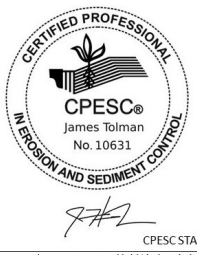
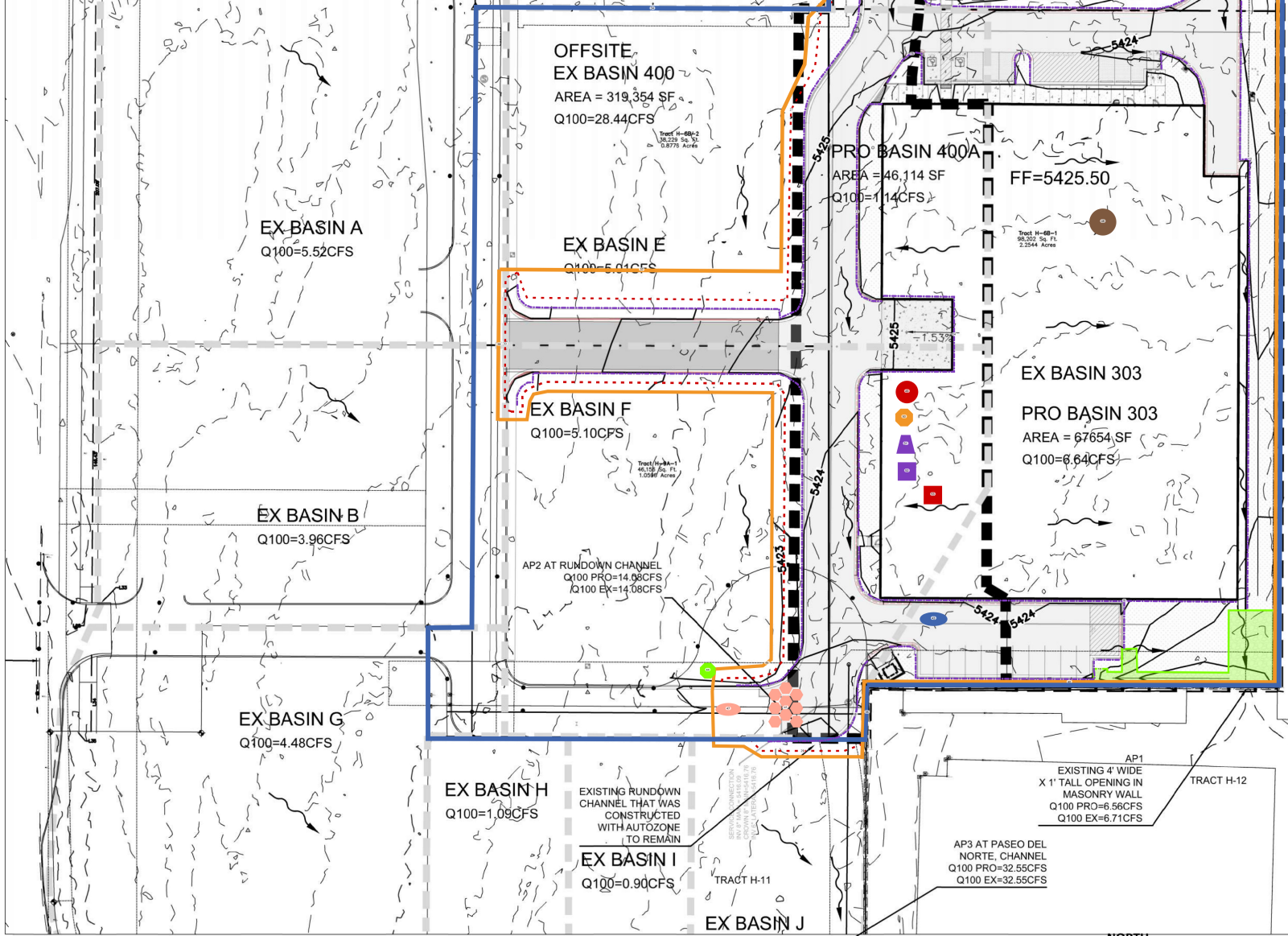


