

CITY OF BAKERSFIELD WATER SPECIFICATIONS (CONT'D):

(CONTINUED FROM SHEET 3)

7.3 DISINFECTION OF WATER LINES: AFTER HYDROSTATIC TESTING HAS BEEN COMPLETED, THE ENTIRE NEWLY CONSTRUCTED WATER SYSTEM INCLUDING PIPE, VALVES, FITTINGS, HYDRANTS, AND OTHER ACCESSORIES SHALL BE DISINFECTED IN ACCORDANCE WITH AWWA C-601 AND AS SPECIFIED HEREIN.

7.3.1 CHLORINE APPLICATION: THE DISINFECTING AGENT SHALL BE CHLORINE IN LIQUID OR "TABLET" FORM APPLIED IN A QUANTITY SUFFICIENT TO PRODUCE A SOLUTION OF AT LEAST 50 PARTS PER MILLION BY WEIGHT IN SAMPLES TAKEN AT THE MOST DISTANT POINTS OF THE SYSTEM.

AFTER THE REQUIRED SOLUTION OF CHLORINE IS OBTAINED THE PIPES SHALL REMAIN CLOSED FOR 24 HOURS. AFTER A 24 HOUR DURATION, SAMPLES SHALL BE TAKEN AT THE SAME LOCATION AS THE INITIAL SAMPLE AND SHALL SHOW NO LESS THAN 10 PARTS PER MILLION BY WEIGHT, FAILING SHALL REQUIRE ADDITIONAL DISINFECTION AS DIRECTED BY THE DEPARTMENT.

7.3.2 DURING THE DISINFECTION PROCESS, ALL VALVES AND OTHER APPURTENANCES SHALL BE OPERATED WHILE THE SYSTEM IS FILLED WITH HEAVILY CHLORINATED WATER.

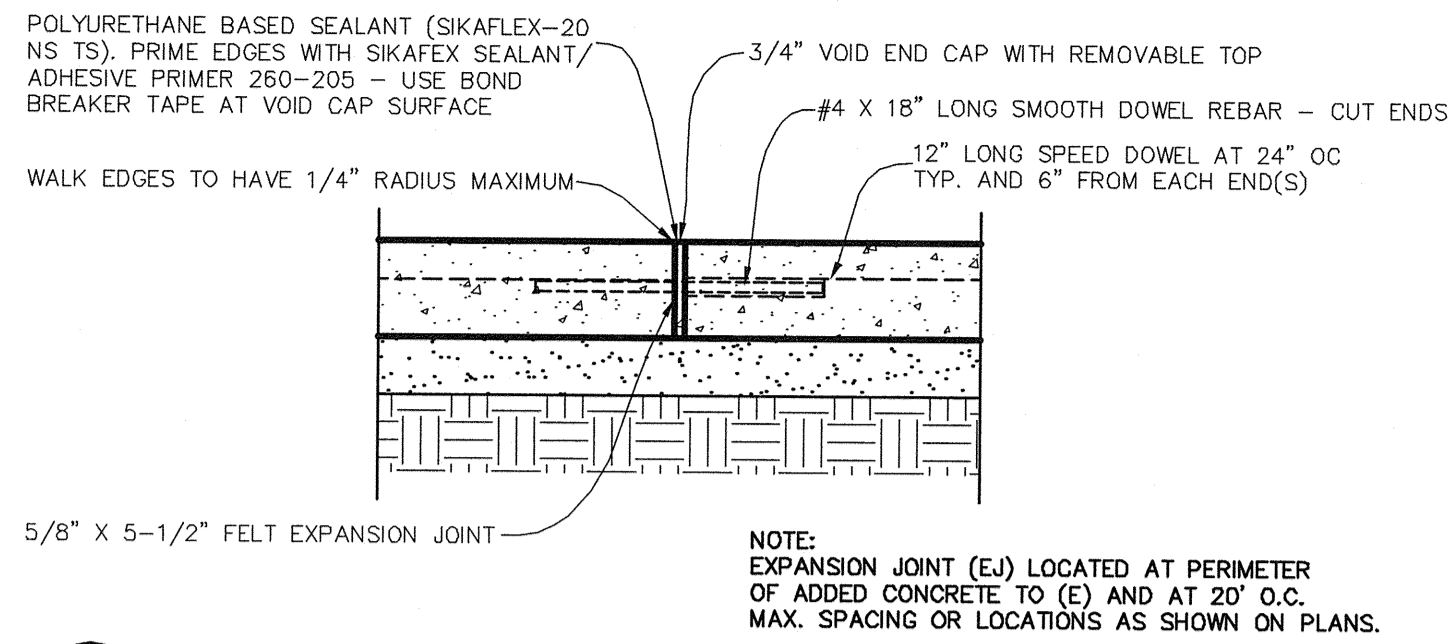
7.3.3 FLUSHING: AFTER THE 24 HOUR STERILIZATION PERIOD THE LINE SHALL BE THOROUGHLY FLUSHED TO REMOVE ALL STRONGLY CHLORINATED WATER UNTIL SAMPLES TAKEN AT VARIOUS POINTS AS DIRECTED TEST NOT IN EXCESS OF 1 PART PER MILLION. FOR THE PROTECTION OF PROPERTY DURING FLUSHING, THE ENGINEER MAY REQUIRE THE CONTRACTOR TO USE HOSES OR PIPE TO CONVEY THE WASTE WATER TO LOCATIONS WHERE NO DAMAGE WILL RESULT.

