- 3. THE CONTRACTOR SHALL PROPERLY GRADE ALL EXCAVATED SURFACES TO PROVIDE POSITIVE DRAINAGE AND PREVENT PONDING OF WATER. CONTRACTOR SHALL CONTROL SURFACE WATER TO AVOID DAMAGE TO ADJOINING PROPERTIES OR TO FINISHED WORK ON THE SITE, AND SHALL TAKE REMEDIAL MEASURES TO PREVENT EROSION OF FRESHLY GRADED AREAS UNTIL SUCH TIME AS PERMANENT DRAINAGE AND EROSION CONTROL MEASURES HAVE BEEN INSTALLED TO THE SATISFACTION OF THE CITY ENGINEER AND THE MITIGATION MONITOR.
- 4. ALL AREAS TO BE FILLED SHALL BE PREPARED PRIOR TO FILLING, AND FILL SHALL BE PLACED IN ACCORDANCE WITH STANDARD SPECIFICATIONS AND THE RECOMMENDATIONS AND SPECIFICATIONS CONTAINED IN THE SOILS REPORT. ALL VEGETABLE MATTER AND OTHER OBJECTIONABLE MATERIALS SHALL BE REMOVED. BY THE CONTRACTOR, FROM THE SURFACE UPON WHICH THE FILL IS TO BE PLACED. LOOSE FILL AND UNSUITABLE SOILS SHALL BE REMOVED TO SUITABLE FIRM NATURAL GROUND. THE EXPOSED SOILS SHALL BE SCARIFIED IN ACCORDANCE WITH THE GEOTECHNICAL REPORT AND THEN COMPACTED TO A MINIMUM OF 90% OF ASTM-D1557. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO PLACE, SPREAD, WATER AND COMPACT THE FILL IN STRICT ACCORDANCE WITH THE SPECIFICATIONS.
- 5. CUT AND FILL SLOPES SHALL BE CUT AND TRIMMED TO THE FINISHED GRADE TO PRODUCE SMOOTH SURFACES AND UNIFORM CROSS SECTIONS. THE SLOPES OF EXCAVATIONS AND EMBANKMENTS SHALL BE SHAPED, TRIMMED, AND PLANTED IN ACCORDANCE WITH THE PLANTING NOTES AND AS DIRECTED BY THE ENGINEER OF WORK, AND LEFT IN A NEAT AND ORDERLY CONDITION. ALL STONES, ROOTS AND OTHER WASTE MATERIALS EXPOSED ON THE EXCAVATION OR EMBANKMENT SLOPES WHICH ARE LIABLE TO BECOME LOOSENED, SHALL BE REMOVED AND DISPOSED OF. THE TOE AND TOP OF ALL SLOPES SHALL BE ROUNDED IN ACCORDANCE WITH ORDINANCE NO. 1797, THESE GRADING PLANS, AND THE STANDARD DRAWINGS GRD-01 AND GRD-02. SLOPE SETBACKS AND GRADES SHALL CONFORM TO GRD-06.
- 6. IF THERE ARE EROSION SCARS ON EXISTING SLOPES WHICH OTHERWISE WOULD NOT BE ELIMINATED BY THE PROPOSED GRADING, THESE SCARS ARE TO BE ELIMINATED BY TRIMMING, FINE GRADING AND PLANTING. IF THE SCARS ARE IN AREAS OF NATIVE VEGETATION, THE REPAIRS SHOULD BE PERFORMED WITH AN EFFORT TO AVOID OR MINIMIZE IMPACTS TO NATIVE VEGETATION. ALL SUCH REPAIRS IN AREAS OF NATIVE VEGETATION SHALL BE REVIEWED AND APPROVED BY THE CITY'S MITIGATION MONITORING COORDINATOR PRIOR TO THE BEGINNING OF THE REPAIR WORK.
- 7. ALL TREES, BRUSH, GRASS, AND OTHER OBJECTIONABLE MATERIAL SHALL BE COLLECTED, PILED OR OTHERWISE DISPOSED OF OFF THE SITE BY THE CONTRACTOR SO AS TO LEAVE THE AREAS THAT HAVE BEEN CLEARED WITH A NEAT AND FINISHED APPEARANCE FREE FROM UNSIGHTLY DEBRIS. APPROVAL OF LOCATIONS FOR DEBRIS FILL SHALL BE OBTAINED FROM THE SOILS ENGINEER PRIOR TO THE DISPOSAL OF ANY SUCH MATERIAL
- 8. SUBDRAIN LOCATIONS SHOWN ARE APPROXIMATE AND ARE RECOMMENDED FOR ALL SIGNIFICANT FILL CANYONS. THE ACTUAL LOCATION AND EXTENT OF SUBDRAINS SHALL BE DETERMINED BY THE GEOTECHNICAL CONSULTANT AT THE TIME OF CONSTRUCTION.
- 9. THE SOILS REPORT TITLED "UPDATE GEOTECHNICAL REPORT. OTAY RANCH VILLAGE 8 EAST. CITY OF CHULA VISTA, CALIFORNIA" DATED MAY 5, 2023 SHALL BE CONSIDERED TO BE PART OF THIS GRADING PLAN. ALL GRADING SHALL BE DONE IN ACCORDANCE WITH THE RECOMMENDATIONS AND SPECIFICATIONS CONTAINED IN SAID REPORT.
- 10. CONTRACTOR SHALL VERIFY LOCATIONS OF ALL EXISTING UNDERGROUND UTILITIES. LOCATIONS SHOWN ON THESE PLANS ARE APPROXIMATE AND SHOWN FOR GENERAL INFORMATION ONLY.
- 11. WHERE GRADING DOES NOT OCCUR, ALL EXISTING PLANT MATERIAL IS TO BE PROTECTED IN PLACE. NO CONSTRUCTION EQUIPMENT WILL BE ALLOWED TO TRAVEL THROUGH AND DAMAGE ANY OF THESE AREAS. ALL AREAS TO BE RETAINED IN A NATURAL CONDITION SHALL BE FENCED UNDER THE DIRECTION OF THE PROJECT BIOLOGIST. CONTRACTOR WILL BE RESPONSIBLE TO REPAIR ANY AND ALL DAMAGE/IMPACTS TO THESE AREAS.
- 12. THE CONTRACTOR SHALL FURNISH TO THE ENGINEER OF WORK AS-BUILT PLANS FOR ALL NEW IMPROVEMENTS AND GRADING SHOWN ON THESE PLANS FOR SUBMITTAL TO THE CITY ENGINEER FOR APPROVAL IN ACCORDANCE WITH SECTION 15.04.140 OF THE CHULA VISTA MUNICIPAL CODE.
- 13. IN THE CASE OF CONFLICTS, THE REQUIREMENTS OF THE EARTHWORK, SPECIFICATIONS PREPARED FOR THE PROJECT BY THE SOILS ENGINEER SHALL GOVERN THE REQUIREMENTS OF THIS PLAN AND THESE NOTES AND THESE PLANS SHALL BE REVISED ACCORDINGLY.

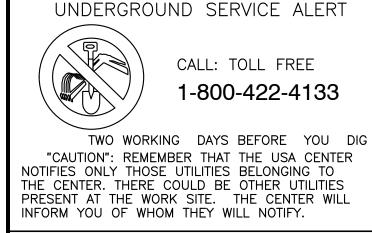
B. "DIG ALERT NOTICE"

IMPORTANT NOTICE

SECTION 4215/4217 OF THE GOVERNMENT CODE REQUIRES THAT A DIG ALERT IDENTIFICATION NUMBER BE ISSUED BEFORE A "PERMIT TO EXCAVATE" WILL BE VALID. PER YOUR DIG ALERT I.D. NUMBER CALL UNDERGROUND SERVICE ALERT TOLL FREE 1-800-422-4133 TWO WORKING DAYS BEFORE YOU DIG.

C. FIRE NOTE

ALL FIRE HYDRANTS AND HARD SURFACES ACCESS MUST BE IN PLACE BEFORE COMBUSTIBLE MATERIALS ARE DELVERED TO THE SITE.



ENGINEER AS-BUILT CERTIFICATE

HEREBY CERTIFY THAT TO THE BEST OF MY KNOWLEDGE AND BELIEF, THE IMPROVEMENTS SHOWN ON THIS SET OF PLANS (SHEET__ THROUGH SHEETS__) HAVE BEEN INSTALLED AND CONSTRUCTED IN SUBSTANTIAL CONFORMANCE WITH THE SAID PLANS, ALL APPROPRIATE STANDARDS AND ANY DISCRETIONARY APPROVAL(S) FOR THE PROJECT.

(SIGNATURE) P.E. NO.: 61827

REFERENCE DRAWINGS

.V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS

V. DWG. NO. 04080-IMP. PLANS C.V. DWG. NO. 19036-IMP. PLANS C.V. DWG. NO. 22043-GRADING PLANS

V. DWG. NO. 02025-IMP. PLANS | C.V. DWG. NO. 14011-GRADING PLANS | SR-125 PLANS-11232304

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE DISCIPLINE CIVIL FIELD PRIOR TO THE START OF CONSTRUCTION.

C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

UTILITY NOTE

OTAY RANCH VILLAGE 8 EAST

D. GENERAL NOTES

- 1. STORM DRAINS ARE SHOWN FOR INFORMATIONAL PURPOSES ONLY. APPROVAL OF THIS PLAN DOES NOT CONSTITUTE APPROVAL OF SIZES, LOCATIONS, AND TYPE OF SEWER AND DRAINAGE FACILITIES, OR ANY SURFACE IMPROVEMENTS WITHIN FUTURE STREET RIGHTS-OF-WAY SHOWN ON THESE PLANS. SEPARATE APPROVALS AND PERMITS FOR THESE SHALL BE REQUIRED IN CONJUNCTION WITH IMPROVEMENT PLANS.
- 2. WRITTEN PERMISSION SHALL BE OBTAINED FOR ANY OFF-SITE GRADING
- 3. CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS REQUIRED TO PROTECT ADJACENT PROPERTIES DURING GRADING OPERATIONS. ANYTHING DAMAGED OR DESTROYED SHALL BE REPLACED OR REPAIRED TO CONDITION EXISTING PRIOR TO GRADING.
- 4. THE DEVELOPER/CONTRACTOR SHALL BE RESPONSIBLE FOR SURVEY MONUMENTS AND/OR VERTICAL CONTROL BENCHMARKS WHICH ARE DESTROYED BY CONSTRUCTION. A LAND SURVEYOR MUST FIELD LOCATE AND TIE-OUT ALL SURVEY MONUMENTS WITHIN THE WORK AREA PRIOR TO CONSTRUCTION; AND IF DESTROYED, A LAND SURVEYOR, OR A CIVIL ENGINEER AUTHORIZED TO PRACTICE LAND SURVEYING SHALL REPLACE SUCH MONUMENTS WITH THE APPROPRIATE MONUMENTS, AND A CORNER RECORD OR RECORD OF SURVEY. AS APPROPRIATE. SHALL BE FILED AS REQUIRED BY THE PROFESSIONAL LAND SURVEYOR'S ACT. THE DEVELOPER/CONTRACTOR WILL BE RESPONSIBLE FOR THE COST OF REPLACING ANY VERTICAL BENCHMARKS DESTROYED BY CONSTRUCTION.
- 5. THE DEVELOPER/CONTRACTOR WILL BE RESPONSIBLE FOR THE COST OF REPLACING ANY VERTICAL BENCHMARKS DESTROYED BY THE CONSTRUCTION.
- 6. THE CONTRACTOR SHALL DESIGN, CONSTRUCT, AND MAINTAIN ALL SAFETY DEVICES, INCLUDING SHORING, AND SHALL BE RESPONSIBLE FOR CONFORMING TO ALL LOCAL, STATE, AND FEDERAL SAFETY AND HEALTH STANDARDS, LAWS, AND REGULATIONS.
- ALL FLOWS SHOWN ARE FOR 50 -YEAR STORM, EXCEPT AS NOTED.
- 8. ALL SEDIMENTATION BASINS, OUTLET PIPES AND DITCHES ARE PRIVATE UNLESS OTHERWISE NOTED AND HAVE NOT BEEN REVIEWED FOR ADEQUACY BY THE CITY ENGINEERING DEPARTMENT.
- 9. THE OWNER MUST OBTAIN AN EXCAVATION PERMIT FROM THE DIVISION OF OCCUPATIONAL SAFETY AND HEALTH (D.O.S.H.) FOR CONSTRUCTION OF TRENCHES OR EXCAVATIONS WHICH ARE FIVE FEET OR DEEPER INTO WHICH A PERSON IS REQUIRED TO DESCEND. SAID PERMIT IS REQUIRED PRIOR TO ISSUANCE OF A GRADING PERMIT BY THE CITY OF CHULA VISTA.
- 10. GRADING EQUIPMENT SHALL NOT USE OR BLOCK TRAFFIC LANES DURING GRADING ACTIVITY, TRUCK OPERATIONS IN AND OUT OF CONSTRUCTION AND STAGING AREAS SHALL BE CONTROLLED AS REQUIRED BY THE CITY. TRUCK AND EQUIPMENT ROUTES IN AND OUT OF THE SITE, SHALL BE APPROVED BY THE CITY PRIOR TO START OF WORK. AT THE END OF THE WORKING DAY, STREETS SHALL BE CLEANED OF DIRT AND CONSTRUCTION DEBRIS TO THE SATISFACTION OF THE CITY INSPECTOR AND THE MITIGATION MONITOR.
- 11. DUST GENERATED BY CONSTRUCTION ACTIVITIES SHALL COMPLY WITH LOCAL DUST CONTROL, ANY REQUIREMENTS OF ANY MITIGATION MONITORING PROGRAMS. AND UNIFORM BUILDING CODE (UBC) REQUIREMENTS, WHICH INCLUDE DUST CONTROL MEASURES FOR CONSTRUCTION SITES. DUST REDUCING MEASURES SHALL INCLUDE, BUT NOT LIMITED TO, REGULAR WATERING OF GRADED SURFACES AND RESTRICTION OF ALL CONSTRUCTION VEHICLES AND EQUIPMENT TO TRAVEL ALONG ESTABLISHED AND REGULARLY WATERED ROADWAYS AT SPECIFIED SPEEDS.

E. PRE-CONSTRUCTION CONFERENCE

THE CONTRACTOR SHALL NOT BEGIN ANY WORK ON THIS PROJECT UNTIL A PRECONSTRUCTION CONFERENCE IS HELD WITH THE ENGINEER OF WORK, THE SOILS ENGINEER, DEVELOPER, CONTRACTOR, OTAY WATER DISTRICT INSPECTOR, AND CITY ENGINEER.

F. SHEET INDEX

SHEET TITLE, NOTES & LEGEND NOTES & MITIGATION MONITORING NOTES SHEET 2: SHEET 3: MITIGATION MONITORING NOTES SHEET 4: INDEX MAP SHEET 5: EXISTING BOUNDARY MAP PROPOSED BOUNDARY MAP SHEET 6: SHEET 7&8: STREET SECTIONS GRADING SECTIONS SHEET 9&10: SHEET 11&12: GRADING DETAILS SHEET 13: FILLTERA DETAILS SHEET 14&15: MWS UNITS DETAILS ROUGH GRADING PLANS SHEET 16-38: SHEET 39-56: STORM DRAIN PROFILES **EROSION CONTROL PLANS** SHHET 57-61 SHEET 62-86 GEOGRID WALL PLANS SHEET 87-90 ORIE WALLS

H. OWNER'S CERTIFICATE:

IT IS AGREED THAT FIELD CONDITIONS MAY REQUIRE CHANGES TO THISE PLANS. IT IS FURTHER AGREED THAT THE OWNER (DEVELOPER SHALL HAVE THE ENGINEER OF WORK MAKE SUCH CHANGES, ALTERATIONS OR ADDITIONS TO THESE PLANS WHICH THE ENGINEER OF WORK DETERMINES ARE NECESSARY AND DESIRABLE FOR THE PROPER COMPLETION OF THE IMPROVEMNETS. ALL PLAN CHANGES SHALL BE APPROVED BY THE CITY ENGINEER PRIOR TO CONSTRUCTION.

I FURTHER AGREE TO COMMENCE WORK ON ANY IMPROVEMENTS SHOWN ON THISE PLANS WITHIN EXISTION CITY RIGHT-OF-WAY WITHIN 60 DAYS AFTER ISSUANCE OF THE CONSTRUCTION PERMIT AND TO PURSUE SUCH WORK ACTIVELY ON EVERY NORMAL WORKING DAY UNTIL COMPLETED, IRRESPECTIVE AND INDEPENDENT OF ANY OTHER WORK ASSOCIATED WITH THIS PROJECT OR UNDER MY CONTROL.

1903 WRIGHT PLACE, SUITE 220 CARLSBAD, CA 92008 (760) 918-8200

DATE:

By | Date | App'd |

REVISIONS

. OWNER/APPLICANT

HOMEFED OTAY LAND II, LLC

HOMEFED OTAY LAND II, LLC 1903 WRIGHT PLACE, SUITE 220 CARLSBAD, CA 92008 (760) 918-8200

REVISIONS



CHULA VISTA TRACT NO. 22-0005

J. SOILS ENGINEER'S CERTIFICATE

I, SHAWN WEEDON, A REGISTERED CIVIL ENGINEER OF THE STATE OF CALIFORNIA, PRINCIPALLY DOING BUSINESS IN THE FIELD OF APPLIED SOIL MECHANICS, HEREBY VERIFY THAT A SAMPLING AND STUDY OF THE SOIL CONDITIONS PREVALENT WITHIN THIS SITE WAS MADE BY ME OR UNDER MY DIRECTION BETWEEN THE DATES OF MARCH TO MAY 2023. ONE COMPLETE COPY OF THE SOILS REPORT COMPILED FROM THIS STUDY, WITH MY RECOMMENDATIONS. HAS BEEN SUBMITTED TO THE OFFICE OF THE CITY ENGINEER.

6. VICINITY MAP

No. 2714

THESE GRADING PLANS HAVE BEEN REVIEWED BY ME OR UNDER MY DIRECTION AND CONFORM TO THE

RECOMMENDATIONS MADE IN THE SOILS REPORT MENTIONED ABOVE.

EXPIRATION DATE:

RCE No. 61827

SHAWN WEEDON G.E. NO. 2714

K. DECLARATION OF RESPONSIBLE CHARGE

I HEREBY DECLARE THAT I AM THE ENGINEER OF WORK FOR THIS PROJECT, THAT I HAVE EXERCISED RESPONSIBLE CHARGE OVER THE DESIGN OF THE PROJECT AS DEFINED IN SECTION 6703 OF THE BUSINESS AND PROFESSIONS CODE AND THAT THE DESIGN IS CONSISTENT WITH CURRENT STANDARDS. I UNDERSTAND THAT THE CHECK OF THE PROJECT DRAWINGS AND SPECIFICATIONS BY THE CITY OF CHULA VISTA AND WATER DISTRICT IS CONFINED TO REVIEW ONLY AND DOES NOT RELIEVE ME AS ENGINEER OF WORK,OF MY RESPONSIBILITIES FOR THE PROJECT DESIGN.

HUNSAKER & ASSOCIATES SAN DIEGO, INC. 9707 WAPLES STREET SAN DIEGO, CA 92121

L. LEGAL DESCRIPTION

YOLANDA CALVO

DISCIPLINE: GEOLOGIST

THE LAND REFERRED TO HEREIN BELOW IS SITUATED IN THE CITY OF CHULA VISTA, IN THE COUNTY OF SAN DIEGO, STATE OF CALIFORNIA, AND IS DESCRIBED AS FOLLOWS:

PARCEL A: APN: 644-070-21-00 AND APN: 646-010-08-00

PARCELS 1 AND 2 OF PARCEL MAP NO. 21215, IN THE CITY OF CHULA VISTA, COUNTY OF SAN DIEGO, STATE OF CALIFORNIA. FILED IN THE OFFICE OF THE COUNTY RECORDER OF SAID COUNTY. JANUARY 29, 2015 AS FILE NO. 2015-7000023, OFFICIAL RECORDS.

EXCEPTING THEREFROM, THAT PORTION OF SAID PARCEL 2 DESCRIBED IN THE IRREVOCABLE OFFER OF DEDICATION OF FEE INTEREST RECORDED DECEMBER 10, 2014, AS INSTRUMENT NO. 2014-0543530 OF OFFICIAL RECORDS, AS ACCEPTED BY THE CITY OF CHULA VISTA IN DOCUMENT RECORDED JUNE 23, 2015, AS INSTRUMENT NO. 2015-0326142 OF OFFICIAL RECORDS.

PARCEL B: APN: 644-070-20-00

ALL THAT PORTION OF THE SAN DIEGO PIPELINE RIGHT-OF-WAY GRANTED TO THE CITY OF SAN DIEGO PER DEED RECORDED JANUARY 31, 1913 IN BOOK 598, PAGE 54 OF DEEDS LYING WITHIN LOT 24 OF THE OTAY RANCHO, IN THE CITY OF CHULA VISTA, COUNTY OF SAN DIEGO, STATE OF CALIFORNIA, ACCORDING TO MAP THEREOF NO. 862, FILED IN THE OFFICE OF THE COUNTY RECORDER OF SAN DIEGO COUNTY FEBRUARY 7, 1900. BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS:

(CONTINUED ON SHEET 3)

M. ASSESSOR'S PARCEL NOS.

644-070-21-00, 646-010-08-00, 644-070-20-00

N. BENCHMARK

BRASS DISK MARKED "SD CITY ENGR." IN 3/4" IRON PIPE 1.5 MILES EAST OF INTEREECTION OF MAIN STREET &HERITAGE ROAD ON ROCK MOUNTAIN 100' EASTERLY OF PROMINENT 10' HIGH BOULDER & 1700' SOUTHERLY OF WATER STORAGE FACILITY. (PT # 1359 PER R.O.S. 14841) ELEVATION 628.319' (NAVD '88)

BASIS OF BEARINGS: CCS '83 CALIFORNIA COORDINATE SYSTEM ZONE 6, 1991.35 EPOCH, GRID BEARING BETWEEN STATION 1359 AND STATION 5106 AS SAID COORDINATES ARE PUBLISHED IN RECORD OF SURVEY MAP NO. 14841 ARE IN THE CITY OF CHULA VISTA HORIZONTAL CONTROL NETWORK. I.E. N87°20'10"E.

THE COMBINED SCALE FACTOR AT STATION 1359 IS 1.00001153. GRID DISTANCE = GROUND DISTANCE x COMBINED SCALE FACTOR.

No. 61827

Plans Prepared Under Supervision Of:

YOLANDA CALVO

Drawn By:

P.A.A.

Designed By:

A.C.G/P.A.A.

O. AS-BUILTS

THE CONTRACTOR SHALL FURNISH TO THE ENGINEER OF WORK, AS-BUILT PLANS FOR ALL NEW IMPROVEMENTS AND GRADING SHOWN ON THESE PLANS FOR SUBMITTAL TO THE CITY ENGINEER FOR APPROVAL IN ACCORDANCE WITH SECTION 15.04.140 OF THE CHULA VISTA MUNICIPAL CODE.

P. TOPOGRAPHY SOURCE

R.J. LUNG & ASSOCIATES 2832 WALNUT AVENUE, SUITE E TUSTIN, CA 92780 (714) 832-2077 FLOWN DEC. 22, 2021

Q. EARTHWORK QUANTITIES

CUT: 4,850,000 C.Y. FILL: 4,850,000 C.Y. EXPORT: 0.0 CY AREA TO BE GRADED: 525 AC

By | Date | App'd |

GRADING QUANTITIES ARE ESTIMATED FOR BONDING PURPOSES ONLY AND ARE NOT TO BE USED FOR FINAL PAYMENT QUANTITIES.



Checked By: Y.C.

Date:

⁻ R.C.E. No. <u>61827</u>

THE CITY OF CHULA VISTA 1/2

IF THIS BAR DOES

NOT MEASURE 1 THEN DRAWING

NOT TO SCALE

R. WORK TO BE DONE

THE WORK TO BE DONE CONSISTS OF THE ITEMS INDICATED UNDER THE "LEGEND" SHOWN BELOW, AND IS TO BE DONE IN ACCORDANCE WITH THESE PLANS AND THE FOLLOWING LIST OR PRINTED MATERIALS AS CURRENTLY ADOPTED BY THE CITY OF CHULA VISTA CITY COUNCIL INCLUDING THE FOLLOWING:

- 1. 2012 STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION ("GREENBOOK") AND 2012 REGIONAL SUPPLEMENT AMENDMENTS (TO THE GREENBOOK).
- 2. 2012 SAN DIEGO AREA REGIONAL STANDARD DRAWINGS.
- 3. 2019 CITY OF CHULA VISTA STANDARD SPECIAL PROVISIONS (TO THE GREENBOOK).
- 4. 2017 DESIGN AND CONSTRUCTION STANDARDS OF THE CITY OF CHULA VISTA.
- 5. PORTION OF THE STATE STANDARD SPECIFICATIONS, STATE OF CALIFORNIA, DEPARTMENT OF TRANSPORTATION, DATED JULY 2010 AND ALL SUBSEQUENT ADDITIONS AND REVISIONS.
- 6. PORTION OF THE STATE STANDARD PLANS, STATE OF CALIFORNIA, DEPARTMENT OF TRANSPORTATION, DATED JULY 2010 AND ALL SUBSEQUENT ADDITIONS AND REVISIONS.
- 7. 2014 CALIFORNIA MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES ("CA-MUTCD") AND ALL SUBSEQUENT ADDITIONS AND REVISIONS.
- 8. WATER AGENCIES STANDARDS SPECIFICATIONS FOR WATER, RECYCLED WATER AND SEWER FACILITIES, LATEST EDITION.

ALL REFERENCES ARE TO BE MADE PART OF THESE PLANS. ANY CHANGES OR REVISIONS THEREFROM, SHALL BE APPROVED BY THE CITY ENGINEER. OR HIS DESIGNEE, PRIOR TO ANY REQUEST. FOR INSPECTION.

S. LEGEND	DRAWING NO.	SYMBOL
SUBDIVISION BOUNDARY		
RIGHT OF WAY		
EASEMENT LINE		
CURB LINE		
EXISTING CONTOURS		100
PROPOSED FINISH CONTOURS		100
EXISTING TOP OF CURB ELEVATION	DNS	× (600.00) TC
EXISTING FINISH EDGE OF PAVEM	ENT ELEVATIONS	× (600.00) FS
FLOW LINE ELEVATION		× 600.00 FI
FINISH GRADE ELEVATION		× <u>600.00</u> FG
RCP STORM DRAIN	SDRSDD-60 (AGGREGATE TO SPRINGLINE), D-61	=====
HDPE (OR HP EQUIVALENT) STORI SEE INSTALLATION NOTES ON SHI	M DRAINEET 2	 -
TYPE F CATCH BASIN	SDRSDD-7	=-=
TYPE A CLEANOUT	SDRSDD-9, D-11	=-= =
TYPE B CURB INLET	SDRSDD-2	
TYPE A CURB OUTLET	SDRSDD-25	0
CUT SLOPE (2:1 MAXIMUM)	CVDS- GR01, GR02	_YY_
FILL SLOPE (2:1 MAXIMUM)	CVDS- GR01, GR02	
DRAINAGE DITCH	SDRSDD-75TYPE B	$\Rightarrow \Rightarrow =$
CUT AND FILL LINE		
DAYLIGHT LINE		F
EARTHEN SWALE		- ···-
EXISTING FENCE		-XXX-
EXISTING TREE		
		7.4%_
	IG WELL TO REMOVE	
	IG WELL TO REIVIOVE	\otimes
		\triangle
	CVDS GRD-05	
		———W—
		s
		RW
		DOQ
EXISTING STORM DRAIN		

TITLE/NOTES SHEET FOR OTAY RANCH VILLAGE 8 EAST

CHULA VISTA TRACT NO. 22-0005

DEVELOPMENT SERVICES DEPARTMENT		ACCELA NO.: XXXX	
		PROJECT NO.: XXXX	
Approved:	TOTAL SHEETS: 90		
Ву:		1796 - 6340	
	Principal Civil Engineer		
Submitted:	NAD83 COORDINATES		
Ву:	154 - 1773		
Planning:	Landscape:	LAMBERT COORDINATES	
	DRAWING NO.		
CONTRACTOR:			G001
INSPECTOR:	DATE COMPLETED:	XXXXX.XXX	

R:\0920\&Eng\Rough Grading\0920RG01

MY REGISTRATION EXPIRES:

FOR ANY QUESTIONS REGARDING THE MARK OUT OF UNDERGROUND UTILITIES, THE CONTRACTOR SHOULD CONTACT THE RESPECTIVE UTILITY COMPANY:

STREET LIGHT OR SIGNAL LIGHT CONDUIT / CITY OF CHULA VISTA (619) 397-6163 SEWER OR STORM DRAIN / CITY OF CHULA VISTA VERIFICATION (619) 691-5024 NOTIFICATION (619) 397-6000 GAS & ELECTRIC SAN DIEGO GAS & ELECTRIC CO. 1-800-227-2600 / (619) 230-7800 WATER OTAY WATER DISTRICT (619) 670-2222 SWEETWATER AUTHORITY (619) 420-1413 TELEPHONE PACIFIC BELL (619) 266-4683 TELEVISION COX CABLE OF SAN DIEGO / CHULA VISTA CABLE (619) 263-9251 / (619) 476-0177 **ULTRONICS & WORLDWIDE SATELLITE** (619) 422-0776

U. NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) STATEMENT

DEVELOPMENT OF THIS PROJECT SHALL COMPLY WITH ALL REQUIREMENTS OF STATE WATER RESOURCES CONTROL BOARD (SWRCB) (NPDES GENERAL PERMIT NO. CAS000002, WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF STORM WATER RUNOFF ASSOCIATED WITH CONSTRUCTION ACTIVITY. IN ACCORDANCE WITH SAID PERMIT, A STORM WATER POLLUTION PREVENTION PLAN (SWPPP) AND A MONITORING PROGRAM PLAN SHALL BE DEVELOPED AND IMPLEMENTED CONCURRENT WITH THE COMMENCEMENT OF GRADING ACTIVITIES. THE SWPPP SHALL SPECIFY BOTH CONSTRUCTION AND POST-CONSTRUCTION STRUCTURAL AND NON-STRUCTURAL POLLUTION PREVENTION MEASURES. THE SWPPP SHALL ALSO ADDRESS OPERATION AND MAINTENANCE OF POST-CONSTRUCTION POLLUTION PREVENTIONS MEASURES. INCLUDING SHORT-TERM AND LONG-TERM FUNDING SOURCES AND THE PARTY OR PARTIES THAT WILL BE RESPONSIBLE FOR THE IMPLEMENTATION OF SAID MEASURES.

A COMPLETE AND ACCURATE NOTICE-OF-INTENT (NOI) WILL BE FILLED WITH THE SWRCB, A COPY OF THE ACKNOWLEDGMENT FROM THE SWRCB THAT A NOI HAS BEEN RECEIVED FOR THIS PROJECT SHALL BE FILED WITH THE CITY OF CHULA VISTA WHEN RECEIVED; FURTHER, A COPY OF THE COMPLETED NOI FROM THE SWRCB SHOWING THE PERMIT NUMBER FOR THIS PROJECT BE FILED WITH THE CITY OF CHULA VISTA WHEN RECEIVED.

IN ADDITION, THE UNDERSIGNED AND SUBSEQUENT OWNER(S) OF ANY PORTION OF THE PROPERTY COVERED BY THIS GRADING PERMIT NO. GR23-0017 SHALL COMPLY WITH SPECIAL PROVISIONS REGARDING THE REVOCATION OR CANCELLATION OF NPDES GENERAL PERMIT COVERAGE, AS SET FORTH IN SWRCB ORDER NO. CAS000002, AND ANY SUBSEQUENT AMENDMENTS THERETO AND REISSUANCES THEREOF.

OWNER OF LAND: _	HOMEFED OTAY LAND II, LLC
	ID OWNER, CORPORATE PARTNER OR PROPRIETOR:
DATE:	ERIN RUHE
TITLE: VICE P	PRESIDENT
PERMIT IDENTIFICAT	TION NUMBER: 9 37C402003

V. LANDSCAPING NOTES

- 1. ALL SLOPES 3 FEET IN VERTICAL HEIGHT AND GREATER SHALL BE PLANTED AND IRRIGATED IN ACCORDANCE WITH LANDSCAPE IMPROVEMENT PLANS CONFORMING TO THE CITY OF CHULA VISTA ALNDSCAPE MANUAL (MOST RECENT EDITION), GRADING ORDINANCE NO. 1797, THE WATER CONSERVATION ORDINANCE, AND THE SAN DIEGO COUNTY HANDBOOK FOR PUBLIC WORKS CONSTRUCTION. WHENEVER SPECIAL REQUIREMENTS COFLICT ON ANY MATTER, THE DIRECTOS OF DEVELOPMENT SERVICES OR DESIGNEE SHALL DETERMINE WHICH SPECIAL CONDITION OR CODE SHALL GOVERN, PLANS SHALL BE APPROVED BY THE DIRECTOR OF DEVELOPMENT SERVICES OR DESIGNEE PRIOR TO ISSUANCE OF APPLICABLE CONSTRUCTION AND BUILDING PERMITS.
- 2. FINISH GRADING AND PLANTING SHALL BE ACCOMPLISHED ON ALL SLOPES PRIOR TO OCTOBER 1 OR IMMEDIATELY UPON COMPLETION OF ANY SLOPES GRADED BETWEEN OCTOBER 1 AND APRIL 1. AS DIRECTED BY THE CITY'S DIRECTOR OF DEVELOPMENT SERVICES.
- 3. PRIOR TO GRADING. CONTRACTOR SHALL FIELD VERIFY EXISTING IRRIGATION SYSTEMS TO DETERMINE WHICH ARE OPERABLE. UNLESS OTHERWISE NOTED ON THESE PLANS. ALL EXISTING IRRIGATION SYSTEMS ARE TO BE PROTECTED IN PLACE AND REMAIN OPERABLE. CONTACT CITY STAFF TWO (2) WORKING DAYS IN ADVANCE OF ANY WORK.

CITY CONTACTS: SR. LANDSCAPE INSPECTOR - DAVE DEFACCI, (619-409-5432) DDEFACCI@CHULAVISTACA.GOV PARK MANAGER - ERIC GARWICK (619-587-5790) EGARWICK@CHULAVISTACA.GOV OPEN SPACE MANAGER - SAM OLUDUNFE (619-397-6006) SOLUDUNFE@CHULAVISTACA.GOV PUBLIC WORKS SUPERINTENDENT - KALANI CAMACHO (619-397-6113) KALANIC@CHULAVISTACA.GOV

4. FOR LANDSCAPE AND IRRIGATION PLANS, SEE SEPARATE SET ASSOCIATED WITH GRADING PERMIT GR23-XXXX.

W. RCP STORM DRAIN BEVELING NOTES:

_P.E. No. <u>61827</u>

Discipline _

- 1. WHERE RADIUS CURVE=90 FEET TO 45 FEET, USE 8-FOOT LENGTH OF PIPE BEVELED ONE END.
- 2. WHERE RADIUS CURVE=45 FEET TO 22 1/2 FEET, USE 8-FOOT LENGTH OF PIPE BEVELED BOTH
- 3. WHERE RADIUS CURVE=22 1/2 FEET, USE 4-FOOT LENGTH OF PIPE BEVELED BOTH ENDS.

REFERENCE DRAWINGS

V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS

V. DWG. NO. 04080-IMP. PLANS C.V. DWG. NO. 19036-IMP. PLANS C.V. DWG. NO. 22043-GRADING PLANS

V. DWG. NO. 02025-IMP. PLANS | C.V. DWG. NO. 14011-GRADING PLANS | SR-125 PLANS-11232304

4. CONTRACTOR SHALL PROVIDE LAYOUT SHEET OF BEVELED PIPE PRIOR TO BEGINNING INSTALLATION.

UTILITY NOTE

FIELD PRIOR TO THE START OF CONSTRUCTION.

C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN

FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL

VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE

X. HDPE & HP STORM DRAIN INSTALLATION NOTES:

- 1. REFERENCE MANUFACTURER INSTALLATION GUIDE AND SPECIFICATIONS FOR MAXIMUM JOINT DEFLECTION.
- 2. CURVILINEAR INSTALLATIONS SPECIFIED PER THIS PLAN ARE BASED ON CHAPTER 5 (INSTALLATION) OF THE ADS, INC. DRAINAGE HANDBOOK, AND ASSUME THE USE OF "N-12 WT IP" AND/OR "HP STORM" GASKETED WATERTIGHT COUPLERS. FOR RADII LESS THAN THAT ACHIEVABLE WITH STANDARD JOINT DEFLECTION A SERIES OF PREFABRICATED BENDS SHALL BE UTILIZED.
- ALL CONCRETE STRUCTURES USED WITH HDPE PIPE MUST BE WATERTIGHT.
- 4. TRENCH BACKFILL FOR HDPE N-12 PER SDRSD SP-02 WITH FILTER FABRIC FULLY SURROUNDING ROCK
- 5. TRENCH BACKFILL FOR HP PER SDRSD SP-02 WITH ROCK TO PIPE CROWN AND FILTER FABRIC ON TOP OF ROCK ZONE.

Y. SPECIAL NOTES

- 1. THE CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFYING THE QUANTITIES SHOWN HEREON AND BALANCING THE EARTHWORK ONSITE. IF DISCREPANCIES ARISE, THE ENGINEER OF WORK SHALL PROVIDE AREAS OF ADJUSTMENT TO THE CONTRACTOR. WHERE TRENCHES ARE WITHIN EASEMENTS, STREETS, OR 10' OF ANY BUILDING, SOILS REPORTS SHALL BE SUBMITTED TO THE ENGINEER OF WORK BY A QUALIFIED SOILS ENGINEER WHICH INDICATE THAT THE TRENCH BACKFILL WAS COMPACTED UNDER THE OBSERVATION OF THE SOILS ENGINEER AND IN ACCORDANCE WITH THE EARTHWORK SPECIFICATIONS.
- THE CONTRACTOR SHALL BE RESPONSIBLE TO INSURE THAT ALL SLOPES ARE BUILT IN ACCORDANCE WITH THESE PLANS. IF THERE IS ANY QUESTION REGARDING THESE PLANS OR FIELD STAKES, THE CONTRACTOR SHALL REQUEST AN INTERPRETATION BEFORE DOING ANY WORK BY CALLING THE
- 3. THE PALEONTOLOGICAL MONITOR SHALL BE PRESENT DURING THE GRADING OF THE OLIGOCENE OTAY FORMATION ON THE SITE. THE MONITOR SHALL HAVE THE AUTHORITY TO TEMPORARILY DIRECT, DIVERT, OR HALT GRADING TO ALLOW RECOVERY OF FOSSIL REMAINS.
- 4. THE CONTRACTOR SHALL UNCOVER ALL UTILITIES THAT MAYBE JOINED, CROSSED, OR PARALLELED TO VERIFY BOTH HORIZONTAL AND VERTICAL LOCATION PRIOR TO ANY CONSTRUCTION. ANY CONFLICT OR DISCREPANCY SHALL BE BROUGHT TO THE ENGINEER'S ATTENTION PRIOR TO CONSTRUCTION. OTHERWISE THE CONTRACTOR ACCEPTS FULL RESPONSIBILITY FOR ANY ADDITIONAL CONSTRUCTION OR RELOCATION COSTS.
- 5. ALL FILL AREAS, WHICH ARE FENCED, SHALL REMAIN FENCED. TEMPORARY AND/OR FINAL FENCING SHALL BE PROVIDED AS SHOWN ON THE PLANS
- 6. ALL APPROVED GEOTEXTILE ENGINEERING FABRIC SHALL BE INSTALLED PER MANUFACTURERS SPECIFICATIONS.
- 7. A 6" MINIMUM THICKNESS BEDDING BLANKET UNDERLAIN BY A LAYER OF GEOTEXTILE (MIRAFI 700X OR EQUIVALENT) SHALL BE CONSTRUCTED BENEATH ALL RIP RAP. THE BEDDING BLANKET SHALL MEET THE FOLLOWING SPECIFICATIONS:
- A) FRACTION PASSING THE NO. 3/8 IN. STANDARD SIEVE SHALL BE 100% BY WEIGHT
- B) ANY SOURCE OF ON-SITE MATERIAL DEEMED SUITABLE BY THE SOILS ENGINEER
- 8. THE CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING, MAINTAINING, RELOCATING, AND OR REMOVAL OF EXISTING UTILITIES.
- 9. THE CONTRACTOR SHALL REPLACE ALL DESTROYED OR DAMAGED SURFACE IMPROVEMENTS WITH IMPROVEMENTS EQUAL OR SUPERIOR.
- 10. ALL CONTOURS AND ELEVATIONS SHOWN HEREON REPRESENT FINISH GRADE. CONTRACTOR SHALL MAKE THE APPROPRIATE ALLOWANCES FOR PAVEMENT SUBGRADE, PAD UNDERCUT, AND UTILITY
- 11. THE ENGINEER PREPARING THESE PLANS WILL NOT BE RESPONSIBLE FOR UNAUTHORIZED CHANGES TO OR USES OF THESE PLANS. ALL PROPOSED CHANGES TO THE PLANS MUST BE IN WRITING AND MUST BE APPROVED BY THE PREPARER OF THESE PLANS AND THE CITY OF CHULA VISTA.

Z. EROSION CONTROL NOTES:

SEE SHEETS 13 AND 14

REVISIONS

MONUMENT PRESERVATION CERTIFICATION

THE PERMITEE SHALL BE RESPONSIBLE FOR THE COST OF REPLACING ALL SURVEY MONUMENTS AND/OR BANCHMARKS DETROYED BY CONSTRUCTION PRIOR TO PERMIT ISSUANCE. THE PERMITTEE SHALL RETAIN THE SERVICE OF A PROFESSIONAL LAND SURVEYOR OR CIVIL ENGINEER AUTHORIZED TO PRACTICE LAND SURVEYING WHO WILL BE RESPONSIBLE FOR MONUMENT PRESERVATION AND SHALL PROVIDE A CORNER (SECTION 8771 OF THE BUSINESS AND PROFESSIONS CODE OF THE STATE OF CALIFORNIA). ANY BENCHMARKS OR HORIZONTAL CONTROL MONUMENTS DESTROYED SHALL BE RE-ESTABLISHED IN ACCORDANCE WITH CITY OF CHULA VISTA SUBDIVISION MANUAL SECTION 2-302.3 AND SECTION 2-302.1(8), RESPECTIVELY.

I HEREBY CERTIFY THAT I HAVE INSPECTED THE SITE AND DETERMINED THAT:

- □ NO SURVEY MONUMENTS WERE FOUND WITHIN THE LIMITS OF WORK
- SURVEY MONUMENTS EXISTING UN OR NEAR LIMITS OF WORK WILL BE PROTECTED IN PLACE
- SURVEY MONUMENTS HAVE BEEN FOUND WITHIN THE LIMITS OF WORK AND HAVE BEEN TIED OUT AND PRE-CONSTRUCTION CORNER RECORD OR RECORD OF SURVEY HAS BEEN FILED. ANY MONUMENRS DESTROYED BY COSNTRUCTION WILL BE REPLACED AND A POST-CONSTRUCTION CORNER RECORD WILL BE FILED.
- SURVEY MONUMENTS HAVE BEEN FOUND AND TIED OUT AND ARE OF THE CHARACTER AND LOCATION AS DESCRIBED IN AN EXISTING PUBLIC RECORD, WILL BE DESTROYED AND REPLACED, AND A POST CONSTRUCTION CORNER RECORD OR RECORD OF SURVEY WILL BE FILED.
- ☐ SURVEY MONUMENTS HAVE BEEN TIED OUT AND A FINAL OR PARCEL MAP WILL BE FILED (NO CORNER RECORD OR RECORD OF SURVEY WILL BE REQUIRED)
- CITY OF CHULA VISTA HORIZONTAL AND/OR VERTICAL CONTROL MONUMENT(S) WERE FOUND WITHIN THE LIMITS OF WORK AND THE CITY OF CHULA VISTA FIELD SURVEY SECTION HAS BEEN NOTIFIED.
- OTHER AGENCY SURVEY MONUMENT(S) WERE FOUND WITHIN THE LIMITS OF WORK, AND THE AGENCY HAS BEEN NOTIFIED OF POSSIBLE MONUMENT DESTRUCTION AND A LETTER PROVIDED TO CITY OF CHULA VISTA.

PRE-CONSTRUCTION CORNER RECORD OR RECORD OF SURVEY

CORNER RECORD# OR RECORD OF SURVEY #

By | Date | App'd |

REVISIONS

AA. MITIGATION MONITORING AND REPORTING PROGRAM NOTES

- 1. MM AQ-1 PRIOR TO APPROVAL OF ANY GRADING PERMITS. THE PROJECT APPLICANT OR ITS DESIGNEE SHALL PLACE THE FOLLOWING ON ALL GRADING PLANS TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR AND CITY ENGINEER, AND THESE REQUIREMENTS SHALL BE IMPLEMENTED DURING GRADING OF EACH PHASE OF THE PROJECT TO MINIMIZE NOX EMISSIONS:
- MINIMIZE SIMULTANEOUS OPERATION OF MULTIPLE CONSTRUCTION EQUIPMENT UNITS. DURING CONSTRUCTION, VEHICLES IN LOADING AND UNLOADING QUEUES SHALL TURN THEIR ENGINES OFF WHEN NOT IN USE TO REDUCE VEHICLE EMISSIONS;
- ALL CONSTRUCTION EQUIPMENT SHALL BE OUTFITTED WITH BEST AVAILABLE CONTROL TECHNOLOGY (BACT) DEVICES CERTIFIED BY CARB. A COPY OF EACH UNIT'S BACT DOCUMENTATION SHALL BE
- PROVIDED AT THE TIME OF MOBILIZATION OF EACH APPLICABLE UNIT OF EQUIPMENT ALL CONSTRUCTION EQUIPMENT SHALL BE PROPERLY TUNED AND MAINTAINED IN ACCORDANCE WITH MANUFACTURER'S SPECIFICATIONS;
- ALL DIESEL-FUELED, ON-ROAD CONSTRUCTION VEHICLES SHALL MEET THE EMISSION STANDARDS APPLICABLE TO THE MOST CURRENT YEAR TO THE GREATEST EXTENT POSSIBLE. TO ACHIEVE THIS STANDARD. NEW VEHICLES SHALL BE USED, OR OLDER VEHICLES SHALL USE POST-COMBUSTION CONTROLS THAT REDUCE POLLUTANT EMISSIONS TO THE GREATEST EXTENT FEASIBLE;
- THE EFFECTIVENESS OF THE LATEST DIESEL EMISSION CONTROLS IS HIGHLY DEPENDENT ON THE SULFUR CONTENT OF THE FUEL. THEREFORE, DIESEL FUEL USED BY ON- AND OFF-ROAD CONSTRUCTION EQUIPMENT SHALL BE LOW SULFUR (LESS THAN 15 PPM) OR OTHER ALTERNATIVE, LOW-POLLUTING
- DIESEL FUEL FORMULATION: THE USE OF ELECTRICAL CONSTRUCTION EQUIPMENT SHALL BE EMPLOYED WHERE FEASIBLE;
- THE USE OF CATALYTIC REDUCTION FOR GASOLINE-POWERED EQUIPMENT SHALL BE EMPLOYED WHERE
- THE USE OF INJECTION TIMING RETARD FOR DIESEL-POWERED EQUIPMENT SHALL BE EMPLOYED WHERE FEASIBLE.
- 2. MM AQ-2 PRIOR TO APPROVAL OF ANY GRADING PERMITS, THE PROJECT APPLICANT OR ITS DESIGNEE SHALL PLACE THE FOLLOWING STANDARD CONSTRUCTION BEST MANAGEMENT PRACTICES (BMPS) ON ALL GRADING PLANS TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR AND CITY ENGINEER AND SHALL IMPLEMENT THESE BMPS DURING PROJECT CONSTRUCTION TO MINIMIZE PM10 AND PM2.5 EMISSIONS, INCLUDING:
- WATER, OR UTILIZE ANOTHER ACCEPTABLE SDAPCD DUST CONTROL AGENT ON, THE GRADING AREAS AT
- LEAST TWICE DAILY TO MINIMIZE FUGITIVE DUST;
- STABILIZE GRADING AREAS AS QUICKLY AS POSSIBLE TO MINIMIZE FUGITIVE DUST; APPLY CHEMICAL STABILIZER OR PAVE THE LAST 100 FEET OF INTERNAL TRAVEL PATH WITHIN THE
- CONSTRUCTION SITE PRIOR TO PUBLIC ROAD ENTRY; INSTALL WHEEL WASHERS ADJACENT TO A PAVED APRON PRIOR TO VEHICLE ENTRY ON PUBLIC ROADS;
- REMOVE ANY VISIBLE TRACK-OUT INTO TRAVELED PUBLIC STREETS WITHIN 30 MINUTES OF OCCURRENCE;
- WET WASH THE CONSTRUCTION ACCESS POINT AT THE END OF THE WORKDAY IF ANY VEHICLE TRAVEL ON UNPAVED SURFACES HAS OCCURRED;
- PROVIDE SUFFICIENT PERIMETER EROSION CONTROL TO PREVENT WASHOUT OF SILTY MATERIAL ONTO PUBLIC ROADS;
- COVER HAUL TRUCKS OR MAINTAIN AT LEAST 12 INCHES OF FREEBOARD TO REDUCE BLOW-OFF DURING HAULING:
- SUSPEND ALL SOIL DISTURBANCE AND TRAVEL ON UNPAVED SURFACES IF WINDS EXCEED 25 MILES PER HOUR (MPH):
- COVER/WATER ON-SITE STOCKPILES OF EXCAVATED MATERIAL;
- ENFORCE A 20-MPH SPEED LIMIT ON UNPAVED SURFACES;
- PAVE PERMANENT ROADS AS QUICKLY AS POSSIBLE TO MINIMIZE DUST;
- DURING CONSTRUCTION, SITE GRADING ACTIVITIES WITHIN 500 FEET OF A SCHOOL IN OPERATION SHALL BE DISCONTINUED OR ALL EXPOSED SURFACES SHALL BE DISCONTINUED OR ALL EXPOSED SURFACES SHALL BE WATERED TO MINIMIZE DUST TRANSPORT OFF SITE TO THE MAXIMUM DEGREE FEASIBLE, WHEN THE WIND VELOCITY IS GREATER THAN 15MPH IN THE DIRECTION OF THE SCHOOL;
- DURING BLASTING, UTILIZE CONTROL MEASURES TO MINIMIZE FUGITIVE DUST. CONTROL MEASURES MAY INCLUDE, BUT ARE NOT LIMITED TO, BLAST ENCLOSURES, VACUUM BLASTERS, DRAPES, WATER CURTAINS OR WET BLASTING.
- 3. MM NOI-8 THE PROJECT APPLICANT OR ITS DESIGNEE SHALL LIMIT ALL PROJECT-RELATED SITE PREPARATION AND CONSTRUCTION ACTIVITIES TO THE HOURS BETWEEN 7:00 AM-6:00 PM. MONDAY-FRIDAY, AND BETWEEN 8:00 AM-6:00 PM SATURDAY. NO CONSTRUCTION ACTIVITIES SHALL OCCUR ON FEDERAL HOLIDAYS (E.G., THANKSGIVING, JULY 4TH, LABOR DAY, ETC.). ALL MAINTENANCE OF CONSTRUCTION EQUIPMENT SHALL BE LIMITED TO THE SAME HOURS. THIS LANGUAGE SHALL BE ADDEI TO THE PROJECT GRADING PLANS. MINOR CONSTRUCTION (I.E., MINOR HOUSEHOLD DO-IT-YOURSELF TYPE PROJECTS) AND NON-NOISE-GENERATING CONSTRUCTION ACTIVITIES SUCH AS INTERIOR PAINTING ARE NOT SUBJECT TO THESE RESTRICTIONS.
- 4. MM CUL-1 PRIOR TO ISSUANCE OF LAND DEVELOPMENT PERMITS, INCLUDING CLEARING OR GRUBBING AND GRADING PERMITS, THE APPLICANT SHALL PROVIDE WRITTEN CONFIRMATION AND INCORPORATE INTO GRADING PLANS, TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR OR THEIR DESIGNEE, THAT A PRINCIPAL INVESTIGATOR (PI) MEETING THE CRITERIA LISTED IN THE SECRETARY OF THE INTERIOR GUIDELINES (36 CFR 61) HAS BEEN RETAINED IN AN OVERSIGHT CAPACITY TO ENSURE THAT AN ARCHAEOLOGICAL MONITOR(S) WILL BE PRESENT DURING ALL CUTTING OF PREVIOUSLY UNDISTURBED SOIL. IF THESE CUTTING ACTIVITIES OCCUR IN MORE THAN ONE LOCATION. MULTIPLE MONITORS SHALL BE PROVIDED TO MONITOR THESE AREAS, AS DETERMINED NECESSARY BY THE PL NATIVE AMERICAN MONITORING WILL ONLY BE REQUIRED IN THE EVENT THAT HUMAN REMAINS ARE DISCOVERED AND IDENTIFIED AS NATIVE AMERICAN. THE LOCATION AND DURATION OF MONITORING BY A NATIVE AMERICAN REPRESENTATIVE WILL BE DETERMINED BY THE CONSULTING ARCHAEOLOGIST AND WILL BE FOCUSED STRICTLY UPON THE AREA CORRESPONDING TO THE DISCOVERY OF HUMAN REMAINS.

(NOTES CONTINUED ON SHEET 3)

Designed By:

A.C.G/P.A.A.

Plans Prepared Under Supervision Of:

YOLANDA CALVO

Drawn By:

P.A.A.

Date:

By | Date | App'd |

BB. SHEET MAP:

SEE SHEET 04

CC. FEMA FLOODPLAIN INFORMATION:

FLOOD ZONE: X

BASE FLOOD ELEVATION (BFE)= N/A

SOURCE CONTROL BMP CHECKLIST	F	FORM I-4					
ALL DEVELOPMENT PROJECTS MUST IMPLEMENT SOURCE CONTROL BMP'S. REFER TO CHAPTER 4 AND APPENDIX E OF THE BMP DESIGN MANUAL FOR INFORMATION TO IMPLEMENT BMPS SHOWN IN THIS CHECKLIST							
SOURCE CONTROL REQUIREMENTS AP							
4.2.1 PREVENTION OF ILLICIT DISCHARGES INTO THE MS4	X YES	□ NO	□ N/A				
4.2.2 STORM DRAIN STENCILING OR SIGNAGE	X YES	□ NO	□ N/A				
4.2.3 PROTECTION OUTDOOR MATERIALS STORAGE AREAS FROM RAINFALL, RUN-ONS RUNOFFS, AND WIND DISPERSAL	☐ YES	□ NO	X N/A				
4.2.4 PROJECT MATERIALS STORED IN OUTDOOR WORK AREAS FROM RAINFALL, RUN-ONS RUNOFFS, AND WIND DISPERSAL	☐ YES	□ NO	X N/A				
4.2.5 PROTECT TRASH STORAGE AREAS FROM RAINFALL, RUN-ONS, RUNOFF, AND WIND DISPERSAL	☐ YES	□ NO	X N/A				
4.2.6 BMPS BASED ON POTENTIAL SOURCES OF RUNOFF POLLUTANTS	X YES	□ NO	□ N/A				
SC-A ON-SITE STORM DRAIN INLETS		□ NO	□ N//				
SC-B INTERIOR FLOOR DRAINS AND ELEVATOR SHAFT SUMP PUMPS	☐ YES	☐ NO	X N/				
SC-C INTERIOR PARKING GARAGES	☐ YES	☐ NO	X N/				
SC-D1 NEED FOR FUTURE INDOOR & STRUCTURAL PEST CONTROL	☐ YES	☐ NO	X N/				
SC-D2 LANDSCAPE/OUTDOOR PESTICIDE USE	X YES	☐ NO	□ N/A				
SC-E POOLS, SPAS, POUND, DECORATIVE FOUNTAINS, AND OTHER WATER FEATURES	☐ YES	□ NO	X N/				
SC-F FOOD SERVICE	☐ YES	☐ NO	X N/				
SC-G REFUSE AREAS	☐ YES	□ NO	X N/				
SC-H INDUSTRIAL PROCESSES	☐ YES	☐ NO					
SC-I OUTDOOR STORAGE OF EQUIPMENT OR MATERIALS	☐ YES	☐ NO	X N/.				
SC-J VEHICLE / EQUIPMENT CLEANING	☐ YES	☐ NO	X N/				
SC-K VEHICLE / EQUIPMENT REPAIR AND MAINTENANCE	☐ YES	☐ NO	X N/				
SC-L FUEL DISPENSING AREA	☐ YES	☐ NO	X N/				
SC-M LOADING DOCKS	☐ YES	☐ NO	X N/				
SC-N FIRE SPRINKLER TEST WATER	☐ YES	☐ NO	X N/				
SC-O MISCELLANEOUS DRAIN OR WASH WATER	X YES	□ NO	□ N/A				
SC-P PLAZAS, SIDEWALKS, AND PARKING LOTS	X YES	☐ NO	□ N/A				
SC-Q LARGE TRASH GENERATING FACILITIES	☐ YES	□ NO					
SC-R ANIMAL FACILITIES	☐ YES	☐ NO					
SC-S PLANTS NURSERIES AND GARDEN CENTERS	☐ YES	□ NO	X N/				
SC-T AUTOMOTIVE -RELATED ISSUES	☐ YES	☐ NO	X N//				

SITE DESIGN BMP CHECKLIST	FORM I-5				
ALL DEVELOPMENT PROJECTS MUST IMPLEMENT SOURCE CONTROL BMP'S. REFER TO CHAPTER 4 AND APPENDIX E OF THE BMP DESIGN MANUAL FOR INFORMATION TO IMPLEMENT BMPS SHOWN IN THIS CHECKLIST					
SITE DESIGN REQUIREMENTS		APPLIED?	•		
4.3.1 MAINTAIN NATURAL DRAINAGE PATHWAYS AND HYDROLOGICAL FEATURES	X YES	□ NO	□ N/A		
4.3.2 CONSERVE NATURAL AREAS, SOILS, AND VEGETATION	X YES	□ NO	□ N/A		
4.3.3 MINIMIZE IMPERVIOUS AREA	X YES	□ NO	□ N/A		
4.3.4 MINIMIZE SOIL COMPACTION	X YES	□ NO	□ N/A		
4.3.5 IMPERVIOUS AREA DISPERSION		☐ NO	X N/A		
4.3.6 RUNOFF COLLECTION	X YES	□ NO	□ N/A		
4.3.7 LANDSCAPING WITH NATIVE OR DROUGHT TOLERANT SPECIES	X YES	□ NO	□ N/A		
	☐ YES	□NO	X N/A		

JNSAKER ENGINEERING San Diego, Ca 92121 SURVEYING PH(858)558-4500 · FX(858)558-1414

1/2

IF THIS BAR DOES NOT MEASURE 1

THEN DRAWING

NOT TO SCALE

Checked By: Y.C. THE CITY OF CHULA VISTA R.C.E. No. <u>61827</u>

ACCELA NO.: XXXX DEVELOPMENT SERVICES DEPARTMENT PROJECT NO.: XXXX TOTAL SHEETS: 90 1796 - 6340 Principal Civil Engineer NAD83 COORDINATES 154 - 1773 LAMBERT COORDINATES Planning: Landscape: AS BUILT DRAWING NO. ONTRACTOR: XXXXX.XXXINSPECTOR: DATE COMPLETED:

NOTES SHEET FOR

CHULA VISTA TRACT NO. 22-0005

OTAY RANCH VILLAGE 8 EAST

R:\0920\&Eng\Rough Grading\0920RG02

V. DWG. NO. 04078-IMP. PLANS

SIGNATURE

YOLANDA CALVO

Printed Name

My Registration Expires_

AS BUILT

PLANS AGE 8 |

AA. MITIGATION MONITORING AND REPORTING PROGRAM NOTES (CONT.)

- MM CUL-2 DURING THE INITIAL GRADING OF PREVIOUSLY UNDISTURBED SOILS WITHIN THE SPA PLAN AREAS) AND OFF-SITE IMPROVEMENT AREAS, PREHISTORIC AND HISTORIC RESOURCES MAY BE ENCOUNTERED. IN THE EVENT THAT THE ARCHAEOLOGICAL MONITOR IDENTIFIES A POTENTIALLY SIGNIFICANT SITE, THE MONITOR SHALL SECURE THE DISCOVERY SITE FROM FURTHER IMPACTS BY DELINEATING THE SITE WITH STAKING AND FLAGGING, AND BY DIVERTING GRADING EQUIPMENT AWAY FROM THE ARCHAEOLOGICAL SITE. FOLLOWING NOTIFICATION TO THE CITY, THE ARCHAEOLOGICAL MONITOR SHALL CONDUCT INVESTIGATIONS AS NECESSARY TO DETERMINE IF THE DISCOVERY IS SIGNIFICANT UNDER THE CRITERIA LISTED IN CEQA AND THE ENVIRONMENTAL GUIDELINES OF THE CITY. IF THE DISCOVERY IS DETERMINED TO BE NOT SIGNIFICANT, GRADING OPERATIONS MAY RESUME AND THE ARCHAEOLOGICAL MONITOR SHALL SUMMARIZE THE FINDINGS IN A LETTER REPORT SUBMITTED TO THE CITY FOLLOWING THE COMPLETION OF MASS GRADING ACTIVITIES. THE LETTER REPORT SHALL DESCRIBE THE RESULTS OF THE ON-SITE ARCHAEOLOGICAL MONITORING, EACH ARCHAEOLOGICAL SITE OBSERVED, THE SCOPE OF TESTING CONDUCTED, RESULTS OF LABORATORY ANALYSIS (IF APPLICABLE), AND CONCLUSIONS. THE LETTER REPORT SHALL BE COMPLETED TO THE SATISFACTION OF THE CITY OF CHULA VISTA'S DEVELOPMENT SERVICES DIRECTOR OR THEIR DESIGNEE PRIOR TO THE RELEASE OF GRADING BONDS. ANY ARTIFACTS RECOVERED DURING THE EVALUATION OF RESOURCES SHALL BE CURATED AT A FACILITY APPROVED BY THE CITY.
- MM CUL-3 FOR THE CULTURAL PREHISTORIC/HISTORIC RESOURCES THAT ARE DETERMINED TO BE SIGNIFICANT, ALTERNATE MEANS OF ACHIEVING MITIGATION SHALL BE PURSUED. IN GENERAL, THESE FORMS OF MITIGATION INCLUDE:
- SITE AVOIDANCE BY PRESERVATION OF ARCHAEOLOGICAL SITE IN A NATURAL STATE IN OPEN SPACE, OR IN SPECIFIC OPEN SPACE EASEMENTS,
- SITE AVOIDANCE BY PRESERVATION THROUGH CAPPING THE SITE AND PLACING LANDSCAPING ON TOP
- OF THE FILL. DATA RECOVERY THROUGH IMPLEMENTATION OF AN EXCAVATION AND ANALYSIS PROGRAM.
- A COMBINATION OF ONE OR MORE OF THE ABOVE MEASURES.
- SEE CHAPTER 9.0 IN THE CULTURAL RESOURCES STUDY FOR THE UNIVERSITY VILLAGES PROJECT AT OTAY RANCH (APPENDIX F OF THIS EIR) FOR THE DETAILED MITIGATION AND MONITORING PROGRAM FOR EACH OF THE IDENTIFIED SIGNIFICANT SITES THAT WOULD BE IMPACTED.
- MM CUL-4 FOR THOSE SITES THAT ARE FOUND TO CONTAIN SIGNIFICANT RESOURCES AND FOR WHICH AVOIDANCE AND PRESERVATION IS NOT FEASIBLE OR APPROPRIATE, THE APPLICANT SHALL PREPARE A DATA RECOVERY PLAN. THE PLAN WILL, AT A MINIMUM, INCLUDE THE FOLLOWING:
- A STATEMENT OF WHY DATA RECOVERY IS APPROPRIATE AS A MITIGATION MEASURE, A RESEARCH PLAN THAT EXPLICITLY PROVIDES THE RESEARCH QUESTIONS THAT CAN REASONABLY BE
- EXPECTED TO BE ADDRESSED BY EXCAVATION AND ANALYSIS OF THE SITE, A STATEMENT OF THE TYPES AND KINDS OF DATA THAT CAN REASONABLY BE EXPECTED TO EXIST AT
- THE SITE AND HOW THESE DATA WILL BE USED TO ANSWER IMPORTANT RESEARCH QUESTIONS, A STEP-BY-STEP DISCUSSION OF FIELD AND LABORATORY METHODS TO BE EMPLOYED,
- PROVISIONS FOR CURATION AND STORAGE OF THE ARTIFACTS, NOTES, AND PHOTOGRAPHS WILL BE
- GRADING OPERATIONS WITHIN THE AFFECTED AREA MAY RESUME ONCE THE SITE HAS BEEN FULLY
- EVALUATED AND MITIGATED TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR OR THEIR DESIGNEE. ALL ARTIFACTS COLLECTED DURING THE SURVEY, TEST, DATA RECOVERY, AND MONITORING PROGRAMS FOR THIS PROJECT SHALL BE PERMANENTLY CURATED AT A QUALIFIED FACILITY APPROVED BY THE CITY OF CHULA VISTA. ARTIFACTS SHALL BE PREPARED FOR CURATION IN ACCORDANCE WITH THE GUIDELINES OF THE SELECTED CURATION FACILITY.
- MM CUL-5 FOLLOWING THE COMPLETION OF MASS GRADING OPERATIONS, THE APPLICANT SHALL PREPARE A PLAN THAT ADDRESSES THE TEMPORARY ON-SITE PRESENTATION AND INTERPRETATION OF THE RESULTS OF THE ARCHAEOLOGICAL STUDIES FOR THE PROPOSED PROJECT. THIS COULD BE ACCOMPLISHED THROUGH EXHIBITION WITHIN A FUTURE COMMUNITY CENTER, CIVIC BUILDING AND/OR MULTI-PURPOSE BUILDING. ANY ARTIFACTS USED FOR PUBLIC DISPLAYS SHALL BE SELECTED FROM THE CURATED COLLECTIONS ORIGINATING FROM THE PROJECT. THIS EXHIBITION WILL ONLY BE FOR TEMPORARY DISPLAY OF ARTIFACTS FOR PUBLIC INTERPRETATION AND DISPLAY PURPOSES. ARTIFACTS SELECTED FOR THE EXHIBIT SHALL BE WITHDRAWN ON LOAN FROM THE CURATION FACILITY AND WILL SUBSEQUENTLY BE RETURNED TO THAT FACILITY UPON THE CLOSE OF THE EXHIBITION. THE APPLICANT WILL BE RESPONSIBLE FOR THE ARTIFACTS DURING THE DISPLAY PERIOD AND FOR THE RETURN OF THE ARTIFACTS AT THE CLOSE OF THE EXHIBITION. THE CONSULTING ARCHAEOLOGIST SHALL ACT ON THE APPLICANT'S BEHALF TO COORDINATE THE CURATION OF ALL COLLECTIONS AND THE SUBSEQUENT USE OF SELECTED ARTIFACTS FOR THE PUBLIC DISPLAY.
- MM CUL-6 IF HUMAN REMAINS ARE DISCOVERED DURING GRADING OR SITE PREPARATION ACTIVITIES WITHIN THE SPA PLAN AREA(S) AND OFF-SITE IMPROVEMENT AREAS. THE ARCHAEOLOGICAL MONITOR SHALL SECURE THE DISCOVERY SITE FROM ANY FURTHER DISTURBANCE. STATE HEALTH AND SAFETY CODE SECTION 7050.5 REQUIRES THAT NO FURTHER DISTURBANCE SHALL OCCUR UNTIL THE SAN DIEGO COUNTY CORONER HAS MADE THE NECESSARY FINDINGS AS TO THE ORIGIN AND DISPOSITION OF THE REMAINS PURSUANT TO PRC SECTION 5097.98. IF THE REMAINS ARE DETERMINED TO BE OF NATIVE AMERICAN DESCENT, THE CORONER HAS 24 HOURS TO NOTIFY THE NATIVE AMERICAN HERITAGE COMMISSION (NAHC). THE NAHC WILL THEN IDENTIFY THE PERSON(S) THOUGHT TO BE THE MOST LIKELY DESCENDENT (MLD) OF THE DECEASED NATIVE AMERICAN. THE MLD WILL ASSIST THE CITY IN DETERMINING WHAT COURSE OF ACTION SHALL BE TAKEN TO DEAL WITH THE REMAINS. GRADING OPERATIONS WITHIN THE AFFECTED AREA MAY RESUME ONCE THE SITE HAS BEEN FULLY EVALUATED AND MITIGATED TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR OR THEIR DESIGNEE. THE ARCHAEOLOGICAL MONITOR SHALL SUMMARIZE THE FINDINGS IN A LETTER REPORT TO THE CITY FOLLOWING THE COMPLETION OF MASS GRADING ACTIVITIES.
- 10. ADDITIONAL CULTURAL RESOURCES NOTES
- A DATA RECOVERY PLAN FOR CA-SDI-12.809 WILL BE PREPARED IN ACCORDANCE WITH THE REQUIREMENTS OF THE 2014 ENVIRONMENTAL IMPACT REPORT (EIR) AND MITIGATION MONITORING AND REPORTING PLAN (MMRP) FOR THE OTAY RANCH UNIVERSITY VILLAGES PROJECT PRIOR TO GRADING OPERATIONS COMMENCING IN THE AREA OF CA-SDI-12,809. DATA RECOVERY EFFORTS OF CA-SDI-12,809 SHALL BE CONDUCTED WHEN REGULATORY PERMITS ARE SECURED.
- THE PRINCIPAL INVESTIGATOR (ARCHAEOLOGIST) WILL INCLUDE A DUAL TRAINED ARCHEOLOGIST/KUMEYAAY NATIVE AMERICAN MONITOR WHO WILL BE PART OF THE DATA RECOVERY CREW DURING THE DATA RECOVERY EFFORTS OF CA-SDI-12,809.
- 11. MM PAL-1 PRIOR TO THE ISSUANCE OF GRADING PERMITS FOR THE PROPOSED PROJECT, INCLUDING THE OFF-SITE IMPROVEMENT AREAS, THE APPLICANT SHALL CONFIRM TO THE DEVELOPMENT SERVICES DIRECTOR, OR THEIR DESIGNEE, THAT A QUALIFIED PALEONTOLOGIST (QP) HAS BEEN RETAINED TO CARRY OUT AN APPROPRIATE MITIGATION PROGRAM. A QP IS DEFINED AS AN INDIVIDUAL WITH A DOCTORATE OR A MASTER'S DEGREE IN PALEONTOLOGY OR GEOLOGY, WHO IS FAMILIAR WITH PALEONTOLOGICAL PROCEDURES AND TECHNIQUES. A PRE-GRADE MEETING SHALL BE HELD BETWEEN THE PALEONTOLOGIST AND THE GRADING AND EXCAVATION CONTRACTORS.

