

CITY OF ALBUQUERQUE

Planning Department
David Campbell, Director



Mayor Timothy M. Keller

October 25, 2018

Genny Donart, P.E.
Isaacson & Arfman, P.A.
128 Monroe St. N.E
Albuquerque, NM, 87108

RE: Broadstone Northpoint Townhomes
9100 San Mateo Blvd NE
Engineer's Stamp Date: 09/16/16
Engineer's Certification Dated 10/18/18
Hydrology File: B18D001C
CPN #786480

Dear Ms. Donart:

Based on the information provided in your submittal received 10/22/18 and site visit on 10/24/18, the Engineer's Certification is **not** approved for ROFG/SIA for Hydrology. The following comments need to be addressed for approval of the above referenced project (please note that these were on the punch list after the walkthrough a few months back):

1. There are some several erosion problems along the channel which are undermining the concrete slabs. (See the photos below.)



PO Box 1293

Albuquerque

NM 87103

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2. The other issue as to due to with the low flows in the bottom are entering between the slabs and flowing underneath them and out falling right at the pipes. This is also undermining the concrete slabs. (See the photos below.)



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If you have any questions, please contact me at 924-3995 or rbrissette@cabq.gov.

Sincerely,

Renée C. Brissette

Renée C. Brissette, P.E. CFM
Senior Engineer, Hydrology
Planning Department



City of Albuquerque

Planning Department

Development & Building Services Division

DRAINAGE AND TRANSPORTATION INFORMATION SHEET (REV 6/2018)

Project Title: Broadstone Northpoint Apts **Building Permit #:** _____ **Hydrology File #:** B18D001C
DRB#: _____ **EPC#:** _____ **Work Order#:** 786480

Legal Description: A Portion of Tract 1, North I-25 Corporate Center

City Address: Northwest Corner of San Mateo & Modesto NE

Applicant: Isaacson & Arfman, PA **Contact:** Genny Donart

Address: 128 Monroe Street NE - Albuquerque, NM 87108

Phone#: (505) 268-8828 **Fax#:** _____ **E-mail:** gennyd@iacivil.com

Other Contact: ORB Architects **Contact:** _____

Address: _____

Phone#: _____ **Fax#:** _____ **E-mail:** _____

TYPE OF DEVELOPMENT: _____ PLAT _____ RESIDENCE _____ DRB SITE ☒ ADMIN SITE

Check all that Apply:

DEPARTMENT:

☒ HYDROLOGY/ DRAINAGE
☐ TRAFFIC/ TRANSPORTATION

TYPE OF SUBMITTAL:

☒ ENGINEER ARCHITECT CERTIFICATION
☐ PAD CERTIFICATION
☐ CONCEPTUAL G & D PLAN
☐ GRADING PLAN
☐ DRAINAGE REPORT
☐ DRAINAGE MASTER PLAN
☐ FLOODPLAIN DEVELOPMENT PERMIT APPLIC
☐ ELEVATION CERTIFICATE
☐ CLOMR/LOMR
☐ TRAFFIC CIRCULATION LAYOUT (TCL)
☐ TRAFFIC IMPACT STUDY (TIS)
☐ STREET LIGHT LAYOUT
☐ OTHER (SPECIFY) _____
☐ PRE-DESIGN MEETING?

TYPE OF APPROVAL/ACCEPTANCE SOUGHT:

☐ BUILDING PERMIT APPROVAL
☐ CERTIFICATE OF OCCUPANCY

☐ PRELIMINARY PLAT APPROVAL
☐ SITE PLAN FOR SUB'D APPROVAL
☐ SITE PLAN FOR BLDG. PERMIT APPROVAL
☐ FINAL PLAT APPROVAL

☒ SIA/ RELEASE OF FINANCIAL GUARANTEE
☐ FOUNDATION PERMIT APPROVAL
☐ GRADING PERMIT APPROVAL
☐ SO-19 APPROVAL
☐ PAVING PERMIT APPROVAL
☐ GRADING/ PAD CERTIFICATION
☐ WORK ORDER APPROVAL
☐ CLOMR/LOMR
☐ FLOODPLAIN DEVELOPMENT PERMIT
☐ OTHER (SPECIFY) _____

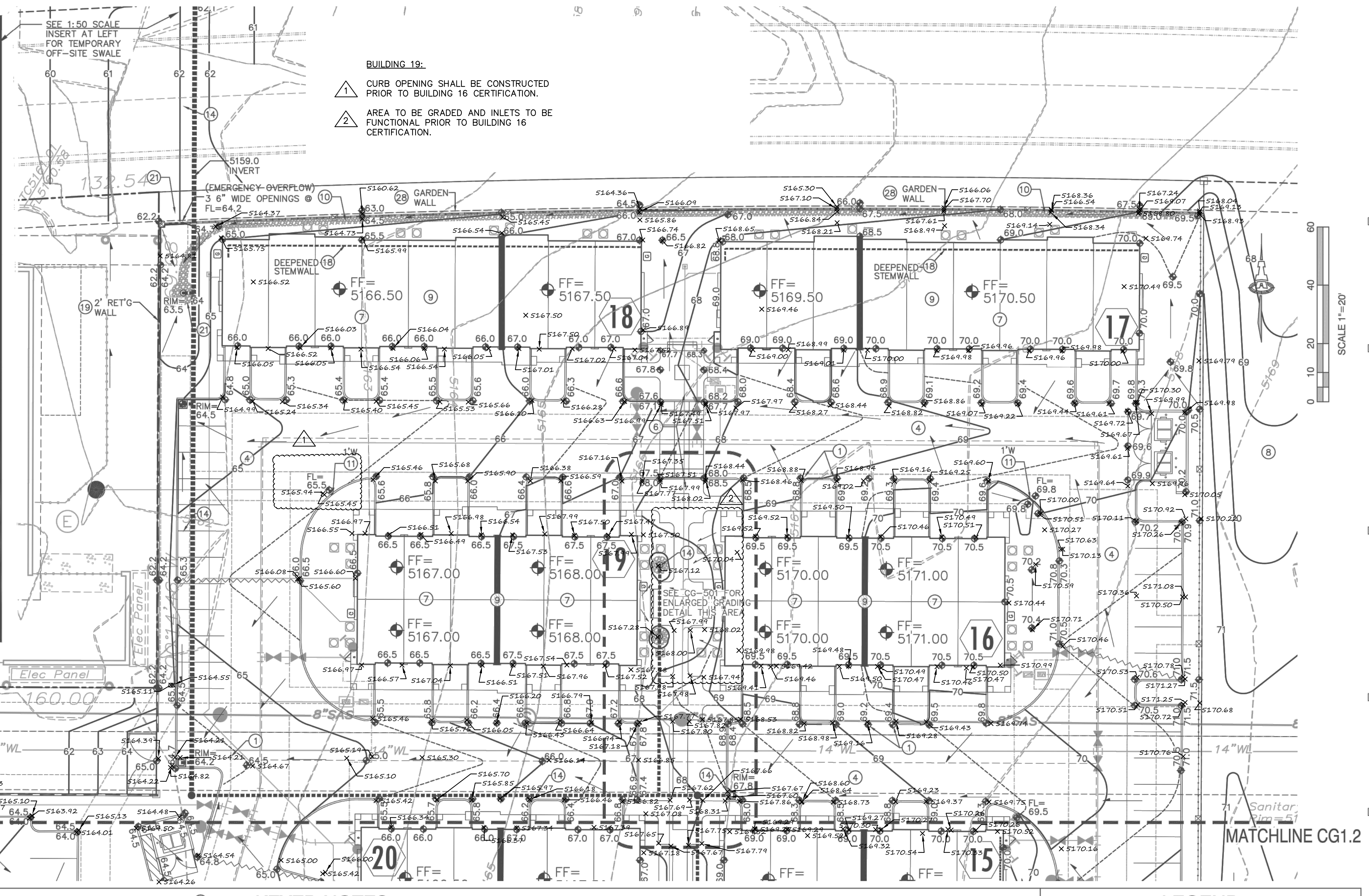
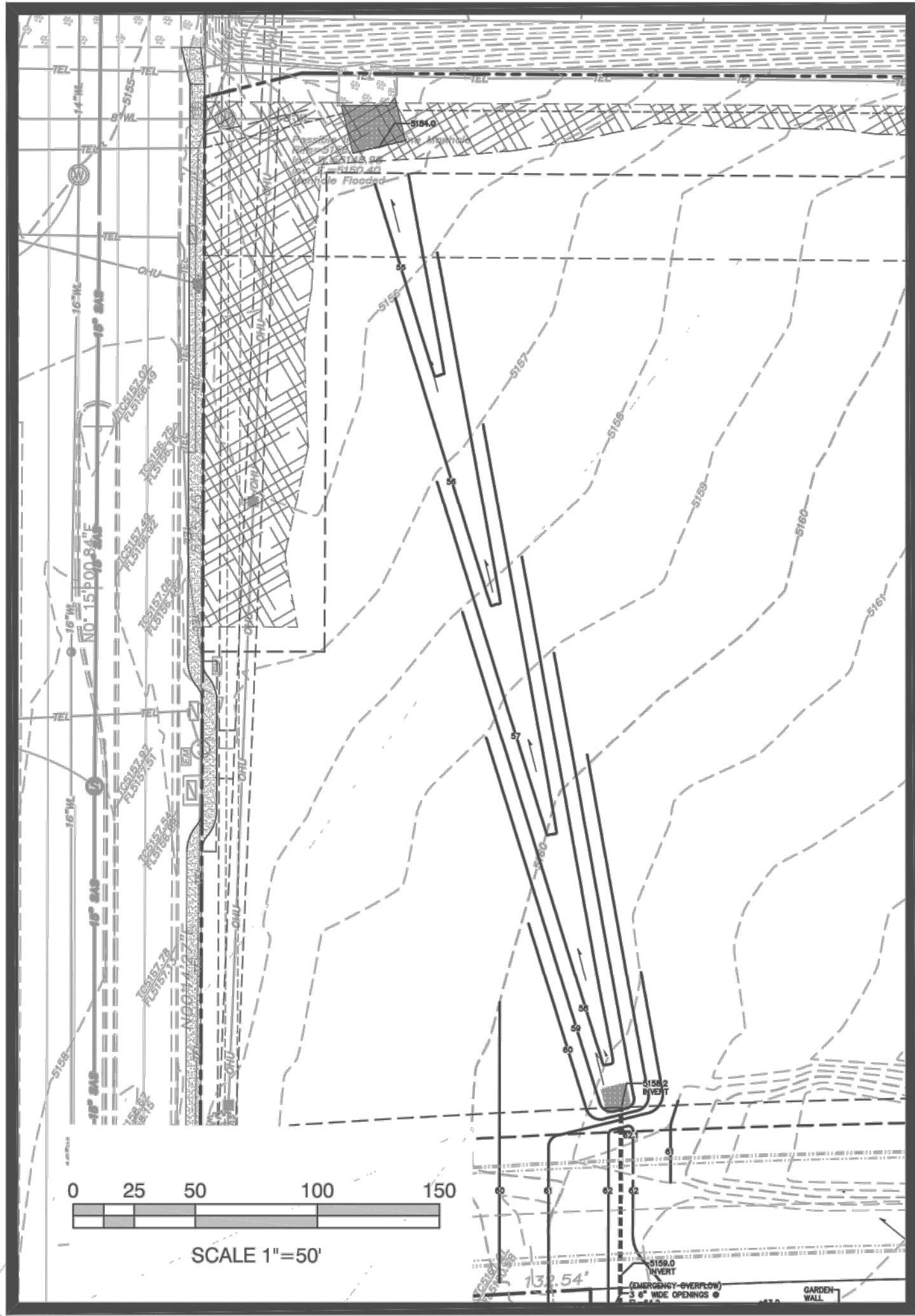
IS THIS A RESUBMITTAL?: ☐ Yes ☒ No

