



WARNING
POWER LINES
OVERHEAD

Know what's below.
Call before you dig.

LEGEND

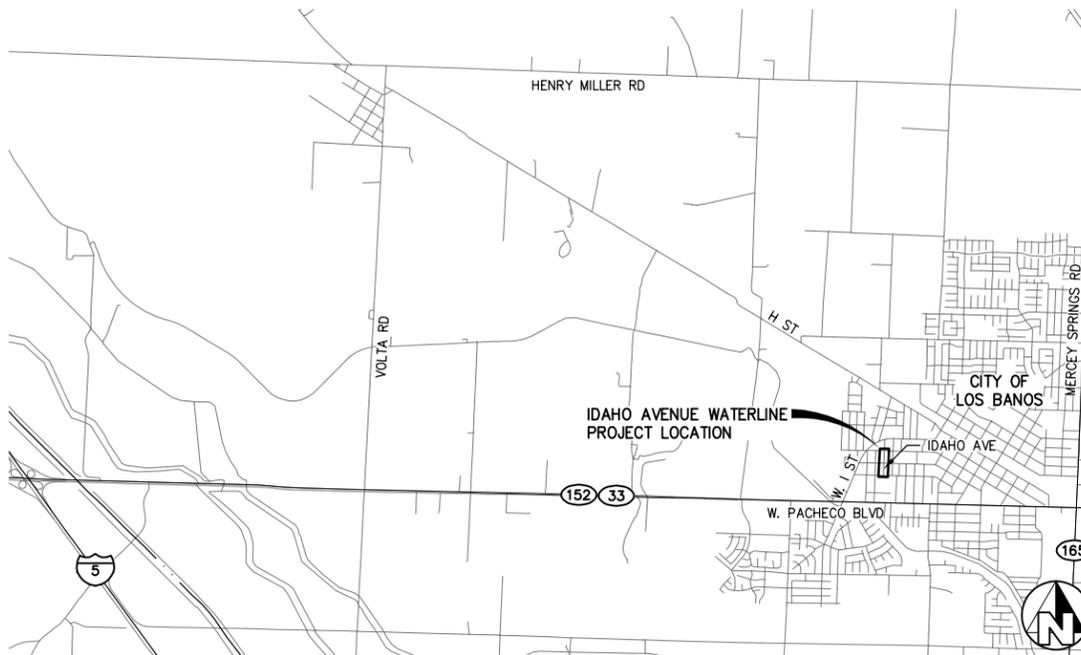
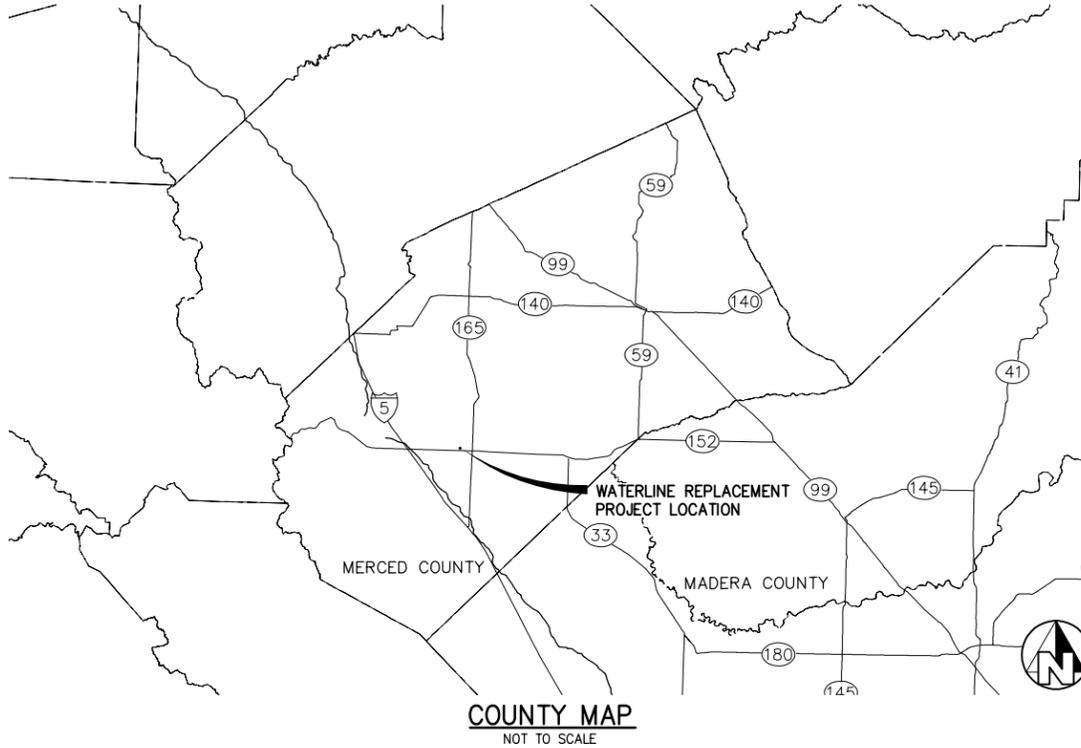
Table with 2 columns: Symbol and Description. Includes entries for (E) BURIED COMPUTER/COMM., (E) AERIAL ELECTRIC, (E) BURIED ELECTRIC, (E) GAS, (E) SANITARY SEWER, (E) STORM DRAINAGE, (E) WATER, (P) WATER, (P) WATER SERVICE, CENTERLINE, PROPERTY LINE, RIGHT-OF-WAY, REVISION CLOUD, SAWCUT LINE, UTILITY POLE, UTILITY POLE ANCHOR, SANITARY SEWER MANHOLE, STORM DRAIN INLET, STORM DRAIN MANHOLE, SIGN, CONTROL POINT, BENCHMARK, IRON PIPE, MONUMENT, FIRE HYDRANT, WATER METER, WATER VALVE, REVISION, CONSTRUCTION CALLOUT, DETAIL NUMBER, SHEET NUMBER.

ABBREVIATIONS

Table with 2 columns: Abbreviation and Full Name. Includes entries for AB AGGREGATE BASE, AC ASPHALT CONCRETE, AGG AGGREGATE, APN ASSESSOR'S PARCEL NUMBER, ARV AIR RELIEF VALVE, ASTM AMERICAN SOCIETY FOR TESTING AND MATERIALS, AV AIR VENT, AVE AVENUE, AWWA AMERICAN WATER WORKS ASSOCIATION, BD BRASS DISK, BM BENCHMARK, C CONC CONCRETE, CA CALIFORNIA, CFS CUBIC FEET PER SECOND, CL CENTERLINE, CNS COMPACTED NATIVE SOIL, COLB CITY OF LOS BANOS, DEMO DEMOLISH/DEMOLITION, DI DROP INLET, DIA, Ø DIAMETER, DWG DRAWING, (E) EXISTING, EAST, EA EACH, EL, ELEV ELEVATION, ELL ELBOW, EP EDGE OF PAVEMENT, F&I FURNISH & INSTALL, FH FIRE HYDRANT, FT FOOT/FEET, GS GAS, ID INSIDE DIAMETER, INV INVERT, LF LINEAR FEET, MAX MAXIMUM, MH MANHOLE, MIN MINIMUM, NAVD NORTH AMERICAN VERTICAL DATUM, NGVD NATIONAL GEODETIC VERTICAL DATUM, NTS NOT TO SCALE, OC ON CENTER, OD OUTSIDE DIAMETER, OSHA OCCUPATIONAL SAFETY & HEALTH ADMINISTRATION, (P) PROPOSED, PIP PLASTIC IRRIGATION PIPE, PL PROPERTY LINE, PVC POLYVINYL CHLORIDE, RD RELATIVE DENSITY, ROAD, R/W RIGHT OF WAY, S SLOPE, SCH SCHEDULE, SD STORM DRAIN, SF SQUARE FEET, SPEC SPECIFICATION, SS SANITARY SEWER, SS OR STS STAINLESS STEEL, SSMH SANITARY SEWER MANHOLE, STA STATION, STD STANDARD, STL STEEL, TBM TEMPORARY BENCHMARK, TYP TYPICAL, W WATER, W/ WITH, W/O WITHOUT.

CITY OF LOS BANOS
MERCED COUNTY

IDAHO AVENUE WATERLINE REPLACEMENT



GENERAL NOTES

- 1. CITY OF LOS BANOS (209-827-7056) SHALL BE CONTACTED AT LEAST 48 HOURS PRIOR TO COMMENCEMENT OF WORK ON OR NEAR EXISTING CITY FACILITIES.
- 2. USED MATERIAL, REJECTS, MISFITS, OR SECONDS, ETC. ARE NOT ACCEPTABLE FOR USE ON CITY OF LOS BANOS FACILITIES.
- 3. ALL CONSTRUCTION SHALL BE IN CONFORMANCE WITH THESE PLANS, PROJECT SPECIFICATIONS AND CITY OF LOS BANOS SPECIFICATIONS.
- 4. CONTRACTOR SHALL FIELD VERIFY THE HORIZONTAL AND VERTICAL LOCATIONS OF ALL EXISTING FACILITIES PRIOR TO COMMENCING WORK. CALL UNDERGROUND SERVICE ALERT (USA) AT 8-1-1. CONTRACTOR SHALL MAKE ENGINEER AWARE OF ANY DISCREPANCIES.
- 5. ALL CAST-IN-PLACE CONCRETE STRUCTURES SHALL BE FORMED INSIDE AND OUT AND CONCRETE VIBRATED SUFFICIENTLY TO PROVIDE FOR SMOOTH SURFACED WALLS/FLOORS WITHOUT VOIDS AND HONEYCOMBS.
- 6. CITY OF LOS BANOS SHALL INSPECT ALL WORK PHASES ON CONCRETE FACILITIES FOR CONFORMANCE TO CITY OF LOS BANOS SPECIFICATIONS. REINFORCING SHALL NOT BE ENCASED IN CONCRETE WITHOUT PRIOR CITY OF LOS BANOS INSPECTIONS. LIKEWISE, CONCRETE SHALL NOT BE COVERED WITH EARTH PRIOR TO CITY OF LOS BANOS INSPECTION.
- 7. CONCRETE DESIGN MIX SHALL BE SUBMITTED TO THE ENGINEER FOR REVIEW AND APPROVAL. NO MONOLITHIC CONCRETE PLACEMENT ALLOWED IN CITY RIGHT OF WAY. ALL CONCRETE SHALL HAVE A 28-DAY MINIMUM COMPRESSIVE STRENGTH OF 3000 PSI UNLESS OTHERWISE SPECIFIED.
- 8. ALL NUTS, BOLTS, AND WASHERS USED TO SECURE UNDERGROUND FITTINGS SHALL BE STAINLESS STEEL. AFTER INSTALLATION, ALL STEEL HARDWARE SHALL BE COATED WITH A RUST PREVENTATIVE, WRAPPED WITH 4 MIL POLYETHYLENE SHEETING, AND SECURE WITH PVC TAPE.
- 9. THRUST RESTRAINTS TO BE PROVIDED AT ALL PIPELINE BENDS, WHETHER OR NOT SHOWN ON THE PLANS.
- 10. ALL CONSTRUCTION SHALL BE PERFORMED IN ACCORDANCE WITH APPLICABLE HEALTH AND SAFETY LAWS OF THE STATE OF CALIFORNIA AND CAL/OSHA STANDARDS.
- 11. TRENCH BACKFILL SHALL BE COMPACTED IN ACCORDANCE WITH THE PLANS AND CITY OF LOS BANOS SPECIFICATIONS.
- 12. CONTRACTOR WILL BE RESPONSIBLE FOR THE REPAIR OF ALL PIPELINE CRACKS, WHICH DEVELOP DURING CONSTRUCTION OF IMPROVEMENTS AFFECTING EXISTING FACILITIES.
- 13. CONCRETE VAULTS AND BOXES MAY BE PURCHASED FROM A PRECAST MANUFACTURER OR CONTRACTOR MAY CONSTRUCT THE STRUCTURES IF STRUCTURAL CALCULATIONS AND DESIGN IS APPROVED BY THE CITY OF LOS BANOS AND THE ENGINEER.
- 14. ALL EXCESS MATERIAL AND/OR DEBRIS SHALL BE REMOVED UPON COMPLETION OF INSTALLATION.
- 15. CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ADEQUATE DUST CONTROL AT ALL TIMES.
- 16. A TRAFFIC CONTROL PLAN SHALL BE SUBMITTED TO AND APPROVED BY THE CITY PRIOR TO CONSTRUCTION.