REFERENCE DRAWINGS

.V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS

V. DWG. NO. 04080-IMP. PLANS C.V. DWG. NO. 19036-IMP. PLANS C.V. DWG. NO. 22043-GRADING PLANS

V. DWG. NO. 02025-IMP. PLANS | C.V. DWG. NO. 14011-GRADING PLANS | SR-125 PLANS-11232304

UTILITY NOTE

FIELD PRIOR TO THE START OF CONSTRUCTION.

C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN

FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL

VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE

- 12. MM PAL-2 A PALEONTOLOGICAL MONITOR SHALL BE ON SITE AT ALL TIMES DURING THE ORIGINAL CUTTING OF PREVIOUSLY UNDISTURBED SEDIMENTS OF HIGHLY SENSITIVE GEOLOGIC FORMATIONS (I.E., SAN DIEGO, OTAY, AND SWEETWATER FORMATIONS) TO INSPECT CUTS FOR CONTAINED FOSSILS. (A PALEONTOLOGICAL MONITOR IS DEFINED AS AN INDIVIDUAL WHO HAS EXPERIENCE IN THE COLLECTION AND SALVAGE OF FOSSIL MATERIALS.) THE PALEONTOLOGICAL MONITOR SHALL WORK UNDER THE DIRECTION OF A QUALIFIED PALEONTOLOGIST. THE MONITOR SHALL BE ON SITE ON AT LEAST A HALF-TIME BASIS DURING THE ORIGINAL CUTTING OF PREVIOUSLY UNDISTURBED SEDIMENTS OF MODERATELY SENSITIVE GEOLOGIC FORMATIONS (I.E., UNNAMED RIVER TERRACE DEPOSITS OF THE MISSION VALLEY FORMATION) TO INSPECT CUTS FOR CONTAINED FOSSILS.
- THE MONITOR SHALL BE ON SITE ON AT LEAST A QUARTER-TIE BASIS DURING THE ORIGINAL CUTTING OF PREVIOUSLY UNDISTURBED SEDIMENTS OF LOW SENSITIVITY GEOLOGIC FORMATIONS (I.E., LINDA VISTA FORMATION AND SANTIAGO PEAK VOLCANICS [METASEDIMENTARY PORTION ONLY] TO INSPECT CUTS FOR CONTAINED FOSSILS. HE OR SHE SHALL PERIODICALLY (EVERY SEVERAL WEEKS) INSPECT ORIGINAL CUTS IN DEPOSITS WITH AN UNKNOWN RESOURCE SENSITIVITY (I.E., QUATERNARY ALLUVIUM).
- IN THE EVENT THAT FOSSILS ARE DISCOVERED IN UNKNOWN, LOW, OR MODERATELY SENSITIVE FORMATIONS, THE APPLICANT SHALL INCREASE THE PER-DAY FIELD MONITORING TIME. CONVERSELY, IF FOSSILS ARE NOT DISCOVERED, THE MONITORING, AT THE DISCRETION OF THE PLANNING DEPARTMENT, SHALL BE REDUCED. A PALEONTOLOGICAL MONITOR IS NOT NEEDED DURING GRADING OF ROCKS WITH NO RESOURCE SENSITIVITY (I.E., SANTIAGO PEAK VOLCANICS, METAVOLCANIC PORTION).
- 13. MM PAL-3 WHEN FOSSILS ARE DISCOVERED, THE PALEONTOLOGIST (OR PALEONTOLOGICAL MONITOR) SHALL RECOVER THEM. IN MOST CASES, THIS FOSSIL SALVAGE CAN BE COMPLETED IN A SHORT PERIOD OF TIME. HOWEVER, SOME FOSSIL SPECIMENS (SUCH AS A COMPLETE WHALE SKELETON) MAY REQUIRE AN EXTENDED SALVAGE TIME. IN THESE INSTANCES, THE PALEONTOLOGIST (OR PALEONTOLOGICAL MONITOR) SHALL BE ALLOWED TO TEMPORARILY DIRECT, DIVERT, OR HALT GRADING TO ALLOW RECOVERY OF FOSSIL REMAINS IN A TIMELY MANNER. BECAUSE OF THE POTENTIAL FOR THE RECOVERY OF SMALL FOSSIL REMAINS SUCH AS ISOLATED MAMMAL TEETH, IT MAY BE NECESSARY IN CERTAIN INSTANCES AND AT THE DISCRETION OF THE PALEONTOLOGICAL MONITOR TO SET UP A 21. MM BIO-15 PRIOR TO ISSUANCE OF ANY LAND DEVELOPMENT PERMITS (INCLUDING CLEARING, SCREEN-WASHING OPERATION ON THE SITE.
- 14. MM PAL-4 PREPARED FOSSILS ALONG WITH COPIES OF ALL PERTINENT FIELD NOTES, PHOTOS, AND MAPS SHALL BE DEPOSITED IN A SCIENTIFIC INSTITUTION WITH PALEONTOLOGICAL COLLECTIONS SUCH AS THE SAN DIEGO NATURAL HISTORY MUSEUM. A FINAL SUMMARY REPORT SHALL BE COMPLETED. THIS REPORT SHALL INCLUDE DISCUSSIONS OF THE METHODS USED, STRATIGRAPHY EXPOSED, FOSSILS COLLECTED, AND SIGNIFICANCE OF RECOVERED FOSSILS.
- 15. MM BIO-4 PRIOR TO ISSUANCE OF LAND DEVELOPMENT PERMITS, INCLUDING CLEARING, GRUBBING, GRADING. AND/OR CONSTRUCTION PERMITS FOR ANY AREAS ADJACENT TO THE PRESERVE AND THE OFF-SITE FACILITIES LOCATED WITHIN THE PRESERVE. THE PROJECT APPLICANT SHALL PROVIDE WRITTEN CONFIRMATION THAT A CITY-APPROVED BIOLOGICAL MONITOR HAS BEEN RETAINED AND SHALL BE ON SITE DURING CLEARING, GRUBBING, AND/OR GRADING ACTIVITIES. THE BIOLOGICAL MONITOR SHALL ATTEND ALL PRE-CONSTRUCTION MEETINGS AND BE PRESENT DURING THE REMOVAL OF ANY VEGETATION TO ENSURE THAT THE APPROVED LIMITS OF DISTURBANCE ARE NOT EXCEEDED AND PROVIDE PERIODIC MONITORING OF THE IMPACT AREA INCLUDING, BUT NOT LIMITED TO, TRENCHES, STOCKPILES, STORAGE AREAS AND PROTECTIVE FENCING. THE BIOLOGICAL MONITOR SHALL BE AUTHORIZED TO HALT ALL ASSOCIATED PROJECT ACTIVITIES THAT MAY BE IN VIOLATION OF THE CITY'S MSCP SUBAREA PLAN AND/OR PERMITS ISSUED BY ANY OTHER AGENCIES HAVING JURISDICTIONAL AUTHORITY OVER THE PROJECT.
- BEFORE CONSTRUCTION ACTIVITIES OCCUR IN AREAS CONTAINING SENSITIVE BIOLOGICAL RESOURCES WITHIN THE OFF-SITE FACILITIES AREA, ALL WORKERS SHALL BE EDUCATED BY A CITY-APPROVED BIOLOGIST TO RECOGNIZE AND AVOID THOSE AREAS THAT HAVE BEEN MARKED AS SENSITIVE BIOLOGICAL RESOURCES.
- 16. MM BIO-5 PRIOR TO ISSUANCE OF GRADING PERMITS IN PORTIONS OF THE SPA PLAN AREAS THAT ARE ADJACENT TO THE PRESERVE, THE PROJECT APPLICANT SHALL INSTALL FENCING. PRIOR TO ISSUANCE OF LAND DEVELOPMENT PERMITS, INCLUDING CLEARING, GRUBBING, GRADING AND/OR CONSTRUCTION PERMITS, THE PROJECT APPLICANT SHALL INSTALL FENCING IN ACCORDANCE WITH CHULA VISTA MUNICIPAL CODE (CVMC) 17.35.030. PROMINENTLY COLORED, WELL-INSTALLED FENCING AND SIGNAGE SHALL BE IN PLACE WHEREVER THE LIMITS OF GRADING ARE ADJACENT TO SENSITIVE VEGETATION COMMUNITIES OR OTHER BIOLOGICAL RESOURCES, AS IDENTIFIED BY THE QUALIFIED MONITORING BIOLOGIST. FENCING SHALL REMAIN IN PLACE DURING ALL CONSTRUCTION ACTIVITIES. ALL TEMPORARY FENCING SHALL BE SHOWN ON GRADING PLANS FOR AREAS ADJACENT TO THE PRESERVE AND FOR ALL OFF-SITE FACILITIES CONSTRUCTED WITHIN THE PRESERVE. PRIOR TO RELEASE OF GRADING AND/OR IMPROVEMENT BONDS, A QUALIFIED BIOLOGIST SHALL PROVIDE EVIDENCE THAT WORK WAS CONDUCTED AS AUTHORIZED UNDER THE APPROVED LAND DEVELOPMENT PERMIT AND ASSOCIATED PLANS.
- 17. MM BIO-8 PRIOR TO ISSUANCE OF GRADING PERMITS IN PORTIONS OF THE SPA PLAN AREAS THAT ARE ADJACENT TO THE PRESERVE. THE PROJECT APPLICANT SHALL DEVELOP A STORM WATER POLLUTION PREVENTION PLAN (SWPPP). THE SWPPP SHALL BE DEVELOPED, APPROVED, AND IMPLEMENTED DURING CONSTRUCTION TO CONTROL STORM WATER RUNOFF SUCH THAT EROSION, SEDIMENTATION, POLLUTION, AND OTHER ADVERSE EFFECTS ARE MINIMIZED. THE FOLLOWING PERFORMANCE MEASURES CONTAINED IN THE EDGE PLANS SHALL BE IMPLEMENTED TO AVOID THE RELEASE OF TOXIC SUBSTANCES ASSOCIATED WITH URBAN RUNOFF:
- SEDIMENT SHALL BE RETAINED ON-SITE BY A SYSTEM OF SEDIMENT BASINS, TRAPS, OR OTHER APPROPRIATE MEASURES.
- WHERE DEEMED NECESSARY, STORM DRAINS SHALL BE EQUIPPED WITH SILT AND OIL TRAPS TO REMOVE OILS, DEBRIS, AND OTHER POLLUTANTS. STORM DRAIN INLETS SHALL BE LABELED "NO DUMPING-DRAINS TO OCEAN." STORM DRAINS SHALL BE REGULARLY MAINTAINED TO ENSURE THEIR
- EFFECTIVENESS. THE PARKING LOTS SHALL BE DESIGNED TO ALLOW STORM WATER RUNOFF TO BE DIRECTED TO VEGETATIVE FILTER STRIPS AND/OR OIL-WATER SEPARATORS TO CONTROL SEDIMENT, OIL, AND OTHER
- CONTAMINANTS.

DEBRIS.

- PERMANENT ENERGY DISSIPATERS SHALL BE INCLUDED FOR DRAINAGE OUTLETS. THE BMPS CONTAINED IN THE SWPPP SHALL INCLUDE, BUT ARE NOT LIMITED TO, SILT FENCES, FIBER ROLLS, GRAVEL BAGS, AND SOIL STABILIZATION MEASURES SUCH AS EROSION CONTROL MATS AND
- HYDRO-SEEDING. THE PROJECT AREA DRAINAGE BASINS WILL BE DESIGNED TO PROVIDE EFFECTIVE WATER QUALITY CONTROL MEASURES, AS OUTLINED IN THE WATER QUALITY TECHNICAL REPORT. DESIGN AND OPERATIONAL FEATURES OF THE DRAINAGE BASINS WILL INCLUDE DESIGN FEATURES TO PROVIDE MAXIMUM INFILTRATION, MAXIMUM DETENTION TIME FOR SETTLING OF FINE PARTICLES; MAXIMIZE THE DISTANCE BETWEEN BASIN INLETS AND OUTLETS TO REDUCE VELOCITIES; AND ESTABLISH MAINTENANCE SCHEDULES FOR PERIODIC REMOVAL OF SEDIMENTATION, EXCESSIVE VEGETATION AND
- 18. MM BIO-6 PRIOR TO ISSUANCE OF LAND DEVELOPMENT PERMITS, INCLUDING CLEARING, GRUBBING, GRADING, AND CONSTRUCTION PERMITS, THE FOLLOWING NOTES SHALL BE INCLUDED ON THE APPLICABLE CONSTRUCTION PLANS TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE):
- A QUALIFIED BIOLOGIST SHALL BE ON SITE TO MONITOR ALL VEGETATION CLEARING AND PERIODICALLY THEREAFTER TO ENSURE IMPLEMENTATION OF APPROPRIATE RESOURCE PROTECTION MEASURES. DEWATERING SHALL BE CONDUCTED IN ACCORDANCE WITH STANDARD REGULATIONS OF THE RWQCB. A
- PERMIT TO DISCHARGE WATER FROM DEWATERING ACTIVITIES WILL BE REQUIRED. THIS WILL MINIMIZE EROSION, SILTATION, AND POLLUTION WITHIN SENSITIVE COMMUNITIES. DURING CONSTRUCTION, MATERIAL STOCKPILES SHALL BE PLACED SUCH THAT THEY CAUSE MINIMAL
- INTERFERENCE WITH ON-SITE DRAINAGE PATTERNS. THIS WILL PROTECT SENSITIVE VEGETATION FROM BEING INUNDATED WITH SEDIMENT-LADEN RUNOFF MATERIAL STOCKPILES SHALL BE COVERED WHEN NOT IN USE. THIS WILL PREVENT FLY-OFF THAT COULD
- GRADED AREA SHALL BE PERIODICALLY WATERED TO MINIMIZE DUST THAT MAY AFFECT ADJACENT VEGETATION.

By | Date | App'd |

REVISIONS

DAMAGE NEARBY SENSITIVE VEGETATION COMMUNITIES.

REVISIONS

- 19. MM BIO-13 TO AVOID ANY DIRECT IMPACTS TO RAPTORS AND/OR ANY MIGRATORY BIRDS PROTECTED UNDER THE MBTA, REMOVAL OF HABITAT THAT SUPPORTS ACTIVE NESTS ON THE PROPOSED AREA OF DISTURBANCE SHOULD OCCUR OUTSIDE OF THE BREEDING SEASON FOR THESE SPECIES. THE BREEDING SEASON IS DEFINED AS FEBRUARY 15 TO AUGUST 15 FOR COASTAL CALIFORNIA GNATCATCHER AND OTHER NON-RAPTOR BIRDS AND JANUARY 15 TO AUGUST 31 FOR RAPTOR SPECIES. IF REMOVAL OF HABITAT ON THE PROPOSED AREA OF DISTURBANCE MUST OCCUR DURING THE BREEDING SEASON, THE PROJECT APPLICANT SHALL RETAIN A CITY-APPROVED BIOLOGIST TO CONDUCT A PRE-CONSTRUCTION SURVEY TO DETERMINE THE PRESENCE OR ABSENCE OF NESTING BIRDS ON THE PROPOSED AREA OF DISTURBANCE. THE PRE-CONSTRUCTION SURVEY MUST BE CONDUCTED WITHIN 10 CALENDAR DAYS PRIOR TO THE START OF CONSTRUCTION. AND THE RESULTS MUST BE SUBMITTED TO THE CITY FOR REVIEW AND APPROVAL PRIOR TO INITIATING ANY CONSTRUCTION ACTIVITIES. IF NESTING BIRDS ARE DETECTED, A LETTER REPORT OR MITIGATION PLAN, AS DEEMED APPROPRIATE BY THE CITY, SHALL BE PREPARED, AND INCLUDE PROPOSED MEASURES TO BE IMPLEMENTED TO ENSURE THAT DISTURBANCE OF BREEDING ACTIVITIES ARE AVOIDED. THE REPORT OR MITIGATION PLAN SHALL BE SUBMITTED TO THE CITY FOR REVIEW AND APPROVAL AND IMPLEMENTED TO THE SATISFACTION OF THE CITY. THE CITY'S MITIGATION MONITOR SHALL VERIFY AND APPROVE THAT ALL MEASURES IDENTIFIED IN THE REPORT OR MITIGATION PLAN ARE IN PLACE PRIOR TO AND/OR DURING CONSTRUCTION.
- 20. MM BIO-14 PRIOR TO ISSUANCE OF ANY LAND DEVELOPMENT PERMITS, INCLUDING CLEARING, GRUBBING, AND GRADING PERMITS, THE PROJECT APPLICANT SHALL RETAIN A CITY-APPROVED BIOLOGIST TO CONDUCT FOCUSED SURVEYS FOR NORTHERN HARRIER TO DETERMINE THE PRESENCE OR ABSENCE OF THIS SPECIES WITHIN 900-FEET OF THE CONSTRUCTION AREA. THE PRE-CONSTRUCTION SURVEY MUST BE CONDUCTED WITHIN 10 CALENDAR DAYS PRIOR TO THE START OF CONSTRUCTION. THE RESULTS OF THE SURVEY MUST BE SUBMITTED TO THE CITY FOR REVIEW AND APPROVAL. IF ACTIVE NESTS ARE DETECTED BY THE CITY-APPROVED BIOLOGIST, A BIO-MONITOR SHALL BE ON SITE DURING CONSTRUCTION TO MINIMIZE CONSTRUCTION IMPACTS AND ENSURE THAT NO NESTS ARE REMOVED OR DISTURBED UNTIL ALL YOUNG HAVE FLEDGED.
- GRUBBING, AND GRADING PERMITS), THE PROJECT APPLICANT SHALL RETAIN A CITY-APPROVED BIOLOGIST TO CONDUCT FOCUSED PRE-CONSTRUCTION SURVEYS FOR BURROWING OWLS. THE SURVEYS SHALL BE PERFORMED NO EARLIER THAN 30 DAYS PRIOR TO THE COMMENCEMENT OF ANY CLEARING, GRUBBING, OR GRADING ACTIVITIES. IF OCCUPIED BURROWS ARE DETECTED, THE CITY-APPROVED BIOLOGIST SHALL PREPARE A PASSIVE RELOCATION MITIGATION PLAN SUBJECT TO THE REVIEW AND APPROVAL BY THE WILDLIFE AGENCIES AND CITY, INCLUDING ANY SUBSEQUENT BURROWING OWL RELOCATION PLANS TO AVOID IMPACTS FROM CONSTRUCTION-RELATED ACTIVITIES.
- 22. MM BIO-17: IN ACCORDANCE WITH THE CITY'S ADJACENCY MANAGEMENT GUIDELINES, THE FOLLOWING MITIGATION MEASURES SHALL BE IMPLEMENTED TO FURTHER REDUCE INDIRECT IMPACTS (FROM LIGHTING, NOISE, INVASIVE SPECIES, TOXIC SUBSTANCES, AND PUBLIC ACCESS) TO SENSITIVE BIOLOGICAL RESOURCES LOCATED IN THE ADJACENT PRESERVE AREAS:
 - 1. LIGHTING. IN COMPLIANCE WITH THE CHULA VISTA MSCP SUBAREA PLAN, ALL LIGHTING SHALL BE SHIELDED AND DIRECTED AWAY FROM THE PRESERVE. CONCURRENT WITH DESIGN REVIEW AND PRIOR TO ISSUANCE OF A BUILDING PERMIT FOR ANY DEVELOPMENT LOCATED ADJACENT TO THE PRESERVE, THE APPLICANT SHALL PREPARE A LIGHTING PLAN AND PHOTOMETRIC ANALYSIS TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE), FOR REVIEW AND APPROVAL. THE LIGHTING PLAN SHALL ILLUSTRATE THE LOCATION OF THE PROPOSED LIGHTING STANDARDS AND TYPE OF SHIELDING MEASURES. LOW-PRESSURE SODIUM LIGHTING SHALL BE USED, IF FEASIBLE, AND SHALL BE SUBJECT TO THE APPROVAL OF THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE).
 - 2. NOISE. NOISE IMPACTS ADJACENT TO THE PRESERVE LANDS SHALL BE MINIMIZED. BERMS OR WALLS SHALL BE CONSTRUCTED ADJACENT TO COMMERCIAL AREAS AND ANY OTHER USE THAT MAY INTRODUCE NOISES THAT COULD IMPACT OR INTERFERE WITH WILDLIFE UTILIZATION OF THE PRESERVE. A 100-FOOT BUFFER AROUND COMMUNITY PARK AREAS, SPECIFICALLY COMMUNITY PARKS (P-2) SOUTH OF VILLAGE EIGHT EAST AND IN PORTION OF VILLAGE FOUR, SHOULD BE INSTALLED IN SECTIONS ADJACENT TO PRESERVE HABITAT OCCUPIED BY SENSITIVE SPECIES SUCH AS THE COASTAL CACTUS WREN. POTENTIAL NOISE GENERATING USES, SUCH AS BASEBALL DIAMONDS AND SOCCER FIELDS, SHOULD BE ORIENTED AWAY FROM SENSITIVE SPECIES HABITAT IN THESE AREAS. CONSTRUCTION ACTIVITIES SHALL INCLUDE NOISE REDUCTION MEASURES OR BE CONDUCTED OUTSIDE THE BREEDING SEASON OF SENSITIVE BIRD SPECIES.
 - 3. CALIFORNIA GNATCATCHER. FOR ANY WORK PROPOSED BETWEEN FEBRUARY 15 AND AUGUST 15, PRIOR TO ISSUANCE OF ANY LAND DEVELOPMENT PERMITS. INCLUDING CLEARING. GRUBBING. GRADING. AND CONSTRUCTION PERMITS. ASSOCIATED WITH THE OFF-SITE FACILITIES LOCATED WITHIN THE PRESERVE, THE PROJECT APPLICANT SHALL RETAIN A CITY-APPROVED BIOLOGIST TO CONDUCT A PRE-CONSTRUCTION SURVEY FOR THE COASTAL CALIFORNIA GNATCATCHER TO REAFFIRM THE PRESENCE AND EXTENT OF OCCUPIED HABITAT. THE PRE-CONSTRUCTION SURVEY AREA FOR THE COASTAL CALIFORNIA GNATCATCHER SHALL ENCOMPASS ALL HABITATS WITHIN THE PROJECT WORK ZONE, AS WELL AS WITHIN A 300-FOOT BUFFER. THE SURVEY SHALL BE PERFORMED TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE) BY A QUALIFIED BIOLOGIST FAMILIAR WITH THE CITY'S MSCP SUBAREA PLAN. THE RESULTS OF THE PRE-CONSTRUCTION SURVEY MUST BE SUBMITTED IN A REPORT TO THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE) FOR REVIEW AND APPROVAL PRIOR TO THE ISSUANCE OF ANY LAND DEVELOPMENT PERMITS AND PRIOR TO INITIATING ANY CONSTRUCTION ACTIVITIES. IF THE COASTAL CALIFORNIA GNATCATCHER IS DETECTED, A MINIMUM 300-FOOT BUFFER DELINEATED BY ORANGE BIOLOGICAL FENCING SHALL BE ESTABLISHED AROUND THE DETECTED SPECIES TO ENSURE THAT NO WORK SHALL OCCUR WITHIN THE OCCUPIED HABITAT FROM FEBRUARY 15 THROUGH AUGUST 15 AND ON-SITE NOISE REDUCTION TECHNIQUES SHALL BE IMPLEMENTED TO ENSURE THAT CONSTRUCTION NOISE LEVELS DO NOT EXCEED 60 DB(A) LEQ-H AT THE LOCATION OF ANY OCCUPIED SENSITIVE HABITAT AREAS. THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE) SHALL HAVE THE DISCRETION TO MODIFY THE BUFFER WIDTH DEPENDING ON-SITE-SPECIFIC CONDITIONS. IF THE RESULTS OF THE PRE-CONSTRUCTION SURVEY DETERMINE THAT THE SURVEY AREA IS UNOCCUPIED, THE WORK MAY COMMENCE AT THE DISCRETION OF THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE) FOLLOWING THE REVIEW AND APPROVAL OF THE PRE-CONSTRUCTION REPORT.
 - 4. INVASIVE SPECIES. PRIOR TO ISSUANCE OF LAND DEVELOPMENT PERMITS, INCLUDING CLEARING OR GRUBBING AND GRADING AND/OR CONSTRUCTION PERMITS FOR 1) AREAS WITHIN THE 100-FOOT PRESERVE EDGE, AND 2) INFRASTRUCTURE (E.G., ROADS, TRAILS, UTILITIES, ETC.) SITED WITHIN THE PRESERVE, THE PROJECT APPLICANT SHALL PREPARE AND SUBMIT TO THE SATISFACTION OF THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE), LANDSCAPE PLANS TO ENSURE THAT THE PROPOSED PLANT PALETTE IS CONSISTENT WITH THE PLANT LIST CONTAINED IN THE PRESERVE EDGE PLAN. THE LANDSCAPE PLAN SHALL ALSO INCORPORATE A MANUAL WEEDING PROGRAM FOR AREAS ADJACENT TO THE PRESERVE. THE MANUAL WEEDING PROGRAM THAT SHALL DESCRIBE AT A MINIMUM, THE ENTITY RESPONSIBLE FOR CONTROLLING INVASIVE SPECIES, THE MAINTENANCE ACTIVITIES AND METHODS REQUIRED TO CONTROL INVASIVES, AND A MAINTENANCE/MONITORING SCHEDULE.
 - 5. TOXIC SUBSTANCES. SEE MMS BIO-4, BIO-6, BIO-8, BIO-16

By | Date | App'd |

6. PUBLIC ACCESS. PRIOR TO ISSUANCE OF GRADING PERMITS, THE PROJECT APPLICANT SHALL SUBMIT WALL AND FENCE PLANS DEPICTING APPROPRIATE BARRIERS TO PREVENT UNAUTHORIZED ACCESS INTO THE PRESERVE. THE WALL AND FENCE PLANS SHALL ILLUSTRATE THE LOCATIONS AND CROSS-SECTIONS OF PROPOSED WALLS AND FENCES ALONG THE PRESERVE BOUNDARY, SUBJECT TO THE APPROVAL THE CITY'S DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE).

Designed By:

A.C.G/P.A.A.

Plans Prepared Under Supervision Of:

YOLANDA CALVO

Drawn By:

P.A.A.

Date:

- 23. MM HYD-2 STORM WATER POLLUTION PREVENTION PLAN. PRIOR TO ISSUANCE OF EACH GRADING PERMIT FOR EACH VILLAGE OR ANY LAND DEVELOPMENT PERMIT, INCLUDING CLEARING AND GRADING, THE PROJECT APPLICANT SHALL SUBMIT A NOTICE OF INTENT AND OBTAIN COVERAGE UNDER THE NPDES PERMIT FOR CONSTRUCTION ACTIVITY FROM THE SWRCB. ADHERENCE TO ALL CONDITIONS OF THE GENERAL PERMIT FOR CONSTRUCTION ACTIVITY IS REQUIRED. THE APPLICANT SHALL BE REQUIRED UNDER THE SWRCB GENERAL CONSTRUCTION PERMIT TO DEVELOP A SWPPP AND MONITORING PLAN THAT SHALL BE SUBMITTED TO THE CITY ENGINEER AND THE DIRECTOR OF PUBLIC WORKS. THE SWPPP SHALL BE INCORPORATED INTO THE GRADING AND DRAINAGE PLANS AND SHALL SPECIFY BOTH CONSTRUCTION AND POST-CONSTRUCTION STRUCTURAL AND NON-STRUCTURAL BMPS ON SITE TO REDUCE THE AMOUNT OF SEDIMENTS AND POLLUTANTS IN CONSTRUCTION AND POST-CONSTRUCTION SURFACE RUNOFF BEFORE IT IS DISCHARGED INTO OFF-SITE STORM WATER FACILITIES. SECTION 7 OF THE CITY'S STORM WATER MANUAL OUTLINES CONSTRUCTION SITE BMP REQUIREMENTS. THE SWPPP SHALL ALSO ADDRESS OPERATION AND MAINTENANCE OF POST-CONSTRUCTION POLLUTION PREVENTION MEASURES, INCLUDING SHORT-TERM AND LONG-TERM FUNDING SOURCES AND THE PARTY OR PARTIES THAT WILL BE RESPONSIBLE FOR SAID MEASURES. THE GRADING PLANS SHALL NOTE THE CONDITION REQUIRING A SWPPP AND MONITORING PLANS.
- 24. MM HYD-3 SUPPLEMENTAL WATER QUALITY REPORT. PRIOR TO ISSUANCE OF EACH GRADING PERMIT THE APPLICANT SHALL SUBMIT SUPPLEMENTAL REPORTS TO THE OTAY RANCH VILLAGES THREE NORTH AND PORTION OF VILLAGE FOUR, VILLAGE EIGHT EAST, AND VILLAGE TEN TENTATIVE MAP WATER QUALITY TECHNICAL REPORTS, RESPECTIVELY, PREPARED BY HUNSAKER AND ASSOCIATES SAN DIEGO, INC. (2014) THAT IDENTIFIES WHICH ON-SITE STORM WATER MANAGEMENT MEASURES FROM THE WATER QUALITY TECHNICAL REPORT HAVE BEEN INCORPORATED INTO THE PROJECT TO THE SATISFACTION OF THE CITY ENGINEER. IF A STORM WATER MANAGEMENT OPTION IS CHOSEN BY THE APPLICANT THAT IS NOT SHOWN IN THE WATER QUALITY TECHNICAL REPORT, A PROJECT-SPECIFIC WATER QUALITY TECHNICAL REPORT SHALL BE PREPARED FOR THE PARCEL. REFERENCING THE OTAY RANCH VILLAGES THREE NORTH AND PORTION OF VILLAGE FOUR, VILLAGE EIGHT EAST, OR VILLAGE TEN TENTATIVE MAP WATER QUALITY TECHNICAL REPORTS, PREPARED BY HUNSAKER AND ASSOCIATES AND DATED MARCH 2014, FOR INFORMATION RELEVANT TO REGIONAL DESIGN CONCEPTS (E.G., DOWNSTREAM CONDITIONS OF CONCERN) TO THE SATISFACTION OF THE CITY ENGINEER.
- 25. MM HYD-5 LIMITATION OF GRADING. THE PROJECT APPLICANT SHALL COMPLY WITH THE CHULA VISTA DEVELOPMENT STORM WATER MANUAL LIMITATION OF GRADING REQUIREMENTS. WHICH LIMIT DISTURBED SOIL AREA TO 100 ACRES. UNLESS EXPANSION OF A DISTURBED AREA IS SPECIFICALLY APPROVED BY THE DIRECTOR OF PUBLIC WORKS. WITH ANY PHASING RESULTING FROM THIS LIMITATION. IF REQUIRED. THE PROJECT APPLICANT SHALL PROVIDE. TO THE SATISFACTION OF THE CITY ENGINEER. EROSION, AND SEDIMENT CONTROL BMPS IN AREAS THAT MAY NOT BE COMPLETED, BEFORE GRADING OF ADDITIONAL AREA BEGINS.
- 26. MM GEO-1 PRIOR TO THE ISSUANCE OF EACH GRADING PERMIT FOR VILLAGE THREE NORTH AND PORTION OF VILLAGE FOUR, VILLAGE EIGHT EAST, AND VILLAGE TEN, THE APPLICANT SHALL VERIFY THAT THE APPLICABLE RECOMMENDATIONS IN THE GEOTECHNICAL INVESTIGATION PREPARED BY GEOCON, DATED MAY 23, 2013; NOVEMBER 21, 2012; AND NOVEMBER 20, 2012, RESPECTIVELY, HAVE BEEN INCORPORATED INTO THE FINAL PROJECT DESIGN AND CONSTRUCTION DOCUMENTS TO THE SATISFACTION OF THE CITY ENGINEER. THESE RECOMMENDATIONS ADDRESS ISSUES INCLUDING BUT NOT LIMITED TO SITE GRADING, RETAINING WALLS, SEISMIC DESIGN, SLOPE STABILITY, BACK DRAIN SYSTEMS, UNDERCUTS, EXCAVATION AND FILL, MONITORING, AND SOIL TESTING. GEOTECHNICAL REVIEW OF GRADING PLANS SHALL INCLUDE A REVIEW OF ALL PROPOSED STORM DRAIN FACILITIES TO ENSURE THE STORM WATER RUNOFF WOULD NOT INTERFERE WITH THE PROPOSED GEOTECHNICAL RECOMMENDATIONS.
- 27. MM HAZ-1 PRIOR TO ISSUANCE OF A MASS GRADING PERMIT FOR EACH VILLAGE, THE APPLICANT SHALL PREPARE A SOILS ASSESSMENT TO THE SATISFACTION OF THE CITY ENGINEER TO DETERMINE IF RESIDUAL PESTICIDES, HERBICIDES, AND/OR ARSENIC ARE PRESENT ON SITE. THE ASSESSMENT SHALL BE PREPARED BY A REGISTERED ENVIRONMENTAL ASSESSOR IN ACCORDANCE WITH DEPARTMENT OF TOXIC SUBSTANCES CONTROL GUIDANCE DOCUMENT. THE ASSESSMENT SHALL INCLUDE ANALYSIS FOR ORGANOCHLORINE PESTICIDES THAT INCLUDE COMPOUNDS SUCH AS TOXAPHENE, DICHLORODIPHENYLDICHLOROETHANE (DDD), DICHLORODIPHENYLTRICHLOROETHANE (DDT), AND DICHLORODIPHENYLDICHLOROETHYLENE (DDE), WHICH HAVE BEEN HISTORICALLY IDENTIFIED AT PROPERTIES IN THE SITE VICINITY. THE CONCENTRATIONS OF THE CONTAMINANTS SHALL BE COMPARED TO REGULATORY AGENCY SOIL SCREENING LEVELS FOR RESIDENTIAL LAND USE (E.G. U.S. EPA REGION IX SOIL SCREENING LEVELS). IF LEVELS OF CONTAMINATION EXCEEDING THE SOIL SCREENING LEVELS ARE FOUND ON SITE, A SOIL REUSE PLAN SHALL BE PREPARED PRIOR TO CONSTRUCTION ON SITE. THE SOIL REUSE PLAN SHALL INCLUDE A DETERMINATION OF THE SUITABILITY OF THE SOILS FOR ON-SITE OR OFF-SITE REUSE, ANY SPECIAL HANDLING PROVISIONS THAT SHALL BE INCORPORATED AS PART OF THE SITE GRADING ACTIVITIES, AND THE PROCEDURE FOR THE PROPER REMEDIATION AND DISPOSAL OF THE CONTAMINATED SOILS, EITHER ON SITE OR OFF SITE. THE RESULTS OF THE LIMITED SOIL ASSESSMENT AND THE SOIL REUSE PLAN SHALL BE SUBMITTED TO THE COUNTY OF SAN DIEGO DEPARTMENT OF ENVIRONMENTAL HEALTH, THE DEVELOPMENT SERVICES DIRECTOR (OR THEIR DESIGNEE), AND/OR THE REGIONAL WATER QUALITY CONTROL BOARD FOR REVIEW AND APPROVAL, PRIOR TO IMPLEMENTATION.

1/2

IF THIS BAR DOES



Checked By: Y.C. THE CITY OF CHULA VISTA R.C.E. No. <u>61827</u>

NOT MEASURE 1 THEN DRAWING CHULA VISTA TRACT NO. 22-0005 NOT TO SCALE ACCELA NO.: XXXX DEVELOPMENT SERVICES DEPARTMENT PROJECT NO.: XXXX TOTAL SHEETS: 90 1796 - 6340 Principal Civil Engineer NAD83 COORDINATES *154 - 1773* LAMBERT COORDINATES Planning: Landscape: AS BUILT DRAWING NO. CONTRACTOR: XXXXX.XXXINSPECTOR: DATE COMPLETED:

NOTES SHEET FOR

OTAY RANCH VILLAGE 8 EAST

R:\0920\&Eng\Rough Grading\0920RG03

V. DWG. NO. 04078-IMP. PLANS

SIGNATURE

YOLANDA CALVO

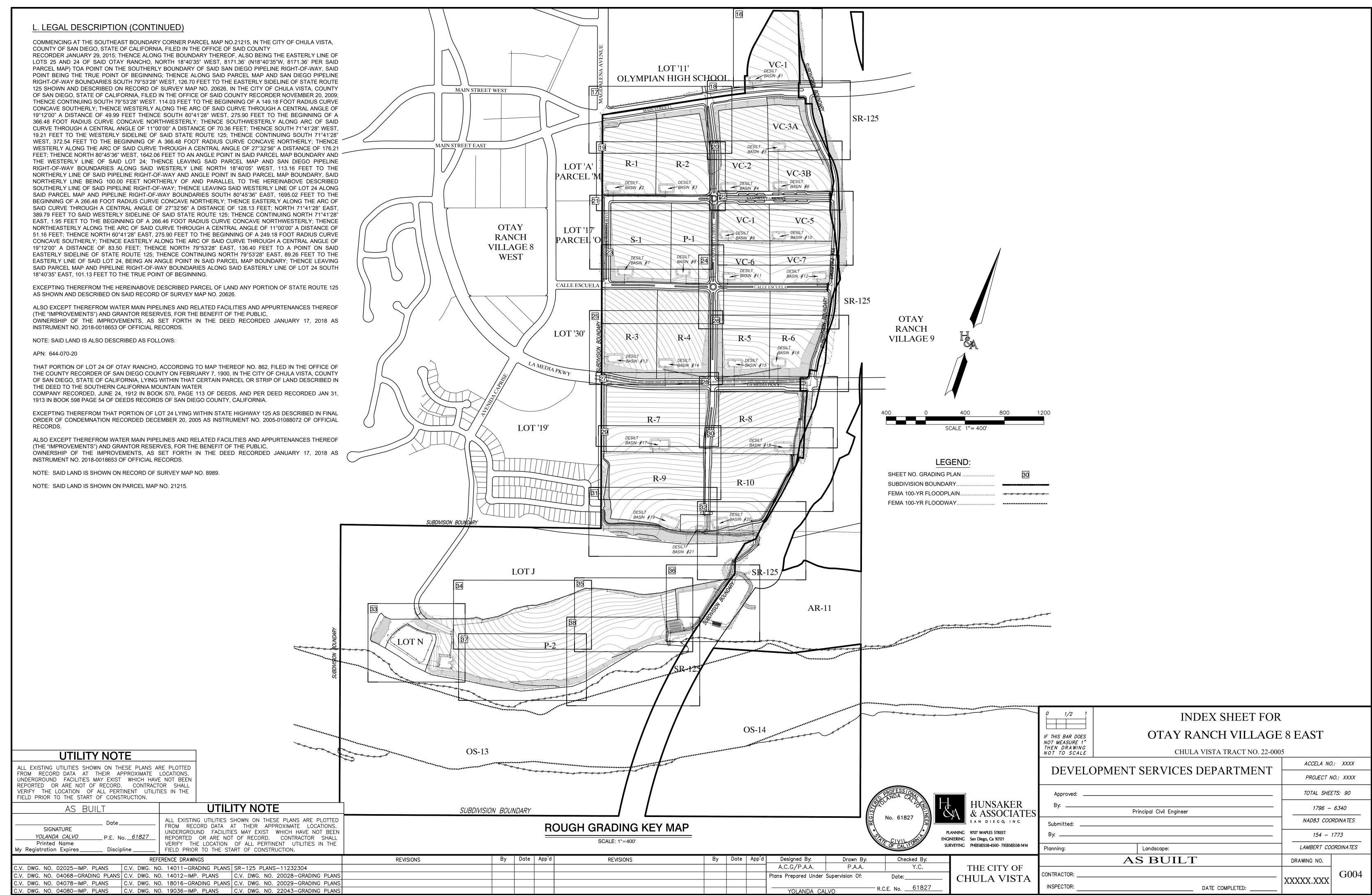
Printed Name

My Registration Expires_

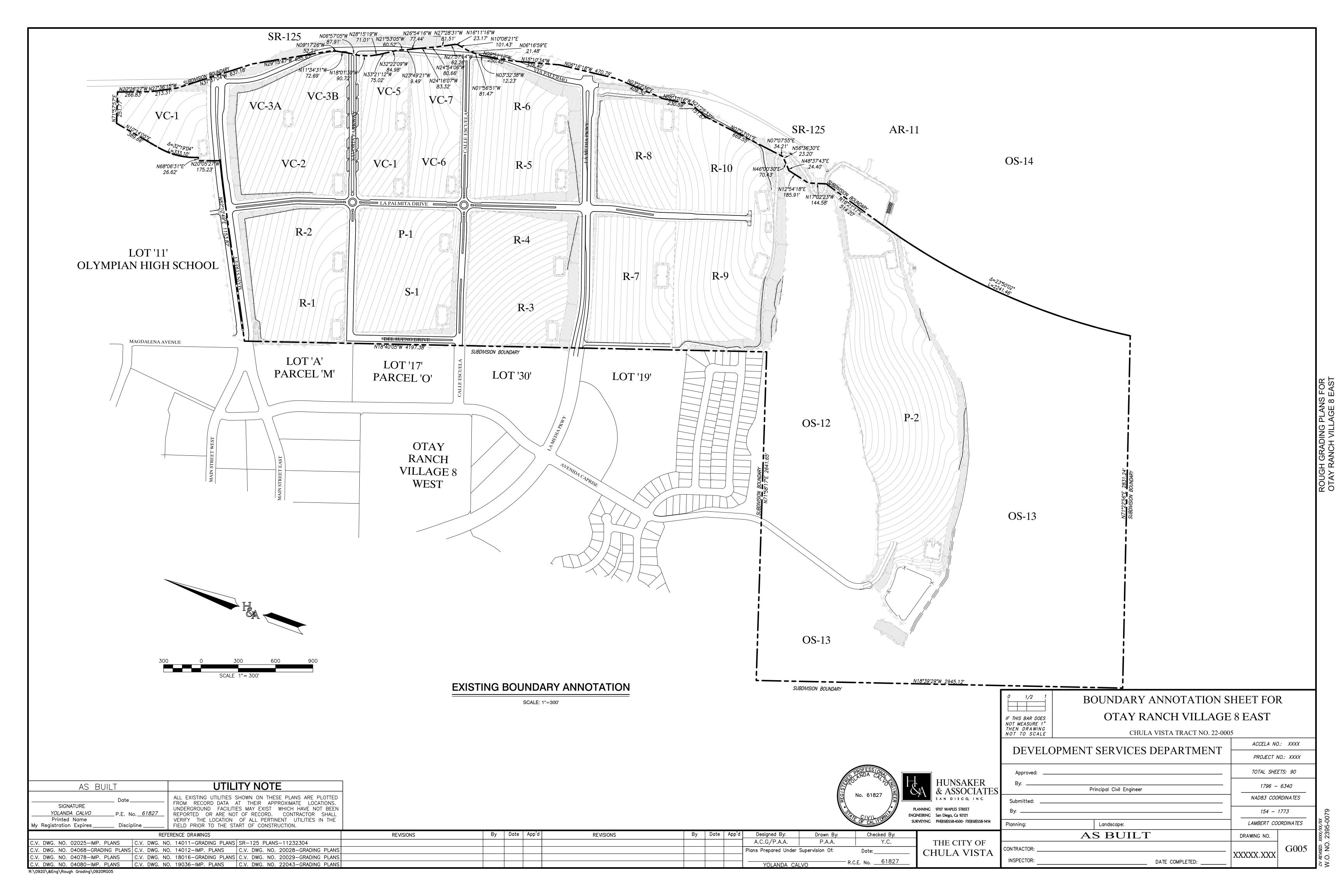
AS BUILT

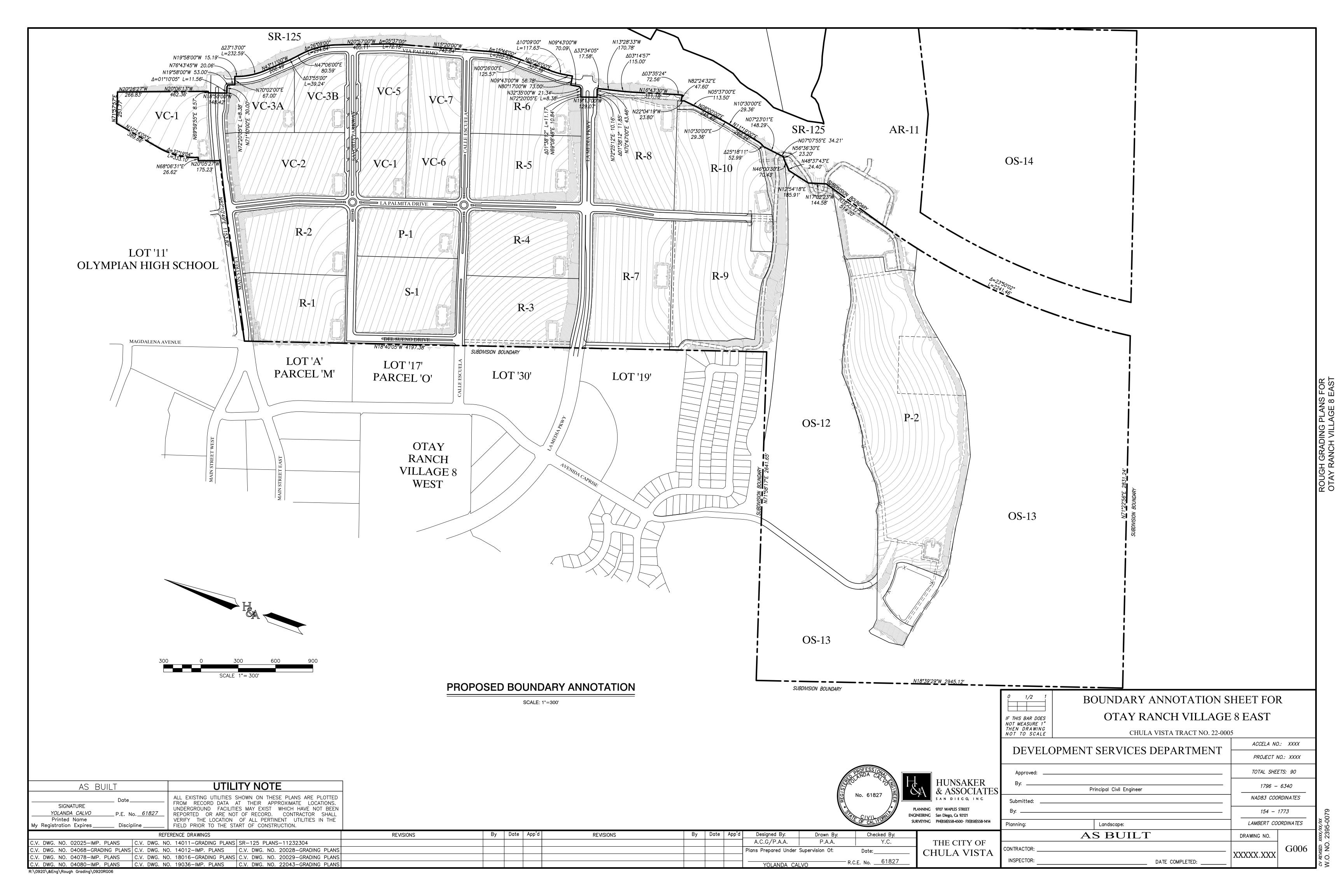
_ P.E. No. <u>61827</u>

Discipline _

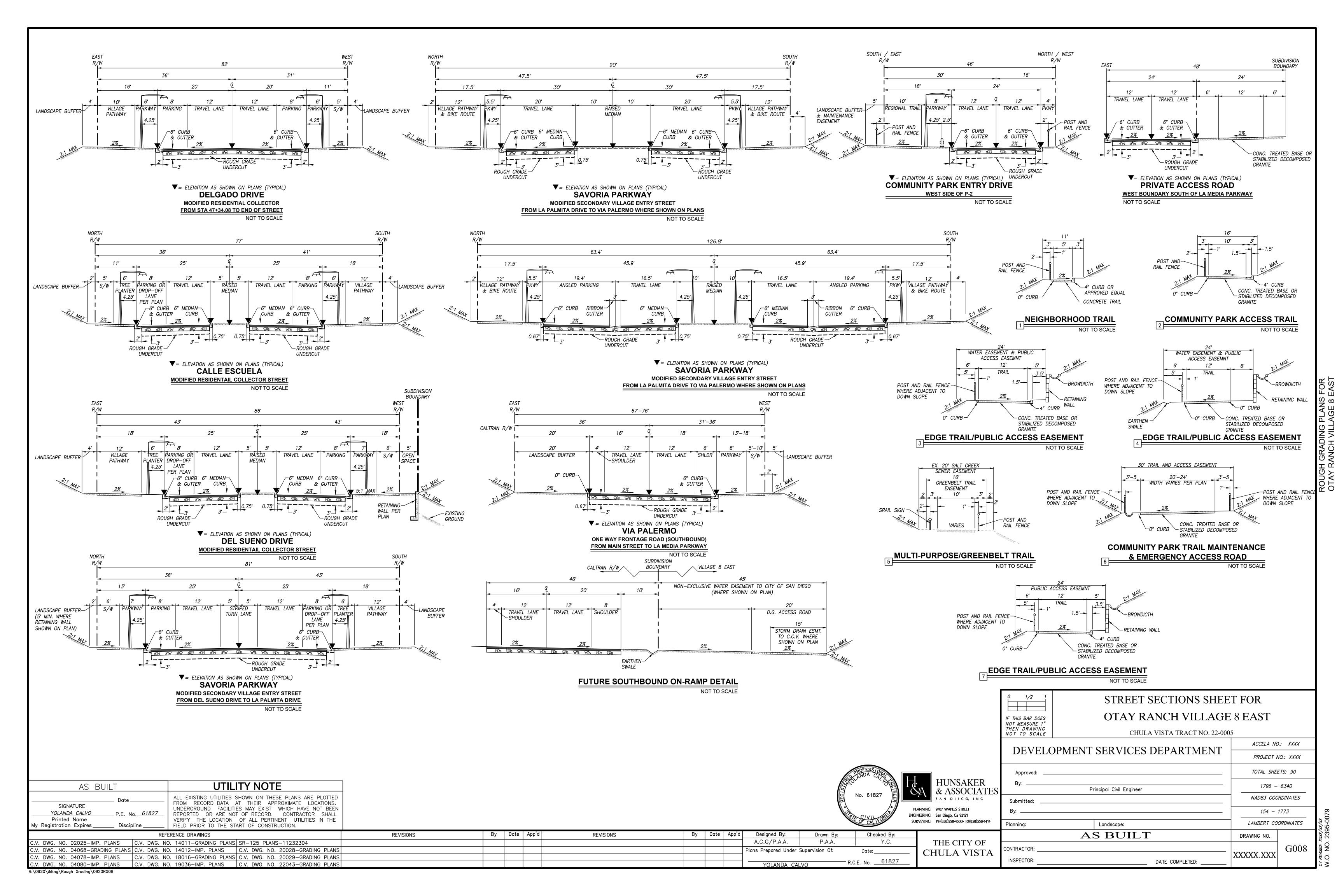


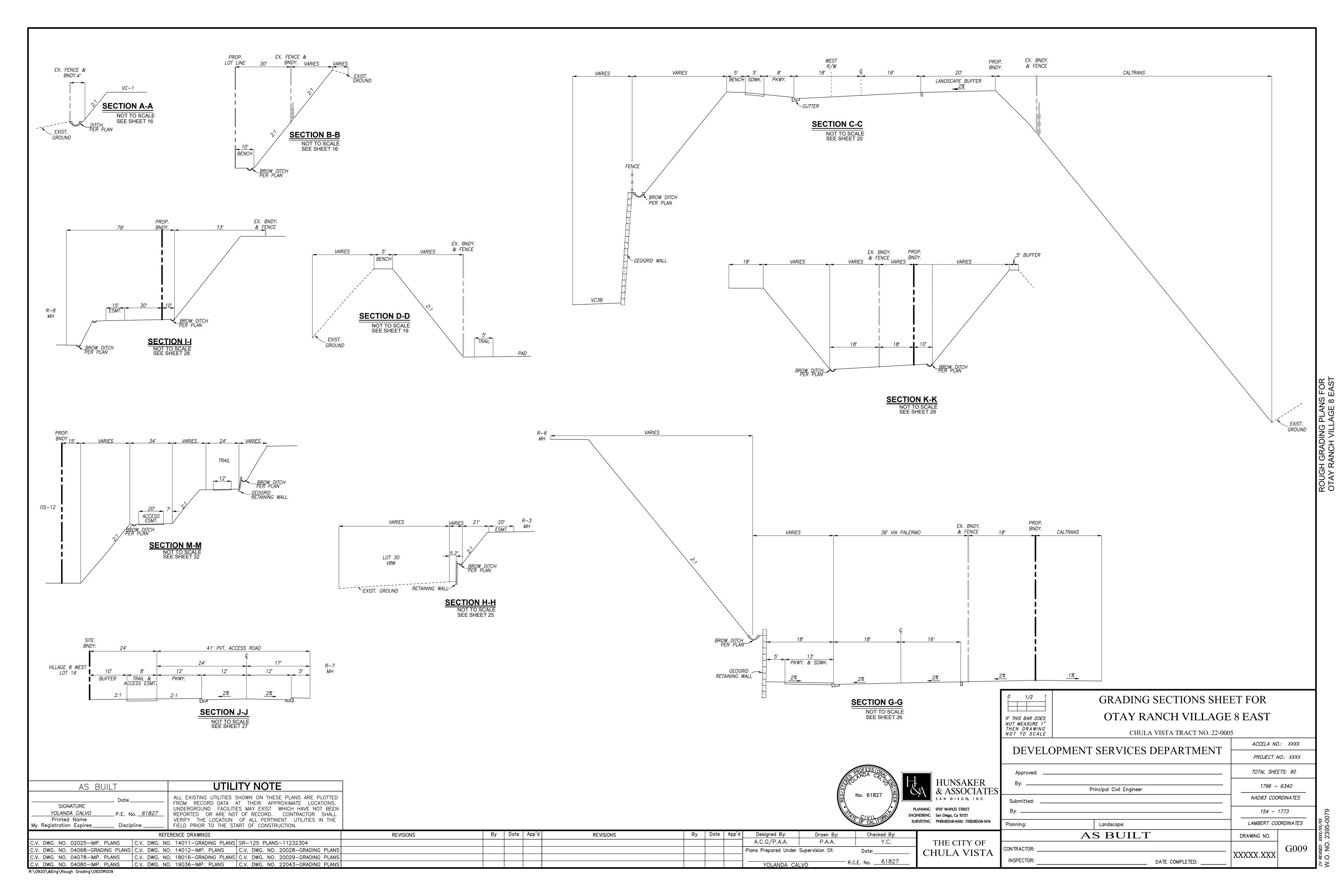
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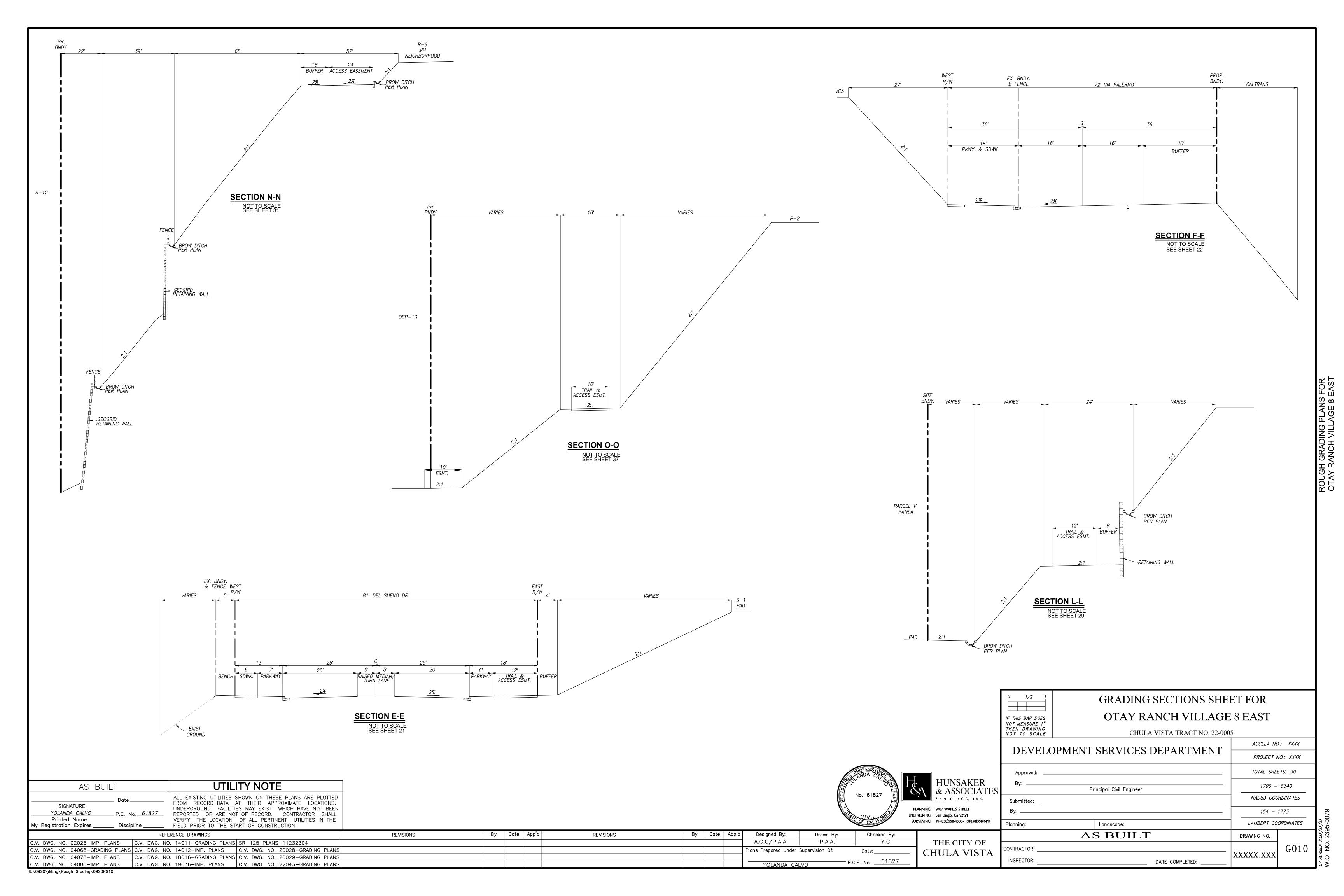


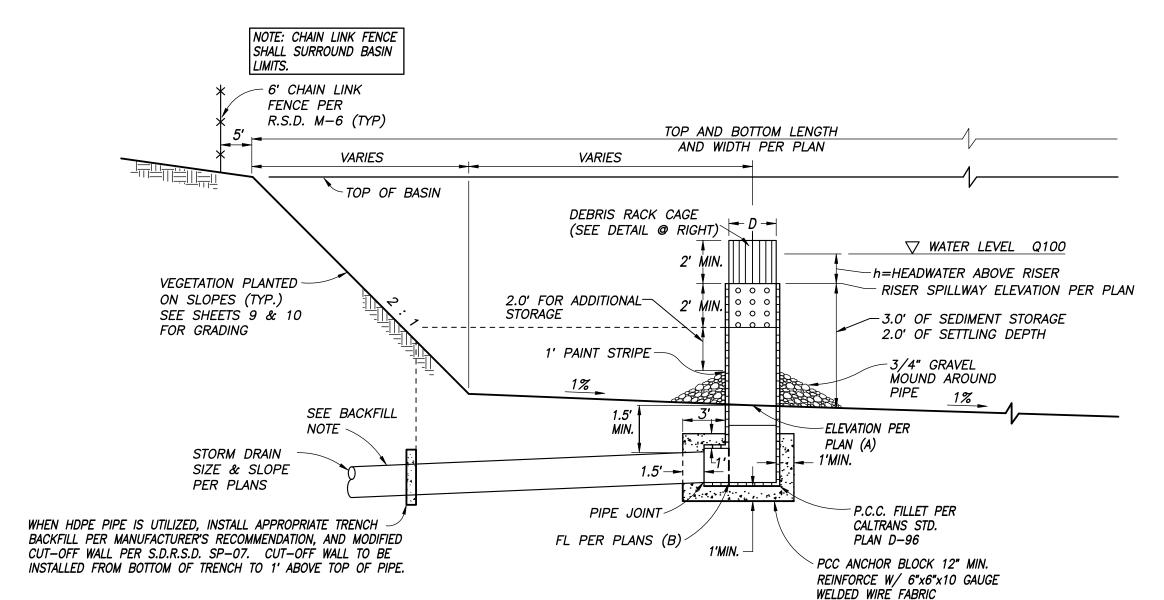


 $R:\0920\$ Eng\Rough Grading\0920RG07









MAINTENANCE

SEDIMENT SHALL BE REMOVED WHENEVER STORAGE CAPACITY AT THE PAINT STRIPE HAS BEEN ACHIEVED. SEDIMENT SHALL BE DISPOSED OF IN SUCH A MANNER THAT WILL PREVENT ITS RETURN TO THE DESILTING BASIN OR MOVEMENT INTO DOWNSTREAM AREAS DURING SUBSEQUENT RUNOFF. THE DESILTING BASINS ARE PRIVATE FACILITIES AND THE CITY WILL NOT BE RESPONSIBLE FOR THEIR MAINTENANCE. REPLACE FILTER FABRIC IF DAMAGED DURING CLEANING OPERATIONS.

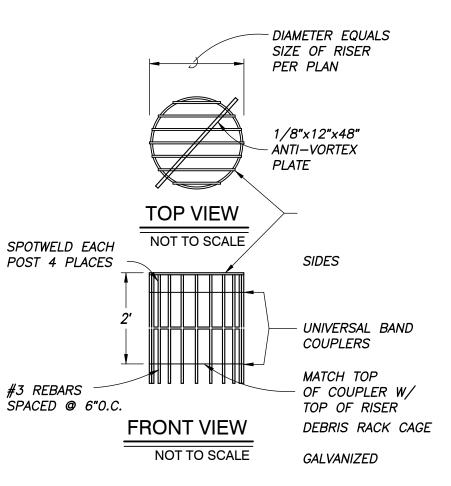
TRENCH NOTE: TRENCH BACKFILL (RCP PIPE) SHALL CONSIST OF NATIVE CLAYEY MATERIAL, APPROVED BY THE SOILS ENGINEER PRIOR TO PLACEMENT. OPEN GRADED, PERMEABLE MATERIAL SHALL NOT BE USED AS BACKFILL.

