CITY OF ALBUQUERQUE

Planning Department Alan Varela, Director



Mayor Timothy M. Keller

May 13, 2022

David Soule, PE Rio Grande Engineering 1606 Central SE Suite 201 Albuquerque, NM 87106

Re: 314 Arizona St. SE

Grading and Drainage Plan

Engineers Stamp Date 9/22/2021 (K18D110)

CO Certification Dated: 3/21/2022

Mr. Soule

PO Box 1293

Based on the Certification received on 3/21/2022, the site is acceptable for release of Certificate of Occupancy by Hydrology.

Albuquerque

If you have any questions please contact me at 924-3986 or at earmijo@cabq.gov.

NM 87103

Sincerely,

www.cabq.gov

Ernest Armijo, P.E.

Principal Engineer, Planning Dept.

Development Review Services



City of Albuquerque

Planning Department

Development & Building Services Division

DRAINAGE AND TRANSPORTATION INFORMATION SHEET (REV 6/2018)

Project Title: 314 ARIZONA	Building Permit #:	Hydrole	ogy File #:
DRB#:	EPC#:	Work (Order#:
DRB#: Legal Description: LOTS 23A FAIRG	ROUNDS ADDIT	ION	
City Address: 314 ARIZONA			
Applicant:		Contact:	
Address:			
Phone#:			
Other Contact: RIO GRANDE ENGINE		Contact:	DAVID SOULE
Address: PO BOX 93924 ALB NM	***		
Phone#: 505.321.9099	Fax#: 505.872.09	99 E-mail: da	avid@riograndeengineering.com
TYPE OF DEVELOPMENT: PLAT	RESIDENC	E DRB SITE X	ADMIN SITE
Check all that Apply:			
DEPARTMENT:	T	YPE OF APPROVAL/ACCEI	PTANCE SOUGHT:
X HYDROLOGY/ DRAINAGE TRAFFIC/ TRANSPORTATION		BUILDING PERMIT APPR	OVAL
TRAFFIC/ TRANSFORTATION	_X	CERTIFICATE OF OCCUP	PANCY
TYPE OF SUBMITTAL:			
× ENGINEER/ARCHITECT CERTIFICATION		PRELIMINARY PLAT AP	PROVAL
PAD CERTIFICATION		SITE PLAN FOR SUB'D A	APPROVAL
CONCEPTUAL G & D PLAN		SITE PLAN FOR BLDG. P	ERMIT APPROVAL
GRADING PLAN	_	FINAL PLAT APPROVAL	_
DRAINAGE REPORT			
DRAINAGE MASTER PLAN	· ———	SIA/ RELEASE OF FINAN	ICIAL GUARANTEE
FLOODPLAIN DEVELOPMENT PERMIT A	PPLIC	FOUNDATION PERMIT A	APPROVAL
ELEVATION CERTIFICATE		GRADING PERMIT APPR	OVAL
CLOMR/LOMR		SO-19 APPROVAL	
TRAFFIC CIRCULATION LAYOUT (TCL)		 PAVING PERMIT APPRO	VAL
TRAFFIC IMPACT STUDY (TIS)		 GRADING/ PAD CERTIFI	
STREET LIGHT LAYOUT		 WORK ORDER APPROVAL	
OTHER (SPECIFY)		CLOMR/LOMR	
PRE-DESIGN MEETING?		FLOODPLAIN DEVELOPM	MENT PERMIT
IS THIS A RESUBMITTAL?: X Yes No	<u></u>	OTHER (SPECIFY)	
DATE SUBMITTED:			
COA STAFF:	ELECTRONIC SUBMIT	TAL RECEIVED:	
	FEE PAID:		

I <u>David Soule</u>, NMPE 14522, of the firm <u>Rio Grande Engineering</u>, hereby certify that this project has been graded and will drain in substantial compliance with and in accordance with the design intend of the approved plan dated <u>9/22/21</u>. The record information edited on the original design document has performed by me or under my direct supervision and is true and correct to the best of my knowledge and belief. The asbuilt survey was provided by <u>LORENZO DOMINGUEZ #10461</u>. The certification is submitted in support of a request for <u>PERMANENT CERTIFICATE OF OCCUPANCY</u>. The record information presented heron is not necessarily complete and intended only to verify substantial compliance of the grading and drainage aspects of this project. Those relying on this record document are advised to obtain independent verification of its accuracy before using it for any other purpose