SHEET INDEX

SHEET NO.	DESCRIPTION
50% CONSTRUCTION DOCUMENTS	
1	COVER SHEET
2	SITE PLAN, TOPOGRAPHY AND DEMOLITION
3	SITE PLAN, TOPOGRAPHY AND DEMOLITION
4	STA 10+00 TO 14+50
5	STA 14+50 TO 19+04
6	DETAILS
7	DETAILS

TOPOGRAPHY NOTE
TOPOGRAPHY SHOWN HEREON WAS COLLECTED BY PROVOST AND PRITCHARD CONSULTING GROUP DURING A FIELD SURVEY CONDUCTED IN DECEMBER OF 2018.

RIGHT-OF-WAY NOTE
THE RIGHT-OF-WAY INFORMATION SHOWN ON THESE PLANS IS BASED UPON RECORD ROAD WIDTHS AND WAS LAID OUT USING EXISTING IMPROVEMENTS, AND WAS PREPARED UNDER THE DIRECTION OF BRYAN W. BOWERS, PLS 8469.

BENCHMARKS
PROJECT BENCHMARK
#104 - MAG NAIL
ELEVATION = 118.47'
TBM #105 - MAG NAIL
ELEVATION = 117.28'
TBM #106 - MAG NAIL
ELEVATION = 119.26'

MATERIAL QUANTITIES

ITEM	QUANTITY	UNIT
CONNECTION TO EXISTING WATER MAIN	3	EA
F&I 8" C-900 DR14 PVC WATER MAIN	910	LF
F&I 10X10X8-INCH TEE	1	EA
F&I 8X8X6X6-INCH CROSS	1	EA
F&I 6X6X6-INCH TEE	1	EA
F&I 8" GATE VALVE	4	EA
F&I 6" GATE VALVE	1	EA
F&I 8" REDUCER	1	EA
F&I 6" REDUCER	1	EA
F&I 8" PIPE BENDS	7	EA
INSTALL 1" WATER SERVICE	27	EA
F&I FIRE HYDRANT ASSEMBLY	2	EA
F&I COMBINATION AIR RELEASE VALVE	1	EA
R&R CURB RETURN AND ACCESS RAMP PER CALTRANS STANDARD PLAN A88A MODIFIED CASE C	2	EA
F&I CONCRETE SIDEWALK	1,353	SF
F&I CONCRETE CURB AND GUTTER	271	LF
R&R CONCRETE RESIDENTIAL DRIVE APPROACH	1	EA
F&I AC TRENCH PATCH	1,380	LF
F&I AC REPLACEMENT AT GUTTER PAN	406	LF

APPROVALS

CITY OF LOS BANOS	DATE
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SPECIAL NOTE
WHERE UNDERGROUND AND SURFACE STRUCTURES ARE SHOWN ON THE PLANS, THE LOCATIONS, DEPTH AND DIMENSIONS OF STRUCTURES ARE BELIEVED TO BE REASONABLY CORRECT, BUT ARE NOT GUARANTEED. SUCH STRUCTURES ARE SHOWN FOR THE INFORMATION OF THE CONTRACTOR, BUT INFORMATION SO GIVEN IS NOT TO BE CONSTRUED AS A REPRESENTATION THAT SUCH STRUCTURES WILL, IN ALL CASES, BE FOUND WHERE SHOWN, OR THAT THEY REPRESENT ALL OF THE STRUCTURES WHICH MAY BE ENCOUNTERED.

SITE SAFETY AND PROTECTION NOTES
THE DUTY OF THE ENGINEER, OWNER OR ITS AGENTS TO CONDUCT CONSTRUCTION REVIEW OF THE CONTRACTOR'S PERFORMANCE AND THE UNDERTAKING OF INSPECTIONS OR THE GIVING OF INSTRUCTIONS AS AUTHORIZED HEREIN IS NOT INTENDED TO INCLUDE REVIEW OF THE ADEQUACY OF THE CONTRACTOR'S SAFETY MEASURES IN, ON, OR NEAR THE CONSTRUCTION SITE AND SHALL NOT BE CONSTRUED AS SUPERVISION OF THE ACTUAL CONSTRUCTION NOR MAKE THE ENGINEER, OWNER OR ITS AGENTS RESPONSIBLE FOR PROVIDING A SAFE PLACE FOR THE PERFORMANCE OF WORK BY THE CONTRACTOR, SUBCONTRACTORS, OR SUPPLIERS, OR FOR ACCESS, VISITS, USE, WORK, TRAVEL OR OCCUPANCY BY ANY PERSON.

THE CONTRACTOR SHALL HAVE AT THE WORK SITE, COPIES OR SUITABLE EXTRACTS OF CONSTRUCTION SAFETY ORDERS, ISSUED BY CAL-OSHA. CONTRACTOR SHALL COMPLY WITH PROVISIONS OF THESE AND ALL OTHER APPLICABLE LAWS, ORDINANCES AND REGULATIONS. THE CONTRACTOR MUST COMPLY WITH PROVISIONS OF THE SAFETY AND HEALTH REGULATIONS FOR CONSTRUCTION, PROMULGATED BY THE SECRETARY OF LABOR UNDER SECTION 107 OF THE CONTRACT WORK HOURS AND SAFETY STANDARDS ACT, AS SET FORTH IN TITLE 29 C.F.R.

TO PROTECT THE LIVES AND HEALTH OF CONTRACTOR'S EMPLOYEES UNDER THE CONTRACT, THE CONTRACTOR SHALL COMPLY WITH ALL PERTINENT PROVISIONS OF THE "MANUAL OF ACCIDENT PREVENTION IN CONSTRUCTION" ISSUED BY THE ASSOCIATED GENERAL CONTRACTORS OF AMERICA, INC., AND SHALL MAINTAIN AN ACCURATE RECORD OF ALL CASES OF DEATH, OCCUPATIONAL DISEASE, AND INJURY REQUIRING MEDICAL ATTENTION OR CAUSING LOSS OF TIME FROM WORK, ARISING OUT OF AND IN THE COURSE OF EMPLOYMENT OR WORK UNDER THE CONTRACT.

THE CONTRACTOR ALONE SHALL BE RESPONSIBLE FOR THE SAFETY, EFFICIENCY, AND ADEQUACY OF CONTRACTOR'S FACILITIES, APPLIANCES, AND METHODS AND FOR ANY DAMAGE, WHICH MAY RESULT FROM THEIR FAILURE OR THEIR IMPROPER CONSTRUCTION, MAINTENANCE OR OPERATION.

THE CONTRACTOR AGREES THAT IT SHALL ASSUME SOLE AND COMPLETE RESPONSIBILITY FOR JOB SITE CONDITIONS DURING THE COURSE OF CONSTRUCTION OF THIS PROJECT, INCLUDING SAFETY OF ALL PERSONS AND PROPERTY; THAT THIS REQUIREMENT SHALL APPLY CONTINUOUSLY AND NOT BE LIMITED TO NORMAL WORKING HOURS; AND THAT THE CONTRACTOR SHALL DEFEND, INDEMNIFY AND HOLD THE OWNER, PROVOST & PRITCHARD CONSULTING GROUP, AND THEIR RESPECTIVE AGENTS HARMLESS FROM ANY AND ALL LIABILITY, REAL OR ALLEGED, IN CONNECTION WITH THE PERFORMANCE OF WORK ON THIS PROJECT, EXCEPTING FOR LIABILITY ARISING FROM THE SOLE NEGLIGENCE OF OWNER, ENGINEER, OR THEIR RESPECTIVE AGENTS.

THE OWNER AND ITS AGENTS' SITE RESPONSIBILITIES ARE LIMITED SOLELY TO THE ACTIVITIES OF THEIR EMPLOYEES ON SITE. THESE RESPONSIBILITIES SHALL NOT BE INFERRED BY ANY PARTY TO MEAN THAT THE OWNER OR ITS AGENTS HAVE RESPONSIBILITY FOR SITE SAFETY, SAFETY IN, ON, OR ABOUT THE SITE IS THE SOLE AND EXCLUSIVE RESPONSIBILITY OF THE CONTRACTOR ALONE. THE CONTRACTOR'S METHODS OF WORK PERFORMANCE, SUPERINTENDENCE AND THE CONTRACTOR'S EMPLOYEES, AND SEQUENCING OF CONSTRUCTION ARE ALSO THE SOLE AND EXCLUSIVE RESPONSIBILITIES OF THE CONTRACTOR ALONE.

