

CITY OF ALBUQUERQUE

PLANNING DEPARTMENT – Development Review Services



Richard J. Berry, Mayor

January
~~December~~ 4, 2017

Ac 1/4/17

Mr. Philip W. Clark, P.E.
Clark Consulting Engineers
19 Ryan Rd.
Edgewood, NM 87015

RE: **Signal Pointe Subdivision**
Release of Financial Guarantee Certification
Engineer's Stamp Date 7-21-2016 (File: C20D0070)

Dear Mr. Clark:

Based upon the information provided in your submittal received 9-20-2016 (electronic copy received 7-21-2016), the above referenced Grading and Drainage Plan is approved for Release of Financial Guarantee. The conditions described in the Pad Certification are satisfied (turn blocks).

PO Box 1293

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

Albuquerque

Sincerely,

New Mexico 87103

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

www.cabq.gov

Orig: Drainage file

See Pad Cert
for Hard File

CITY OF ALBUQUERQUE

PLANNING DEPARTMENT – Development Review Services



Richard J. Berry, Mayor

November 3, 2016

Mr. Philip W. Clark, P.E.
Clark Consulting Engineers
19 Ryan Rd.
Edgewood, NM 87015

RE: **Signal Pointe Subdivision**
Pad Certification – All Pads
Engineer's Stamp Date 7-21-2016 (File: C20D0070)

Dear Mr. Clark:

Based upon the information provided in your submittal received 9-20-2016 (electronic copy received 7-21-2016), the above referenced Grading and Drainage Plan is approved for Pad Certification of all Pads within the subdivision with the following condition:

PO Box 1293

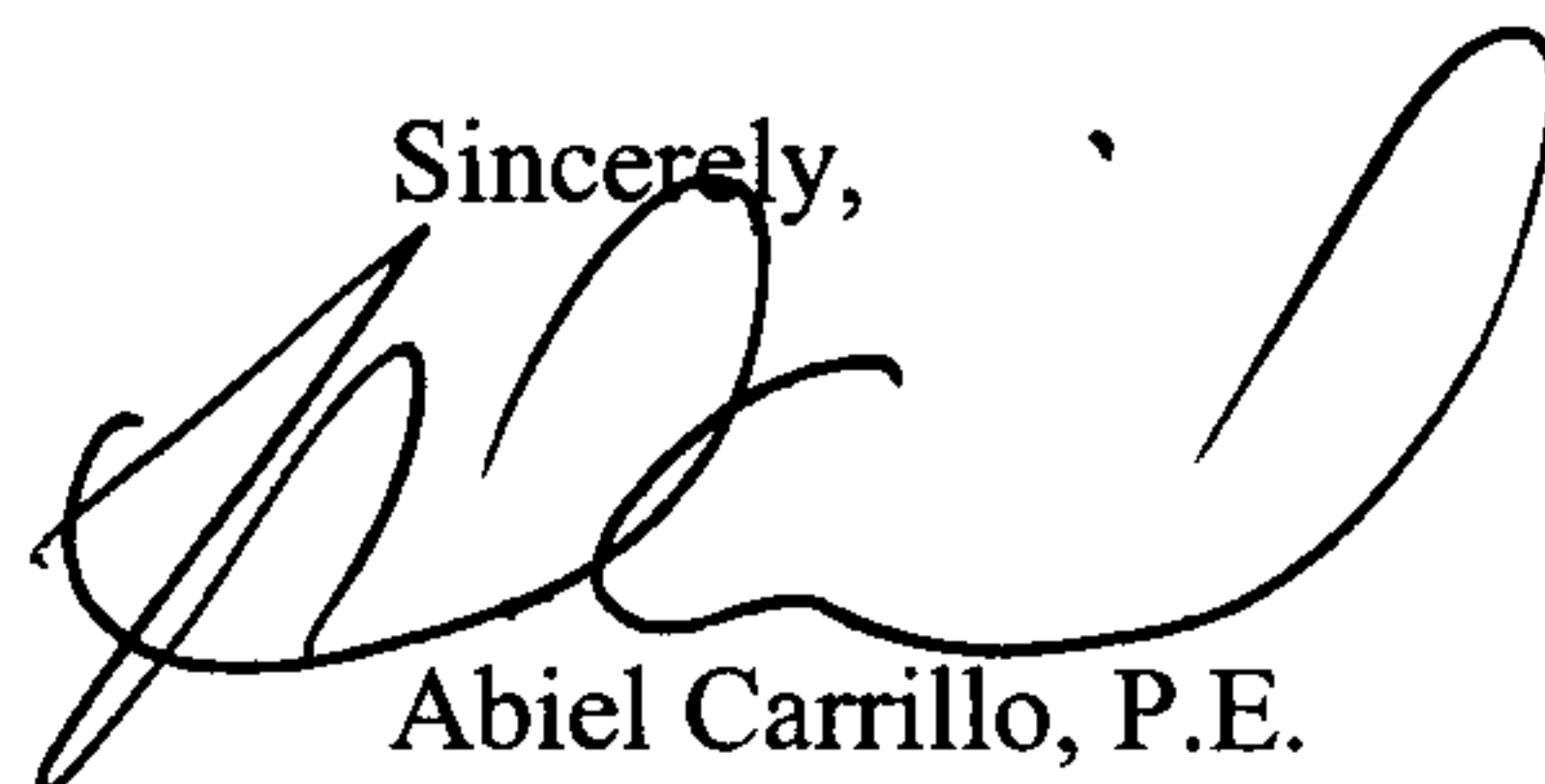
Albuquerque

New Mexico 87103

1. The turn blocks were not incorporated into the western wall, as an outlet for the water quality pond. This has the potential to adversely affect the home that is currently under construction