TO BACK OF SIDEWALK, OR AS APPROVED BY CITY ENGINEER.

City of Lindsay

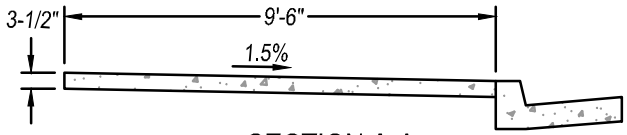
CITY SERVICES DEPARTMENT

SIDEWALK - RESIDENTIAL ADJACENT TO CURB

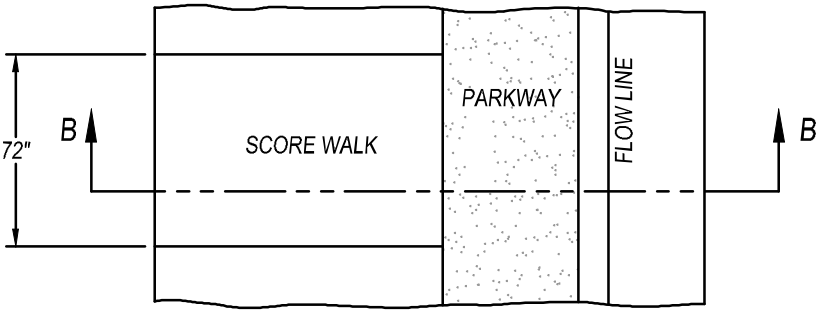
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-11
			DATE 03/06/25	



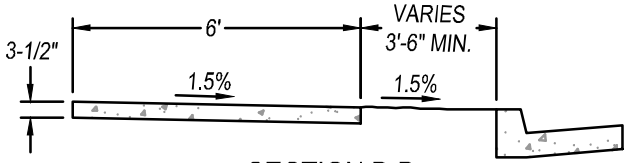
PLAN
DOWNTOWN COMMERCIAL



SECTION A-A



PLAN
WITH PARKWAY



SECTION B-B

NOTES:

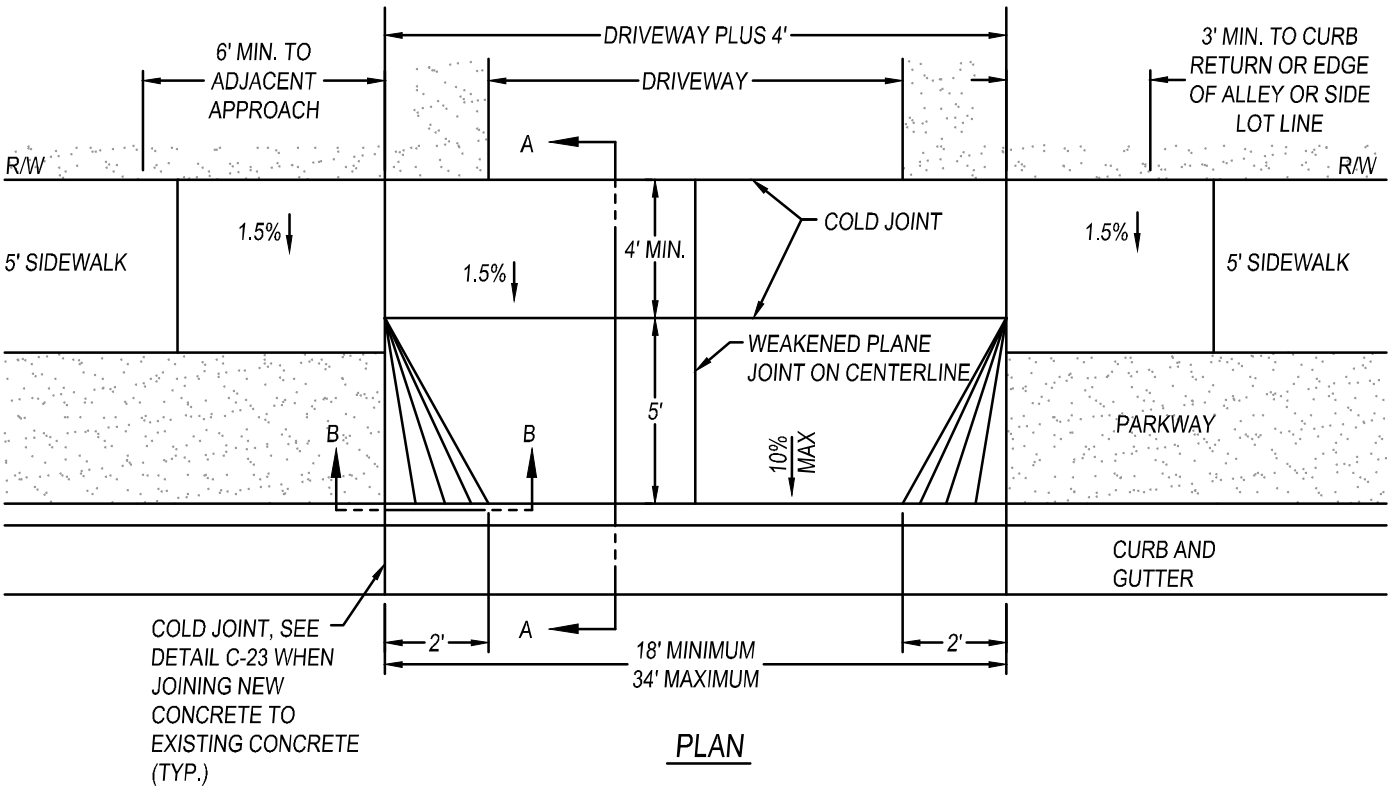
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.

City of Lindsay

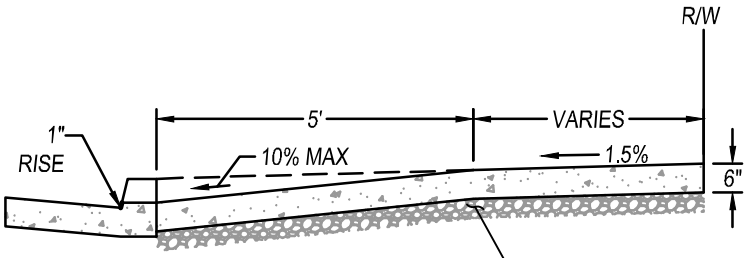
CITY SERVICES DEPARTMENT

SIDEWALK - OFFICE / COMMERCIAL

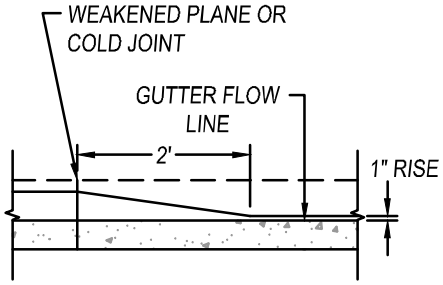
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-12
			DATE 03/06/25	



PLAN



SECTION A-A



SECTION B-B

NOTES:

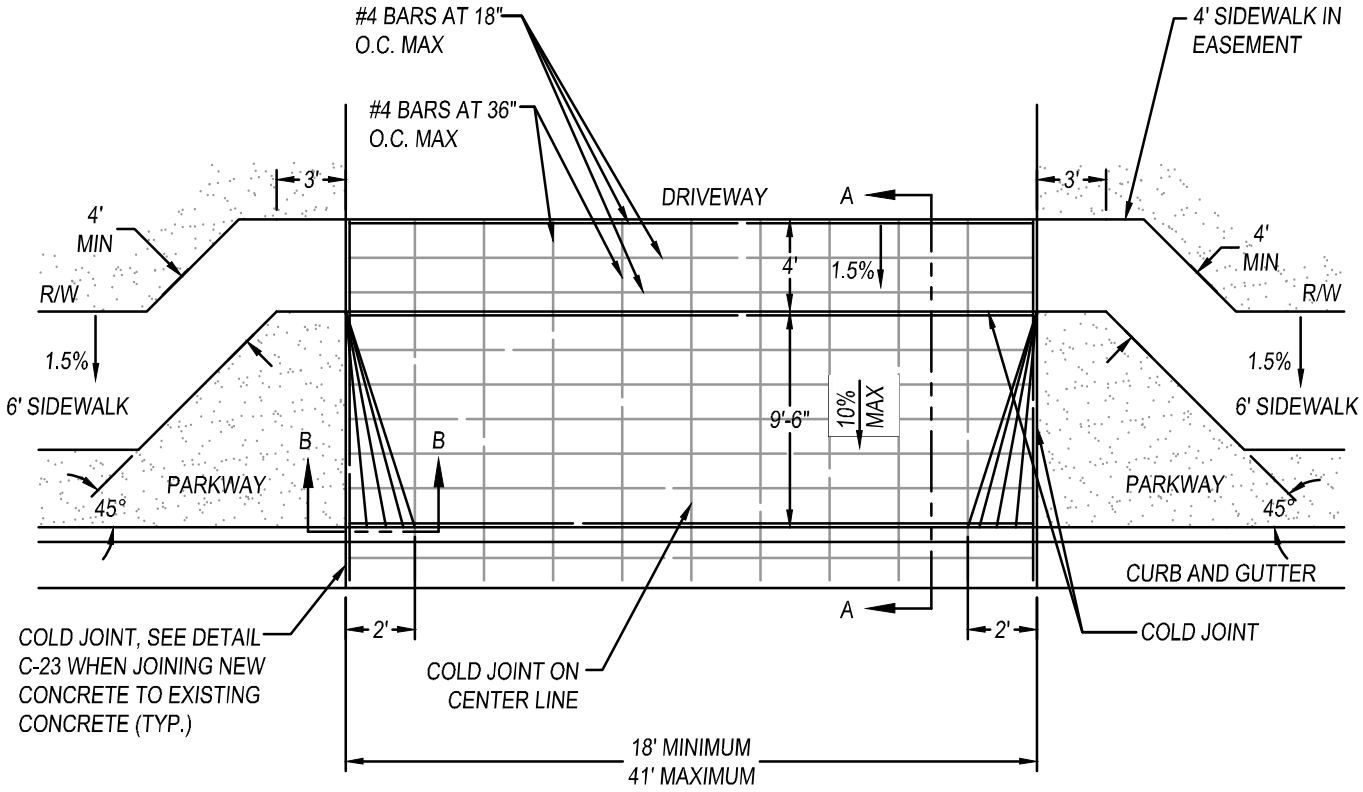
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE (5 SACK MIX).
2. DRIVE APPROACHES SHALL BE NO GREATER THAN 6' WIDER THAN THE DRIVEWAY.
3. APPROACH SHALL HAVE A HEAVY BROOM FINISH.
4. CURING COMPOUND SHALL BE APPLIED AS APPROVED BY THE CITY ENGINEER.

City of Lindsay

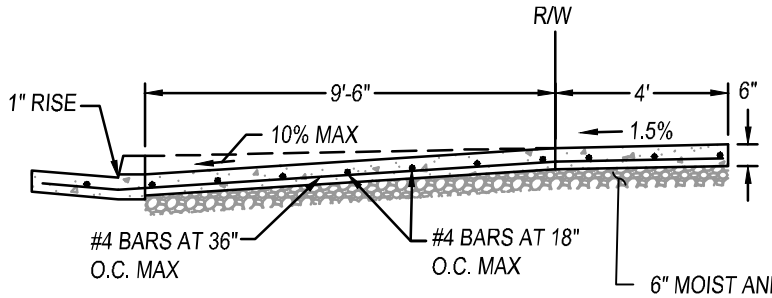
CITY SERVICES DEPARTMENT

RESIDENTIAL DRIVE APPROACH

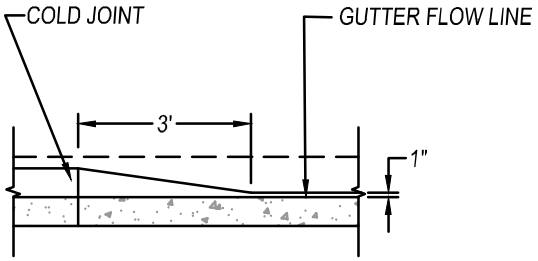
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-13
			DATE 03/06/25	



PLAN



SECTION A-A



SECTION B-B

NOTES:

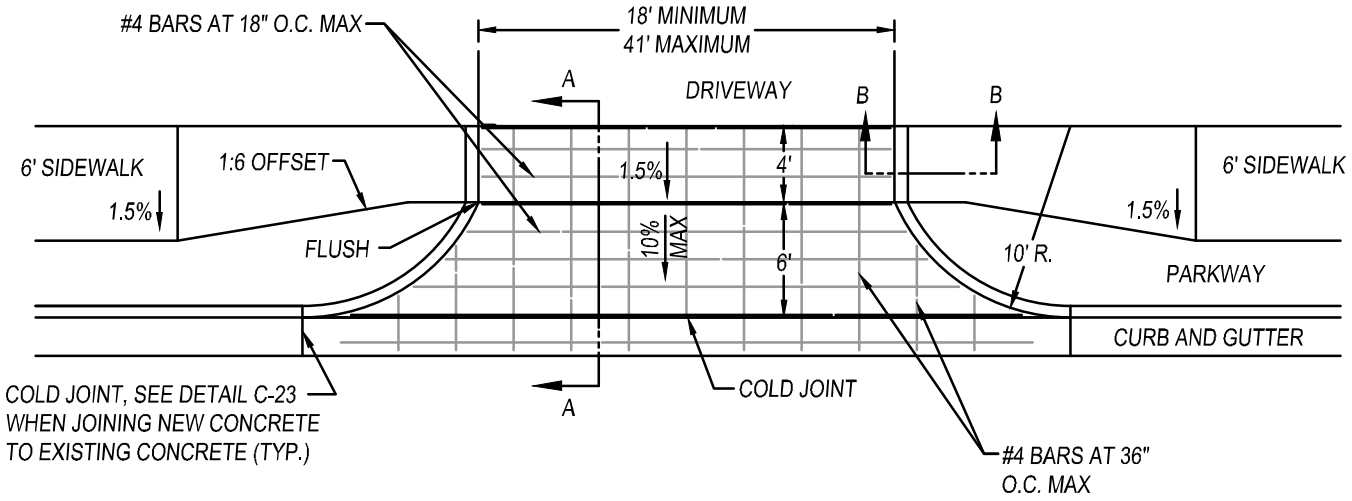
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE (5 SACK MIX).
2. ON COLLECTOR AND ARTERIAL STREETS, THE MINIMUM DRIVE APPROACH WIDTH SHALL BE 21' FOR ONE-WAY DRIVE APPROACHES AND 36' FOR TWO-WAY DRIVE APPROACHES, OR AS APPROVED BY CITY ENGINEER.
3. REBAR SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REBAR SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
4. REBAR SHALL HAVE A MINIMUM OF 2" OF CLEAR COVERAGE.
5. NOT MORE THAN 50% OF PROPERTY FRONTAGE SHALL BE USED AS DRIVE APPROACH.
6. WIDTH AND LOCATION OF DRIVE APPROACHES ON STATE ROUTES IS SUBJECT TO APPROVAL BY CALTRANS.
7. DRIVE APPROACH SHALL HAVE A HEAVY BROOM FINISH.
8. CURING COMPOUND SHALL BE APPLIED AS APPROVED BY THE CITY ENGINEER.

City of Lindsay

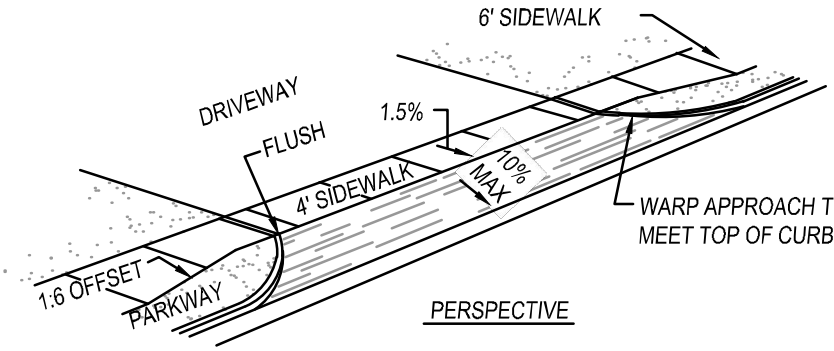
CITY SERVICES DEPARTMENT

MULTI-FAMILY RESIDENTIAL / OFFICE / COMMERCIAL DRIVE APPROACH

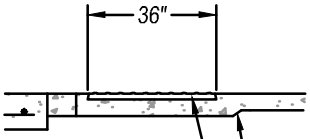
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-14
			DATE 03/06/25	



PLAN



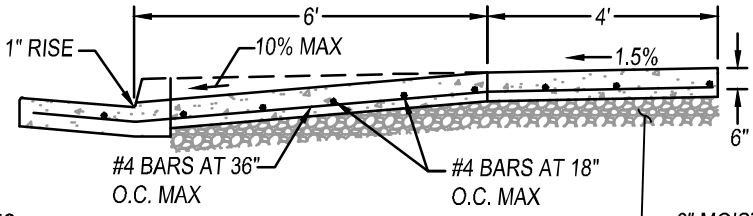
PERSPECTIVE



DETECTABLE WARNING SURFACE PANEL ACROSS WIDTH OF WALK. FEDERAL YELLOW IN COLOR.

THICKEN WALK 1" UNDER DETECTABLE WARNING SURFACE FOR CAST IN PLACE CONSTRUCTION OPTION.

SECTION B-B



SECTION A-A

6" MOIST AND COMPACTED CLASS 2 AGGREGATE BASE @ 95% RELATIVE COMPACTION

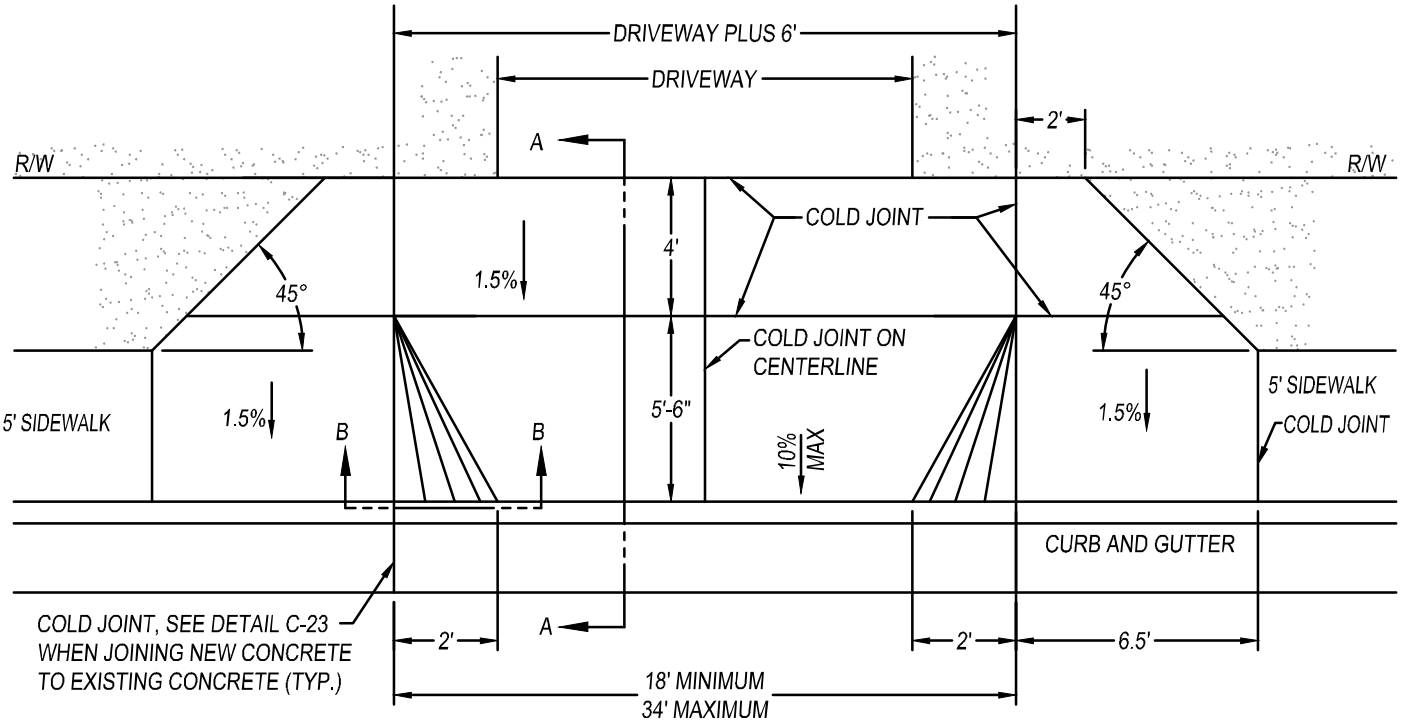
NOTES:

1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. ON COLLECTOR AND ARTERIAL STREETS, THE MINIMUM DRIVE APPROACH WIDTH SHALL BE 21' FOR ONE-WAY DRIVE APPROACHES AND 36' FOR TWO-WAY DRIVE APPROACHES, OR AS APPROVED BY CITY ENGINEER.
3. REBAR SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REBAR SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
4. REBAR SHALL HAVE A MINIMUM OF 2" OF CLEAR COVERAGE.
5. NOT MORE THAN 50% OF PROPERTY FRONTAGE SHALL BE USED AS DRIVE APPROACH.
6. WIDTH AND LOCATION OF DRIVE APPROACHES ON STATE ROUTES IS SUBJECT TO APPROVAL BY CALTRANS.
7. DRIVE APPROACH SHALL HAVE A HEAVY BROOM FINISH.
8. CURING COMPOUND SHALL BE APPLIED AS APPROVED BY THE CITY ENGINEER.

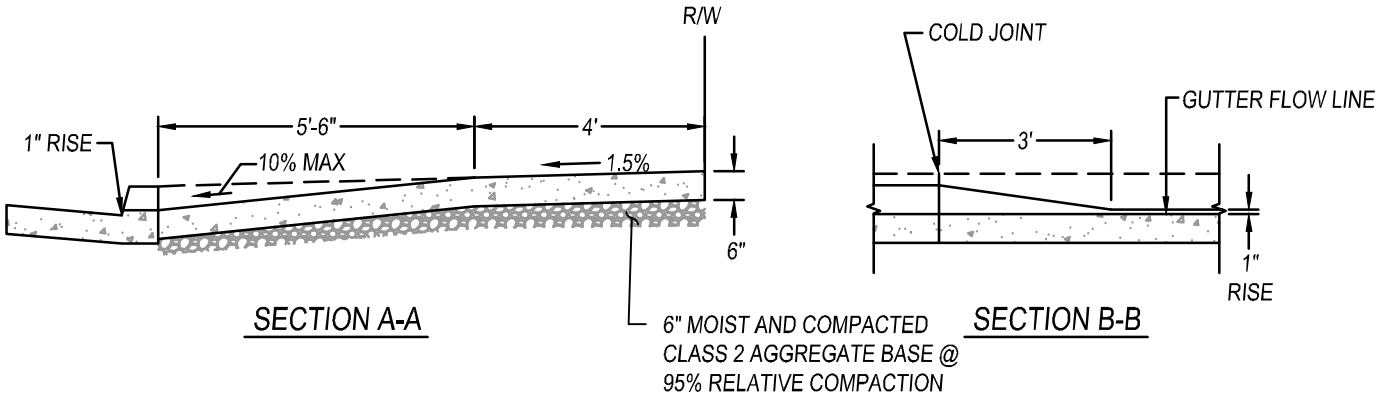
City of Lindsay
CITY SERVICES DEPARTMENT

OFFICE / COMMERCIAL DRIVE APPROACH (ALTERNATE - WITH CURB RETURNS)

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-15
			DATE 03/06/25	



PLAN



SECTION A-A

SECTION B-B

NOTES:

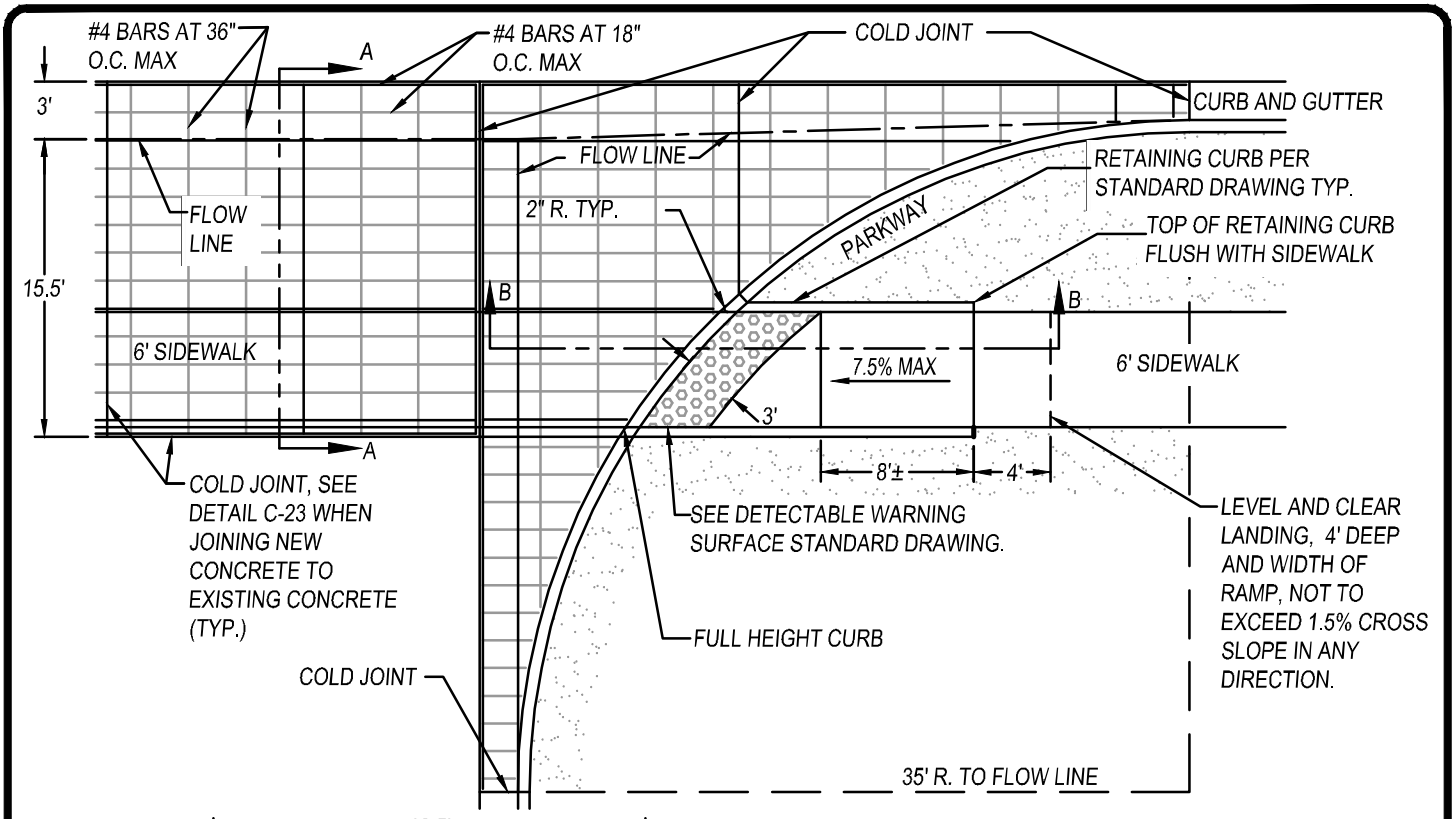
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. DRIVE APPROACHES SHALL BE NO GREATER THAN 6' WIDER THAN THE DRIVEWAY.

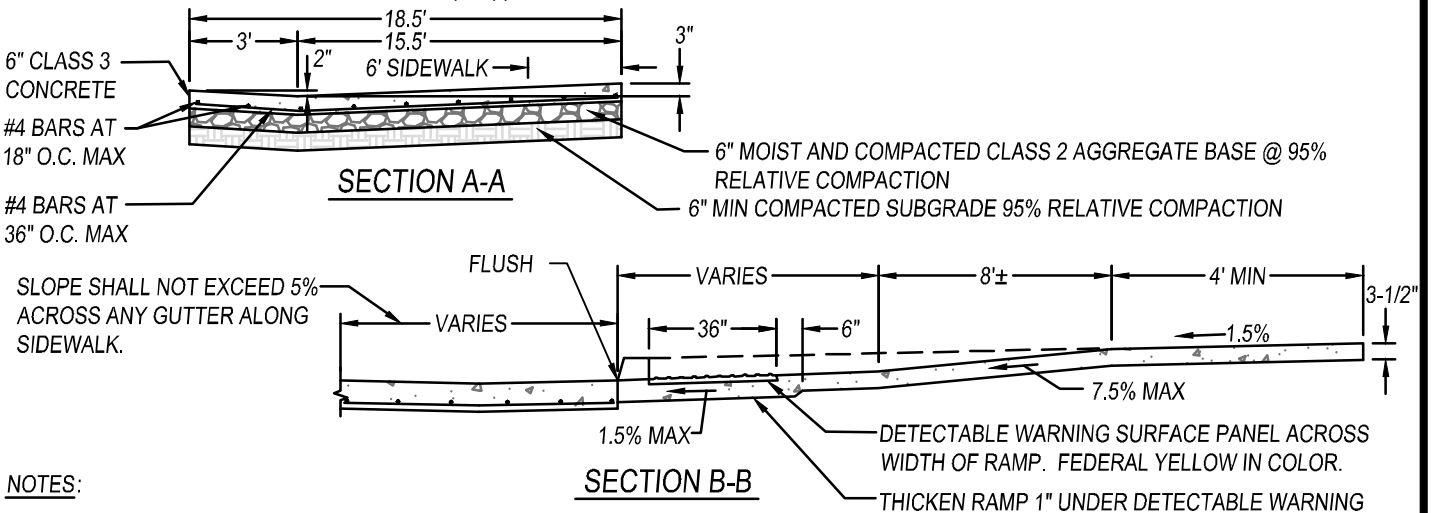
City of Lindsay

CITY SERVICES DEPARTMENT

RESIDENTIAL DRIVE APPROACH WITH ADJACENT SIDEWALK (INFILL ONLY)

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-16
			DATE 03/06/25	





NOTES:

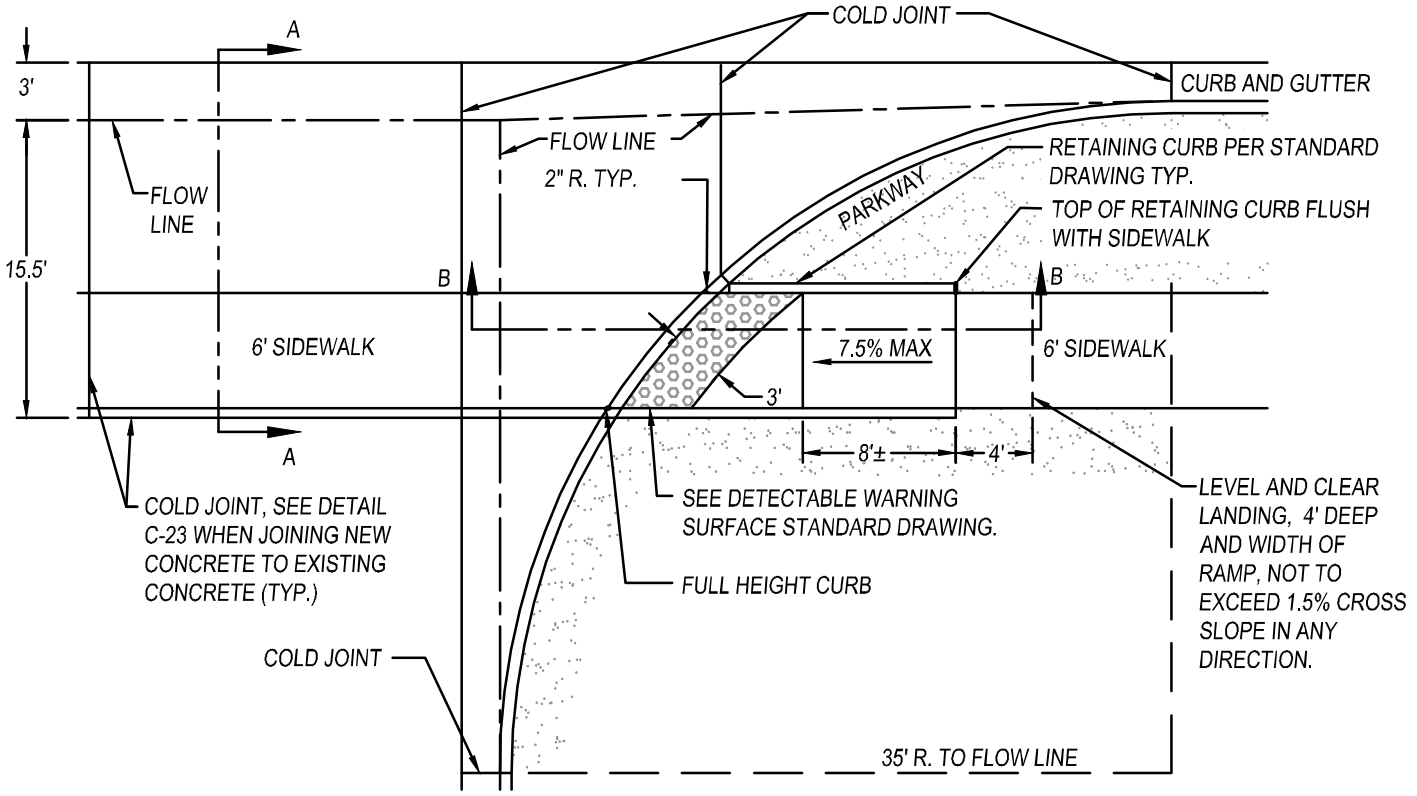
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. COMMERCIAL DRIVE APPROACH SHALL HAVE A MINIMUM GRADIENT OF 0.40%. MINIMUM GRADIENT ON INFILL PROJECTS MAY BE LESS AS APPROVED BY THE CITY ENGINEER.
3. REBAR SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REBAR SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
4. REBAR SHALL HAVE A MINIMUM 2" OF CLEAR COVERAGE.
5. GUTTER FLOW LINE SHALL BE WATER TESTED FOR FLOW.
6. PROVIDE A MINIMUM 6' SIDEWALK ACROSS DRIVE. MAXIMUM 1.5% CROSS SLOPE AND MAXIMUM 1.5% SLOPE IN THE DIRECTION OF SIDEWALK.
7. NO CROSS SLOPE IN THE PEDESTRIAN ACCESS ROUTE TO EXCEED 1.5%.

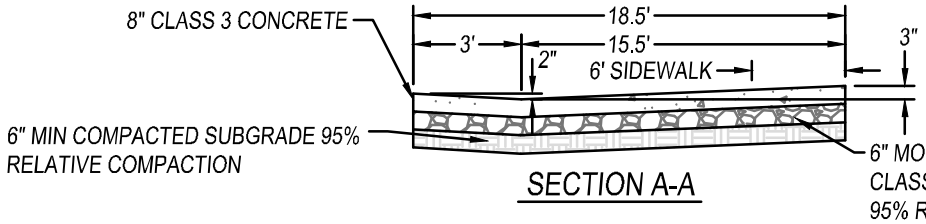
City of Lindsay

CITY SERVICES DEPARTMENT

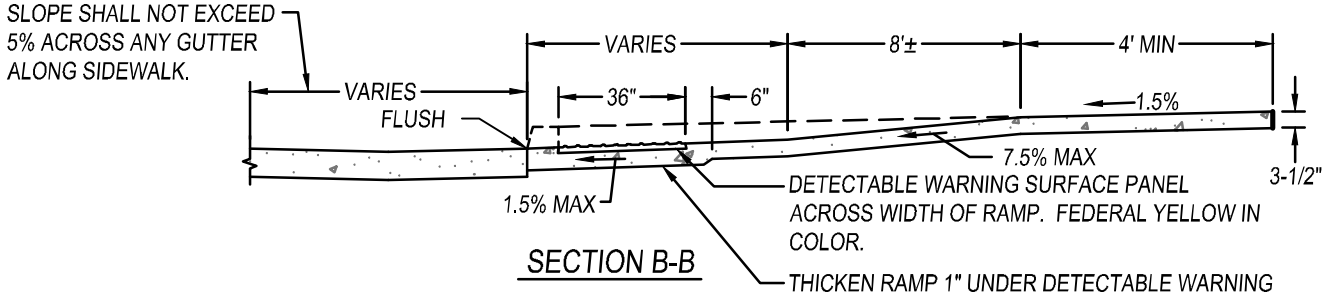
MAJOR COMMERCIAL DRIVE APPROACH
35' RADIUS CURB RETURN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-17
			DATE 03/06/25	





SECTION A-A



SECTION B-B

NOTES:

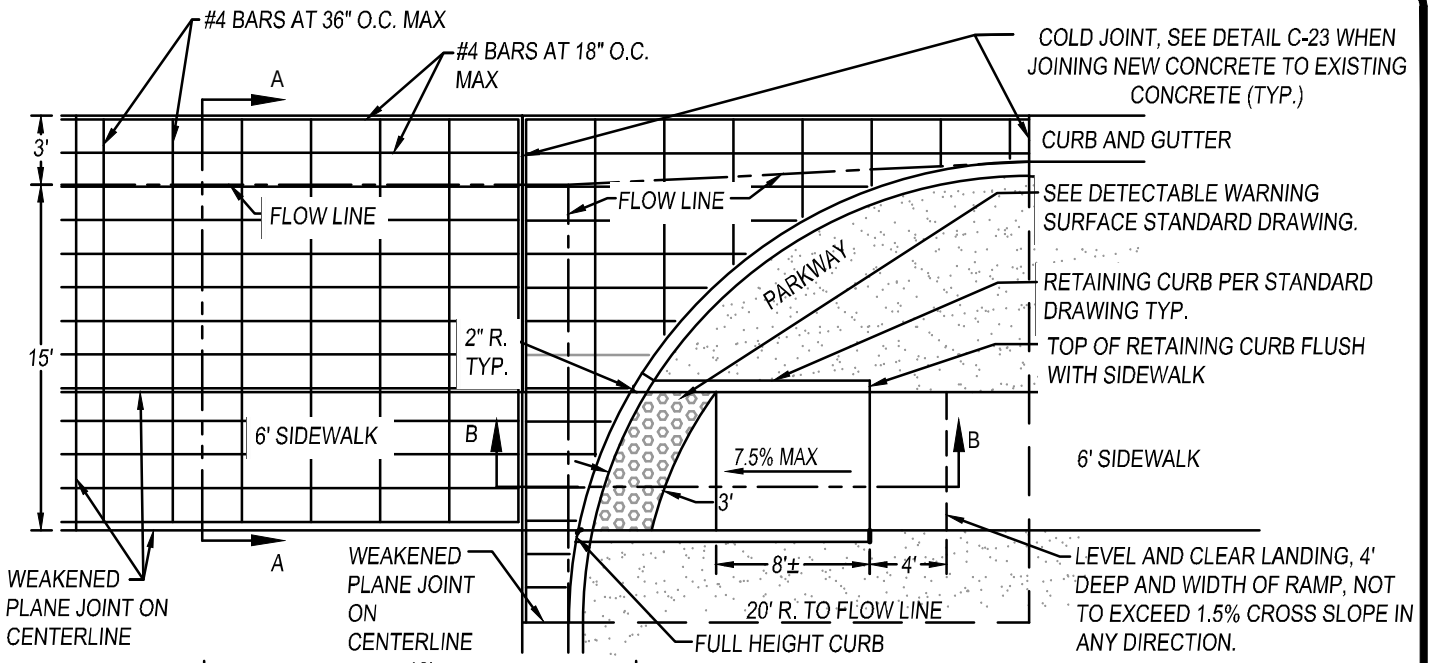
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. COMMERCIAL DRIVE APPROACH SHALL HAVE A MINIMUM GRADIENT OF 0.40%. MINIMUM GRADIENT ON INFILL PROJECTS MAY BE LESS AS APPROVED BY THE CITY ENGINEER.
3. GUTTER FLOW LINE SHALL BE WATER TESTED FOR FLOW.
4. NO CROSS SLOPE IN THE PEDESTRIAN ACCESS ROUTE TO EXCEED 1.5%.
5. PROVIDE A MINIMUM 6' SIDEWALK ACROSS DRIVE. MAXIMUM 1.5% CROSS SLOPE AND MAXIMUM 1.5% SLOPE IN THE DIRECTION OF SIDEWALK.

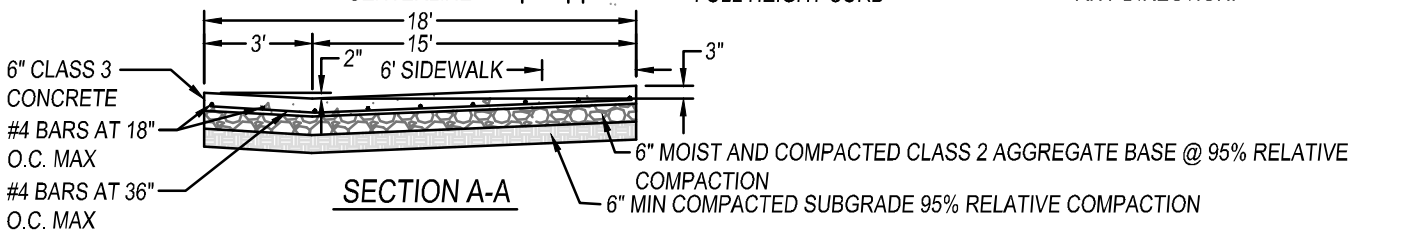
City of Lindsay

CITY SERVICES DEPARTMENT

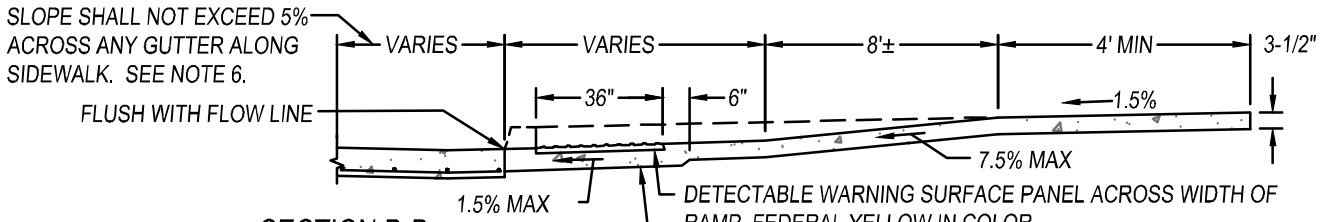
MAJOR COMMERCIAL DRIVE APPROACH
35' RADIUS CURB RETURN - ALTERNATE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-18
			DATE 03/06/25	





SECTION A-A



SECTION B-B

NOTES:

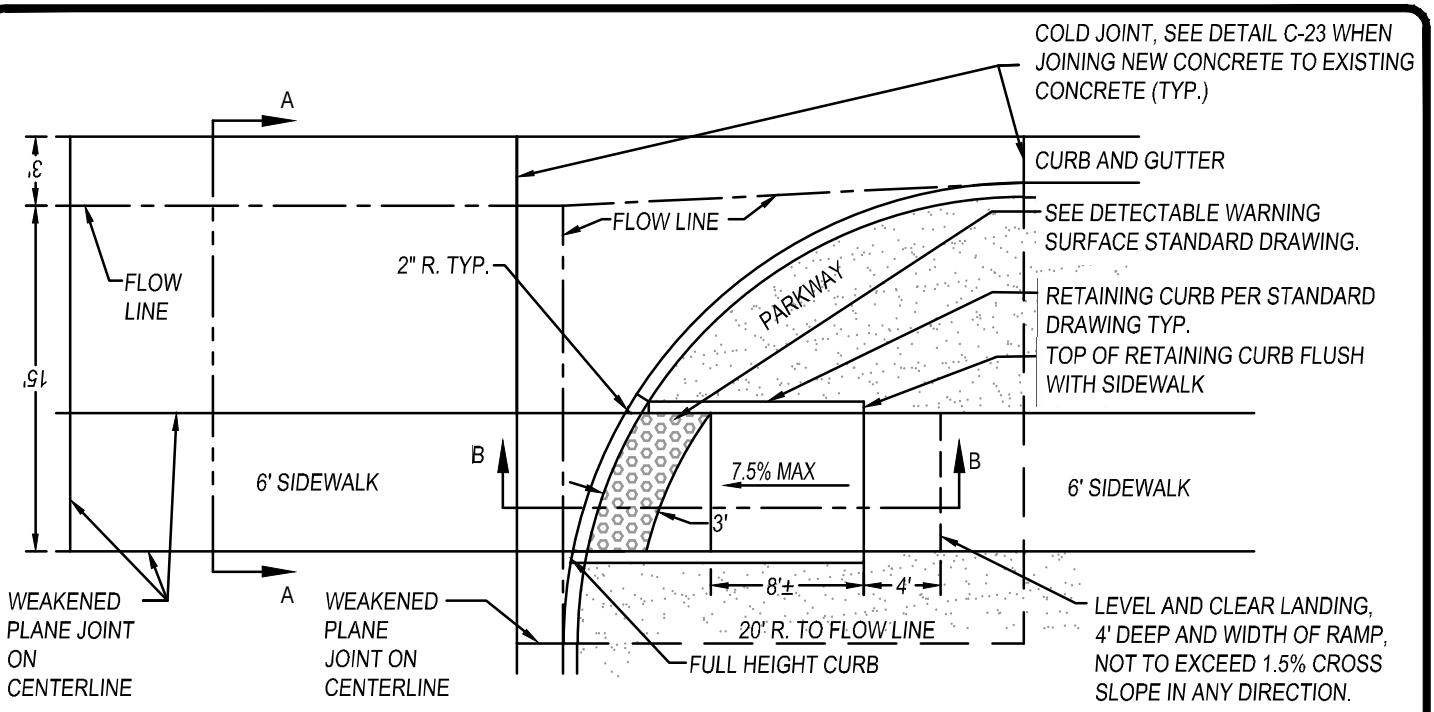
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. COMMERCIAL DRIVE APPROACH SHALL HAVE A MINIMUM GRADIENT OF 0.40%. MINIMUM GRADIENT ON INFILL PROJECTS MAY BE LESS AS APPROVED BY THE CITY ENGINEER.
3. REBAR SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REBAR SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
4. REBAR SHALL HAVE A MINIMUM OF 2" OF CLEAR COVERAGE.
5. GUTTER FLOW LINE SHALL BE WATER TESTED FOR FLOW.
6. MAXIMUM SLOPES OF ADJOINING GUTTERS IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
7. NO CROSS SLOPE IN THE PEDESTRIAN ACCESS ROUTE TO EXCEED 1.5%.
8. PROVIDE A MINIMUM 6' SIDEWALK ACROSS DRIVE. MAXIMUM 1.5% CROSS SLOPE AND MAXIMUM 1.5% SLOPE IN THE DIRECTION OF SIDEWALK.

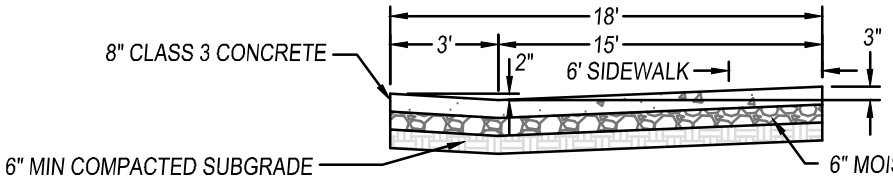
City of Lindsay

CITY SERVICES DEPARTMENT

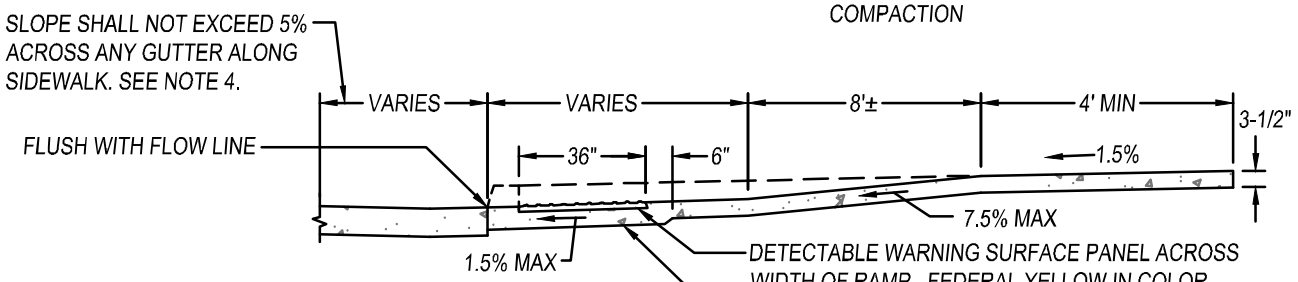
MAJOR COMMERCIAL DRIVE APPROACH 20' RADIUS CURB RETURN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-19
			DATE 03/06/25	





SECTION A-A



SECTION B-B

NOTES:

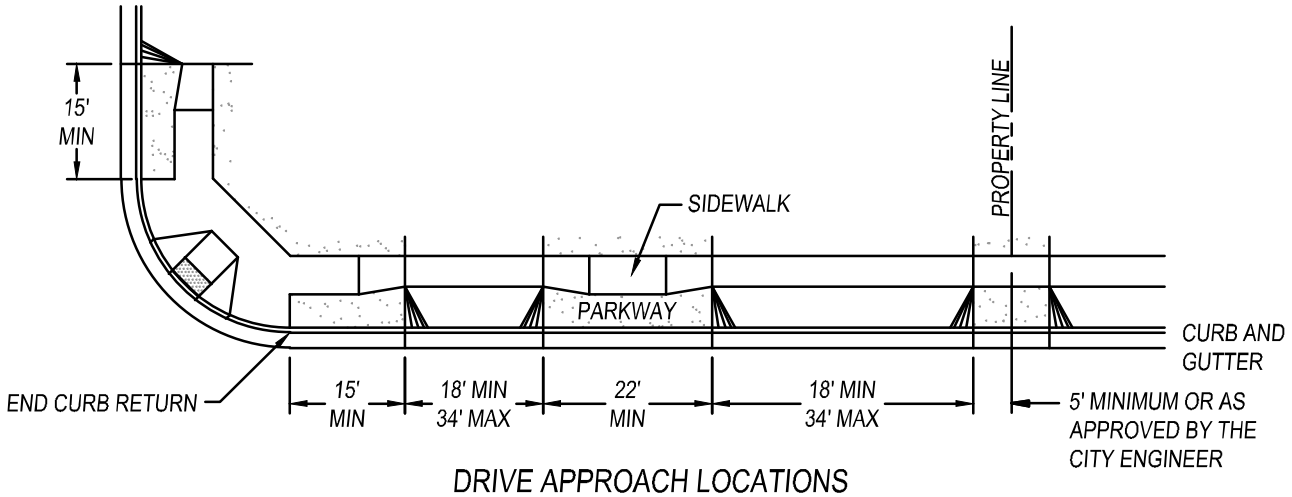
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. COMMERCIAL DRIVE APPROACH SHALL HAVE A MINIMUM GRADIENT OF 0.40%. MINIMUM GRADIENT ON INFILL PROJECTS MAY BE LESS AS APPROVED BY THE CITY ENGINEER.
3. GUTTER FLOW LINE SHALL BE WATER TESTED FOR FLOW.
4. MAXIMUM SLOPES OF ADJOINING GUTTERS IMMEDIATELY ADJACENT TO THE CURB RAMP OR ACCESSIBLE ROUTE SHALL NOT EXCEED 5% WITHIN 2' OF THE BOTTOM OF THE CURB RAMP.
5. NO CROSS SLOPE IN THE PEDESTRIAN ACCESS ROUTE TO EXCEED 1.5%.
6. PROVIDE A MINIMUM 6' SIDEWALK ACROSS DRIVE. MAXIMUM 1.5% CROSS SLOPE AND MAXIMUM 1.5% SLOPE IN THE DIRECTION OF SIDEWALK.

City of Lindsay

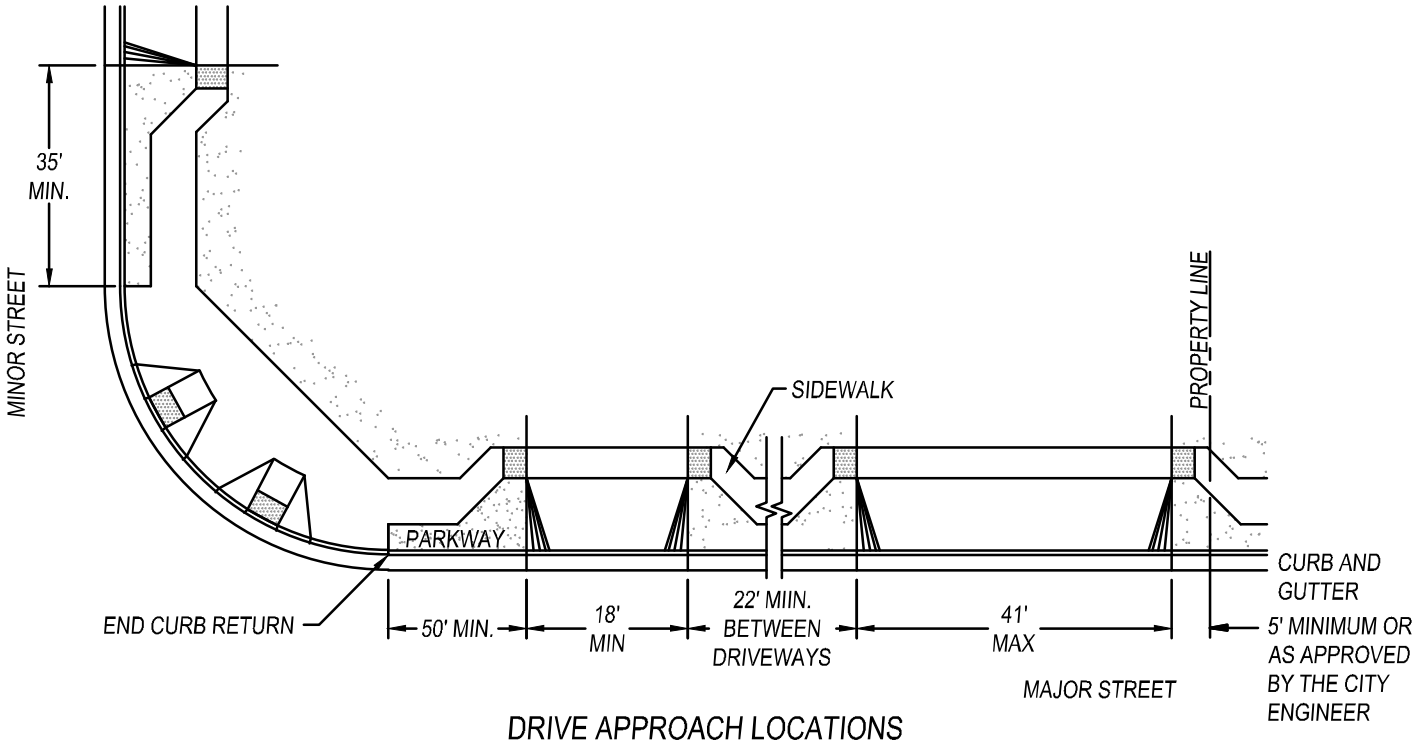
CITY SERVICES DEPARTMENT

MAJOR COMMERCIAL DRIVE APPROACH 20' RADIUS CURB RETURN - ALTERNATE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-20
			DATE 03/06/25	



DRIVE APPROACH LOCATIONS
RESIDENTIAL ZONES WITH 4 UNITS OR LESS PER LOT



DRIVE APPROACH LOCATIONS
OFFICE / COMMERCIAL / MULTI FAMILY ZONES

NOTES:

1. ON COLLECTOR AND ARTERIAL STREETS, THE MINIMUM DRIVE APPROACH WIDTH SHALL BE 21' FOR ONE-WAY DRIVE APPROACHES AND 36' FOR TWO-WAY DRIVE APPROACHES, OR AS APPROVED BY CITY ENGINEER.
2. NOT MORE THAN 50% OF PROPERTY FRONTAGE SHALL BE USED AS DRIVE APPROACH.
3. DRIVEWAYS SHOULD BE CONSOLIDATED WHENEVER POSSIBLE TO PROVIDE THE MINIMUM DISTANCE BETWEEN DRIVEWAYS AS SHOWN ABOVE.
4. DRIVEWAYS FROM RESIDENTIAL LOTS TO ARTERIAL STREETS ARE NOT PERMITTED.
5. WIDTH AND LOCATION OF DRIVE APPROACHES ON STATE ROUTES IS SUBJECT TO CALTRANS APPROVAL.
6. NO VEHICULAR TRAFFIC SHALL CROSS CURB, GUTTER, OR SIDEWALK WITHOUT AN APPROVED DRIVE APPROACH.

City of Lindsay

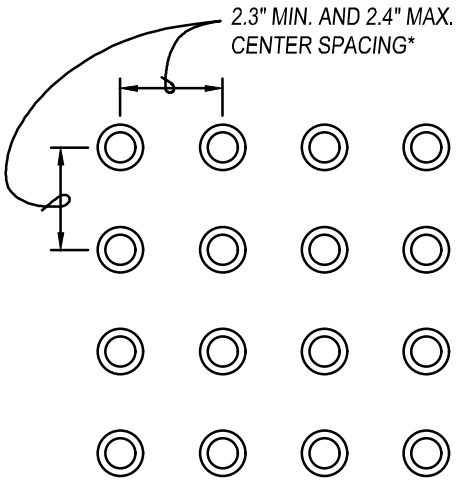
CITY SERVICES DEPARTMENT

DRIVE APPROACH LOCATIONS

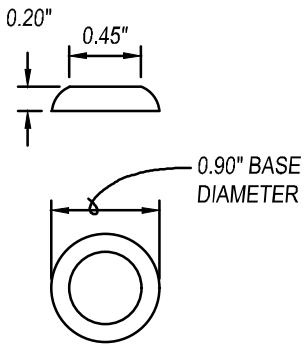
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-21
			DATE 03/06/25	

NOTE:

* WHERE INSTALLED IN A RADIAL PATTERN, TRUNCATED DOMES SHALL HAVE A CENTER TO CENTER SPACING OF 1.6" MINIMUM TO 2.4" MAXIMUM OR AS INDICATED PER CURRENT CBC.



RAISED TRUNCATED DOME PATTERN



RAISED TRUNCATED DOME

NOTES:

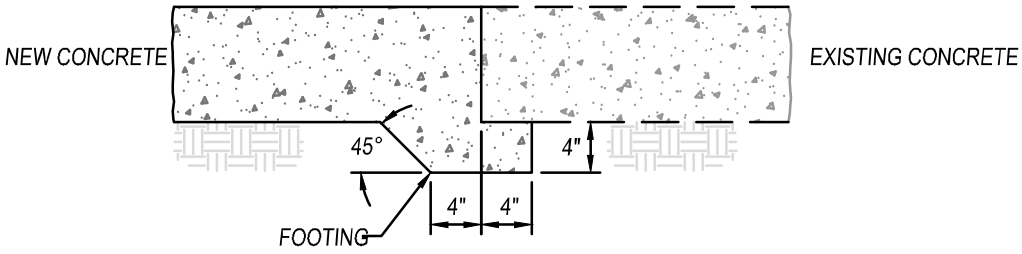
1. DETECTABLE WARNING SURFACE SHALL BE INSTALLED AT THE BOTTOM OF ALL CURB RAMPS.
2. DETECTABLE WARNING SHALL BE INSTALLED SO THAT IT BUTTS UP FLUSH AGAINST THE BACK OF ADJACENT CURB. WHERE CURBS ARE ON A CURVE, THE BACK OF CURB SHALL BE STRAIGHTENED AT THE DETECTABLE WARNING LOCATION SO THE WARNING BUTTS UP FLUSH AGAINST THE BACK OF CURB.
3. DETECTABLE WARNING SURFACE SHALL BE THE FULL WIDTH OF RAMP AND SHALL BE A MINIMUM OF 36" IN DEPTH.
4. DETECTABLE WARNING SURFACE SHALL BE PREMIXED FEDERAL YELLOW COLORED AND SHALL BE AN AUTHORIZED MATERIAL FROM THE CITY OF LINDSAY DETECTABLE WARNING SURFACE AUTHORIZED MATERIAL LIST.
5. IN RETROFIT TYPE SITUATIONS ON EXISTING SURFACES THE CITY WILL ALLOW RETROFIT TYPE WARNING PANELS. RETROFIT PANEL MATERIALS SHALL BE SUBMITTED TO THE CITY ENGINEER FOR ACCEPTANCE PRIOR TO CONSTRUCTION. PANELS SHALL BE GLUED AND BOLTED IN ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATIONS. BOTTOM OF PANELS SHALL BE FLUSH AGAINST THE ADJACENT CONCRETE SURFACE.

City of Lindsay

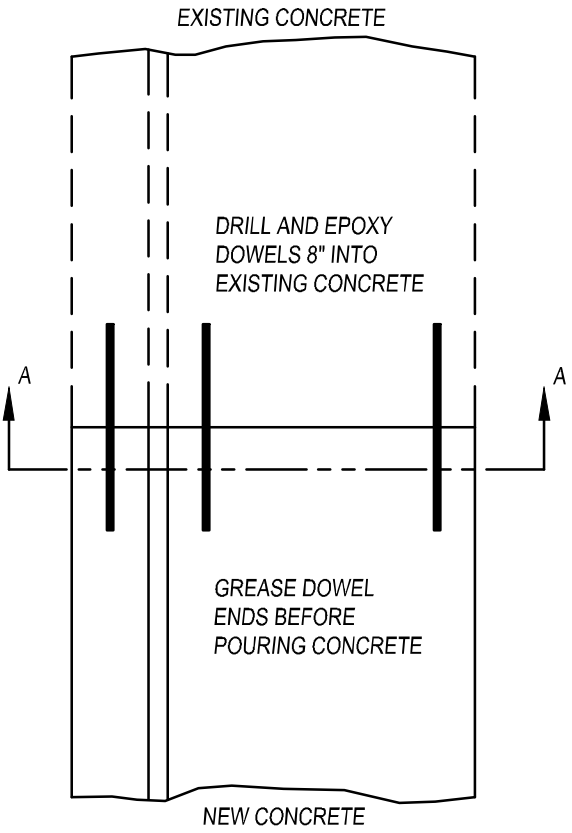
CITY SERVICES DEPARTMENT

DETECTABLE WARNING SURFACE DETAIL

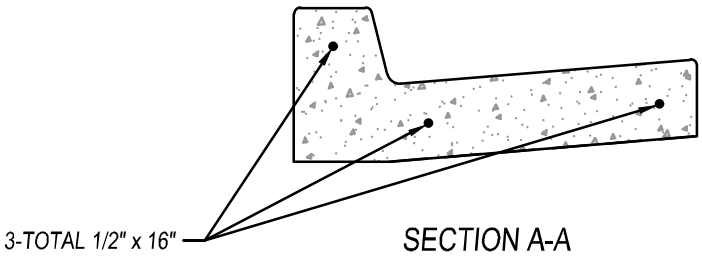
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-22
			DATE 03/06/25	



SECTION
CONCRETE FLATWORK



PLAN



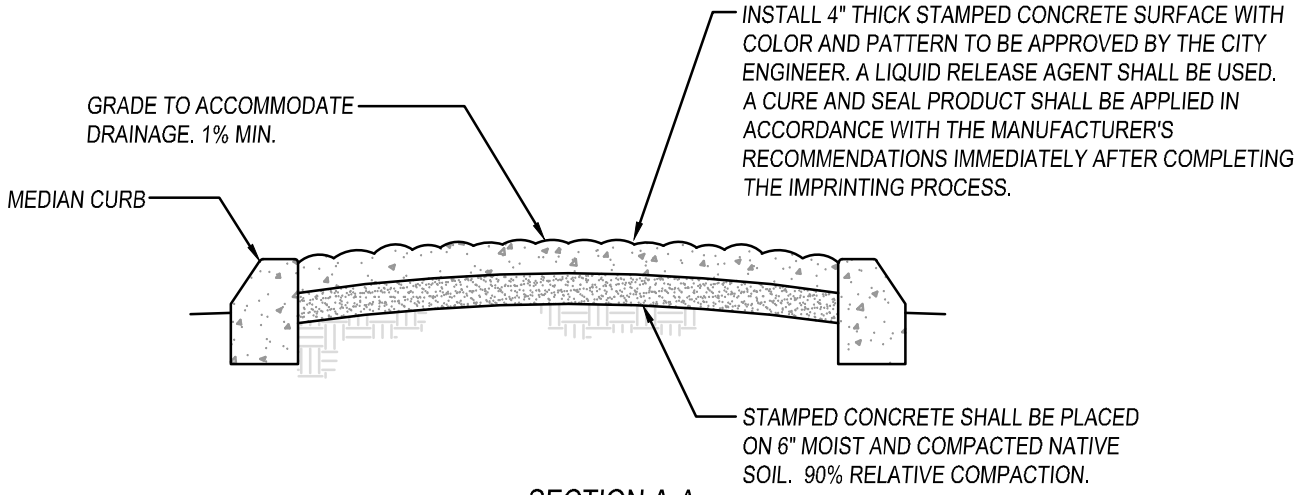
SECTION A-A
CONCRETE CURBING

City of Lindsay

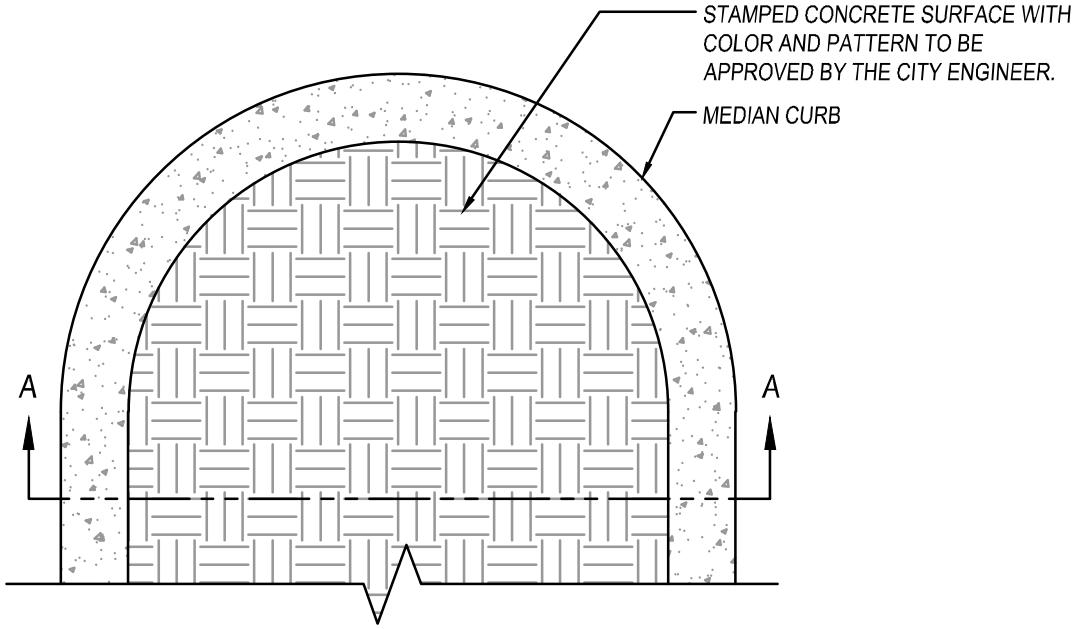
CITY SERVICES DEPARTMENT

CONCRETE COLD JOINTS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-23
			DATE 03/06/25	



SECTION A-A



PLAN

NOTES:

1. WHEN MATCHING AN EXISTING COBBLESTONE MEDIAN, "RIVER ROCK" PATTERN WITH "COBBLESTONE GRAY" COLOR AND A LIQUID RELEASE AGENT SHALL BE USED.

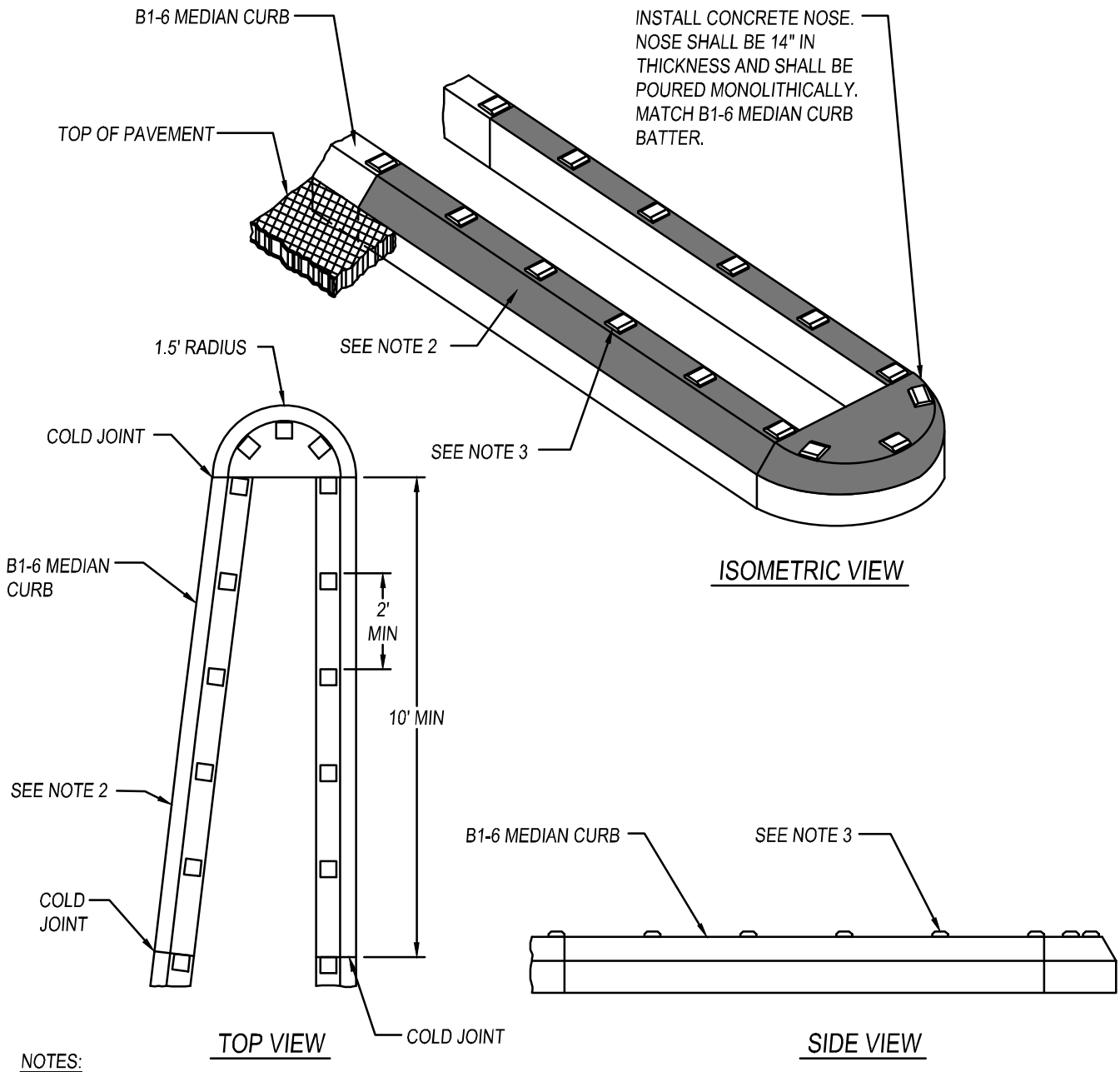
2. PATTERN AND COLOR TO BE APPROVED BY THE CITY ENGINEER

City of Lindsay

CITY SERVICES DEPARTMENT

STAMPED CONCRETE MEDIAN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-24
			DATE 03/06/25	



NOTES:

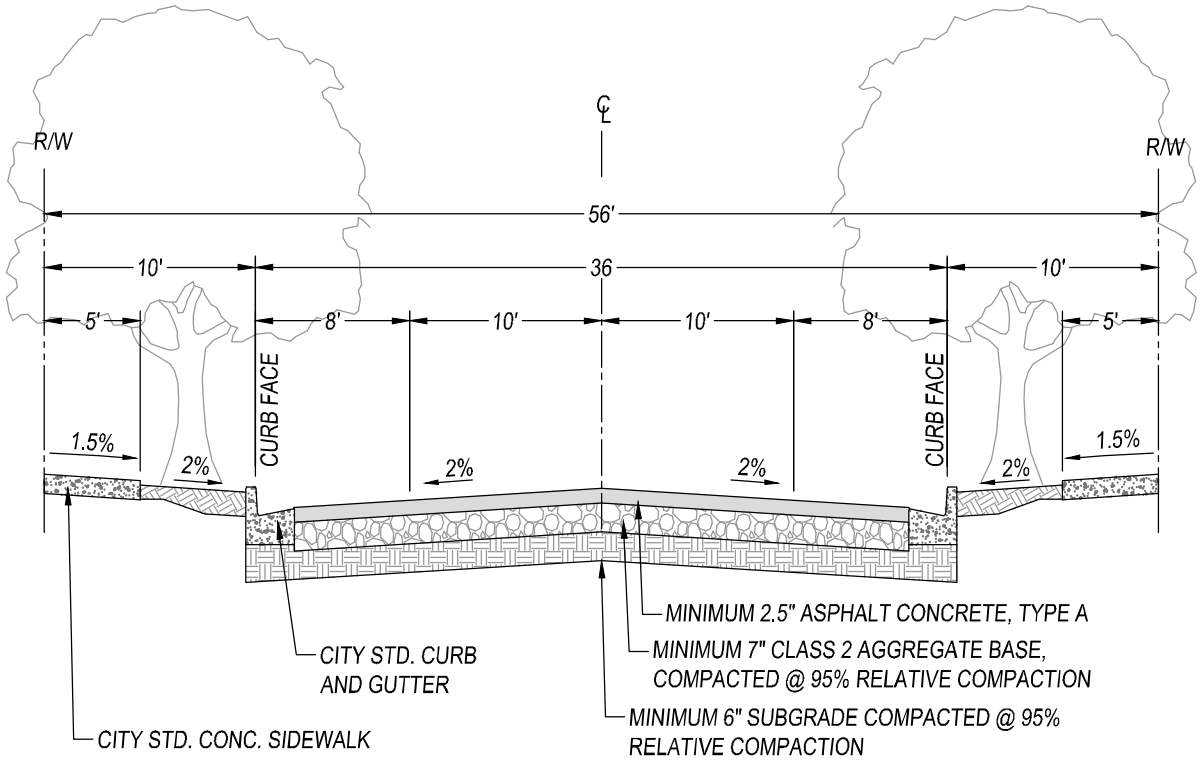
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. THE TOP AND FACE OF THE CURB SHALL BE PAINTED WITH WHITE OR YELLOW WATERBORNE PAINT AND APPLY GLASS BEADS FOR RETROREFLECTIVITY IN ACCORDANCE TO CITY OF LINDSAY STANDARD SPECIFICATIONS.
3. INSTALL TYPE G OR TYPE D RAISED PAVEMENT MARKERS PER CALTRANS STANDARD SPECIFICATIONS SECTION 81-3.02C. THE RAISED PAVEMENT MARKERS SHALL BE ATTACHED TO THE TOP OF THE CURB USING ADHESIVES PER CALTRANS STANDARD SPECIFICATIONS SECTIONS 81-3.02D AND 81-3.02E.

City of Lindsay

CITY SERVICES DEPARTMENT

MEDIAN NOSE DETAIL

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	C-25
			DATE 03/06/25	



NOTES:

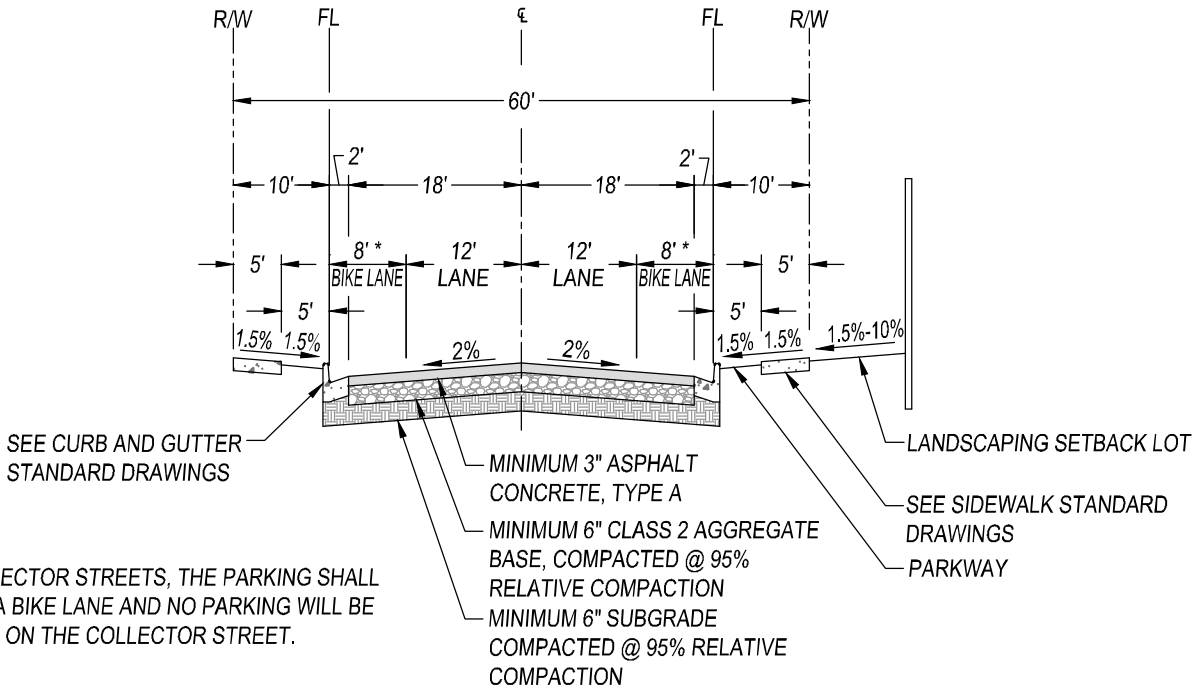
1. ASPHALT AND AGGREGATE BASE ARE SHOWN AT MINIMUM REQUIRED DEPTH, SUBJECT TO R-VALUE AND TRAFFIC INDEX BASED ON CALCULATIONS BY A REGISTERED CIVIL ENGINEER. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY A GEOTECHNICAL ENGINEER. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS DRAWING (ST-27).
2. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY GEOTECHNICAL ENGINEER.
3. STRUCTURAL PAVEMENT SECTIONS SHALL BE DESIGNED BY AN ACCEPTED FLEXIBLE PAVEMENT DESIGN METHOD IN ACCORDANCE WITH THE DESIGN GUIDELINES.
4. ASPHALT CONCRETE SHALL BE PLACED AND COMPACTED IN ACCORDANCE WITH THE CITY OF LINDSAY TECHNICAL SPECIFICATIONS.
5. ASPHALT CONCRETE SHALL BE PLACED ONLY WHEN THE ATMOSPHERIC TEMPERATURE IS ABOVE 50° F AND RISING.
6. REFER TO CITY OF LINDSAY TECHNICAL SPECIFICATIONS FOR MATERIALS AND CONSTRUCTION REQUIREMENTS.
7. TRAFFIC INDEX FOR STRUCTURAL SECTION CALCULATIONS = 5.5.
8. SEE DETAIL ST-8 FOR MINOR LOOP AND CUL-DE-SAC LAYOUT.

City of Lindsay

CITY SERVICES DEPARTMENT

MINOR LOOP & CUL-DE-SAC STREET SECTION

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-1
			DATE	03/06/25	



* FOR COLLECTOR STREETS, THE PARKING SHALL BECOME A BIKE LANE AND NO PARKING WILL BE ALLOWED ON THE COLLECTOR STREET.

NOTES:

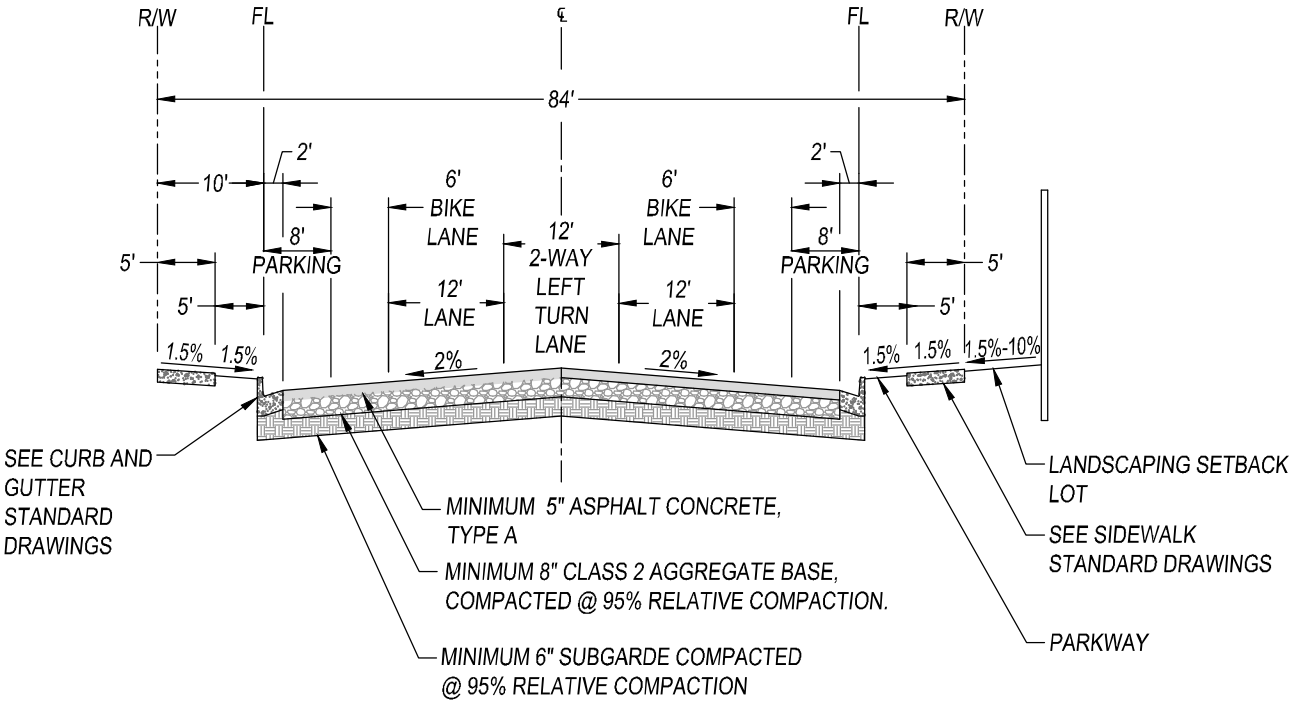
1. ASPHALT AND AGGREGATE BASE ARE SHOWN AT MINIMUM REQUIRED DEPTH, SUBJECT TO R-VALUE AND TRAFFIC INDEX BASED ON CALCULATIONS BY A REGISTERED CIVIL ENGINEER. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY A GEOTECHNICAL ENGINEER. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS DRAWING (ST-27).
2. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY GEOTECHNICAL ENGINEER.
3. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS STANDARD DRAWING.
4. ASPHALT CONCRETE SHALL BE TYPE A, WITH 3/4" AGGREGATE GRADATION AND PG 64-10 LIQUID ASPHALT BINDER PER CITY OF LINDSAY STANDARD SPECIFICATIONS.
5. TACK COAT IS REQUIRED AND SHALL BE APPLIED PER CITY STANDARD SPECIFICATIONS.
6. ASPHALT CONCRETE REQUIREMENTS SHALL BE AS STATED IN THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
7. ASPHALT CONCRETE SHALL BE PLACED ONLY WHEN THE ATMOSPHERIC TEMPERATURE IS 50° F AND RISING.
8. WITH ADDITIONAL LANDSCAPE EASEMENTS, SIDEWALK MAY BE LOCATED OUTSIDE RIGHT OF WAY TO PROVIDE ADDITIONAL PARKWAY.
9. A FOOTING EASEMENT WILL BE REQUIRED AS NEEDED FOR BLOCK WALL FOOTINGS THAT EXTEND INTO PRIVATE PROPERTY.
10. STREET TREES ARE REQUIRED IN ADDITION TO THE ON-SITE LANDSCAPE REQUIREMENT.
11. FOR PARTIAL WIDTH STREETS A MINIMUM OF 30 FT OF PAVEMENT AND 8 FT SHOULDERS ARE REQUIRED.
12. SOIL ADJACENT TO CONCRETE CURB AND SIDEWALK SHALL BE GRADED 3" BELOW TOP OF CURB TO ALLOW ROOM FOR MULCH.
13. TRAFFIC INDEX FOR STRUCTURAL SECTION CALCULATIONS = 6.0 (LOCAL) AND 8.0 (COLLECTOR)

City of Lindsay

CITY SERVICES DEPARTMENT

LOCAL & COLLECTOR STREET

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-2
			DATE	03/06/25	



NOTES:

1. ASPHALT AND AGGREGATE BASE ARE SHOWN AT MINIMUM REQUIRED DEPTH, SUBJECT TO R-VALUE AND TRAFFIC INDEX BASED ON CALCULATIONS BY A REGISTERED CIVIL ENGINEER. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY A GEOTECHNICAL ENGINEER. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS DRAWING (ST-27).
2. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY GEOTECHNICAL ENGINEER.
3. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS STANDARD DRAWING.
4. ASPHALT CONCRETE SHALL BE TYPE A, WITH 3/4" AGGREGATE GRADATION AND PG 64-10 LIQUID ASPHALT BINDER PER CITY OF LINDSAY STANDARD SPECIFICATIONS.
5. TACK COAT IS REQUIRED AND SHALL BE APPLIED PER CITY STANDARD SPECIFICATIONS.
6. ASPHALT CONCRETE REQUIREMENTS SHALL BE AS STATED IN THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
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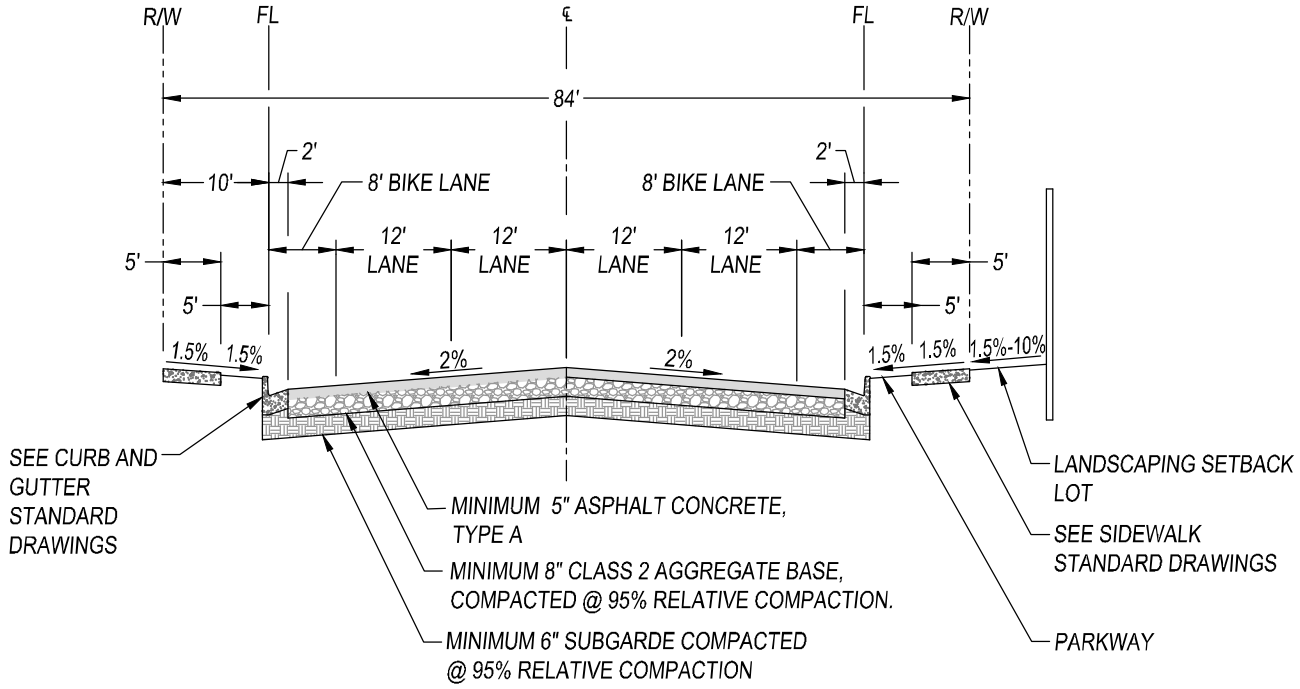
9. A FOOTING EASEMENT WILL BE REQUIRED AS NEEDED FOR BLOCK WALL FOOTINGS THAT EXTEND INTO PRIVATE PROPERTY.
10. STREET TREES ARE REQUIRED IN ADDITION TO THE ON-SITE LANDSCAPE REQUIREMENT.
11. FOR PARTIAL WIDTH STREETS A MINIMUM OF 30 FT OF PAVEMENT AND 8 FT SHOULDERS ARE REQUIRED.
12. MEDIAN BREAK LOCATIONS AND U-TURN MOVEMENT LOCATIONS ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.
13. UNIMPROVED MEDIAN SHALL BE LEFT WITH NATIVE SOILS 3" BELOW THE TOP OF CURB.
14. SOIL ADJACENT TO CONCRETE CURB AND SIDEWALK SHALL BE GRADED 3" BELOW TOP OF CURB TO ALLOW ROOM FOR MULCH.
15. TRAFFIC INDEX FOR STRUCTURAL SECTION CALCULATIONS = 8.0.