DATE SUBMITTED: October 18, 2018 **By:** Genny Donart

COA STAFF:

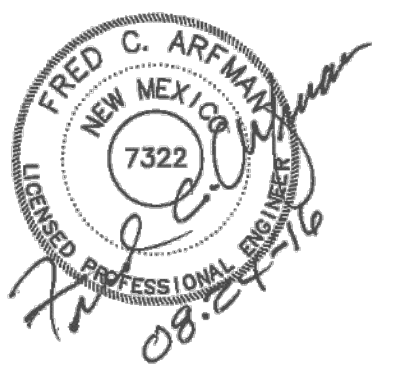
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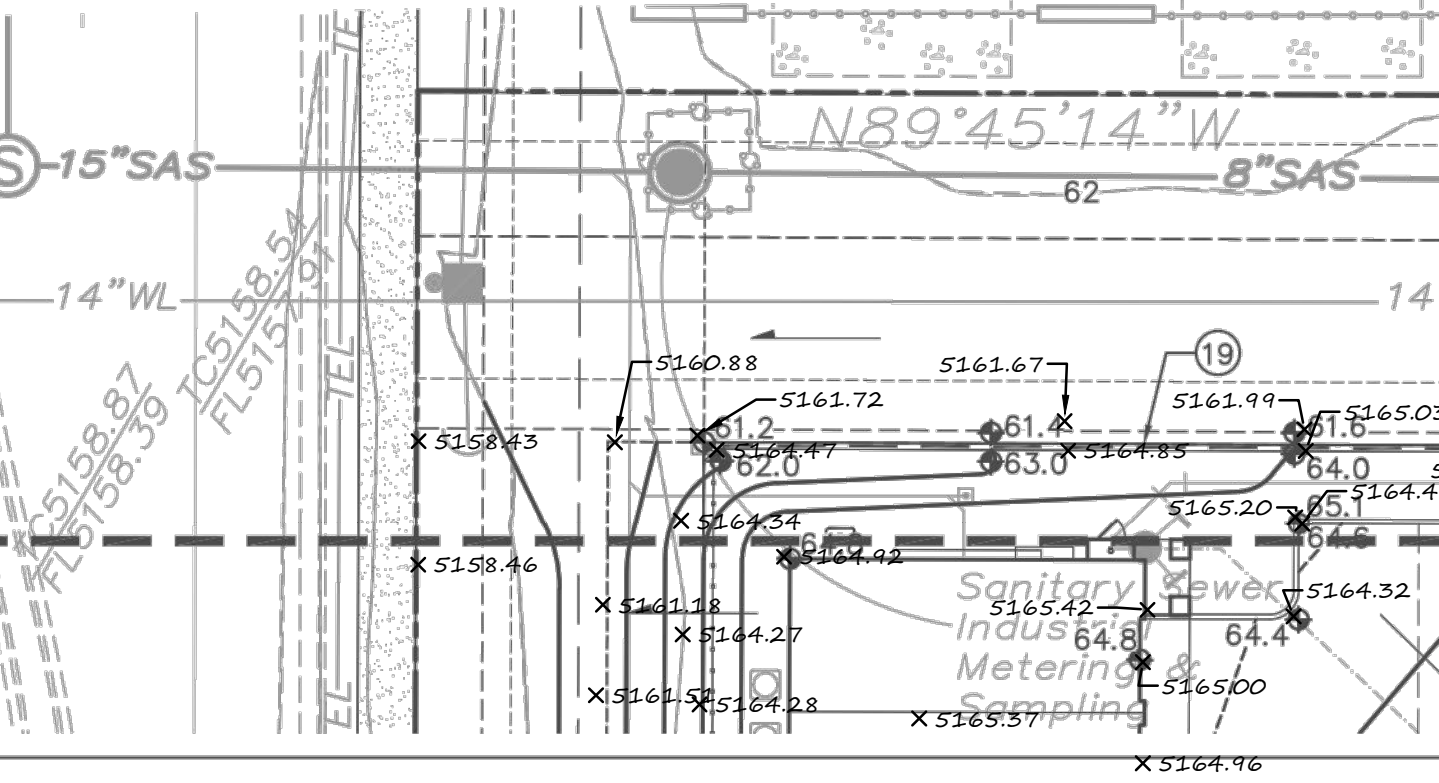


BROADSTONE NORTHPOINT
NWC SAN MATEO AND MODESTO NE
Albuquerque, New Mexico

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LOCATIONS (TYPICAL).

- PROVIDE 3' WIDE FRACTURED FACE ROCK SWALE AT GRADES SHOWN. SEE CG5.1 FOR ADDITIONAL INFORMATION.
- PROVIDE OPENING IN CURB TO PASS FLOW (SEE PLAN FOR BOTTOM WIDTH). INSTALL 3'X3' ROCK EROSION PROTECTION (DEPRESS TO PREVENT BLOCKING OF FLOW) WITHIN LANDSCAPE AREA. SEE DETAIL SHEET CG5.1.
- CONSTRUCT 18" WIDE (BOTTOM WIDTH) COVERED SIDEWALK CULVERT PER C.O.A. STD. DWG. 2236. SEE DETAIL SHEET CG5.1 FOR ADDITIONAL CONSTRUCTION INFORMATION.
- INSTALL TWO 4" DIA. PVC PIPE DRAINS @ 2% SLOPE THROUGH SIDEWALK. GRADE LANDSCAPE TO DIRECT FLOW TO OPENING. SEE DETAIL SHEET CG5.1.
- CONSTRUCT PRIVATE STORM DRAIN SYSTEM. SEE SHEET CG5.2 AND CG5.3 FOR SIZES / SLOPES / INLET INFORMATION / MATERIALS.
- NOT USED.
- POOL AREA GRADES SHOWN FOR GENERAL INFORMATION ONLY. POOL CONTRACTOR TO PROVIDE FINAL DESIGN GRADES / DECK DRAINS ETC.
- CONSTRUCT RETAINING STEMWALL TO ACHIEVE EXTERIOR GRADES SHOWN. SEE ARCHITECTURAL.
- CONSTRUCT DEEPENED STEMWALL THIS AREA TO ACHIEVE EXTERIOR GRADES SHOWN. SEE ARCHITECTURAL.
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- CONSTRUCT 6" STEP(S) PER PLAN. SEE ARCHITECTURAL.

KEYED NOTES

- EROSION CONTROL (MIN. 6" AVG. DIA. ANGULAR FACED ROCK) TO BE INSTALLED ON ALL SLOPES > 3:1 AND TO LIMITS SHOWN HATCHED. SEE GENERAL NOTES.
- COORDINATE LANDSCAPING FEATURE GRADES I.E. MOW CURBS, PLAYFIELD, PLAYGROUND, PUTTING GREEN, ETC. WITH LANDSCAPE ARCHITECT WHILE MAINTAINING CLEAR DRAINAGE PATHS SHOWN.
- CONSTRUCT CONCRETE ALLEY GUTTER AT FLOWLINE ELEVATIONS SHOWN. SEE PAVING PLAN.
- NOT USED
- CONSTRUCT ESTATE CURB THIS AREA TO PASS SHEETFLOW TO LANDSCAPING AND STORM DRAIN INLETS. SEE PAVING PLAN.
- CONSTRUCT STORM DRAIN OUTLET WITH END SECTION. SEE CG5.1 FOR DETAIL.
- CONSTRUCT STORM DRAIN PRIOR TO RETAINING WALL PLACEMENT.
- CONSTRUCT SITE GARDEN WALL TO ACHIEVE GRADE DIFFERENCE THIS AREA (MAX. 1.5' RETAINING). SEE ARCHITECTURAL PLAN FOR EXTENTS AND DETAILS.