TEMPORARY EROSION CONTROL **DESILTING BASIN DETAIL**

(PRIVATELY MAINTAINED)

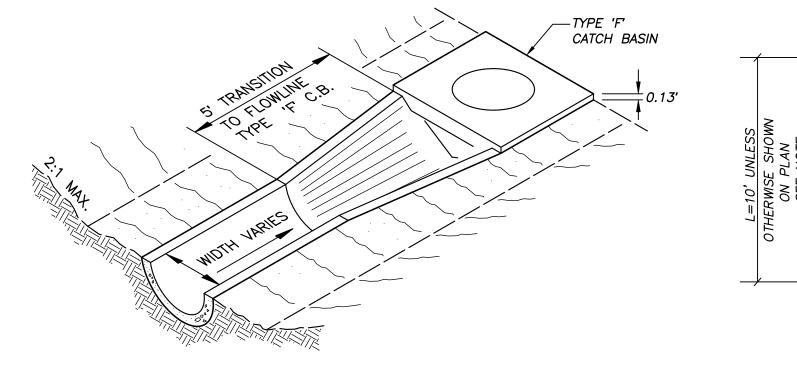
NOT TO SCALE

	DESI	LT BASIN O	RIFICE & R	ISER CONFIC	GURATION		
	BASIN 1	BASIN 2	BASIN 3	BASIN 4	BASIN 5	BASIN 6	BASIN 7
BOTTOM ELEVATION	561.4'	479.5'	483.9'	489.3'	500.7'	493.7'	461.3'
TOP ELEVATION	568.4'	486.5'	490.9'	496.3'	507.7'	500.7'	468.3'
RISER SIZE & RIM ELEVATION	24" @ 566.4'	<i>30"</i> @ 484.5'	30" @ 488.9'	<i>30"</i> @ 494. <i>3</i> '	18" @ 505.7'	24" @ 498.7'	<i>30"</i> @ 466.3
EMERGENCY RISER SIZE & RIM ELEVATION	24" @ 567.4'	<i>30" @ 485.5</i> '	<i>30" @ 489.9'</i>	<i>30" @ 495.3</i> '	18" @ 506.7'	24" @ 499.7'	<i>30" @ 467.3</i>
ORIFICE @ 3.0'	1-2"	1-3"	1-3"	1-3"	1-2"	1-2"	1-3"
ORIFICE @ 3.5'	2-2"	1-3"	1-3"	1-3"	1-2"	2-2"	1-3"
ORIFICE @ 4.0'	1-2"	1-3"	1-3"	1-3"	1-2"	1-2"	1-3"
ORIFICE @ 4.5'	1-2"	1-3"	1-3"	1-3"	1-2"	1-2"	1-3"
	BASIN 8	BASIN 9	BASIN 10	BASIN 11	BASIN 12	BASIN 13	BASIN 14
BOTTOM ELEVATION	465.5'	480.8'	486.3'	467.2'	467.4'	424.9'	433.8'
TOP ELEVATION	472.5'	487.8'	493.3'	474.2'	474.4'	431.9'	440.8'
RISER SIZE & RIM ELEVATION	18" @ 470.5'	24" @ 485.8'	24" @ 491.3'	24" @ 472.2'	24" @ 472.4'	30" @ 429.9'	<i>30" @ 438.8</i>
EMERGENCY RISER SIZE & RIM ELEVATION	18" @ 471.5	24" @ 486.8'	24" @ 492.3'	24" @ 473.2'	24" @ 473.4'	30" @ 430.9'	<i>30" @ 439.8</i>
ORIFICE @ 3.0'	1-2"	1-2"	1-2"	1-2"	1-2"	1-3"	1-3"
ORIFICE @ 3.5'	1-2"	2-2"	2-2"	2-2"	2-2"	1-3"	1-3"
ORIFICE @ 4.0'	1-2"	1-2"	1-2"	1-2"	1-2"	1-3"	1-3"
ORIFICE @ 4.5'	1-2"	1-2"	1-2"	1-2"	1-2"	1-3"	1-3"
	BASIN 15	BASIN 16	BASIN 17	BASIN 18	BASIN 19	BASIN 20	BASIN 21
BOTTOM ELEVATION	447.2'	450.8'	373.8'	369.7'	360.7'	359.7'	359.8'
TOP ELEVATION	454.2'	457.8'	380.8'	376.7'	367.7'	366.7'	366.8'
RISER SIZE & RIM ELEVATION	30" @ 452.2'	<i>30" @ 455.8</i> '	<i>30" @ 378.8</i> '	<i>30" @ 374.7'</i>	30" @ 365.7'	30" @ 364.7'	18" @ 364.8
EMERGENCY RISER SIZE & RIM ELEVATION	30" @ 453.2'	<i>30" @ 456.8</i> '	<i>30" @ 379.8</i> '	<i>30" @ 375.7</i> '	30" @ 366.7'	30" @ 365.7'	18" @ 365.8
ORIFICE @ 3.0'	1-3"	1-3"	1-3"	1-3"	1-3"	1-3"	1-1"
ORIFICE @ 3.5'	1-3"	1-3"	3–3"	1-3"	3–3"	1-3"	2-1"
ORIFICE @ 4.0'	1-3"	1-3"	3–3"	1-3"	3–3"	1-3"	2-1"
ORIFICE @ 4.5'	1-3"	1-3"	3–3"	1-3"	3–3"	1-3"	2-1"



C.M.P. RISER HOT-DIPPED FULLY COATED GALVANIZED 12 GAUGE 2-2/3" x 1/2" CORRUGATIONS, DIAMETER PER PLANS AND TABLE. ORIFICES PER PLANS AND TABLE WRAP RISER WITH TREVIRA S1115 FILTER FABRIC OR EQUAL.

DEBRIS RACK CAGE DETAIL NOT TO SCALE



NOT TO SCALE

DITCH TO "F" CATCH BASIN TRANSITION

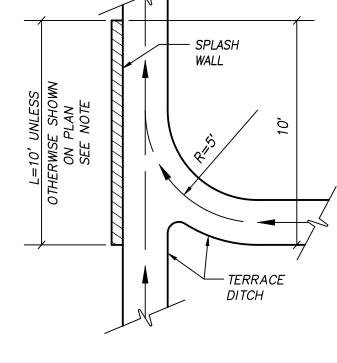
W=WIDTH (PER PLAN)

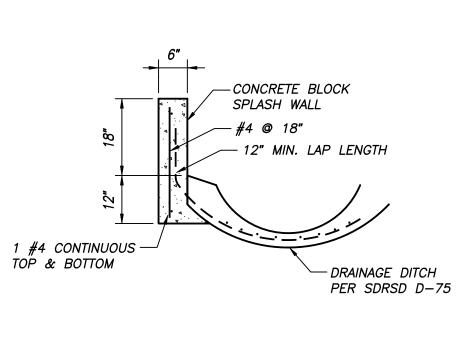
D=DEPTH (PER, PLAN)

S.D.R.S.D. D-75 TYPE 'D'

BROW DITCH

NOTE: WIDTH & DEPTH VARY PER PLAN NOT TO SCALE

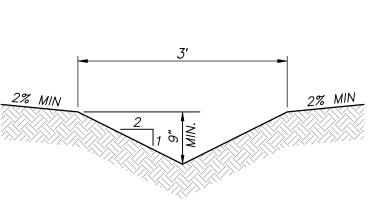




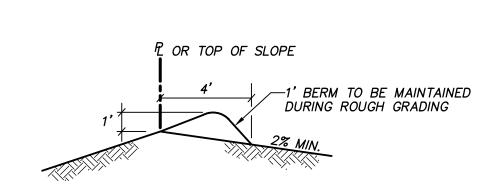
TYPICAL PLAN AT "TEE" NOT TO SCALE **CONCRETE SPLASH WALL** NOT TO SCALE

BROW DITCH JUNCTIONS

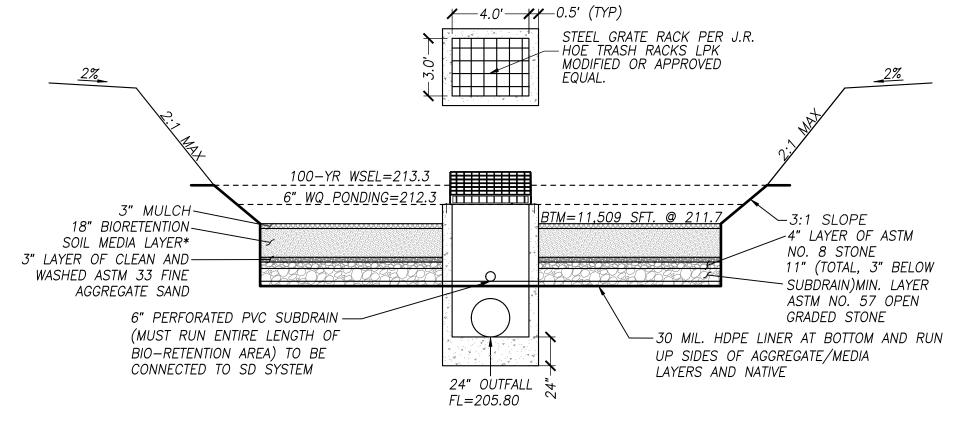
NOT TO SCALE



PROPOSED EARTHEN SWALE NOT TO SCALE



TEMPORARY TOP OF SLOPE BERM (TYP.) NOT TO SCALE



** BIO-RETENTION FILL NOTES

REVISIONS

By | Date | App'd |

REVISIONS

18" MIN. SOIL MIX: MUST MAINTAIN A MINIMUM PERCOLATION RATE OF 5 INCHES PER HOUR THROUGHOUT THE LIFE OF THE FACILITY, AND IT MUST BE SUITALBE FOR MAINTAINING PLANT LIFE.

12" MIN. CLASS 2 PERMEABLE: CALTRANS SPECIFICATION 68-2.02F(3) IS RECOMMENDED. OPEN-GRADED CRUSHED ROCK, WASHED, MAY BE USED, BUT REQUIRES 4"-6" WASHED PEA GRAVEL BE SUBSTITUTED AT THE TOP OF THE CRUSHED ROCK GRAVEL LAYERS.

> GRADING SECTION FOR BIOFILTRATION BASIN BF-2-2 & OUTLET STRUCTURE DETAIL

> > NOT TO SCALE

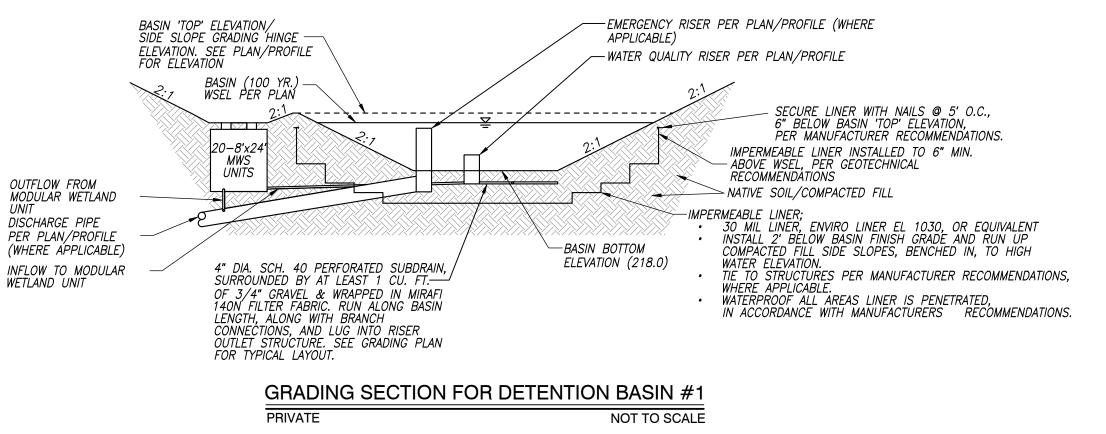
By | Date | App'd |

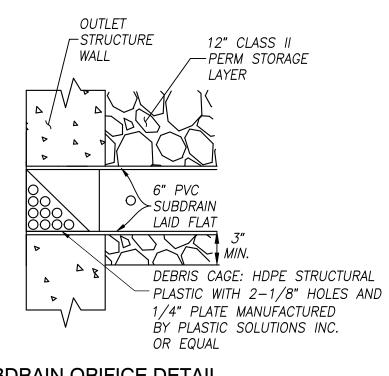
Designed By:

A.C.G/P.A.A.

Plans Prepared Under Supervision Of:

YOLANDA CALVO





Date:

SUBDRAIN ORIFICE DETAIL NOT TO SCALE

Drawn By:

P.A.A.



SURVEYING PH(858)558-4500 · FX(858)558-1414

1/2

IF THIS BAR DOES

NOT MEASURE 1 THEN DRAWING

NOT TO SCALE

Checked By: Y.C. THE CITY OF CHULA VISTA ⁻ R.C.E. No. <u>61827</u>

DETAILS SHEET FOR
OTAY RANCH VILLAGE 8 EAST

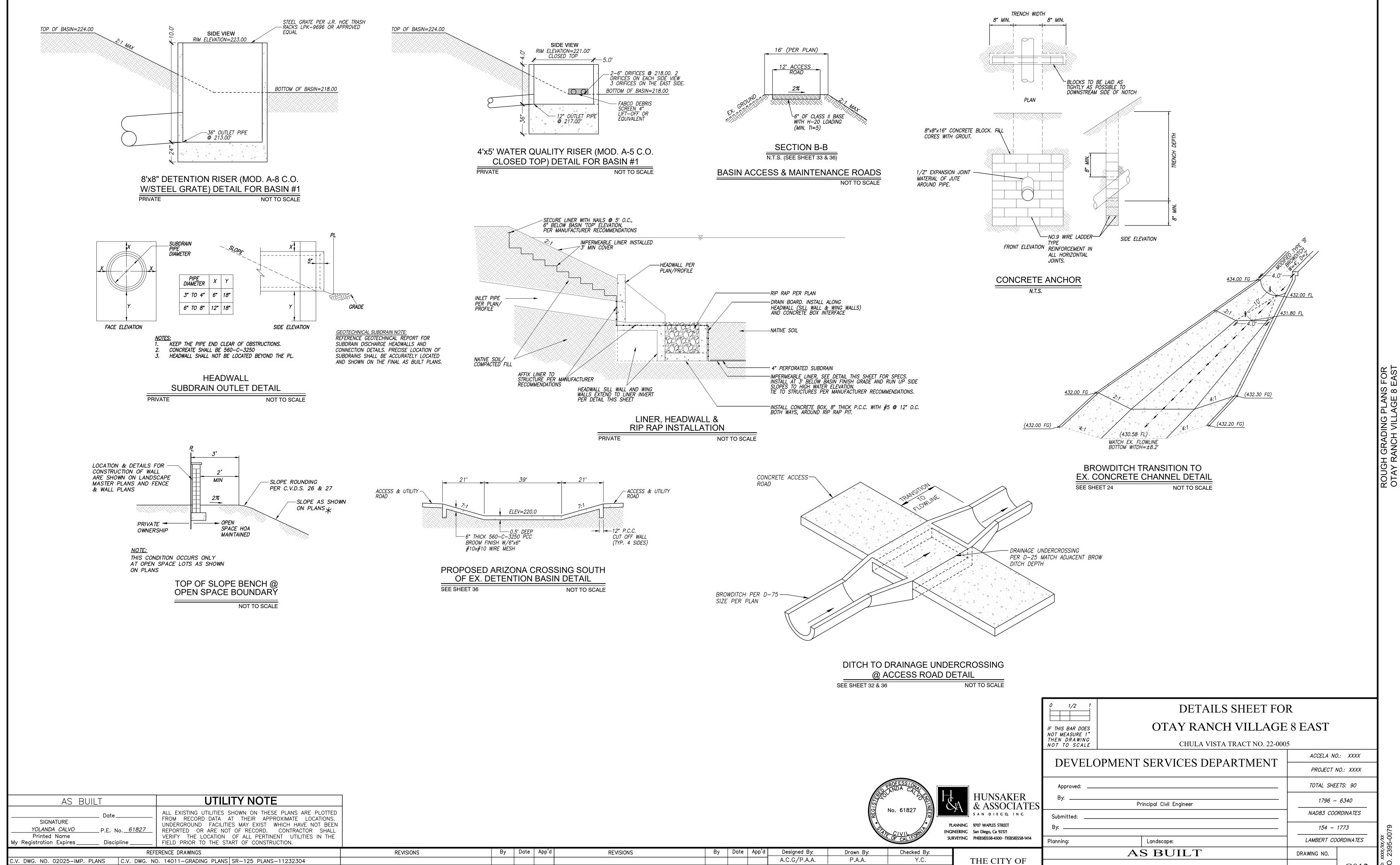
CHULA VISTA TRACT NO. 22-0005

DEVICI	ACCELA NO	O.: XXXX	
DEVELO	PROJECT I	VO.: XXXX	
Approved:		_ TOTAL SHE	ETS: 90
Bv:	Principal Civil Engineer	4700	0740
- ,		1796 – 6340	
	NAD83 COC	NAD83 COORDINATES	
Submitted:		-	
Ву:		_ 154 -	1773
Planning:	Landscape:	LAMBERT CO	ORDINATES
	AS BUILT	DRAWING NO.	
CONTRACTOR:			G011
INSPECTOR:	DATE COMPLETED:	XXXXX.XXX 	

AS BUILT	UTILITY NOTE				
Date SIGNATURE YOLANDA CALVO P.E. No. 61827 Printed Name My Registration Expires Discipline	ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE FIELD PRIOR TO THE START OF CONSTRUCTION.				
DEFEDENCE DRAWINGS					

V. DWG. NO. 02025-IMP. PLANS | C.V. DWG. NO. 14011-GRADING PLANS | SR-125 PLANS-11232304 .V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS V. DWG. NO. 04078-IMP. PLANS C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

V. DWG. NO. 04080-IMP. PLANS C.V. DWG. NO. 19036-IMP. PLANS C.V. DWG. NO. 22043-GRADING PLANS $R:\0920\$ Eng\Rough Grading\0920RG11



Plans Prepared Under Supervision Of:

YOLANDA CALVO

Date:

– R.C.E. No. <u>61827</u>

V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS

V. DWG. NO. 04080-IMP. PLANS C.V. DWG. NO. 19036-IMP. PLANS C.V. DWG. NO. 22043-GRADING PLANS

C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

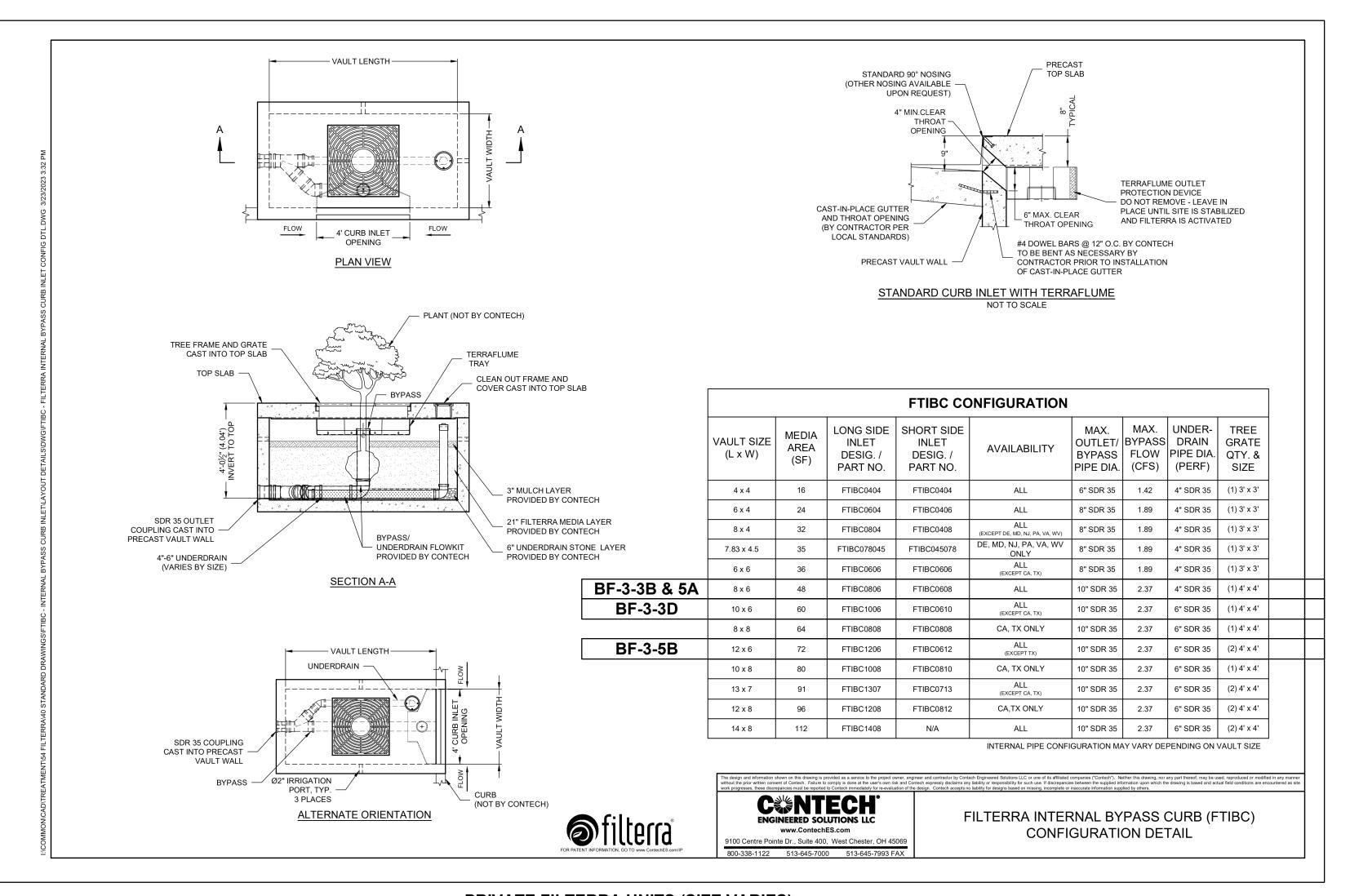
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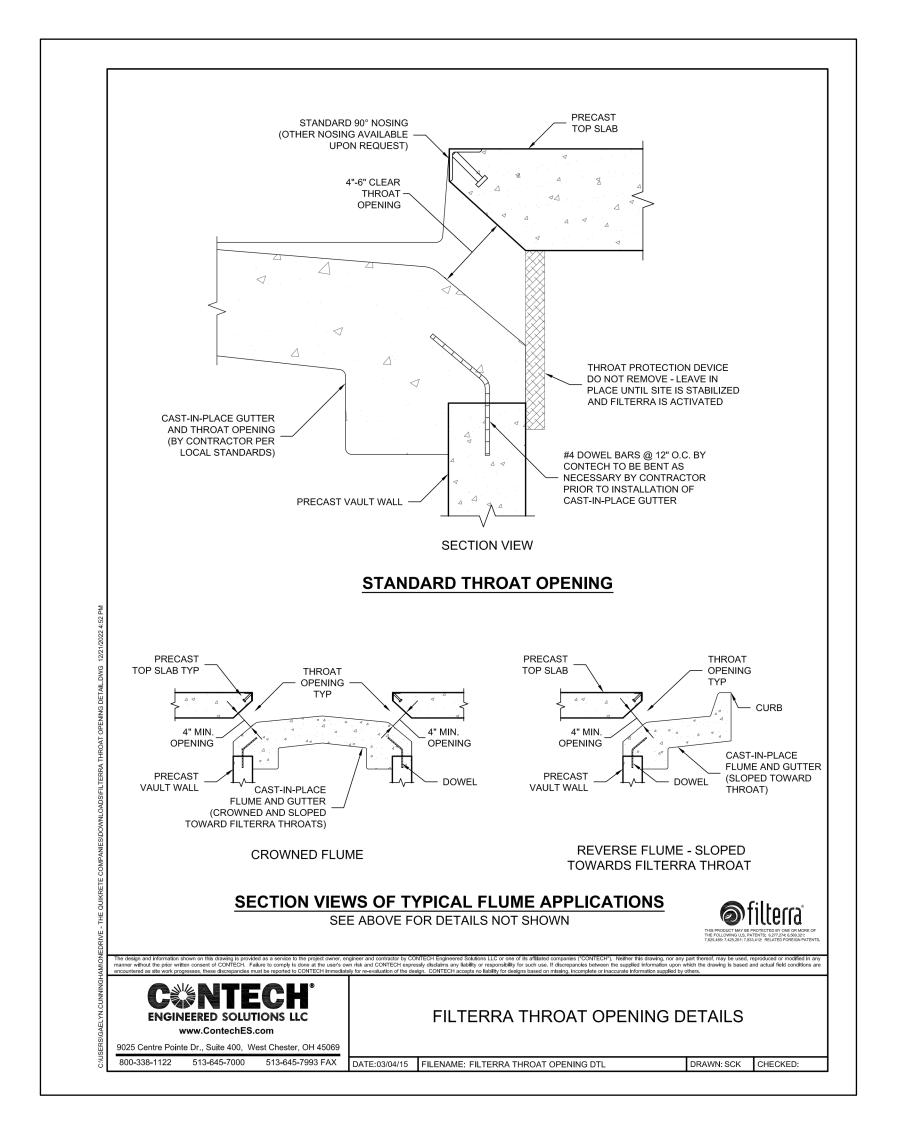
DATE COMPLETED: _

CONTRACTOR:

INSPECTOR:

CHULA VISTA





PRIVATE FILTERRA UNITS (SIZE VARIES) BMPs BF-3-3A THROUGH BF-3-3D (SEE SHEET 16) NOT TO SCALE

REVISIONS

By Date App'd

REVISIONS

By | Date | App'd |

Designed By:

A.C.G/P.A.A.

Plans Prepared Under Supervision Of:

YOLANDA CALVO

UTILITY NOTE

FIELD PRIOR TO THE START OF CONSTRUCTION.

C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

REFERENCE DRAWINGS

C.V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS

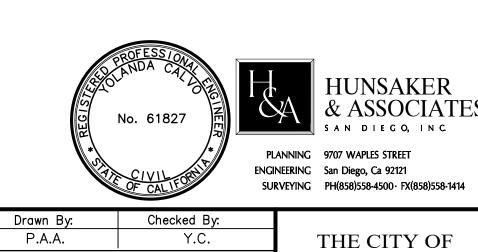
.V. DWG. NO. 02025-IMP. PLANS | C.V. DWG. NO. 14011-GRADING PLANS | SR-125 PLANS-11232304

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN

REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL

VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE



Date:__

– R.C.E. No. <u>61827</u>

	0 1/2 1	2		
	IF THIS BAR DOES NOT MEASURE 1"	OTAY RANCH VILLAGE	8 EAST	
	THEN DRAWING NOT TO SCALE CHULA VISTA TRACT NO. 22-0005			
	DEVIELO	ADMENIT CEDATICEC DEDA DEMAENT	ACCELA NO.	.: XXXX
	DEVELC	PMENT SERVICES DEPARTMENT	PROJECT NO.: XXXX	
	Approved:		TOTAL SHEE	TS: 90
HUNSAKER & ASSOCIATES	Ву:	Principal Civil Engineer	1796 -	6340
SAN DIEGO, INC	Submitted:		NAD83 COOF	RDINATES
NNING 9707 WAPLES STREET EERING San Diego, Ca 92121	Ву:		154 – 1	
/EYING PH(858)558-4500 · FX(858)558-1414	Planning:	Landscape:	LAMBERT COO	DRDINATES
		AS BUILT	DRAWING NO.	
THE CITY OF CHULA VISTA	CONTRACTOR:		XXXXX.XXX	G013
	INSPECTOR:	DATE COMPLETED:	AAAAAAA	

.V. DWG. NO. 04080-IMP. PLANS | C.V. DWG. NO. 19036-IMP. PLANS | C.V. DWG. NO. 22043-GRADING PLANS R:\0920\&Eng\Rough Grading\0920RG13

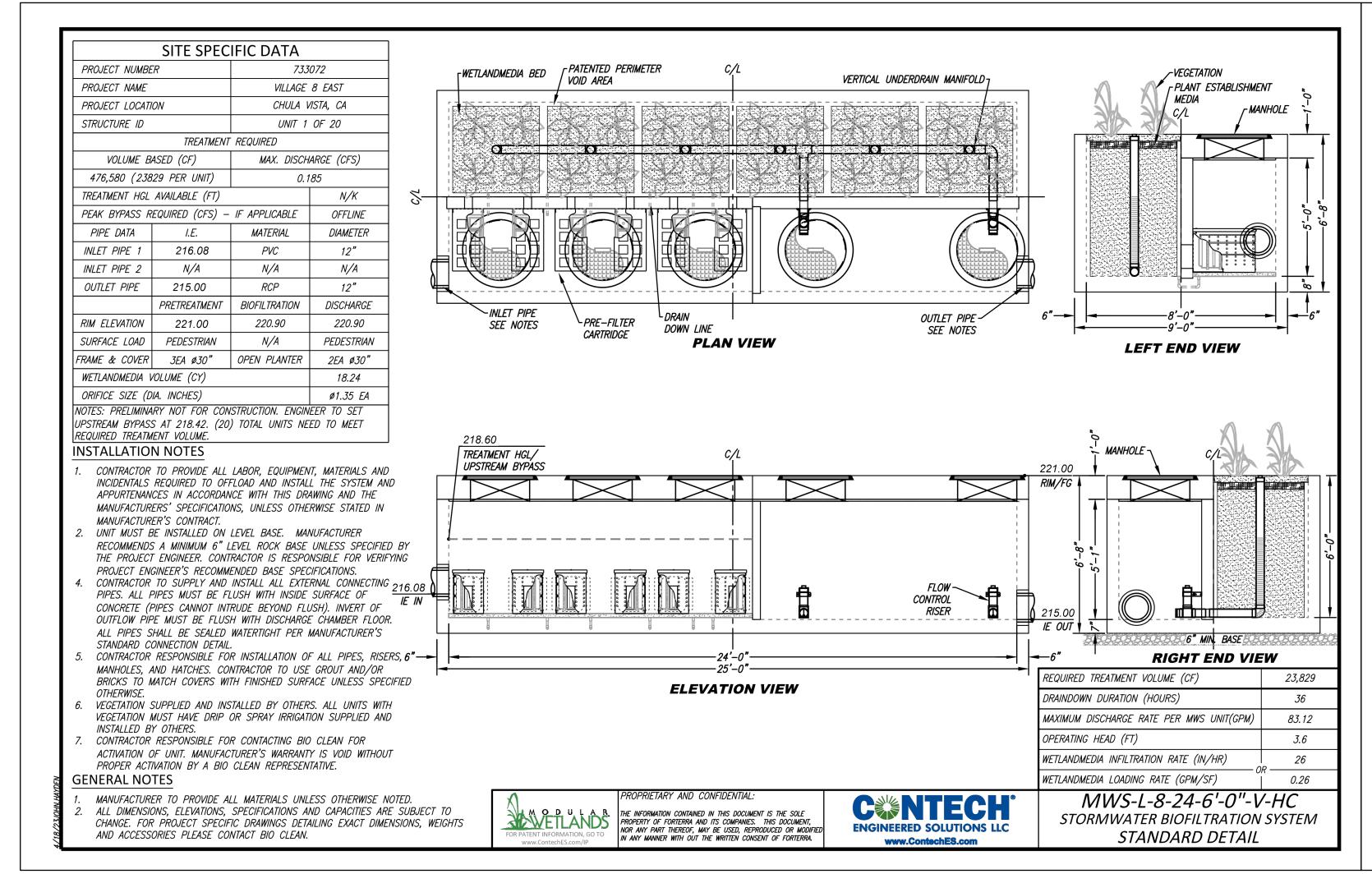
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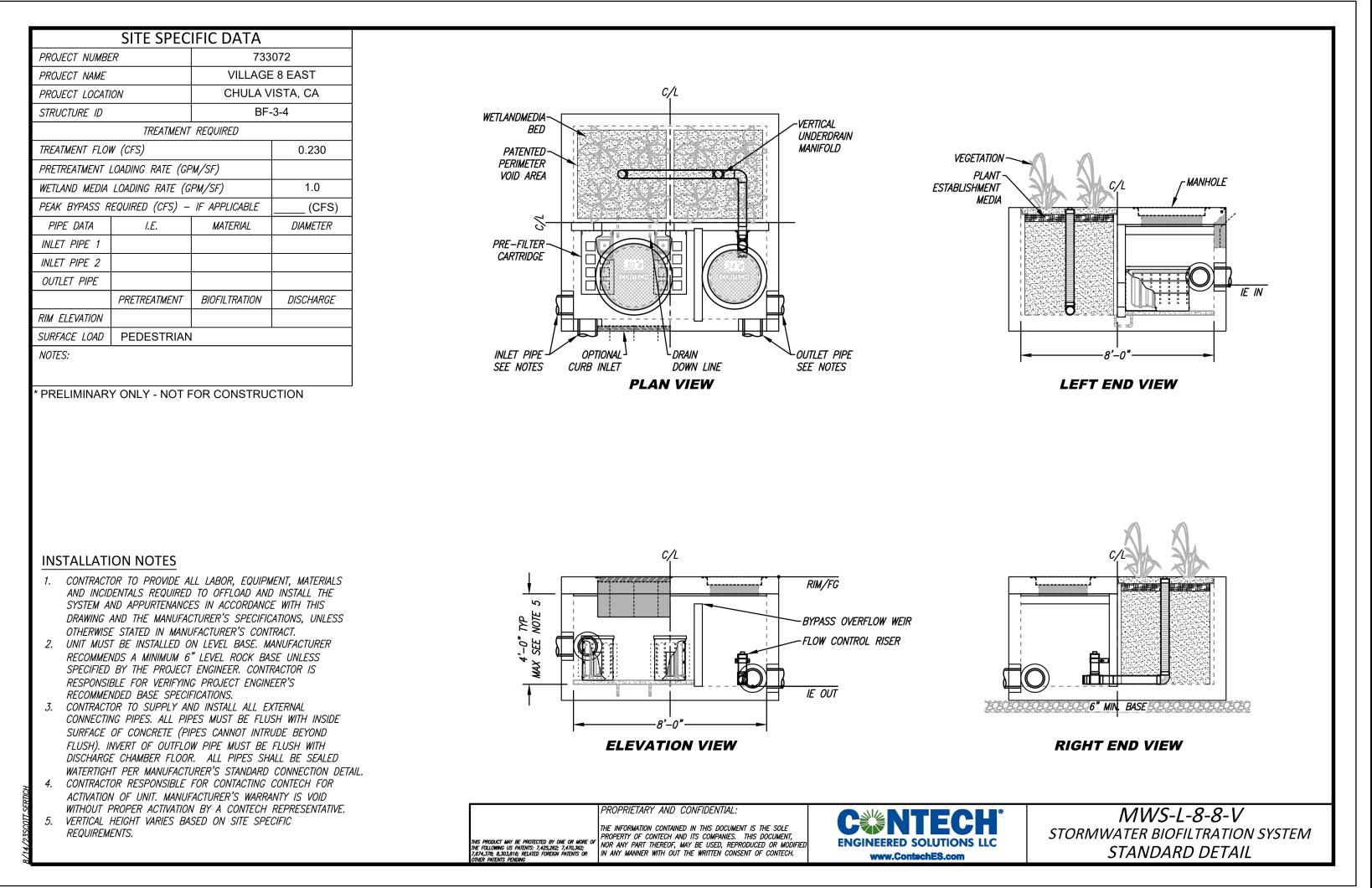
YOLANDA CALVO

Printed Name

My Registration Expires_

AS BUILT





PRIVATE MODULAR WETLAND SYSTEM L-8-24-6'-0" V-HC
BMP BF-3-1, 1 OF 20 IDENTICAL UNITS (SEE SHEETS 15 & 33)

REVISIONS

UTILITY NOTE

FIELD PRIOR TO THE START OF CONSTRUCTION.

C.V. DWG. NO. 18016-GRADING PLANS C.V. DWG. NO. 20029-GRADING PLANS

REFERENCE DRAWINGS

.V. DWG. NO. 04068-GRADING PLANS C.V. DWG. NO. 14012-IMP. PLANS C.V. DWG. NO. 20028-GRADING PLANS

.V. DWG. NO. 02025-IMP. PLANS | C.V. DWG. NO. 14011-GRADING PLANS | SR-125 PLANS-11232304

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN

REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL

VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE

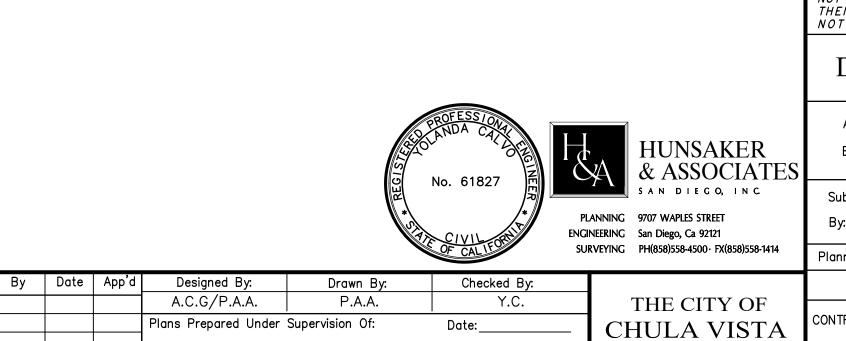
NOT TO SCALE

By Date App'd

REVISIONS

PRIVATE MODULAR WETLAND SYSTEM L-8-8-4'-0" V
BMP BF-3-4 (SEE SHEET 16)

NOT TO SCALE



- R.C.E. No. <u>61827</u>

YOLANDA CALVO

	IF THIS BAR DOES NOT MEASURE 1"				
	THEN DRAWING NOT TO SCALE	5			
	DEVIELO	ACCELA NO.: XXXX			
	DEVELO	PROJECT NO.: XXXX			
	Approved:		TOTAL SHEE	TTS: 90	
ES	Ву:	1796 - 6340			
LS	Submitted:	NAD83 COORDINATES			
	Ву:	154 - 1773			
114	Planning:	Landscape:	LAMBERT COORDINATES		xx/xx
		DRAWING NO.		/xxxx	
A	CONTRACTOR:		XXXXX.XXX	G014	CV REVISED: XXXX/XX/XX
	INSPECTOR:	DATE COMPLETED:			2

DETAILS SHEET FOR

C.V. DWG. NO. 04080-IMP. PLANS C.V. DWG. NO. 19036-IMP. PLANS C.V. DWG. NO. 22043-GRADING PLANS R:\0920\&Eng\Rough Grading\0920RG14

SIGNATURE

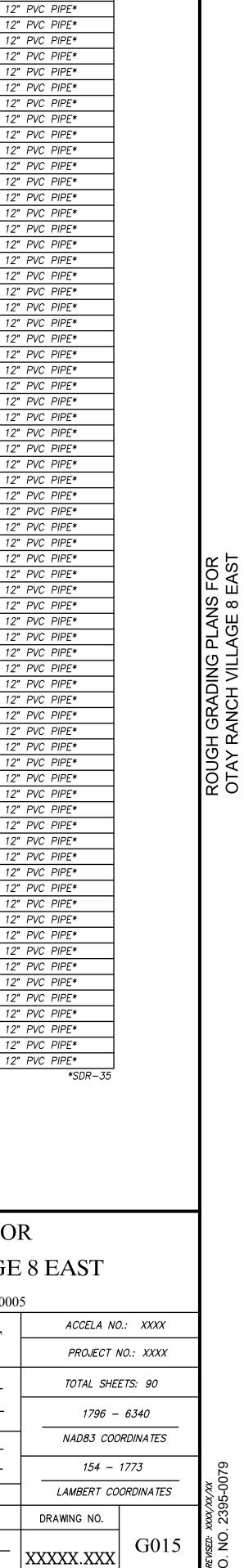
YOLANDA CALVO

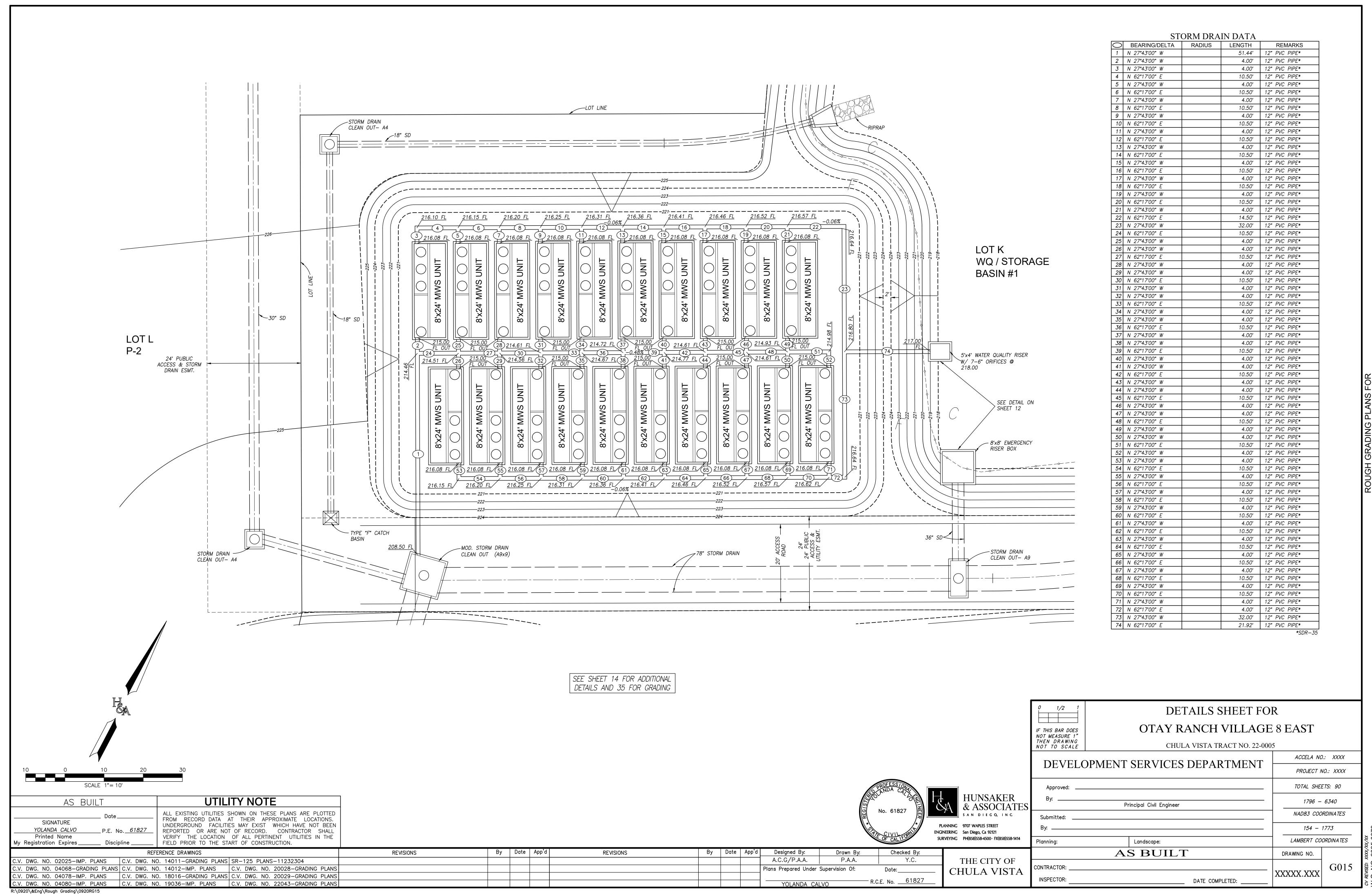
Printed Name

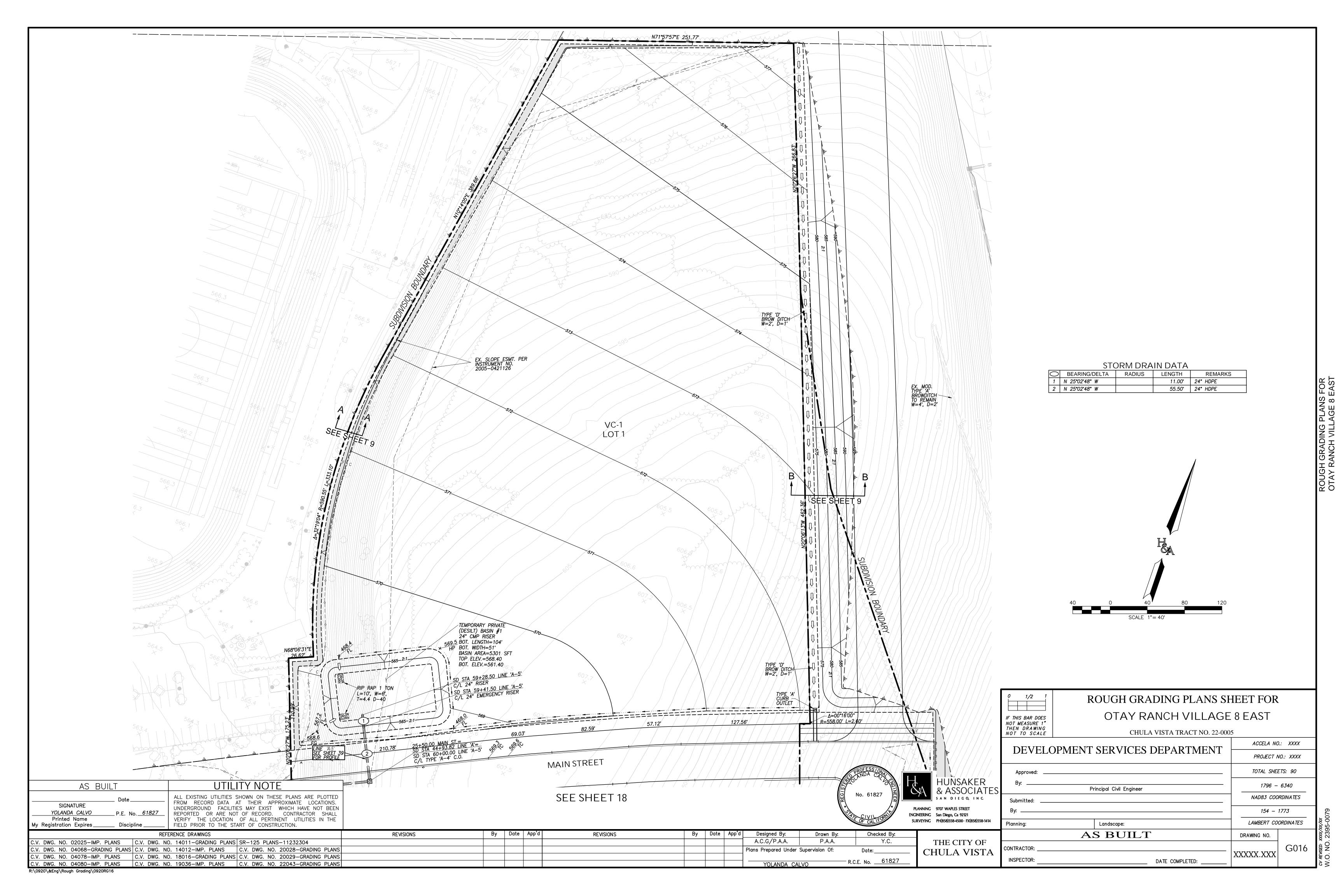
My Registration Expires

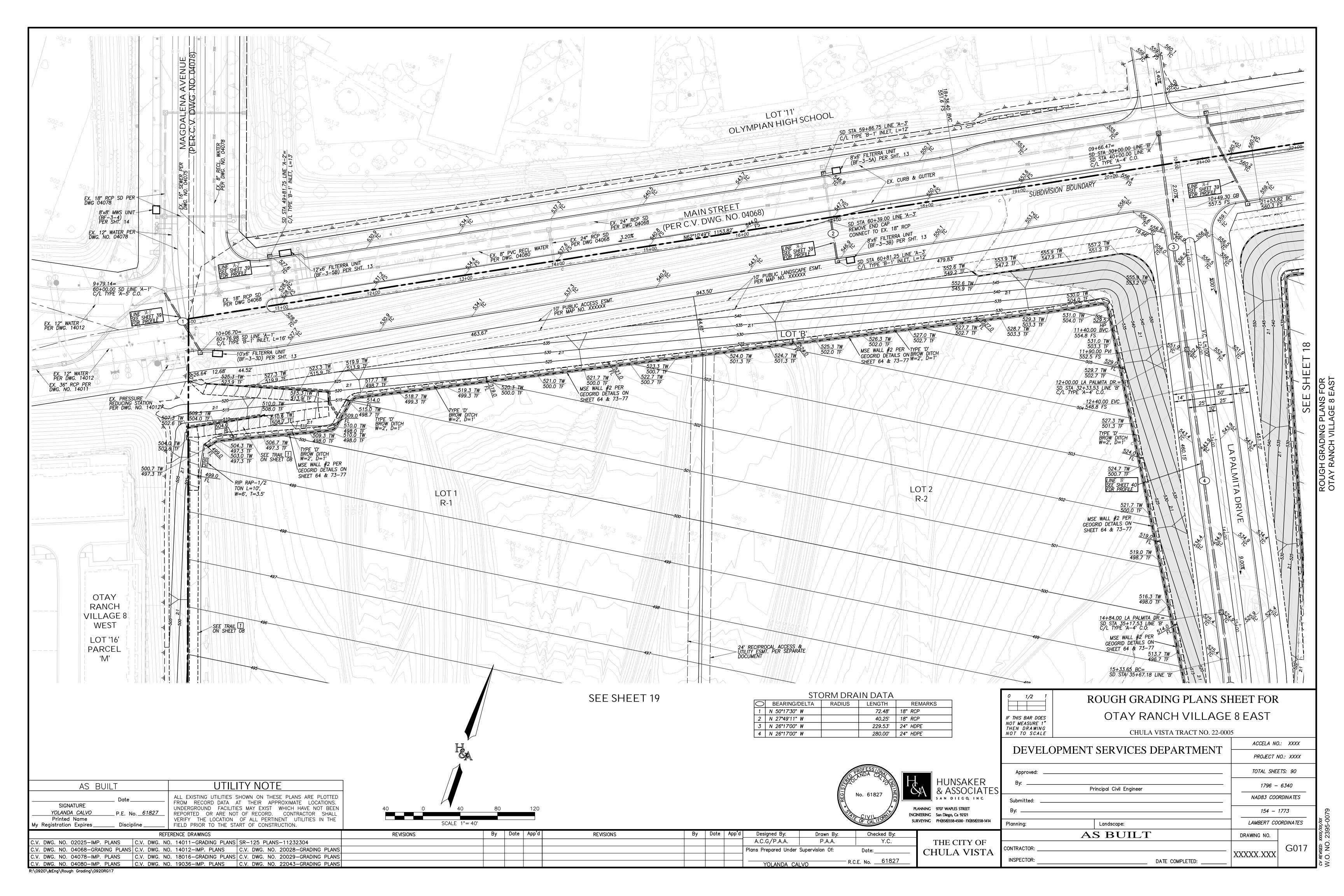
AS BUILT

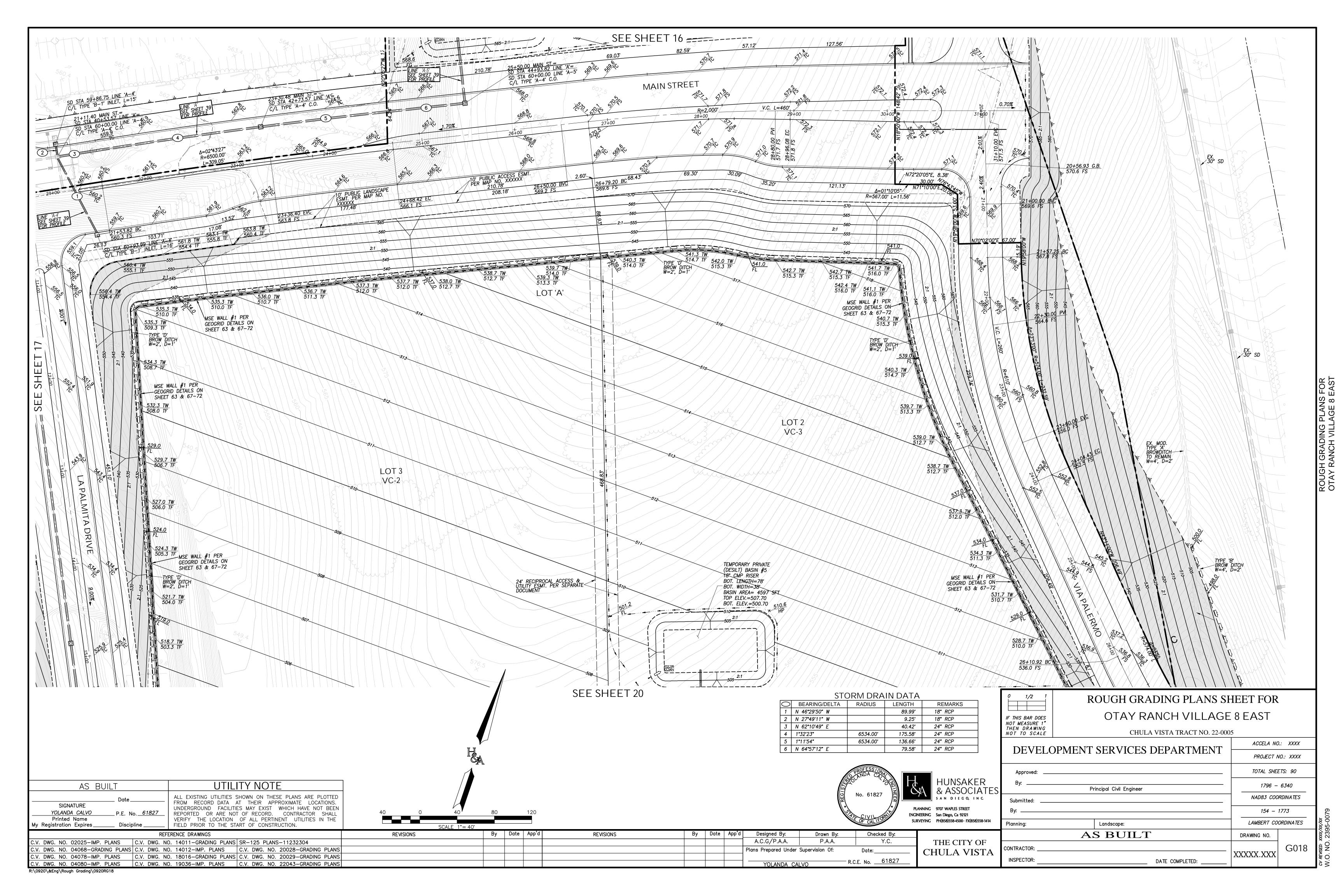
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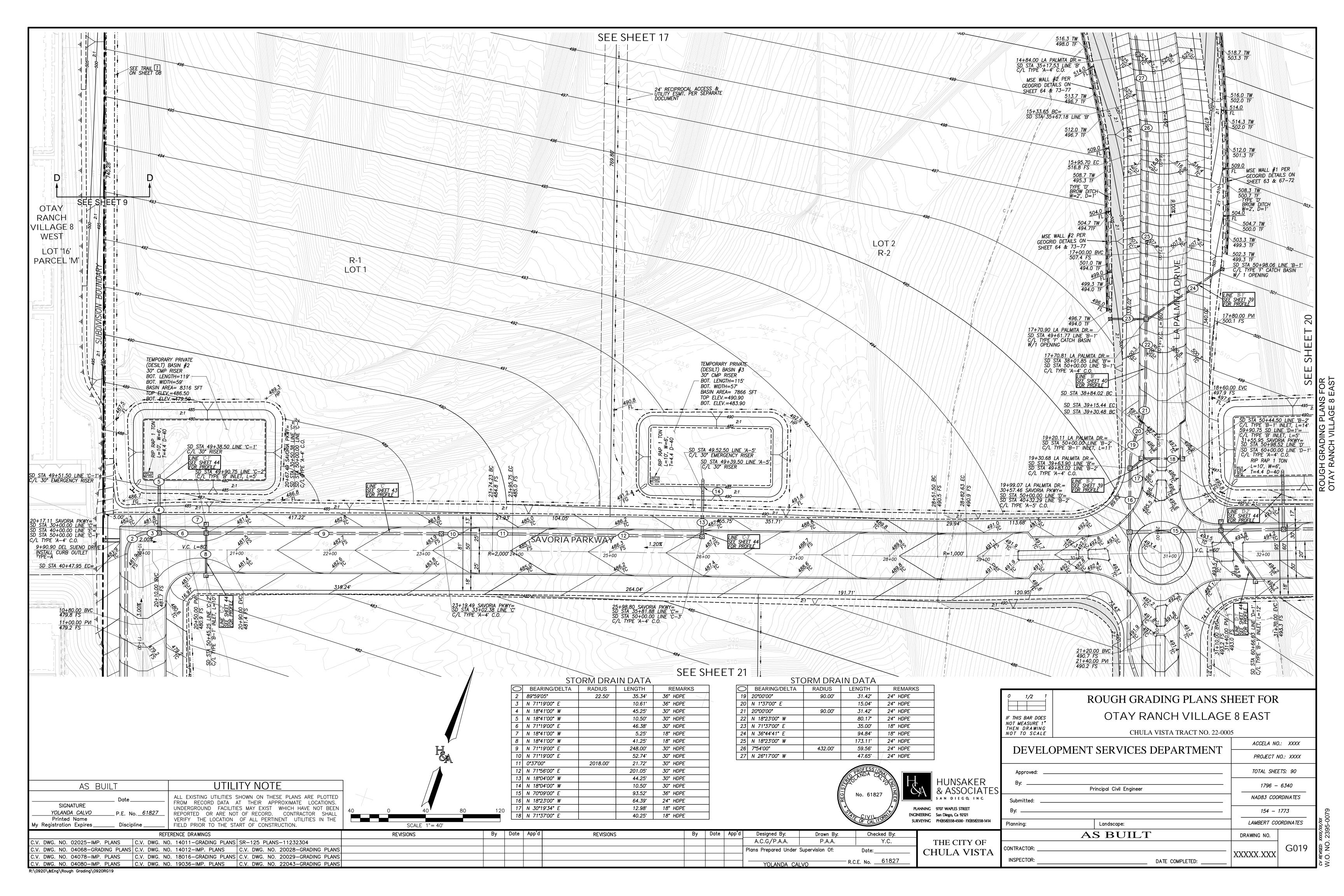


