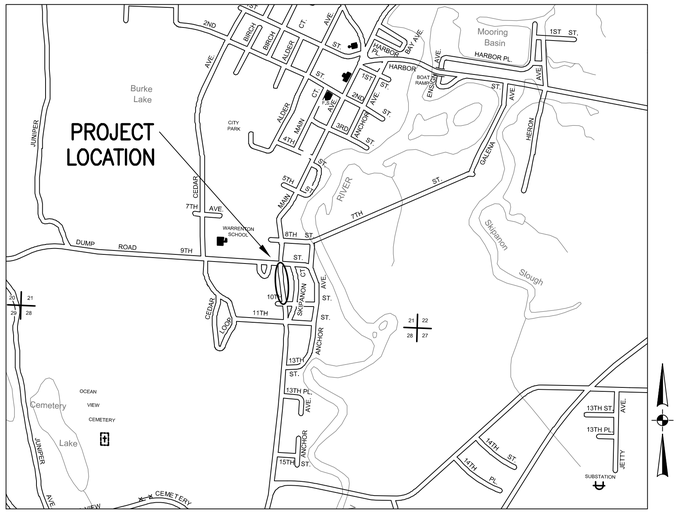
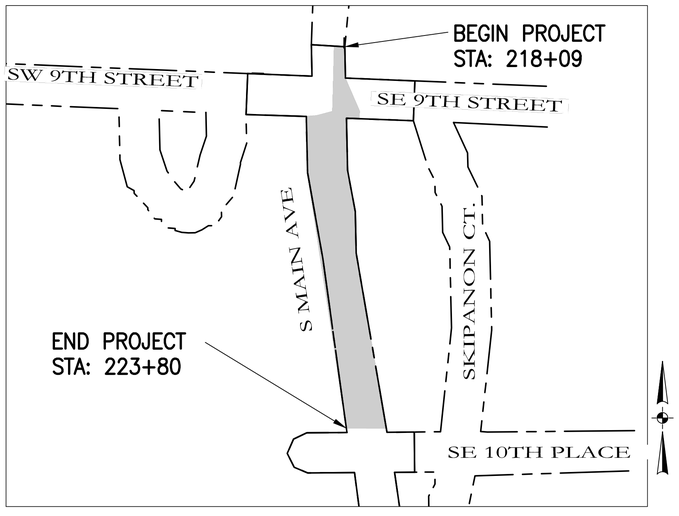
FINAL PLANS

CITY OF WARRENTON

WARRENTON GRADE SCHOOL MAIN AVENUE SAFE PEDESTRIAN WALKWAY



LOCATION MAP
NO SCALE



SITE OVERVIEW
NO SCALE

GENERAL NOTES

1. ATTENTION CONTRACTORS: OREGON LAW REQUIRES YOU TO FOLLOW RULES ADOPTED BY THE OREGON UTILITY NOTIFICATION CENTER. THOSE RULES ARE SET FORTH IN OAR 952-001-0010 THROUGH OAR 952-001-0090. YOU MAY OBTAIN COPIES OF THE RULES BY CALLING THE CENTER. (NOTE: THE TELEPHONE NUMBER FOR THE OREGON UTILITY NOTIFICATION CENTER IS (503) 232-1897 OR 1-800-332-2344). AT LEAST TWO (2) BUSINESS DAYS PRIOR TO CONSTRUCTION, THE CONTRACTOR SHALL NOTIFY THE OREGON UTILITY NOTIFICATION CENTER OF THE DATE AND LOCATION OF THE PROPOSED CONSTRUCTION, AND THE TYPE OF WORK TO BE PERFORMED.

2. ALL EXISTING FACILITIES TO BE MAINTAINED IN-PLACE BY THE CONTRACTOR UNLESS OTHERWISE SHOWN OR DIRECTED. CONTRACTOR TO LEAVE EXISTING FACILITIES IN AN EQUAL OR BETTER THAN ORIGINAL CONDITION AND TO THE SATISFACTION OF THE ENGINEER.

3. IN ACCORDANCE WITH O.R.S.290.140, IF THE CONTRACTOR FINDS IT NECESSARY TO INTERFERE WITH OR PAVE OVER ANY ESTABLISHED PUBLIC LAND SURVEY CORNER OR ITS ACCESSORIES, WITHIN THE PROJECT LIMITS, THE CONTRACTOR SHALL NOTIFY THE COUNTY SURVEYOR PRIOR TO DOING SO.

4. IN ACCORDANCE WITH O.R.S.290.150, CONTRACTOR SHALL BE RESPONSIBLE FOR REPLACING ALL SURVEY MONUMENTS DISTURBED OR DESTROYED DURING CONSTRUCTION. REPLACING THE SURVEY MONUMENTS SHALL BE DONE BY A REGISTERED LAND SURVEYOR AT THE EXPENSE OF THE CONTRACTOR.

5. EXISTING UTILITY LOCATIONS SHOWN (PLAN & PROFILE) ARE APPROXIMATE ONLY. POTHOLING WAS CONDUCTED ON THE EAST SIDE AND IS AVAILABLE FROM THE ENGINEER. CONTACT UTILITY COMPANIES FOR PREMARKING. CONTRACTOR TO POTHOLE EXISTING UTILITIES AT CONNECTION & CROSSING LOCATIONS TO VERIFY DEPTH, LOCATION & TYPE OF EXISTING WATER MAIN, SEWER MAIN & STORM MAIN PRIOR TO ORDERING CONNECTION MATERIALS. NOTIFY ENGINEER IMMEDIATELY IF EXISTING CONDITIONS VARY FROM THAT SHOWN. NOTIFY ENGINEER 48 HOURS PRIOR TO POTHOLING.

6. CONTRACTOR SHALL VERIFY ALL CONDITIONS ON THE JOB SITE INCLUDING ALL DIMENSIONS, GRADES, ELEVATIONS, EXTENT AND COMPATIBILITY TO THE EXISTING SITE CONDITIONS, AND WITH THE WORK DESCRIBED ON THE CONTRACT DRAWINGS. ANY DISCREPANCIES OR UNEXPLAINED CONDITIONS THAT AFFECT OR CHANGE THE WORK DESCRIBED IN THE CONTRACT DOCUMENTS SHALL BE BROUGHT TO THE ENGINEER'S ATTENTION IMMEDIATELY. CONTRACTOR SHALL NOT PROCEED WITH ANY OF THE WORK IN THE AREA OF DISCREPANCIES UNTIL ALL SUCH DISCREPANCIES ARE RESOLVED. IF THE CONTRACTOR CHOOSES TO DO SO, THEN IT IS UNDERSTOOD THAT HE SHALL BE PROCEEDING AT HIS OWN RISK AND INCUR ALL COST, IF ANY, TO RESOLVE THE ISSUE TO THE SATISFACTION OF THE ENGINEER.

7. TECHNICAL SPECIFICATIONS FOR CONSTRUCTION ARE TO FOLLOW THE CONTRACT SPECIFICATIONS AND THE MOST CURRENT EDITION OF THE ODOT/APWA STANDARD SPECIFICATION FOR CONSTRUCTION. OREGON STANDARD SPECIFICATIONS FOR CONSTRUCTION (ODOT/APWA) SHALL BE REFERENCED WHERE CONTRACT SPECIFICATIONS DO NOT ADDRESS A SPECIFIC ITEM. SEE SPECIFICATIONS FOR CONSTRUCTION METHODS AND OTHER NOTES PERTINENT TO THIS PROJECT.

8. UPON COMPLETION OF CONSTRUCTION OF THE PROJECT, CONTRACTOR TO SUBMIT RECORD DRAWINGS TO THE ENGINEER OR CITY. THE PROJECT SHALL NOT BE CONSIDERED COMPLETE UNTIL RECORD DRAWINGS ARE ACCEPTED BY CITY.

9. CONTRACTOR MAY ENCOUNTER HIGH GROUND-WATER TABLE AT SITE LOCATION. HIGH GROUND-WATER IN COMBINATION WITH BEACH SAND SUBGRADE WILL CAUSE A "QUICK" EFFECT, WHICH WILL RESULT IN THE DESTABILIZATION OF ADJACENT SOILS, UTILITIES AND STRUCTURES. CONTRACTOR SHALL ANTICIPATE AND COORDINATE ANY AND ALL DEWATERING TECHNIQUES NECESSARY AND/OR REQUIRED TO COMPLETE PROJECT AS SPECIFIED IN THE TECHNICAL SPECIFICATIONS. CONTRACTOR SHALL BEAR ALL COSTS PERTAINING TO DEWATERING EFFORTS.

ROADWORK/SITEWORK

10. CONTRACTOR SHALL RESTORE ALL SURFACES TO MATCH EXISTING AND ADJACENT GRADES.

11. ALL DESIGN ELEVATIONS SHOWN SHALL BE CONSIDERED TO BE FINISH SURFACE ELEVATIONS UNLESS OTHERWISE NOTED. ALL SURFACES SHALL BE GRADED SMOOTH AND FREE OF IRREGULARITIES THAT COULD ACCUMULATE SURFACE WATER. REPLACEMENT OF THE STREET MARKINGS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.

12. THE CONTRACTOR SHALL HAVE A SUFFICIENT NUMBER OF COMPACTION TESTS PERFORMED TO MEET SPECIFICATION REQUIREMENTS AT THE CONTRACTOR'S EXPENSE. TESTS SHALL BE PERFORMED BY A QUALIFIED TESTING AGENCY AND WRITTEN RESULTS SHALL BE PROVIDED TO ODOT, CITY OF WARRENTON AND THE ENGINEER OF RECORD. SHOULD COMPACTION REQUIREMENTS NOT BE MET, CONTRACTOR SHALL RECOMPACT AND PAY ALL ADDITIONAL TESTING COSTS RELATED TO THE RECOMPACTION.

SIGNAGE

13. CONTRACTOR SHALL ERECT AND MAINTAIN BARRICADES, WARNING SIGNS, TRAFFIC CONES PER ODOT & MUTCD REQUIREMENTS. ACCESS TO EXISTING DRIVEWAYS AND BUSINESSES TO BE MAINTAINED AT ALL TIMES. CONTRACTOR SHALL REPLACE ALL SIGNS REMOVED DURING CONSTRUCTION. CITY TO APPROVE INSTALLATION.

STORMWATER

14. CONTRACTOR SHALL COORDINATE WITH ENGINEER OR CITY REPRESENTATIVE FOR INSPECTION OF STORMWATER SYSTEMS PRIOR TO BACKFILL.

15. CONTRACTOR SHALL POTHOLE EXISTING STORMWATER PIPES FOR CONNECTION OF NEW STORMWATER SYSTEM. ALL INVERT ELEVATIONS, PIPE SIZES AND MATERIALS ARE TO BE MEASURED BY CONTRACTOR PRIOR TO ORDERING ANY MATERIALS FOR THE STORMWATER SYSTEM.

DEMOLITION

16. CONTRACTOR TO DEVELOP A CONSTRUCTION PHASING PLAN AND PROVIDE IT TO THE CITY AND ENGINEER PRIOR TO BEGINNING CONSTRUCTION. PLAN SHALL INDICATE STAGES OF DEMOLITION AND DURATION OF OUTAGES. ALL OUTAGES ARE TO BE KEPT TO A MINIMUM.

TRAFFIC CONTROL

17. THE CONTRACTOR SHALL DEVELOP AND SUBMIT A TRAFFIC CONTROL PLAN FOR REVIEW AND APPROVAL PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL INCLUDE SIGNAGE AS NECESSARY TO INFORM TRAFFIC OF ANY CLOSURE AND PROPER REROUTING. THE CONTRACTOR SHALL FURNISH AND PLACE TRAFFIC CONTROL BARRICADES AND SIGNS ACCORDING TO THE MUTCD AND ODOT SPECIFICATIONS IN ORDER TO ALLOW THE PUBLIC REASONABLE ACCESS TO BUSINESSES AND RESIDENTIAL PARKING. THE CONTRACTOR SHALL USE CONES, DELINEATORS, DETOUR SIGNS AND BARRICADES TO KEEP VEHICULAR AND PEDESTRIAN TRAFFIC OUT OF THE IMMEDIATE CONSTRUCTION ZONE OF THE CONTRACTOR. ALL SIGNS AND BARRICADES MUST BE APPROVED BY THE CITY OF WARRENTON, ODOT, AND THE ENGINEER PRIOR TO ORDERING.

EXISTING UTILITIES

UTILITY LOCATES SHOWN ON THIS MAP ARE BASED ON ABOVE GROUND STRUCTURES AND SURFACE LOCATES AT THE TIME THE FIELD WORK WAS COMPLETED. THE COMPANIES THAT PLACE THE PAINT MARKS DO NOT GUARANTEE THEIR SURFACE LOCATES TO BE FREE OF ERRORS AND OMISSIONS THEREFORE OTAK RESERVES THE SAME LIMITATIONS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REQUESTING, UPDATING AND PROTECTING THE LOCATION OF ALL UNDERGROUND UTILITIES.

SHEET INDEX

UTILITY PROVIDERS

ELECTRICITY
PACIFIC POWER
ATTN: MARILYN BROCKEY
2340 SE DOLPHIN
WARRENTON, OR 97146
503-861-6005
503-861-6020 (FAX)

CABLE TELEVISION
CHARTER COMMUNICATIONS
ATTN: RICH MCCAIN
419 GATEWAY
ASTORIA, OR 97103
503-735-5887
503-235-7421 (FAX)

ODOT
ODOT REGION 2 NORTHWEST AREA
ATTN.: KEN SHONKWILER, SENIOR PLANNER
350 W MARINE DR. ASTORIA, OR 97103
503-313-6812

WARRENTON POST OFFICE
ATTN: KEVIN ROMEYN
99 N MAIN AVE
WARRENTON, OR 97146
503-861-7035
KEVIN.D.ROMEYN@USPS.GOV

WATER, STORM, ROADS
CITY OF WARRENTON
ATTN: GREG SHAFER, P.E.
PUBLIC WORKS DIRECTOR
225 S. MAIN
P.O. BOX 250
WARRENTON, OR 97146
503-861-0917

GAS
NORTHWEST NATURAL GAS
ATTN.: RYAN WINFREE
503-226-4211 EXT, 2967
503-610-7765 (MOBILE)
RYAN.WINFREE@NWNATURAL.COM

TELEPHONE
LUMEN
ATTN: JOSH FALLIN
740 STATE ST RM 407
SALEM, OR 97301
503-798-1009

ONE CALL CENTER
1-800-332-2344 OR 811

PROJECT TEAM

OWNER
CITY OF WARRENTON
ATTN: GREG SHAFER, P.E.
PUBLIC WORKS DIRECTOR
225 S. MAIN
P.O. BOX 250
WARRENTON, OR 97146
503-861-0917

ROADWAY ENGINEER
OTAK, INC.
ATTN: KEITH BUISMAN, P.E.
808 SW THIRD AVE., SUITE 800
PORTLAND, OR 97204
(503) 287-6825

STORMWATER ENGINEER
OTAK, INC.
ATTN: PHILIP KENYON, P.E.
808 SW THIRD AVE., SUITE 800
PORTLAND, OR 97204
(503) 415-2308

BENCH MARK

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REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS
WARRENTON, OREGON
COVER SHEET

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
AMO — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

G-01

Plotted: Sep 15, 2023 - 9:17am Jess.Borgsheuer V:\PROJECT\19300\19996\CADD\ACAD\Dwg\G19996_G01.dwg Layout Name: G-01

WARRENTON GENERAL SITE PLAN NOTES:

1. NO PERSON SHALL DO WORK AFFECTING THE PUBLIC RIGHT-OF-WAY WITHOUT FIRST OBTAINING A PERMIT FROM THE PUBLIC WORKS DEPARTMENT. WORK AFFECTING THE RIGHT-OF-WAY INCLUDES, BUT IS NOT LIMITED TO, CONSTRUCTION, RECONSTRUCTION, GRADING, OILING, REPAIR, OPENING OR EXCAVATION OF A SIDEWALK, STREET, CURB, DRIVEWAY, CULVERT OR DITCH IN A PUBLIC RIGHT-OF-WAY, BUT DOES NOT INCLUDE THE CONSTRUCTION OF IMPROVEMENTS PERFORMED UNDER CITY CONTRACT.
2. CONSTRUCTION SHALL CONFORM TO THE OREGON SPECIFICATIONS AND STANDARD DRAWINGS FOR CONSTRUCTION AND AS REVISED BY THE CITY OF WARRENTON.
3. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY ALL UTILITY LOCATIONS PRIOR TO CONSTRUCTION AND ARRANGE FOR THE RELOCATION OF ANY IN CONFLICT WITH THE PROPOSED CONSTRUCTION. THE LOCATIONS, DEPTH, AND DESCRIPTION OF EXISTING UTILITIES SHOWN WERE COMPILED FROM AVAILABLE RECORDS AND-OR FIELD SURVEYS. THE CITY OR UTILITY COMPANIES DO NOT GUARANTEE THE ACCURACY OF THE COMPLETENESS OF SUCH RECORDS. ADDITIONAL UTILITIES MAY EXIST WITHIN THE WORK AREA.
4. OREGON LAW REQUIRES THAT THE RULES ADOPTED BY OREGON UTILITY NOTIFICATION CENTER BE FOLLOWED. THOSE RULES ARE SET FORTH IN OAR 952-001-0090. THE CONTRACTOR IS RESPONSIBLE TO CALL 1-800-332-2344 FOR LOCATES PRIOR TO EXCAVATION. ANY DAMAGE TO CITY OR PRIVATE SERVICES SHALL BE REPAIRED BY THE CONTRACTOR WITH OWN REPAIR MATERIALS, AND AT CONTRACTORS EXPENSE.
5. THE CONTRACTOR SHALL MAKE PROVISIONS TO KEEP ALL EXISTING UTILITIES (INCLUDING NON-LOCATABLE) IN SERVICE AND PROTECT THEM DURING CONSTRUCTION. CONTRACTOR SHALL BE RESPONSIBLE FOR THE IMMEDIATE NOTIFICATION OF DAMAGE TO UTILITIES AND THE REPAIR OR REPLACEMENT OF DAMAGED UTILITIES USING MATERIALS AND METHODS APPROVED BY THE UTILITY OWNER. NO SERVICE INTERRUPTIONS SHALL BE PERMITTED WITHOUT PRIOR WRITTEN AGREEMENT WITH THE UTILITY OWNER/PROVIDER.
6. THE CONTRACTOR SHALL POTHOLE AND VERIFY LOCATION AND DEPTH OF ALL EXISTING UTILITIES PRIOR TO THE START OF CONSTRUCTION. THE CONTRACTOR SHALL TAKE ALL NECESSARY FIELD MEASUREMENTS AND OTHERWISE VERIFY ALL DIMENSIONS AND EXISTING CONSTRUCTION CONDITIONS INDICATED AND OR SHOWN ON THE PLANS. SHOULD ANY ERROR OR INCONSISTENCY EXIST, THE CONTRACTOR SHALL NOT PROCEED WITH THE WORK AFFECTED UNTIL REPORTED TO THE DESIGN ENGINEER FOR CLARIFICATION OR CORRECTION.
7. ALL PROJECT ELEMENTS SHALL BE CONSTRUCTED PER APPROVED PROJECT DRAWINGS; SPECIFICATIONS; FEDERAL, STATE AND LOCAL PERMITS; AND PRECONSTRUCTION MEETING NOTES.
8. THE CONTRACTOR SHALL KEEP AN APPROVED SET OF PLANS ON THE PROJECT SITE AT ALL TIMES.
9. ALL DSL, DEQ, ODOT, AND OHA PERMITS AND REGULATIONS WILL BE THE RESPONSIBILITY OF THE DEVELOPER OR CONTRACTOR.
10. PROJECT INSPECTION ON PRIVATE PROJECTS IS THE RESPONSIBILITY OF THE DEVELOPER. THE CITY WARRENTON REQUIRES THE DESIGN ENGINEER TO MONITOR CONSTRUCTION STANDARDS AND WORKMANSHIP.
11. PROJECT PLANS SHALL ALWAYS HAVE AN ENGINEER-OF-RECORD PERFORMING THE FUNCTION OF DESIGN ENGINEER. IF THE DESIGN ENGINEER IS CHANGED DURING THE COURSE OF THE WORK, THE CITY SHALL BE NOTIFIED IN WRITING AND THE WORK SHALL BE STOPPED UNTIL THE REPLACEMENT ENGINEER HAS AGREED TO ACCEPT THE RESPONSIBILITIES OF THE DESIGN ENGINEER. THE NEW DESIGN ENGINEER SHALL PROVIDE WRITTEN NOTICE OF ACCEPTING PROJECT RESPONSIBILITY TO THE CITY WITHIN 72 HOURS OF ACCEPTING THE POSITION AS DESIGN ENGINEER.
12. INFRASTRUCTURE THROUGH NEIGHBORING PROPERTY IS ALLOWED ONLY WHEN RECORDED ACCESS EASEMENTS ARE GRANTED BY OWNERS. RECORDED EASEMENTS SHALL BE SUBMITTED TO PUBLIC WORKS PRIOR TO THE START OF THE WARRANTY PERIOD.
13. ALL PUBLIC, PRIVATE AND FRANCHISE UTILITIES SHALL BE IN PLACE PRIOR TO PROJECT FINAL APPROVAL AND ACCEPTANCE, E.G. ALL STREET LIGHTS MUST BE IN AND OPERATIONAL.
14. ALL SURVEY MONUMENTS ON THE PROJECT'S SITE OR THAT MAY BE SUBJECT TO DISTURBANCE WITHIN THE CONSTRUCTION AREA, OR THE CONSTRUCTION OF ANY OFF-SITE IMPROVEMENTS SHALL BE ADEQUATELY REFERENCED AND PROTECTED PRIOR TO COMMENCEMENT OF ANY CONSTRUCTION ACTIVITY. IF THE SURVEY MONUMENTS ARE DISTURBED, MOVED, RELOCATED, OR DESTROYED AS A RESULT OF ANY CONSTRUCTION, THE CONTRACTOR SHALL, AT THEIR COST, RETAIN THE SERVICES OF A REGISTERED PROFESSIONAL LAND SURVEYOR IN THE STATE OF OREGON TO RESTORE THE MONUMENT TO ITS ORIGINAL CONDITION AND FILE THE NECESSARY SURVEYS AS REQUIRED BY OREGON STATE LAW.
15. GRADING AND FILL/EXCAVATION PERMITS OR PRIVATE SERVICE PLUMBING PERMITS SHALL BE REQUIRED WHEN WORK IS PERFORMED ON PRIVATE PROPERTY. OWNER, ENGINEER, OR CONTRACTOR MUST CONTACT THE CITY OF WARRENTON PLANNING AND BUILDING DEPARTMENT, PRIOR TO CONSTRUCTION.
16. THE CONTRACTOR IS REQUIRED TO METER CONSTRUCTION WATER THROUGH A CITY HYDRANT WATER METER. WATER USED DURING CONSTRUCTION FOR DUST CONTROL OR OTHER PROCEDURES SHALL BE WITH A PERMIT AND FEE. CERTAIN HYDRANTS ARE AVAILABLE, PERMITS FOR CONNECTION AND FLOW ARE REQUIRED FROM THE PUBLIC WORKS DEPARTMENT, AND BACKFLOW DEVICES SHALL BE PRESENT.
17. ALL EXISTING STREETS AND SIDEWALKS TO BE CLEANED AND OR PROTECTED DAILY. CITY HAS THE RIGHT TO ENFORCE CLEANING AND SAFETY ISSUES. THE CONTRACTOR CAN BE FINED OR CHARGED FOR PUBLIC WORKS TIME AND MATERIAL.
18. CONTRACTOR SHALL ERECT AND MAINTAIN TEMPORARY TRAFFIC CONTROL PER THE "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES" (MUTCD), PART 6, AND DEVIATIONS TO THE MUTCD AS ADOPTED AND MODIFIED BY ODOT. SHOULD WORK BE IN AN EXISTING PUBLIC RIGHT OF WAY THAT IS OPEN TO TRAFFIC, THE CONTRACTOR SHALL SUBMIT A TRAFFIC CONTROL PLAN WITH ROW PERMIT TO APPROPRIATE CITY, COUNTY, AND STATE PERSONNEL FOR APPROVAL. APPROVALS SHALL BE OBTAINED PRIOR TO START OF WORK.
19. ANY INSPECTION BY THE CITY, COUNTY, STATE, FEDERAL AGENCY OR DESIGN ENGINEER SHALL NOT, IN ANY WAY, RELIEVE THE CONTRACTOR FROM ANY OBLIGATION TO PERFORM THE WORK IN COMPLIANCE WITH THE APPLICABLE CODES, REGULATIONS, CITY STANDARDS AND PROJECT CONTRACT DOCUMENTS.
20. TRACER WIRE INSTALLATION SHALL BE PERFORMED IN SUCH A MANNER THAT ALLOWS PROPER ACCESS FOR CONNECTION OF LINE TRACING EQUIPMENT, PROPER LOCATING OF WIRE WITHOUT LOSS OR DETERIORATION OF LOW FREQUENCY SIGNAL, AND WITHOUT DISTORTION OF SIGNAL CAUSED BY MORE THAN ONE WIRE BEING INSTALLED IN CLOSE PROXIMITY TO ONE ANOTHER.
21. TRACER WIRE SYSTEMS MUST BE INSTALLED AS A SINGLE CONTINUOUS WIRE, EXCEPT WHERE USING APPROVED CONNECTORS. NO LOOPING OR COILING OF WIRE IS ALLOWED. ONE FOOT OF EXCESS/SLACK WIRE IS REQUIRED IN ALL TRACER WIRE ACCESS POINTS AFTER MEETING FINAL ELEVATION.
22. ALL NEW TRACER WIRE INSTALLATIONS SHALL BE LOCATED USING TYPICAL LOW FREQUENCY (512 HZ) LINE TRACING EQUIPMENT, WITNESSED BY THE DESIGN ENGINEER OR PUBLIC WORKS DEPARTMENT, PRIOR TO ACCEPTANCE OF OWNERSHIP. THIS VERIFICATION SHALL BE PERFORMED UPON COMPLETION OF ROUGH GRADING AND AGAIN PRIOR TO FINAL ACCEPTANCE OF THE PROJECT.
23. UPON COMPLETION OF CONSTRUCTION, THE CONTRACTOR SHALL SUBMIT "REDLINE DRAWINGS" TO DESIGN ENGINEER FOR PREPARATION OF RECORD DRAWINGS. "REDLINE DRAWINGS" DOCUMENT ALL DEVIATIONS AND REVISIONS TO THE APPROVED PLANS; THEY ALSO RECORD A DESCRIPTION OF CONSTRUCTION MATERIALS ACTUALLY USED (PIPE MATERIAL, ETC.). FROM THE INFORMATION CONTAINED ON THESE REDLINE DRAWINGS, AS WELL AS ANY NOTES RECORDED BY THE DESIGN ENGINEER, THE DESIGN ENGINEER SHALL PREPARE AND SUBMIT RECORD DRAWINGS TO PUBLIC WORKS ENGINEERING DEVELOPMENT SERVICES. RECORD DRAWINGS ARE REQUIRED FOR ANY PUBLIC IMPROVEMENTS. CITY ACCEPTANCE OF ANY PUBLIC IMPROVEMENTS ARE TIED TO THE SUBMITTAL OF THESE RECORD DRAWINGS. CAD GENERATED PLANS SHALL ALSO HAVE ELECTRONIC RECORD DRAWINGS SUBMITTED TO THE CITY IN COMPLIANCE WITH THE DIGITAL MAPPING REQUIREMENTS. COMPLY WITH SECTION 2.11 AS-BUILT DOCUMENTS OF THE CITY OF WARRENTON ENGINEERING DESIGN STANDARDS.

