## The Eastern California Border: Cultural

## and Temporal Affinities\*

### Francis A. Riddell

The western periphery or more properly the Eastern California border of the Great Basin, for the purposes of this report, includes that section of California extending from the Oregon border to the Mojave Desert. The northwestern periphery and the southern periphery do not directly concern this presentation, except in so far as they are referred to for purposes of comparison and contrast.

Investigations of an archaeological nature undertaken in the past by a number of students interested in the western periphery have been compiled and mapped by Baumhoff and Elsasser (1956). Their very useful and graphic presentation provides a series of references to excavations and/or archaeological site surveys along the western border of the Great Basin. The listing below of areas closely follows the one which appears on their map and in their references.

Proceeding north to south from the Oregon border we have the following investigations:

Area 1. The Graham Brothers Collection completed before 1930; State Indian Museum Accession #6. Although lacking specific site provenience this vast collection from northeastern California and southeastern Oregon provides a body of material from which some information can be gleaned, including possible relationship with such Early Man sites as Lind Coulee in Washington, and the Narrows at Lower Klamath Lake, California.

Area 2. The Klamath-Tule Lakes area of Modoc and Siskiyou Counties. Early work in the area has been published (Cressman, 1942). Subsequently, between 1952 and 1954, R. J. Squier and G. L. Grosscup excavated, or testexcavated, five sites and undertook site surveys in this region of California. This work, done for the University of California Archaeological Survey, has resulted in the recognition of a tentative three-phase cultural sequence for that region (Squier, 1956). The sequence apparently only involves the last 1500 years.

Area 3. The Honey Lake region of Lassen County. Work here includes site surveys and the excavation of two caves and one open site (Riddell,

<sup>\*</sup> Read at the 4th Annual Great Basin Conference, San Francisco, California, August, 1957.

1956a). Most of this work was done by the writer since 1946 and was supported principally by the University of California Archaeological Survey. The investigations have led to the definition of several culture periods, and have provided significant cultural and temporal evidence of relationships to other regions, both within and outside of the Great Basin. More will be said about this area below.

Area 4. The Truckee Basin-Lake Tahoe region. Archaeological site surveys and surface collections by R. F. Heizer and A. B. Elsasser (1953) in 1952 in this region of east-central California have resulted in the definition of the Martis and Kings Beach Complexes. It is proposed that the Martis Complex may have an antiquity of several thousand years, and is distinguished by the great preference of basalt for stone tools to the near exclusion of other stone materials. The Kings Beach Complex is "probably ascribable to the late prehistoric Washo tribe" (Heizer and Elsasser, 1953, p. 20). Additional investigations are being prepared for publication.

Area 5. Mono County. Five small areas, both north and south of Mono Lake, were surveyed by C. W. Meighan in 1953. Most of the 300 sites recorded appear to belong to the late prehistoric period. Meighan states, however, that "There is some evidence for earlier cultures equatable with Lovelock, Pinto Basin, and Amargosa cultures; however, the precise nature of these connections remains to be defined" (Meighan, 1955, p. 21).

Area 6. Vermilion Valley, Fresno County. A high elevation summer village just west of the Sierra crest was tested by D. W. Lathrap in 1953. The site may have been culturally stratified but the limited excavation there was not sufficient to reveal it. The cultural remains recovered, however, "present a fairly satisfactory picture of the terminal phase of aboriginal occupation in this section of the High Sierra" (Lathrap and Shutler, 1955, p. 238).

Area 7. Owens Valley, Inyo County. A probable winter village of the Owens Valley Paiute (Iny-2) was partially excavated in 1950 by H. Riddell. As a result of this work the site serves as the type site for the protohistoric and early historic periods of the Owens Valley region Riddell, 1951). It was at this site that pottery now known as Owens Valley Brown Ware was first described. Archaeological site survey and limited test excavations have been undertaken in the Owens Valley region with the result that a 13,000 specimen collection was amassed by Mr. and Mrs. H. Riddell. The collection, now housed in the University of California Museum of Anthropology, provides evidence of several cultural periods for this region (Riddell and Riddell, 1956).

Area 8. Rose Spring, Inyo County. This deeply stratified site, excavated in 1956 for the University of California Archaeological Survey by F. and H. Riddell, is of considerable importance as it provides cultural evidence covering the last several thousand years. The upper 18 or 24 inches of the site deposit produce Owens Valley Brown Ware potsherds, which are lacking in the remaining 6 to 8 feet of deposit. A burial from this site had in association a mass of ring-shaped abalone shell ornaments which indicate Pacific Coast contacts at a time preceding the late period. Additional details will be presented for this site below.

Area 9. The Stahl Site at Little Lake, Inyo County. Excavation began at this site in 1948 under the direction of M. R. Harrington (1948; 1957) and continued for several seasons. The site seems to be of some antiquity and has Pinto Basin affinities (Hamilton, 1951). It apparently immediately precedes the Rose Spring site in time. House remains in the form of post holes were revealed during excavation.