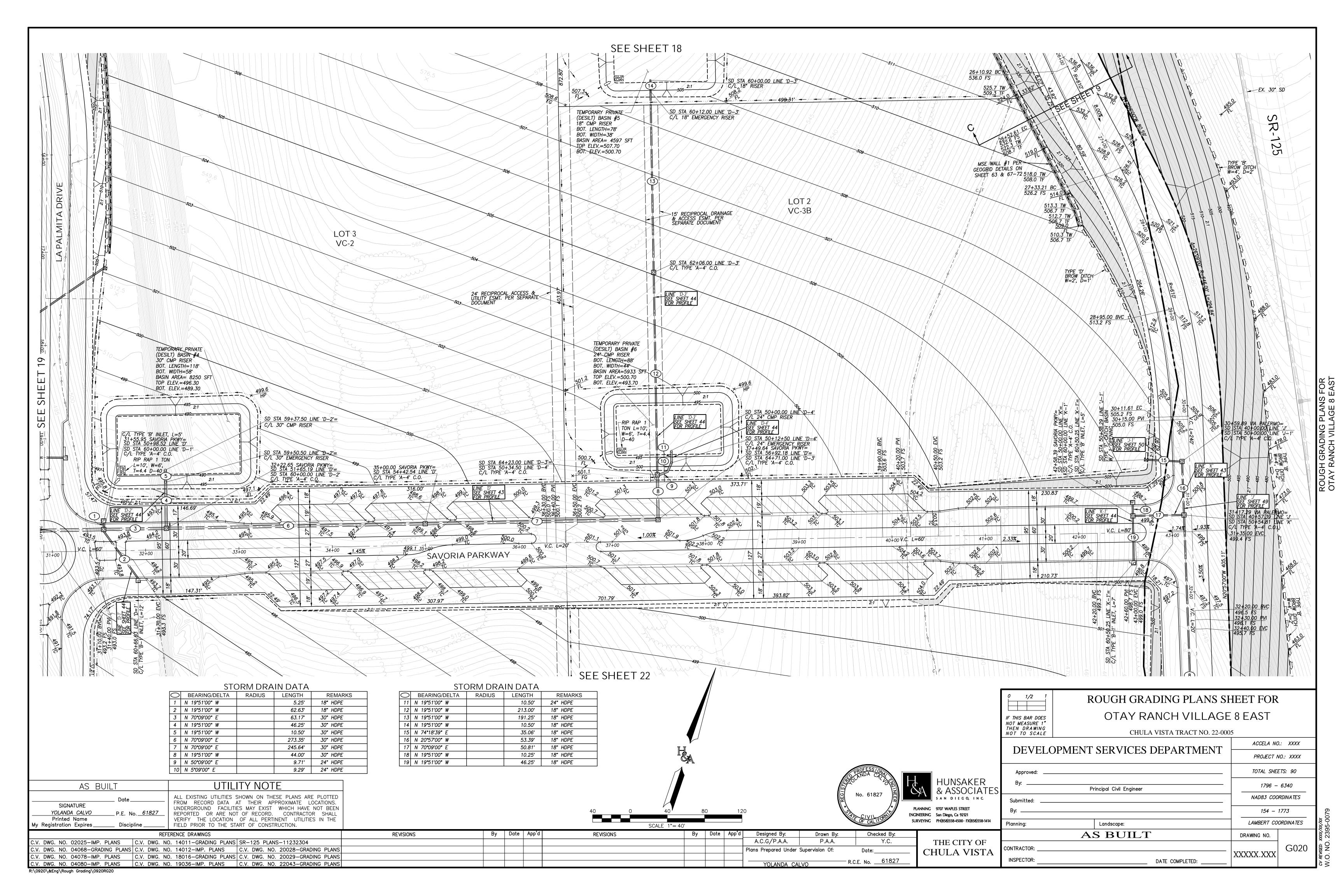


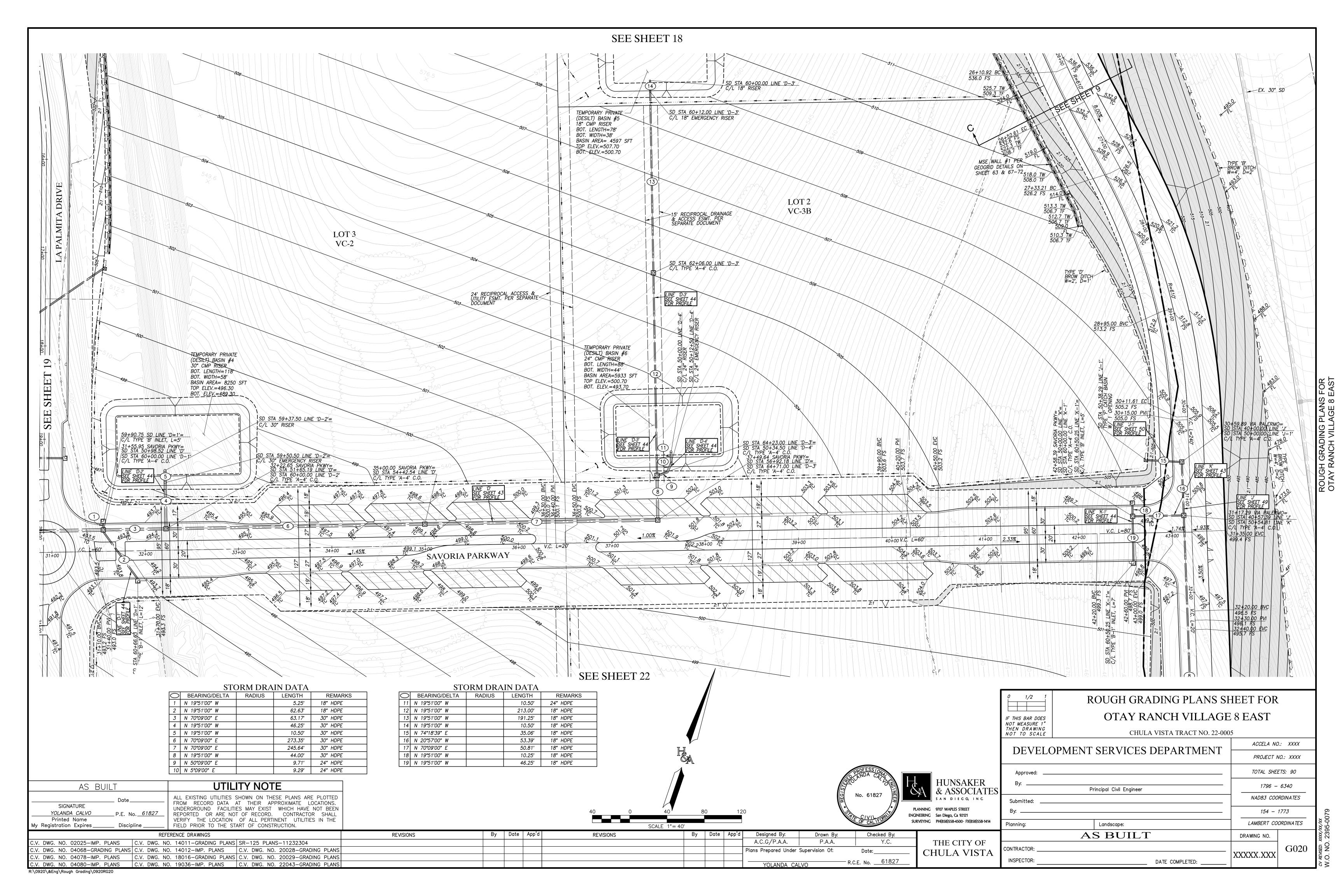


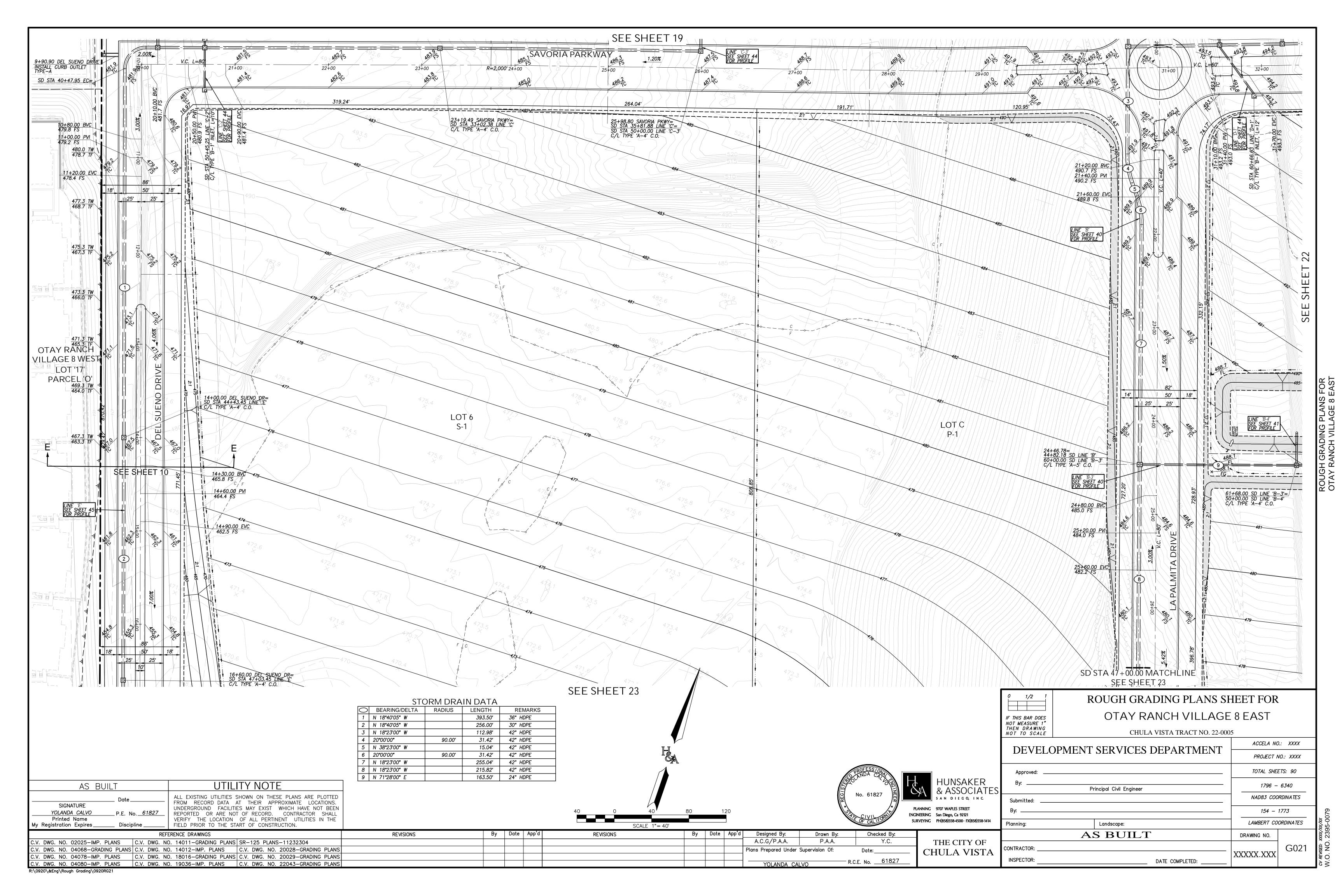


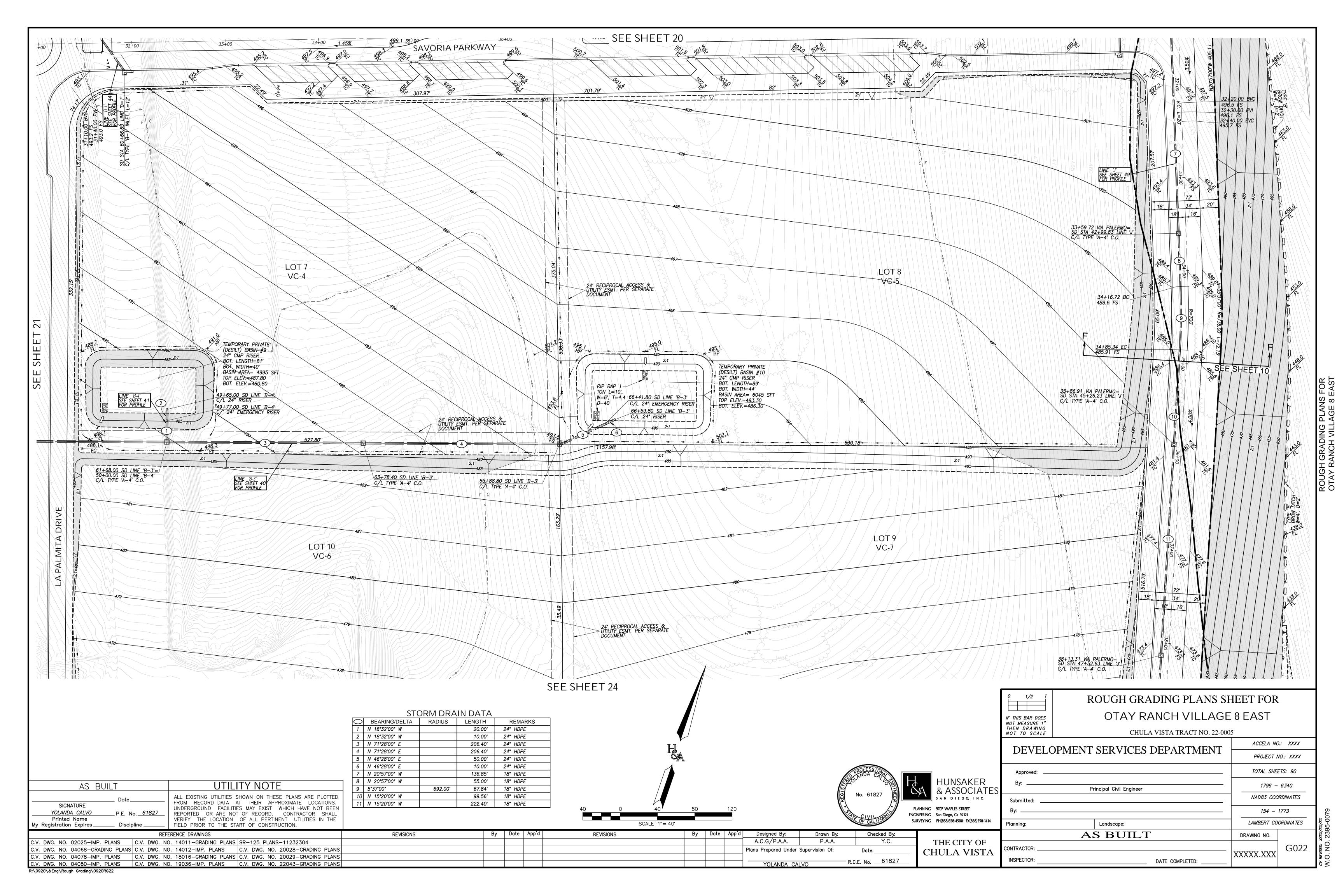


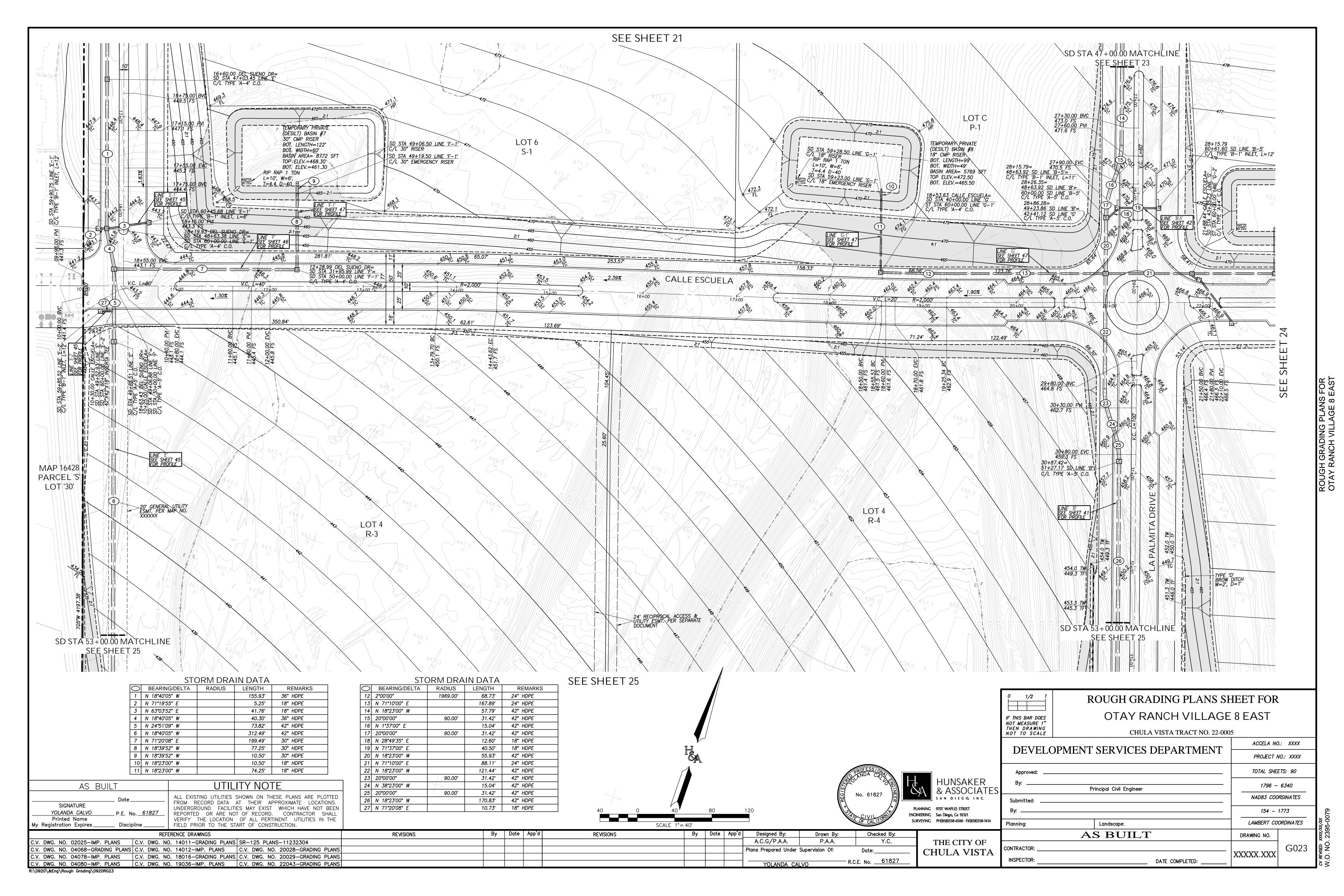


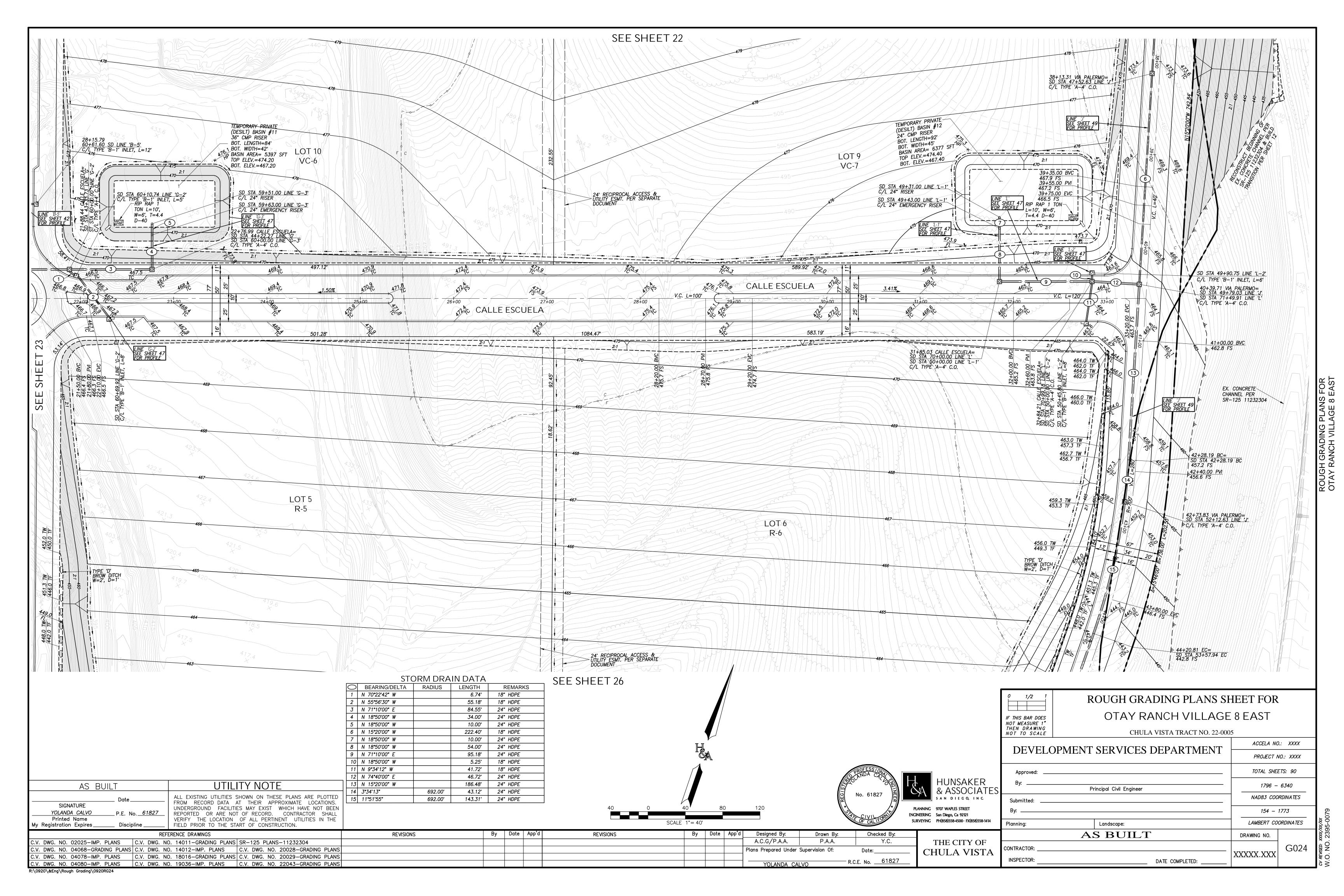


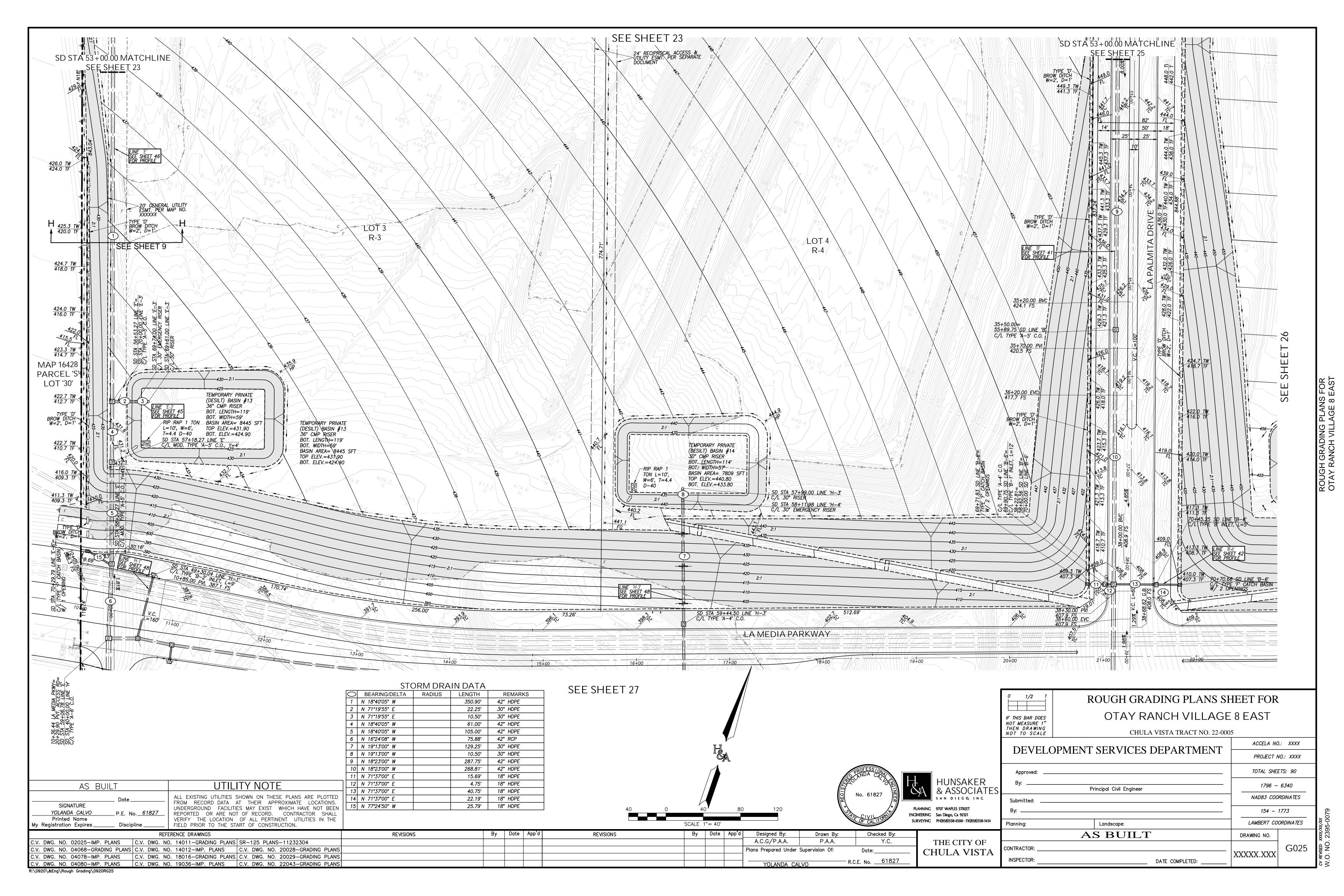


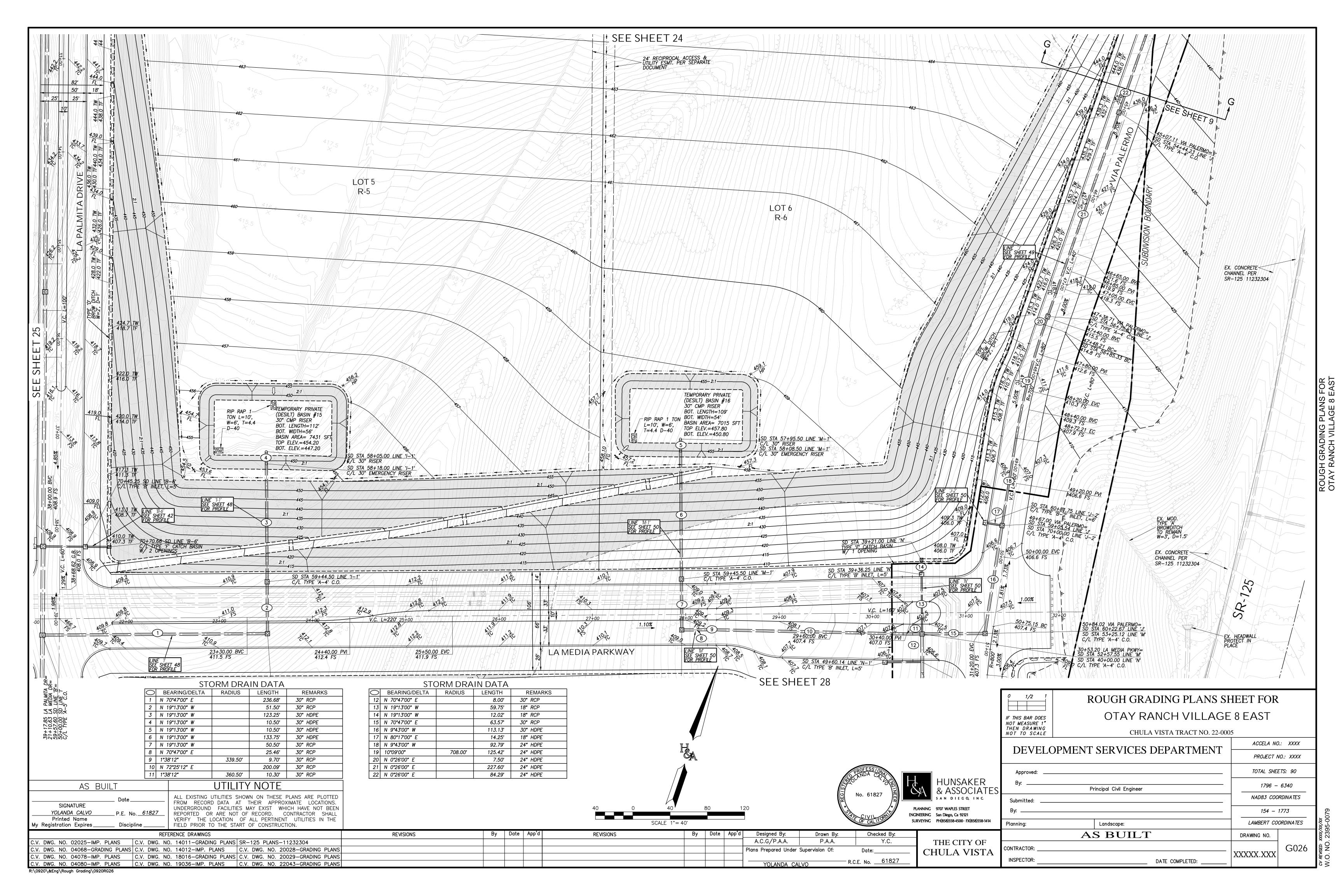


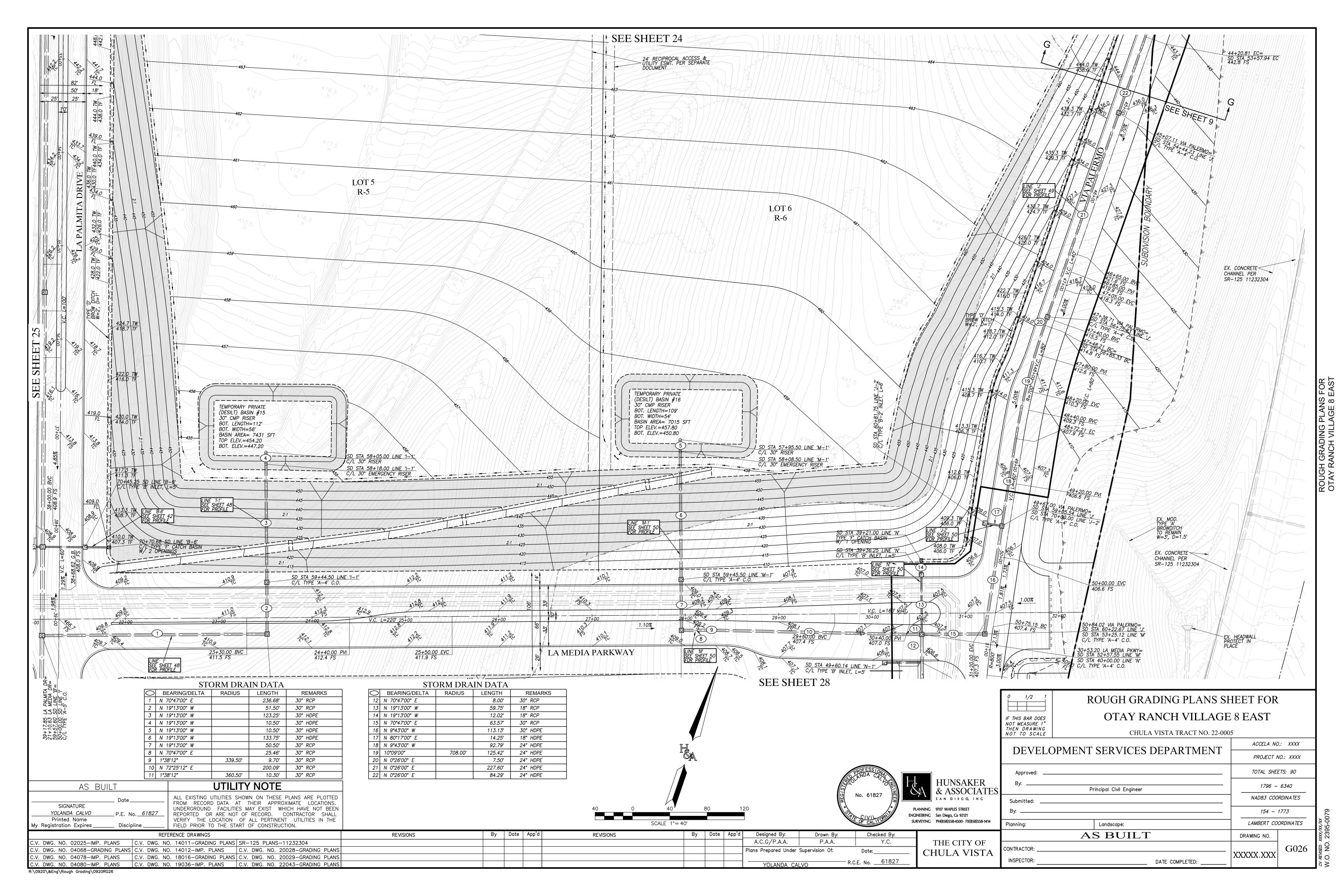


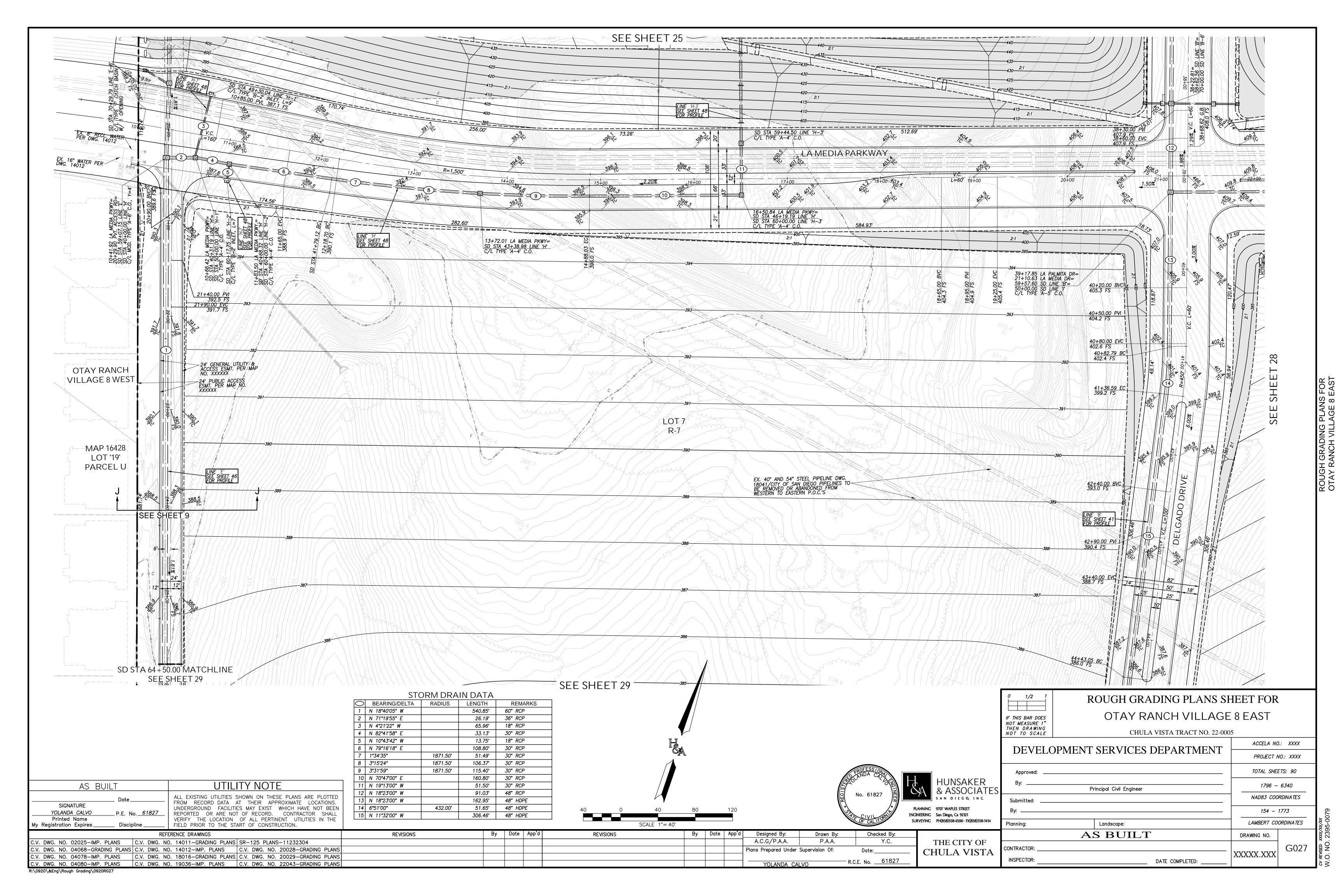


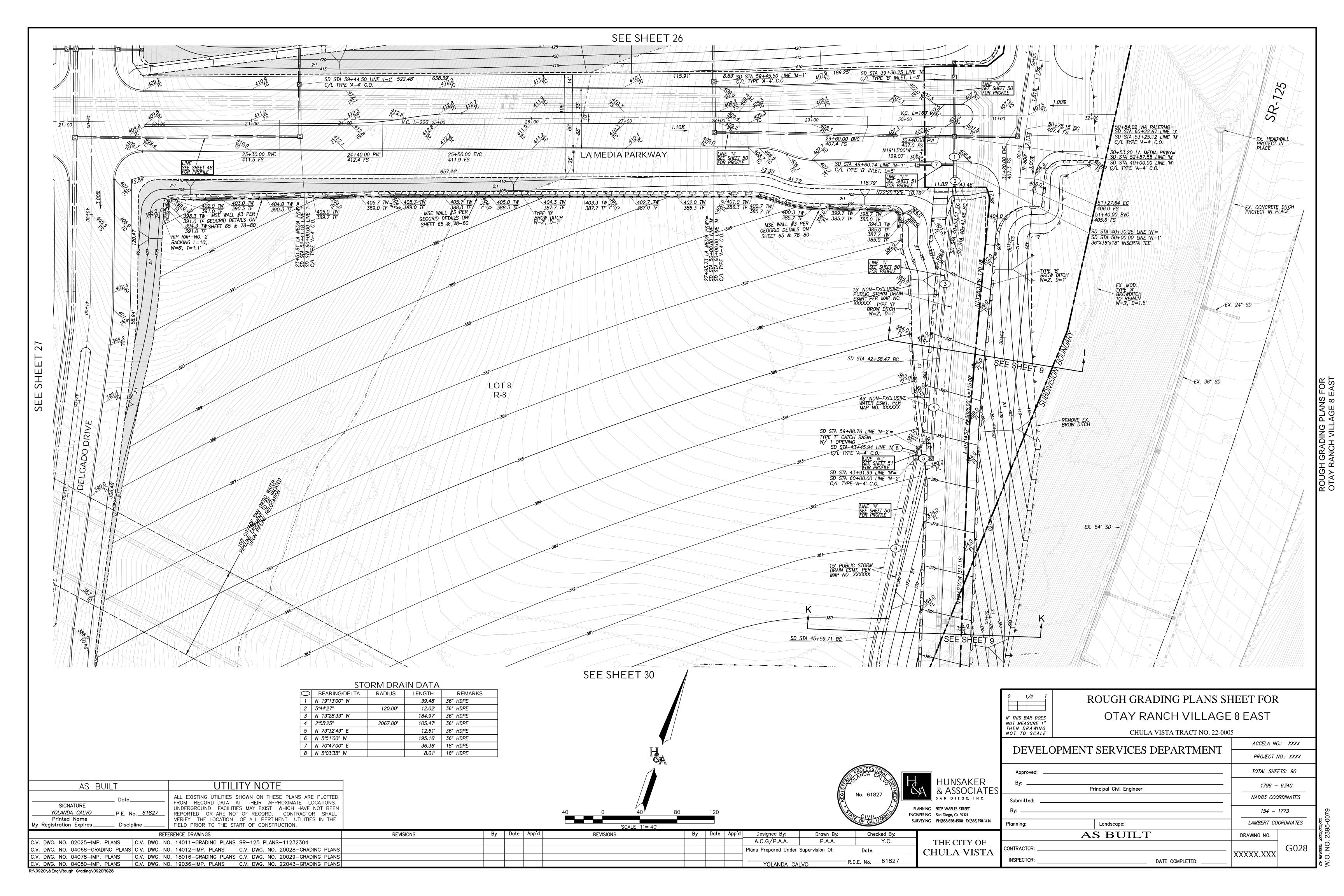


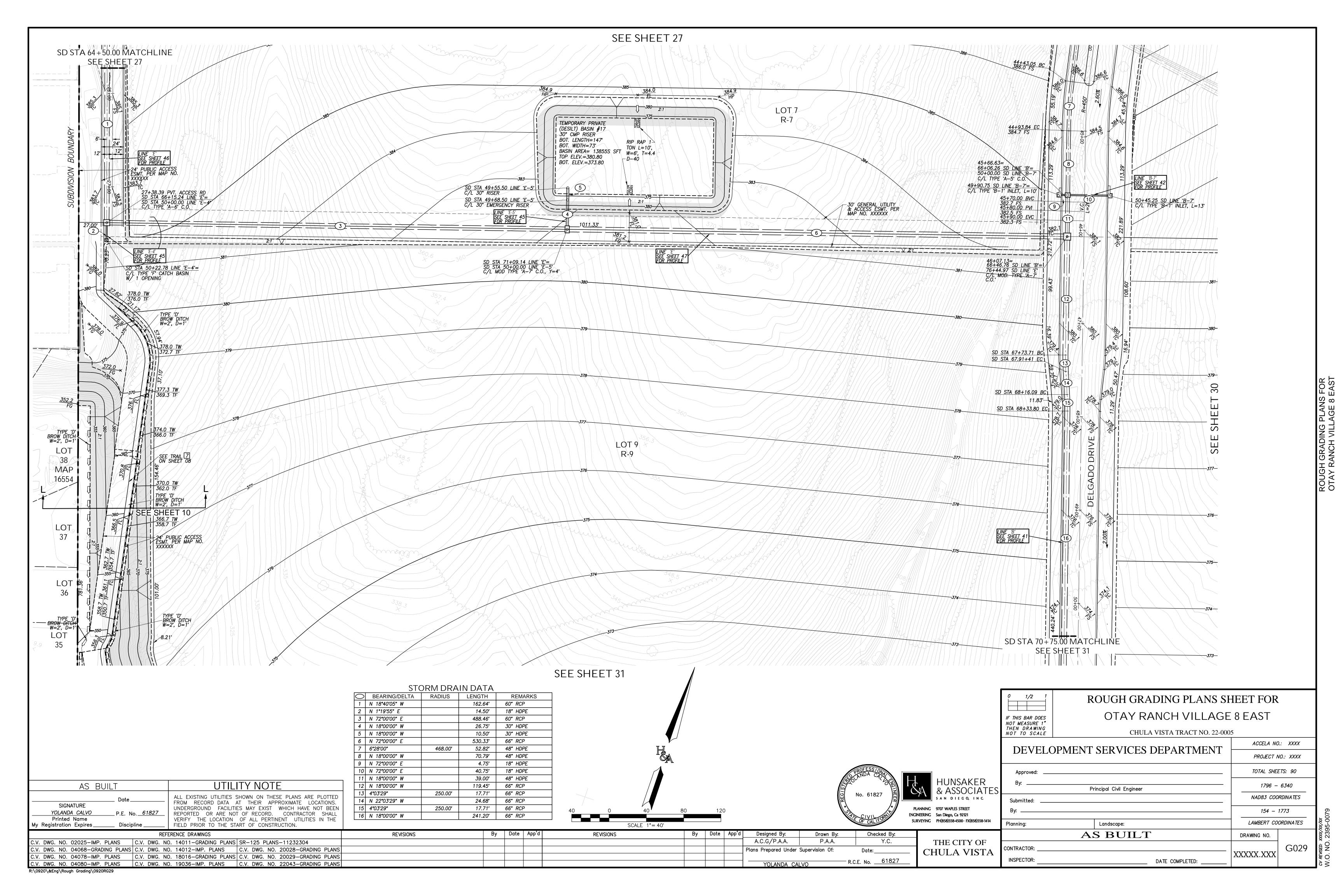


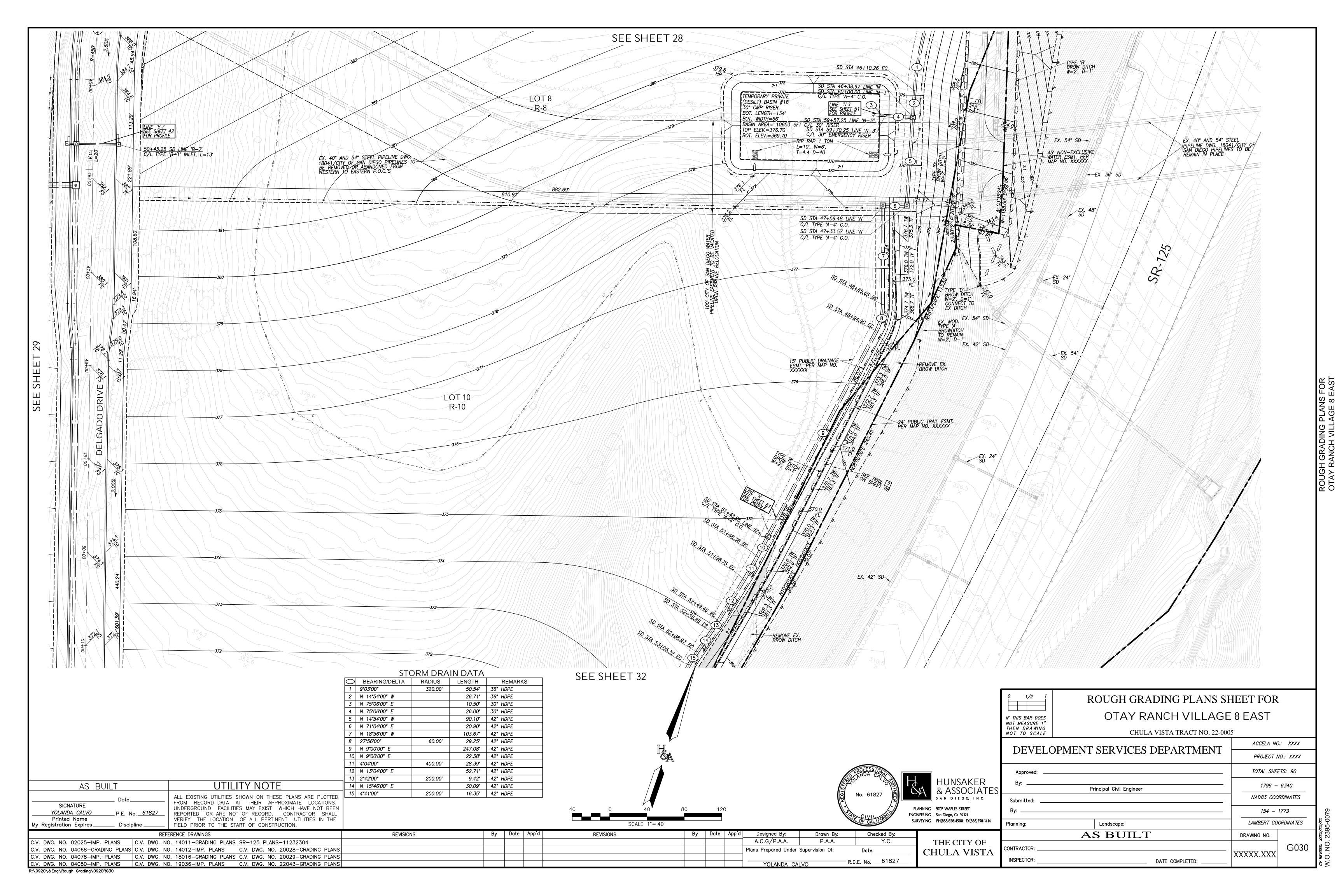


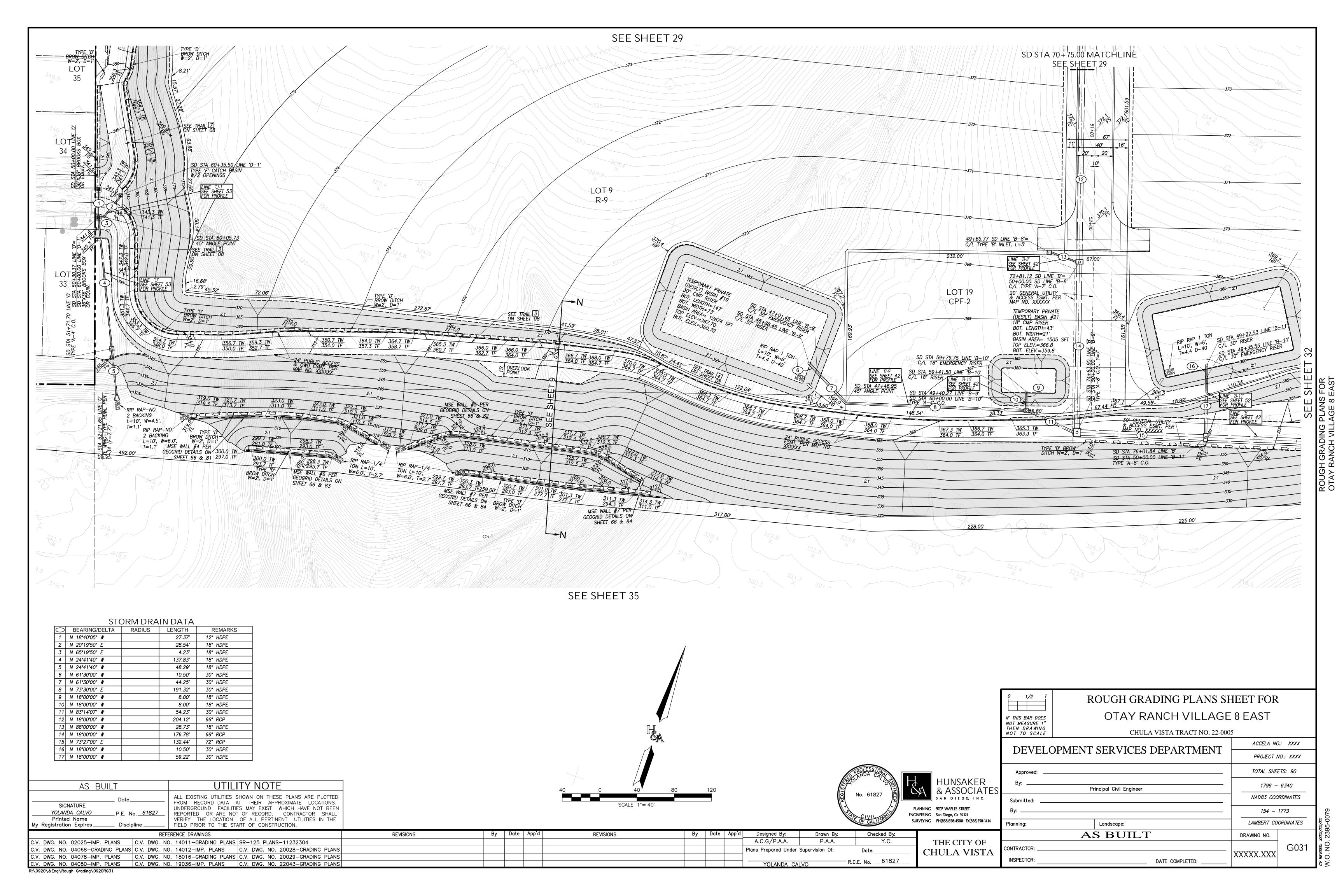


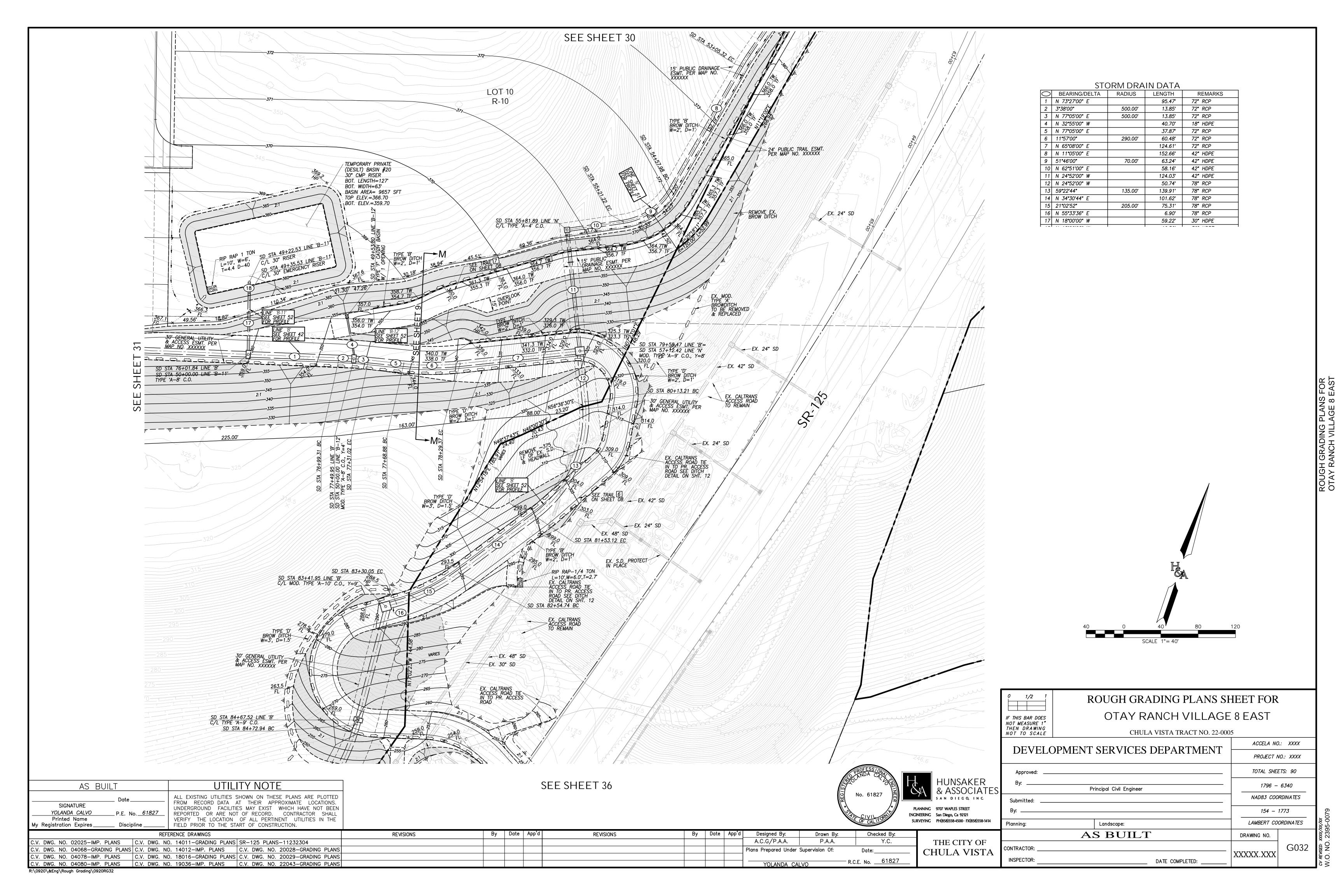


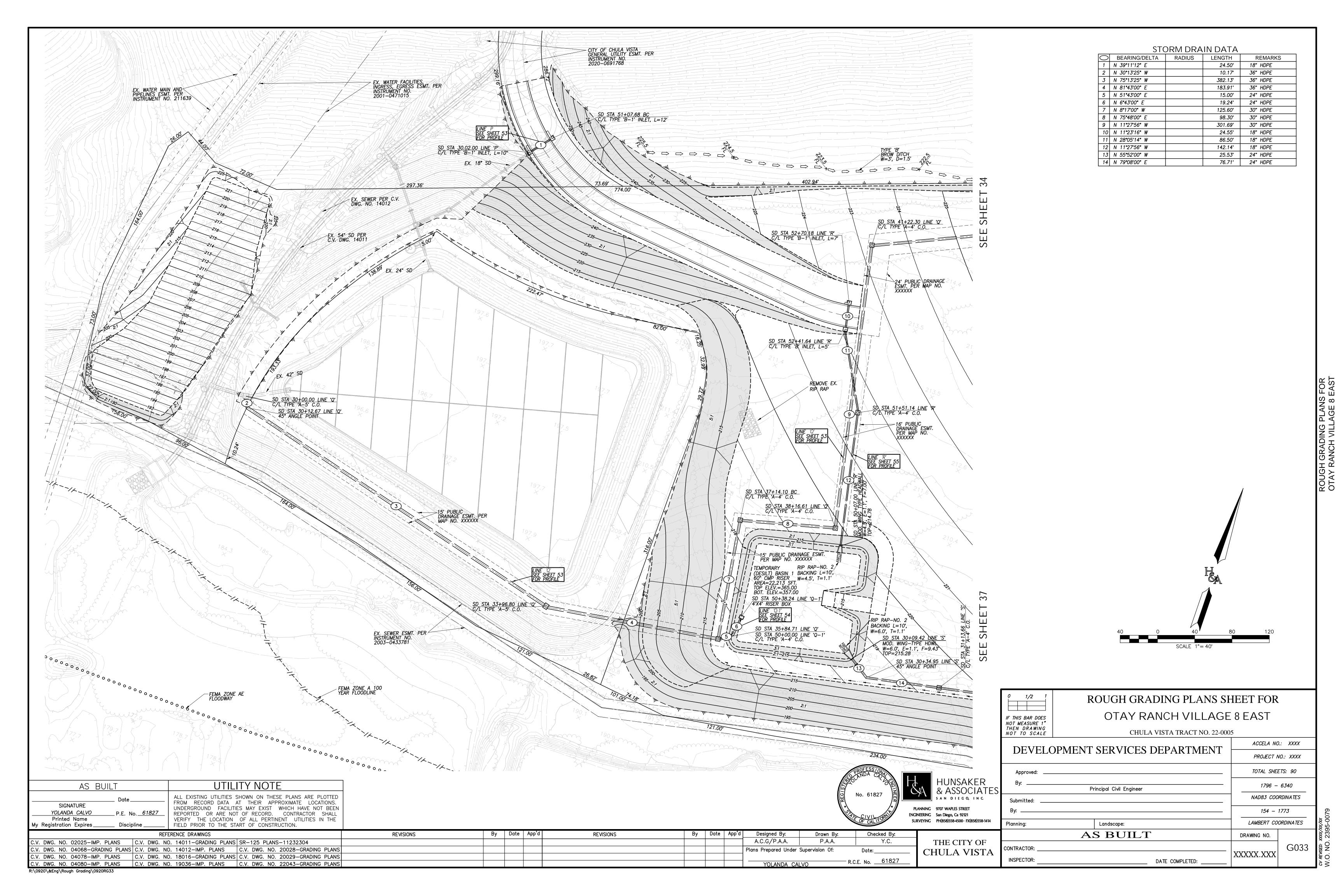


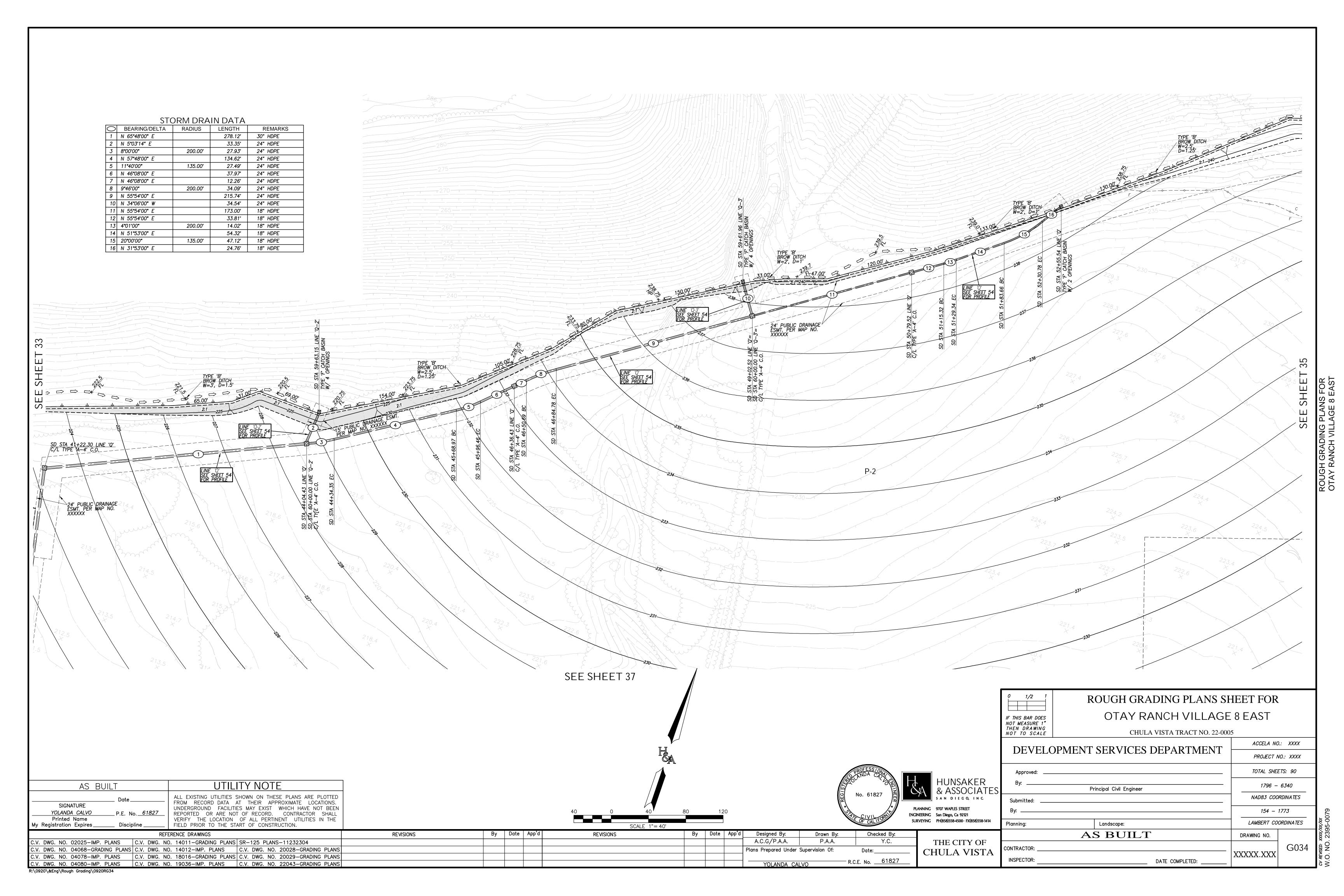


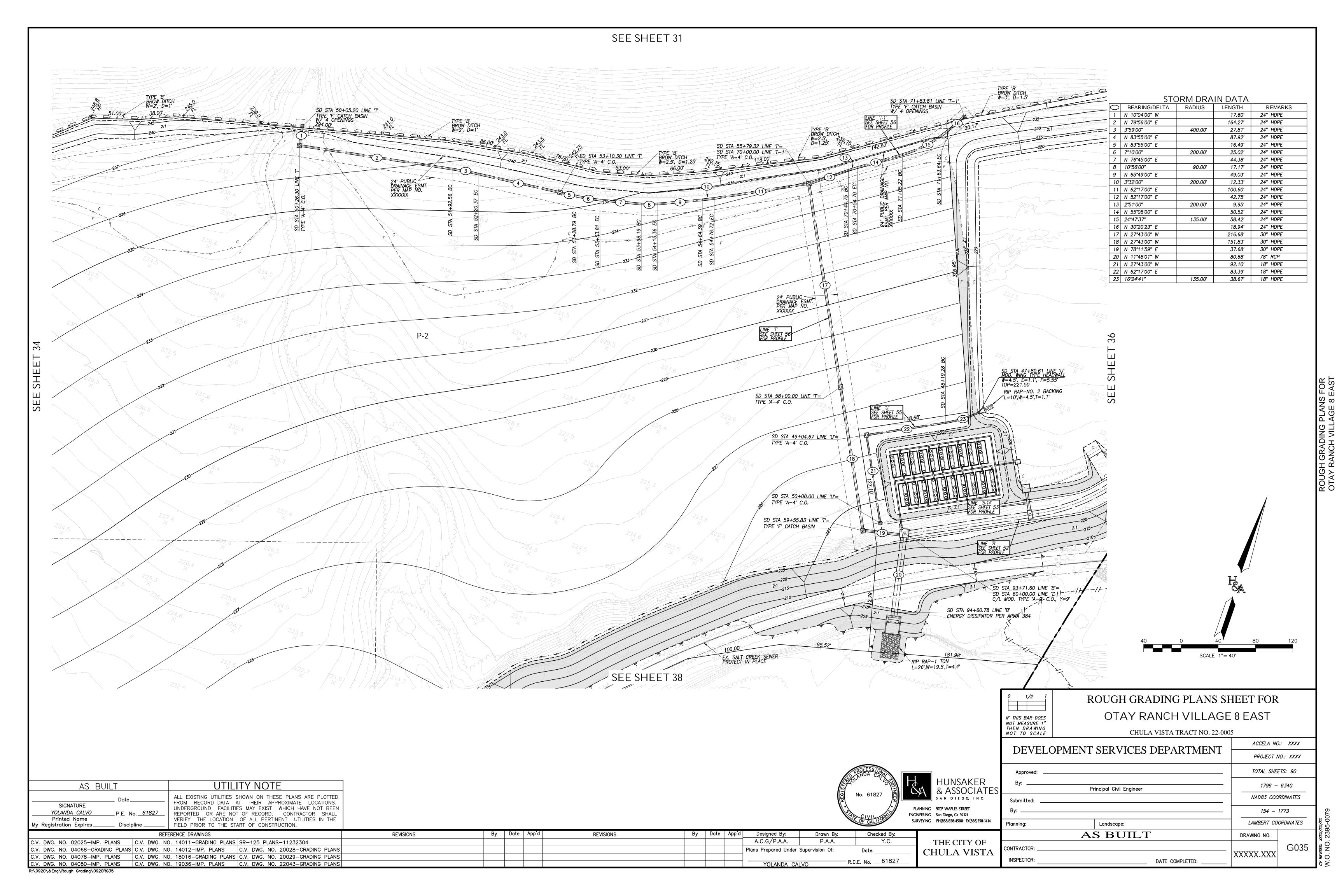




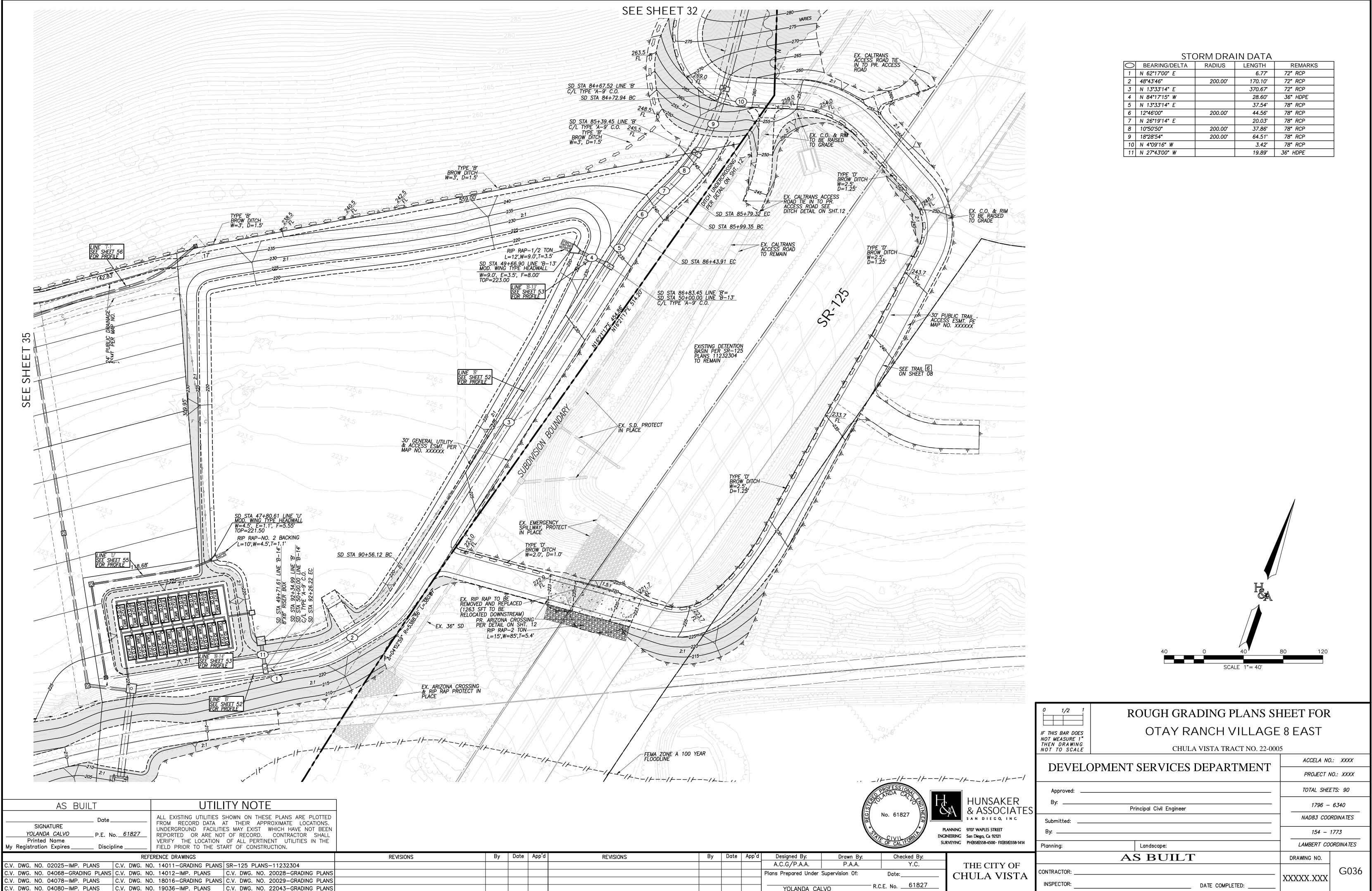


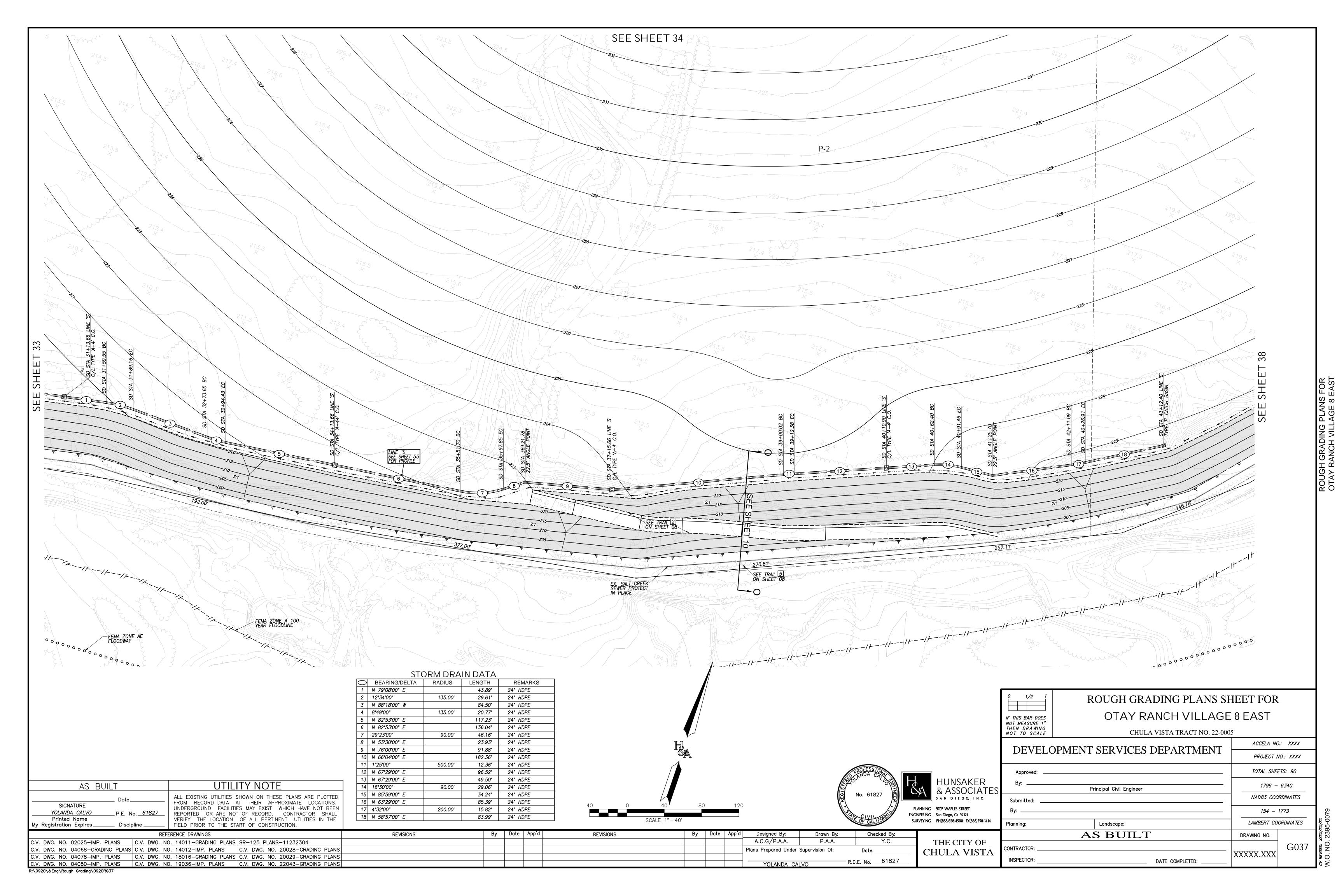


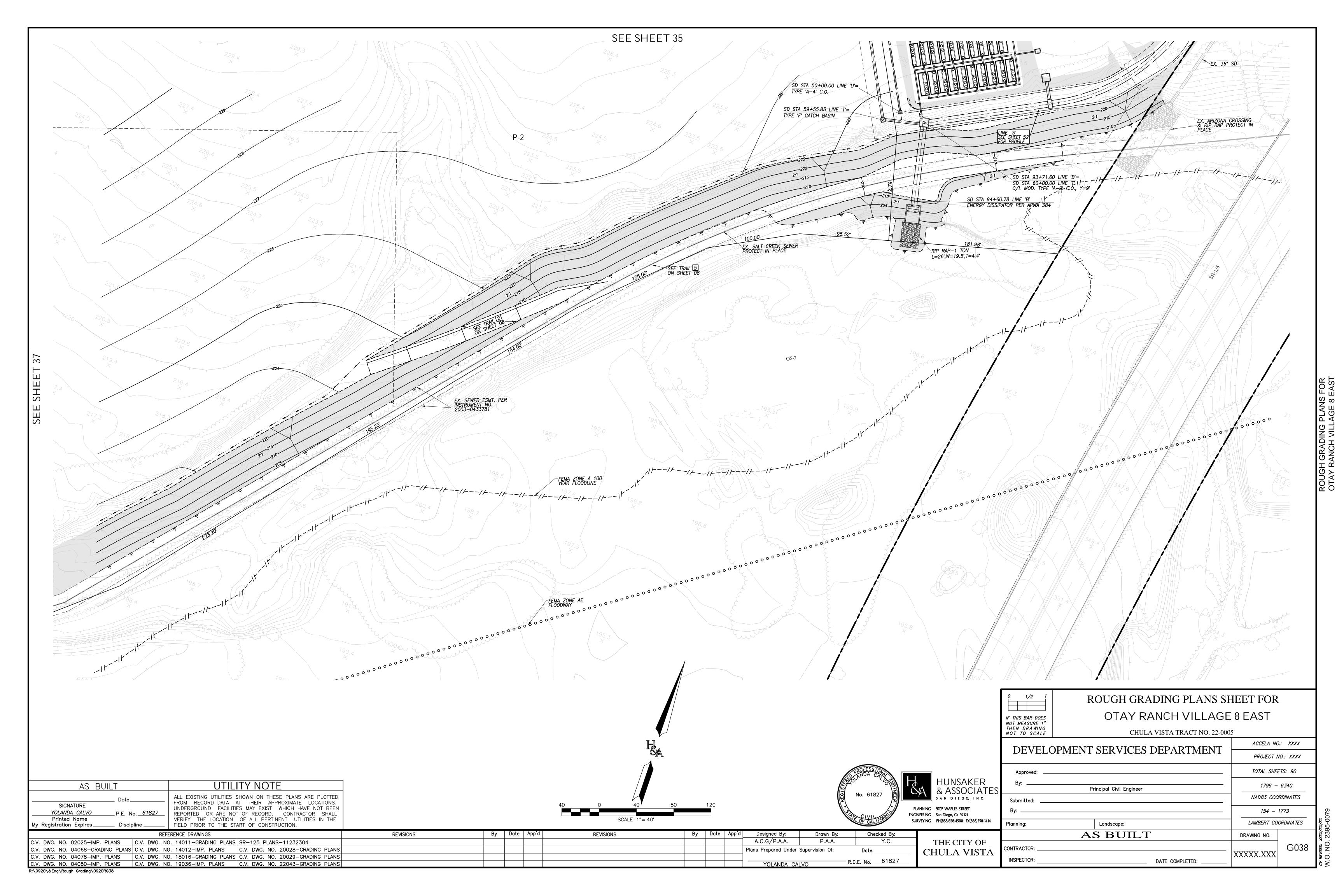


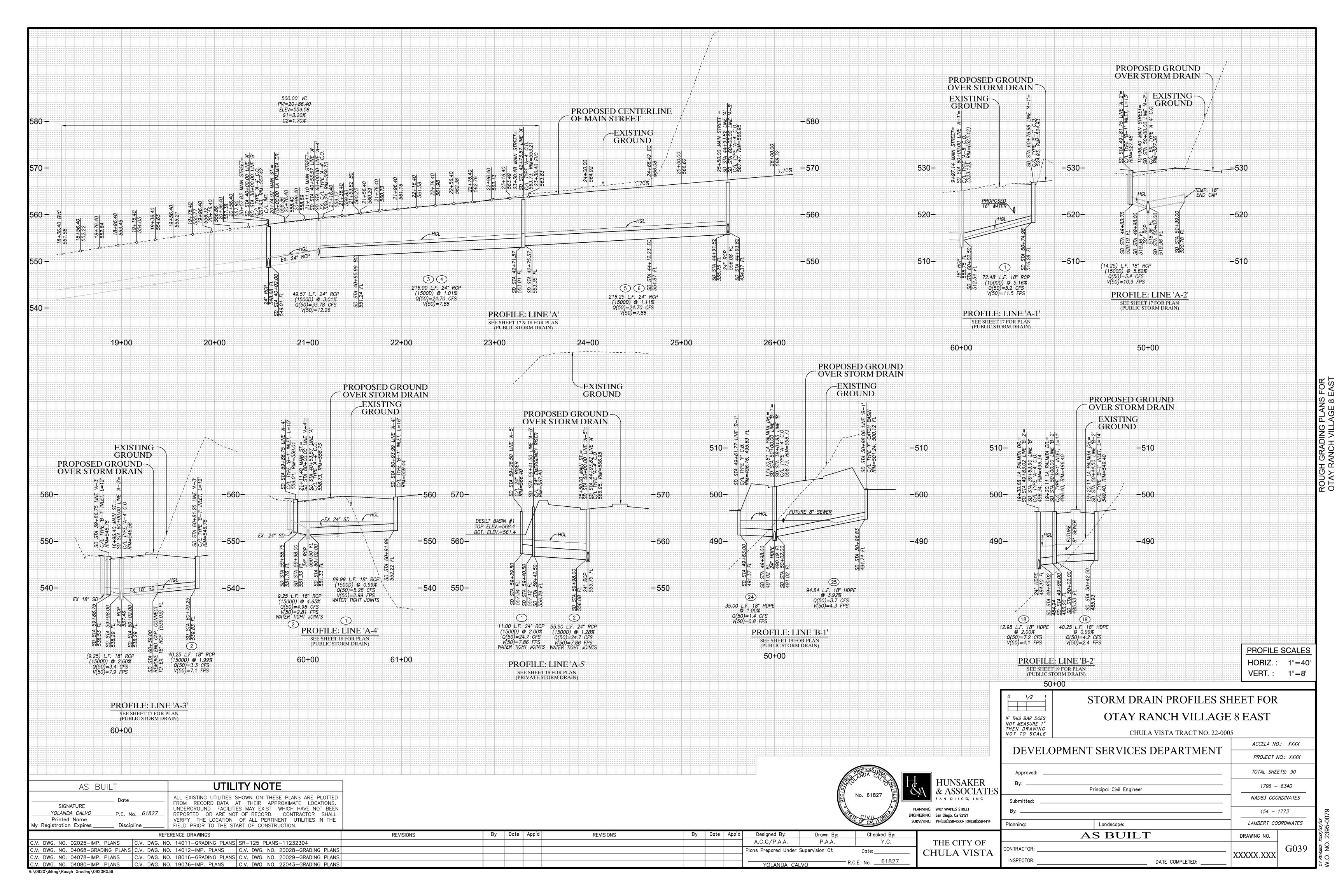


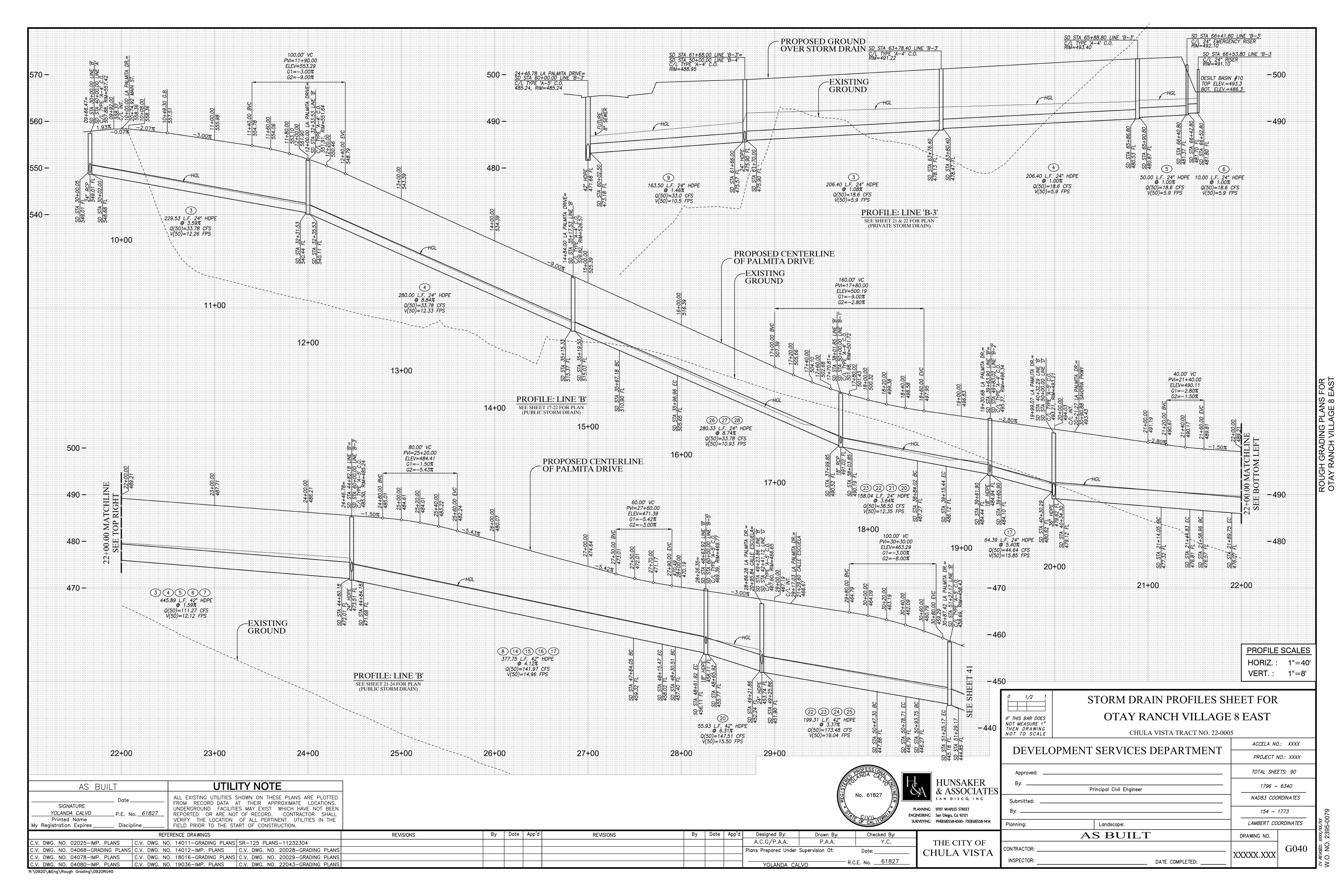


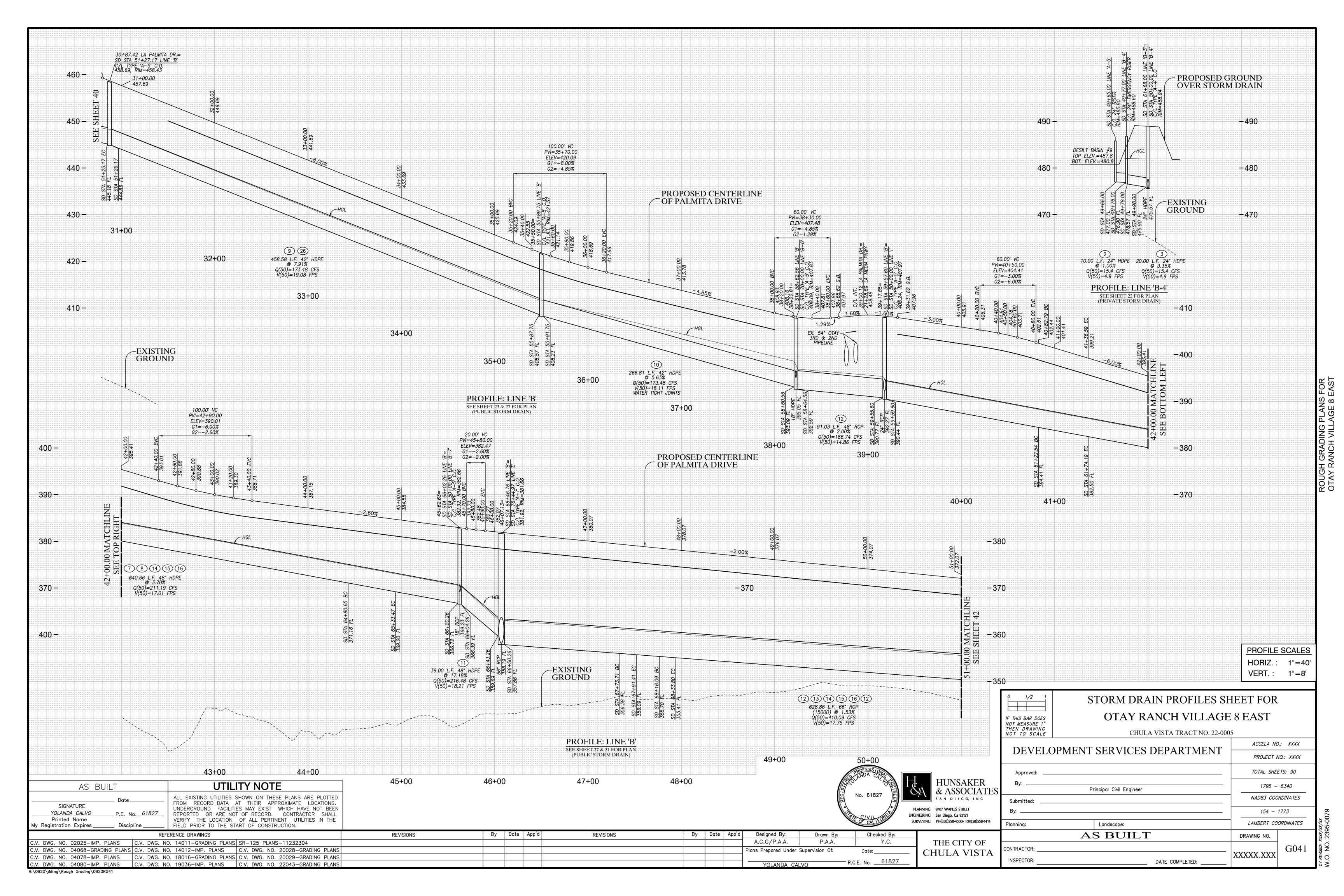


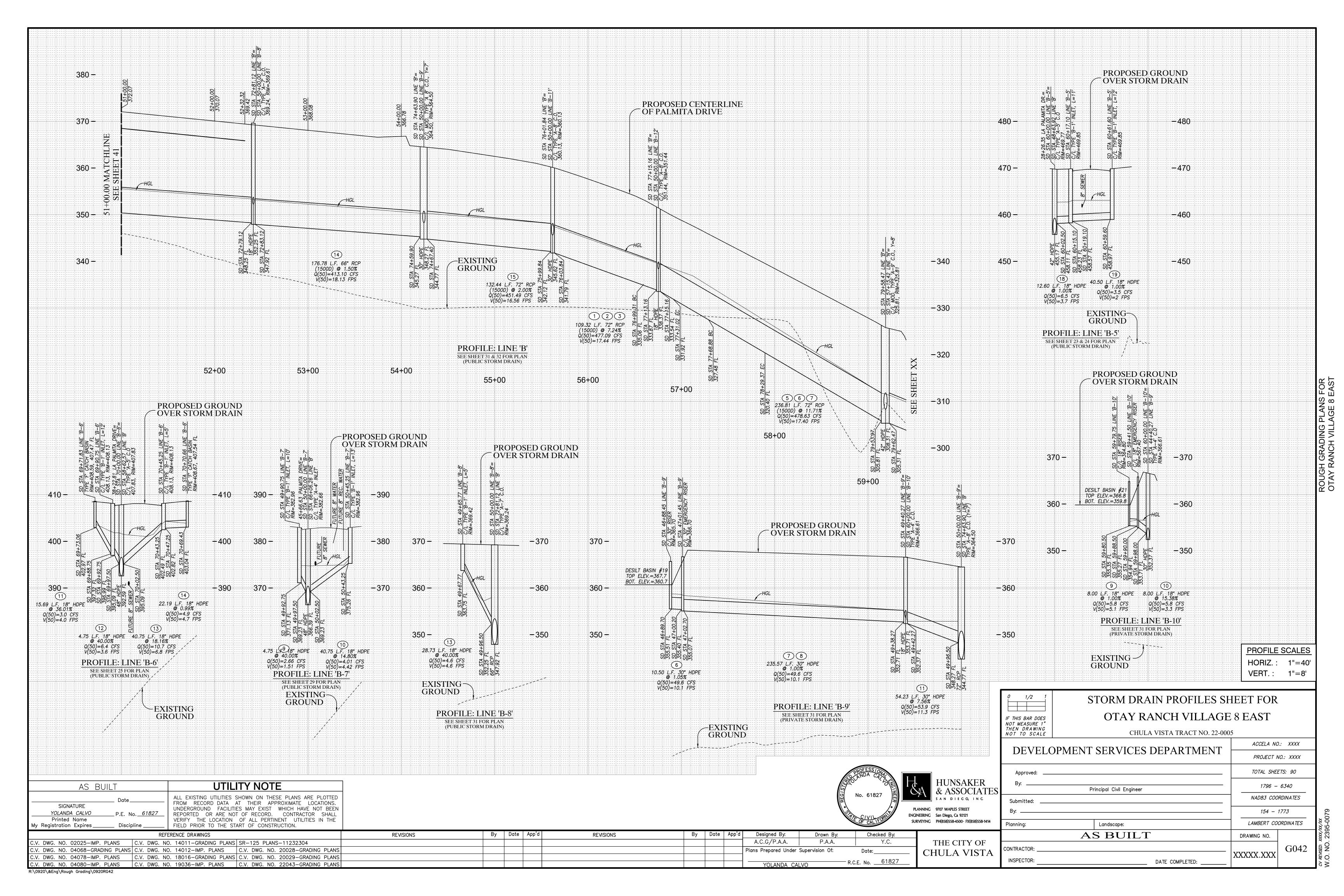


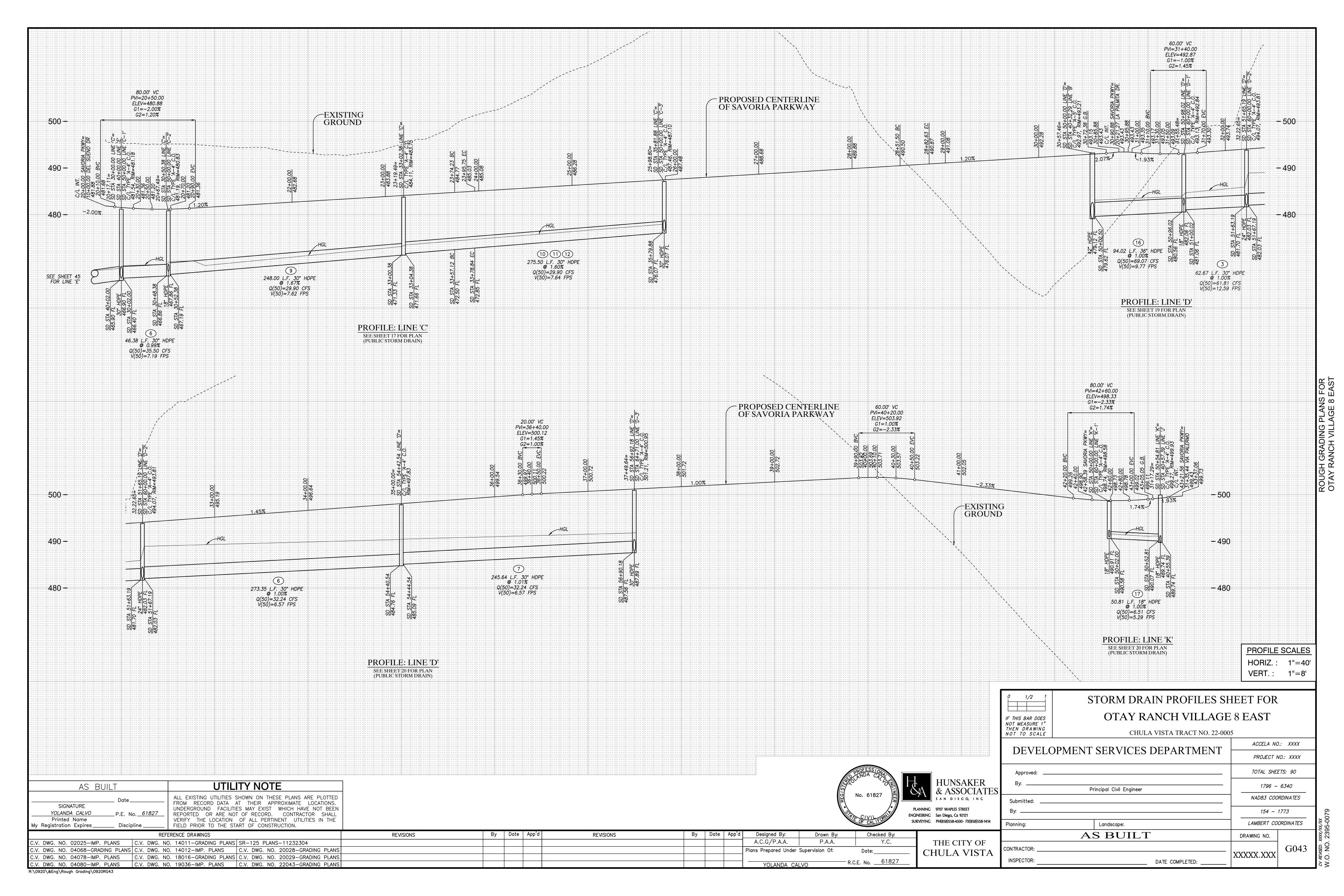


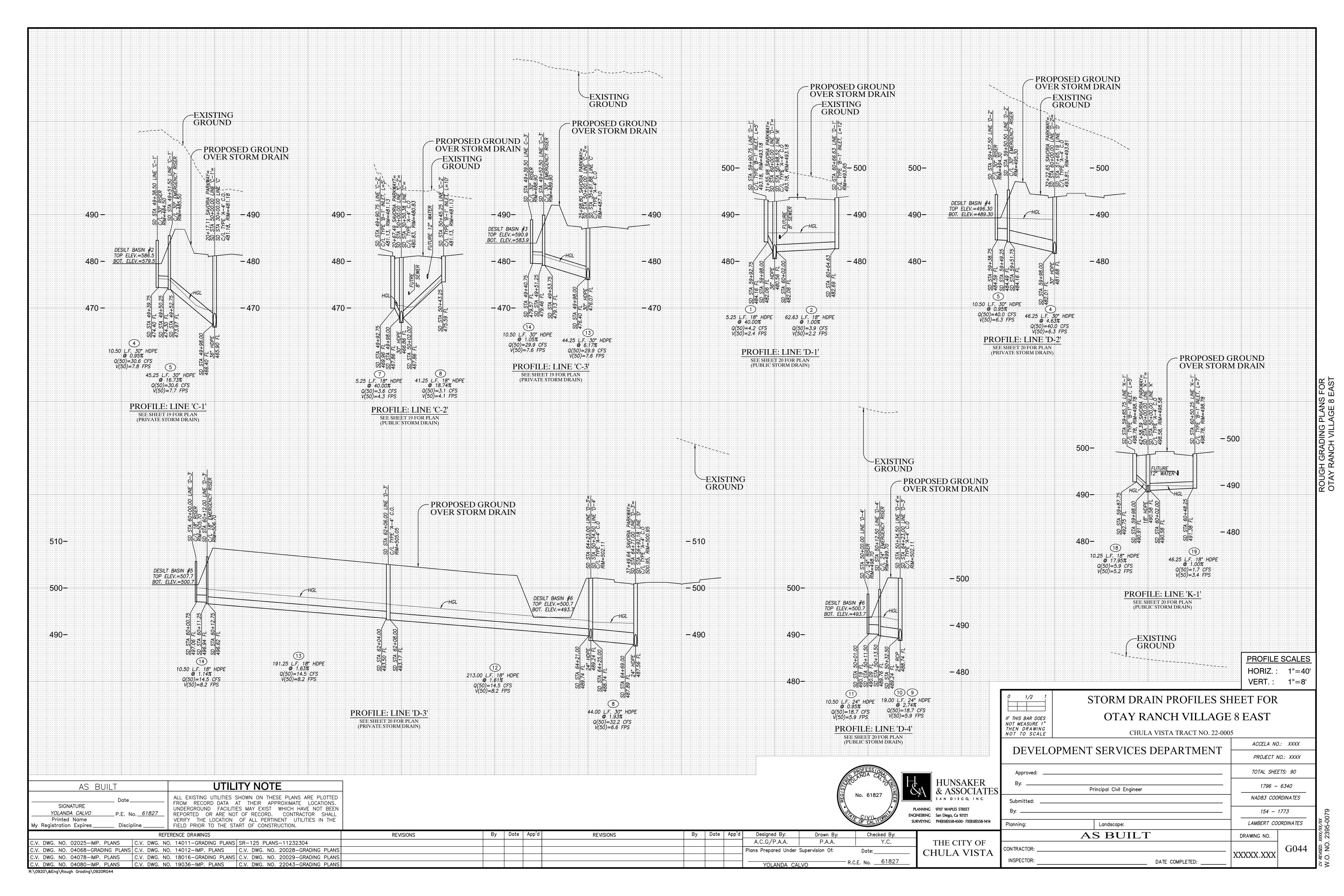


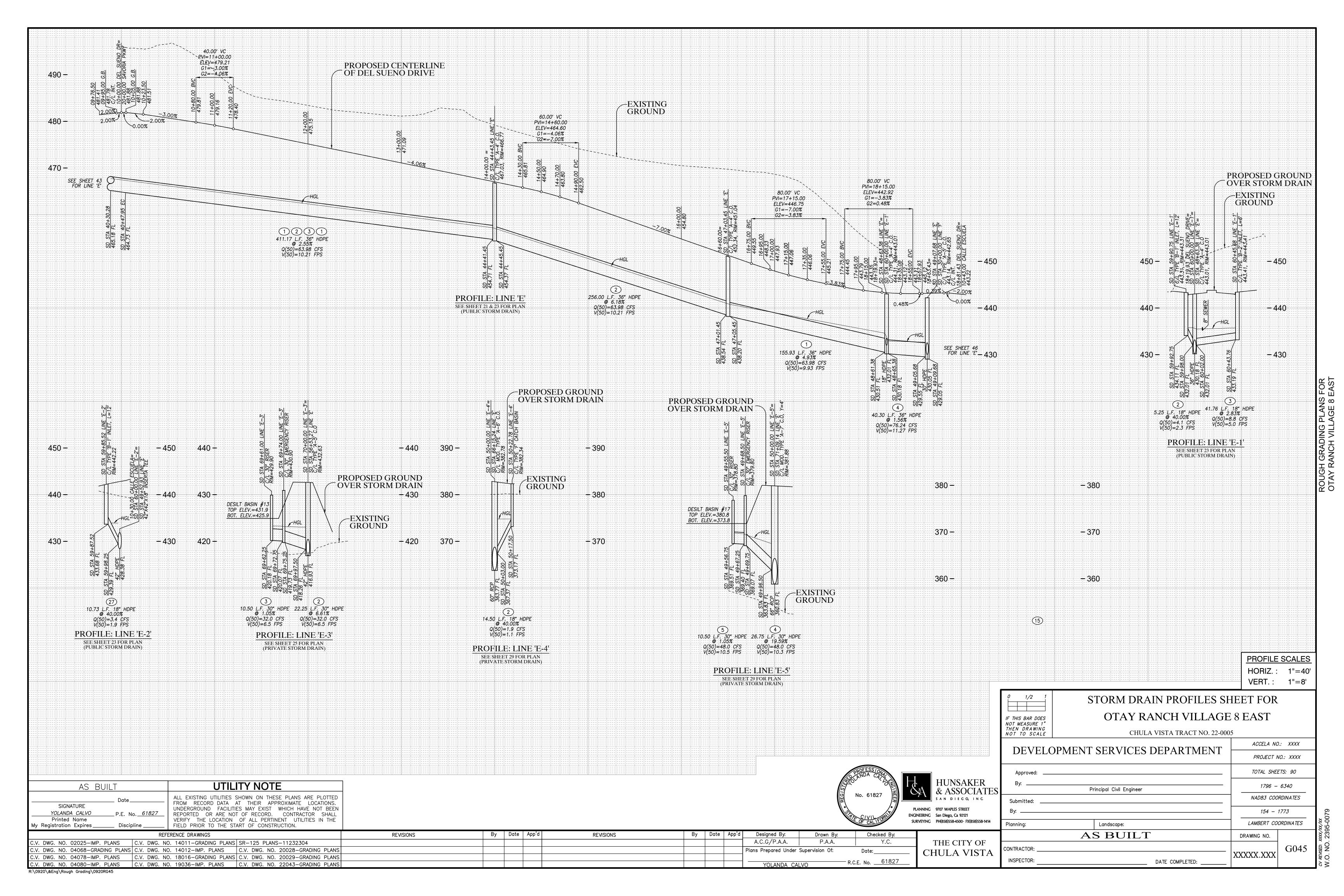


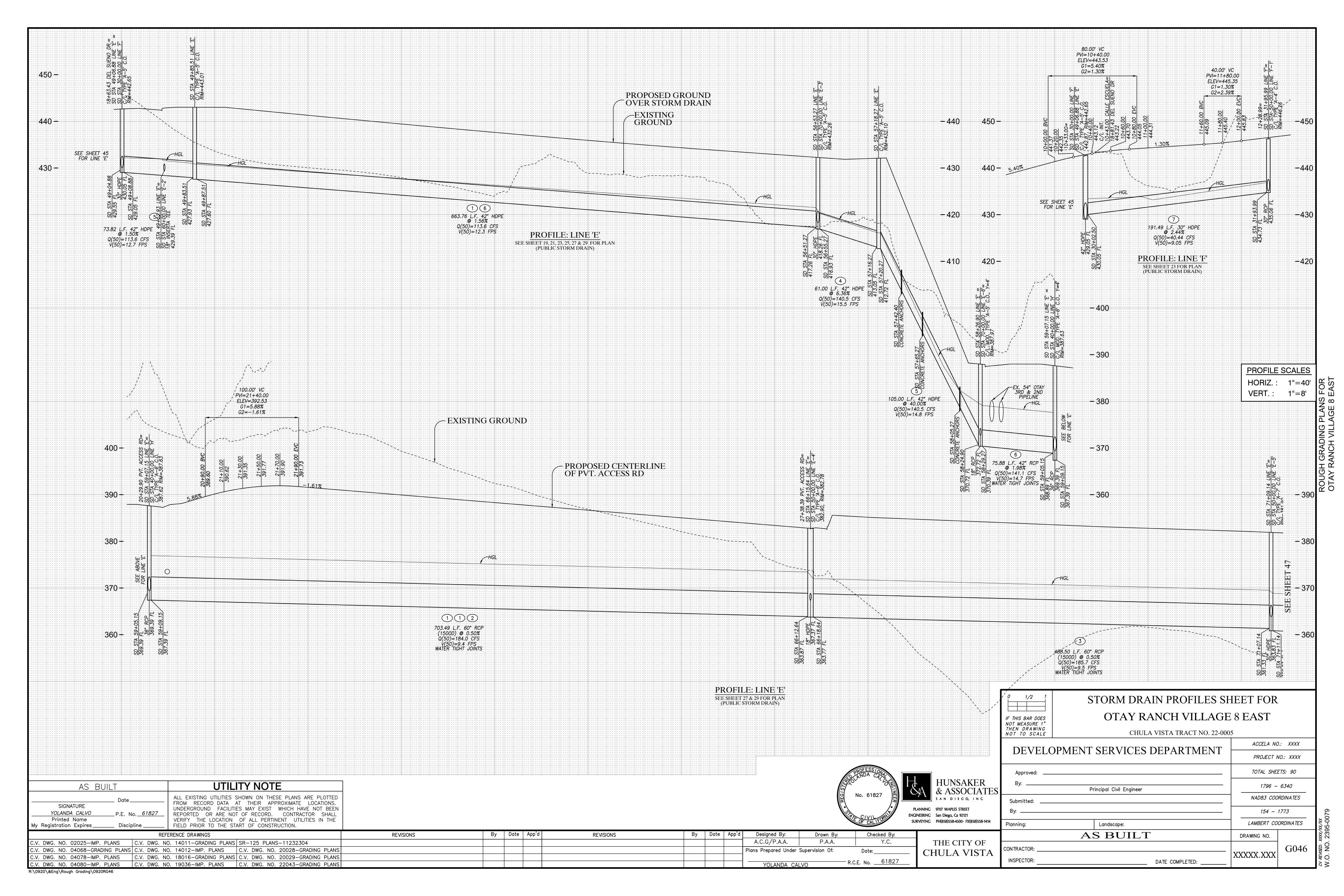


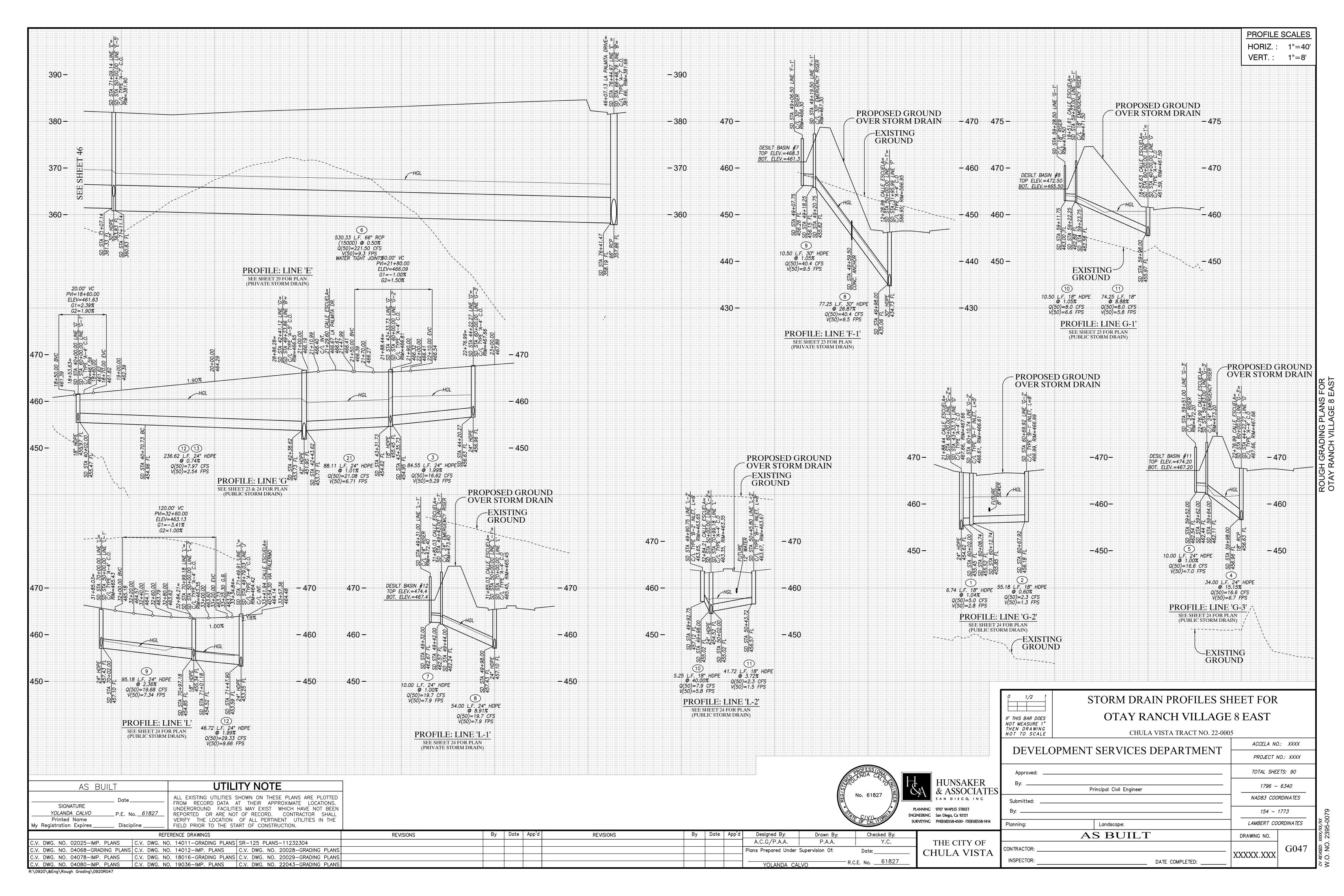


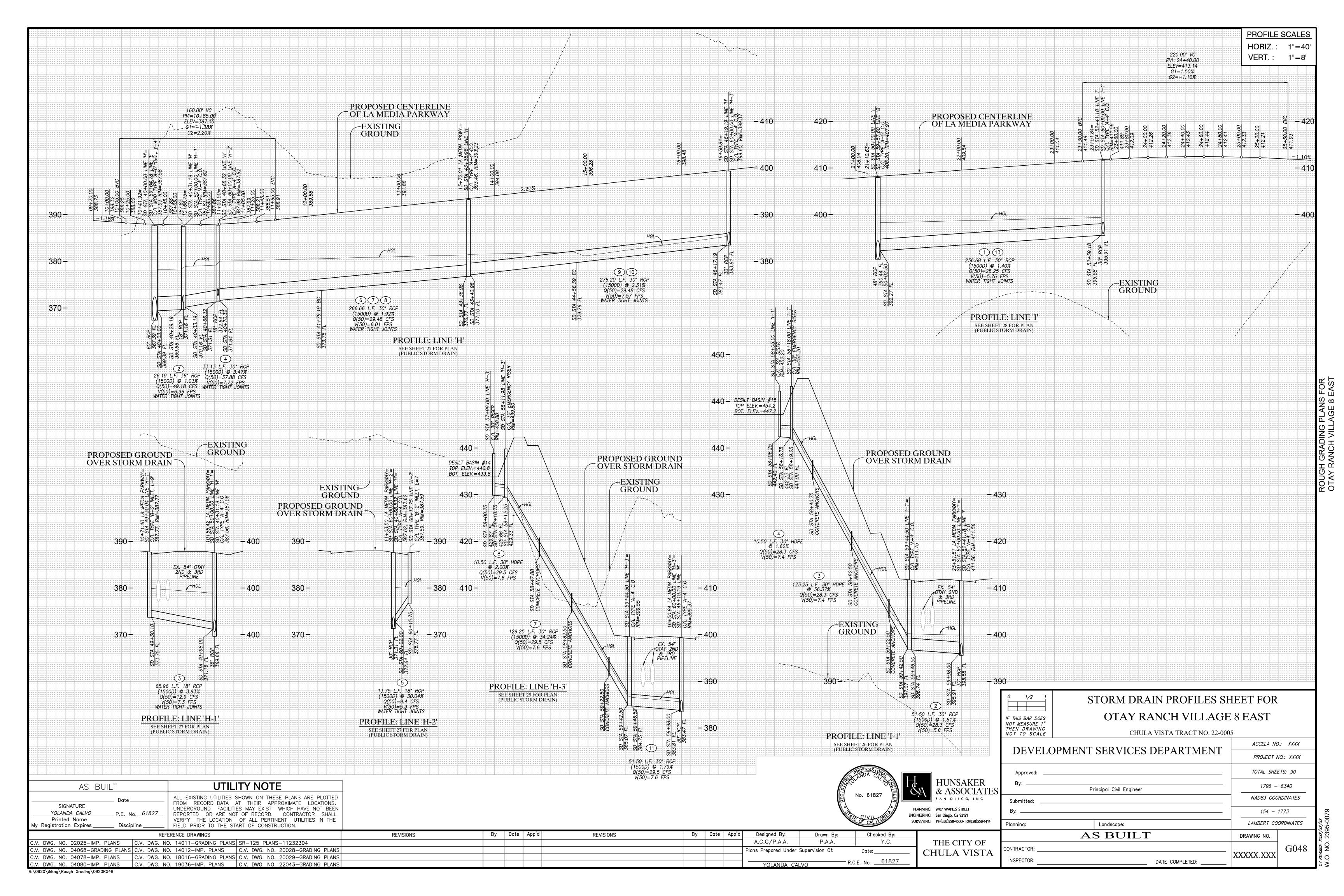


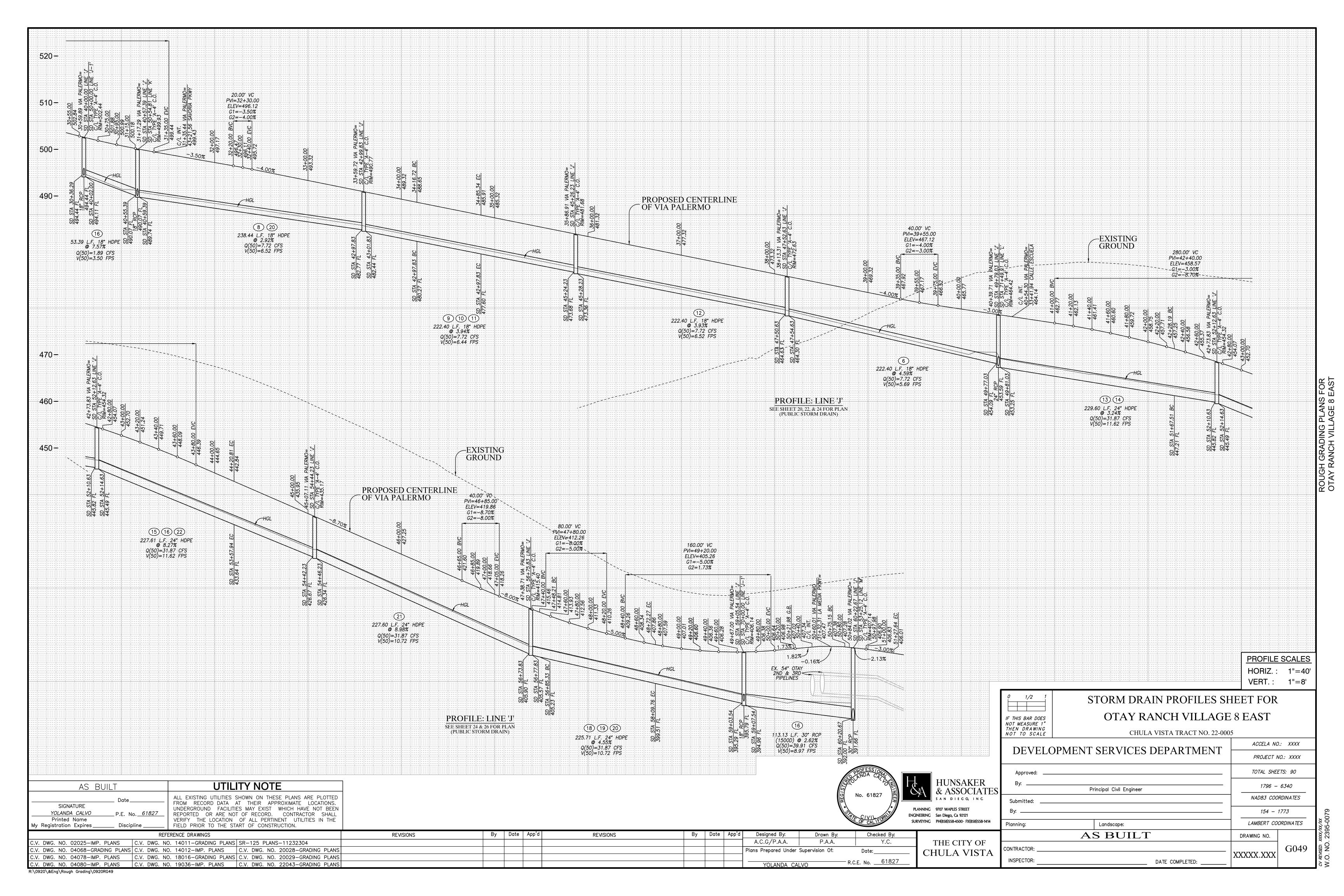


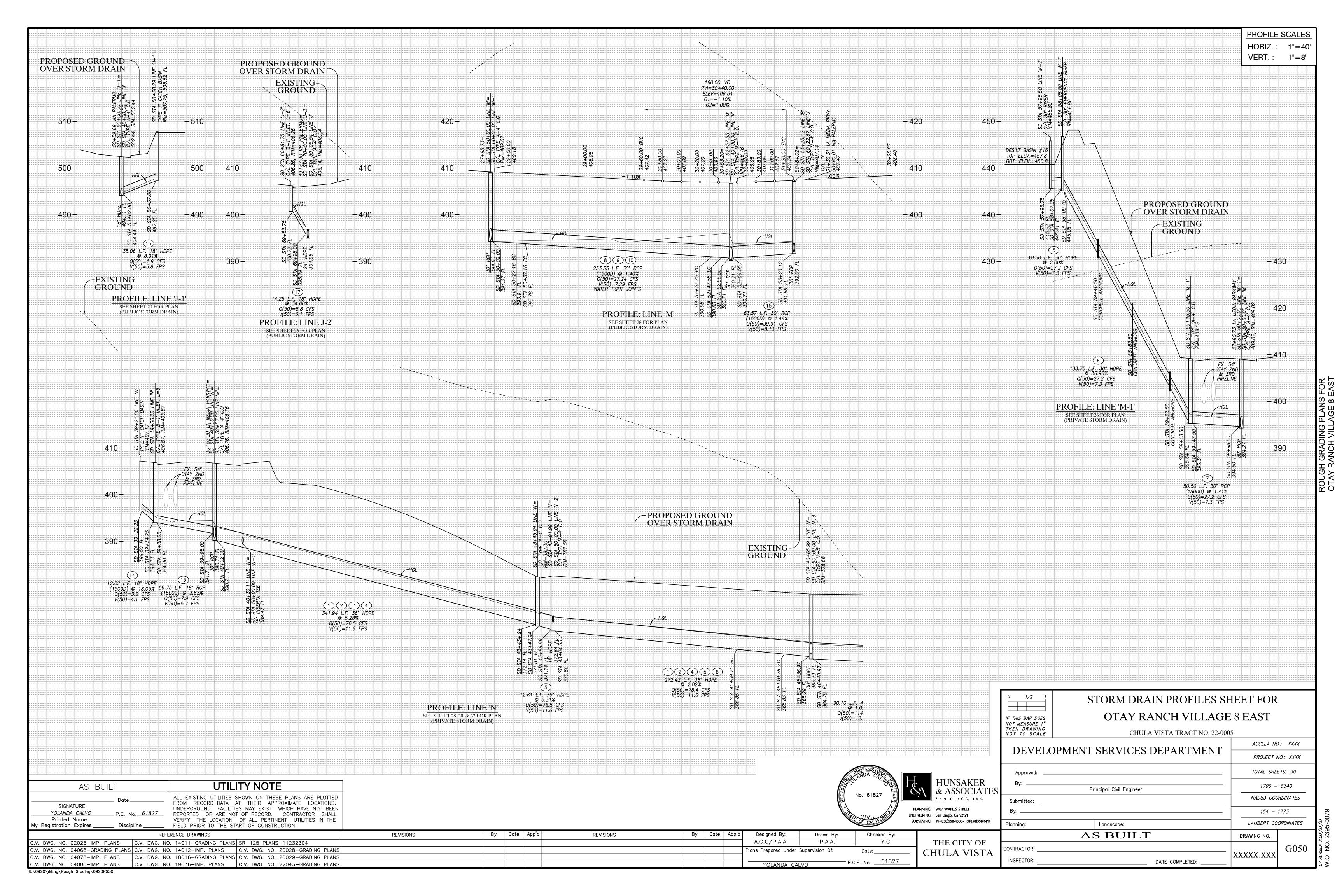


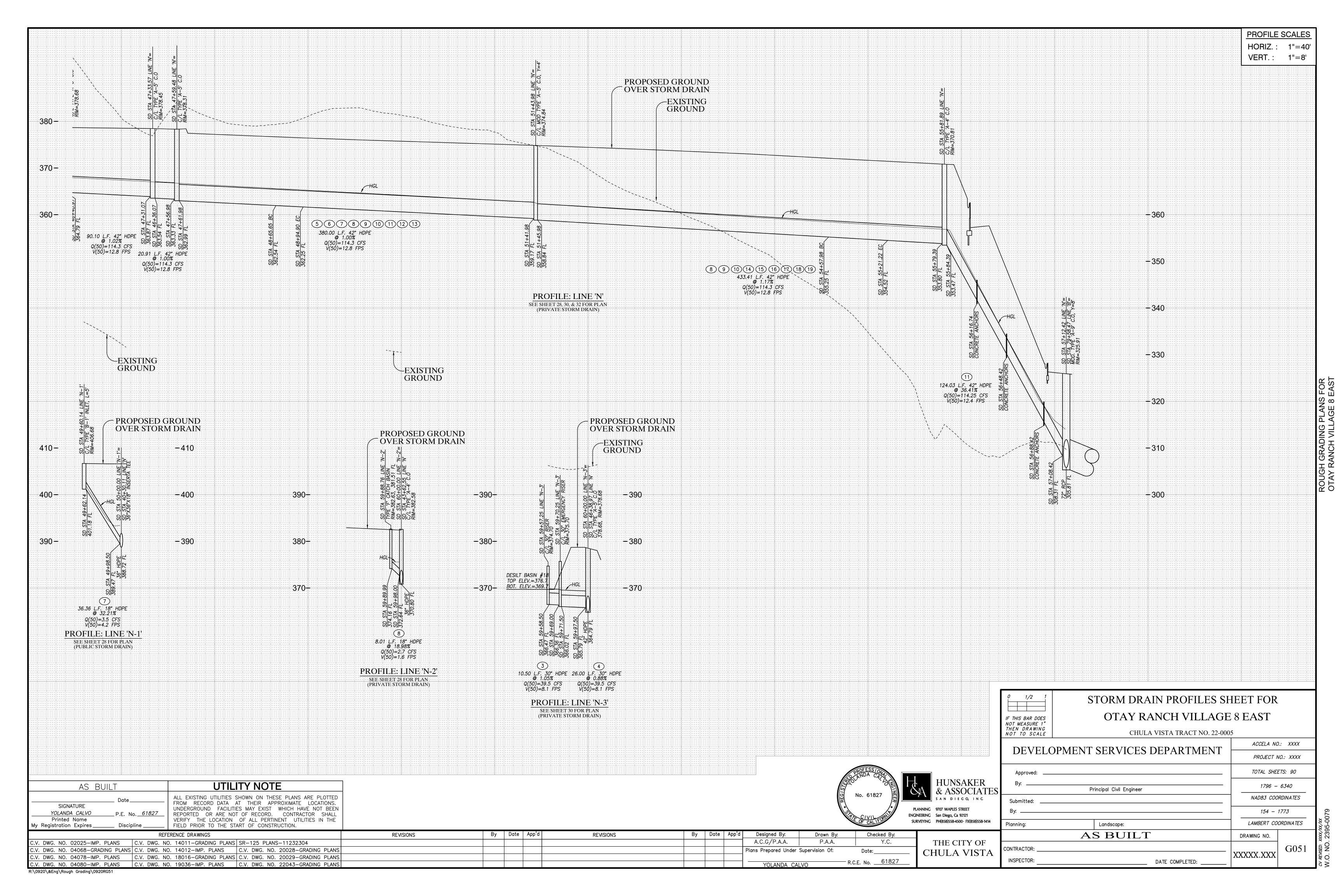


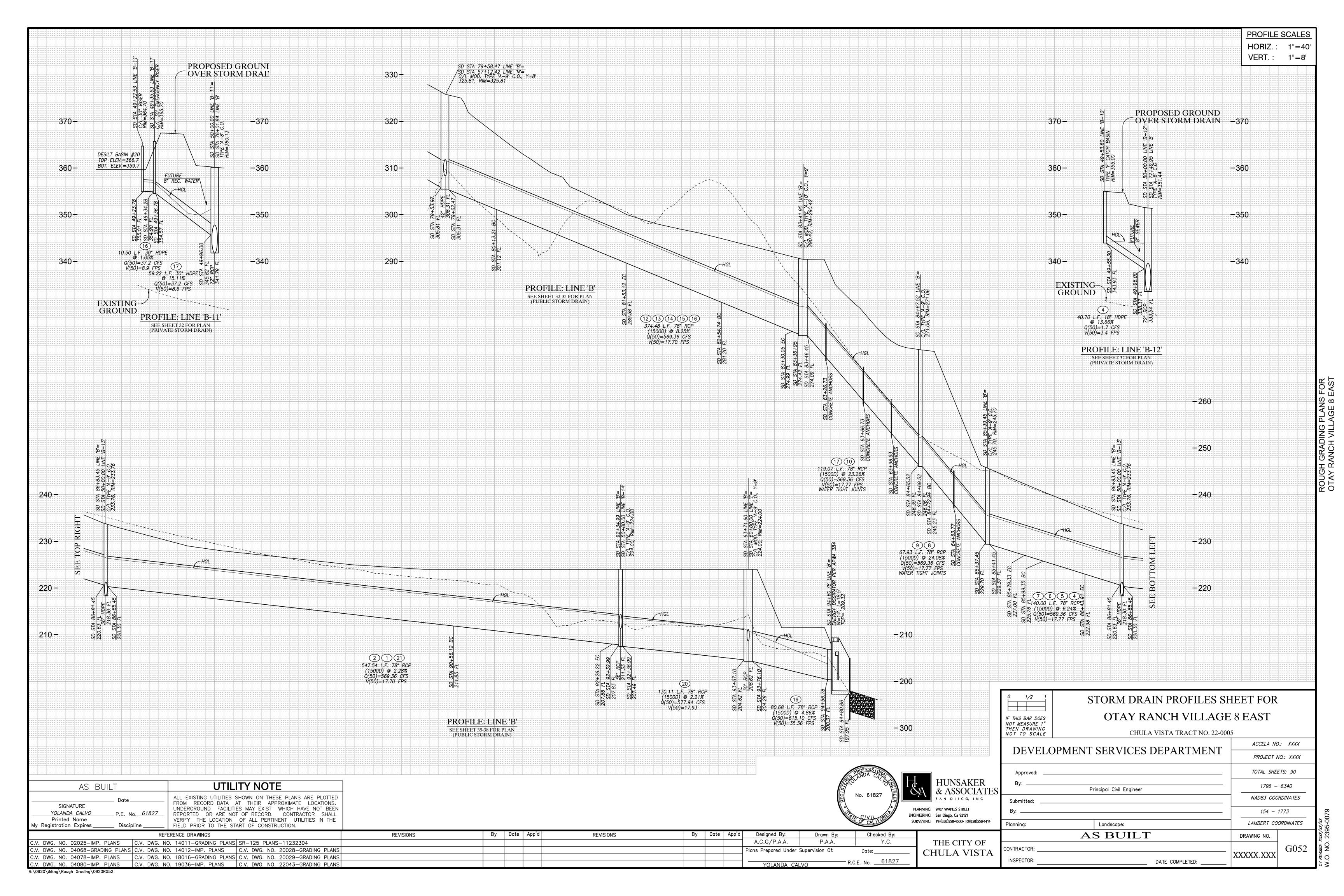


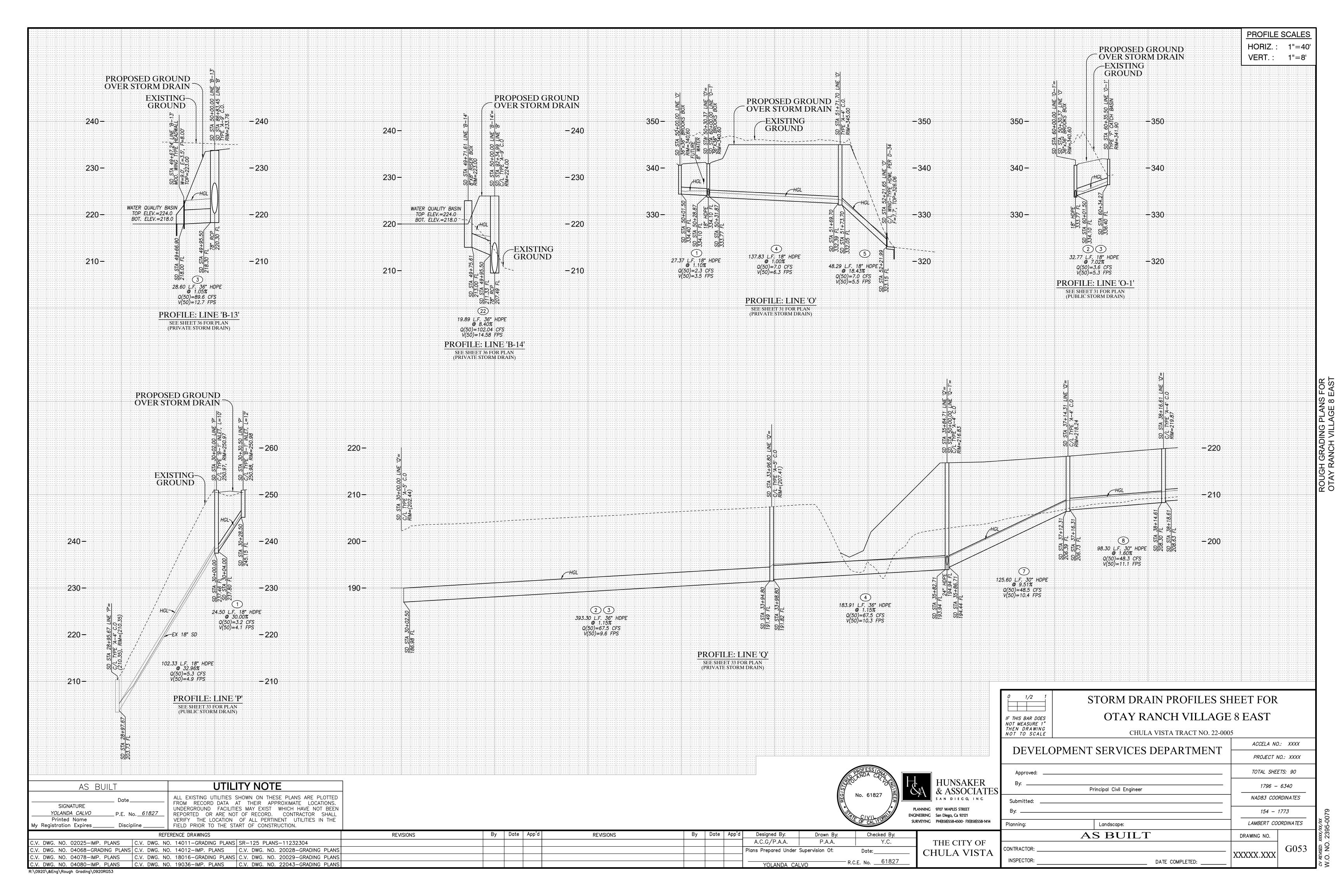


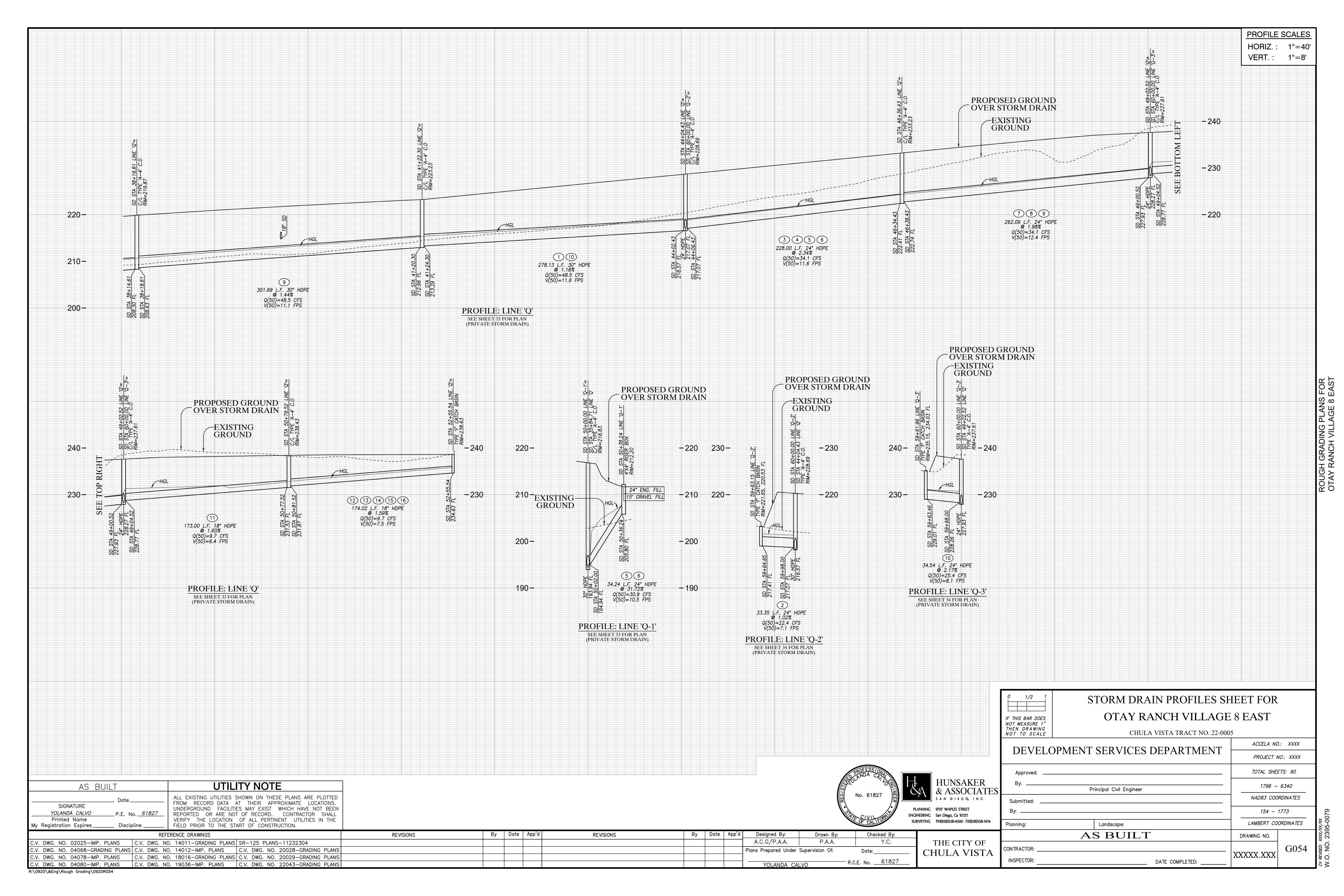


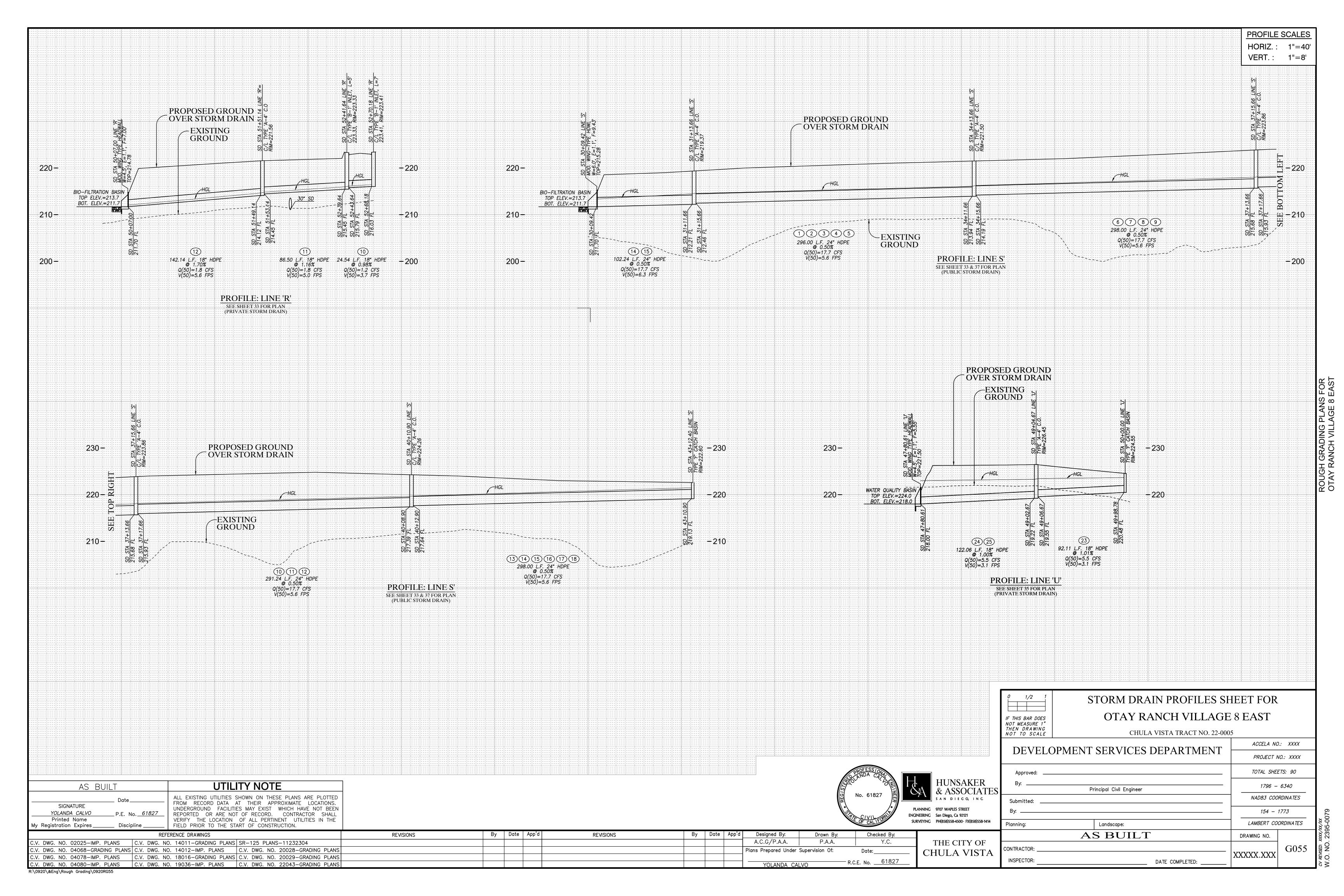


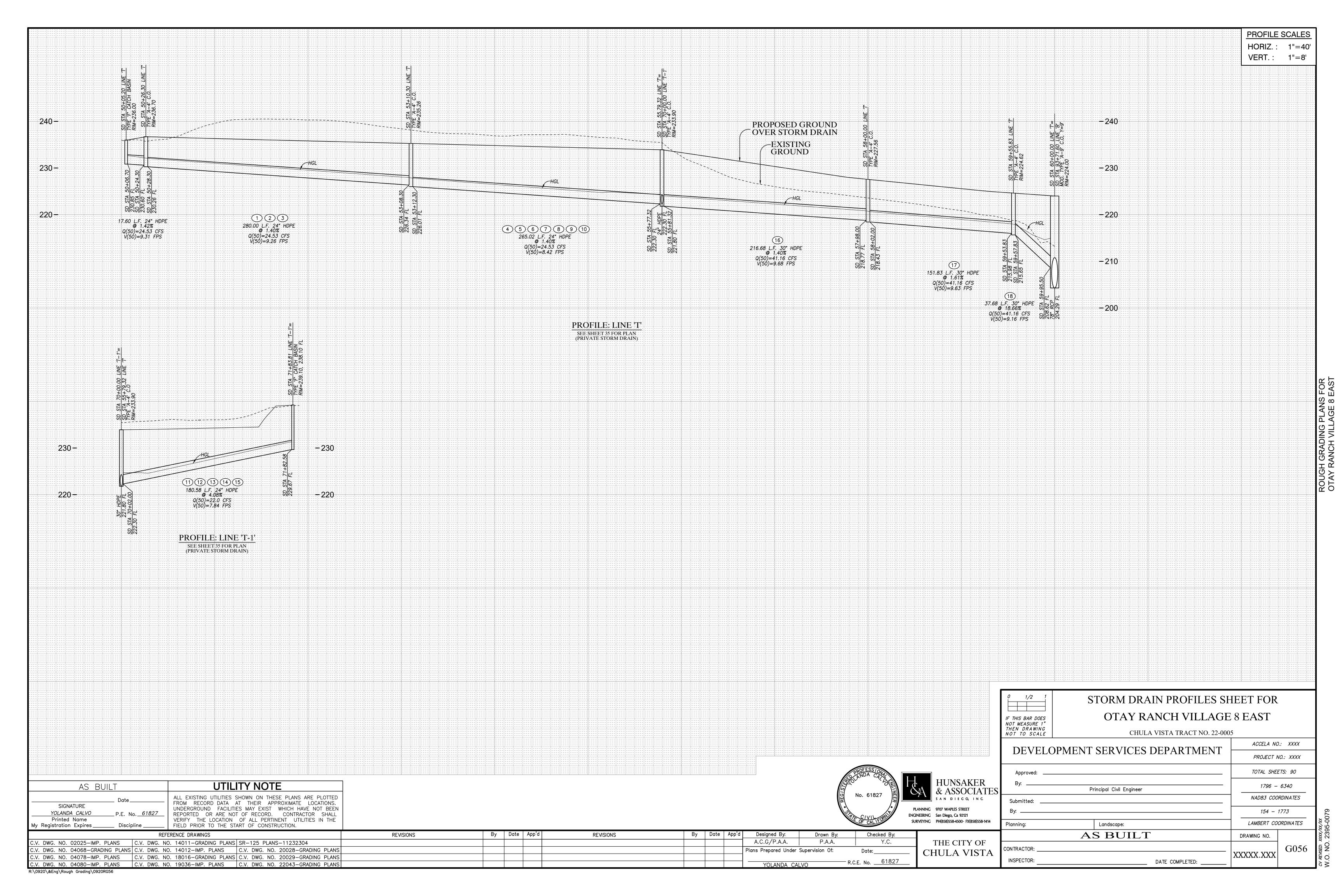


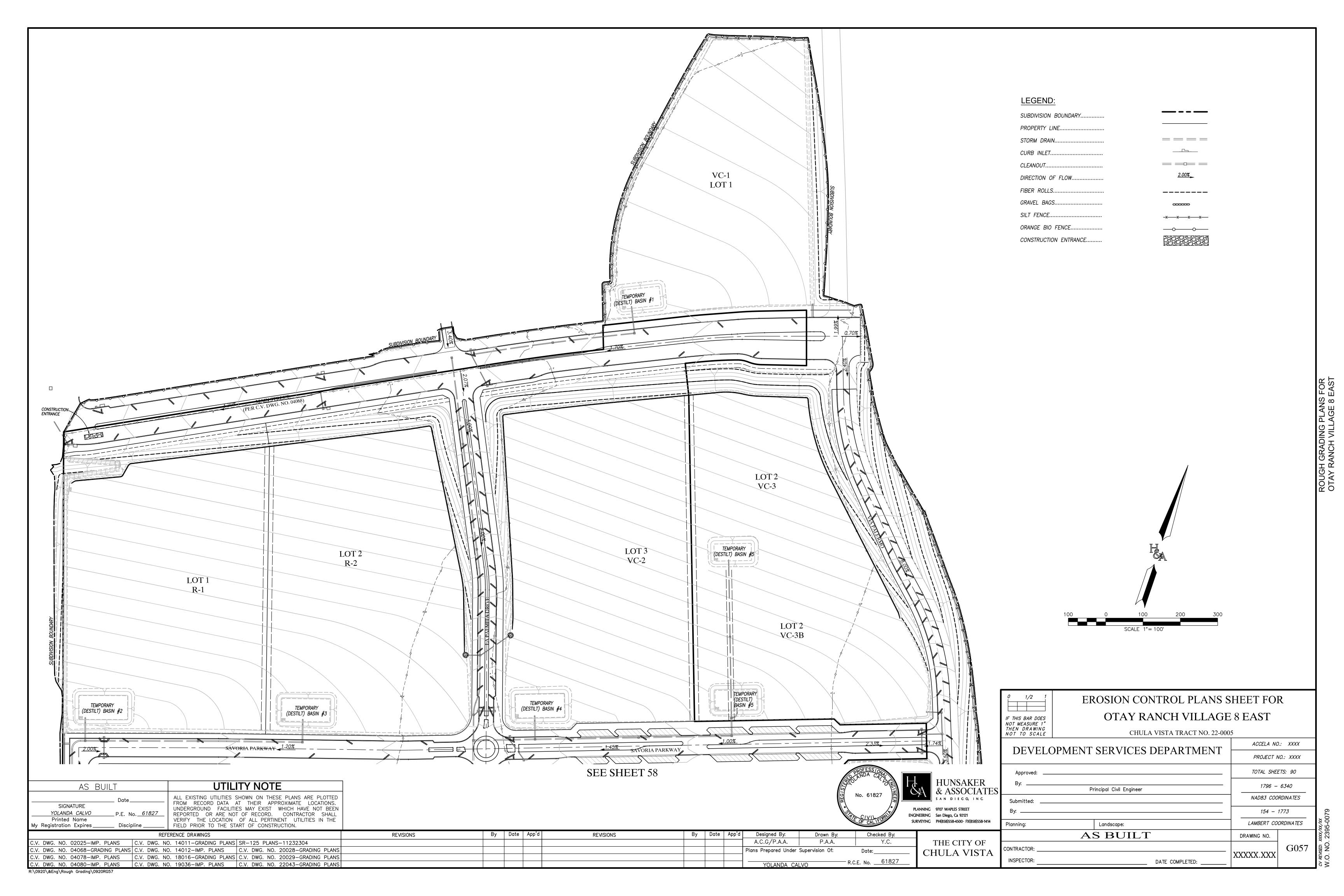


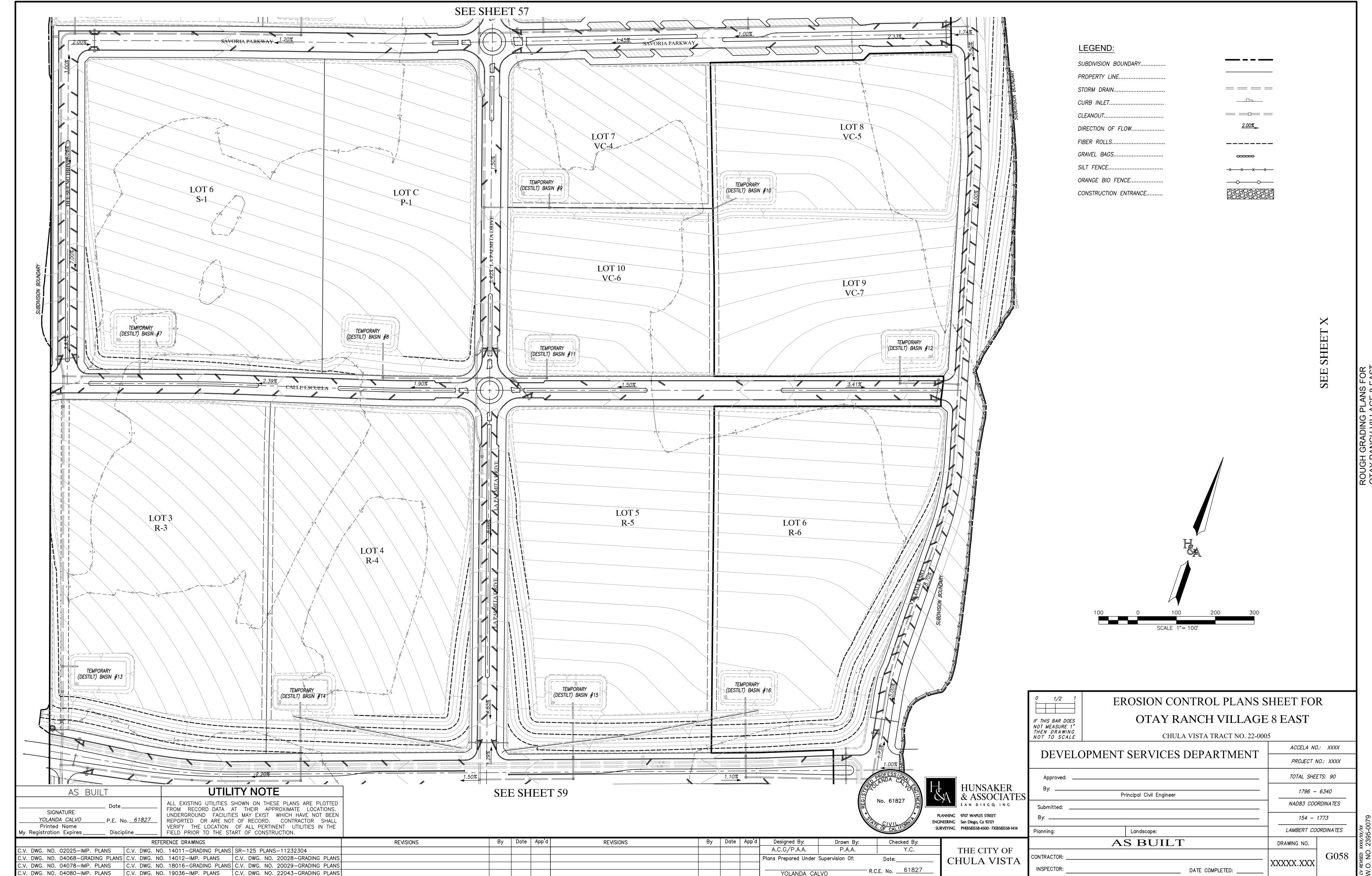


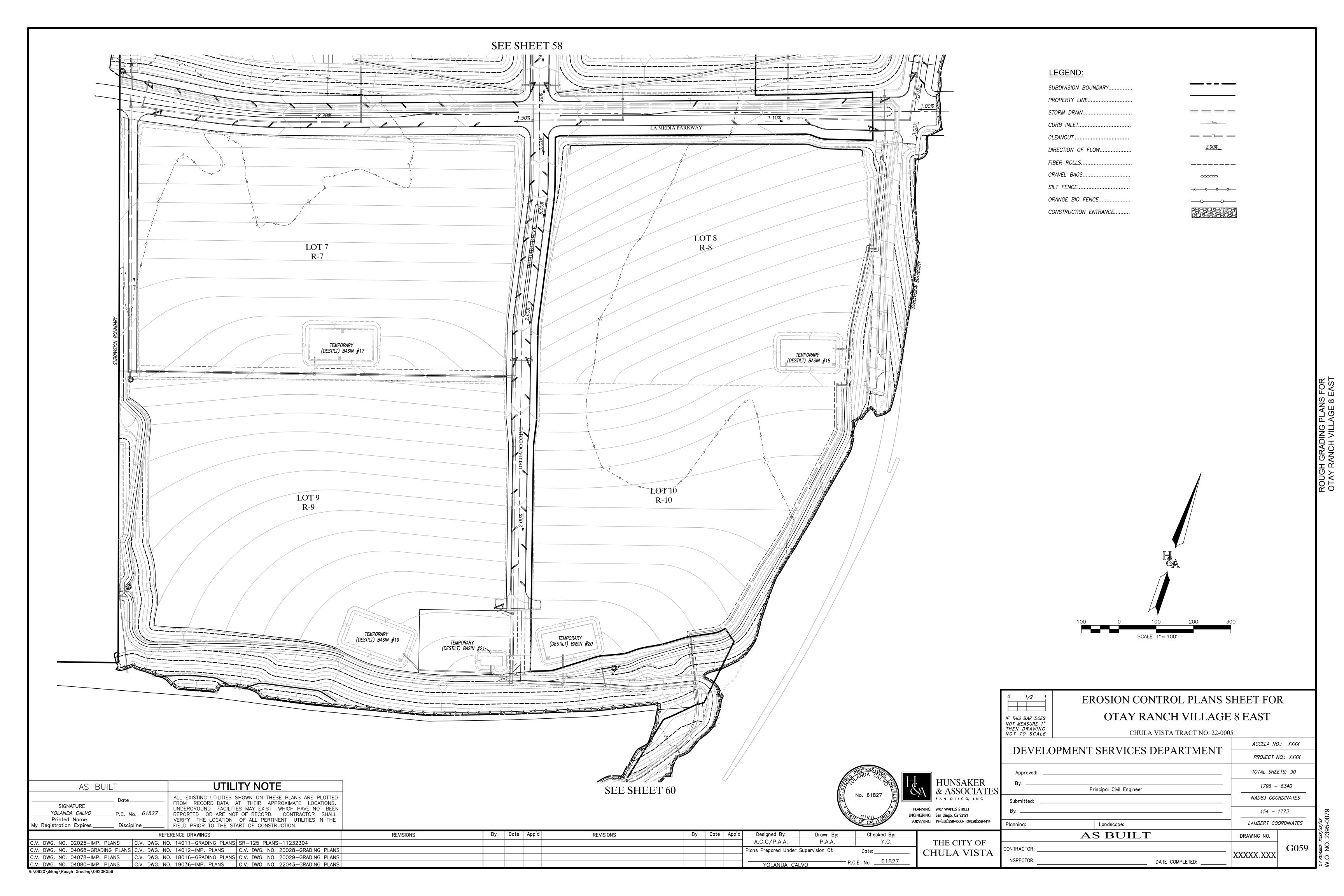


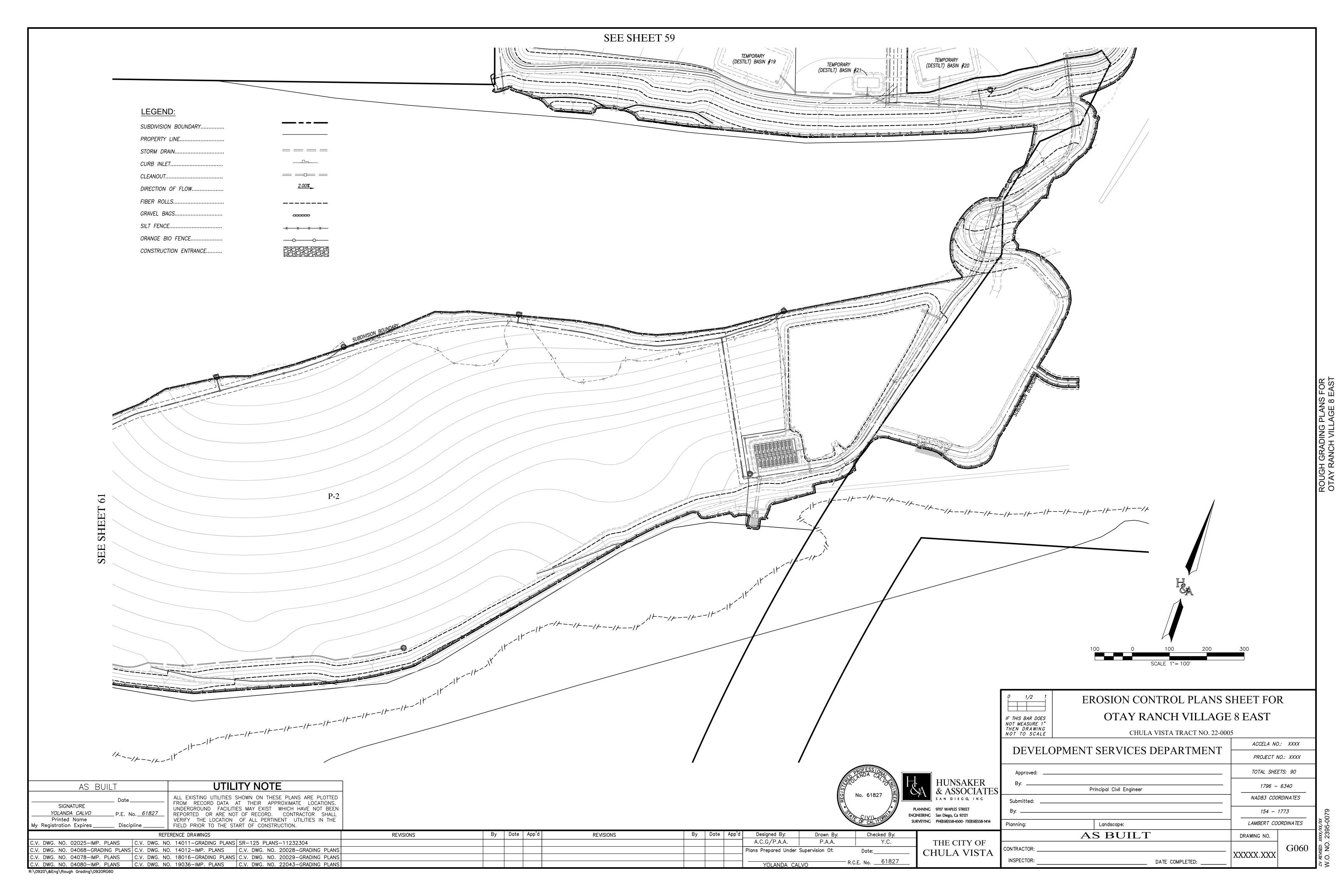




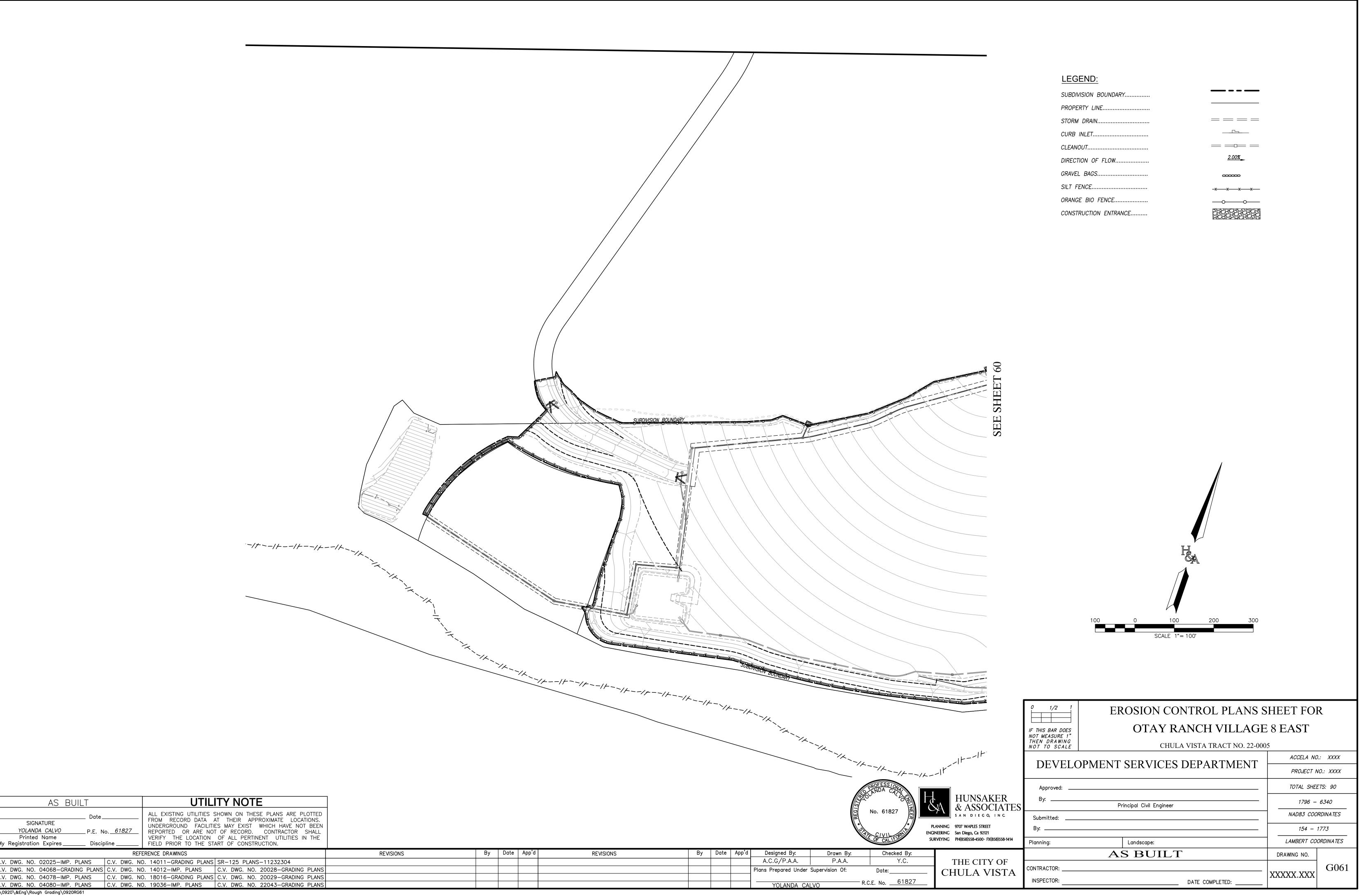












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VILLAGE 8 EAST ANCHOR RETAINING WALL PLANS

- THE WORK SHALL CONSIST OF FURNISHING AND CONSTRUCTING ANCHOR WALL BLOCK AND MIRAGRID GEOGRID REINFORCED SOIL RETAINING WALL SYSTEMS IN ACCORDANCE WITH THIS TECHNICAL SCOPE OF WORK AND IN REASONABLY CLOSE CONFORMITY WITH THE LINES, GRADES AND DIMENSIONS SHOWN ON THE ROUGH GRADING PLAN BY HUNSAKER & ASSOCIATES
- WORK INCLUDED: A. FURNISHING ANCHOR WALL SEGMENTAL CONCRETE FACING AND CAP UNITS AS SHOWN ON THE CONSTRUCTION DRAWINGS.
- B. FURNISHING STRUCTURAL GEOGRID REINFORCEMENT AS SHOWN ON THE CONSTRUCTION DRAWINGS. C. STORING, CUTTING AND PLACING STRUCTURAL GEOGRID REINFORCEMENT AS SPECIFIED HEREIN AND AS SHOWN ON THE
- D. PLACEMENT AND COMPACTION OF UNIT WALL FILL AND BACKFILL WITHIN THE GEOGRID REINFORCED AREA AS SPECIFIED HEREIN
- AND AS SHOWN ON THE CONSTRUCTION DRAWINGS. E. ERECTION OF ANCHOR WALL SEGMENTAL CONCRETE UNITS AND PLACEMENT OF STRUCTURAL GEOGRID.

- HUNSAKER & ASSOCIATES SAN DIEGO, INC., ROUGH GRADING PLAN, DATED
- GEOCON, INC., UPDATE GEOTECHNICAL REPORT, DATED MAY 5, 2023. 3. WHERE SPECIFICATIONS AND REFERENCE DOCUMENTS CONFLICT, THE ENGINEER SHALL MAKE FINAL DETERMINATION OF THE

- M3 CIVIL ENGINEERING, INC. (M3CE) ASSUMES NO LIABILITY FOR INTERPRETATION OF SUBSURFACE CONDITIONS, SUITABILITY OF
- SOIL DESIGN PARAMETERS AND SUBSURFACE GROUNDWATER CONDITIONS MADE BY OTHERS. 2. M3CE SHALL NOT BE RESPONSIBLE FOR THE COST OF ALL MEANS OF SUBSOIL IMPROVEMENT; COST OF ADDITIONAL SUBSOIL EXPLORATION; AND FOR ALL LABOR TOOLS, EQUIPMENT AND INCIDENTALS NECESSARY TO COMPLETE THE WORK. THE OWNER
- SHALL BE RESPONSIBLE FOR ALL SUCH COST THE OWNER SHALL BE RESPONSIBLE FOR COMPLYING WITH ALL FEDERAL, STATE AND LOCAL REQUIREMENTS FOR THE EXECUTION OF THE WORK, INCLUDING LOCAL BUILDING INSPECTION AND CURRENT OSHA EXCAVATION REGULATIONS.
- 4. PRIOR TO UNDERTAKING ANY GRADING OR EXCAVATION OF THE SITE, THE CONTRACTOR SHALL CONFIRM THE LOCATION OF THE PROPOSED RETAINING WALLS AND ALL UNDERGROUND FEATURES, INCLUDING UTILITY LOCATIONS WITHIN THE AREA OF
- 5. M3CE HAS COMPLETED ENGINEERING DESIGN OF THE PROPOSED RETAINING WALL(S), INCLUDING INTERNAL STABILITY AND LOCAL EXTERNAL STABILITY WHERE APPLICABLE, BASED UPON THE INFORMATION PROVIDED TO US AS OUTLINED ABOVE, M3CE ASSUMES THAT OTHERS HAVE DETERMINED THE SUITABILITY OF PLACING RETAINING WALLS AT THE LOCATIONS PROVIDED TO US, INCLUDING GEOTECHNICAL SUITABILITY AND SITE GLOBAL STABILITY.
- 6. SEGMENTAL RETAINING WALLS ARE FLEXIBLE STRUCTURES (VS. RIGID AS IN CMU WALLS) AND ARE SUBJECT TO POST CONSTRUCTION SETTLEMENT AND MOVEMENT. ALL IMPROVEMENTS (I.E. PAVEMENTS, CURBS, TRASH ENCLOSURES, UTILITY LINES ETC.) SHOULD BE DESIGNED TO HANDLE DIFFERENTIAL SETTLEMENT UP TO 1% OF TOTAL WALL HEIGHT.

- THIS SET OF SEGMENTAL RETAINING WALL PLANS ARE BASED ON THE PLANS AND DOCUMENTS REFERENCED IN SECTION 2.0. CHANGES TO THESE PLANS OR DOCUMENTS, INCLUDING GRADING, DRAINAGE, UTILITIES, SURCHARGE LOADS OR GEOTECHNICAL PARAMETERS MAY AFFECT WALL DESIGN REQUIREMENTS. M3CE SHALL BE NOTIFIED OF ANY SUCH CHANGES TO DETERMINE IF WALL DESIGN MODIFICATIONS ARE NEEDED.
- 2. THIS SET OF SEGMENTAL RETAINING WALL PLANS ARE BASED SPECIFICALLY ON THE WALL BEING CONSTRUCTED WITH ANCHOR BLOCK AND MIRAGRID REINFORCEMENT PRODUCTS. ABSOLUTELY NO SUBSTITUTIONS ALLOWED.
- 3. LOCATION OF THE SEGMENTAL RETAINING WALL IN RELATION TO PROPERTY LINES, UTILITY EASEMENTS, WATERSHED EASEMENTS, OR ANY OTHER TYPE OF EASEMENTS ARE THE RESPONSIBILITY OF THE OWNER OR THE SITE CIVIL ENGINEER. M3 CIVIL ENGINEERING ASSUMES NO LIABILITY FOR THE LOCATION OF THE SEGMENTAL RETAINING WALL, OR IF CONSTRUCTION OF THE PROPOSED SEGMENTAL RETAINING WALL ENCROACHES ANY PROPERTY LINES OR EASEMENTS.
- 4. IT IS IMPERATIVE THAT THE SITE SURVEYING OF THE SEGMENTAL RETAINING WALL BE DONE BY THE SITE CIVIL ENGINEER OR SURVEYOR AND MUST BE BASED ON COMPUTER GENERATED SITE/GRADING PLANS AND NOT PROFILE PLANS DONE BY THE ENGINEER OF RECORD. SURVEYING OF THE SEGMENTAL RETAINING WALL MUST TAKE INTO ACCOUNT THE DESIGN BATTER INDICATED ON THE ENCLOSED PLANS AND DETAILS. FAILURE TO TAKE INTO ACCOUNT WALL BATTER FOR SEGMENTAL RETAINING WALL SURVEYING WILL PRODUCE INCORRECT LOCATIONS OF ALL TOP OF WALLS AND SHALL BE CORRECTED AT NO COST TO THE ENGINEER OF RECORD OR THE SEGMENTAL RETAINING WALL CONTRACTOR.
- 5. WALL GEOMETRY, LOCATIONS, SLOPES AND SURCHARGE LOADS FOR THE SEGMENTAL RETAINING WALLS WERE MEASURED FROM THE GRADING PLAN REFERENCED ABOVE. IF CONDITIONS VARY IN THE FIELD FROM THOSE SHOWN ON THIS PLAN, THE ENGINEER OF RECORD MUST BE NOTIFIED PRIOR TO CONSTRUCTION OF THE SEGMENTAL RETAINING WALLS TO REVIEW THE DESIGN AND/OR PLANS. MODIFICATIONS TO THE DESIGN AND/OR PLANS MAY BE REQUIRED AFTER THE REVIEW, AND MAY TAKE UP TO TEN BUSINESS DAYS TO COMPLETE.
- 6. IF THERE ARE DISCREPANCIES BETWEEN ANY INFORMATION ON THESE PLANS AND INFORMATION IN THE PROJECT SPECIFICATIONS, THE MORE RESTRICTIVE INFORMATION TAKES PRECEDENCE.

5.0 SEGMENTAL RETAINING WALL CONTRACTOR QUALIFICATIONS

THE WALL CONTRACTOR SHALL DOCUMENT COMPLIANCE WITH THE FOLLOWING EXPERIENCE REQUIREMENTS: 2. A MINIMUM OF FIVE YEARS IN WHICH THE CONTRACTOR HAS BUILT SEGMENTAL RETAINING WALLS WITH A TOTAL FACE AREA NO LESS THAN 250,000 SQUARE FEET

CONSTRUCTION OF A MINIMUM OF 25,000 SQUARE FEET WITH THE SPECIFIED ANCHOR BLOCK UNITS . CONSTRUCTION OF AT LEAST FIVE SEGMENTAL RETAINING WALLS OF A SIMILAR HEIGHT AND SIZE AS THOSE SPECIFIED HEREIN.

CONCRETE RETAINING WALL UNITS: ANCHOR RETAINING WALL UNITS AS SHOWN ON THE DRAWINGS AND AS MANUFACTURED BY

- SIERRA BUILDING PRODUCTS UNDER LICENSE FROM ANCHOR WALL SYSTEMS. GEOSYNTHETIC REINFORCEMENT: MIRAGRID AS SHOWN ON THE DRAWINGS.
- A. AGGREGATE BASE: CRUSHED STONE OR GRANULAR FILL MEETING THE FOLLOWING GRADATION AS DETERMINED IN
- ACCORDANCE WITH ASTM D448:

SIEVE SIZE PERCENT PASSING

1 INCH 3/4 INCH 75 TO 100 NO. 4 0 TO 60 0 TO 50 NO 40

NO. 200

B. BASE THICKNESS: 6 INCHES (MINIMUM COMPACTED THICKNESS). DRAINAGE AGGREGATE: CLEAN CRUSHED STONE OR GRANULAR FILL MEETING THE FOLLOWING GRADATION AS DETERMINED IN

ACCORDANCE WITH ASTM D448 SIEVE SIZE PERCENT PASSING

0 TO 5

1 INCH 75 TO 100 3/4 INCH NO. 4 0 TO 60 NO. 40 0 TO 50 NO. 200 0 TO 5

5. REINFORCED FILL: SOIL FREE OF ORGANICS AND DEBRIS AND CONSISTING OF EITHER GP, GW, SP, SW, SM OR SC TYPE CLASSIFIED IN ACCORDANCE WITH ASTM D2487 AND THE USCS CLASSIFICATION SYSTEM AND MEETING THE FOLLOWING

GRADATION AS DETERMINED IN ACCORDANCE WITH ASTM D448: SIEVE SIZE PERCENT PASSING

1 INCH 75 TO 100 NO. 4 20 TO 100 0 TO 60 NO. 200 0 TO 35

A THE PLASTICITY INDEX (PI) SHALL BE LESS THAN 20.

- B. MAXIMUM PARTICLE SIZE FOR BACKFILL IS THREE (3) INCHES UNSUITABLE SOILS ARE ORGANIC SOILS AND THOSE SOILS CLASSIFIED AS ML, CL, OL, MH, CH, OH OR PT
- ALL WALL BACKFILL MATERIALS SHALL ALSO HAVE THE MINIMUM ENGINEERING PROPERTIES SHOWN IN SECTION 17.2 ITEM A.