City of Lindsay

CITY SERVICES DEPARTMENT

2 LANE COLLECTOR STREET (WITH PARKING)

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-3
			DATE	03/06/25	



NOTES:

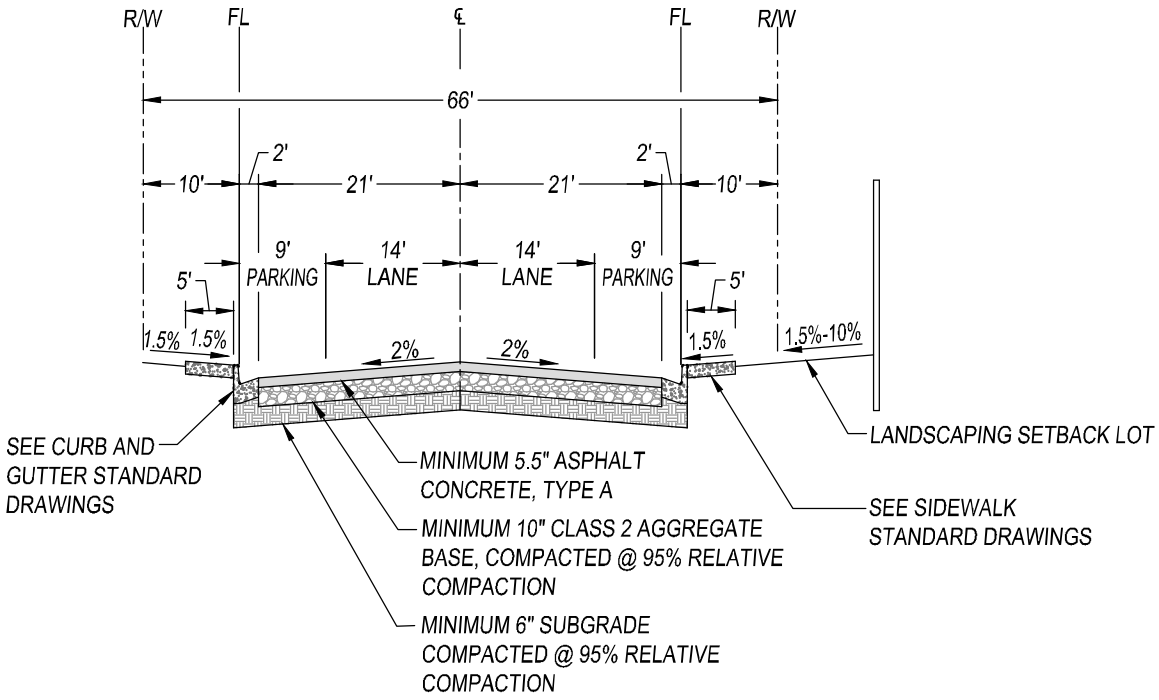
1. ASPHALT AND AGGREGATE BASE ARE SHOWN AT MINIMUM REQUIRED DEPTH, SUBJECT TO R-VALUE AND TRAFFIC INDEX BASED ON CALCULATIONS BY A REGISTERED CIVIL ENGINEER. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY A GEOTECHNICAL ENGINEER. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS DRAWING (ST-27).
2. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY GEOTECHNICAL ENGINEER.
3. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS STANDARD DRAWING.
4. ASPHALT CONCRETE SHALL BE TYPE A, WITH 3/4" AGGREGATE GRADATION AND PG 64-10 LIQUID ASPHALT BINDER PER CITY OF LINDSAY STANDARD SPECIFICATIONS.
5. TACK COAT IS REQUIRED AND SHALL BE APPLIED PER CITY STANDARD SPECIFICATIONS.
6. ASPHALT CONCRETE REQUIREMENTS SHALL BE AS STATED IN THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
7. ASPHALT CONCRETE SHALL BE PLACED ONLY WHEN THE ATMOSPHERIC TEMPERATURE IS 50° F AND RISING.
8. WITH ADDITIONAL LANDSCAPE EASEMENTS, SIDEWALK MAY BE LOCATED OUTSIDE RIGHT OF WAY TO PROVIDE ADDITIONAL PARKWAY.
9. A FOOTING EASEMENT WILL BE REQUIRED AS NEEDED FOR BLOCK WALL FOOTINGS THAT EXTEND INTO PRIVATE PROPERTY.
10. STREET TREES ARE REQUIRED IN ADDITION TO THE ON-SITE LANDSCAPE REQUIREMENT.
11. FOR PARTIAL WIDTH STREETS A MINIMUM OF 30 FT OF PAVEMENT AND 8 FT SHOULDERS ARE REQUIRED.
12. MEDIAN BREAK LOCATIONS AND U-TURN MOVEMENT LOCATIONS ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.
13. UNIMPROVED MEDIAN SHALL BE LEFT WITH NATIVE SOILS 3" BELOW THE TOP OF CURB.
14. SOIL ADJACENT TO CONCRETE CURB AND SIDEWALK SHALL BE GRADED 3" BELOW TOP OF CURB TO ALLOW ROOM FOR MULCH.
15. TRAFFIC INDEX FOR STRUCTURAL SECTION CALCULATIONS = 8.0.

City of Lindsay

CITY SERVICES DEPARTMENT

4 LANE COLLECTOR STREET (NO PARKING)

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-4
			DATE	03/06/25	



NOTES:

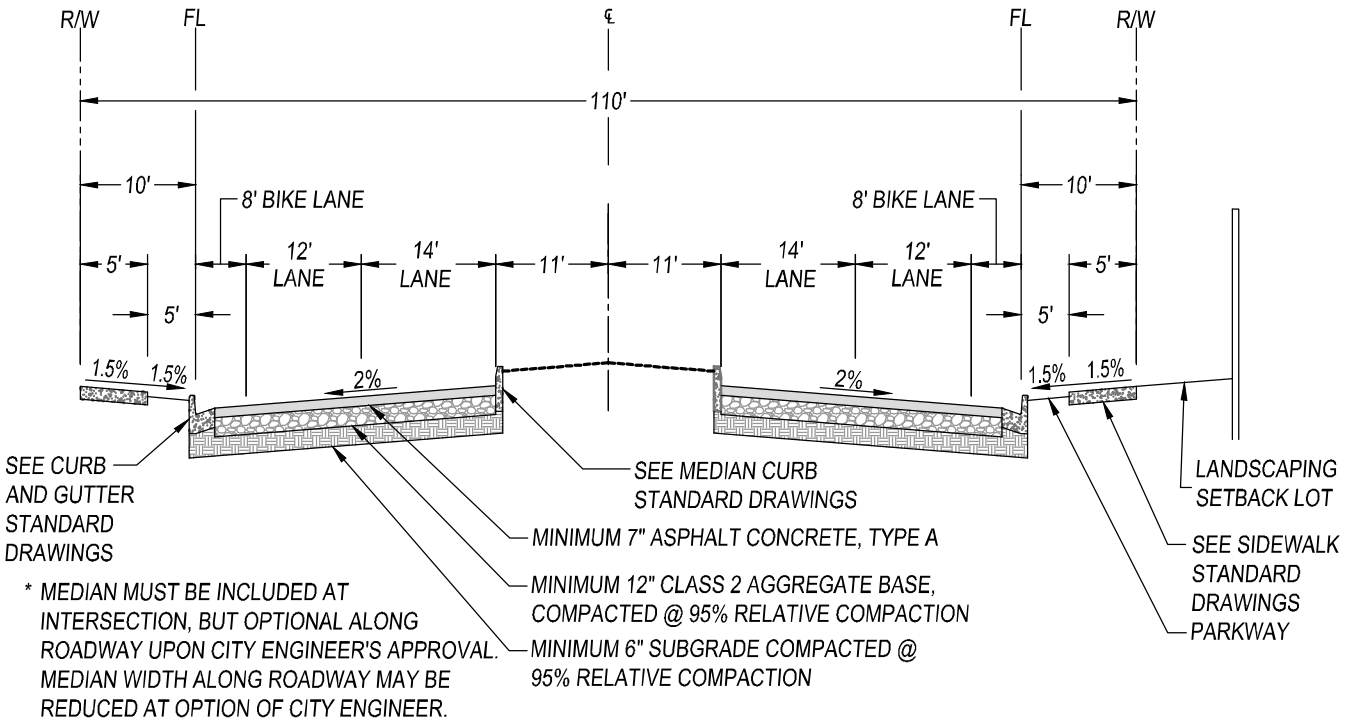
1. ASPHALT AND AGGREGATE BASE ARE SHOWN AT MINIMUM REQUIRED DEPTH, SUBJECT TO R-VALUE AND TRAFFIC INDEX BASED ON CALCULATIONS BY A REGISTERED CIVIL ENGINEER. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY A GEOTECHNICAL ENGINEER. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS DRAWING (ST-27).
2. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY GEOTECHNICAL ENGINEER.
3. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS STANDARD DRAWING.
4. ASPHALT CONCRETE SHALL BE TYPE A, WITH 3/4" AGGREGATE GRADATION AND PG 64-10 LIQUID ASPHALT BINDER PER CITY OF LINDSAY STANDARD SPECIFICATIONS.
5. TACK COAT IS REQUIRED AND SHALL BE APPLIED PER CITY STANDARD SPECIFICATIONS.
6. ASPHALT CONCRETE REQUIREMENTS SHALL BE AS STATED IN THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
7. ASPHALT CONCRETE SHALL BE PLACED ONLY WHEN THE ATMOSPHERIC TEMPERATURE IS 50° F AND RISING.
8. WITH ADDITIONAL LANDSCAPE EASEMENTS, SIDEWALK MAY BE LOCATED OUTSIDE RIGHT OF WAY TO PROVIDE ADDITIONAL PARKWAY.
9. A FOOTING EASEMENT WILL BE REQUIRED AS NEEDED FOR BLOCK WALL FOOTINGS THAT EXTEND INTO PRIVATE PROPERTY.
10. STREET TREES ARE REQUIRED IN ADDITION TO THE ON-SITE LANDSCAPE REQUIREMENT.
11. FOR PARTIAL WIDTH STREETS A MINIMUM OF 30 FT OF PAVEMENT AND 8 FT SHOULDERS ARE REQUIRED.
12. SOIL ADJACENT TO CONCRETE CURB AND SIDEWALK SHALL BE GRADED 3" BELOW TOP OF CURB TO ALLOW ROOM FOR MULCH.
13. TRAFFIC INDEX FOR STRUCTURAL SECTION CALCULATIONS = 6.0 MINIMUM, TO BE DETERMINED BY CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

2 LANE INDUSTRIAL

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-5
			DATE 03/06/25	



NOTES:

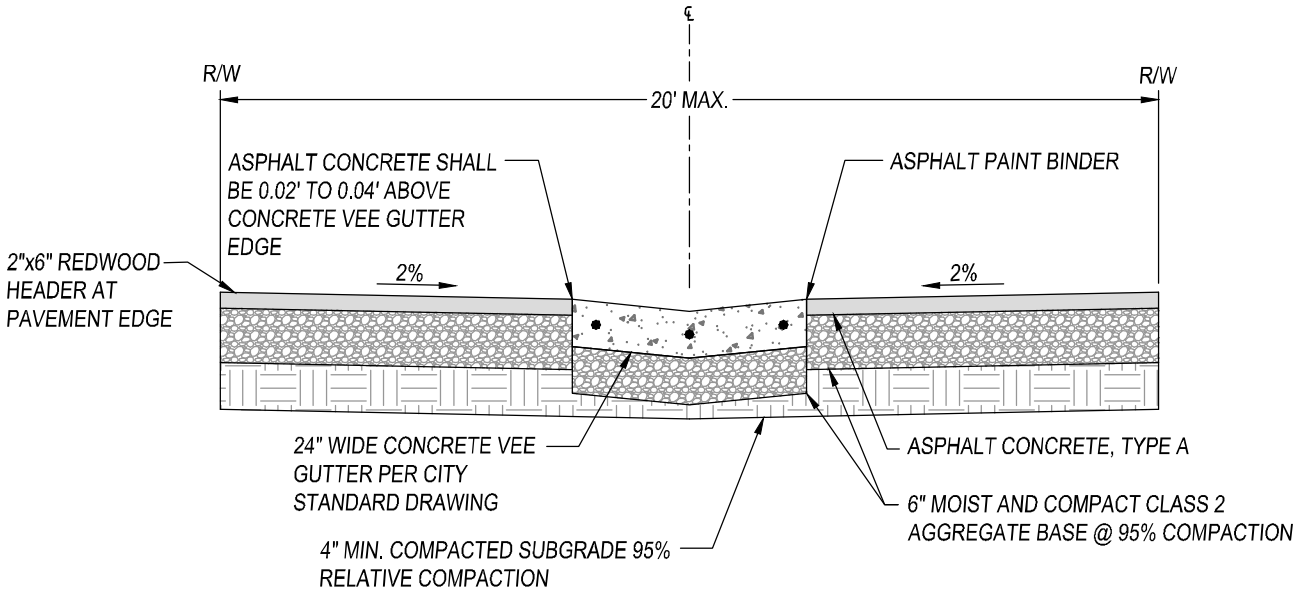
1. ASPHALT AND AGGREGATE BASE ARE SHOWN AT MINIMUM REQUIRED DEPTH, SUBJECT TO R-VALUE AND TRAFFIC INDEX BASED ON CALCULATIONS BY A REGISTERED CIVIL ENGINEER. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY A GEOTECHNICAL ENGINEER. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTIONS REQUIREMENTS DRAWING (ST-27).
2. R-VALUE AND PAVEMENT CALCULATIONS SHALL BE SUBMITTED TO THE CITY OF LINDSAY BY GEOTECHNICAL ENGINEER.
3. ASPHALT CONCRETE SHALL BE TYPE A, WITH 3/4" AGGREGATE GRADATION AND PG 64-10 LIQUID ASPHALT BINDER PER CITY OF LINDSAY STANDARD SPECIFICATIONS.
4. TACK COAT IS REQUIRED AND SHALL BE APPLIED PER CITY STANDARD SPECIFICATIONS.
5. ASPHALT CONCRETE REQUIREMENTS SHALL BE AS STATED IN THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
6. ASPHALT CONCRETE SHALL BE PLACED ONLY WHEN THE ATMOSPHERIC TEMPERATURE IS 50° F AND RISING.
7. WITH ADDITIONAL LANDSCAPE EASEMENTS, SIDEWALK MAY BE LOCATED OUTSIDE RIGHT OF WAY TO PROVIDE ADDITIONAL PARKWAY.
8. A FOOTING EASEMENT WILL BE REQUIRED AS NEEDED FOR BLOCK WALL FOOTINGS THAT EXTEND INTO PRIVATE PROPERTY.
9. STREET TREES ARE REQUIRED IN ADDITION TO THE ON-SITE LANDSCAPE REQUIREMENT.
10. FOR PARTIAL WIDTH STREETS A MINIMUM OF 30 FT OF PAVEMENT AND 8 FT SHOULDERS ARE REQUIRED.
11. MEDIAN BREAK LOCATIONS AND U-TURN MOVEMENT LOCATIONS ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.
12. UNIMPROVED MEDIAN SHALL BE LEFT WITH NATIVE SOILS 3" BELOW THE TOP OF CURB.
13. SOIL ADJACENT TO CONCRETE CURB AND SIDEWALK SHALL BE GRADED 3" BELOW TOP OF CURB TO ALLOW ROOM FOR MULCH.
14. TRAFFIC INDEX FOR STRUCTURAL SECTION CALCULATIONS = 11.0

City of Lindsay

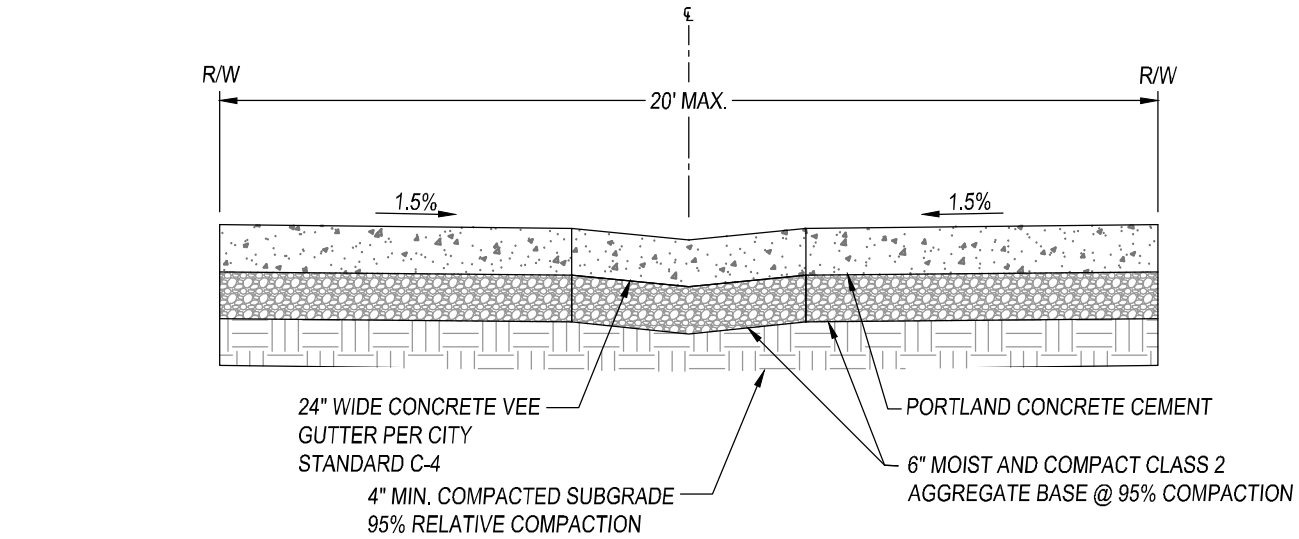
CITY SERVICES DEPARTMENT

ARTERIAL STREET

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-6
			DATE 03/06/25	



ASPHALT CONCRETE SURFACE



CONCRETE SURFACE

NOTES:

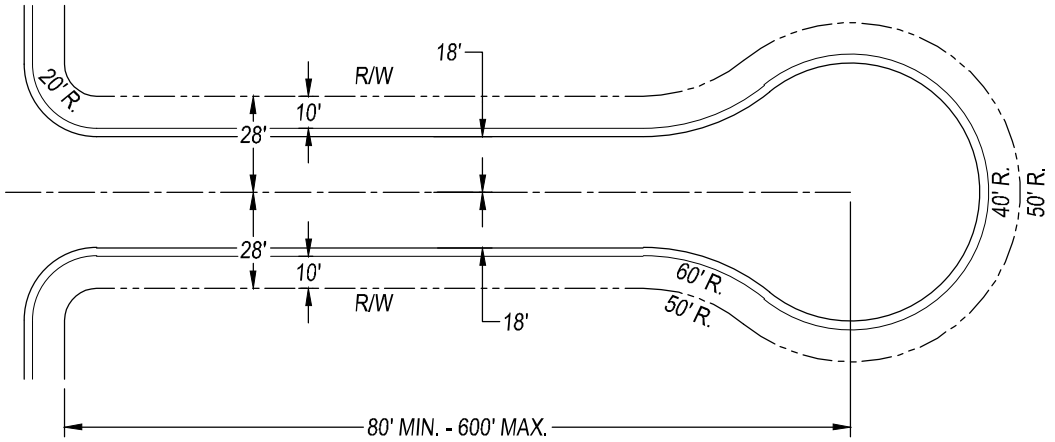
1. ALL CONCRETE SHALL BE CLASS 3 CONCRETE.
2. ALL CONCRETE SHALL HAVE A LIGHT BROOM FINISH.
3. DESIGN CRITERIA: TRAFFIC INDEX 5.5
4. STRUCTURAL SECTIONS SHALL BE DETERMINED BASED ON T.I. AND R-VALUES AS TABULATED IN THE STREET SECTION REQUIREMENTS STANDARD DETAIL.

City of Lindsay

CITY SERVICES DEPARTMENT

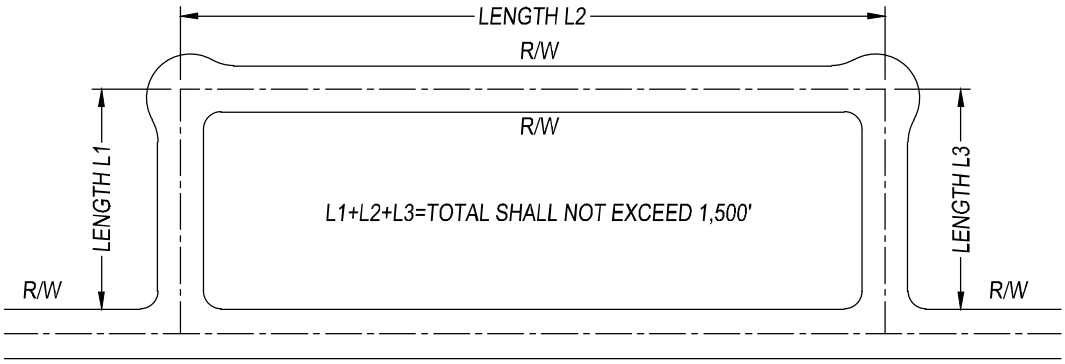
ALLEY SECTION

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-7
			DATE	03/06/25	



RESIDENTIAL CUL-DE-SAC

NOTE:
DESIGNS TO PERMIT PARKING IN CUL-DE-SAC CENTERS ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.



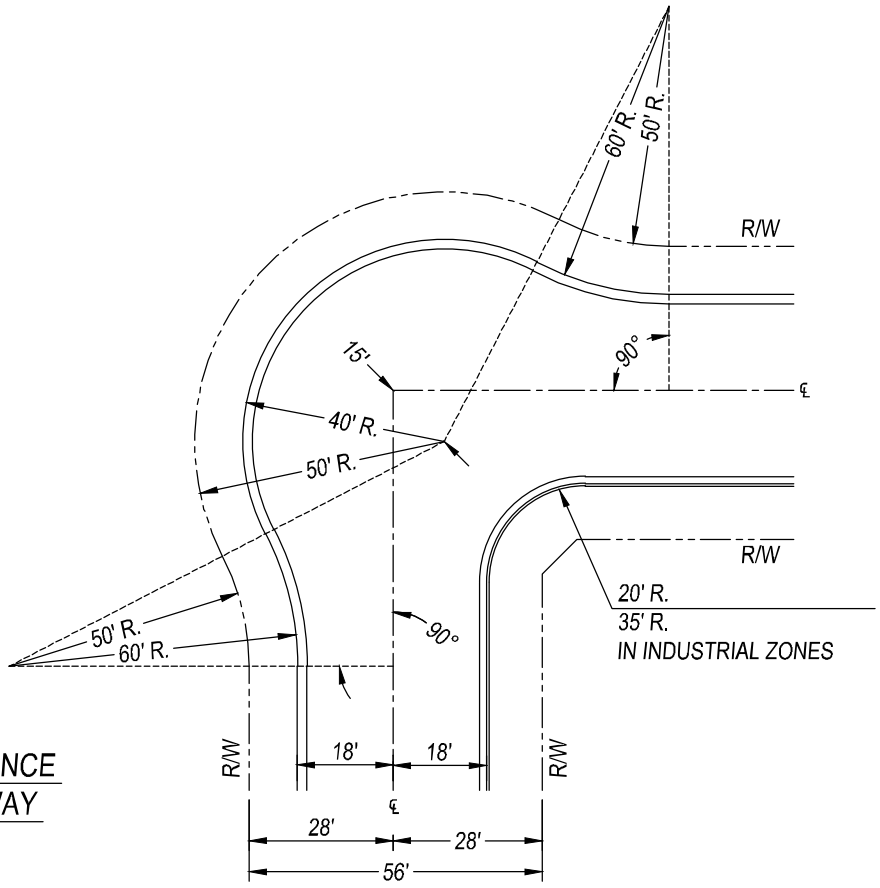
LOCAL MINOR LOOP STREET

City of Lindsay

CITY SERVICES DEPARTMENT

MINOR LOOP & CUL-DE-SAC LAYOUT

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-8
			DATE	03/06/25	



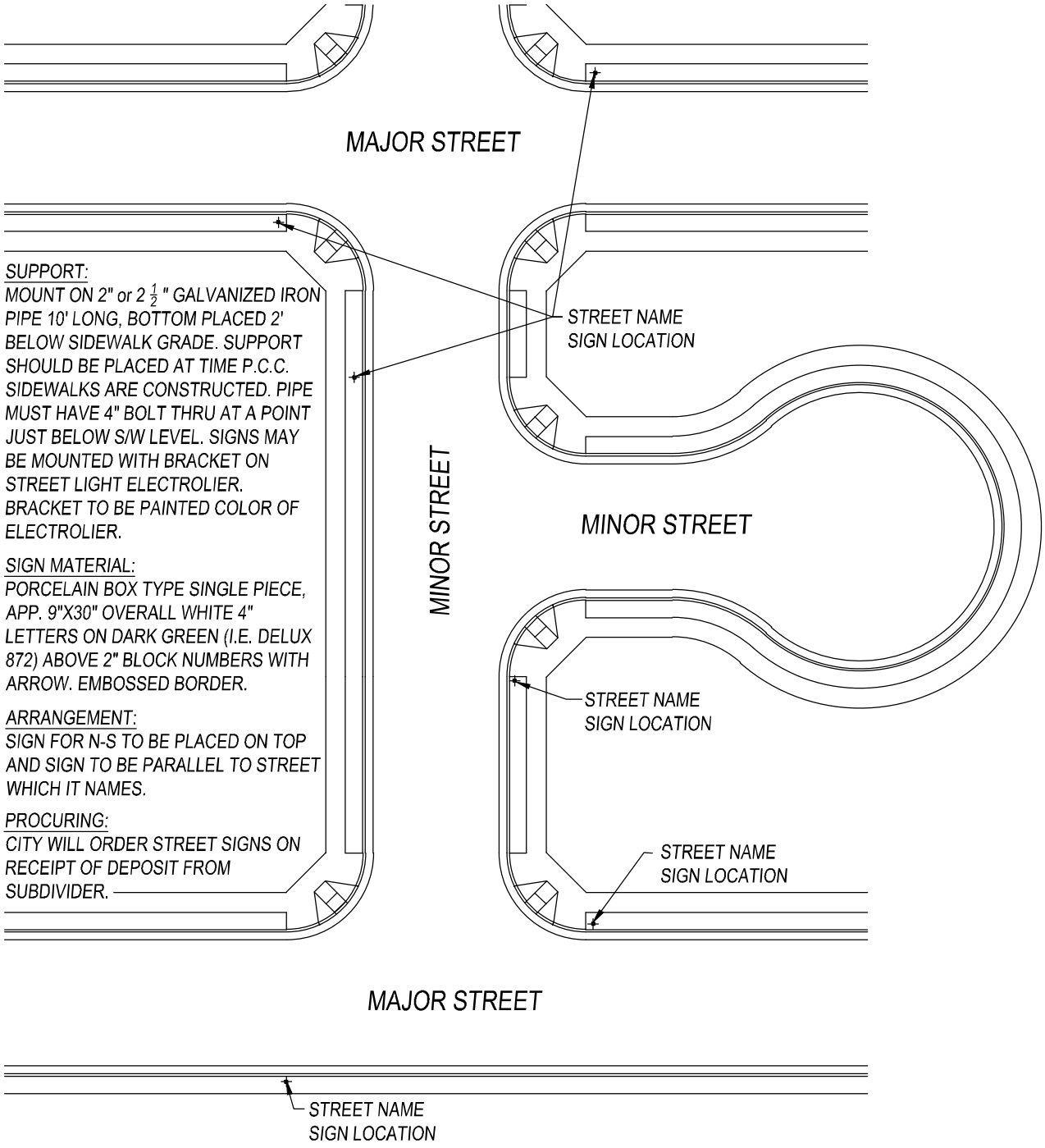
TYPICAL STREET BULB CONNECTION WITH 10' DISTANCE CURB FACE TO RIGHT OF WAY

City of Lindsay

CITY SERVICES DEPARTMENT

STREET BULB CONNECTION

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-9
			DATE	03/06/25	



SUPPORT:
MOUNT ON 2" or 2 $\frac{1}{2}$ " GALVANIZED IRON PIPE 10' LONG, BOTTOM PLACED 2' BELOW SIDEWALK GRADE. SUPPORT SHOULD BE PLACED AT TIME P.C.C. SIDEWALKS ARE CONSTRUCTED. PIPE MUST HAVE 4" BOLT THRU AT A POINT JUST BELOW S/W LEVEL. SIGNS MAY BE MOUNTED WITH BRACKET ON STREET LIGHT ELECTROLIER. BRACKET TO BE PAINTED COLOR OF ELECTROLIER.

SIGN MATERIAL:
PORCELAIN BOX TYPE SINGLE PIECE, APP. 9"X30" OVERALL WHITE 4" LETTERS ON DARK GREEN (I.E. DELUX 872) ABOVE 2" BLOCK NUMBERS WITH ARROW. EMBOSSED BORDER.

ARRANGEMENT:
SIGN FOR N-S TO BE PLACED ON TOP AND SIGN TO BE PARALLEL TO STREET WHICH IT NAMES.

PROCURING:
CITY WILL ORDER STREET SIGNS ON RECEIPT OF DEPOSIT FROM SUBDIVIDER.

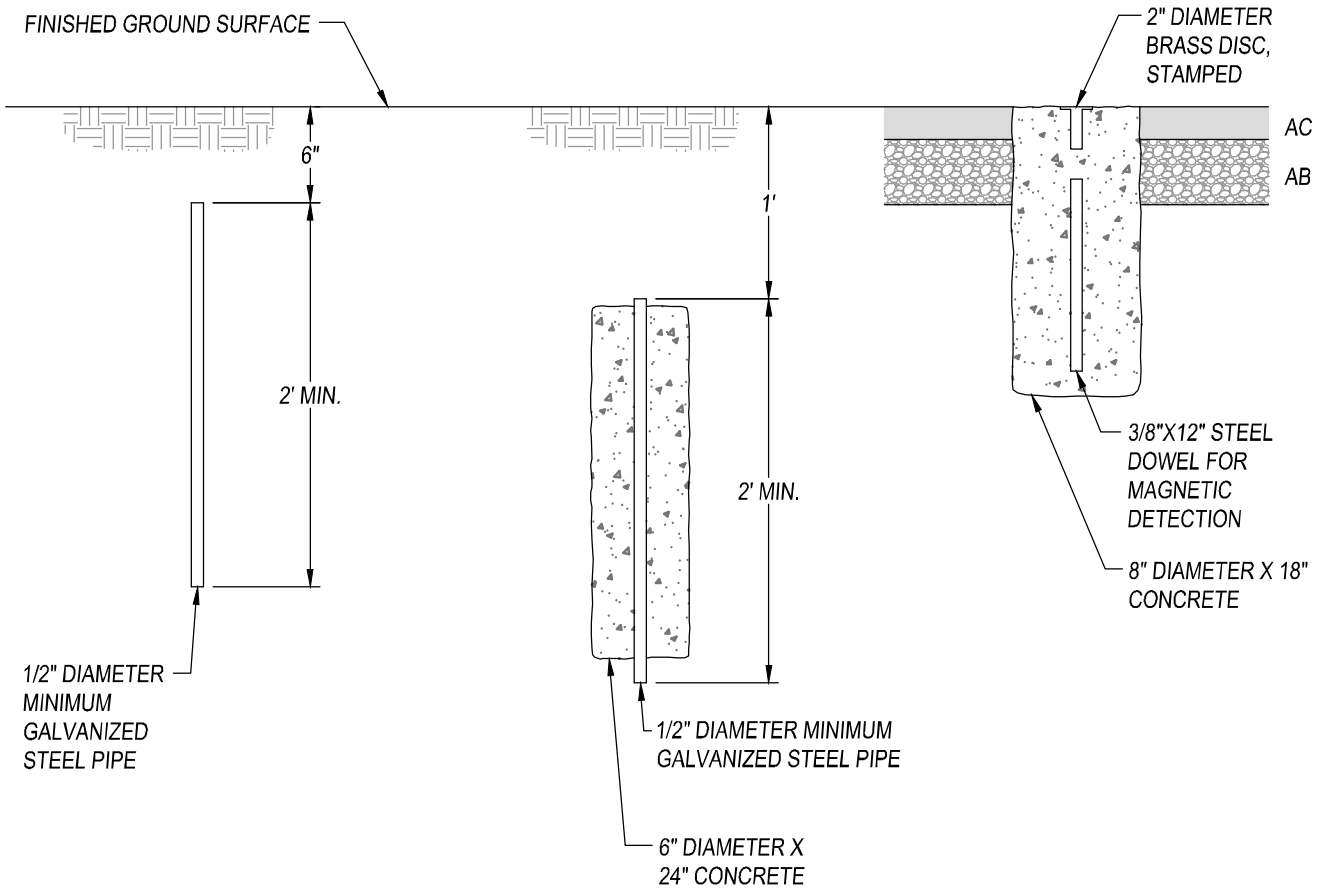
LOCATION:
ON RIGHT SIDE OF TRAFFIC ON MAJOR STREET, IN SIDEWALK 12" BEHIND CURB FACE, AT BEGINNING OF CURB RETURN OR AT A "T" INTERSECTION IN LINE WITH CURB OF OPPOSING STREET.

City of Lindsay

CITY SERVICES DEPARTMENT

STREET SIGN LOCATION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-10
			DATE 03/06/25	



TYPE "A"
LOT CORNERS

TYPE "B"
STREET MONUMENTS AND LANDSCAPED MEDIAN MONUMENTS

TYPE "C"
STREET MONUMENTS

NOTES:

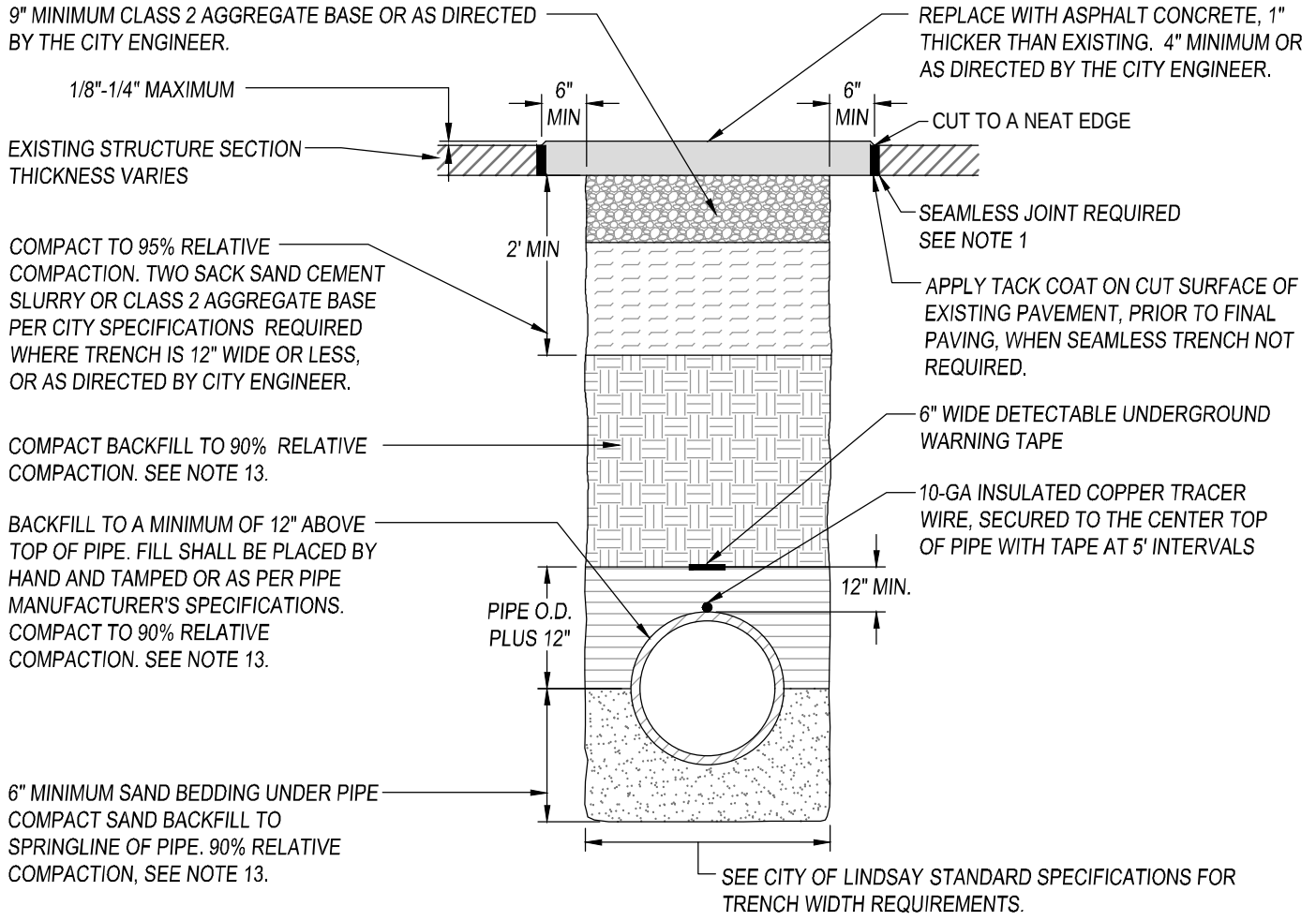
1. ALL MONUMENTS SET SHALL BE PERMANENTLY AND VISIBLY MARKED OR TAGGED WITH THE LICENSE NUMBER OF THE SURVEYOR OR CIVIL ENGINEER SETTING IT.
2. ALL LOT CORNERS SHALL BE LOCATED WITH TYPE "A" MONUMENTS OR MONUMENTS APPROVED BY THE CITY SURVEYOR.
3. TYPE "C" STREET MONUMENTS SHALL BE USED TO LOCATE ALL ANGLE AND CURVE POINTS ON THE CENTERLINES OF ASPHALT CONCRETE SURFACED STREETS.
4. ADDITIONAL MONUMENTS MAY BE REQUIRED AT THE DISCRETION OF THE CITY SURVEYOR.

City of Lindsay

CITY SERVICES DEPARTMENT

MONUMENT DETAILS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-11
			DATE 03/06/25	



NOTES:

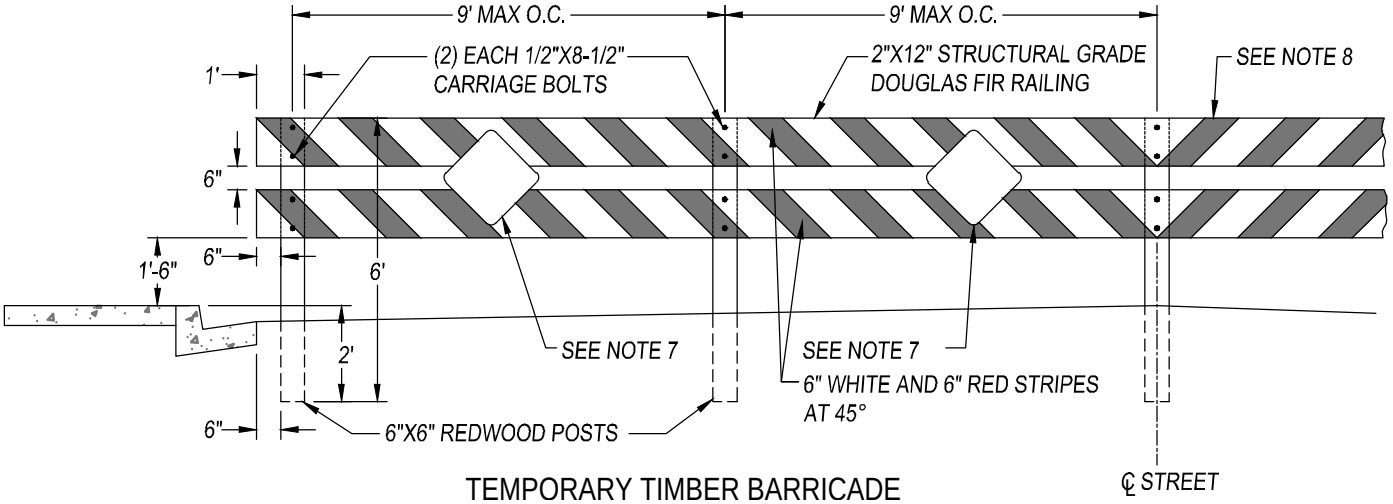
1. ALL CUTS IN EXISTING PAVEMENT THAT IS LESS THAN EIGHT YEARS OLD OR AS DIRECTED BY THE CITY ENGINEER SHALL BE REQUIRED TO HAVE SEAMLESS JOINTS WITH THE EXISTING PAVEMENT BY USING A HEATER-REMIX PROCESS.
2. ALL WORKMANSHIP AND MATERIALS SHALL CONFORM TO THE REQUIREMENTS SET FORTH IN THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
3. ALL PROVISIONS AND REQUIREMENTS OF THE CITY OF LINDSAY MUNICIPAL CODE SHALL BE FOLLOWED.
4. STREET CUTS SHALL BE MADE PARALLEL OR AT RIGHT ANGLES TO THE CENTERLINE OF THE STREET.
5. ALL TRENCHES UNDER EXISTING CURB AND GUTTER OR OTHER CITY STRUCTURES SHALL REQUIRE A TWO SACK CEMENT SLURRY BACKFILL. CEMENT SLURRY BACKFILL SHALL HAVE NOT LESS THAN 188 POUNDS OF CEMENT PER CUBIC YARD OF MATERIAL PRODUCED.
6. MANHOLE AND WATER VALVE RAISING ASSOCIATED WITH NEW STREET CONSTRUCTION IS NOT REQUIRED TO FOLLOW NOTE 1.
7. MOISTURE CONDITION AND MIX BACKFILL MATERIAL PRIOR TO PLACEMENT.
8. TEMPORARY TRENCH RESURFACING SHALL CONSIST OF A MINIMUM OF 3" COLD MIX AND SHALL BE REQUIRED WHENEVER THE STREET IS TEMPORARILY OPENED TO TRAFFIC. ALL TEMPORARY MATERIAL SHALL BE COMPLETELY REMOVED PRIOR TO FINAL PAVING.
9. TRENCH RESURFACING STRUCTURAL SECTION IN OTHER THAN PERMANENTLY PAVED OR UNPAVED AREAS SHALL BE DETERMINED BY THE CITY ENGINEER.
10. NO JETTING OR FLOODING OF TRENCH BACKFILL WILL BE ALLOWED. BACKFILL IS TO BE PLACED IN MAXIMUM 8" LOOSE LIFTS, THEN COMPACTED AS DIRECTED BY THE CITY ENGINEER.
11. FOR UTILITY POTHOLES WITH DIAMETER 9" OR LESS OR MAXIMUM DIMENSION IN ANY DIRECTION OF 9" OR LESS, OR WHERE DIRECTED BY THE ENGINEER, BACKFILL SHALL COMPLY WITH THE STANDARD CITY DRAWING ST-30 FOR UTILITY POTHOLE BACKFILL.
12. IF THERE IS LESS THAN 2 FEET BETWEEN THE EDGE OF A TRENCH CUT AND A CONCRETE IMPROVEMENT, OR EDGE OF PAVING, THEN REMOVE AND REPLACE THE A.C. PAVEMENT FROM THE EDGE OF THE TRENCH CUT TO THE CONCRETE IMPROVEMENT, OR EDGE OF PAVING.
13. UNLESS OTHERWISE NOTED BACKFILL AND BEDDING SHALL BE CLEAN GRANULAR NATIVE MATERIAL PER CITY SPECIFICATIONS. WITH MINIMUM 30% SAND EQUIVALENCE.

City of Lindsay

CITY SERVICES DEPARTMENT

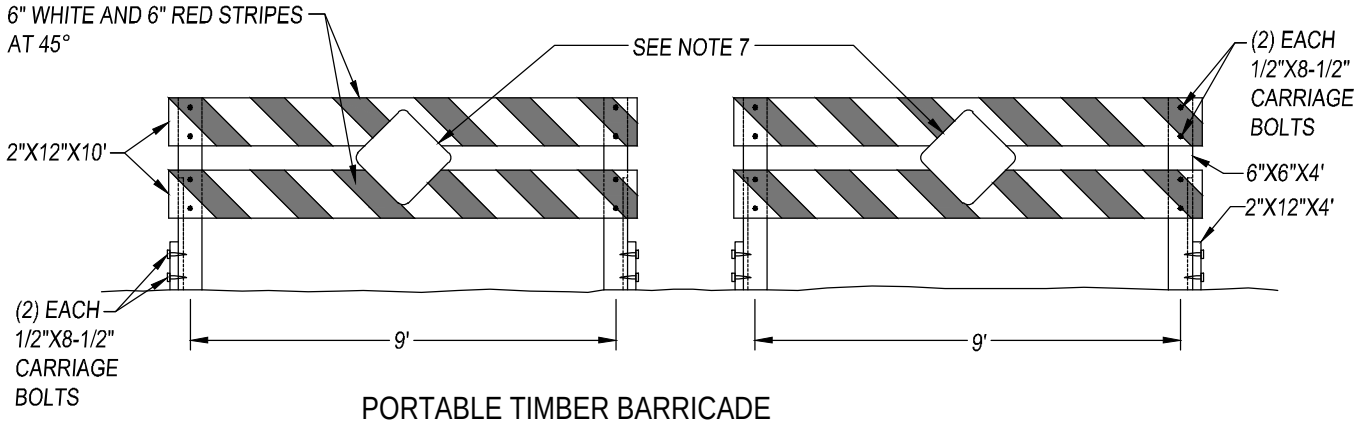
TRENCH BACKFILL / PAVING

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-12
			DATE	03/06/25	



TEMPORARY TIMBER BARRICADE

FOR TYPICAL CONDITIONS

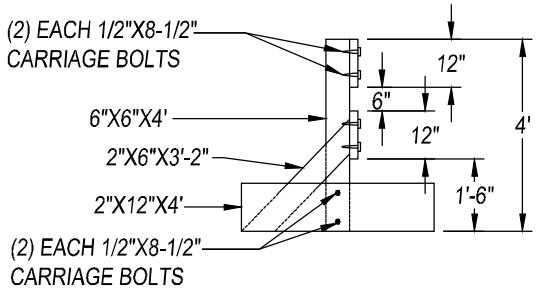


PORTABLE TIMBER BARRICADE

FOR SPECIAL CONDITIONS

NOTES:

1. BARRICADES SHALL BE FULL WIDTH OF PAVEMENT OR TRAVELED WAY OR AS APPROVED BY THE CITY ENGINEER.
2. BARRICADE SHALL BE PAINTED WITH TWO COATS OF WHITE PAINT. FOLLOWED BY TWO COATS OF RED PAINT FOR THE STRIPE. PAINT SHALL BE A PREMIUM QUALITY EXTERIOR GLOSS OR SEMI-GLOSS ENAMEL AND SHALL BE PURE WHITE IN COLOR. PAINT SHALL COMPLETELY SEAL ALL EXPOSED SURFACES OF THE BARRICADE.
3. WOOD PRESSURE TREATED WITH A PRESERVATIVE MAY BE SUBSTITUTED FOR REDWOOD MATERIAL.
4. ALL SIGNS SHALL BE IN ACCORDANCE WITH THE CURRENT EDITION OF THE CALIFORNIA MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES.
5. USE OF THE PORTABLE TIMBER BARRICADE OR BARRICADES WITH A LOCK AND CHAIN, SHALL BE SUBJECT TO THE APPROVAL OF THE CITY ENGINEER.
6. ABANDONED BARRICADES SHALL BE RECLAIMED BY THE CITY OF LINDSAY.
7. REFLECTOR SIGNS - CALIFORNIA 0M4-1. FASTEN REFLECTOR SIGN TO BARRICADE WITH 3/8" X 1-1/2" GALVANIZED LAG SCREWS WITH WASHERS, MUST BE HIGH INTENSITY REFLECTIVE STANDARD, AND SIGNAGE MUST HAVE ANTI-GRAFFITI COATING.
8. DIAGONAL STRIPES ON BARRICADE SHALL POINT TO THE CENTER OF THE ROADWAY.



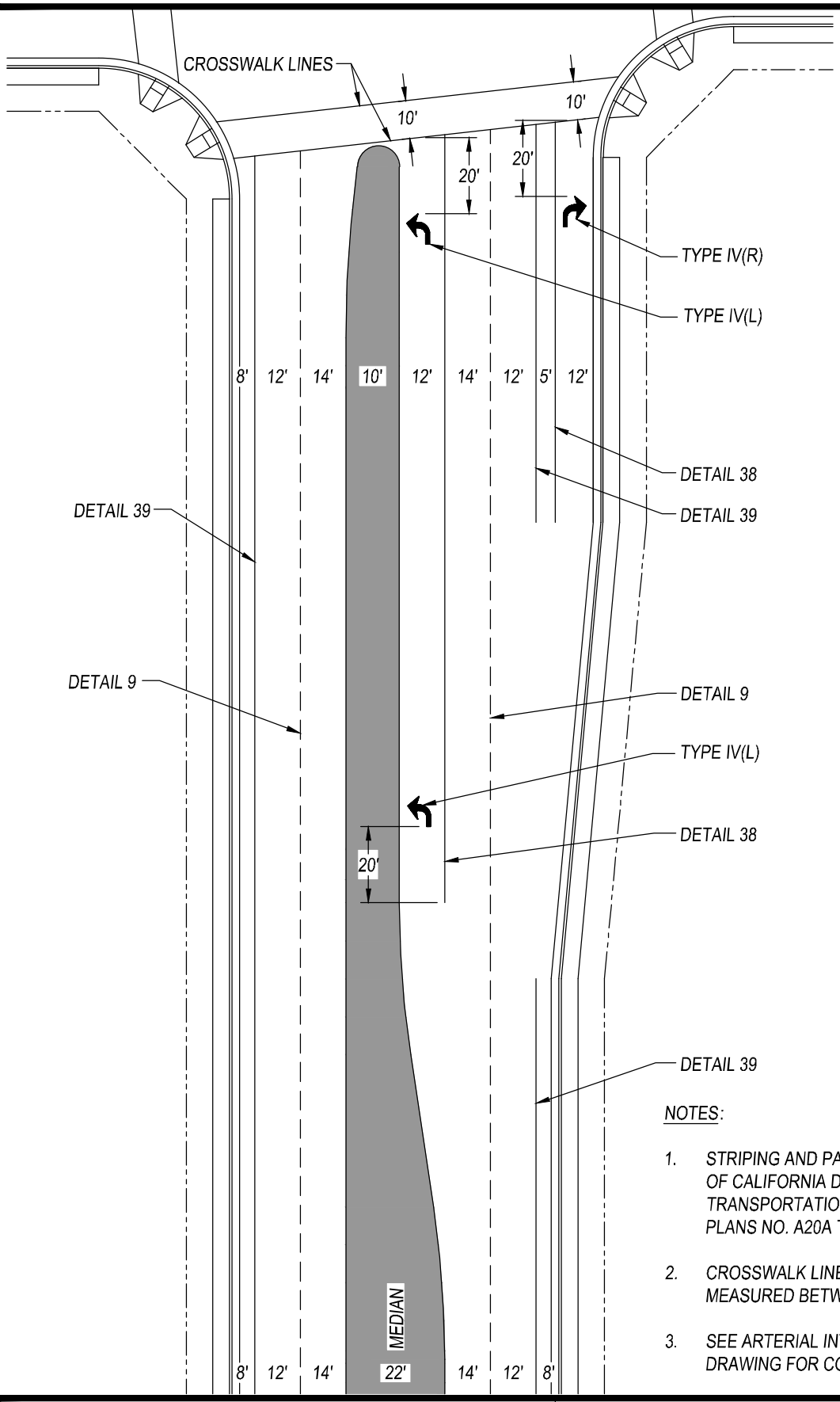
PORTABLE TIMBER BARRICADE SIDE VIEW

City of Lindsay

CITY SERVICES DEPARTMENT

TIMBER BARRICADES

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-13
			DATE 03/06/25	



NOTES:

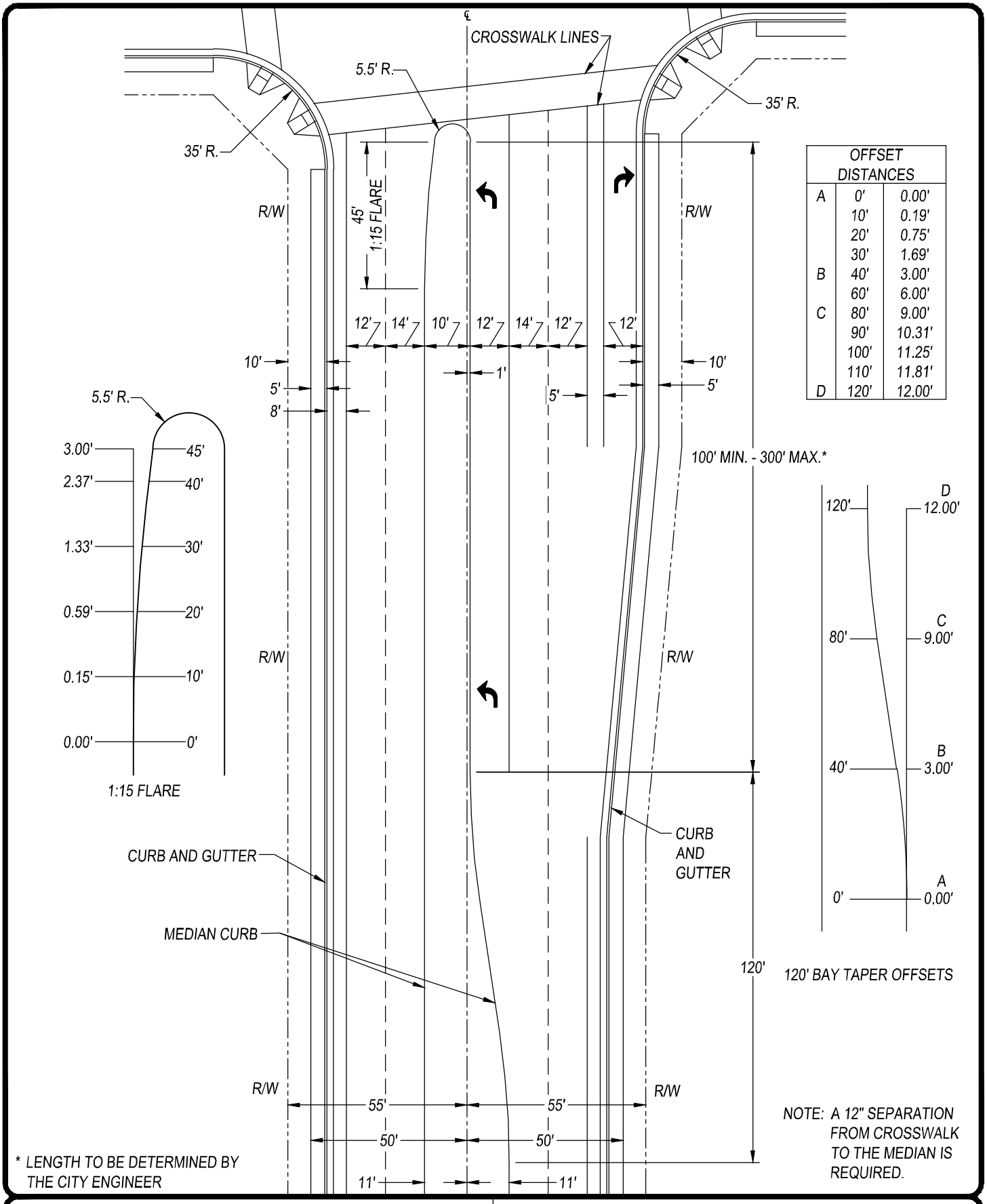
1. STRIPING AND PAVEMENT MARKINGS PER STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION STANDARD PLANS, STANDARD PLANS NO. A20A THROUGH A24E.
2. CROSSWALK LINES SHALL BE 10' APART MEASURED BETWEEN INSIDE OF LINES.
3. SEE ARTERIAL INTERSECTION DESIGN STANDARD DRAWING FOR CONSTRUCTION DIMENSIONS.

City of Lindsay

CITY SERVICES DEPARTMENT

ARTERIAL INTERSECTION STRIPING

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-14
			DATE 03/06/25	



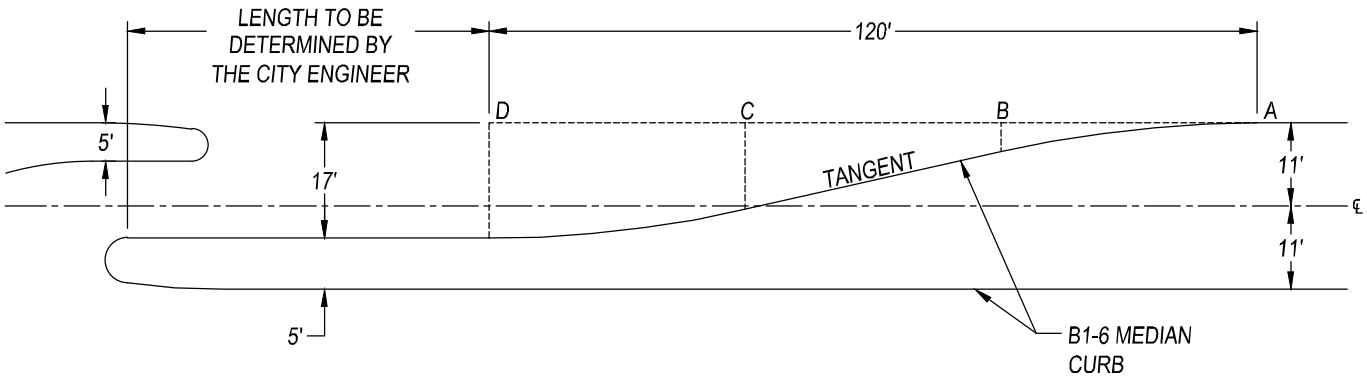
OFFSET DISTANCES		
A	0'	0.00'
	10'	0.19'
	20'	0.75'
	30'	1.69'
B	40'	3.00'
	60'	6.00'
C	80'	9.00'
	90'	10.31'
	100'	11.25'
	110'	11.81'
D	120'	12.00'

City of Lindsay

CITY SERVICES DEPARTMENT

ARTERIAL INTERSECTION DESIGN

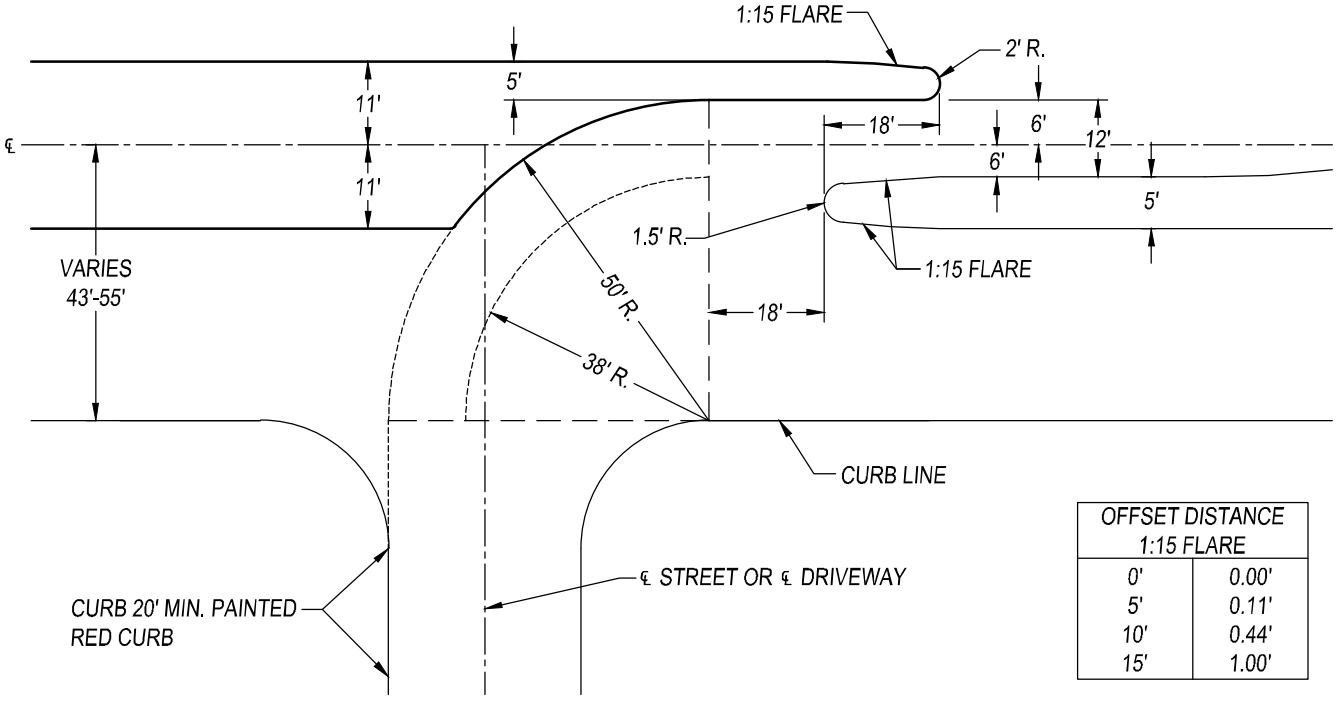
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-15
			DATE 03/06/25	



OFFSET DISTANCES		
A	0'	0.00'
	10'	0.25'
	20'	1.00'
	30'	2.25'
B	40'	4.00'
C	80'	12.00'
	90'	13.75'
	100'	15.00'
	110'	15.75'
D	120'	16.00'

OFFSET DISTANCES		
A	0'	0.00'
	10'	0.28'
	20'	1.13'
	30'	2.53'
B	40'	4.50'
C	80'	13.50'
	90'	15.47'
	100'	16.88'
	110'	17.72'
D	120'	18.00'

NOTE: MEDIAN WIDTH MAY BE REDUCED AT OPTION OF THE CITY ENGINEER.



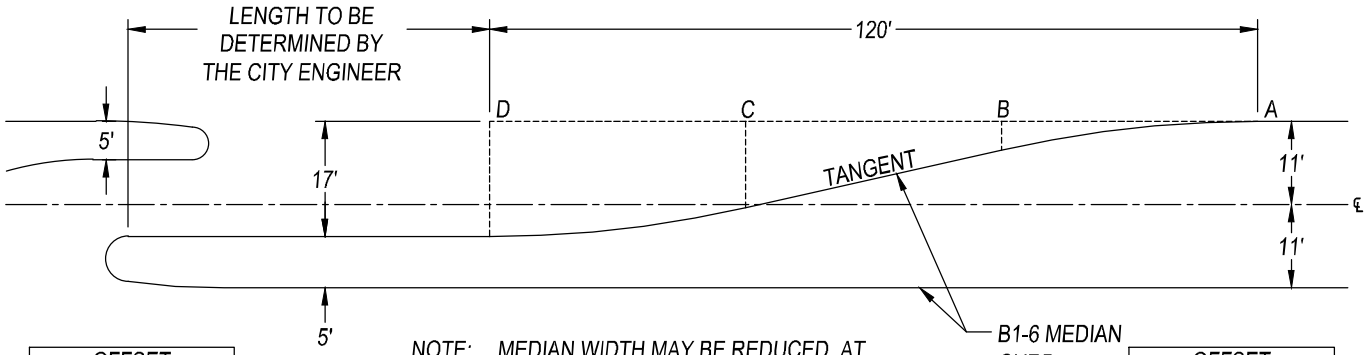
OFFSET DISTANCE 1:15 FLARE	
0'	0.00'
5'	0.11'
10'	0.44'
15'	1.00'

City of Lindsay

CITY SERVICES DEPARTMENT

ARTERIAL MEDIAN ISLAND OPENING OR ONE-WAY LEFT TURN ONLY

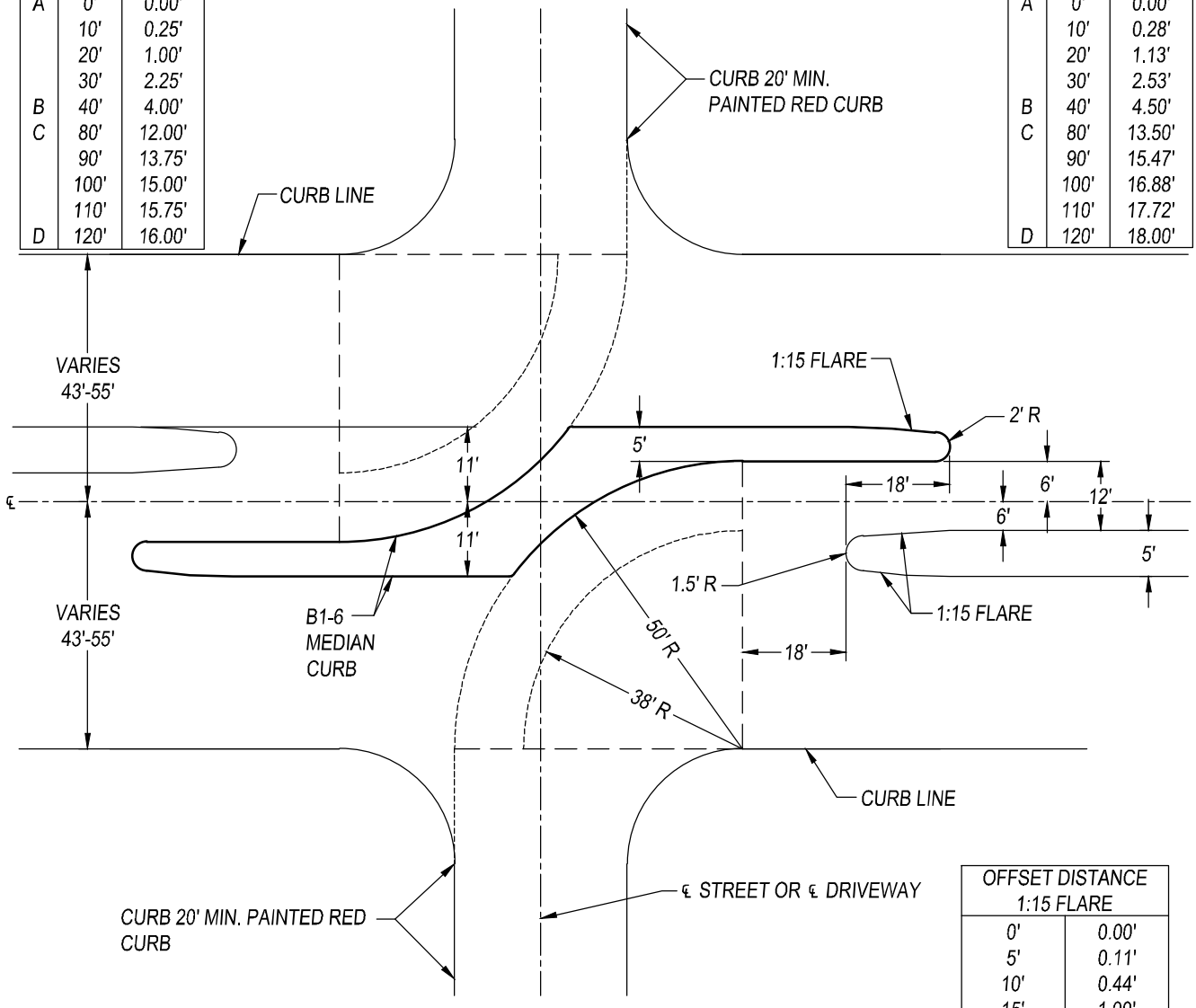
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-16
			DATE 03/06/25	



NOTE: MEDIAN WIDTH MAY BE REDUCED AT OPTION OF THE CITY ENGINEER.

OFFSET DISTANCES		
A	0'	0.00'
	10'	0.25'
	20'	1.00'
	30'	2.25'
B	40'	4.00'
C	80'	12.00'
	90'	13.75'
	100'	15.00'
	110'	15.75'
D	120'	16.00'

OFFSET DISTANCES		
A	0'	0.00'
	10'	0.28'
	20'	1.13'
	30'	2.53'
B	40'	4.50'
C	80'	13.50'
	90'	15.47'
	100'	16.88'
	110'	17.72'
D	120'	18.00'



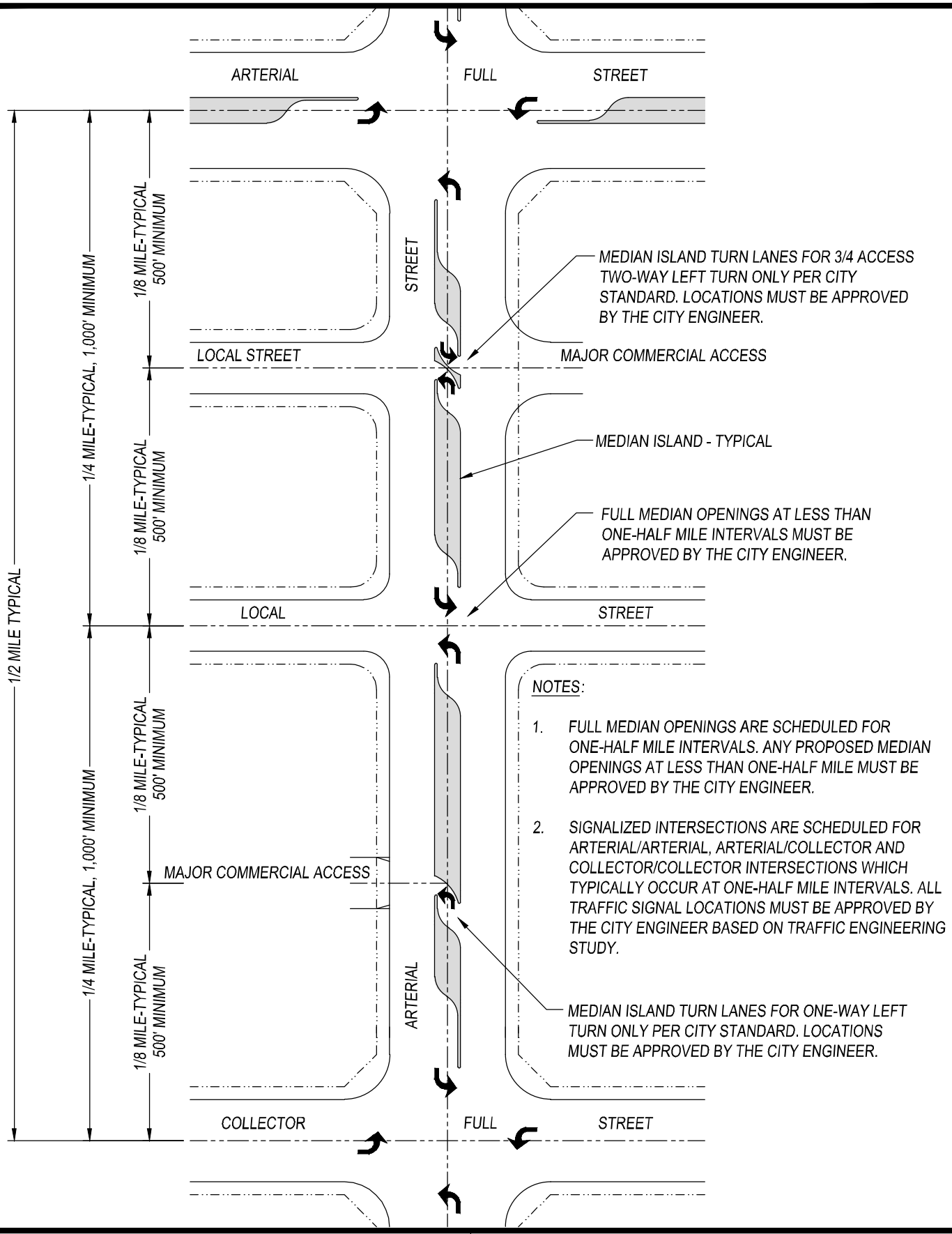
OFFSET DISTANCE 1:15 FLARE	
0'	0.00'
5'	0.11'
10'	0.44'
15'	1.00'

City of Lindsay

CITY SERVICES DEPARTMENT

ARTERIAL MEDIAN ISLAND OPENING FOR TWO-WAY LEFT TURN ONLY

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-17
			DATE 03/06/25	

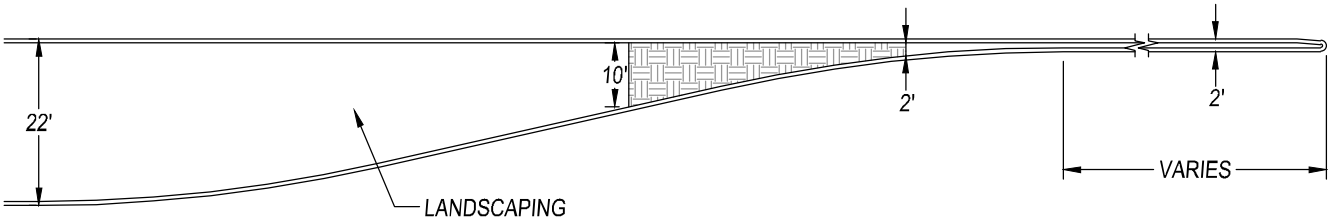


City of Lindsay

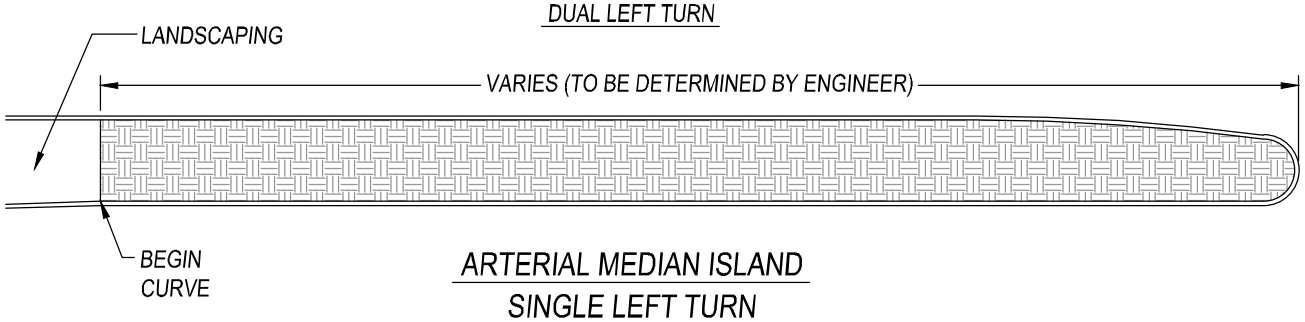
CITY SERVICES DEPARTMENT

TYPICAL MEDIAN BREAK LOCATIONS

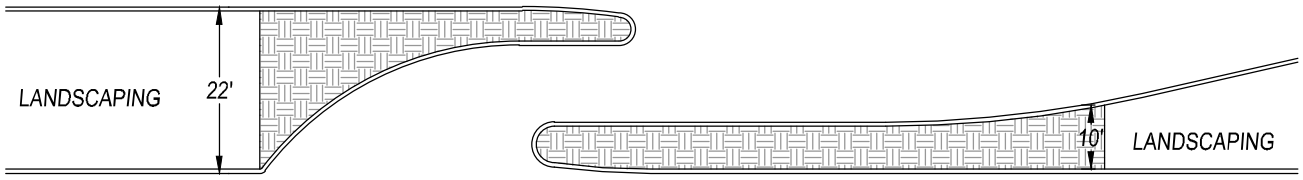
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-18
			DATE 03/06/25	



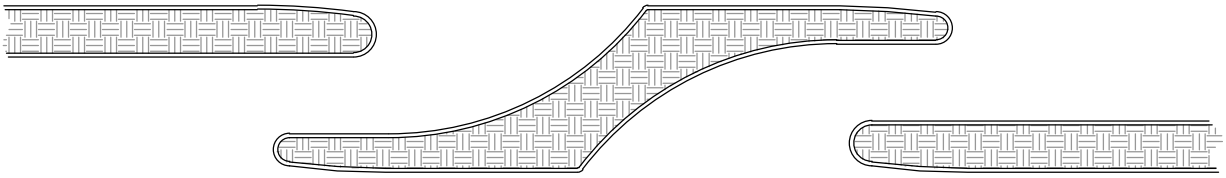
ARTERIAL MEDIAN ISLAND
DUAL LEFT TURN



ARTERIAL MEDIAN ISLAND
SINGLE LEFT TURN



ARTERIAL MEDIAN ISLAND OPENING
FOR ONE-WAY LEFT TURN ONLY



ARTERIAL MEDIAN ISLAND OPENING
FOR TWO-WAY LEFT TURN ONLY

LEGEND:

STAMPED CONCRETE PER CITY STANDARD SPECIFICATIONS OR AS DIRECTED BY CITY ENGINEER

NOTES:

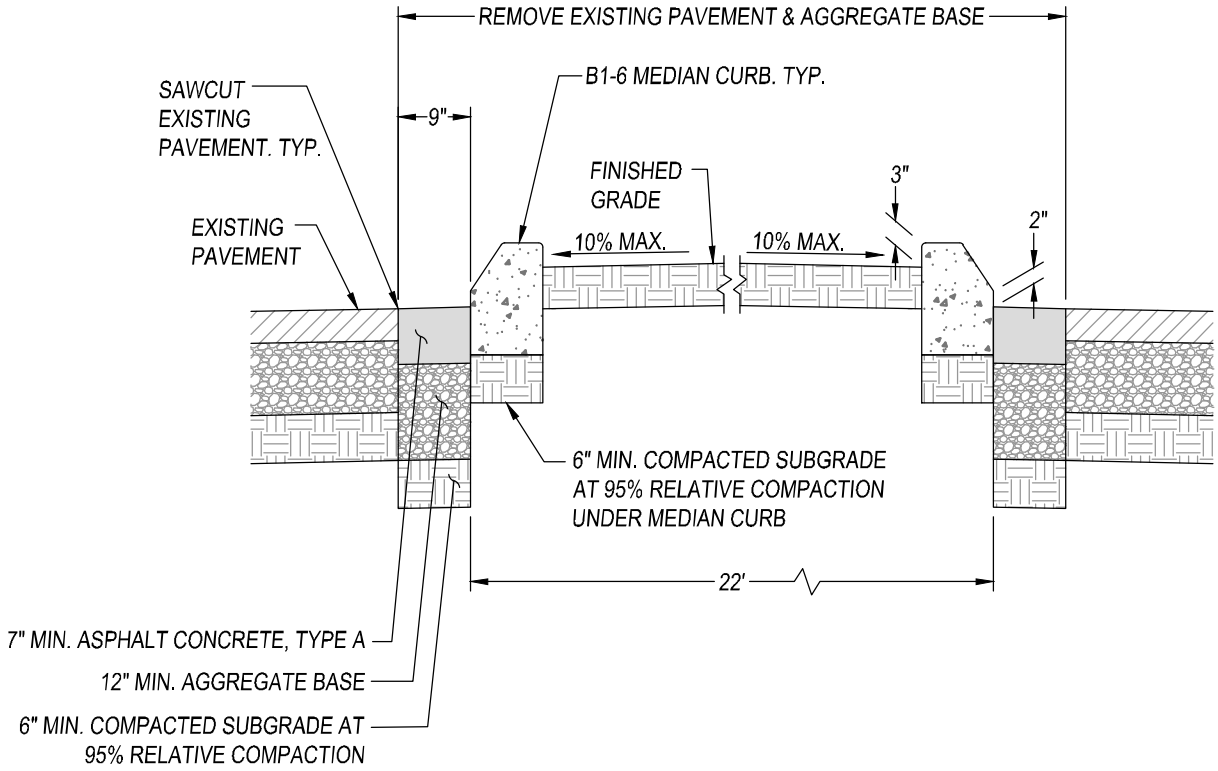
1. ANY MEDIAN SPACE LESS THAN 2' BACK OF CURB TO BACK OF CURB SHALL BE SOLID CONCRETE FINISH.
2. END STAMPED CONCRETE WHERE MEDIAN ISLAND WIDTH IS 10' BACK OF CURB TO BACK OF CURB.
3. SLEEVES SHALL BE PROVIDED THROUGH MEDIAN CONCRETE. IF CONDUIT OR OTHER IMPROVEMENT NEEDS TO RUN THROUGH MEDIAN CONCRETE IT SHALL BE DONE THROUGH BORING, NOT TRENCHING.