PHASE / BUILDING NO				PHASE / BUILDING NO				PHASE / BUILDING NO			
CERTIFICATION				CERTIFICATION				CERTIFICATION			
DATE				DATE				DATE			
PH 1 / BLDGS 1 & 2				PH 1 / BLDG 7				BLDG 11			
Genevieve L. Donart				Genevieve L. Donart				Genevieve L. Donart			
10/24/17				05/22/18				10/17/18			
PH 1 / BLDGS 4, 20 & 24				PH 1 / BLDG 9				BLDG 18			
Genevieve L. Donart				Genevieve L. Donart				Fred C. Arfman			
11/21/17				06/25/18				10.04.18			
PH 1 / BLDGS 3, 6, & 8				PH 1 / BLDG 8				BLDG 15			
Genevieve L. Donart				Genevieve L. Donart				Genevieve L. Donart			
07/10/18				07/10/11				10/11/18			
PH 1 / BLDG 5				PH 1 / BLDG 10				BLDG 16			
Fred C. Arfman				Genevieve L. Donart				Genevieve L. Donart			
08/10				7/24/18				10/18/18			
PH 1 / BLDGS 12, 13 & 14				PH 1 / BLDG 12, 13 & 14				PH 1 / BLDG 12, 13 & 14			
Genevieve L. Donart				Genevieve L. Donart				Genevieve L. Donart			
08/17/18				08/17/18				08/17/18			

LEGEND

- 79 PROPOSED CONTOUR - 1' INCREMENT
- 75.5 PROPOSED CONTOUR - 0.5' INCREMENT
- 78.3 PROPOSED SPOT ELEVATION
- FF= 5171.00 FINISH FLOOR ELEVATION
- ROCK EROSION CONTROL
- PROPOSED STORM DRAIN (SEE CG-501) FLOWLINE ELEVATION
- INVERT ELEVATION
- RETAINING WALL
- DEEPENED/RETAINING BUILDING STEMWALL
- BUILDING NUMBER
- FINISH FLOOR GRADE TRANSITION

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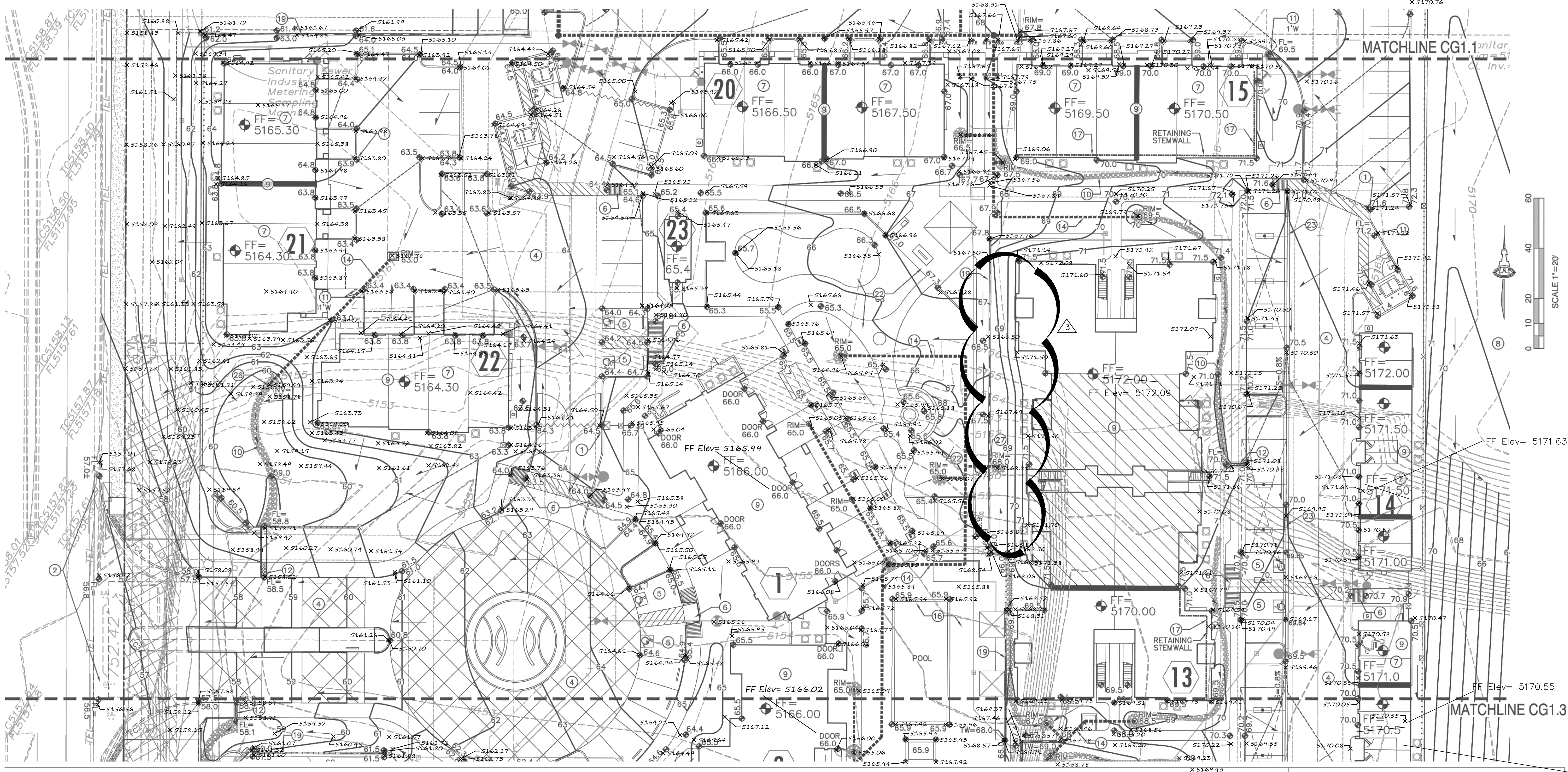
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SECOND CITY SUBMITTAL

DATE: AUGUST 24, 2016 ORB # 15-212

CG1.1
GRADING AND DRAINAGE
PLAN - 1 OF 4



KEYED NOTES

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BUILDING 13:

INLETS TO BE INSTALLED AND FUNCTIONAL PRIOR TO BUILDING 15 CERTIFICATION.

LEGEND

- | | |
|--|---------------------------------------|
| | PROPOSED CONTOUR - 1' INCREMENT |
| | PROPOSED CONTOUR - 0.5' INCREMENT |
| | PROPOSED SPOT ELEVATION |
| | FLOW ARROW |
| | FINISH FLOOR ELEVATION |
| | ROCK EROSION CONTROL |
| | PROPOSED STORM DRAIN (SEE CG-501) |
| | FLOWLINE ELEVATION |
| | INVERT ELEVATION |
| | RETAINING WALL |
| | DEEPEENED/RETAINING BUILDING STEMWALL |
| | BUILDING NUMBER |
| | FINISH FLOOR GRADE TRANSITION |

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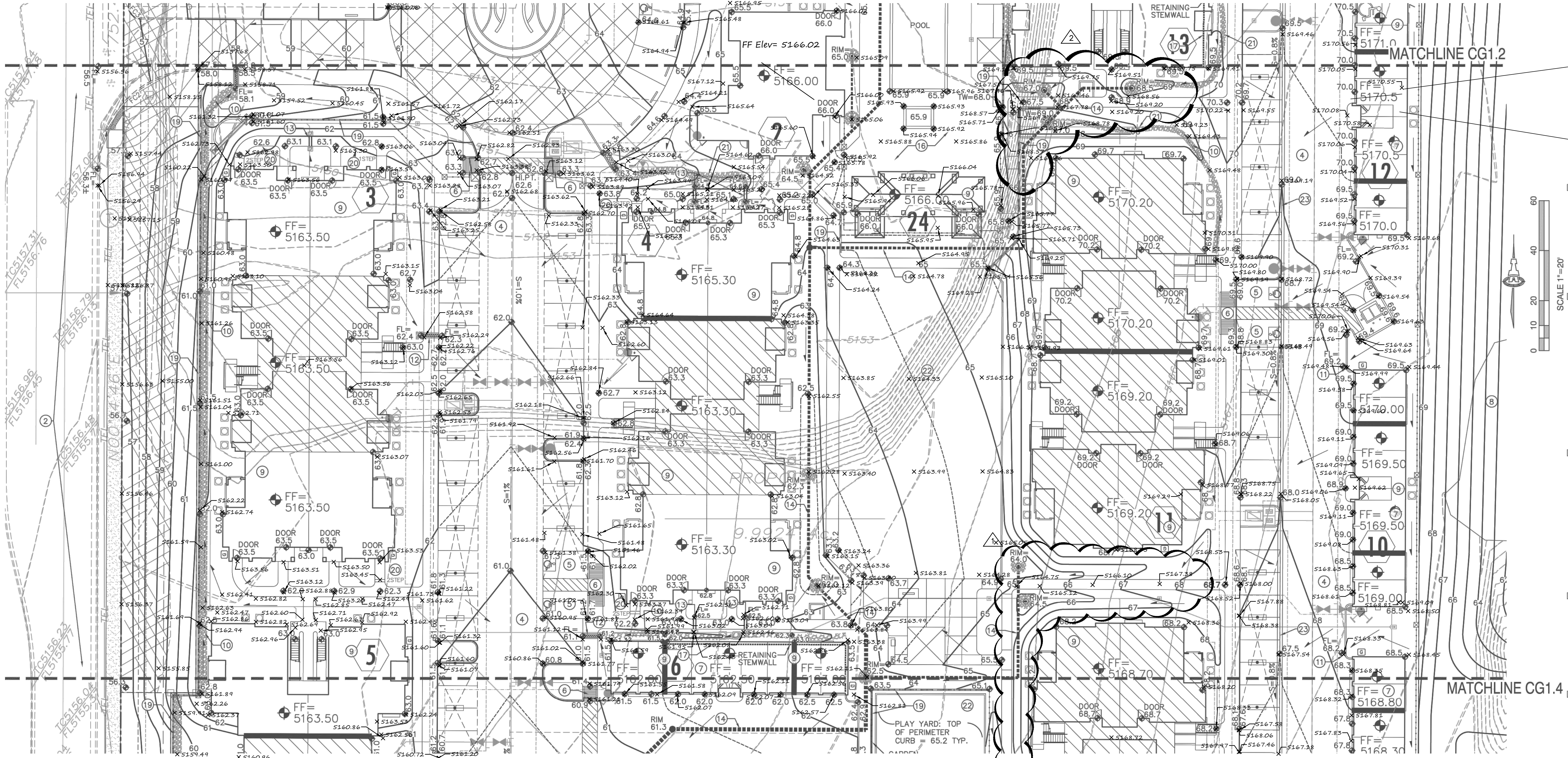
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SECOND CITY SUBMITTAL

