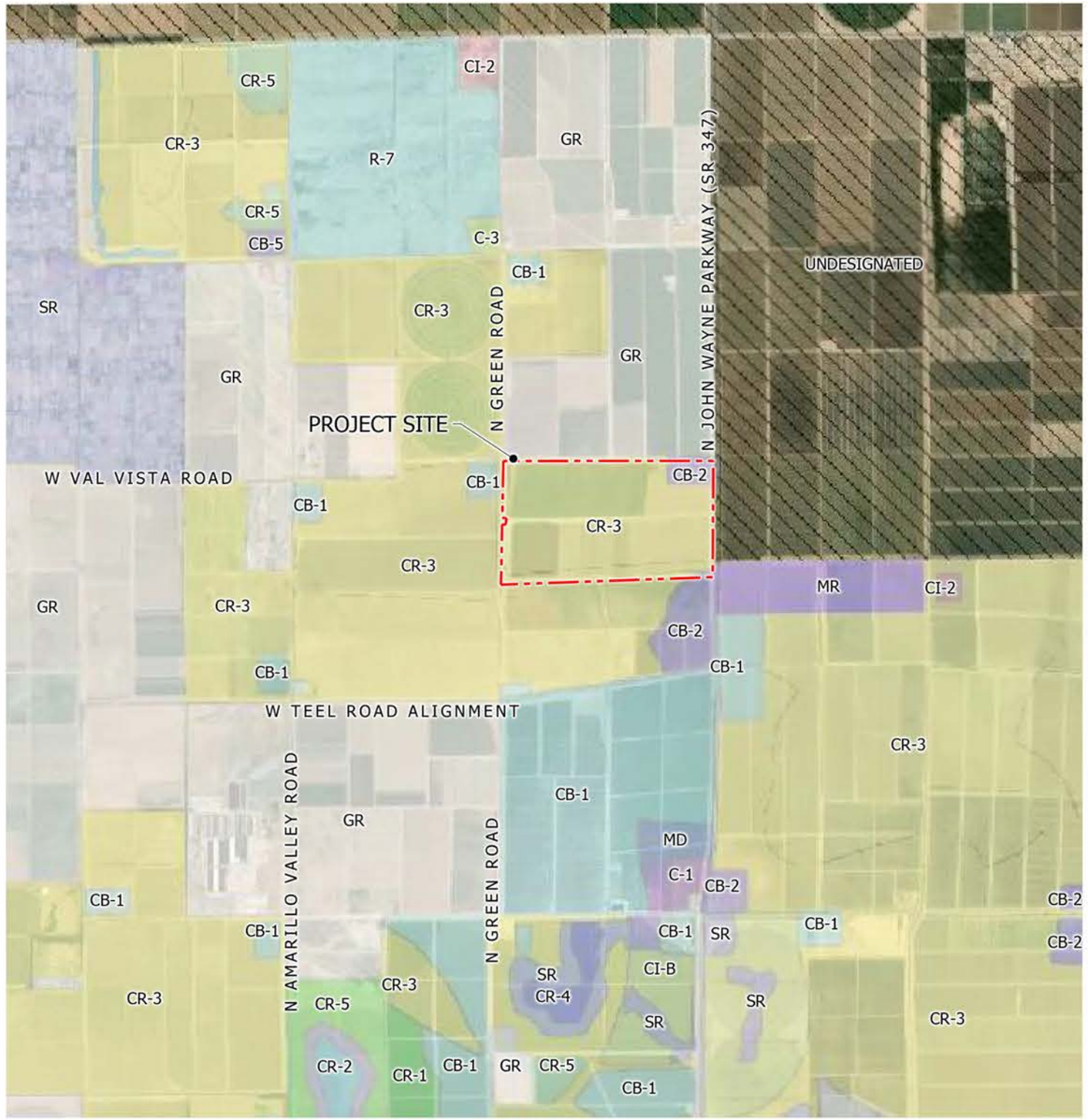
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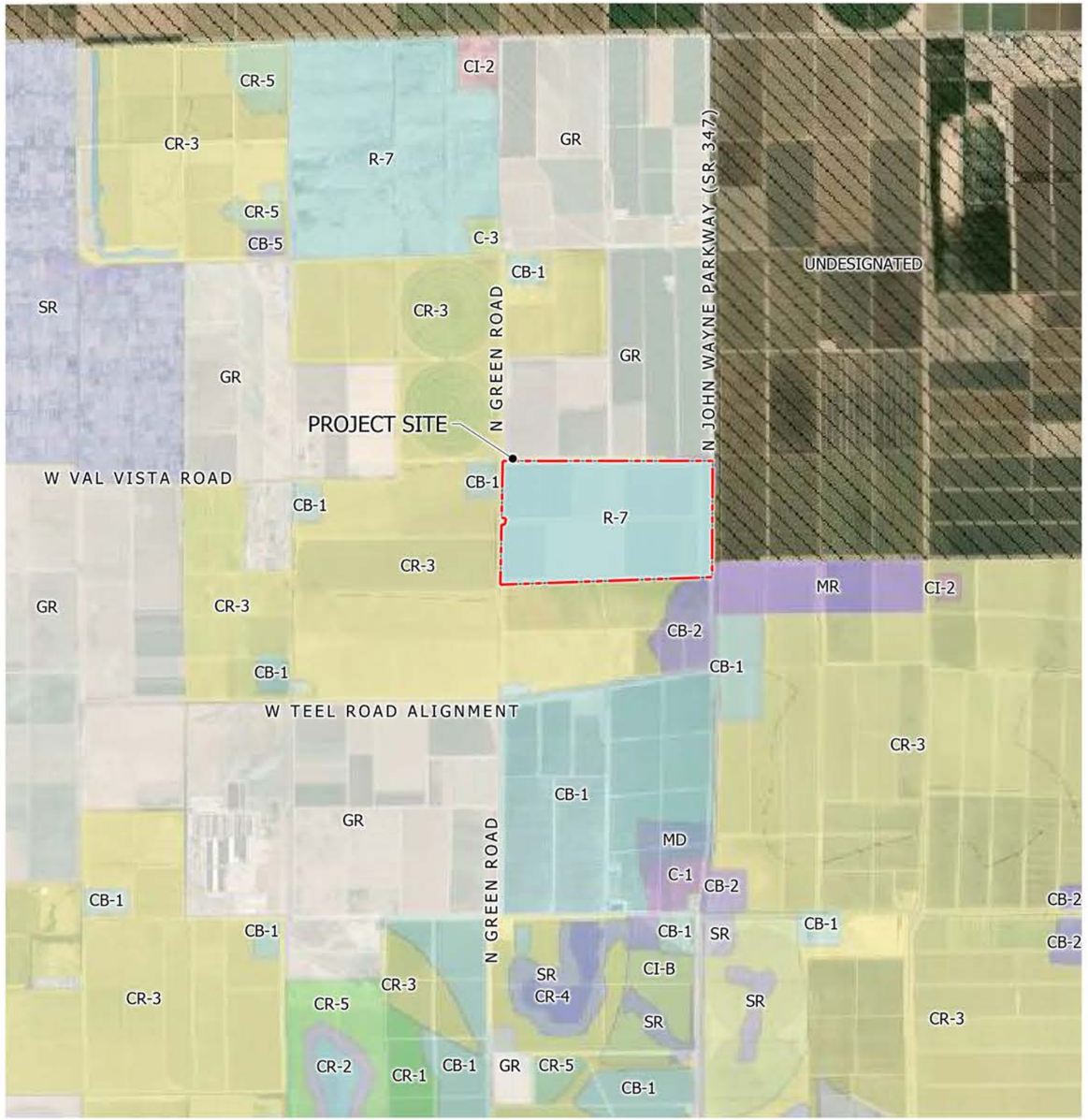


NOT TO SCALE EXHIBIT 4550 North 12th Street Phoenix, Arizona 85014 Phone 602-264-6831 http://www.cvlci.com	SUNSET CANYON SLOPE ANALYSIS EXHIBIT	CVL CONSULTANTS 01 OF 01



EXISTING ZONING DISTRICTS

- SR - SUBURBAN RANCH ZONE
- CR-1 - SINGLE FAMILY RESIDENCE
- CR-2 - SINGLE FAMILY RESIDENCE
- CR-3 - SINGLE FAMILY RESIDENCE
- CR-4 - MULTIPLE RESIDENCE
- CR-5 - MULTIPLE RESIDENCE
- CB-1 - LOCAL BUSINESS ZONE
- CB-2 - GENERAL BUSINESS ZONE
- MR - MULTIPLE RESIDENCE
- MD - MIXED DWELLING
- C-1 - NEIGHBORHOOD COMMERICIAL
- C-2 - COMMUNITY COMMERCIAL
- CI-B - INDUSTRIAL BUFFER
- CI-2 - INDUSTRIAL
- R-7 - SINGLE RESIDENCE
- GR - GENERAL RURAL



PROPOSED ZONING DISTRICTS

- R-7 - SINGLE RESIDENCE

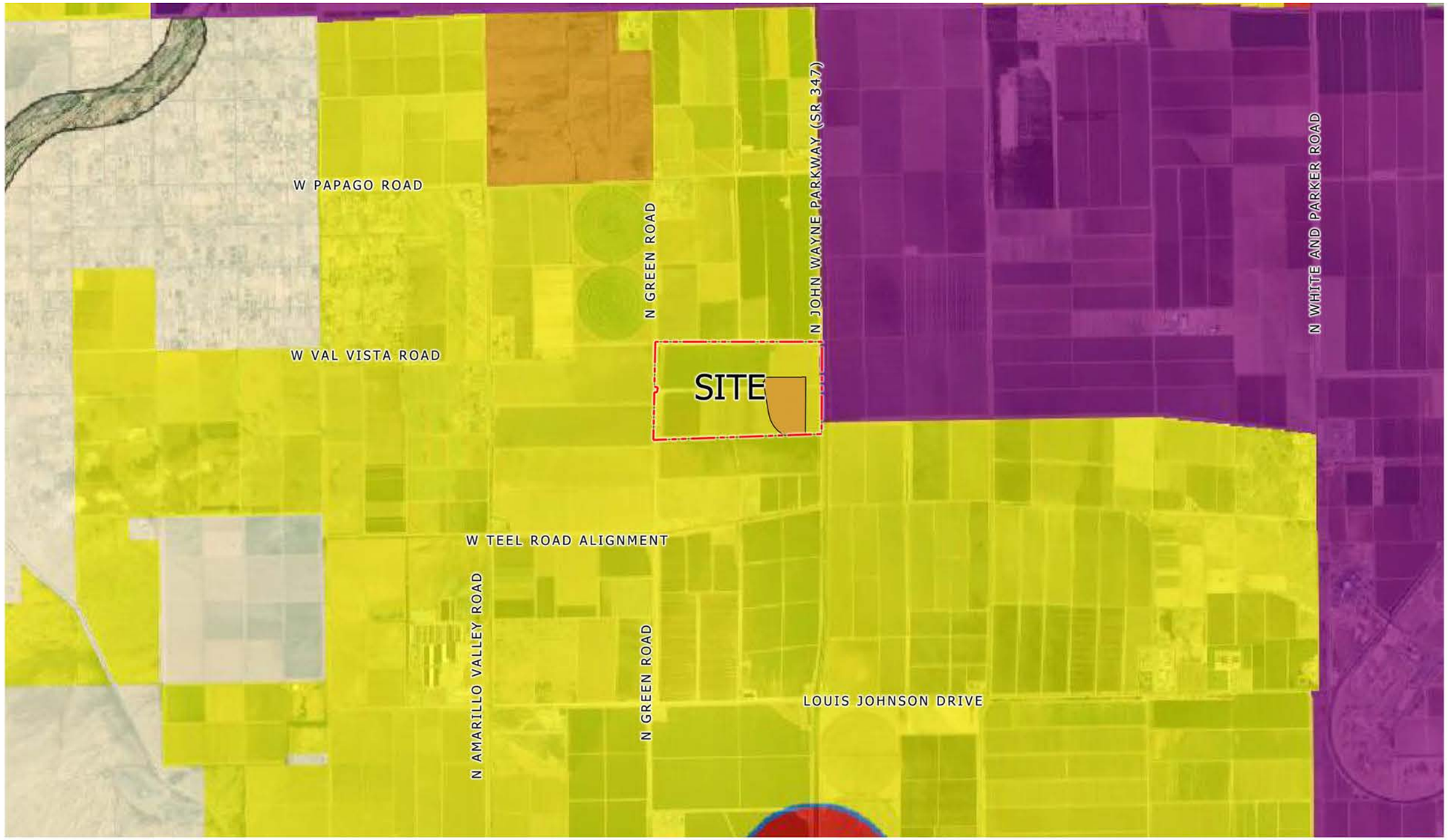
Exhibit 4: Existing and Proposed Zoning Map



EXISTING LAND USE

- VERY LOW DENSITY RESIDENTIAL (0 - 1 DU/AC)
- MODERATE LOW DENSITY RESIDENTIAL (1 - 3.5 DU/AC)
- MEDIUM DENSITY RESIDENTIAL (3.5 - 8 DU/AC)
- MID INTENSITY ACTION CENTER
- EMPLOYMENT

Exhibit 5: Existing Comprehensive Plan Map



CONFORMANCE WITH ALTERNATIVE LAND USES FOR MODERATE LOW DENSITY RESIDENTIAL

- VERY LOW DENSITY RESIDENTIAL (0 - 1 DU/AC)
- MODERATE LOW DENSITY RESIDENTIAL (1 - 3.5 DU/AC)
- MEDIUM DENSITY RESIDENTIAL (3.5 - 8 DU/AC)
- HIGH DENSITY RESIDENTIAL (8-24 DU/AC)
- GENERAL COMMERCIAL
- EMPLOYMENT
- MID INTENSITY ACTION CENTER

Table 1: Conformance with Alternative Land Uses for Moderate Low Density Residential

Proposed Land Use	Acreage Requirement	Proposed Acreage	Proposed Units	Proposed Density
Moderate Low Density Residential (1-3.5 DU/AC)	NA	324.10 AC	1,133 DU	3.5 DU/AC
Medium Density Residential (3.5-8 DU/AC)	25-50 AC	49.92 AC	399 DU	8.0 DU/AC
	Total	**374.02 AC**	**1,532 DU**	

Exhibit 6: Alternative Land Use Conformance Map

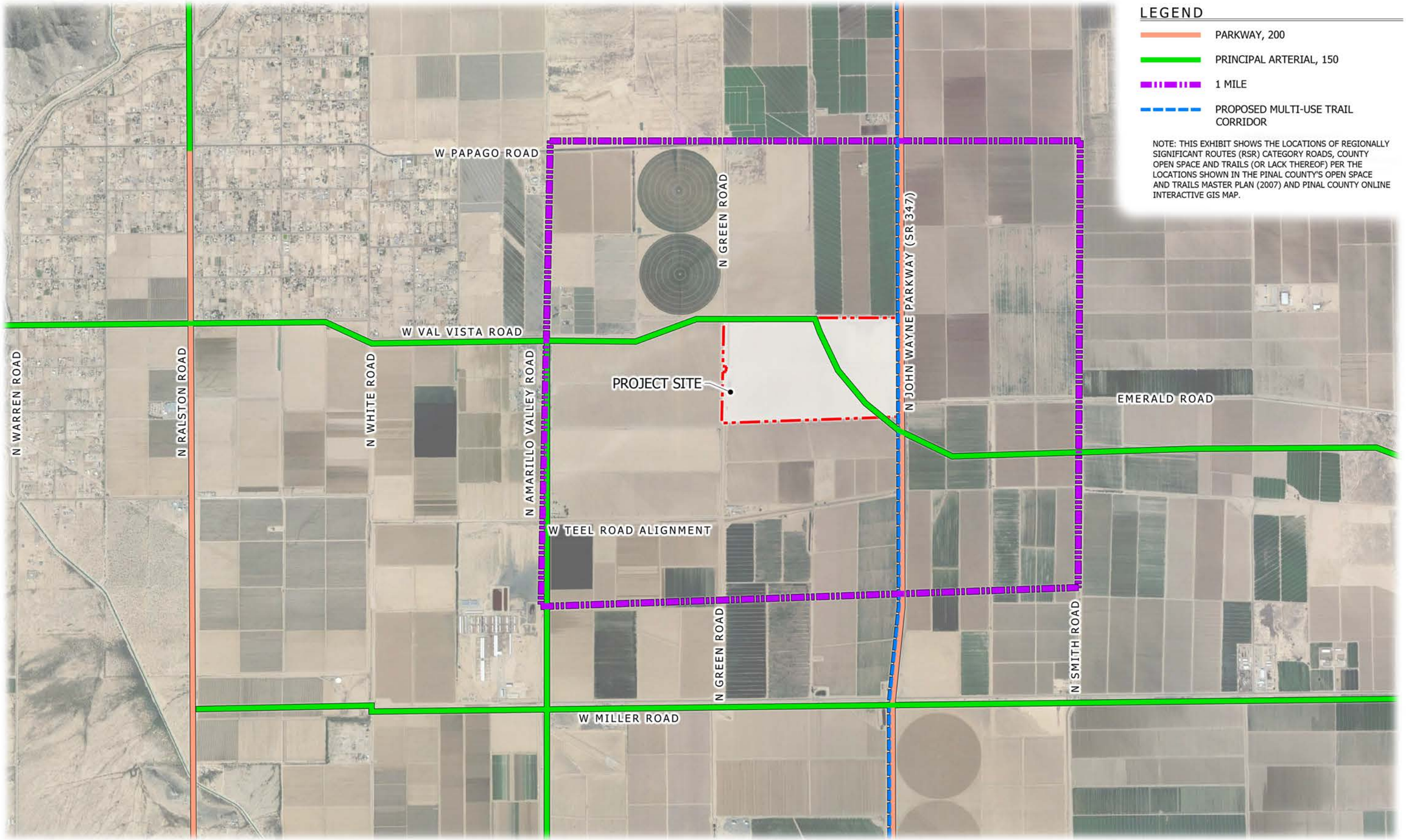


Exhibit 7: Pinal County Trails, Roadways, and Access Context Map

SITE DATA			
GROSS ACREAGE	374.02 AC.		4.10 D.U./AC.
NET ACREAGE	354.00 AC.		
DRAINAGE CHANNEL[1]	37.41 AC.		
DEDICATED OPEN SPACE	12.83 AC.		
TRAIL AREAS	11.97 AC.		
POCKET PARKS	10.88 AC.		
NEIGHBORHOOD PARK	3.56 AC.		
TOTAL OPEN SPACE	76.65 AC.		20.49%

DESCRIPTION	ACREAGE	USE	UNITS	UNIT PERCENTAGE
PARCEL 1.1	25.27 AC.	50'x120'	140 D.U.	9.14%
PARCEL 1.2	26.11 AC.	45'x120'	176 D.U.	11.49%
PARCEL 1.3	28.28 AC.	55'x120'	133 D.U.	8.68%
PARCEL 1.4	33.41 AC.	50'x120'	166 D.U.	10.84%
PARCEL 1.5	29.31 AC.	40'x115'	182 D.U.	11.88%
PARCEL 1.6	14.07 AC.	ES		
PARCEL 1.7	24.45 AC.	45'x120'	157 D.U.	10.25%
PARCEL 1.8	21.91 AC.	45'x120'	117 D.U.	7.64%
PARCEL 1.9	24.08 AC.	50'x120'	116 D.U.	7.57%
PARCEL 1.10	21.25 AC.	55'x120'	122 D.U.	7.96%
PARCEL 1.11	32.95 AC.	40'x115'	223 D.U.	14.56%
ELEMENTARY SCHOOL	14.07 AC.	ES		
40'X115'	62.26 AC.	40'x115'	405 D.U.	26.44%
45'X120'	72.47 AC.	45'x120'	450 D.U.	29.37%
50'X120'	82.76 AC.	50'x120'	422 D.U.	27.55%
55'X120'	49.53 AC.	55'x120'	255 D.U.	16.64%
SUNSET CANYON TOTAL	281.09 AC.		1,532 D.U.	

1. DRAINAGE CHANNEL TO BE INCLUDE IN DEDICATED OPEN SPACE ON "CONCEPTUAL OPEN SPACE EXHIBIT" TABLE.

LEGEND

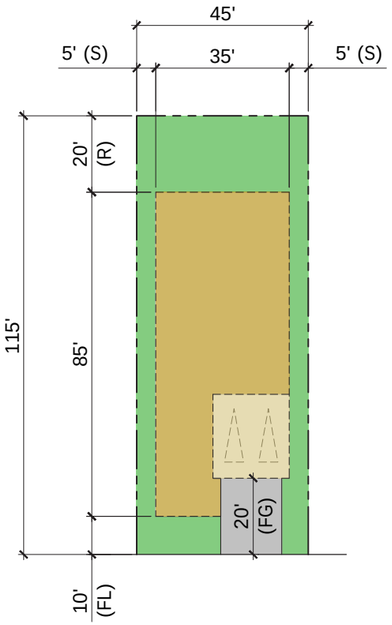
MAJOR ENTRY MONUMENT

Exhibit 8: Site Plan

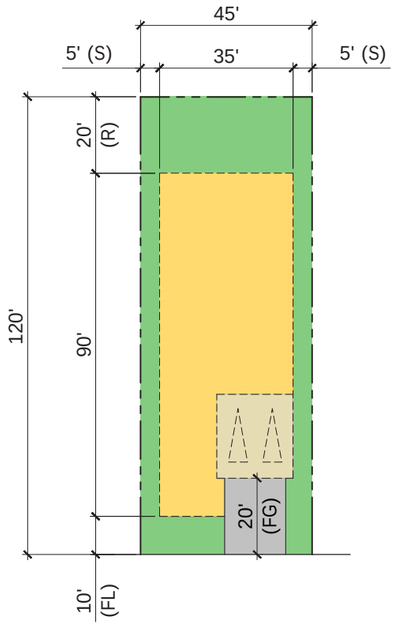
SITE DATA				
GROSS ACREAGE	374.02 AC.		4.10 D.U./AC.	
NET ACREAGE	354.00 AC.			
DRAINAGE CHANNEL [1]	37.41 AC.			
DEDICATED OPEN SPACE	12.83 AC.			
TRAIL AREAS	11.97 AC.			
POCKET PARKS	10.88 AC.			
NEIGHBORHOOD PARK	3.56 AC.			
TOTAL OPEN SPACE	**76.65 AC.**		**20.49%**	
DESCRIPTION	**ACREAGE**	**USE**	**UNITS**	**UNIT PERCENTAGE**
PARCEL 1.1	25.27 AC.	50'x120'	140 D.U.	9.14%
PARCEL 1.2	26.11 AC.	45'x120'	176 D.U.	11.49%
PARCEL 1.3	28.28 AC.	55'x120'	133 D.U.	8.68%
PARCEL 1.4	33.41 AC.	50'x120'	166 D.U.	10.84%
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55'X120'	49.53 AC.	55'x120'	255 D.U.	16.64%
SUNSET CANYON TOTAL	**281.09 AC.**		**1,532 D.U.**	

1. DRAINAGE CHANNEL TO BE INCLUDE IN DEDICATED OPEN SPACE ON "CONCEPTUAL OPEN SPACE EXHIBIT" TABLE.

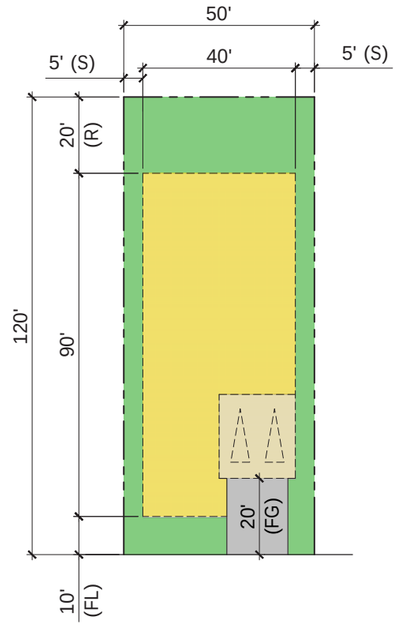
Exhibit 9: Site Data Table - Enlarged



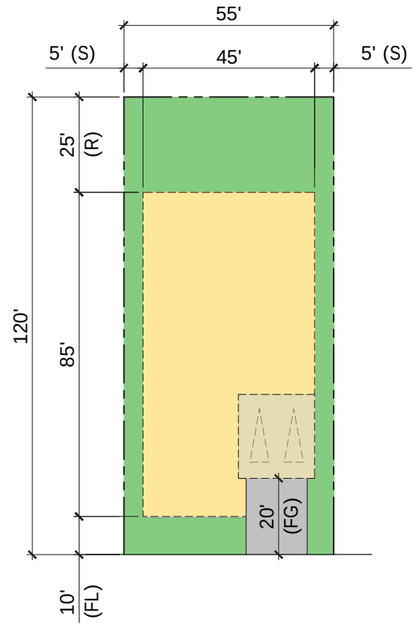
45' X 115' LOT FIT DIAGRAMS



45' X 120' LOT FIT DIAGRAMS

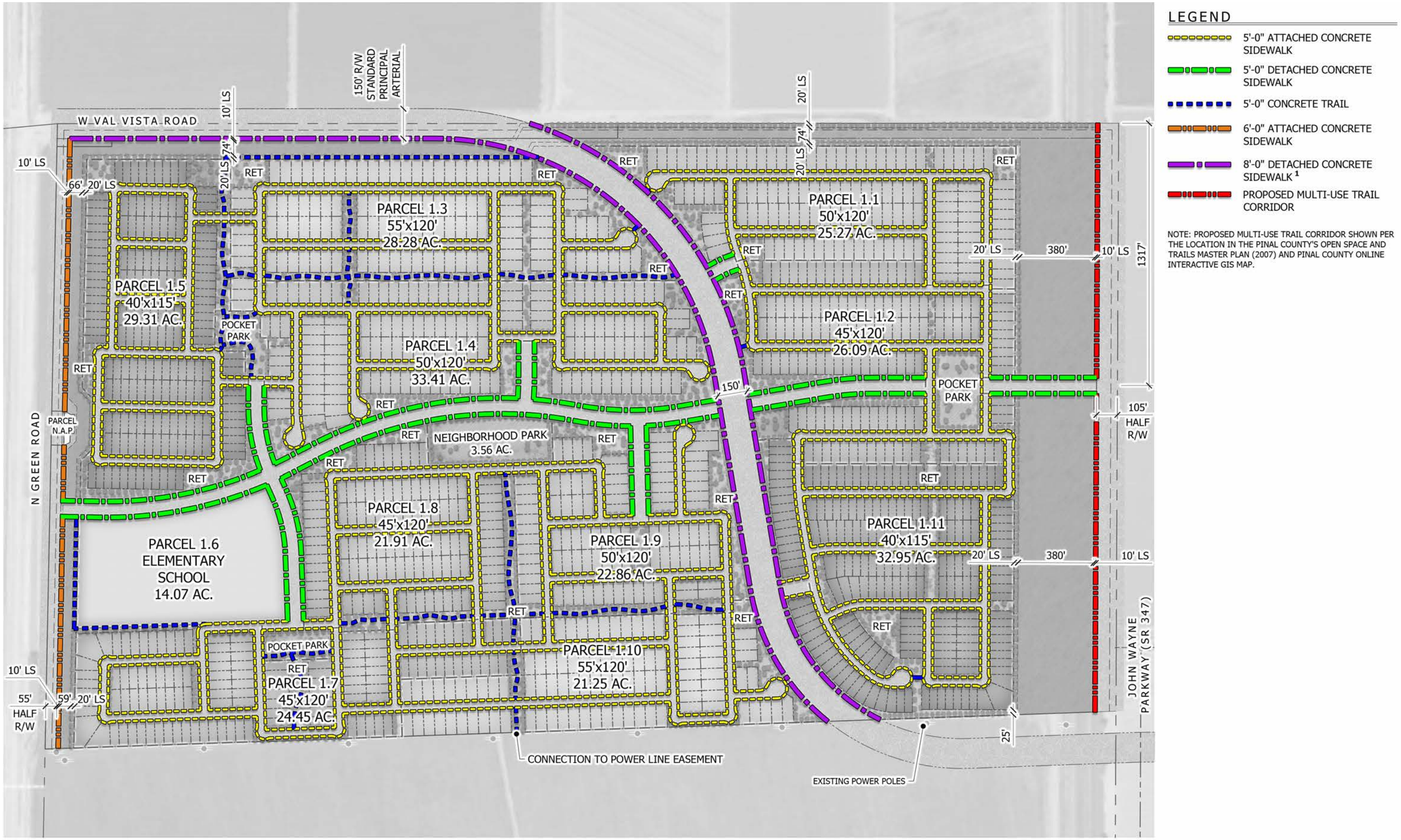


50' X 120' LOT FIT DIAGRAMS



55' X 120' LOT FIT DIAGRAMS

SETBACKS
(FL) FRONT LIVING
(FG) FRONT GARAGE
(R) REAR SETBACK
(S) SIDE SETBACK



LEGEND

- 5'-0" ATTACHED CONCRETE SIDEWALK
- 5'-0" DETACHED CONCRETE SIDEWALK
- 5'-0" CONCRETE TRAIL
- 6'-0" ATTACHED CONCRETE SIDEWALK
- 8'-0" DETACHED CONCRETE SIDEWALK [1]
- PROPOSED MULTI-USE TRAIL CORRIDOR

NOTE: PROPOSED MULTI-USE TRAIL CORRIDOR SHOWN PER THE LOCATION IN THE PINAL COUNTY'S OPEN SPACE AND TRAILS MASTER PLAN (2007) AND PINAL COUNTY ONLINE INTERACTIVE GIS MAP.

Exhibit 11: Circulation and Trails Plan

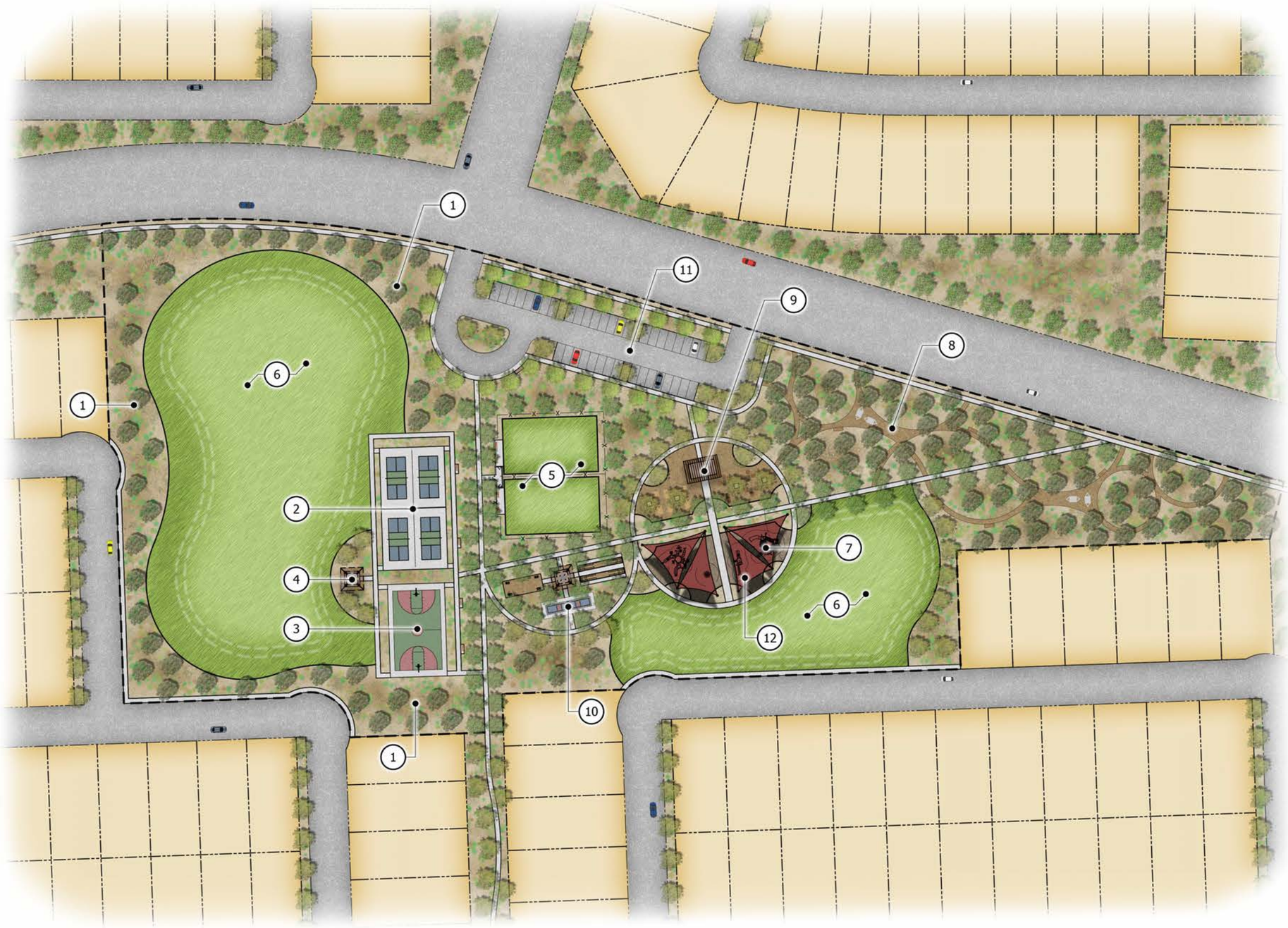


OPEN SPACE TABLE				
GROSS ACREAGE [1]	374.02 Ac.			
	REQUIRED		PROVIDED	
DESCRIPTION	%	ACREAGE	%	ACREAGE
NEIGHBORHOOD PARK (ACTIVE RECREATIONAL)				3.56 AC.
POCKET PARK (ACTIVE RECREATIONAL)				10.88 AC.
TRAIL AREAS (ACTIVE RECREATIONAL)				11.97 AC.
DRAINAGE CHANNEL				37.41 AC.
TOTAL ACTIVE RECREATIONAL OPEN SPACE	7.00%	26.18 Ac.	7.06%	26.41 AC.
DEDICATED OPEN SPACE [1, 2]	11.00%	41.14 Ac.	13.43%	50.24 AC.
TOTAL OPEN SPACE	18.00%	67.32 Ac.	20.49%	76.65 AC.

1. DEDICATED OPEN SPACE TO BE DETERMINED AT FINAL SITE DESIGN.
2. DEDICATED OPEN SPACE INCLUDES DRAINAGE CHANNEL.

NOTE: ACTIVE RECREATIONAL SPACES TO INCLUDE: COMMUNITY AND POCKET PARKS THAT MAY INCLUDE AMENITIES SUCH AS GARDENS, RAMADAS, TOT LOTS, SEATING, DOG PARKS, AND OPEN PLAY/TURF AREAS.

