

CITY OF ALBUQUERQUE



Richard J. Berry, Mayor

August 20, 2016

Yolanda Padilla Moyer, P.E.
Bohannon Huston
7601 Jefferson NE, Suite 100
Albuquerque, NM, 87109

**RE: Del Webb @ Mirehaven Phase 2
Grading & Drainage Plan Revision
Stamp Date 3-11-16 / Hydrology File: H09D017F**

Dear Ms. Padilla-Moyer:

Based upon the information provided in your submittal received 8-05-2016, the above-referenced is re-approved for ESC Grading Permit. We understand that the above-referenced Plan includes minor changes to the way that Lots 58-67 drain within Phase 2A.

PO Box 1293

Engineer's Certification will be required prior to Pad Certification/Release of Financial Guarantee per the DPM Checklist.

Albuquerque

An approved ESC Grading Permit is required prior to any grading on the site. A Floodzone Permit will be required for the Grading Permit, since the Mirehaven Arroyo A Zone is still mapped and appears to encroach into small portions of the site.

New Mexico 87103

If you have any questions, you can contact me at 924-3986.

www.cabq.gov

Sincerely,

Abiel Carrillo, P.E.
Principal Engineer, Planning Dept.
Development Review Services

Orig: Drainage file

Courtyard I
7500 Jefferson St. NE
Albuquerque, NM
87109-4335
www.bhinc.com
voice: 505.823.1000
facsimile: 505.798.7988
toll free: 800.877.5332

CLIENT/COURIER TRANSMITTAL

To: Shahab Biazar
Abiel Carrillo
City of Albuquerque
Plaza del Sol
600 2nd Street NW
Albuquerque, NM 87102

Requested by: Yolanda Padilla Moyer / jcm

Date: August 5, 2016

Time Due: This A.M.
 This P.M.
 Rush _____
 By Tomorrow

Phone: (505) 924-3993

Job No.: 20160158

Job Name: Del Webb, Phase 2A

DELIVERY VIA

- Courier Federal Express
 Mail UPS
 Other

PICK UP

Item: _____

<u>ITEM NO.</u>	<u>QUANTITY</u>	<u>DESCRIPTION</u>
1	1	Drainage & Transporation Information Sheet
2	1	Del Webb, Ph2A Approved Basin Map
3	1	Del Webb, Ph2A Revised Basin Map
4	1	Del Webb, Ph2A Revised Grading & Drainage Plan

COMMENTS / INSTRUCTIONS

REC'D BY: _____ DATE: _____ TIME: _____

August 5, 2016

Mr. Shahab Biazar, P.E. - City Engineer
Abiel Carrillo, P.E. – City Hydrologist
City of Albuquerque
600 2nd Street NW
Albuquerque, NM 87102

Re: Revised Grading and Drainage Plan, Del Webb @ Mirehaven, Phase 2A
DRB Case No. 1006864

Dear Shahab\ Abiel:

Please find enclosed a revision to the approved grading and drainage plan for Phase 2A of the above referenced project.

The revision consists of Lots 58-67 draining to the front of the lot into Woods Wash Trail, whereas the approved grading and drainage plan showed the lots draining back the open space area. As you are probably aware, these lots previously drained to the front and during the Grading and Drainage review process we revised these same lots to drain toward the back. In that original change, the initial calculations inadvertently did not get updated to account for the lots draining back. The calculations were checked and verified that the proposed infrastructure was not impacted however the calculations from the initial design were not updated as mentioned. We notice this when we were going to update the necessary calculation for this new change. In the end the drainage, regardless if these pad drain forward of back, ultimately drain via the same roads and collected by the same inlets and storm drain. The original roadway, inlet and storm drain calculation remain true in the approved Grading and Drainage report. We have provided an updated Basin Map which delineates the boundaries.

Please find enclosed the revised grading plan and revised basin map. We are requesting your review and approval. I appreciate your time and consideration. If you have questions or require additional information, please contact me at 823-1000.

Sincerely,



Yolanda Padilla Moyer, P.E.
Senior Project Manager
Community Development & Planning

Enclosure

cc: Kevin Patton, Pulte Homes

Engineering ▲

Spatial Data ▲

Advanced Technologies ▲



City of Albuquerque

Planning Department

Development & Building Services Division

DRAINAGE AND TRANSPORTATION INFORMATION SHEET (REV 09/2015)

Project Title: DEL WEBB @ MIREHAVEN PHASE 2A Building Permit #: _____ City Drainage #: H-8/H-9
 DRB#: 10006864 EPC#: _____ Work Order#: 650388
 Legal Description: DEL WEBB @ MIREHAVEN PHASE 2A (A REPLAT OF TRACT N-2-A-1 & TRACT M OF WATERSHED)
 City Address: _____

Engineering Firm: BOHANNAN HUSTON INC Contact: Yolanda Moyer
 Address: 7500 JEFFERSON ST NE COURTYARD 1 ALBUQUERQUE NM 87109
 Phone#: 823-1000 Fax#: _____ E-mail: ypadilla@bhinc.com

Owner: PULTE Contact: KEVIN PATTON
 Address: 7601 JEFFERSON STREET NE SUITE 310 ALBUQ. NM 87109
 Phone#: 505-341-8591 Fax#: _____ E-mail: kevin.patton@pultegroup.com

Architect: _____ Contact: _____
 Address: _____
 Phone#: _____ Fax#: _____ E-mail: _____

Other Contact: _____ Contact: _____
 Address: _____
 Phone#: _____ Fax#: _____ E-mail: _____

Check all that Apply:

DEPARTMENT:

- HYDROLOGY/ DRAINAGE
- TRAFFIC/ TRANSPORTATION
- MS4/ EROSION & SEDIMENT CONTROL

CHECK 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
- PRE-DESIGN MEETING
- OTHER (SPECIFY) _____

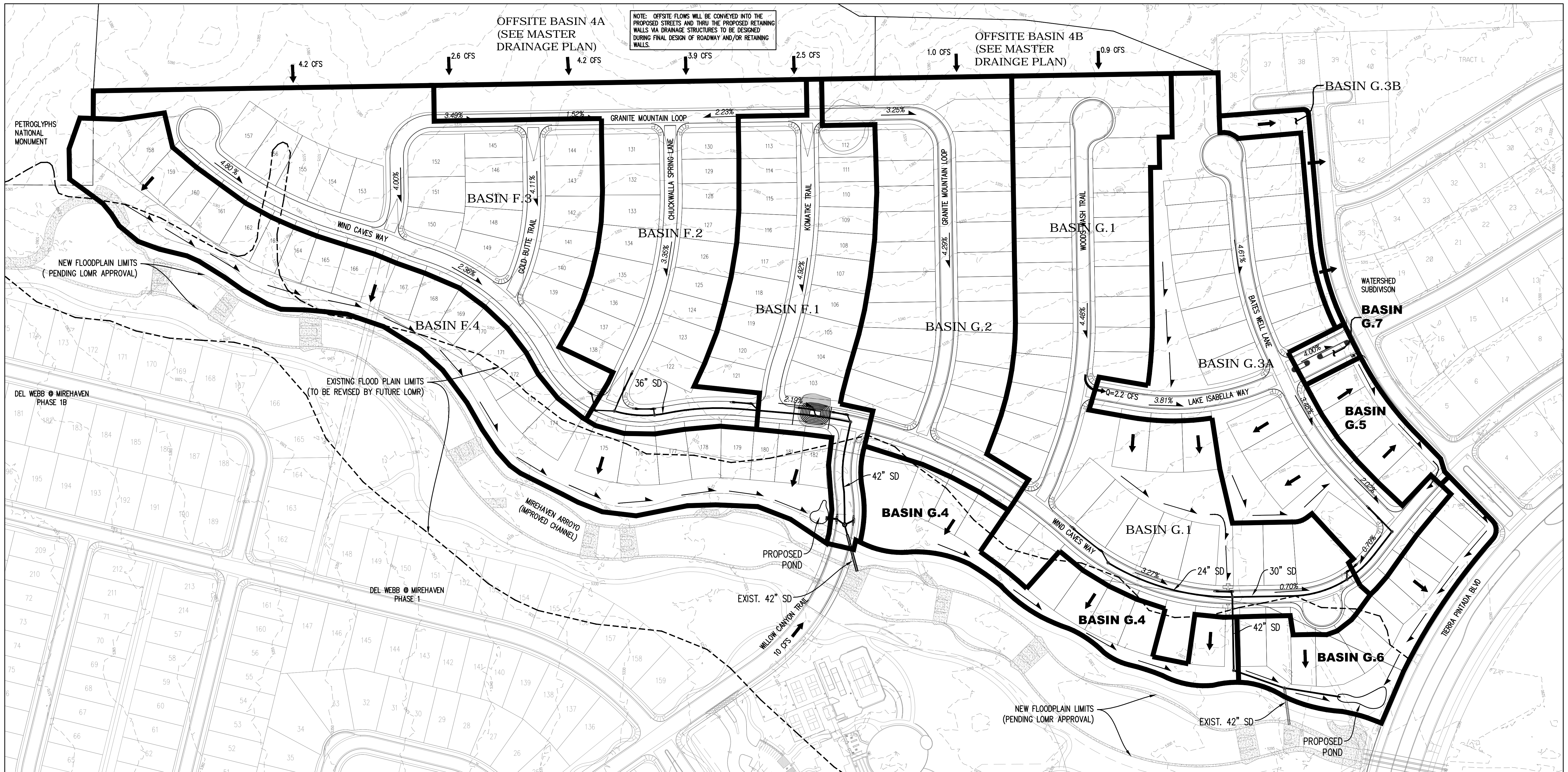
TYPE OF SUBMITTAL:

- ENGINEER/ ARCHITECT CERTIFICATION
- CONCEPTUAL G & D PLAN
- GRADING PLAN
- DRAINAGE MASTER PLAN
- DRAINAGE REPORT
- CLOMR/LOMR
- TRAFFIC CIRCULATION LAYOUT (TCL)
- TRAFFIC IMPACT STUDY (TIS)
- EROSION & SEDIMENT CONTROL PLAN (ESC)
- OTHER (SPECIFY) Revision to existing approved plan

IS THIS A RESUBMITTAL?: Yes No

DATE SUBMITTED: 08-05-16 By: YOLANDA PADILLA MOYER, P.E.

COA STAFF: _____ ELECTRONIC SUBMITTAL RECEIVED: _____



DEVELOPED BASIN SUMMARY

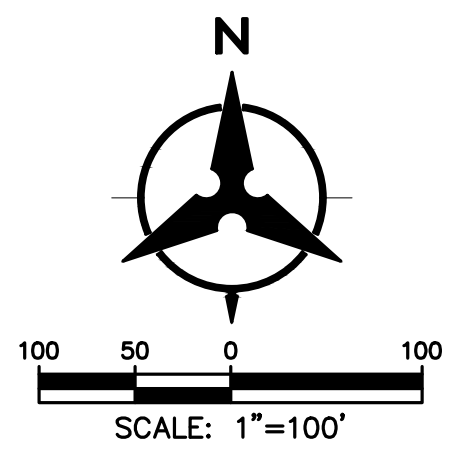
BASIN I.D.	AREA (AC)	% LAND TREATMENT				DISCHARGE (CFS) 100YR	VOLUME (AC-FT)
		A	B	C	D		
F.1	4.99	0.00%	29.00%	29.00%	42.00%	16.2	0.54
F.2	5.83	0.00%	29.00%	29.00%	42.00%	19.0	0.64
F.3	7.58	0.00%	29.00%	29.00%	42.00%	24.7	0.83
F.4	7.05	0.00%	10.00%	40.00%	50.00%	24.9	0.85
G.1	10.23	0.00%	29.00%	29.00%	42.00%	33.3	1.12
G.2	5.97	0.00%	29.00%	29.00%	42.00%	19.4	0.65
G.3A	7.22	0.00%	29.00%	29.00%	42.00%	23.5	0.79
G.3B	0.40	0.00%	0.00%	100.00%	0.00%	1.1	0.03
G.4	2.50	0.00%	10.00%	40.00%	50.00%	8.8	0.30
G.5	0.94	0.00%	29.00%	29.00%	42.00%	3.1	0.10
G.6	2.34	0.00%	29.00%	29.00%	42.00%	7.6	0.26
G.7	0.23	0.00%	10.00%	10.00%	80.00%	0.9	0.03
TOTAL	55.28					182.7	6.1