CARE SHALL BE TAKEN TO PREVENT STRONG CHLORINE SOLUTION IN THE LINE BEING TREATED FROM FLOWING BACK INTO THE EXISTING SYSTEM.

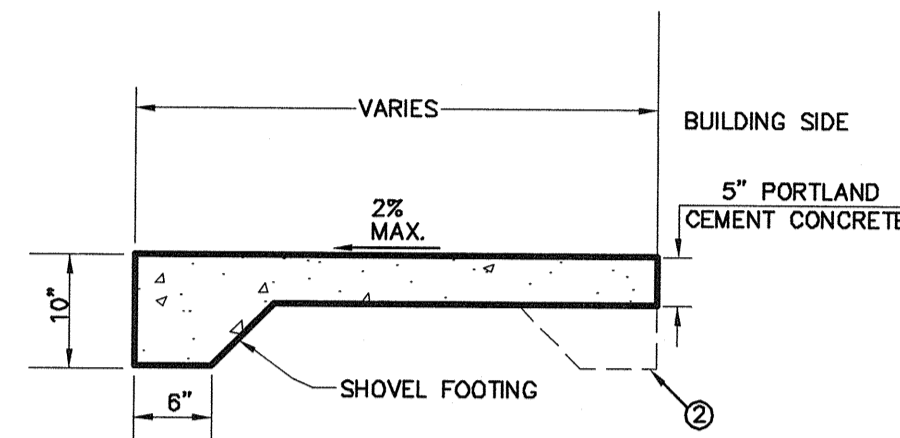
7.4 BACTERIOLOGICAL TESTS: THE DEPARTMENT SHALL REQUIRE A BACTERIOLOGICAL TEST. BACTERIOLOGICAL TESTS SHALL BE PERFORMED BY A QUALIFIED LABORATORY AND THE REQUIREMENTS OF SUCH TESTS SHALL BE IN ACCORDANCE WITH STANDARDS ESTABLISHED BY THE STATE DEPARTMENT OF HEALTH SERVICES.

7.5 FIRE FLOW TESTS: THE CITY OF BAKERSFIELD FIRE DEPARTMENT WILL TEST NEWLY CONSTRUCTED WATER SYSTEMS TO DETERMINE IF MINIMUM STANDARDS FOR THE FIRE FLOW HAVE BEEN MET.

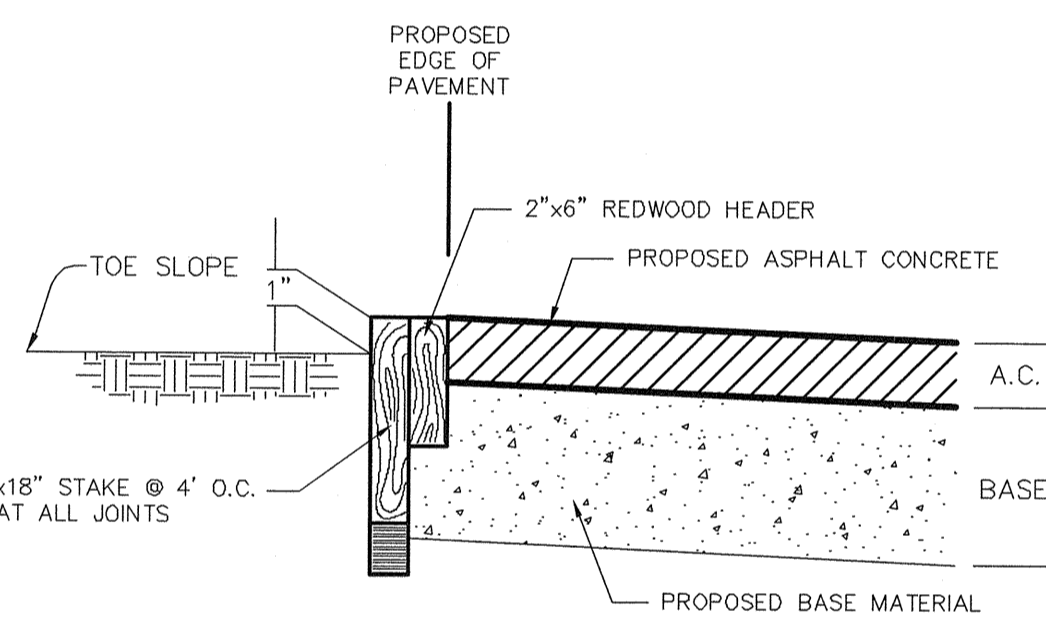
7.6 COSTS FOR TESTING: THE DEVELOPER OR DEVELOPER'S CONTRACTOR SHALL BE RESPONSIBLE FOR ALL COSTS ASSOCIATED WITH THE VARIOUS ACCEPTANCE TESTS AND ANY NECESSARY REPAIRS, EXCEPT AS OTHERWISE STATED IN THESE SPECIFICATIONS.