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BID SET 2/4/19

NO.	REVISION	BY	DATE



IDAHO AVENUE WATERLINE REPLACEMENT
CITY OF LOS BANOS
MERCED COUNTY
BID SET
COVER SHEET

DESIGN ENGINEER:
DENA R. TRAINA
LICENSE NO:
35580

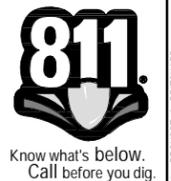
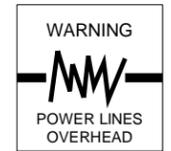
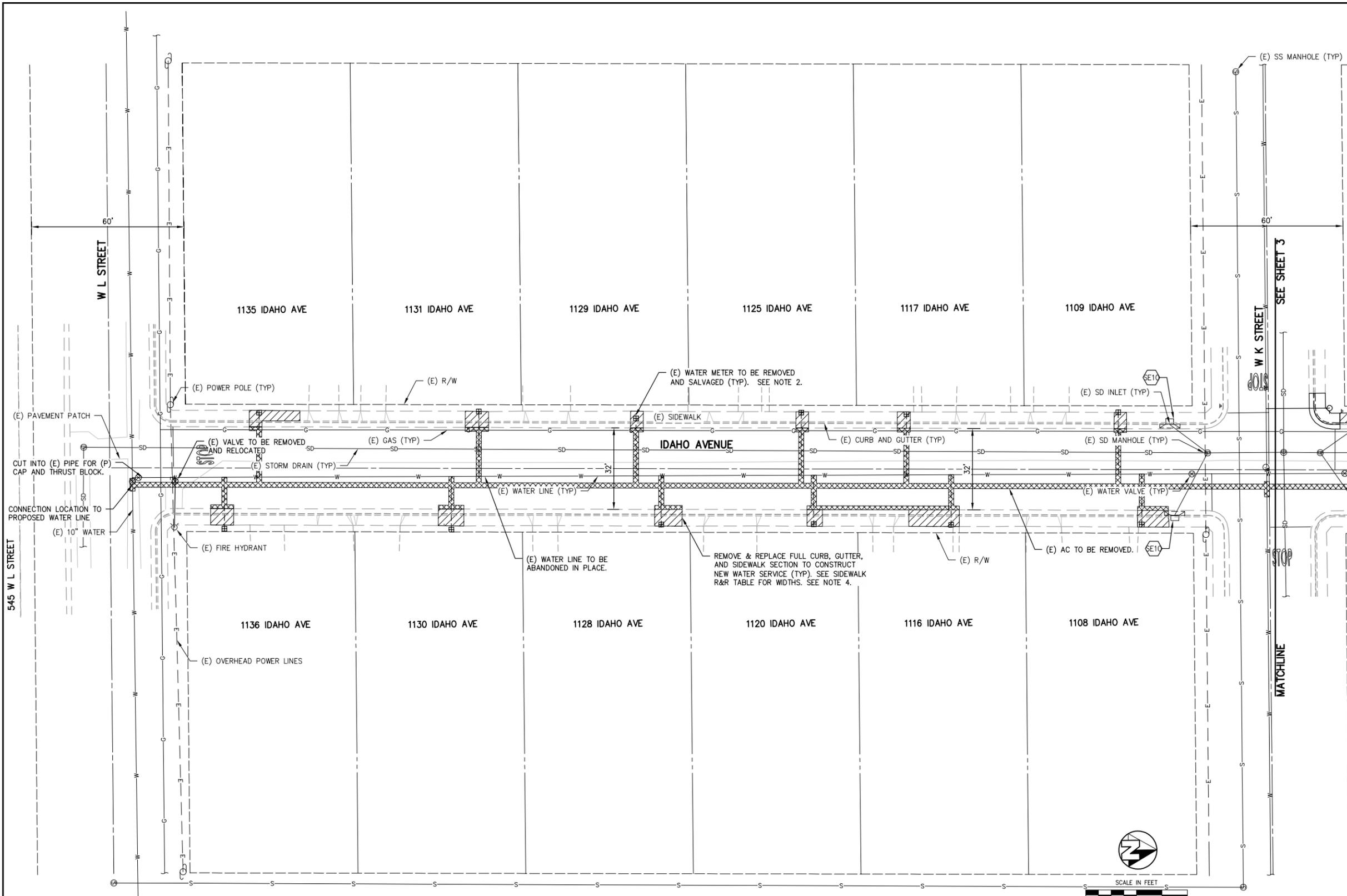
DRAFTED BY: JMG
CHECKED BY: DMM

DATE: 01/31/2019
JOB NO: 350118008

PROJECT NO:
PHASE:

ORIGINAL SCALE SHOWN IS ONE INCH. ADJUST SCALE FOR REDUCED OR ENLARGED PLANS.

SHEET 1 OF 7



SIDEWALK R&R	
ADDRESS	C&G/SW
1135 IDAHO	5' / 20'
1131 IDAHO	9.5'
1129 IDAHO	5'
1125 IDAHO	5'
1117 IDAHO	5'
1109 IDAHO	5'
1136 IDAHO	9'
1130 IDAHO	10'
1128 IDAHO	11'
1120 IDAHO	6'
1116 IDAHO	20'
1108 IDAHO	12'

CONSTRUCTION LEGEND

	STORM DRAIN INLET PROTECTION PER CASQA STANDARD PLAN SE-10	
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- NOTES**
- REPLACE ALL STREET STRIPING, STOP BARS, AND LETTERING DISTURBED BY CONSTRUCTION WITH THERMOPLASTIC PAINT AS NOTED IN THE SPECIFICATIONS. THE ENTIRE MARKING SHALL BE REPLACED REGARDLESS OF THE PORTION DISTURBED.
 - ALL VALVE BOXES, METERS, METER BOXES, CURB STOPS, AND FIRE HYDRANT ASSEMBLIES SHALL BE REMOVED AND SALVAGED. CONTRACTOR TO COORDINATE WITH COLB AS TO WHERE TO TRANSPORT THESE ITEMS.
 - VALVES ON ABANDONED LINE SHALL BE LEFT IN THE CLOSED POSITION
 - REMOVE ASPHALT AROUND REMOVED VALVE BOXES FOR A MINIMUM OF 12" EACH SIDE OF EXCAVATION.

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2/4/19

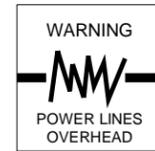
NO.	REVISION	BY	DATE



IDAHO AVENUE WATERLINE REPLACEMENT
CITY OF LOS BANOS
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BID SET
SITE PLAN, TOPOGRAPHY AND DEMOLITION

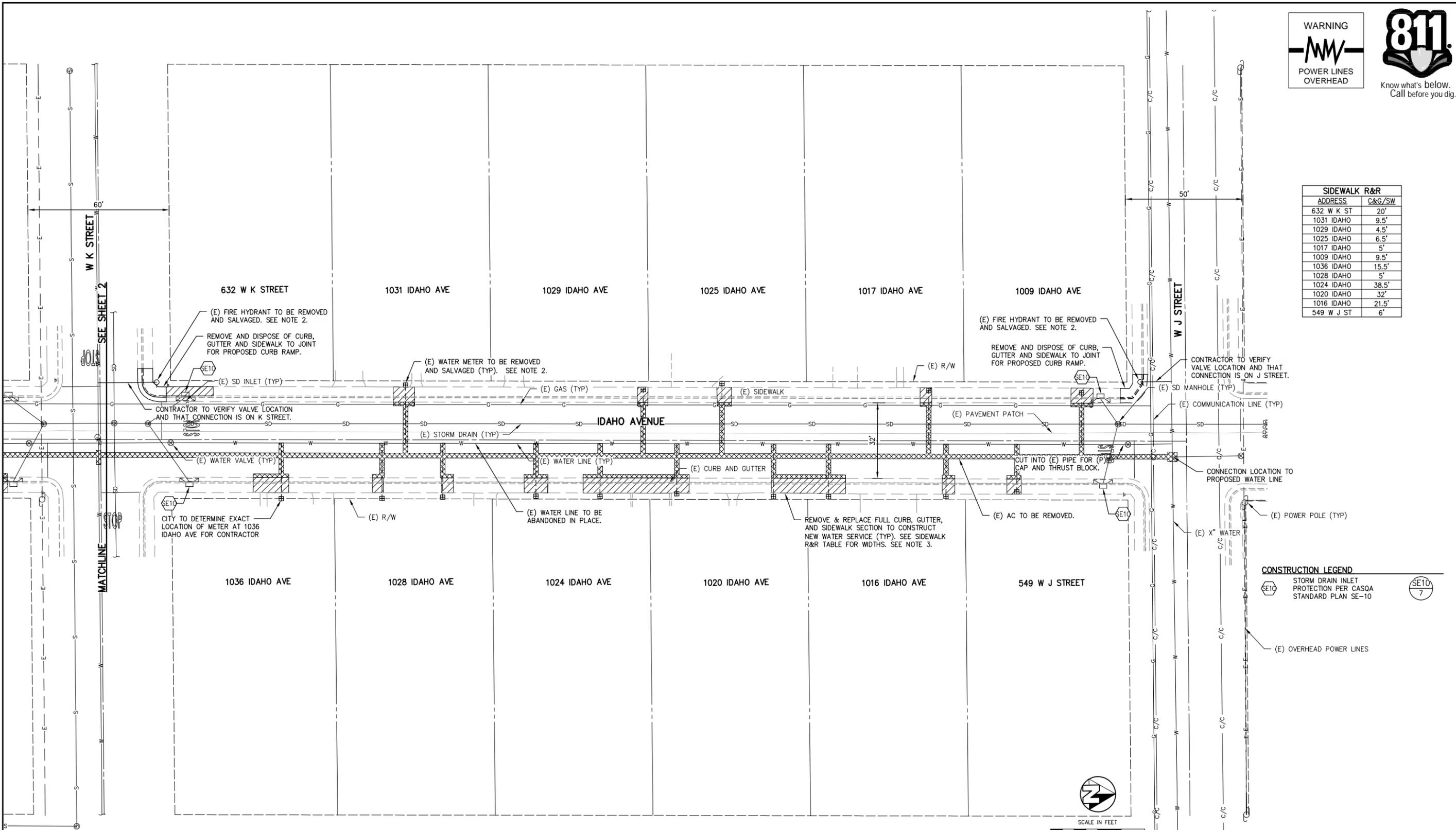
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www.pps3.com

DESIGN ENGINEER: DENA R. TRAINA LICENSE NO: 35580	DRAFTED BY: JMG	CHECKED BY: DMM
DATE: 01/31/2019	JOB NO: 350118008	
PROJECT NO:	PHASE:	
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SHEET 2 OF 7		



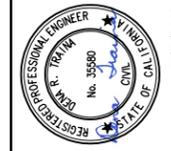
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SIDEWALK R&R	
ADDRESS	C&G/SW
632 W K ST	20'
1031 IDAHO	9.5'
1029 IDAHO	4.5'
1025 IDAHO	6.5'
1017 IDAHO	5'
1009 IDAHO	9.5'
1036 IDAHO	15.5'
1028 IDAHO	5'
1024 IDAHO	38.5'
1020 IDAHO	32'
1016 IDAHO	21.5'
549 W J ST	6'