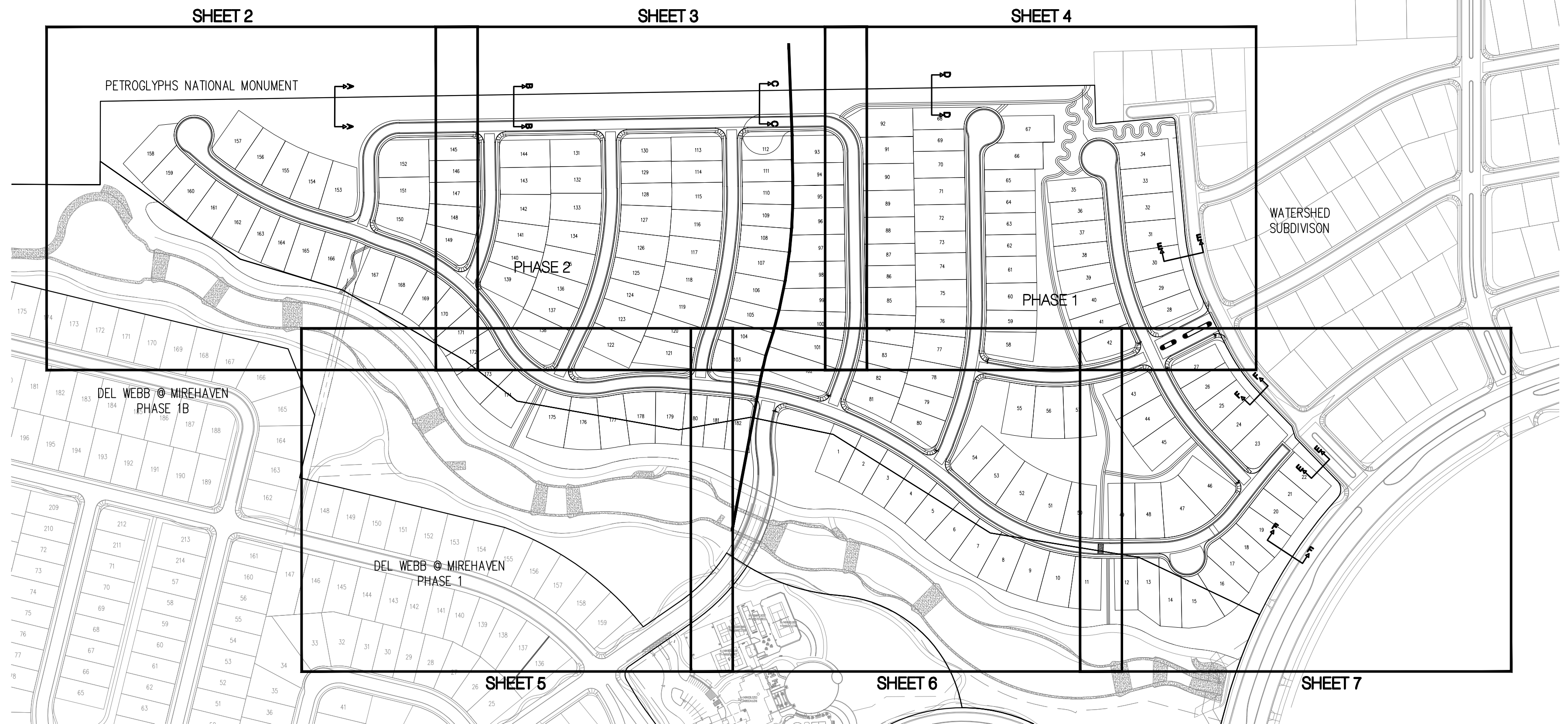
NOTE: ALL BLOCKS DRAIN TOWARD THE FRONT/STREET UNLESS OTHERWISE NOTED BY FLOW ARROW/DIRECTION ABOVE.

DEL WEBB @ MIREHAVEN PHASE 2
PROPOSED BASINS MAP

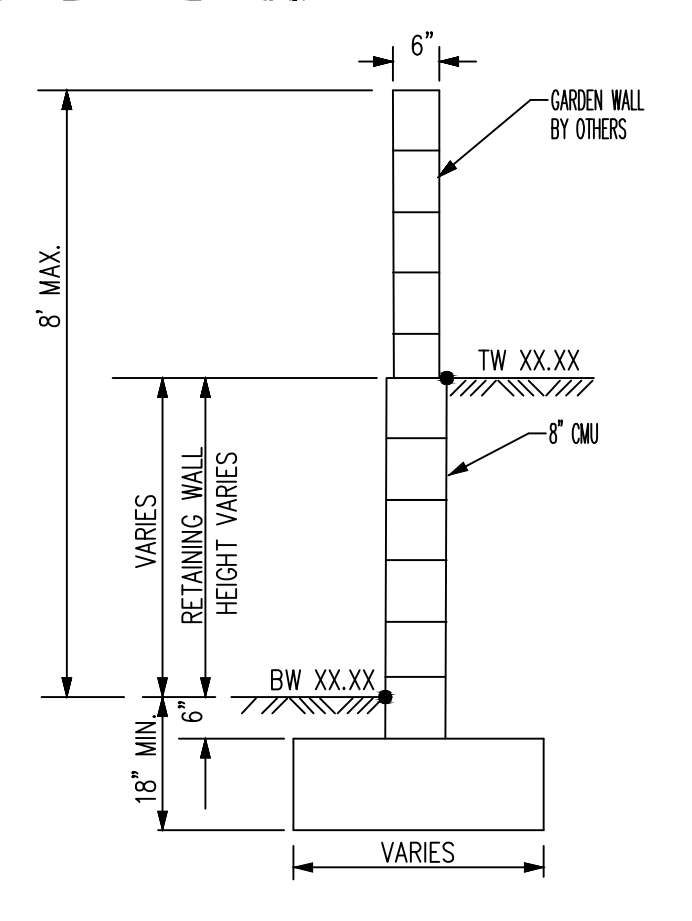
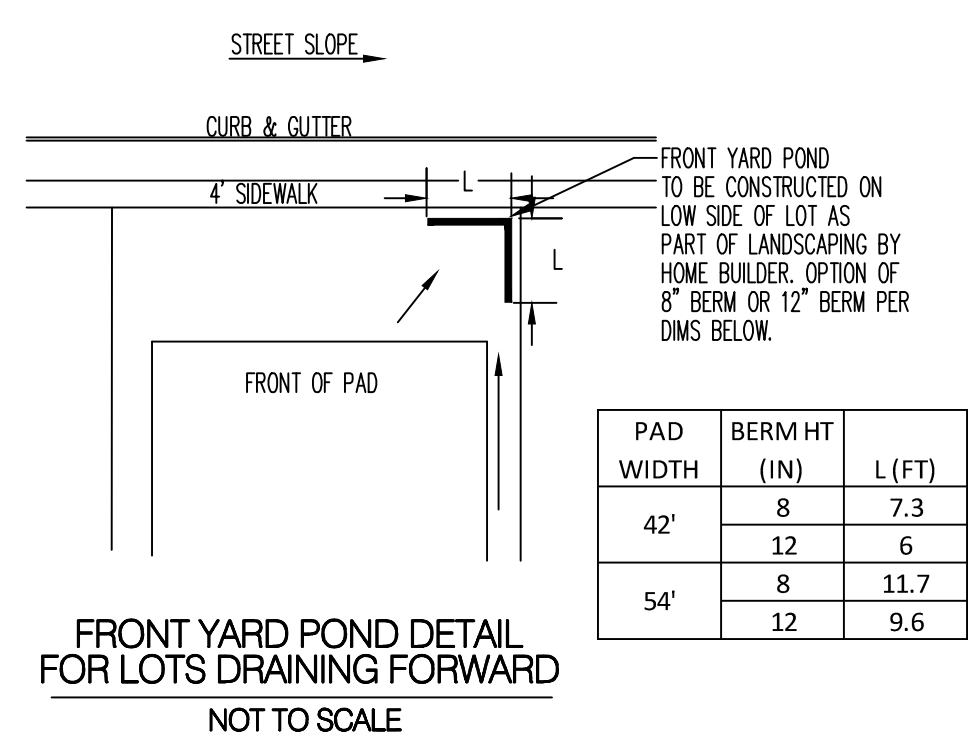
AUGUST 2016

- LEGEND**
- BASIN BOUNDARY
 - FLOW ARROW
 - PROPOSED STORM DRAIN
 - EXISTING STORM DRAIN
 - PROPOSED STREET SLOPE OR FLOW PATH
 - PROPOSED STORM DRAIN MANHOLE
 - PROPOSED STORM DRAIN INLET





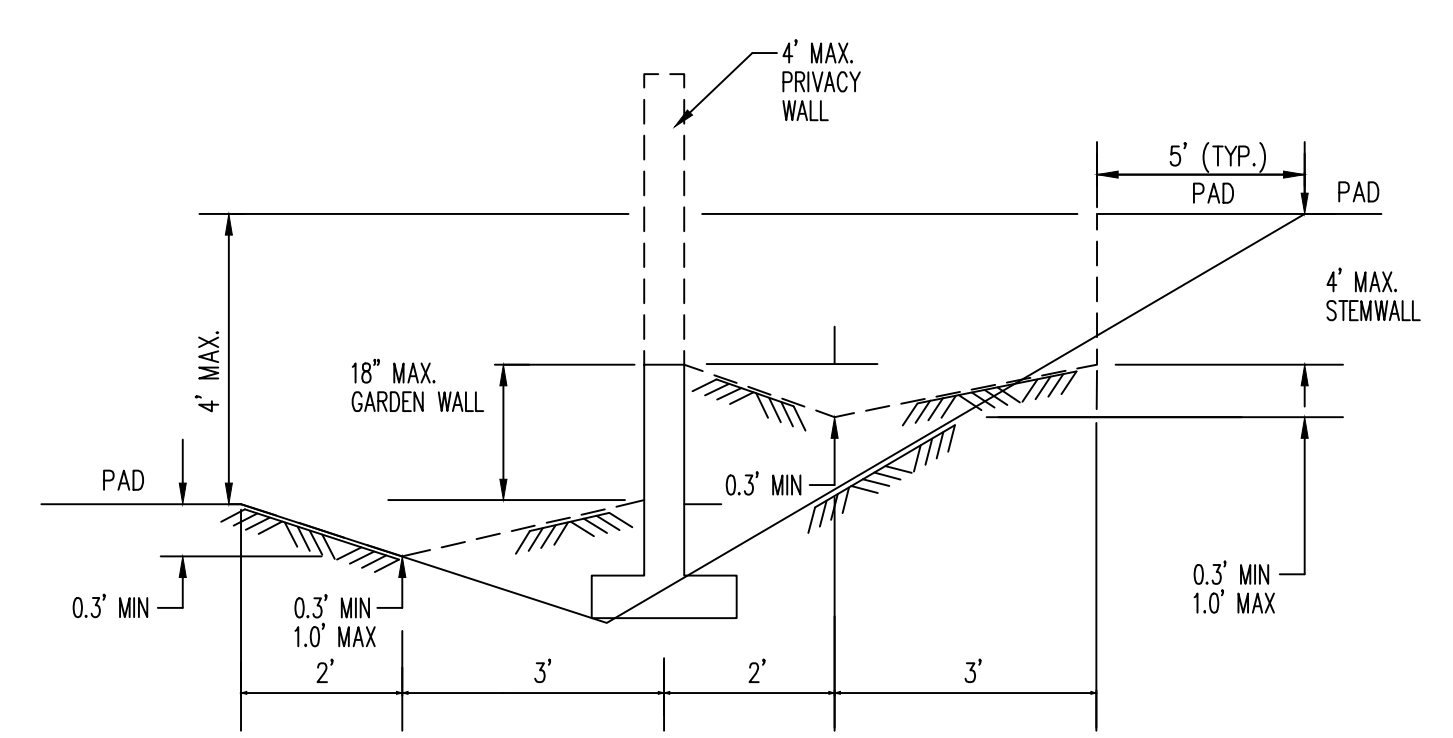
FOR WALL CROSS SECTIONS
SEE SHEET 7.



