

CITY OF ALBUQUERQUE

PLANNING DEPARTMENT – Development Review Services



February 25, 2016

Richard J. Berry, Mayor

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

**RE: Stanford Court (424 Stanford Drive SE)
Grading & Drainage Plan
Engineer's Stamp Date 2-9-16 (File: K16D084)**

Dear Mr. Clark:

Based upon the information provided in your submittal received 2-10-2016, the above referenced Grading and Drainage Plan is approved for Foundation Permit, Grading Permit, Paving Permit, and conditionally approved for Building Permit.

Please attach a copy of this approved plan in the construction sets when submitting for the building permit. Prior to Certificate of Occupancy release, Engineer Certification per the DPM checklist will be required, and the following conditions shall be met:

1. That the SO-19 Standard Notes are followed (attached to this letter).
2. That the two sidewalk culverts in City Right of Way are extended 6-inches behind the sidewalk.

A copy of this approval letter must be on hand when applying for the excavation/barricading permit. The work in the City ROW must be inspected and accepted. The Contractor must contact Jason Rodriguez at 235-8016 and Construction Coordination at 924-3416 to schedule an inspection.

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

Sincerely,

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

Orig: Drainage file



City of Albuquerque

Planning Department

Development & Building Services Division

DRAINAGE AND TRANSPORTATION INFORMATION SHEET (REV 09/2015)

Project Title: STANFORD COURT (APTS) **Building Permit #:** _____ **City Drainage #:** K16D084
DRB#: 1010731 **EPC#:** _____ **Work Order#:** _____
Legal Description: _____
City Address: _____

Engineering Firm: _____ **Contact:** _____
Address: _____
Phone#: _____ **Fax#:** _____ **E-mail:** _____

Owner: _____ **Contact:** _____
Address: _____
Phone#: _____ **Fax#:** _____ **E-mail:** _____

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

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) _____

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) _____

IS THIS A RESUBMITTAL?: ☐ Yes ☐ No

DATE SUBMITTED: _____ **By:** _____

COA STAFF: _____ ELECTRONIC SUBMITTAL RECEIVED: _____

GRADING & DRAINAGE PLAN

SUBJECT PROPERTY IS NOT ADJACENT TO A FLOOD HAZARD ZONE.

FIRM MAP

PANEL # 353 H

THE MULTIFAMILY/TOWNHOME PROJECT IS LOCATED IN THE UNIVERSITY HEIGHTS OF ALBUQUERQUE APPROXIMATELY 2.5 MILES EAST OF THE DOWNTOWN CORE OF ALBUQUERQUE, NM. THE GRADING & DRAINAGE SCHEME DEVELOPED IS IN COMPLIANCE WITH THE BERMUNDO ACT AND THE CITY OF ALBUQUERQUE'S STANDARDS FOR THE CITY STORM DRAINAGE ORDINANCE. THE PLAN IS REQUIRED IN ORDER TO FACILITATE THE OWNER'S REQUEST FOR BUILDING PERMIT. THE PLAN SHOWS:

1. EXISTING CONTOURS, AND SPOT ELEVATIONS AND EXISTING DRAINAGE PATTERNS AND EXISTING IMPROVEMENTS;
2. PROPOSED IMPROVEMENTS: 4284 SF BUILDING STRUCTURE, NEW CONCRETE DRIVEPADS AND OUTDOOR PATIO AREAS, NEW GRADE ELEVATIONS, WALLS, FLATWORK AND LANDSCAPING;
3. CONTINUITY BETWEEN EXISTING AND PROPOSED ELEVATIONS;
4. QUANTIFICATION AND ACCEPTANCE OF UPSTREAM OFF-SITE FLOWS WHICH CONTRIBUTE TO THE DEVELOPED FLOWS GENERATED BY THE IMPROVEMENTS.

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 NORTH BY RESIDENTIAL USE TO THE EAST BY RESIDENTIAL ALLEY (GARFIELD S & STANFORD DRIVE), AND TO THE WEST BY A PUBLIC UTILITY EASEMENT. THE SITE IS MAINTAINED BY THE CITY OF ALBUQUERQUE. THE SITE CURRENTLY DRAINS AT 1% FROM EAST TO WEST.