City of Lindsay

CITY SERVICES DEPARTMENT

STAMPED CONCRETE & LANDSCAPING LOCATIONS IN ARTERIAL MEDIANS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-19
			DATE 03/06/25	



NOTE:

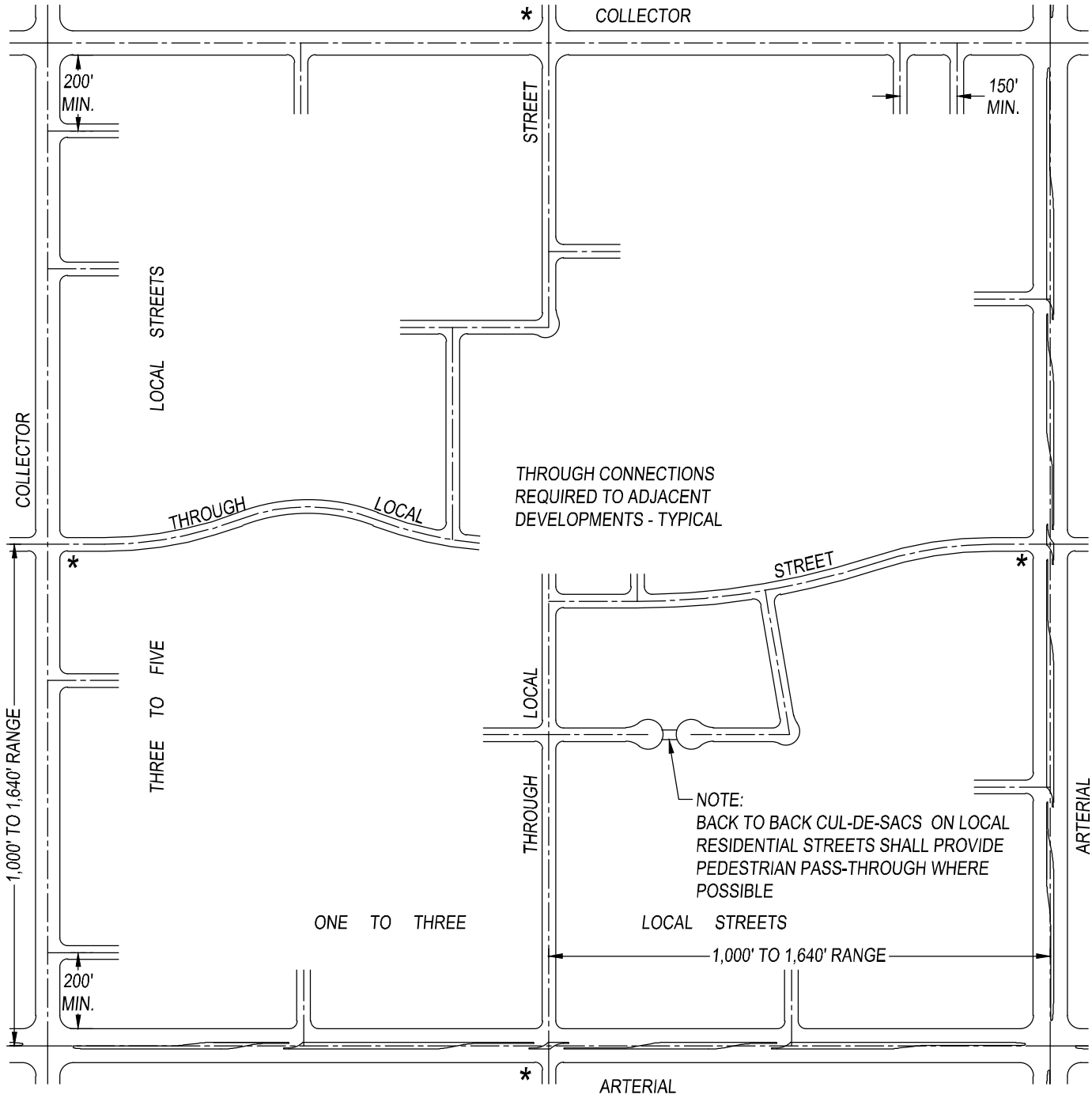
1. IF EXISTING PAVEMENT SECTION IS THICKER THAN SECTION THICKNESS MENTIONED ABOVE, THE PAVEMENT TO BE INSTALLED SHALL MATCH EXISTING.
2. IF MEDIAN WIDTH IS LESS THAN 6 FEET, THE MEDIAN SLOPE MAY BE INCREASED UP TO 25%.
3. MEDIAN IMPROVEMENTS, INCLUDING LANDSCAPING, SHALL NOT EXCEED 30" IN HEIGHT WITHIN THE SIGHT TRIANGLE AREA.
4. FULL DEPTH ASPHALT CONCRETE PLUG MAY BE ALLOWED WITH APPROVAL OF CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

ARTERIAL MEDIAN INSTALLATION IN EXISTING PAVEMENT

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-20
			DATE 03/06/25	



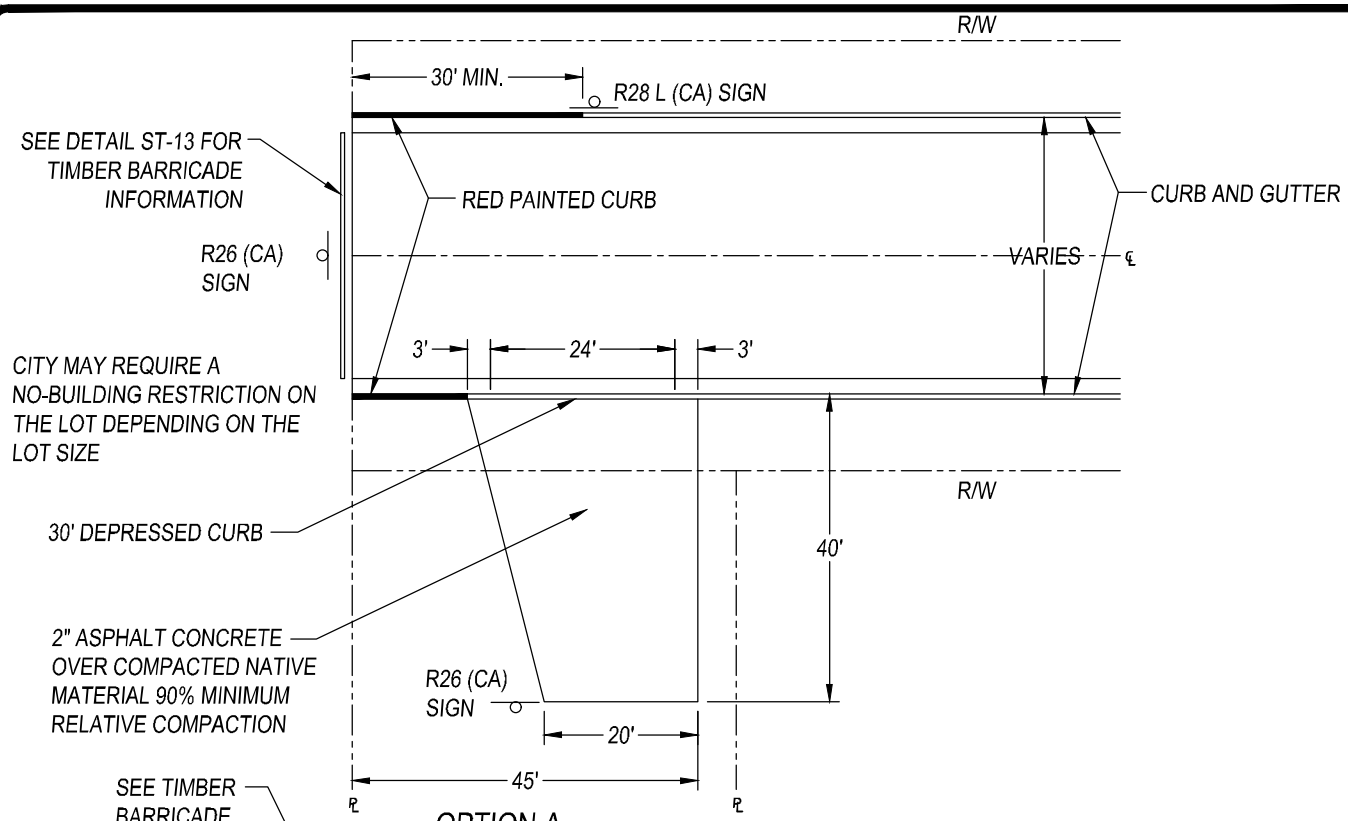
* THE INTENT OF THIS POLICY IS TO PROVIDE FULL ACCESS FROM EACH ASTERISK NOTED INTERSECTION TO EACH DEVELOPMENT WITHIN THE SUPER BLOCK WITHOUT USING A COLLECTOR OR ARTERIAL.

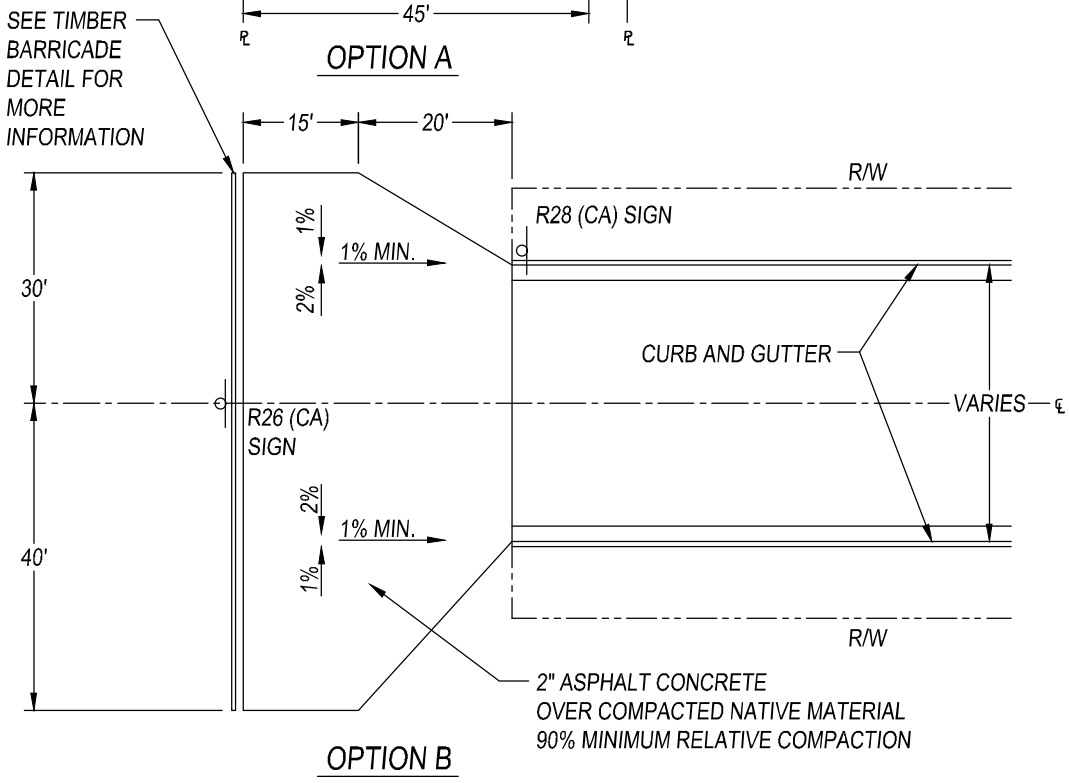
City of Lindsay

CITY SERVICES DEPARTMENT

SUPERBLOCK CONNECTIVITY

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-21
			DATE 03/06/25	





NOTES:

1. THESE STANDARDS ARE INTENDED FOR PUBLIC STREETS IN PHASED DEVELOPMENTS ON A TEMPORARY BASIS ONLY.
2. TURNAROUND SHALL BE REQUIRED WHEN A STUB STREET IS IN EXCESS OF 2 LOTS OR IN EXCESS OF 150 FEET FROM THROUGH STREET.
3. USE OTHER THAN TEMPORARY SHALL BE AT THE DISCRETION OF THE CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

TEMPORARY HAMMERHEAD TURNAROUND PUBLIC STREET

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-22
			DATE 03/06/25	

PRIVATE STREET GUIDELINES

PAVEMENT WIDTHS:

1. PRIVATE STREETS SHALL PROVIDE A PAVEMENT WIDTH COMMENSURATE WITH THE PROPOSED DESIGN SPEED, TRAFFIC VOLUME, ALIGNMENT AND PARKING REQUIREMENTS.

2. A STREET PAVEMENT WIDTH OF 24', AND PARKING STALLS 20' IN LENGTH SHALL BE CONSIDERED MINIMUM IF THE PARKING STALLS ARE ORIENTED PERPENDICULAR TO THE STREET AND IF VEHICLES BACK INTO THE STREET TO EXIT. PARKING SPACES ORIENTED OTHERWISE SHALL CONFORM TO THE CITY OF LINDSAY PARKING STANDARDS.

3. PRIVATE STREETS WITH ENTRY GATES SHALL PROVIDE A U-TURN AREA WITHIN THE PUBLIC RIGHT OF WAY. THE MINIMUM TURNING RADIUS SHALL BE 24'.

4. STREET ENDS, COURTS OR DRIVEWAYS SHALL PROVIDE SOLID WASTE TRUCKS SERVICING INDIVIDUAL REFUSE CONTAINERS A MINIMUM OUTSIDE TURNING RADIUS OF 35' AND A MAXIMUM INSIDE TURNING RADIUS OF 20'. SOLID WASTE TRUCKS PROVIDING SERVICE TO REFUSE BINS REQUIRE A MINIMUM OUTSIDE TURNING RADIUS OF 50' AND A MAXIMUM INSIDE TURNING RADIUS OF 36'.

5. THE UNIFORM FIRE CODE REQUIRES THAT THE MOST REMOTE WALL OF ANY BUILDING MUST BE WITHIN 150' OF A PAVED DRIVE OR STREET NOT LESS THAN 20' WIDE. ACCESS TO BUILDINGS CONFORMING TO THIS REQUIREMENT SHALL PROVIDE A 14' MINIMUM PAVED ACCESS DRIVE AND A 20' MINIMUM UNOBSTRUCTED ACCESS EASEMENT. ACCESS TO BUILDINGS IN EXCESS OF TWO STORIES SHALL COMPLY TO MORE STRINGENT REQUIREMENTS OF THE FIRE CODE.

STRUCTURAL SECTIONS:

1. THE STRUCTURAL SECTIONS OF STREETS UTILIZING ASPHALT CONCRETE SURFACING SHALL BE DESIGNED BY AN ACCEPTED FLEXIBLE PAVEMENT DESIGN METHOD.

2. THE MINIMUM STREET SECTION SHALL CONSIST OF A 2-1/2" TYPE A, 3/4" MAXIMUM, MEDIUM GRADE ASPHALT CONCRETE SURFACE, A 7" SECTION OF AGGREGATE BASE, CLASS 2, AND A 6" MINIMUM SOIL SUBGRADE COMPACTED TO A MINIMUM OF 95% RELATIVE COMPACTION.

3. PARKING AREAS AND ACCESS DRIVES MAY USE A PORTLAND CEMENT CONCRETE SURFACE A MINIMUM OF 6" THICK OVER A 6" AGGREGATE BASE OVER A 6" MINIMUM SOIL SUBGRADE COMPACTED TO A MINIMUM OF 90% RELATIVE COMPACTION.

TRAFFIC INDEXES:

1. THE CITY ENGINEER SHALL ESTABLISH TRAFFIC INDEXES FOR PRIVATE STREETS BASED UPON EXPECTED TRAFFIC VOLUMES AS INDICATED BELOW:

RESIDENTIAL UNITS USING STREET	MINIMUM TRAFFIC INDEX
1-50	5.5
51-150	6.0

City of Lindsay

CITY SERVICES DEPARTMENT

PRIVATE STREET GUIDELINES

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-23
			DATE 03/06/25	1 OF 2

PRIVATE STREET GUIDELINES CONTINUED

GEOMETRIC SECTIONS

1. DRIVES SERVING 1 TO 4 UNITS SHALL USE A LOCAL ROAD PAVING SECTION STANDARD EXCEPTING THAT PAVEMENT EDGES SHALL BE PROTECTED WITH A 6" TALL CONCRETE CURB. SUBJECT TO SITE PLAN REVIEW, THE CURBING REQUIREMENT MAY BE WAIVED.

2. DRIVES OR STREETS SERVING 5 OR MORE UNITS SHALL PROVIDE A CURB OR CURB AND GUTTER AT ALL PAVEMENT EDGES.

3. PAVEMENT SHALL HAVE A MINIMUM CROSS SLOPE OF 1% AND PAVEMENT SECTIONS SHOULD MATCH THE EQUIVALENT LOCAL PUBLIC STREET.

4. BARRIER TYPE CURB AND GUTTER TYPE A2-6, IS RECOMMENDED FOR PRIVATE STREETS. THE FOLLOWING ARE PERMITTED OPTIONS.

    A. VEE GUTTER, 30" MINIMUM WIDTH, SLOPE = 0.25 FEET PER 100 FEET MINIMUM.

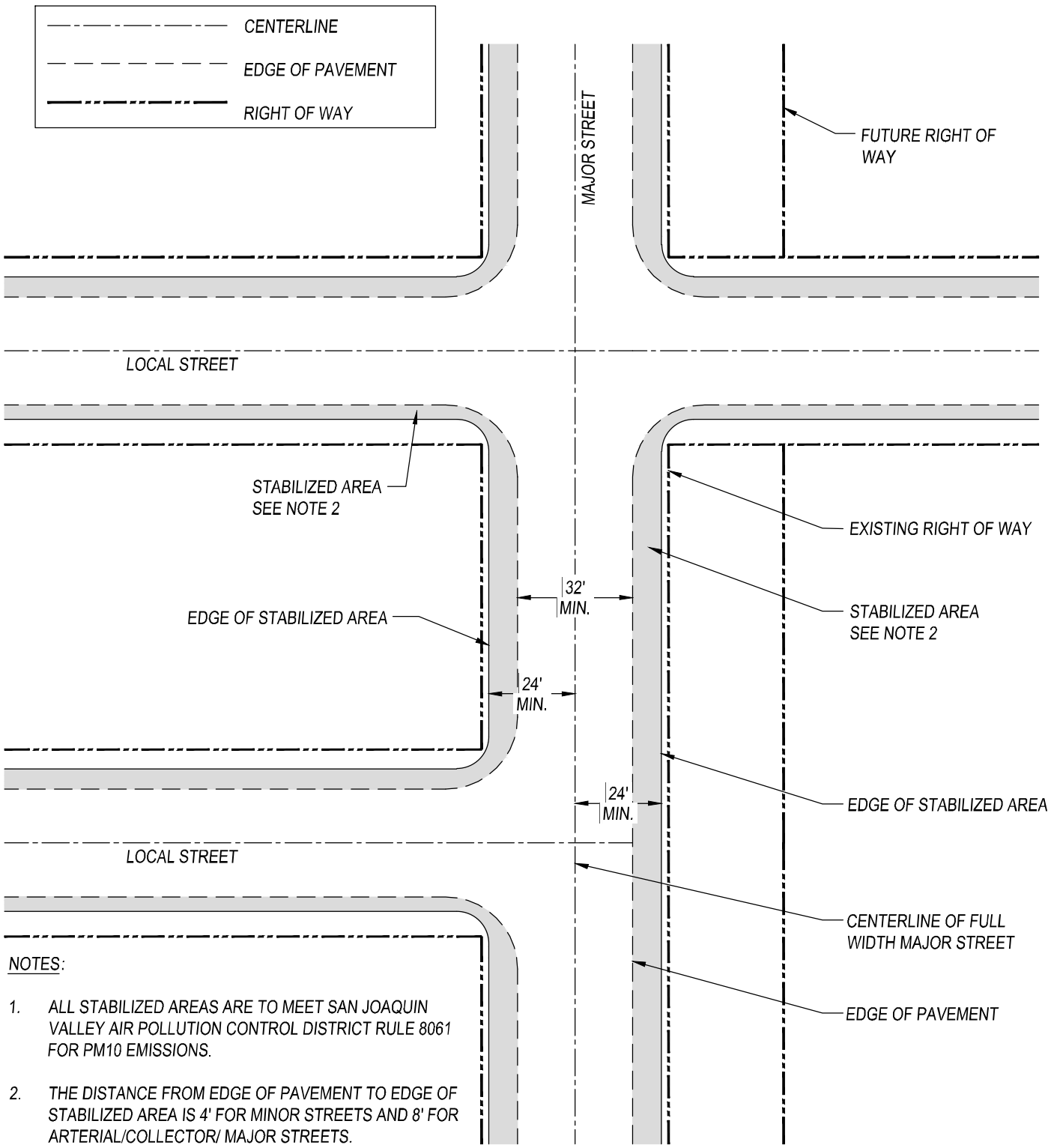
    B. CURB AND GUTTER, 6" CURB HEIGHT AND 24" GUTTER, SLOPE = 0.20 FEET PER 100 FEET MINIMUM.

    C. ROLL CURB AND GUTTER, 4" CURB HEIGHT AND 24" GUTTER, SLOPE = 0.35 FEET PER 100 FEET MINIMUM.

5. FOR NEW ROADWAYS THAT ARE BEING CONSTRUCTED WHERE A PREVIOUS ROAD DID NOT EXIST, ALL ROADWAY INFRASTRUCTURE SHALL BE INSTALLED & OPERATIONAL PRIOR TO OPENING. THIS INCLUDES SIGNAGE, STRIPING, AND ROADWAY LIGHTING.

REQUIRED SIGNS:

1. THE ENTRANCE TO ANY PRIVATE STREET FROM A PUBLIC RIGHT OF WAY SHALL HAVE A SIGN "PRIVATE STREET" POSTED AT THE ENTRANCE.



NOTES:

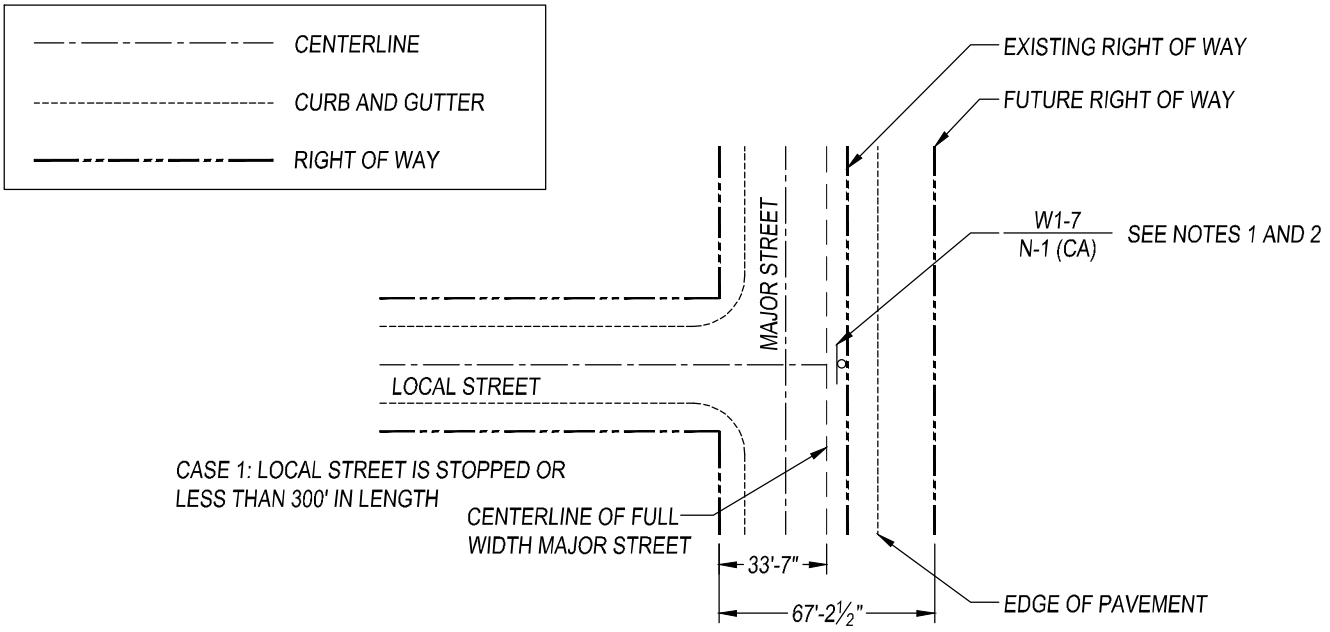
1. ALL STABILIZED AREAS ARE TO MEET SAN JOAQUIN VALLEY AIR POLLUTION CONTROL DISTRICT RULE 8061 FOR PM10 EMISSIONS.
2. THE DISTANCE FROM EDGE OF PAVEMENT TO EDGE OF STABILIZED AREA IS 4' FOR MINOR STREETS AND 8' FOR ARTERIAL/COLLECTOR/ MAJOR STREETS.
3. NEW PAVED ROADS OR MODIFICATIONS TO EXISTING PAVED ROADS WITH PROJECTED AVERAGE DAILY TRIPS OF 500 VEHICLES OR MORE SHALL BE CONSTRUCTED WITH PAVED SHOULDERS.

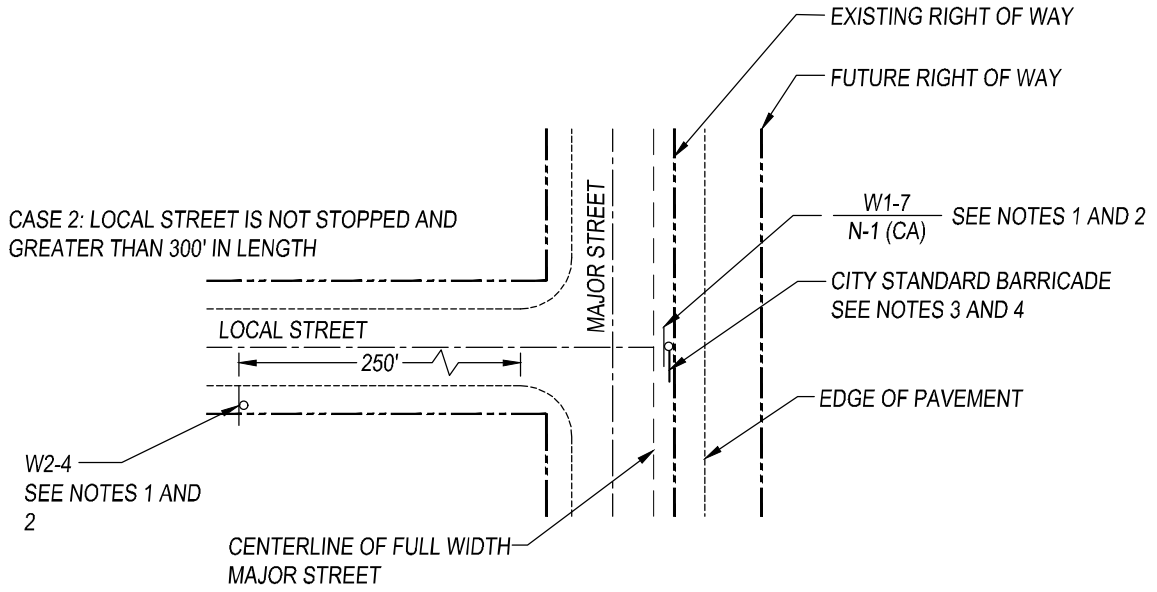
City of Lindsay

CITY SERVICES DEPARTMENT

UNPAVED STREET & SHOULDERS S.J.V.A.P.C.D. STANDARD REQUIREMENTS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-24
			DATE 03/06/25	





NOTES:

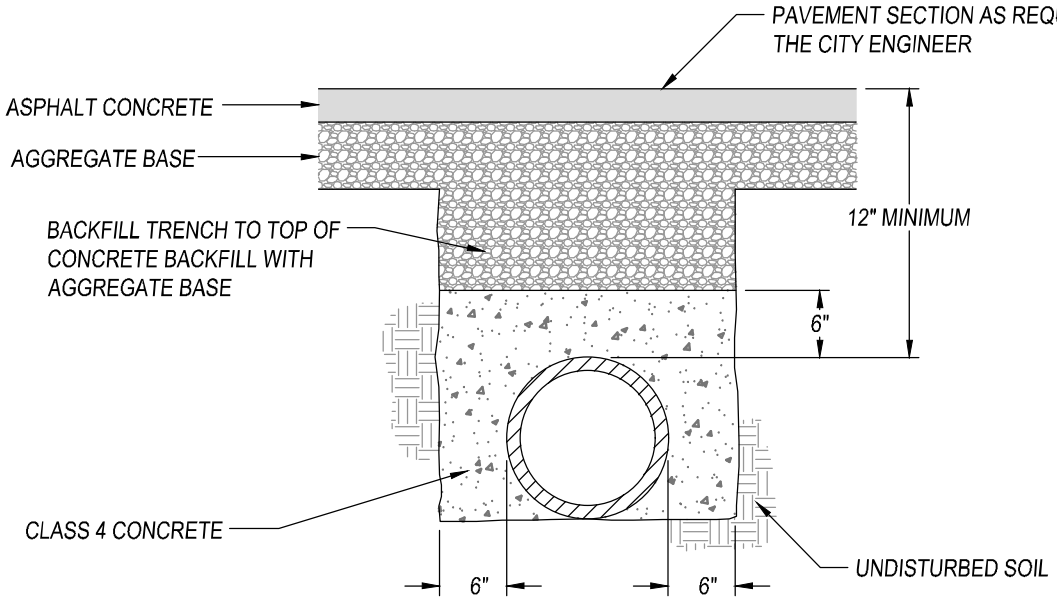
1. ALL SIGNS ARE TO MEET CITY STANDARDS FOR RETROREFLECTIVITY, FACE SHEETING, SIGN GAUGE, POST TYPE AND ANCHORING/FOOTING PROCEDURES.
2. SIGNS ARE TO BE INSTALLED A MINIMUM OF 4' BACK FROM EDGE OF PAVEMENT.
3. CITY STANDARD BARRICADE IS TO BE INSTALLED IF OBJECTS IN THE PATH OF ONCOMING TRAFFIC MAY FORM A HAZARD (I.E. ORCHARD, TREE STAND, EARTHWORK, BUILDING, ETC.).
4. IF REQUIRED, CITY STANDARD BARRICADE IS TO BE INSTALLED BETWEEN 4' AND 8' BACK FROM EDGE OF PAVEMENT, DEPENDENT ON SURROUNDING AREA.
5. ALL SIGNS ARE TO MEET THE LATEST CALIFORNIA MUTCD GUIDELINES.

City of Lindsay

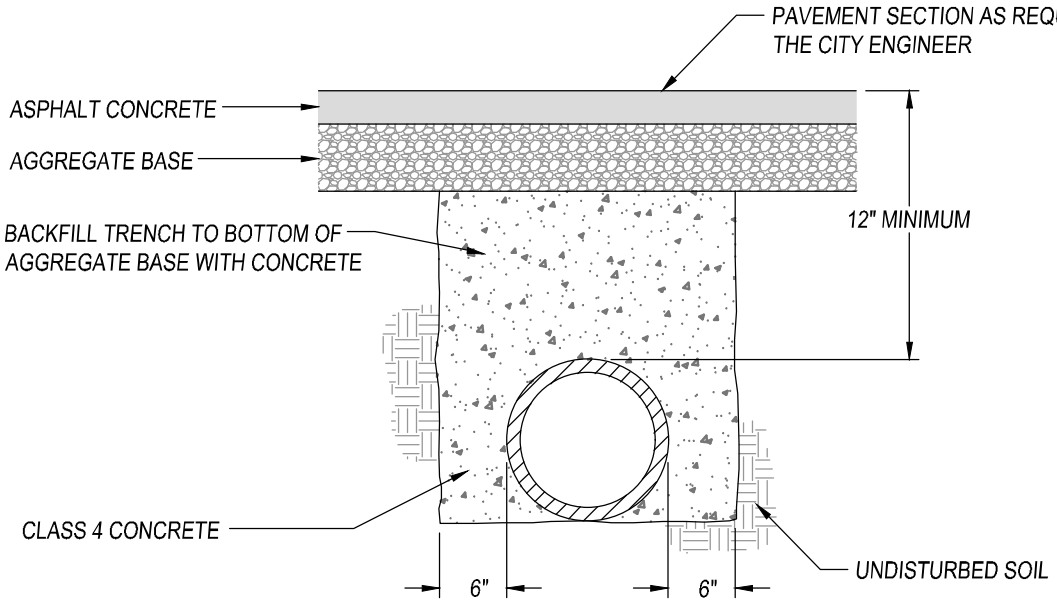
CITY SERVICES DEPARTMENT

"T" INTERSECTION TEMPORARY HALF STREET TREATMENTS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-25
			DATE 03/06/25	



OPTION 1



OPTION 2

NOTES:

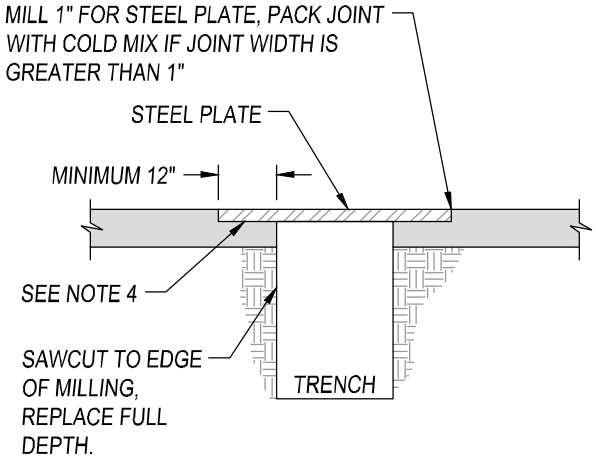
1. PIPE CONCRETE BACKFILL SHALL BE REQUIRED FOR ALL PIPE INSTALLED WITH LESS THAN 24" OF COVER OR AS DIRECTED BY THE CITY ENGINEER.
2. ALL CONCRETE BACKFILL SHALL BE CLASS 4 CONCRETE.
3. CONCRETE BACKFILL SHALL BE PLACED IN THE TRENCH AGAINST UNDISTURBED SOIL AND SHALL BE PLACED IN A MANNER THAT WILL PREVENT FLOATING OR SHIFTING OF THE PIPE.
4. FOREIGN MATERIAL WHICH FALLS INTO THE TRENCH DURING PLACEMENT OF THE CONCRETE SHALL BE IMMEDIATELY REMOVED.
5. NO MATERIAL SHALL BE PLACED ON TOP OF THE CONCRETE BACKFILL UNTIL 8 HOURS AFTER PLACING THE CONCRETE BACKFILL, AS DIRECTED BY THE CITY ENGINEER.
6. TRENCH SHALL BE BACKFILLED AND RE-SURFACED PER TRENCH BACKFILL/PATCH PAVING STANDARD DRAWING.

City of Lindsay

CITY SERVICES DEPARTMENT

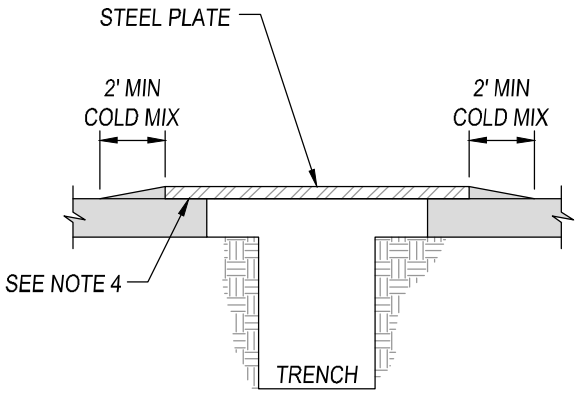
PIPE CONCRETE BACKFILL

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-26
			DATE	03/06/25	



TYPE "A" PLATING

CITY POSTED SPEEDS OF GREATER THAN 25 MPH OR BUS & TRUCK ROUTE



TYPE "B" PLATING

CITY POSTED SPEEDS OF 25 MPH AND UNDER

TRENCH WIDTH	MINIMUM PLATE THICKNESS
10" (0.25 M)	1/2" (13 MM)
1'-11" (0.58 M)	3/4" (19 MM)
2'-7" (0.80 M)	7/8" (22 MM)
3'-5" (1.04 M)	1" (25 MM)
5'-3" (1.60 M)	1 1/4" (32 MM)

NOTES:

1. WHEN BACKFILLING OPERATIONS CANNOT BE PROPERLY COMPLETED WITHIN A WORK DAY, STEEL PLATES SHALL BE INSTALLED USING EITHER TYPE "A" OR TYPE "B" PLATING METHODS, OR AS DIRECTED BY CITY ENGINEER. THE CONTRACTOR IS RESPONSIBLE FOR MAINTENANCE OF THE STEEL PLATES, SHORING OR BRACING OF THE TRENCH AND ENSURING THAT THEY MEET THE MINIMUM SPECIFICATIONS OF CALTRANS TR-0157.

2. USE OF STEEL PLATE BRIDGING SHOULD NOT EXCEED 4 CONSECUTIVE WORKING DAYS IN ANY GIVEN WEEK.

3. THE TRENCH SHALL BE ADEQUATELY SHORED OR BRACED TO SUPPORT THE STEEL PLATE BRIDGING AND TRAFFIC LOADS.

4. THE CONTRACTOR SHALL PROVIDE ADEQUATE OVERLAP OF PLATE ON ASPHALT TO ASSURE NO SLIPPAGE OF PLATE AND NO COLLAPSING OF TRENCH. PLATES SHALL BE PINNED TO THE PAVEMENT SURFACE, WITH A MINIMUM OF 2 DOWELS PRE-DRILLED INTO THE CORNERS OF THE PLATE AND DRILLED 2" INTO THE PAVEMENT, WITH A MINIMUM 1' OVERLAP ONTO EXISTING STABLE MATERIAL. WHEN STEEL PLATES ARE REMOVED, THE DOWEL HOLES IN THE PAVEMENT SHALL BE BACKFILLED WITH EITHER GRADED FINES OF ASPHALT CONCRETE MIX, CONCRETE SLURRY OR AN EQUIVALENT SLURRY THAT IS APPROVED BY CITY ENGINEER.

5. STEEL PLATES USED IN THE TRAVELED PORTION OF THE RIGHT OF WAY SHALL HAVE A SURFACE THAT WAS MANUFACTURED WITH A NOMINAL COEFFICIENT OF FRICTION (COF) OF 0.35 AS DETERMINED BY CALIFORNIA TEST METHOD 342, OR AS APPROVED BY CITY ENGINEER. SURFACING REQUIREMENTS ARE NOT NECESSARY FOR STEEL PLATES USED IN PARKING STRIPS, ON SHOULDERS NOT USED FOR TURNING MOVEMENTS, OR ON CONNECTING DRIVEWAYS, ETC. NOT OPEN TO THE PUBLIC. FOR SPANS GREATER THAN 5'-3", A STRUCTURAL DESIGN SHALL BE PREPARED BY A CALIFORNIA REGISTERED CIVIL ENGINEER.

6. ALL STEEL PLATES WITHIN THE RIGHT OF WAY, WHETHER USED IN OR OUT OF THE TRAVELED WAY, SHALL BE WITHOUT DEFORMATION.

7. A ROUGH ROAD SIGN (W8-8) WITH BLACK LETTERING ON AN ORANGE BACKGROUND SHALL BE USED IN ADVANCE OF STEEL PLATES IN ADDITION TO ANY OTHER REQUIRED CONSTRUCTION SIGNING.

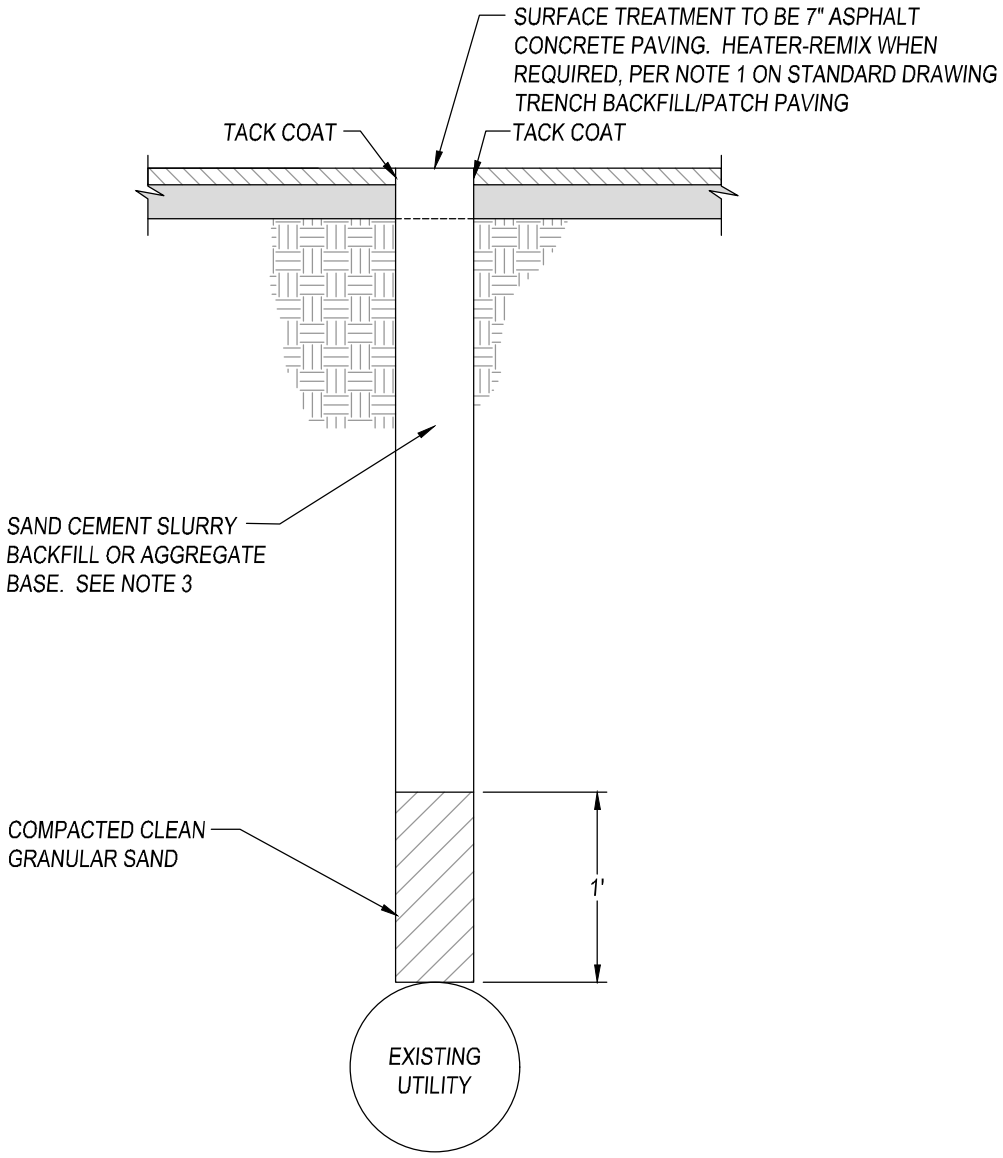
8. "POSTED SPEED" DOES NOT INCLUDE TEMPORARY CONSTRUCTION SIGNING.

City of Lindsay

CITY SERVICES DEPARTMENT

TRENCH PLATE DETAILS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	ST-27
			DATE 03/06/25	



NOTES:

1. THIS BACKFILL METHOD IS REQUIRED FOR UTILITY POTHOLES 9" DIAMETER OR LESS, OR MAXIMUM DIMENSION IN ANY DIRECTION OF 9" OR LESS, OR ANY POTHOLE DIRECTED BY THE ENGINEER TO BE BACKFILLED BY THIS METHOD.

2. POTHOLES WITH DIMENSIONS GREATER THAN 9" SHALL BE BACKFILLED PER STANDARD DRAWING TRENCH BACKFILL/PATCH PAVING.

3. TWO SACK SAND CEMENT SLURRY BACKFILL OR CLASS 2 AGGREGATE BASE COMPACTED PER STANDARD DRAWING TRENCH BACKFILL/PATCH PAVING, SHALL CONFORM TO THE CITY OF LINDSAY STANDARD SPECIFICATIONS.

4. TEMPORARY TRENCH SURFACING SHALL CONSIST OF A MINIMUM OF 2" COLD MIX AND SHALL BE REQUIRED WHENEVER THE STREET IS TEMPORARILY OPENED TO TRAFFIC. ALL TEMPORARY MATERIAL SHALL BE COMPLETELY REMOVED PRIOR TO FINAL PAVING.

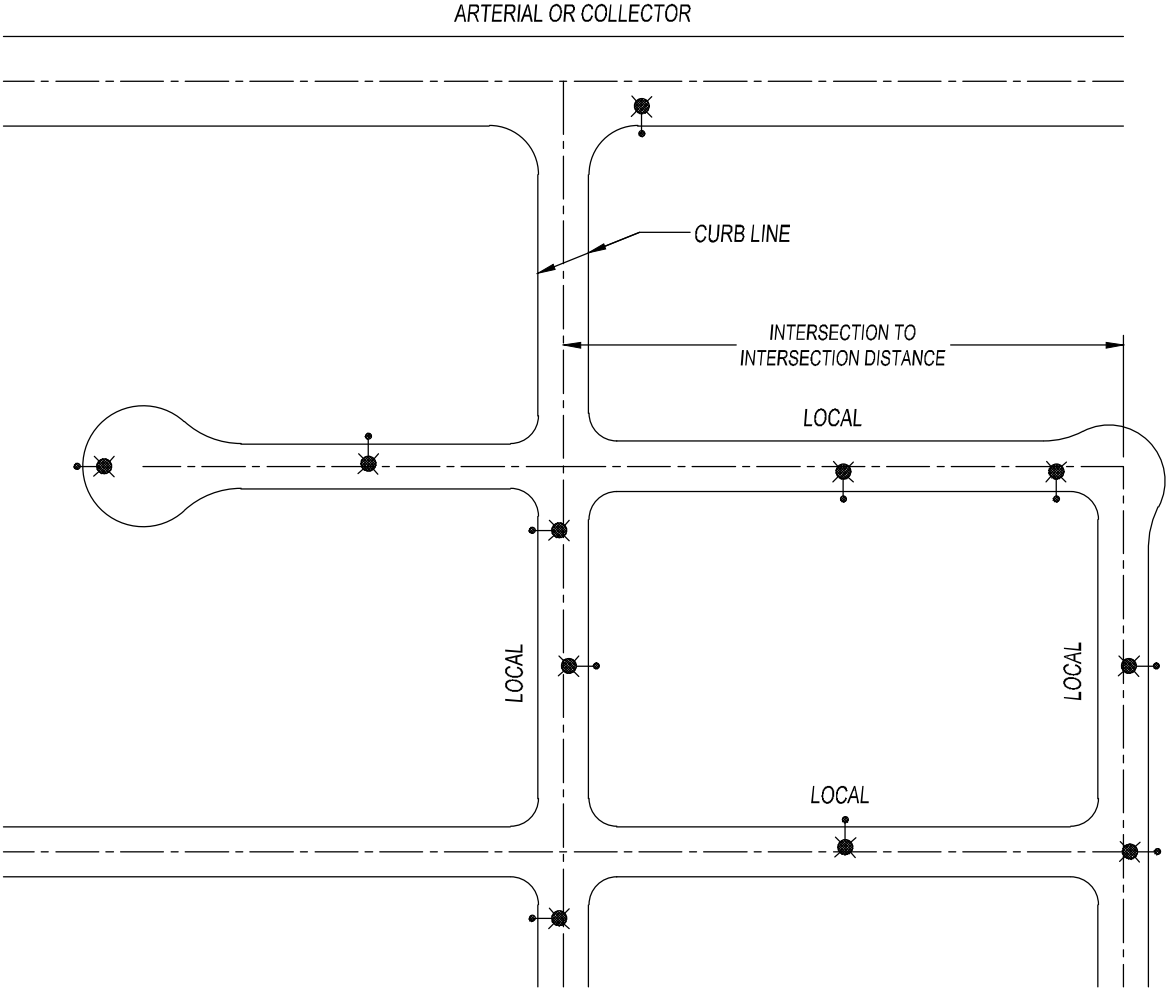
5. WHEN 3 OR MORE POTHOLES HAPPEN WITHIN 12 LINEAR FEET ON A SINGLE TRAVEL LANE, THE CONTRACTOR SHALL MILL AND REPLACE THE ASPHALT CONCRETE SECTION.

City of Lindsay

CITY SERVICES DEPARTMENT

UTILITY POTHOLE BACKFILL

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	ST-28
			DATE	03/06/25	



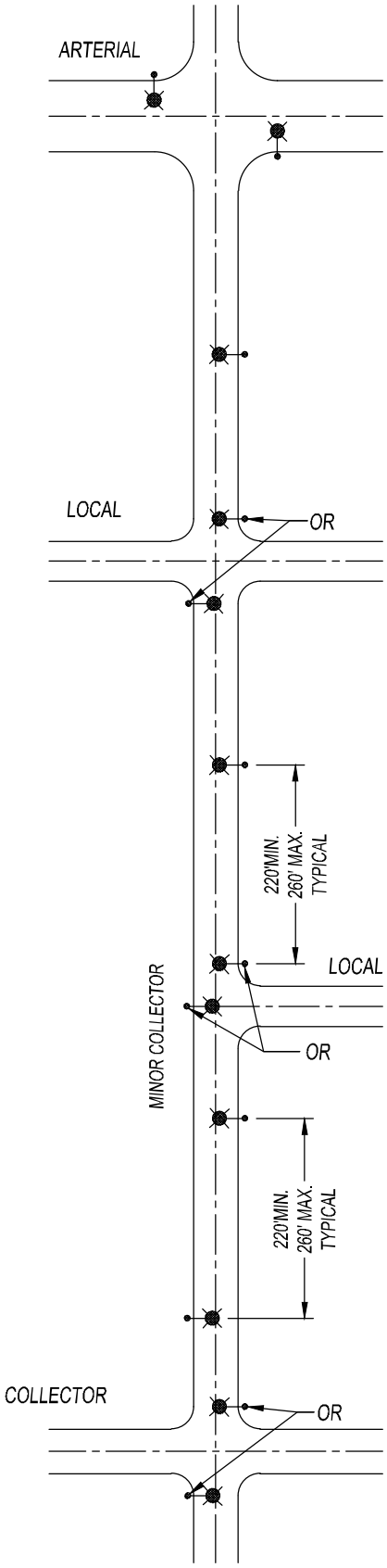
NOTES:

1. SEE CITY STANDARD SL-4 FOR STREETLIGHT POLE REQUIREMENTS. ALTERNATIVE STREETLIGHT POLES ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.
2. STREETLIGHTS SHALL BE INSTALLED AT LOCATIONS AS DETERMINED BY THE CITY ENGINEER UPON REVIEW OF SUBMITTED IMPROVEMENT PLANS.
3. A STREETLIGHT SHALL BE INSTALLED AT EACH INTERSECTION. SHOULD THE DISTANCE EXCEED 360' BETWEEN INTERSECTIONS AN INTERMEDIATE STREETLIGHT, OR STREETLIGHTS, SHALL BE INSTALLED. SPACING OF STREET LIGHTS BETWEEN INTERSECTIONS WHERE REQUIRED SHALL BE 180' MINIMUM TO 240' MAXIMUM.
4. CUL-DE-SACS SHALL HAVE A MINIMUM OF ONE STREETLIGHT AND SHALL FOLLOW THE ABOVE SPACING REQUIREMENTS.
5. A MINIMUM SEPARATION OF 20' IS REQUIRED BETWEEN TREES AND STREETLIGHT POLES.
6. ALL STREETLIGHTS INSTALLED OR REPLACED IN THE CENTRAL BUSINESS DISTRICT ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.

City of Lindsay
CITY SERVICES DEPARTMENT

LOCAL STREET LIGHTING RESIDENTIAL & INDUSTRIAL

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SL-1
			DATE 03/06/25	



NOTES:

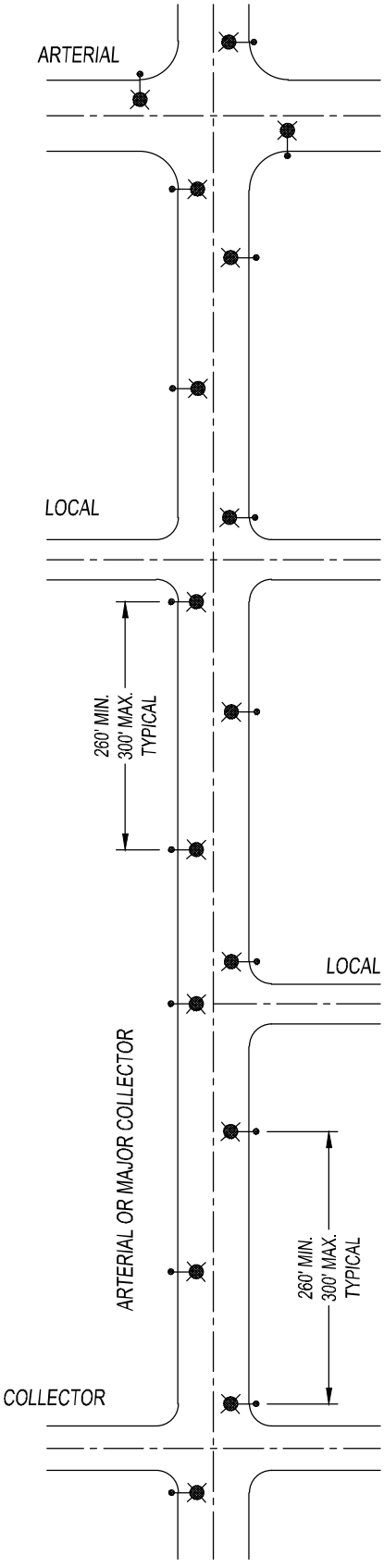
1. SEE CITY STANDARD SL-5 FOR STREETLIGHT POLE REQUIREMENTS.
2. STREETLIGHTS SHALL BE INSTALLED AT LOCATIONS AS DETERMINED BY THE CITY ENGINEER UPON REVIEW OF SUBMITTED IMPROVEMENT PLANS.
3. A STREETLIGHT SHALL BE INSTALLED AT EACH INTERSECTION. STREETLIGHT SPACING SHALL BE 220' MINIMUM TO 260' MAXIMUM.
4. STREETLIGHTS SHALL BE STAGGERED FROM SIDE TO SIDE OF STREET, UNLESS OTHERWISE APPROVED BY THE CITY ENGINEER.
5. IF AN INTERSECTION IS SIGNALIZED, A STREETLIGHT SHALL BE INSTALLED ON EACH CORNER AS A PART OF THE TRAFFIC SIGNAL SYSTEM.
6. A MINIMUM SEPARATION OF 20' IS REQUIRED BETWEEN TREES AND STREETLIGHT POLES.
7. ALL STREETLIGHTS INSTALLED OR REPLACED IN THE CENTRAL BUSINESS DISTRICT ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

MINOR COLLECTOR STREET LIGHTING

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SL-2
			DATE	03/06/25	



NOTES:

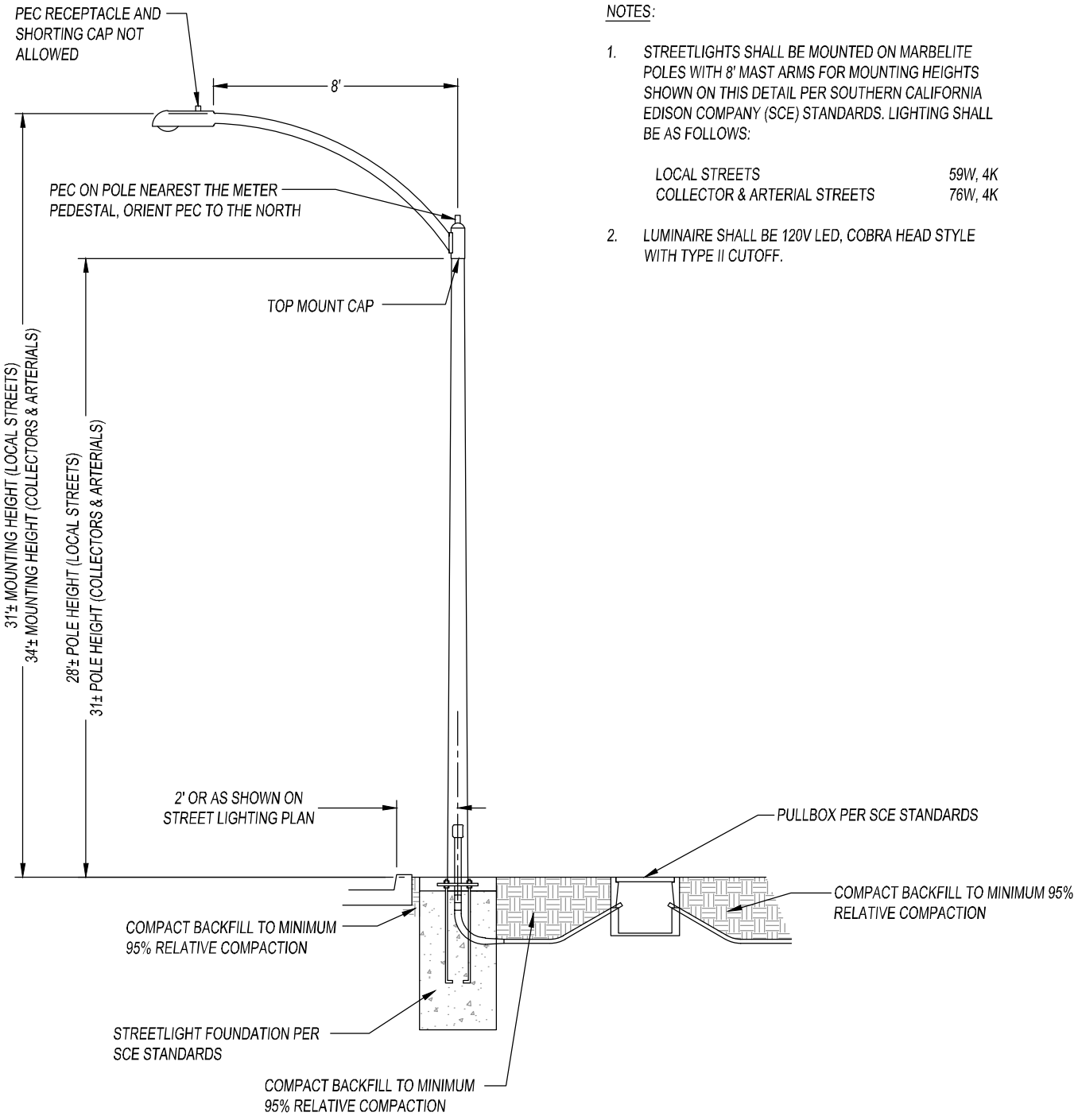
1. SEE CITY STANDARD SL-5 FOR STREETLIGHT POLE REQUIREMENTS.
2. STREETLIGHTS ON MAJOR COLLECTOR STREETS SHALL BE LED - MINIMUM 9,500 LUMEN WITH CUT-OFF LUMINAIRES, LUMINAIRE ELEVATION OF 29', MOUNTED ON MARBLELITE POLES WITH 8' ALUMINUM MAST ARMS.
3. STREETLIGHTS SHALL BE INSTALLED AT LOCATIONS AS DETERMINED BY THE CITY ENGINEER UPON REVIEW OF SUBMITTED IMPROVEMENT PLANS.
4. TWO STREETLIGHTS SHALL BE INSTALLED AT EACH INTERSECTION. STREETLIGHT SPACING SHALL BE 260' MINIMUM TO 300' MAXIMUM.
5. STREETLIGHTS SHALL BE INSTALLED ON BOTH SIDES OF THE STREET.
6. IF AN INTERSECTION IS SIGNALIZED, A STREETLIGHT SHALL BE INSTALLED ON EACH CORNER AS A PART OF THE TRAFFIC SIGNAL SYSTEM.
7. A MINIMUM SEPARATION OF 20' IS REQUIRED BETWEEN TREES AND STREETLIGHT POLES.
8. ALL STREETLIGHTS INSTALLED OR REPLACED IN THE CENTRAL BUSINESS DISTRICT ARE SUBJECT TO APPROVAL OF THE CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

ARTERIAL AND MAJOR COLLECTOR STREET LIGHTING

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SL-3
			DATE	03/06/25	



NOTES:

1. STREETLIGHTS SHALL BE MOUNTED ON MARBELITE POLES WITH 8' MAST ARMS FOR MOUNTING HEIGHTS SHOWN ON THIS DETAIL PER SOUTHERN CALIFORNIA EDISON COMPANY (SCE) STANDARDS. LIGHTING SHALL BE AS FOLLOWS:

LOCAL STREETS	59W, 4K
COLLECTOR & ARTERIAL STREETS	76W, 4K

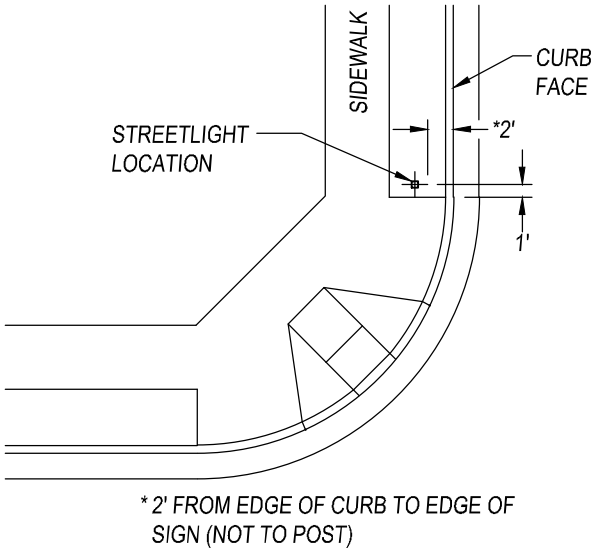
2. LUMINAIRE SHALL BE 120V LED, COBRA HEAD STYLE WITH TYPE II CUTOFF.

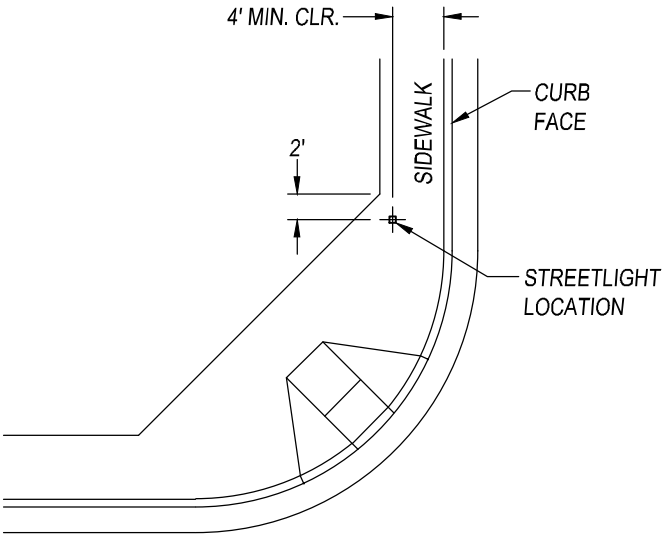
City of Lindsay

CITY SERVICES DEPARTMENT

STREETLIGHT POLE

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SL-4
			DATE	03/06/25	





NOTES:

1. ALL WORK SHALL CONFORM TO THE APPLICABLE SECTIONS OF THE SPECIFICATIONS ENTITLED "STANDARD SPECIFICATIONS, STATE OF CALIFORNIA, BUSINESS, TRANSPORTATION AND HOUSING AGENCY, DEPARTMENT OF TRANSPORTATION" AND THE NATIONAL ELECTRICAL CODE.

2. ALL STREETLIGHTS SHALL BE NUMBERED. NUMERICAL SEQUENCE TO BE OBTAINED FROM THE CITY OF LINDSAY. EACH CHARACTER SHALL BE 2 $\frac{1}{2}$" TEXT HEIGHT. ALUMINUM TAGS SHALL BE INSTALLED VERTICALLY. THE BOTTOM TAG SHALL BE 10'-6" ABOVE FINISH GRADE.

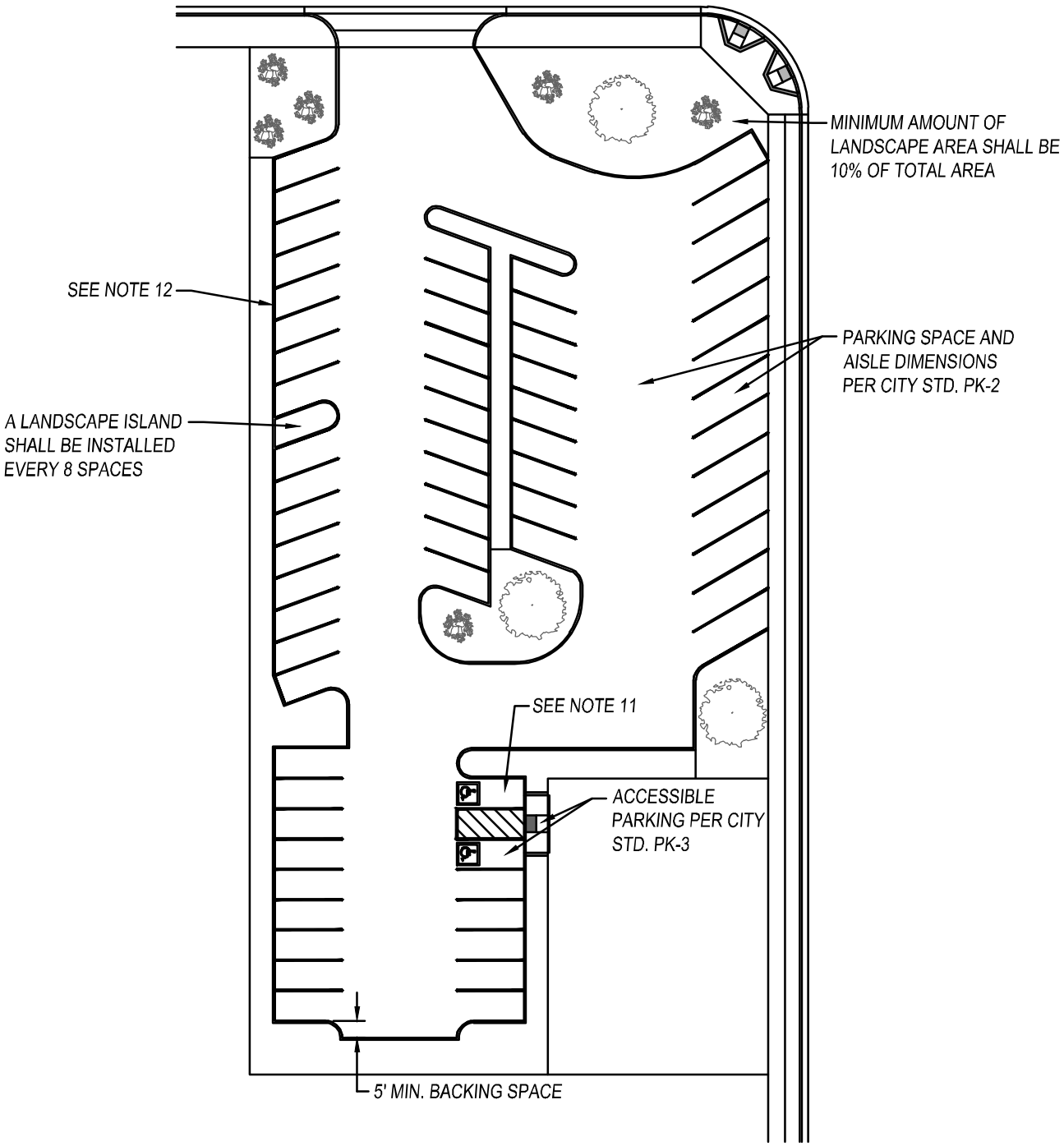
3. PULL BOX SHALL NOT BE INSTALLED WITHIN SIDEWALK, UNLESS APPROVED BY THE CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

STREETLIGHT LOCATION AT INTERSECTION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SL-5
			DATE 03/06/25	



City of Lindsay

CITY SERVICES DEPARTMENT

PARKING AREA STANDARDS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	PK-1
			DATE 03/06/25	1 OF 2

NOTES:

1. PARKING LOTS WHICH WILL EXPERIENCE TRUCK TRAFFIC MAY REQUIRE HIGHER T.I. VALUES AND SHALL BE DESIGNED ACCORDINGLY.

2. A MINIMUM CROSS SLOPE OF 1% IS REQUIRED.

3. ANY PARKING LAYOUT NECESSITATING A CUL-DE-SAC OR SIMILAR TURNING FACILITY FOR REVERSING THE DIRECTION OF TRAVEL ION ORDER TO EXIT FROM THE AREA OR ANY PARKING SPACES WILL GENERALLY BE DISCOURAGED AND SHALL BE APPROVED BY THE CITY ENGINEER PRIOR TO INCORPORATION INTO THE PLAN.

4. IN ALL PARKING LOT DESIGN, PROVISIONS SHALL BE MADE FOR THE MANEUVERING OF EMERGENCY VEHICLES, AND THE ARRANGEMENT SHALL BE APPROVED BY THE CITY ENGINEER PRIOR TO INCORPORATION INTO THE PLAN.

5. ALL UNUSABLE AREAS SHALL BE LANDSCAPED WHERE PRACTICAL.

6. END STALLS SHOULD BE PROTECTED FROM THE TURNING MOVEMENTS OF OTHER VEHICLES.

7. CONTINUOUS CONCRETE CURBING SHALL BE USED AS WHEEL STOPS WHEREVER POSSIBLE. THE USE OF BUMPER BLOCKS IS DISCOURAGED.

8. HANDICAPPED STALLS SHALL COMPLY WITH THE STATE BUILDING CODE AND CITY OF LINDSAY STANDARD PLANS AND SPECIFICATIONS.

9. DEAD-END 90° PARKING SHALL BE PROVIDED WITH ADEQUATE TURNING ROOM.

10. IN LOCATIONS WHERE PARALLEL PARKING IS PERMITTED OR POSSIBLE. AN ADDITIONAL 3'-0" SHALL BE ADDED TO THE AISLE WIDTH TO ACCOMMODATE PARKED VEHICLES ON ONE SIDE OR AN ADDITIONAL 11'-0" SHALL BE ADDED TO THE AISLE WIDTH TO ACCOMMODATE PARKED VEHICLES ON BOTH SIDES (I.E. PARKING ON ONE SIDE 28'-0", ON BOTH SIDES 36'-0"). PARALLEL PARKING IS CONSIDERED POSSIBLE WHEREVER 20'-0" OR MORE OF CLEAR, REASONABLE STRAIGHT CURB EXISTS.

11. THE FOLLOWING ARE TH EMINIM ACCEPTABLE DIMENSTION FOR IUNDIVIDUAL PARKING SPACES:
    A. MINIMUM STANDARD PARKING SPACE: 9'-0" WIDE BY 20'-0" LONG.
    B. MINIMUM COMPACT PARKING SPACE: 8'-0" WIDE BY 17'-0" LONG. 40% OF THE REQUIRED OFF-STREET PARKING MAY BE DEVELOPED TO COMPACT SIZE.

12. PARKING SPACES MUST BE DEVELOPED WITH DRAINAGE AND SURFACING AS REQUIRED IN THE CITY OF LINDSAY STANDARD PLANS AND SPECIFICATIONS.

13. ALL PARKING LOTS WITH MORE THAN 4 SPACES SHALL CONFORM TO LANDSCAPING AND SCREENING REQUIREMENTS OF THE CITY OF LINDSAY ORDINANCE.

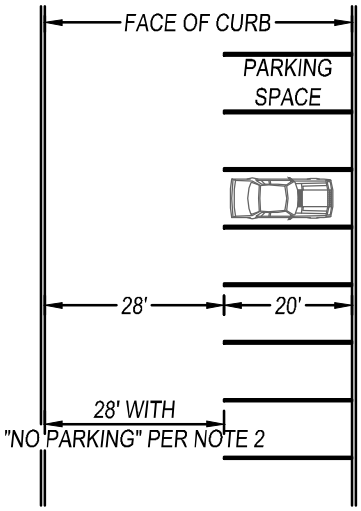
14. CIRCULATION REQUIRING USE OF A PUBLIC STREET TO TRAVEL FROM AISLE TO AISLE IN SEARCH OF A PARKING SPACE IS NOT PERMITTED.

City of Lindsay

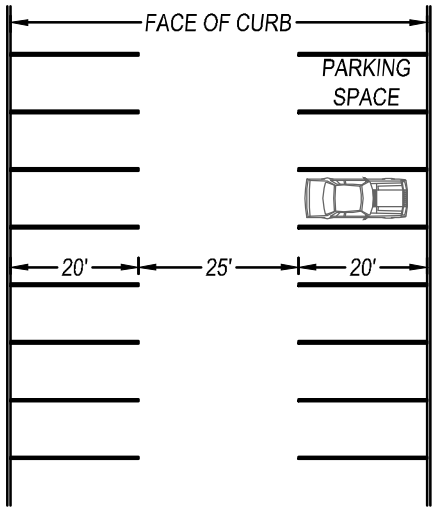
CITY SERVICES DEPARTMENT

PARKING AREA STANDARDS

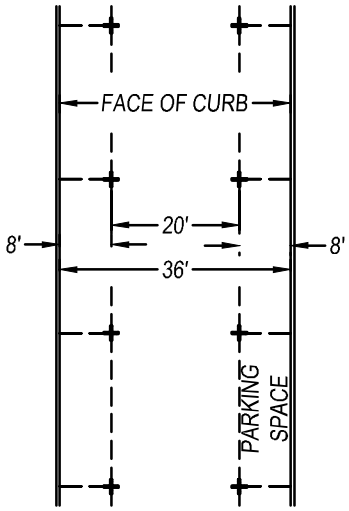
MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	PK-1
			DATE	03/06/25	2 OF 2



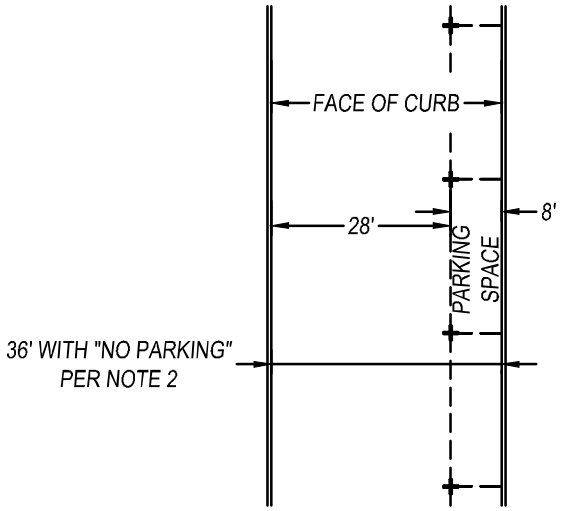
CASE "A"



CASE "B"



CASE "C"



CASE "D"

NOTES:

1. THE ABOVE WIDTHS SHOWN ARE ARE REQUIRED FOR OFF-STREET PARKING AREAS IN CONNECTION WITH BUILDING DEVELOPMENTS.

2. WHEN ANY PORTION OF A STRUCTURE IS MORE THAN 150'-0" FROM A PUBLIC STREET, THE ABOVE WIDTHS MAY BE REDUCED WITH THE APPROVAL OF THE FIRE DEPARTMENT AND THE CITY SERVICES DEPARTMENT. ANY SUCH REDUCTIONS WILL REQUIRE THE ESTABLISHMENT OF APPROPRIATE "NO PARKING" ZONES TOGETHER WITH THE INSTALLATION OF "NO PARKING" SIGNS BY THE DEVELOPER.

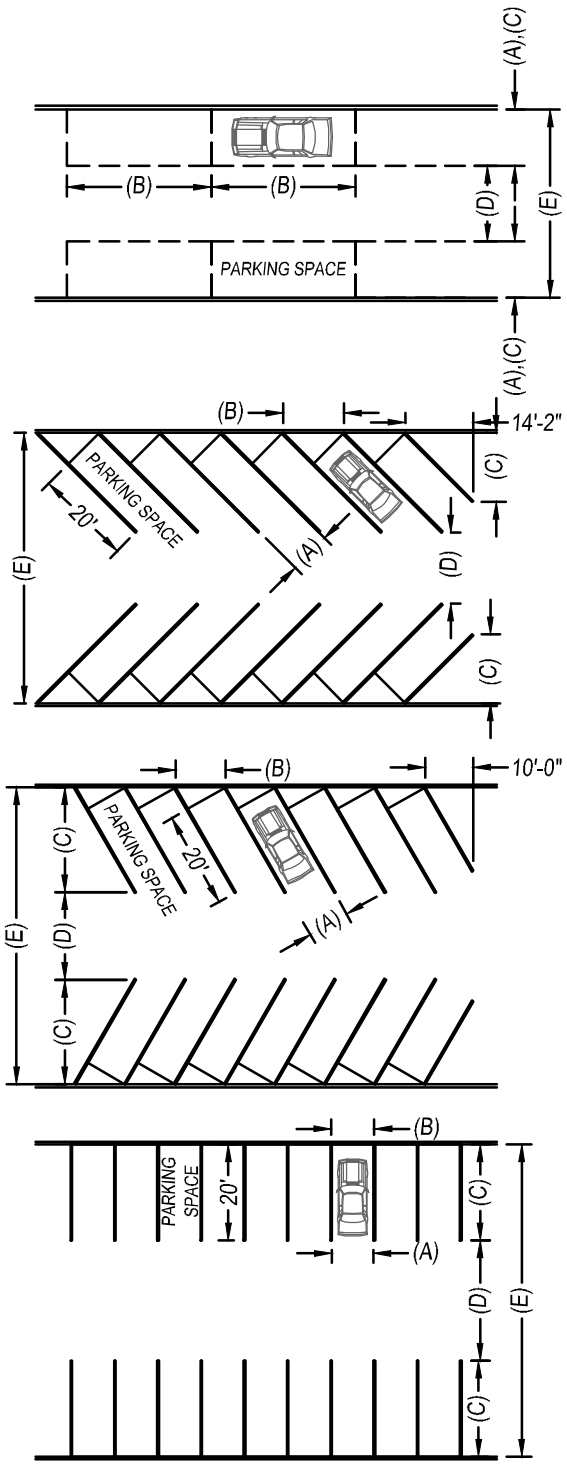
3. ALL PARKING AREA CONSTRUCTION SHALL BE PREPARED IN ACCORDANCE WITH CITY STD. PK-1.

City of Lindsay

CITY SERVICES DEPARTMENT

AISLE WIDTH REQUIREMENTS FOR PARKING AREAS

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	PK-2
			DATE	03/06/25	



PARALLEL PARKING						
STALL WIDTH (A)	CURB LENGTH (B)	STALL DEPTH (C)	MIN. AISLE WIDTH (D)		TOTAL WIDTH (E)	
			ONE-WAY	TWO-WAY	ONE-WAY	TWO-WAY
9'-0"	23'-0"	9'-0"	12'-0"	20'-0"	30'-0"	38'-0"
9'-6"	23'-0"	9'-6"	12'-0"	20'-0"	31'-0"	39'-0"

45° PARKING						
STALL WIDTH (A)	CURB LENGTH (B)	STALL DEPTH (C)	MIN. AISLE WIDTH (D)		TOTAL WIDTH (E)	
			ONE-WAY	TWO-WAY	ONE-WAY	TWO-WAY
9'-0"	12'-9"	20'-7"	15'-0"	20'-0"	56'-2"	61'-2"
9'-6"	13'-5"	21'-0"	15'-0"	20'-0"	57'-0"	62'-0"

60° PARKING						
STALL WIDTH (A)	CURB LENGTH (B)	STALL DEPTH (C)	MIN. AISLE WIDTH (D)		TOTAL WIDTH (E)	
			ONE-WAY	TWO-WAY	ONE-WAY	TWO-WAY
9'-0"	10'-5"	21'-11"	18'-0"	20'-0"	61'-11"	63'-11"
9'-6"	11'-0"	22'-2"	18'-0"	20'-0"	62'-4"	64'-4"

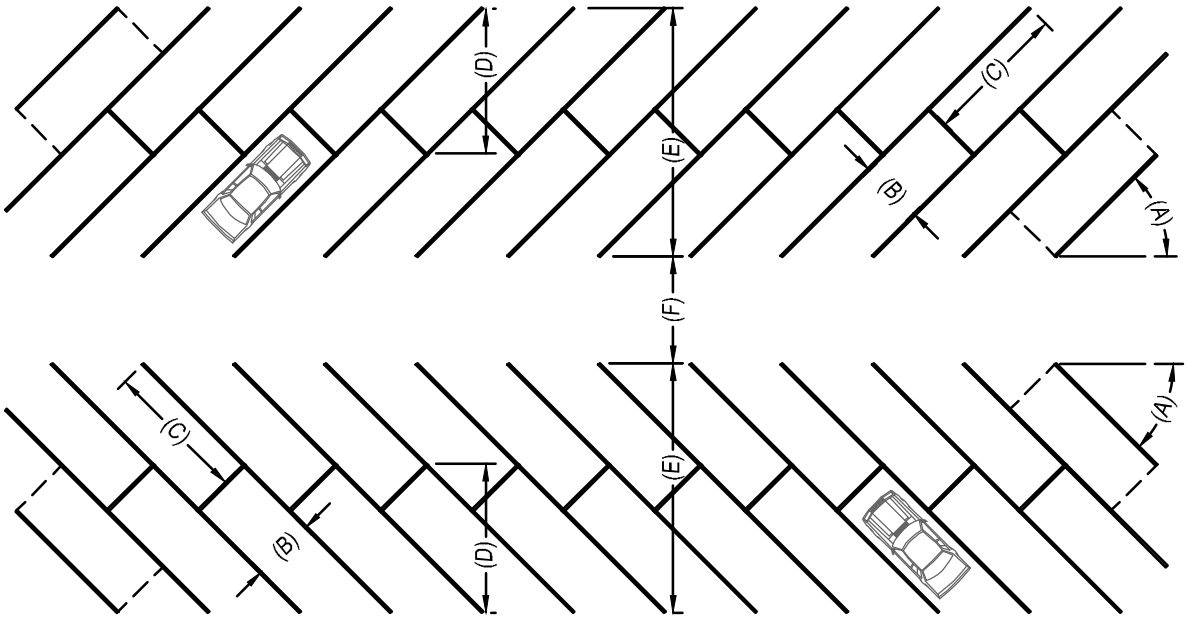
90° PARKING						
STALL WIDTH (A)	CURB LENGTH (B)	STALL DEPTH (C)	MIN. AISLE WIDTH (D)		TOTAL WIDTH (E)	
			ONE-WAY	TWO-WAY	ONE-WAY	TWO-WAY
9'-0"	9'-0"	20'-0"	25'-0"	25'-0"	65'-0"	65'-0"
9'-6"	9'-6"	20'-0"	25'-0"	25'-0"	65'-0"	65'-0"

City of Lindsay

CITY SERVICES DEPARTMENT

STANDARD PARKING SPACE DIMENSIONS

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	PK-3
			DATE	03/06/25	



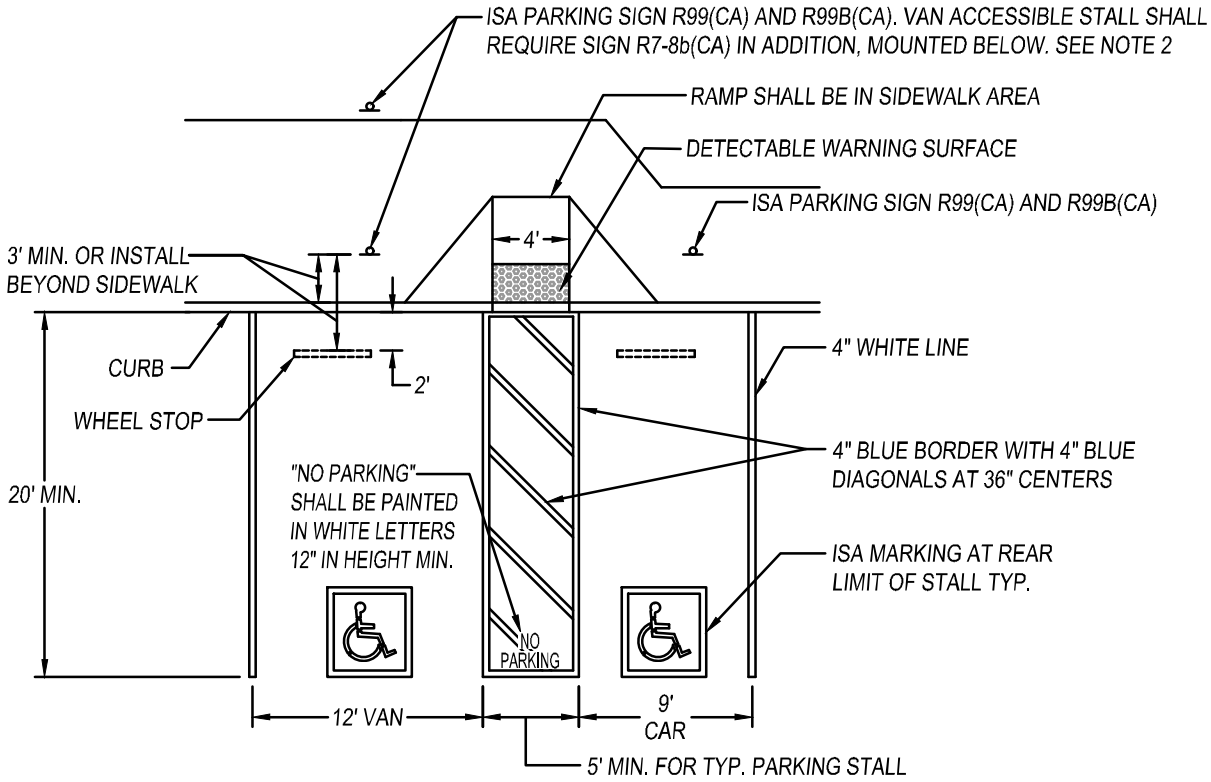
OVERLAP PATTERN						
PARK ANGLE (A)	STALL WIDTH (B)	STALL LENGTH (C)	STALL DEPTH (D)	ISLAND WIDTH (E)	MIN. AISLE WIDTH (F)	
					ONE-WAY	TWO-WAY
0°	9'-0"	23'-0"	8'-0"	8'-0"	12'-0"	20'-0"
	9'-6"	23'-0"	8'-0"	8'-0"	12'-0"	20'-0"
45°	9'-0"	20'-0"	20'-6"	34'-8"	15'-0"	20'-0"
	9'-6"	20'-0"	20'-10"	35'-0"	15'-0"	20'-0"
60°	9'-0"	20'-0"	21'-10"	39'-2"	18'-0"	20'-0"
	9'-6"	20'-0"	22'-1"	39'-5"	18'-0"	20'-0"
90°	9'-0"	20'-0"	20'-0"	40'-0"	25'-0"	25'-0"
	9'-6"	20'-0"	20'-0"	40'-0"	25'-0"	25'-0"

City of Lindsay

CITY SERVICES DEPARTMENT

STANDARD PARKING SPACE AND AISLE DIMENSIONS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	PK-4
			DATE 03/06/25	



TYPICAL CONFIGURATION

NOTE:

1. SEE PARKING STANDARDS SYSTEM FOR REQUIRED LENGTH OF STALLS.
2. A R99C(CA) SIGN CAN BE USED IN PLACE OF THE R99(CA) AND R99B(CA) SIGNS.
3. A MAX SLOPE OF 1.5% IN ALL DIRECTIONS ON ACCESSIBLE PARKING STALLS AND AISLES.
4. ACCESSIBLE PARKING STALLS SHALL BE LOCATED AS CLOSE AS POSSIBLE, AND ON THE SHORTEST ACCESSIBLE ROUTE OF TRAVEL, TO THE PEDESTRIAN ENTRANCE OF THE SITE.
5. ACCESSIBLE PARKING STALLS SHALL BE SO LOCATED THAT USERS ARE NOT COMPELLED TO WHEEL OR WALK BEHIND PARKED CARS OTHER THAN THEIR OWN.
6. ONE IN EVERY SIX ACCESSIBLE PARKING STALLS, BUT NOT LESS THAN ONE, SHALL BE VAN ACCESSIBLE. VAN ACCESSIBLE PARKING STALLS SHALL HAVE AN ACCESS AISLE 5' MINIMUM IN WIDTH, PLACED ON THE SIDE OPPOSITE OF THE DRIVER'S SIDE OF THE VEHICLE.
7. RAMPS SHALL NOT ENCROACH INTO ANY ACCESSIBLE PARKING STALL OR ACCESS AISLE.
8. WHERE R99(CA) AND R99B(CA) SIGNS ARE INSTALLED ON SIDEWALKS OR OTHER PATHS OF TRAVEL, THE BOTTOM OF SIGN PANEL SHALL BE A MINIMUM OF 7' ABOVE THE SURFACE OF THE SIDEWALK OR PATH. WHERE R99(CA) AND R99B(CA) SIGNS ARE NOT INSTALLED ON SIDEWALKS OR PATHS OF TRAVEL, THE BOTTOM OF THE SIGN PANEL SHALL BE AT LEAST 5' ABOVE THE SURFACE OF THE PARKING LOT.
9. WHERE THERE IS A CLUSTER OF ACCESSIBLE PARKING STALLS, THE VAN ACCESSIBLE PARKING STALL SHALL BE FURTHEST FROM THE ACCESSIBLE FACILITY ENTRANCE, WITHIN SUCH CLUSTER OF ACCESSIBLE PARKING STALLS.