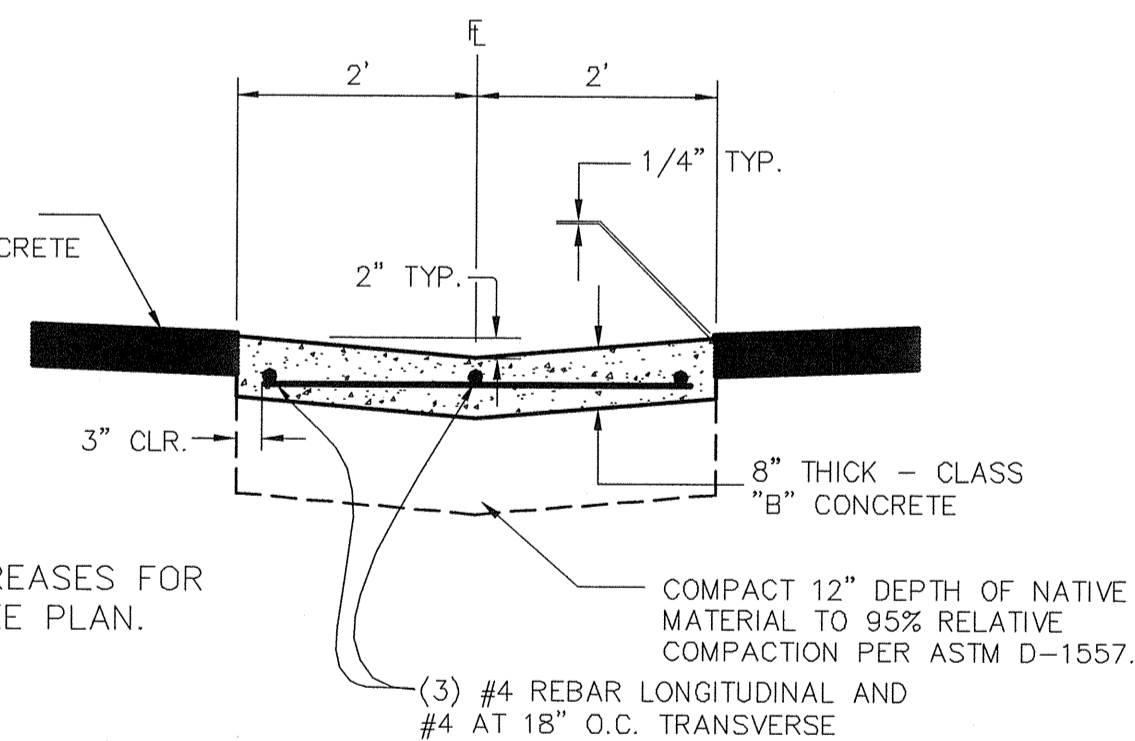
(D) 4 EXPANSION JOINT AT CONCRETE "JOINS"
N.T.S.



(E) 4 SIDEWALK SECTION
N.T.S.