TW=FINISHED GRADE ELEVATION AT TOP OF RETAINING WALL
BW=FINISHED GRADE ELEVATION AT BOTTOM OF RETAINING WALL
TYPICAL RETAINING WALL NOMENCLATURE
NOT TO SCALE

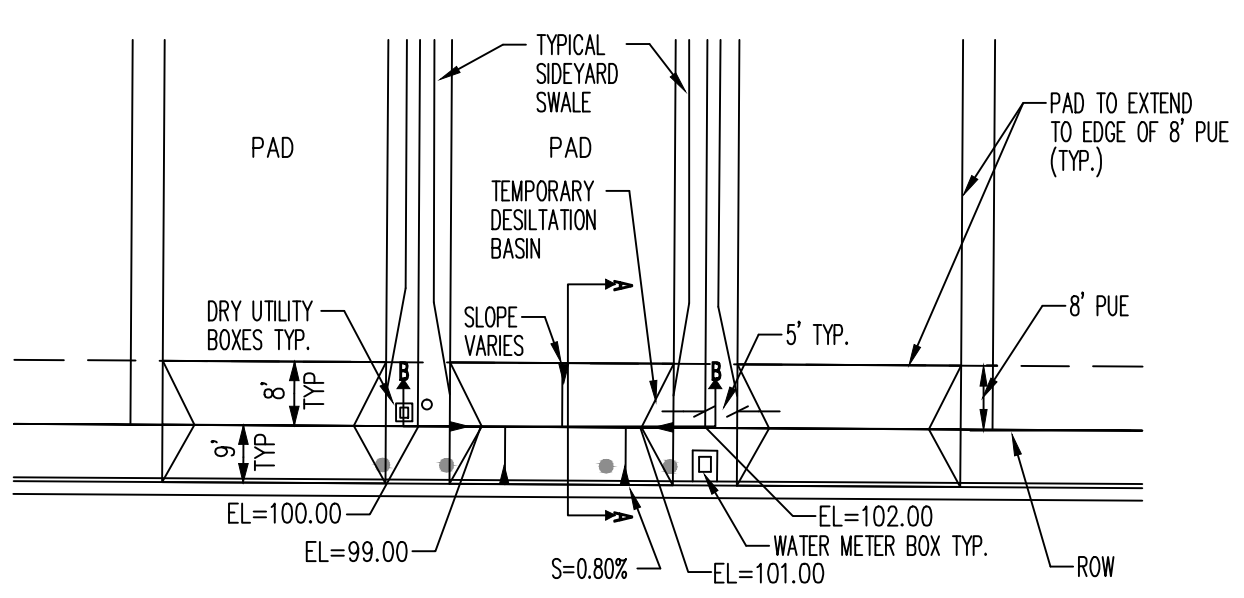
(RETAINING HEIGHT IS TAKEN TO BE DIFFERENCE IN FINISHED GRADES ON LEFT AND RIGHT SIDE OF WALL.)
HEIGHT IS IN ACCORDANCE WITH CITY COMPREHENSIVE ZONING CODE, SECTION 14-16-3-19, GENERAL HEIGHT AND DESIGN REGULATIONS FOR WALLS, FENCES, AND RETAINING WALLS.

- LEGEND**
- PROPOSED SPOT ELEVATION ● 5235.25
 - EXISTING SPOT ELEVATION ● EX 5235.25
 - PROPOSED CONTOUR - - - - - 5225
 - EXISTING STORM DRAIN LINE - - - - -
 - PROPOSED STORM DRAIN INLET □
 - PROPOSED STORM DRAIN MANHOLE ○
 - PROPOSED WATER BLOCK [Symbol]
 - RETAINING WALL [Symbol]
 - PAD [Symbol]
 - TURNED BLOCK [Symbol]
 - STREET SLOPE [Symbol]



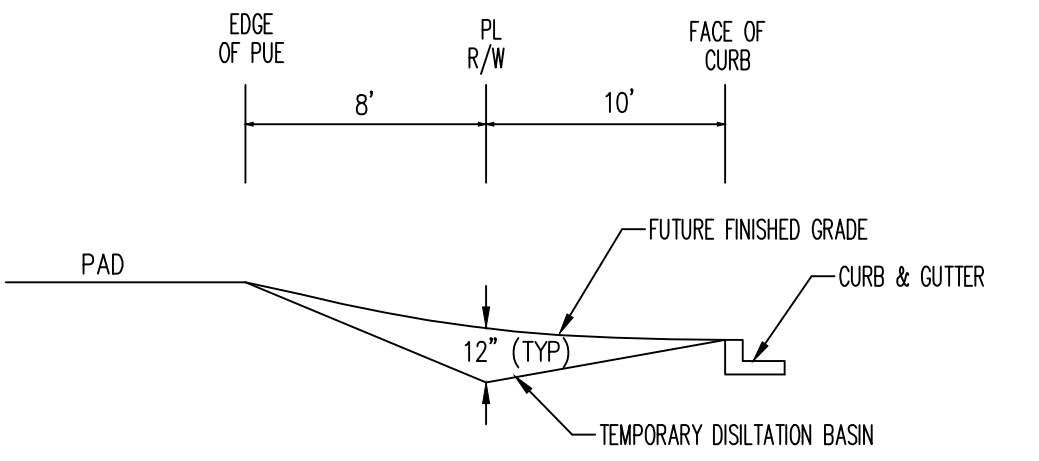
TYPICAL SIDE LOT LINE SECTION
NOT TO SCALE

NOTE: DASHED LINES IN TYP. SIDE LOT LINE SECTIONS REPRESENT THE FINAL CONDITION AFTER THE GARDEN, STEM, AND PRIVACY WALLS HAVE BEEN CONSTRUCTED. THE INTERIM CONDITION, WHICH IS TO BE CONSTRUCTED BY THE GRADING CONTRACTOR AND CERTIFIED BY THE ENGINEER, IS REPRESENTED BY THE SOLID LINES. RETAINING WALLS WILL BE CONSTRUCTED PRIOR TO GRADING CERTIFICATION.

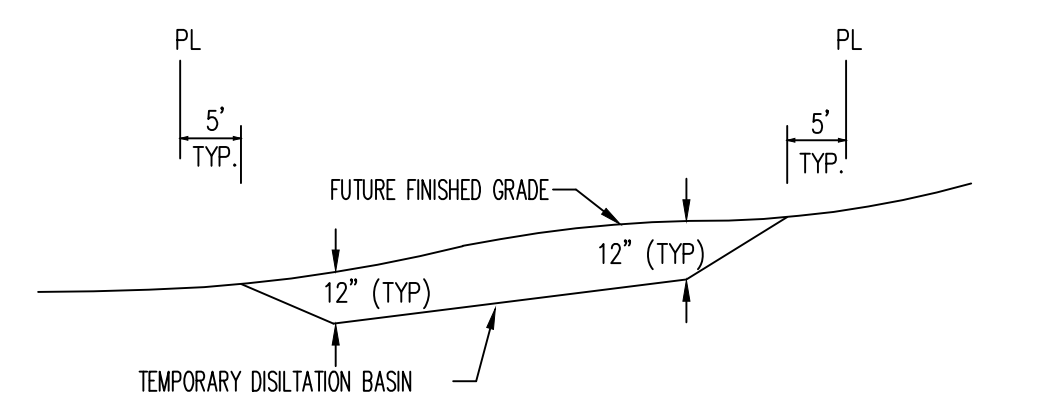


TEMPORARY DESILTATION BASIN
NOT TO SCALE

** BOTTOM OF BASIN IS 1' BELOW PROPERTY LINE ELEVATION SEE GRADING PLANS FOR EXACT ELEVATIONS



TEMPORARY DESILTATION SECTION A-A
NOT TO SCALE



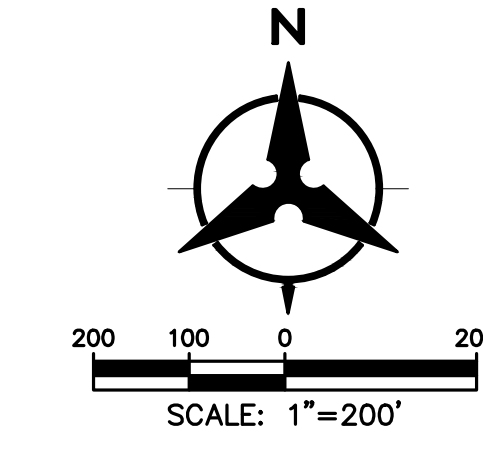
TEMPORARY DESILTATION SECTION B-B
NOT TO SCALE

GENERAL NOTES

- ALL WORK DETAILED ON THESE PLANS AND PERFORMED UNDER THIS CONTRACT SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE PROJECT SPECIFICATIONS AND THE PROJECT GEOTECHNICAL REPORT. WHERE APPLICABLE, CITY OF ALBUQUERQUE PUBLIC WORKS STANDARDS SHALL APPLY.
- THE CONTRACTOR SHALL ABIDE BY ALL LOCAL, STATE, AND FEDERAL LAWS, RULES AND REGULATIONS WHICH APPLY TO THE CONSTRUCTION OF THESE IMPROVEMENTS, INCLUDING EPA REQUIREMENTS WITH RESPECT TO STORM WATER DISCHARGE.
- PRIOR TO CONSTRUCTION, THE CONTRACTOR SHALL FIELD VERIFY THE HORIZONTAL AND VERTICAL LOCATIONS OF ALL POTENTIAL OBSTRUCTIONS INCLUDING ALL UNDERGROUND UTILITIES. SHOULD A CONFLICT EXIST, THE CONTRACTOR SHALL NOTIFY THE CONSTRUCTION OBSERVER OR ENGINEER SO THAT THE CONFLICT CAN BE RESOLVED WITH A MINIMUM AMOUNT OF DELAY.
- TWO (2) WORKING DAYS PRIOR TO ANY EXCAVATION, THE CONTRACTOR SHALL CONTACT LINE LOCATING SERVICE FOR LOCATION OF EXISTING UTILITIES.
- ALL ELECTRICAL, TELEPHONE, CABLE TV, GAS AND OTHER UTILITY LINES, CABLES, AND APPURTENANCES ENCOUNTERED DURING CONSTRUCTION THAT REQUIRE RELOCATION, SHALL BE COORDINATED WITH THAT UTILITY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR COORDINATION OF ALL NECESSARY UTILITY ADJUSTMENTS. NO ADDITIONAL COMPENSATION WILL BE ALLOWED FOR DELAYS OR INCONVENIENCES CAUSED BY UTILITY COMPANY WORK CREWS. THE CONTRACTOR MAY BE REQUIRED TO RESCHEDULE HIS ACTIVITIES TO ALLOW UTILITY CREWS TO PERFORM THEIR REQUIRED WORK.
- THE CONTRACTOR IS RESPONSIBLE FOR PROTECTING ALL EXISTING UTILITY LINES WITHIN THE CONSTRUCTION AREA. ANY DAMAGE TO EXISTING FACILITIES CAUSED BY CONSTRUCTION ACTIVITY SHALL BE REPAIRED OR REPLACED AT THE CONTRACTOR'S EXPENSE AND APPROVED BY THE CONSTRUCTION OBSERVER.
- CONSTRUCTION ACTIVITY SHALL BE LIMITED TO THE PROPERTY AND/OR PROJECT LIMITS. ANY DAMAGE TO ADJACENT PROPERTIES RESULTING FROM THE CONSTRUCTION PROCESS SHALL BE REPAIRED OR REPLACED AT THE CONTRACTOR'S EXPENSE.
- OVERNIGHT PARKING OF CONSTRUCTION EQUIPMENT SHALL NOT OBSTRUCT DRIVEWAYS OR DESIGNATED TRAFFIC LANES. THE CONTRACTOR SHALL NOT STORE ANY EQUIPMENT OR MATERIAL WITHIN THE PUBLIC RIGHT-OF-WAY.
- THE CONTRACTOR SHALL OBTAIN ALL THE NECESSARY PERMITS FOR THE PROJECT PRIOR TO COMMENCING CONSTRUCTION (I.E., BARRICADING, TOPSOIL DISTURBANCE, EXCAVATION PERMITS, EPA STORM WATER PERMITS, ETC.).
- ALL PROPERTY CORNERS DESTROYED DURING CONSTRUCTION SHALL BE REPLACED AT THE CONTRACTOR'S EXPENSE. ALL PROPERTY CORNERS MUST BE RESET BY A REGISTERED LAND SURVEYOR.
- THE CONTRACTOR SHALL PREPARE A CONSTRUCTION TRAFFIC CONTROL AND SIGNING PLAN AND OBTAIN APPROVAL OF SUCH PLAN FROM THE CITY OF ALBUQUERQUE, TRAFFIC ENGINEERING DEPARTMENT, PRIOR TO BEGINNING ANY CONSTRUCTION WORK ON OR ADJACENT TO EXISTING STREETS.
- ALL BARRICADES AND CONSTRUCTION SIGNING SHALL CONFORM TO APPLICABLE SECTIONS OF THE "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES" (MUTCD), US DEPARTMENT OF TRANSPORTATION, LATEST EDITION.
- THE CONTRACTOR SHALL MAINTAIN ALL CONSTRUCTION BARRICADES AND SIGNING AT ALL TIMES. THE CONTRACTOR SHALL VERIFY THE PROPER LOCATION OF ALL BARRICADING AT THE END AND BEGINNING OF EACH DAY.
- THE CONTRACTOR SHALL TAKE ALL STEPS NECESSARY TO CONFORM WITH EPA REQUIREMENTS, INCLUDING COMPLIANCE WITH NPDES PHASE 2 REQUIREMENTS.

