CONSTRUCTION PLANS FOR

HERITAGE MARKET PLACE

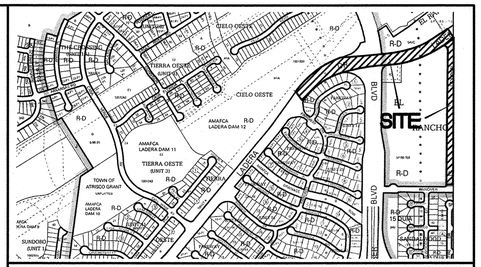
LADERA DRIVE AND MARKET STREET

PAVING IMPROVEMENTS

CITY OF ALBUQUERQUE
BERNALILLO COUNTY, NEW MEXICO
MARCH, 2015

APPROVED AS RECORD DRAWINGS
DESIGN REVIEW SECTION
CITY CONSTRUCTION ENGINEER
DATE: 4/20/2016

APPROVED AS RECORD DRAWINGS
DESIGN REVIEW SECTION
CITY CONSTRUCTION ENGINEER
DATE:



VICINITY MAP H-9Z

NTS

NOTICE TO CONTRACTORS

1. ALL WORK DETAILED ON THESE PLANS TO BE PERFORMED UNDER CONTRACT SHALL, EXCEPT AS OTHERWISE STATED OR PROVIDED FOR HEREON, BE CONSTRUCTED IN ACCORDANCE WITH THE CITY OF ALBUQUERQUE STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, 1986 EDITION (UPDATE #8), INCLUDING AMENDMENT #1.

2. TWO WORKING DAYS PRIOR TO ANY EXCAVATION, THE CONTRACTOR MUST CONTACT NEW MEXICO ONE CALL SYSTEM (260-1990) FOR LOCATION OF EXISTING UTILITIES.

3. ANY WORK AFFECTING RIO BRAVO BLVD SHALL TAKE PLACE BETWEEN 9 PM AND 4:30 AM ONLY.

4. PRIOR TO CONSTRUCTION, THE CONTRACTOR SHALL EXCAVATE AND VERIFY THE HORIZONTAL AND VERTICAL LOCATIONS OF ALL OBSTRUCTIONS. SHOULD A CONFLICT EXIST, THE CONTRACTOR SHALL NOTIFY THE ENGINEER OR SURVEYOR IMMEDIATELY SO THAT THE CONFLICT CAN BE RESOLVED WITH A MINIMUM AMOUNT OF DELAY.

5. SEVEN (7) WORKING DAYS PRIOR TO BEGINNING OF CONSTRUCTION, THE CONTRACTOR SHALL SUBMIT TO COA AND CONSTRUCTION COORDINATION DIVISION A DETAILED CONSTRUCTION SCHEDULE. TWO(2) WORKING DAYS PRIOR TO CONSTRUCTION, THE CONTRACTOR SHALL OBTAIN A BARRICADING PERMIT FROM THE CONST. COORDINATION DIVISION. CONTRACTOR SHALL NOTIFY BARRICADE ENGINEER (924-3400) PRIOR TO OCCUPYING AN INTERSECTION. REFER TO STANDARD SPECIFICATIONS.

6. ALL STREET STRIPING ALTERED OR DESTROYED SHALL BE REPLACED WITH 90 MIL THERMOPLASTIC ONLY REFLECTORIZED PAVEMENT MARKINGS BY THE CONTRACTOR TO LOCATION AS EXISTING OR AS INDICATED BY THIS PLAN SET.

7. CONTRACTOR SHALL NOTIFY THE ENGINEER NOT LESS THAN SEVEN (7) DAYS PRIOR TO STARTING WORK IN ORDER THAT THE ENGINEER MAY TAKE NECESSARY MEASURES TO INSURE THE PRESERVATION OF SURVEY MONUMENTS. CONTRACTOR SHALL NOT DISTURB PERMANENT SURVEY MONUMENTS WITHOUT THE CONSENT OF THE ENGINEER AND SHALL NOTIFY THE ENGINEER AND BEAR THE EXPENSE OF REPLACING ANY THAT MAY BE DISTURBED WITHOUT PERMISSION. REPLACEMENT SHALL BE DONE ONLY BY THE CITY SURVEYOR. WHEN A CHANGE IS MADE IN THE FINISHED ELEVATIONS OF THE PAVEMENT OF ANY ROADWAY IN WHICH A PERMANENT SURVEY MONUMENT IS LOCATED, CONTRACTOR SHALL, AT HIS OWN EXPENSE, ADJUST THE MONUMENT COVER TO THE NEW GRADE UNLESS OTHERWISE SPECIFIED. REFER TO SECTION 4.4 OF THE GENERAL CONDITIONS OF THE STANDARD SPECIFICATIONS. ANY PERMANENT SURVEY MONUMENT LOCATED WITHIN 50' OF THIS PROJECT THAT IS NOT SHOWN ON THE PLAN AND IS DESTROYED DURING CONSTRUCTION WILL BE REPLACED AT THE CONTRACTORS EXPENSE.

8. CONTRACTOR SHALL MAINTAIN A GRAFFITI-FREE WORK SITE. CONTRACTOR SHALL PROMPTLY REMOVE ANY AND ALL GRAFFITI FROM EQUIPMENT, WHETHER PERMANENT OR TEMPORARY.

9. FOR STORM DRAIN CONSTRUCTION, RCP PIPE JOINTS SHALL NOT BE GROUTED PRIOR TO FINAL INSPECTION. FINAL INSPECTION WILL DETERMINE JOINTS TO BE GROUTED FOR FINAL ACCEPTANCE OF THE CONSTRUCTION.

10. THE CONTRACTOR SHALL COORDINATE WITH THE WATER AUTHORITY SEVEN (7) DAYS IN ADVANCE OF PERFORMING WORK THAT WILL AFFECT THE PUBLIC WATER OR SANITARY SEWER INFRASTRUCTURE. WORK REQUIRING SHUTOFF OF WELL COLLECTORS, TRANSMISSION LINES OR FACILITIES DESIGNATED AS MASTER PLAN FACILITIES MUST BE COORDINATED WITH THE WATER AUTHORITY 14 DAYS IN ADVANCE OF PERFORMING SUCH WORK. ONLY WATER AUTHORITY CREWS ARE AUTHORIZED TO OPERATE PUBLIC VALVES. SHUTOFF REQUESTS MUST BE MADE ONLINE AT HTTP://WWW.ABCWUA.ORG/WATER_SHUT_OFF_AND_TURN_ON_PROCEDURES.ASPX.

11. ALL EXCAVATION, TRENCHING, AND SHORING ACTIVITIES MUST BE CARRIED-OUT IN ACCORDANCE WITH OSHA 29 CFR 1926.650 SUBPART P AND COA STD DWG 2465.

12. ELECTRONIC MARKER SPHERES (EMS) WILL BE PLACED ACCORDING TO SECTION 170 OF THE CITY OF ALBUQUERQUE STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, 1986 EDITION AS REVISED THROUGH UPDATE #8, AMENDMENT #1.

13. CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING AND MAINTAINING ALL CONSTRUCTION SIGNING UNTIL PROJECT HAS BEEN ACCEPTED BY THE APPROPRIATE JURISDICTION.

14. PEDESTRIAN PATHWAYS NEED TO BE MAINTAINED DURING CONSTRUCTION INCLUDING ACCESSIBLE ROUTES OR PROVIDE ALTERNATE ACCESSIBLE PATHWAY.

THE FOLLOWING NOTES ALSO APPLY WHEN CHECKED

- [x] ALL UTILITIES AND UTILITY SERVICE LINES SHALL BE INSTALLED PRIOR TO PAVING.
- [x] BACKFILL COMPACTION SHALL BE ACCORDING TO SPECIFIED STREET USE.
- [ ] TACK COAT REQUIREMENTS SHALL BE DETERMINED BY THE PROJECT ENGINEER.
- [x] SIDEWALKS AND WHEELCHAIR RAMPS WITHIN THE CURB RETURNS SHALL BE CONSTRUCTED WHEREVER A NEW CURB RETURN IS CONSTRUCTED.
- [ ] IF CURB IS DEPRESSED FOR A DRIVEPAD, THE DRIVEPAD SHALL BE CONSTRUCTED PRIOR TO ACCEPTANCE OF CURB AND GUTTER.
- [ ] ALL STORM DRAINAGE FACILITIES SHALL BE COMPLETED PRIOR TO FINAL ACCEPTANCE.

INDEX TO DRAWINGS

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engraved Or Seal & Signature
RONALD R. BOHANNAN
NEW MEXICO
15868
REGISTERED PROFESSIONAL ENGINEER

RECORD DRAWING

UTILITY CONTACT INFORMATION

ROBERT MARTINEZ-COMCAST
761-6221
ROBERT_MARTINEZ@CABLE.COMCAST.COM

TONY MACHAC-PNM ELECTRIC
241-3404
TONY.MACHAC@PNM.COM

JOE HERRERA-NEW MEXICO GAS COMPANY
891-6995
JOE.HERRERA@NMGCO.COM

ROSA KNIFFIN-QWEST
245-6374
ROSARITO.KNIFFIN@QWEST.COM

KRISTOPHER CADENA-ALBUQUERQUE BERNALILLO COUNTY WATER UTILITY AUTHORITY
289-3301
KCADENA@ABCWUA.ORG

DRB NO 15DRB-70051

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

REV	SHEETS	CITY ENGINEER	DATE	USER DEPT.	DATE	USER DEPT.	DATE

ENGINEERS STAMP & SIGNATURE

RONALD R. BOHANNAN
NEW MEXICO
15868
PROFESSIONAL ENGINEER

RONALD R. BOHANNAN
P.E. #7868

APPROVALS	ENGINEER	DATE
DRC Chairman	M Woodall	4-27-15
Transportation	[illegible]	4-16-15
ABCWUA	[illegible]	4-8-15
Hydrology	[illegible]	4-8-15
AMAFCA		
Constr. Mngmt.		
Constr. Coord.		

APPROVED FOR CONSTRUCTION

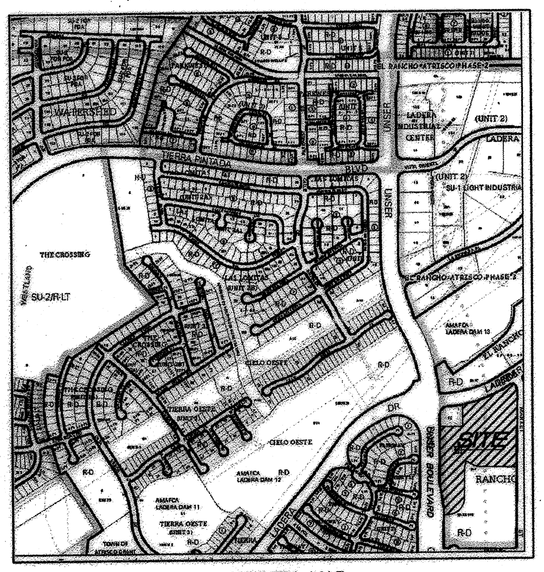
City Engineer 7/30/15 Date

CITY PROJECT NO. 529882

SHEET 1 of 22

PLAT OF
TRACTS A-1 THRU A-3 AND C-1 THRU C-3
HERITAGE MARKETPLACE
(BEING A REPLAT OF TRACTS A AND C, HERITAGE MARKETPLACE)
WITHIN
THE TOWN OF ATRISCO GRANT
PROJECTED SECTIONS 9, 10, 15 AND 16, TOWNSHIP 10 NORTH, RANGE 2 EAST
NEW MEXICO PRINCIPAL MERIDIAN
CITY OF ALBUQUERQUE
BERNALILLO COUNTY, NEW MEXICO
FEBRUARY, 2015

PROJECT NUMBER: 1003275
Application Number: 15-70089



VICINITY MAP
Not to Scale

GENERAL NOTES

1. Bearings are grid based on the New Mexico State Plane Coordinate System, Central Zone (NAD 83).
2. Distances are ground.
3. Distances shown along curved lines are arc lengths.
4. Record Plat or Deed bearings and distances, where they differ from those established by this field survey, are in parenthesis ( ).
5. All corners that were set are either a 5/8" rebar with cap stamped "HUG L.S. 9750" or a concrete nail with brass disk stamped "HUGG L.S. 9750" unless otherwise indicated hereon.
6. All corners found in place and held were tagged with a brass disk stamped "HUGG L.S. 9750" unless otherwise indicated hereon..
7. City of Albuquerque Zone Atlas Page: H-9-Z

SUBDIVISION DATA

Total number of existing Tracts: 2
Total number of new Tracts created: 6
Gross Subdivision acreage: 10.9281 acres

TREASURERS CERTIFICATION

This is to certify that taxes are current and paid on the following:
1009059500240105
Western Albuq Land Holdings LLC
4-7-15
Bernalillo County Treasurer — Date

PUBLIC UTILITY EASEMENTS

PUBLIC UTILITY EASEMENTS shown on this plat are granted for the common and joint use of:

A. Public Service Company of New Mexico ("PNM"), a New Mexico corporation, (PNM Electric) for installation, maintenance, and service of overhead and underground electrical lines, transformers, and other equipment and related facilities reasonably necessary to provide electrical services.

B. New Mexico Gas Company for installation, maintenance, and service of natural gas lines, valves and other equipment and facilities reasonably necessary to provide natural gas services.

C. Qwest for the installation, maintenance, and service of such lines, cable, and other related equipment and facilities reasonably necessary to provide communication services.

D. Cable TV for the installation, maintenance, and service of such lines, cable, and other related equipment and facilities reasonably necessary to provide Cable services.

Included, is the right to build, rebuild, construct, reconstruct, locate, relocate, change, remove, replace, modify, renew, operate and maintain facilities for purposes described above, together with free access to, from, and over said easements, with the right and privilege of going upon, over and across adjoining lands of Grantor for the purposes set forth herein and with the right to utilize the right of way and easement to extend services to customers of Grantee, including sufficient working area space for electric transformers, with the right and privilege to trim and remove trees, shrubs or bushes which interfere with the purposes set forth herein. No building, sign, pool (aboveground or subsurface), hot tub, concrete or wood pool decking, or other structure shall be erected or constructed on said easements, nor shall any wall be drilled or operated thereon. Property owners shall be solely responsible for correcting any violations of National Electrical Safety Code by construction of pools, decking, or any structures adjacent to or near easements shown on this plat.

Easements for electric transformer/switchgears, as installed, shall extend ten (10) feet in front of transformer/switchgear doors and five (5) feet on each side.

DISCLAIMER

In approving this plat, Public Service Company of New Mexico (PNM) and New Mexico Gas Company (NMGC) did not conduct a Title Search of the properties shown hereon. Consequently, PNM and NMGC do not waive or release any easement or easement rights which may have been granted by prior plat, replat or other document and which are not shown on this plat.

PURPOSE OF PLAT

The Purpose of this plat is to:

a. Divide 2 existing Tracts into 6 new Tracts as shown hereon.
b. Grant the Private and Public easements as shown hereon.

PLAT APPROVAL

UTILITY APPROVALS:

Public Service Company of New Mexico	3-30-15 Date
New Mexico Gas Company	3/30/15 Date
QWest Corporation d/b/a CenturyLink QC	3/30/15 Date
Comcast	3/31/15 Date

CITY APPROVALS:

City Surveyor, Department of Municipal Development	3/3/15 Date
Real Property Division	4-7-15 Date
Environmental Health Department	4-7-15 Date
Traffic Engineering, Transportation Division	3/11/15 Date
ABCWUA	03/11/15 Date
Parks and Recreation Department	3-11-15 Date
AMAFCA	4-7-15 Date
City Engineer	4-6-15 Date
DRB Chairperson, Planning Department	4-7-15 Date

SURVEYOR'S CERTIFICATION

I, Russ P. Hugg, New Mexico Professional Surveyor Number 9750, hereby certify that this plat of survey was prepared from field notes of an actual ground survey performed by me or under my direct supervision; that it meets the Standards for Land Surveys in the State of New Mexico as adopted by the New Mexico State Board of Registration for Professional Engineers and Professional Surveyor's; that it meets the minimum requirements for surveys and monumentation of the Albuquerque Subdivision Ordinance; that it shows all easements of record; and that it is true and correct to the best of my knowledge and belief.

Russ P. Hugg
NMPS No. 9750
February 17, 2015

PROFESSIONAL SURVEYOR — STATE OF NEW MEXICO — No. 9750 — RUSS P. HUGG

DOC# 2015028498
04/07/2015 02:20 PM Page: 1 of 3
PLAT R $25.00 B: 2015C P: 0035 M: Toulouse Oliver, Bernalillo Cour

FOR REFERENCE ONLY
SHEET 1 OF 3

SURVTEK, INC.
Consulting Surveyors
9384 Valley View Drive, N.W. Albuquerque, New Mexico 87114
Phone: 505-897-3366 Fax: 505-897-3377

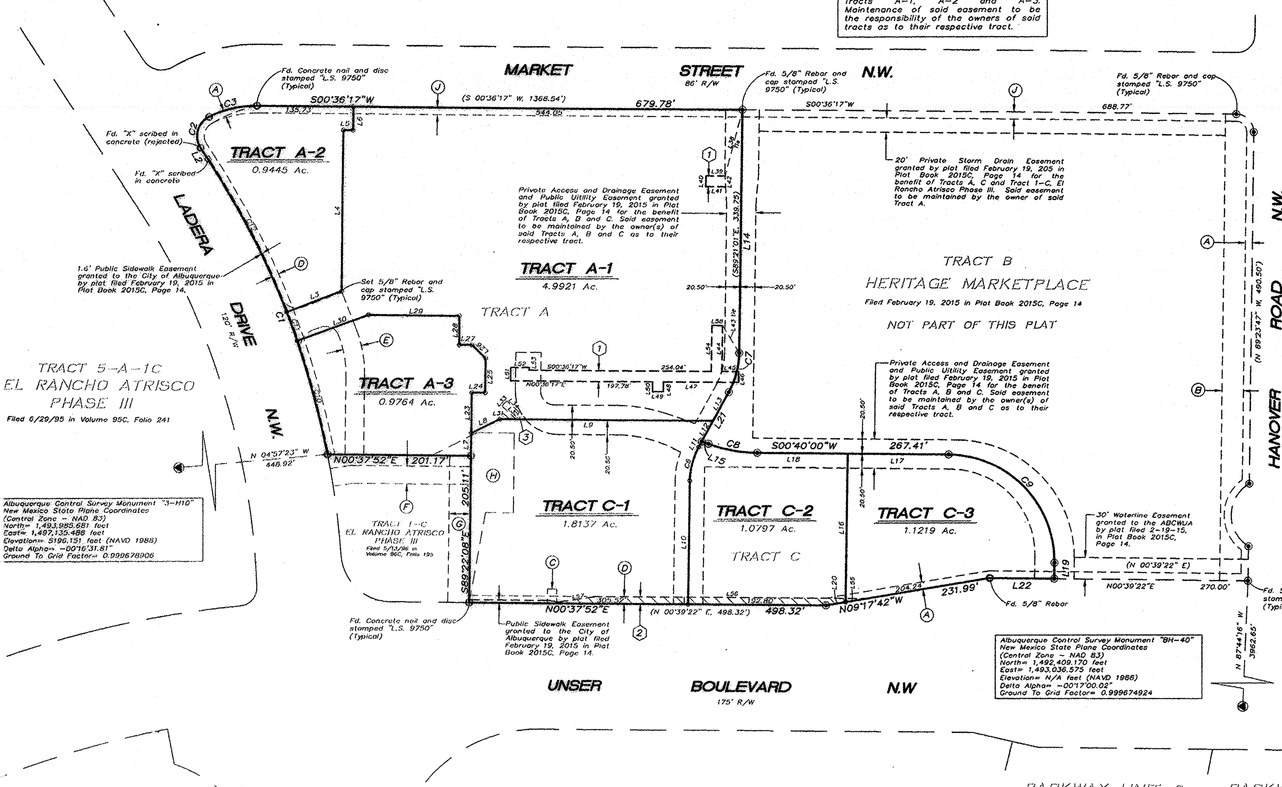
130412_PLAT2. DWG

PLAT OF
TRACTS A-1 THRU A-3 AND C-1 THRU C-3
HERITAGE MARKETPLACE
(BEING A REPLAT OF TRACTS A AND C, HERITAGE MARKETPLACE)
WITHIN
THE TOWN OF ATRISCO GRANT
PROJECTED SECTIONS 9, 10, 15 AND 16, TOWNSHIP 10 NORTH, RANGE 2 EAST
NEW MEXICO PRINCIPAL MERIDIAN
CITY OF ALBUQUERQUE
BERNALILLO COUNTY, NEW MEXICO
FEBRUARY, 2015

DRAINAGE NOTE

There is an existing Private Blanket Drainage Easement over Tracts A and C, excluding any future buildings granted by plat filed February 19, 2015 in Plat Book 2015C, Page 14 for the benefit of Tracts A, C and Tract 1-C, El Rancho Atrisco. Maintenance of said easement to be the responsibility of the owners of said tracts as to their respective tract.

A Private Blanket Drainage Easement over Tracts A-1, A-2 and A-3, excluding any future buildings is hereby granted by this plat for the benefit of Tracts A-1, A-2 and A-3. Maintenance of said easement to be the responsibility of the owners of said tracts as to their respective tract.



NEW EASEMENTS CREATED

1. 15' Public Waterline Easement granted to the ABCWUA by this plat.
2. Public Sidewalk and Trail Easement granted to the City of Albuquerque by this plat. (Cross hatched area)
3. 10' Private Drainage Easement granted by this plat for the benefit of Tract C-1, to be maintained by the owners of Tract C-1.

EXISTING EASEMENT LEGEND

- (A) Existing 10' Public Utility Easement per plat filed 05/13/96 in Plat Book 96C, Page 195.
- (B) Existing 30' Drainage Easement filed per plat, 08/13/82 in Volume C19, Folio 143
- (C) Existing 20'x13' Public Service Company of New Mexico Underground Easement filed 4-7-1997, in Book 97-2, page 5635, as Document No. 97034817
- (D) Existing 10' Public Utility Easement filed 05/28/92 in Book BCR 92-12, Page 3074.
- (E) Existing Temporary Private Common Reciprocal Cross Access Easement per plat filed 5/13/96 in Volume 96C, Folio 195
- (F) Existing 25' Private Common Reciprocal Cross Access Easement for the benefit of Tracts 1-A & 1-C1 to be maintained by Tract 1-C per plat filed 5/13/96 in Volume 96C, Folio 195
- (G) Existing 30' Private Common Reciprocal Cross Access Easement for the benefit of Tracts 1-A & 1-C to be maintained by Tract 1-C per plat filed 5/13/96 in Volume 96C, Folio 195
- (H) Existing Temporary Drainage Facility Area per Drainage Agreement filed 10-2-1996, in Book 96-2B, page 8709, as Document 96109302
- (J) Existing 10' Public Utility Easement per plat filed 08/11/98 in Plat Book 98C, Page 238.

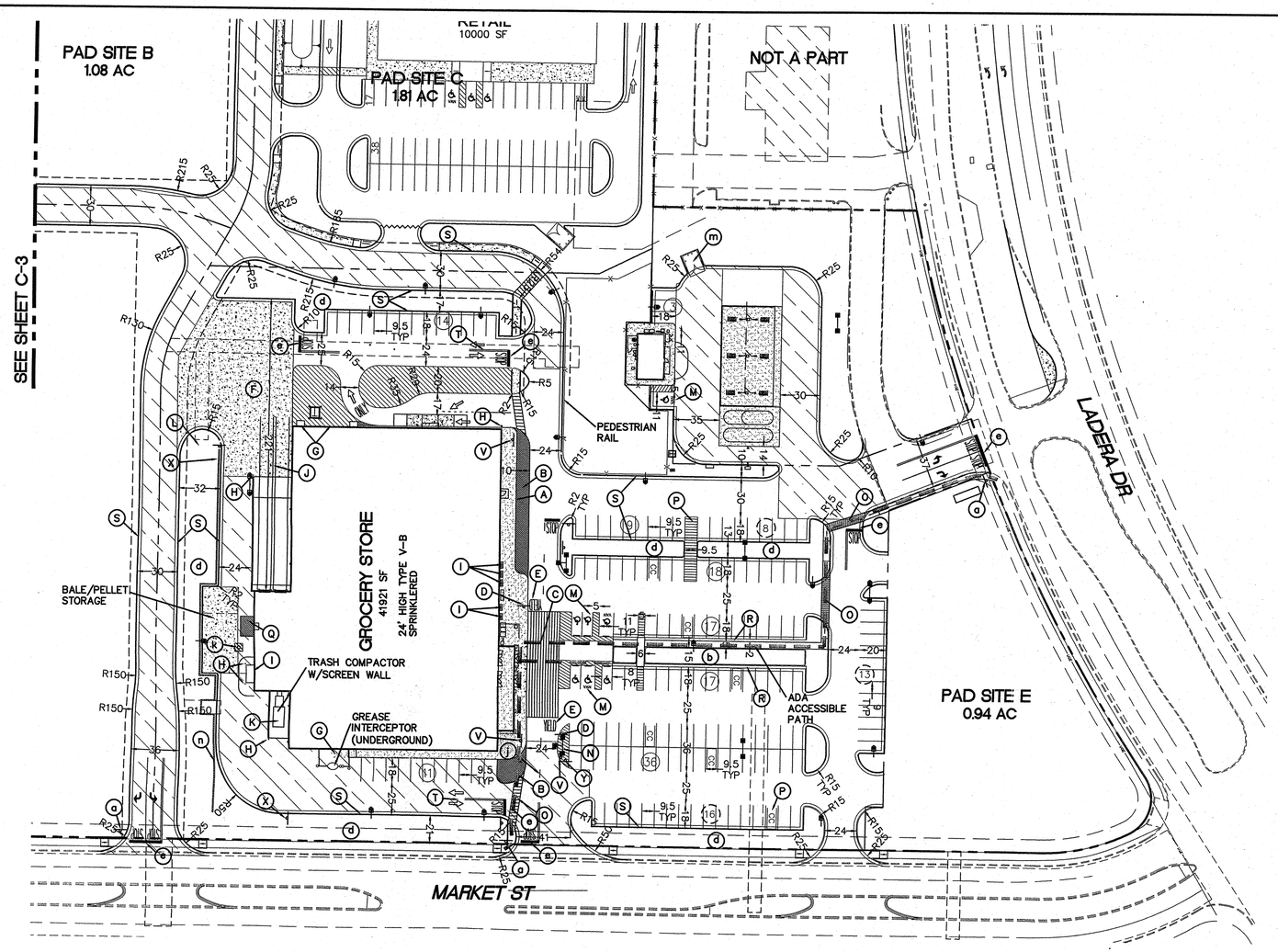
PROFESSIONAL SURVEYOR — STATE OF NEW MEXICO — No. 9750 — RUSS P. HUGG

DOC# 2015028498
04/07/2015 02:20 PM Page: 3 of 3
PLAT R $25.00 B: 2015C P: 0037 M: Toulouse Oliver, Bernalillo Cour

FOR REFERENCE ONLY
SHEET 3 OF 3

SURVTEK, INC.
Consulting Surveyors
9384 Valley View Drive, N.W. Albuquerque, New Mexico 87114
Phone: 505-897-3366 Fax: 505-897-3377

130412_PLAT 2_3-10-15. DWG



SEE SHEET SP-2 FOR KEYED NOTES

SITE NOTES

1. ALL WORK AND MATERIALS SHALL COMPLY WITH ALL CITY/COUNTY REGULATIONS AND CODES AND O.S.H.A. STANDARDS.
2. CONTRACTOR SHALL REFER TO THE ARCHITECTURAL PLANS FOR EXACT LOCATIONS AND DIMENSIONS OF VESTIBULES, SLOPE PAVING, SIDEWALKS, EXIT PORCHES, TRUCK DOCKS, PRECISE BUILDING DIMENSIONS AND EXACT BUILDING UTILITY ENTRANCE LOCATIONS.
3. ALL DISTURBED AREAS ARE TO RECEIVE FOUR INCHES OF TOPSOIL, SEED, MULCH AND WATER UNTIL A HEALTHY STAND OF GRASS IS ESTABLISHED.
4. ALL CURBED RADII ARE TO BE 10' UNLESS OTHERWISE NOTED. STRIPED RADII ARE TO BE 5'.
5. ALL DIMENSIONS AND RADII ARE TO THE FACE OF CURB UNLESS OTHERWISE NOTED.
6. EXISTING STRUCTURES WITHIN CONSTRUCTION LIMITS ARE TO BE ABANDONED, REMOVED OR RELOCATED AS NECESSARY. ALL COST SHALL BE INCLUDED IN BASE BID.
7. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL RELOCATIONS, (UNLESS OTHERWISE NOTED ON PLANS) INCLUDING BUT NOT LIMITED TO, ALL UTILITIES, STORM DRAINAGE, SIGNS, TRAFFIC SIGNALS & POLES, ETC. AS REQUIRED. ALL WORK SHALL BE IN ACCORDANCE WITH GOVERNING AUTHORITIES REQUIREMENTS AND PROJECT SITE WORK SPECIFICATIONS AND SHALL BE APPROVED BY SUCH. ALL COST SHALL BE INCLUDED IN BASE BID.
8. SITE BOUNDARY, TOPOGRAPHY, UTILITY AND ROAD INFORMATION TAKEN FROM A SURVEY BY A LAND SURVEYOR.
9. TOTAL LAND AREA IS XX.XX± ACRES.
10. NO WETLANDS WERE PRESENT ON THIS SITE AS INDICATED BY THE LETTER FROM THE U.S. ARMY CORP OF ENGINEERS LETTER DATE XX-XX-XX. (REFERENCE)
11. THE SITE WORK FOR THIS PROJECT SHALL MEET OR EXCEED "THE SITE SPECIFIC SPECIFICATIONS".
12. PYLON SIGNS SHALL BE CONSTRUCTED BY OTHERS.
13. REFER TO ARCH. PLANS FOR SITE LIGHTING ELECTRICAL PLAN.
14. ALL WM GENERAL CONTRACTOR WORK TO BE COMPLETED (EARTHWORK, FINAL UTILITIES, AND FINAL GRADING) BY THE MILESTONE DATE IN PROJECT DOCUMENTS. OUTLOT AREA TO BE KEPT FREE OF JOB TRAILERS AND STORAGE AFTER THE CONTRACT MILESTONE DATE FOR THE OUTLOT. WM GENERAL CONTRACTOR TO PROVIDE CLEAR ACCESS FOR OUTLOT CONTRACTOR TO THE SPECIFIC PARCEL AT ALL TIMES AFTER MILESTONE DATE. PURCHASER OF OUTLOT TO PROVIDE PERMIT DOCUMENTS AND SWPPP REQUIRED BY STATE/LOCAL REQUIREMENTS FOR SPECIFIC OUTLOT.

PROJECT NUMBER: 1003275

APPLICATION NUMBER: 14EPC-40079, 15DRB-70051

This plan is consistent with the specific Site Development Plan approved by the Environmental Planning Commission (EPC), dated _____, and the Findings and Conditions in the Official Notification of Decision are satisfied.

Is an Infrastructure List required? ( ) Yes ( ) No If Yes, then a set of approved DRC plans with a work order is required for any construction within Public Right-of-Way or for construction of public improvements.

DRB SITE DEVELOPMENT PLAN SIGNOFF APPROVAL:

Traffic Engineer, Transportation Division	02-25-15 Date
Water Utility Development	02/25/15 Date
Parks & Recreation Department	02-25-15 Date
City Engineer	Date
* Environmental Health Department (conditional)	Date
Solid Waste Management	Date
DRB Chairperson, Planning Department	Date

* Environmental Health, if necessary

SITE DATA

LEGAL DESCRIPTION: PORTION OF TRACT 1-A-1, PLAT OF TRACTS 1-A-1 & 1-B-1 EL RANCHO ATRISCO PHASE 3

ZONING:

PAD SITES A, B, C, E
SU-1/SU-2 PLANNED OFFICE PARK & COMMERCIAL DEVELOPMENT WITH SALES FOR FULL SERVICE ALCOHOL SALES FOR SIT DOWN RESTAURANT.