CURB @ PROPERTY LINE

without curb

RETENTION POND TOP = 5296.75

OUTFALL @ 5295.95 BOTTOM = 5294.95

MWSEL = 5296.73

TOTAL VOLUME = 777 CF

WATER QUALITY VOLUME = 253 CF

volume provided

EROSION CONTROL NOTES:

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

LOT 6-A

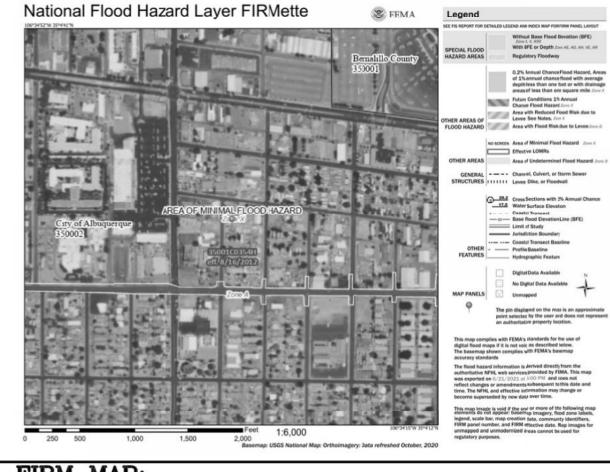
UPLANDSOUT

97.45

97.12



VICINITY MAP: K-18-2



FIRM MAP:

LEGAL DESCRIPTION:

LOT 23A FAIR GROUNDS ADDITION CITY OF ALBUQUERQUE, BERNALILLO COUNTY, NEW MEXICO

NOTES

- . ALL SPOT ELEVATIONS REPRESENT FLOWLINE ELEVATION UNLESS OTHERWISE NOTED
- 2. ALL SLOPES SHALL BE 3:1 MAX. AND GRAVEL OR NATIVE SEEDING PRIOR TO CO
- SHALL BE BY OTHERS.

 4. SURVEY INFORMATION PROVIDED BY COMMUNITY SCIENCES CORPORATION USING NAVD

3. ANY PERIMETER WALLS MUST BE PERMITED SEPARATELY ALL RETAINING WALL DESIGN

LEGEND

[EXISTING CONTOUR
[EXISTING INDEX CONTOUR
	PROPOSED CONTOUR
	PROPOSED INDEX CONTOUR
× XXXX	EXISTING SPOT ELEVATION
■ XXXX F	PROPOSED SPOT ELEVATION
	BOUNDARY
	ADJACENT BOUNDARY
===============	EXISTING CURB AND GUTTER
	DRAINAGE BASIN BOUNDARY



FL = 95.95 PRTS INSTALL 2" WIDE CURB

CUT TO THROTTLE FLOW

ANGLE DOWN SPOUT
TO DISCHARGE TO POND

SOUTH BASIN

LOT 1A

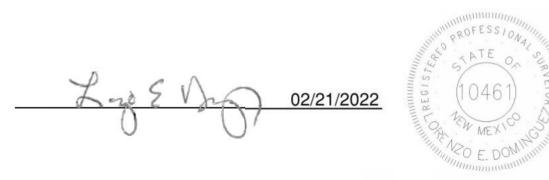
16' P.U.E. & SANITARY SEWER EASE

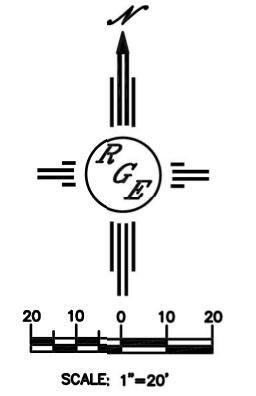
FP = 5297.50

EXISTING WALL

5297.60 FF = 5298.00

EXISTING UTILITIES ARE NOT SHOWN. IT SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR TO CONDUCT ALL NECESSARY FIELD INVESTIGATIONS PRIOR TO ANY EXCAVATION TO DETERMINE THE ACTUAL LOCATION OF UTILITIES & OTHER IMPROVEMENTS.





