A Class III Cultural Resource Survey for the Permian Basin MOA Area, Chaves and Eddy Counties, New Mexico (NMCRIS Activity No. 116929)

Author(s) / Editor(s): Beth McCormack, Douglas H. M. Boggess, Peggy Allison, Peggy Cordua, Brian Deaton, Victoria Menchaca, Tomasz Wasowski, Andrew Zink
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Notification of Confidential Content Deleted

Information has been deleted from this digital copy of this document because it was judged to be confidential information, the general release of which might result in harm to the archaeological resources described.

> [Section 9 of the Archaeological Resources Protection Act [16 USC 470aa-mm] prohibits the general public release of "…information concerning the nature and location of any archaeological resource for which the excavation or removal requires a permit or other permission under this Act or under any other provision of Federal law…" unless the release of this information will:
>
> (1) further the purposes of this Act or the Act of June 27, 1960 [the Reservoir Salvage Act, as amended, 16 U.S.C. 469-469c-1] and
>
> (2) not create a risk of harm to such resources or to the site at which such resources are located."]

Text or figures on the following pages of the original document have been redacted as follows:

[X] Text or figures have been blacked out on the following pages: 1

[X] The following pages have been removed in their entirety: Appendix A 13-23

Please contact the **Bureau of Land Management, Carlsbad Field Office Archaeologist** for inquiries related to confidential information contained in this document.

NMCRIS INVESTIGATION ABSTRACT FORM (NIAF)

1. NMCRIS Activity No.:	2a. Lead (Sponsoring) Agency:	2b. Other Permitting Agency(ies):	3. Lead Agency Report No.:
116929	Bureau of Land Management – Carlsbad Field Office		

4. Title of Report: A Class III Cultural Resource Survey for the Permian Basin MOA Area, Chaves and Eddy Counties, New Mexico

Author(s) Beth McCormack, Douglas H.M. Boggess, Peggy Allison, Teresa Cordua, Brian Deaton, Vicki Menchaca, Tomasz Wasowski, Andrew Zink

5. Type of Report
☐ **Negative** ☒ **Positive**

6. Investigation Type
☐ Research Design ☒ Survey/Inventory ☐ Test Excavation ☐ Excavation ☐ Collections/Non-Field Study
☐ Overview/Lit Review ☐ Monitoring ☐ Ethnographic study ☐ Site specific visit ☐ Other

7. Description of Undertaking (what does the project entail?): The task of this project is to inventory and characterize the archaeological landscape in portions of the Permian Basin MOA area that are under-represented by previous archaeological inventory. The project area comprises five parcels of BLM-managed land encompassing 3,358.91 acres (1,359.31 ha).

8. Dates of Investigation: (from: November 2, 2009 to: April 14, 2010)

9. Report Date: April 15, 2010

10. Performing Agency/Consultant:
Lone Mountain Archaeological Services, Inc.
Principal Investigator: Douglas H.M. Boggess
Field Supervisor: Thoras R. Dye, Randolph Davis, Andrew Zink, Zachary Shultheis
Field Personnel Names: Noel Pacheco, Francisco Britton, Victoria Menchaca, Judah Braunstein, Tomasz Wasowski

11. Performing Agency/Consultant Report No.: 908-01

12. Applicable Cultural Resource Permit No(s):
BLM Permit No. 122-2920-09-EEE

13. Client/Customer (project proponent): Bureau of Land Management – Carlsbad Field Office
Contact: George MacDonell
Address: 620 E Greene Street,
Carlsbad, NM 88220
Phone: (575**)** 234-5972

14. Client/Customer Project No.:

15. Land Ownership Status ***(Must be indicated on project map):***

Land Owner	Acres Surveyed	Acres in APE
Bureau of Land Management	3358.91	3358.91
TOTALS	3358.91	3358.91

16 Records Search(es):

Date(s) of ARMS File Review July 17, 2009	**Name of Reviewer(s)** Saundra D. Daras	
Date(s) of NR/SR File Review July 17, 2009	**Name of Reviewer(s)** Saundra D. Daras	
Date(s) of Other Agency File Review November 2, 2009	**Name of Reviewer(s)** Thoras R. Dye	**Agency** Bureau of Land Management, Carlsbad Field Office

17. Survey Data:

a. Source Graphics ☒ NAD 27 ☐ NAD 83

☒ USGS 7.5' (1:24,000) topo map ☐ Other topo map, Scale:

☒ GPS Unit Accuracy ☐ <1.0m ☒ 1-10m ☐ 10-100m ☐ >100m

b. USGS 7.5' Topographic Map Name **USGS Quad Code**

[redacted]	[redacted]
[redacted]	[redacted]
[redacted]	[redacted]
[redacted]	[redacted]
[redacted]	[redacted]
[redacted]	[redacted]

c. County(ies): [redacted]

17. Survey Data (continued):

d. Nearest City or Town: [redacted]

e. Legal Description:

[redacted]

Projected legal description? Yes [ ] , No [x] **Unplatted [ ]**

f. Other Description (e.g. well pad footages, mile markers, plats, land grant name, etc.):

18. Survey Field Methods:

Intensity: ☒ 100% coverage ☐ <100% coverage

Configuration: ☒ block survey units ☐ linear survey units ☐ other survey units (specify):

Scope: ☒ non-selective (all sites recorded) ☐ selective/thematic (selected sites recorded)

Coverage Method: ☒ systematic pedestrian coverage ☐ other method (describe)

Survey Interval (m): 15 **Crew Size:** 2 to 4 **Fieldwork Dates:** November 2, 2009 to March 23, 2010

Survey Person Hours: 1993 **Recording Person Hours:** 498 **Total Hours:** 2491

Additional Narrative:

19. Environmental Setting (NRCS soil designation; vegetative community; elevation; etc.): According to the Soil Survey of [redacted], soils in the area are likely to derive from a number of different associations. The parcels are located on various geological formations (http://websoilsurvey.nrcs.usda.gov).

Parcel 1 is located on Holocene to Middle-Pleistocene eolian deposits. Elevation ranges from 4,091 ft to 4,237 ft. Predicted soils are Kermit-Berino fine sands, 0 to 3 percent slopes. These are fine mixed alluvial and eolian sands underlain by fine sandy loam and loamy sand.

The geology of Parcel 2 is dominated by Holocene to Middle Pleistocene eolian and Piedmont deposits. These are characterized by interlayed eolian sands and piedmont slope deposits along the [redacted], capped by thin eolian deposits. Elevation ranges from 4,092 ft to 4,153 ft. From north to south, Predicted soils in Parcel 2 are Faskin-Roswell, Ima, Roswell-Jalmar, Kermit-Berino (described above), Likes, Tonuco, and Largo associations. Faskin-Roswell complex soils are mixed alluvial and eolian fine sandy clay loam derived from sedimentary rock. Ima fine sandy loam soils are mixed alluvial and eolian fine sandy loam derived from sedimentary rock. Roswell-Jalmar complex soils are mixed alluvial and eolian fine sand derived from sedimentary rock. Likes loamy fine sand, 1 to 5 percent slopes soils, in the eastern section of the parcel, are calcareous alluvial or colluvial loamy fine sand. Tonuco loamy fine sand, 0 to 3 percent slopes, eroded soils, in the southwestern portion of the parcel, are mixed alluvial and eolian loamy fine sand. Largo loam, 1 to 5 percent slopes soils, in the southeastern portion of the parcel, are calcareous alluvial loam, underlain by silty loam.

Parcel 3 is on the lower Pleistocene to Middle Miocene Ogallala formation. The Ogallala is characterized by alluvial and eolian deposits and petrocalcic soils. Elevation ranges from 3,990 ft to 4,080 ft. Predicted soils include Berino, Kermit-Berino, Largo (described above), Tonuco (described above), and Mobeetie complexes. Berino complex, 0 to 3 percent slopes, eroded soils are mixed alluvial and eolian fine sands underlain by sandy clay loam and loamy sand. Mobeetie fine sandy loam, 1 to 5 percent slopes soils are deep, mixed alluvial and eolian fine sandy loam.

Parcel 4 is located on Holocene to Upper Pleistocene alluvial deposits, with some older Middle to Lower Pleistocene alluvial deposits in the eastern and southern sections. Elevation ranges from 2,911 ft. to 3,102 ft. The [redacted] is the primary drainage in this area, cutting through the center of this parcel. Predicted soils include Pajarito-Dune, Simona-Bippus, Upton, Dev-Pima, Kermit-Berino (described above), Potter-Simona, and Simona complexes. Pajarito-Dune land complex, 0 to 3 percent slopes is composed of fine, deep, mixed alluvial and eolian sandy loam. Simona-Bippus complex, 0 to 5 percent slopes soils are fine, mixed alluvial and eolian gravelly sandy loam and silty clay loam. Upton gravelly loam, 0 to 9 percent slopes soils are residual gravelly loam derived from limestone. Dev-Pima complex, 0 to 3 percent slopes soils are alluvial gravelly loam and alluvial silty clay loam. Potter-Simona complex, 5 to 25 percent slopes soils are mixed alluvial and eolian gravelly loam and gravelly fine sandy loam. Simona sandy loam, 0 to 3 percent slopes soils are fine, mixed alluvial and eolian sandy loam.

The geology of Parcel 5 is dominated by Upper Permian Quartermaster formation, characterized by red siltstone and sandstone. Portions of the parcel are also located on Holocene to Upper Pleistocene alluvial deposits. Elevation ranges from 2,850 ft to 2,904 ft . The [redacted] bisects this parcel from north to south. Predicted soils in this parcel include Dev-Pima (described above), Pajarito-Dune (described above), Upton (described above), Upton-Simona, and Russler-Ector complexes. Upton-Simona Complex, 1 to 15 percent slopes, eroded soils are residual gravelly loams. Russler-Ector association, 0 to 9 percent slopes soils are alluvial and residual loam, clay loam, and very cobbly loams.

20. a. Percent Ground Visibility: 50 to 100 percent **b. Condition of Survey Area (grazed, bladed, undisturbed, etc.):** The survey area has been disturbed by grazing, bladed roads, two-track traffic, and oil/gas development.

21. CULTURAL RESOURCE FINDINGS ☒ **Yes, See Page 3** ☐ **No, Discuss Why:**

22. Required Attachments (check all appropriate boxes):
- ☒ **USGS 7.5 Topographic Map with sites, isolates, and survey area clearly drawn**
- ☒ **Copy of NMCRIS Mapserver Map Check**
- ☒ **LA Site Forms - new sites (*with sketch map & topographic map)***
- ☒ **LA Site Forms (update) - previously recorded & un-relocated sites (*first 2 pages minimum)***
- ☐ **Historic Cultural Property Inventory Forms**
- ☒ **List and Description of isolates, if applicable**
- ☒ **List and Description of Collections, if applicable**

23. Other Attachments:
- ☒ **Photographs and Log**
- ☐ **Other Attachments**

***(Describe)*:**

24. I certify the information provided above is correct and accurate and meets all applicable agency standards.

Principal Investigator/Responsible Archaeologist: Douglas H.M. Boggess

Signature _____ **Date** _____ **Title (if not PI):**

25. Reviewing Agency: Reviewer's Name/Date Accepted ( ) Rejected ( ) Tribal Consultation (if applicable): ☐ Yes ☐ No	26. SHPO Reviewer's Name/Date: HPD Log #: SHPO File Location: Date sent to ARMS:

CULTURAL RESOURCE FINDINGS

[fill in appropriate section(s)]

1. NMCRIS Activity No.: 116929	2. Lead (Sponsoring) Agency: Bureau of Land Management – Carlsbad Field Office	3. Lead Agency Report No.:

SURVEY RESULTS:

Sites discovered and registered: 87
Sites discovered and NOT registered: 0
Previously recorded sites revisited (*site update form required*): **9**
Previously recorded sites not relocated *(site update form required):* 0
TOTAL SITES VISITED: 96
Total isolates recorded: 183 **Non-selective isolate recording?** ☒
Total structures recorded (*new and previously recorded, including acequias*): **0**

MANAGEMENT SUMMARY: Lone Mountain archaeologists recorded 183 isolated occurrences and 87 newly discovered sites. Nine previously recorded sites were updated.

Twenty-eight of the sites examined have been recommended eligible for nomination to the NRHP, nine are recommended ineligible, and 59 have undetermined eligibility recommendations.

All work was completed in compliance with applicable federal and state legislation and procedures designed to protect nonrenewable cultural resources, including Section 106 of the National Historic Preservation Act of 1966 as amended (PL 89-665), the National Environmental Policy Act of 1969 (PL 91-852), the Archaeological Resource Protection Act of 1979 (PL 96-95), and Executive Order 11593.

IF REPORT IS NEGATIVE YOU ARE DONE AT THIS POINT.

SURVEY LA NUMBER LOG

Sites Discovered:

LA No.	Field/Agency No.	Eligible? (Y/N, applicable criteria)
908-01-001	LA 165595	Undetermined
908-01-002	LA 165596	Eligible, D
908-01-003	LA 165597	Undetermined
908-01-004	LA 165598	Undetermined
908-01-005	LA 165599	Undetermined
908-01-006	LA 165600	Eligible, D
908-01-007	LA 165601	Undetermined
908-01-008	LA 165602	Undetermined
908-01-009	LA 165603	Undetermined
908-01-010	LA 165604	Eligible, D
908-01-100	LA 165605	Undetermined
908-01-101	LA 165606	Undetermined
908-01-102	LA 165607	Undetermined
908-01-103	LA 165608	Eligible, D
908-01-104	LA 165609	Eligible, D
908-01-105	LA 165610	Eligible, D
908-01-106	LA 165611	Eligible, D
908-01-107	LA 165612	Undetermined
908-01-108	LA 165613	Eligible, D

908-01-109	LA 165614	Eligible, D	
908-01-110	LA 165615	Undetermined	
908-01-111	LA 165616	Undetermined	
908-01-112	LA 165617	Undetermined	
908-01-113	LA 165618	Eligible, D	
908-01-114	LA 165619	Eligible, D	
908-01-115	LA 165620	Undetermined	
908-01-116	LA 165621	Undetermined	
908-01-117	LA 165622	Undetermined	
908-01-118	LA 165623	Undetermined	
908-01-119	LA 165624	Undetermined	
908-01-120	LA 165625	Undetermined	
908-01-121	LA 165626	Undetermined	
908-01-122	LA 165627	Undetermined	
908-01-123	LA 165628	Undetermined	
908-01-124	LA 165634	Undetermined	
908-01-125	LA 165635	Undetermined	
908-01-126	LA 165636	Undetermined	
908-01-127	LA 165637	Undetermined	
908-01-128	LA 165638	Ineligible	
908-01-129	LA 165639	Eligible, D	
908-01-130	LA 165640	Undetermined	
908-01-131	LA 165641	Undetermined	
908-01-132	LA 165642	Undetermined	
908-01-133	LA 165643	Eligible, D	
908-01-134	LA 165644	Ineligible	
908-01-135	LA 165645	Eligible A, D	
908-01-136	LA 165646	Ineligible	
908-01-137	LA 165647	Undetermined	
908-01-138	LA 165648	Undetermined	
908-01-139	LA 165649	Undetermined	
908-01-140	LA 165650	Eligible, D	
908-01-141	LA 165651	Undetermined	
908-01-142	LA 165652	Undetermined	
908-01-143	LA 165653	Eligible, D	
908-01-144	LA 165654	Undetermined	
908-01-145	LA 165655	Ineligible	
908-01-146	LA 165656	Ineligible	
908-01-147	LA 165657	Undetermined	
908-01-148	LA 165658	Ineligible	
908-01-149	LA 165659	Undetermined	
908-01-150	LA 165660	Undetermined	
908-01-151	LA 165661	Undetermined	
908-01-152	LA 165662	Undetermined	
908-01-153	LA 165663	Undetermined	
908-01-154	LA 165664	Undetermined	
908-01-155	LA 165665	Eligible, D	
908-01-156	LA 165666	Undetermined	
908-01-157	LA 165667	Undetermined	
908-01-158	LA 165668	Undetermined	
908-01-159	LA 165669	Eligible, D	
908-01-160	LA 165670	Eligible, D	
908-01-161	LA 165671	Undetermined	
908-01-162	LA 165672	Undetermined	
908-01-163	LA 165673	Eligible, D	
908-01-164	LA 165674	Undetermined	
908-01-165	LA 165675	Undetermined	
908-01-166	LA 165676	Ineligible	
908-01-167	LA 165677	Eligible, D	
908-01-168	LA 165678	Undetermined	

908-01-200	LA 165679	Eligible, D
908-01-201	LA 165680	Undetermined
908-01-202	LA 165681	Undetermined
908-01-203	LA 165682	Ineligible
908-01-204	LA 165683	Undetermined
908-01-205	LA 165684	Undetermined
908-01-206	LA 165685	Undetermined
908-01-207	LA 165686	Undetermined

Previously recorded revisited sites:

LA No.	Field/Agency No.	Eligible? (Y/N, applicable criteria)
LA 26821	N/A	Eligible, D
LA 32229N LA 32229S	N/A	Eligible, D
LA 61244	N/A	Eligible, D
LA 99815	N/A	Undetermined
LA 116374	N/A	Ineligible
LA 122417	N/A	Eligible, D
LA 146165	N/A	Eligible, D
LA 159321	N/A	Eligible, D
LA 159324	N/A	Undetermined

MONITORING LA NUMBER LOG *(site form required)*

Sites Discovered (*site form required*) **:** **Previously recorded sites** ***(Site update form required):***

LA No.	Field/Agency No.	LA No.	Field/Agency No.

Areas outside known nearby site boundaries monitored? Yes ☐, No ☐ If no explain why:

TESTING & EXCAVATION LA NUMBER LOG (*site form required)*

Tested LA number(s)	Excavated LA number(s)

A CLASS III CULTURAL RESOURCE SURVEY OF THE PERMIAN BASIN MOA AREA, CHAVES AND EDDY COUNTIES, NEW MEXICO

Prepared by
Beth McCormack, Douglas H. M. Boggess,
Peggy Allison, Teresa Cordua, Brian Deaton,
Victoria Menchaca, Tomasz Wasowski,
and Andrew Zink
Lone Mountain Archaeological Services, Inc.

Submitted by
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2625 Pennsylvania Street NE
Albuquerque, New Mexico 87110

Prepared for
George MacDonell
Bureau of Land Management - Carlsbad Field Office
620 East Greene Street
Carlsbad NM 88220-1778

LONE MOUNTAIN ARCHAEOLOGICAL SERVICES, INC.

NMCRIS No. 116929
BLM Permit 122-2920-09-EEE
NM State Permit No. NM-10-073
Lone Mountain Report No. 908-01
April 15, 2010

Between November 2, 2009 and March 23, 2010, Field Director/Field Supervisor Thoras Dye and Archaeological Technicians Randolph Davis, Noel Pacheco, Francisco Britton, Andrew Zink, Victoria Menchaca, Judah Braunstein, Zachary Schultheis, and Tomasz Wasowski completed a Class III pedestrian survey of 3,358.91 acres (1,359.31 ha) divided into five parcels in [redacted] This inventory was conducted under NMCRIS Number 116929, BLM Permit 122-2920-09-EEE, and BLM Contract No. L08PC90394-Order No. L09PD01424. The lead agency for this project was the Bureau of Land Management - Carlsbad Field Office. George McDonell was the point of contact.

The task of this project was to inventory and characterize the archaeological landscape in portions of the Permian Basin MOA area that are under-represented by previous archaeological inventory. The data provided by this project will be utilized by the BLM Permian Basin Working Group to help guide future inventory and research projects in the Permian Basin MOA area.

The project area consists of 3,358.91 acres (1,359.31 ha) on BLM lands located in all or part of the following PLSS sections:

[redacted]

Lone Mountain archaeologists recorded 183 isolated occurrences and 87 newly discovered sites. Nine previously recorded sites were updated.

Twenty-eight of the sites examined have been recommended eligible for nomination to the NRHP, nine are recommended ineligible, and 59 have undetermined eligibility recommendations.

All work was completed in compliance with applicable federal and state legislation and procedures designed to protect nonrenewable cultural resources, including Section 106 of the National Historic Preservation Act of 1966 as amended (PL 89-665), the National Environmental Policy Act of 1969 (PL 91-852), the Archaeological Resource Protection Act of 1979 (PL 96-95), and Executive Order 11593.

Archaeologists with Lone Mountain Archaeological Services, Inc. conducted a Class III cultural resource survey of the Permian Basin MOA area (NMCRIS No. 116929), as requested by The Bureau of Land Management - Carlsbad Field Office (BLM-CFO).

DESCRIPTION OF UNDERTAKING

The task of this project was to inventory and characterize the archaeological landscape in portions of the Permian Basin MOA area that are under-represented by previous archaeological inventory. The project area is is comprised of five parcels of BLM-managed land encompassing 3,358.91 acres (1,359.31 ha). The data provided by this project will be utilized by the BLM Permian Basin Working Group to help guide future inventory and research projects in the Permian Basin MOA area.

Fieldwork was conducted from November 2, 2009 to March 23, 2010. The work was performed by Field Director/Field Supervisor Thoras Dye and Archaeological Technicians Randolph Davis, Noel Pacheco, Francisco Britton, Andrew Zink, Victoria Menchaca, Judah Braunstein, Zachary Schultheis, and Tomasz Wasowski.

ENVIRONMENTAL SETTING

GEOLOGY AND TOPOGRAPHY

According to the Soil Survey of [redacted] soils in the area are likely to derive from a number of different associations. The parcels are located on various geological formations (http://websoilsurvey.nrcs.usda.gov).

Parcel 1 is located on Holocene to Middle-Pleistocene eolian deposits. Elevation ranges from 4,091 ft to 4,237 ft. Predicted soils are Kermit-Berino fine sands, 0 to 3 percent slopes. These are fine mixed alluvial and eolian sands underlain by fine sandy loam and loamy sand.

The geology of Parcel 2 is dominated by Holocene to Middle Pleistocene eolian and Piedmont deposits. These are characterized by interlayed eolian sands and piedmont slope deposits along the [redacted] capped by thin eolian deposits. Elevation ranges from 4,092 ft to 4,153 ft. From north to south, Predicted soils in Parcel 2 are Faskin-Roswell, Ima, Roswell-Jalmar, Kermit-Berino (described above), Likes, Tonuco, and Largo associations. Faskin-Roswell complex soils are mixed alluvial and eolian fine sandy clay loam derived from sedimentary rock. Ima fine sandy loam soils are mixed alluvial and eolian fine sandy loam derived from sedimentary rock. Roswell-Jalmar complex soils are mixed alluvial and eolian fine sand derived from sedimentary rock. Likes loamy fine sand, 1 to 5 percent slopes soils, in the eastern section of the parcel, are calcereous alluvial or colluvial loamy fine sand. Tonuco loamy fine sand, 0 to 3 percent slopes, eroded soils, in the southwestern portion of the parcel, are mixed alluvial and eolian loamy fine sand. Largo loam, 1 to 5 percent slopes soils, in the southeastern portion of the parcel, are calcareous alluvial loam, underlain by silty loam.

Parcel 3 is on the lower Pleistocene to Middle Miocene Ogallala formation. The Ogallala is characterized by alluvial and eolian deposits and petrocalcic soils. Elevation ranges from 3,990 ft to 4,080 ft. Predicted soils include Berino, Kermit-Berino, Largo (described above), Tonuco (described above), and Mobeetie complexes. Berino complex, 0 to 3 percent slopes, eroded soils are mixed alluvial and eolian fine

sands underlain by sandy clay loam and loamy sand. Mobeetie fine sandy loam, 1 to 5 percent slopes soils are deep, mixed alluvial and eolian fine sandy loam.

Parcel 4 is located on Holocene to Upper Pleistocene alluvial deposits, with some older Middle to Lower Pleistocene alluvial deposits in the eastern and southern sections. Elevation ranges from 2,911 ft. to 3,102 ft. The [redacted] is the primary drainage in this area, cutting through the center of this parcel. Predicted soils include Pajarito-Dune, Simona-Bippus, Upton, Dev-Pima, Kermit-Berino (described above), Potter-Simona, and Simona complexes. Pajarito-Dune land complex, 0 to 3 percent slopes is composed of fine, deep, mixed alluvial and eolian sandy loam. Simona-Bippus complex, 0 to 5 percent slopes soils are fine, mixed alluvial and eolian gravelly sandy loam and silty clay loam. Upton gravelly loam, 0 to 9 percent slopes soils are residual gravelly loam derived from limestone. Dev-Pima complex, 0 to 3 percent slopes soils are alluvial gravelly loam and alluvial silty clay loam. Potter-Simona complex, 5 to 25 percent slopes soils are mixed alluvial and eolian gravelly loam and gravelly fine sandy loam. Simona sandy loam, 0 to 3 percent slopes soils are fine, mixed alluvial and eolian sandy loam.

The geology of Parcel 5 is dominated by Upper Permian Quartermaster formation, characterized by red siltstone and sandstone. Portions of the parcel are also located on Holocene to Upper Pleistocene alluvial deposits. Elevation ranges from 2,850 ft to 2,904 ft. The [redacted] bisects this parcel from north to south. Predicted soils in this parcel include Dev-Pima (described above), Pajarito-Dune (described above), Upton (described above), Upton-Simona, and Russler-Ector complexes. Upton-Simona Complex, 1 to 15 percent slopes, eroded soils are residual gravelly loams. Russler-Ector association, 0 to 9 percent slopes soils are alluvial and residual loam, clay loam, and very cobbly loams.

FLORA AND FAUNA

[redacted] have a semiarid climate, with the southern part slightly warmer and wetter than the northern part. Average high and low temperatures are, respectively, 25° C (74.5° F) and 7° C (50.4° F). Average annual precipitation is 300 mm (14.74 inches). Brown (1994) defines the area to the west as Semidesert grassland, while Chihuahuan desert scrub dominates the east. At the boundary zone, one can expect both communities to be present and segregated by elevation.

The local vegetation was used for food, medicinal purposes, and as sources of material to produce baskets, rope, and sandals. Food sources include grass seeds, prickly pear fruits, and mesquite pods, which can be harvested as the plants mature. Grass seeds generally mature in the spring, mesquite pods in the summer, and prickly pear fruits in the late summer and early fall. Fibers from yucca provided material for making sandals, rope, and twine, while certain types of yucca root can be used as soap.

The contemporary environment provides habitat for a variety of fauna including mule deer, pronghorn, coyote, badger, jackrabbits, desert cottontail, tortoise, rattlesnake, and other small animals. While it is unclear which species inhabited the area prehistorically, it is known that many animals were hunted or trapped to provide additional food sources. Bison roamed this area as well, and served as a valuable food source for local prehistoric inhabitants.

CULTURAL LANDSCAPE

Historic and recent land uses have predominantly been ranching and petrochemical and potash extraction. These economic pursuits have left a strong mark on the landscape.

Prior to fieldwork, a site files check was conducted by modem at the Archeological Records Management Section (ARMS) of the Historic Preservation Division to determine if previously recorded cultural resources are located in or near the project area.

PREFIELD RECORDS CHECK AND REVIEW OF PREVIOUS RESEARCH

The ARMS files check was conducted on July 17, 2009. A check of the National and State Registers was also conducted on July 17, 2009. A site files inspection was also conducted at the BLM - Carlsbad Field Office on November 2, 2009. All known sites were plotted on USGS quadrangles and project-specific field maps, and relevant site forms were copied and carried into the field.

Pre-field research located 37 sites within 0 25 mi of the project area. Twenty-five of these sites fall outside the boundaries of the project; the other nine were updated during this survey. The disposition of these sites within the context of this project is summarized in Table 2.1. Please note that components and eligibility recommendations were determined by the original investigators.

Table 2.1: Previously Recorded Sites.

LA No.	Description	Components	Eligibility, Criteria
26821	Five burned caliche features (two with staining), one ring midden with staining below the surface and consisting of cores, El Paso brownware, and assorted lithic artifacts; four artifact concentrations and general artifact scatter consisting of flaked-stone debitage, groundstone tools and fragments, scrapers, choppers, one hammer, one utilized flake, El Paso brownware sherds, one Jornada brownware sherd, Chupadero Black-on-White, and Three Rivers Red-on-Terracotta	Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500)	Eligible, D
26997	Prehistoric artifact scatter consisting of ground stone tools, lithic debitage, and ceramic cherd	Mogollon Early Pueblo (Jornada) A.D. 1100 to Late Pueblo (Jornada) A.D. 1400	Not determined
32229	Burial (n=unknown), burned rock midden, fire-cracked rock concentration, three hearth features, pithouse, lithic artifacts consisting of burned adobe, chipped stone tools, cores, diagnostic projectile points, fire-cracked rock, burned caliche, lithic debitage, and ground stone tool fragments; diagnostic ceramic sherds; diagnostic metal artifacts, and other metal fragments	Late Archaic 1800 BC to A.D. 900; Mogollon Late pithouse (Jornada) A.D. 900 to Early Pueblo (Jornada) A.D. 1350	Eligible, D
32267	Not entered - see LA 32229	Not entered	Not determined
49226	Not entered - see LA 32229	Not entered	Not determined
50305	Not entered - see LA 32229	Not entered	Not determined
55902	Prehistoric artifact scatter consisting of fire-cracked rock, burned caliche, ground stone tool fragments, lithic debitage, and ceramic sherds	Mogollon Late Pueblo (Jornada) A.D. 1175 to Late Pueblo (Jornada) A.D. 1400	Not determined

Table 2.1: Previously Recorded Sites. (Continued)

LA No.	Description	Components	Eligibility, Criteria
61244	Hearth features with associated artifact scatter consisting of lithic debitage and prehistoric ceramic sherds	Mogollon Early Pueblo (Jornada) A.D. 1100 to Late Pueblo (Jornada) A.D. 1400	Not determined
75430	Lithic debitage scatter	Unknown 9,500 B.C. to Unknown A.D. 1993	Eligible - Criteria not specified
79572	Lithic artifact scatter consisting of lithic debitage	Unknown 9,500 B.C. to Unknown A.D. 1993	Not eligible
80247	Two hearth features, one with stain; one groundstone fragment	Unspecific Jornada Mogollon A.D. 200 to A.D.1400	Not determined
80255	Six hearth features, one with stain, five are deflated; Lithinc artifact scatter consisting of cores, groundstone fragments, and lithic debitage	Unspecific Jornada Mogollon A.D. 200 to A.D.1401	Eligible - Criteria not specified
110908	Six hearth features constructed of cobbles; lithic artifact scatter consisting of chipped stone tools, diagnostic projectile points, fire-cracked rock, burned caliche, groundstone tool fragments, and lithic debitage	Middle Archaic 3000 BC to Late Archaic A.D. 200	Eligible, D
116374	One lithic cache; one lithic quarry; lithic artifact scatter consisting of chipped stone tools, cores, and lithic debitage	Early Archaic 5500 BC to Late Archaic A.D. 900	Not eligible
117564	Lithic artifact scatter consisting of cores, fire-cracked rock, ground stone tool fragments, and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1550	Not determined
122417	One historic house foundation; historic artifact scatter consisting of diagnostic glass and fragments, diagnostic metal and fragments, architectural debris, assorted historic trash	Anglo NM Statehood - WWII A.D. 1930 to Recent Historic A.D. 1950	Not entered
125173	100 fire-cracked concentrations; dense prehistoric artifact scatter consisting of chipped stone tools, cores, ground stone tools and fragments, and lithic debitage; diagnostic ceramic sherds; faunal and macrobotanical remains	Mogollon Late Pithouse (Jornada) A.D. 900 to Late Pithouse (Jornada) A.D. 1100;	Not entered
125177	Three hearth features with charcoal present; one fire-cracked rock concentration; lithic artifact scatter consisting of cores, fire-cracked rock, and lithic debitage; faunal and microbotanical remains	Unspecific/Other Prehistoric 9500 BC to A.D. 1880	Not entered
125220	Lithic artifact scatter consisting of lithic debitage, chipped-stone tools, and burned caliche	Unspecific/Other Prehistoric 9500 BC to A.D. 1881	Not determined
125221	One burned caliche feature; lithic artifact scatter consisting of lithic debitage, ground stone tool fragments, fire-cracked rock and caliche, diagnostic ceramics	Late Pithouse (Jornada) A.D. 900 to Late Pueblo (Jornada) A.D. 1400	Not determined
125223	One deflated hearth with stai; Lithic artifact scatter consisting of burned caliche, lithic debitage, cores, ground stone fragments	Unspecific/Other Prehistoric 9500 BC to A.D. 1881	Not determined

Table 2.1: Previously Recorded Sites. (Continued)

LA No.	Description	Components	Eligibility, Criteria
129320	Lithic artifact scatter consisting of chipped stone tools, cores, and lihic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Not determined
129322	Lithic artifact scatter consisting of cores, and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Not determined
129325	Lithic artifact scatter consisting of chipped stone tools, cores, and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Eligible, D
129326	Lithic artifact scatter consisting of cores and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Not determined
129329	Lithic artifact scatter consisting of chipped stone tools, cores, and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Not eligible
129330	Lithic artifact scatter consisting of chipped stone tools, cores, and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Eligible, D
129332	Three rock shelters; lithic artifact scatter consisting of fire-cracked rock, burned caliche, and lithic debitage	Unspecific/Other Prehistoric 9500 BC to A.D. 1850	Eligible, D
146165	Three fire-cracked rock concentrations; burned caliche concentration; lithic artifact scatter consisting of chipped stone tools, cores, fire-cracked rock, burned caliche, and lithic debitage	Unknown Aboriginal Unspecific/Other Prehistoric 9500 BC to Unspecific/Other Historic A.D. 1880	Eligible, D
157037	Not entered	Not entered	Not entered
157578	Not entered	Not entered	Not entered
159323	Not entered	Not entered	Not entered
159325	Not entered	Not entered	Not entered
159326	Not entered	Not entered	Not entered
159327	Not entered	Not entered	Not entered
159328	Not entered	Not entered	Not entered
159329	Not entered	Not entered	Not entered
159330	Not entered	Not entered	Not entered

EXPECTED RESOURCES

The typical developmental trajectory posited for southwestern prehistory is one of mobility giving way to sedentism as subsistence technologies shifted over time. Paleoindian groups and Early to Middle Archaic groups moved from resource procurement area to resource procurement area. It appears that these groups, especially Archaic groups, visited favored lithic sources during their seasonal rounds and curated cores for tool production throughout the remainder of their rounds. This led to a tool-production technology requiring sparing use of these cores for formal tool production, resulting in assemblages comprised of a higher proportion of biface-thinning flakes.

With the advent of agriculture, groups began to settle near water sources, and pottery appeared. Judging from areas that have had substantial sedentary agriculturalist settlement such as southern Arizona or the Four Corners, large amounts of pottery are present in artifact assemblages. These settlements became somewhat permanent, and many appear to

have lasted more than two to thee generations. Only when the agricultural potential was played out or damaged through natural disaster such as flooding did these populations move on. Since these populations were no longer making seasonal rounds to distant lithic sources, lower quality locally available lithic materials were employed for tool-production. Since gravels are available in and around most riverbeds, these materials were present in quantity. Flaked-stone assemblages came to be dominated by core-reduction flakes and expedient tools.

Late in the Formative period, many of these sedentary settlements were abandoned. In some cases this was due to drought, such as the one in the Four Corners that led to the abandonment of the Mesa Verde system. In the Phoenix basin, extensive flooding is thought to have wiped out irrigation networks. Traditionally, an Athapaskan invasion is thought to have caused some regional abandonment. By the beginning of the Protohistoric period, many areas that had been peripheral to the Southwest, such the Fremont areas of Utah, and the Southern Plains Villages of northeast New Mexico, Texas, and Oklahoma were dominated by material culture and mobile subsistence patterns more akin to that of the Archaic period.

As discussed in the Culture History section, the material culture of southeastern New Mexico suggests two parallel subsistence systems. One system consisted of hunting and gathering with an emphasis on collecting wild plant resources that could be stored. This nomadic adaptation is assumed to be a continuation of the Archaic adaptation from the preceding period. The second system consisted of agriculturists who occupied areas suitable for growing crops. It is assumed that groups practicing this latter system used pottery and were more sedentary than the former, and that these are two separate groups.

There are sites in southeastern New Mexico where there are quantities of ceramics, such as the Merchant Site, that are clearly agriculturalist sedentary sites. The Merchant site is close to a substantial playa and a number of springs. Sedentism is dependent on the availability of year-round water. Ceramics alone are not necessarily indicators for agriculture and sedentism, however. In southeastern New Mexico, ceramics are only equivalent to sedentism where sedentism is practical. The adoption of agriculture and sedentism in certain water-rich locations does not seem to preclude continued use of outlying resource areas that had been exploited by Archaic populations in southeastern New Mexico.

It is likely that these populations merely incorporated agriculture into an Archaic subsistence base, rather than replacing one pattern with the other, resulting in the use of wild, semi-wild, and cultivated plant foods. Similar patterns of a balanced use of wild, semi-wild and cultivated plant foods have been posited for the Hohokam of southern Arizona (Fish and Donaldson 1991). In the case of the Tucson Basin and the Marana area north of Tucson where Fish's work has centered, there is a wide river valley, suitable for irrigation and the placement of substantial agricultural settlements. Only when one reaches a narrow strip of bajada at the base of the mountains does one begin to see limited activity sites centered on the exploitation of semi-wild and wild resources. These sites often have a flaked-stone scatter, some groundstone, and very few sherds.

One of the more typical prehistoric site types in southeastern New Mexico is the flaked-stone scatter with expedient groundstone and the occasional sherd. This site is typically interpreted as a limited activity area and is accompanied by a thermal feature or a scatter of burned caliche or fire-cracked rock; it is posited that some wild resource was being processed. The prevalence of this site type may be a function of geography and resource potential on the landscape. When one is away from a river valley or a playa or lake, there is a vast expanse of land with exploitable wild resources, but little water suitable for long-term agricultural settlement. It is possible that if one looked at private land currently under cultivation in the floodplain of the Pecos River, some indications of sedentism may remain.

Southeastern New Mexico has artifact assemblages similar to those found at the edges of agricultural areas, because much of the region is unsuitable for agriculture but was too resource-rich to abandon. Furthermore, the relatively local availability of lithic sources such as the Ogallala Formation has made the curation and careful reduction of cores unnecessary and led to pattern of flaked-stone debitage that does not match the assumptions concerning the temporal placement of formal versus expedient flaked-stone tools.

Regional ceramic and projectile point chronologies are poorly developed to the extent that there are varying dates for the emergence of ceramic producing groups and inconsistencies in the use of chronological frameworks. The Ceramic period has been variously cited as starting at A.D. 150, 200, 400, 500, 800, and 1000 depending on the sequence, the area, and the researcher. Similarly, Lord and Reynolds's (1985) work demonstrates that dated projec-

tile point styles from the Waste Isolation Pilot Plant (WIPP) sites vary from the chronologies developed by Leslie (1978) for this part of southeastern New Mexico.

Much of the data recorded by previous recorders reflects some of the difficulties created by archaeologists using different typological and chronological frameworks. The Hueco phase as posited by Lehmer (1948) was a terminal Archaic phase that lasted until as late as A.D. 1000. Hueco phase sites are typically identified by diagnostic projectile points identified as Types 8A and 8B in Leslie (1978), variations of the Hueco point thought (by that author) to date as late as A.D. 950. However, as Justice (2002:208) argues, points identified as Hueco (e.g. MacNeish 1993:182-183) can be assigned to two of Justice's typological "clusters." These include San Pedro points, which date from 1500 B.C. to A.D. 300 and Cienega cluster points, more specifically Tularosa Corner notched, which date from 100 B.C. to A.D. 900. The range of variability within these two types causes their identification to overlap. When Justice's typology is applied, the contradictions between the appearance of pottery and the end of the Archaic period in southeastern New Mexico seem to make more sense.

CULTURE HISTORY

Culture histories provide a context by which cultural resources studies in particular regions may be carried out and evaluated. Because the sequence of cultural developments and events may be spatially distinctive and temporally restricted it is possible to categorize archaeological finds with reference to specific time periods, culture groups, and adaptive strategies. Research questions are usually tailored to these categories, which are often called "periods" or "phases" when they refer to time and are called "culture groups" when they refer to differing assemblages of material culture thought to reflect distinctive adaptations.

For southeastern New Mexico, Katz and Katz (1993), Sebastian and Larralde (1989), Stuart and Gauthier (1988), and most recently Hogan (2006) have prepared comprehensive cultural overviews. These authors provide a detailed analytical synthesis of the prehistory of the region and discuss many of the region-specific research themes. Their work provides the basis for much of the following discussion. In addition, synthetic treatments of the history of this southeast region completed by Pratt and Scurlock (1989) and Katz and Katz (1985) serve as a basis for the Protohistoric and historic portions of this overview.

PALEOINDIAN PERIOD (CA. 10,500 TO 5500 B.C.)

The earliest consistent evidence for human settlement in North America dates to approximately 10,500 B.C. with consistent (and accepted) evidence of humans in southeastern New Mexico by around 9500 B.C. There is some controversial evidence for a human presence in southern New Mexico earlier than 10,500 B.C. from Pendejo Cave (ca. 50,000 B.C. to ca. 13,000 B.C.) between the Guadalupe Mountains and the Organ Mountains (MacNeish and Liddy 2003) and Hermit's Cave (12,900 B.C.) in the Guadalupe Mountains (Simmons et al. 1989). However, Anderson and Faught (2000) argue that there is insufficient evidence to describe any cultural trends prior to the appearance of the Clovis complex at around 9500 B.C., Hayden's (1976) arguments for Malpais pre-San Dieguito/San Dieguito material notwithstanding (Heilen 2004).

The Paleoindian period is characterized by a subsistence strategy focused on hunting now-extinct Pleistocene megafauna, including Bison antiquus and mammoth. Diagnostic stone tools associated with this period include end scrapers and large, unstemmed lanceolate projectile points, which are often fluted. These stylized points have been found in association with the remains of large Pleistocene animals. During the Paleoindian period, projectile points were attached to spears that were thrust or to darts that were propelled by atlatls. A reliance on big game hunting has been established (Judge 1982), but it is unclear to what extent these people exploited other available resources such as plants. Little evidence has been found to suggest the use of structures during this period. From negative evidence, it has been assumed that people lived a nomadic lifestyle, with the use of structures apparently uncommon.

Three distinct complexes have been identified for the Paleoindian period: Clovis, Folsom, and Plano. The earliest occupation, Clovis, appears to date from 9400 to 8800 B.C. on the Llano Estacado (Holliday 1997:177). The tool assemblage is characterized by Clovis points (bifacially worked lanceolate projectile points with a concave base), transverse end scrapers, side scrapers, bifacial knifes, gravers, perforators, and hammerstones (Cordell 1997). Blackwater Draw, located north of the survey areas, is the Clovis type

site. At this site, artifacts dating to the Clovis complex were found in association with the skeletal remains of mammoths and other megafauna.

Folsom complex sites date from 8800 to 8200 B.C. on the Southern High Plains (Holliday 1997:182). The Folsom complex exhibits technological distinctions from the Clovis complex. Diagnostic projectile points include fluted Folsom and unfluted Midland points, which are similar in outline. In addition to these points, Folsom tool assemblages include spokeshaves, end scrapers, perforators, knives, denticulates, drills, choppers, awls, and abrading stones (Cordell 1997). These artifacts are often found in association with a now-extinct species of bison.

Plano complex cultures are generally thought of as forming the terminal elements of the Paleoindian big game hunting tradition. Plano is known for a number of artifact complexes dating from 8200 to 6000/5500 B.C. Each complex is distinguished by a series of large lanceolate and unfluted projectile points including Plainview, Midland, Meserve, Frederick, Agate Basin, Hell Gap, Firstview, Alberta, and Cody.

The Late Pleistocene environment played an important role in Paleoindian subsistence strategies. Paleoenvironmental reconstructions suggest the climate was cooler and wetter, with less variation in temperatures between seasons than the present climate. During the Paleoindian period, southeastern New Mexico was an open savanna with lush vegetation including stands of pine and spruce trees, and numerous shallow lakes. At the end of the Pleistocene, the climate became warmer, drier, and more variable. These environmental changes lead to the extinction of some animal species, changes in the types and distribution of plant resources, and a shift in human adaptive strategies.

Evidence for Paleoindian use of southeastern New Mexico has proved elusive. Of the more than 50,000 acres of survey that have been conducted by Lone Mountain alone in the Carlsbad area prior to 1999, only seven Paleoindian or possible Paleoindian projectile points have been located (Cunningham et al. 1995a, 1995b, 1995c; Cunningham and Bowden 1998a, 1998b). Six of these seven points were found on four different sites, and the seventh was an isolated occurrence. Hogan's (2006) review of the ARMS data lists 165 Paleoindian components for all of southeastern New Mexico, representing 1.7 percent of the components known in southeastern New Mexico. A long history of illegal artifact collection, the popularity of the large projectile points from this time period, prehistoric curation of these points by later groups, and the fact that Paleoindian sites are defined primarily by these point types may be biasing our understanding of Paleoindian occupation in this area.

ARCHAIC PERIOD (CA. 5500 B.C. TO A.D.200/900)

The Archaic period coincides with the beginning of the Sand Canyon Postpluvial epoch when the cooler, wetter climate of the Pleistocene was replaced with conditions similar to the present climate. Archaic adaptation was a response to these climatic changes, which included drier, warmer weather with greater seasonal variation. The Archaic period is characterized by a more diffuse subsistence strategy (Judge 1982) than the Paleoindian period. There was a greater reliance on small-bodied game and wild plant foods. To a lesser degree, large animals such as deer and pronghorn were also utilized. Mobility was cyclical and more restricted in extent than during Paleoindian times, when it has been inferred that hunters followed Pleistocene megafauna over hundreds of miles. Productive Archaic site locations, once established, were re-used on a seasonal basis.

The Archaic artifact assemblage is characterized by a diversity of tool forms with an emphasis on grinding implements. Archaic projectile points are shorter than those of the Paleoindian period, yet larger than arrow points used during the subsequent Ceramic period. Archaic dart points were attached to short shafts and thrown using an atlatl or spear thrower (Suhm et al. 1954). Points of this period are generally stemmed or corner-notched and exhibit more extensive morphological variability and less precision in the quality of manufacture than those of the Paleoindian period (Sebastian and Larralde 1989).

Two Archaic period chronologies for this region have been developed, one by Katz and Katz (1985) and one by Shelley (1994). The various phases are identified by changes in projectile point styles. Projectile points diagnostic of the earlier Archaic phases are generally large, straight-stemmed points with indented, concave, or straight bases. Points diagnostic of the Late Archaic are more varied in form and include points with broad but shallow side or corner notches or pronounced shoulder barbs (Suhm and Jelks 1962; Irwin-Williams 1973; Katz and Katz 1993). Leslie (1979) also developed a point typology for southeastern New Mexico, but because few absolute dates were available at the time, temporal assignments are limited (Sebastian and Larralde 1989). Many area researchers use point typologies

developed in Texas, such as those developed by Suhm and Jelks (1962) and Turner and Hester (1999).

Katz and Katz (1985) developed a four phase Archaic chronology (Archaic 1 through 4) based on their work at Brantley Reservoir. Archaic 1 dates from 5200 to 3200 B.C., Archaic 2 dates from 1700 B.C. to 1000 B.C., Archaic 3 dates from 1000 B.C. to A.D. 1, and Archaic 4 dates from A.D. 1 to 500. Shelley's (1994) projectile point chronology was developed for the Llano Estacado and is based on the work conducted by Johnson and Holliday (1986) at Lubbock Lake. This scheme has an Early Archaic period dating from 6500 to 4400 B.C., a Middle Archaic period dating from 4400 to 2500 B.C., and a Late Archaic period (2500 B.C. to A.D. 1).

No climatic event marks the end of the Archaic period. The end of the period has been frequently tied to cultural events, such as the introduction of ceramics and the bow and arrow into the material culture of the groups occupying this area (Sebastian and Larralde 1989). Researchers working in different parts of southeastern New Mexico argue for varying end-dates for the Archaic period. Leslie (1978,1979) (who did a great deal of work east of Carlsbad toward Hobbs) dates the end of the Hueco phase (the terminal Archaic phase) at around A.D. 950. Katz and Katz (1993) place the end of the Archaic period at A.D. 500, based on the results they obtained from Brantley Reservoir to the northwest of Carlsbad. Ceramics are known to be present in the Sierra Blanca Mountains to the west of Carlsbad by between A.D. 400 and 500 (Wiseman 1996), but Jornada Brown has been dated as early as A.D. 200 at Deadman's Shelter (Hughes and Willey 1978), located between Amarillo and Lubbock, Texas. The adoption of the bow and arrow is at present thought to have taken place between A.D. 500 and A.D. 800, with the dart and atlatl continuing in use sometime afterwards (VanPool 2006).

Archaic components represent 8.8 percent of the known prehistoric sites in southeastern New Mexico (Hogan 2006).

CERAMIC PERIOD (A.D. 200/900 TO 1540)

As Hogan (2006) has indicated in his overview of southeastern New Mexico chronology, projectile points and ceramics are the artifact types that have proven most useful for assigning chronological affiliations to sites. Unfortunately, reliance on these artifact classes has not led to a clear dataset or interpretive model. Regional ceramic and projectile point chronologies are poorly developed to the extent that there are varying dates for the emergence of ceramic-producing groups and inconsistencies in the use of chronological frameworks. The Ceramic period in southeastern New Mexico has been variously cited as starting at A.D. 150, 200, 400, 500, 800, and 1000, depending on the sequence, the area, and the researcher. Similarly, Lord and Reynolds's (1985) work demonstrates that dated projectile point styles from the Waste Isolation Pilot Plant (WIPP) sites vary from the chronologies developed by Leslie (1978, 1979) for that part of southeastern New Mexico.

The earliest use of ceramics in southeastern New Mexico was initially suggested to have occurred between A.D. 600 and 900 (Stuart and Gauthier 1988). More recently, however, radiocarbon dates have been obtained from a limited number of sites indicating that ceramics may have appeared as early as A.D. 200 (LeBlanc 1982). It has been suggested that two primary settlement and subsistence systems were occurring simultaneously during the Ceramic period (Sebastian and Larralde 1989). One system consisted of hunting and gathering with an emphasis on collecting wild plant resources that could be stored. Late in the period there is an increased emphasis on bison hunting. This nomadic adaptation is assumed to be a continuation of the Archaic adaptation from the preceding period. The second system consisted of agriculturists who occupied areas suitable for growing crops. It is assumed that groups practicing this latter system used pottery and were more sedentary than the former. As Sebastian and Larralde (1989) point out, the underlying assumption that the appearance of pottery coincides with the adoption of agriculture and the advent of sedentism needs to be reexamined.

Ceramic period traits initially appear primarily along major river valleys. Unlike many other areas of New Mexico, Ceramic period sites in this area, especially those in the far southeastern portion of the state, exhibit little if any dependence on agriculture (Leslie 1979; Roney 1985; Stuart and Gauthier 1988). Because the addition of ceramics to the material culture apparently did not necessarily accompany a dependence on agriculture, some archaeologists believe that Archaic subsistence patterns persisted until historic times. Others have argued that agriculture has played a role in subsistence since the Late Archaic (MacNeish and Beckett 1987).

Several chronological sequences or schemes have been developed for southeastern New Mexico. Formative- (Ceramic-) period developments in southeastern New Mexico have been characterized by five chronological sequences (Sebastian and Larralde 1989, Katz and Katz 2001) that were developed for specific areas within southeastern New Mexico. Lehmer (1948) developed a classification to characterize Ceramic-period developments of the Eastern Branch of the Jornada Mogollon culture in south-central New Mexico, identified as the Hueco, Mesilla, Doña Ana, and El Paso phases. Leslie (1978, 1979) developed a sequence based on the work of Corley (1965) for Ceramic-period groups closely related to the Jornada Mogollon that occupied the extreme southeastern portion of the state. The chronology developed by Kelley (1984) for the south-central highlands is based on work done in the Sierra Blanca Region. The fourth sequence was developed by Jelinek (1967) for the Pecos Valley between Roswell and Fort Sumner. All of these sequences are tied to the Lehmer (1948) chronology for the Jornada Mogollon. Katz and Katz (2001) have presented a fifth chronological scheme intended to facilitate comparison between the four previously developed schemes, and to allow a higher resolution of chronological description.

The temporal classification proposed by Lehmer (1948) includes one Archaic phase (Hueco) and three ceramic phases (Mesilla, Doña Ana, and El Paso). The Mesilla phase is characterized by pithouse sites, containing both round and rectangular structures with extramural hearths and storage pits. Ceramics consist mainly of El Paso Brown. Imported ceramics are very rare but when present appear to be indicative of trade with the Mimbres area. The Doña Ana phase is characterized by the development of multiroom aboveground adobe structures occupied along with pithouses like those of the Mesilla phase. Ceramics include El Paso Polychrome (a painted ware) and El Paso Brown. There is an increase in the number and variety of tradeware ceramics including pottery associated with the Mimbres, Zuni, and northern Tularosa Basin areas. El Paso phase sites are characterized by adobe roomblocks arranged around a plaza or oriented in long east-west tiers. El Paso Polychrome is the dominant ceramic. Tradewares include Chupadero Black-on-white, Lincoln Black-on-red, and Three Rivers Red-on-terracotta.

Leslie's chronology is based on the work of Lehmer (1948) and Corley (1965). Corley suggested that occupants of extreme southeastern New Mexico during the Ceramic period were closely related to the Jornada Mogollon as defined by Lehmer. Leslie's sequence includes an Archaic phase (Hueco) that is similar to that proposed by Lehmer, and four ceramic phases (Querecho, Maljamar, Transitional, and Ochoa). Only non-structural sites are known for the early portions of the Querecho phase. Late in the phase, small rectangular pitstructures occur on some sites. Associated ceramic types include locally manufactured variants of Jornada brownware and imported Mimbres and Cebolleta Black-on-white. Maljamar-phase sites consist of nonstructural camps and pithouse villages with small rectangular structures. Ceramic types include variants of Jornada Brown, some corrugated utility wares late in the phase, and imported ceramics including Chupadero Black-on-white, El Paso Polychrome, and Three Rivers Red-on-terracotta. Transitional-phase sites are characterized by a ceramic assemblage consisting of Glaze A Red and Yellow types; Gila, Ramos, and El Paso Polychromes; and Lincoln Black-on-red. The Ochoa phase includes sites with surface rooms, occurring both as roomblocks and as single units. Ceramics are less varied than in the preceding phase and include a locally produced Ochoa Indented and imported Chupadero Black-on-white.

Kelley's sequence (1984) consists of three phases: Corona, Lincoln, and Glencoe. Two of the phases, Corona and Lincoln, are sequential and occur in the northern portion of the Sierra Blanca region. The third, Glencoe, is contemporaneous with the other two phases but occurs in the southern portion of the study area. Corona-phase sites consist of small open villages of contiguous jacal rooms with upright slab foundations. Two major ceramic types are associated with this phase: Jornada brownware and Chupadero Black-on-white. Lincoln-phase sites are characterized by villages consisting of multiroom pueblos composed of stone masonry and coursed adobe. Subterranean ceremonial structures are present on these sites. Ceramics include corrugated utility wares, Chupadero Black-on-white, and Lincoln Black-on-red, with El Paso Polychrome and Three Rivers Red-on-terracotta as tradewares. Glencoe-phase sites consist of open, scattered arrangements of pithouses. The major ceramic type is Jornada Brown. Early tradewares include Chupadero Black-on-white and Mimbres Boldface Black-on-white, while later sites contain Chupadero Black-on-white, El Paso Polychrome, Lincoln Black-on-red, and Three Rivers Red-on-terracotta.

Jelinek's sequence (1967) consists of four phases including 18 Mile, Mesita Negra, McKenzie, and Post-McKenzie. The first three phases (18 Mile, Mesita Negra, and McKenzie) are subdivided into early and late subphases. Early and Late 18 Mile sites con-

tain pithouses with surface rooms appearing late in the phase. Ceramics include Jornada brownware and Lino Gray in the early subphase and Middle Pecos Micaceous and Red Mesa Black-on-white late in the subphase. Early and Late Mesita Negra-phase sites are characterized by pithouses and ceramics consisting of Chupadero Black-on-white, Santa Fe Black-on-white, and Socorro Black-on-white. Early and Late McKenzie-phase sites consist of surface structures that are rectangular and slab-based. Ceramics include McKenzie Brown, and Chupadero and Middle Pecos Black-on-white. The Post-McKenzie phase encompasses sites containing evidence of continued use of the Middle Pecos region by Ceramic-period groups after A.D. 1300.

In the Katz and Katz (2001:37-40) scheme, the Formative period is divided into seven phases: Formative 1 (A.D. 500 to 750), Formative 2 (A.D. 750 to 950), Formative 3 (A.D. 950 to 1075), Formative 4 (A.D. 1075 to 1125), Formative 5 (A.D. 1125 to 1200), Formative 6 (A.D. 1200 to 1300), and Formative 7 (A.D. 1300 to 1375). Hogan (2006:4-17) believes that this latter scheme has two distinct problems: that the arbitrary slices of time do not capture developmental changes that may be occurring in different parts of southeastern new Mexico at different times and; that few artifacts commonly found on sites in southeastern New Mexico would allow researchers to differentiate between these taxa. Chupadero Black-on-white, for example, likely the most commonly encountered decorated ceramic in southeastern New Mexico, could date to any phase from the end of Formative 3 through Formative 7 and later.

Ceramic-period Jornada Mogollon sites represent 33.8 percent of all prehistoric components in southeastern New Mexico (Hogan 2006).

PROTOHISTORIC PERIOD (A.D. 1450 TO 1540/1600)

The Protohistoric period is poorly identified wherever it is discussed. This period captures the transition from relatively archaeologically visible groups leaving painted pottery and occasional village sites to the appearance of nearly invisible groups creating tipi rings and leaving little else. An increase in dependence on bison hunting has been identified on several late Formative-period sites, and an increased dependence on bison is thought to be responsible for this shift in the archaeological record. Protohistoric sites are thought to be affiliated with Apache or other groups that are known to have been in southeastern New Mexico into the Historic period number less than the Paleoindian sites and represent only 1 percent of known components in southeastern New Mexico (Hogan 2006).

Native groups present in the area during the Spanish Colonial period were entirely nomadic. Early Spanish records indicate that several native groups were present on the Llano Estacado including Apaches, Querechos, Vaqueros, and Teyas, with more sedentary Xumanos, Manso, and Suma to the south and west. Apachean groups extended their range to the southern portion of the state during the 1500s.

The protohistoric period has been identified and described in areas surrounding southeastern New Mexico (c.f. Hogan 2006). The Tierra Blanca Complex dates from A.D 1450 to 1650 and has been found at the northern end of the Llano Estacado. These remains consist both of jacal villages and hunting camps, likely inhabited by semi-sedentary corn growers and bison hunters who traded with the pueblos to the west. The Garza Complex is for the most part found along the upper Brazos River in Texas and dates from A.D. 1550 to 1700. Lone Mountain has encountered Garza points in southeastern New Mexico. This complex appears to consist of the remains of mobile hunters, while the Toyah Complex, dating from A.D. 1300 to 1700, represents an adaptation to expanding bison herds spreading farther south throughout central Texas and into Chihuahua. In the El Paso area, Lone Mountain archaeologists have identified a Cerro Rojo (Apache) Complex and a Canutillo (Manso) occupation, all dating from A.D. 1400 into the 1700s (Seymour 2004).

HISTORIC PERIOD (AFTER A.D. 1540/1600)

The Spanish first entered southeastern New Mexico prior to A.D. 1536, when Alvar Nuñez Cabeza de Vaca, surviving a shipwreck in the Gulf of Mexico, entered southeastern New Mexico from Texas, crossed into Arizona and made his way south into Mexico (Cabeza de Vaca 1983). Cabeza de Vaca's initial report concerning New Mexico led to a 1539 expedition by Fray Marcos de Niza. Cabeza de Vaca's and de Niza's reports in turn prompted Francisco Vázquez de Coronado to lead the 1540 expedition in search of riches to be found in the fabled cities of "Quivira" (Katz and Katz 1985). Southeastern New Mexico came to be used as a route by later Spanish explorers to areas north and east. Subsequent expeditions were led by Fray Agustin Rodríguez and Captain Francisco Sanchez Chamuscado in 1581,

Antonio de Espejo in 1582, Don Juan de Oñate y Salazar in 1598, and Gaspar Castaño de Sosa in 1590 (Kessell 1987).

By about 1630, the Apache were ranging as far south along the Pecos as the Seven Rivers area. During the early 1700s, Comanches and their allies drove the Apache from the Plains. The Apache settled in the Pecos Valley and in the mountains of southeastern New Mexico. By the early to mid-1800s, Comancheros (New Mexican traders) had established trade with the Pueblos, Comanche, and other residents of the Plains.

There were no permanent settlements in the area by Pueblo or Hispanic groups during the Spanish Colonial period (Olmstead 1975). Anglo ranchers began moving into the Canadian and Pecos River Valleys in the 1850s. The establishment of two military outposts, Hatch's Ranch in 1856 and Fort Sumner in 1862, emboldened Anglo and Hispanic settlers in the area. With the passage of the Homestead Act of 1862, substantial numbers of cattle ranchers and settlers moved into the area. Communities grew around the military outposts. The forts not only provided security from raids by Comanches, but also served as major markets for agricultural products before the arrival of the railroad, as well as presenting the opportunity for wage labor.

The era of cattle empires in eastern New Mexico lasted about 25 years. These operations were concentrated in two general areas, the Rio Hondo and Pecos River Valleys and the Canadian River Valley. In 1866 Oliver Loving and Charles Goodnight blazed a cattle trail from Texas to Denver by driving the herd west and then following the Pecos River north. The Goodnight-Loving Trail became an important route to Colorado and to the reservations of New Mexico and Arizona.

In 1872 John Chisum established his Chisum Ranch, which extended from near Roswell to Fort Sumner on the north and Seven Rivers on the south. Other large cattle operations in southeastern New Mexico include the LFD Ranch, the Diamond A, and the Eddy & Bissell Livestock Company. Sheep ranches were also present in the area. Captain Joseph Lea and Judge Edmund T. Stone raised sheep near Roswell. Unlike many other areas in the west, there was not a conflict between sheep and cattle ranchers. Massive droughts in the late 1880s largely destroyed the range. Many large outfits moved east onto the Llano, opening land for homesteaders.

Legislation facilitating the acquisition of public land, including the Kinkaid Homestead Act of 1904 and the Enlarged Homestead Act of 1909, encouraged more settlement in the area. Construction of the railroad in the late 1890s also brought in large numbers of homesteaders. In general, homesteaders practiced a mixture of herding and agriculture. Droughts and the Great Depression of the 1930s drove many from their land because subsistence farming and ranching on small plots was no longer feasible. The size of ranches and farms has been increasing since that time.

John F. Truitt set up a homestead on the Chisum Trail at the South Chisum Camp in the early 1890s. By 1894, a stage stop at that site was called Blake's Spring. Later in the decade the railroad built a siding there and named it Miller's Siding. The Post Office opened in 1899 in what was Stegman, New Mexico. The settlement came to be called Artesia upon the 1903 discovery of artesian water. This water attracted settlers to the area (Fugate and Fugate 1989). Some shallow oil wells in the Artesia area had been productive in the first decade of the twentieth century. Geologists in the 1920s began explorations for deeper oil reserves in Eddy County.

RESEARCH ORIENTATION

Most of the sites encountered during this survey are prehistoric. For this reason, we have highlighted a prehistoric research orientation based on the regional research design developed for the BLM, Development of Southeastern New Mexico Regional Research Design and Cultural Resource Management Strategy (Hogan 2006). A historic research orientation is presented after the prehistoric discussion. Efforts were made during the survey to collect sufficient and consistent data from each site in order address the topics and problem domains as specified by this document. The document proposes a site typology that might be used to address settlement patterns and then specifies a Chronology and Culture History Problem Domain, a Subsistence Strategies Problem Domain, a Settlement Systems/Mobility Patterns Domain, and an Environment Problem Domain.

Data derived from large-scale surveys can be highly useful in characterizing the occupation of an area from a variety of perspectives. Such data are particularly well suited to addressing questions related to settlement systems because such studies are, by nature, spatial in character. Additionally, numerous other types of questions can potentially be addressed using data from large-scale surveys. These questions

relate to chronology, adaptive strategies, cultural affiliation and interactions, and a number of other basic research questions within the problem domains specified above. Even if a particularly data-intensive Problem Domain such as the Environment cannot be directly addressed, or a site with nondiagnostic artifacts cannot be placed within a specific temporal or cultural taxon, survey data can be used to identify the sites capable of addressing these domains, should data recovery take place. In addition, results of surveys undertaken as a cultural resources management project can ensure that managing agencies are aware of these sites, and these potentially data-rich sites can be protected for future data recovery.

Lone Mountain therefore seeks primarily to address the first three Problem Domains (the Chronology and Culture History Problem Domain, the Subsistence Strategies Problem Domain, and the Settlement Systems/Mobility Patterns Problem Domain) and to identify contexts that may yield data concerning the Environment Problem Domain.

CHRONOLOGY AND CULTURE HISTORY

Perhaps the research themes that are most commonly addressed by survey data are those of chronology and cultural affiliation. This is because most archaeological inference is set in a foundation that is constructed on assumptions regarding these themes. For southeastern New Mexico, these issues remain poorly understood, despite the fact that a high percentage of work conducted in the state is carried out in this area and despite repeated and continued efforts to address these concerns.

This problem domain merits the lengthiest discussion, as placing a site accurately in a cultural context allows researchers to address other research problems with more meaningful data. For example, the intensification of subsistence activities that appears in the Late Archaic (Hogan 2006) would not be apparent unless the "Late Archaic" can be identified on the landscape. The correct identification of Archaic remains in southeastern New Mexico has been dependent on point typologies utilized by various researchers.

As discussed above and in greater detail in Hogan (2006), regional ceramic and projectile point chronologies are poorly developed to the extent that there are varying dates for the emergence of ceramic-producing groups and inconsistencies in the use of chronological frameworks. The Ceramic period has been variously cited as starting at A.D. 150, 200, 400, 500, 800, and 1000 depending on the sequence, the area within southeastern New Mexico, and the researcher. Similarly, Lord and Reynolds's (1985) work demonstrates that dated projectile point styles from the Waste Isolation Pilot Plant (WIPP) sites vary from the point chronologies developed by Leslie (1978) for much of the same part of southeastern New Mexico.

The problems may be in the data or in the typologies utilized by the archaeologists. If the problem is in the data, it may be that adaptive strategies and societal developments did not progress at the same rate, to the same degree, or through the same trajectory throughout the area. If one ignores the presence of Jornada Brown in Texas in the early part of the first millennium, and accepts the various pottery inception dates applied by archaeologists working in different parts of southeastern New Mexico, Jornada Brown is in the Sierra Blanca Mountains by A.D. 400, Brantley Reservoir by A.D. 500, and near Hobbs by A.D. 950. The linear march of a set of adaptations across the landscape over hundreds of years, when an individual may walk this territory over a period of days is not reasonable. Perhaps the material culture correlates of behavioral strategies are far subtler or need to be examined from a different perspective. These and similar questions are appropriate for this area. The inability to easily categorize the archaeology of this area may be a blessing in that it forces us to look beyond the basic, uninventive, and sometimes commonplace questions into issues that are more intriguing and meaningful.

There is a corollary set of very relevant behaviors that must be addressed in analyzing these data. These are the topological behaviors of archaeologists in addressing basic, uninventive, and sometimes commonplace questions. The most basic question becomes: if the temporal models and the data are not conforming to one another, is it the fault of the model or the data? While the above paragraph assumes that this is the fault of the data, we should also question the validity of our own assumptions.

If the problem is in the data, there are a number of reasons the archaeology of the area may be difficult to interpret using existing time and culture frameworks that work elsewhere. First, the area is on a frontier and along a major transportation and communication corridor that cuts through and connects a variety of distinct prehistoric culture areas, including those in Old Mexico, New Mexico, and Texas. These include the high cultures of northern Mexico (Casas Grandes), the pueblos of the Southwest (Piru Pueblos), and the nomadic Plains adaptation. The

Pecos River may be the most important factor confusing the categorization of cultural materials found in this area. Archaeologists from opposite sides of the river have different ways of categorizing the same materials. Confusion also relates in part to the fact that modern political boundaries often have the effect of shutting off the information flow between political entities. This is largely because different sets of permitted researchers are involved. Additionally, interaction with, and the influx of, a variety of distinct prehistoric culture groups who practice a variety of adaptive strategies may also contribute to the complexity of the record. This condition might also alter the nature of local populations, such that the physical and spatial correlates of an adaptation might look different. These are the key items that archaeologists would easily recognize through comparative analysis of prehistoric adaptations or through ethnographic, cross-cultural comparisons and analysis.

It is important to note that this predicament is not that unusual; the same circumstance pertains to the area around Safford, Arizona, an area west of the Hohokam area, but north of the San Simon Branch of the Mogollon, south of the Gila Mogollon, and west of the Mimbres. Its geographic location does not betray its classification, in that this is one of the more poorly understood areas in the state of Arizona, just as the southeastern portion of New Mexico is poorly understood. Thus, there is a belt of frontier, a band of intensive and sustained interaction and occupation, which extends from southeastern Arizona to southeastern New Mexico where adaptations are less distinctive than many areas (or are more generic), where borrowing of certain traits is apparent that contradict our often-used classifications, where the big sites often have a lot more in common with the small sites than they do with large sites in other culture areas, and where the typical correlates of adaptation do not make perfect typological sense.

The normal constructs, the typical correlates used in the construction of inference about prehistoric behavior, do not seem to apply in this area. This confounds archaeologists because, without an analytical framework to replace it, there has not been a foundation in which to interpret cultural finds. This applies to the southeastern portion of New Mexico in that, in contrast to many other areas, it is a place (1) where expedient groundstone is regularly found in association with decorated ceramics, but (2) ceramics are not typically associated with sedentism and agriculture, (3) where intensive use of and quality manufacture of bifaces are not diagnostically associated with a preceramic adaptation, and (4) where intrusive Chupadero Black-on-white ceramics are in some areas at least as common as the Jornada brownwares, (5) where expedient flaked-stone tools are consistently found in assemblages with formal tools rather than occurring in distinctly different types of sites that might represent differing degrees of mobility, and (6) where ceramic assemblages mimic those found in the Guadalupe Mountains but represent a different adaptation.

Despite the unembellished nature of the adaptation, cultural diversity and influence may be higher in this area than is typical of many other areas sharing these traits. That the project area is located in a transition area, where there is spatial interaction of a variety of groups and adaptations, undoubtedly contributes to the nature of the record. Yet, it may be that there is an intensive interaction of a number of different "unelaborated" groups that makes it difficult to pinpoint what is occurring. When more diversified and less generic groups interact there are usually more indicators that reveal the nature and intensity of the interaction. For example, when Gila Polychrome makes it debut, when Casas Grandes wares appear, when aboveground architecture or flexed burials are present, and so on, it is easy to infer that major changes and perhaps intensive interaction has occurred. But the lack of elaboration in material culture assemblages and the lack of variety in adaptive strategies in this area make it difficult to interpret what is happening. Therefore, researchers need to look for and examine other correlates that are perhaps more subtle in nature; Lone Mountain will attempt to identify these correlates as part of this and future projects.

If the fault is in the topological and typological models devised by archaeologists, then it has been in applying models derived from two different approaches. One approach is internally derived from within a given region and develops from the excavation of single type sites (such as the Merchant Site), or studies that may seem too narrowly focused on a given geographic area and do not take into account similar manifestations happening beyond the self-imposed borders of a study area (such as Leslie's point typology). The other approach to making assumptions is externally derived. Archaeologists who are more used to dealing with somewhat similar material in another contiguous region produce these sets of assumptions. The Jornada Mogollon of southeastern New Mexico are sufficiently different from their assumed kin in the Mimbres area, in the Casas Grandes area, and from their neighbors, the Southern Plains villagers, to make any archaeologist well-

versed in these neighboring cultural patterns and prone to applying typologies from these traditions produce some very confused data.

A further dimension of difficulty apparent to those who compare overlapping classificatory schemes is the tension between "lumpers" and "splitters." "Lumpers" prefer broad classifications that fit a variety of data, while "splitters" tend to create a category for each variation expressed by the data. It is certain than additional comparative research (such as that point typology recently published by Justice in 2002) and more absolute dates may bring these difficulties toward some resolution and may clarify inconsistencies.

The answer to this problem is to selectively compare the interpretations produced by these approaches. The appropriate data to select for interpretive purposes is that which fits well with other data (i.e., the simplest explanation is often the best). Contradicting data must not be thrown out; rather possible reasons for these contradictions should be examined. If it is not the fault of the model, then it is the fault of the data. Assessing conflicting typologies to select appropriate typologies will be a component of Lone Mountain's research program.

SUBSISTENCE STRATEGIES AND THE SETTLEMENT SYSTEMS/ MOBILITY PATTERNS PROBLEM DOMAINS

Survey can address these research domains in that the assemblage of artifacts and features when coupled with the environmental constraints implicit in a site's setting on the landscape may produce a set of hypotheses for future testing. A given site's setting (i.e. riparian, shinnery oak forest, montane) may provide a list of potential plant and animal resources available for consumption. Survey can also serve to identify areas where procurement and processing were focused.

Activities on a site, especially those that are subsistence related, can be inferred to a limited extent from surface assemblages. Projectile points and faunal remains are suggestive of hunting, certain tool types such as bifacial scrapers may be found in association with ring middens and may reflect a specific plant processing regimen, while groundstone and small clusters of fire-cracked rock found among stands of shinnery oak may reflect processing of acorns. Flaked-stone tools such as unifacial endscrapers similar to the Protohistoric Toyah Complex may be specific to a bison hunting adaptation. Specific varieties of groundstone coupled with permanent or semipermanent structures such as those found on or near the Merchant site may even reflect a subsistence strategy that is at least partially dependent on agriculture. Thus when Lone Mountain records a site during a survey, these are the data sets that are examined.

If a set of sites in a project area can be demonstrated to be roughly contemporary and the sites can be identified according a typology such as that proposed by Hogan (2006), some patterning that may address subsistence strategies as well as settlement and mobility may be evident. If other periods do not appear to adhere to a given pattern, then diachronic cultural processes become visible, a key component of developing a culture history of an area. Even if the data from a given project area is too small to invite comparison, the data may be used to develop a synthetic view at a later date.

Much of the work conducted has been in the way of small 5- to 10-acre surveys for well locations. These spotty surveys provide little chance for each individual project to contribute much to a broad scale synthetic perspective of the area. Yet, those archaeologists who work on these projects have seen a considerable amount of archaeology and can often precisely predict where sites will be and what the nature of sites will be. Thus, perhaps more is known than previously thought, despite theoretical predilections. Perhaps efforts to place sites and material culture into preexisting and inappropriate categories is the cause of confusion. Thus, Lone Mountain's research program in southeastern New Mexico has included taking Hogan's (2006) research design for a test drive to evaluate the taxa proposed therein as a means of sorting the data.

Three sets of historic data that sometimes overlap are present within the project area. One set of historic sites is domestic refuse dumps. These sites may contain data that address temporal placement, consumption, distribution of goods, and refuse-dumping behavior. Ranching-related facilities are also very common. These sites sometimes are indistinguishable from refuse scatters, but may contain an associated feature such a windmill or corral. The most distinctive set of historic data is that contained by historic well pad sites. The first oil derricks in the area were steam-powered and used a method called cable-tool drilling. A drill bit, shaped like a large chisel, was suspended from spring pole or walking beam, and then dropped down the bore hole to batter through the rock. These derricks had forges near the boreholes, the purpose of which was to maintain

the drill bits. This technique in drilling is still used in Appalachia and is also known as percussion drilling (Pees 2004).

The archaeological expression of this technology is typically a scatter of burned bricks, the remains of the forge. These derricks often had domestic structures on site and may be accompanied by domestic refuse that may be used to date the placement of the well. During the 1950s, steam power in American industry began to be replaced by diesel power, though steam engines were still marketed for the purpose of powering drill rigs into the 1960s (Pees 2004). These well pad sites may serve to date this transition in southeastern New Mexico, as smaller operators often did not make the investment in newer equipment at the same rate as the larger operators. There is quite often a lag between the introduction of a new technology and its universal adoption. Again, a domestic assemblage may be associated, as steam power requires that someone be on site 24 hours a day while the derrick is operating. Temporary housing may therefore have been present.

Between November 2, 2009 and March 23, 2010, archaeologists with Lone Mountain completed this Class III cultural resource survey. The pedestrian survey was conducted by walking parallel transects at 15-m (50-ft) intervals.

Thoras Dye served as field director, with other personnel including Randolph Davis, Andrew Zink, amd Zachary Shultheis serving as crew chiefs and crews containing some combination of Noel Pacheco, Francisco Britton, Victoria Menchaca, Judah Braunstein, and Tomasz Wasowski making up crews of two to four people as varying schedules permitted. The boundaries of project areas and those of transects were identified using landmarks, such as rivebanks, section corners, and usually a Garmin Rhino 110 Global Positioning System (GPS). Transects were walked either north/south or east/west depending on logistical and safety considerations, such as access and proximity to vehicles. When cultural remains predating 1960 were encountered, a determination was made as to whether they were an isolated occurrence or a site.

CULTURAL RESOURCE ASSESSMENT

ISOLATE DEFINITION

Isolated occurrences are cultural remains that do not qualify as sites. They generally consist of single artifacts or artifact scatters that are of extremely low density and are widely dispersed, and are indicative of a single or unintentional activity. Isolated occurrences may consist of:

1) Up to 10 prehistoric artifacts of the same general type. If artifact diversity is demonstrated, fewer than 10 artifacts may constitute a site.

2) A single, undateable feature, usually represented by a low density of burned rock with no stained sediments. If a trowel test reveals the presence of subsurface materials, however, the feature is classified as a site.

These definitions must apply to materials that are not related to other nearby isolates or sites (BLM 2005).

FEATURE DEFINITION

Some features are clearly identifiable as facilities (or the byproducts thereofconstructed to support human activity. Such phenomena caninclude slablined hearths, charcoal and ash stains, cairns, rock alignments, masonry concentrations, corrals, and rock art. The definition of "feature" in southeastern New Mexico, especially when the most common aboriginal feature type, the burned caliche or fire-cracked rock concentration, can vary from place top place, condition to condition, and often from observer to observer. A mound or scatter of thermally altered material may be the remains of a deflated thermal feature or evidence for the cleaning out of a nearby roasting pit. Sometimes a sheet of thermally altered rock or caliche may overlay several distinct ash and charcoal stains, making up individual features, though without invasive testing such a sheet can only be identified as one feature on a survey. "Concentrations", "scatters," and "features" all appear to share some degree of clustering of burned caliche or fire-cracked rock. Such a clustered scatter may therefore merely be an indication that facility was present or is in a buried context nearby.

SITE DEFINITION

As per the site definition provided by the BLM, sites are defined as any physical location of past human activities or events. Cultural resource sites are extremely variable in size, and range from a cluster of several objects or materials to structures with associated objects and features. A site may consist of secondarily deposited cultural resource remains. Features such as hearths, cairns, rock alignments, masonry concentrations, burned adobe, fire-cracked rock, cists, corrals, and rock art are generally recorded as sites. Sites also include definite locations of traditional cultural or religious importance to specified social and/or cultural groups (BLM 2005). Furthermore, sites are at least 50 years old, unless it can be demonstrated that a property has achieved exceptional importance within the past 50 years.

VARIATIONS IN SITE DEFINITION

There were a few variations to this general site definition that are implemented by Lone Mountain archaeologists:

1. A burned-caliche scatter lacking clustering by itself is not a site unless

a) there are buried deposits (meaning ash or charcoal), or,

b) there is a possibility for buried deposits (e.g., it's found in blowouts with dunes between).

2.Burned caliche associated with fewer than 10 artifacts is considered an isolated occurrence in the absence of buried deposits.

3.Burned caliche associated with fewer than 10 artifacts is considered a site if there are buried deposits or if there is a high diversity of artifact types.

4. Burned caliche associated with 10 or more artifacts is considered a site.

5. Burned caliche associated with 10 or more artifacts and buried deposits is considered a Category 2 site.

6. A surficial artifact scatter consisting of 100 or more artifacts will likely be considered a significant cultural resource by the Historic Preservation Division (HPD) unless substantial redundancy in the assemblage can be demonstrated, or post-depositional disturbance has clearly destroyed the original integrity of the resource.

SITE RECORDING

When sites were encountered, boundaries were defined using BLM guidelines. Site boundaries were drawn beyond the last artifacts on the site periphery (the "last" artifacts being those without any other cultural materials in a 20-m [65-ft] radius). This guideline was generally followed, although in some instances (such as in dune fields where there is an almost continuous distribution of isolated pieces of burned caliche), small or isolated pieces of burned caliche may be encountered outside the delineated site boundary. In each instance, however, a definite and marked decrease in the amount and density of cultural material was demonstrated and documented. Sites that were partially located in the survey area were recorded in their entirety, providing that access to adjoining land was allowed.

Sites were recorded using Lone Mountain's site recording form. A sketch map was drawn, including site boundaries, source and receiver points in or near the site, features, concentrations of artifacts, individual diagnostic artifacts and those associated with features, the site datum, drainages or other physiographic reference points, topographic contours, modern objects (roads, pipelines, powerlines, fences, etc.), and overstory vegetation (if present). Maps were aligned with true north and were drawn to the largest scale feasible to record the maximum amount of detail and accuracy. Black-and-white or color photographs were taken on sites with unique artifacts or features, or evidence of structures. A metal datum spike and aluminum tag with the site's field number (LMAS 908-01-#), date, and initials of recording personnel was placed on the site and plotted on the site map. GPS coordinates were also recorded for the datum and for any collected artifacts, as well as isolated occurrences. The location, size, and shape of the site were plotted on the USGS 7.5' quadrangle and the project-specific maps provided by the surveyors, which have the seismic grid line plotted (preplots). Notes were made of the centerline flags closest to the site to facilitate site avoidance and rerouting.

A representative sample of artifacts from each site was recorded using Lone Mountain's recording artifact forms and size templates. In most cases, if fewer than 25 of any type of artifact were found, all were recorded in the field. Otherwise, a judgmental sample of each type was selected in order to characterize all existing material types and reduction stages of debitage, all ceramic types, all groundstone forms, and all historic artifact types. Additional notes were taken to convey other pertinent information that may not be evident from the sample, such as a dominant flaked-stone technology or lithic material type. Unless vast numbers were found, all flaked-stone tools and rim sherds were recorded, as these artifacts usually provide the best information regarding cultural and temporal affiliations of the site.

PREVIOUSLY RECORDED SITES

Previously recorded sites were recorded using the same Lone Mountain forms, and their locations and sizes were reevaluated. If discrepancies were found between previously recorded information and the observed materials during the revisit, a sample of artifacts was recorded. Data pertaining to BLM category and National Register of Historic Places (NRHP) evaluation were obtained or reassessed, and maps were redrawn. If the original site recorders did not place a datum (or it could not be found), a datum spike and tag with the site's LA number were placed, and sites were plotted accurately on the USGS quadrangle and preplot maps.

EVALUATION AND ELIGIBILITY

Sites were further evaluated as to their NRHP eligibility status. The key criterion was the potential of the site to contain additional data relevant to future research (NRHP Criterion D). In the case of prehistoric sites, the potential for important additional data was often dependent on the presence or absence of bur-

ied cultural deposits. On each site, the possibility of buried cultural deposits was assessed by a variety of means. Observations were noted regarding the likelihood of buried cultural deposits based on several characteristics. For example, indications of potential site depth include stratigraphic soil profiles exposed along road cuts and arroyos or cultural materials in the back-dirt piles of rodent burrows. However, even a deflated site may be considered eligible for nomination to the NRHP, especially if more than 100 artifacts are present.

Criteria A, B, and C rarely apply to the most common site types in the region (i.e., aboriginal artifact scatters or thermal feature sites); however, these criteria were evaluated when appropriate, taking into account the regional historic context of ranching and oil and gas extraction.

BURIED CULTURAL DEPOSITS

On each site, the possibility of buried deposits (subsurface ash, charcoal, stained soil, burned rock, or artifacts) was assessed based on a variety of site characteristics. For example, when burned caliche and/or artifacts are scattered in disarray at the bottom of a single dune blowout, the site is likely deflated and has no depth potential. When burned caliche and/or artifacts are eroding out of the side of a dune and are found on the slopes of the dune, there is a possibility for intact buried deposits. When burned caliche is found at the bottom of more than one blowout and there are dunes between these blowouts, there is a likelihood for buried cultural deposits in the intervening dunes. Other indications of potential site depth include stratigraphic soil profiles exposed along road cuts and arroyos, and artifacts or thermal by-products in animal burrow backdirt piles.

DESCRIPTION AND ANALYSIS OF RECORDED RESOURCES

Cultural resources encountered during the survey include 87 new sites and nine previously recorded sites for a total of 96 sites (Appendix A), and 183 isolated occurrences (IOs) (Appendix A). These are described in this section.

ISOLATED OCCURRENCES

One hundred and eighty-three isolated occurrences were identified during the survey and are presented in Table 3.1 in detail.

Table 3.1: Isolated Occurrences.