PAD SITE D
SU1-SU2 FOR PLANNED OFFICE PARK AND COMMERCIAL DEVELOPMENT TO INCLUDE SALES OF PACKAGE LIQUOR IN ASSOCIATION WITH A GROCERY STORE. PERMITTEE SHALL NOT SELL DISTILLED SPIRITS IN ANY PACKAGE THAT CONTAINS LESS THAN 750 MILLILITERS (MINIBOTTLES) AND BEER IN ANY SINGLE CONTAINER CONTAINING 16 OR FEWER OUNCES (SINGLES)

SITE AREA: PAD D (GROCERY STORE): 4.99 ACRES
PAD F (GAS PAD): 0.9751 ACRES

PROPOSED USE:
GROCERY STORE (41,921 SF) WITH A PHARMACY DRIVE-UP SERVICE WINDOW, RETAIL SALES OF GASOLINE WITH 6-TWO SIDED FUELING DISPENSER UNITS, AND CONVENIENCE STORE (740 SF); RETAIL BUILDING (10,000 SF) WITH DRIVE-UP WINDOW.

PEDESTRIAN AND VEHICULAR INGRESS AND EGRESS:
VEHICULAR ACCESS AND CIRCULATION- THE PROPOSED DEVELOPMENT HAS ACCESS TO ADJACENT STREETS ON ALL FOUR SIDES OF THE PROPERTY. LIMITED ACCESS TO UNSER BOULEVARD (A LIMITED ACCESS PRINCIPAL ARTERIAL) HAS BEEN APPROVED BY THE TRANSPORTATION COORDINATING COMMITTEE OF THE METROPOLITAN TRANSPORTATION BOARD OF THE MID-REGION COUNCIL OF GOVERNMENTS (R-14-01 TCC). ACCESS INCLUDES A RIGHT-IN, RIGHT OUT, AND LEFT-IN ACCESS (APPROXIMATELY 1,040 FEET SOUTH OF LADERA) AND AN ADDITIONAL RIGHT-IN ACCESS (APPROXIMATELY 529 FEET SOUTH OF LADERA) TO SERVE THE PROPOSED DEVELOPMENT. THERE ARE EXISTING ACCESS POINTS ON THE NORTH SIDE OF THE PROPERTY TO LADERA DRIVE THAT REMAIN. ADDITIONAL ACCESS IS SHOWN ON LADERA DRIVE, MARKET STREET, AND HANOVER ROAD.

SITE DATA (CONTINUED)

INTERNAL CIRCULATION REQUIREMENTS:
INTERNAL ROADWAY AND SIDEWALK NETWORK TO INTERCONNECT USES WITHIN CENTER WITH PUBLIC RIGHT OF WAY.

MAXIMUM BUILDING HEIGHT ALLOWED (ALL LOTS):
MAXIMUM BUILDING HEIGHTS FOR ALL BUILDING SHALL BE PER THE SU-1 ZONE.

MINIMUM BUILDING SETBACK:
N/A

MAXIMUM TOTAL DWELLING UNITS (ALL LOTS):
NO RESIDENTIAL PROPOSED

NON RESIDENTIAL USES' MAXIMUM FLOOR AREA RATIO (ALL LOTS):
MAXIMUM F.A.R IS 0.30

PHASING:
ACCESS ON PUBLIC RIGHT OF WAY AND INTERNAL ROADWAY NETWORK WITH PUBLIC UTILITIES TO BE CONSTRUCTED WITH FIRST DEVELOPMENT.

NOTE:
SITE LIGHTING SHALL COMPLY WITH THE LIGHTING REGULATIONS OF THE ZONING CODE, 14-16-3-9, AREA LIGHTING REGULATIONS. LIGHT FIXTURES WITHIN 100 FEET OF A RESIDENTIAL AREA SHALL NOT EXCEED 16 FEET. THE MAXIMUM HEIGHT FOR PARKING LOT LIGHTS SHALL BE A MAXIMUM OF 28 FEET.

PARKING DATA (GROCERY STORE AND GAS LOT)

PARKING REQUIRED	210 SPACES (1 SPACE PER 200 SF) GROCERY
PARKING REQUIRED	4 SPACES (1 SPACE PER 200 SF) GAS LOT
TOTAL PARKING REQUIRED	214 SPACES
PARKING PROVIDED	160 SPACES (GROCERY) + 4 (GAS LOT)
HC PARKING REQUIRED	8 SPACES
HC PARKING PROVIDED	8 SPACES (GROCERY) + 1 (GAS LOT)
TOTAL PARKING PROVIDED	164 SPACES
MC PARKING REQUIRED	5 SPACES
MC PARKING PROVIDED	5 SPACES
BICYCLE PARKING PROVIDED	25 SPACES (5 RACKS)

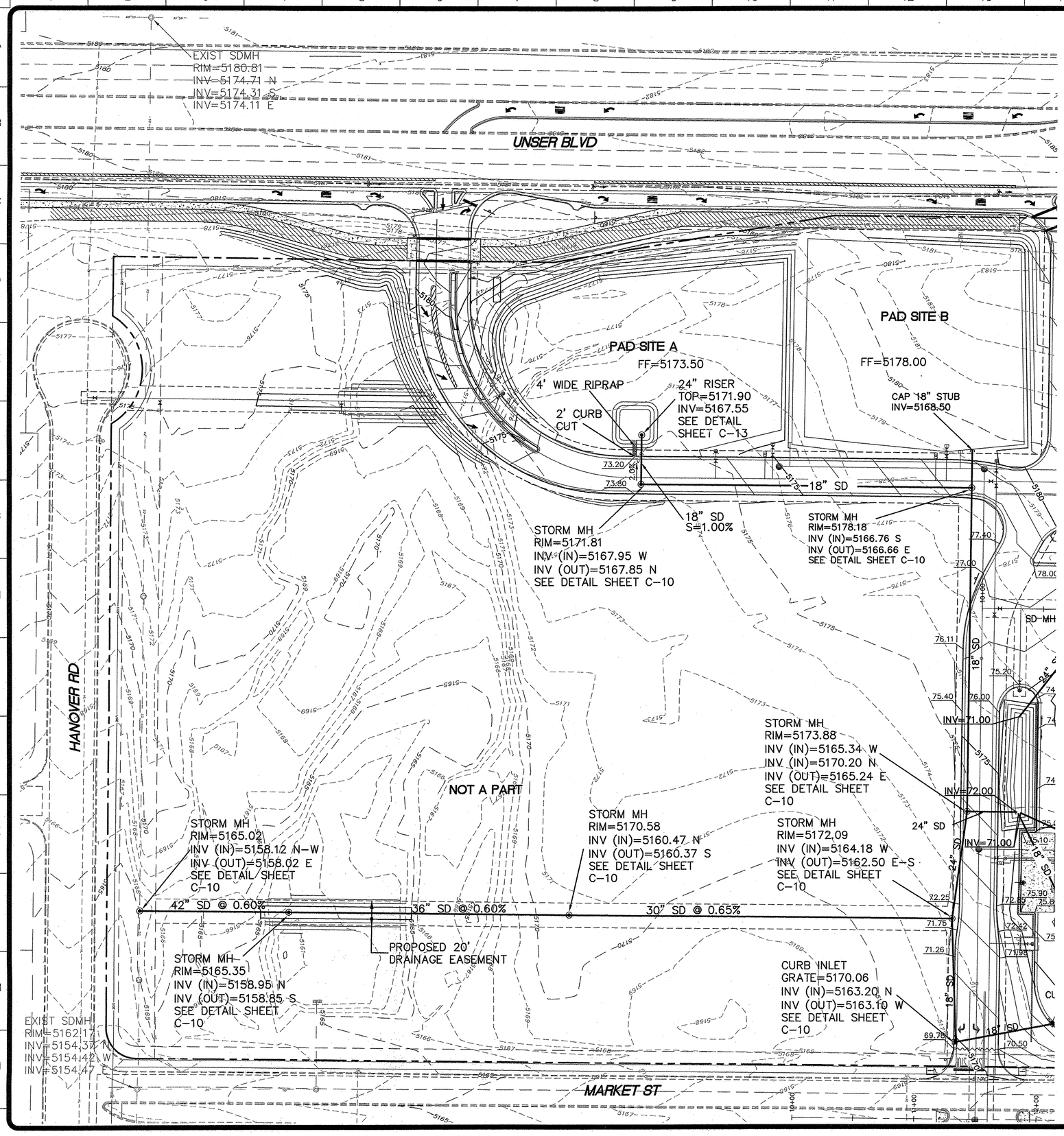
**SEE SHEET SP-2 FOR PAD C PARKING DATA

INDEX TO DRAWINGS

GRAPHIC SCALE
50 0 25 50
(IN FEET)
1 inch = 50 ft.

FOR REFERENCE ONLY

ENGINEER'S SEAL	HERITAGE MARKET PLACE ALBUQUERQUE, NM	DRAWN BY pm
	PAD D SITE PLAN FOR BUILDING PERMIT	DATE 2-17-15
		DRAWING 2014038-SPC
	TIERRA WEST, LLC 5571 MIDWAY PARK PL NE ALBUQUERQUE, NEW MEXICO 87109 (505) 858-3100 www.tierrawestllc.com	SHEET NO SP-1
RONALD R. BOHANNAN P.E. #7868		JOB # 2014038



LEGEND

- CURB & GUTTER
- BOUNDARY LINE
- EASEMENT
- SIDEWALK
- EXISTING CURB & GUTTER
- SINGLE CLEAN OUT
- DOUBLE CLEAN OUT
- EXISTING SD MANHOLE
- EXISTING SAS MANHOLE
- EXISTING FIRE HYDRANT
- EXISTING WATER METER
- EXISTING POWER POLE
- EXISTING GAS VALVE
- U — EXISTING OVERHEAD UTILITIES
- G — EXISTING GAS
- EX. 8" SAS — EXISTING SANITARY SEWER LINE
- EX. WL — EXISTING WATER LINE
- EX. SD — EXISTING STORM SEWER LINE
- 4900 — EXISTING INDEX CONTOUR
- EXISTING CONTOUR
- WATER BLOCK

EROSION CONTROL NOTES:

1. CONTRACTOR IS RESPONSIBLE FOR MAINTAINING RUN-OFF ON SITE DURING CONSTRUCTION.
2. CONTRACTOR IS RESPONSIBLE FOR CLEANING ALL SEDIMENT THAT GETS INTO EXISTING RIGHT-OF-WAY.
3. REPAIR OF DAMAGED FACILITIES AND CLEANUP OF SEDIMENT ACCUMULATIONS ON ADJACENT PROPERTIES AND IN PUBLIC FACILITIES IS THE RESPONSIBILITY OF THE CONTRACTOR.
4. ALL EXPOSED EARTH SURFACES MUST BE PROTECTED FROM WIND AND WATER EROSION PRIOR TO FINAL ACCEPTANCE OF ANY PROJECT.

NOTICE TO CONTRACTORS

1. TWO WORKING DAYS PRIOR TO ANY EXCAVATION, CONTRACTOR MUST CONTACT LINE LOCATING SERVICE, 765-1234, FOR LOCATION OF EXISTING UTILITIES.
2. PRIOR TO CONSTRUCTION, THE CONTRACTOR SHALL EXCAVATE AND VERIFY THE HORIZONTAL AND VERTICAL LOCATIONS OF ALL CONNECTIONS. SHOULD A CONFLICT EXIST, THE CONTRACTOR SHALL NOTIFY THE ENGINEER SO THAT THE CONFLICT CAN BE RESOLVED WITH A MINIMUM AMOUNT OF DELAY.
3. BACKFILL COMPACTION SHALL BE ACCORDING TO TRAFFIC/STREET USE.
4. MAINTENANCE OF THESE FACILITIES SHALL BE THE RESPONSIBILITY OF THE OWNER OF THE PROPERTY SERVED.

CAUTION:

ALL EXISTING UTILITIES SHOWN WERE OBTAINED FROM RESEARCH, AS-BUILTS, SURVEYS OR INFORMATION PROVIDED BY OTHERS. IT SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR TO CONDUCT ALL NECESSARY FIELD INVESTIGATIONS PRIOR TO AND INCLUDING ANY EXCAVATION, TO DETERMINE THE ACTUAL LOCATION OF UTILITIES AND OTHER IMPROVEMENTS, PRIOR TO STARTING THE WORK. ANY CHANGES FROM THIS PLAN SHALL BE COORDINATED WITH AND APPROVED BY THE ENGINEER.

GRAPHIC SCALE

40 0 20 40

(IN FEET)
1 inch = 40 ft.

FOR REFERENCE ONLY

GRADING AND DRAINAGE PLAN

REVISIONS	BY

TIERRA WEST, LLC
5571 MIDWAY PARK PL NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

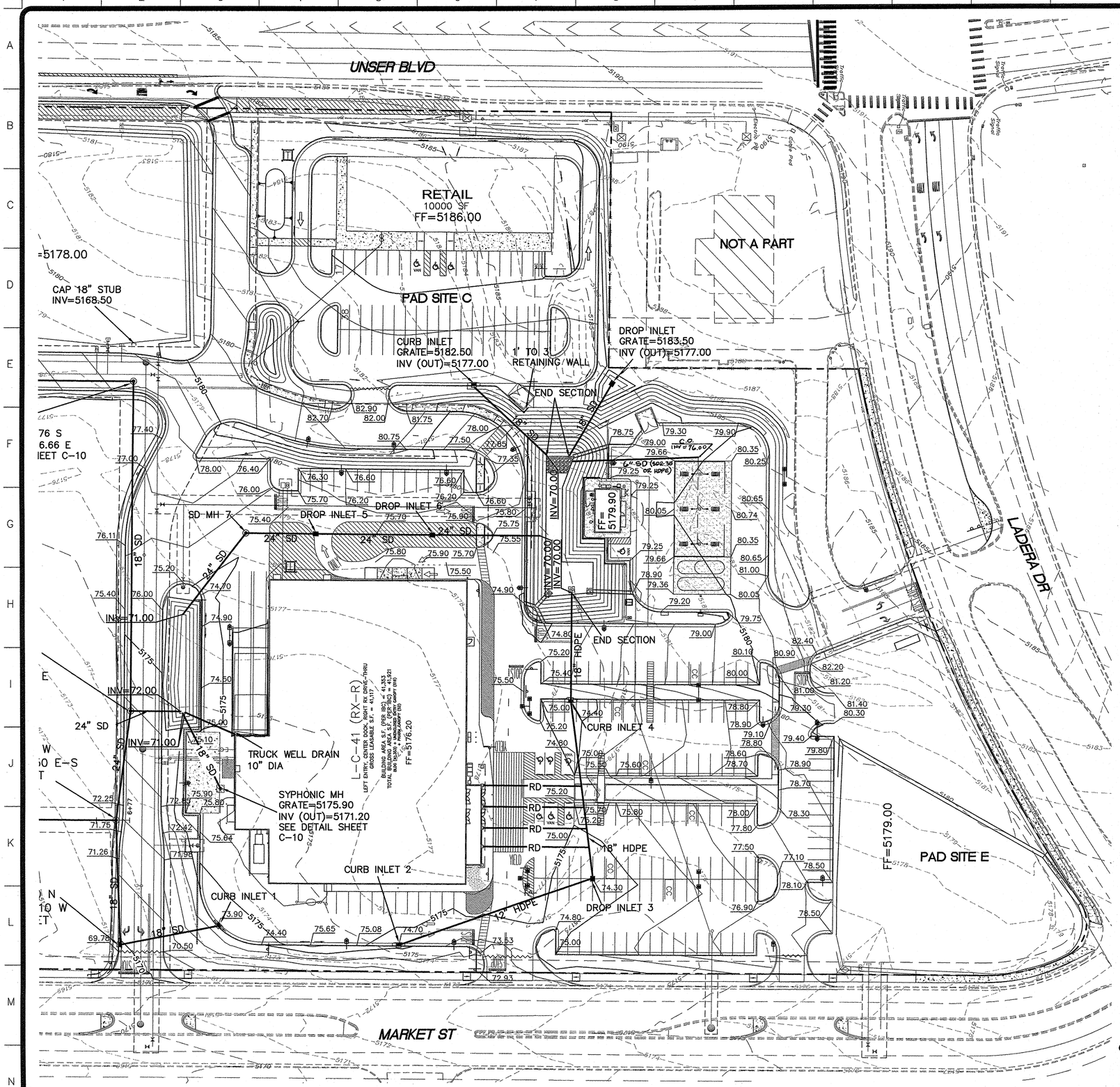
RONALD R. BOHANNAN
NEW MEXICO
7868
PROFESSIONAL ENGINEER

NEIGHBORHOOD MARKET #4676
ALBUQUERQUE (LADERA), BERNCO, NM

WAL-MART STORES, INC.
2001 SE 10TH STREET
BENTONVILLE, AR 72716

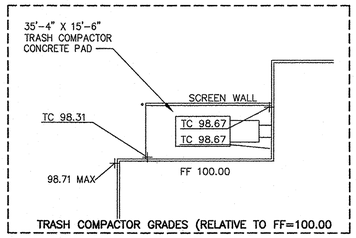
Walmart

DRAWN	pm
CHECKED	JDH
DATE	2-5-15
SCALE	1"=40'
JOB No.	2014038
SHEET	C-5
OF	SHEETS

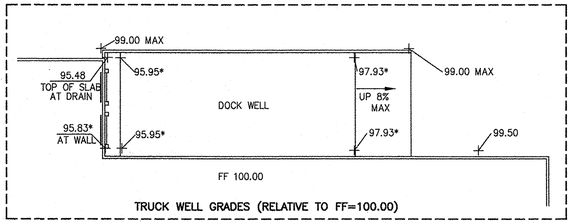


LEGEND

- CURB & GUTTER
- BOUNDARY LINE
- EASEMENT
- SIDEWALK
- EXISTING CURB & GUTTER
- SINGLE CLEAN OUT
- DOUBLE CLEAN OUT
- EXISTING SD MANHOLE
- EXISTING SAS MANHOLE
- EXISTING FIRE HYDRANT
- EXISTING WATER METER
- EXISTING POWER POLE
- EXISTING GAS VALVE
- EXISTING OVERHEAD UTILITIES
- EXISTING GAS
- EXISTING SANITARY SEWER LINE
- EXISTING WATER LINE
- EXISTING STORM SEWER LINE
- EXISTING INDEX CONTOUR
- EXISTING CONTOUR
- PROPOSED STORM DRAIN (RCP OR HDPE)
- RIPRAP SEE DETAIL SHEET C-11
- CONCRETE FLUME, SEE DETAIL SHEET C-11



TRASH COMPACTOR GRADES (RELATIVE TO FF=100.00



TRUCK WELL GRADES (RELATIVE TO FF=100.00)

STRUCTURE TABLE

STRUCTURE	RIM/GRATE	INV IN	INV OUT
CURB INLET 1	5173.90		5167.10
CURB INLET 2	5174.70		5172.18
DROP INLET 3	5174.30	5171.35	5171.25
CURB INLET 4	5174.40	5170.53	5170.43
DROP INLET 5	5175.20	5171.43	5171.43
DROP INLET 6	5175.30	5171.72	5171.72
SD MH 7	5175.30	5171.25	5171.25

NOTE

1. SEE SHEET C-7 FOR GRADES AROUND BUILDING
2. SEE SHEET C-7 FOR FOUNDATION SUBSURFACE PREPARATION
3. SE SHEET C-8 FOR FUEL PAD GRADING

CAUTION:
ALL EXISTING UTILITIES SHOWN WERE OBTAINED FROM RESEARCH, AS-BUILTS, SURVEYS OR INFORMATION PROVIDED BY OTHERS. IT SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR TO CONDUCT ALL NECESSARY FIELD INVESTIGATIONS PRIOR TO AND INCLUDING ANY EXCAVATION, TO DETERMINE THE ACTUAL LOCATION OF UTILITIES AND OTHER IMPROVEMENTS, PRIOR TO STARTING THE WORK. ANY CHANGES FROM THIS PLAN SHALL BE COORDINATED WITH AND APPROVED BY THE ENGINEER.

BEFORE YOU DIG
NM ONE CALL 260-1990

GRAPHIC SCALE
40 0 20 40
(IN FEET)
1 inch = 40 ft.

FOR REFERENCE ONLY

GRADING AND DRAINAGE PLAN

REVISIONS	BY

TERRA WEST, LLC
5571 MIDWAY PARK PL NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 857-1700
www.terrawestllc.com

RONALD R. BOHANNAN
NEW MEXICO
PROFESSIONAL ENGINEER

NEIGHBORHOOD MARKET #4676
WAL-MART STORES, INC.
2001 SE 10TH STREET
BENTONVILLE, AR 72716

Walmart

DRAWN	pm
CHECKED	JDH
DATE	2-5-15
SCALE	1"=40'
JOB No.	2014038
SHEET	C-6
OF	SHEETS

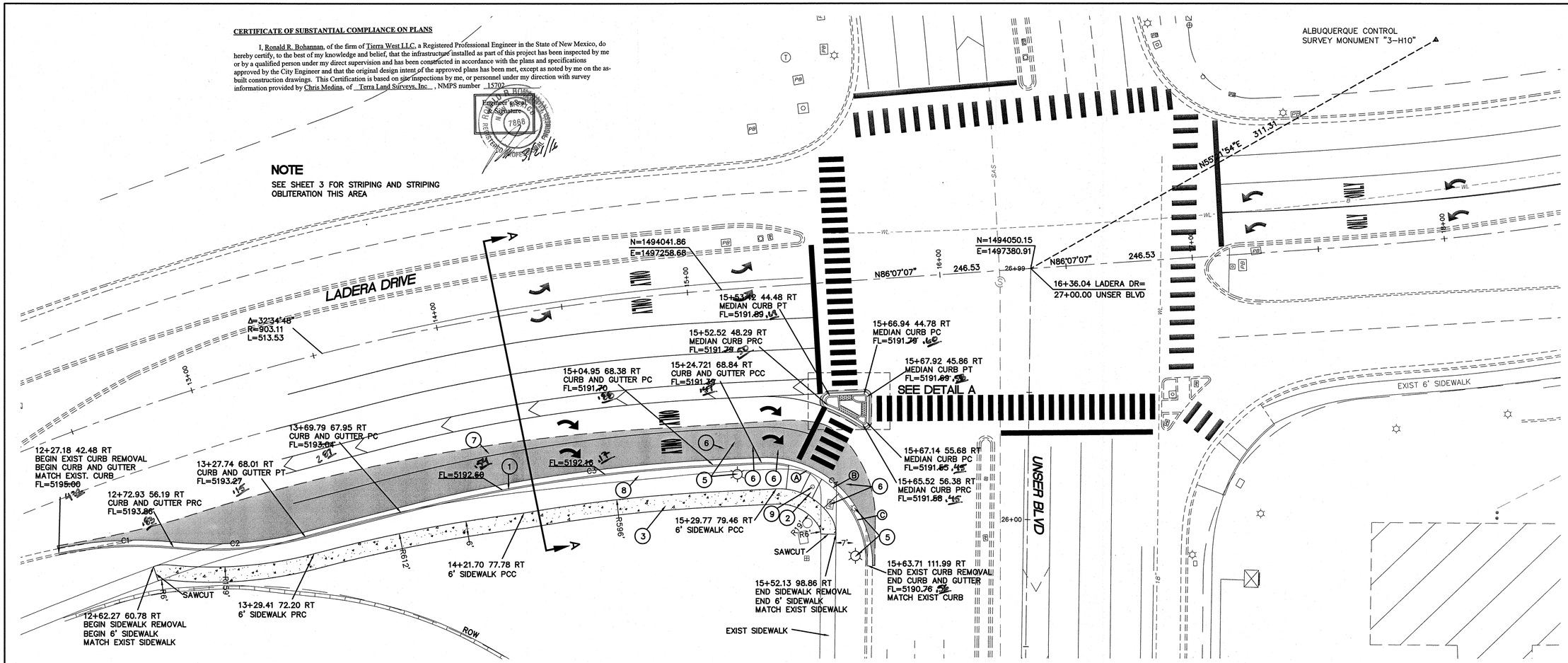
CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc. , NMPS number 15702 .

Engineer's Seal & Signature

ROLAND R. BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER

3/27/16



LEGEND

- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- BOUNDARY LINE
- EXISTING BOUNDARY LINE
- CENTERLINE
- RIGHT-OF-WAY
- 4" DASHED WHITE LINE
- 4" SOLID WHITE STRIPE
- SAWCUT LINE
- W — EXISTING WL
- SD — EXISTING SD
- SAS — EXISTING SAS
- NEW ASPHALT PAVING SEE DETAIL THIS SHEET

KEYED NOTES

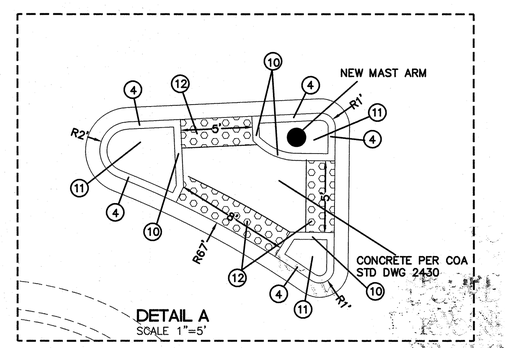
1. STANDARD 8" CURB AND GUTTER PER COA STD DWG 2415A
2. ACCESSIBLE RAMP PER COA STD DWG 2441
3. 6' CONCRETE SIDEWALK PER COA STD DWG 2430
4. MEDIAN CURB PER COA STD DWG 2415B
5. RELOCATE EXISTING LIGHT POLE
6. RELOCATE EXISTING PULL BOXES PER SIGNAL PLAN
7. REMOVE AND DISPOSE 365 LF EXIST CURB, REMOVE TO NEAREST JOINT
8. REMOVE AND DISPOSE 290 LF EXIST SIDEWALK, REMOVE TO NEAREST JOINT
9. EXISTING CAMERA TO BE RELOCATED, SEE SIGNAL PLAN
10. 6" HEADER CURB PER COA STD DWG 2415B
11. MEDIAN CONCRETE PAVING PER COA STD DWG 2408 & 2502
12. 24" DETECTABLE WARNING SURFACE SEE DETAIL SHEET 22

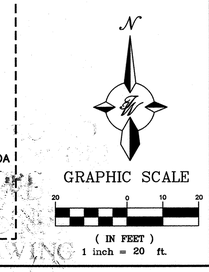
CURVE TABLE			
CURVE	DELTA	RADIUS	LENGTH
C1	17°23'53"	149.97	45.54
C2	20°06'58"	149.99	52.66
C3	11°49'28"	606.00	125.07
C4	93°14'23"	40.00	65.09
C5	34°26'04"	35.00	21.03
C6	111°13'42"	25.00	48.53

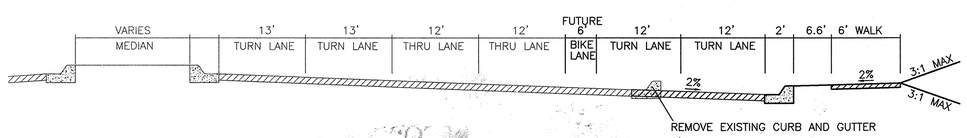
QUARTER POINTS

C4

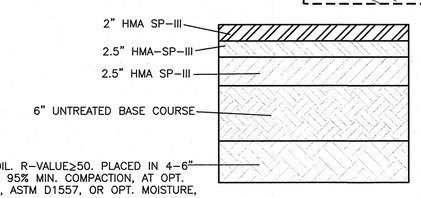
FL	ELEV.
A	5191.24
B	5191.08
C	5190.92







SECTION A-A



12" SUBGRADE SOIL. R-VALUE≥50. PLACED IN 4-6" COMPACTED LIFTS. 95% MIN. COMPACTION, AT OPT. MOISTURE ± 2.0%, ASTM D1557, OR OPT. MOISTURE, TO +4%, ASTM D698 FOR SOIL W/35% OR MORE MATERIAL PASSING THE NO. 200 SIEVE. SOIL NOT HAVING THE MIN. R-VALUE OF 50, SHALL BE REMOVED TO A DEPTH OF 2' BELOW FINISH SUBGRADE AND REPLACED BY THE CONTRACTOR WITH SUITABLE MATERIAL OR A PAVEMENT SHALL BE DESIGNED BY TIERRA WEST, LLC ACCOMMODATING THE EXISTING R-VALUE PER C.O.A. STANDARD SPECIFICATIONS.