- E. TEST RESULTS OF ALL PROPOSED BACKFILL MATERIALS. WHETHER ON-SITE OR IMPORTED, SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PRIOR TO CONSTRUCTION.
- 6. DRAINAGE PIPE: PERFORATED OR SLOTTED PVC OR CORRUGATED HDPE PIPE MANUFACTURED IN ACCORDANCE WITH D3034

UTILITY NOTE

FIELD PRIOR TO THE START OF CONSTRUCTION.

REVISIONS

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN

REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL

VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE

By | Date | App'd |

7. CONSTRUCTION ADHESIVE: EXTERIOR GRADE ADHESIVE AS RECOMMENDED BY THE RETAINING WALL MANUFACTURER

- 7.0 FOUNDATION SOIL NOTES

 1. EXCAVATE FOUNDATION SOIL AS REQUIRED FOR FOOTING OR BASE DIMENSION SHOWN ON THE DRAWINGS, OR AS DIRECTED BY THE PROJECT GEOTECHNICAL ENGINEER 2. THE OWNER SHALL RETAIN THE SERVICES OF A GEOTECHNICAL ENGINEER TO EXAMINE FOUNDATION SOIL TO ENSURE THAT THE ACTUAL FOUNDATION SOIL STRENGTH MEETS OR EXCEEDS THAT INDICATED ON THE DRAWINGS. UNSUITABLE SOILS ARE
- DEFINED AS ANY SOIL THAT DOES NOT HAVE SUFFICIENT BEARING CAPACITY OR WILL CAUSE EXCESSIVE WALL SETTLEMENT. REMOVE SOIL NOT MEETING THE REQUIRED STRENGTH. 3. THE OWNER SHALL RETAIN THE SERVICES OF A GEOTECHNICAL ENGINEER TO DETERMINE IF THE FOUNDATION SOILS WILL
- REQUIRE SPECIAL TREATMENT OR CORRECTION TO CONTROL TOTAL AND DIFFERENTIAL SETTLEMENT 4. FILL OVER-EXCAVATED AREAS WITH SUITABLE COMPACTED BACKFILL, AS RECOMMENDED BY THE PROJECT GEOTECHNICAL

- PLACE BASE MATERIALS TO THE DEPTHS AND WIDTHS SHOWN ON THE DRAWINGS, UPON UNDISTURBED SOILS, OR FOUNDATION SOILS PREPARED AS DIRECTED BY THE PROJECT GEOTECHNICAL ENGINEER. A. EXTEND THE LEVELING PAD LATERALLY AT LEAST 6 INCHES IN FRONT AND BEHIND THE LOWERMOST CONCRETE RETAINING WALL
- PROVIDE AGGREGATE BASE COMPACTED TO 6 INCHES THICK (MINIMUM).
- COMPACT AGGREGATE BASE MATERIAL TO PROVIDE A LEVEL, HARD SURFACE ON WHICH TO PLACE THE FIRST COURSE OF UNITS. PREPARE BASE MATERIALS TO ENSURE COMPLETE CONTACT WITH RETAINING WALL UNITS. GAPS ARE NOT ALLOWED.

EXCAVATION SUPPORT, IF REQUIRED, IS THE RESPONSIBILITY OF THE CONTRACTOR, INCLUDING THE STABILITY OF THE

- EXCAVATION AND ITS INFLUENCE ON ADJACENT PROPERTIES AND STRUCTURES. 2. GENERAL: ERECT UNITS IN ACCORDANCE WITH MANUFACTURER'S INSTRUCTIONS AND RECOMMENDATIONS, AND AS SPECIFIED
- 3. PLACE FIRST COURSE OF CONCRETE WALL UNITS ON THE PREPARED BASE MATERIAL. CHECK UNITS FOR LEVEL AND ALIGNMENT. MAINTAIN THE SAME ELEVATION AT THE TOP OF EACH UNIT WITHIN EACH SECTION OF THE BASE COURSE.
- ENSURE THAT FOUNDATION UNITS ARE IN FULL CONTACT WITH NATURAL OR COMPACTED SOIL BASE 5. PLACE CONCRETE WALL UNITS SIDE-BY-SIDE FOR FULL LENGTH OF WALL ALIGNMENT. ALIGNMENT MAY BE DONE BY USING A
- STRING LINE MEASURED FROM THE BACK OF THE BLOCK. GAPS ARE NOT ALLOWED BETWEEN THE FOUNDATION CONCRETE 6. PLACE 12 INCHES (MINIMUM) OF DRAINAGE AGGREGATE BETWEEN, AND DIRECTLY BEHIND THE CONCRETE WALL UNITS. FILL
- VOIDS IN RETAINING WALL UNITS WITH DRAINAGE AGGREGATE. PROVIDE A DRAINAGE ZONE BEHIND THE WALL UNITS TO WITHIN 9 INCHES OF THE FINAL GRADE. CAP THE BACKFILL AND DRAINAGE AGGREGATE ZONE WITH 9 INCHES OF IMPERVIOUS MATERIAL. INSTALL DRAINAGE PIPE AT THE LOWEST ELEVATION POSSIBLE, TO MAINTAIN GRAVITY FLOW OF WATER TO OUTSIDE OF THE REINFORCED ZONE. SLOPE THE MAIN COLLECTION DRAINAGE PIPE, LOCATED JUST BEHIND THE CONCRETE RETAINING WALL
- UNITS. 1 PERCENT (MINIMUM) TO PROVIDE GRAVITY FLOW TO THE DAYLIGHTED AREAS. DAYLIGHT THE MAIN COLLECTION DRAINAGE PIPE TO AN APPROPRIATE LOCATION AWAY FROM THE WALL SYSTEM AS SHOWN ON THE WALL PLANS.
- REMOVE EXCESS FILL FROM TOP OF UNITS AND INSTALL NEXT COURSE. ENSURE DRAINAGE AGGREGATE AND BACKFILL ARE COMPACTED BEFORE INSTALLATION OF NEXT COURSE.
- 9. CHECK EACH COURSE FOR LEVEL AND ALIGNMENT. ADJUST UNITS AS NECESSARY WITH REINFORCEMENT SHIMS TO MAINTAIN LEVEL, ALIGNMENT, AND SETBACK PRIOR TO PROCEEDING WITH EACH ADDITIONAL COURSE. 10. INSTALL EACH SUCCEEDING COURSE. BACKFILL AS EACH COURSE IS COMPLETED. PULL THE UNITS FORWARD UNTIL THE
- LOCATING SURFACE OF THE UNIT CONTACTS THE LOCATING SURFACE OF THE UNITS IN THE PRECEDING COURSE. INTERLOCK WALL SEGMENTS THAT MEET AT CORNERS BY OVERLAPPING SUCCESSIVE COURSES. ATTACH CONCRETE RETAINING WALL UNITS AT EXTERIOR CORNERS WITH ADHESIVE SPECIFIED.
- 11. INSTALL GEOSYNTHETIC REINFORCEMENT IN ACCORDANCE WITH GEOSYNTHETIC MANUFACTURER'S RECOMMENDATIONS AND
- ORIENT GEOSYNTHETIC REINFORCEMENT WITH THE HIGHEST STRENGTH AXIS PERPENDICULAR TO THE WALL FACE. PRIOR TO GEOSYNTHETIC REINFORCEMENT PLACEMENT, PLACE THE BACKFILL AND COMPACT TO THE ELEVATION OF THE TOP OF THE WALL UNITS AT THE ELEVATION OF THE GEOSYNTHETIC REINFORCEMENT.
- PLACE GEOSYNTHETIC REINFORCEMENT AT THE ELEVATIONS AND TO THE LENGTHS SHOWN ON THE DRAWINGS. LAY GEOSYNTHETIC REINFORCEMENT HORIZONTALLY ON TOP OF THE CONCRETE RETAINING WALL UNITS AND THE COMPACTED BACKFILL SOILS. PLACE THE GEOSYNTHETIC REINFORCEMENT WITHIN ONE INCH OF THE FACE OF THE CONCRETE RETAINING WALL UNITS. PLACE THE NEXT COURSE OF CONCRETE RETAINING WALL UNITS ON TOP OF THE GEOSYNTHETIC REINFORCEMENT.
- THE GEOSYNTHETIC REINFORCEMENT SHALL BE IN TENSION AND FREE FROM WRINKLES PRIOR TO PLACEMENT OF THE BACKFILL SOILS. PULL GEOSYNTHETIC REINFORCEMENT HAND-TAUT AND SECURE IN PLACE WITH STAPLES, STAKES, OR BY HAND-TENSIONING UNTIL THE GEOSYNTHETIC REINFORCEMENT IS COVERED BY 6 INCHES OF LOOSE FILL. THE GEOSYNTHETIC REINFORCEMENTS SHALL BE CONTINUOUS THROUGHOUT THEIR EMBEDMENT LENGTHS. SPLICES IN THE
- GEOSYNTHETIC REINFORCEMENT STRENGTH DIRECTION ARE NOT ALLOWED. DO NOT OPERATE TRACKED CONSTRUCTION EQUIPMENT DIRECTLY ON THE GEOSYNTHETIC REINFORCEMENT. AT LEAST 6 INCHES OF COMPACTED BACKFILL SOIL IS REQUIRED PRIOR TO OPERATION OF TRACKED VEHICLES OVER THE GEOSYNTHETIC REINFORCEMENT. KEEP TURNING OF TRACKED CONSTRUCTION EQUIPMENT TO A MINIMUM.
- RUBBER-TIRED EQUIPMENT MAY PASS OVER THE GEOSYNTHETIC REINFORCEMENT AT SPEEDS OF LESS THAN 5 MILES PER HOUR. TURNING OF RUBBER-TIRED EQUIPMENT IS NOT ALLOWED ON GEOSYNTHETIC REINFORCEMENT

10.0 BACKFILL PLACEMENT NOTES

PLACE REINFORCED BACKFILL, SPREAD AND COMPACT IN A MANNER THAT WILL MINIMIZE SLACK IN THE REINFORCEMENT. PLACE FILL WITHIN THE REINFORCED ZONE AND COMPACT IN LIFTS NOT EXCEEDING 6 TO 8 INCHES (LOOSE THICKNESS) WHERE HAND-OPERATED COMPACTION EQUIPMENT IS USED, AND NOT EXCEEDING 12 INCHES (LOOSE THICKNESS) WHERE HEAVY, SELF PROPELLED COMPACTION EQUIPMENT IS USED.

ONLY LIGHTWEIGHT HAND-OPERATED COMPACTION EQUIPMENT IS ALLOWED WITHIN 4 FEET OF THE BACK OF THE RETAINING

- WALL UNITS. MINIMUM COMPACTION REQUIREMENTS FOR FILL PLACED IN THE REINFORCED ZONE COMPACT TO 90 PERCENT OF THE SOIL'S STANDARD MAXIMUM DRY DENSITY (ASTM D1557) FOR THE ENTIRE WALL HEIGHT.
- VERIFY COMPACTION REQUIREMENTS WITH THE PROJECT GEOTECHNICAL ENGINEER. UTILITY TRENCH BACKFILL: COMPACT UTILITY TRENCH BACKFILL IN OR BELOW THE REINFORCED SOIL ZONE TO 90 PERCENT OF THE SOIL'S STANDARD MAXIMUM DRY DENSITY (ASTM D1557). OR AS RECOMMENDED BY THE PROJECT GEOTECHNICAL ENGINEER. MOISTURE CONTENT: AT OR 2 PERCENTAGE POINTS ABOVE THE OPTIMUM MOISTURE CONTENT FOR ALL WALL HEIGHTS.
- THESE NOTES MAY BE CHANGED BASED ON RECOMMENDATIONS BY THE PROJECT GEOTECHNICAL ENGINEER. AT THE END OF EACH DAY'S OPERATION, SLOPE THE LAST LEVEL OF COMPACTED BACKFILL AWAY FROM THE INTERIOR (CONCEALED) FACE OF THE WALL TO DIRECT SURFACE WATER RUNOFF AWAY FROM THE WALL FACE.
- THE GENERAL CONTRACTOR IS RESPONSIBLE FOR ENSURING THAT THE FINISHED SITE DRAINAGE IS DIRECTED AWAY FROM THE RETAINING WALL SYSTEM. IN ADDITION, THE GENERAL CONTRACTOR IS RESPONSIBLE FOR ENSURING THAT SURFACE WATER RUNOFF FROM ADJACENT CONSTRUCTION AREAS IS NOT ALLOWED TO ENTER THE RETAINING WALL AREA OF THE CONSTRUCTION SITE.
- ANY STRUCTURAL FILL PLACED MUST BE KEPT FROM FREEZING. REQUIRING THE USE OF FROST BLANKETS AND GOOD WINTER CONSTRUCTION PRACTICES. GENERALLY, WINTER CONSTRUCTION REQUIRES THE IMPORT OF NON-FROST SUSCEPTIBLE SOILS, TYPICALLY CLEAN SAND AND/OR GRAVEL. ANY STRUCTURAL FILL FOUND TO BE FROZEN ON SUBSEQUENT DAYS OF CONSTRUCTION MUST BE REMOVED AND REPLACED PRIOR TO PLACING ADDITIONAL FILL.

REVISIONS

- APPLY ADHESIVE TO THE TOP SURFACE OF THE UNIT BELOW AND PLACE THE CAP UNIT INTO DESIRED POSITION.
- CUT CAP UNITS AS NECESSARY TO OBTAIN THE PROPER FIT. BACKFILL AND COMPACT TO TOP OF CAP UNIT

12.0 WALL CONSTRUCTION TOLERANCE NOTES WALL CONSTRUCTION TO FRANCES

- A. VERTICAL ALIGNMENT: PLUS OR MINUS 1-1/4 INCHES OVER ANY 10-FOOT DISTANCE, WITH A MAXIMUM DIFFERENTIAL OF 3 INCHES OVER THE LENGTH OF THE WALL.
- HORIZONTAL LOCATION CONTROL FROM GRADING PLAN: B.1. STRAIGHT LINES: PLUS OR MINUS 1-1/4 INCHES OVER ANY 10-FOOT DISTANCE, WITH A MAXIMUM DIFFERENTIAL OF 3 INCHES
- OVER THE LENGTH OF THE WALL
- B.2. CORNER AND RADIUS LOCATIONS: PLUS OR MINUS 12 INCHES. B.3. CURVES AND SERPENTINE RADII: PLUS OR MINUS 2 FEET.