Exhibit 12: Open Space and Amenities Plan



LEGEND

1. LANDSCAPE AREA
2. PICKELBALL COURTS
3. BASKETBALL COURTS
4. RAMADA
5. DOG PARKS
6. ACTIVE TURF AREA
7. TOT LOT PLAY STRUCTURE
8. ADVENTURE TRAIL
9. PICNIC AREA
   - RAMADA
   - CHESS TABLES
   - PICNIC TABLE
10. ADULT GAME AREA
    - HORSESHOES
    - BOCCE BALL COURT
    - BAG TOSS
    - RAMADA
11. PARKING
12. SHADE STRUCTURE

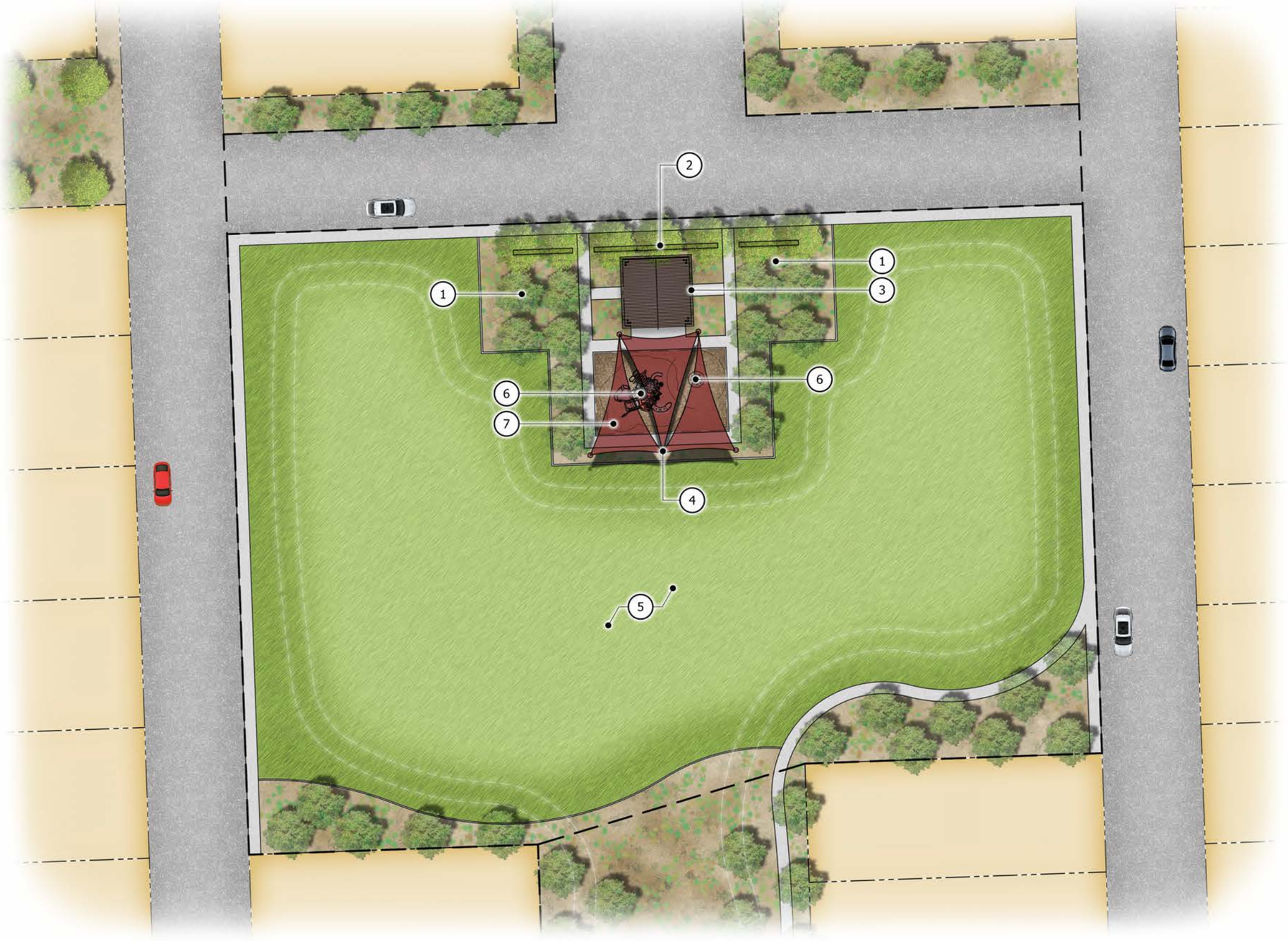
Exhibit 13: Conceptual Neighborhood Park



LEGEND

1. LANDSCAPE AREA
2. RAMADA
3. BOCCE BALL COURT
4. ACTIVE TURF AREA
5. TOT LOT PLAY STRUCTURE
6. PLAY SURFACING
7. BAG TOSS
8. BBQ STATION
9. PICNIC TABLE
10. BENCH

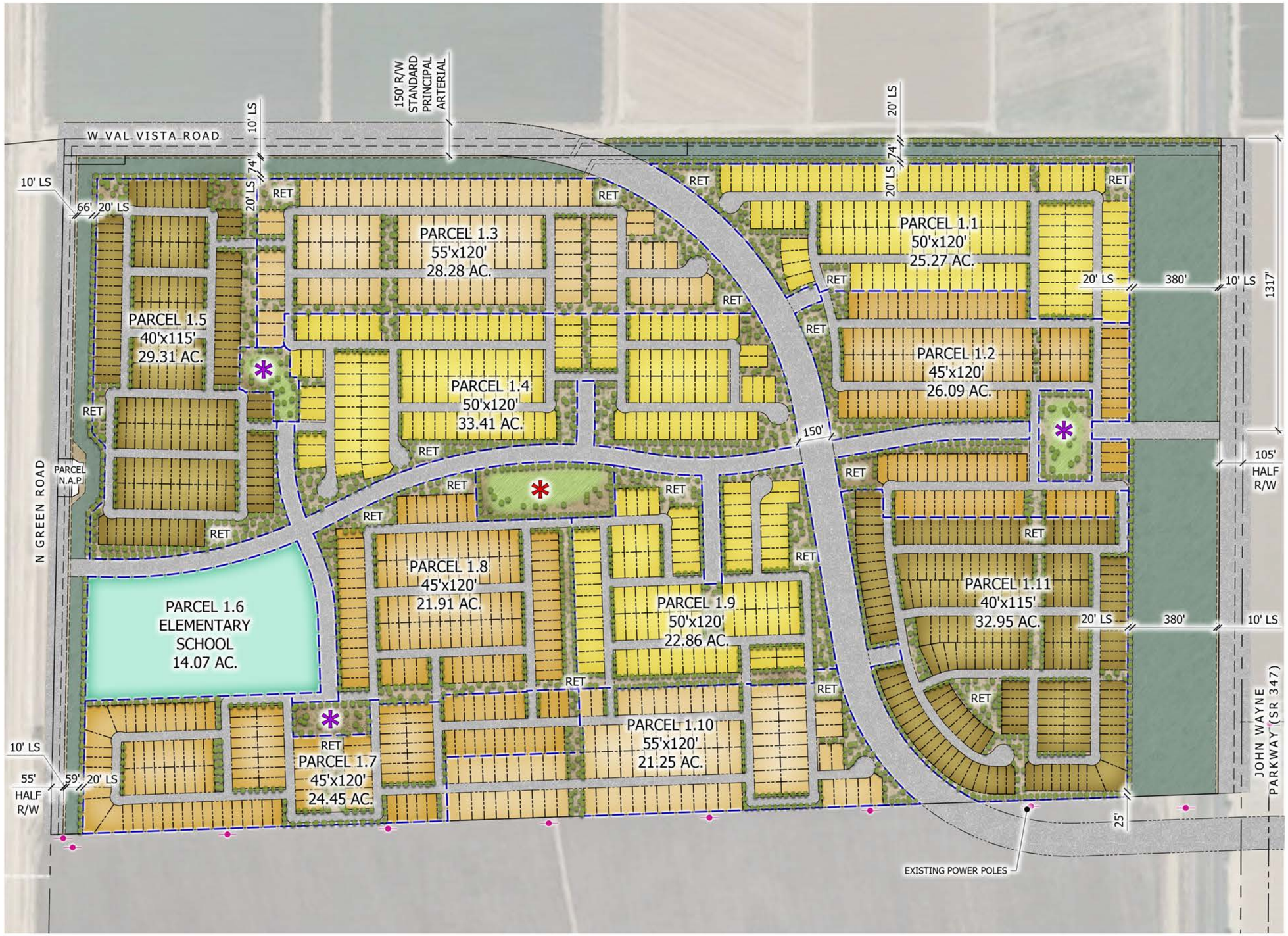
Exhibit 14: Conceptual Pocket Park A



LEGEND

1. LANDSCAPE AREA
2. SEAT WALL
3. RAMADA
4. SHADE STRUCTURE
5. ACTIVE TURF AREA
6. TOT LOT PLAY STRUCTURE
7. PLAY SURFACING

Exhibit 15: Conceptual Pocket Park B



LEGEND

CANOPY AND ORNAMENTAL TREES — 24"-36" BOX
24"-36" BOX
TREES TO BE SELECTED AND PLANTED PER ANA STANDARDS

SHRUBS AND GROUNDCOVER — 1-5 GALLON
SHRUB DENSITY PER PINAL COUNTY STANDARDS
ALL LANDSCAPE AREAS TO RECEIVE 2" COVER OF DECOMPOSED GRANITE

TURF
MID-IRON SOD

NOTE:
PLEASE REFER TO THE MASTER PLANT PALETTE IN THE PAD FOR A COMPLETE LIST OF PROPOSED PLANT MATERIALS

NEIGHBORHOOD PARK

POCKET PARK

PLANTING NOTES:
ALL FIVE (5) GALLON SHRUBS SHALL BE PLANTED AT A RATE OF FIVE SHRUBS PER 30 FEET OF LINEAR STREET FRONTAGE

- FIVE (5) GALLON SHRUBS WITHIN RECREATION AREAS SHALL BE PLANTED AT A RATE OF SEVEN (7) SHRUBS PER 1,000 SQUARE FEET OF SURFACE AREA PROVIDED
- THE MINIMUM NUMBER OF TREES REQUIRED SHALL BE PLANTED PER THE OPEN SPACE AND RECREATION AREA MANUAL
- TWENTY-FIVE PERCENT (25%) OF THE TREES REQUIRED SHALL BE AT LEAST 24" BOX SIZE
- DECORATIVE DESIGN ELEMENTS SUCH AS BENCHES AND PAVING ACCENTS SHALL BE PROVIDED WHERE APPROPRIATE TO ENHANCE THE OPEN SPACE AREAS
- NO WASH CORRIDORS OR NATURAL FEATURES EXIST WITHIN THE SITE
- A VEGETATIVE SALVAGE PLAN DOES NOT EXIST FOR THE SITE AS IT IS EXISTING FARMLAND
- THERE IS NO CONSERVATION OPEN SPACE WITHIN THE SITE OR VICINITY
- LOCATION OF TREES AND SHRUBS SHALL BE PROVIDED DURING THE CONSTRUCTION DOCUMENTATION PROCESS AND SHALL MEET THE MINIMUM STANDARDS AND SPECIFICATIONS OF THE ARIZONA NURSERYMAN'S ASSOCIATION OR ARIZONA ASSOCIATION OF NURSERYMEN
- RIPARIAN VEGETATION AND BIOLOGICAL HABITATS ARE NOT PRESENT ON THE SITE
- A MINIMUM OF 25% OF EACH RECREATION AREA WILL SHALL BE DRY AND NOT USED AS RETENTION/DETENTION

Exhibit 16: Conceptual Landscape Plan

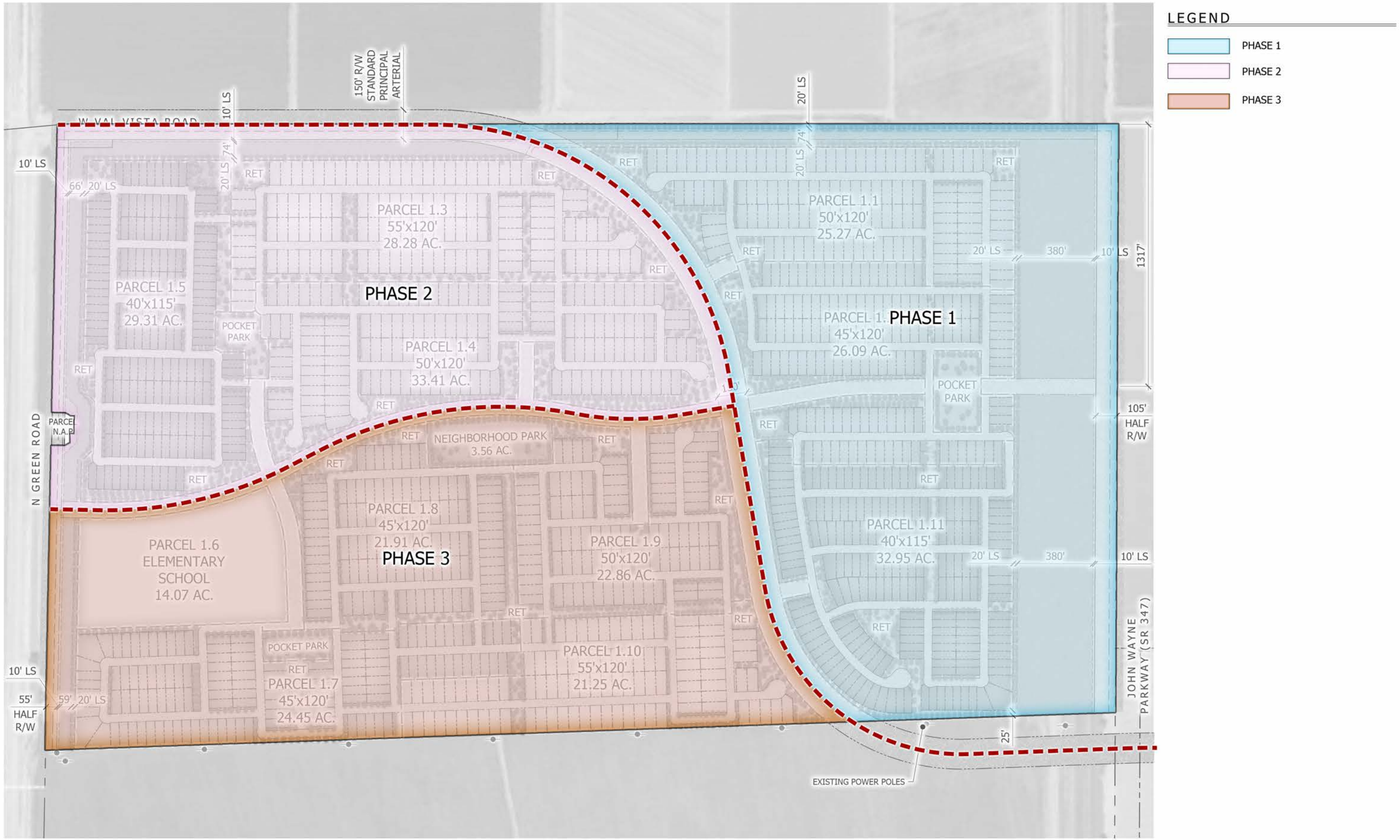
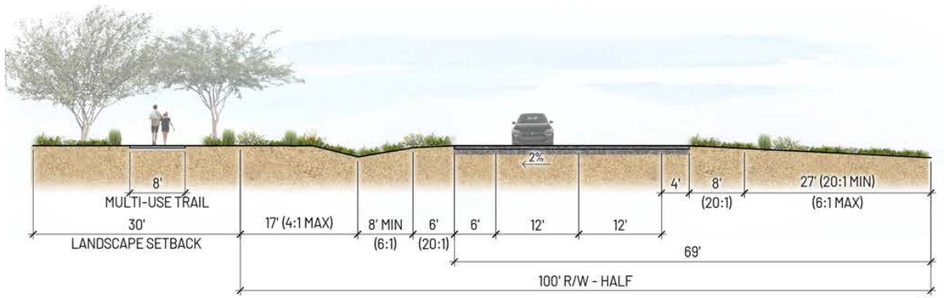
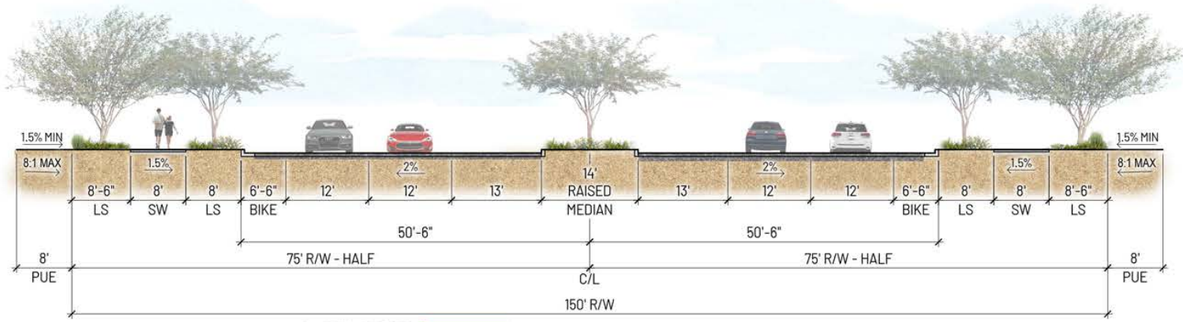


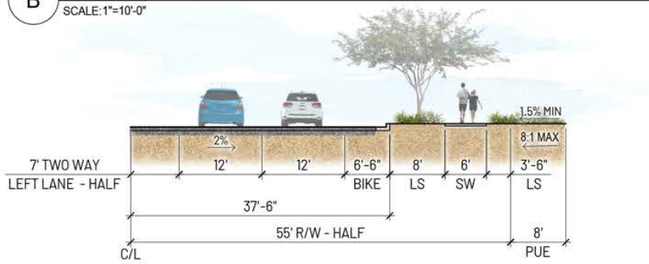
Exhibit 17: Conceptual Phasing Plan



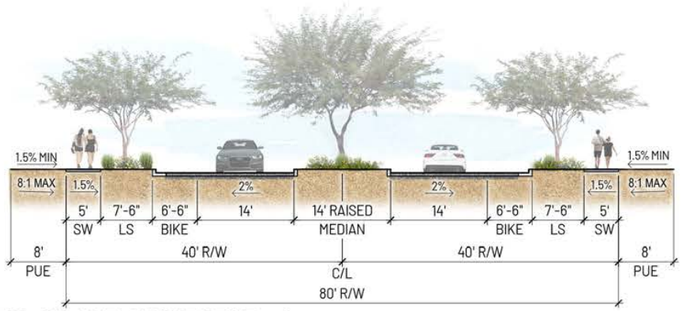
A JOHN WAYNE PARKWAY - HALF STREET
SCALE: 1"=10'-0"



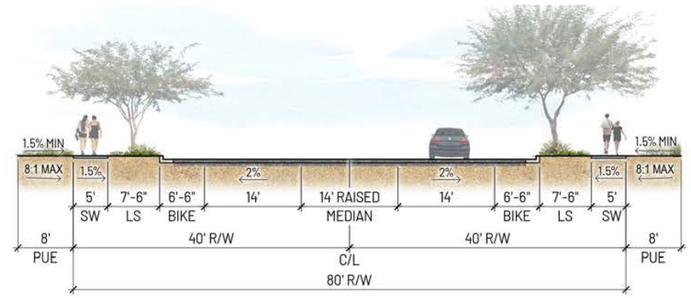
B PRINCIPAL ARTERIAL
B1: FULL STREET
B2: HALF STREET
FULL STREET WHERE APPLICABLE. SEE KEY MAP
SCALE: 1"=10'-0"



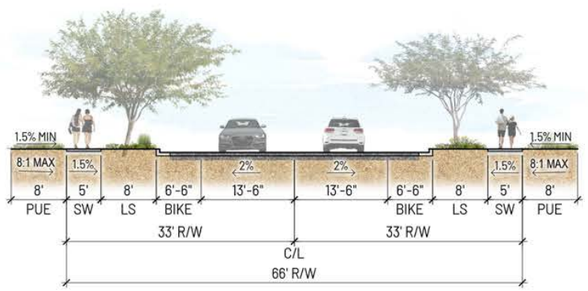
C MINOR ARTERIAL
SCALE: 1"=10'-0"



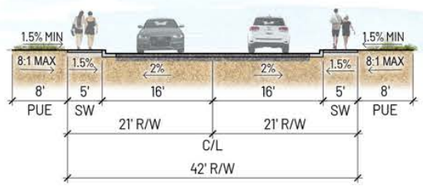
D MAJOR COLLECTOR - A
SCALE: 1"=10'-0"



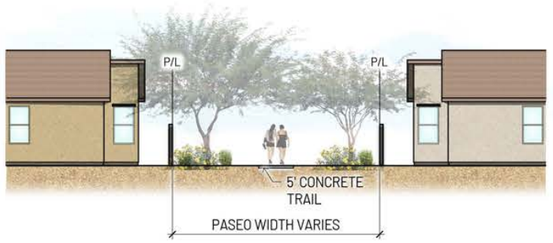
E MAJOR COLLECTOR - B
SCALE: 1"=10'-0"



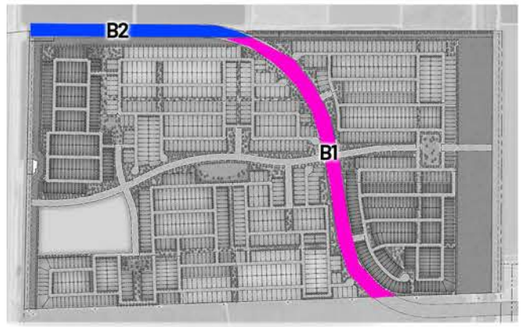
F MINOR COLLECTOR
SCALE: 1"=10'-0"



G LOCAL STREET - C
SCALE: 1"=10'-0"



H Concrete Trail Within Paseo
SCALE: 1"=10'-0"



KEY MAP
N.T.S

Sunset Canyon Neighborhood Meeting Report

Meeting Location: Harrah's Ak -Chin Casino Meeting Room 3, 15406 N. Maricopa Road, Maricopa, AZ 85139

Meeting Date: November 1, 2023

Meeting Time: 6-7pm

The neighborhood meeting began at approximately 6:00 pm.

There were no attendees who showed up for the meeting aside from Alex Fish, the presenter. As there were no attendees, the blank sign in sheet has not been included with this report.

The meeting adjourned at approximately 6:45. There were no questions or comments received.

The applicant notes that one notification mailer was returned by post as undeliverable due to the address being vacant. This was the Arizona RR Ranches, LLC at 1121 W. Warner Road Suite 100 in Tempe, AZ 85251.

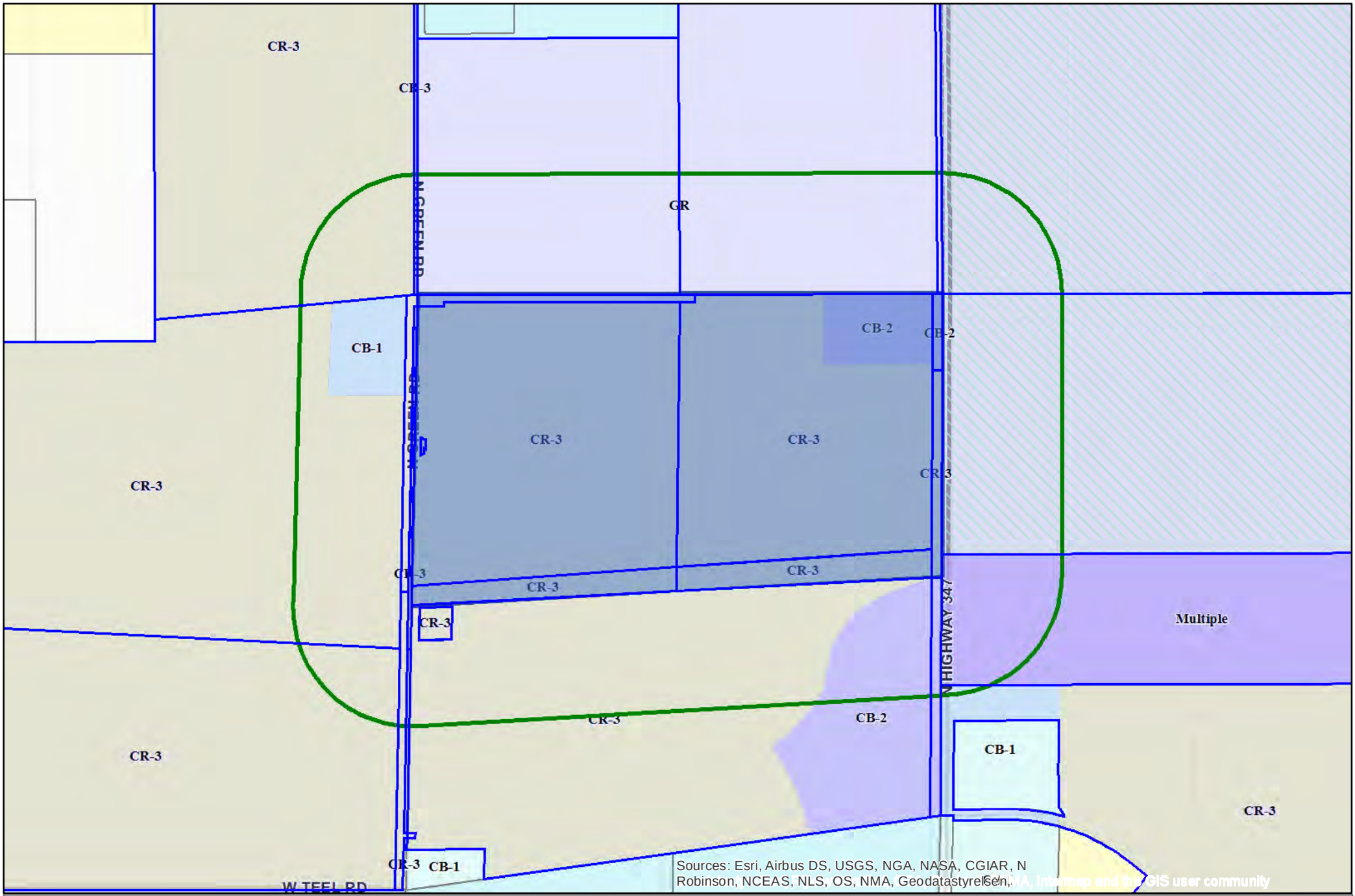
310 E Rio Salado Parkway
Tempe, AZ 85281

480.530.0077
info@ablastudio.com

ABLASTUDIO.COM

PINAL COUNTY
WIDE OPEN OPPORTUNITY

Sunset Canyon 1,200ft Buffer Map



Disclaimer: Pinal County does not guarantee that any information contained within this dataset or map is accurate, complete, or current. This data is for informational use only and does not constitute a legal document for the description of these properties. The Pinal County disclaims any responsibility or liability for any direct or indirect damages resulting from the use of this data. The boundaries depicted within this dataset or map are for illustrative purposes only. Users should independently research, investigate, and verify all information before relying on this map or using this map in the preparation of legal documents.

,

TRES POINTS LLC
15420 E SILVER CREEK CT
GILBERT, AZ 85298

HAM MESA LLC
PO BOX 15662
PHOENIX, AZ 85060

,

HAM MESA LLC
PO BOX 15662
PHOENIX, AZ 85060

PINAL COUNTY
PO BOX 827
FLORENCE, AZ 85132

,

TRES POINTS LLC
15420 E SILVER CREEK CT
GILBERT, AZ 85298

,

,

HAM SUNSET LLC
PO BOX 15662
PHOENIX, AZ 85060

AMARILLO CREEK SOUTH LLC ...
5346 E CALLE DEL NORTE
PHOENIX, AZ 85018

,

ARIZONA RR RANCHES LLC
1121 W WARNER RD STE 100
TEMPE, AZ 85251

PRATT EDWARD C TRUSTEE
45065 W PAPAGO RD
MARICOPA, AZ 85139

,

HAM SUNSET LLC
PO BOX 15662
PHOENIX, AZ 85060

,

,

GLOBAL WATER - SANTA CRUZ ...
21410 N 19TH AVE STE 220
PHOENIX, AZ 85027

,

HAM SUNSET LLC
PO BOX 15662
PHOENIX, AZ 85060

ARIZONA RR RANCHES LLC
1121 W WARNER RD STE 100
TEMPE, AZ 85251

HAM MESA LLC
PO BOX 15662
PHOENIX, AZ 85060

HAM MESA LLC
PO BOX 15662
PHOENIX, AZ 85060

HAM SUNSET LLC
PO BOX 15662
PHOENIX, AZ 85060

Notice of Neighborhood Meeting

October 18, 2023

Dear Neighbor,

You are cordially invited to a neighborhood meeting hosted by ABLA on behalf of Zeitlin Capital regarding a proposed Rezoning and Planned Area Development (PAD) applications in your area. This meeting notification is being sent to all property owners within 1,200 feet of the subject property.

The subject property consists of approximately 374 acres located west of John Wayne Parkway and south of Val Vista Road Pinal County, Arizona. The location of the subject property is identified on the map on the reverse side of this letter.

Zeitlin Capital intends to submit applications to Pinal County requesting; (1) a Rezoning from Single Residence CR-3 and General Business (CB-2) to Single Residence (R-7) , Multiple Residence (MR), and Community Commercial (C-2), with a Planned Area Development (PAD) overlay in order to facilitate single-family, multi-family, and commercial development.

Please note that at this stage, there are ongoing discussions with Pinal County regarding regional drainage flows across the property as well as the Val Vista Road alignment that may have an impact on the final design and unit count of the proposed Site Plan that may cause a loss of residential units.

A virtual neighborhood meeting will be held at the time listed below to discuss the proposed applications and answer any questions you may have.

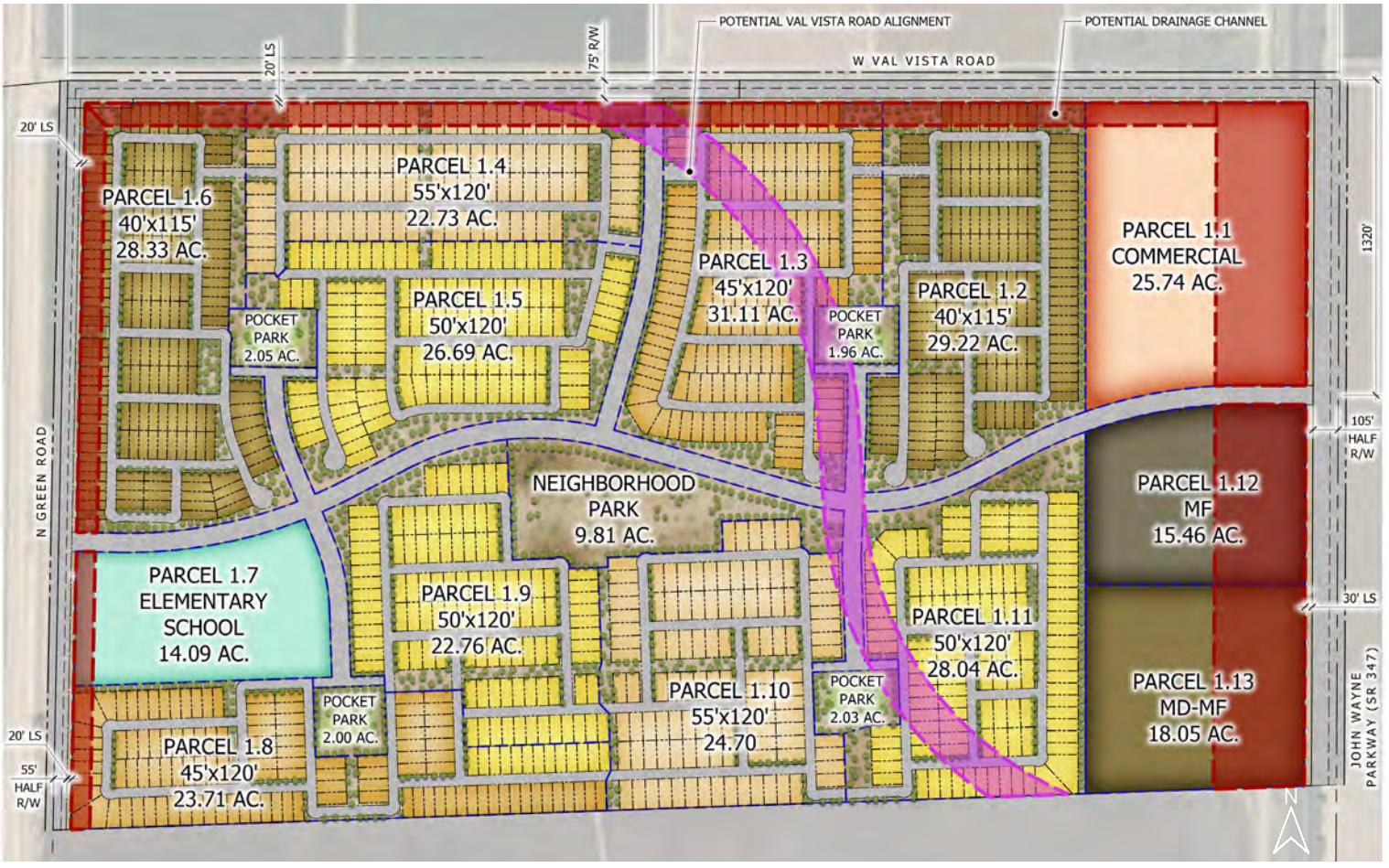
Wednesday, November 1, 2023
6:00 PM – 7:00 PM
Harrah's Ak-Chin Casino Events Center
Meeting Room 3
15406 N. Maricopa Rd.
Maricopa, AZ 85139

If you have any questions or comments regarding the above referenced applications or the neighborhood meeting, please contact Alex Fish at ABLA, (480) 530-0077 or alex.fish@ablastudios.com. Comments or questions related to these applications may also be communicated to Sangeeta Doekar at Pinal County at (520) 866-6442 or sangeeta.deokar@pinal.gov.