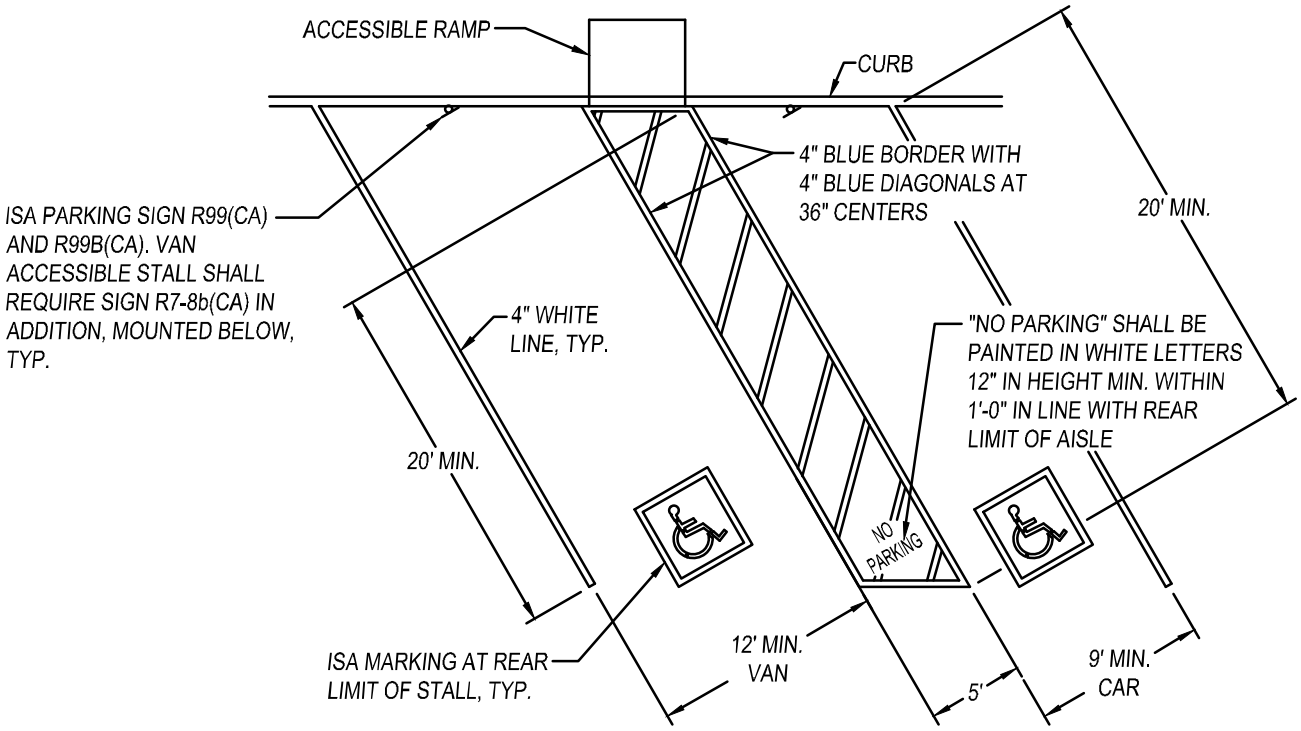
City of Lindsay

CITY SERVICES DEPARTMENT

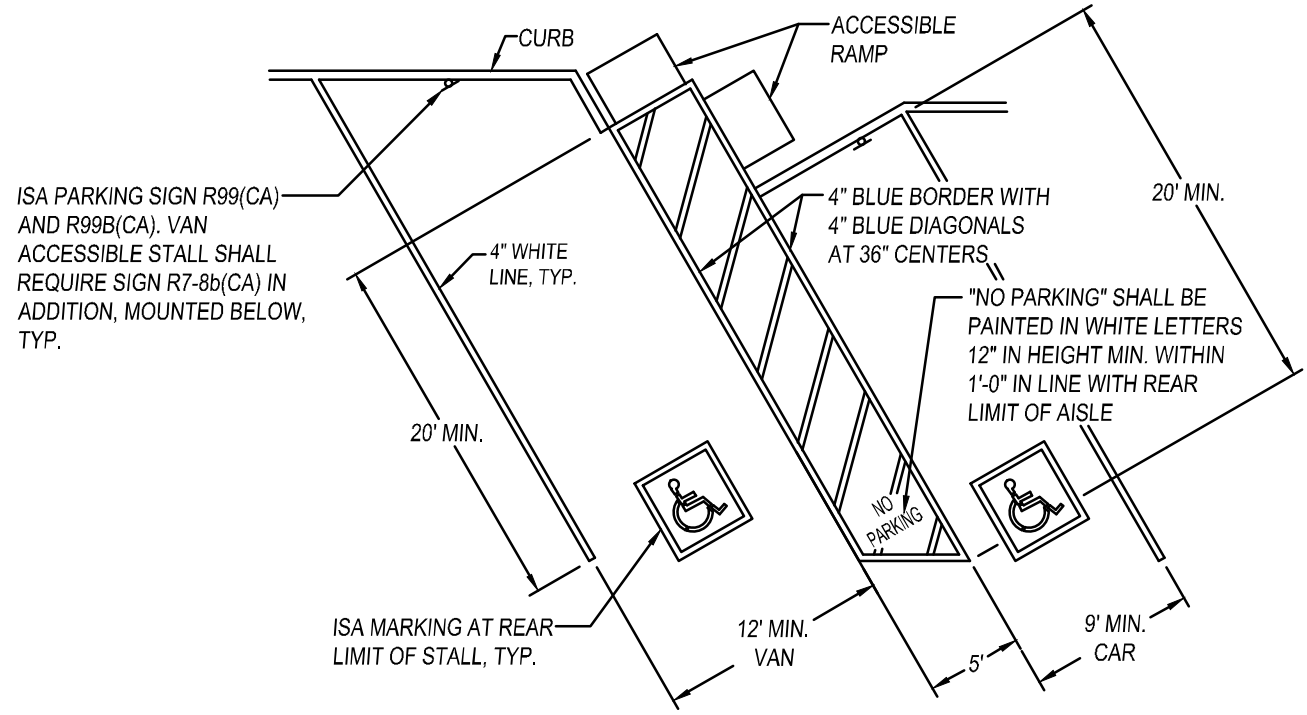
ACCESSIBLE PARKING

1 OF 3

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	PK-5
			DATE 03/06/25	



TYPICAL CONFIGURATION



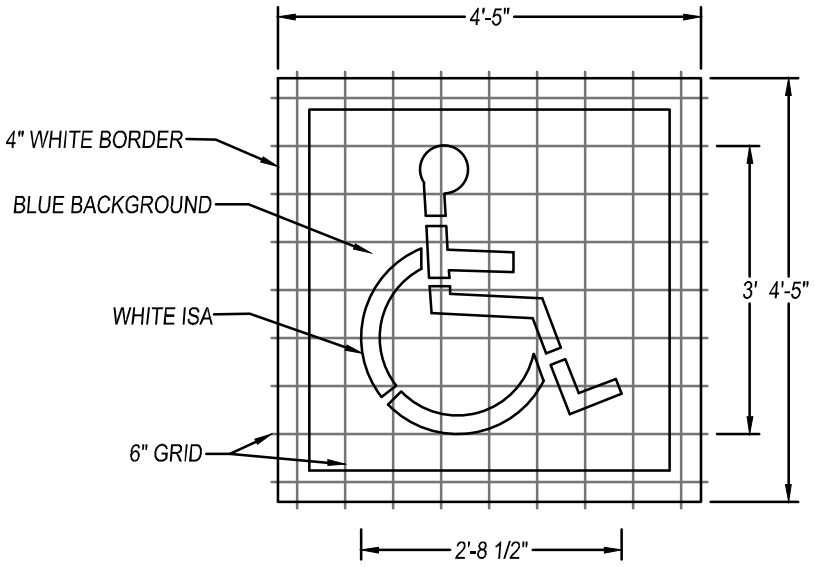
TYPICAL CONFIGURATION

City of Lindsay

CITY SERVICES DEPARTMENT

ACCESSIBLE PARKING
2 OF 3

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	PK-6
			DATE 03/06/25	



ISA MARKING FOR ACCESSIBLE PARKING SPACE OR STALL

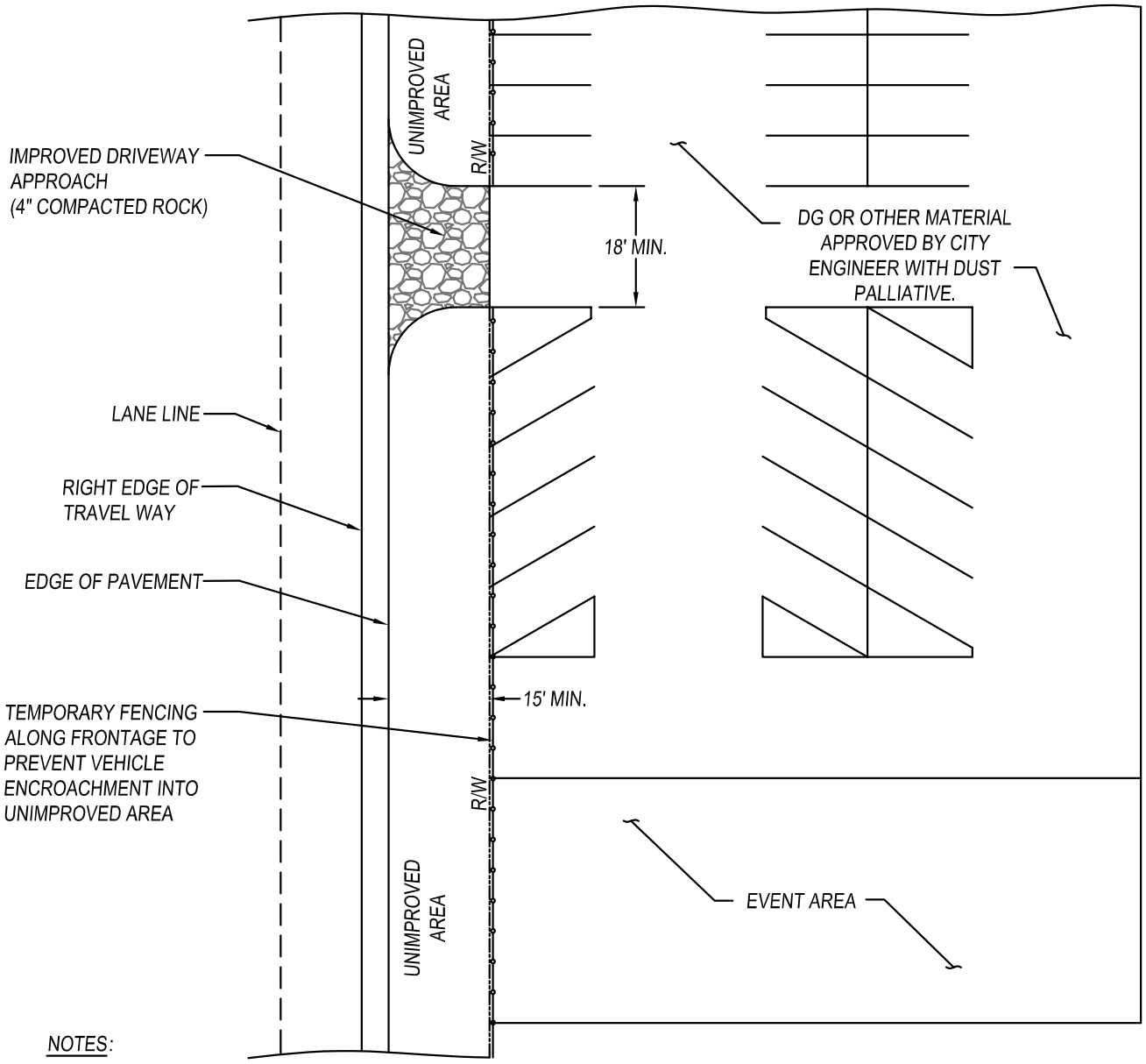
TOTAL NUMBER OF PARKING SPACES OR STALLS	MINIMUM NUMBER OF DISABLED ACCESSIBLE PARKING SPACES OR STALLS
1-25	1
26-50	2
51-75	3
76-100	4
101-150	5
151-200	6
201-300	7
301-400	8
401-500	9
501-1000	2 PERCENT OF TOTAL
GREATER THAN 1001	20 PLUS 1 FOR EACH 100 OR FRACTION THEREOF OVER 1000

City of Lindsay

CITY SERVICES DEPARTMENT

ACCESSIBLE PARKING
3 OF 3

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	PK-7
			DATE 03/06/25	



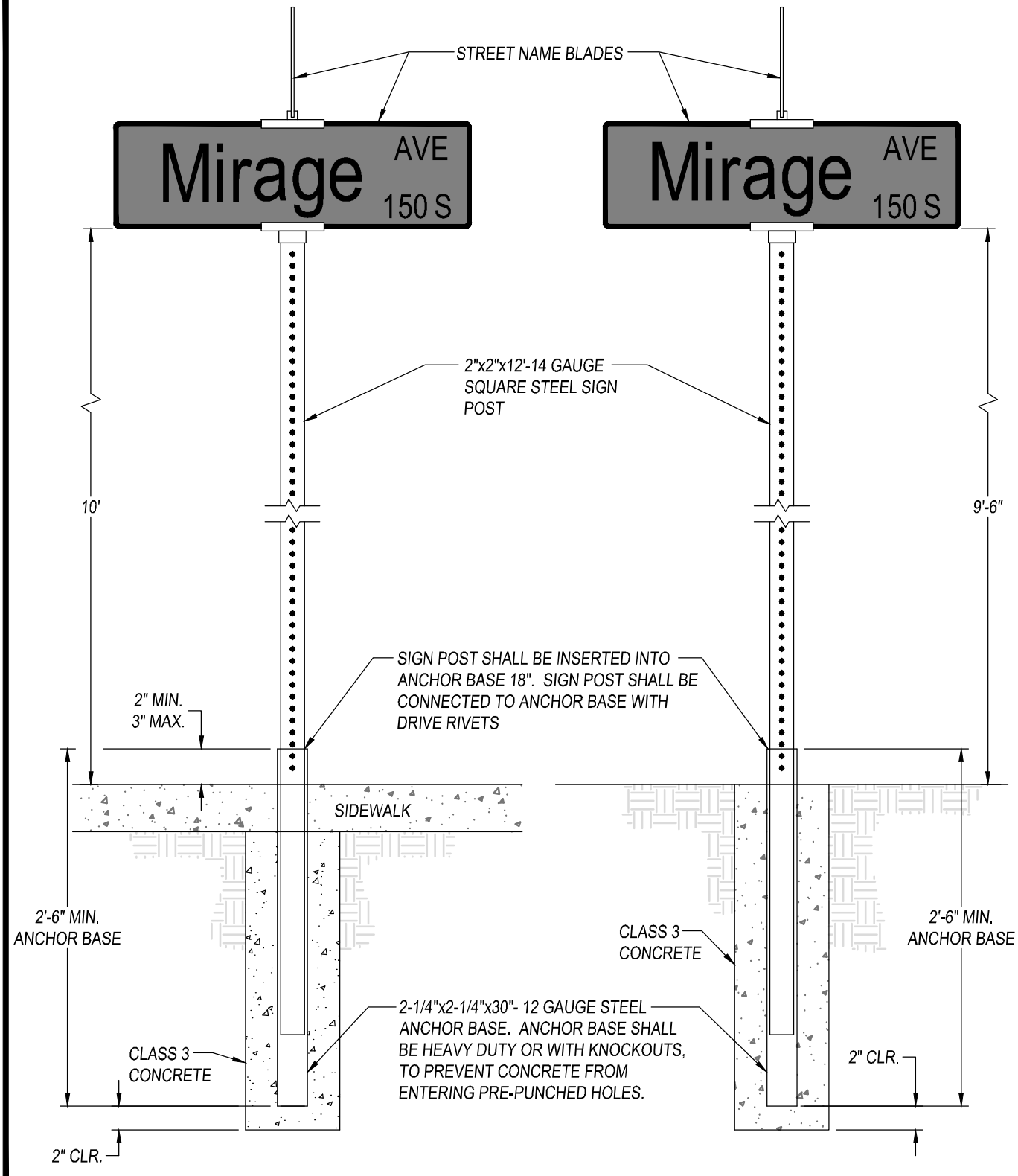
NOTES:

1. APPLICABLE TO TEMPORARY PARKING LOTS FOR TEMPORARY FUNCTIONS SUCH AS CARNIVALS, CHRISTMAS TREE LOTS. PUMPKIN PATCHES AND SIMILAR EVENTS WITH APPROVAL OF CITY ENGINEER.
2. TEMPORARY PARKING LOT REQUIRES A TEMPORARY CONDITIONAL USE PERMIT (TCUP). APPLICANT IS RESPONSIBLE FOR ALL TRACK-OUT DAILY. TEMPORARY PARKING SHALL BE LIMITED TO 3 MONTHS MAX.
3. SEE OTHER PARKING DETAILS FOR DIMENSIONS AND OTHER REQUIREMENTS.
4. NOT APPLICABLE FOR PERMANENT FACILITIES WITH TEMPORARY PARKING USE SUCH AS STORAGE FACILITIES, INDUSTRIAL PARKING LOTS, GARAGE SHOPS, ETC.
5. APPLICANT IS RESPONSIBLE FOR ON-SITE DRAINAGE.
6. LAYOUT REQUIRES ADMINISTRATIVE APPROVAL.
7. A DUST PALLIATIVE MUST BE USED IN CONJUNCTION WITH DG OR OTHER APPROVED MATERIAL.

City of Lindsay
CITY SERVICES DEPARTMENT

TEMPORARY PARKING LOT STANDARDS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	PK-8
			DATE 03/06/25	

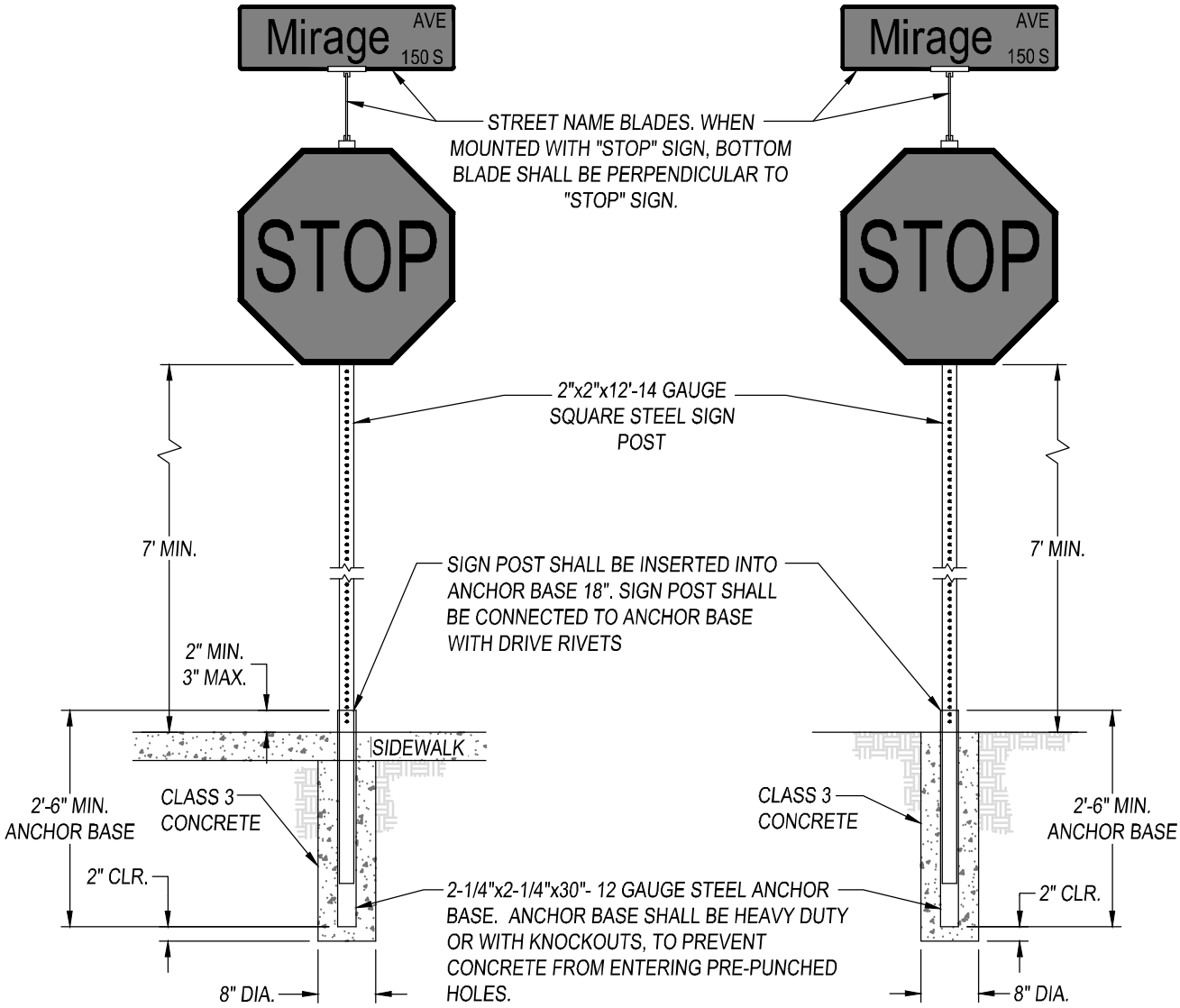


City of Lindsay

CITY SERVICES DEPARTMENT

STREET NAME SIGN INSTALLATION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TS-1
			DATE 03/06/25	



IN SIDEWALK

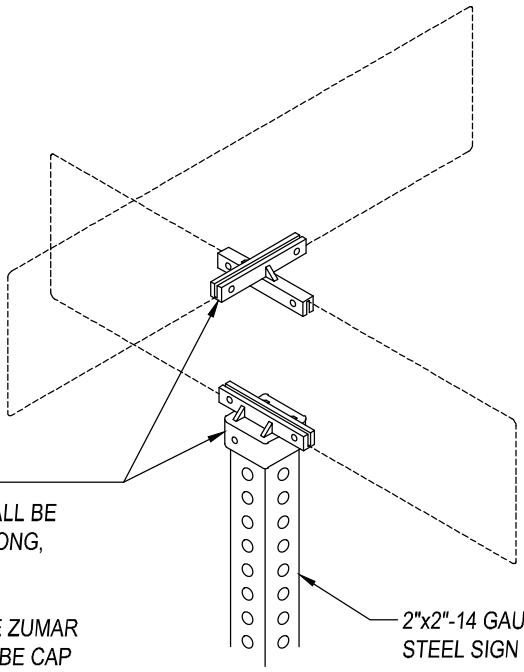
IN PARKWAY

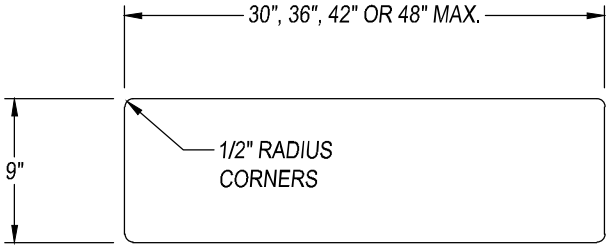
City of Lindsay

CITY SERVICES DEPARTMENT

STREET NAME SIGN INSTALLATION WITH "STOP" (R1) SIGN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TS-2
			DATE 03/06/25	





SIGN DIMENSIONS

NOTE:

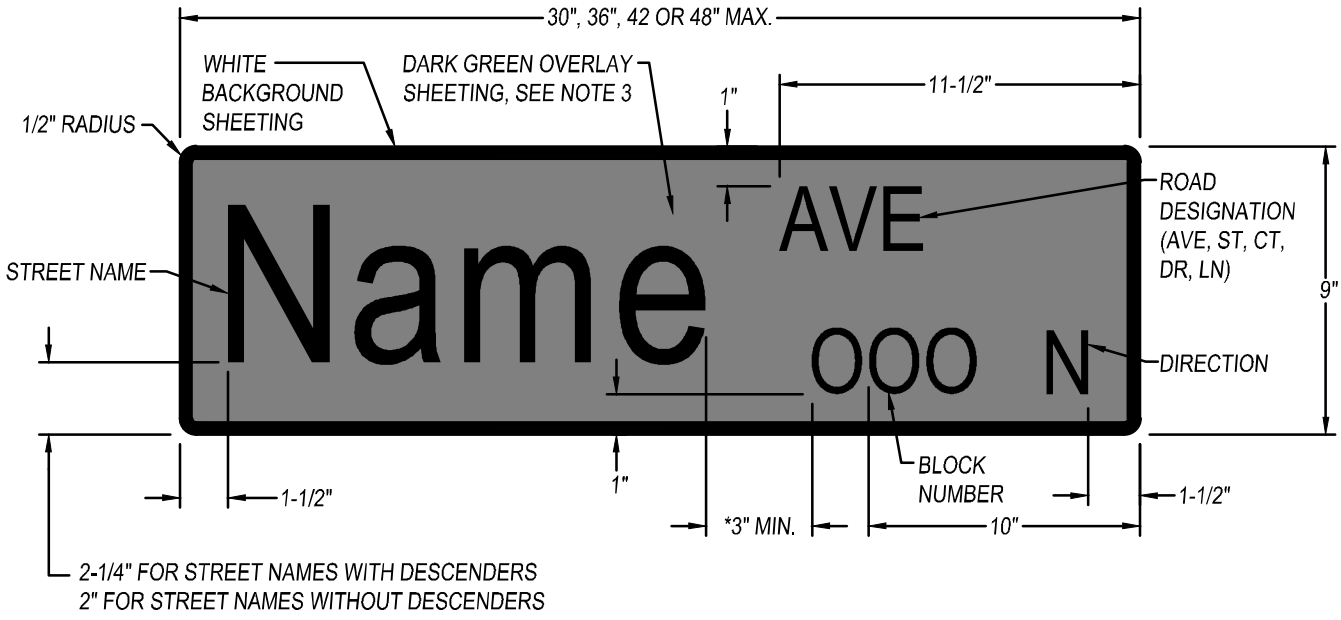
ALL SIGN MATERIAL SHALL CONFORM TO THE STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION SPECIFICATIONS. SIGN BLANKS SHALL BE 0.08" IN THICKNESS AND SHALL BE ALUMINUM ALLOY #5052-H38.

City of Lindsay

CITY SERVICES DEPARTMENT

STREET NAME SIGNS TYPE 1

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	TS-3
			DATE	03/06/25	



*MINIMUM WIDTH MAY BE REDUCED TO 1" ONLY ON 48" BLADES TO FIT STREET NAME

NOTES:

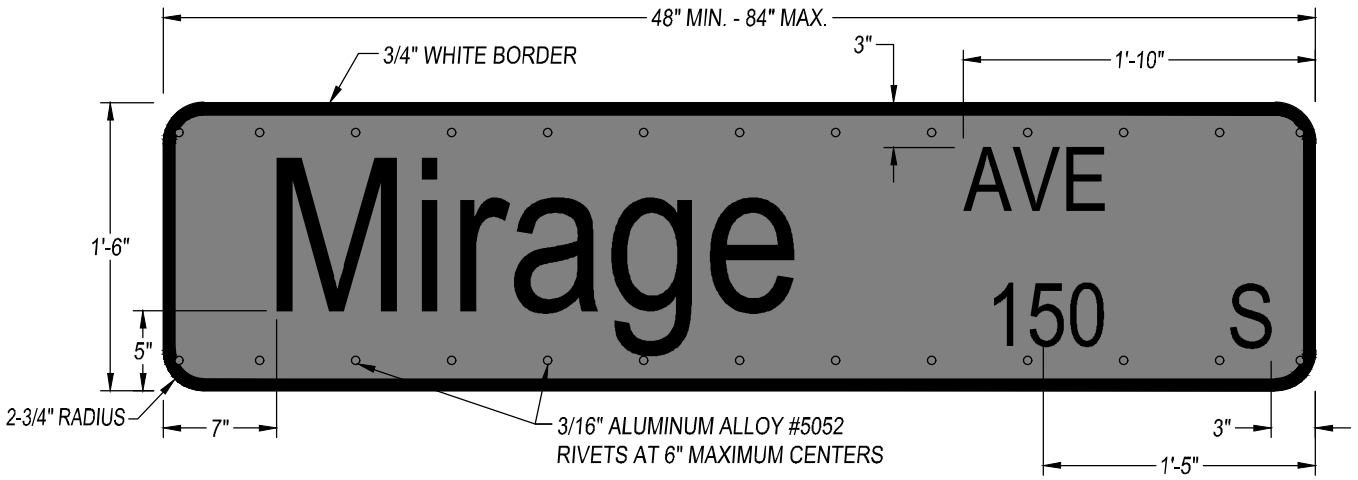
1. ALL SIGN MATERIAL SHALL CONFORM TO THE STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION SPECIFICATIONS. SIGN BLANKS SHALL BE 0.08" MINIMUM IN THICKNESS AND SHALL BE ALUMINUM ALLOY #5052-H38.
2. ALL SHEETING SHALL BE 3M BRAND SCOTCHLITE REFLECTIVE MATERIAL. NO SUBSTITUTIONS WILL BE ACCEPTED.
3. BACKGROUND SHEETING SHALL BE WHITE #4090 (DIAMOND GRADE). OVERLAY SHEETING SHALL BE DARK GREEN DELUX 872 PER CITY OF LINDSAY STANDARD.
4. STREET NAME LETTERS SHALL BE 6" IN SIZE, "ROAD GEEK" OR "HIGHWAY GOTHIC" FONT, SERIES 'C' WITH AN UPPER CASE INITIAL FOLLOWED BY LOWER CASE LETTERS.
5. ROAD DESIGNATION, BLOCK NUMBER AND DIRECTION LETTERS SHALL BE 3" UPPER CASE, SERIES 'C' (DIECUT).
6. WHEN STREET NAME LENGTH DOES NOT FIT ON 48" BLADE, LETTERS MAY BE REDUCED TO SERIES 'B'. SERIES 'A' IN NOT ALLOWED.
7. WHEN STREET NAME LENGTH IS SHORT, USE SERIES 'D'.
8. SIGNAGE MUST HAVE ANTI-GRAFFITI COATING.

City of Lindsay

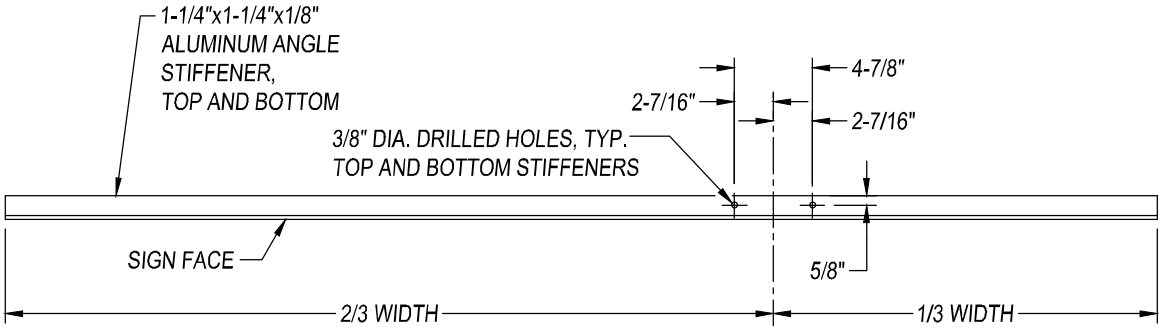
CITY SERVICES DEPARTMENT

STREET NAME SIGN STREET INSTERSECTIONS

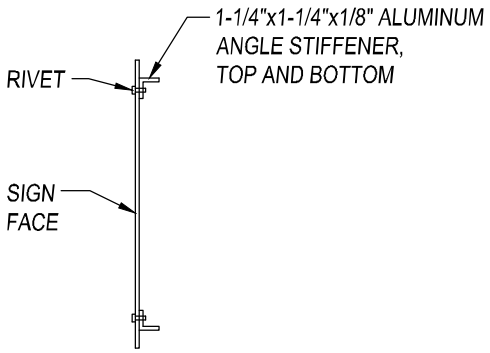
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TS-4
			DATE 03/06/25	



FRONT VIEW



TOP VIEW



SIDE VIEW

NOTES:

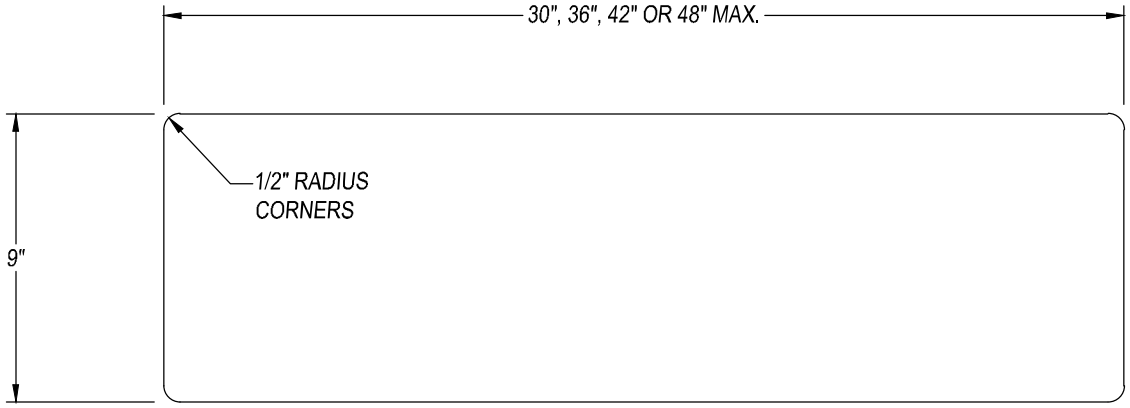
1. SIGN BLANK SHALL BE ALUMINUM ALLOY 6061-T6 OR 5052-H38.
2. ALL SHEETING, LETTERS AND NUMERALS SHALL BE 3M BRAND DIAMOND GRADE 3 (DG3) SCOTCHLITE REFLECTIVE MATERIAL. NO SUBSTITUTIONS WILL BE ACCEPTED.
3. BACKGROUND SHEETING SHALL BE DARK GREEN DELUX 872 PER CITY OF LINDSAY STANDARD.
4. BORDER, LETTERS AND NUMERALS SHALL BE WHITE (#3970).
5. STREET NAME LETTERS SHALL BE 12", "HIGHWAY GOTHIC" FONT, SERIES 'E' MODIFIED UPPER CASE INITIAL WITH LOWER CASE SUBSEQUENT LETTERS. "AVE", "ST", "DR", "LN", BLOCK NUMBER AND DIRECTION SHALL BE 5", "HIGHWAY GOTHIC" FONT, SERIES 'E' MODIFIED UPPER CASE LETTERS.
6. SEE STREET NAME SIGN BRACKET STANDARD DRAWING FOR BRACKET INFORMATION.
7. SIGNAGE MUST HAVE ANTI-GRAFFITI COATING.

City of Lindsay

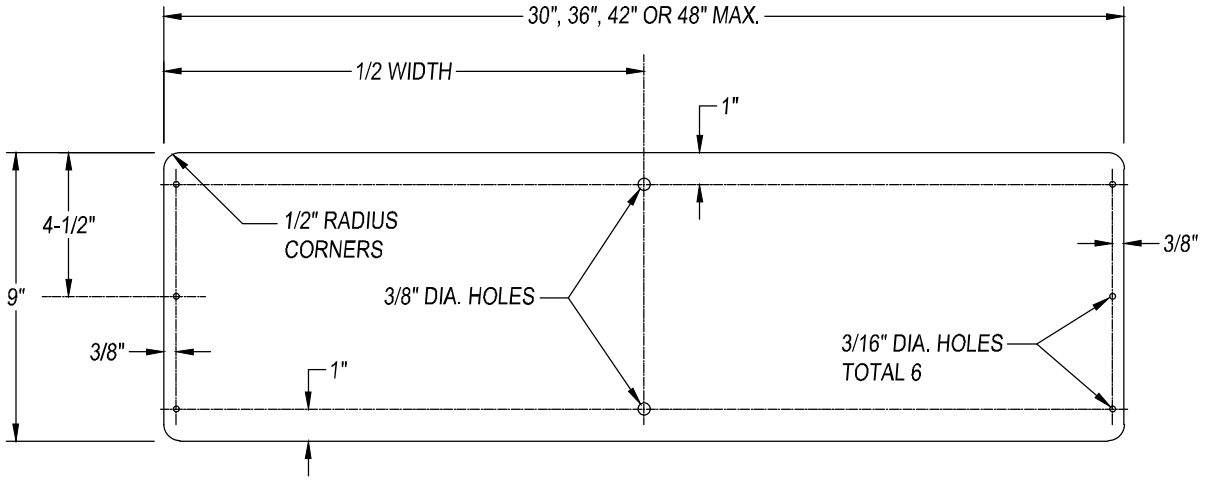
CITY SERVICES DEPARTMENT

STREET NAME SIGN SIGNALIZED INTERSECTION

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	TS-5
			DATE	03/06/25	



TYPE 1



TYPE 2

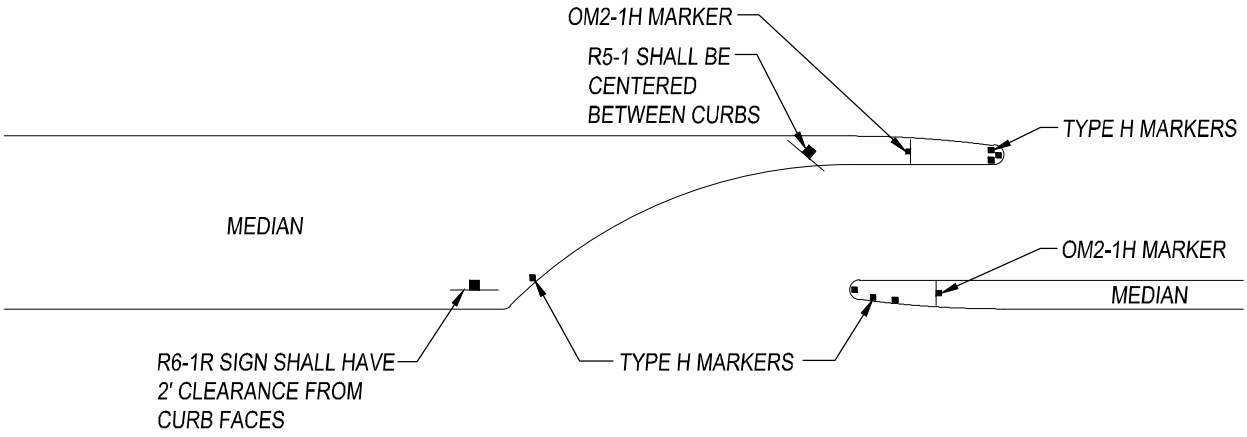
NOTE:
ALL SIGN MATERIAL SHALL CONFORM TO THE STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION SPECIFICATIONS. SIGN BLANKS SHALL BE 0.08" IN THICKNESS AND SHALL BE ALUMINUM ALLOY #5052-H38. TYPE 2 SIGN BLANKS SHALL BE DRILLED AS SHOWN.

City of Lindsay

CITY SERVICES DEPARTMENT

STREET NAME BLANK

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TS-6
			DATE 03/06/25	



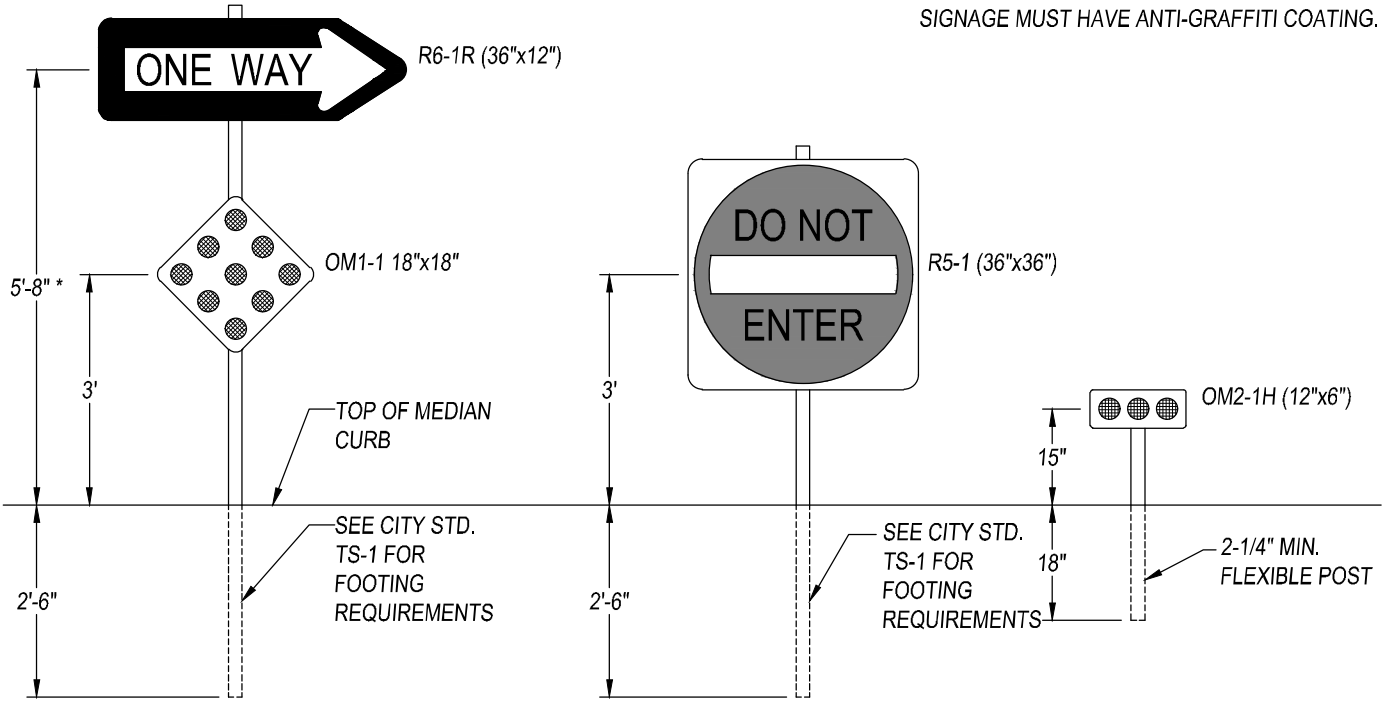
STREET OR DRIVEWAY

OM1-1 SIGNS ARE TO BE USED AT STREET INTERSECTIONS ONLY.

* 36" WHEN OM1-1 SIGN IS OMITTED.

TYPE H MARKERS SHALL BE ONE WAY YELLOW RETROREFLECTIVE AND SHALL BE CEMENTED TO THE TOP OF CURB WITH A RAPID SET TYPE EPOXY ADHESIVE IN CONFORMANCE WITH THE MANUFACTURER'S INSTRUCTIONS.

SIGNAGE MUST HAVE ANTI-GRAFFITI COATING.



City of Lindsay

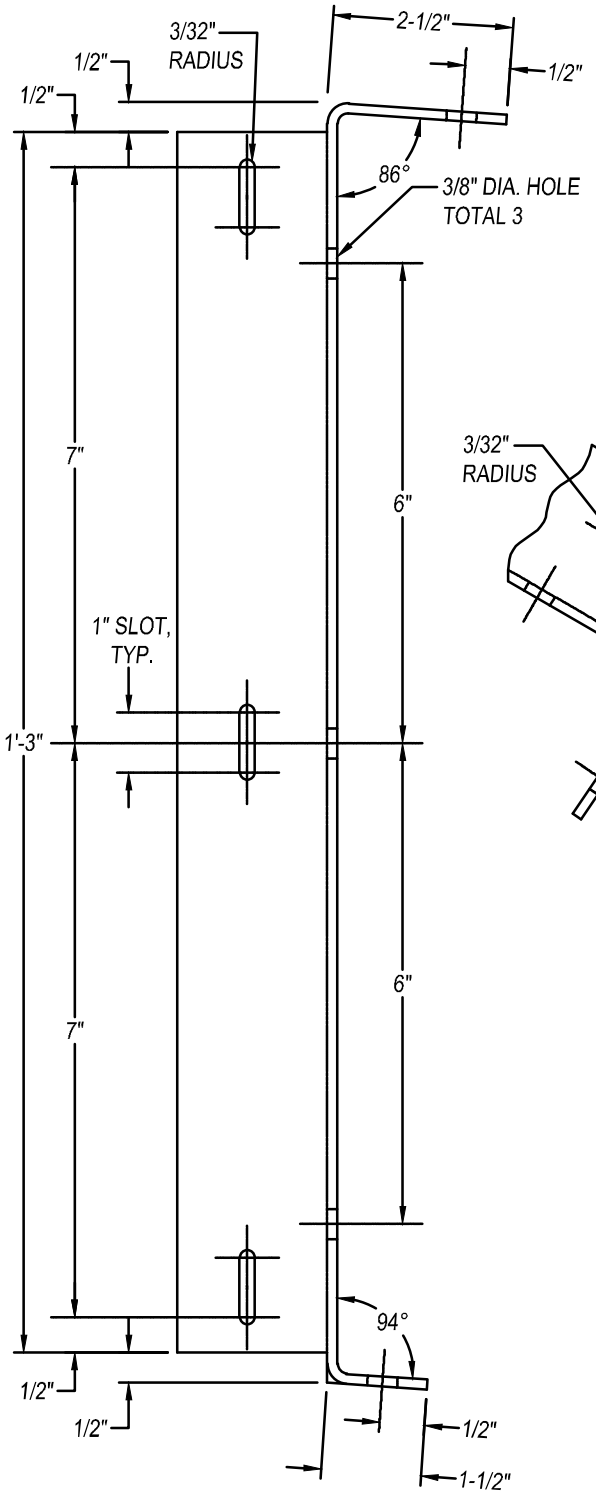
CITY SERVICES DEPARTMENT

MEDIAN ISLAND OPENING SIGNING

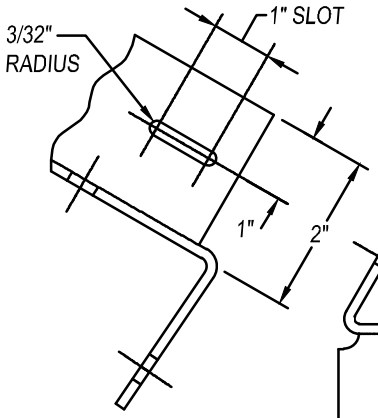
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TS-7
			DATE 03/06/25	

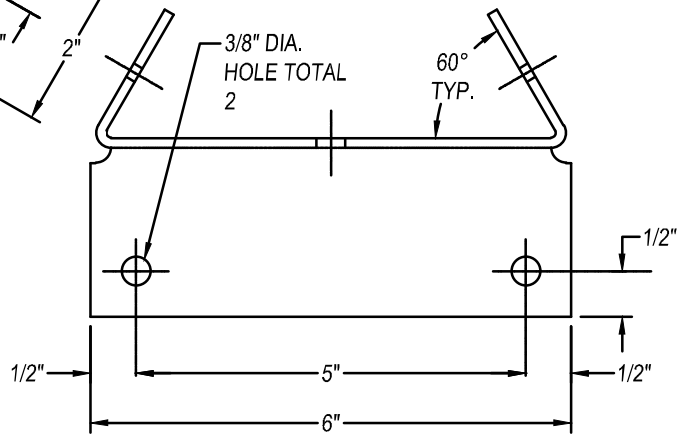
NOTES:

1. ALL MATERIAL SHALL BE 12 GAUGE HOT ROLLED STEEL SHEET, LOW CARBON COMMERCIAL QUALITY. SPECIFICATION QQS-636. GRADE 1010.
2. ALL BRACKETS SHALL BE HOT DIP GALVANIZED AFTER FABRICATION PER SPECIFICATION ASTM A 123/A 123M.
3. ALL BENDS SHALL BE 1/8" RADIUS.
4. ALL SHARP EDGES SHALL BE DEBURRED.
5. TOLERANCES: DIMENSIONS 1/32"±
   ANGLES 0°30'±
6. ATTACH BRACKET TO THE TRAFFIC SIGNAL POLE USING (3) 3/4" STAINLESS STEEL BANDS, 2 FEET ABOVE THE MAST ARM CONNECTION.

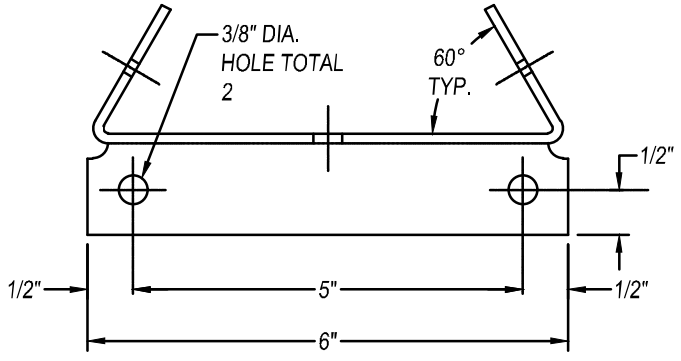


SIDE VIEW





TOP VIEW



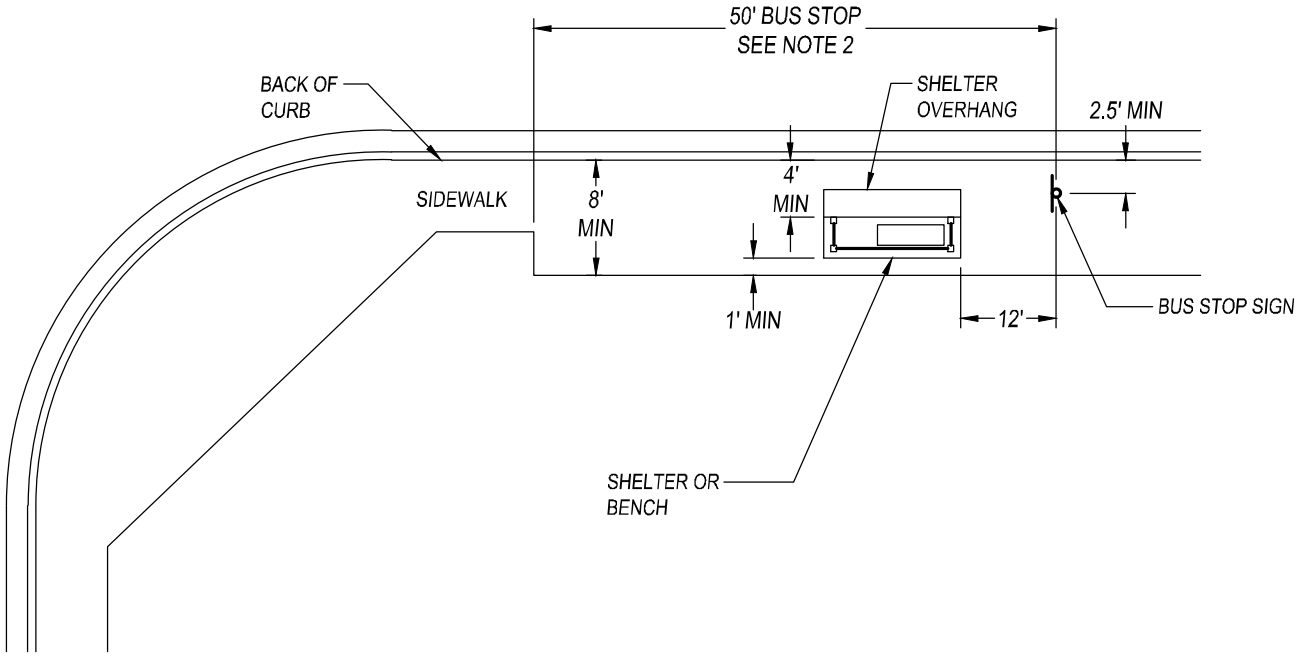
BOTTOM VIEW

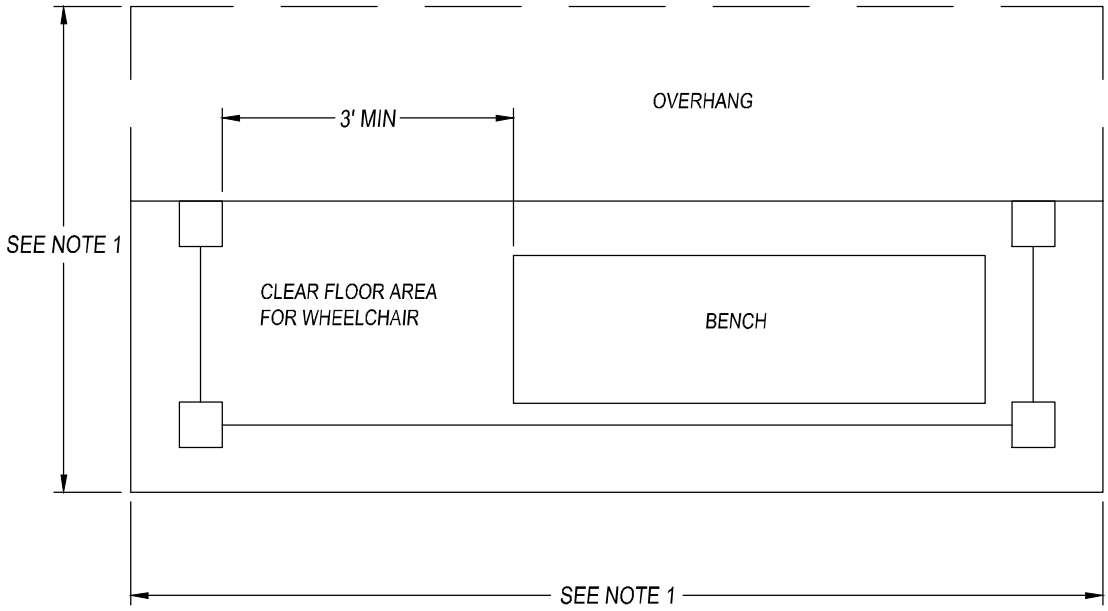
City of Lindsay

CITY SERVICES DEPARTMENT

STREET NAME SIGN BRACKET

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TS-8
			DATE 03/06/25	





NOTES:

1. ALL SHELTERS SHALL BE PROPERLY CONSTRUCTED ACCORDING TO THE CITY'S REQUIREMENTS AND STRUCTURAL ENGINEERING PLANS FOR THE SHELTER. SIZE OF SHELTER SHALL BE VERIFIED WITH CITY SERVICES DEPARTMENT AND CITY ENGINEER PRIOR TO CONSTRUCTION.

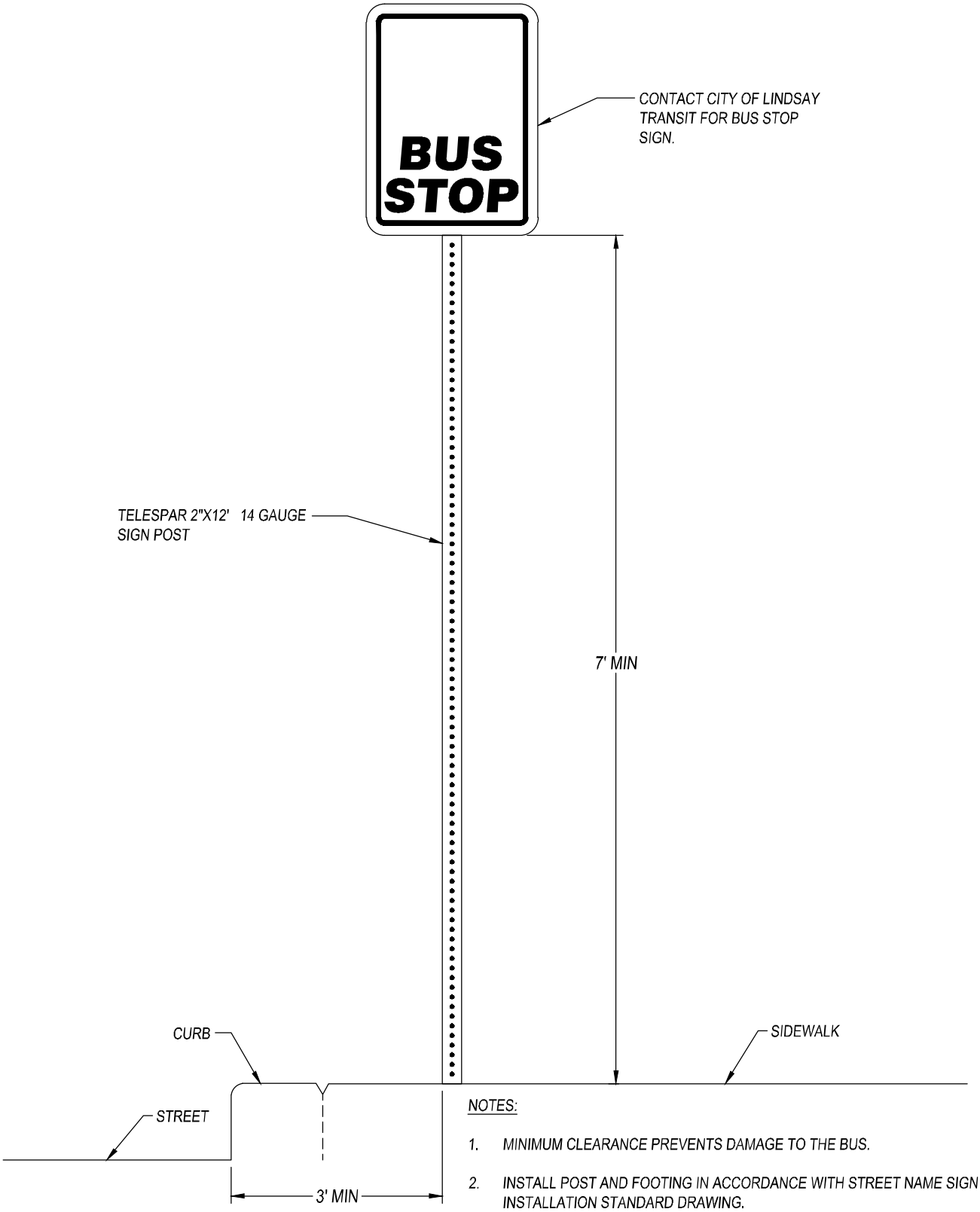
2. 8' MIN SIDEWALK DEPTH MUST EXTEND AT LEAST 25' ENDING AT BUS STOP SIGN POLE. DESIRABLE LENGTH IS 50'.

City of Lindsay

CITY SERVICES DEPARTMENT

BUS SHELTER AND SIGN LOCATION WITH WHEEL CHAIR AREA

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	TR-1
			DATE	03/06/25	



NOTES:

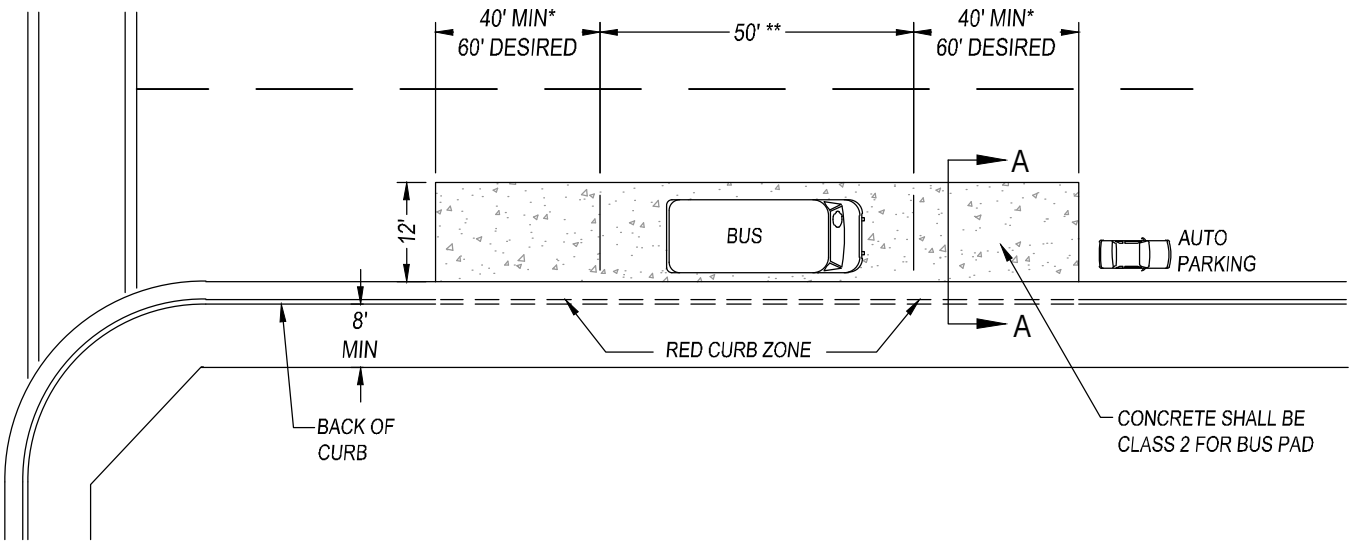
1. MINIMUM CLEARANCE PREVENTS DAMAGE TO THE BUS.
2. INSTALL POST AND FOOTING IN ACCORDANCE WITH STREET NAME SIGN INSTALLATION STANDARD DRAWING.
3. SEE CITY STD. TS-1 FOR FOOTING REQUIREMENTS.

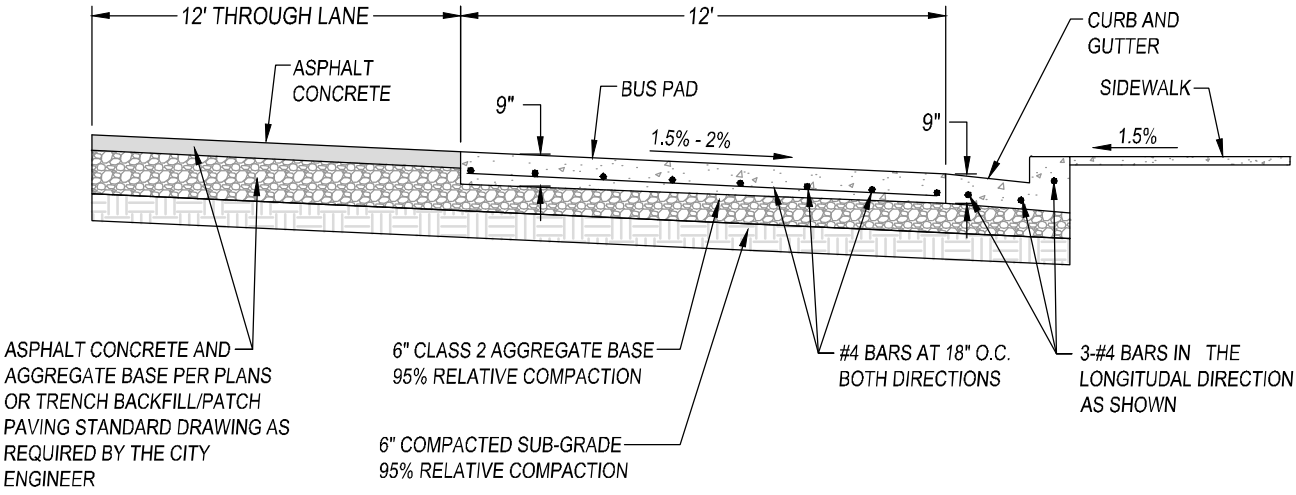
City of Lindsay

CITY SERVICES DEPARTMENT

BUS STOP SIGN

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	TR-2
			DATE	03/06/25	





SECTION A-A

NOTES:

1. CONCRETE FOR BUS PAD SHALL BE CLASS 2.
2. CONCRETE FOR SIDEWALK AND CURB AND GUTTER SHALL BE CLASS 2 OR CLASS 3.
3. REINFORCING BARS SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REINFORCING BARS SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
4. REINFORCING BARS SHALL HAVE A MINIMUM OF 3" OF CLEAR COVERAGE.
5. WEAKEND PLANE JOINTS SHALL BE PLACED IN THE BUS PAD AT 10'-15' CENTERS, MINIMUM DEPTH OF 2". JOINTS IN CURB AND GUTTER SHALL ALIGN WITH JOINTS IN BUS PAD WHERE POSSIBLE.

* 40' MINIMUM FOR SPEED LIMIT 30 MPH AND UNDER. 60' DESIRABLE FOR SPEED LIMIT ABOVE 30 MPH.

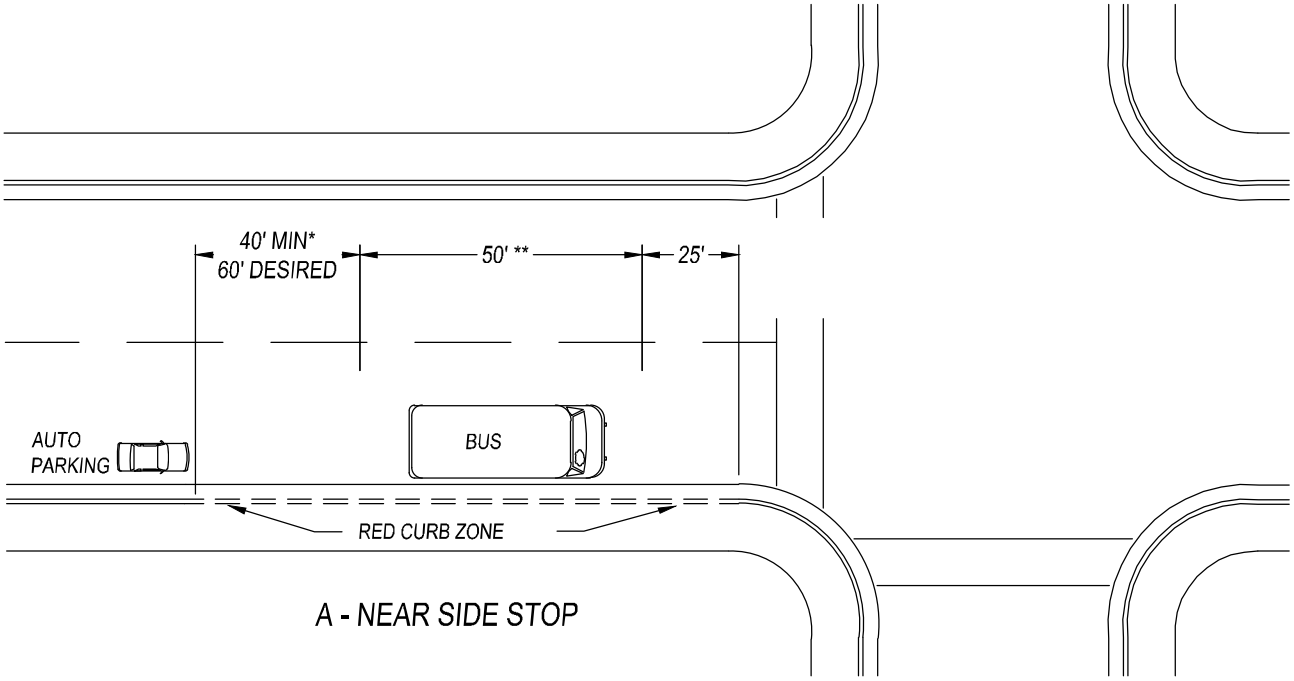
** FOR EACH ADDITIONAL PASS THROUGH BUS BERTH ADD 50', AND FOR EACH ADDITIONAL LAYOVER BUS BERTH ADD 80'.

City of Lindsay

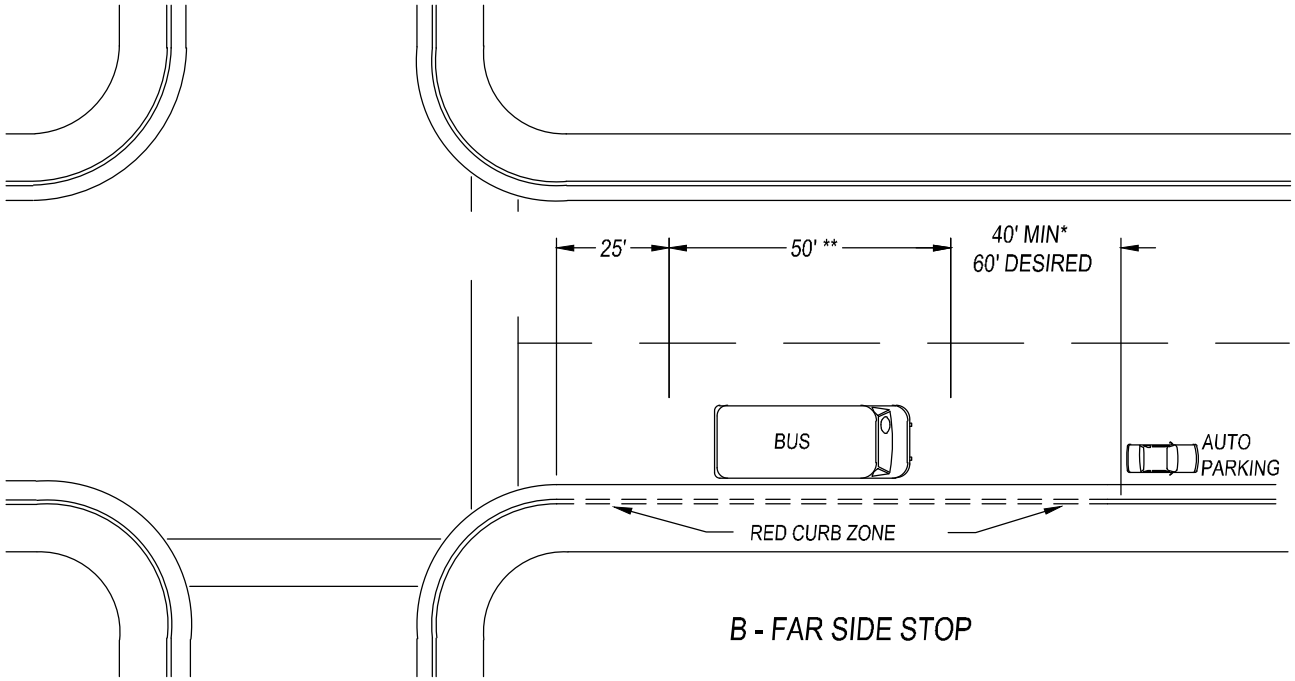
CITY SERVICES DEPARTMENT

BUS PAD

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TR-3
			DATE 03/06/25	



A - NEAR SIDE STOP



B - FAR SIDE STOP

NOTES:

* 40' MINIMUM FOR SPEED LIMIT 30 MPH AND UNDER. 60' DESIRABLE FOR SPEED LIMIT ABOVE 30 MPH.

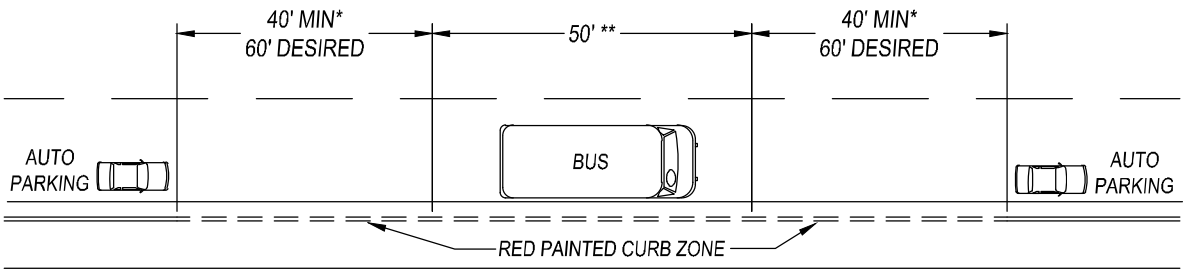
** FOR EACH ADDITIONAL PASS THROUGH BUS BERTH ADD 50', AND FOR EACH ADDITIONAL LAYOVER BUS BERTH ADD 80'.

City of Lindsay

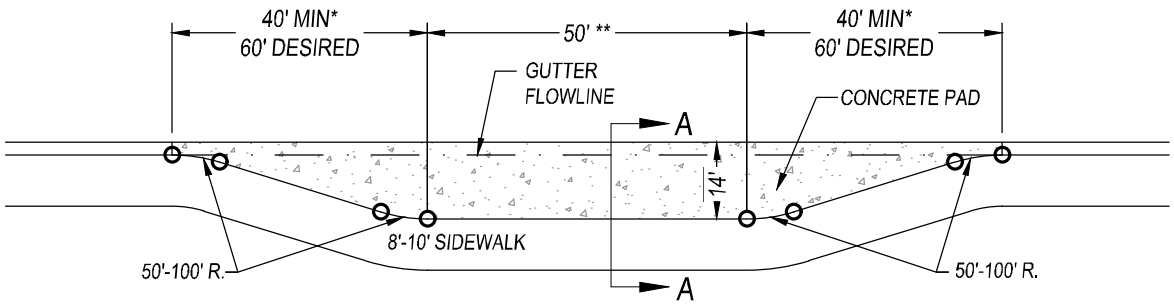
CITY SERVICES DEPARTMENT

BUS STOPS A & B

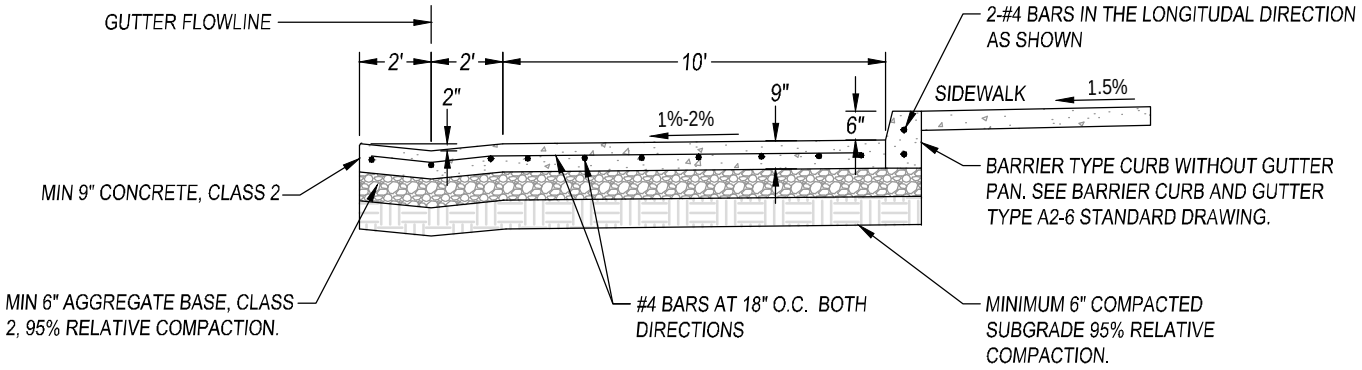
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TR-4
			DATE 03/06/25	



C - MID-BLOCK STOP



D - TURNOUT STOP



SECTION A-A

NOTES:

1. CONCRETE FOR VEE GUTTER AND BUS PAD SHALL BE CLASS 2.
2. CONCRETE FOR SIDEWALK AND CURB AND GUTTER SHALL BE CLASS 2 OR CLASS 3.
3. REINFORCING BARS SHALL BE DEFORMED STEEL BARS AND SHALL BE GRADE 40 MINIMUM. REINFORCING BARS SHALL BE FREE OF RUST OR DIRT AND SHALL BE THOROUGHLY CLEANED BEFORE PLACEMENT.
4. REINFORCING BARS SHALL HAVE A MINIMUM OF 3" OF CLEAR COVERAGE.
5. WEAKEND PLANE JOINTS SHALL BE PLACED IN THE BUS PAD AT 12'-15' CENTERS, MINIMUM DEPTH OF 2". JOINTS IN CURB AND GUTTER SHALL ALIGN WITH JOINTS IN BUS PAD WHERE POSSIBLE.

* 40' MINIMUM FOR SPEED LIMIT 30 MPH AND UNDER. 60' DESIRABLE FOR SPEED LIMIT ABOVE 30 MPH.

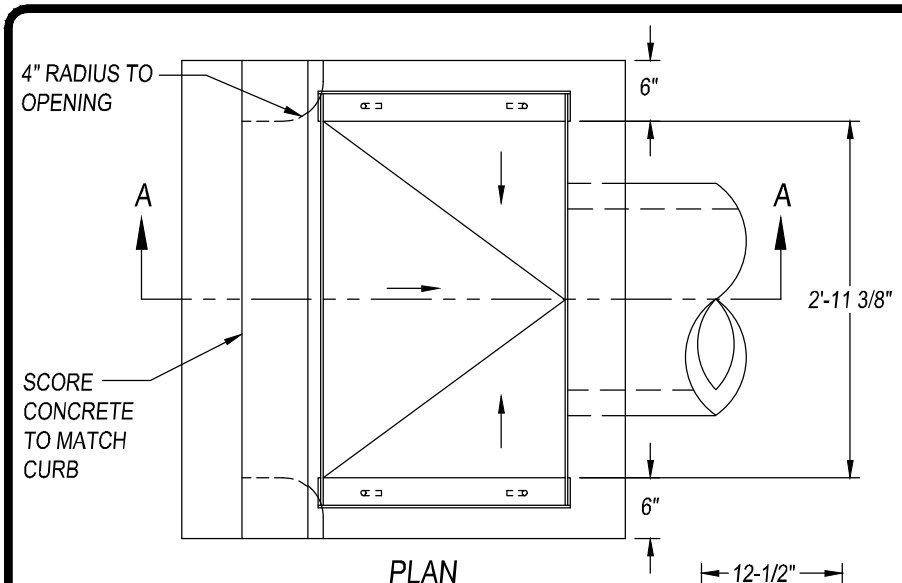
** FOR EACH ADDITIONAL PASS THROUGH BUS BERTH ADD 50', AND FOR EACH ADDITIONAL LAYOVER BUS BERTH ADD 80'.

City of Lindsay

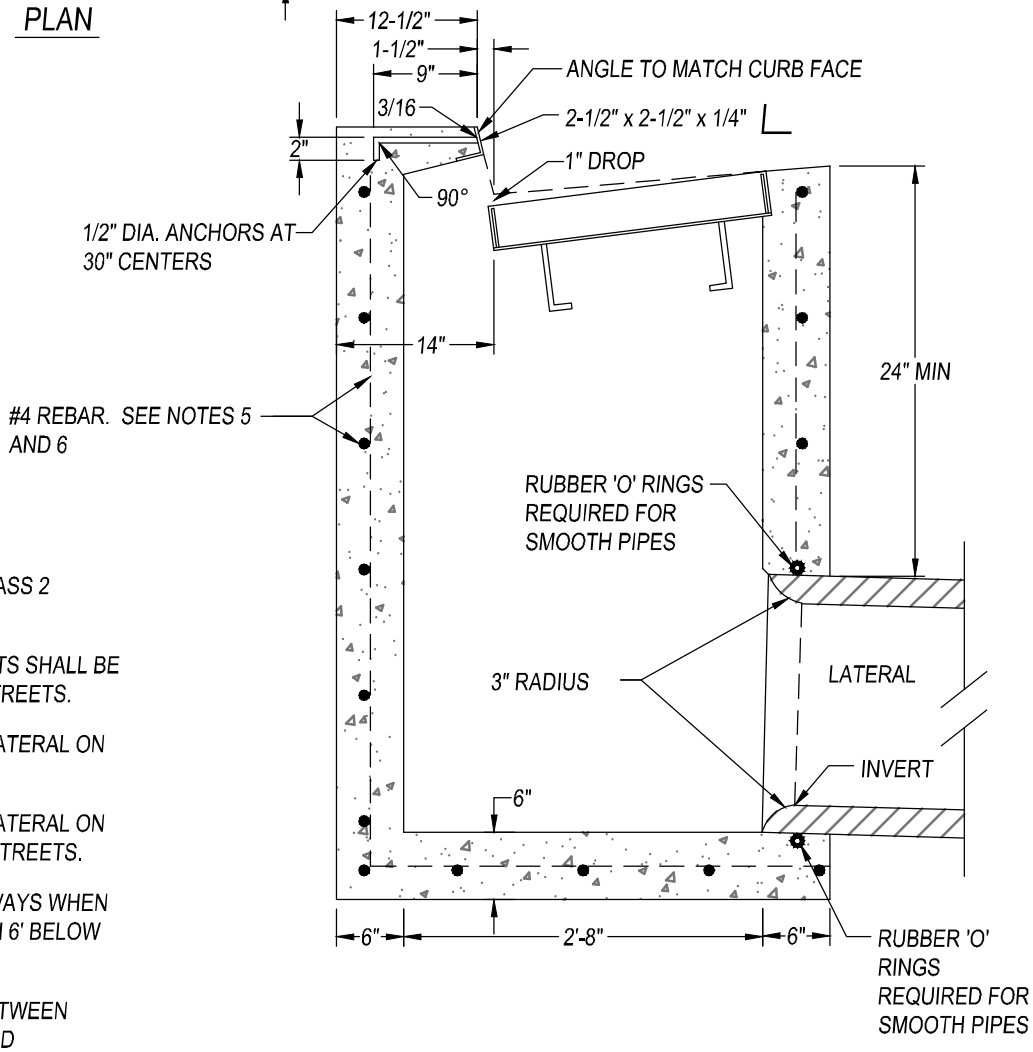
CITY SERVICES DEPARTMENT

BUS STOPS C & D

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	TR-5
			DATE 03/06/25	



PLAN



NOTES:

1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MAJOR TYPE DRAINAGE INLETS SHALL BE INSTALLED ON ALL PUBLIC STREETS.
3. 12" MINIMUM STORM DRAIN LATERAL ON LOCAL STREETS.
4. 18" MINIMUM STORM DRAIN LATERAL ON COLLECTOR AND ARTERIAL STREETS.
5. #4 REBAR AT 18" O.C. BOTH WAYS WHEN DRAIN INLET IS DEEPER THAN 6' BELOW TOP OF CURB.
6. MINIMUM CLEAR SPACING BETWEEN SURFACES OF CONCRETE AND REINFORCING STEEL SHALL BE 2".