GRADING NOTES

- EXCEPT AS PROVIDED HEREIN, GRADING SHALL BE PERFORMED AT THE ELEVATIONS AND IN ACCORDANCE WITH THE DETAILS SHOWN ON THIS PLAN.
- CONTRACTOR SHALL OBTAIN AND ABIDE BY A TOPSOIL DISTURBANCE PERMIT FROM THE CITY OF ALBUQUERQUE ENVIRONMENTAL HEALTH DIVISION, PRIOR TO CONSTRUCTION. THE COST FOR REQUIRED CONSTRUCTION DUST AND EROSION CONTROL MEASURES SHALL BE INCIDENTAL TO THE PROJECT COST. THE CONTRACTOR SHALL CONFORM TO ALL CITY, COUNTY, STATE, AND FEDERAL DUST CONTROL MEASURES AND REQUIREMENTS AND WILL BE RESPONSIBLE FOR PREPARING AND OBTAINING ALL NECESSARY APPLICATIONS AND APPROVALS.
- ALL WORK RELATIVE TO FOUNDATION CONSTRUCTION, SITE PREPARATION, AND PAVEMENT INSTALLATION, AS SHOWN ON THIS PLAN, SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE SOILS REPORT PREPARED BY XEIVAYARD DATED JULY 22, 2013. ALL OTHER WORK, UNLESS OTHERWISE STATED OR PROVIDED FOR HEREON, SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE PROJECT SPECIFICATIONS (FIRST PRIORITY), AND/OR THE CITY OF ALBUQUERQUE (COA) STANDARD SPECIFICATIONS FOR PUBLIC WORKS (SECOND PRIORITY).
- TWO WORKING DAYS PRIOR TO EXCAVATION, CONTRACTOR MUST CONTACT LINE LOCATING SERVICE (765-1264) FOR LOCATION OF EXISTING UTILITIES.
- PRIOR TO GRADING, ALL VEGETATION DEBRIS, AND NEAR SURFACE ORGANICALLY CONTAMINATED SOIL SHALL BE STRIPPED FROM ALL AREAS TO BE GRADED. VEGETATION AND DEBRIS SHALL BE DISPOSED OF OFF-SITE OR STOCK-PILED FOR USE IN PLANTERS AND NON-STRUCTURAL FILLS.
- EARTH SLOPES SHALL NOT EXCEED 4 HORIZONTAL TO 1 VERTICAL UNLESS SHOWN OTHERWISE.
- IT IS THE INTENT OF THESE PLANS THAT THIS CONTRACTOR SHALL NOT PERFORM ANY WORK OUTSIDE OF THE PROPERTY BOUNDARIES EXCEPT AS REQUIRED BY THIS PLAN.
- THE CONTRACTOR IS TO ENSURE THAT NO SOIL ERODES FROM THE SITE ONTO ADJACENT PROPERTY OR PUBLIC RIGHT-OF-WAY. THIS SHOULD BE ACHIEVED BY CONSTRUCTING TEMPORARY BERMS AT THE PROPERTY LINES MEETING THE SOIL TO PROTECT IT FROM WIND EROSION.
- A DISPOSAL SITE FOR ALL EXCESS EXCAVATION AND UNSUITABLE MATERIAL SHALL BE OBTAINED BY THE CONTRACTOR IN COMPLIANCE WITH APPLICABLE ENVIRONMENTAL REGULATIONS AND APPROVED BY THE OBSERVER. ALL COSTS INCURRED IN OBTAINING A DISPOSAL SITE AND HAUL THERE TO SHALL BE CONSIDERED INCIDENTAL TO THE PROJECT, AND NO SEPARATE MEASUREMENT OR PAYMENT SHALL BE MADE.
- PAVING AND ROADWAY GRADES SHALL BE +/- 0.1' FROM PLAN ELEVATIONS. PAD ELEVATION SHALL BE +/- 0.05' FROM BUILDING PLAN ELEVATIONS.
- ALL SPOT ELEVATIONS ARE TO FLOWLINE UNLESS OTHERWISE NOTED. VALLEY GUTTER ELEVATIONS ARE SHOWN AT FLOWLINE ELEVATION.



AS-BUILT INFORMATION		BENCH MARKS		SURVEY INFORMATION		ENGINEER'S SEAL	
CONTRACTOR	DATE	US&GS BRASS DISC STAMPED	REWARD	NO.	DATE	NO.	DATE
REWARD 1989		1548364.063	149190.819				
INSPECTOR'S STAKE BY	DATE	N.M. STATE PLANE COORDINATES (CENTRAL ZONE)	GROUND TO GRID = 0.999675005				
INSPECTOR'S FIELD VERIFICATION BY	DATE		DELTA ALPHA = -007172.26"				
INSPECTOR'S FIELD CORRECTED BY	DATE		NAVD 1988 ELEVATION = 5319.688				
				MICRO-FILM INFORMATION			
				RECORDED BY	NO.	DATE	DATE

NO.	DATE	REVISIONS
		DESIGN

DESIGNED BY	YPM	DATE 01/2016
DRAWN BY	AR	DATE 01/2016
CHECKED BY	YPM	DATE 01/2016

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	MO./DAY/YR.	MO./DAY/YR.

CITY PROJECT NO.	ZONE MAP NO.	SHEET	OF
		1	7

Bohannon & Huston
www.bhinc.com 800.877.5332

CITY OF ALBUQUERQUE
DEPARTMENT OF MUNICIPAL DEVELOPMENT

DEL WEBB @ MIREHAVEN PHASE 2
OVERALL GRADING PLAN

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	MO./DAY/YR.	MO./DAY/YR.



LEGEND

PROPOSED SPOT ELEVATION	● 5235.25
EXISTING SPOT ELEVATION	● EX 5235.25
PROPOSED CONTOUR	— 5225 —
EXISTING STORM DRAIN LINE	- - - - -
PROPOSED STORM DRAIN INLET	□
PROPOSED STORM DRAIN LINE	▬▬▬▬▬
PROPOSED STORM DRAIN MANHOLE	○
PROPOSED WATER BLOCK	⌞
RETAINING WALL	▬▬▬▬▬
PAD	▭
TURNED BLOCK	TB
STREET SLOPE	XX

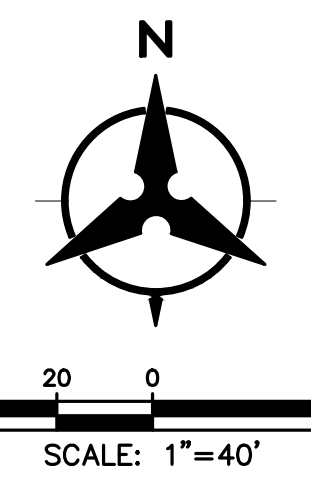
CONTRACTOR SHALL INSTALL 7' WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 158 TO PEDESTRIAN TRAIL BETWEEN LOTS 166/167, AN 8' WIDE 1' DEEP SWALE FROM LOT 167 TO THE PEDESTRIAN TRAIL BETWEEN LOTS 174/175 AND A 12' WIDE 1.5' DEEP SWALE FROM LOT 175 TO POND WEST OF WILLOW CANYON.

CONTRACTOR SHALL INSTALL 8' WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 1 TO POND BEHIND LOT 15.

CONTRACTOR SHALL INSTALL 7' WIDE 1' DEEP SWALE ALONG THE BACKSIDE OF LOT 23 TO LOT 27 AND FROM THE POND AT LOT 16 TO LOT 22.

SWALE LOCATION VARIES BEHIND LOTS 9-11 AND 172-174. SEE PLAN FOR LOCATION

SWALE SHALL BE 12" OF 95% COMPACTION WITH FILTER FABRIC AND 1" TO 2" FRACTURED COBBLE



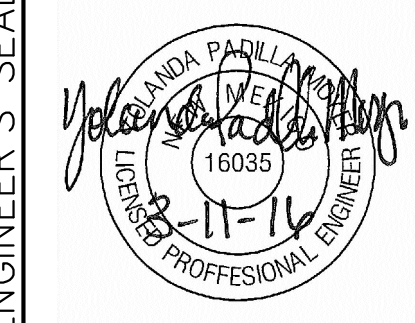
Bohannon & Huston
www.bhinc.com 800.877.5332

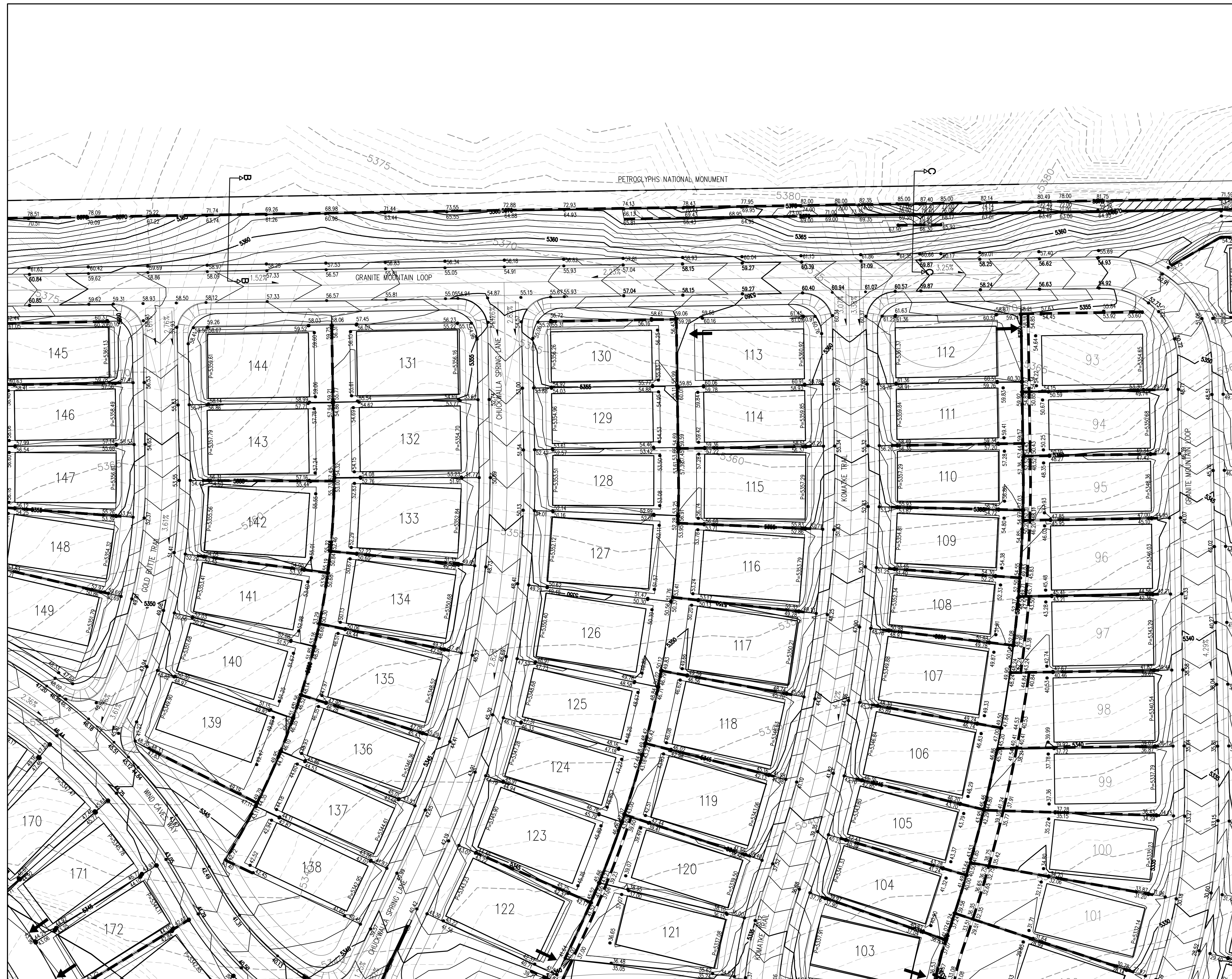
CITY OF ALBUQUERQUE
DEPARTMENT OF MUNICIPAL DEVELOPMENT