310 E Rio Salado Parkway
Tempe, AZ 85281
480.530.0077
info@ablastudio.com
ABLASTUDIO.COM



Vicinity Map



Site Plan

Sunset Canyon

Neighborhood Meeting Presentation






Presented:
November 01, 2023

OVERVIEW

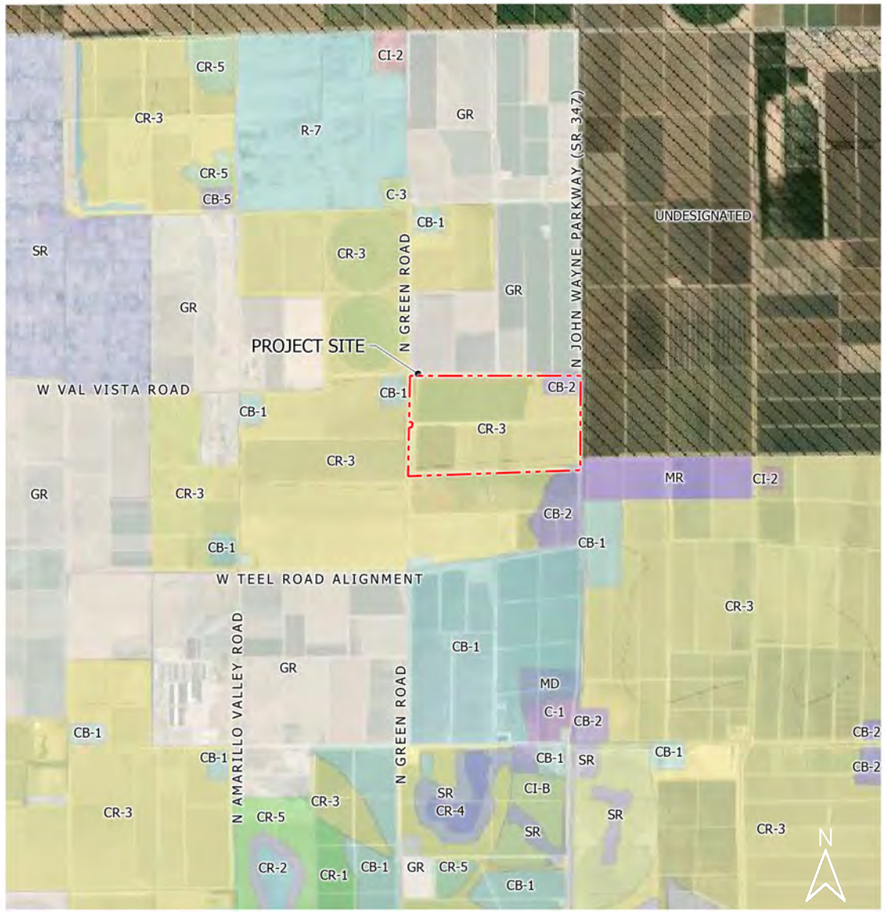
- Site Location
- Existing and Proposed Zoning Map
- Existing Comprehensive Plan Map
- Conformance with Land Use
- Existing Site Plan
- Conceptual Site Plan
- Conceptual Site Plan Data
- Circulation Plan
- Parks and Open Space Plan
- Analysis Plan





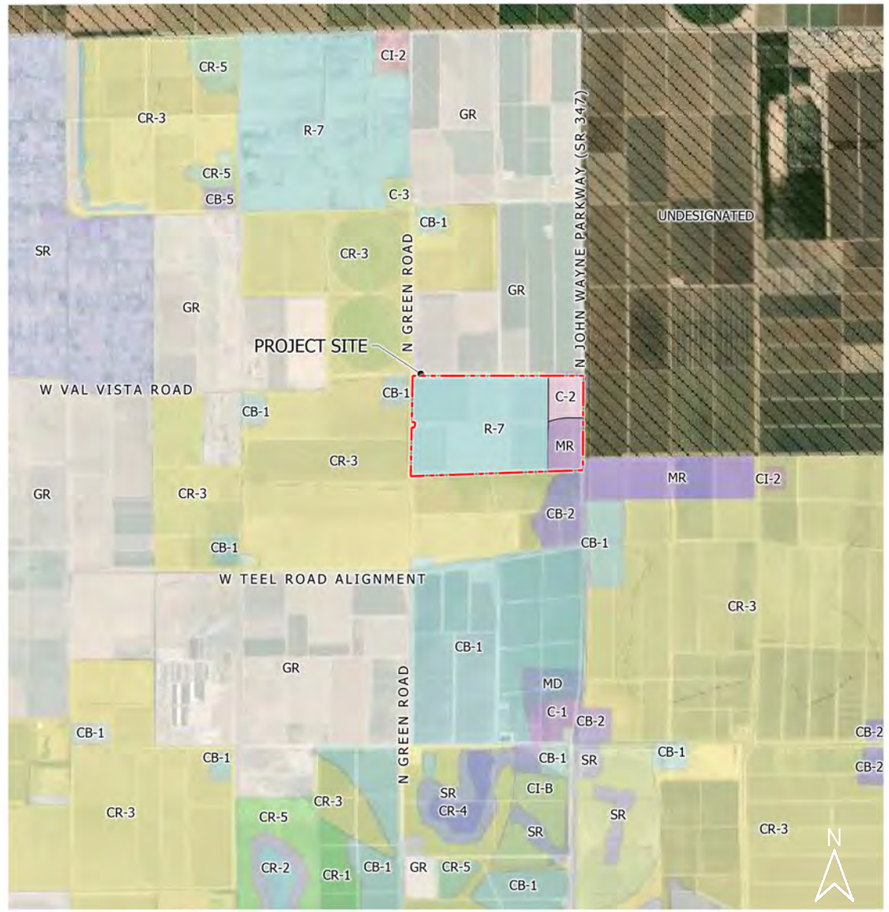
SITE LOCATION

- **Site is located at the southwest corner of Val Vista Road and John Wayne Parkway**
- **Site is approximately 373.77 gross acres (354.00 net acres) .**
- **The Site offers an opportunity to develop a variety of residential products that will support commercial and employment land uses.**



EXISTING ZONING DISTRICTS

- SR - SUBURBAN RANCH ZONE
- CR-1 - SINGLE FAMILY RESIDENCE
- CR-2 - SINGLE FAMILY RESIDENCE
- CR-3 - SINGLE FAMILY RESIDENCE
- CR-4 - MULTIPLE RESIDENCE
- CR-5 - MULTIPLE RESIDENCE
- CB-1 - LOCAL BUSINESS ZONE
- CB-2 - GENERAL BUSINESS ZONE
- MR - MULTIPLE RESIDENCE
- MD - MIXED DWELLING
- C-1 - NEIGHBORHOOD COMMERICIAL
- C-2 - COMMUNITY COMMERCIAL
- CI-B - INDUSTRIAL BUFFER
- CI-2 - INDUSTRIAL
- R-7 - SINGLE RESIDENCE
- GR - GENERAL RURAL



PROPOSED ZONING DISTRICTS

- R-7 - SINGLE RESIDENCE
- MR - MULTIPLE RESIDENCE
- C-2 - COMMUNITY COMMERCIAL

PURPOSE & INTENT

- **The Amendment modifies the Site zoning from CR-3 and CB-2 to R-7, MR, and C-2 to reflect the needs of the current market trends and the needs of Pinal County.**
- **The design of the Site provides a logical transition of intensity and density with the highest density near the commercial area and John Wayne Parkway.**



EXISTING LAND USE

- VERY LOW DENSITY RESIDENTIAL (0 - 1 DU/AC)
- MODERATE LOW DENSITY RESIDENTIAL (1 - 3.5 DU/AC)
- MEDIUM DENSITY RESIDENTIAL (3.5 - 8 DU/AC)
- MID INTENSITY ACTION CENTER
- EMPLOYMENT

COMPREHENSIVE PLAN MAP

- **The Amendment does not modify the Comprehensive Plan designation of the Site.**
- **The entire Site is designated Moderate Low Density Residential (1-3.5 du/ac)**



CONFORMANCE WITH ALTERNATIVE LAND USES FOR MODERATE LOW DENSITY RESIDENTIAL

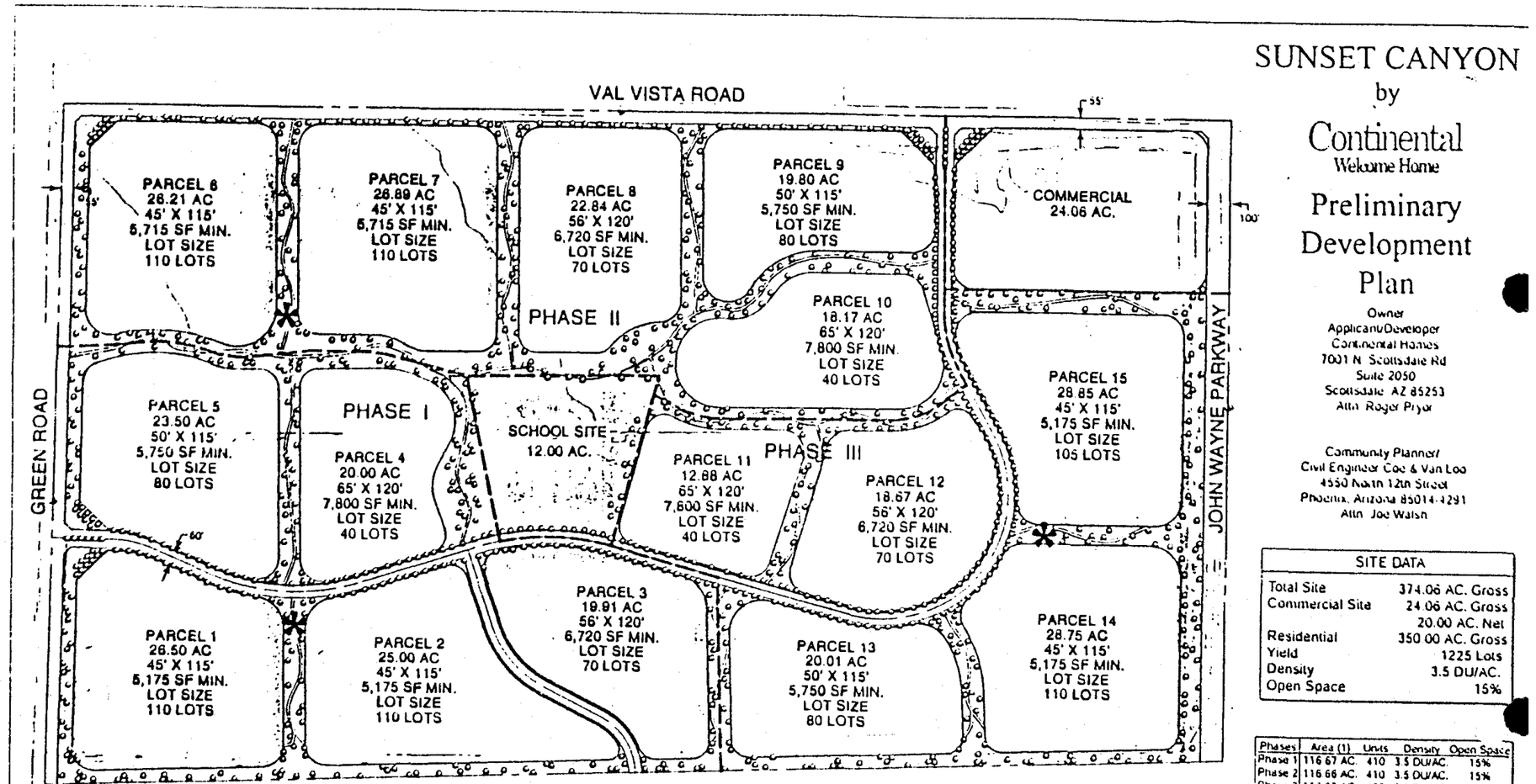
- VERY LOW DENSITY RESIDENTIAL (0 - 1 DU/AC)
- MODERATE LOW DENSITY RESIDENTIAL (1 - 3.5 DU/AC)
- MEDIUM DENSITY RESIDENTIAL (3.5 - 8 DU/AC)
- HIGH DENSITY RESIDENTIAL (8-24 DU/AC)
- GENERAL COMMERCIAL
- EMPLOYMENT
- MID INTENSITY ACTION CENTER

Table 1: Conformance with Alternative Land Uses for Moderate Low Density Residential

Proposed Land Use	Acreage Requirement	Proposed Acreage	Proposed Units	Proposed Density
Medium Low Density Residential (1-3.5 DU/AC)	NA	301.60 AC	1,170 DU	3.9 DU/AC
High Density Residential (8-24 DU/AC)	25-50 AC	39.46 AC	588 DU	14.9 DU/AC
Commercial	25-50 AC	32.71 AC	NA	
	Total	**373.77 AC**	**1,758 DU**	

CONFORMANCE WITH LAND USE

- **Within the Moderate Low Density Residential (1-3.5 du/ac) land use, the Site may include a limited amount of High Density Residential and Commercial.**
- **The Site proposes an area of High Density Residential and Commercial along John Wayne Parkway towards the areas with Employment land use.**



SUNSET CANYON

by

Continental
Welcome Home

Preliminary Development Plan

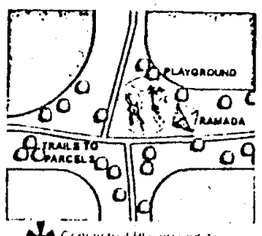
Owner
Applicant/Developer
Continental Homes
7001 N. Scottsdale Rd
Suite 2050
Scottsdale AZ 85253
Attn: Roger Pryor

Community Planner/
Civil Engineer Coe & Van Loo
4550 North 12th Street
Phoenix, Arizona 85014-4291
Attn: Joe Walsh

SITE DATA	
Total Site	374.06 AC. Gross
Commercial Site	24.06 AC. Gross
	20.00 AC. Net
Residential	350.00 AC. Gross
Yield	1225 Lots
Density	3.5 DU/AC.
Open Space	15%

Phases	Area (1)	Units	Density	Open Space
Phase 1	116.67 AC.	410	3.5 DU/AC.	15%
Phase 2	116.66 AC.	410	3.5 DU/AC.	15%
Phase 3	116.67 AC.	405	3.5 DU/AC.	15%

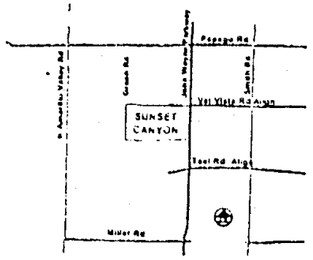
(1) 1/3 of the school site is included in each phase



* Conceptual Playground Area

Land Use Data

Lot Size	# of Lots	Percentage
45' x 115'	655	53.4%
50' x 115'	240	19.6%
56' x 120'	210	17.2%
65' x 120'	120	9.8%
	1225	100%



Vicinity Map

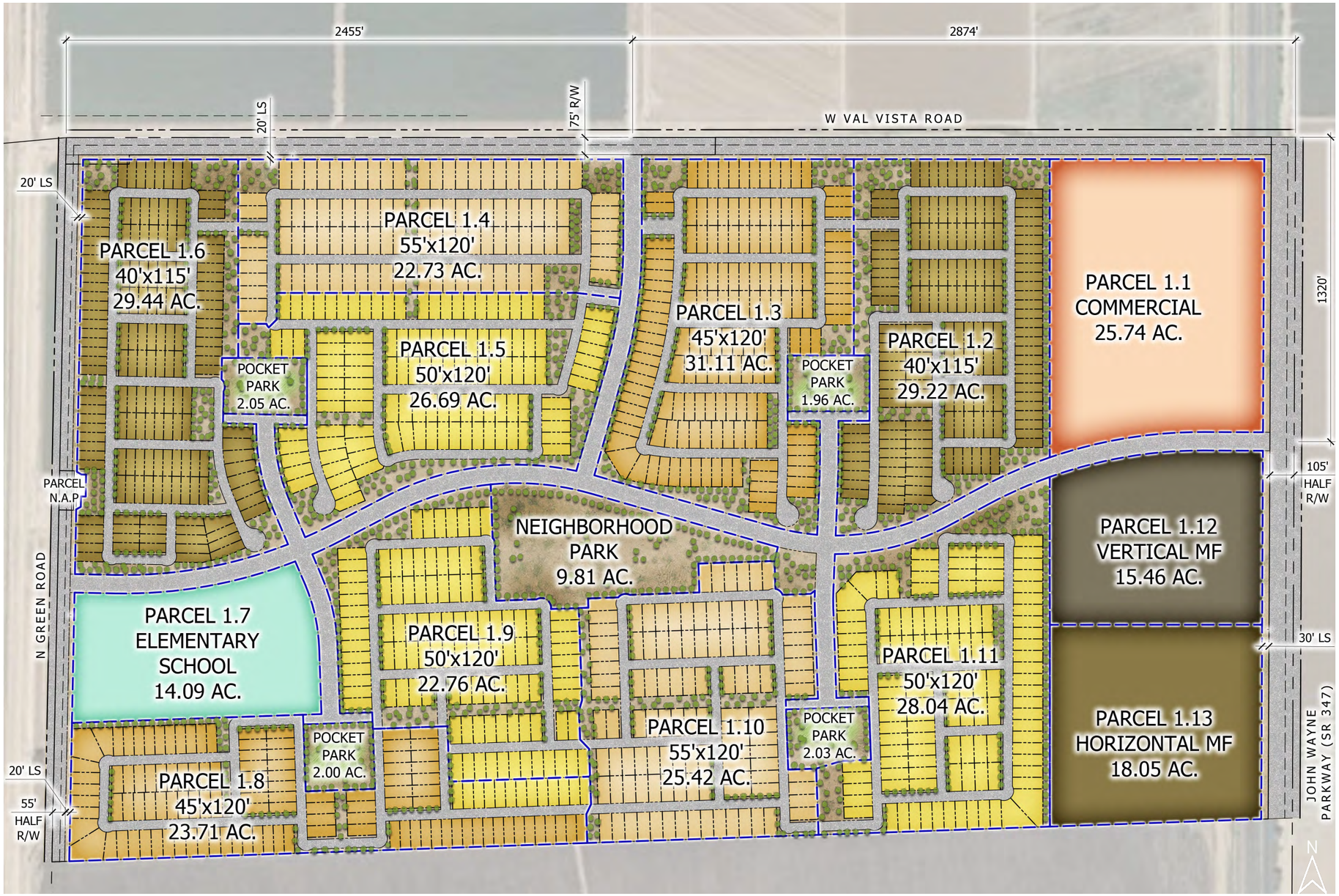
CVL

DATE:8-15-03

EXHIBIT A

EXISTING PAD SITE PLAN

- **The existing Site Plan from 2003 inlcuded a total of 1,225 dwelling units.**

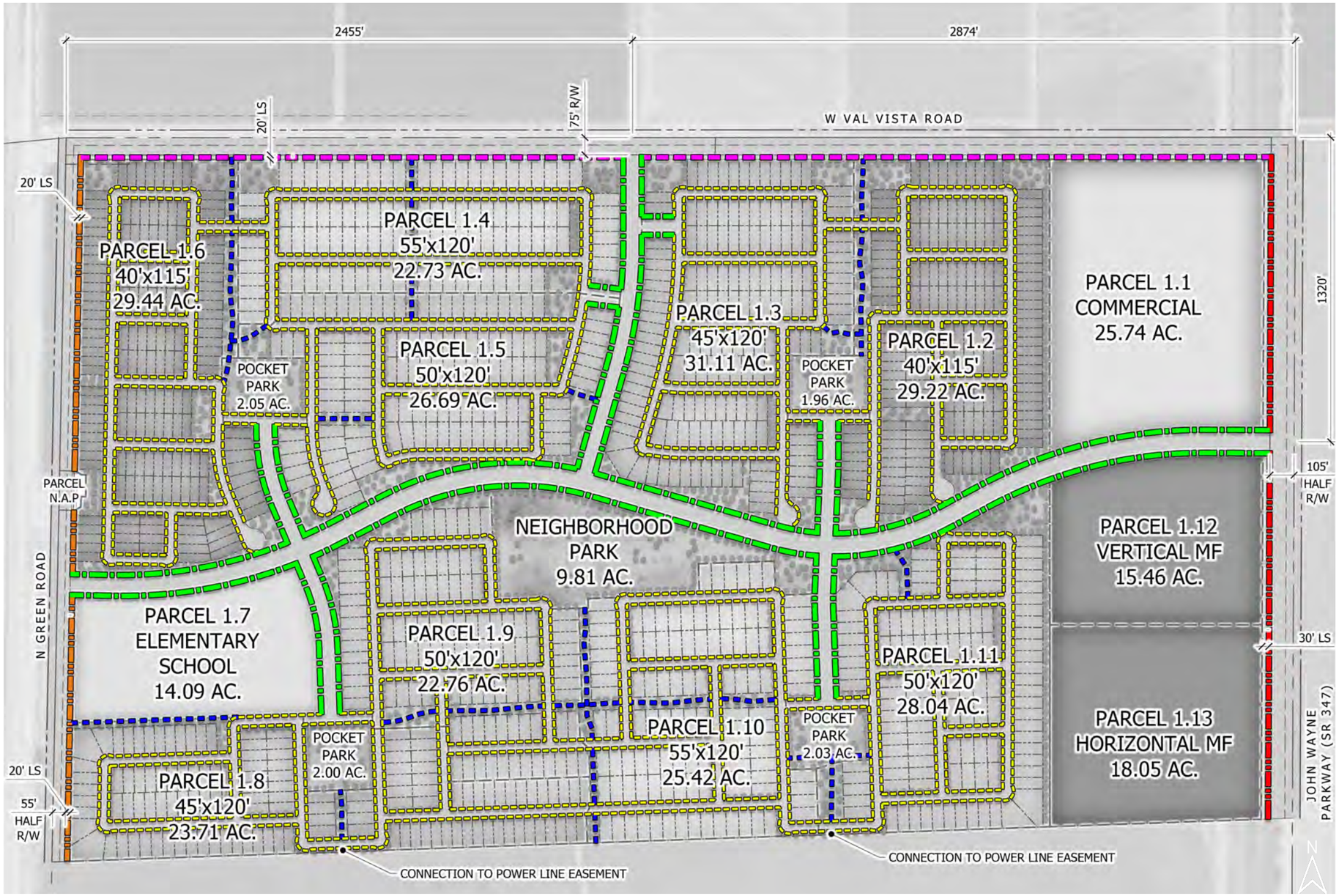


CONCEPTUAL SITE PLAN

- **With a high demand for housing variety, this Site aims to address the need with the proposed 1,684 dwelling units while still including area for commercial development.**
- **This location was chosen for its proximity to principal arterials and John Wayne Parkway (SR 347).**

SITE DATA					
GROSS ACREAGE	373.77 AC.			4.51 D.U./AC.	
NET ACREAGE	354.00 AC.				
RESIDENTIAL NET ACREAGE	328.26 AC.				
DEDICATED OPEN SPACE	37.18 AC.				
TRAIL AREAS	5.53 AC.				
POCKET PARKS	8.04 AC.				
NEIGHBORHOOD PARK	9.81 AC.				
TOTAL OPEN SPACE	60.56 AC.			18.45%	
DESCRIPTION	**ACREAGE**	**USE**	**FLOOR AREA (0.2 F.A.R.)**	**UNITS**	**UNIT PERCENTAGE**
PARCEL 1.1	25.74 AC.	COMM	224,247 S.F.		
PARCEL 1.2	29.22 AC.	40'x115'		128 D.U.	7.60%
PARCEL 1.3	31.11 AC.	45'x120'		138 D.U.	8.19%
PARCEL 1.4	22.73 AC.	55'x120'		103 D.U.	6.12%
PARCEL 1.5	26.69 AC.	50'x120'		112 D.U.	6.65%
PARCEL 1.6	29.44 AC.	40'x115'		138 D.U.	8.19%
PARCEL 1.7	14.09 AC.	ES			
PARCEL 1.8	23.71 AC.	45'x120'		108 D.U.	6.41%
PARCEL 1.9	22.76 AC.	50'x120'		107 D.U.	6.35%
PARCEL 1.10	25.42 AC.	55'x120'		112 D.U.	6.65%
PARCEL 1.11	28.04 AC.	50'x120'		114 D.U.	6.77%
PARCEL 1.12	15.46 AC.	V-MF		371 D.U.	22.03%
PARCEL 1.13	18.05 AC.	H-MF		253 D.U.	15.02%
COMMERCIAL	**25.74 AC.**	**COMM**	**224,247 S.F.**		
ELEMENTARY SCHOOL	**14.09 AC.**	**ES**			
VERTICAL MULTI-FAMILY	**15.46 AC.**	**V-MF**		**371 D.U.**	**22.03%**
HORIZONTAL MULTI-FAMILY	**18.05 AC.**	**H-MF**		**253 D.U.**	**15.02%**
40'X115'	**58.66 AC.**	**40'x115'**		**266 D.U.**	**15.80%**
45'X120'	**54.82 AC.**	**45'x120'**		**246 D.U.**	**14.61%**
50'X120'	**77.49 AC.**	**50'x120'**		**333 D.U.**	**19.77%**
55'X120'	**48.15 AC.**	**55'x120'**		**215 D.U.**	**12.77%**
SUNSET CANYON TOTAL	**312.46 AC.**		**224,247 S.F.**	**1,684 D.U.**	

*OPEN SPACE CALCULATIONS BASED OFF OF TOTAL RESIDENTIAL NET ACREAGE.

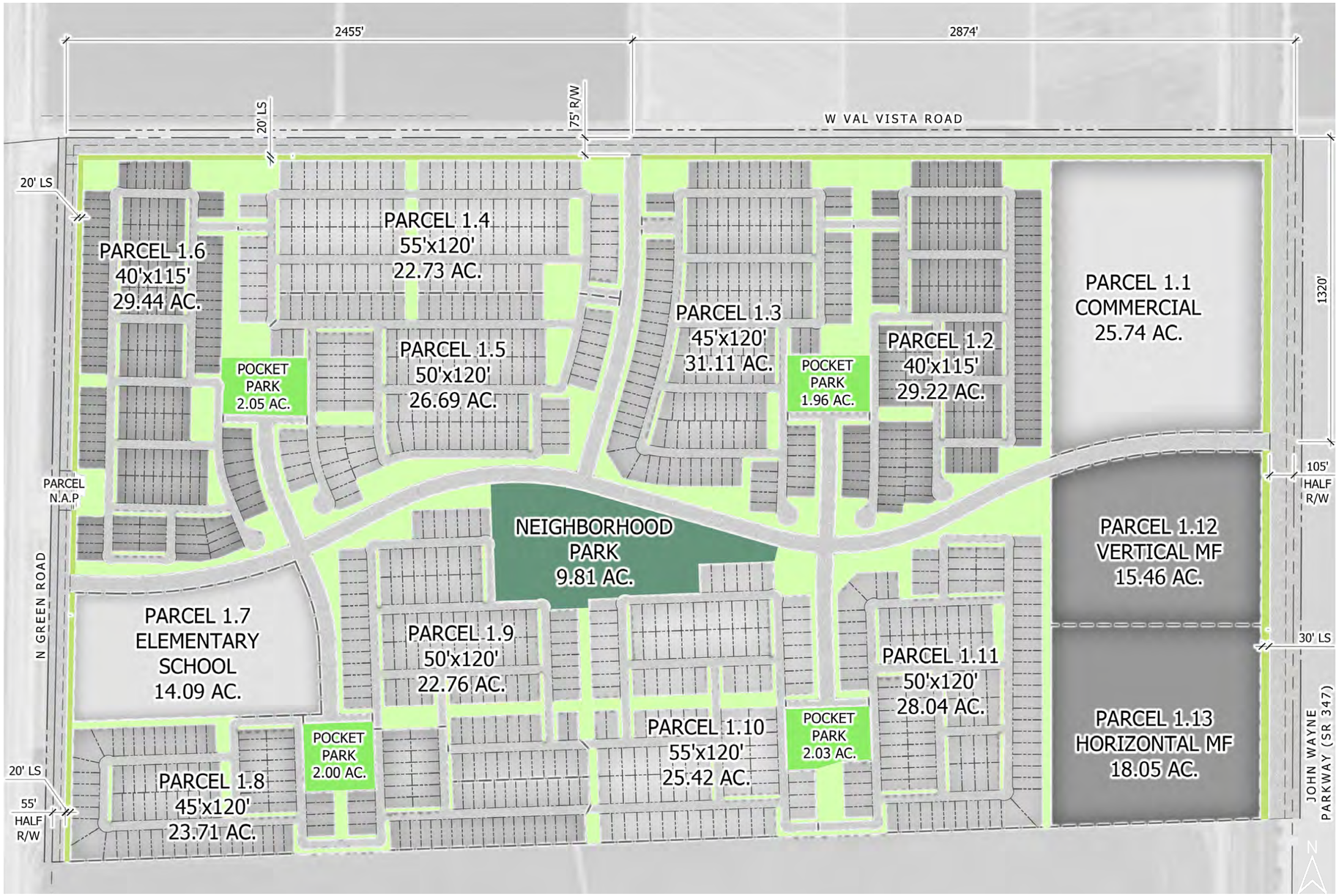


LEGEND

- 5'-0" DETACHED CONCRETE SIDEWALK
- 5'-0" CONCRETE TRAIL
- 8'-0" CONCRETE SIDEWALK
- 6'-0" ATTACHED CONCRETE SIDEWALK
- 5'-0" ATTACHED CONCRETE SIDEWALK
- EXISTING/PLANNED MULTI-USE TRAIL CORRIDOR

CIRCULATION PLAN

- **The Site will be accessed from Val Vista Road, Green Road, and John Wayne Parkway**
- **The Site includes a system of tree shaded paths and trails which provide connections to the planned parks and open space areas.**



PARKS AND OPEN SPACE PLAN

- **The residents will enjoy access to dedicated recreational open space centrally located in the community.**

OPEN SPACE TABLE				
*NET ACREAGE	328.26 Ac.			
	REQUIRED		PROVIDED	
DESCRIPTION	%	ACREAGE	%	ACREAGE
NEIGHBORHOOD PARK (ACTIVE RECREATIONAL)				9.81 AC.
POCKET PARK (ACTIVE RECREATIONAL)				8.04 AC.
TRAIL AREAS (ACTIVE RECREATIONAL)				5.53 AC.
TOTAL ACTIVE RECREATIONAL OPEN SPACE	7.00%	22.98 Ac.	7.12%	23.38 AC.
**DEDICATED OPEN SPACE	11.00%	36.11 Ac.	11.33%	37.18 AC.
TOTAL OPEN SPACE	18.00%	59.09 Ac.	18.45%	60.56 AC.

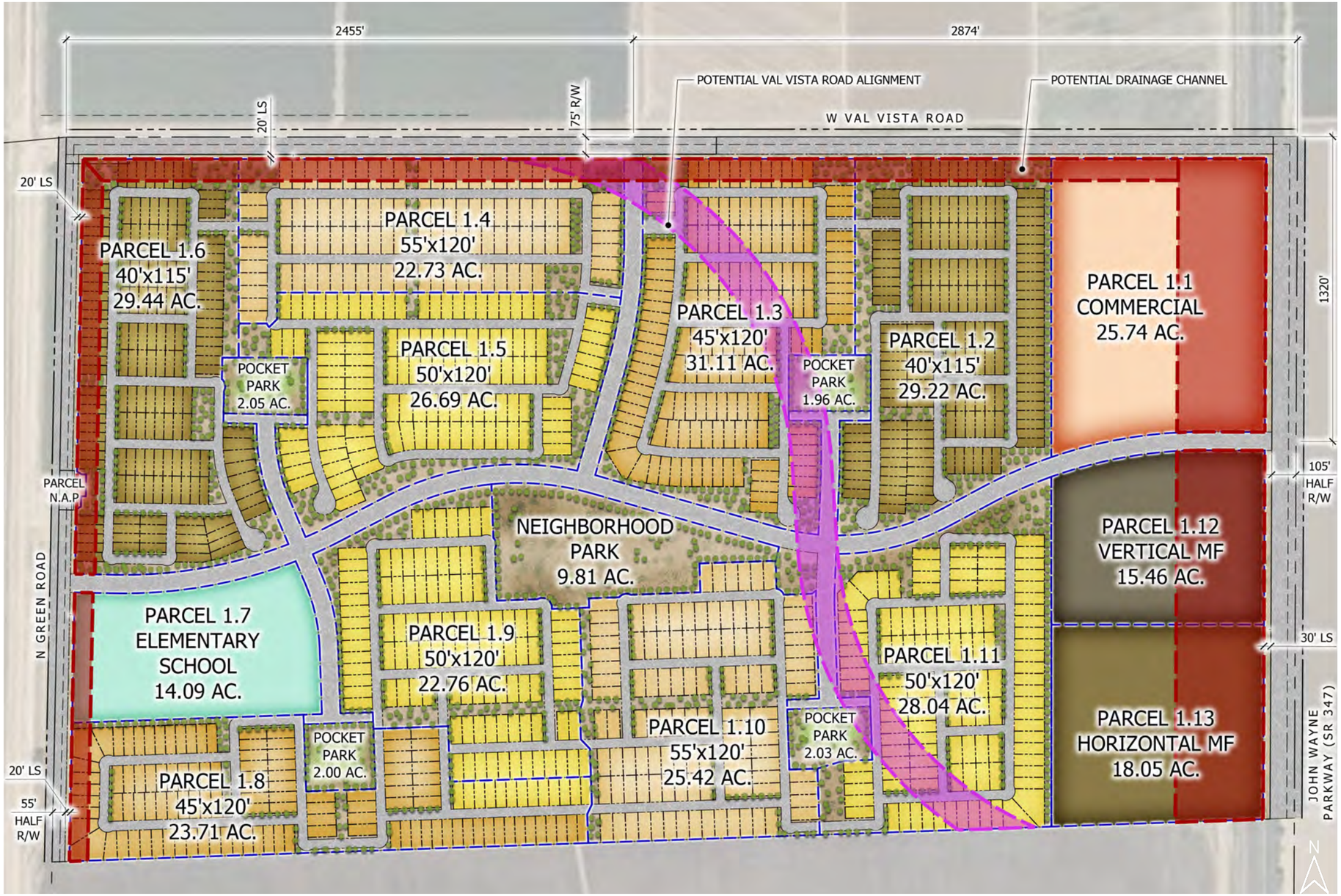
*NET ACREAGE BASED OFF OF TOTAL RESIDENTIAL NET ACREAGE FOR OPEN SPACE CALCULATIONS

**DEDICATED OPEN SPACE TO BE DETERMINED AT FINAL SITE DESIGN.

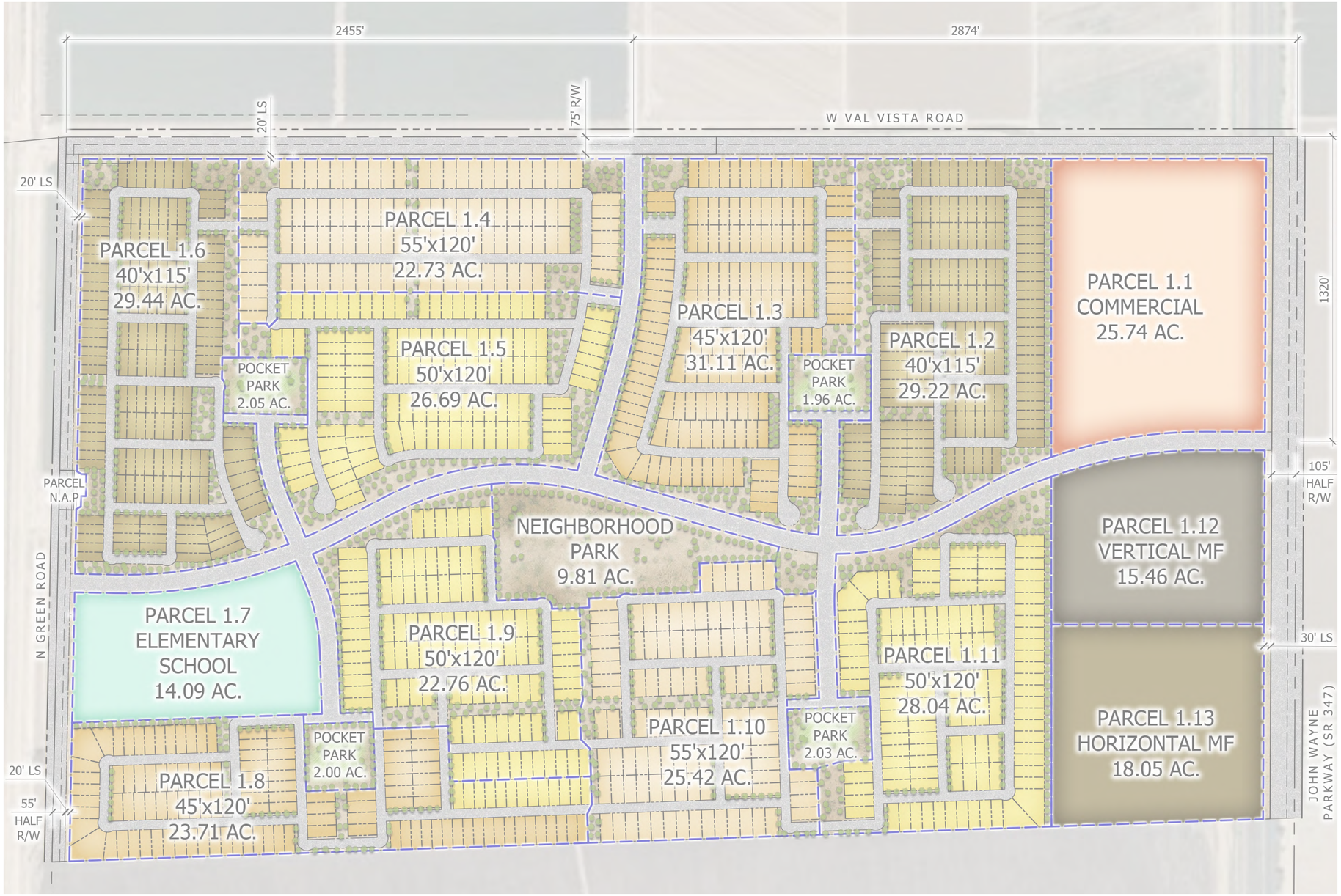
NOTE: ACTIVE RECREATIONAL SPACES TO INCLUDE: COMMUNITY AND POCKET PARKS THAT MAY INCLUDE AMENITIES SUCH AS GARDENS, RAMADAS, TOT LOTS, SEATING, DOG PARKS, AND OPEN PLAY/TURF AREAS.