TYP PAVEMENT SECTION

FROM CITY PROJECT NO 691591

NICORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R.T.C. CONSTRUCTION
WORK STAKED BY TIERRA LAND SURVEYS
INSPECTOR'S ACCEPTANCE BY TWLLC/COA
FIELD VERIFICATION BY TWLLC/COA
DRAWINGS CORRECTED BY TIERRA WEST LLC
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES (CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN
DESIGNED BY JH DATE Feb, 2015
DRAWN BY pm DATE Feb, 2015
DRAWING NAME 20140038-LADERA JOB NO. 20140038
CHECKED BY RRB DATE Feb, 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

LADERA DRIVE

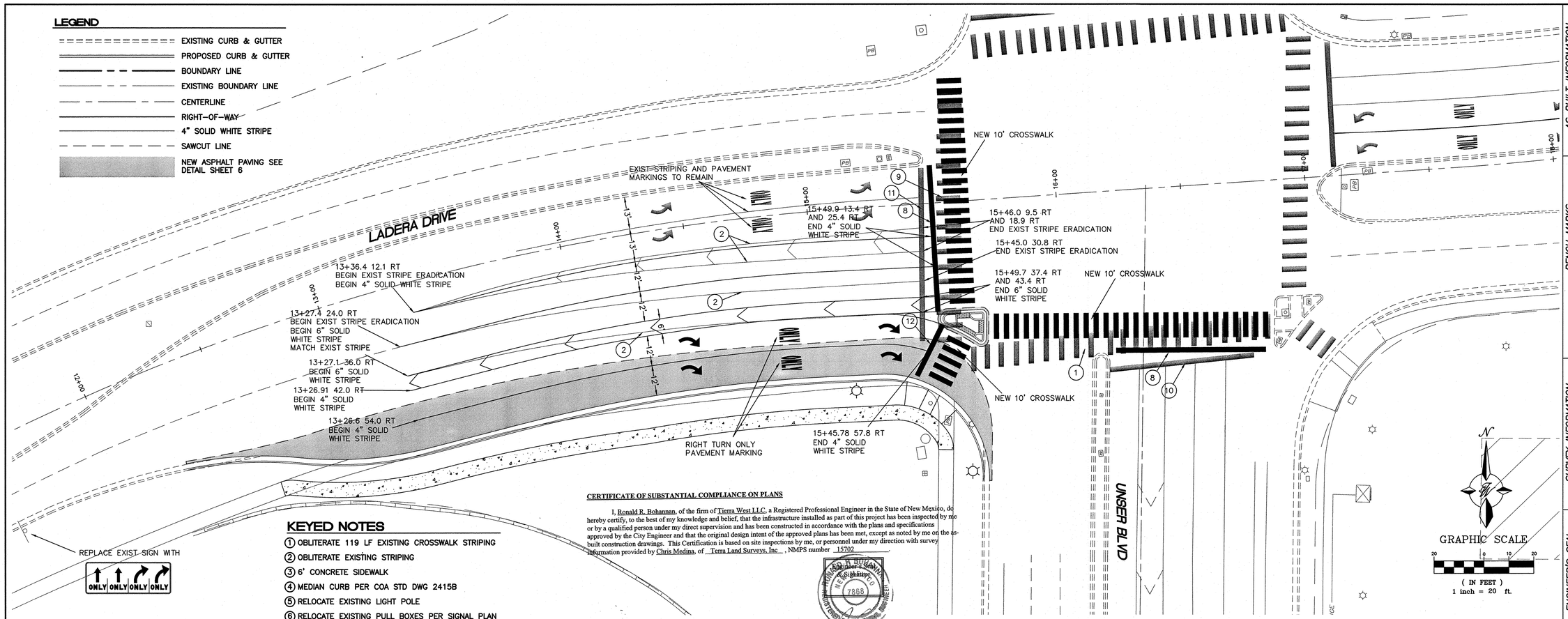
PAVING IMPROVEMENTS PLAN 12+25 TO 16+00

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	2 of 22

LEGEND

- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- BOUNDARY LINE
- EXISTING BOUNDARY LINE
- CENTERLINE
- RIGHT-OF-WAY
- 4" SOLID WHITE STRIPE
- SAWCUT LINE
- NEW ASPHALT PAVING SEE DETAIL SHEET 6



KEYED NOTES

1. OBLITERATE 119 LF EXISTING CROSSWALK STRIPING
2. OBLITERATE EXISTING STRIPING
3. 6' CONCRETE SIDEWALK
4. MEDIAN CURB PER COA STD DWG 2415B
5. RELOCATE EXISTING LIGHT POLE
6. RELOCATE EXISTING PULL BOXES PER SIGNAL PLAN
7. REMOVE AND DISPOSE 365 LF EXIST CURB
8. 2' STOP BAR
9. OBLITERATE 103 LF EXISTING CROSSWALK STRIPING
10. OBLITERATE 58 LF STOP BAR
11. OBLITERATE 69 LF STOP BAR
12. 2' STOP BAR

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Registered Signature

RONALD R. BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER

3/2/16

GENERAL NOTES:

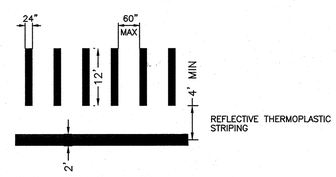
1. OBLITERATE EXISTING CROSSWALK STRIPING
2. EXISTING MARKINGS IDENTIFIED TO BE REMOVED SHALL BE COMPLETELY OBLITERATED TO A MAXIMUM DEPTH OF 0.25" AND FOR A WIDTH EQUAL TO TWO TIMES THE WIDTH OF THE STRIPE OR MARKING TO BE REMOVED, PER COA STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, SECTION 443.3.2
3. ALL SIGNS SHALL BE MADE IN ACCORDANCE WITH THE M.U.T.C.D. (CURRENT EDITION) SPECIFICATIONS.
4. ALL STRIPING AND PAVEMENT MARKINGS SHALL BE IN ACCORDANCE WITH THE M.U.T.C.D. (CURRENT EDITION) SPECIFICATIONS.
5. OBLITERATE EXISTING STOP BAR

PERMANENT SIGNING AND STRIPING NOTES:

1. ALL REGULATORY, WARNING, SPECIAL, AND GUIDE SIGNS SHALL COMPLY WITH THE FOLLOWING REQUIREMENTS:

SIGN	SIGN CODE	COLOR	LETTER SHEETING	BACKGROUND SHEETING
STOP	R1-1	(W/RED)	TYPE VIII OR IX	TYPE XI
YIELD	R1-2	(W/RED)	TYPE VIII OR IX	TYPE XI
DO NOT ENTER	R5-1	(W/RED)	TYPE VIII OR IX	TYPE XI
WRONG WAY	R5-1A	(W/RED)	TYPE VIII OR IX	TYPE XI
SCHOOL BUS STOP	S3-1	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
SCHOOL BUS X-ING	S1-1	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
PEDESTRIAN X-ING	W11-2	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
BIKE X-ING	W11-1	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
ALL SCHOOL/PED/BIKE SUPPLEMENTAL PLAQUES		(BLK/FLOURESCENT YELLOW GREEN)WHEREVER BLK/YELLOW IS SPECIFIED COLOR IN MUTCD	TYPE VIII OR IX	TYPE XI
ALL OTHER WARNING SIGNS AND SUPPLEMENTAL PLAQUES		(BLK/FLOURESCENT YELLOW GREEN)WHEREVER BLK/YELLOW IS SPECIFIED COLOR IN MUTCD	TYPE VIII OR IX	TYPE XI
GUIDE & DESTINATION SIGNS INCLUDES EXTRUDED & NON-EXTRUDED (OVERHEAD & GROUND MOUNTED)	ALL	(W/GREEN) EXCEPT WHERE SPECIFIED OTHERWISE IN THE MUTCD	TYPE VIII OR IX	TYPE XI
E-CODE SIGNS	E11-1, 1A 1B, 1C	(BLK/YELLOW)	TYPE VIII OR IX	TYPE XI
RECREATIONAL & CULTURAL INTEREST	ALL	(W/BROWN)	TYPE VIII OR IX	TYPE XI
GENERAL SERVICES	ALL	(W/BLUE)	TYPE VIII OR IX	TYPE XI
SPECIFIC SERVICES	ALL	(W/BLUE)	TYPE VIII OR IX	TYPE XI
ALL OTHER PERMANENT SIGNS		(BLK/WHITE) EXCEPT WHERE SPECIFIED OTHERWISE IN THE MUTCD	TYPE IV	TYPE XI

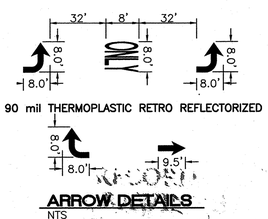
2. ONLY 0.125 INCHES THICK ALUMINUM PANEL SIGNS ARE PERMITTED FOR WARNING AND REGULATORY SIGNS.
3. ANTI-GRAFFITI COATING SHALL BE APPLIED ON ALL REGULATORY, WARNING, GUIDE, AND OTHER SPECIAL SIGNS.
4. QUANTITIES MAY VARY AS FIELD CONDITIONS DICTATE. THE CONTRACTOR WILL BE PAID FOR ACTUAL QUANTITIES USED.
5. ALL TRAFFIC CONTROL DEVICES SHALL COMPLY WITH NM STANDARDS SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION (LATEST EDITION) AND ANY APPLICABLE SPECIAL PROVISION AND/ OR SUPPLEMENTAL SPECIFICATION. ALSO THE DEVICES SHALL COMPLY WITH THE CURRENT EDITION, WITH REVISION, OF THE MUTCD.
6. EACH SIGN FACE SHOWN ON PLANS SHALL MEET THE SPECIFICATIONS IN THE STANDARD HIGHWAY SIGNS MANUAL (CURRENT EDITION) FOR PROPER ARRANGEMENT, SPACING OF LETTERS, LETTER HEIGHT, SYMBOLS AND BORDERS FOR THE SPECIFIED SIZE AND MESSAGE AS SHOWN ON PLANS.
7. POST LENGTHS ARE BASED ON A MINIMUM OF 5 FT FOR RURAL ROADWAY SECTIONS TO A MINIMUM OF 7 FT FOR URBAN AND INTERSTATE ROADWAY SECTIONS. THE LENGTHS ARE MEASURED FROM THE BOTTOM OF THE SIGN TO NEAR EDGE OF THE DRIVING LANE.
8. THE LATERAL CLEARANCE OF SIGNS SHALL BE NO CLOSER THAN THE 6 FT FROM THE EDGE OF SHOULDER OR 12 FT FROM THE EDGE OF TRAVELED WAY FOR RURAL AREAS AND NO CLOSER THAN 2 FT FROM FACE OF CURB FOR URBAN AREAS.
9. ALL SIGNING HARDWARE, INCLUDING BRACKETS, (FOR MOUNTING ALL STREET NAME SIGNS, W1-8-18 BACK TO BACK MOUNTING, ETC.) ARE CONSIDERED INCIDENTAL TO SIGN INSTALLATION. THEREFORE, NO PAYMENT WILL BE MADE.
10. THREE 4 LB/FT SIGN POST INSTALLATION APPROVED ONLY IF THE SPAN BETWEEN THE OUTER POSTS EXCEEDS 84" (SIGN WIDTH OF 96" OR GREATER).
11. 3"-6" BASE POST ARE REQUIRED FOR ALL SMALL SIGN POST. SEE STANDARD SERIAL DRAWING 701-02-1/3 FOR DETAILS.
12. SIGN POST SHALL BE SQUARE TUBING AS APPROVED BY THE PROJECT MANAGER OR THE DISTRICT TRAFFIC ENGINEER.
13. CONTRACTOR SHALL FIELD VERIFY ALL SIGNING INFORMATION, TEXT, AND LOCATIONS PRIOR TO FABRICATION AND INSTALLATION. NEW SIGN LOCATIONS SHALL BE APPROVED BY THE PROJECT MANAGER OR THE DISTRICT TRAFFIC ENGINEER.
14. HOT THERMOPLASTIC PAVEMENT MARKINGS SHALL TO BE USED ON ALL STRIPING (LONG LINES, CROSSWALKS, LEGENDS, SYMBOLS, ETC.) THE THERMOPLASTIC PAINT SHALL BE APPLIED AT A THICKNESS OF 120 MIL.
15. WATER BLASTING IS THE ONLY APPROVED METHOD OF EXISTING STRIPE REMOVAL WITHIN DISTRICT THREE. THE USE OF BLACK PAINT AS A METHOD OR REMOVING OR COVERING EXISTING STRIPING IS STRICTLY PROHIBITED.



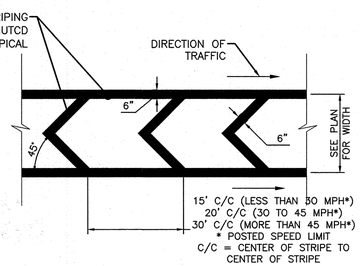
ALL PAVEMENT MARKINGS SHALL CONFORM TO M.U.T.C.D. SPECS (LATEST EDITION)

MAKE SURE VEHICLE WHEEL PATH IS BETWEEN MARKINGS

CROSSWALK DETAIL
NTS



ARROW DETAILS
NTS



CHEVRON STRIPES DETAIL
NTS

RECORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R10 CONSTRUCTION
WORK STAKED BY TERRA LAND SURVEYS
INSPECTED BY CORY TULLE
ACCEPTANCE BY CORY TULLE
FIELD VERIFICATION BY TULLE
DRAWINGS CORRECTED BY TULLE
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES (CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL
RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN
DESIGNED BY JH DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 20140038-LADERA JOB NO. 20140038
CHECKED BY RRB DATE Feb. 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

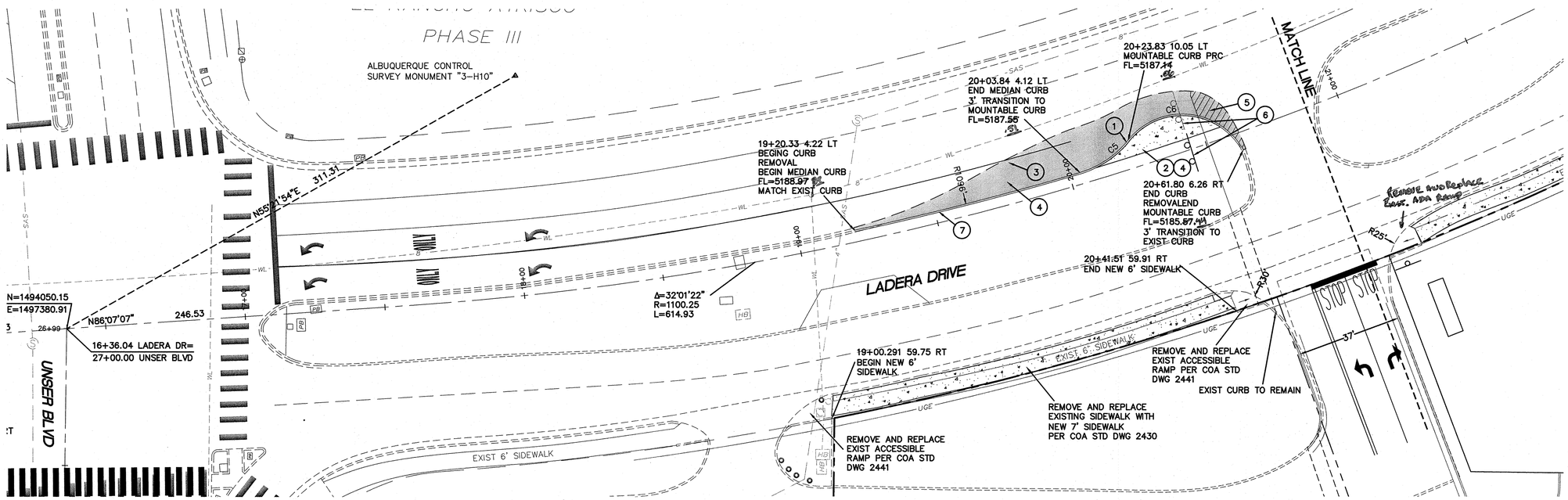
CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

UNSER BOULEVARD

STRIPING AND SIGNAGE PLAN 12+25 TO 16+00

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	3 of 22



CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

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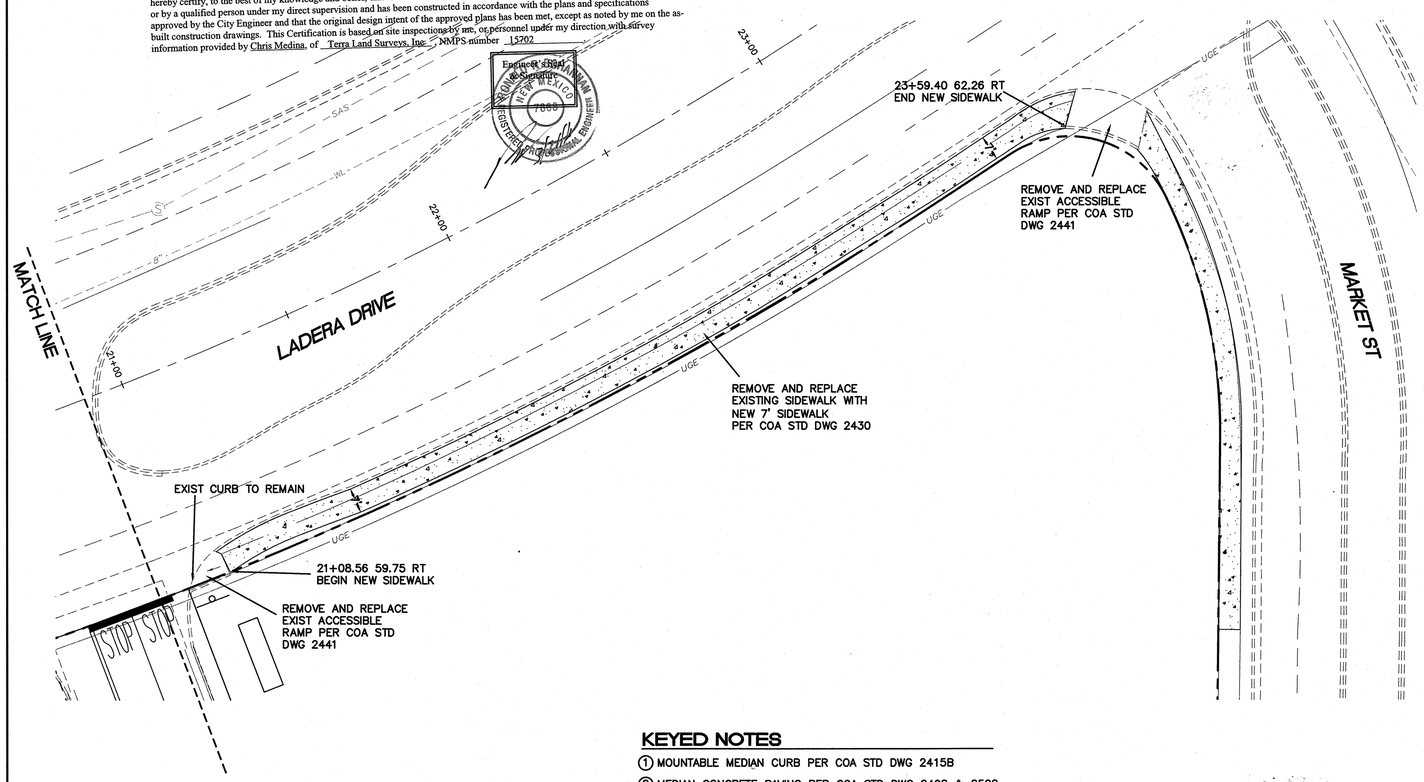
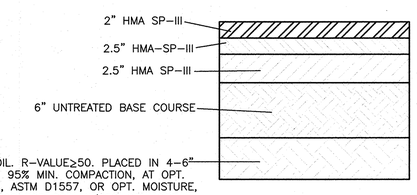
Engineer Seal & Signature



CURVE TABLE			
CURVE	DELTA	RADIUS	LENGTH
C1	17°23'53"	149.97	45.54
C2	20°06'58"	149.99	52.66
C3	11°49'28"	606.00	125.07
C4	93°14'23"	40.00	65.09
C5	34°26'04"	35.00	21.03
C6	111°13'42"	25.00	48.53

LEGEND

- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- BOUNDARY LINE
- EXISTING BOUNDARY LINE
- CENTERLINE
- RIGHT-OF-WAY
- 4" DASHED WHITE LINE
- 4" SOLID WHITE STRIPE
- SAWCUT LINE
- W — EXISTING WL
- SD — EXISTING SD
- SAS — EXISTING SAS
- NEW ASPHALT PAVING SEE DETAIL THIS SHEET
- MEDIAN CONCRETE TO BE REMOVED



12" SUBGRADE SOIL. R-VALUE≥50. PLACED IN 4-6" COMPACTED LIFTS. 95% MIN. COMPACTION, AT OPT. MOISTURE ± 2.0%, ASTM D1557, OR OPT. MOISTURE, TO +4%, ASTM D698 FOR SOIL W/35% OR MORE MATERIAL PASSING THE NO. 200 SIEVE. SOIL NOT HAVING THE MIN. R-VALUE OF 50, SHALL BE REMOVED TO A DEPTH OF 2' BELOW FINISH SUBGRADE AND REPLACED BY THE CONTRACTOR WITH SUITABLE MATERIAL OR A PAVEMENT SHALL BE DESIGNED BY TIERRA WEST, LLC ACCOMMODATING THE EXISTING R-VALUE PER C.O.A. STANDARD SPECIFICATIONS.

TYP PAVEMENT SECTION

FROM CITY PROJECT NO 691591

GRAPHIC SCALE

20 0 10 20

(IN FEET)
1 inch = 20 ft.

KEYED NOTES

1. MOUNTABLE MEDIAN CURB PER COA STD DWG 2415B
2. MEDIAN CONCRETE PAVING PER COA STD DWG 2408 & 2502
3. REMOVE AND DISPOSE 160 LF EXIST CURB, REMOVE TO NEAREST JOINT
4. REMOVE AND DISPOSE EXISTING LANDSCAPE
5. REMOVE AND DISPOSE EXISTING CONCRETE
6. RELOCATE EXISTING SIGN
7. MEDIAN CURB PER COA STD DWG 2415B

NOTE

CONTRACTOR SHALL CONTACT BILL GALLEGOS (505) 259-4651 (bgallegos@cabq.gov) AND COORDINATE IRRIGATION LINE RELOCATION IF ANY EXISTING LINES ENCOUNTERED DURING MEDIAN DEMOLITION OR CONSTRUCTION OPERATIONS.

RECORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R&D Construction
WORK STAKED BY Terra Land Surveys
INSPECTED BY CORI TULLC
FIELD VERIFICATION BY CORI TULLC
DRAWINGS CORRECTED BY TULLC
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES
(CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION
FIELD NOTES
NO. BY DATE

ENGINEER'S SEAL

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGNED BY JH DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 20140038-LADERA JOB NO. 20140038
CHECKED BY RRB DATE Feb. 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

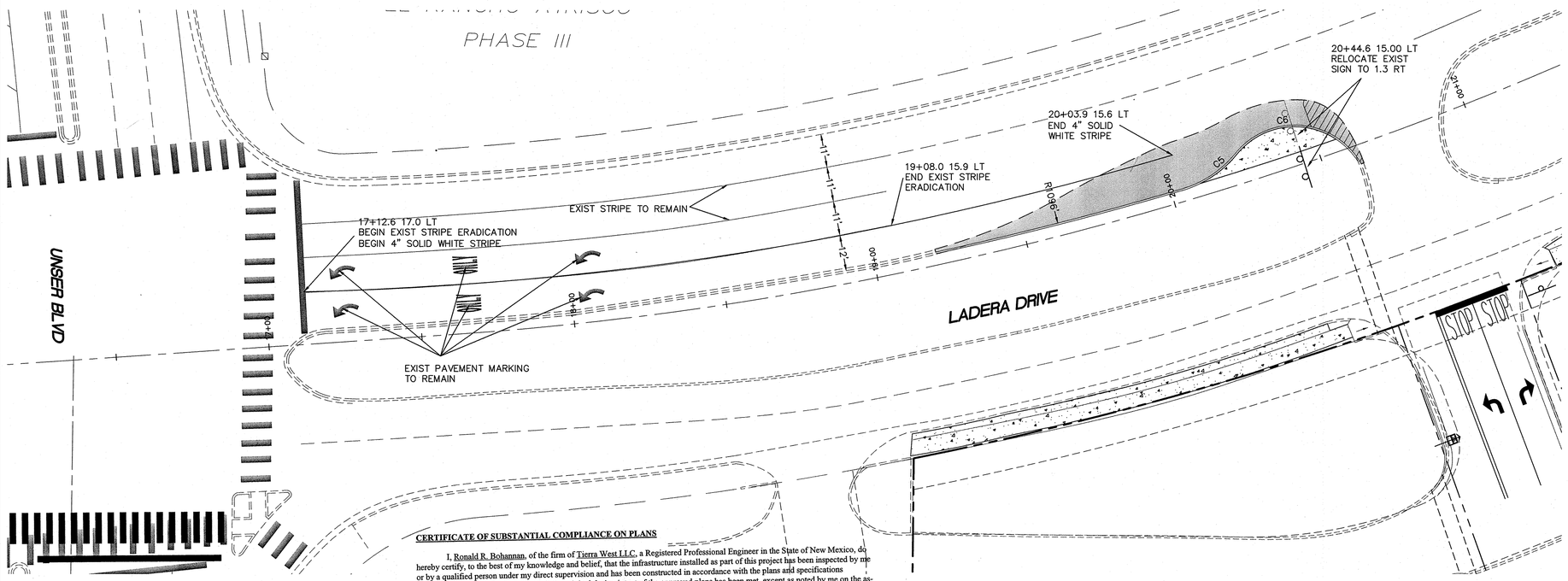
CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

LADERA DRIVE

PAVING IMPROVEMENTS PLAN 19+00 TO 21+00

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529682	H-9-Z	4 of 22



LEGEND

- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- BOUNDARY LINE
- EXISTING BOUNDARY LINE
- CENTERLINE
- RIGHT-OF-WAY
- 4" DASHED WHITE LINE
- 4" SOLID WHITE STRIPE
- SAWCUT LINE
- W — EXISTING WL
- SD — EXISTING SD
- SAS — EXISTING SAS
- NEW ASPHALT PAVING SEE DETAIL SHEET 6

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15792.

RONALD R. BOHANNAN — NEW MEXICO — REGISTERED PROFESSIONAL ENGINEER — 7868

Engineer & Signature

GENERAL NOTES:

1. OBLITERATE ALL CONFLICTING STRIPING AND PAVEMENT MARKING UNLESS OTHERWISE SPECIFIED
2. EXISTING MARKINGS IDENTIFIED TO BE REMOVED SHALL BE COMPLETELY OBLITERATED TO A MAXIMUM DEPTH OF 0.25" AND FOR A WIDTH EQUAL TO TWO TIMES THE WIDTH OF THE STRIPE OR MARKING TO BE REMOVED, PER COA STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, SECTION 443.3.2
3. ALL SIGNS SHALL BE MADE IN ACCORDANCE WITH THE M.U.T.C.D. (CURRENT EDITION) SPECIFICATIONS.
4. ALL STRIPING AND PAVEMENT MARKINGS SHALL BE IN ACCORDANCE WITH THE M.U.T.C.D. (CURRENT EDITION) SPECIFICATIONS.

PERMANENT SIGNING AND STRIPING NOTES:

1. ALL REGULATORY, WARNING, SPECIAL, AND GUIDE SIGNS SHALL COMPLY WITH THE FOLLOWING REQUIREMENTS:

SIGN	SIGN CODE	COLOR	LETTER SHEETING	BACKGROUND SHEETING
STOP	R1-1	(W/RED)	TYPE VIII OR IX	TYPE XI
YIELD	R1-2	(W/RED)	TYPE VIII OR IX	TYPE XI
DO NOT ENTER	R5-1	(W/RED)	TYPE VIII OR IX	TYPE XI
WRONG WAY	R5-1A	(W/RED)	TYPE VIII OR IX	TYPE XI
SCHOOL BUS STOP	S3-1	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
SCHOOL BUS X-ING	S1-1	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
PEDESTRIAN X-ING	W11-2	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
BIKE X-ING	W11-1	(BLK/FLOURESCENT YELLOW GREEN)	TYPE VIII OR IX	TYPE XI
ALL SCHOOL/PED/BIKE SUPPLEMENTAL PLAQUES		(BLK/FLOURESCENT YELLOW GREEN)WHEREVER BLK/YELLOW IS SPECIFIED COLOR IN MUTCD	TYPE VIII OR IX	TYPE XI
ALL OTHER WARNING SIGNS AND SUPPLEMENTAL PLAQUES		(BLK/FLOURESCENT YELLOW GREEN)WHEREVER BLK/YELLOW IS SPECIFIED COLOR IN MUTCD	TYPE VIII OR IX	TYPE XI
GUIDE & DESTINATION SIGNS INCLUDES EXTRUDED & NON-EXTRUDED (OVERHEAD & GROUND MOUNTED)	ALL	(W/GREEN) EXCEPT WHERE SPECIFIED OTHERWISE IN THE MUTCD	TYPE VIII OR IX	TYPE XI
E-CODE SIGNS	E11-1, 1A 1B, 1C	(BLK/YELLOW)	TYPE VIII OR IX	TYPE XI
RECREATIONAL & CULTURAL INTEREST	ALL	(W/BROWN)	TYPE VIII OR IX	TYPE XI
GENERAL SERVICES	ALL	(W/BLUE)	TYPE VIII OR IX	TYPE XI
SPECIFIC SERVICES	ALL	(W/BLUE)	TYPE VIII OR IX	TYPE XI
ALL OTHER PERMANENT SIGNS		(BLK/WHITE) EXCEPT WHERE SPECIFIED OTHERWISE IN THE MUTCD	TYPE IV	TYPE XI

2. ONLY 0.125 INCHES THICK ALUMINUM PANEL SIGNS ARE PERMITTED FOR WARNING AND REGULATORY SIGNS.
3. ANTI-GRAFFITI COATING SHALL BE APPLIED ON ALL REGULATORY, WARNING, GUIDE, AND OTHER SPECIAL SIGNS.
4. QUANTITIES MAY VARY AS FIELD CONDITIONS DICTATE. THE CONTRACTOR WILL BE PAID FOR ACTUAL QUANTITIES USED.
5. ALL TRAFFIC CONTROL DEVICES SHALL COMPLY WITH NM STANDARDS SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION (LATEST EDITION) AND ANY APPLICABLE SPECIAL PROVISION AND/ OR SUPPLEMENTAL SPECIFICATION. ALSO THE DEVICES SHALL COMPLY WITH THE CURRENT EDITION, WITH REVISION, OF THE MUTCD.
6. EACH SIGN FACE SHOWN ON PLANS SHALL MEET THE SPECIFICATIONS IN THE STANDARD HIGHWAY SIGNS MANUAL (CURRENT EDITION) FOR PROPER ARRANGEMENT, SPACING OF LETTERS, LETTER HEIGHT, SYMBOLS AND BORDERS FOR THE SPECIFIED SIZE AND MESSAGE AS SHOWN ON PLANS.
7. POST LENGTHS ARE BASED ON A MINIMUM OF 5 FT FOR RURAL ROADWAY SECTIONS TO A MINIMUM OF 7 FT FOR URBAN AND INTERSTATE ROADWAY SECTIONS. THE LENGTHS ARE MEASURED FROM THE BOTTOM OF THE SIGN TO NEAR EDGE OF THE DRIVING LANE.
8. THE LATERAL CLEARANCE OF SIGNS SHALL BE NO CLOSER THAN THE 6 FT FROM THE EDGE OF SHOULDER OR 12 FT FROM THE EDGE OF TRAVELED WAY FOR RURAL AREAS AND NO CLOSER THAN 2 FT FROM FACE OF CURB FOR URBAN AREAS.
9. ALL SIGNING HARDWARE, INCLUDING BRACKETS, (FOR MOUNTING ALL STREET NAME SIGNS, W1-8-18 BACK TO BACK MOUNTING, ETC.) ARE CONSIDERED INCIDENTAL TO SIGN INSTALLATION. THEREFORE, NO PAYMENT WILL BE MADE.
10. THREE 4 LB/FT SIGN POST INSTALLATION APPROVED ONLY IF THE SPAN BETWEEN THE OUTER POSTS EXCEEDS 84" (SIGN WIDTH OF 96" OR GREATER).
11. 3'-6" BASE POST ARE REQUIRED FOR ALL SMALL SIGN POST. SEE STANDARD SERIAL DRAWING 701-02-1/3 FOR DETAILS.
12. SIGN POST SHALL BE SQUARE TUBING AS APPROVED BY THE PROJECT MANAGER OR THE DISTRICT TRAFFIC ENGINEER.
13. CONTRACTOR SHALL FIELD VERIFY ALL SIGNING INFORMATION, TEXT, AND LOCATIONS PRIOR TO FABRICATION AND INSTALLATION. NEW SIGN LOCATIONS SHALL BE APPROVED BY THE PROJECT MANAGER OR THE DISTRICT TRAFFIC ENGINEER.
14. HOT THERMOPLASTIC PAVEMENT MARKINGS SHALL TO BE USED ON ALL STRIPING (LONG LINES, CROSSWALKS, LEGENDS, SYMBOLS, ETC.) THE THERMOPLASTIC PAINT SHALL BE APPLIED AT A THICKNESS OF 120 MIL.
15. WATER BLASTING IS THE ONLY APPROVED METHOD OF EXISTING STRIPE REMOVAL WITHIN DISTRICT THREE. THE USE OF BLACK PAINT AS A METHOD OR REMOVING OR COVERING EXISTING STRIPING IS STRICTLY PROHIBITED.

RECORD DRAWING

PROFESSIONAL DRAWING

N

GRAPHIC SCALE

20 0 10 20

(IN FEET)
1 inch = 20 ft.