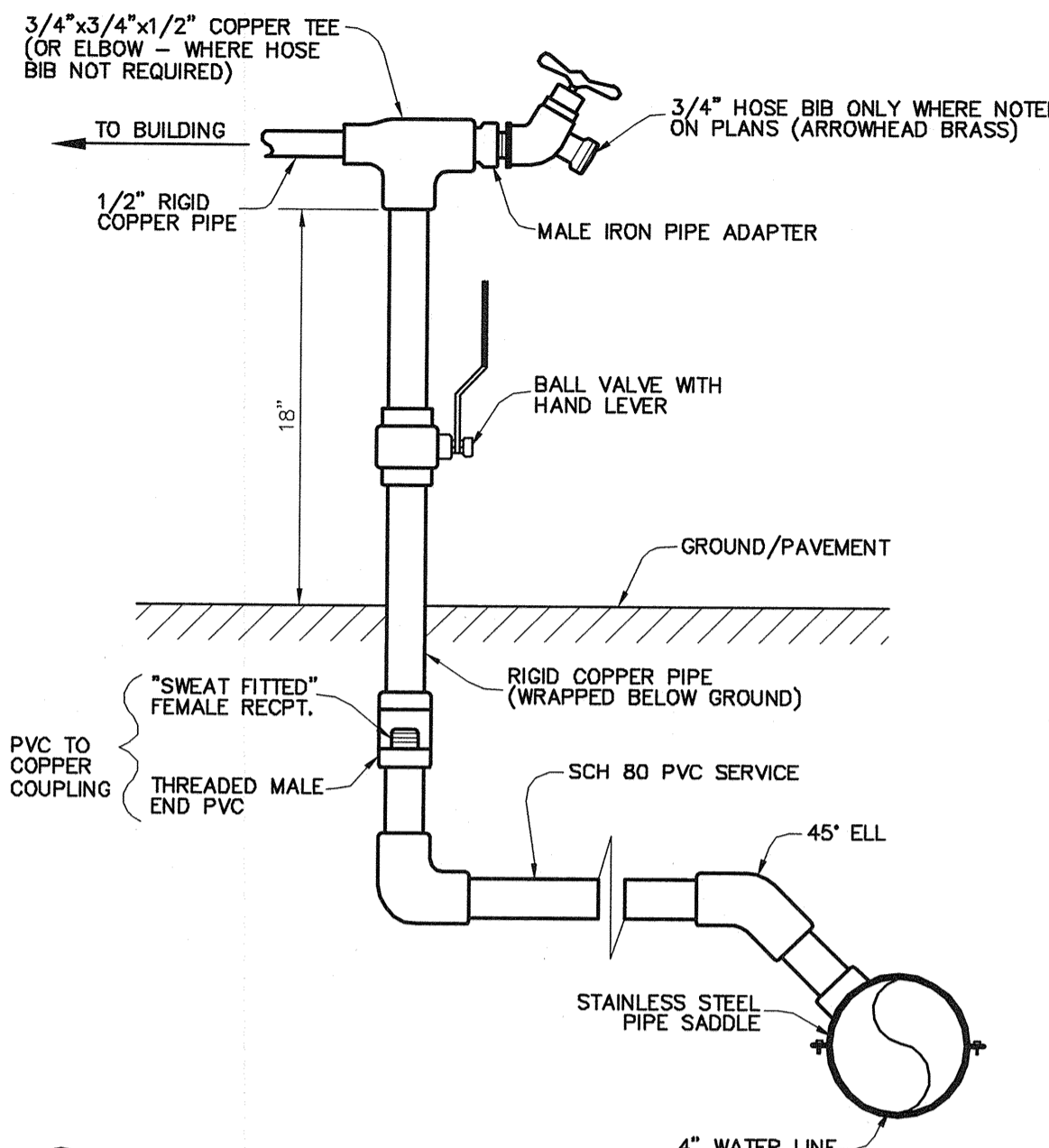


(F) 4 REDWOOD PAVING BOARD
N.T.S.