NOTE: TOTAL OPEN SPACE DOES NOT INCLUDE THE COMMERCIAL AREA.

ANALYSIS PLAN



Sunset Canyon
Planned Area Development Amendment



QUESTIONS

Sunset Canyon
Planned Area Development Amendment

First American Commitment	ALTA Commitment for Title Insurance ISSUED BY First American Title Insurance Company File No: NCS-1133754-PHX1

COMMITMENT FOR TITLE INSURANCE

Issued By

FIRST AMERICAN TITLE INSURANCE COMPANY

NOTICE

IMPORTANT-READ CAREFULLY: THIS COMMITMENT IS AN OFFER TO ISSUE ONE OR MORE TITLE INSURANCE POLICIES. ALL CLAIMS OR REMEDIES SOUGHT AGAINST THE COMPANY INVOLVING THE CONTENT OF THIS COMMITMENT OR THE POLICY MUST BE BASED SOLELY IN CONTRACT.

THIS COMMITMENT IS NOT AN ABSTRACT OF TITLE, REPORT OF THE CONDITION OF TITLE, LEGAL OPINION, OPINION OF TITLE, OR OTHER REPRESENTATION OF THE STATUS OF TITLE. THE PROCEDURES USED BY THE COMPANY TO DETERMINE INSURABILITY OF THE TITLE, INCLUDING ANY SEARCH AND EXAMINATION, ARE PROPRIETARY TO THE COMPANY, WERE PERFORMED SOLELY FOR THE BENEFIT OF THE COMPANY, AND CREATE NO EXTRACONTRACTUAL LIABILITY TO ANY PERSON, INCLUDING A PROPOSED INSURED.

THE COMPANY'S OBLIGATION UNDER THIS COMMITMENT IS TO ISSUE A POLICY TO A PROPOSED INSURED IDENTIFIED IN SCHEDULE A IN ACCORDANCE WITH THE TERMS AND PROVISIONS OF THIS COMMITMENT. THE COMPANY HAS NO LIABILITY OR OBLIGATION INVOLVING THE CONTENT OF THIS COMMITMENT TO ANY OTHER PERSON.

COMMITMENT TO ISSUE POLICY

Subject to the Notice; Schedule B, Part I-Requirements; Schedule B, Part II-Exceptions; and the Commitment Conditions, *First American Title Insurance Company*, a Nebraska Corporation (the "Company"), commits to issue the Policy according to the terms and provisions of this Commitment. This Commitment is effective as of the Commitment Date shown in Schedule A for each Policy described in Schedule A, only when the Company has entered in Schedule A both the specified dollar amount as the Proposed Policy Amount and the name of the Proposed Insured.

If all of the Schedule B, Part I-Requirements have not been met within six months after the Commitment Date, this Commitment terminates and the Company's liability and obligation end.

First American Title Insurance Company

Kenneth D. DeGiorgio, President

Greg L. Smith, Secretary

If this jacket was created electronically, it constitutes an original document.

This page is only a part of a 2016 ALTA® Commitment for Title Insurance issued by First American Title Insurance Company. This Commitment is not valid without the Notice; the Commitment to Issue Policy; the Commitment Conditions; Schedule A; Schedule B, Part I-Requirements; Schedule B, Part II-Exceptions.

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COMMITMENT CONDITIONS

1. DEFINITIONS
   (a) "Knowledge" or "Known": Actual or imputed knowledge, but not constructive notice imparted by the Public Records.
   (b) "Land": The land described in Schedule A and affixed improvements that by law constitute real property. The term "Land" does not include any property beyond the lines of the area described in Schedule A, nor any right, title, interest, estate, or easement in abutting streets, roads, avenues, alleys, lanes, ways, or waterways, but this does not modify or limit the extent that a right of access to and from the Land is to be insured by the Policy.
   (c) "Mortgage": A mortgage, deed of trust, or other security instrument, including one evidenced by electronic means authorized by law.
   (d) "Policy": Each contract of title insurance, in a form adopted by the American Land Title Association, issued or to be issued by the Company pursuant to this Commitment.
   (e) "Proposed Insured": Each person identified in Schedule A as the Proposed Insured of each Policy to be issued pursuant to this Commitment.
   (f) "Proposed Policy Amount": Each dollar amount specified in Schedule A as the Proposed Policy Amount of each Policy to be issued pursuant to this Commitment.
   (g) "Public Records": Records established under state statutes at the Commitment Date for the purpose of imparting constructive notice of matters relating to real property to purchasers for value and without Knowledge.
   (h) "Title": The estate or interest described in Schedule A.

2. If all of the Schedule B, Part I—Requirements have not been met within the time period specified in the Commitment to Issue Policy, this Commitment terminates and the Company's liability and obligation end.

3. The Company's liability and obligation is limited by and this Commitment is not valid without:
   (a) the Notice;
   (b) the Commitment to Issue Policy;
   (c) the Commitment Conditions;
   (d) Schedule A;
   (e) Schedule B, Part I—Requirements; and
   (f) Schedule B, Part II—Exceptions.

4. **COMPANY'S RIGHT TO AMEND**
   The Company may amend this Commitment at any time. If the Company amends this Commitment to add a defect, lien, encumbrance, adverse claim, or other matter recorded in the Public Records prior to the Commitment Date, any liability of the Company is limited by Commitment Condition 5. The Company shall not be liable for any other amendment to this Commitment.

5. LIMITATIONS OF LIABILITY
   (a) The Company's liability under Commitment Condition 4 is limited to the Proposed Insured's actual expense incurred in the interval between the Company's delivery to the Proposed Insured of the Commitment and the delivery of the amended Commitment, resulting from the Proposed Insured's good faith reliance to:
      (i) comply with the Schedule B, Part I—Requirements;
      (ii) eliminate, with the Company's written consent, any Schedule B, Part II—Exceptions; or
      (iii) acquire the Title or create the Mortgage covered by this Commitment.
   (b) The Company shall not be liable under Commitment Condition 5(a) if the Proposed Insured requested the amendment or had Knowledge of the matter and did not notify the Company about it in writing.
   (c) The Company will only have liability under Commitment Condition 4 if the Proposed Insured would not have incurred the expense had the Commitment included the added matter when the Commitment was first delivered to the Proposed Insured.
   (d) The Company's liability shall not exceed the lesser of the Proposed Insured's actual expense incurred in good faith and described in Commitment Conditions 5(a)(i) through 5(a)(iii) or the Proposed Policy Amount.
   (e) The Company shall not be liable for the content of the Transaction Identification Data, if any.
   (f) In no event shall the Company be obligated to issue the Policy referred to in this Commitment unless all of the Schedule B, Part I—Requirements have been met to the satisfaction of the Company.
   (g) In any event, the Company's liability is limited by the terms and provisions of the Policy.

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6. LIABILITY OF THE COMPANY MUST BE BASED ON THIS COMMITMENT
   (a) Only a Proposed Insured identified in Schedule A, and no other person, may make a claim under this Commitment.
   (b) Any claim must be based in contract and must be restricted solely to the terms and provisions of this Commitment.
   (c) Until the Policy is issued, this Commitment, as last revised, is the exclusive and entire agreement between the parties with respect to the subject matter of this Commitment and supersedes all prior commitment negotiations, representations, and proposals of any kind, whether written or oral, express or implied, relating to the subject matter of this Commitment.
   (d) The deletion or modification of any Schedule B, Part II—Exception does not constitute an agreement or obligation to provide coverage beyond the terms and provisions of this Commitment or the Policy.
   (e) Any amendment or endorsement to this Commitment must be in writing and authenticated by a person authorized by the Company.
   (f) When the Policy is issued, all liability and obligation under this Commitment will end and the Company's only liability will be under the Policy.

7. IF THIS COMMITMENT HAS BEEN ISSUED BY AN ISSUING AGENT
   The issuing agent is the Company's agent only for the limited purpose of issuing title insurance commitments and policies. The issuing agent is not the Company's agent for the purpose of providing closing or settlement services.

8. PRO-FORMA POLICY
   The Company may provide, at the request of a Proposed Insured, a pro-forma policy illustrating the coverage that the Company may provide. A pro-forma policy neither reflects the status of Title at the time that the pro-forma policy is delivered to a Proposed Insured, nor is it a commitment to insure.

9. ARBITRATION
   The Policy contains an arbitration clause. All arbitrable matters when the Proposed Policy Amount is $2,000,000 or less shall be arbitrated at the option of either the Company or the Proposed Insured as the exclusive remedy of the parties. A Proposed Insured may review a copy of the arbitration rules at http://www.alta.org/arbitration.

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Transaction Identification Data for reference only:

Issuing Agent: First American Title Insurance Company National Commercial Services
Commitment No.: NCS-1133754-PHX1
Property Address: Pinal County, AZ, AZ
Revision No.: 1

Issuing Office: 2425 E. Camelback Road, Suite 300, Phoenix, AZ 85016
Issuing Office File No.: NCS-1133754-PHX1
Escrow Officer: Name:
Email:
Phone: (602)567-8100
Title Officer: Name:
Email:
Phone: (602)567-8100

SCHEDULE A

1. Commitment Date: August 03, 2022, at 8:00 AM
2. Policy to be issued:

   (a) ☒ ALTA® Extended Owner's Policy
   Proposed Insured: To Be Determined
   Proposed Policy Amount: $TBD

   (b) ☐ ALTA® Policy
   Proposed Insured:
   Proposed Policy Amount: $

   (c) ☐ ALTA® Policy
   Proposed Insured:
   Proposed Policy Amount: $

3. The estate or interest in the Land described or referred to in this Commitment is

   Fee Simple

4. Title to the Fee Simple estate or interest in the Land is at the Commitment Date vested in:

   HAM Sunset, L.L.C., an Arizona limited liability company

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Commitment No.: NCS-1133754-PHX1

SCHEDULE B, PART I

Requirements

All of the following Requirements must be met:

1. The Proposed Insured must notify the Company in writing of the name of any party not referred to in this Commitment who will obtain an interest in the Land or who will make a loan on the Land. The Company may then make additional Requirements or Exceptions.

2. Pay the agreed amount for the estate or interest to be insured.

3. Pay the premiums, fees, and charges for the Policy to the Company.

4. Documents satisfactory to the Company that convey the Title or create the Mortgage to be insured, or both, must be properly authorized, executed, delivered, and recorded in the Public Records.

5. Compliance with A.R.S. 11-480 relative to all documents to be recorded in connection herewith. See note at end of this section for details

   NOTE: In connection with Arizona Revised Statutes 11-480, as of January 1, 1991, the County Recorder may not accept documents for recording that do not comply with the following:

   a. Print must be ten-point type or larger.
   b. A margin of two inches at the top of the first page for recording and return address information and margins of one-half inch along other borders of every page.
   c. Each instrument shall be no larger than 8-1/2 inches in width and 14 inches in length.

   NOTE: In the event any Affidavit required pursuant to A.R.S. 33-422 relating to unsubdivided land in an unincorporated area of a country has been, or will be, recorded pertaining to the Land, such as Affidavit is not reflected in this Commitment nor will it be shown in any policy to be issued in connection with this Commitment.

6. All of 2021 taxes are paid in full.

   NOTE: Taxes are assessed in the total amount of $6,360.40 for the year 2021 under Assessor's Parcel No. 510-48-018A.

   NOTE: Taxes are assessed in the total amount of $6,598.28 for the year 2021 under Assessor's Parcel No. 510-48-019D.

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NOTE: Taxes are assessed in the total amount of $459.20 for the year 2021 under Assessor's Parcel No. 510-48-020D.

NOTE: Taxes are assessed in the total amount of $646.44 for the year 2021 under Assessor's Parcel No. 510-48-021D.

7. Proper evidence showing that all assessments due and payable, levied by South Maricopa Fire Association, have been paid to and including the closing date of this transaction.

8. Furnish Plat of Survey of the subject property by a Registered Land Surveyor in accordance with the "Minimum Standard Detail Requirements for ALTA/NSPS Land Title Surveys" which became effective February 23, 2021. Said Plat of survey shall include the required certification and, at a minimum, also have shown thereon Items 1, 8, 11, 16, 17, and 18 from Table A thereof. If zoning assurances are requested, Items 7(a), 7(b), 7(c) and 9 from Table A and information regarding the usage of the property must be included.

   NOTE: If a Zoning Endorsement is requested, Items 7(a), 7(b) and 7(c) of Table A will also be required. If "parking" is to be added to the endorsement, the number and type of parking spaces must be shown on the survey. Property use information must also be provided to First American Title Insurance Company.

9. Furnish copies of any existing leases affecting the within described property and insertion of said leases in Schedule B of the Policy of Title Insurance.

10. Furnish a copy of the Articles of Organization, stamped "filed" by the Arizona Corporation Commission; a fully executed copy of the Operating Agreement, and any amendments thereto; and a list of the current members of HAM Sunset, LLC, a limited liability company.

11. Furnish the names of parties to be insured herein and disposition of any matters disclosed thereby.

12. Approval by all parties to this transaction of the description used herein.

13. Record Warrany Deed from HAM Sunset, L.L.C., an Arizona limited liability company to Buyer(s).

14. Return to title department for final recheck before recording.

15. Prior to closing, the Company must confirm whether the county recording office in which the Land is located has changed its access policies due to the COVID-19 outbreak. If recording has been restricted, specific underwriting approval is required; and, additional requirements or exceptions may be made.

    NOTE: If this will be <u>other</u> than a Cash Transaction, notify the title department prior to close and additional requirements will be made.

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Commitment No.: NCS-1133754-PHX1

SCHEDULE B, PART II

Exceptions

THIS COMMITMENT DOES NOT REPUBLISH ANY COVENANT, CONDITION, RESTRICTION, OR LIMITATION CONTAINED IN ANY DOCUMENT REFERRED TO IN THIS COMMITMENT TO THE EXTENT THAT THE SPECIFIC COVENANT, CONDITION, RESTRICTION, OR LIMITATION VIOLATES STATE OR FEDERAL LAW BASED ON RACE, COLOR, RELIGION, SEX, SEXUAL ORIENTATION, GENDER IDENTITY, HANDICAP, FAMILIAL STATUS, OR NATIONAL ORIGIN.

The Policy will not insure against loss or damage resulting from the terms and provisions of any lease or easement identified in Schedule A, and will include the following Exceptions unless cleared to the satisfaction of the Company:

1. Any defect, lien, encumbrance, adverse claim, or other matter that appears for the first time in the Public Records or is created, attaches, or is disclosed between the Commitment Date and the date on which all of the Schedule B, Part I-Requirements are met.

2. (a) Taxes or assessments that are not shown as existing liens by the records of any taxing authority that levies taxes or assessments on real property or by the Public Records; (b) proceedings by a public agency that may result in taxes or assessments, or notices of such proceedings, whether or not shown by the records of such agency or by the Public Records.

3. Any facts, rights, interests, or claims that are not shown by the Public Records but that could be ascertained by an inspection of the Land or that may be asserted by persons in possession thereof.

4. Easements, liens or encumbrances, or claims thereof, not shown by the Public Records.

5. Discrepancies, conflicts in boundary lines, shortage in area, encroachments, or any other facts which a correct survey would disclose, and which are not shown by the Public Records.

6. (a) Unpatented mining claims; (b) reservations or exceptions in patents or in Acts authorizing the issuance thereof; (c) water rights, claims or title to water, whether or not the matters excepted under (a), (b), or (c) are shown by the Public Records.

7. Any lien or right to a lien for services, labor, material or equipment, unless such lien is shown by the Public Records at Date of Policy and not otherwise excepted from coverage herein.

Exceptions above will be eliminated from any A.L.T.A. Extended Coverage Policy, A.L.T.A. Homeowner's Policy, A.L.T.A. Expanded Coverage Residential Loan Policy and any short form versions thereof. However, the same or similar exception may be made in Schedule B of those policies in conformity with Schedule B, Part Two of this Commitment.

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1. Taxes for the full year of 2022.
(The first half is due October 1, 2022 and is delinquent November 1, 2022. The second half is due March 1, 2023 and is delinquent May 1, 2023 .)

2. Any charge upon said land by reason of its inclusion in South Maricopa Fire Association. (All assessments due and payable are paid.)

3. Any charge upon said land by reason of its inclusion in Maricopa Stanfield Irrigation and Drainage District. (All assessments due and payable are paid.)

4. Reservations or Exceptions in Patents, or in Acts authorizing the issuance thereof.

5. The right to enter upon said land, prospect for, mine and remove all coal, oil, gas and other mineral deposits as reserved in Deed recorded as 2007-036589 of Official Records.

   (Affects Parcel No. 1)

6. Declaration of Covenants, Conditions and Restrictions recorded as 2005-149010, recorded as 2007-079521, but deleting any covenant, condition or restriction indicating a preference, limitation or discrimination based on race, color, religion, sex, handicap, familial status or national origin to the extent such covenants, conditions or restrictions violate 42 USC 3604(c).

   First Amendment recorded as 2006-030998

   Acknowledgment and Consent recorded as 2007-079522

   Assignment of Declarant's Rights recorded as 2008-087614, re-recorded as 2008-088922

   Second Amendment recorded as 2021-141252

   (Affects Parcel No. 1)

7. Declaration of Road by the Pinal County Board of Supervisor recorded as Docket 375, Page 572.

   (Affects Parcel No. 2)

8. All matters as set forth in Quit Claim Deeds, recorded January 16, 1991 as Docket 1720, Page 78 and as Docket 1793, Page 747 of Official Records.

   (Affects Parcel No. 2)

9. The terms and provisions contained in the document entitled "Joint Use Turnout Agreement" recorded May 26, 1988 as Docket 1530, Page 799 of Official Records.

   Assignment recorded as Docket 1539, Page 617

   (Affects Parcel No. 1 and 2)

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10. The terms and provisions contained in the document entitled "Agreement for Protect Water" recorded June 29, 1989 as Docket 1615, Page 554 of Official Records.

    Modification recorded as Docket 1983, Page 970

    (Affects Parcel No. 1 and 2)

11. All matters as set forth in Zone Change Resolution, recorded November 17, 2003 as 2003-080679 and as 2003-080680 of Official Records.

    (Affects Parcel No. 1 and 2)

12. The terms and provisions contained in the document entitled "Development Agreement" recorded March 7, 2005 as 2005-023476 of Official Records.

    Assignment and Assumption recorded as 2008-087613, re-recorded as 2008-088921

    (Affects Parcel No. 1 and 2)

13. The terms and provisions contained in the document entitled "Infrastructure Coordination and Finance Agreement" recorded May 24, 2005 as 2005-060411 of Official Records.

    (Affects Parcel No. 1 and 2)

14. The terms and provisions contained in the document entitled "Special Warranty Deed and Reservations of Surface Rights (Minerals)" recorded March 27, 2007 as 2007-036589 of Official Records.

    (Affects Parcel No. 1)

15. Any facts, rights, interests or claims which would be disclosed by a correct ALTA/NSPS survey.

16. The rights of parties in possession by reason of any unrecorded lease or leases or month to month tenancies affecting any portion of the within described property.

    NOTE: This matter will be more fully set forth or deleted upon compliance with the applicable requirement(s) set forth herein.

17. Water rights, claims or title to water, whether or not shown by the public records.

18. An easement for electric lines and appurtenant facilities and incidental purposes in the document recorded as 2007-043624 of Official Records.

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File No.: NCS-1133754-PHX1

The Land referred to herein below is situated in the County of Pinal, State of Arizona, and is described as follows:

A PARCEL OF LAND LYING IN AND BEING A PART OF SECTION 28, TOWNSHIP 5 SOUTH, RANGE 3 EAST, GILA AND SALT RIVER BASE AND MERIDIAN, PINAL COUNTY, ARIZONA, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE NORTHWEST CORNER OF SAID SECTION 28, THE TRUE POINT OF BEGINNING;

THENCE NORTH 89 DEGREES 58 MINUTES 45 SECONDS EAST, A DISTANCE OF 5329.05 FEET TO THE NORTHEAST CORNER OF SECTION 28;

THENCE SOUTH 0 DEGREES 16 MINUTES 00 SECONDS WEST, A DISTANCE OF 2951.34 FEET;

THENCE SOUTH 87 DEGREES 58 MINUTES 24 SECONDS WEST, A DISTANCE OF 5380.90 FEET;

THENCE NORTH 01 DEGREES 08 MINUTES 33 SECONDS EAST, A DISTANCE OF 135.00 FEET TO THE WEST QUARTER CORNER OF SECTION 28;

THENCE NORTH 01 DEGREES 08 MINUTES 06 SECONDS EAST, A DISTANCE OF 3005.30 FEET TO THE TRUE POINT OF BEGINNING;

EXCEPT THAT PORTION OF THE EAST HALF OF THE EAST HALF OF SAID SECTION 28, DESCRIBED AS FOLLOWS:

BEGINNING AT THE NORTHEAST CORNER OF SAID SECTION 28;

THENCE SOUTH 00 DEGREES 17 MINUTES 57 SECONDS WEST ALONG THE EAST LINE OF SECTION 28, A DISTANCE OF 2631.35 FEET TO THE EAST QUARTER CORNER OF SECTION 28;

THENCE SOUTH 00 DEGREES 18 MINUTES 28 SECONDS WEST ALONG THE EAST LINE OF SECTION 28, A DISTANCE OF 320.00 FEET;

THENCE SOUTH 88 DEGREES 00 MINUTES 20 SECONDS WEST, A DISTANCE OF 105.25 FEET;

THENCE NORTH 00 DEGREES 18 MINUTES 12 SECONDS EAST, A DISTANCE OF 2955.04 FEET TO A POINT ON THE NORTH LINE OF SECTION 28;

THENCE SOUTH 89 DEGREES 59 MINUTES 03 SECONDS EAST, A DISTANCE OF 105.00 FEET TO THE POINT OF BEGINNING; AND

ALSO EXCEPT THE NORTH 75 FEET OF THE WEST HALF OF SAID SECTION 28; AND

ALSO EXCEPT THE SOUTH 40 FEET OF THE NORTH 115 FEET OF THE WEST 275 FEET OF THE WEST HALF OF SAID SECTION 28;

ALSO EXCEPT THE NORTH 75 FEET OF THE WEST 150 FEET OF THE EAST HALF OF SAID SECTION 28

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ALSO EXCEPT THAT PART OF THE NORTHWEST QUARTER OF SECTION 28, TOWNSHIP 5 SOUTH, RANGE 3 EAST OF THE GILA AND SALT RIVER BASE AND MERIDIAN, PINAL COUNTY, ARIZONA, MORE PARTICULARLY DESCRIBED AS FOLLOWS:

COMMENCING AT THE 1/2" IRON BAR MARKING THE NORTHWEST CORNER OF SAID SECTION 28, FROM WHICH THE 1/2" IRON BAR WITH PINAL COUNTY CAP MARKING THE WEST QUARTER CORNER OF SAID SECTION 28 BEARS SOUTH 01 DEGREES 07 MINUTES 51 SECONDS WEST, A DISTANCE OF 3004.65 FEET;

THENCE SOUTH 01 DEGREES 07 MINUTES 51 SECONDS WEST ALONG THE WEST LINE OF THE NORTHWEST QUARTER OF SAID SECTION 28, A DISTANCE OF 1443.62 FEET;

THENCE SOUTH 88 DEGREES 52 MINUTES 09 SECONDS EAST DEPARTING SAID WEST LINE, A DISTANCE OF 63.00 FEET TO THE TRUE POINT OF BEGINNING;

THENCE CONTINUING SOUTH 88 DEGREES 52 MINUTES 09 SECONDS EAST, A DISTANCE OF 5.00 FEET;

THENCE SOUTH 59 DEGREES 15 MINUTES 37 SECONDS EAST, A DISTANCE OF 30.90 FEET;

THENCE SOUTH 88 DEGREES 52 MINUTES 09 SECONDS EAST, A DISTANCE OF 20.17 FEET TO A POINT ON A LINE WHICH IS PARALLEL WITH AND 115.03 FEET EASTERLY, AS MEASURED AT RIGHT ANGLES, FROM THE WEST LINE OF THE NORTHWEST QUARTER OF SAID SECTION 28;

THENCE SOUTH 01 DEGREES 07 MINUTES 51 SECONDS WEST ALONG SAID PARALLEL LINE, A DISTANCE OF 95.00 FEET;

THENCE NORTH 88 DEGREES 52 MINUTES 09 SECONDS WEST DEPARTING SAID PARALLEL LINE, A DISTANCE OF 20.17 FEET TO A POINT ON A LINE WHICH IS PARALLEL WITH AND 94.86 FEET EASTERLY, AS MEASURED AT RIGHT ANGLES, FROM THE WEST LINE OF THE NORTHWEST QUARTER OF SAID SECTION 28;

THENCE SOUTH 01 DEGREES 07 MINUTES 51 SECONDS WEST ALONG SAID PARALLEL LINE, A DISTANCE OF 45.00 FEET;

THENCE SOUTH 61 DEGREES 07 MINUTES 51 SECONDS WEST DEPARTING SAID PARALLEL LINE, A DISTANCE OF 31.00 FEET;

THENCE NORTH 88 DEGREES 52 MINUTES 09 SECONDS WEST, A DISTANCE OF 5.02 FEET TO A POINT ON A LINE WHICH IS PARALLEL WITH AND 63.00 FEET EASTERLY, AS MEASURED AT RIGHT ANGLES, FROM THE WEST LINE OF THE NORTHWEST QUARTER OF SAID SECTION 28;

THENCE NORTH 01 DEGREES 07 MINUTES 51 SECONDS EAST ALONG SAID PARALLEL LINE, A DISTANCE OF 170.77 FEET TO THE TRUE POINT OF BEGINNING;

TOGETHER WITH ALL RIGHTS, INCLUDING WATER RIGHTS, AND APPURTENANCES THERETO.

EXCEPTING THEREFROM ALL COAL, OIL, GAS, AND MINERAL DEPOSITS AS CONVEYED TO DRH ENERGY, INC., A COLORADO CORPORATION, RECORDED MARCH 27, 2007 IN FEE NO. 2007-036589, OFFICIAL RECORDS.

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Open Space and Recreation Plan for:

Sunset Canyon







Case No: Z-PA-044-22

Submitted: May 2024

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1. Open Space and Recreation Plan Overview

This Open Space and Recreation Plan narrative (referred to hereafter as the "OSRP") is an accompanying document for the PAD and Rezone application (referred to hereafter as the "Amendment", "PAD", and "Site") to amend the existing zoning district from Single-Family Residence Zone (CR-3) and General Business Zone (CB-2) to Single Residence Zone (R-7) to reflect the needs of the current market trends and the needs of Pinal County. See **Exhibit 1: Vicinity Map** for the location of the Site**.**

The Site will utilize patterned planting, shade trees, and low-water use vegetation to create an agrarian community theme.

The common open space areas and amenities meet or exceed the minimum requirements per the Pinal County Open Space & Recreational Area Guideline Manual (OSRAM). See **Table 2: Open Space Requirement Calculation** for a breakdown of the open space.

2. Existing Conditions, Context, and Site Analysis

2.1 Site Analysis

The following were revealed in the analysis of the Site and the surrounding areas, (see **Exhibit 1: Vicinity Map** and **Exhibit 2: Aerial Map** for a visual overview of the site's current condition):

1. The Site consists of agricultural fields and most of the area consists of slopes less than five (5) percent. The property is considered disturbed land. (See **Exhibit 3: Slope and Site Analysis**)
2. The recreation area designation is "Family" oriented as defined in the OSRAM.
3. Other recreational opportunities in the region include:
    - Copper Sky Regional Park and Copper Sky Dog Park: approximately 4.5 miles north of the Site
    - Sonoran Desert National Monument
    - Hohokam Pima National Monument
4. The Site does border an existing/proposed multi-use trail corridor per Pinal County see **Exhibit 4: Pinal County Trails, Roadways, and Access Context Map** which has been incorporated see **Exhibit 5: Circulation and Trails Plan** and **Exhibit 6: Sections.**
5. No cultural resources were identified within the Site according to the Arizona State Museum (ASM) who conducted a search of archeological records for any cultural resources discovered within the Site.
6. As land that has been previously used for agriculture, no riparian vegetation, biological habitats, or existing native plans are located on the property. Per the Arizona Environmental Online Review Tool Report (EORTR) there are no important areas of vegetation within the Site.

2.2 Context

The Site was previously disturbed and utilized for agricultural purposes. For more detailed information on the context of the Site including the surrounding land use and zoning, see the Amendment document submitted to Pinal County concurrently with this OSRP**.**

The visual context of the Site, aside from agricultural fields, includes some mountain views towards of the southernmost tips of the Palo Verde Mountains, Seven Mile Mountain, and the Sierra Estrellas.

2.2.1 Circulation

The Site will be accessed from Val Vista Road, Green Road, and John Wayne Parkway. Val Vista Road, which runs along the northwest boundary and crosses diagonally throughout the Site to the southeast corner, is classified as a Principal Arterial Regionally Significant Route (RSR) according to Pinal County's Regionally Significant Routes for Safety and Mobility (RSRSM). See **Exhibit 4: Pinal County Trails, Roadways, and Access Context Map** for a graphic illustrating the location of the RSR roads.

Regionally, the following provide access to surrounding communities:

- John Wayne Parkway: Adjacent to the east of the Site
- State Route 84: approximately six (6) miles to the south
- State Route 238: approximately six (6) miles to the north
- Interstate 8: approximately nine (9) miles to the south

2.2.2 Surrounding Recreational Opportunities

The surrounding context was analyzed and considered in designing the open space program for the Site. Other recreational opportunities in the regional scale of the Site include:

- Copper Sky Regional Park and Copper Sky Dog Park: approximately four and a half (4.5) miles north of the Site
- Sonoran Desert National Monument
- Hohokam Pima National Monument

Analysis of the County's online interactive GIS maps and the County's Open Space and Trails Master Plan (2007) indicate that the Site does border an proposed Pinal County multi-use trail corridor as shown on **Exhibit 4: Pinal County Trails, Roadways, and Access Context Map** and that has been incorporated, see **Exhibit 5: Circulation and Trails Plan** and **Exhibit 6: Sections.**

2.2.3 Target Market Analysis

The Site is designated 'Family" oriented as defined within the OSRM. The recreational amenities will approach National Recreation and Park Association (NRPA) standards. The Site is more than one thousand (1,000) dwelling units but less than two thousand (2,000) dwelling units and is within the designation of "All Developments" as defined in Table 1 of the OSRAM. The Site will meet or exceed the category of *Developments Approximately 1,000 Dwelling Units* as shown below to be in conformance. See **Table 1: Pinal County Suggested Minimum Facilities for Recreation Areas** for Pinal County's suggested amenities. For a breakdown of Sunset Canyon's suggested minimum facilities according to **Table 1: Pinal County Suggested Minimum Facilities for Recreation Areas** see **Table 4: Suggested Amenities for Sunset Canyon**. Amenity programming based on park type is described in **Exhibit 11: Suggested Park Amenity Table**.

Table 1: Pinal County Suggested Minimum Facilities for Recreation Areas

All Developments	Developments Approximately 1,000 Dwelling Units	Developments Approximately 2,000 Dwelling Units
• Paths in addition to sidewalks	• Paths in addition to sidewalks • One (1) acre turf field • One (1) play structure • One (1) picnic ramada	• Paths in addition to sidewalks • One (1) acre turf field • Two (2) play structures • Three (3) picnic ramadas • One (1) Little League Baseball field (LT) • One (1) Softball field (LT) • One (1) Basketball court (LT) • Two (2) Racquet sports court

2.2.4 Slope Analysis

Table 2: Open Space Requirement Calculation

Slope Categories	0%-5% Slope	<5%-10% Slope	<10% Slope	Totals
Measures Areas Within Each Category	374.02*	0 acres	0 acres	374.02 acres
Conservation Open Space Required	Min. Reqd. = 0%-3% Area Reqd. = 0 Acres	Min. Reqd. = 5% Area Reqd. = 0 Acres	Min. Reqd. = 9% Area Reqd. = 0 Acres	0 acres
Recreation Open Space Required	Min. Reqd. = 7% Area Reqd. = 26.18 Acres	Min. Reqd. = 6% Area Reqd. = 0 Acres	Min. Reqd. = 4% Area Reqd. = 0 Acres	26.18 acres
Total Open Space Required	Min. Reqd. = 18% Area Reqd. = 67.32 Acres	Min. Reqd. = 18% Area Reqd. = 0 Acres	Min. Reqd. = 18% Area Reqd. = 0 Acres	67.32 acres

** Net acreage based off total residential acreage for open space calculations.*

2.2.5 Preliminary Hydrology Analysis

The Site was used as agricultural fields and the overall drainage slope of less than five (5) percent toward the south. The surrounding properties are also agricultural fields.