DATE: AUGUST 24, 2016 ORB # 15-212

CG1.2
GRADING AND DRAINAGE
PLAN - 2 OF 4



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Albuquerque, New Mexico

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FRED C. ARFMAN
NEW MEXICO
7322
REGISTERED PROFESSIONAL ENGINEER
08/21/16

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KEYED NOTES

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BUILDING 11:

SIDEWALK AND INLETS TO BE INSTALLED AND FUNCTIONAL PRIOR TO BUILDING 15

BUILDING 13:

SIDEWALK AND INLETS TO BE INSTALLED AND FUNCTIONAL PRIOR TO BUILDING 15

GLP
08/17/18

LEGEND

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- 75.5 PROPOSED CONTOUR - 0.5' INCREMENT
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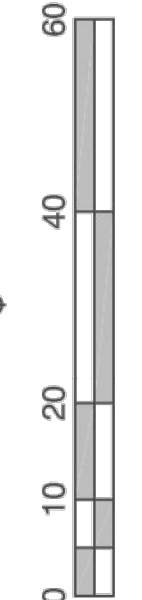
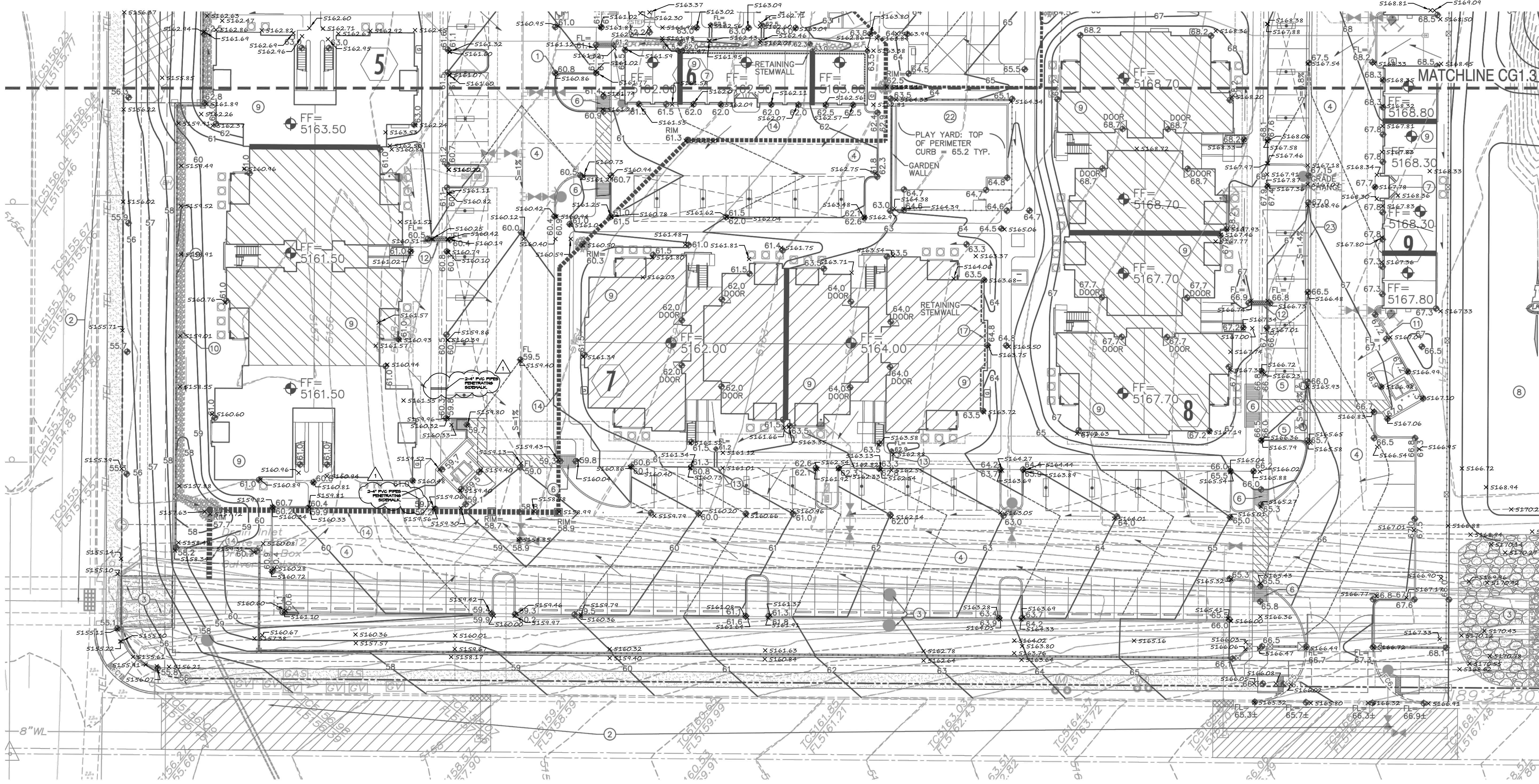
- REVISIONS

SECOND CITY SUBMITTAL

DATE: AUGUST 24, 2016 ORB # 15-212

CG1.3

GRADING AND DRAINAGE
PLAN - 3 OF 4



**BROADSTONE
NORTHPOINT**
NWC SAN MATEO AND MODESTO NE
Albuquerque, New Mexico

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KEYED NOTES

THESE NOTES ARE REFERENCED ON SHEETS CG1.1, CG1.2, CG1.3 AND CG1.4. NOT ALL NOTES ARE USED ON EACH SHEET.

- SPOT ELEVATIONS WITHIN GUTTER AREA REPRESENT FLOWLINE UNLESS NOTED. ADD 0.5' TYPICAL FOR TOP OF CURB / TOP OF ADJACENT WALK ELEVATIONS.
- SEE PUBLIC WORK ORDER DRAWINGS FOR CONSTRUCTION WITHIN R.O.W. INCLUDING NEW ACCESS DRIVES WITH CONCRETE VALLEY GUTTER, HANDICAP RAMPS, PUBLIC SIDEWALKS, ETC. GRADES SHOWN FOR INFORMATION ONLY.
- SEE PUBLIC WORK ORDER DRAWINGS FOR CONSTRUCTION OF PUBLIC STORM SEWER SYSTEM WITHIN PUBLIC DRAINAGE EASEMENT THIS AREA.
- CONSTRUCT PAVING, CURBS, WALKS AT ELEVATIONS SHOWN. SEE PAVING PLAN, PAVING DETAILS AND ARCHITECTURAL SITE DETAILS FOR ADDITIONAL INFORMATION. NOTE THAT PAVEMENT SLOPES AND CROSS-SLOPES VARY THROUGHOUT TO ACHIEVE GRADES NECESSARY FOR ADA COMPLIANT PEDESTRIAN ACCESS; POSITIVE DRAINAGE; STREET STORMWATER CAPACITIES; PIPE COVERAGE; ETC. CONSTRUCT TO ELEVATIONS SHOWN.
- SLOPES WITHIN HANDICAP PARKING AREAS TO BE ADA COMPLIANT. MAX. SLOPE = 2% IN ANY DIRECTION.
- CONSTRUCT ADA COMPLAINT ACCESS RAMP. 1:12 MAX. SLOPE, 2% MAX. CROSS-SLOPE.
- F.F. ELEVATION WITHIN UNITS WITH GARAGES REFERENCES TOP OF CONCRETE STEP AT BACK OF GARAGE. GRADE AT GARAGE DOOR SHOWN 6" BELOW F.F. TO ACCOMMODATE 4" STEP AND PAD SLOPE. TYPICAL.
- OFF-SITE GRADING THIS AREA TO PROVIDE FOR TEMPORARY DESILTATION PONDS AND BERMS AS REQUIRED TO ROUTE OFF-SITE FLOW AROUND DEVELOPMENT.
- BUILDING ROOF DISCHARGE TO BE RELEASED TO ALL SIDES. PROVIDE CONCRETE SPLASH BLOCK (O.E) AT DOWNSPOUT

LOCATIONS (TYPICAL).

- PROVIDE 3" WIDE FRACTURED FACE ROCK SWALE AT GRADES SHOWN. SEE CG5.1 FOR ADDITIONAL INFORMATION..
- PROVIDE OPENING IN CURB TO PASS FLOW (SEE PLAN FOR BOTTOM WIDTH). INSTALL 3'X3' ROCK EROSION PROTECTION (DEPRESS TO PREVENT BLOCKING OF FLOW) WITHIN LANDSCAPE AREA. SEE DETAIL SHEET CG5.1.
- CONSTRUCT 18" WIDE (BOTTOM WIDTH) COVERED SIDEWALK CULVERT PER C.O.A. STD. DWG. 2236. SEE DETAIL SHEET CG5.1 FOR ADDITIONAL CONSTRUCTION INFORMATION.
- INSTALL TWO 4" DIA. PVC PIPE DRAINS @ 2% SLOPE THROUGH SIDEWALK. GRADE LANDSCAPE TO DIRECT FLOW TO OPENING. SEE DETAIL SHEET CG5.1.
- CONSTRUCT PRIVATE STORM DRAIN SYSTEM. SEE SHEET CG5.2 AND CG5.3 FOR SIZES / SLOPES / INLET INFORMATION / MATERIALS.
- NOT USED.
- POOL AREA GRADES SHOWN FOR GENERAL INFORMATION ONLY. POOL CONTRACTOR TO PROVIDE FINAL DESIGN GRADES / DECK DRAINS ETC.
- CONSTRUCT RETAINING STEMWALL TO ACHIEVE EXTERIOR GRADES SHOWN. SEE ARCHITECTURAL.
- CONSTRUCT DEEPENED STEMWALL THIS AREA TO ACHIEVE EXTERIOR GRADES SHOWN. SEE ARCHITECTURAL.
- CONSTRUCT SITE RETAINING WALL TO ACHIEVE GRADE DIFFERENCE THIS AREA. SEE ARCHITECTURAL PLAN FOR EXTENTS AND DETAILS. STRUCTURAL / WEEPHOLE DESIGN BY OTHERS.
- CONSTRUCT 6" STEP(S) PER PLAN. SEE ARCHITECTURAL.