BID SET
2/4/19

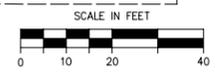


DATE SIGNED: 2/4/2019

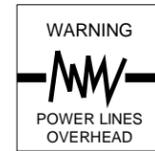
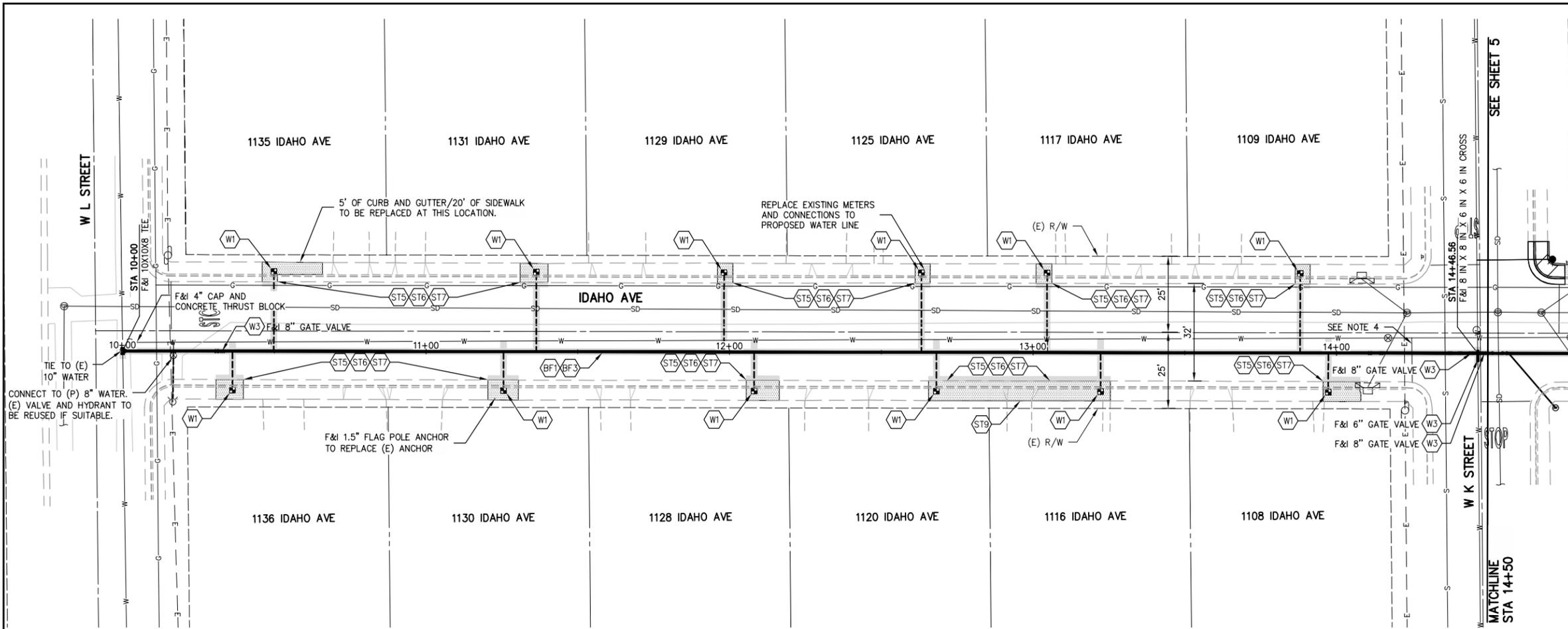
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SITE PLAN, TOPOGRAPHY AND
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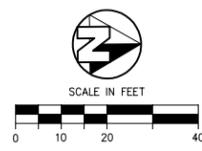
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ORIGINAL SCALE SHOWN IS ONE INCH. ADJUST SCALE FOR REDUCED OR ENLARGED PLANS.	
SHEET	3
OF	7



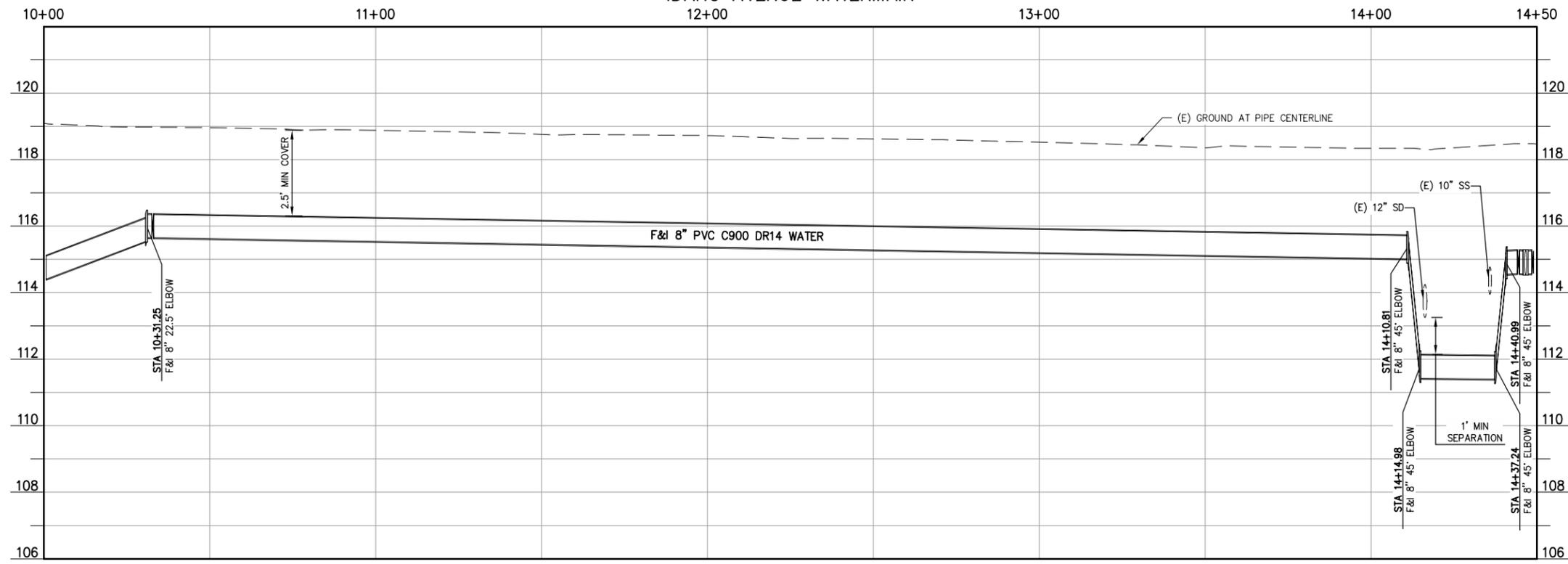
- NOTES**
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 - ALL VALVE BOXES, METERS, METER BOXES, CURB STOPS, AND FIRE HYDRANT ASSEMBLIES SHALL BE REMOVED AND SALVAGED. CONTRACTOR TO COORDINATE WITH COLB AS TO WHERE TO TRANSPORT THESE ITEMS.
 - VALVES ON ABANDONED LINE SHALL BE LEFT IN THE CLOSED POSITION
 - REMOVE ASPHALT AROUND REMOVED VALVE BOXES FOR A MINIMUM OF 12" EACH SIDE OF EXCAVATION.



- NOTES**
- ALL PROPOSED SERVICES SHALL BE 1".
 - ALL LAWN LANDSCAPING SHALL BE PROTECTED IN PLACE. ANY REQUIRED LAWN REPAIR SHALL BE MADE WITH CLEAN FILL DIRT AND NOT GRAVEL OR SAND.
 - ALL HOUSE NUMBERS TO BE PAINTED AT FACE OF CURB.
 - REPLACE ALL STREET STRIPING, STOP BARS, AND LETTERING DISTURBED BY CONSTRUCTION WITH THERMOPLASTIC PAINT AS NOTED IN THE SPECIFICATIONS. THE ENTIRE MARKING SHALL BE REPLACED REGARDLESS OF THE PORTION DISTURBED.
 - PROVIDE AN ASPHALT PATCH AROUND REMOVED VALVE BOXES THAT EXTENDS A MINIMUM OF 12" EACH SIDE OF EXCAVATION.
 - ALL METER BOXES SHALL BE LOCATED IN THE SIDEWALK.



IDAHO AVENUE WATERMAIN



CONSTRUCTION LEGEND

- | | | | |
|-----|--|-----|---|
| W1 | 1" WATER SERVICE PER COLB STANDARD W-1 | W1 | 6 |
| W2 | FIRE HYDRANT INSTALLATION PER COLB STANDARD W-2 | W2 | 6 |
| W3 | VALVE BOX DETAIL PER COLB STANDARD W-3 | W3 | 6 |
| BF1 | FLEXIBLE WALLED PIPE BACKFILL PER COLB STANDARD BF-1 | BF1 | 6 |
| BF3 | EXCAVATION AND BACKFILL IN EXISTING STREETS PER COLB STANDARD BF-3 | BF3 | 6 |
| ST5 | STANDARD CURB & GUTTER SECTION PER COLB STANDARD ST-5 | ST5 | 6 |
| ST6 | 4' WIDE SIDEWALK CURB & GUTTER SECTION PER COLB STANDARD ST-6 | ST6 | 6 |
| ST7 | SIDEWALK CONSTRUCTION PER COLB STANDARD ST-7 | ST7 | 6 |
| ST9 | RESIDENTIAL DRIVEWAY PER COLB STANDARD ST-9 | ST9 | 7 |
| CR | CURB RAMP PER CALTRANS STANDARD PLAN AB8A MODIFIED CASE C | D | 7 |