WARRENTON STREET PLAN NOTES:

1. STANDARD MONOLITHICALLY POURED 6" CURB AND 18" GUTTER SECTION SHALL BE CONSTRUCTED. SUB-GRADE AASHTOT99 COMPACTION TESTS COMPLETED EVERY ONE-HUNDRED FEET WITH TEST REPORTS GIVEN TO PUBLIC WORKS.
2. THE FULL STREET SECTION SHALL HAVE A MINIMUM OF 4" ASPHALT CONCRETE IN TWO 2" LIFTS. THE TOP LAYER SHALL BE 12.5 MM (1/2") DENSE MIX FOR THE SURFACE WEARING COURSE WITH THE LOWER LIFT EITHER 19 MM (3/4") DENSE HOT MIX ASPHALT CONCRETE (HMAC) OR 12.5 MM (1/2") DENSE MIX.
3. ROADWAY STRUCTURE OF TWELVE INCHES OF 1" OR ¾" – 0" INCH COMPACTED BASE ROCK. AN ADDITIONAL 12" LAYER OF 3" COBBLE SUB-BASE WITH GEOTEXTILE LAYER MAY BE USED DURING WET WEATHER OR WINTER CONSTRUCTION PERIODS.
4. ALL CUTS IN ASPHALT PAVING, PORTLAND CEMENT PAVING, CONCRETE CURBS, GUTTERS AND SIDEWALKS SHALL BE SAW CUT AT LEAST THREE INCHES DEEP UNLESS EXCEPTED AS A CONDITION OF THE PERMIT.
5. TRENCH COMPACTION OF 1" OR ¾"-0" BACKFILL IN PUBLIC UTILITIES. STREET SAW CUT AND RESTORATION ARE REQUIRED. TACK COATING AND SAND SEALING OF EDGES OF PAVEMENT CUT IS REQUIRED.
6. MAILBOX UNITS MOUNTED IN SIDEWALK SHALL HAVE A SWEEP PROVIDED BEHIND THE OBSTRUCTION SO THAT 4 FEET OF CLEAR PASSING DISTANCE IS MAINTAINED. LOCATION TO BE COORDINATED WITH THE UNITED STATES POST SERVICE OFFICE FOR WARRENTON.
7. NEW ADA RAMP(S) WITH TRUNCATED DOMES TEXTURE PATTERN IS REQUIRED ON ALL STREET CORNERS. THE CONTRACTOR SHALL PROVIDE THE PATTERN PANELS FOR THE RAMPS. DAMAGE TO ADA RAMPS OR SIDEWALKS DURING CONSTRUCTION OR BUILDING CONSTRUCTION SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO REPAIR.
8. ALL STREET NAME SIGNS SHALL BE INSTALLED BY CONTRACTOR TO APWA, MUTCD AND CITY STANDARDS. SIGNS POLES MOUNTED IN GRADE, CURBS OR SIDEWALKS HAVE V-LOCK ANCHORS.
9. ALL STREET MARKINGS SUCH AS STOP BARS OR CROSSWALKS ETC., SHALL BE INSTALLED BY CONTRACTOR FOLLOWING THE MOST CURRENT ADDITION OF THE MUTCD AND BE MADE OF THERMOPLASTIC MATERIAL PER APWA STANDARDS.
10. STREETLIGHT POLES AND LUMINARIES SHALL BE INSTALLED PRIOR TO FINAL APPROVAL.
11. SIDEWALK PORTIONS TO BE (RE)CONSTRUCTED FOR FULL FRONTAGE OR WHERE BROKEN AND MISSING. TWO INCHES OF COMPACTED ½"-0" BASE ROCK UNDER CONCRETE, WITH ½" FIBER BOARD EXPANSION JOINT AT ENDS, DUMMY TOOL CONSTRUCTION JOINTS EVERY 5 FEET ALSO MATCHING SCORE MARKS IN ANY EXISTING ADJACENT CURB AND GUTTER. AN 8-INCH THICKNESS IN COMMERCIAL (6" RESIDENTIAL) DRIVEWAY APRONS IS REQUIRED. ALL SIDEWALK WIDTHS ARE DETERMINED BY THE STREET CLASSIFICATION. THE SIDEWALK SHALL BE A MINIMUM OF FOUR INCHES THICK AND SIX INCHES THICK AT THE DRIVEWAYS. EACH LOT SHALL HAVE A DRIVEWAY APPROACH WITH THREE-FOOT CURB TRANSITIONS WITH SIDEWALK SWEEP AROUND THE BACK OF THE ACCESS PER THE ATTACHED PLAN SET.
12. NEWLY CONSTRUCTED CURBS SHALL BE STAMPED WITH THE CAPITAL LETTER "D" FOR STORM, "S" FOR SANITARY, AND "W" FOR WATER AT THE LOCATION OF EACH UNDERGROUND SERVICE CROSSING. LETTERS SHALL BE THREE (3) INCHES IN HEIGHT AND EMBOSSED A MINIMUM OF ONE-QUARTER (1/4) INCH DEEP.

WARRENTON STORMWATER PLAN NOTES:

1. INSTALLATION OF CURB INLETS, FIELD INLETS AND MANHOLES ARE TO CONFORM TO CITY STANDARDS. CONNECTION TO EXISTING PUBLIC SYSTEMS FROM PRIVATE CATCHMENTS SHALL BE AT OR HAVE INSTALLED CURB CATCH BASINS OR AREA INLETS WITHIN THE PUBLIC RIGHT-OF-WAY.
2. CONTRACTOR IS RESPONSIBLE FOR, MANDREL AND TELEVISION TESTING AND INSPECTION REQUIREMENTS - SEE GENERAL SECTION.

WARRENTON EROSION CONTROL PLAN NOTES:

1. ALL SITES SHALL SUBMIT AN EROSION CONTROL PLAN FOR REVIEW, REGARDLESS OF SIZE. NEW DEVELOPMENTS IMPACTING AREAS OF 10,000 SQUARE FEET OR GREATER MUST OBTAIN AN EROSION CONTROL PERMIT. (SEE GR-02 FOR DETAILS)
2. EROSION CONTROL PLAN SHALL INCLUDE:
   - 2.1. THE METHODS AND/OR FACILITIES TO BE USED TO PREVENT EROSION AND POLLUTION CREATED FROM THE DEVELOPMENT BOTH DURING AND AFTER CONSTRUCTION.
   - 2.2. LIMITS OF CLEARING BY FLAGGING BOUNDARIES IN THE FIELD BEFORE STARTING SITE GRADING OR CONSTRUCTION. STAGING AREAS SHALL BE INCLUDED.
   - 2.3. AN ANALYSIS OF SOURCE CONTROLS, SUCH AS DETENTION AND STORAGE DURING CONSTRUCTION AS AN ALTERNATIVE METHOD TO CONTROL EROSION FROM STORM WATER RUNOFF.
   - 2.4. A DRAINAGE PLAN DURING CONSTRUCTION.
   - 2.5. SHOW EXISTING CONTOURS AS WELL AS ALL SENSITIVE AREAS, CREEKS, STREAMS, WETLANDS, AND OPEN AREAS.
   - 2.6. A DESCRIPTION OF HISTORIC LOCALIZED FLOODING PROBLEMS RESULTING FROM SURFACE WATER RUNOFF, FEMA OR FLOODING PROBLEMS KNOWN TO THE COMMUNITY OR THE CITY.
   - 2.7. EROSION CONTROL PLAN SHALL INCLUDE A SCHEDULE FOR IMPLEMENTATION OF EROSION MEASURES. THE SCHEDULE SHALL INCLUDE:
     - 2.7.1. MEASURES TO COVER BARE SOIL WITHIN 14 DAYS FOLLOWING FINAL GRADING.
     - 2.7.2. IMPLEMENTATION OF WET WEATHER MEASURES BETWEEN OCTOBER 1ST AND APRIL 30TH, UNLESS OTHERWISE APPROVED BY THE CITY.
     - 2.7.3. ON SITES WHERE VEGETATION AND GROUND COVER HAVE BEEN REMOVED, CITY APPROVED GROUND COVER SHALL BE RE-ESTABLISHED BY SEEDING AND MULCHING ON OR BEFORE SEPTEMBER 1ST WITH THE GROUND COVER ESTABLISHED BY OCTOBER 15TH. AS AN ALTERNATIVE TO SEEDING AND MULCHING, OR IF GROUND COVER IS NOT ESTABLISHED BY OCTOBER 15TH, THE OPEN AREAS SHALL BE PROTECTED THROUGH THE WET SEASON WITH STRAW MULCH, EROSION BLANKETS, OR OTHER APPROVED METHODS, WHERE APPROPRIATE, WITH LONG TERM MAINTENANCE PLAN.
3. WATER CONTAINING SEDIMENT SHALL NOT BE DISCHARGED INTO THE SURFACE WATER MANAGEMENT SYSTEM, WETLANDS OR STREAMS WITHOUT FIRST PASSING THROUGH AN APPROVED SEDIMENT FILTERING FACILITY OR DEVICE. DISCHARGE FROM TEMPORARY SEDIMENTATION PONDS OR DETENTION FACILITIES USED FOR SEDIMENTATION DURING CONSTRUCTION SHALL BE CONSTRUCTED TO CITY STANDARDS TO PROVIDE ADEQUATE SEDIMENT FILTRATION.
4. A SITE-SPECIFIC PLAN PREPARED BY A REGISTERED PROFESSIONAL ENGINEER SHALL BE REQUIRED AND ADDITIONAL EROSION CONTROL MEASURES MAY BE REQUIRED FOR SITES HAVING ONE OR MORE OF THE FOLLOWING CHARACTERISTICS:
   - 4.1. SITES WITH HIGHLY ERODIBLE SOILS;
   - 4.2. SITES ADJACENT TO SENSITIVE AREAS;
   - 4.3. SITES WHERE GRADING AND CLEARING ACTIVITIES ARE LIKELY BETWEEN OCTOBER 1ST AND APRIL 30TH
5. ADDITIONAL EROSION CONTROL MEASURES MAY INCLUDE ONE OR MORE OF THE FOLLOWING:
   - 5.1. LIMITED AREA CLEARED AT ANY ONE TIME;
   - 5.2. ADDITIONAL DRAINAGE REQUIREMENTS DURING CONSTRUCTION;
   - 5.3. FILTERING OR TREATMENT OF RUNOFF;
   - 5.4. ADDITIONAL WATER QUALITY;
   - 5.5. ADDITIONAL EROSION CONTROL TO COVER PORTIONS OF THE SITE;
   - 5.6. MAINTAINING A VEGETATED BUFFER STRIP BETWEEN SITE AND SENSITIVE AREA;
   - 5.7. ADDITIONAL FACILITIES TO REDUCE VOLUME AND VELOCITY OF WATER RUNOFF;
   - 5.8. IF THERE ARE NO WORKABLE ALTERNATIVES, LIMIT CLEARING AND GRADING IN SOME AREAS BETWEEN OCTOBER 1ST AND APRIL 30TH
   - 5.9. ALL DISTURBED LAND AREAS THAT SHALL REMAIN UNWORKED FOR 14 DAYS OR MORE SHALL BE PHYSICALLY COVERED IN THE WET WEATHER SEASON.
6. SITE CLEANUP AND DEBRIS REMOVAL. CONTRACTOR TO REMOVE EXCESSIVE SOIL AND DEBRIS DEPOSITED ONTO STREETS OR INTO THE CITY STORM DRAINAGE SYSTEM. STREET CLEANUP ON STREETS EVERY DAY AND UPON COMPLETION OF WORK OR AS REQUIRED BY THE CITY.
7. DUST CONTROL ON STREETS ACCESSIBLE AND USED BY RESIDENTS IS REQUIRED.
8. MINIMUM EROSION CONTROL MEASURES SHALL INCLUDE BUT ARE NOT LIMITED TO THE FOLLOWING. SEDIMENT FENCES ALONG THE DOWNGRADE SLOPE OF THE PROJECT PERIMETER. FILTER BAGS AT CATCH BASIN INLETS. STREET CLEANING OF DEBRIS OR MATERIAL DROPPED IN TRANSIT. INSTALLATION OF WATER QUALITY EROSION CONTROL BMP'S PER PROJECT PLANS.

LEGEND

PROPOSED

- STORM LINE — SD
- CURB INLET
- ASPHALT SAWCUT
- ASPHALT
- SIDEWALK/CONCRETE
- GRAVEL SHOULDER
- SEAL COAT
- DETECTABLE WARNING SURFACE
- WATER QUALITY FILTER STRIP
- REMOVE EXISTING ASPHALT AND CONCRETE
- SEEDING - SEE SHEETS C-01 AND C-02 FOR DETAILS
- GRAVEL CONSTRUCTION ENTRANCE
- LANDSCAPE AREA
- CONCRETE WASHOUT
- INLET PROTECTION
- DISTURBANCE LIMITS
- WATTLE

EXISTING

- RIGHT-OF-WAY
- MAJOR CONTOURS 5' INTERVAL — 30 —
- MINOR CONTOURS 1' INTERVAL — 29 —
- STORM LINE — SD —
- SEWER LINE — SS —
- WATER LINE — W —
- WATER VALVE — WV —
- GAS VALVE — GV —
- STORM INLET
- FENCE — X —
- GAS LINE — G —
- SIGN
- OVERHEAD POWER — OHL —
- FIBER OPTIC — FO —
- EDGE OF PAVEMENT
- EDGE OF GRAVEL

- INDICATES ASPHALT — ASPH
- INDICATES CONCRETE — CONC
- INDICATES RECORD DATA — ( )
- INDICATES AUDITOR'S FILE NUMBER — AFN:
- RIGHT OF WAY CENTERLINE
- WATER METER WITH VAULT
- STORM SEWER MANHOLE — ST
- DRY WELL
- SANITARY SEWER MANHOLE — S
- TRANSFORMER — T
- GAS VALVE — GV
- GAS METER — GM
- POWER POLE
- GUY ANCHOR
- STREET SIGN
- CATCH BASIN (CB)

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REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

GENERAL NOTES

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
AMO — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

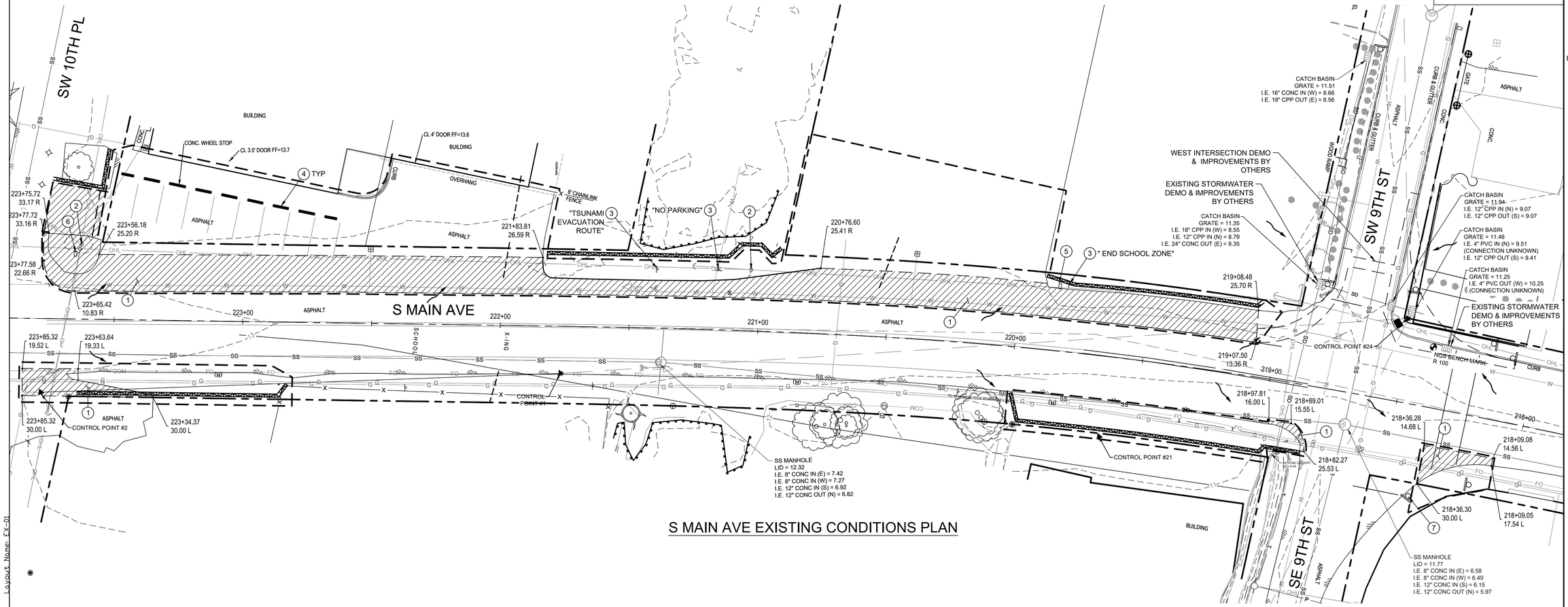
19996
PROJECT NUMBER

G-02

If this drawing is not 22" x 34", it has been reduced/enlarged. Scale accordingly.

Plotted: Sep 15, 2023 - 8:58am Jess.Bornsheuer V:\PROJECT\19900\19996\CADD\ACAD\Dwg\C19996_G02.dwg Layout: None G-02

FINAL PLANS



S MAIN AVE EXISTING CONDITIONS PLAN

DEMOLITION LEGEND

- LIMITS OF DISTURBANCE
- SAWCUT LINE
- SEDIMENT FENCE
- SURFACING TO BE REMOVED
- DRAINAGE FLOW ARROW

EXISTING LEGEND

- SURVEY CONTROL
- SANITARY MANHOLE
- STORM MANHOLE
- APPROXIMATE MANHOLE SIZE/LOCATION
- CATCH BASIN
- AREA DRAIN
- YARD/AREA DRAIN
- CLEAN OUT
- GAS VALVE
- GAS LINE MARKER SIGN
- GAS METER
- WATER VALVE
- FIRE HYDRANT
- WATER METER
- COMMUNICATION MANHOLE
- UTILITY POLE
- GUY ANCHOR
- SIGN
- MAILBOX
- BH BORE HOLE
- BIKE LANE
- DECIDUOUS TREE
- EVERGREEN TREE
- 50' WETLAND BUFFER
- WETLAND BOUNDARY
- SS SANITARY LINE
- G GAS LINE
- OHL OVER HEAD UTILITY LINE
- W WATER LINE
- COM COMMUNICATION LINE
- X FENCE (AS NOTED)
- RAMP

CONC. = CONCRETE
DEC = DECIDUOUS

GENERAL NOTES

1. SEE SHEETS G-01 & G-02 FOR NOTES AND LEGEND.
2. CONSTRUCTION CONTRACTOR IS RESPONSIBLE FOR THE DEMOLITION, REMOVAL, AND LEGAL DISPOSAL OF ALL ONSITE EXISTING MATERIALS AND IMPROVEMENTS THAT CONFLICT WITH ACCEPTABLE COMPLETION OF CONSTRUCTION OF THE PROPOSED AND APPROVED PROJECT.
3. CONTRACTOR SHALL PROVIDE EROSION CONTROL AND PAVEMENT SWEEPING/CLEANING AS NECESSARY TO ENSURE NO TRACTION OF SOILS ON TO PUBLIC STREETS.
4. CONTRACTOR SHALL PROTECT ALL EXISTING UTILITIES UNLESS NOTED TO BE REMOVED ON PLANS.

DEMOLITION NOTES

1. SAWCUT, DEMO, AND REMOVE EXISTING PAVEMENT, CONCRETE AND GRAVEL.
2. EXISTING UTILITY POLE TO REMAIN.
3. PROTECT EXISTING SIGNS AND POLE.
4. REMOVE AND PRESERVE EXISTING WHEEL STOP. SEE SHEET SS-01 FOR PROPOSED WHEEL STOP LOCATION.
5. REMOVE AND PRESERVE EXISTING MAILBOX FOR RELOCATION. SEE SHEET C-02 FOR PROPOSED MAILBOX LOCATION.
6. REMOVE AND PRESERVE EXISTING MAILBOX FOR RELOCATION. SEE SHEET C-01 FOR PROPOSED MAILBOX LOCATION.
7. REMOVE AND PRESERVE EXISTING SIGN FOR RELOCATION. SEE SHEET SS-01 FOR SIGNING AND STRIPING PLAN.

0 20 40
SCALE IN FEET

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OREGON
JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

EXISTING CONDITIONS & DEMO

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
ZMG — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

EX-01

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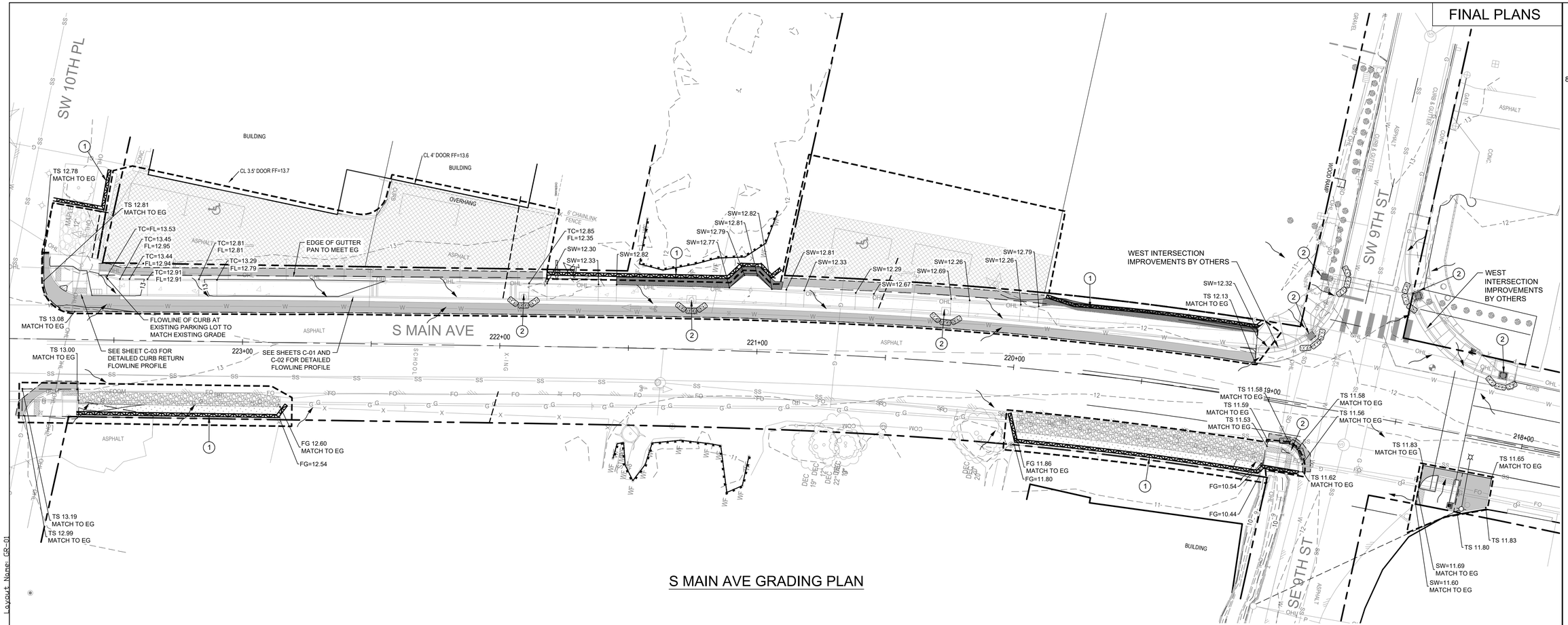
FINAL PLANS



S MAIN AVE GRADING PLAN

GENERAL NOTES

1. SEE SHEETS G-01 & G-02 FOR NOTES AND LEGEND.
2. CONTRACTOR SHALL PROVIDE EROSION CONTROL AND PAVEMENT SWEEPING/CLEANING AS NECESSARY TO ENSURE NO TRACTION OF SOILS ON TO PUBLIC STREETS.
3. CONTRACTOR SHALL INSTALL AND MAINTAIN ALL EROSION AND SEDIMENT CONTROL MEASURES PRIOR TO BEGINNING CONSTRUCTION AND SHALL BE RESPONSIBLE FOR MAINTAINING SUCH FACILITIES THROUGHOUT CONSTRUCTION PROCESS.
4. CONTRACTOR SHALL REMOVE ALL TEMPORARY EROSION CONTROL MEASURES AT PROJECT COMPLETION.

EROSION CONTROL NOTES

(1) SEDIMENT BARRIER, TYPE 3. SEE STD. DWG. RD1030 ON SHEET GR-02.

(2) INSTALL INLET PROTECTION, TYPE 4. SEE STD. DWG. RD1015 ON SHEET GR-02.

HORZ 0 20 40
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SCALE IN FEET

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JUNE 11, 2008
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EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

GRADING & EROSION CONTROL PLAN I

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
ZMG — CHECKED BY

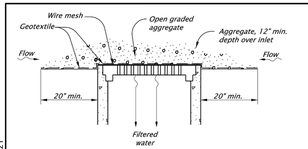
FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

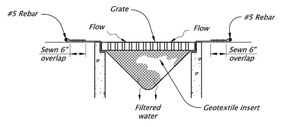
19996
PROJECT NUMBER

GR-01

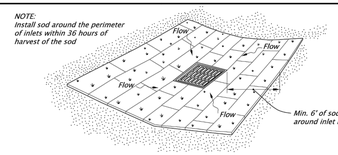
Plotted: Sep 15, 2023 - 8:59am Jess Borgsheuer V:\PROJECT\19900\19996\CADD\dCAD\Dwg\C19996_GR01.dwg Layout Name: GR-01



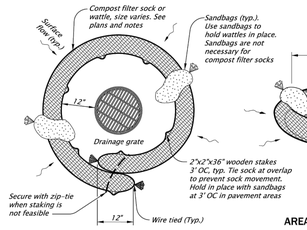
GEOTEXTILE/WIRE MESH/AGGREGATE - TYPE 2
NOT TO SCALE



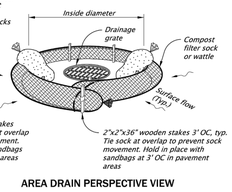
PREFABRICATED FILTER INSERT - TYPE 3
NOT TO SCALE



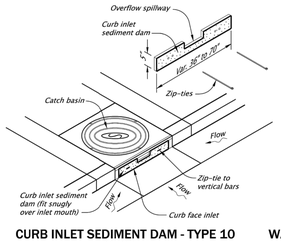
SOD PROTECTION - TYPE 6
NOT TO SCALE



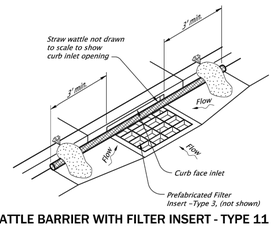
AREA DRAIN PLAN



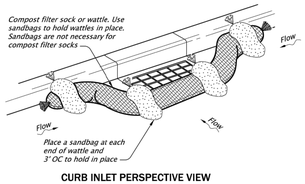
AREA DRAIN PERSPECTIVE VIEW



CURB INLET SEDIMENT DAM - TYPE 10
NOT TO SCALE



WATTLE BARRIER WITH FILTER INSERT - TYPE 11
NOT TO SCALE



CURB INLET PERSPECTIVE VIEW

COMPOST FILTER SOCK OR WATTLE - TYPE 7
NOT TO SCALE

NOTES:
Type 2 – Geotextile/wire mesh/aggregate
Place the wire mesh over the grate.
Place sediment fence geotextile over the wire mesh and perimeter area around structure.
Install aggregate over the geotextile fabric.

Type 3 – Prefabricated filter inserts
Install prefabricated filter inserts according to the plans, special provisions, and manufacturer recommendations.
Prefabricated inserts with provisions for overflow are allowed only when accompanied by additional BMP's to prevent the potential of sediments entering project storm systems.
Field fabricated inserts are not allowed.

Type 7 – Compost filter sock
Drive 2"x2" wood stakes a minimum of 6" into ground and flush with the top of the sock.
Overlap ends of sock per manufacturers recommendations (12"min., 36" max.).
Use 8" to 12" dia sock on curbside in traffic areas.

(Type 7 cont.)
Use 12" to 18" dia sock in non-traffic areas or areas where the larger socks can be used safely.
use synthetic mesh socks for temporary installations.

Type 10 – Curb inlet sediment dam
Fit curb inlet sediment dam snugly into inlet mouth. Curb inlet sediment dam is required for use with inlet filter insert where at-grade inlet grate and curb inlet are combined at a catch basin.