- EROSION CONTROL (MIN. 6" AVG. DIA. ANGULAR FACED ROCK) TO BE INSTALLED ON ALL SIDE SLOPES > 3:1 AND TO LIMITS SHOWN HATCHED. SEE GENERAL NOTES.
- COORDINATE LANDSCAPING FEATURE GRADES I.E. MOW CURBS, PLAYFIELD, PLAYGROUND, PUTTING GREEN, ETC. WITH LANDSCAPE ARCHITECT WHILE MAINTAINING CLEAR DRAINAGE PATHS SHOWN.
- CONSTRUCT CONCRETE ALLEY GUTTER AT FLOWLINE ELEVATIONS SHOWN. SEE PAVING PLAN.
- NOT USED
- CONSTRUCT ESTATE CURB THIS AREA TO PASS SHEETFLOW TO LANDSCAPING AND STORM DRAIN INLETS. SEE PAVING PLAN.
- CONSTRUCT STORM DRAIN OUTLET WITH END SECTION. SEE CG5.1 FOR DETAIL.
- CONSTRUCT STORM DRAIN PRIOR TO RETAINING WALL PLACEMENT.
- CONSTRUCT SITE GARDEN WALL TO ACHIEVE GRADE DIFFERENCE THIS AREA (MAX. 1.5' RETAINING). SEE ARCHITECTURAL PLAN FOR EXTENTS AND DETAILS.

LEGEND

- 79 PROPOSED CONTOUR - 1' INCREMENT
- 75.5 PROPOSED CONTOUR - 0.5' INCREMENT
- 78.3 PROPOSED SPOT ELEVATION
- FF= 5171.00 FLOW ARROW
- ROCK EROSION CONTROL
- PROPOSED STORM DRAIN (SEE CG-501)
- FLOWLINE ELEVATION
- INVERT ELEVATION
- RETAINING WALL
- DEEPENED/RETAINING BUILDING STEMWALL
- BUILDING NUMBER
- FINISH FLOOR GRADE TRANSITION

Contractor must verify all dimensions at project before proceeding with this work. Do not reproduce these drawings and specifications without the expressed written permission of the Architect. The drawings and specifications are instruments of service and shall remain the property of the Architect whether the project for which they are made is executed or not. These drawings and specifications shall not be used by anyone on any other project, for additions to this project, or for completion of this project by others except by the expressed written permission of the Architect.

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REVISIONS

NO.	DESCRIPTION	DATE
1	Added PVC pipe penetration. GLD 04/20/18	

SECOND CITY SUBMITTAL

DATE: AUGUST 24, 2016 ORB # 15-212

CG1.4
GRADING AND DRAINAGE
PLAN - 4 OF 4

I, Genevieve L. Donart, NMPE #15088, of the firm Isaacson & Arfman, P.A., hereby certify that this project has been graded and will remain in substantial compliance with and in accordance with the design intent of the approved public work order plan dated 09/16/2016. The record information edited onto the original design document has been obtained by Russ Hugg NMPS #9750, of the firm Surv-Tek, Inc. I further certify that I have personally visited the project site on 12/01/17 and have determined by visual inspection that the survey data provided is representative of actual site conditions and is true and correct to the best of my knowledge and belief with the following exception:

This certification is submitted in support of a request for SIA / financial guaranty release.

Professional Engineer Seal for Genevieve L. Donatelli, New Mexico, License 15088, dated 12/1/80.



Russ P. Hugg
NMPS No. 9750
2/7



SOUTH LA CUEVA ARROYO

- A. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE COMPLETE INSTALLATION OF ALL WORK RELATED TO PROPOSED STORM DRAINS SHOWN ON THIS PLAN INCLUDING: TRENCHING, BACKFILL, SUPPORTS, INLET AND MANHOLE COLLARS, MANHOLES, WATER QUALITY FEATURES, EROSION CONTROL FEATURES, TESTING, CLEANING, AND STERILIZING. ANY WORK NOT ACCEPTED BY THE ARCHITECT OR ENGINEER DUE TO IMPROPER WORKMANSHIP OR LACK OF PROPER COORDINATION SHALL BE REMOVED AND CORRECTLY INSTALLED AT THE CONTRACTOR'S EXPENSE, AS DIRECTED.
- B. MINIMUM COVER FOR STORM DRAIN PIPES SHALL BE 12", UNLESS OTHERWISE NOTED.
- C. STORM DRAINS SHALL BE INSTALLED AFTER COMPLETION OF THE SITE ROUGH GRADING.
- D. STORM DRAINS SHALL BE INSTALLED PRIOR TO SURFACE IMPROVEMENTS SUCH AS PAVEMENT, SIDEWALKS, AND LANDSCAPING.
- E. CONTRACTOR SHALL BE RESPONSIBLE FOR CONNECTIONS TO ROOF DOWNSPOUTS AND ALL NECESSARY FITTINGS. FITTING COSTS SHALL BE INCIDENTAL.
- F. TRENCHING, BORING, AND JACKING SHALL BE CONSTRUCTED IN ACCORDANCE WITH COA SPEC. SECT. 700 / NMAPWA SPEC. SECT. 700 / LOCAL UTILITY COMPANY SPECIFICATIONS. ALL BACKFILL SHALL BE COMPACTED TO A MINIMUM 95% DENSITY PER ASTM D-1557.
- G. ALL INLET AND AREA DRAIN RINGS & GRATES, MANHOLE RINGS & COVERS, AND OTHER SURFACE ITEMS FOR THE STORM DRAINS SHALL BE ADJUSTED TO FINISHED GRADE, UNLESS OTHERWISE NOTED ON THE PLANS.
- H. ALL STORM DRAIN CROSSINGS OF WATER AND SEWER LINES SHALL HAVE 18" MIN CLEARANCE. IF 18" CLEARANCE IS NOT POSSIBLE, CONTACT THE ENGINEER AND / OR ARCHITECT IMMEDIATELY.
- I. RCP PIPES, PP PIPES, CONCRETE INLETS, MANHOLES, AND CLEANOUTS SHALL BE CONSTRUCTED IN ACCORDANCE WITH COA SPEC. SECT. 900.
- J. HDPE PIPE SHALL BE ADS N-12 (WATERTIGHT) OR ENGINEER APPROVED EQUIVALENT. HDPE PIPE SHALL BE INSTALLED PER MANUFACTURER'S RECOMMENDATIONS.
- K. PVC PIPES SHALL BE PVC SDR-35, INSTALLED PER MANUFACTURER'S RECOMMENDATIONS.
- L. STORM DRAINS SHALL BE INSTALLED AT INVERTS AND SLOPES SPECIFIED ON THE PLANS. THE PIPE SHALL DRAIN AT A CONSTANT SLOPE BETWEEN FITTINGS AND MANHOLES. THE PIPE SHALL DRAIN TOWARD THE OUTLET AT ALL LOCATIONS.

ENGINEER'S SEAL

NO.	DATE	REMARKS	BY
REVSIONS			
DESIGN			
DESIGNED BY	FCA	DATE	06/2016
DRAWN BY	DEC/GLD/FCA	DATE	06/2016
FCA		DATE	06/2016

128 Monroe Street N.E.
Albuquerque, New Mexico 87
Ph. 505-268-8828 www.iacivil.com

**BROADSTONE NORTHPOINTE APARTMENTS
SOUTH LA CUEVA ARROYO
STORM DRAIN PLAN & PROFILE**

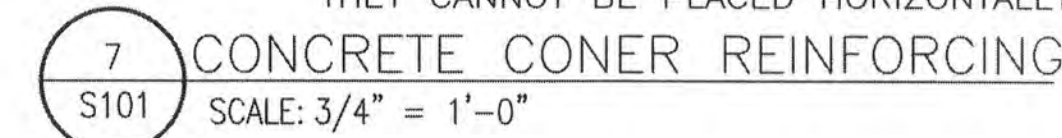
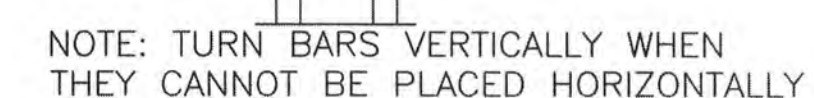
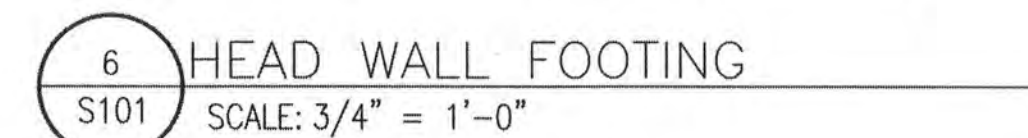
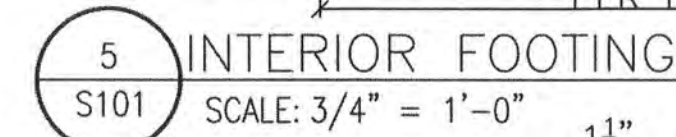
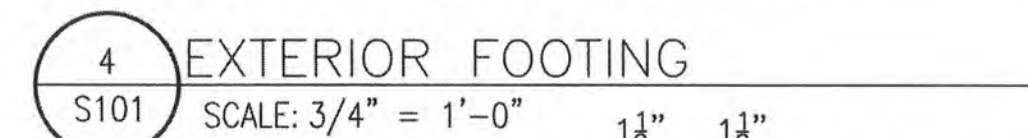
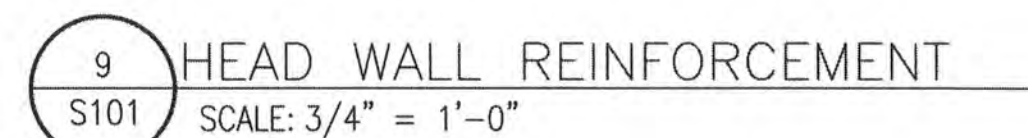
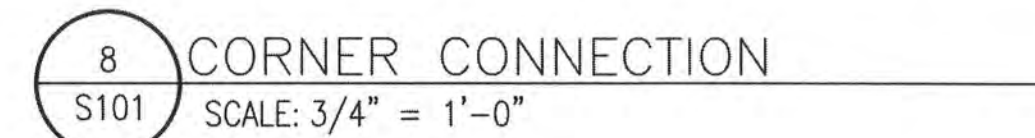
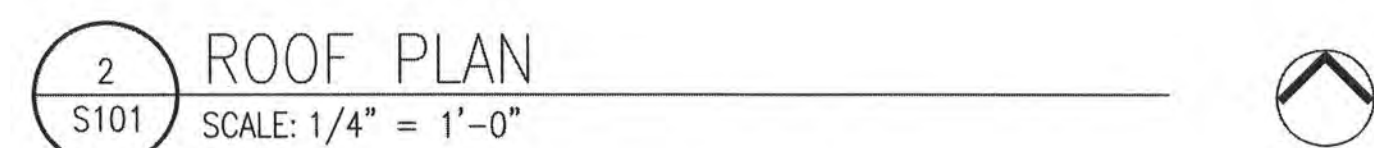
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LAST DESIGN UPDATE