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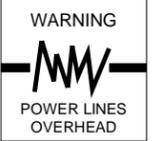
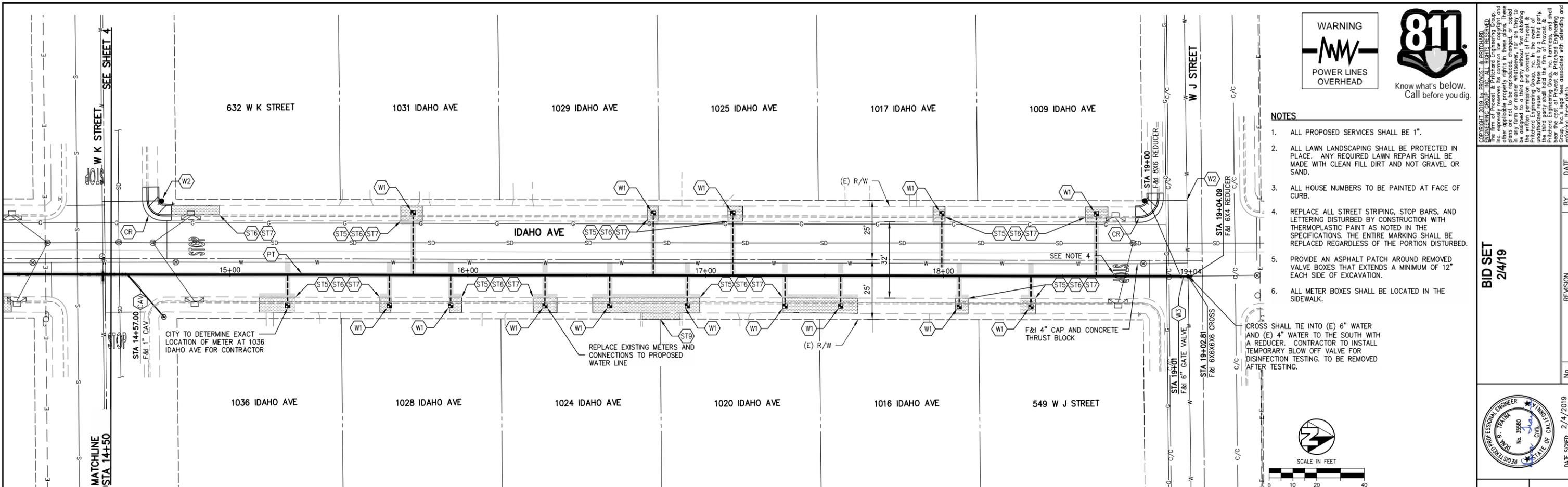
BID SET 2/4/19	REVISION	BY	DATE



IDAHO AVENUE WATERLINE REPLACEMENT
CITY OF LOS BANOS
MERCED COUNTY
BID SET
STA 10+00 TO 14+50
DATE SIGNED: 2/4/2019

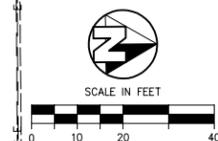
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ORIGINAL SCALE SHOWN IS ONE INCH, ADJUST SCALE FOR REDUCED OR ENLARGED PLANS.	
SHEET	4



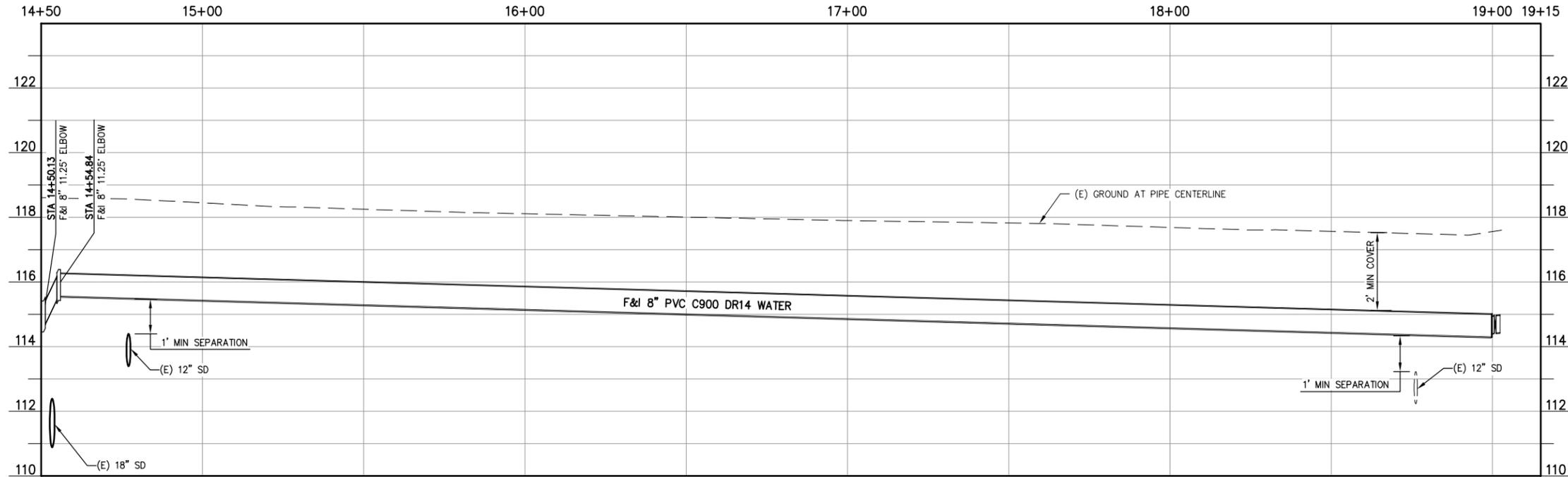
- NOTES**
- ALL PROPOSED SERVICES SHALL BE 1".
 - ALL LAWN LANDSCAPING SHALL BE PROTECTED IN PLACE. ANY REQUIRED LAWN REPAIR SHALL BE MADE WITH CLEAN FILL DIRT AND NOT GRAVEL OR SAND.
 - ALL HOUSE NUMBERS TO BE PAINTED AT FACE OF CURB.
 - REPLACE ALL STREET STRIPING, STOP BARS, AND LETTERING DISTURBED BY CONSTRUCTION WITH THERMOPLASTIC PAINT AS NOTED IN THE SPECIFICATIONS. THE ENTIRE MARKING SHALL BE REPLACED REGARDLESS OF THE PORTION DISTURBED.
 - PROVIDE AN ASPHALT PATCH AROUND REMOVED VALVE BOXES THAT EXTENDS A MINIMUM OF 12" EACH SIDE OF EXCAVATION.
 - ALL METER BOXES SHALL BE LOCATED IN THE SIDEWALK.

CROSS SHALL TIE INTO (E) 6" WATER AND (E) 4" WATER TO THE SOUTH WITH A REDUCER. CONTRACTOR TO INSTALL TEMPORARY BLOW OFF VALVE FOR DISINFECTION TESTING. TO BE REMOVED AFTER TESTING.



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IDAHO AVENUE WATERMAIN



CONSTRUCTION LEGEND

- | | | |
|---------|---|---------|
| (W1) 6 | 1" WATER SERVICE PER COLB STANDARD W-1 | (W1) 6 |
| (W2) 6 | FIRE HYDRANT INSTALLATION PER COLB STANDARD W-2 | (W2) 6 |
| (W3) 6 | VALVE BOX DETAIL PER COLB STANDARD W-3 | (W3) 6 |
| (ST5) 6 | STANDARD CURB & GUTTER SECTION PER COLB STANDARD ST-5 | (ST5) 6 |
| (ST6) 6 | 4' WIDE SIDEWALK CURB & GUTTER SECTION PER COLB STANDARD ST-6 | (ST6) 6 |
| (ST7) 6 | SIDEWALK CONSTRUCTION PER COLB STANDARD ST-7 | (ST7) 6 |
| (ST9) 7 | RESIDENTIAL DRIVEWAY PER COLB STANDARD ST-9 | (ST9) 7 |
| (CR) 7 | CURB RAMP PER CALTRANS STANDARD PLAN AB8A MODIFIED CASE C | (CR) 7 |
| (CAV) 7 | COMBINATION AIR VALVE | (CAV) 7 |
| (PT) 7 | PIPE TRENCH STA 14+50 TO 19+05 | (PT) 7 |

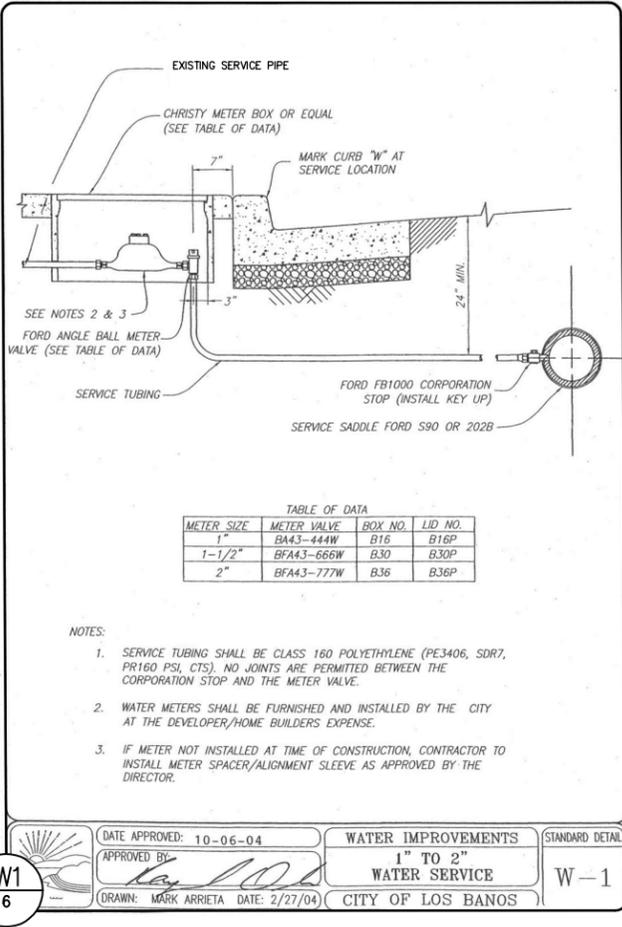
NO.	REVISION	BY	DATE



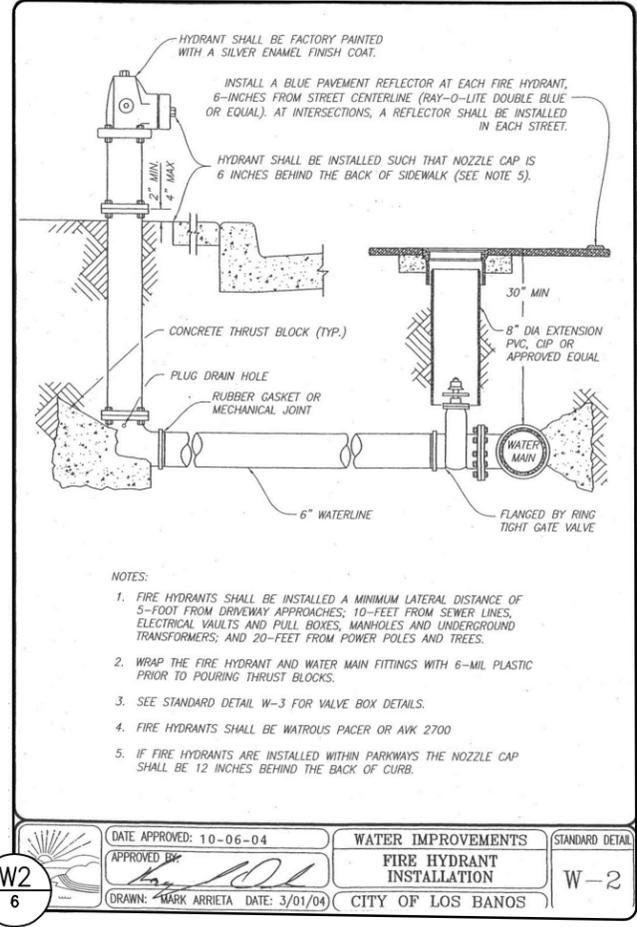
IDAHO AVENUE WATERLINE REPLACEMENT
CITY OF LOS BANOS
MERCED COUNTY
BID SET
STA 14+50 TO 19+04