HISTORICAL SITE RUNOFF OUTFALL LOCATIONS WILL REMAIN UNCHANGED. SINCE BOTH STREETS ARE IMPROVED ONLY MINIMAL GRADING (DRIEPAID RECONSTRUCTION) IS PROPOSED WITHIN THE CITY R.O.W. FREE DISCHARGE OF DEVELOPED FLOW IS ACCEPTABLE SINCE THE TOTAL INCREASE OF DEVELOPED FLOW IS MINIMAL, AND CAPACITY EXISTS DOWNSTREAM. A MAJORITY OF DEVELOPED RUNOFF IS ROUTED TO/THRU PERMEABLE (SOFT) LANDSCAPE AREAS. THE SITE IS NOT IMPACTED ADVERSELY BY ANY OFF-SITE DRAINAGE FLOWS.

Scale: 1" = 10'

VICINITY MAP

ZONE K-16

NOTES

1. ALL WORK WITHIN THE RIGHT-OF-WAY SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE CITY OF ALBUQUERQUE STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, 1986 (1/9) DATES.
2. AN EXCAVATION/CONSTRUCTION PERMIT IS REQUIRED BEFORE BEGINNING ANY WORK WITHIN CITY R.O.W. ANY APPROVED COPY OF THIS PLAN MUST BE SUBMITTED AT THE TIME OF APPLICATION.
3. 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.
4. ALL LANDSCAPING AREA SHALL BE SOFT-LINED WITH NATIVE VEGETATION AND/OR GRAVEL. PAVED PARKING AREA SHALL DRAIN DIRECTLY TO NEW CURB CUT OR SWK CULVERT.
5. CONTRACTOR SHALL ENSURE THAT NO SITE SOILS/SEGMENT OR SILT ENTER THE RIGHT-OF-WAYS DURING CONSTRUCTION.
6. REVEGETATE ALL AREAS DISTURBED DUE TO CONSTRUCTION PER CITY OF ALBUQ. SPEC. 1012, NATIVE SEED MIX.
7. MAXIMUM SITE GRADING WITHOUT EROSION PROTECTION: 3% HORIZONTAL TO 1 VERTICAL, 3:1. ALL DIMENSIONS TO FACE OF CURB, UNLESS NOTED OTHERWISE.

LEGEND

- EXIST. SPOT ELEVATION +24.0
- EXIST. CONTOUR 10
- NEW SPOT ELEVATION 24.0
- NEW CONTOUR 12
- NEW SWALE
- DRAINAGE DIRECTION, EXISTING
- NEW CONCRETE CURB (0.5' HEIGHT)
- NEW P.C.C. CONCRETE
- TOP OF CURB, EXISTING
- FLOWLINE
- EXISTING POWER POLE
- FACE OF CURB/FACE OF CURB
- WATER BLOCK

PROJECT DATA

LEGAL DESCRIPTION (PENDING LOT 12-A CONSOLIDATION)