AS BUILT INFORMATION
CONTRACTOR L&C Construction
WORK STAKED BY Terra Land Surveys
INSPECTOR'S CERTIFICATE OF FIELD VERIFICATION BY Carl Tourse
VERIFICATION OF DRAWINGS CORRECTED BY Tourse
MICRO-FILM INFORMATION
RECORDED BY
DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES
(CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999679906

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL
RONALD R. BOHANNAN — NEW MEXICO — 7868

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN
DESIGNED BY JH DATE Feb, 2015
DRAWN BY pm DATE Feb, 2015
DRAWING NAME 2014038-LADERA JOB NO. 2014038
CHECKED BY RRB DATE Feb, 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

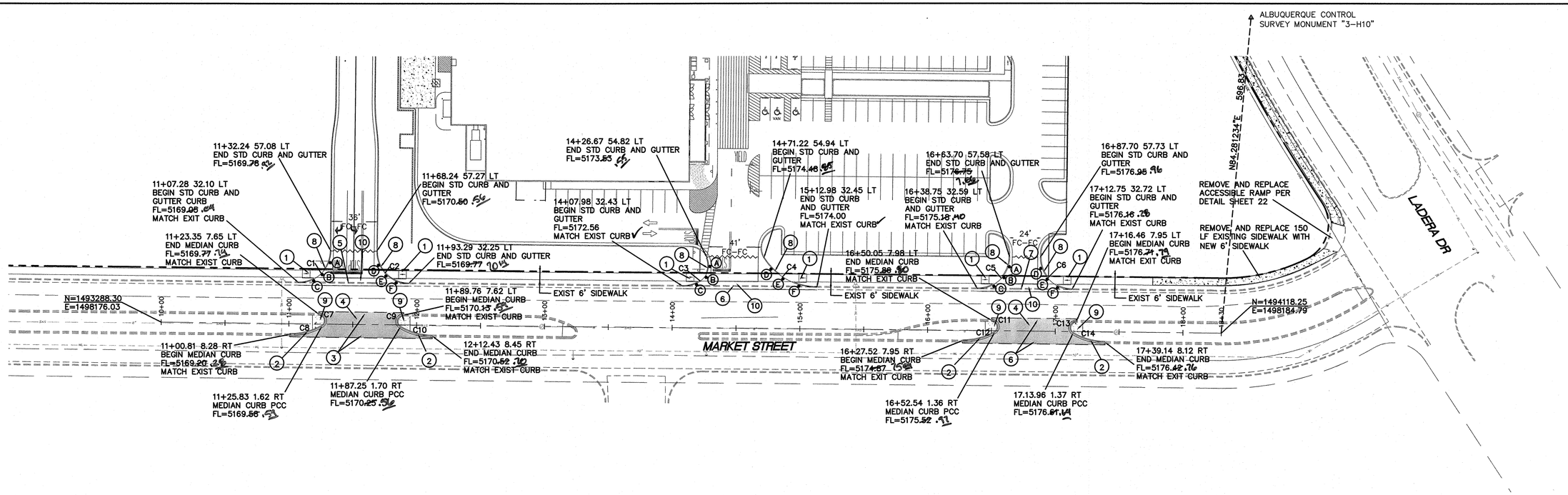
CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

LADERA DRIVE

STRIPING AND SIGNAGE PLAN 19+00 TO 21+00

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	5 of 22



KEYED NOTES

1. UNIDIRECTIONAL ACCESSIBLE RAMP PER DETAIL SHEET 22
2. MEDIAN CURB PER COA STD DWG 2415B
3. REMOVE AND DISPOSE 180 LF EXISTING CURB, REMOVE TO NEAREST JOINT
4. REMOVE AND DISPOSE EXISTING LANDSCAPING NEW PAVING PER ASPHALT SECTION COA STD DWG 2465
5. REMOVE AND DISPOSE 85 LF EXISTING CURB AND SIDEWALK, REMOVE TO NEAREST JOINT
6. REMOVE AND DISPOSE 105 LF EXISTING CURB, REMOVE TO NEAREST JOINT
7. REMOVE AND DISPOSE 75 LF EXISTING CURB AND SIDEWALK, REMOVE TO NEAREST JOINT
8. 8" STD CURB AND GUTTER PER COA STD DWG 2415A
9. MEDIAN CONCRETE PAVING PER COA STD DWG 2408 & 2502
10. 6" VALLEY GUTTER PER COA STD DWG 2420

CURVE TABLE

CURVE	DELTA	RADIUS	LENGTH
C1	89°50'39"	25.00	39.20
C2	90°10'31"	25.00	39.35
C3	84°00'36"	15.00	21.99
C4	56°37'37"	50.00	49.42
C5	89°52'27"	25.00	39.21
C6	90°08'06"	25.00	39.33
C7	150°17'51"	5.00	13.12
C8	29°59'25"	50.00	26.17
C9	149°48'33"	5.00	13.07
C10	30°13'19"	50.00	26.37
C11	150°17'51"	5.00	13.12
C12	29°59'25"	50.00	26.17
C13	149°48'33"	5.00	13.07
C14	30°13'19"	50.00	26.37

QUARTER POINTS

C1

FL	ELEV.
A	5169.60
B	5169.42
C	5169.24

C2

FL	ELEV.
D	5170.32
E	5170.14
F	5169.96

C3

FL	ELEV.
A	5173.28
B	5173.04
C	5172.80

C4

FL	ELEV.
D	5174.36
E	5174.24
F	5174.12

C5

FL	ELEV.
A	5176.36
B	5175.96
C	5175.57

C6

FL	ELEV.
D	5176.75
E	5176.56
F	5176.36

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

RONALD R BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER 5/20/15

LEGEND

- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- BOUNDARY LINE
- EXISTING BOUNDARY LINE
- CENTERLINE
- RIGHT-OF-WAY
- SAWCUT LINE
- W — EXISTING WL
- SD — EXISTING SD
- SAS — EXISTING SAS
- WATER BLOCK
- NEW ASPHALT PAVING

GRAPHIC SCALE

40 0 25 40

(IN FEET)
1 inch = 40 ft.

RECORD DRAWING

AS BUILT INFORMATION

CONTRACTOR R&O Construction
WORK STAKED BY Terra Land Surveys
AS-BUILTS BY CON | TWLLC
ACCEPTANCE
FIELD VERIFICATION BY CON | TWLLC
DRAWINGS CORRECTED BY TWLLC
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES
(CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION

FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

REVISIONS

NO.	DATE	REMARKS	BY

DESIGN

DESIGNED BY JH — DATE Feb, 2015
DRAWN BY pm — DATE Feb, 2015
DRAWING NAME 20140038-MARKET — JOB NO. 20140038
CHECKED BY RRB — DATE Feb, 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

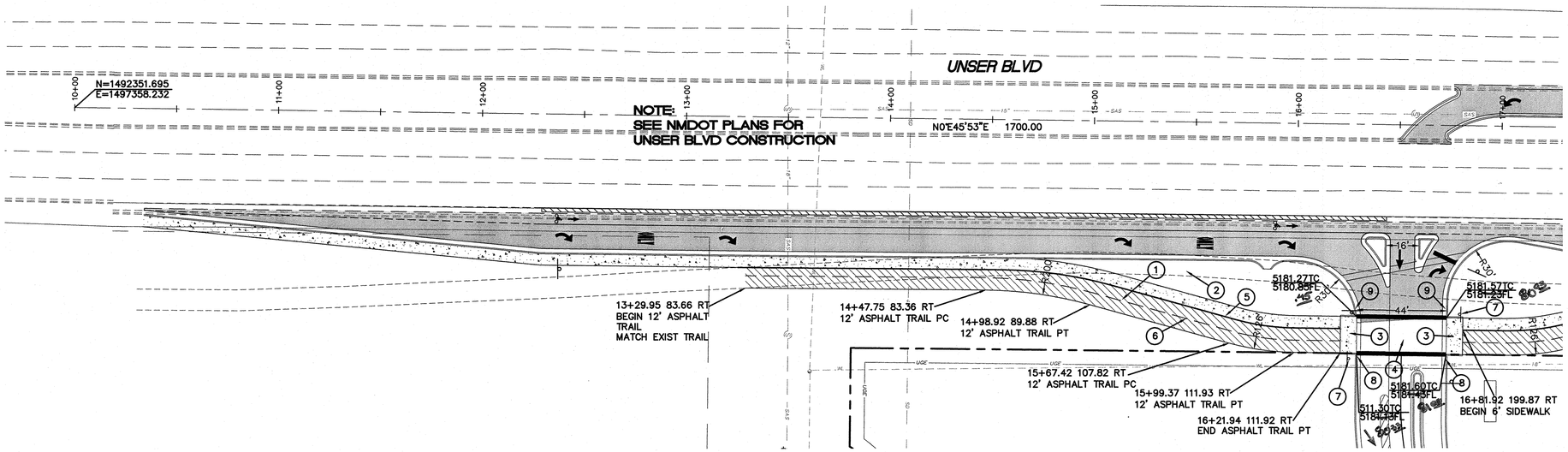
CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

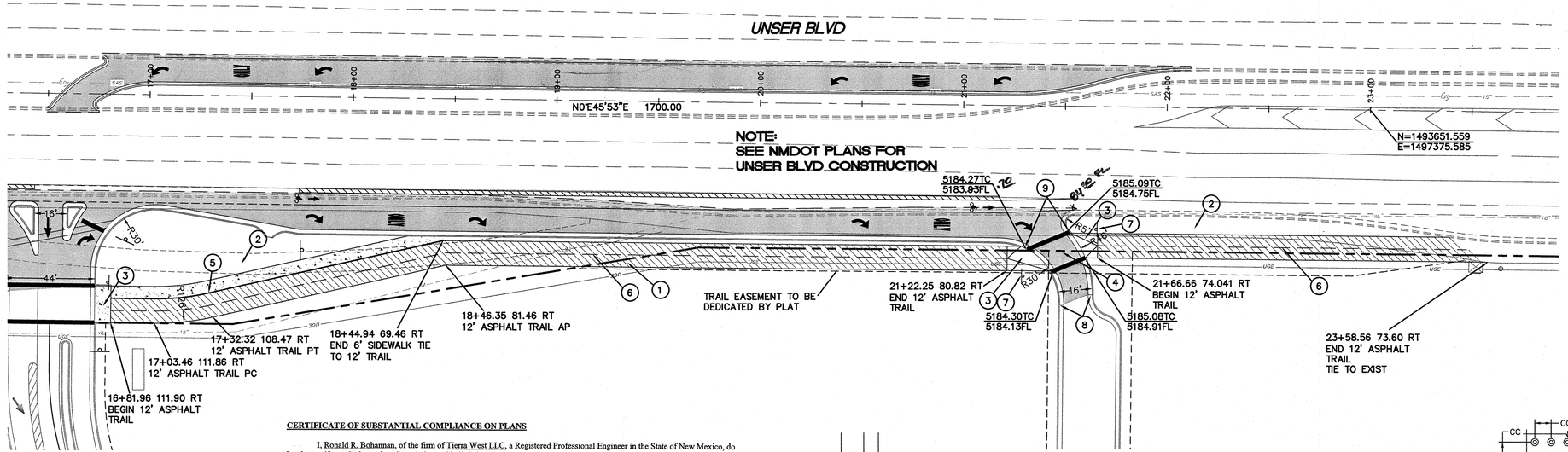
MARKET STREET

PAVING IMPROVEMENTS PLAN

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	6 of 22



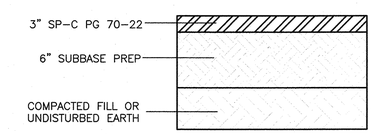


LEGEND

- EXISTING CURB & GUTTER
- PROPOSED CURB & GUTTER
- BOUNDARY LINE
- EXISTING BOUNDARY LINE
- CENTERLINE
- RIGHT-OF-WAY
- 4" DASHED WHITE LINE
- 4" SOLID WHITE STRIPE
- SAWCUT LINE
- W — EXISTING WL
- SD — EXISTING SD
- SAS — EXISTING SAS
- NEW ASPHALT PAVING SEE DETAIL THIS SHEET
- NEW 12' ASPHALT TRAIL

KEYED NOTES

1. 12' ASPHALT TRAIL
2. REMOVE AND DISPOSED 1016 LF TRAIL
3. ACCESSIBLE RAMP SEE DETAIL THIS SHEET
4. RAISED CROSSWALK PER DETAIL SHEET 22
5. 4" SOLID REFLECTORIZED WHITE STRIPE
6. 4" DASHED REFLECTORIZED YELLOW STRIPE
7. STOP SIGN
8. 3" TO 6" CURB TRANSITION (OVER 5')
9. 3" TO 8" CURB TRANSITION (OVER 5')



MULTIUSE TRAIL SECTION

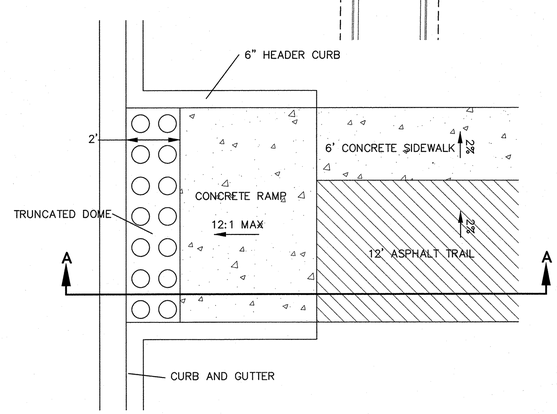
FROM CITY PROJECT NO 691591

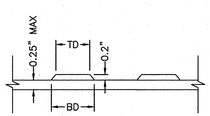
CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

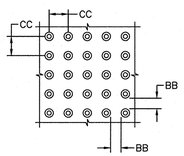
RONALD R. BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER





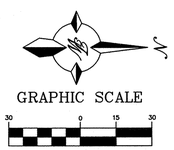
DOME SECTION

BD – BASE DIAMETER 0.9" MIN
TD – TOP DIAMETER 50% OF BD MIN TO 65% OF BD MAX



DOME SPACING

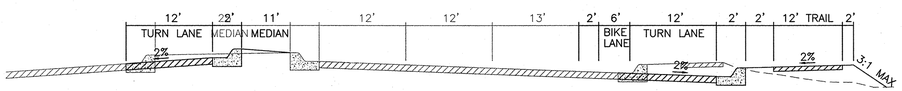
CC – CENTER TO CENTER SPACING 2.35"
BB – BASE TO BASE SPACING 1.48" MIN



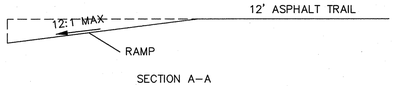
GRAPHIC SCALE

30 0 15 30

(IN FEET)
1 inch = 30 ft.



UNSER BLVD SECTION



SECTION A–A

ACCESSIBLE RAMP DETAIL

RECORD DRAWING

CAUTION:

ALL EXISTING UTILITIES SHOWN WERE OBTAINED FROM RESEARCH, AS-BUILTS, SURVEYS OR INFORMATION PROVIDED BY OTHERS. IT SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR TO CONDUCT ALL NECESSARY FIELD INVESTIGATIONS PRIOR TO AND INCLUDING ANY EXCAVATION, TO DETERMINE THE ACTUAL LOCATION OF UTILITIES AND OTHER IMPROVEMENTS, PRIOR TO STARTING THE WORK. ANY CHANGES FROM THIS PLAN SHALL BE COORDINATED WITH AND APPROVED BY THE ENGINEER.

AS BUILT INFORMATION
CONTRACTOR R&R Construction
WORK STAKED BY Terra Land Surveys
ASBUILT DRAWINGS ACCEPTANCE BY CORA Tw LLC
FIELD VERIFICATION BY CORA Tw LLC
DRAWINGS CORRECTED BY Tw LLC
MICRO-FILM INFORMATION
RECORDED BY
DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES
(CENTRAL ZONE – NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN
DESIGNED BY JH — DATE Feb, 2015
DRAWN BY pm — DATE Feb, 2015
DRAWING NAME 2014038-UNSER — JOB NO. 2014038
CHECKED BY RRB — DATE Feb, 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

UNSER BOULEVARD

PAVING IMPROVEMENTS PLAN

DESIGN REVIEW COMMITTEE: APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE

CITY ENGINEER APPROVAL: APPROVED JUL 30 2015 CITY ENGINEER

LAST DESIGN UPDATE — MO./DAY/YR. — MO./DAY/YR.

CITY PROJECT NO. 529882 | ZONE MAP NO. H-9-Z | SHEET # 7 of 22

SIGNAL NOTES

1. ALL WORK ON THESE PLANS TO BE PERFORMED UNDER THIS CONTRACT SHALL CONFORM TO THE CURRENT NATIONAL ELECTRIC CODE, THE STANDARDS OF THE NATIONAL BOARD OF FIRE UNDERWRITERS FOR ELECTRICAL WIRING AND APPARATUS, AND THE CITY'S TRAFFIC ENGINEERING OPERATIONS THIRD DRAFT SPECIFICATIONS (JUNE 1994).
2. LOCATIONS OF CONDUITS, FOUNDATIONS, CONTROL CABINETS, POLES, PULL BOXES, MANHOLES, AND SPLICE CABINETS SHOWN ON THE PLANS ARE SCHEMATIC AND SHALL BE ADJUSTED IN THE FIELD TO MAXIMIZE CLEAR SPACE AVAILABLE FOR PEDESTRIANS AND WHEELCHAIRS TO COMPLY WITH THE AMERICANS WITH DISABILITIES ACT. THE CONTRACTOR SHALL MEET WITH THE CITY'S TRAFFIC ENGINEERING OPERATIONS PERSONNEL IN THE FIELD AT ALL LOCATIONS TO SPOT EQUIPMENT BEFORE BEGINNING THE WORK. ALL SUCH EQUIPMENT SHALL BE INSTALLED WITHIN THE RIGHT-OF-WAY.
3. THE CONTRACTOR IS WARNED THAT EXISTING CONDUITS MAY CONTAIN AC POWER AND CAUTION SHALL BE EXERCISED IN INTERCEPTING OR INSTALLING CABLE IN EXISTING CONDUIT.
4. THE CONTRACTOR SHALL BORE, DRILL, OR PUSH WHEN CROSSING EXISTING PAVEMENTS AND ANY DRIVEWAYS FOR SIDE STREET CROSSINGS. BEFORE CONDUIT CAN BE BORED, DRILLED, OR PUSHED THE CONTRACTOR SHALL LOCATE ALL EXISTING UTILITIES. THE CONTRACTOR SHALL LOCATE AND EXPOSE GAS LINES WHICH CROSS ANY PROPOSED BORES. THESE EXCAVATIONS SHALL REMAIN OPEN UNTIL AFTER THE BORE IS COMPLETE. CONTRACTOR SHALL REMOVE AND REPLACE IN KIND ANY SIDEWALK OR PAVEMENT REQUIRED TO EXPOSE SUCH LINES. THE CONTRACTOR MAY CUT, TRENCH, AND REPLACE EXISTING PAVEMENT ONLY WHEN APPROVED BY THE PROJECT MANAGER.
5. SPLICING OF COMMUNICATIONS CABLE WILL NOT BE PERMITTED IN PULL BOXES. SPLICING OF COMMUNICATIONS CABLE (CONNECTIONS) WILL BE PERMITTED ONLY AT SPLICE CABINETS OR CONTROLLER CABINETS WITH SPLICE BARS. SPLICING OF TRAFFIC SIGNALS MCC WILL BE PERMITTED IN LARGE PULL BOXES INCLUDING LARGE MEDIAN PULL BOXES. SPLICING OF VIDEO DETECTION COAXIAL CABLE WILL NOT BE PERMITTED FROM THE MASTARM BASE TO THE CONTROLLER CABINET. SPLICING OF OPTICAL DETECTOR CABLE WILL NOT BE PERMITTED FROM THE DETECTOR TO THE CONTROLLER CABINET.
6. ALL LOOP LEAD-IN CABLES SHALL BE TAGGED AT THE CONTROL CABINET TO IDENTIFY EACH CABLE BY PHASE AND LOOP NUMBER. ALL VIDEO DETECTION COAXIAL AND POWER CABLES SHALL BE TAGGED AT THE CONTROL CABINET TO IDENTIFY EACH CABLE BY CAMERA NUMBER AND LOCATION. ALL OPTICAL DETECTOR CABLE SHALL BE TAGGED AT THE CONTROL CABINET TO IDENTIFY EACH BY DIRECTION AND LOCATION.
7. ALL PULL BOXES SHALL BE REINFORCED POLYMER MORTAR HEAVY DUTY TYPE WITH REINFORCED POLYMER MORTAR HEAVY DUTY COVERS. CONCRETE COVERS, STEEL COVERS, AND CONCRETE PULL BOXES WILL NOT BE ACCEPTABLE.
8. THE CONTRACTOR SHALL NOTIFY THE CITY OF ALBUQUERQUE TRAFFIC ENGINEERING OPERATIONS(857-8000) THREE WORKING DAYS IN ADVANCE OF ANY ANTICIPATED WORK ON SIGNALS, LIGHTING, AND POWER SERVICES. TRAFFIC ENGINEERING OPERATIONS PERSONNEL WILL ASSIST THE CONTRACTOR IN FIELD LOCATION OF EQUIPMENT, COLOR CODING OF WIRING, AND MUST BE PRESENT WHEN SIGNALS AND LIGHTING ARE SHUT-OFF OR TURNED ON. THE CONTRACTOR SHALL ALSO NOTIFY THE CITY OF ALBUQUERQUE TRAFFIC ENGINEERING OPERATIONS EACH TIME A TRAFFIC SIGNAL CONTROL DOOR IS OPENED.
9. THE CONTRACTOR SHALL NOTIFY PUBLIC SERVICE COMPANY 30 DAYS IN ADVANCE OF ANTICIPATED POWER SERVICE CONNECTIONS. THE CONTRACTOR SHALL COORDINATE WITH PUBLIC SERVICE COMPANY TO ESTABLISH ELECTRICAL SERVICE IN THE CITY'S NAME. THE CONTRACTOR SHALL PAY THE LOCAL POWER COMPANY ALL COSTS TO PROVIDE ELECTRICAL SERVICE. THIS WORK WILL BE CONSIDERED INCIDENTAL TO CONSTRUCTION.
10. THE CONTRACTOR SHALL REMOVE ALL CONFLICTING SIGNING AND DELIVER TO THE CITY TRAFFIC ENGINEERING YARDS WHEN TRAFFIC SIGNALS ARE PUT INTO OPERATION.
11. LIVE UNUSED CONDUCTORS WILL NOT BE ALLOWED AT MASTARM POLES AND PEDESTAL POLES. ALL SUCH UNUSED CONDUCTORS SHALL BE DISCONNECTED AT THE LARGE PULL BOX ADJACENT TO THE POLE.
12. IF TRENCH WIDTHS LESS THAN 12" ARE PROPOSED BY THE CONTRACTOR, APPROVED COMPACTION METHODS SHALL BE USED DURING BACKFILL TO PREVENT LATENT TRENCH FAILURES. THE CONTRACTOR SHALL USE GROUT OR LEAN FILL AS APPROVED BY THE PROJECT MANAGER IN LIEU OF EARTH BACKFILL.
13. FOR CONDUITS CONTAINING ONLY LOW VOLTAGE COMMUNICATIONS CABLES, THE REQUIREMENTS FOR A SINGLE CONDUCTOR BARE COPPER #8 AWG MAY BE WAIVED WHERE PERMITTED BY THE NATIONAL ELECTRIC CODE.
14. THE CITY OF ALBUQUERQUE TRAFFIC ENGINEERING OPERATIONS PERSONNEL WILL PROVIDE TRAFFIC SIGNAL TIMING PLANS AND WILL PROGRAM TRAFFIC SIGNAL CONTROLLERS.
15. EXISTING CONDUITS TO BE REMOVED OR ABANDONED SHALL HAVE ALL WIRING REMOVED.
16. EXISTING CONDUITS SHALL BE REPAIRED, ADJUSTED, OR REPLACED AS DIRECTED BY THE PROJECT MANAGER WHERE ELECTRICAL PULLBOXES OR TRAFFIC MANHOLES ARE INSTALLED OR REPLACED.
17. CONTRACTOR SHALL COIL EXCESS INTERCONNECT CABLE AT ALL NEW OR EXISTING TRAFFIC MANHOLES BETWEEN SPLICE CABINET OR CONTROL CABINETS WITH SPLICE BARS. IF MORE THAN ONE MANHOLE EXISTS BETWEEN SPLICE CABINETS OR CONTROL CABINETS WITH SPLICE BARS, THEN COILING IS ONLY REQUIRED AT ONE OF THE MANHOLES. THE FOLLOWING QUANTITIES OF COMMUNICATION CABLE SHALL BE COILED:
   - 12 PAIR – 50 FT.
   - 25 PAIR – 50 FT.
   - 50 PAIR – 25 FT.
   - 75 PAIR – 25 FT.
18. THE CONTRACTOR SHALL PROVIDE OFF-DUTY POLICE OFFICERS TO DIRECT TRAFFIC WHEN SIGNALS ARE TURNED OFF.
19. ALL DATA SHOWN HEREIN CONCERNING EXISTING UTILITIES HAS BEEN OBTAINED FROM "AS-BUILT" DRAWINGS AND FROM FIELD OBSERVATIONS WHICH MAY OR MAY NOT BE ACCURATE. THE CONTRACTOR WILL BE RESPONSIBLE FOR EXPLORATORY TRENCHING. IF NECESSARY, TO MORE SPECIFICALLY LOCATE UTILITY LINES. COST OF LOCATING UTILITY LINES INCLUDING EXPLORATORY TRENCHING WILL BE CONSIDERED INCIDENTAL TO CONSTRUCTION.
20. THE CONTRACTOR SHALL VIDEO TAPE THE EXISTING TRAFFIC SIGNAL EQUIPMENT IN VHS FORMAT AND REVIEW THE TAPE WITH CITY OF ALBUQUERQUE TRAFFIC ENGINEERING OPERATIONS PERSONNEL PRIOR TO BEGINNING ANY REMOVALS OF SIGNAL EQUIPMENT. THE TAPE SHALL BECOME THE PROPERTY OF THE CITY AND MAY BE USED TO RESOLVE ANY QUESTIONS RELATED TO THE ORIGINAL CONDITION AND QUALITY OF EXISTING EQUIPMENT. THE EXISTING TRAFFIC SIGNAL EQUIPMENT INCLUDING POLES, CONTROLLER CABINETS, CONFLICT MONITORS, AND DETECTORS SHALL BE DELIVERED TO THE CITY OF ALBUQUERQUE TRAFFIC ENGINEERING YARD ON PINO ROAD NE.
21. CABINET AND CONTROLLER NEED TO BE I.D.C. 820A.

INCIDENTAL ITEMS *

1. REMOVAL OF EXISTING PULL BOXES, CONDUITS, OR OTHER SIGNAL EQUIPMENT FOR INSTALLATION OF NEW SIGNAL EQUIPMENT.
2. CABLE TESTING AND DIAGRAMS.
3. BORING, DRILLING, PUSHING, AND TRENCHING, INCLUDING REMOVAL AND REPLACEMENT OF PAVEMENT, SIDEWALKS, DRIVEPADS, VALLEY GUTTERS, WHEELCHAIR RAMPS, CURB & GUTTER, AND LANDSCAPING (INCLUDING SPRINKLERS), FOR INSTALLATION OF PULL BOXES, CONDUITS, AND SIGNAL FOUNDATIONS, EXCEPT AS NOTED ON THE PLANS.
4. LOCATION OF UTILITY LINES INCLUDING EXPLORATORY TRENCHING AND EXPOSING OF GAS LINES WHEN BORING.
5. DESIGN, MATERIALS, INSTALLATION AND REMOVAL OF SAFETY BARRIER FOR SHIELDING EQUIPMENT OR MATERIAL.
6. APPRISING PUBLIC THROUGH THE LOCAL NEWS MEDIA.
7. HAULING OF NON SALVAGEBLE MATERIAL TO BE DISPOSED TO CITY LANDFILL.
8. REMOVAL, SALVAGE, AND TRANSPORTATION OF EXISTING SIGNAL EQUIPMENT TO THE CITY TRAFFIC ENGINEERING OPERATIONS YARD.
9. LEAN FILL FOR CONDUIT TRENCHES.
10. PULL BOX ADJUSTMENT TO GRADE.
11. OFF-DUTY POLICE OFFICER FOR TRAFFIC CONTROL
12. REMOVAL AND REPLACEMENT IN KIND OR BETTER OF LANDSCAPING INCLUDING SPRINKLERS, FOR INSTALLATION OF PULL BOXES, CONDUITS AND SIGNAL FOUNDATIONS.
13. COST FOR PUBLIC SERVICE COMPANY TO PROVIDE ELECTRICAL SERVICE.

* ITEMS LISTED ARE ONLY A GENERAL DESCRIPTION OF THE REQUIRED WORK AND MATERIALS, AND MAY NOT BE COMPLETE. THIS LIST DOES NOT INCLUDE ANY INCIDENTAL WORK OR MATERIALS REQUIRED BY THE SPECIAL PROVISIONS SERIALS (STANDARD DETAILS), SUPPLEMENTAL SPECIFICATIONS, OR THE STANDARD SPECIFICATIONS.

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

RONALD R. BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER 3/2/16

DEFINITIONS

1. "ENGINEER" – FOR THE PURPOSES OF THIS PROJECT, THE TERM "ENGINEER" IS SYNONYMOUS WITH THE TERM "PROJECT MANAGER".