on Lot 5 when the subdivision is built out. This will need to be addressed before any further action on this subdivision is approved (final plat, ROFG, future building permits).

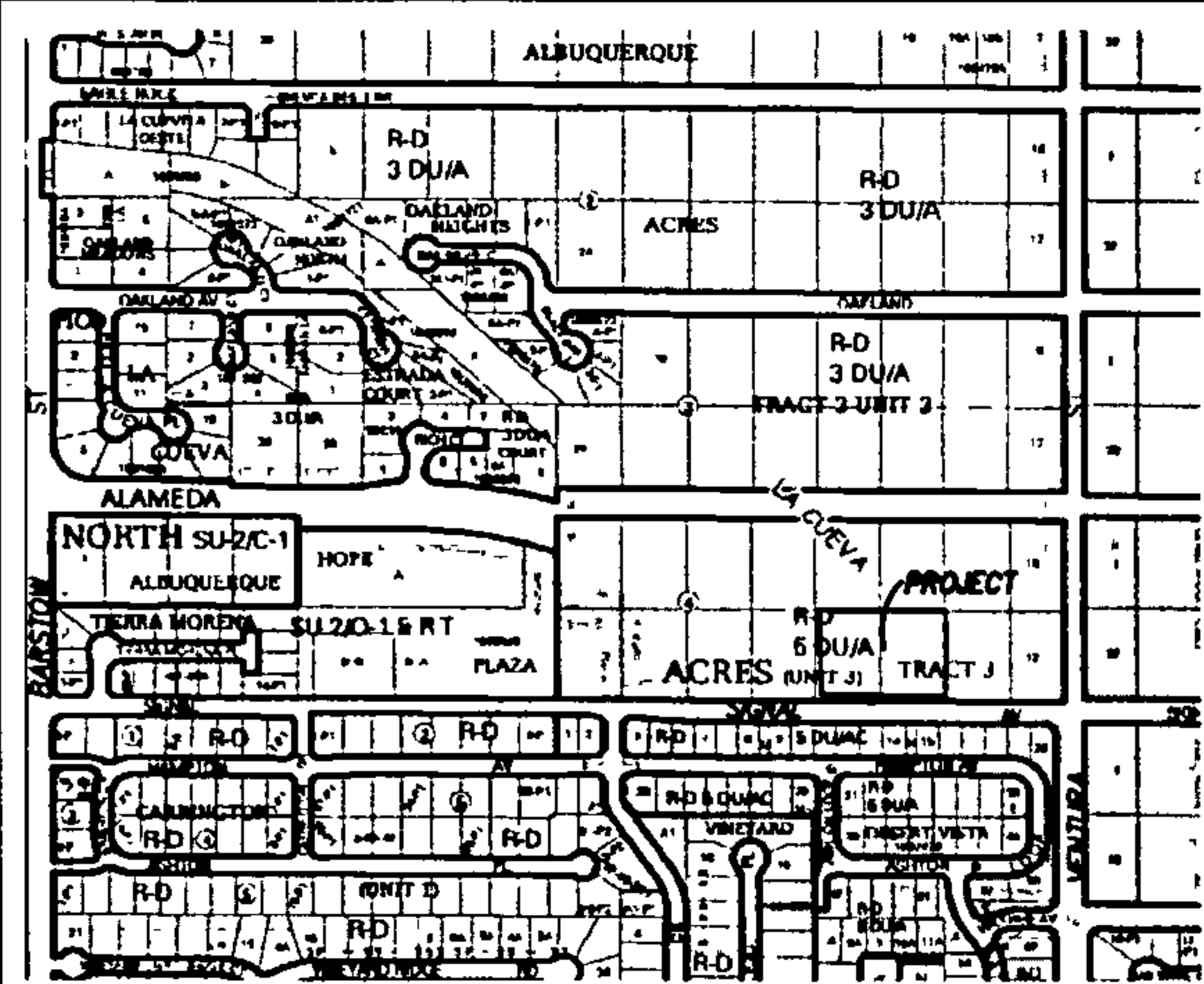
If you have any questions you can contact me at 924-3986.