Type 11 – Wattle barrier with filter insert
Install prefabricated filter insert per Type 3 detail.
Install wattles over opening and 36" to each side of opening tight against curb. Adjust wattle to force storm water to flow through filter insert or wattle prior to leaving the site.
Adjust, replace or modify the inlet protection as needed to prevent sediment laden water from entering the catch basin.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

INLET PROTECTION TYPE 2, 3, 6, 7, 10 AND 11

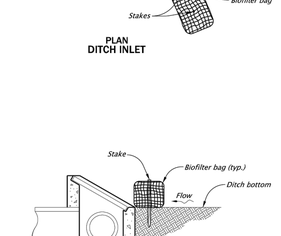
2021

DATE	REVISION DESCRIPTION
01-2021	REMOVED CALC BOOK NUMBERS
01-2021	MOVED NOTES UP FROM OVERLAPPING THE SHEET BORDER

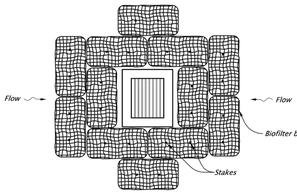
CALC BOOK NO. N/A — SDR DATE 20-JAN-2021 — **RD1010**

Effective Date: June 1, 2023 – November 30, 2023

RD1010.dgn 20-JAN-2021

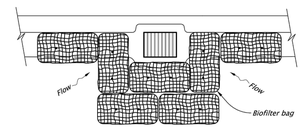


PLAN
DITCH INLET



PLAN
AREA DRAIN

SECTION A-A
DITCH INLET



PLAN
CATCH BASIN

BIOFILTER BAGS - TYPE 4
NOT TO SCALE

NOTES:
1. *Stake biofilter bags with 2"x2"x36" wood stakes, and use a minimum 2 stakes per bag. Drive stakes a minimum of 6" into the ground and flush with the top of the bags.*
2. *Omit stakes when bags are placed on pavement surface.*
3. *Overlap all bag joints 6".*
4. *Biofilter bags used on active roadways are easily displaced and made ineffective if struck by vehicles. If struck by a cyclist, falls with injury could result. On active roadways alternative inlet protection should be considered.*

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

INLET PROTECTION TYPE 4

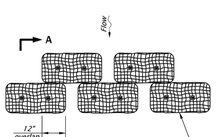
2021

DATE	REVISION DESCRIPTION
01-2021	REMOVED CALC BOOK NUMBERS

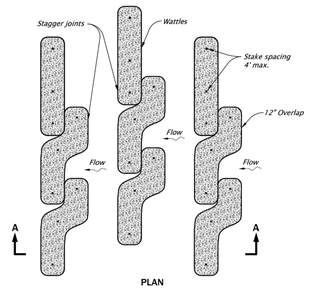
CALC BOOK NO. N/A — SDR DATE 20-JAN-2021 — **RD1015**

Effective Date: June 1, 2023 – November 30, 2023

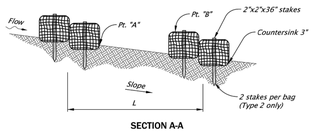
RD1015.dgn 20-JAN-2021



PLAN

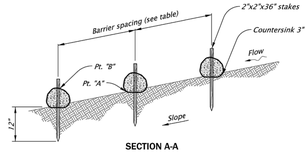


PLAN



SECTION A-A

BIOFILTER BAG / SAND BAG BARRIER - TYPE 2 AND 4
NOT TO SCALE



SECTION A-A

FIBER ROLL BARRIER - TYPE 3
NOT TO SCALE

NOTES:
1. *For Type 2 barrier, drive stakes flush with top of bag and into undisturbed ground a min. of 12". Omit stakes if bags are placed on paved surface.*
2. *For Type 2 and Type 4 barriers, space bags (L) so that the elevation of point "A" is less than or equal to the elevation of point "B".*

Type 2 – Biofilter bags
Type 3 – Wattles
Type 4 – Sand bags

BARRIER SPACING		
INSTALL PARALLEL ALONG CONTOURS AS FOLLOWS		
% SLOPE	% SLOPE	MAXIMUM SPACING ON SLOPE
10% Flatter	1:10 or Flatter	300'
10 > % ≥ 15	10 > X ≥ 7.5	150'
15 > % ≥ 20	7.5 > X ≥ 5	100'
20 > % ≥ 30	5 > X ≥ 3	50'
Steeper than 30%	Steeper than 1:3	25'

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

SEDIMENT BARRIER TYPE 2, 3 AND 4

2021

DATE	REVISION DESCRIPTION
01-2021	REMOVED CALC BOOK NUMBERS

CALC BOOK NO. N/A — SDR DATE 20-JAN-2021 — **RD1030**

Effective Date: June 1, 2023 – November 30, 2023

RD1030.dgn 20-JAN-2021

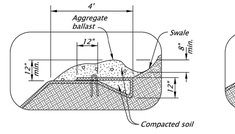


FIGURE A1:
TOP OF BANK ANCHOR TRENCH, H>3' AND TERMINAL SLOPE
NOT TO SCALE

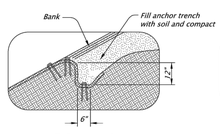


FIGURE A2:
TOP OF BANK ANCHOR TRENCH, H<3'
NOT TO SCALE

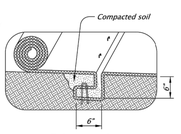


FIGURE A3:
CHANNEL CHECK SLOT
NOT TO SCALE

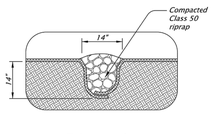


FIGURE A4:
CHANNEL CHECK SLOT WITH ROCK BACKFILL
NOT TO SCALE

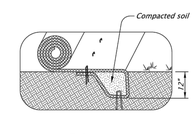
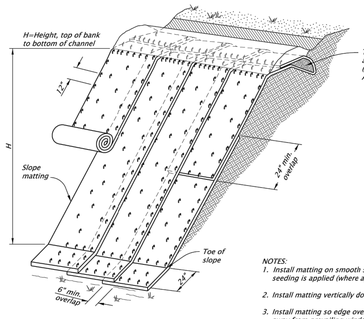
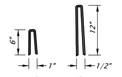


FIGURE A5:
INITIAL CHANNEL ANCHOR TRENCH
NOT TO SCALE



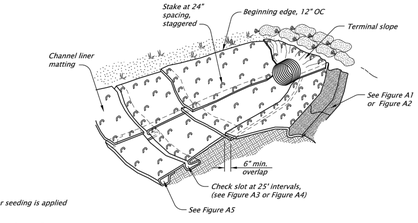
SLOPE MATTING ISOMETRIC VIEW
NOT TO SCALE

NOTES:
1. *Install matting on smooth soil surface after seeding is applied (where applicable).*
2. *Install matting vertically down slope.*
3. *Install matting so edge overlaps are shingled away from prevailing winds.*
4. *Place fastener at 12" OC on matting edges*
5. *Overlap upper mat over lower mat, and fasten.*
6. *Stagger alternate rows of fasteners placed at 24" OC*
7. *Extend mat 24" beyond toe of slope; fold mat back under 4" and fasten.*
8. *Matting Types A through E: Furnish fully biodegradable product. Matting with plastic or photodegradable components will not be accepted.*



STAPLES
NOT TO SCALE

NOTES:
1. *Install matting on smooth soil surface after seeding is applied (where applicable).*
2. *Install channel liner matting, in the direction of water flow. Anchor upstream end of mat with check slot for culvert outfalls, place mat under pipe 12" minimum upstream from pipe outlet.*
3. *Construct check slots across channel bottom at 25' spacing and at the end of each mat (Fig. A3 or A4).*
4. *Overlap side channel liner matting edges 6" over the center channel liner matting and fasten edges 12" OC. Continue overlap and stapling pattern for each additional side channel liner mat.*
5. *Lap upstream matting end 12" over beginning edge of downstream matting. Fasten 12" OC*
6. *Anchor top edge of side channel matting in trench and fasten 12" OC (Fig. A2).*
7. *Fasten matting interior at 24" OC with staggered spacing.*
8. *Construct initial anchor trench at downstream end of matting and terminal slope anchor at upstream end.*
9. *Matting Types A through E: Furnish fully biodegradable product. Matting with plastic or photodegradable components will not be accepted.*



CHANNEL MATTING ISOMETRIC VIEW
NOT TO SCALE

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

SLOPE AND CHANNEL MATTING

2021

DATE	REVISION DESCRIPTION
01-2021	REMOVED CALC BOOK NUMBERS

CALC BOOK NO. N/A — SDR DATE 20-JAN-2021 — **RD1055**

Effective Date: June 1, 2023 – November 30, 2023

RD1055.dgn 20-JAN-2021

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OREGON
JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

GRADING & EROSION CONTROL DETAILS

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY — ZMG — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

GR-02

Plotted: Sep 15, 2023 - 9:00am Jess.Borgsheuer V:\PROJECT\19900\19996\CAD\ACAD\Dwg\C19996_GR03.dwg Layout: None GR-02

FINAL PLANS

GENERAL NOTES

1. SEE SHEET G-01 AND G-02 FOR NOTES AND LEGEND.
2. ALL BASIS OF DESIGN IS BASED OFF OF SURVEYED RIGHT-OF-WAY CENTERLINE ALIGNMENT UNLESS OTHERWISE NOTED.
3. SEE SHEET C-04 FOR CURB RETURN AND RAMP GRADING PROFILE
4. SEE SHEET SS-01 FOR SIGNING AND STRIPING PLAN.
5. SEE SHEET C-07 FOR STORM DETAILS.

STREET CONSTRUCTION KEY NOTES

1. CONSTRUCT COMBINATION CURB RAMP OPTION "CC-4" WITH DETECTABLE WARNING SURFACE PER ODOT STD DWGS RD936 AND RD950 ON SHEET STD-03.
2. CONSTRUCT PERPENDICULAR CURB RAMP OPTION "PR-1" WARNING SURFACE PER ODOT STD DWG RD912 ON SHEET STD-03.
3. CONSTRUCT ASPHALT ROADWAY, SEE AC PAVEMENT SECTION ON SHEET C-06.
4. CONSTRUCT CONCRETE SIDEWALK PER ODOT STD DWG RD720 ON SHEET STD-02.
5. CONSTRUCT FULLY LOWERED DRIVEWAY APRON (OPTION G) PER ODOT STD DWG RD735 ON SHEET STD-03. SEE PLAN VIEW FOR DRIVEWAY CENTERLINE LOCATION.
6. CONSTRUCT 6" CURB AND 18" GUTTER PER ODOT STD DWG RD700 ON SHEET STD-01.
7. CONSTRUCT 6" STANDARD CURB PER ODOT STD DWG RD700 ON SHEET STD-01.
8. NOT USED.
9. INSTALL GRAVEL ACCESS, SEE DETAIL ON SHEET C-06 FOR GRAVEL SECTION.
10. EMULSIFIED ASPHALT IN FOG COAT, 5,400 SF
11. REMOVE AND REINSTALL MAILBOXES ON MULTIPLE MAILBOX SUPPORT PER ODOT STD DWG RD100 ON SHEET STD-02 AND SPECIAL PROVISIONS. INSTALL RAISED 4" CONCRETE PAD (WIDTH AND LENGTH OF MAILBOXES 4' X 2')
12. SAWCUT EXISTING PAVEMENT AT EXISTING FOG LINE STRIPING.
13. SAWCUT EXISTING PARKING LOT PAVEMENT.
14. RESTORE AREAS TO MATCH EXISTING CONDITIONS - INSTALL PERMANENT SEEDING IN NON-HARDSCAPE AREAS DISTURBED BY CONSTRUCTION.

STORM CONSTRUCTION KEY NOTES

1. CONSTRUCT CONCRETE INLET, TYPE CG-48
   INLET #: CG-03
   PCL STA: 221+90.88, 18.00' RT
   TOC ELEV= 12.7
   IE OUT= 10.25 (12" N)
   SEE CLEAN WATER SERVICES
   STANDARD DRAWING NO. 340 ON SHEET C-07
2. INSTALL STORM SEWER PIPE
   L=66LF 12" DI S=0.0046FT/FT
3. CONSTRUCT CONCRETE CHANNEL INLET
   PCL STA: 221+95.00, 18.00' RT
   SEE DETAIL 2 ON SHEET C-07.
4. CONSTRUCT CONCRETE CHANNEL INLET
   PCL STA: 222+48.93, 18.00' RT
   SEE DETAIL 2 ON SHEET C-07.
5. CONSTRUCT WATER QUALITY FILTER STRIP D01526
   PCL STA: 222+85.02 TO PCL STA: 223+63.61
   SEE DETAIL 1 ON SHEET C-07
6. INSTALL TYPE S2 FACILITY MARKER.
   SEE ODOT RD 399 ON SHEET STD-01.

ELEVATION ABBREVIATIONS

TOC	TOP OF CURB
FL	FLOW LINE
ME	MATCH EXISTING

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EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STREET & STORM PLAN & PROFILE S MAIN AVE STA 223+80 TO 221+50

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG DRAWN BY | ZMG CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

C-01

FINAL PLANS

GENERAL NOTES

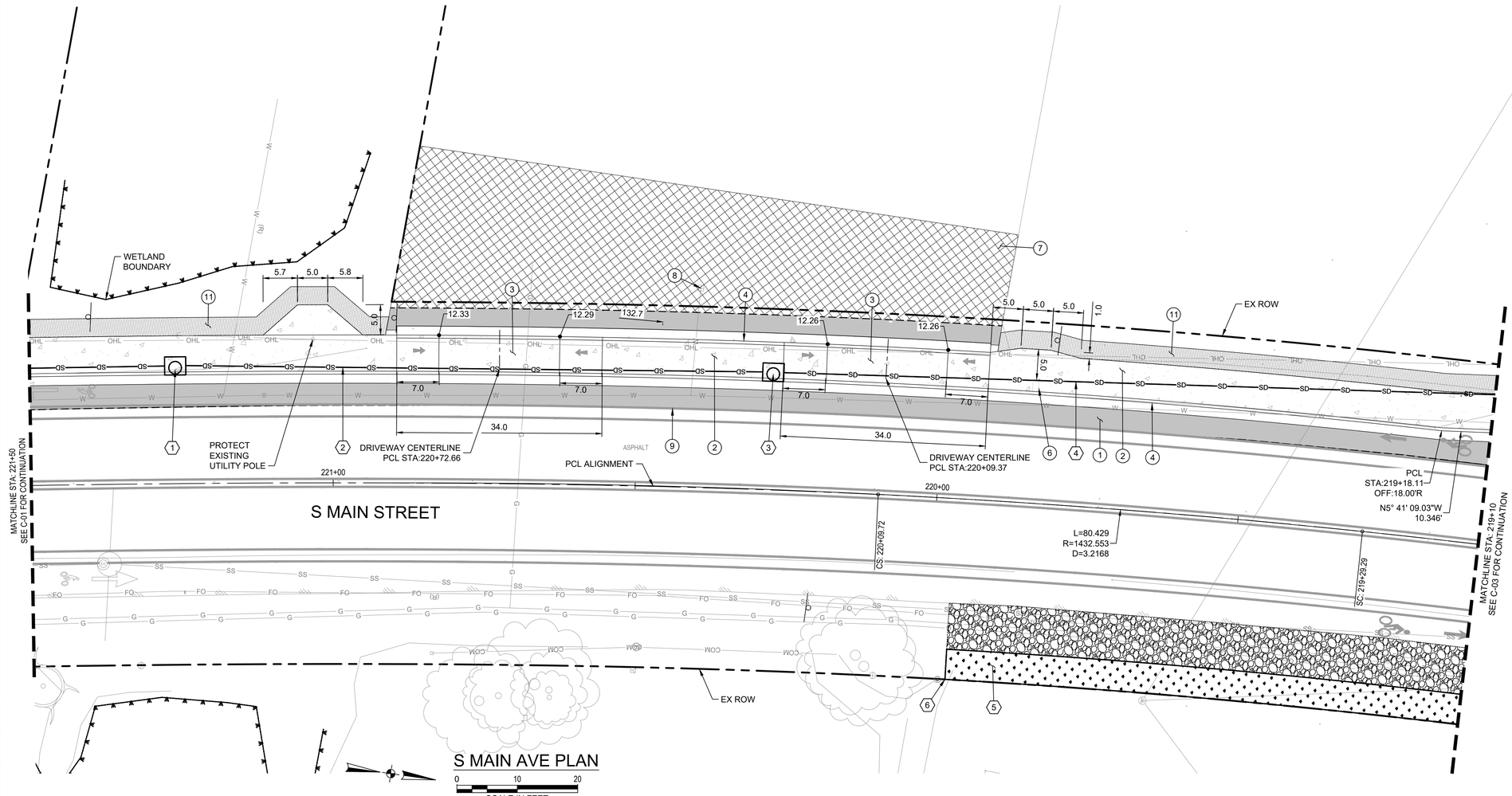
1. SEE SHEET G-01 AND G-02 FOR NOTES AND LEGEND.
2. ALL BASIS OF DESIGN IS BASED OFF OF SURVEYED RIGHT-OF-WAY CENTERLINE ALIGNMENT UNLESS OTHERWISE NOTED.
3. SEE SHEET SS-01 FOR SIGNING AND STRIPING PLAN
4. SEE SHEET C-07 FOR STORM DETAILS.

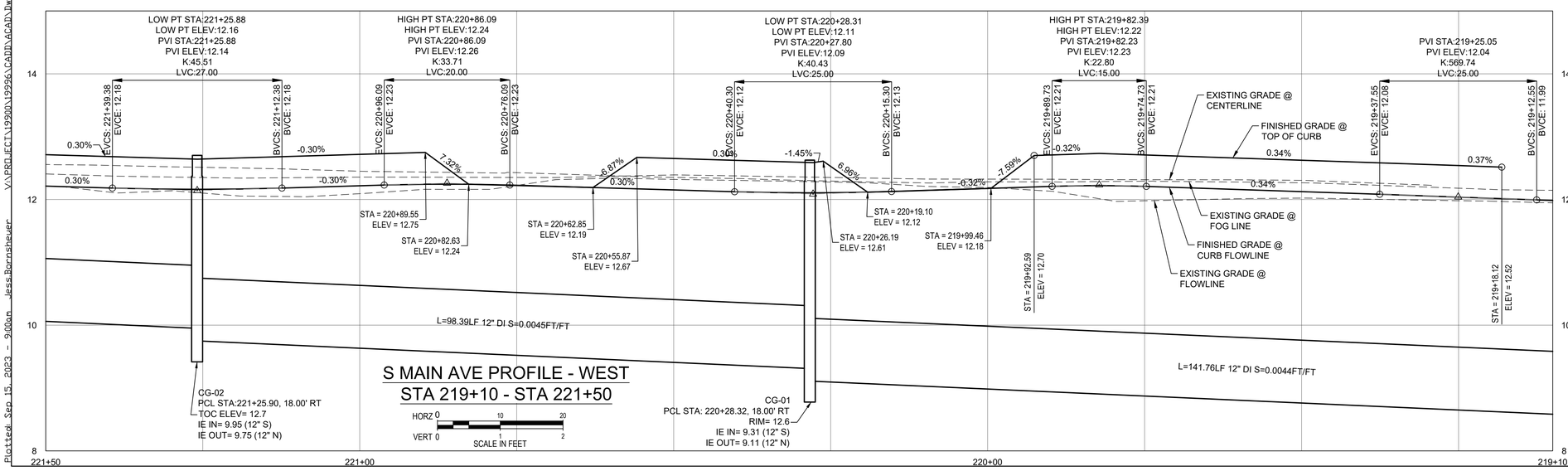
STREET CONSTRUCTION KEY NOTES

(1) CONSTRUCT ASPHALT ROADWAY, SEE AC PAVEMENT SECTION ON SHEET C-06.
(2) CONSTRUCT CONCRETE SIDEWALK PER ODOT STD DWG RD720 ON SHEET STD-02.
(3) CONSTRUCT FULLY LOWERED DRIVEWAY (OPTION G) PER ODOT STD RD735 ON SHEET STD-03. SEE PLAN VIEW FOR DRIVEWAY CENTERLINE LOCATION.
(4) CONSTRUCT 6" CURB AND 18" GUTTER PER ODOT STD DWG RD700 ON SHEET STD-01.
(6) REMOVE AND REINSTALL MAILBOXES ON MULTIPLE MAILBOX SUPPORT. SEE DETAIL RD100 ON SHEET STD-02 AND SPECIAL PROVISIONS.
(7) SEALCOAT EXISTING PARKING AREA, 2100 SF.
(8) MINOR ADJUSTMENT OF METER BOX.
(9) SAWCUT EXISTING PAVEMENT AT EXISTING FOG LINE STRIPING.
(10) CONSTRUCT AC PAVEMENT, SEE AC PAVEMENT SECTION ON SHEET C-06.
(11) RESTORE AREAS TO MATCH EXISTING CONDITIONS - INSTALL PERMANENT SEEDING IN NON-HARDSCAPE AREAS DISTURBED BY CONSTRUCTION.

STORM CONSTRUCTION KEY NOTES

(1) CONSTRUCT CONCRETE INLET, TYPE CG-48
INLET #:CG-02
PCL STA:221+25.90, 18.00' RT
RIM= 12.7
IE IN= 9.95 (12" S)
IE OUT= 9.75 (12" N)
SEE CLEAN WATER SERVICES STANDARD DRAWING NO 340 ON SHEET C-07
(2) INSTALL STORM SEWER PIPE
L=99LF 12" DI S=0.0045FT/FT
(3) CONSTRUCT CONCRETE INLET, TYPE CG-48
INLET #:CG-01
PCL STA:220+28.32, 18.00' RT
TOC ELEV= 12.6
IE IN= 9.31 (12" S)
IE OUT= 9.11 (12" N)
SEE CLEAN WATER SERVICES STANDARD DRAWING NO. 340 ON SHEET C-07
(4) INSTALL STORM SEWER PIPE
L=142LF 12" DI S=0.0044FT/FT
(5) CONSTRUCT WATER QUALITY FILTER STRIP
D01525 STA: 218+98.93 TO STA: 219+96.94
SEE DETAIL 1 ON SHEET C-07
(6) INSTALL TYPE S2 FACILITY MARKER
SEE ODOT RD 399 ON SHEET STD-01





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EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STREET & STORM PLAN & PROFILE S MAIN AVE STA 221+50 TO 219+10

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG DRAWN BY | ZMG CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

C-02

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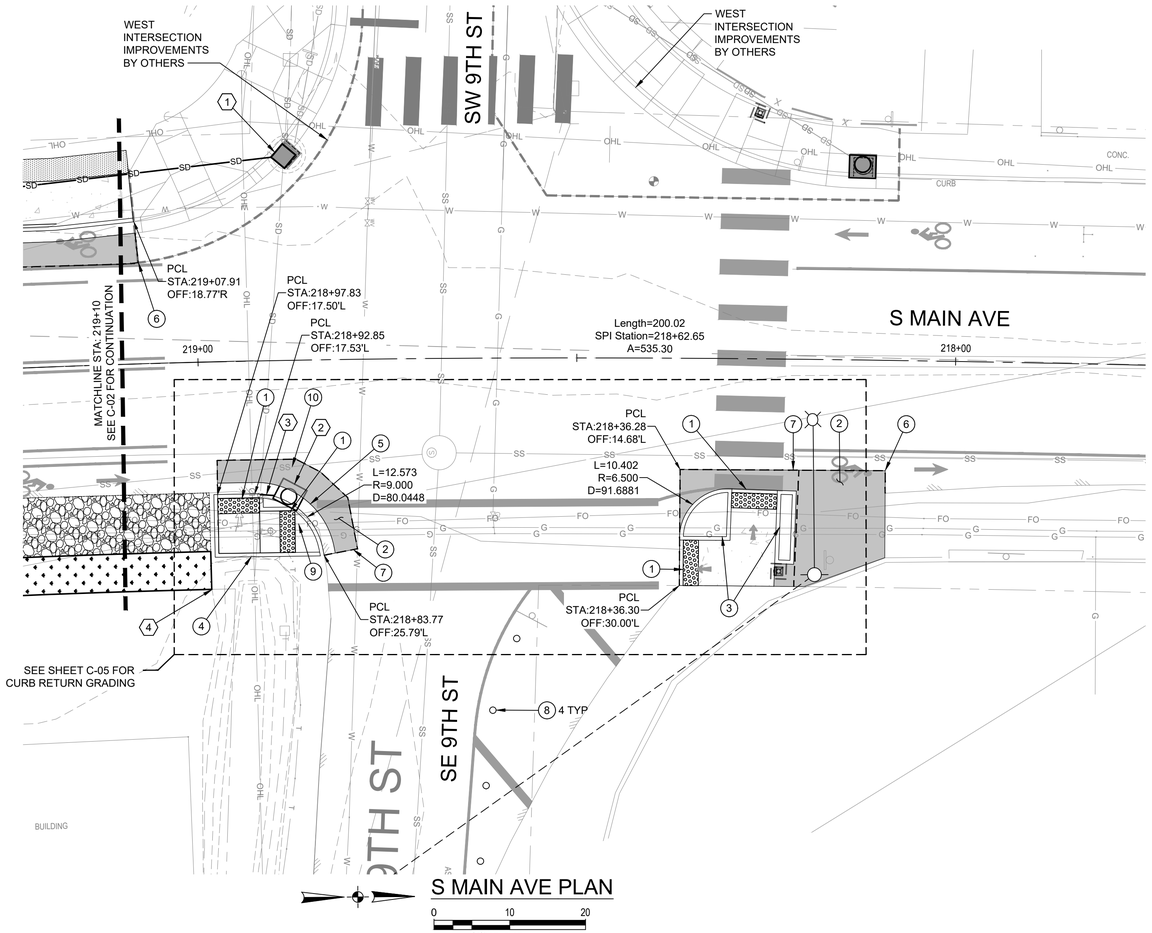

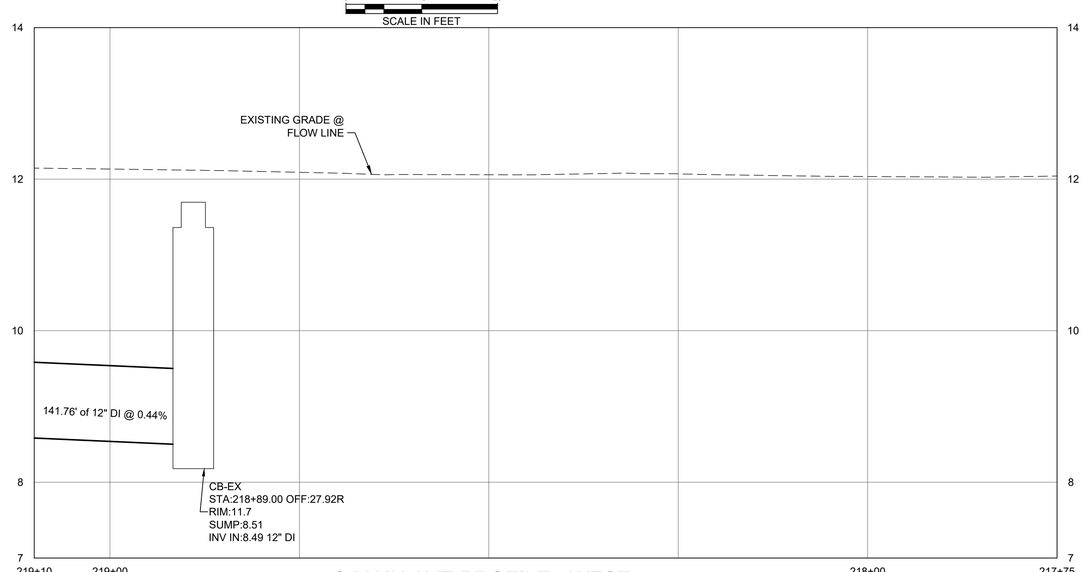

FINAL PLANS

GENERAL NOTES

1. SEE SHEETS G-01 & G-02 FOR NOTES AND LEGEND.
2. ALL BASIS OF DESIGN IS BASED OFF OF SURVEYED RIGHT-OF-WAY CENTERLINE ALIGNMENT UNLESS OTHERWISE NOTED.
3. SEE SHEET C-05 FOR CURB RETURN AND RAMP GRADING.
4. SEE SHEET SS-01 FOR SIGNING AND STRIPING PLAN.
5. SEE SHEET C-07 FOR STORM DETAILS.

STREET CONSTRUCTION KEY NOTES

1. CONSTRUCT DETECTABLE WARNING SURFACE PER ODOT STD DWG RD902.
2. CONSTRUCT ASPHALT ROADWAY, SEE AC PAVEMENT SECTION ON SHEET C-06.
3. CONSTRUCT RAISED CONCRETE ISLAND (TYPE C) PER ODOT STD DWG RD705.
4. CONSTRUCT STANDARD CURB, PER ODOT STD DWG RD700 ON SHEET STD-01.
5. CONSTRUCT STANDARD CURB AND GUTTER WITH TRANSITION AT INLET, PER ODOT STD DWGS RD363 AND RD700.
6. END ASPHALT CONSTRUCTION. PCL STA. 218+09.08, 14.56' LT
7. SAWCUT EXISTING PAVEMENT.
8. CONSTRUCT TRAFFIC DELINEATOR (FLEXIBLE PLASTIC POST TYPE 3) PER ODOT STD DWG TM570.
9. EXISTING LUMEN FIBER OPTIC LINE. PROTECT UTILITY IN PLACE WITH CONSTRUCTION OF STORM INLET. POTHOLE LOCATION/ELEVATION AT LEAST SEVEN CALENDAR DAYS PRIOR TO CONSTRUCTION OF STORM INLET.
10. EXISTING 12" CITY OF WARRENTON SEWER. PROTECT UTILITY IN PLACE WITH CONSTRUCTION OF STORM INLET.