DEL WEBB @ MIREHAVEN PHASE 2
GRADING PLAN

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	MO./DAY/YR.	MO./DAY/YR.
LAST DESIGN UPDATE			
CITY PROJECT NO.	ZONE MAP NO.	SHEET	OF
		2	7

AS-BUILT INFORMATION		BENCH MARKS		SURVEY INFORMATION		FIELD NOTES	
CONTRACTOR	DATE	US&GS BRASS DISC STAMPED "REWARD 1969"	DATE	NO.	BY	NO.	DATE
STAKED BY	DATE	GEOGRAPHIC POSITION (NAD 83)	DATE				
INSPECTOR'S FIELD VERIFICATION BY	DATE	N.M. STATE PLANE COORDINATES (CENTRAL ZONE)	DATE				
FIELD VERIFICATION BY	DATE	N=1487364.063 E=1491190.819	DATE				
CORRECTED BY	DATE	GROUND TO GRID = 0.999675005	DATE				
		DELTA ALPHA = -0071712.26"	DATE				
		NAVD 1988 ELEVATION = 5319.668	DATE				
			DATE				





LEGEND

- PROPOSED SPOT ELEVATION: ● 5235.25
- EXISTING SPOT ELEVATION: ● EX 5235.25
- PROPOSED CONTOUR: --- 5225
- EXISTING STORM DRAIN LINE: --- --- ---
- PROPOSED STORM DRAIN INLET: □
- PROPOSED STORM DRAIN LINE: |||
- PROPOSED STORM DRAIN MANHOLE: ○
- PROPOSED WATER BLOCK: ~~~~~
- RETAINING WALL: ———
- PAD: 10
- TURNED BLOCK: TB
- STREET SLOPE: XX

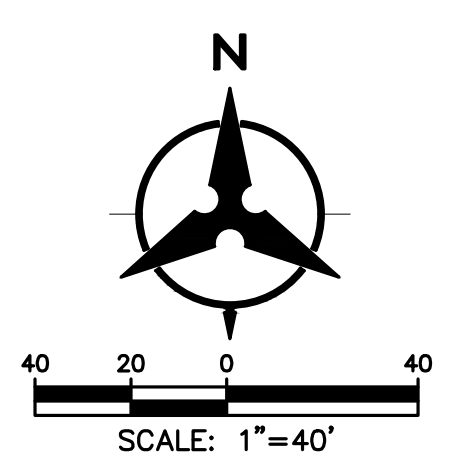
CONTRACTOR SHALL INSTALL 7" WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 159 TO PEDESTRIAN TRAIL BETWEEN LOTS 166/167. AN 8" WIDE 1' DEEP SWALE FROM LOT 167 TO THE PEDESTRIAN TRAIL BETWEEN LOTS 174/175 AND A 12" WIDE 1.5' DEEP SWALE FROM LOT 175 TO POND WEST OF WILLOW CANYON.

CONTRACTOR SHALL INSTALL 8" WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 1 TO POND BEHIND LOT 15.

CONTRACTOR SHALL INSTALL 7" WIDE 1' DEEP SWALE ALONG THE BACKSIDE OF LOT 23 TO LOT 27 AND FROM THE POND AT LOT 16 TO LOT 22.

SWALE LOCATION VARIES BEHIND LOTS 9-11 AND 172-174. SEE PLAN FOR LOCATION

SWALE SHALL BE 12" OF 95% COMPACTION WITH FILTER FABRIC AND 1" TO 2" FRACTURED COBBLE



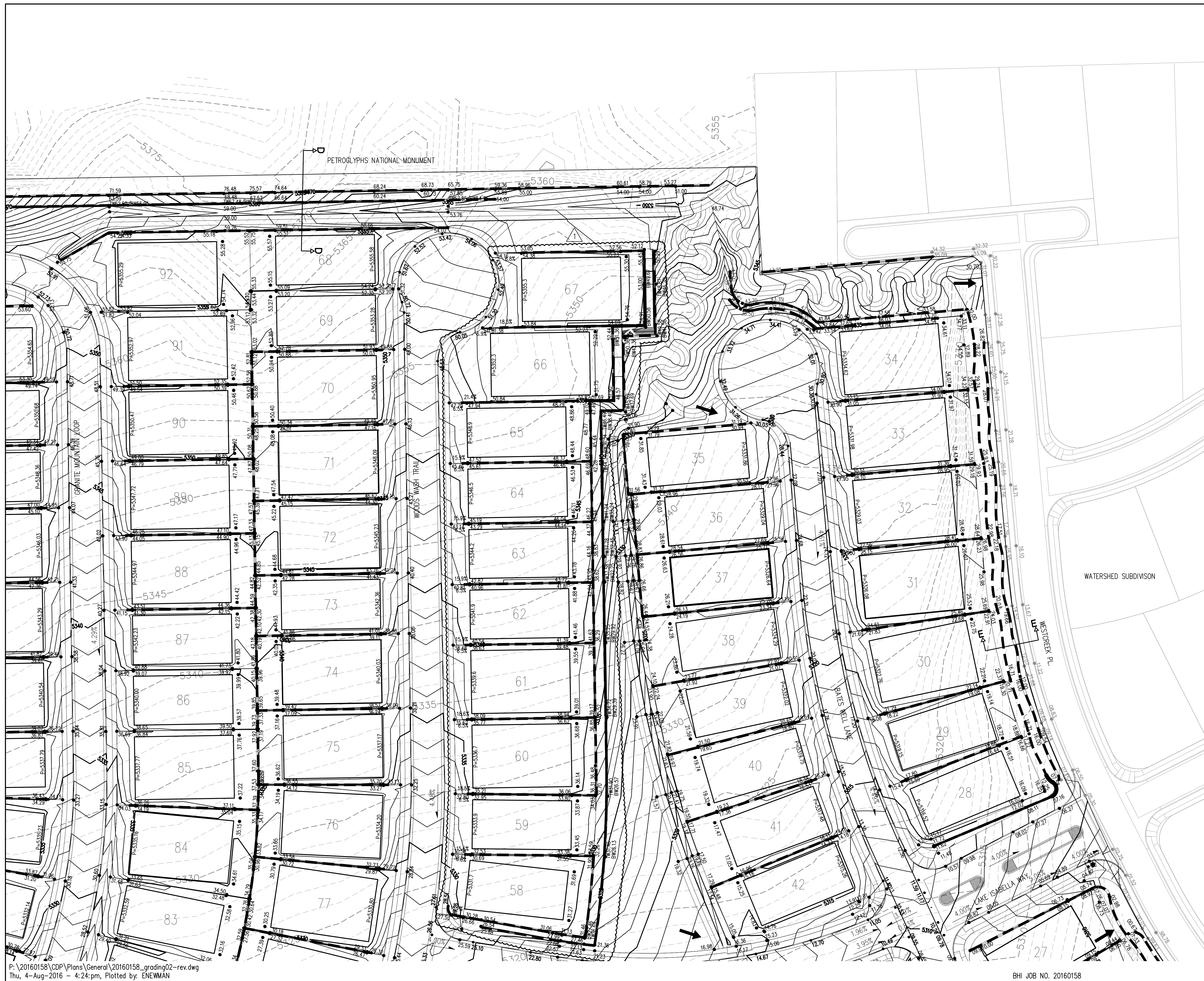
Bohannon & Huston
www.bhinc.com 800.877.5332

CITY OF ALBUQUERQUE
DEPARTMENT OF MUNICIPAL DEVELOPMENT
DEL WEBB @ MIREHAVEN PHASE 2
GRADING PLAN

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	MO./DAY/YR.	MO./DAY/YR.
LAST DESIGN UPDATE			
DESIGNED BY: YPM	DATE: 01/2016	CHECKED BY: YPM	DATE: 01/2016
DRAWN BY: AR	DATE: 01/2016	CHECKED BY: YPM	DATE: 01/2016

BENCH MARKS		AS-BUILT INFORMATION	
US&GS BRASS DISC STAMPED "REWARD 1969"	CONTRACTOR STAKED BY	DATE	DATE
GEOGRAPHIC POSITION (NAD 83)	INSPECTOR'S FIELD VERIFICATION BY	DATE	DATE
N.M. STATE PLANE COORDINATES (CENTRAL ZONE)	FIELD VERIFICATION BY	DATE	DATE
N=1487364.063 E=1491190.819	CORRECTED BY	DATE	DATE
GROUND TO GRID = 0.999675005	MICRO-FILM INFORMATION	DATE	DATE
DELTA ALPHA = -007712.26"	RECORDED BY	DATE	DATE
NAVD 1988 ELEVATION = 5319.668	NO.	NO.	NO.
SURVEY INFORMATION		FIELD NOTES	
NO.	BY	NO.	BY
REMARKS		REVISIONS	
DESIGN		DESIGN	
NO.	DATE	BY	DATE

P: \\20160158\CDP\Plans\General\20160158_grading02.dwg
Tue, 15-Mar-2016 - 4:47:pm, Plotted by: YPADILLA



LEGEND

- PROPOSED SPOT ELEVATION ● 5235.25
- EXISTING SPOT ELEVATION ● EX 5235.25
- PROPOSED CONTOUR - - - - - 5225
- EXISTING STORM DRAIN LINE - - - - -
- PROPOSED STORM DRAIN INLET □
- PROPOSED STORM DRAIN LINE |||
- PROPOSED STORM DRAIN MANHOLE ○
- PROPOSED WATER BLOCK ~~~~~
- RETAINING WALL - - - - -
- PAD 10
P=5300.00
- TURNED BLOCK TB
- STREET SLOPE XX

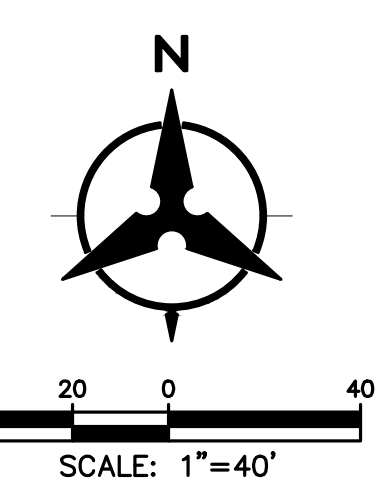
CONTRACTOR SHALL INSTALL 7" WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 158 TO PEDESTRIAN TRAIL BETWEEN LOTS 166/167. AN 8" WIDE 1' DEEP SWALE FROM LOT 167 TO THE PEDESTRIAN TRAIL BETWEEN LOTS 174/175 AND A 12" WIDE 1.5' DEEP SWALE FROM LOT 175 TO POND WEST OF WILLOW CANYON.

CONTRACTOR SHALL INSTALL 8" WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 1 TO POND BEHIND LOT 15.

CONTRACTOR SHALL INSTALL 7" WIDE 1' DEEP SWALE ALONG THE BACKSIDE OF LOT 23 TO LOT 27 AND FROM THE POND AT LOT 16 TO LOT 22.