RECORD DRAWING

TRAFFIC SIGNAL LEGEND

NEW	EXISTING	ITEM
		PULL BOX
		SERVICE POLE
M	M	METER PEDESTAL
C	C	CONTROLLER CABINET
		CONDUIT RUN (SIGNALS)
		CONDUIT RUN (INTERCONNECT)
		LOOP DETECTOR
		TRAFFIC SIGNAL PEDESTAL POLE
1	1E	CONDUIT RUN NUMBER (SIGNAL)
S1	S1	CONDUIT RUN NUMBER (POWER SERVICE)
C1	C1	CONDUIT RUN NUMBER (INTERCONNECT)
F1	F1	CONDUIT RUN NUMBER (WARNING BEACON)
		TYPE II STANDARD WITH MASTARM, TRAFFIC SIGNAL, BACK PLATE, AND OPTICAL DETECTOR
		TRAFFIC SIGNAL, BACK PLATE, OPTICAL DETECTOR, LUMINAIRE, AND VIDEO CAMERA
		TRAFFIC SIGNAL, BACK PLATE, OPTICAL DETECTOR, LUMINAIRE,
		PEDESTRIAN PUSH BUTTON (MOUNTED TO SIDE OF POLE WHERE INDICATED)
		PEDESTRIAN SIGNALS (MOUNTED TO SIDE OF POLE WHERE INDICATED)
SC	SC	SPLICE CABINET
		TRAFFIC MANHOLE
		VIDEO CAMERA

AS BUILT INFORMATION
CONTRACTOR R&O Construction
WORK STAKED BY Tierra Land DATE 2015
INSPECTOR'S ACCEPTANCE BY Chris Medina DATE 2015
FIELD VERIFICATION BY Chris Medina DATE 2015
DRAWINGS CORRECTED BY Tierra DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN
DESIGNED BY JN DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 2014038–Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb. 2015

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PUBLIC WORKS DEPARTMENT
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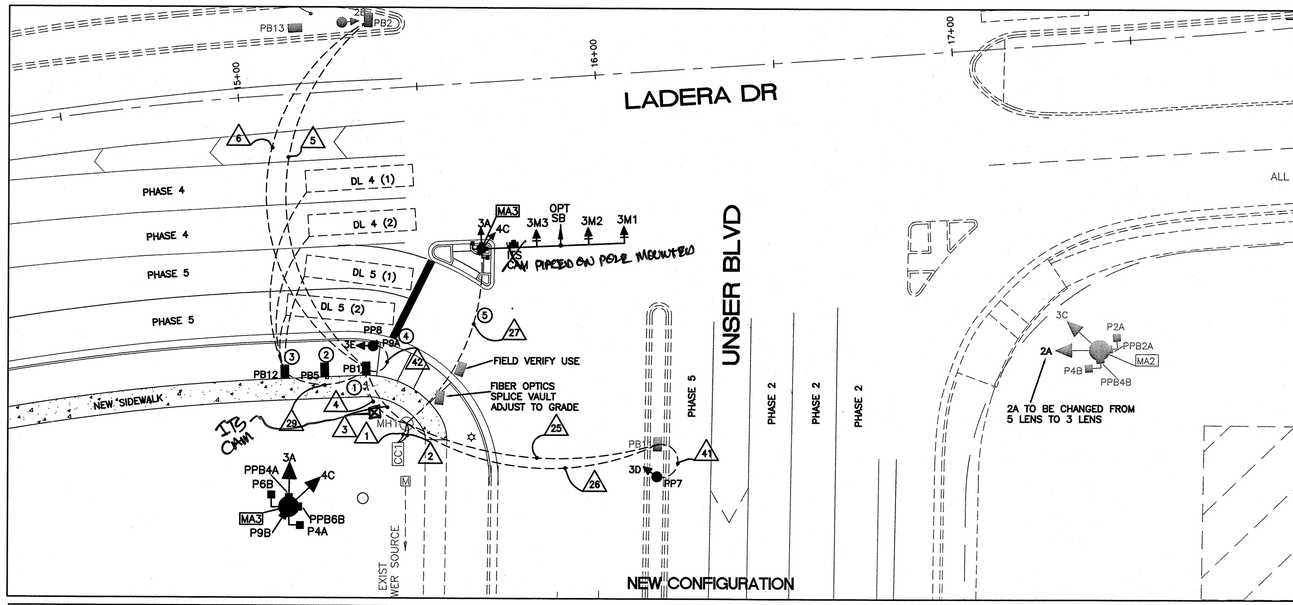
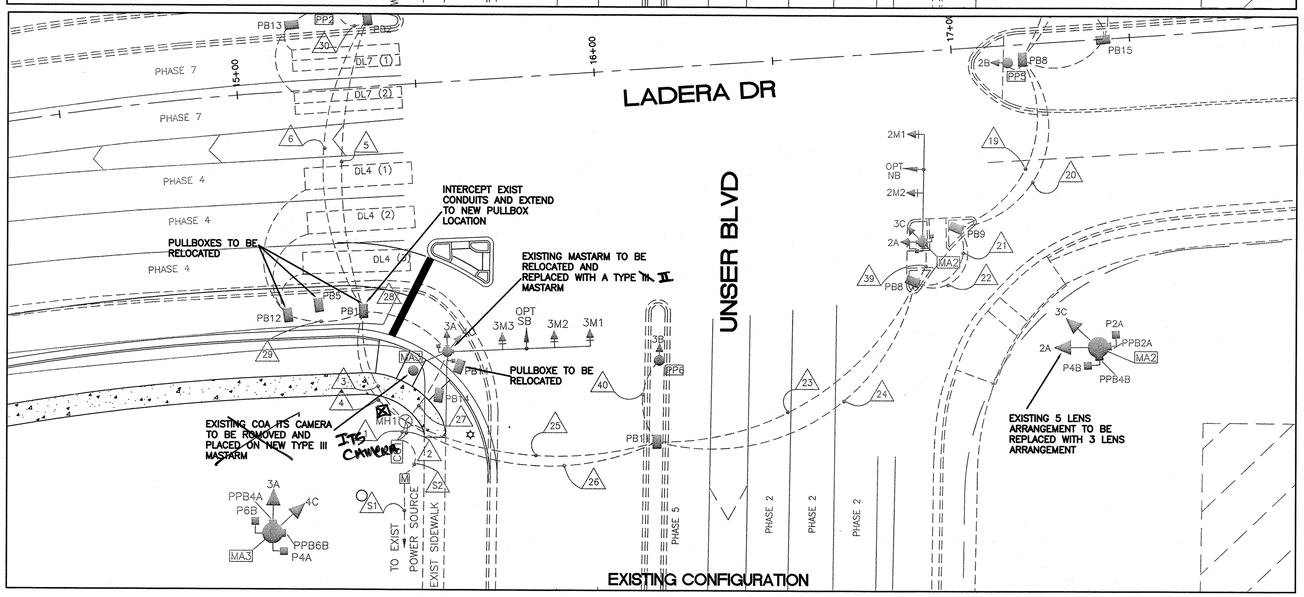
UNSER BLVD AND LADERA DR

SIGNAL NOTES

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO. 529882 | ZONE MAP NO. H-9-Z | SHEET # 8 of 22





MASTARM SIGNING

MASTARM 1	UNSER BLVD
MASTARM 2	LADERA DR
MASTARM 3	UNSER BLVD
MASTARM 4	LADERA DR

ALL SIGNS TO BE BUILT PER MUTCD STANDARDS

VIDEO CABLE

FROM	TO	CONDUIT TRACE	TOTAL LENGTH
MA3	CONTROLLER	27, 2	59'
		TOTAL	59'

OPTICOM SYSTEM CABLE

FROM	TO	CONDUIT TRACE	# PAIR x LENGTH	TOTAL LENGTH
MA1	CC1	MA1-34-16-18-20-22-24-26-2	1 @ 421'	421'
MA2	CC1	MA2-39-24-26-2	1 @ 220'	220'
MA3	CC1	MA3-27-2	1 @ 75'	75'
MA4	CC1	MA4-32-8-6-4-2	1 @ 242'	242'
			TOTAL	958'

LOOP DETECTOR CABLE

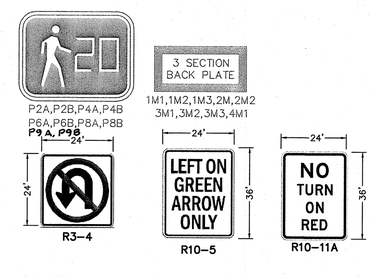
FROM	TO	CONDUIT TRACE	NO.PAIR x LENGTH	TOTAL LENGTH
PB12	CC1	29-4-2	3 @ 94'	282'
PB13	CC1	31-6-4-2	2 @ 184'	368
PB14	CC1	36-18-20-22-24-26-2	2 @ 355'	710'
PB15	CC1	38-20-22-24-26-2	2 @ 297'	594'
			TOTAL	1954'

SIGNAL POLES AND MASTARMS

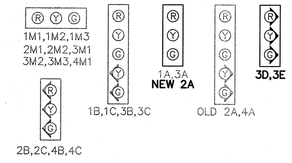
ID#	TYPE	STATION	OFFSET
MA1	MASTARM 40' TROMBONE	16+92	85' LT
MA2	MASTARM 30' TROMBONE	16+89	53' RT
MA3	MASTARM 40' TROMBONE	15+54	75' RT
EXISTING NEW MA3	MASTARM 40' TYPE ~~III~~ II	15+65	46' RT
MA4	MASTARM 35' TROMBONE	15+51	69' RT
CC1	CONTROLLER	15+39	99' RT
PP1	NOT INSTALLED		
PP2	PED POLE	15+30	19' LT
PP3	PED POLE	16+39	83' LT
PP4	PED POLE	17+09	70' LT
PP5	PED POLE	17+16	5' RT
PP6	PED POLE	16+13	81' RT
PP7	PED POLE	16+10	113' RT
PP8	PED POLE	15+33	71' RT
M	METER PEDESTAL	25+77	79' RT

SYMBOL KEY

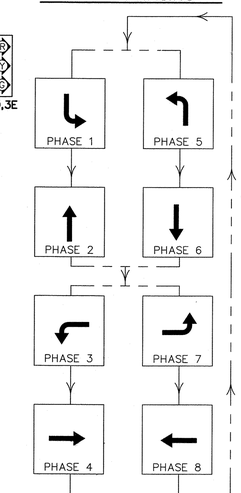
- MA1 — SIGNAL & CABINET ID
- 9 — NEW CONDUIT RUN ID
- S1 — CONDUIT RUN ID (POWER SERVICE)
- C1 — CONDUIT RUN ID (INTERCONNECT)



TYPICAL SIGNAL FACE LENS ARRANGEMENTS



SIGNAL PHASING



NOTES

1. PULLBOXES 1–11 ARE TO BE LARGE PULL BOXES.
2. PULLBOXES 12–15 ARE TO BE SMALL PULL BOXES.
3. ALL INDICATORS ARE TO BE LED
4. OPTICOMS TO BE 3M 700 SERIES. 4 CHANNEL DISCRIMINATOR CARD.
5. ALL PEDESTRIAN SIGNALS TO BE COUNTDOWN
6. MASTARM FOUNDATION CONCRETE SHALL BE TESTED FOR SLUMP AND COMPRESSIVE STRENGTH
7. DISRUPTION OF POWER MUST BE COORDINATED WITH TRAFFIC OPERATIONS AND PNM. DOWNTIME SHALL BE MINIMIZED
8. NEW MA3 TO BE INSTALLED AND OPERATIONAL PRIOR TO OLD MA3 DISCONNECT
9. EXISTING TRAFFIC SIGNAL INFORMATION OBTAINED FROM RECORD DRAWINGS FOR COA PROJECT NO 6945.91
10. ~~OLD MASTARM TO BE RETURNED TO PINO YARD~~

ABBREVIATIONS

MA1	MASTARM NUMBER
PP1	PEDESTAL POLE NUMBER
PPB1	PEDESTRIAN PUSH BUTTON NUMBER
CC1	CONTROL CABINET NUMBER
PB1	PULL BOX NUMBER (SIGNALS)
PBS1	PULL BOX NUMBER (POWER)
PBC1	PULL BOX NUMBER (INTERCONNECT)
DL1(1)	DETECTOR LOOP PHASE # (LOOP #)
3A	SIGNAL HEAD NUMBER
P1	PEDESTRIAN SIGNAL NUMBER
BP	BACK PLATE
EC	EXTENDED CALL LOOP DETECTOR
SD	SYSTEM LOOP DETECTOR
MH1	TRAFFIC MANHOLE NUMBER
M	METER
OPT	OPTICOM
ITS CAM	COA ITS CAMERA

KEYED NOTES

1. REMOVE PB1 INSTALL NEW PB3 BEHIND NEW CURB AND INTERCEPT CONDUITS 5 AND 6
2. REMOVE TRAFFIC LIGHT PULLBOX PB5 AND EXISTING TRAFFIC LIGHT INSTALL NEW TRAFFIC LIGHT PULLBOX PB5 AND NEW TRAFFIC LIGHT BEHIND NEW CURB AND RECONNECT TO POWER
3. REMOVE PB12 INSTALL NEW PULLBOX PB12 BEHIND NEW CURB REMOVE DL4 (1) AND DL4 (2) INSTALL NEW DL4 (1) AND DL4 (2)
4. INTERCEPT AND EXTEND CONDUITS 5 AND 6 TO NEW PULLBOX LOCATION
5. INTERCEPT AND EXTEND CONDUIT 27 TO NEW MASTARM

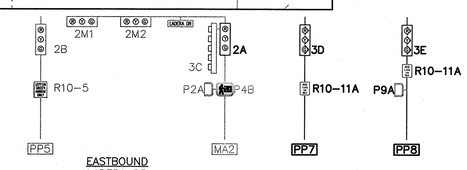
NOTES

1. IMPROVEMENTS SHOWN ON PLAN TO BE COORDINATED AND COMPLETED AT THE TIME CITY IMPROVEMENTS ARE CONSTRUCTED
2. IF FIBER IS DAMAGED AS A PART OF THIS PROJECT, THE PROJECT WILL NEED TO REPLACE THE FIBER FROM EXISTING FULL SPLICE TO EXISTING FULL SPLICE. THE PROJECT OR CONTRACTOR WILL BE RESPONSIBLE FOR THE COST OF THE WORK

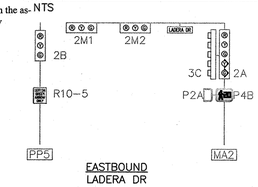
CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc., NMPS number 15702.

Engineer's Seal & Signature



NEW TRAFFIC SIGNAL CONFIGURATION
NTS



TRAFFIC SIGNAL CONFIGURATION (EXISTING)
NTS

RECORD DRAWING

GRAPHIC SCALE
(IN FEET)
1 inch = 20 ft.

AS BUILT INFORMATION
CONTRACTOR R.W. Construction
WORK STAKED BY Tierra West DATE 2015
INSPECTOR'S ACCEPTANCE BY Contrac DATE 2015
FIELD VERIFICATION BY Contrac DATE 2015
DRAWINGS CORRECTED BY Tierra DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

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SIGNALIZATION PLAN

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CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	9 of 22

CONDUIT AND CONDUCTOR REQUIREMENTS

CONDUIT LENGTH, SIZE, AND TYPE						CONDUIT FILL BY CONTRACTOR LENGTH AND TYPE								
RUN ID ##	SIZE/LENGTH 2"	3"	4"	TYPE	REMARKS	MCC 5 (# @ FT)	MCC 7 (# @ FT)	MCC 20 (# @ FT)	SHIELDED TWISTED PAIR	SCC #4 (# @ FT)	SCC #6 (# @ FT)	VIDEO (# @ FT)	OPTICOM (# @ FT)	DLLI CABLE (# @ FT)
MA3					BASE TO 3M1	1 @ 60'								
MA3					BASE TO 3M2	1 @ 46'								
MA3					BASE TO 3M3	1 @ 27'								
MA3					BASE TO 3A	1 @ 13'								
MA3					BASE TO OPT SB								1 @ 40'	
MA3					BASE TO ITS CAM							1 @ 60'		
MA3					BASE TO 4C	1 @ 13'								
MA3					BASE TO P4A	1 @ 10'								
MA3					BASE TO PPB4B				1 @ 4'					
MA3					BASE TO P6B	1 @ 10'								
MA3					BASE TO PPB6B				1 @ 4'					
MA3					BASE TO P9A	1 @ 10'								
1		5		REC	CC1 TO MH1	1 @ 11'		2 @ 11'			2 @ 11'			
2		5		REC	CC1 TO MH1								4 @ 11'	11 @ 11'
3	18	33		REC	MH1 TO PB1	1 @ 23'		2 @ 23'			2 @ 23'			
4	18	33		REC	MH1 TO PB1								1 @ 23'	7 @ 23'
5	95	77		REC	PB1 TO PB2	1 @ 100'		2 @ 100'			2 @ 100'			
6	95	77		REC	PB1 TO PB2								1 @ 100'	2 @ 100'
27		53		REC	MH1 TO MA3	1 @ 58'		1 @ 58'			2 @ 58'	1 @ 58'	1 @ 58'	
29	22	38		REC	PB1 TO PB12									4 @ 27'
31		45		REC	PB2 TO PB13									2 @ 51'
41		9		REC	PB11 TO PP7	1 @ 14'								
42		6		REC	PB1 TO PP8			1 @ 11'						
PP7					BASE TO 3D	1 @ 13'								
PP8					BASE TO 3E	1 @ 13'								
PP8					BASE TO P9B	1 @ 10'								
TOTALS						431'		337'	8'		384'	118'	225'	692'

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

RONALD R BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER

3/21/16

ABBREVIATIONS

CC 6	COMMUNICATION CABLE–6 PAIR
CC 12	COMMUNICATION CABLE–12 PAIR
DLLIC	DETECTOR LOOP LEAD IN CABLE
MA	MASTARM
MCC	MULTI CONDUCTOR CABLE
PB	PULL BOX
PP	PEDESTAL POLE
PPB	PEDESTRIAN PUSH BUTTON
REC	RIGID ELECTRIC CONDUIT
SCC	SINGLE CONDUCTOR CABLE
CAM	VIDEO CAMERA

SIGNAL NOTES

1. LOCATIONS OF CONDUITS, FOUNDATIONS, CONTROL CABINETS, POLES, PULL BOXES, MANHOLES, AND SPLICE CABINETS SHOWN ON THE PLANS ARE SCHEMATIC AND SHALL BE ADJUSTED IN THE FIELD TO MAXIMIZE CLEAR SPACE AVAILABLE FOR PEDESTRIANS AND WHEELCHAIRS TO COMPLY WITH THE AMERICANS WITH DISABILITIES ACT. THE CONTRACTOR SHALL MEET WITH THE PROJECT MANAGER IN THE FIELD AT ALL LOCATIONS TO SPOT EQUIPMENT BEFORE BEGINNING THE WORK. ALL SUCH EQUIPMENT SHALL BE INSTALLED WITHIN THE RIGHT–OF–WAY.
2. THE CONTRACTOR IS WARNED THAT EXISTING CONDUITS MAY CONTAIN AC POWER AND CAUTION SHALL BE EXERCISED IN INTERCEPTING OR INSTALLING CABLE IN EXISTING CONDUIT.
3. THE CONTRACTOR SHALL BORE, DRILL, OR PUSH WHEN CROSSING EXISTING PAVEMENTS AND DRIVEWAYS. BEFORE CONDUIT CAN BE BORED, DRILLED, OR PUSHED THE CONTRACTOR SHALL LOCATE ALL EXISTING UTILITIES. THE CONTRACTOR SHALL LOCATE AND EXPOSE GAS LINES WHICH CROSS ANY PROPOSED BORES. THESE EXCAVATIONS SHALL REMAIN OPEN UNTIL AFTER THE BORE IS COMPLETE. CONTRACTOR SHALL REMOVE AND REPLACE IN KIND ANY SIDEWALK OR PAVEMENT REQUIRED TO EXPOSE SUCH LINES. THE CONTRACTOR MAY CUT, TRENCH, AND REPLACE EXISTING PAVEMENT ONLY WHEN APPROVED BY THE PROJECT MANAGER.
4. MASTARMS SHALL BE PLACED 90° TO THE CENTERLINE UNLESS OTHERWISE NOTED.
5. NOT USED
6. SHOWN DISTANCES TO TRAFFIC SIGNAL POLES TO BE MEASURED FROM FACE OF CURB, UNLESS OTHERWISE NOTED.
7. ALL WIRE ON THIS PROJECT SHALL BE COPPER
8. ALL SPLICES FOR TRAFFIC SIGNAL MULTI–CONDUCTOR CABLE SHALL BE MADE ABOVE GROUND (IN CABINET OR STANDARD BASE). NO SPLICING OF MCC WILL BE PERMITTED IN PULL BOXES.
9. SPLICING OF COMMUNICATIONS CABLE WILL NOT BE PERMITTED IN PULL BOXES. SPLICING OF COMMUNICATIONS CABLE (CONNECTIONS) WILL BE PERMITTED ONLY AT SPLICE CABINET OR CONTROL CABINETS WITH SPLICE BLOCKS. SPLICING OF VIDEO DETECTION COAXIAL CABLE WILL NOT BE PERMITTED BETWEEN THE MASTARM BASE AND THE CONTROLLER CABINET. SPLICING OF OPTICAL DETECTOR CABLE WILL NOT BE PERMITTED FROM THE OPTICAL DETECTOR TO THE CONTROLLER CABINET.
10. SIGNAL HEADS SHALL BE COVERED WHEN NECESSARY WITH PACIFIC ENTERPRISES SIGNAL COVERS OR APPROVED EQUAL.
11. NOT USED
12. THE CONTRACTOR IS HEREBY ADVISED THAT THE INTERSECTION SIGNALS SHALL NOT BE TURNED ON UNTIL THE SIGNAL IS COMPLETELY INSTALLED. INCLUDING FULLY ACTUATED OPERATION (ALL LOOPS AND PUSHBUTTON WIRING SHALL BE OPERATIONAL).
13. FLASHING OPERATION IS NOT CONSIDERED THE BEGINNING OF THE FIELD TESTING PERIOD.
14. ACCEPTABLE TYPE II AND TYPE III STANDARDS ARE VALMONT, UNION METAL, JEM, OR APPROVED EQUAL.
15. ALL LOOP LEAD–IN CABLES SHALL BE TAGGED AT THE CONTROL CABINET TO IDENTIFY EACH CABLE BY PHASE AND LOOP NUMBER. ALL VIDEO DETECTION COAXIAL AND POWER CABLES SHALL BE TAGGED AT THE CONTROL CABINET TO IDENTIFY EACH CABLE BY CAMERA NUMBER AND LOCATION. ALL OPTICAL DETECTOR CABLES SHALL BE TAGGED AT THE CONTROL CABINET TO IDENTIFY EACH BY DIRECTION AND LOCATION.
16. THE CONTRACTOR SHALL NOTIFY THE CITY OF ALBUQUERQUE SIGNAL SHOP TWO WORKING DAYS IN ADVANCE OF ANY ANTICIPATED WORK ON SIGNALS, LIGHTING, AND POWER SERVICES. TRAFFIC ENGINEERING PERSONNEL MUST BE PRESENT WHEN SIGNALS ARE SHUT–OFF OR TURNED ON. THE CONTRACTOR SHALL ALSO NOTIFY THE CITY OF ALBUQUERQUE SIGNAL SHOP EACH TIME A TRAFFIC SIGNAL CONTROL DOOR IS OPENED.
17. THE CONTRACTOR SHALL NOTIFY THE LOCAL POWER COMPANY 30 DAYS IN ADVANCE OF ANTICIPATED POWER SERVICE CONNECTIONS. THE CONTRACTOR SHALL COORDINATE WITH THE LOCAL POWER COMPANY TO ESTABLISH ELECTRICAL SERVICE IN THE MAINTAINING AGENCY'S NAME. THE CONTRACTOR SHALL PAY THE LOCAL POWER COMPANY ALL COSTS TO PROVIDE ELECTRICAL SERVICE. THIS WORK WILL BE CONSIDERED INCIDENTAL TO CONSTRUCTION.
18. THE CONTRACTOR IS RESPONSIBLE FOR THE COST OF THE POWER AND MAINTENANCE UNTIL SUCH TIME AS THE SIGNAL IS ACCEPTED FOR MAINTENANCE BY THE CITY OF ALBUQUERQUE.
19. THE CONTRACTOR SHALL REMOVE AND SALVAGE TO COA YARD ALL CONFLICTING SIGNING WHEN TRAFFIC SIGNALS ARE PUT INTO OPERATION.
20. FOR CONDUITS CONTAINING ONLY LOW VOLTAGE COMMUNICATIONS CABLES. THE REQUIREMENTS FOR SINGLE CONDUCTOR BARE COPPER #8 AWG MAY BE WAIVED WHERE PERMITTED BY THE NATIONAL ELECTRICAL CODE.
21. EXISTING CONDUITS TO BE REMOVED OR ABANDONED SHALL HAVE ALL WIRING REMOVED.
22. EXISTING CONDUITS SHALL BE REPAIRED, ADJUSTED, OR REPLACED AS DIRECTED BY THE PROJECT MANAGER WHERE ELECTRICAL PULL BOXES OR TRAFFIC MANHOLES ARE INSTALLED OR REPLACED.
23. THE CONTRACTOR SHALL ARRANGE TO HAVE OFF–DUTY POLICE OFFICERS TO DIRECT TRAFFIC WHEN SIGNALS ARE TURNED OFF.
24. ALL DATA SHOWN HEREIN CONCERNING EXISTING UTILITIES HAS BEEN OBTAINED FROM "AS–BUILT" DRAWINGS AND FROM FIELD OBSERVATIONS WHICH MAY OR MAY NOT BE ACCURATE. THE CONTRACTOR WILL BE RESPONSIBLE FOR EXPLORATORY TRENCHING, IF NECESSARY, TO MORE SPECIFICALLY LOCATE UTILITY LINES. COST OF LOCATING UTILITY LINES INCLUDING EXPLORATORY TRENCHING WILL BE CONSIDERED INCIDENTAL TO CONSTRUCTION.
25. NOT USED
26. THE CONTRACTOR SHALL VIDEO TAPE THE EXISTING TRAFFIC SIGNAL EQUIPMENT IN VHS FORMAT AND REVIEW THE TAPE WITH THE CITY OF ALBUQUERQUE SIGNAL SHOP PERSONNEL PRIOR TO BEGINNING ANY REMOVALS OF SIGNAL EQUIPMENT. THE TAPE SHALL BECOME THE PROPERTY OF THE CITY OF ALBUQUERQUE SIGNAL LABS AND MAY BE USED TO RESOLVE ANY QUESTIONS RELATED TO THE ORIGINAL CONDITION AND QUALITY OF EXISTING EQUIPMENT. THE EXISTING TRAFFIC SIGNAL EQUIPMENT INCLUDING POLES, CONTROLLER, CABINETS, SIGNAL HEADS, PEDESTRIAN HEADS, PEDESTRIAN PUSH BUTTONS, FITTINGS, BACK PLATES, LOAD SWITCHES, CONFLICT MONITORS, AND DETECTORS SHALL BE DELIVERED TO THE CITY OF ALBUQUERQUE SIGNAL YARD

AS BUILT INFORMATION
CONTRACTOR R&O Construction DATE 2015
WORK STAKED BY Terra Land DATE 2015
INSPECTOR ACCEPTANCE BY Carl Tenn DATE 2015
FIELD VERIFICATION BY Contrans DATE 2015
DRAWINGS CORRECTED BY Tierra DATE 2016
MICRO–FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES
NO. BY DATE

ENGINEER'S SEAL
RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN
DESIGNED BY JN DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 20140 38–Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb. 2015

RECORD DRAWING

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858–3100
www.tierrawestllc.com

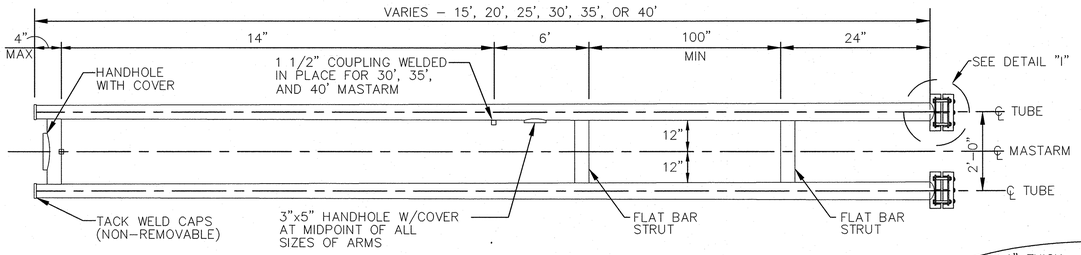
CITY OF ALBUQUERQUE
PUBLIC WORKS DEPARTMENT
ENGINEERING GROUP

UNSER BLVD AND LADERA DR

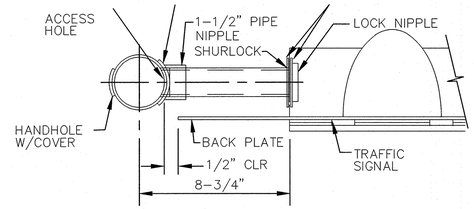
CABLES AND CONDUITS, SIGNAL NOTES

DESIGN REVIEW COMMITTEE: APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE
CITY ENGINEER APPROVAL: APPROVED JUL 30 2015 CITY ENGINEER
LAST DESIGN UPDATE | MO./DAY/YR. | MO./DAY/YR.

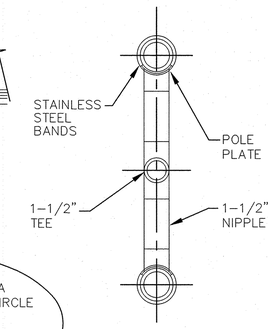
CITY PROJECT NO. 529882 | ZONE MAP NO. H–9–Z | SHEET # 10 of 22



TYPICAL MASTARM DETAIL



SECTION C–C



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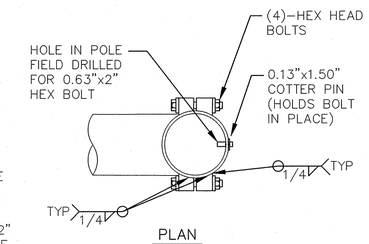
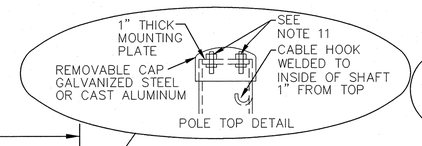
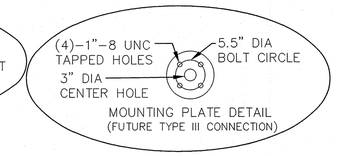
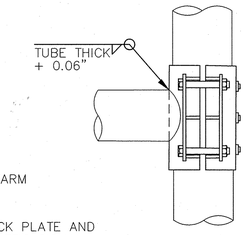


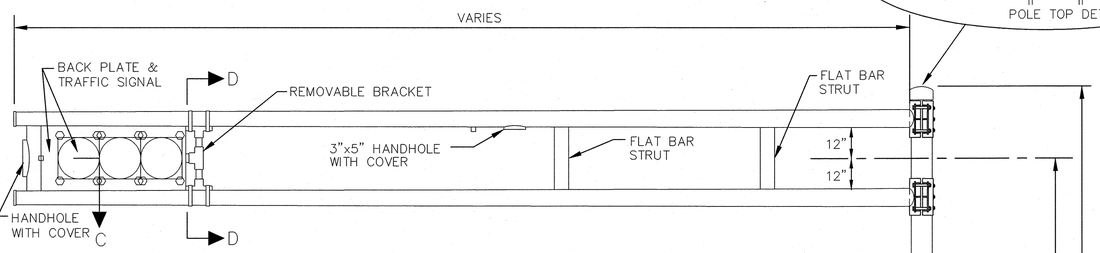
PLAN



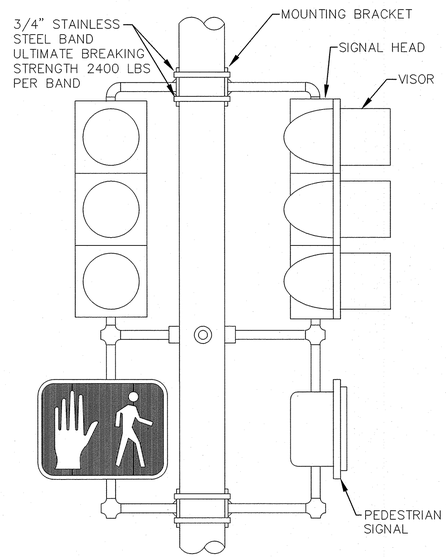




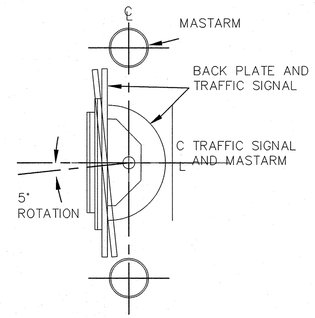
ELEVATION



3–SECTION TRAFFIC SIGNAL



SECTION F–F



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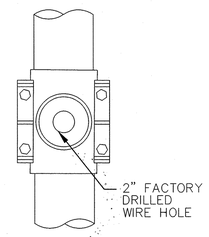
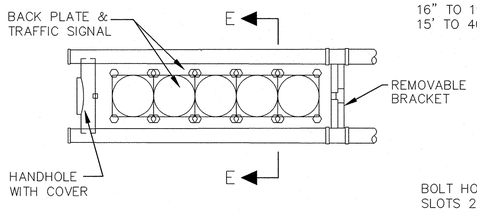


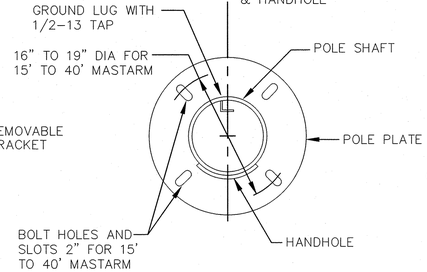
SECTION

DETAIL I

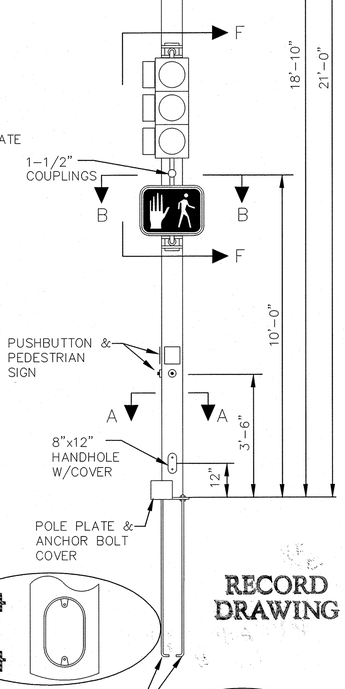
NOTE:
ONE SIZE ARM CLAMP FOR 15' TO 25' MASTARMS AND ONE SIZE FOR 30' TO 40' MASTARMS WILL BE ALLOWED

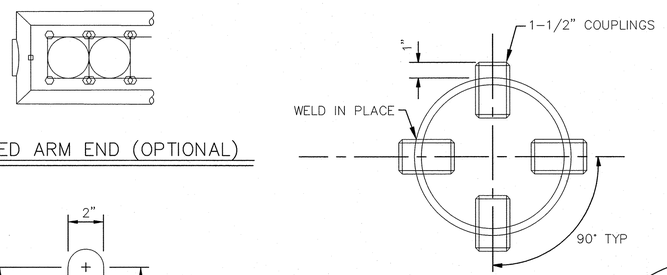


5–SECTION TRAFFIC SIGNAL



SECTION A–A

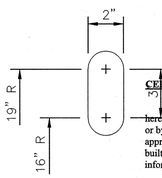




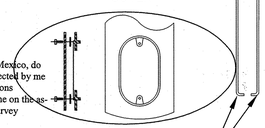
SECTION B–B

SECTION G–G

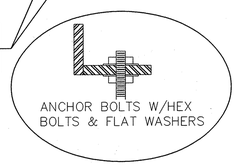
MITERED ARM END (OPTIONAL)



POLE PLATE SLOT DETAIL



ANCHOR BOLTS
15', 20', 25' ARM: 1-1/2"x54"x6"
30', 35', 40' ARM: 1-1/2"x54"x6"



ANCHOR BOLTS W/HEX BOLTS & FLAT WASHERS

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

RECORD DRAWING

RECORD DRAWING

TRAFFIC SIGNAL MASTARM NOTES:

1. DESIGN IN ACCORDANCE WITH 1985 AASHTO SPECIFICATIONS FOR STRUCTURAL SUPPORTS FOR HIGHWAY SIGNS, LUMINARIES, AND TRAFFIC SIGNALS FOR AN 80 MPH WIND ZONE.
2. POLES AND MASTARMS SHAFTS SHALL CONFORM TO ASTM A–595 GRADE A (MIN YIELD 55 KSI)
3. BASE PLATE AND SIGNAL ARM CLAMP SHALL BE ASTM A–36 (MIN YIELD 36 KSI).
4. ANCHOR BOLTS SAHLL BE ASTM A–36 MOD 55 (MIN YIELD 55 KSI)
5. SIGNAL ARM CONNECTING BOLTS SHALL BE ASTM A–325.
6. WELDING SHALL CONFORM TO THE REQUIREMENTS OF THE AMERICAN WELDING SOCIETY SPECIFICATIONS AWS D1.1. LATEST EDITION. ALL WELDS SHALL BE FREE FROM CRACKS, EXCESSIVE UNDERCUT, AND POROSITY. ANY WELD DEFECTS SHALL BE REPAIRED BY REMOVING THE DEFECTIVE MATERIAL AND REPLACING IT WITH SOUND WELD MATERIAL.
7. ALL HOLES SHALL BE DRILLED AND DEBURRED.
8. ALL POLES, MASTARMS, AND BOLTS SHALL BE GALVANIZED TO ASTM A–123 & A–153.
9. MASTARM SHALL BE MARKED TO DESCRIBE WHICH IS TOP AND WHICH IS BOTTOM. POLE PLATE COVER SHALL BE MARKED IN MATED PAIRS. POLE SHAFTS SHALL BE MARKED "ALB" "15–25" OR "30–40", AND DATE OF FABRICATION (MOUNTH/YEAR).
10. DETAILS SHOWN ARE FOR STEEL POLES. ALUMINUM POLES MAY BE USED ONLY WHEN PRE–APPROVED BY THE CITY OF ALBUQUERQUE TRAFFIC ENGINEERING OPERATIONS DIVISION.
11. BOLTS FOR TYPE III EXTENSIONS SHALL BE FURNISHED BY THE MANUFACTURER FOR ALL POLES INCLUDING TYPE II STANDARDS WITH NO EXTENSIONS.