IO No.	Description	Parcel
1	One transparent brown chalcedony uniface, complete (37 mm x 27 mm x 8 mm); one transparent white chalcedony secondary flake, complete, 10 percent cortex (39 mm x 28 mm x 11 mm); one brown chert tertiary flake, complete (39 mm x 25 mm x 3 mm)	2
2	One transparent brown chalcedony tertiary flake, complete (19 mm x 11 mm x 2 mm)	2
3	A single deflated scatter of 18 pieces of burned caliche with no observed staining in trowel test, no artifacts present (1.75 m x 1.50 m)	2
4	One brown chert tertiary flake, broken (30 mm x 21 mm x 3 mm)	2
5	One brown sandstone basin metate fragment, heavily used on two sides (6.0 cm x 4.5 cm x 1.0 cm)	2
6	One gray chert tertiary flake, complete (33 mm x 32 mm x 13 mm); one purple quartzite uniface, complete (45 mm x 30 mm x 15 mm); one dark gray multidirectional core, exhausted (36 mm x 27 mm x 20 mm); one light brown chert tertiary flake, broken (12 mm x 10 mm x 2 mm)	2
7	One transparent brown and white chalcedony primary flake, complete (37 mm x 30 mm x 13 mm)	2
8	One transparent white and brown chalcedony multidirectional core, not exhausted (45 mm x 36 mm x 30 mm); one unknown brownware sherd (4 mm thick)	2
9	A single deflated scatter of 15 pieces of burned caliche with no observed staining in trowel test, no artifacts present (1.5 m x 1.0 m)	2

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
10	One brown chert uniface, broken (22 mm x 32 mm x 5 mm)	2
11	One brown chert hammerstone/multidirectional core, complete (83 mm x 76 mm x 50 mm)	2
12	One transparent white chalcedony secondary flake, broken, 5 percent cortex (14 mm x 11 mm x 3 mm)	2
13	One brown sandstone one-hand mano, complete, moderately used on one side (11.0 cm x 9.5 cm x 4.5 cm)	2
14	One gray chert primary flake, broken (40 mm x 31 mmx 14 mm); 20 brown sandstone metate fragments, heavily used on one side (2 cm in diameter)	2
15	One brown chert uniface, complete (50 mm x 33 mm x 5 mm)	2
16	One transparent white and red chalcedony primary flake, complete (28 mm x 25 mm x 3 mm)	2
17	One transparent white and brown chalcedony primary flake, complete (41 mm x 30 mm x 13 mm)	2
18	One transparent light gray chalcedony secondary reduction flake, complete, 10 percent cortex (48 mm x 29 mm x 10 mm)	2
19	One red chert multidirectional core, exhausted (34 mm x 23 mm x 19 mm)	2
20	One red chert secondary flake, complete, 15 percent cortex (31 mm x 25 mm x 12 mm)	2
21	One El Paso brownware sherd (5 mm thick)	2
22	One dark gray chert multidirectional core, not exhausted (63 mm x 30 mm x 29 mm)	2
23	One transparent white chalcedony tertiary flake, complete (32 mm x 19 mm x 10 mm); one brown chert secondary reduction flake, broken, 5 percent cortex (27 mm x 17 mm x 6 mm)	2
24	Two El Paso brownware sherds (6 mm thick)	2
25	One gray chert tertiary flake, complete (16 mm x 12 mm x 2 mm)	2
26	One white chert secondary flake, complete, 5 percent cortex (35 mm x 27 mm x 5 mm)	2
27	One light brown chert secondary flake, complete, 30 percent cortex (42 mm x 30 mm x 9 mm)	2
28	One El Paso brownware sherd (5 mm thick)	2
29	One brown chert primary flake, complete (27 mm x 20 mm x 8 mm)	2
30	One white and brown chert tertiary flake, complete (37 mm x 39 mm x 8 mm)	2
31	One gray and brown chert secondary flake, broken, 40 percent cortex (35 mm x 31 mm x 14 mm)	2
32	One gray chert tertiary flake, complete (55 mm x 40 mm x 20 mm)	2
33	One piece of orange chert angular debris (39 mm x 31 mm x 18 mm); one red and gray chert tertiary flake, complete (20 mm x 18 mm x 6 mm); one red and gray chert secondary flake, complete, 20 percent cortex (30 mm x 14 mm x 12 mm); one piece of red chert angular debris (32 mm x 26 mm x 24 mm); all artifacts in a 20 m x 20 m area	2
34	One red and orange chert secondary flake, complete, 40 percent cortex (42 mm x 38 mm x 12 mm)	2
35	One gray and white chert primary flake, complete (41 mm x 23 mm x 22 mm)	2

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
36	One purple quarzite primary flake, 100 percent cortex showing distinct platform, bulb, and scars, evident edge wear (43 mm x 26 mm x 11 mm)	4
37	One gray chert scraper, 80 percent cortex, primary flake reduced with unifacial edging, evidence of edge wear and retouching (45 mm x 38 mm x 10 mm)	4
38	One gray basalt one-handed mano, heavy useage on two sides, medium grained (100 mm x 45 mm x 23 mm)	4
39	One gray rhyolite primary flake chopper, showing unifacial knapping along edge, retouch and edge wear present (78 mm x 70 mm x 26 mm)	4
40	One gray rhyolite chopper, split cobble with unifacial flaking, 90 percent cortex (80 mm x 60 mm x 22 mm)	4
41	One gray quartzite primary tested gravel flake, 100 percent cortex (4.7 cm x 4.2 cm x 1.9 cm); one brown limestone primary flake, complete, 90 percent cortex (37 mm x 33 mm x 6 mm)	4
42	One purple quartizite unidirectional core with smooth-lipped platform, 80 percent cortex (81 mm x 75 mm x 75 mm); one complete brown chert teriary flake, smooth platform, no cortex present (32 mm x 19 mm x 5 mm); one brown quartzite secondary flake, broken, battered platform, 20 percent cortex (39 mm x 25 mm x 7 mm)	4
43	One brown chert complete utilized flake, smooth broad platform, shows edge wear (30 mm x 30 mm x 5 mm)	4
44	One light yellow chert uniface, complete, unifacially flaked and retouched, 10 percent cortex (45 mm x 39 mm x 10 mm)	4
45	One complete purple quartzite hammerstone/core, flaked bifacially, 70 percent cortex (83 mm x 75 mm x 51 mm)	4
46	One broken brown quartzite secondary flake, battered broad platform, 30 percent cortex (67 mm x 50 mm x 20 mm)	4
47	One complete red chert tertiary flake, a battered platform, no cortex present (33 mm x 18 mm x 8 mm)	4
48	One complete purple quartzite primary flake, smooth-lipped platform, 80 percent cortex (48 mm x 30 mm x 13 mm)	4
49	One complete brown quartzite tertiary flake, uneven platform, no cortex present (35 mmx 24 mm x 8 mm)	4
50	One complete purple quartzite secondary flake, smooth platform, 10 percent cortex (50 mm x 35 mm x 19 mm)	4
51	One complete light gray chert secondary flake, lipped platform, 40 percent cortex (25 mm x 23 mm x 5 mm)	4
52	One complete gray chert uniface flake, retouched, 10 percent cortex (64 mm x 43 mm x 11 mm); one complete brown chert secondary flake, battered platform, 10 percent cortex (31 mm x 27 mm x 6 mm)	4
53	One broken manganese decolorized (amethyst) glass bottle, no neck, side seam, bubbles in glass, no makers mark present (base 77 mm x 35 mm)	4

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
54	One complete gray chert tertiary flake, smooth-lipped platform, no cortex present (35 mm x 28 mm x 6 mm); one broken purple quartzite tertiary (core-reduction) flake, no cortex present (49 mm x 45 mm x 15 mm); one large gray quartzite secondary core-reduction flake, battered platform, 10 percent cortex (65 mm x 50 mm x 10 mm)	4
55	One complete red chert primary flake, smooth platform, 65 percent cortex (28 mm x 19 mm x 6 mm); one complete gray chert utilized flake, evidence of edge wear, no cortex present (30 mm x 27 mm x 5 mm)	4
56	One brown quartzite bifacially flaked core, not exhausted, 90 percent cortex (85 mm x 56 mm x 25 mm)	4
57	One brown and white chert projectile point, broken tip (48 mm x 44 mm x 6 mm) (Figure 3.1)	4
58	One light gray transparent chalcedony core, multi-directional flaking, not exhausted, 5 percent cortex (65 mm x 64 mm x 30 mm)	4
59	One complete gray chert secondary flake, lipped platform, 5 percent cortex (38 mm x 27 mm x 12 mm)	4
60	Five pieces of white stoneware ceramic, white paste, white paint with glaze, possible dinner plate (average piece size 66 mm x 46 mm x 8 mm)	4
61	One complete pink chert thinning flake, battered lipped platform, no cortex present (21 mm x 18 mm x 3 mm)	4
62	One complete light gray chert primary flake, smooth-lipped platform, 80 percent cortex (37 mm x 28 mm x 8 mm)	4
63	One complete gray chert secondary flake, cortex lipped platform, 10 percent cortex (29 mm x 15 mm x 5 mm)	4
64	One complete purple quartzite secondary flake, cortex lipped platform, 15 percent cortex	4
65	One red chert multidirectional core, exhausted (25 mm x 25 mm x 18 mm); one complete gray chert secondary flake, 10 percent cortex (30 mmx x28 mm x 13 mm); one broken purple quartzite secondary flake, 10 percent cortex (40 mm x 42 mm x 7 mm); one broken purple quartzite tertiary flake, no cortex present (20 mm x 13 mm x 4 mm)	4
66	One broken gray chert secondary flake, 30 percent cortex (16 mm x 15 mm x 4 mm); one complete gray chert secondary flake, 50 percent cortex (21 mm x 26 mm x 4 mm)	4
67	One complete purple quartzite secondary flake, 30 percent cortex (46 mm x 33 mm x 15 mm); one broken purple quartzite tertiary flake, no cortex present (30 mm x 31 mm x 6 mm)	4
68	One complete brown chert primary flake, no cortex present (67 mm x 48 mm x 10 mm)	4
69	One broken purple quartzite tertiary flake, no cortex present (25 mm x 25 mm x 6 mm)	4
70	One unidirectional purple quartzite core, not exhausted (110 mm x 100 mm x 55 mm); one complete purple quartzite tertiary flake, no cortex present (35 mm x 21 mm x 6 mm); one complete brown chert teritary flake, no cortex present (18 mm x 18 mm x 4 mm)	4
71	One purple quartzite bifacially tested cobble core, 80 percent cortex (75 mm x 70 mm x 65 mm)	4
72	One complete purple quartzite secondary flake, cortex platform, 10 percent cortex (63 mm x 42 mm x 15 mm)	4
73	One light brown chert angular debris flake, no cortex present (45 mm x 27 mm x 7 mm)	4

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
74	One complete purple quartzite teriary flake, battered platform, no cortex present (63 mm x 43 mm x 9 mm); one complete brownn rhyolite uniface, no cortex present (61 mm x 46 mm x 15 cm); one complete purple quartzite tertiary flake, broad platform, no cortex present (35 mm x 30 mm x 9 mm)	4
75	One gray granite multidirectional core, 15 percent cortex (98 mm x 50 mm x 21 mm)	4
76	One complete transparent white chalcedony secondary flake, cortex platform, 50 percent cortex (83 mm x 50 mm x 20 mm); one complete black basalt primary flake, 40 percent cortex (56 mm x 47 mm x 15 mm)	4
77	One complete light gray tertiary flake, no cortex present (38 mm x 19 mm x 9 mm); one complete purple quartzite secondary flake, cortex platform; 15 percent cortex (61 mm x 38 mm x 10 mm)	4
78	One complete gray chert secondary flake, 20 percent cortex (66 mm x 50 mm x 22 mm); one complete green quartzite primary flake, 100 percent cortex (51 mm x 28 mm x 21); flakes are located 2 meters apart	4
79	One complete purple quartzite primary flake, 100 percent cortex (52 mm x 36 mm x 14 mm); one purple quartzite tested cobble, not exhausted, 60 percent cortex (70 mm x 61 mm x 52 mm); artifacts are located 5 m apart	4
80	One complete purple quartzite secondary flake, 40 percent cortex, (46 mm x 31 mm x 18 mm); five burned caliche fragments (5 cm to 10 cm size): all artifacts located within a 2-m diameter area	4
81	One Chupadero sherd (Figure 3.2), unknown vessel form, no design, collected (6 mm thick); one complete purple quartzite tertiary flake, no cortex present (32 mm x 21 mm x 6 mm); 15 burned caliche fragments, approximately ten are <3 cm in size, (2 cm to 8 cm in size); all artifacts are located within a 4-m (E/W) x 2-m (N/S) area prone to washing	4
82	One purple quartzite tested cobble, not exhausted, two flake scars, 80 percent cortex (111 mm x 58 mm x 49 mm); one complete purple quartzite tertiary flake no cortex present (41 mm x 28 mm x 9 mm); one complete black siltstone secondary flake, 30 percent cortex (42 mm x 40 mm x 8 mm); all artifacts located within a 16-m (N/S) x 5-m (E/W) area	4
83	One brown quartzite bidirectional core, not exhausted, 40 percent cortex (96 mm x 81 mm x 42 mm); one brown chert angular debris, 5 percent cortex (3 cm)	4
84	35 pieces of burned caliche (3 cm to 15 cm in size), scattered within a 30 meter area; one purple quartzite core, not exhausted, 60 percent cortex (122 mm x 75 mm x 52 mm); one complete purple quartzite secondary flake, 60 percent cortex (43 mm x 22 mm x 8 mm); artifacts are located along the southern boundary of the project area within a 30-m x 5-m area	4
85	One purple quartzite multidirectional core, not exhausted, 50 percent cortex (76 mm x 59 mm x 53 mm)	4
86	One complete light gray chert tertiary flake (26 mm x 9 mm x 3 mm); two burned caliche fragments (6 cm and 3 cm); all artifacts are within a single blowout (10 m N/S x 5 m E/W)	5
87	One broken clear white mottled chalcedony secondary flake (31 mm x 26 mm x 11 mm)	5
88	One gray chert multidirectional core, not exhausted, 60 percent cortex (51 mm x 48 mm x 32 mm)	5
89	One purple quartzite multidirectional core, exhausted (42 mm x 41 mm x 19 mm); one clear and brown chalcedony secondary flake, broken, 30 percent cortex (20 mm x 19 mm x 8 mm)	2
90	One brown chert uniface, complete (32 mm x 21 mm x 10 mm)	2

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
91	One gray and brown chert multidirectional core, not exhausted (65 mm x 62 mm x 51 mm)	2
92	A single deflated scatter of 15 pieces of burned caliche with no observed staining in trowel test (1.5 m x 1.0 m); one pink chert tertiary flake, complete (11 mm x 9 mm x 3 mm); one purple quartzite uniface, complete (58 mm x 32 mm x 15 mm); one black and clear chalcedony secondary flake, broken, 10 percent cortex (21 mm x 15 mm x 5 mm); all artifacts located in a 15-m x 5-m area	2
93	A single deflated scatter of 10 pieces of burned caliche with no observed staining in trowel test (10 m x 8 m); one gray chert multidirectional core, not exhausted (60 mm x 49 mm x 41 mm)	2
94	One light gray with brown chert tested cobble, unifacially flaked, 80 percent cortex (100 mm x 72 mm x 51 mm); one broken purple quartzite primary flake, battered platform, 90 percent cortex (63 mm x 47 mm x 20 mm); one complete brown rhyolite secondary flake, 10 percent cortex (38 mm x 29 mm x 10 mm); one broken dark brown chert tertiary flake, no cortex present (29 mm x 12 mm x 5 mm)	4
95	One complete white chert tertiary flake, lipped platform, no cortex present (43 mm x 32 mm x 9 mm); one light gray bifacially tested gravel, 45 percent cortex (53 mm x 41 mm x 18 mm)	4
96	One gray chert multidiredtional core, 5 percent cortex (69 mm x 52 mm x 40 mm);	4
97	One metal rusted crushed hole in cap can, stamped ends, crimped seam	4
98	One complete gray quartzite biface tool, no retouch, no cortex present (80 mm x 69 mm x 24 mm); one complete red chert secondary flake, lipped platform, 40 percent cortex (44 mm x 25 mm x 9 mm); one broken light yellow and orange chert primary flake, battered platform, 100 percent cortex (31 mm x 28 mm x 8 mm); one complete light gray chert teriary flake, no cortex present (32 mm x 25 mm x 5 mm)	4
99	One complete white chert secondary flake, lipped cortex platform , 20 percent cortex (51 mm x 37 mm x 13 mm)	4
100	One broken purple quartzite secondary flake, cortex platform, 15 percent cortex (66 mm x 43 mm x 15 mm)	4
101	One complete brown quartzite secondary flake, broad-lipped platform, 5 percent cortex (77 mm x 58 mm x 18 mm)	4
102	One rusted crushed beverage can with crown cap intact; one rusted and crushed baking powder can, exterior friction lid intact, crimped seam and end; one rusted can, interior friction lid intact, crimped seam and end	4
103	One complete transparent brown chalcedony tertiary flake, broad platform, no cortex present (56 mmx x43 mm x 10 mm); one light gray chert unifacially retouched flake, cortex on lipped platform, 5 percent cortex (48 mm x 33 mm x 7 mm); one complete brown quartzite secondary flake, cortex platform, 10 percent cortex (43 mm x 35 mm x 10 mm)	4
104	One complete gray quartzite secondary flake, broad-lipped platform, 5 percent cortex (64 mm x 41 mm x 10mm); one complete brown chert primary flake, cortex platform, 100 percewnt cortex (54 mm x 40 mm x 10 mm); one complete brown quartzite primary flake, broad platform, 90 percent cortex (47 mm x 33 mm x 9 mm)	4
105	One broken gray chert teriary flake, battered platform, no cortex present; one light gray unifacially flaked core, 90 percent cortex (45 mm x 41 mm x 20 mm)	4

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
106	One complete white chert tertiary flake, battered platform, no cortex present (33 mm x 24 mm x 9 mm)	4
107	One purple quartzite unifacially flaked core, 50 percent cortex (55 mm x 53 mm x 21 mm)	4
108	One complete gray quartzite chopper, unifacially flaked (120 mm x 73 mm x 27 mm)	5
109	One complete gray quartzite chopper, bifacially flaked (145 mm x 140 mm x 70 mm); one complete pink chert tertiary flake, no cortex present (40 mm x 35 mm x 8 mm); one broken gray quartzite tertiary flake, no cortex present (66 mm x 40 mm x 9 mm)	5
110	One complete gray with red chert scraper, bifacially flaked and retouched (35 mm x 33 mm x 9 mm)	5
111	One complete light gray and black chert uniface, unifacially retouched (47 mm x 34 mm x 8 mm); one complete light gray chert primary flake, broad platform, 90 percent cortex (60 mm x 38 mm x 15 mm); one complete light brown chert teriary flake, lipped platform, no cortex present (34 mm x 23 mm x 3 mm)	5
112	One complete light gray chert scraper, unifacially flaked and retouched (48 mm x 30 mm x 18 mm); one complete gray quartzite secondary flake, lipped platform, 15 percent cortex (44 mm x 25 mm x 11 mm)	5
113	One broken white chert tertiary flake, no cortex present (13 mm x 11 mm x 3 mm)	5
114	One complete light gray biface tool, retouched (48 mm x 32 mm x 6 mm); one clear flat window frame fragment, 3/8" width, scattered within a 3 meter square area	5
115	One brown sandstone basin metate fragment, heavily used on two sides (130 mm x 90 mm x 30 mm)	5
116	One complete purple quartzite chopper, bifacially flaked, 90 percent cortex (110 mm x 80 mm x 55 mm)	5
117	One complete white and light brown chert uniface, retouched unifacially, 20 percent cortex (63 mm x 39 mm x 15 mm)	5
118	One complete gray quartzite secondary flake, cortex platform, 100 percent cortex (81 mm x 55 mm x 29 mm); one broken gray quartzite primary flake, cortex platform, 100 percent cortex (31 mm x 25 mm x 10 mm); one complete gray chert secondary flake, lipped cortex platform, 5 percent cortex (41 mm x 38 mm x 5 mm)	5
119	One broken yellow chert secondary flake, 10 percent cortex (42 mm x 40 mm x 4 mm); one broken gray chert secondary flake, cortex platform, 60 percent cortex (30 mm x 27 mm x 7 mm)	5
120	One broken transparent light gray chalcedony secondary flake, 50 percent cortex (51 mm x 27 mm x 18 mm)	5
121	One complete transparent light gray chalcedony secondary flake, lipped platform, 5 percent cortex (23 mm x 17 mm x 4 mm)	5
122	One complete gray quartzite primary flake, narrow cortex platform, 30 percent cortex (50 mm x 48 mm x 10 mm); one broken white chert primary flake, 20 percent cortex (33 mm x 25 mm x 5 mm); one complete transparent light brown chalcedony primary flake, cortex platform, 15 percent cortex (80 mm x 75 mm x 28 mm); one broken brown rhyolite secondary flake, broad cortex platform, 10 percent cortex (50 mm x 31 mm x 11 mm)	5
123	One complete brown quartzite tertiary flake, broad-lipped platform, no cortex present (57 mm x 53 mm x 12 mm)	5
124	One broken gray quartzite chopper, bifacially flaked (124 mm x 100 mm x 55 mm)	5
125	One multidirectional purple quartzite core, not exhausted, 30 percent cortex (65 mm x 50 mm x 25 mm)	5

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
126	One multidirectional purple quartzite core, not exhausted, no cortex present (90 mm x 73 mm x 20 mm)	5
127	One El Paso brownware sherd; one complete dark gray quartzite secondary flake, broad cortex platform, 5 percent cortex (50 mm x 38 mm x 12 mm); one gray quartzite bifacially flaked core, not exhausted, 80 percent cortex (110 mm x 50 mm x 46 mm)	5
128	One complete brown quartzite secondary flake, broad cortex platform, 15 percent cortex (60 mm x 41 mm x 20 mm)	5
129	One complete gray quartzite primary flake, lipped platform, 100 percent cortex (65 mm x 53 mm x 26 mm)	5
130	One complete brown chert biface tool (52 mm x 43 mm x 10 mm)	5
131	One complete brown quartzite scraper, unifacially retouched, 20 percent cortex (77 mm x 65 mm x 20 mm)	5
132	One complete brown limestone secondary flake, lipped platform, 10 percent cortex (62 mm x 45 mm x 11 mm)	5
133	One complete white chert secondary flake, lipped platform, 5 percent cortex (2.7 mm x 2 mm x 5 mm)	5
134	One complete brown quartzite secondary flake, cortex platform, 20 percent cortex, 20 percent cortex (90 mm x 8 mm x 20 mm)	5
135	One complete gray and brown chert primary flake, cortex platform, 50 percent cortex (46 mm x 31 mm x 12 mm)	5
136	One broken gray chert tertiary flake, no cortex present (41 mm x 21 mm x 8 mm)	5
137	One broken gray chert primary flake, battered platform, 100 percent cortex (65 mm x 52 mm x 9 mm); one complete gray quartzite secondary flake, 50 percent cortex (43 mm x 31 mm x 8 mm)	5
138	One white chert whole flaked and retouched uniface, 20 percent cortex (46 mm x 30 mm x 11 mm); one complete tan chert secondary flake, battered platform, 10 percent cortex (60 mm x 25 mm x 5 mm); one broken gray chert primary flake, battered platform, 100 percent cortex (31 mm x 27 mm x 4 mm); one broken gray quartzite secondary flake, 20 percent cortex (46 mm x 30 mm x 10 mm)	5
139	One gray with brown chert multidirectional flaked core, 10 percent cortex (63 mm x 53 mm x 30 mm); one complete gray quartzite secondary flake, cortex platform flaked on lateral side at sharp angle, 90 percent cortex (91 mm x 43 mm x 12 mm); one broken white chert secondary flake, lipped platform, 30 percent cortex (39 mm x 35 mm x 4 mm); one broken purple quartzite primary flake, battered platform, 60 percent cortex (34 mm x 28 mm x 7 mm); one broken gray quartzite primary flake, broad-lipped platform, 15 percent cortex (67 mm x 58 mm x 11 mm)	5
140	One broken gray chert biface tool, missing proximal end, no cortex present (52 mm x 43 mm x 5 mm); one complete brown with gray chert tertiary flake, narrow battered platform, no cortex present (26 mm x 22 mm x 6 mm); one broken brown with red chert tertiary flake, broad-lipped platform, no cortex present (32 mm x 26 mm x 7 mm)	5
141	One complete pink chert primary flake, cortex platform, 90 percent cortex (55 mm x 33 mm x 20 mm)	5
142	One complete red/brown chert secondary flake, cortex platform, 30 percent cortex.	5

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
143	One complete gray quartzite secondary flake, cortex platform (96 mm x 68 mm x 26 mm); one broken brown chert primary flake, lipped platform, 100 percent cortex (57 mm x 36 mm x 12 mm); one broken brown quartzite secondary flake, cortex platform, 10 percent cortex (53 mm x 31 mm x 9 mm); one complete brown quartzite secondary flake, cortex platform, 50 percent cortex (73 mm x 61 mm x 11 mm)	5
144	One complete brown quartzite primary flake, broad-lipped platform, 90 percent cortex (97 mm x 72 mm x 22 mm); one broken gray quartzite tertiary flake, no cortex present (31 mm x 24 mm x 4 mm); one broken white chert secondary flake, cortex platform, 10 percent cortex (23 mm x 19 mm x 5 mm)	5
145	One complete gray quartzite primary flake, broad cortex platform, 100 percent cortex (95 mm x 83 mm x 30 mm)	5
146	One broken gray quartzite secondary flake, broad platform, 15 percent cortex (72 mm x 40 mm x 10 mm); one broken transparent white chalcedony secondary flake, 20 percent cortex (31 mm x 3 mm x 11 mm); one complete white chert secondary flake, cortex platform, 5 percent cortex (36 mm x 19 mm x 12 mm)	5
147	One broken brown chert primary flake, broad platform, 100 percent cortex (43 mm x 24 mm x 10 mm)	5
148	One complete purple quartzite secondary flake, broad-lipped platform, 40 percent cortex (61 mm x 41 mm x 16 mm); one complete gray quartzite tertiary flake, broad platform, no cortex present (49 mm x 38 mm x 13 mm); one complete gray quartzite secondary flake, broad platform, 15 percent cortex (78 mm x 57 mm x 15 mm)	5
149	One complete gray quartzite secondary flake, battered platform, 45 percent cortex (50 mm x 43 mm x 16 mm); one broken white chert primary flake, narrow platform, 90 percent cortex (23 mm x20 mm x 5 mm); one complete gray quartzite chopper bifacially flaked on one end of flat cobble, 80 percent cortex (95 mm x 80 mm x 33 mm)	5
150	One complete green quartzite primary flake, broken platform, 85 percent cortex (43 mm x 38 mm x 10 mm); one gray quartzite bifacialy flaked core, 70% cortex (120 mm x 111 mm x 60 mm)	5
151	One complete purple quartzite secondary flake, broad platform, 20 percent cortex (69 mm x 50 mm x 15 mm); one broken light gray chert tertiary flake, no cortex present (20 mm x 21 mm x 4 mm); one broken light brown chert tertiary flake, no cortex present (21 mm x 19 mm x 5 mm); one broken white chert tertiary flake, no cortex present (1.8 mm x 1.5 mm x 3 mm)	5
152	One complete purple quartzite tertiary flake, narrow battered platform, no cortex present (62 mm x 39 mm x 10 mm); one broken transparent light brownchalcedony secondary flake, 5 percent cortex (21 mm x 18 mm x 4 mm)	5
153	A single deflated scatter of 13 pieces of burned caliche with no observed staining, no artifacts present (5 m x 5 m)	1
154	Twelve pieces of manganese decolorized (amethyst) bottle glass from a single vessel	1
155	One gray and white chert tertiary flake, complete (34 mm x 12 mm x 4 mm)	1
156	One gray and orange chert primary flake, complete (43 mm x 31 mm x 12 mm); one piece of clear and red angular debris (43 mm x 31 mm x 26 mm); five scattered pieces of burned caliche with no visible staining present (10 m x 15 m area)	1

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
157	One white and orange chert primary flake, complete (39 mm x 29 mm x 11 mm); twelve pieces of burned caliche with no visible staining present (20-m x 20-m area)	1
158	One dark gray basalt uniface, complete (37 mm x 30 mm x 5 mm); one piece of red chert angular debris, broken (19 mm x 15 mm x 5 mm)	1
159	One brass survey marker, dated "1916"; one transparent white chalcedony secondary flake, complete, 20 percent cortex (37 mm x 30 mm x 10 mm)	1
160	One transparent white chalcedony primary flake, complete (36 mm x 27 mm x 7 mm)	1
161	One brown sandstone one-hand mano, complete, moderately used on one side (9 cm x 7 cm x 3 cm)	1
162	One transparent brown chalcedony secondary flake, broken, 10 percent cortex (18 mm x 15 mm x 6 mm)	1
163	One brown chert tertiary flake, broken (24 mm x 17 mm x 4 mm); one purple quartzite secondary flake, broken, 5 percent cortex (18 mm x 13 mm x 5 mm)	1
164	One brown sandstone metate slab fragment, moderately used on one side (15.0 cm x 9.0 cm x 3.7 cm)	1
165	One purple quartzite uniface, broken (68 mm x 45 mm x 6 mm)	1
166	One brown sandstone metate basin fragment, heavily used on one side, moderately used on one side (10.0 cm x 6.0 cm x 2.5 cm)	1
167	One transparent white chalcedony secondary flake, complete, 10 percent cortex (24 mm x 37 mm x 7 mm)	1
168	One brown sandstone one-hand mano, complete, heavily used on one side (10 cm x 8 cm x 3 cm); one light gray chert secondary flake, complete, 5 percent cortex (46 mm x 32 mm x 8 mm)	1
169	One transparent gray and white uniface tool, complete (57 mm x 55 mm x 30 mm)	1
170	A single deflated scatter of 15 pieces of burned caliche with no visible staining in trowel test, no artifacts present (1.50 m x 1.25 m)	1
171	One transparent white and gray chalcedony multidirectional core, not exhausted (40 mm x 20 mm x 20 mm); one transparent white chalcedony tertiary flake, complete (23 mm x 15 mm x 3 mm); one dark gray chert secondary flake, complete, 10 percent cortex (39 mm x 27 mm x 19 mm)	1
172	One yellow and red chert uniface, broken (23 mm x 16 mm x 6 mm)	3
173	One transparent white chalcedony tertiary flake, complete (26 mm x 18 mm x 7 mm)	3
174	One transparent white and gray chalcedony bifacial core, exhausted (81 mm x 24 mm x 17 mm)	3
175	One gray chert primary flake, complete (40 mm x 30 mm x 16 mm); one transparent brown chalcedony secondary flake, complete, 10 percent cortex (27 mm x 15 mm x 3 mm)	3
176	One brown quartzite tertiary flake, complete (17 mm x 15 mm x 2 mm)	3
177	One red and brown chert scraper, complete (46 mm x 35 mm x 13 mm)	3
178	One gray chert tertiary flake, broken (25 mm x 17 mm x 2 mm); one transparent gray chalcedony secondary flake, complete, 5 percent cortex (27 mm x 14 mm x 2 mm)	3
179	One green chert bifacial core, produced from a river cobble, not exhausted (50 mm x 46 mm x 25 mm)	4

Table 3.1: Isolated Occurrences. (Continued)

IO No.	Description	Parcel
180	One complete tan chert tertiary flake (26 mm x 32 mm x 5 mm)	4
181	One brown quartzite chopper, one end of large cobble bifaced into chopper (140 mm x 95 mm x 60 mm); one complete gray chert secondary flake, 60 percent cortex (49 mm x 33 mm x 10 mm) located 15 meters from chopper	4
182	One bidirectional purple quartzite core, not exhausted (95 mm x 76 mm x 60 mm)	4
183	One complete brown quartzite primary flake 80 mm x 55 mm x 13 mm); one complete red and white chert secondary flake, 20 percent cortex (40 mm x 33 mm x 11 mm); one complete red and white chert secondary flake, 70 percent cortex (35 mm x 25 mm x 10 mm)	4

Figure 3.1: IO 57, Chert Projectile Point.

Figure 3. 2: IO 81, Chupadero Sherd.

PREVIOUSLY RECORDED SITES

LA 26821

Category: 2
Affiliation: Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500)
Eligibility: Eligible, D
Site Type: Ring Midden
Parcel: 4

Description

LA 26821 is located [redacted] Previously recorded site LA 26819 is located [redacted] LA 26821 was originally recorded by Eastern New Mexico University [redacted] During the current investigation, Lone Mountain observed that the site boundaries and location of the site had changed slightly from those originally recorded. The site now consists of six features with an associated artifact scatter. Vegetation includes creosote, mesquite, white acacia, snakeweed, four-wing saltbush, mesquite, various grasses, and forbs. Visibility is 76 percent to 99 percent.

Assemblage

In 1977, the artifact assemblage consisted of groundstone artifacts, Jornada brownware sherds, flaked-stone tools, and flaked-stone debitage. During the current investigation, Lone Mountain estimates that over 20,000 artifacts and numerous pieces of freshwater shell are present in this location and noted four artifact concentrations as described below. Representative samples of most classes of artifacts were recorded. Lone Mountain recorded an estimated 10 percent of flaked-stone debitage, 20 percent of the cores, 30 percent of the observed groundstone, and all identified flaked-stone tools and sherds, many of which were located within the concentrations. The analyzed assemblage includes 524 pieces of flaked-stone debitage, 10 cores, 12 flaked-stone tools, 13 pieces of groundstone, and 44 sherds.

The debitage consists of 347 secondary reduction flakes (55 red quartzite, 73 gray chert, one brown/gray striped chert, three green quartzite, 81 brown chert, 14 white chert, 35 brown quartzite, four clear white chalcedony, 54 gray quartzite, four black chert, one gray rhyolite); 151 tertiary reduction flake (49 red quartzite, 36 gray chert, nine jasper, one gray/brown striped chert, two green quartzite, 20

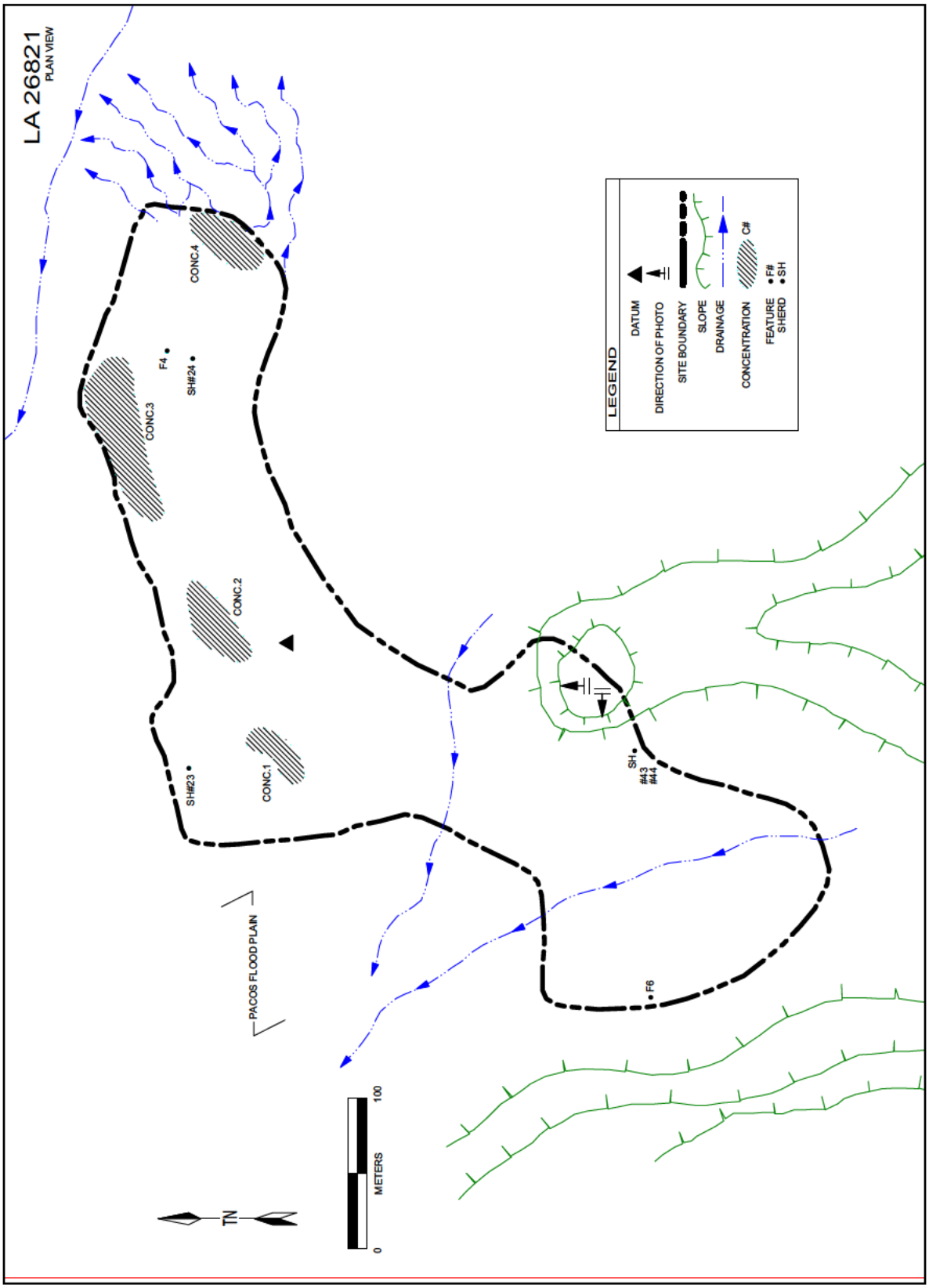

Figure 3.3: LA 26821 Site Map.

Figure 3. 4: LA 26821 Chupadero Black-on-white Sherds.

brown chert, four white chert, 13 brown quartzite, three clear white chalcedony, 14 gray quartzite); and 26 pieces of angular debris (2 red quartzite, nine gray chert, four jasper, one gray/brown striped chert, six brown chert, three white chert, one clear white chalcedony). The cores include eight multidirectional cores (one red quartzite, one black limestone, three brown chert, three yellow chert) and two unidirectional cores (one red quartzite, one brown chert). The tools include three quartzite scrapers (one pink, two purple quartzite); two brown chert scrapers; two chert choppers (one gray, one brown chert); two quartzite choppers (one gray, one purple quartzite); one gray limestone chopper; one brown chert hammerstone; and one black chert utilized flake. The groundstone material includes four one-hand manos (three sandstone, one quartzite); two two-hand manos (one sandstone, one quartzite); five sandstone slab metate fragments; and one sandstone metate basin. The ceramics include 37 El Paso Brown sherds, one sherd of Jornada Brown, four sherds of Chupadero Black-on- white (Figure 3.4), and two sherds of Three River Red-on-Terracotta. Given the quantity of artifacts and features in this location, the ceramics likely represent a broad date range, possibly extending from A.D. 200 to 1500.

Features and Site Structure

In 1977, Eastern New Mexico reported no features. During the current investigation, four artifact concentrations containing thousands of lithic artifacts and six features were observed. It is uncertain why no features were previously reported. Cetaninly some of these features re fire-cracked scatters and may not have fallen within whatever feature definitions were employed in 1977, but Feature 5 is a ring midden. Feature 1 is a large, 12-m by 23-m burned caliche and fire-cracked rock scatter, which may be the remains of at least five features. The feature is made up of over 5,000 pieces of thermally altered caliche, limestone, and sandstone, ranging in size from 1 cm to 16 cm, with an average size of 7 cm. There are no visible ash or charcoal stains. Hundreds of flakes and cores, together with shell remains are associated. The feature is estimated to be 60 percent intact

Feature 2 is a large 10-m by 15-m concentration of burned caliche and fire-cracked rock that may contain the remains of two or three features. Feature 2 is composed of at least 700 pieces of thermally altered caliche, sandstone, and limestone, ranging in size from 2 cm to 13 cm, with an average size of 10 cm. The feature is surrounded by more than 1,000 lithic artifacts and shell remains. The feature lacks visible charcoal or ash stains and appears to be 40 percent intact.

Feature 3 is 10-m by 20-m scatter of at least 1,600 pieces of thermally altered caliche, sandstone, and limestone, representing the conflated remains of at least two features. The constituent elements of the feature range from 1 cm to 12 cm, with an average size of 5 cm. Hundreds of flakes and cores, along with five pieces of groundstone are associated with the feature, which lacks any visible ash or charcoal staining. The feature is on a slope, and colluvial erosion appears to have washed approximately 20 percent of the burned caliche and fire-cracked rock from its original placement. The feature also has been disturbed by vegetation. Feature 3 is 45 percent intact.

Feature 4 is a 90-cm by 80-cm concentration of approximately 80 pieces of thermally altered caliche. The constituent elements of the feature range in size from 3 cm to 14 cm, averaging 10 cm. One El Paso brownware sherd and one secondary reduction flake are associated. No staining was observed. Feature 4 is approximately 40 percent intact.

Feature 5 is 32-m by 20-m ring midden composed of an estimated 8,000 thermally altered limestone and sandstone cobbles. The cobbles measure between 1 cm and 12 cm in size, averaging 8 cm. A stain is located in the northern portion of the feature measuring 15.0 cm N/S by 27.0 cm E/W by 6.5 cm in depth (based on a trowel test). Hundreds of flakes, some cores, and six sherds of El Paso brownware are associated. This feature is located on a slope. It is estimated that approximately 60 percent of the cobbles washed downward from their original context.

Feature 6 is a small 5-cm by 75-cm concentration of at least 30 pieces of burned caliche. The burned caliche measures between 3 cm and 15 cm in size, averaging 10 cm. A dark carbon stain was observed within the feature.

[redacted] Numerous ephemeral drainages cross through the site. Artifacts and burned caliche were observed within these drainages. Observations of drainages and arroyo cuts suggest that sediments are present to 1 m deep. Based on trowel testing in Feature 5, cultural deposits are present to at least 6.5 cm deep.

Disturbances and Potential Impacts

Wind erosion, water erosion with gullying and sheetwash, and bioturbation have disturbed the site. The site is 51 percent to 75 percent intact.

Conclusions

The artifact assemblage at LA 26821 indicates an Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500) temporal and cultural affiliation. The site has an extensive assemblage of unrecorded artifacts and six features, including a ring midden, all likely to yield additional significant data capable of addressing regional research questions. LA 86261 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 32229

Category: 2
Affiliation: Paleoindian through Late Pueblo Jornada Mogollon (12,000 B.C. to A.D. 1500)
Eligibility: Eligible, D
Site Type: Residential Complex
Parcel: 2 and 3

Description

LA 32229 (the Boot Hill Site) was excavated by LCAS in 1957 and 1958 (Corley and Leslie 1960) and was described as a hilltop location measuring 200 ft N/S by 250 ft E/W (Figures 3.5 and 3.6). The Boot Hill Site is located [redacted] In the course of Condon's (2002) investigations, site numbers LA 32267, LA 49226, LA 50305, LA 128720, possibly LA 128721 (sources differ), and LA 128722 came to be subsumed within LA 32229, as these sites fell within the Poco Site Special Management Area and identified as loci within a larger site. The Boot Hill Site itself became "Locus 3." This resulted in an enlarged site (LA 32229) measuring 1,900 m by 1,900 m and encompassing an area that had been partially surveyed by Clifton and Sanders (2000) for a 3-D Seismic.

During the current investigation, Lone Mountain recorded only the northern and southern portions of the site. The northern portion of the site is located in Parcel 2 and consists of a heavy artifact scatter, three features and a concentration labeled Locus 8. The southern portion is located in Parcel 3 and consists of a moderate general artifact scatter and a concentration of artifacts labeled Locus 6.Vegetation includes mesquite, creosote, snakeweed, yucca, and various grasses. Surface visibility is between 51 percent and 99 percent.

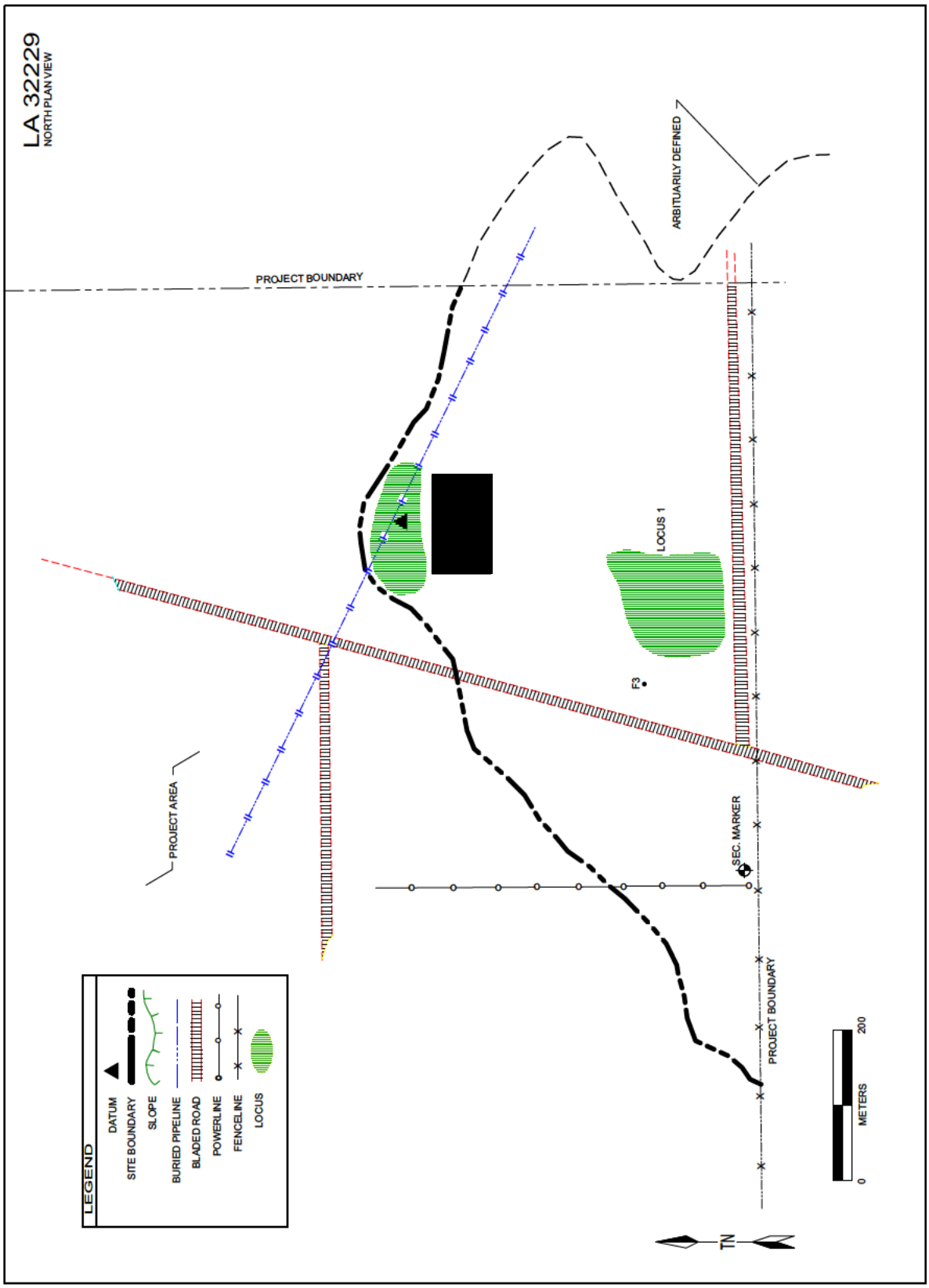

Figure 3.5: LA 32229, Northern Portion Site Map.

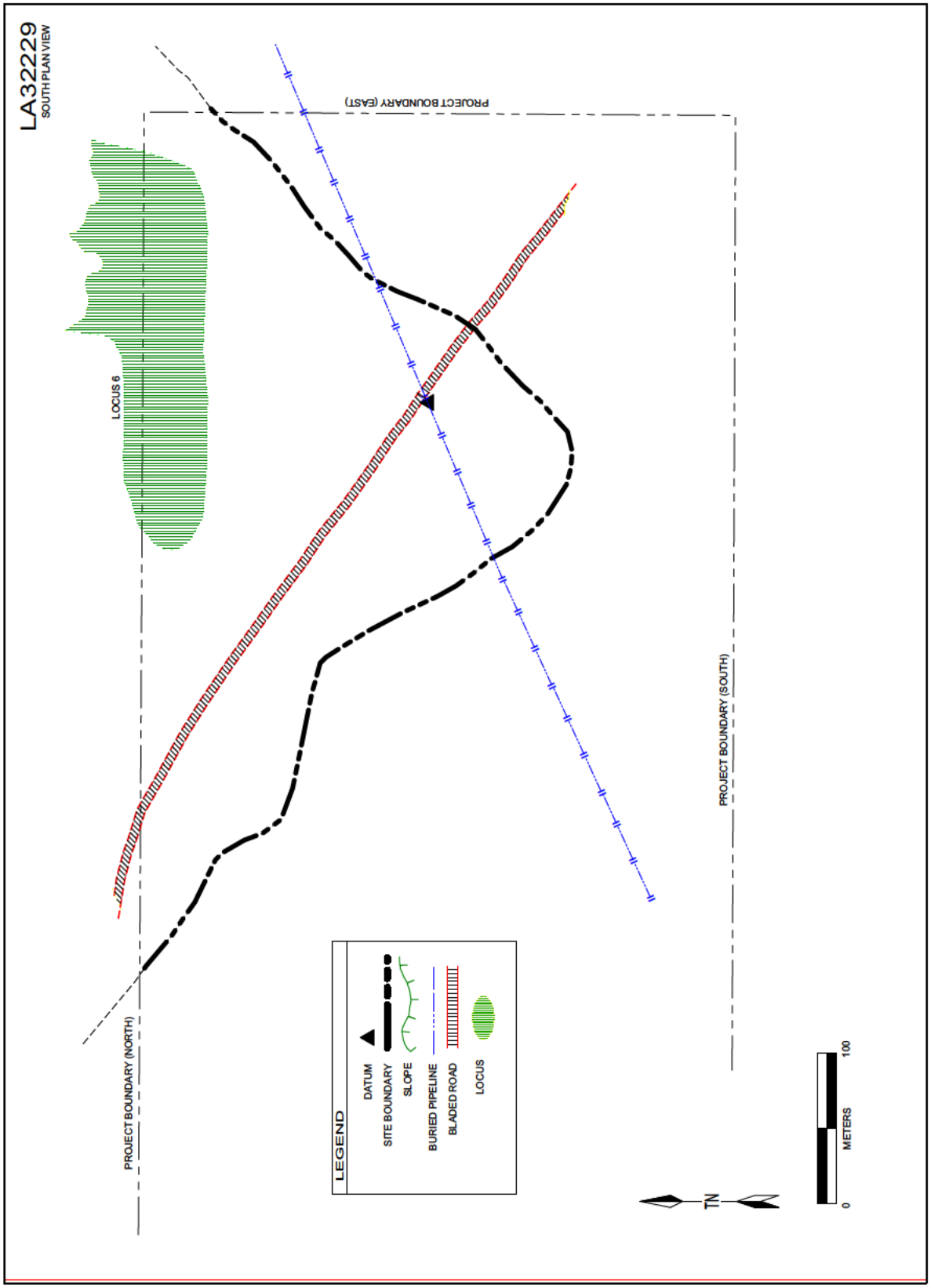

Figure 3.6: LA 32229, Southern Portion Site Map.

Assemblage

In the northern portion (including Locus 8) of the site, Lone Mountain recorded a representational sample (50 percent) of all observed artifacts in the general scatter and 100 percent of all observed artifacts within Locus 8.The recorded assemblage consists of 249 flaked-stone artifacts, five pieces of groundstone, and five ceramics. The flaked-stone assemblage consists of 224 pieces of debitage, 21 cores, and four tools. The debitage includes 23 primary reduction flakes (nine chalcedony, nine chert, five quartzite); 97 secondary reduction flakes (58 chalcedony, 23 chert, 13 quartzite, three brown siltstone); 63 tertiary reduction flakes (36 chalcedony, 21 chert, three quartzite, three brown siltstone); 13 thinning flakes (11 chalcedony, three chert); three pressure flakes (chalcedony); and 24 pieces of angular debris (21 chalcedony, three chert). Quartzites occur in purple, gray, and brown; cherts are brown, gray, banded, red, black, white, and tan; and chalcedonies are clear and white. The cores include five clear and white chalcedony multidirectional cores; three chert multidirectional cores (one black, white, and brown; one red; one red and black); two quartzite multidirectional cores (one purple, one white); one brown siltstone multidirectional core; one black and white chert unidirectional core; one clear and white chalcedony bifacial core; two chert bifacial cores (one black, one black and white); two chert tested cobbles (one black, one white and gray); two white and clear chalcedony tested cobbles; and two purple quartzite tested cobbles. The tools consist of one white and clear chalcedony scraper, one white and clear chalcedony hammerstone, one purple quartzite hammerstone, and one tan chert uniface. The groundstone includes two sandstone metate slab fragments, two sandstone metate basin fragments, and one sandstone one-hand mano fragment. The ceramics consist of five El Paso Brown sherds.

In the southern portion (including Locus 6), Lone Mountain recorded all observed artifacts in the general scatter only. The assemblage consists of 33 flaked-stone artifacts and three ceramics. The flaked-stone assemblage consists of 30 pieces of debitage, two cores, and one tool. The debitage includes two primary reduction flakes (one quartzite, one clear chalcedony); five secondary reduction flakes (two clear chalcedony, two chert, one quartzite); 21 tertiary reduction flakes (13 chert, six quartzite, two clear chalcedony); one thinning flake (chert); and one piece of angular debris (chert). Quartzites occur in purple and green; cherts are white, gray, red, and black. The cores consist of one gray and white chert unidirectional core and one red chert multidirectional core. The tool consists of one brown chert hammerstone. The ceramics include three El Paso Brown sherds.

Site Structure and Features

In the northern section a concentration (Locus 1) was previously recorded. During the present survey Locus 1 was relocated, but not recorded. A new concentration (Locus 8) and three features were observed.

Locus 8 contains two features (Features 1 and 2) and a light artifact assemblage, including 44 pieces of debitage, five cores, two tools, two pieces of groundstone, and five sherds.

Feature 1 is an 85-cm by 90-cm cluster of burned caliche. The concentration consists of approximately 40 cobbles that range in size from 3 cm to 18 cm, averaging 10 cm. No artifacts, charcoal, or ash staining were observed. The feature is 60 percent intact.

Feature 2 is a 1-m by 1-m cluster of burned caliche. The concentration consists of approximately 60 cobbles that range in size from 1 cm to 20 cm, averaging 5 cm. Most of the cobbles appear to be partially buried. No artifacts, charcoal, or ash staining were observed. The feature is 50 percent intact.

Feature 3 is a 4-m by 2-m cluster of burned caliche and limestone. The concentration consists of approximately 500 cobbles that range in size from 1 cm to 5 cm, averaging 3 cm. The estimated depth is 4 cm based on the mounding of feature rock from the ground surface. No artifacts, charcoal, or ash staining were observed. The feature is 35 percent intact.

In the southern section, a concentration (Locus 6) was previously recorded. This concentration was relocated, but not recorded during the current investigations. No new features or concentrations were recorded by Lone Mountain in this section.

The northern section of the site is bisected by a buried pipeline that runs northeast to southwest and east to west. The southern section of the site is bisected by an old bladed road that runs northwest to southeast. A fence line running northeast to southwest cuts across the southern half.

The site is located on residuum in an eolian depositional environment. Evidence for buried cultural material was observed during previous investigations.

Disturbances and Potential Impacts

Water erosion, wind erosion, pipeline construction, and vehicle traffic from the bladed roads have all moderately impacted the northern and southern portions of the site. LA 32229 is estimated to be between 76 percent and 99 percent intact.

Conclusions

The site has been identified as having a Late Archaic through Late Pueblo Jornada Mogollon (1800 B.C. to A.D. 1300) affiliation, though materials collected from the core of LA 32229 (Locus 3) potentially range in date from Paleoindian through Late Pueblo Jornada Mogollon (12,000 B.C. to A.D. 1500). LA 32229 is an extensive site covering a broad area and containing (or known to have contained) a variety of feature types, including dwellings, resource processing features, and burials, all capable of yielding significant additional data. LA 32229 has been determined to be eligible for nomination to the NRHP under Criterion D and has been listed on the State Register of Cultural Properties since March 20, 1970.

LA 61244

Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to 1300)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 2

Description

LA 61244, located [redacted]
During the current investigation, Lone Mountain observed the site boundaries and location of the site to have changed slightly from those originally recorded (Figure 3.7). The site consists of three features with an associated artifact scatter. Vegetation includes mesquite, shinnery oak, narrow-leaf yucca, sage, prickly pear, various annual grasses, and forbs. Visibility is 51 percent to 75 percent.

Assemblage

In 1987, the artifact assemblage consisted of groundstone artifacts, Jornada brownware sherds, cores, and flaked-stone debitage. During the current investigation, Lone Mountain observed the artifact assemblage to consist of 15 groundstone artifacts, six tools, four cores, and 43 pieces of flaked-stone debitage. The flaked-stone debitage consists of 11 primary reduction flakes (four white chert, three gray chert, two white chalcedony, two gray quartzite), 17 secondary reduction flakes (11 white chert, two gray chert, one light gray limestone, two red and black chert, one red jasper), one tertiary reduction flake (white chalcedony), six biface-thinning flakes (two white chert, one gray rhyolite, one white chalcedony, one red and black chert, one black rhyolite), and eight pieces of angular debris (seven white chert, one red and black chert). Materials include locally available quartzites and cherts. The tools include two chert scrapers (one red and white chert, one gray chert), one quartzite scraper (gray quartzite), two chert unifaces (gray chert), and one quartzite uniface (gray quartzite). The cores include two chert multidirectional cores (white chert), and two chert tested cobbles (white chert). The groundstone artifacts include four metate slab fragments (sandstone), one complete slab metate (sandstone), one one-hand mano fragment (sandstone), one complete one-hand mano (sandstone), six indeterminate metate fragments (sandstone), and one piece of a trough metate (sandstone). The ceramics include one Jornada brownware sherd and three El Paso brownware sherds that were all found in association with Feature 3. Burned caliche was observed scattered across the site.

Features and Site Structure

In 1987, four hearths and a charcoal stained area were observed. During the current investigation, three features were observed. Feature 1 is a 1.75-m by 1.25-m burned caliche cluster. The cluster consists of 35 pieces of burned caliche that range in size from 2 cm to 10 cm, averaging 6 cm. The feature has a depth of 5 cm based on partially buried burned caliche and trowel testing. No staining, charcoal, or artifacts were observed. The feature has been deflated by wind erosion and is 45 percent intact.

Feature 2 is a 1.75-m by 1.50-m burned caliche cluster. The cluster consists of 30 pieces of burned caliche that range in size from 3 cm to 20 cm, averaging 6 cm. The feature has a depth of 5 cm based on partially buried burned caliche and trowel testing. No staining, charcoal, or artifacts were observed. The feature has been deflated by wind and water erosion. The feature is 40 percent intact.

Feature 3 is a 4-m diameter stain. The stain is dark gray and contains charcoal. Fifteen pieces of burned caliche were observed within the stain ranging in size from 2 cm to 8 cm, averaging 6 cm. Flakes, sherds, and groundstone artifacts were observed in association. The feature has a depth of 15 cm based on

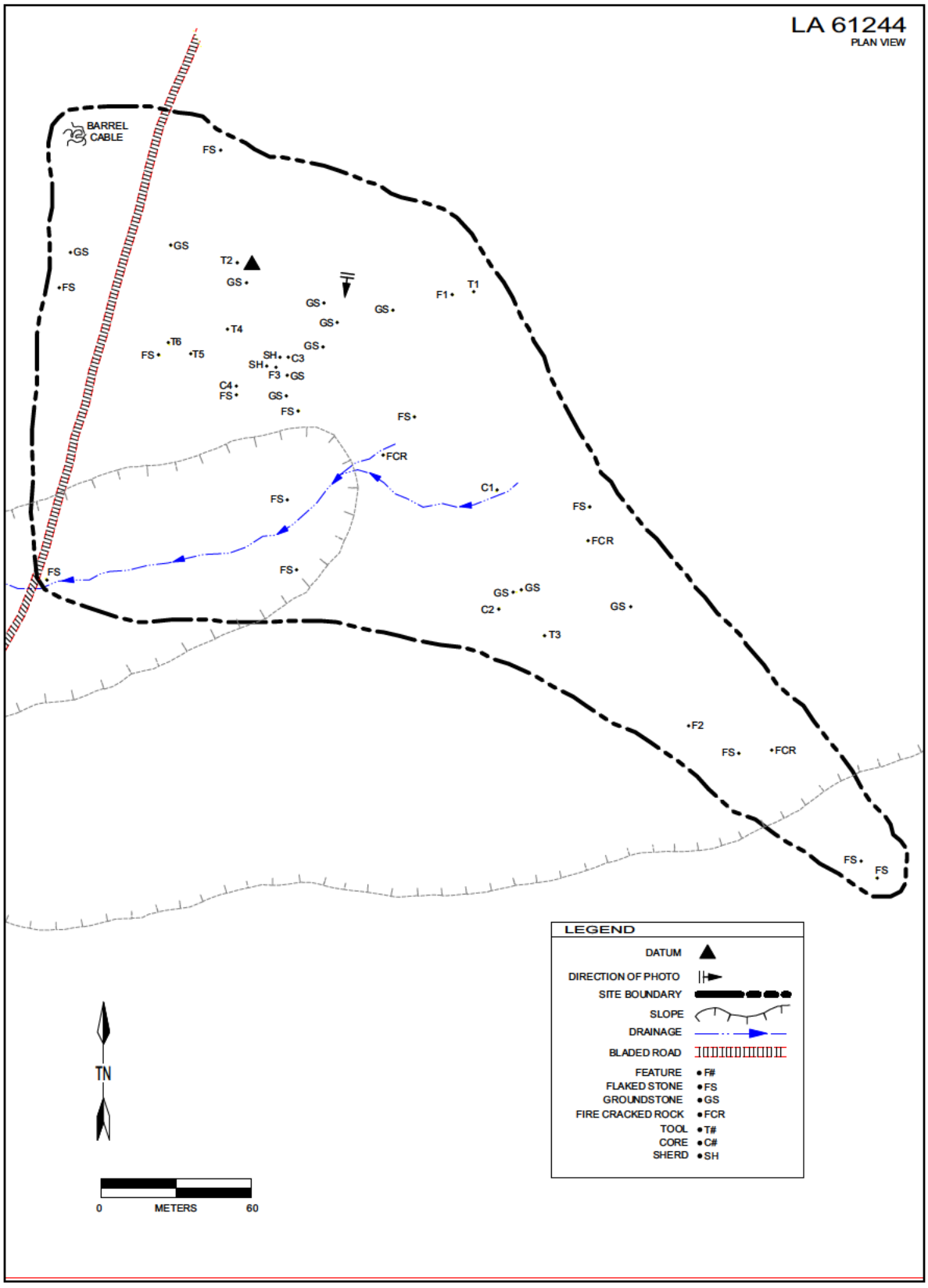

Figure 3.7: LA 61244 Site Map

mounding of the feature and a deep cow hoof print. The feature has been disturbed by wind and water erosion. The feature is 65 percent intact.

The site is located in an eolian and residual depositional environment. The estimated depth of sediments varies across the site from 20 cm to 200 cm. Artifacts were observed eroding from dune slopes and on either side of the dune. Based on trowel testing and observations of the features, subsurface cultural materials are present up to at least 15 cm below surface.

Disturbances and Potential Impacts

Wind erosion, water erosion, cattle grazing, and bladed road construction have all disturbed the site. The site is 26 percent to 50 percent intact.

Conclusions

LA 61244 has an Unspecified Jornada Mogollon (A.D. 400 to 1300) affiliation based on the presence of El Paso Brown ceramics. There is data potential based on the subsurface cultural material located on the site. The features may yield C14 dates and microbotanical dates. The site may produce chronometric dates and subsistence data useful for addressing regional research questions concerning chronology and subsistence. Therefore, based on the further data potential and research potential, the site is recommended eligible to the NRHP under Criterion D.

LA 99815

Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 99815 was previously recorded in December 1992 by Archaeological Survey Consultants [redacted] Situated on a [redacted] LA 99815 was documented as a sparse lithic artifact scatter (Figure 3.8). Lone Mountain found the site to be much the same as originally recorded. Vegetation includes white-thorn acacia, creosote, allthorn, prickly pear cactus, sage, snakeweed, various forbs, and various grasses. Visibility is 90 percent.

Assemblage

The original assemblage as recorded in 1993 consisted of flaked-stone artifacts. During the current survey, all observed artifacts were recorded. The assemblage consists of 34 flaked-stone artifacts, including 21 pieces of debitage, 11 cores, and two tools. The debitage includes seven primary reduction flakes (five chert, two quartzite); 13 secondary reduction flakes (seven chert, six quartzite); and one piece of angular debris (chert). Quartzites occur in purple and gray, and cherts are brown and red, gray and white, gray, gray and brown, and red. The cores include four chert multidirectional cores (two brown, one green, one black); one purple quartzite multidirectional core; four chert unidirectional cores (two brown, two gray); two quartzite bidirectional cores (one purple, one gray); one green chert bidirectional core; and one brown chert tested cobble. The tools consist of one purple quartzite hammerstone and one gray quartzite hammerstone.

Features and Site Structure

No features were observed during this or the previous investigation. [redacted] The site is located on residuum in an eolian depositional environment. The estimated depth of sedimentary deposits on the site is approximately 20 cm. No evidence for buried cultural material was observed.

Disturbances and Potential Impacts

Water erosion, wind erosion, and bioturbation due to cattle grazing have all moderately impacted the site, leaving it 76 percent to 99 percent intact.

Conclusions

LA 99815 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) cultural and temporal affiliation. Although the site was previously recommended to "not warrant National Registry consideration," the site has some potential to contain buried cultural deposits, though the presence of any such deposits is unproven. LA 99815 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

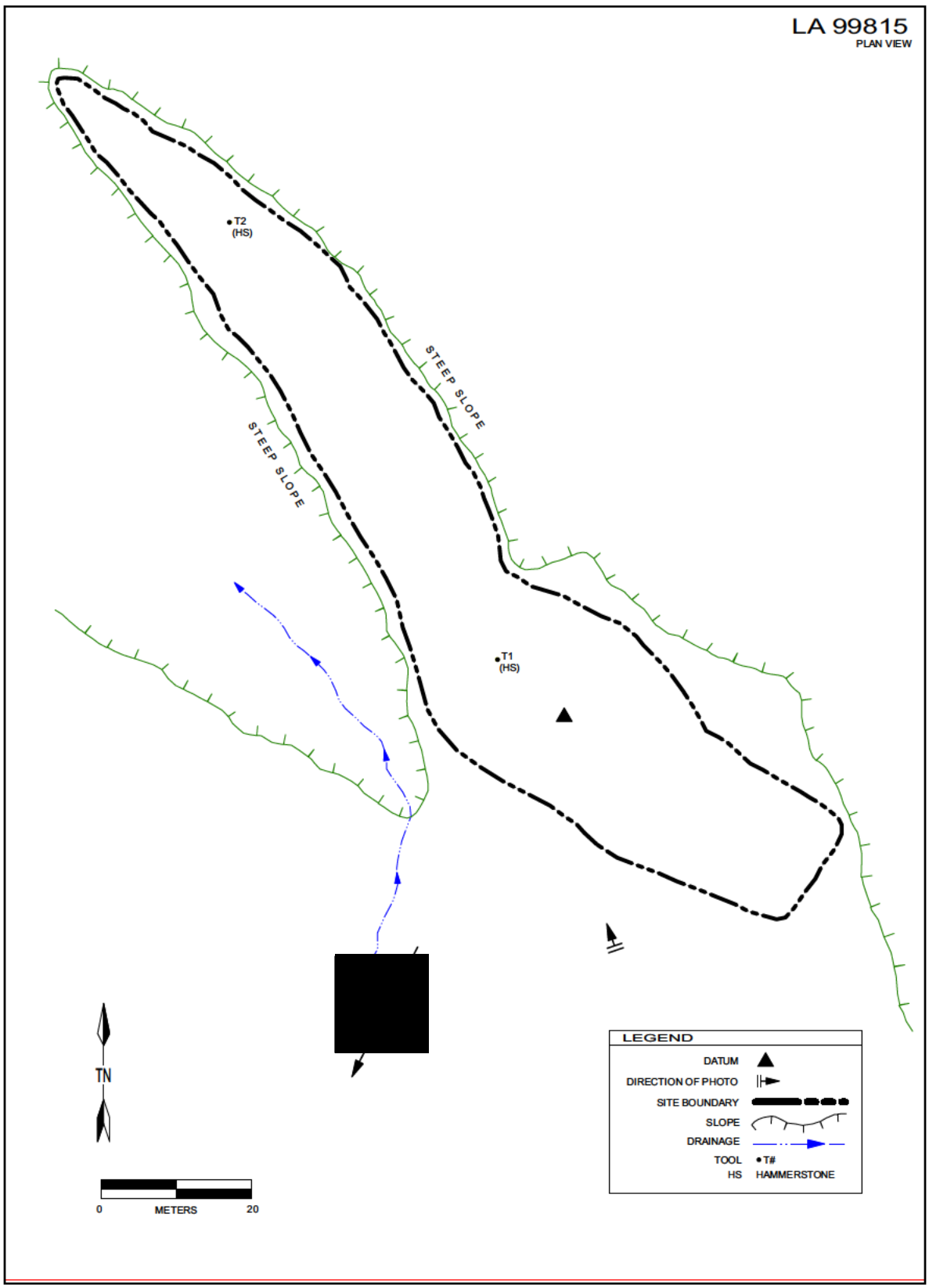

Figure 3.8: LA 99815 Site Map.

LA 116374

Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Quarry
Parcel: 5

Description

LA 116374 was previously recorded in January 1997 by Desert West Archaeological Services [redacted]. Situated on [redacted] LA 116374 was found to consist of one feature and a light artifact scatter (Figure 3.9). During the present investigation Lone Mountain found the site to consist of two features and a light artifact scatter. Vegetation includes creosote, mesquite, crucifixion thorn, narrow-leaf yucca, little-leaf horse brush, prickly pear cactus, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

The original assemblage, as recorded in 1997, consisted of flaked-stone artifacts.

During the current survey, all observed artifacts were recorded. The assemblage consists of 62 flaked-stone artifacts, including 54 pieces of debitage, six cores, and three tools. The debitage includes 52 secondary reduction flakes (41 quartzite, 11chert); one tertiary reduction flake (quartzite); and one piece of angular debris (chert). Quartzites occur in gray, brown, and red, and cherts are brown, gray, and white and red. The cores include four multidirectional quartzite cores (two gray, two brown); one clear and white chalcedony multidirectional core; and one gray and brown chert multidirectional core. The tools consist of two gray chert scrapers and one brown quartzite scraper.

Features and Site Structure

At the time of the original investigation one feature was recorded. The feature consisted of a lithic concentration surrounded by sandstone cobbles.

During the present survey, Lone Mountain relocated Feature 1, and encountered an additional feature.

Feature 1 is a 1-m by 1-m lithic concentration surrounded by approximately 50 quartzite and sandstone cobbles. The cobbles range in size from 12 cm to 30 cm. No depth estimate for the feature is given. Two unifacial tool fragments and several primary and secondary reduction flakes were found within the concentration. No charcoal or ash staining were observed. The feature has been badly deflated

Feature 2 is a 1.5-m by 1.5-m concentration of lithics surrounded by limestone cobbles. The concentration consists of approximately 30 limestone cobbles and 20 limestone and quartzite fragments. No depth estimate for the feature is given. Several primary reduction flakes were noted within the concentration. No charcoal or ash staining were observed. The feature has been slightly affected by erosion, but remains mostly intact.

Several small drainages bisect the site and a dirt two-track road runs north to south approximately 50 m to the west of the site. The site is located on residuum in an eolian and alluvial depositional environment. A trowel test performed during the previous investigation showed that no subsurface cultural deposits are present. No evidence was observed for buried cultural material during the current investigation. The estimated depth of sedimentary deposits is unknown.

Disturbances and Potential Impacts

Wind erosion and water erosion are the primary disturbances. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 116374 was originally identified as having an Archaic through Formative period (7000 B.C. to A.D. 900) affiliation, based on a lithic assemblage lacking ceramics or temporally diagnostic artifacts. Given the low quantities of ceramics found on most identifiable Formative period sites, Lone Mountain prefers to identify sites with these attributes as Unknown Aboriginal (9500 B.C. to A.D. 1880). The site has been previously determined to be ineligible for nomination to the NRHP.

LA 122417

Category: 2
Affiliation: NM Statehood-WWII to Recent
Euroamerican (A.D. 1935 to 1959)
Eligibility: Eligible, D
Site Type: Ranching Related
Parcel: 5

Description

LA 122417, [redacted] was originally recorded by Southern New Mexico Archaeological Services, Inc. as the ruins of

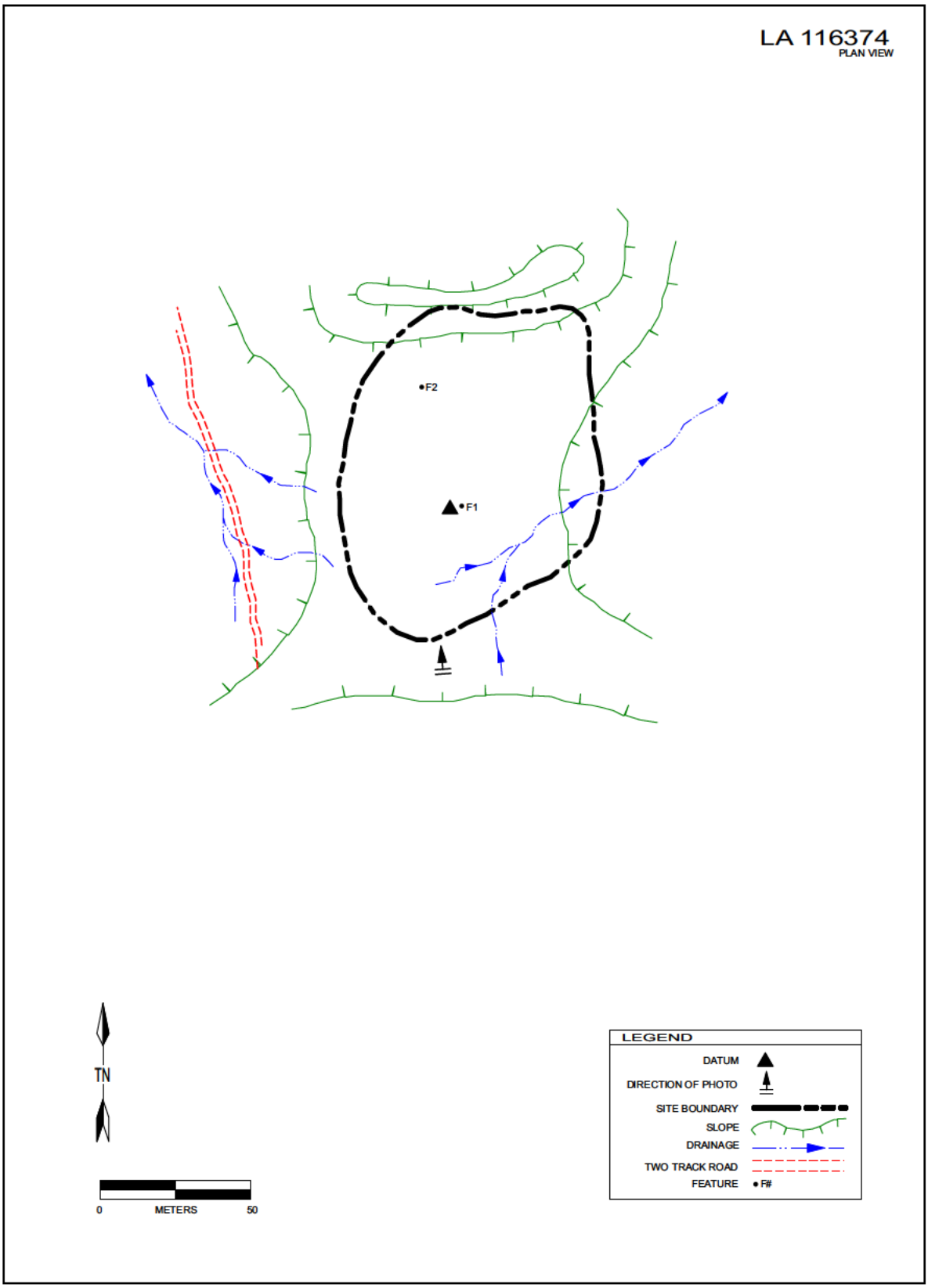

Figure 3.9: LA 116374 Site Map.

the Ross Ranch House with associated Historic features and artifact [redacted]. During the current investigation, Lone Mountain relocated 4 of the 5 previously recorded features, and encountered three additional features (Figure 3.10). The artifact assemblage was found to be much the same as described in the original recording. Local vegetation includes creosote, catclaw, mesquite, cholla, and seasonal grasses. Visibility is 76 percent to 99 percent.

Assemblage

The artifact assemblage recorded in1998 consisted of thousands of historic artifacts including a kerosene stove and refrigerator, an ice box, a kerosene heater, cinder blocks, a concrete engine stand, numerous portions of framed walls or roofs of corrugated iron, nuts, bolts, pipes, tires, and a large scatter of broken glass and unidentified artifacts. The assemblage looks to be much the same as that originally recorded. Lone Mountain observed thousands of artifacts, but recorded only 1930s automobile parts, as these seemed to the most temporally diagnostic artifacts on the site.

Site Structure and Features

During the previous investigation, five features were recorded. These included a collapsed ranch house, a water tower stand, a standing outbuilding, a cesspool, and an extensive refuse scatter. Lone Mountain archaeologists did not encounter the water tower stand, but did observe the remaining four features. Three additional features were observed and recorded during the present investigation.

Feature 1, located in the western portion of site, is the remains of a dismantled vehicle body and frame. The vehicle fragments are concentrated in a 5-m N/S by 4-m E/W area. Pieces of the exhaust system, parts of headlights, and three tires were observed. A metal and wood element, possibly a gear or harness, was also observed.

Feature 2 is the remains of a structure with gas lines. The feature measures 40 ft to 45 ft in length (measured N/S) and 25 ft in width (measured E/W). The structure has a sewage pipe buried 1 ft below the surface with an adjacent cesspool located 10 ft to the west. Two gas stoves are present, one measuring 3.5 ft by 3.75 ft and the second measuring 5 ft by 3 ft. A 6.0-ft by 3.5-ft furnace and at least 50 broken and intact cinderblocks are present within the feature. The structure appears to have been burned down, as evidenced by the presence of melted glass.

Feature 3 is a collapsed 2-m square cellar with a partially intact roof. The depth of the feature is approximately 1.5 m. The feature is located 5 m to the west of the previously recorded ranch house. No artifacts were observed near or within the feature.

The site is located in an eolian and alluvial depositional environment. Based on the depth of the cesspool, cultural deposits are present up to 75 cm below the surface.

Disturbances and Potential Impacts

Wind erosion, sheet wash, bioturbation, vandalism (bullet holes), and modern trash have all disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 122417, the Ross Ranch House, was in use from the late 1930s to the Late 1950s, and therefore has a NM Statehood-WWII to Recent Euroamerican (ca. A.D. 1935 to 1959). The site has an extensive artifact scatter and retains features that may yield a variety of data concerning historic research questions. The site has been previously recommended eligible for nomination to the NRHP under Criterion D, and Lone Mountain concurs.

LA 146165

Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880), Unknown Historic (A.D. 1895 to 1930)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 5

Description

LA 146165, [redacted] was originally recorded by Mesa Field Services as three burned caliche scatters and a moderate number of flaked-stone artifacts [redacted]. During the present investigation Lone Mountain observed two features, and a large and varied prehistoric and historic artifact scatter (Figure 3.11). Vegetation includes creosote, mesquite, snakeweed, and seasonal grasses. Visibility is 76 percent to 99 percent.

Assemblage

The originally recorded assemblage, a judgmental sample of hundreds of observed artifacts, consisted of 13 flakes and four cores. During the current investigation, Lone Mountain recorded approximately 20 percent of the prehistoric and historic artifacts and

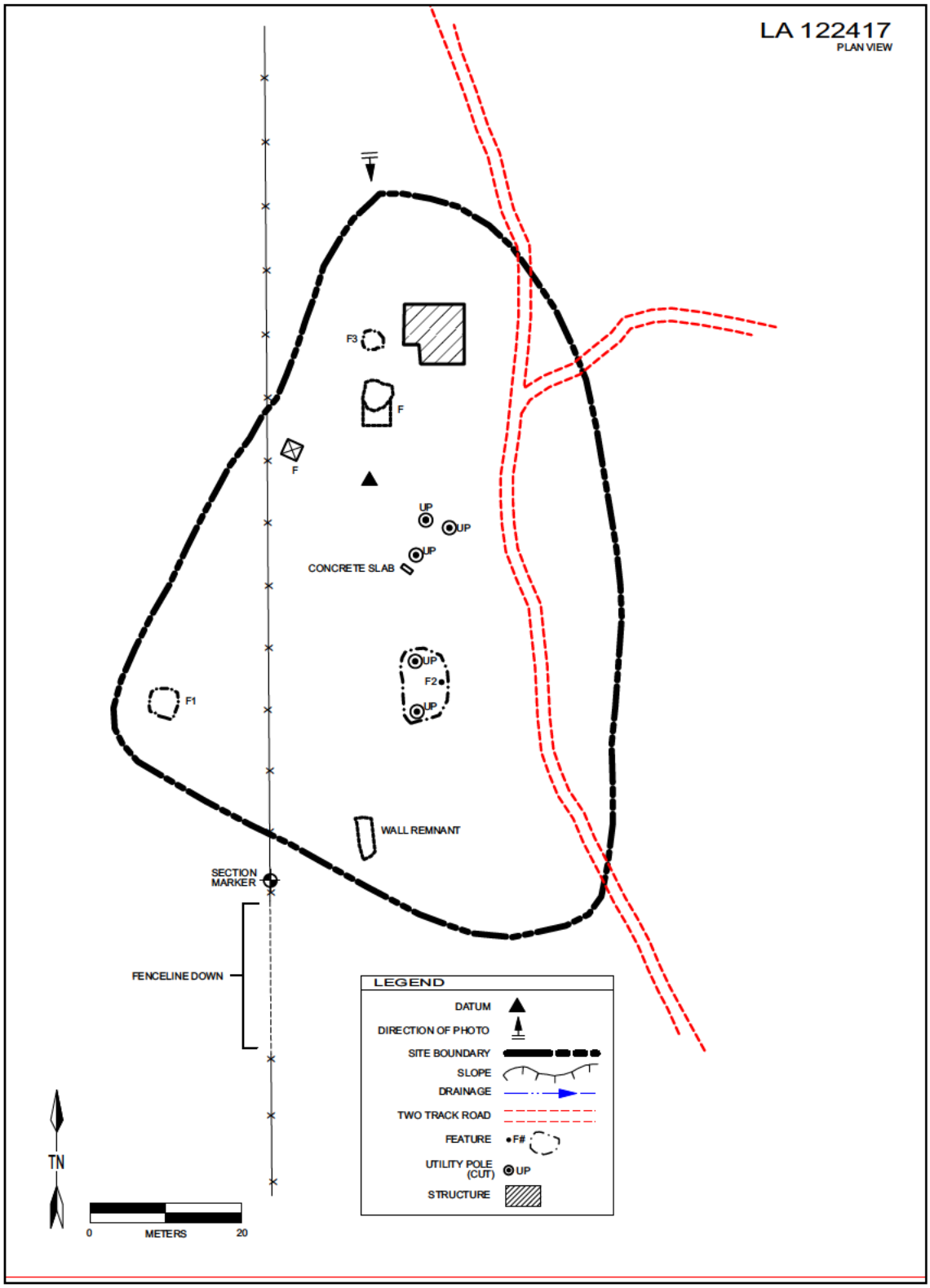

Figure 3.10: LA 122417 Site Map.

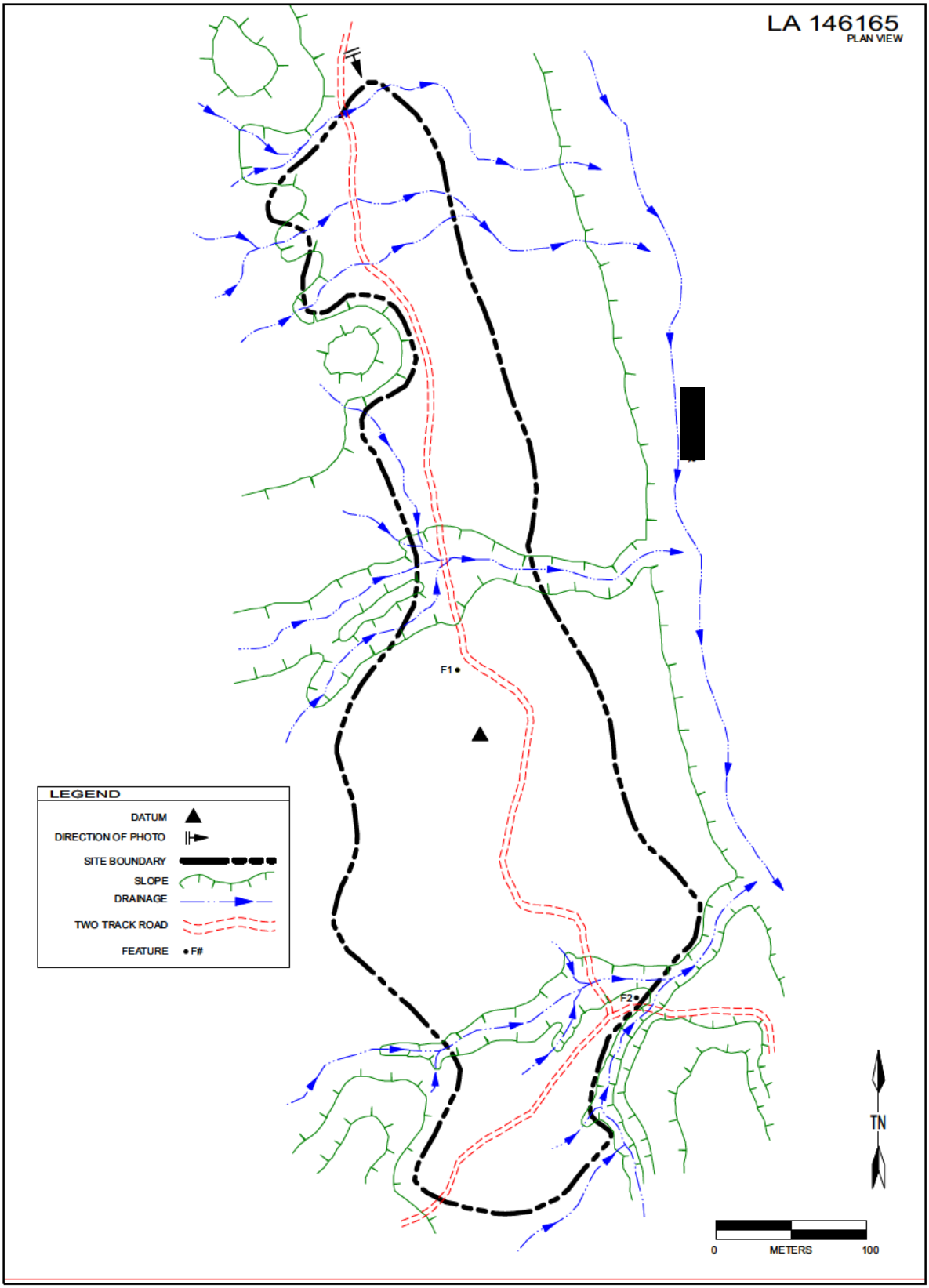

Figure 3.11: LA 146165 Site Map.

approximately 8 percent of shell fragments observed across the site. The recorded assemblage includes 100 pieces of flaked-stone debitage, four cores, four tools, three groundstone artifacts, 100 shell fragments, and one half of a bivalve shell. The historic assemblage includes two cans and over 1,000 glass shards.

The debitage consists of four primary reduction flakes (one quartzite, three chert); 37 secondary reduction flakes (20 quartzite, 12 chert, 1 brown limestone, 2 chalcedony, 2 rhyolite); 40 tertiary reduction flakes (19 quartzite, 14 chert, 2 brown limestone, 4 chalcedony, 1 obsidian); eight thinning flakes (2 quartzite, 6 chert); four chert pressure flakes; and seven pieces of angular debris (two quartzite, four chert, one chalcedony). Chert occurred in gray, pink, brown, white, purple, red, yellow, and orange. Quartzite occurred in brown, gray, and purple. Chalcedony occurred in translucent white, pink, gray, orange, and red. Rhyolite occurred in brown and black. Historic glass includes four white bottle body shards, one white bottle base, two clear bottle body shards, and an estimated 1,000 aqua bottle shards. Cans include one score-key can and one exterior friction can, both with soldered seams, suggesting a date between A.D. 1895 and 1930.

Features and Site Structure

No features were observed during the previous investigation. Two features were observed during the current investigation.

Feature 1, located in the central part of the site, is a thermally altered limestone concentration measuring 2 m N/S by 1 m E/W. The concentration is composed of 31 limestone cobbles, each measuring between 1.0 cm and 7.5 cm. One pink chert tertiary reduction flake and one white chert secondary reduction flake were found in association. This feature has been severely deflated by erosion and intrusive plant growth, remaining less than 20 percent intact.

Feature 2, located next to the northern border of the site, is a 2.5-m N/S by 2.3-m E/W fire-cracked rock and burned caliche concentration. The feature is composed of 41 fire-cracked rocks, each between 1 cm and 9 cm in size, averaging 5 cm. No artifacts were observed in association. The feature has been severely deflated by erosion.

LA146165 is located in an alluvial and eolian depositional environment. The site is bisected north to south and east to west by dirt two-track roads. Two large drainage systems were observed across the site. The estimated depth of cultural deposits is 15 cm, based on exposed artifacts in cut-banks of the drainages.

Disturbances and Potential Impacts

Wind erosion, water erosion with gullying and sheetwashing, bioturbation, and land development have all disturbed the site, leaving it 26 percent to 50 percent intact.

Conclusions

The site has Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1895 to 1930) components as indicated by the artifact assemblage. The site contains buried cultural deposits and two features that may yield TL/OSL dates and residues. These classes of data are significant for addressing regional research questions. The site has been previously determined to be eligible for nomination to the NRHP under Criterion D, and Lone Mountain concurs.

LA 159321

Category: 2
Affiliation: Late Archaic to Early Pithouse Jornada Mogollon (1500 B.C. to A.D. 300) and Recent Euroamerican (A.D. 1945 to 1963)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 4

Description

LA 159321 was previously recorded in April 2008 by the Bureau of Land Management-Carlsbad Field Office [redacted] LA 116374 was originally recorded as consisting of two features and a light artifact scatter. During the present investigation, Lone Mountain found the site to be much the same as originally recorded (Figure 3.12). Vegetation includes creosote, mesquite, broom snakeweed, four-wing saltbush, and narrow-leaf yucca. Visibility is 76 percent to 99 percent.

Assemblage

The original assemblage, as recorded in 2008, consisted of flaked-stone artifacts and historic artifacts including glass shards, cans, a mason jar, and a drinking glass.

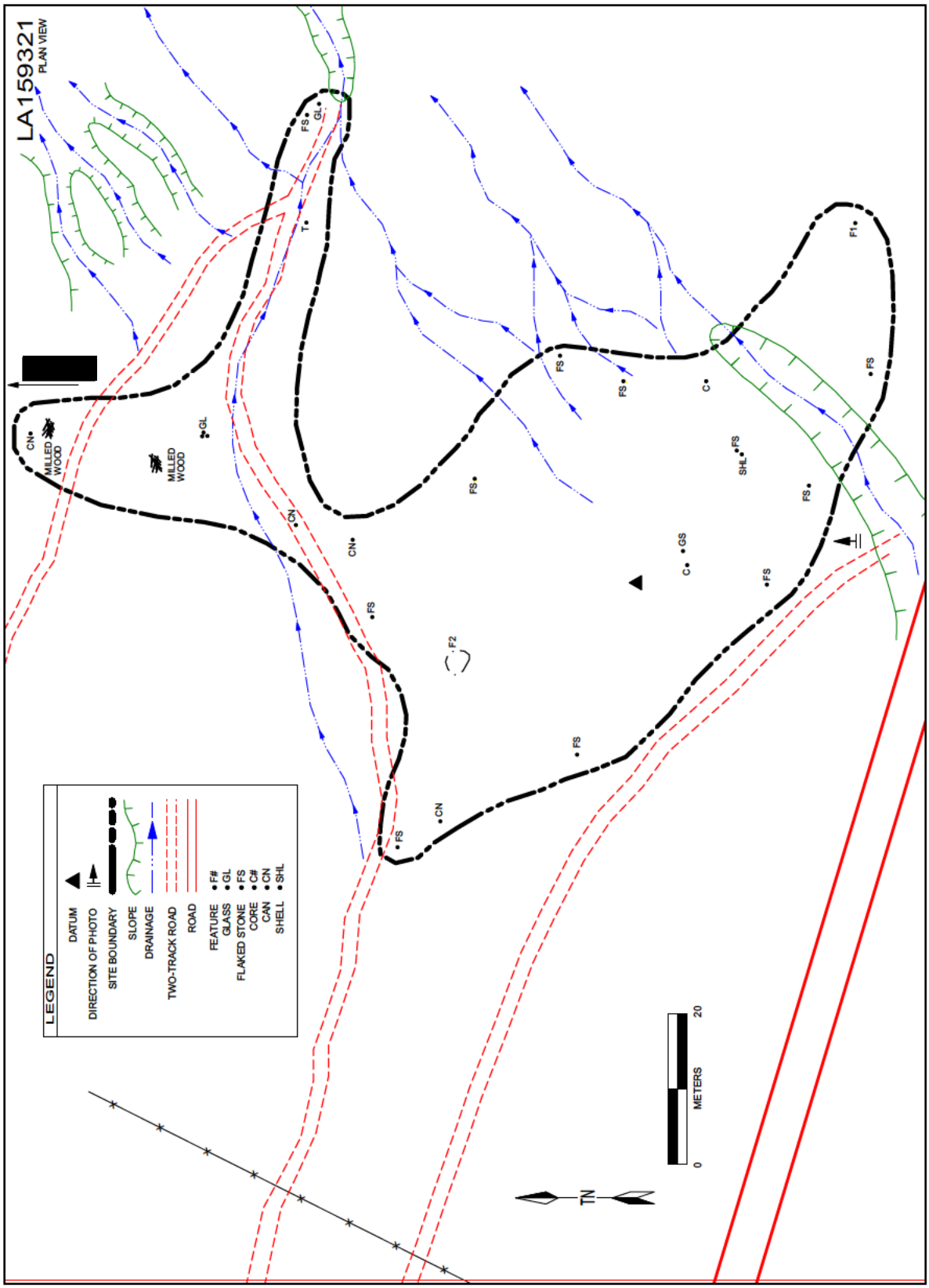

Figure 3.12: LA 159321 Site Map.

During the current survey, all observed artifacts were recorded. The assemblage consists of 41 flaked-stone artifacts, two pieces of groundstone, six pieces of shell, and 125 historic artifacts including 57 cans, 11 historic ceramics, two pieces of metal, and 65 pieces of glass. The flaked-stone assemblage consists of 35 pieces of debitage, five cores, and one tool. The debitage includes three primary reduction flakes (chert); nine secondary reduction flakes (seven chert, one quartzite, one chalcedony); 21 tertiary reduction flakes (12 chert, eight quartzite, one chalcedony); and two pieces of angular debris (one chert, one chalcedony). Quartzites occur in gray and purple; cherts are red, black, brown, white, mottled, gray, and tan; and chalcedonies are clear, and white. The cores include two brown chert tested cobbles, one gray quartzite tested cobble, one tan quartzite unidirectional core, and one purple quartzite bidirectional core. The tool is a brown and tan chert scraper. The shell consists of six pearl white freshwater bivalve fragments. The cans include 50 crushed cans (one beverage, two exterior friction, 47 sanitary); six intact cans (sanitary); and one tobacco tin. The ceramics consist of 11 white ware dinner plate sherds. The metal includes one cabinet hinge with a length of 2 in and a width of 1 ¾ in, and one bolt measuring 5 in by ¼ in by ¼ in. The glass includes five brown bottle body shards, 50 clear jar body shards, six green bottle body shards, one green bottle base shard, and three clear finish fragments.

Features and Site Structure

At the time of the original investigation, two features were found. The features consisted of a burned caliche concentration and a historic refuse scatter. Lone Mountain relocated both of these features during the current investigation.

Feature 1 is a 35-cm by 25-cm burned caliche and burned limestone cluster. The concentration consists of approximately 40 cobbles that range in size from 2 cm to 12 cm, averaging 12 cm. The estimated depth of the feature is 1 cm, based on the mounding of the feature rock. No artifacts, charcoal, or ash staining were observed. The feature is 25 percent intact, having been disturbed by water erosion due to its location in a drainage.

Feature 2 is a 30-ft by 15-ft scatter of historic refuse. The scatter consists of approximately 50 artifacts including sanitary cans, paint cans, tobacco tins, a broken clear glass bottle, and two prehistoric flakes. No charcoal or ash staining were observed. The feature appears to be intact.

Two two-track roads running east to west run through the northern portion of the site. The southwest boundary is defined by a third two-track road. LA 159321 is located in an alluvial depositional environment. No evidence for subsurface cultural material was observed during the previous and current investigations and depth of sedimentary deposits is unknown

Disturbances and Potential Impacts

Wind erosion and water erosion are the primary disturbances. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

The previous recorder reported a San Pedro point and a Late Archaic temporal and cultural affiliation, while the historic component was identified as a Recent Euroamerican temporal and cultural affiliation, possibly dating to the 1940s. Given these observations, Lone Mountain would identify the site as having a Late Archaic to Early Pithouse Jornada Mogollon (1500 B.C. to A.D. 300) component and a Recent Euroamerican (A.D. 1945 to 1963) component. The site has been determined to have an undetermined eligibility, as the data potential or presence of buried cultural deposits was unknown. Given developments in analytical techniques, Feature 1 may yield TL/OSL dates and residue data, which would be significant additional data capable of addressing regional research questions. Lone Mountain therefore recommends LA 159321 eligible for nomination to the NRHP under Criterion D.

LA 159324

Category: 2
Affiliation: Late Archaic to Early Pithouse Jornada Mogollon (1600 B.C. to A.D. 300) and Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 159324 was previously recorded in April 2008 by the Bureau of Land Management-Carlsbad Field Office [redacted]. LA 159324 was reported to consist of a sparse artifact scatter. During the present investigation, Lone Mountain found the site to be the same as previously described (Figure 3.13). Vegetation includes mesquite, creosote, nar-

row-leaf yucca, broom snakeweed, four-wing saltbush, and allthorn. Visibility is 76 percent to 99 percent.

Assemblage

The original assemblage, as recorded in 2008, consisted of flaked-stone artifacts and ceramics.

During the current survey, all observed artifacts were recorded. The assemblage consists of 111 flaked-stone artifacts, five ceramics, and six pieces of shell. The flaked-stone assemblage consists of 97 pieces of debitage, six cores, and eight tools. The debitage includes one primary reduction flake (chert); 27 secondary reduction flakes (21 chert, three quartzite, one chalcedony, two brown petrified wood); 42 tertiary reduction flakes (22 quartzite, 18 chert, one chalcedony, one dark brown basalt); 13 thinning flakes (10 chert, three quartzite); six pressure flakes (five chert, one quartzite); and eight pieces of angular debris (five chert, three quartzite). Quartzites occur in purple, gray, and brown; cherts are gray, tan, white, black, brown, blue, and red; and chalcedonies are in white, and clear. The cores include two chert multidirectional cores (one white, gray, and brown; one brown); one clear and white chalcedony multidirectional core; two chert bidirectional cores (one brown and white, one brown); and one purple quartzite tested cobble. The tools consist of two chert bifaces (one light red, one red); one pink and violet quartzite scraper; one orange and red chert drill; one brown quartzite biface; one purple quartzite hammerstone; one brown quartzite retouched flake; and one brown chert projectile point. The projectile point resembles a Datil point, a type that dates from 1600 B.C. to A.D. 300 (Justice 2002:174). The ceramics include three El Paso Brown sherds and two Chupadero Black-on-white sherds. The shell consists of 10 pearl white freshwater bivalve fragments.

Features and Site Structure

No features were observed during this or the previous investigation. A two-track road runs east to west through the northern portion of the site and a fence line runs northeast to southwest, bisecting the eastern portion of the site. The southern edge of the site is bounded by a two-track road running east to west and the western edge is bounded by a drainage.

The site is located in an alluvial depositional environment. No evidence for buried cultural material was observed and the depth of sedimentary deposits on the site is unknown.

Disturbances and Potential Impacts

[redacted] LA 159324 is estimated to be 26 percent to 50 percent intact.

Conclusions

The site has Late Archaic to Early Pithouse Jornada Mogollon (1600 B.C. to A.D. 300) and Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500) components, as indicated by the temporally diagnostic artifacts on the site. The site has been previously determined to have an Undetermined eligibility for nomination to the NRHP. Lone Mountain concurs with this determination.