STORM CONSTRUCTION KEY NOTES

1. EX STM MH
   PCL STA. 218+89.04, 27.76' RT
   EX IE OUT = 8.40 (24" E)
   EX IE IN 8.40 (24" W)
   IE IN 9.40 (12" S)
   CONNECT TO EX MH WITH FERNCO 1004-2424 COUPLER OR APPROVED EQUAL.
2. CONSTRUCT INLET TYPE G-2
   PCL STA. 218+88.34, 17.97' LT
   RIM=11.4
   IE OUT = 9.08 (12" S)
   SEE ODOT STD DWG RD364, SHEET C-07.
3. INSTALL 12" DI STORM SEWER PIPE
   L=3.00' 12" DI S=0.050 FT/FT
   CONNECT TO EXISTING 24" CULVERT WITH INSERTA-TEE AT
   IE OUT = 8.93
4. INSTALL TYPE S2 FACILITY MARKER
   SEE ODOT RD 399 ON SHEET STD-01

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WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STREET & STORM PLAN & PROFILE S MAIN AVE STA 219+10 TO 217+75

TITLE

#	DATE	DESCRIPTION

REVISIONS

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DATUM

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FINAL PLANS
STATUS

SEPTEMBER 2023
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PROJECT NUMBER

C-03

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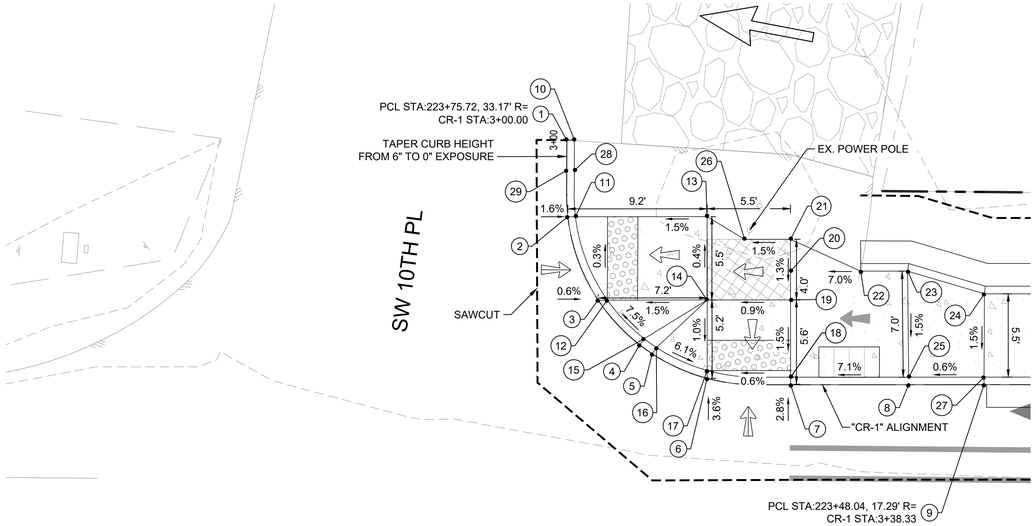

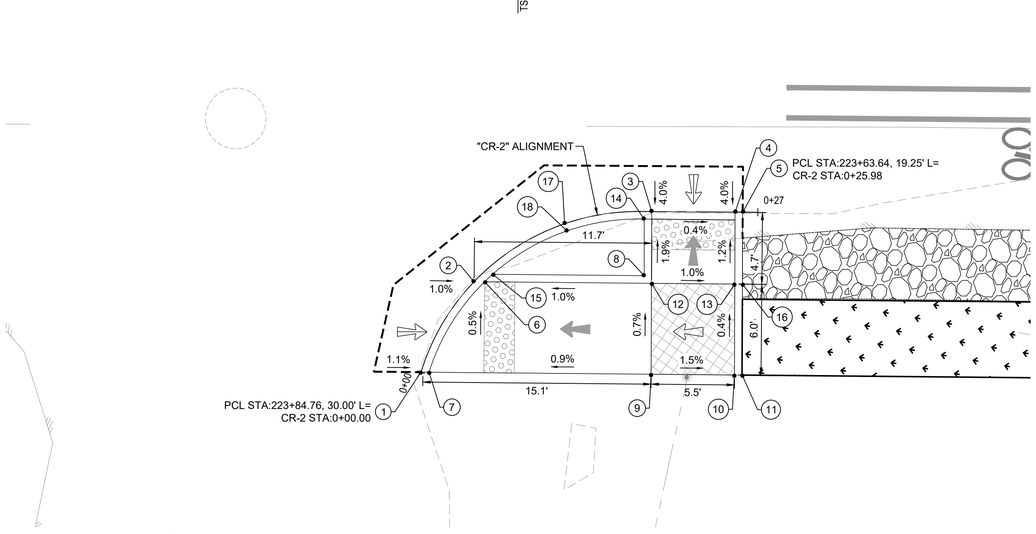

SW 10TH PL & S MAIN AVE CURB INTERSECTION

CR-1 GUTTER KEYPOINT ELEVATIONS		
LOCATION	CR STATION	GUTTER ELEV
2	CR-1 STA: 3+05.06	12.74
3	CR-1 STA: 3+10.97	12.78
4	CR-1 STA: 3+15.02	12.81
5	CR-1 STA: 3+16.04	12.82
6	CR-1 STA: 3+20.02	12.84
7	CR-1 STA: 3+25.56	12.86
8	CR-1 STA: 3+33.36	12.92
9	CR-1 STA: 3+38.33	12.95
29	CR-1 STA: 3+02.00	12.72

CR-1 GUTTER KEYPOINT ELEVATIONS		
LOCATION	CR STATION	GUTTER ELEV
1	CR-1 STA: 3+00.00	(12.70)

CR-1 RAMP KEYPOINT ELEVATIONS			
LOCATION	CR STATION	OFFSET	ELEVATION
10	CR-1 STA: 3+00.00	0.51' LT	12.70
11	CR-1 STA: 3+05.12	0.50' LT	12.74
12	CR-1 STA: 3+11.31	0.50' LT	12.79
13	CR-1 STA: 3+08.77	8.98' LT	12.87
14	CR-1 STA: 3+17.82	4.88' LT	12.89
15	CR-1 STA: 3+15.00	0.49' LT	13.06
16	CR-1 STA: 3+16.04	0.49' LT	13.07
17	CR-1 STA: 3+19.89	0.49' LT	12.84
18	CR-1 STA: 3+25.56	0.50' LT	12.86
19	CR-1 STA: 3+25.56	5.60' LT	12.94
20	CR-1 STA: 3+25.56	7.50' LT	12.97
21	CR-1 STA: 3+25.56	9.60' LT	12.96
22	CR-1 STA: 3+30.19	7.50' LT	13.29
23	CR-1 STA: 3+33.29	7.50' LT	13.53
24	CR-1 STA: 3+38.35	6.00' LT	13.53
25	CR-1 STA: 3+33.36	0.50' LT	13.42
26	CR-1 STA: 3+20.12	9.50' LT	12.91
27	CR-1 STA: 3+38.33	0.50' LT	13.45
28	CR-1 STA: 3+02.00	0.50' LT	13.22

CR-2 GUTTER KEYPOINT ELEVATIONS		
LOCATION	CR STATION	GUTTER ELEV
2	CR-2 STA: 0+06.98	13.03
3	CR-2 STA: 0+19.98	13.05
17	CR-2 STA: 0+14.15	13.08

CR-2 GUTTER KEYPOINT ELEVATIONS		
LOCATION	CR STATION	GUTTER ELEV
1	CR-2 STA: 0+00.00	(13.00)
4	CR-2 STA: 0+25.48	(13.03)

CR-2 RAMP KEYPOINT ELEVATIONS			
LOCATION	CR STATION	OFFSET	ELEVATION
5	CR-2 STA: 0+25.98	0.00' T	13.53
6	CR-2 STA: 0+07.48	0.50' RT	13.03
7	CR-2 STA: 0+00.16	0.50' RT	13.01
8	CR-2 STA: 0+19.51	4.23' RT	13.64
9	CR-2 STA: 0+20.01	10.74' RT	13.19
10	CR-2 STA: 0+25.51	10.75' RT	13.11
11	CR-2 STA: 0+26.01	10.75' RT	13.61
12	CR-2 STA: 0+20.00	4.74' RT	13.14
13	CR-2 STA: 0+25.50	4.75' RT	13.09
14	CR-2 STA: 0+19.48	0.50' RT	13.55
15	CR-2 STA: 0+08.23	0.50' RT	13.53
16	CR-2 STA: 0+26.00	4.75' RT	13.58
18	CR-2 STA: 0+14.15	0.50' RT	13.58

LEGEND

- SIDEWALK
- TURNING SPACE MIN. LEVEL AREA 4'X4' 4'X5' WHEN CONSTRAINED (WITH LONGER DIMENSION IN DIRECTION OF PEDESTRIAN CROSSING). FOR THE PURPOSED OF THIS APPLICATION, A MAX. 2.0% FINISHED SURFACE SLOPE (FOR DRAINAGE) IS CONSIDERED LEVEL.
- TRUNCATED DOME DETECTABLE WARNING SURFACE
- SLOPE 1.5% MAX. (MAX. 2.0% FINISHED SURFACE SLOPE) (NORMAL SIDEWALK CROSS SLOPE)
- SLOPE 7.5% MAX. (MAX. 8.3% FINISHED SURFACE SLOPE) (RAMP LENGTH 15' MAX., MEASURED ALONG FINISHED SURFACE SLOPE)
- COUNTER SLOPE (4% MAX)
- STATION, OFFSET, ELEVATION POINT
- (XX.XX) MATCH EXISTING ELEVATION

CONSTRUCTION NOTES:

1. SLOPES HOLD OVER ELEVATIONS.
2. MAX. CROSS SLOPE CHANGE ON RAMP 0.5% PER FOOT.
3. SEE STD. DWGS ON SHEET STD-01 AND STD-03 FOR DETAILS NOT SHOWN.

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WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

CURB RAMPS

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
ZMG — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
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C-04

If this drawing is not 22" x 34", it has been reduced/enlarged. Scale accordingly.

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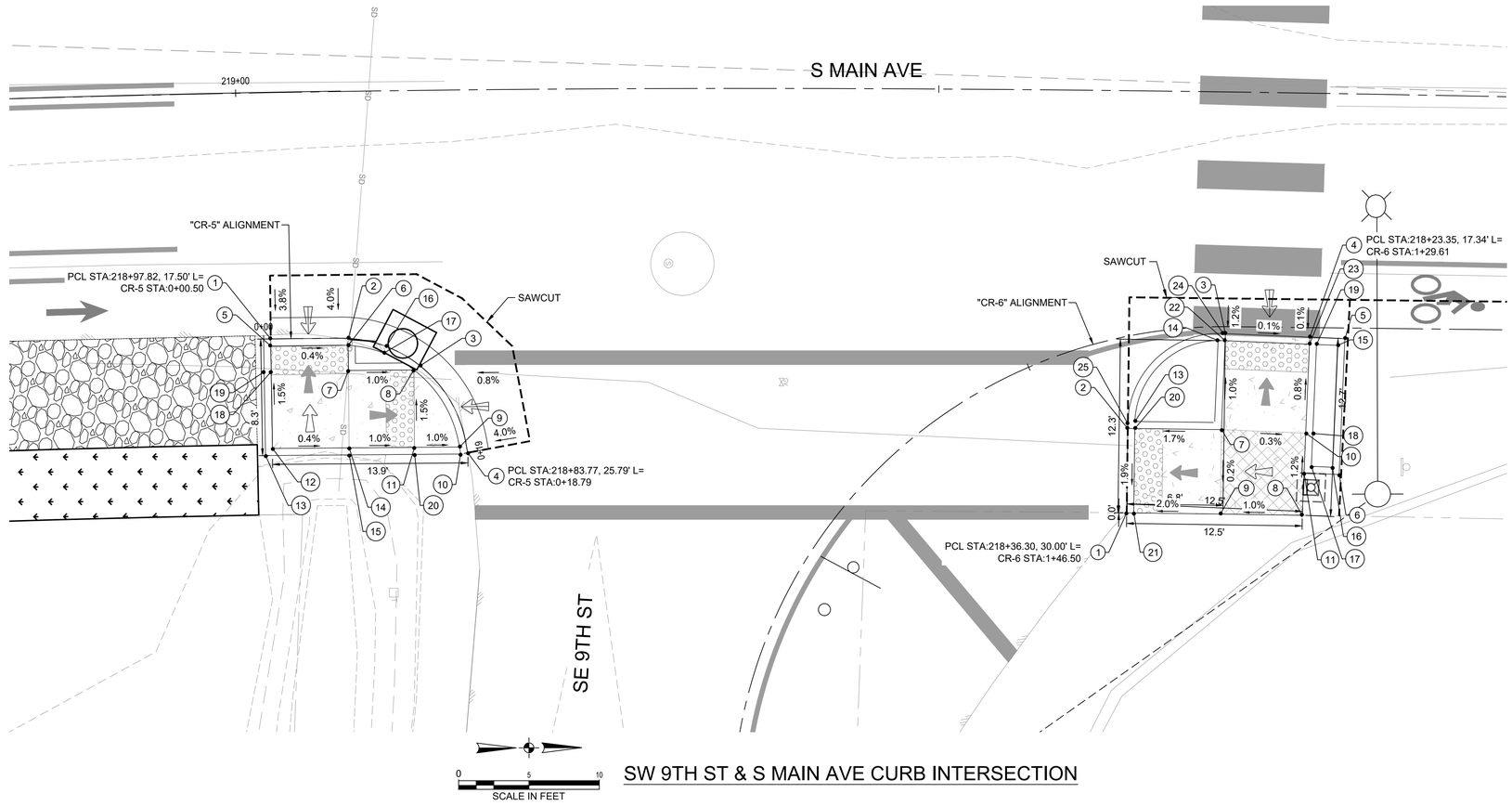

SW 9TH ST & S MAIN AVE CURB INTERSECTION

CR-5 GUTTER KEYPOINT ELEVATIONS		
LOCATION	CR STATION	GUTTER ELEV
2	CR-5 STA: 0+06.02	11.51
3	CR-5 STA: 0+11.57	11.51
16	CR-5 STA: 0+08.79	11.48

CR-5 GUTTER KEYPOINT ELEVATIONS		
LOCATION	CR STATION	GUTTER ELEV
1	CR-5 STA: 0+00.50	(11.53)
4	CR-5 STA: 0+18.79	(11.56)

CR-5 RAMP KEYPOINT ELEVATIONS			
LOCATION	CR STATION	OFFSET	ELEVATION
5	CR-5 STA: 0+00.50	0.50' RT	11.53
6	CR-5 STA: 0+06.04	0.50' RT	11.51
7	CR-5 STA: 0+06.22	2.27' RT	11.56
8	CR-5 STA: 0+11.40	0.50' RT	11.51
9	CR-5 STA: 0+18.28	0.50' RT	11.56
11	CR-5 STA: 0+17.54	3.64' RT	11.59
12	CR-5 STA: 0+00.55	7.78' RT	11.66
13	CR-5 STA: 0+00.05	8.28' RT	12.16
14	CR-5 STA: 0+09.46	7.66' RT	11.64
15	CR-5 STA: 0+11.61	8.09' RT	12.14
17	CR-5 STA: 0+08.79	0.50' RT	11.98
18	CR-5 STA: 0+00.52	2.33' RT	11.58
19	CR-5 STA: 0+00.02	2.33' RT	12.08
20	CR-5 STA: 0+18.22	3.73' RT	12.09

CR-5 RAMP KEYPOINT ELEVATIONS			
LOCATION	CR STATION	OFFSET	ELEVATION
10	CR-5 STA: 0+18.79	0.50' RT	(11.56)

CR-6 RAMP KEYPOINT ELEVATIONS			
LOCATION	CR STATION	OFFSET	ELEVATION
7	CR-6 STA: 1+35.96	7.32' LT	11.83
8	CR-6 STA: 1+30.00	13.34' LT	11.88
9	CR-6 STA: 1+36.15	13.32' LT	11.81
10	CR-6 STA: 1+29.82	7.51' LT	11.81
11	CR-6 STA: 1+29.91	10.35' LT	11.84
12	CR-6 STA: 1+36.55	6.81' LT	12.33
13	CR-6 STA: 1+43.44	6.04' LT	12.22
14	CR-6 STA: 1+36.15	0.98' LT	12.26
15	CR-6 STA: 1+27.63	1.24' LT	12.23
16	CR-6 STA: 1+27.90	9.91' LT	12.30
17	CR-6 STA: 1+29.39	9.87' LT	12.33
18	CR-6 STA: 1+29.32	7.52' LT	12.31
19	CR-6 STA: 1+29.13	1.20' LT	12.25
20	CR-6 STA: 1+43.59	6.52' LT	11.72
21	CR-6 STA: 1+45.77	12.31' LT	11.61
22	CR-6 STA: 1+35.64	1.00' LT	11.76
23	CR-6 STA: 1+29.63	1.18' LT	11.76

CR-6 RAMP KEYPOINT ELEVATIONS			
LOCATION	CR STATION	OFFSET	ELEVATION
1	CR-6 STA: 1+46.50	12.16' LT	(11.60)
2	CR-6 STA: 1+44.18	6.40' LT	(11.71)
3	CR-6 STA: 1+35.62	0.50' LT	(11.76)
4	CR-6 STA: 1+29.61	0.68' LT	(11.75)
5	CR-6 STA: 1+27.12	0.76' LT	(11.73)
6	CR-6 STA: 1+27.41	10.42' LT	(11.80)
24	CR-6 STA: 1+35.79	0.49' LT	(11.76)
25	CR-6 STA: 1+44.08	6.08' LT	(11.71)

FINAL PLANS

LEGEND

- SIDEWALK
- TURNING SPACE MIN. LEVEL AREA 4'X4' 4'X5' WHEN CONSTRAINED (WITH LONGER DIMENSION IN DIRECTION OF PEDESTRIAN CROSSING). FOR THE PURPOSED OF THIS APPLICATION, A MAX. 2.0% FINISHED SURFACE SLOPE (FOR DRAINAGE) IS CONSIDERED LEVEL.
- TRUNCATED DOME DETECTABLE WARNING SURFACE
- SLOPE 1.5% MAX. (MAX. 2.0% FINISHED SURFACE SLOPE) (NORMAL SIDEWALK CROSS SLOPE)
- SLOPE 7.5% MAX. (MAX. 8.3% FINISHED SURFACE SLOPE) (RAMP LENGTH 15' MAX., MEASURED ALONG FINISHED SURFACE SLOPE)
- COUNTER SLOPE (4% MAX)
- STATION, OFFSET, ELEVATION POINT
- (XX.XX) MATCH EXISTING ELEVATION

CONSTRUCTION NOTES:

1. SLOPES HOLD OVER ELEVATIONS.
2. MAX. CROSS SLOPE CHANGE ON RAMP 0.5% PER FOOT.
3. SEE STD. DWGS ON SHEET STD-01 FOR DETAILS NOT SHOWN.

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REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2009
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

CURB RAMPS

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG
DRAWN BY

ZMG
CHECKED BY

FINAL PLANS
STATUS

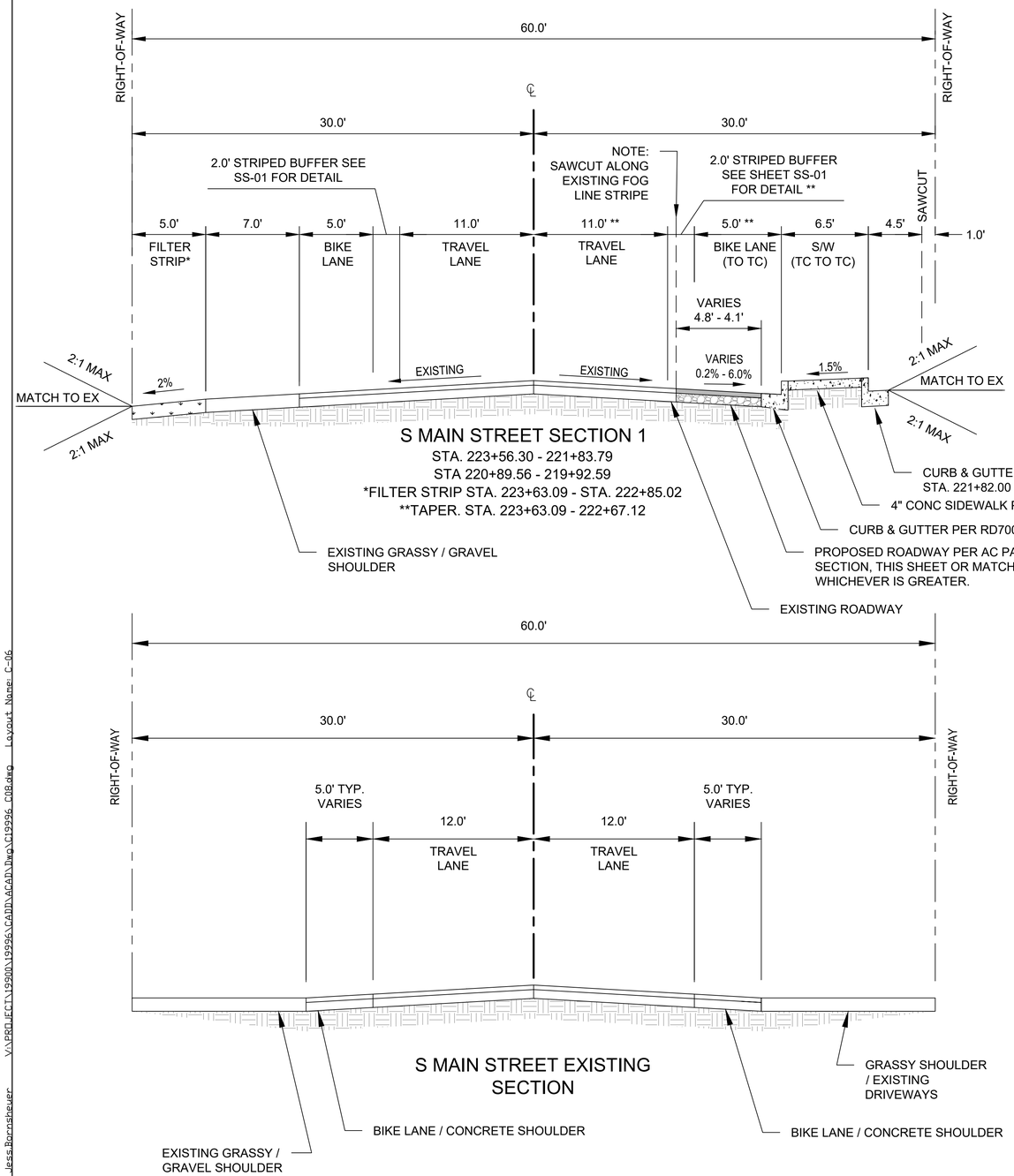
SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

C-05

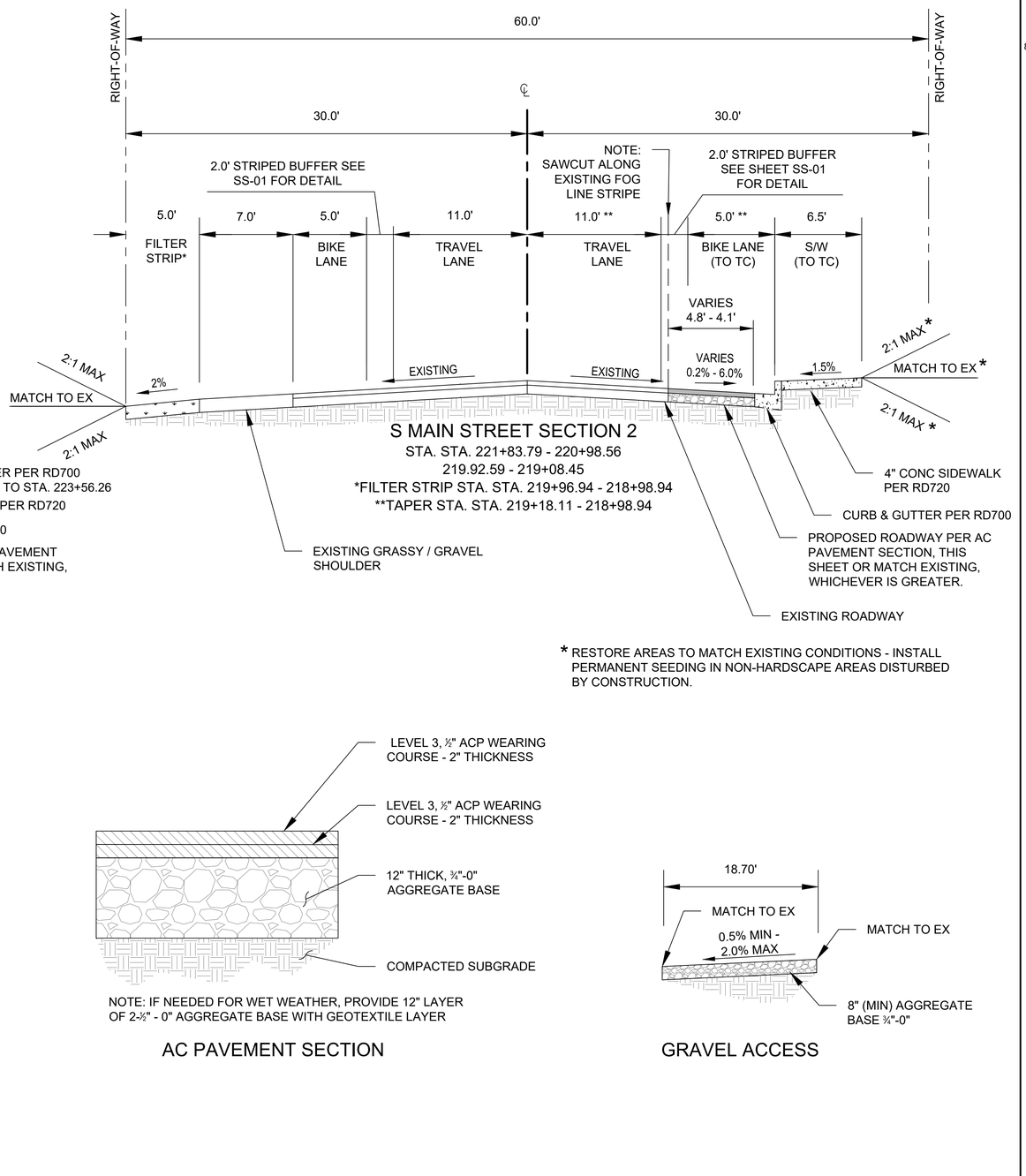
If this drawing is not 22" x 34", it has been reduced/enlarged. Scale accordingly.

Plotted: Sep 15, 2023 - 9:02am Jess.Bornsheuer V:\PROJECT\19900\19996\CADD\ACAD\Dwg\C19996_C04.dwg Layout: None C-05



S MAIN STREET SECTION 1

STA. 223+56.30 - 221+83.79
STA 220+89.56 - 219+92.59
*FILTER STRIP STA. 223+63.09 - STA. 222+85.02
**TAPER. STA. 223+63.09 - 222+67.12



S MAIN STREET SECTION 2

STA. STA. 221+83.79 - 220+98.56
219.92.59 - 219+08.45
*FILTER STRIP STA. STA. 219+96.94 - 218+98.94
**TAPER STA. STA. 219+18.11 - 218+98.94

* RESTORE AREAS TO MATCH EXISTING CONDITIONS - INSTALL PERMANENT SEEDING IN NON-HARDSCAPE AREAS DISTURBED BY CONSTRUCTION.

S MAIN STREET EXISTING SECTION

NOTE: IF NEEDED FOR WET WEATHER, PROVIDE 12" LAYER OF 2-½" - 0" AGGREGATE BASE WITH GEOTEXTILE LAYER

AC PAVEMENT SECTION

GRAVEL ACCESS

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JUNE 11, 2009
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

ROADWAY DETAILS

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG / ZMG
DRAWN BY / CHECKED BY

FINAL PLANS
STATUS

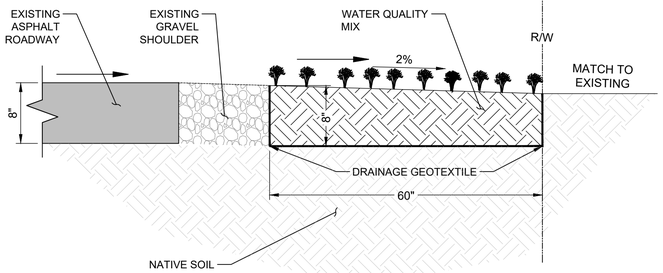
SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

C-06

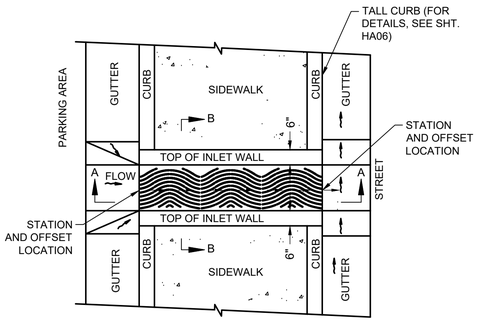
If this drawing is not 22" x 34", it has been reduced/enlarged. Scale accordingly.

Plotted: Sep 15, 2023 - 9:03am Jess.Borgsheuer V:\PROJECT\19900\19996\CADD\ACAD\Dwg\C19996_C08.dwg Layout Name: C-06

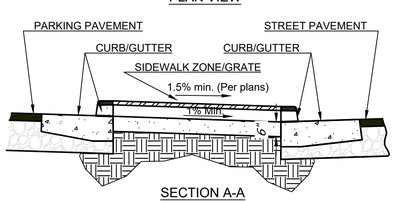


1 / C-05 **WATER QUALITY FILTER STRIP**

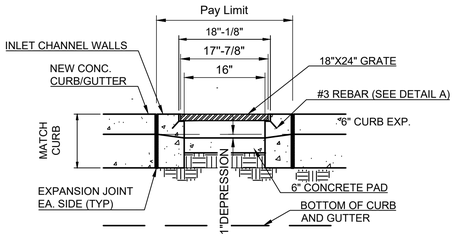
SCALE: NTS



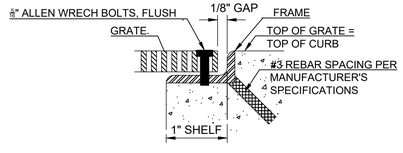
PLAN VIEW



SECTION A-A



SECTION B-B

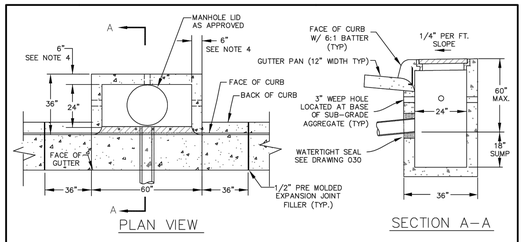


DETAIL A

NOTE:
MAXIMUM GRATE HOLE WIDTH (OPEN) 1/4 INCH.
GRATE SIZE 18"X24". CAST IRON URBAN ACCESSORIES
TRENCH GRATE AND FRAME. TITLE WAVE MODEL OR EQUAL.