www.cabq.gov

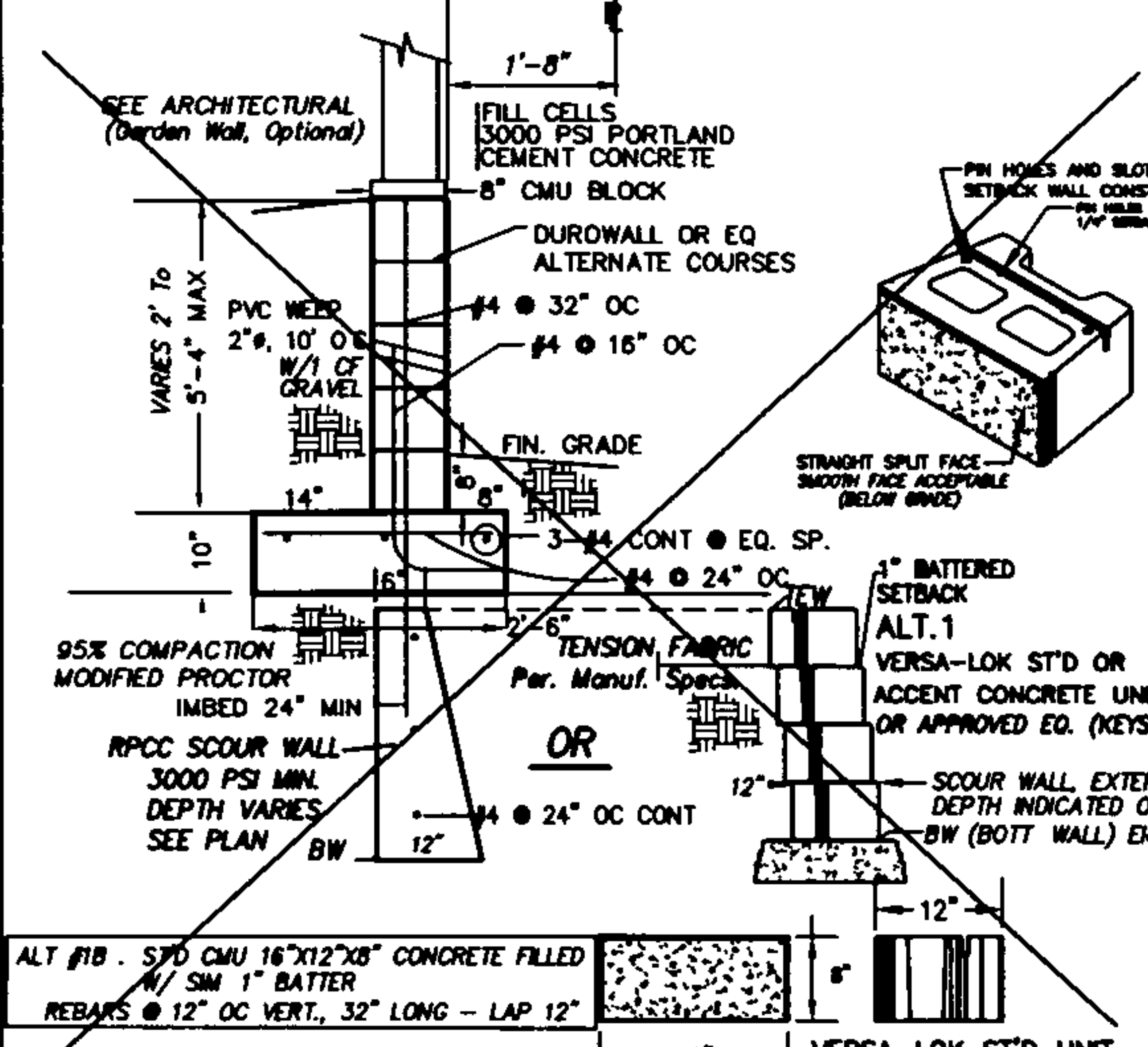
Sincerely,


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

Orig: Drainage file



VICINITY MAP



CMU RETAINING WALL / SCOUR WALL SECT. A

DELETED, SEE 10/26/15 SECTIONS & AS-BUILT CERT. 3/3/16

DESIGN CRITERIA
HYDROLOGIC METHODS PER SECTION 22.2, HYDROLOGY OF THE DEVELOPMENT PROCESS MANUAL (DPM) REVISED JANUARY 1993 FOR CITY OF ALBUQUERQUE, ADOPTED BY THE COUNTY OF BERNALILLO
DISCHARGE RATE: $Q = OPEAK \times AREA$, "Peak Discharge Rates For Small Watersheds"
VOLUMETRIC DISCHARGE: $VOLUME = E_{weighted} \times AREA$
 $P100 = 2.60$ inches, Zone 3 Time of Concentration, $TC = 10$ Minutes
DESIGN STORM: 100-YEAR/6-HOUR, 10-YEAR/6-HOUR [] = 10 YEAR VALUES

HISTORIC CONDITIONS PER EXIST. LOT
PROJECT AREA = 0.85 ACRES, WHERE EXCESS PRECIP. "Weighted" = 0.66 in. [0.19]
PEAK DISCHARGE, $Q100 = 1.8$ CFS [1.06], WHERE UNIT PEAK DISCHARGE "A" = 1.9 CFS/AC. [0.60]
THEREFORE: $VOLUME 100 = 2132$ OF [614]

DEVELOPED CONDITIONS DETERMINE LAND TREATMENTS, PEAK DISCHARGE AND VOLUMETRIC DISCHARGE FOR STUDY AREA

AREA	LAND TREATMENT	Q_{Peak}	E
UNDEVELOPED	0.0X AC. A	1.87 [0.58]	0.66 [0.19]
LANDSCAPING	0.29 AC. (17%) B	2.60 [1.19]	0.92 [0.36]
COMPACTED SOIL & Slopes >	0.29 AC. (16%) C	3.45 [2.00]	1.29 [0.62]
ROOF - PAVEMENT	1.20 AC. (67%) D	5.02 [3.39]	2.36 [1.50]

THEREFORE $E_{weighted} = 1.95$ in. [1.16] &
 $Q100 = 7.75$ CFS
 $Q10 = 5.0$ CFS

UNIT DISCHARGE = 7.75 CFS/1.78 AC. = 4.35 CFS/AC

CALC. 1ST FLUSH, $P(4-6MO.) = 0.6"$ Per Table 2 Water Qual. Storm
PRO-RATE: $7/20 = 0.35 \times 0.09 = 0.03 + 0.27 = 0.3$ INCHES $\times 1.78$ (43560/12) = 1830 CF

UPSTREAM ANALYSIS - SEE HEC-RAS WATER SURFACE MODEL OF LA CUEVA, ON FILE WITH CITY HYDROLOGY (Rev. C-20/035)
(REVISED 11.8.12)
PER RTI STUDY, $Q100 = 3080$ CFS AT VENTURA ST. (SEE LOMR2012)