- IMMEDIATE POST CONSTRUCTION WALL BATTER: WITHIN 2 DEGREES OF THE DESIGN BATTER OF THE CONCRETE RETAINING

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D. BULGING: PLUS OR MINUS 1-1/4 INCHES OVER ANY 10-FOOT DISTANCE.

- 13.0 UTILITY NOTES

 1. UTILITY INFORMATION MAY NOT HAVE BEEN PROVIDED TO THE ENGINEER OF RECORD FOR THE PREPARATION OF THESE PLANS, AND THEREFORE MAY NOT BE INCLUDED. IF UTILITIES ARE LOCATED WITHIN THE PROPOSED REINFORCED ZONE THE ENGINEER OF RECORD MUST BE NOTIFIED PRIOR TO CONSTRUCTION OF THE SEGMENTAL RETAINING WALLS TO REVIEW THE DESIGN AND/OR PLANS. MODIFICATIONS TO THE DESIGN AND/OR PLANS MAY BE REQUIRED. AND MAY TAKE UP TO TEN BUSINESS DAYS.
- UNITS, REINFORCED SOIL MASS, AND SURCHARGE LOADS (IF ANY). 3. STORM DRAINS ARE PRONE TO LEAKING. THEREFORE, IF A JOINT IN A STORM DRAIN IS LOCATED WITHIN 100 FEET OF THE RETAINING WALL THE STORM WATER PIPE MUST BE WATER TIGHT. NEOPRENE O-RINGS MUST BE INSTALLED AT ALL STORM PIPE

2. UTILITIES MUST BE PROPERLY DESIGNED (BY OTHERS) TO WITHSTAND ALL FORCES FROM THE SEGMENTAL RETAINING WALL

4. WATER LINES, INCLUDING IRRIGATION SYSTEMS, MUST BE WATER TIGHT WITHIN 100 FEET OF THE RETAINING WALL. LEAKAGE BEHIND A RETAINING WALL WILL INCREASE THE HORIZONTAL PRESSURE AGAINST THE WALL LEADING TO WALL FAILURE. FOR THIS REASON, SUBSURFACE WATERLINES AND IRRIGATION SYSTEMS SHOULD NOT BE INSTALLED ABOVE THE REINFORCED ZONES OF THE RETAINING WALL, OR WITHIN 5 FEET OF THE REINFORCED ZONE

- 14.0 FIELD QUALITY CONTROL AND QUALITY ASSURANCE NOTES

 1. INSTALLER IS RESPONSIBLE FOR QUALITY CONTROL OF INSTALLATION OF SYSTEM COMPONENTS. 2. THE OWNER SHALL EMPLOY AN INDEPENDENT THIRD PARTY SPECIAL INSPECTOR EXPERIENCED IN SEGMENTAL RETAINING WALL CONSTRUCTION TO PERFORM QUALITY ASSURANCE VERIFICATION OF THE CORRECT INSTALLATION OF SYSTEM COMPONENTS IN
- ACCORDANCE WITH THESE SPECIFICATIONS AND THE DRAWINGS. 3. CORRECT WORK WHICH DOES NOT MEET THESE SPECIFICATIONS OR THE REQUIREMENTS SHOWN ON THE DRAWINGS AT THE INSTALLER'S EXPENSE
- 4. PROJECT GEOTECHNICAL ENGINEER TO PERFORM COMPACTION TESTING OF THE REINFORCED BACKFILL PLACED AND COMPACTED IN THE REINFORCED BACKFILL ZONE. A. TESTING FREQUENCY (OR AS DIRECTED BY PROJECT GEOTECHNICAL ENGINEER)
- B. ONE TEST FOR EVERY 2 FEET (VERTICAL) OF FILL PLACED AND COMPACTED, FOR EVERY 50 LINEAL FEET OF RETAINING WALL. C. VARY COMPACTION TEST LOCATIONS TO COVER THE ENTIRE AREA OF THE REINFORCED SOIL ZONE, INCLUDING THE AREA COMPACTED BY THE HAND-OPERATED COMPACTION EQUIPMENT.
- 5. PROJECT GEOTECHNICAL ENGINEER TO TEST ALL SOIL PROPOSED FOR USE IN THE SEGMENTAL RETAINING WALL CONSTRUCTION, INCLUDING SOIL IN THE FOUNDATION, RETAINED AND REINFORCED ZONE OF THE WALLS, TO VERIFY COMPLIANCE WITH THE MATERIAL SPECIFICATIONS AND ENGINEERING PROPERTIES.

15.0 STATEMENT OF SPECIAL INSPECTIONS

- SPECIAL INSPECTION IS REQUIRED IN ACCORDANCE WITH CBC SECTION 1705.4. 2. SPECIAL INSPECTION WORK IS TO BE PERFORMED BY THE PROJECT GEOTECHNICAL ENGINEER.
- THE SPECIAL INSPECTOR'S RESPONSIBILITIES INCLUDE VERIFYING THE FOLLOWING:
- A. UNIT DIMENSIONS. B. ANCHOR WALL UNIT IDENTIFICATION OF COMPLIANCE WITH ASTM C 1372, INCLUDING COMPRESSIVE STRENGTH AND WATER
- C. FOUNDATION PREPARATION. UNIT PLACEMENT, INCLUDING ALIGNMENT AND INCLINATION.

ABSORPTION, AS DESCRIBED IN SECTION 3.1 OF ICC REPORT 1959.

- E. GEOSYNTHETIC REINFORCEMENT TYPE AND PLACEMENT.
- BACKFILL PLACEMENT AND COMPACTION. G. DRAINAGE PROVISIONS
- 3. TYPE AND EXTENT OF SPECIAL INSPECTION:
- A. SPECIAL INSPECTION OF SOIL BACKFILL SHALL BE PERFORMED ON A CONTINUOUS BASIS. ALL OTHER SPECIAL INSPECTION SHALL BE ON A PERIODIC BASIS
- 4. TYPE AND EXTENT OF EACH TEST
- A. MODULAR UNIT DIMENSION SHALL BE VERIFIED ONCE PER WALL PRIOR TO THE START OF CONSTRUCTION. B. CONCRETE UNIT SHALL HAVE A MINIMUM 28-DAY COMPRESSIVE STRENGTH OF 3,000 PSI AND A MAXIMUM WATER ABSORPTION OF
- C. FOUNDATION PREPARATION SHALL BE INSPECTED FOR COMPLIANCE WITH THE ANCHOR RETAINING WALL DESIGN PARAMETERS AND GEOTECHNICAL ENGINEER OF RECORD RECOMMENDATIONS ONCE PER WALL PRIOR TO PLACEMENT OF CONTROLLED FILL.
- D. ANCHOR UNIT ALIGNMENT AND INCLINATION SHALL BE VERIFIED BY SURVEYED WALL HORIZONTAL LOCATION PRIOR TO CONSTRUCTION AND CORRECT BLOCK PLACEMENT AGAINST THE LOWER BLOCK'S ALIGNMENT DEVICE DURING CONSTRUCTION. F GEOSYNTHETIC REINFORCEMENT TYPE SHALL BE VERIFIED PRIOR TO CONSTRUCTION WITH AN INSPECTION OF THE
- REINFORCEMENT SHALL BE CONTINUALLY OBSERVED DURING WALL CONSTRUCTION FOR COMPLIANCE WITH THE ANCHOR RETAINING WALL PLANS. F. BACKFILL SOIL SHALL BE VERIFIED IN COMPLIANCE WITH THE ANCHOR RETAINING WALL PLANS AND SOIL DESIGN PARAMETERS PRIOR TO AND PERIODICALLY DURING CONSTRUCTION. BACKFILL SOIL COMPACTION SHALL BE CONTINUOUSLY VERIFIED
- COMPACTED TO AT LEAST 90 PERCENT OF THE MAXIMUM DRY DENSITY AS DETERMINED BY ASTM D 1557 FOR EVERY 20-40 YARDS G. ALL DRAINAGE PROVISIONS SHALL BE VERIFIED IN COMPLIANCE WITH THE ANCHOR RETAINING WALL PLANS AND THE

GEOSYNTHETIC REINFORCEMENT DELIVERED TO THE SITE FOR WALL CONSTRUCTION. PLACEMENT OF GEOSYNTHETIC

- RECOMMENDATIONS OF THE GEOTECHNICAL ENGINEER OF RECORD AS CONSTRUCTED AND PRIOR TO BACKFILL. SEISMIC OR WIND RESISTANCE:
- A. THERE ARE NO ADDITIONAL SPECIAL INSPECTION REQUIREMENTS FOR SEISMIC OR WIND RESISTANCE PER CBC 1705. STRUCTURAL OBSERVATIONS:
- THERE ARE NO REQUIRED STRUCTURAL OBSERVATIONS PER CBC 1704.6. SPECIAL INSPECTION NOTES: A. THE SPECIAL INSPECTIONS IDENTIFIED ON PLANS ARE IN ADDITION TO, AND NOT A SUBSTITUTE FOR, THOSE INSPECTIONS REQUIRED TO BE PERFORMED BY THE BUILDING INSPECTOR.
- THE GEOTECHNICAL ENGINEER SHALL SUBMIT VERIFICATION TO M3 CIVIL ENGINEERING PRIOR TO THE START OF SEGMENTAL WALL CONSTRUCTION THAT ALL SOILS PROPOSED FOR CONSTRUCTION MEET THE REQUIREMENTS OF THIS SPECIFICATION.

IT IS THE RESPONSIBILITY OF THE OWNER OR OWNER'S REPRESENTATIVE TO VERIFY THE SOIL STRENGTH DESIGN PARAMETERS ARE REPRESENTATIVE OF THE SOILS AVAILABLE FOR WALL CONSTRUCTION. IF THE SOIL STRENGTH PARAMETERS ARE FOUND TO BE INCONSISTENT WITH THOSE USED BY THE ENGINEER OF RECORD. THIS DESIGN IS NO LONGER VALID AND IT IS THE RESPONSIBILITY OF THE OWNER OR OWNER'S REPRESENTATIVE TO NOTIFY THE ENGINEER OF RECORD SO THE RETAINING WALL SYSTEM CAN BE REDESIGNED. FAILURE TO NOTIFY THE ENGINEER OF RECORD MAY RESULT IN FAILURE OF THE RETAINING

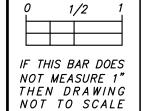
- SOIL DESIGN PARAMETERS A. REINFORCED SOIL:
- PHI = 30 DEGREES C= 0 PSF GAMMA = 125 PCF RETAINED SOIL: PHI = 30 DEGREES C= 0 PSF GAMMA = 125 PCF PHI = 30 DEGREES C= 0 PSF GAMMA = 125 PCF FOUNDATION SOIL:
- 3. DESIGN PEAK GROUND ACCELERATION (2/3*PGAm PER 2022 CBC AND ASCE 7-22): 0.28G 4. REINFORCED BACKFILL SHALL MEET SOIL CLASSIFICATION, GRADATION AND PLASTICITY INDEX AS STATED IN SECTION 6.5 THIS
- 5. GEOTECHNICAL PARAMETERS USED FOR DESIGN SHALL BE CONFIRMED BY GEOTECHNICAL ENGINEER PRIOR TO WALL
- CONSTRUCTION 6. LATERAL EARTH PRESSURES ARE DETERMINED USING RANKINE EARTH PRESSURE THEORY
- INTERNAL STABILITY OF WALLS MINIMUM FACTOR OF SAFETY ON GEOGRID STRENGTH = 1.50
- B. MINIMUM FACTOR OF SAFETY ON GEOGRID PULLOUT = 1.50
- PERCENT COVERAGE OF GEOGRID = 100% EXTERNAL STABILITY MINIMUM FACTOR OF SAFETY AGAINST BASE SLIDING = 1.50
- MINIMUM FACTOR OF SAFETY AGAINST OVERTURNING = 2.00 MINIMUM FACTOR OF SAFETY AGAINST SOIL BEARING OVERSTRESS = 2.00
- UNIFORM SURCHARGE = AS SHOWN ON STRUCTURAL CALCULATIONS BACKFILL SLOPE = AS SHOWN ON SITE PLAN AND STRUCTURAL CALCULATIONS GLOBAL STABILITY (TO BE CONFIRMED BY GEOTECHNICAL ENGINEER)
- MINIMUM FACTOR OF SAFETY AGAINST STATIC GLOBAL STABILITY = 1.50 B. MINIMUM FACTOR OF SAFETY AGAINST SEISMIC GLOBAL STABILITY = 1.15

ANCHOR WALL SYSTEM ICC-ES REPORT ESR-1959

19.0 APPLICABLE BUILDING CODE
ALL CONSTRUCTION SHALL CONFORM TO THE 2022 CALIFORNIA BUILDING CODE

, 00.1000		
20.0 SHEET INDEX		
SHEET G062.	TITLE SHEET AND NOTES	
SHEET G063.	ANCHOR WALL #1 PLAN VIEW	
SHEET G064.	ANCHOR WALL #2 PLAN VIEW	
SHEET G065.	ANCHOR WALL #3 PLAN VIEW	
SHEET G063.	ANCHOR WALL #4-#7 PLAN VIEW	
SHEET G064.	ANCHOR WALL #1 PROFILE	
SHEET G065.	ANCHOR WALL #1 PROFILE	
SHEET G066.	ANCHOR WALL #1 PROFILE	
SHEET G067.	ANCHOR WALL #1 PROFILE	
SHEET G068.	ANCHOR WALL #1 PROFILE	
SHEET G069.	ANCHOR WALL #1 PROFILE	
SHEET G070.	ANCHOR WALL #1 PROFILE	
SHEET G071.	ANCHOR WALL #1 PROFILE	
	ANCHOR WALL #1 PROFILE	
	ANCHOR WALL #2 PROFILE	
SHEET G074.	ANCHOR WALL #2 PROFILE	
SHEET G075.	ANCHOR WALL #2 PROFILE	
SHEET G076.		
	ANCHOR WALL #2 PROFILE	
SHEET G078.	ANCHOR WALL #3 PROFILE	
SHEET G079.	ANCHOR WALL #3 PROFILE	
SHEET G080.	ANCHOR WALL #3 PROFILE	
SHEET G081.	ANCHOR WALL #4 PROFILE	
SHEET G082.	ANCHOR WALL #5 PROFILE	
	ANCHOR WALL #6 PROFILE	
	ANCHOR WALL #7 PROFILE	
	TYPICAL WALL SECTION	
SHEET G086.	CONSTRUCTION DETAILS	

ANCHOR RETAINING WALL DESIGNED FOR INTERNAL AND EXTERNAL STABILITY ONLY. GEOTECHNICAL ENGINEER OF RECORD TO CONFIRM SITE GLOBAL STABILITY.