ENGINEER'S SEAL	LOT 23A FAIR GROUNDS ADDITION 314 ARIZONA STREET S.E.	DRAWN BY _{DEM}			
ON IN MEXICA		<i>DATE</i> 6-24-21			
RE (14522) CH	GRADING AND DRAINAGE PLAN	LOT 23A FAIR GROUNDS ADDITION .DWG			
AROFESSIONAL E	Rio Grande	SHEET#			
9/22/21 6/24/21	Engineering PO BOX 93924	C1			
DAVID SOULE	ALBUQUERQUE, NM 87199 (505) 321-9099	JOB#			
P.E. #14522	'11'				

ANYMO. PROGRAM (AITWO-54) RIN DAIL (MON/DOX/YN) = 06/25/2021 RIGGrandesingleAdiye5157 ccureents and settings\Omner\Desktop\2021 JOBS\2021229-arizona\pondrout\Barboard A21.txt "S AHYMO = DETENTION- ARIZONA "S TART TIME-00.0 PUNCH CODE=0 RAINFALL TVPE-2 QUARTER-0.0 DN=1,83 IN SIX-2,34 IN DAV-2.73 IN DT = 0.05 HR AREAS (NM & AZ) = DT — 0.50000 HOURS	2.6489 2.6498 2.6507 2.6516 2.6525 2.6534 2.6542 2.6551 2.6560 2.6569 2.6567 7.6586 2.6595 2.6603 2.6569 2.	5.700	12.450	BASI E UF UF N S PF *DISCHA ** SITE I SLIGHT Narrative The subj propertie north bas from the is 1.39 cf
12.750	12.900	TIME	NUMBER PRO 1.8300	
16.200 3.600 0.0 7.800 0.0 12.000 0.0 16.300 3.790 0.0 7.950 0.0 12.150 0.0 16.500 3.90.0 0.0 8.100 0.0 12.300 0.0 16.650 0.00 0.0 8.250 0.0 12.450 0.0 16.650 0.0 0.0 8.250 0.0 12.450 0.0 16.650 0.0 0.0 8.250 0.0 12.450 0.0 **BUNDEF VOLIME = 1.91410 INCHES = 0.0022 ACRE-FEET PEAN DISCHARGE RATE = 0.34 CFS AT 1.500 HOURS BASIN AREA = 0.002 Sq. MI. **ADD UPLAND NORTH TO ONSITE NORTH ADD PRENT HAVE ID-8 HAVD NO-108 ID I=2 ID II=6 **PRINT HAVE ID-8 HAVD NO-108 ID IE-2 ID II=6 **PRINT HAVE ID-8 HAVD NO-108 ID IE-2 ID II=6 **PRINT HAVE ID-8 HAVD NO-108 ID IE-2 ID II=6 **TIME FLOW TIME FLOW TIME FLOW TIME FLOW ID-8 HAS CFS HAS CFS HAS CFS HAS CFS ID-9 (1.650 0.0) 12.300 0.0 0.0 16.200 4.050 0.0 8.250 0.0 12.450 0.000 0.0 16.200 4.050 0.0 8.250 0.0 12.450 0.000 0.0 16.500 4.350 0.0 8.400 0.0 12.450 0.450 0.0 0.0 16.500 4.350 0.0 8.400 0.0 12.750 0.000 0.0 16.650 4.500 0.0 8.700 0.0 12.750 0.000 0.0 16.500 4.500 0.0 8.550 0.0 12.750 0.000 0.0 16.500 4.500 0.0 8.550 0.0 12.750 0.000 0.0 16.500 4.500 0.0 8.550 0.0 12.900 0.750 0.0 0.0 16.500 4.500 0.0 9.000 0.0 13.000 1.000 0.0 16.500 4.500 0.0 9.000 0.0 13.000 1.000 0.0 16.500 4.500 0.0 9.000 0.0 13.350 1.000 0.0 17.100 5.000 0.0 9.300 0.0 13.350 1.000 0.0 17.500 5.500 0.0 9.300 0.0 13.350 1.000 0.0 17.500 5.500 0.0 9.300 0.0 13.500 1.350 0.0 1.1 7.500 5.500 0.0 9.900 0.0 13.500 1.350 0.0 1.1 7.500 5.500 0.0 9.900 0.0 13.500 1.350 0.0 1.1 8.500 6.000 0.0 9.750 0.0 14.400 2.500 0.0 18.500 0.0 18.500 0.0 0.0 9.500 0.0 14.550 2.550 0.0 0.1 18.450 6.600 0.0 0.0 10.550 0.0 14.550 2.550 0.0 0.1 18.450 6.600 0.0 0.0 10.550 0.0 14.550 2.550 0.0 0.1 18.450 6.600 0.0 0.0 10.550 0.0 14.550 2.550 0.0 0.1 18.450 6.600 0.0 0.0 10.550 0.0 14.550 2.550 0.0 0.1 18.450 6.600 0.0 0.0 10.550 0.0 15.500 3.450 0.0 19.900 0.0 19.900 0.0 0.1 11.500 0.0 15.500 3.450 0.0 19.900 0.0 0.0 11.550 0.0 0.0 11.550 0.0 15.500 3.450 0.0 19.900 0.0 11.550 0.0 0.0 11.550 0.0 15.500 3.450 0.0 19.900 0.0 19.900 0.0 0.0 11.550 0.0 15.500 3.450 0.0 19.900 0.0 19.900 0.0 0.	15.600 0.0 0.0 7.650 0.0 11.700 0.0 15.750 3.600 0.0 7.650 0.0 11.700 0.0 15.900 3.750 0.0 7.800 0.0 11.850 0.0 16.050 0.0 7.800 0.0 12.000 0.0 RUNGEY VOLUME 1.50752 INCHES - 0.0501 ARRE-FEET PRAY DISCHARGE RATE = 1.40 CFS AT 1.500 HOURS BASIN AREA = 0.0006 SQ. MI. **AND UPLAND SOUTH TO ONSITE SOUTH AND ROUTE THROUGH FOND ADD HYD ON HYD NO-109 10 1-3 10 11-7 **ROUTE THE TOTAL FLOW THROUGH THE PROPOSED RESERVOIR ROUTE RESERVOIR 00TFLOW(CFS) 0.006	12.600	POND OUTLET 95.95 0.00	AREA SF 36.0000 470.0000 840.0000