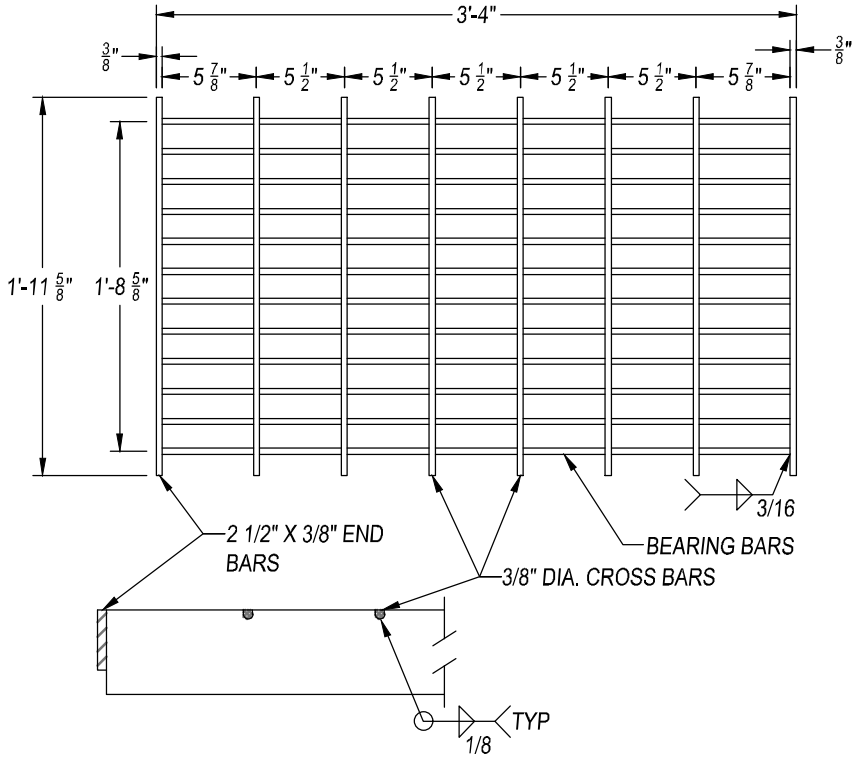
SECTION A-A

City of Lindsay

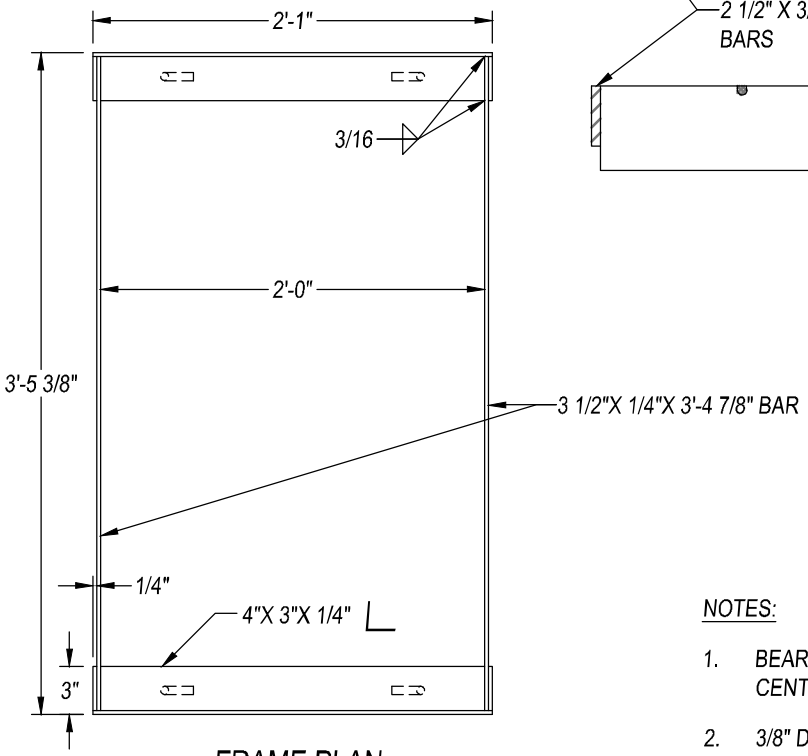
CITY SERVICES DEPARTMENT

DRAINAGE INLET - GO TYPE

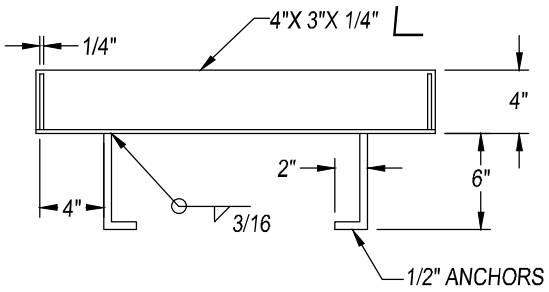
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-1
			DATE 03/06/25	1 OF 2



GRATE DETAIL



FRAME PLAN



FRAME SECTION

NOTES:

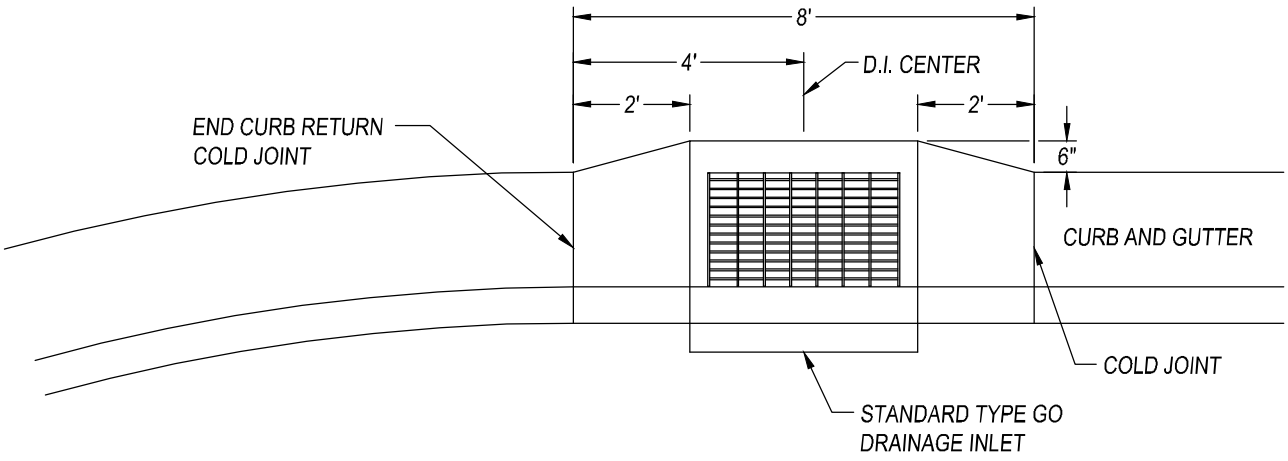
1. BEARING BARS SHALL BE 3-1/2"X 3/8" BARS ON 1-7/8" CENTERS.
2. 3/8" DIAMETER CROSS BARS MAY BE FILLET WELDED, RESISTANCE WELDED OR ELECTROFORGED TO BEARING BARS.
3. FRAME AND GRATE SHALL BE HOT DIPPED GALVANIZED AFTER FABRICATION.

City of Lindsay

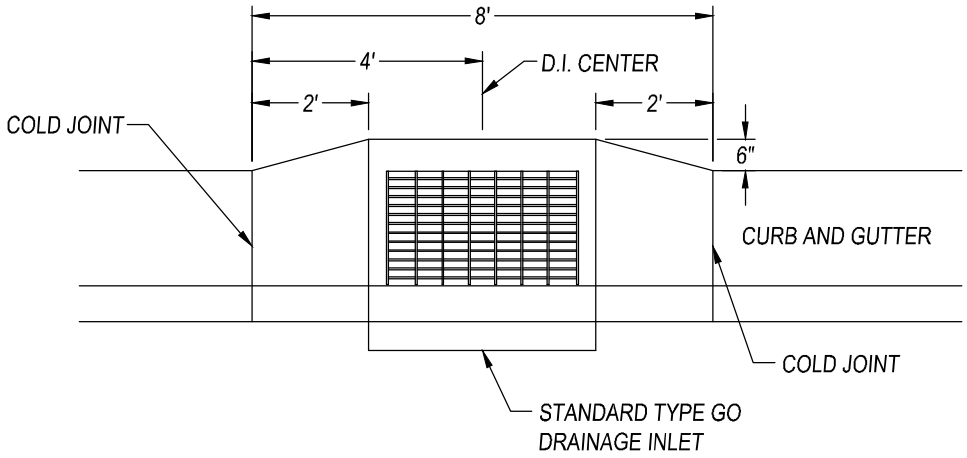
CITY SERVICES DEPARTMENT

DRAINAGE INLET - GO TYPE FRAME AND GRATE DETAIL

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-1
			DATE 03/06/25	2 OF 2



TYPE GO DRAINAGE INLET (D.I.)
INSTALLED AT CURB RETURN



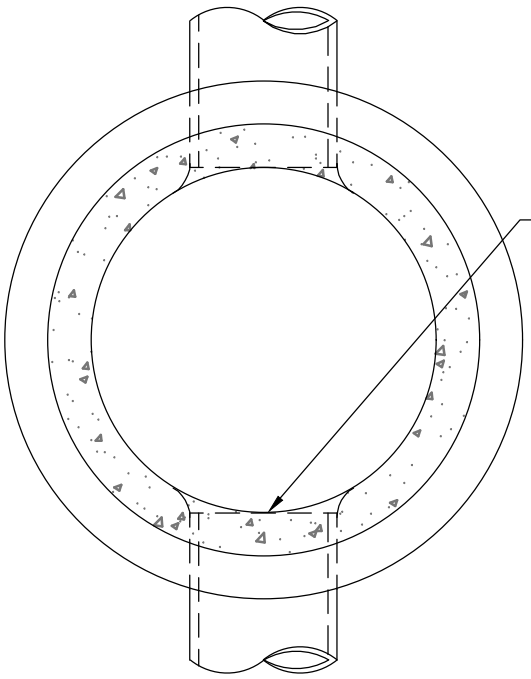
TYPE GO DRAINAGE INLET (D.I.)
INSTALLED MID-BLOCK

City of Lindsay

CITY SERVICES DEPARTMENT

MISCELLANEOUS DRAINAGE INLET DETAILS

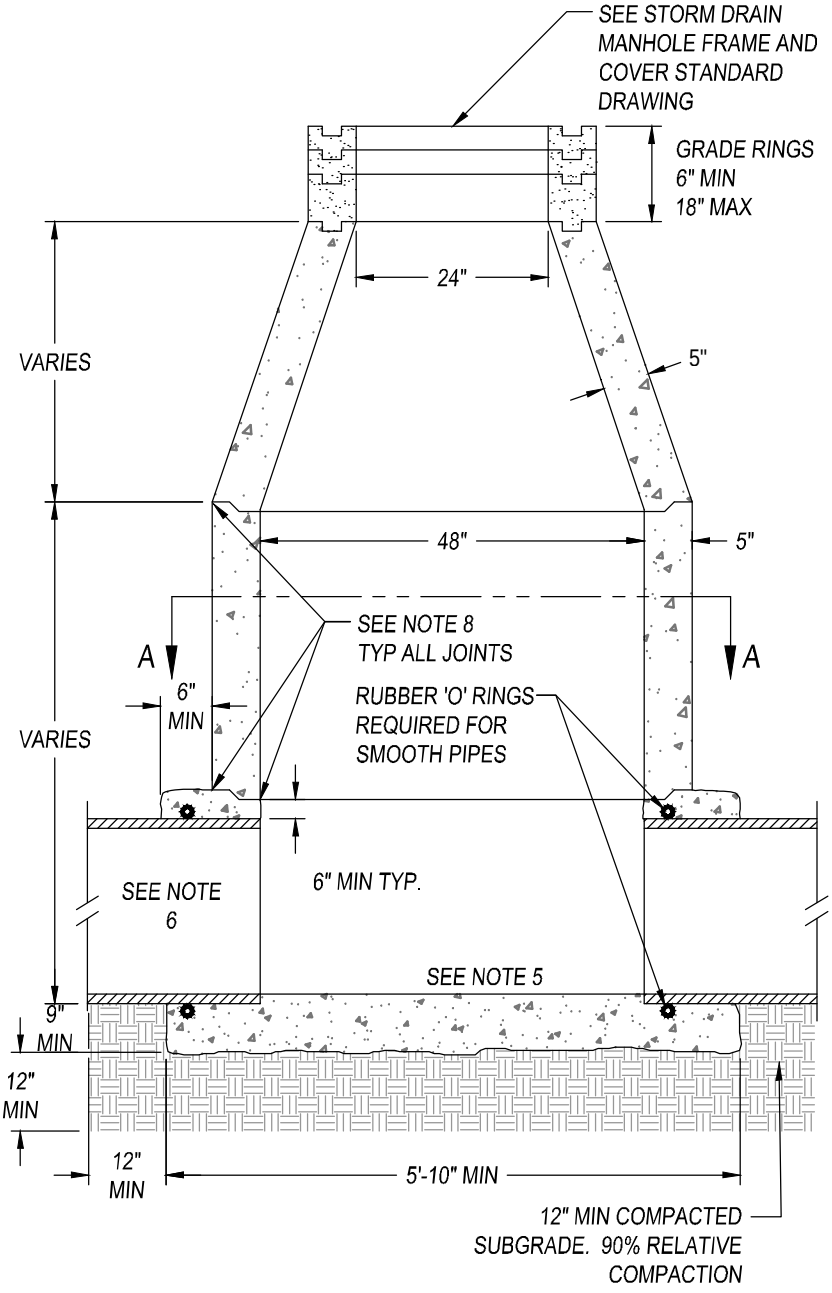
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-2
			DATE 03/06/25	



SECTION A-A

NOTES:

1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. SUMP BOTTOM MANHOLES ARE REQUIRED ON ALL STORM DRAIN SYSTEMS WITH PUMPS. 18" SUMP BELOW PIPE INVERT WHERE REQUIRED. SEE STORM DRAIN MANHOLE SUMP REQUIREMENTS STANDARD DRAWING.
6. 48" MANHOLES ARE REQUIRED FOR STORM DRAIN PIPE SIZES FROM 12" TO 24" OR AS REQUIRED BY THE CITY ENGINEER.
7. EXFILTRATION TEST REQUIRED AS PER ASTM C969-02, AS IMPLEMENTED BY CITY OF LINDSAY.
8. SEE STORM DRAIN MANHOLE JOINT FINISHING REQUIREMENTS STANDARD DRAWING.

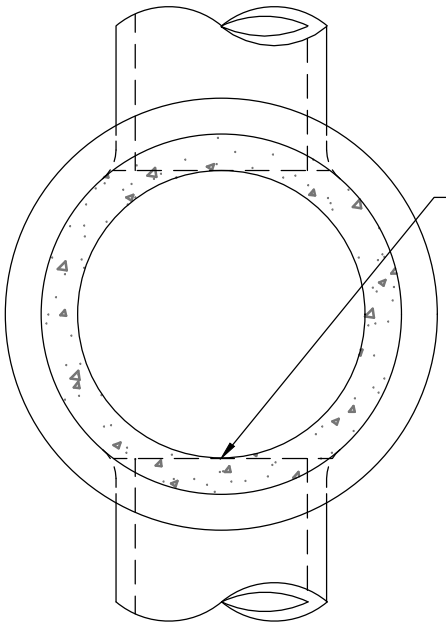


City of Lindsay

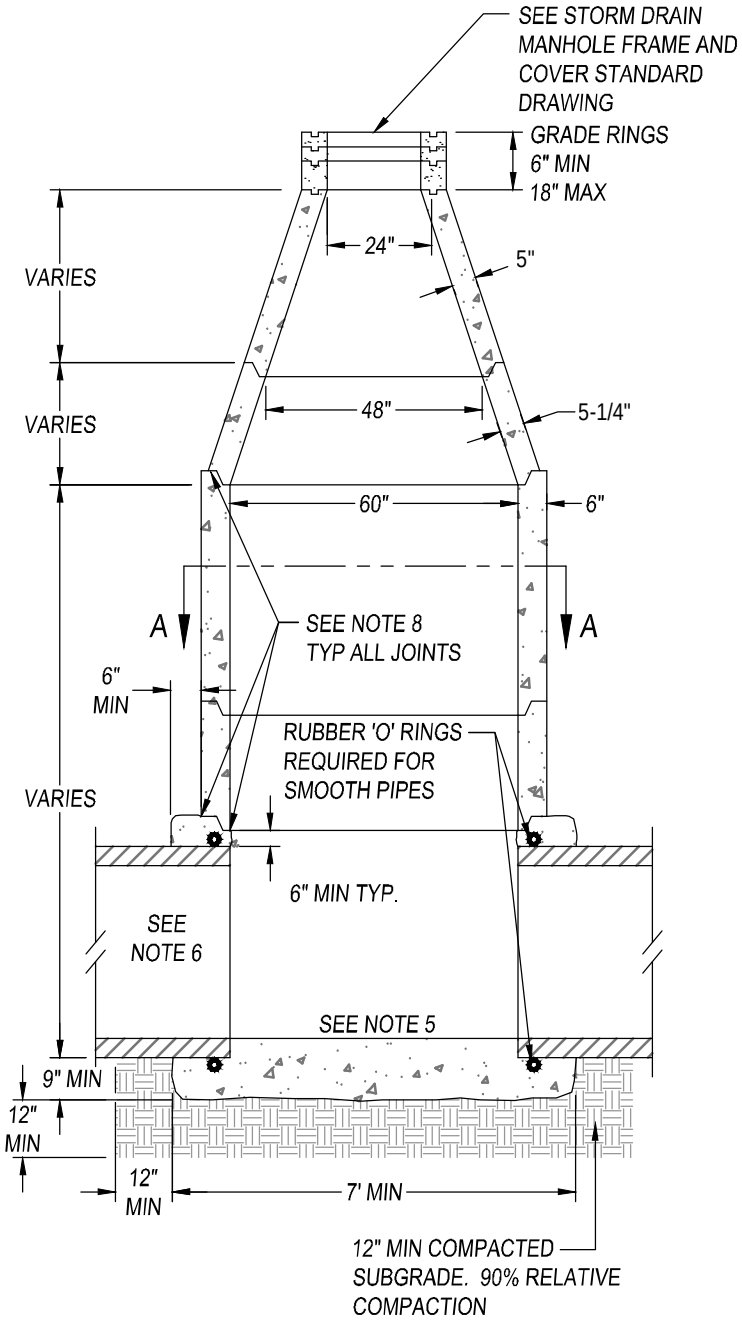
CITY SERVICES DEPARTMENT

48" STORM DRAIN MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-3
			DATE 03/06/25	



SECTION A-A



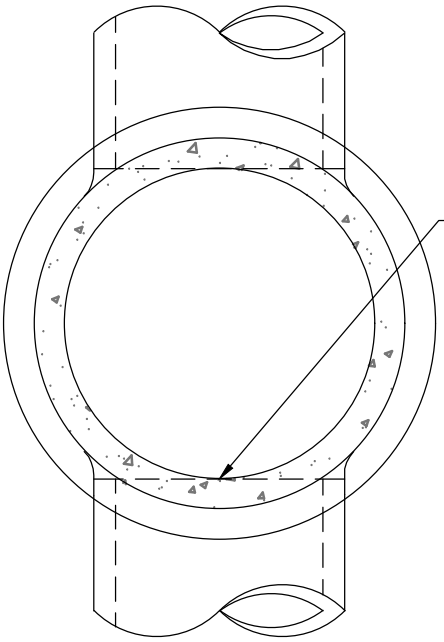
NOTES:

1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. SUMP BOTTOM MANHOLES ARE REQUIRED ON ALL STORM DRAIN SYSTEMS WITH PUMPS. 18" SUMP BELOW PIPE INVERT WHERE REQUIRED. SEE STORM DRAIN MANHOLE SUMP REQUIREMENTS STANDARD DRAWING.
6. 60" MANHOLES ARE REQUIRED FOR STORM DRAIN PIPE SIZES FROM 27" TO 36" OR AS REQUIRED BY THE CITY ENGINEER.
7. EXFILTRATION TEST REQUIRED AS PER ASTM C969-02, AS IMPLEMENTED BY CITY OF LINDSAY.
8. SEE STORM DRAIN MANHOLE JOINT FINISHING REQUIREMENTS STANDARD DRAWING.

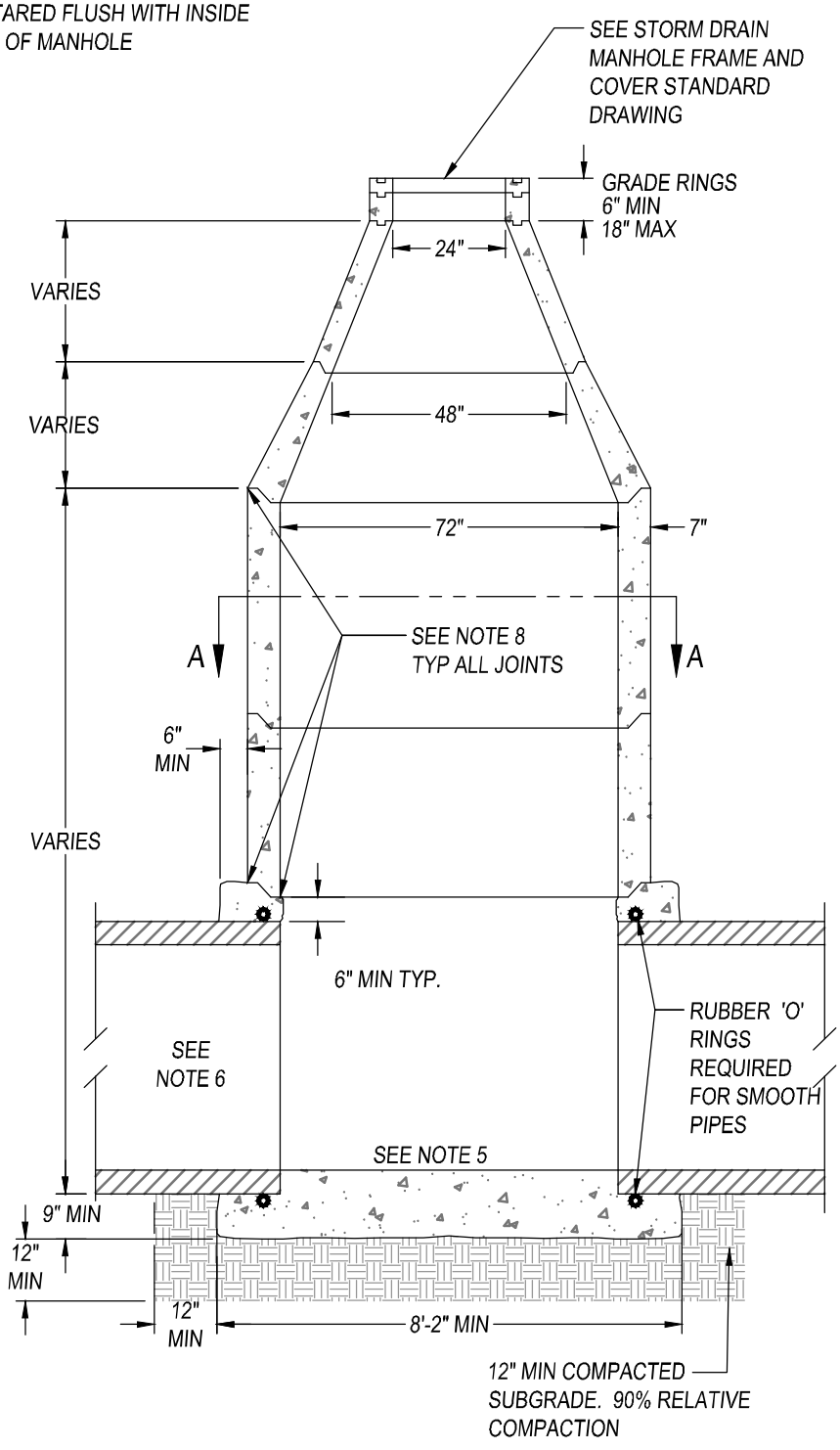
CITY SERVICES DEPARTMENT

60" STORM DRAIN MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-4
			DATE 03/06/25	



SECTION A-A



NOTES:

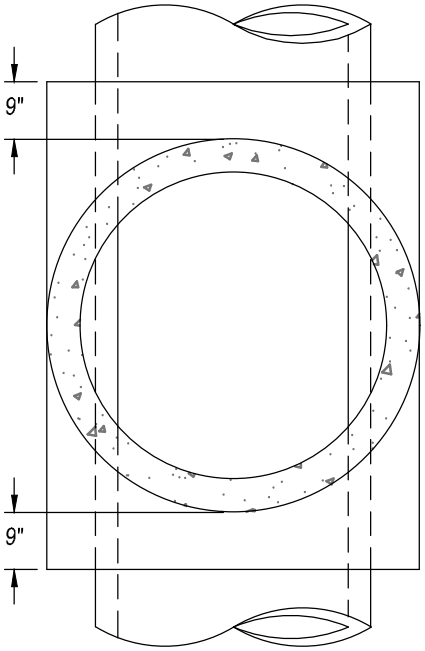
1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. SUMP BOTTOM MANHOLES ARE REQUIRED ON ALL STORM DRAIN SYSTEMS WITH PUMPS. 18" SUMP BELOW PIPE INVERT WHERE REQUIRED. SEE STORM DRAIN MANHOLE SUMP REQUIREMENTS STANDARD DRAWING.
6. 72" MANHOLES ARE REQUIRED FOR STORM DRAIN PIPE SIZES FROM 39" AND LARGER OR AS REQUIRED BY THE CITY ENGINEER.
7. EXFILTRATION TEST REQUIRED AS PER ASTM C969-02, AS IMPLEMENTED BY CITY OF LINDSAY.
8. SEE STORM DRAIN MANHOLE JOINT FINISHING REQUIREMENTS STANDARD DRAWING .

City of Lindsay

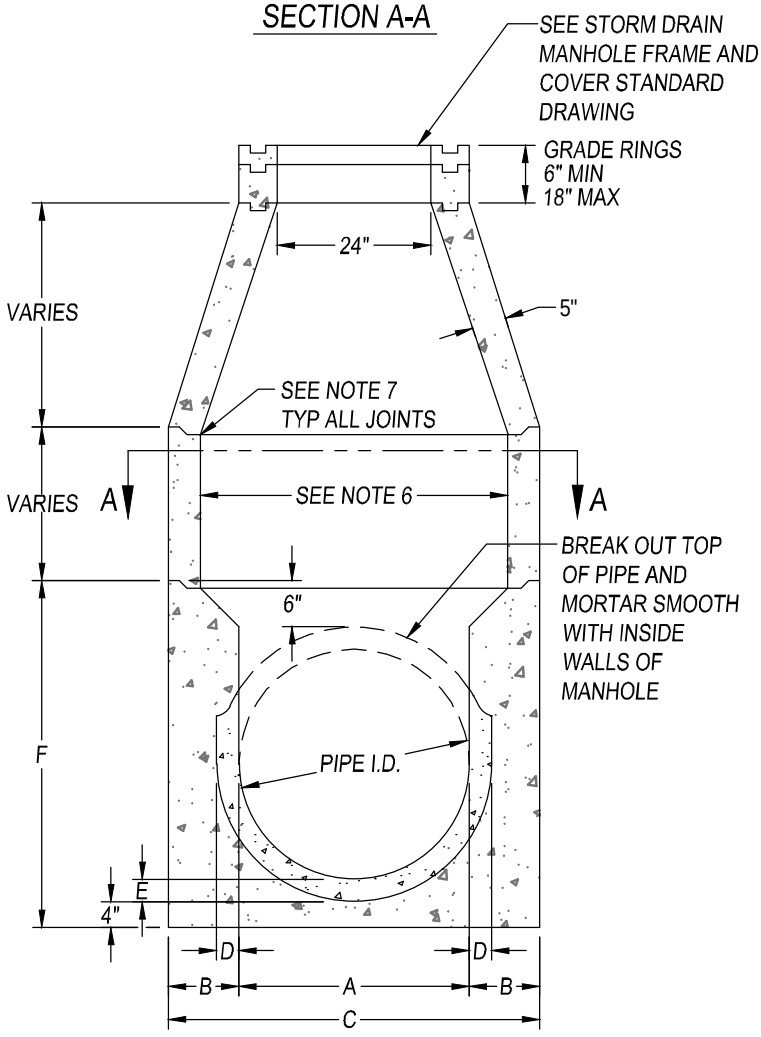
CITY SERVICES DEPARTMENT

72" STORM DRAIN MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-5
			DATE 03/06/25	



SECTION A-A



NOTES:

1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. EXFILTRATION TEST REQUIRED AS PER ASTM C969-02, AS IMPLEMENTED BY CITY OF LINDSAY.
6. MANHOLE SHALL BE SIZED TO MATCH MANHOLE BASE. 48" MINIMUM INNER DIAMETER MANHOLE IS REQUIRED.
7. SEE STORM DRAIN MANHOLE JOINT FINISHING REQUIREMENTS STANDARD DRAWING.

PIPE I.D.	A	B	C	MIN D	E	F
24"	24"	17"	58"	3"	3"	40"
27"	27"	15-1/2"	58"	3"	3"	43"
30"	30"	14"	58"	3"	3"	46"
36"	36"	17"	70"	3-1/2"	3-1/2"	53"
42"	42"	15"	72"	4"	4"	60"
48"	48"	12"	72"	5"	5"	68"
54"	54"	10-1/2"	75"	5-1/2"	5-1/2"	75"
60"	60"	11"	82"	6"	6"	82"
66"	66"	11-1/2"	89"	6-1/2"	6-1/2"	89"
72"	72"	12"	96"	7"	7"	96"

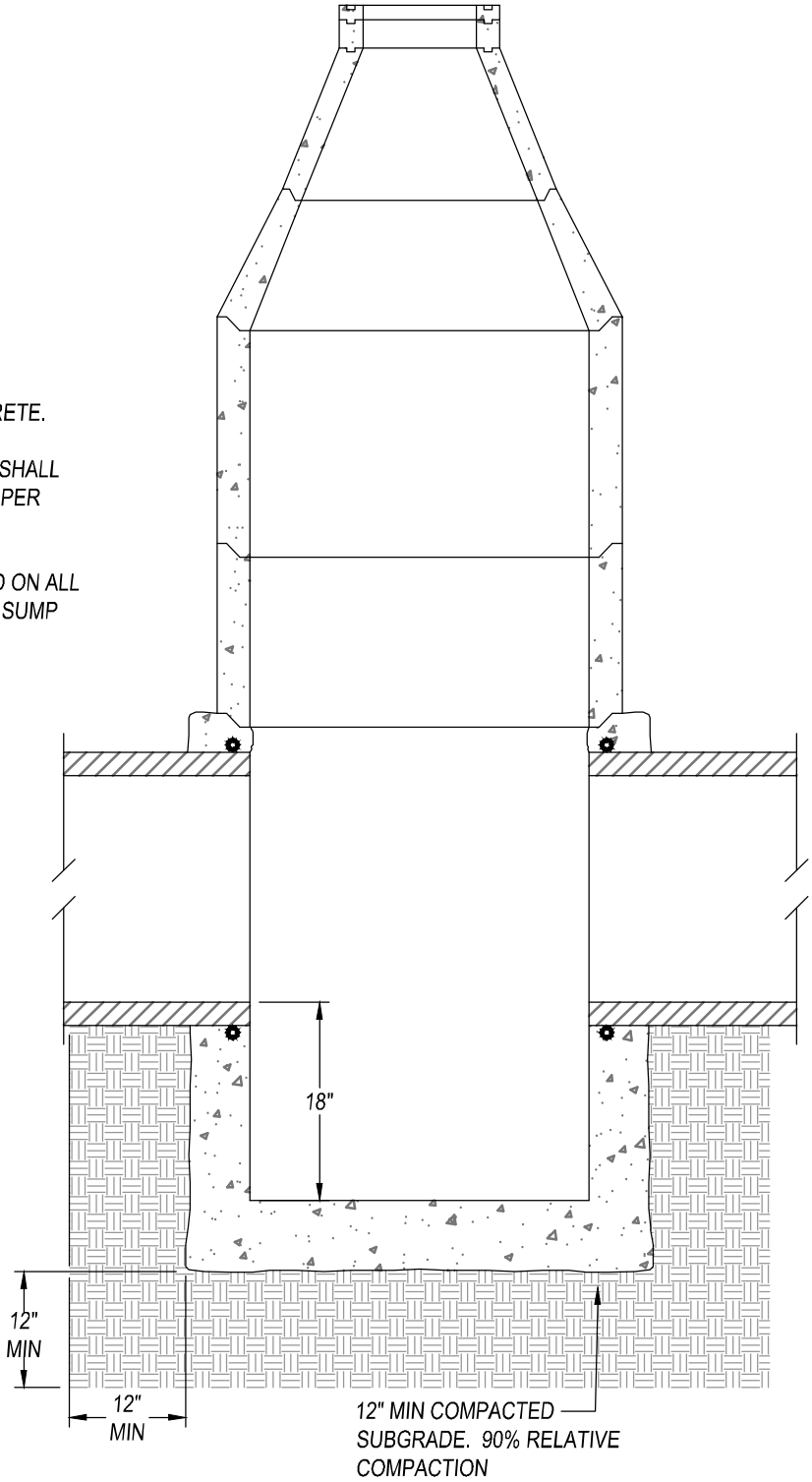
CITY SERVICES DEPARTMENT

CAST IN PLACE CONCRETE PIPE MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SD-6
			DATE	03/06/25	

NOTES:

1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. SUMP BOTTOM MANHOLES ARE REQUIRED ON ALL STORM DRAIN SYSTEMS WITH PUMPS. 18" SUMP BELOW PIPE INVERT.

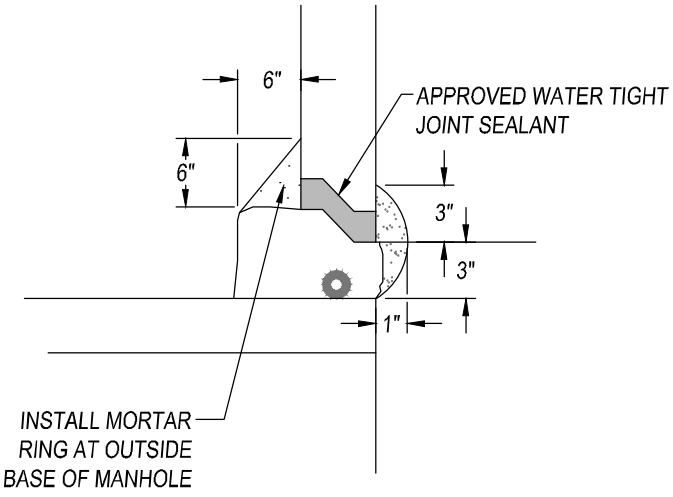


City of Lindsay

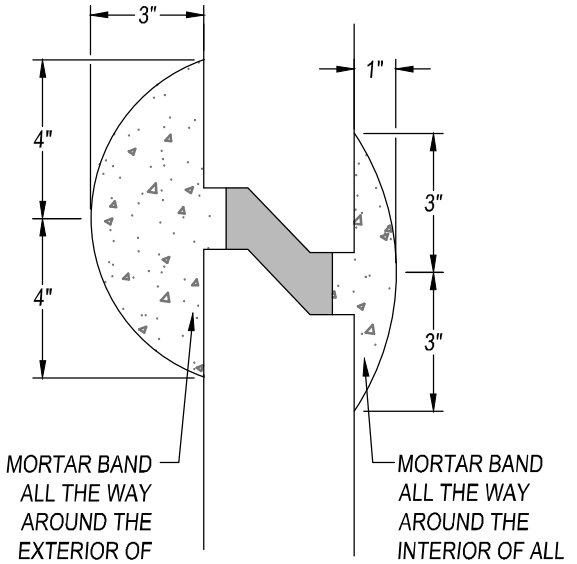
CITY SERVICES DEPARTMENT

STORM DRAIN MANHOLE SUMP REQUIREMENTS

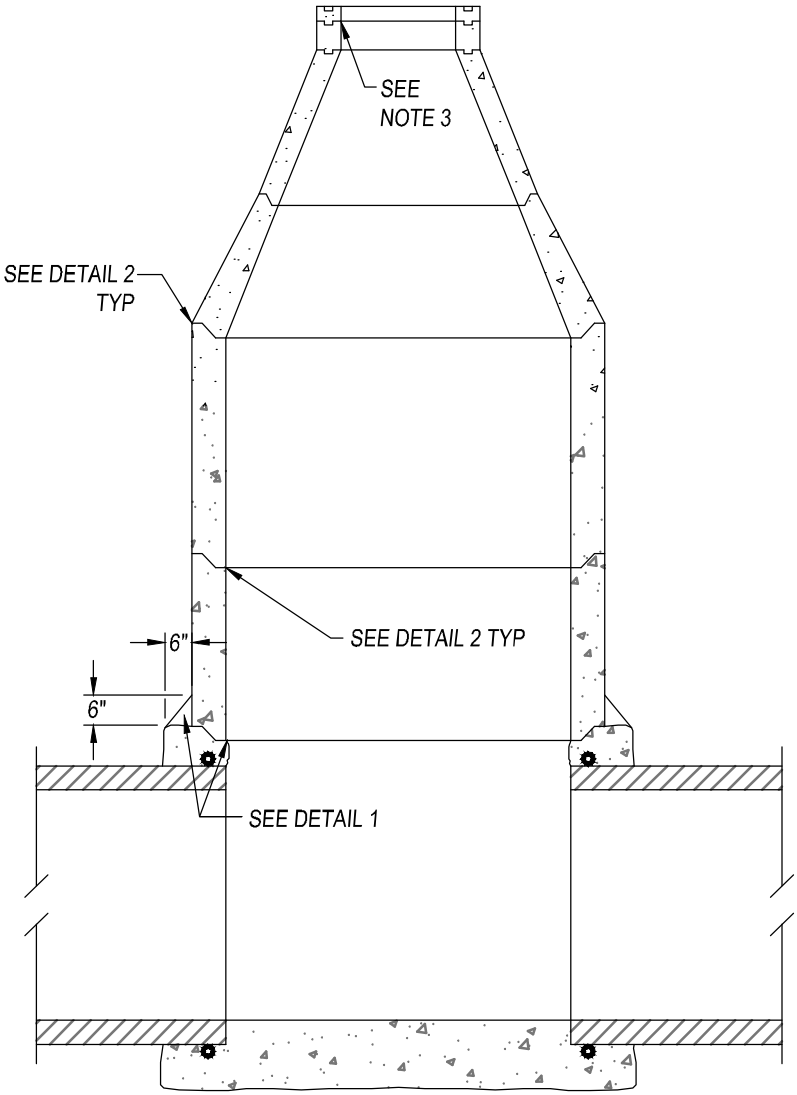
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-7
			DATE 03/06/25	



DETAIL 1



DETAIL 2



NOTES:

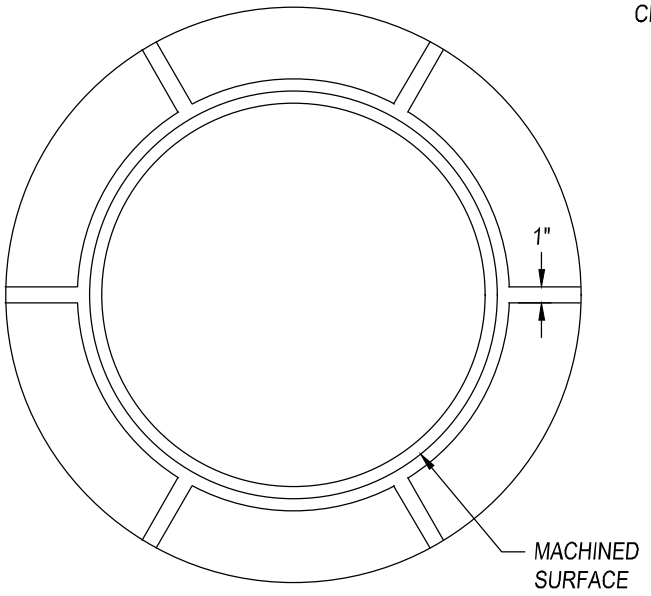
1. ALL JOINTS SHALL BE FINISHED WITH MORTAR AS SHOWN AND/OR NOTED ON THIS DETAIL.
2. MORTAR MIXTURE SHALL BE ONE PART CEMENT PER TWO PARTS SAND.
3. MORTAR INSIDE OF GRADE RINGS TO A SMOOTH SURFACE.
4. ALL JOINTS SHALL BE WATER TIGHT.

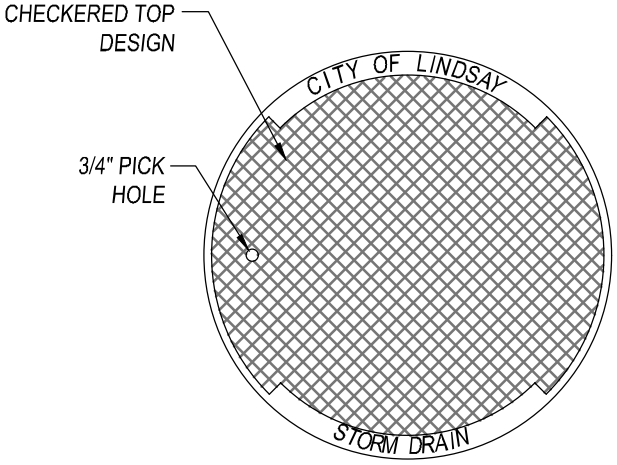
City of Lindsay

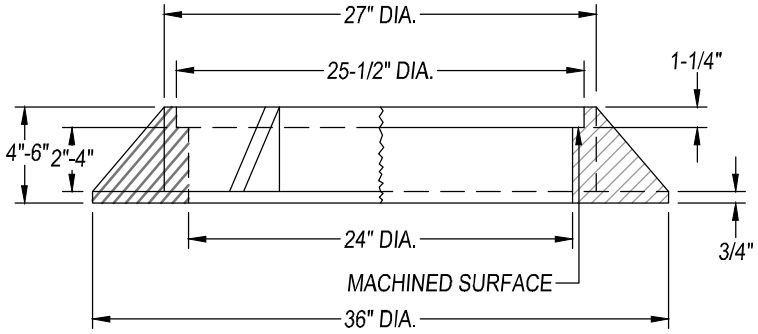
CITY SERVICES DEPARTMENT

STORM DRAIN MANHOLE JOINT FINISHING REQUIREMENTS

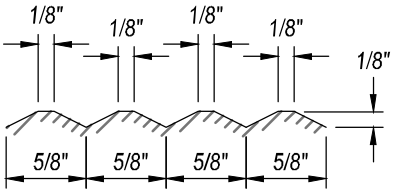
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-8
			DATE 03/06/25	

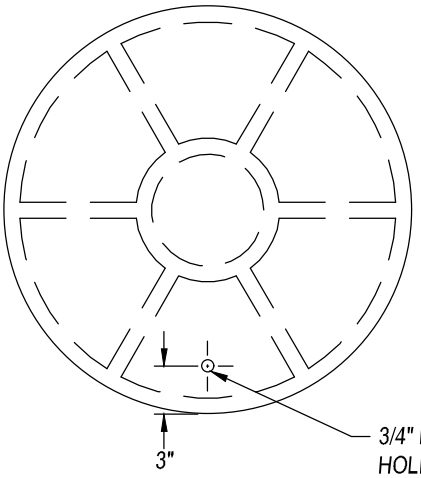


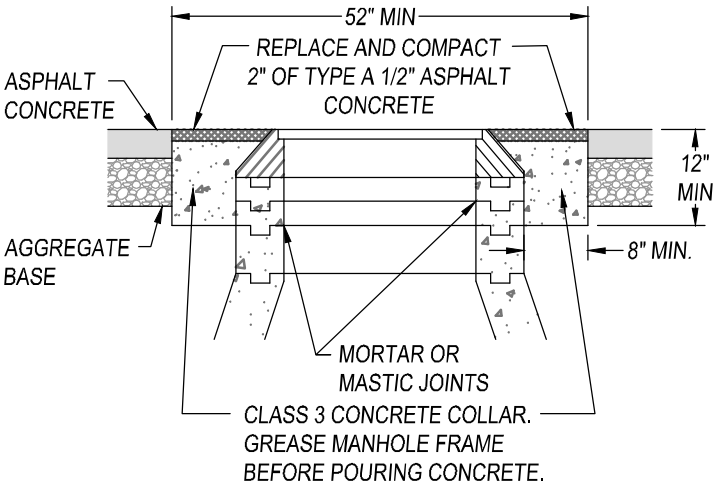




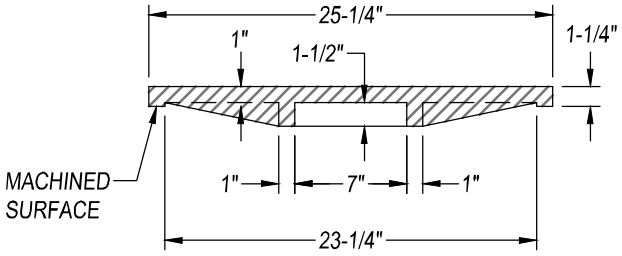
MANHOLE FRAME







MANHOLE ADJUSTMENT



MANHOLE COVER

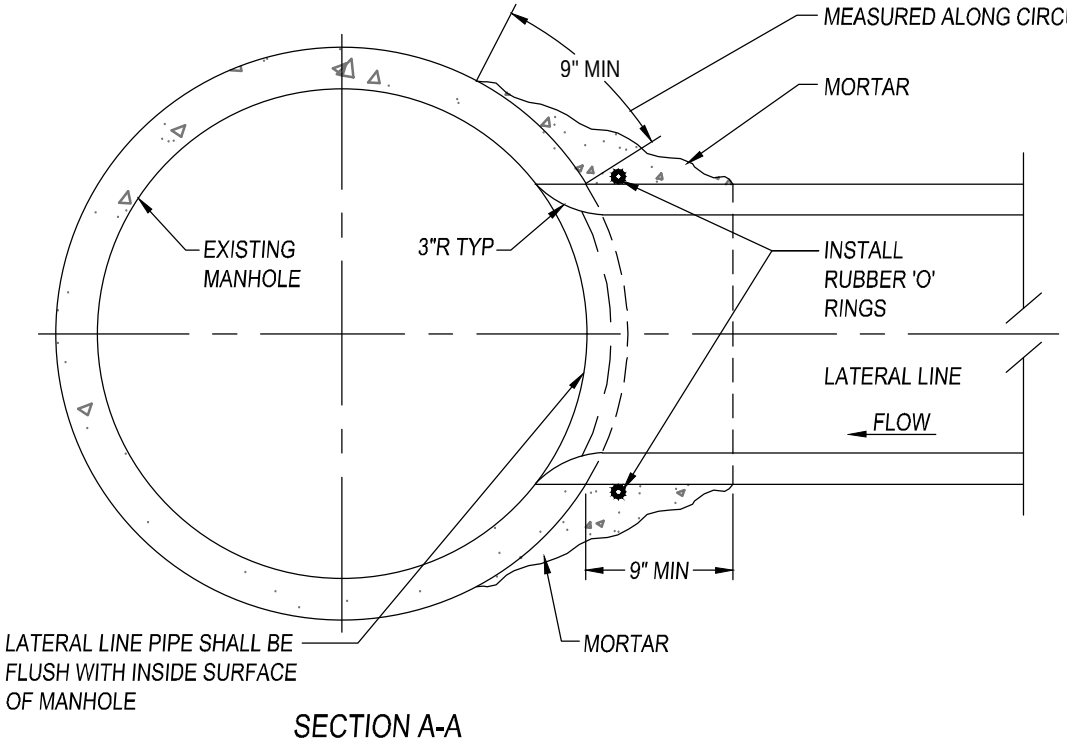
NOTE: FRAME AND COVER SHALL MATCH CROSS SLOPE

City of Lindsay

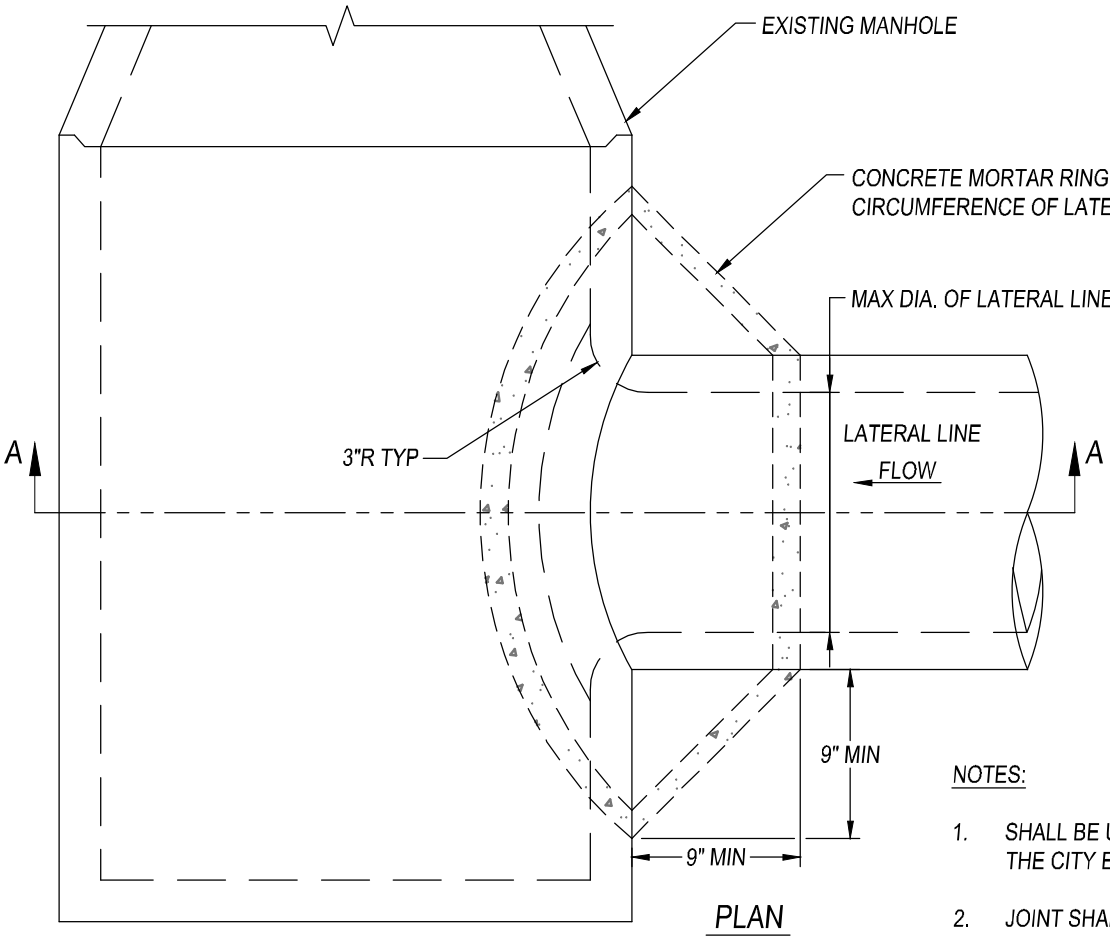
CITY SERVICES DEPARTMENT

STORM DRAIN MANHOLE FRAME AND COVER

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-9
			DATE 03/06/25	



SECTION A-A



PLAN

NOTES:

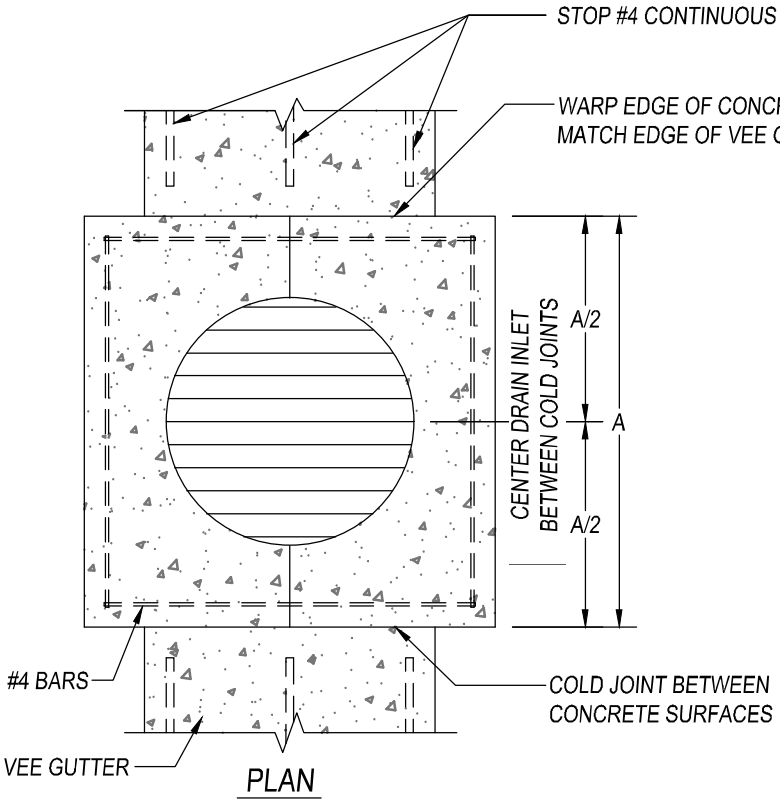
1. SHALL BE USED ONLY AS APPROVED BY THE CITY ENGINEER.
2. JOINT SHALL BE WATER TIGHT.

City of Lindsay

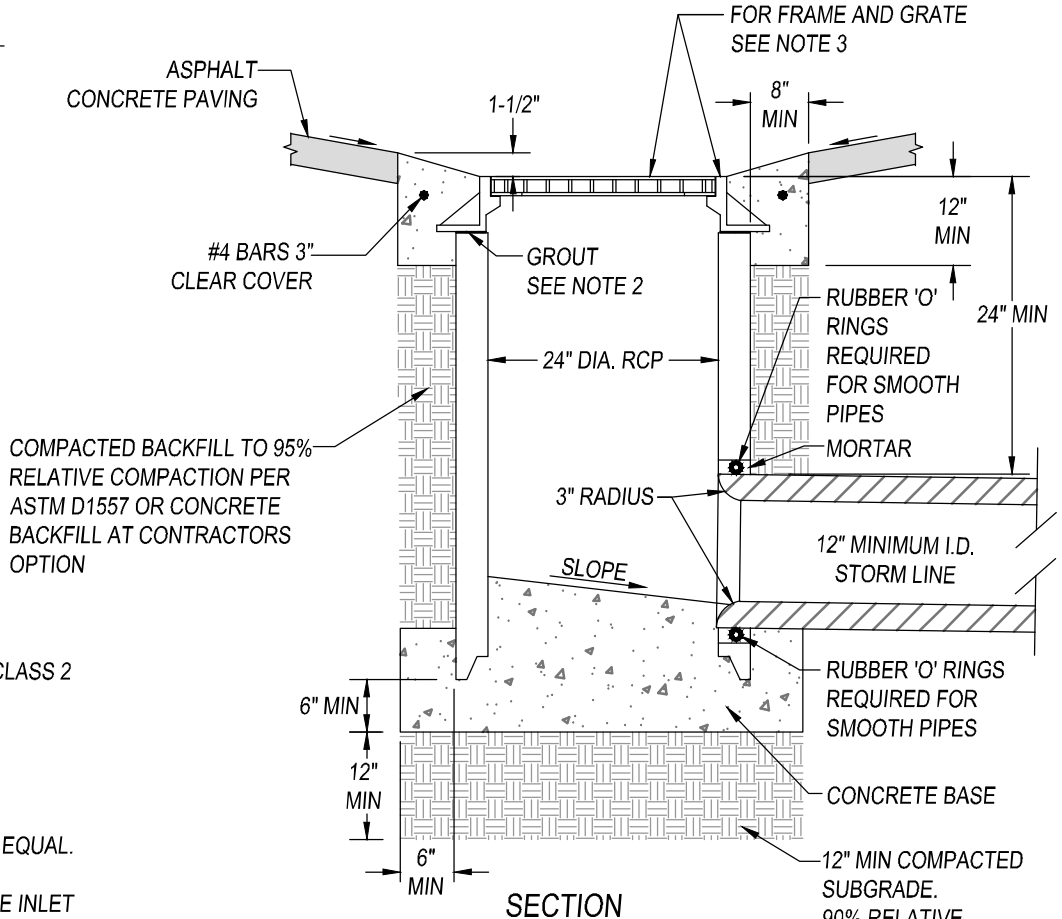
CITY SERVICES DEPARTMENT

LATERAL LINE CONNECTION AT EXISTING MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-10
			DATE 03/06/25	



PLAN



SECTION

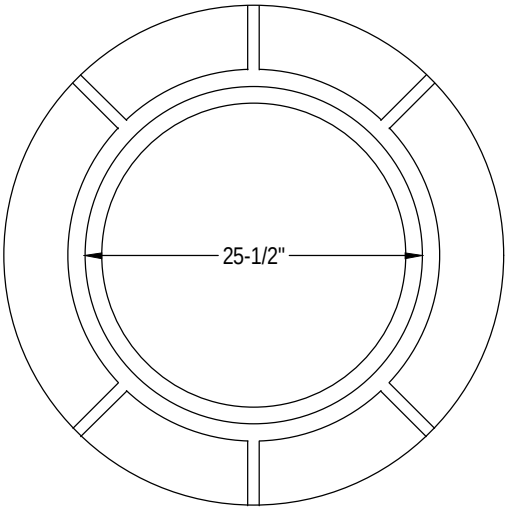
NOTES:

1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. GROUT SHALL BE A HIGH STRENGTH, SHRINKAGE COMPENSATING, NON-METALLIC GROUT, OR EQUAL.
3. SEE VEE GUTTER DRAINAGE INLET FRAME AND GRATE STANDARD DRAWING.

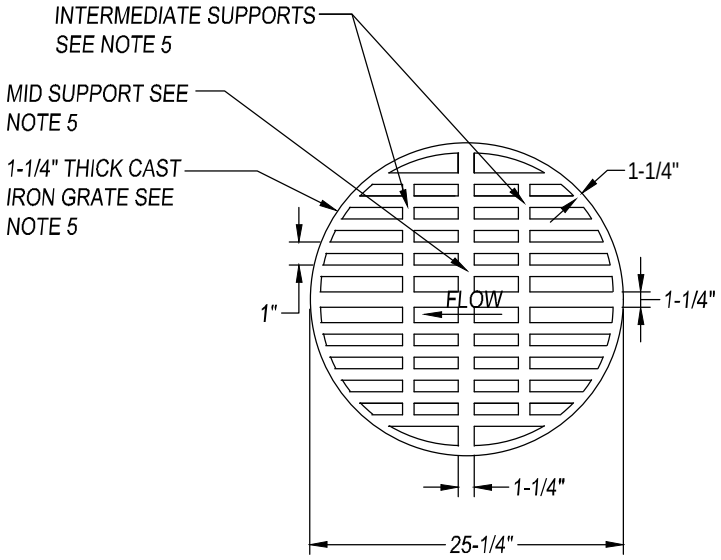
CITY SERVICES DEPARTMENT

VEE GUTTER DRAINAGE INLET

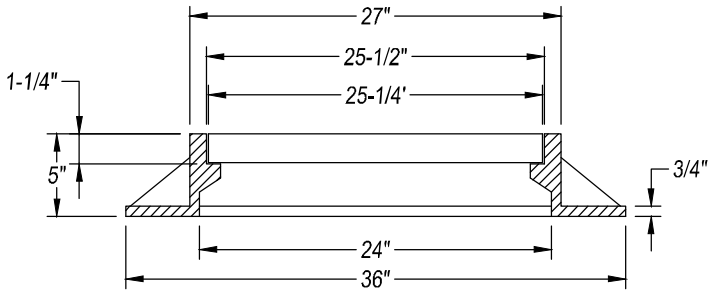
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-11
			DATE 03/06/25	



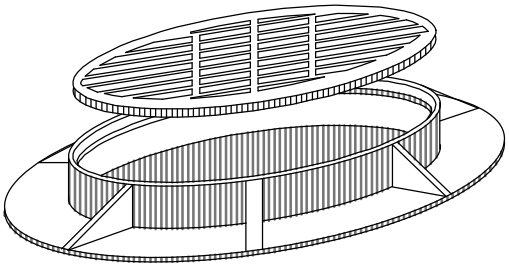
FRAME
PLAN



GRATE
PLAN



FRAME
SECTION



PERSPECTIVE

NOTES:

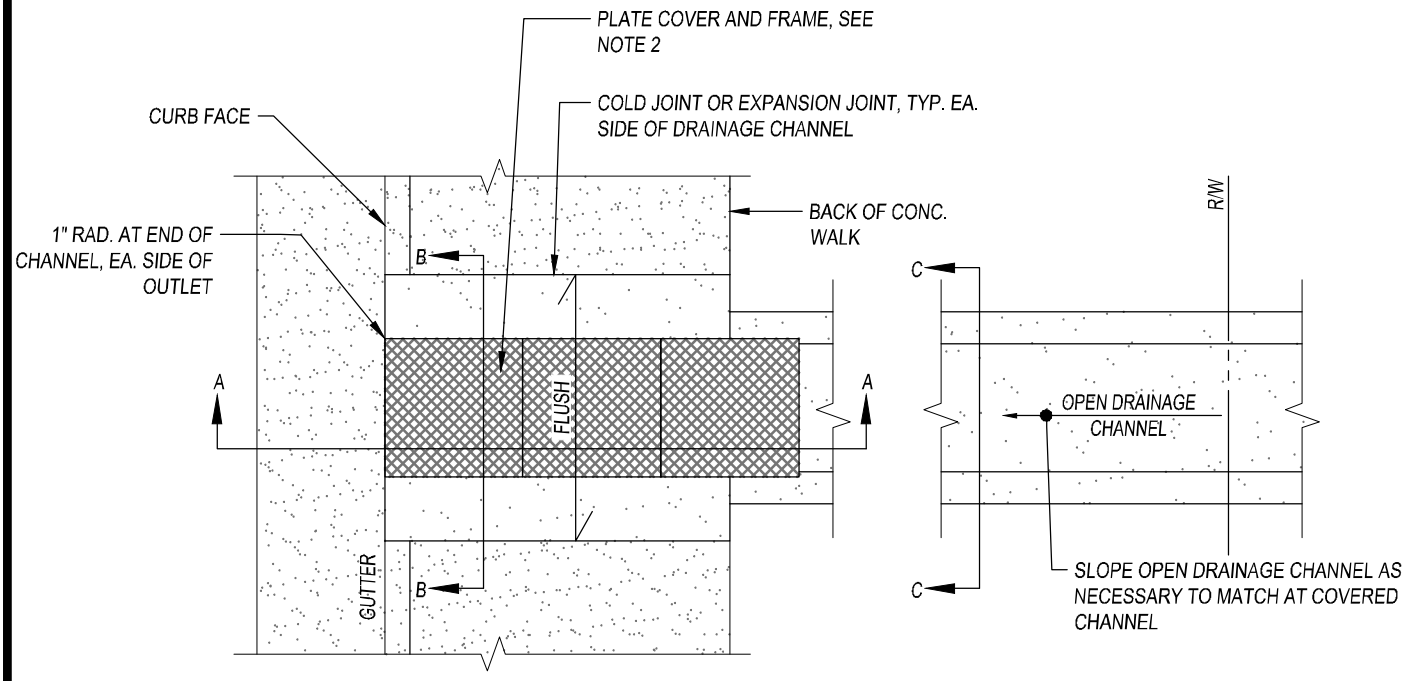
1. ALL DIMENSIONS ARE FINISHED DIMENSIONS. FRAME AND COVER BEARING SURFACE TO BE MACHINED TO ASSURE CLOSE, QUIET FIT.
2. CONSTRUCTION MATERIAL SHALL BE CAST IRON, DIPPED IN BLACK BITUMINOUS PAINT.
3. FRAME AND GRATE TO BE CONSTRUCTED IN ACCORDANCE WITH ASTM DESIGNATION 48, CLASS 35B, AND EXCEED H20 WHEEL LOADING.
4. GRATE TO BE INSTALLED SUCH THAT THE SLOTS ARE PARALLEL WITH THE DIRECTION OF WATER FLOW.
5. GRATES WITH MID AND INTERMEDIATE SUPPORTS SHALL BE USED AT ALL LOCATIONS WHERE BICYCLE OR OTHER WHEELED TRANSPORT SUCH AS WHEEL CHAIRS CAN BE ANTICIPATED. COVERS WITHOUT INTERMEDIATE SUPPORTS SHALL NOT BE USED WITHOUT APPROVAL OF THE CITY ENGINEER.
6. ALL GRATES SHALL HAVE A MINIMUM OPEN AREA OF 1.0 SQUARE FEET AND A MINIMUM WEIR PERIMETER OF 6.0 LINEAR FEET. ENGINEER OF RECORD SHALL BE RESPONSIBLE FOR VERIFYING GRATES MEET DRAINAGE REQUIREMENTS.
7. IF GRATE IS LOCATED IN A DESIGNATED ACCESSIBLE PATH OF TRAVEL, GRATE SHALL BE A.D.A. COMPLIANT.

City of Lindsay

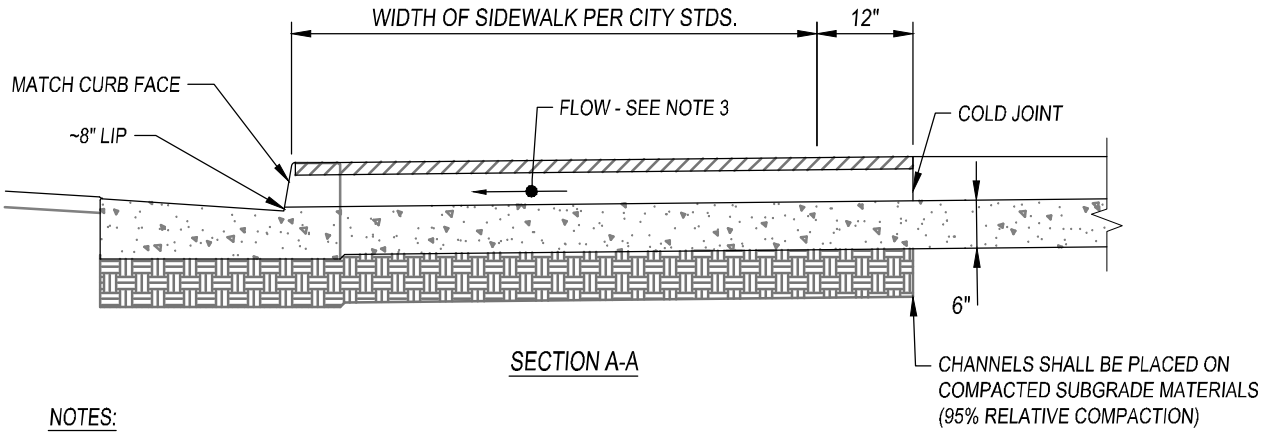
CITY SERVICES DEPARTMENT

VEE GUTTER INLET FRAME & GRATE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-12
			DATE 03/06/25	



PLAN VIEW



SECTION A-A

NOTES:

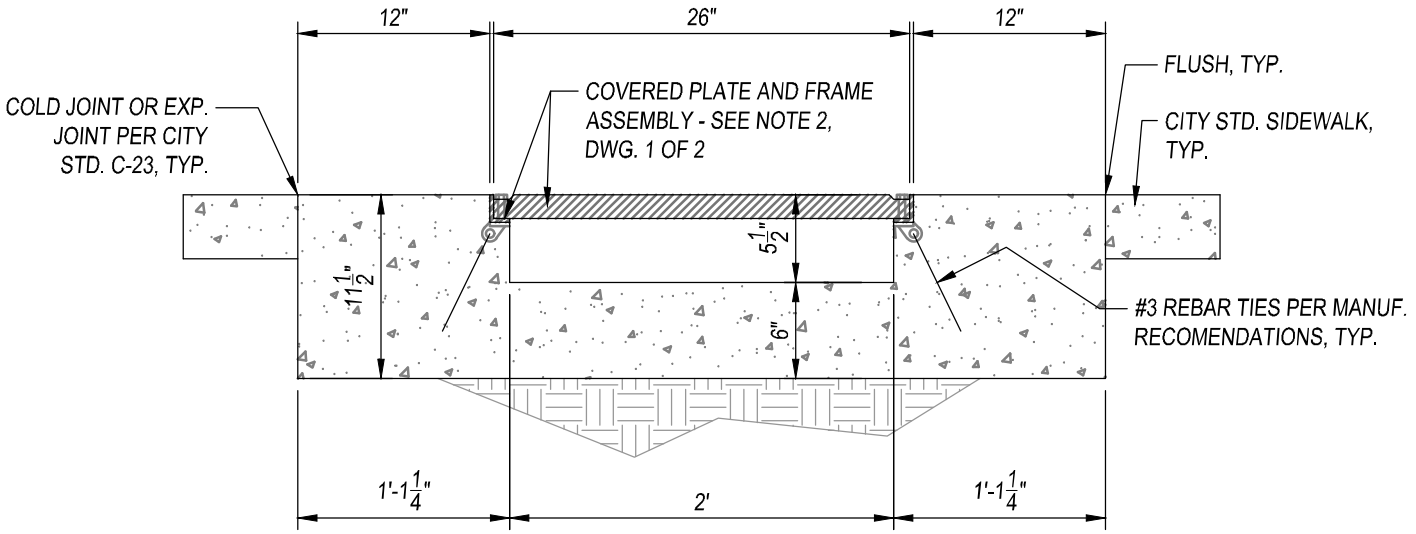
1. SEE SHEET 2 OF 2 FOR ADDITIONAL INFORMATION.
2. FRAME AND COVERS SHALL BE "NEENAH" R-4999, TYPE D, SOLID TOP BOLTED WITH PERMA-GRIP SURFACE OR APPROVED EQUAL. THERE SHALL BE A $\frac{1}{8}$" SPACE BETWEEN THE FRAME AND THE LID. INSTALL FRAME AND COVERS IN ACCORDANCE WITH MANUFACTURE'S RECOMMENDATIONS WITH THE EXCEPTION OF REBAR. THE ONLY REBAR REQUIRED FOR THIS INSTALLATION ARE THE #3 FRAME ANCHOR TIE BARS. SIDEWALK, FRAME, AND COVER SHALL BE FLUSH WHEN COMPLETE.
3. COVERED CHANNEL SLOPE SHALL BE NO LESS THAN 1.0% AND MORE THAN 2.0% AND SHALL BE PARALLEL WITH SIDEWALK SURFACE CROSS SLOPE.
4. ROUND ALL EXPOSED CONCRETE CORNERS WITH $\frac{1}{2}$" RADIUS TYPICAL.
5. HEIGHT VARIES TO MATCH UP WITH COVERED SIDEWALK UNDERDRAIN CHANNEL AND PROVIDE POSITIVE FLOW TO STREET.
6. ALL CONCRETE SHALL BE CLASS 2. ALL CONCRETE SHALL HAVE A LIGHT BROOM FINISH. WEAKENED PLANE JOINTS SHALL BE CONSTRUCTED AT 16' CTR'S AND SHALL BE FINISHED WITH A SCORING TOOL. LEAVING EDGES ROUNDED.

City of Lindsay

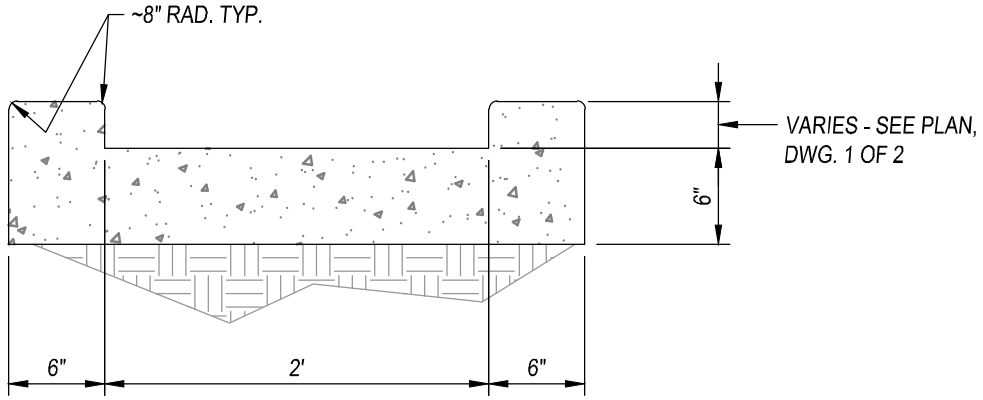
CITY SERVICES DEPARTMENT

RESIDENTIAL SIDEWALK DRAIN

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SD-13
			DATE	03/06/25	1 OF 2



SECTION B-B



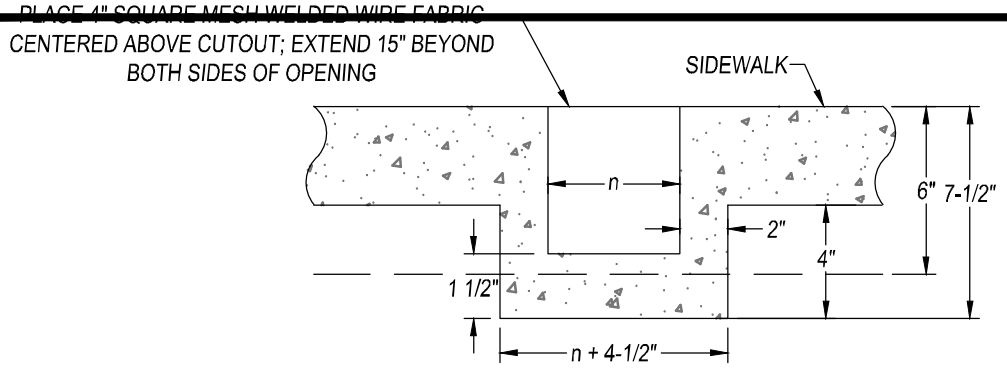
SECTION C-C

City of Lindsay

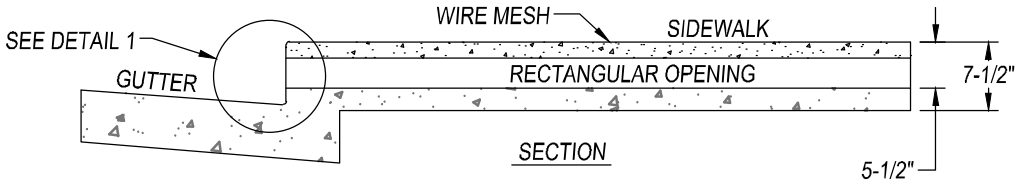
CITY SERVICES DEPARTMENT

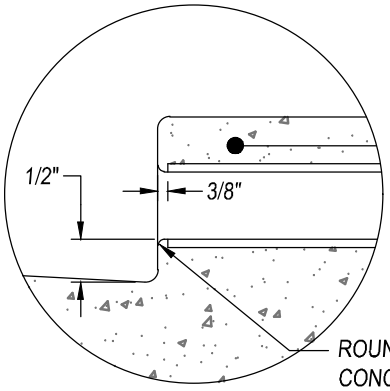
RESIDENTIAL SIDEWALK DRAIN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-13
			DATE 03/06/25	2 OF 2

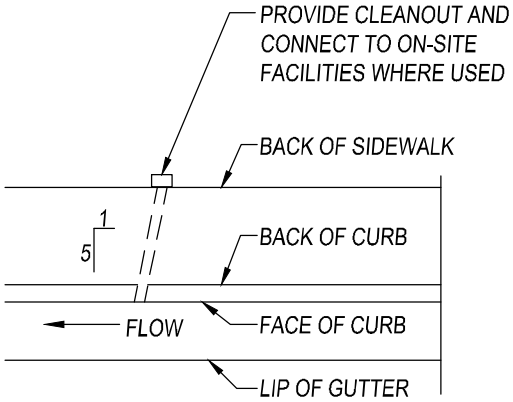


5 1/2" X n" RECTANGULAR OPENING





DETAIL 1
SEE NOTE 6



DETAIL 2
SEE NOTE 5

NOTES:

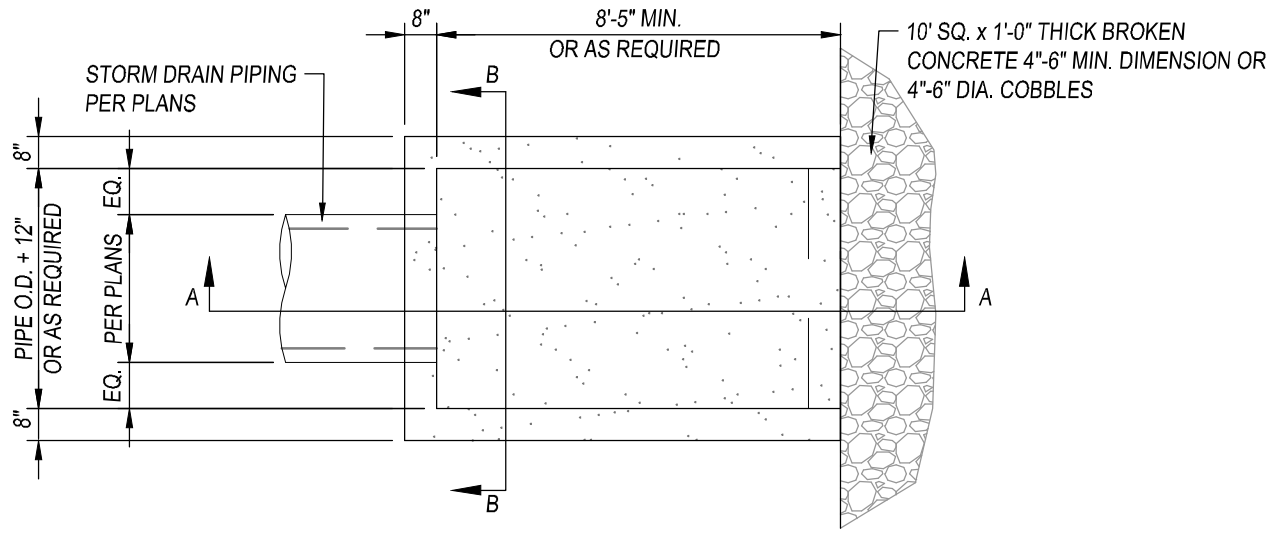
1. SLOPE SHALL MATCH CROSS GRADE OF SIDEWALK.
2. NO DRAIN SHALL BE PERMITTED IN DRIVE APPROACH AREAS.
3. DRAINS SHALL BE ANGLED THROUGH SIDEWALK IN DIRECTION OF GUTTER FLOW. SEE DETAIL 2.
4. CUT SHALL BE SQUARE AND ROUNDED WITH FACE OF CURB. SEE DETAIL 1.
5. PERMITTED SIZE AND NUMBER OF CUTS TO BE BASED ON DRAINAGE AREA AND SHALL BE DETERMINED BY THE ENGINEER OF RECORD.
6. WHERE SIDEWALK AND CURB AND GUTTER EXIST, SIDEWALK AND CURB AND GUTTER SHALL BE REMOVED AND REPLACED TO THE NEAREST JOINT AND SHALL BE CONSTRUCTED PER APPLICABLE CITY OF LINDSAY STANDARD DRAWINGS.
7. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO OBTAIN AN ENCROACHMENT PERMIT FOR ANY WORK WITHIN THE CITY RIGHT OF WAY, INCLUDING THE REMOVAL AND REPLACEMENT OF THE SIDEWALK AND CURB AND GUTTER AND THE CONSTRUCTION OF THE RESIDENTIAL UNDER SIDEWALK DRAIN, FROM THE CITY OF LINDSAY CITY SERVICES DEPARTMENT.
8. THE ENGINEER OF RECORD SHALL DETERMINE THE NUMBER OF DRAINS REQUIRED.
9. WELDED WIRE MESH SHALL BE 4X4-W2.1XW2.1.