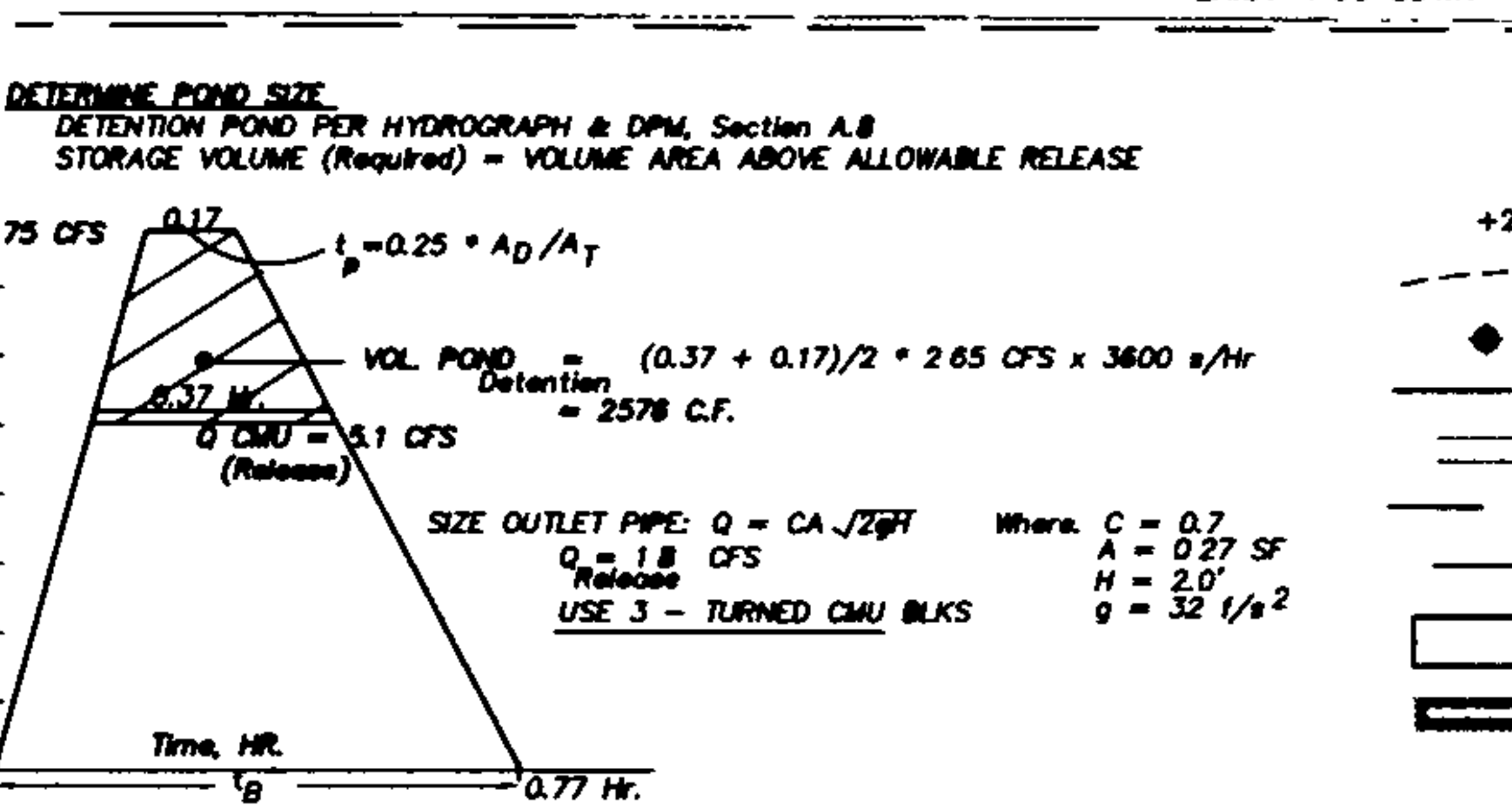
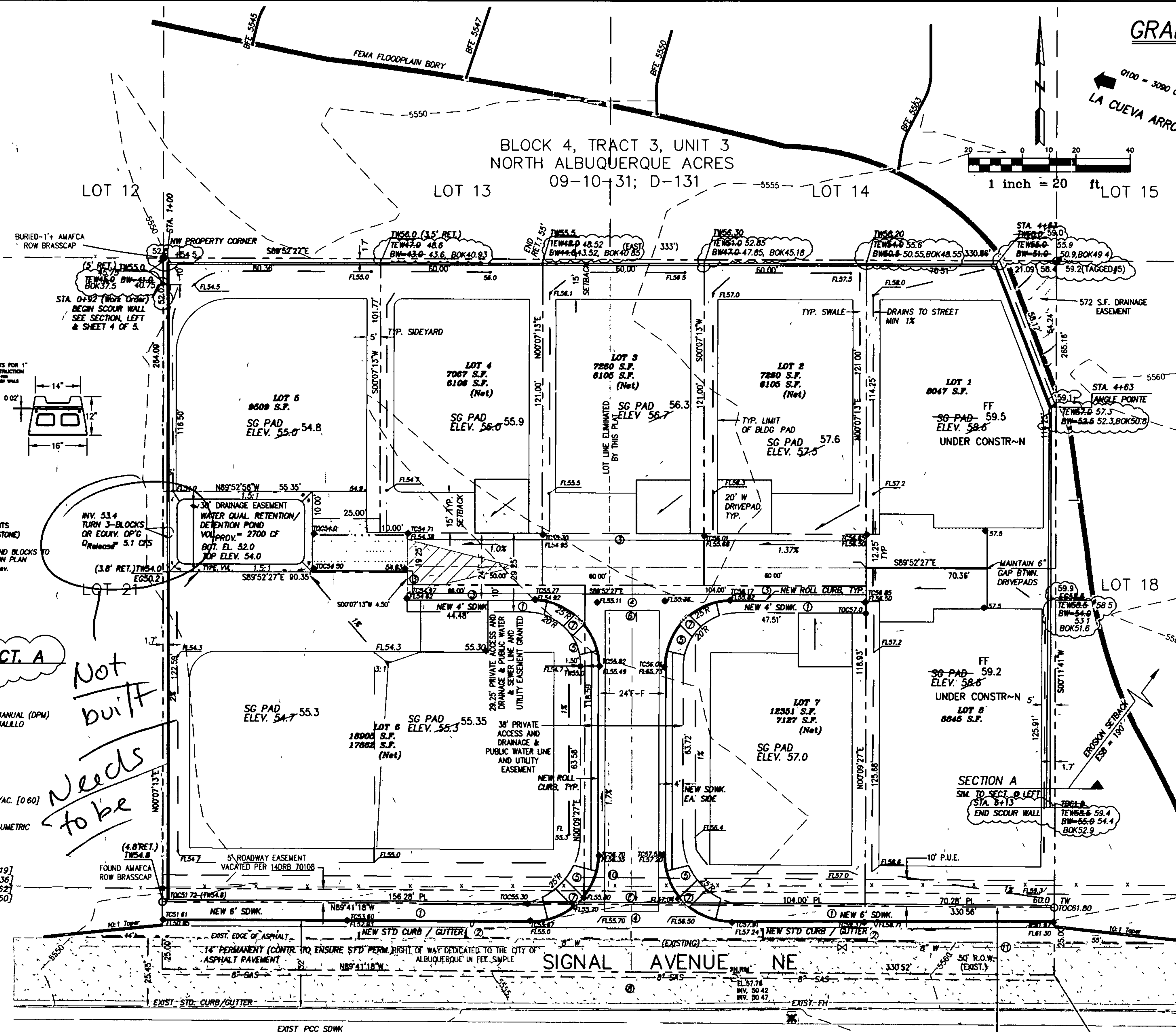
EROSION SET BACK ANALYSIS - PER SEDIMENT EROSION DESIGN GUIDE (SEDG)
 $Q100 = 3080$ CFS... LA CUEVA ARROYO
 $Q10 = 220$ CFS
 $Q5 = 100$ CFS
 $Q2 = 50$ CFS