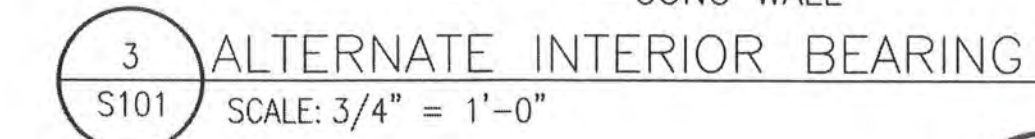
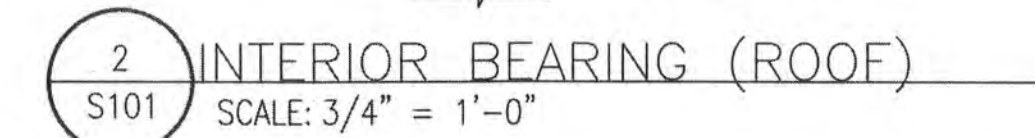
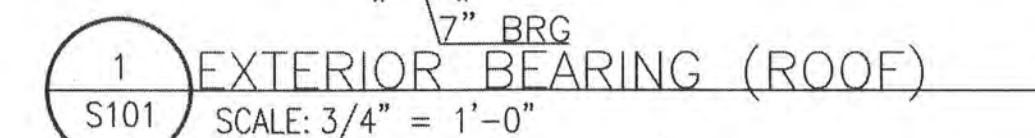
Zone Map No.	540
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316

16 26



1. 8" DEEP x 48" WIDE PRECAST HOLLOW CORE PANELS WITH 2" CONCRETE TOPPING.
2. EXISTING WING WALLS TO BE REMOVED.
3. EXISTING BOX CULVERT TO REMAIN.
4. 12" CONCRETE WALL WITH #4@18" OC VERTICAL AND #4@16" OC HORIZONTAL, EACH FACE.
5. 10" CONCRETE WALL WITH #4@18" OC VERTICAL AND #4@18" OC HORIZONTAL, EACH FACE.
6. 10" CONCRETE HEAD WALL WITH #4@18" OC VERTICAL AND #4@18" OC HORIZONTAL, EACH FACE
7. 6' DIAMETER RCP.
8. 10" THICK CONCRETE SLAB ON GRADE WITH #4@18" OC EACH WAY, TOP AND BOTTOM.
9. 4'-0" WIDE x 12" THICK CONTINUOUS FOOTING WITH BOTTOM REINFORCING; #4@18" OC TRANSVERSE AND 4-#4 LONGITUDINAL, TOP REINFORCING; #4@18" OC TRANSVERSE AND 2-#4 LONGITUDINAL.
10. 4'-9" WIDE x 12" THICK CONTINUOUS FOOTING WITH #4@18" TRANSVERS AND 4-#4 LONGITUDINAL.
11. 4'-0" WIDE x 12" THICK CONTINUOUS FOOTING WITH #4@18" OC TRANSVERSE AND 4-#4 LONGITUDINAL.
12. PROVIDE NP-1 SEALANT, OR EQUIVALENT, AT ALL JOINTS, TYPICAL.

SHEET NO.

S-101

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S-101

GENERAL

1. CONSTRUCTION DOCUMENTS
 - A. IF THERE ARE DISCREPANCIES BETWEEN PLANS, DETAILS, GENERAL NOTES AND SPECIFICATIONS, USE THE MOST STRINGENT REQUIREMENTS.
 - B. SPECIFIC NOTES AND DETAILS TAKE PRECEDENCE OVER GENERAL NOTES AND TYPICAL DETAILS.
 - C. DETAILS DESIGNATED "TYPICAL" APPLY IN ALL SIMILAR CONDITIONS UNLESS SPECIFIC DETAILS ARE SHOWN.
 - D. WHERE NO SPECIFIC DETAILS ARE SHOWN, PROVIDE CONSTRUCTION TO MATCH CONSTRUCTION DETAILED FOR SIMILAR CONDITIONS ON THE PROJECT. CONFIRM DETAILS WITH ENGINEER BEFORE CONSTRUCTION.
2. DIMENSIONS
 - A. DO NOT SCALE DRAWINGS FOR CONSTRUCTION DIMENSIONS.
 - B. VERIFY ALL DIMENSIONS IN THE FIELD. NOTIFY ENGINEER OF ANY DISCREPANCIES.
3. PROJECT COORDINATION
 - A. COORDINATE STRUCTURAL WORK WITH REQUIREMENTS SHOWN ON ARCHITECTURAL, MECHANICAL, ELECTRICAL, CIVIL AND OTHER PROJECT DRAWINGS.
 - B. NOT ALL STRUCTURAL WORK IS SHOWN ON STRUCTURAL DRAWINGS. PROVIDE WORK SHOWN ON ALL PROJECT DRAWINGS.
4. SUBMITTALS
 - A. ANY WORK THAT IS FABRICATED OR INSTALLED BEFORE REQUIRED SUBMITTALS FOR THAT WORK ARE SUBMITTED AND REVIEWED IS AT CONTRACTOR'S RISK AND MAY BE REQUIRED TO BE MODIFIED OR REMOVED AND REPLACED AT CONTRACTOR'S EXPENSE.
 - B. POORLY EXECUTED SUBMITTALS WILL NOT BE REVIEWED BUT WILL BE REJECTED.
 - C. REVIEW OF SUBMITTALS IS FOR GENERAL CONFORMANCE WITH DESIGN CONCEPT OF THE PROJECT AND GENERAL COMPLIANCE WITH THE INFORMATION GIVEN IN THE CONTRACT DOCUMENTS. SUBMITTAL REVIEW DOES NOT RELIEVE CONTRACTOR FROM COMPLIANCE WITH THE REQUIREMENTS OF THE CONTRACT DOCUMENTS.
 - D. DEVIATIONS FROM THE CONTRACT DOCUMENTS SHOWN ON SUBMITTALS
 - (1) ON AN ATTACHED SEPARATE SHEET, PREPARED ON CONTRACTOR'S LETTERHEAD, SPECIFICALLY NOTE ON SUBMITTALS ANY ITEMS DEVIATING FROM THE CONTRACT DOCUMENTS OR PREVIOUSLY REVIEWED SUBMITTALS, AND REQUEST APPROVAL.
 - (2) ONLY DEVIATIONS THAT ARE SPECIFICALLY NOTED AS APPROVED IN THE ENGINEER'S REVIEW ARE APPROVED FOR INCORPORATION INTO THE WORK. DEVIATIONS THAT ARE NOTED AS "NOT APPROVED", AND DEVIATIONS THAT ARE NOT COMMENTED ON, ARE NOT APPROVED FOR INCORPORATION INTO THE WORK.

5. CHANGES TO THE CONTRACT DOCUMENTS

- A. CHANGES TO THE CONTRACT DOCUMENTS THAT DO NOT AFFECT THE PROJECT COST OR SCHEDULE MAY BE ISSUED BY THE ENGINEER OF RECORD BY ARCHITECT'S SUPPLEMENTAL INSTRUCTIONS (ASI), RESPONSES TO REQUESTS FOR INFORMATION (RFI), COMMENTS ON SUBMITTALS, OR BY OTHER WRITTEN DOCUMENT.
- B. CHANGES TO THE CONTRACT DOCUMENTS WILL NOT BE ISSUED VERBALLY, BY PHONE OR IN PERSON. DO NOT INCORPORATE ANY CHANGES TO THE CONTRACT DOCUMENTS THAT HAVE BEEN ISSUED VERBALLY WITHOUT WRITTEN DOCUMENTATION.
- C. CHANGES TO THE CONTRACT DOCUMENTS THAT AFFECT THE PROJECT COST OR SCHEDULE CAN ONLY BE ISSUED IN WRITING BY THE OWNER. THE ENGINEER DOES NOT HAVE AUTHORITY TO ISSUE CHANGES THAT AFFECT PROJECT COST OR SCHEDULE.
- D. IF ENGINEER ISSUES ANY CHANGE TO THE CONTRACT DOCUMENTS THAT THE CONTRACTOR BELIEVES AFFECTS THE PROJECT COST OR SCHEDULE, DO NOT PROCEED WITH THE CHANGE. NOTIFY THE OWNER AND ENGINEER OF THE PROPOSED CHANGE AND IMPACT ON COST AND SCHEDULE.
- E. ANY WORK DONE ON A CHANGE THAT IMPACTS PROJECT COST OR SCHEDULE, THAT HAS NOT BEEN ISSUED IN WRITING BY THE OWNER, IS AT CONTRACTOR'S RISK. CONTRACTOR MAY NOT BE PAID FOR THIS WORK, AND THE WORK MAY BE REQUIRED TO BE MODIFIED OR REMOVED AND REPLACED AT CONTRACTOR'S EXPENSE.