City of Albuquerque
 Planning Department
 Development Review Services
HYDROLOGY SECTION
APPROVED
 DATE: 8-1-2025
 BY: [Signature]
 HydroTeam # B10D003C3C



Ventana Square Self Storage
 PROJECT TITLE
 ALBUQUERQUE, NM - BERNALILLO COUNTY
 CITY, COUNTY, STATE
 02/03/2026 DATE
 D. Lewis / J. Tolman DRAWN BY
 INSPECTIONS PLUS



GRADING AND DRAINAGE PLAN - OVERALL
 SCALE: 1" = 40'-0"

I. PURPOSE AND SCOPE

THE PURPOSE OF THIS DRAINAGE PLAN IS TO PRESENT THE EXISTING AND PROPOSED DRAINAGE CONDITIONS FOR THE PROPOSED VENTANA SQUARE SELF-STORAGE PROJECT. THE NEW BUILDING IS LOCATED AT THE NORTH EAST CORNER OF PASEO DEL NORTE AND UNIVERSE BOULEVARD IN NORTHWEST ALBUQUERQUE. THE ZONE ATLAS PAGE FOR THE SITE IS B-10-Z.

II. SITE DESCRIPTION AND HISTORY

THE PROJECT SITE IS LOCATED ON THE NORTH EAST CORNER OF PASEO DEL NORTE NW, AND UNIVERSE BOULEVARD NW IN THE VENTANA SQUARE DEVELOPMENT. THE SITE IS CURRENTLY VACANT. PROPERTIES TO THE EAST AND SOUTH HAVE BEEN DEVELOPED AND CONTAIN SELF STORAGE UNITS. A SHARED STORMWATER POND HAS BEEN CONSTRUCTED TO THE SOUTH EAST OF VENTANA SQUARE ALONG PASEO DEL NORTE. THE POND HAS BEEN SIZED TO ACCEPT RUNOFF FROM THE PROJECT SITE, INCLUDING WATER QUALITY VOLUMES.

III. COMPUTATIONAL PROCEDURES

HYDROLOGIC ANALYSIS WAS PERFORMED UTILIZING THE DESIGN CRITERIA BASED ON CHAPTER 6, HYDROLOGY, OF THE DEVELOPMENT PROCESS MANUAL RELEASED 2020. TABLES WITHIN CHAPTER 6, WERE USED TO AID IN THE STUDY OF THE SITE HYDROLOGY.

IV. PRECIPITATION

THE STORM EVENT USED FOR THE FOLLOWING CALCULATIONS IS THE 100YR-24HR STORM. THE PROJECT SITE IS LOCATED IN ZONE 1 (WEST OF RIO GRANDE).

V. EXISTING DRAINAGE CONDITIONS

THE SITE IS CURRENTLY UNDEVELOPED. THE SITE TO THE EAST AND SOUTH IS FULLY DEVELOPED AS A SELF STORAGE FACILITY. RUNOFF FROM THIS SITE UNDER THE PRIOR DRAINAGE PLAN (DRAINAGE REPORT FOR VENTANA SQUARE DATED DECEMBER 2020, PREPARED BY THIS OFFICE) ALLOWS FOR 6.71CFS TO BE DISCHARGED AT THE SOUTHEAST CORNER OF THE PROJECT SITE. THIS RUNOFF WILL PASS THROUGH THE ADJACENT DEVELOPMENT TO REACH THE WATER QUALITY AND RETENTION POND ALONG PASEO DEL NORTE.