SWALE LOCATION VARIES BEHIND LOTS 9-11 AND 172-174. SEE PLAN FOR LOCATION

SWALE SHALL BE 12" OF 95% COMPACTION WITH FILTER FABRIC AND 1" TO 2" FRACTURED COBBLE



Bohannon & Huston
www.bhinc.com 800.877.5332

CITY OF ALBUQUERQUE
DEPARTMENT OF MUNICIPAL DEVELOPMENT

DEL WEBB @ MIREHAVEN PHASE 2
GRADING PLAN

DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	MO./DAY/YR.	MO./DAY/YR.
CITY PROJECT NO.		ZONE MAP NO.	SHEET 4 OF 7

BENCH MARKS		SURVEY INFORMATION		ENGINEER'S SEAL		AS-BUILT INFORMATION	
US&GS BRASS DISC STAMPED "REWARD 1969"	CONTRACTOR MARKED BY	NO.	DATE		CONTRACTOR	DATE	DATE
GEOGRAPHIC POSITION (NAD 83)	INSPECTOR'S ACCEPTANCE BY	BY	DATE		REMARKS	DATE	DATE
N.M. STATE PLANE COORDINATES (CENTRAL ZONE)	VERIFICATION BY	REVISIONS	BY	DESIGN	DATE01/2016	DATE01/2016	DATE
N=1487364.063 E=1491190.819	DRAWN BY	DESIGN	BY	CHECKED BY	DATE01/2016	DATE01/2016	DATE
GROUND TO GRID = 0.999675005	DATE						DATE
DELTA ALPHA = -007712.26'							DATE
NAVD 1988 ELEVATION = 5319.688							DATE

P:\20160158\CDP\Plans\General\20160158_grading02-rev.dwg
Thu, 4-Aug-2016 - 4:24:pm, Plotted by: ENEWMAN



LEGEND

PROPOSED SPOT ELEVATION	● 5235.25
EXISTING SPOT ELEVATION	● EX 5235.25
PROPOSED CONTOUR	— 5235
EXISTING STORM DRAIN LINE	— — — —
PROPOSED STORM DRAIN INLET	□
PROPOSED STORM DRAIN LINE	▬▬▬▬▬▬
PROPOSED STORM DRAIN MANHOLE	○
PROPOSED WATER BLOCK	⊞
RETAINING WALL	— — — — —
PAD	10 P=5300.00
TURNED BLOCK	TB
STREET SLOPE	XX

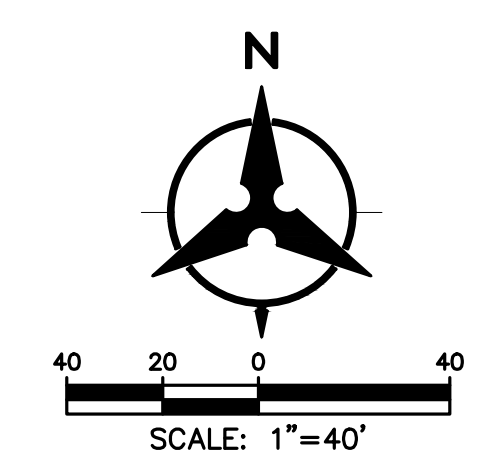
CONTRACTOR SHALL INSTALL 7' WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 158 TO PEDESTRIAN TRAIL BETWEEN LOTS 166/167. AN 8' WIDE 1' DEEP SWALE FROM LOT 167 TO THE PEDESTRIAN TRAIL BETWEEN LOTS 174/175 AND A 12' WIDE 1.5' DEEP SWALE FROM LOT 175 TO POND WEST OF WILLOW CANYON.

CONTRACTOR SHALL INSTALL 8' WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 1 TO POND BEHIND LOT 15.

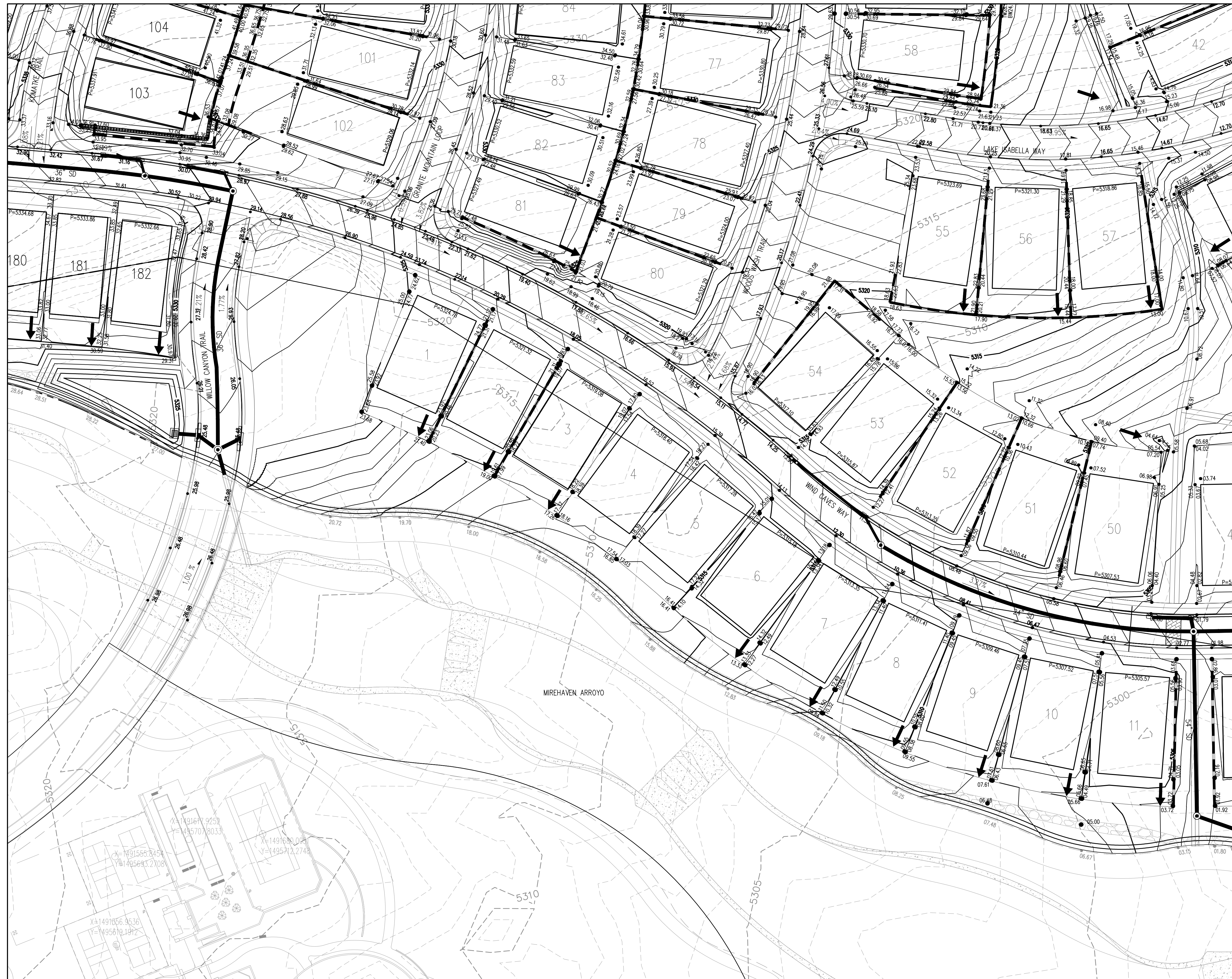
CONTRACTOR SHALL INSTALL 7' WIDE 1' DEEP SWALE ALONG THE BACKSIDE OF LOT 23 TO LOT 27 AND FROM THE POND AT LOT 16 TO LOT 22.

SWALE LOCATION VARIES BEHIND LOTS 9-11 AND 172-174. SEE PLAN FOR LOCATION

SWALE SHALL BE 12" OF 95% COMPACTION WITH FILTER FABRIC AND 1" TO 2" FRACTURED COBBLE.



AS-BUILT INFORMATION		BENCH MARKS		SURVEY INFORMATION		ENGINEER'S SEAL	
CONTRACTOR	REWARD 1989	US&GS BRASS DISC STAMPED		NO.	DATE		DESIGNED BY: YPM DRAWN BY: AR CHECKED BY: YPM
STAKED BY		GEOGRAPHIC POSITION (NAD 83)		BY	DATE		
INSPECTOR'S FIELD VERIFICATION BY		N.M. STATE PLANE COORDINATES (CENTRAL ZONE)		REMARKS	REVISIONS		DATE 01/2016 DATE 01/2016 DATE 01/2016
DATE		GROUND TO GRID = 0.999675005		DESIGN			
DATE		DELTA ALPHA = -0071712.26"				CITY OF ALBUQUERQUE DEPARTMENT OF MUNICIPAL DEVELOPMENT DEL WEBB @ MIREHAVEN PHASE 2 GRADING PLAN	
DATE		NAVD 1988 ELEVATION = 5319.688				DESIGN REVIEW COMMITTEE CITY ENGINEER APPROVAL	MO./DAY/YR. MO./DAY/YR.
						LAST DESIGN UPDATE	SHEET 5 OF 7
						CITY PROJECT NO. ZONE MAP NO.	BHI JOB NO. 20160158



LEGEND

- PROPOSED SPOT ELEVATION ● 5235.25
- EXISTING SPOT ELEVATION ● EX 5235.25
- PROPOSED CONTOUR --- 5225
- EXISTING STORM DRAIN LINE - - - - -
- PROPOSED STORM DRAIN INLET □
- PROPOSED STORM DRAIN LINE = = = = =
- PROPOSED STORM DRAIN MANHOLE ○
- PROPOSED WATER BLOCK ~ ~ ~ ~ ~
- RETAINING WALL [Symbol]
- PAD [Symbol]
- TURNED BLOCK [Symbol]
- STREET SLOPE XX

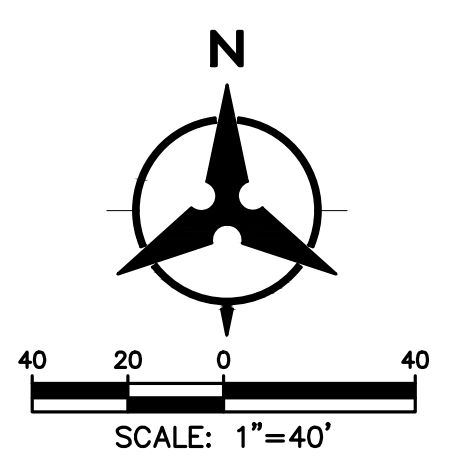
CONTRACTOR SHALL INSTALL 7" WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 158 TO PEDESTRIAN TRAIL BETWEEN LOTS 166/167. AN 8" WIDE 1' DEEP SWALE FROM LOT 167 TO THE PEDESTRIAN TRAIL BETWEEN LOTS 174/175 AND A 12" WIDE 1.5' DEEP SWALE FROM LOT 175 TO POND WEST OF WILLOW CANYON.

CONTRACTOR SHALL INSTALL 8" WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 1 TO POND BEHIND LOT 15.

CONTRACTOR SHALL INSTALL 7" WIDE 1' DEEP SWALE ALONG THE BACKSIDE OF LOT 23 TO LOT 27 AND FROM THE POND AT LOT 16 TO LOT 22.

SWALE LOCATION VARIES BEHIND LOTS 9-11 AND T12-T14. SEE PLAN FOR LOCATION

SWALE SHALL BE 12" OF 95% COMPACTION WITH FILTER FABRIC AND 1" TO 2" FRACTURED COBBLE



ENGINEER'S SEAL		SURVEY INFORMATION		BENCH MARKS		AS-BUILT INFORMATION	
NO.	DATE	NO.	DATE	US&GS BRASS DISC STAMPED "REWARD 1969"	CONTRACTOR	DATE	DATE
				GEOGRAPHIC POSITION (NAD 83) <td>STAKED BY <td></td> <td></td> </td>	STAKED BY <td></td> <td></td>		
				N.M. STATE PLANE COORDINATES (CENTRAL ZONE) <td>INSPECTOR'S FIELD VERIFICATION BY <td></td> <td></td> </td>	INSPECTOR'S FIELD VERIFICATION BY <td></td> <td></td>		
				N=1487364.063 E=1491190.819 <td>DATE <td></td> <td></td> </td>	DATE <td></td> <td></td>		
				GROUND TO GRID = 0.999675005 <td>DATE <td></td> <td></td> </td>	DATE <td></td> <td></td>		
				DELTA ALPHA = -007172.26" <td>CORRECTED BY <td></td> <td></td> </td>	CORRECTED BY <td></td> <td></td>		
				NAVD 1988 ELEVATION = 5319.668 <td>DATE <td></td> <td></td> </td>	DATE <td></td> <td></td>		
					NO.		