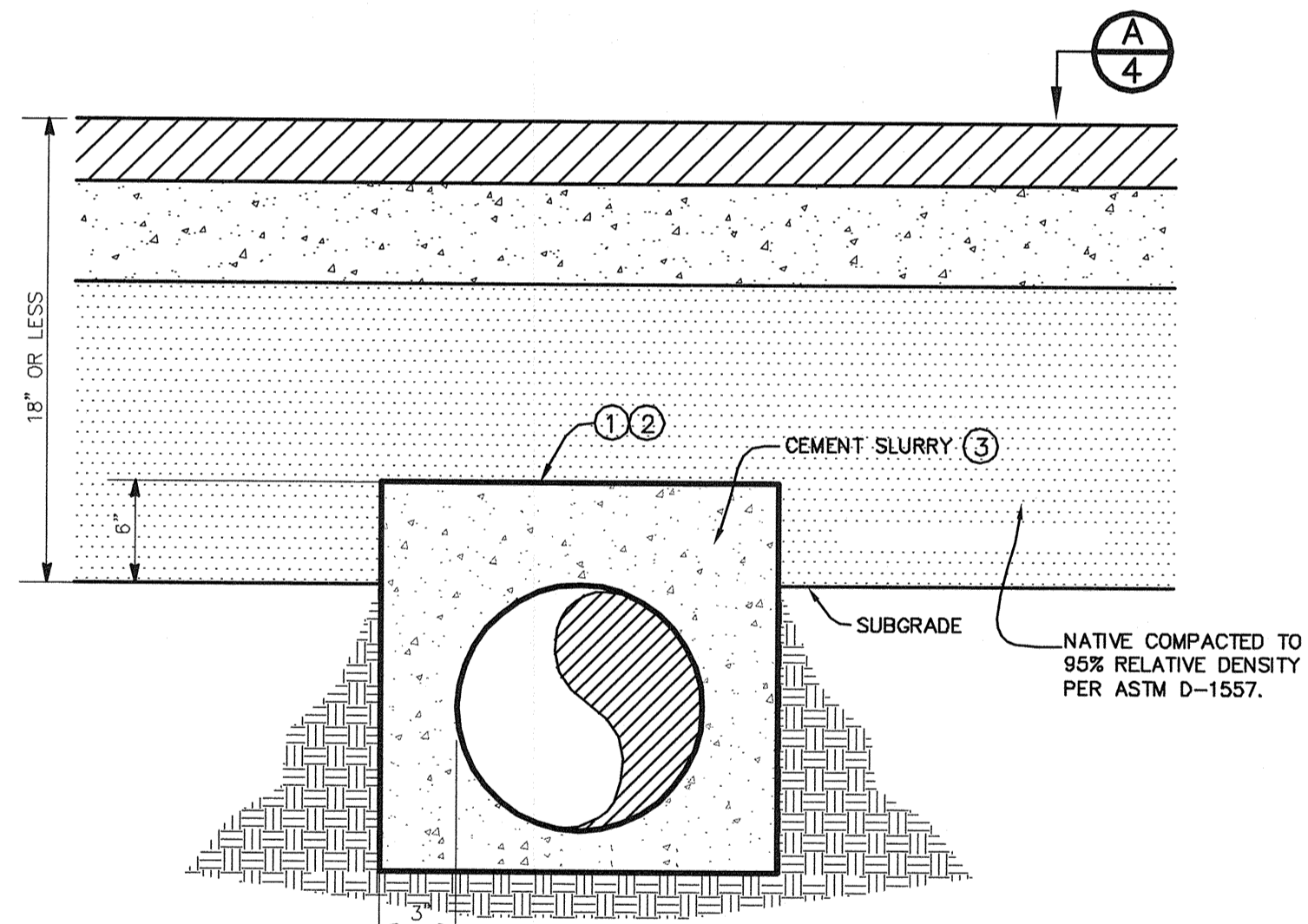


*DIMENSION INCREASES FOR ADA ROUTES-SEE PLAN.

(G) 4 4" CONCRETE "V" GUTTER
N.T.S.

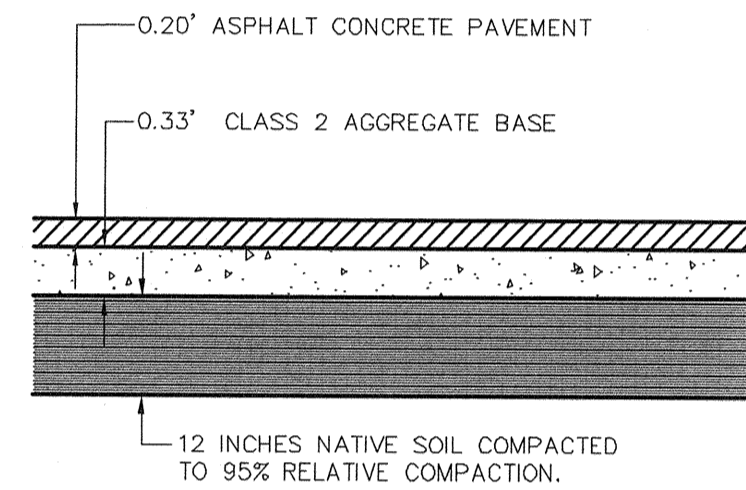


(I) 4 3/4" WATER SERVICE
N.T.S.

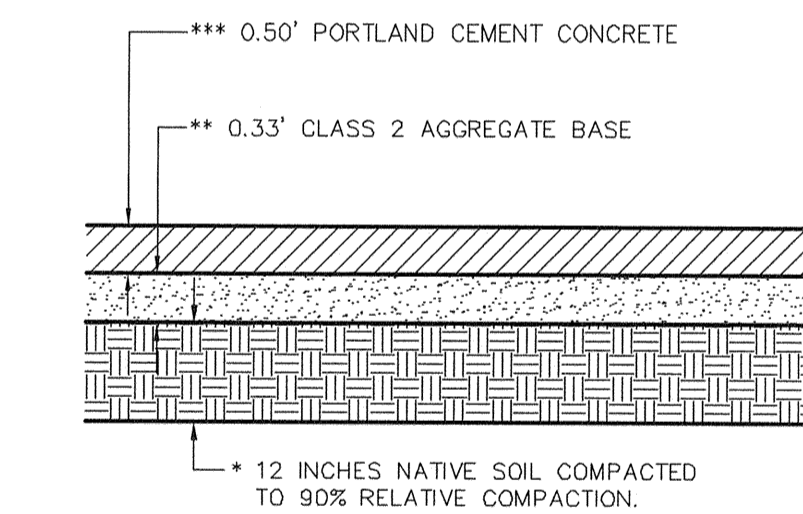


(J) 4 TRENCH SLURRY BACKFILL
N.T.S. (WHEN LESS THAN 18" OF COVER)