City of Lindsay

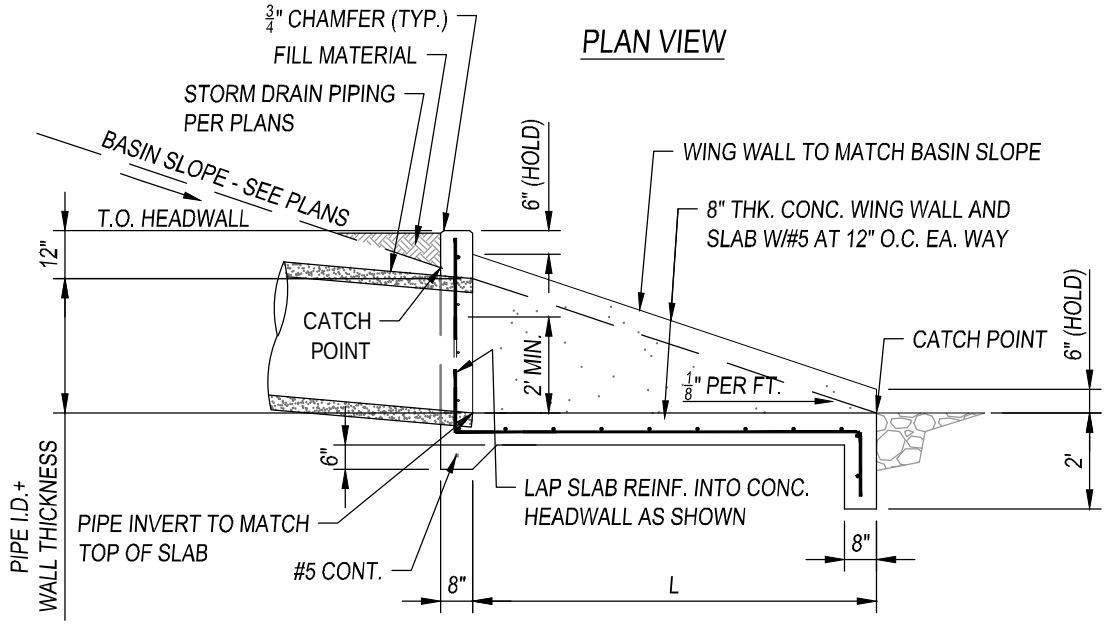
CITY SERVICES DEPARTMENT

COMMERCIAL SIDEWALK DRAIN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-14
			DATE 03/06/25	

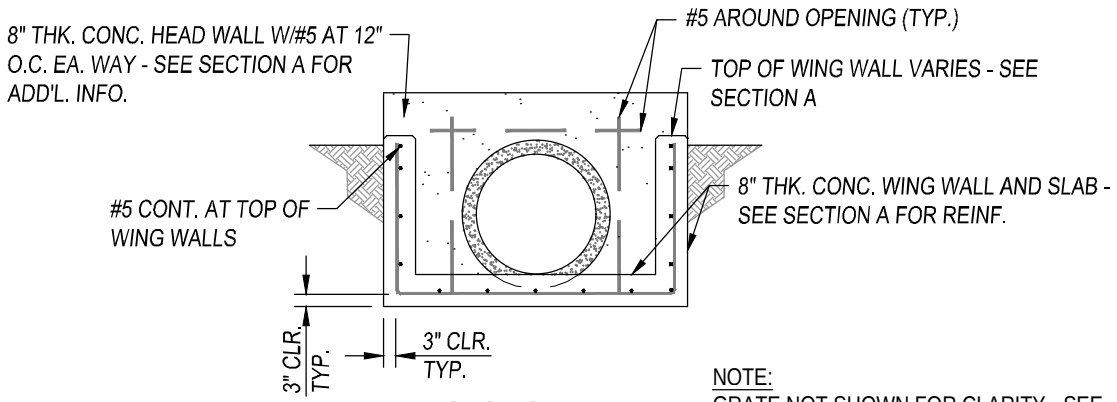


PLAN VIEW



L = [PIPE I.D. THICKNESS + PIPE WALL THICKNESS] X [BASIN SLOPE H:V]

SECTION A



SECTION B

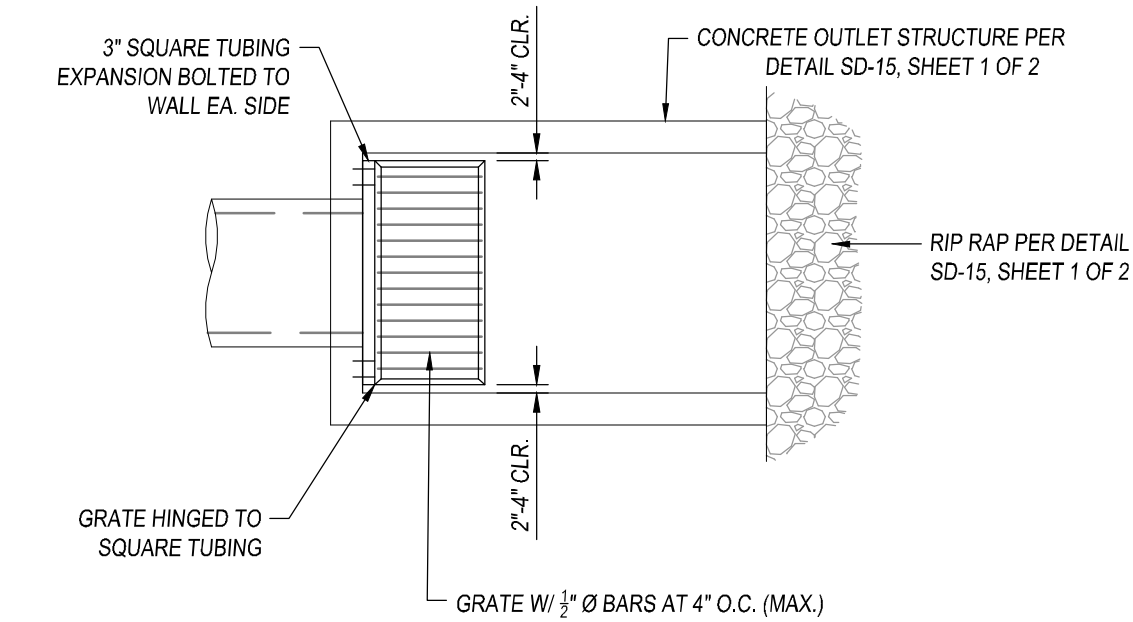
NOTE:
GRATE NOT SHOWN FOR CLARITY - SEE DETAIL SD-15 SHEET 2 OF 2

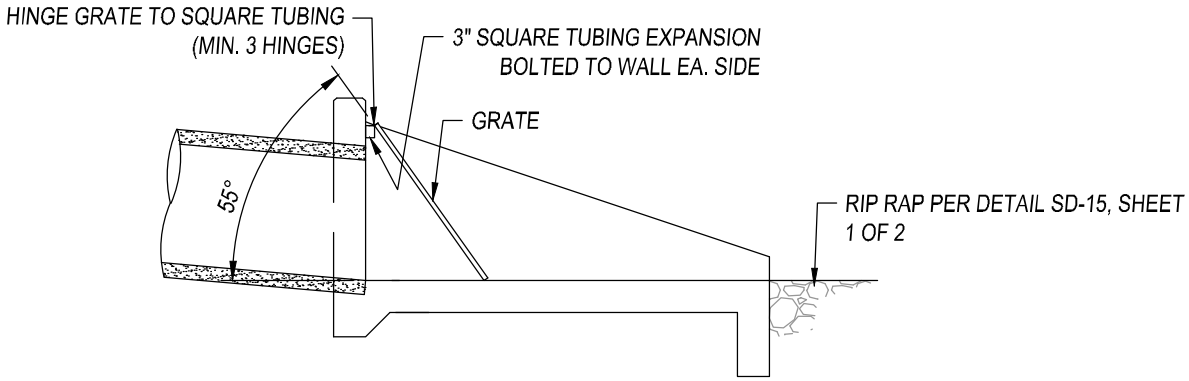
City of Lindsay

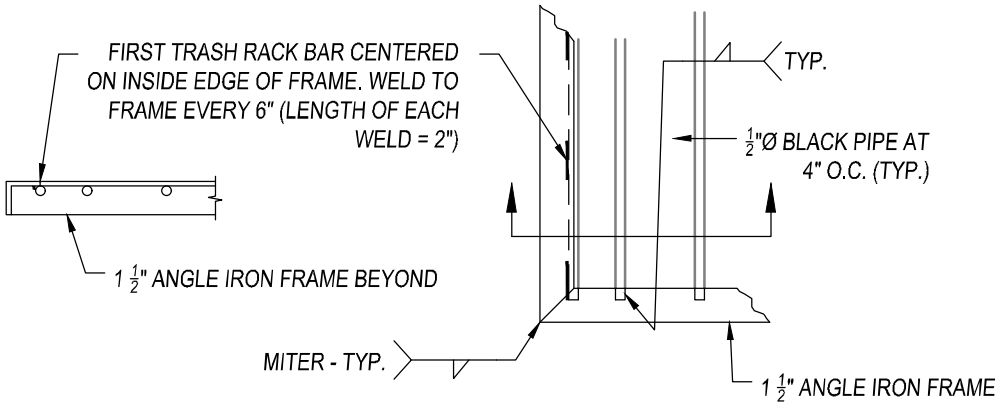
CITY SERVICES DEPARTMENT

CAST-IN-PLACE OUTLET STRUCTURE DETAIL

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-15
			DATE 03/06/25	1 OF 2





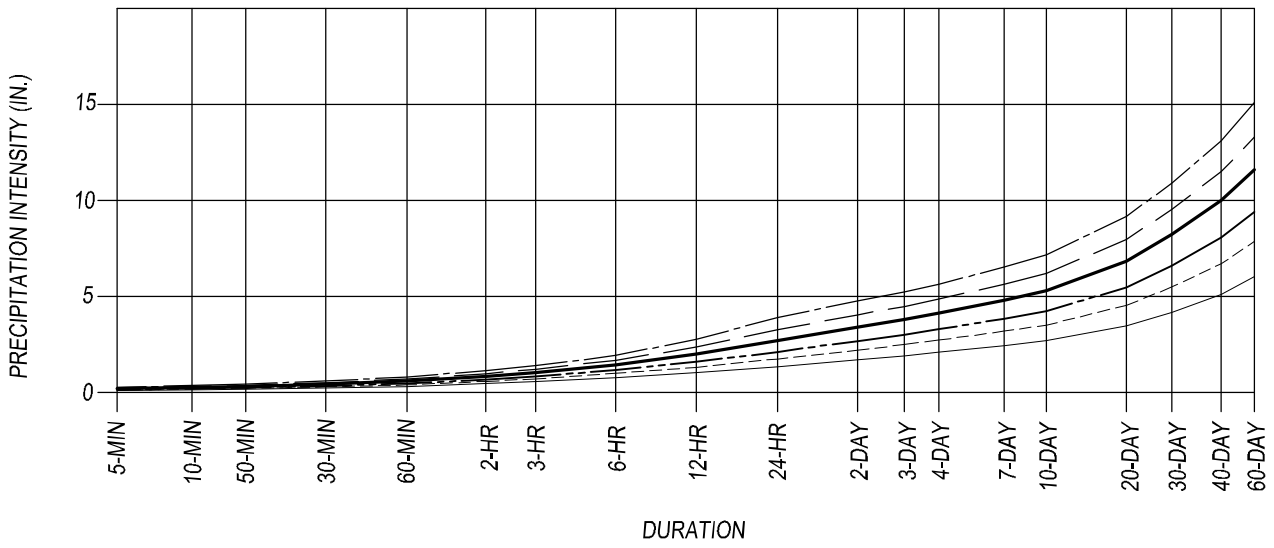


City of Lindsay

CITY SERVICES DEPARTMENT

CAST-IN-PLACE OUTLET STRUCTURE DETAIL

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SD-15
			DATE	03/06/25	2 OF 2



2 YEAR

5 YEAR

10 YEAR

25 YEAR

50 YEAR

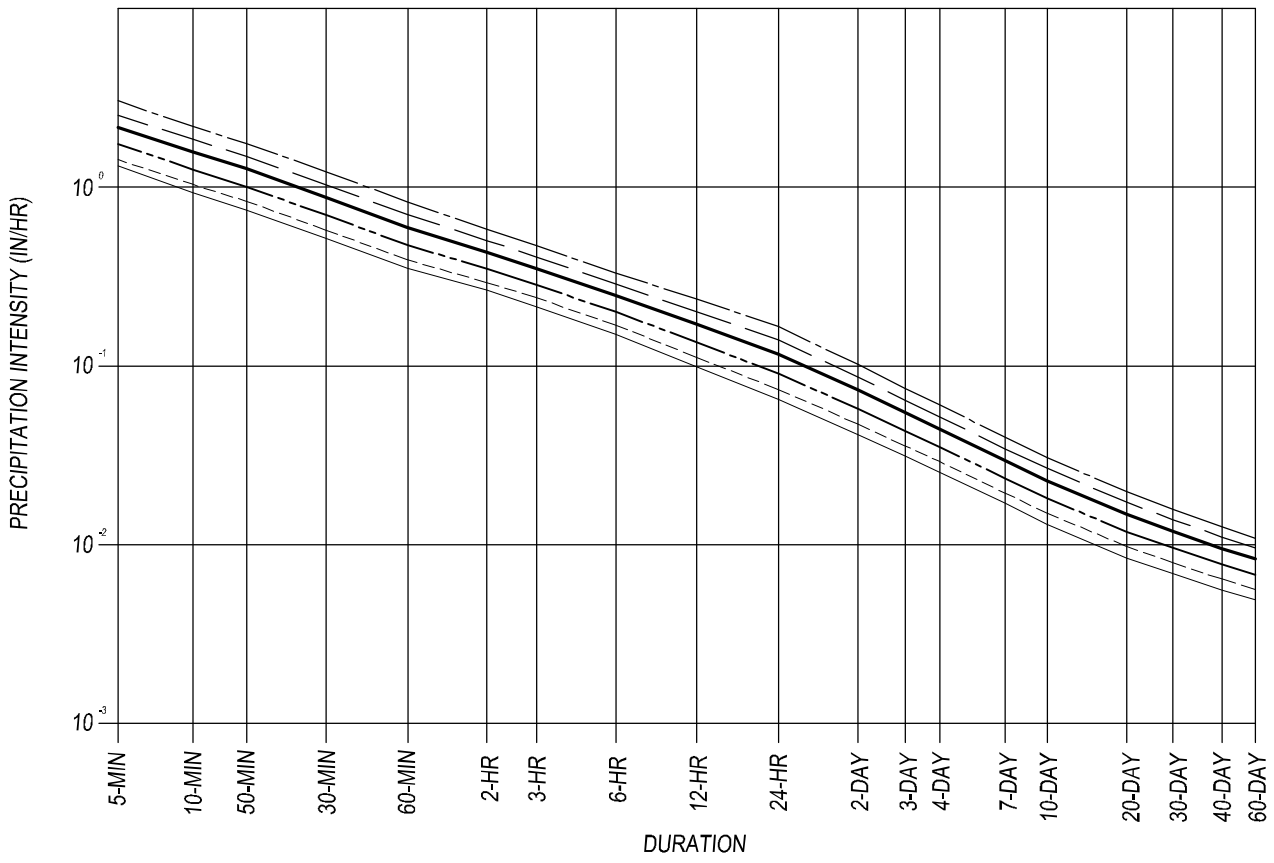
100 YEAR

City of Lindsay

CITY SERVICES DEPARTMENT

RAINFALL DEPTH CURVE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-16
			DATE 03/06/25	1 OF 2



2 YEAR

5 YEAR

10 YEAR

25 YEAR

50 YEAR

100 YEAR

City of Lindsay

CITY SERVICES DEPARTMENT

RAINFALL INTENSITY CURVE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-16
			DATE 03/06/25	2 OF 2

STORM DRAINAGE DESIGN CRITERIA

LEVEL OF PROTECTION

ITEM	VOLUME	LEVEL OF PROTECTION
MINOR (COLLECTOR) DRAINS	N/A	2 YEAR
MAJOR DRAINS AND DOWNTOWN AREA	N/A	10 YEAR
RETENTION BASINS	25 YEAR - 10 DAY	25 YEAR - 10 DAY

NOTES:

1. MAJOR DRAINS GENERALLY SERVE AREAS IN EXCESS OF 100 ACRES. THESE DRAINS ARE DEFINED AND ANALYZED IN THE CITY'S STORM WATER MASTER PLAN.
2. MINOR DRAINS CONVEY RUNOFF TO THE MAJOR DRAINS AND GENERALLY SERVE AREAS LESS THAN 100 ACRES.
3. THE STORAGE VOLUME FOR RETENTION STORAGE IS BASED ON A 25-YEAR, 10-DAY STORM EVENT WITH A TOTAL RAIN FALL OF 5.30 INCHES. DISCHARGE PUMPS CAN ONLY BE INSTALLED AND OPERATED WITH THE APPROVAL OF THE CITY.
4. THE DESIGN WATER SURFACE ELEVATION IN A BASIN SHALL BE A MINIMUM OF ONE FOOT BELOW THE LOWEST CATCH BASIN IN THE AREA THAT IS TRIBUTARY TO THE BASIN.
5. THE CITY DOES NOT CONSIDER PERCOLATION/INFILTRATION FACTORS IN SIZING BASINS.

RATIONAL METHOD RUNOFF COEFFICIENTS AND DESIGN CRITERIA FOR STORM WATER BASINS

LAND USE	COEFFICIENT OF RUNOFF (C)
INDUSTRIAL AND COMMERCIAL	0.90
PROFESSIONAL OFFICE	0.65
RESIDENTIAL	0.40
PUBLIC/INSTITUTIONAL	0.40
OPEN SPACE	
- IMPROVED (PARKS)	0.20
- UNIMPROVED	0.15

DESIGN CRITERIA

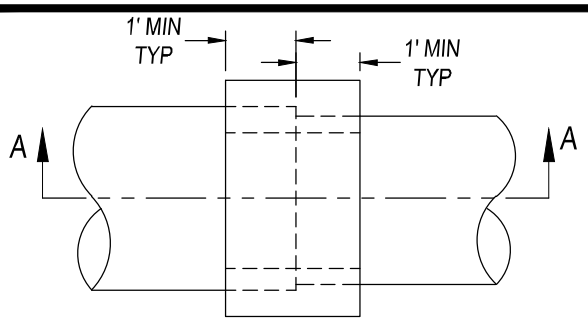
1. THE RATIONAL METHOD MAY BE USED TO DETERMINE PEAK FLOWS AND RUNOFF VOLUMES FOR AREAS LESS THAN 150 ACRES.
2. ALL NEW DEVELOPMENTS SHALL BE DESIGNED SUCH THAT THE SURFACE OF PONDED WATER DURING THE 100-YEAR RAINFALL EVENT DOES NOT RISE MORE THAN ONE FOOT ABOVE THE LOWEST TOP OF CURB IN THE DEVELOPMENT.
3. LOT TO STREET TIME = 15 MINUTES. (RESIDENTIAL ONLY)
4. GUTTER VELOCITY = 2 FEET PER SECOND.

City of Lindsay

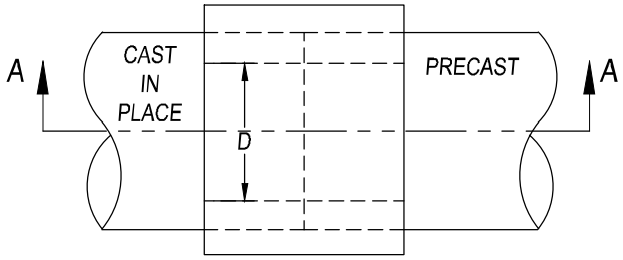
CITY SERVICES DEPARTMENT

DESIGN CRITERIA FOR DRAINAGE

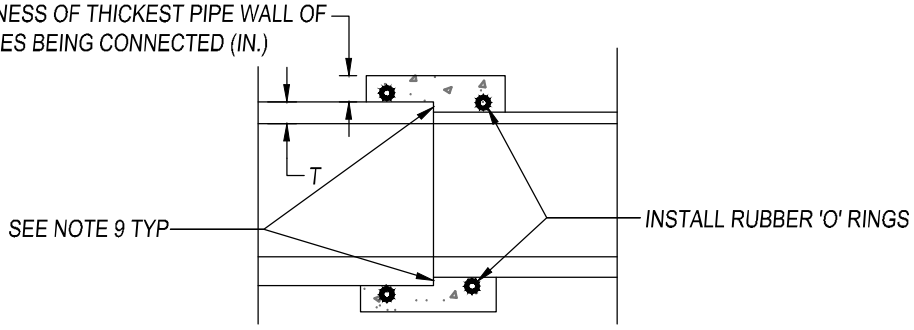
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-17
			DATE 03/06/25	



JOINING DISSIMILAR PIPES



JOINING CAST-IN-PLACE TO PRE-CAST PIPES



SECTION A-A

NOTES:

1. CONCRETE COLLAR SHALL BE CLASS 2 CONCRETE.
2. INSIDE COLLAR SHALL MATCH PIPE DIAMETER, SMOOTH STEEL TROWEL FINISH.
3. ALLOW CONCRETE TO HARDEN BEFORE BACKFILLING.
4. WHEN FORMING ANGLES ENGINEER MAY REQUIRE CHAMFERING OF PIPE ENDS.
5. JOINTS SHALL BE WATER TIGHT.
6. THIS DETAIL IS NOT FOR USE WITH PVC/PLASTIC PIPES. JOINING OF PVC/PLASTIC PIPES SHALL BE AS APPROVED BY THE CITY ENGINEER.
7. THIS DETAIL MAY BE USED FOR PIPES UP TO 48" IN DIAMETER. COLLARS FOR PIPES LARGER THAN 48" SHALL BE AS APPROVED BY THE CITY ENGINEER.
8. EXFILTRATION TEST REQUIRED AS PER ASTM C969-02 AS IMPLEMENTED BY THE CITY OF LINDSAY.
9. CONTRACTOR SHALL INSTALL A QUICK SETTING TYPE HYDRAULIC CEMENT TO ALL JOINTS PRIOR TO POURING CONCRETE COLLAR. HYDRAULIC CEMENT SHALL BE A NON-SHRINKING, NON-METALLIC AND NON-CORROSIVE TYPE WITH A MINIMUM 28 DAY COMPRESSIVE STRENGTH OF 5,000 P.S.I. HYDRAULIC CEMENT DATA SHALL BE SUBMITTED TO THE CITY ENGINEER FOR APPROVAL PRIOR TO CONSTRUCTION. JOINT SEAL SHALL BE WATER TIGHT.

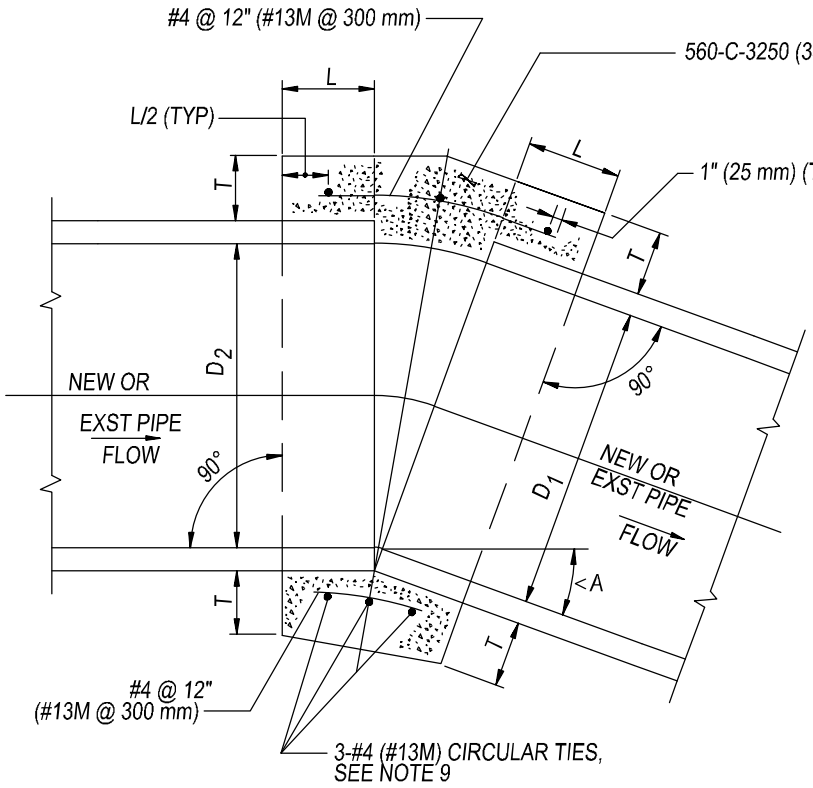
*THIS INSTALLATION METHOD SHALL ONLY BE USED WHERE APPROVED BY THE CITY ENGINEER IN WRITING. SEE NOTE 4.

City of Lindsay

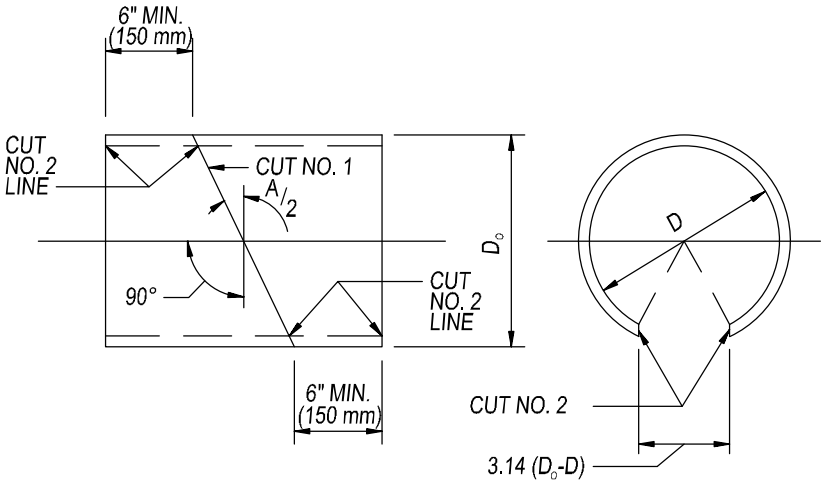
CITY SERVICES DEPARTMENT

CONSTRUCTION JOINT CONCRETE FILLED COLLAR

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SD-18
			DATE	03/06/25	

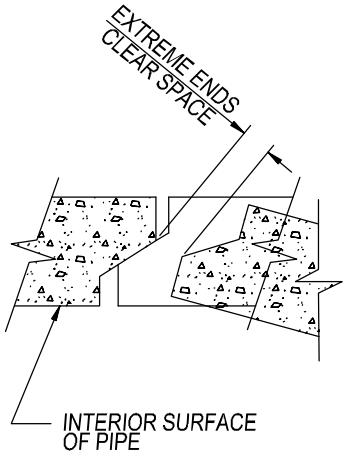


D	L	T
12" (300 mm)	12" (300 mm)	4" (100 mm)
18" (450 mm)	12" (300 mm)	5" (125 mm)
24" (600 mm)	12" (300 mm)	6" (150 mm)
30" (750 mm)	18" (450 mm)	7" (175 mm)
36" (900 mm)	18" (450 mm)	9" (225 mm)
42" (1050 mm)	18" (450 mm)	9" (225 mm)
48" (1200 mm)	18" (450 mm)	10" (250 mm)
57" (1425 mm)	18" (450 mm)	10" (250 mm)
60" (1500 mm)	21" (525 mm)	11" (275 mm)
66" (1650 mm)	21" (525 mm)	11" (275 mm)
72" (1800 mm)	24" (600 mm)	12" (300 mm)



DETAIL "A" (SEE NOTE 10)

SONO-TUBE, OR EQUAL, INTERIOR FORM



DETAIL "B"

TYPICAL JOINT FOR

REINFORCED CONCRETE PIPE

CUT NO. 1: SAW THE TUBE AT AN ANGLE OF A/2 WITH THE TRANSVERSE PLANE. REVERSE ONE SECTION AND TAPE BOTH SECTIONS TOGETHER FORMING THE DEFLECTION ANGLE A.

CUT NO. 2: SAW THE TUBE LONGITUDINALLY REMOVING A STRIP 3.14 (D -D)WIDE ON THE SIDE OPPOSITE THE OPEN JOINT. BEND THE ENDS OF THE CUT TOGETHER AND INSERT THE TUBE IN THE PIPE.

City of Lindsay

CITY SERVICES DEPARTMENT

CONCRETE COLLAR AT BENDS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-19
			DATE 03/06/25	1 OF 2

NOTES

1. A CONCRETE COLLAR IS REQUIRED WHERE THE CHANGE IN GRADE EXCEEDS 10%.

2. FOR CURVE JOINTS (SEE DETAIL B, SHEET 1)

   IF THE EXTREME ENDS OF THE PIPE LEAVE A CLEAR SPACE THAT IS GREATER THAN 1" (25 mm), BUT IS LESS THAN 3" (75 mm) A CONCRETE COVER IS REQUIRED IN ACCORDANCE WITH SSPWC 306-7.3.2.1.

   IF THE EXTREME ENDS OF THE PIPE LEAVE A CLEAR SPACE THAT IS EQUAL TO OR GREATER THAN 3" (75 mm), BUT LESS THAN 6" (150 mm), A CONCRETE COLLAR IS REQUIRED. IF THE CLEAR SPACE IS 6" (150 mm) OR GREATER, A TRANSITION STRUCTURE IS REQUIRED.

3. CONCRETE COLLAR SHALL NOT BE USED FOR A SIZE CHANGE ON THE MAIN LINE.

4. CONNECTOR PIPES

   A. WHERE PIPES OF DIFFERENT DIAMETERS ARE JOINED WITH A CONCRETE COLLAR, L AND T SHALL BE THOSE OF THE LARGER PIPE. D=D OR D, WHICHEVER IS GREATER.
   B. WHEN D IS EQUAL TO OR LESS THAN D, JOIN INVERTS AND WHEN D IS GREATER THAN D, JOIN SOFFITS.

5. FOR PIPE LARGER THAN 72" (1800 mm) SPECIAL COLLAR DETAILS ARE REQUIRED.

6. FOR PIPE SIZE NOT LISTED USE NEXT SIZE LARGER.

7. REINFORCEMENT SHALL CONFORM TO ASTM A 615 (A 615 M) GRADE 40 (300).

8. WHERE REINFORCING IS REQUIRED THE DIAMETER OF THE CIRCULAR TIES SHALL BE D+(2X WALL THICKNESS) + T.

9. REINFORCING SHALL BE USED WHERE THE PIPE DIAMETER IS GREATER THAN 21" (525 mm) AND ON ALL PIPES WHERE THE SPACES BETWEEN THE EXTREME OUTER ENDS IS 3" (75 mm) OR LARGER.

   CIRCULAR TIES:

PIPE DIAMETER	NO. OF CIRCULAR TIES
21" (525 mm) OR LESS	3
24" (600 mm) TO 30" (750 mm)	3
33" (825 mm) TO 57" (1425 mm)	4
60" (1500 mm) TO 72" (1800 mm)	5

   WHERE THE SPACE BETWEEN PIPE ENDS EXCEEDS 3" (75 mm), THE NUMBER OF CIRCULAR TIES SHALL BE INCREASED TO MAINTAIN AN APPROXIMATE SPACING OF 6" (150 mm) O.C.

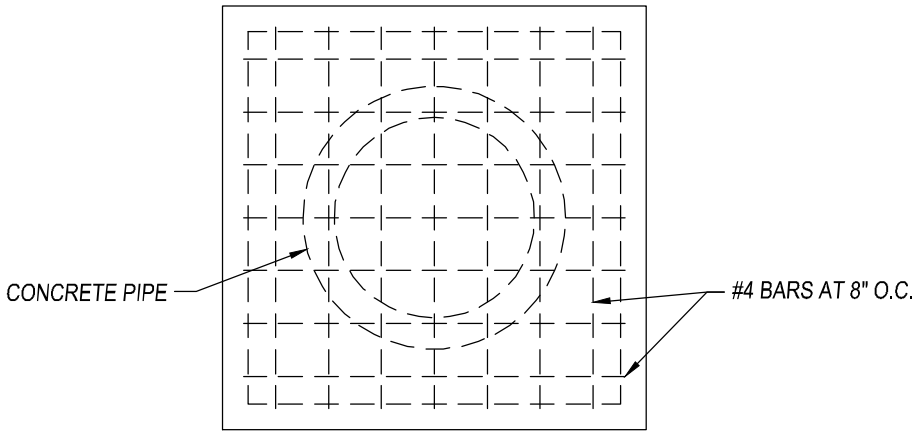
10. WHERE THE PIPE IS 21" (525 mm) OR LESS IN DIAMETER AN INTERIOR FORM OF UNSEALED SONO-TUBE OR EQUAL SHALL BE USED TO PROVIDE A SMOOTH INTERIOR JOINT. THE PAPER FORM MAY BE LEFT IN PLACE (SEE DETAIL A). WHEN THE PIPE IS 24" (600 mm) OR LARGER A REMOVABLE INTERIOR FORM SHALL BE USED OR THE INTERIOR JOINT SHALL BE COMPLETELY FILLED WITH MORTAR AND NEATLY POINTED.

City of Lindsay

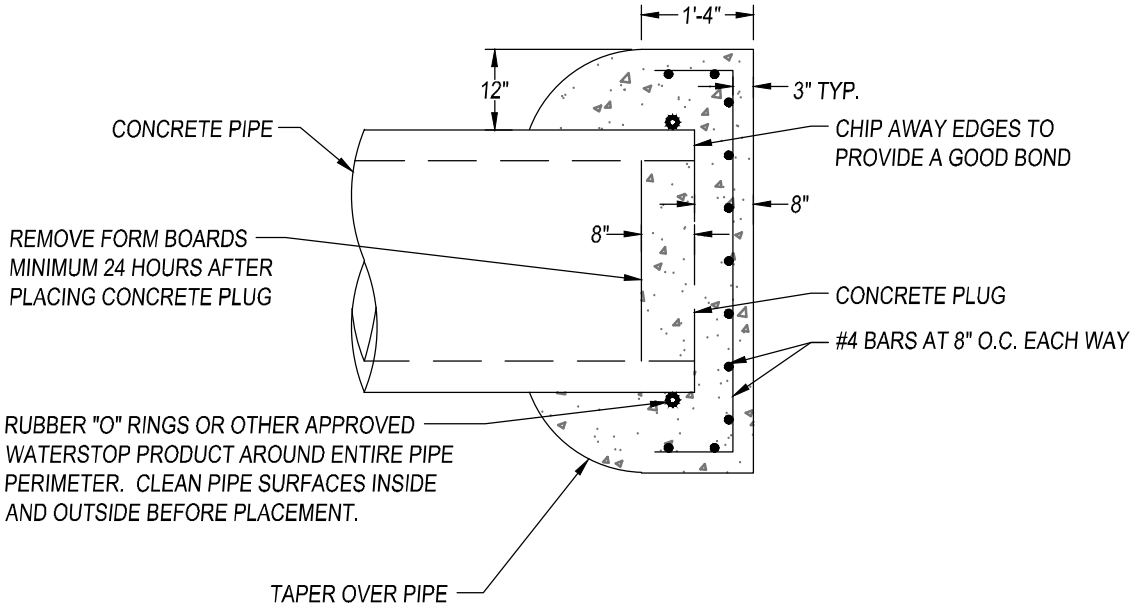
CITY SERVICES DEPARTMENT

CONCRETE COLLAR AT BENDS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-19
			DATE 03/06/25	2 OF 2



FRONT VIEW



SECTION

NOTES:

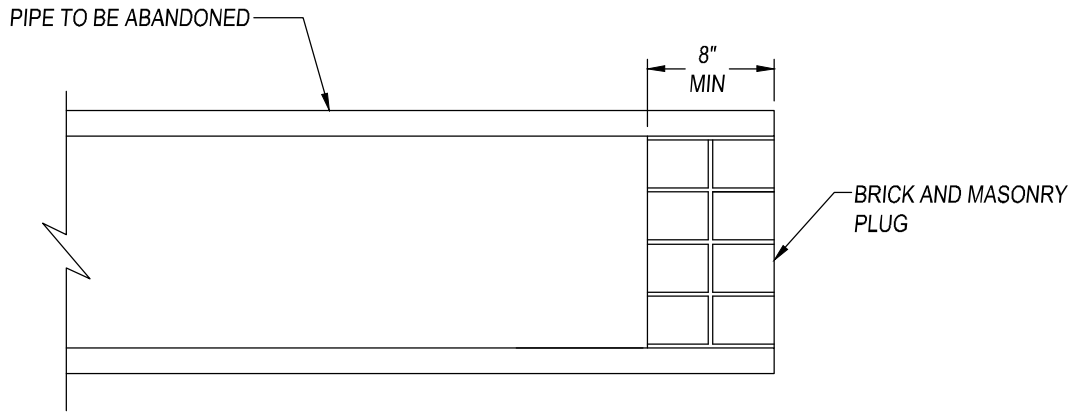
1. END PLUG SHALL ONLY BE USED WHERE APPROVED BY THE CITY ENGINEER.
2. THIS PLUG SHALL BE USED ON PIPES WITH AN INNER DIAMETER OF 12" UP TO 48". END PLUGS FOR PIPES WITH AN INNER DIAMETER LARGER THAN 48" SHALL BE DESIGNED BY THE ENGINEER OF RECORD AND APPROVED BY THE CITY ENGINEER.
3. REBAR AND CONCRETE SHALL COMPLY WITH THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
4. CONCRETE SHALL BE CLASS 2.
5. PIPE END PLUG SHALL BE WATER TIGHT.
6. EXFILTRATION TEST REQUIRED AS PER ASTM C969-02 AS IMPLEMENTED BY THE CITY OF LINDSAY.

City of Lindsay

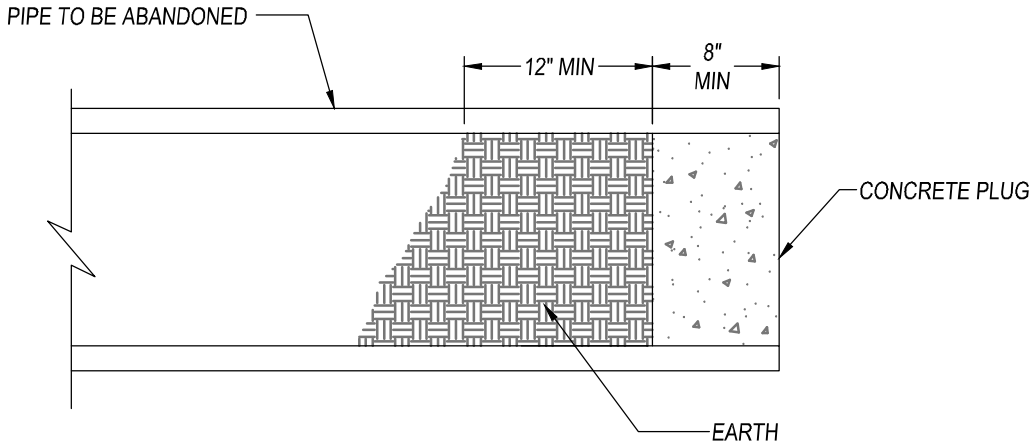
CITY SERVICES DEPARTMENT

PIPE PLUG FOR CONCRETE PIPE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-20
			DATE 03/06/25	



12" TO 48" DIAMETER PIPE



10" DIAMETER PIPE AND SMALLER

NOTES:

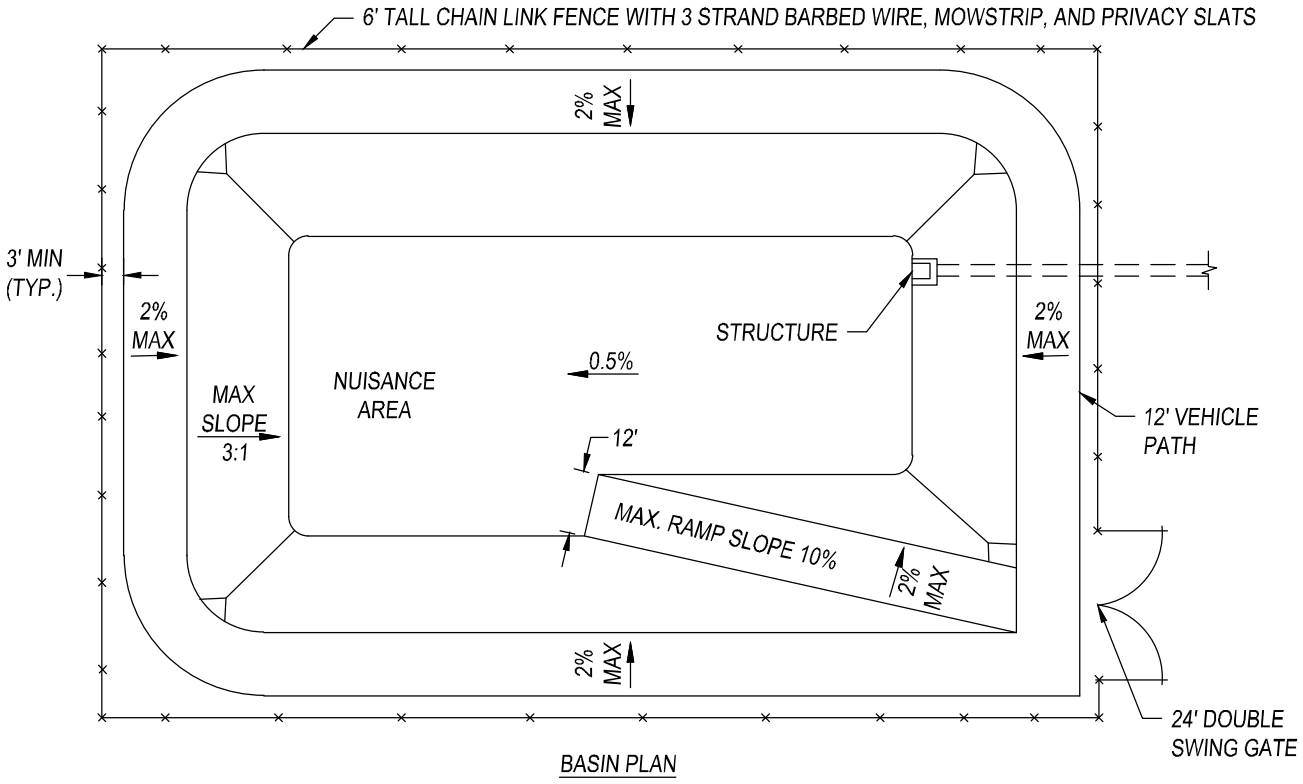
1. PIPE PLUGS SHALL BE INSTALLED TO THE SATISFACTION OF THE ENGINEER.
2. WHERE REQUIRED BY THE CITY ENGINEER, ABANDONED PIPES 12" AND LARGER, SHALL BE FILLED COMPLETELY WITH CEMENT SLURRY BACKFILL.
3. ALL PLUGS SHALL COMPLY WITH THE CITY OF LINDSAY STANDARD SPECIFICATIONS.
4. PIPE END PLUG SHALL BE WATER TIGHT.
5. VIDEO INSPECTION REQUIRED PRIOR TO ABANDONMENT OF PIPE.

City of Lindsay

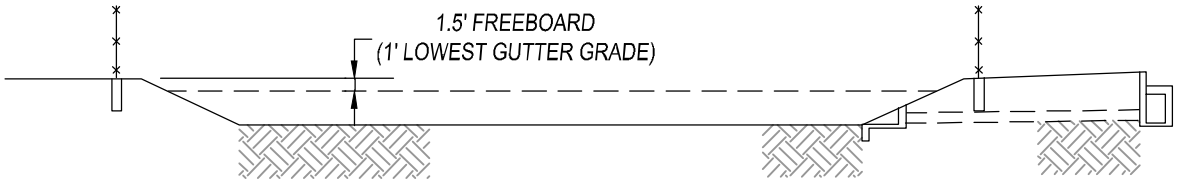
CITY SERVICES DEPARTMENT

ABANDONED SANITARY SEWER & STORM DRAIN PIPE PLUG

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-21
			DATE 03/06/25	



BASIN PLAN



NOTES:

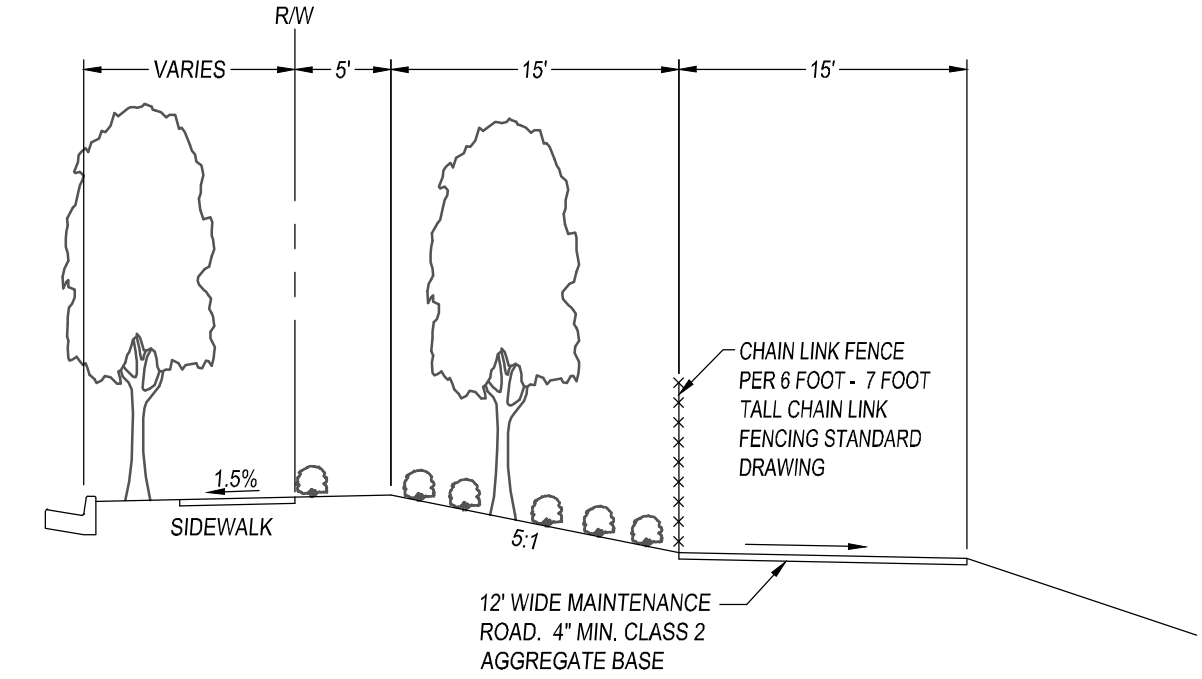
1. OVERFLOW MUST BE TO THE STREET, UNLESS OTHERWISE APPROVED BY THE CITY ENGINEER.
2. DESIGNED WATER SURFACE ELEVATION SHALL BE 1 FOOT BELOW THE LOWEST INLET FLOW OR PONGD PERIPHERAL ELEVATION, WHICHEVER IS LOWER.
3. SEE DETAIL SD-25 FOR COEFFICIENT RUNOFF (C) VALUES.
4. VEHICLE RAMP SHALL BE 12 FEET WIDE WITH A MAXIMUM SLOPE OF 10% REQUIRED.
5. BASIN SHALL BE SIZED TO HANDLE THE REQUIRED STORAGE VOLUME WITHOUT EXCEEDING AN EXCAVATION DEPTH OF 12 FEET.
6. ADEQUATE AREA AT THE FLOOR OF THE BASIN SHALL BE PROVIDED FOR MANEUVERING MAINTENANCE EQUIPMENT.
7. LANDSCAPING OF THE BASIN MAY NOT BE NECESSARY IF SCREENED FENCING IS PROVIDED. HOWEVER, LANDSCAPING TREATMENT BETWEEN THE FENCE AND THE STREET MAY BE REQUIRED.
8. FENCING IS NOT REQUIRED ON BASINS WHERE THE MAXIMUM POSSIBLE WATER DEPTHS DOES NOT EXCEED 18 INCHES AND THE SIDE SLOPES ARE 6 TO 1 OR FLATTER.
9. SOIL BORING LOG TO A DEPTH OF NOT LESS THAN 30 FEET SHALL BE SUBMITTED TO THE CITY ENGINEER.

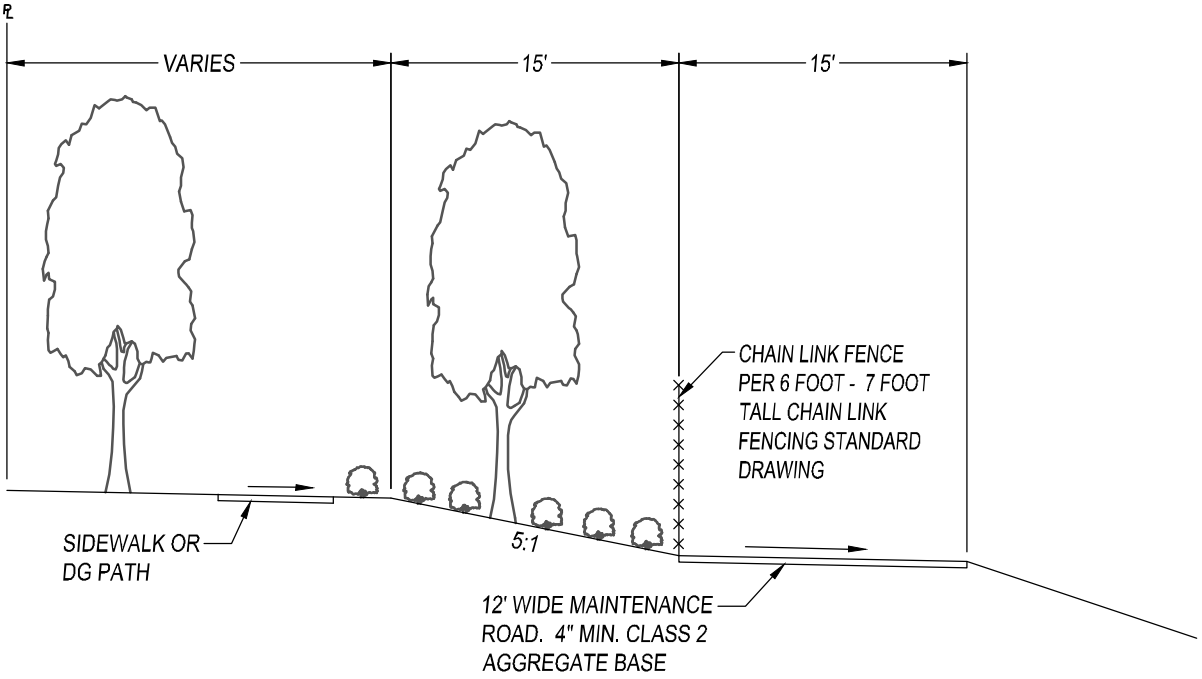
City of Lindsay

CITY SERVICES DEPARTMENT

RETENTION BASIN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-22
			DATE 03/06/25	





NOTES:

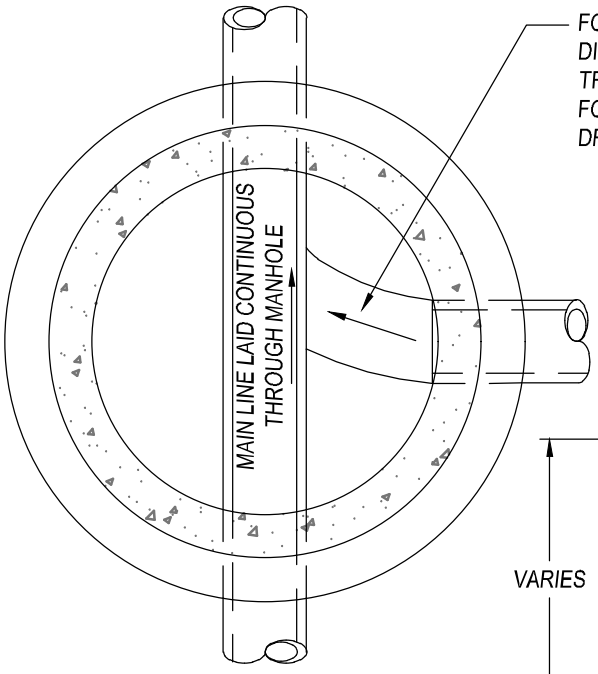
1. REFER TO CONCRETE IMPROVEMENT STANDARD DRAWINGS FOR SIDEWALK AND PARKWAY REQUIREMENTS.
2. DESIGN SHALL MINIMIZE EROSION.
3. SIDE SLOPE STABILIZATION AND HYDROSEEDING REQUIREMENTS PER CITY STANDARD SPECIFICATIONS OR AS DIRECTED BY THE CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

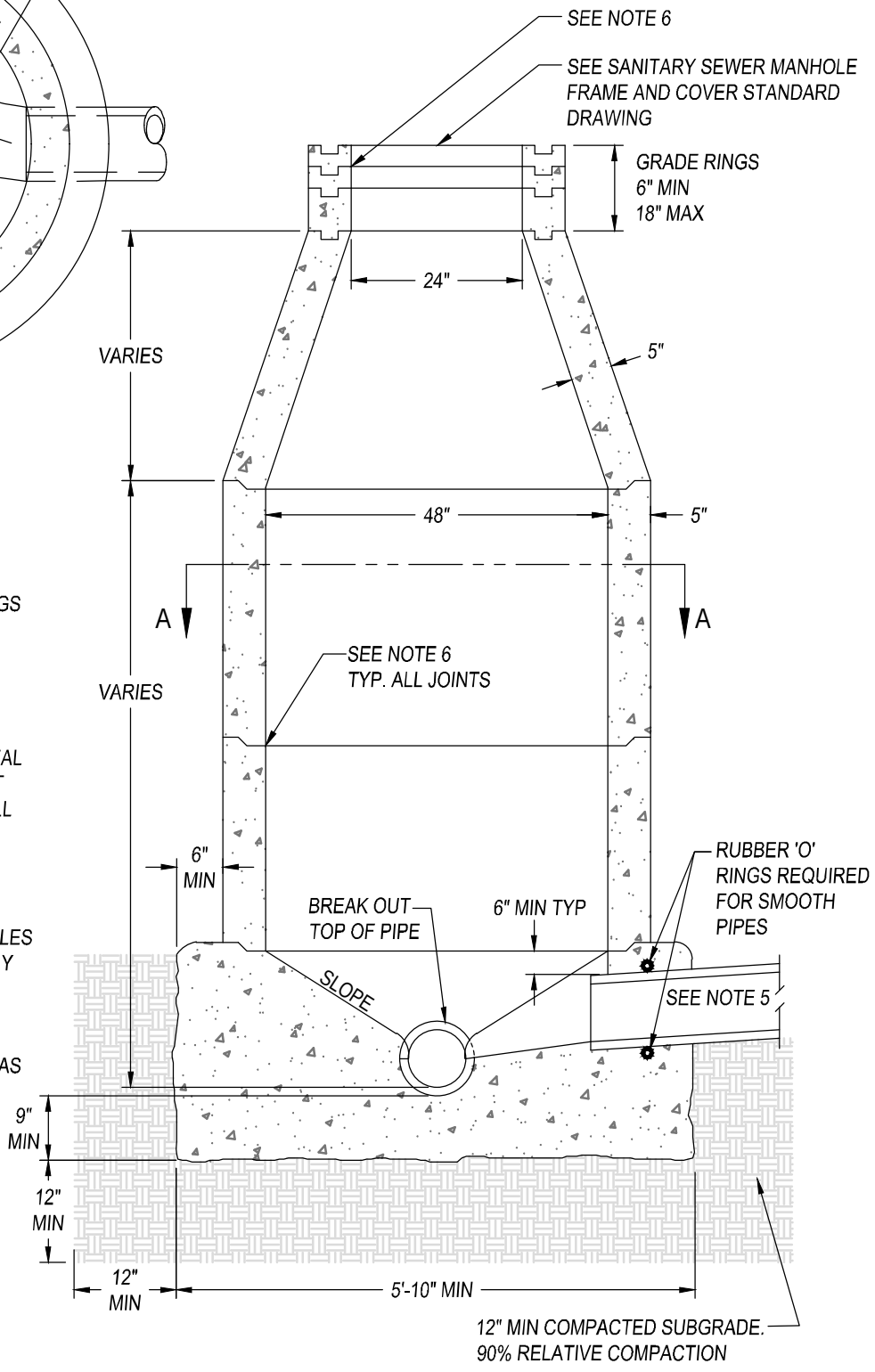
BASIN PERIMETER LANDSCAPING SECTION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SD-23
			DATE 03/06/25	



SECTION A-A

FORM TROUGH IN BOTTOM OF MANHOLE IN DIRECTION OF FLOW. TROUGH SHALL BE STEEL TROWELED SMOOTH. SEE TYPICAL FLOW CHANNELS FOR SANITARY SEWER MANHOLES STANDARD DRAWING.



NOTES:

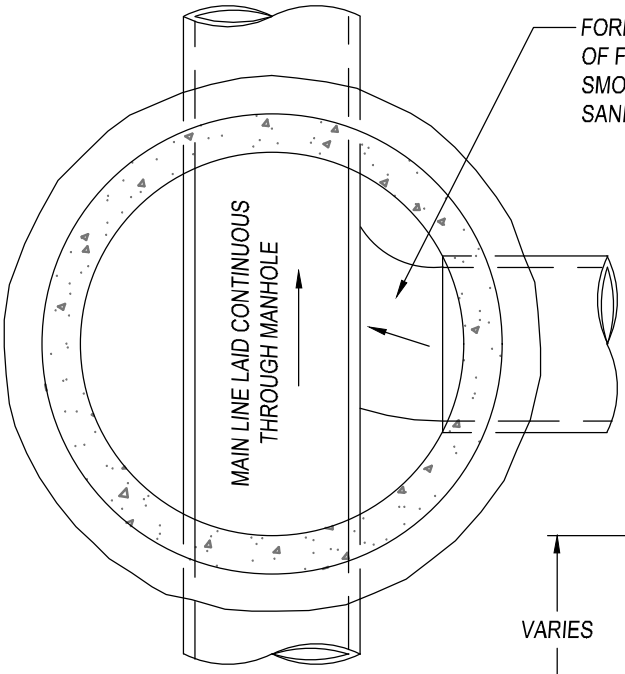
1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. 48" MANHOLES ARE REQUIRED FOR SEWER PIPE SIZES FROM 8" TO 24" OR AS REQUIRED BY THE CITY ENGINEER.
6. MORTAR INSIDE OF GRADE RINGS AND ALL INTERIOR JOINTS TO A SMOOTH FINISH.
7. A MAXIMUM OF 2 SEWER LATERAL CONNECTIONS WILL BE ALLOWED AT EACH SEWER MANHOLE, UNLESS APPROVED OTHERWISE BY THE CITY ENGINEER.

City of Lindsay

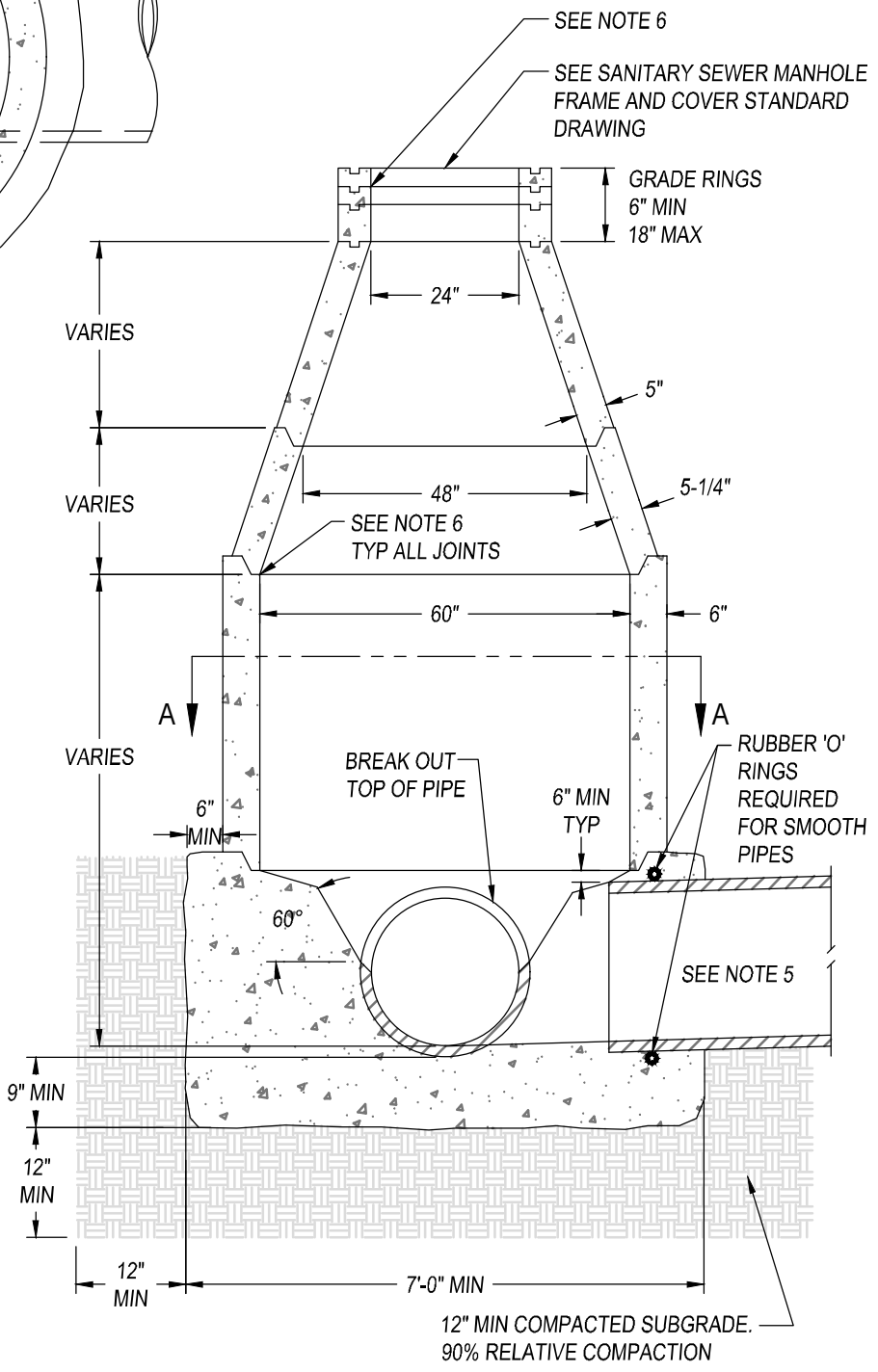
CITY SERVICES DEPARTMENT

48" SANITARY SEWER MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-1
			DATE 03/06/25	



SECTION A-A



NOTES:

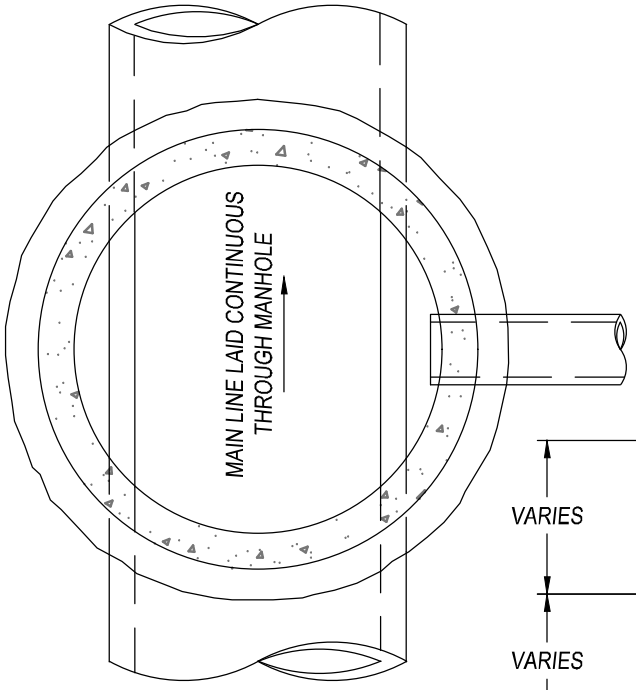
1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. 60" MANHOLES ARE REQUIRED FOR SEWER PIPE SIZES FROM 27" TO 36" OR AS REQUIRED BY THE CITY ENGINEER.
6. MORTAR INSIDE OF GRADE RINGS AND ALL INTERIOR JOINTS TO A SMOOTH FINISH.
7. A MAXIMUM OF 2 SEWER LATERAL CONNECTIONS WILL BE ALLOWED AT EACH SEWER MANHOLE, UNLESS APPROVED OTHERWISE BY THE CITY ENGINEER.

City of Lindsay

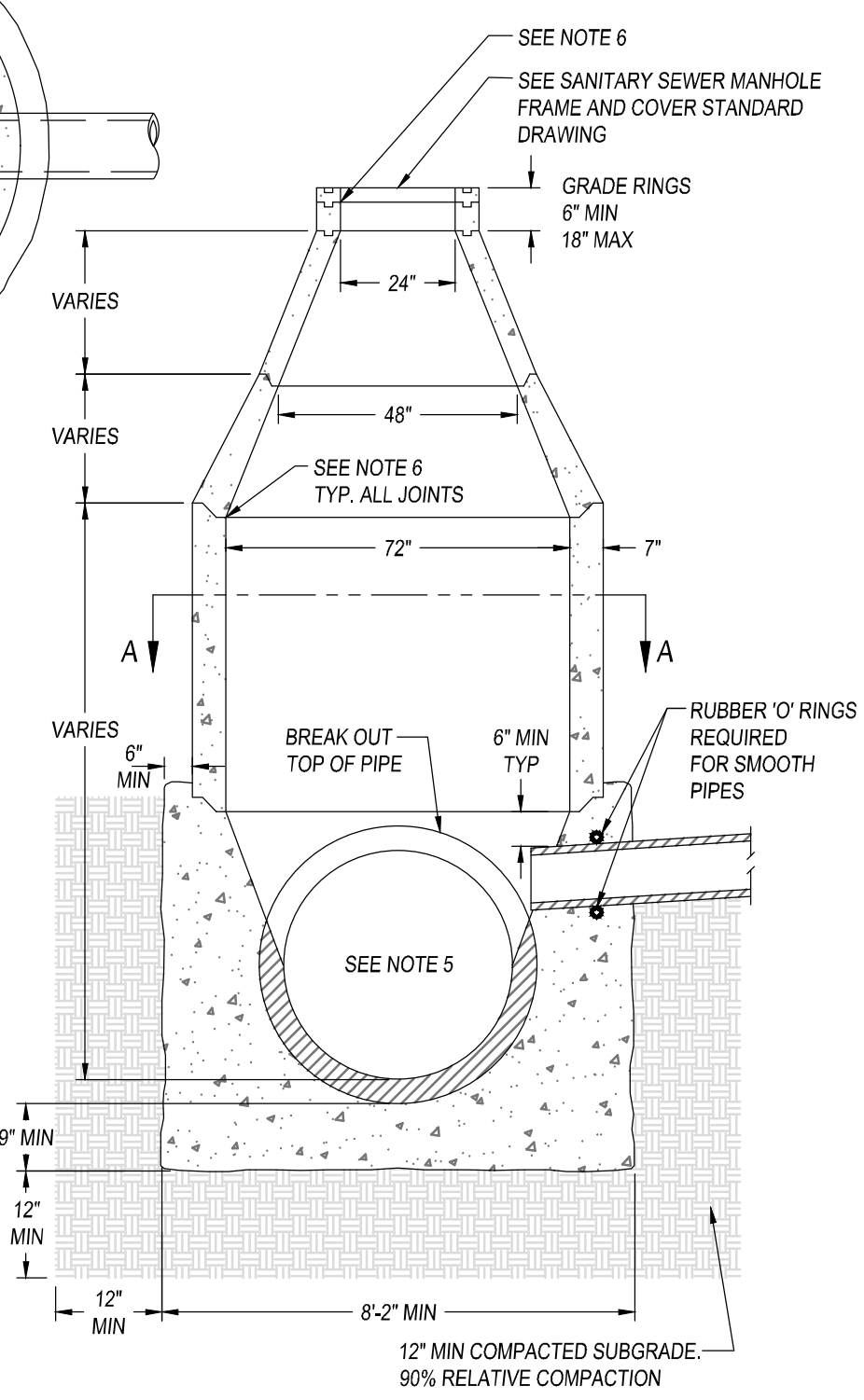
CITY SERVICES DEPARTMENT

60" SANITARY SEWER MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-2
			DATE 03/06/25	



SECTION A-A



NOTES:

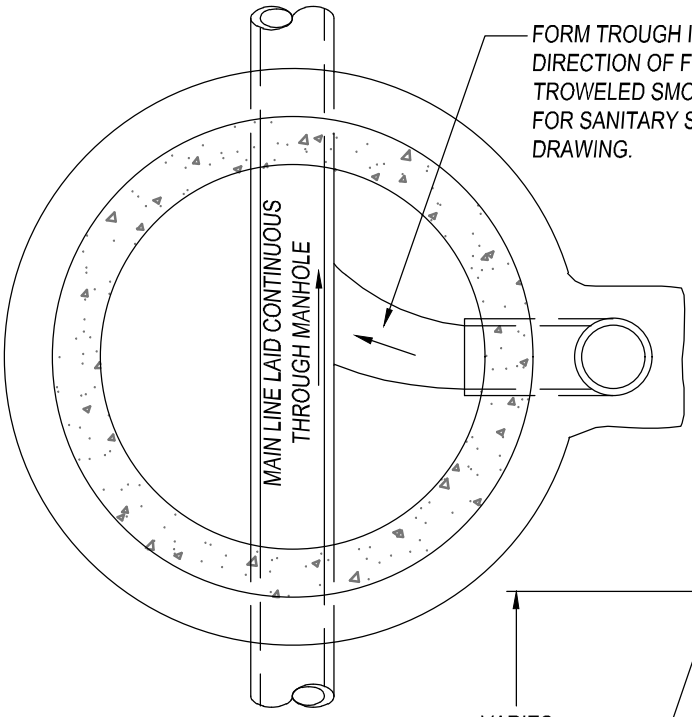
1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. 72" MANHOLES ARE REQUIRED FOR SEWER PIPE SIZES FROM 39" TO 48" OR AS REQUIRED BY THE CITY ENGINEER.
6. MORTAR INSIDE OF GRADE RINGS AND ALL INTERIOR JOINTS TO A SMOOTH FINISH.
7. A MAXIMUM OF 2 SEWER LATERAL CONNECTIONS WILL BE ALLOWED AT EACH SEWER MANHOLE, UNLESS APPROVED OTHERWISE BY THE CITY ENGINEER.

City of Lindsay

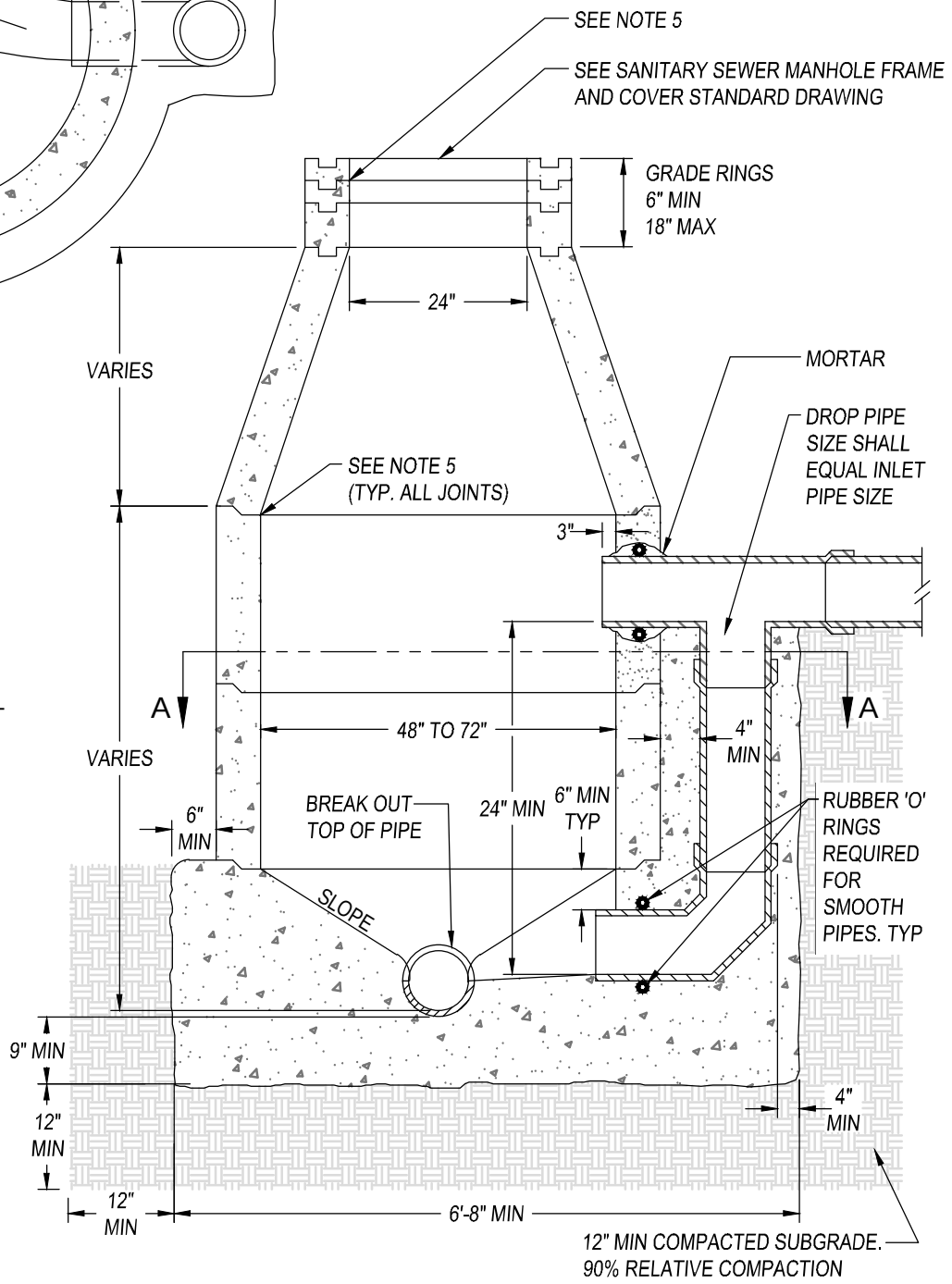
CITY SERVICES DEPARTMENT

72" SANITARY SEWER MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-3
			DATE 03/06/25	



SECTION A-A



NOTES:

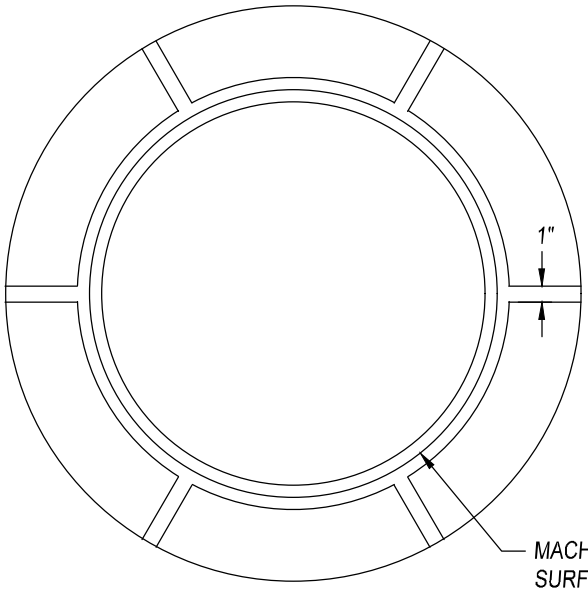
1. ALL CONCRETE SHALL BE CLASS 2 CONCRETE.
2. MANHOLE PIPE, CONE AND GRADE RINGS SHALL BE PRECAST REINFORCED CONCRETE AS PER ASTM C478.
3. JOINTS SHALL BE RUBBER GASKET AS PER ASTM C443 OR JOINTS SHALL BE CONSTRUCTED WITH MASTIC (KENT SEAL NO. 2 OR EQUAL) AS PER ASTM C990 AT CONTRACTOR'S OPTION. MASTIC SHALL COVER A MINIMUM OF ONE-HALF THE COMPRESSED SURFACE. ALL JOINTS SHALL BE WATER TIGHT.
4. MAXIMUM DISTANCE BETWEEN MANHOLES SHALL BE 500 FEET OR AS REQUIRED BY THE CITY ENGINEER.
5. MORTAR INSIDE OF GRADE RINGS AND ALL INTERIOR JOINTS TO A SMOOTH FINISH.

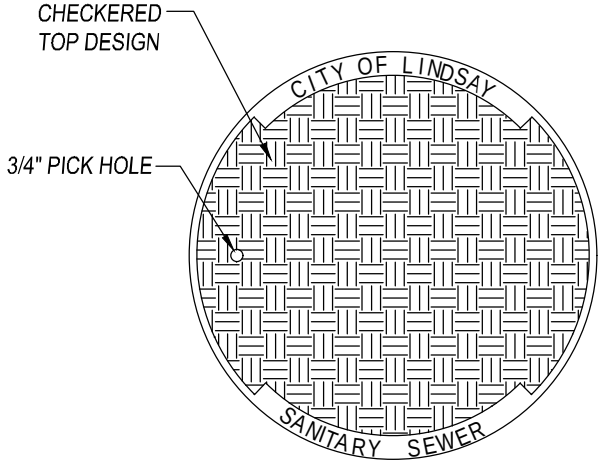
City of Lindsay

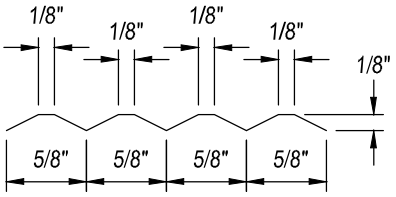
CITY SERVICES DEPARTMENT

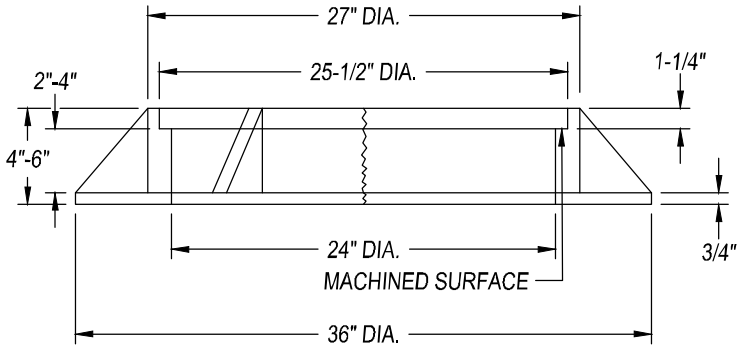
SANITARY SEWER DROP MANHOLE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-4
			DATE 03/06/25	

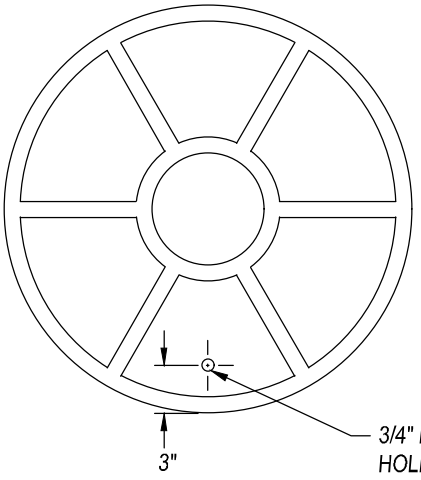


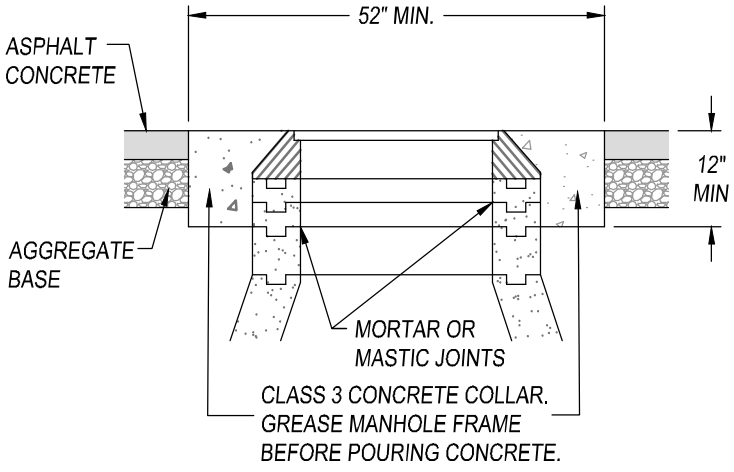




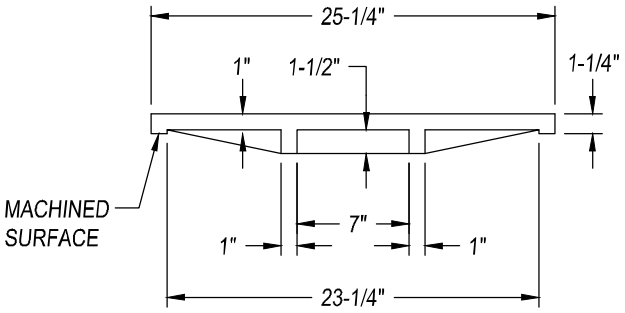


MANHOLE FRAME





MANHOLE ADJUSTMENT



MANHOLE COVER

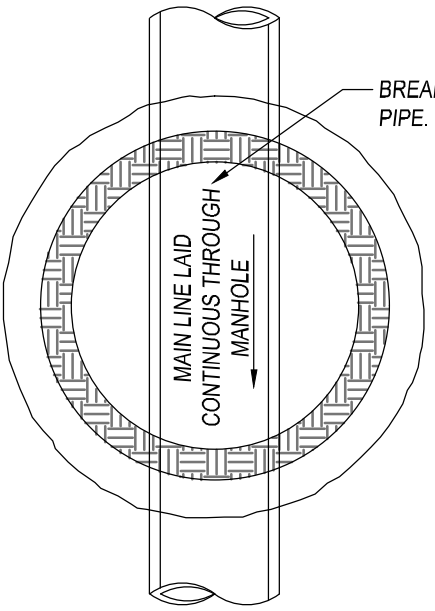
NOTE: FRAME & COVER SHALL MATCH CROSS SLOPE

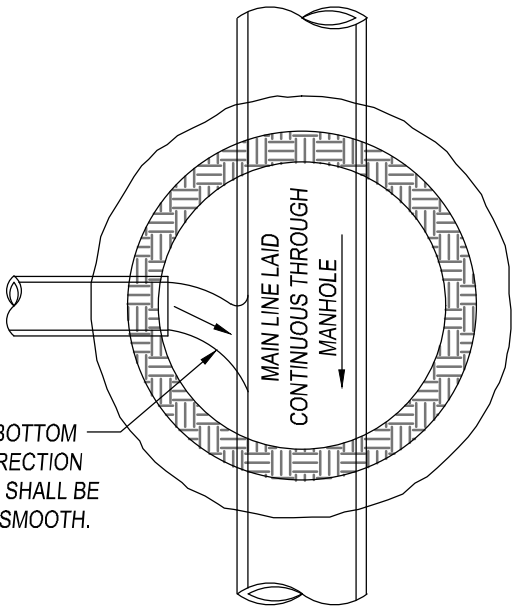
City of Lindsay

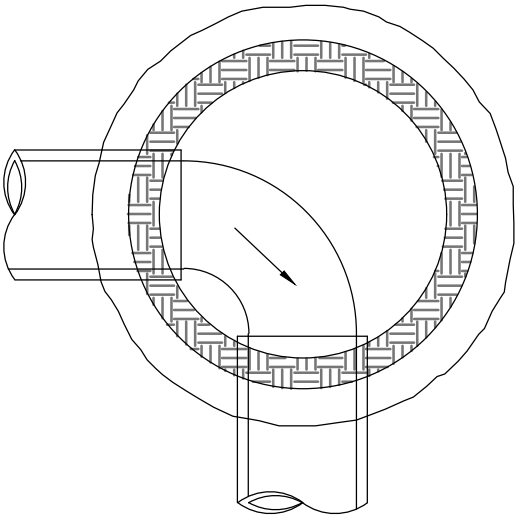
CITY SERVICES DEPARTMENT

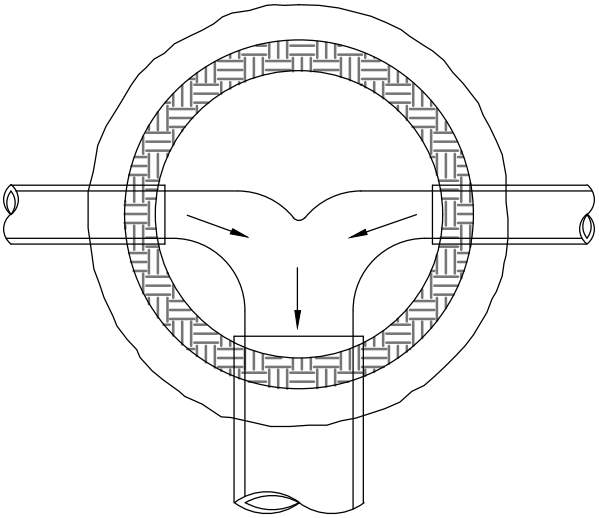
SANITARY SEWER MANHOLE FRAME AND COVER

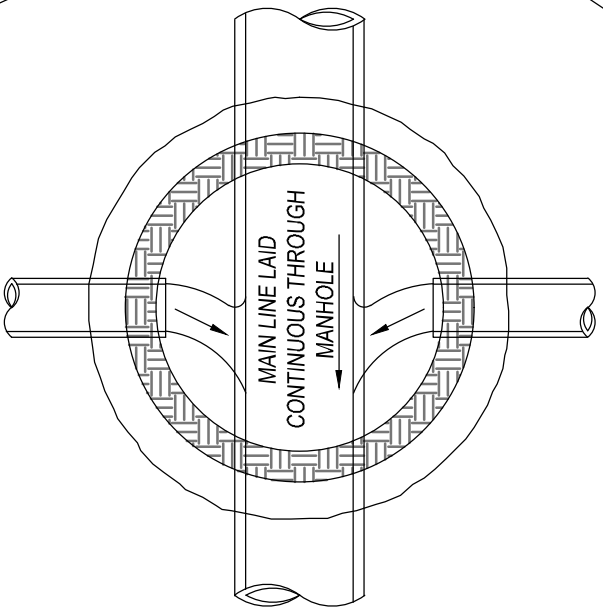
MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-5
			DATE 03/06/25	









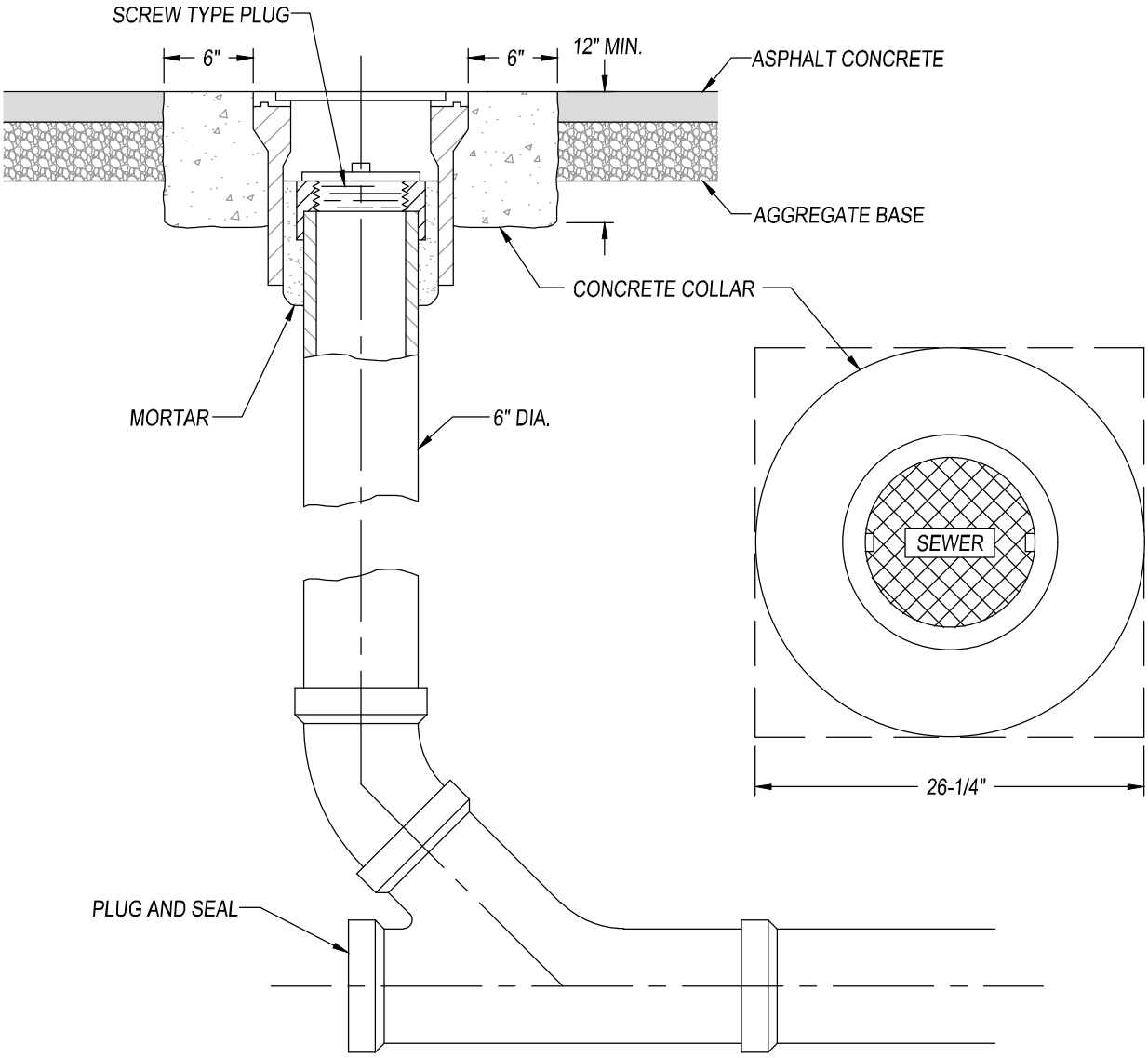


City of Lindsay

CITY SERVICES DEPARTMENT

SANITARY SEWER MANHOLE FLOW CHANNELS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-6
			DATE 03/06/25	



NOTES:

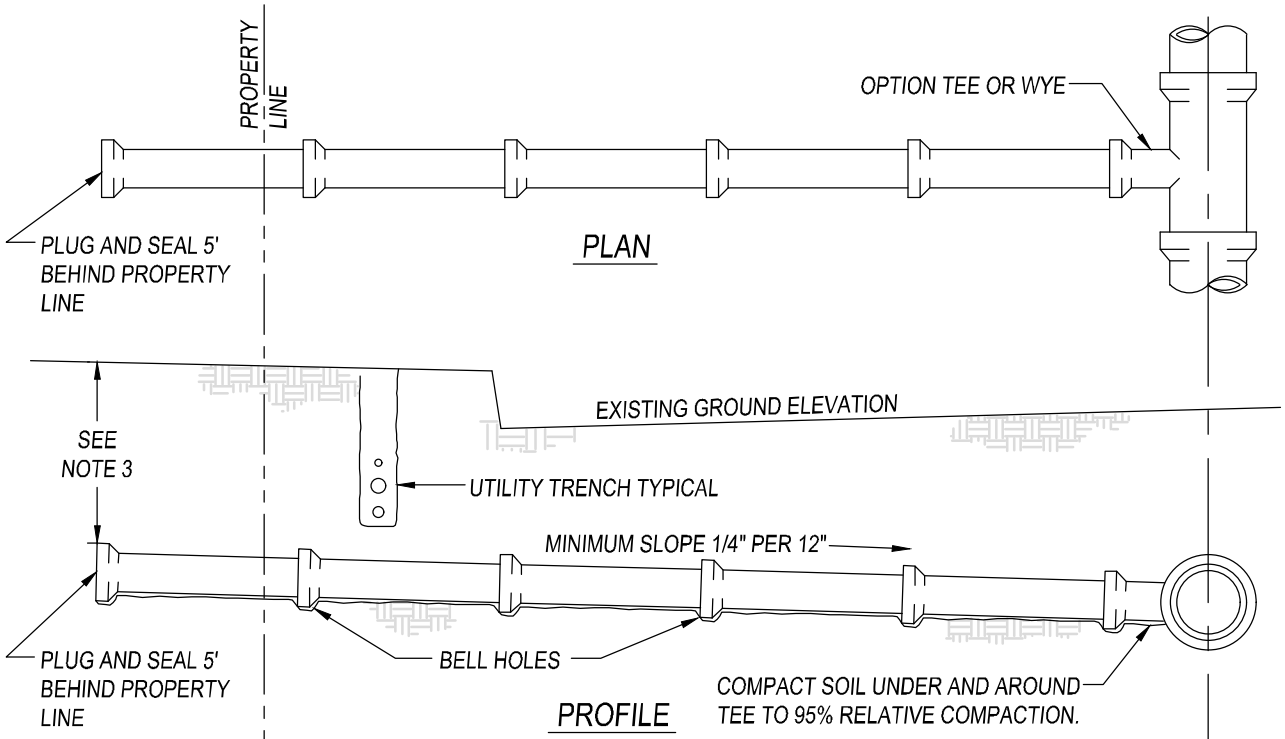
1. SEWER CLEANOUT RISER SHALL BE 6" MINIMUM PVC WITH A MINIMUM PIPE STIFFNESS OF 46 AT 5% DEFLECTION.
2. SEWER CLEANOUT FRAME AND COVER SHALL BE CHRISTY G5 TRAFFIC VALVE BOX OR EQUAL.
3. PLUG MAIN LINE END WITH CAP APPROVED BY THE PIPE MANUFACTURER FOR USE WITH THE PRODUCT.
4. CONCRETE COLLAR SHALL BE CLASS 3 CONCRETE.
5. CONCRETE COLLAR SHALL BE 26-1/4" IN DIAMETER OR ALTERNATIVE 26-1/4"X26-1/4" SQUARE.
6. MORTAR MIXTURE SHALL BE ONE PART CEMENT PER TWO PARTS SAND.