2.2.6 Flood Zone Designation

This site is located within Zone "X" on the Floodplain Insurance Rate Map (FIRM); FIRM Map 04021C1125E, revised to reflect letter map revision (LOMR), December 4, 2007.

3. Development Concept

3.1 Site Plan

The Site is comprised of 374.02 gross acres for one thousand five hundred thirty-two (1,532) dwelling units. The maximum proposed density is 4.10 du/ac.

See the Amendment document for more details. Open Space included in the Site is outlined in the following table:

Table 3: Open Space Allocation Table

Category (for 0-5% Slope)	**Area Required**	**Area Provided**
Conservation Open Space	0 acres	0 acres
Developed Open Space		
Recreation Open Space	26.18 acres	26.41 acres
Total Open Space*	67.32 acres	76.65 acres

* "Total Open Space" is the combination of conservation and developed open space. Developed open space includes recreation open space.

The Site has a slope of less than five (5) percent and is disturbed land therefore conservation open space was not included per the open space requirements for disturbed conservation open space, zero (0) percent. Developed open space comprises 76.65 acres and includes landscape areas, pedestrian paths, and recreational area open space.

Residents within the Site will benefit from accessible, dedicated recreational open space per Pinal County requirements. Amenity areas shall meet the designated level of recreation designated by Pinal County including, at minimum, pathways in addition to sidewalks. Other open space areas within the Site will include concrete sidewalks creating connected pathways to open spaces and amenities as illustrated on **Exhibit 7: Open Space and Amenities Plan**.

The ownership, control, and maintenance of landscaping, open space, and recreation facilities will be conveyed to and held in common by the homeowner's association(s) (HOA) for the single-family areas.

3.2 Design Theme

Drawing on the property's agrarian heritage, the Site will utilize an appropriate landscape palette that meets ADWR low-water use criteria to create a landscape theme that evokes an agricultural aesthetic through patterned planting, shaded walkways, and architectural elements. The overall planting style compliments the architectural features of the community and creates an inviting climate for pedestrians to enjoy. Aesthetic walls and landscaping are provided throughout the community and along the development perimeter.

3.2.1 Vehicular Circulation Concept

The parcel will be accessed from Val Vista Road, Green Road, and John Wayne Parkway. Val Vista Road is classified as a Principal Arterial while John Wayne Parkway is classified as a Parkway. Proposed improvements for these roads are to be determined and adhere per Pinal County Standards and Staff recommendations.

The landscape theme at the major entries will follow the following, also see the Amendment document for more details:

1. The landscape along the street frontage features native trees grouped with clusters of shrubs that give pops of color and interest. Layered vegetation of trees and shrubs create opportunities for shade for pedestrians.
2. The landscape at entries gives a sense of arrival and assist visitors with wayfinding. The landscape at the entries of the Site will use a series of plant material that set the tone for the rest of the community.

3.2.2 Pedestrian Circulation Concept

Pedestrian circulation throughout the Site provides an interconnected network of walkable paths that join open space, amenity areas, and connections throughout the Site. These include sidewalks, open space, and paved and/or unpaved pathways per Pinal County standards. All paved access routes will comply with ADA requirements to provide residents with unhindered access to all that the Site has to offer. See **Exhibit 7: Open Space and Amenities Plan** and the Amendment document for more details.

3.2.3 Stormwater Management Concept

Stormwater management for the Site will follow the recommendations and findings of the Master Drainage Report.

3.2.4 Development Phasing Concept

Final phasing will be determined by several factors including the findings in the engineering reports and market conditions. Final phasing will be demonstrated within the tentative plat. The proposed Amendment includes a series of conceptual phases as illustrated in **Exhibit 17: Conceptual Phasing Plan** and in **Table 6: Conceptual Phasing** in the PAD narrative.

4. Conservation Open Space

Conservation open space is not provided as the site has been previously disturbed for agricultural purposes. Analysis of the Arizona Environmental Online Review Tool Report revealed no important connectivity zones, important bird areas, or critical habitat within the Site.

5. Dedicated Open Space Area

A total of 50.24 acres of dedicated open space area is conceptually shown, see **Exhibit 7: Open Space and Amenities Plan** for more details.

6. Proposed Entry, Walls, and Signage

Fences and walls in the Site create a visually cohesive sense of community character across parcels by using interesting patterning, wall color, and texture. Project signage is located at entries for wayfinding. A thematic monument will be located where Val Vista Road and the major collector intersect on the Site. See **Exhibit 8: Site Plan** in the PAD narrative for location.

7. Recreation Area Open Space

The proposed amenity areas exceed the level of recreation designated by the County as "Family" and "All Developments". As discussed in the Target Market Analysis section, the recreational amenities fall within the two (2) categories of *Suggested Amenities for All* Developments and *Suggested Amenities for Developments Approximately 1,000 Dwelling Units* with an analysis of the amenities to be provided shown in the table below.

Table 4: Suggested Amenities for Sunset Canyon			
Suggested Amenities for All Developments (Per OSRM)	**Suggested Amenities for Developments of Approximately 1,000 Dwelling Units (Per OSRM)**	**Suggested Amenities for Developments Approximately 2,000 Dwelling Units (Per OSRM)**	**Provided Amenities for Sunset Canyon (1,532 Dwelling Units)**
• Paths in addition to sidewalks	• Paths in addition to sidewalks • One (1) acre turf field • One (1) play structure • One (1) picnic ramada	• Paths in addition to sidewalks • One (1) acre turf field • Two (2) play structures • Three (3) picnic ramadas • One (1) Little League Baseball field (LT) • One (1) Softball field (LT) • One (1) Basketball court (LT) • Two (2) Racquet sports court	• Paths in addition to sidewalks • Pocket Parks – see **Section 7.2: Pocket Parks** for amenity requirements • Neighborhood Park – see **Section 7.1: Neighborhood Park** for amenity requirements

This OSRP provides several recreation areas with a variety of amenities for residents including a 3.56 acre neighborhood park and several pocket parks located throughout the Site, see **Exhibit 7: Open Space and Amenities Plan**.

7.1 Neighborhood Park

The neighborhood park is in a central location of the Site to encourage recreation and serve all residents of the community. The open space provided within the neighborhood park includes larger scale amenities in accordance with the OSRAM suggestions, including but not limited to, the following amenities listed on **Exhibit 11: Suggested Park Amenity Table**. See **Exhibit 8: Conceptual Neighborhood Park** for a conceptual neighborhood park layout.

Neighborhood parks must meet the following criteria:

1. At least one (1) neighborhood park is required for communities of one thousand (1,000) units or more.
2. Neighborhood parks are to be a minimum of one (1) acre.
3. Neighborhood parks shall have a minimum of three (3) amenities, which may be selected from **Exhibit 11: Suggested Park Amenity Table**, or other comparable amenities.

7.2 Pocket Parks

Pocket parks are intended to serve as smaller, more localized amenities for residents within a quarter (1/4) mile. Tree lined sidewalks and trails will connect the pocket parks to the larger circulation system. The open space provided within pocket parks includes small-scale amenities in accordance with the OSRAM suggestions, including but not limited to those listed in **Exhibit 11: Suggested Park Amenity Table**. See **Exhibit 9: Conceptual Pocket Park A** and **Exhibit 10: Conceptual Pocket Park B** for conceptual layouts for pocket parks.

Pocket parks must meet the following criteria:

1. All homes are to be located within approximately a quarter (1/4) mile of a pocket park unless they are within a half (1/2) mile from a neighborhood park.
2. Pocket parks are to be a minimum of one quarter (1/4) acre in size.
3. Pocket parks shall have a minimum of two (2) amenities, which may be selected from the **Exhibit 11: Suggested Park Amenity Table**.

7.3 Recreation Area Design Guidelines

1. Recreation areas should be provided in a manner where they are easily visible and accessible.
2. Playground/tot lot equipment should include but not be limited to, slides, swings, pre-manufactured structures that meet the National Playground Safety Institute Standards requirements for age groups two (2) to five (5) years old and six (6) to twelve (12) years old.
3. Tot lots and other active play equipment should be covered with a shade structure.
4. Tot lots and other active play equipment should be located to be visible and easily accessible.
5. Seating areas should be located in appropriate locations to provide supervision of activities.
6. Seating areas shall incorporate shade.
7. All recreation areas within the development should be connected through a multi-use path or trail system. The multi-use path or trail system should provide linkages to open space, recreation areas, trails, paths, bikeways, schools and commercial parcels within the proposed development as well as to adjacent neighborhoods and communities, and the County's trail system, if applicable.
8. Where lighting is provided for pathways, trails, ramadas, parking and security the lighting should be designed to be operated as an automatic dusk to dawn system.
9. Path lighting, where provided, should be low level and low intensity; but adequate enough to maintain an acceptable level of safety.
10. All lighting shall meet the requirements of Chapter 2.195 of the Pinal County Development Services Code.

7.4 Paths

The Site includes a network of paths and sidewalks connecting residents with open space areas. Paths and sidewalks are provided to achieve true community connectivity and encourage a healthy lifestyle for residents. See **Exhibit 5: Circulation and Trails Plan** and **Exhibit 6: Sections** for more information.

8. Landscaping

8.1 Landscape Character

Drawing on the agrarian history of the area, the landscape character for the Site will employ a landscape palette evoking the natural and patterned forms of agriculture. A conceptual plant palette has been included in **Exhibit 12: Plant Palette**. Vegetation will meet the ADWR low-water use criteria while still providing an aesthetically pleasing character and offering relief to pedestrians through shaded sidewalks. The landscape along the street frontage features native trees grouped with clusters of shrubs that give pops of color and interest. Layered vegetation of trees and shrubs create opportunities for shade for pedestrians. The landscape at entries gives a sense of arrival and assist visitors with wayfinding. The landscape at the entries of the Site will use a series of plant material that set the tone for the rest of the community.

8.2 Landscape Calculations

The table below outlines the required plant quantity, density, sizes, and amount provided for the Site. The quantities shown are the minimum required per Pinal County Development Services Code. Detailed calculations will be provided with the final landscape plans.

Table 5: Landscape Calculations

Based on 76.65 acres (3,338,874 sf)	**Total Trees (15 gallon minimum)**	**24' Box Trees**	**Shrubs (5 gallon minimum)**	**Groundcover (<18" tall)**
Standard/ Requirement	1 per 1,000 SF	25% of total trees	7 per 1,000 SF	>50% of vegetation area
Quantity Required	3,338 trees	834 trees	23,366 shrubs	1,669,437 SF of groundcover

8.3 Irrigation Source

The irrigation source will be potable water, with connection points at water meters located within the open space tracts to be coordinated with the civil plans. To minimize the irrigation demand of the Site landscape, all plants will be low water use, per the ADWR plant list. Where possible, passive rainwater harvesting techniques will be employed in the developed open spaces to direct rainwater towards landscape areas.

9. Compliance with County Guidelines and General OSRP Design Guidelines

9.1 Conformance to the Open Space and Recreation Area Manual (OSRAM)

The development standards outlined in this plan are in conformance with the OSRAM and key design guidelines are quoted directly from the manual.

9.2 Conformance to the PCDSC

The development standards outlined within this OSRP and PAD amendment are in conformance with Chapter 2.176 of the PCDSC.

9.2.1 Section 130 – Minimum requirements for open space

The average slope for the Site was less than five percent (5%) which requires a minimum of zero (0) percent conservation open space if disturbed.

9.2.2 Section 140 – Uses Permitted

The Site's proposed development includes pathways, recreation areas, entryways, streetscapes are within the developed open space that are in conformance with the PCDSC.

9.2.3 Section 150 – Uses Prohibited

There are no prohibited uses being proposed within the open space areas.

9.2.4 Section 160 – Minimum Requirements for Recreation Areas

Final phasing will be determined by several factors including the findings in the engineering reports and market conditions. Final phasing will be demonstrated within the tentative plat. The proposed Amendment includes a series of conceptual phases as illustrated in **Exhibit 14: Conceptual Phasing Plan** and in **Table 6: Conceptual Phasing** in the PAD narrative.

9.2.5 Section 170 – Minimum Requirements for Multi-Use Paths and Trails

Per the County's Open Space and Trails Master Plan (2007) as well as the County's online interactive GIS map. The Site includes a Pinal County multi-use trail corridor along John Wayne Parkway that will be constructed and included as part of the Site development, see **Exhibit 5: Circulation and Trails Plan** and **Exhibit 6: Sections** for more information. As the Site develops, the project will be required to comply with Pinal County's trail system and open space preservation standards. Sidewalks and pedestrian paths are included as part of the proposed improvements.

9.2.6 Section 180 – Minimum Requirements for Storm Water Retention and Detention Basins

The appearance of retention/detention basins will be softened by employing a varied and natural groundform that includes natural grading and berming along adjacent streets. Drought tolerant plant material and turf will be employed in the basins and open space areas. Any trails passing through open space areas will conform to ADA guidelines.

9.2.7 Section 190 – Minimum Requirements for Streetscape and Entryways

As with the rest of the Site, all plant material used will be listed from the ADWR low water use plant list. The plant sizes and densities will conform to the requirements of the PCDSC.

9.2.8 Section 200 – Minimum Requirements for Conservation Open Space

Per the County's requirements, disturbed land requires zero (0) percent conservation areas and there are no significant existing vegetation onsite due to previous agricultural use of the Site.

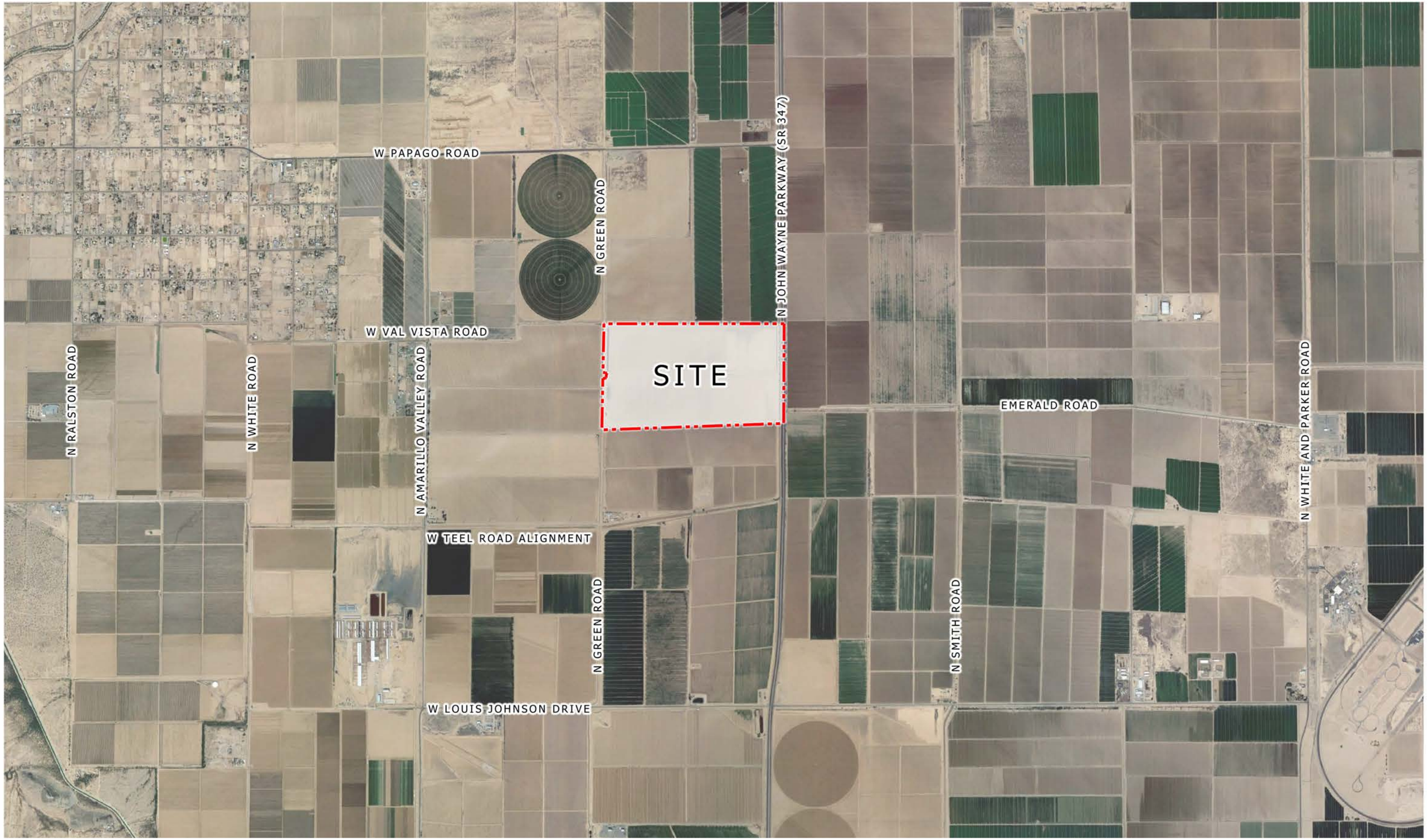


Exhibit 1: Vicinity Map



Exhibit 2: Aerial Map

N:\01\0376401\Hydro\MDR\CADD\HS.SLOPE.ANALYSIS.dwg **RamonI** **April 6, 2023**



NOT TO SCALE EXHIBIT 4550 North 12th Street Phoenix, Arizona 85014 Phone 602-264-6831 http://www.cvlci.com	SUNSET CANYON SLOPE ANALYSIS EXHIBIT	CVL CONSULTANTS 01 OF 01

Exhibit 3: Slope and Site Analysis Map

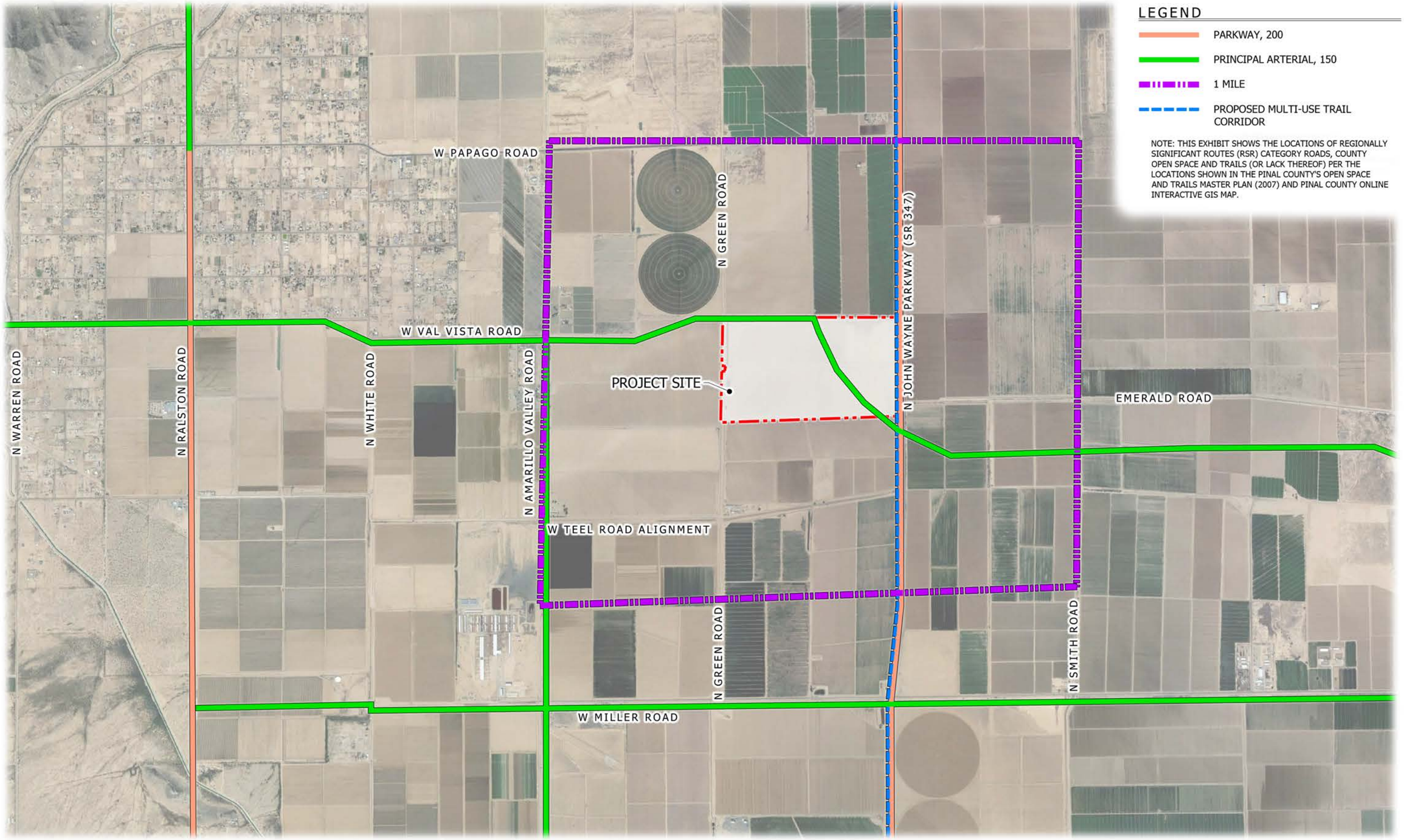
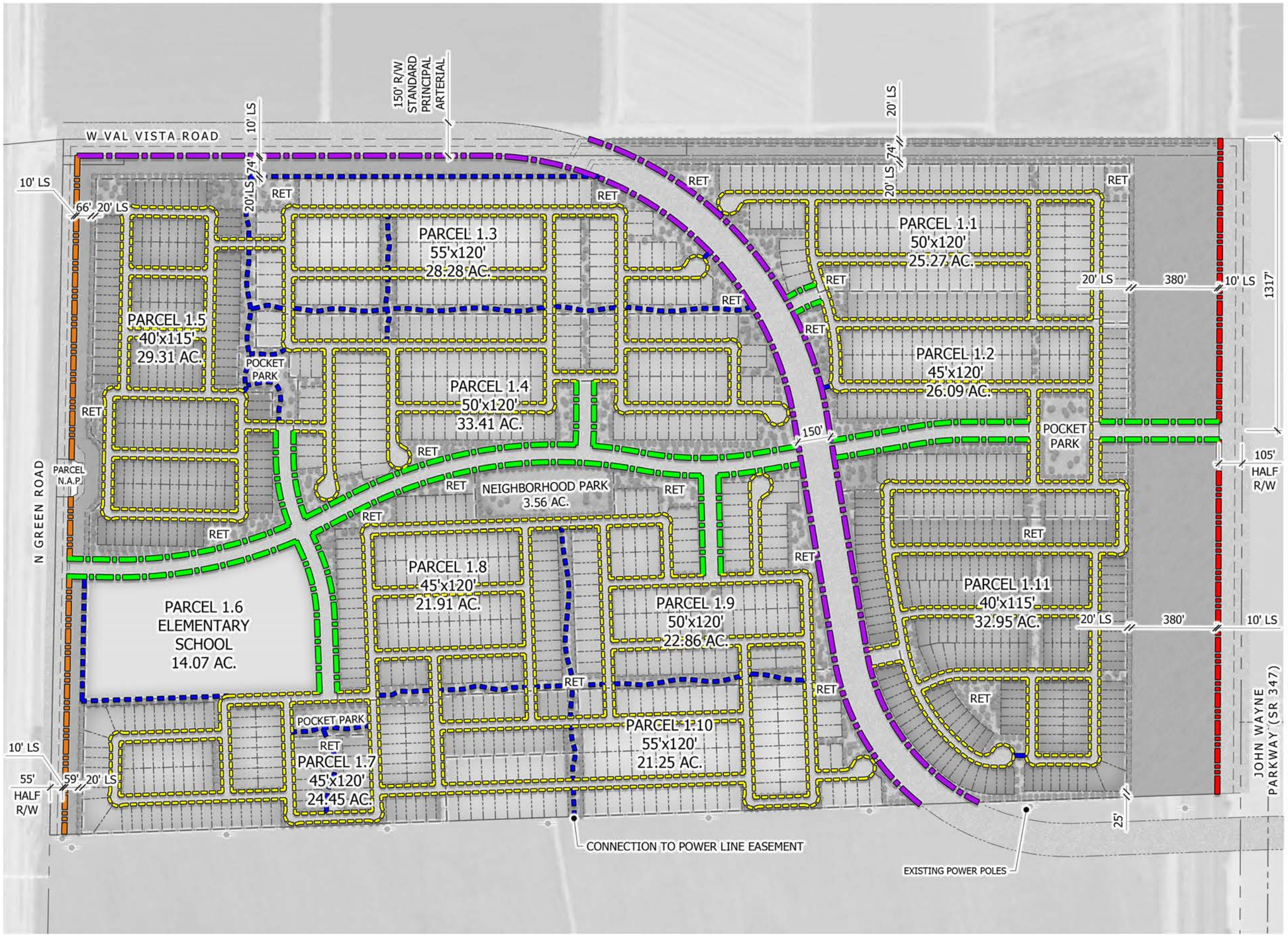


Exhibit 4: Pinal County Trails, Roadways, and Access Context Map

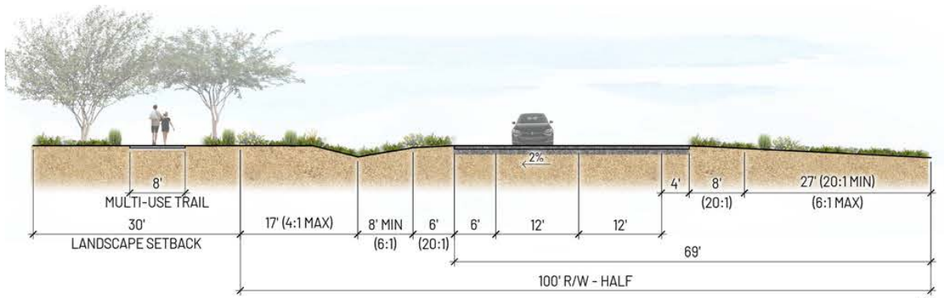


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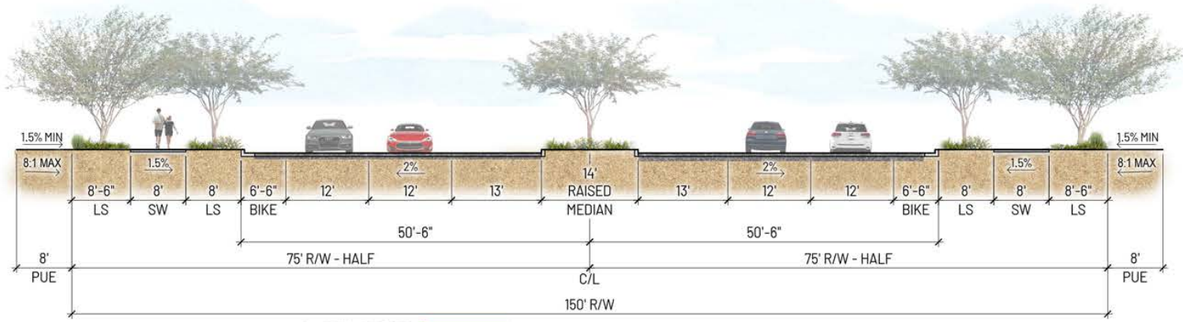
- 5'-0" ATTACHED CONCRETE SIDEWALK
- 5'-0" DETACHED CONCRETE SIDEWALK
- 5'-0" CONCRETE TRAIL
- 6'-0" ATTACHED CONCRETE SIDEWALK
- 8'-0" DETACHED CONCRETE SIDEWALK [1]
- PROPOSED MULTI-USE TRAIL CORRIDOR

NOTE: PROPOSED MULTI-USE TRAIL CORRIDOR SHOWN PER THE LOCATION IN THE PINAL COUNTY'S OPEN SPACE AND TRAILS MASTER PLAN (2007) AND PINAL COUNTY ONLINE INTERACTIVE GIS MAP.

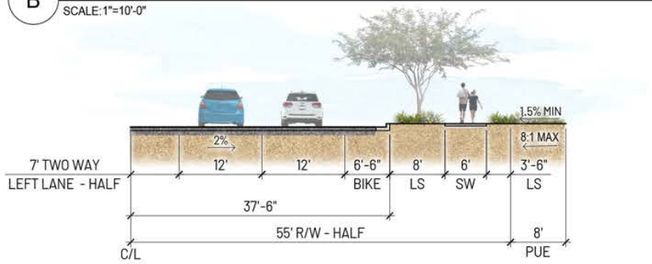
Exhibit 5: Circulation and Trails Plan



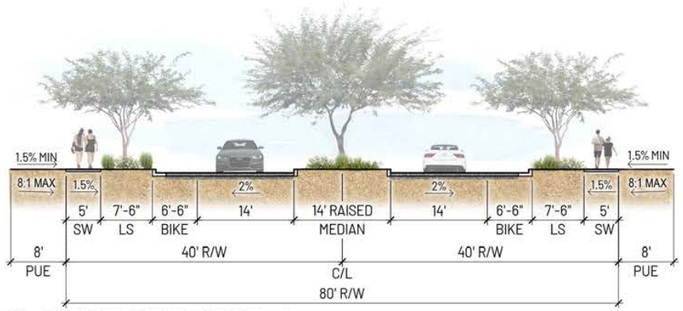
A JOHN WAYNE PARKWAY - HALF STREET
SCALE: 1"=10'-0"



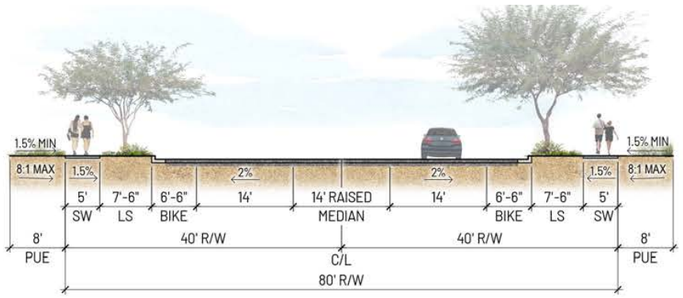
B PRINCIPAL ARTERIAL
B1: FULL STREET
B2: HALF STREET
FULL STREET WHERE APPLICABLE. SEE KEY MAP
SCALE: 1"=10'-0"



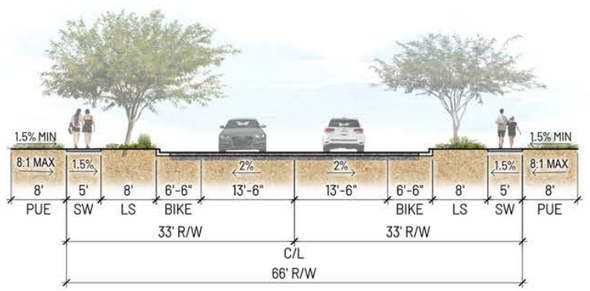
C MINOR ARTERIAL
SCALE: 1"=10'-0"



D MAJOR COLLECTOR - A
SCALE: 1"=10'-0"

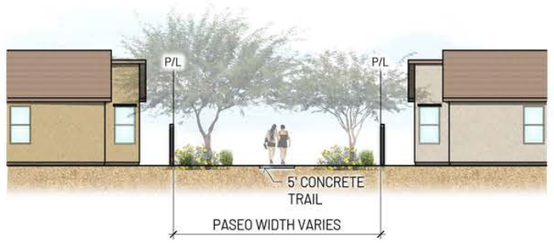


E MAJOR COLLECTOR - B
SCALE: 1"=10'-0"

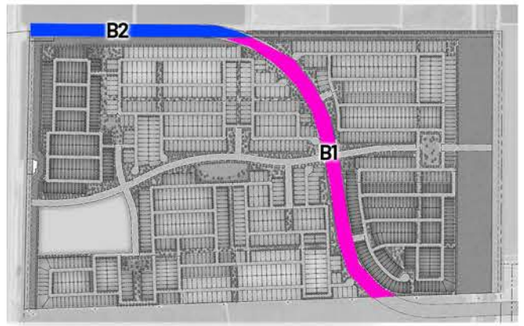


F MINOR COLLECTOR
SCALE: 1"=10'-0"

G LOCAL STREET - C
SCALE: 1"=10'-0"



H Concrete Trail Within Paseo
SCALE: 1"=10'-0"



KEY MAP
N.T.S

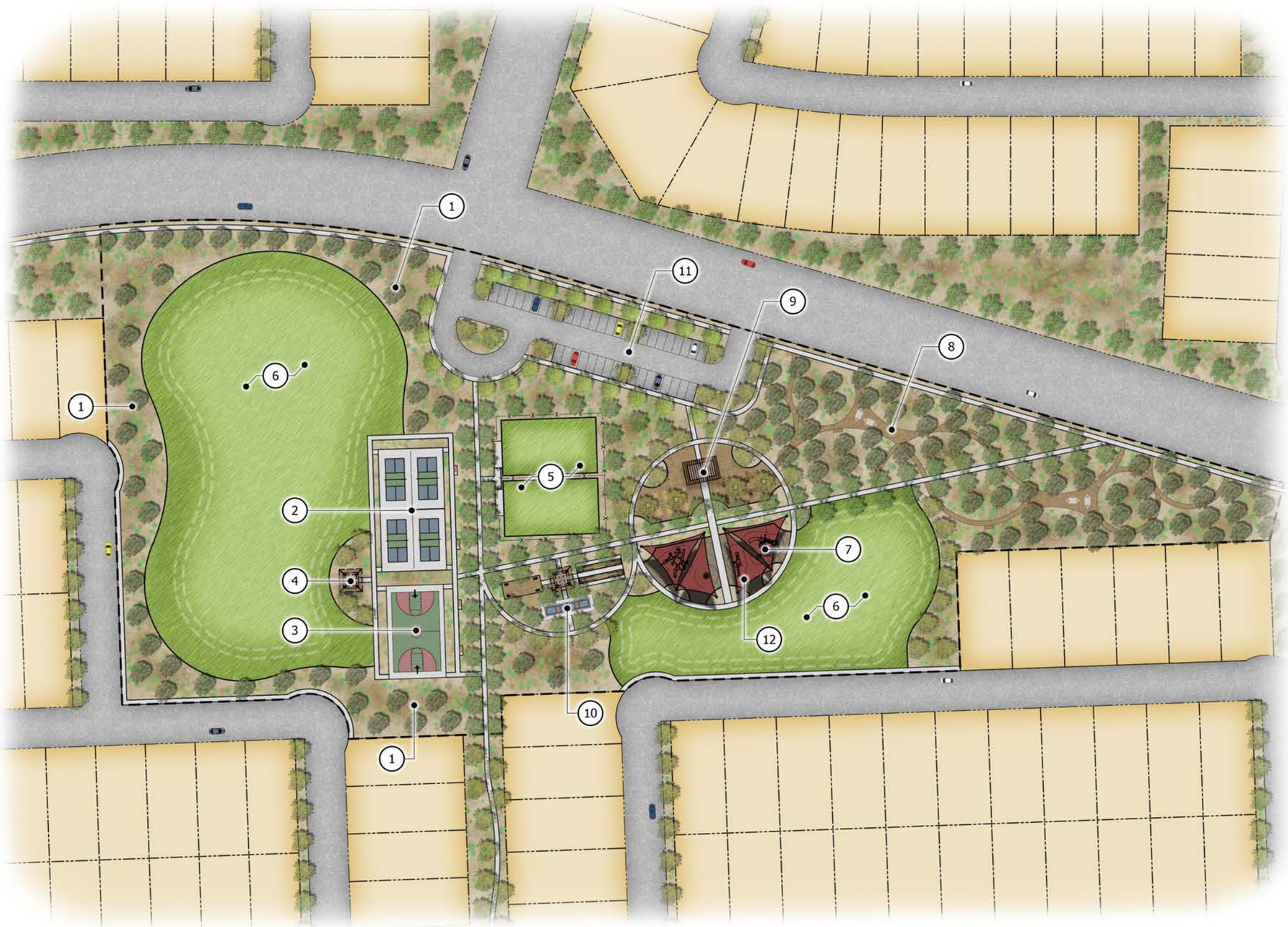


OPEN SPACE TABLE				
GROSS ACREAGE [1]	374.02 Ac.			
	REQUIRED		PROVIDED	
DESCRIPTION	%	ACREAGE	%	ACREAGE
NEIGHBORHOOD PARK (ACTIVE RECREATIONAL)				3.56 AC.
POCKET PARK (ACTIVE RECREATIONAL)				10.88 AC.
TRAIL AREAS (ACTIVE RECREATIONAL)				11.97 AC.
DRAINAGE CHANNEL				37.41 AC.
TOTAL ACTIVE RECREATIONAL OPEN SPACE	7.00%	26.18 Ac.	7.06%	26.41 AC.
DEDICATED OPEN SPACE [1, 2]	11.00%	41.14 Ac.	13.43%	50.24 AC.
TOTAL OPEN SPACE	18.00%	67.32 Ac.	20.49%	76.65 AC.