PROVOST & PRITCHARD
CONSULTING ENGINEERS
An Employee Owned Company
1120 WEST I STREET, SUITE C
LOS BANOS, CALIFORNIA 93635
209/229-1665 FAX 209/229-1675
www.pps3.com

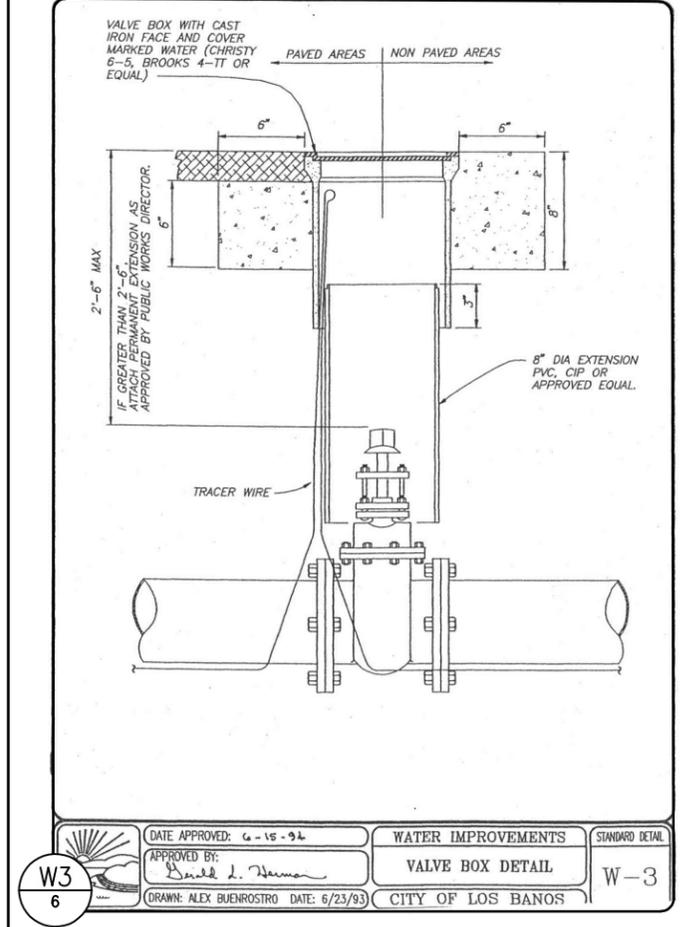
DESIGN ENGINEER: DENA R. TRAINA LICENSE NO: 35580	DRAFTED BY: JMG	CHECKED BY: DMM
DATE: 01/31/2019		
JOB NO: 350118008		
PROJECT NO:		
PHASE:		
ORIGINAL SCALE SHOWN IS ONE INCH. ADJUST SCALE FOR REDUCED OR ENLARGED PLANS.		
SHEET 5 OF 7		



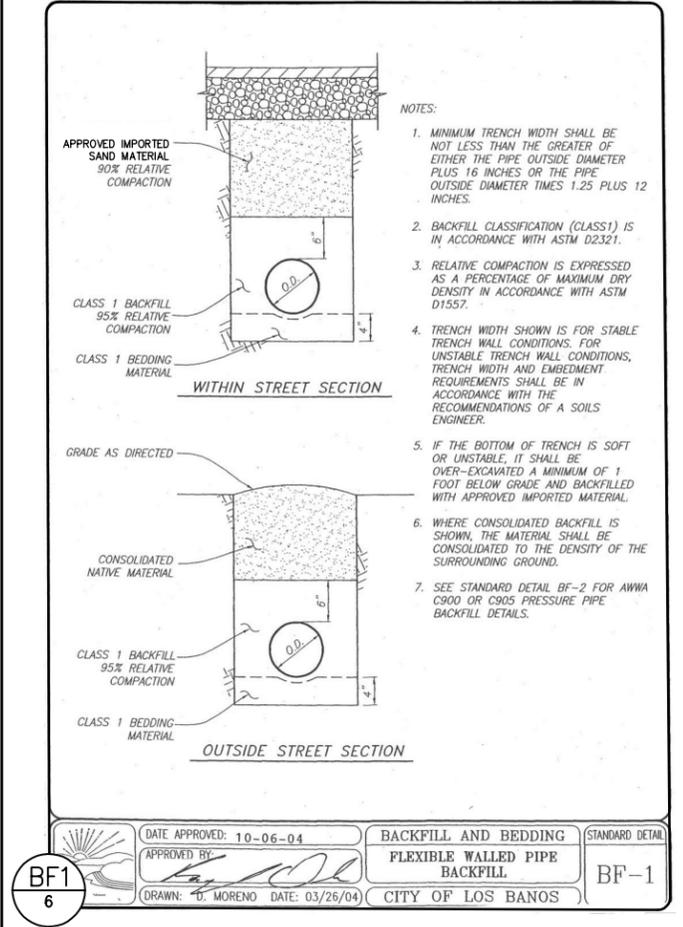
DATE APPROVED: 10-06-04	WATER IMPROVEMENTS	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	1" TO 2" WATER SERVICE	W-1
DRAWN: MARK ARRIETA DATE: 2/27/04	CITY OF LOS BANOS	



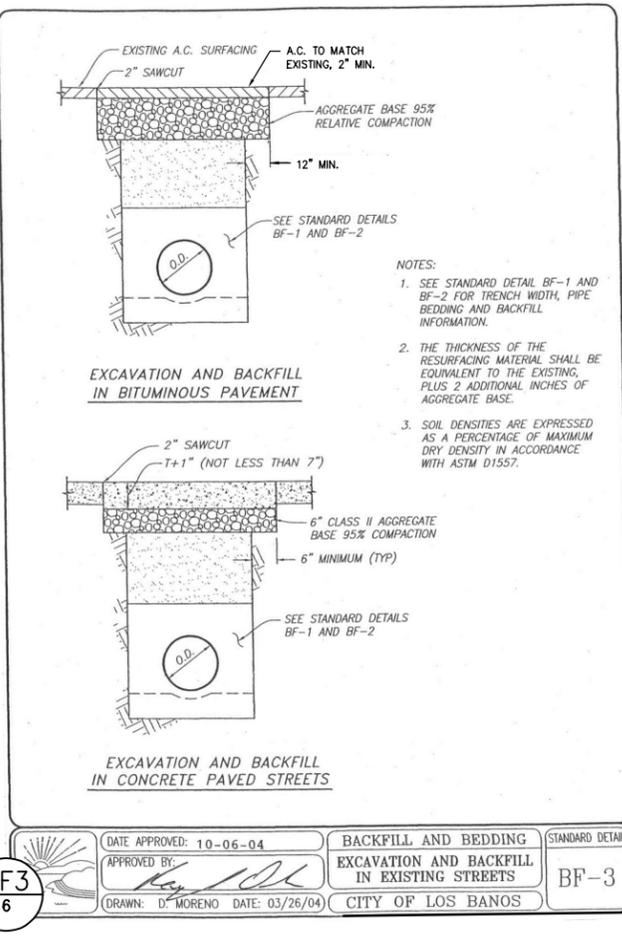
DATE APPROVED: 10-06-04	WATER IMPROVEMENTS	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	FIRE HYDRANT INSTALLATION	W-2
DRAWN: MARK ARRIETA DATE: 3/01/04	CITY OF LOS BANOS	



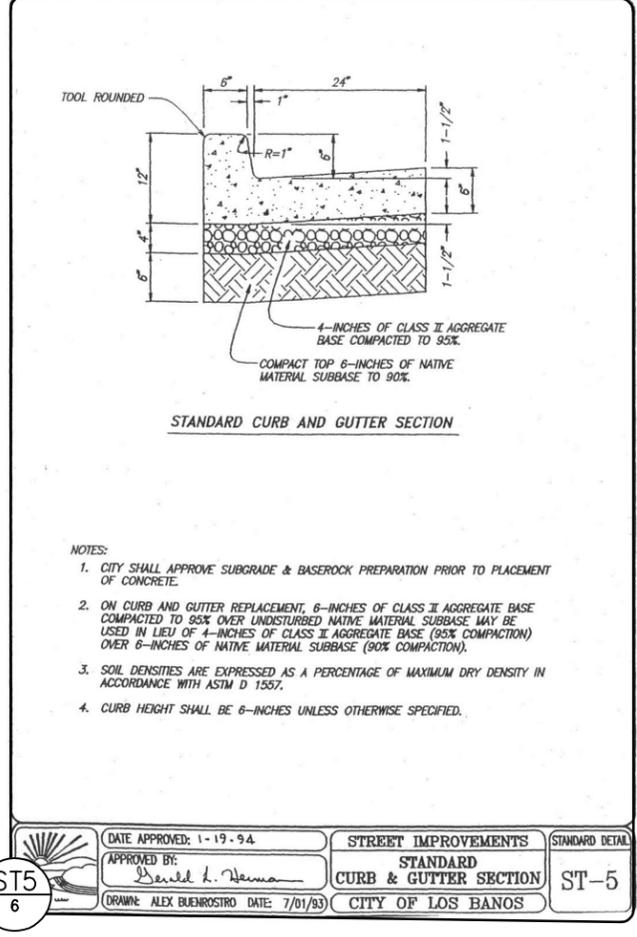
DATE APPROVED: 6-15-94	WATER IMPROVEMENTS	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	VALVE BOX DETAIL	W-3
DRAWN: ALEX BUENROSTRO DATE: 6/23/93	CITY OF LOS BANOS	