NEWLY ENCOUNTERED SITES

LA 165595

Field Number: 908-01-001
Category: 2
Affiliation: Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 2

Description

LA 165595, [redacted] consists of a light scatter of prehistoric artifacts (Figure 3.14). Vegetation includes shinnery oak, sand sage, snakeweed, narrow leaf yucca, mesquite, four-wing saltbush, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain conducted a complete artifact analysis on all observed artifacts. The assemblage consists of 18 pieces of flaked-stone debitage, one tool, three cores, two pieces of groundstone, and 11 ceramic sherds. The flaked-stone debitage consists of three secondary reduction flakes (one gray and white chalcedony, one brown quartzite, one white chalcedony), nine tertiary reduction flakes (two white chert, three gray and white chalcedony, one white chalcedony, two gray chert, one red chert), four pressure flakes (one white and red chert, one gray and white chalcedony, one white chalcedony, one gray chert), and one piece of angular debris (gray and white chalcedony). The raw material includes locally available chert, chalcedony, and quartzite. The tool is a chert uniface (brown and gray chert). The cores include one chalcedony bidirectional core (white

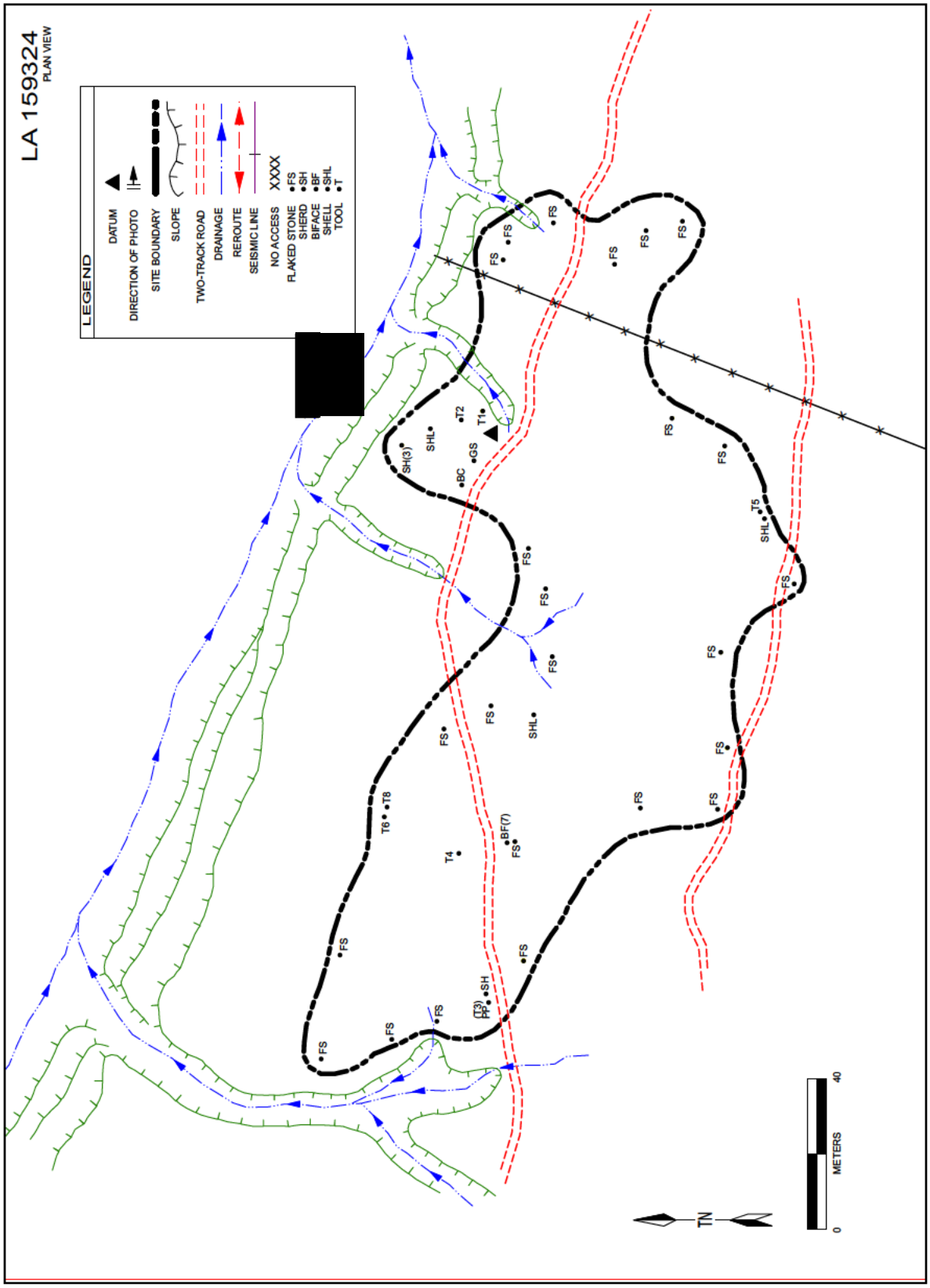

Figure 3.13: LA 159324 Site Map.

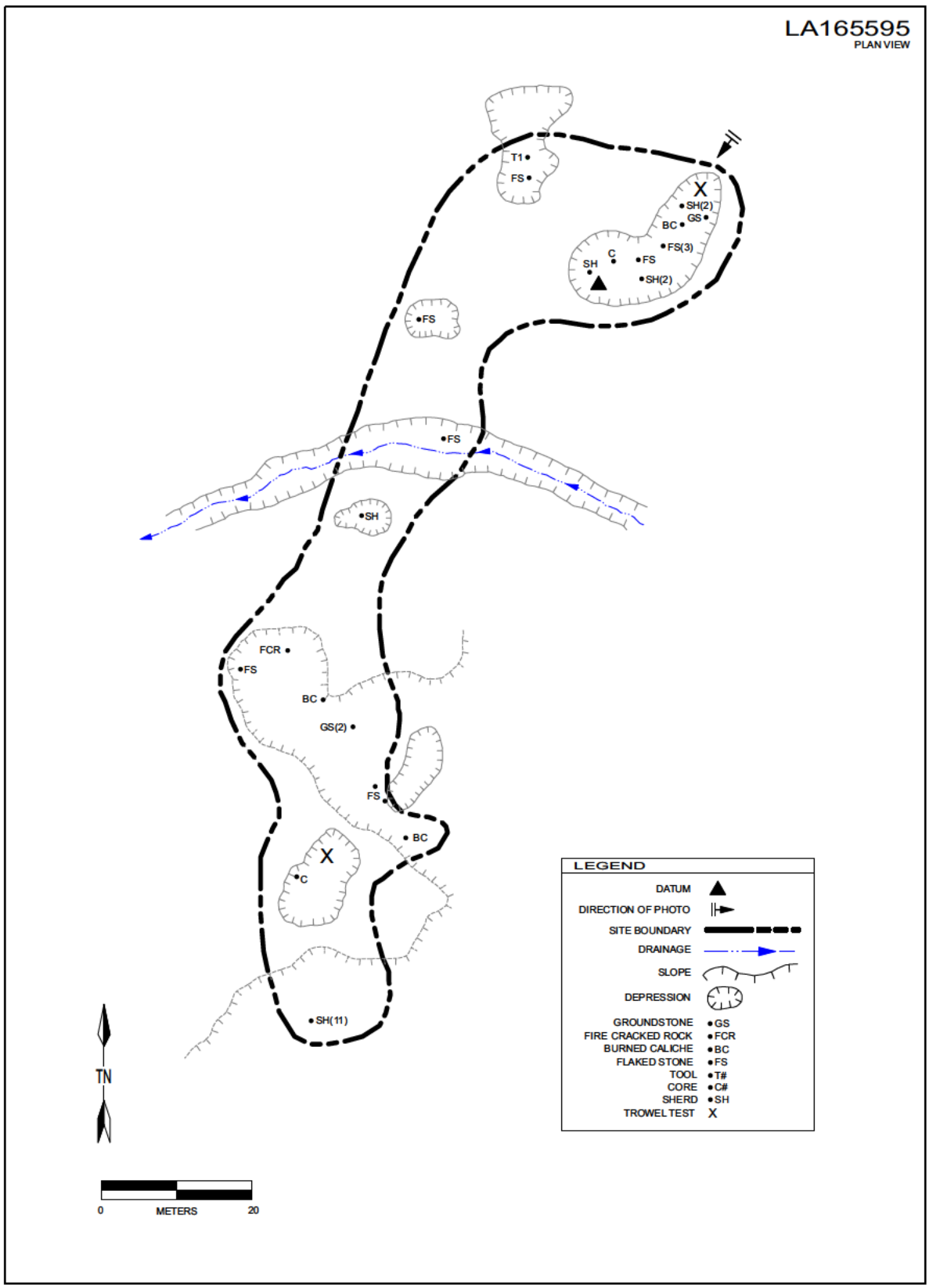

Figure 3.14: LA 165595 Site Map.

Figure 3. 15: LA 165595 Chupadero Black-on-white Sherd.

chalcedony), one chert bidirectional core (dark gray chert), and one chert multidirectional core (brown and gray chert). The groundstone artifacts include one sandstone basin metate fragment and one sandstone slab metate fragment. The ceramic artifacts include five Jornada Brown sherds, five El Paso brownware sherds, and one Chupadero Black-on-white sherd (Figure 3.15). The Chupadero sherd was collected. While Jornada Brown and El Paso Brown have long date ranges as ceramic types (A.D. 200 to 1340 and A.D. 400 to 1300 respectively) the small artifact assemblage suggests a short-term occupation. Therefore a date range in line with that known for Chupadero Black-on-white (A.D. 1100 to 1500) seems appropriate.

Features and Site Structure

No features were observed on the site. The site is located in an eolian depositional environment. Trowel testing revealed no subsurface cultural deposits. However, based on the height of dunes, the depth of blowouts, and drainage cuts, potential for the presence of subsurface cultural material is estimated at a depth of up to 1.75 m.

Disturbances and Potential Impacts

Wind erosion, water erosion, cattle bioturbation, and rodent burrowing have moderately disturbed the site. The site is 50 percent intact.

Conclusions

LA 165595 has an Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500) affiliation based on the temporally diagnostic sherd. The site has potential for containing subsurface cultural material, but the data potential of any such deposits, should they be present, is unknown. Therefore, the site is recommended to have an undetermined eligibility for nomination the NRHP.

LA 165596

Field Number: 908-1-002
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 2

Description

LA 165596, [redacted], consists of a sparse artifact scatter in association with a feature (Figure 3.16). Vegetation includes shinnery oak, sand sage, narrow leaf yucca, snakeweed, mesquite, various forbs, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain conducted a complete analysis on all of the observed artifacts. The assemblage consists of nine pieces of flaked-stone debitage and one tool. The debitage consists of one primary reduction flake (brown chert), three secondary reduction flakes (two gray chalcedony, one light brown quartzite), four tertiary reduction flakes (two white chalcedony, one gray chalcedony, one brown chalcedony), and one pressure flake (white chalcedony). The raw materials include chert, quartzite, and chalcedony. The tool is a chalcedony biface (gray with dark gray chalcedony). More than 50 pieces of burned caliche were observed scattered across the site.

Features and Site Structure

One feature was observed. Feature 1 is a 60-cm by 50-cm burned caliche cluster. The cluster consists of 40 pieces of burned caliche that range in size from 3 cm to 20 cm, averaging 8 cm. The feature has a depth of 7 cm based on a trowel test that revealed buried burned caliche. No artifacts, staining, or charcoal were observed. The feature is disturbed by wind erosion and water erosion. The feature is 85 percent intact.

The site is located in an eolian depositional environment. Based on the height of dunes in the area, sedimentation is estimated to a depth of one meter. Trowel testing revealed the presence of subsurface cultural material to a depth of approximately 7 cm below the surface.

Disturbances and Potential Impacts

Wind erosion, rodent burrowing, and cattle grazing have disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165596 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on the lack of temporally diagnostic artifacts. The site appears to contain both buried cultural deposits and a feature that is capable of yielding TL/OSL dates and lipid residues. This data may contribute toward regional research questions concerning chronology and subsistence. Therefore, the site is recommended eligible to the NRHP under Criterion D.

LA 165597

Field Number: 908-01-003
Category: 2
Affiliation: Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 2

Description

LA 165597, [redacted] consists of a sparse artifact scatter (Figure 3.17). Vegetation includes shinnery oak, snakeweed, mesquite, narrow leaf yucca, sand sage, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain conducted a complete analysis on all of the observed artifacts. The assemblage consists of 10 pieces of flaked-stone debitage, three tools, and one core. The debitage includes one primary reduction flake (brown quartzite), three secondary reduction flakes (one brown chert, one gray chert, one gray chalcedony), five tertiary reduction flakes (one white chalcedony, three purple quartzite, one gray chalcedony), and one pressure flake (white chalcedony). Materials include locally available chert, chalcedony, and quartzite. The tools include one chert scraper (tan chert), one chert biface (gray chert), and one light gray chert projectile point (Figure 3.18) with characteristics of a Tularosa Corner Notched type (100 B.C. to A.D. 900) (Justice, 2002). The core is a chert multidirectional core (brown chert). More than 40 pieces of burned caliche were observed scattered across the site

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment. Based on the height of dunes and blowouts in the site area, the depth of sedimentation is estimated at approximately 1.75 meters. Trowel tests revealed no evidence for or against the presence of subsurface cultural material.

Disturbances and Potential Impacts

Wind erosion, cattle grazing, and rodent burrowing have slightly disturbed the site. Overall, the site is 51 percent to 75 percent intact.

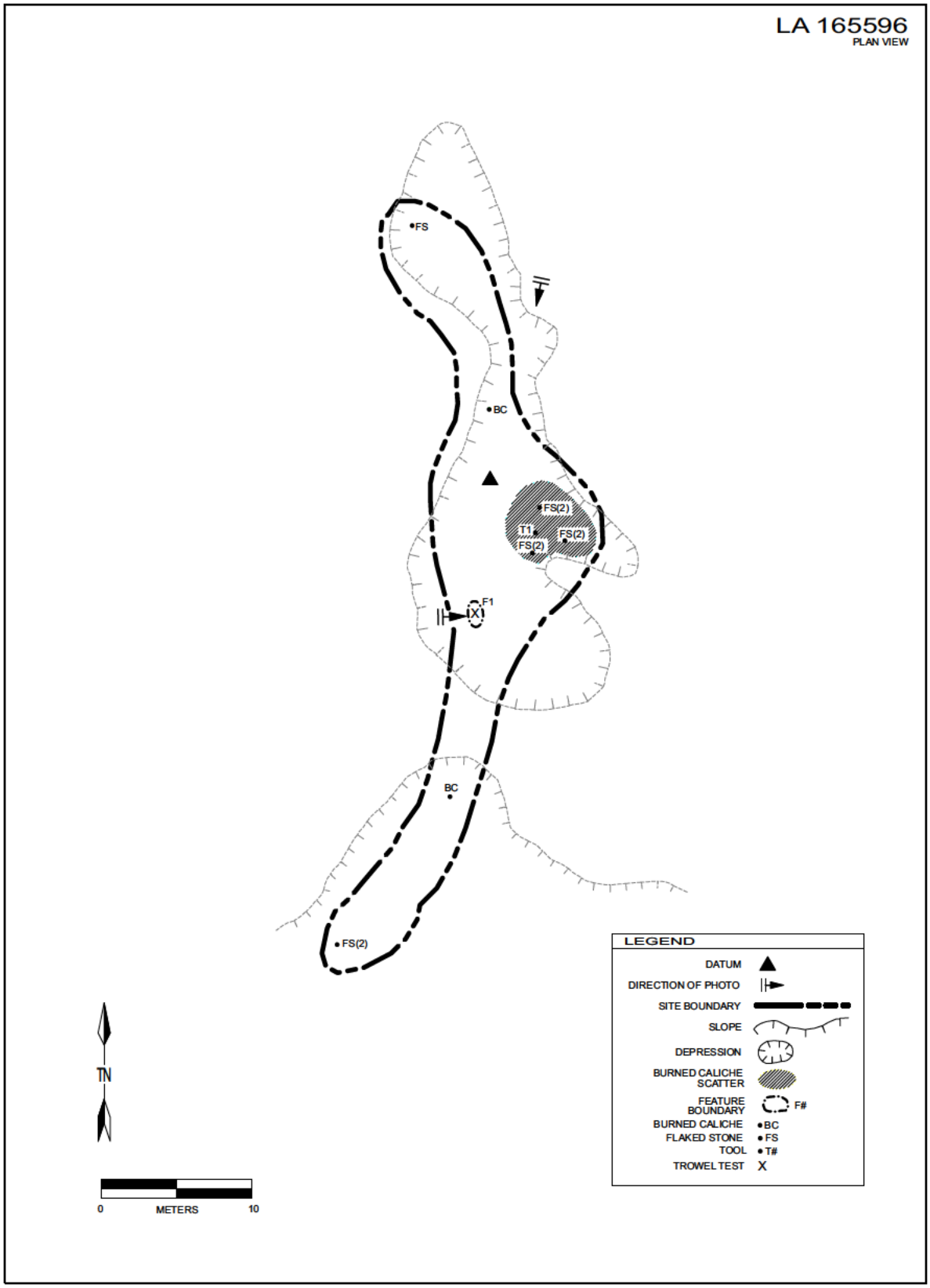

Figure 3.16: LA 165596 Site Map.

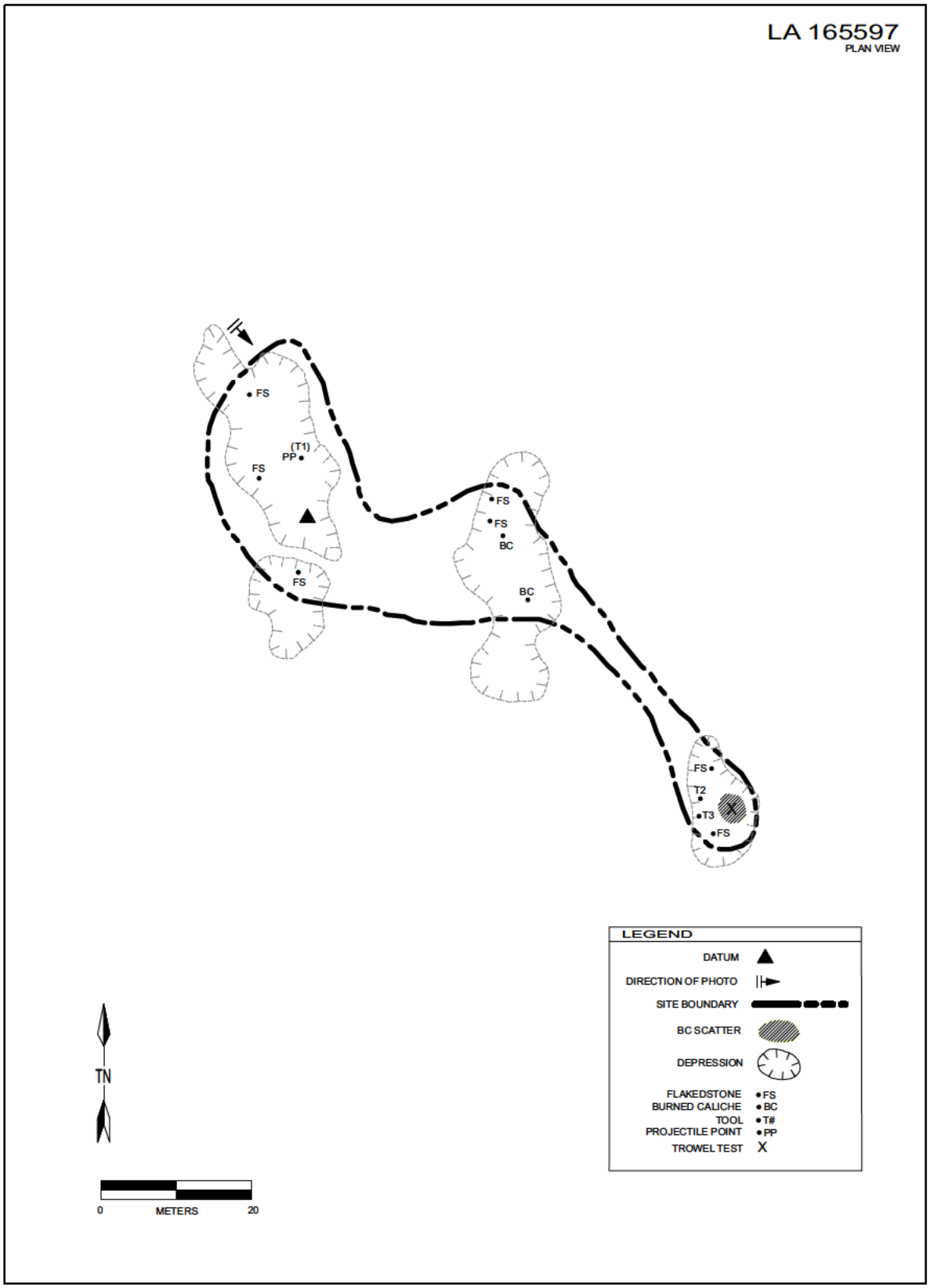

Figure 3.17: LA 165597 Site Map.

Figure 3.18: LA 165597 Tularosa Corner-Notched Projectile Point.

Conclusions

LA 165597 has a Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900) affiliation as suggested by the Tularosa Corner Notched type projectile point. It is unknown whether there are subsurface cultural materials on the site or what the data potential of any such deposits might be. Therefore, due to the unknown potential for additional significant data, the site is recommended to have an undetermined eligibility for nomination to the NRHP until its data potential can be determined.

LA 165598

Field Number: 908-01-004
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165598, [redacted] consists of a sparse artifact scatter (Figure 3.19). Vegetation includes creosote, desert sage, snakeweed, Christmas tree cholla, prickly pear cactus, white thorn acacia, various grasses, and various forbs. Visibility is 90 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 32 flaked-stone artifacts, including 27 pieces of debitage, four cores, and one tool. The debitage includes six primary reduction flakes (five purple quartzite, one gray chert) and 21 secondary reduction flakes (seven purple quartzite, three brown chert, four gray chert, one brown and gray chert, two clear and white chalcedony, one brown and white chert, one jasper, one gray and white chert). The cores consist of two unidirectional purple quartzite cores, one multidirectional purple quartzite core, and one multidirectional brown and gray chert core. The tool is one brown chert biface.

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment. No buried cultural material was observed. The depth of the sediment deposition on the site is estimated at 20 cm based on observations of the ridge edge along the northern site boundary.

Disturbances and Potential Impacts

Primary disturbances are wind erosion, water erosion and bioturbation. The site is estimated to be 51 percent to 75 percent intact.

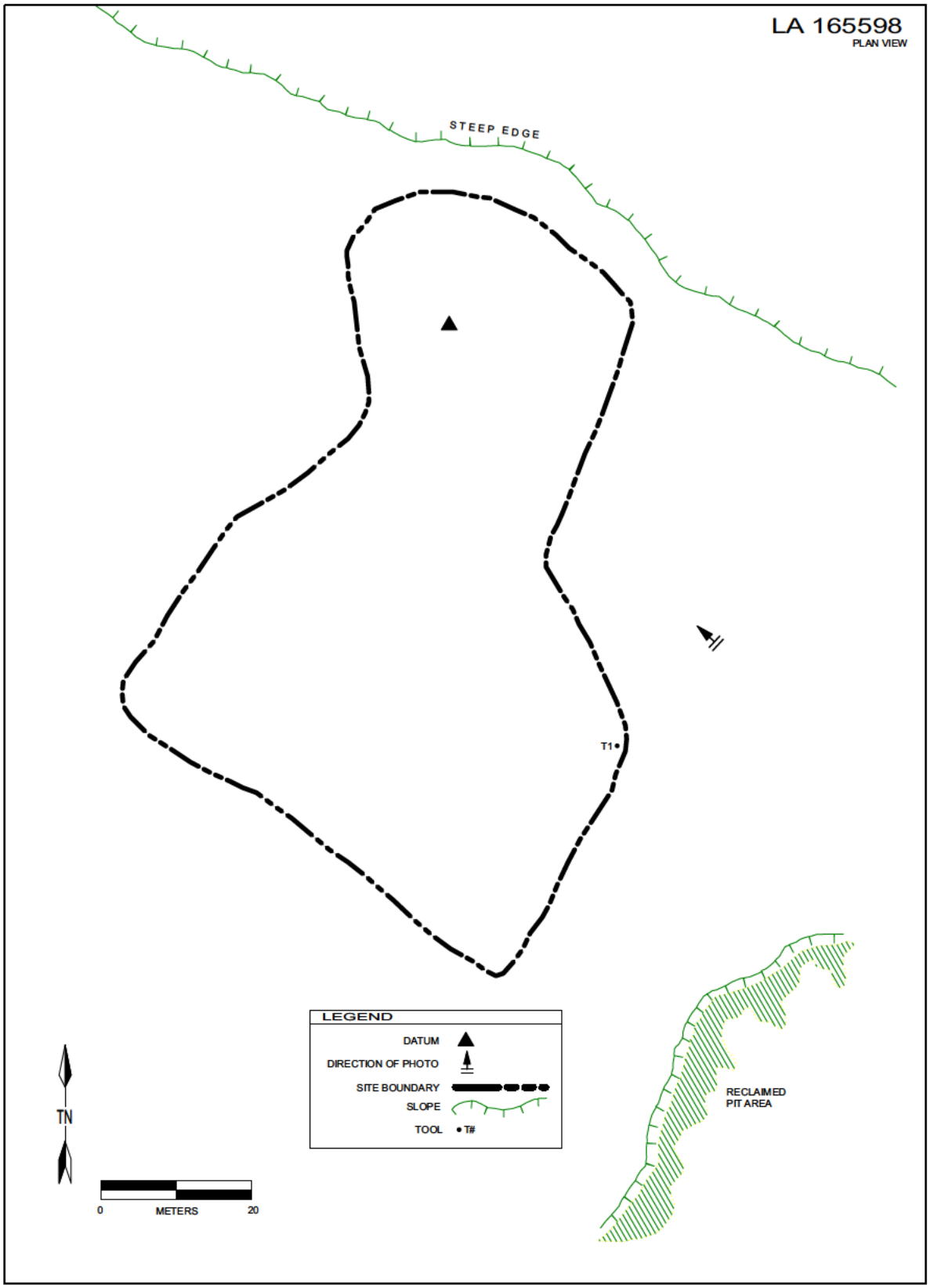

Figure 3.19: LA 165598 Site Map.

Conclusions

LA 165598 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on a lack of temporally diagnostic lithic artifacts. The site has a potential for containing subsurface cultural deposits, but the data potential of any such deposits is unknown. Therefore, the site is recommended to have an undetermined eligibility for nomination the NRHP.

LA 165599

Field Number: 908-01-005
Category: 2
Affiliation: Early to Late Archaic (4500 to 1500 B.C.)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165599, [redacted] consists of a sparse artifact scatter (Figure 3.20). Vegetation includes creosote, desert sage, snakeweed, Christmas tree cholla, prickly pear cactus, white thorn acacia, various grasses, and various forbs. Visibility is 80 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 28 flaked-stone artifacts, including 23 pieces of debitage, four cores, and one tool. The debitage includes six primary reduction flakes, nine secondary reduction flakes, and seven tertiary reduction flakes. Raw materials include locally available chalcedony (white, clear), quartzite (purple, brown), and chert (brown, red, white, orange). The cores consist of one dark green quartzite tested cobble, one brown chert unidirectional core, one brown and gray chert multidirectional core, and one purple quartzite tested cobble. The tool is a gray chert projectile point, similar to a San Jose point (Figure 3 21). San Jose points date from 4500 to 1500 B.C. (Justice 2002:133).

Features and Site Structure

No features were observed. The site is bounded on the southern side by a steep edge. A two-track road runs east-west through the southern edge of the site. The site is located in an eolian depositional environment. No buried cultural material was observed, however, sediments that could contain buried cultural deposits are estimated to be 20 cm based on observations of the ridge edge and road cut.

Disturbances and Potential Impacts

Primary disturbances are wind erosion, water erosion, bioturbation, and the two-track road. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165599 has an Early to Late Archaic (4500 to 1500 B.C.) component, as indicated by a San Jose point. The site may contain subsurface cultural

Figure 3. 21: LA 165599 San Jose Projectile Point.

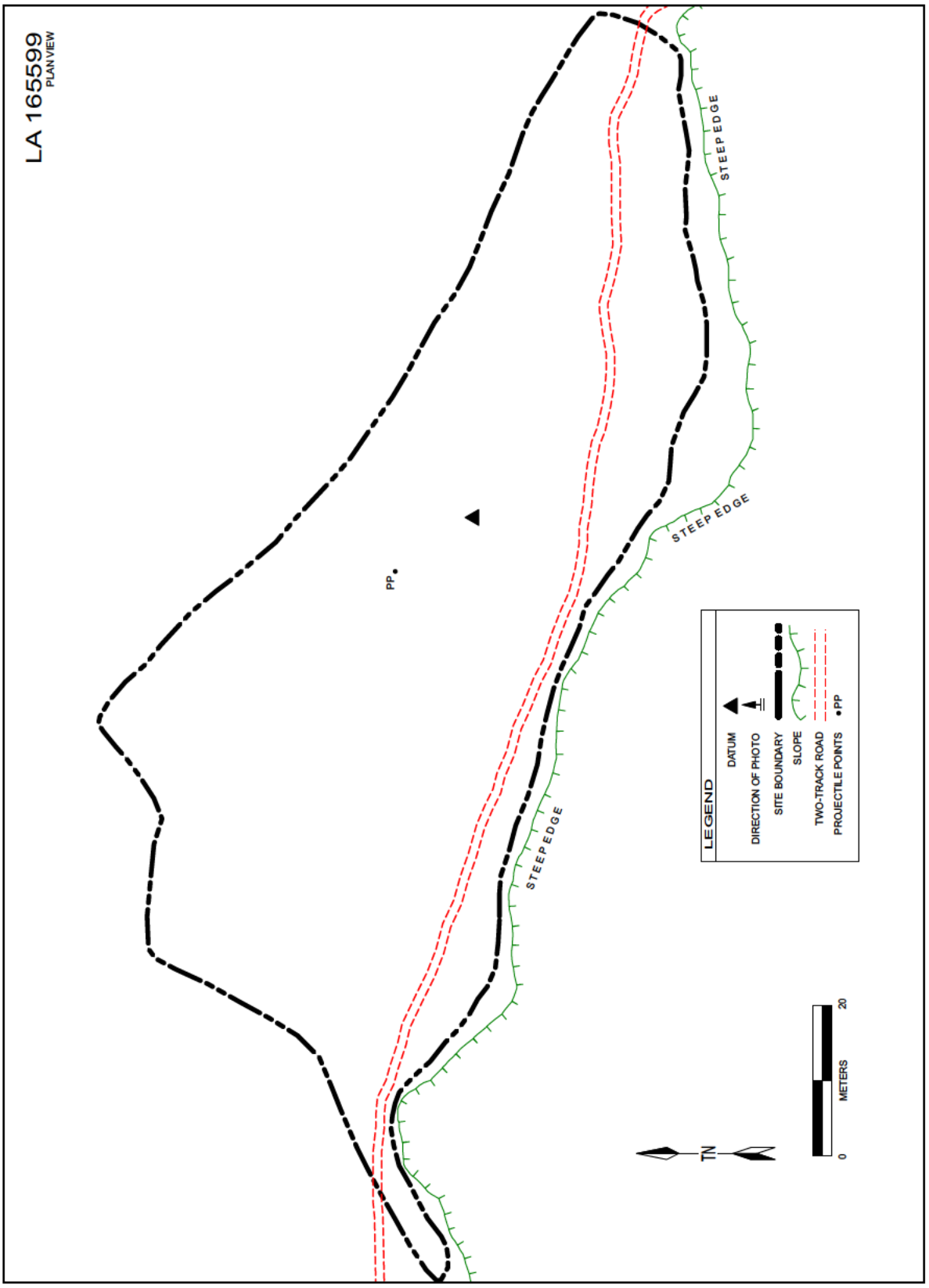

Figure 3.20: LA 165599 Site Map.

deposits, but the data potential of any such deposits is unknown. Therefore, the site is recommended to have an undetermined eligibility for nomination the NRHP.

LA 165600

Field Number: 908-01-006
Category: 2
Affiliation: Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500), possible Unspecified Plains (A.D. 1500 to 1880), Unknown Historic (A.D. 1907 to A.D. 1965)
Eligibility: Eligible, D
Site Type: Single Residence
Parcel: 4

Description

LA 165600 [redacted] This site consists of a heavy artifact scatter and 29 features (Figure 3 22). Although there are artifacts and fire-cracked rock scattered across the site, three distinct loci were observed in which features and artifacts were clustered more heavily. Vegetation includes mesquite, salt-cedar, white-thorn acacia, snakeweed, prickly pear cactus, horse crippler cactus, allthorn, various grasses, and various forbs. Visibility is 85 percent to 90 percent.

Assemblage

All observed tools and sherds were recorded. A representative sample of observed flaked-stone debitage, cores, groundstone, and shell was recorded. This sample was less than one percent of the General Scatter, five percent of shell, 10 percent of Locus 1, and 10 percent of Locus 2. No artifacts were recorded from Locus 3, although the presence of artifacts within features in this locus was noted in individual feature descriptions. The total analyzed assemblage consists of 498 flaked-stone artifacts; 27 pieces of groundstone; seven sherds; an estimated 203 bivalve shell fragments (Figure 3.23); and an estimated 208 historic artifacts including 29 cans, five bottles, an estimated 74 pieces of glass, and an estimated 100 pieces of wood.

A representative sample of the flaked-stone assemblage consists of 429 pieces of debitage, seven tools, and 62 cores. The debitage includes 56 primary reduction flakes, 151 secondary reduction flakes, 162 tertiary reduction flakes, 34 thinning flakes, 22 pressure flakes, and four pieces of angular debris. Raw materials include locally available chert (red, black, blue, white, brown, gray), chalcedony (clear, white), obsidian, and quartzite (purple, gray, green, pink). The tools consist of three brown chert scrapers, one clear chalcedony scraper, one gray limestone

Figure 3. 23: LA 165600 Bivalve Shell.

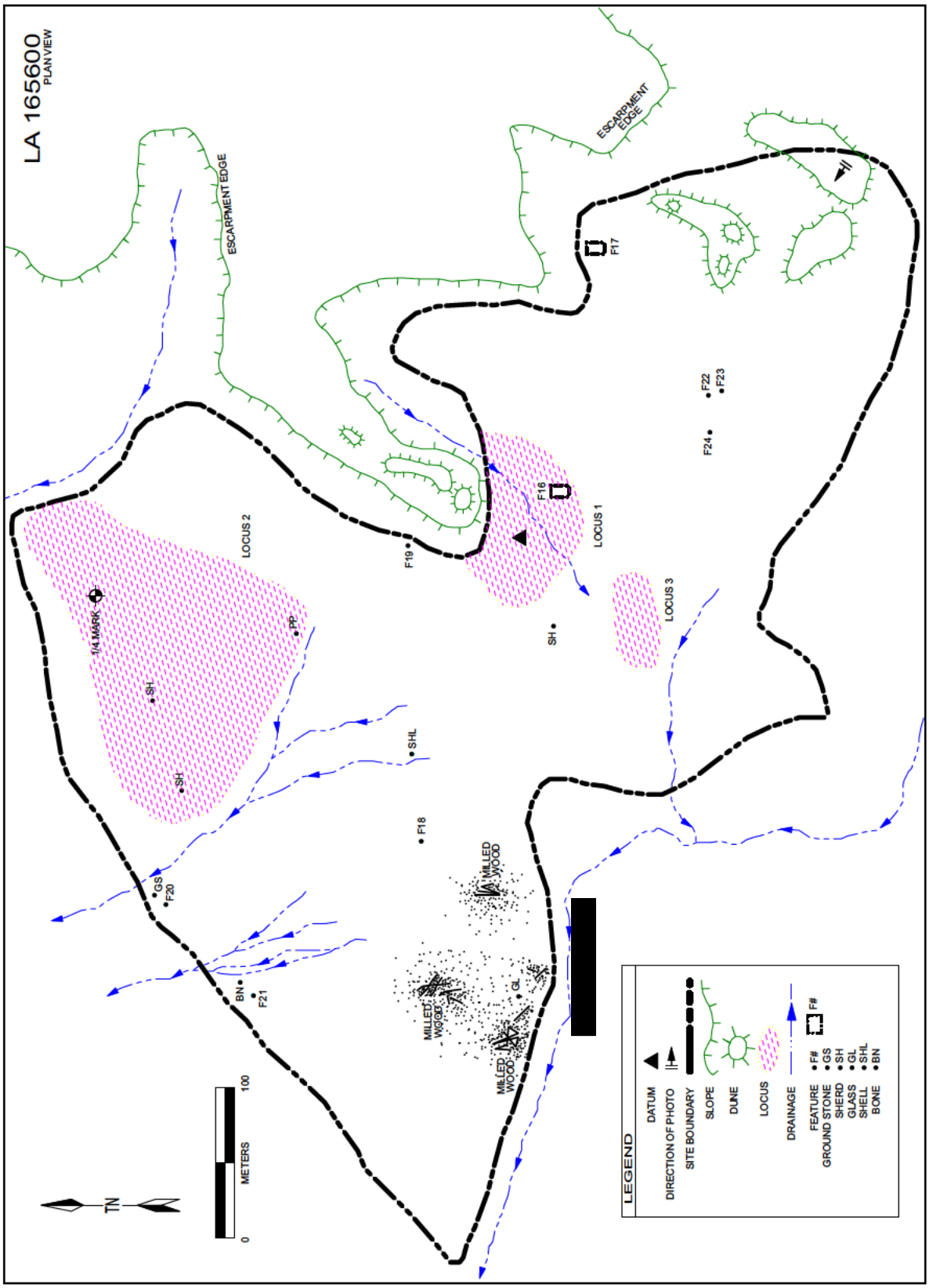

Figure 3.22: LA 165600 Site Map.

chopper, one purple quartzite uniface, and one black and clear obsidian projectile point base. The projectile point base has a distinctive form that is suggestive of an Awatovi Side notched (Justice 2002) or Harrell point (Turner and Hester 1999). This tri-notched point dates from A.D. 1250 into the Historic period (Justice 2002:317) which, for aboriginal groups in southeastern New Mexico ended around A.D. 1880. The cores include, in various colors, 29 quartzite cores (two unidirectional, six bidirectional, 12 multidirectional, and eight tested cobbles); 29 chert cores (seven unidirectional, three bidirectional, 16 multidirectional, and three tested cobbles); four rhyolite cores (two multidirectional, and two tested cobbles); and one chalcedony bidirectional core. Again, the raw materials include locally available chert (red, blue, white, brown, gray, tan, gray and green, yellow and gray), chalcedony (clear), quartzite (purple, gray, green, pink, brown, red, white and brown) and rhyolite (gray, black). The groundstone artifacts consist of five one-hand mano fragments (four sandstone, one rhyolite); two whole one-hand manos (one rhyolite, one sandstone); four slab metate fragments (two limestone, two sandstone); two slab metates (one limestone, one sandstone); seven basin metate fragments (sandstone); one basin metate (limestone); and six indeterminate metate fragments (five sandstone, one limestone). The ceramic artifacts include four El Paso Brown sherds (one possible bowl fragment (Figure 3.24), two Chupadero Black-on-white sherds, and one El Paso decorated sherd (El Paso Bichrome or El Paso Polychrome).

The cans include six sanitary cans, 12 smashed and rusted hole-in-top x-cut opened cans, one smashed and rusted three-part knife cut opened sardine or meat type can, eight smashed and rusted vent hole knife punch opened cans, and two two-part key strip opened external friction lid closure cans. The bottles consist of one clear glass three-part machine made possible syrup bottle with "Penick & Ford Ltd" (A.D. 1920 to 1965) and a an Owens-Illinois mark dating to 1959 or later on the base; and four glass liquor bottles (three clear and one brown) with the words "Federal Law Prohibits Reuse of this Bottle" and a screw cap, suggesting a date between A.D. 1932 and 1964. The glass includes 20 aquamarine shards, 12 blue shards, one blue base 75 percent intact that has the letter "M" in the center, an estimated 40 white opaque shards, and one white opaque bottle base with the letters "A" and "B." The "M" mark may date from A.D. 1907 to 1916, if it is in fact a Maryland Glass Corporation mark. The other marks). are unknown (Toulouse 1971). The wood consists of an estimated 100 pieces of milled wood including two decaying railroad ties.

Figure 3. 24: LA 165600 El Paso Brownware Sherds.

More than 30,000 pieces of burned caliche and fire-cracked rock were observed scattered across the area.

Features and Site Structure

Twenty-nine features were observed in total. Most of the features and artifacts are clustered into three loci, designated Loci 1, 2, and 3. The remainder is located in the General Scatter. As stated above, a judgmental sample of artifacts was recorded, though all artifacts observed in direct association with features were noted in individual feature descriptions below.

Locus 1 includes Features 1 through 13, and Feature 16. The recorded sample of artifacts includes 166 pieces of flaked-stone debitage, 20 cores, six pieces of groundstone, and one sherd.

Locus 2 consists of Features 14 and 15. The recorded sample of artifacts includes 261 pieces of flaked-stone debitage, 34 cores, five tools, nine pieces of groundstone, five sherds, an estimated 64 pieces of glass, and six cans

Locus 3 includes Features 25 through 29. No artifacts were recorded, although many were observed (please see above for explanation).

The General Scatter consists of Features 17 through 24 (Table 3.2). The recorded sample of artifacts includes two pieces of flaked-stone debitage, two tools, 12 pieces of groundstone, one sherd, 23 cans, five bottles, 20 shards of glass, and an estimated 100 pieces of milled wood.

The northeastern and eastern areas of the site are bounded by a very steep escarpment and a deep cut drainage that flows into the Pecos River approximately 100 m to 150 m to the north. The western and northwestern areas are bounded by the Pecos River flood plain, which has been impacted by recent salt cedar-removal activity. The southern and southwestern areas are bounded by Cedar Canyon Draw. The site slopes to the west and is crossed, especially in the northwestern portion, by numerous deep cut drainages.

Table 3.2: LA 165600 Feature Summary.

F No	Type	Dimensions (N/S by E/W)	Est. Depth	Comments	Location
1	FCR/BC Cluster	0.75 m by 1.25 m	15 cm	One flake was observed. No soil staining, charcoal, or ash was observed.	Locus 1
2	FCR/BC Cluster and Stain	3 m by 2 m	5 cm	Stain is 50 cm N/S to 60 cm E/W. Two tested cobbles and a few quartzite flakes were present. No charcoal was observed.	Locus 1
3	FCR/BC Cluster	1.0 m by 0.7 m	10 cm	No artifacts, soil staining, charcoal, or ash were observed.	Locus 1
4	FCR/BC Cluster	1.0 m by 0.6 m	None	No artifacts, soil staining, charcoal, or ash were observed.	Locus 1
5	FCR/BC Cluster	1 m by 1 m	None	Burned cobbles were observed eroding from the surface. One brown chert secondary reduction flake was present. No soil staining, charcoal, or ash was observed.	Locus 1
6	FCR/BC Cluster	70 cm by 40 cm	10 cm (mound ded)	A brown chert tertiary reduction flake and a white and brown chalcedony secondary reduction flake were present. No soil staining, charcoal, or ash was observed.	Locus 1

Table 3.2: LA 165600 Feature Summary. (Continued)

F No	Type	Dimensions (N/S by E/W)	Est. Depth	Comments	Location
7	FCR/BC Cluster with Two Stains	2 m by 3 m	5 cm	Two stains comprise this feature. One is located in the southwest portion and measures 22 cm by 45 cm. The other stain is in the southeast portion and measures 26 cm by 28 cm. A quartzite tested cobble was present. No charcoal or ash was observed.	Locus 1
8	Stain	37 cm by 38 cm	6 cm	This stain is located adjacent to Features 8 and 9. Two jasper tertiary reduction flakes and one grey chert secondary reduction flake were present. Charcoal was observed.	Locus 1
9	FCR/BC Cluster	1 m by 1 m	16 cm (mound ed)	One multidirectional core was present. No soil staining, charcoal, or ash was observed.	Locus 1
10	FCR/BC Cluster	50 cm by 80 cm	1 cm (mound ed)	The concentration is small and compact with some subsurface cobbles being exposed through erosion. Two white chert tertiary reduction flakes were present. No soil staining, charcoal, or ash was observed.	Locus 1
11	FCR/BC Cluster	1 m by 1 m	None	No artifacts, soil staining, charcoal, or ash were observed.	Locus 1
12	FCR/BC Cluster	1.0 m by 0.7 m	None	Eighty percent of the limestone cobbles were completely burned. No artifacts, soil staining, charcoal, or ash were observed.	Locus 1
13	FCR/BC Cluster	10 m by 21 m	None	The concentration is extremely dense and may represent five to six smaller features. Several flakes and cores were present. No soil staining, charcoal, or ash was observed.	Locus 1
14	FCR/BC Cluster	1 m by 1 m	None	Cores and flakes made of chert and quartzite, and pieces of shell were present. No soil staining, charcoal, or ash was observed.	Locus 2
15	FCR/BC Cluster	80 cm by 60 cm	1 cm (mound ed)	No artifacts, soil staining, charcoal, or ash were observed.	Locus 2
16	Rectangular Rock Alignment; Possible Structure	6 m by 5 m	N/A	F16 is a rectangular structure composed of four linear limestone cobble walls. Fragments of burned caliche were present within the feature. No artifacts, soil staining, charcoal, or ash were observed.	Locus 1
17	Rectangular Rock Alignment; Possible Structure	4 m by 3 m	N/A	F17 is a rectangular structure composed of four linear limestone cobble walls. No artifacts, soil staining, charcoal, or ash were observed.	General Scatter

Table 3.2: LA 165600 Feature Summary. (Continued)

F No	Type	Dimensions (N/S by E/W)	Est. Depth	Comments	Location
18	FCR/BC Cluster	1.25 m by 1.25 m	None	Groundstone and flakes were present. No soil staining, charcoal, or ash was observed.	General Scatter
19	FCR/BC Cluster	1.25 m by 1.25 m	None	No artifacts, soil staining, charcoal, or ash were observed.	General Scatter
20	FCR/BC Cluster	1.75 m by 2.00 m	None	Groundstone was present. No soil staining, charcoal, or ash was observed.	General Scatter
21	BC Cluster	1.2 m by 1.0 m	None	No artifacts, soil staining, charcoal, or ash were observed.	General Scatter
22	FCR/BC Cluster	1 m by 1 m	20 cm (mounded)	No artifacts, soil staining, charcoal, or ash were observed.	General Scatter
23	FCR/BC Cluster	1 m by 1 m	10 cm (mounded)	No artifacts, soil staining, charcoal, or ash were observed.	General Scatter
24	FCR/BC Cluster	5 m by 10 m	None	F 24 is a large concentration of BC/FCR in a heavily deflated area, possibly representing the remains of three to four features. Quartzite and chert flakes and groundstone were present. No charcoal, ash or soil staining was observed.	General Scatter
25	FCR/BC Cluster	1.2 m by 1.0 m	None	Three flakes and groundstone were present. No soil staining, charcoal, or ash was observed.	Locus 3
26	FCR/BC Cluster	75 cm by 75 cm	None	No artifacts, soil staining, charcoal, or ash were observed.	Locus 3
27	Stain	30 cm by 30 cm	None	F 27 is a dark carbon stain with charcoal flecks. No artifacts were observed.	Locus 3
28	FCR/BC Cluster	1.2 m by 1.0 m	None	No artifacts, soil staining, charcoal, or ash were observed.	Locus 3
29	FCR/BC Cluster	75 cm by 50 cm	None	No artifacts, soil staining, charcoal, or ash were observed	Locus 3

LA 165600 is located in an eolian, alluvial, and colluvial depositional environment. The depth of sediment deposits is estimated at 1.5 meters, based on examination of arroyo cuts. Subsurface cultural deposits were observed to an estimated depth of 5 cm to 1.5 m, based on trowel tests in Features 2, 7, and 8 and examinations of drainages.

Disturbances and Potential Impacts

The primary disturbance to the site is water erosion. Secondary disturbances are bioturbation and wind erosion. The site is 51 percent to 75 percent intact.

Conclusions

This is a multicomponent site with two or three possible temporal and cultural affiliations including an Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500) component, a possible Unspecified Plains Nomad (A.D. 1500 to 1880) component, and an Unknown Historic component (A.D. 1907 to 1965), as suggested by various temporally diagnostic artifacts. The possible Unspecified Plains Nomad component is suggested by the presence of an Awatovi side-notched/Harrell point, but this artifact may also be contemporary with the Jornada Mogollon ceramics found on the site. The site has an extensive

assemblage of artifacts and features including two possible habitation features (Features 16 and 17). The site has demonstrated the presence of buried cultural deposits and appears to contain additional significant data capable of answering regional research questions concerning chronology, subsistence, and settlement patterns. LA 165600 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165601

Field Number: 908-01-007
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165601 [redacted] The site consists of a light artifact scatter (Figure 3.25). Vegetation includes creosote, snakeweed, white thorn acacia, mesquite, allthorn, various grasses, and various forbs. Visibility is 85 percent.

Assemblage

All observed cores were recorded. A representational sample (60 percent) of the debitage was recorded. The analyzed assemblage consists of 92 pieces of flaked-stone debitage and 14 cores. The debitage includes 28 secondary reduction flakes, 51 tertiary reduction flakes, and 12 pieces of angular debris. Raw materials include locally available chert (red, black, gray, blue, green), quartzite (purple, red, gray), and siltstone (brown). The cores consist of three purple quartzite multidirectional cores, three purple quartzite tested cobbles, two purple quartzite unidirectional cores, one purple quartzite bidirectional core, one brown quartzite bidirectional core, one gray and red chert bidirectional core, one gray chert unidirectional core, one blue chert tested cobble, and one brown siltstone multidirectional core.

Features and Site Structure

No features were observed. The site is located in a colluvial depositional environment. No buried cultural material was observed. However, the depth of the sediments that could contain buried cultural material is estimated to be 10 cm to 1 m based on the depth of small rises and drainage cuts.

Disturbances and Potential Impacts

Primary disturbances are wind erosion and water erosion. A secondary disturbance is bioturbation due to cattle and wildlife activity. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165601 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on a lack of temporally diagnostic lithic artifacts. The site may contain subsurface cultural deposits, but the data potential or significance of any such deposits is unknown. The site is therefore recommended to have an undetermined eligibility for nomination the NRHP.

LA 165602

Field Number: 908-01-008
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1900 to 1945)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165602 [redacted] The site consists of light artifact scatter (Figure 3.26). Vegetation includes creosote, snakeweed, white thorn acacia, mesquite, allthorn, Christmas tree cholla, various grasses, and various forbs. Visibility is 85 percent.

Assemblage

All observed cores were recorded. A representational sample (50 percent) of the debitage was recorded. The assemblage consists of 115 flaked-stone artifacts and four historic buckets. The flaked-stone assemblage consists of 100 pieces of debitage, and 15 cores. The debitage includes four primary reduction flakes (quartzite); 25 secondary reduction flakes (22 quartzite, three chert); 53 tertiary reduction flakes (46 quartzite, five chert, one brown siltstone, one clear and white chalcedony) and 16 pieces of angular debris (15 quartzite, one brown siltstone). Quartzite occurs in purple, red, green, and gray. Cherts occur in gray, white, and red. The cores consist of two purple quartzite tested cobbles, one gray quartzite tested cobble, one gray quartzite unidirectional core, one brown quartzite unidirectional core, three purple quartzite bidirectional cores, one purple quartzite multidirectional core, two brown chert tested cobbles, one tan chert multidirectional core, one gray

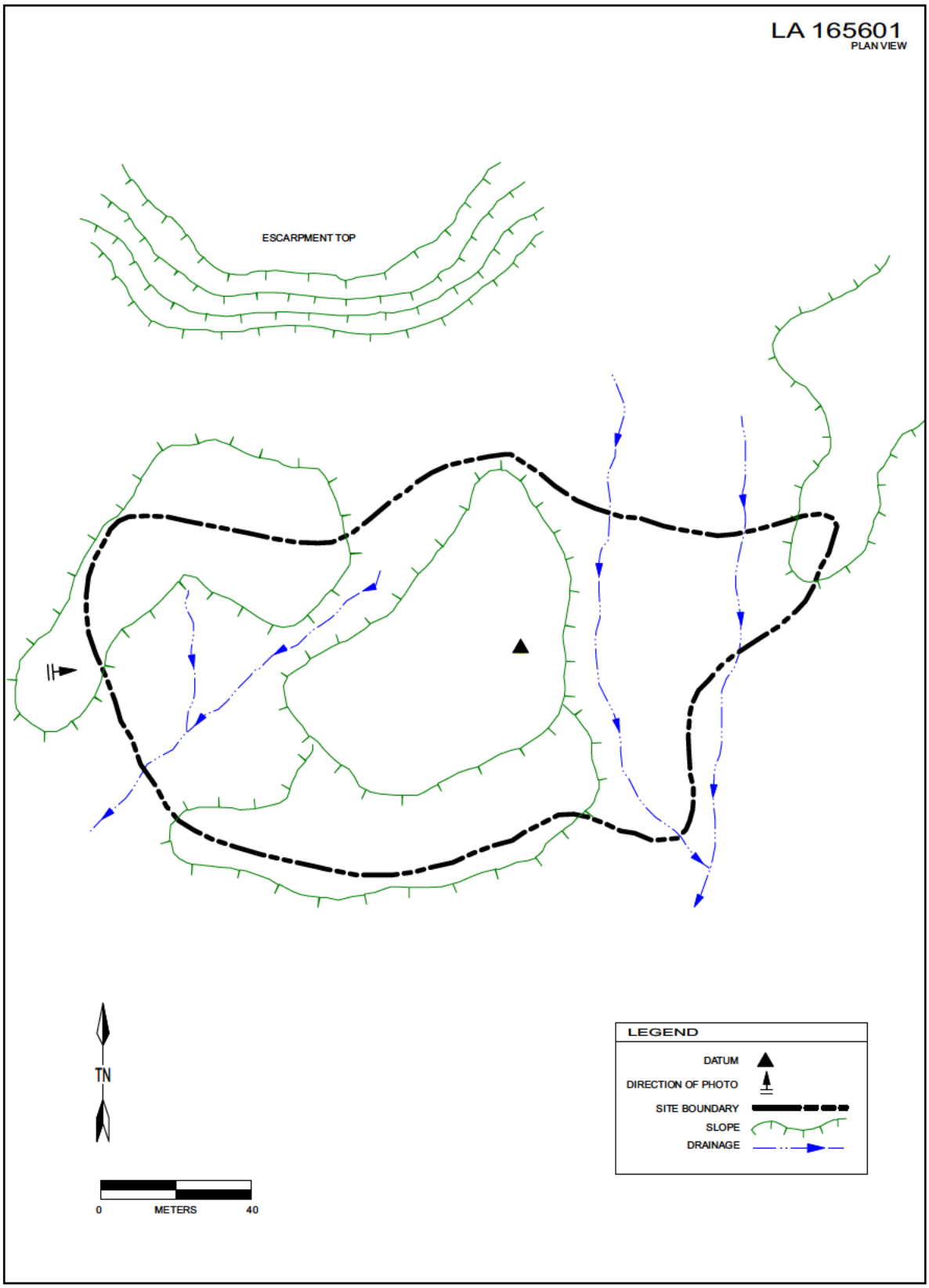

Figure 3.25: LA 165601 Site Map.

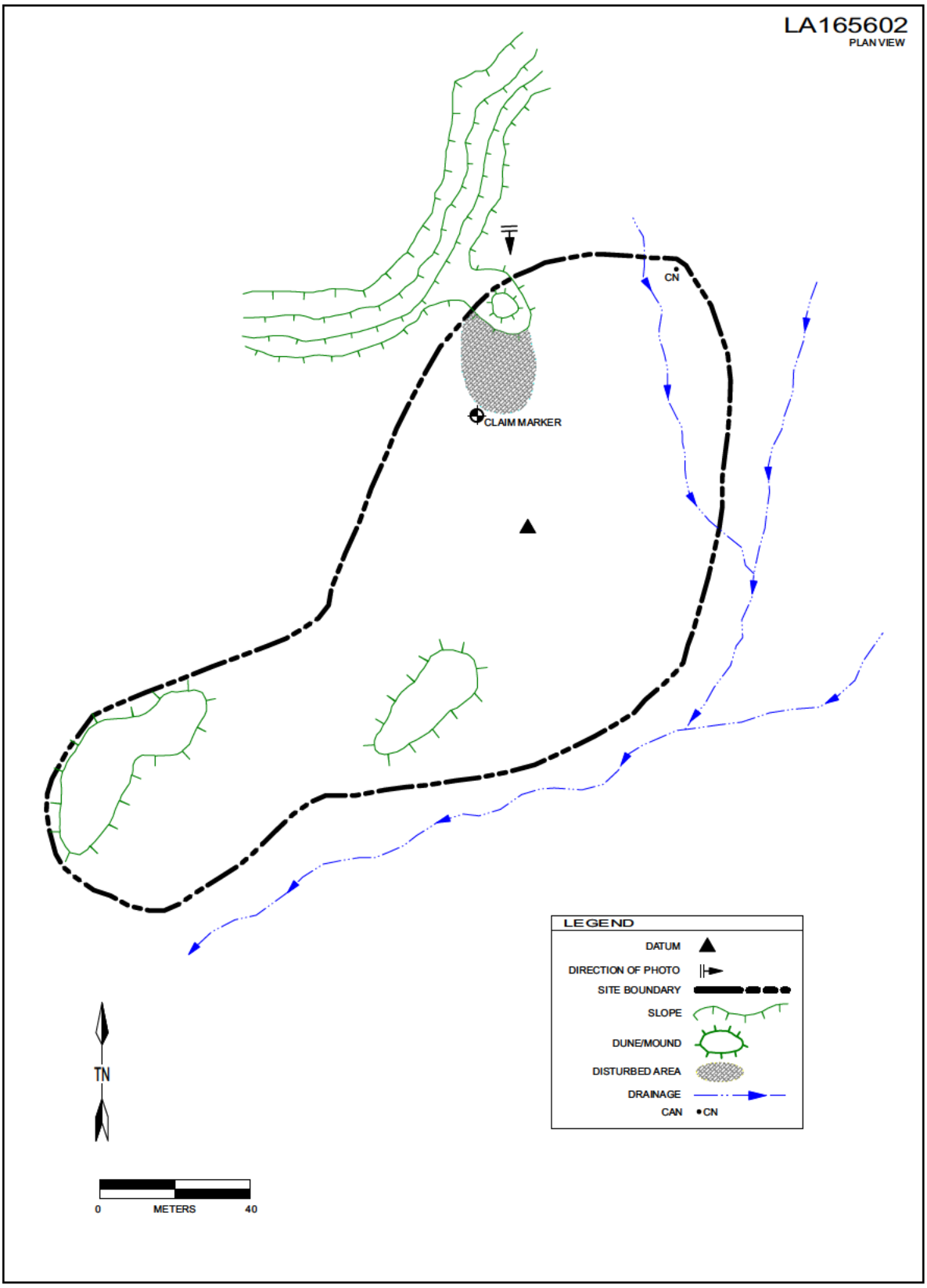

Figure 3.26: LA 165602 Site Map.

chert multidirectional core, one dark brown siltstone tested cobble, and one brown siltstone unidirectional core. The four buckets are smashed and rusted lard buckets, likely dating between A.D. 1900 and 1945.

Features and Site Structure

No aboriginal features were observed, but in the northern portion of the site there is an area that has been mechanically excavated, most likely for gravel (borrow) materials. There is also a collapsed rock cairn in the same area, which may have been a claim marker. It is unclear whether these features are associated with the lard buckets. It seems likely these features represent very recent disturbances on the landscape.

The site is located in a colluvial depositional environment. No buried material was observed. However, the depth of the sediment deposition that could contain buried cultural material is estimated to be 0 cm to 1 m, as indicated by the excavated depression and drainage cuts across the site area.

Disturbances and Potential Impacts

Primary disturbances are wind erosion, water erosion, and mechanical excavation. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

Artifacts on the site indicate an Unknown Aboriginal (9500 B.C. to A.D. 1880) component and an Unknown Historic (A.D. 1900 to 1945) component. LA 165602 has sufficient sedimentary depth to contain additional materials in buried contexts, although there is no evidence for or against the presence of any such deposits. Should any deposits be present, it is uncertain what significant data they may contribute to regional research designs. LA 165602 therefore is recommended to have an undetermined eligibility status.

LA 165603

Field Number: 908-01-009
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 3

Description

LA 165603, [redacted] consists of a light artifact scatter (Figure 3.27). Vegetation includes mesquite, shinnery oak, narrow-leaf yucca, snakeweed, little-leaf horse brush, and various grasses. Visibility is 26 percent to 50 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 91 flaked-stone artifacts and one piece of groundstone. The flaked-stone assemblage consists of 87 pieces of debitage, and four cores. The debitage includes 25 secondary reduction flakes (11 clear and white chalcedony, 11 chert of various colors, three quartzite in green, gray, and purple); 19 tertiary reduction flakes (one clear chalcedony, 16 chert in various colors, two quartzite); eight thinning flakes (six chert of various colors, two clear chalcedony); 30 pressure flakes (12 clear chalcedony, 18 chert in various colors); and five pieces of angular debris (all chert in various colors). The cores consist of three chert multidirectional cores (one brown and gray, one gray and white, one red); and one brown and gray quartzite unidirectional core. The groundstone includes one sandstone one-hand mano fragment. Approximately 100 pieces of fire-cracked rock were observed scattered across the site.

Features and Site Structure

No features were observed, although the presence of fire-cracked rock scattered across the site suggests that thermal features were present and have since deflated or remain in buried contexts.

The site is located in an eolian depositional environment. The southeastern area of the site has larger dunes, deeper blowouts, and contains the majority of the artifacts. No conclusive evidence of buried cultural material was observed, but artifacts are located on dune slopes and on both sides of dunes, suggesting buried deposits may be present. The depth of sedimentary deposits that could contain buried cultural material is estimated to be approximately 1 m.

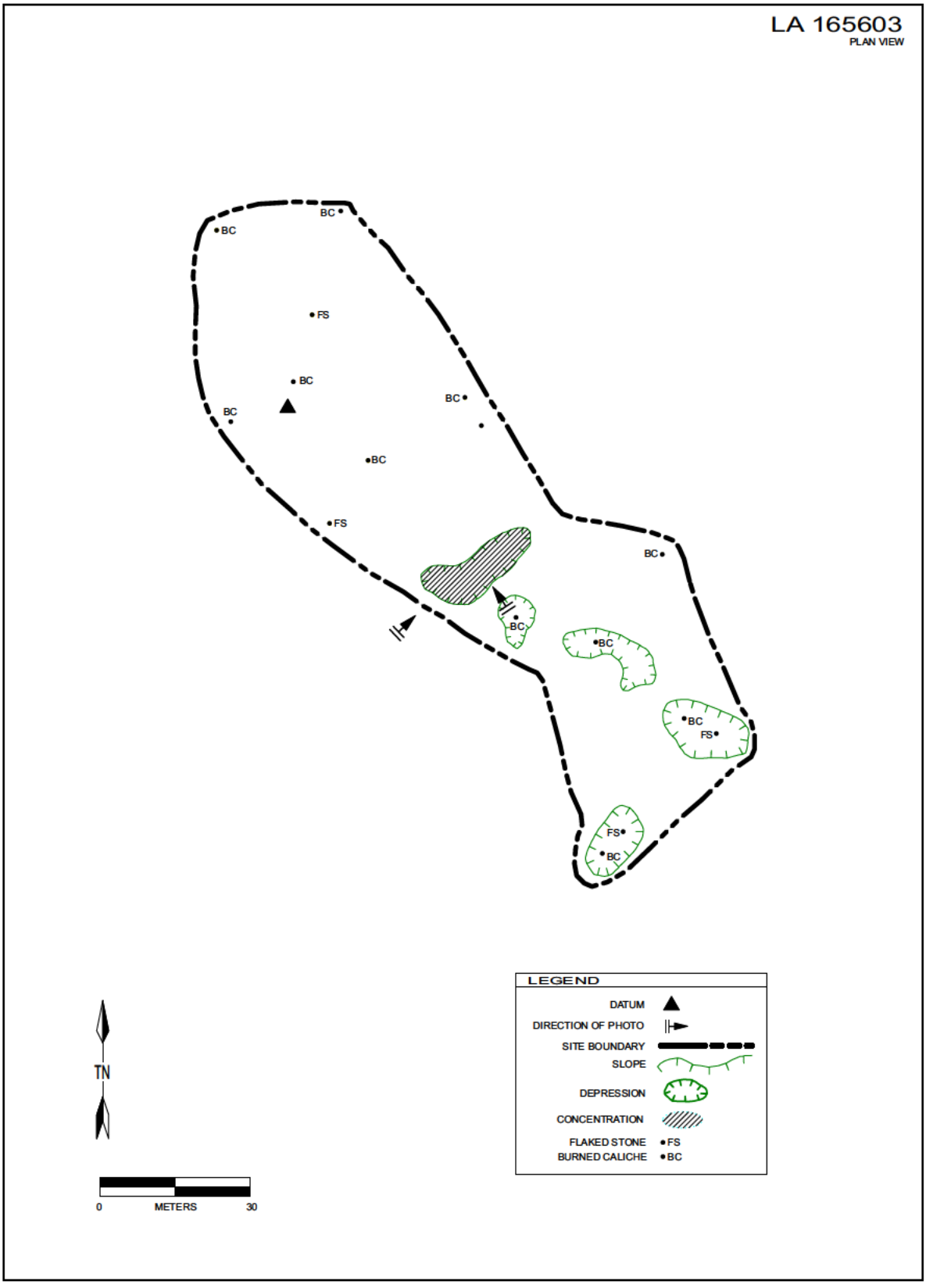

Figure 3.27: LA 165603 Site Map.

Disturbances and Potential Impacts

The primary disturbance to the site has been wind erosion. A secondary disturbance is bioturbation from cattle grazing and rodent burrowing. The site is estimated to be 26 percent to 50 percent intact.

Conclusions

LA 165603 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the site has a lithic assemblage that lacks temporally diagnostic artifacts. The site retains a potential for buried cultural deposits up to an estimated depth of 1 m. It is uncertain what the nature, extents, or potential to yield additional significant data any such deposits may have. LA 165603 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165604

Field Number: 908-01-010
Category: 2
Affiliation: Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 400 to 1500)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 4

Description

LA 165604 [redacted]

The site consists of seven features and a dense artifact scatter (Figure 3 28). Vegetation includes mesquite, four-wing saltbush, whitethorn acacia, allthorn, snakeweed, creosote, various grasses, and various forbs. Visibility is 80 percent to 90 percent.

Assemblage

A 20 percent judgmental sample of the observed lithic debitage was recorded. 100 percent of all other observed artifacts were recorded. The analyzed assemblage consists of 264 flaked-stone artifacts, six groundstone items, 44 ceramics, and one can. The flaked-stone assemblage consists of 241 pieces of debitage, 17 cores, and six tools. The debitage includes 192 secondary reduction flakes (88 quartzite, 87 chert, 12 chalcedony, 5 rhyolite); 34 tertiary reduction flakes (13 quartzite, 15 chert, six chalcedony); and 15 pieces of angular debris (three quartzite, nine chert, three chalcedony). Quartzites occur in red, brown, gray, and yellow. Cherts occur in gray, green, red, white, and brown. Chalcedony occurs in clear/brown and white. Rhyolite occurs in gray and brown. The cores consist of eight quartzite multidirectional (cores three red, four gray, 1 brown); four chert multidirectional cores (two brown, one black, one gray); two quartzite tested cobbles (red); one brown quartzite bidirectional core, and one gray quartzite unidirectional core. The tools include two brown chert unifaces, one gray rhyolite chopper, one brown quartzite uniface, one gray quartzite scraper, and one brown quartzite chopper. The groundstone consists of two limestone one-hand manos, two sandstone one-hand manos, and two sandstone metate slab fragments. The ceramics include 35 El Paso Brown sherds, eight Chupadero Black-on-white sherds (Figures 3.29 and 3.29a), and one Three Rivers Red-on-terracotta sherd. The can is an intact oil can measuring 28 cm in diameter and 20 cm in height. This can does not appear to represent an historic component. More than 2,000 pieces of fire-cracked rock and burned caliche were observed scattered across the site.

Features and Site Structure

Seven features were observed. Feature 1 is a 2.5-m by 1.0-m fire-cracked rock and burned caliche cluster with a stain. The concentration consists of approximately 350 pieces of thermally altered limestone, sandstone, and caliche that range in size from 1 cm to 11 cm, averaging 5 cm. 85 percent of the cobbles were burned completely. The stain measures 9 cm N/S by 20 cm E/W. No trowel test was conducted; however, the feature is estimated to have a depth of at least 1 cm. Charcoal was noted. No artifacts or ash were observed. The feature is 70 percent intact.

Feature 2 is a 6-m by 2-m fire-cracked rock and burned caliche cluster with a stain. The concentration consists of approximately 600 pieces of thermally altered limestone, sandstone, and caliche that range in size from 1 cm to 14 cm, averaging 7 cm. The stain is located in the northern portion of the feature and measures 9 cm N/S by 20 cm E/W. No trowel test was conducted; however, the feature is estimated to have a depth of at least 1 cm. One El Paso Brown sherd and one multidirectional core were present in the concentration. Charcoal was observed. No ash was seen. The feature is 70 percent intact and located adjacent to a drainage.

Feature 3 is a 70-cm by 100-cm fire-cracked rock and burned caliche cluster with a stain. The concentration consists of approximately 100 pieces of thermally altered limestone, sandstone, and caliche that range in size from 1 cm to 10 cm, averaging 6 cm. The stain measures 12 cm N/S by 7 cm E/W. No trowel test was conducted and the feature is esti-

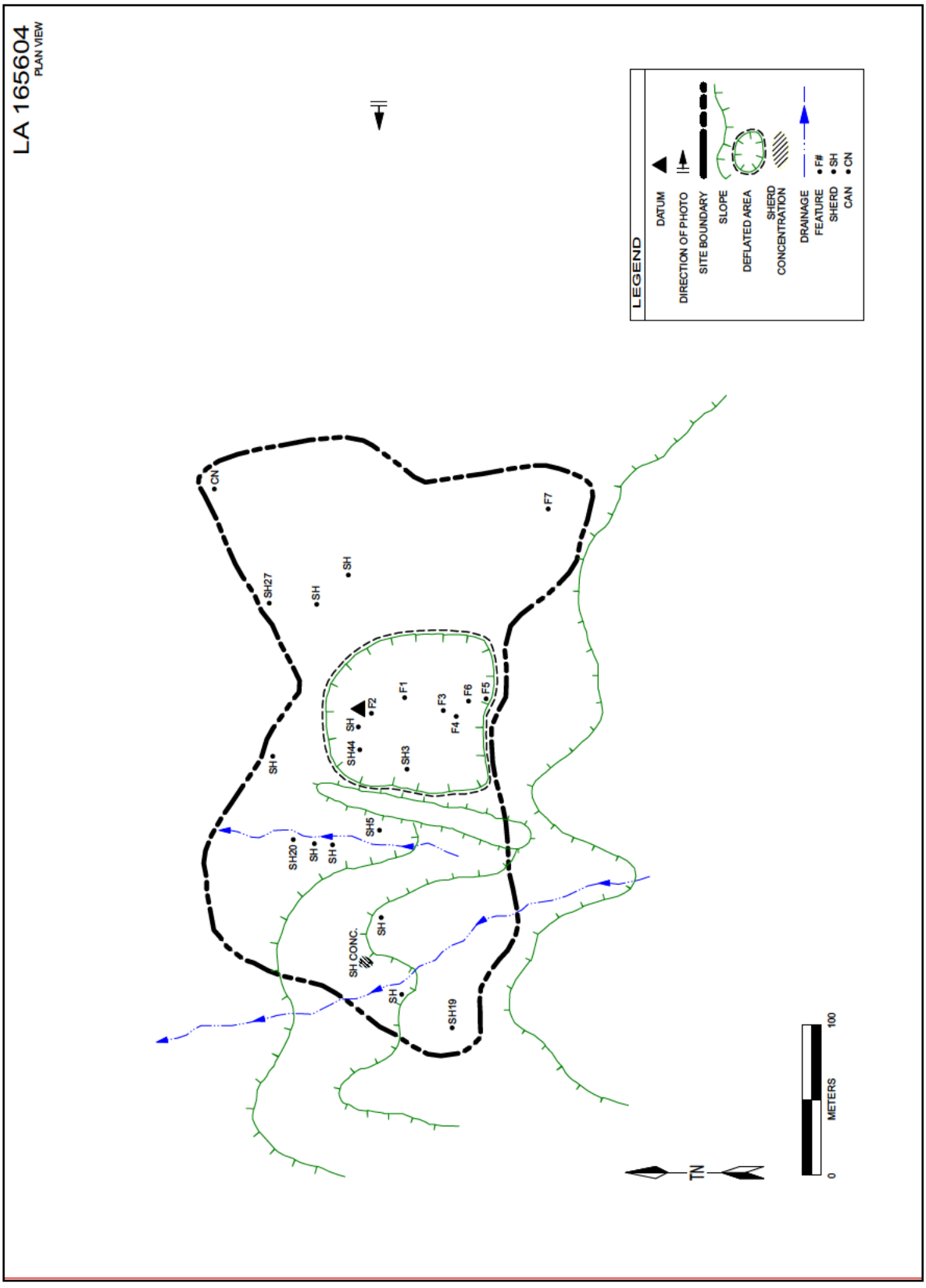

Figure 3.28: LA 165604 Site Map.

Figure 3.29: LA 165604 Three Rivers Red-on-terracotta and Chupadero Black-on-white Sherds.

Figure 3. 29a: LA 165604 Chupadero Black-on-white Sherds.

mated to have no depth. Charcoal was observed. No artifacts or ash were present. The feature is 40 percent intact and has been heavily deflated due to its location in a drainage.

Feature 4 is a 37-cm by 48-cm fire-cracked rock and burned caliche cluster with a stain. The concentration consists of approximately 50 pieces of thermally altered limestone, sandstone, and caliche that range in size from 2 cm to 11 cm, averaging 10 cm. The stain measures 8 cm N/S by 7 cm E/W. The feature is estimated to have a depth of 4 cm. Partially buried burned caliche and sandstone cobbles were noted. Charcoal was observed. No artifacts or ash were present. The feature is 75 percent intact.

Feature 5 is a 30-cm by 50-cm fire-cracked rock and burned caliche cluster with a stain. The concentration consists of approximately 25 pieces of thermally altered limestone and caliche that range in size from 1 cm to 11 cm, averaging 7 cm. The stain measures 18 cm N/S by 20 cm E/W. The feature is estimated to have no depth. Charcoal was observed. No artifacts or ash were present. The feature is 30 percent intact and heavily deflated due to its location in a drainage.

Feature 6 is a 1-m by 1-m fire-cracked rock and burned caliche cluster with a stain. The concentration consists of approximately 45 pieces of thermally altered limestone, sandstone, and caliche that range in size from 7 cm to 21 cm, averaging 15 cm. The stain measures 11 cm N/S by 30 cm E/W. The feature is estimated to have a depth of 7 cm, based on examination of an adjacent drainage. Charcoal was observed. No artifacts or ash were present. The feature is 25 percent intact, having become deflated by water action.

Feature 7 is a 100-cm by 80-cm fire-cracked rock and burned caliche cluster. The concentration consists of approximately 160 pieces of thermally altered limestone and caliche that range in size from 2 cm to 20 cm, averaging 10 cm. The feature is estimated to have a depth of 7 cm, based on the estimated depth of exposed subsurface cobbles. No artifacts, charcoal, or ash were observed. The feature is 40 percent intact and located adjacent to a drainage.

The site is located in an eolian and colluvial depositional environment. Buried material was observed within features and could be present elsewhere on the site at depths of between 0 cm and 1 m, as indicated by the examination of drainage cuts.

Disturbances and Potential Impacts

The primary disturbances are water and wind erosion. A secondary disturbance is bioturbation from cattle grazing and rodent burrowing.

Conclusions

Given the quantity of features and thermally altered materials, the site was likely reused over a substantial period of time. Artifacts on the site indicate an Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 400 to 1500) temporal and cultural affiliation. The site has buried cultural deposits that are capable of yielding additional significant data addressing regional research questions concerning chronology and subsistence. LA 165604 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165605

Field Number: 908-01-100
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 2

Description

LA 165605, [redacted], consists of a general artifact scatter (Figure 3.30). Vegetation includes mesquite, shinnery oak, broom snakeweed, sage, various grasses, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete in-field analysis on all of the observed artifacts. The assemblage consists of 61 pieces of flaked-stone debitage, 18 tools, six cores, 11 groundstone artifacts, and 42 ceramic artifacts. The debitage includes five primary reduction flakes (three white chert, one gray chert, one black rhyolite), 19 secondary reduction flakes (seven white chert, one beige chert, four gray chert, seven red chert), three tertiary reduction flakes (two white chert, one purple quartzite), 16 biface-thinning flakes (two white chert, two red jasper, two purple quartzite, ten red chert), and 18 pieces of angular debris (13 white chert, three beige chert, two gray chert). The raw materials include chert, quartzite, and rhyolite. The tools include three chert bifaces (two gray chert, one white chert), one chert knife (gray chert), two chert choppers (one gray chert, one white chert), one quartzite chopper (gray),

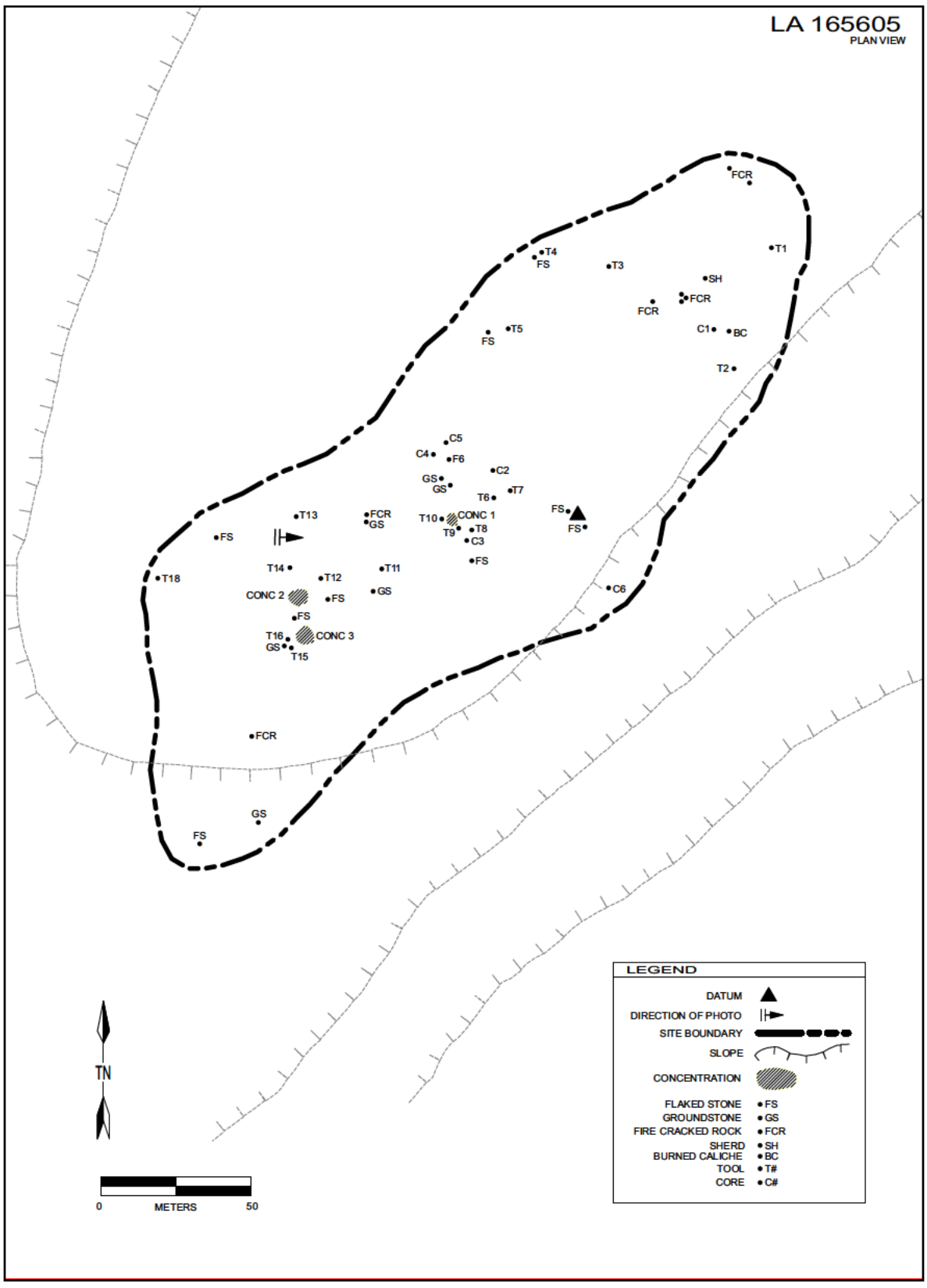

Figure 3.30: LA 165605 Site Map.

four chert unifaces (two white chert, one gray chert, one brown chert), four chert scrapers (one black chert, one white chert, two gray chert), one quartzite scraper (purple), one rhyolite scraper (red), and one chert graver (red and gray). The cores include two chert tested cobbles (one white and gray, one white) and four chert multidirectional cores (two white, one gray, one gray and black). The groundstone artifacts consist of a complete sandstone slab metate, one complete sandstone pestle, seven indeterminate sandstone metates, one complete sandstone one-hand mano, and one sandstone one-hand mano fragment. The ceramic artifacts include 40 El Paso brownware sherds and two Jornada Brown sherds. Approximately one hundred pieces of burned caliche were observed scattered across the site.

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment and based on the height of dunes on the site, the range of sedimentation varies between 10 to 50 cm in interdunal areas, and 100 to 200 cm in dunal areas. Based on observations of partially buried artifacts eroding out of dune slopes and artifacts located on both sides of dunes, Lone Mountain determined that further subsurface materials may be present to depths varying between 10 cm to 200 cm.

Disturbances and Potential Impacts

Wind erosion, water erosion, rodent burrowing, and cattle grazing have disturbed the site. Overall the site is 51 percent to 75 percent intact.

Conclusions

LA 165605 has been assigned an Unspecified Jornada Mogollon (A.D. 400 to 1300) affiliation based on the artifact assemblage. The site has potential to yield subsurface cultural material. Because of the unknown data potential of any subsurface cultural material, the site is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165606

Field Number: 908-01-101
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 2

Description

LA 165606, [redacted], consists of a general artifact scatter (Figure 3.31). Vegetation includes mesquite, shinnery oak, little-leaf horse brush, yucca, broom snakeweed, four-wing saltbush, various grasses, and various forbs. Visibility is 26 percent to 50 percent.

Assemblage

Lone Mountain conducted a complete analysis on all of the observed artifacts. The assemblage consists of 13 pieces of flaked-stone debitage, three tools, two cores, six groundstone artifacts, and six ceramic sherds. The debitage includes two primary reduction flakes (one white chalcedony, one white chert), two secondary reduction flakes (white chert), one biface-thinning flake (gray chert), and eight pieces of angular debris (three white chalcedony, five white chert). The raw materials include chert and chalcedony. The tools include two chert scrapers (one red and yellow, one gray), and a chert biface (gray). The cores include two chert multidirectional cores (one gray, one white). The groundstone artifacts consist of five sandstone indeterminate metate fragments, one complete sandstone trough metate, and one complete sandstone one-hand mano. The ceramic artifacts include three Jornada brownware sherds and three El Paso brownware sherds. Twenty pieces of burned caliche were observed scattered across the site.

Features and Site Structure

No features were observed on the site. The site is located in an eolian depositional environment. Due to the varying height of dunes in the area, sedimentation depth is estimated between 5 cm and 200 cm. Based on the observation of partially buried artifacts eroding out of dune slopes, and located on both sides of the dunes, the site maintains potential for subsurface cultural material.

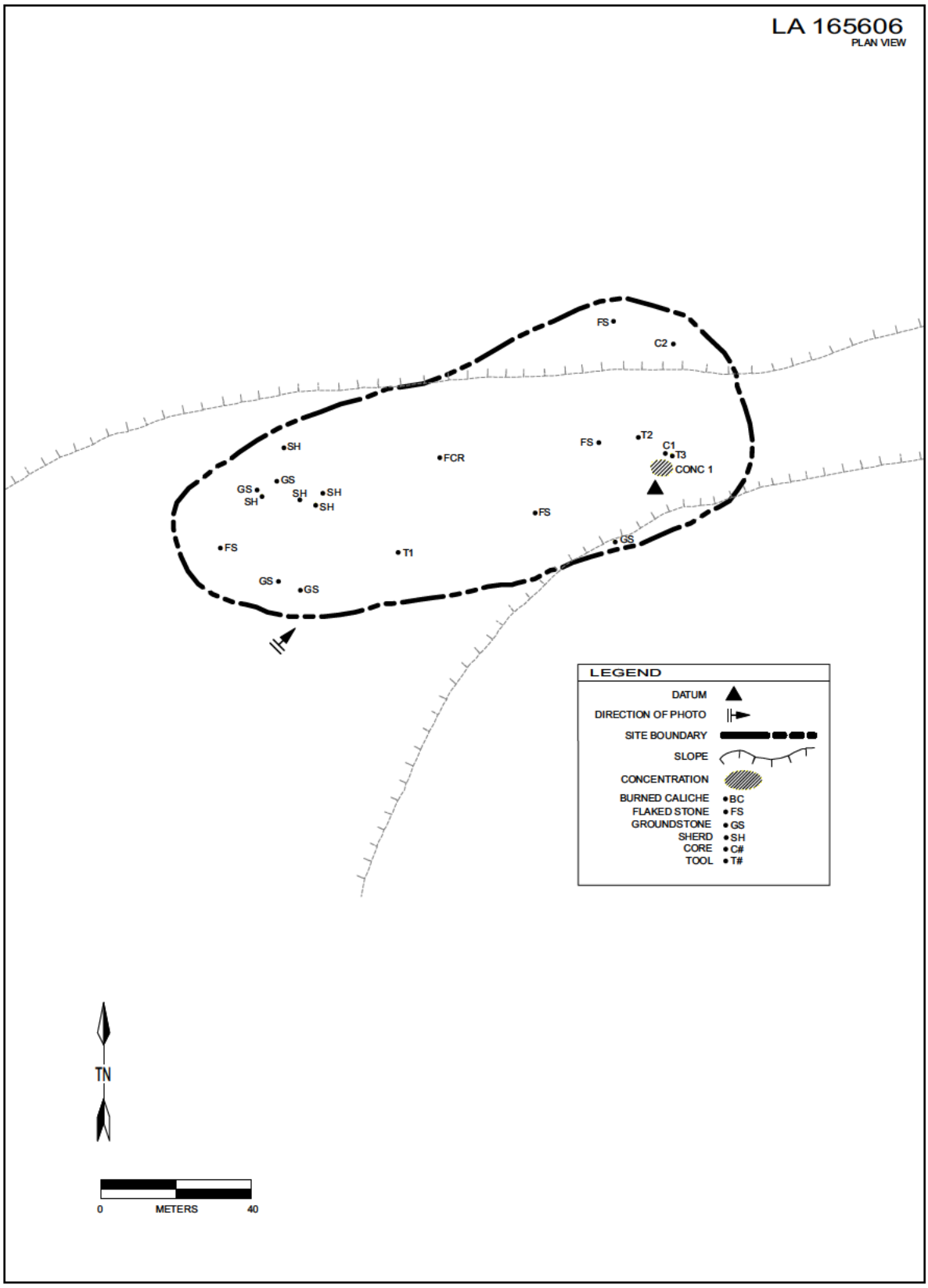

Figure 3.31: LA 165606 Site Map.

Disturbances and Potential Impacts

Wind erosion and cattle grazing have disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165606 has been assigned an Unspecified Jornada Mogollon (A.D. 400 to 1300) affiliation based on the artifact assemblage. There is a possibility that additional cultural materials are present in buried contexts, although no direct evidence of subsurface cultural material was observed. Therefore, due to the unknown data potential of any subsurface cultural materials, the site is recommended as having an undetermined eligibility for nomination to the NRHP.

LA 165607

Field Number: 908-01-102
Category: 1
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 2

Description

LA 165607, [redacted] consists of a sparse artifact scatter (Figure 3.32). Vegetation includes mesquite, shinnery oak, and broom snakeweed. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain conducted a complete analysis on all of the observed artifacts. The assemblage consists of 13 pieces of flaked-stone debitage, including four secondary reduction flakes, two tertiary reduction flakes, one biface thinning flake, and six pieces of angular debris. The raw materials include locally obtained chert (red, black, tan, gray) and chalcedony (clear, white).

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment. The site may contain additional cultural material in subsurface contexts, as suggested by partially buried artifacts eroding out of dune slopes that are up to 2 m in height.

Disturbances and Potential Impacts

Wind erosion and cattle grazing have disturbed the site, leaving it 26 percent to 50 percent intact.

Conclusions

LA 165607 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on the lack of temporally diagnostic artifacts. There is a possibility that subsurface cultural materials are present, although no direct evidence of subsurface cultural material was observed. Therefore, due to the unknown nature or data potential of subsurface cultural material, the site is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165608

Field Number: 908-01-103
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 2

Description

LA 165608, [redacted] consists of two features with a sparse artifact scatter (Figure 3.33). Vegetation includes mesquite, shinnery oak, little-leaf horse brush, broom snakeweed, various grasses, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete analysis on all of the observed artifacts. The assemblage consists of 10 pieces of flaked-stone debitage, including three secondary reduction flakes, one biface thinning flake, and six pieces of angular debris. The raw materials include locally obtained chert (tan, red, brown) and chalcedony (clear, white).

Features and Site Structure

Two features were observed on the site. Feature 1 is a 2-m by 1-m burned caliche cluster with a height of 1 cm. The cluster consists of 25 pieces of burned caliche that range in size from 1 cm to 21 cm, averaging 10 cm. No staining, charcoal, or artifacts were observed. The feature has been disturbed by water erosion and is heavily disarticulated and deflated, remaining only 20 percent intact.

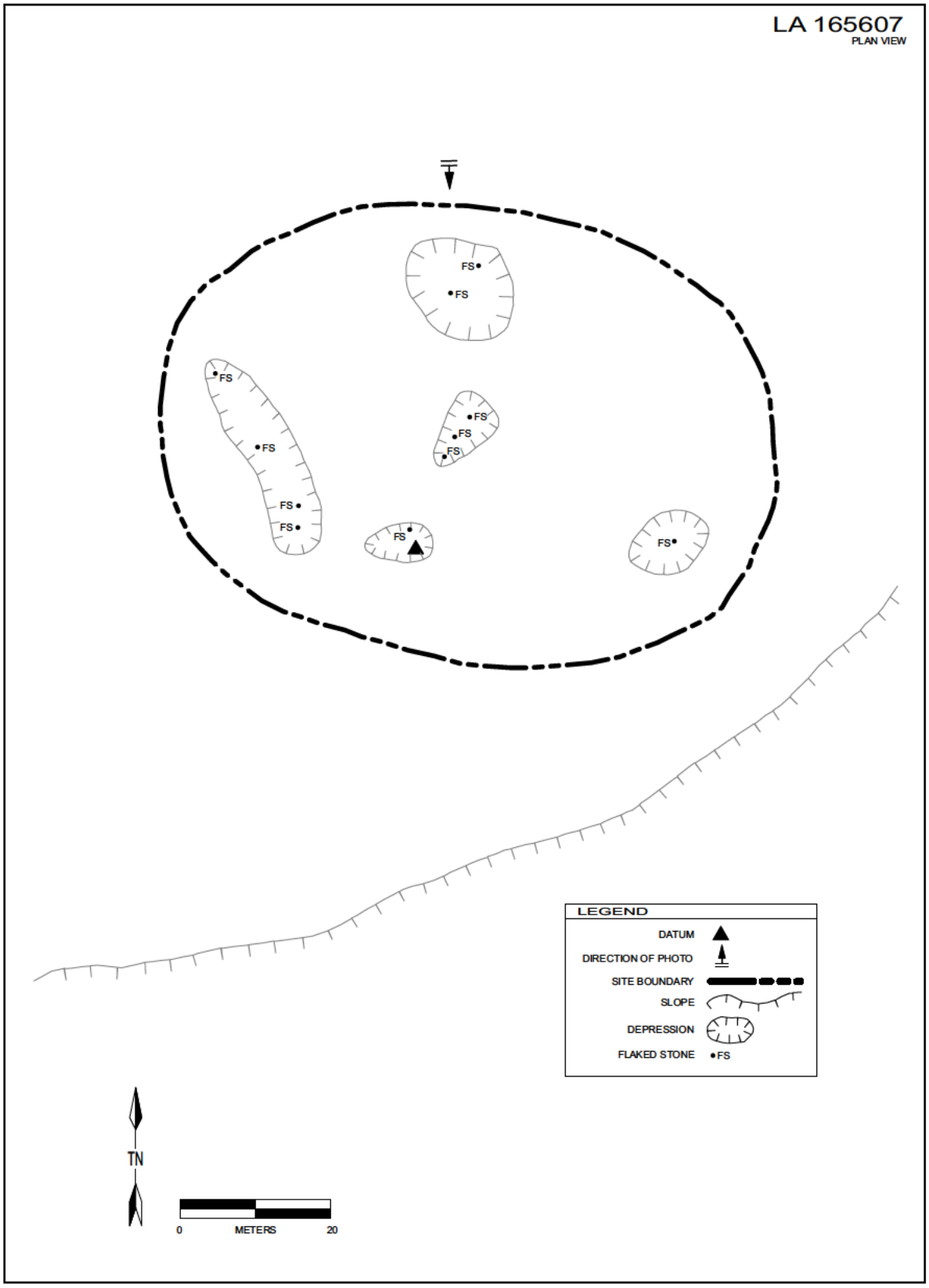

Figure 3.32: LA 165607 Site Map.