FINISH:

☒ GALVANIZED

☐ POWDER COATED

COLOR RECORD DRAWING

AS BUILT INFORMATION

CONTRACTOR R.B. Construction DATE 2015
WORK STAKED BY Tierra West DATE 2015
AS-BUILTS CHECKED BY Tierra West DATE 2015
ACCEPTANCE BY CONTRACTOR DATE 2015
FIELD VERIFICATION BY Tierra West DATE 2016
DRAWINGS CORRECTED BY Tierra West DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

RONALD R. BOHANNAN NEW MEXICO 10786 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN
DESIGNED BY JN DATE Feb, 2015
DRAWN BY pm DATE Feb, 2015
DRAWING NAME 20140038–Signal.dwg JOB NO 20140038
CHECKED BY RRB DATE Feb, 2015

TIERRA WEST, LLC
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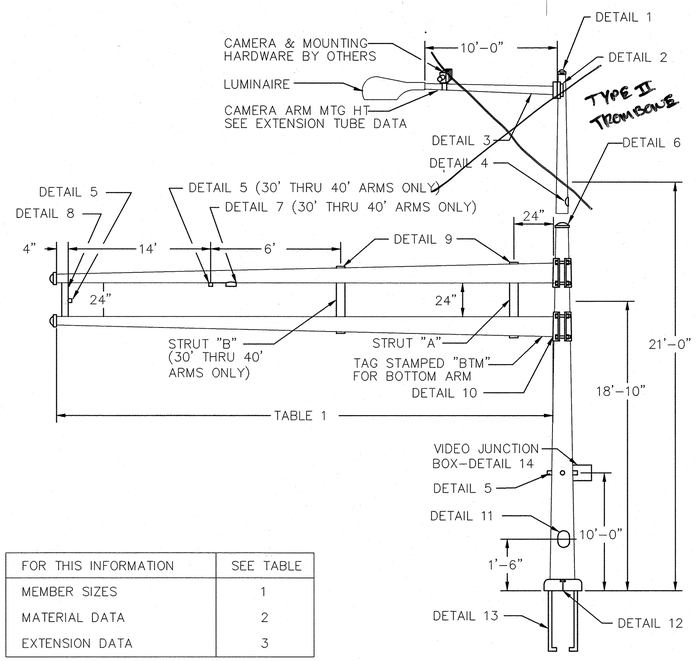
CITY OF ALBUQUERQUE
PUBLIC WORKS DEPARTMENT
ENGINEERING GROUP

UNSER BLVD AND LADERA DR

MASTARM DETAILS, TYPE III STANDARD – A

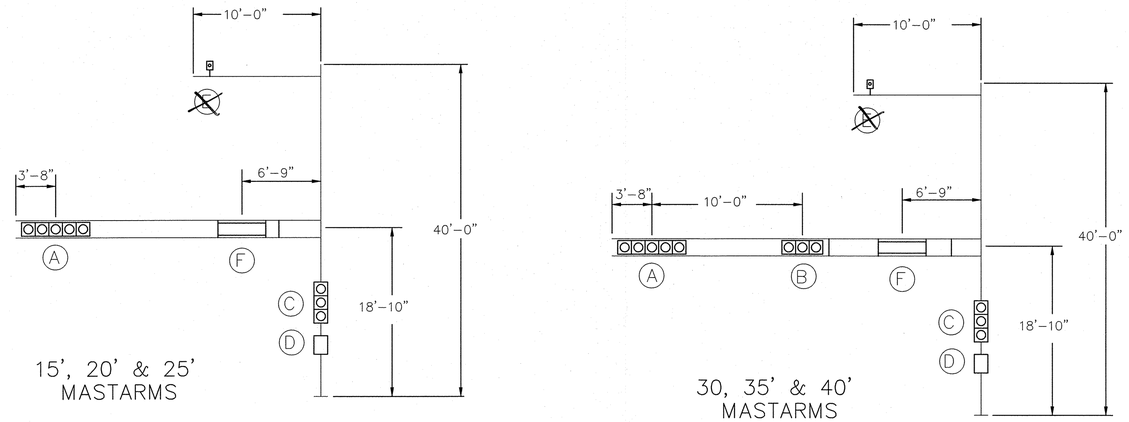
DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H–9–Z	11 of 22



FOR THIS INFORMATION	SEE TABLE
MEMBER SIZES	1
MATERIAL DATA	2
EXTENSION DATA	3

ALBUQUERQUE, NM POLE SERIES



DEVICE	DESCRIPTION	PROJ AREA (FT 2)	WEIGHT (LBS)
(A)	12"-5 SEC. SIGNAL WITH BACK PLATE	13.33	75
(B)	12"-3 SEC. SIGNAL WITH BACK PLATE	8.67	50
(C)	DUAL 12"-3 SEC. SIGNAL WITHOUT BACK PLATES	8.20	100
(D)	DUAL PEDESTRIAN SIGNAL & VIDEO JUNCTION BOX	3.00	60
(X)	VIDEO CAMERA	1.00 EPA	35
(F)	FREE SWINGING STREET NAME -96" X 16"	3.00 EPA	35

DESIGN CRITERIA:

1985 AASHTO STANDARD SPECIFICATIONS FOR STRUCTURAL SUPPORTS FOR HIGHWAY SIGNS, LUMINAIRES, AND TRAFFIC SIGNALS.

WIND VELOCITY:

80 MPH ISOTACH

LOADING INFORMATION

TABLE 1: POLE AND MASTARM SCHEDULE

DESIGNATION (SEE EXAMPLE ABOVE)				POLE DATA				BASE PLATE DATA				ANCHOR BOLT DATA				MASTARM DATA				ARM ATTACHMENT DATA				
POLE SERIES	POLE TYPE	SIGNAL ARM SPAN (FT)	CAMERA MOUNTING HEIGHT 0=NO CAMERA	BASE DIA	TOP DIA	LENGTH	GA	CIRCLE "C"	THK "G"	BC RANGE BC1	BC RANGE BC2	BOLT CIRCLE	DIAMETER "K"	LENGTH "J"	HOOK "H"	FIXED END DIA	FREE END DIA	GA	LENGTH (FT)	"A"	"B"	"C"	"D"	"E"
ALB	2	15	0, 30, 35, 40	10.00"	7.06"	21'-0"	7	23.00"	1.50"	16.00"	19.00"	16.00"	1.50"	54"	6"	5.80"	3.70"	11	15	7.25"	9.44"	10.81"	10.38"	1.00"-8UNC X 8.00"
ALB	2	20	0, 30, 35, 40	10.00"	7.06"	21'-0"	7	23.00"	1.50"	16.00"	19.00"	16.00"	1.50"	54"	6"	6.50"	3.70"	11	20	7.25"	9.44"	10.81"	10.38"	1.00"-8UNC X 8.00"
ALB	2	25	0, 30, 35, 40	10.00"	7.06"	21'-0"	7	23.00"	1.50"	16.00"	19.00"	16.00"	1.50"	54"	6"	7.00"	3.50"	11	25	7.25"	9.44"	10.81"	10.38"	1.00"-8UNC X 8.00"
ALB	2	30	0, 30, 35, 40	12.00"	9.06"	21'-0"	5	23.00"	1.50"	16.00"	19.00"	16.00"	1.50"	54"	6"	7.72"	3.52"	7	30	9.25"	11.44"	13.81"	12.38"	1.00"-8UNC X 9.00"
ALB	2	35	0, 30, 35, 40	12.00"	9.06"	21'-0"	5	23.00"	1.50"	16.00"	19.00"	16.00"	1.50"	54"	6"	8.30"	3.40"	7	35	9.25"	11.44"	13.81"	12.38"	1.00"-8UNC X 9.00"
ALB	2	40	0, 30, 35, 40	12.00"	9.06"	21'-0"	5	23.00"	1.50"	16.00"	19.00"	16.00"	1.50"	54"	6"	9.00"	3.40"	7	40	9.25"	11.44"	13.81"	12.38"	1.00"-8UNC X 9.00"

TABLE 2: MATERIAL DATA

COMPONENT	ASTM DESIGNATION	MIN. YIELD (KSI)	COMPONENT	ASTM DESIGNATION	MIN YIELD (KSI)
POLE TUBE	A595 GR A	55	SIGNAL ARM CLAMP	A36	36
BASE PLATE	A36	36	SIGNAL ARM CONN BOLTS	A325*	
MAST ARM TUBE	A595 GR A	55	CAMERA ARM PLATES	A36	36
CAMERA ARM TUBE	A595 GR A	55	GALVANIZING	A123 & A153	
POLE EXTENSION	A595 GR A	55			
ANCHOR BOLTS AASHTO M314 GR. 55					

* LUBRICATE IN FIELD IF NECESSARY IN LIEU OF THE REQUIREMENT IN A325

TABLE 3: EXTENSION TUBE DATA

MASTARM LENGTH (FT)	CAMERA MTG HT (FT)	EXTENSION TUBE BASE DIA	EXTENSION TUBE TOP DIA	EXTENSION TUBE LENGTH (FT)	EXTENSION TUBE GAUGE
15-20	30	7.00	5.74	9.0	11
	35	7.00	5.04	14.0	11
	40	7.00	4.34	19.0	11
30-40	30	9.00	7.74	9.0	11
	35	9.00	7.04	14.0	11
	40	9.00	6.34	19.0	11

FINISH:

☒ GALVANIZED

☐ POWDER COATED

COLOR _____

ALB - 2 - 25 - 40

- 40: CAMERA MOUNTING HEIGHT (0,30',35',OR 40')
- 25: SIGNAL ARM SPAN (15',20',25',30',35',40')
- 2: POLE TYPE
- ALB: ALBUQUERQUE POLE SERIES (ALB)

DESIGNATION EXAMPLE **

** POLE SHAFTS SHALL BE MARKED "ALB" "15-25" OR "30-40", AND DATE OF FABRICATION (MONTH/YEAR).

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

RONALD R BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER

5/12/16

RECORD DRAWING

AS BUILT INFORMATION

CONTRACTOR R&R Construction
WORK STAKED BY Texas Lopez DATE 2015
INSPECTOR'S ACCEPTANCE BY Ron Tillue DATE 2015
FIELD TEST BY Ron Tillue DATE 2015
VERIFICATION BY Ron Tillue DATE 2015
DRAWINGS CORRECTED BY Tillue DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION

FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN

DESIGNED BY JN DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 2014038-Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb. 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
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www.tierrawestllc.com

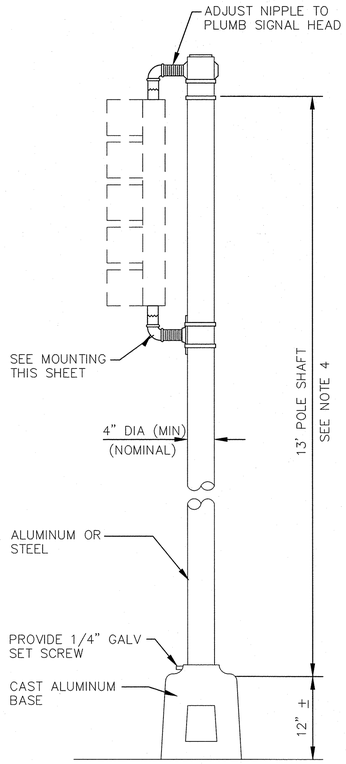
CITY OF ALBUQUERQUE
PUBLIC WORKS DEPARTMENT
ENGINEERING GROUP

UNSER BLVD AND LADERA DR

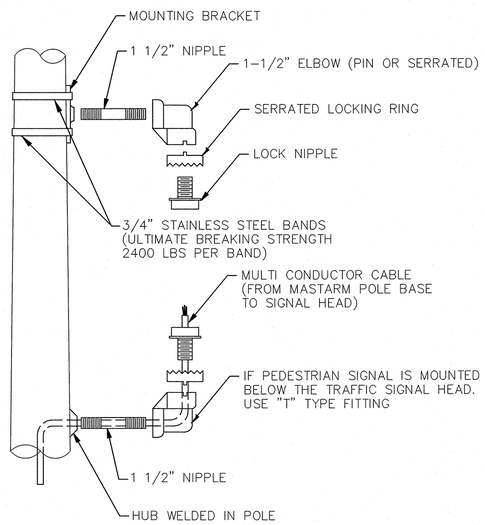
MASTARM DETAILS - TYPE II STANDARD - B

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED APR 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	12 of 22

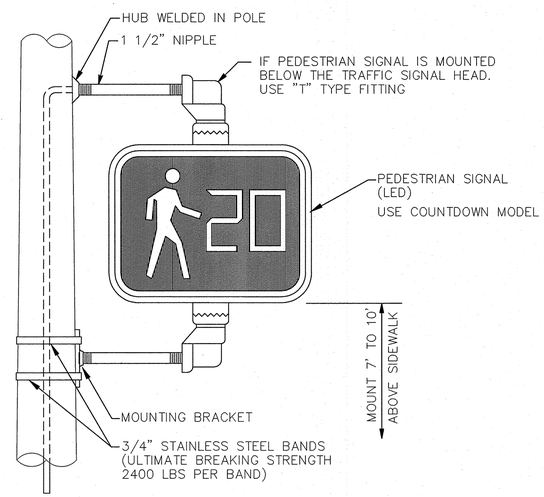


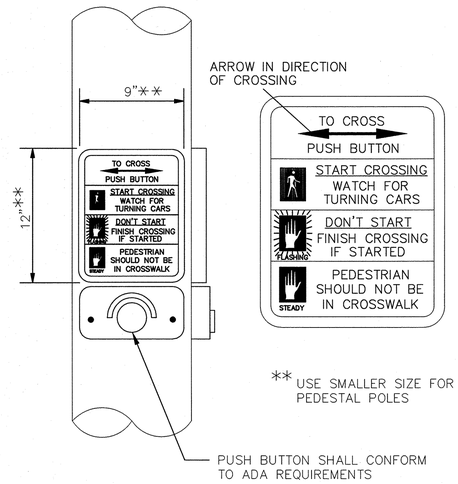
PEDESTAL POLE DETAILS



SIDE VIEW

MOUNTING DETAIL





PEDESTRIAN SIGNAL DETAILS

PUSH BUTTON DETAIL

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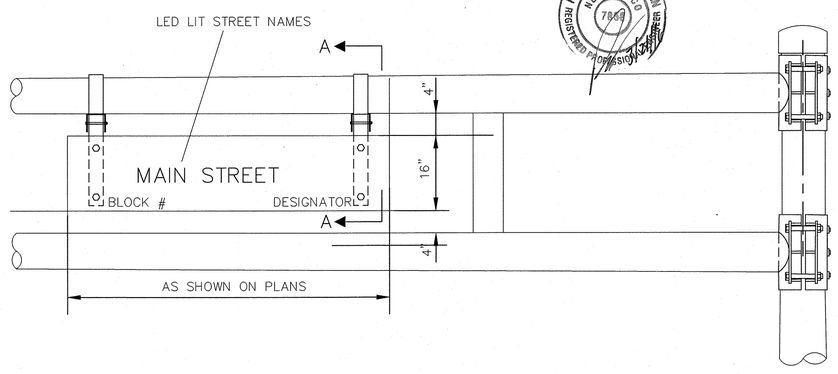
Engineer's Seal & Signature

RONALD R. BOHANNAN NEW MEXICO 7869 REGISTERED PROFESSIONAL ENGINEER

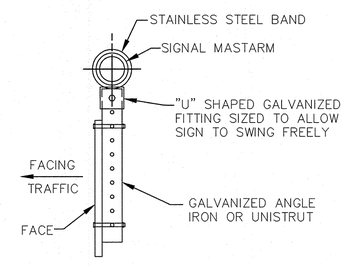
NOTES:

1. STREET NAME SIGNS REQUIRED AS SHOWN ON PLANS.
2. STREET NAME SIGN SHALL BE 16" WIDE WITH 8" SERIES "C" LETTERS. SIGN SHALL BE NO MORE THAN TO 12 SQUARE FEET TOTAL AREA AND SHALL HAVE HIGH INTENSITY REFLECTIVE LEGEND, 1" BORDER AND BACKGROUND COLORS: WHITE ON GREEN, SIGN PANELS SHALL BE SINGLE SHEET 6061-T6 ALUMINUM .120 MINIMUM THICKNESS.
3. PEDESTRIAN ACTUATED CROSSING SHALL BE A MAXIMUM OF 42" (1065 mm) ABOVE THE FINISHED PUBLIC SIDEWALK. A STABLE, FIRM, AND SLIP-RESISTANT AREA - 30"x48" (915 mm x 1220 mm) - SHALL BE PROVIDED TO ALLOW FOR A FORWARD OR A PARALLEL APPROACH TO THE CONTROLS. WHERE A PARALLEL IS PROVIDED, CONTROLS SHALL BE WITHIN 10" (255 mm) HORIZONTALLY OF AND CENTERED ON THE CLEAR GROUND SPACE.
4. FOR INSTALLATIONS WITH ONLY PEDESTRIAN SIGNALS, CUT SHAFT TO 9'. USE 15' SHAFT FOR PEDESTAL POLES REQUIRING BOTH 5-SECTION SIGNAL ASSEMBLIES AND PEDESTRIAN SIGNALS.



STREET NAME SIGN DETAILS

SUBJECT TO COA TRAFFIC ENGINEER APPROVAL PRIOR TO FABRICATION.



SECTION "A-A"

RECORD DRAWING

FINISH:

☒ GALVANIZED

☐ POWDER COATED

COLOR _____

AS BUILT INFORMATION
CONTRACTOR R&C Construction
WORK STAKED BY Terra-Land DATE 2015
INSPECTORS ACCEPTANCE BY Contrac DATE 2015
FIELD VERIFICATION BY Contrac DATE 2015
DRAWINGS CORRECTED BY Thrac DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

REVISIONS

NO.	DATE	REMARKS	BY

DESIGN
DESIGNED BY JN DATE Feb, 2015
DRAWN BY prn DATE Feb, 2015
DRAWING NAME 2014038-Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb, 2015

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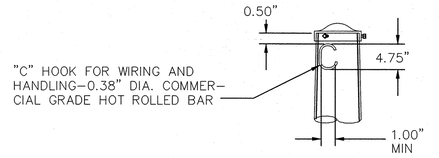
UNSER BLVD AND LADERA DR

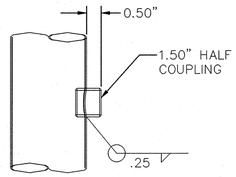
MISCELLANEOUS DETAILS A - TYPE III STANDARD

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

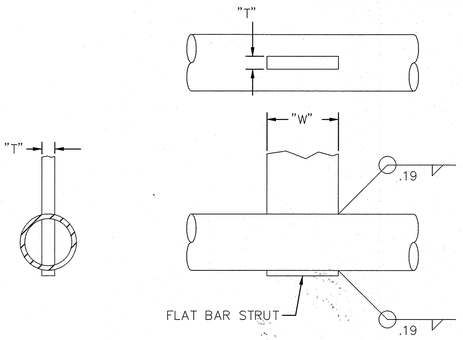
CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	13 of 22



DETAIL 1 | POLE TOP

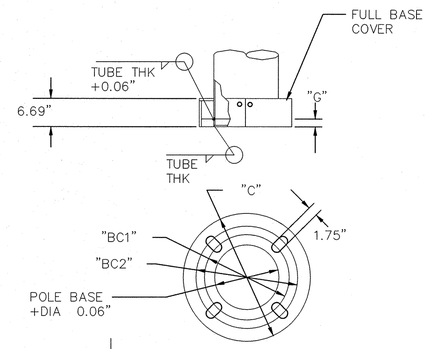


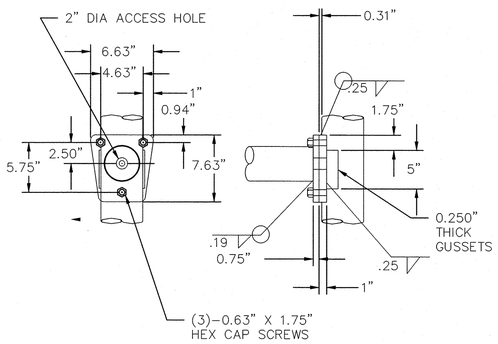
DETAIL 5 | POLE COUPLING



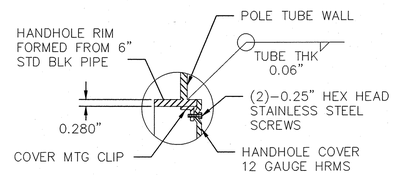
STRUT	ARM SPAN	
	15' THRU 25'	30' THRU 40'
	"W" X "T"	"W" X "T"
A	5" X 0.50"	7" X 0.50"
B	———	5" X 0.50"

DETAIL 9 | MID BAR STRUT

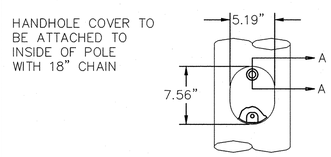




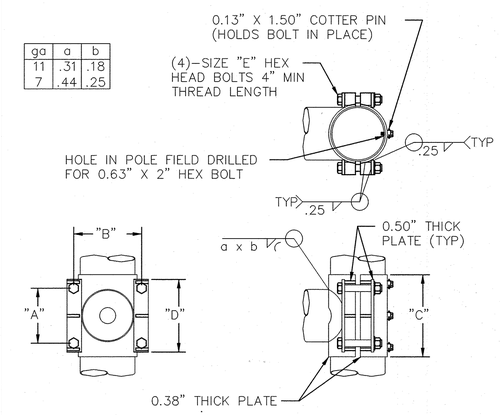
DETAIL 2 | CAMERA ARM ATTACHMENT



SECTION A–A



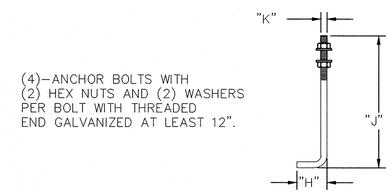
DETAIL 6 | EXTENSION HANDHOLE



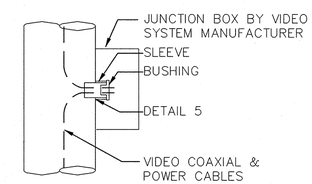
ga	a	b
11	.31	.18
7	.44	.25

DETAIL 10 | SIGNAL ARM ATTACHMENT

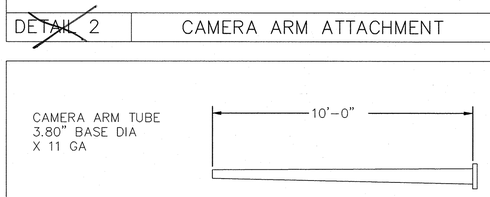
DETAIL 12 | POLE BASE



DETAIL 13 | ANCHOR BOLT



DETAIL 14 | VIDEO JUNCTION BOX



DETAIL 3 | CAMERA ARM

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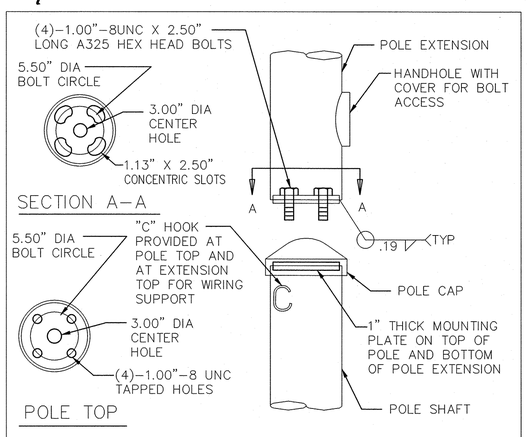
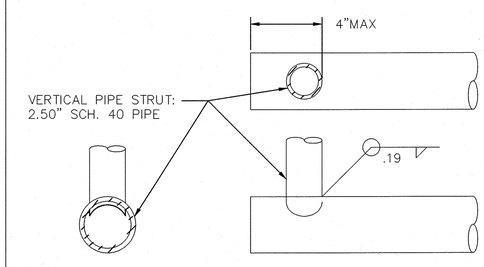
SEE DETAIL 6

Engineer's Seal & Signature

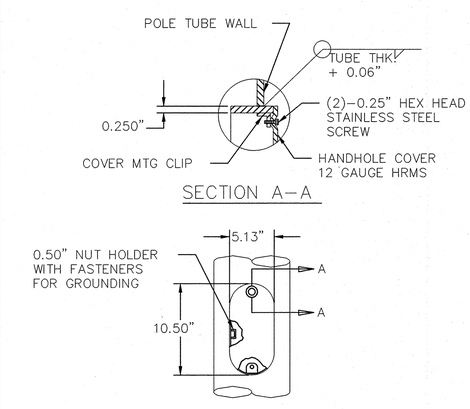
DETAIL 7 | HANDHOLE



DETAIL 4 | POLE EXTENSION CONNECTION



DETAIL 8 | END PIPE STRUT



DETAIL 11 | HANDHOLE

RECORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R.W. Castenada
WORK STAKED BY Tierra Land DATE 2015
INSPECTOR'S ACCEPTANCE BY Chris Medina DATE 2015
FIELD VERIFICATION BY Chris Medina DATE 2015
DRAWINGS CORRECTED BY Chris Medina DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES
NO. | BY | DATE

ENGINEER'S SEAL

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN
DESIGNED BY JN DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 2014038–Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb. 2015

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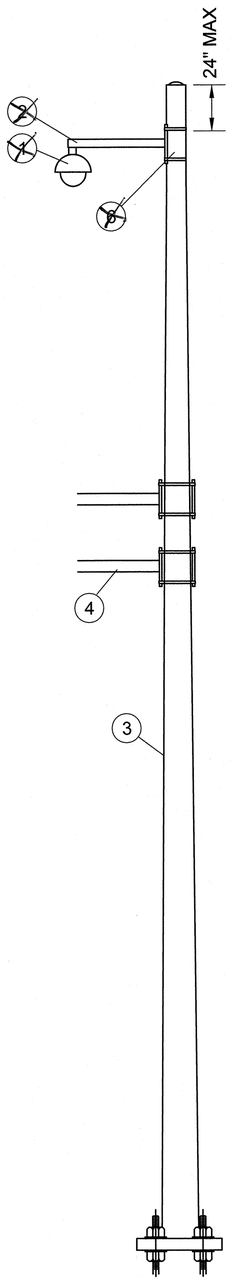
CITY OF ALBUQUERQUE
PUBLIC WORKS DEPARTMENT
ENGINEERING GROUP

UNSER BLVD AND LADERA DR

MISCELLANEOUS DETAILS B – TYPE II STANDARD

DESIGN REVIEW COMMITTEE: APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE
CITY ENGINEER APPROVAL: APPROVED JUL 30 2015 CITY ENGINEER
LAST DESIGN UPDATE | MO./DAY/YR. | MO./DAY/YR.