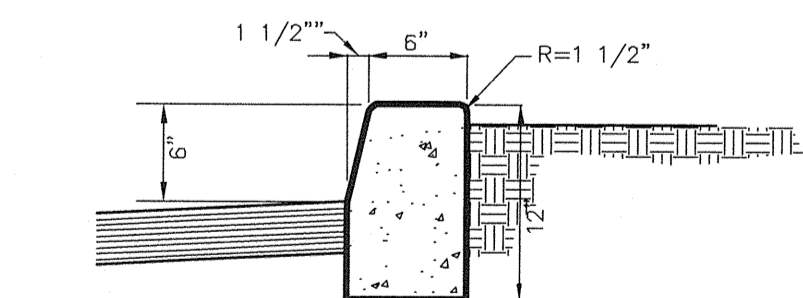
(K) 4 TRENCH SLURRY BACKFILL
N.T.S. (WHEN LESS THAN 18" OF COVER)



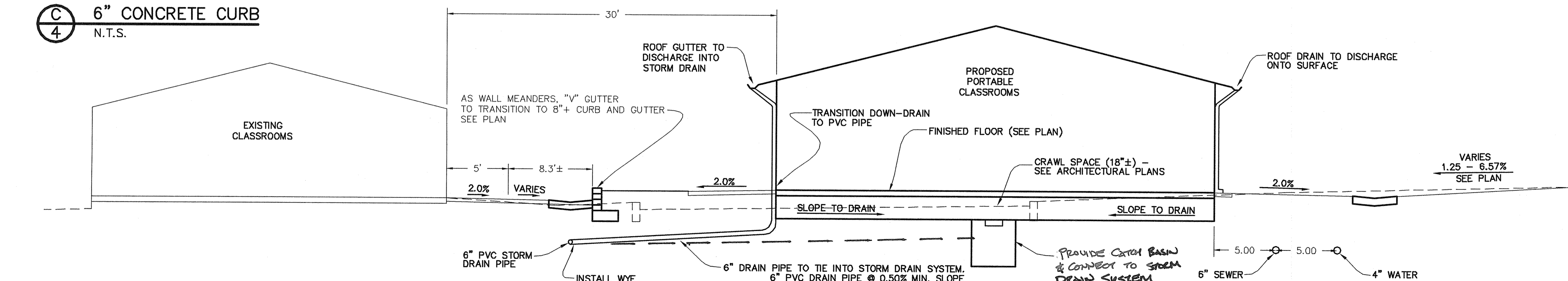
(A) 4 TYPICAL PAVING SECTION
N.T.S.



(B) 4 TYPICAL PORTLAND CEMENT PAVEMENT SECTION
N.T.S.



(C) 4 6" CONCRETE CURB
N.T.S.



(H) 4 FINISH GRADING / SURFACE SECTION (FACING WEST)
N.T.S.