THE DRAINAGE MASTERPLAN IDENTIFIED A RIDGELINE WITHIN THE PARCEL TO THE NORTH. THE PROJECT SITE WILL ALLOW FROM BASIN 500 TO ENTER AND PASS THROUGH THE PROJECT SITE. THE PARCEL TO THE WEST DRAINS SOUTH AND WILL JOIN RUNOFF WITH OTHER PARCELS AS PART OF A 8.39 ACRE DRAINAGE BASIN. THE PEAK FLOW RATE FROM BASIN 400 IS 32.55CFS. BASIN 400 WILL ALSO DRAIN TO THE RETENTION POND ALONG PASEO DEL NORTE.

THE EXISTING BASIN MAP ALSO INCLUDES THE REFINED SUB-BASINS FROM A PRIOR DRAINAGE STUDY FROM 2021. BASIN WITH LETTERS ARE DERIVED FROM THAT STUDY. THE SUMMATION OF THE LETTERED SUB-BASIN EQUAL THE MASTERPLANNED DRAINAGE BASIN #400.

PASEO DEL NORTE CONTAINS STORMWATER COLLECTION AND CONVEYANCE CHANNELS AND PIPING THAT DISCHARGE INTO THE LARGE STORMWATER RETENTION POND. AS MENTIONED IN THE SITE DESCRIPTION AND HISTORY PORTION, THE DRAINAGE MASTER PLAN FOR VENTANA SQUARE REQUIRES THAT THE FLOW RATE OFF THE SITE MATCH THE 6.71CFS AND 32.55CFS RESPECTIVELY.

VI. PROPOSED DRAINAGE CONDITIONS

THE NEW BUILDING WILL BE 45,632SF FOOTPRINT, TWO STORY SELF STORAGE BUILDING. THE ROOF WILL HAVE A CENTER RIDGE AND WILL SLOPE BOTH EAST AND WEST. ROOF DOWNSPOUTS WILL CONVEY RUNOFF TO THE GROUND, WHERE SPLASH BLOCKS AND RIPRAP RUNDOWNS WILL CONVEY RUNOFF TO THE SURROUNDING STREET NETWORK OR CONCRETE RUNDOWN CHANNEL. THE ROOF RIDGE IS SLIGHTLY ALTERED FROM THE MASTERPLAN FOR BASIN 303 AND ADDITIONAL PARKING RUNOFF HAS BEEN ADDED TO THE BASIN TO MAINTAIN A SIMILAR FLOWRATE. FLOWRATE AT THE SOUTHEAST CORNER IS REDUCED BY 0.15CFS AT ANALYSIS POINT AP1.

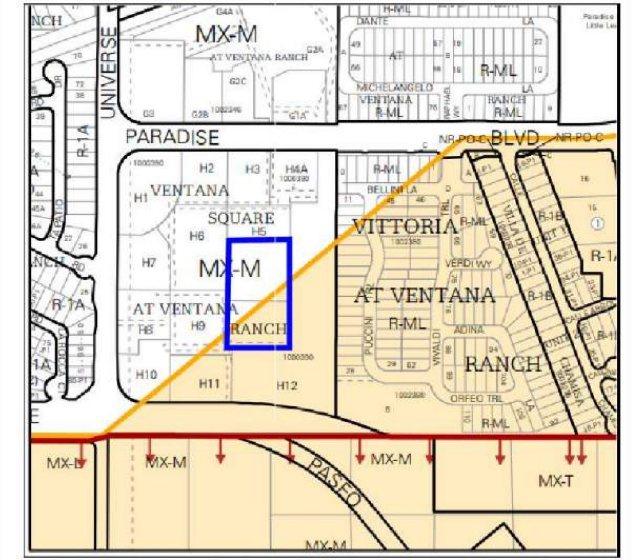
THE WESTERN PART OF THE SITE HAS BEEN IDENTIFIED AT SUB-BASIN PRO BASIN 400A. PRO BASIN 400A GENERATES A PEAK RUNOFF OF 4.11CFS. PRO BASIN 400A WHEN COMBINED WITH OFFSITE PRO BASIN 400 FROM THE PRIOR DRAINAGE STUDY THAT CONTAINS THE REMAINING 28.44 CFS (WILL EQUAL THE DEFINED FLOW RATE OF 32.55CFS). THE LANDSCAPING PERCENTAGE IS SLIGHTLY HIGHER THAN UTILIZED IN THE PRIOR DRAINAGE MASTERPLAN. CONSERVATIVE VALUES FOLLOWING THE MASTER DRAINAGE PLAN HAVE BEEN USED. 7.5% FOR TYPE B AND TYPE C SOILS, AS THIS IS A SUBBASIN WITHIN THE 8.39 ACRE BASIN 400.