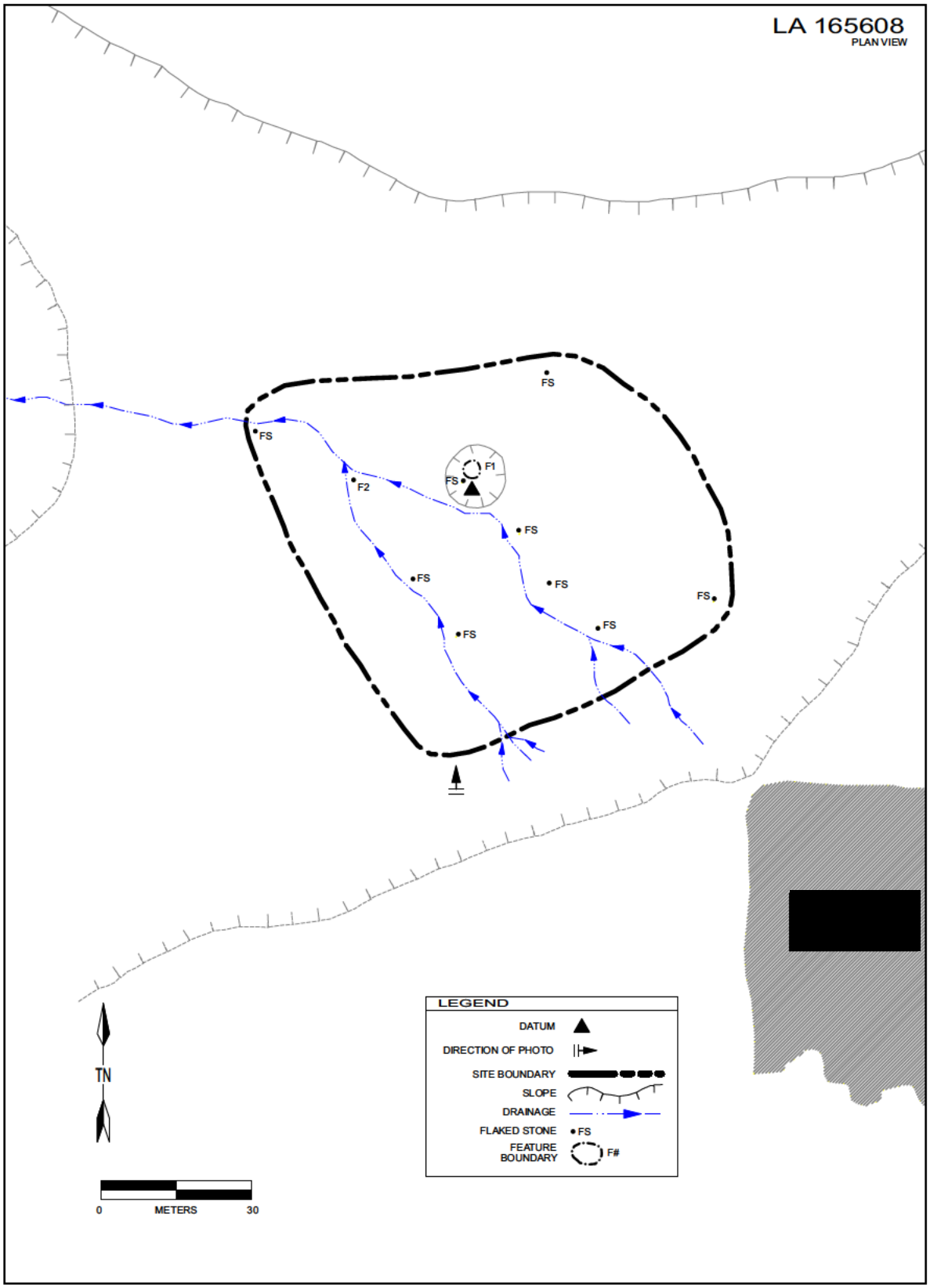

Figure 3.33: LA 165608 Site Map.

Feature 2 is a 1-m diameter burned caliche cluster. The cluster consists of 14 pieces of burned caliche that range in size from 3 cm to 15 cm, averaging 12 cm. No staining or charcoal was observed. One piece of chalcedony angular debris was observed in association. The feature has a height of 5 cm. The feature is very disturbed by water erosion and is only 5 percent intact.

The site is located in an eolian and alluvial depositional environment. Sedimentation depth is based on the estimated one-meter high dunes within the area. The presence or absence of any subsurface cultural material is unknown, but is possible within the dunes themselves, or in un-eroded areas containing aeolian deposits.

Disturbances and Potential Impacts

Water erosion and cattle grazing have seriously disturbed the site. Overall, the site is 20 percent intact.

Conclusions

LA 165608 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on the lack of diagnostic artifacts. There is a possibility that subsurface cultural material is present, although no evidence of such material was observed. Features 1 and 2 may produce OSL/TL dates and lipid residues and are therefore capable of producing additional significant data concerning chronology and subsistence. The site is recommended eligible for nomination to the NRHP under Criterion D.

LA 165609

Field Number: 908-01-104
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 2

Description

LA 165609, [redacted] consists of four features with an associated artifact scatter (Figure 3.34). Vegetation includes shinnery oak, mesquite, little-leaf horse brush, sage, and broom snakeweed. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted an in-field analysis of a 50 percent judgmental sample of the flaked-stone debitage and a 100 percent analysis on all of the cores, ceramic, and groundstone artifacts. The artifacts were recorded in a general scatter and a concentration. The recorded flaked-stone debitage from the general scatter consists a total of 48 pieces that include four primary reduction flakes, 12 secondary reduction flakes, 19 tertiary reduction flakes, two biface-thinning flakes, two pressure flakes, and nine pieces of angular debris. The recorded flaked-stone debitage from Concentration 1 includes three primary reduction flakes, 22 secondary reduction flakes, 16 tertiary reduction flakes, three biface-thinning flakes, one pressure flake, and seven pieces of angular debris. The raw materials include locally obtained quartzite (purple, amber, brown, gray), chert (tan, black, red, white, gray), and chalcedony (white, clear). The tools, all observed in Concentration 1, consist of three scrapers (one gray chert, one red and black chert, one gray quartzite) and one hammerstone (tan chert). The cores from the general scatter consist of two multidirectional cores (white chalcedony), one tested cobble (white chert), and two bidirectional cores (one purple quartzite, one white chalcedony). The cores from Concentration 1 consist of three multidirectional cores (two white chalcedony, one clear chalcedony), one tested cobble (purple quartzite), and one bidirectional core (white chalcedony). One multidirectional core (white chalcedony) was observed in Feature 4. The groundstone artifacts, all of which were from Concentration 1, consist of three sandstone slab metate fragments and one sandstone one-hand mano. The ceramic artifact observed within the concentration is an El Paso brownware sherd. Burned caliche was observed scattered across the site.

Features and Site Structure

Artifacts are more concentrated in the northeastern portion of the site. This higher density of artifacts (Concentration 1) is in area measuring 20 m N/S by 60 m E/W.

Four features were observed on the site. Feature 1 is a 1.0-m by 0.7-m burned caliche cluster with a height of 1 cm. The cluster consists of 35 pieces of burned caliche that range in size from 1 cm to 6 cm, averaging 3 cm. No staining or charcoal was observed. Three flakes were observed in association. The feature has been disturbed by plant and wildlife bioturbation, remaining 10 percent intact.

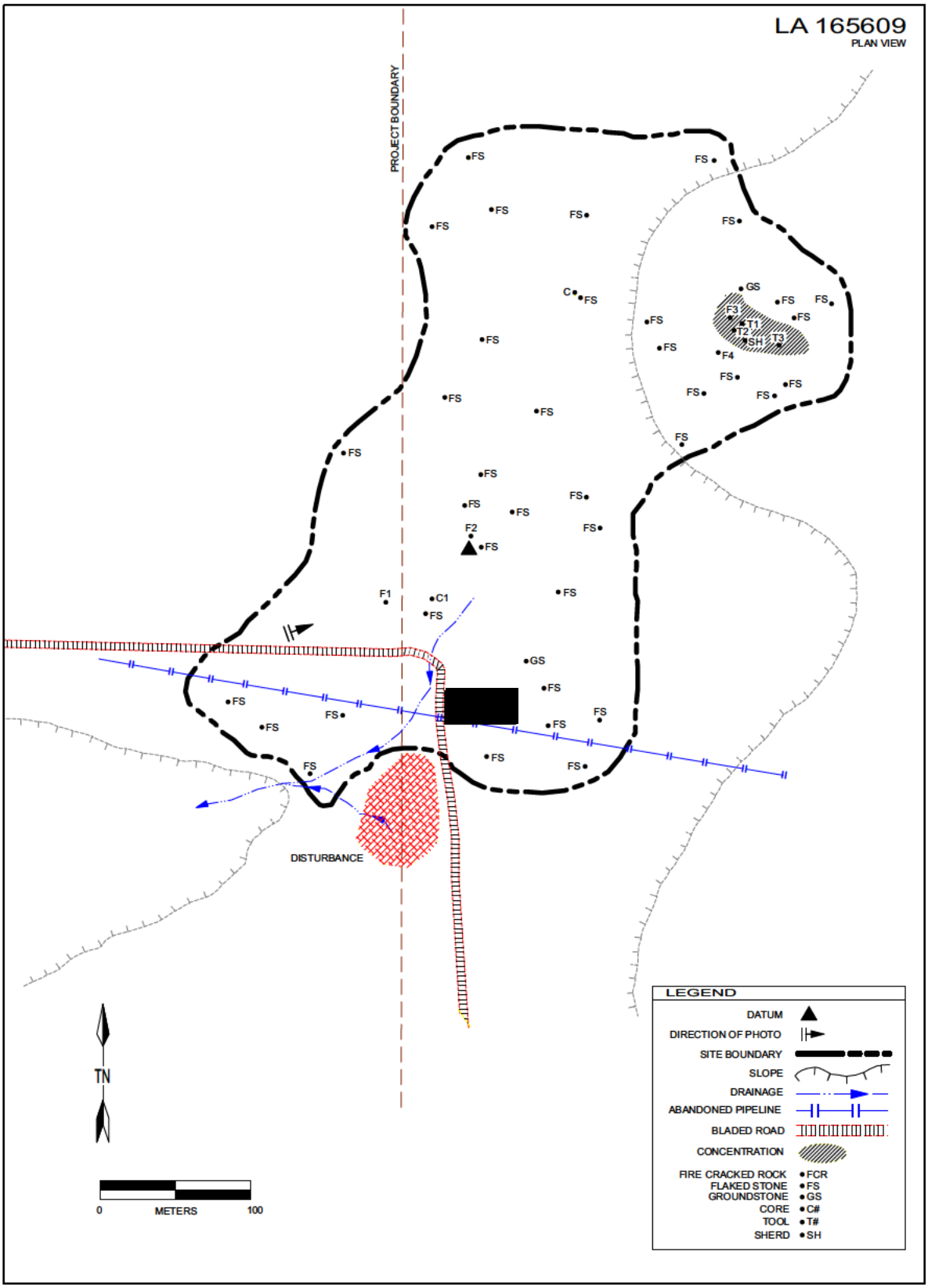

Figure 3.34: LA 165609 Site Map.

Feature 2 is a 60-cm by 45-cm stain. A trowel test was conducted, revealing subsurface staining to a depth of 3 cm. One piece of angular debris was observed in association. The feature is 40 percent intact.

Feature 3 is a 1-m by 3-m burned caliche concentration with staining. The depth could not be determined. The feature consists of 50 pieces of burned caliche that range in size from 3 cm to 7 cm, averaging 3 cm. No charcoal was observed. Twenty-one flakes were observed in association. The feature is heavily disarticulated and deflated, having been disturbed by water erosion, and remains only 5 percent intact.

Feature 4 is a 2-m diameter burned caliche concentration with staining. The feature has a height of 2 cm. The feature consists of 65 pieces of burned caliche that range in size from 2 cm to 10 cm, averaging 6 cm. No charcoal was observed. One flake was observed in association. The feature is heavily disarticulated and deflated, remaining 20 percent intact.

The site is located in an eolian and colluvial depositional environment. The estimated depth of sediments varies across the site from 5 cm to 300 cm based on the dune height. Trowel testing and the observation of artifacts eroding from dune slopes as well as partially buried artifacts in aeolian deposits at the base of the dunes, suggest the possible presence of subsurface cultural materials at depths from 5 cm up to 200 cm.

Disturbances and Potential Impacts

Water erosion, wind erosion, cattle grazing, pipeline construction, and road activities have heavily disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165609 has been assigned an Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300) affiliation based on the artifact assemblage. The site has data potential based on the presence of subsurface cultural materials. The features may yield TL/OSL dates, C14 dates, and microbotanical and macrobotanical remains. The site may produce chronometric dates and subsistence data useful for addressing regional research questions concerning chronology and subsistence. Therefore, based on the additional data potential and research potential, the site is recommended eligible to the NRHP under Criterion D.

LA 165610

Field Number: 908-01-105
Category: 2
Affiliation: Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 1

Description

LA 165610, [redacted] consists of one feature with an associated artifact scatter (Figure 3.35). Vegetation includes shinnery oak, mesquite, sage, yucca, broom snakeweed, and various annual grasses. Visibility is 26 percent to 50 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of 29 pieces of flaked-stone debitage, six tools, and three cores. The debitage consists of two primary reduction flakes (purple quartzite), nine secondary reduction flakes (four gray chert, two white chert, one black chert, one gray quartzite, one purple quartzite), four tertiary reduction flakes (gray chert), four biface-thinning flakes (two white chert, one gray rhyolite, one yellow chert), and 11 pieces of angular debris (one gray chert, eight white chert, one yellow chert, one red chert). The raw materials include chert, rhyolite, and quartzite. The tools include two chert scrapers (one gray, one white), one quartzite uniface (gray), one quartzite hammerstone (gray), one chert uniface (white), and one white chert Tularosa Corner Notched type projectile point (Figure 3.36) with a date range of 100 B.C. to A.D. 900 (Justice 2002). This projectile point was collected. The cores consist of two chert multidirectional cores (one white, one gray) and a chert tested cobble (white). Burned caliche is scattered across the site.

Features and Site Structure

One feature was observed. Feature 1 is a 1-m by 2-m fire-cracked rock cluster. The cluster consists of 30 pieces of fire-cracked limestone that range in size from 2 cm to 10 cm, averaging 6 cm. No staining, charcoal, or artifacts were observed. A trowel test was conducted, revealing no subsurface deposits. The feature is 20 percent intact.

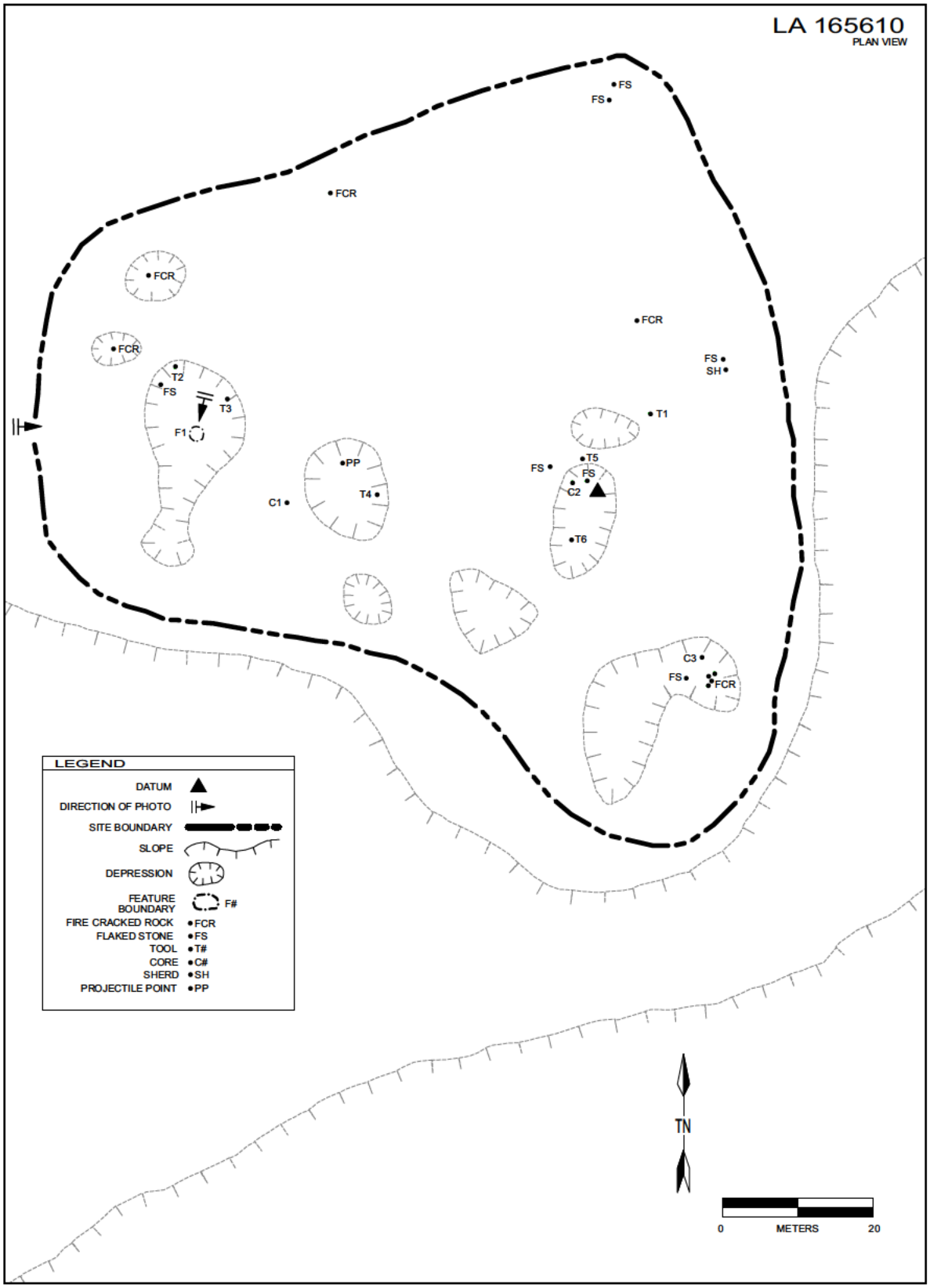

Figure 3.35: LA 165610 Site Map.

Figure 3.36: LA 165610 Tularosa Corner Notched Type Projectile Point.

The site is located in an eolian depositional environment. The estimated depth of sediments varies from 5 cm to 40 cm in blowouts to 40 cm to 200 cm in dunes. The possibility of subsurface cultural material exists on the site, as partially buried artifacts and fire-cracked rock were observed in aeolian deposits, eroding out of the dune, and on both sides of the dune. No direct evidence of subsurface cultural material was observed, however.

Disturbances and Potential Impacts

Wind erosion and cattle grazing have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165610 has been assigned a Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900) affiliation based on the temporally diagnostic projectile point. The site has a feature that may produce OSL/TL dates as well as lipid residues. The site has the potential to yield additional significant data that may address regional research questions concerning chronology and subsistence. Therefore, LA 165610 is recommended eligible for nomination to the NRHP under Criterion D.

LA 165611

Field Number: 908-01-106
Category: 2
Affiliation: Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 1

Description

LA 165611 [redacted], consists of three features with a sparse artifact scatter (Figure 3.37). Vegetation includes mesquite, four-wing saltbush, creosote, broom snakeweed, and sage. Visibility is 26 percent to 50 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of 49 pieces of flaked-stone debitage, six cores, two tools, and three groundstone artifacts. The debitage consists of one primary reduction flake (black quartzite), 13 secondary reduction flakes (one white and orange chert, five black and white chert, seven white, gray, blue chalcedony), 21 tertiary reduction flakes (two black quartzite, two red and pink chert, ten gray chert, one orange and black chert, one white and orange chert, four black and white chert),

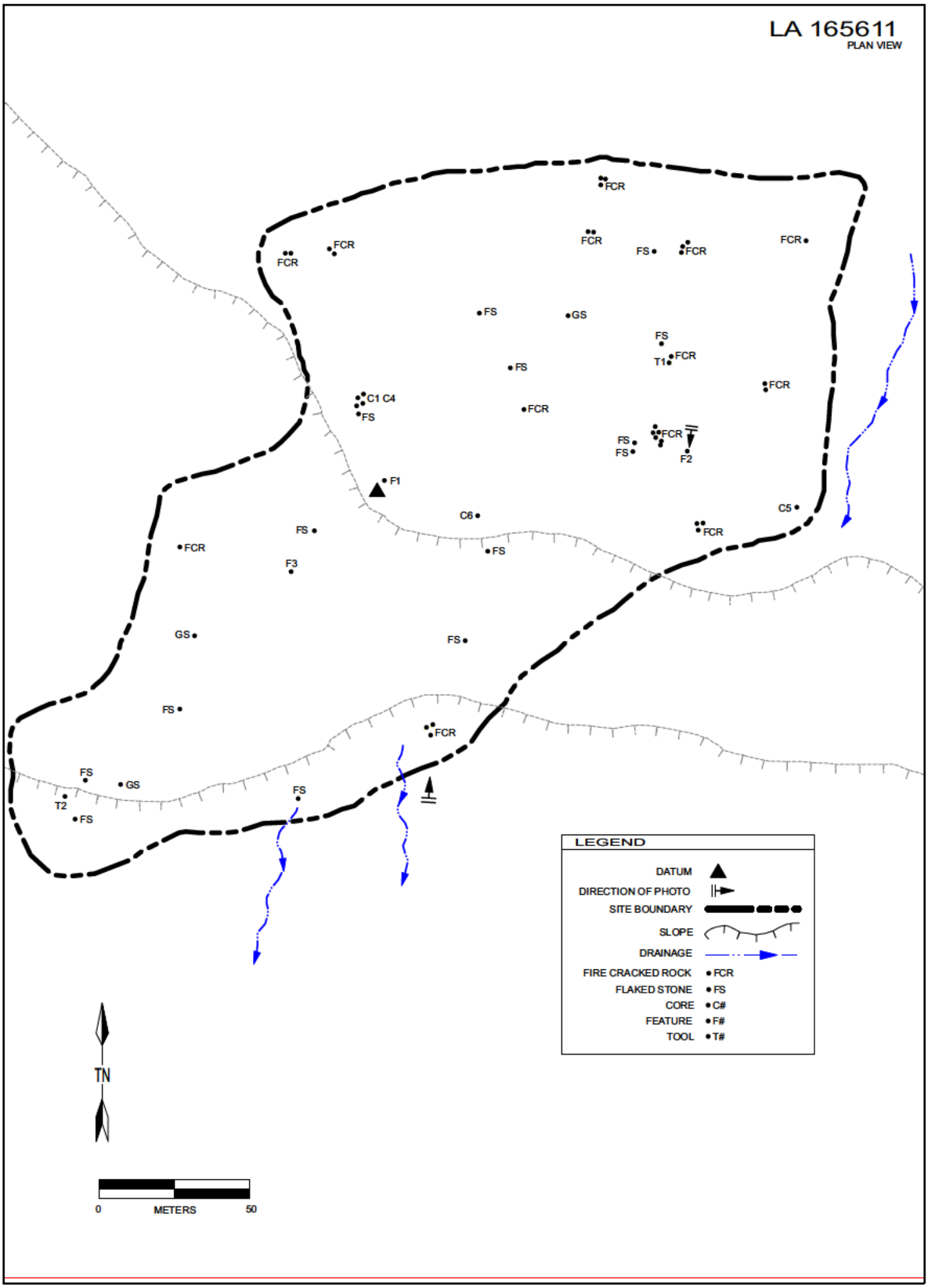

Figure 3.37: LA 165611 Site Map.

six biface-thinning flakes (two red and pink chert, three gray chert, one black and white chert), and eight pieces of angular debris (one gray chert, one orange and black chert, six white, gray, blue chalcedony). The raw materials include quartzite, chert, and chalcedony. The cores consist of four chert multidirectional cores (three black and gray, one black and brown) and two chert tested cobbles (one red and gray, one black and gray). The tools consist of a chert scraper (black and brown) and a chert projectile point base (black and brown) with characteristics of a Tularosa Corner Notched type that ranges from 100 B.C. to A.D. 900 (Justice 2002). The groundstone artifacts consist of one sandstone basin metate fragment and two complete sandstone one-hand manos. Approximately one thousand pieces of fire-cracked rock were observed scattered across the site.

Features and Site Structure

Three features were observed. Feature 1 is a 3-m by 7-m burned caliche concentration. The concentration consists of 70 pieces of burned caliche that range in size from 2 cm to 15 cm, averaging 8 cm. No staining, charcoal, or artifacts were observed. A trowel test was conducted, revealing burned caliche to a depth of at least 5 cm. The feature has been disturbed by water erosion and wind erosion, remaining 50 percent intact.

Feature 2 is a 2.5-m by 6.0-m burned caliche concentration. The concentration consists of 120 pieces of burned caliche that range in size from 1 cm to 23 cm, averaging 8 cm. No staining, charcoal, or artifacts were observed. A depth of 5 cm was determined based on partially buried burned caliche. The feature has been heavily disturbed by an ephemeral drainage and is 30 percent intact.

Feature 3 is a 2.5-m by 3.0-m burned caliche cluster. The cluster consists of 40 pieces of burned caliche that range in size from 1 cm to 15 cm, averaging 6 cm. No staining, charcoal, or artifacts were observed. A depth of 5 cm was determined based on partially buried burned caliche. The feature is disturbed by an ephemeral drainage and is 50 percent intact.

The site is located in an eolian and colluvial depositional environment. The estimated depth of sediments varies from 50 cm to 200 cm in dunes, to 5 cm to 50 cm in blowouts. There is a strong possibility of subsurface cultural deposits to a depth up to 200 cm due to the observation of partially buried artifacts eroding from the dune slopes, and on either side of the dune. Trowel testing within Feature 1 revealed subsurface cultural materials to depths of at least 5 cm.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have heavily disturbed the site. Overall, the site is 26 percent to 50 percent intact.

Conclusions

LA 165611 has been assigned a Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900) affiliation based on the temporally diagnostic projectile point. There is data potential based on the subsurface cultural material located on the site. The features may yield TL/OSL dates and lipid residues. The site may produce chronometric dates and subsistence data useful for addressing regional research questions concerning chronology and subsistence. Based on the data and research potential, the site is recommended eligible to the NRHP under Criterion D.

LA 165612

Field Number: 908-01-107
Category: 2
Affiliation: Early to Middle Archaic
(4000 B.C. to 2500 B.C.)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 1

Description

LA 165612, [redacted], consists of a sparse artifact scatter (Figure 3.38). Vegetation includes mesquite, four-wing saltbush, broom snakeweed, various grasses, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of five pieces of flaked-stone debitage, one core, three tools, and five groundstone artifacts. The debitage consists of three secondary reduction flakes, one tertiary reduction flake, and one piece of angular debris. The core is a multidirectional core (white and gray chalcedony). The tools include one scraper (brown chert), one hammerstone (brown and gray chert), and one gray chert projectile point (Figure 3.39) with characteristics of a Pandale type that ranges from 4000 B.C. to 2500 B.C (Justice 2002). This projectile point was collected. The raw materials

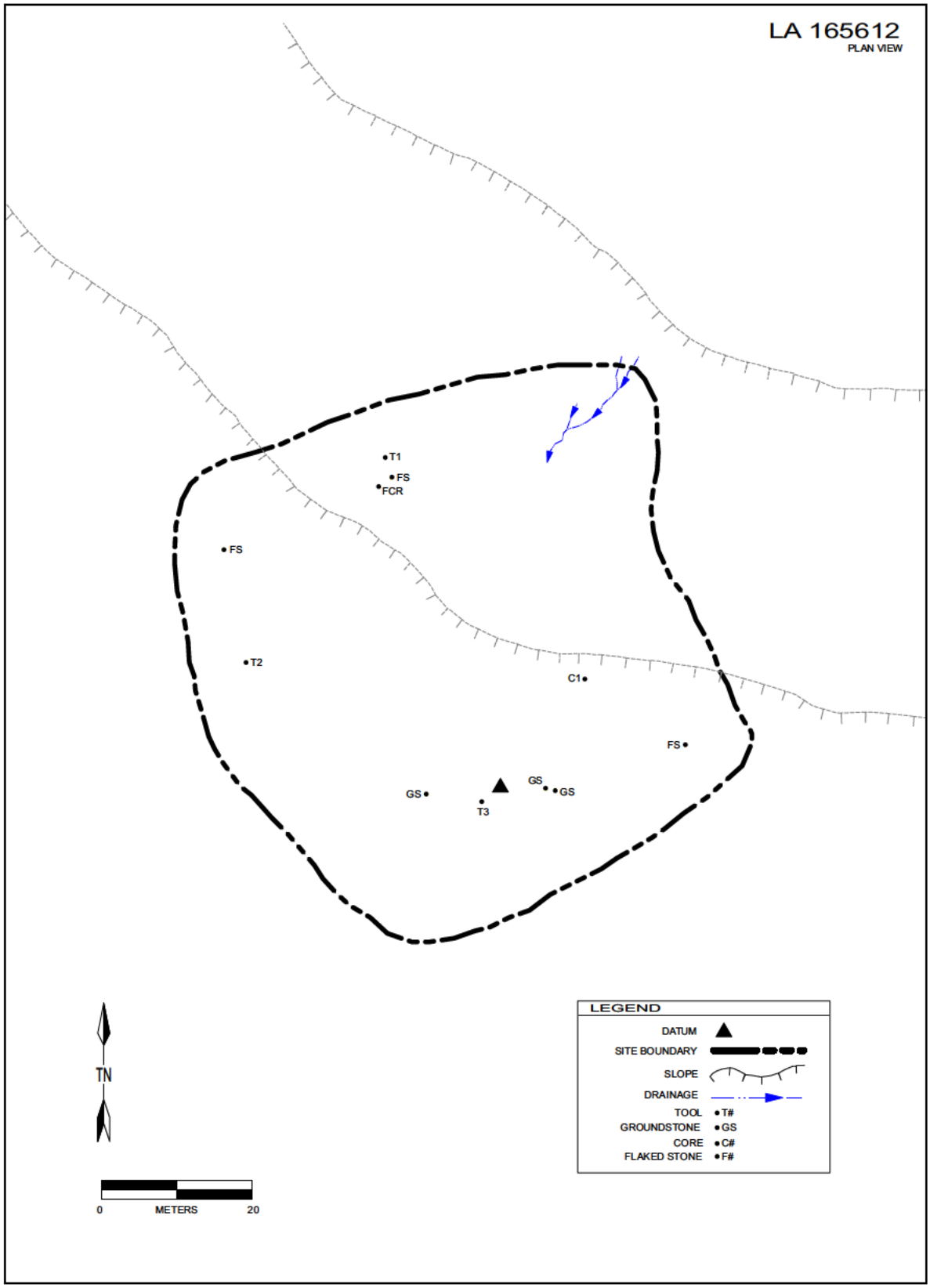

Figure 3.38: LA 165612 Site Map.

Figure 3.39: LA 165612 Pandale Type Projectile Point.

include locally obtained chalcedony (white, gray, orange, black) and chert (brown, brown and gray, gray). The groundstone artifacts consist of four one-hand mano fragments (two sandstone, two limestone) and one complete one-hand mano (limestone). Fire-cracked rock was observed scattered across the site.

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment where the dunes range in height from 1 meter to 3 meters. There is a possibility subsurface cultural materials are present, as suggested by the presence of partially buried artifacts on the slopes and both sides of dunes.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165612 has been assigned an Early to Middle Archaic (4000 B.C. to 2500 B.C.) affiliation based on the temporally diagnostic projectile point. There is the possibility that subsurface cultural material is present, although no direct evidence of such material was observed. Therefore, due to the unknown nature, extents, or data potential of any subsurface cultural material, the site is recommended undetermined for nomination to the NRHP.

LA 165613

Field Number: 908-01-108
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 1

Description

LA 165613, [redacted] consists of three features with a general artifact scatter (Figure 3.40). Vegetation includes mesquite, littleleaf horse brush, four-wing saltbush, narrow leaf yucca, various grasses, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording of all observed artifacts. The assemblage consists of 18 pieces of flaked-stone debitage, one tool, three ceramic artifacts, and six groundstone artifacts. The

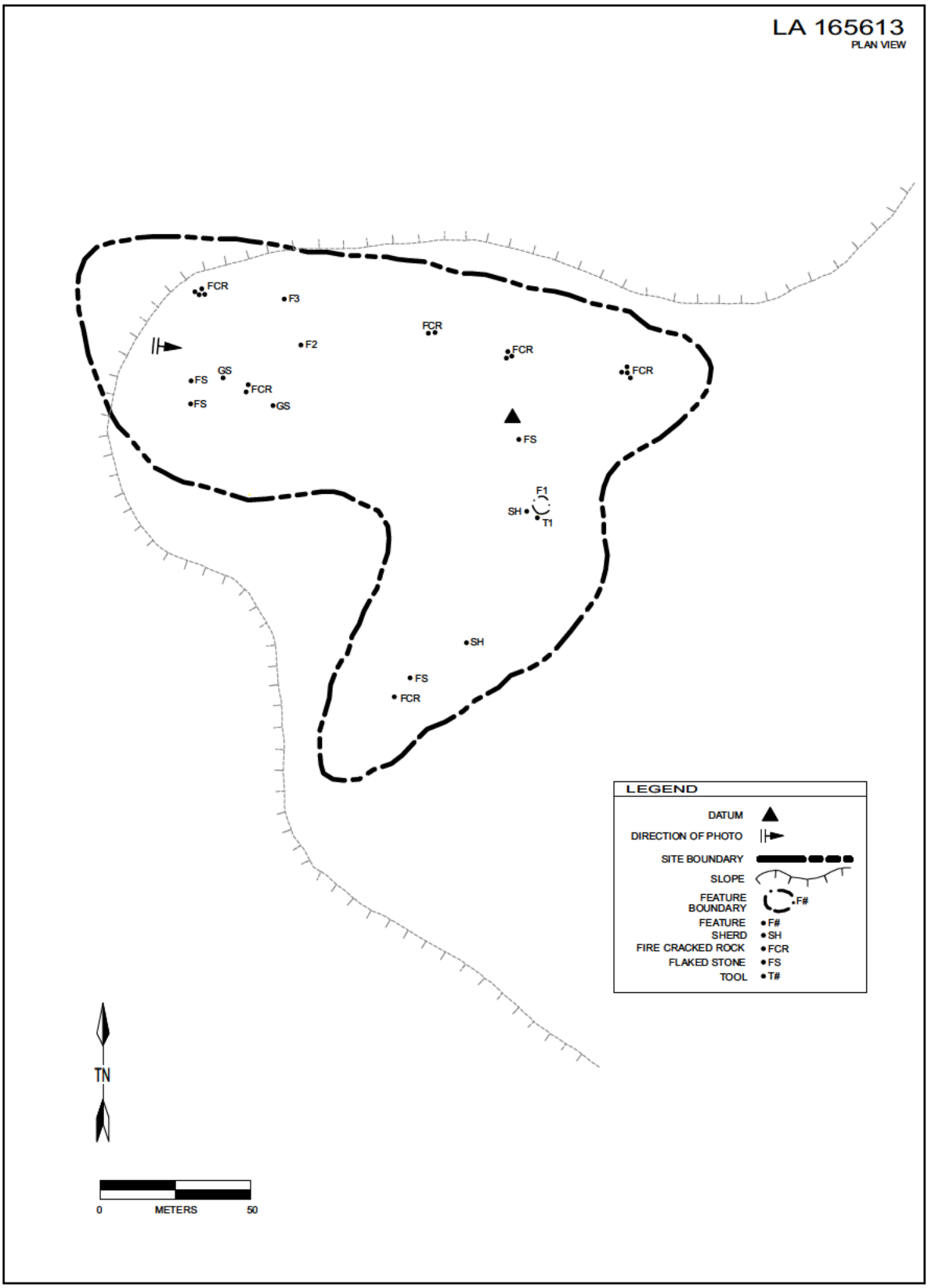

Figure 3.40: LA 165613 Site Map.

debitage consists of four secondary reduction flakes, seven tertiary reduction flakes, and seven pieces of angular debris. Raw materials include locally obtained chert (orange, red, blue, gray), chalcedony (gray, white, blue), and quartzite (blue, gray, purple). The tool, located in Feature 1, is a uniface tool (tan chert). The ceramics include two Jornada Brown sherds and an El Paso brownware sherd. The groundstone artifacts include one complete sandstone one-hand mano, two sandstone one-hand mano fragments, and three sandstone indeterminate metate fragments. Pieces of fire-cracked rock were observed scattered across the site.

Features and Site Structure

Three features were observed on the site. Feature 1 is a 7.5-m by 8.0-m fire-cracked rock concentration with staining. The concentration consists of approximately 1,000 pieces of fire-cracked rock that ranges from 1 cm to 10 cm, averaging 3 cm in size. One tool, two sherds, two groundstone artifacts, and seven flakes were observed in association. The feature has a depth of at least 10 cm. The feature is disturbed by cattle grazing, bioturbation, wind erosion, and water erosion. Overall, the feature is 40 percent intact.

Feature 2 is a 1.25-m by 1.00-m burned caliche cluster. The cluster consists of 30 pieces of burned caliche that range in size from 3 cm to 20 cm, averaging 8 cm. No staining, charcoal, or artifacts were observed. A trowel test was conducted, revealing no subsurface cultural deposits. The feature is disturbed by wind and water erosion. Overall, the feature is 65 percent intact.

Feature 3 is a 1-m diameter burned caliche cluster. The cluster consists of 25 pieces of burned caliche that range in size from 2 cm to 20 cm, averaging 6 cm. No staining, charcoal, or artifacts were observed. A trowel test was conducted, revealing no subsurface cultural deposits. The feature is disturbed by water and wind erosion. Overall, the feature is 60 percent intact.

The site is located in an eolian depositional environment. Sedimentation depth varies across the site up to 200 cm based on the height of dunes in the area. The possibility of subsurface cultural deposits is estimated from at least 10 cm up to 200 cm due to partially buried artifacts exposed in blowouts and eroding from dune slopes, located on both sides of the dunes, as well as evidenced by the depth of staining in Feature 1.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165613 has been assigned an Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300) affiliation based on the temporally diagnostic sherds. Subsurface cultural material was observed at this site, attesting to the potential for further data. The features may yield C14, TL/OSL dates, and lipid residues. The site may produce chronometric dates and subsistence data useful for addressing regional research questions concerning chronology and subsistence. Based on the further data and research potential, the site is recommended eligible to the NRHP under Criterion D.

LA 165614

Field Number: 908-01-109
Category: 2
Affiliation: Unspecified Archaic
(5,500 B.C. to A.D. 200)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 1

Description

LA 165614, [redacted] consists of three features with an associated artifact scatter (Figure 3.41). Vegetation includes shinnery oak, mesquite, narrow leaf yucca, sage, and broom snakeweed. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of 50 pieces of flaked-stone debitage, four tools, eight cores, and five groundstone artifacts. The debitage consists of 19 secondary reduction flakes, 12 tertiary reduction flakes, two pressure flakes, and 17 pieces of angular debris. Raw materials include chert (white, gray, orange, red, purple, blue, tan, pink), quartzite (gray, orange, purple), basalt (black), and chalcedony (white, gray). The tools include two unifaces (one dark gray chert, one dark gray and white chert), one scraper (gray chert), and one medial fragment of a projectile point (brown chert). The point is not sufficiently complete to allow for a specific identification, but its size suggests that it is likely an Archaic-period dart point. The cores are all multidirectional (three white chalcedony, two gray chalced-

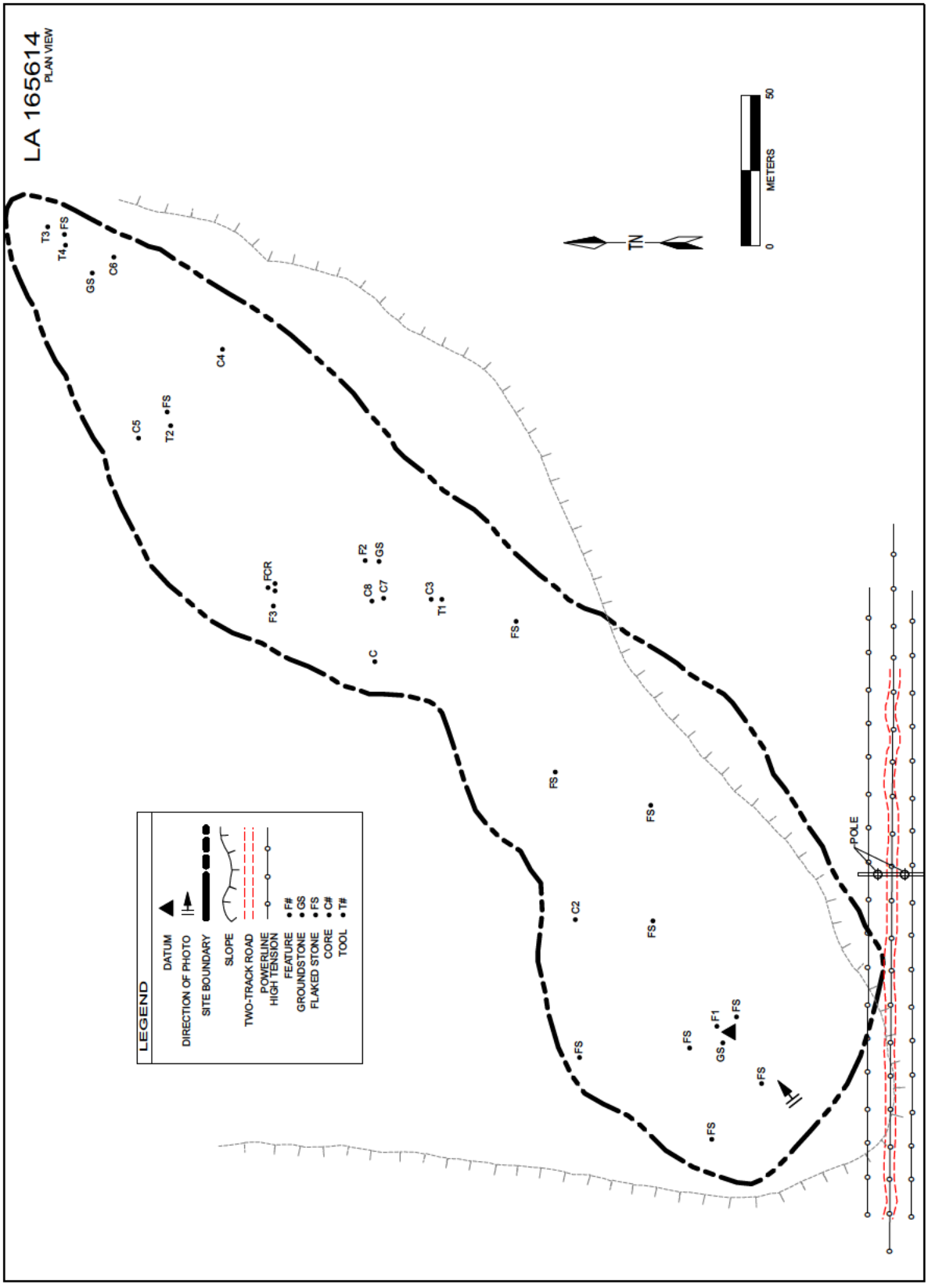

Figure 3.41: LA 165614 Site Map.

ony, one purple and brown quartzite, one gray and blue chert, one gray and purple chert). The groundstone artifacts consist of two sandstone one-hand mano fragments, two sandstone slab metate fragments, and one sandstone indeterminate metate fragment. Forty pieces of burned caliche were observed across the site.

Features and Site Structure

Three features were observed. Feature 1 is a 1.00-m by 0.75-m burned caliche cluster. The cluster consists of 15 pieces of burned caliche that range in size from 3 cm to 20 cm, averaging 6 cm. A trowel test was conducted, revealing buried burned caliche to a depth of 15 cm. No staining, charcoal, or artifacts were observed. The feature is eroding out of a dune and is 40 percent intact.

Feature 2 is a 1-m diameter burned caliche cluster. The cluster consists of 35 pieces of burned caliche that range in size from 2 cm to 20 cm, averaging 7 cm. A trowel test was conducted, revealing no subsurface deposits. No staining or charcoal was observed. A single mano fragment was observed in association. The feature is disturbed by wind erosion and is 65 percent intact.

Feature 3 is a 50-cm diameter charcoal stain. A trowel test revealed subsurface staining and charcoal flecks to a depth of 15 cm. No artifacts were observed. The feature is disturbed by wind erosion and is 65 percent intact.

The site is located in an eolian depositional environment. Sediment depth is estimated to vary up to 250 cm across the site based on the height of dunes in the area. Subsurface cultural material are likely present due to the fact artifacts are eroding out of dune slopes, exposed in blowouts, and partially buried at the base of dunes. Trowel tests in Feature 1 revealed cultural materials to a depth of at least 15 cm.

Disturbances and Potential Impacts

Water erosion, wind erosion and cattle grazing have moderately disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165614 has been assigned an Unspecified Archaic (5500 B.C. to A.D. 200) affiliation based on the projectile point fragment. This site has potential to yield more data, given the subsurface cultural materials observed within the features. The features may yield C14, TL/OSL dates, microbotanical and macrobotanical remains, and lipid residues. The site may produce chronometric dates and subsistence data useful for addressing regional research questions concerning chronology and subsistence. Based on the data and research potential, the site is recommended eligible to the NRHP under Criterion D.

LA 165615

Field Number: 908-01-110
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 1

Description

LA 165615 is an artifact scatte [redacted] Vegetation includes mesquite, shinnery oak, sage, broom snakeweed, and narrow leaf yucca. Visibility is 26 percent to 50 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of 12 pieces of flaked-stone debitage, two tools, one core, and four groundstone artifacts. The debitage consists of four secondary reduction flakes, four tertiary reduction flakes, four pieces of angular debris. The locally obtained raw material includes chert (brown, white, purple, gray, orange) and chalcedony (white, gray). The tools include a biface chopper (light brown and red chert) and a uniface tool (gray chert). The core is a multidirectional core (light gray chert). The groundstone artifacts are four sandstone indeterminate metate fragments. Six pieces of burned caliche were observed scattered across the site.

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment. Estimated depths of sedimentation vary across the site from 10 cm to 200 cm based on the height of dunes. Partially buried artifacts were observed on the slopes of and eroding out of the dunes, suggesting subsurface cultural deposits may be present to depths up to 200 cm.

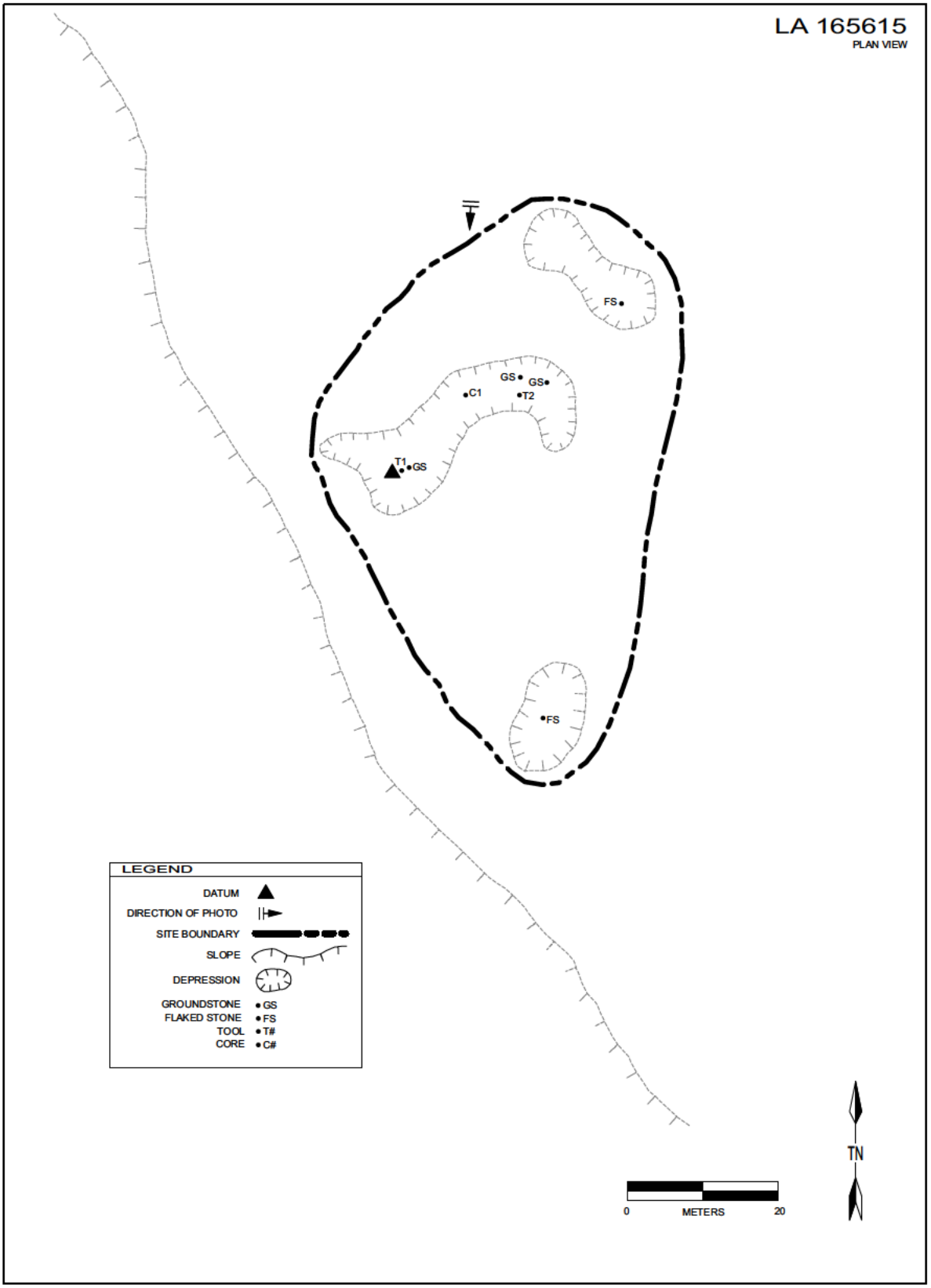

Figure 3.42: LA 165615 Site Map.

Disturbances and Potential Impacts

Water erosion, wind erosion and cattle grazing have moderately disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165615 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on a lack of temporally diagnostic artifacts. Subsurface cultural material may be present, although the nature, extents, or data potential of any such deposits is currently unknown. Therefore, the site is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165616

Field Number: 908-01-111
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 1

Description

LA 165616 is an artifact scatte [redacted] Vegetation includes mesquite, desert sage, shinnery oak, snakeweed, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of eight pieces of flaked-stone debitage, 15 ceramic sherds, and one groundstone artifact. The debitage consists of five secondary reduction flakes, one tertiary reduction flake, one biface-thinning flake, and one piece of angular debris. Locally obtained raw materials include chert (gray, brown, red) and chalcedony (clear, white). The ceramics are 15 El Paso brownware sherds. The groundstone artifact is a sandstone slab metate fragment. Pieces of burned caliche were observed scattered across the site.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment. The depth of sedimentation is based on the height of dunes, and varies between 50 cm to 200 cm across the site. Artifacts were observed on the slopes of and eroding out of the dunes, suggesting that buried cultural deposits may be present up to a depth of 200 cm.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165616 has been assigned an Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300) affiliation based on the sherds in the artifact assemblage. Subsurface cultural material may be present, although no direct evidence of such material was observed. Therefore, due to the unknown nature of the subsurface cultural material, the site is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 161617

Field Number: 908-01-112
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 1

Description

LA 161617, [redacted], consists of a burned caliche cluster with an associated artifact scatter (Figure 3.44). Vegetation includes mesquite, four-wing saltbush, little-leaf horse brush, shinnery oak, and broom snakeweed. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of 10 pieces of flaked-stone debitage, two tools, six groundstone artifacts, and one historic artifact. The debitage includes three secondary reduction flakes, two tertiary reduction flakes, and five pieces of angular debris. The locally obtained raw materials include chert (orange, white, green, blue), chalcedony (white), and quartzite (purple, red). The tools include two utilized flakes (one blue and purple quartzite, one brown chert). The groundstone artifacts include five sandstone indeterminate metate fragments and one sandstone slab metate fragment. The historic artifact is a pocketknife with white bone or ivory on the side, and is likely an isolated occur-

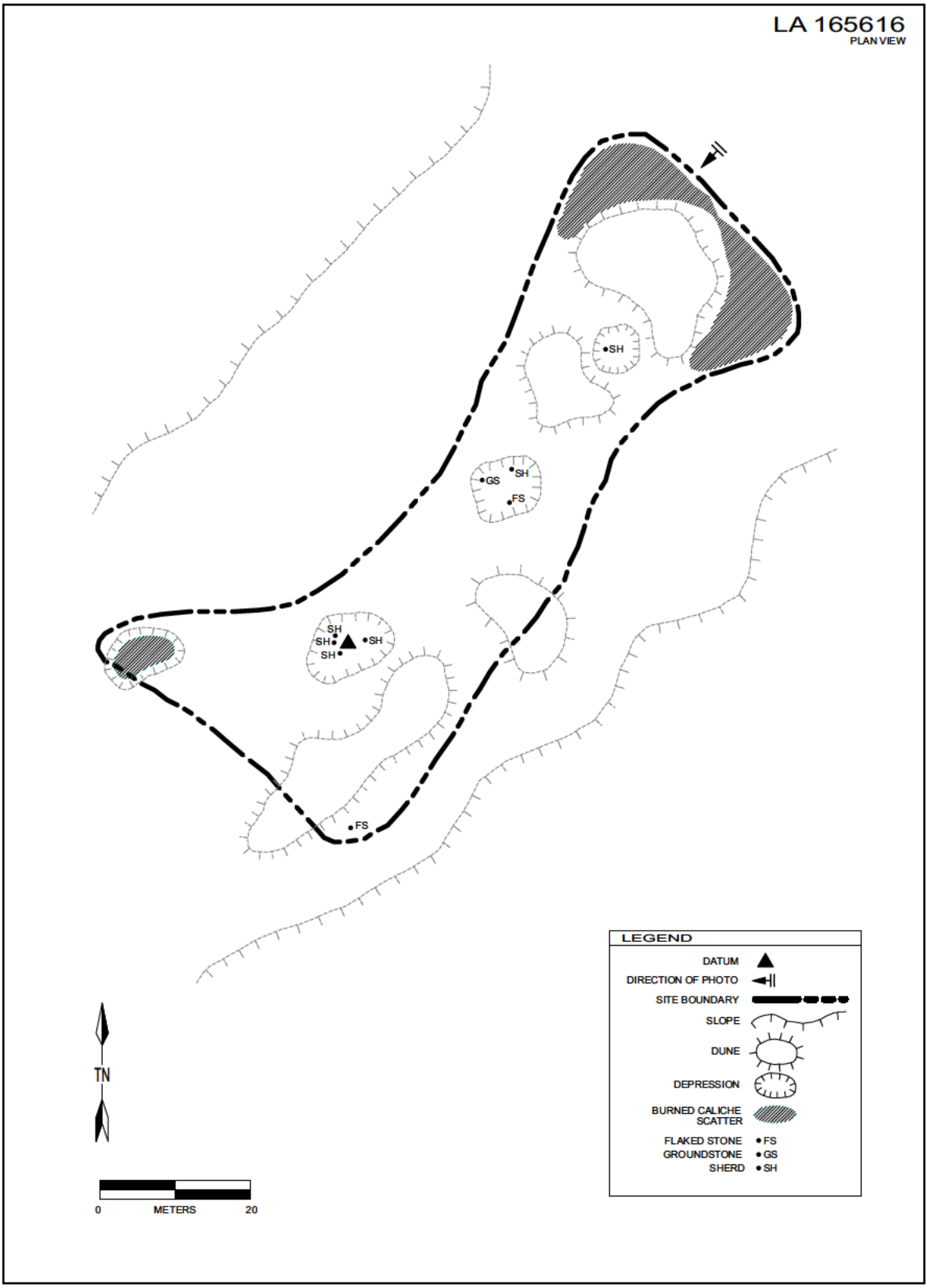

Figure 3.43: LA 165616 Site Map.

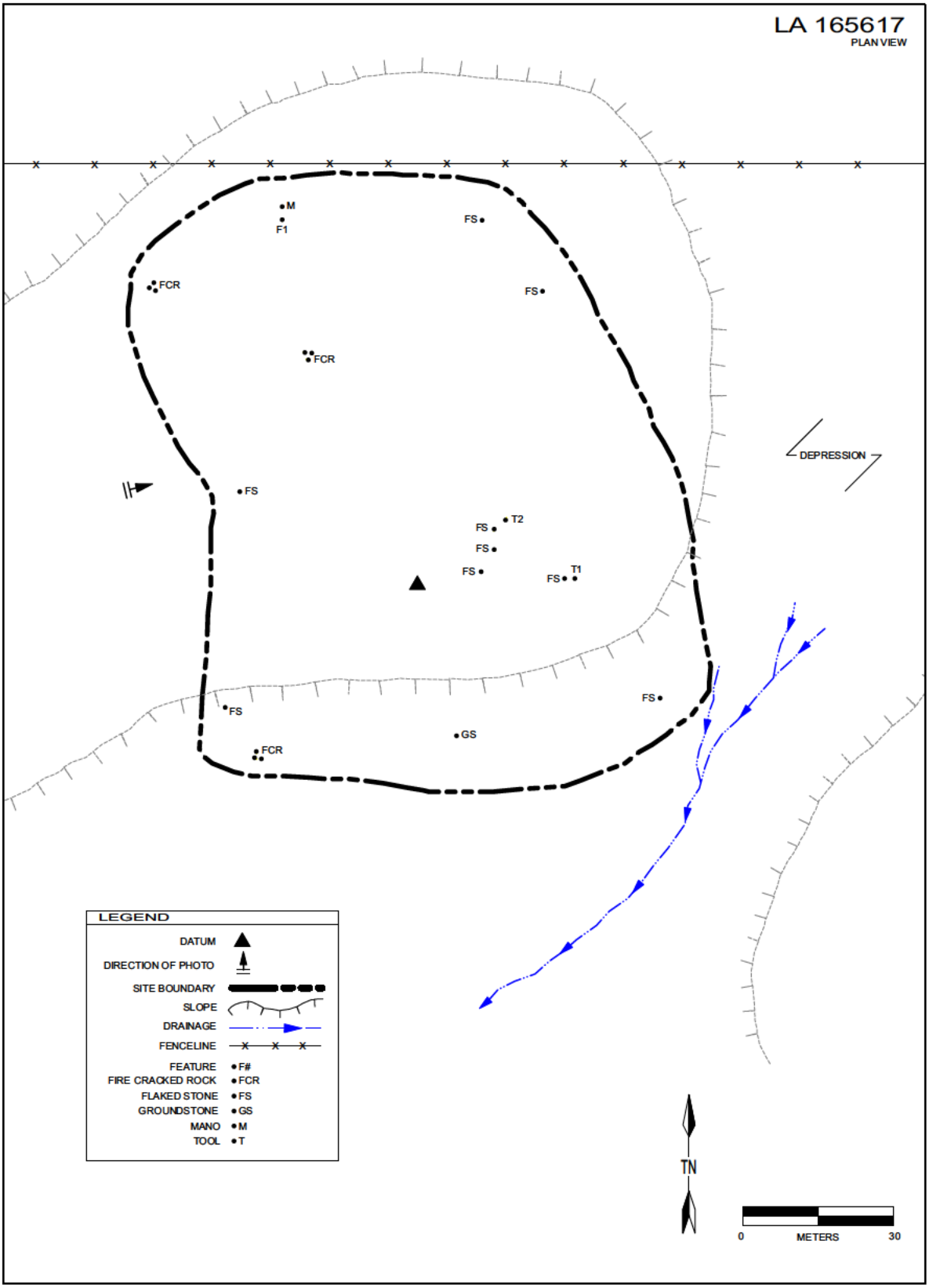

Figure 3.44: LA 165617 Site Map.

rence rather than representative of a historic occupation of this site. Pieces of burned caliche occur across the site.

Features and Site Structure

Burned caliche is more concentrated near the hilltop and may represent a deflated or otherwise disarticulated feature. There was no staining in this location, and the burned caliche was not sufficiently concentrated at this time to merit identification as a feature.

The site is located in an eolian and colluvial depositional environment. The depth of sediments varies from 10 cm to 200 cm across the site based on the height of existing dunes. There is a high potential for buried cultural material based on observed artifacts eroding out of the dune slopes, lying at the base of dunes, and partially buried across the site.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 161617 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on the lack of temporally diagnostic artifacts. Subsurface cultural material may be present, although no direct evidence of any such deposits was observed. Therefore, due to the unknown nature of the subsurface cultural material, the site is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165618

Field Number: 908-01-113
Category: 2
Affiliation: Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 1

Description

LA 165618, [redacted], consists of a feature with an associated artifact scatter (Figure 3.45). Vegetation includes mesquite, desert sage, snakeweed, shinnery oak, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. The assemblage consists of 13 pieces of flaked-stone debitage, seven groundstone artifacts, and three ceramic sherds. The debitage includes six secondary reduction flakes, five tertiary reduction flakes, one biface-thinning flake, and one piece of angular debris. The locally obtained raw materials include chert (brown, gray, white), chalcedony (clear, white), and quartzite (purple). The groundstone artifacts include seven sandstone slab metate fragments. The ceramics include two El Paso brownware sherds and one Chupadero Black-on-white sherd (Figure 3.46). The Chupadero sherd was collected. More than 60 pieces of burned caliche were observed across the site.

Features and Site Structure

One feature was observed on the site. Feature 1 is a 1-m diameter burned caliche cluster. The cluster consists of 15 pieces of burned caliche that range in size from 2 cm to 10 cm, averaging 8 cm. No artifacts, staining, or charcoal were observed. The feature is 10 percent intact.

The site is located in an eolian and alluvial depositional environment. The depth of sediments is estimated as 50 cm to 2 meters based on the height of existing dunes. Artifacts were observed eroding out of the slopes and blowouts, suggesting the possibility of subsurface cultural materials up to a depth of 2 meters.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165618 has been assigned an Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500) affiliation based on the presence of a Chupadero Black-on-white sherd. The site may yield TL/OSL dates and may produce lipid residues. Such data may contribute to regional research questions concerning chronology and subsistence. The site is therefore recommended eligible for nomination to the NRHP under Criterion D.

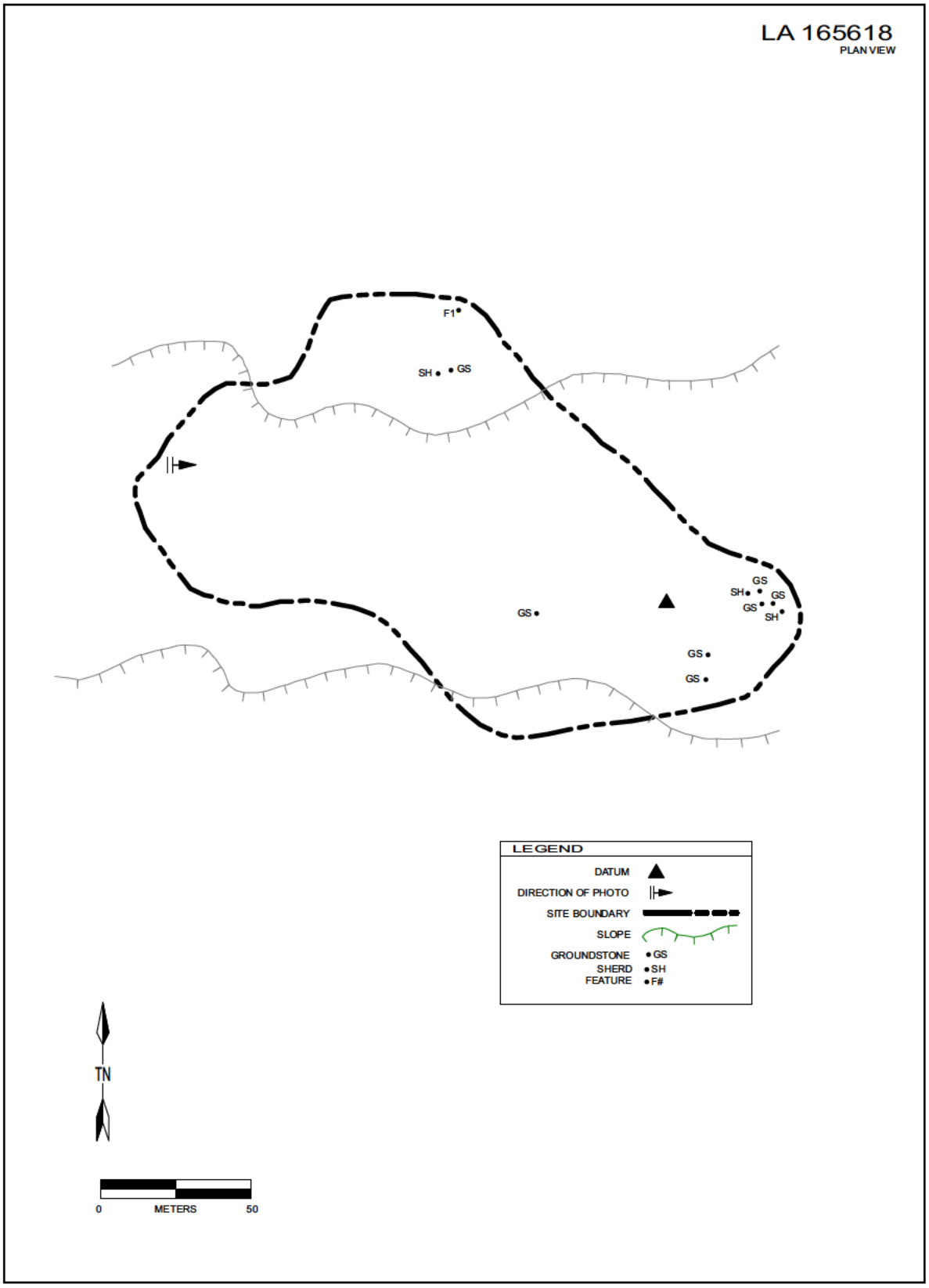

Figure 3.45: LA 165618 Site Map.

LA 165619

Field Number: 908-01-114
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to 1300)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 1

Description

LA 165619, [redacted] consists of a feature with an associated artifact scatter (Figure 3.47). Vegetation includes shinnery oak, mesquite, narrow leaf yucca, sage, broom snakeweed, various grasses, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording of all of the observed artifacts. One concentration of artifacts was noted and designated Concentration 1. More than 60 pieces of fire-cracked rock were observed across the site.

The general artifact assemblage consists of four pieces of flaked-stone debitage, one tool, 11 groundstone artifacts, and 14 ceramic sherds. The debitage includes two secondary reduction flakes (white chalcedony, black basalt), one tertiary reduction flake (gray and red chert), and one piece of angular debris (gray chert, white chert). The tool is a utilized flake (orange chert). The groundstone artifacts consist of 11 sandstone indeterminate metate fragments. The ceramics include 11 unknown brownware sherds and three El Paso brownware sherds.

Concentration 1 consists of 64 pieces of flaked-stone debitage and two cores. The debitage includes 20 secondary reduction flakes, 17 tertiary reduction flakes, nine biface-thinning flakes, and 19 pieces of angular debris. The locally obtained raw materials include chert (gray, blue, white, brown, yellow, red, black, orange, pink), quartzite (purple, brown), chalcedony (white, gray), and basalt (black). The cores consist of two multidirectional cores (white chalcedony).

Features and Site Structure

One artifact concentration and one feature were observed on the site. Concentration 1 is an artifact cluster in a blowout measuring 10 m in diameter on the west side of the site. Feature 1 is a 20-cm diameter charcoal stain. No artifacts were observed in direct association. The feature is 50 percent intact.

The site is located in an eolian depositional environment. The estimated depth of sediments varies across the site from 5 cm to 200 cm, based on the height of dunes and blowouts. Partially buried cultural deposits were observed eroding out of the dune slopes and at the base of the dunes, as well as

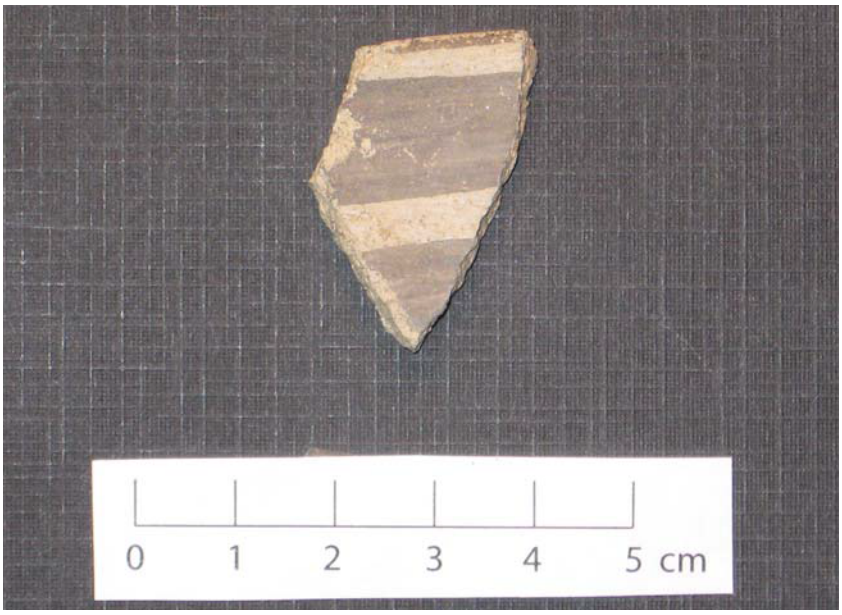

Figure 3.46: LA 165618 Chupadero Black-on-white Sherd.

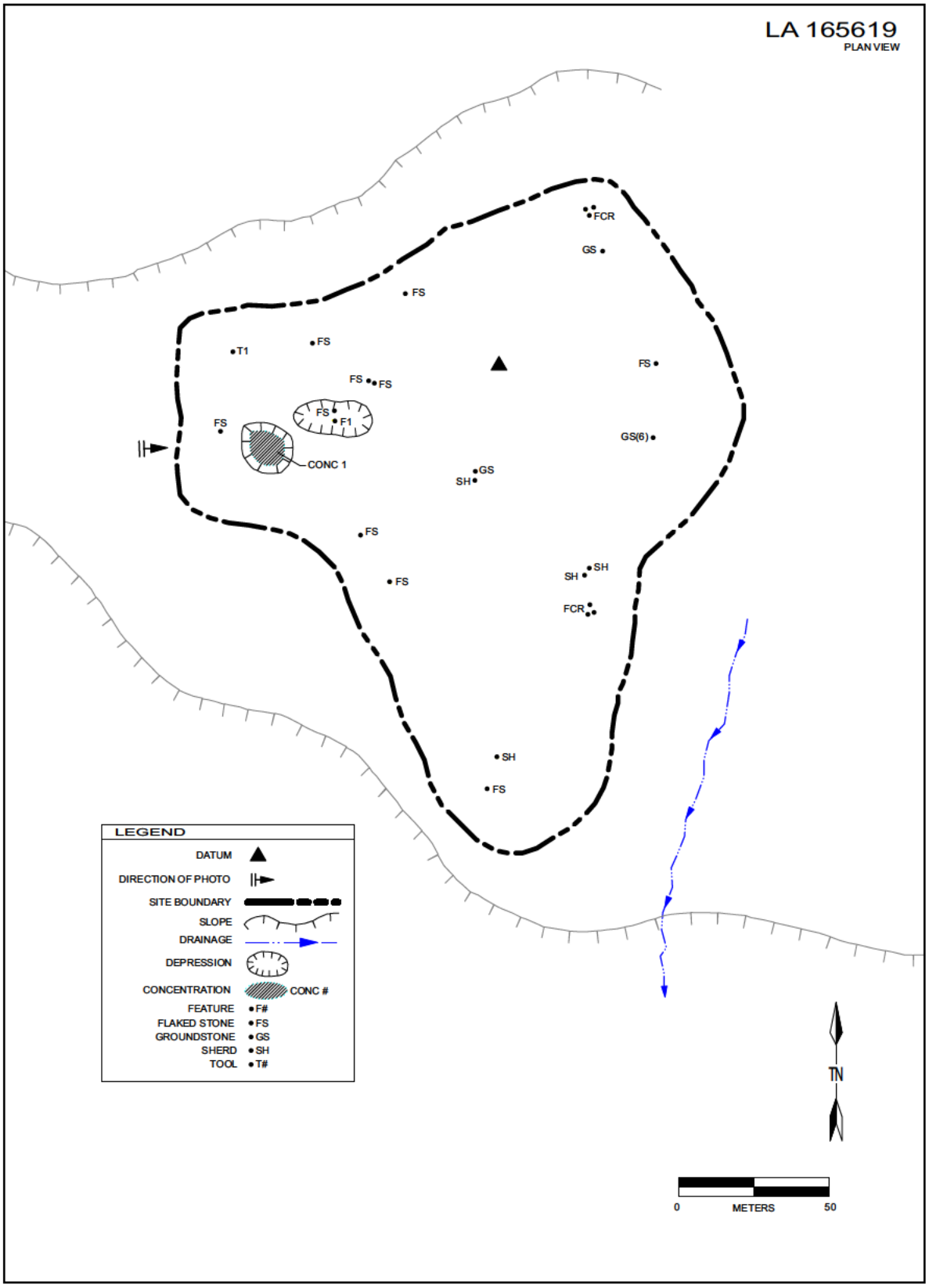

Figure 3.47: LA 165619 Site Map.

in the back-dirt of rodent burrows, suggesting the possibility of subsurface cultural deposits up to 200 cm.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165619 has been assigned an Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300) affiliation based on the artifact assemblage. Subsurface cultural material observed in Feature 1 attests to the potential for further data to be yielded by this site. The feature may yield C14 dates and microbotanical and macrobotanical remains. The site may produce chronometric dates and subsistence data useful for addressing regional research questions concerning chronology and subsistence. Therefore, based on the further data and research potential, the site is recommended eligible to the NRHP under Criterion D.

LA 165620

Field Number: 908-01-115
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 1

Description

LA 165620, [redacted], consists of a general artifact scatter (Figure 3.48). Vegetation includes mesquite, desert sage, snakeweed, yucca, and various forbs. Visibility is 51 percent to 75 percent.

Assemblage

Lone Mountain conducted a complete recording on all of the observed artifacts. The assemblage consists of 20 pieces of flaked-stone debitage, four tools, two cores, and five groundstone artifacts. The debitage includes nine secondary reduction flakes, eight tertiary reduction flakes, three biface-thinning flakes, and five pieces of angular debris. The locally obtained raw materials include chert (gray, red, white, brown, tan), quartzite (gray, purple), chalcedony (clear, white), and obsidian (black, translucent). The tools include one utilized flake (black and red chert), two scrapers (one red and brown chert, one gray, brown, white, blue quartzite), and one hammerstone (white, red, blue, tan chert). The cores consist of one multidirectional core (white and blue chalcedony) and one tested cobble (purple, blue, gray quartzite). The groundstone artifacts include three sandstone slab metate fragments, one complete sandstone basin metate, and a rhyolite indeterminate metate fragment. Pieces of burned caliche were observed across the site.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment. The depth of sediments across the site is estimated at 50 cm to 2 meters based on the height of dunes and blowouts. Artifacts were observed eroding out of the slopes of the dunes and blowouts, as well as in the back-dirt of rodent burrows, suggesting the possibility of subsurface cultural deposits.

Disturbances and Potential Impacts

Water erosion, wind erosion, and cattle grazing have moderately disturbed the site. Overall, the site is 51 percent to 75 percent intact.

Conclusions

LA 165620 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation based on the lack of temporally diagnostic artifacts. Subsurface cultural material may be present, although no direct evidence of any such deposits was observed. Without additional testing to identify the presence, nature, extents, or data potential of any buried cultural deposits, the site is recommended to have an undetermined eligibility for nomination to the NRHP under Criterion D.

LA 165621

Field Number: 908-01-116
Category: 2
Affiliation: Unspecified Jornada Mogollon
(A.D. 400 to A.D. 1300)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 1

Description

LA 165621, [redacted] consists of a general artifact scatter (Figure 3.49). Vegetation includes shinnery oak, mesquite, broom snakeweed, narrow leaf yucca, sage, various grasses and various forbs. Visibility is 51 percent to 75 percent.

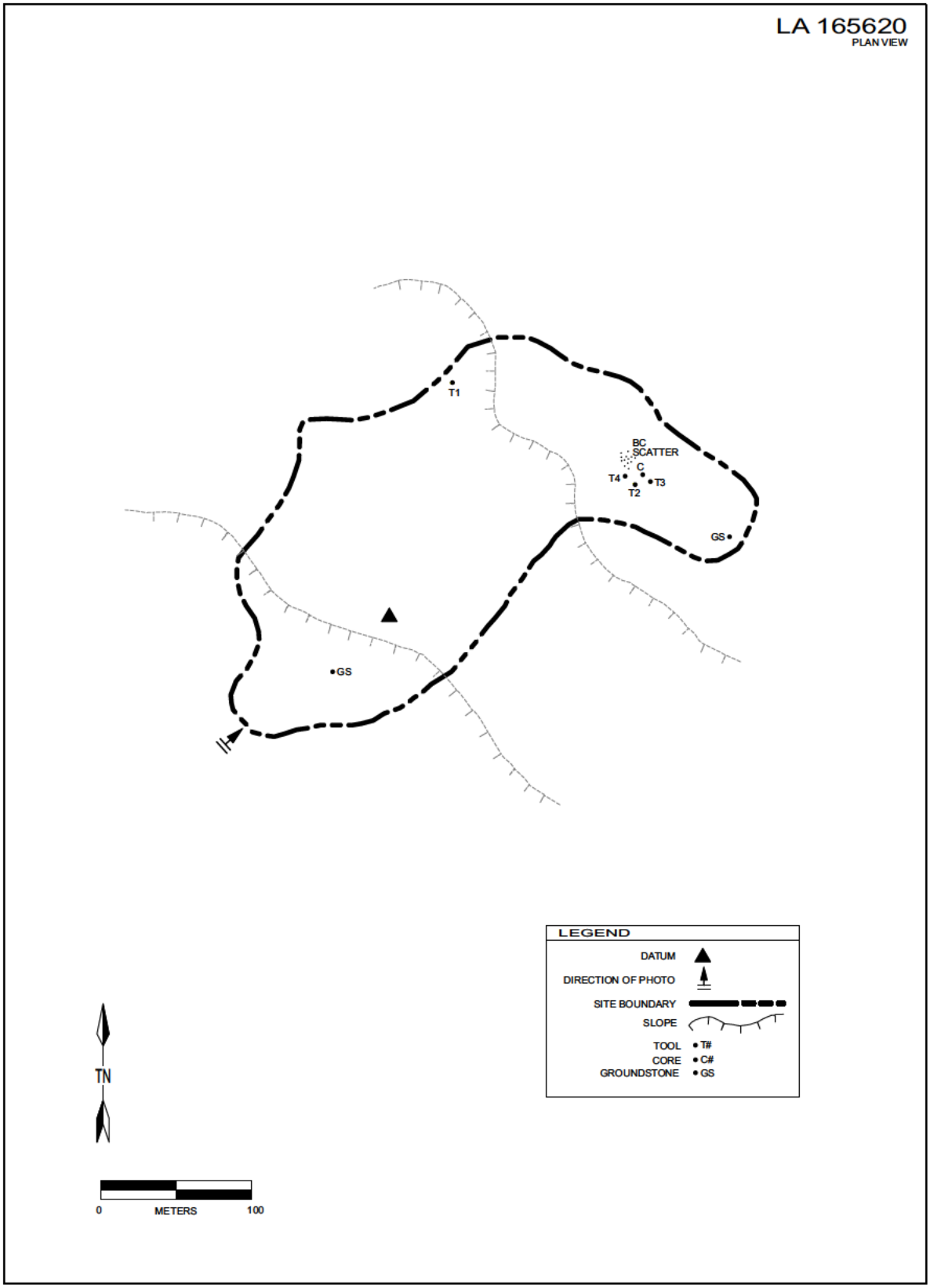

Figure 3.48: LA 165620 Site Map.

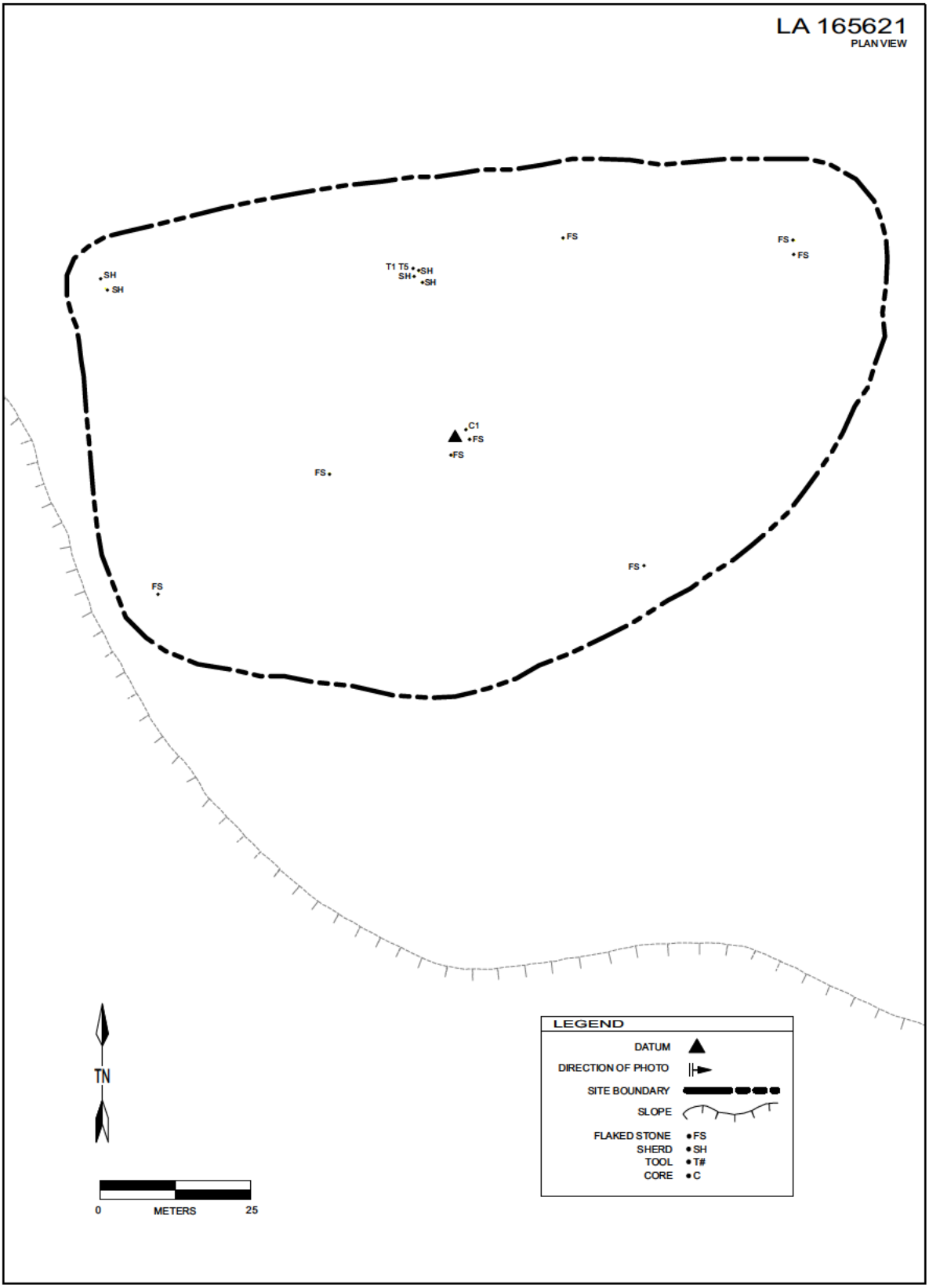

Figure 3.49: LA 165621 Site Map.

Assemblage

Lone Mountain conducted a complete recording on all of the observed artifacts. The assemblage consists of 31 pieces of flaked-stone debitage, five tools, one core, and seven ceramic sherds. The debitage includes eight secondary reduction flakes, 12 tertiary reduction flakes, two biface-thinning flakes, two pressure flakes, and nine pieces of angular debris. The locally obtained raw materials include quartzite (gray, white, purple, blue), chert (gray, white, pink, red), and chalcedony (white). The tools consist of one scraper (gray and white chert), four unifaces (two gray chert, one white chalcedony, one gray chalcedony). The core is a multidirectional core (dark gray chert). The ceramics include two El Paso brownware sherds and five Jornada Brown sherds. Pieces of burned caliche were observed across the site.

Features and Site Structure

No features were observed. The site is located in an eolian depositional environment with sediment deposits varying from 10 cm to 50 cm in blowouts and 50 cm to 200 cm in dunes. Artifacts were observed on both sides of the dunes, eroding out of the dune slopes, and at the base of the dunes, suggesting the possibility of additional buried cultural materials present at a depth up to 200 cm.

Disturbances and Potential Impacts

Wind erosion and cattle grazing have moderately disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165621 has an Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300) affiliation as indicated by the ceramic assemblage. There is a potential for subsurface cultural material even though the nature, extents, or data potential of any such deposits is unknown. The site is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165622

Field Number: 908-1-117
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165622 is an artifact scatte [redacted] Vegetation includes creosote, acacia, snakeweed, little horse brush, and various low forbs. Surface visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 27 pieces of flaked-stone debitage and one crushed historic can. The debitage includes three primary reduction flakes (one reddish brown quartzite, two gray quartzite), 10 secondary reduction flakes (three gray chert, three reddish brown quartzite, one gray quartzite, one purple quartzite, two gray chalcedony), six tertiary reduction flakes (two reddish brown quartzite, two gray quartzite, one white chalcedony, one gray chalcedony), and eight pieces of angular debris (two gray chert, four reddish brown quartzite, two gray quartzite). The historic can is a crushed and corroded knife opened hole-in-top can. This can appears to be an isolated occurrence and does not represent a historic component at this site.

Features and Site Structure

Lone Mountain found no features at LA 165622. The site is located in an eolian and alluvial depositional environment and sediments appear to be at least 50 cm deep. The estimated depth of cultural deposit is 10 cm, based on observations of partially buried artifacts.

Disturbances and Potential Impacts

Wind erosion and livestock grazing have had slight impacts on the site surface. Sheetwash has caused the displacement of artifacts. The site is estimated to be between 76 percent and 99 percent intact.

Conclusions

LA 165622 is a lithic scatter lacking temporally diagnostic artifacts and therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and

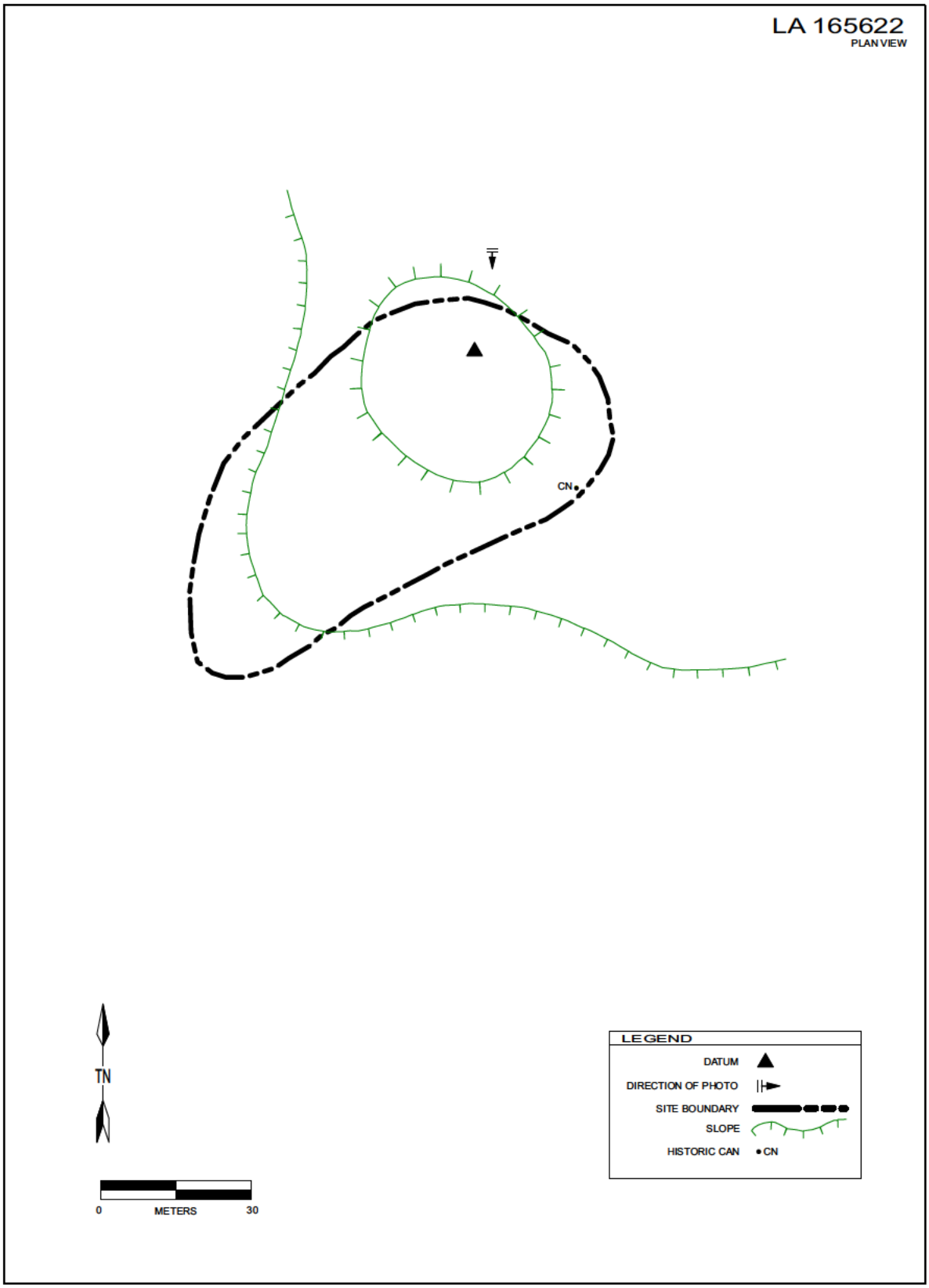

Figure 3.50: LA 165622 Site Map.

cultural affiliation. LA 165622 does appear to have buried cultural deposits, but the nature, extents, and data potential of these deposits is currently unknown. LA 165622 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165623

Field Number: 908-1-118
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165623 is a lithic scatter [redacted]
Vegetation includes creosote, mesquite, acacia, crucifixion thorn, little-leaf horse brush and various low forbs. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 34 pieces of flaked-stone debitage and one core. The debitage includes six primary reduction flakes (two chert, two brown chert, two reddish brown quartzite), nine secondary reduction flakes (three gray chert, two white chert, three reddish brown quartzite, one red/brown rhyolite), 11 tertiary reduction flakes (nine reddish brown quartzite, two white chert) and eight pieces of angular debris (one gray chert, one white chert, five reddish brown quartzite, one clear chalcedony). The core is a reddish brown quartzite multidirectional core.

Features and Site Structure

Lone Mountain encountered no features at LA 165523. Drainages are located immediately west and east of the site. The site is located in an eolian and alluvial depositional environment. Sediments are estimated to be 25 cm deep and observations of partially buried artifacts indicate that buried cultural deposits are present to a depth of at least 10 cm.

Disturbances and Potential Impacts

Wind erosion and sheetwash have had some impact on the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165623 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation. This component is indicated by a lithic artifact assemblage with no temporally diagnostic artifacts. The site does appear to have buried cultural deposits, but the nature and extents of these deposits are unknown as is the potential of these deposits to yield any significant data. LA 165623 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165624

Field Number: 908-1-119
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165624 is a sparse lithic scatter [redacted]
The vegetation on the site includes creosote, mesquite, crucifixion thorns, little-leaf horse brush and various low forbs. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 22 pieces of flaked-stone debitage and two cores. The debitage includes two reddish brown quartzite primary reduction flakes; eight secondary reduction flakes (four reddish brown quartzite, two gray quartzite, one brown quartzite, one reddish brown rhyolite); seven tertiary reduction flakes (four reddish brown quartzite, one orange chert, one reddish brown rhyolite, one red and white chalcedony); and five pieces of angular debris (four reddish brown quartzite, one reddish brown rhyolite). The cores consist of one reddish brown quartzite multidirectional core and one reddish brown quartzite tested cobble.

