AN ARCHAEOLOGICAL SURVEY OF 5.4 ACRES
FOR A PROPOSED COMPRESSOR STATION
ON PUEBLO OF LAGUNA LANDS
VALENCIA COUNTY, NEW MEXICO

by

Steven R. Hoagland

submitted to

Gas Company of New Mexico
P. O. Box 1899
Bloomfield, New Mexico 87413

submitted by

Kenneth J. Lord, Ph.D.
Principal Investigator
CHAMBERS GROUP, INC.
2021 Girard Blvd. SE, Suite 205
Albuquerque, New Mexico 87106

July 25, 1990
Chambers Group, Inc. has completed an archaeological survey of 5.4 acres of Laguna Pueblo Tribal Lands, Valencia County, New Mexico. The survey was performed in preparation for a proposed 3.56 acre Gas Company of New Mexico Compressor Station. The additional two acres were surveyed as a 15 meter (50 ft) wide buffer zone.

Two chipped stone isolated occurrences were located and recorded during the survey. These two isolated occurrences are no longer thought to be potentially significant as adverse effects were mitigated through field recordation. Based on the lack of significant intact cultural resources, clearance is recommended for construction of the proposed Gas Company of New Mexico Compressor Station.
INTRODUCTION

Chambers Group, Inc. (CGI) has completed an archaeological survey for the Gas Company of New Mexico. The survey was requested by Mr. Juan E. Betoni on July 3, 1990, for a proposed 3.56 acre compressor construction site. Authorization to proceed was received on July 18, 1990 from the Tribal Secretary, Pueblo of Laguna in Laguna, New Mexico. The work was performed under a Bureau of Indian Affairs Albuquerque Office permit number CRSA 89-21 and a letter of authorization from Victor Sarracino, Tribal Secretary of Laguna Pueblo. Fieldwork was conducted on July 19, 1990, by Steven R. Hoagland, Archaeologist. Mr. Juan E. Betoni provided plans and a location map for the project and accompanied Mr. Hoagland to the project area. Dr. Kenneth J. Lord served as CGI's Principal Investigator.

PROJECT LOCATION

The survey area is a 5.4 acre parcel of unsectioned land situated within the Laguna Indian Reservation. The survey was conducted across POL lands on the Laguna Indian Reservation (Antonio Sedillo Grant) approximately seven miles southeast of the State Highway 6 and I-40 Interchange, and four miles west of the Valencia/Bernalillo County line. More specifically it is situated 1.4 miles west of the confluence of State Highway 6 and the Atchison, Topeka and Santa Fe railroad line, on lands adjacent to existing Gas Company of New Mexico Facility. The location of the proposed compressor site is depicted on the South Garcia, New Mexico, 7.5 min topographic quadrangle map (see Figure 1). Legal description for the project area is T8N, R3W, projected section 25. The UTMs for the project area are as follows:

| Zone 13 | NW Corner | 307340mE; 3863200mN |
| NE Corner | 307480mE; 3863210mN |
| SE Corner | 307510mE; 3862980mN |
| Turn North | 307440mE; 3862940mN |
| Turn West | 307440mE; 3863010mN |
| SW Corner | 307380mE; 3862970mN |
Figure 1
Location of Project Area
LEGISLATIVE AUTHORITIES

The present survey was conducted in accordance with existing environmental legislation for the protection of natural and cultural resources as outlined by the State of New Mexico Cultural Properties Act of 1969 (revised 1978) and Federal legislation such as the Executive Order 11593 (1972), the Environmental Policy Act of 1969 (91 state 852), and the National Historic Preservation Act of 1966. This legislation was passed in response to interest of the scientific community and many segments of the American public in recognition that the material remains of prior cultures are a limited, non-renewable aspect of the environment and contain data of intrinsic historic and social significance.

PROJECT IMPACTS

Construction impacts would include the blading and subsequent graveling of site locales that don't contain above ground compressor station features. Foundation excavations for the compressor facility would extend no deeper than two to three feet and trenches for the required gas line pipes would be excavated to an approximate depth of three feet below surface.

MODERN ENVIRONMENT

The proposed project area is located at an elevation of 1,643 meters (5,390 ft above sea level) on the gradual southwest slope of Black Mesa. Garcia Arroyo is located approximately 0.34 miles to the south-southeast. The proposed site has been heavily sheet washed in the recent past. Resultant of this sheet washing, the vegetation is somewhat sparse, thus ground visibility was excellent.

The average annual precipitation in the project area ranges from seven to ten inches with about half of the annual average falling between July and September. The mean annual temperature in the eastern portion of Valencia County is 57 degrees Fahrenheit. The frost
free season in lower elevations is about six months long, extending from late April to mid-October (Maker et.al. 1974).