LOTS 11-12, BLOCK 13, UNIVERSITY HEIGHTS, ALBUQUERQUE, BERNALILLO COUNTY, NEW MEXICO

PROJECT BENCHMARK

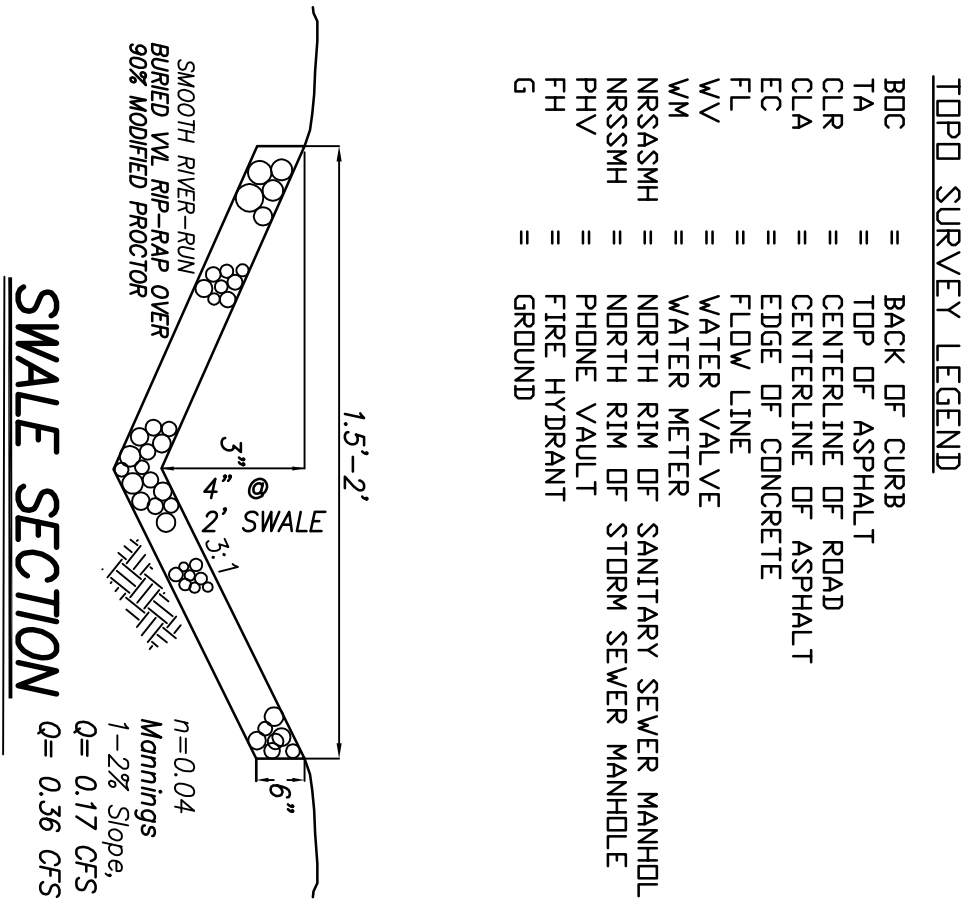
TOP OF REBAR/CAP AT THE PROJECT SOUTHEAST CORNER MSL ELEVATION = 5169.86, AS TIED FROM COA 3-1/4" DIAMETER ALUM DISK SET IN TOP OF CURB, 20.116' MSL, NAVD 88, 5210.84, LOCATED 114' SOUTH OF THE INTERSECTION OF GARFIELD AND BURTON AVENUE, SE.

TOPOGRAHIC DESIGN SURVEY

PROVIDED BY HARRIS SURVEYING, INC. UNDER THE DIRECTION OF TONY HARRIS, N.M.P.S. 11463, DATED MAR. 2015.

Clark Consulting Engineers

19 Ryon Road Edgewood, New Mexico 87015 Tel: (505) 281-2446	105 E. 11-12, BLK. 13, UNIVERSITY HEIGHTS, ALBUQUERQUE, BERNALILLO COUNTY, NEW MEXICO 2/4/16	2/7-9/16	Shon Reas
DESIGNED BY: PWC CHECKED BY: PWC	DRAWN BY: COE DATE: 12/23/15	JOSEPH ALBERT, Sealed FILE #	C/D
Grading & Drainage Plan			
1 OF 1			



CALCULATIONS

DESIGN CRITERIA

HYDROLOGIC METHODS PER SECTION 22.2, HYDROLOGY OF THE DEVELOPMENT PROCESS MANUAL (DPN) REVISED JANUARY 1993 FOR CITY OF ALBUQUERQUE ADOPTED BY THE COUNTY OF BERNALILLO

DISCHARGE RATE: Q=QPEAK x AREA, "Peak Discharge Rates For Small Watersheds"

VOLUMETRIC DISCHARGE: VOLUME = EWeighted x AREA

P100 = 2.35 inches, Zone 2 Time of Concentration, TC = 10 Minutes

DESIGN STORM: 100-YEAR/6-HOUR, 10-YEAR/6-HOUR [] = 10 YEAR VALUES

EXISTING CONDITIONS

TOTAL AREA = 0.33 ACRES, WHERE EXCESS PRECIP. W' = 1.13 in. [0.52"]

PEAK DISCHARGE, Q100 = 1.0 CFS [0.55] WHERE UNIT PEAK DISCHARGE W' = 3.025/AC. [1.7"]

THEFORE: VOLUME 100 = 1312 CF [604']

DEVELOPED CONDITIONS

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

AREA LAND TREATMENT D Peak

UNDEVELOPED A 1.56 [0.38]

LANDSCAPING 0.08 AC. (24%) B 2.28 [0.95]

GRAVEL & COMPACTED SOIL 0.07 AC. (24%) C 3.14 [1.71]

ROOF - PAVEMENT 0.12 AC. (35%) D 4.70 [3.14]

2.12 [1.34]