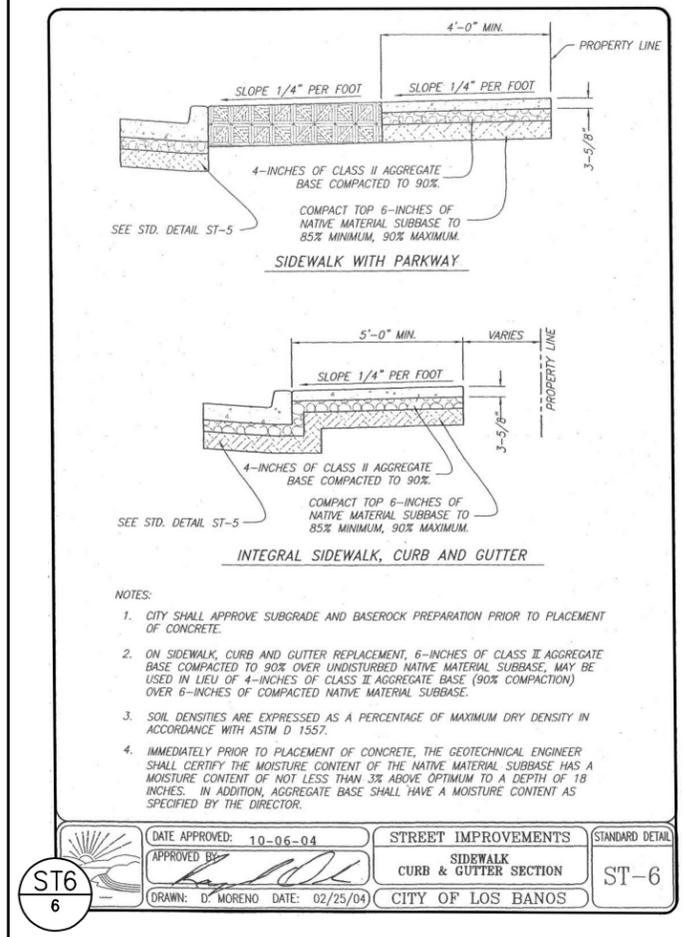
DATE APPROVED: 10-06-04	BACKFILL AND BEDDING	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	FLEXIBLE WALLED PIPE BACKFILL	BF-1
DRAWN: D. MORENO DATE: 03/26/04	CITY OF LOS BANOS	



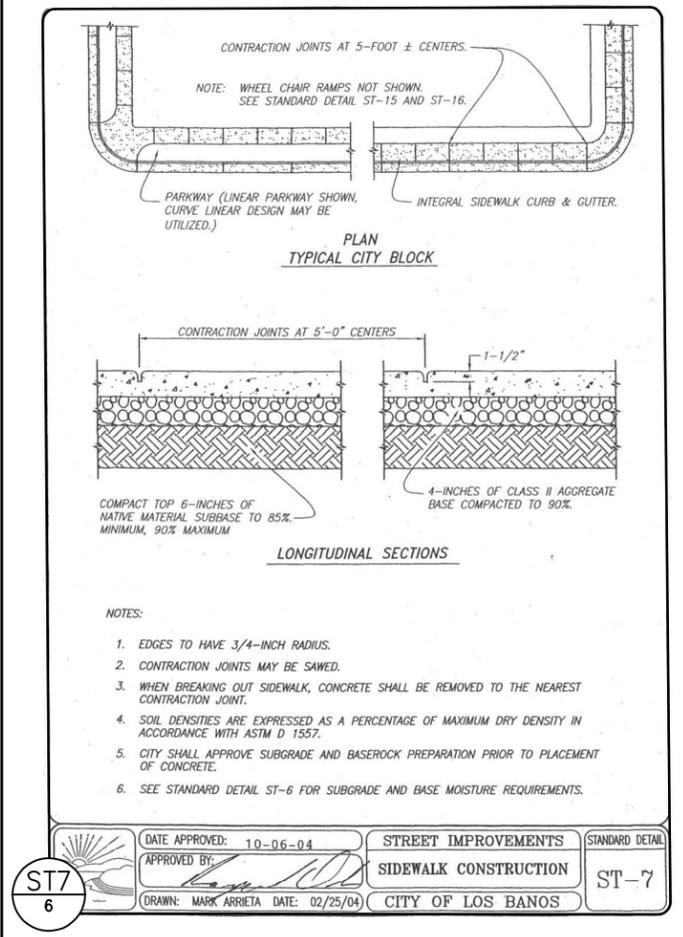
DATE APPROVED: 10-06-04	BACKFILL AND BEDDING	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	EXCAVATION AND BACKFILL IN EXISTING STREETS	BF-3
DRAWN: D. MORENO DATE: 03/26/04	CITY OF LOS BANOS	



DATE APPROVED: 1-19-94	STREET IMPROVEMENTS	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	STANDARD CURB & GUTTER SECTION	ST-5
DRAWN: ALEX BUENROSTRO DATE: 7/01/93	CITY OF LOS BANOS	



DATE APPROVED: 10-06-04	STREET IMPROVEMENTS	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	SIDEWALK CURB & GUTTER SECTION	ST-6
DRAWN: D. MORENO DATE: 02/25/04	CITY OF LOS BANOS	



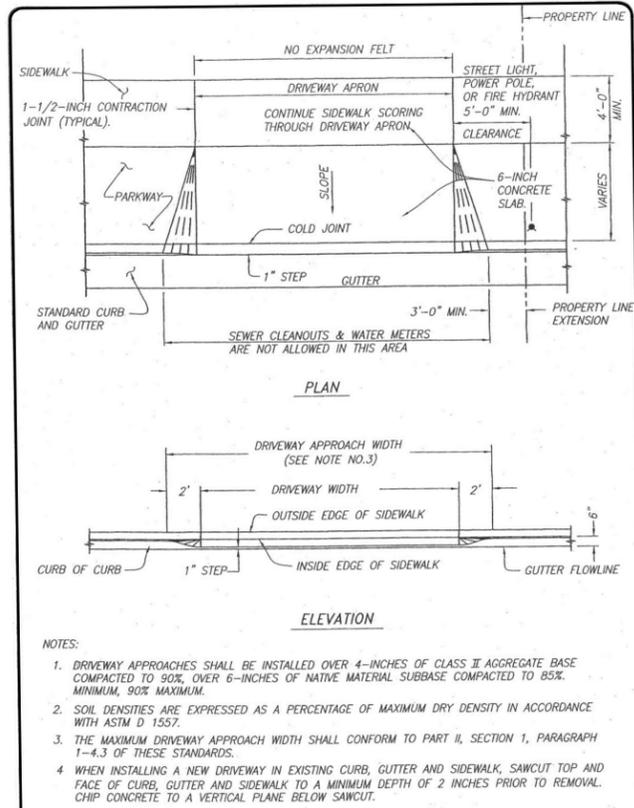
DATE APPROVED: 10-06-04	STREET IMPROVEMENTS	STANDARD DETAIL
APPROVED BY: <i>[Signature]</i>	SIDEWALK CONSTRUCTION	ST-7
DRAWN: MARK ARRIETA DATE: 02/25/04	CITY OF LOS BANOS	

IDAHO AVENUE WATERLINE REPLACEMENT
 CITY OF LOS BANOS
 MERCED COUNTY
 BID SET
 DETAILS

DESIGN ENGINEER: DENA R. TRAINA
 LICENSE NO: 35580
 DRAFTED BY: JMG
 CHECKED BY: DMM
 DATE: 01/31/2019
 JOB NO: 350118008
 PROJECT NO:
 PHASE:

ORIGINAL SCALE SHOWN IS ONE INCH. ADJUST SCALE FOR REDUCED OR ENLARGED PLANS.
 SHEET 6 OF 7

2/4/2019 2:54 PM C:\Los Banos_City of-350118008 Idaho Ave Waterline Replacement\DWG\Sheet6 DETAILS.dwg -Georgia te Velde