NO.	DATE	REMARKS
		DESIGN
		REVISIONS

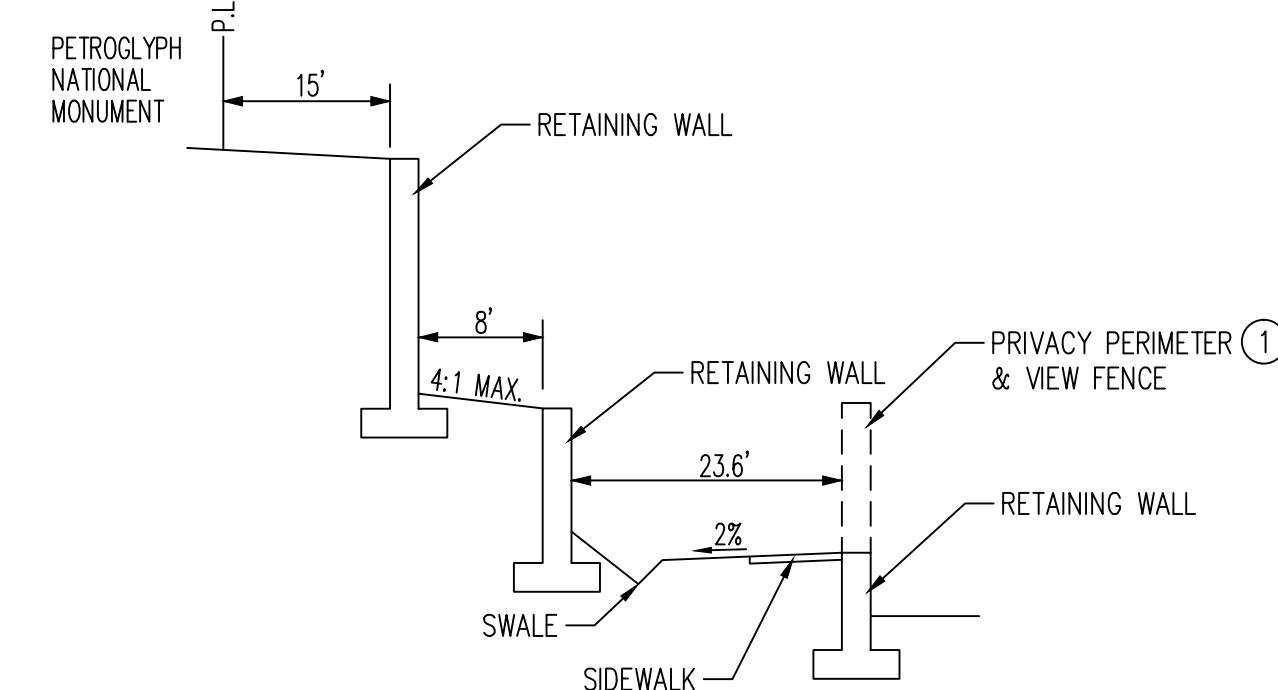
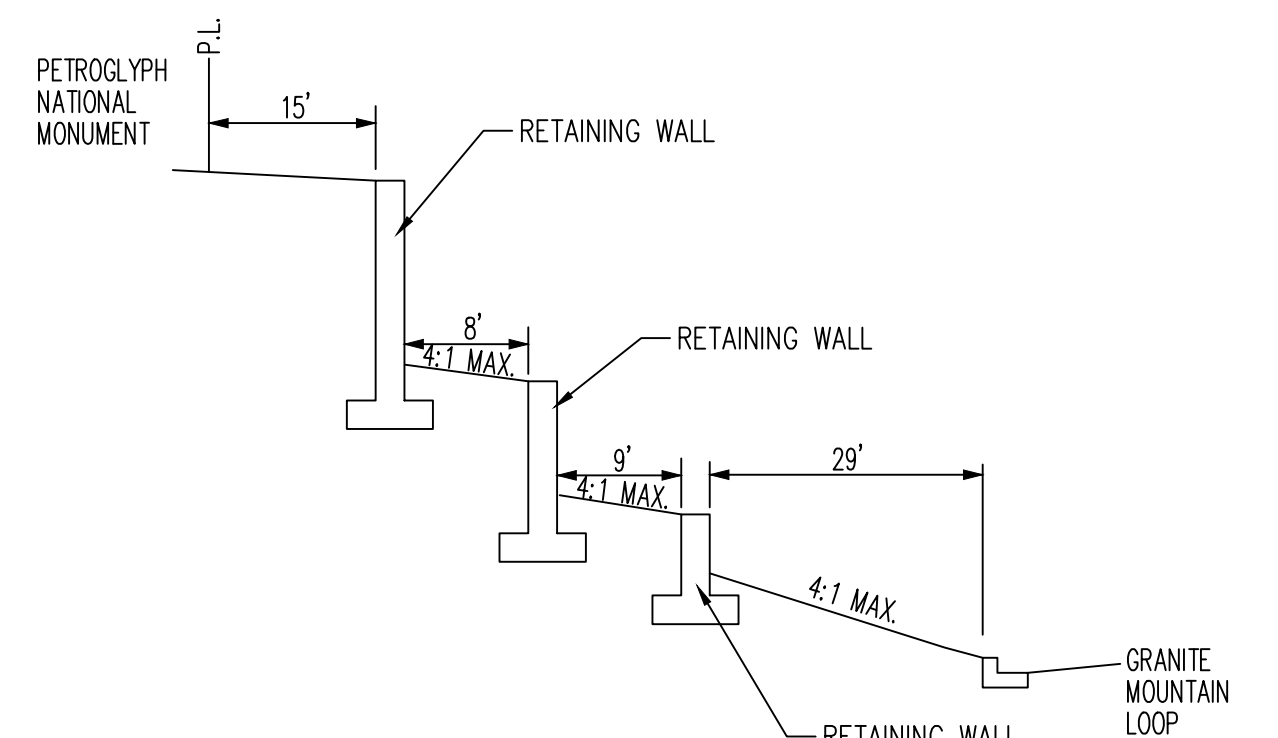
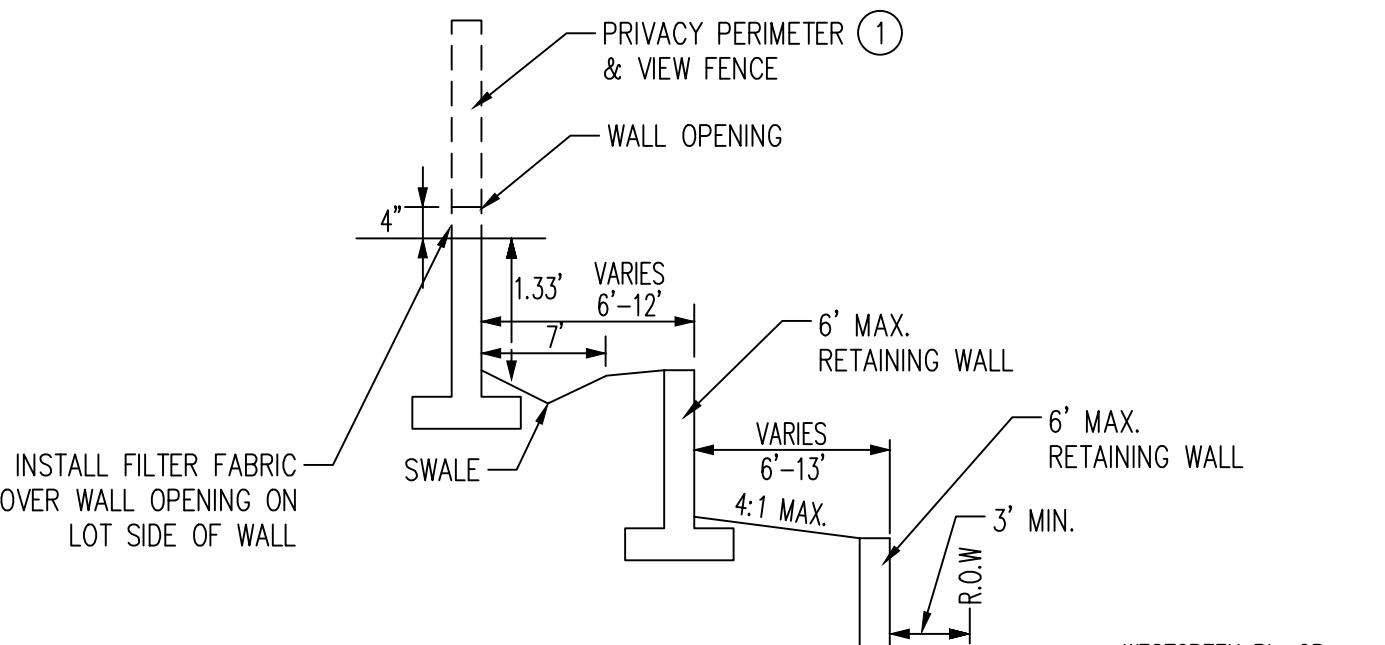
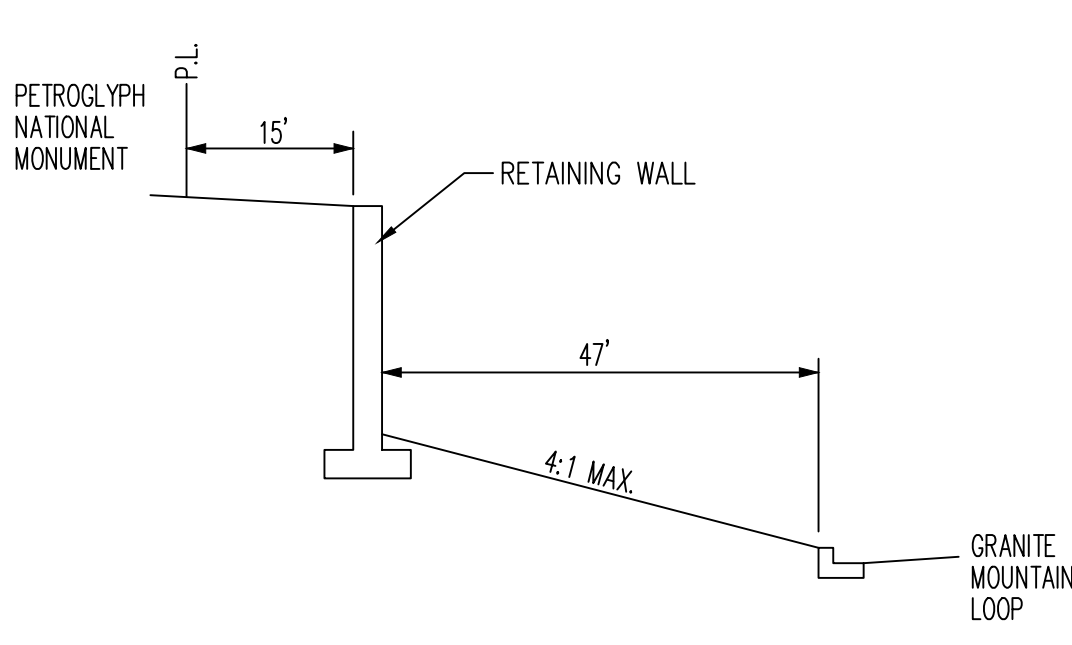
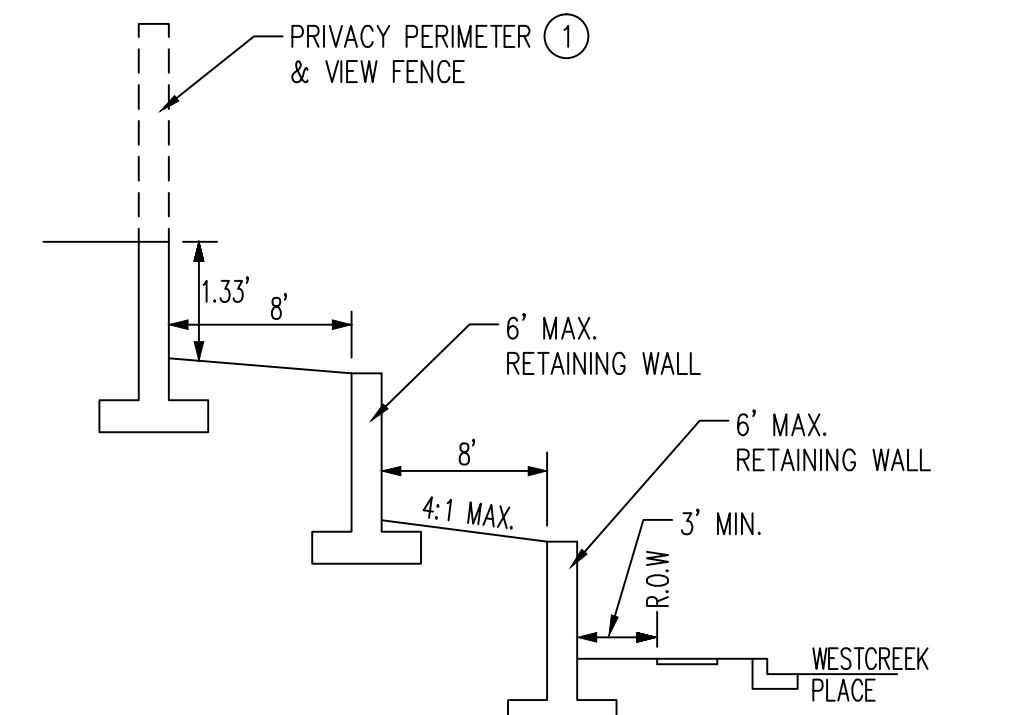
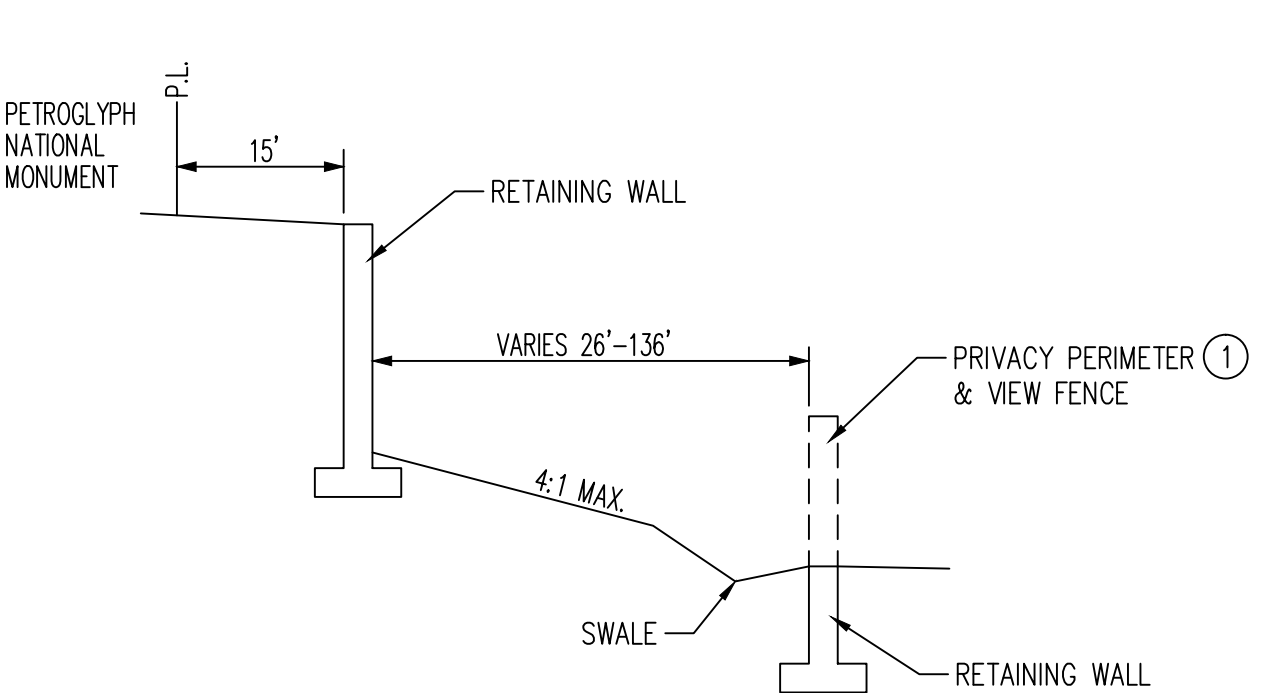
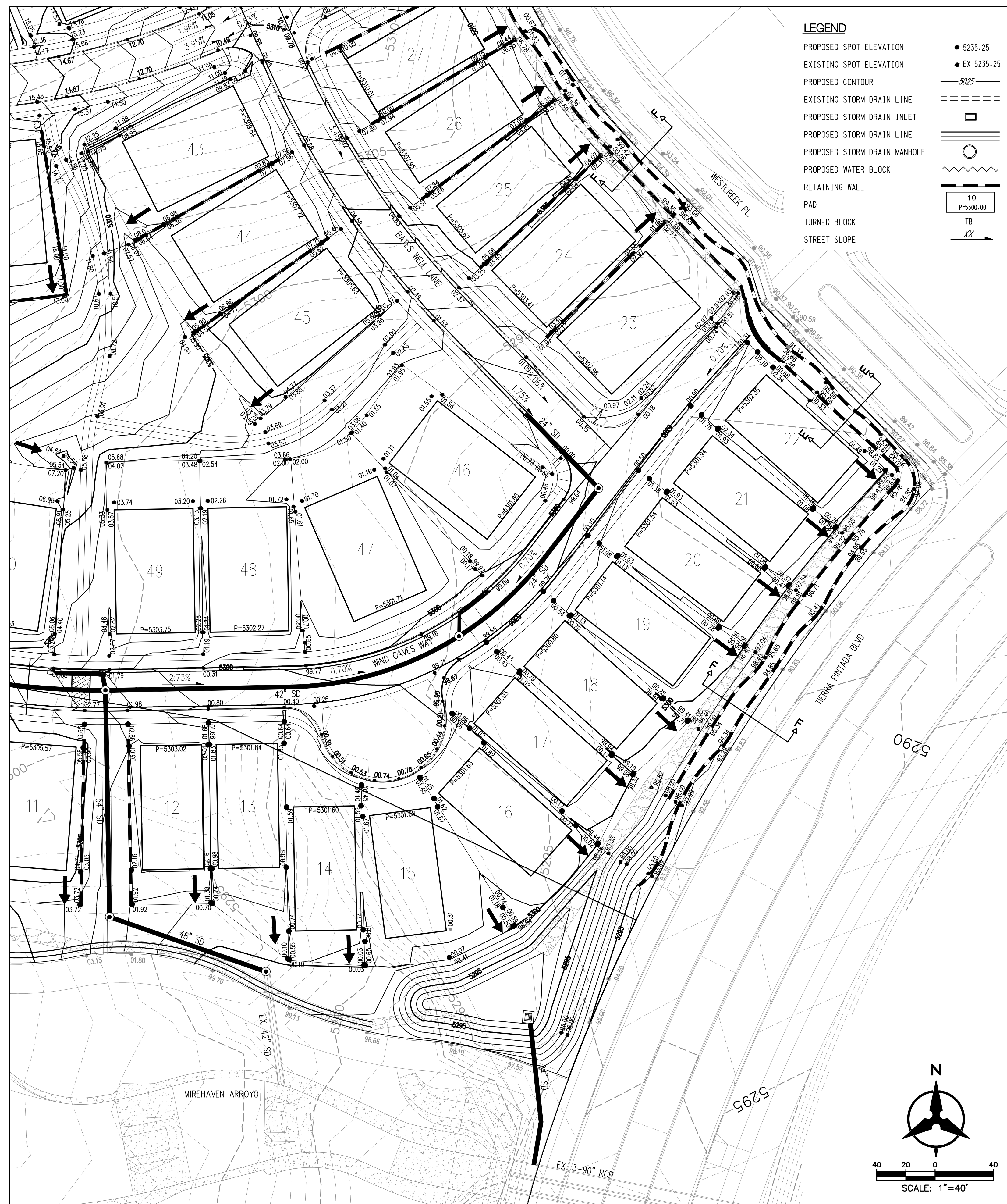
DESIGNED BY: YPM	DATE: 01/2016
DRAWN BY: AR	DATE: 01/2016
CHECKED BY: YPM	DATE: 01/2016