Features and Site Structure

No features were observed. Drainages are located west and south of the site, which is located in an eolian and alluvial depositional environment. Sediments on LA 165624 are estimated to be 50 cm

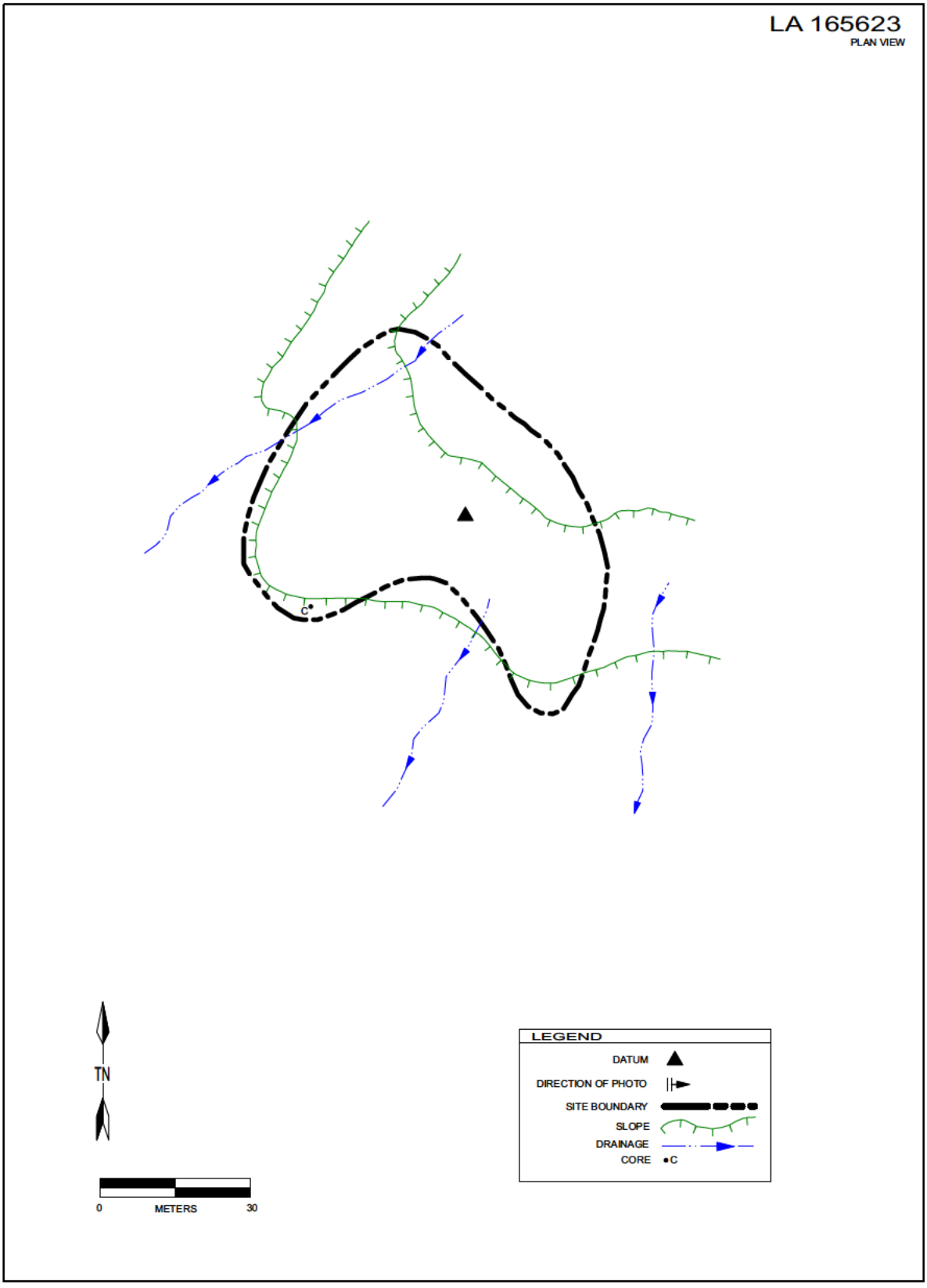

Figure 3.51: LA 165623 Site Map.

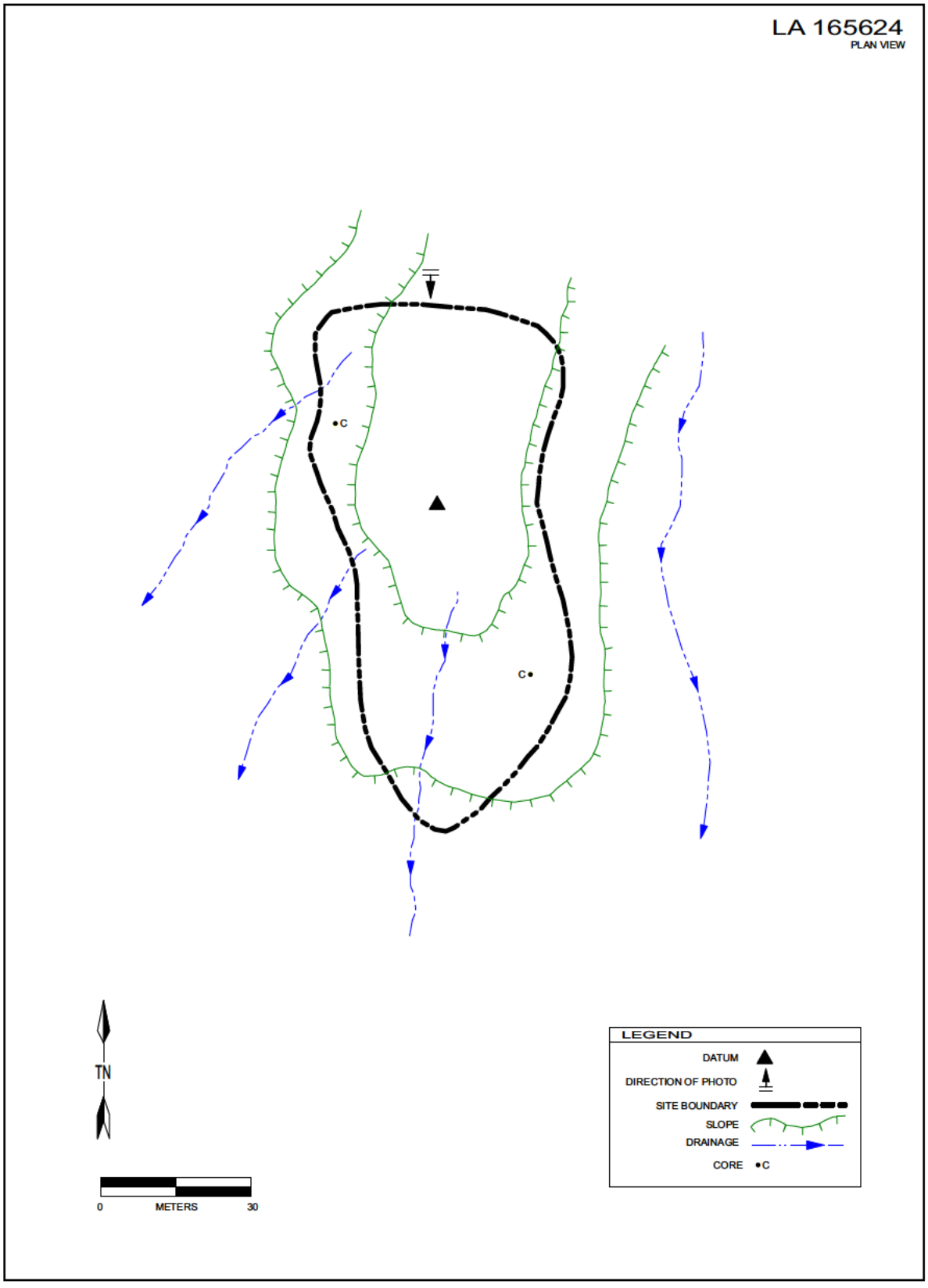

Figure 3.52: LA 165624 Site Map.

based on the observation of drainages. Buried cultural deposits are present to a depth of at least 10 cm, as indicated by partially buried artifacts.

Disturbances and Potential Impacts

Wind erosion and water erosion in the form of sheetwash and some gullying have had an impact on the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165624 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as indicated by a lack of temporally diagnostic artifacts. The site does appear to have buried cultural deposits, but the nature, extents, and data potential of these deposits are unknown. LA 165624 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165625

Field Number: 908-1-120
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165625 [redacted] The site consists of a sparse artifact scatter. Vegetation includes creosote, mesquite, snakeweed, acacia, and low forbs. Surface visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain recorded all visible artifacts at this site. The assemblage consists of 17 pieces of flaked-stone debitage and one stone tool. The debitage includes nine primary flake (four gray chert, one clear chalcedony, one gray quartzite, two purple quartzite, one reddish brown quartzite); three secondary reduction flakes (one gray chert, one pink chalcedony, one reddish brown quartzite); four tertiary reduction flakes (one gray quartzite, one purple quartzite, two white chert); and one piece of purple quartzite angular debris. The tool is a brown quartzite uniface.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment. Alluvial deposits to a depth of 10 cm overlie bedrock on parts of the site, possibly containing buried cultural deposits. Exposed bedrock is evident, particularly on the eastern portion of site.

Disturbances and Potential Impacts

Wind erosion, sheetwash, and grazing have caused some damage to the site, leaving it 51 percent to 75 percent intact.

Conclusions

The site has a lithic assemblage that lacks temporally diagnostic artifacts. LA 165625 therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component. The site may contain buried cultural deposits, but the nature, extent, or data potential of any such deposits is unknown. LA 165625 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165626

Field Number: 908-1-121
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165626 consists of an extensive artifact scatter [redacted] Vegetation includes creosote, mesquite, snakeweed, little-leaf horse brush, crucifixion thorn, and various low forbs. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 83 pieces of flaked-stone debitage, four cores, and three flaked-stone tools The debitage includes 24 primary reduction flakes (eight gray chert, two variegated chert, two brown chert, one jasper, four red-brown quartzite, two purple quartzite, three brown quartzite, one brown rhyolite, one clear chalcedony); 16

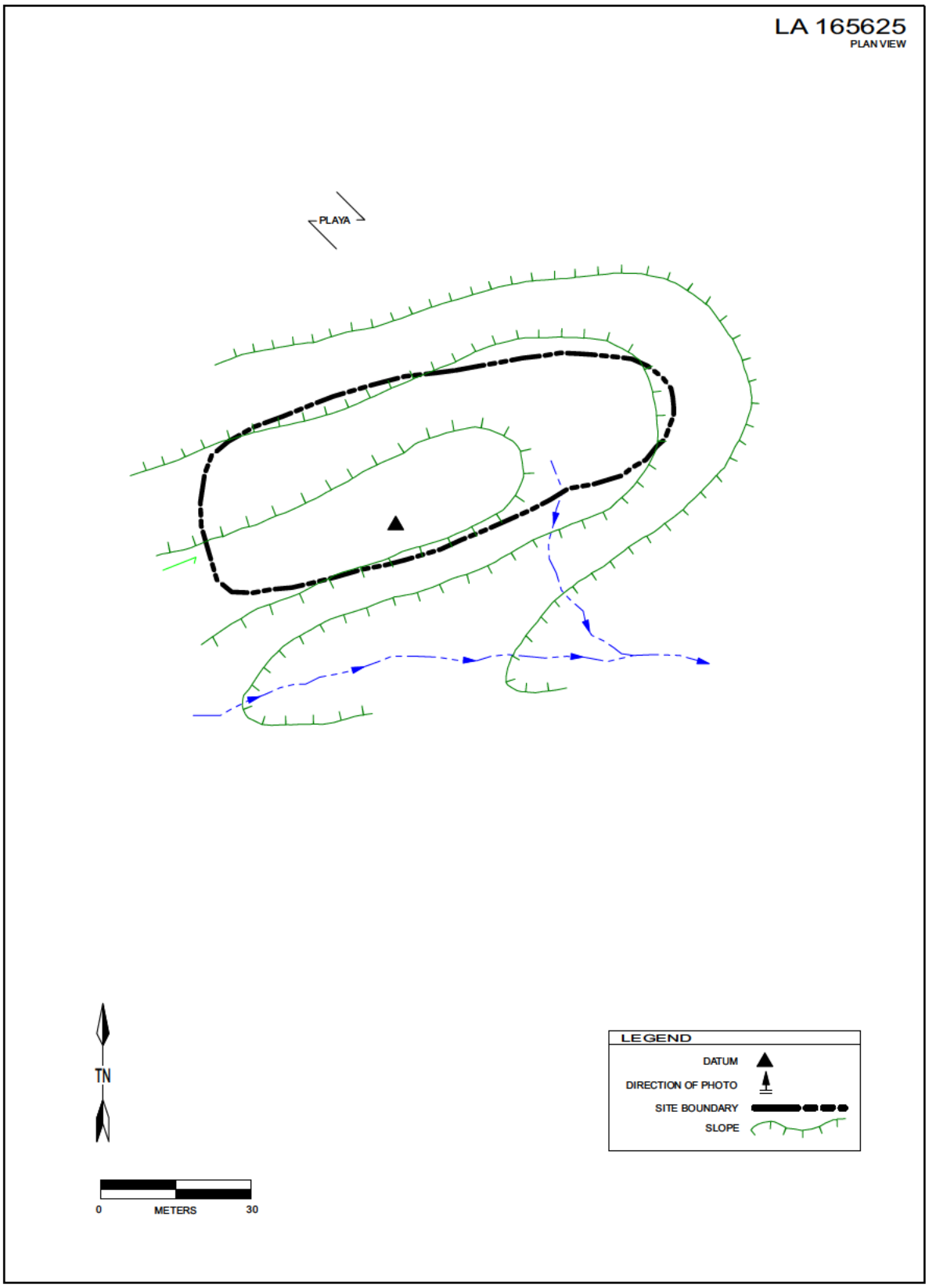

Figure 3.53: LA 165625 Site Map.

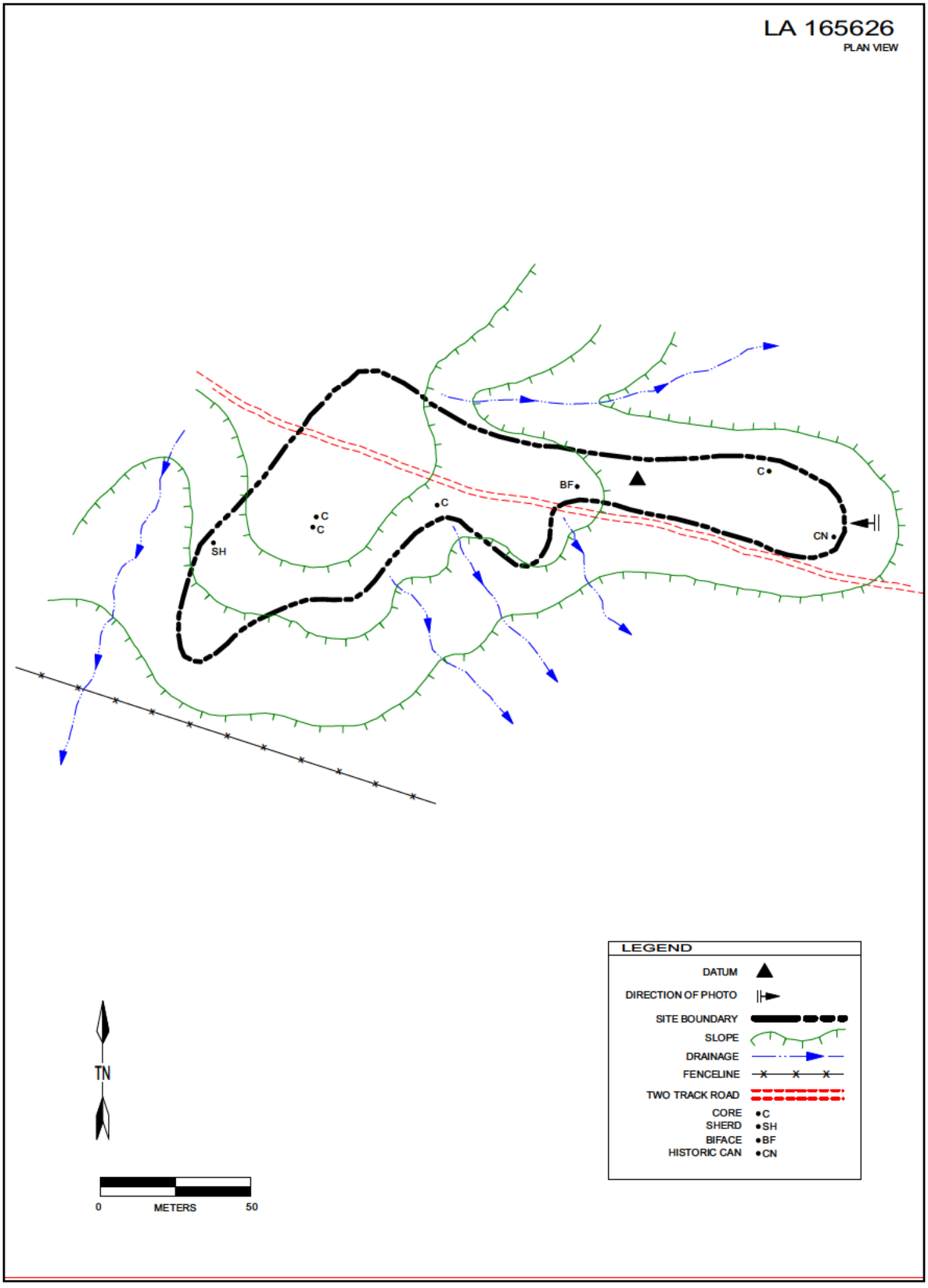

Figure 3.54: LA 165626 Site Map.

secondary reduction flakes (three gray chert, one variegated chert, one white chert, four red-brown quartzite, four purple quartzite, one gray quartzite, two clear chalcedony); 26 tertiary reduction flakes (eight gray chert, one variegated chert, one brown chert, two jasper, five red brown quartzite, six purple quartzite, one brown rhyolite, one red chalcedony, one gray meta-chert); and 17 pieces of angular debris (two gray chert, one variegated chert, two white chert, two jasper, three red brown quartzite, six purple quartzite, one clear chalcedony). Cores include three multidirectional cores (composed of red brown quartzite, white chert, and gray fine-grained basalt) and one gray chert bidirectional core. Tools include one brown rhyolite uniface, one red brown quartzite biface, and one reddish brown quartzite scraper.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment with drainages on both sides of the finger-shaped ridge and off of the main ridge. Exposed limestone bedrock is visible primarily on the eastern end of the site. Sediments overlying the bedrock elsewhere on the site are estimated to be 20 cm thick. Partially buried artifacts suggest that cultural deposits may be present to a depth of at least 10 cm.

Disturbances and Potential Impacts

Wind erosion, sheetwashing, and livestock grazing have had impacts on the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165626 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, based on a lithic assemblage that lacks temporally diagnostic artifacts. The site may contain buried cultural deposits, but the nature, extent, or data potential of any such deposits is unknown. LA 165626 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165627

Field Number: 908-1-122
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165627 is a sparse artifact scatter [redacted] Vegetation includes creosote, mesquite, little-leaf horse brush, yucca, and various low forbs. Surface visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 17 pieces of flaked-stone debitage, two cores, and one tool. The debitage consists of two primary reduction flakes (one gray quartzite, one purple quartzite); four secondary reduction flakes (two gray chert, two purple quartzite); five tertiary reduction flakes (three gray chert, one purple quartzite, one gray rhyolite); and six pieces of angular debris (one brown chert, one gray chert, one gray meta-chert, one purple quartzite, one red quartzite, one gray rhyolite). Cores include one gray chert bidirectional core and one brown chert multidirectional core. The tool is a purple granite hammerstone. Burned caliche is scattered across the site.

Features and Site Structure

No features were observed on this site, although the presence of scattered pieces of burned caliche suggests that a feature was present and has subsequently deflated, or is present in a buried context.

LA 165627 is located in an eolian, colluvial, and alluvial depositional environment. Sediments that might contain buried cultural deposits are estimated at 1 m deep based o the height of dunes in the area. The presence of artifacts on the slope of the dune suggests that buried cultural deposits may be present, although the depth of any such deposits is unknown.

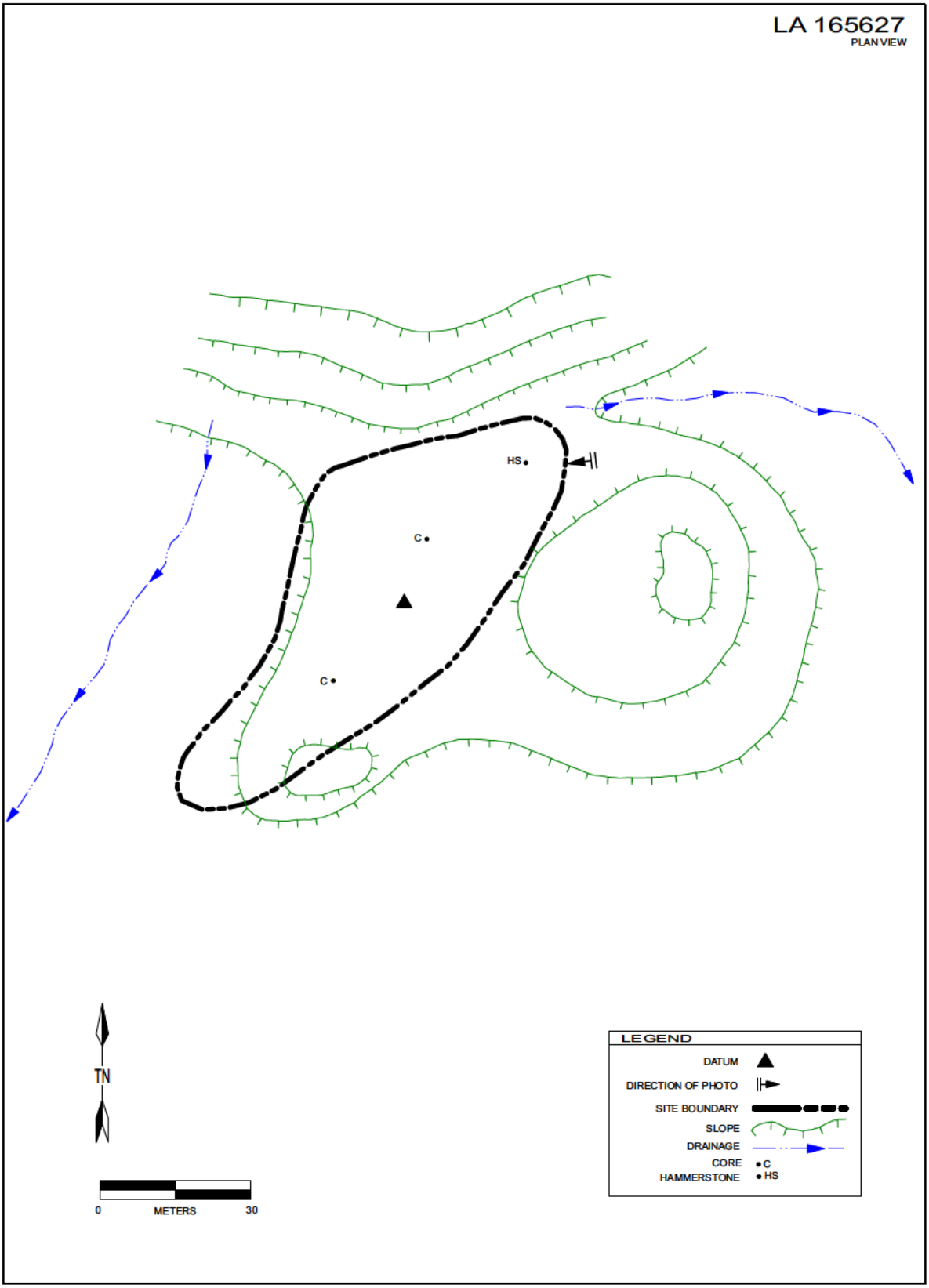

Figure 3.55: LA 165627 Site Map.

Disturbances and Potential Impacts

Wind erosion and sheetwashing have had the most noticeable impact, displacing artifacts and burned rock, and leaving the site an estimated 51 percent to 75 percent intact.

Conclusions

LA 165627 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, given a lithic assemblage lacking temporally diagnostic artifacts. The site may contain buried cultural deposits including thermal features, but the nature, extent, or data potential of any such deposits is unknown. LA 165627 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165628

Field Number: 908-1-123
Category: 1
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165628 is a very sparse artifact scatter [redacted] Vegetation consists of creosote, acacia, and sage. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 13 pieces of flaked-stone debitage, including six primary reduction flakes (one gray and green chalcedony, two gray rhyolite, one gray chert, one white chert, one reddish brown quartzite); four secondary reduction flakes (two reddish brown quartzite, two gray chert); and three tertiary reduction flakes (one reddish brown quartzite, two brown rhyolite).

Features and Site Structure

Lone Mountain did not encounter any features at this location. The site is located in an eolian and alluvial depositional environment. The estimated depth of sediments on the site is 10 cm, as evidenced during the placement of the datum nail. The estimated depth of any subsurface cultural deposits is at least 3 cm, suggested by the presence of partially buried artifacts.

Disturbances and Potential Impacts

LA 165628 has been disturbed by wind erosion, sheetwash, and livestock grazing. The site is estimated to be between 51 percent and 75 percent intact.

Conclusions

LA 165628 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the site lacks temporally diagnostic artifacts. The site has minimal evidence of buried cultural deposits, and the nature, extent, or data potential of any such deposits is unknown. LA 165628 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165634

Field Number: 908-1-124
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165634 is a sparse lithic artifact scatter [redacted] Vegetation includes creosote, sage, and various low forbs. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 16 pieces of flaked-stone debitage and one core. The debitage includes three primary reduction flakes (one jasper, one gray quartzite, one brown rhyolite); 10 secondary reduction flakes (three gray chert, three purple quartzite, one brown quartzite, one clear chalcedony, one pink chalcedony, one brown rhyolite); two tertiary reduction flakes (one yellow chert, one purple quartzite); and one piece of purple quartzite angular debris. The core is a gray chert unidirectional core.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment. A limestone escarpment is exposed along the edge of the ridge to the south of the site. The estimated depth of sediments on the site is 10 cm, based on the depth

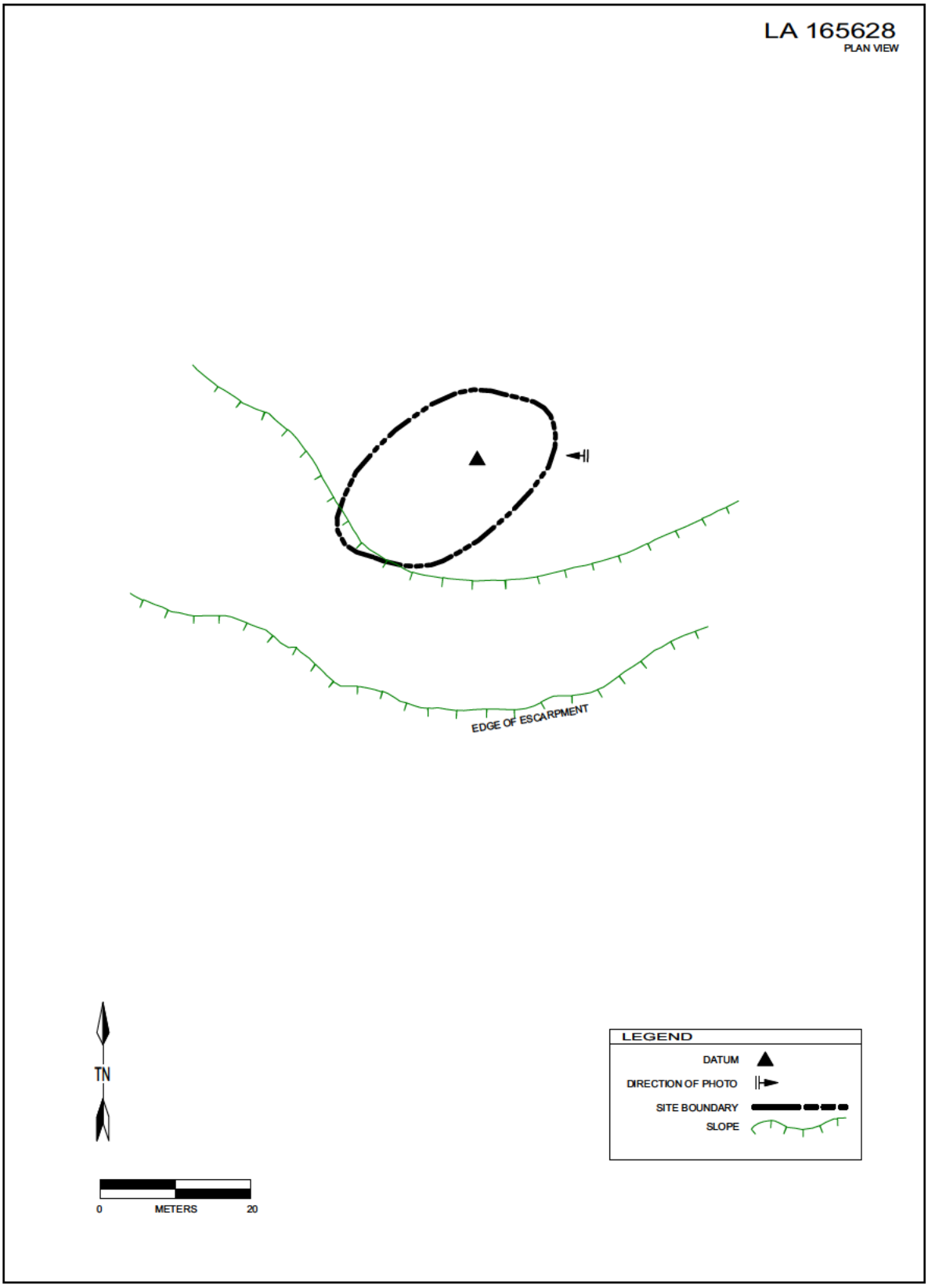

Figure 3.56: LA 165628 Site Map.

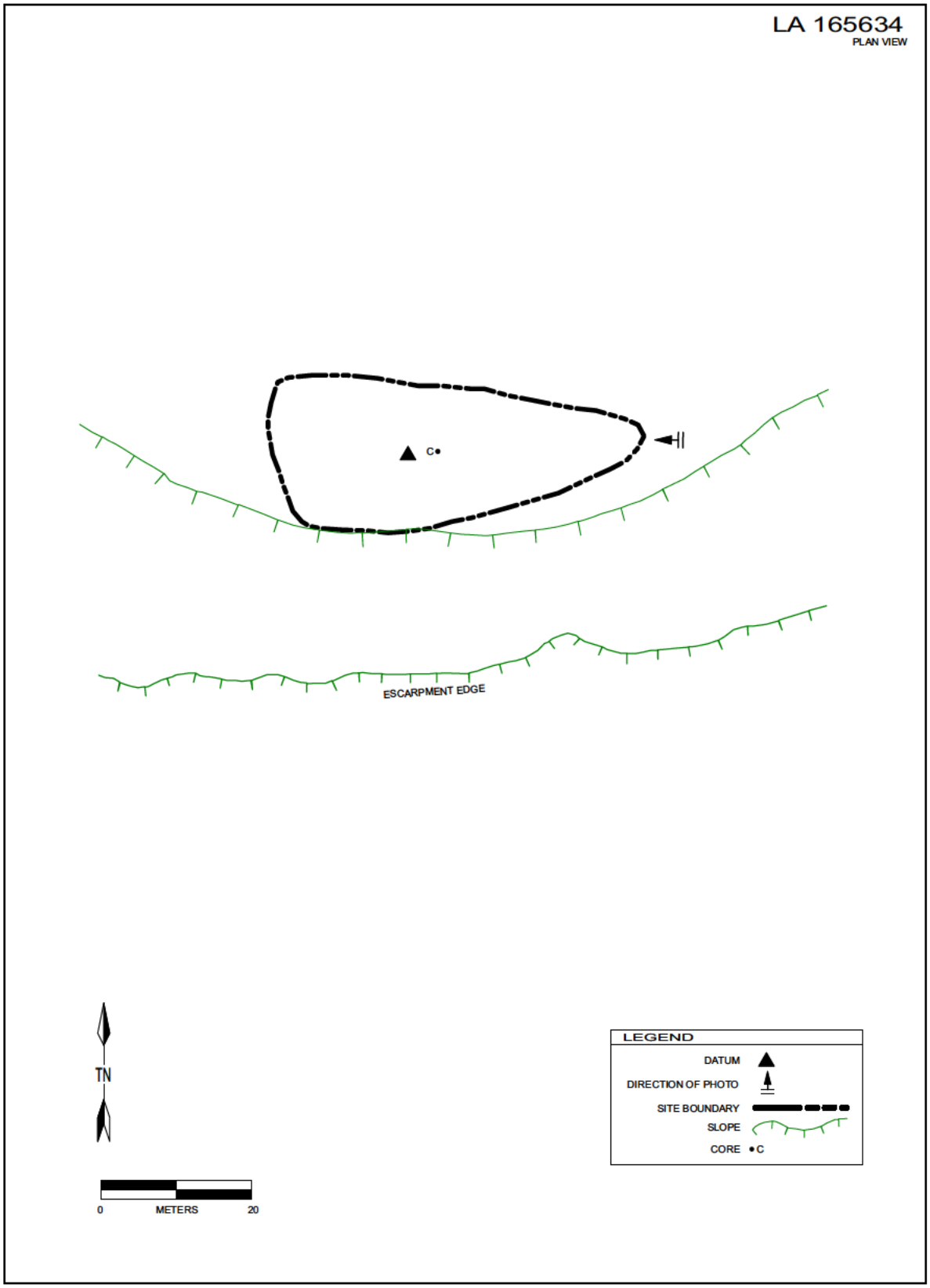

Figure 3.57: LA 165634 Site Map.

of the datum nail. Partially buried artifacts indicate that subsurface cultural deposits are present to a depth of at least 3 cm.

Disturbances and Potential Impacts

Wind erosion, sheetwash, and animal grazing have caused some damage to the site, leaving it an estimated 51 percent to 75 percent intact.

Conclusions

LA 165634 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, given a lack of temporally diagnostic artifacts in the lithic assemblage. The site has little evidence of buried cultural deposits, and the data potential or significance of any such deposits is unknown. LA 165634 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165635

Field Number: 908-1-125
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165635 is a sparse lithic scatter [redacted] Vegetation consists of creosote, acacia, sage, Christmas tree cholla, and various low forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts during this investigation. The assemblage consists of 14 pieces of flaked-stone debitage and one core. The debitage includes two primary reduction flakes (one variegated chert, one purple quartzite); seven secondary reduction flakes (two gray chert, one variegated chert, one purple quartzite, three gray quartzite); and five tertiary reduction flakes (one gray chert, two purple quartzite, two gray quartzite). The core is a gray chert bidirectional core.

Features and Site Structure

There were no features observed. The site is located in an eolian and alluvial depositional environment. The estimated sedimentary depth is 10 cm, based on datum nail placement. Partially buried artifacts suggest that buried cultural deposits are present to a depth of 3 cm.

Disturbances and Potential Impacts

Wind erosion, livestock grazing, and sheetwash have impacted the site, together with eolian accumulation, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165635 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the site has a lithic assemblage that lacks any temporally diagnostic artifacts. The site does appear to have buried cultural deposits, and the nature, extents, or potential of any such deposits, should they exist, to yield additional significant data is unknown. LA 165635 is therefore recommended to have undetermined eligibility for nomination to the NRHP.

LA 165636

Field Number: 908-1-126
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165636 [redacted] consists of a very sparse artifact scatter (FIgure 3.59). Vegetation covers much of the site and consists of creosote, acacia, mormon tea, little-leaf horse brush and other low forbs. Surface visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 22 pieces of flaked-stone debitage and one flaked-stone tool. The debitage includes 10 primary flakes (four gray chert, one yellow chert, one jasper, two gray quartzite, two reddish brown quartzite); six secondary reduction flakes (two gray chert, one brown chert, one yellow chert, one reddish brown quartzite, one brown rhyolite); two tertiary reduction flakes (one

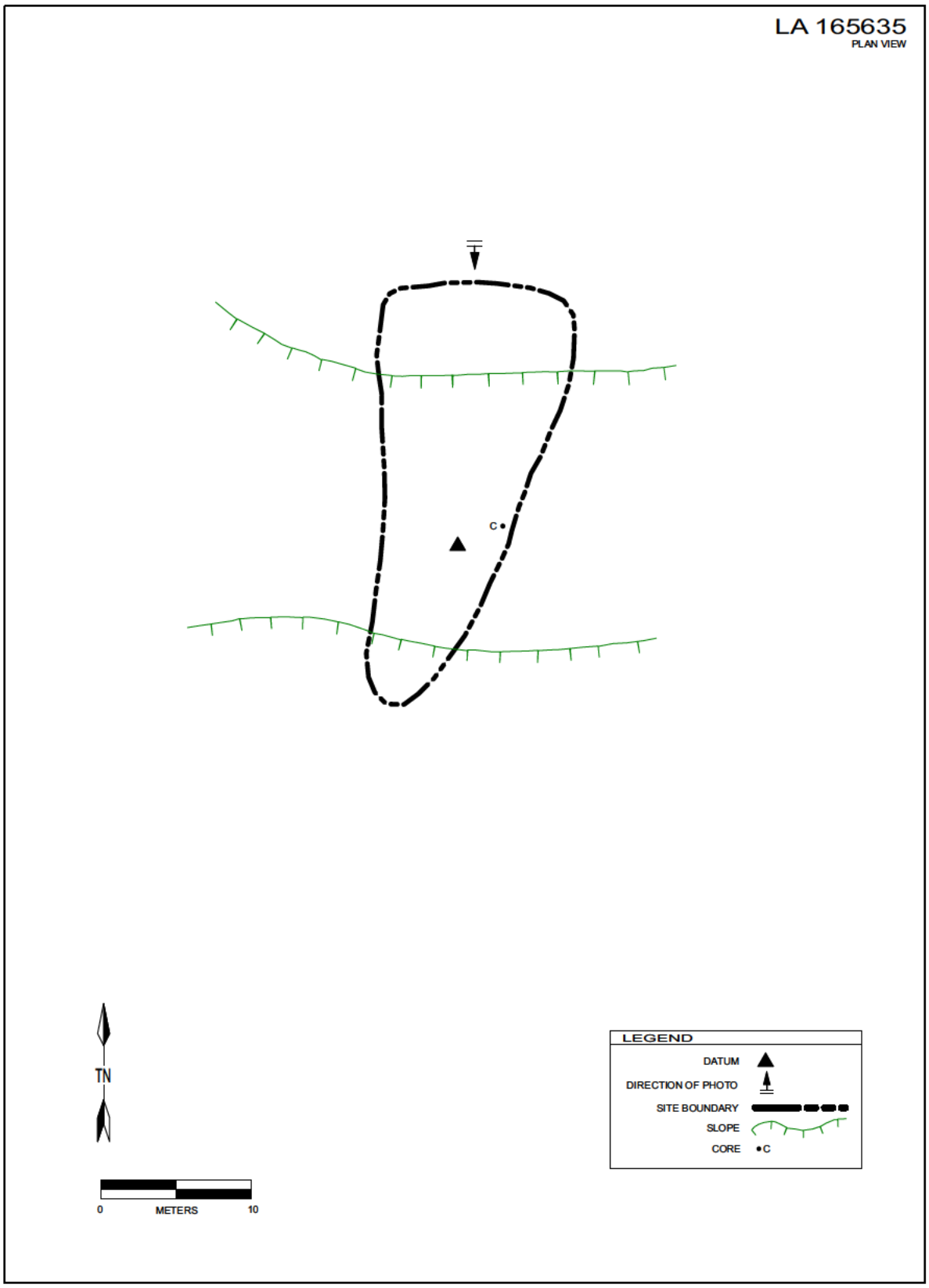

Figure 3.58: LA 165635 Site Map.

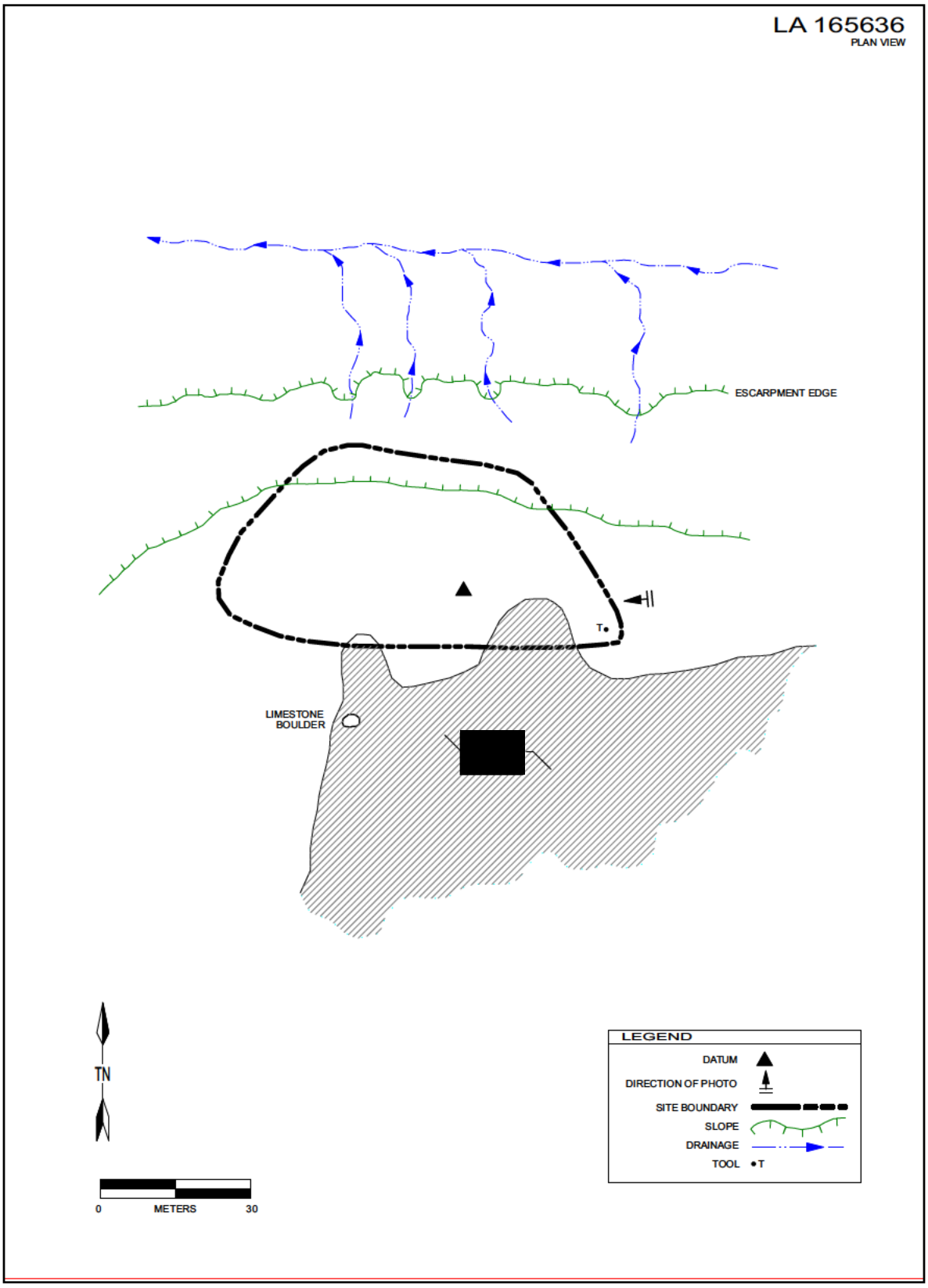

Figure 3.59: LA 165636 Site Map.

gray chert and one reddish brown quartzite); and four pieces of angular debris (three jasper, one reddish brown quartzite). The tool is a complete brown rhyolite uniface.

Features and Site Structure

No features were observed during the investigation. The site is located in an eolian and alluvial depositional environment and is bounded by a well pad on the south side and a limestone escarpment overlooking a drainage on the north side. The placement of the datum nail indicated that sediments are approximately 10 cm deep. Partially buried artifacts suggest that buried cultural deposits are present to a depth of at least 3 cm.

Disturbances and Potential Impacts

Wind erosion, sheetwash, and some wildlife disturbance have had an impact on the site. Heavy machinery tracks are evident on south side of the site. The site is estimated to be between 51 percent and 75 percent intact.

Conclusions

LA 165636 lacks temporally diagnostic artifacts and therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component. The site appears to have buried cultural deposits, but the nature, extents, or the data potential of any such deposits is unknown. LA 165636 is therefore recommended to have undetermined eligibility for nomination to the NRHP.

LA 165637

Field Number: 908-1-127
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165637 is a lithic scatter [redacted] Vegetation includes creosote, acacia, crucifixion thorn, little-leaf horse brush, prickly pear, sage, Christmas tree cholla, and a variety of low forbs. Surface visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 122 pieces of flaked-stone debitage and five cores. The debitage includes 38 primary reduction flakes (12 purple quartzite, two gray quartzite, eight reddish brown quartzite, 10 gray chert, six brown rhyolite); 47 secondary reduction flakes (15 purple quartzite, two gray quartzite, three reddish brown quartzite, two gray chert, one pink chert, one yellow chert, one jasper, 18 brown rhyolite, three clear chalcedony, one gray metachert); 24 tertiary reduction flakes (seven purple quartzite, two gray quartzite, three gray chert, one clear chalcedony, 11 brown rhyolite); and 14 pieces of angular debris (five gray chert, two yellow chert, three jasper, two brown rhyolite, two gray quartzite). The cores are two purple quartzite unidirectional cores, two purple quartzite multidirectional cores, and one gray quartzite tested cobble.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment. Finger-shaped ridges emerge from a broad relatively flat ridge to the west. Drainages are evident along the ridge slopes. Sediments are estimated to be no more than 15 cm deep, as indicated by the bedrock encountered by the datum nail. Partially buried artifacts indicate that subsurface cultural deposits are present to a depth of at least 5 cm.

Disturbances and Potential Impacts

Sheetwash and wind erosion have had the greatest effect on the site, with limited disturbance caused by bioturbation. Sheetwash is particularly evident across the slopes, causing artifacts to be displaced toward the west and toward the edges of the ridges. Wind erosion has caused sediments to accumulate at the base of plants. The site is estimated to be between 51 percent and 75 percent intact.

Conclusions

LA 165637 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the assemblage lacks temporally diagnostic artifacts. The site has limited buried cultural deposits, but the nature, extents, or the data potential of any further deposits is unknown. LA 165637 is therefore recommended to have undetermined eligibility for nomination to the NRHP.

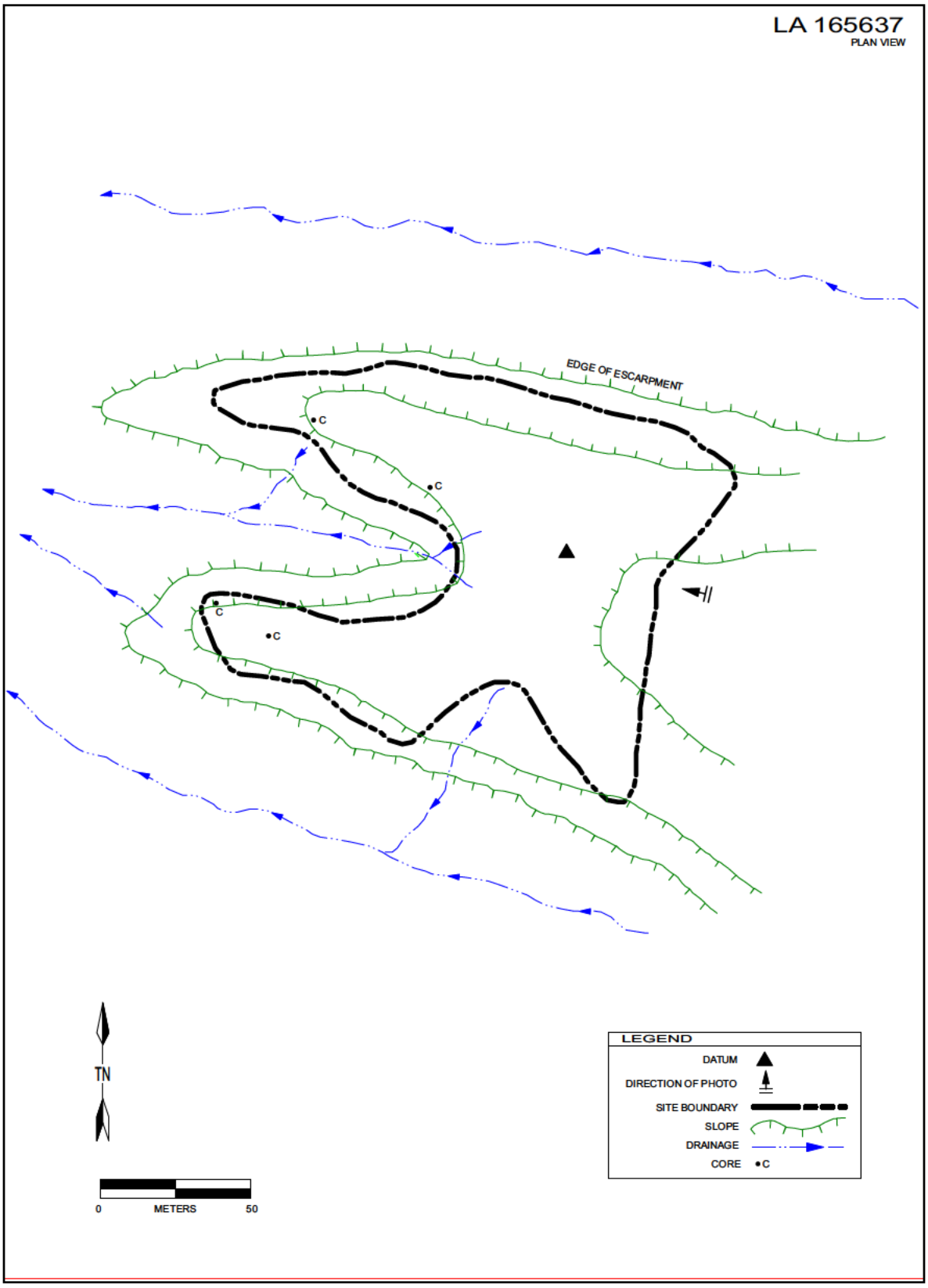

Figure 3.60: LA 165637 Site Map.

LA 165638

Field Number: 908-1-128
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165638 is a lithic artifact scatter [redacted] Vegetation on LA 165638 includes creosote, acacia, crucifixion thorn, Mormon tea, sage and other low forbs. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 20 pieces of flaked-stone debitage and four cores. The debitage includes 12 primary flakes (three gray chert, one yellow chert, six gray quartzite, one purple quartzite, one brown rhyolite); five secondary reduction flakes (three gray quartzite, one purple quartzite, one brown rhyolite); and three tertiary reduction flakes (one gray chert, two gray quartzite). The cores consist of a gray and a purple quartzite tested core and two brown rhyolite multidirectional cores.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment, overlooking a broad valley to the northwest into which drainages on and near the site are flowing. Sediments on the site are shallow and no deeper than 5 cm. Some partially buried artifacts are present, but there appears to be little to no potential for substantial buried deposits in this location.

Disturbances and Potential Impacts

Sources of disturbance to the site include wind erosion, sheetwash, and limited bioturbation caused by wildlife. Sheetwash appears to be slowly redistributing artifacts to the west, and winds are collecting sediments at the base of plants. The site is estimated to be between 51 percent and 75 percent intact.

Conclusions

LA 165638 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, given a lithic assemblage lacking temporally diagnostic artifacts. The site has very shallow sediments and appears unlikely to yield any additional significant data. LA 165638 is therefore recommended ineligible for nomination to the NRHP under any of the four criteria.

LA 165639

Field Number: 908-1-129
Category: 2
Affiliation: Unspecified Paleoindian
(8700 to 5500 B.C.)
Eligibility: Eligible, D
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165639 is a lithic scatter [redacted] Vegetation on the site includes creosote, crucifixion thorn, catclaw, and grasses. Although vegetation is dense in places, the overall surface visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 45 pieces of flaked-stone debitage, three cores, and four flaked-stone tools. The debitage includes 24 secondary reduction flakes (six reddish brown quartzite, seven purple quartzite, three grayish blue quartzite, one orange chert, five gray chert, two brown chert); 12 tertiary reduction flakes (five reddish brown quartzite, four purple quartzite, one pink chert, two red chalcedony); and nine pieces of angular debris (four reddish brown quartzite, one white quartzite, one jasper, one gray chert, two red chalcedony). The cores include one bluish black quartzite multidirectional core, one reddish brown quartzite bidirectional core, and one gray chert multidirectional core. The tools are two brown quartzite unifaces, one brown quartzite scraper, and one brown chert projectile point that appears to be missing its base. The point is likely one of the Plano Complex of unfluted lanceolate points. Lacking a base, however, a specific type

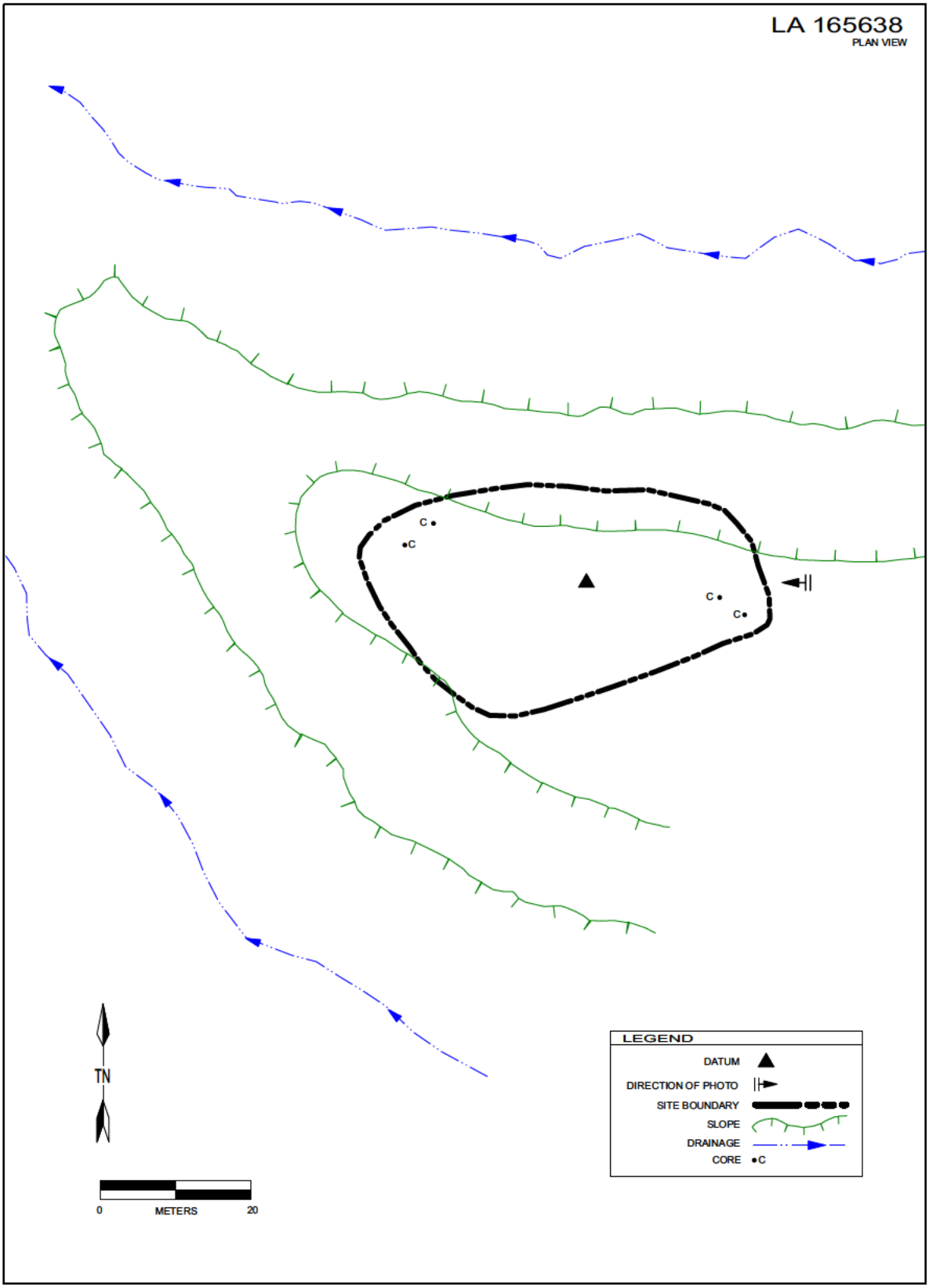

Figure 3.61: LA 165638 Site Map.

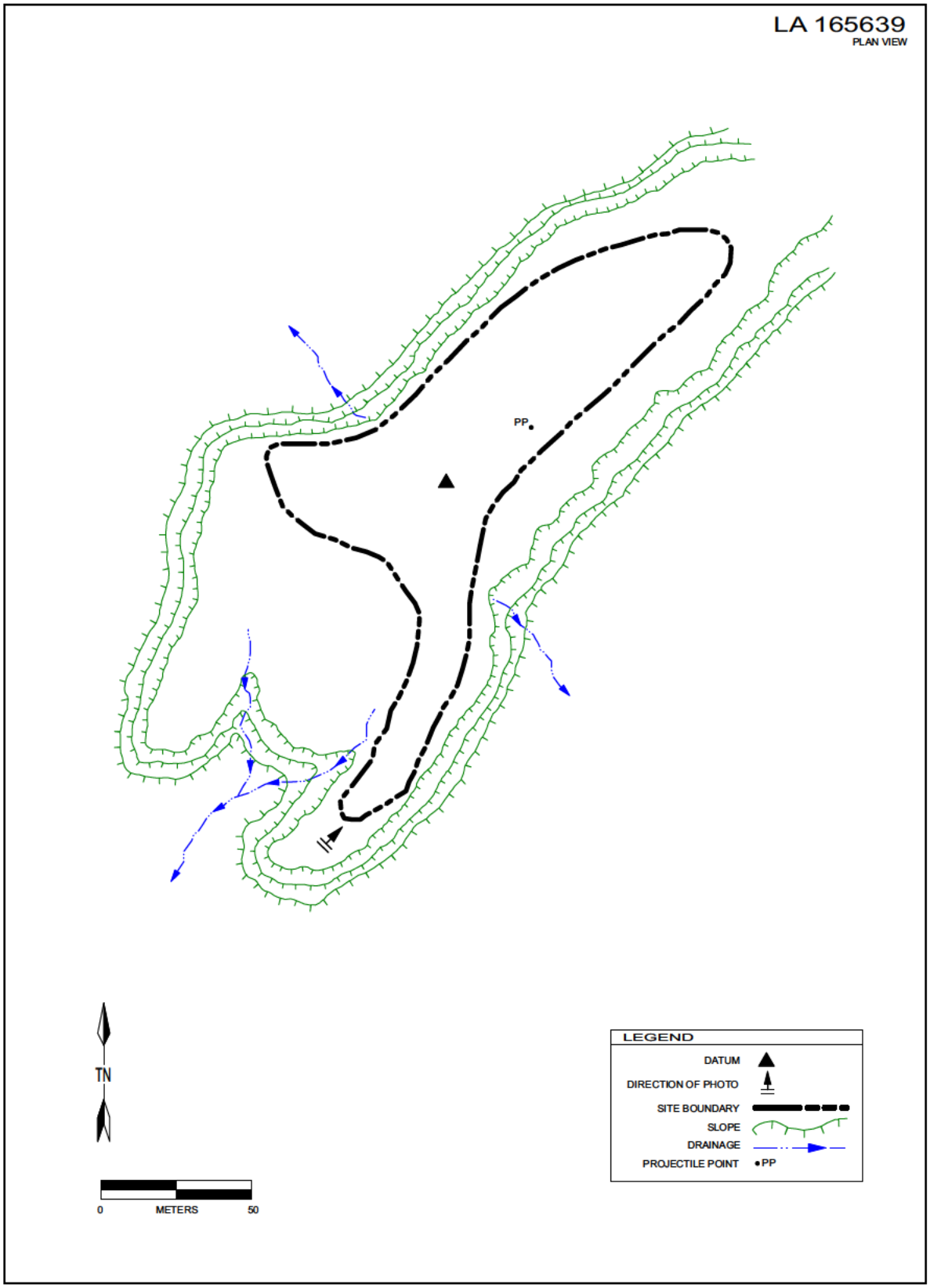

Figure 3.62: LA 165639 Site Map.

designation is difficult and this point therefore may be one of several types that date between 8700 and 5500 B.C. (Figure 3.63).

Features and Site Structure

No features were observed during investigation. The site is located on residuum in an alluvial depositional environment, bordered by two large drainages. There is decomposing limestone bedrock less then 10 cm below the surface, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

Alluvial processes have likely had some impact on site integrity. The site is estimated to be between 51 percent and 75 percent intact.

Conclusions

LA 165639 has an Unspecified Paleoindian (8700 to 5500 B.C.) component as indicated by the presence of an incomplete unfluted lanceolate point. The site appears to have limited potential for additional significant remains, given its shallow soils. However, as the site has thus far yielded a Paleoindian point, even limited data collected would have significance for addressing research questions concerning the Paleoindian period. LA 165639 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165640

Field Number: 908-01-130
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165640, [redacted] consists of a light artifact scatter (FIgure 3.64). Vegetation includes creosote, catclaw acacia, little-leaf horse brush, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 91 flaked-stone artifacts, including 86 pieces of debitage, two cores, and three tools. The debitage consists of 32 secondary reduction flakes (23 quartzite, seven chert, two chalcedony); 18 tertiary reduction flakes (12 quartzite, four chert, two chalcedony); and 36 pieces of angular debris (26 quartzite, nine chert, one chalcedony). Quartzite colors are purple, red-purple, pink, gray, blue, reddish brown, brown, and white. Cherts at LA 165640 are brown, dark gray, orange, and pink, and chalcedonies are white-pink, white, and dark gray. The cores include one gray and white chert multidirectional core, and one brown quartzite multidirectional core.

Figure 3.63: LA 165639 Plano Complex Projectile Point.

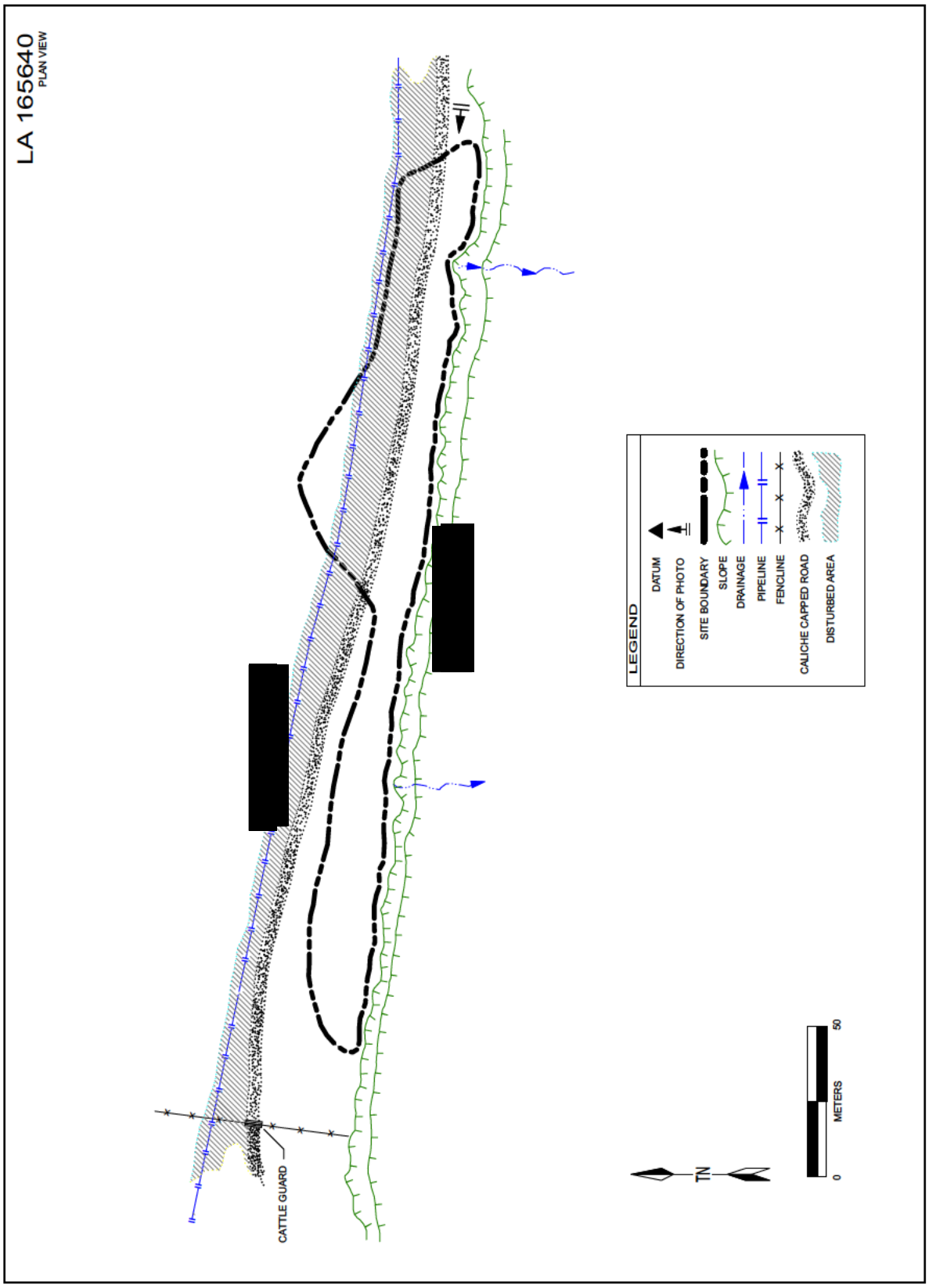

Figure 3.64: LA 165640 Site Map.

The tools consist of one reddish brown quartzite uniface, one grayish green chert uniface, and one reddish brown quartzite scraper.

Features and Site Structure

Lone Mountain encountered no features in this location. The site is located in an alluvial depositional environment. No buried cultural material was observed and the depth of sediment deposits that could contain buried cultural material is unknown.

Disturbances and Potential Impacts

The eastern portion of the site is bisected by an oil field two-track road running east-west. An exposed pipeline parallels the two-track road approximately 6 m to the north. The main disturbances have been water erosion, construction from the pipeline, and the two-track road. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165640 has a lithic assemblage with no associated temporally diagnostic artifacts. This indicates the site has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation. The site has yielded no clear evidence for or against the presence of buried cultural deposits. In the absence of data concerning the presence or data potential of any buried cultural deposits, LA 165640 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165641

Field Number: 908-01-131
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165641 is a sparse lithic artifact scatter [redacted]
Vegetation includes desert sage, catclaw acacia, creosote, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 23 flaked-stone artifacts, including 18 pieces of debitage, four cores, and one tool. The debitage consists of nine secondary reduction flakes (two reddish brown quartzite, one purple quartzite, one white quartzite, two gray chert, two brown chert, one jasper), three tertiary reduction flakes (one reddish brown quartzite, one white quartzite, one yellow chert), and six pieces of angular debris (three reddish-brown quartzite, two purple quartzite, and one gray chert). The cores include one brown quartzite multidirectional core, one gray chert unidirectional core, one dark gray chert multidirectional core, and one purple quartzite unidirectional core. The tool is a purple quartzite scraper.

Features and Site Structure

No features were observed. The site is bordered to the north by an oil field and a caliche-capped road that runs east to west. The southern border is the northern rim of Cedar Canyon. The site is located in a residual and alluvial depositional environment. No buried cultural material was observed and the depth of sediments that could contain such deposits appears to be no more than 10 cm, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

The primary disturbance is water erosion and a two-track road bisecting the site east to west along the north rim of the canyon. LA 165641 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165641 has an Undetermined Aboriginal (9500 B.C. to A.D. 1880) affiliation, indicated by a lithic assemblage lacking any temporally diagnostic artifacts. The site has a limited potential for buried cultural deposits or any other forms of significant data, but the presence of such data or their significance cannot be entirely ruled out. LA 165641 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

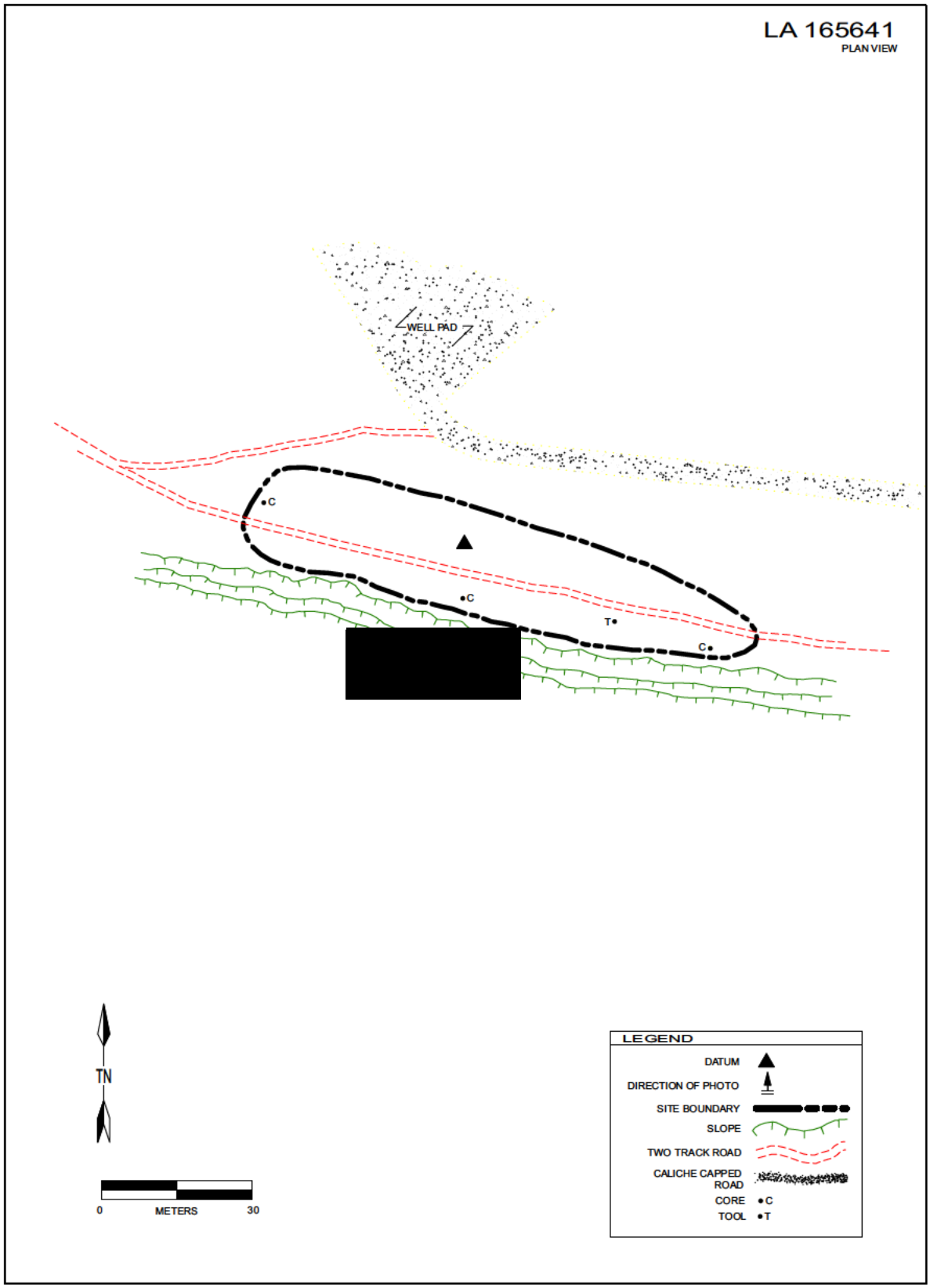

Figure 3.65: LA 165641 Site Map.

LA 165642

Field Number: 908-01-132
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165642 is a lithic artifact scatter [redacted] Vegetation on the site includes creosote, catclaw acacia, little-leaf horse brush, Mormon tea, crucifixion thorn, and various low forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 159 flaked-stone artifacts, including 135 pieces of flaked-stone debitage, 17 cores, and seven tools. The flaked-stone debitage consists of 13 primary reduction flakes (seven quartzite, three chert, three brown rhyolite); 72 secondary reduction flakes (16 chert, 56 quartzite); 33 tertiary reduction flakes (18 quartzite, 13 chert, two chalcedony) and 17 pieces of angular debris (six quartzite, 10 chert, one chalcedony). Quartzites occur in purple, gray, red-brown, brown, pink, blue, orange, and white; cherts are red, gray, orange, white, pink, yellow, brown, and black; and chalcedony in white and pink. The cores include seven quartzite multidirectional cores, two quartzite unidirectional cores, two quartzite bidirectional cores, two quartzite tested cobbles, and four chert multidirectional cores. The quartzite cores occur in gray, blue and purple, purple, blue, brown and purple, red and brown, and light purple. Most of the chert cores are in tan, gray, and pink. However, one chert multidirectional core is gray and orange banded. The tools consist of four quartzite scrapers (two purple, one gray and tan, one tan, one red and brown); one red and brown quartzite utilized flake; and one jasper biface.

Features and Site Structure

No features were observed. The southern edge of the site is bounded by a major drainage that runs east to west across the canyon floor and the northern edge is bounded by the rim of the canyon. The site is located on scattered areas of residuum and in an alluvial and colluvial depositional environment. No buried cultural material was observed and the depth of sediment deposition that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbance on the site is water erosion. LA 165642 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165642 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as indicated by a lithic assemblage lacking temporally diagnostic artifacts. It is unclear whether the site contains buried cultural deposits or what the nature, extents, or significance of any such deposits may be. LA 165642 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165643

Field Number: 908-01-133
Category: 2
Affiliation: Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1400), possible Unspecified Plains Nomad (A.D. 1500 to 1880), and Unknown Historic (A.D. 1908 to 1945)
Eligibility: Eligible, D
Site Type: Possible Structure
Parcel: 4

Description

LA 165643 [redacted] site consists of four features with associated lithic, ceramic, and historic artifacts (Figure 3.67). Vegetation includes creosote, catclaw acacia, desert sage, acacia, horse crippler cactus, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

A representative sample (40 percent) of all the artifacts was recorded. The assemblage consists of 121 flaked-stone artifacts, two groundstone artifacts, five prehistoric ceramics, and six historic cans. The flaked-stone assemblage consists of 107 pieces of debitage, 10 cores, and four tools. The debitage includes six primary reduction flakes (four quartzite, two chert); 42 secondary reduction flakes (27 quartzite, 11 chert, one chalcedony, two gray rhyolite); 48 tertiary reduction flakes (34 quartzite, 13 chert, one red and orange chalcedony); one thinning flake (chert); and 10 pieces of angular debris (eight quartzite, one chert, one gray rhyolite). Quartzites occur in purple,

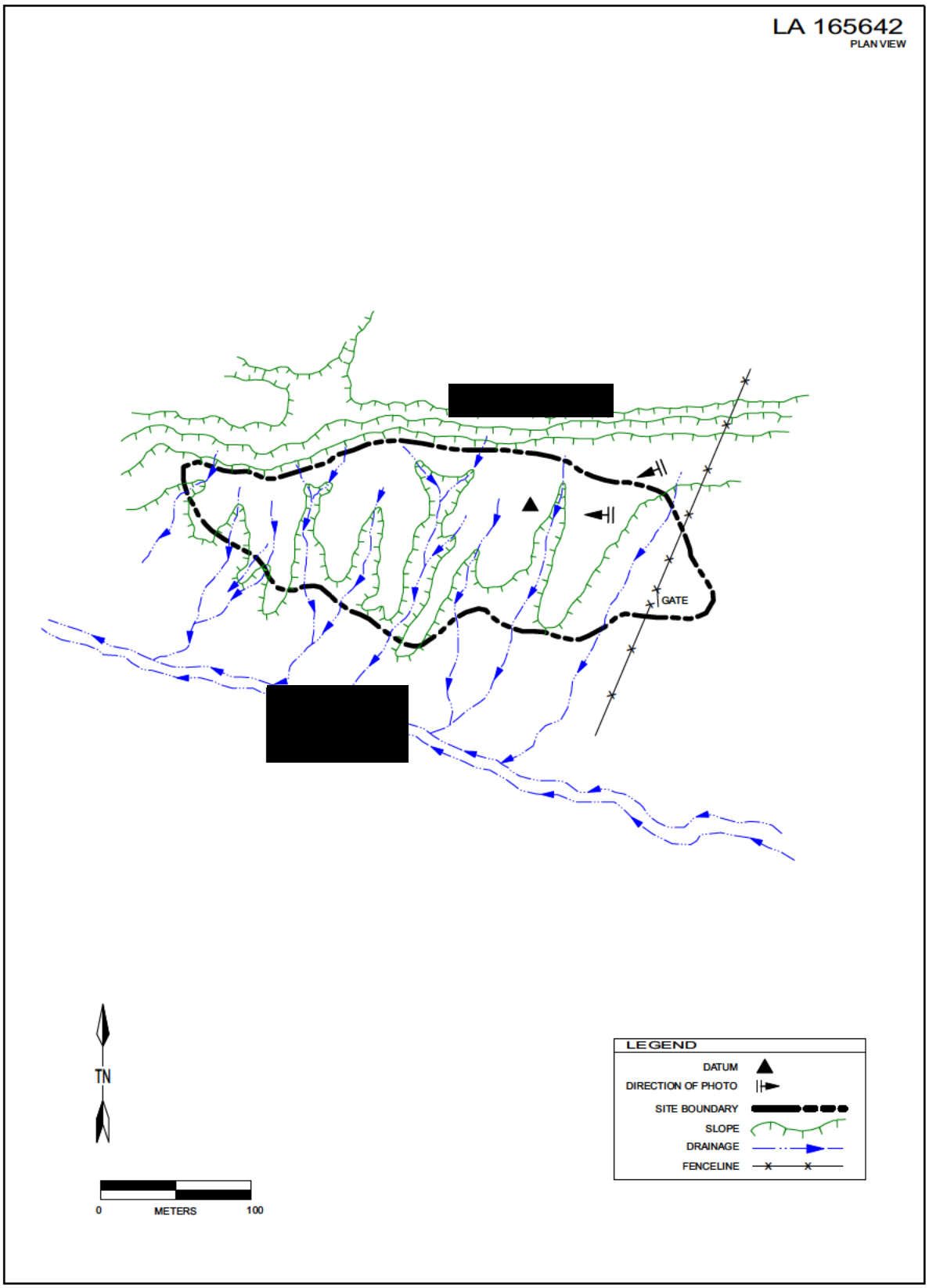

Figure 3.66: LA 165642 Site Map.

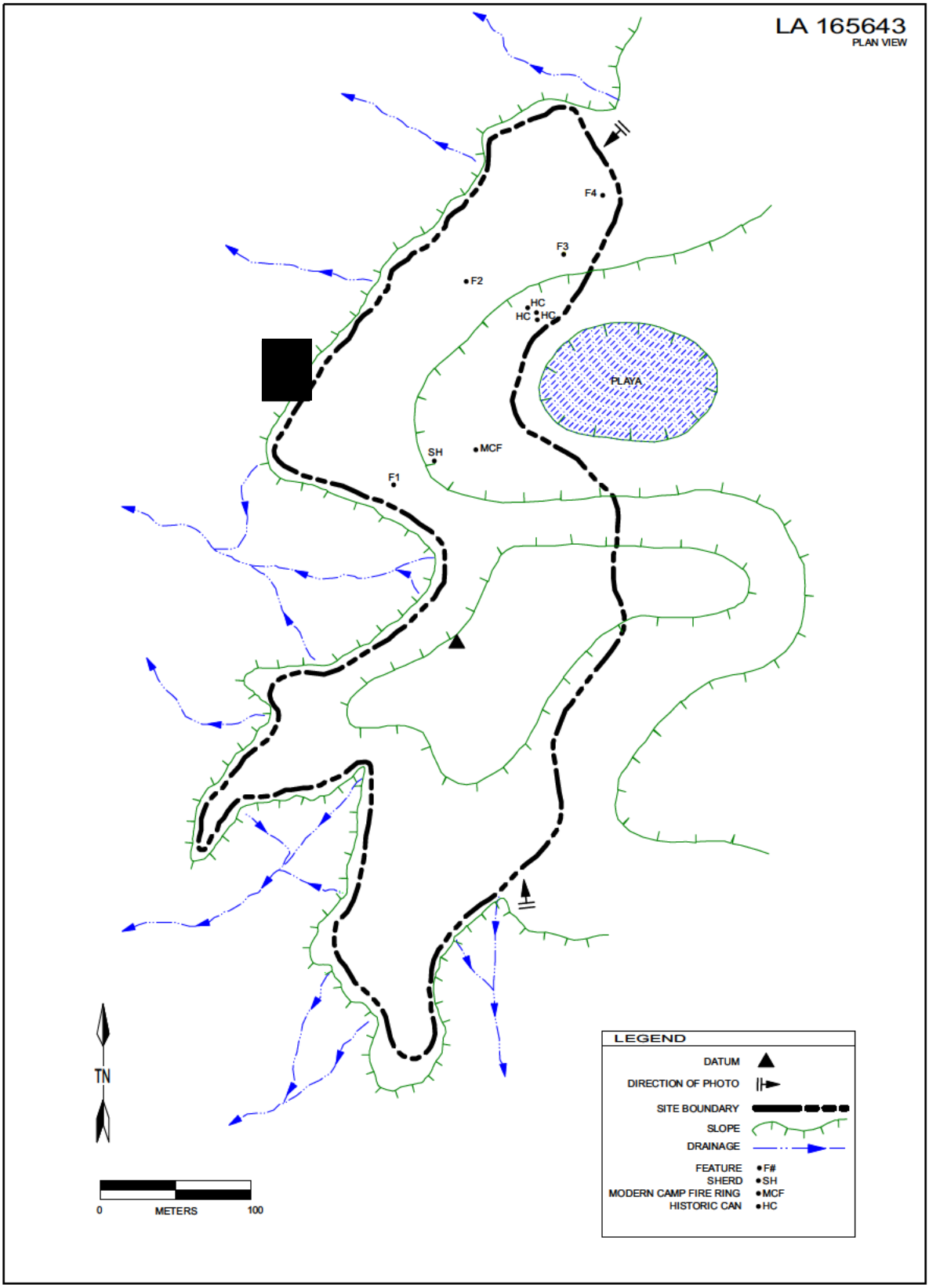

Figure 3.67: LA 165643 Site Map.

red and brown, tan and red, tan, red, and gray and blue. Cherts are gray, white, red, red and brown, purple, tan, pink, orange, and orange and gray banded. The cores consist of three multidirectional quartzite cores (one purple, one tan, one red); one red and brown multidirectional chert core; one purple quartzite bidirectional core; three chert bidirectional cores (two tan, one orange); one purple quartzite unidirectional core; and one white chalcedony multidirectional core. The tools include three chert unifaces (one red, one gray, one orange and gray); and one gray and blue quartzite scraper. The groundstone artifacts are one sandstone one-hand mano fragment and one limestone metate slab fragment. The ceramics consist of three Jornada Brown sherds, one El Paso Brown sherd, and one Chupadero Black-on-white sherd (Figure 3.68). Given the sizable artifact assemblage, a broad date range between A.D. 200 and 1400 is possible. The cans include three hole-in-top cans, one sanitary can, one intact tobacco tin with a wire hinge top, and one exterior friction lid. This assemblage suggests a date range between A.D. 1908 and 1945.

Features and Site Structure

Lone Mountain encountered four features at LA 165643. Feature 1 is a 7-m by 8-m scatter of burned caliche and burned limestone with an associated stain. A concentration of fire-cracked rocks was observed within the larger feature area. Carbon staining was noted 2 m to 5 m northwest of the main concentration of feature rock. The feature depth is unknown. Two secondary flakes were associated. The feature is less than 20 percent intact and badly deflated.

Feature 2 is a 3-m by 2-m burned caliche and burned limestone cluster of fewer than 50 pieces. The feature depth is unknown. No artifacts, ash staining, or charcoal were observed. The feature is approximately 20 percent intact and has been disturbed by plant growth.

Feature 3 is a 3-m by 2-m L-shaped rock alignment consisting of 16 limestone blocks. No artifacts, charcoal, or ash staining were noted. Feature depth is unknown. The feature is less than 10 percent intact, having been impacted by erosion and bioturbation due to plant growth.

Feature 4 is a 5-m by 5-m circular rock alignment, possibly the remains of a teepee ring. The alignment consists of 16 limestone blocks. Two jasper tertiary reduction flakes, one limestone hammerstone, and one limestone groundstone were noted. The feature depth is unknown. No ash staining or charcoal was observed. The feature is 40 percent intact. This feature may indicate a protohistoric or historic plains nomad component.

The southern and western sides of the site are bounded by the canyon rim. The site is located on residuum and in an eolian, colluvial, and alluvial depositional environment. Buried cultural material was observed at least in association with Feature 1 and

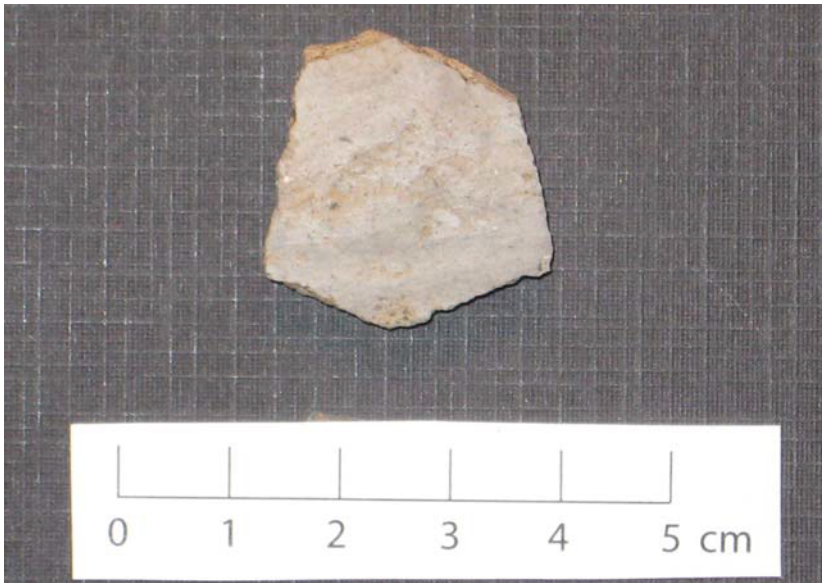

Figure 3. 68: LA 165643 Brownware Sherd.

the estimated depth of sediment deposition that could contain additional buried material is 5 cm, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

The primary disturbance is water erosion. Wind erosion and cattle grazing have had a minimal effect. The site is between 51 percent and 75 percent intact.

Conclusions

LA 165643 has Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1400), possible Unspecified Plains Nomad (A.D. 1500 to 1880), and Unknown Historic (A.D. 1908 to 1945) components as suggested by temporally diagnostic artifacts and the possible presence of a tipi ring. The site has an extensive unrecorded artifact scatter and at least one feature that may yield radiocarbon dates and micro/macrobotanical data. Other features may produce TL/OSL dates and residues or additional classes of data that may address regional research questions. LA 165643 is recommended eligible for nomination to the NRHP under Criterion D.

LA 165644

Field Number: 908-01-134
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165644 is a light lithic artifact scatter [redacted] Vegetation on the site includes creosote, catclaw acacia, little-leaf horse brush and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 122 flaked-stone artifacts, including 105 pieces of flaked-stone debitage, 6 cores, and 11 tools. The debitage consists of eight primary reduction flakes (five quartzite, three chert); 50 secondary reduction flakes (30 quartzite, 16 chert, two chalcedony, two brown rhyolite); 29 tertiary reduction flakes (18 quartzite, seven chert, two chalcedony, two brown rhyolite); and 18 pieces of angular debris (nine quartzite, nine chert). Quartzites occur in red, red and brown, pink and tan, pink, dark blue, white, green and brown, tan, brown, purple, gray, and orange. Cherts are gray, red and purple, tan, brown, pink, orange, red, pink and tan, white and tan, and white. Chalcedony occurs in brown and red and purple. The cores include four quartzite multidirectional cores (three purple, one brown and orange); one pink and tan quartzite bidirectional core; and one gray and tan chert bidirectional core. The tools consist of five quartzite unifaces, two quartzite hammerstones, one quartzite bifacial scraper, one quartzite biface, one gray chert hammerstone, and one gray and orange chert uniface. The quartzite tools occur in purple, pink, pink and orange, red and purple, red and brown, and blue and brown.

Features and Site Structure

No features were observed. The southern, western and northern boundaries are defined by the corresponding edges of the ridge. The site is bisected along the north rim of Cedar Canyon by an oil field two-track road.

LA 165644 is located on residuum and in an alluvial and eolian depositional environment. No buried cultural material was observed and the depth of sediment deposition that could contain such material is estimated to be less than 5 cm, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

The primary disturbance on the site is water erosion. Wind erosion and oilfield road cutting through the site have had minimal effects. The site is estimated to be 76 percent to 99 percent intact.

Conclusions

LA 165644 has a lithic scatter with no temporally diagnostic artifacts. The site therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component. The site has been completely recorded and has little to no potential for buried cultural deposits or any other forms of additional significant data. LA 165644 is recommended ineligible for nomination to the NRHP under any of the four criteria.

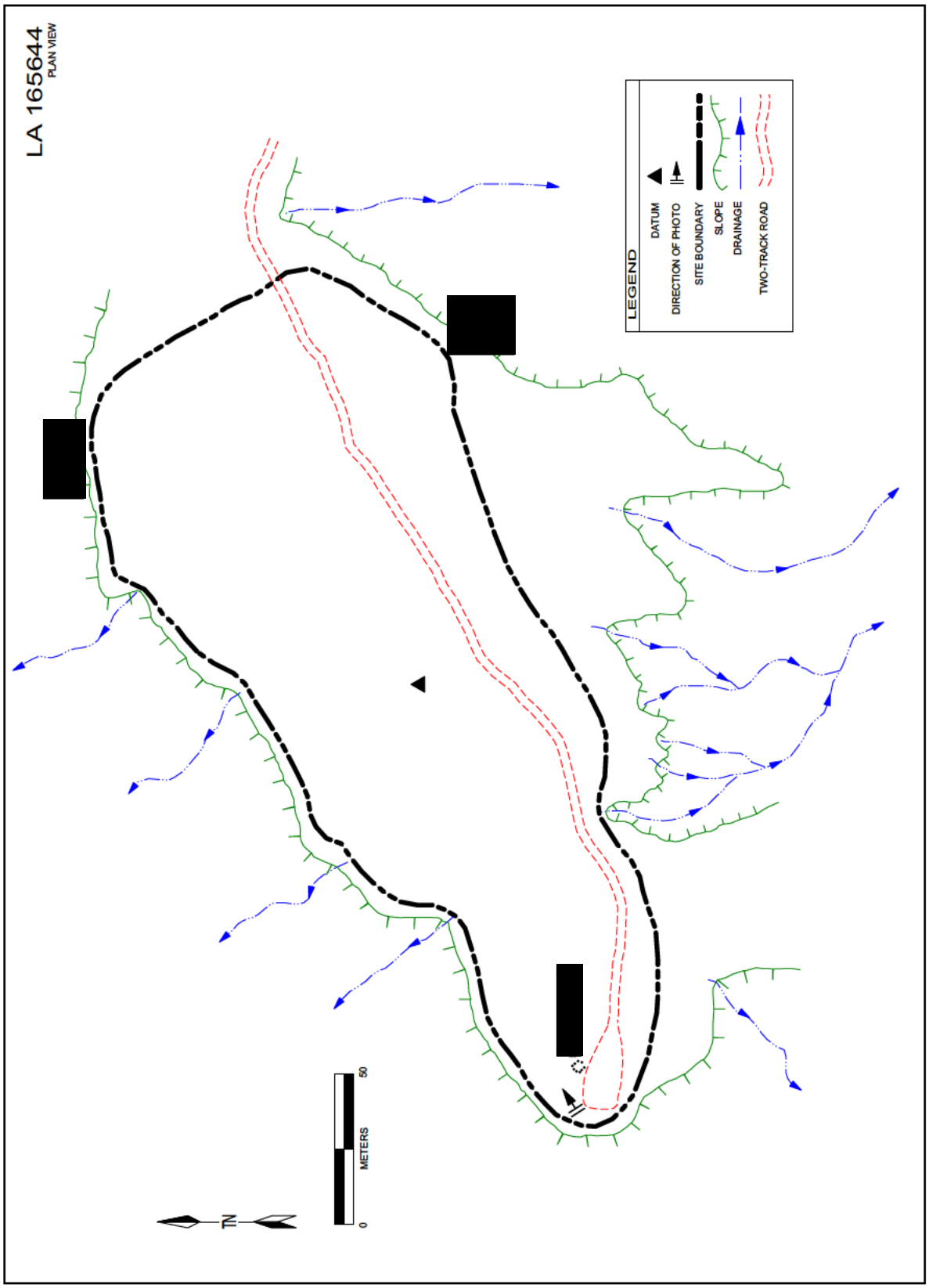

Figure 3.69: LA 165644 Site Map.

LA 165645

Field Number: 908-01-135
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880), US Territorial Euroamerican (A.D. 1869)
Eligibility: Eligible A, D
Site Type: Artifact Scatter and Burial
Parcel: 4

Description

LA 165645 [redacted]

The site consists of one feature and a moderate artifact scatter (Figure 3.70). Vegetation includes creosote, catclaw acacia, little-leaf horse brush, Mormon tea, horse crippler cactus, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

A representative sample (30 percent) of all the artifacts was recorded. The recorded assemblage consists of 172 flaked-stone artifacts, including 156 pieces of debitage, 14 cores, and two tools. The debitage includes 125 secondary reduction flakes (86 quartzite, 35 chert, three chalcedony, one gray rhyolite); 17 tertiary reduction flakes (14 quartzite, one chert, two chalcedony); and 14 pieces of angular debris (six quartzite, six chert, two chalcedony). Quartzites occur in red, purple, white, and pink, cherts are brown, gray, and red; and chalcedony is white, and brown. The cores consist of six red quartzite multidirectional cores; four chert multidirectional cores (two brown, one gray, one white); and four quartzite tested cobbles (three red, one gray). The tools include one gray chert uniface and one brown chert scraper.