1. DEDICATED OPEN SPACE TO BE DETERMINED AT FINAL SITE DESIGN.
2. DEDICATED OPEN SPACE INCLUDES DRAINAGE CHANNEL.

NOTE: ACTIVE RECREATIONAL SPACES TO INCLUDE: COMMUNITY AND POCKET PARKS THAT MAY INCLUDE AMENITIES SUCH AS GARDENS, RAMADAS, TOT LOTS, SEATING, DOG PARKS, AND OPEN PLAY/TURF AREAS.

Exhibit 7: Open Space and Amenities Plan



LEGEND

1. LANDSCAPE AREA
2. PICKELBALL COURTS
3. BASKETBALL COURTS
4. RAMADA
5. DOG PARKS
6. ACTIVE TURF AREA
7. TOT LOT PLAY STRUCTURE
8. ADVENTURE TRAIL
9. PICNIC AREA
   - RAMADA
   - CHESS TABLES
   - PICNIC TABLE
10. ADULT GAME AREA
    - HORSESHOES
    - BOCCE BALL COURT
    - BAG TOSS
    - RAMADA
11. PARKING
12. SHADE STRUCTURE

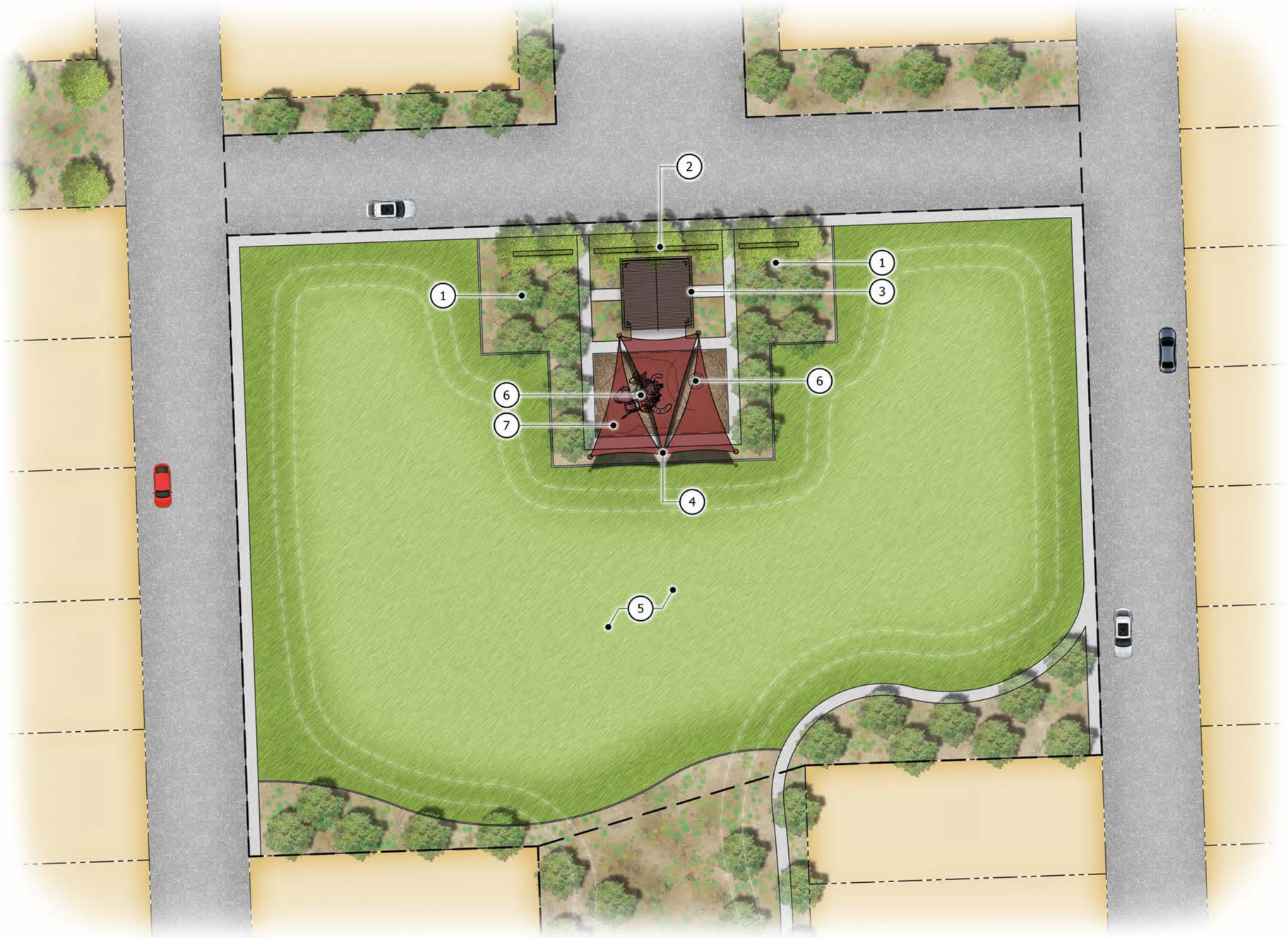
Exhibit 8: Conceptual Neighborhood Park



LEGEND

1. LANDSCAPE AREA
2. RAMADA
3. BOCCE BALL COURT
4. ACTIVE TURF AREA
5. TOT LOT PLAY STRUCTURE
6. PLAY SURFACING
7. BAG TOSS
8. BBQ STATION
9. PICNIC TABLE
10. BENCH

Exhibit 9: Conceptual Pocket Park A



LEGEND

1. LANDSCAPE AREA
2. SEAT WALL
3. RAMADA
4. SHADE STRUCTURE
5. ACTIVE TURF AREA
6. TOT LOT PLAY STRUCTURE
7. PLAY SURFACING

Exhibit 10: Conceptual Pocket Park B

Suggested Park Amenity Table			
	Park Hierarchy		Minimum Standards
Amenity	Pocket Park (1/4 Ac. Min)	Neighborhood Park (1 Ac. Min)	
Bag Toss Courts	X	X	
Barbeque	X	X	
Bench and Seating Areas	X	X	
Bike Parking		X	4 Spaces
Bocce Ball Courts		X	
Community Garden		X	
Dog Park With Seating/Benches		X	10,000 SF
Drinking Fountains		X	
Fire Pit	X	X	
Paths in addition to sidewalks	X	X	
Outdoor Fitness/Stretch Equipment		X	
Open Play/Turf	X	X	20,000 SF (NP), 5,000 SF (PP)
Pickleball Court		X	
Picnic Tables	X	X	
Ramadas	X	X	250 SF
Play Structure (Ages 2-5)	X	X	1 Per 500 Units
Play Structure (Ages 5-12)	X	X	
Seating Area with Shade Trees	X		
Tennis Court		X	
Trash Cans	X	X	
Volleyball Court		X	

Note: Amenities listed above are intended as conceptual suggestions and are not intended to be an exhaustive list.

Conceptual Plant Palette

Tree	
Botanical Name	**Common Name**
Acacia aneura	Mulgav Acacia
Acacia smallii	Sweet Acacia
Acacia stenophylla	Shoestring Acacia
Acacia willardiana	Palo Blanco
Bauhinia lunarioides	Anacacho Orchid Tree
Caeselpinia cacalaco	'Smoothie' Cascalote
Chilopsis linearis	Desert Willow
Chitalpa tashkentensis	Chitalpa
Eucalyptus papuana	Ghost Gum
Olea europaea	'Wilsonii' Wilsonii Olive
Parkinsonia hyb.	Desert Museum Palo Verde
Pistacia chinensis	'Red Push' Red Push Chinese Pistache
Pistacia lentiscus	Mastic Tree
Prosopis hybrid	Thornless Mesquite
Prosopis glandulosa	Honey Mesquite
Prosopis chilensis	Chilean Mesquite
Quercus virginiana	'Cathedral' Cathedral Live Oak
Quercus virginiana	'Empire' Empire Live Oak
Quercus virginiana	'Joan Leonetti' Joan Leonetti Live Oak
Quercus virginiana	Southern Live Oak
Sophora secundiflora	Texas Mountain Laurel
Ulmus parvifolia 'Sempervirens'	Evergreen Elm
Vitex agnus-castus	Chaste Tree
Rhus Lancea	African Sumac
Dalbergia sissoo	Rosewood
Parkinsonia florida	Blue Palo Verde
Parkinsonai praecox	Palo Brea

General Note: Any plants with thorns shall not be located adjacent to sidewalks or paths.

Conceptual Plant Palette Continued

Extra Large Shrubs	
Botanical Name	**Common Name**
Bougainvillea 'Barbara Karst'	Barbara Karst Bougainvillea
Bougainvillea 'California Gold'	California Gold Bougainvillea
Buddleia marrubifolia	Woolly Butterfly Bush
Caesalpinia gillesii	Yellow Bird of Paradise
Caesalpinia mexicana	Mexican Bird of Paradise
Caesalpinia pulcherrima	Red Bird of Paradise
Cordia boissieri	Anacahuita
Cordia parvifolia	Little Leaf Cordia
Dodonaea viscosa	Hopbush
Nerium oleander 'tree form'	Standard Oleander 'Tree Form'
Rosa banksiae 'Alba Plena'	White Lady Bank's Rose
Tecoma alata 'Orange Jubilee'	Orange Jubilee
Tecoma 'Sparky'	Sparky Bells
Tecoma Stans	Yellow Bells
Tecoma x 'Bells of Fire'	Bells of Fire
Tecoma x 'Sunrise'	Sunrise
Vauquelinia californica	Arizona Rosewood

Large Shrubs	
Botanical Name	**Common Name**
Calliandra californica	Red Fairy Duster
Cassia artemisioides 'Silver'	Silver Cassia
Cassia nemophila	Desert Cassia
Convolvus cneorum	Silver Bush
Justicia californica	Red Chuparosa
Larrea tridentata	Creosote
Leucophyllum langmaniae 'Lynn's Legacy'	Lynn's Legacy Sage
Leucophyllum langmaniae 'Rio Bravo'	Rio Bravo Sage
Salvia clevelandii	Chaparral Sage
Senna artemisiodes	Feathery Senna
Simmondsia Chinensis	Jojoba
Viguiera parishii	Goldeneye

Conceptual Plant Palette Continued

Medium Shrubs	
Botanical Name	**Common Name**
Dalea frutescens	Black Dalea
Dalea frutescens 'Sierra Negra'	Sierra Negra Dalea
Eremophila glabra spp. carnosa	Winter Blaze
Eremophila hygrophana Blue Bells	Blue Bells
Hibiscus rosa-sinensis 'Diamond Head'	Double Red Hibiscus
Justicia spicigera	Mexican Honeysuckle
Leucophyllum candidum 'Thunder Cloud'	Thunder Cloud Sage
Leucophyllum frutescens 'Compacta'	Compact Texas Sage
Leucophyllum frutescens 'Green Cloud'	Green Cloud Texas Sage
Leucophyllum X 'Heavenly Cloud'	Heavenly Cloud Sage
Leucophyllum zygophyllum	Cimarron Sage
Nerium oleander 'Little Red'	Little Red Oleander
Nerium oleander 'Petite Pink'	Petite Pink Oleander
Punica granatum	Dwarf Pomegranate
Rosmarinus officinalis 'Tuscan Blue'	Tuscan Blue Rosemary
Ruellia brittoniana	Purple Ruellia
Simmondsia Chinensis	Vista' Compact jojoba
Teucrium fruticans	Bush Germander

Small Shrubs	
Botanical Name	**Common Name**
Anisacanthus quadrifidus v. brevilobus	Mountain Flame
Bougainvillea 'Alexandra'	Alexandra Bougainvillea
Bougainvillea glabra 'Yani's Delight'	Yani's Delight Bougainvillea
Calliandra eriophylla	Pink Fairy Duster
Callistemon viminalis 'Little John'	Little John Bottle Brush
Myrtus communis 'compacta'	Dwarf Myrtle
Olea europaea "Little Ollie"	Dwarf Olive
Teucrium chamaedrys	Germander

Conceptual Plant Palette Continued

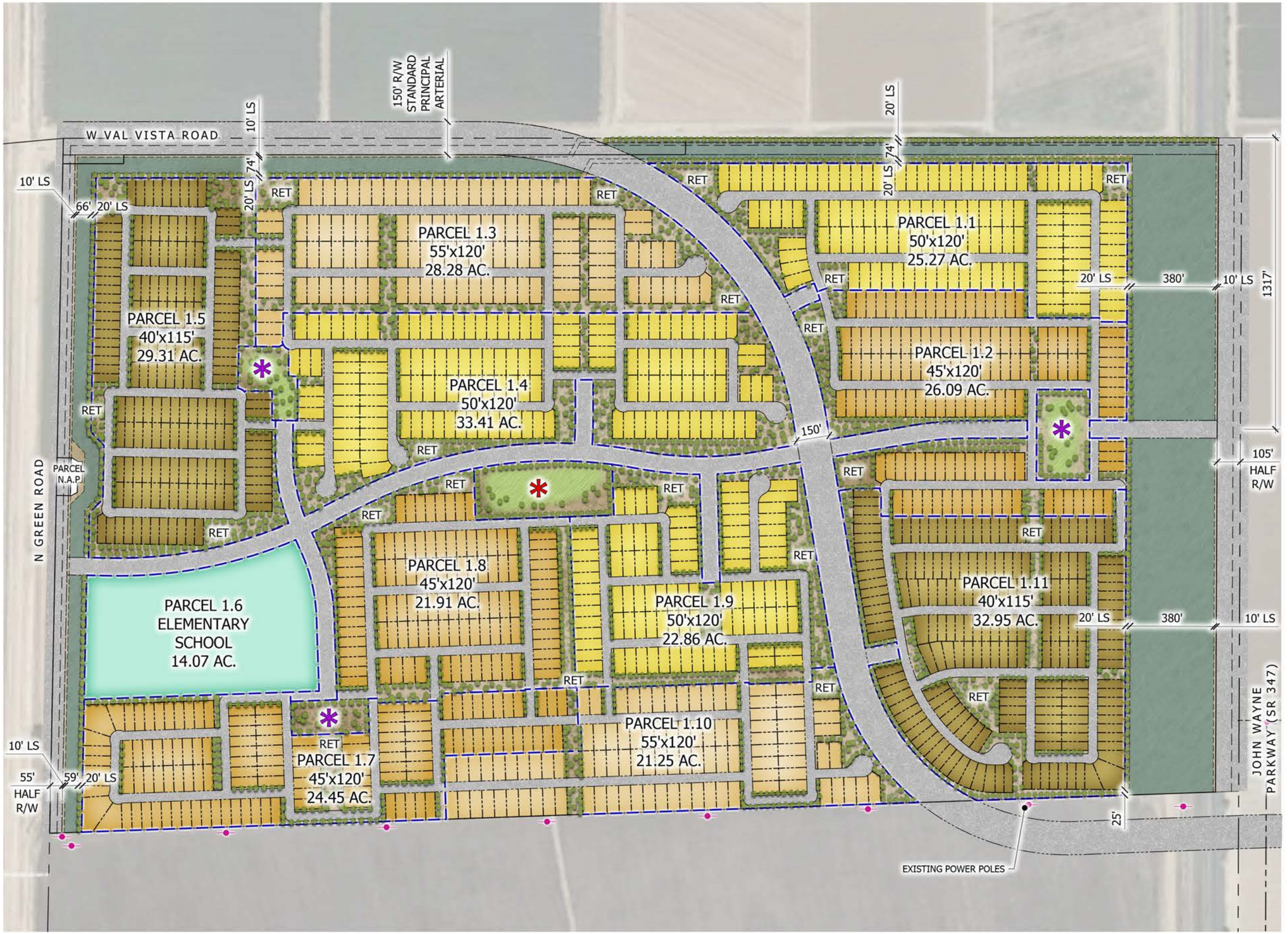
Groundcovers	
Botanical Name	**Common Name**
Acacia redolens	Desert Carpet
Baccharis hybrid 'Starn'	Thompson' Coyote Bush
Eremophila prostrata	Outback Sunrise
Eremophila Juniperus sabina 'Buffalo'	Buffalo Juniper
Lantana montevidensis	Purple Trailing Lantana
Lantana sp.	'New Gold' Lantana
Lantana sp.	'Dallas Red' Lantana
Rosmarinus officinalis 'Prostratus'	Trailing Rosemary
Ruellia 'Katie'	Dwarf Ruellia 'Katie'
Teucrium chamaedrys 'prostratum'	Prostrate Germander
Trachelospermum jasminoides Asiaticum	Asiatic Jasmine
Wedelia trilobata	Wedelia

General Note: Any plants with thorns shall not be located adjacent to sidewalks or paths.

Conceptual Plant Palette Continued	
Cacti/ Accents	
Botanical Name	**Common Name**
Agave bovicornuta	Cow's Horn Agave
Agave geminiflora	Twin Flowered Agave
Agave schidigera	Durango Delight Agave
Agave parryi 'truncata'	Parry's Agave
Aloe barbadensis	Medicinal Aloe
Aloe hyb. 'Blue Elf'	Blue Elf Aloe
Aloe striata	Coral Aloe
Bouteloua gracilis	Blonde Ambition
Bulbine frutescens	Shrubby Bulbine
Dasylirion quadrangulatum	Mexican Grass Tree
Dasylirion wheeleri	Desert Spoon
Hesperaloe sp. Pink Parade	Pink Parade Hesperaloe
Hesperaloe parviflora 'Brakelights'	Brakelights Red Yucca
Hesperaloe parviflora 'MSWNPERED'	Sandia Glow Red Yucca
Muhlenbergia capillaris	'Regal Mist'
Muhlenbergia lindheimeri	'Autumn Glow'
Muhlenbergia rigens	Deer Grass
Myoporum parvifolium	Trailing Myoporum
Nassella tenuissima	Mexican Feather Grass
Nolina bigelovii	Bear-grass
Opuntia basilaris	Beavertail Prickly Pear
Opuntia santa rita	Purple Prickly Pear
Opuntia sp. Kelly's Choice	Kelly's Choice Prickly Pear
Opuntia violacea 'Santa-Rita'	Purple Prickly Pear
Pachycereus marginatus	Mexican Fence Post Cactus
Pedilanthus macrocarpus	Slipper Plant
Penstemon eatonii	Firecracker Penstemon
Portulacaria afra minima	Dwarf Elephant Food
Yucca baccata	Banana Yucca
Yucca pallida	Pale Leaf Yucca
Yucca recurvifolia	Soft Leaf Yucca
Yucca rupicola	Twisted Leaf Yucca

Conceptual Plant Palette Continued	
Vines	
Botanical Name	**Common Name**
Bougainvillea 'Barbara Karst'	Barbara Karst Bougainvillea
Hardenbergia violacea	Purple Lilac Vine
Rosa banksiae	Lady Bank's Rose

General Note: Any plants with thorns shall not be located adjacent to sidewalks or paths.



LEGEND

CANOPY AND ORNAMENTAL TREES — 24"-36" BOX
24"-36" BOX
TREES TO BE SELECTED AND PLANTED PER ANA STANDARDS

SHRUBS AND GROUNDCOVER — 1-5 GALLON
SHRUB DENSITY PER PINAL COUNTY STANDARDS
ALL LANDSCAPE AREAS TO RECEIVE 2" COVER OF DECOMPOSED GRANITE

TURF
MID-IRON SOD

NOTE:
PLEASE REFER TO THE MASTER PLANT PALETTE IN THE PAD FOR A COMPLETE LIST OF PROPOSED PLANT MATERIALS

NEIGHBORHOOD PARK

POCKET PARK

PLANTING NOTES:
ALL FIVE (5) GALLON SHRUBS SHALL BE PLANTED AT A RATE OF FIVE SHRUBS PER 30 FEET OF LINEAR STREET FRONTAGE

- FIVE (5) GALLON SHRUBS WITHIN RECREATION AREAS SHALL BE PLANTED AT A RATE OF SEVEN (7) SHRUBS PER 1,000 SQUARE FEET OF SURFACE AREA PROVIDED
- THE MINIMUM NUMBER OF TREES REQUIRED SHALL BE PLANTED PER THE OPEN SPACE AND RECREATION AREA MANUAL
- TWENTY-FIVE PERCENT (25%) OF THE TREES REQUIRED SHALL BE AT LEAST 24" BOX SIZE
- DECORATIVE DESIGN ELEMENTS SUCH AS BENCHES AND PAVING ACCENTS SHALL BE PROVIDED WHERE APPROPRIATE TO ENHANCE THE OPEN SPACE AREAS
- NO WASH CORRIDORS OR NATURAL FEATURES EXIST WITHIN THE SITE
- A VEGETATIVE SALVAGE PLAN DOES NOT EXIST FOR THE SITE AS IT IS EXISTING FARMLAND
- THERE IS NO CONSERVATION OPEN SPACE WITHIN THE SITE OR VICINITY
- LOCATION OF TREES AND SHRUBS SHALL BE PROVIDED DURING THE CONSTRUCTION DOCUMENTATION PROCESS AND SHALL MEET THE MINIMUM STANDARDS AND SPECIFICATIONS OF THE ARIZONA NURSERYMAN'S ASSOCIATION OR ARIZONA ASSOCIATION OF NURSERYMEN
- RIPARIAN VEGETATION AND BIOLOGICAL HABITATS ARE NOT PRESENT ON THE SITE
- A MINIMUM OF 25% OF EACH RECREATION AREA WILL SHALL BE DRY AND NOT USED AS RETENTION/DETENTION

Exhibit 13: Conceptual Landscape Plan

Arizona Environmental Online Review Tool Report

Arizona Game and Fish Department Mission
To conserve Arizona's diverse wildlife resources and manage for safe, compatible outdoor recreation opportunities for current and future generations.

Project Name:
Sunset Canyon

Project Description:
Development of single family, multi-family, and neighborhood commercial project.

Project Type:
Development Outside Municipalities (Rural Development), Residential subdivision and associated infrastructure, New construction

Contact Person:
Paula Wheeler

Organization:
ABLA

On Behalf Of:
PINAL

Project ID:
HGIS-15844

Please review the entire report for project type and/or species recommendations for the location information entered. Please retain a copy for future reference.

Disclaimer:

1. This Environmental Review is based on the project study area that was entered. The report must be updated if the project study area, location, or the type of project changes.
2. This is a preliminary environmental screening tool. It is not a substitute for the potential knowledge gained by having a biologist conduct a field survey of the project area. This review is also not intended to replace environmental consultation (including federal consultation under the Endangered Species Act), land use permitting, or the Departments review of site-specific projects.
3. The Departments Heritage Data Management System (HDMS) data is not intended to include potential distribution of special status species. Arizona is large and diverse with plants, animals, and environmental conditions that are ever changing. Consequently, many areas may contain species that biologists do not know about or species previously noted in a particular area may no longer occur there. HDMS data contains information about species occurrences that have actually been reported to the Department. Not all of Arizona has been surveyed for special status species, and surveys that have been conducted have varied greatly in scope and intensity. Such surveys may reveal previously undocumented population of species of special concern.
4. HabiMap Arizona data, specifically Species of Greatest Conservation Need (SGCN) under our State Wildlife Action Plan (SWAP) and Species of Economic and Recreational Importance (SERI), represent potential species distribution models for the State of Arizona which are subject to ongoing change, modification and refinement. The status of a wildlife resource can change quickly, and the availability of new data will necessitate a refined assessment.

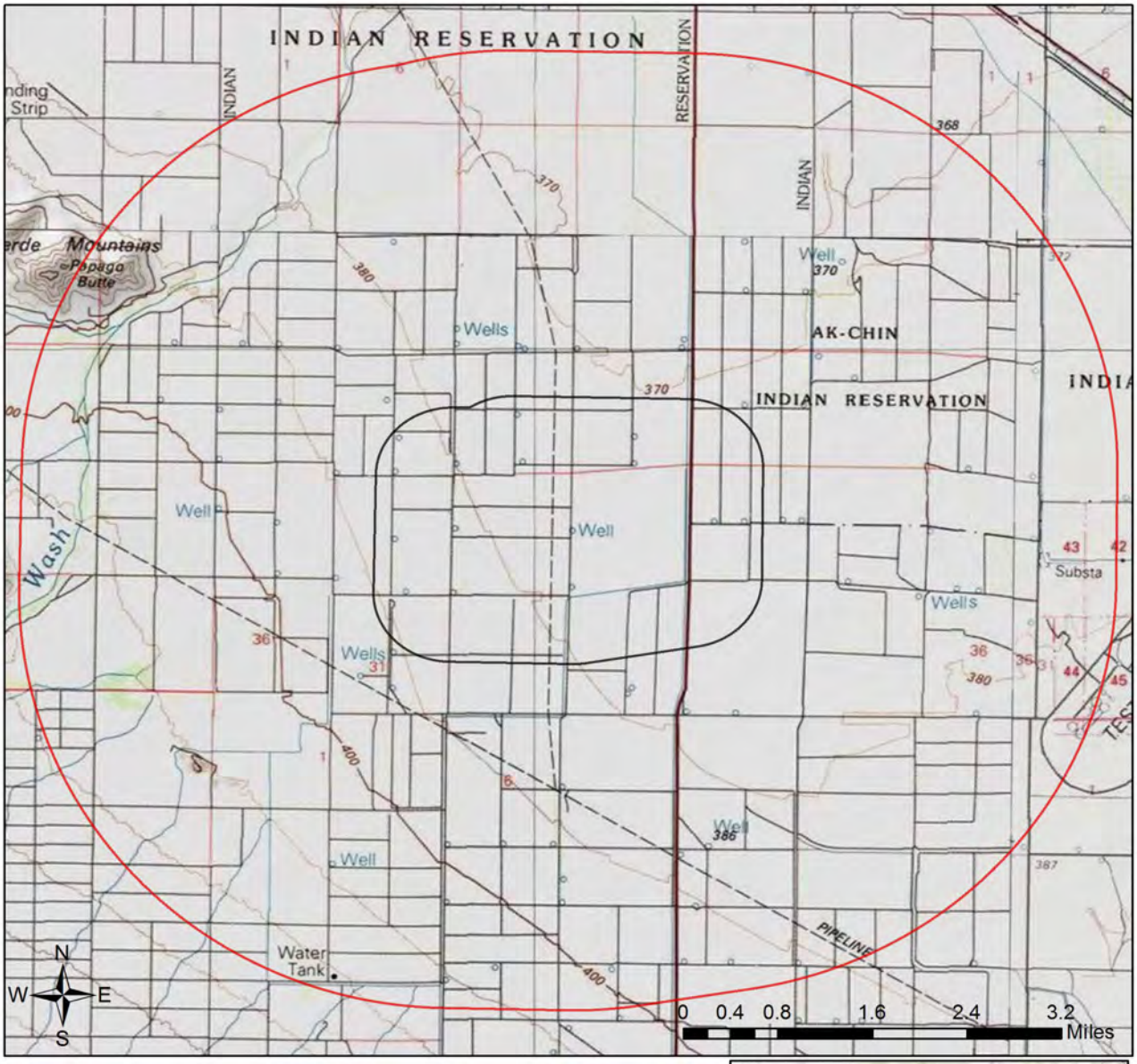
Locations Accuracy Disclaimer:
Project locations are assumed to be both precise and accurate for the purposes of environmental review. The creator/owner of the Project Review Report is solely responsible for the project location and thus the correctness of the Project Review Report content.

Recommendations Disclaimer:

1. The Department is interested in the conservation of all fish and wildlife resources, including those species listed in this report and those that may have not been documented within the project vicinity as well as other game and nongame wildlife.
2. Recommendations have been made by the Department, under authority of Arizona Revised Statutes Title 5 (Amusements and Sports), 17 (Game and Fish), and 28 (Transportation).
3. Potential impacts to fish and wildlife resources may be minimized or avoided by the recommendations generated from information submitted for your proposed project. These recommendations are preliminary in scope, designed to provide early considerations on all species of wildlife.
4. Making this information directly available does not substitute for the Department's review of project proposals, and should not decrease our opportunity to review and evaluate additional project information and/or new project proposals.
5. Further coordination with the Department requires the submittal of this Environmental Review Report with a cover letter and project plans or documentation that includes project narrative, acreage to be impacted, how construction or project activity(s) are to be accomplished, and project locality information (including site map). Once AGFD had received the information, please allow 30 days for completion of project reviews. Send requests to:
   Project Evaluation Program, Habitat Branch
   Arizona Game and Fish Department
   5000 West Carefree Highway
   Phoenix, Arizona 85086-5000
   Phone Number: (623) 236-7600
   Fax Number: (623) 236-7366
   Or
   PEP@azgfd.gov
6. Coordination may also be necessary under the National Environmental Policy Act (NEPA) and/or Endangered Species Act (ESA). Site specific recommendations may be proposed during further NEPA/ESA analysis or through coordination with affected agencies

Sunset Canyon

USA Topo Basemap With Locator Map



Project Boundary

Buffered Project Boundary

Project Size (acres): 4,480.67

Lat/Long (DD): 32.9629 / -112.0656

County(s): Pinal

AGFD Region(s): Mesa; Yuma

Township/Range(s): T5S, R3E

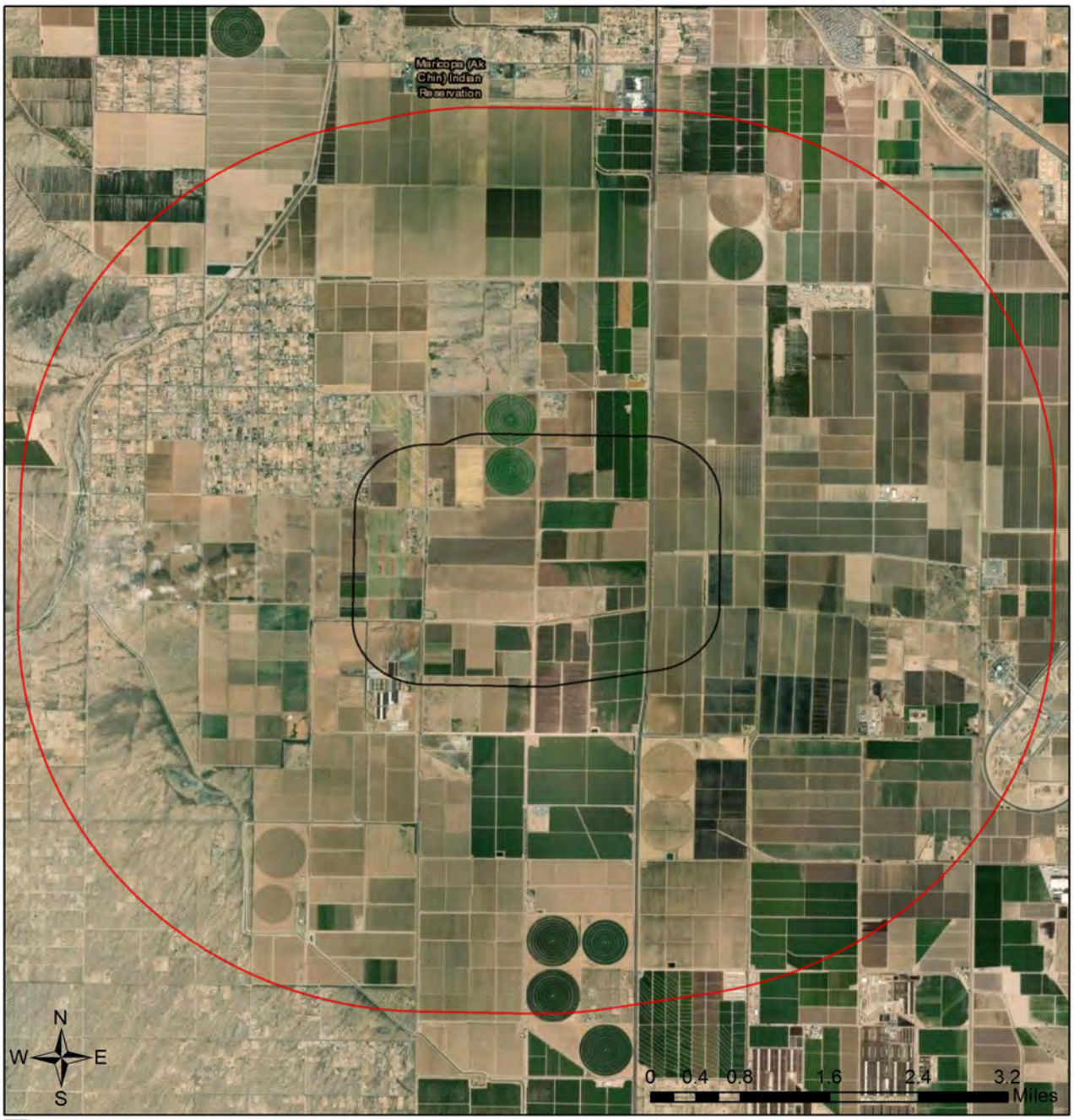
USGS Quad(s): ANTELOPE PEAK NE



Service Layer Credits: Sources: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap

Sunset Canyon

Web Map As Submitted By User



Project Boundary

Buffered Project Boundary

Project Size (acres): 4,480.67

Lat/Long (DD): 32.9629 / -112.0656

County(s): Pinal

AGFD Region(s): Mesa; Yuma

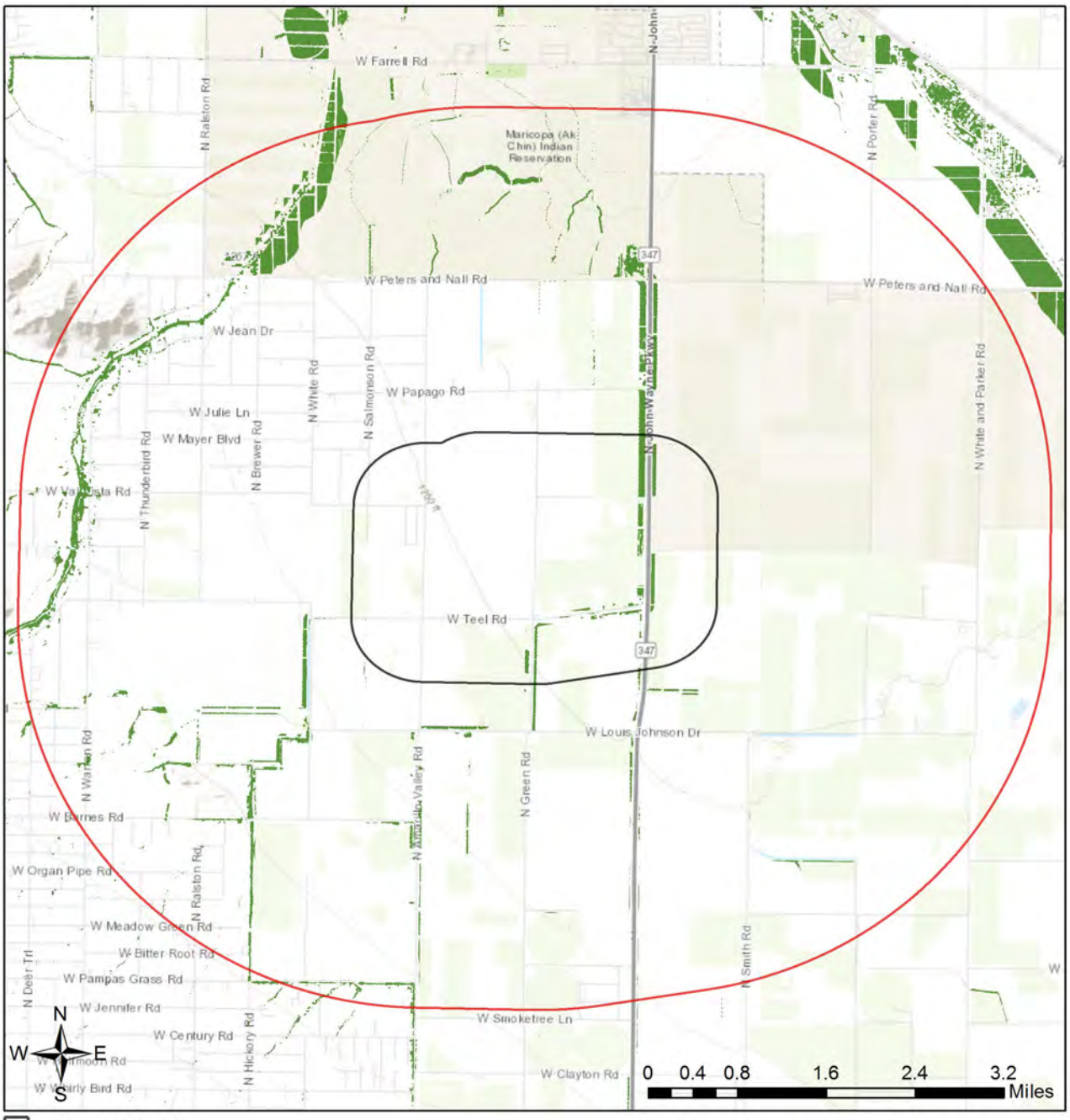
Township/Range(s): T5S, R3E

USGS Quad(s): ANTELOPE PEAK NE

Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community
Esri, HERE, Garmin, (c) OpenStreetMap contributors, and the GIS user community

Sunset Canyon

Important Areas



- Project Boundary
- Buffered Project Boundary
- Wildlife Connectivity
- Important Connectivity Zones
- Pinal County Riparian
- Critical Habitat
- Important Bird Areas

Project Size (acres): 4,480.67

Lat/Long (DD): 32.9629 / -112.0656

County(s): Pinal

AGFD Region(s): Mesa; Yuma

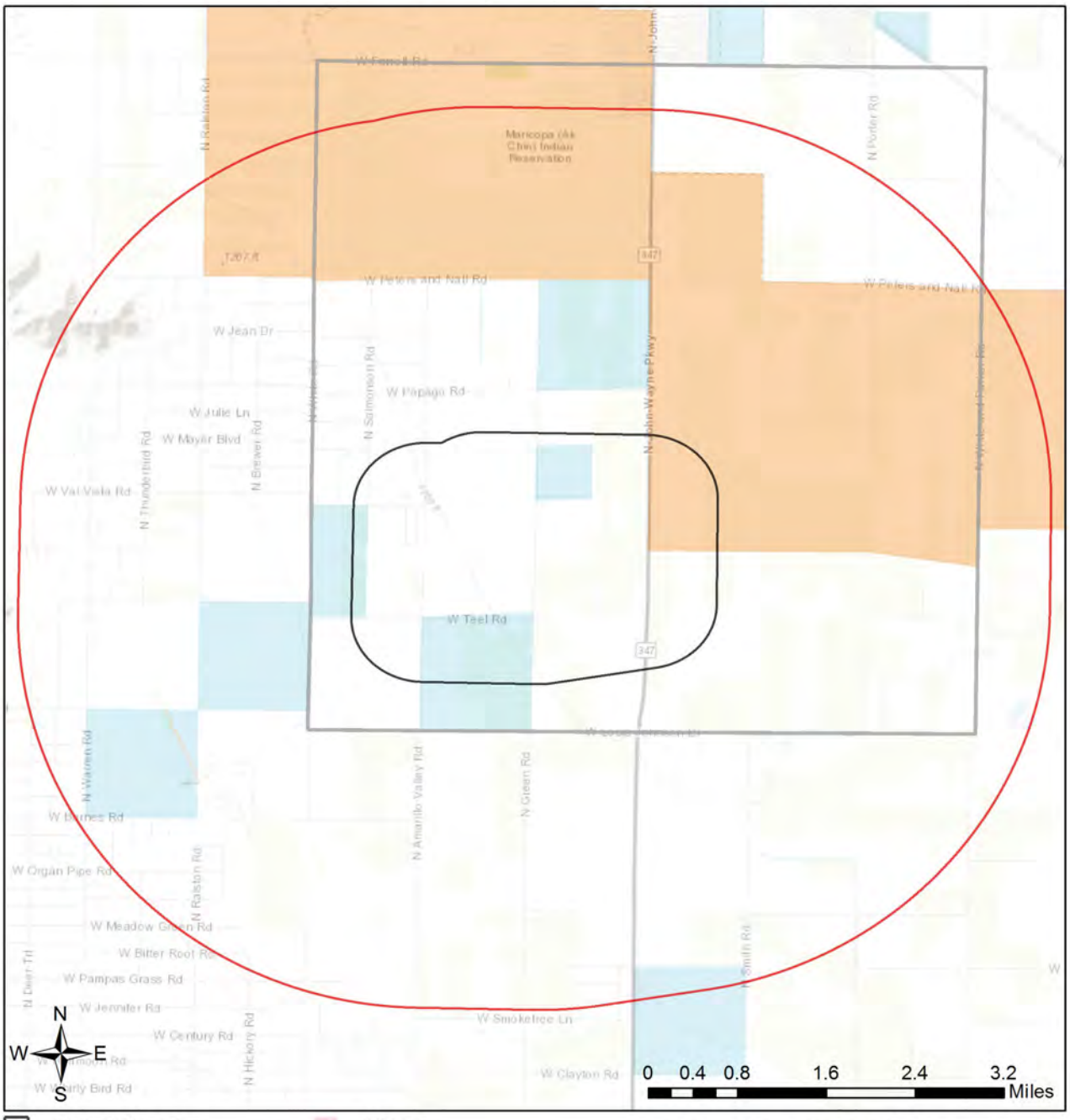
Township/Range(s): T5S, R3E

USGS Quad(s): ANTELOPE PEAK NE

Sources: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community

Sunset Canyon

Township/Ranges and Land Ownership



- Project Boundary
- Buffered Project Boundary
- Township/Ranges

Land Ownership

- AZ Game & Fish Dept.
- BLM
- BOR
- Indian Res.
- Military
- Mixed/Other
- National Park/Mon.
- Private
- State & Regional Parks
- State Trust
- US Forest Service
- Wildlife Area/Refuge

Project Size (acres): 4,480.67

Lat/Long (DD): 32.9629 / -112.0656

County(s): Pinal

AGFD Region(s): Mesa; Yuma

Township/Range(s): T5S, R3E

USGS Quad(s): ANTELOPE PEAK NE

Sources: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community

Special Status Species Documented within 3 Miles of Project Vicinity

Scientific Name	Common Name	FWS	USFS	BLM	NPL	SGCN
Athene cunicularia hypugaea	Western Burrowing Owl	SC	S	S		1B

Note: Status code definitions can be found at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/statusdefinitions/
.

Special Areas Documented that Intersect with Project Footprint as Drawn

Scientific Name	Common Name	FWS	USFS	BLM	NPL	SGCN
Ak-Chin Indian Reservation	Ak-Chin Indian Reservation					
Riparian Area	Riparian Area					

Note: Status code definitions can be found at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/statusdefinitions/
.

Species of Greatest Conservation Need Predicted that Intersect with Project Footprint as Drawn, based on Predicted Range Models

Scientific Name	Common Name	FWS	USFS	BLM	NPL	SGCN
Aix sponsa	Wood Duck					1B
Ammospermophilus harrisii	Harris' Antelope Squirrel					1B
Anaxyrus retiformis	Sonoran Green Toad			S		1B
Athene cunicularia hypugaea	Western Burrowing Owl	SC	S	S		1B
Botaurus lentiginosus	American Bittern					1B
Buteo regalis	Ferruginous Hawk	SC		S		1B
Calypte costae	Costa's Hummingbird					1C
Chilomeniscus stramineus	Variable Sandsnake					1B
Colaptes chrysoides	Gilded Flicker			S		1B
Coluber bilineatus	Sonoran Whipsnake					1B
Corynorhinus townsendii pallescens	Pale Townsend's Big-eared Bat	SC	S	S		1B
Crotalus tigris	Tiger Rattlesnake					1B
Crotaphytus nebrius	Sonoran Collared Lizard					1B
Euderma maculatum	Spotted Bat	SC	S	S		1B
Eumops perotis californicus	Greater Western Bonneted Bat	SC		S		1B
Glaucidium brasilianum cactorum	Cactus Ferruginous Pygmy-owl	PT	S	S		1B
Gopherus morafkai	Sonoran Desert Tortoise	CCA	S	S		1A
Haliaeetus leucocephalus	Bald Eagle	SC, BGA	S	S		1A
Heloderma suspectum	Gila Monster					1A
Incilius alvarius	Sonoran Desert Toad					1B
Lasiurus blossevillii	Western Red Bat		S			1B
Lasiurus xanthinus	Western Yellow Bat		S			1B
Leptonycteris yerbabuenae	Lesser Long-nosed Bat	SC				1A
Lepus alleni	Antelope Jackrabbit					1B

Species of Greatest Conservation Need Predicted that Intersect with Project Footprint as Drawn, based on Predicted Range Models

Scientific Name	Common Name	FWS	USFS	BLM	NPL	SGCN
Macrotus californicus	California Leaf-nosed Bat	SC		S		1B
Melanerpes uropygialis	Gila Woodpecker					1B
Melospiza lincolnii	Lincoln's Sparrow					1B
Melozone aberti	Abert's Towhee		S			1B
Micrathene whitneyi	Elf Owl					1C
Micruroides euryxanthus	Sonoran Coralsnake					1B
Myiarchus tyrannulus	Brown-crested Flycatcher					1C
Myotis velifer	Cave Myotis	SC		S		1B
Myotis yumanensis	Yuma Myotis	SC				1B
Nyctinomops femorosaccus	Pocketed Free-tailed Bat					1B
Oreoscoptes montanus	Sage Thrasher					1C
Oreothlypis luciae	Lucy's Warbler					1C
Passerculus sandwichensis	Savannah Sparrow					1B
Perognathus longimembris	Little Pocket Mouse	No Status				1B
Phrynosoma goodei	Goode's Horned Lizard					1B
Phrynosoma solare	Regal Horned Lizard					1B
Progne subis hesperia	Desert Purple Martin			S		1B
Sphyrapicus nuchalis	Red-naped Sapsucker					1C
Spizella breweri	Brewer's Sparrow					1C
Sturnella magna	Eastern Meadowlark					1C
Tadarida brasiliensis	Brazilian Free-tailed Bat					1B
Toxostoma lecontei	LeConte's Thrasher			S		1B
Troglodytes pacificus	Pacific Wren					1B
Vireo bellii arizonae	Arizona Bell's Vireo					1B
Vulpes macrotis	Kit Fox	No Status				1B

Species of Economic and Recreation Importance Predicted that Intersect with Project Footprint as Drawn

Scientific Name	Common Name	FWS	USFS	BLM	NPL	SGCN
Callipepla gambelii	Gambel's Quail					
Pecari tajacu	Javelina					
Puma concolor	Mountain Lion					
Zenaida asiatica	White-winged Dove					
Zenaida macroura	Mourning Dove					

Project Type: Development Outside Municipalities (Rural Development), Residential subdivision and associated infrastructure, New construction

Project Type Recommendations:
Fence recommendations will be dependant upon the goals of the fence project and the wildlife species expected to be impacted by the project. General guidelines for ensuring wildlife-friendly fences include: barbless wire on the top and bottom with the maximum fence height 42", minimum height for bottom 16". Modifications to this design may be considered for fencing anticipated to be routinely encountered by elk, bighorn sheep or pronghorn (e.g., Pronghorn fencing would require 18" minimum height on the bottom). Please refer to the Department's Fencing Guidelines located on Wildlife Friendly Guidelines page, which is part of the WIldlife Planning button at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/.

During the planning stages of your project, please consider the local or regional needs of wildlife in regards to movement, connectivity, and access to habitat needs. Loss of this permeability prevents wildlife from accessing resources, finding mates, reduces gene flow, prevents wildlife from re-colonizing areas where local extirpations may have occurred, and ultimately prevents wildlife from contributing to ecosystem functions, such as pollination, seed dispersal, control of prey numbers, and resistance to invasive species. In many cases, streams and washes provide natural movement corridors for wildlife and should be maintained in their natural state. Uplands also support a large diversity of species, and should be contained within important wildlife movement corridors. In addition, maintaining biodiversity and ecosystem functions can be facilitated through improving designs of structures, fences, roadways, and culverts to promote passage for a variety of wildlife. Guidelines for many of these can be found at: https://www.azgfd.com/wildlife/planning/wildlifeguidelines/.

Consider impacts of outdoor lighting on wildlife and develop measures or alternatives that can be taken to increase human safety while minimizing potential impacts to wildlife. Conduct wildlife surveys to determine species within project area, and evaluate proposed activities based on species biology and natural history to determine if artificial lighting may disrupt behavior patterns or habitat use. Use only the minimum amount of light needed for safety. Narrow spectrum bulbs should be used as often as possible to lower the range of species affected by lighting. All lighting should be shielded, canted, or cut to ensure that light reaches only areas needing illumination.

Minimize the potential introduction or spread of exotic invasive species, including aquatic and terrestrial plants, animals, insects and pathogens. Precautions should be taken to wash and/or decontaminate all equipment utilized in the project activities before entering and leaving the site. See the Arizona Department of Agriculture website for a list of prohibited and restricted noxious weeds at https://www.invasivespeciesinfo.gov/unitedstates/az.shtml and the Arizona Native Plant Society https://aznps.com/invas for recommendations on how to control. To view a list of documented invasive species or to report invasive species in or near your project area visit iMapInvasives - a national cloud-based application for tracking and managing invasive species at https://imap.natureserve.org/imap/services/page/map.html.

- To build a list: zoom to your area of interest, use the identify/measure tool to draw a polygon around your area of interest, and select “See What’s Here” for a list of reported species. To export the list, you must have an account and be logged in. You can then use the export tool to draw a boundary and export the records in a csv file.

The construction or maintenance of water developments should include: incorporation of aspects of the natural environment and the visual resources, maintaining the water for a variety of species, water surface area (e.g., bats require a greater area due to in-flight drinking), accessibility, year-round availability, minimizing potential for water quality problems, frequency of flushing, shading of natural features, regular clean-up of debris, escape ramps, minimizing obstacles, and minimizing accumulation of silt and mud.

Minimization and mitigation of impacts to wildlife and fish species due to changes in water quality, quantity, chemistry, temperature, and alteration to flow regimes (timing, magnitude, duration, and frequency of floods) should be evaluated. Minimize impacts to springs, in-stream flow, and consider irrigation improvements to decrease water use. If dredging is a project component, consider timing of the project in order to minimize impacts to spawning fish and other aquatic species (include spawning seasons), and to reduce spread of exotic invasive species. We recommend early direct coordination with Project Evaluation Program for projects that could impact water resources, wetlands, streams, springs, and/or riparian habitats.

The Department recommends that wildlife surveys are conducted to determine if noise-sensitive species occur within the project area. Avoidance or minimization measures could include conducting project activities outside of breeding seasons.

Based on the project type entered, coordination with State Historic Preservation Office may be required (http://azstateparks.com/SHPO/index.html).

Trenches should be covered or back-filled as soon as possible. Incorporate escape ramps in ditches or fencing along the perimeter to deter small mammals and herptefauna (snakes, lizards, tortoise) from entering ditches.

Communities can actively support the sustainability and mobility of wildlife by incorporating wildlife planning into their regional/comprehensive plans, their regional transportation plans, and their open space/conservation land system programs. An effective approach to wildlife planning begins with the identification of the wildlife resources in need of protection, an assessment of important habitat blocks and connective corridors, and the incorporation of these critical wildlife components into the community plans and programs. Community planners should identify open spaces and habitat blocks that can be maintained in their area, and the necessary connections between those blocks to be preserved or protected. Community planners should also work with State and local transportation planning entities, and planners from other communities, to foster coordination and cooperation in developing compatible development plans to ensure wildlife habitat connectivity. The Department's guidelines for incorporating wildlife considerations into community planning and developments can be found on the Widlife Friendly Guidelines portion of the Wildlife Planning page at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/.

Design culverts to minimize impacts to channel geometry, or design channel geometry (low flow, overbank, floodplains) and substrates to carry expected discharge using local drainages of appropriate size as templates. Reduce/minimize barriers to allow movement of amphibians or fish (e.g., eliminate falls). Also for terrestrial wildlife, washes and stream corridors often provide important corridors for movement. Overall culvert width, height, and length should be optimized for movement of the greatest number and diversity of species expected to utilize the passage. Culvert designs should consider moisture, light, and noise, while providing clear views at both ends to maximize utilization. For many species, fencing is an important design feature that can be utilized with culverts to funnel wildlife into these areas and minimize the potential for roadway collisions. Guidelines for culvert designs to facilitate wildlife passage can be found on the home page of this application at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/.

Based on the project type entered, coordination with Arizona Department of Environmental Quality may be required (http://www.azdeq.gov/).

Based on the project type entered, coordination with Arizona Department of Water Resources may be required (https://new.azwater.gov/).

Based on the project type entered, coordination with U.S. Army Corps of Engineers may be required (http://www.usace.army.mil/)

Based on the project type entered, coordination with County Flood Control district(s) may be required.

Development plans should provide for open natural space for wildlife movement, while also minimizing the potential for wildlife-human interactions through design features. Please contact Project Evaluation Program for more information on living with urban wildlife at PEP@azgfd.gov or at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/ and https://www.azgfd.com/Wildlife/LivingWith.

Vegetation restoration projects (including treatments of invasive or exotic species) should have a completed site-evaluation plan (identifying environmental conditions necessary to re-establish native vegetation), a revegetation plan (species, density, method of establishment), a short and long-term monitoring plan, including adaptive management guidelines to address needs for replacement vegetation.

The Department requests further coordination to provide project/species specific recommendations, please contact Project Evaluation Program directly at PEP@azgfd.gov.

Project Location and/or Species Recommendations:
This review has identified **riparian areas** within the vicinity of your project. During the planning stage of your project, avoid, minimize, or mitigate any potential impacts to riparian areas identified in this report. Riparian areas play an important role in maintaining the functional integrity of the landscape, primarily by acting as natural drainages that convey water through an area, thereby reducing flood events. In addition, riparian areas provide important movement corridors and habitat for fish and wildlife. Riparian areas are channels that contain water year-round or at least part of the year. Riparian areas also include those channels which are dry most of the year, but may contain or convey water following rain events. All types of riparian areas offer vital habitats, resources, and movement corridors for wildlife. The Pinal County Comprehensive Plan (i.e. policies *6.1.2.1* and *7.1.2.4*), Open Space and Trails Master Plan, Drainage Ordinance, and Drainage Design Manual all identify riparian area considerations, guidance, and policies. Guidelines to avoid, minimize, or mitigate impacts to riparian habitat can be found at https://www.azgfd.com/wildlife/planning/wildlifeguidelines/. Based on the project type entered, further consultation with the Arizona Game and Fish Department and Pinal County may be warranted.

Tribal Lands are within the vicinity of your project area and may require further coordination. Please contact:
Ak-Chin Indian Community Council
42507 W Peters & Nail Rd
Maricopa, AZ 85239
(520) 568-2618
(520) 568-4566 (fax)

HDMS records indicate that **Western Burrowing Owls** have been documented within the vicinity of your project area. Please review the western burrowing owl resource page at: https://www.azgfd.com/wildlife/speciesofgreatestconservneed/burrowingowlmanagement/.

THE UNIVERSITY OF ARIZONA
ARIZONA STATE MUSEUM

Arizona State Museum
PO Box 210026
Tucson AZ 85721-0026
www.statemuseum.arizona.edu

Paula Wheeler
ABLA
310 E. Rio Salado Pkwy
Tempe, AZ 85281

February 20, 2023

RE: Sunset Canyon Project #92-010-22

Dear Paula,

The Arizona State Museum (ASM) has reviewed archaeological project and site records in support of the following project:

ABLA's Sunset Canyon project (ALBA Project No. 92-010-22; ASM Job No. 005426)

Correspondence indicates this project will involve the development of privately-owned land with the intent of building a residential subdivision. The project area is located at southwest corner of John Wayne Parkway (SR 347) and Val Vista Road in the city of Maricopa, Pinal County, and encompasses the parcel within Township 5 South, Range 3 East, Section 28-29.

I invite you to review the results of ASM's research, which are summarized below.

Search Results:

According to a search of the archaeological site records and reports held in ASM collections, 12 archaeological investigations were conducted within a one-mile radius of the project area between 1985 and 2019. Of these 12 archaeological investigations, 5 intersect a portion of the project area.

For the 5 archaeological investigations that intersect the project area, Table 1 summarizes their basic information and scope.

Additionally, one ASM archaeological site has been identified within a one-mile radius of the project area. No archaeological sites intersect the project area.

THE UNIVERSITY OF ARIZONA
ARIZONA STATE MUSEUM

Arizona State Museum
PO Box 210026
Tucson AZ 85721-0026
www.statemuseum.arizona.edu

ASM Reference Number (AZProj/Accession)	Report Citation	Year(s) Conducted	Scope of Project	Partial or Entire Coverage of Current Project Area
1985-0219	Green, 1986	1985	Transmission line installation	Partial Coverage
AP-2006-0084	Boloyan, 2005	2005	Survey for residential development	Partial Coverage
AP-2007-0692	Henderson et al., 2009	2006-2009	Transmission line installation	Partial Coverage
AP-2007-0818	Doschka, 2007	2007	Survey for proposed road improvements	Partial Coverage
AP-2011-0371	Garcia and Behrend, 2012	2011-2012	Transmission line installation	Partial Coverage

Table 1. ASM archaeological investigations that intersect the project area

Recommendations and Responsibilities:

1. Since a portion of the project area has not been subject to prior archaeological survey, ASM recommends—but does not require—that a qualified archaeological contractor be consulted before any ground-disturbing activity begins. A list of archaeological contractors is available on the ASM website at: https://statemuseum.arizona.edu/crm/document/aaa-qualified-consultants

2. Pursuant to Arizona Revised Statute §41-865, if any human remains or funerary objects are encountered during project work, all work must stop within the area of the remains and the ASM Repatriation Office must be contacted at 520-626-0320.

3. City, county, or municipal governments may have their own requirements. Therefore, ASM recommends that the relevant jurisdiction(s) be consulted.

If you have any questions about the results of this records search, please feel free to contact me at dophelps@arizona.edu or 520-621-4011.

Kind regards,



Danielle Phelps, Ph.D.
Research Specialist
Archaeological Records Office
Arizona State Museum
520-621-4011
dophelps@arizona.edu

Arizona State Museum
PO Box 210026
Tucson AZ 85721-0026
www.statemuseum.arizona.edu

References:

Boloyan, David S.
2005. *Archaeological Survey of Amarillo Creek Project: 320 Acres on the Southwest Corner of Papago and Green Roads, in Section 20, T5S, R3E, Pinal County, Arizona*. David S. Boloyan Archaeological Services, Tempe, Arizona.

Doschka, Jeremy.
2007. *Archaeological Survey for the State Route 347 and Teel Road Interim Access ADOT Encroachment Permit, Pinal County, Arizona*. Letter Report dated December 11, 2007. SWCA Environmental Consultants, Tucson, Arizona.

Garcia, Daniel and Matthew Behrend.
2012. *Supplemental Cultural Resource Survey of 41 Locations Along the Proposed Pinal West-Duke-Pinal Central Transmission Line. Pinal County, Arizona*. EcoPlan Survey Report No. 09-281005. EcoPlan Associates, Inc. Mesa, Arizona.

Green, Margerie
1986. *A Cultural Resource Survey of the Proposed Arizona Public Service Company Santa Rosa to Gila Bend 230 kV Transmission line*. ACS Cultural Resource Report 39, Tempe, Arizona.

Henderson, T. Kathleen, Michael W. Lindeman, and Tiffany C. Clark.
2009. *Cultural Resources Survey for the Pinal West to Dinosaur Extra-High Voltage Transmission Line, Pinal County, Arizona*. Project Report No. 08-109. Desert Archaeology, Inc., Tucson, Arizona.

1st Submittal: April 5, 2023
2nd Submittal: November 16, 2023
May 13, 2024

SUNSET CANYON

Pinal County, Arizona

MASTER DRAINAGE REPORT

Prepared for:
HAM SUNSET LLC
5050 N. 40th Street
Suite 380
Phoenix, Arizona 85015
Contact: Harry Zeitlin
602.648.5227

Prepared by:
Coe & Van Loo Consultants, Inc.
4550 N. 12th Street
Phoenix, AZ 85014
Contact: Ryan Weed, P.E.
602.264.6831



Job # 1.01.0376402

CVL CONSULTANTS

MASTER DRAINAGE REPORT

FOR

SUNSET CANYON

PINAL COUNTY, ARIZONA

May 13, 2024

Prepared for:

HAM SUNSET LLC

5050 N. 40TH Street Suite 380

Phoenix, AZ 85018

Contact: Harry Zeitlin

(602) 648-5227

Prepared by:

Coe & Van Loo LLC

4550 N. 12th Street

Phoenix, AZ 85014

Contact: Ryan Weed, P.E.

(602) 264-6831



CVL Job Number: 1.01.0376402

Master Drainage Report for Sunset Canyon

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Figure 3 FIRMette

Figure 4 Conceptual Master Plan

Appendices

Appendix A Offsite Hydrology Documentation

A.1 Vekol Tributary Wash Hydrology Update

Appendix B Offsite Hydraulic Documentation

B.1 Offsite Channel Sizing

B.2 Conceptual Drainage Map

Appendix C Onsite Hydrology Documentation

C.1 NOAA Atlas 14 Rainfall Data

C.2 Soils Data



1.0 INTRODUCTION

1.1 SCOPE

Coe & Van Loo Consultants, Inc. (CVL) has been contracted by HAM SUNSET LLC to provide engineering services in support of the proposed Sunset Canyon development (the site). The purpose of this report is to provide hydrologic and hydraulic analyses for the site. In addition, this report addresses offsite drainage, onsite drainage, and storm-water storage requirements.

This report is focused on providing design information, evaluation and analysis for statistical flood events up to and including the 100-year frequency flood. The scope of this assessment does not include, neither did CVL's client request that, evaluation of storm-water runoff resulting from events exceeding the 100-year storm. Hence, it should be noted that a storm event exceeding the 100-year frequency may cause or create the risk of greater flood impact than is addressed and presented in this study.

The procedures used herein are derived from, and performed with, currently accepted engineering methodologies and practices. Additionally, the criteria for this evaluation are designed to conform to currently applicable ordinances, regulations and policies as set forth by Pinal County.

1.2 REGULATORY JURISDICTION

The proposed development will be designed to meet Pinal County drainage requirements as stated in the Pinal County Drainage Manual Volume I: Design Criteria [1], Pinal County Drainage Manual Volume II Design Methodology and Procedures [2], Pinal County Drainage Ordinance No. 100798-DO [3], Pinal County Floodplain Ordinance [4], and the Pinal County Subdivision Infrastructure Design Manual [5].

2.0 LOCATION & SITE DESCRIPTION

The site consists of approximately 307 acres located in Pinal County, in Section 28, Township 5 South, Range 3 East of the Gila and Salt River Base and Meridian, Pinal County, Arizona. The site is comprised of Parcels 51048019D and 51048018A. The site is bordered on the north by Val Vista Road followed by agricultural land, on the east by State Route 347, on the south by agricultural land, and on the west by Green Road followed by agricultural land. Soils for the site consist of Mohall loam, Mohall clay loam, and Sasco silt loam. Soils information for the site is provided in **Appendix C.2**. The site currently consists of

agricultural land, and slopes generally to the northeast at approximately 0.4 percent. See **Figure 1** for an Area Location Map and **Figure 2** for Aerial Photo Map.

3.0 PROPOSED DEVELOPMENT

The proposed development consists of 13 mixed-use parcels including single-family residential, multi-family, school, build to rent, drainage easements and commercial. There are also several open spaces designated as parks, with infrastructure roads also being proposed within the conceptual master plan. See **Figure 4** for Conceptual Master Plan.

4.0 FLOOD ZONE INFORMATION

The Pinal County, Arizona and Incorporated Areas Flood Insurance Rate Map (FIRM), panel number 04021C1125E, Map Revised December 4, 2007 [6], indicates the site falls within Zone "X" (unshaded). See **Figure 3** for FIRMette Map of Sunset Canyon.

Zone "X" (unshaded) is defined by FEMA as:

> "Areas determined to be outside the 500-year flood and protected by levee from 100-year flood."

5.0 MANAGEMENT OF OFFSITE RUNOFF

5.1 OFFSITE HYDROLOGY

The offsite flows generally impacting the proposed site have been analyzed in the Vekol Wash Tributary Hydrology Update Report by Wood, Patel & Associates [7]. This hydrology update, including the assumptions, methods, and results of analysis, have been reviewed and accepted as a part of this report. Per the Vekol Wash Tributary, there are multiple offsite flows impacting the site for the 100-year, 24-hour storm. See Exhibit B within **Appendix A.1** for the HEC-1 output and corresponding schematic map. The peak flow, known as CP75, entering Channel 1 near the southeast boundary was found to be 6680 cfs. The peak flow entering Channel 2 is the combined flow of VT82 and VT83, which was calculated as 604 cfs. See **Appendix B.2** for the Conceptual Drainage Map that shows the proposed channels.

5.2 OFFSITE HYDRAULICS

The project will accommodate the existing flows generated from the south by safely routing the flows through the site via channels while maintaining historic inlet and outlet locations. The channels will be constructed along the perimeter of the site to convey the anticipated 100-year flows. See **Appendix B.1** for conceptual offsite channel sizing. The channel corridors and anticipated flow paths can be found in **Appendix B.2**. Further analysis of offsite flows, including detailed conveyance methods, will be provided in preliminary design.

6.0 MANAGEMENT OF ONSITE RUNOFF

6.1 ONSITE HYDROLOGY & HYDRAULICS

Onsite hydrology will be considered when lotting is determined at the time of preliminary design. It will conform to the standards outlined in Pinal County Drainage Manual Volume I and II [1] [2] for methodology and parameter selection. An All-weather access road will be provided per the Pinal County Drainage Ordinance [3].

The onsite drainage facilities will be designed based on Pinal County requirements. Drainage sub-basins will be delineated based on preliminary design information for the overall development. Rainfall data is based on NOAA Atlas 14 [8] precipitation and intensity values, with a 100-year, 2-hour point precipitation depth of 2.32 inches. Refer to **Appendix C.1** for NOAA 14 data.

6.2 RETENTION

Retention will be provided onsite to contain the 100-year, 2-hour storm as required by Pinal County [1]. The estimated 100-year, 2-hour storm precipitation value of 2.32 inches will be used for the site, per the NOAA 14 Precipitation Frequency Data Server [8]. Retention methods will be designed to drain within 36 hours by means of infiltration and/or drywells, as required by Pinal County [1].

7.0 SUMMARY AND CONCLUSIONS

1. The proposed development will be designed to meet Pinal County drainage requirements. Drainage requirements include the Pinal County Drainage Manual Volume I: Design Criteria [1], Pinal County Drainage Manual Volume II Design Methodology and Procedures [2], Pinal County Drainage Ordinance No. 100798-DO [3], Pinal County Floodplain Ordinance [4], and the Pinal County Subdivision Infrastructure Design Manual [5].
2. An all-weather access road to the site is provided, per the Pinal County Drainage Ordinance requirements.
3. Sunset Canyon is located within Pinal County at the Intersection of State Route 347 and Val Vista Road, Parcels 51048019D and 51048018A. Sunset Canyon consists of approximately 307 acres of agricultural land.
4. Sunset Canyon is conceptualized to contain single family homes, open spaces, commercial, multi-family, and build to rent uses.
5. According to FIRM Panel 04021C1125E, the site is located in Zone X.
6. Offsite flows of 6680 cfs from the south will currently continue to flow through the site (undeveloped condition). Should this development proceed to preliminary design, it shall be designed to not cause any adverse drainage impacts or increased drainage problems for adjacent properties (upstream or downstream).
7. Onsite hydrology is not determined at this time, as the proposed development is in the conceptual stage. Onsite retention requirements will follow Pinal County Standards.