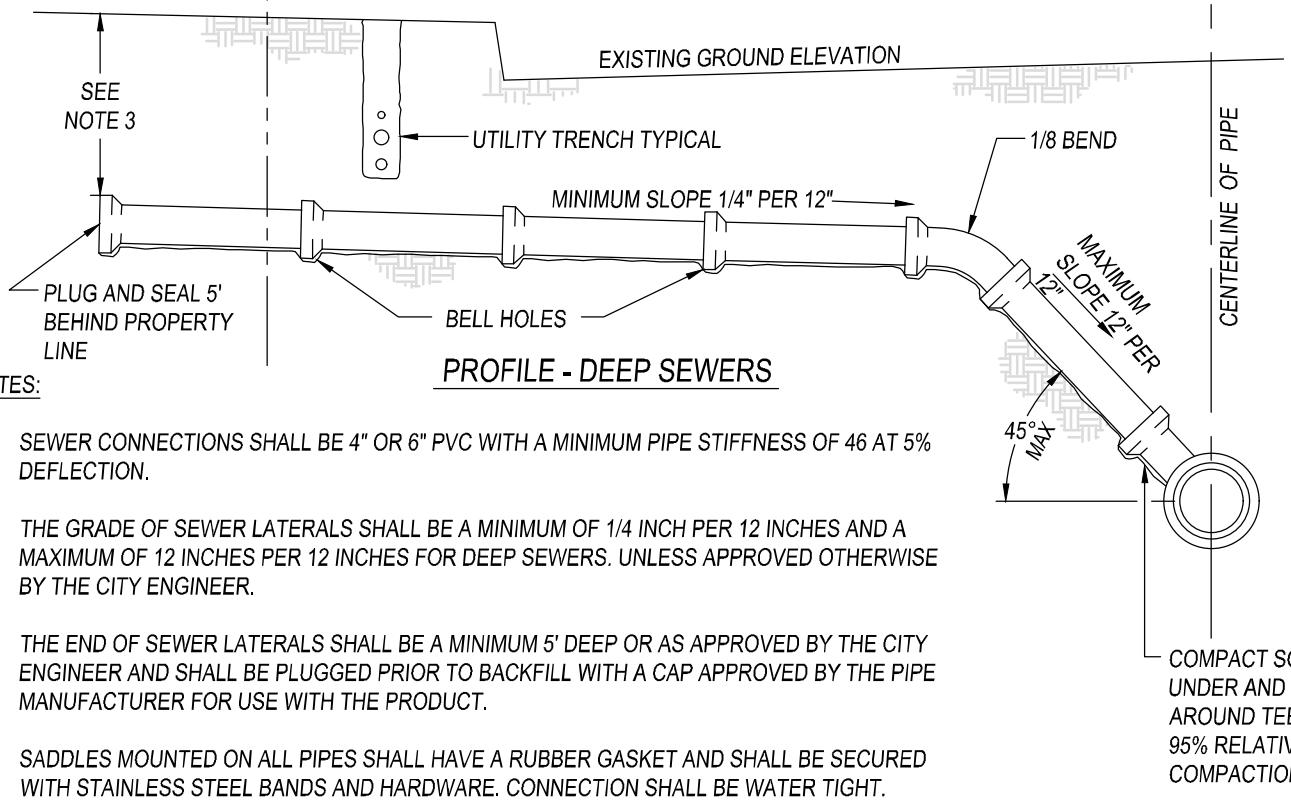
City of Lindsay

CITY SERVICES DEPARTMENT

SANITARY SEWER CLEANOUT

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-7
			DATE 03/06/25	





NOTES:

1. SEWER CONNECTIONS SHALL BE 4" OR 6" PVC WITH A MINIMUM PIPE STIFFNESS OF 46 AT 5% DEFLECTION.
2. THE GRADE OF SEWER LATERALS SHALL BE A MINIMUM OF 1/4 INCH PER 12 INCHES AND A MAXIMUM OF 12 INCHES PER 12 INCHES FOR DEEP SEWERS. UNLESS APPROVED OTHERWISE BY THE CITY ENGINEER.
3. THE END OF SEWER LATERALS SHALL BE A MINIMUM 5' DEEP OR AS APPROVED BY THE CITY ENGINEER AND SHALL BE PLUGGED PRIOR TO BACKFILL WITH A CAP APPROVED BY THE PIPE MANUFACTURER FOR USE WITH THE PRODUCT.
4. SADDLES MOUNTED ON ALL PIPES SHALL HAVE A RUBBER GASKET AND SHALL BE SECURED WITH STAINLESS STEEL BANDS AND HARDWARE. CONNECTION SHALL BE WATER TIGHT.
5. A 3" "S" SHALL BE CHISELED OR STAMPED ON THE TOP OF CONCRETE CURB TO VERIFY SEWER LATERAL LOCATION.

City of Lindsay

CITY SERVICES DEPARTMENT

SANITARY SEWER CONNECTION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	SS-8
			DATE 03/06/25	

OUTSIDE COMMERCIAL AND INDUSTRIAL SAND, SILT, GREASE, OIL, AND GARBAGE INTERCEPTORS

1. THE SIZE AND DETAILS OF ALL INTERCEPTORS SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE CALIFORNIA PLUMBING CODE, CURRENT EDITION, HEREINAFTER REFERRED TO AS CPC. ALL INTERCEPTORS SHALL BE SEALED AND WATER TIGHT.

2. INTERCEPTORS SHALL BE CONSTRUCTED AND VENTED IN ACCORDANCE WITH THE SPECIFICATIONS SET FORTH IN THE CPC.

3. THE LOCATION OF THE INTERCEPTOR SHALL BE APPROVED BY THE CITY SERVICES DEPARTMENT PRIOR TO CONSTRUCTION.

4. ALL CAST IN PLACE OR PRECAST INTERCEPTOR UNITS SHALL BE APPROVED BY THE CITY SERVICES DEPARTMENT PRIOR TO CONSTRUCTION.

5. THE OWNER SHALL BE RESPONSIBLE FOR PROVIDING ALL DOCUMENTATION AND TESTING TO CERTIFY THAT THE INTERCEPTORS AND WASTE STREAMS MEETS THE REQUIREMENTS OF ALL CURRENT REGULATIONS AND THE QUALITY ASSURANCE DIVISION REQUIREMENTS.

6. PRE -CAST INTERCEPTORS SHALL BE LABELED WITH THE MANUFACTURERS NAME, MODEL NUMBER AND SHALL HAVE AN I.A.P.M.O. CERTIFICATION MARK.

7. ALL CONCRETE FOR CAST-IN-PLACE INTERCEPTORS SHALL BE CLASS 2 CONCRETE IN ACCORDANCE WITH THE CITY OF LINDSAY STANDARD SPECIFICATIONS AND ENGINEERING DESIGN & IMPROVEMENT STANDARDS.

8. CAST IRON FRAMES MAY BE CAST INTO THE INTERCEPTOR LID.

9. ALL INTERCEPTORS SHALL BE ACCESSIBLE TO THE CITY FOR TESTING AT ANY TIME.

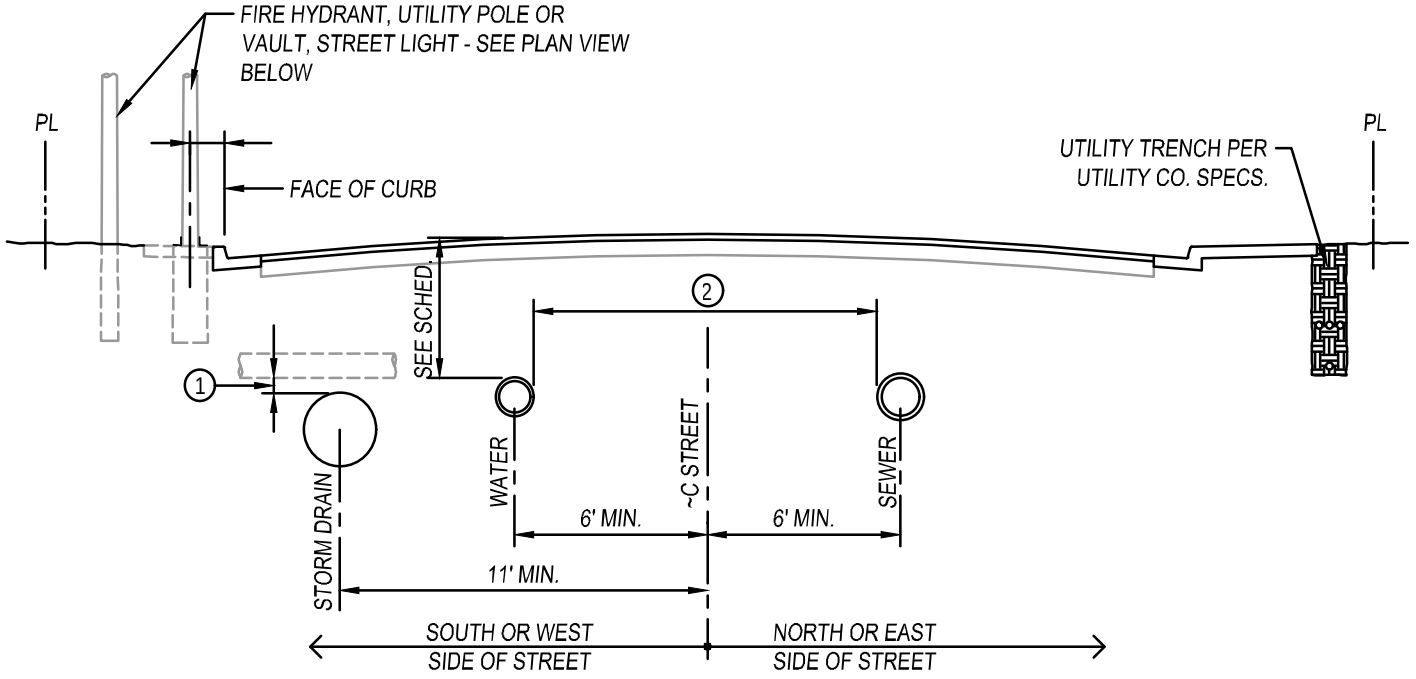
CITY OF LINDSAY CITY SERVICES DEPARTMENT
150 N. MIRAGE AVE.
LINDSAY, CA 93247
TEL. 559.562.7102

City of Lindsay

CITY SERVICES DEPARTMENT

OUTSIDE INDUSTRIAL & COMMERCIAL, SAND & GREASE TRAP

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	SS-9
			DATE	03/06/25	

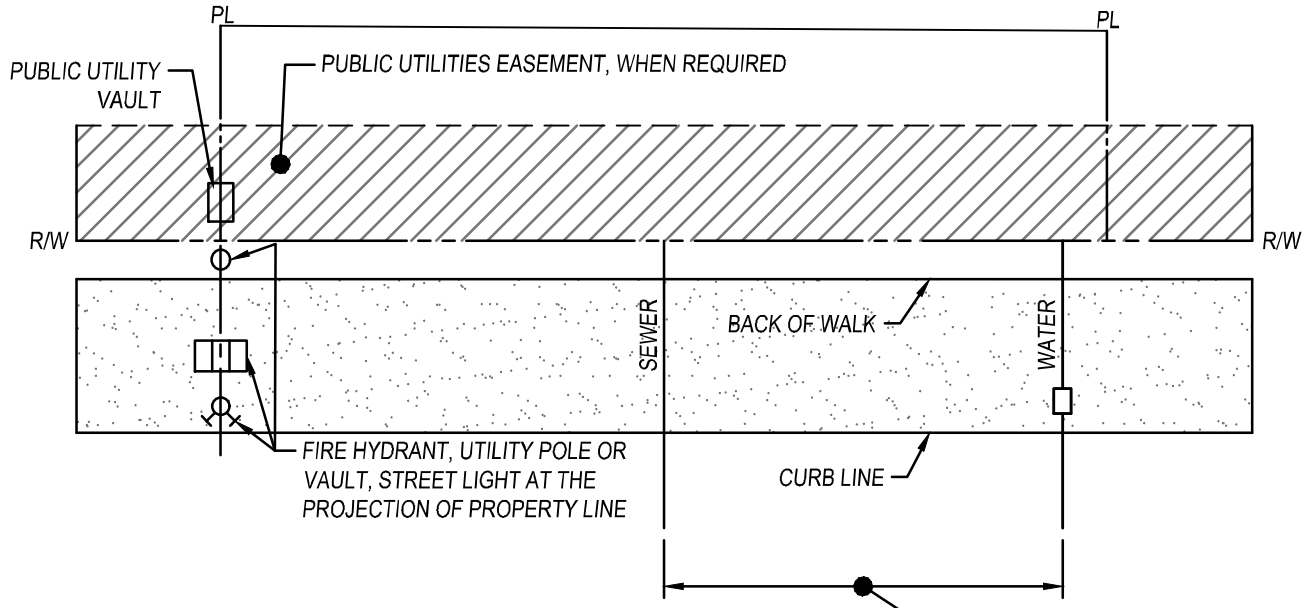


NOTES:

1. MINIMUM VERTICAL SEPARATION AT ALL UTILITY CROSSINGS SHALL BE 6" CLEAR, UNLESS OTHERWISE APPROVED BY THE CITY ENGINEER.
2. SEE DRAWING W-3.

WATER MAIN - DEPTH SCHEDULE

SIZE OF MAIN (INCHES)	MIN. COVER BELOW FIN. GRADE (FEET)	MIN. COVER BELOW SUBGRADE (FEET)
6	3.5 OR	2.5 (WHICHEVER IS DEEPER)
8	4.0 OR	3.0 (WHICHEVER IS DEEPER)
10	4.0 OR	3.0 (WHICHEVER IS DEEPER)
12	4.0 OR	3.0 (WHICHEVER IS DEEPER)



PLAN VIEW

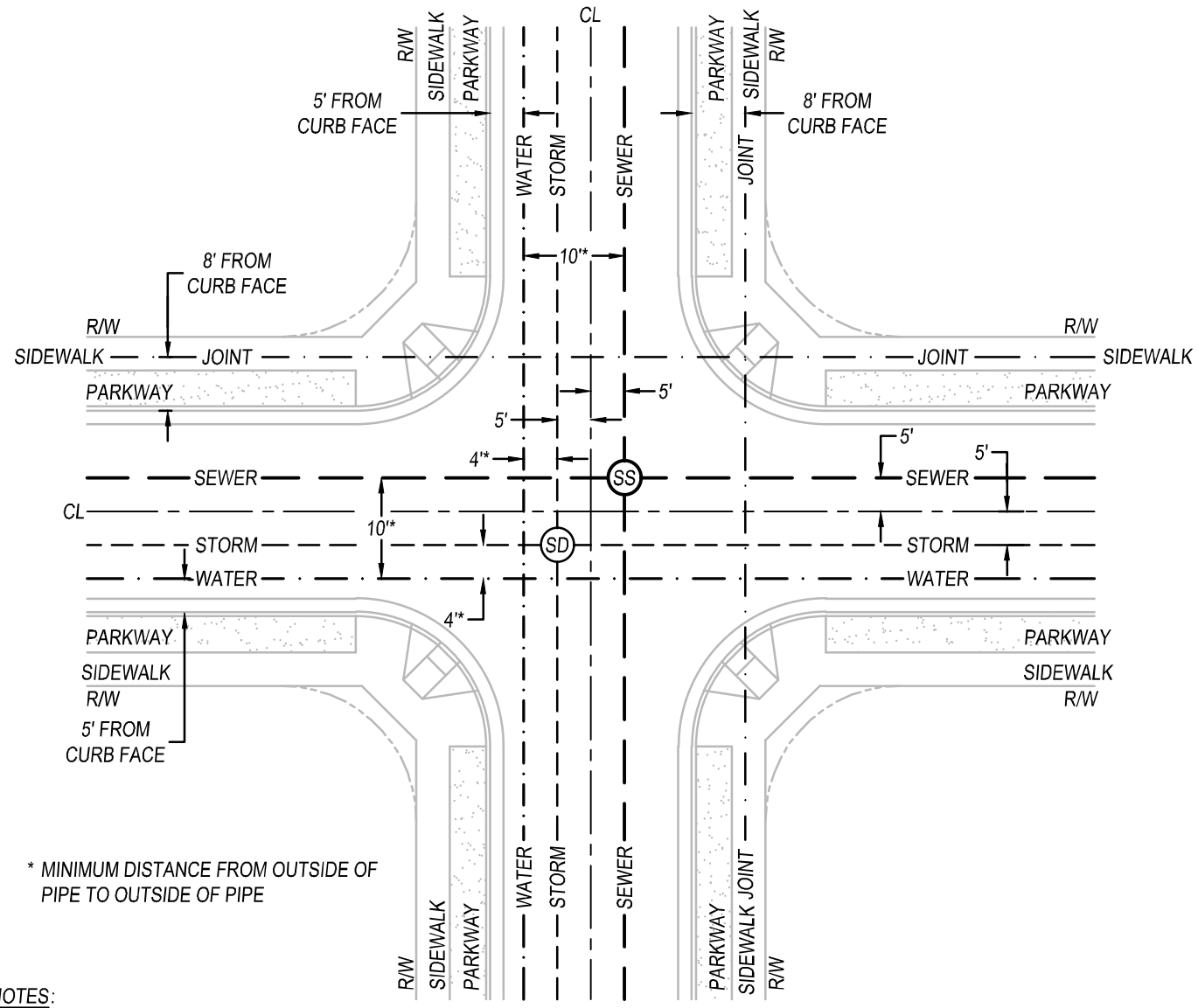
NOTE:
STAMP TOP OF CURB W/3" TO 4" TALL "S" FOR SANITARY SEWER LATERALS AND "W" FOR WATER LATERALS.

City of Lindsay

CITY SERVICES DEPARTMENT

UTILITY LOCATION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-1
			DATE 03/06/25	



NOTES:

1. SANITARY SEWER LINES SHALL BE LOCATED NORTH OR EAST OF THE STREET CENTERLINE AND AT LEAST 10 FT HORIZONTALLY AND 1 FT LOWER THAN WATER MAIN.
2. STORM DRAIN LINES SHALL BE LOCATED SOUTH OR WEST OF THE STREET CENTERLINE.
3. WATER MAIN SHALL BE LOCATED SOUTH OR WEST OF THE STREET CENTERLINE. HORIZONTAL AND VERTICAL CLEARANCES TO SANITARY SEWER AND STORM DRAIN LINES SHALL MEET THE REQUIREMENTS OF THE "STATE OF CALIFORNIA DEPARTMENT OF HEALTH SERVICES GUIDANCE MEMO NO. 2003-02: GUIDANCE FOR THE SEPARATION OF WATER MAINS AND NON-POTABLE PIPELINES".
4. JOINT UTILITY FACILITIES (GAS, ELECTRIC, TELEPHONE AND CABLE TELEVISION) SHALL BE LOCATED NORTH OR EAST OF THE STREET CENTERLINE.
5. IF EXISTING UTILITY LOCATIONS DO NOT CONFORM TO THIS STANDARD, ALTERNATE LOCATIONS MAY BE APPROVED BY CITY ENGINEER.
6. UTILITY LINES SHOULD BE PLACED OUTSIDE THE TRAVELED WAY WHERE POSSIBLE.
7. MINIMUM VERTICAL SEPARATION AT ALL UTILITY CROSSINGS SHALL BE 1 FT OR AS REQUIRED BY THE UTILITY COMPANY; WHICHEVER

City of Lindsay

CITY SERVICES DEPARTMENT

UTILITY LOCATION

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-2
			DATE 03/06/25	

CRITERIA FOR THE SEPARATION OF WATER MAINS AND SANITARY SEWERS

A. PUBLIC HEALTH CONSIDERATIONS

SANITARY SEWERS MAY LEAK AND SATURATE THE SURROUNDING SOIL WITH SEWAGE. THIS IS CAUSED PRIMARILY BY STRUCTURAL FAILURE OF THE SEWER LINE, IMPROPERLY CONSTRUCTED JOINTS, AND SUBSIDENCE OR UPHEAVAL OF THE SOIL ENCASING THE CONDUIT. A SERIOUS PUBLIC HEALTH HAZARD EXISTS WHEN THE WATER MAINS ARE DEPRESSURIZED AND NO PRESSURE OR NEGATIVE PRESSURES OCCUR. THE HAZARD IS FURTHER COMPOUNDED WHEN, IN THE COURSE OF INSTALLING OR REPAIRING A WATER MAIN, EXISTING SEWER LINES ARE BROKEN. SEWAGE SPILLS INTO THE EXCAVATION AND, HENCE, ENTERS INTO THE WATER MAIN ITSELF. ADDITIONALLY, IF A WATER MAIN FAILS IN CLOSE PROXIMITY TO A SEWER LINE, THE RESULTANT FAILURE MAY DISTURB THE BEDDING OF THE SEWER LINE AND CAUSE IT TO FAIL. IN THE EVENT OF AN EARTHQUAKE OR MAN-MADE DISASTER, SIMULTANEOUS FAILURE OF BOTH CONDUITS MAY OCCUR.

THE WATER SUPPLIER IS RESPONSIBLE FOR THE QUALITY OF THE WATER DELIVERED TO CONSUMERS AND MUST TAKE ALL PRACTICAL STEPS TO MINIMIZE THE HAZARD OF SEWAGE CONTAMINATION TO THE PUBLIC WATER SUPPLY. PROTECTION OF THE QUALITY OF THE WATER IN THE PUBLIC WATER SYSTEM IS BEST ACHIEVED BY THE BARRIER PROVIDED BY THE PHYSICAL SEPARATION OF THE WATER MAINS AND SEWER LINES.

THIS DOCUMENT SETS FORTH THE CONSTRUCTION CRITERIA FOR THE INSTALLATION OF WATER MAINS AND SEWER LINES TO PREVENT CONTAMINATION OF THE PUBLIC WATER SUPPLIES FROM NEARBY SANITARY SEWERS.

B. BASIC SEPARATION STANDARDS

THE "CALIFORNIA WATERWORKS STANDARDS" SETS FORTH THE MINIMUM SEPARATION REQUIREMENTS FOR WATER MAINS AND SEWER LINES. THESE STANDARDS, CONTAINED IN SECTION 64630, TITLE 22, CALIFORNIA ADMINISTRATIVE CODE, SPECIFY:

(a) (1) PARALLEL CONSTRUCTION: THE HORIZONTAL DISTANCE BETWEEN PRESSURE WATER MAINS AND SEWER LINES SHALL BE AT LEAST 10 FEET.

(1) PERPENDICULAR CONSTRUCTION (CROSSING): PRESSURE WATER MAINS SHALL BE AT LEAST 12 INCHES ABOVE SANITARY SEWER LINES WHERE THESE LINES MUST CROSS.

(b) SEPARATION DISTANCES SPECIFIED IN (a) SHALL BE MEASURED FROM THE NEAREST EDGES OF THE FACILITIES.

(c) COMMON TRENCH: WATER MAINS AND SEWER LINES MUST NOT BE INSTALLED IN THE SAME TRENCH.

WHEN WATER MAINS AND SANITARY SEWERS ARE NOT ADEQUATELY SEPARATED, THE POTENTIAL FOR CONTAMINATION OF THE WATER SUPPLY INCREASES. THEREFORE, WHEN ADEQUATE PHYSICAL SEPARATION CANNOT BE ATTAINED, AN INCREASE IN THE FACTOR OF SAFETY SHALL BE PROVIDED, AS DIRECTED BY THE CITY ENGINEER, BY INCREASING THE STRUCTURAL INTEGRITY OF BOTH THE PIPE MATERIALS, JOINTS AND BACKFILL MATERIALS OR ENCASEMENT.

C. EXCEPTIONS TO BASIC SEPARATION STANDARDS

LOCAL CONDITIONS, SUCH AS AVAILABLE SPACE, LIMITED SLOPE, EXISTING STRUCTURES, ETC., MAY CREATE A SITUATION WHERE THERE IS NO ALTERNATIVE BUT TO INSTALL WATER MAINS OR SEWER LINES AT A DISTANCE LESS THAN THAT REQUIRED BY THE BASIC SEPARATION STANDARDS. IN SUCH CASES, ALTERNATIVE CONSTRUCTION CRITERIA AS SPECIFIED IN SECTION E SHALL BE FOLLOWED, SUBJECT TO THE SPECIAL PROVISIONS IN SECTION D.

D. SPECIAL PROVISION

1. THE BASIC SEPARATION STANDARDS ARE APPLICABLE UNDER NORMAL CONDITIONS FOR SEWAGE COLLECTION LINES AND WATER DISTRIBUTION MAINS. MORE STRINGENT REQUIREMENTS MAY BE NECESSARY IF CONDITIONS SUCH AS HIGH GROUND WATER EXIST.

2. SEWER LINES SHALL NOT BE INSTALLED WITHIN 26 FEET HORIZONTALLY OF A LOW HEAD (5 PSI OR LESS PRESSURE) WATER MAIN.

D. SPECIAL PROVISIONS CONT'D

3. NEW WATER MAINS AND SEWERS SHALL BE PRESSURE TESTED WHERE THE CONDUITS ARE LOCATED 10 FEET APART OR LESS.

4. IN THE INSTALLATION OF WATER MAINS OR SEWER LINES, MEASURES SHOULD BE TAKEN TO PREVENT OR MINIMIZE DISTURBANCES OF THE EXISTING LINE. DISTURBANCE OF THE SUPPORTING BASE OF THIS LINE COULD EVENTUALLY RESULT IN FAILURE OF THIS EXISTING PIPELINE.

5. SPECIAL CONSIDERATION SHALL BE GIVEN TO THE SELECTION OF PIPE MATERIALS IF CORROSIVE CONDITIONS ARE LIKELY TO EXIST. THESE CONDITIONS MAY BE DUE TO SOIL TYPE AND/OR THE NATURE OF THE FLUID CONVEYED IN THE CONDUIT, SUCH AS A SEPTIC SEWAGE WHICH PRODUCES CORROSIVE HYDROGEN SULFIDE.

6. SEWER FORCE MAINS

a. SEWER FORCE MAINS SHALL NOT BE INSTALLED WITHIN 10 FEET (HORIZONTALLY) OF A WATER MAIN.

b. WHEN A SEWER FORCE MAIN MUST CROSS A WATER LINE, THE CROSSING SHOULD BE AS CLOSE AS PRACTICAL TO THE PERPENDICULAR. THE SEWER FORCE MAIN SHOULD BE AT LEAST 12 INCHES BELOW THE WATER LINE.

c. WHEN A NEW SEWER FORCE MAIN CROSSES UNDER AN EXISTING WATER MAIN, ALL PORTIONS OF THE SEWER FORCE MAIN WITHIN 10 FEET (HORIZONTALLY) OF THE WATER MAIN SHALL BE ENCLOSED IN A CONTINUOUS SLEEVE.

d. WHEN A NEW WATER MAIN CROSSES OVER AN EXISTING SEWER FORCE MAIN, THE WATER MAIN SHALL BE CONSTRUCTED OF PIPE MATERIALS WITH A MINIMUM RATED WORKING PRESSURE OF 235 PSI OR EQUIVALENT PRESSURE RATING.

E. ALTERNATIVE CRITERIA FOR CONSTRUCTION

THE CONSTRUCTION CRITERIA FOR SEWER LINES OR WATER MAINS WHERE THE BASIC SEPARATION STANDARDS CANNOT BE ATTAINED ARE SHOWN IN FIGURES 1 AND 2, DRAWING NO. 6120. THERE ARE TWO SITUATIONS ENCOUNTERED:

CASE 1 -- NEW SEWER LINE - NEW OR EXISTING WATER MAIN.

CASE 2 -- NEW WATER MAIN -- EXISTING SEWER LINE.

FOR CASE 1, THE ALTERNATE CONSTRUCTION CRITERIA APPLY TO THE SEWER LINE.

FOR CASE 2, THE ALTERNATE CONSTRUCTION CRITERIA MAY APPLY TO EITHER OR BOTH THE WATER MAIN AND SEWER LINE.

THE CONSTRUCTION CRITERIA SHOULD APPLY TO THE HOUSE LATERALS THAT CROSS ABOVE A PRESSURE WATER MAIN BUT NOT TO THOSE HOUSE LATERALS THAT CROSS BELOW A PRESSURE WATER MAIN.

F. CONSIDERATION OF RECYCLED WATER

1. RECYCLED WATER MAINS SHALL BE TREATED AS SEWER MAINS WHEN CONSIDERING THEIR SEPARATION FROM POTABLE WATER.

2. RECYCLED WATER MAINS SHALL BE TREATED AS POTABLE WATER MAINS WHEN CONSIDERING THEIR SEPARATION FROM SEWERS.

G. NOTES AND DEFINITIONS

1. SEWER LINE - INCLUDES BOTH SEWER MAINS AND SEWER LATERALS.
2. STORM DRAIN LINE - INCLUDES BOTH STORM DRAIN MAIN AND STORM DRAIN LATERALS.
3. SEWER LATERAL - A SEWER LINE CONNECTING THE BUILDING DRAIN AND THE SANITARY SEWER MAIN LINE IN THE STREET.
4. STORM DRAIN LATERAL - A STORM DRAIN LINE CONNECTING DRAINAGE INLETS OR ADJACENT PROPERTIES TO THE STORM DRAIN MAIN IN THE STREET.
5. LOW HEAD WATER MAIN - ANY WATER MAIN WHICH HAS A PRESSURE OF 5 PSI OR LESS AT ANY TIME AND AT ANY POINT IN THE MAIN.

CASE 1
NEW SEWER MAIN BEING INSTALLED
(SEE FIGURE 1, IN NEXT SHEET)

ZONE	SPECIAL CONSTRUCTION REQUIRED FOR SEWER
A	SEWER LINES PARALLEL TO WATER MAINS SHALL NOT BE PERMITTED IN THIS ZONE WITHOUT APPROVAL FROM THE CITY ENGINEER.
B	A SEWER LINE PLACED PARALLEL TO A WATER LINE SHALL BE CONSTRUCTED OF: 1. PLASTIC SEWER PIPE WITH RUBBER RING JOINTS (PER ASTM D3034) OR EQUIVALENT. 2. DUCTILE IRON PIPE WITH COMPRESSION JOINTS.
C	A SEWER LINE CROSSING A WATER MAIN SHALL BE CONSTRUCTED OF: 1. DUCTILE IRON PIPE WITH HOT DIP BITUMINOUS COATING AND MECHANICAL JOINTS. 2. A CONTINUOUS SECTION OF CLASS 305 (DR 14 PER AWWA C900) PLASTIC PIPE OR EQUIVALENT, CENTERED OVER THE PIPE BEING CROSSED. 3. ANY SEWER PIPE WITHIN A CONTINUOUS SLEEVE.
D	A SEWER LINE CROSSING A WATER MAIN SHALL BE CONSTRUCTED OF: 1. A CONTINUOUS SECTION OF DUCTILE IRON PIPE WITH HOT DIP BITUMINOUS COATING. 2. A CONTINUOUS SECTION OF CLASS 305 (DR 14 PER AWWA C900) PLASTIC PIPE OR EQUIVALENT, CENTERED OVER THE PIPE BEING CROSSED. 3. ANY SEWER PIPE WITHIN A CONTINUOUS SLEEVE.

CASE 2
NEW WATER MAIN BEING INSTALLED
(SEE FIGURE 2, IN NEXT SHEET)

ZONE	SPECIAL CONSTRUCTION REQUIRED FOR WATER
A	NO WATER MAINS PARALLEL TO SEWERS SHALL BE CONSTRUCTED WITHOUT APPROVAL FROM THE CITY ENGINEER.
B	IF THE SEWER PARALLELING THE WATER MAIN DOES NOT MEET THE CASE 1, ZONE B REQUIREMENTS, THE WATER MAIN SHALL BE CONSTRUCTED OF: 1. DUCTILE IRON PIPE WITH HOT DIP BITUMINOUS COATING. 2. CLASS 305 PRESSURE RATED PLASTIC WATER PIPE (DR 14 PER AWWA C900) OR EQUIVALENT.
C	IF THE SEWER CROSSING THE WATER MAIN DOES NOT MEET THE CASE 1, ZONE C REQUIREMENTS, THE WATER MAIN SHALL HAVE NO JOINTS WITHIN 10' EACH WAY OF CROSSING. 1. DUCTILE IRON PIPE WITH HOT DIP BITUMINOUS COATING. 2. CLASS 305 PRESSURE RATED PLASTIC WATER PIPE (DR 14 PER AWWA C900) OR EQUIVALENT.
D	IF THE SEWER CROSSING THE WATER MAIN DOES NOT MEET THE CASE 1, ZONE D REQUIREMENTS, THE WATER MAIN SHALL HAVE NO JOINTS WITHIN 4 FEET FROM EITHER SIDE OF THE SEWER AND SHALL BE CONSTRUCTED OF: 1. DUCTILE IRON PIPE WITH HOT DIP BITUMINOUS COATING. 2. CLASS 305 PRESSURE RATED PLASTIC WATER PIPE (DR 14 PER AWWA C900) OR EQUIVALENT.

NOTES:

1. FOR CASE 1, ZONE C, THE SANITARY SEWER SHALL HAVE NO JOINTS WITHIN 10 FEET OF EITHER SIDE OF THE WATER MAIN.

2. ALL MAINS AND LATERALS SHALL HAVE TRACER WIRE PER DRAWING NO. 6020.

City of Lindsay
CITY SERVICES DEPARTMENT

WATER - SEWER / STORM SEPARATION REQUIREMENTS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
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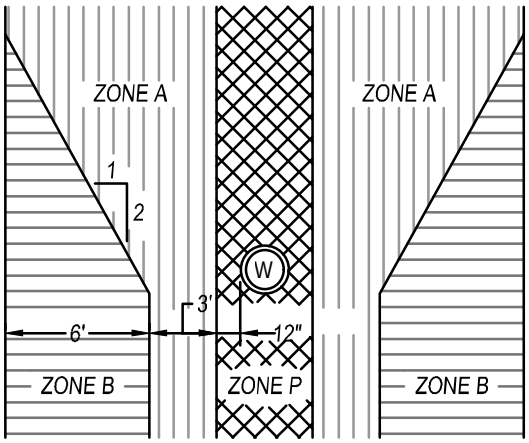
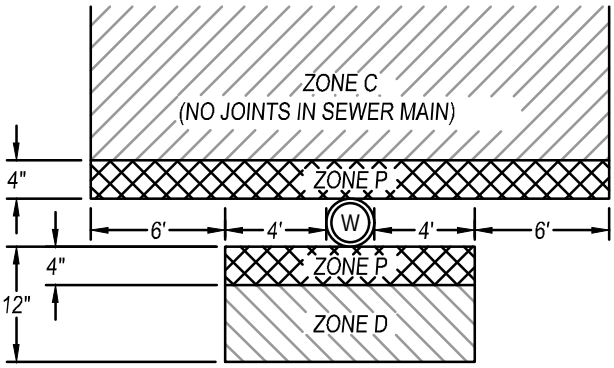
			DATE 03/06/25	3 OF 4

CRITERIA FOR THE SEPARATION OF WATER MAINS AND SANITARY SEWERS

REFER TO DRAWING NO. W-3 FOR SEPARATION CRITERIA TEXT



PARALLEL



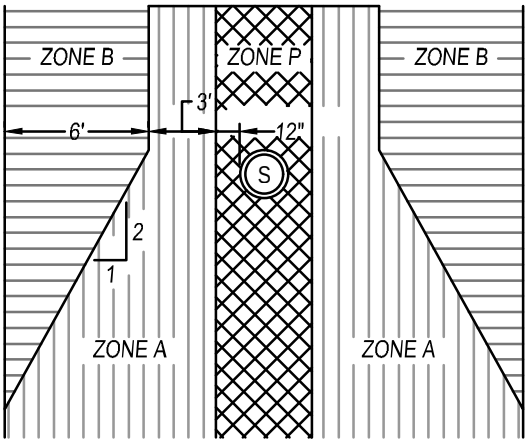
CROSSING

CASE 1

NEW SEWER MAIN

FIGURE 1

ZONE P IS A PROHIBITED ZONE, SECTION 64630(E)(2) CALIFORNIA ADMINISTRATIVE CODE, TITLE 22.



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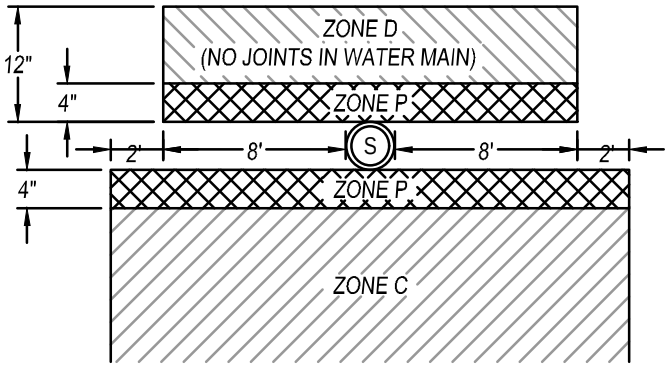


CROSSING

CASE 2

NEW WATER MAIN

FIGURE 2

NOTES AND DEFINITIONS

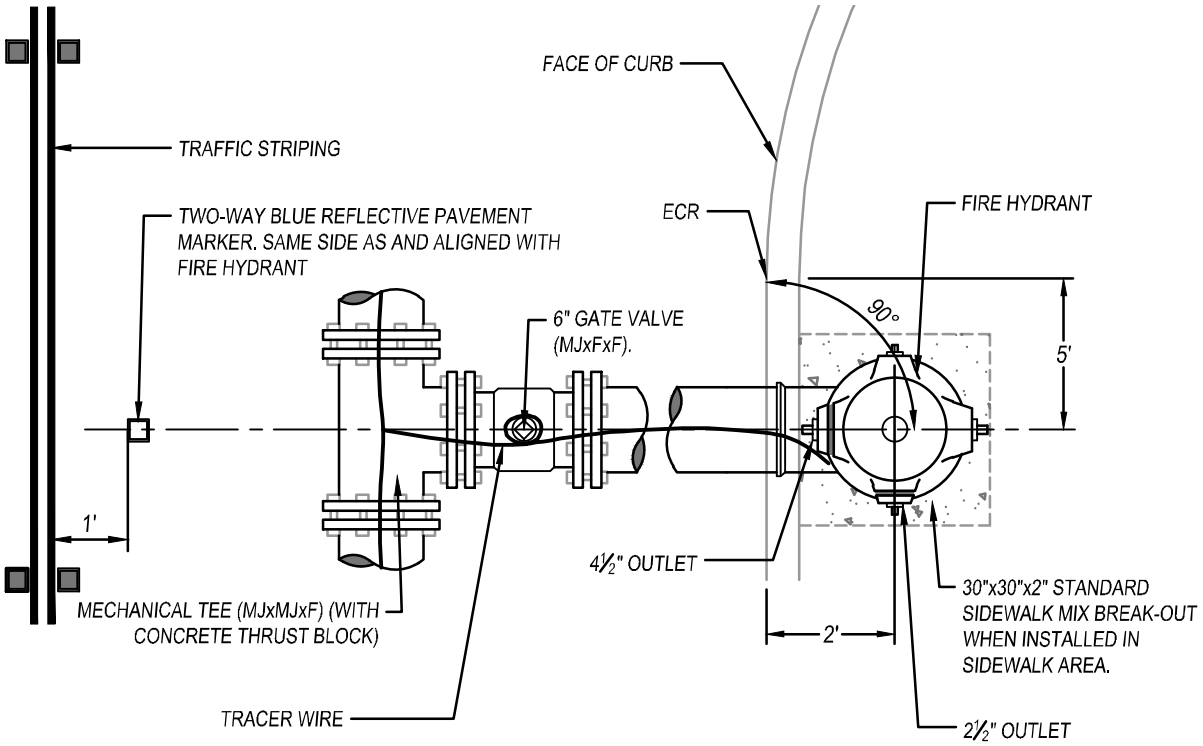
1. COMPRESSION JOINT - A PUSH-ON JOINT THAT SEALS BY MEANS OF THE COMPRESSION OF A RUBBER RING OR GASKET BETWEEN THE PIPE AND A BELL OR COUPLING.
2. DIMENSIONS ARE FROM THE OUTSIDE OF WATER MAIN TO OUTSIDE OF SEWER LINE OR MANHOLE.
3. FUSED JOINT - THE JOINING OF SECTIONS OF PIPE USING THERMAL OR CHEMICAL BONDING PROCESSES.
4. HOUSE LATERAL - A SEWER LINE CONNECTING THE BUILDING DRAIN AND THE SANITARY SEWER MAIN LINE IN THE STREET.
5. LOW HEAD WATER MAIN - ANY WATER MAIN WHICH HAS A PRESSURE OF 5 PSI OR LESS AT ANY TIME AT ANY POINT IN THE MAIN.
6. MECHANICAL JOINT - BOLTED JOINT
7. RATED WORKING WATER PRESSURE OR PRESSURE CLASS - A PIPE CLASSIFICATION SYSTEM BASED UPON INTERNAL WORKING PRESSURE OF THE FLUID IN THE PIPE, TYPE OF PIPE MATERIAL, AND THE THICKNESS OF THE PIPE WALL.
8. SLEEVE - A PROTECTIVE TUBE OF STEEL WITH A WALL THICKNESS OF NOT LESS THAN ~4" INTO WHICH A PIPE IS INSERTED.
9. WATER SUPPLIER - ANY PERSON OR ENTITCY WHO OWNS OR OPERATES A PUBLIC WATER SYSTEM.

City of Lindsay

CITY SERVICES DEPARTMENT

WATER - SEWER / STORM SEPARATION REQUIREMENTS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-3
			DATE 03/06/25	4 OF 4

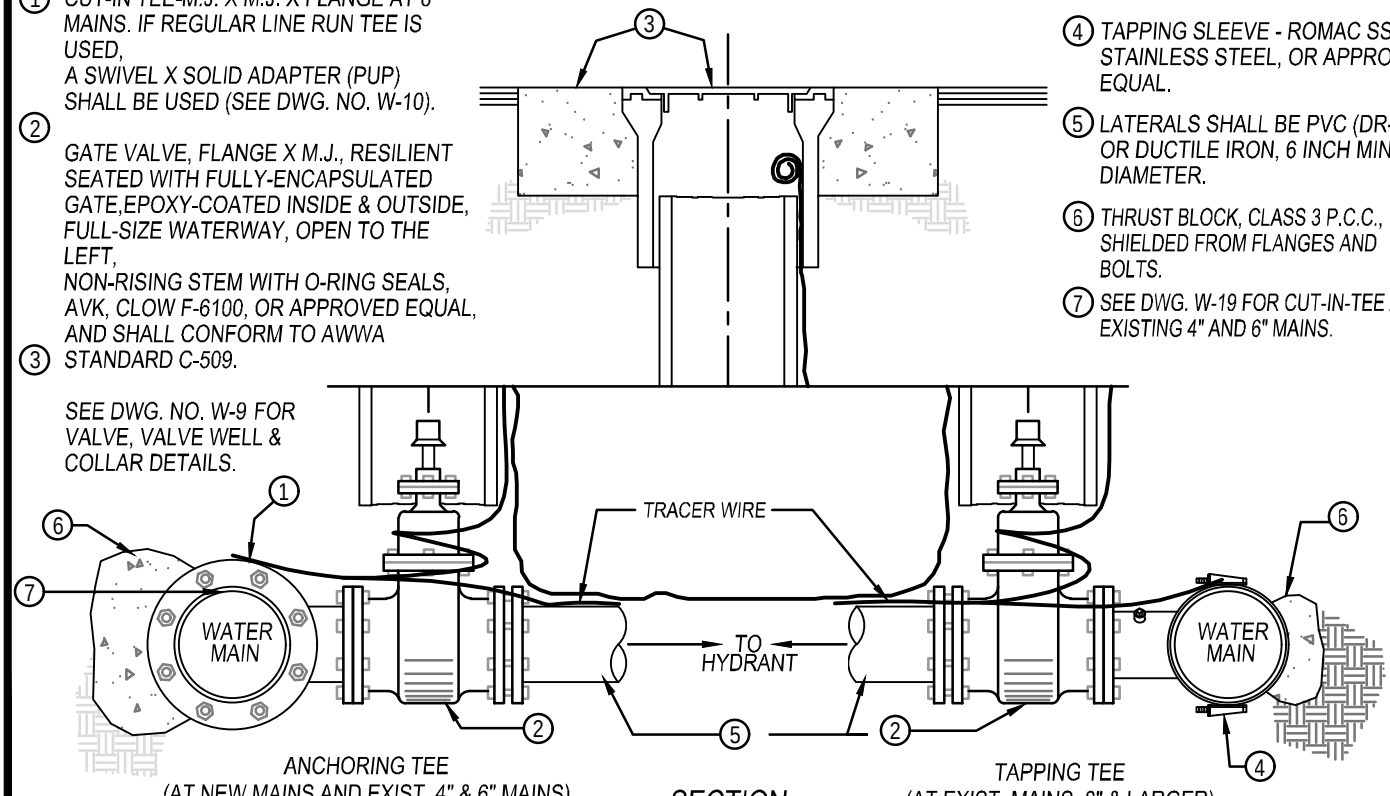


PLAN

NOTES:

1. CUT-IN TEE-M.J. X M.J. X FLANGE AT 6" MAINS. IF REGULAR LINE RUN TEE IS USED, A SWIVEL X SOLID ADAPTER (PUP) SHALL BE USED (SEE DWG. NO. W-10).
2. GATE VALVE, FLANGE X M.J., RESILIENT SEATED WITH FULLY-ENCAPSULATED GATE,EPOXY-COATED INSIDE & OUTSIDE, FULL-SIZE WATERWAY, OPEN TO THE LEFT, NON-RISING STEM WITH O-RING SEALS, AVK, CLOW F-6100, OR APPROVED EQUAL, AND SHALL CONFORM TO AWWA
3. STANDARD C-509.

   SEE DWG. NO. W-9 FOR VALVE, VALVE WELL & COLLAR DETAILS.
4. TAPPING SLEEVE - ROMAC SST-STAINLESS STEEL, OR APPROVED EQUAL.
5. LATERALS SHALL BE PVC (DR-18) OR DUCTILE IRON, 6 INCH MIN. DIAMETER.
6. THRUST BLOCK, CLASS 3 P.C.C., SHIELDED FROM FLANGES AND BOLTS.
7. SEE DWG. W-19 FOR CUT-IN-TEE AT EXISTING 4" AND 6" MAINS.



ANCHORING TEE (AT NEW MAINS AND EXIST. 4" & 6" MAINS)

SECTION

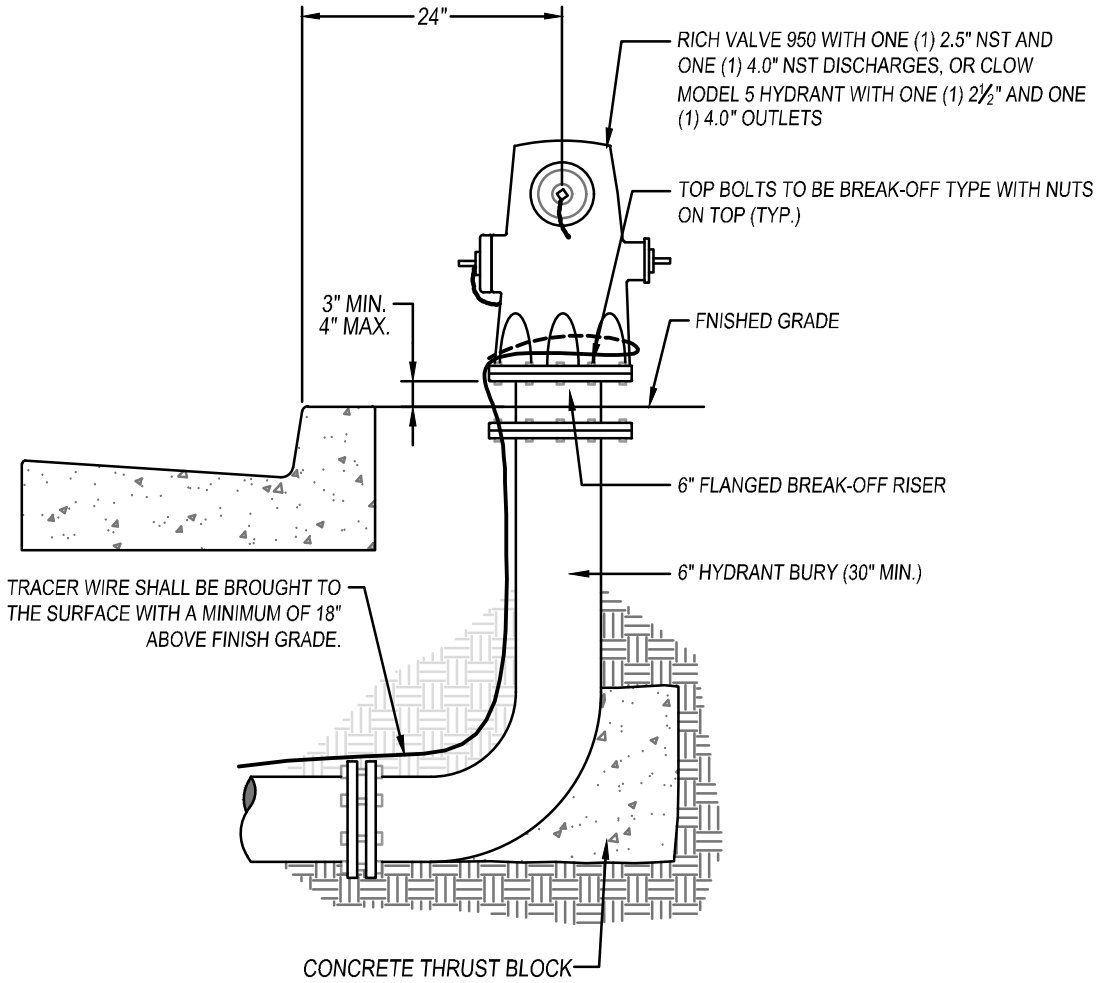
TAPPING TEE (AT EXIST. MAINS, 8" & LARGER)

City of Lindsay

CITY SERVICES DEPARTMENT

FIRE HYDRANT ASSEMBLY

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-4
			DATE 03/06/25	



NOTES

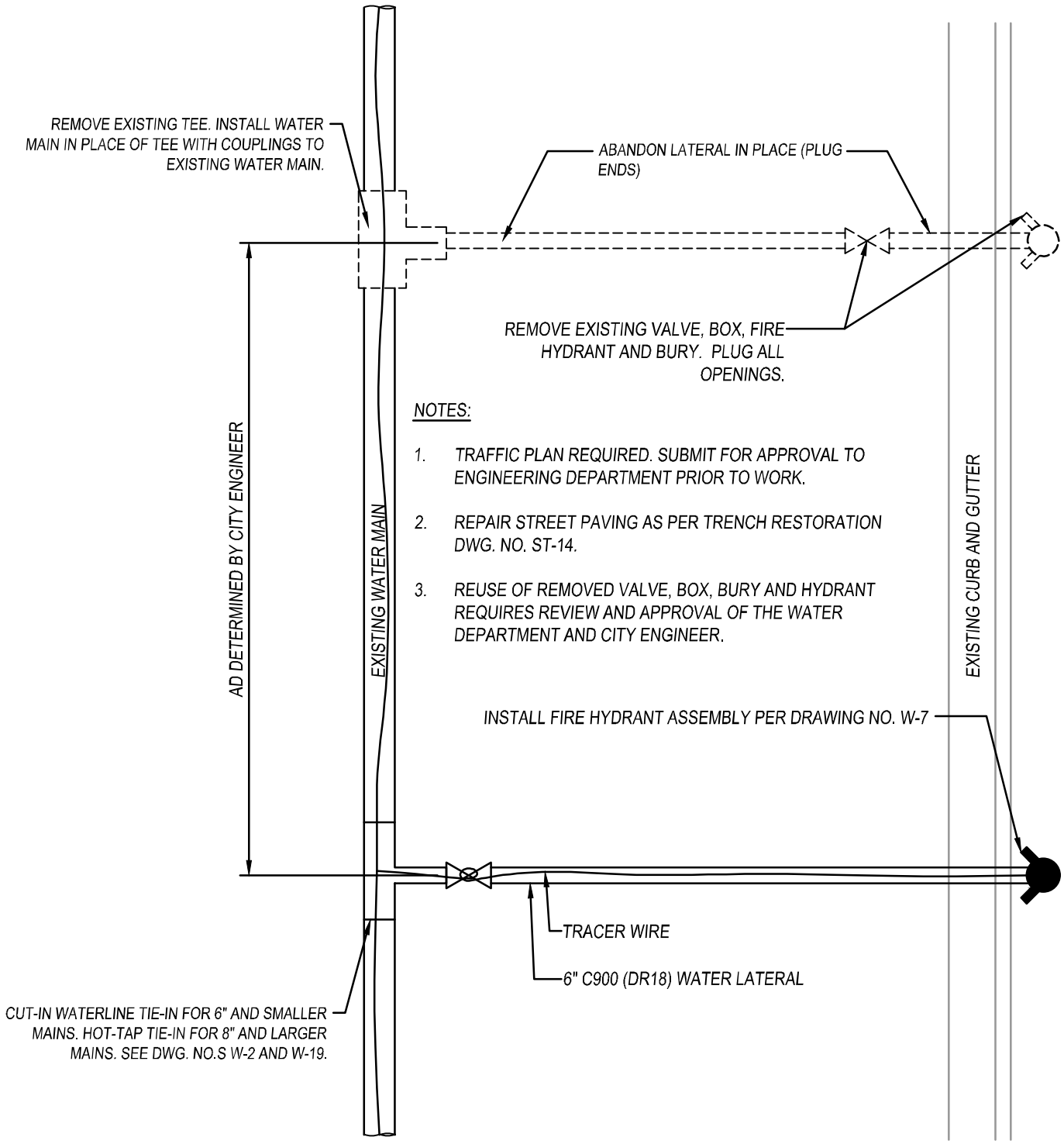
1. MATERIALS AND CONSTRUCTION PROCEDURE SHALL BE IN ACCORDANCE WITH CITY OF LINDSAY SPECIFICATIONS.
2. COLOR SHALL BE YELLOW, ENAMEL VALSPAR SUNSET GLOW 3009-02, OR APPROVED EQUAL.
3. HYDRANT BURY SHALL BE DUCTILE IRON.
4. TRENCH AND PAVEMENT RESTORATION SHALL BE PERFORMED IN ACCORDANCE WITH CITY OF LINDSAY, "TECHNICAL SPECIFICATIONS NO. 8, TRENCH AND PAVEMENT RESTORATION."

City of Lindsay

CITY SERVICES DEPARTMENT

FIRE HYDRANT

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	W-5
			DATE	03/06/25	



NOTES:

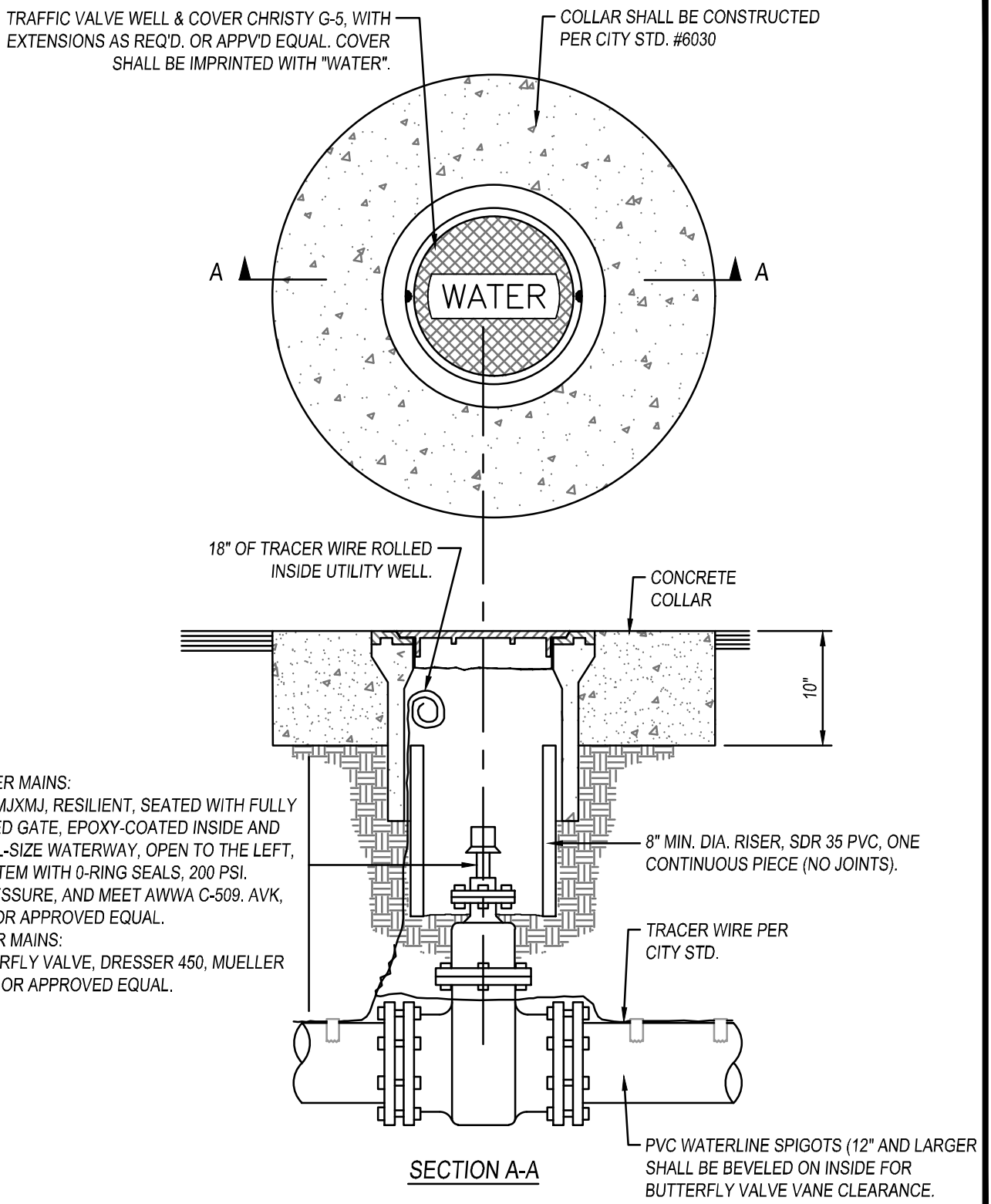
1. TRAFFIC PLAN REQUIRED. SUBMIT FOR APPROVAL TO ENGINEERING DEPARTMENT PRIOR TO WORK.
2. REPAIR STREET PAVING AS PER TRENCH RESTORATION DWG. NO. ST-14.
3. REUSE OF REMOVED VALVE, BOX, BURY AND HYDRANT REQUIRES REVIEW AND APPROVAL OF THE WATER DEPARTMENT AND CITY ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

FIRE HYDRANT REPLACEMENT

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-6
			DATE 03/06/25	



SECTION A-A

WATER VALVE

10" OR SMALLER MAINS:
GATE VALVE, MJXMJ, RESILIENT, SEATED WITH FULLY ENCAPSULATED GATE, EPOXY-COATED INSIDE AND OUTSIDE, FULL-SIZE WATERWAY, OPEN TO THE LEFT, NON-RISING STEM WITH 0-RING SEALS, 200 PSI. WORKING PRESSURE, AND MEET AWWA C-509. AVK, CLOW F-6100 OR APPROVED EQUAL.

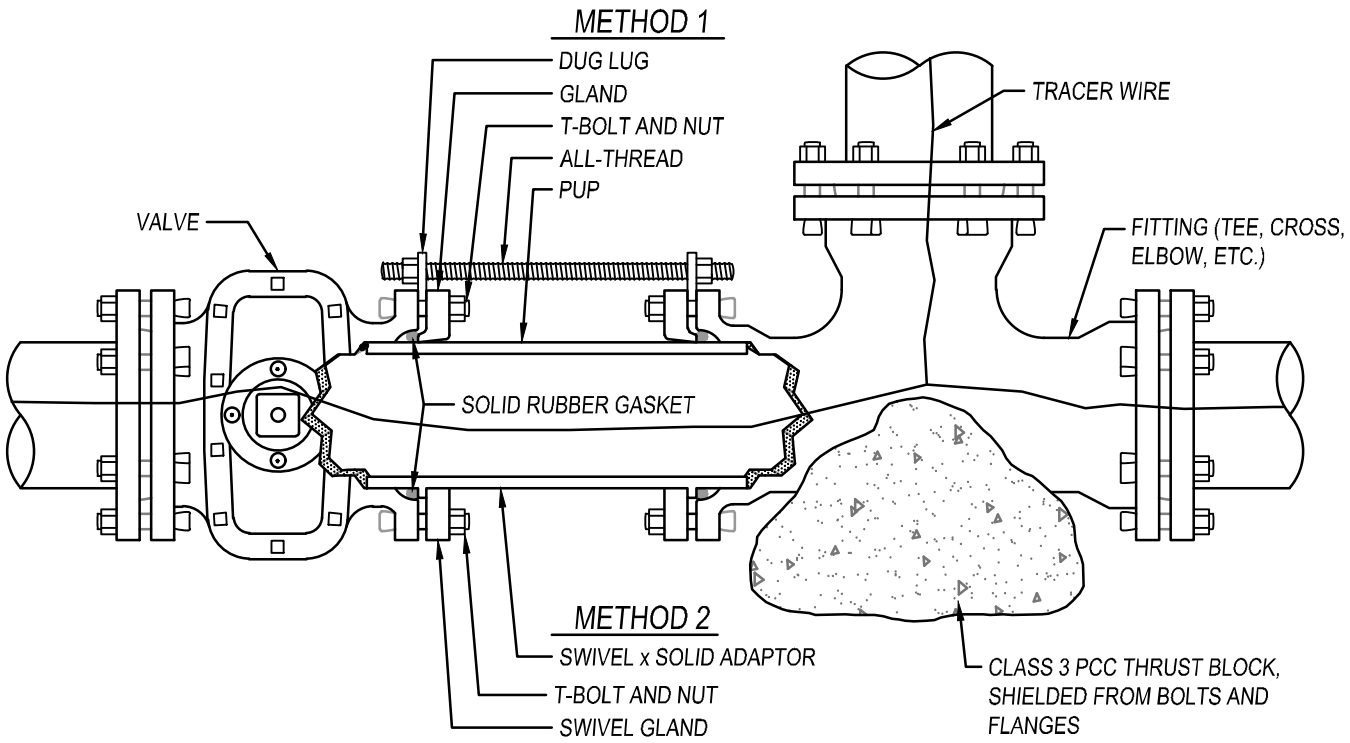
12" OR LARGER MAINS:
MJXMJ, BUTTERFLY VALVE, DRESSER 450, MUELLER LINE SEAL ILL, OR APPROVED EQUAL.

City of Lindsay

CITY SERVICES DEPARTMENT

WATER VALVE AND WELL

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-7
			DATE 03/06/25	



VALVES ADJACENT TO FITTINGS SHALL BE RESTRAINED IN ACCORDANCE WITH ONE OF THE FOLLOWING METHODS LISTED BELOW:

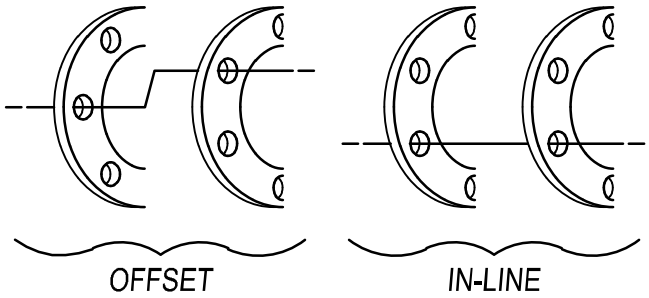
METHOD 1 - MAY BE USED ONLY WITH IN-LINE BOLT ALIGNMENT OF VALVE & FITTING. SEE CHART BELOW FOR NUMBER OF ALL THREADS. ALL-THREADS AND NUTS SHALL BE STAINLESS STEEL AND COATED WITH HENRY'S #204 ROOF CEMENT, OR EQUAL. THIS METHOD MAY BE USED ONLY WITH APPROVAL OF THE CITY WATER DEPARTMENT.

METHOD 2 - MAY BE USED WITH EITHER OFFSET OR IN-LINE BOLT ALIGNMENT.

METHOD 3 - FLANGE-TO-FLANGE BOLTED CONNECTION MAY BE USED.

METHOD 4 - RETAINER GLANDS MAY BE USED WITH DUCTILE IRON PIPE ONLY, SUBJECT TO CITY APPROVAL. RETAINER GLANDS MAY NOT BE USED ON FIRE HYDRANT LATERALS.

METHOD 5 - SWIVEL GLAND & INTEGRAL RETAINING LIP CONNECTIONS MAY BE USED.



BOLT HOLE ALIGNMENT

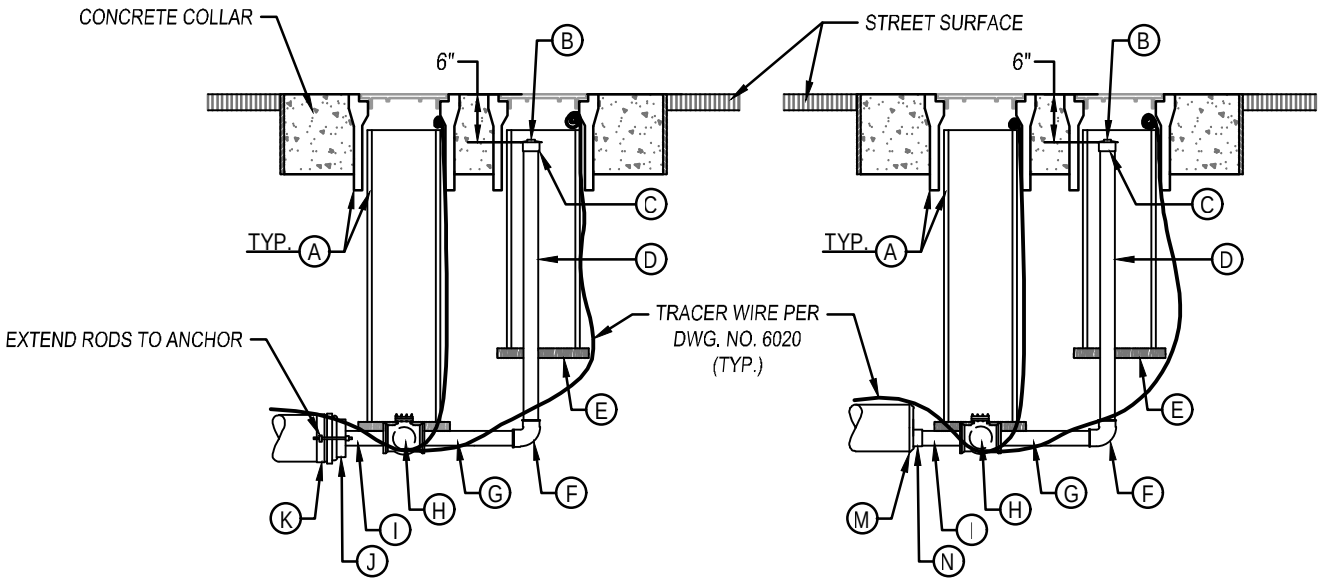
METHOD 1	
PIPE SIZE (INCHES)	NO. OF ALL-THREADS (MIN.)
4	2
6, 8, 10	4
12, 14	6
OVER 14	TO BE DETERMINED IN FIELD

City of Lindsay

CITY SERVICES DEPARTMENT

VALVE TO FITTING RESTRAINT

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-8
			DATE 03/06/25	



CAST IRON MAIN

WELDED STEEL MAIN

ITEM	MATERIAL	NO. REQ. EA.	CAST IRON MAIN					NO. REQ. EA.	WELDED STEEL MAIN					
			4"	6"	8"	10"	12"		4"	6"	8"	10"	12"	
A	GATE POT & COVER - 8"	2	✓	✓	✓	✓	✓	2	✓	✓	✓	✓	✓	
B	PLUG- 2" SCREW BLOCK	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
C	COUPLING - 2" SCREW GALV.	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
D	RISER - 2"x30" SCREW GALV.	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
E	REDWOOD BLOCKING - 2"x4"x12"	4	✓	✓	✓	✓	✓	4	✓	✓	✓	✓	✓	
F	ELL - 2" SCREW GALV. 90°	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
G	NIPPLE - 2"x12" SCREW GALV.	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
H	CURB STOP - 2"	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
I	NIPPLE - 2"x6" SCREW BRASS	1	✓	✓	✓	✓	✓	1	✓	✓	✓	✓	✓	
J	PLUG, COLLAR - PLUG & RODS	1	4"	6"	8"	10"	12"	-	-	-	-	-	-	
K	COLLAR - SINGLE	1	4"	6"	8"	10"	12"	-	-	-	-	-	-	
L	SLEEVE - C.I.	-	-	-	-	-	-	-	-	-	-	-	-	
M	BUMPED HEAD	-	-	-	-	-	-	1	4"	6"	8"	10"	12"	
N	COUPLING - 2" SCREW BLOCK	-	-	-	-	-	-	1	✓	✓	✓	✓	✓	

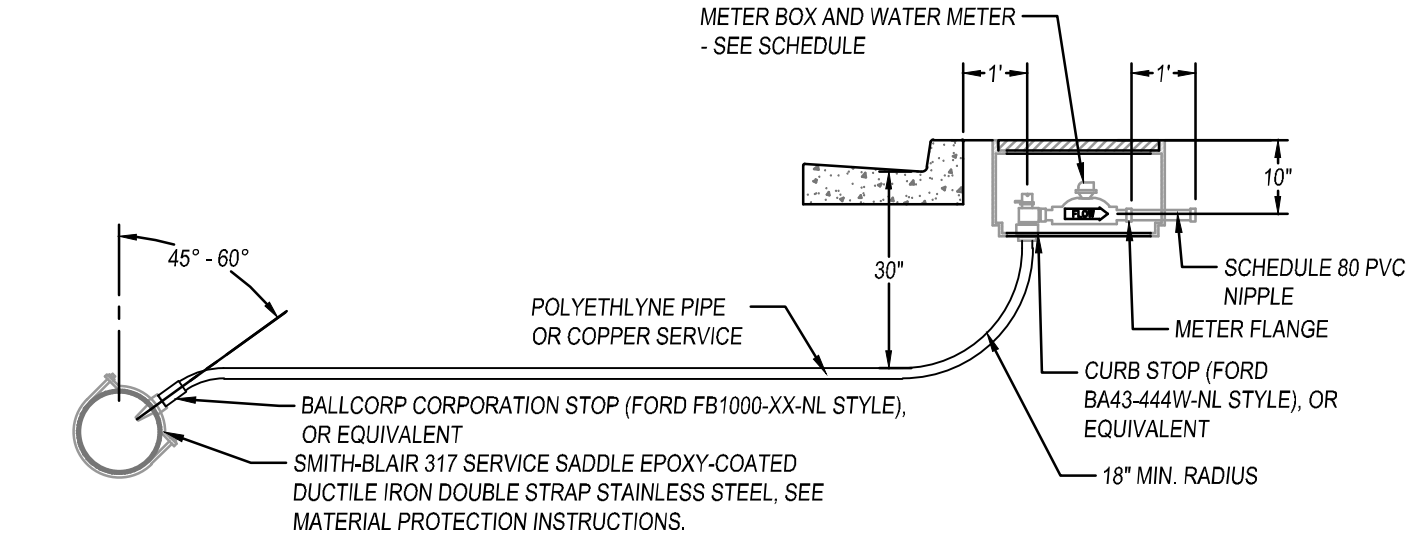
NOTE:
PAINT RODS, COLLARS, LUGS AND ENTIRE
BLOW-OFF ASSEMBLY WITH E.C. 244 ADHESIVE.

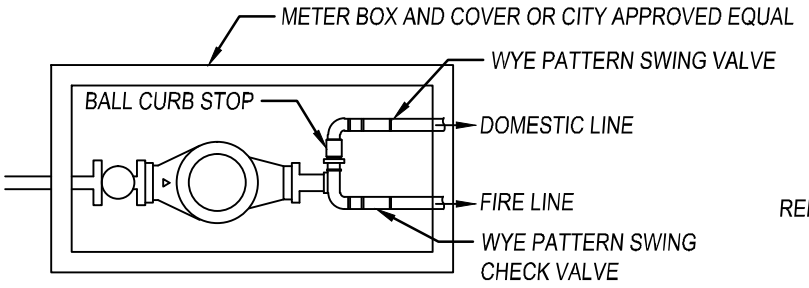
City of Lindsay

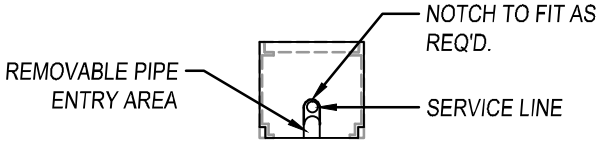
CITY SERVICES DEPARTMENT

BLOW OFF ASSEMBLY

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-9
			DATE 03/06/25	







WATER SERVICE SCHEDULE			WATER METER BOX AND LID SCHEDULE - "OLD CASTLE PRECAST" (SUPPLIER)	
SERVICE PIPING	WATER METER: "MASTER METER"	"MASTER METER 4G ALLEGRO"	"CARSON" METER BOX	"CARSON" LID
1"	SENSUS MTR 1 IIPERL I4S1FXX 4WHL5A 110CF 6'TRPL 2-WR SMART	USG	SERVICE PIPING SIZES: 1" ITEM #: SP-CB13242500 DESCRIPTION: 1324-12 NEW LINDSAY METER BOX GREY	SERVICE PIPING SIZES: 1" ITEM #: SP-CB13244208 DESCRIPTION: 1324 NEW POLYMER LID FOR LINDSAY

NOTES:

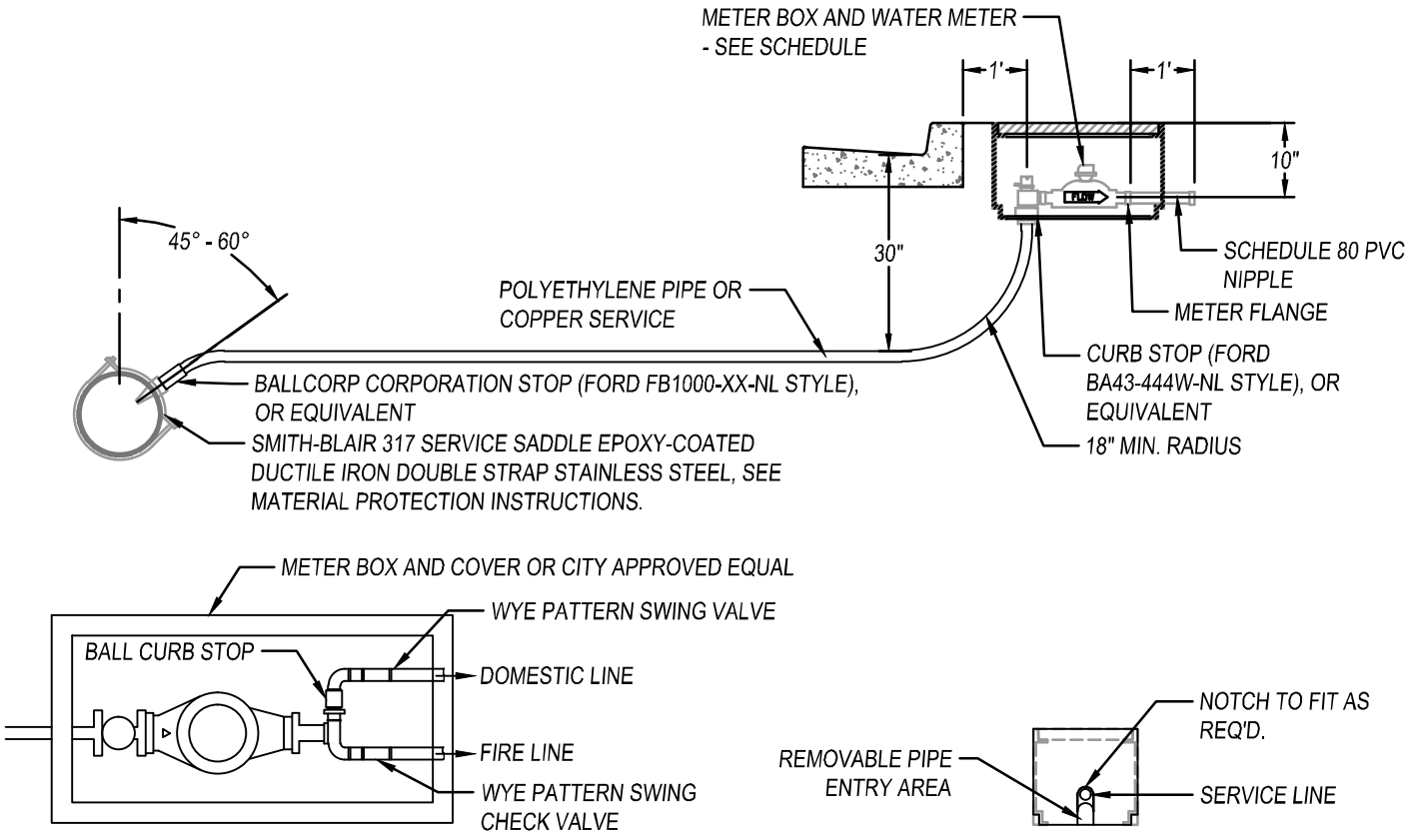
1. SERVICE PIPING SHALL BE A CONTINUOUS LENGTH OF POLYETHLYNE.
2. ALL FITTINGS SHALL BE SIZED ACCORDINGLY WITH SERVICE PIPING AND WATER METER.
3. CORPORATION STOPS, ANGLE METER STOPS AND METER FLANGES SHALL BE AS SHOWN OR APPROVED EQUAL.
4. ALL PIPE, FITTINGS, METER, OR OTHER MATERIAL IN CONTACT WITH WATER SHALL BE COMPLIANT WITH NSF/ANSI 61.
5. METER TO BE A NEPTUNE T-10 AND READ IN CUBIC FEET.
6. PROVIDE TRAFFIC RATED METER BOX AND LID IF LOCATED WITHIN DRIVE APPROACH, OR WHEN REQUIRED BY THE CITY.
7. ALL METER BOX LIDS MUST BE COMPATIBLE WITH THE RADIO READ EQUIPMENT BEING UTILIZED BY THE CITY.
8. IF A COUPLING IS NEEDED TO CONNECT THE NIPPLE TO THE METER, COUPLING SHALL BE SCHEDULE 80 PVC.
9. 2" X 4" PRESSURE TREATED LUMBER, THE SAME LENGTH AS THE METER BOX, SHALL BE PLACED DIRECTLY UNDER BOTH SIDES OF THE BOX FOR SUPPORT. THE GROUND MUST BE ADEQUATELY COMPACTED TO PREVENT THE BOX FROM SETTLING.