6. CONSTRUCTION

A. THE STRUCTURE SHOWN ON THE DRAWINGS IS DESIGNED TO BE STABLE IN THE FINAL CONFIGURATION. DESIGN AND PROVIDE TEMPORARY BRACING, SHORING AND OTHER SUPPORTS AS REQUIRED FOR STABILITY DURING CONSTRUCTION. DO NOT DAMAGE OR OVERSTRESS PERMANENT ELEMENTS WITH TEMPORARY BRACING, SHORING OR OTHER SUPPORTS.

B. USE CONSTRUCTION SEQUENCES THAT WILL NOT RESULT IN DAMAGE TO PERMANENT COMPONENTS FROM THERMAL STRESSES DURING CONSTRUCTION.

C. DO NOT CUT, NOTCH OR MODIFY SHOP-FABRICATED STRUCTURAL MEMBERS IN THE FIELD UNLESS SHOWN ON DRAWINGS OR SUBMITTED AND APPROVED BY ENGINEER.

1. GEOTECHNICAL REPORT: THE PROJECT GEOTECHNICAL REPORT WAS PREPARED BY X8e/VINYARD, INC., PROJECT NUMBER 15-1-065, DATED NOVEMBER 23, 2015.
2. DESIGN ALLOWABLE BEARING PRESSURE: 3000 PSF.
3. MINIMUM BEARING DEPTH BELOW FINISH GRADE FOR FROST FOR EXTERIOR FOOTINGS: 18".
4. ENGINEERED FILL:
 - A. IMPORTED FILL SHALL CONFORM TO THE FOLLOWING:

(1) GRADATION (ASTM C136)	PERCENT PASSING BY WEIGHT
4"	100
1"	90-100
NO. 4 SIEVE	70-100
NO. 200 SIEVE	10-100
 - (2) PLASTICITY INDEX OF 10 OR LESS.
 - (3) IMPORTED FILL SHALL BE APPROVED BY THE GEOTECHNICAL ENGINEER PRIOR TO PLACEMENT.
5. DO NOT PLACE BACKFILL BEHIND RETAINING WALLS UNTIL CONCRETE HAS REACHED DESIGN STRENGTH. WHERE RETAINING WALLS ARE ATTACHED TO PERMANENT STRUCTURE ABOVE THE FOUNDATIONS, DO NOT PLACE BACKFILL BEHIND THE WALLS UNTIL PERMANENT STRUCTURE IS IN PLACE AND ATTACHED TO WALLS, OR DESIGN AND PROVIDE TEMPORARY BRACING FOR THE WALLS UNTIL PERMANENT STRUCTURE IS IN PLACE AND ATTACHED TO WALLS.

Rob Hill Structural Engineering, LLC
309 Washington St se
Albuquerque, NM 87108
Office: 505.234.6861
www.nhse.pro

REVISIONS		
MARK	DATE	DESCRIPTION

ISSUE DATE: 6/10/16

PROJECT NO: 1612

DRAWN BY: SA

CHK'D BY: SA

SHEET TITLE

GENERAL NOTES

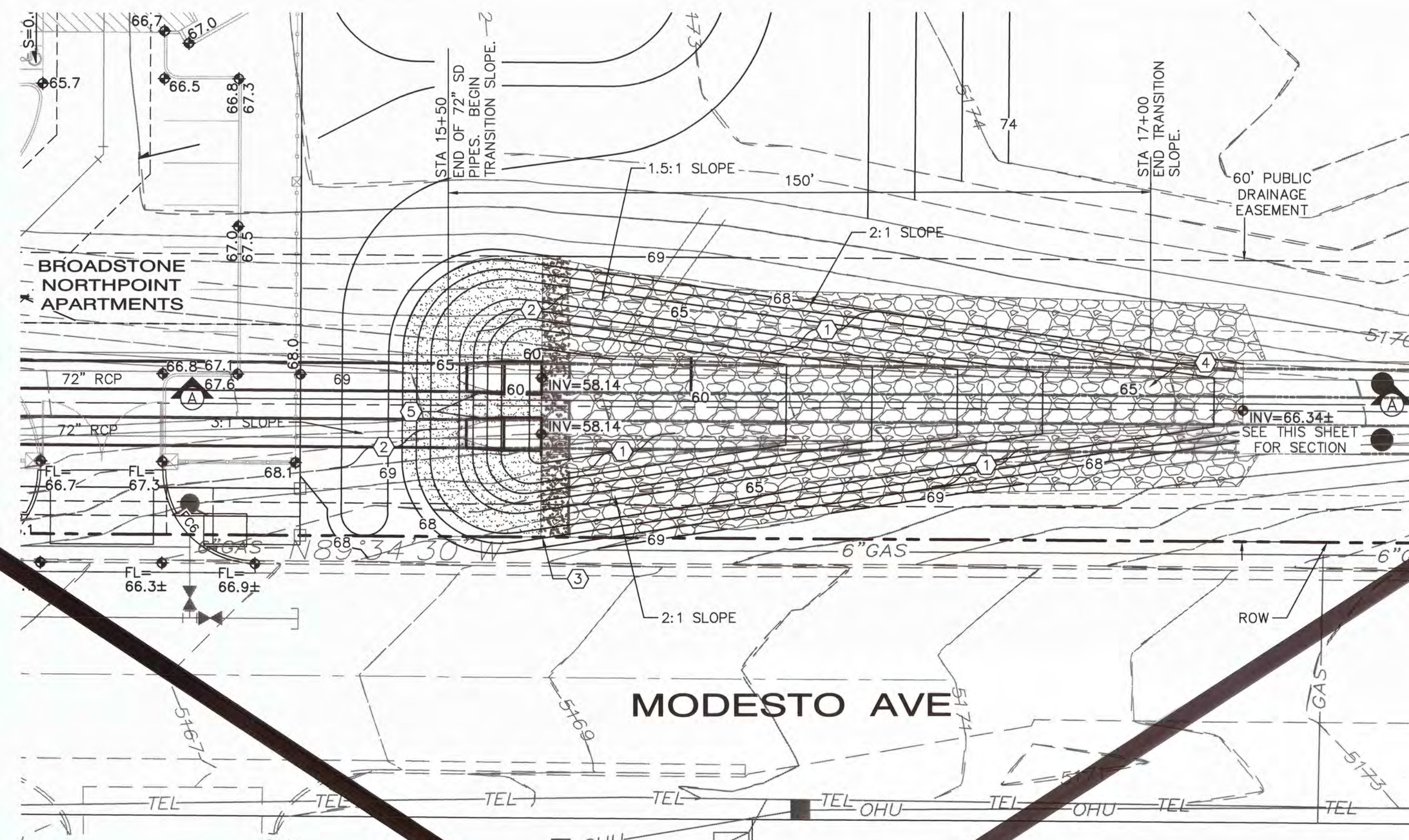
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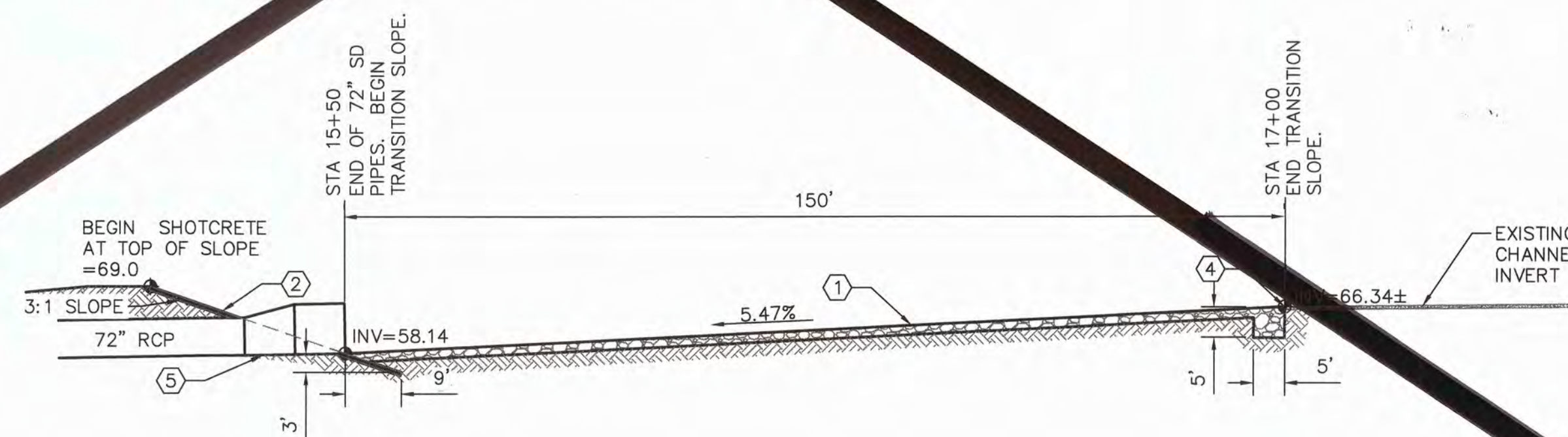