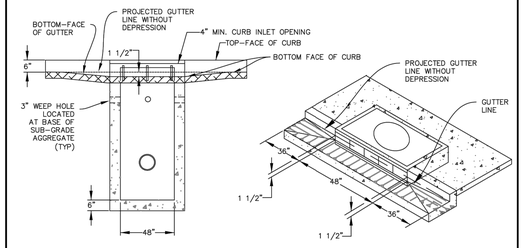
2 / C-05 **CONCRETE CHANNEL INLET**

SCALE: NTS



PLAN VIEW

SECTION A–A



FRONT VIEW

PERSPECTIVE VIEW SHOWING DEPRESSED GUTTER AT CURB INLET

NOTES:

1. ALL POURED IN PLACE CONCRETE SHALL HAVE A 28 DAY STRENGTH OF 3000 P.S.I. AND A SLUMP OF 2" TO 4".
2. INSTALL STRUCTURE ON MINIMUM OF 8" OF ¾" TO 0" COMPACTED BASE MATERIAL.
3. NON-SUMP INLET CATCH BASINS SHALL BE CHANNELED (E.G. FLOW THROUGH CBs).
4. WALL THICKNESS SHALL BE 6" MIN. TO 10" MAX. FOR POURED IN PLACE STRUCTURES.
5. PRECAST STRUCTURE TO BE APPROVED BY DISTRICT OR CITY, REINFORCEMENT FOR PRECAST CATCH BASIN SHALL BE REBAR MEETING ASTM A-615, GRADE 60 OR WELDED WIRE MEETING ASTM A-497.

INLET CATCH BASIN (CG-48)

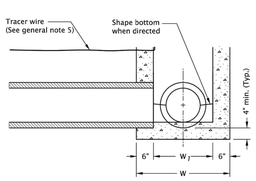
DRAWING NO. 340

REVISED 10-31-19

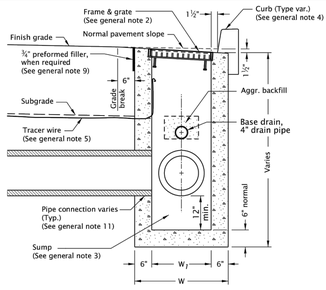
CleanWater Services

20-JUL-2020

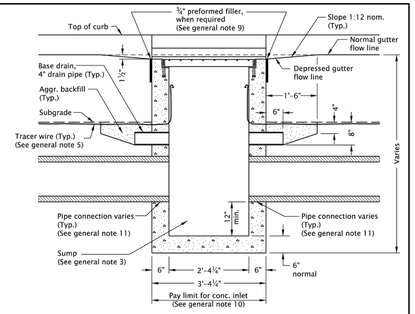
RD364.dgn



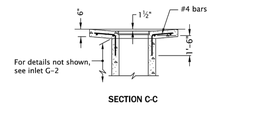
DETAIL A WITHOUT SUMP



SECTION B - B



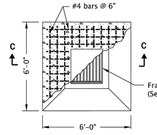
SECTION A - A



SECTION C-C

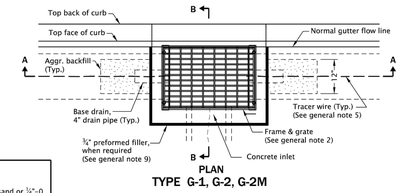
NOTE:

All reinforcement to be placed 2" clear of nearest face of concrete unless shown or noted otherwise



PLAN

TYPE G-2MA



PLAN

TYPE G-1, G-2, G-2M

TABLE A		
INLET TYPE	W	W_1
G-1	2'-8⅝"	1'-8⅞"
G-2, G-2M, G-2MA	3'-3⅛"	2'-3⅛"

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Where precast inlets are used as an alternate to cast-in-place inlets, a 4" compacted leveling bed of sand or ¼"-0 crushed aggregate shall be provided. All precast inlets shall conform to requirements of ASTM C913.
2. Graphics show G-1 inlet with Type 2 grate. See Table A for inlet dimensions.
   Type 1 grate allowed only in locations not subject to bicycle or pedestrian use.
   For frame and grate details, see Std. Dwg. RD365.
3. Provide sump only where shown on plans, and allowed by jurisdiction. See Detail A for inlet without sump.
4. For curb details, see Std. Dwgs. RD700 & RD701.
5. See Std. Dwg. RD336 for tracer wire details, or approved alternate.
6. Max. pipe diameter varies with pipe material.
7. Location, elevation, diameter, slope, and number of pipe(s) varies, see project plans.
8. All concrete shall be commercial grade concrete.
9. ¾" preformed filler (in concrete pavement or gutter only) to extend through thickness of concrete.
10. See Std. Dwg. RD383 for gutter transition section, when curb and gutter are required.
11. See Std. Dwg. RD339 for pipe to structure connections.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

CONCRETE INLETS TYPE G-1, G-2, G-2M, & G-2MA

2021

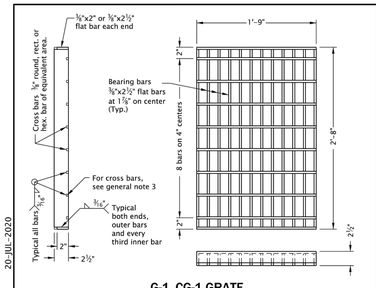
DATE	REVISION DESCRIPTION

CALC BOOK NO. — N/A — SDR DATE 21-JUL-2015 — **RD364**

Effective Date: June 1, 2023 - November 30, 2023

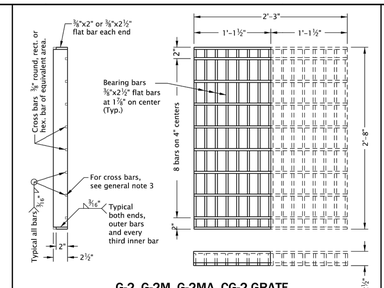
20-JUL-2020

RD365.dgn



G-1, CG-1 GRATE (TYPE 2)

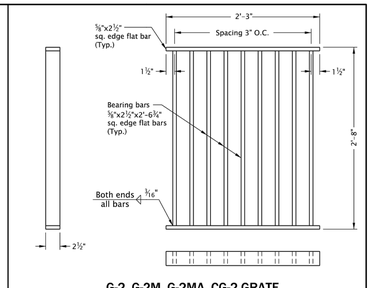
(Bicycle-safe)



G-2, G-2M, G-2MA, CG-2 GRATE (TYPE 2)

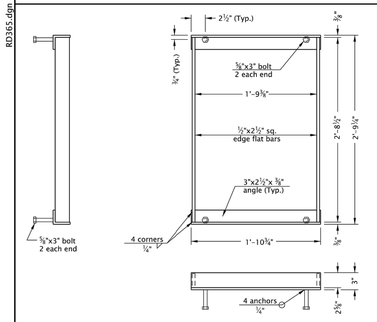
(Bicycle-safe)

(2 grates required per inlet, as shown)

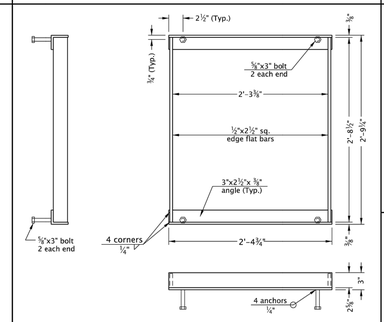


G-2, G-2M, G-2MA, CG-2 GRATE (TYPE 1)

(See general note 2)



G-1, CG-1 FRAME



G-2, G-2M, G-2MA, CG-2 FRAME

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. For inlet details, see appropriate inlet standard drawing(s).
2. Type 1 grate allowed only in locations not subject to bicycle or pedestrian use.
3. ⅜" cross bars shall be flush with the top of grate surface and may be fillet welded, resistance welded or electroforged to bearing bars.
4. Hot dip galvanize after fabrication.
5. Cast iron grate and frame are acceptable alternates. See ODOT's QPL.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

FRAMES & GRATES FOR CONCRETE INLETS

2021

DATE	REVISION DESCRIPTION

CALC BOOK NO. — N/A — SDR DATE 14-JUL-2014 — **RD365**

Effective Date: June 1, 2023 - November 30, 2023

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JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STORMWATER DETAILS I

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — ZMG
DRAWN BY — CHECKED BY

FINAL PLANS
STATUS

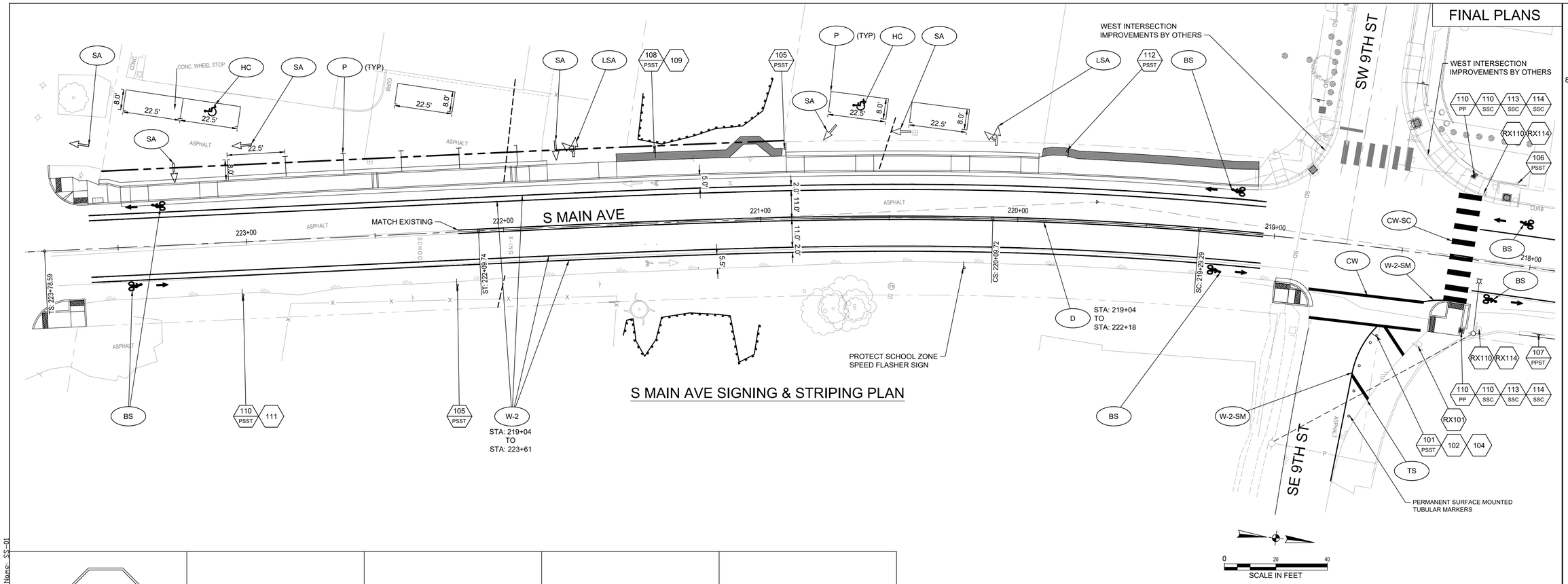
SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

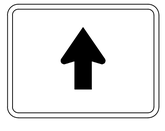
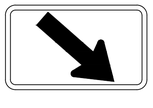
C-07

Plotted: Sep 15, 2023 – 9:02am Jess.Bornsheuer V:\PROJECT\19900\19996\CADD\CAD\Dwg\C19996_C08.dwg Layout Name: C-07

FINAL PLANS



S MAIN AVE SIGNING & STRIPING PLAN

 101 R1-1 TYPE "R" 30" X 30" 1 REQUIRED	 102 D3-1 1 REUSED	103 NOT USED	 104 D3-1 1 REUSED	 105 R7-1 18" X 12" 2 REQUIRED
 106 R7-1 L 18" X 12" 1 REQUIRED	 107 R7-1 R 18" X 12" 1 REQUIRED	 108 EM-1A 24" X 24" 1 REQUIRED	 109 M6-3 21" X 15" 1 REQUIRED	 110 S1-1 36" X 36" 1 REQUIRED 4 ON RRFB
 111 W16-09P 24" X 12" 1 REQUIRED	 112 S5-2 24" X 30" 1 REQUIRED	 113 W16-7P (R) 12" X 24" 2 ON RRFB	 114 W16-7P (L) 12" X 24" 2 ON RRFB	

STRIPING LEGEND (SEE SHEET SS-04 FOR DETAILS)

W-2-SM	INST. 8" WHITE LINE, SURFACE INST. MARKING
CW	INST. TWO 1' WHITE LINE CROSSWALK
CW-SC	INST. 2' WHITE LINE, STAGGERED CONTINENTAL CROSSWALK
BS	INST. BIKE LANE MARKING (WHITE)
W-2	INST. 8" WHITE LINE
D	INST. DOUBLE NO-PASS TWO 4" YELLOW LINES
LSA	INST. LEFT TURN/STRAIGHT ARROW (WHITE)
SA	INST. STRAIGHT ARROW (WHITE)
TM	INST. 4" TRANSVERSE MARKINGS 2' O.C (WHITE)
HC	INST. DISABLED PARKING DETAIL (WHITE)
TS	TRANSVERSE SHOULDER BARS (1' WHITE BARS AT 20' SPACING)
P	INST. ON-STREET PARKING DETAIL (4" WHITE LINES). SURFACE INST. MARKING

GENERAL NOTES:

1. ALL ROADWAY PAVEMENT MARKINGS SHALL BE THERMOPLASTIC MATERIAL.
2. ALL PARKING LOT PAVEMENT MARKINGS SHALL BE PAINT.
3. THE LOCATIONS OF SIGN INSTALLATIONS SHOWN ARE APPROX. WITH EXACT LOCATIONS TO BE DETERMINED IN THE FIELD.
4. STREET NAME SIGNS TO BE MOUNTED ABOVE STOP SIGN.
5. SIGN SHEETING TYPE AND SUBSTRATE ARE TO BE STANDARD SHEETING AND ALUMINUM SUBSTRATE.
6. BACKGROUND AND COLOR SHALL BE ASTM TYPE III OR IV EXCEPT SIGNS 110, 111, 113 AND 114 WHICH SHALL BE YG COLOR WITH ASTM TYPE IX OR XI BACKGROUND.
7. POST LENGTH SHALL BE MINIMUM 13' AND SHALL BE 2 1/2" X 2 1/2", 10 GAUGE PERFORATED STEEL SQUARE TUBE. HEIGHT SHALL BE FIELD VERIFIED.
8. REMOVAL OF STOP SIGN DURING CONSTRUCTION MUST BE ACCOMPANIED BY A TEMPORARY STOP SIGN ON BARRICADE OR OTHER TEMPORARY SIGN SUPPORT.
9. ALL SIGNS MOUNTED ON RRFB POST ARE INCIDENTAL TO RRFB FLASHING BEACON ITEM AND SHALL BE INSTALLED PER MANUFACTURER'S RECOMMENDATION.

SIGNING LEGEND

N / M	INSTALL NEW SIGN (N) ON NEW (M) SIGN SUPPORT N = SIGN NUMBER M = MATERIAL OPTIONS: PSST = PERFORATED STEEL SQUARE TUBE PP = PEDESTRIAN PEDESTAL (RRFB POST), SEE SHEET SS-02 FOR FLASHING BEACON PLAN SSC = STAINLESS STEEL CLAMP
RIN	REINSTALL EXISTING SIGN (N) ATTACH ACCORDING TO ODOT STANDARD DRAWING TM - 676.
RXN	REMOVE EXISTING SIGN (N) AND SUPPORT.

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REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2003
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

SIGNING & STRIPING PLAN

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG / ZMG
DRAWN BY / CHECKED BY

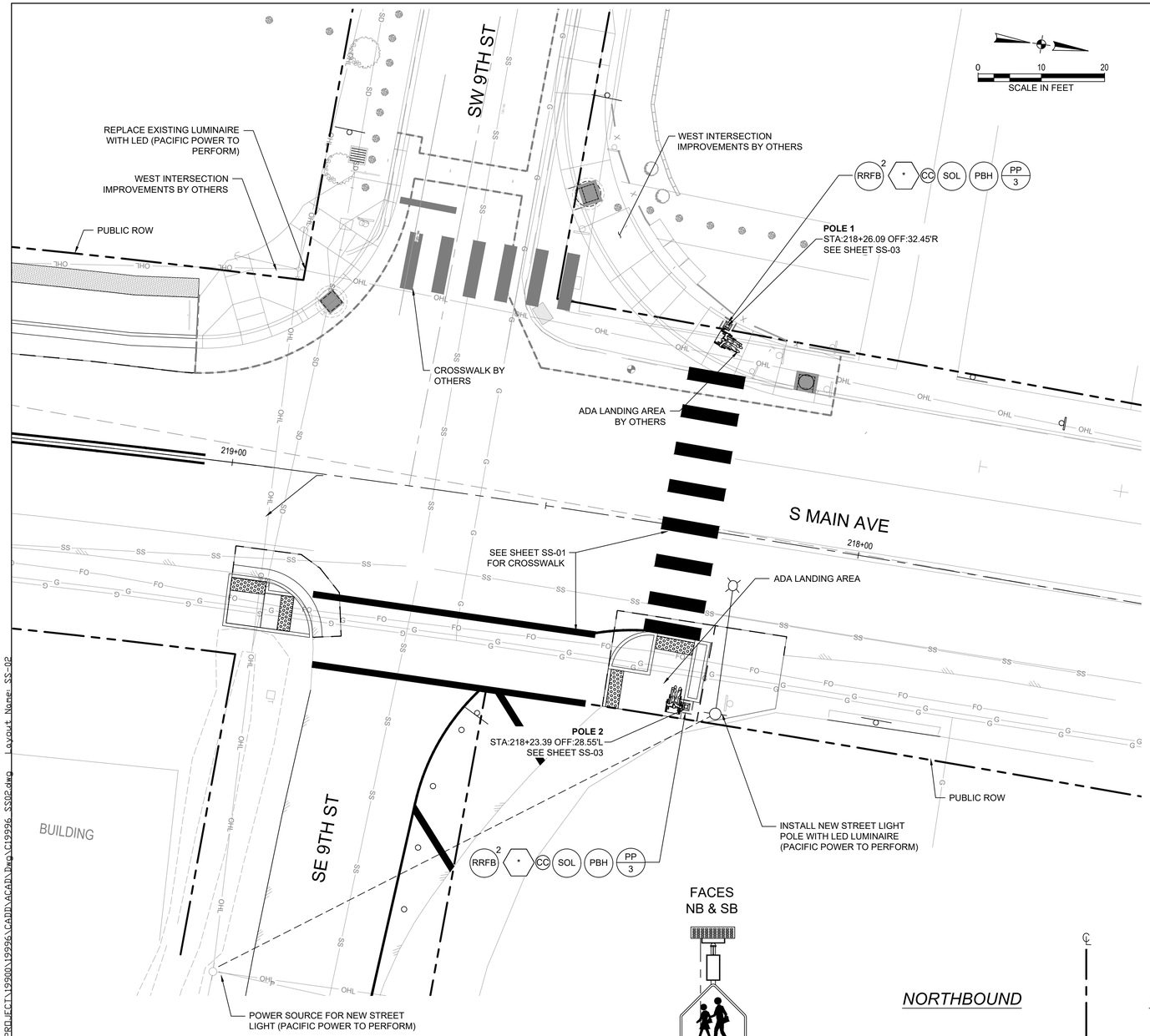
FINAL PLANS
STATUS

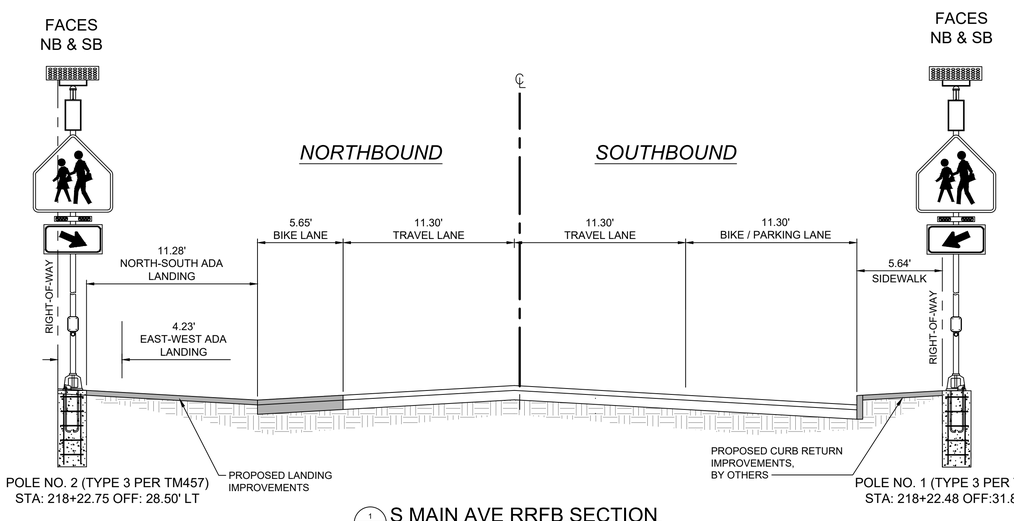
SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

SS-01

Plotted: Sep 15, 2023 - 9:03am Jess.Barngrover V:\PROJECT\19900\19996\CADD\ACAD\Dwg\C19996_SS01.dwg Layout Name: SS-01





1 SS-02 S MAIN AVE RRFB SECTION

SCALE: NTS

POLE ENTRANCE CHART

SEE TM457		EQUIPMENT ON POLE		
POLE NO.	TYPE	FLASHING BEACON DEG.	PED. PUSHBUTTON DEG.	SIGN DEG.
1	PP/3	0 & 180	0	0 & 180
2	PP/3	0 & 180	180	0 & 180

TRAFFIC SECTION APPROVAL

HWY 104
M.P.: 3.90

UNIT FILE CODE
23153

DFI/TSSU NO.
SB RRFB 1F180
NB RRFB 1F181

FINAL PLANS

NOTES

1. THE LOCATIONS OF SIGN INSTALLATIONS SHOWN ARE APPROX. WITH EXACT LOCATIONS TO BE DETERMINED IN THE FIELD.
2. INSTALL THE RRFB SYSTEM ACCORDING TO MANUFACTURER'S INSTRUCTIONS.
3. CONFIRM POLE AND CABINET INSTALLATION LOCATIONS WITH ENGINEER.
4. INSTALL CONTROLLER CABINET ACCORDING TO MANUFACTURER'S INSTRUCTIONS.
5. REFER TO SHEET SS-03 FOR FLASHING BEACON DETAILS.
6. CONTACT REGION 2 SIGNAL OPERATIONS ENGINEER AT LEAST TWO WEEKS PRIOR TO ACTIVATING THE RRFB.

LEGEND

POLES

- PP / N — INSTALL PEDESTRIAN PEDESTAL WITH FRANGIBLE BASE ON (N=NUMBER) FOUNDATION, SEE TM457 FOR DETAILS.
- LP — LUMINAIRE POLE.

CABINETS

- CC — INSTALL CONTROLLER SYSTEM AS PER MANUFACTURER REQUIREMENTS.

SIGNALS

- N RRFB — INSTALL (N=NUMBER) RRFB RAPID FLASHING BAR.

SIGNS

- * — SEE SIGNING PLANS FOR DETAILS ON SIGNS.

MISCELLANEOUS NOTES

- SOL — INSTALL SOLAR ENERGY SOURCE.
- PBH — INSTALL PUSHBUTTON WITH MOUNT ("PUSHBUTTON TO TURN ON WARNING LIGHTS" R10-25).

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JULY 13, 2004
AMANDA M. OWINGS
EXPIRES: 12/31/2024

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

FLASHING BEACON PLAN

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
ZMG — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

SS-02

If this drawing is not 22" x 34", it has been reduced/enlarged. Scale accordingly.

Plotted: Sep 15, 2023 - 9:04am Jessa.Bornsheuer V:\PROJECT\19300\19996\CADD\ACAD\Dwg\C19996_SS02.dwg Layout: None: SS-02

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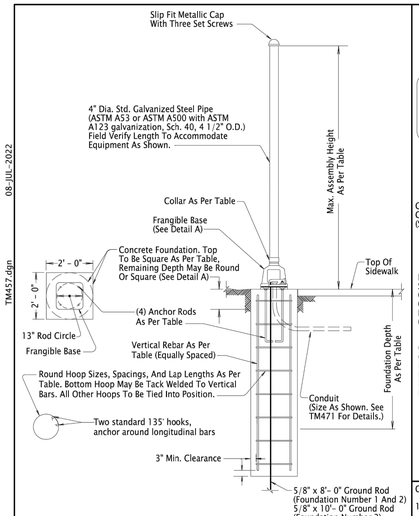
WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

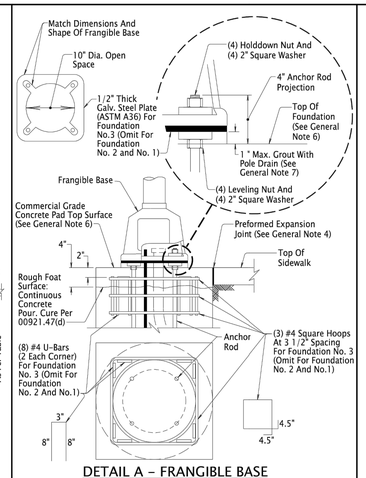
FLASHING BEACON DETAILS

TM457.dgn 08-JUL-2022



Pedestal Foundation Number	Max. Assembly Height	Foundation Depth	Depth of Square Foundation	Anchor Rods (ASTM F 1554 Grade 36)	Reinforcing Steel				Collar
					Vertical Rebar	Hoop Size & Spacing	Hoop Lap Length		
1	6' - 0"	2' - 0"	4"	3/4" x 18" x 4" (6" Thread)	N/A	N/A	N/A	N/A	
2	10' - 0"	3' - 0"	4"						
3	20' - 6"	8' - 0"	12"	1" x 36" x 4" (6" Thread)	8-#6	#4-12"	6" with 2 hooks	Req'd	

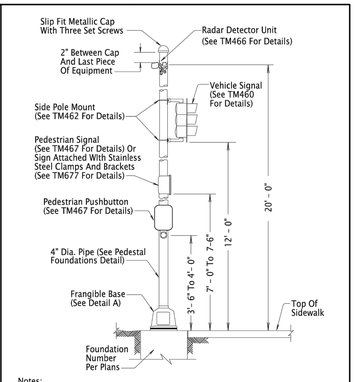
PEDESTAL FOUNDATIONS



DETAIL A – FRANGIBLE BASE

General Notes:

1. All Bolts, Nuts And Washers To Conform To 02560.20 And Be Galvanized Steel According To 02560.40 Unless Noted Otherwise.
2. All Anchor Rods To Be Galvanized Steel Conforming To 02560.30.
3. All Pole Entrances Containing Wiring To Be Smooth.
4. Install 1/4" Thick Preformed Expansion Joint Filler Around Footing In Sidewalk Areas.
5. The Entire Foundation To Be Located On A Single Plane With Less Than 3% Slope. The Flat Edge(s) Of The Foundation May Be Adjacent To The Turn Space, Back Of Walk, Or A Curb Ramp Grade Break Line.
6. Install Commercial Grade Concrete Pad Above Rough Float Surface With Top Surface Matching Sidewalk Grade And Less Than 1/4 " Vertical Exposure From Adjacent Grade. Clean Rough Float Surface Prior To Placing Fresh Concrete By Removing All Scum, Laitance, Loose Gravel, And Sediment. Pour During Sidewalk Installation After Installing Pipe And Appurtenances.
7. Non-Shrink High Early Strength Grout (Non-Ferrous) with 3/4" Diameter Pole Drain And A Minimum Strength of 5000 psi. Do Not Use Footing Concrete.



Notes:

1. Equipment Shown In the Assembly Detail Is An Example Of The Equipment That May Be Mounted. Install Equipment As Shown.
2. See TM492 For Ramp Meter Pedestal Mounting Details.
3. See TM493 For RRFB Pedestal Mounting Details.