ASIN DATA

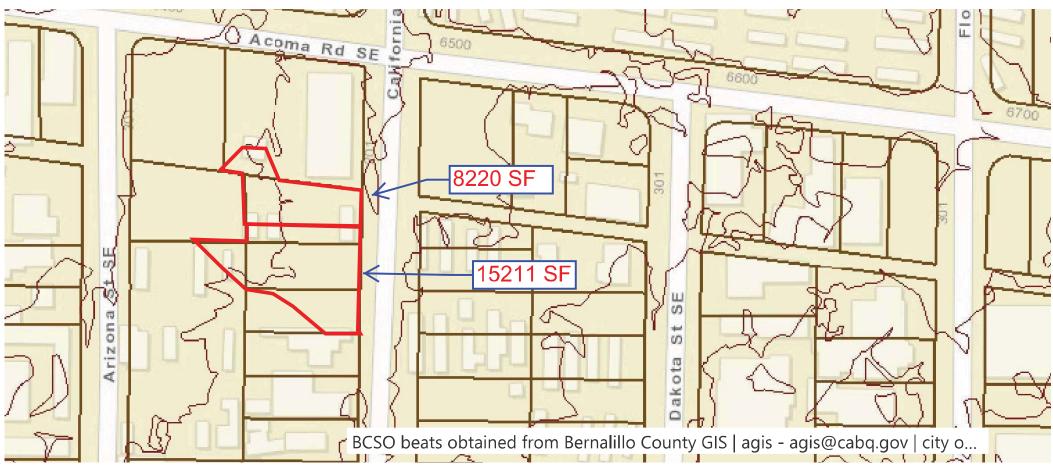
													WATER	WATER
Basin	Area	Area	Treatment	Α	Treatme	nt B	Treatme	nt C	Treatme	nt D	Q100	Q100	QUALITY	QUALITY
	(sf)	(acres)	%	(acres)	%	(acres)	%	(acres)	%	(acres)	GENERATED	DISCHARGED	REQUIRED	PROVIDED
EXISTING LOT	11609.00	0.267	0%	0	0%	0.000	90%	0.2399	10%	0.027	0.85	2.66*		
UPLAND NORTH	8220.00	0.189	0%	0	0%	0.000	72%	0.1359	28%	0.053	0.65	0.65		
UPLAND SOUTH	15211.00	0.349	0%	0	0%	0.000	80%	0.2794	20%	0.070	1.16	1.16		
NORTH BASIN	9150.00	0.210	0%	0	0%	0.000	64%	0.1344	36%	0.076	0.75	1.4*	71	
SOUTH BASIN	6061.00	0.139	0%	0	6%	0.008	33%	0.0459	61%	0.085	0.54	1.39*	80	777
PROPOSED LOT												2.66**		