THEFORE: EWeighted = 1.56 in. [0.9"] &

Q100 = 1.2 CFS VOLUME 100 = 1812 CF

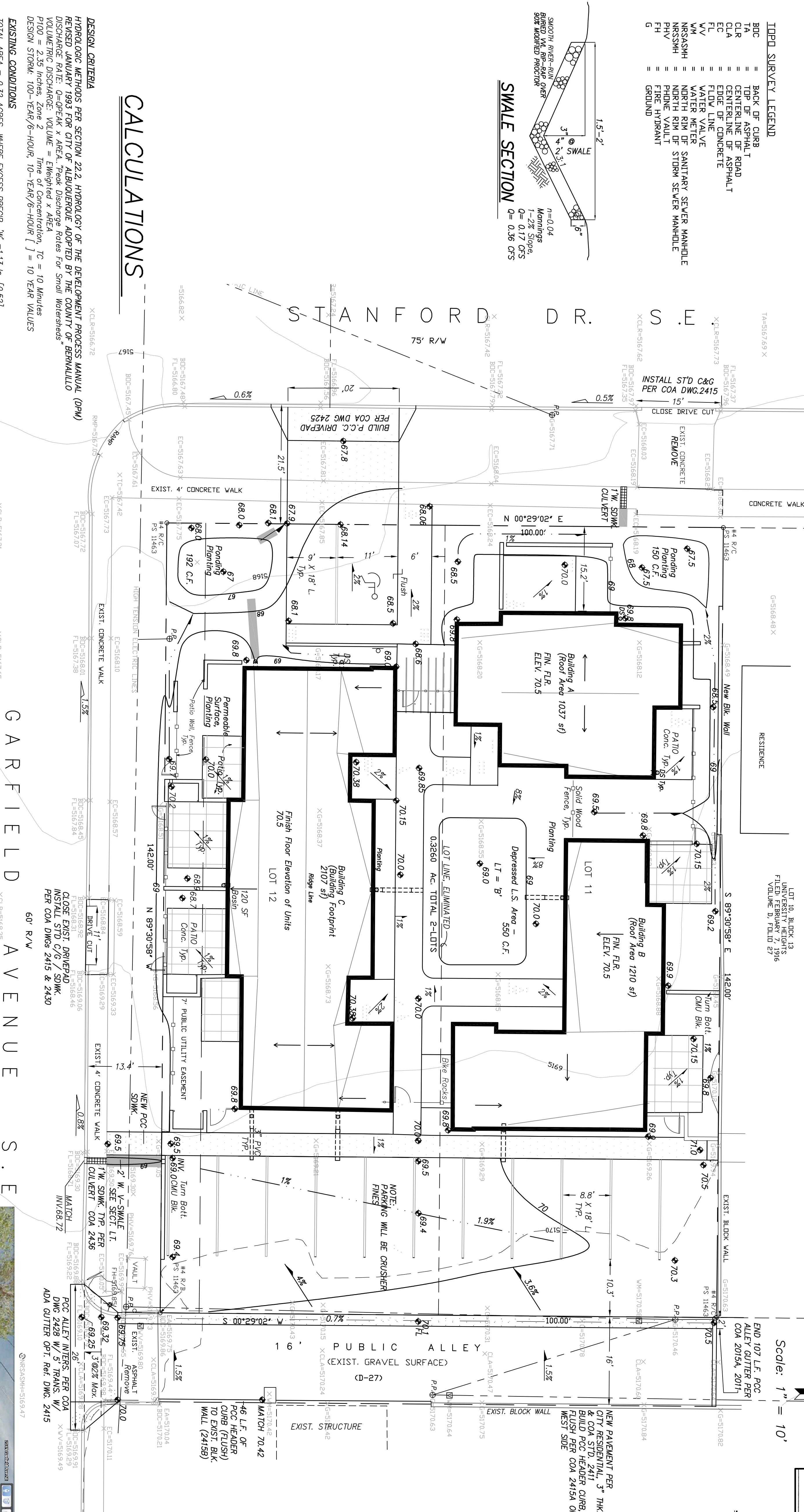
Q10 = 0.75 CFS VOLUME 10 = 1034 CF

RECOMMEND : ROUTE DEVELOPED RUNOFF THROUGH SOFT LANDSCAPING

FIRST FLUSH: (EPA WATER QUALITY), USE DPM TABLE 2 "WATER QUAL. STORM EVENT", 52% IMPERVIOUS THEREFORE: PROPORTION FOR 52% USE 0.23" x 0.17 AC. /12 x 43560 SF

VOL. RETENTION = 142 CF.

GARFIELD AVENUE S.E.



PHILIP W. CLARK N.M.P.E. #10265