TRAFFIC SIGNAL PEDESTAL ASSEMBLY

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

PEDESTAL FOUNDATION AND TRAFFIC SIGNAL ASSEMBLY

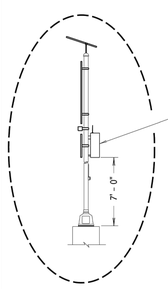
2021

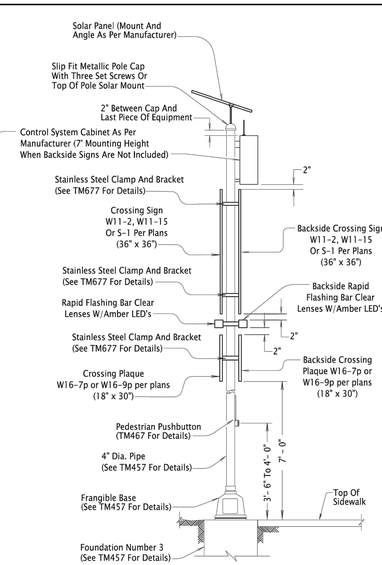
DATE	REVISION DESCRIPTION
01-2021	UPDATED ALL ANCHOR ROD DETAILS, CORRECTED STD. DWG. REFERENCE
07-2022	COMPLETE REDESIGN OF FOUNDATION AND INSTALLATION PROCEDURE

CALC. BOOK NO. N/A SDR DATE 08-JUL-2022 **TM457**

Effective Date: June 1, 2023 – November 30, 2023

TM493.dgn 08-JUL-2022

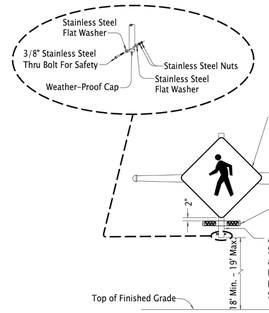




Note:

1. Equipment Shown In the Assembly Detail Is An Example Of The Equipment That May Be Mounted. Install Equipment As Shown.
2. This detail is also applicable to mounting RRFB equipment on a large signal pole.

RECTANGULAR RAPID FLASHING BEACON PEDESTAL ASSEMBLY
(Use Green Sheet Listed Items Only)



RECTANGULAR RAPID FLASHING BEACON MAST ARM ASSEMBLY
(Use Green Sheet Listed Items Only)

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

RECTANGULAR RAPID FLASHING BEACON (RRFB) ASSEMBLIES

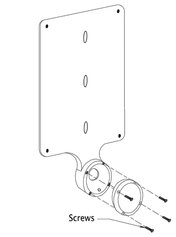
2021

DATE	REVISION DESCRIPTION
07-2022	NEW DRAWING

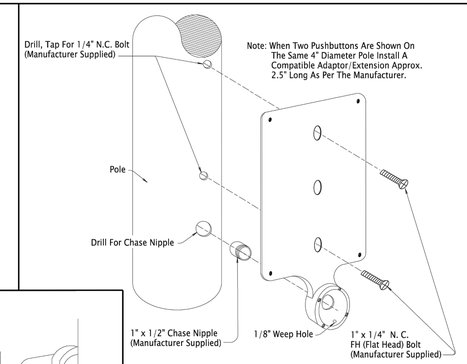
CALC. BOOK NO. N/A SDR DATE 08-JUL-2022 **TM493**

Effective Date: June 1, 2023 – November 30, 2023

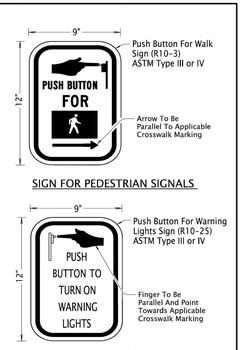
TM467.dgn 08-JUL-2022



STANDARD PUSHBUTTON

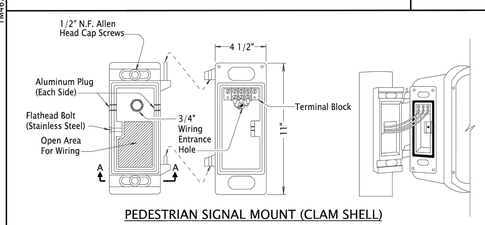


STANDARD PUSHBUTTON STATION AND INSTRUCTION SIGN



SIGN FOR PEDESTRIAN SIGNALS

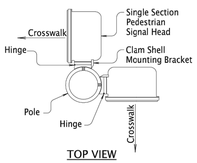
SIGN FOR WARNING BEACON ASSEMBLY



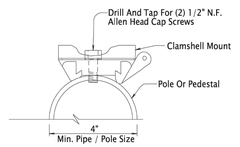
PEDESTRIAN SIGNAL MOUNT (CLAM SHELL)

NOTES:

1. Where Two Heads Are Side Mounted On 4" Conduit, Proper Clearance To Be Maintained To Allow Legend To Be Fully Visible.
2. Clam Shells To Be Orientated So That The Heads Can Be Opened For Maintenance. (Verify Hinge Placement Of Clamshell).



TOP VIEW



SECTION A–A

CLAM SHELL ORIENTATION

General Notes:

1. All Screws, Bolts, Nuts And Washers To Be Type 304 Or 316 Stainless Steel Unless Noted Otherwise.
2. Bolts And Screws To Have Square Or Hex Heads. Allen Head Fasteners Not Allowed.
3. Drill And Tap Pole As Per Orientation Shown On Plans.
4. Horizontal Reach To The Pushbutton To Be 10 Inches Maximum. See Plans Or Consult Engineer To Ensure Compliance.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

PEDESTRIAN SIGNAL MOUNT AND PEDESTRIAN PUSHBUTTON DETAILS

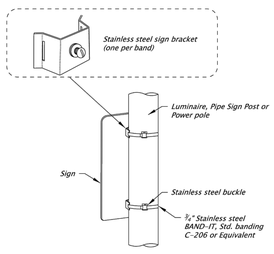
2021

DATE	REVISION DESCRIPTION
07-2022	ADDED #10-25 SIGN. ADDED EXTENSION MOUNTING NOTE FOR 2 PUSHBUTTONS ON SAME 4" DIA. POLE.

CALC. BOOK NO. N/A SDR DATE 08-JUL-2022 **TM467**

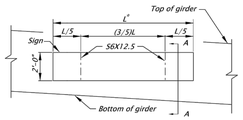
Effective Date: June 1, 2023 – November 30, 2023

TM677.dgn 10-JUL-2020



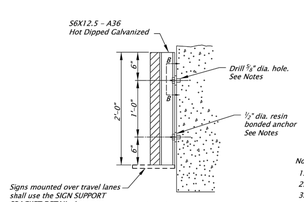
Signs mounted to vertical posts that use stainless steel clamps shall not be wider than 36". Use 2 clamps for all signs less than 48" in height and 3 clamps for signs 48" to 60" in height.

STAINLESS STEEL CLAMP (SSC) DETAIL
No Scale

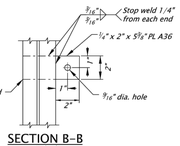


* = L maximum is 14'-0".

SIGN ELEVATION
No Scale



SECTION A–A
No Scale



SECTION B–B
No Scale

Notes:

1. *Install resin bonded anchors according to Section 00535.*
2. *Resin bonded anchors shall conform to ASTM A307.*
3. *The hole depths shall develop the pullout strength specified in Table 00535-1.*
4. *Tighten 1/2" dia. anchors using 16 ft-lb of torque for waxed galvanized and 40 ft-lb of torque for galvanized only connections.*

ROAD NAME SIGN STRUCTURE MOUNT DETAIL

GENERAL NOTES

1. *For Secondary Sign Mounts See TM678.*

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

SIGN MOUNTS

2021

DATE	REVISION DESCRIPTION

CALC. BOOK NO. N/A SDR DATE 06-JUL-2015 **TM677**

Effective Date: June 1, 2023 – November 30, 2023

TRAFFIC SECTION APPROVAL

HWY 104
M.P.: 3.90

UNIT FILE CODE
23154

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG DRAWN BY ZMG CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

SS-03

Plotted: Sep 15, 2023 - 9:04am Jess.Bornsheuer V:\PROJECTS\19900\19996\CAD\ACAD\Dwg\19996_SS03.dwg Layout Name: SS-03

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JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

ODOT STANDARD STRIPING & MARKING DETAILS

TM500.dgn 07-01-2020

W — 4" WHITE LINE

W-2 — 8" WHITE LINE

Y — 4" YELLOW LINE

CH — CHEVRON BARS
1' WHITE BARS AT 20' SPACING

TM — TRANSVERSE MEDIAN BARS
1' YELLOW BARS AT 20' SPACING

WB — 4" WHITE BROKEN LINE

YB — 4" YELLOW BROKEN LINE

WD — 4" WHITE DOTTED LINE
For lane extensions

WD-2 — 8" WHITE DOTTED LINE
For lane extensions and bike lane extensions

YD — 4" YELLOW DOTTED LINE
For lane extensions

DLL — 4" WHITE DOTTED LANE LINE
For lane lines in acceleration/deceleration lanes

DLL-2 — 8" WHITE DOTTED LANE LINE
For lane lines in drop lanes

NPR — NO-PASS RIGHT
4" YELLOW LINES

NPL — NO-PASS LEFT
4" YELLOW LINES

TWL — TWO-WAY LEFT TURN
4" YELLOW LINES

TM-40 — TRANSVERSE MEDIAN BARS
1' YELLOW BARS AT 40' SPACING
For use at painted medians where distance between left turn refuges exceeds 200'

D — DOUBLE NO-PASS
TWO 4" YELLOW LINES

ND — NARROW DOUBLE NO-PASS
TWO 4" YELLOW LINES

NDW — NARROW DOUBLE NO-LANE CHANGE
TWO 4" WHITE LINES

TS — TRANSVERSE SHOULDER BARS
1' WHITE BARS AT 20' SPACING

HC — DISABLED PARKING DETAIL (white)

YLD — YIELD LINE (white)

BYLD — BICYCLE YIELD LINE (white)

Direction Of Traffic, Increasing Stationing Or Thru Traffic Side

LEGEND

℄ — Lane line dimensions are shown on the striping plans

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

PAVEMENT MARKING STANDARD DETAIL BLOCKS

2021

DATE	REVISION DESCRIPTION
07-2020	Changed Min. widths for CH, TM, TM-40, and TS.

CALC. BOOK NO. N/A — SDR DATE 07-01-2020 — **TM500**

Effective Date: June 1, 2023 - November 30, 2023

TM501.dgn 01-03-2022

SA — STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

LA — LEFT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

RA — RIGHT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

LSA — LEFT TURN STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

RSA — RIGHT TURN STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

RALA — RIGHT TURN LEFT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

RSLA — RIGHT TURN STRAIGHT LEFT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-SA — ELONGATED STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-LA — ELONGATED LEFT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-RA — ELONGATED RIGHT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-LSA — ELONGATED LEFT TURN STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-RSA — ELONGATED RIGHT TURN STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-RALA — ELONGATED RIGHT TURN LEFT TURN ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

E-LSLA — ELONGATED LEFT TURN STRAIGHT ARROW (white)
For arrow proportion details, see current version of Standard Highway Signs

F-LA — FISH-HOOK LEFT TURN ARROW (white)
For arrow proportion details, see the current ODOT Traffic Line Manual

F-RALA — FISH-HOOK RIGHT TURN LEFT TURN ARROW (white)
For arrow proportion details, see the current ODOT Traffic Line Manual

F-SA — FISH-HOOK STRAIGHT ARROW (white)
For arrow proportion details, see the current ODOT Traffic Line Manual

F-RSA — FISH-HOOK RIGHT TURN SRAIGHT ARROW (white)
For arrow proportion details, see the current ODOT Traffic Line Manual

F-LSA — FISH-HOOK LEFT TURN STRAIGHT ARROW (white)
For arrow proportion details, see the current ODOT Traffic Line Manual

F-RSLA — FISH-HOOK RIGHT TURN STRAIGHT LEFT TURN ARROW (white)
For arrow proportion details, see the current ODOT Traffic Line Manual

LRA-L — LANE REDUCTION ARROW – LEFT LANE ENDS (white)
For arrow proportion details, see current version of Standard Highway Signs

LRA-R — LANE REDUCTION ARROW – RIGHT LANE ENDS (white)
For arrow proportion details, see current version of Standard Highway Signs

WWA — WRONG-WAY ARROW (white)

General Note:
1. Center pavement markings within the lane width.
2. Arrow and letter dimensions nominal, excluding WWA.

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

PAVEMENT MARKING STANDARD DETAIL BLOCKS

2021

DATE	REVISION DESCRIPTION
07-2020	Some Detail Blocks moved to new Std. Drawing TM504
	Fish-hook Arrows added, LRA split into LRA-L and LRA-R
01-2022	Corrected bubble callout of LRA-L and typo in LRA-R

CALC. BOOK NO. N/A — SDR DATE 01-03-2022 — **TM501**

Effective Date: June 1, 2023 - November 30, 2023

TM502.dgn 07-08-2022

CW — STANDARD CROSSWALK
TWO 1' WHITE BARS
Install per Standard Drawing TM530

CW-SC — STAGGERED CONTINENTAL CROSSWALK
2' WHITE BARS
Install per Standard Drawing TM530

S — STOP BAR
1' WHITE BAR
Install per Standard Drawing TM530

S-2 — STOP BAR - LARGE
2' WHITE BAR
Install per Standard Drawing TM530

S-RM — RAMP METER STOP BAR
1' & 8" WHITE BARS
For multi-lane ramp meter applications

BR — BIKE RIGHT TURN STENCIL (white)
Center marking within lane width
For proportion details, see current version of Standard Highway Signs

BS — BIKE LANE STANDARD STENCIL (white)
Center marking within lane width
For proportion details, see current version of Standard Highway Signs

BL — BIKE LEFT TURN STENCIL (white)
Center marking within lane width
For proportion details, see current version of Standard Highway Signs

BRS — BIKE RIGHT TURN STRAIGHT STENCIL (white)
Center marking within lane width
For proportion details, see current version of Standard Highway Signs

BLS — BIKE LEFT TURN STRAIGHT STENCIL (white)
Center marking within lane width
For proportion details, see current version of Standard Highway Signs

SLM — SHARED LANE MARKING (white)
Center marking within lane width or as shown
For proportion details, see current version of Standard Highway Signs

B — BIKE STENCIL (white)
Used for Intersection Bicycle Box applications
Place marking within bicycle box, cenetered with motor vehicle lane width

BD — BICYCLE DETECTOR MARKING (white)
Place Bicycle Detector Pavement Marking in optimum loction where bicycle acuates the traffic signal

GRN — GREEN SUPPLEMENTAL BICYCLE LANE SOLID LINE (green)

BLE-C — GREEN SUPPLEMENTAL BICYCLE LANE DOTTED LINE EXTENSION (green)

BUS — BUS (white)
Center marking within lane width
For letter proportion details, see current version of Standard Highway Signs

ON — ONLY (white)
Center marking within lane width
For letter proportion details, see current version of Standard Highway Signs

SCH — SCHOOL (white)
Center marking within lane width
For letter proportion details, see current version of Standard Highway Signs

SCH-LG — SCHOOL - LARGE (white)
Center marking within width of two lanes
For letter proportion details, see current version of Standard Highway Signs

CRS-LG — CROSSING - LARGE (white)
Center marking within width of two lanes
For letter proportion details, see current version of Standard Highway Signs

XNG — X-ING (white)
Center marking within lane width
For letter proportion details, see current version of Standard Highway Signs

P — ON-STREET PARKING DETAIL (white)

General Note:
1. Arrow, letter, and bike symbol dimensions nominal.

LEGEND

Direction of Travel

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

PAVEMENT MARKING STANDARD DETAIL BLOCKS

2021

DATE	REVISION DESCRIPTION
07-2022	Added note for measurement of Standard Crosswalk

CALC. BOOK NO. N/A — SDR DATE 07-08-2022 — **TM503**

Effective Date: June 1, 2023 - November 30, 2023

TM530.dgn 06-JUL-2022

PAVEMENT MARKINGS FOR TYPICAL INTERSECTION

* Stop bar shall be placed as near as possible to the intersecting traveled way. Locate stop bar 4' min. to 30' max. in advance of the extended fog line, edge of pavement, or curb face. Minimum stop bar distance may need to be increased, depending on location of pedestrian ramps (see Detail "A") and/or vehicle turn radii (see Detail "B"). Field verify sight distance and truck turning movements.

Detail "A"
STOP BAR PLACEMENT WITH RESPECT TO PEDESTRIAN RAMPS

Detail "B"
STOP BAR PLACEMENT WITH RESPECT TO TURN RADII

INSTALLATION OF BIKE LANE STENCILS FOR BIKE LANE SEPARATED BY RIGHT TURN LANE

INSTALLATION OF BIKE LANE STENCILS FOLLOWING INTERSECTIONS

General Note:
Install bike lane stencil to avoid right turning vehicle wheel tracks.

STAGGERED CONTINENTAL LAYOUT

STANDARD CROSSWALK BARS AT INTERSECTION
* = Refer to Std Dwg RD916

General Note:
1. Install crosswalk bars such that the throat of the ADA ramp is entirely within crosswalk markings, or 5' back of extended fog line, edge of pavement, or curb face.

To be accompanied by Standard Dwg. Nos. TM500 thru TM504

LEGEND

Direction of Travel

℄ - Lane line dimensions are shown on the striping plans

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

INTERSECTION PAVEMENT MARKINGS (CROSSWALK, STOP BAR & BIKE LANE STENCIL)

2021

DATE	REVISION DESCRIPTION
07-2022	Added Roadway Standard Drawing reference to detail for clarity

CALC. BOOK NO. N/A — SDR DATE 06-JUL-2022 — **TM530**

Effective Date: June 1, 2023 - November 30, 2023

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88

DATUM

ZMG — ZMG

DRAWN BY — CHECKED BY

FINAL PLANS

STATUS

SEPTEMBER 2023

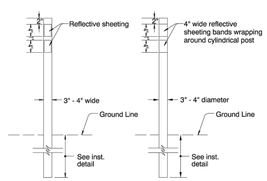
DATE

19996

PROJECT NUMBER

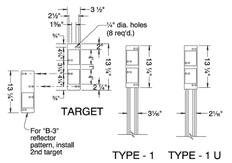
SS-04

Plotted: Sep 15, 2023 - 9:04am Jess.Borgsheuer V:\PROJECTS\19900\19996\CADD\ACAD\Dwg\C19996_STD05.dwg Layout: None: SS-04

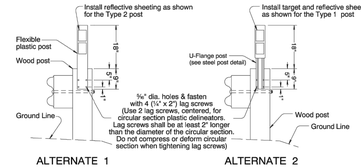


TYPE - 2 TYPE - 3

FLEXIBLE PLASTIC POSTS



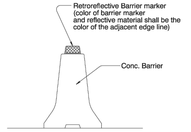
TYPE - 1 TYPE - 1 U



ALTERNATE 1 ALTERNATE 2

TYPE - 4

GUARDRAIL AREAS (WITH WOOD POSTS)

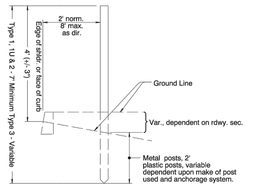


TYPE - 5

CONCRETE BARRIER AREAS

(Install barrier markers at 50' spacing unless otherwise noted in plans)

STEEL POSTS



INSTALLATION DETAIL

NOTES:

POST:
Galv. steel, nominal weight Type 1, 2 lb/ft, Type 1 U, 1.12 lb/ft.

See Standard Drawing TM571 for steel post dimensions and details.

TARGET:
Aluminum sheet, nominal thickness .050". Fasten to post with¼" dia. aluminum blind rivets and washers.

For "B-3" reflector pattern, top target shall overlap bottom target.

REFLECTORS:
3" x 4" reflective sheeting unless otherwise shown. (3½" x 4" reflective sheeting is an acceptable alternate unless otherwise shown.)
Acrylic prismatic reflectors acceptable on Type 1, 1 U, 2 and 4 posts and Type 5 barrier mounts.
Place required number in sequence from top of target.

GENERAL NOTES:

1. Spacing shall be measured along the shoulder.
2. On roads with less than 500 vehicle ADT, delineators are not to be used except where situations such as sharp horizontal curves, etc. exist.
3. To clear driveways, crossroads etc., or for required adjustments at ramps and at intersections, either:
   (a) vary placement of that post up to 25% of spacing shown, or;
   (b) eliminate said post if limit of variation must be exceeded.
4. Judgement should be exercised in the installation of delineators in cut section, particularly on roads constructed to older standards where ditches are narrow and where delineators tend to hamper maintenance operations.
5. On horizontal curves place delineators nearly opposite each other.
6. At guard rail locations the delineators are to be installed behind the rail and shall be located adjacent to guard rail posts as shown for Type 4 Delineators.
7. Install all delineators with reflectors facing adjacent oncoming traffic.
8. Offset delineators an additional 4' in areas of heavy snow removal operations.
9. Backside Delineators may be used in frequently snow plowed areas where use of snow poles is not justified. When Backside Delineators are specified, substitute "W-1" and "W-2" with "W-1B" and "W-2B" respectively, on Type 1 steel posts. Do not install Backside Delineators on one-way sections of roadway, freeways and ramps, or on radius sections.
10. Refer to TM 222 for bracket assembly details for Backside Reflector Pattern.

REFLECTOR PATTERN TABLE					
	Color Type	Color Of Reflector And Target Or Post	Number Of Reflectors	Color Of Reflector And Target Or Post On Backside	Number Of Reflectors On Backside
Standard Pattern	"W-1"	White	1	Not Applicable	Not Applicable
	"W-2"	White	2		
	"Y-1"	Yellow	1		
	"Y-2"	Yellow	2		
	"B-1"	Blue	1		
	"B-2"	Blue	2		
	"B-3"	Blue	3		
	"R-1"	Red	1		
Backside Pattern	"W-1B"	White	1	White	2
	"W-2B"	White	2	White	2

TANGENT	HORIZONTAL CURVES				
▲MAX. SPACING EACH SIDE OF ROADWAY IN FEET	▲ MAX. SPACING EACH SIDE OF ROADWAY IN FEET				
	DEGREE OF CURVE	ON CURVE	IN ADVANCE OF & BEYOND CURVE		
			FIRST SPACE	SECOND SPACE	THIRD SPACE
400	Lower Than 1	300	300	300	300
	1	230	300	300	300
	2	160	300	300	300
	3	130	260	300	300
	4	110	220	300	300
	5	100	200	300	300
	6	90	180	270	300
	7 - 8	80	160	240	300
	9 - 11	70	140	210	300
	12 - 16	60	120	180	300
	17 - 22	50	100	150	300
	23 - 34	40	80	120	240
	35 - 53	30	60	90	180
	54 & Higher	20	40	60	120

(Min. spacing 20 feet)

(▲Install "W-1" reflective pattern unless otherwise noted. See Standard Drawings TM575 thru TM577 for spacing, layout, and reflective pattern of delineators at interchange ramps, channelized intersections, lane reductions, emergency escape ramps and freeway crossovers.)

DELINEATOR SPACING TABLE FOR TYPES 1, 1U, 2, and 4

To be accompanied by Drg. No. TM571, TM575, TM576, and/or TM577 as specified.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

TRAFFIC DELINEATORS

2021

DATE	REVISION DESCRIPTION

CALC. BOOK NO. N/A SDR DATE 06-JAN-2012 **TM570**

Effective Date: June 1, 2023 - November 30, 2023

06-JAN-2012

TM570.dgn

Otak, Inc.
808 SW Third Avenue, Ste. 800
Portland, OR 97204
503. 287. 6825
www.otak.com

REGISTERED PROFESSIONAL ENGINEER 72,629 OREGON JUNE 11, 2008 KEITH BUISMAN

EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

ODOT STANDARD STRIPING & MARKING DETAILS

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG DRAWN BY ZMG CHECKED BY

FINAL PLANS
STATUS

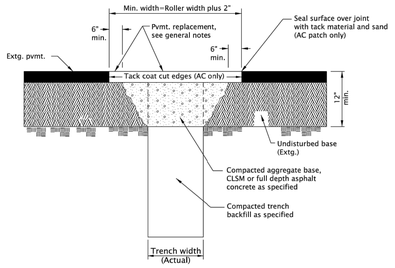
SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

SS-05

If this drawing is not 22" x 34", it has been reduced/enlarged. Scale accordingly.

Plotted: Sep 15, 2023 - 9:05am Jess Borgsheuer V:\PROJECT\19900\19996\CADD\dCAD\Dwg\C19996_ST005.dwg Layout: None SS-05



GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. All existing AC or PCC pavement shall be sawcut prior to repaving.
2. Concrete pavement shall be replaced with concrete to a minimum thickness of 8" or to the thickness of removed pavement, whichever is greater.
3. For joining new concrete to existing concrete, see contract plans for sepecific details.
4. Place AC mix minimum thkn. of 6" or the thkn. of the removed pavement, whichever is greater. Compact as specified.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

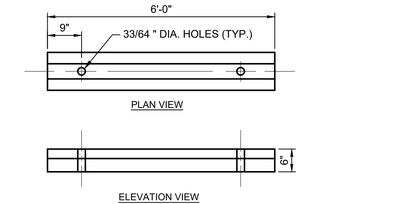
STREET CUT

2021

DATE	REVISION DESCRIPTION

CALC. BOOK NO. N/A | SDR DATE 20-JUL-2020 | **RD302**

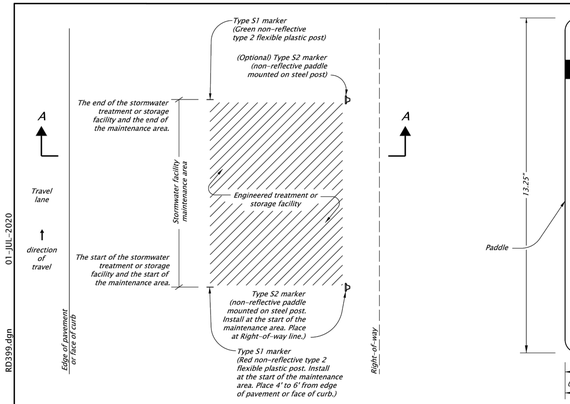
Effective Date: June 1, 2023 - November 30, 2023



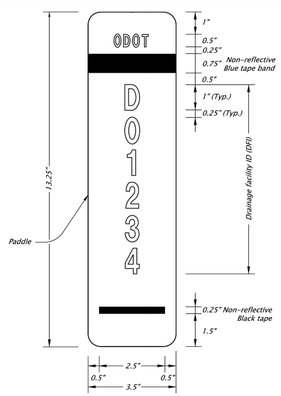
NOTES
1. USE PRECAST CONCRETE WHEEL STOP.
2. INSTALL PER MANUFACTURER RECOMMENDATIONS.
3. DETAIL SHOWN FOR REFERENCE ONLY. ACTUAL WHEEL STOP GEOMETRY AND INSTALLATION REQUIREMENTS MAY VARY.

TYPICAL WHEEL STOP

SCALE: N.T.S.



TYPE S1 & S2 MARKERS INSTALLATION DETAIL

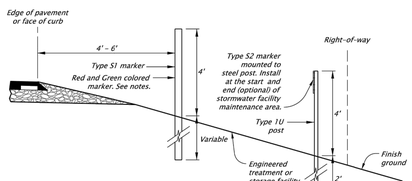


TYPE S2 MARKER

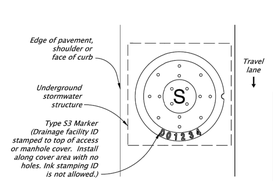
NOTES:
Stormwater Facility Field Marker Type S1:
1. *See Standard Drawing TM570 for Type 2 flexible plastic post dimensions. Do not mount reflective sheeting to flexible plastic post.*
2. *A red Type S1 marker is used to mark the start of a stormwater facility maintenance area. A green Type S1 marker is used to mark the end of a stormwater facility maintenance area.*
3. *Place 4 to 6 feet from edge of pavement or face of curb.*
4. *See marker table for installation locations.*

Stormwater Facility Field Marker Type S2:
1. *Paddle:*
   - *Aluminum sheet, nominal thickness 0.050"*
   - *White non-reflective background*
   - *Mount paddle to one (1) Type 1U steel post using $\frac{5}{16}$" diameter aluminum blind rivets and washers. See Standard Drawing TM570 detail labeled "Steel Posts" for mounting a traffic target. Install paddle onto Type 1U steel post using the same hole pattern.*
   - *Text and numbers are Type C font in non-reflectorized black*
   - *Band is non-reflective blue tape*
   - *Do not mount paddle to other highway signing posts*
   - *Install paddle parallel to travel lane*
   - *Prepare paddle for each "DFI" noted in the marker table*
2. *Steel Posts:*
   - *See Standard Drawing TM571 for Type 1U steel post dimensions*

Stormwater Facility Field Marker Type S3:
1. *The top of access or manhole cover shall be stamped with the drainage facility ID. Ink stamping ID is not allowed.*



SECTION A-A



TYPE S3 MARKER INSTALLATION DETAIL

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

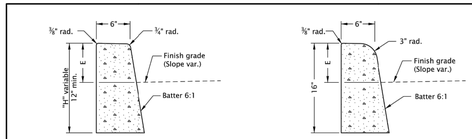
STORMWATER TREATMENT AND STORAGE FACILITY FIELD MARKERS

2021

DATE	REVISION DESCRIPTION

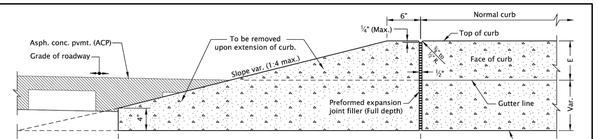
CALC. BOOK NO. RD11-01 | SDR DATE 01-JUL-2020 | **RD399**

Effective Date: June 1, 2023 - November 30, 2023

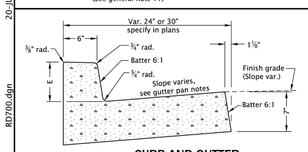


O.D.O.T. & City of Portland Standard "H"=16"
STANDARD CURB
(See general note 11)

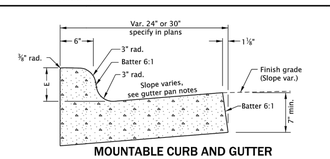
MOUNTABLE CURB
(See general note 11)



CURB ENDING DETAIL



CURB AND GUTTER



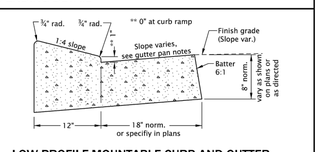
MOUNTABLE CURB AND GUTTER

GUTTER PAN NOTES:

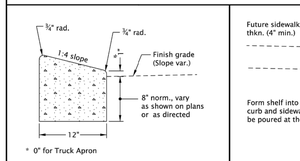
Slope 5.0% normal.