8.0 REFERENCES

[1] Pinal County, "Drainage Manual Volume I, Design Criteria," Pinal County, Arizona, August 2004.

[2] Pinal County, "Drainage Manual Volume II: Design Methodology and Procedures," 2004.

[3] Pinal County, "Pinal County Drainage Ordinance No. 100798-DO," October 7, 1998.

[4] Pinal County, "Pinal County Floodplain Management Ordinance Number {Insert Number}," 2019.

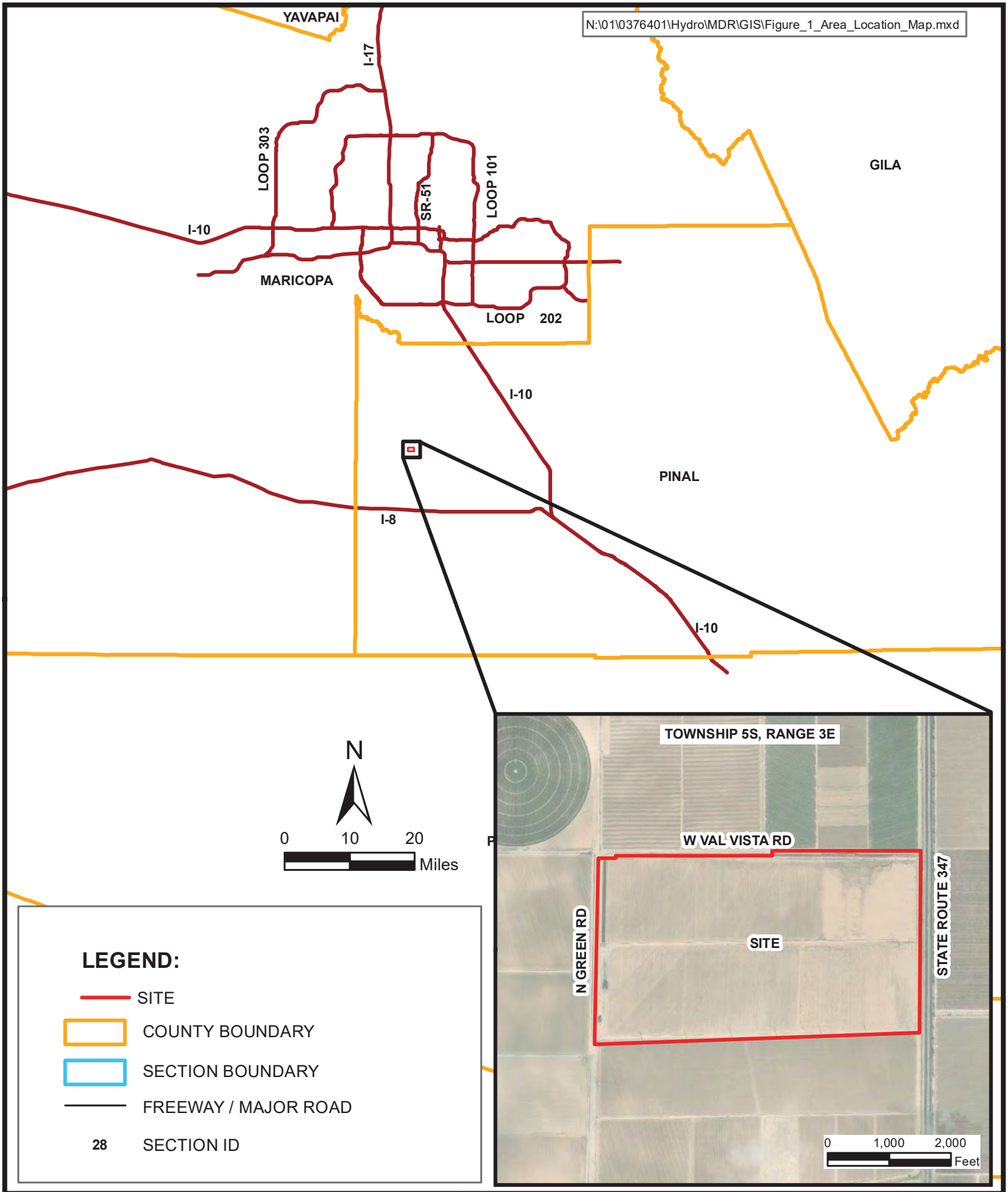
[5] Pinal County, "Pinal County Subdivision & Infrastructure Design Manual".

[6] Federal Emergency Management Agency (FEMA), "National Flood Insurance Program, Flood Insurance Rate Map, Pinal County, Arizona and Incorporated Areas, Panel Number 04021C1125E," Map Revised December 4, 2007.

[7] Wood, Patel & Associates, Inc., "Vekol Wash Tributary Hydrology Update Report," October 2011.

[8] National Oceanic and Atmospheric Administration, "Percipitation Frequency Data Server (PFDS) NOAA Atlas 14, Volume 1, Version 5," [Online]. Available: https://hdsc.nws.noaa.gov/hdsc/pfds/. [Accessed 26 January 2023].

FIGURES



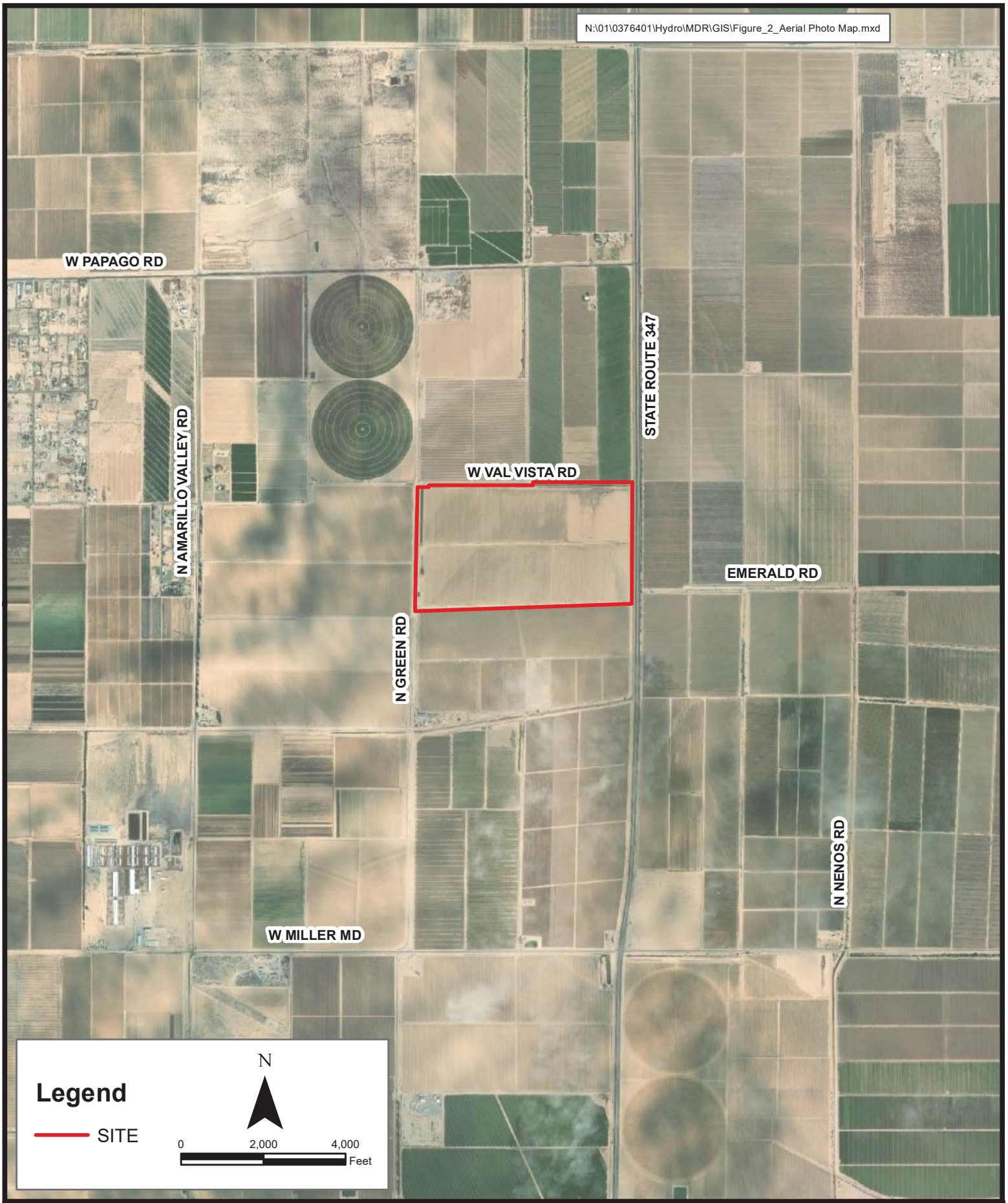
CVL CONSULTANTS
4550 NORTH 12TH STREET
PHOENIX, ARIZONA 85014
TELEPHONE (602) 264-6831

SUNSET CANYON

JOB NO.
01-0376402

AREA LOCATION MAP

FIGURE 1



CVL CONSULTANTS

4550 NORTH 12TH STREET
PHOENIX, ARIZONA 85014
TELEPHONE (602) 264-6831

SUNSET CANYON

JOB NO.
01-0376402

AERIAL PHOTO MAP

FIGURE 2

National Flood Hazard Layer FIRMette

FEMA

112°3'43"W 32°58'15"N



112°3'5"W 32°57'45"N

0 250 500 1,000 1,500 2,000 Feet 1:6,000

Basemap: USGS National Map: Orthoimagery: Data refreshed October, 2020

Legend

SEE FIS REPORT FOR DETAILED LEGEND AND INDEX MAP FOR FIRM PANEL LAYOUT

SPECIAL FLOOD HAZARD AREAS
- Without Base Flood Elevation (BFE) *Zone A, V, A99*
- With BFE or Depth *Zone AE, AO, AH, VE, AR*
- Regulatory Floodway

OTHER AREAS OF FLOOD HAZARD
- 0.2% Annual Chance Flood Hazard, Areas of 1% annual chance flood with average depth less than one foot or with drainage areas of less than one square mile *Zone X*
- Future Conditions 1% Annual Chance Flood Hazard *Zone X*
- Area with Reduced Flood Risk due to Levee. See Notes. *Zone X*
- Area with Flood Risk due to Levee *Zone D*

OTHER AREAS
- NO SCREEN Area of Minimal Flood Hazard *Zone X*
- Effective LOMRs
- Area of Undetermined Flood Hazard *Zone D*

GENERAL STRUCTURES
- Channel, Culvert, or Storm Sewer
- Levee, Dike, or Floodwall

OTHER FEATURES
- 20.2 / 17.5 Cross Sections with 1% Annual Chance / Water Surface Elevation
- Coastal Transect
- 513 Base Flood Elevation Line (BFE)
- Limit of Study
- Jurisdiction Boundary
- Coastal Transect Baseline
- Profile Baseline
- Hydrographic Feature

MAP PANELS
- Digital Data Available
- No Digital Data Available
- Unmapped

N

The pin displayed on the map is an approximate point selected by the user and does not represent an authoritative property location.

This map complies with FEMA's standards for the use of digital flood maps if it is not void as described below. The basemap shown complies with FEMA's basemap accuracy standards

The flood hazard information is derived directly from the authoritative NFHL web services provided by FEMA. This map was exported on 4/5/2023 at 11:47 AM and does not reflect changes or amendments subsequent to this date and time. The NFHL and effective information may change or become superseded by new data over time.

This map image is void if the one or more of the following map elements do not appear: basemap imagery, flood zone labels, legend, scale bar, map creation date, community identifiers, FIRM panel number, and FIRM effective date. Map images for unmapped and unmodernized areas cannot be used for regulatory purposes.

Call at least two full working days before you begin excavation. ARIZONA 811 Arizona Blue Stake, Inc. Dial 8-1-1 or 1-800-STAKE-IT (782-5348) In Maricopa County: (602) 263-1100

CVL CONSULTANTS
4550 North 12th Street
Phoenix, Arizona 85014
602-264-6831
www.cvlci.com

NO.	REVISION	DATE

Coe & Van Loo Consultants, Inc.

FEMA FRIMETTE
FIGURE 3

SUNSET CANYON
PINAL COUNTY, ARIZONA

SHEET
OF

CVL Contact: RYAN WEED
CVL Project #: 01-0376402

© 2022 Coe & Van Loo Consultants, Inc. All rights reserved to reproduction in any format

Printed By: **Ramon** Print Date: **April 5, 2023** Filename: N:\01037640\Hydro\MDRCAD\DHS FIGURE3 FIRMETTE.dwg

SITE DATA			
GROSS ACREAGE	374.02 AC.	4.10 D.U./AC.	
NET ACREAGE	354.00 AC.		
DRAINAGE CHANNEL [1]	37.41 AC.		
DEDICATED OPEN SPACE	12.83 AC.		
TRAIL AREAS	11.97 AC.		
POCKET PARKS	10.88 AC.		
NEIGHBORHOOD PARK	3.56 AC.		
TOTAL OPEN SPACE	76.65 AC.	20.49%	

DESCRIPTION	ACREAGE	USE	UNITS	UNIT PERCENTAGE
PARCEL 1.1	25.27 AC.	50'x120'	140 D.U.	9.14%
PARCEL 1.2	26.11 AC.	45'x120'	176 D.U.	11.49%
PARCEL 1.3	28.28 AC.	55'x120'	133 D.U.	8.68%
PARCEL 1.4	33.41 AC.	50'x120'	166 D.U.	10.84%
PARCEL 1.5	29.31 AC.	40'x115'	182 D.U.	11.88%
PARCEL 1.6	14.07 AC.	ES		
PARCEL 1.7	24.45 AC.	45'x120'	157 D.U.	10.25%
PARCEL 1.8	21.91 AC.	45'x120'	117 D.U.	7.64%
PARCEL 1.9	24.08 AC.	50'x120'	116 D.U.	7.57%
PARCEL 1.10	21.25 AC.	55'x120'	122 D.U.	7.96%
PARCEL 1.11	32.95 AC.	40'x115'	223 D.U.	14.56%
ELEMENTARY SCHOOL	14.07 AC.	ES		
40'X115'	62.26 AC.	40'x115'	405 D.U.	26.44%
45'X120'	72.47 AC.	45'x120'	450 D.U.	29.37%
50'X120'	82.76 AC.	50'x120'	422 D.U.	27.55%
55'X120'	49.53 AC.	55'x120'	255 D.U.	16.64%
SUNSET CANYON TOTAL	281.09 AC.		1,532 D.U.	

1. DRAINAGE CHANNEL TO BE INCLUDE IN DEDICATED OPEN SPACE ON "CONCEPTUAL OPEN SPACE EXHIBIT" TABLE.

LEGEND

MAJOR ENTRY MONUMENT

ZEITLIN CAPITAL

SUNSET CANYON

Conceptual Site Plan

Plan Scale1 : 2 0 0 Date: 05-14-2024

200' 400' 600'

ABLASTUDIO.COM

ABLA

APPENDICES

CVL

APPENDIX A

Offsite Hydrology Documentation

CVL

A.1

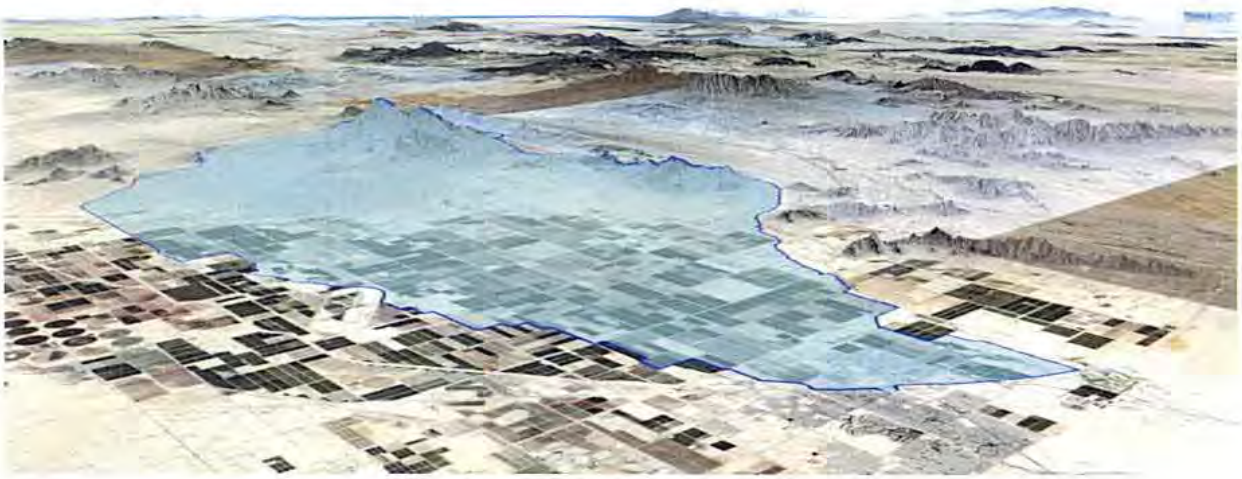
Vekol Wash Tributary Hydrology Update Report

CVL

VEKOL WASH TRIBUTARY
HYDROLOGY UPDATE REPORT

October 2011

WP #113690



Prepared for: **City of Maricopa**
45145 West Madison Avenue
Maricopa, Arizona 85139
Phone: (520) 316-6944
Fax: (520) 568-9120

Prepared by: **Wood, Patel & Associates, Inc.**
2051 West Northern Avenue
Suite 100
Phoenix, Arizona 85021
Phone: (602) 335-8500
Fax: (602) 335-8580
Website: www.woodpatel.com

In Association With: **ABACUS Project Management, Inc.**
3030 N. Central Avenue
Suite 1207
Phoenix, AZ 85012
Phone: (602) 265-6870
Fax: (602) 265-9360



EXPIRES: 9/30/12

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EXPIRES: 9/30/12

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Appendix B	USGS Gaged Data near Laveen
Appendix C	Supporting Data for Storage Routing Revisions
Appendix D	Supporting Data for Flow Diversion Revisions
Appendix E	Revised HEC-1 Models
Appendix F	Supporting Data for Verification of Results

EXHIBITS

Exhibit A	Existing Drainage Map
Exhibit B	Revised Drainage Map
Exhibit C	CD Containing Electronic Files for Hydrology Study Update

W:\2011Projects\113690_Vekol Wash\Project Support\Reports\Drainage\113690 Vekol Wash Tributary Hydrology Update Report_Oct 2011 jujm 10-7-11.docx



EXPIRES: 9/30/12

1.0 INTRODUTION

1.1 Purpose of the Hydrologic Study Update

The hydrologic analysis including HEC-1 modeling for the Vekol Wash Tributary watershed was completed by HDR as part of the City of Maricopa Master Drainage Study and Plan in August 2009. This HEC-1 model is referenced as the *existing* model in this study.

Subsequent to the Master Drainage Study, FEMA contracted with BakerAECOM to conduct flood delineation studies within the City of Maricopa including the Vekol Wash Tributary (April 2010) and completed an independent review of the existing hydrology. FEMA's Consultant concluded that the existing hydrologic analysis was appropriate for use in the floodplain study. No further hydrologic analyses were conducted for the Vekol Wash Tributary watershed.

The preliminary floodplain delineations prepared by BakerAECOM within the City of Maricopa illustrate 100-year base flows that appear extreme when compared with the October 1983 flood of record. The watersheds contributing runoff to the Santa Cruz River, including the Santa Cruz Wash, Santa Rosa Wash, Vekol Wash, and the Vekol Wash Tributary were subject to a record storm estimated to be a 0.33 percent-chance (approximately 300-year) event. No floodplains of the magnitude delineated by the BakerAECOM study were documented for the Vekol Wash Tributary as a result of this record flood event.

The City of Maricopa contracted with ABACUS Project Management, Inc. (ABACUS) and with Wood, Patel & Associates, Inc. (Wood/Patel) as a sub-consultant (June 2011) to revise the hydrologic analyses and review the proposed floodplains for the Vekol Wash Tributary. Wood/Patel employees and staff from the City of Maricopa and Pinal County conducted multiple field visits of the Vekol Wash Tributary watershed to evaluate major drainage features that have significant impacts on the hydrology including storage basins, major washes, bridges, culverts, channels, canals, highways, overchutes (bridge structure conveying water over the canal), and siphons.

100-year 6-hour storm event not analyzed

The primary objectives of this hydrologic study update are to document the major findings of the field visits, revise the existing hydrologic (HEC-1) model, document the revised modeling results, and perform a sensitivity analysis for the 100-year, 24-hour storm event in order to determine a more reasonable base flow for the floodplain delineation. As a result of this study, four new HEC-1 models were developed, a recommended updated model and three sensitivity analysis models.

The Vekol Wash Tributary Hydrology Update Report is formatted in accordance with the Arizona Department of Water Resources (ADWR) State Standard 1-97 and State Standard Attachment 1-97. Note that this technical documentation standard results in some duplication of information within the report.

1.2 Methodology and Software

The existing HEC-1 model developed by HDR as part of the City of Maricopa Master Drainage Study and Plan for the Vekol Wash Tributary watershed follows the Pinal County Drainage Manual, Volume 2: Design Methodology and Procedures, Chapter 2: Hydrology. NOAA Atlas 14 precipitation estimates and Green and Ampt equation were used to estimate average rainfall depth and losses. S-graph methods were applied to generate hydrographs. The hydrologic model was developed using the U.S. Army Corps of Engineers computer program HEC-1, Version 4.1, Flood Hydrograph Package.

The sub-basin delineations and data developed for the existing HEC-1 model were not revised as part of this update. The major revisions to the existing model are the additions of some major storage routing and flow splits that changed the flow patterns in addition to a few minor changes of the channel routing data. The detailed information for the existing hydrologic model including land uses, soil data, drainage sub-basin delineations, and sub-basin parameters were documented in the *Technical Memorandum, City of Maricopa Master Drainage Study and Plan, Vekol Wash Tributary Hydrology,* which is included for reference in Appendix A. The existing HEC-1 model input and output files are also included for reference in Appendix A.

APPENDIX E

Revised HEC-1 Models

(HEC-1 Models are included on CD in Exhibit C)

```
1****************************************                 ****************************************
*                                      *                 *                                      *
*   FLOOD HYDROGRAPH PACKAGE  (HEC-1)  *                 *    U.S. ARMY CORPS OF ENGINEERS      *
*              JUN   1998              *                 *    HYDROLOGIC ENGINEERING CENTER     *
*            VERSION 4.1               *                 *         609 SECOND STREET            *
*                                      *                 *       DAVIS, CALIFORNIA 95616        *
*  RUN DATE   11OCT11  TIME  18:00:41  *                 *           (916) 756-1104             *
*                                      *                 *                                      *
****************************************                 ****************************************

                                X     X  XXXXXXX   XXXXX          X
                                X     X  X        X     X        XX
                                X     X  X        X              X
                                XXXXXXX  XXXX     X        XXXXX  X
                                X     X  X        X              X
                                X     X  X        X     X        X
                                X     X  XXXXXXX   XXXXX        XXX

          THIS PROGRAM REPLACES ALL PREVIOUS VERSIONS OF HEC-1 KNOWN AS HEC1 (JAN 73), HEC1GS, HEC1DB, AND HEC1KW.

          THE DEFINITIONS OF VARIABLES -RTIMP- AND -RTIOR- HAVE CHANGED FROM THOSE USED WITH THE 1973-STYLE INPUT STRUCTURE.
          THE DEFINITION OF -AMSKK- ON RM-CARD WAS CHANGED WITH REVISIONS DATED 28 SEP 81. THIS IS THE FORTRAN77 VERSION
          NEW OPTIONS: DAMBREAK OUTFLOW SUBMERGENCE , SINGLE EVENT DAMAGE CALCULATION, DSS:WRITE STAGE FREQUENCY,
          DSS:READ TIME SERIES AT DESIRED CALCULATION INTERVAL   LOSS RATE:GREEN AND AMPT INFILTRATION
          KINEMATIC WAVE: NEW FINITE DIFFERENCE ALGORITHM

1                                                  HEC-1 INPUT                                                  PAGE  1

          LINE          ID.......1.......2.......3.......4.......5.......6.......7.......8.......9......10

            1           ID        Vekol Wash Tributary Hydrology - City of Maricopa
            2           ID        100 YEAR
            3           ID        24 Hour Storm
            4           ID        Unit Hydrograph: S-Graph
            5           ID        ************************************************************************
            6           ID        Vekol Wash Tributary Hydrology Refinement Study, Wood/Patel, Oct. 2011
            7           ID        Model Name VW-REV01.Dat, the base model (recommended)
            8           ID        WPA revised/added some of the storage basins and flow splits
            9           ID        The original HEC-1 model is for the City of Maricopa Master Drainage
           10           ID        Study and Plan by HDR, August 2009
           11           ID
           12           ID        ************************************************************************
           13           ID        HDR
           14           ID        08/25/2009
           15           IT       5       0       0    2000
           16           IN      15
           17           IO       3
                        *DIAGRAM
                        *
           18           JD   3.810  0.0001
           19           PC   0.000   0.002   0.005   0.008   0.011   0.014   0.017   0.020   0.023   0.026
           20           PC   0.029   0.032   0.035   0.038   0.041   0.044   0.048   0.052   0.056   0.060
           21           PC   0.064   0.068   0.072   0.076   0.080   0.085   0.090   0.095   0.100   0.105
           22           PC   0.110   0.115   0.120   0.126   0.133   0.140   0.147   0.155   0.163   0.172
           23           PC   0.181   0.191   0.203   0.218   0.236   0.257   0.283   0.387   0.663   0.707
           24           PC   0.735   0.758   0.776   0.791   0.804   0.815   0.825   0.834   0.842   0.849
           25           PC   0.856   0.863   0.869   0.875   0.881   0.887   0.893   0.898   0.903   0.908
           26           PC   0.913   0.918   0.922   0.926   0.930   0.934   0.938   0.942   0.946   0.950
           27           PC   0.953   0.956   0.959   0.962   0.965   0.968   0.971   0.974   0.977   0.980
           28           PC   0.983   0.986   0.989   0.992   0.995   0.998   1.000
           29           JD   3.620    10.0
           30           JD   3.429    30.0
           31           JD   3.315    60.0
           32           JD   3.246    90.0
           33           JD   3.204   120.0
           34           JD   3.170   150.0
           35           JD   3.071   300.0
                        *

           36           KK    VT01   BASIN
           37           KM
           38           BA   3.006
           39           LG    0.10    0.25    4.10    0.72       8
           40           UI       0     125     127     125     193     367     487     605     755     819
           41           UI     898     978    1068    1268    1532    1260     935     848     762     729
           42           UI     694     639     608     575     522     497     464     417     378     337
           43           UI     311     300     292     272     263     216     206     177     161     160
           44           UI     144     139     138     123      97      96      96      97      78      61
                        *
1                                                  HEC-1 INPUT                                                  PAGE  2

          LINE          ID.......1.......2.......3.......4.......5.......6.......7.......8.......9......10


           45           KK  RT0102   ROUTE
           46           KM        Cross-section: Natural wash in mountainous area based on aerial
           47           KM        and USGS / N Value: nat desert wash w/ veg (raised to slow velocity)
           48           RS       7    FLOW
           49           RC   0.040   0.040   0.040   29363  0.0218    0.00
           50           RX  100.00  120.00  140.00  156.00  176.00  192.00  212.00  232.00
           51           RY  1451.5 1451.25 1451.00 1447.00 1447.10 1451.00 1451.25 1451.50
                        *

           52           KK    VT02   BASIN
           53           KM
           54           KM
           55           BA   4.007
           56           LG    0.10    0.25    3.81    0.44       8
           57           UI       0     125     127     125     193     367     487     605     755     819
           58           UI     898     978    1068    1268    1532    1260     935     848     762     729
           59           UI     694     639     608     575     522     497     464     417     378     337
           60           UI     311     300     292     272     263     216     206     177     161     160
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+	HYDROGRAPH AT	VT25	1606.	12.58	289.	78.	26.	3.50
+	ROUTED TO	RT2543	1469.	12.75	289.	78.	26.	3.50
+	HYDROGRAPH AT	VT43	1371.	12.58	235.	63.	21.	1.56
+	3 COMBINED AT	CP43	4926.	12.75	1084.	293.	98.	8.46
+	HYDROGRAPH AT	VT23	1769.	12.75	406.	117.	39.	3.14
+	ROUTED TO	RT2341	1432.	13.42	406.	116.	39.	3.14
+	HYDROGRAPH AT	VT41	1307.	12.75	263.	69.	23.	1.22
+	3 COMBINED AT	CP41	7090.	12.83	1708.	466.	156.	12.86
+	ROUTED TO	SR41	4994.	13.25	1707.	466.	156.	12.86
+	ROUTED TO	RT4162	4893.	13.92	1705.	466.	156.	12.86
+	HYDROGRAPH AT	VT40	1384.	12.75	284.	75.	25.	1.86
+	ROUTED TO	SR40	810.	13.17	274.	74.	25.	1.86
+	ROUTED TO	RT4062	691.	14.50	266.	74.	25.	1.86
+	HYDROGRAPH AT	VT62	713.	13.00	195.	49.	16.	2.12
+	3 COMBINED AT	CP62	5270.	14.00	2072.	572.	192.	16.80
+	ROUTED TO	R6264A	5251.	14.17	2072.	572.	192.	16.80
+	ROUTED TO	SR64A	5250.	14.17	2030.	560.	192.	16.80
+	ROUTED TO	SR64B	5247.	14.17	1951.	545.	192.	16.80
+	ROUTED TO	SR64C	5359.	14.42	1514.	450.	176.	16.80
+	ROUTED TO	R6264B	4941.	14.67	1511.	450.	176.	16.80
+	HYDROGRAPH AT	VT64	292.	13.08	80.	20.	7.	1.13
+	2 COMBINED AT	CP64	4954.	14.67	1510.	461.	180.	17.93
+	ROUTED TO	RT6474	4406.	15.42	1503.	459.	180.	17.93
+	HYDROGRAPH AT	VT45	318.	13.00	83.	21.	7.	1.38
+	ROUTED TO	RT4565	290.	13.83	82.	21.	7.	1.38
+	HYDROGRAPH AT	VT65	291.	13.17	88.	22.	7.	1.60
+	2 COMBINED AT	CP65	531.	13.67	168.	42.	14.	2.98
+	ROUTED TO	RT6574	470.	14.67	165.	42.	14.	2.98
+	HYDROGRAPH AT	VT74	293.	13.08	80.	20.	7.	1.03
+	4 COMBINED AT	CP74	6860.	15.58	2978.	912.	331.	45.47
+	ROUTED TO	RT7475	6450.	16.17	2976.	912.	331.	45.47
+	HYDROGRAPH AT	VT75	361.	13.08	112.	29.	10.	1.11
+	3 COMBINED AT	CP75	6680.	16.17	3298.	1004.	362.	53.71
+	ROUTED TO	RT7583	6201.	16.92	3296.	1004.	362.	53.71
+	HYDROGRAPH AT	VT83	260.	13.25	80.	20.	7.	1.10
+	2 COMBINED AT	CP83	6190.	16.92	3331.	1018.	367.	54.81
+	ROUTED TO	RT8386	5901.	17.67	3325.	1017.	367.	54.81

Peak Flow entering site highlighted in yellow

+	HYDROGRAPH AT	VT82	344.	13.08	100.	25.	8.	1.09
+	ROUTED TO	RT8286	307.	14.42	98.	25.	8.	1.09
+	HYDROGRAPH AT	VT86	251.	13.25	75.	19.	6.	1.02
+	3 COMBINED AT	CP86	5898.	17.67	3419.	1048.	378.	56.92
+	ROUTED TO	RT8690	5672.	18.42	3376.	1048.	378.	56.92
+	HYDROGRAPH AT	VT90	199.	12.83	47.	12.	4.	.51
+	2 COMBINED AT	CP90	5666.	18.42	3378.	1056.	380.	57.43
+	ROUTED TO	RT9091	5332.	19.92	3266.	1055.	380.	57.43
+	HYDROGRAPH AT	VT85	352.	13.08	100.	25.	8.	1.02
+	ROUTED TO	RT8588	323.	13.92	99.	25.	8.	1.02
+	HYDROGRAPH AT	VT80	511.	13.08	157.	40.	13.	1.79
+	ROUTED TO	RT8084	464.	14.50	155.	40.	13.	1.79
+	HYDROGRAPH AT	VT81	387.	12.92	98.	24.	8.	1.07
+	ROUTED TO	RT8184	347.	13.92	97.	24.	8.	1.07
+	HYDROGRAPH AT	VT84	1151.	13.00	218.	57.	19.	2.11
+	3 COMBINED AT	CP84	1145.	13.00	456.	120.	40.	4.97
+	ROUTED TO	RT8488	931.	13.67	449.	119.	40.	4.97
+	HYDROGRAPH AT	VT87	576.	13.00	153.	39.	13.	1.63
+	ROUTED TO	RT8788	538.	13.58	152.	39.	13.	1.63
+	HYDROGRAPH AT	VT88	268.	13.17	73.	18.	6.	1.04
+	4 COMBINED AT	CP88	1921.	13.67	758.	200.	67.	8.66
+	ROUTED TO	RT8889	1854.	14.00	757.	200.	67.	8.66
+	HYDROGRAPH AT	VT89	146.	12.92	37.	9.	3.	.51
+	2 COMBINED AT	CP89	1904.	14.00	787.	209.	70.	9.17
+	ROUTED TO	RT8991	1870.	14.17	783.	209.	70.	9.17
+	HYDROGRAPH AT	VT91	139.	13.25	47.	12.	4.	.52
+	4 COMBINED AT	CP91	7832.	20.25	5458.	3074.	1089.	181.37
+	DIVERSION TO	D91N	4575.	20.25	2254.	684.	228.	181.37
+	HYDROGRAPH AT	D91W	3257.	20.25	3205.	2390.	861.	181.37
+	ROUTED TO	RT9291	3256.	20.92	3205.	2390.	861.	181.37
+	ROUTED TO	RT9194	3256.	21.08	3205.	2389.	861.	181.37
+	HYDROGRAPH AT	VT94	744.	13.92	329.	84.	28.	5.51
+	2 COMBINED AT	CP94	3494.	15.17	3237.	2433.	881.	186.88
+	ROUTED TO	RT9495	3237.	25.58	3207.	2432.	881.	186.88
+	ROUTED TO	RT9599	3235.	26.58	3207.	2415.	880.	186.88
+	HYDROGRAPH AT	VT99	620.	13.08	184.	48.	16.	2.23
	2 COMBINED AT							

VT82 included for informational purposes

EXHIBIT B

Revised Drainage Map