LAMDA = $(0.8 + 4.0 \log Q10) / W$ = 718 FEET BANK SETBACK = LAMDA/4 = 179 FEET
CENTER LINE SETBACK = $858 + W/2 = 190$ FEET

THEREFORE: EROSION CONTROL IMPROVEMENTS REQUIRED - PER DISCUSSION WITH CITY AND AMAFCA CONSTRUCT SCOUR WALL ON EAST/NORTH SIDES OF DEVELOPMENT

CLASSIFICATION AND GRADATION OF RIPRAP

TYPE	SIZE	PERCENT	PERCENT
70-100	9	9	9
50-70	4	4	4
35-50	2	2	2
2-10			



LEGEND
EXIST. SPOT ELEVATION
EXIST. CONTOUR
NEW SPOT ELEVATION
NEW CONTOUR
EXIST. CURB & GUTTER
NEW SWALE
DRAINAGE DIRECTION
NEW P.C.C. CONCRETE
NEW RIPRAP, BURIED
SG AS BUILT 58.0' 54.8' / SPOT EL. +
TOP OF WALL, BEARING
BOTTOM ELEV. OF SCOUR WALL
BOTT. OF KEY (SEE SHT S1)
BASE FLOOD ELEVATION (SEE FEMA
REVSD MAP NOV. 08, 2012)
FLOWLINE
EXIST. GRADE
SUBGRADE
FINISH FLOOR/FORM
NOTE

KEYED NOTE(S)
1. NEW PCC SDWK PER COA STD 2430.
2. NEW STD CURB/GUTTER PER COA STD 2415A.
3. NEW ROLL CURB PER COA STD 2415A.
4. BUILD NEW PRIVATE ENTRANCE PER COA STD 2420 AND 2026.
5. NEW PCC WHEEL CHAIR RAMP PER COA STD 2441.
6. PROVIDE 3' WIDE ADA PATHWAY, 2% MAX. CROSS SLOPE W/ TRUNCATED DOMES.

PROJECT DATA
LEGAL DESCRIPTION
LOTS 19 & 20, BLOCK 4, TRACT 3, UNIT 3
NORTH ALBUQUERQUE ACRES, ALBUQUERQUE, NEW MEXICO
PROJECT BENCHMARK
THE BASIS OF ELEVATIONS FOR THIS SURVEY IS ACS BENCHMARK
7-018, ELEVATION OF WHICH IS 5485.72. BENCHMARK IS LOCATED
AT THE INTERSECTION OF BARSTON ST. AND MODESTO AVE.
TOPOGRAPHIC DESIGN SURVEY
COMPILED BY CLARK CONSULTING ENGINEERS FROM DESIGN SURVEY
BY PHILIP W. TURNER P.S., DATED JULY 2014

GRADING & DRAINAGE PLAN

THE RESIDENTIAL HOME PROJECT IS LOCATED IN UNIT 3 OF NORTH ALBUQUERQUE ACRES, APPROXIMATELY 11 MILES FROM THE DOWNTOWN CORE OF ALBUQUERQUE, NM. THE GRADING AND DRAINAGE SCHEME HEREON IS IN COMPLIANCE WITH THE BERNALILLO COUNTY FLOOD HAZARD ORDINANCE, NO. 88-46, AND CITY STORM DRAINAGE ORDINANCE. THE PLAN IS REQUIRED IN ORDER TO FACILITATE THE OWNER'S REQUEST FOR BUILDING PERMIT. THE PLAN SHOWS:

- EXISTING CONTOURS, SPOT ELEVATIONS, AND EXISTING DRAINAGE PATTERNS.
- PROPOSED IMPROVEMENTS: A RESIDENTIAL HOME PAD SITES, NEW PERIMETER SOLID WALL, CONCRETE DRIVEWAYS, AND NEW GRADE ELEVATIONS.
- CONTINUITY BETWEEN EXISTING AND PROPOSED ELEVATIONS.
- QUANTIFICATION AND ACCEPTANCE OF UPSTREAM OFFSITE FLOWS WHICH CONTRIBUTE TO THE DEVELOPED FLOWS GENERATED BY THE IMPROVEMENTS.
- UPSTREAM ANALYSIS AS TO WATER SURFACE MODEL AND EROSION SETBACK.

THE PURPOSE OF THE PLAN IS TO ESTABLISH CRITERIA FOR CONTROLLING STORM RUNOFF AND EROSION, AND ESSENTIALLY ALLOWING HISTORIC FLOWS TO CONTINUE TO DRAIN THROUGH THE PROPERTY. PRESENTLY, THE SITE IS BOUNDED ON THE EAST, WEST AND NORTH BY UNDEVELOPED PROPERTY. SIGNAL AVENUE ON THE SOUTH IS AN IMPROVED, ASPHALT ROADWAY ALONG THE PROJECT FRONTAGE. THE SITE GENERALLY FALLS FROM EAST TO WEST AT APPROX. 3.5 PERCENT. ALL OFFSITE FLOWS ARE QUANTIFIED ON THE PLAN, AND ADDRESSED IN THE CALCULATIONS.