Soils

The soils in the project area are dominated by the Penistaja-Prewitt-Moriarty association. These soils which generally occur on nearly level to strongly sloping and undulating landscapes, are dominantly formed in alluvial sediments of mixed origin. They are generally deep, well drained, and moderately fine to moderately coarse-textured (Maker et.al. 1974). The surface soil in the project area is a brown to reddish brown, fine sandy, loam with numerous tabular sandstone gravels which appear to be washing down from Garcia Mesa. The sandstone is more abundant in the upslope portions of the project area. Below the surface loams, soils found in the Penistaja-Prewitt-Moriarty association are frequently a fairly thick deposit of a sandy clay, loam.

Vegetation

A fairly sparse scatter of juniper trees were noted along the northeastern edge of the project area. These trees became more abundant with increased upslope elevation. Shrubs noted in the project area were: narrow leaf yucca, snakeweed, rabbit-brush, sage, Mormon tea, saltbush, mesquite, various species of cacti, and various annuals. Grasses frequently supported by the local soil association include; Indian ricegrass, blue grama, galleta, alkali sacaton, western wheatgrass, sand dropseed, ring muhly, sideoats grama, and three-awns (Maker et.al. 1974).

SURVEY METHODOLOGY

The project area was inspected by means of spaced interval transects; 100 percent coverage was achieved by walking parallel transects 12 meters apart. The transects were oriented
east and west except for the small area situated east of the existing fenced measurement station which was walked north and south. Suspect anomalies were inspected in greater detail and no collections were made. The actual zone of proposed disturbance is restricted to a 3.56 acre area. A 15 meter wide (50 ft) buffer zone was also examined for the areas bordering the proposed compressor station (except in the vicinity of the existing facility) increasing the area surveyed to 5.4 acres (see Figure 2).

PREVIOUS ARCHAEOLOGICAL RESEARCH

No sites on the National Register of Historic Places, or the State Register of Cultural Properties, or sites nominated to these registers are located in the project area.

No new significant cultural resources were identified during the completion of this survey, thus no detailed cultural resources overview will be presented in this document. Tainter and Gillio (1980) provide an excellent overview of the Mt. Taylor District which includes information on the Rio Puerco Valley. Stuart and Gauthier (1984) also provide information on the region.

Two sites have been previously recorded within a mile southeast of the project area. These sites were recorded during the 1981 survey conducted for the Gas Company of New Mexico by the Office of Contract Archeology. These sites are LA 34112 and LA 34116. LA 34112 is a small ceramic and lithic scatter containing local graywares, Socorro Black-on-whites, local Mancos Black-on-whites, and corrugated utility wares. This site dates to the Pueblo III period.

LA 34116 consists of a rectangular stone alignment and several possible structural foundations. Structural remains include upright sandstone slabs. Artifacts found in association with this site include groundstone (metate fragments), lithics (flakes and cores), and ceramics including Mancos Black-on-white, Socorro Black-on-white, and gray and white
wares. This site has been identified as a hunting and gathering site dating to the PII-PIII period.

RESULTS OF THE SURVEY

Two isolated occurrences were located during the survey. The location of these artifacts are shown in Figure 1. UTMs for Isolated Occurrences (IO) #1 and #2 are as follows:

Zone 13  
IO #1  307360mE; 3863120mN
IO #2  307420mE; 3863040mN

Isolated Occurrence #1 is a red, clear, and grayish brown chalcedony decortication flake measuring 4.5 x 3.75 x 1.5 cm. This artifact is the proximal portion of a flake that has a cortical platform, step termination, and about 15% dorsal cortex.

Isolated Occurrence #2 is a white, clear, brownish gray chalcedony decortication flake measuring 1.75 x 1.75 x 1 cm. This medial flake fragment has a step termination and about 18% cortex remaining on the dorsal surface.

RECOMMENDATIONS

It is the opinion of the author based on the current archaeological survey, that construction of the proposed Gas Company of New Mexico Compressor Station will have no effect on any significant cultural resources. It is felt that all potential information has been recovered through artifact recordation of Isolated Occurrences #1 and #2, thus they are no longer thought to be significant. There is no evidence to suggest that there are any subsurface remains associated with either of the documented isolated occurrences, in fact, it is very likely the these artifacts were sheet washed into the project area.
Construction of the proposed Gas Company of New Mexico compressor station will have no effect on any known significant cultural resource(s). If any subsurface cultural resource manifestations are located during construction, work must be halted, until a qualified archaeologist can assess the significance and develop an approved mitigation plan if one is warranted. With this stipulation cultural resource clearance is recommended for construction of the proposed Gas Company of New Mexico Compressor Station.

REFERENCES CITED

Maker, H.J., C.W. Keetch, and J.U. Anderson
1974 *Soil Associations and Land Classification for Irrigation, Valencia County.* New Mexico State University.

Stuart, D. and R. Gauthier
1981 *Prehistoric New Mexico: Background for Survey.* Historic Preservation Bureau, Santa Fe.

Tainter, J.A. and D."A". Gillio
1980 *Cultural Resources Overview, Mount Taylor, New Mexico.* USDA Forest Service and Bureau of Land Management, Albuquerque and Santa Fe.

Wozlak, Frank E.