Features and Site Structure

Lone Mountain encountered one feature at LA 165643. Feature 1 is a 2-m by 2-m historic grave. The grave consists of a concrete headstone marker and a white painted metal cross and is ringed by limestone boulders. The headstone reads "Silas Gibson Killed in Indian Fight 1869 Vic Queen, John and Lewis Means." The feature depth is unknown. No artifacts were observed. The feature is 100 percent intact. Mr. Gibson had been traveling in a group with 17 other men, women, and children, driving four or five ox-drawn wagons, 40 horses, and 1500 steers. The group set out for California from Bianco County, Texas and traveled up the east side of the Pecos River into New Mexico, where they were attacked near the Black River. The Indians stampeded the horses, and some of the members of the Gibson party gave chase. In the course of regaining the horses, Mr. Gibson became isolated from the rest of his party and was killed and scalped. The concrete marker was erected in 1968 by Vic Queen and John and Lewis Means. The Means brothers were distant relatives of Silas Gibson (http://files.usgwarchives.net/nm/eddy/cemeteries/gibson.htm).

The eastern site boundary is defined by the high escarpment. The site is located on residuum and in an eolian, colluvial and alluvial depositional environment. Aside from the grave, no buried cultural material was observed. The estimated depth of sediment deposition that could contain such material is unknown, but presumed to be sufficient to contain a burial.

Disturbances and Potential Impacts

The primary disturbance is water erosion. Wind erosion has had a minimal effect. The site is between 51 percent and 75 percent intact.

Conclusions

LA 165645 has Unknown Aboriginal (9500 B.C to A.D. 1880) and a US Territorial Euroamerican (A.D. 1869) component as indicated by the assemblage of artifacts and the feature. The site contains a Euroamerican burial feature that is one of the oldest Euroamerican graves encountered by Lone Mountain in southeast New Mexico. This grave represents early Euroamerican use of southeastern New Mexico and is capable of yielding a variety of significant data. LA 165645 is therefore recommended eligible for nomination to the NRHP under Criteria A and D.

LA 165646

Field Number: 908-01-136
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165646 is a sparse lithic artifact scatter [redacted] Vegetation on the site includes creosote, catclaw acacia, crucifixion thorn, desert sage, and various grasses. Visibility is 76 percent to 99 percent.

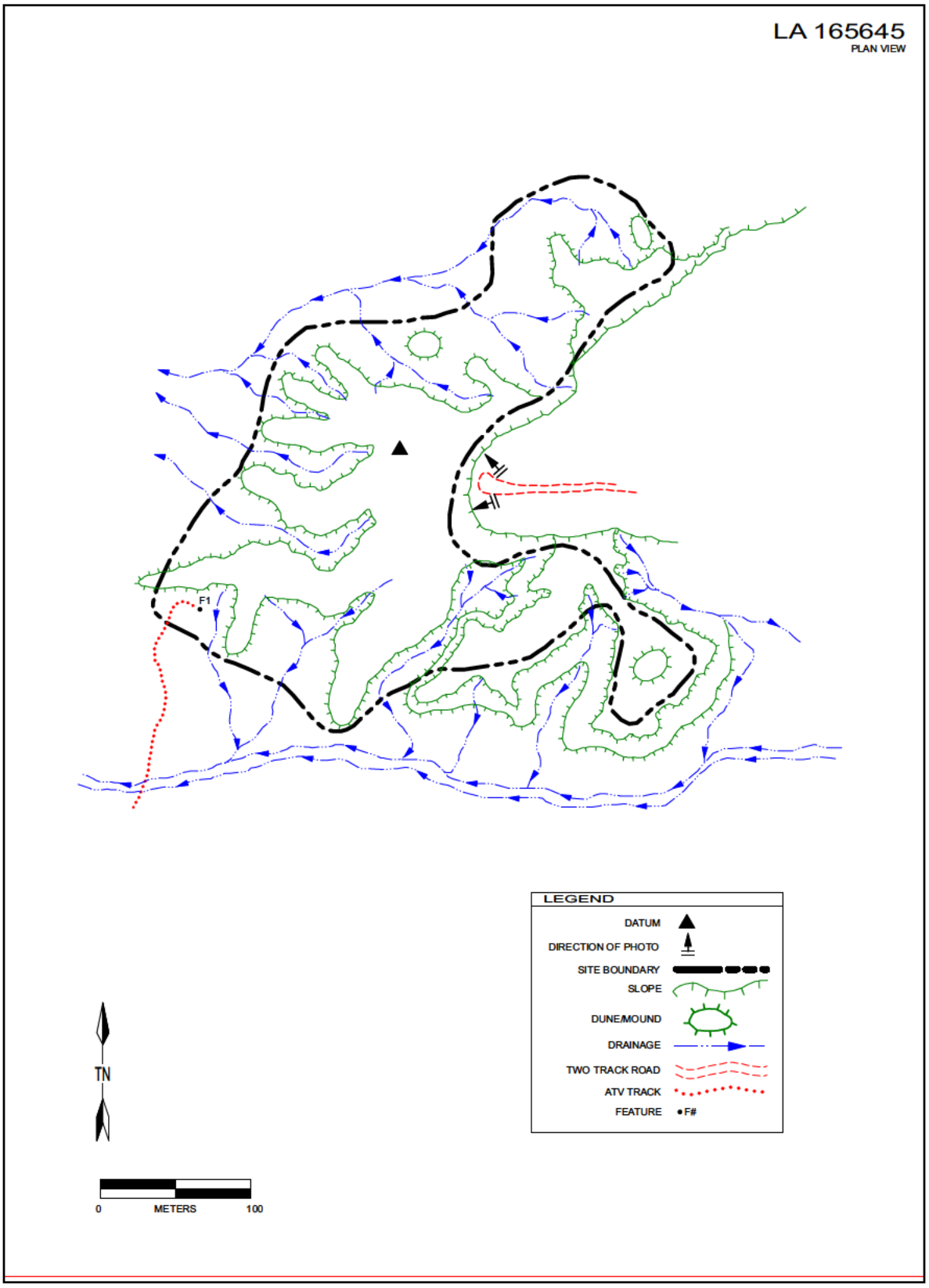

Figure 3.70: LA 165645 Site Map.

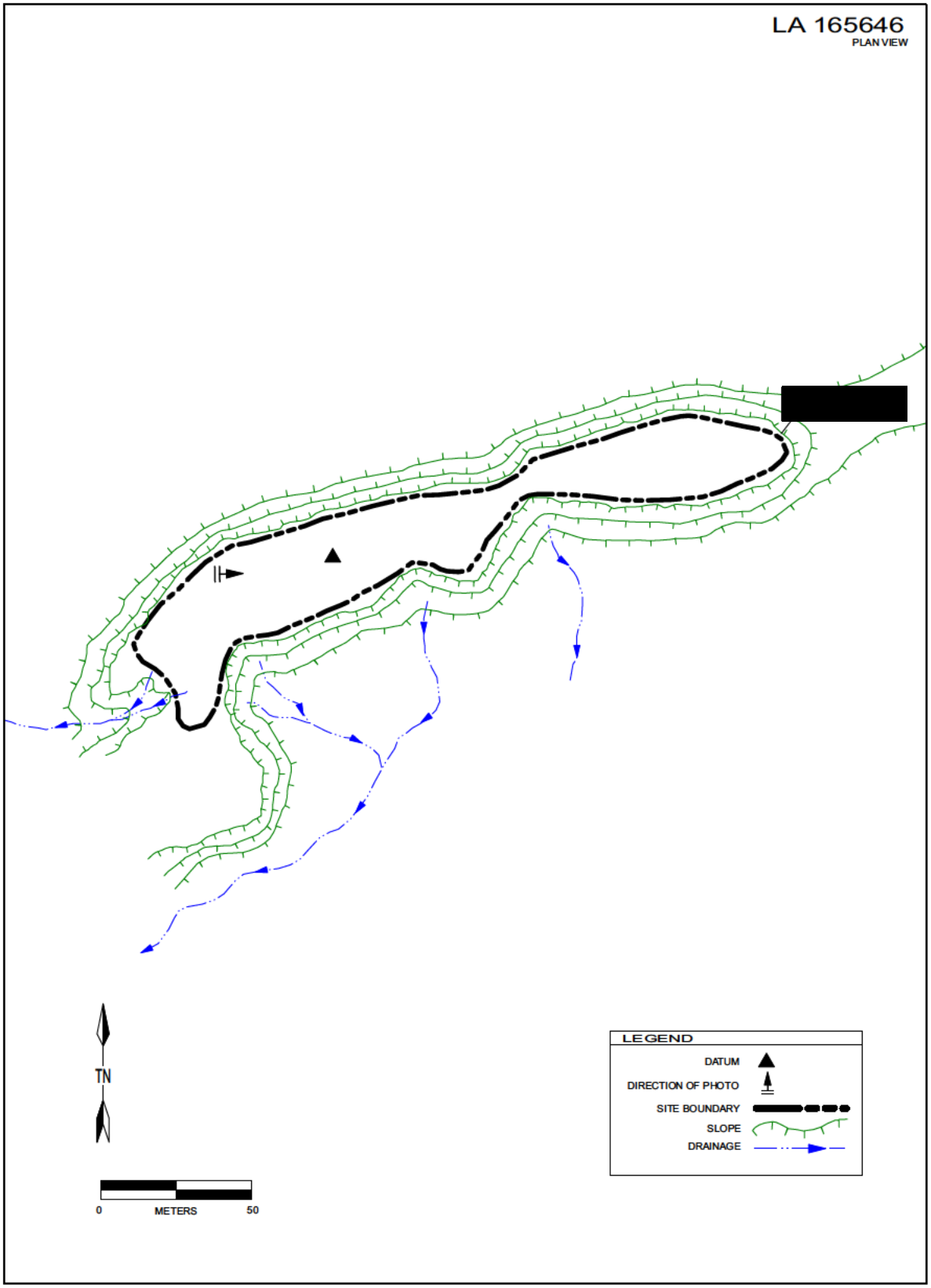

Figure 3.71: LA 165646 Site Map.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 40 flaked-stone artifacts, including 31 pieces of flaked-stone debitage, seven cores, and two tools. The debitage consists of 22 secondary reduction flakes (13 chert, eight quartzite, one clear and white chalcedony); four tertiary reduction flakes (two chert, two quartzite); and five pieces of angular debris (chert). Quartzites occur in brown, black, and red. Cherts are gray, black, brown, and red. The cores include six chert multidirectional cores (two brown, one gray, one black, one red, one white and gray banded) and one white quartzite multidirectional core. The tools consist of one brown chert uniface and one brown and yellow chert uniface.

Features and Site Structure

No features were observed. The northern, southern, and eastern site boundaries are defined by the bluff edge. LA 165646 is located on residuum and in an alluvial depositional environment. No buried cultural material was observed and the depth of sediment deposition that could contain such material is estimated to be less than 5 cm, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

The primary disturbance on the site is water erosion. Wind erosion has had a minimal effect. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165646 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as indicated by a lithic assemblage lacking temporally diagnostic artifacts. The site has been completely recorded and has little to no potential to yield any additional significant data. LA 165646 is therefore recommended ineligible for nomination to the NRHP under any of the four criteria.

LA 165647

Field Number: 908-01-137
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165647 is a moderate lithic artifact scatter [redacted] Vegetation includes creosote, catclaw acacia, crucifixion thorn, acacia, narrow-leaf yucca, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

A representational sample (40 percent) of all observed artifacts was recorded. The assemblage consists of 130 flaked-stone artifacts, including 112 pieces of flaked-stone debitage, 15 cores, and three tools. The debitage consists of one primary reduction flake (quartzite); 87 secondary reduction flakes (66 quartzite, 21 chert); 17 tertiary reduction flakes (16 quartzite, one chert); and seven pieces of angular debris (five chert, two quartzite). Quartzites occur in red, pink, gray, purple, and light brown and cherts are gray, brown, black, and white. The cores include nine red quartzite multidirectional cores; four chert multidirectional cores (two gray, one brown, one white); one green quartzite bidirectional core; and one yellow and red chert unidirectional core. The tools consist of one violet quartzite uniface, one gray chert biface, and one gray chert uniface.

Features and Site Structure

Lone Mountain encountered no features at this location. The canyon wall defines the northern boundary. The southern boundary is defined by a major drainage that runs east to west across the canyon floor. Numerous drainages and finger ridges bisect the site north to south and flow into the main wash.

LA 165647 is located on residuum and in an alluvial and colluvial depositional environment. No buried cultural material was observed and the depth of sediment deposition that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbance on the site is water erosion. Wind erosion has had a minimal effect. The site is estimated to be 51 percent to 75 percent intact.

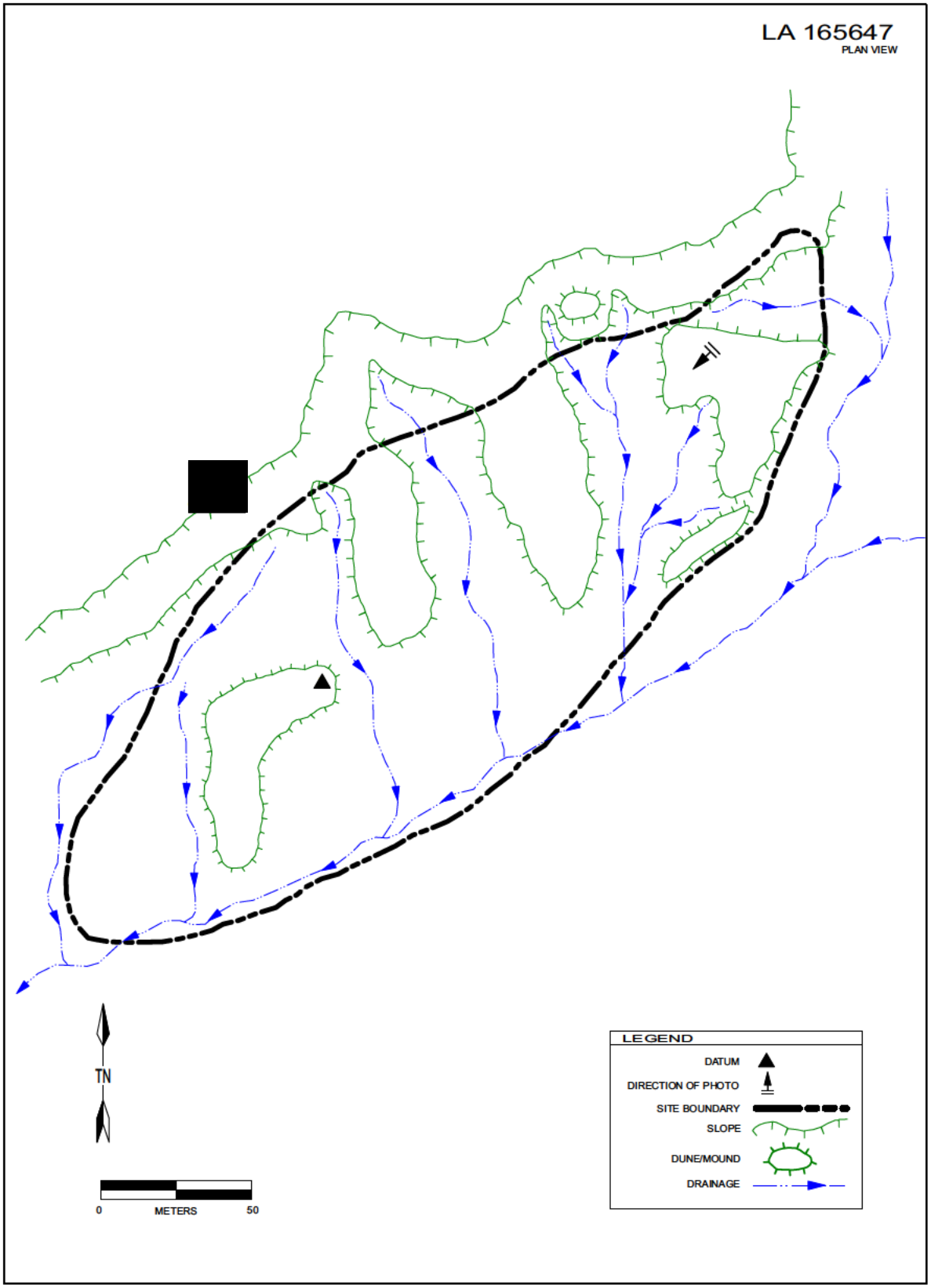

Figure 3.72: LA 165647 Site Map.

Conclusions

LA 165647 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, as the site has a lithic assemblage with no temporally diagnostic artifacts. The site has a 60 percent unrecorded artifact assemblage and an unknown potential for buried cultural deposits. Without establishing the nature and extents of the remaining assemblage and any buried sources of data, the eligibility of this site cannot be determined. LA 165647 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165648

Field Number: 908-01-138
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165648 [redacted] The site consists of a sparse artifact scatter (Figure 3.73). Vegetation includes creosote, mesquite, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The artifact assemblage consists of 22 flaked-stone artifacts, including 17 pieces of debitage, three cores, and two tools. The debitage includes 15 secondary reduction flakes (three gray chert, one brown chert, one gray rhyolite, two red quartzite, seven brown quartzite, one gray quartzite); one tertiary reduction flake (gray chert); and one piece of angular debris (gray chert). The cores consist of two brown chert multidirectional cores, and one brown quartzite multidirectional core. The tools include one gray limestone bifacial chopper and one brown quartzite uniface.

Features and Site Structure

No features were observed. The site is located in a colluvial and eolian depositional environment. No buried cultural material was observed, and the depth of sediment that could contain buried cultural material is unknown.

Disturbances and Potential Impacts

The primary disturbance to the site is water erosion. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165648 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, given a lack of temporally diagnostic lithic artifacts. It is uncertain whether the site contains any buried cultural deposits and what the significance or data potential of any such deposits may be. LA 165648 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165649

Field Number: 908-01-139
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1900 to 1945)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 16564 [redacted] The site consists of a light artifact scatter (Figure 3.74). Vegetation includes creosote, mesquite, snakeweed, rabbit brush, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The artifact assemblage consists of 56 flaked-stone artifacts; one piece of groundstone; and 127 historic artifacts including 43 pieces of glass, 21 cans, four can lids, 41 historic sherds, 15 metal artifacts, one bottle, and three bricks. The flaked-stone assemblage consists of 46 pieces of debitage, six cores, and three tools. The debitage includes 33 secondary reduction flakes (14 red quartzite, five brown quartzite, six gray chert, two white and clear chalcedony, one red and clear chalcedony, one pink quartzite, three gray quartzite, and one yellow chert); 11 tertiary reduction flakes (red quartzite); and one piece of angular debris (black chert). The cores consist of two brown quartzite multidirectional cores, one brown quartzite tested cobble, one red quartzite multidirectional core, one gray quartzite multidirectional core, and one gray quartzite tested cobble. The tools include one gray quartzite chopper, one brown chert biface, and one gray chert uniface. The groundstone consists of one

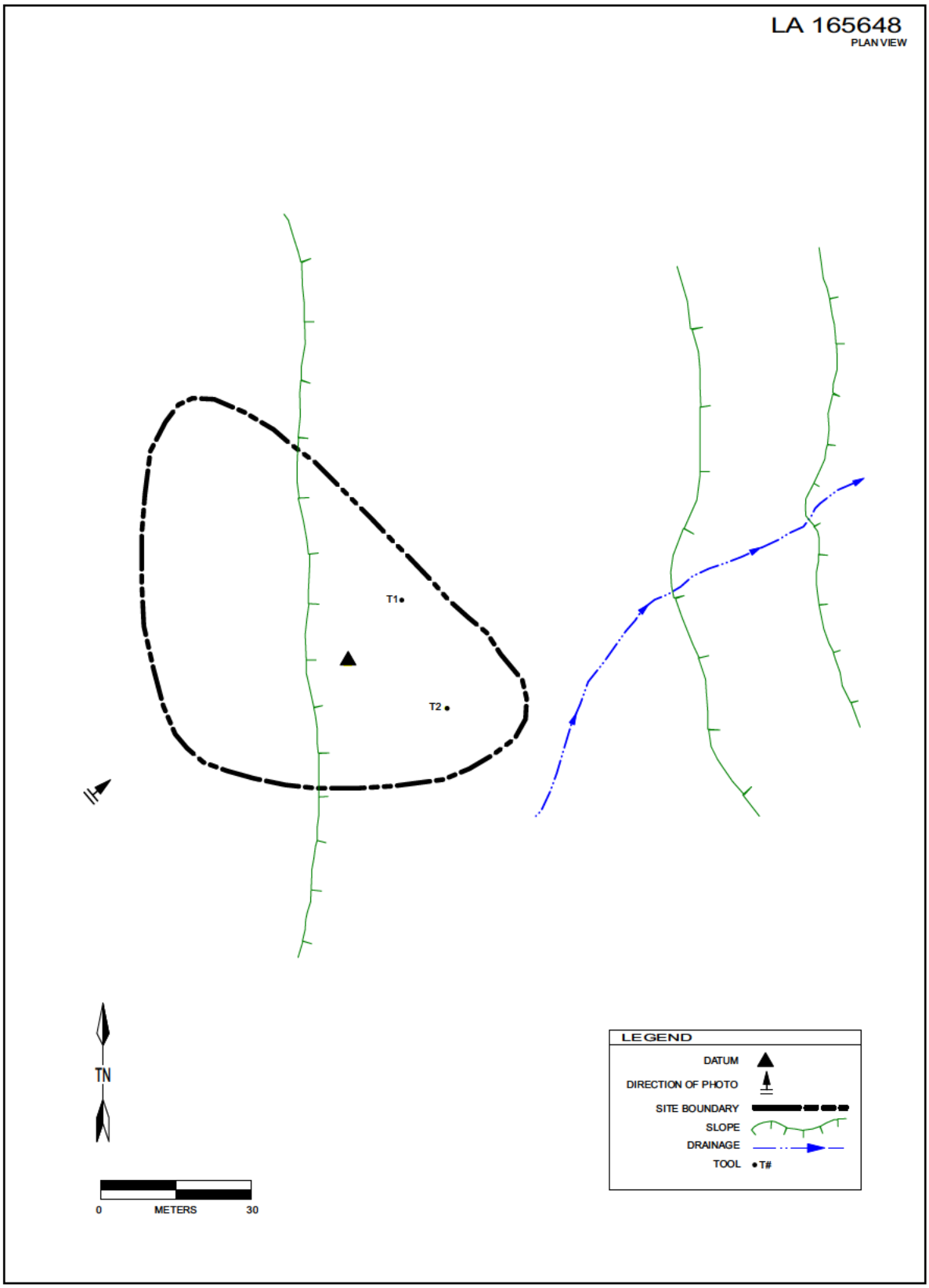

Figure 3.73: LA 165648 Site Map.

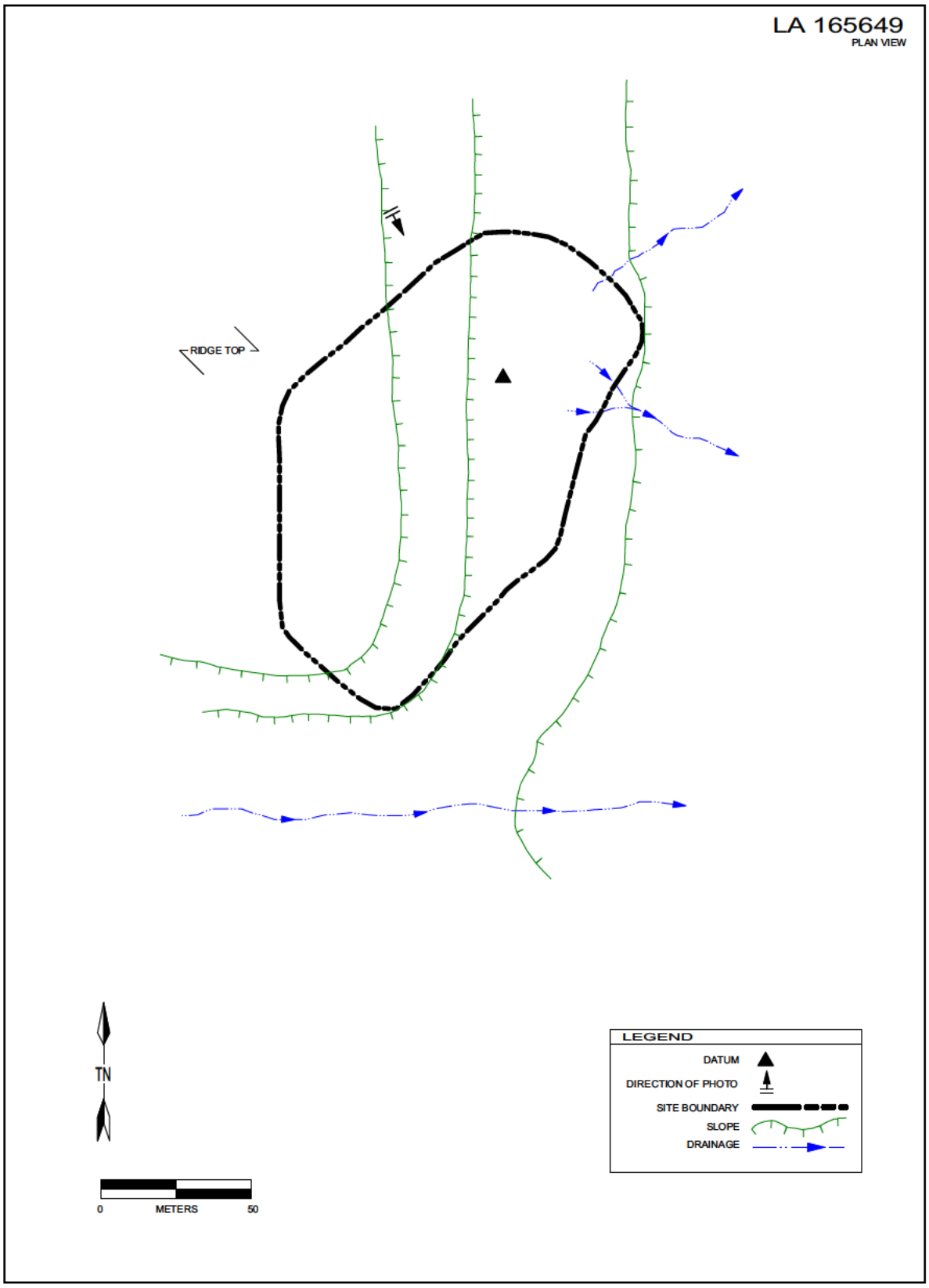

Figure 3.74: LA 165649 Site Map.

sandstone two-hand mano. The glass includes 42 amber shards (two base fragments), and one red shard. The cans consist of two crushed hole-in-top cans, two crushed hole-in-cap cans, one interior friction crimped seam can, one interior friction x-cut crimped seam can, six tobacco tins, six crushed lard buckets, and one exterior friction crushed can. There are also a paint bucket lid, a baking powder lid, a lard bucket lid, and an x-cut can lid. The baking powder lid has a "KC Baking Powder" label. The lard can lid identifies the contents as "Cottolene" and promises that it "contains no hog fat." Cottolene was an alternative to lard made of cotton and beef byproducts and was produced from 1868 to the mid twentieth century. The 40 Historic sherds include 39 white-glazed semi-porcelain fragments and one sherd with a floral transfer design.

Features and Site Structure

No features were observed. The site is located in a colluvial and eolian depositional environment. No buried cultural material was observed. Although the depth is unknown, there may be sufficient sediments to contain buried cultural deposits.

Disturbances and Potential Impacts

The primary disturbance to the site is water erosion. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165649 has two components, including Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1900 to 1945). These dates are indicated by a lithic assemblage with no temporally diagnostic characteristics and the assemblage of historic artifacts. The site retains a potential to contain buried cultural deposits although the nature, extents, or data potential of any such deposits is unknown. LA 165649 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165650

Field Number: 908-01-140
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1951 to 1954)
Eligibility: Eligible, D
Site Type: Single Residence
Parcel: 5

Description

LA 165650 [redacted] The site consists of 10 features and a light scatter of lithic and historic artifacts (Figure 3.75). Vegetation includes creosote, mesquite, snakeweed, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 102 flaked-stone artifacts, two groundstone artifacts, and nine historic artifacts including seven bottles and three cans. The flaked-stone assemblage consists of 87 pieces of debitage, 10 cores, and five tools. The debitage includes 73 secondary reduction flakes (28 brown quartzite, five red quartzite, six gray quartzite, one green quartzite, six gray limestone, five gray chert, 11 brown chert, four white and brown chert, two yellow chert, two gray rhyolite, two white and gray chalcedony, one clear and brown chalcedony); 11 tertiary reduction flakes (one brown quartzite, three red quartzite, one gray quartzite, one yellow chert, one gray chert, one brown chert, two white and brown chert, one white chalcedony); and three pieces of angular debris (one brown quartzite, one gray chert, one brown chert). The cores consist of five quartzite multidirectional cores (three red, one brown, one gray); four chert multidirectional cores (two yellow, two brown); and one gray rhyolite multidirectional core. The tools include one light brown quartzite uniface, one brown quartzite scraper, one gray and green quartzite scraper, one brown quartzite chopper, and one yellow chert chopper. The groundstone consists of two sandstone indeterminate metate fragments. The bottles consist of four clear glass alcohol bottles all with the writing "Federal Law Forbids Sale or Re-Use of this Bottle" embossed on them (this statement appears on alcohol bottles between A.D. 1932 and 1964). Two of these bottles have 1929 to 1954 Owens-Illinois maker's marks on them. One of these Owens-Illinois marks dates to A.D. 1938 or 1948. A third alcohol bottle has a post-1945 Glass Containers, Inc. mark (Toulouse 1971) and the fourth alcohol

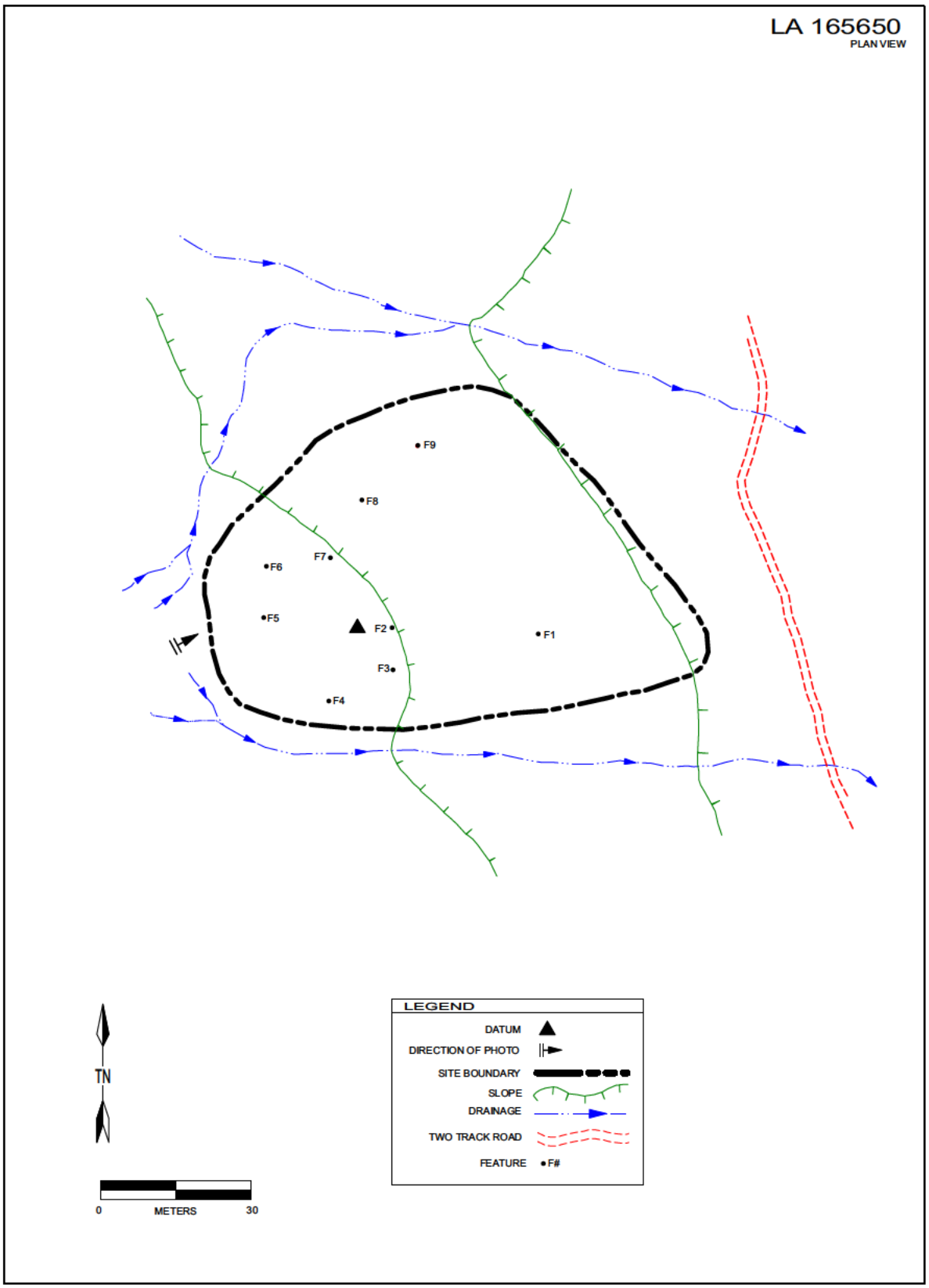

Figure 3.75: LA 165650 Site Map.

bottle has no clear maker's mark. Other bottles are clear glass and include two perfume bottles and a jar, all with 1929 to 1954 Owens-Illinois marks. The Owens-Illinois mark on the jar may date to A.D. 1931, 1941, or 1951. The cans include two crushed sanitary cans and one intact exterior friction can. Given the dates on the individual artifacts, the historic assemblage appears to have been deposited between A.D. 1951 and 1954

Features and Site Structure

Lone Mountain encountered 10 features at LA 165650. Feature 1 is a 1.5-m by 1.5-m burned caliche cluster. The concentration consists of oxidized and carbon-stained burned caliche. The feature depth is unknown. Two primary gray chert flakes were observed. No ash or charcoal staining was observed. The feature is less than 20 percent intact.

Feature 2 is a 2-m by 2-m burned caliche cluster. The feature depth is unknown. No artifacts, ash staining, or charcoal were observed. The feature is less than 20 percent intact and badly deflated

Feature 3 is a 9-m by 9-m possible limestone slab structure. The possible structure is buried in a large mesquite stabilized sand dune with large limestone slabs eroding out of the northeastern, southwestern, and southern edges. There is a cluster of burned caliche located on the east side of the structure. Two large quartzite cores and two pieces of groundstone were observed. No charcoal or ash staining were noted. Estimated depth is approximately 15 cm, based on the height of the dune and the limestone eroding out of the sides of the dune. The feature has been impacted by bioturbation due to plant growth, wind erosion, and water erosion. This feature seems typical of Late Formative and Historic period structures, but this is speculative without further investigation.

Feature 4 is a 1-m by 1-m burned caliche cluster. The feature depth is unknown. No artifacts, ash, or charcoal were observed. The feature is less than 10 percent intact and badly deflated

Feature 5 is a 2-m by 2-m burned caliche cluster. The feature depth is unknown. No artifacts, ash, or charcoal were observed. The feature is less than 20 percent intact and is also badly deflated

Feature 6 is a 1-m by 1-m fire-cracked rock and burned caliche cluster. The concentration consists of approximately 40 pieces of thermally-altered limestone, sandstone, and caliche that range in size from 4 cm to 16 cm, averaging 9 cm. The feature appears to have no depth. One brown quartzite tertiary reduction flake is associated with this feature. No charcoal or ash staining were visible. The feature is 20 percent intact and has been disturbed by water erosion and bioturbation.

Feature 7 is a 1.6-m by 1.3-m fire-cracked rock and burned caliche cluster. The concentration consists of approximately 80 pieces of thermally-altered limestone, sandstone, and caliche that range in size from 3 cm to 17 cm, averaging 7 cm. The feature appears to be surficial with no apparent depth. There are no associated artifacts, charcoal, or ash staining present. The feature is 35 percent intact and has been disturbed by water erosion and bioturbation.

Feature 8 is a 1.2-m by 1.1-m fire-cracked rock and burned caliche cluster located in a small dune mound within an ephemeral drainage. The concentration consists of approximately 50 pieces of thermally-altered limestone, sandstone, and caliche that range in size from 4 cm to 17 cm, with an average size of 9 cm. The concentration is estimated to have a depth of at least 5 cm, based on feature elements eroding out of the sides of the small dune. No artifacts, charcoal, or ash staining were visible. The feature is 30 percent intact and has been disturbed by water erosion and bioturbation.

Feature 9 is a 1.5-m by 1.0-m fire-cracked rock and burned caliche cluster located on the side of a dune. The concentration consists of approximately 60 pieces of thermally-altered limestone, sandstone, and caliche that range in size from 4 cm to 12 cm, averaging 7 cm. The concentration is estimated to have a depth of 8 cm, based on fire-cracked rock eroding out of the side of the dune. Lone Mountain archaeologists observed no artifacts, charcoal, or ash staining in this location. The feature is 35 percent intact and has been disturbed by water erosion and bioturbation.

Feature 10 is a 1-m by 1-m fire-cracked rock and burned caliche cluster. The concentration consists of approximately 40 pieces of thermally-altered limestone, sandstone, and caliche that range in size from 4 cm to 17 cm, averaging 8 cm. The feature appears to have no depth. There are no associated artifacts and no visible charcoal or ash staining. The feature is 30 percent intact and has been disturbed by water erosion and bioturbation.

The site is located in an eolian and alluvial depositional environment. Sediments are estimated to be at least 1 m deep, suggested by the height of dunes in the area. Buried cultural material was observed to a

depth of 5 cm to 15 cm based on the presence of material eroding from the sides of dunes in Features 3, 8, and 9.

Disturbances and Potential Impacts

The primary disturbances are water erosion, wind erosion, and bioturbation from cattle grazing and plant growth. The site is between 51 percent and 75 percent intact.

Conclusions

Although the limestone slab feature may represent a Late Formative or Historic period structure, there are insufficient data to allow for a certain identification. LA 165650 therefore has Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1951 to 1954) affiliations. The site has a large assemblage of thermal features composed of thermally-altered rock and caliche. These features may be a source of TL/OSL dates and lipid residues. Such data may be employed to address regional research questions. LA 165650 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165651

Field Number: 908-01-141
Category: 1
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165651 [redacted] The site consists of a sparse lithic artifact scatter (Figure 3.76). Vegetation on the site includes creosote, mesquite, snakeweed, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 12 flaked-stone artifacts, including nine pieces of flaked-stone debitage and three cores. The debitage includes seven secondary reduction flakes (five gray quartzite, two brown and gray chert) and two gray quartzite tertiary reduction flakes. The cores consist of two gray quartzite multidirectional cores and one brown chert bidirectional core.

Features and Site Structure

No features were observed. The site is located in an alluvial and eolian depositional environment. No buried cultural material was observed. The depth of sedimentary deposits that might contain buried cultural material is unknown.

Disturbances and Potential Impacts

The primary source of disturbance to the site has been water erosion. The site is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165651 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as indicated by a lithic assemblage lacking temporally diagnostic artifacts. The site has a sparse lithic assemblage and no evidence suggesting the presence of buried cultural deposits or other sources of significant additional data. The possibility that significant data are present in buried contexts cannot wholly be discounted. LA 165651 is there recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165652

Field Number: 908-01-142
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165652 [redacted] he site consists of sparse artifact scatter associated with thousands of pieces of shell (Figure 3.77). Vegetation includes snakeweed and various grasses. Visibility is 100 percent, as the site has been bladed.

Assemblage

A representational sample (5 percent) of the observed shell was recorded. 100 percent of all other observed artifacts were recorded. The recorded assemblage includes 18 flaked-stone artifacts, one piece of groundstone, and 100 pieces of shell. The flaked-stone assemblage consists of 18 pieces of debitage and four cores. The debitage includes two chert primary reduction flakes; 10 secondary reduc-

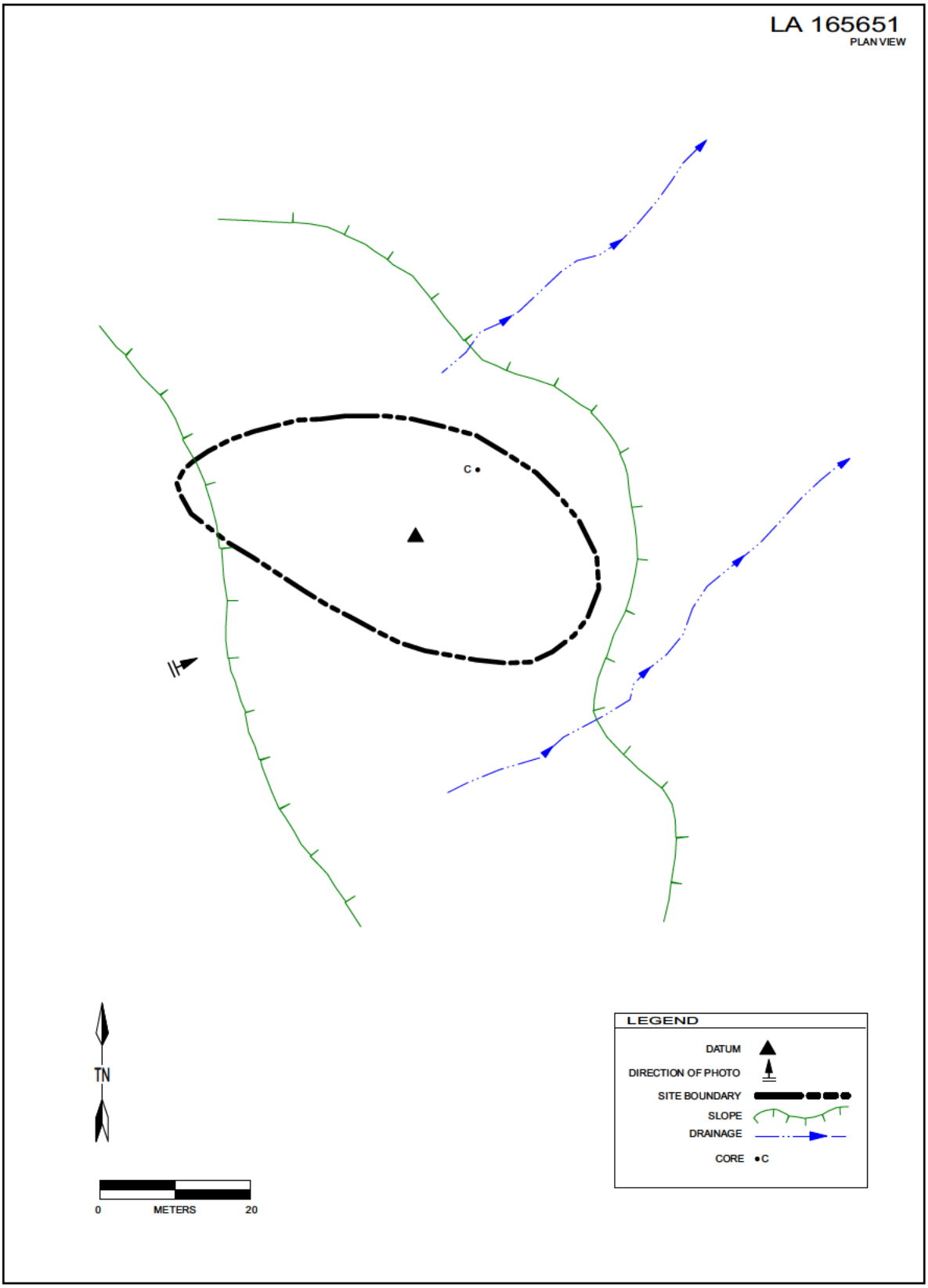

Figure 3.76: LA 165651 Site Map.

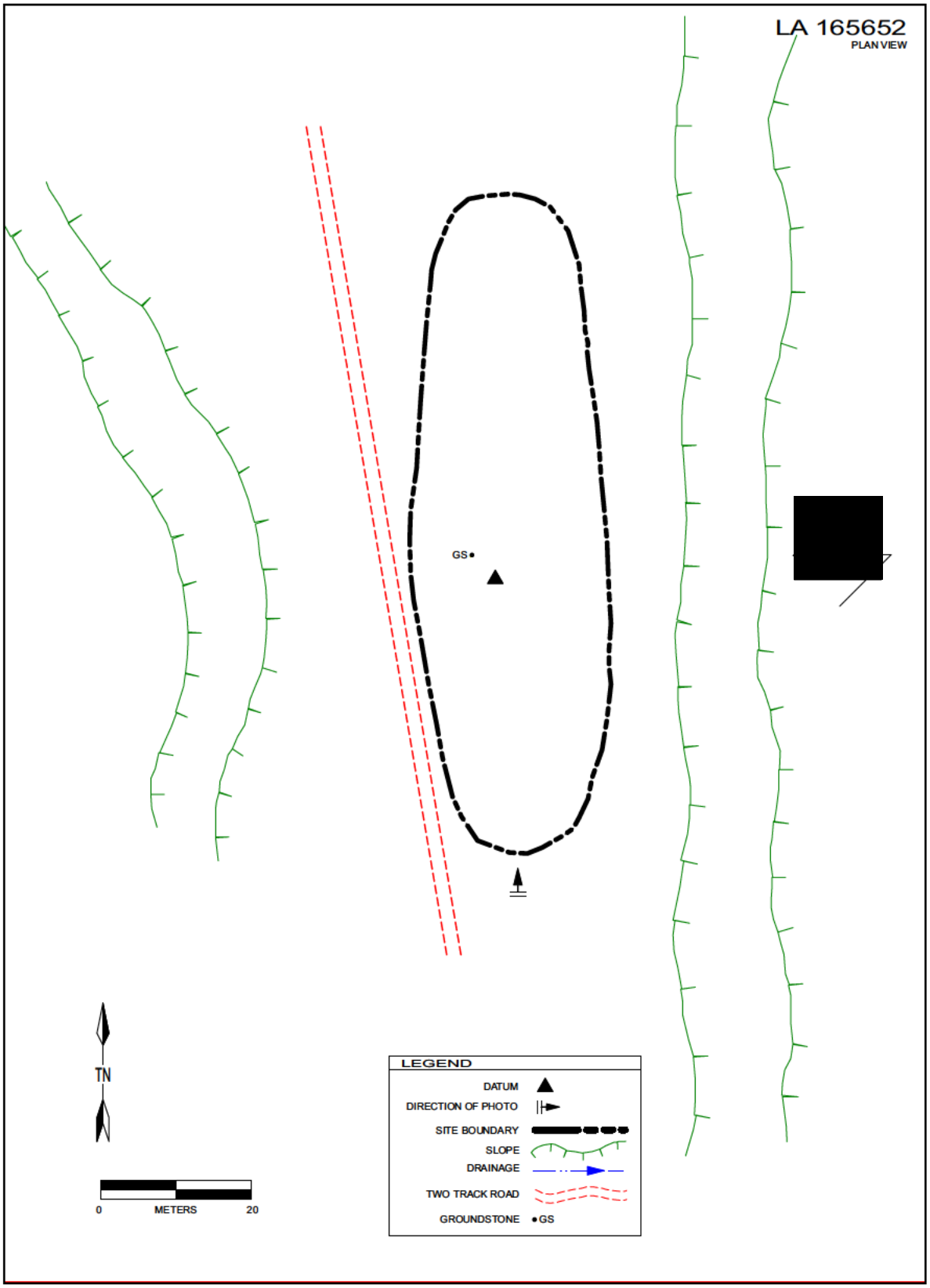

Figure 3.77: LA 165652 Site Map.

tion flakes (six chert, four quartzite); and six tertiary reduction flakes (three chert, two quartzite, one gray limestone). Chert debitage occurs in gray/tan, white, and yellow and green. Quartzite debitage occurs in gray and brown. The cores consist of two quartzite multidirectional cores (one brown and gray, one brown and blue) and two chert multidirectional cores (one gray, one gray with yellow cortex). The groundstone includes one intact sandstone one-hand mano. The analyzed shell consists of 100 fragments of broken freshwater bivalve shell.

Features and Site Structure

No features were observed. The site is located in an alluvial and eolian depositional environment. No buried cultural material was observed. The depth of sedimentary deposits that could contain buried cultural material is unknown.

Disturbances and Potential Impacts

The entire surface of the site appears to have been mechanically bladed and then subjected to water erosion. The surface of the site is estimated to be between 1 percent and 25 percent intact.

Conclusions

LA 165652 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, as the site contains a lithic scatter with no temporally diagnostic artifacts. It appears that activities at the site were focused, at least in part, on shell processing. The surface of the site has been mechanically bladed, but there may yet be buried cultural deposits in this location. It is uncertain what data potential any such deposits may have. LA 165652 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165653

Field Number: 908-01-143
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1902 to 2010)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 5

Description

LA 165653 [redacted] The site consists of seven features and a moderate artifact scatter (Figure 3.78). Vegetation includes creosote, mesquite, snakeweed, and various grasses. Visibility is 51 percent to 75 percent.

Assemblage

A representational sample of all observed artifacts was recorded (25 percent of all prehistoric, and 20 percent of all historic). The assemblage consists of 287 flaked-stone artifacts, one groundstone artifact, and 230 historic artifacts including 102 cans and 128 pieces of glass. The flaked-stone assemblage consists of 265 pieces of debitage, 17 cores, and 5 flaked-stone tools. The debitage includes 207 secondary reduction flakes (130 quartzite, 48 chert, one brown and black banded chert, four chalcedony, 17 gray rhyolite, seven gray limestone); 50 tertiary reduction flakes (34 quartzite, 11 chert, three clear brown and white chalcedony, one gray limestone, one gray rhyolite); and 8 pieces of angular debris (five chert, three quartzite). Quartzite debitage occurs in brown, red, white, and gray. Chert debitage occurs in yellow, brown/black banded, brown, red, gray, and white. The cores consist of 11 quartzite multidirectional cores (five gray, four tan, one dark gray, one blue-gray); two quartzite bidirectional cores (one gray, one tan and orange); two chert multidirectional cores (one gray, one gray and tan); and two gray and tan chert bidirectional cores. The tools include one brown quartzite uniface, one gray quartzite uniface, one light brown quartzite biface, one purple quartzite uniface, and one tan quartzite uniface. The groundstone consists of one intact sandstone two-hand mano. The glass includes 125 bottle body shards (10 amber, 23 amethyst, two aqua, four brown, 75 clear, three cobalt, eight green); two bottle base shards (one brown, one clear); and an amethyst neck finish. The cans consist of 98 crushed cans (60 hole-in-cap, 13 vent hole, three crimped side seam and stamped end seam beverage, 10 sanitary, three score-key, one score-strip, two exterior friction, six tobacco); three intact hole-in-cap cans; and one intact crimped side seam and stamped end church-key opened cans. Although most of the historic assemblage appears to pre-date 1945, some items, such as the clear glass shards may be quite recent. The historic assemblage appears to date between A.D. 1902 and the present (2010).

Features and Site Structure

Lone Mountain located seven features on the site. Feature 1 is a 1-m by 1-m burned caliche and fire-cracked rock concentration. The concentration consists of approximately 28 pieces of oxidized and carbon-stained limestone and caliche that range in size

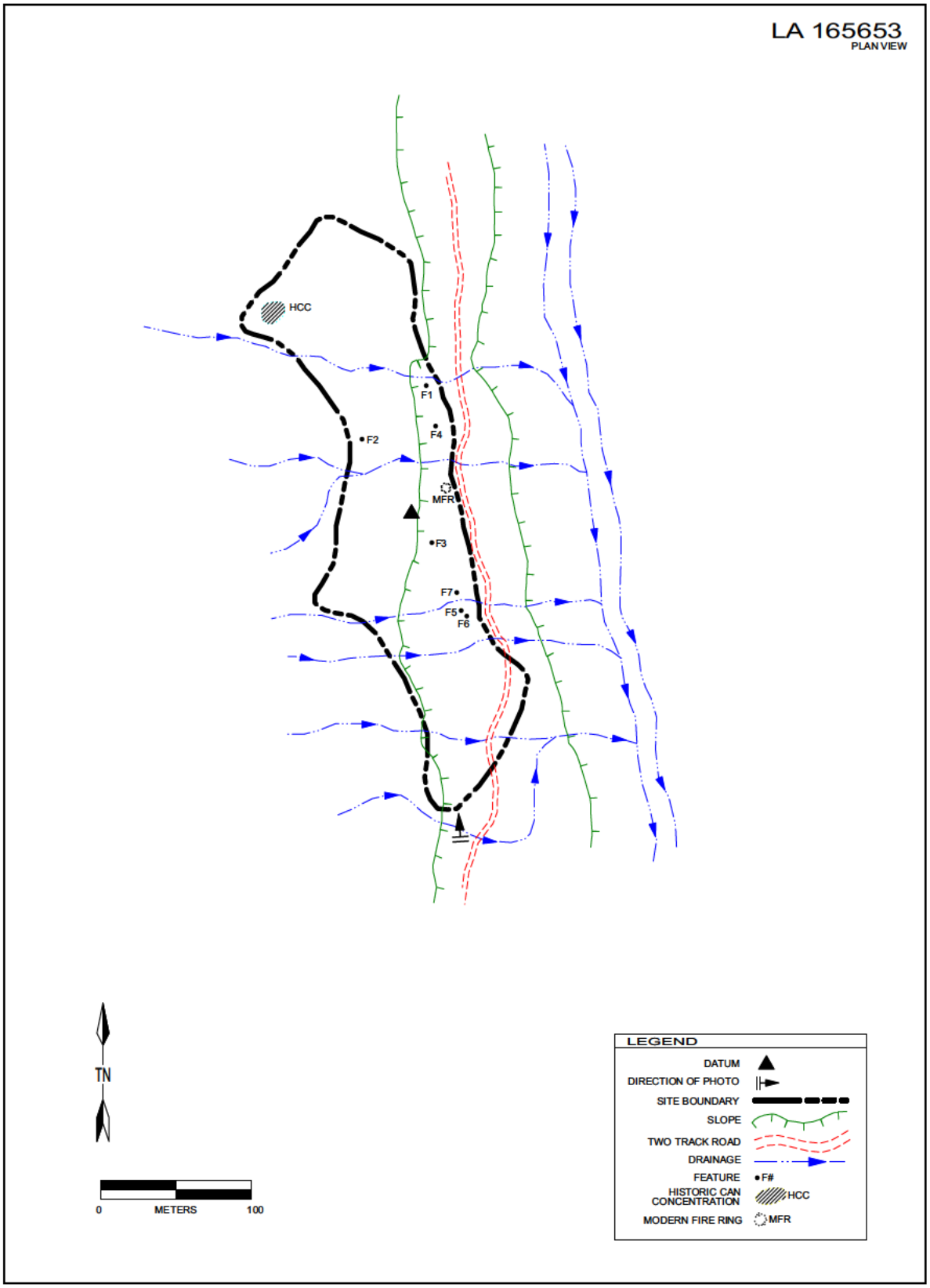

Figure 3.78: LA 165653 Site Map.

from 2 cm to 31 cm, averaging 15 cm. The estimated depth is 4 cm, based on the mounding of the feature. Historic glass and metal fragments were observed. No charcoal or ash was noted. The feature is 40 percent intact and has been affected by high energy water erosion

Feature 2 is a 24-cm by 25-cm monument or marker. The marker is round and made of crude cement with a historic can in the middle. The number 26 is etched into the cement. No artifacts, soil staining, ash, or charcoal were observed. The feature is 90 percent intact and has been disturbed mainly by water erosion.

Feature 3 is a 1.2-m by 1.4-m fire-cracked rock and burned caliche cluster. The concentration consists of approximately 23 pieces of thermally-altered rock and caliche that range in size from 2 cm to 26 cm, averaging 14 cm. The estimated depth is 3 cm, based on the mounding of the feature. Historic glass and metal fragments appear to be associated. No charcoal or ash staining were present. The feature is 30 percent intact and has been disturbed by water erosion and bioturbation.

Feature 4 is a 1-m by 1-m burned caliche and fire-cracked rock concentration. The concentration consists of approximately 25 pieces of oxidized and carbon-stained limestone and caliche that range in size from 3 cm to 48 cm, averaging 25 cm. The estimated depth is 10 cm, based on the mounding of the feature. Historic glass and metal fragments appear to be associated. No charcoal or ash was observed. The feature is 50 percent intact and has been impacted by water erosion and bioturbation.

Feature 5 is a 1-m by 1-m fire-cracked rock and burned caliche cluster associated with a soil stain. The concentration consists of approximately 50 pieces of oxidized and carbon-stained rock and caliche that range in size from 2 cm to 13 cm, averaging 7 cm. The estimated depth is 2 cm, based on the mounding of the feature. One quartzite tested cobble and one fresh water shell fragment were observed. A spotty soil stain is visible beneath the feature. The feature is 35 percent intact and has been impacted by water erosion and bioturbation.

Feature 6 is a 38-cm by 43-cm fire-cracked rock and burned caliche cluster. The concentration consists of approximately 27 pieces of thermally-altered rock and caliche that range in size from 2 cm to 21 cm, averaging 8 cm. The feature appears to have no depth. Three gray quartzite tested cobbles, four gray quartzite primary flakes, and four freshwater shell fragments appear to be associated. No soil staining, charcoal, or ash was present. The feature is 20 percent intact and has been disturbed by water erosion and bioturbation.

Feature 7 is a 1.00-m by 0.78-m fire-cracked rock and burned caliche cluster. The concentration consists of approximately 26 pieces of thermally-altered rock and caliche that range in size from 2 cm to 31 cm, averaging 16 cm. This feature lacks depth. No artifacts, soil staining, or ash were noted. The feature is 50 percent intact and has been disturbed by water erosion and bioturbation.

The site is located in an eolian and alluvial depositional environment. Numerous shallow drainages bisect the site west to east and a two-track road bounds the eastern edge. Although the depth of sediments across the site is unknown, an examination of the drainage cuts revealed buried cultural material to a depth of 15 cm.

Disturbances and Potential Impacts

The primary disturbances are water erosion, wind erosion and bioturbation. The site is between 51 percent and 75 percent intact.

Conclusions

LA 165653 has Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1902 to 2010) components. The feature has a suite of features that are likely to yield additional significant data concerning chronology and subsistence. These data will likely contribute to regional research questions. LA 165653 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165654

Field Number: 908-1-144
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Single Residence
Parcel: 5

Description

LA 165654 [redacted] consists of one rock feature and a very sparse artifact scatter (Figure 3.79). Vegetation includes creosote, mesquite, snakeweed, and seasonal grasses. Visibility is 76 percent to 99 percent.

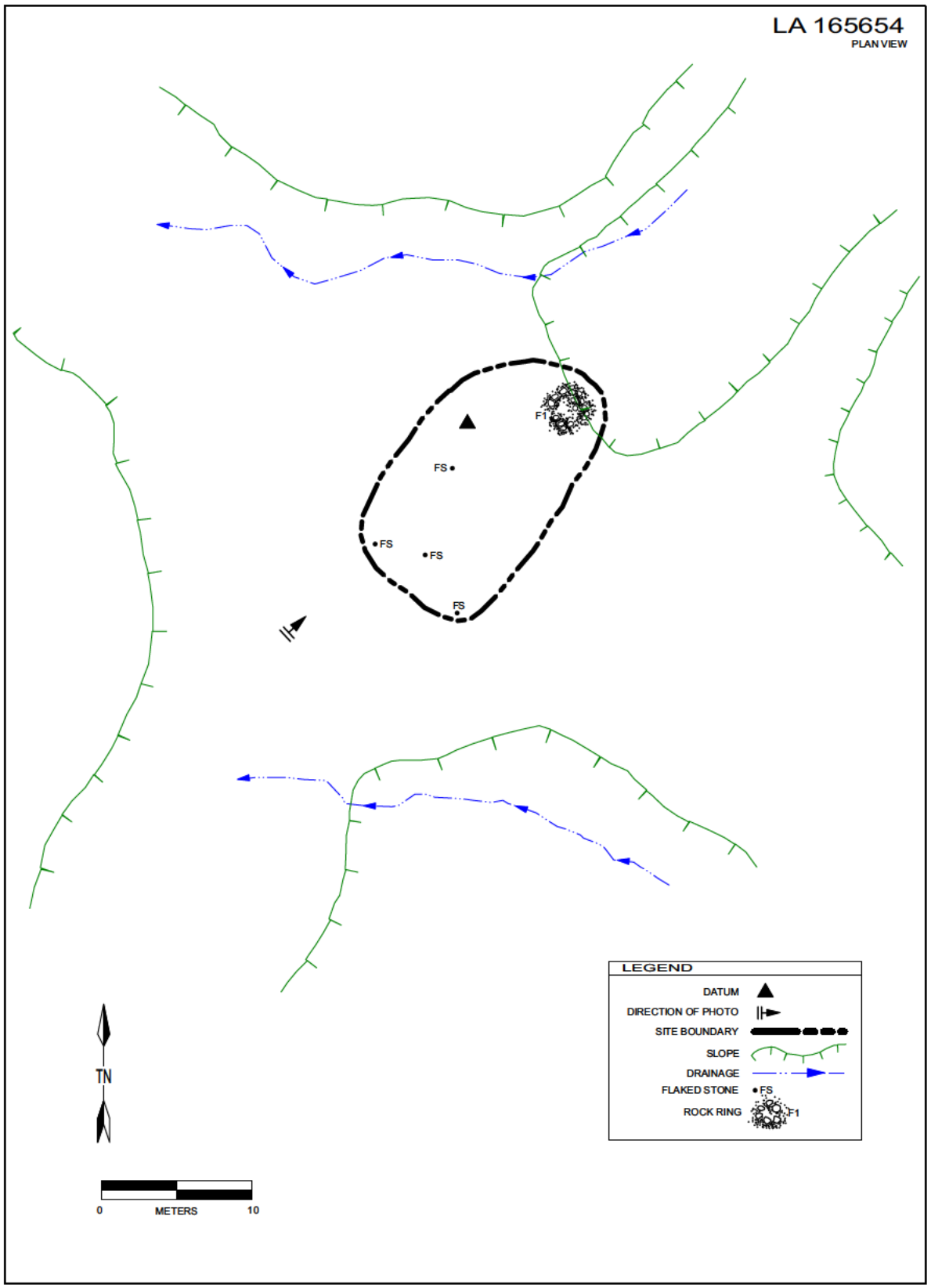

Figure 3.79: LA 165654 Site Map.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of five pieces of flaked-stone debitage including four secondary reduction flakes (two quartzite, two chalcedony) and one piece of chalcedony angular debris.

Features and Site Structure

One feature was observed. F1 is a 2.5-m by 1.8-m ovular rock alignment. The long axis of the feature is oriented northwest to southeast. The feature is composed of limestone rocks ranging in size from 12 cm to 48 cm, averaging 22 cm. The feature is estimated to have a depth of 16 cm based on mounding of the rock. F1 is located next to a drainage and has been impacted by water erosion and intrusive plant growth, remaining 20 percent intact. No artifacts, soil stains, or charcoal were observed. This feature may represent the base of a residence, but it is unclear whether it was the base of a teepee, a brush structure, or perhaps less likely, an adobe house. Additional data would be required in order to make any interpretations regarding specific dates or cultural affiliations for this site.

Drainages are located to the north and south of the site. The site is located in an eolian and alluvial depositional environment. Up to 16 cm of buried deposits may be contained within the feature, judging from the mounding of the stones. Alluvial deposition is heavy, possibly obscuring subsurface artifacts.

Disturbances and Potential Impacts

Water erosion in the form of gullying has affected the integrity of the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165654 does not have any temporally diagnostic artifacts and the feature is not clearly identifiable. The site therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation. The site has sufficient sedimentary deposits to contain buried cultural deposits and it possible that such deposits would identify the nature of Feature 1 and address regional research questions. There is no evidence for or against the presence or data potential of any buried cultural deposits. LA 165654 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 164655

Field Number: 908-1-145
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 5

Description

LA 164655, [redacted] onsists of a flaked-stone artifact scatter (Figure 3.80). Vegetation includes creosote, mesquite, snakeweed, and seasonal grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 36 pieces of flaked-stone debitage, including three primary flakes (quartzite); 18 secondary reduction flakes (six chert, 10 quartzite, two chalcedony); seven tertiary reduction flakes (two chert, four quartzite, one rhyolite); and eight pieces of angular debris (three chert, three quartzite, one chalcedony, one rhyolite). Raw materials occurred in several colors (gray-brown, purple-white, pink, white-brown chert; white-blue, gray, purple, red-brown, red quartzite; translucent white, white-gray, gray chalcedony) suggesting local origins. Lone Mountain archaeologists observed five cores: three tested cobbles (one brown quartzite, one purple quartzite, one tan quartzite) and two multidirectional cores (one gray/blue quartzite, one brown chert).

Features and Site Structure

No features were observed. The southwest, northeast, and southeast boundaries are defined by the edge of the broad ridge top and the northwest boundary is indicated by the edges of the artifact distribution. The site is located on residuum and in an alluvial depositional environment. Moderate alluvial wash has scattered artifacts down slope during heavy rainfall episodes. Limestone bedrock is visible in several areas. The estimated depth of potential cultural deposits is less then 2 cm, suggested by the general topographic structure of the site and the fact that the datum nail hit bedrock at 2 cm.

Disturbances and Potential Impacts

Water erosion has had an impact on the site, leaving it 51 percent to 75 percent intact.

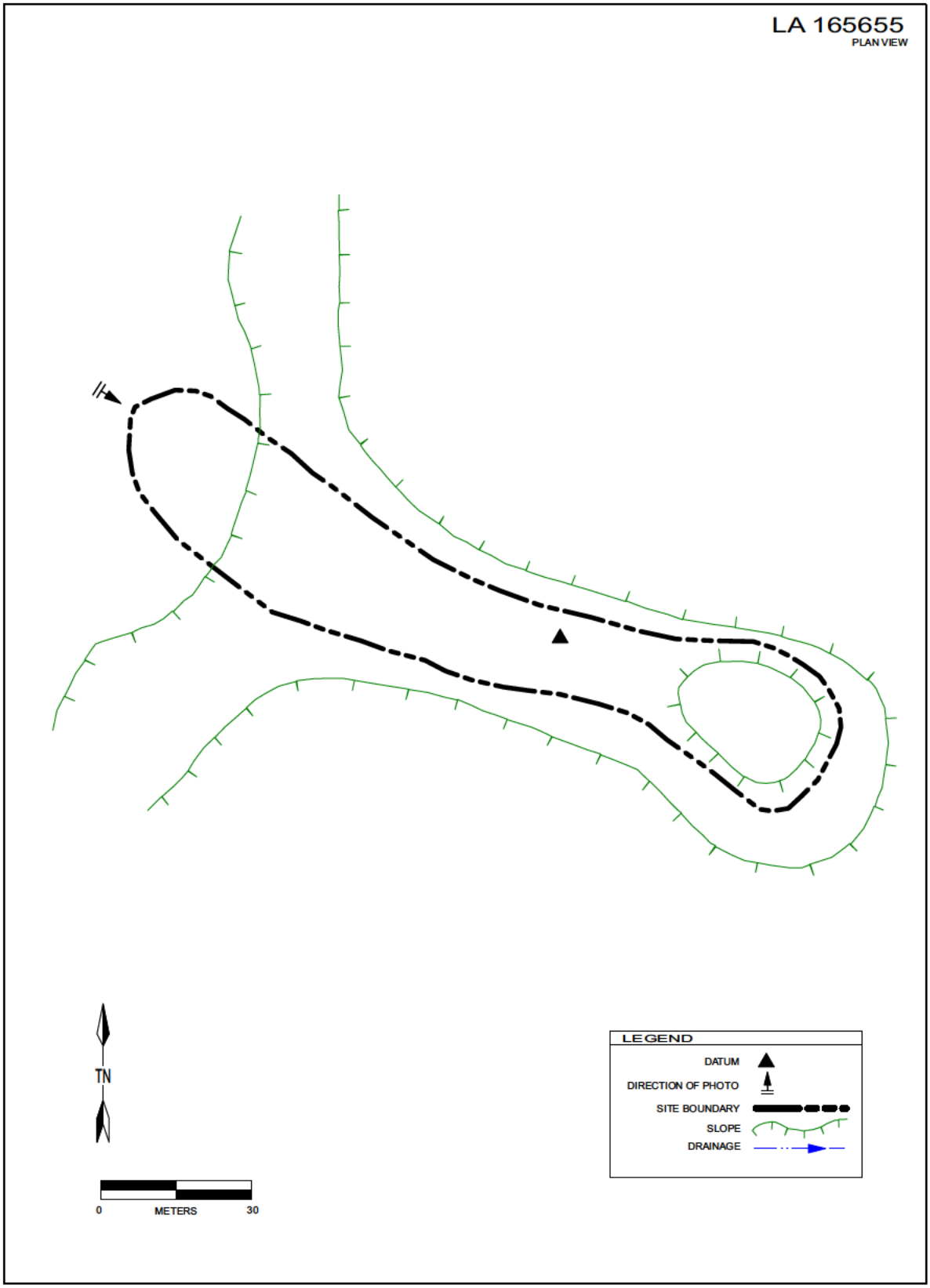

Figure 3.80: LA 165655 Site Map.

Conclusions

LA 164655 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as it is a lithic artifact scatter with no temporally diagnostic artifacts. The site appears to have little to no potential for any buried cultural deposits and is therefore unlikely to yield any additional significant data. For this reason, LA 164655 is recommended ineligible for nomination to the NRHP under any of the four criteria.

LA 165656

Field Number: 908-1-146
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1880 to 2010)
Eligibility: Ineligible
Site Type: Artifact Scatter/Ranching
Parcel: 5

Description

LA 165656, [redacted] consists of two features and a sparse artifact scatter (Figure 3.81). Vegetation includes creosote, mesquite, snakeweed, and grasses. Surficial visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 10 pieces of flaked-stone debitage, one core, one flaked-stone tool, and seven historic artifacts. The debitage includes nine secondary reduction flakes (one orange-brown chert, seven quartzite of gray and brown-shaded colors, one white chalcedony); and one tertiary reduction flake (pink-white chert). The core is a gray quartzite bidirectional core. The flaked-stone tool is a brown quartzite uniface. Historic artifacts include six metal barrel hoops and one piece of wire.

Features and Site Structure

Two features were observed on this site. Feature 1, located near the northern edge of the site, is a 5-cm (2-inch) diameter upright iron pipe associated with the barrel hoops. The pipe emerges from the ground to a height of 38.86 cm (15.3 inches) high. The pipe runs through the bedrock, passes through an underground cave located beneath the site, then continues into the rock, through the floor of the cave. The mouth of the cave opens into a drainage downslope. The cave was inspected for additional cultural materials during the site recording, but appeared to have had no other cultural disturbance. Three barrel hoops are associated with this feature.

Feature 2 is a 2.5-m diameter partially disarticulated circular rock alignment with a 2.5-cm (1-inch) diameter iron pipe in its center. The pipe stands 20.3 cm (8 inches) from the ground and is not firmly set in the limestone. No artifacts are associated with this feature.

Drainages are located north and south of the site. The site is located on residuum with some alluvial deposition. No subsurface cultural deposits appear to be present as sediments are very shallow. The datum nail encountered bedrock at a depth of 3 cm.

Disturbances and Potential Impacts

Water erosion and sheetwash have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusions

The site has Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1880 to 2010) affiliations as indicated by a lack of temporally diagnostic artifacts. The site has very shallow sedimentary deposits and appears to have little to no potential for buried cultural deposits. The site is unlikely to contribute any additional significant data and is there fore recommended ineligible for nomination to the NRHP under any of the four criteria.

LA 165657

Field Number: 908-1-147
Category: 2
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165657 [redacted] consists of a lithic artifact scatter (Figure 3.82). Vegetation includes creosote, mesquite, crucifixion thorn, and various grasses. Visibility is 76 percent to 99 percent, with some dense grass in some areas.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 48 pieces of flaked-stone debitage, six cores, one flaked-stone

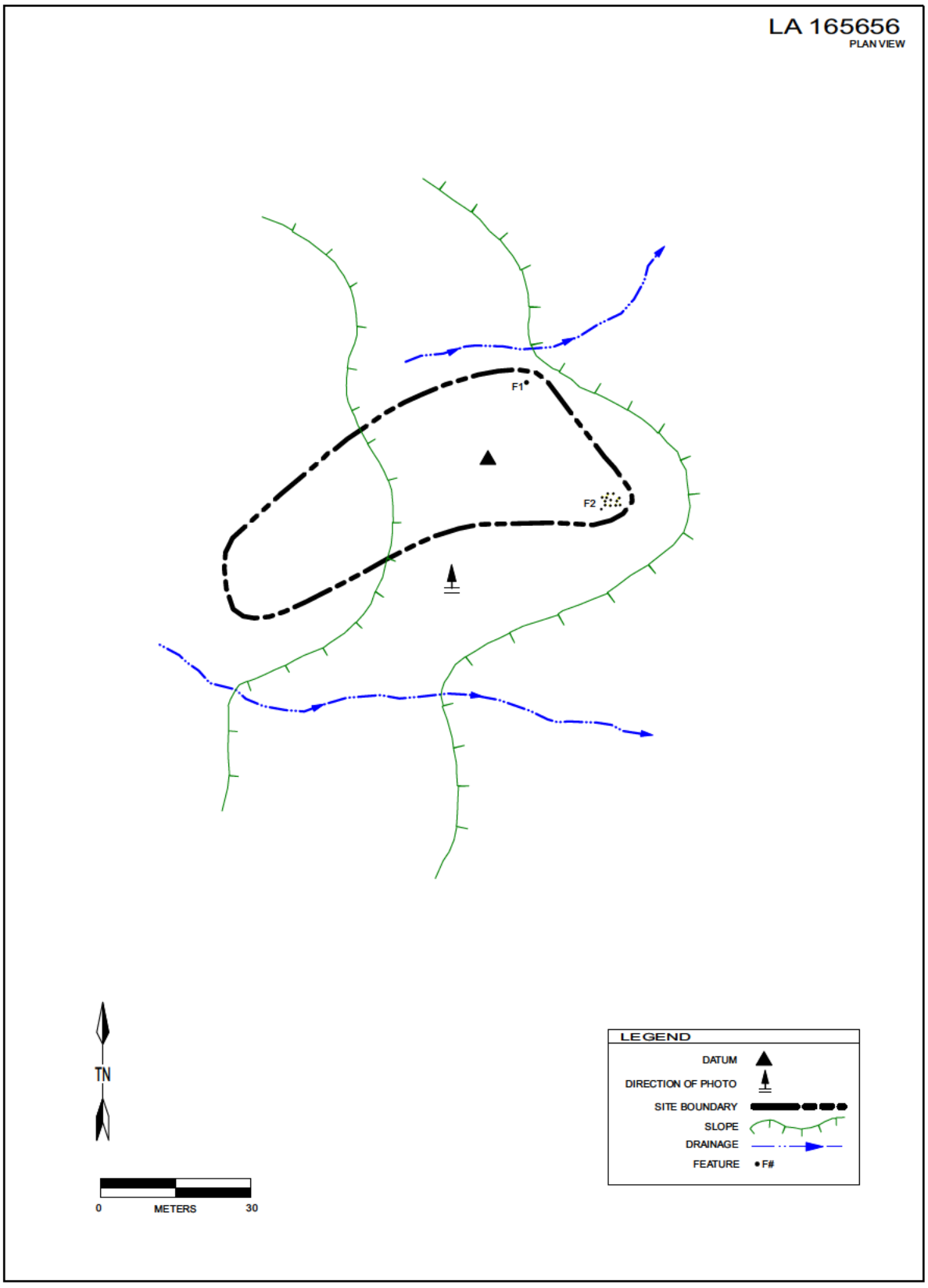

Figure 3.81: LA 165656 Site Map.

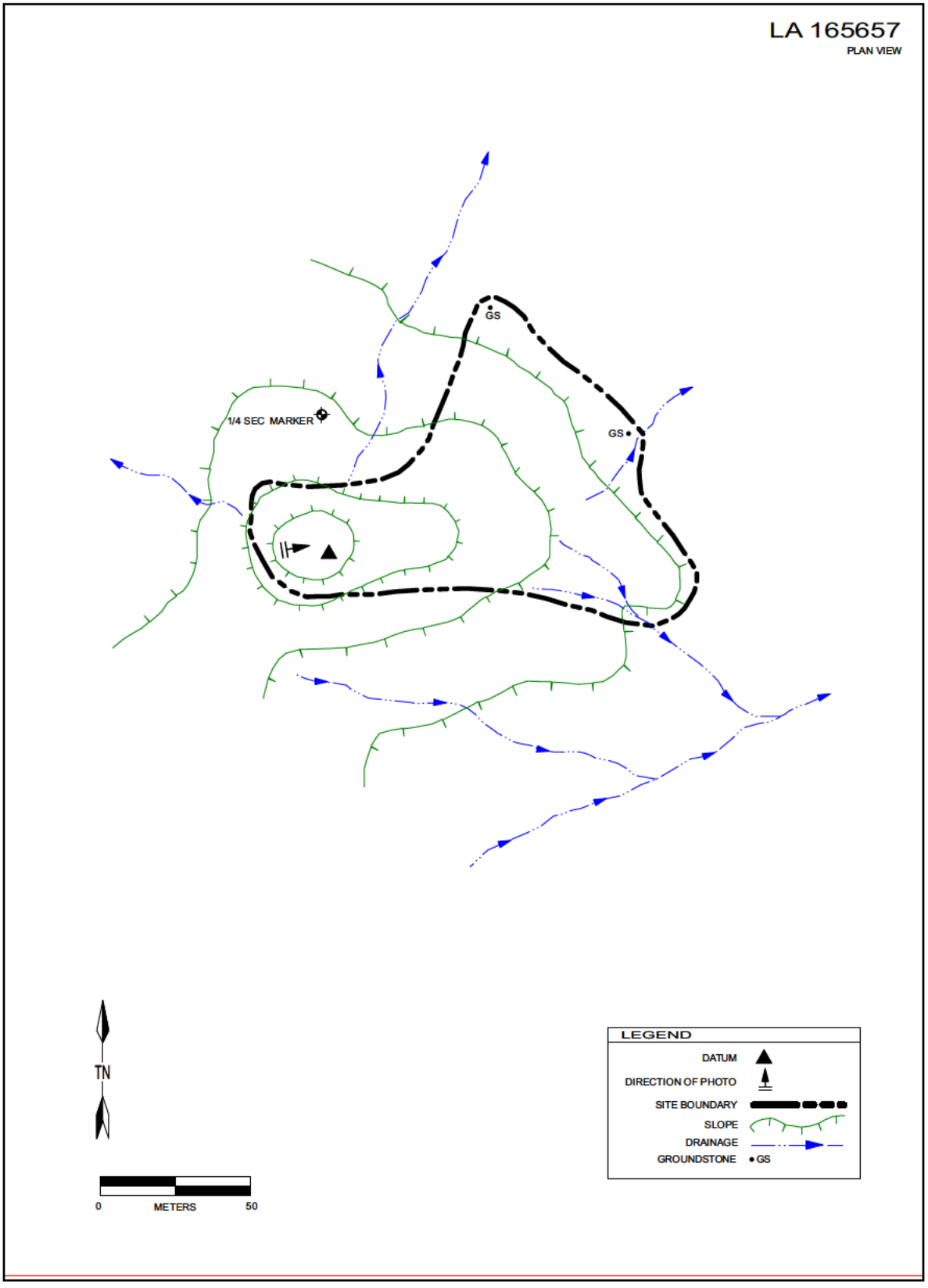

Figure 3.82: LA 165657 Site Map.

tool, and two groundstone artifacts. The debitage includes one chert primary reduction flake, 39 secondary reduction flakes (23 quartzite, 14 chert, three chalcedony), five tertiary reduction flakes (four quartzite, one chert), and three pieces of angular debris (three chert). Flaked-stone debitage raw materials occur in a variety of locally available colors. Cores include three multidirectional cores (one brown chert, one white chert, one gray/blue quartzite), two gray quartzite tested cobbles, and one gray quartzite bidirectional core. The tool is one whole yellow-brown chert biface. Groundstone artifacts are a complete sandstone slab metate and one fragment of a sandstone trough metate.

Features and Site Structure

No features were observed on this site. The site is located approximately 800 m west of the Pecos River on residuum with some alluvial deposition. A small drainage crosses the site on the northeast side of the slope. Bedrock is exposed through most of the site. There is no evidence of buried cultural deposits; the limited sediments are no deeper than 7.5 cm as suggested by the placement of the datum nail, which encountered bedrock at this depth.

Disturbances and Potential Impacts

Sheetwash has had some impact on the site, leaving it 51 percent to 75 percent intact.

Conclusions

The site has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, as it is a lithic scatter with no temporally diagnostic artifacts. The site is for the most part on exposed bedrock but limited sediments are present in some areas that might contain limited buried cultural deposits such as temporally diagnostic artifacts. LA 165657 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165658

Field Number: 908-1-148
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165658, a sparse lithic artifact scatter [redacted] Vegetation includes creosote, mesquite, little-leaf horse brush, crucifixion thorn and seasonal grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 12 pieces of flaked-stone debitage and two cores. The debitage includes 10 secondary reduction flakes (five quartzite, four chert, one chalcedony) and two quartzite tertiary reduction flakes. Quartzite occurs in gray, purple, and red-brown, cherts are gray, white, light orange, and blue. The chalcedony is gray. Cores include one brown quartzite tested cobble and one purple quartzite multidirectional core.

Features and Site Structure

No features were observed on the site. The site is located on residuum with limited alluvial deposition. The datum stake encountered limestone bedrock at a depth of 3 cm. No subsurface deposits were observed and given the shallow sediments at this location, such deposits are unlikely to be present.

Disturbances and Potential Impacts

Wind erosion is the primary source of disturbance on the site, leaving it 51 percent to 75 percent intact.

Conclusions

LA 165658 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the site has a lithic assemblage lacking temporally diagnostic artifacts. The site has little to no potential to yield any further significant data as it has little to no potential for buried cultural deposits. LA 165658 is therefore recommended ineligible for nomination to the NRHP under any of the four criteria.

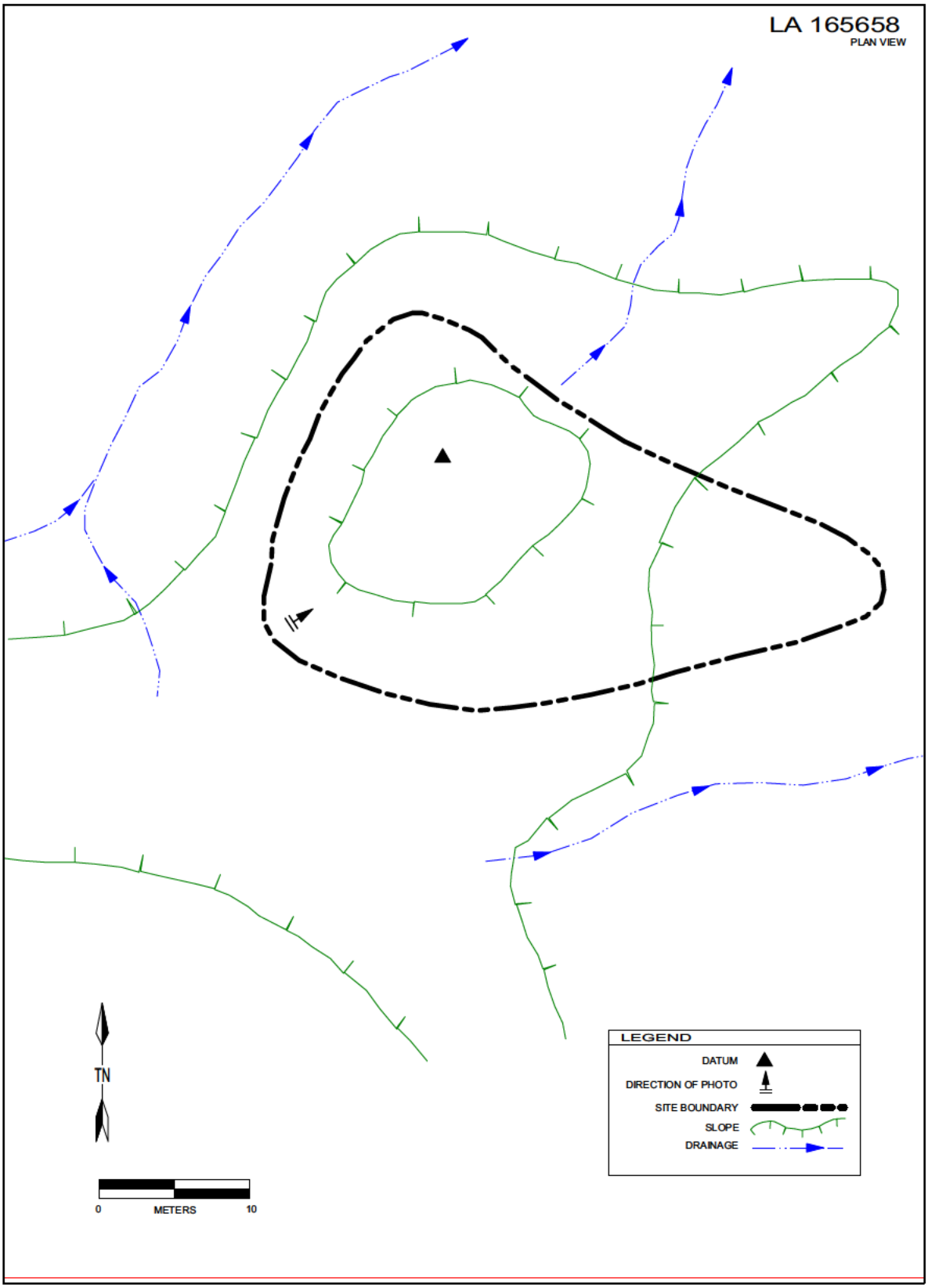

Figure 3.83: LA 165658 Site Map.

LA 165659

Field Number: 908-01-149
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165659 is a light lithic artifact scatter [redacted] Vegetation includes creosote, catclaw acacia, acacia, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 97 flaked-stone artifacts, including 79 pieces of debitage, 11 cores, and seven tools. The debitage consists of 64 secondary reduction flakes (15 chert, 49 quartzite); seven tertiary reduction flakes (five quartzite, two chert); and eight pieces of angular debris (eight quartzite, eight chert). Quartzites occur in red, brown, and gray and cherts are red, gray, and brown. The cores include seven chert multidirectional cores (two red, two gray, one yellow and gray, one brown, one pink and gray); one brown quartzite bidirectional core; one brown quartzite unidirectional core; one gray chert multidirectional core; and one gray chert unidirectional core. The tool consists of three chert scrapers (two gray, one brown); one gray quartzite uniface; one black chert biface; and two brown quartzite bifaces.

Features and Site Structure

No features were observed. The site is located on residuum and in an alluvial depositional environment. No buried cultural material was observed and the depth of sediments that could contain such material is unknown.

Disturbances and Potential Impacts

The primary source of disturbance on the site is water erosion, which has displaced some artifacts. LA 165659 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165659 contains a lithic scatter with no temporally diagnostic artifacts. The site therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation. It is uncertain whether any buried cultural deposits or other sources of additional significant data exist at this site. For this reason, LA 165659 is recommended to have an undetermined eligibility for nomination the NRHP.

LA 165660

Field Number: 908-01-150
Category: 1
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165660 is a sparse lithic artifact scatter located on the slope and at the base of a low rise hill (Figure 3.85). Vegetation on the site includes creosote, catclaw acacia, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 14 flaked-stone artifacts, including 12 pieces of flaked-stone debitage and one core. The debitage consists of 13 secondary reduction flakes (12 quartzite, one gray chert). Quartzites occur in red, gray, and brown. The core is a gray and brown chert multidirectional core.

Features and Site Structure

No features were observed. The site is located on residuum and in an alluvial depositional environment. No buried cultural material was observed and the depth of sediment deposition that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbances on the site are water erosion and wind erosion. LA 165660 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165660 has an Unknown Aboriginal (9500 B.C. and A.D. 1880) temporal and cultural affiliation, as indicated by a lithic assemblage that lacks temporally diagnostic artifacts. It is not apparent whether LA 165660 contains or does not contain any buried cultural deposits or other sources of significant data.

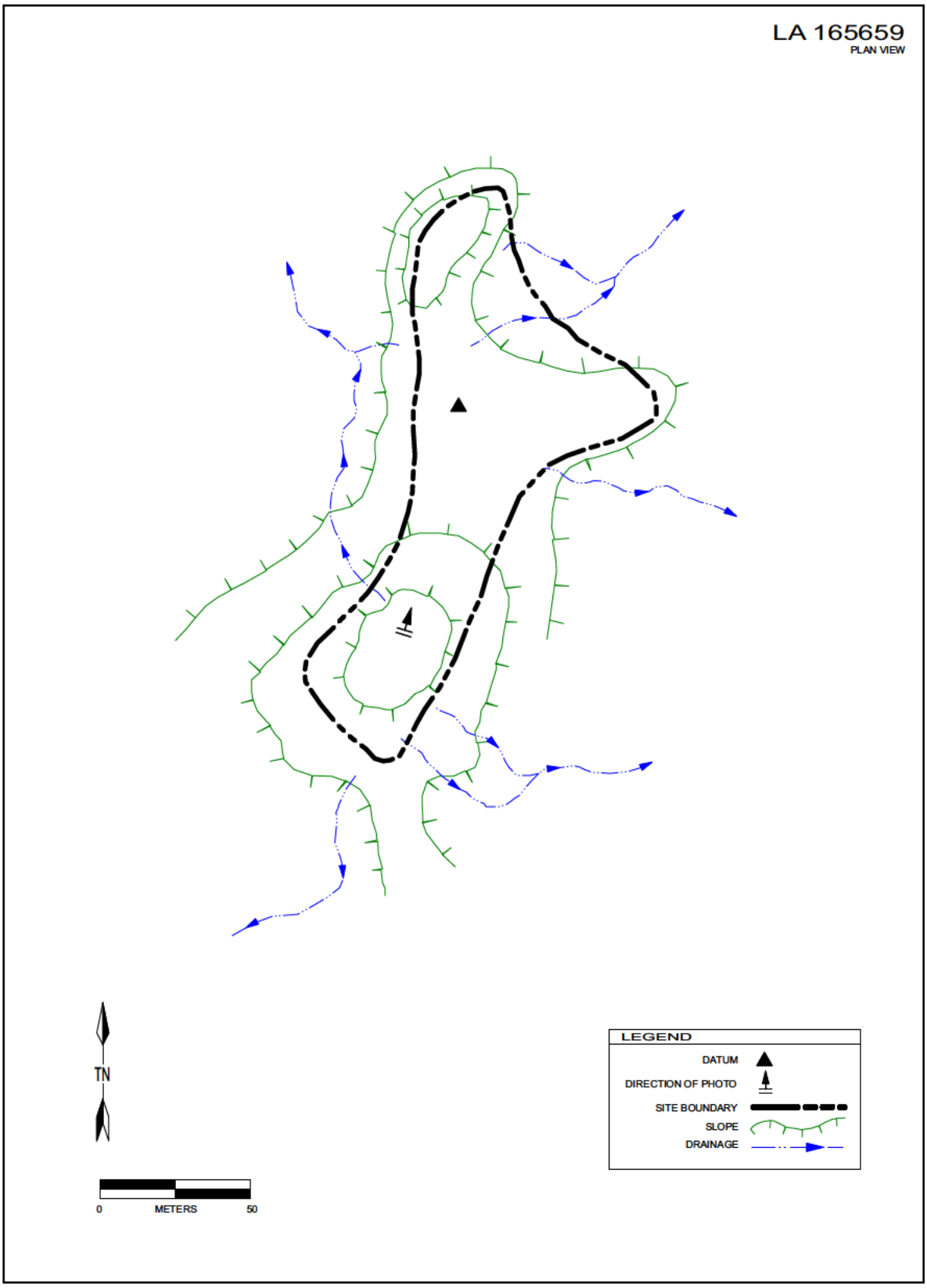

Figure 3.84: LA 165659 Site Map.