CITY PROJECT NO.		ZONE MAP NO.	SHEET 6 OF 7
------------------	--	--------------	--------------

Bohannon & Huston
www.bhinc.com 800.877.5332

CITY OF ALBUQUERQUE
DEPARTMENT OF MUNICIPAL DEVELOPMENT

DEL WEBB @ MIREHAVEN PHASE 2
GRADING PLAN



CONTRACTOR SHALL INSTALL 7' WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 158 TO PEDESTRIAN TRAIL BETWEEN LOTS 166/167, AN 8' WIDE 1' DEEP SWALE FROM LOT 167 TO THE PEDESTRIAN TRAIL BETWEEN LOTS 174/175 AND A 12' WIDE 1.5' DEEP SWALE FROM LOT 175 TO POND WEST OF WILLOW CANYON.

CONTRACTOR SHALL INSTALL 8' WIDE 1' DEEP SWALE ALONG THE NORTHSIDE OF MIREHAVEN ARROYO MAINTENANCE ROAD FROM LOT 1 TO POND BEHIND LOT 15.

CONTRACTOR SHALL INSTALL 7' WIDE 1' DEEP SWALE ALONG THE BACKSIDE OF LOT 23 TO LOT 27 AND FROM THE POND AT LOT 16 TO LOT 22.

SWALE LOCATION VARIES BEHIND LOTS 9-11 AND 172-174. SEE PLAN FOR LOCATION

SWALE SHALL BE 12" OF 95% COMPACTION WITH FILTER FABRIC AND 1" TO 2" FRACTURED COBBLE

KEYED NOTE

① PRIVACY WALL HEIGHT WILL BE 4'-5' IF PRIVATE SIDE GRADE IS HIGHER (4' MAX) THAN ADJACENT PUBLIC SIDE GRADE, FOR A TOTAL OF 8' MAX WALL FROM THE PUBLIC SIDE. PRIVACY WALL WILL BE 6' MAX. IF PRIVATE SIDE GRADE IS LOWER THAN ADJACENT PUBLIC GRADE.

BENCH MARKS		AS-BUILT INFORMATION	
US&GS BRASS DISC STAMPED "REWARD 1969"	CONTRACTOR DATE		
GEOGRAPHIC POSITION (NAD 83)	STAKED BY DATE		
N.M. STATE PLANE COORDINATES (CENTRAL ZONE)	INSPECTOR'S DATE		
N=1487364.063 E=1491190.819	FIELD VERIFICATION BY DATE		
GROUND TO GRID = 0.999675005	CORRECTED BY DATE		
DELTA ALPHA = -0071712.26"	MICRO-FILM INFORMATION		
NAVD 1988 ELEVATION = 5319.688	RECORDED BY DATE		
	NO.		
SURVEY INFORMATION		FIELD NOTES	
	DATE		
	BY		
	NO.		
ENGINEER'S SEAL			
	REVISIONS	DATE	BY
	DESIGN	01/2016	YPM
		01/2016	AR
		01/2016	YPM
CITY OF ALBUQUERQUE DEPARTMENT OF MUNICIPAL DEVELOPMENT DEL WEBB @ MIREHAVEN PHASE 2 GRADING PLAN			
DESIGN REVIEW COMMITTEE	CITY ENGINEER APPROVAL	MO./DAY/YR.	MO./DAY/YR.
CITY PROJECT NO.	ZONE MAP NO.	SHEET	OF
		7	7