CONSTRUCTION NOTES-GRADING, UTILITY & SITE IMPROVEMENTS

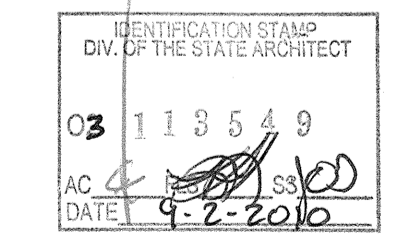
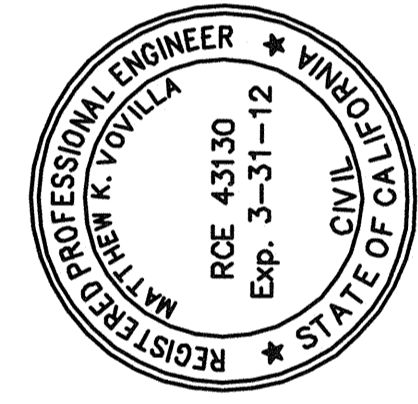
- 1) CONTRACTOR SHALL PERFORM ALL NECESSARY DEMOLITION WITHIN THE LIMITS OF WORK. PROTECT EXISTING UTILITIES THAT ARE TO REMAIN. SEE DEMOLITION NOTES, SHEET 2 HEREIN, AND ARCHITECT'S SPECIFICATIONS.
- 2) SAWCUT AND REMOVE EXISTING ASPHALT CONCRETE PAVEMENT FOR PLACEMENT OF NEW UTILITIES. PATCH PAVEMENT IN ACCORDANCE WITH DETAIL (A) HEREIN.
- 3) CONTRACTOR SHALL CORDON OFF WORK AREAS WITH CAUTION TAPE, DELINEATORS AND BARRICADES, AND SHALL PROVIDE FOR SAFE PASSAGE OF STUDENTS AND DISTRICT EMPLOYEES.
- 4) PRIOR TO FINISH GRADING, THE BUILDING PAD AREA SHALL BE OVEREXCAVATED AND RECOMPACTED IN ACCORDANCE WITH THE RECOMMENDATIONS OF THE SOILS REPORT.
- 5) CONTRACTOR SHALL RESEARCH ALL EXISTING UTILITIES AND POINTS OF CONNECTION. AS A FIRST ORDER OF WORK, CONTRACTOR SHALL "POTHOLE" EXISTING UTILITIES TO VERIFY LOCATION AND DEPTH. DISCREPANCIES WITH THE PLANS SHALL BE IMMEDIATELY REPORTED TO THE ENGINEER SUCH THAT ADJUSTMENTS MAY BE MADE PRIOR TO INSTALLATION.
- 6) PLACE AND COMPACT ASPHALT CONCRETE PAVEMENT OVER CLASS 2 AGGREGATE BASE OVER COMPACTED SUBGRADE IN ACCORDANCE WITH DETAIL (A) PLANS, THE SPECIFICATIONS AND CONTRACT DOCUMENTS.
- 7) CONSTRUCT REDWOOD HEADER BOARD PER DETAIL (F) AT ANY EDGE OF ASPHALT CONCRETE PAVEMENT NOT ABUTTING PORTLAND CEMENT CONCRETE.
- 8) CONSTRUCT PORTLAND CEMENT CONCRETE PAVEMENT OR WALKS IN ACCORDANCE WITH DETAIL (E) HEREIN. SAWCUT EXISTING ASPHALT CONCRETE PAVEMENT. NEW WALKS SHALL MEET ALL STATE AND FEDERAL ADA SPECIFICATIONS. CONCRETE FORMWORK SHALL BE CHECKED FOR ADA COMPLIANCE BY THE INSPECTOR PRIOR TO POUR.
- 9) CONSTRUCT 6" CONCRETE CURB PER DETAIL (C) HEREIN.
- 10) CONSTRUCT ADA ACCESSIBLE RAMP PER DETAIL (D) HEREIN.
- 11) FURNISH AND INSTALL ADA APPROVED DETECTABLE/TACTILE WARNING SURFACE TILE (TRUNCATED DOME MAT) ON EXISTING PORTLAND CEMENT CONCRETE SURFACE. SURFACE SHALL BE MANUFACTURED BY ARMOR TILE OR APPROVED EQUAL MAT COLOR SHALL BE YELLOW IN ACCORDANCE WITH ADA REQUIREMENTS. CONTRACTOR SHALL SUBMIT CONCRETE ANCHORAGE DETAIL FOR APPROVAL.
- 12) PAINT NEW PARKING STALLS, ADA PARKING STALLS, PAVEMENT MARKINGS, AND ROUTES IN ACCORDANCE WITH THE PLANS. EXISTING CONFLICTING PAVEMENT MARKINGS SHALL BE REMOVED AND FOG SEALED PRIOR TO PAINTING NEW MARKINGS. FOG SEAL SHALL SET SUFFICIENTLY BEFORE APPLYING NEW PAINT. SEE DETAILS (X) AND (Y).
- 13) INSTALL ADA PARKING LOT SIGNS PER DETAIL (X) HEREIN.
- 14) FURNISH AND INSTALL 3" PRE-CAST CONCRETE PARKING BUMPERS. SAWCUT AND JOIN EXISTING PORTLAND CEMENT CONCRETE.
- 15) INSTALL CENTER OF CRAWL SPACE UNDER EACH PORTABLE UNIT TO STEAM DRAIN SYSTEM.
- 16) ADJUST ALL EXISTING UTILITY BOXES TO FINISHED GRADE. CONCRETE COLLARS SHALL BE POURED AROUND CLEAN-OUTS, BLOWOFFS, AND UTILITY BOXES. SAWCUT AND POUR COLLARS AFTER COMPLETION OF NEW PAVEMENT.
- 17) VENT STRUCTURE SHALL BE CONSTRUCTED WITH FOUNDATION. SEE ARCHITECT'S PLANS FOR DETAIL.
- 18) REMOVE AND SALVAGE EXISTING BASKETBALL GOALS AND TETHERBALL POLES. DELIVER TO AN "ON-SITE" LOCATION AS DIRECTED BY THE DISTRICT.
- 19) INSTALL REBAR DOWELS PER DETAIL (D) HEREIN.
- 20) INTENTIONALLY LEFT BLANK.
- 21) INTENTIONALLY LEFT BLANK.
- 22) INTENTIONALLY LEFT BLANK.