THE DISCHARGE RATE AT THE ENTRANCE OF THE CHANNEL (AP2) ON THE EAST SIDE OF AUTOZONE WILL REMAIN AS PREVIOUSLY DESIGNED AT 14.08 CFS. THE DISCHARGE RATE AT ANALYSIS POINT 3 (AP3) REMAINS THE SAME AS THE DRAINAGE REPORT FOR VENTANA SQUARE DATED DECEMBER 2020 AT 32.55CFS AT THE SOUTH WEST CORNER OF TRACT H-11 WHERE RUNOFF ENTERS THE CONCRETE CHANNEL THAT CONVEYS RUNOFF TO THE DETENTION POND.

WATER QUALITY VOLUMES WERE COMPUTED FOR 85% IMPERVIOUS FOR THE 98,202SF LOT ARE 2.365CF. THE SITE DOES NOT CONTAIN A LOCATION FOR RETENTION OF THE WATER QUALITY VOLUME. PER THE "DRAINAGE REPORT FOR VENTANA SQUARE" DATED DECEMBER 2020 THE ADJACENT POND ALONG PASEO DEL NORTE DOES CONTAIN SUFFICIENT VOLUME TO CONTAIN AND INFILTRATE THE 2.365CF OF RUNOFF TO SATISFY THE WATER QUALITY REQUIREMENTS. PER THE 2020 REPORT THE FULL BUILD OUT DEPTH WILL BE 0.80' DEEP IN THE SHARED RETENTION POND.

VII. CONCLUSIONS

THIS DRAINAGE STUDY HAS BEEN PREPARED IN ACCORDANCE WITH THE DRAINAGE REPORT FOR VENTANA SQUARE DATED DECEMBER 2020. RUNOFF FROM THE PROJECT SITE WILL DRAIN OUT AT ANALYSIS POINTS AP1 AND AP2 AT THE OR SLIGHTLY REDUCED FROM THE PRIOR STUDY. NO CHANGES ARE REQUIRED TO DOWNSTREAM USERS, AS THIS PROJECT WILL NOT CAUSE AN INCREASE IN FLOWRATE, WATER QUALITY VOLUME OR EXCESS RUNOFF VOLUME FROM THE DRAINAGE REPORT FOR VENTANA SQUARE DATED DECEMBER 2020.



ZONE ATLAS PAGE B-10Z
 NOT TO SCALE



FEMA FLOOD ZONE MAP 35001C0103H
 NOT TO SCALE

MATERIAL LEGEND		LINEWORK LEGEND	
[Symbol]	HEAVY DUTY ASPHALT	[Symbol]	EXISTING CONTOURS
[Symbol]	HEAVY DUTY CONCRETE PAVEMENT	[Symbol]	PROPOSED CONTOURS
[Symbol]	4" THICK CONCRETE SIDEWALK	[Symbol]	DRAINAGE BASIN DEFINITION FROM MASTER DRAINAGE PLAN
[Symbol]	EROSION PROTECTION, PER DETAIL ON SHEET G&D3	[Symbol]	PROPOSED BASIN DEFINITION LINE
[Symbol]	LANDSCAPING AREA.		

GRADING AND DRAINAGE PLAN



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