A PORTION OF THE SITE IS ENCOMBERED BY A DESIGNATED FEMA FLOODPLAIN.

HISTORICAL SITE RUNOFF OUTFALL LOCATIONS WILL REMAIN UNCHANGED IN DEVELOPMENT, SINCE SIGNAL AVE IS IMPROVED MINIMAL GRADING IS PROPOSED WITHIN THE CITY R.O.W. FREE DISCHARGE OF DEVELOPED FLOW IS ACCEPTABLE SINCE DOWNSTREAM CAPACITY (LA CUEVA CHANNEL) EXISTS.

NOTES

- ALL WORK SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE CITY OF ALBUQUERQUE STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, W/ 8 UPDATES.
- AN EXCAVATION/CONSTRUCTION PERMIT IS REQUIRED BEFORE BEGINNING ANY WORK WITHIN WORK AREA. AN APPROVED COPY OF THIS PLAN MUST BE SUBMITTED AT THE TIME OF APPLICATION.
- ALL WORK ON THIS PROJECT SHALL BE PERFORMED IN ACCORDANCE WITH APPLICABLE FEDERAL, STATE AND LOCAL LAWS, RULES, AND REGULATIONS CONCERNING CONSTRUCTION SAFETY AND HEALTH.
- CONTRACTOR SHALL ENSURE THAT NO SITE SOILS/SEDIMENT OR SILT ENTER THE RIGHT-OF-WAYS DURING CONSTRUCTION.
- AREAS DISTURBED DUE TO CONSTRUCTION PER CITY OF ALBUQ. SPEC. 1012 NATIVE SEED MIX.
- MAXIMUM SITE GRADING WITHOUT EROSION PROTECTION: 3 HORIZONTAL TO 1 VERTICAL, 3:1. ALL DIMENSIONS TO FACE OF CURB, UNLESS NOTED OTHERWISE.

NOTE: ADDED SUBGRADE PAD / SPOT ELEV. @ NW & NE CORNER OUTSIDE WALL GRADES OBTAINED BY PHIL TURNER, HMP5 10204, OF TERRAMETRICS NM 7/20/16

AS-CONSTRUCTED
SCOUR WALL ONLY +> NOTED ABOVE

PHILIP W. CLARK, P.E. #10265

CLARK CONSULTING ENGINEERS
18 River Road
Edgewood, New Mexico 87015
Tel: (505) 281-2444 Fax: (505) 281-2444

DESIGNED BY: PWC DRAWN BY: COE JOB #: SignalPointe SHEET 1 OF 1
CHECKED BY: PWC DATE: 2/26/15 FILE #: G/D

Signal Pointe 10/10/2014 CCE Engineering

AMAFCA

**Albuquerque, NM 87122
(505)**

Mr. Shahab Biazar, PE
City Engineer
Development Review Services Division
600 2nd St. NW
Suite 201
Albuquerque, NM 87102
(505) 924-3999

Re: Signal Pointe Subdivision

Dear Mr. Biazar,

AMAFCA is the Owner of Lots 21, Block 4, Tract 3, Unit 3, NAA adjacent on the west side of formerly Lot 20, Block 4, Tract 3, Unit 3, NAA now incorporated into Signal Pointe Subdivision. AMAFCA is satisfied with the final grading on its property and requires nothing more to be done.

Sincerely,


Jerry Lovato
Engineer

8/31/2016

Cc: sbiazar@cabq.gov
acarillo@cabq.gov
CCEAlbq@aol.com
llavehomes@hotmail.com

**Llave Enterprises, Inc.
8830 Keeran Ln. NE
Albuquerque, NM 87122
(505) 249-1502**

Mr. Shahab Biazar, PE
City Engineer
Development Review Services Division
600 2nd St. NW
Suite 201
Albuquerque, NM 87102
(505) 924-3999

Re: Signal Pointe Subdivision

Dear Mr. Biazar,

Llave Enterprises, Inc. is the Owner of Lot 13, Block 4, Tract 3, Unit 3, NAA adjacent on the north side of formerly Lot 20, Block 4, Tract 3, Unit 3, NAA now incorporated into Signal Pointe Subdivision. Llave is satisfied with the final grading on its property and requires nothing more to be done.

Sincerely,



Robert Keeran,
President

Cc: Clark Consulting Engineers

Signal Pointe Shahab Final Grading Letter