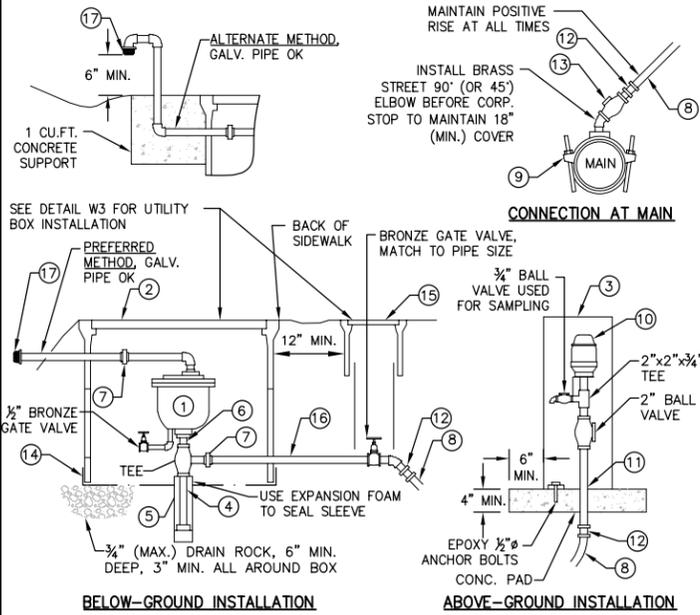
DATE APPROVED: 10-06-04

STREET IMPROVEMENTS

RESIDENTIAL DRIVEWAY

CITY OF LOS BANOS

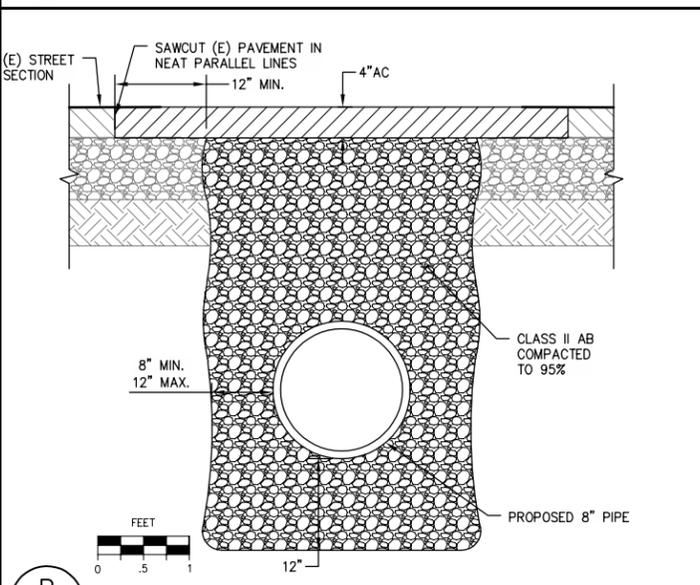
ST-9



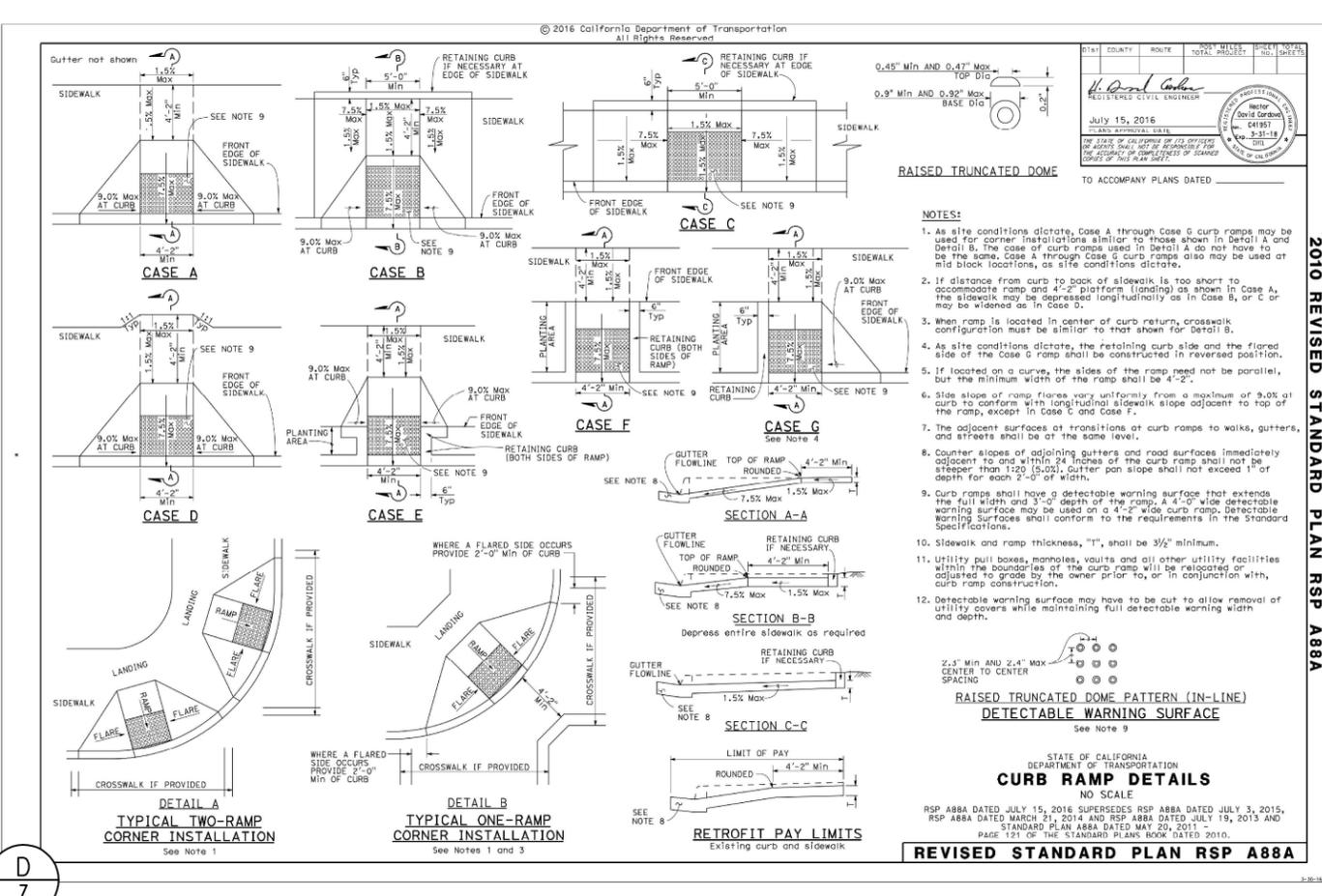
- NOTES**
- GATE VALVES, BRASS UNIONS AND TEES WILL BE A SPECIFIC SIZE ACCORDING TO THE C.A.V. USED.
 - ALL CONCRETE SHALL HAVE A MIN. COMPRESSIVE STRENGTH OF 2500 PSI IN ALL AREAS SHOWN.
 - ALL COMBINATION AIR VALVES TO BE LOCATED OUT OF TRAFFIC AREAS.
 - ABOVE-GROUND COMB. AIR VALVES MUST BE PROTECTED FROM TRAFFIC WITH BOLLARDS.
 - ALL FITTINGS SHALL BE BRASS UNLESS OTHERWISE NOTED.

ITEM	QTY	DESCRIPTION	REMARKS
1	1	COMBINATION AIR VALVE	1" APCO 143C FOR 6" & 8" MAINS OR APPROVED EQUAL
2	1	UTILITY BOX AND LID, USE EXTENSION(S)	CHRISTY B36 FOR 1" VALVE OR APPROVED EQUAL
3	1	VALVE PEDESTAL, 12"x12"x30"	PLACER WATER WORKS #PW/SJARV-2 OR APPROVED EQUAL
4	1	1"x 8" BRASS NIPPLE WITH BRASS CAP	
5	1	2"x12" PVC NIPPLE WITH 2" CAP	SCH. 40 PVC
6	1	3" LONG BRASS NIPPLE	SIZE PER PIPE
7	1	BRASS UNION	SIZE PER PIPE
8	1	1" POLYETHYLENE TUBING FOR 6" & 8" MAINS	WESTFLEX SP200 PSI (OR APPROVED EQUAL)
9	1	1" SERVICE SADDLE	FORD FS202 OR APPROVED EQUAL
10	1	1" COMBINATION AIR VALVE	BERMAD MODEL #4415 OR APPROVED EQUAL
11	1	1" BRASS NIPPLE, 12" MIN.	EXTEND 6" MIN. BELOW GRADE
12	1	FEMALExCTS PACK JOINT COUPLING	FORD C14-44 OR APPROVED EQUAL
13	1	CORPORATION STOP (MIPxMIP)	FORD FB500-4-NL OR APPROVED EQUAL
14	1	1/2" HARDWARE CLOTH (GALV.)	MUST COVER ALL ACCESS HOLES
15	1	TRAFFIC VALVE BOX W/ LID MARKED "WATER"	CHRISTY G5 BOX WITH G5C LID, OR APPROVED EQUAL
16	1	36" LONG BRASS NIPPLE	SIZE PER PIPE
17	1	AIR VENT CAP #10 MESH	T. CHRISTY #VCI FOR 1" AIR/VAC

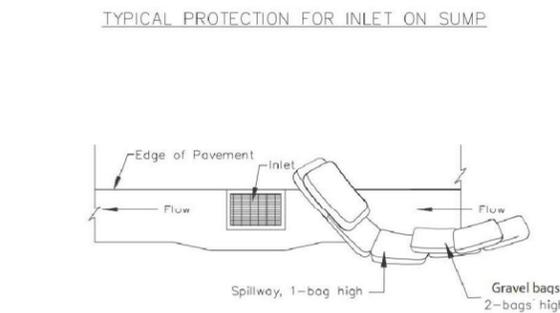
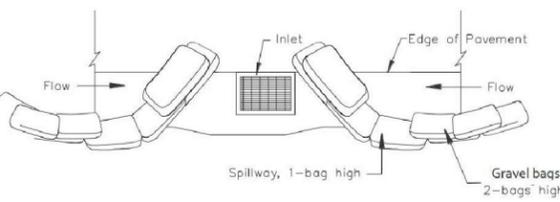
COMBINATION AIR VALVE



THRUST BLOCKS



Storm Drain Inlet Protection SE-10



- NOTES:**
- Intended for short-term use.
 - Use to inhibit non-storm water flow.
 - Allow for proper maintenance and cleanup.
 - Bags must be removed after adjacent operation is completed.
 - Not applicable in areas with high silts and clays without filter fabric.
 - Protection can be effective even if it is not immediately adjacent to the inlet provided that the inlet is protected from potential sources of pollution.

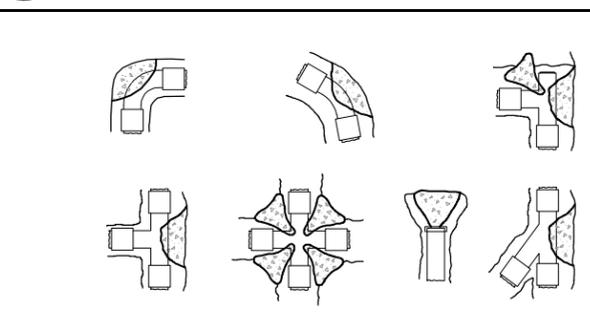
DI PROTECTION TYPE 3

California Stormwater BMP Handbook

Construction

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MAX INTERNAL PRESSURE (PSI)		50			
SOIL BEARING PRESSURE (PSF)		1500			
SAFETY FACTOR		1			
MINIMUM BEARING AREA (SF)					
PIPE SIZE	DEAD END OR TEE	90° BEND	45° BEND	22.5° BEND	11.25° BEND
3	0.2	0.3	0.2	0.1	0.0
4	0.4	0.6	0.3	0.2	0.1
6	0.9	1.3	0.7	0.4	0.2
8	1.7	2.4	1.3	0.7	0.3
10	2.6	3.7	2.0	1.0	0.5
12	3.8	5.3	2.9	1.5	0.7
16	6.7	9.5	5.1	2.6	1.3
18	8.5	12.0	6.5	3.3	1.7
20	10.5	14.8	8.0	4.1	2.1
24	15.1	21.3	11.5	5.9	3.0
30	23.6	33.3	18.0	9.2	4.6
36	33.9	48.0	26.0	13.2	6.7
42	46.2	65.3	35.3	18.0	9.1
48	60.3	85.3	46.2	23.5	11.8

- NOTES**
- ALL FITTINGS TO BE WRAPPED IN 4 MIL VISQUEEN.
 - CONCRETE SHALL NOT ENCRUSH ON END FITTINGS.
 - CONCRETE SHALL BEAR AGAINST UNDISTURBED SOIL.
 - CONCRETE TO HAVE ULTIMATE STRENGTH OF 3000 PSI @ 28 DAYS.

PROVOST & PRITCHARD

REGISTERED CIVIL ENGINEER

7/15/2016

REVISIONS

DATE: 2/4/2019

IDAHO AVENUE WATERLINE REPLACEMENT

CITY OF LOS BANOS

MERCED COUNTY

BID SET

DETAILS

PROVOST & PRITCHARD

DESIGN ENGINEER: DENA R. TRAINA

LICENSE NO: 35580

DRAFTED BY: JMG

CHECKED BY: DMM

DATE: 01/31/2019

JOB NO: 350118008

PHASE:

ORIGINAL SCALE SHOWN IS ONE INCH ADJUST SCALE FOR REDUCED OR ENLARGED PLANS.

SHEET 7 OF 7