Slope 4.0% max. at curb ramps.

Vary slope as reqd. for drainage. Vary where shown on plans, and allowed by jurisdiction.

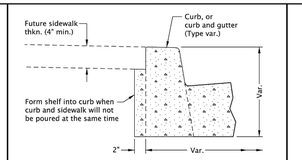


LOW PROFILE MOUNTABLE CURB AND GUTTER
(Where shown on plans)

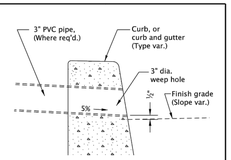


* 0" for Truck Apron

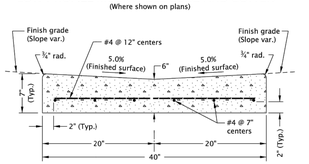
LOW PROFILE MOUNTABLE CURB
(See general note 11)



MODIFICATION FOR KEYWAY
(Where shown on plans)



WEEP HOLE DETAIL
(Where shown on plans, and allowed by jurisdiction)



VALLEY GUTTER

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Curb exposure "E" = 6" to 9", as measured vertically from flowline to highest point on curb. Vary as shown on plans or as directed. O.D.O.T standard "E"=7".
2. Const. curb expansion joints at 200' maximum spacing, and at points of tangency, and at ends of each driveways.
3. Const. curb contraction joints at 15' maximum spacing, and at ends of each inlet and curb ramp.
4. Transitions shall be used to connect curbs of different exposures "E". ("E" is the total vertical dimension of those curb surfaces having a slope of 1:1 or steeper). Minimum desirable transition length shall be 20' for each 1" difference in "E".
5. Tops of all curbs shall slope toward the roadway at 1.5% max. (Max. 2.0% finished surface slope), unless otherwise shown, or as directed.
6. Dimensions are nominal, vary to conform with curb machine approved by the engineer.
7. Dimensions adjacent to radii are measured to the point of intersection of curb surfaces.
8. For sidewalk details, and monolithic curb & sidewalk, see Std. Dwgs. RD720 & RD721.
9. For drainage curbs, see Std. Dwg. RD701.
10. For curb ramp details, see Std. Dwgs. RD900 series.
11. On or along state highways, curb and gutter is required at curb ramp.

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

CURBS

2021

DATE	REVISION DESCRIPTION

CALC. BOOK NO. N/A | SDR DATE 20-JUL-2020 | **RD700**

Effective Date: June 1, 2023 - November 30, 2023

Otak

Otak, Inc.
808 SW Third Avenue, Ste. 800
Portland, OR 97204
503. 287. 6825
www.otak.com

REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2009
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STANDARD DETAILS I

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG | ZMG
DRAWN BY | CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

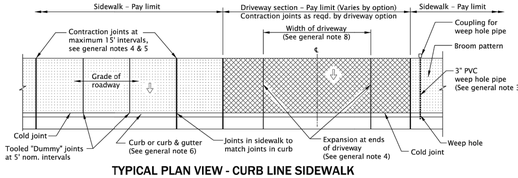
STD-01

RD302.dgn 20-JUL-2020
RD399.dgn 01-JUL-2020
RD700.dgn 20-JUL-2020
Plotted: Sep 15, 2023 - 9:05am Jess.Bornshewer V:\PROJECTS\19900\19996\CAD\ACAD\Dwg\C19996_STD01.dwg Layout Name: STD-01

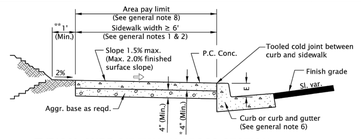
Otak, Inc.
808 SW Third Avenue, Ste. 800
Portland, OR 97204
503. 287. 6825
www.otak.com

REGISTERED PROFESSIONAL ENGINEER 72,629 OREGON JUNE 11, 2008 KEITH BUISMAN
EXPIRES: 12/31/2023

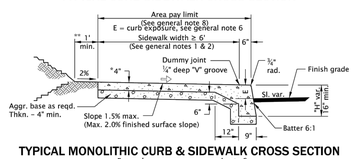
RD720.dgn 20-JUL-2020



TYPICAL PLAN VIEW - CURB LINE SIDEWALK



TYPICAL CURB SIDEWALK CROSS SECTION



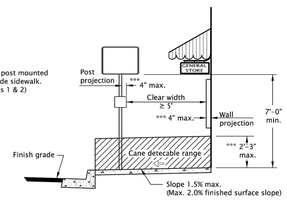
TYPICAL MONOLITHIC CURB & SIDEWALK CROSS SECTION

E – curb exposure, see general note 6

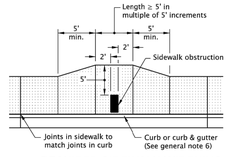
* Min. 4" or as specified in plans. A thickness ≥ 6" if sidewalk is intended as portion of a driveway or mountable curb is used.

** Provide compacted backfill adjacent to curb and sidewalk

*** Objects with base below 2'-3" may protrude any distance as long as the 5' circulation path is maintained. When an object with a base higher than 2'-3" protrudes further than 4" provide a detection below protrusion to delineate edge.



CLEAR CIRCULATION PATH



REQUIRED SIDEWALK WIDENING AROUND OBSTRUCTIONS

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Include additional paved or unpaved 2' shy distance to vertical faces higher than 5' such as retaining walls, sound walls, fences and buildings.
2. Curb type and sidewalk width as shown on plans or as directed. On sidewalks 8' and wider, provide a longitudinal joint at the midpoint.
3. Install 3" pvc weep hole pipes in sidewalks where shown on plans, and allowed by jurisdiction. Place contraction joint over top of pipe. See Std. Dwg. RD700 for weep hole details.
4. Provide expansion joints around poles, posts, boxes, at ends of each driveway, and other fixtures which protrude through or against the structures. For sidewalk, monolithic curb & sidewalk, const. expansion joints at 45' maximum spacing. See Std. Dwg. RD722 for expansion joints details.
5. Const. contraction joints at 15' maximum spacing, and at ends of each curb ramp. See Std. Dwg. RD722 for contraction joints details.
6. For curb details, see Std. Dwgs. RD700 & RD701. ODOT standard E=7".
7. Sidewalk details are based on applicable ODOT standards.
8. Fully lowered sidewalk shown; see project plans for the diveway design specified. For driveway details not shown, see Std. Dwgs. RD725, RD730, RD735, RD740, RD745 & RD750.
9. See project plans for details not shown.

LEGEND

- Sidewalk pay limit.
- Driveway pay limit, varies by option, (See general note 8).
- Cross slope 1.5% max. (Max. 2.0% finished surface slope) (Normal sidewalk cross slope)

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

CURB LINE SIDEWALKS

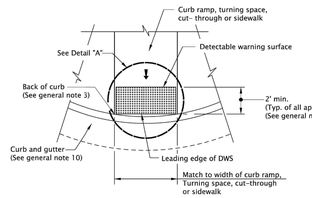
2021

DATE	REVISION DESCRIPTION

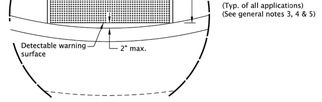
CALC. BOOK NO. N/A | SDR DATE 21-JUN-2019 | **RD720**

Effective Date: June 1, 2023 – November 30, 2023

RD902.dgn 19-JUL-2021

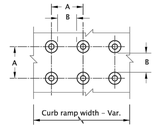


DETECTABLE WARNING SURFACE DETAIL

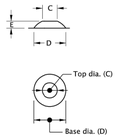


DETAIL "A"

	A	B	C	D	E
MIN.	1.60"	0.65"	0.45"	0.90"	0.20"
MAX.	2.40"	--	0.91"	1.40"	0.20"



TRUNCATED DOME SPACING



TRUNCATED DOME

TRUNCATED DOME DETAILS

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Detectable warning surface details & locations are based on applicable ODOT Standards.
2. See project plans for details not shown. See Std. Dwgs. RD700 & RD701 for curbs.
3. The detectable warning surface shall extend the full width of the curb ramp opening, shared use path, blended transition, turning space, or other roadway entrance as applicable. A gap of up to 2 inches on each side of the detectable warning surface is permitted (measured at the leading edge of the detectable warning surface panel as shown in Detail "A").
4. Detectable warning surface shall be placed at the back of curb for a minimum depth of 2 ft. in the direction of pedestrian travel at curb ramps that are adjacent to traffic. Detectable warning surface may be radial or rectangular, but must comply with the truncated dome size and spacing standards. Detectable warning surface may be cut to meet necessary shape as shown in plans. Detectable warning surface across a grade break is prohibited. Place abutting panels within ¼ inch of each other and install anchors, as specified by manufacturers, along cut edge.
5. Color to be safety yellow if no color specified in construction note. Alternative colors require a design exception on or along state highways.
6. Detectable warning surface shall be used in the following locations:
   a) Curb ramps at street crossings.
   b) Crossing islands (Accessible Route Islands).
   c) Rail crossings.
7. Where public transportation stations (rail, bus, etc.) use platform boarding, detectable warning surface shall be placed along the full edge length of the station, when not protected by platform screens or guards, (see Std. Dwg. RD908).
8. Detectable warning surface shall not be used on the following locations:
   a) End of sidewalk transitions that are not at a crosswalk, (see Std. Dwgs. RD950, RD952 and RD960).
   b) Driveways, unless constructed with curb return or are signalized.
   c) Parking lots, access aisles and passenger loading zones where curb ramp does not lead to vehicular way.
9. Where no curb is present, the detectable warning surface shall be placed at the edge of the roadway.
10. On or along state highways, curb and gutter is required at curb ramps.

LEGEND:

- Detectable warning surface
- Cross slope 1.5% max. (Max. 2.0% finished surface slope) (Normal sidewalk cross slope)
- Running slope 7.5% max. (Max. 8.3% finished surface slope)

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

DETECTABLE WARNING SURFACE DETAILS

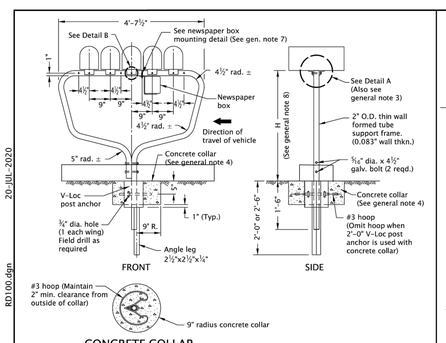
2021

DATE	REVISION DESCRIPTION
07-2020	NEW DRAWING CREATED
07-2021	REVISED DETAILS AND NOTES

CALC. BOOK NO. N/A | SDR DATE 19-JUL-2021 | **RD902**

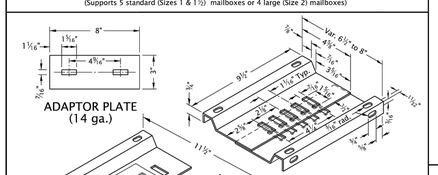
Effective Date: June 1, 2023 – November 30, 2023

RD100.dgn 20-JUL-2020



CONCRETE COLLAR
(See general note 4)

MULTIPLE SUPPORT
(Supports 5 standard (Sizes 1 & 1½) mailboxes or 4 large (Size 2) mailboxes)



SIZE 2 MOUNTING BRACKET (16 ga.) WITH ADAPTOR PLATE (14 ga.)

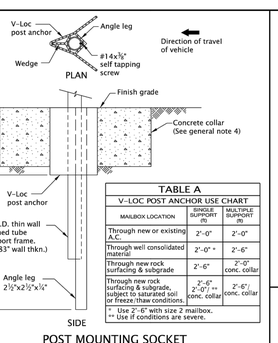
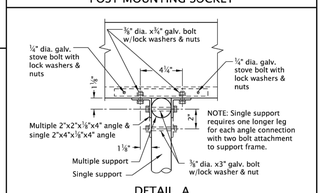


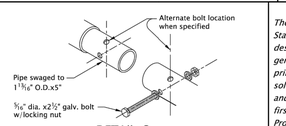
TABLE A V-LOC POST ANCHOR USE CHART		
MAILBOX LOCATION	SINGLE SUPPORT (S)	MULTIPLE SUPPORT (M)
Through new or existing A.C.	2'-0"	2'-0"
Through well consolidated material	2'-0" *	2'-6"
Through new rock surfacing & subgrade	2'-6"	2'-0" conc. collar
Through new rock surfacing & subgrade, subject to saturated soil or freeze/thaw conditions.	3'-6" 2'-0"* ** conc. collar	2'-6"/ conc. collar

* Use 2'-6" with size 2 mailbox.
** Use if conditions are severe.

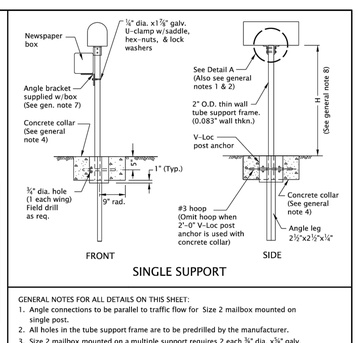
POST MOUNTING SOCKET



DETAIL A



DETAIL B



SINGLE SUPPORT

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Angle connections to be parallel to traffic flow for Size 2 mailbox mounted on single post.
2. All holes in the tube support frame are to be predrilled by the manufacturer.
3. Size 2 mailbox mounted on a multiple support requires 2 each ⅜" dia. x¾" galv. bolts with lock washers and nuts to attach the adaptor plate to the mounting bracket. The unit will then require 4 angle connections to attach to the formed tube support frame. See Detail A.
4. Provide concrete collar when any of the following conditions exist:
   a) when required in Table A
   b) when required by project plans
   c) as directed by the Engineer
   Concrete collar, when required, to be poured in place after V-Loc post anchor has been installed, level and plumb. Do not excavate below bottom of V-Loc post anchor. Care shall be taken that no concrete is placed within anchor.
5. Other proprietary products available as listed in ODOT's QPL.
6. For mailbox installation locations, see Std. Dwg. RD101 and project plans.
7. For Newspaper Box Mounting Detail, see Std. Dwg. RD101.
8. Mounting height (H) shall be 42" nominal, measured from vehicle driving surface.
9. See project plans for detail not shown.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

MAILBOX SUPPORT

2021

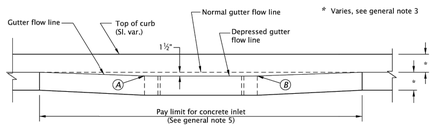
DATE	REVISION DESCRIPTION

CALC. BOOK NO. N/A | SDR DATE 25-JUL-2017 | **RD100**

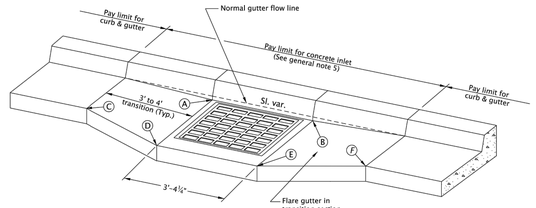
Effective Date: June 1, 2023 – November 30, 2023

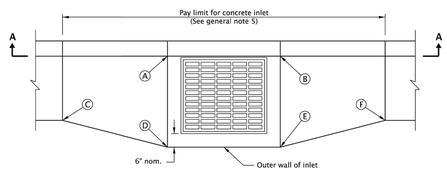
RD363.dgn 20-JUL-2020

NOTES:
1. Provide 1½" local depression at points A & B.
2. Match normal pvmt. grade at points C, D, E & F.
3. Vary transition section slopes to match above points.



SECTION A-A





PLAN VIEW

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. For inlet details, see appropriate inlet standard drawing(s).
2. For frame and grate details, see Std. Dwg. RD365.
3. For curb details, see Std. Dwgs. RD700 & RD701.
4. All concrete shall be commercial grade concrete.
5. Pay limit for inlet is expanded when curb and gutter are monolithic.

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

GUTTER TRANSITION AT INLET

2021

DATE	REVISION DESCRIPTION

CALC. BOOK NO. N/A | SDR DATE 21-JUL-2015 | **RD363**

Effective Date: June 1, 2023 – November 30, 2023

PROVIDE 4" RAISED CONCRETE TO RUN LENGTH AND WIDTH OF MAILBOX INSTALLATION

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STANDARD DETAILS II

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG | ZMG
DRAWN BY | CHECKED BY

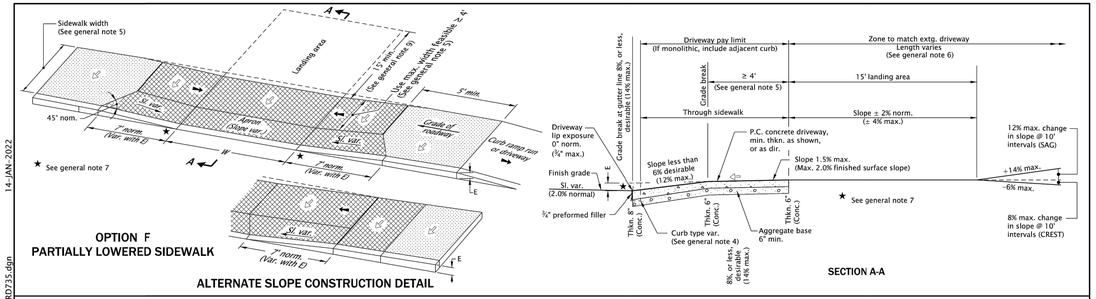
FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

STD-02

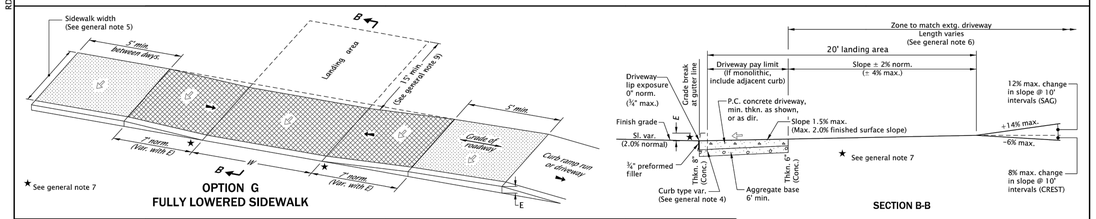
Plotted: Sep 15, 2023 – 9:05am Jess.Bornsheuer V:\PROJECT\19900\19996\CAD\DrCAD\Dwg\C19996_STD02.dwg Layout Name: STD-02



OPTION F
PARTIALLY LOWERED SIDEWALK

ALTERNATE SLOPE CONSTRUCTION DETAIL

SECTION A-A



OPTION G
FULLY LOWERED SIDEWALK

SECTION B-B

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Details are based on applicable ODOT Standards.
2. Only use details allowed by jurisdiction.
3. The following dimensions are as shown on plans, or as directed: driveway width, driveway slope, sidewalk width, curb exposure, driveway lip exposure, landing area length and width. See project plans for details not shown.
4. Curb, gutter, and sidewalk types varies, see plans.
   See Std. Dwgs. RD700 & RD701 for curb details.
   See Std. Dwg. RD720 for sidewalk details.
   See Std. Dwg. RD722 for joint details.
5. A greater than or equal 4' unobstructed clear passage with cross slope 1.5% max. (Max. 2.0% finished surface slope) is required behind driveway apron.
6. Where existing driveway is in good condition, and meets slope requirements, construct only as much landing area as required for satisfactory connection with new work.
7. Check the gutter flow depth at driveway locations to assure that the design flood does not overtop the back of sidewalk at driveway. If overtopping occurs place an inlet at upstream side of driveway or perform other approved design mitigation.
8. Construct a full depth expansion joints with 1#2" (in) preformed joint filler at ends of each driveway. Tooled joints are required at all driveway slope break lines.
9. 15' min. of the driveway behind the sidewalk should be surfaced to prevent tracking of gravel onto the sidewalk.
10. Monolithic curb & sidewalk shall retain thickened edge through lowered profile, to accommodate driveway use. See Std. Dwg. RD720 for details.

LEGEND:

- Sidewalk
- Driveway pay limit (If monolithic, include adjacent curb) (See project plans for details not shown)
- Cross slope 1.5% max. (Max. 2.0% finished surface slope) (Normal sidewalk cross slope)
- Running slope 7.5% max. (Max. 8.3% finished surface slope)
- W — Width of driveway
- E — Curb exposure

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

CURB LINE SIDEWALK DRIVEWAYS OR ALLEYS (OPTIONS F & G) ODOT HIGHWAYS

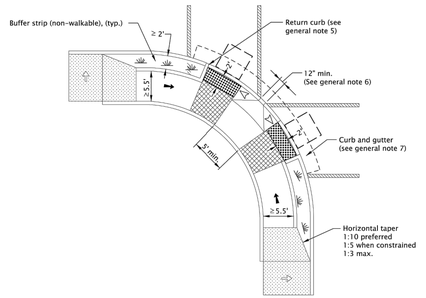
2021

DATE	REVISION DESCRIPTION

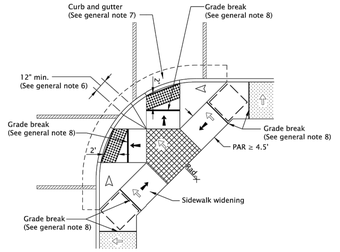
CALC. BOOK NO. N/A | SDR DATE 20-JUL-2020 | **RD735**

RD735.dgn 14-JAN-2022

Effective Date: June 1, 2023 - November 30, 2023



PARALLEL COMBINATION WITH LANDSCAPE BUFFER STRIP
OPTION "CC-3"



FOR NARROW SIDEWALKS
OPTION "CC-4"

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Curb ramp details are based on applicable ODOT Standards.
2. See project plans for details not shown.
   See Std. Dwgs. RD700 & RD701 for curbs.
   See Std. Dwgs. RD720 & RD721 for sidewalks.
   See Std. Dwgs. RD902 through RD908 for detectable warning surface installation details.
   See Std. Dwg. RD930 for combination curb ramp details.
3. Tooled dummy joints are required at all curb ramp grade break lines, (see Std. Dwg. RD722).
4. Curb ramp slopes shown are relative to the true level horizon (zero bubble).
5. Return curb may be provided in lieu of flared slope only if protected from traverse travel by landscaping, see Std. Dwg. RD721. Return curb shall not reduce width of approaching sidewalk.
6. When 2 curb ramps are immediately adjacent, the curb exposure (E) between the adjacent side flares may range between 3" and full design exposure.
7. On or along state highways, curb and gutter is required at curb ramps.
8. Grade breaks at the top and bottom of curb ramp runs shall be perpendicular to the direction of the ramp run. Grade breaks shall not be permitted on the surface of ramp runs and turning spaces. Surface slopes that meet at grade breaks shall be flush.

LEGEND:

- Marked or intended crossing location
- Sidewalk
- Detectable warning surface
- Level area (Turning space/landing)
  Unobstructed 4.5' x 4.5'
  With obstruction 4.5' x 5.5' (Longer dimension in direction of pedestrian street crossing).
  For the purposes of this application, a max. 2.0% finished surface slope (for drainage) measured perpendicular in two directions is considered level.
- Cross slope 1.5% max. (Max. 2.0% finished surface slope) (Normal sidewalk cross slope)
- Running slope 7.5% max. (Max. 8.3% finished surface slope)
- Flare slope (Max. 10% finished surface slope)
- E — Curb height
- 4' x 4' clear space
- PAR

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

COMBINATION CURB RAMP

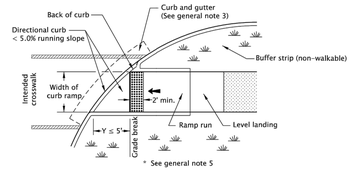
2021

DATE	REVISION DESCRIPTION
07-2020	NEW DRAWING CREATED
01-2022	REVISED DETAILS AND NOTES

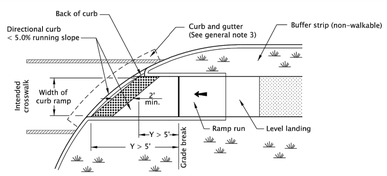
CALC. BOOK NO. N/A | SDR DATE 14-JAN-2022 | **RD936**

RD936.dgn 14-JAN-2022

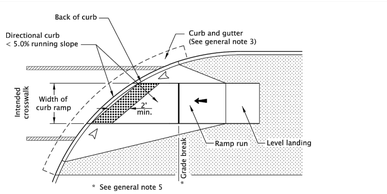
Effective Date: June 1, 2023 - November 30, 2023



CURB RAMP CROSSING
GRADE BREAK ≤ 5 FT. FROM BACK OF CURB



CURB RAMP CROSSING
GRADE BREAK > 5 FT. FROM BACK OF CURB



CURB RAMP CROSSING
DIRECTIONAL CURB WITH FLARED CONSTRUCTION

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Detectable warning surface details & locations are based on applicable ODOT Standards.
2. See project plans for details not shown.
   See Std. Dwgs. RD700 & RD701 for curbs.
   See Std. Dwg. RD902 for detectable warning surface installation details.
3. On or along state highways, curb and gutter is required at curb ramps.
4. Detectable warning surface placement for perpendicular ramps vary as shown.
5. Detectable warning surface placement across the grade break is prohibited.

LEGEND:

- Marked or intended crossing location
- Sidewalk
- Detectable warning surface
- Running slope 7.5% max. (Max. 8.3% finished surface slope)
- Flare slope (Max. 10.0% finished surface slope)

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

DETECTABLE WARNING SURFACE PLACEMENT FOR DIRECTIONAL CURBS

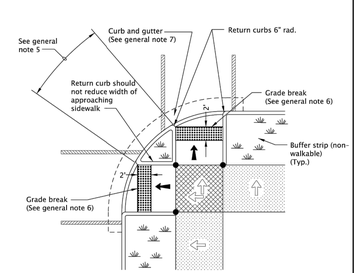
2021

DATE	REVISION DESCRIPTION
07-2020	NEW DRAWING CREATED
01-2022	REVISED NOTES

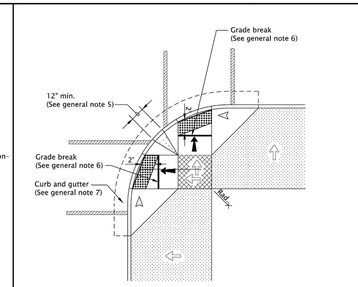
CALC. BOOK NO. N/A | SDR DATE 14-JAN-2022 | **RD905**

RD905.dgn 14-JAN-2022

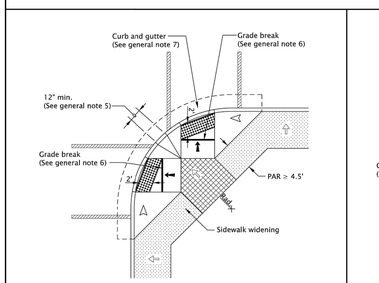
Effective Date: June 1, 2023 - November 30, 2023



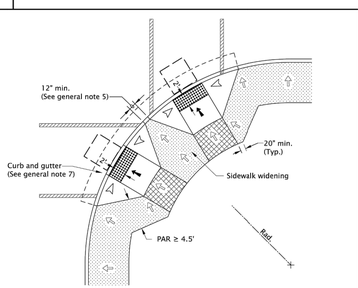
WITH LANDSCAPED BUFFER STRIP
OPTION "PR-1"



FOR WIDE SIDEWALKS
OPTION "PR-2"



FOR NARROW SIDEWALKS
OPTION "PR-3"



FOR NARROW SIDEWALKS
OPTION "PR-4"

GENERAL NOTES FOR ALL DETAILS ON THIS SHEET:

1. Curb ramp details are based on applicable ODOT Standards.
2. See project plans for details not shown.
   See Std. Dwgs. RD700 & RD701 for curbs.
   See Std. Dwgs. RD720 & RD721 for sidewalks.
   See Std. Dwg. RD910 for perpendicular curb ramp details.
   See Std. Dwgs. RD902 through RD908 for detectable warning surface installation details.
3. Tooled dummy joints are required at all curb ramp grade break lines, (see Std. Dwg. RD722).
4. Curb ramp slopes shown are relative to the true level horizon (zero bubble).
5. When 2 curb ramps are immediately adjacent, the curb exposure (E) between the adjacent side flares may range between 3" and full design exposure.
6. Grade breaks at the top and bottom of curb ramp runs shall be perpendicular to the direction of the ramp run. Grade breaks shall not be permitted on the surface of ramp runs and turning spaces. Surface slopes that meet at grade breaks shall be flush.
7. On or along state highways, curb and gutter is required at curb ramps.