DOMESTIC WATER NOTES:

- 23) SEE GENERAL NOTES AND SPECIFICATIONS ON SHEET 3 OF THESE PLANS.
- 24) CUT-IN/JOIN EXISTING WATER LINE. COORDINATE WITH DISTRICT FOR ACCEPTABLE TIMES TO SHUT OFF WATER SERVICE.
- 25) ALL UTILITIES WITH LESS THAN 18-INCHES OF COVER SHALL BE ENCASED IN A CONCRETE SLURRY PER DETAIL (J).
- 26) INSTALL 2-INCH DOMESTIC WATER LINE. SEE DISTRICT'S PLUMBING STANDARDS.
- 27) INSTALL 8-INCH PVC C900 FIRE WATER LINE, IN ACCORDANCE WITH CITY OF BAKERSFIELD STANDARD W-1.
- 28) INSTALL 8-INCH GATE VALVE AND VALVE BOX PER CITY OF BAKERSFIELD STANDARDS.
- 29) INSTALL 2-INCH GATE VALVE AND VALVE BOX PER DISTRICT STANDARDS.
- 30) INSTALL THRUST BLOCKS AT ALL WATERLINE ANGLE POINTS PER CITY OF BAKERSFIELD STANDARD W-2.
- 31) FURNISH AND INSTALL DOUBLE DETECTOR CHECK VALVE, OS&Y, PER COUNTY AND CITY FIRE DEPARTMENT STANDARDS.
- 32) INSTALL FIRE HYDRANT PER CITY OF BAKERSFIELD STANDARD W-3.
- 33) INSTALL WATERLINE BLOW-OFF PER CITY OF BAKERSFIELD STANDARD W-4.
- 34) INSTALL 3/4-INCH DOMESTIC SERVICE PER DETAIL (I) HEREIN. CONNECT TO PORTABLE PER MANUFACTURER'S RECOMMENDATIONS. EXCLUDE 3/4" HOSE BIB EXCEPT WHERE NOTED ON THE PLANS.
- 35) INTENTIONALLY LEFT BLANK.
- 36) INTENTIONALLY LEFT BLANK.

SEWER AND STORM DRAIN NOTES:

- 37) FURNISH AND INSTALL 8-INCH PVC STORM DRAIN, SDR 35.
- 38) FURNISH AND INSTALL 4-INCH PVC SEWER, SDR 35.
- 39) INSTALL PLUG IN SEWER WHERE NOTED.
- 40) FURNISH AND INSTALL 4-INCH PVC SEWER, SDR 35, WITH SEWER WYES FOR CONNECTION TO BUILDING SEWER.
- 41) INSTALL SEWER WYES IN STORM DRAIN LINE FOR CONNECTION TO ROOF DRAINS. INSTALL ADAPTOR FOR RECTANGULAR ROOF DRAIN TO CIRCULAR STORM DRAIN.
- 42) INSTALL SEWER CLEAN-OUT PER CITY OF BAKERSFIELD STANDARD SW-5, WHERE INDICATED FOR BOTH SEWER AND STORM DRAIN. CONSTRUCT CONCRETE COLLAR AROUND CLEANOUT PER C.O.B. STANDARD SW-5.
- 43) FURNISH AND INSTALL 24-INCH SQUARE DRAINAGE INLET - CHRISTY U23 WITH H20, ADA COMPLIANT AND HEEL PROOF GRATE. SEE SHEET 5 FOR DETAIL.
- 44) FURNISH AND INSTALL SEWER MANHOLE PER CITY OF BAKERSFIELD STANDARD SW-2.
- 45) EXCAVATE DEPRESSION AS SHOWN FOR STORM WATER RETENTION AND INFILTRATION. HYDROSEED DISTURBED AREA UPON COMPLETION OF GRADING AND INSTALLATION OF DRAINAGE APPURTENANCES.
- 46) INSTALL STORM DRAIN ROCK WELL PER DETAIL (S) HEREIN. INSTALL SEDIMENT BARRIER DURING CONSTRUCTION AND MAINTAIN UNTIL "GROW-IN" IS COMPLETE.
- 47) INSTALL 2-INCH SEWER LATERAL WITH WYE AND CLEAN-OUT. MAKE CONNECTION TO EACH PORTABLE UNIT PER MANUFACTURER'S RECOMMENDATION.
- 48) INTENTIONALLY LEFT BLANK.



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REVISIONS
DATE
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MATTHEW K. VOVILLA
REGISTERED PROFESSIONAL ENGINEER
STATE OF CALIFORNIA
Exp. 3-31-12

NOTES, DETAILS & TYPICAL SECTIONS
PIONEER ELEMENTARY SCHOOL
4404 PIONEER DRIVE
BAKERSFIELD, CALIFORNIA

JOB NO.: 09-419
DWG NO.: 09-419-BM
DATE: 09/01/2010
DRAWN BY: ADK
CHECKED BY: MKV
SHEET 4
OF 10 SHEETS