CITY PROJECT NO. 529882 | ZONE MAP NO. H–9–Z | SHEET # 14 of 22

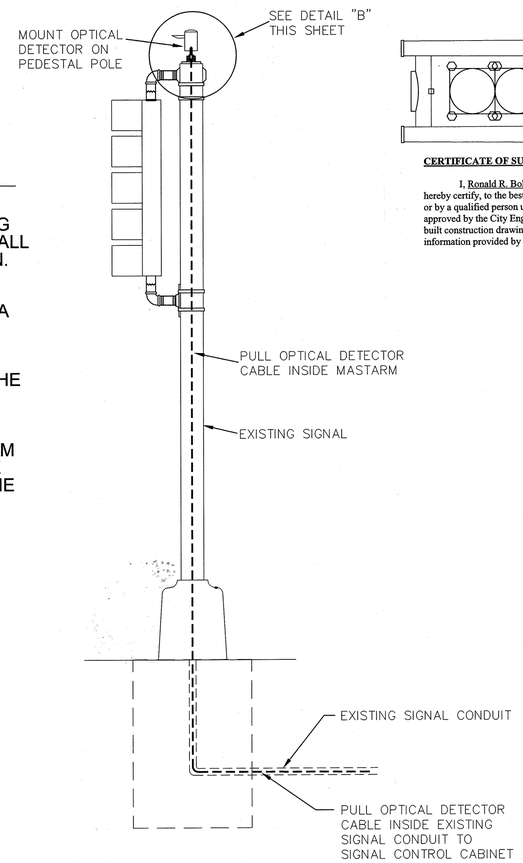


CAMERA POLE DETAIL

CCTV INSTALLATION NOTES:

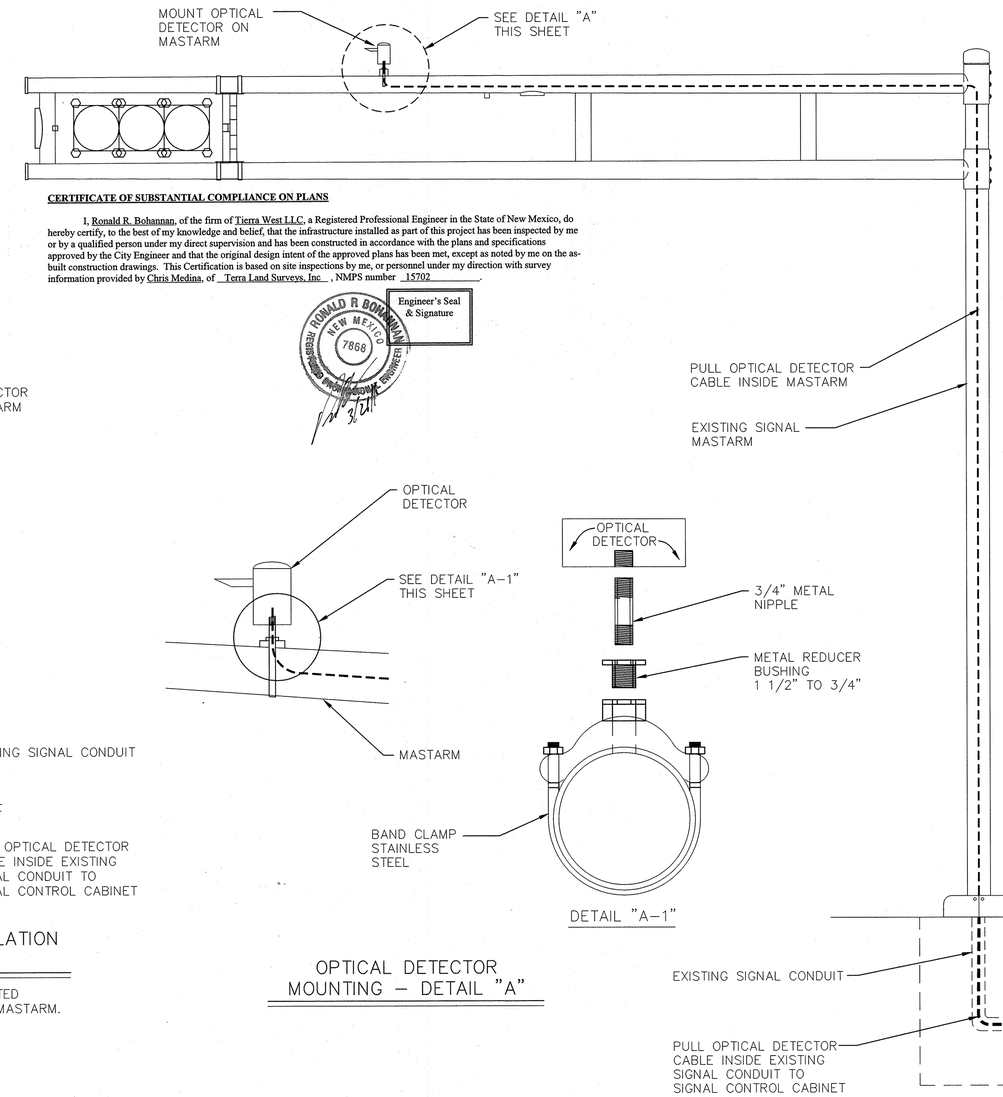
1. CCTV MOUNTING ASSEMBLY SHALL BE SECURED WITH A MINIMUM OF 2 STAINLESS STEEL BANDING STRAPS. THE MOUNTING ASSEMBLY OR ARM SHALL BE POINTED TOWARD CENTER OF INTERSECTION.
2. CCTV MOUNTING ON MAST ARM SHALL INCLUDE A 1 1/2" NPT FITTING BANDED TO THE END OF THE MAST ARM.
3. THE CABLING SHALL BE CONTAINED INSIDE OF THE POLE. A HOLE SHALL BE DRILLED IN THE POLE FOR CABLING TO EXIT THE POLE AND FEED THROUGH THE MOUNTING ASSEMBLY. THE HOLE SHALL BE SEALED TO PREVENT ANY WATER FROM ENTERING THE POLE. CABLING WITHIN THE POLE SHALL HAVE A MEANS OF CABLE SUPPORT AT THE TOP TO PREVENT THE CABLE TENSION FROM PULLING ON THE EQUIPMENT.
4. ALL WORK TO BE PERFORMED IN THE CABINET SHALL BE COORDINATED AND SUPERVISED BY THE CITY.
5. CCTV CAMERA SHALL BE MOUNTED WITHIN ONE DEGREE OF LEVEL ON BOTH HORIZONTAL AXIS.
6. ALL CABLING SHALL RUN UNSPLICED FROM THE CCTV CAMERA TO THE CONTROL CABINET.

- (1) DOME CCTV UNIT
- (2) MOUNTING ASSEMBLY
- (3) EX. TRAFFIC SIGNAL POLE
- (4) EX. TRAFFIC SIGNAL MAST ARM
- (5) DELETED
- (6) CABLE STRAIN RELIEF (NOT SHOWN)
- (7) ITS POLE (SEE DETAIL SHEET D-5 ITS-40)
- (8) BREAK AWAY COUPLING



TYPICAL OPTICAL DETECTOR INSTALLATION PEDESTAL POLE

NOTE: OPTICAL DETECTOR SHALL ONLY BE MOUNTED ON PEDESTAL POLES WHEN THERE IS NO MASTARM.



OPTICAL DETECTOR MOUNTING – DETAIL "A"

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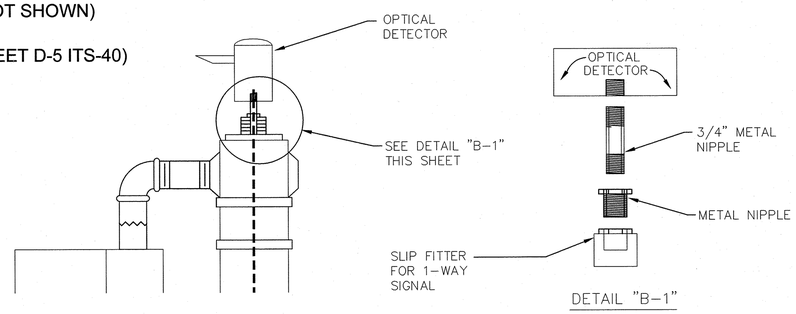
RONALD R BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER

3/2/15

Engineer's Seal & Signature



OPTICAL DETECTOR MOUNTING – DETAIL "B"

TYPICAL OPTICAL DETECTOR INSTALLATION – MASTARM

NOTES:

1. ALL OPTICAL DETECTOR MOUNTING HARDWARE SHALL CONFORM TO OPTICAL DETECTOR MANUFACTURER'S REQUIREMENTS.

RECORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R.W. Construction DATE 2015
WORK STAKED BY Terra Land DATE 2015
INSPECTOR'S ACCEPTANCE BY Construc DATE 2015
FIELD VERIFICATION BY Construc DATE 2015
DRAWINGS CORRECTED BY Twc DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN
DESIGNED BY JN DATE Feb. 2015
DRAWN BY prm DATE Feb. 2015
DRAWING NAME 2014038-Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb. 2015

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OPTICAL DETECTOR INSTALLATION DETAILS

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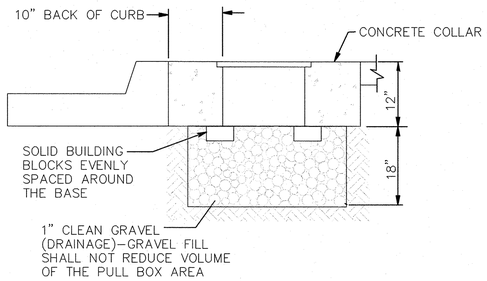
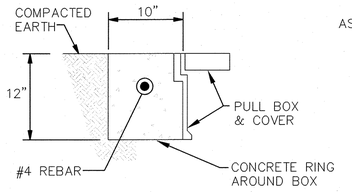
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED APR 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	15 of 22

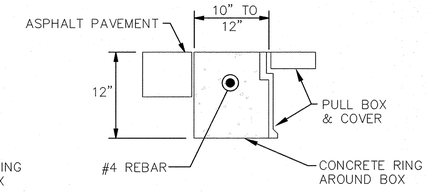


TYPICAL PULL BOX INSTALLATION

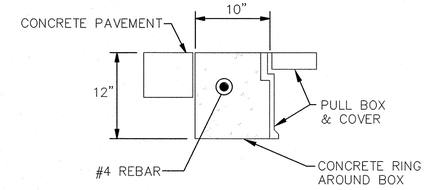
NOTE: SEE "CONCRETE COLLAR DETAIL"



IN COMPACTED EARTH



IN ASPHALT PAVEMENTS



IN CONCRETE PAVEMENTS

CONCRETE COLLAR DETAILS

NOTE: THE CONCRETE COLLAR SHALL BE PER SEC 101, EXTERIOR CONCRETE f'c=3500 PSI AT 28 DAYS
THE CONCRETE COLLAR SHALL BE CONSIDERED INCIDENTAL TO THE PULL BOX BID ITEMS

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

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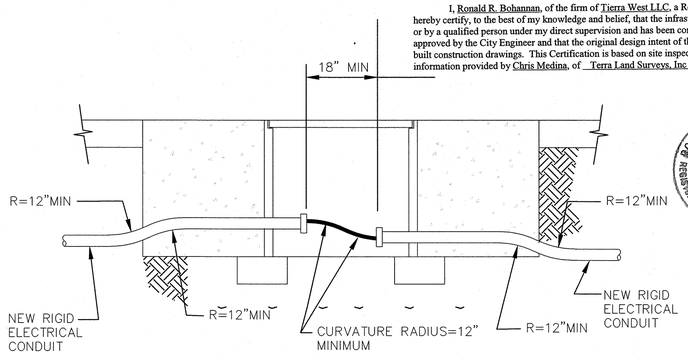
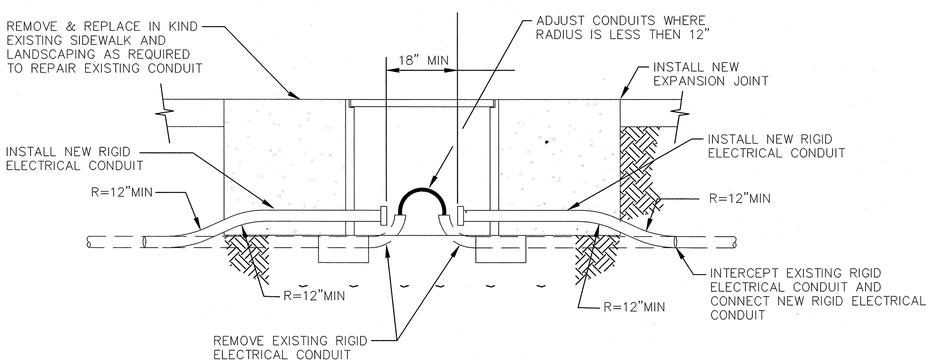
Engineer's Seal & Signature

RONALD R BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER



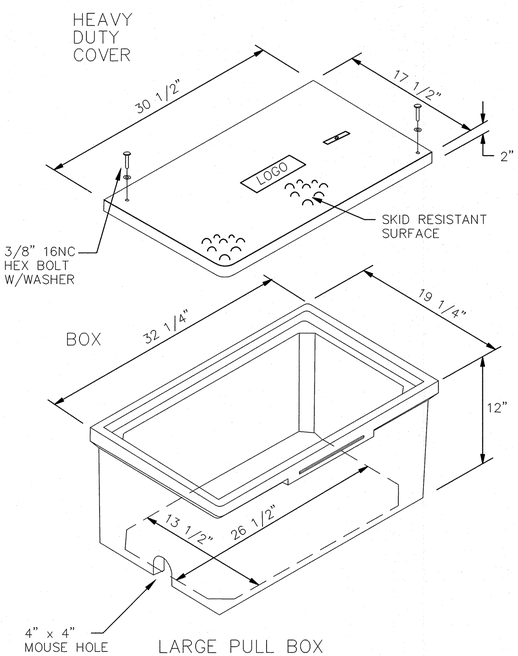
TRAFFIC SIGNAL PULL BOX (TYPICAL)

NEW CONDUIT INSTALLATION

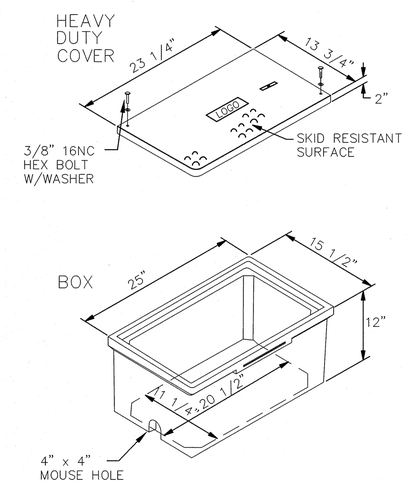


TRAFFIC SIGNAL PULL BOX (TYPICAL)

RETROFIT INSTALLATION



LARGE PULL BOX



STANDARD PULL BOX

RECORD DRAWING

NOTES FOR HEAVY DUTY REINFORCED POLYMER MORTAR PULL BOX AND COVERS

1. MATERIAL TO BE AN AGGREGATE CONSISTING OF SAND AND GRAVEL BOUND TOGETHER WITH A POLYMER AND REINFORCED WITH CONTINUOUS WOVEN GLASS STRANDS. THE MATERIAL MUST HAVE THE FOLLOWING MECHANICAL PROPERTIES: COMPRESSIVE STRENGTH – 11,000 PSI, TENSILE STRENGTH – 1,700 PSI, FLEXURAL STRENGTH – 7,500 PSI.
2. ALL PULL BOX COVERS SHALL BE HEAVY DUTY REINFORCED POLYMER MORTAR, HAVING A SERVICE LOAD OF 22,568 LBS OVER 10" SQUARE (225 PSI).
3. PULL BOX TYPE AND LOGO SHALL BE APPROVED BY THE PROJECT MANAGER.
4. THE DIMENSIONS OF THE PULL BOXES SHOWN ARE NOMINAL DIMENSIONS AND MAY VARY AS TO THE MANUFACTURER'S RECOMMENDATIONS. ALL DIMENSIONS SHALL BE VERIFIED BY THE PROJECT MANAGER.
5. ELECTRICAL PULL BOX (STANDARD) SHALL BE A HEAVY DUTY REINFORCED POLYMER MORTAR PULL BOX AND COVER MEASURING 13 3/4" x 23 1/4" x 2".

RECORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R&O Construction
WORK STAKED BY Terra Land DATE 2015
INSPECTOR'S ACCEPTANCE BY Cont/Tierra DATE 2015
FIELD VERIFICATION BY Cont/Tierra DATE 2015
DRAWINGS CORRECTED BY Tierra DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN
DESIGNED BY JN DATE Feb, 2015
DRAWN BY pm DATE Feb, 2015
DRAWING NAME 2014038–Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb, 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858–3100
www.tierrawestllc.com

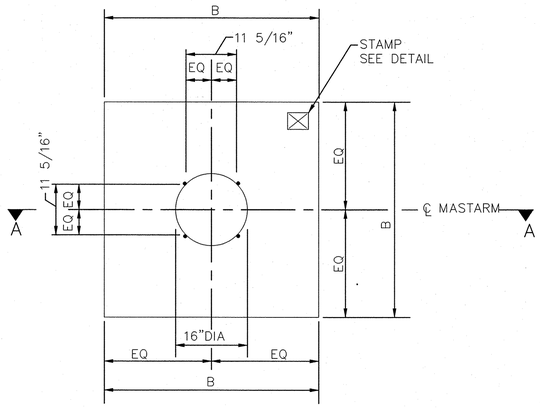
CITY OF ALBUQUERQUE
PUBLIC WORKS DEPARTMENT
ENGINEERING GROUP

UNSER BLVD AND LADERA DR

PULL BOX DETAILS

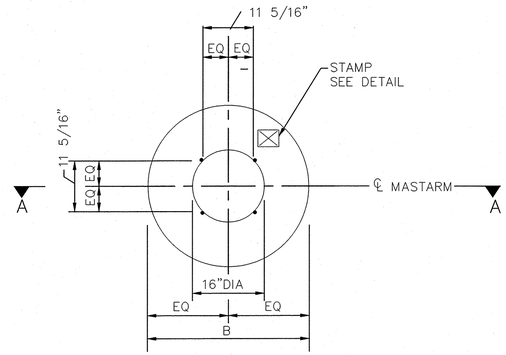
DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 3 0 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H–9–Z	16 of 22



PLAN VIEW (SQUARE)

NO SCALE

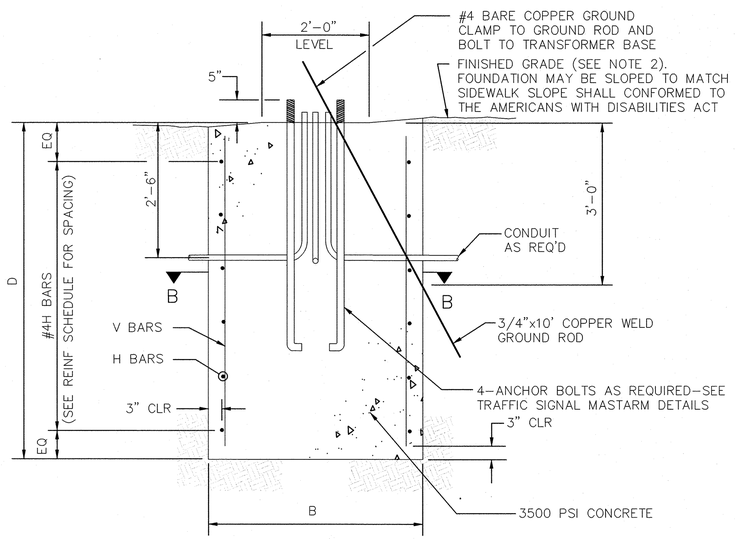


PLAN VIEW (ROUND)

NO SCALE

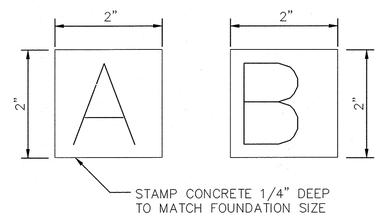
FOUNDATION DIMENSIONS AND QUANTITIES								
FOUNDATION TYPE	SIGNAL ARM SPAN(FT)	DIMENSION		REINFORCING		REBAR POUNDS	3500 PSI CONCRETE CUBIC YARDS	NOTES
		B (WIDTH)	D (DEPTH)	V BARS MARK	H BARS MARK			
TYPE A (SQUARE)	15 20 25	3'-6" " "	5'-0" " "	#4V2 " "	#3H2 " "	49.1 •	2.27 " "	
TYPE B (SQUARE)	30 35 40	4'-0" " "	6'-3" " "	#5V1 " "	#3H1 " "	82.6	3.70 " "	
TYPE A (ROUND)	15 20 25	2'-6" " "	8'-6" " "	#6V4 " "	#3H4 " "	98.1	1.55 " "	ROUND SHAPE TO BE USED ONLY WHERE SPECIFICALLY NOTED ON PLANS OR WHEN APPROVED BY THE PROJECT MANAGER.
TYPE B (ROUND)	30 35 40	3'-0" " "	11'-9" " "	#7V3 " "	#3H3 " "	179.7	3.08 " "	

REINFORCING SCHEDULE (GRADE 60 BARS)					
MARK	QUANT	TYPE	SIZE	LENGTH	COMMENTS
#5V1	8	1	5	5'-9"	
#4V2	8	1	4	4'-6"	
#7V3	6	1	7	11'-3"	
#6V4	6	1	6	8'-0"	
#3H1	6	2	3	15'-4"	A = 42",TIES AT 14" OC
#3H2	5	2	3	13'-4"	A = 36",TIES AT 12" OC
#3H3	12	3	3	9'-3"	DIA = 30",TIES AT 12" OC
#3H4	9	3	3	7'-8"	DIA = 24",TIES AT 12" OC



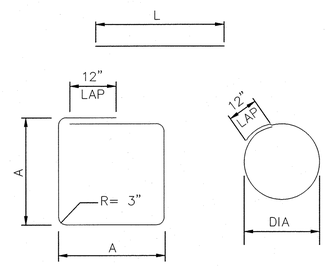
SECTION A-A (ROUND OR SQUARE)

NO SCALE

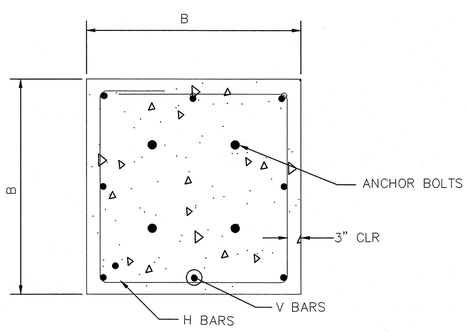


STAMP DETAIL

NO SCALE

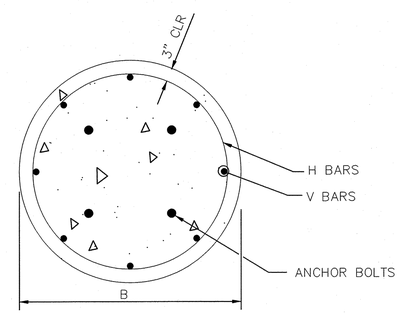


BAR BENDING DIAGRAM



SECTION B-B (SQUARE)

NO SCALE



SECTION B-B (ROUND)

NO SCALE

TRAFFIC SIGNAL MASTARM FOUNDATION NOTES

1. REFER TO THE PLANS FOR LOCATIONS OF TRAFFIC SIGNAL MASTARM FOUNDATIONS.
2. FINISHED GRADE FOR THE FOUNDATIONS SHALL BE ESTABLISHED IN THE FIELD BY THE PROJECT MANAGER.
3. THE FOUNDATIONS SHOWN HERE SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE CITY OF ALBUQUERQUE STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, CURRENT REVISION.
4. CONCRETE SHALL BE 3500 PSI FOR EXTERIOR STRUCTURES. REFER TO TABLE 101.C OF THE SPECIFICATIONS.
5. REINFORCING STEEL SHALL CONFORM TO ASTM A-615 GRADE 60.
6. THE TOP 6 INCHES OF THE FOUNDATION PEDESTAL SHALL BE FORMED TO THE DIMENSIONS SHOWN ON THIS SHEET TO FORM NEAT LINES. CONCRETE BELOW 6 LINES MAY BE CAST AGAINST THE EARTH.
7. THE CONCRETE SHALL GAIN 80% OF THE DESIGN STRENGTH PRIOR TO INSTALLING THE TRAFFIC SIGNAL MASTARM.
8. ALL FOUNDATIONS SHALL INCLUDE COPPER WELD GROUND RODS. ALL GROUND RODS SHALL BE 3/4" DIA X 10'-0" AND WILL BE CONSIDERED INCIDENTAL TO THE FOUNDATIONS BID ITEMS.
9. ALL FOUNDATIONS SHALL BE STAMPED EITHER "A" OR "B" TO SHOW TYPE CONSTRUCTED (SEE STAMP DETAIL).

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702.

Engineer's Seal & Signature

RONALD R. BOHANNAN NEW MEXICO 7868 REGISTERED PROFESSIONAL ENGINEER

3/27/15

RECORD DRAWING

RECORD DRAWING

AS BUILT INFORMATION
CONTRACTOR R.C. Construction
WORK STAKED BY Terra Land DATE 2015
INSPECTOR'S ACCEPTANCE BY Chris Medina DATE 2015
FIELD VERIFICATION BY Chris Medina DATE 2015
AS-BUILTS CORRECTED BY Terra West DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES
NO. BY DATE

ENGINEER'S SEAL
RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY

REVISIONS

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DESIGNED BY JN DATE Feb. 2015
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PUBLIC WORKS DEPARTMENT
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UNSER BLVD AND LADERA DR

FOUNDATION DETAILS, TYPE II AND TYPE III STANDARD

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVE APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVE JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	17 of 22

FUNCTION CHART – 115 VOLT CIRCUIT 1/

CONDUCTOR			RING 1 – MULTI CONDUCTOR CABLE 20		RING 2 – MULTI CONDUCTOR CABLE 20 2/	
CONDUCTOR NUMBER	BASE COLOR	TRACER	FUNCTION	FIELD CONNECTION	FUNCTION	FIELD CONNECTION
1	BLACK	–	SPARE	SPARE	SPARE	SPARE
2	WHITE	–	SPARE	SPARE	SPARE	SPARE
3	RED	–	PHASE 1 RED	RED LEFT TURN ARROW –	PHASE 5 RED	**RED LT & RT TURN ARROW 3D,3E**
4	GREEN	–	PHASE 1 GREEN	GREEN LEFT TURN ARROW 3B,3C	PHASE 5 GREEN	**GREEN LT & RT TURN ARROW 1B,1C,3D,3E**
5	ORANGE	–	PHASE 1 YELLOW	YELLOW LEFT TURN ARROW 3B,3C	PHASE 5 YELLOW	**YELLOW LT & RT TURN ARROW 1B,1C,3D,3E**
6	BLUE	–	SPARE	SPARE	SPARE	SPARE
7	WHITE	BLACK	SPARE	SPARE	SPARE	SPARE
8	RED	BLACK	PHASE 2 RED	RED BALL 1M1,1M2,1M3,1A,1B,1C	PHASE 6 RED	RED BALL 3M1,3M2,3M3,3A,3B,3C
9	GREEN	BLACK	PHASE 2 GREEN	GREEN BALL 1M1,1M2,1M3,1A,1B,1C	PHASE 6 GREEN	GREEN BALL 3M1,3M2,3M3,3A,3B,3C
10	ORANGE	BLACK	PHASE 2 YELLOW	YELLOW BALL 1M1,1M2,1M3,1A,1B,1C	PHASE 6 YELLOW	YELLOW BALL 3M1,3M2,3M3,3A,3B,3C
11	BLUE	BLACK	PHASE 2 WALK	PEDESTRIAN WALK P2A,P2B, **P9B**	PHASE 6 WALK	PEDESTRIAN WALK P6A,P6B, **P9A**
12	BLACK	WHITE	PHASE 2 DON'T WALK	PEDESTRIAN DON'T WALK P2A,P2B, **P9B**	PHASE 6 DON'T WALK	PEDESTRIAN DON'T WALK P6A,P6B, **P9A**
13	RED	WHITE	PHASE 3 RED	RED LEFT TURN ARROW 4B,4C	PHASE 7 RED	RED LEFT TURN ARROW 2B,2C
14	GREEN	WHITE	PHASE 3 GREEN	GREE LEFT TURN ARROW 4B,4C	PHASE 7 GREEN	GREEN LEFT TURN ARROW 2B,2C
15	BLUE	WHITE	PHASE 3 YELLOW	YELLOW LEFT TURN ARROW 4B,4C	PHASE 7 YELLOW	YELLOW LEFT TURN ARROW 2B,2C
16	BLACK	RED	PHASE 4 RED	RED BALL 2M1,2M2,2A. 3D, 3E	PHASE 8 RED	RED BALL 4M1,4A , 3D, 3E
17	WHITE	RED	PHASE 4 GREEN	GREEN BALL 2M1,2M2,2A. 3D, 3E	PHASE 8 GREEN	GREEN BALL 4M1,4A , 3D, 3E
18	ORANGE	RED	PHASE 4 YELLOW	YELLOW BALL 2M1,2M2,2A. 3D, 3E	PHASE 8 YELLOW	YELLOW BALL 4M1,4A , 3D, 3E
19	BLUE	RED	PHASE 4 WALK	PEDESTRIAN WALK P4A,P4B	PHASE 8 WALK	PEDESTRIAN WALK P8A,P8B
20	RED	GREEN	PHASE 4 DON'T WALK	PEDESTRIAN DON'T WALK P4A,P4B	PHASE 8 DON'T WALK	PEDESTRIAN DON'T WALK P8A,P8B

DETECTOR LOOPS

LOOP ID	VEHICLE DETECTOR				LOOP TYPE	LOOP DIMENSIONS				LOOP WIRE	PAVEMENT SAWCUT
	MODE	CALL	UNIT NO	CHANNEL		L	W	S	T		
DL3 (1)	PRESENCE		FIVE	CH 1	QP	50'	6'	13'	5'	465	125
DL3 (2)	PRESENCE		TEN	CH 1	QP	50'	6'	20'	5'	479	132
DL4 (1)	PRESENCE		SIX	CH 1	QP	50'	6'	27'	5'	493	139
DL4 (2)	PRESENCE		SIX	CH 2	QP	50'	6'	16'	5'	471	128
DL4 (3)	PRESENCE		SIX	CH 2	QP	50'	6'	5'	5'	449	117
DL7 (1)	PRESENCE		FIVE	CH 2	QP	50'	6'	15'	5'	469	127
DL7 (2)	PRESENCE		TEN	CH 2	QP	50'	6'	21'	5'	481	133
DL8 (1)	PRESENCE		SEVEN	CH 1	QP	50'	6'	15'	5'	469	127
DL8 (2)	PRESENCE		SEVEN	CH 2	QP	50'	6'	5'	5'	449	117
DL5 (1)	**PRESENCE**		**FIVE**	**CH 2**	**QP**	**50'**	**6'**	**15'**	**5'**	**469**	**127**
DL5 (2)	**PRESENCE**		**FIVE**	**CH 2**	**QP**	**50'**	**6'**	**5'**	**5'**	**449**	**117**
TOTAL									**55**	**5143**	**1389**

FUNCTION CHART – 24 VOLT CIRCUIT 3/

MULTI CONDUCTOR CABLE 5			
CONDUCTOR NUMBER	BASE COLOR	FUNCTION	FIELD CONNECTION
1	BLACK	PHASE 2 PPB	PPB2A,PPB2B
2	WHITE	COMMON	PP2A,2B,4A,4B,6A,6B,8A,8B
3	RED	PHASE 4 PPB	PPB4A,PPB4B
4	GREEN	PHASE 6 PPB	PPB6A,PPB6B
5	ORANGE	PHASE 8 PPB	PPB8A,PPB8B

DETECTOR RACK ASSIGNMENTS

UNIT NUMBER →	POWER SUPPLY	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
CHANNEL 1 →		ø1	ø2	ø6	ø2 EC	ø3	ø4	ø8	ø4 EC	DUAL LEFT ø1	DUAL LEFT ø3	SD 1	SD 3	SD 5	SD 7	SD 9	PED ISOLATION	OPTICOM 1	OPTICOM 3
CHANNEL 2 →		ø5	ø2	ø6	ø6 EC	ø7	ø4	ø8	ø8 EC	DUAL LEFT ø5	DUAL LEFT ø7	SD 2	SD 4	SD 6	SD 8	SD 10		OPTICOM 2	OPTICOM 4
DETECTOR MODULE REQUIRED →	*					✓	✓	✓									✓	✓	✓

* INCIDENTAL TO CONSTRUCTION

QUANTITY ESTIMATING ASSUMPTIONS:

LOOP WIRE

6' X 30' QP LOOP =(8*L) + (4*W) + (2*S) + (2*T) + 5 = 269 + 2(S+T)
6' X 40' QP LOOP =(8*L) + (4*W) + (2*S) + (2*T) + 5 = 349 + 2(S+T)
6' X 50' QP LOOP =(8*L) + (4*W) + (2*S) + (2*T) + 5 = 429 + 2(S+T)
6' X 6' EC LOOP =(6*L) + (6*W) + (2*S) + (2*T) + 5 = 77 + 2(S+T)
6' X 6' SYS LOOP =(8*L) + (8*W) + (2*S) + (2*T) + 5 = 96 + 2(S+T)

PAVEMENT SAW CUT

6' X 30' QP LOOP =(3*L) + (2*W) + S =102 + S
6' X 40' QP LOOP =(3*L) + (2*W) + S =132 + S
6' X 50' QP LOOP =(3*L) + (2*W) + S =162 + S
6' X 6' EC LOOP =(2*L) + (2*W) + S = 24 + S
6' X 6 SYS LOOP =(2*L) + (2*W) + S = 24 + S

WHERE:

L = DETECTOR LOOP LENGTH (FROM PLAN)
W = DETECTOR LOOP WIDTH (FROM PLAN)
S = SAWCUT LENGTH FROM DETECTOR LOOP TO FACE OF CURB (FROM PLAN)
T = LOOP WIRE TERMINAL LENGTH FROM FACE OF CURB TO PULL BOX (FROM PLAN)

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature

RONALD R. BOHANNAN NEW MEXICO 15702 REGISTERED PROFESSIONAL ENGINEER

NOTES:

1/ IDENTIFY CONDUCTORS LISTED AS "115 VOLTS"

2/ WRAP RING 2 CABLE AT EACH SPLICE POINT WITH COLORED ELECTRICAL TAPE. THE IDENTIFICATION MARKING SHALL BE PROVIDED ON EACH RING 2 CABLE AT EACH SPLICE BOX AND LOCATED 6" BACK FROM THE END.

3/ IDENTIFY CONDUCTORS LISTED AS "PPB – LOW VOLTAGE" AT EACH SPLICE POINT. FIVE (5) CONDUCTOR CABLE SHALL BE 24 VOLTS AND USED FOR PUSH BUTTONS ONLY.