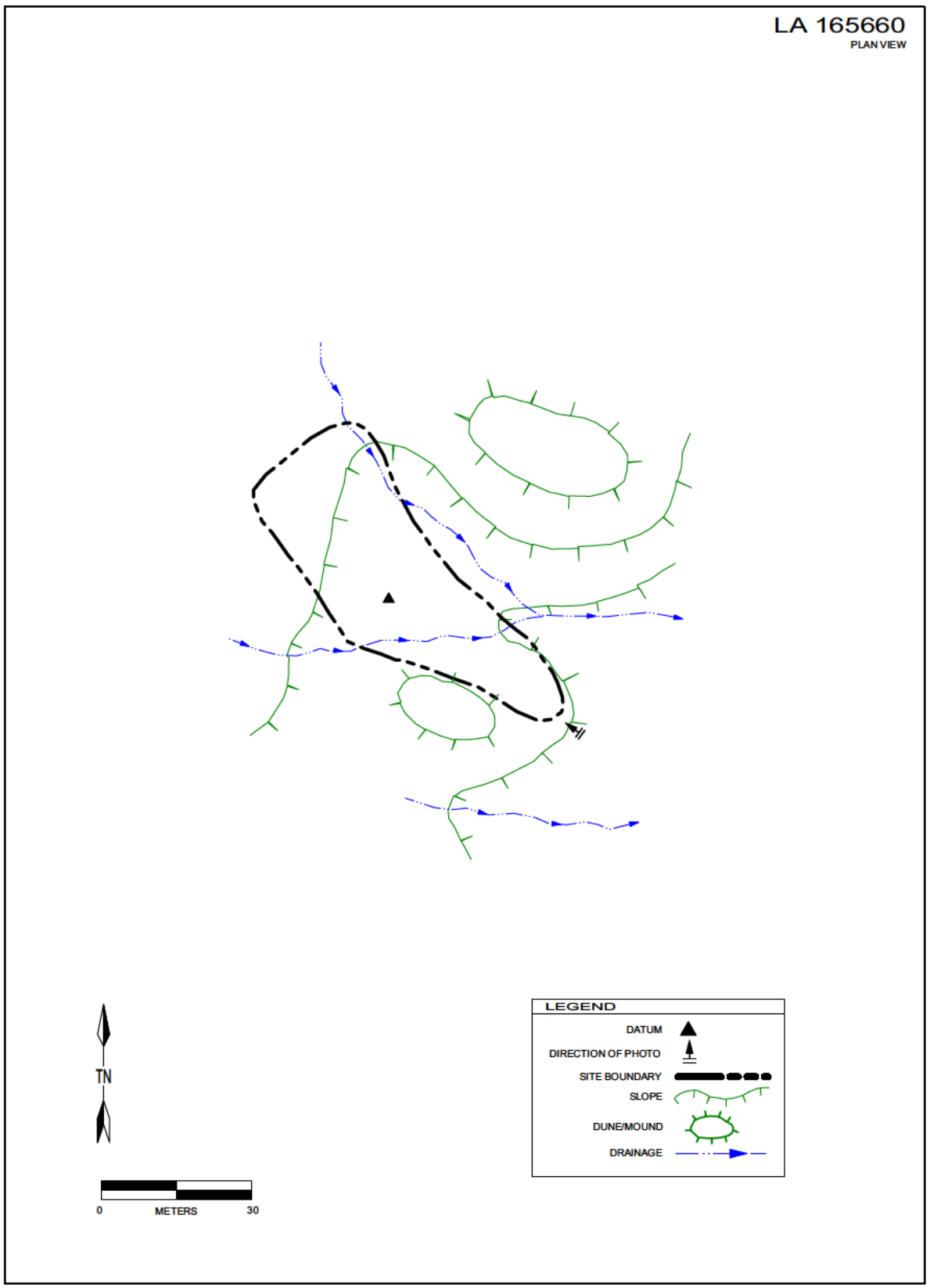

Figure 3.85: LA 165660 Site Map.

The data potential of this site is unknown, and therefore LA 165660 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165661

Field Number: 908-01-151
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165661 is a sparse lithic artifact scatter [redacted] Vegetation includes creosote, mesquite, crucifixion thorn, catclaw acacia, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 35 flaked-stone artifacts, including 30 pieces of debitage and five cores. The debitage consists of 29 secondary reduction flakes (21 quartzite, seven chert, one gray limestone) and one piece of angular debris (gray limestone). Quartzites occur in red, gray, and brown and cherts are gray and red. The cores include one brown chert unidirectional core, three brown quartzite multidirectional cores, and one gray and brown chert multidirectional core.

Features and Site Structure

No features were observed. The site is bordered to the north and south by medium sized drainages and bisected by a small drainage that runs east to west. The site is located on residuum and in an alluvial depositional environment. No buried cultural material was observed and the depth of sediments that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbances on the site are water erosion and wind erosion. LA 165661 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165661 has an Unknown Aboriginal affiliation (9500 B.C. to A.D. 1880), as the site consists of a lithic scatter with no temporally diagnostic artifacts. The site has not yielded evidence either confirming or disproving the existence of buried cultural deposits or other sources of significant data. LA 165661 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165662

Field Number: 908-1-152
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165662 is a lithic scatter [redacted] Vegetation includes creosote, catclaw, crucifixion thorn, littleleaf horse brush and seasonal grasses. Visibility is 76 percent to 99 percent, with moderate to dense vegetation in places.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 71 pieces of flaked-stone debitage, two tools, and six cores. The debitage includes 57 secondary reduction flakes (eight brown quartzite, 28 red quartzite, two gray quartzite, three white chert, five black chert, eight gray chert, one brown chert, two red chert, one green chert); seven tertiary reduction flakes (six red quartzite, one gray chert); and seven pieces of angular debris (one white chert, one red quartzite, two gray chert, one brown chert one red chert, one green chert). Cores include five multidirectional cores (red quartzite, gray quartzite, two brown quartzite, gray chert). Tools include two red quartzite choppers.

Features and Site Structure

No features were observed during this investigation. The site is located in alluvial depositional environment with a narrow drainage bisecting the hill slope from east to west. The drainage is decomposing limestone and alluvial gravels from the surface of the site. The site has no visible evidence of buried cultural deposits.

Disturbances and Potential Impacts

LA 165662 has been disturbed by wind erosion and some livestock grazing. The site is estimated to be between 51 percent and 75 percent intact.

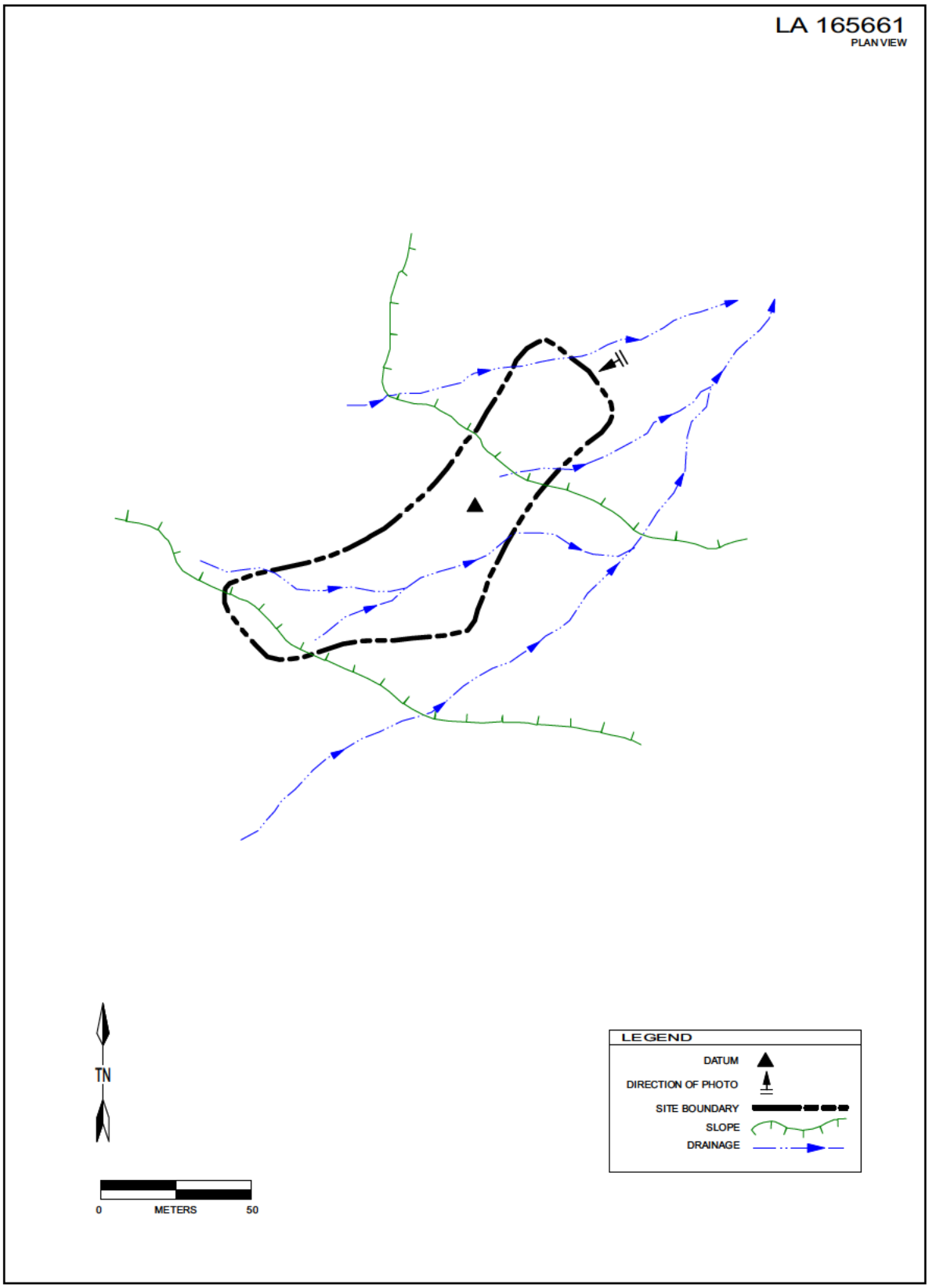

Figure 3.86: LA 165661 Site Map.

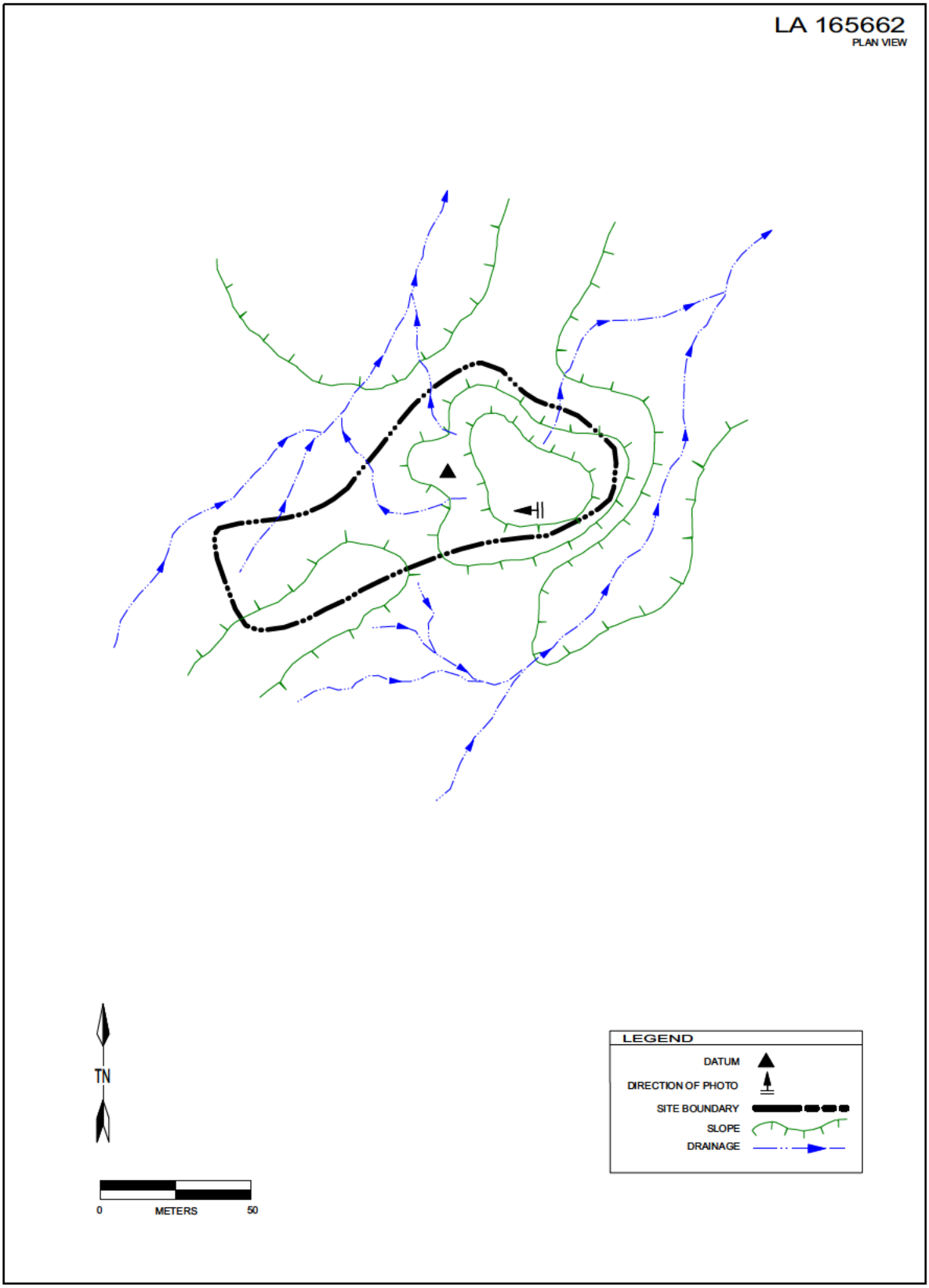

Figure 3.87: LA 165662 Site Map.

Conclusion

LA 165662 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the site has a lithic assemblage with no temporally diagnostic artifacts. It is unknown whether LA 165662 retains buried cultural deposits and what the nature, extent, or data potential of any such deposits may be. LA 165662 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165663

Field Number: 908-1-153
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA165663, [redacted] consists of a sparse artifact scatter (Figure 3.88). Vegetation includes creosote, catclaw, little-leaf horse brush and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The recorded assemblage consists of 30 pieces of flaked-stone debitage, one core, and one crushed historic can. The debitage includes 25 secondary reduction flakes (six brown quartzite, one jasper, four gray quartzite, four brown chert, seven gray chert, one red quartzite) and three pieces of angular debris (one gray quartzite, one black chert, one gray chert). The core is a brown quartzite multidirectional core. The can is a crushed and corroded sanitary can. This can appears to be an isolated occurrence and does not represent any historic component on the site.

Features and Site Structure

Lone Mountain found no features at LA 165663. The site is located in an eolian and alluvial depositional environment. The southeast portion of the site drops dramatically onto a small flood plain. There is no evidence of cultural deposition on the site as the surface is covered with alluvial gravels.

Disturbances and Potential Impacts

Wind erosion and some bioturbation have had impacts on the site surface. The site is estimated to be between 51 percent and 75 percent intact.

Conclusion

LA 165663 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation as the site consists of a lithic artifact assemblage with no temporally diagnostic artifacts. The site appears to have a very limited potential for buried cultural deposits, given a gravelly surface, but this potential (and any attendant data potential) cannot be discounted entirely.

LA 165663 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165664

Field Number: 908-1-154
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165664, [redacted] consists of a sparse artifact scatter (Figure 3.89). Local vegetation includes creosote, Christmas tree cholla, crucifixion thorn, catclaw, and dense seasonal grasses in some areas. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 23 pieces of flaked stone debitage, one flaked-stone tool, and one historic beer can. The lithic material includes 20 secondary reduction flakes (eight gray chert, one red quartzite, three white chert, two gray brownish chert, two jasper, four brown quartzite); one gray chert tertiary reduction flake; and two pieces of gray chert angular debris. The flaked-stone tool is a complete gray chert uniface. The historic artifact is a cone top beer can with a crown cap. Although crowntainers have recently been re-released as novelty cans, the crowntainer usually dates from 1940 to the mid 1950s, with those produced from 1942 and 1947 reserved for military use (Maxwell 1993). This can is most likely an isolated occurrence and does not represent a separate historic component at LA 165664.

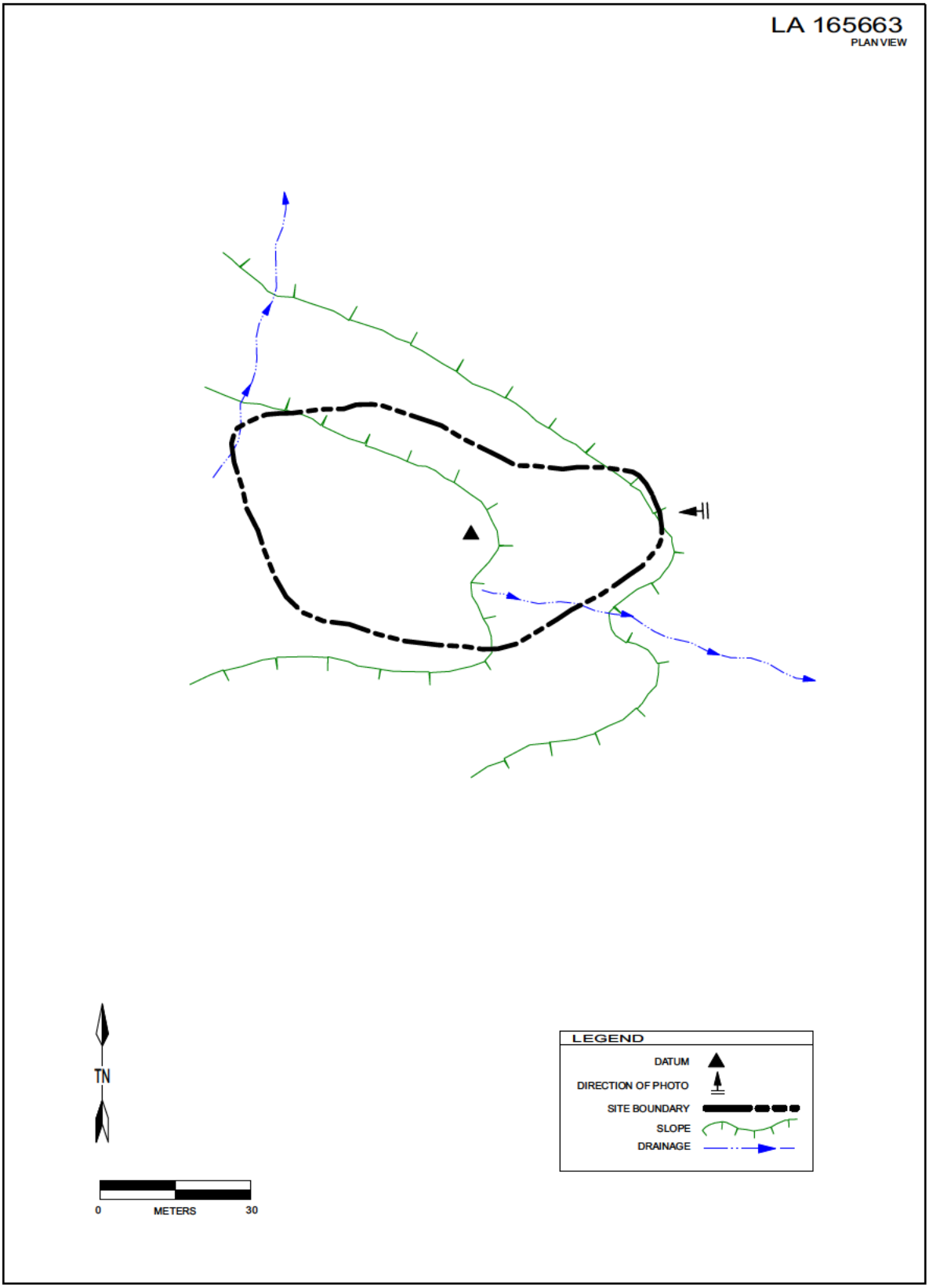

Figure 3.88: LA 165663 Site Map.

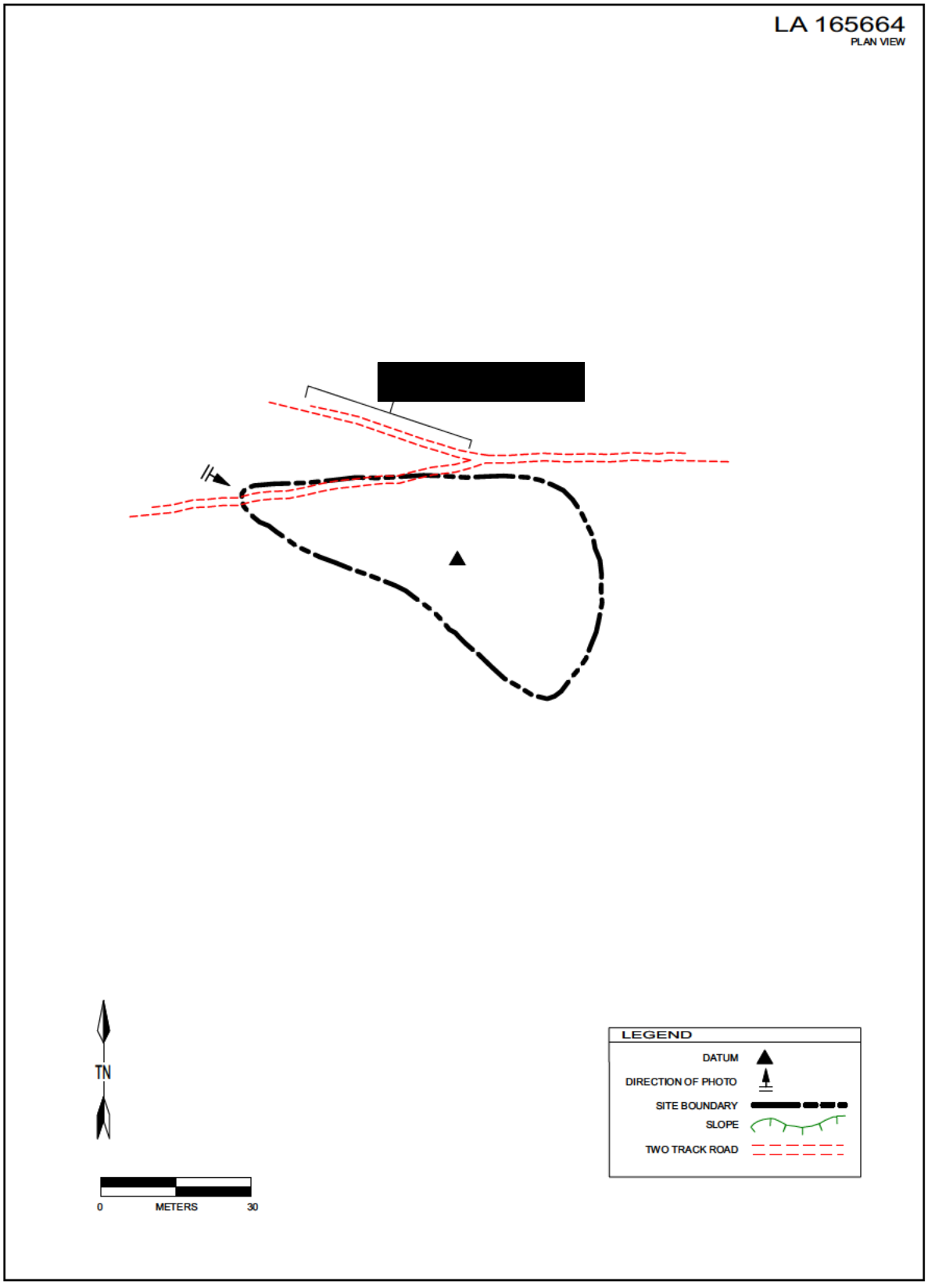

Figure 3.89: LA 165664 Site Map.

Features and Site Structure

No features were observed on this site. LA 165664 is located in an alluvial depositional environment with considerable sedimentary depth. There is no evidence of buried cultural deposits on the site although the possibility of such deposits may not be discounted at this time.

Disturbances and Potential Impacts

A dirt two-rack road runs along the northern edge of the site and low-energy sheetwash has redeposited some artifacts. Sheetwashing and bioturbation have had the most extensive impacts on the site, leaving it an estimated 51 percent to 75 percent intact.

Conclusion

LA 165664 has a lithic scatter with no temporally diagnostic artifacts. The site therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation. LA 165664 has yielded no evidence for buried cultural deposits but does have substantial sedimentation. The possibility that buried cultural deposits are present may not be discounted. LA 165664 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165665

Field Number: 908-1-155
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 5

Description

LA 165665, [redacted] consists a sparse artifact scatter and three features (Figure 3.90). Local vegetation includes creosote, snakeweed, little-leaf horse brush, catclaw and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of ten pieces of flaked-stone debitage, two groundstone artifacts, and one core. The debitage includes 10 secondary reduction flakes (one white reddish chert, five gray quartzite, four brown quartzite). The core is a brown quartzite multidirectional core. Groundstone artifacts include one sandstone slab metate and one limestone basin metate.

Features and Site Structure

Three features were observed on the site and designated Features 1 through 3. All of the features are located in northern portion of the site. Feature 1 is a 1.0-m by 0.5-m burned caliche feature with an associated charcoal stain of unknown depth. The feature is composed of seven pieces of burned caliche ranging in size from 2 cm to 11 cm, with an average size of 11 cm. One tertiary reduction flake is associated with the feature. The feature is estimated to be 30 percent intact.

Feature 2 measures 30 cm by 28 cm and is composed of five 1-cm pieces of thermally altered rock. The feature may be as deep as 6 cm, based on buried materials in a disturbed area. There are no associated artifacts, charcoal, or ash stains. The feature is estimated to be 20 percent intact due to wildlife or livestock trampling the area.

Feature 3 is a small 27-cm by 13-cm thermal feature composed of four pieces of burned caliche ranging between 1 cm and 2 cm in size. There is no apparent depth to this feature. There are no associated artifacts in this location and no visible ash or charcoal staining. The feature appears to be no more than 15 percent intact.

Several shallow drainages bisect the site from southwest to northeast. A dirt two-track road and barbed wire fence borders the site to the west. The site is located in an alluvial and eolian depositional environment and sediments consist of loose material and gravels. Rodent burrows suggest that sediments are considerably deep. There is no clear evidence of buried cultural deposits.

Disturbances and Potential Impacts

Wind erosion, sheetwashing, and the construction of a fence and two-track road have all disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165665 has no temporally diagnostic artifacts and therefore has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation. Buried cultural materials were observed in the features. The site contains features that may yield addi-

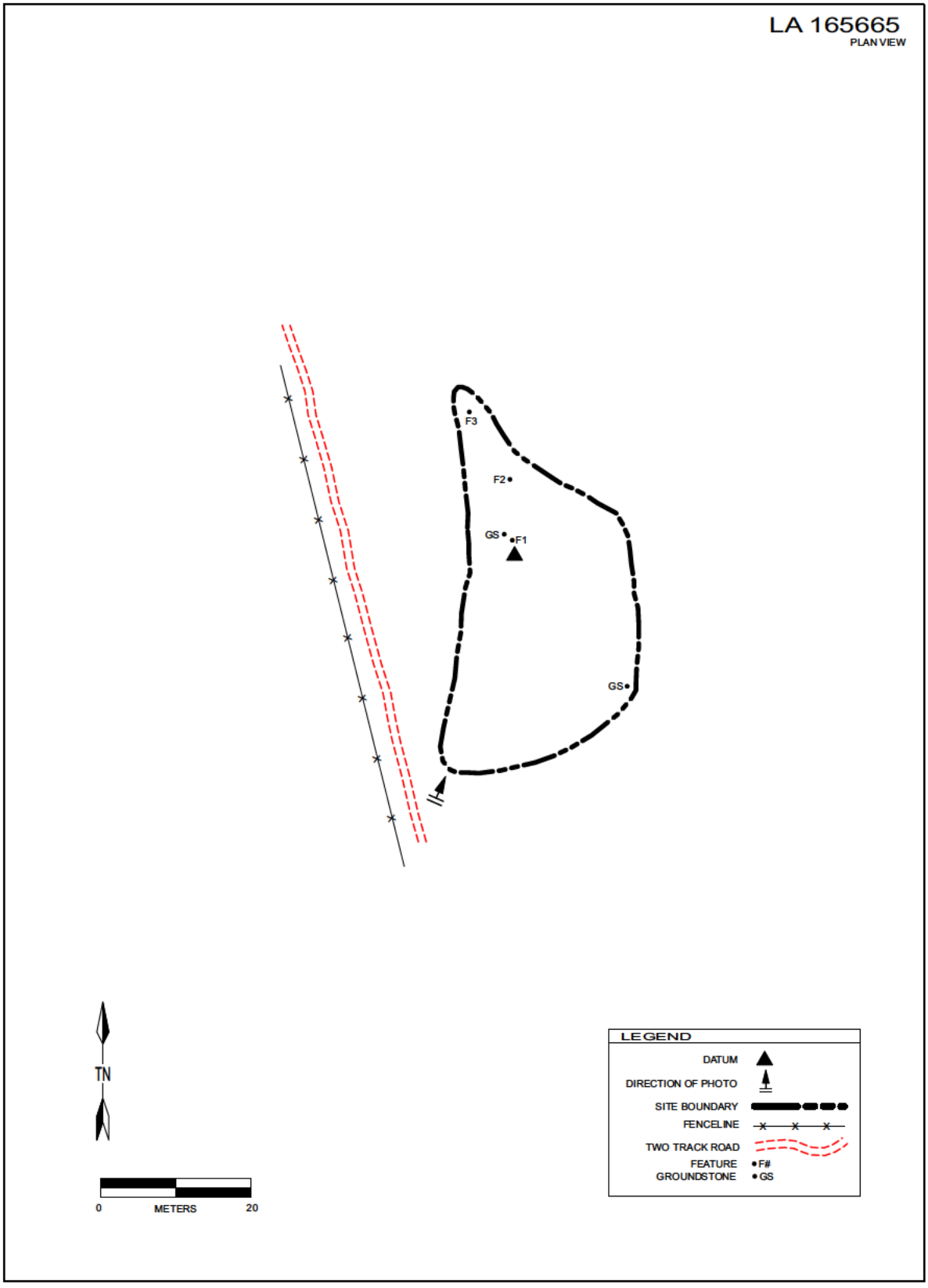

Figure 3.90: LA 165665 Site Map.

tional significant data such as TL/OSL dates and residues. The site is therefore recommended eligible for nomination to the NRHP.

LA 165666

Field Number: 908-1-156
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165666, [redacted] onsists of a varied and extensive artifact scatter (Figure 3.91). Local vegetation includes creosote, little-leaf horse brush, catclaw, and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

Lone Mountain recorded all observed artifacts at this location. The assemblage consists of 89 pieces of flaked stone debitage, 10 cores, and one flaked-stone tool. The debitage includes 81 secondary reduction flakes (41 red quartzite, eight gray quartzite, 10 gray chert, 11 brown quartzite, one pink quartzite, one white reddish chert, nine green quartzite); five tertiary reduction flakes (three red quartzite, one brown quartzite, one gray chert); three pieces of angular debris (one red quartzite, one brown chert, one green chert). Cores are two tested cobbles (purple quartzite, gray chert); three unidirectional quartzite cores (one gray, two purple); three multidirectional cores (one brown, two purple); and two bidirectional quartzite cores (one gray, one purple). The tool is a brown quartzite biface.

Features and Site Structure

No aboriginal features were observed, though an upright pipe 60 cm above ground and 2.5 cm in diameter is located in the southeast section of the site. It is uncertain what activity this pipe may be associated with, as there are no historic or recent artifacts in the area. It is not clear if this pipe is archaeologically significant. LA165666 is located in an eolian and alluvial depositional environment and on residuum. Surface material consists of decomposing limestone bedrock and alluvial gravels. Substantial buried cultural deposits are unlikely in this environment, though loose gravels may conceal small significant artifacts.

Disturbances and Potential Impacts

Wind erosion, sheetwashing, and development activity had have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165666 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, given a lithic assemblage that lacks temporally diagnostic artifacts. The site appears to lack potential for substantial cultural deposits but may still yield additional significant data from shallow deposits. Without definite proof of the existence of such deposits, the eligibility of this site is uncertain. LA 165666 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165667

Field Number: 908-1-157
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165667 [redacted] consists of a sparse artifact scatter. [redacted] Local vegetation includes creosote, little-leaf horse brush, catclaw, Spanish bayonet, and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 21 pieces of flaked stone debitage and one flaked-stone tool. The debitage includes 21 secondary reduction flakes (two red quartzite, two brown chert, five red quartzite, four gray chert, two reddish white chert, one white chert, five brown quartzite). The tool is a gray quartzite chopper.

Features and Site Structure

No features were observed. The site is located in an eolian and alluvial depositional environment with alluvial gravels and decomposing limestone accounting for a large portion of the surface. Substantial buried cultural deposits are unlikely in this environment, though loose gravels may conceal small artifacts.

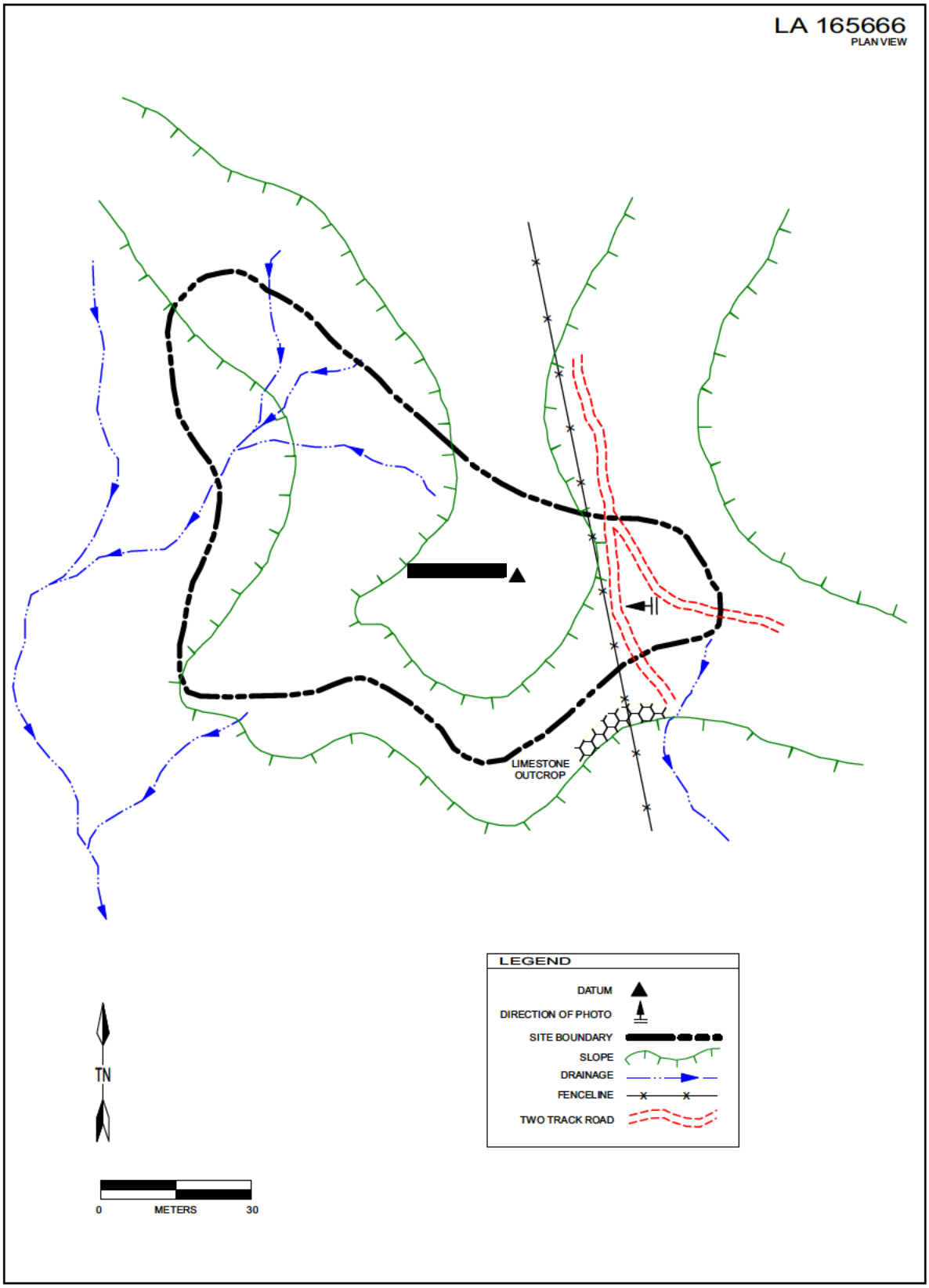

Figure 3.91: LA 165666 Site Map.

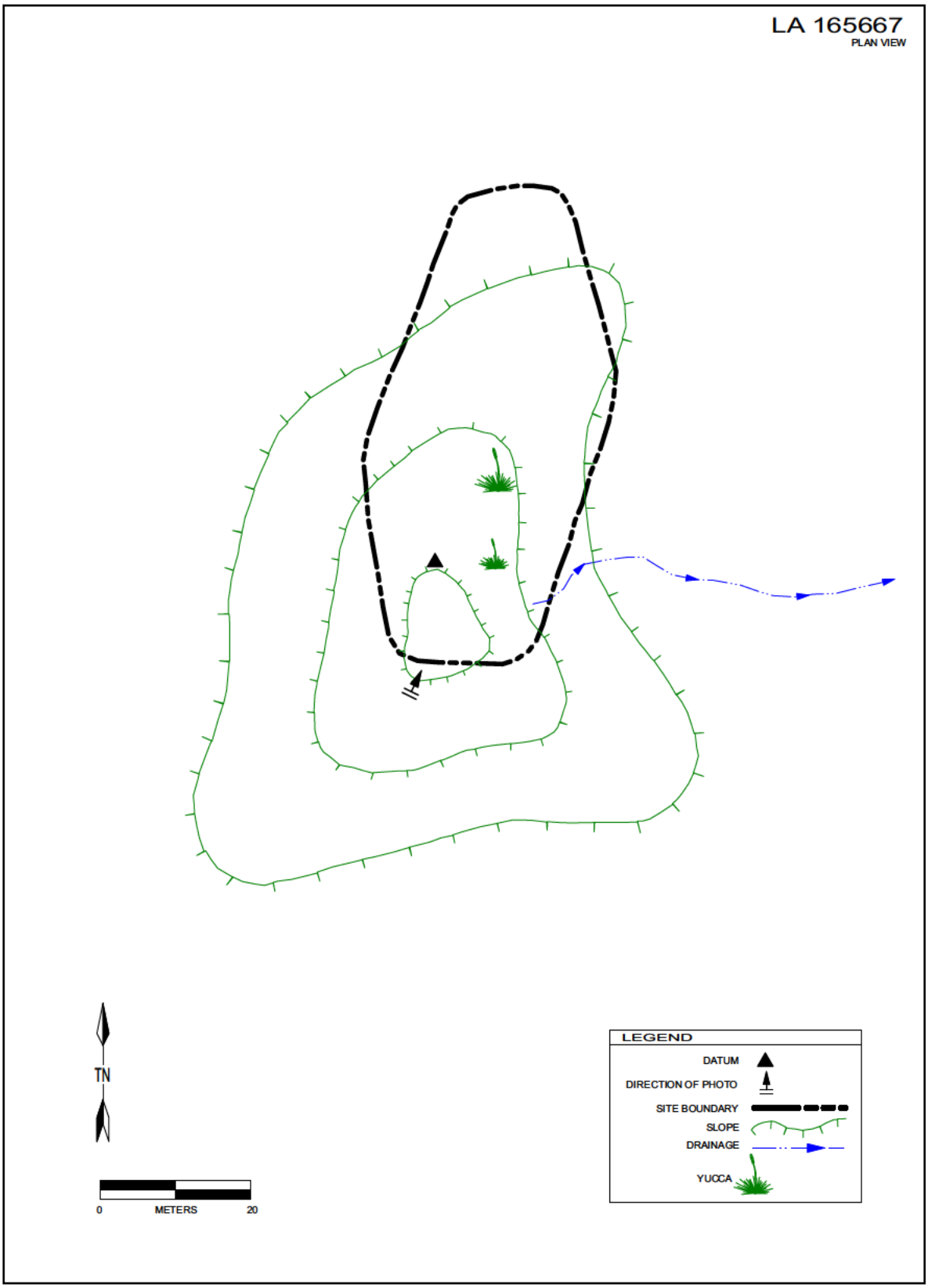

Figure 3.92: LA 165667 Site Map.

Disturbances and Potential Impacts

Wind erosion and some livestock grazing had have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165667 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, as the site is composed of a lithic assemblage that lacks temporally diagnostic artifacts. The site appears to lack potential for substantial cultural deposits but may still yield additional significant data from shallow deposits. LA 165667 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165668

Field Number: 908-1-158
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Possible Structure
Parcel: 5

Description

LA 165668 is a feature associated with a sparse artifact scatter [redacted] Vegetation on and around the site includes creosote, mesquite, sage, and grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 14 pieces of flaked-stone debitage, one core, and one flaked-stone tool. The debitage includes 14 secondary reduction flakes (four gray ortho-quartzite, four brown quartzite, two gray chert, two clear grayish chert, one red quartzite). The tool is a brown quartzite chopper.

Features and Site Structure

One feature was observed. Feature 1, located in the northern portion of the site, is a 2.3-m by 2.1-m deflated rock mound with a height of 0.22 m. Approximately 100 cobbles of various sizes and materials compose this feature, which is 15 percent to 20 percent intact. Two primary reduction flakes (gray quartzite) and one secondary reduction flake (gray chert) were observed within the feature. This mound may be a disarticulated cairn or shrine, a pile of rocks intended to trap moisture for growing a particular plant, the remains of a structure or hunting blind, or some other feature type.

Smaller finger-shaped ridges are located immediately north and south of the site. Sediments that might contain buried cultural deposits beyond the feature are no more than 15 cm deep, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

Wind erosion, sheetwashing, and plant growth have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165668 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, based on a lithic assemblage with no temporally diagnostic artifacts and a feature of unknown function. It is unknown whether any buried cultural deposits or other sources of significant data are present. LA 165668 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165669

Field Number: 908-01-159
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 5

Description

LA 165669 [redacted] The site consists of five features and a moderate scatter of artifacts (Figure 3.94). Vegetation includes creosote, catclaw, mesquite, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

A representative sample (20 percent) of all observed artifacts was recorded. The assemblage consists of 124 flaked-stone artifacts and five groundstone artifacts. The flaked-stone assemblage consists of 100 pieces of debitage, 13 cores, and 11 tools. The debitage includes 86 secondary reduction flakes (57 quartzite, 27 chert, one gray limestone, one clear chalcedony); nine tertiary reduction flakes (four chert, five quartzite); and five pieces of angular debris (chert). Quartzites occur in gray, brown, red, and yellow, and cherts are gray, red, brown, green,

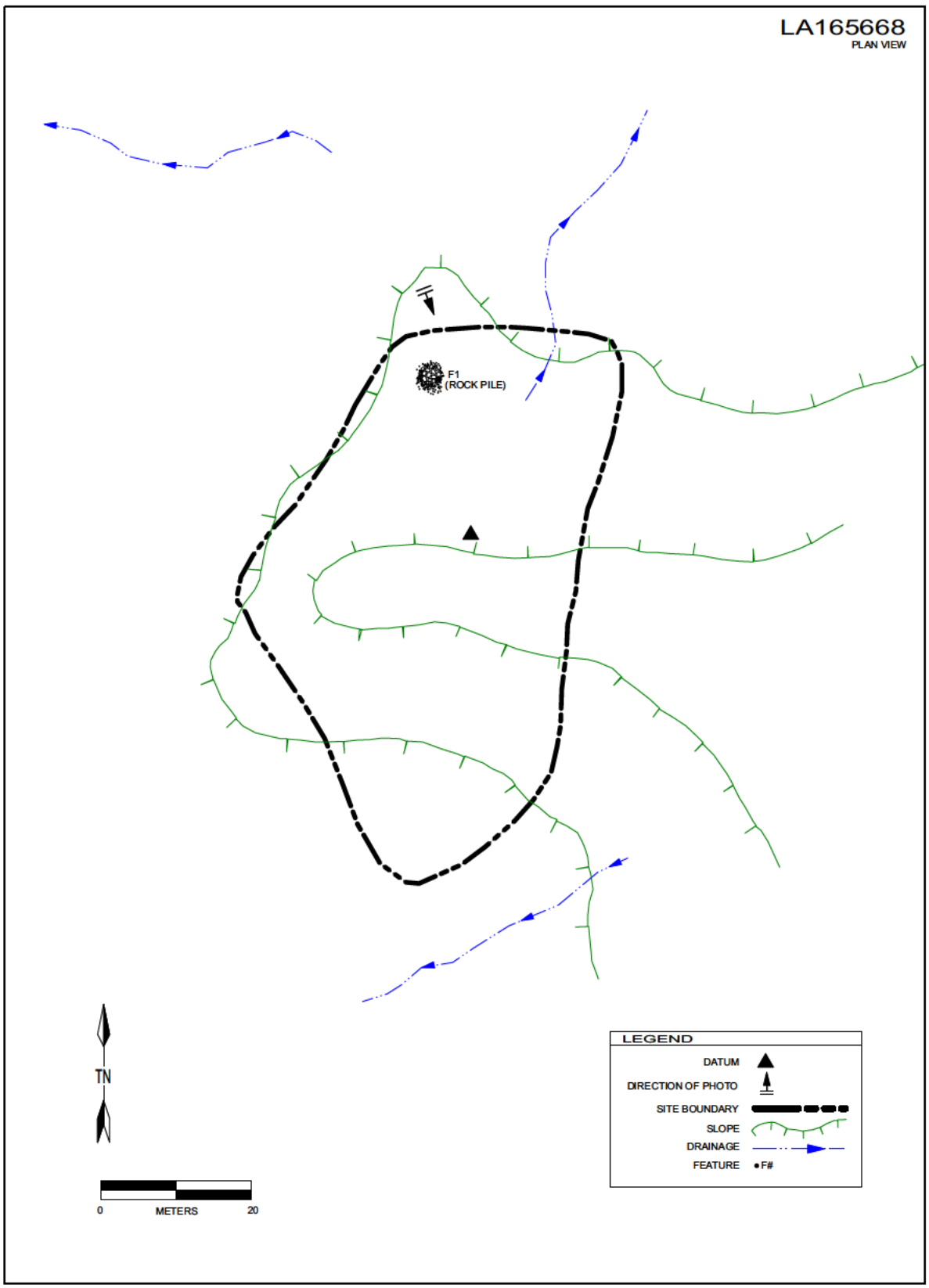

Figure 3.93: LA 165668 Site Map.

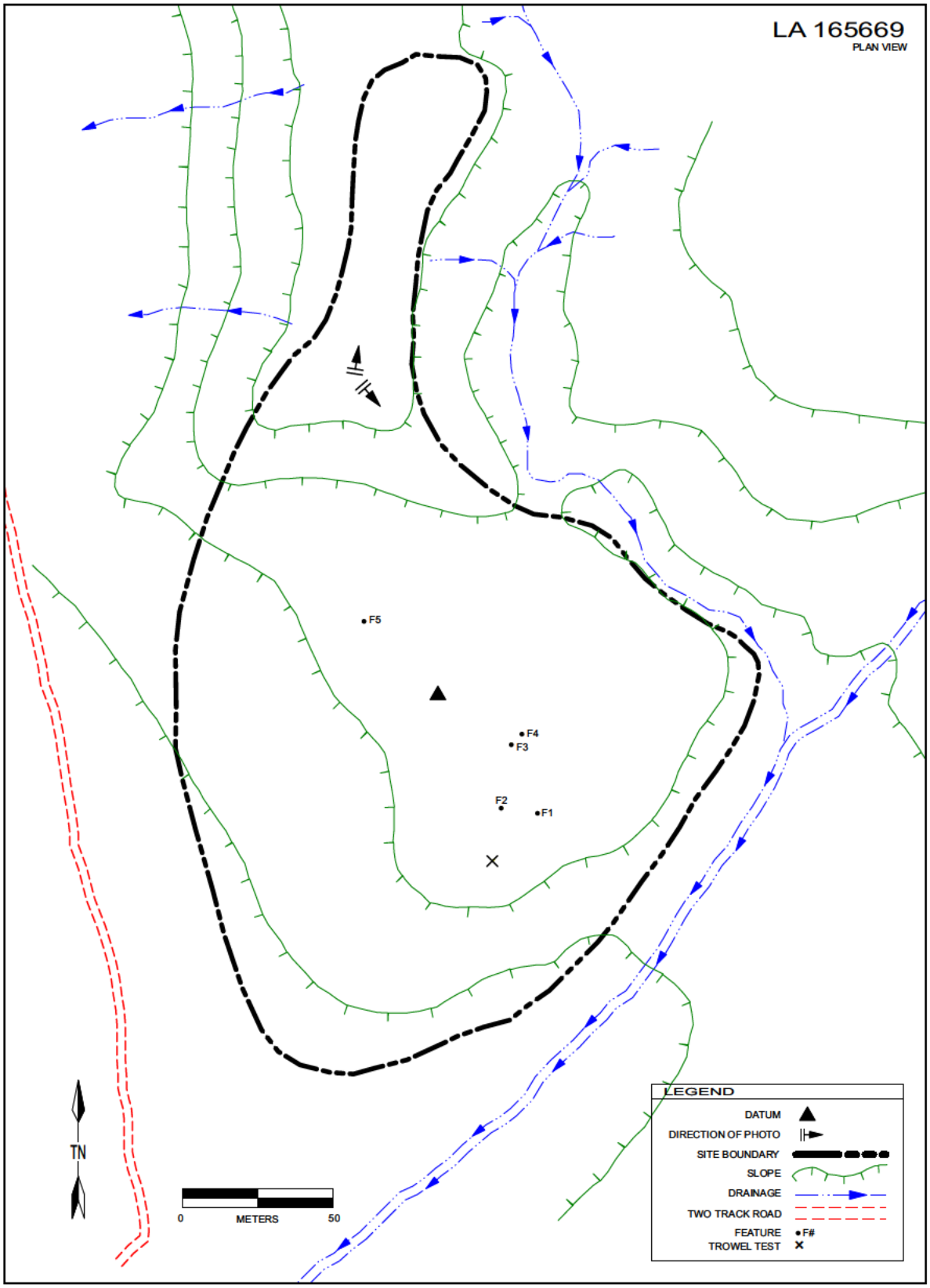

Figure 3.94: LA 165669 Site Map.

and white. The cores consist of 10 quartzite multidirectional cores (six gray, two gray and yellow, one brown, one red); one red quartzite bidirectional core; and two brown quartzite unidirectional cores. The tools include three quartzite choppers (one brown and two gray); one brown chert chopper; two chert scrapers (one brown and one red); two brown quartzite scrapers; one brown quartzite biface; one black and brown chert biface; and one light gray limestone single edge knife. The groundstone consists of two quartzite metate slab fragments, one sandstone metate slab fragment, one sandstone two-hand mano fragment, and one whole quartzite one-hand mano.

Features and Site Structure

Lone Mountain encountered five features at LA 165669.

Feature 1 is a 1-m by 1-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 55 pieces of thermally altered limestone, sandstone, and caliche that range in size from 1 cm to 12 cm, averaging 10 cm. The estimated depth is 1 cm, based on the mounding of the feature rock. One secondary reduction flake was noted. No charcoal or ash staining were observed. The feature is 20 percent intact, having been heavily eroded.

Feature 2 is a 2-m by 2-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 100 pieces of thermally altered limestone, sandstone, and caliche that range in size from 1 cm to 16 cm, averaging 11 cm. The estimated depth is 3 cm, based on the mounding of the feature rock. Three tertiary reduction flakes of white, pink, and brown chert were noted. No ash staining or charcoal was observed. The feature is approximately 15 percent intact, having been disturbed by bioturbation due to cattle grazing.

Feature 3 is a 2-m by 1-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 80 pieces of thermally altered limestone, sandstone, and caliche that range in size from 4 cm to 15 cm, averaging 8 cm. The estimated depth is 8 cm, based on the mounding of the feature rock. Two brown chert tertiary reduction flakes were noted. No charcoal or ash staining were observed. The feature is 45 percent intact, having been impacted by water erosion.

Feature 4 is a 1 m by 1 m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 130 pieces of thermally altered limestone, sandstone, and caliche that range in size from 3 cm to 13 cm, averaging 8 cm. The estimated depth is 10 cm, based on the mounding of the feature rock. The feature is tightly compact, with subsurface feature rock being exposed through erosion. No charcoal or ash staining were observed. The feature is 60 percent intact, having been impacted by bioturbation due to plant growth.

Feature 5 is a 1.0-m by 0.8-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 70 pieces of thermally altered limestone, sandstone, and caliche that range in size from 1 cm to 14 cm, averaging 10 cm. The estimated depth is 6 cm, based on the mounding of the feature rock. One exhausted brown quartzite core was noted. The cluster is tightly compact, with subsurface feature rock being exposed through erosion. No charcoal or ash staining were observed. The feature is 50 percent intact.

The southern and eastern site boundaries are defined by two large drainages. There is a two-track road running north to south approximately 50 m from the southwestern boundary. The site is located in an eolian, and alluvial depositional environment. Buried cultural material was observed to a depth of 30 cm based on a trowel test. The estimated depth of sedimentary deposits is greater than 30 cm.

Disturbances and Potential Impacts

The primary disturbance is water erosion. Wind erosion and bioturbation due to plant growth and cattle grazing have had a minimal effect. The site is between 51 percent and 75 percent intact.

Conclusions

LA 165669 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, as indicated by a lithic scatter lacking temporally diagnostic artifacts. The site contains an extensive assemblage of as-yet unrecorded artifacts and a suite of features that may yield additional significant data such as TL/OSL dates and residues. LA 165669 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165670

Field Number: 908-01-160
Category: 2
Affiliation: Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500)
Eligibility: Eligible, D
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165670 is a moderate artifact scatter [redacted] Vegetation on the site includes creosote, mesquite, catclaw acacia, tamarisk, sage, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

A judgmental sample (20 percent) of all observed artifacts was recorded. The assemblage consists of 116 flaked-stone artifacts, four pieces of groundstone, and 17 sherds. The flaked-stone assemblage includes of 100 pieces of debitage, eight cores, and eight tools. The debitage consists of 90 secondary reduction flakes (59 quartzite, 31 chert); nine tertiary reduction flakes (seven chert, two quartzite); and one piece of angular debris (chert). Quartzites occur in gray, brown, and red; cherts are gray, brown, white, and red. The cores include five quartzite multidirectional cores (four gray, one red and gray); one white chert multidirectional core; one brown quartzite bidirectional core; and one red quartzite unidirectional core. The tools consist of four quartzite choppers (three brown and one gray); one gray limestone chopper; one brown quartzite uniface; one brown quartzite scraper; and one gray chert biface. The groundstone includes three quartzite metate slab fragments and one sandstone metate slab fragment. The ceramics consist of four Jornada Brown sherds, seven El Paso Brown sherds, and six Chupadero Black-on-white sherds (Figure 3.95). Given a large artifact assemblage, it is likely that these sherds represent a broad period of time, ranging potentially from A.D. 200 to 1500, rather than a narrow occupation span.

Features and Site Structure

No features were observed. A two-track road runs northwest to southeast through the southern portion of the site, and stabilized coppice dunes are located throughout the eastern portion. Three drainages flowing east to west bisect the site.

The site is located on residuum and in an eolian, alluvial, and colluvial depositional environment. The estimated depth of sedimentary deposits is greater than 1 m. Buried cultural material was observed to a depth of greater than 1 m based on examination of the river terrace.

Figure 3.95: LA 165670 Chupadero Black-on-white Sherds.

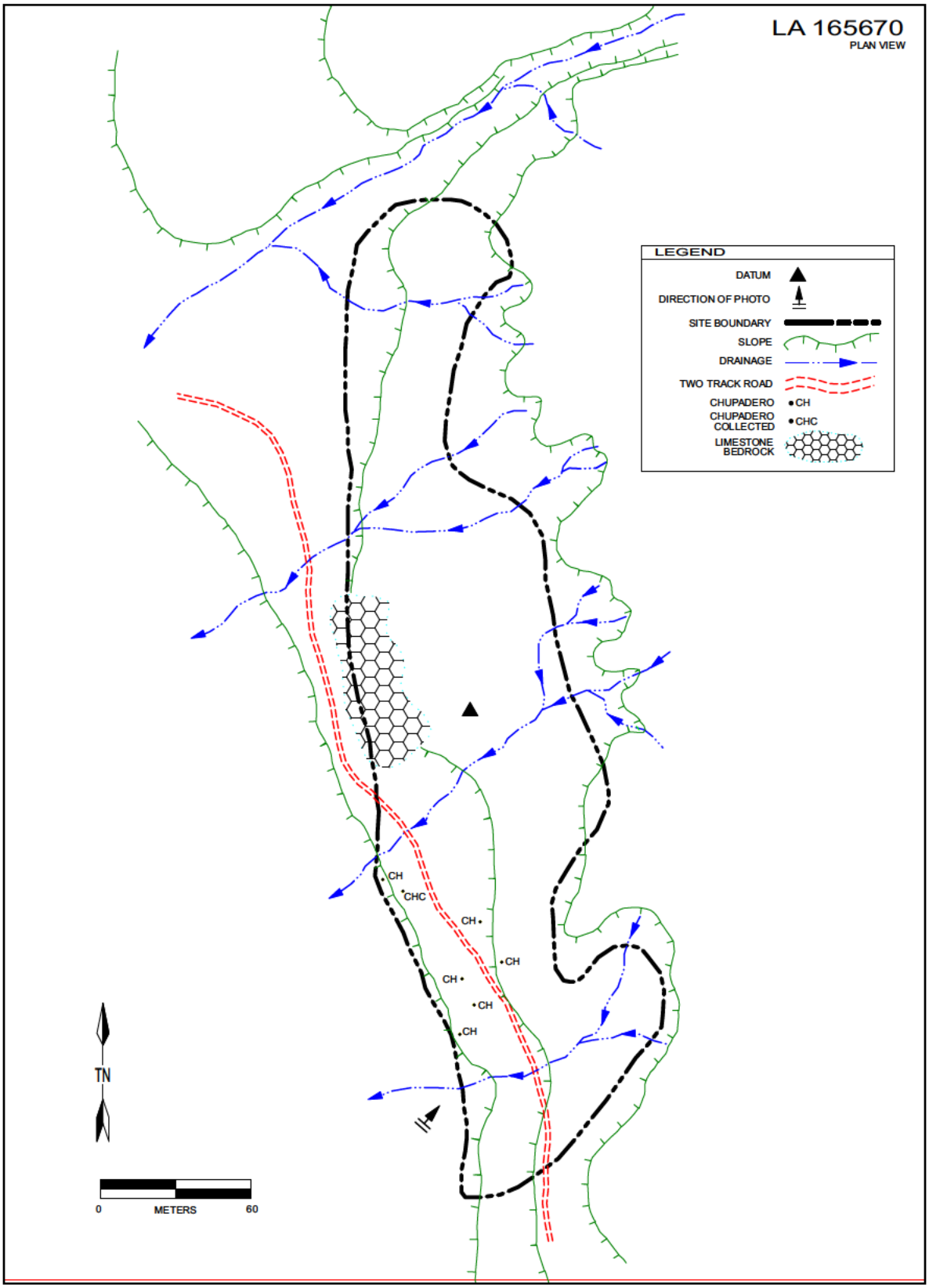

Figure 3.96: LA 165670 Site Map.

Disturbances and Potential Impacts

The primary disturbances to the site are the blading and chaining of the river terrace to remove vegetation and water erosion. Wind erosion and bioturbation due to plant growth and cattle grazing are secondary disturbances. LA 165670 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165670 has an Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500)

affiliation, as indicated by a quantitatively extensive artifact assemblage with pottery types potentially having a broad date range. Given the quantity of materials and presence of buried cultural deposits, the site is at least capable of yielding additional significant data concerning site function. The site is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165671

Field Number: 908-01-161
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165671 is a sparse artifact scatter [redacted] Vegetation on the site includes creosote, mesquite, catclaw acacia, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 28 flaked-stone artifacts, including 22 pieces of debitage, four cores, and two tools. The debitage consists of 20 secondary reduction flakes (18 quartzite, two red and clear chert); two tertiary reduction flakes (quartzite). The quartzites occur in gray, red, and brown. The cores include four quartzite multidirectional cores (two gray, one red, one brown). The tools consist of one brown chert scraper and one brown quartzite uniface.

Features and Site Structure

No features were observed. A mechanically made pit approximately 8 cm deep and measuring 1 m by 5 m is located on the northeast edge of the hilltop. This appears to be a recent excavation with an unknown purpose, possibly prospecting for quarrying material.

The site is located in an eolian and alluvial depositional environment. No buried cultural material was observed. The estimated depth of sedimentary deposits that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbance is water erosion and the possibly recent excavation activity. Wind erosion has minimally affected the site. LA 165671 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165671 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, based on the lack of temporally diagnostic artifacts. The site has a limited surface assemblage and a potential to yield additional data from buried contexts. It is uncertain if such deposits are present or what the data potential of such deposits may be. LA 165671 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165672

Field Number: 908-01-162
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165672 is a sparse artifact scatter [redacted] Vegetation on the site includes creosote, mesquite, catclaw acacia, little-leaf horse brush, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 17 flaked-stone artifacts, including 11 pieces of debitage, four cores, and two tools. The debitage consists of 11 secondary reduction flakes (seven quartzite, four chert). Quartzites occur in

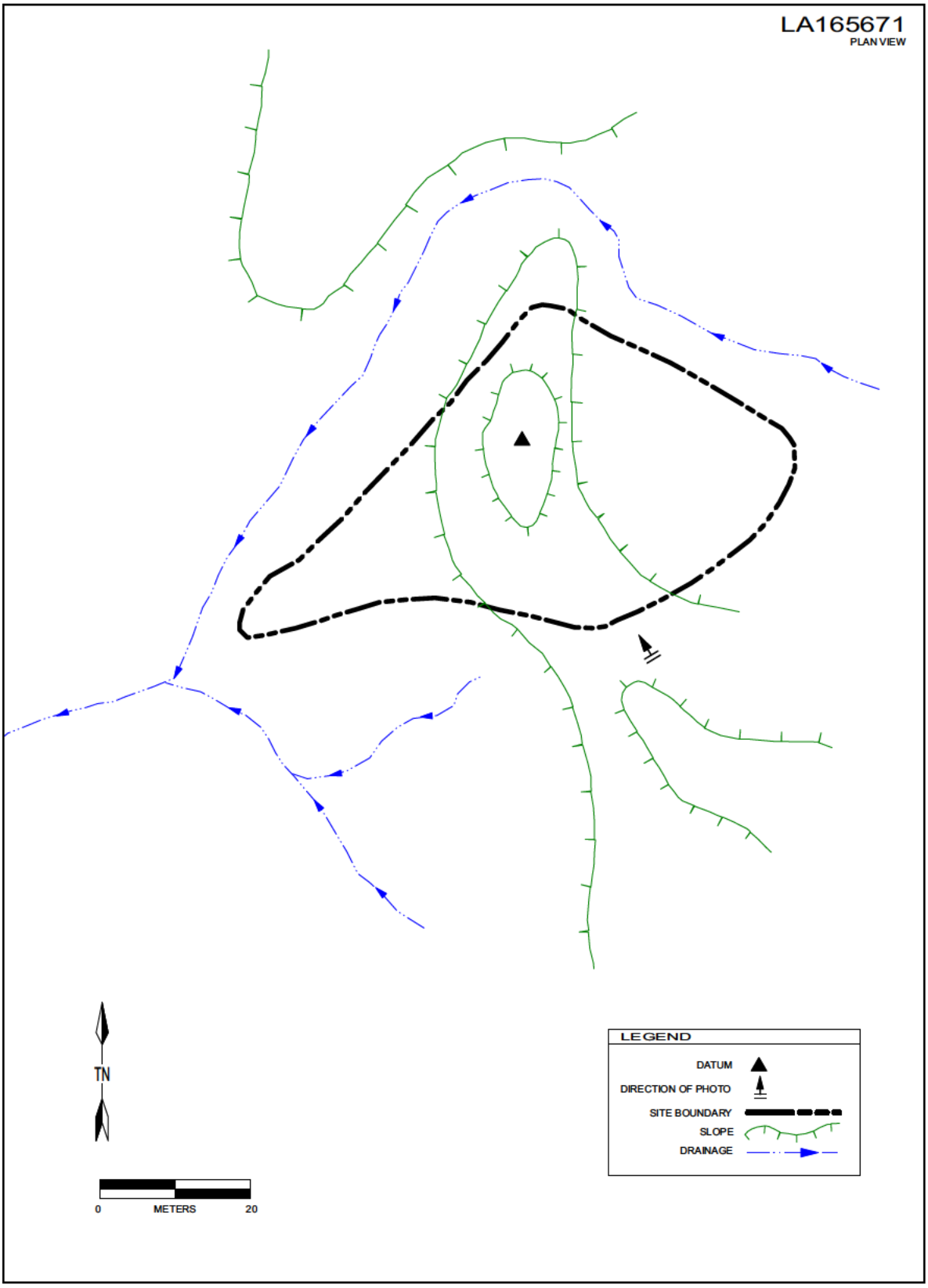

Figure 3.97: LA 165671 Site Map.

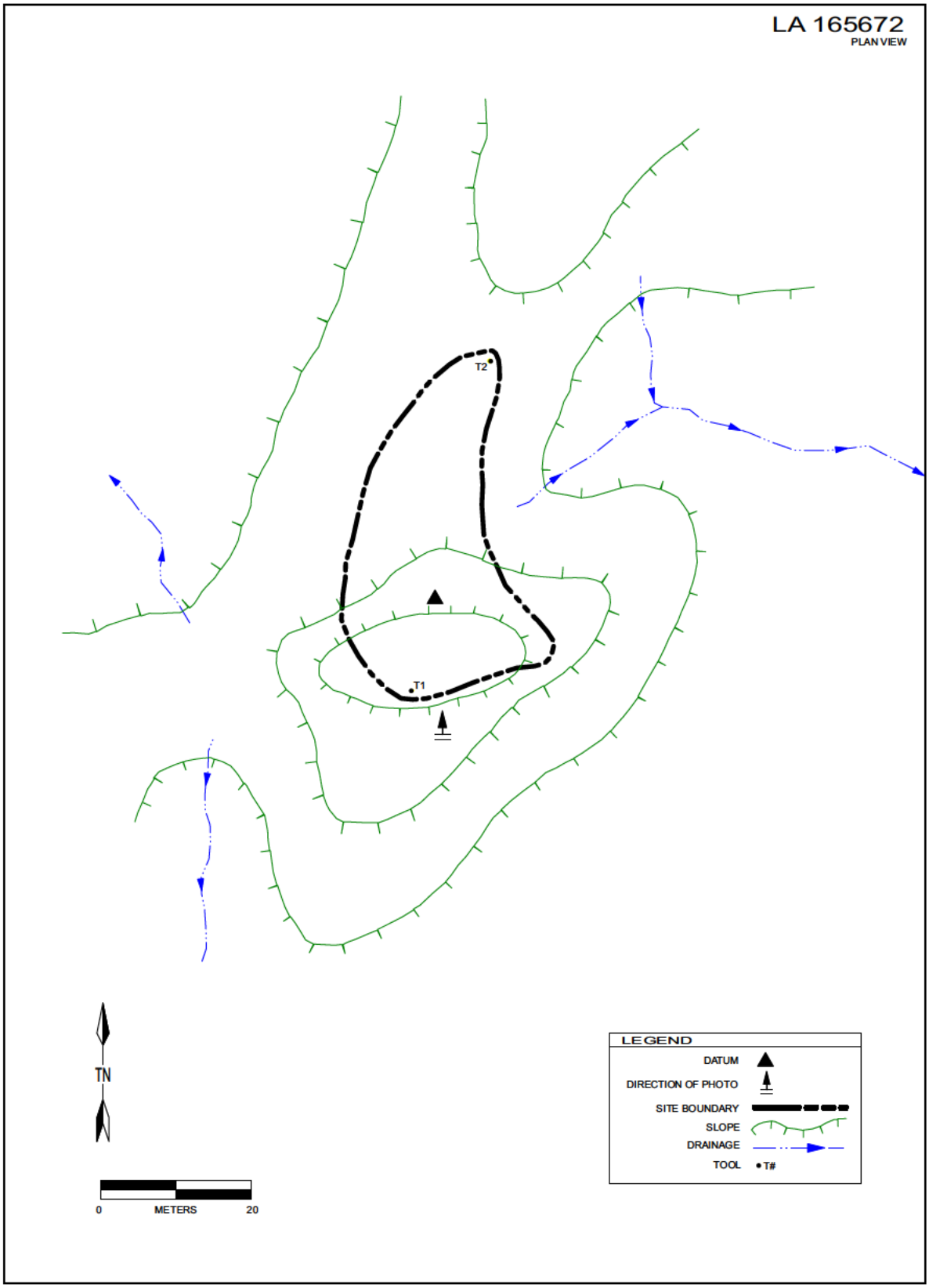

Figure 3.98: LA 165672 Site Map.

brown, red, and gray, and cherts are brown, green, and gray. The cores include one purple quartzite multidirectional core, one brown chert multidirectional core, one purple quartzite bidirectional core, and one brown quartzite unidirectional core. The tools consist of one white chert scraper and one brown quartzite chopper.

Features and Site Structure

No features were observed. The site is located on residuum and in an eolian and alluvial depositional environment. No buried cultural material was observed and the estimated depth of sedimentary deposits that could contain such material is unknown. Seventy-five percent of the site appears to be on bedrock

Disturbances and Potential Impacts

The primary disturbances are water erosion and wind erosion. LA 165672 is estimated to be 51 percent to 75 percent intact.

Conclusions

LA 165672 has been assigned an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, based on a lithic assemblage lacking temporally diagnostic artifacts. The potential of the site to contain buried cultural deposits and the nature, extents, or data potential of any such deposits is limited. The site therefore is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165673

Field Number: 908-01-163
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 200 to 1350)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 5

Description

LA 16567 [redacted] The site consists of nine features and a heavy artifact scatter (Figure 3.99). Vegetation includes creosote, crucifixion thorn, mesquite, and various grasses. Visibility is 76 percent to 99 percent.

Assemblage

A 10 percent sample of all observed artifacts was recorded. The assemblage consists of 123 flaked-stone artifacts, eight pieces of groundstone, and 10 sherds. The flaked-stone assemblage consists of 100 pieces of debitage, 12 cores, and 11 tools. The debitage includes 88 secondary reduction flakes (68 quartzite, 19 chert, one white chalcedony); 10 tertiary reduction flakes (chert); and two pieces of angular debris (chert). Quartzites occur in gray, brown, and red, and cherts are white and red, gray, gray and violet, black, brown, white and green. The cores consist of seven quartzite multidirectional cores (four gray, one red, one brown, one gray and yellow); two gray quartzite unidirectional cores; one gray quartzite tested cobble; and two brown quartzite bidirectional cores. The tools include five quartzite choppers (two gray, two brown, and one yellow and gray); two quartzite scrappers (one red and one yellow and gray); three chert scrapers (one green, one gray, and one brown); and one white chert uniface. The groundstone consists of two quartzite metate slab fragments, one sandstone metate slab fragment, one sandstone one-hand mano fragment, three quartzite whole one-hand manos, and one sandstone whole one-hand mano. The ceramics consist of five El Paso Brown sherds and five Jornada Brown sherds.

Features and Site Structure

Lone Mountain encountered nine features at LA 165673.

Feature 1 is a 2.8-m by 2.4-m concentration of approximately 50 pieces of burned caliche and fire-cracked rock. The rocks range in size from 2 cm to 6 cm, averaging 3 cm. Feature depth is unknown. The concentration is located in a blowout below two stabilized dunes. Eight primary quartzite flakes were noted. No charcoal or ash staining was observed. The feature is less than 25 percent intact.

Feature 2 is a 1.5-m by 1.2-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 30 rocks that range in size from 1 cm to 15 cm, averaging 4 cm. Feature depth is unknown. The concentration is eroding out of the side of a stabilized coppice dune. Two brown quartzite cores, one brown quartzite tested cobble, and three gray quartzite tertiary reduction flakes were noted. No ash staining or charcoal was observed. The feature is less than 30 percent intact.

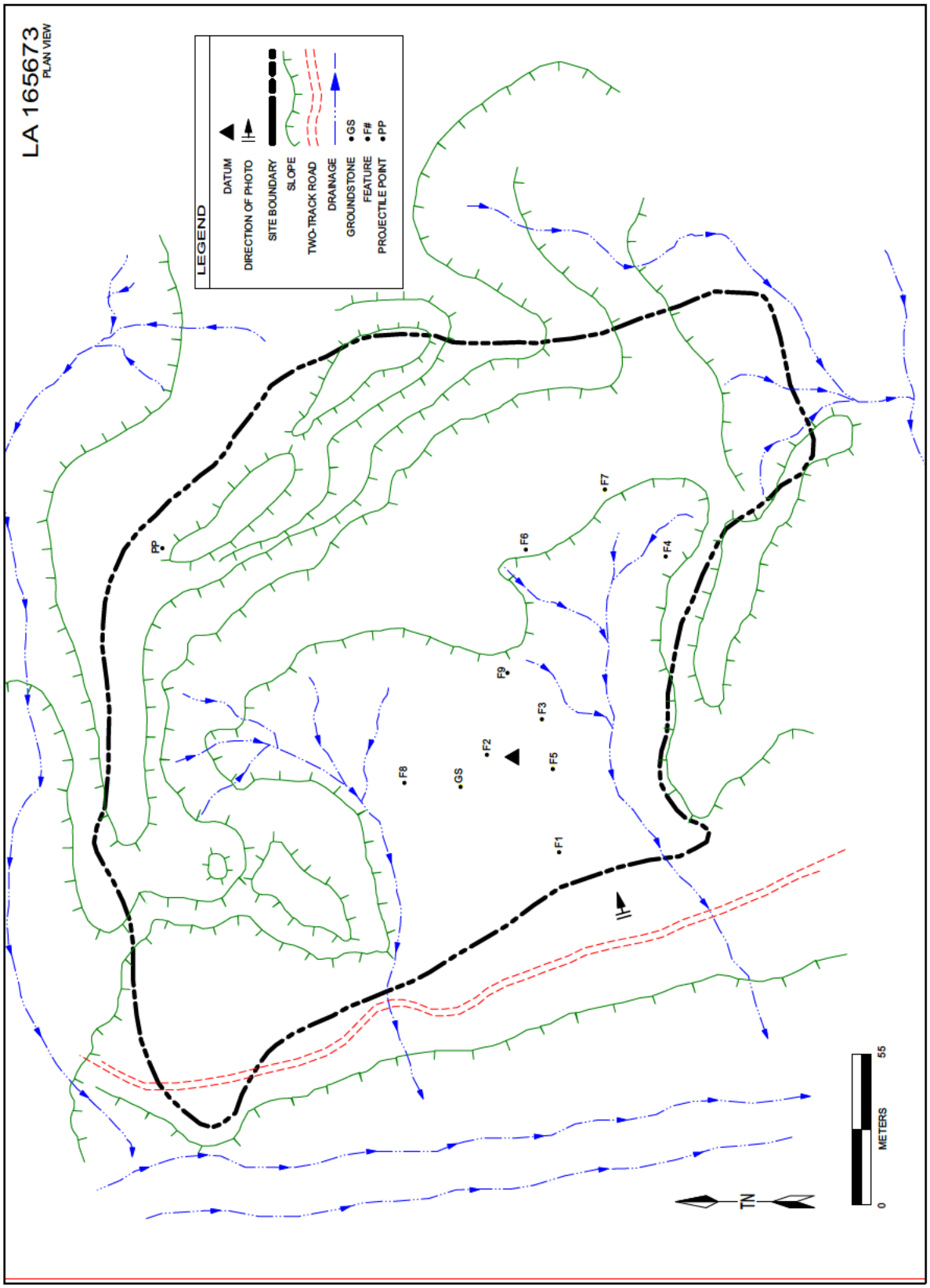

Figure 3.99: LA 165673 Site Map.

Feature 3 is a 3.5-m by 4.6-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 100 rocks that range in size from 2 cm to 12 cm, averaging 7 cm. Feature depth is unknown. The concentration was eroding out of the base of a stabilized coppice dune. Sixteen flakes, one hammerstone, two choppers, and four cores were noted. No charcoal or ash staining was observed. The feature is less than 40 percent intact.

Feature 4 is a 2.5-m by 1.7-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 60 rocks that range in size from 2 cm to 12 cm, averaging 4 cm. Feature depth is unknown. The concentration was eroding out of a stabilized coppice dune. Two quartzite tertiary reduction flakes were noted. No charcoal or ash staining was observed. The feature is less than 20 percent intact.

Feature 5 is a 70-cm by 60-cm concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 30 rocks that range in size from 2 cm to 7 cm, averaging 4 cm. Feature depth is unknown. However, the concentration was eroding out of a stabilized coppice dune. No artifacts, charcoal, or ash staining were observed. The feature is less than 15 percent intact and badly deflated.

Feature 6 is a 1-m by 2-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 30 pieces of thermally altered rock and caliche that range in size from 1 cm to 6 cm, averaging 4 cm. Feature depth is unknown. The concentration was eroding out of a stabilized coppice dune. Two gray quartzite flakes were noted. No charcoal or ash staining was observed. The feature is less than 20 percent intact.

Feature 7 is a 1-m by 1-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 25 rocks that range in size from 2 cm to 10 cm, averaging 4 cm. Feature depth is unknown. The concentration was eroding out of a stabilized coppice dune. No artifacts, charcoal, or ash staining were observed. The feature is less than 25 percent intact.

Feature 8 is a 1-m by 1-m concentration of burned caliche and fire-cracked rock with a soil stain. The concentration consists of approximately 20 pieces of thermally altered rock and caliche that range in size from 1 cm to 8 cm, averaging 4 cm. Feature depth is unknown. Several flakes, a biface, and a tested cobble were noted. No charcoal was observed. The feature is less than 10 percent intact, having been disturbed by water erosion.

Feature 9 is a 3-m by 2-m concentration of burned caliche and fire-cracked rock. The concentration consists of approximately 100 rocks that range in size from 1 cm to 8 cm, averaging 5 cm. Feature depth is unknown. Several flakes, cores, and one chopper were noted. No charcoal or ash staining was observed. The feature is less than 30 percent intact.

A U-shaped system of hills surrounds the site area to the north, east, and south. A large drainage defines the eastern boundary and a dirt two-track road runs north to south along the western boundary.

The site is located on residuum in an eolian and alluvial depositional environment. The estimated depth of sedimentary deposits is greater than 1 m as suggested by the height of surrounding dunes. Buried cultural material is present to a depth of 20 cm, based on examinations of rodent borrows and observations of cultural material eroding from the sides of stabilized dunes.

Disturbances and Potential Impacts

The primary disturbances are water erosion and wind erosion. The site is between 51 percent and 75 percent intact.

Conclusions

Given an extensive artifact and feature assemblage, LA 165673 has an Unspecified Jornada Mogollon (A.D. 200 to 1350) component. Features at this site may yield TL/OSL dates and residue data. The site may contribute additional significant data toward addressing regional research questions concerning, at the least, chronology and subsistence. LA 165673 is recommended eligible for nomination to the NRHP under Criterion D.

LA 165674

Field Number: 908-1-164
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Possible Structure
Parcel: 5

Description

LA 165674 consists of a sparse artifact scatter and one feature [redacted] Local vegetation includes creosote, catclaw, little-leaf horse brush, and seasonal grasses Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage contains 10 pieces of flaked-stone debitage and six cores. The debitage includes 10 secondary reduction flakes (two gray quartzite, one gray chert, four red quartzite three brown quartzite). Cores include three multidirectional cores (one gray yellowish ortho-quartzite, one brown quartzite, one gray chert), two unidirectional cores (one gray yellowish ortho-quartzite, one gray quartzite), and one red quartzite tested cobble.

Features and Site Structure

One feature was observed. Feature 1, a deflated rock mound, is located on the flat top of a moderately-sized rise and measures 5.0 m N/S by 4.5 m E/W with a height of 0.5 m. Various-sized cobbles of several materials compose this oval-shaped feature, which has an open area 1 m in diameter. One gray quartzite secondary reduction flake is associated with the feature. Possible identifications include a disarticulated cairn or shrine, a pile of rocks intended to trap moisture for growing a particular plant, the remains of a structure or hunting blind, or some other feature type. The feature is estimated to be 40 percent intact.

The site is located in an eolian and alluvial depositional environment. There are no visible indications of buried cultural deposits. The depth of sediments possibly containing cultural deposits, as indicated by the placement of the datum nail, is 10 cm.

Disturbances and Potential Impacts

Sheetwash may have removed artifacts from the site. A shallow drainage bisects the site east to west along the northern edge. Ephemeral remains of old dirt two-track road are located approximately 12 m southeast of the feature and run northeast to southwest. Wind erosion, sheetwash, and plant growth are current sources of disturbance to the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165674 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, based on a lithic assemblage with no temporally diagnostic artifacts and a feature of unknown function. It is unknown whether buried cultural deposits or other sources of significant data are present, and what the nature, extents, or significance of any such deposits might be. LA 165674 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165675

Field Number: 908-1-165
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Possible Structure
Parcel: 5

Description

LA 165675 [redacted] consists of a lithic artifact scatter and one feature (Figure 3.101). Local vegetation includes creosote, catclaw, little-leaf horse brush, pencil cholla and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of 24 pieces of flaked-stone debitage, two cores, and three flaked-stone tools. The debitage includes 23 secondary reduction flakes (seven brown quartzite, three red chert, three chocolate chert, four gray quartzite, one brown chert, four red quartzite, one gray chert) and one gray chert tertiary reduction flake. Cores include two multidirectional cores (one brown quartzite, one reddish white chert). Tools are two quartzite scrapers (one pink, one brown) and one brown quartzite chopper.

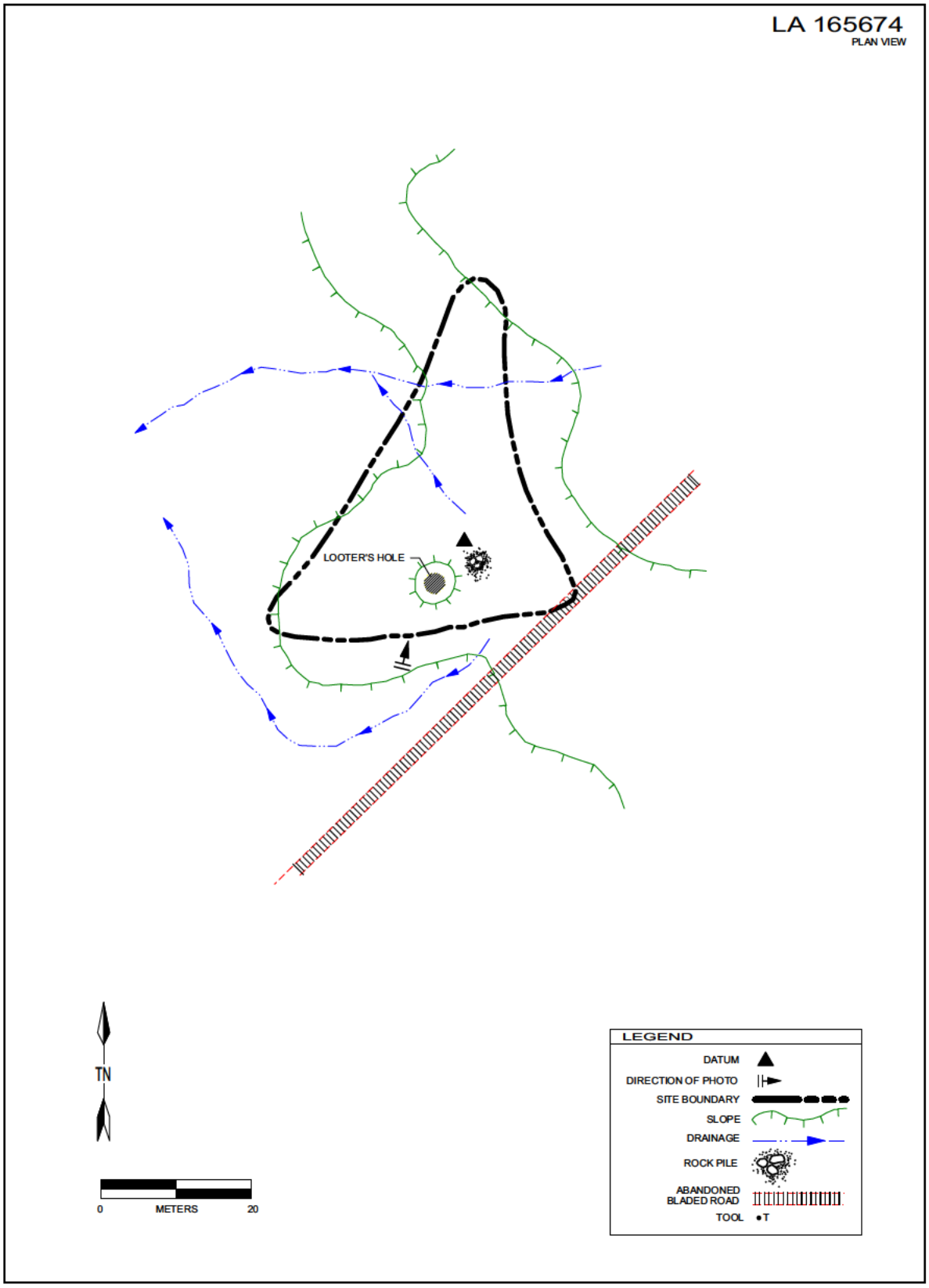

Figure 3.100: LA 165674 Site Map.

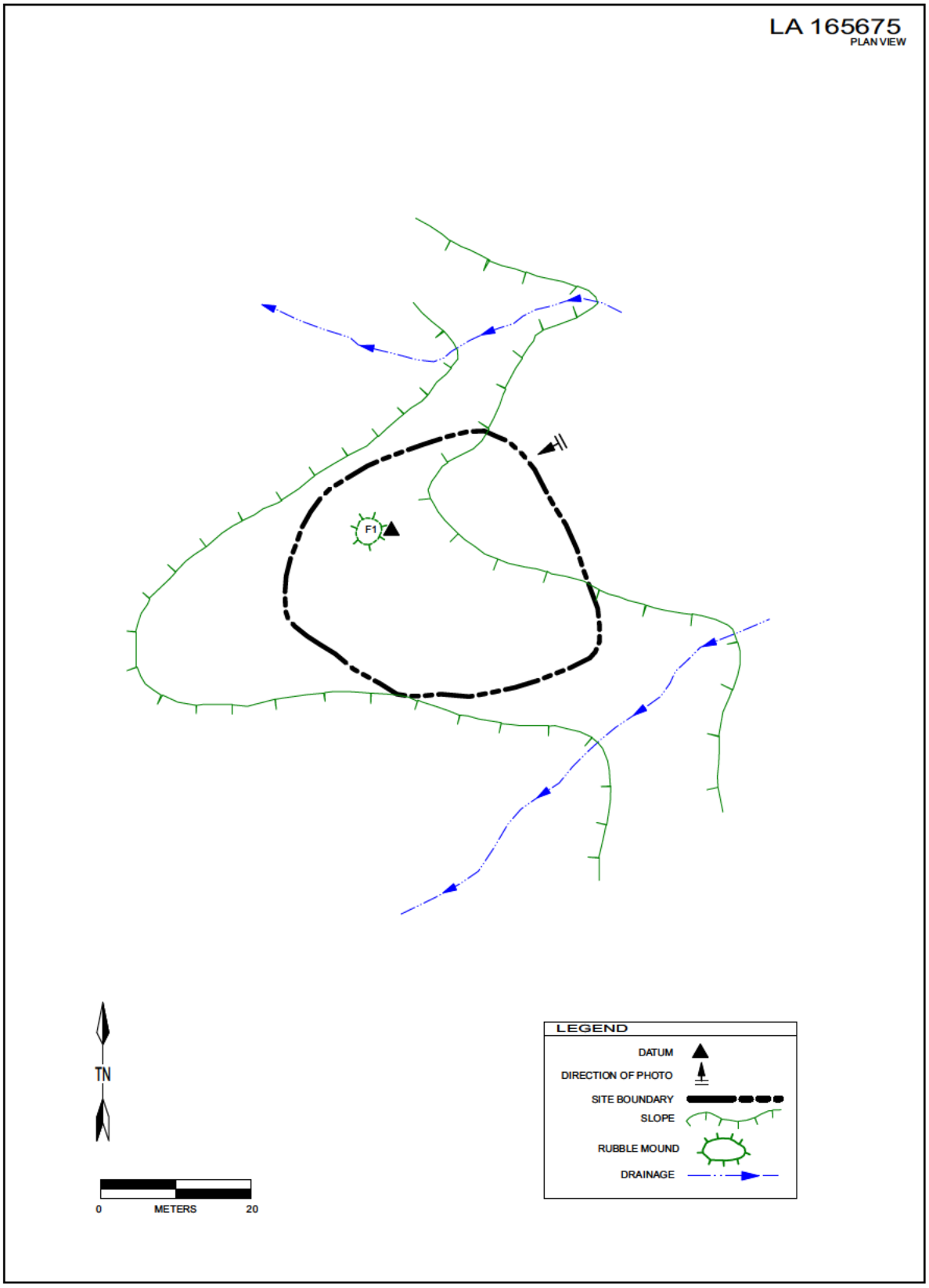

Figure 3.101: LA 165675 Site Map.

Features and Site Structure

Lone Mountain encountered one feature in this location. Feature 1, located in the western portion of the site, is a 3-m N/S by 3-m E/W limestone rubble mound with a height of 0.4 m. A sparse artifact scatter surrounds the feature. Possible identifications of this feature include a disarticulated cairn or shrine, a pile of rocks intended to trap moisture for growing a particular plant, the remains of a structure or hunting blind, or some other feature type. The feature is estimated to be 40 percent intact.

The site is located in an eolian and alluvial depositional environment. No clear evidence of cultural deposits was apparent in this location. The estimated depth of any cultural deposits is less then 10 cm, as indicated by the placement of the datum nail.

Disturbances and Potential Impacts

Wind erosion, heavy sheetwashing, and plant growth had have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165675 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, as indicated by a lithic scatter lacking temporally diagnostic artifacts and a feature of unknown function. There is no evidence for or against the presence of buried cultural deposits. The site has a potential to retain buried cultural deposits, but the nature, extents, and data potential of any such deposits is unknown. LA 165675 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165676

Field Number: 908-1-166
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 5

Description

LA 165676 is a lithic artifact scatter [redacted] Local vegetation includes creosote, catclaw, and grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage contains 21 pieces of flaked-stone debitage and one core. The debitage includes 18 secondary reduction flakes (two brown quartzite, two gray yellowish ortho-quartzite, four gray quartzite, one white chalcedony, five red quartzite, four brown grayish chert); two tertiary reduction flakes (one brown quartzite, one brown grayish chert); and one piece of clear reddish chalcedony angular debris. The core is a gray chert multidirectional core.

Features and Site Structure

Lone Mountain did not encounter any features at this location. The site is located in an eolian and alluvial depositional environment. A dense compact layer of alluvial gravels and cobbles accounts for 90 percent of the surface, indicating little to no potential for buried cultural deposits.

Disturbances and Potential Impacts

Wind erosion, heavy sheetwashing, and plant growth have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165676 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, as the site has a lithic artifact assemblage with no temporally diagnostic artifacts. The site is located on a compact gravel and cobble bed and is unlikely to contain buried cultural deposits. LA 165676 is unlikely to yield any additional significant data and is recommended ineligible for nomination to the NRHP under any of the four criteria.

LA 165677

Field Number: 908-1-167
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 5

Description

LA 165677 [redacted]. The site consists of a very sparse artifact scatter and one feature (Figure 3.103). Local vegetation includes creo-

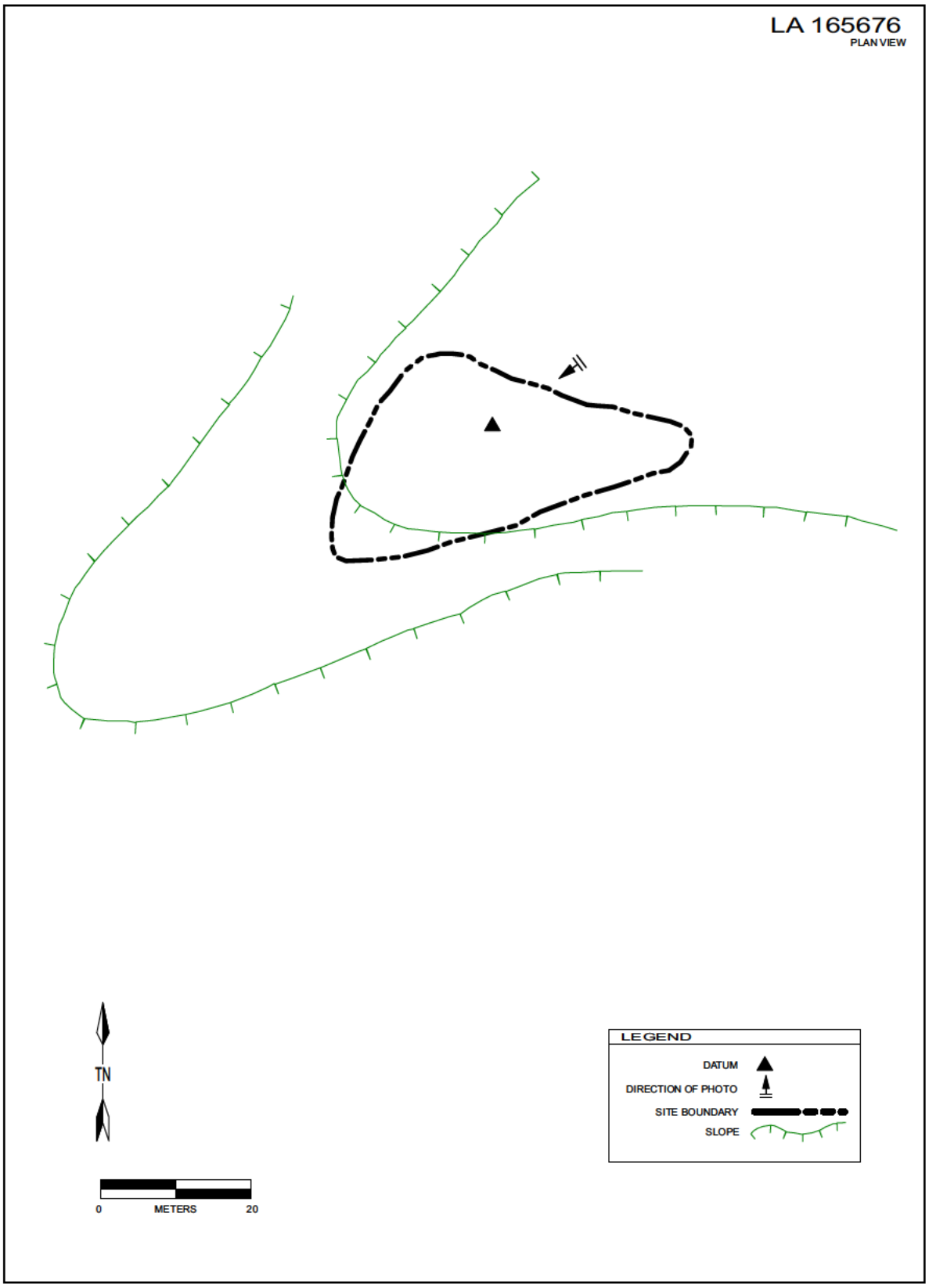

Figure 3.102: LA 165676 Site Map.

sote, catclaw, little-leaf horse brush, yucca, and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of five pieces of flaked-stone debitage and one flaked-stone tool. The debitage includes four secondary reduction flakes (two gray quartzite, one white chert, one brownish white chert) and one piece of brown quartzite angular debris. The tool is a complete brown quartzite scraper.