CHANNEL GENERAL NOTES
GENERAL NOTES

Sheet 18 Of 26



TEMPORARY TRANSITION STRUCTURE DETAIL
PLAN VIEW



TEMPORARY TRANSITION STRUCTURE DETAIL
SECTION A-A

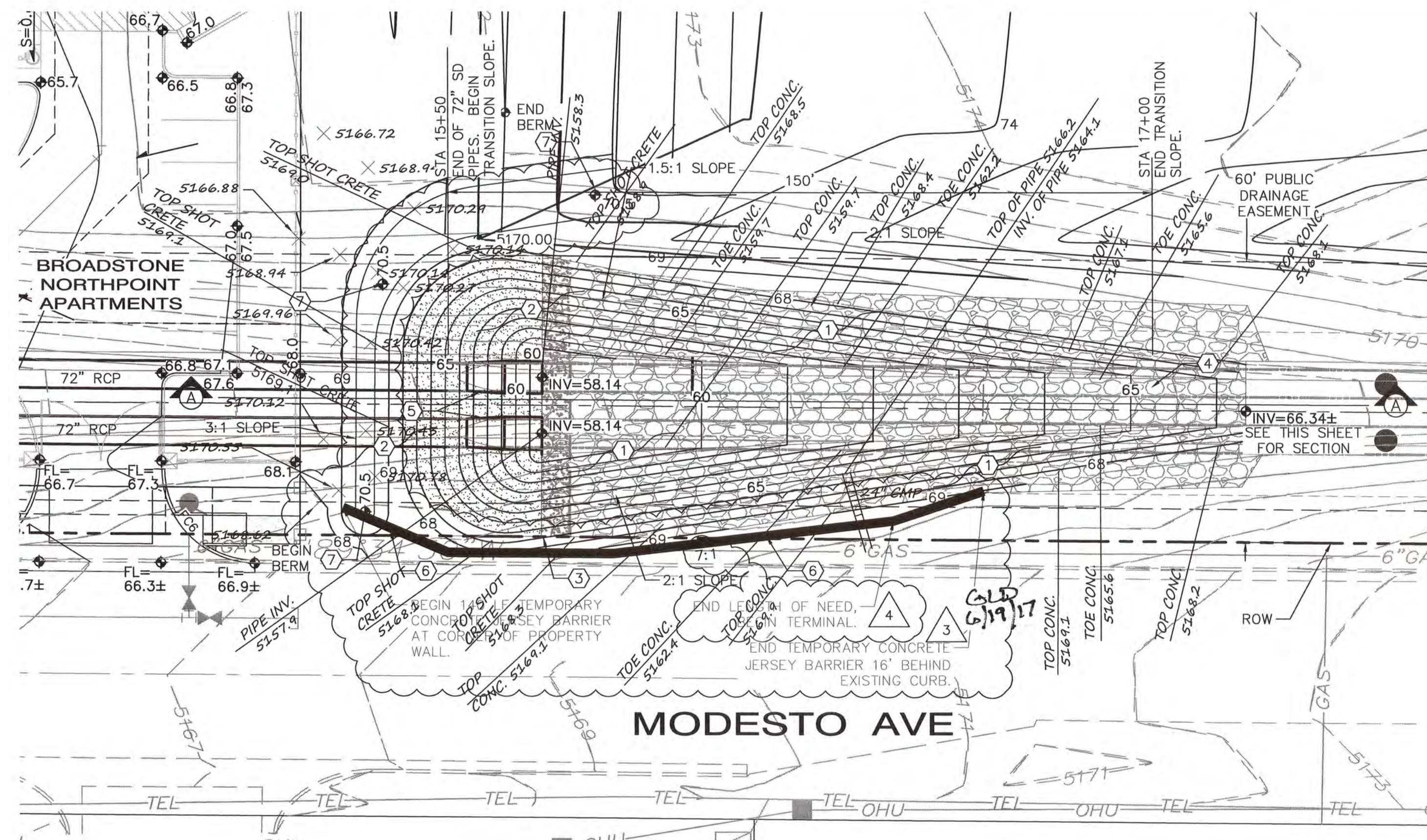
KEYED CONSTRUCTION NOTES

- 3" THICK, 15" MEAN DIA. BROKEN CONCRETE OR RIPRAP OVER 12" TYPE 2 GRAVEL FILTER MATERIAL AND 12" SUBGRADE COMPACTED TO 95% MIN.
- 7" THICK SHOTCRETE (OPTION #1), OR 18" THICK GROUTED RIPRAP (OPTION #2), OR 18" THICK GROUTED BROKEN CONCRETE (OPTION #3)
- NOT USED.
- SAWCUT EXISTING CONCRETE CHANNEL. REMOVE & DISPOSE OF CONCRETE DOWNSTREAM.
- 84" TO 72" RCP TRANSITION WITH AN ECCENTRIC CONE & 8 LF OF 8" RCP SD. TO BE REMOVED WHEN FUTURE BRIDGES EXTEND THE 72" SD UPSTREAM.

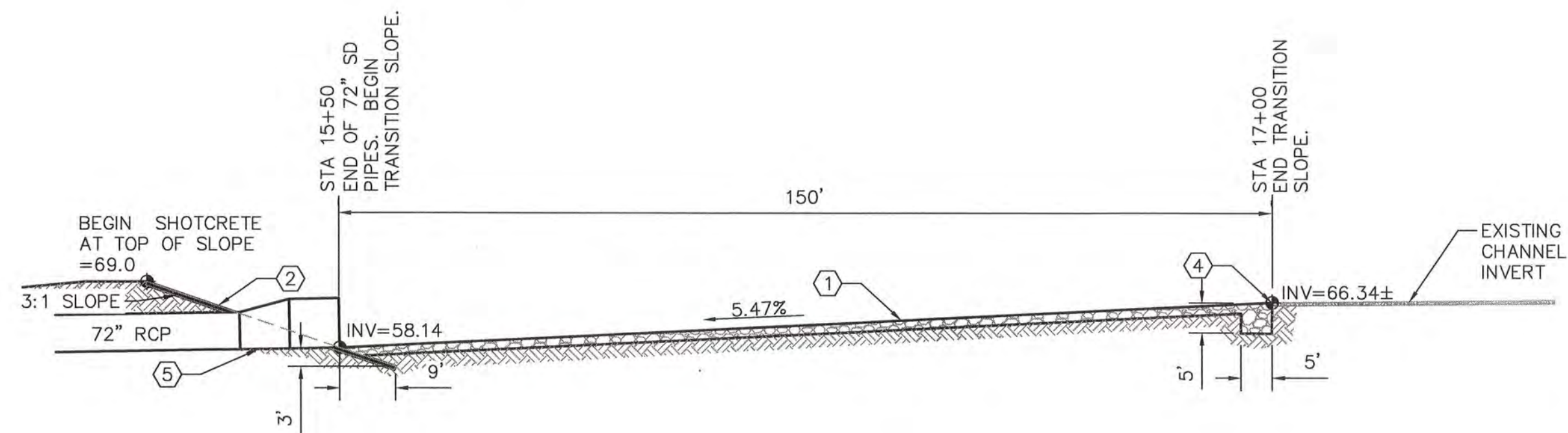
AS BUILT DRAWING

ISAACSON & ARFMAN, P.A.
Consulting Engineering Associates
128 Monroe Street N.E.
Albuquerque, New Mexico 87108
Ph. 505-268-8828 www.incivil.com
12-502.dwg Sep 09, 2016

CITY OF ALBUQUERQUE PUBLIC WORKS DEPARTMENT ENGINEERING DEVELOPMENT GROUP	
BROADSTONE NORTHPOINT APARTMENTS CHANNEL DETAILS	
DESIGN REVIEW COMMITTEE APPROVE OCT 03 2016 DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL APPROVE JAN 17 2017 CITY ENGINEER
City Project No. 786480	Zone Map No. B-18
Sheet 19	Of 26



TEMPORARY TRANSITION STRUCTURE DETAIL
PLAN VIEW



TEMPORARY TRANSITION STRUCTURE DETAIL
SECTION A-A

SURVEYORS CERTIFICATION

I, Russ P. Hugg, New Mexico Professional Surveyor Number 9750, hereby certify that the as-built information shown hereon is the result of an actual field survey performed by me or under my direct supervision and that the same is true and correct to the best of my knowledge and belief.

Russ P. Hugg
NMPS No. 9750
9/7/2018



KEYED CONSTRUCTION NOTES

- 3' THICK, 15" MEAN DIA. BROKEN CONCRETE OR RIPRAP OVER 12" TYPE 2 GRAVEL FILTER MATERIAL, OR 12" THICK MINIMUM SIZE 3 SQ. FT. SLABS OF OVERLAPPING BROKEN CONCRETE PLACED TO KEEP THE OVERLAP ON THE DOWNSTREAM END, THEREBY PREVENTING STORM WATER FROM RELOCATING THE SLABS. EITHER OPTION TO BE PLACED OVER 12" TYPE 2 GRAVEL FILTER MATERIAL AND 12" SUBGRADE COMPACTED TO 95% MIN.
- 7" THICK SHOTCRETE (OPTION #1), OR 18" THICK GROUTED RIPRAP (OPTION #2), OR 18" THICK GROUTED BROKEN CONCRETE (OPTION #3)
- NOT USED.
- SAWCUT EXISTING CONCRETE CHANNEL. REMOVE & DISPOSE OF CONCRETE DOWNSTREAM.
- 84" TO 72" RCP TRANSITION WITH AN ECCENTRIC CONE & 8 LF OF 84" RCP SD. TO BE REMOVED WHEN FUTURE PHASES EXTEND THE 72" SD UPSTREAM.
- INSTALL 140 LF OF TEMPORARY CONCRETE JERSEY BARRIERS BETWEEN CURB AND TEMPORARY TRANSITION STRUCTURE AS SHOWN IN PLAN VIEW.
- 18" HIGH BERM FOR FREEBOARD.

3
G.L.D.
6/19/17

AS BUILT DRAWING

ISAACSON & ARFMAN, P.A.
Consulting Engineering Associates
128 Monroe Street N.E.
Albuquerque, New Mexico 87108
Ph. 505-268-8828 www.iaacivil.com
2129 CP-502.dwg Aug 08, 2018

CITY OF ALBUQUERQUE PUBLIC WORKS DEPARTMENT ENGINEERING DEVELOPMENT GROUP			
BROADSTONE NORTHPOINTE APARTMENTS CHANNEL DETAILS			
DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	Mo./DAY/YR.	Mo./DAY/YR.
		LAST DESIGN UPDATE	
City Project No.	Zone Map No.	Sheet	Of
786480	B-18	19-R	26