RECORD DRAWING

RECORD DRAWING

ABBREVIATIONS

DL – DETECTOR LOOP
EC – EXTENDED CALL LOOP
L – DETECTOR LOOP LENGTH
W – DETECTOR LOOP WIDTH
S – SAW CUT LOOP TO CURB
T – TERMINAL LENGTH
QP – QUADRAPOLE LOOP
SDWBA – SYSTEM DETECTOR WEST BOUND APPROACH
SDWBD – SYSTEM DETECTOR WEST BOUND DEPARTURE
SDEBA – SYSTEM DETECTOR EAST BOUND APPROACH
SDEBD – SYSTEM DETECTOR EAST BOUND DEPARTURE
SDNBA – SYSTEM DETECTOR NORTH BOUND APPROACH
SDNBD – SYSTEM DETECTOR NORTH BOUND DEPARTURE
SDSBA – SYSTEM DETECTOR SOUTH BOUND APPROACH
SDSBD – SYSTEM DETECTOR SOUTH BOUND DEPARTURE

AS BUILT INFORMATION
CONTRACTOR P&D Construction
WORK STAKED BY Tierra Land DATE 2015
INSPECTOR'S ACCEPTANCE BY Tierra West DATE 2015
FIELD VERIFICATION BY Tierra West DATE 2015
DRAWINGS CORRECTED BY Tierra West DATE 2016
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

SURVEY INFORMATION
FIELD NOTES
NO. BY DATE

ENGINEER'S SEAL
RONALD R. BOHANNAN NEW MEXICO 15702 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY

REVISIONS

DESIGN
DESIGNED BY JN DATE Feb, 2015
DRAWN BY pm DATE Feb, 2015
DRAWING NAME 2014038–Signal.dwg JOB NO 2014038
CHECKED BY RRB DATE Feb, 2015

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CITY OF ALBUQUERQUE
PUBLIC WORKS DEPARTMENT
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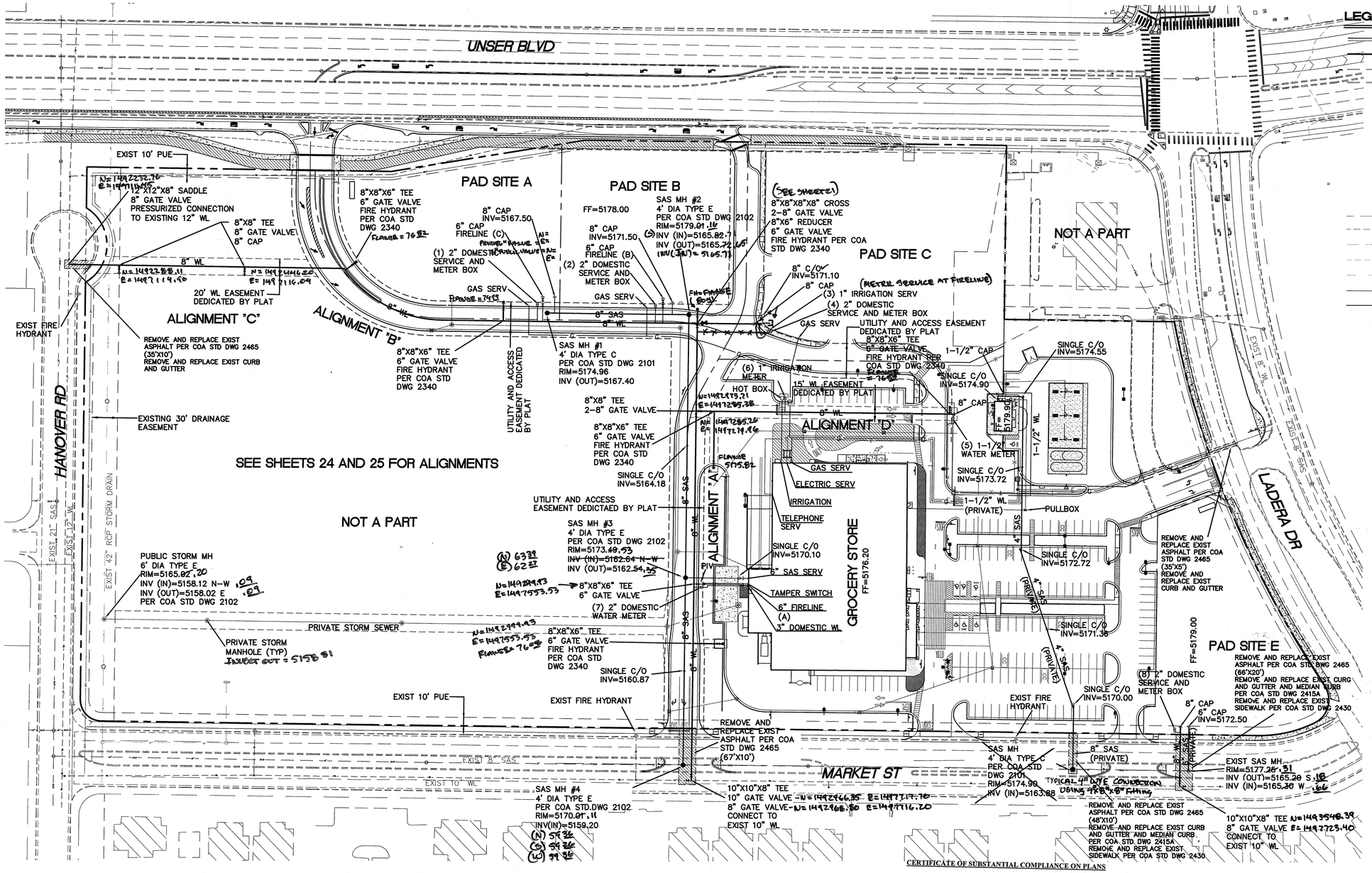
UNSER BLVD AND LADERA DR

FUNCTION AND DETECTORS AND DETECTOR TABLES

DESIGN REVIEW COMMITTEE: APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE
CITY ENGINEER APPROVAL: APPROVED MAY 20 2015 CITY ENGINEER
LAST DESIGN UPDATE | MO./DAY/YR. | MO./DAY/YR.

CITY PROJECT NO. 529882 | ZONE MAP NO. H–9–Z | SHEET # 18 of 22



LEGEND

- CURB & GUTTER
- BOUNDARY LINE
- EASEMENT
- EXISTING CURB & GUTTER
- SINGLE CLEAN OUT
- DOUBLE CLEAN OUT
- EXISTING SD MANHOLE
- EXISTING SAS MANHOLE
- EXISTING FIRE HYDRANT
- EXISTING WATER METER
- EXISTING POWER POLE
- EXISTING GAS VALVE
- EXISTING OVERHEAD UTILITIES
- EXISTING GAS
- EXISTING SANITARY SEWER LINE
- EXISTING WATER LINE
- EXISTING STORM SEWER LINE
- PROPOSED POWER LINE
- PROPOSED GAS LINE
- TRANSFORMER
- PULL BOX

NOTES

1. BACKFLOW PREVENTER FOR FIRE SPRINKLER AND DOMESTIC SERVICE TO BE LOCATED INSIDE BUILDING.
2. ALL METER BOXES PER COA STD DWG 2361, 2366, 2367
3. MARKET STREET DESIGNATION – MAJOR LOCAL STREET

WATER METER AND FIRELINE SUMMARY FOR COMMERCIAL DEVELOPMENT			
WATER METER			
NUMBER	SIZE	LOCATION	USE
1	2"	13+32.5 2.0 LT	DOMESTIC
2	2"	15+12.3 18.1 LT	DOMESTIC
3	1"	16+48.3 23.6 LT	IRRIGATION
4	2"	16+51.5 23.6 LT	DOMESTIC
5	2"	13+13.7 5.5 LT	DOMESTIC
6	1"	11+15.1 16.2 LT	IRRIGATION
7	2"	13+30.4 18.1 LT	DOMESTIC
8	1-1/2"	17+37.8 48.6 LT	DOMESTIC
FIRELINE			
NUMBER	SIZE	LOCATION	
A	6"	13+26.6 10.0 LT	
B	6"	15+21.1 2.0 RT	
C	6"	13+78.8 2.0 RT	

SEE SHEETS 20 AND 21 FOR ALIGNMENTS

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

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Engineer's Seal
Or Signature

CAUTION

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RECORD DRAWING

GRAPHIC SCALE
60 0 30 60
(IN FEET)
1 inch = 60 ft.

AS BUILT INFORMATION
CONTRACTOR Rodgers Plumbing
WORK STAKED BY Terra Land Surveys
INSPECTOR'S ACCEPTANCE BY Ashwin Lodh
FIELD VERIFICATION BY Tonic/Terra Land
DRAWINGS CORRECTED BY Twill
MICRO-FILM INFORMATION
RECORDED BY
DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES
(CENTRAL ZONE – NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION
FIELD NOTES
NO. BY DATE

ENGINEER'S SEAL
RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN
DESIGNED BY JH DATE Feb. 2015
DRAWN BY pm DATE Feb. 2015
DRAWING NAME 20140038-MU JOB NO. 2014038
CHECKED BY RRB DATE Feb. 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

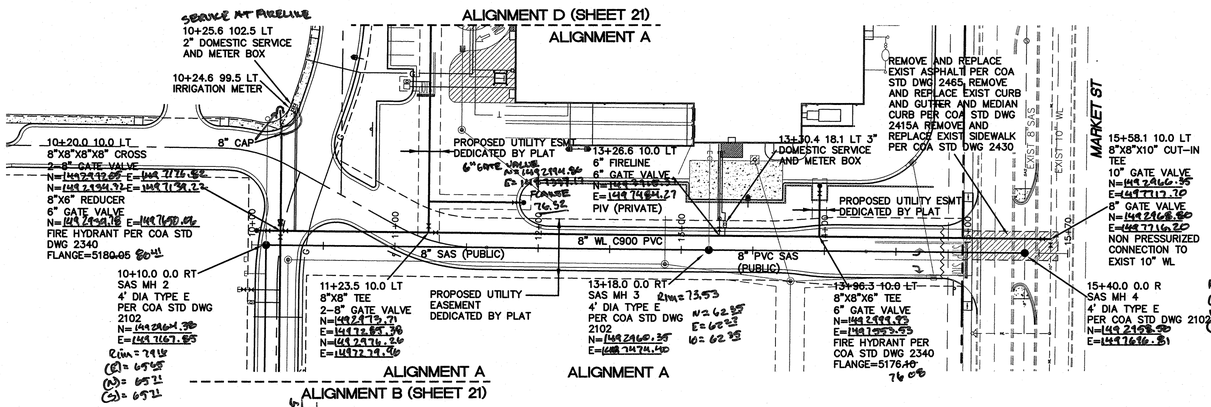
CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

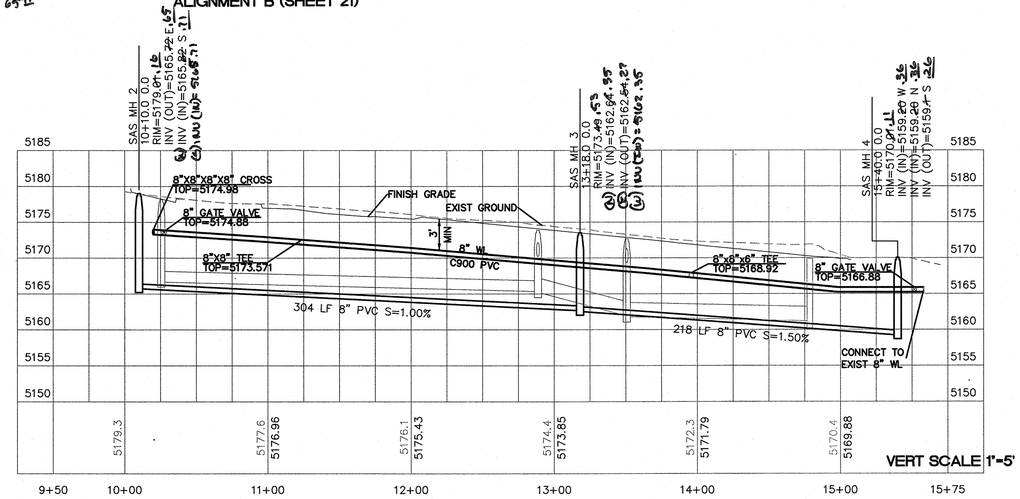
HERITAGE MARKET PLACE

MASTER UTILITY AND PUBLIC MANHOLE PLAN

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVE APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED 4-30-2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	19 of 22





LEGEND

- CURB & GUTTER
- BOUNDARY LINE
- EASEMENT
- EXISTING CURB & GUTTER
- SINGLE CLEAN OUT
- DOUBLE CLEAN OUT
- EXISTING SD MANHOLE
- EXISTING SAS MANHOLE
- EXISTING FIRE HYDRANT
- EXISTING WATER METER
- EXISTING POWER POLE
- EXISTING GAS VALVE
- U — EXISTING OVERHEAD UTILITIES
- G — EXISTING GAS
- EX. 8" SAS — EXISTING SANITARY SEWER LINE
- EX. WL — EXISTING WATER LINE
- EX. RCP — EXISTING STORM SEWER LINE

NOTES

1. SANITARY SEWER SERVICE CONNECTION PER COA STD DWG 2125.
2. ALL FIRE HYDRANTS ARE TO BE BUILT WITH MECH RESTRAINTS PER COA STANDARDS.
3. ALL EXISTING UTILITY CONNECTION LOCATIONS AND INVERTS MUST BE FIELD VERIFIED PRIOR TO AND CONSTRUCTION OF UTILITIES.
4. ALL EXCAVATION, TRENCHING AND SHORING ACTIVITIES MUST BE CARRIED-OUT IN ACCORDANCE WITH OSHA 29 CFR 1926.650 SUBPART P.
5. ALL WATERLINES ARE C900 PVC (DR18) UNLESS OTHERWISE NOTED ON PLAN ELEVATION.
6. ALL SANITARY SEWER LINES ARE TO BE SDR35 UNLESS OTHERWISE NOTED ON PLAN ELEVATION.
7. BASIS OF ALIGNMENT: CL SAS LINE
8. ALL METER BOXES PER COA STD DWG 2361, 2366 AND 2367

CERTIFICATE OF SUBSTANTIAL COMPLIANCE ON PLANS

I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal
& Signature

RECORD DRAWING

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GRAPHIC SCALE
50 0 25 50
(IN FEET)
1 inch = 50 ft.

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CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

HERITAGE MARKET PLACE

SANITARY SEWER AND WATER LINE PLAN AND PROFILE

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APR 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	20 of 22

AS BUILT INFORMATION
CONTRACTOR Rodgers Plumbing
WORK STAKED BY Terra Land Surveys LLC
DRAWINGS CORRECTED BY Rodgers Plumbing 2015
ACCEPTANCE BY Albuquerque
CERTIFICATION BY Terra Land Surveys 2015
DRAWINGS CORRECTED BY Terra 2015
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS
ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES (CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
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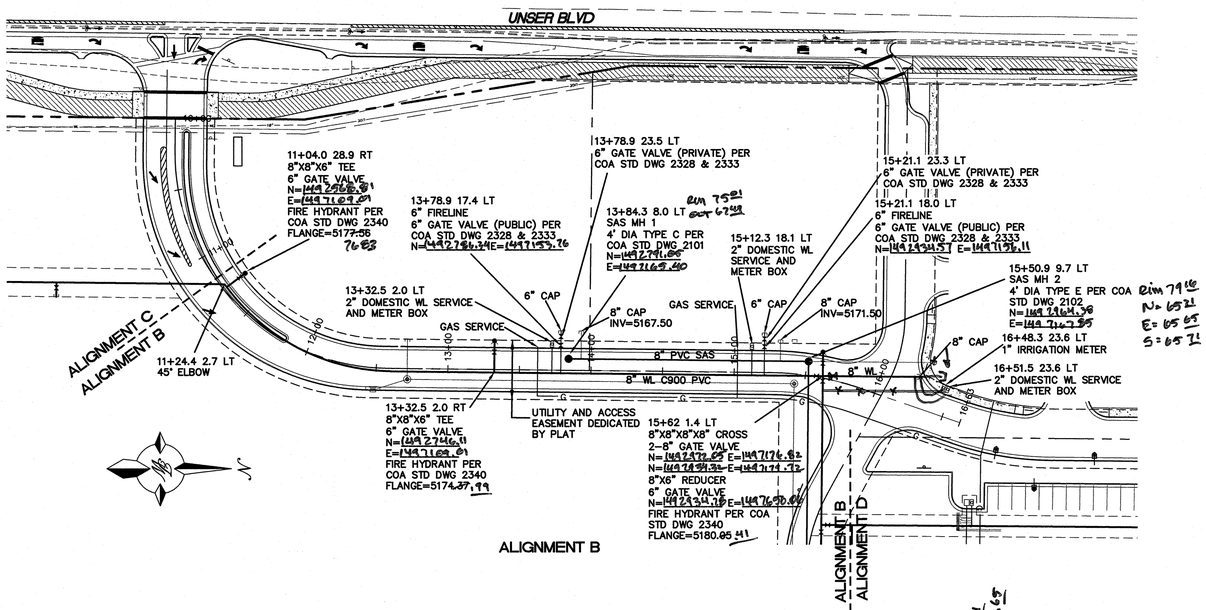
ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

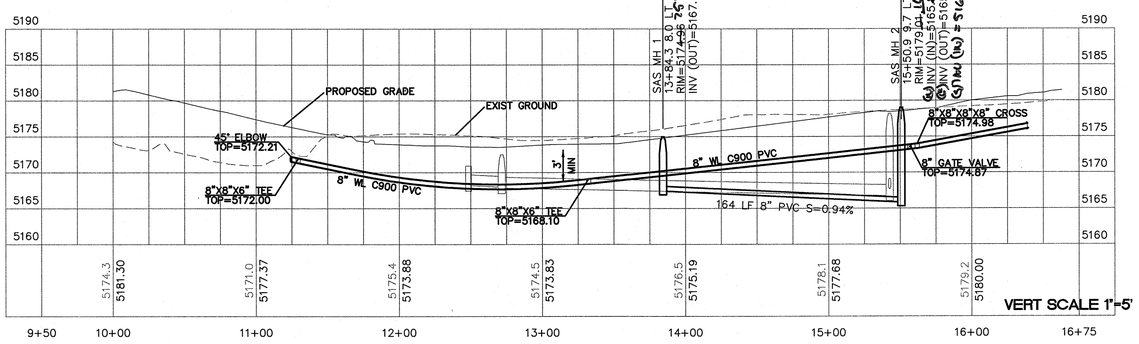
SURVEY INFORMATION
FIELD NOTES
NO. | BY | DATE

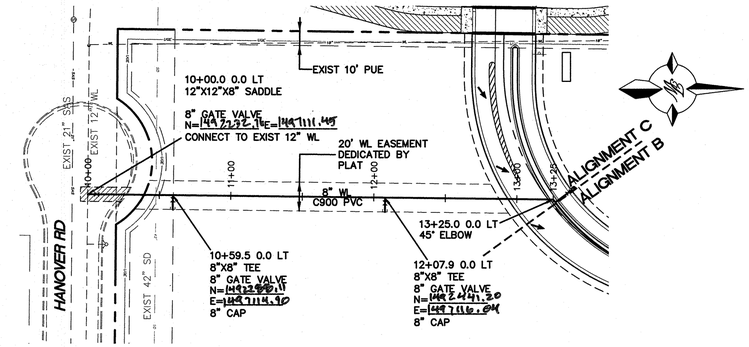
ENGINEER'S SEAL
RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

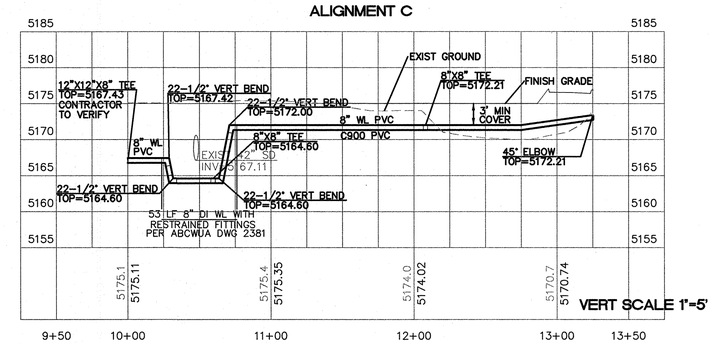
NO.	DATE	REMARKS	BY
		REVISIONS	

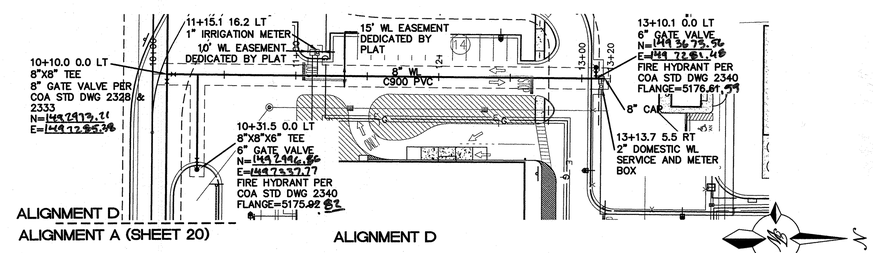
DESIGN
DESIGNED BY JH DATE Feb, 2015
DRAWN BY pm DATE Feb, 2015
DRAWING NAME 2014038-MU JOB NO. 2014038
CHECKED BY RRB DATE Feb, 2015

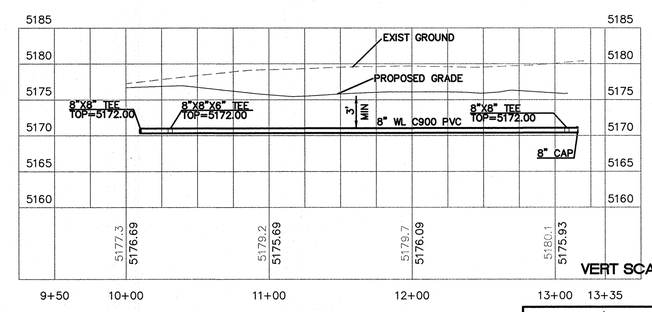












LEGEND

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- EXISTING OVERHEAD UTILITIES
- EXISTING GAS
- EXISTING SANITARY SEWER LINE
- EXISTING WATER LINE
- EXISTING STORM SEWER LINE

NOTES

1. SANITARY SEWER SERVICE CONNECTION PER COA STD DWG 2125.
2. ALL FIRE HYDRANTS ARE TO BE BUILT WITH MECH RESTRAINTS PER COA STANDARDS.
3. ALL EXISTING UTILITY CONNECTION LOCATIONS AND INVERTS MUST BE FIELD VERIFIED PRIOR TO AND CONSTRUCTION OF UTILITIES.
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I, Ronald R. Bohannan, of the firm of Tierra West LLC, a Registered Professional Engineer in the State of New Mexico, do hereby certify, to the best of my knowledge and belief, that the infrastructure installed as part of this project has been inspected by me or by a qualified person under my direct supervision and has been constructed in accordance with the plans and specifications approved by the City Engineer and that the original design intent of the approved plans has been met, except as noted by me on the as-built construction drawings. This Certification is based on site inspections by me, or personnel under my direction with survey information provided by Chris Medina, of Terra Land Surveys, Inc , NMPS number 15702 .

Engineer's Seal & Signature
RONALD R. BOHANNAN NEW MEXICO 7888 PROFESSIONAL ENGINEER

RECORD DRAWING

GRAPHIC SCALE
50 0 25 50
(IN FEET)
1 inch = 50 ft.

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AS BUILT INFORMATION

CONTRACTOR	Rockies Plumbing
WORK STAKED BY	Texas Land Surveyor 2015
INSPECTOR'S ACCEPTANCE BY	Arlington Jones 2015
FIELD VERIFICATION BY	Texas Land 2015
DRAWINGS CORRECTED BY	Texas 2015
MICRO-FILM INFORMATION	
RECORDED BY	DATE
NO.	

BENCH MARKS

ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES
(CENTRAL ZONE - NAD 83)
NORTH=1,493,985.681
EAST=1,497,135.488
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GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION

FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

RONALD R. BOHANNAN NEW MEXICO 7888 PROFESSIONAL ENGINEER

NO.	DATE	REMARKS	BY
		REVISIONS	

DESIGN

DESIGNED BY JH	DATE Feb, 2015
DRAWN BY pm	DATE Feb, 2015
DRAWING NAME 2014038-MU	JOB NO. 2014038
CHECKED BY RRB	DATE Feb, 2015

TIERRA WEST, LLC
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ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
www.tierrawestllc.com

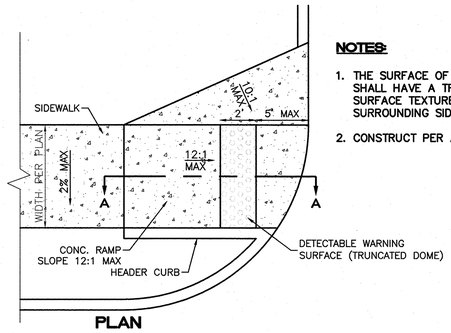
CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

HERITAGE MARKET PLACE

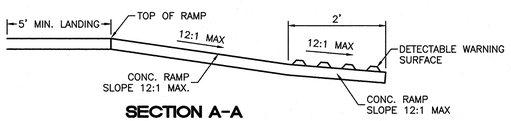
SANITARY SEWER AND WATER LINE PLAN AND PROFILE

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
529882	H-9-Z	21 of 22



PLAN



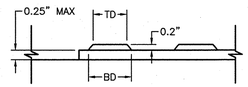
SECTION A-A

(5) UNIDIRECTIONAL HC RAMP

NOT TO SCALE

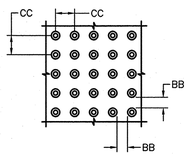
NOTES:

1. THE SURFACE OF RAMP AND SIDES SHALL HAVE A TRANSVERSE BROOMED SURFACE TEXTURE ROUGHER THAN THE SURROUNDING SIDEWALK.
2. CONSTRUCT PER A.D.A. STANDARDS.



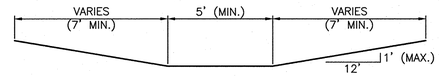
DOME SECTION

BD – BASE DIAMETER 0.9" MIN
TD – TOP DIAMETER 50% OF BD MIN TO 65% OF BD MAX



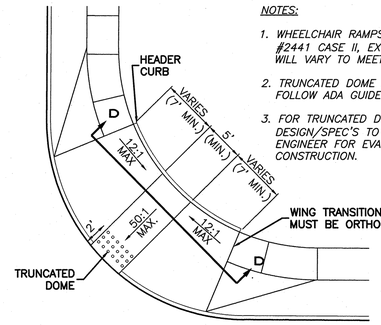
(6) DOME SPACING

CC – CENTER TO CENTER SPACING 2.35"
BB – BASE TO BASE SPACING 1.48" MIN



SECTION D-D

NTS

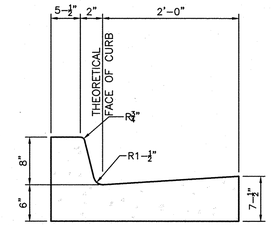


NOTES:

1. *WHEELCHAIR RAMPS ARE AS COA STD DWG #2441 CASE II, EXCEPT THE RAMP WIDTH WILL VARY TO MEET A 12:1 MAX. SLOPE.*
2. *TRUNCATED DOME DESIGN NEEDS TO FOLLOW ADA GUIDELINES.*
3. *FOR TRUNCATED DOMES, SUBMIT DESIGN/SPEC'S TO CITY CONSTRUCTION ENGINEER FOR EVALUATION PRIOR TO CONSTRUCTION.*

WHEELCHAIR RAMP DETAIL (TYP.)

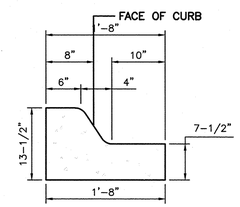
NTS



CURB GENERAL NOTES:
1. ALL CURBS TO BE CONSTRUCTED OF PORTLAND CEMENT CONCRETE, PER COA SPECIFICATIONS.
2. PROVIDE CONTRACTION JTS. 12' MAX., SPACING, 1/2" EXP. JTS. AT CURB RETURNS AND AT A MAX. SPACING OF 120' BETWEEN CURB RETURNS AND EACH SIDE OF SEPARATELY CONSTRUCTED DRIVEWAYS. CONTRACTION JTS., SHALL BE EITHER SAWED OR TOOLED A MINIMUM OF 1" DEEP AT FINISHED FACES.
3. ALL EDGES SHALL BE EDGED WITH A 3/8" RADUIS EDGING TOOL.
4. 1/4" ISOLATION JOINT SHALL BE PLACED BETWEEN SIDEWALK AND CURB WHEN CAST ADJACENT TO EACH OTHER.

8" STANDARD CURB / GUTTER

NTS



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2. PROVIDE CONTRACTION JTS. 12' MAX., SPACING, 1/2" EXP. JTS. AT CURB RETURNS AND AT A MAX. SPACING OF 120' BETWEEN CURB RETURNS AND EACH SIDE OF SEPARATELY CONSTRUCTED DRIVEWAYS. CONTRACTION JTS., SHALL BE EITHER SAWED OR TOOLED A MINIMUM OF 1" DEEP AT FINISHED FACES.
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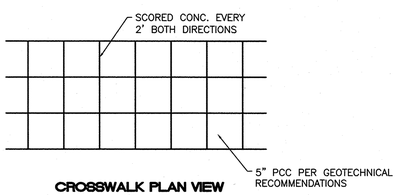
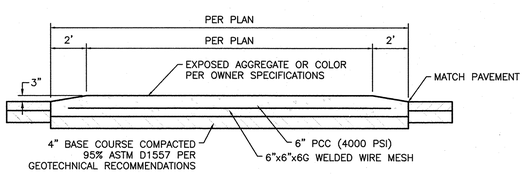
MOUNTABLE MEDIAN CURB / GUTTER

NTS



CROSSWALK PLAN VIEW



RAISED CROSSWALK

NTS

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Engineer's Seal & Signature

7868

RECORD DRAWING

GRAPHIC SCALE

50 0 25 50

(IN FEET)
1 inch = 50 ft.

AS BUILT INFORMATION

CONTRACTOR R.O. CONSTRUCTION
WORK STAKED BY TERRA LAND SURVEYS
INSPECTOR'S ACCEPTANCE BY CONTINUE
FIELD VERIFICATION BY CONTINUE
DRAWINGS CORRECTED BY TWC
MICRO-FILM INFORMATION
RECORDED BY DATE
NO.

BENCH MARKS

ALBUQUERQUE CONTROL SURVEY MONUMENT "3-H10"
NEW MEXICO STATE PLANE COORDINATES (CENTRAL ZONE – NAD 83)
NORTH=1,493,985.681
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ELEVATION=5196.151 FEET (NAVD 1988)
DELTA ALPHA=-00°16'31.81"
GROUND TO GRID FACTOR=0.999678906

SURVEY INFORMATION

FIELD NOTES

NO.	BY	DATE

ENGINEER'S SEAL

RONALD R. BOHANNAN NEW MEXICO 7868 PROFESSIONAL ENGINEER

REVISIONS

NO.	DATE	REMARKS	BY

DESIGN

DESIGNED BY JH	DATE Feb, 2015
DRAWN BY pm	DATE Feb, 2015
DRAWING NAME 20140038-DETAILS	JOB NO. 20140038
CHECKED BY RRB	DATE Feb, 2015

TIERRA WEST, LLC
5571 MIDWAY PARK PLACE NE
ALBUQUERQUE, NEW MEXICO 87109
(505) 858-3100
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CITY OF ALBUQUERQUE
PUBLIC WORKS DIVISION
ENGINEERING GROUP

LADERA DRIVE AND MARKET STREET

CONSTRUCTION DETAILS

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	LAST DESIGN UPDATE	MO./DAY/YR.	MO./DAY/YR.
APPROVED APR 27 2015 DESIGN REVIEW COMMITTEE	APPROVED JUL 30 2015 CITY ENGINEER			

CITY PROJECT NO.	ZONE MAP NO.	SHEET #
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