RETAINING WALL PLAN SHEET FOR OTAY RANCH VILLAGE 8 EAST

CHULA VISTA TRACT NO. 22-0005

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DEVELOPMENT SERVICES DEPARTMENT	PROJECT	PROJECT NO.: XXXX	
Approved:	. TOTAL SHE	TOTAL SHEETS: 14	
By:Principal Civil Engineer	1796 -	1796 — 6340	
Submitted:	NAD83 CO	NAD83 COORDINATES	
By:	. 154 –	154 - 1773	
Planning: Landscape:	LAMBERT CO	LAMBERT COORDINATES	
AS BUILT	DRAWING NO.		
CONTRACTOR:	_	G062	
INSPECTOR: DATE COMPLETED:	_		

M3 CIVIL ENGINEERING, INC PO BOX 923 OCEANSIDE, CA 92049 760-802-1772 MATT@M3CE.COM



PREPARED FOR THE EXCLUSIVE USE OF

MMM

THE CITY OF CHULA VISTA

MMM Plans Prepared Under Supervision Of: – R.C.E. No. <u>68429</u> MATTHEW M. MERRITT

REVISIONS

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SIGNATURE

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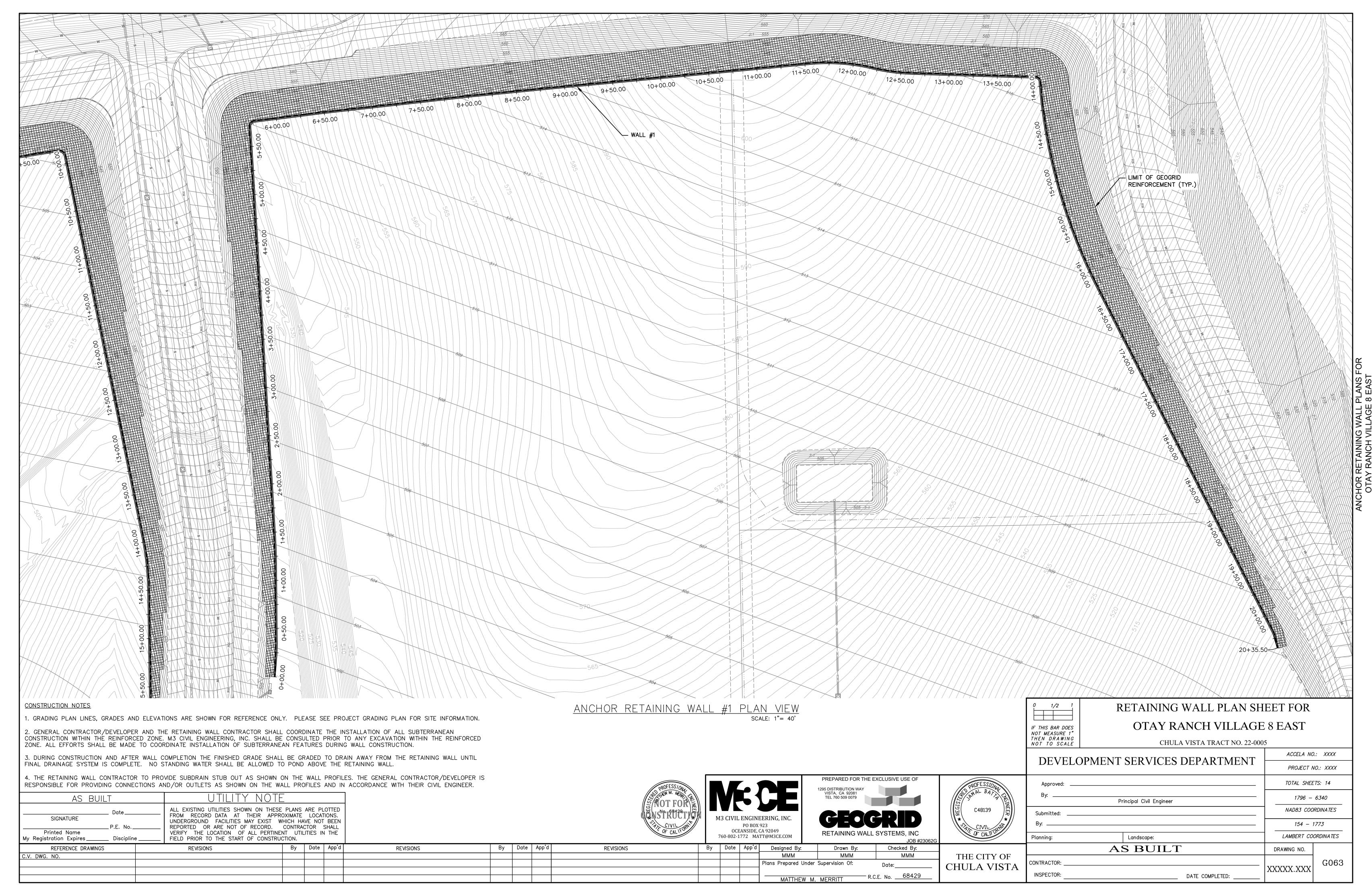
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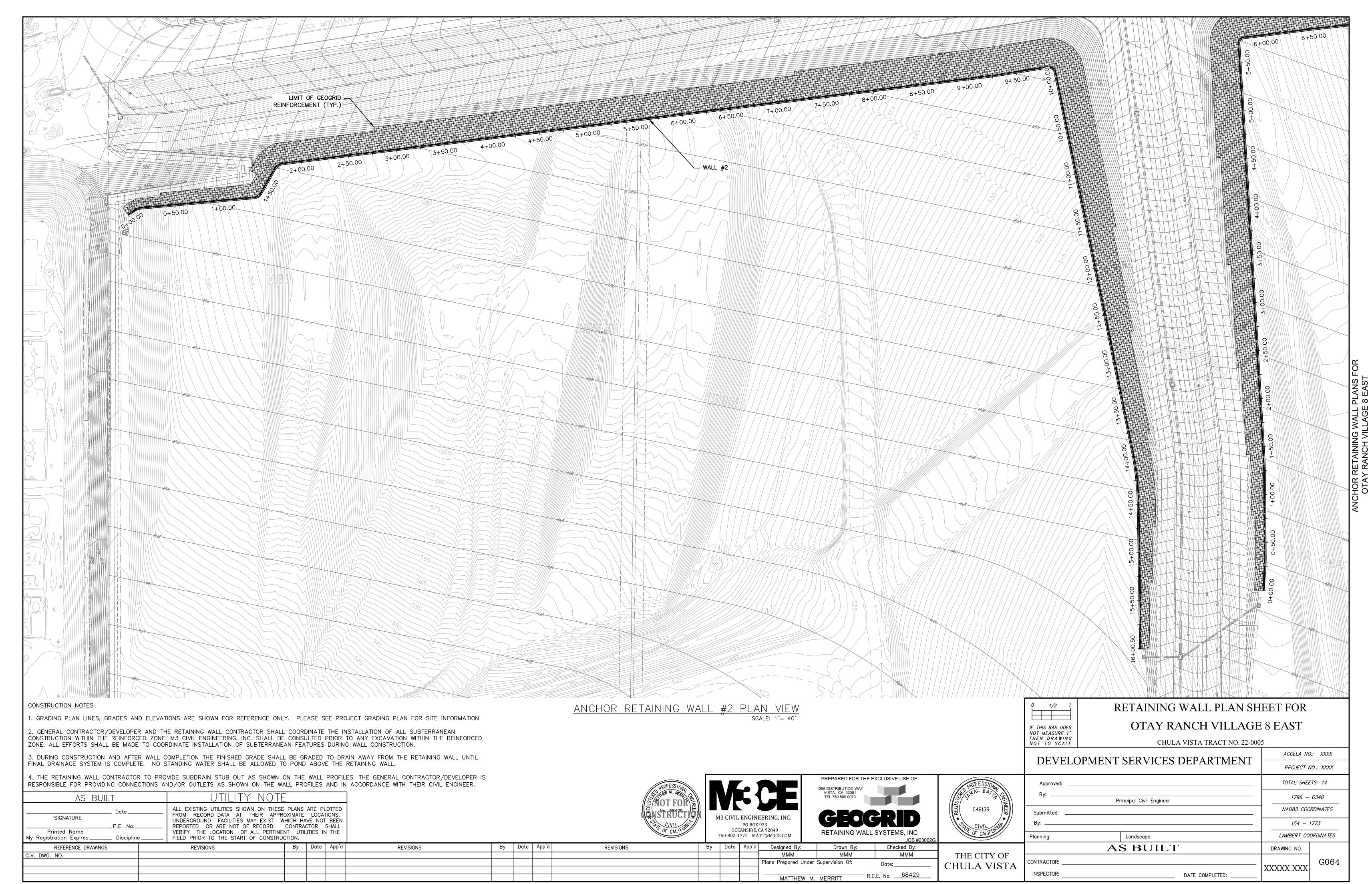
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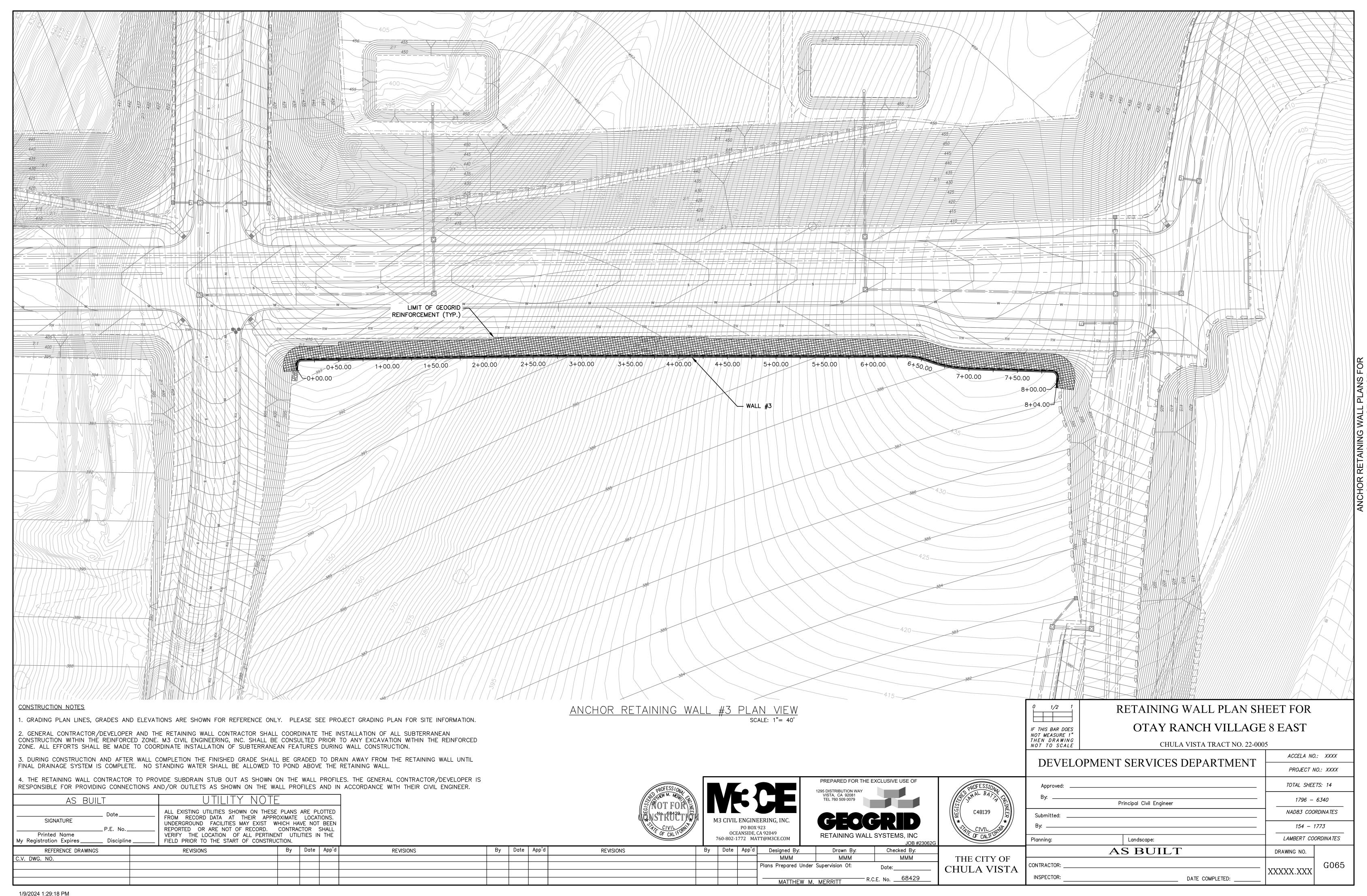
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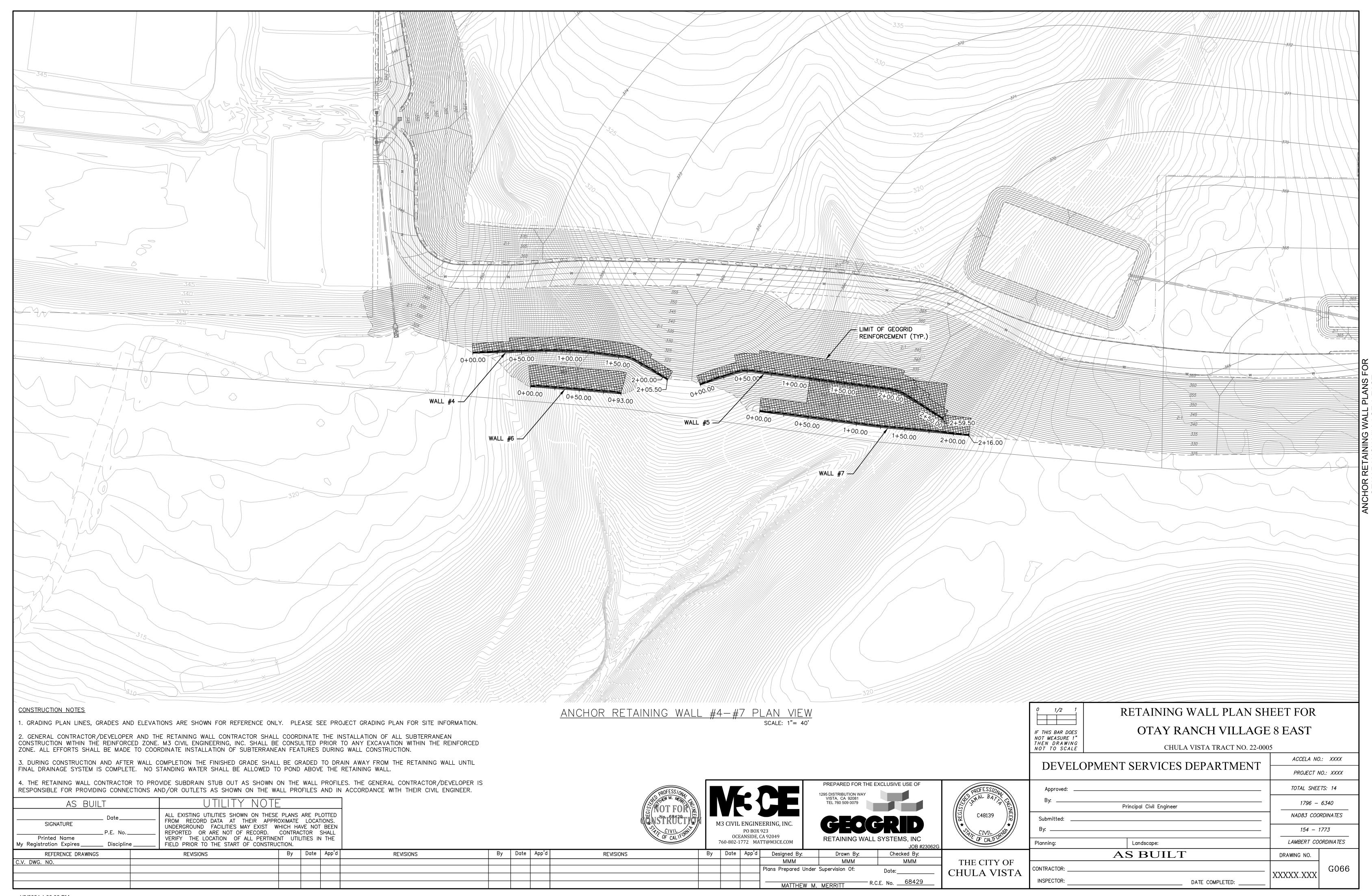
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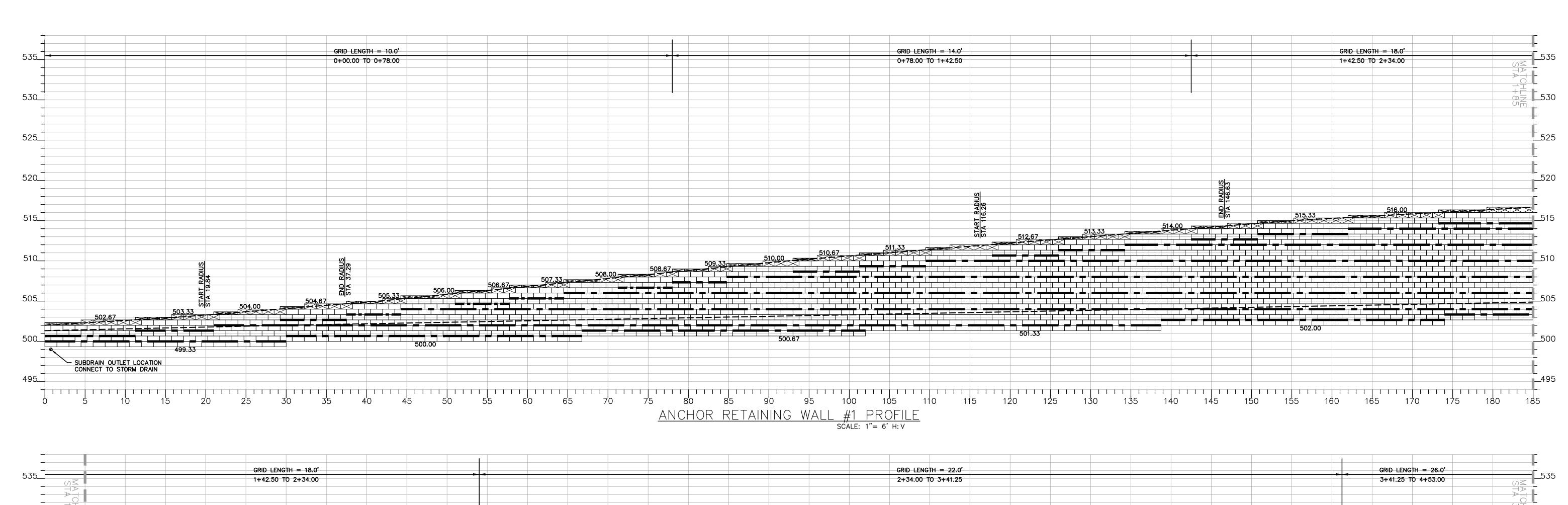
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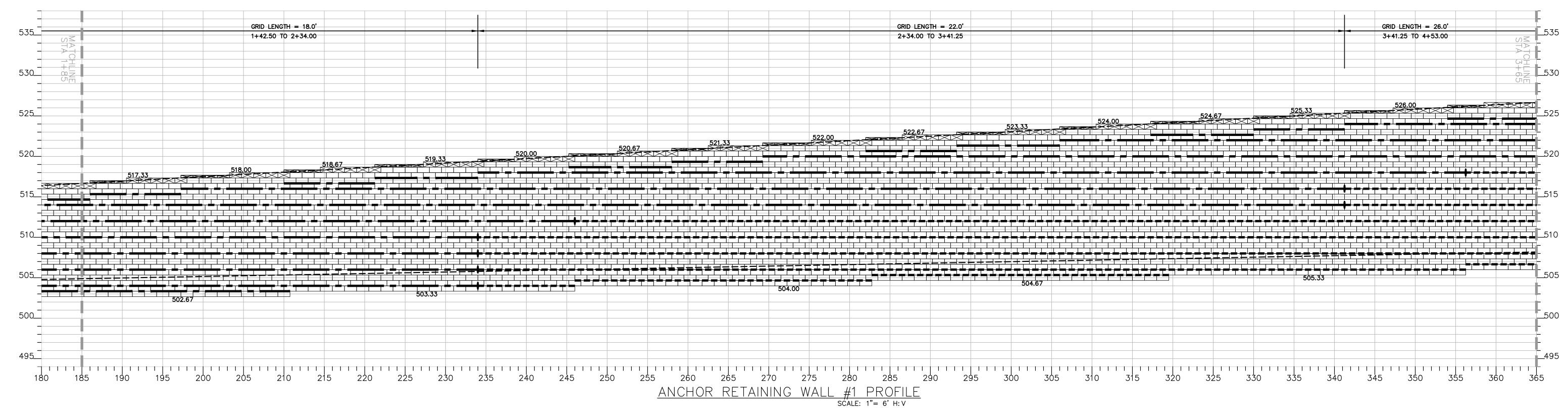














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By Date App'd Designed By:

Drawn By:

MMM

Plans Prepared Under Supervision Of:

MATTHEW M. MERRITT

Checked By:

— R.C.E. No. <u>68429</u>

MMM

Principal Civil Engineer Landscape: AS BUILT DRAWING NO. THE CITY OF CONTRACTOR: CHULA VISTA XXXXX.XXX DATE COMPLETED:

DEVELOPMENT SERVICES DEPARTMENT

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RETAINING WALL PLAN SHEET FOR

OTAY RANCH VILLAGE 8 EAST

ACCELA NO.: XXXX

PROJECT NO.: XXXX

TOTAL SHEETS: 14

1796 - 6340

NAD83 COORDINATES

154 – 1773

LAMBERT COORDINATES

CHULA VISTA TRACT NO. 22-0005

C.V. DWG. NO.

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FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

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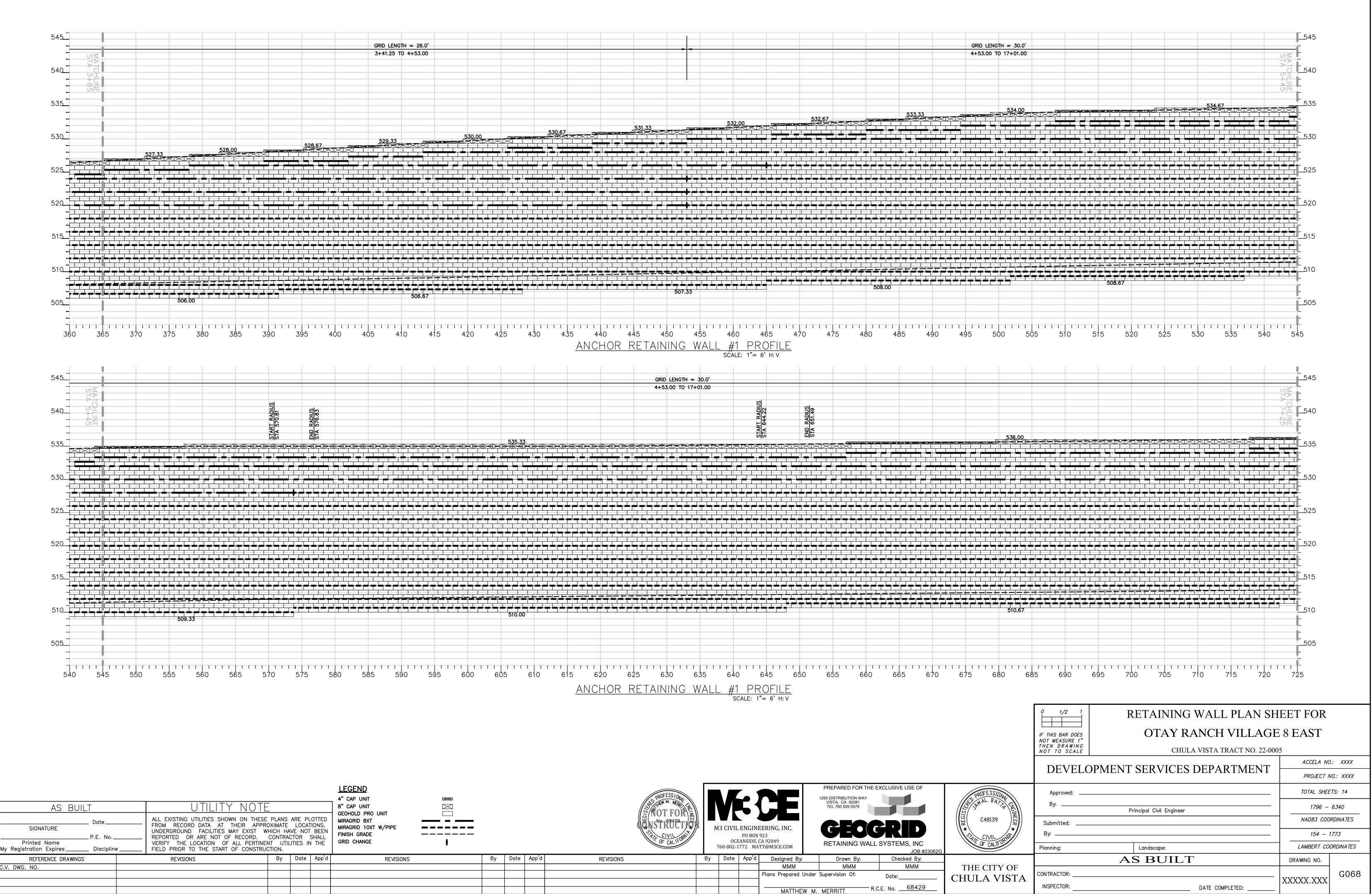
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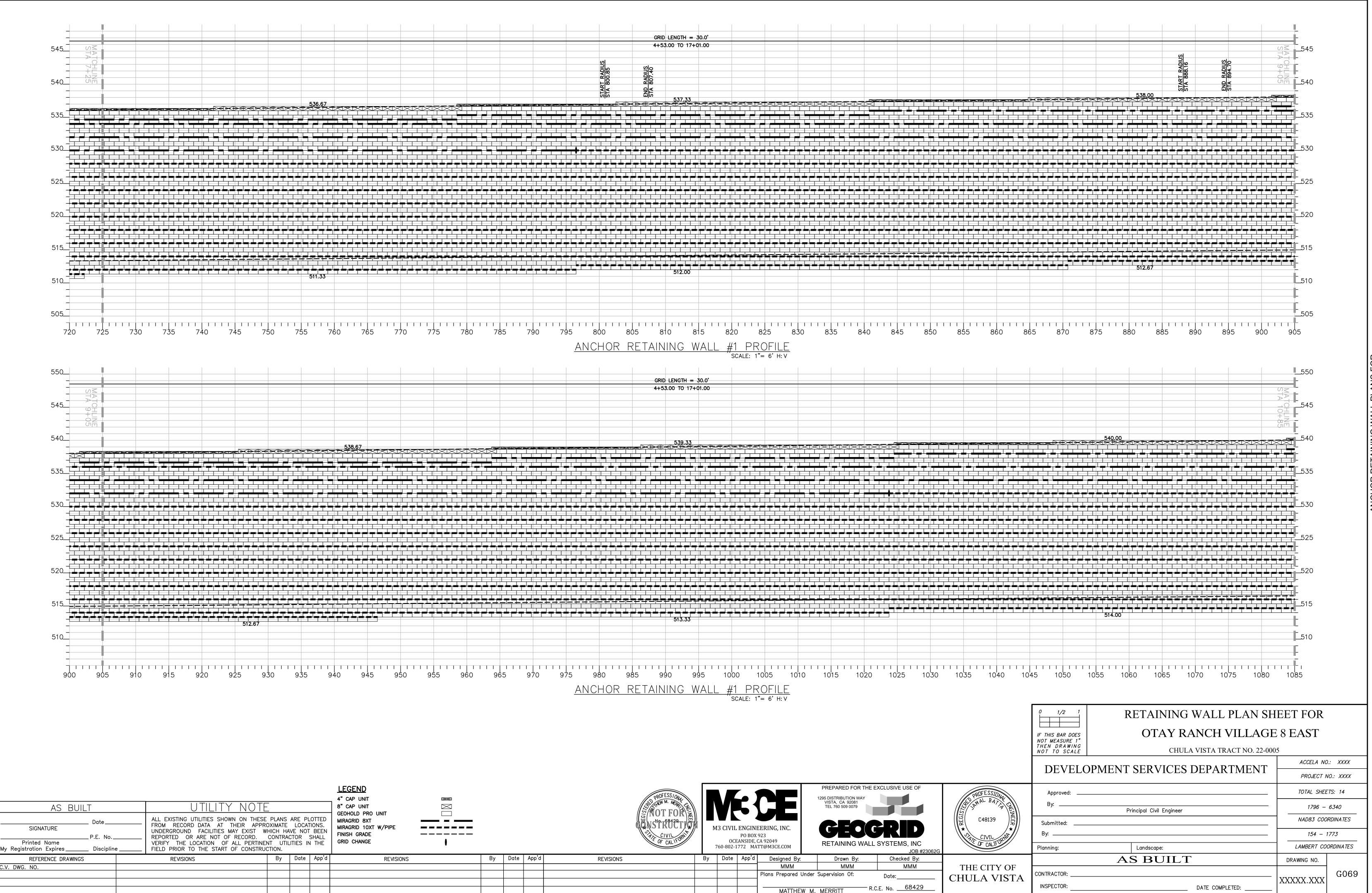
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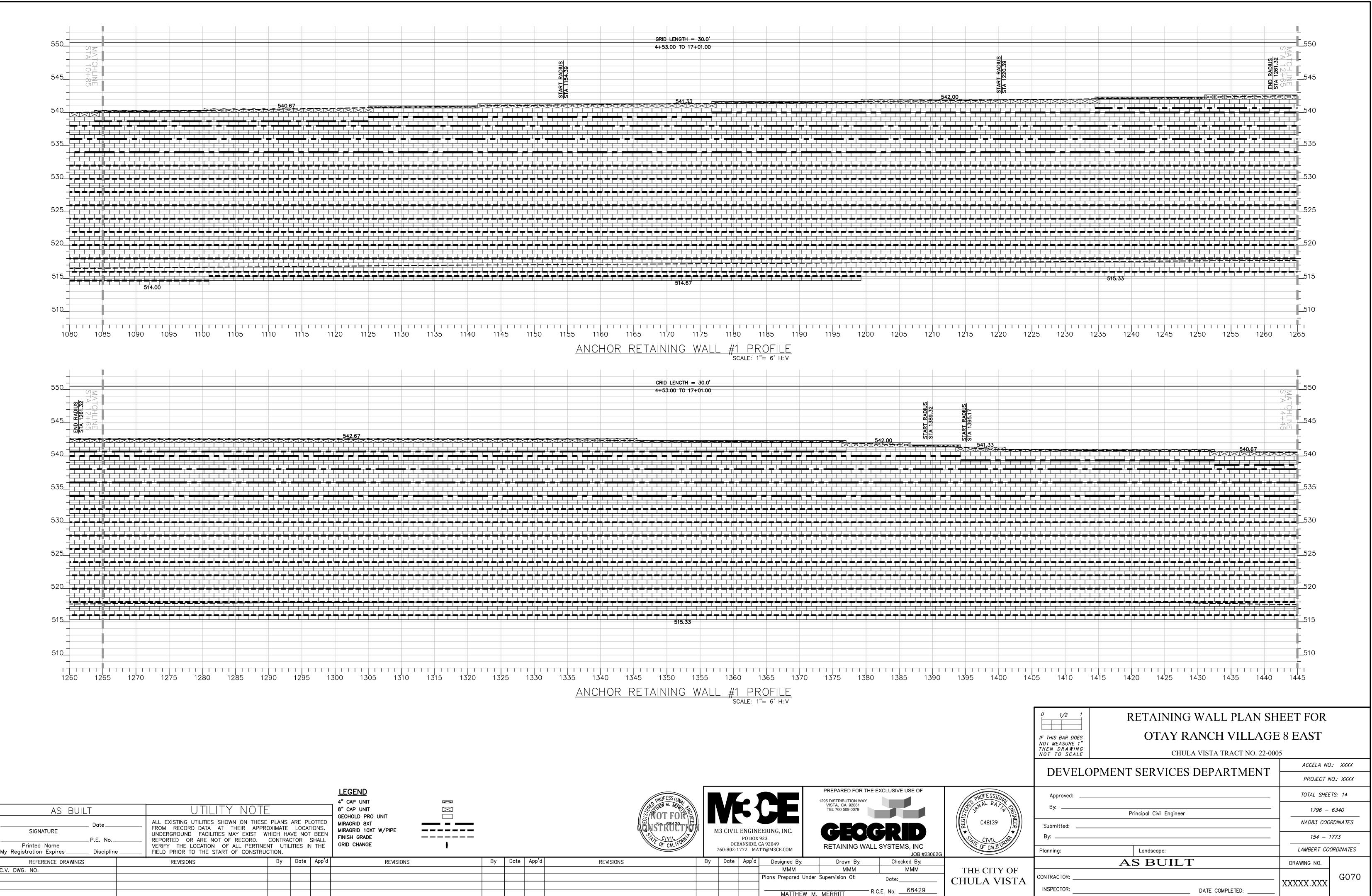
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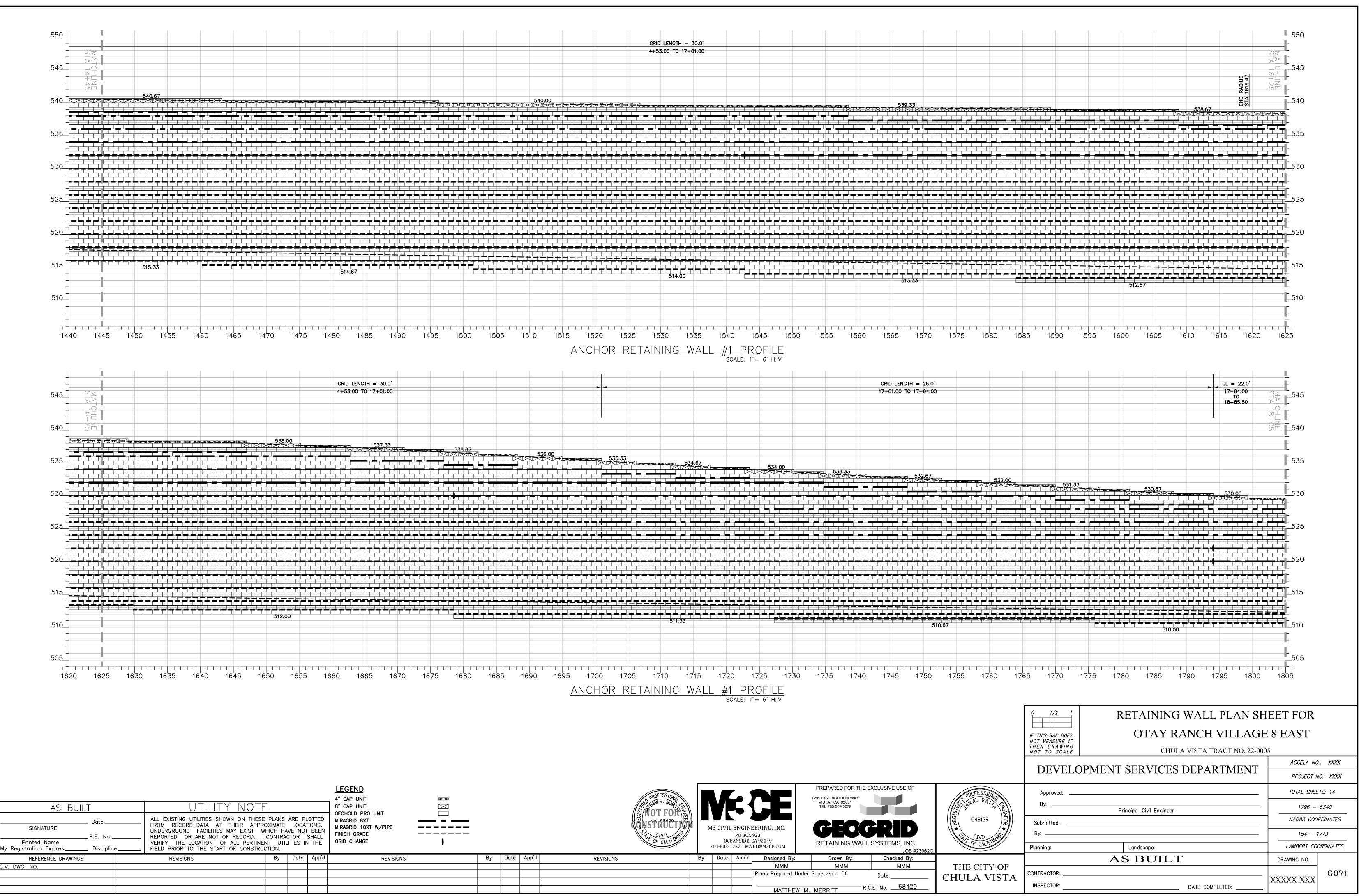
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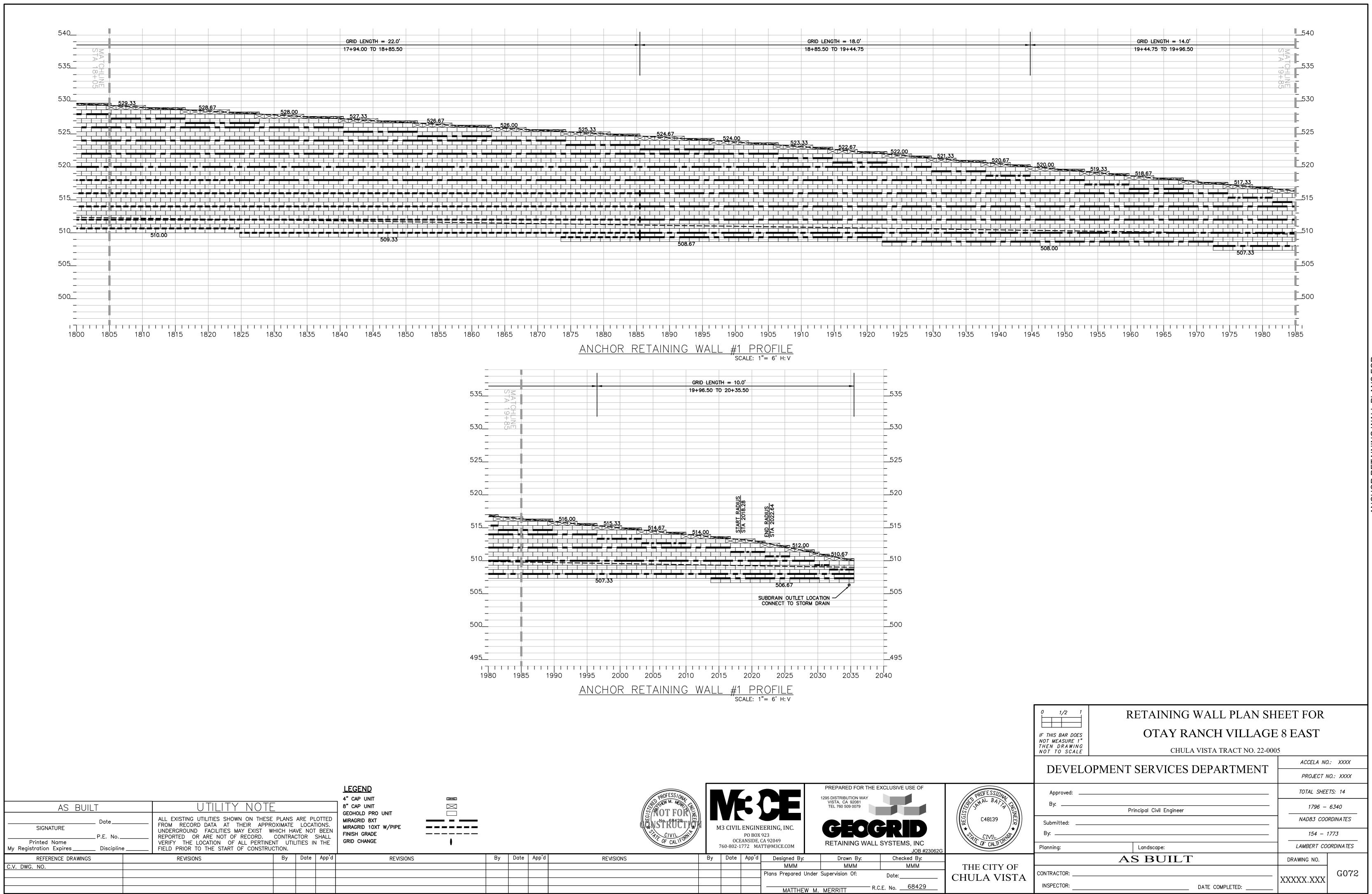
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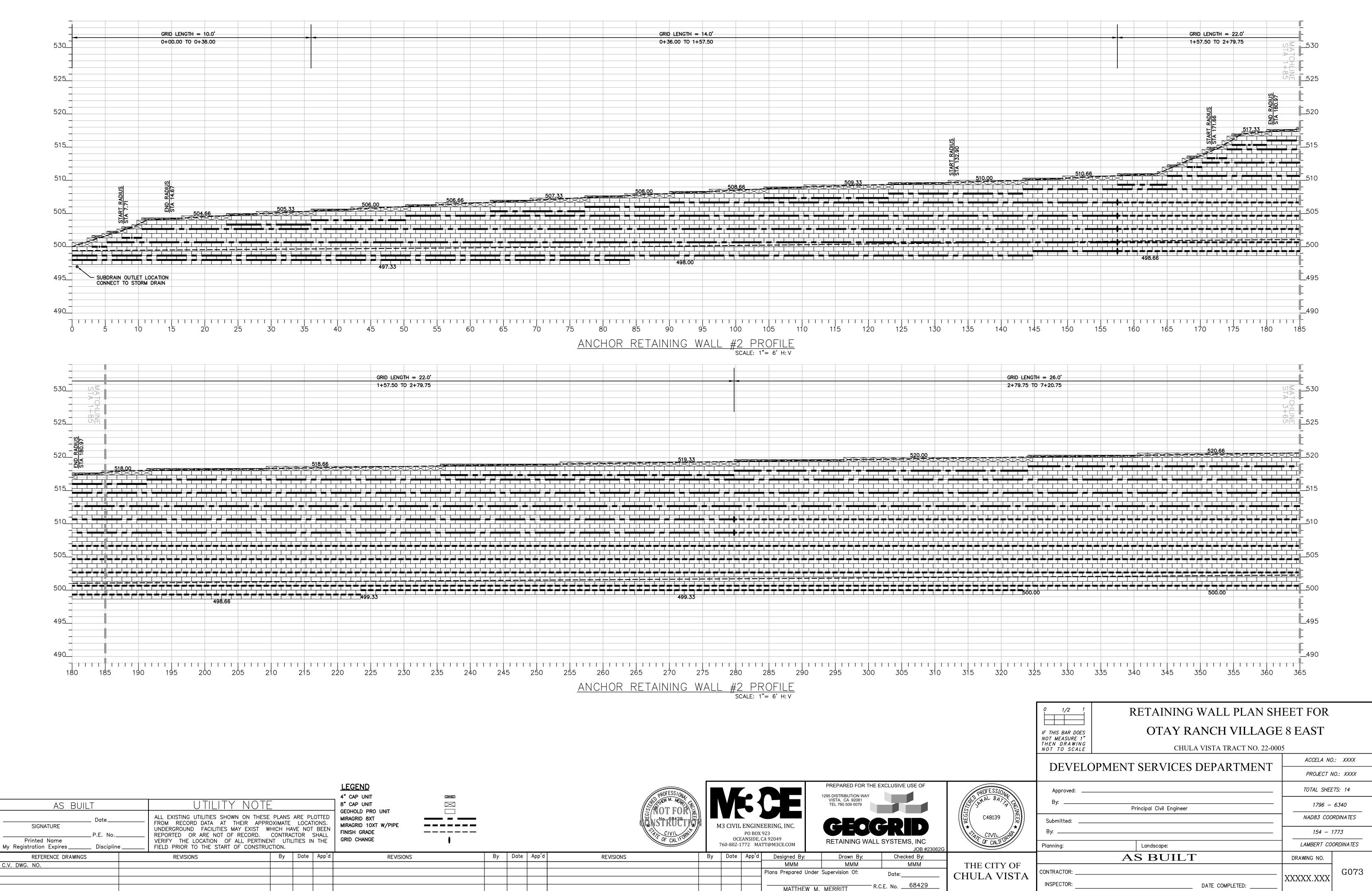


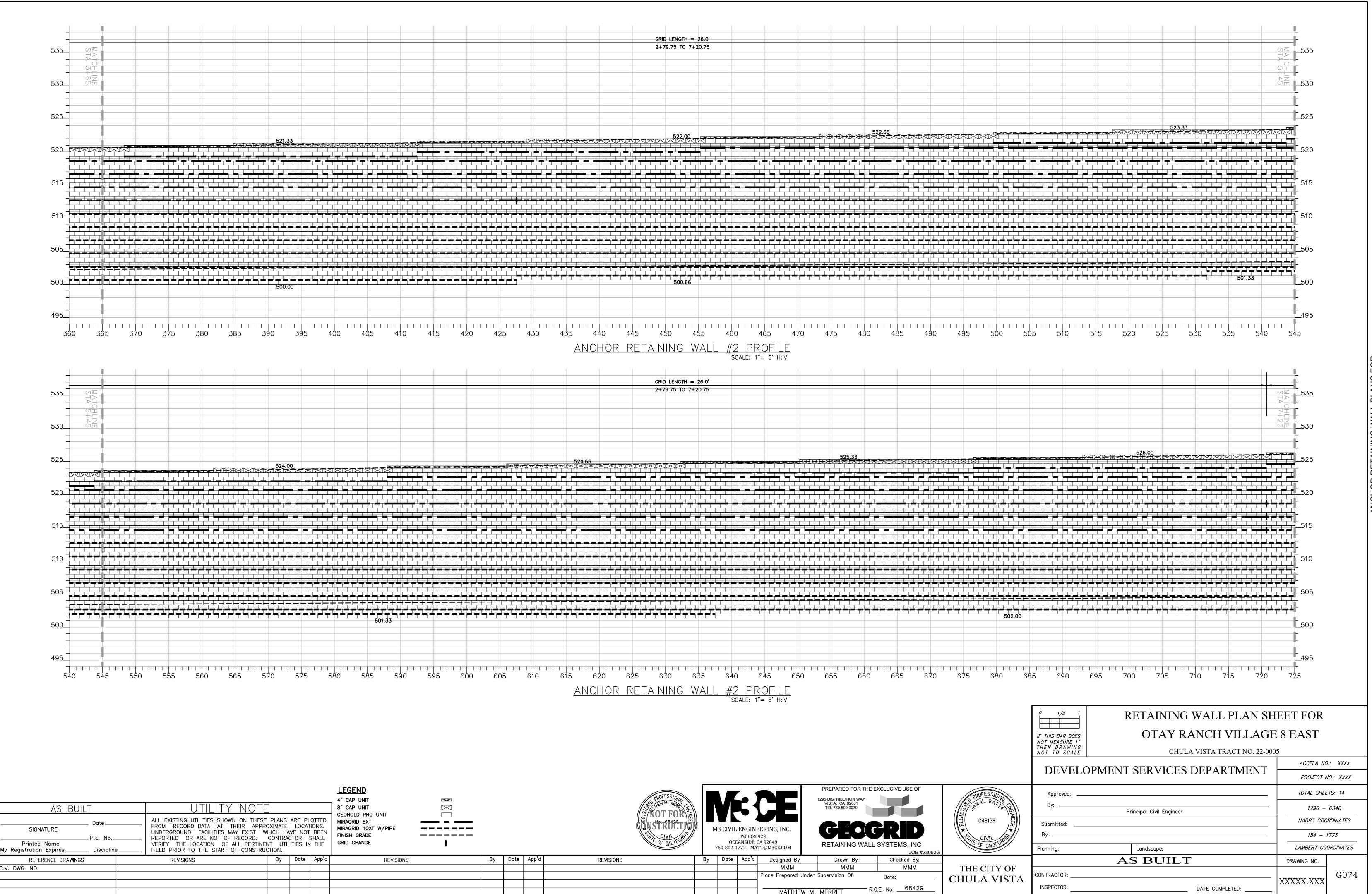


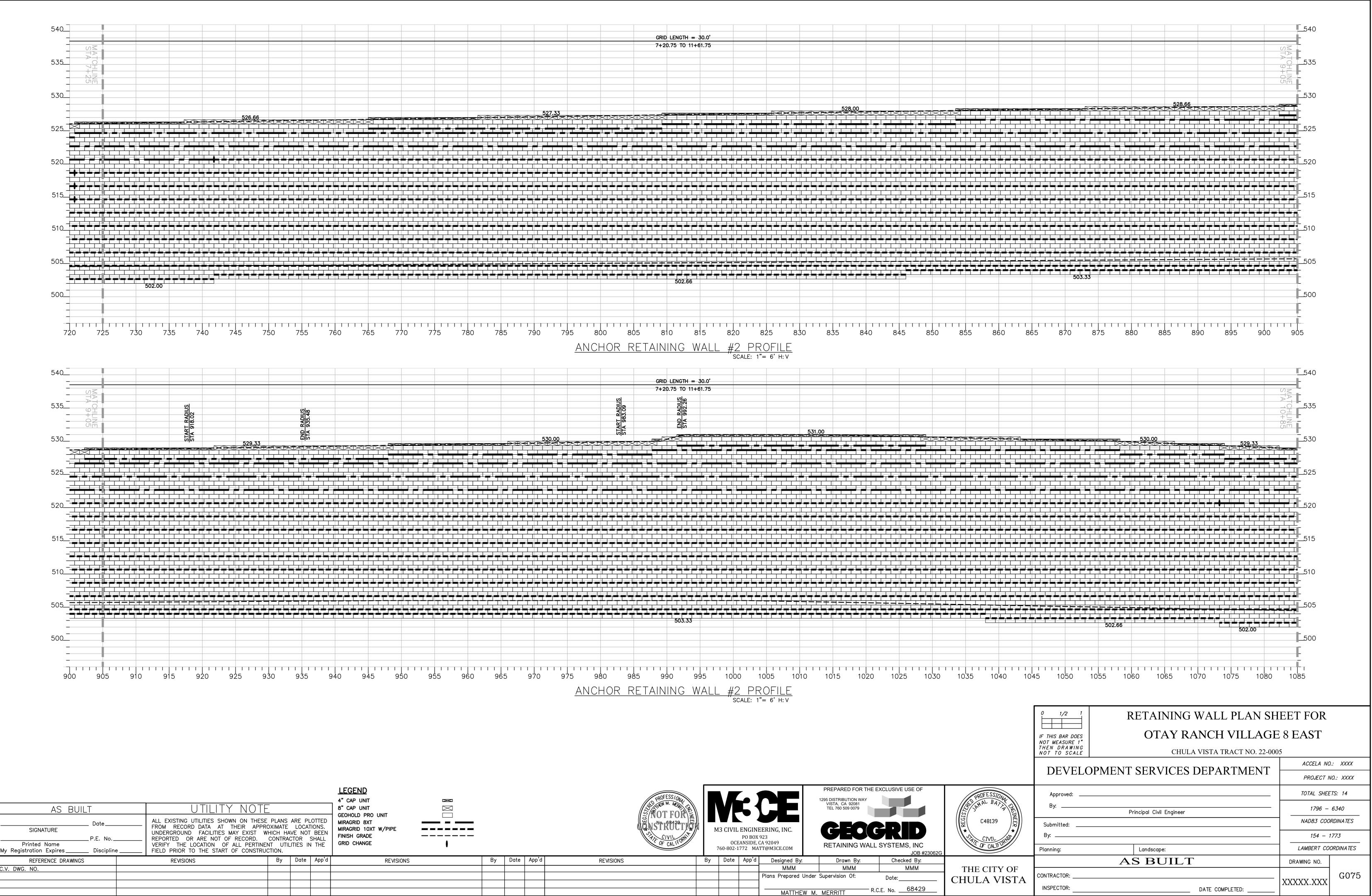


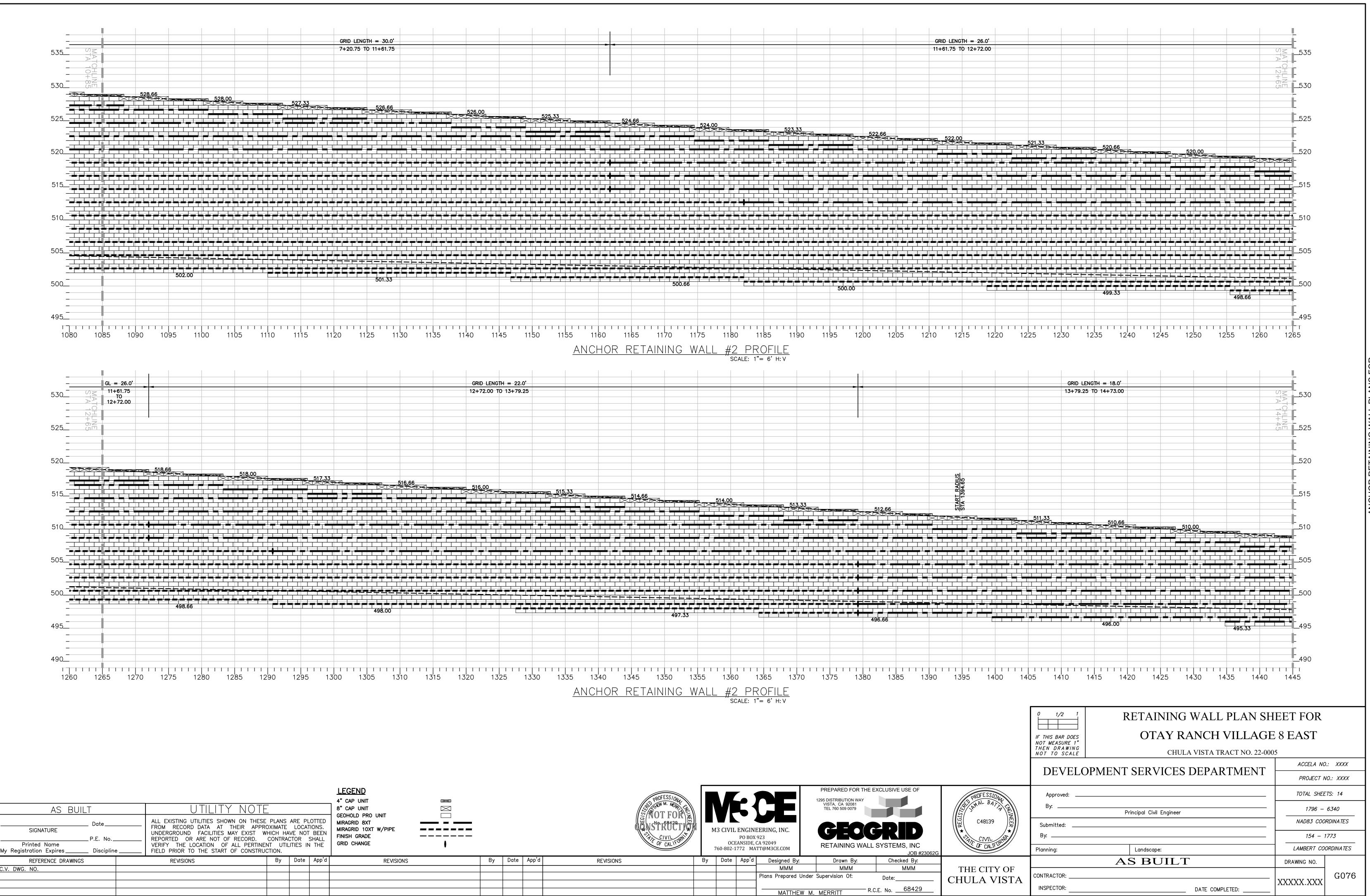


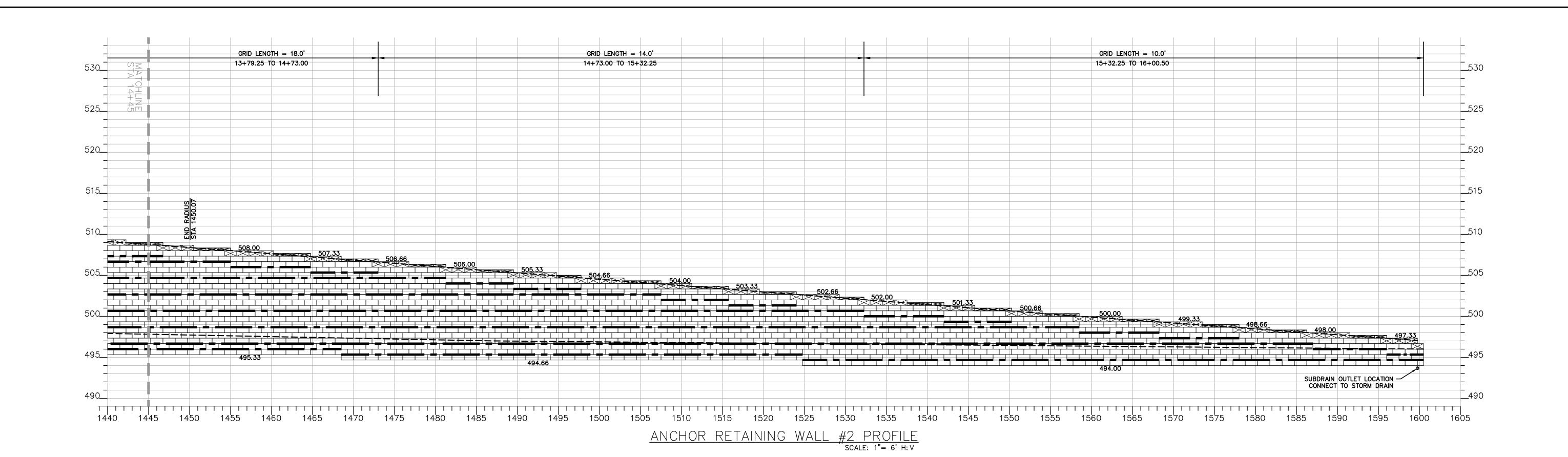


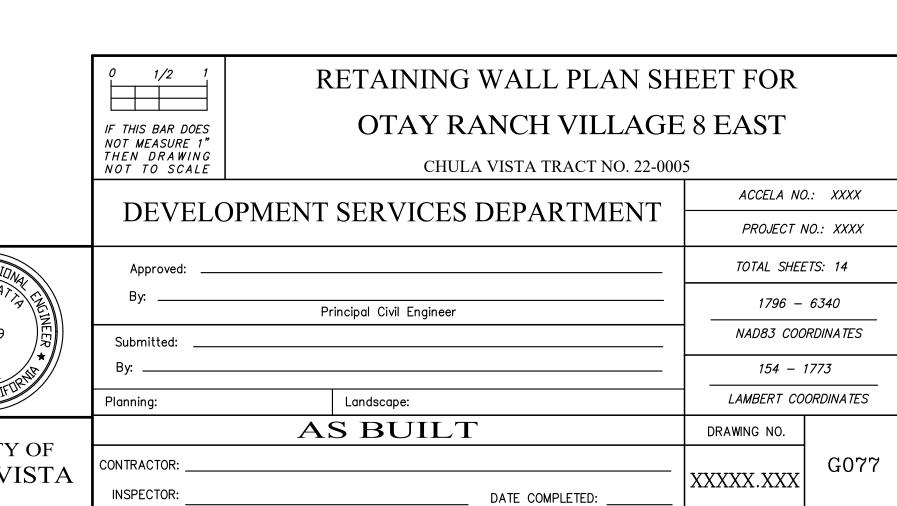












4" CAP UNIT AS BUILT 8" CAP UNIT GEOHOLD PRO UNIT ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED MIRAGRID 8XT FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.
UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN MIRAGRID 10XT W/PIPE SIGNATURE FINISH GRADE _____ REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE GRID CHANGE Printed Name My Registration Expires_ FIELD PRIOR TO THE START OF CONSTRUCTION.

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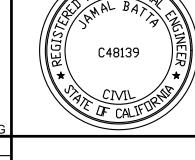
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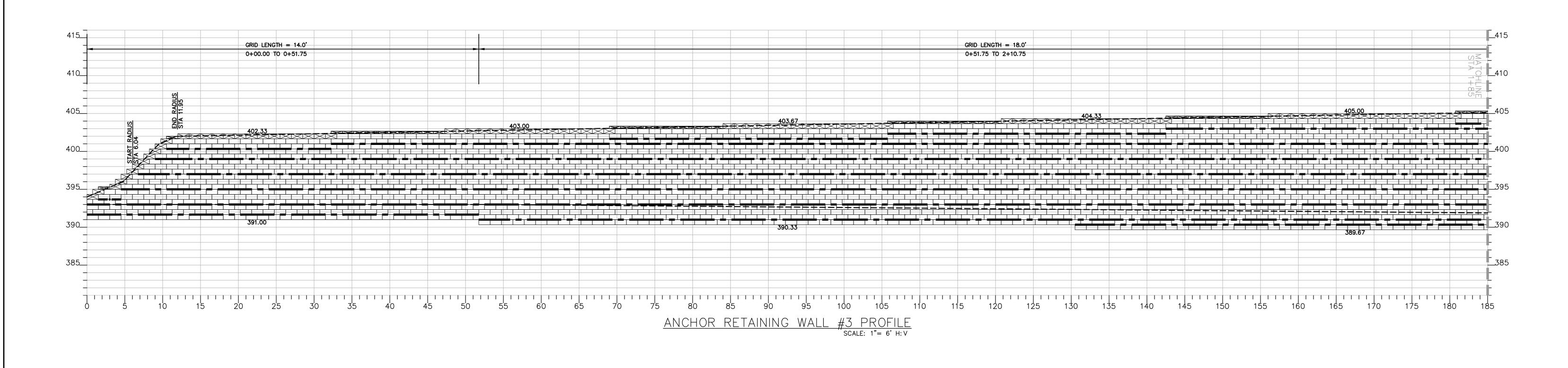
MATTHEW M. MERRITT

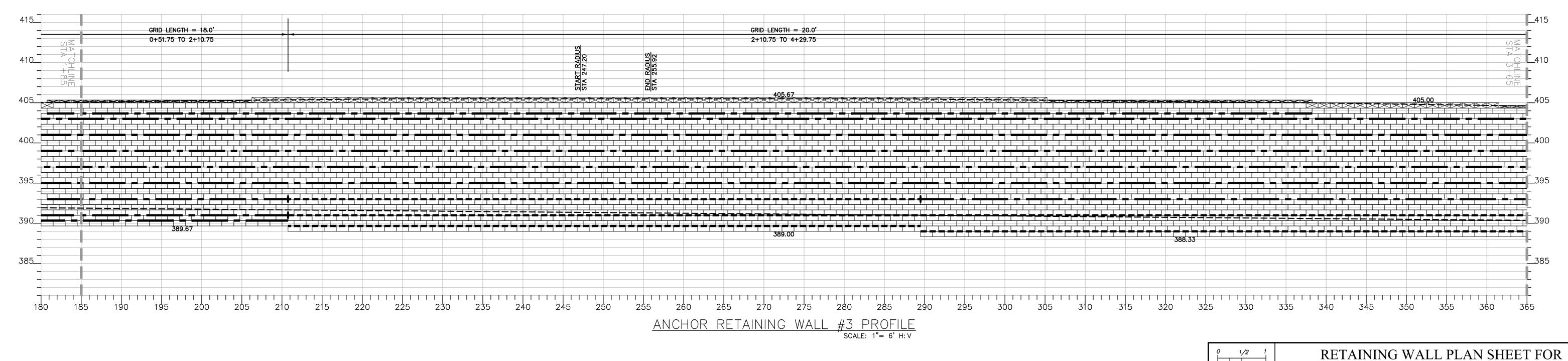


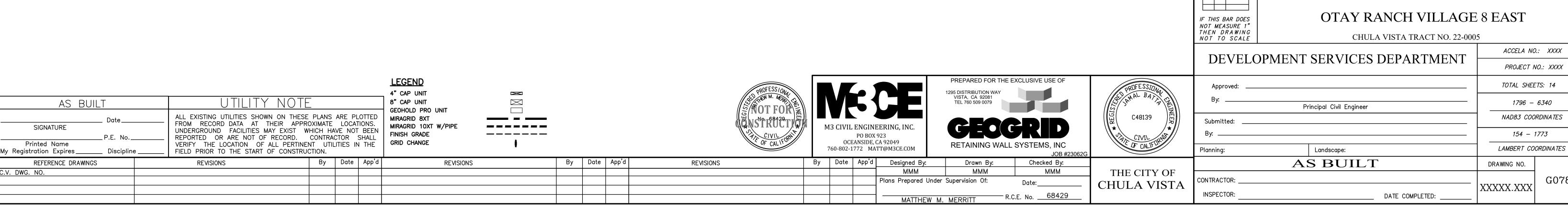
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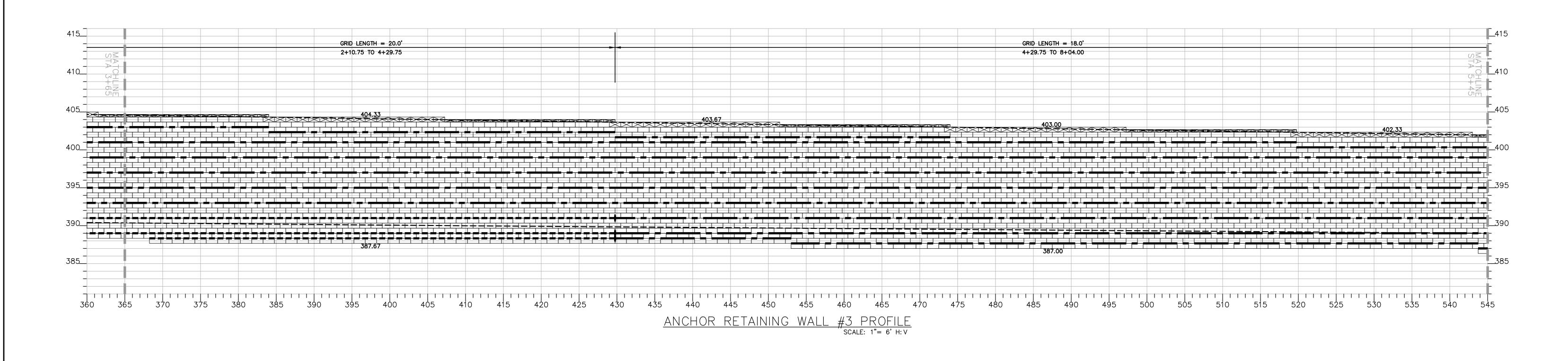
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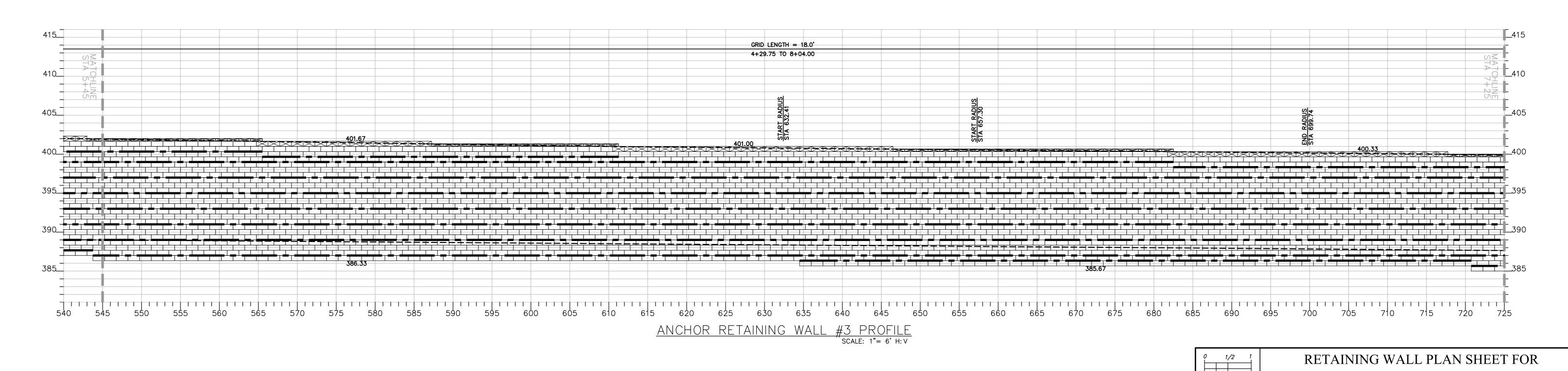
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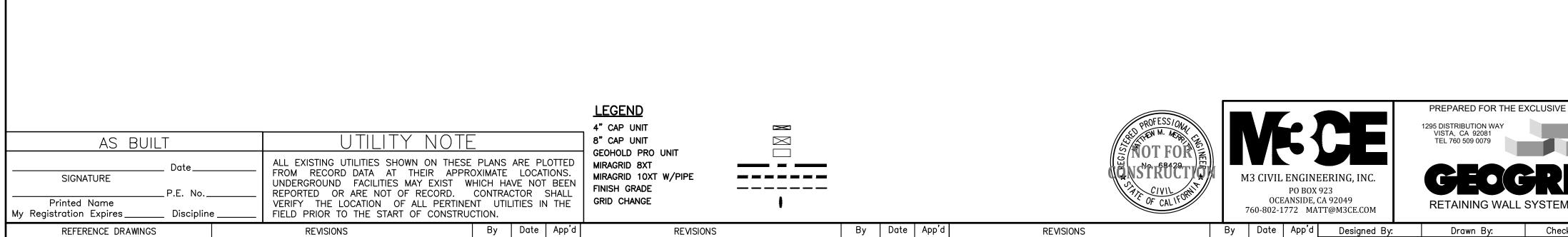












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MATTHEW M. MERRITT

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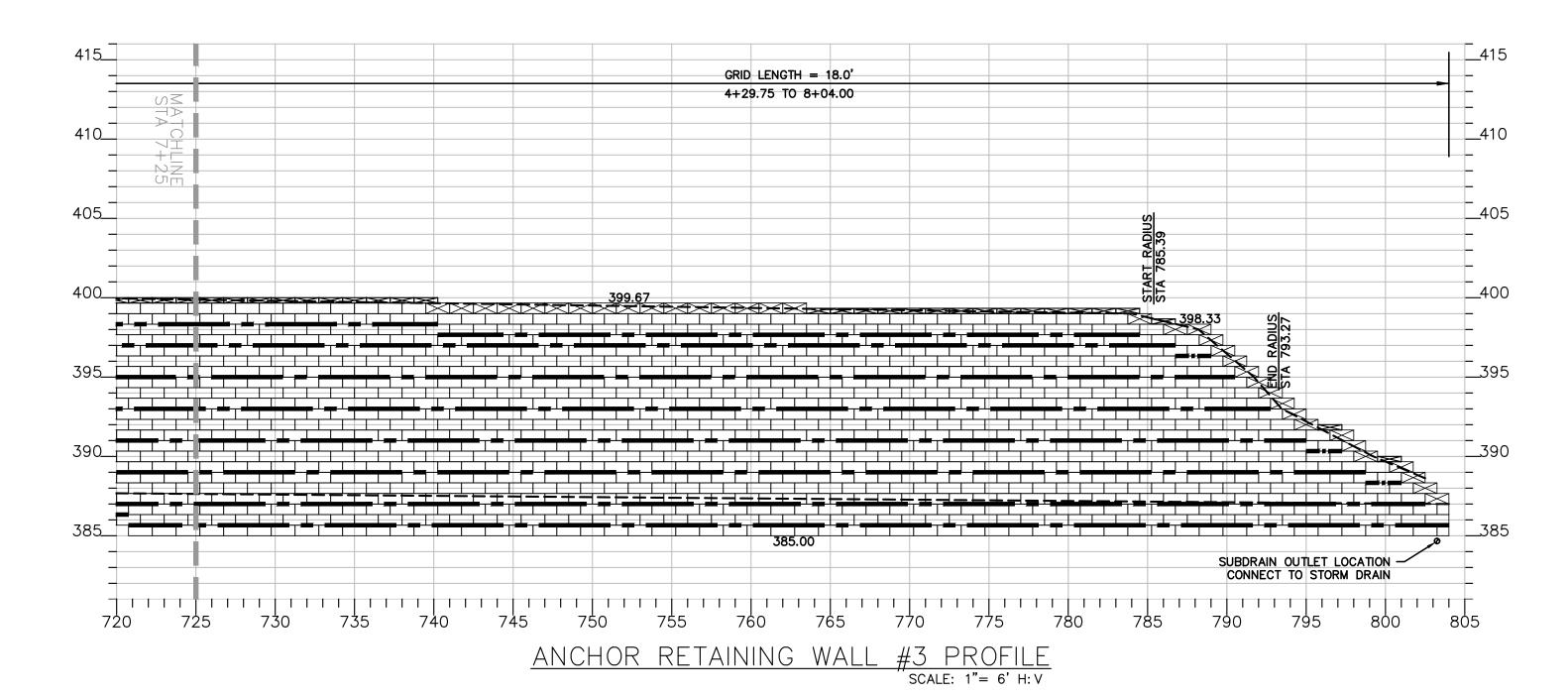
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	Ву:	r:Principal Civil Engineer		1796 — 6340	
	Submitted:		NAD83 COO	RDINATES	
	Ву:		154 – 1	1773	
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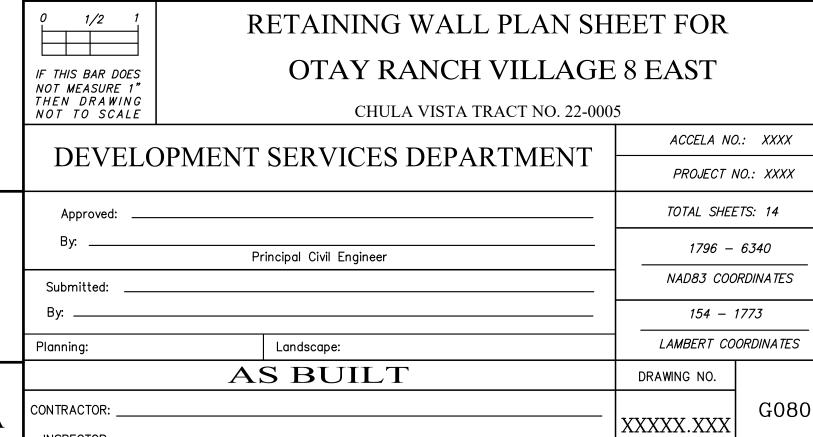
OTAY RANCH VILLAGE 8 EAST

CHULA VISTA TRACT NO. 22-0005

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C.V. DWG. NO.