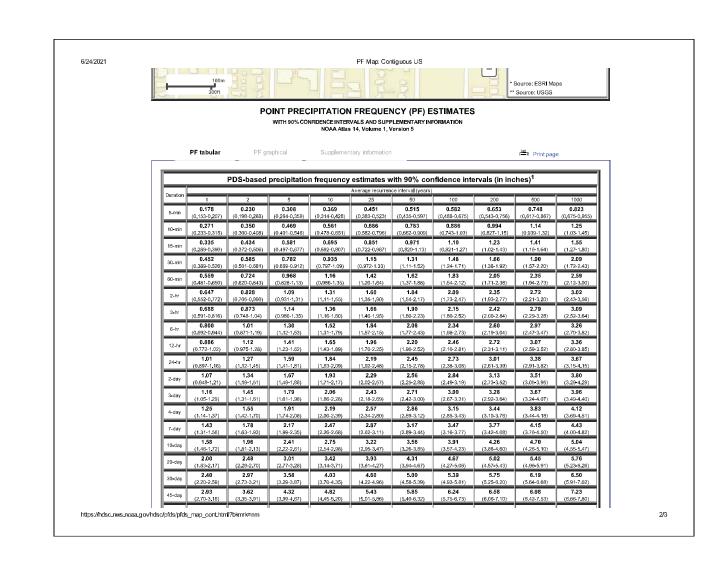
ISCHARGE INLCUDED INCLUSION OF UPLAND FLOW IMPACTED

SITE DISCHARGE CALCULATED UTILIZING AHYMO. THE DETENTION PONDS HAVE DIFFERENT TP THEREFORE THE CUMULATIVE DISCHARGE IS IGHTLY LESS THAT THE SUMMATION OF EACH BASIN

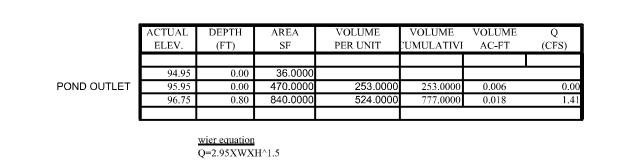
e subject property is located within a fully developed area of SE Albuquerque. All down stream drainage improvements have been completed. This is a redevelopment of an site that accepts 1.81 cfs from upland perties. The existing site generates a peak discharge of .85 cfs. The combined existing flow rate leaving this site to Arizona Avenue is 2.66 cfs. The proposed improvements consist of 2 onsite basins, the th basin accepts .65 cfs from upland flow and generates .75 cfs, free discharging 1.4 cfs to Arizona. This basin has a water quality treatment volume requirement of 71 cf. The southern basin accepts 1.16 cfs m the upland basins and generates.54 cfs. This basin has a water quality treatment volume requirement of 80 cf This combined flow is routed through a detention pond, The peak flow leaving this pond 1.39 cfs. The compined flow discharging this site in the proposed condition is 2.66 cfs which matches the historical. A fee in lieu of \$568 shall be paid for untreated first flush volume from north basin

*** REDEVELOPMENT 0.26 INCHES PER SF IMPERVIOUS





CALCULATIONS



ENGINEER'S SEAL	LOT 23A FAIR GROUNDS ADDITION 314 ARIZONA STREET S.E.	DRAWN BY DEM
War War Con		<i>DATE</i> 6-24-21
REGISTANT 14522	CALCULATION SHEET	LOT 23A FAIR GROUNDS ADDITION .DVI
APOFESSIONAL ET	Rio Grande	SHEET#
9/22/21 6/24/21	Engineering	C2
DAVID SOULE P.E. #14522	PO BOX 93924 ALBUQUERQUE, NM 87199 (505) 321-9099	JOB #