City of Lindsay

CITY SERVICES DEPARTMENT

METERED WATER SERVICES 1"

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-10
			DATE 03/06/25	



WATER SERVICE SCHEDULE			WATER METER BOX AND LID SCHEDULE - "OLD CASTLE PRECAST" (SUPPLIER)	
SERVICE PIPING	WATER METER: "MASTER METER"	"MASTER METER 4G ALLEGRO"	"CARSON" METER BOX	"CARSON" LID
1 ½"	1 ½" - PART NO. M21-A00-A01-0101A-1	USG	SERVICE PIPING SIZES: 1 ½"-2" ITEM #: SP-CB17302500 DESCRIPTION: CB1730-12 NEW LINDSAY BOX GREY	SERVICE PIPING SIZES: 1 ½"-2" ITEM #: SP-CB17304239 DESCRIPTION: 1730 NEW POLYMER LID FOR LINDSAY
2"	2" - PART NO. M23-A00-A01-0101A-1	USG		

NOTES:

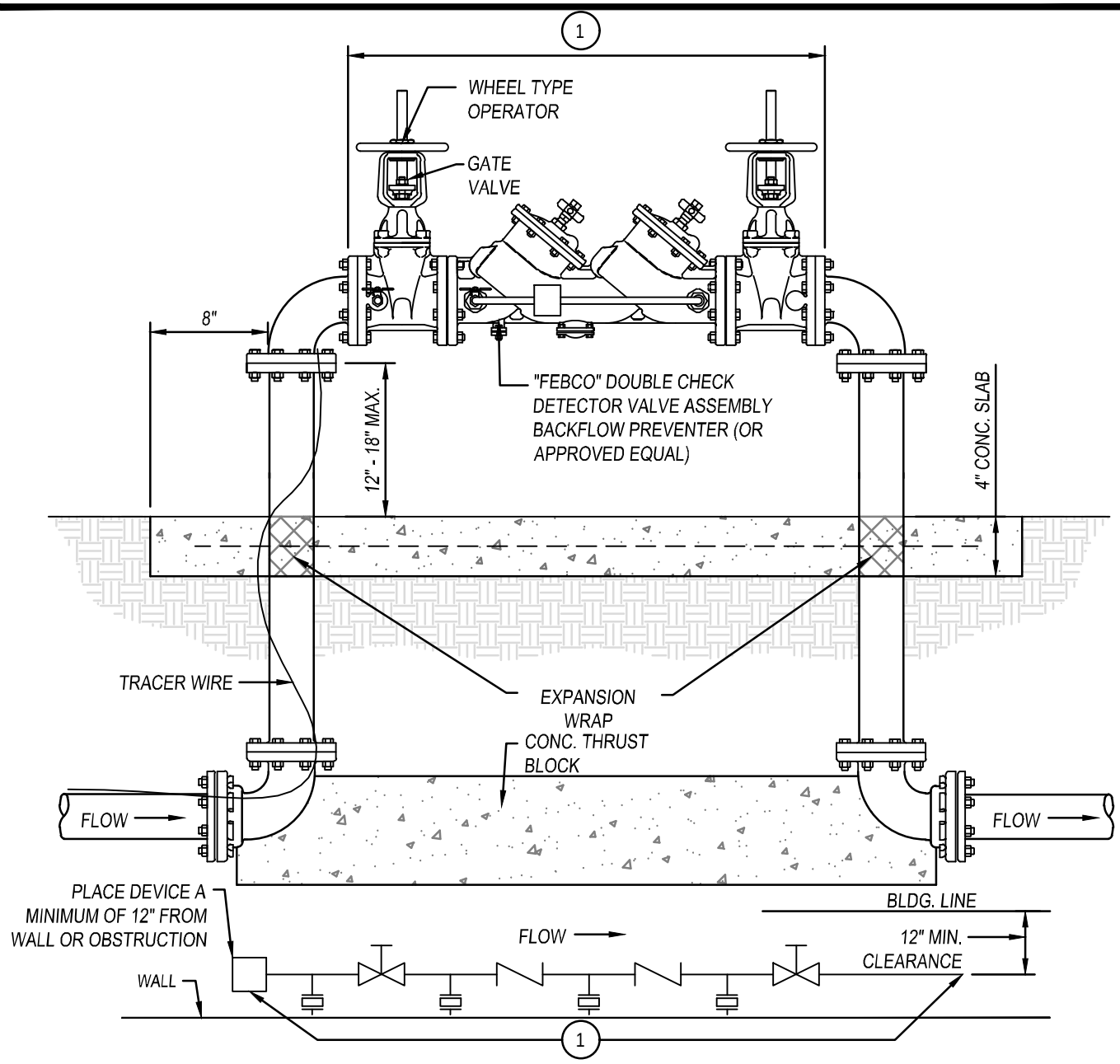
1. SERVICE PIPING SHALL BE A CONTINUOUS LENGTH OF TYPE "K" SOFT COPPER.
2. ALL FITTINGS SHALL BE SIZED ACCORDINGLY WITH SERVICE PIPING AND WATER METER.
3. CORPORATION STOPS, ANGLE METER STOPS AND METER FLANGES SHALL BE AS SHOWN OR APPROVED EQUAL.
4. ALL PIPE, FITTINGS, METER, OR OTHER MATERIAL IN CONTACT WITH WATER SHALL BE COMPLIANT WITH NSF/ANSI 61.
5. METER TO BE A NEPTUNE T-10 AND READ IN CUBIC FEET.
6. PROVIDE TRAFFIC RATED METER BOX AND LID IF LOCATED WITHIN DRIVE APPROACH, OR WHEN REQUIRED BY THE CITY.
7. ALL METER BOX LIDS MUST BE COMPATIBLE WITH THE RADIO READ EQUIPMENT BEING UTILIZED BY THE CITY.
8. IF A COUPLING IS NEEDED TO CONNECT THE NIPPLE TO THE METER, COUPLING SHALL BE SCHEDULE 80 PVC.
9. 2" X 4" PRESSURE TREATED LUMBER, THE SAME LENGTH AS THE METER BOX, SHALL BE PLACED DIRECTLY UNDER BOTH SIDES OF THE BOX FOR SUPPORT. THE GROUND MUST BE ADEQUATELY COMPACTED TO PREVENT THE BOX FROM SETTLING.
10. INSTALLATION DETAILS OF LARGER SERVICES ARE TO BE DETERMINED BY THE ENGINEER.

City of Lindsay

CITY SERVICES DEPARTMENT

METERED WATER SERVICES 1-1/2" TO 2"

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-11
			DATE 03/06/25	



NOTES:

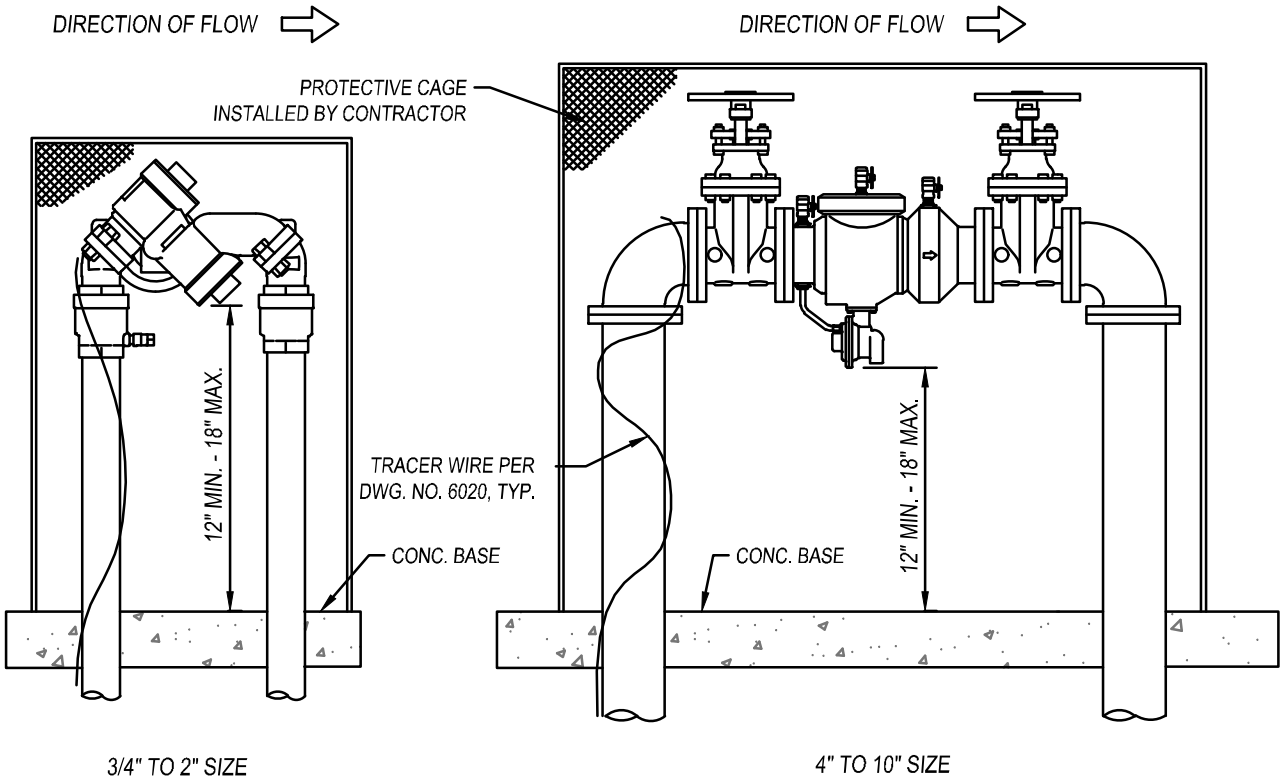
1. REDUCED PRESSURE PRINCIPLE ASSEMBLY.
2. EXPOSED PIPING TO BE INSULATED.
3. ALL FLANGED FITTINGS WHICH ARE BURIED SHALL HAVE PLASTIC WRAP, 30 MIL.
4. ALL THREE SIDES MUST BE LANDSCAPED AND SCREENED OR A "WEATHERGUARD BLANKET", OR "LOCKBOX", OR APPROVED EQUAL SHALL BE USED IN LIEU OF LANDSCAPING.
5. PAINT RUST-OLEUM #7771 SAND, HI-SOLIDS POLYURETHANE. SIZE OF DOUBLE DETECTOR CHECK SHALL MATCH FIRE SERVICE PIPING
6. PROVIDE 3/8" CHAIN AND PADLOCKS FOR EACH GATE VALVE TO PREVENT UNAUTHORIZED OPERATION.

City of Lindsay

CITY SERVICES DEPARTMENT

DOUBLE CHECK DETECTOR ASSEMBLY

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-12
			DATE 03/06/25	



NOTES:

1. PIPE AND FITTINGS SHALL BE GALVANIZED WHEN DIAMETER IS BETWEEN 3/4" AND 2" AND DUCTILE IRON FOR PIPE LARGER THAN 2". DUCTILE IRON PIPE SHALL BE WRAPPED WITH TWO LAYERS OF UPC, LISTED PLASTIC TAPE MINIMUM 40 ML. RESILIENT SEATED SHUT OFF VALVES AND TEST COCKS ARE REQUIRED.

2. THE MECHANICAL BACKFLOW PREVENTION ASSEMBLY SHALL BE INSTALLED SUBJECT TO THE APPROVAL OF THE CITY OF LINDSAY. ANY DEVIATION FROM THIS STANDARD MUST RECEIVE APPROVAL PRIOR TO INSTALLATION.

3. ALL MECHANICAL BACKFLOW PREVENTION ASSEMBLIES APPROVED BY THE CITY OF LINDSAY FOR INSTALLATION AT THE SERVICE CONNECTION HAVE BEEN EVALUATED AND APPROVE BY THE FOUNDATION FOR CROSS-CONNECTION CONTROL AND HYDRAULIC RESEARCH , UNIVERSITY OF SOUTHERN CALIFORNIA. THESE ASSEMBLIES ARE ONLY APPROVED FOR THE OTHER ORIENTATIONS. CHECK WITH THE LOCAL HEALTH DEPARTMENT.

4. CHOICE OF TYPE OF BACKFLOW PREVENTION ASSEMBLY, I.E. REDUCED PRESSURE PRINCIPLE OR DOUBLE CHECK VALVE ASSEMBLY, WILL BE BASED ON THE DEGREE OF HAZARD AS EVALUATED BY THE CITY ENGINEER.

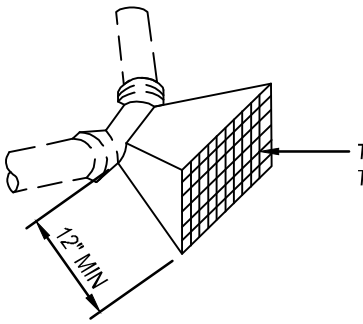
5. BACKFLOW PREVENTER SHALL BE LOCATED WITHIN 10' OF WATER METER, UNLESS OTHERWISE APPROVED BY THE CITY ENGINEER. NO CONNECTIONS OR TEES ARE ALLOWED BETWEEN THE METER AND THE ASSEMBLY.
6. 3/4" - 2" RPB SHALL BE AN APPROVED DEVICE (SEE NOTE 3 ABOVE). 4" - 10" RPB SHALL BE AN APPROVED DEVICE (SEE NOTE 3 ABOVE).

City of Lindsay

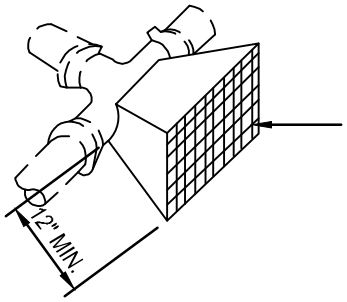
CITY SERVICES DEPARTMENT

R.P. BACKFLOW PREVENTER (3/4" TO 10")

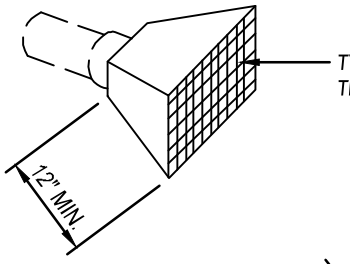
MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	W-13
			DATE	03/06/25	



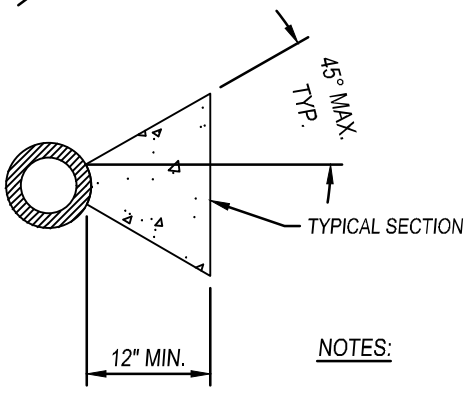
TYPICAL FOR BEND REQUIRED THRUST BLOCK AREA



TYPICAL FOR TEE OUTLET REQUIRED THRUST BLOCK AREA



TYPICAL FOR DEAD END REQUIRED THRUST BLOCK AREA



THRUST BLOCK AREA REQUIREMENTS IN SQ. FT.	
FITTINGS	ALLOWABLE SOIL BEARING VALUE 2,000 lbs./sq.ft.
6" - 11 $\frac{1}{4}$° ELL	1.0
6" - 22 $\frac{1}{2}$° ELL	1.5
6" - 45° ELL	3.0
6" - 90° ELL	5.5
6" - TEE OUTLET	4.0
6" - DEAD END	4.0
8" - 11 $\frac{1}{4}$° ELL	1.5
8" - 22 $\frac{1}{2}$° ELL	3.0
8" - 45° ELL	5.0
8" - 90° ELL	9.5
8" - TEE OUTLET	6.5
8" - DEAD END	6.5
10" - 11 $\frac{1}{4}$° ELL	2.8
10" - 22 $\frac{1}{2}$° ELL	4.5
10" - 45° ELL	8.5
10" - 90° ELL	15.5
10" - TEE OUTLET	11.0
10" - DEAD END	11.0
12" - 11 $\frac{1}{4}$° ELL	3.0
12" - 22 $\frac{1}{2}$° ELL	6.0
12" - 45° ELL	12.0
12" - 90° ELL	22.0
12" - TEE OUTLET	15.5
12" - DEAD END	15.5

NOTES:

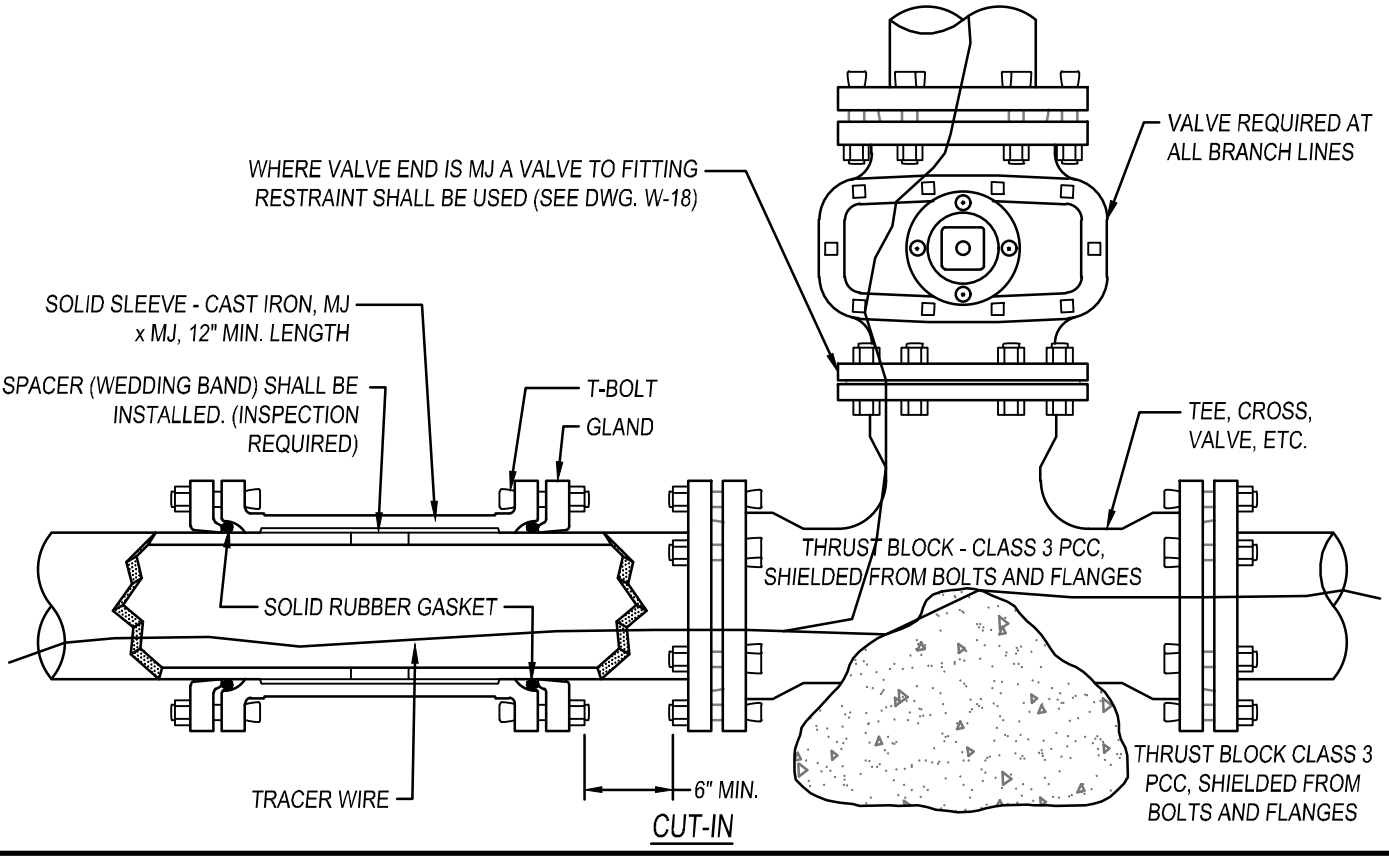
1. ALL CONCRETE FOR THRUST BLOCKS SHALL BE CLASS 2.
2. FITTINGS SHALL BE SEPARATED FROM CONCRETE BY 4 MILS. OF PLASTIC. JOINTS SHALL BE KEPT FREE FROM CONCRETE.
3. CONCRETE SHALL BE POURED AGAINST UNDISTURBED SOIL.

City of Lindsay

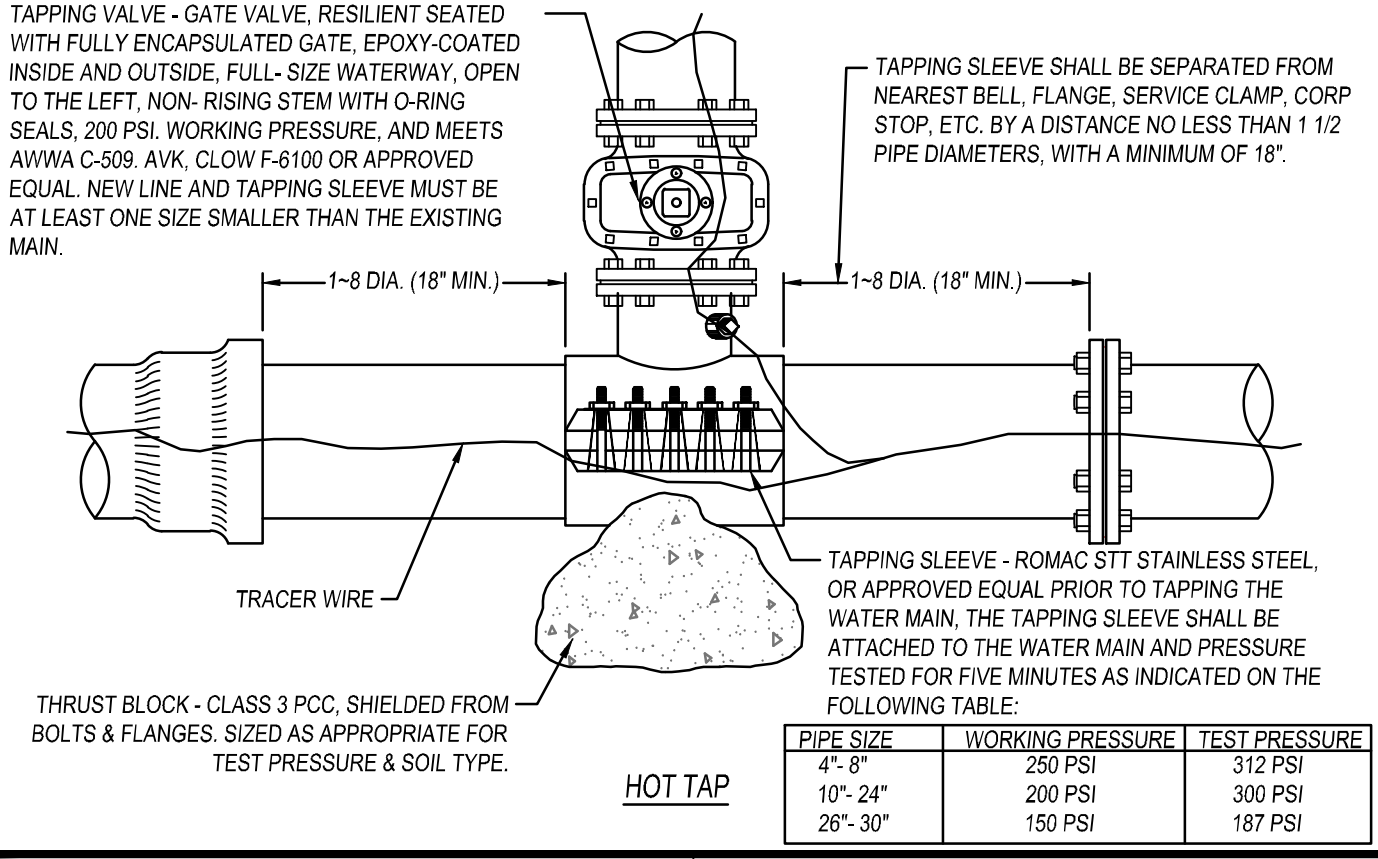
CITY SERVICES DEPARTMENT

THRUST BLOCK

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-14
			DATE 03/06/25	



CUT-IN



HOT TAP

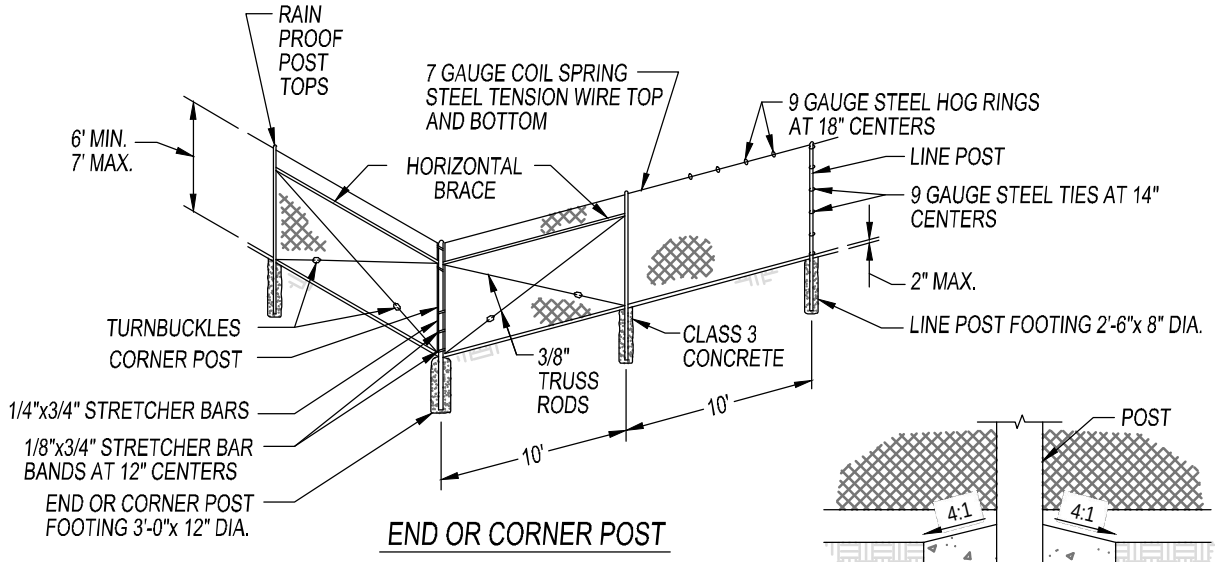
PIPE SIZE	WORKING PRESSURE	TEST PRESSURE
4"- 8"	250 PSI	312 PSI
10"- 24"	200 PSI	300 PSI
26"- 30"	150 PSI	187 PSI

City of Lindsay

CITY SERVICES DEPARTMENT

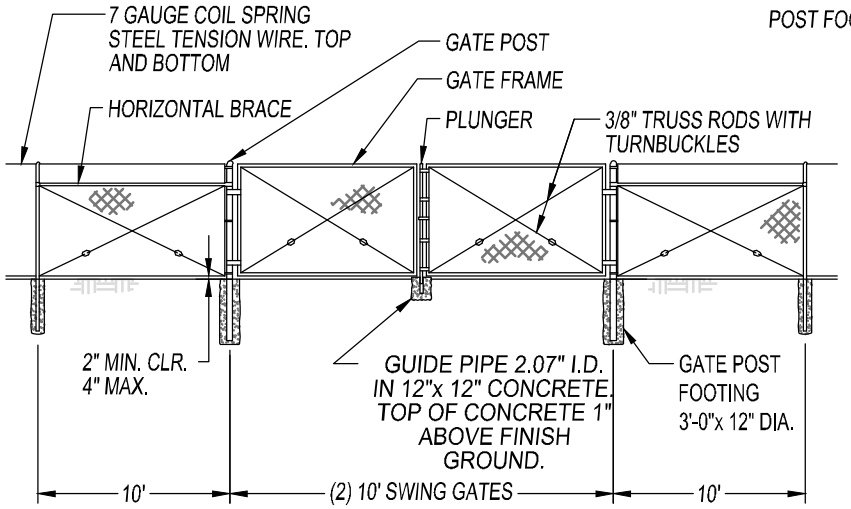
WATERLINE TIE-IN

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	W-15
			DATE 03/06/25	



END OR CORNER POST

POST FOOTING DETAIL



GATE

NOTES:

POST AND BRACE SIZE REQUIREMENTS

DESCRIPTION	MIN. SIZE	MIN. WEIGHT LBS./FT.
END, LATCH OR CORNER POSTS	2.875"	5.80
LINE POSTS	2.375"	3.65
BRACES	1.660"	2.27
GATE POSTS	5.563"	14.63
GATE FRAMES	1.900"	2.72
GATE PLUNGER	1.600"	2.27

1. POSTS, BRACES AND GATE FRAMES SHALL BE COMMERCIAL QUALITY, OR BETTER, WELDABLE STEEL.
2. POST TOPS, STRETCHER BARS AND OTHER REQUIRED FITTINGS AND HARDWARE SHALL BE STEEL OR MALLEABLE IRON OR WROUGHT IRON.
3. CHAIN LINK FABRIC SHALL BE 9 GAUGE WIRE WOVEN INTO APPROXIMATELY 2" MESH. FABRIC SHALL HAVE A KNUCKLE BOTTOM AND TWISTED TOP.
4. FOR A 6' TALL FENCE, LINE POSTS SHALL BE A MINIMUM OF 8'-6" LONG. GATE, END AND CORNER POSTS SHALL BE A MINIMUM OF 9'-0" LONG.
5. END, CORNER, GATE AND LATCH POSTS SHALL BE BRACED TO THE NEAREST LINE POST WITH HORIZONTAL OR DIAGONAL BRACES USED AS COMPRESSION MEMBERS AND 3/8" STEEL TRUSS RODS WITH TURNBUCKLES USED AS TENSION MEMBERS.
6. GATE FRAMES SHALL BE CROSSED TRUSSED WITH 3/8" ADJUSTABLE TRUSS RODS. THE CORNERS OF GATE FRAMES SHALL BE FASTENED TOGETHER WITH A MALLEABLE IRON FITTING OR WELDED AND GALVANIZE COATED OVER WELDS.
7. GATES SHALL BE HUNG BY AT LEAST TWO STEEL OR MALLEABLE IRON HINGES NOT LESS THAN THREE INCHES IN WIDTH AND SHALL HAVE A MALLEABLE CATCH AND LOCKING ATTACHMENT.
8. ALL CHAIN LINK FENCE MATERIAL SHALL BE GALVANIZED.
9. CHAIN LINK FENCING FOR SCREENING MAY BE REQUIRED BY THE CITY ENGINEER.
10. VINYL COATING MAY BE REQUIRED BY THE CITY ENGINEER.
11. NARROWER GATE SIZES SHALL BE SUBJECT TO APPROVAL BY THE CITY ENGINEER.
12. 7' TALL FENCES MAY BE REQUIRED BY CITY ENGINEER. FOR A 7' TALL FENCE, LINE POSTS SHALL BE A MINIMUM OF 9'-6" LONG. GATE, END AND CORNER POSTS SHALL BE A MINIMUM OF 10'-0' LONG.

City of Lindsay

CITY SERVICES DEPARTMENT

6 FOOT - 7 FOOT CHAIN LINK FENCE

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	F-1
			DATE	03/06/25	

City of Lindsay

CITY SERVICES DEPARTMENT

REFUSE CONTAINER ENCLOSURE

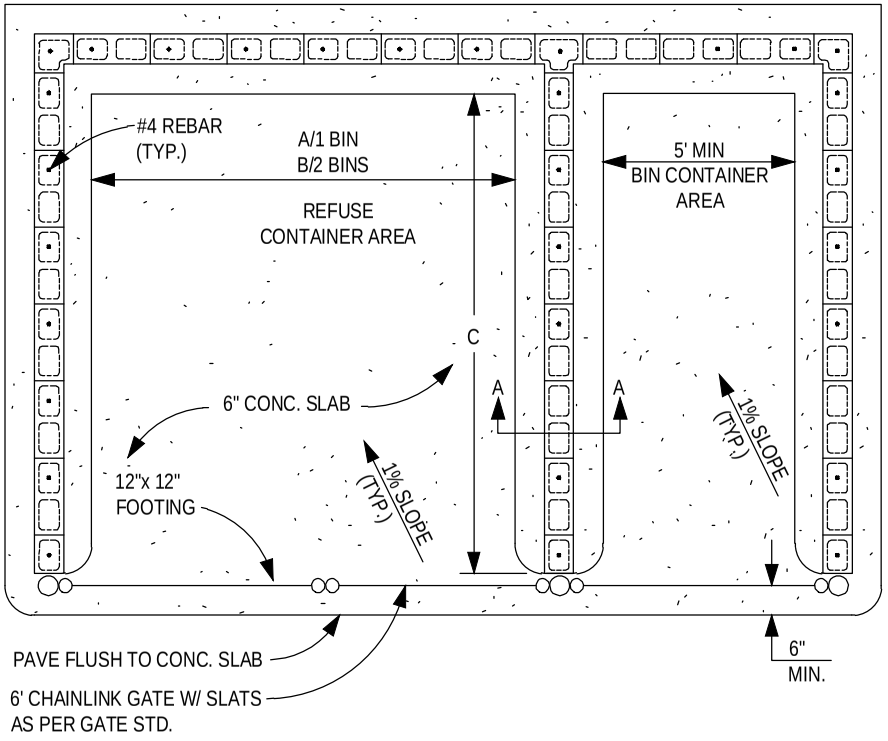
MARK	DATE	REVISION

ENGINEERING STANDARD

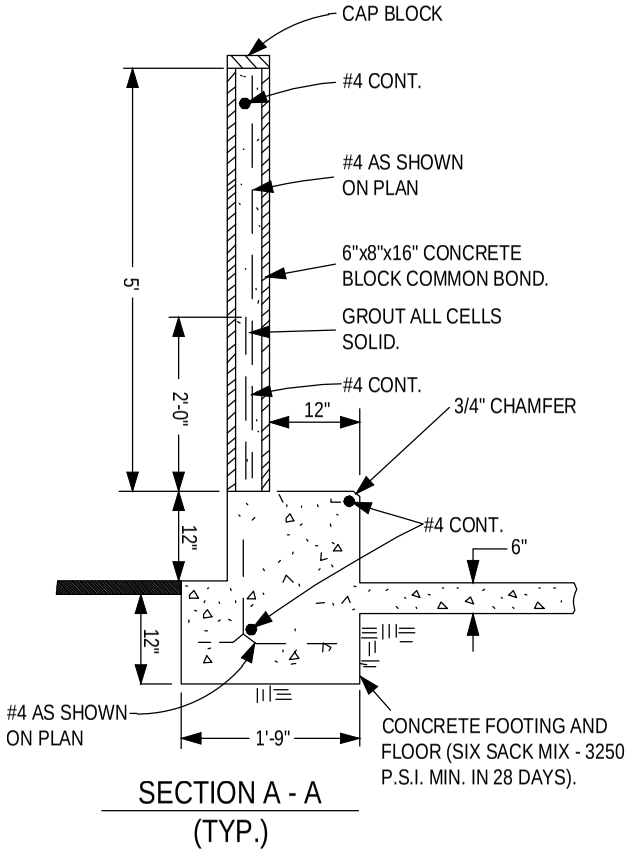
APPROVED DATE 03/06/25

IMPROVEMENT STANDARD

M-1



PLAN



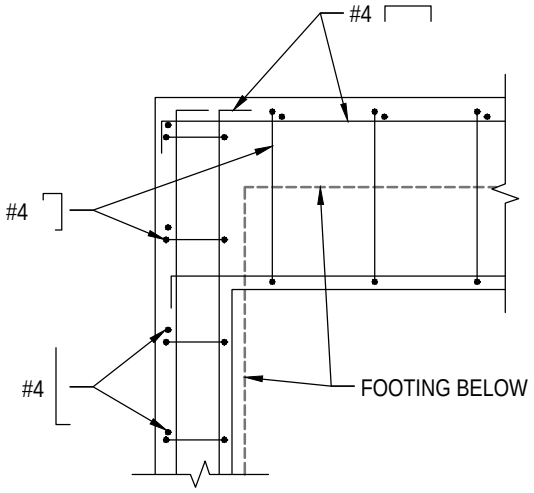
SECTION A - A
(TYP.)

NOTE:

1. PUBLIC WORKS RECOMMENDED ENCLOSURE.
2. CUT CORNER BLOCK ENDS AND CENTER WEB TO FORM A CONT. BOND BEAM.
3. GROUND TO BE SLOPED AWAY FROM WALL.
4. LOCATION OF BIN ENCLOSURE TO BE APPROVED BY THE CITY ENGINEER.
5. A BUILDING PERMIT SHALL BE OBTAINED FROM THE CITY BUILDING DEPARTMENT.
6. ALL PLUMBING REQUIRED FOR CLEANING & DRAINAGE DEVICE MUST BE PERMITTED THROUGH CITY BUILDING DEPARTMENT.

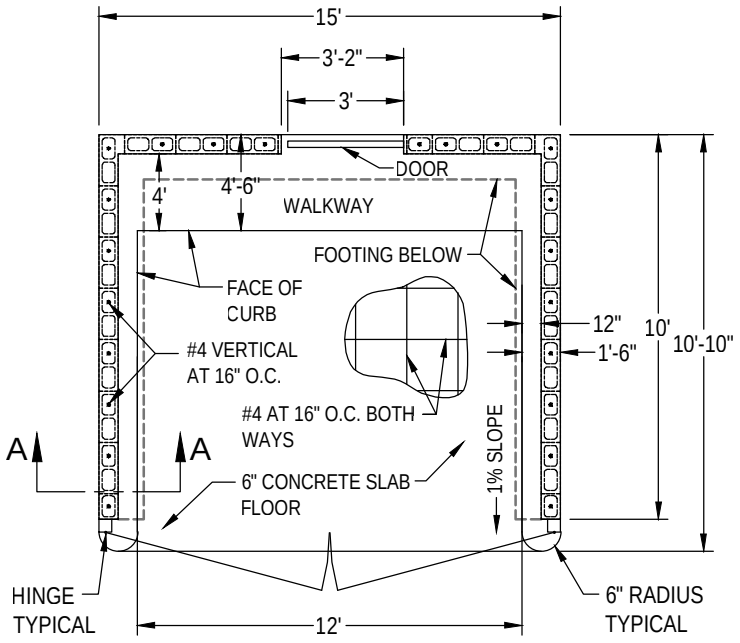
MIN. INSIDE ENCLOSURE DIMENSIONS

	1 YD.	2 YD.	3 YD.
A	10'	10'	10'
B	–	15'	20'
C	10'	10'	10'

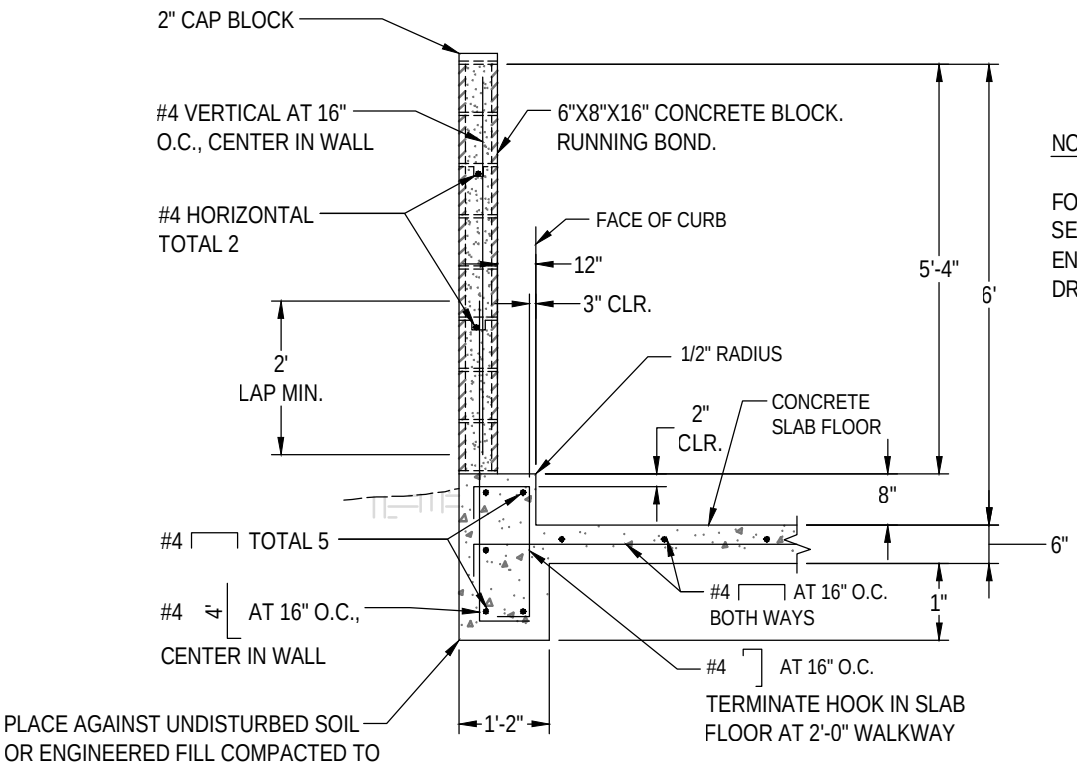


CURB CORNER DETAIL

FOOTING CORNER DETAIL SIMILAR



PLAN



SECTION A-A

NOTE:

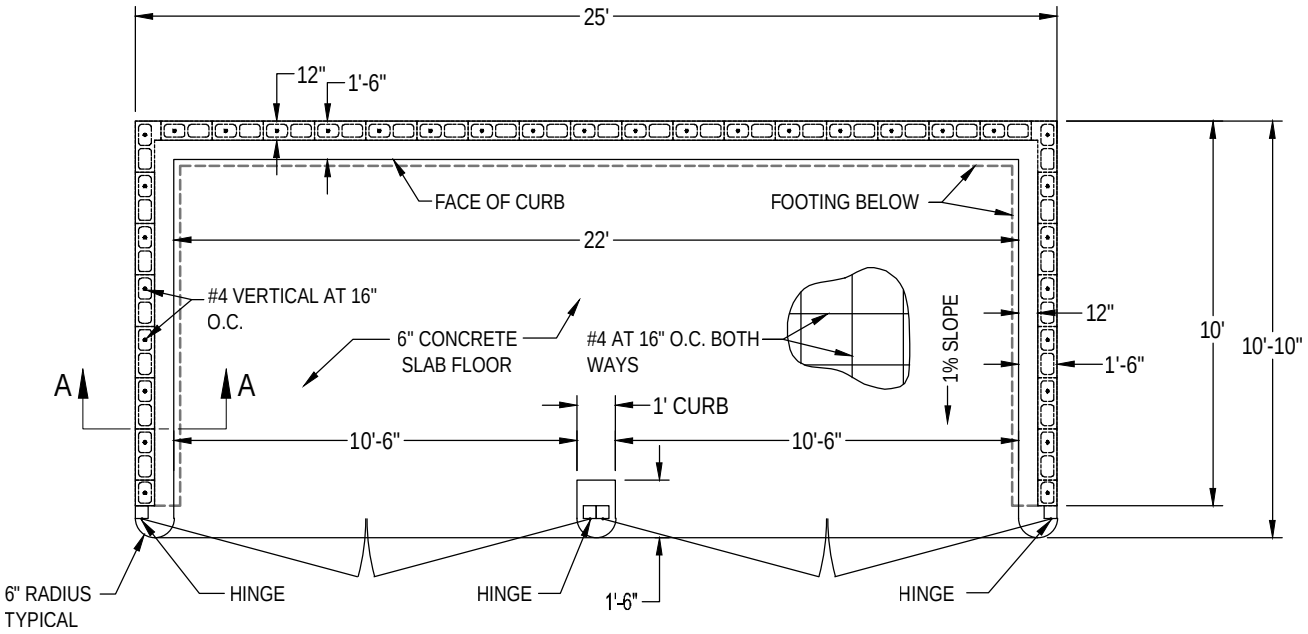
FOR ALL APPLICABLE NOTES, SEE REFUSE CONTAINER ENCLOSURE NOTES STANDARD DRAWING.

City of Lindsay

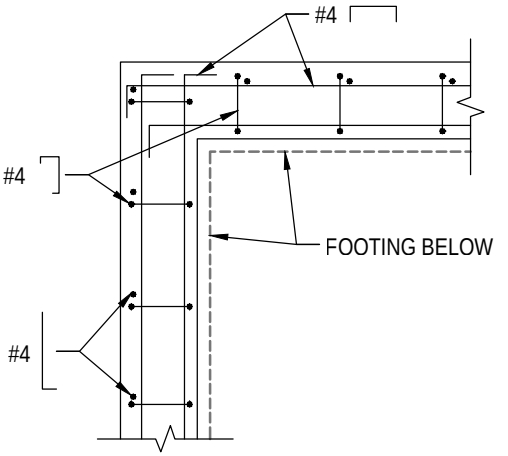
CITY SERVICES DEPARTMENT

15' REFUSE CONTAINER ENCLOSURE - WITH DOOR

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	M-2
			DATE 03/06/25	



PLAN

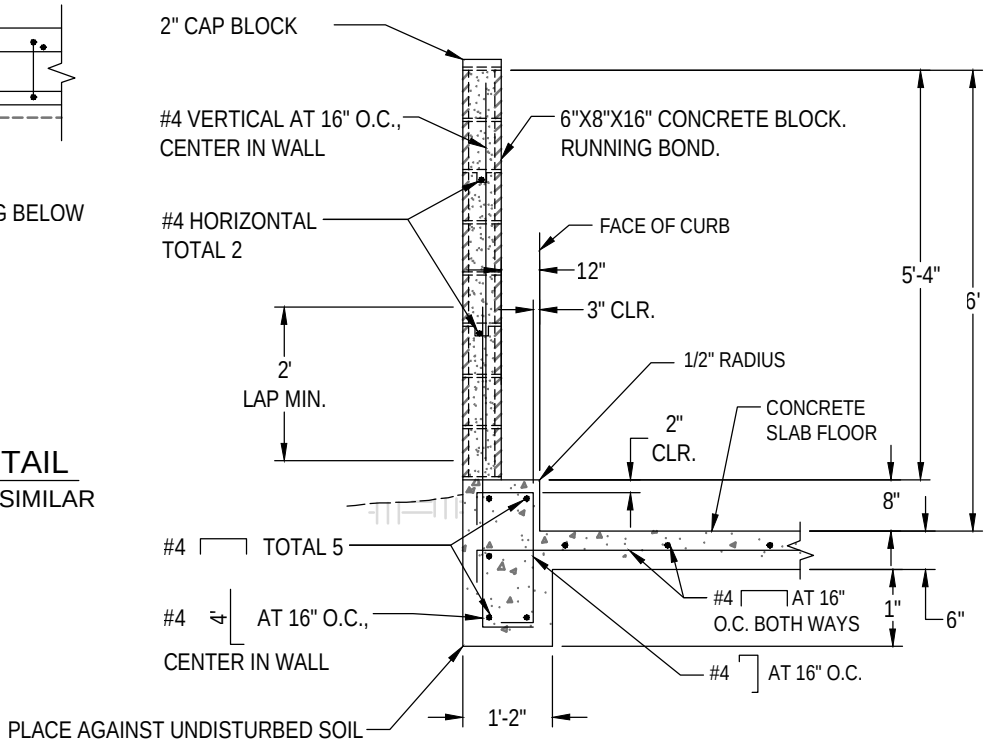


CURB CORNER DETAIL

FOOTING CORNER DETAIL SIMILAR

NOTE:

FOR ALL APPLICABLE NOTES, SEE REFUSE CONTAINER ENCLOSURE NOTES STANDARD DRAWING.



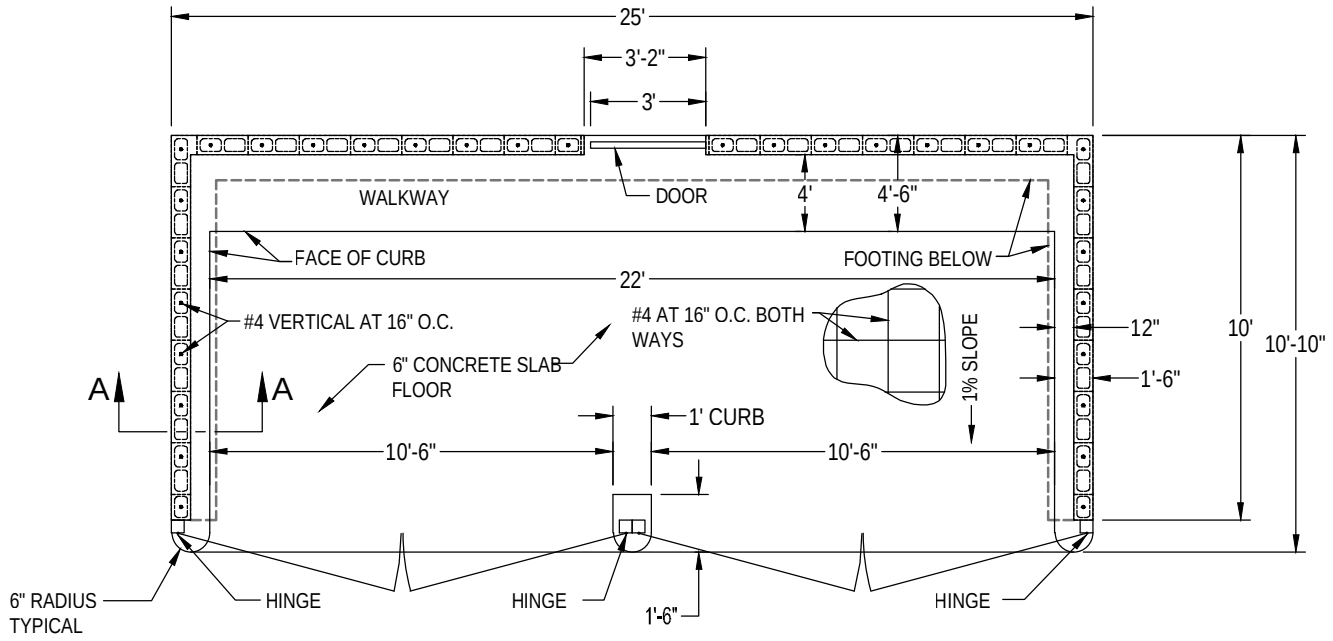
SECTION A-A

City of Lindsay

CITY SERVICES DEPARTMENT

25' REFUSE CONTAINER ENCLOSURE

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	M-3
			DATE 03/06/25	



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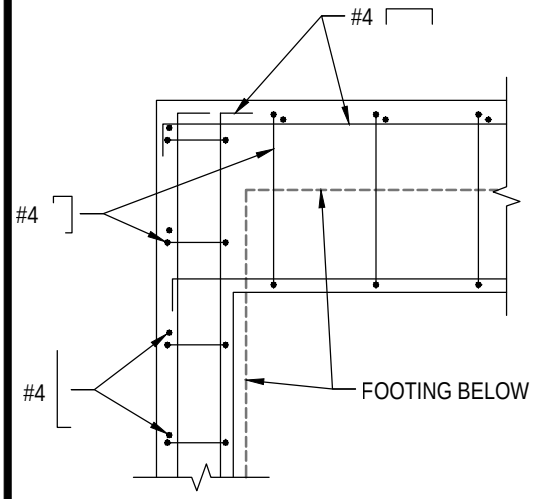
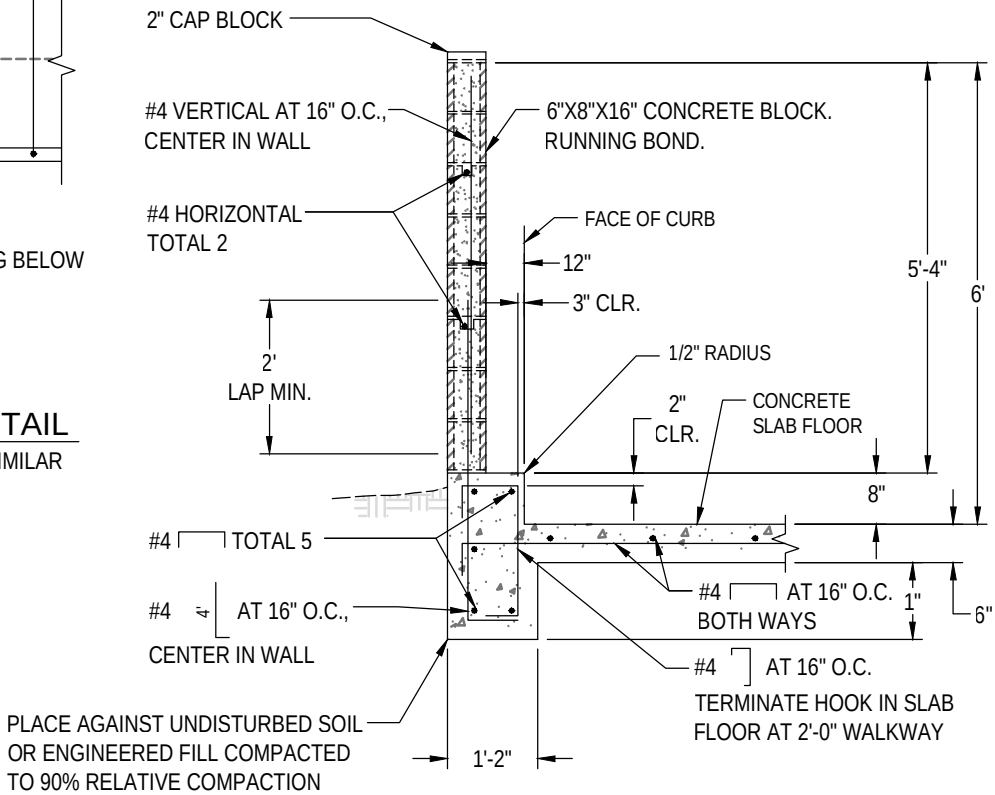


CURB CORNER DETAIL

FOOTING CORNER DETAIL SIMILAR

NOTE:

FOR ALL APPLICABLE NOTES, SEE REFUSE CONTAINER ENCLOSURE NOTES STANDARD DRAWING.



SECTION A-A

City of Lindsay

CITY SERVICES DEPARTMENT

25' REFUSE CONTAINER ENCLOSURE - WITH DOOR

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	M-4
			DATE 03/06/25	

City of Lindsay

CITY SERVICES DEPARTMENT

TRASH BIN - BLOCK ENCLOSURE (FOR RESTAURANT / AUTO MOTIVE)

MARK	DATE	REVISION

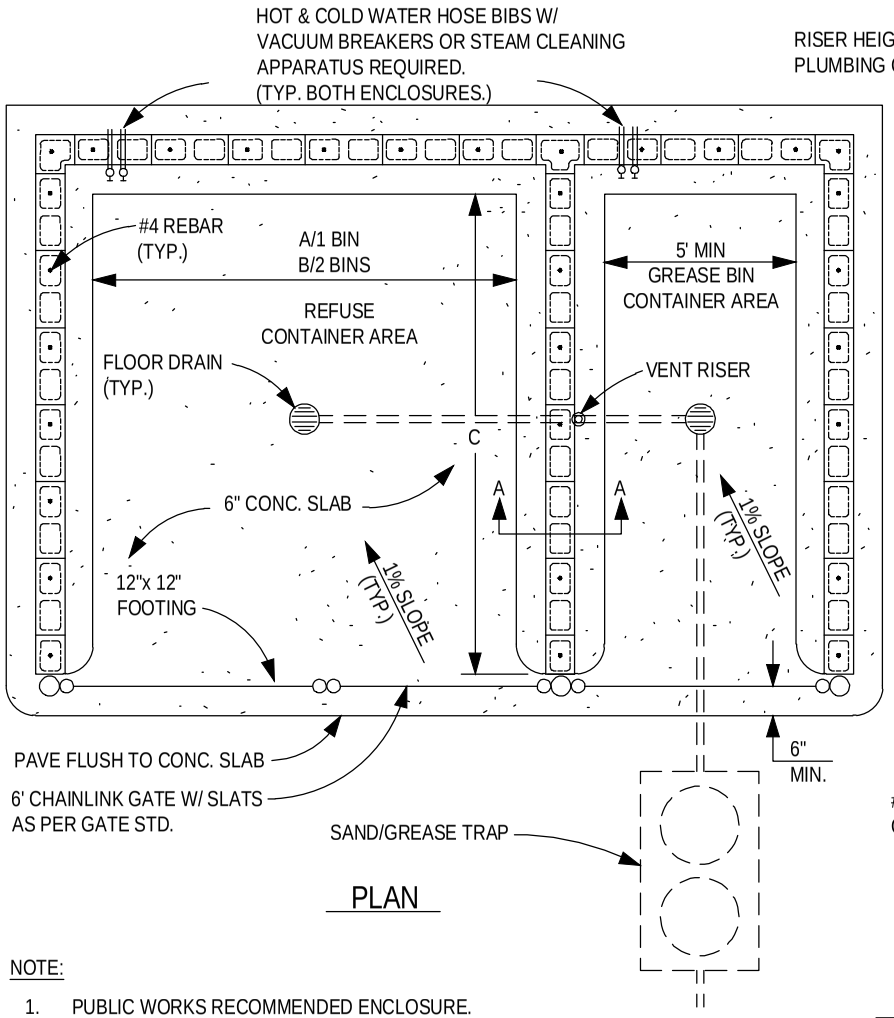
ENGINEERING STANDARD

APPROVED: JSO

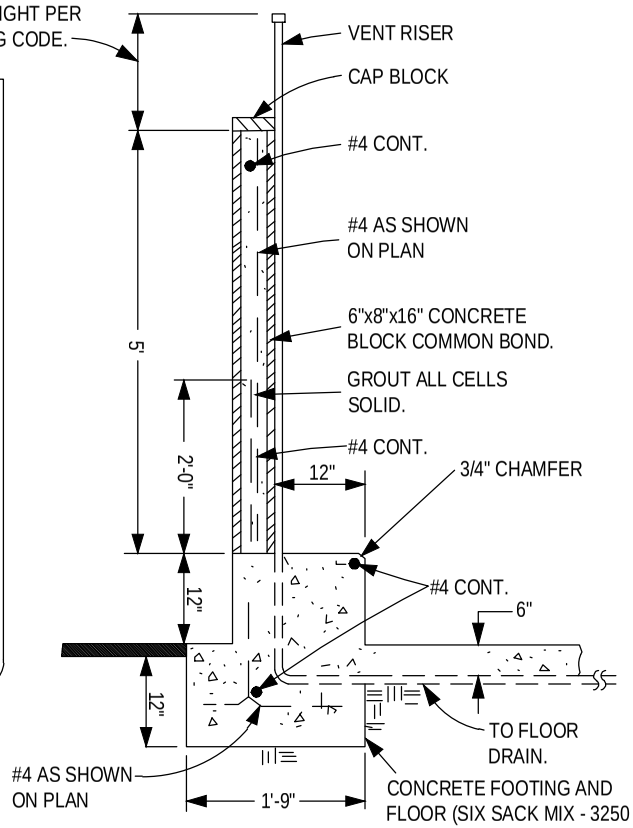
DATE: 03/06/25

IMPROVEMENT STANDARD

M-5



PLAN



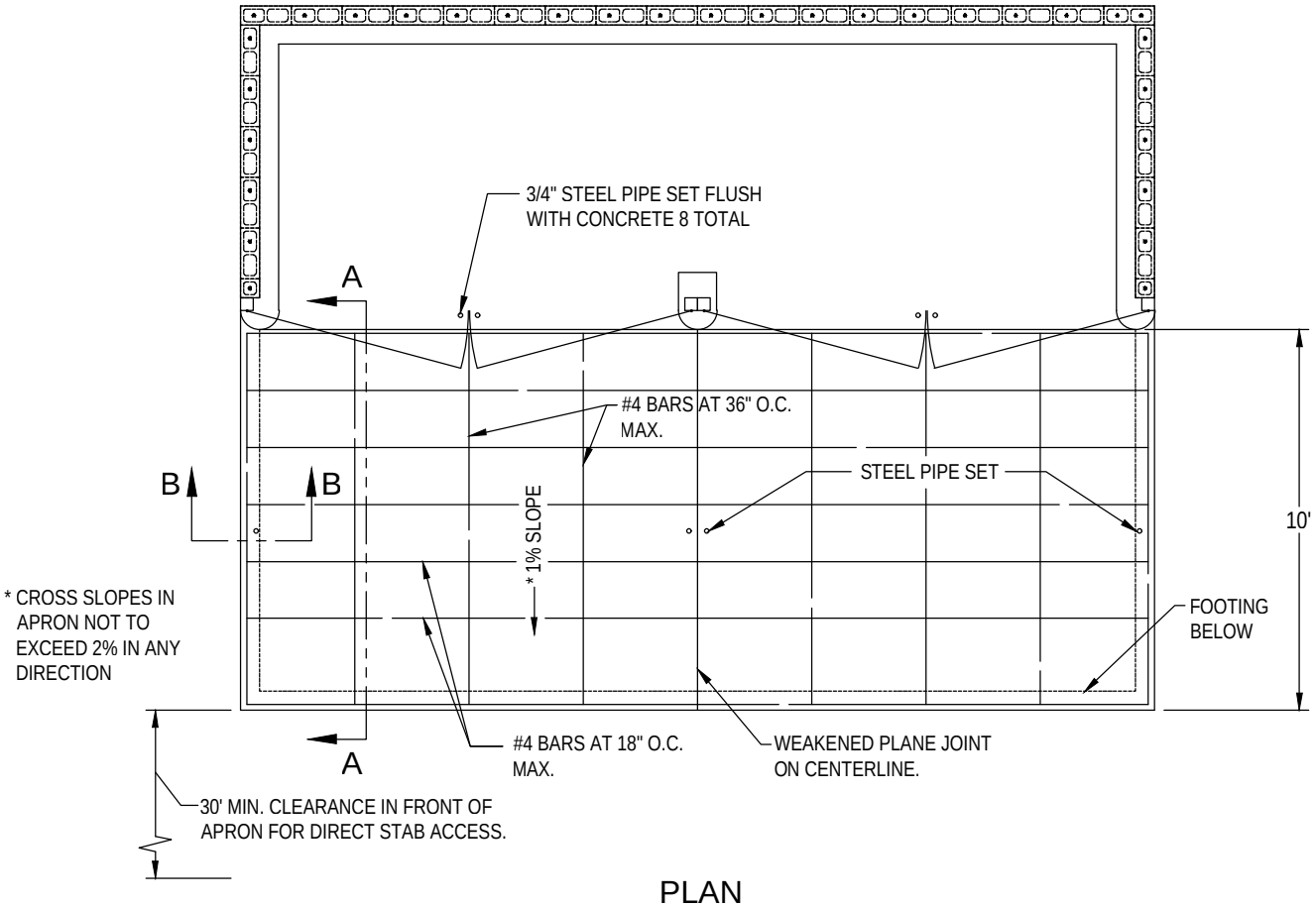
SECTION A - A
(TYP.)

NOTE:

1. PUBLIC WORKS RECOMMENDED ENCLOSURE.
2. CUT CORNER BLOCK ENDS AND CENTER WEB TO FORM A CONT. BOND BEAM.
3. GROUND TO BE SLOPED AWAY FROM WALL.
4. LOCATION OF BIN ENCLOSURE TO BE APPROVED BY THE CITY ENGINEER.
5. A BUILDING PERMIT SHALL BE OBTAINED FROM THE CITY BUILDING DEPARTMENT.
6. ALL PLUMBING REQUIRED FOR CLEANING & DRAINAGE DEVICE MUST BE PERMITTED THROUGH CITY BUILDING DEPARTMENT.

MIN. INSIDE ENCLOSURE DIMENSIONS

	1 YD.	2 YD.	3 YD.
	10'	10'	10'
	–	15'	20'
	10'	10'	10'



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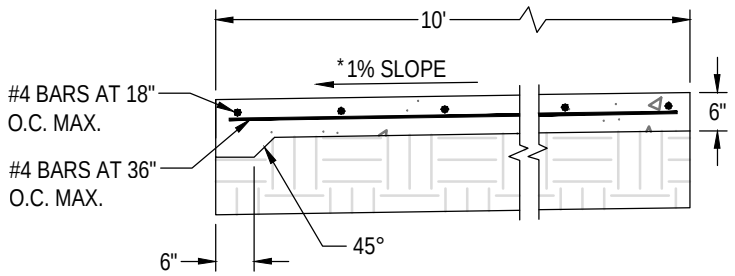
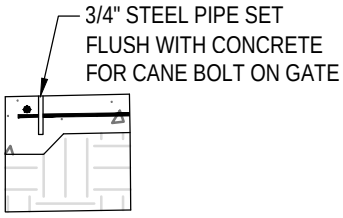


SECTION A-A



SECTION B-B

NOTES:

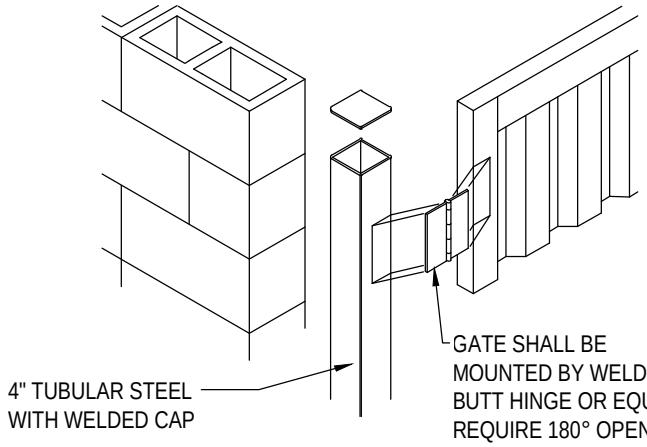
1. ALL CONCRETE SHALL BE CLASS 3, PRE-MIXED. 28-DAY COMPRESSIVE STRENGTH = 2500 psi MIN.
2. REINFORCING BARS SHALL BE ASTM A615 GRADE 40 MINIMUM DEFORMED STEEL AND SHALL BE CLEAN OF DIRT AND RUST BEFORE PLACEMENT.
3. REINFORCING BARS SHALL HAVE A MINIMUM OF 3" OF CLEAR COVERAGE FROM THE COMPACTED EARTH AND 2" FROM FINISH GRADE.
4. ALL REFUSE CONTAINER ENCLOSURES SHALL HAVE A CONCRETE APRON.
5. CONCRETE PAD SHALL BE PLACED ON MOIST AND COMPACTED BASE MATERIALS. 95% RELATIVE COMPACTION.
6. STEEL PIPE LOCATION IN CONCRETE PAD SHALL BE DETERMINED BY CANE BOLT LOCATION ON GATE. SEE REFUSE CONTAINER ENCLOSURE GATE DETAILS STANDARD DRAWING.

City of Lindsay

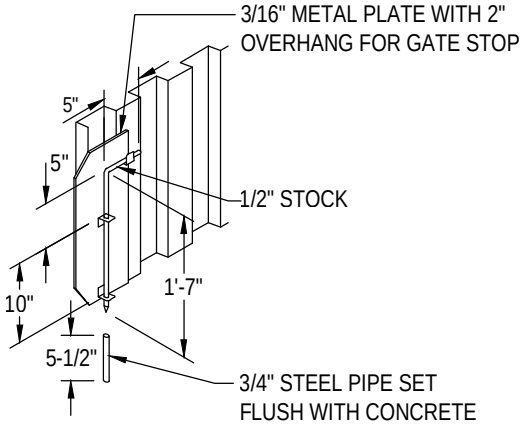
CITY SERVICES DEPARTMENT

REFUSE CONTAINER ENCLOSURE CONCRETE APRON DETAILS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	M-6
			DATE 03/06/25	



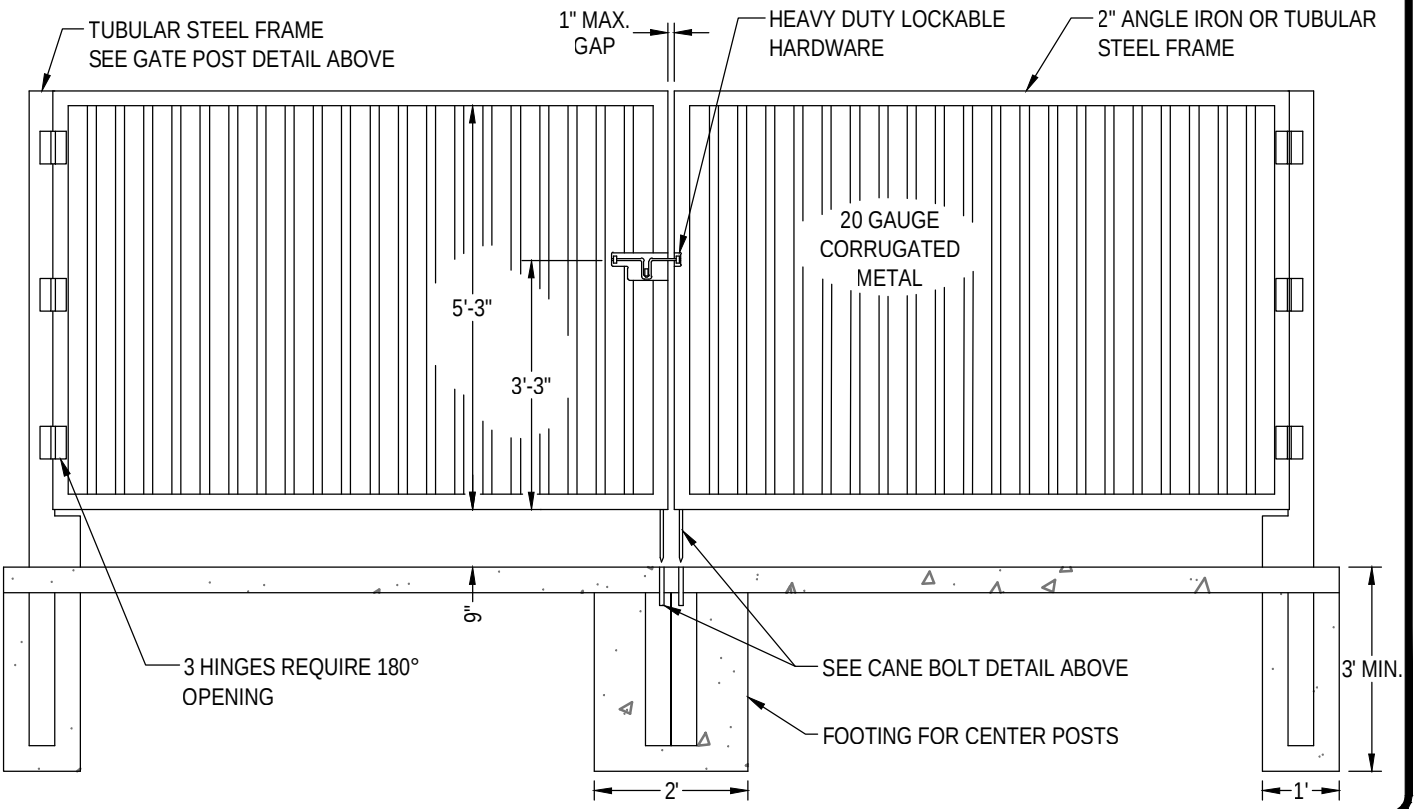
GATE POST DETAIL



CANE BOLT DETAIL

NOTES:

1. GATES TO BE PAINTED TO MATCH BUILDING ACCENT FEATURES.
2. DESIGN, ENGINEERING AND CONSTRUCTION NOT SPECIFICALLY NOTED SHALL BE IN ACCORDANCE WITH ACCEPTED INDUSTRY STANDARDS & OF FIRST QUALITY.
3. CONCRETE APRON SHALL INCLUDE TWO 3/4" STEEL PIPES SET FLUSH WITH THE CONCRETE FOR EACH GATE DOOR, BASED ON LOCATION OF CANE BOLTS ON GATE, TO SECURE THE GATE IN THE OPEN OR CLOSED POSITION. SEE REFUSE CONTAINER ENCLOSURE CONCRETE APRON DETAILS STANDARD DRAWING.
4. GATE POST SHALL ABUT REFUSE CONTAINER ENCLOSURE.
5. SUBMIT DETAILS OF REFUSE CONTAINER ENCLOSURES AND/OR REFUSE CONTAINERS REQUIRED TO BE ACCESSIBLE UNDER THE CURRENT CBC, OR MODIFY THIS DETAIL AS NECESSARY FOR REVIEW AND ACCEPTANCE FROM THE CITY ENGINEER.

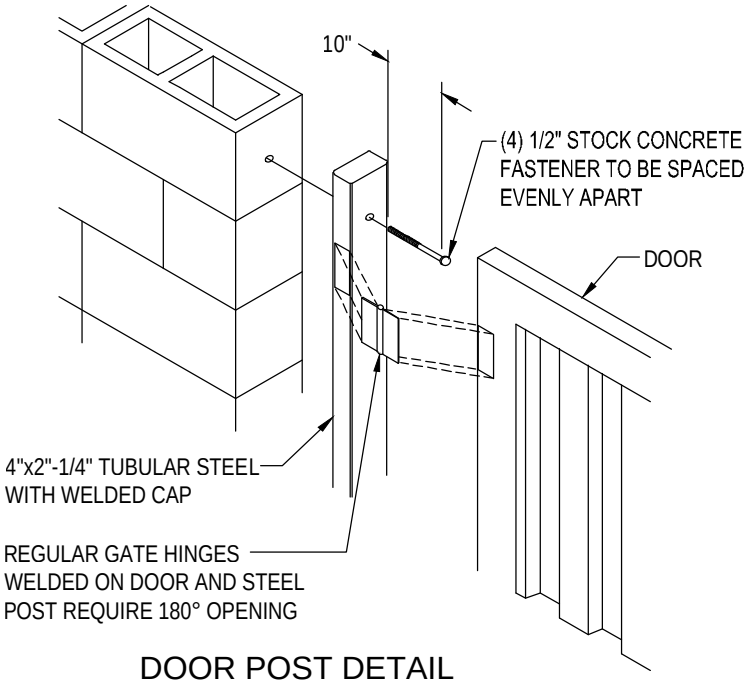


City of Lindsay

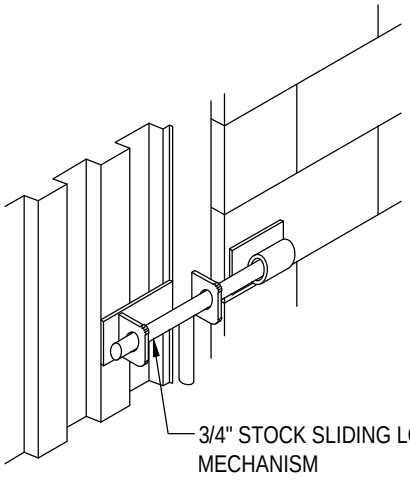
CITY SERVICES DEPARTMENT

REFUSE CONTAINER ENCLOSURE GATE DETAILS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	M-7
			DATE 03/06/25	



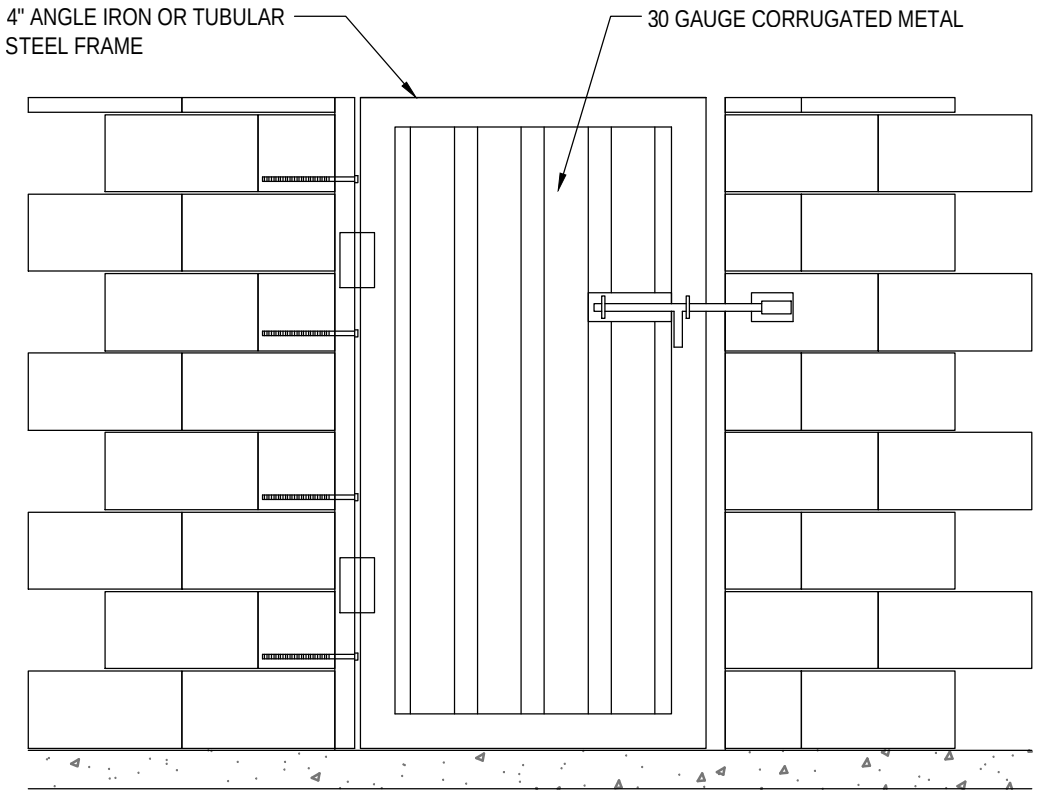
DOOR POST DETAIL



LOCKABLE HARDWARE DETAIL

NOTE:

1. SUBMIT DETAILS OF REFUSE CONTAINER ENCLOSURES AND/OR REFUSE CONTAINERS REQUIRED TO BE ACCESSIBLE UNDER THE CURRENT CBC, OR MODIFY THIS DETAIL AS NECESSARY FOR REVIEW AND ACCEPTANCE FROM THE CITY ENGINEER.



City of Lindsay

CITY SERVICES DEPARTMENT

REFUSE CONTAINER ENCLOSURE DOOR DETAILS

MARK	DATE	REVISION	ENGINEERING STANDARD	IMPROVEMENT STANDARD
			APPROVED JSC	M-8
			DATE 03/06/25	

NOTES:

1. MASONRY ENCLOSURE WALLS SHALL BE FULLY GROUTED.
2. ALL MASONRY SHALL COMPLY WITH CURRENT EDITION OF THE CALIFORNIA BUILDING CODE.
3. SLAB FLOOR AND FOOTING CONCRETE SHALL BE CLASS 3, PRE-MIXED. 28-DAY COMPRESSIVE STRENGTH = 2500 P.S.I MINIMUM.
4. MASONRY DESIGN IS BASED ON MINIMUM COMPRESSIVE STRENGTH OF f'm = 1500 P.S.I.
5. REINFORCING BARS SHALL BE ASTM A615 GRADE 40 DEFORMED STEEL AND SHALL BE CLEAN OF DIRT AND RUST BEFORE PLACEMENT.
6. GROUT SHALL CONFORM TO THE REQUIREMENTS OF ASTM C476 AND ATTAIN A 28-DAY STRENGTH OF 2000 P.S.I. ADMIXTURES FOR GROUT MUST BE APPROVED BY THE ENGINEER. FIELD ADDITION OF ADMIXTURES IS NOT PERMITTED IN SELF-CONSOLIDATING GROUT.
7. GROUT STOP SHALL CONSIST OF METAL OR PLASTIC LATH APPROVED BY THE MANUFACTURER TO CREATE A BARRIER THAT STOPS THE FLOW OF GROUT WHEN FILLING BLOCK WALL CELLS.
8. REFUSE CONTAINER ENCLOSURE SHALL BE LOCATED A MINIMUM OF 5'-0" FROM ANY BUILDING WALL LINE. OTHERWISE ENCLOSURE MUST COMPLY WITH STRICTER REQUIREMENTS PER THE CALIFORNIA FIRE CODE.
9. ALL HORIZONTAL AND VERTICAL JOINTS SHALL HAVE A CONCAVE FINISH JOINT.
10. GROUND SHALL BE SLOPED AWAY FROM ENCLOSURE WALLS.
11. REFUSE CONTAINER ENCLOSURE SHALL HAVE SOLID FACE GATES.
12. LOCATION OF REFUSE CONTAINER ENCLOSURE SHALL BE APPROVED BY THE CITY OF LINDSAY SOLID WASTE DIVISION.
13. ALL REFUSE CONTAINER ENCLOSURES SHALL HAVE A CONCRETE APRON PER REFUSE CONTAINER ENCLOSURE CONCRETE APRON DETAILS STANDARD DRAWING.
14. SUBMIT DETAILS OF REFUSE CONTAINER ENCLOSURES AND/OR REFUSE CONTAINERS REQUIRED TO BE ACCESSIBLE UNDER THE CURRENT CBC, OR MODIFY THIS DETAIL AS NECESSARY FOR REVIEW AND ACCEPTANCE FROM THE CITY ENGINEER.
15. WHERE REQUIRED, PROVIDE ACCESSIBLE TRASH CONTAINERS MEETING THE ACCESSIBILITY REQUIREMENTS UNDER THE CURRENT CBC. COORDINATE WITH SOLID WASTE DIVISION FOR SERVICEABILITY.
16. CONTRACTOR SUBMITTALS SHALL CONFORM TO ARTICLE 1.5 OF TMS 602/ACI 530.1/ASCE 6.
17. QUALITY ASSURANCE SHALL CONFORM TO LEVEL 'B' QUALITY ASSURANCE PER ARTICLE 1.6 OF TMS 602/ACI 530.1/ASCE 6. PERIODIC SPECIAL INSPECTION REQUIRED. CONTRACTOR SHALL CONTACT THE CITY FOR INSPECTIONS.
18. INTERLOCKING BLOCKS ARE AN ACCEPTABLE ALTERNATIVE.

City of Lindsay

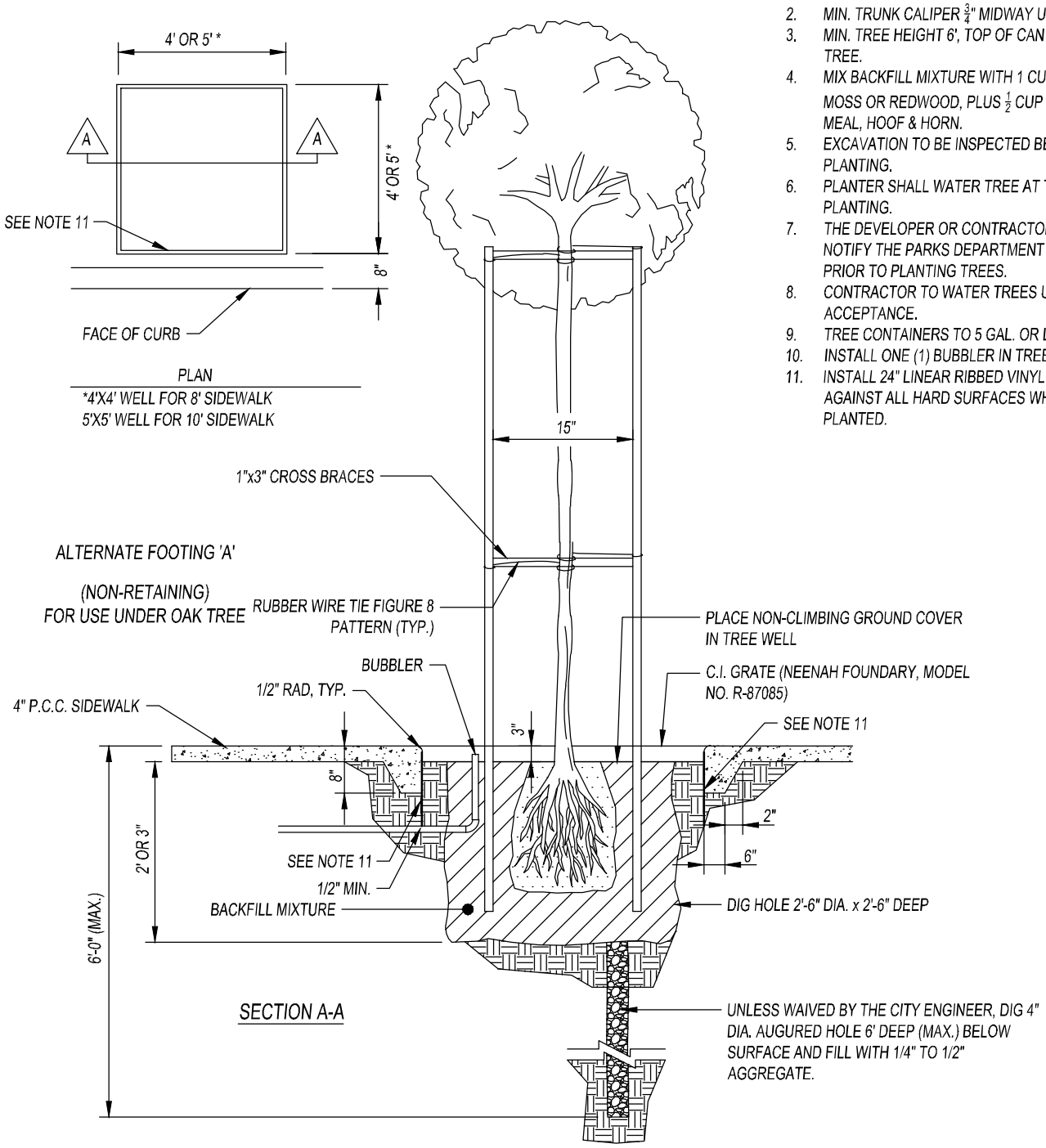
CITY SERVICES DEPARTMENT

REFUSE CONTAINER ENCLOSURE NOTES

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	M-9
			DATE	03/06/25	

NOTES:

1. TREE WELLS SPACED AT 50' (MAX) O.C. OR AS INDICATED (LOCATION TO BE APPROVED BY PARKS DIRECTOR)
2. MIN. TRUNK CALIPER $\frac{3}{4}$" MIDWAY UP TREE.
3. MIN. TREE HEIGHT 6', TOP OF CAN TO TOP OF TREE.
4. MIX BACKFILL MIXTURE WITH 1 CU. FOOT PEAT MOSS OR REDWOOD, PLUS $\frac{1}{2}$ CUP EACH OF BONE MEAL, HOOF & HORN.
5. EXCAVATION TO BE INSPECTED BEFORE PLANTING.
6. PLANTER SHALL WATER TREE AT TIME OF PLANTING.
7. THE DEVELOPER OR CONTRACTOR SHALL NOTIFY THE PARKS DEPARTMENT 48 HOURS PRIOR TO PLANTING TREES.
8. CONTRACTOR TO WATER TREES UNTIL FINAL ACCEPTANCE.
9. TREE CONTAINERS TO 5 GAL. OR LARGER.
10. INSTALL ONE (1) BUBBLER IN TREE WELL.
11. INSTALL 24" LINEAR RIBBED VINYL ROOT BARRIER AGAINST ALL HARD SURFACES WHEN TREE IS PLANTED.



MAJOR STREET & COMMERCIAL AREA

City of Lindsay

CITY SERVICES DEPARTMENT

TREE WELL

MARK	DATE	REVISION	ENGINEERING STANDARD		IMPROVEMENT STANDARD
			APPROVED	JSC	M-10
			DATE	03/06/25	