DATE COMPLETED: _

4" CAP UNIT 8" CAP UNIT

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE

By Date App'd

FIELD PRIOR TO THE START OF CONSTRUCTION.

REVISIONS

GEOHOLD PRO UNIT MIRAGRID 8XT MIRAGRID 10XT W/PIPE FINISH GRADE GRID CHANGE

REVISIONS

By Date App'd



REVISIONS



By Date App'd Designed By:



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— R.C.E. No. <u>68429</u>

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Plans Prepared Under Supervision Of:

MATTHEW M. MERRITT

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	THE CITY OF

CHULA VISTA

INSPECTOR:

C.V. DWG. NO.

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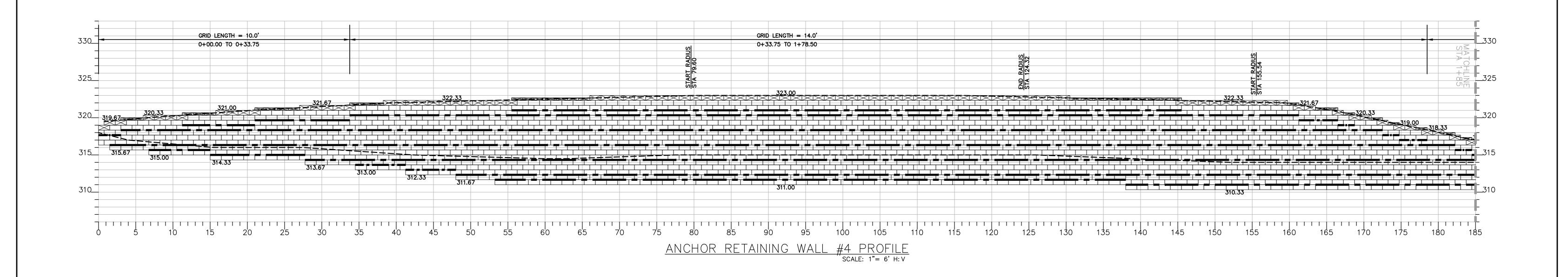
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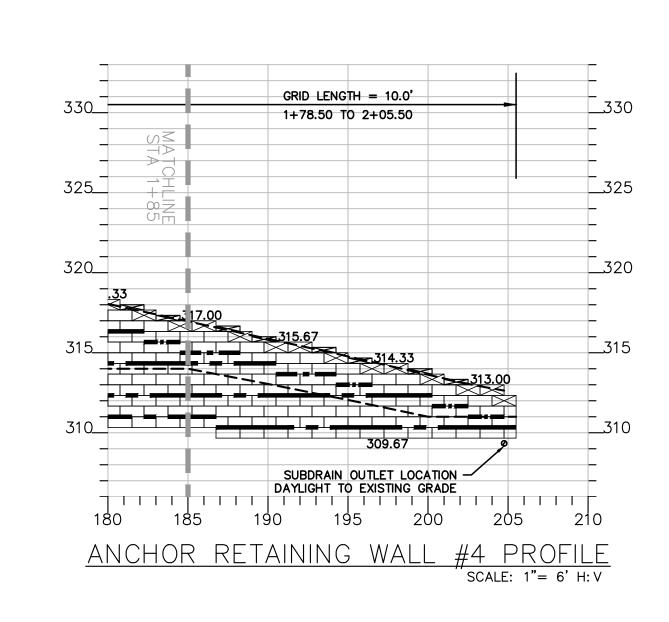
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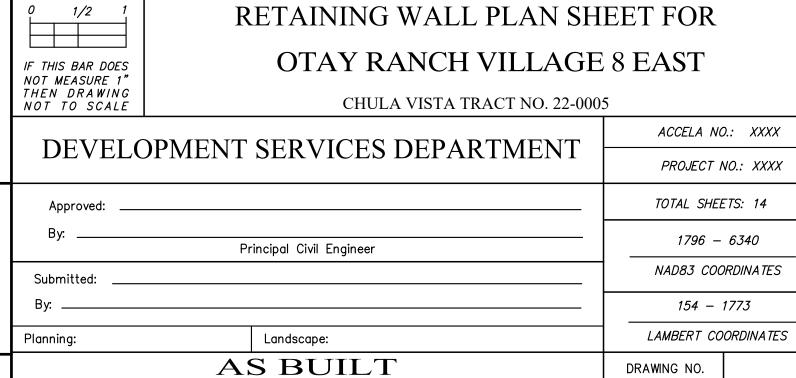
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DATE COMPLETED: _

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE FIELD PRIOR TO THE START OF CONSTRUCTION.

By Date App'd

REVISIONS

4" CAP UNIT 8" CAP UNIT GEOHOLD PRO UNIT MIRAGRID 8XT MIRAGRID 10XT W/PIPE FINISH GRADE GRID CHANGE

REVISIONS

By Date App'd



REVISIONS





— R.C.E. No. <u>68429</u>

MMM

Plans Prepared Under Supervision Of:

MATTHEW M. MERRITT

CONTRACTOR:

INSPECTOR:

THE CITY OF
CHULA VISTA

C.V. DWG. NO.

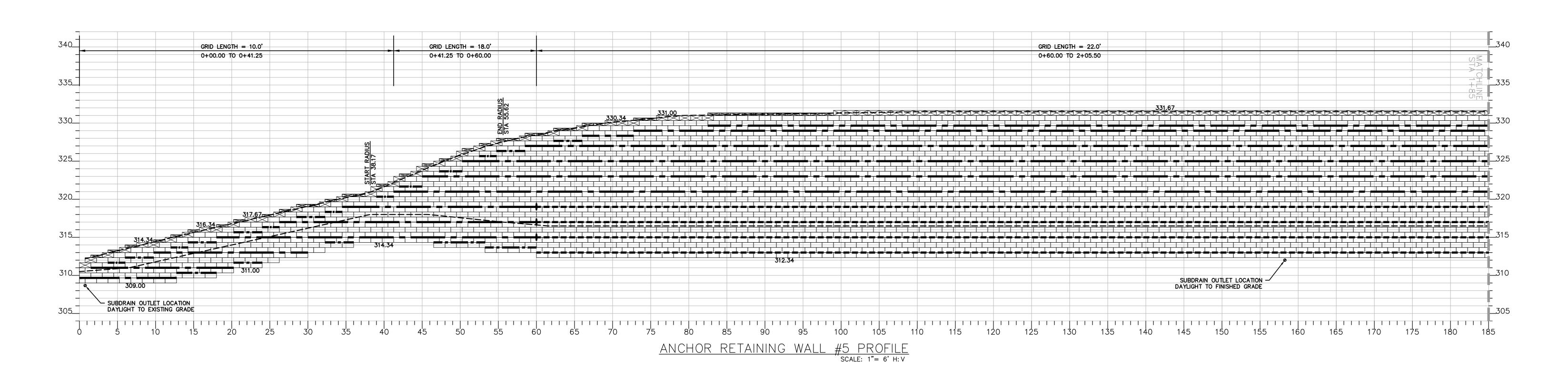
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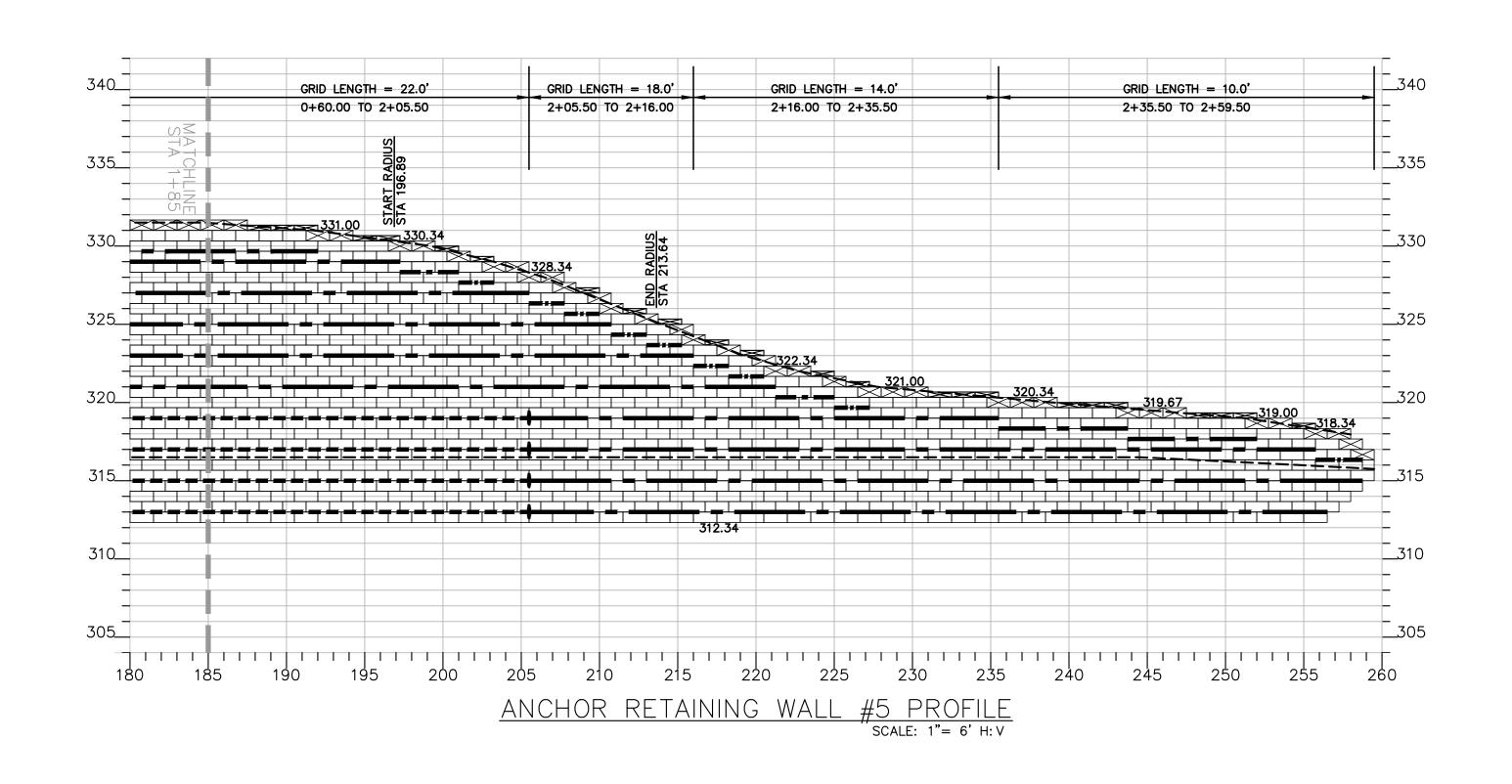
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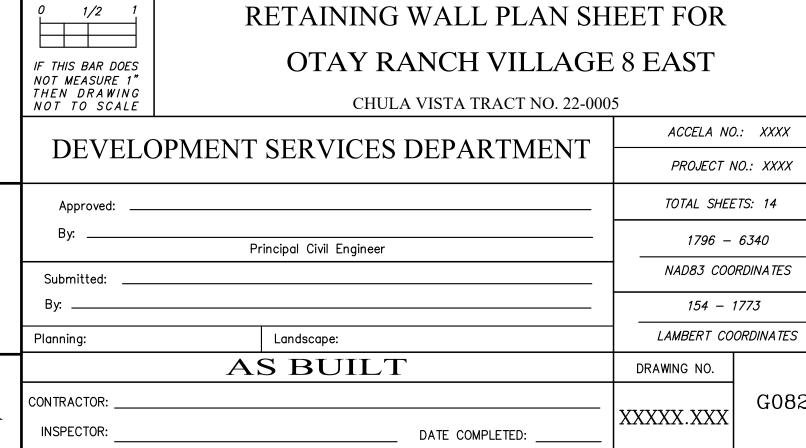
REFERENCE DRAWINGS

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AS BUILT







AS BUILT ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

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4" CAP UNIT GEOHOLD PRO UNIT MIRAGRID 8XT MIRAGRID 10XT W/PIPE FINISH GRADE GRID CHANGE REVISIONS

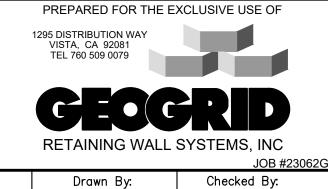
By Date App'd

REVISIONS



By Date App'd Designed By:





— R.C.E. No. <u>68429</u>

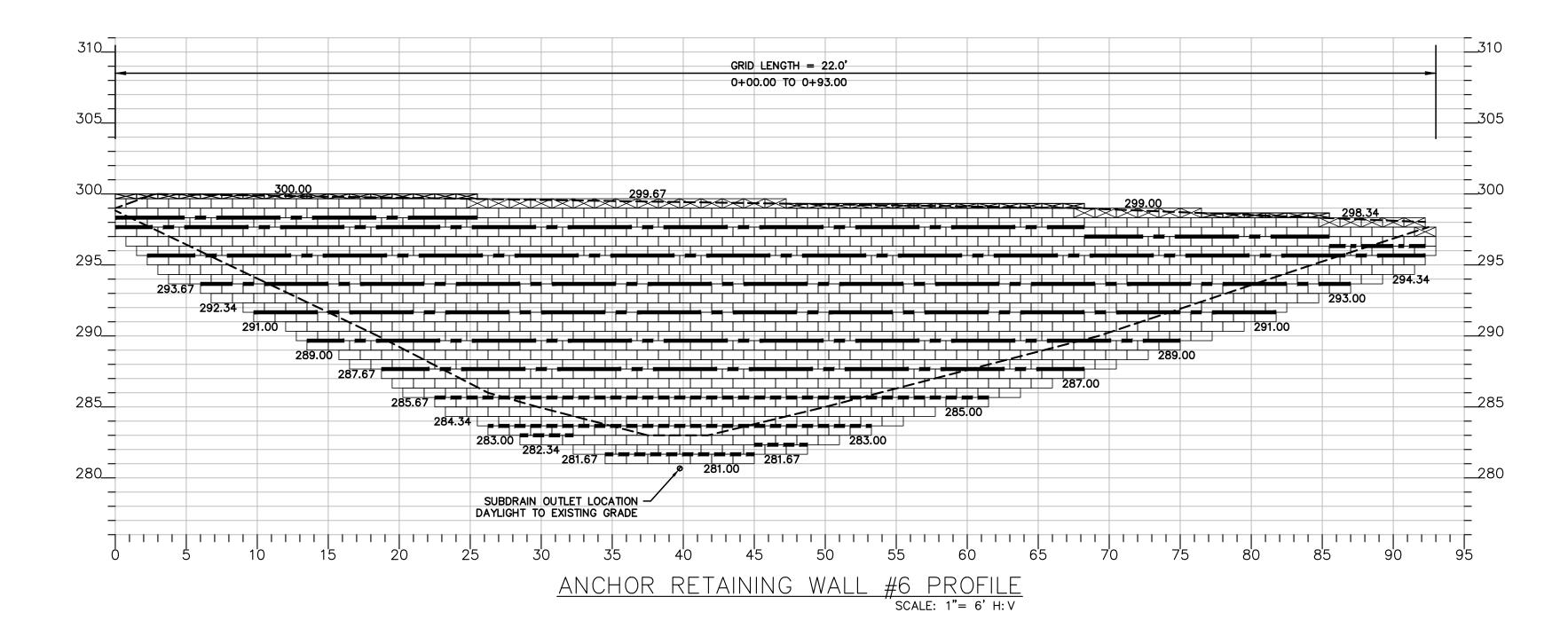
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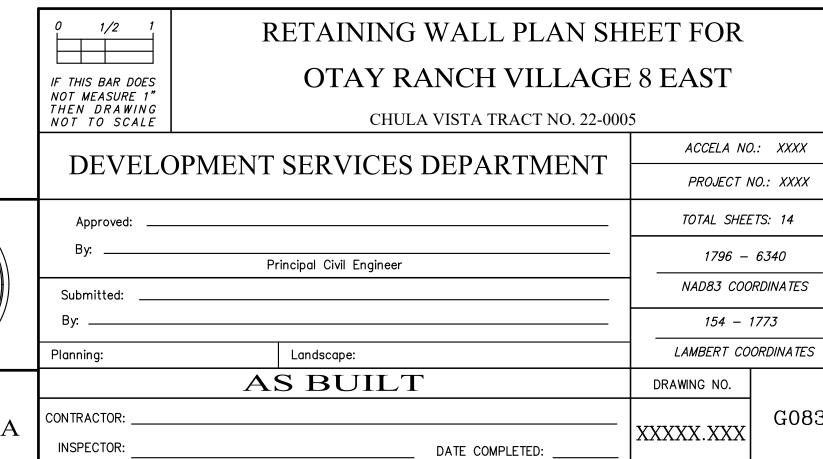
Plans Prepared Under Supervision Of:

MATTHEW M. MERRITT

]	THE CITY OF
CI	HULA VISTA

C.V. DWG. NO.





4" CAP UNIT 8" CAP UNIT GEOHOLD PRO UNIT ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE MIRAGRID 8XT MIRAGRID 10XT W/PIPE FINISH GRADE GRID CHANGE FIELD PRIOR TO THE START OF CONSTRUCTION.

By Date App'd

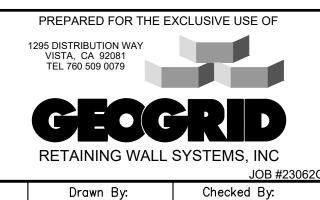
REVISIONS

By Date App'd



REVISIONS





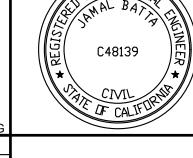
MMM

— R.C.E. No. <u>68429</u>

MMM

Plans Prepared Under Supervision Of:

MATTHEW M. MERRITT



THE CITY OF CHULA VISTA

C.V. DWG. NO.

SIGNATURE

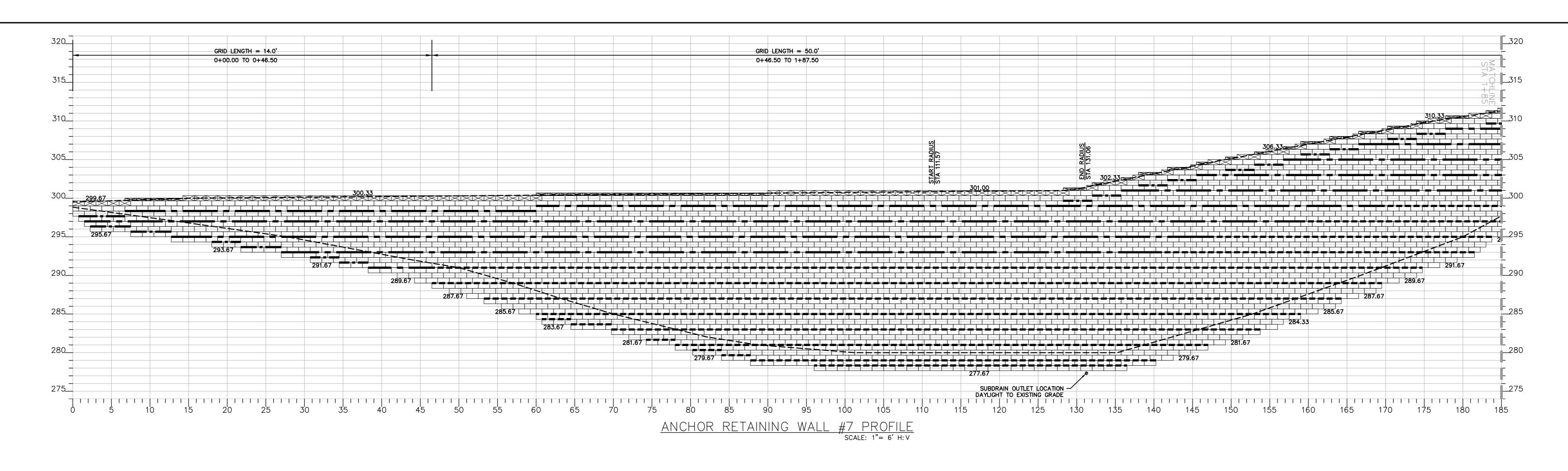
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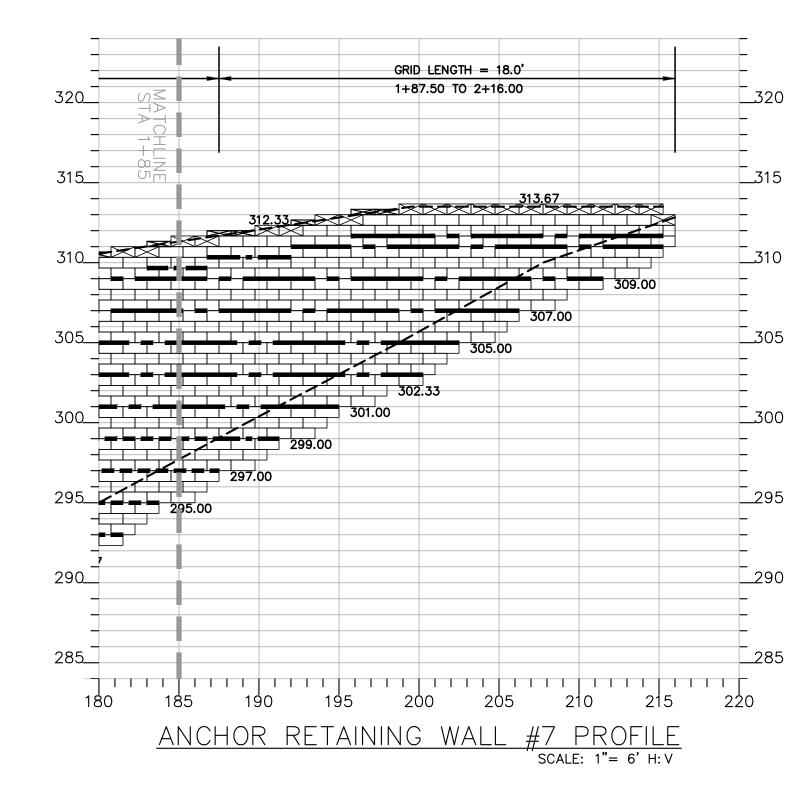
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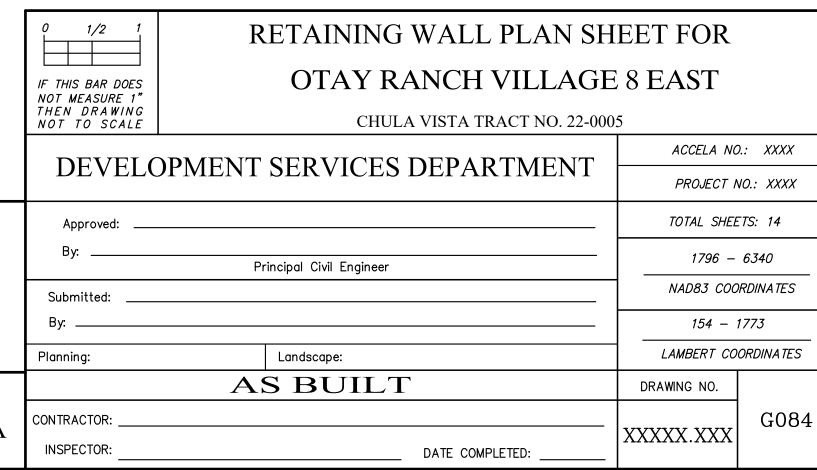
My Registration Expires_

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REVISIONS







AS BUILT ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. SIGNATURE UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE Printed Name My Registration Expires FIELD PRIOR TO THE START OF CONSTRUCTION.

REVISIONS

4" CAP UNIT 8" CAP UNIT GEOHOLD PRO UNIT MIRAGRID 8XT MIRAGRID 10XT W/PIPE FINISH GRADE GRID CHANGE By | Date | App'd | REVISIONS _____

By Date App'd



REVISIONS





Checked By:

— R.C.E. No. <u>68429</u>

MMM

Drawn By:

MMM

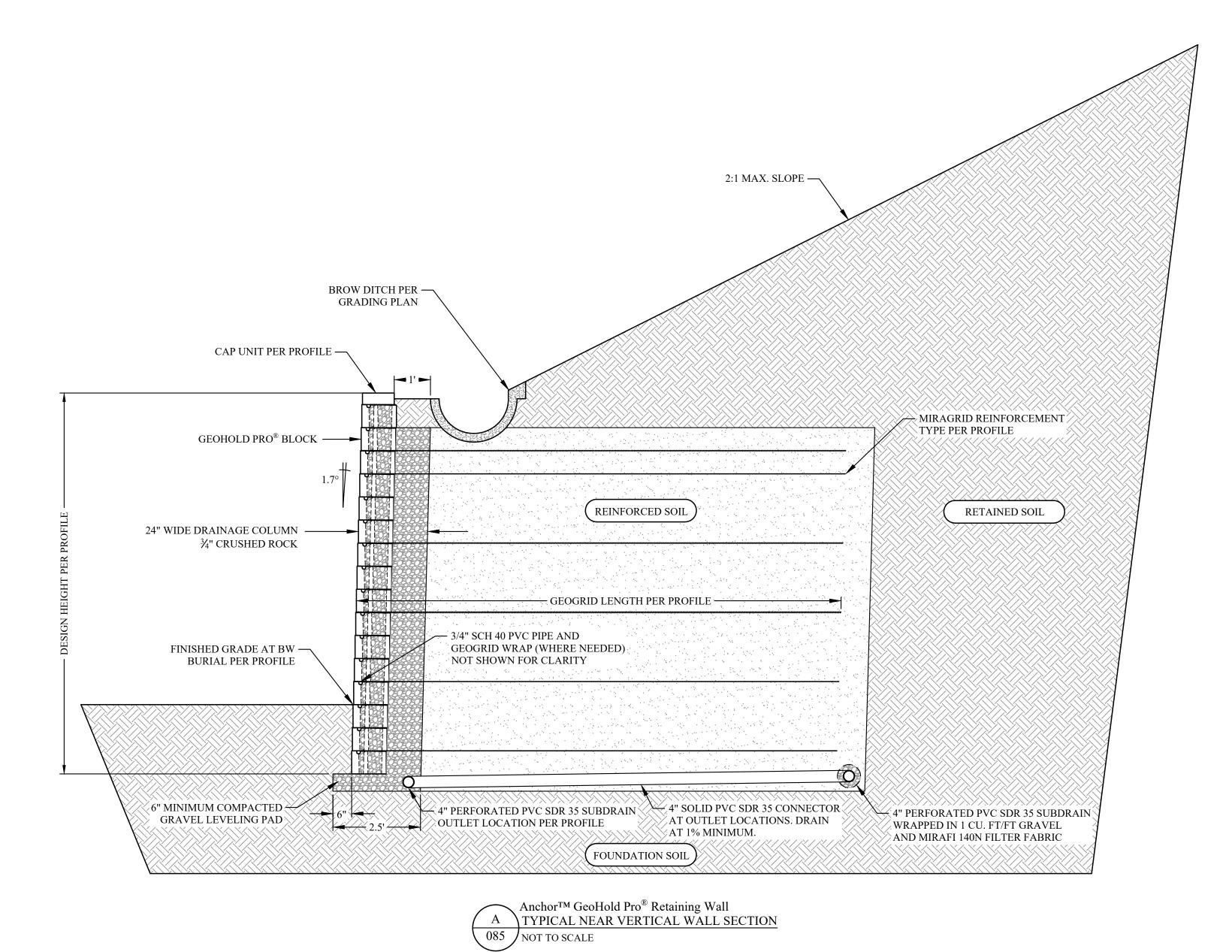
Plans Prepared Under Supervision Of:

MATTHEW M. MERRITT



C.V. DWG. NO.

REFERENCE DRAWINGS



NOT MEASURE 1" THEN DRAWING NOT TO SCALE DEVELOPMENT SERVICES DEPARTMENT PREPARED FOR THE EXCLUSIVE USE OF 1295 DISTRIBUTION WAY VISTA, CA 92081 TEL 760 509 0079 M3 CIVIL ENGINEERING, INC. PO BOX 923 OCEANSIDE, CA 92049

THE CITY OF

CHULA VISTA

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE FIELD PRIOR TO THE START OF CONSTRUCTION. Printed Name 760-802-1772 MATT@M3CE.COM Discipline _ My Registration Expires_ By Date App'd Designed By: By Date App'd REFERENCE DRAWINGS REVISIONS By Date App'd REVISIONS REVISIONS Drawn By: Checked By: C.V. DWG. NO. MMM MMM Plans Prepared Under Supervision Of: — R.C.E. No. <u>68429</u> MATTHEW M. MERRITT

TOTAL SHEETS: 14 1796 - 6340 Principal Civil Engineer NAD83 COORDINATES 154 – 1773 LAMBERT COORDINATES Landscape: Planning: AS BUILT DRAWING NO. CONTRACTOR: XXXXXX.XXX INSPECTOR: DATE COMPLETED: _

RETAINING WALL PLAN SHEET FOR

CHULA VISTA TRACT NO. 22-0005

OTAY RANCH VILLAGE 8 EAST

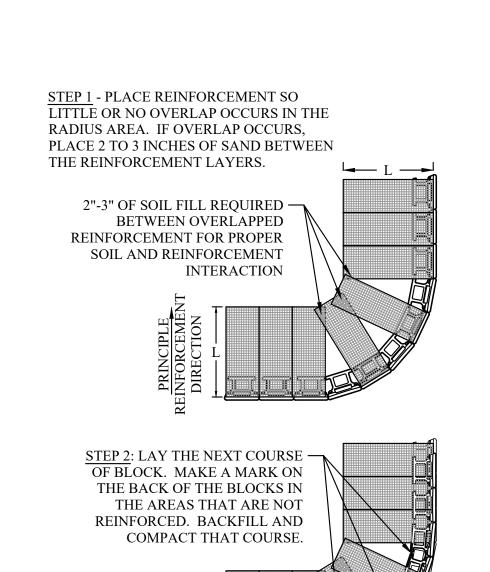
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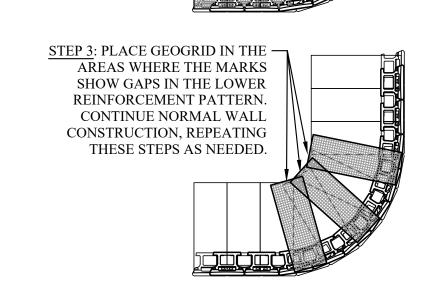
PROJECT NO.: XXXX

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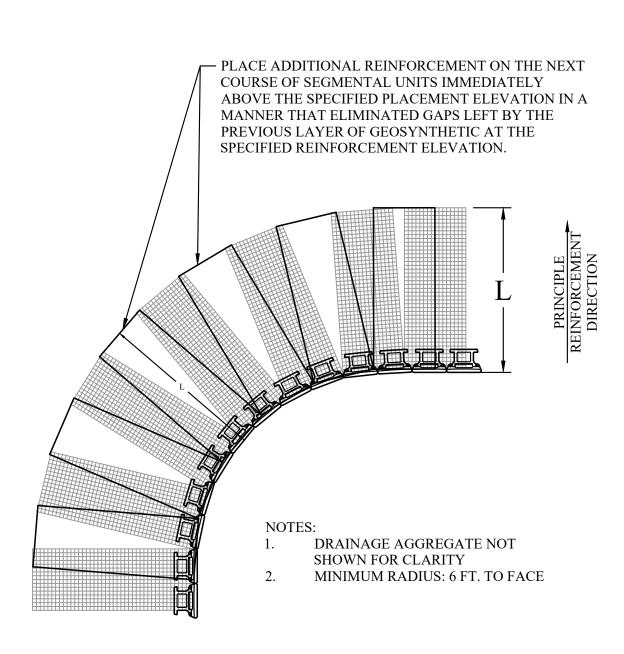
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UTILITY NOTE

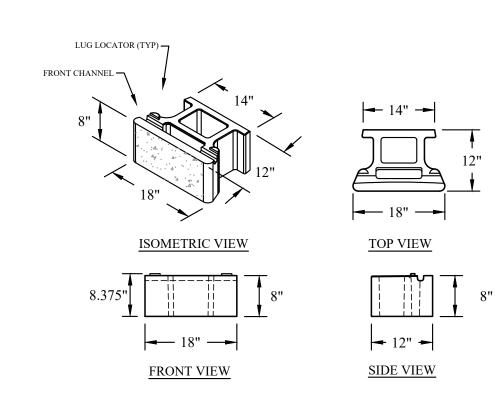




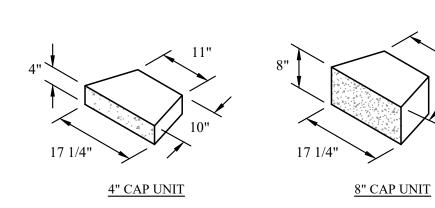
Anchor™ GeoHold Pro® Retaining Wall
OUTSIDE CURVE DETAILS 086 NOT TO SCALE



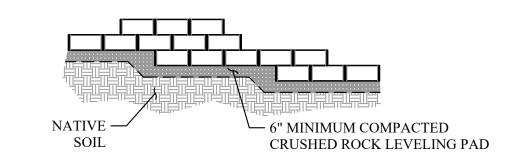
AnchorTM GeoHold Pro[®] Retaining Wall C \INSIDE CURVE DETAILS 086 I NOT TO SCALE



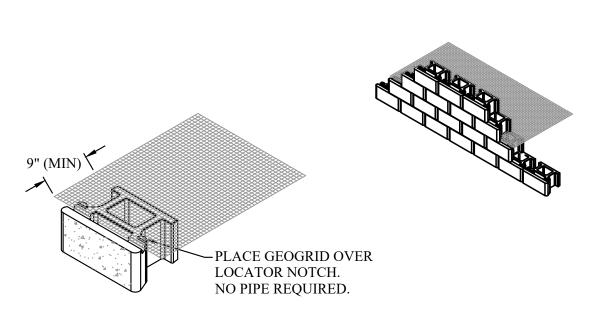
AnchorTM GeoHold Pro[®] Retaining Wall GEOHOLD PRO BLOCK DETAILS 086 NOT TO SCALE



AnchorTM GeoHold Pro[®] Retaining Wall ACCESSORY BLOCK DETAILS 086 NOT TO SCALE

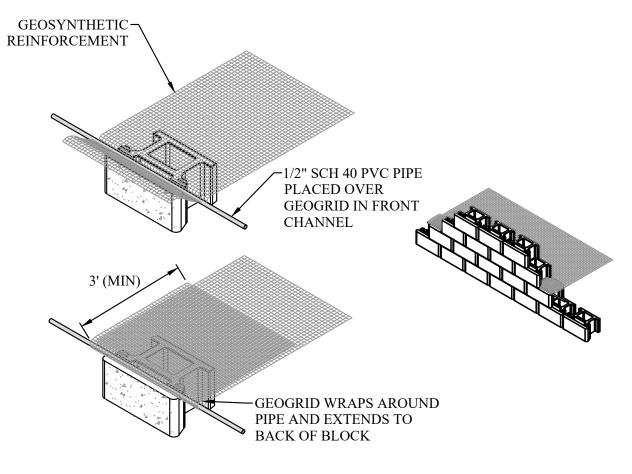


AnchorTM GeoHold Pro[®] Retaining Wall \LEVELING PAD STEP DETAIL 086 NOT TO SCALE



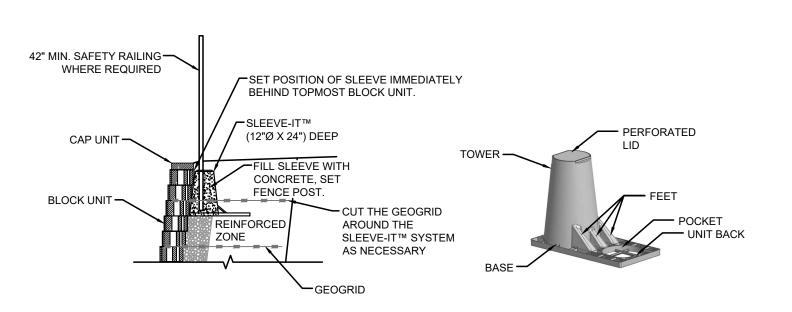
1. FOR USE WITH MIRAGRID 8XT LAYERS

AnchorTM GeoHold Pro[®] Retaining Wall REINFORCEMENT CONNECTION DETAIL NO PIPE



1. FOR USE WITH MIRAGRID 10XT LAYERS

Anchor[™] GeoHold Pro[®] Retaining Wall REINFORCEMENT CONNECTION DETAIL WITH PIPE 086 NOT TO SCALE



THE SLEEVE—IT™ PRODUCT SHALL BE SPACED NO FARTHER APART THAN 8' ON CENTER. USE OF THE SLEEVE—IT™ SYSTEM IS LIMITED TO THE FOLLOWING FENCING APPLICATIONS WITHOUT CONSIDERATION OF

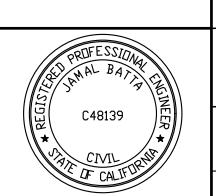
- 8-FOOT HIGH AND UNDER CHAIN LINK FENCES
- 6-FOOT HIGH AND UNDER WOOD FENCE WITH GAPS BETWEEN BOARDS
- 6-FOOT HIGH AND UNDER BALUSTRADED PVC, STEEL, ALUMINUM OR WROUGHT IRON FENCES.
FOR OTHER FENCING SYSTEMS SPECIFICALLY NOT MEETING THESE CRITERIA, CONTACT STRATA SYSTEMS INC., TO DETERMINE SUITABILITY. 1 (800) 680-7750 OR EMAIL STRATA@GEOGRID.COM

DETAIL OF FENCE POST INSTALLATION USING SLEEVE-ITTM 086 NOT TO SCALE

IF THIS BAR DOES

AS BUILT	UTILITY NOTE					
Date SIGNATURE P.E. No	ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS. UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL					
Printed Name My Registration Expires Discipline	VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE FIELD PRIOR TO THE START OF CONSTRUCTION.					
DEFEDENCE DRAWINGS	PENICIONS Py Data App'd					

Printed Name My Registration Expires Discipline	REPORTED OR ARE NOT OF RECOVERIFY THE LOCATION OF ALL PERSONNEL FIELD PRIOR TO THE START OF CO	PERTINENT UTIL	CTOR SHALL LITIES IN THE				PTE OF CALIFORNI		PO BOX OCEANSIDE, 760-802-1772 MA	CA 92049		ALL SYSTEMS, INC JOB #23062G
REFERENCE DRAWINGS	REVISIONS	Ву	Date App'd	REVISIONS	By Date	App'd	REVISIONS	Ву	Date App'd	Designed By:	Drawn By:	Checked By:
C.V. DWG. NO.										MMM	MMM	MMM
										Plans Prepared U	nder Supervision Of:	Date:
										MATTHEW	M. MERRITT	R.C.E. No. <u>68429</u>



PREPARED FOR THE EXCLUSIVE USE OF

GEOGRID

1295 DISTRIBUTION WAY VISTA, CA 92081 TEL 760 509 0079

THE CITY OF CHULA VIST.

	NOT MEASURE 1" THEN DRAWING						
	NOT TO SCALE	05					
	DEVELO	ACCELA NO	ACCELA NO.: XXXX				
	DEVELO	JEMENI	SERVICES	DEPARTMENT	PROJECT I	VO.: XXXX	
	Approved:	TOTAL SHEETS: 14					
	By:P		rincipal Civil Engineer		1796 — 6340		
5))	Submitted:				NAD83 COORDINATES		
	Ву:				154 –	1773	
	Planning:		Landscape:		LAMBERT CO	ORDINATES	
		A	S BUILT		DRAWING NO.		
Γ Γ A	CONTRACTOR:					G086	
L / X	INSPECTOR:			DATE COMPLETED:	XXXXX.XXX		

RETAINING WALL PLAN SHEET FOR

OTAY RANCH VILLAGE 8 EAST

1/9/2024 2:16:17 PM

UNIT WEIGHT = 120 PSF

ACTIVE FLUID PRESSURE = 40 PCF (LEVEL BACKFILL), 55 PCF (2:1

BACKFILL)

SEISMIC LOAD = 15xH PCF/FT TRIANGULAR LOADING APPLIED AT 1/3 H FOR WALLS > 6'-0" HIGH

ALLOWABLE BEARING = 2,000 PSF WITH INCREASE UP TO 4,000 PSF INCREASE 500 PSF/FT FOR EACH FOOT OF DEPTH BEYOND 1 FT INCREASE 300 PSF/FT FOR EACH FOOT OF WIDTH BEYOND 1 FT (ALLOWABLE 1/3 INCREASE FOR SEISMIC LOADING)

ALLOWABLE 1/3 INCREASE FOR SEISMIC LOADING)
ALLOWABLE PASSIVE = 350 PSF (LEVEL)
FRICTION = 0.35 (CONCRETE TO SOIL)

GEOTECH REPORT BY: GEOCON INC., PROJECT NO: G1006-52-05 DATED: SEPTEMBER 30, 2022, REVISED MAY 5, 2023

REQUIRED SPECIAL INSPECTIONS

IN ADDITION TO THE REGULAR INSPECTIONS, THE FOLLOWING CHECKED ITEMS WILL ALSO REQUIRE SPECIAL INSPECTION IN ACCORDANCE WITH CHAPTER 17 OF THE CALIFORNIA BUILDING CODE. SPECIAL INSPECTION INDEPENDENT OF CONTRACTOR, ARCHITECT, OR ENGINEER OF RECORD SHALL BE PROVIDED BY OWNER ACCORDING TO THE CALIFORNIA BUILDING CODE CHAPTER 17 (TABLE 1704.3—STEEL, TABLE 1704.4—CONCRETE, TABLE 1704.5.1 OR 1704.5.3—MASONRY). THE SPECIAL INSPECTOR SHALL OBSERVE THE WORK FOR CONFORMANCE W/ THE CONTRACT DOCUMENTS, NOT THE SHOP DRAWINGS.

ITEM:	TYPE:	REMARKS:		
CONCRETE (CBC TABLE 1705.3)	PERIODIC CONTINUOUS	VERIFYING USE OF REQUIRED DESIGN MIX SAMPLING FRESH CONCRETE AND PERFORMING SLUMP AND AIR CONTENT TESTS AND DETERMINING THE TEMPERATURE OF FRESH CONCRETE AT THE TIME OF MAKING SPECIMENS FOR STRENGTH TESTS PER ACI 318		
	PERIODIC	INSPECTION FOR MAINTENANCE OF SPECIIED CURING TEMPERATURE AND TECHNIQUES		
MASONRY (ACI 530-11)	PERIODIC AND CONTINUOUS	MASONRY CONSTRUCTION SHALL BE INSPECTED IN ACCORDANCE WITH ACI 530 AND ACI 530.1		
SOIL (CBC TABLE 1705.6)	PERIODIC	VERIFY SOIL MATERIALS ARE ADEQUATE TO ACHIEVE BEARING CAPACITY, VERIFY EXCAVATIONS ARE EXTENDED TO PROPER DEPTH AND PERFORM CLASSIFICATION & TESTING OF COMPACTED FILL MATERIALS,		
	CONTINUOUS	VERIFY MATERIAL, LIFT THICKNESS DURING RE-COMPACTION		

SPECIAL INSPECTION NOTES:

AS BUILT

SIGNATURE

REFERENCE DRAWINGS

Printed Name

My Registration Expires

XXX

C.V. DWG. NO.

Date

P.E. No. XXX

Discipline

1. THE SPECIAL INSPECTOR MUST BE CERTIFIED BY THE CITY OR GOVERNING AGENCY, IN THE CATEGORY OF WORK REQUIRED TO HAVE SPECIAL INSPECTION:

CONSTRUCTION TESTING & ENGINEERING (760) 746-4955

- 2. A PROPERTY OWNER'S FINAL REPORT FORM FOR WORK REQUIRED TO HAVE SPECIAL INSPECTIONS, TESTING AND STRUCTURAL OBSERVATIONS MUST BE COMPLETED BY THE PROPERTY OWNER, PROPERTY OWNER'S AGENT OF RECORD, ARCHITECT OF RECORD OR, ENGINEER OF RECORD AND SUBMITTED TO THE INSPECTION SERVICES DIVISION.
- 3. THE SPECIAL INSPECTIONS IDENTIFIED ON PLAN ARE, IN ADDITION TO, AND NOT A SUBSTITUTE FOR, THOSE INSPECTIONS REQUIRED TO BE PERFORMED BY A CITY'S OR GOVERNING AGENCY'S BUILDING INSPECTOR.

UTILITY NOTE

FIELD PRIOR TO THE START OF CONSTRUCTION.

REVISIONS

ALL EXISTING UTILITIES SHOWN ON THESE PLANS ARE PLOTTED

UNDERGROUND FACILITIES MAY EXIST WHICH HAVE NOT BEEN

By | Date | App'd |

FROM RECORD DATA AT THEIR APPROXIMATE LOCATIONS.

REPORTED OR ARE NOT OF RECORD. CONTRACTOR SHALL

VERIFY THE LOCATION OF ALL PERTINENT UTILITIES IN THE

MASONRY:

- 1. ALL BLOCK UNITS SHALL BE GRADE "N" HOLLOWCORE, MEDIUM WEIGHT UNITS CONFORMING TO ASTM C-90, LATEST REVISION, WITH A MAXIUM SHRINKAGE OF 0.06% FROM THE SATURATED TO OVEN-DRY CONDITION. F'm TO BE ESTABLISHED PER CBC SECTIONS 2106 WITH REFERENCE TO 2105.2.2.1 (UNIT STRENGTH METHOD). USE OPEN END UNITS AT VERTICAL REINFORCING.
 - THE MINIMUM COMPRESSIVE STRENGTH AT 28 DAYS SHALL BE AS LISTED BELOW:

DESIGN STRENGTH fm'	BLOCK UNIT NET STRENGTH	GROUT STRENGTH	MORTAR TYPE	PRISM TEST	REMARKS	SPECIAL INSPECTION
2,000 PSI	2,000 PSI	2,000 PSI	S	NO	ASTM C-90	YES

- 2. BLOCK TO BE SLUMP BLOCK AND COLOR PER OWNER.
- 3. MORTAR SHALL BE FRESHLY PREPARED AND UNIFORMLY MIXED AND IN THE FOLLOWING RATIO BY VOLUME:

TYPE S MORTAR:

ONE PART PORTLAND CEMENT

1/4 TO 1/2 PART LIME PUTTY

DAMP LOOSE AGGREGATE: NOT LESS THAN 2-1/4

AND NOT MORE THAN 3 TIMES THE SUM OF THE

VOLUMES OF THE CEMENT AND LIME USED

- 4. GROUT SHALL BE COMPOSED OF THE FOLLOWING RATIO BY VOLUME: ONE PART PORTLAND CEMENT, TWO PARTS PEA GRAVEL, THREE PARTS SAND, AND WATER WHICH WILL COMPLETELY FILL ALL VOIDS IN THE WALL AND DEVELOP THE STRENGTH REQUIRED IN THE TABLE ABOVE.
- 5. MAXIMUM HEIGHT OF GROUT POUR SHALL BE 4'-8"(1.42m) UNLESS CLEANOUT OPENINGS ARE PROVIDED AT THE BOTTOM OF CELLS TO BE FILLED.
- 6. MINIMUM GROUTING: FILL ALL CELLS (SOLID GROUT), UNLESS OTHERWISE NOTED.
- 7. WHERE SPECIAL INSPECTION IS SPECIFIED, CONTINUOUS INSPECTION IS REQUIRED FOR ALL MASONRY.
 THE SPECIAL INSPECTOR SHALL BE RESPONSIBLE FOR:
 - i) VERIFICATION OF f'm SHALL BE BY UNIT STRENGTH TESTING OR TEST RECORDS PER CBC
 - ii) VERIFICATION OF INITIAL PLACEMENT OF MASONRY UNITS FOR OPEN END UNITS OR PLACEMENT OF ALL UNITS FOR CLOSED END UNITS.
 - iii) VERIFICATION OF REINFORCEMENT SIZE AND PLACEMENT PRIOR TO EACH GROUT OPERATION.
 iv) INSPECTION OF GROUT SPACE PRIOR TO GROUT OPERATION AND MONITORING OF GROUT PLACEMENT AND CONSOLIDATION.
- 8. NO COLD JOINTS ARE PERMITTED UNLESS SPECIFICALLY DETAILED.
- 9. VERTICAL CELLS TO BE FILLED SHALL HAVE VERTICAL ALIGNMENT; ANY OVERHANGING MORTAR OR OTHER OBSTRUCTION OR DEBRIS SHALL BE REMOVED FROM THE INSIDES OF SUCH CELL WALLS.
- 10. THE SURFACE OF FOOTING OR SLAB AT THE GROUTED WALL JOINT AT THE FLOOR LINE SHALL BE ROUGHENED BY AN APPROVED METHOD PRIOR TO STARTING CONSTRUCTION OF THE MASONRY ABOVE.
- 11. ALL GROUT SHALL BE CONSOLIDATED AT THE TIME OF POURING BY VIBRATING WITH A 3/4"(1.9cm) VIBRATOR WITHIN THE CELLS BEING POURED.
- 12. WHEN GROUTING IS STOPPED FOR ONE HOUR OR LONGER, HORIZONTAL CONSTRUCTION JOINST SHALL BE FORMED BY STOPPING THE POUR OF GROUT 1 1/2" BELOW THE TOP OF THE UPPERMOST MASONRY UNIT
- 13. PROVIDE ONE INCH MINIMUM GROUT COVER ON ALL BOLTS AND PLATES.
- 14. ALL HEAD JOINTS SHALL BE FULL BUTTERED OR OPEN END MASONRY UNITS SHALL BE USED.
- 15. PROVIDE 1/4"(0.64cm) MINIMUM CLEARANCE FROM INSIDE FACE OF BLOCK MASONRY CELLS AND MINIMUM OF ONE BAR DIAMETER, BUT NOT LESS THAN 3/4"(1.9cm) CLEAR DISTANCE BETWEEN PARALLEL 6. BARS
- 16. REINFORCING STEEL A.S.T.M. A-615, GRADE 60. MINIMUM LAP OF REINFORCING STEEL SHALL BE 48 BAR DIAMETERS FOR TYPICAL REINFORCING OR 2'-0"(0.61m) MINIMUM
- 17. REINFORCEMENT WELDING SHALL COMPLY WITH AWS D1.4 (LATEST EDITION). NO FIELD WELDING OF REINFORCING BARS, U.N.O.
- 18. ALL VERTICAL WALL REINFORCEMENT SHALL BE DOWELED TO THE FOUNDATION WITH THE SAME SIZE AND NUMBER OF BARS AS SHOWN IN THE WALLS.
- 19. VERTICAL BARS IN MASONRY UNITS SHALL BE TIED OR OTHERWISE FIXED IN POSITION AT INTERVALS OF NOT LESS THAN 4'-0" AND AT TOP AND BOTTOM.
- 20. HORIZONTAL REINFORCING SHALL BE PLACED IN BOND BEAM UNITS.
- 21. NO PIPES OR DUCTS SHALL BE PLACED IN MASONRY WALLS UNLESS SPECIFICALLY NOTED OR DETAILED.
- 22. REFER TO ARCHITECTURAL FOR BLOCK FINISH, AND MOLDS, ORNAMENTS, CLIPS, OR GROUNDS TO BE SET IN MASONRY.
- 23. IF NO REINFORCING IS SHOWN IN DETAILS FOR CMU WALLS, THEN USE A MINIMUM OF #4 @ 32" O.C. HORIZONTAL AND #5 @ 24" O.C. VERTICAL REINFORCING BARS.

CONCRETE:

- ALL CONCRETE WORK SHALL CONFORM TO ALL REQUIREMENTS OF A.C.I. 318-LATES EDITION "SPECIFICATIONS FOR STRUCTURAL CONCRETE FOR BUILDINGS", EXCEPT AS MODIFIED BY THE SUPPLEMENTAL REQUIREMENTS CONTAINED HEREIN OR SHOWN ON THE DRAWINGS.
- 2. ALL CONCRETE SHALL BE 150 P.C.F. HARDROCK, MIXED PER A.S.T.M. C-94, AND SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 4,000 P.S.I. AT 28 DAYS.
- 3. THE MAXIMUM SIZE AGGREGATE IN FOUNDATION AND MASS CONCRETE WORK SHALL BE 1 INCH. THE MAXIMUM SIZE AGGREGATE IN FOOTINGS.
- 4. CEMENT SHALL CONFORM TO A.S.T.M.. C-150, TYPE II OR V, LOW ALKALI. AGGREGATES FOR NORMAL WEIGHT SHALL CONFORM TO A.S.T.M. C-33.
- 5. ADMIXTURES AND COLORS (EXCEPT AS NOTED HEREIN) SHALL NOT BE USED UNLESS SUBSTANTIATING DATA IS SUBMITTED TO AND ACCEPTED BY THE ENGINEER AND ARCHITECT OF RECORD.
- 6. CONCRETE MIXES SHALL BE DESIGNED BY A QUALIFIED TESTING LABORATORY. THE MIX DESIGNS SHALL CONFORM TO C.B.C. SEC. 1905 AND ACI SECTION 5.6.5 UNLESS NOTED OTHERWISE.
- 7. READY MIXED CONCRETE SHALL CONFORM TO (A.S.T.M. C-94).
- 8. PLACEMENT OF CONCRETE SHALL CONFORM TO A.C.I. 304.
- 9. ALL REINFORCING STEEL, ANCHOR BOLTS, DOWELS AND INSERTS SHALL BE WELL SECURED IN POSITION PRIOR TO PLACING CONCRETE.
- 10. NO BRICK OR POROUS MATERIAL SHALL BE USED TO SUPPORT FOUNDATION STEEL OFF THE GROUND.
- 11. SLEEVE PLUMBING OPENINGS IN SLABS WITH NON-CORROSIVE SLEEVE BEFORE PLACING CONCRETE AND BEND REINFORCING AROUND SLEEVES.
- 12. ALL REINFORCING BARS SHALL BE PROVIDED WITH THE FOLLOWING CONCRETE MINIMUM COVER:

FOOTINGS CAST AGAINST EARTH 3"
FORMED CONCRETE EXPOSED
TO EARTH OR WEATHER 2"

13. CONCRETE CURING: TYPICALLY REQUIRED FOR 10 DAYS.

REINFORCING STEEL:

- 1. ALL REINFORCING STEEL SHALL BE PLACED IN CONFORMANCE WITH THE C.B.C., AND THE "MANUAL OF STANDARD PRACTICE" BY THE C.R.S.I. OR AS MODIFIED BY THE CONSTRUCTION DOCUMENTS.
- 2. REINFORCING BARS SHALL CONFORM TO A.S.T.M. A-615, DEFORMED GRADE 60, EXCEPT #3 BARS MAY BE GRADE 40. REINFORCING BARS THAT ARE TO BE WELDED SHALL CONFORM TO A.S.T.M. A-706, DEFORMED GRADE 60.
- 3. WELDING OF REINFORCEMENT SHALL BE IN ACCORDANCE WITH A.S.T.M. A-706 WITH LOW HYDROGEN ELECTRODES AND SHALL CONFORM TO THE C.B.C. AND STRUCTURAL WELDING CODE REINFORCING STEEL BY A.N.S.I. / A.W.S. D1.4. MINIMUM TENSILE STRENGTH OF WELD METAL SHALL BE 90 K.S.I. ALL WELDING SHALL BE PERFORMED BY CERTIFIED WELDERS.
- 4. ALL REINFORCING BAR BENDS SHALL BE MADE COLD, UNLESS OTHERWISE PERMITTED BY THE BUILDING OFFICIAL.
- 5. DOWELS BETWEEN FOOTINGS AND WALLS OR COLUMNS SHALL BE LAPPED WITH THE SAME GRADE, SIZE, SPACING AND NUMBER AS THE VERTICAL REINFORCEMENT, RESPECTIVELY.
- 6. REINFORCING SPLICES SHALL BE MADE AS INDICATED ON THE DRAWINGS
- 7. PROVIDE #3 SPACER TIES AT 2'-6" ON CENTER IN ALL BEAMS AND FOOTINGS TO SECURE REINFORCING BARS IN PLACE, U.O.N.
- 8. PIPING AND CONDUIT SHALL BE SO FABRICATED AND INSTALLED THAT CUTTING, BENDING, OR DISPLACEMENT OF REINFORCEMENT FROM ITS PROPER LOCATION WILL NOT BE REQUIRED. A.C.I. #6.3.12

GENERAL NOTES:

- 1. THE PROJECT SPECIFICATIONS SHALL BE PART OF THE CONTRACT DOCUMENTS.
- 2. THE STRUCTURAL DRAWINGS ARE TO BE USED IN CONJUNCTION WITH CIVIL DRAWINGS.
- 3. THE CONTRACTOR SHALL REVIEW EXISTING CONDITIONS ON THE SITE DURING THE BIDDING. THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS PRIOR TO STARTING WORK. THE ARCHITECT AND ENGINEER SHALL BE NOTIFIED OF ANY DISCREPANCIES OR INCONSISTENCIES PRIOR TO PROCEEDING.
- 4. UNLESS OTHERWISE SHOWN OR NOTED, ALL PHASES OF WORK ARE TO CONFORM TO THE MINIMUM STANDARDS OF THE CALIFORNIA BUILDING CODE (CURRENT EDITION C.B.C.), AND ANY A.S.T.M. SPECIFICATIONS WHICH THESE STANDARDS ARE BASED. WHERE CONFLICT BETWEEN BUILDING CODES AND SPECIFICATIONS OCCUR, THE MOST STRINGENT REQUIREMENTS SHALL GOVERN.
- 5. ALL A.S.T.M. DESIGNATIONS REFERRED TO ON THESE DRAWINGS SHALL BE THE LATEST ADOPTED OR REVISED SPECIFICATION, AS OF THE DATE OF THESE DRAWINGS.
- 6. ALL DIMENSIONS SHALL TAKE PRECEDENCE OVER SCALE SHOWN ON PLANS, SECTIONS AND DETAILS. DRAWINGS SHALL NOT BE SCALED FOR CONSTRUCTION PURPOSES
- 7. NOTES AND DETAILS ON THE DRAWINGS SHALL TAKE PRECEDENCE OVER GENERAL NOTES AND TYPICAL DETAILS.
- 8. THE STRUCTURAL CONTRACT DOCUMENTS AND SPECIFICATIONS REPRESENT THE FINISHED STRUCTURE. UNLESS OTHERWISE INDICATED, THEY DO NOT INDICATE THE METHOD OF CONSTRUCTION.
- 9. NEITHER THE OWNER NOR THE ARCHITECT/STRUCTURAL ENGINEER WILL ENFORCE SAFETY MEASURES OR REGULATIONS. THE CONTRACTOR SHALL, AT HIS OWN EXPENSE, DESIGN, CONSTRUCT AND MAINTAIN ALL SAFETY DEVICES, INCLUDING SHORING AND BRACING AND SHALL BE SOLELY RESPONSIBLE FOR CONFORMING TO ALL LOCAL, STATE AND FEDERAL SAFETY AND HEALTH STANDARDS, LAWS AND REGULATIONS. OBSERVATION VISITS TO THE SITE BY THE STRUCTURAL ENGINEER SHALL NOT INCLUDE INSPECTION OF THE ABOVE SAFETY ITEMS.

PROFILE S	SCALES
HORIZ.:	1"=40'
VERT.:	1"=8'

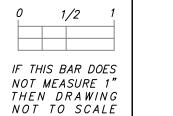
- 10. SATISFACTORY EXECUTION OF CONSTRUCTION IS DEPENDENT UPON CONFORMANCE WITH THE INTENT OF THESE DRAWINGS. OWNER OR CONTRACTOR SHALL RETAIN A CALIFORNIA LICENSED CIVIL OR STRUCTURAL ENGINEER DURING CONSTRUCTION TO OBSERVE THE CONSTRUCTION AND STATE THAT THE STRUCTURE HAS BEEN BUILT IN GENERAL CONFORMANCE WITH THE INTENT OF THESE DRAWINGS.
- 11. WHERE NO CONSTRUCTION DETAILS ARE SHOWN OR NOTED FOR ANY PART OF THE WORK. THE DETAILS SHALL BE THE SAME AS FOR OTHER SIMILAR WORK.

GEOTECHNICAL NOTES:

GEOTECH REPORT BY: GEOCON INC., PROJECT NO: G1006-52-05 DATED MAY 5, 2023 AND LETTER DATED 12/23/2023

- 1. FOOTING OR PEIR EXCAVATIONS SHOULD BE OBSERVED BY THE PROJECT GEOTECHNICAL REPRESENTATIVE TO DOCUMENT THAT THE FOOTING TRENCHES HAVE BEEN EXCAVATED INTO COMPETENT BEARING SOILS AND TO THE EMBEDMENTS RECOMMENDED IN THE GEOTECHNICAL REPORT. THESE OBSERVATIONS SHOULD BE PERFOREMED PRIOR OT PLACING FORMS OR REINFORCING STEEL.
- 2. SEE "DESIGN CRITERA" FOR GEOTECHNICAL WALL DESIGN PARAMETERS.

S-1 STRUCTURAL NOTES & DETAILS



RETAINING WALL PLAN SHEET FOR

OTAY RANCH VILLAGE 8 EAST

CHULA VISTA TRACT NO. 22-0005

PROFESSIONALD R. OP.	
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EXP. 12-31-24	E
OF CALIFOR	Plo

THE CITY OF CHULA VISTA

ACCELA NO.: XXXX DEVELOPMENT SERVICES DEPARTMENT PROJECT NO.: XXXX TOTAL SHEETS: 1796 - 6340 Principal Civil Engineer NAD83 COORDINATES 154 – 1773 LAMBERT COORDINATES Landscape: AS BUILT DRAWING NO. 87 REVISED: O. NO CONTRACTOR: $\mathsf{XXXXX}.\mathsf{XXX}$ INSPECTOR: DATE COMPLETED: \$ ≥

1 STRUCTURAL NOTES