Features and Site Structure

Lone Mountain archaeologists located a single feature. Feature 1 is located in the southern portion of the site and is a 1-m diameter roughly circular fire-cracked rock concentration with an associated ash stain. There are approximately 100 pieces of thermally altered material, ranging in size from 6 cm to 11 cm, with an average size of 8 cm. One piece of flaked-stone debitage (brown quartzite) and one scraper tool (brown quartzite) are associated with the feature. A trowel test revealed that the staining has a depth of 4 cm. The feature is at least 35 percent intact.

The site is located in an eolian and alluvial depositional environment, and much of the site is covered by gravels and cobbles. A trowel test performed in Feature 1 suggests that cultural deposits are present to a depth of 4 cm.

Disturbances and Potential Impacts

Wind erosion, heavy sheetwashing, and plant growth had have disturbed the site, leaving it 51 percent to 75 percent intact.

Conclusion

LA 165677 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, as the site thus far has a lithic assemblage with no temporally diagnostic artifacts. The site has a feature that is capable of yielding radiocarbon dates and macro/microbotanical samples. These additional data are capable of addressing regional research questions. LA 165677 is therefore recommended eligible for nomination to the NRHP under Criterion D.

LA 165678

Field Number: 908-1-168
Category: 1
Affiliation: Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1885 to 2010)
Eligibility: Undetermined
Site Type: Artifact Scatter/Possible Burial
Parcel: 5

Description

LA 165678 [redacted] The site consists of a very sparse lithic artifact scatter and one feature of historic or recent affiliation (Figure 3.104). Local vegetation includes creosote, catclaw, snakeweed, and seasonal grasses. Surface visibility is between 76 percent and 99 percent.

Assemblage

All observed artifacts were recorded during this investigation. The assemblage consists of six pieces of flaked-stone debitage, four cores, weathered wood with wire nails, and wire. The debitage includes six secondary reduction flakes (three brown quartzite, two purple quartzite, one white clear white chalcedony). Cores are two brown quartzite unidirectional cores, one gray quartzite bifacial core, and one gray quartzite tested cobble. Wire nails, weathered wood, and wire are present that may be associated with Feature 1, as described below. Iron wire nails became available in the mid 1880s and were replaced by steel wire nails in the early 1890s.

Features and Site Structure

One feature were observed. Feature 1, located in the western portion of the site is a 1.5-m diameter deflated dirt mound with approximately 40 small cobbles placed on it. On the eastern edge of the feature is a 15-cm (6-inch) high by 5-cm (2-inch) wide badly weathered wooden stake. Within 5 m downslope to the west are additional fragments of weathered wood, wire, and wire nails. There is a 5-cm (2-inch) diameter by 20-cm (8-inch) high iron pipe that has been stuck into the ground 3 m east of Feature 1. The function of Feature 1 is not clear, but the size and shape suggest that it may represent a Historic or Recent burial, with the scattered wood representing the remains of the grave marker. This possible identification is speculative.

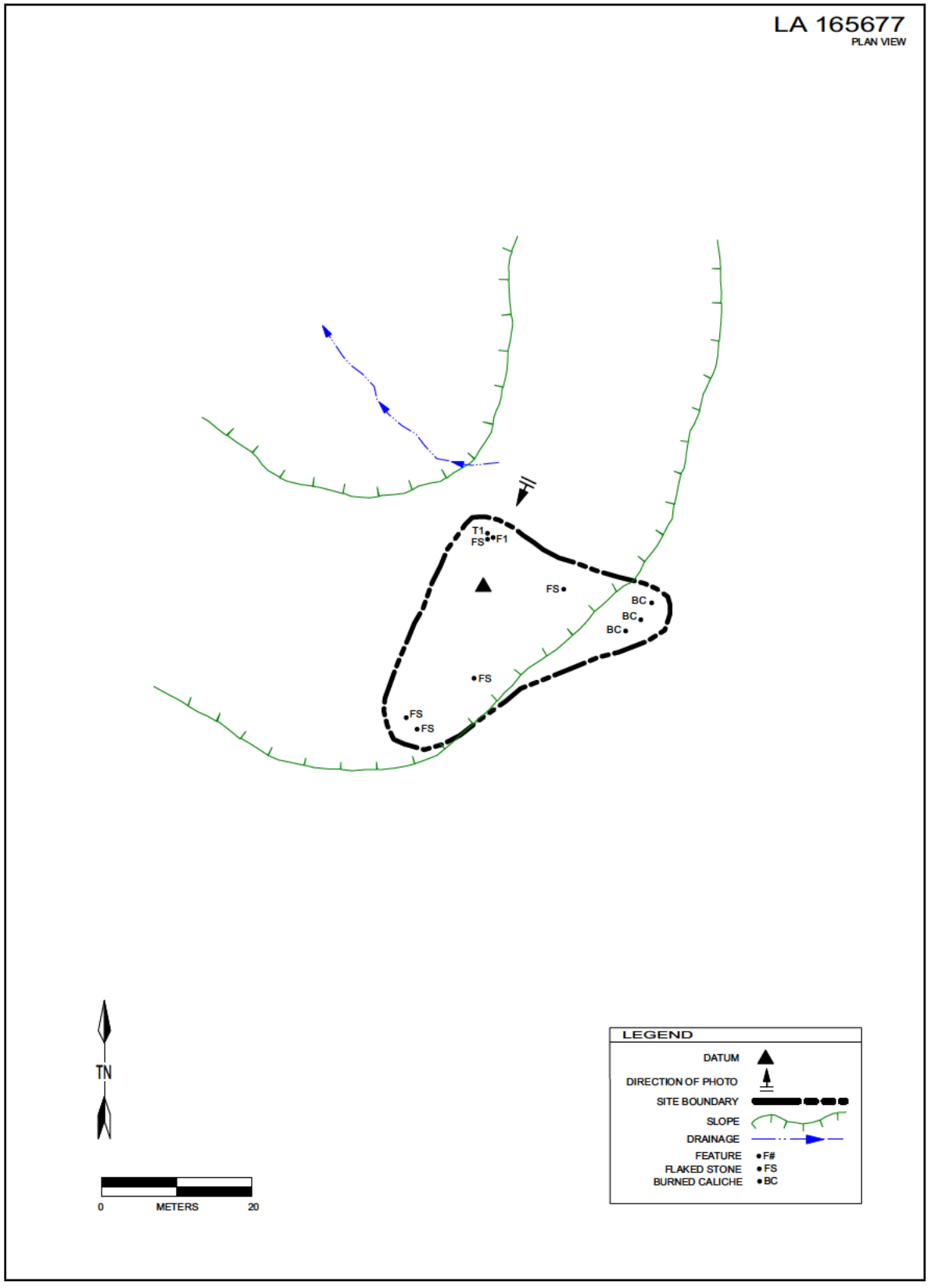

Figure 3.103: LA 165677 Site Map.

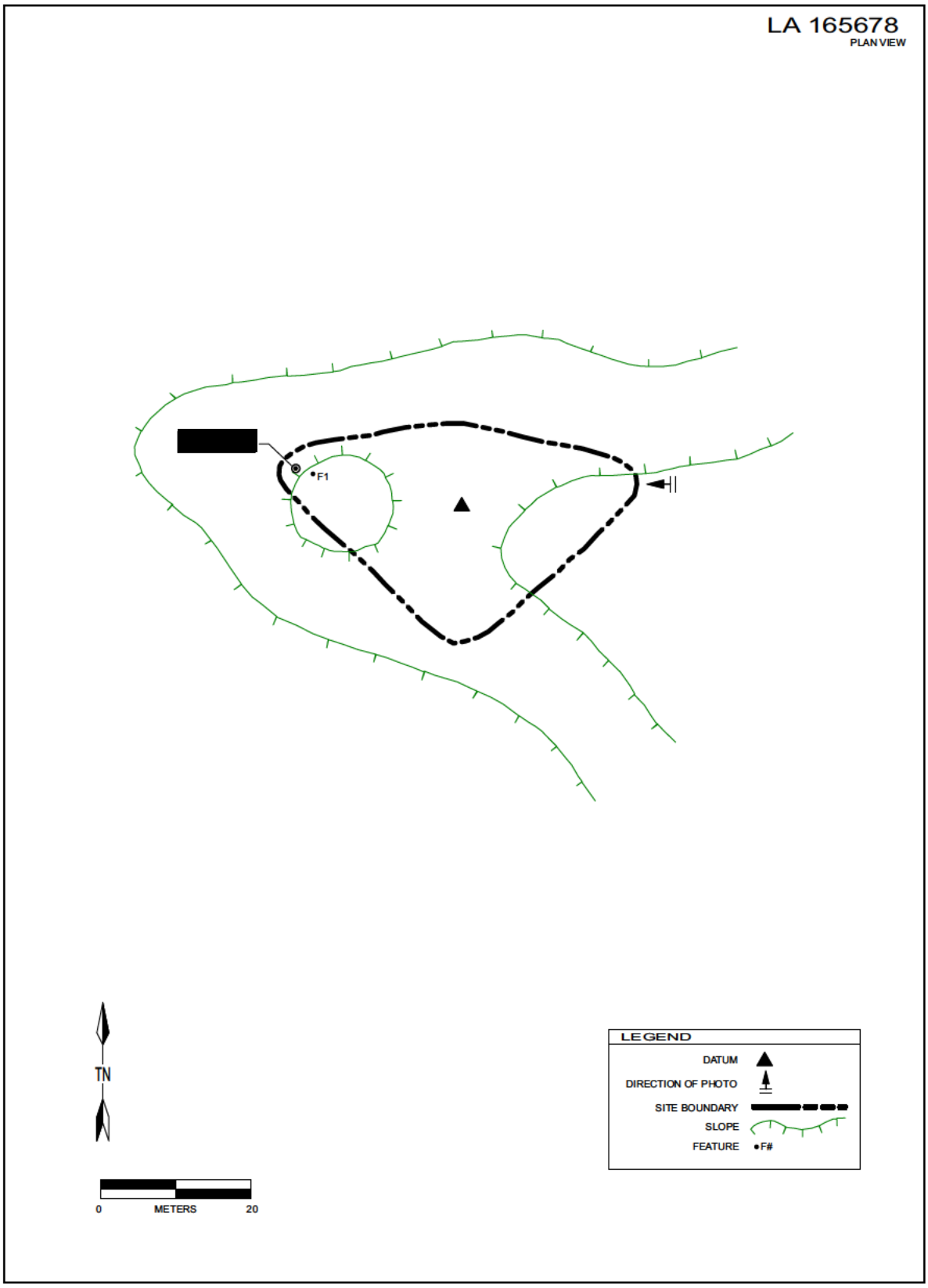

Figure 3.104: LA 165678 Site Map.

The site is located in an eolian and alluvial depositional environment. Alluvial gravels cover much of the surface. No subsurface deposits were observed on the site.

Disturbances and Potential Impacts

Wind erosion and sheetwashing have disturbed the site. Heavy sheetwash has likely scattered artifacts and possibly portions of Feature 1. LA 165678 is estimated to be between 51 percent and 75 percent intact.

Conclusion

LA 165678 has Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1885 to 2010) temporal and cultural affiliations, based on the character of the assemblage. It is uncertain whether any buried cultural deposits are present. The gravelly surface suggests that it is implausible for significant aboriginal deposits to be present in this location, but the possible identification of Feature 1 as a burial argues for the presence of significant buried cultural deposits. If Feature 1 is some sort of mechanical push pile associated with the dismantling of a windmill or some other ranching facility, it would arguably have no significance whatsoever. Without a clear identification for Feature 1, the eligibility of LA 165678 is recommended to be undetermined.

LA 165679

Field Number: 908-01-200
Category: 2
Affiliation: Unspecified Jornada Mogollon (A.D. 400 to 1300) and Unknown Historic (A.D. 1935 to 1960)
Eligibility: Eligible, D
Site Type: Domestic Feature
Parcel: 4

Description

LA 165679 [redacted] The site consists of one feature and a light artifact scatter (Figure 3.105). Vegetation includes creosote, mesquite, snakeweed, various grasses, and various forbs. Visibility is 26 percent to 50 percent.

Assemblage

Lone Mountain recorded all visible artifacts. The assemblage consists of 73 flaked-stone artifacts, three groundstone artifacts, three prehistoric ceramics, and 110 historic artifacts including 51 cans, 41 pieces of glass, 10 historic ceramics, and eight bricks. The flaked-stone assemblage consists of 66 pieces of debitage and seven cores. The debitage includes one primary reduction flake (chert); 22 secondary reduction flakes (19 chert, three quartzite); 33 tertiary reduction flakes (21 chert, four clear and white chalcedony, 8 quartzite); four thinning flakes (three chert, one quartzite); and 6 pieces of angular debris (three chert, three quartzite). Quartzite occurs in purple, gray, and brown. Cherts occur in gray, white, brown black, and red. The cores consist of one tan chert multidirectional core, one brown quartzite multidirectional core, one clear and white chalcedony multidirectional core, two chert bidirectional cores (one red and brown, and one brown); and two chert unidirectional cores (one black, and one tan and brown). The groundstone includes one limestone indeterminate metate fragment, one sandstone indeterminate metate fragment, and one sandstone one-hand mano fragment. The prehistoric ceramics consist of three El Paso Brown sherds. The cans include 49 crushed cans (six venthole, 17 church-key opened beverage, 21 sanitary, three score-strip, and two tobacco) and two intact church-key opened cans with a diameter of 6 ¾ in and a height of 12 in. The bricks consisted of a pile of eight bricks all measuring 19 ½ in by 12 ½ in by 4 ½ in with no markings. The glass includes 38 bottle body shards (22 clear and 16 green), one clear bottle base shard, and two clear bottle finish shards. The historic ceramics consist of 10 semi-porcelain white-glazed sherds.

Features and Site Structure

One feature was observed on the site. Feature 1 is a 2-m by 1-m burned caliche and fire-cracked rock concentration. The concentration consists of approximately 120 pieces of thermally-altered limestone and caliche that range in size from 1 cm to 13 cm, averaging 8 cm. Estimated depth is 1 cm, based on the mounding of the feature. No artifacts, charcoal, or ash staining were observed. The feature is 20 percent intact and has been affected by water erosion and bioturbation from plant growth.

Large arroyos border the southwest and northeast edges of the site. The southern boundary is the edge of the terrace, which descends 9 m onto the Pecos River flood plain.

The site is located in an alluvial depositional environment. No evidence for buried cultural material was observed. No estimate for depth of sediment deposits that could contain buried cultural material could be made.

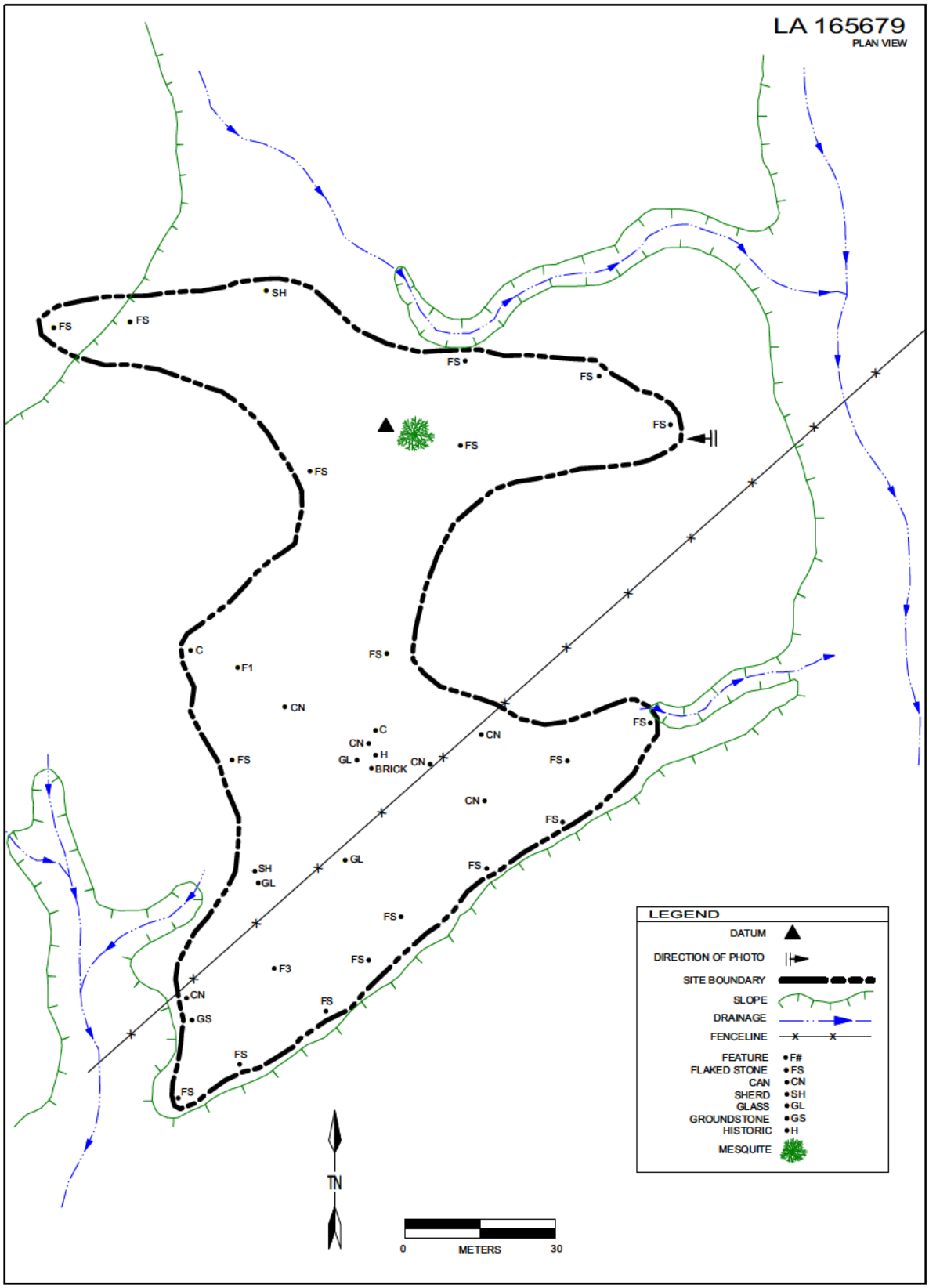

Figure 3.105: LA 165679 Site Map.

Disturbances and Potential Impacts

The primary disturbances to LA 165679 are water erosion, wind erosion, and bioturbation. The site is between 26 percent and 50 percent intact.

Conclusions

LA 165679 has Unspecified Jornada Mogollon (A.D. 400 to 1300) component and an Unknown Historic (A.D. 1935 to 1960) affiliations, as suggested by the temporally diagnostic artifacts in the assemblage. Although the feature at LA 165679 appears to lack stained sediments or charcoal suitable for radiocarbon dating, the feature may still yield TL/OSL dates and lipid residues. Such data would be significant in addressing regional research questions. LA 165679 is recommended eligible for nomination to the NRHP under Criterion D.

LA 165680

Field Number: 908-01-201
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165680, [redacted] consists of a light artifact scatter. [redacted] Vegetation includes creosote and mesquite. Visibility is 26 percent to 50 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 45 flaked-stone artifacts, including 42 pieces of debitage and three cores. The debitage consists of three primary reduction flakes (three chert); 11 secondary reduction flakes (two purple quartzite, eight chert, one clear and white chalcedony); eight tertiary reduction flakes (three purple quartzite, four, one clear and white chalcedony); 19 thinning flakes (chert); and one piece of angular debris (chert). Cherts occur in tan, gray, brown, white, red, and black. The cores are comprised of one purple quartzite tested cobble, one purple quartzite multidirectional core, and one brown chert bidirectional core.

Features and Site Structure

No features were observed, although artifacts are concentrated to the southwest of a stand of mesquite. Concentration 1 is approximately 5 m in diameter and contains 37 pieces of flaked-stone debitage, 19 of which are thinning flakes.

The site is located in an alluvial depositional environment. No buried cultural material was observed and the depth of sediment deposits that could contain buried cultural material is unknown.

Disturbances and Potential Impacts

The primary source of disturbance to the site is water erosion. A secondary source of disturbance is wind erosion. The site is estimated to be 26 percent to 50 percent intact.

Conclusions

LA 165680 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural component, given a lithic assemblage lacking any temporally diagnostic artifacts. It is unknown whether the site contains any buried cultural deposits or any other potential sources of significant data. LA 165680 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165681

Field Number: 908-01-202
Category: 1
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Quarrying
Parcel: 4

Description

LA 165681, [redacted] consists of a light artifact scatter (Figure 3.107). Vegetation includes mesquite, creosote, little-leaf horse brush, acacia, snakeweed, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 13 flaked-stone artifacts, including 10 pieces of debitage, and three cores. The debitage consists of two primary reduction flakes (one quartzite, one chert); four secondary reduction flakes (one quartzite, three chert); two tertiary reduction flakes

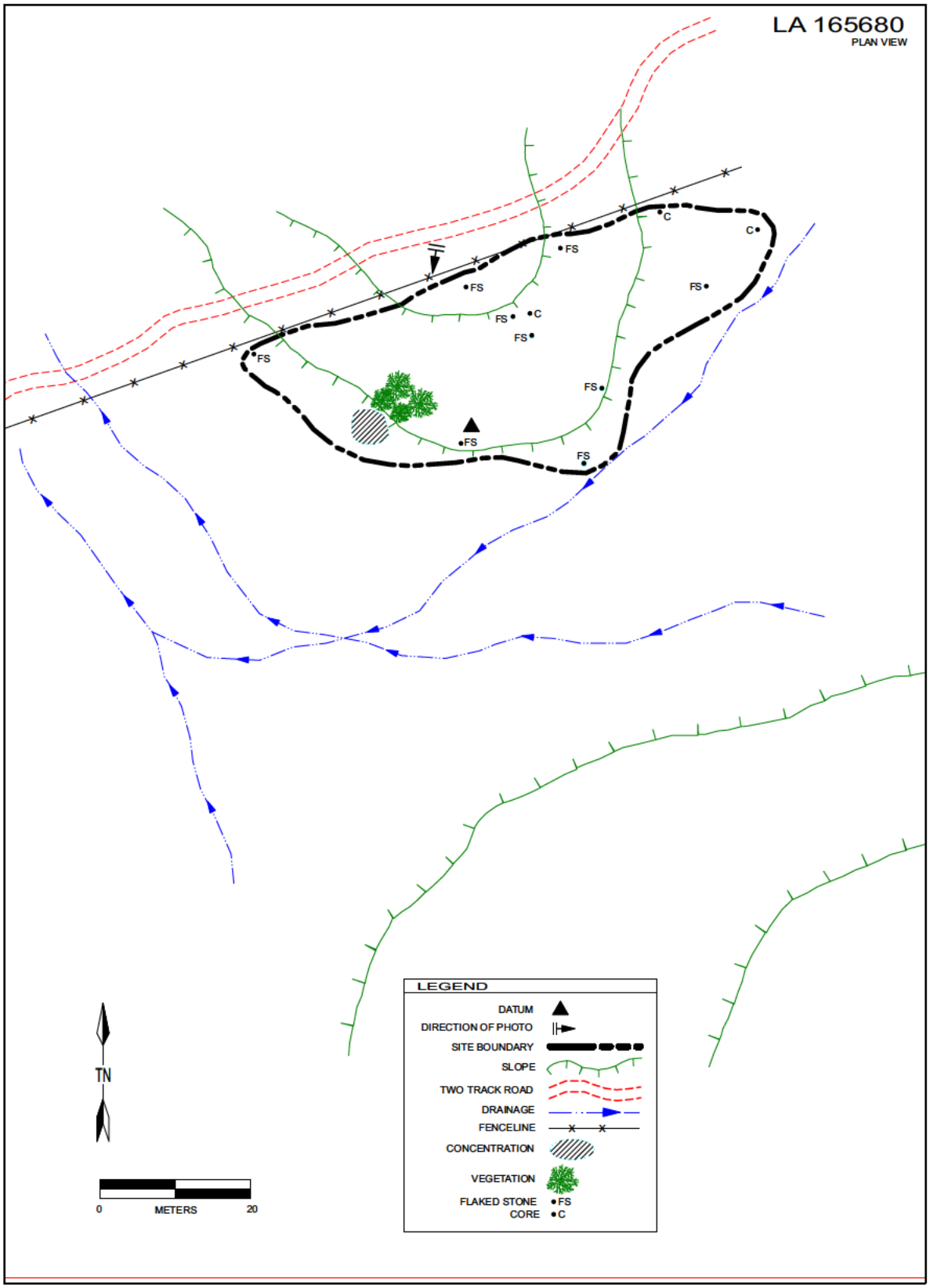

Figure 3.106: LA 165680 Site Map.

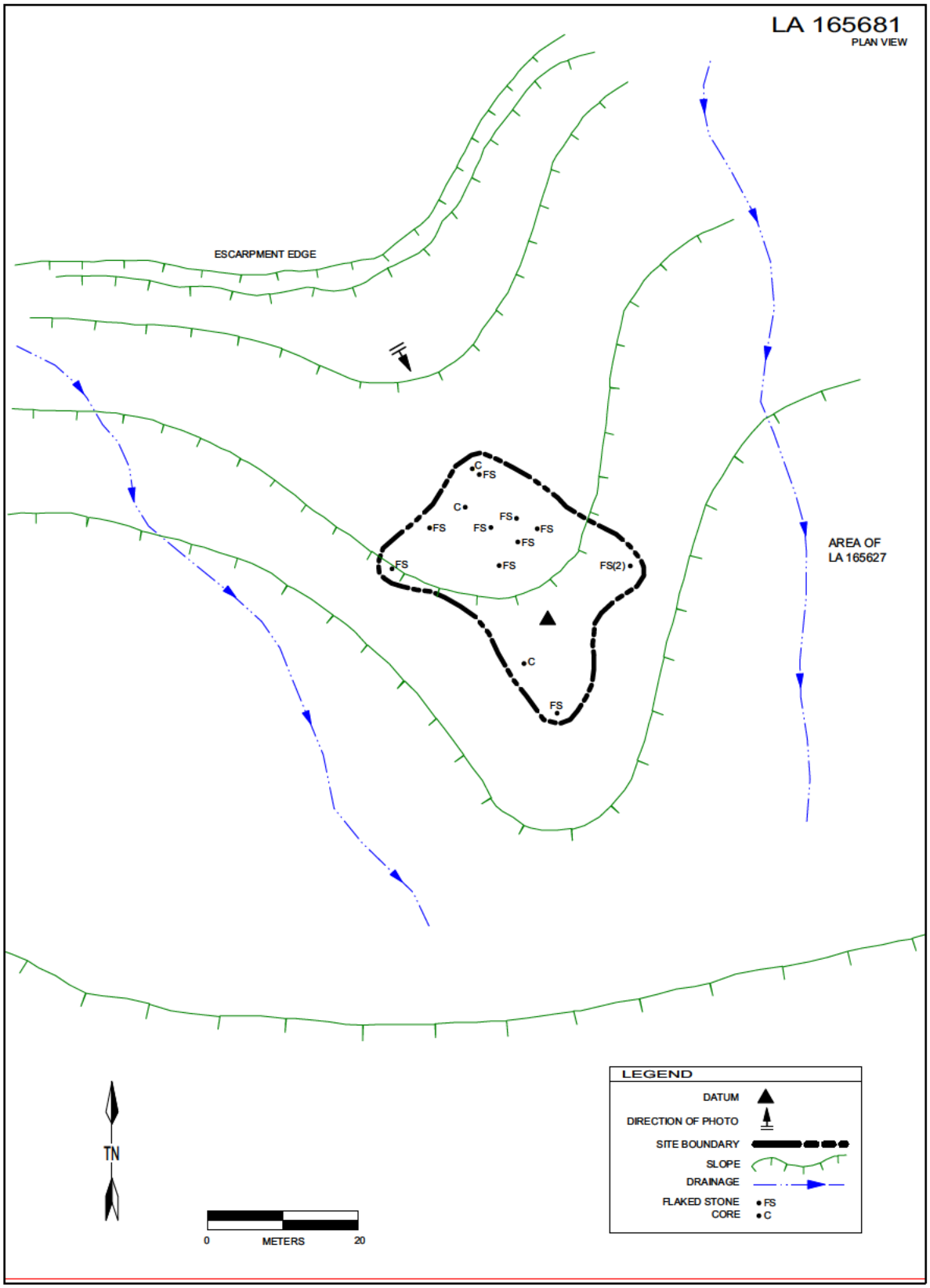

Figure 3.107: LA 165681 Site Map.

(chert); one thinning flake (quartzite); and one piece of angular debris (quartzite). Cherts occur in white, gray, and brown. Quartzites are brown and purple. The cores include one gray chert multidirectional core, one purple quartzite unidirectional core, and one gray, brown, and red chert bidirectional core.

Features and Site Structure

No features were observed. The site is located in a colluvial, eolian, and alluvial depositional environment. No buried cultural material was observed and the depth of sediment deposits that could contain buried cultural material is unknown. Natural chert and quartzite cobbles are eroding out of the dunes and slopes on the site.

Disturbances and Potential Impacts

The primary disturbance is water erosion. A secondary disturbance is wind erosion. The site is estimated to be 26 percent to 50 percent intact.

Conclusions

LA 165681 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, given a lithic assemblage with no temporally diagnostic artifacts. It is unknown whether the site has any buried cultural deposits or what data potential any such deposits may have. LA 165681 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165682

Field Number: 908-01-203
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Ineligible
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165682 [redacted] consists of a sparse artifact scatter (Figure 3.108). Vegetation includes acacia, crucifixion thorn, creosote, various grasses, and various forbs. Surficial visibility is 76 percent to 99 percent.

Assemblage

All observed artifacts were recorded. The assemblage consists of 28 flaked-stone artifacts, including 25 pieces of debitage and three cores. The debitage consists of one primary reduction flake (quartzite); eight secondary reduction flakes (one quartzite, seven chert); 15 tertiary reduction flakes (quartzite); and one piece of angular debris (quartzite). Quartzites occur in purple and brown. Cherts occur in red, brown, and black. The cores include one purple quartzite bidirectional core, one purple quartzite multidirectional core, and one tan chert bidirectional core.

Features and Site Structure

No features were observed. The site is located on residuum. No buried cultural material was observed and the depth of sedimentary deposits that could contain buried cultural material is estimated to be less than 5 cm.

Disturbances and Potential Impacts

The primary source of disturbance to LA 165682 is water erosion. A secondary source of disturbance is wind erosion. The site is estimated to be 26 percent to 50 percent intact.

Conclusions

LA 165682 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) component, as indicated by a lithic assemblage lacking temporally diagnostic artifacts. The site is on very shallow residuum and is therefore unlikely to contain any additional cultural material in buried contexts. LA 165682 is therefore recommended ineligible for nomination to the NRHP under any of the four criteria.

LA 165683

Field Number: 908-01-204
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165683 is a sparse lithic artifact scatter [redacted] Vegetation on the site includes acacia, crucifixion thorn, creosote, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The artifact assemblage encountered at LA 165683 consists of 24 flaked-stone artifacts, including 20 pieces of debitage and four cores. The deb-

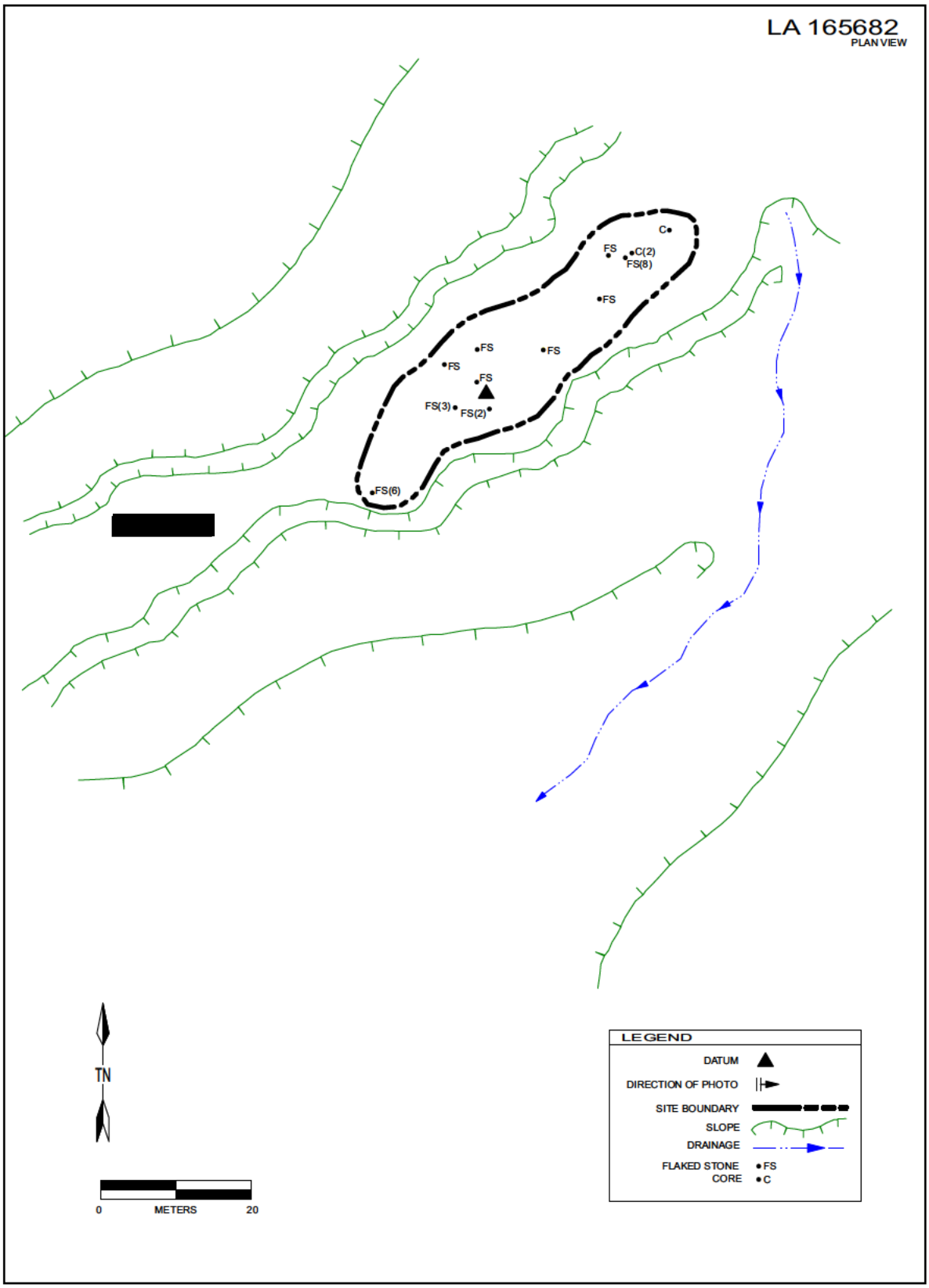

Figure 3.108: LA 165682 Site Map.

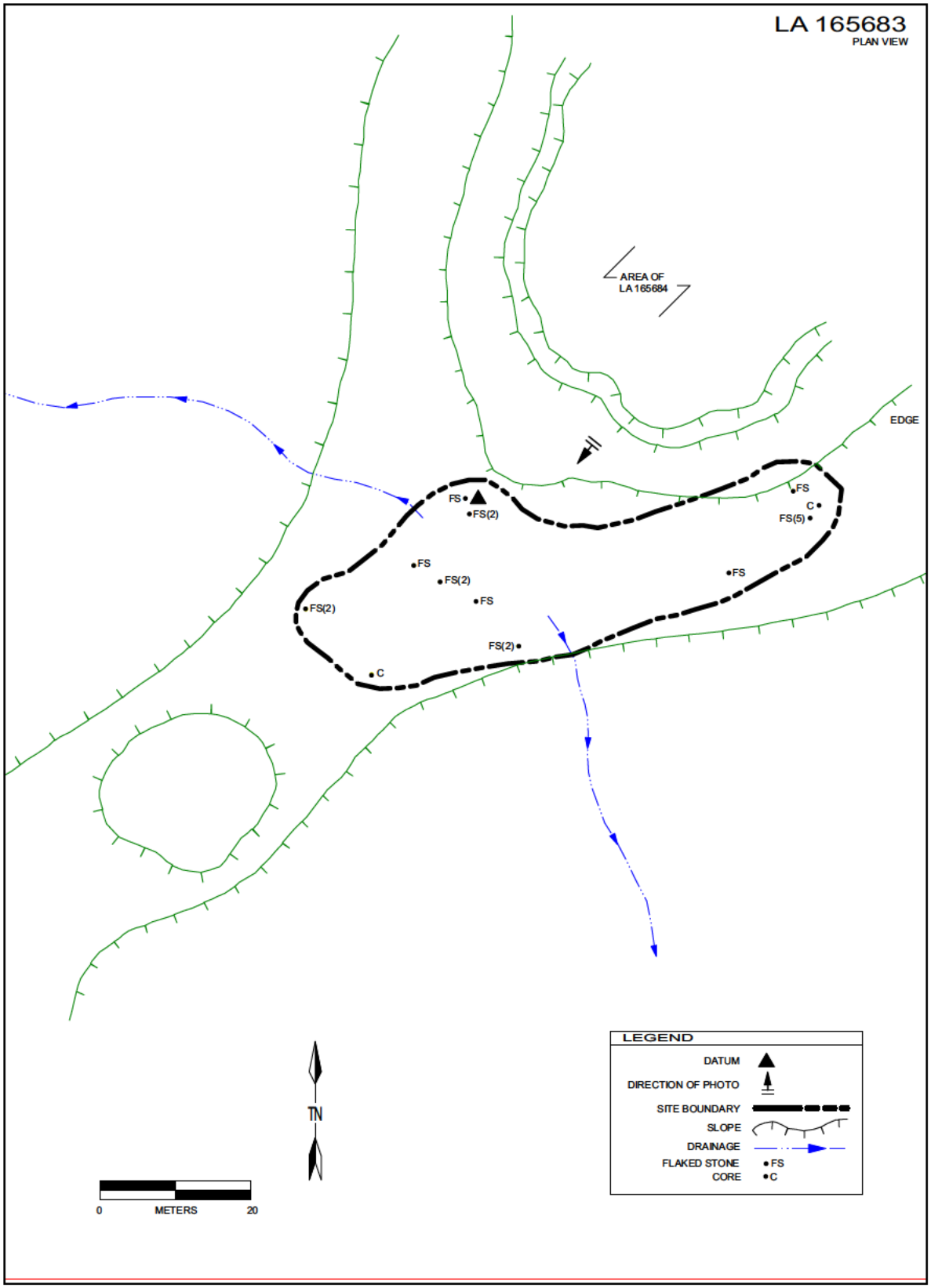

Figure 3.109: LA 165683 Site Map.

itage consists of two quartzite primary reduction flakes; 13 secondary reduction flakes (seven quartzite, six chert), three quartzite tertiary reduction flakes; and one piece of angular debris (quartzite). Quartzite occurs in purple, gray, and red, and cherts are brown, tan, and gray. The cores include one purple quartzite bidirectional core, one gray chert multidirectional core, one purple quartzite unidirectional core, and one gray quartzite unidirectional core.

Features and Site Structure

No features were observed. The site is located on residuum and in an alluvial and colluvial depositional environment. No buried cultural material was observed and it is unknown how deep those sediments that may contain buried cultural deposits are.

Disturbances and Potential Impacts

The primary disturbance on the site is water erosion. Wind erosion has a more limited effect. LA 165683 is estimated to be 26 percent to 50 percent intact.

Conclusions

LA 165683 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation. It is uncertain whether LA 165683 has buried cultural deposits or any other potential to yield additional significant data. LA 165683 is recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165684

Field Number: 908-01-205
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165684 is a light lithic artifact scatter [redacted] Vegetation on the site includes acacia, crucifixion thorn, creosote, desert sage, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 70 flaked-stone artifacts, including 63 pieces of flaked-stone debitage, and seven cores. The flaked-stone debitage consists of five primary reduction flakes (one quartzite, four chert); 18 secondary reduction flakes (four quartzite, 13 chert, one chalcedony); 38 tertiary reduction flakes (18 quartzite, 20 chert); and two quartzite pieces of angular debris. Quartzites occur in purple, gray, and brown; cherts are brown, gray, white, red, and tan; and chalcedony is in clear, and white. The cores include two multidirectional chert cores (purple and gray-brown); one purple quartzite multidirectional core; one brown chert unidirectional core; one gray chert bidirectional core; one purple quartzite bidirectional core; and one gray and purple chert tested cobble.

Features and Site Structure

No features were observed. LA 165684 is bounded on the north, south, and west edges by a steep escarpment and bisected by a fence line running north to south. The site is located on residuum and in an eolian depositional environment. No buried cultural material was observed. Sediments that could contain such materials are estimated to be up to 10 cm in depth as determined by limestone outcrops.

Disturbances and Potential Impacts

The primary disturbance on the site is wind erosion. LA 165684 is estimated to be 76 percent to 99 percent intact.

Conclusions

LA 165684 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) temporal and cultural affiliation, given the presence of a lithic scatter lacking any temporally diagnostic artifacts. Sediments at the site are shallow but may yet contain significant buried data. There is no evidence either confirming or denying this potential, and LA 165684 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165685

Field Number: 908-01-206
Category: 2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165685 is a sparse lithic artifact scatter [redacted] Vegeta-

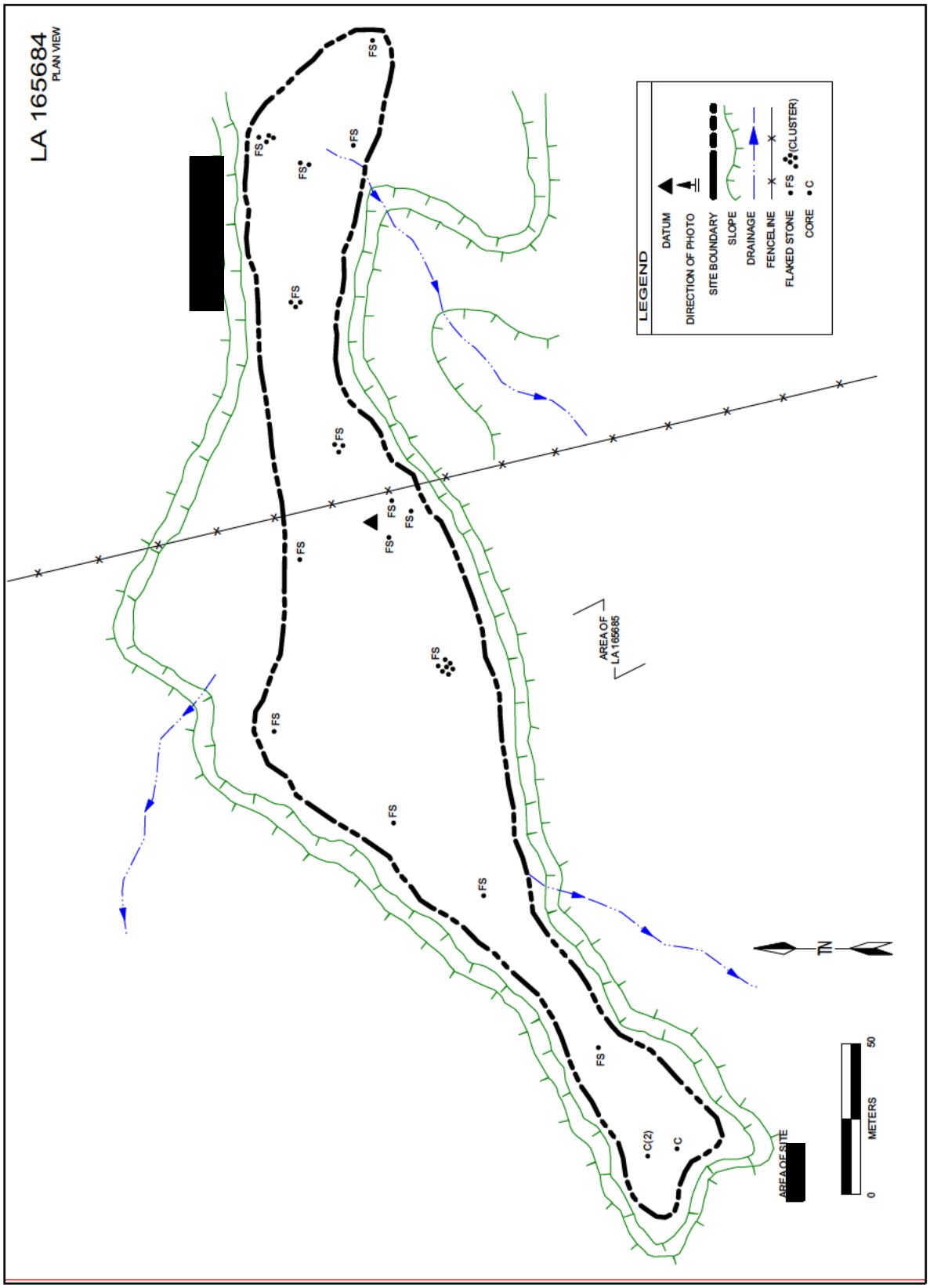

Figure 3.110: LA 165684 Site Map.

tion on the site includes acacia, crucifixion thorn, creosote, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 28 flaked-stone artifacts, including 24 pieces of debitage and four cores. The debitage consists of 14 primary reduction flakes (three chert, 11 quartzite) and 10 secondary reduction flakes (four chert, six quartzite). Quartzites occur in purple and gray and cherts are brown, white, and tan. The cores include one brown and black chert unidirectional core, one light red quartzite multidirectional core, one purple quartzite bidirectional core, and one brown chert bidirectional core.

Features and Site Structure

No features were observed. A fence line running north to south is located approximately 5 m to the east of the site. The site is located on residuum and in an eolian, colluvial, and alluvial depositional environment. Most artifacts are lying on a gravel bed. No buried cultural material was observed and the depth of sediments that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbance to the site is water erosion, as the site is located on the floor of a large drainage. Wind erosion has had a more limited effect. LA 165685 is estimated to be 76 percent to 99 percent intact.

Conclusions

As there are no temporally diagnostic artifacts associated with this lithic assemblage, LA 165685 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation. The site may be composed of materials that have washed downslope from LA 165684, may be composed of artifacts that were collected from the gravel bed, or may be the surface expression of a buried site. Without additional data concerning the nature, extents, and data potential of any buried deposits, no recommendation concerning the eligibility of this site can be made. LA 165685 is therefore recommended to have an undetermined eligibility for nomination to the NRHP.

LA 165686

Field Number: 908-01-207
Category:2
Affiliation: Unknown Aboriginal
(9500 B.C. to A.D. 1880)
Eligibility: Undetermined
Site Type: Artifact Scatter
Parcel: 4

Description

LA 165686 is a light lithic artifact scatter [redacted] Vegetation on the site includes little-leaf horse brush, acacia, creosote, various grasses, and various forbs. Visibility is 76 percent to 99 percent.

Assemblage

Lone Mountain archaeologists recorded all visible artifacts. The assemblage consists of 60 flaked-stone artifacts, including 48 pieces of debitage and 12 cores. The debitage consists of nine primary reduction flakes (seven quartzite, two chert); 11 secondary reduction flakes (eight quartzite, three chert); 27 tertiary reduction flakes (18 quartzite, nine chert); and one piece of angular debris (chert). Quartzites occur in purple and gray and cherts are brown, gray, red, and black. The cores include two unidirectional purple quartzite cores; one brown chert unidirectional core; three purple quartzite multidirectional cores; two chert multidirectional cores (one orange, one maroon); one gray quartzite bidirectional core; two purple quartzite tested cobbles; and one orange and red chert tested cobble.

Features and Site Structure

No features were observed. The site is located on residuum and in an eolian, colluvial, and alluvial depositional environment. No buried cultural material was observed and the depth of sediments that could contain such material is unknown.

Disturbances and Potential Impacts

The primary disturbance to the site is water erosion. Wind erosion has had a more limited effect. LA 165686 is estimated to be 76 percent to 99 percent intact.

Conclusions

LA 165686 has an Unknown Aboriginal (9500 B.C. to A.D. 1880) affiliation, given a lithic assemblage with no temporally diagnostic artifacts. It is unclear whether the site contains buried cultural deposits

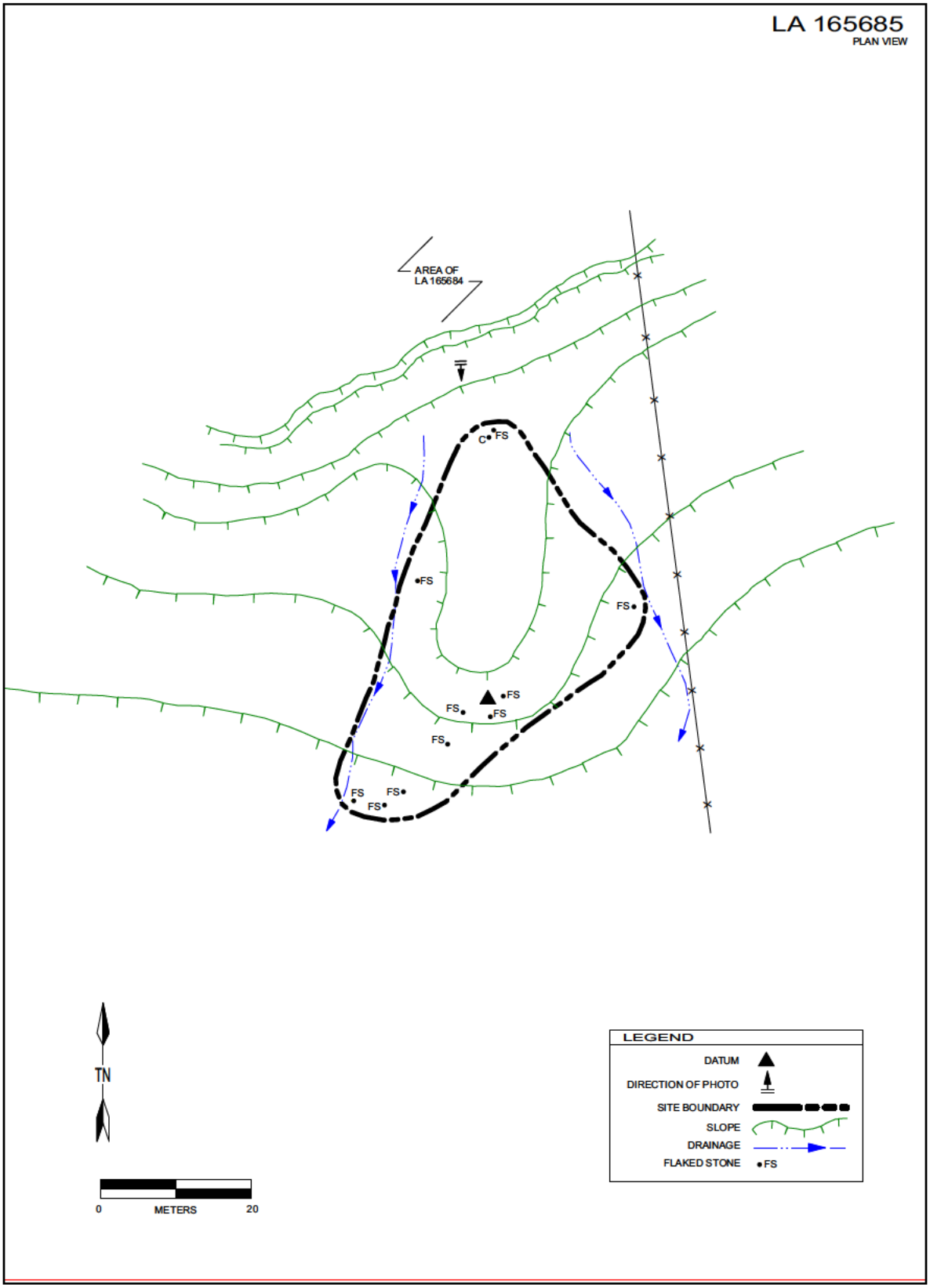

Figure 3.111: LA 165685 Site Map.

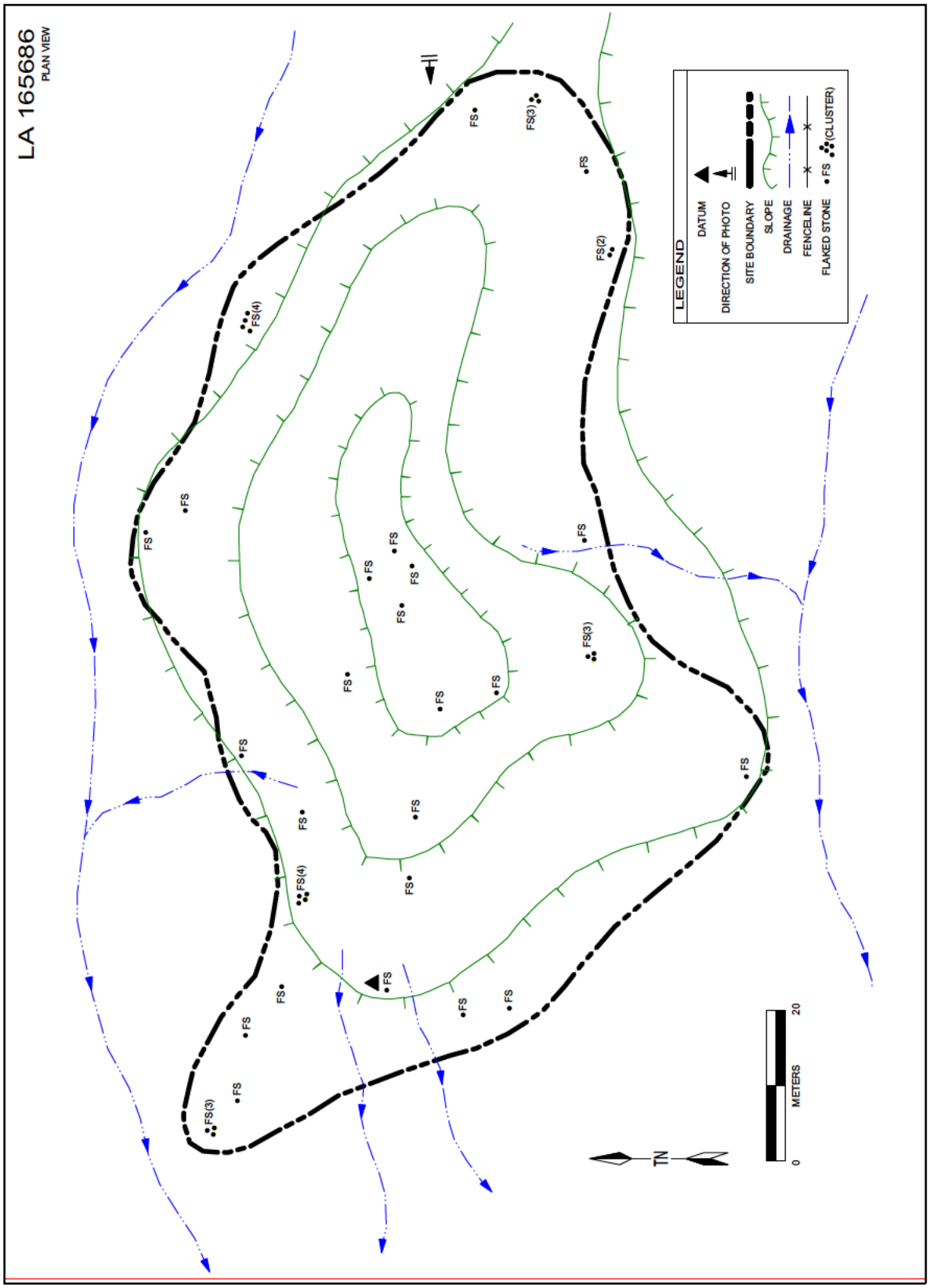

Figure 3.112: LA 165686 Site Map.

and what the nature, extents, or potential to yield additional significant data of any such deposits may be. LA 165686 is recommended to have an undetermined eligibility for nomination to the NRHP.

DISCUSSION

Cultural change through time and the processes that produce that change are best recognized when the material remnants of past cultures are placed in a chronological framework. The history of archaeological research in southeastern New Mexico has limited the development of chronologies and consequently limited recognition of material cultural patterns and our understanding of past behavior and adaptations in this region. Thus, a major goal of this research is to place the material identified in the project area into a chronological framework that allows the identification of cultural patterns. The discussion below focuses on this goal, and to some extent the related goal of subsistence practices and settlement systems over time.

CHRONOLOGY AND CULTURE HISTORY

Chronological classification of sites in southeastern New Mexico is problematic for several reasons. First, while more work takes place in the southeastern plains of the eastern extension of the Jornada Mogollon than in other regions of New Mexico, there has been much less in-depth research there. This may be partly due to the perception that the area contains unremarkable remains in comparison to the Anasazi and Mogollon heartlands (Stuart and Gauthier 1988:259). This does not completely account for the lapse, however, because many local archaeologists are sincerely interested in studying and understanding the material culture patterns and processes in the area. Many projects that sponsor work in the region result in avoidance of sites, rather than with data recovery. This limits the degree of understanding as to what can be gleaned from the sites during what are typically quick recordings. Moreover, sites in the region do not fit neatly into cultural-historical periods, such as Archaic and Ceramic (Formative), in the same way as sites in other parts of the Southwest adhere to these period designations and their correlates. This is because in this area there is significant temporal overlapping in traits that are normally considered diagnostic of one or the other period. This is frequently attributed to the generally greater mobility of prehistoric peoples of the region, particularly of the Ceramic-period Jornada Mogollon, in comparison with ceramic-using groups in other regions of the Southwest. This perspective is based on the high numbers of nonstructural Ceramic-period sites and the sparse evidence of agricultural subsistence practices on ceramic sites of this area (Sebastian and Larralde 1989:82). In addition, Archaic-style projectile points, usually interpreted to be dart points, persist into the Ceramic period here, making it difficult to draw a clear line between the Archaic and Formative periods. Moreover, points manufactured in and diagnostic of earlier periods are often collected for reuse; sometimes these show evidence of resharpening and sometimes they were simply reused without modification.

Further confounding this problem is the difficulty in choosing the appropriate typological sequence for projectile points found in the region. Sebastian and Larralde (1989:42; see also Hogan 2006) note that southeastern New Mexico falls in an area between several Archaic traditions, including the Cochise tradition of southwestern New Mexico and the Archaic of central and Trans-Pecos Texas, with various researchers arguing that one or the other is more closely affiliated with southeastern New Mexico at various times (see Jelinek 1967; Laumbach and Beckett 1980). Leslie (1978) has developed a point typology specific to the eastern extension of the Jornada Mogollon. This typology is limited by the fact that few absolute dates were available for Archaic sites in southeastern New Mexico when the typology was developed. As a result, researchers must rely on a combination of typologies, selecting those most appropriate for a given place and time within the region (Hogan 2006). In this report, projectile points were classified using Justice's (2002) guide, with reference to Leslie's (1978) typology for the Eastern Jornada Mogollon, and Turner and Hester's (1999) guide to stone artifacts of Texas.

As a result of the above-mentioned difficulties with chronological classification, basic cultural-historical classification and chronometric dating remain important goals in southeastern New Mexico.

A total of 96 sites were identified in the surveyed parcels, including nine previously recorded sites that were revisited. The regional overview presented in Hogan (2006:3-5) notes that 52.7 percent of prehistoric sites in southeastern New Mexico have an unknown component. This is somewhat complicated by previous researchers' implicit assumption that lithic scatters predate A.D 1539. The "Unknown Aboriginal" term employed in this report acknowledges that a lithic scatter may be contemporary with the last aboriginal inhabitants of the region. Unknown Aboriginal components may therefore have a date range of 9,500 B.C. to A.D. 1880, or a

shorter date range that reflects the presence of a given artifact or feature type that is not specific to a certain cultural historical taxon.

Sixty-six newly recorded sites and two previously recorded sites have Unknown Aboriginal components dating from 9500 B.C. to A.D. 1880. The sites with Unknown Aboriginal components represent 71 percent of the sites recorded during this project.

Lone Mountain found a Paleoindian component at LA 165639. This component is indicated by an untyped lanceolate point fragment, likely dating sometime between 8700 and 5500 B.C. The previously recorded site LA 32229 has produced channel flakes and a Midland Point from Locus 3, the Boot Hill Site (Corley and Leslie 1960), although this component is not identified as such in recent site documentation (Condon et al. 2008). LA 165599 has a San Jose point dating from the Early to Late Archaic periods (4500 to 1500 B.C.) (Justice 2002:133). LA 165612 has a Pandale point, which dates between 4000 and 2500 B.C. (Justice 2002:171). LA 165614 has an Unspecified Archaic component, based on the presence of an untyped dart point fragment.

Three newly recorded sites and two previously recorded sites have Late Archaic components that may extend at least into the beginning of the Ceramic period (depending on the accepted inception date). LA 159324 has a Datil point that dates from 1600 B.C. to A.D. 300 (as well as brownware and Chupadero Black-on-white, suggesting a later Formative period component ending as late as A.D. 1500). LA 159321 was previously reported to have a San Pedro point, suggesting a date range from 1500 B.C. to A.D. 300. LA 165597, LA 165610, and LA 165611 have Tularosa Corner-notched points, a type that dates from 100 B.C. to A.D. 900 (Justice 2002:217). These points are consistent with Hueco points, a type developed within southeastern New Mexico.

Hueco-phase sites are typically identified by diagnostic projectile points identified as Types 8A, 8B, and 8C in Leslie (1978), variations of the Hueco point thought (by that author) to date as late as A.D. 950. However, as Justice (2002:208) has pointed out, points identified as Hueco (e.g. MacNeish 1993:182-183) fall within two of Justice's typological "clusters." These include San Pedro points, which date from 1500 B.C. to A.D. 300, and Cienega points (more specifically Tularosa Corner Notched), which date from 100 B.C. to A.D. 900. The range of size variability within these two types causes their identification to overlap. When Justice's typology is applied, the contradictions between the appearance of pottery and the dating of the end of the Archaic period in southeastern New Mexico seem to become resolved. Justice (2002:17) derived this date range from excavations of Tularosa Cave, Bat Cave, and Cordova Cave, all located in southwestern New Mexico.

Hogan's (2006) treatment of these issues relies on a Southern Plains based set of sources for identifying points, such as Turner and Hester (1993) and Shelley (1994). According to Shelley (1994:388), Leslie's Type 8A is Marcos, 8B is Ensor, and 8C is Palmillas, all dating to the Late Archaic period (1500 B.C. to A.D. 1). This set of dates is not applied with consistency across southeastern New Mexico and neighboring areas. For example, the Palmillas type is dated to Katz and Katz's (1985:67) Archaic 3 (1000 B.C. to A.D. 1), but Mallouf (1985) has suggested that the Palmillas point dates from 500 B.C. to A.D. 150 in the Trans-Pecos area. Lone Mountain has been concerned with assessing and resolving these conflicting interpretations of projectile point data and has been testing Justice's (2002) interpretations against others with some success thus far (e.g., Travis et al. 2005).

Ceramic artifacts are present on 17 sites. While LA 32229 has a broad variety of ceramics reported from the Boot Hill site (Locus 3), this ceramic variety was not expressed in those parcels investigated by Lone Mountain. Ceramic types encountered on sites within the project area include Jornada Brown (A.D. 200 to 1350), El Paso Brown (A.D. 400 to 1300), El Paso decorated (A.D. 1000 to 1400), Chupadero Black-on-white (A.D. 1100 to 1500), and Three Rivers Red-on-Terracotta.

Unspecified Plains Nomad components may be present at LA 165600, based on the presence of an Awatovi Side-notched/Harrell point, a type that dates from A.D. 1250 to 1880 (Justice 2002:317), and at LA 165643, based on a possible tipi ring.

Table 3.3 summarizes the cultural/temporal affiliation components of the sites encountered within the project area. Please note that the number of components is greater than the number of sites because some of the sites have more than one component.

Table 3.3: Summary of Site Cultural/Temporal Affiliation Components.

Cultural and Temporal Affiliation (component falls within listed date range)	Parcel 1	Parcel 2	Parcel 3	Parcel 4	Parcel 5	Total Components
Historic (A.D. 1869 to 2010)				6	7	13
Unspecified Plains Nomad (A.D. 1500 to 1880)				2		2
Jornada Mogollon (A.D. 200 to 1500)	5	4		6	2	17
Late Archaic to Jornada Mogollon (100 B.C. to A.D. 900)	2	1				3
Late Archaic to Jornada Mogollon (1600 B.C. to A.D. 500)				2		2
Paleoindian to Jornada Mogollon (12,000 B.C. to A.D. 1500)		1	1			2
Archaic Period (5500 B.C. to A.D. 200)	2			1		3
Paleoindian (12,000 to 5500 B.C.)				1		1
Unknown Aboriginal (9,500 B.C. to A.D. 1880)	3	3	1	30	31	68
Totals	12	9	2	48	40	111

Judging from the identification of various artifacts and features, the project areas were used from the Paleoindian period through the twentieth century. Parcels 4 and 5 show the heaviest use, with 88 of 111 total components (79 percent). Together, these parcels contain components dating from the Paleoindian through Historic and Recent periods. Historic and Recent use appears to be confined exclusively to Parcels 4 and 5, as is possible Plains Nomad use. This is not surprising, given the proximity of those parcels to the Pecos River.

Although Parcel 3 has the fewest components (two of 111 total components, or 2 percent), this area, together with Parcel 2, contains evidence of very intensive use. LA 32229, straddling both parcels, contains elements spanning the Paleoindian through Late Jornada Mogollon periods. Sites with Archaic components (n=10) appear to be clustered in Parcels 1 (n=4) and 4 (n=3), with two in Parcel 2, one possibly intensively used site in Parcel 3, and none in Parcel 5. Jornada Mogollon sites are distributed fairly evenly throughout Parcels 1 (n=7), 2 (n=6), and 4 (n=8), with one large, very intensively used site in Parcel 3. Aside from sites with an Unknown Aboriginal designation, the majority of the sites have a Jornada Mogollon component (n=24, or 56 percent), indicating that the project area was used on a regular basis during that time period.

SUBSISTENCE PRACTICES AND SETTLEMENT SYSTEMS

Ninety-five sites encountered in the project area have aboriginal components, and more than two thirds of these (n=65 or 68 percent) are artifact scatters. Most artifact scatters are lithic debitage scatters with occasional groundstone and flaked-stone tools, suggesting that activities beyond flaking may have taken place in these locations. Locations where it is clear that local cobbles were worked are identified as quarries (n=2). Fire-cracked rock features may be disassembled or otherwise destroyed ring middens, covering buried or deflated roasting pits, or may be materials that have been cleaned out of a nearby thermal feature. Katz and Katz have asserted that scatters of thermally altered rock are a particular feature type rather than merely a feature remnant, but

Hogan (2006:3-3) is unconvinced. Sites with fire-cracked rock features or ash and charcoal stains are identified as domestic feature sites and make up 20 percent (n=19) of the aboriginal sites present. These sites are likely to contain the residues or remains of a variety of plant and animal resources. While any number of resources may be roasted and cooked, ring middens are typically associated with processing succulents, especially mescal (Hogan 2006:3-11). The only site with a clearly identifiable ring midden is LA 26821.

LA 165668, LA 165674, and LA 165675 [redacted] and contain undatable lithic scatters and rubble mound features. If these features had been discovered in another part of New Mexico, and if they had associated ceramic artifacts, it would be easy to identify them as fieldhouses. On the plains, however, features like these are sometimes hunting blinds.

LA 32229 is comprised of a conglomeration of several loci, some of which had been previously identified as separate sites. While Locus 3, the Boot Hill site, had pit structures and burials, the other loci seem to represent a range of processing stations and other site types. These likely represent activity areas associated with the residents of Boot Hill, as well as a palimpsest of the remains left by groups visiting the area both before and after the Boot Hill houses were occupied. Any contemporary sites in Parcels 1, 2, and 3 may also be associated in some way with LA 32229. Possible residential features were also found at LA 165600, LA 165650, and LA 165654. These appeared to be rock foundation features, possibly dating to the Late Formative period or later.

A number of researchers have pointed out that flaked-stone assemblage studies that have been helpful in distinguishing Archaic and Formative sites in other areas are not as useful in eastern and southeastern New Mexico. Because of the persistence of relatively mobile lifestyles throughout the prehistoric occupation of the area, a generalized biface-based technology continued to be common during the Ceramic period of the Jornada Mogollon. Inferences about changing patterns of subsistence and mobility in this area, and about the relative dating of aceramic lithic scatters, are therefore more tenuous in this area than other areas of the Southwest where expedient tool technologies are correlated with Formative sites and biface technologies are more common on Archaic sites.

Historic sites appear to be connected with ranching activities or refuse disposal. There is no evidence for mineral procurement beyond possible prospecting for gravel or caliche pits. The Ross Ranch house is the most complex historic site encountered and was in use from the 1930s through the 1950s.

Table 3.4 summarizes the site types found within each parcel in the project area. The number of site types is greater than the number of sites because some sites can be classified as more than one type.

Table 3.4: Summary of Site Types.

Site Type	Parcel 1	Parcel 2	Parcel 3	Parcel 4	Parcel 5	Total
Artifact Scatter	6	5	1	31	22	65
Domestic Feature	6	4		3	6	19
Quarry				1	1	2
Possible Structure				1	3	4
Single Residence				1	2	3
Residential Complex		1 (LA 32229)	1 (LA 32229)			2
Ranching Related					2	2
Burial/Possible Burial				1	1	2
Ring Midden				1		1
Totals	12	10	2	39	37	106

All site types, with the exception of residential complexes, can be found in Parcels 4 and 5. Fifty-three of 65 total artifact scatters (82 percent) are located in these parcels, indicating that this area was used continually for non-intensive, short-term occupations by aboriginal groups. Both quarry sites are located in these parcels, indicating that groups utilized this area for lithic procurement. Longer-term occupations are indicated for these parcels by the presence of structural and residential sites (n=8, or 100 percent of these site types encountered in the project area). Historic ranching took place exclusively in these two parcels. Again, this is not surprising, given these parcels' proximity to the Pecos River and a wide variety of resources.

Parcel 1 does not seem to have been used for anything but short-term, non-intensive occupations. No structural or residential remains were encountered, and few artifact scatters (n=6, or 9 percent) and domestic feature (n=6, or 32 percent) sites are located in this parcel. Likewise, with the exception of the large residential complex (LA 32229), Parcels 2 and 3 contain only short-term, non-intensive occupations (six artifact scatters and four domestic feature sites between them). No sites were encountered in the central and southwestern portions of Parcel 3. The landscape may have lacked sufficient resources to attract many groups. Conversely, remains may have been displaced downslope.

Although Parcels 2 and 3 contain fewer sites and fewer site types, they are the location for the longest-term, most intensive occupation (LA 32229) within the project area [redacted] This indicates the possible presence of a prehistoric spring. This would have been an attractive landscape for animals, with a predictable source of water and vegetation. This in turn would have attracted human groups. The short-term occupations in Parcels 1, 2, and 3 could be related to this large, intensive site. Small groups may have travelled out from LA 32229 to various parts of the landscape to forage, hunt, and process wild foods.

SUMMARY

Ninety-six archaeological sites were either newly identified or revisited during this survey. All are located on BLM-administered land. Twenty-eight of the sites examined have been recommended eligible for nomination to the NRHP, nine are recommended ineligible, and 59 have undetermined eligibility recommendations.

Table 3.5 provides a brief synopsis of each site including eligibility recommendations.

Table 3.5: Summary of Sites Encountered Within the Project Area.

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 32229N LA 32229S	Northern portion of site (Parcel 2) three burned caliche thermal features; artifact scatter consisting of flaked-stone debitage (n<50), cores (n=5), one hammerstone, one uniface tool, basin metate fragments (n=2), El Paso brownware sherds (n+5); Southern portion of site (Parcel 3) artifact scatter consisting of burned caliche fragments (n>100), cores (n<5), flaked-stone debitage (n<30), one hammerstone, and El Paso brownware (n<10)	Paleoindian through Late pueblo Jornada Mogollon (12,000 B.C. to A.D. 1500)	Eligible, D	2,3
LA 61244	One stain feature and two burned caliche concentration features with no visible staining; artifact types include flaked-stone debitage (n=43), cores (n=4), indeterminate metates (n=6), slab metates (n=6), one-hand manos (n=2), one trough metate, El Paso brownware sherds (n=3), one Jornada brownware sherd, uniface tools (n=3), and scraper tools (n=3)	Unspecified Jornada Mogollon (A.D. 400 to 1300)	Eligible, D	2

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 99815	Artifact scatter consisting of flaked-stone debitage (n=21), cores (n=11), and hammerstones (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 116374	Two cobble concentrations; artifact scatter consisting of flaked-stone debitage (n=54), scrapers (n=3), and cores (n=6)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	5
LA 122417	From previous recording: one collapsed ranch house, one water tower stand, one stand out building, one cess pool, and one large trash scatter; three additional features added including remnants of dismantled vehicle, possible house structure, and a collapsed cellar with intact roof; historic artifact scatter consisitng of stoves (n=3), furnaces (n=3), nails (n=10), milled wood (n=15), one white-wall tire, one muffler, one exhaust trundown, car/truck frame fragments (n=8), one headlight housing, exhaust pipe remains (n=3)	NM Statehood-WWII to Recent (A.D. 1935 to 1959)	Eligible, D	5
LA 146165	Two burned caliche cluster features; artifact scatter consisting of flaked-stone debitage (n>100), shell fragments (n>100), cores (n>10), uniface tools (n=3), one hammerstone, groundstone fragments (n<5), glass shards (n>1000), and cans (n<10)	Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1895 to 1930)	Eligible, D	5
LA 159321	One burned caliche feature, no stain present; one historic trash dump; artifact scatter consisting of flaked-stone debitage (n=47), one scraper, cores, (n=5), indeterminate metate fragments (n=2), cans (n=54), historic ceramic sherds (n=11), metal pieces (n=2), and glass bottle fragments (n=64)	Late Archaic to Early Pithouse Jornada Mogollon (1500 B.C. to A.D. 300); Recent Euroamerican (A.D. 1945 to 1963)	Eligible, D	4
LA 159324	Artifact scatter consisting of flaked-stone debitage (n=87), flaked-stone tools (n=8), cores (n=6), and prehistoric ceramic sherds (n=2)	Late Archaic to Early Pithouse Jornada Mogollon (1600 B.C. to A.D. 300); Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500)	Undetermined	4
LA 165595	Artifact scatter consisting of flaked-stone debitage (n=18), cores (n=3), one basin metate fragment, one slab metate fragment, Jornada brownware sherds (n=5), El Paso brownware sherds (n=10), one Chupadero Black-on-white sherd (collected), and one uniface	Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500)	Undetermined	2
LA 165596	One thermal feature with buried burned caliche revealed in a trowel test; artifact types include flaked-stone debitage (n=9) and one biface tool	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Eligible, D	2

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165597	Artifact scatter consisting of flaked-stone debitage (n=10), one core, one scraper, one biface, and one projectile point with characteristics of a Tularosa Corner Notched type	Late Archaic to Early Pithouse Jornada Mogollon (100 B.C. to A.D. 900)	Undetermined	2
LA 165598	Artifact scatter consisting of flaked-stone debitage (n=27), cores (n=4), and one biface tool	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165599	Artifact scatter consisting of flaked-stone debitage (n=23), cores (n=4), and one broken projectile point with evidence of resharpening	Early to Late Archaic (4500 to 1500 B.C.)	Undetermined	4
LA 165600	Three loci including twenty-five thermal features, two stain features, and two rock alignments total; artifact scatters consisting of flaked-stone debitage (n>10,000), cores (n>100), groundstone (n>100), El Paso brownware sherds (n=5),Chupadero Black-on-white sherds (n=2), scrapers (n=4), one broken projectile point, one chopper, one uniface tool, historic artifacts consisting of glass shards (n<100), cans (n<30), milled wood fragments (n>100, complete bottles (n=5)	Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1500); possible Unspecified Plains Nomad (A.D. 1500 to 1880; Unknown Historic (A.D. 1907 to A.D. 1965)	Eligible, D	4
LA 165601	Artifact scatter consisting of flaked-stone debitage (n>100) and cores (n=14)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165602	Prehistoric and historic artifact scatter consisting of flaked-stone debitage (n>100), cores (n=15), and cans (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1900 to 1945)	Undetermined	4
LA 165603	Artifact scatter consisting of flaked-stone debitage (n=87), cores (n=4), and one one-hand mano	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	3
LA 165604	Seven burned caliche features, six with staining; artifact scatter consisting of both prehistoric and historic artifacts, prehistoric artifacts include one-hand manos (n=4), metate slab fragments (n=2), uniface tools (n=2), one biface tool, one scraper, choppers (n=2), cores (n=17), flaked-stone debitage (n>200), El Paso brownware sherds (n=36), Chupadero Black-on-white sherds (n=6), one Three Rivers Red-on-terracotta sherd, historic artifacts consist of one oil can	Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 400 to 1500)	Eligible, D	4

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165605	Artifact scatter consisting of flaked-stone debitage (n=61), cores (n=6), indeterminate metate frements (n=7), one-hand manos (n=2), one slab metate, one pestle, El Paso brownware sherds (n=40), Jornada brownware sherds (n=2), scraper tools (n=6), uniface tools (n=4), chopper tools (n=3), biface tools (n=3), one graver, and one knife	Unspecified Jornada Mogollon (A.D. 400 to 1300)	Undetermined	2
LA 165606	Artifact scatter consisting of flaked-stone debitage (n=13), cores (n=2), indeterminate metate fragments (n=5), a one-hand mano, one trough metate, Jornada brownware sherds (n=3), El Paso brownware sherds (n=3), two scraper tools, and one biface	Unspecified Jornada Mogollon (A.D. 400 to 1300)	Undetermined	2
LA 165607	Artifact scatter consisting of flaked-stone debitage (n=13)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	2
LA 165608	Two burned caliche features with no visible staining; artifact types include flaked-stone debitage (n=10)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Eligible, D	2
LA 165609	Four thermal features, three of which contain subsurface staining; artifact types include a 50 percent sample of flaked-stone debitage (recorded n=100), cores (n=10), metate slab fragments (n=3), a one-hand mano fragment, one El Paso brownware sherd, scraper tools (n=3), and one hammerstone	Unspecified Jornada Mogollon (A.D. 400 to A.D. 1300)	Eligible, D	2
LA 165610	One fire-cracked rock feature with no visible staining; artifact types include flaked-stone debitage (n=29), cores (n=3), one El Paso brownware sherd, two scraper tools, two uniface tools, one hammerstone, and one projectile point with characteristics of a Tularosa Corner Notched type (collected)	Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900)	Eligible, D	1
LA 165611	Three burned caliche concentration featues, one with buried burned caliche revealed in a trowel test; artifact types include flaked-stone debitage (n=49), cores (n=6), two one-hand manos, one basin metate, one scraper, and one projectile point base with characteristics of a Tularosa Corner Notched type	Late Archaic to Late Pithouse Jornada Mogollon (100 B.C. to A.D. 900)	Eligible, D	1
LA 165612	Artifact scatter consisting of flaked-stone debitage (n=5), one core, one-hand manos (n=5), one scraper, one hammerstone, and one projectile point with characteristics of a Pandale type (collected)	Early to Middle Archaic (4000 B.C. to 2500 B.C.)	Undetermined	1

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165613	Three thermal features, one of which contains a buried stain; artifact types include flaked-stone debitage (n=18), indeterminate metate fragments (n=3), one-hand manos (n=3), Jornada brownware sherds (n=2), one El Paso brownware sherd, and one uniface	Unspecified Jornada Mogollon (A.D. 400 to 1300)	Eligible, D	1
LA 165614	Two thermal features and one surface stain; artifact types include flaked-stone debitage (n=50), cores (n=8), one-hand mano fragments (n=2), slab metate fragments (n=2), one indeterminate metate fragment, uniface tools (n=2), one scraper, and one untyped projectile point fragment.	Unspecified Archaic (5500 B.C. to A.D. 200)	Eligible, D	1
LA 165615	Artifact scatter consisting of flaked-stone debitage (n=12), one core, indeterminate metate fragments (n=4), one biface/chopper, and one uniface	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	1
LA 165616	Artifact scatter consisting of flaked-stone debitage (n=8), one slab metate, and El Paso brownware sherds (n=15)	Unspecified Jornada Mogollon (A.D. 400 to 1300)	Undetermined	1
LA 165617	One burned caliche concentration feature with no visible staining; artifact types include flaked-stone debitage (n=10), indeterminate metate fragments (n=5), one slab metate fragment, one possibly historic pocket knife, and two utilized flakes	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	1
LA 165618	One burned caliche concentration feature with no visible staining; artifact types include flaked-stone debitage (n=13), slab metate fragments (n=7), El Paso brownware sherds (n=2), and one Chupadero Black-on-white sherd	Early to Late Pueblo Jornada Mogollon (A.D. 1100 to 1550)	Eligible, D	1
LA 165619	One stain feature; artifact types include flaked-stone debitage (n=69), cores (n=2), one utilized flake, indeterminate metate fragments (n=11), unidentified brownware sherds (n=11), and El Paso brownware sherds (n=3)	Unspecified Jornada Mogollon (A.D. 400 to 300)	Eligible, D	1
LA 165620	Artifact scatter consisting of flaked-stone debitage (n=20), one basin metate, one indeterminate metate fragment, slab metate fragments (n=3), cores (n=2), scraper tools (n=2), one hammerstone, and one utilized flake	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	1
LA 165621	Artifact scatter consisting of flaked-stone debitage (n=33), one core, Jornada brownware sherds (n=5), El Paso brownware sherds (n=2), uniface tools (n=4), and one scraper	Unspecified Jornada Mogollon (A.D. 400 to 300)	Undetermined	1

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165622	Artifact scatter consisting of flaked-stone debitage (n=27) and one crushed hole-in-top can	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165623	Artifact scatter consisting of flaked-stone debitage (=34) and one core	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165624	Artifact scatter consisting of flaked-stone debitge (n=22) and cores (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165625	Artifact scatter consisting of flaked-stone debitage (n=17) and one uniface tool	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165626	Artifact scatter consisting of flaked-stone debitage (n=83), one uniface tool, one biface tool, and one scraper	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165627	Artifact scatter consisting of flaked-stone debitage (n=15) and one hammerstone	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165628	Artifact scatter consisitng exclusively of flaked-stone debitage (n=13)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165634	Artifact scatter consisiting of flaked-stone debitage (n=16) and one core	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165635	Artifact scatter consisitng of flaked-stone debitage (n=14) and one bidirectional core	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165636	Artifact scatter consisting of flaked-stone debitage (n=22) and one uniface tool	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165637	Artifact scatter consisting of flaked-stone debitage (n=122)and cores (n=5)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165638	Artifact scatter consisting of flaked-stone debitage (n=20) and cores (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	4
LA 165639	Artifact scatter consisting of flaked-stone debitage (n=44), cores (n=3), and tools (n=4)	Unspecified Paleoindian (8700 to 5500 B.C.)	Eligible, D	4
LA 165640	Artifact scatter consisting of flaked-stone debitage (n=86), uniface tools (n=2), one scraper, and cores (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165641	Artifact scatter consisting of flaked-stone debitage (n=18), one scraper, and cores (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165642	Artifact scatter consisting of flaked-stone debitage (n>100), cores (>20), and flaked-stone tools (n<10)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165643	Two thermal features, one with staining; two rock alignment features, one L-shaped and one circular (possible teepee ring); artifacts occur both within some of the features and as a general scatter and include flaked-stone debitage (n>100), flaked-stone tools (n>5), cores (n>10), groundstone fragments (n<5), Jornada brownstone sherds (n<5), Chupadero Black-on-white (<5), El Paso brownware (n<5), historic cans (n>5), and one metal bucket top	Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1400); possible Unspecified Plains Nomad (A.D. 1500 to 1880); Unknown Historic (A.D. 1908 to 1945)	Eligible, D	4
LA 165644	Artifact scatter consisting of flaked-stone debitage (n=102), uniface tools (n=6), hammerstones (n=3), one biface scraper, one biface tool, and cores (n=6)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	4
LA 165645	One historic grave site; artifact scatter consisting of flaked-stone debitage (n>150), flaked-stone tools (n<5), and cores (n<20)	Unknown Aboriginal (9500 B.C. to A.D. 1880); US Territorial Euroamerican (A.D. 1869)	Eligible A, D	4
LA 165646	Artifact scatter consisting of flaked-stone debitage (n=31), cores (n=7), and uniface tools (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	4
LA 165647	Artifact scatter consisting of flaked-stone debitage (n>100), cores (n>15), and flaked-stone tools (n>5)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165648	Artifact scatter consisting of flaked-stone debitage (n=17), cores (n=3), one bifacial chopper, and one uniface tool	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165649	Artifact scatter consisting of flaked-stone debitage (n=46), one chopper, one biface tool, one uniface tool, cores (n=6), one two-hand mano, historic trash dump consisting of glass shards (n=43), one complete bottle, assorted cans (n=25), whiteware sherds (n-41), one round nail, one metal basin, railroad spikes (n=4), bricks (n=3), one metal barrel hoop, one piece barbed wire, one metal bucket, and miscellaneous metal pieces (n=6)	Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1900 to 1945)	Undetermined	5
LA 165650	Nine thermal features with no observed staining; one possible buried limestone slab structure with associated burned caliche pile; artifact scatter consisting of flaked-stone debitage (n=87), cores (n=10), one utilized flake, scrapers (n=2), choppers (n=2), indeterminate metate fragments (n=2), historic cans (n=-3), and bottles (n=7)	Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1951 to 1954)	Eligible, D	5

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165651	Artifact scatter consisting of flaked-stone debitage (n=9) and cores (n=3)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165652	Artifact scatter consisting of flaked-stone debitage (n=118), cores (n=4), and one one=hand mano	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165653	Four historic camp fire rings (three with stains), two burned caliche clusters (one with stain), one cement marker; artifact scatter consisting of flaked-stone debitage (n>250), flaked-stone tools (n>5), cores (n>20), groundstone fragments (n>5), cans (n>100), and glass shards (n>100)	Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1902 to 2010)	Eligible, D	5
LA 165654	One circular rock alignment feature; artifact scatter consisting of flaked-stone debitage (n=5)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165655	Artifact scatter consisting of flaked-stone debitage (n=36) and cores (n=5)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	5
LA 165656	One 2 inch upright pipe imbedded in bedrock and through into the floor of a limestone cave, barrel hoops are associated with this feature (n=2); one irregular circular rock alignment with an associated 1 inch upright pipe in the center; artifact scatter consisting of flaked-stone artifacts (n=10), one core, one uniface tool, one piece of metal wire, and barrel hoops (n=6)	Unknown Aboriginal (9500 B.C. to A.D. 1880); Unknown Historic (A.D. 1880 to 2010)	Ineligible	5
LA 165657	Artifact scatter consisting of flaked-stone debitage (n=48), one biface tool, cores (n=6), one complete metate slab, and one indeterminate metate fragment	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165658	Artifact scatter consisting of flaked-stone debitage (n=12) and cores (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	5
LA 165659	Artifact scatter consisting of flaked-stone debitage (n=79), scrapers (n=3), biface tools (n=3), one uniface tool, and cores (n=11)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165660	Artifact scatter consisting of flaked-stone debitage (n=13) and one core	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165661	Artifact scatter consisting of flaked-stone debitage (n=30) and cores (n=5)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165662	Artifact scatter consisting of flaked-stone debitage (n=71), cores (n=6), and choppers (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165663	Artifact scatter consisting of flaked-stone debitage (n=30), one core, and one historic sanitary can	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165664	Artifact scatter consisting of flaked-stone debitage (n=23), one uniface tool, and one historic beverage can	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165665	Three burned caliche thermal features with staining; artifact scatter consisting of flaked-stone debitage (n=10), one core, one basin metate, and one slab metate	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Eligible, D	5
LA 165666	Artifact scatter consisting of flaked-stone debitage (n=89), one biface tool, and cores (n=10)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165667	Artifact scatter consisting of flaked-stone debitage (n=23) and one chopper	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165668	One deflated rock mound feature; artifact scatter consisitng of flaked-stone debitage (n=14), one core, and one chopper	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165669	Five burned caliche thermal features with no visible staining, three are deflated; artifact scatter consisting of flaked-stone debitage (n>100), flaked-stone tools (n>10), cores (n<15), and groundstone (n>5)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Eligible, D	5
LA 165670	Artifact scatter consisiting of flaked-stone debitage (n>100), cores (n<10), groundstone fragments (n<5), flaked-stone tools (<10), Jornada brownware sherds (n<5), El Paso brownware (n>5), and Chupadero Black-on-white (n<5)	Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500)	Eligible, D	5
LA 165671	Artifact scatter consisting of flaked-stone debitage (n=22), one scraper, one uniface tool, and cores (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165672	Artifact scatter consisting of flaked-stone debitage (n=11), cores (n=4), one scraper, and one chopper	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165673	Nine burned caliche clusters with staining; artifact scatter consisting of flaked-stone debitage (n>100), cores (n>15), flaked-stone tools (n>15), groundstone (n>10), El Paso brownware sherds (N>5), and Jornada brownware sherds (n>5)	Unspecified Jornada Mogollon (A.D. 200 to 1350)	Eligible, D	5
LA 165674	One prehistoric rubble mound/field house; artifact scatter consisting of flaked-stone debitage (n=10) and cores (n=6)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 165675	One prehistoric rubble mound/field house; artifact scatter consisting of flaked-stone debitage (n=24), scrapers (n=2), one chopper, and cores (n=2)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	5
LA 165676	Artifact scatter consisting of flaked-stone debitage (n=21) and one core	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	5
LA 165677	One thermal feature with below-surface staining revealed in a trowel test; artifact scatter consisting of flaked-stone debitage (n=4) and one scraper tool	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Eligible, D	5
LA 165678	One deflated rock mound feature with a wooden stake on eastern edge and associated wire, wood fragments, and nails; artifact scatter consists of flaked-stone debitage (n=7) and cores (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880) and Unknown Historic (A.D. 1885 to 2010)	Undetermined	5
LA 165679	One burned caliche thermal feature; artifact scatter consisting of flaked-stone debitage (n=66), one shell fragment, cores (n=7), indeterminate metate fragments (n=2), one one-hand mano, El Paso brownware (n=3), cans (n=51), bricks (n=8), glass shards (n=41), and historic whiteware sherds (n=10)	Unspecified Jornada Mogollon (A.D. 400 to 1300); Unknown Historic (A.D. 1935 to 1960)	Eligible, D	4
LA 165680	Artifact scatter consisting of flaked-stone debitage (n=42), and cores (n=3)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165681	Artifact scatter consisting of flaked-stone debitage (n=10) and cores (n=3)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165682	Artifact scatter consisting of flaked-stone debitage (n=25) and cores (n=3)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Ineligible	4
LA 165683	Artifact scatter consisting of flaked-stone debitage (n=20) and cores (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165684	Artifact scatter consisting of flaked-stone debitage (n=63) and cores (n=7)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165685	Artifact scatter consisting of flaked-stone debitage (n=24) and cores (n=4)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4
LA 165686	Artifact scatter consisting of flaked-stone debitage (n=48) and cores (n=12)	Unknown Aboriginal (9500 B.C. to A.D. 1880)	Undetermined	4

Table 3.5: Summary of Sites Encountered Within the Project Area. (Continued)

LA Number	Description	Affiliation	Eligible?/ Criterion	Parcel
LA 26821	Five burned caliche features (two with staining), one ring midden with staining below the surface and consisting of cores (n>100), El Paso brownware (n=6), and assorted lithic artifacts; four artifact concentrations as well as a general artifact scatter consisting of flaked-stone debitage, (n>1,000), groundstone tools and fragments (n>100), scrapers (n=5), choppers (n=5), one hammer, one utilized flake, El Paso brownware sherds (n=45), one Jornada brownware sherd, Chupadero Black-on-white (n=12), and Three Rivers Red-on-terracotta (n=2)	Early Pithouse to Late Pueblo Jornada Mogollon (A.D. 200 to 1500)	Eligible, D	4

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This appendix contains site and isolated occurrence locational maps.

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