LEGEND:

- Marked or intended crossing location
- Sidewalk
- Detectable warning surface
- Level area (Turning space/landing)
  Unobstructed 4.5' x 4.5'
  With obstruction 4.5' x 5.5' (Longer dimension in direction of pedestrian street crossing).
  For the purposes of this application, a max. 2.0% finished surface slope (for drainage) measured perpendicular in two directions is considered level.
- Cross slope 1.5% max. (Max. 2.0% finished surface slope) (Normal sidewalk cross slope)
- Running slope 7.5% max. (Max. 8.3% finished surface slope)
- Flare slope (Max. 10% finished surface slope)
- Zero curb exposure
- 4' x 4' clear space
- PAR — Pedestrian Access Route

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

PERPENDICULAR CURB RAMP

2021

DATE	REVISION DESCRIPTION
07-2020	NEW DRAWING CREATED
07-2021	REVISED DETAIL AND NOTES
01-2022	REVISED DETAILS AND NOTES NOTES

CALC. BOOK NO. N/A | SDR DATE 14-JAN-2022 | **RD912**

RD912.dgn 14-JAN-2022

Effective Date: June 1, 2023 - November 30, 2023

Otak, Inc.
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Portland, OR 97204
503. 287. 6825
www.otak.com

REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2008
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

STANDARD DETAILS III

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG | ZMG
DRAWN BY | CHECKED BY

FINAL PLANS
STATUS

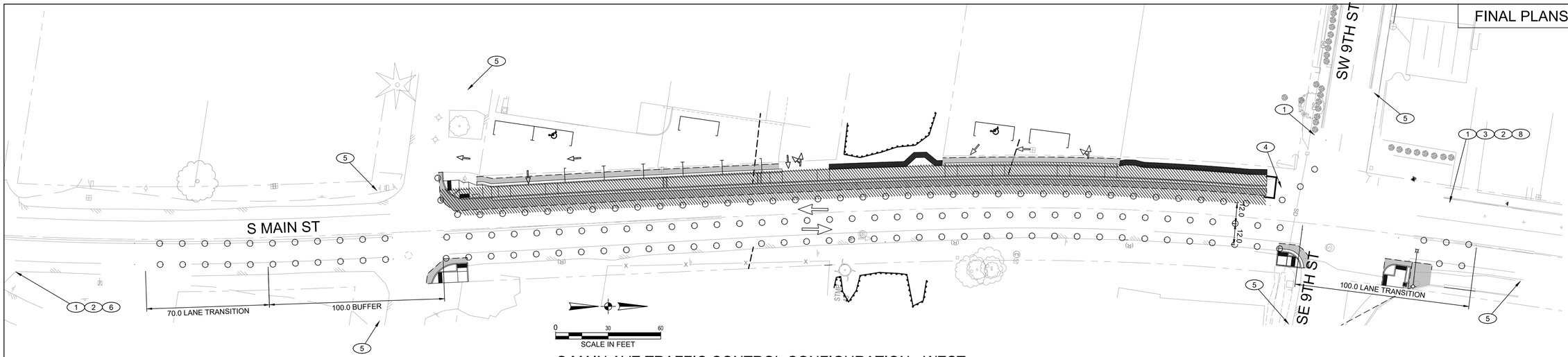
SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

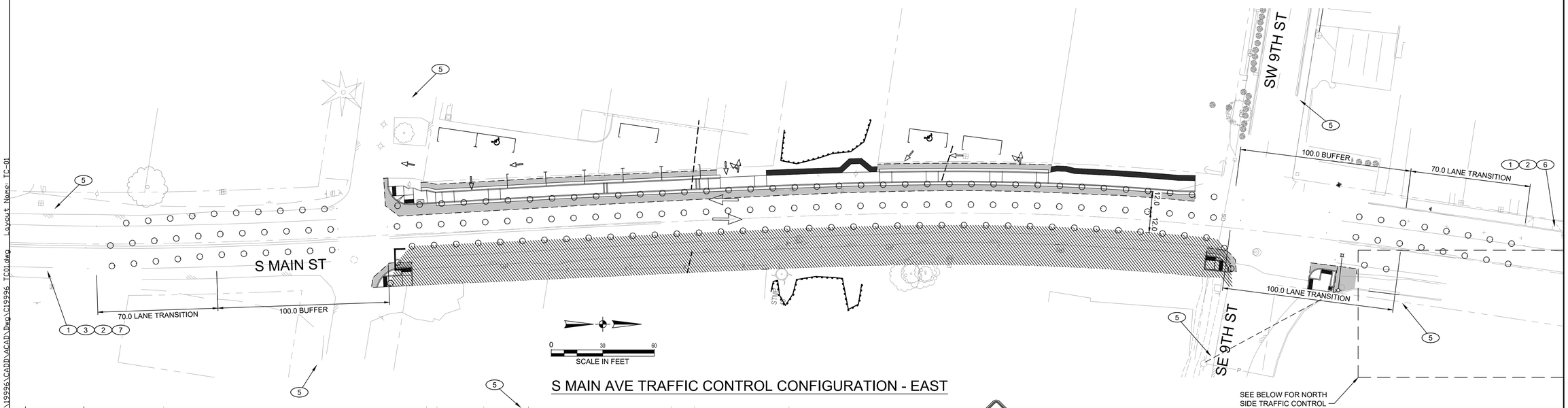
STD-03

Plotted: Sep 15, 2023 - 9:05am Jess.Bornsheuer V:\PROJECTS\19900\19996\CAD\DrACAD\Dwg\D19936_STD02.dwg Layout Name: STD-03

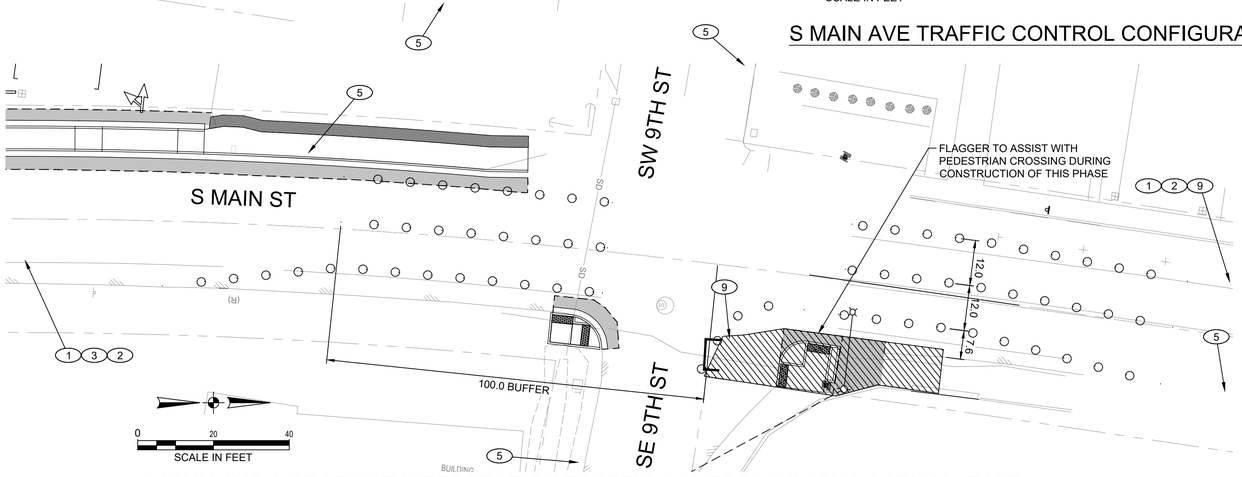
FINAL PLANS



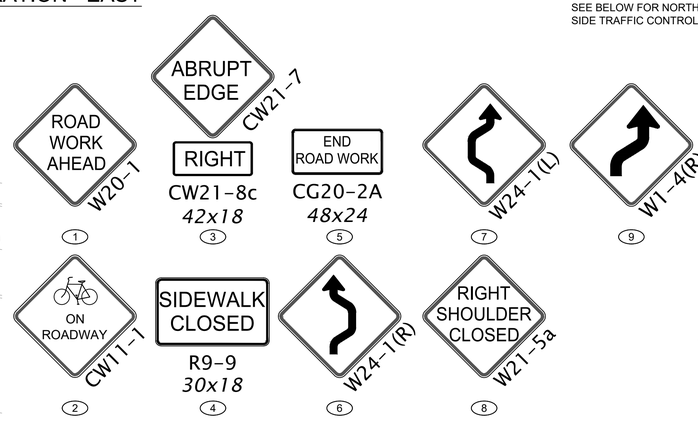
S MAIN AVE TRAFFIC CONTROL CONFIGURATION - WEST



S MAIN AVE TRAFFIC CONTROL CONFIGURATION - EAST



S MAIN AVE & SE 9TH ST INTERSECTION TRAFFIC CONTROL CONFIGURATION - EAST



GENERAL NOTES

1. SEE ODOT STANDARD DETAIL TM800 ON SHEET TC-02, FOR PROPER TCD SPACING TABLE AND ABRUPT EDGE DELINEATION.
2. SEE TC-02 FOR TCM STANDARD DRAWINGS TM821, TM822, AND TM850.
3. CONTRACTOR TO MAINTAIN 12' MINIMUM LANE WIDTHS AT ALL TIMES.
4. CONTRACTOR TO MAINTAIN BUSINESS ACCESS DURING CONSTRUCTION.
5. CONTRACTOR TO RESTORE CENTERLINE AND ORIGINAL LANE CONFIGURATION, WHEN NOT ENGAGED IN ACTIVE CONSTRUCTION, WHERE POSSIBLE.

LEGEND

- 28" TUBULAR MARKERS ON 28' MAX SPACING
- WORK ZONE
- TYPE III BARRICADE

Otak

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808 SW Third Avenue, Ste. 800
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www.otak.com

REGISTERED PROFESSIONAL ENGINEER
72,629
OREGON
JUNE 11, 2009
KEITH BUISMAN
EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

WORK ZONE TRAFFIC CONTROL

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88
DATUM

ZMG — DRAWN BY
ZMG — CHECKED BY

FINAL PLANS
STATUS

SEPTEMBER 2023
DATE

19996
PROJECT NUMBER

TC-01

Plotted: Sep 15, 2023 - 9:06am Jess.Bornsheuer V:\PROJECT\19300\19996\CADD\ACAD\Dwg\C19996_TC01.dwg Layout: None TC-01

TAPER TYPES & FORMULAS	
TAPER	FORMULA
Merging (Lane Closure)	"L"
Shifting	"L"/2 or ½"L"
Shoulder Closure	"L"/3 or ⅓"L"
Flagging (See Drg. TM850)	50' – 100'
Downstream (Termination)	Varies (See Drawings)

★ Use Pre-Construction Posted Speed to select the Speed from the Tables below:

TEMPORARY BARRIER FLARE RATE TABLE	
★SPEED (mph)	MINIMUM FLARE RATE
≤ 30	8:1
35	9:1
40	10:1
45	12:1
50	14:1
55	16:1
60	18:1
65	19:1
70	20:1

MINIMUM LENGTHS TABLE					
"L" VALUE FOR TAPERS (ft)					BUFFER "B" (ft)
★ SPEED (mph)	W = Lane or Shoulder Width being closed or shifted				
	W ≤ 10	W = 12	W = 14	W = 16	
25	105	125	145	165	75
30	150	180	210	240	100
35	205	245	285	325	125
40	265	320	375	430	150
45	450	540	630	720	180
50	500	600	700	800	210
55	550	660	770	880	250
60	600	720	840	960	285
65	650	780	910	1000	325
70	700	840	980	1000	365
FREEWAYS					
55	1000	1000	1000	1000	250
60	1000	1000	1000	1000	285
65	1000	1000	1000	1000	325
70	1000	1000	1000	1000	365

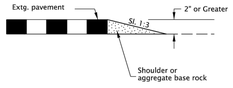
NOTES:
- For Lane closures where W < 10', use "L" value for W = 10'.
- For Shoulder closures where W < 10', use "L" value for W = 10' or calculate "L" using formula, for Speeds ≥ 45: L = WS, Speeds < 45: L = S²W/60, S = Speed, W=Width

TRAFFIC CONTROL DEVICES (TCD) SPACING TABLE				
★ SPEED (mph)	Sign Spacing (ft)			Max. Channelizing Device Spacing (ft)
	A	B	C	
20 – 30	100	100	100	20
35 – 40	350	350	350	20
45 – 55	500	500	500	40
60 – 70	700	700	700	40
Freeway	1000	1500	2640	40

NOTES:
- Place traffic control devices on 10 ft. spacing for intersection and access radii.
- When necessary, sign spacing may be adjusted to fit site conditions. Limit spacing adjustments to 30% of the "A" dimension for all speeds.

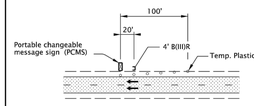
TM800.dgn 01-JUL-2022

NOTES:
- When paved shoulders adjacent to excavations are less than four feet wide protect longitudinal abrupt edge as shown.
- Use aggregate wedge when abrupt edge is 2 inches or greater.



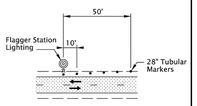
EXCAVATION ABRUPT EDGE

NOTES:
- Install PCMS beyond the outside shoulder, when possible.
- Use the appropriate type of barricade panels for PCMS location. Right shoulder, use Type BIII(R) Left shoulder, use Type BIII(L)
- Use six drums in shoulder taper on 20' spacing. The drums and barricade may be omitted when PCMS is placed behind a roadside barrier.
- Detail as shown is used for trailered and non-crashworthy components of:
  - Portable Traffic Signals
  - Smart Work Zone Systems



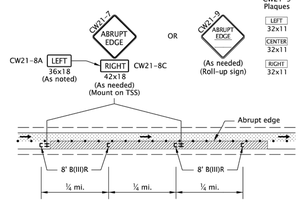
PORTABLE CHANGEABLE MESSAGE SIGN (PCMS) INSTALLATION

NOTES:
- Install Flagger Station Lighting beyond the outside shoulder, where practical.
- Use six tubular markers in shoulder taper on 10' spacing.
- Place cart / generator / power supply off of the shoulder, as far as practical.



FLAGGER STATION LIGHTING DELINEATION

NOTES:
- Abrupt edges may be created by paving, operations, excavations or other roadway work. Use abrupt edge signing for longitudinal abrupt edges of 1 inch or greater.
- If the excavation is located on left side of traffic, replace the 8' BIII(R) barricades with 8' BIII(L) barricades and replace the "RIGHT" (CW21–8C) riders with "LEFT" (CW21–8A) riders.
- Continue signing and other traffic control devices throughout excavation area at spacings shown.
- If roll-up signs are used, attach the correct (CW21–9) plaques to the sign face using hook and loop fasteners. Place roll-up signs in advance of barricades.



TYPICAL ABRUPT EDGE DELINEATION

GENERAL NOTES FOR ALL TCP DRAWINGS:
- Signs and other Traffic Control Devices (TCD) shown are the minimum required.
- Place a barricade approx. 20' ahead of all sequential arrow boards.
- Arrows shown in roadway are directional arrows to indicate traffic movements.
- All signs are 48" x 48" unless otherwise shown. Use fluorescent orange sheeting for the background of all temporary warning signs.
- All diamond shaped warning signs mounted on barrier sign supports shall be 36" by 36". All other signs mounted on barrier sign supports shall not exceed 12 sq. ft. in total sign area.
- Low speed highways have a pre–construction posted speed of 40 mph or less. High speed highways have a pre–construction posted speed of 45 mph or higher.
- Do not locate sign supports in locations designated for bicycle or pedestrian traffic.
- Combine drawing details to complete temporary traffic control for each work activity.
- Coordinate and control pedestrian movements through a Temporary Accessible Route using Flaggers, Traffic Control Measures, or as directed.
- To be accompanied by Dwg. Nos. TM820 & TM821.

Temp. Plastic Drums See TCD Spacing Table for max. spacing.
28" Tubular Markers See TCD Spacing Table for max. spacing.
UNDER TRAFFIC
UNDER CONSTRUCTION

The selection and use of this Standard Drawing, while designed in accordance with generally accepted engineering principles and practices, is the sole responsibility of the user and should not be used without first consulting a Registered Professional Engineer.

All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

TABLES, ABRUPT EDGE AND PCMS DETAILS

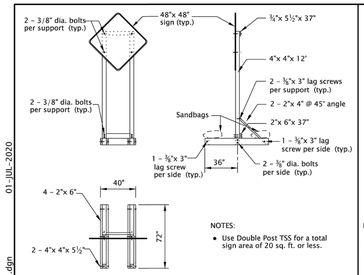
2021

DATE	REVISION DESCRIPTION
07-2022	Added a note for TPARs

CALC BOOK NO. N/A | SDR DATE 01-JUL-2022 | **TM800**

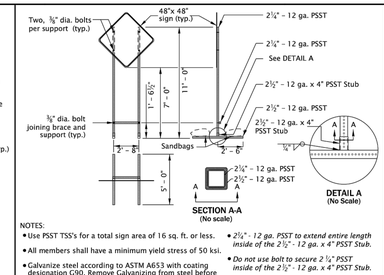
Effective Date: June 1, 2023 – November 30, 2023

TM821.dgn 01-JUL-2020



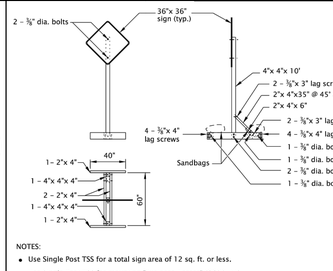
NOTES:
- Use Double Post TSS for a total sign area of 20 sq. ft. or less.

DOUBLE POST DETAIL



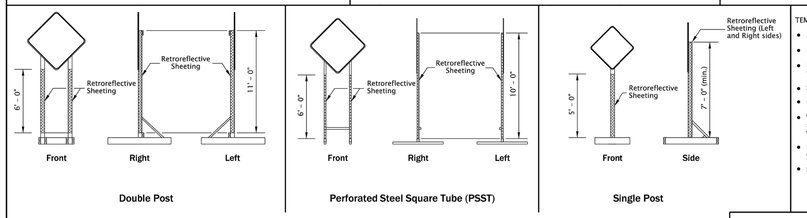
NOTES:
- Use PSST TSS's for a total sign area of 16 sq. ft. or less.
- All members shall have a minimum yield stress of 50 ksi.
- Galvanize steel according to ASTM A653 with coating designation G90. Remove Galvanizing from steel before welding. Repair Galvanizing according to ASTM A780.
- Use A325 Bolts or equivalent.
- *2¼" - 12 ga. PSST to extend entire length inside of the 2½" - 12 ga. x 4" PSST Stub.*
- *Do not use bolt to secure 2 ½" PSST inside of the 2½" - 12 ga. x 4" PSST Stub.*
- *Weld steel according to American Welding Society (AWS) D.1.1.*

PERFORATED STEEL SQUARE TUBE (PSST) DETAIL



NOTES:
- Use Single Post TSS for a total sign area of 12 sq. ft. or less.
- Use Single Post TSS for mounting "Business Access" (CG20–11) signs. Do not mount signs on Type II or III Barricades.

SINGLE POST DETAIL



TEMPORARY SIGN SUPPORT GENERAL NOTES:
- Do not tip over TSS at any time.
- Do not locate TSS's in locations that block pedestrian or bicycle traffic.
- For wooden TSS's, use either Douglas Fir or Hem Fir, which is surfaced four sides (S4S) and free of heart center (FOHC).
- See "Temporary Sign Placement" detail on TM822 for sign installation heights.
- Do not place or stack ballast more than 24" above the ground.
- When sign is inconsistent with current work zone conditions, cover sign: or turn sign 90 degrees away from approaching traffic. Remove TSS from roadway when signing is not needed for more than 3 days.
- Place a minimum of 50 lbs of sandbags on each of the four TSS supports legs. (25 lb. max per bag) (min. 100 lbs per side of each TSS).
- See Dwg. No. TM204 for flag board mounting detail.

NOTES:
- Apply fluorescent orange, ANSI Type VIII or IX retroreflective sheeting to TSS posts, as shown, for all temporary signs, except "STOP" and "DO NOT ENTER". For "STOP" and "DO NOT ENTER" signs, used red ANSI Type III or IV retroreflective sheeting on the TSS posts.
- Apply sign post retroreflectivity to each TSS post facing front; and to the left and right sides of the TSS, as shown. Use 3" wide sheeting for wood post TSS's. Use 2" wide sheeting for PSST TSS's.
- Sheeting may be applied directly to post material; or applied to a rigid, lightweight substrate, then securely attached to the posts.

SIGN POST REFLECTIVE SHEETING PLACEMENT

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

TEMPORARY SIGN SUPPORTS

2021

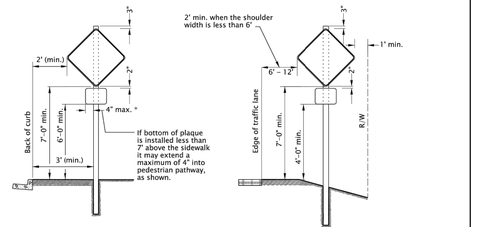
DATE	REVISION DESCRIPTION

CALC BOOK NO. N/A | SDR DATE 01-JUL-2020 | **TM821**

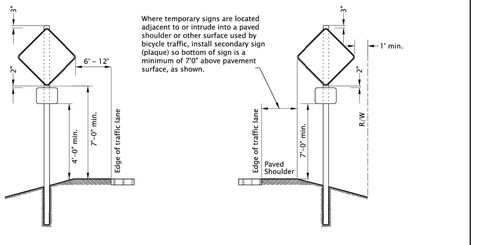
Effective Date: June 1, 2023 – November 30, 2023

TM822.dgn 01-JUL-2020

NOTES:
- Do not block bicycle lanes, sidewalks, or TPAR's with sign supports. Maintain minimum widths for these facilities according TCP Design Manual, MUTCD, ADA, or as directed.
- To be accompanied by Dwg. Nos. TM670, TM671, TM687, TM688 & TM689.

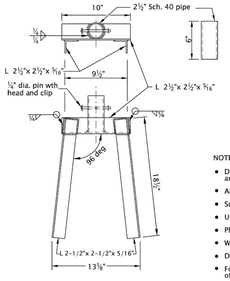


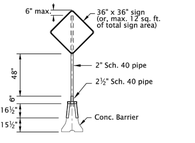
Urban Areas With Curb/Sidewalk | **Rural Areas**



Divided Highway/Freeway Medians No Curb/Sidewalk | **Rural or Urban Areas - Curb or No Curb Bicycles On Shoulder**

TEMPORARY SIGN PLACEMENT





NOTES:
- Drill additional holes so sign can be rotated 90 degrees and pinned when not in use.
- All structural steel shall conform to ASTM A36.
- Support fits both 32" and 42" tall "F" barrier.
- Use for supporting a maximum 12 sq. ft. of total sign area.
- Place support at connection between two concrete barrier sections.
- Weld steel according to American Welding Society (AWS) D.1.1.
- Do not use clipped signs.
- Follow manufacturer recommendation when installing signs on barrier other than concrete.

CONCRETE BARRIER SIGN SUPPORT

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

TEMPORARY SIGN SUPPORTS

2021

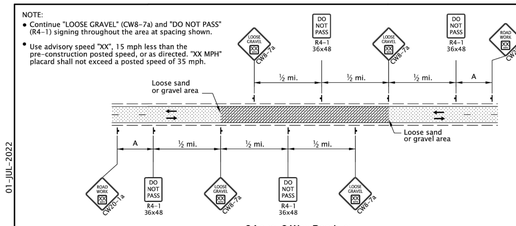
DATE	REVISION DESCRIPTION

CALC BOOK NO. N/A | SDR DATE 01-JUL-2020 | **TM822**

Effective Date: June 1, 2023 – November 30, 2023

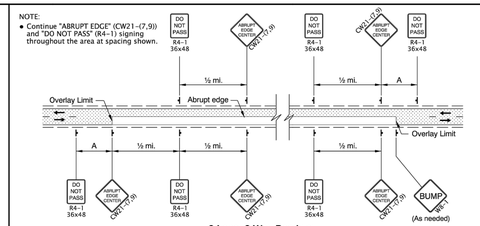
TM850.dgn 01-JUL-2022

NOTE:
- Continue "LOOSE GRAVEL" (CW8-7a) and "DO NOT PASS" (R4-1) signing throughout the area at spacing shown.
- Use advisory speed "XX", 15 mph less than the pre-construction posted speed, or as directed. "XX MPH" placard shall not exceed a posted speed of 35 mph.



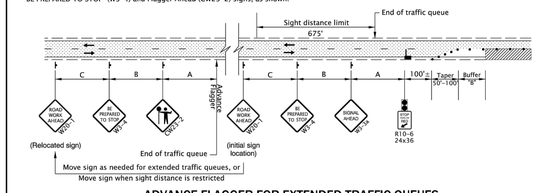
2-Lane, 2-Way Roadway
LOOSE GRAVEL IN ROADWAY SIGNING

NOTE:
- Continue "ABRUPT EDGE" (CW21-(7,9)) and "DO NOT PASS" (R4-1) signing throughout the area at spacing shown.



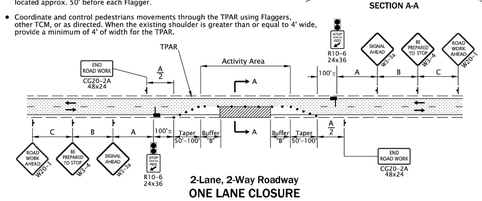
2-Lane, 2-Way Roadway
OVERLAY AREA SIGNING

NOTES:
- Place Advance Flagger and additional signing when traffic queues extend beyond initial warning signing OR when sight distance is restricted.
- Relocate initial "ROAD WORK AHEAD" (W20–1) sign in advance of additional "BE PREPARED TO STOP" (W3–4) and Flagger Ahead (CW23–2) signs, as shown.
- Place additional Tubular Markers for Flagger and Advance Flagger Stations according to FLAGGER STATION DELINEATION detail.



ADVANCE FLAGGER FOR EXTENDED TRAFFIC QUEUES

NOTE:
- When using pilot cars with flaggers to control traffic during paving operations, the Tubular Marker spacing along centerline may be increased to 200' within the Activity Area, as shown or as directed.
- Include "WAIT FOR FLAGGER" (CR4–23) signs mounted on Type II Barricade located approx. 50' before each Flagger.
- Coordinate and control pedestrians movements through the TPAR using Flaggers, other TCM, or as directed. When the existing shoulder is greater than or equal to 4' wide, provide a minimum of 4' of width for the TPAR.

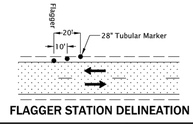


2-Lane, 2-Way Roadway
ONE LANE CLOSURE

GENERAL NOTES FOR ALL DETAILS:
- The "SIGNAL AHEAD" (W3–3a) sign may be substituted with the Signal Ahead (W3–3) symbol sign.
- Cover existing passing zone signing, as directed.
- Install temporary striping as required.
- To determine Taper Length ("L") and Buffer Length ("B"), use the "MINIMUM LENGTHS TABLE" shown on Dwg. No. TM800.
- To determine sign spacing A, B, and C, use "TRAFFIC CONTROL DEVICES (TCD) SPACING TABLE" on Dwg. No. TM800.
- Install a "BICYCLES ON ROADWAY" (CW11–1) sign in advance of the closure when a bike lane is closed, or when the shoulder is closed and bikes are expected.
- At night, flagger stations shall be illuminated according to the FLAGGER STATION LIGHTING DELINEATION detail on Dwg No. TM800.
- To be accompanied by Dwg. Nos. TM820, TM821 & TM854.

Automated Flagging Assistance Device (AFAD)
28" Tubular Markers on 20' max. spacing for flagger tapers and stations
28" Tubular Markers See TCD Spacing Table on TM800 for max. spacing.
UNDER TRAFFIC
UNDER CONSTRUCTION
CONSTRUCTION UNDER TRAFFIC

NOTE:
- Use a minimum of 3 tubular markers in shoulder taper on 10' spacing for flagger station delineation.



FLAGGER STATION DELINEATION

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All materials shall be in accordance with the current Oregon Standard Specifications.

OREGON STANDARD DRAWINGS

2-LANE, 2-WAY ROADWAYS

2021

DATE	REVISION DESCRIPTION
01-2022	Added AFADs to drawing.

CALC BOOK NO. N/A | SDR DATE 01-JUL-2022 | **TM850**

Effective Date: June 1, 2023 – November 30, 2023

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REGISTERED PROFESSIONAL ENGINEER 72,629 OREGON JUNE 11, 2008 KEITH BUISMAN

EXPIRES: 12/31/2023

WARRENTON MAIN AVE AT 9TH ST SRTS

WARRENTON, OREGON

WORK ZONE TRAFFIC CONTROL DETAILS

TITLE

#	DATE	DESCRIPTION

REVISIONS

NAVD 88

DATUM

ZMG | ZMG

DRAWN BY | CHECKED BY

FINAL PLANS

STATUS

SEPTEMBER 2023

DATE

19996

PROJECT NUMBER

TC-02

Plotted: Sep 15, 2023 - 9:06am Jess.Bornsheuer V:\PROJECT\19990\19996\CAD\TCAD\Dwg\C19996_TC01.dwg Layout: None TC-02