Area 10. Northern Death Valley, Inyo County. Site survey in this area in 1951 by the University of California Archaeological Survey produced a number of sites, none of which appear to be of any great antiquity (Lathrap and Meighan, 1951, p. 25). The excavation of a rock shelter in the Panamint Mountains, Death Valley National Monument, was directed in 1951 by C. W. Meighan under the sponsorship of the University of California Archaeological Survey (Meighan, 1953).

Area 11. Death Valley National Monument. Besides the work done by Meighan in Death Valley a systematic investigation has been under way for the past five years by Wallace and Taylor. Their comprehensive work has allowed them to identify a series of four cultural complexes which they believe extend from 6000 B.C., or earlier, to the present Desert Shoshone (Wallace, 1958).

With these preliminary definitions made and a brief listing of the major archaeological activities along the mestern periphery given, I would like now to reconsider several of those sites, or areas, from which a considerable amount of information has been obtained. The information from them will be, in a general way, typical for the region of the western periphery in which they are located. I have reference to: (a) the Lassen County area of northeastern California; (b) the Owens Valley region in Inyo County, in south-central California east of the Sierra; (c) the deep stratified Rose Spring site a few miles south of Owens Valley, in Inyo County.

Work in the Lassen County area primarily has been through my efforts, with the result that several hundred sites have been recorded. Excavation of Amedee Cave has defined the proto-historic period, and the excavation of Tommy Tucker Cave has additionally defined the late period (Riddell, 1956b). On the basis of specific cultural similarities Tommy Tucker Cave has been equated with the Late Lovelock period. It is possible, but not demonstrable at this time, that Tommy Tucker Cave also has Middle Lovelock relationships (for these culture periods, see Heizer, 1956). Amedee Cave has been assigned to the Late Lovelock period, and especially to the protohistoric period. The only open site so far excavated is the productive Karlo site located some 15 miles north of Honey Lake (Riddell, 1956c). Evidence provided by the faunal remains suggest a climate similar to or perhaps even moister than that found today. The elk remains recovered do not suggest the dry, Altithermal period of occupation, but rather the moist Medithermal period. Cultural affinities with Central California are demonstrated by the recovery at Karlo of abalone and ocean mussel shell beads typical of the Early Period of Central California, which has a terminal date of approximately 4000 years ago.\* The Karlo beads and associated artifacts form a complex which I believe is coeval with the end of the Early period, or with the beginning of the Central California Middle period. Since the Early Period falls within the dry Altithermal period, the Karlo site appears not to have been established until the more moist Medithermal Period began.

The similarities between the projectile points at Karlo and Danger Cave, in both amount recovered and in type, are interesting and possibly significant. Were it not for the radiocarbon dates for Danger Cave (Jennings, 1953), which indicate the earliest occupation approximately 9000 years ago, one might guess from the similarity of the two projectile point assemblages that Karlo and Danger Cave were much more closely related temporally.

Karlo was occupied into the proto-historic and historic times, although clear evidence of a continuum is absent. Comparison of the Karlo materials with those from Lovelock and Humboldt Cawes of west-central Nevada indicates close cultural ties and thus, presumably, temporal equivalence. The Karlo site is, therefore, considered to be an open site manifestation of the Lovelock Culture, including Early, possibly Transitional, and Late Lovelock periods. The site had been briefly reoccupied by the recent Northern Paiute (?) as suggested by several burials with "fresh" looking bones.

Just what preceded the Early Lovelock period in the Honey Lake region is not known with certainty. When new finds allow a more detailed description of the Leonard and Humboldt Cultures of west-central Nevada (Heizer, 1951) it may be possible to recognize them as filling the timegap of the Anathermal and Altithermal in portions of Lassen County. There is no reason to believe that this region of the western periphery was uninhabited through these periods.

The finding of what seems to be a Scottsbluff point (personal communication with Alex Krieger for this definition) in a private collection in Lassen County is of possible significance. The specimen is of such a size (ca. 12 cm. long) that it cannot be conveniently categorized as a variant Lind Coulee type stemmed point (cf. Daugherty, 1956). It came

<sup>\*</sup> Recently secured radiocarbon dates from University of Michigan Memorial-Phoenix Project Radiocarbon Laboratory for Early Horizon site SJO-68 are as follows: Sample M-645, 4100 + 250 years; Sample M-646, 4350 + 250 years (communication with R. F. Heizer).

from Secret Valley at a point several miles south of the Karlo Site. It was was a surface find in an area in which each stabilized sand dune is an archaeo-80logical site, each producing specimens typical of the Lovelock Culture. Provocative, however, is the considerable amount of highly mineralized bone pne material of Pleistocene fauna, including mammeth, bison, camel and horse, 9 which is weathering out of the arroyos here. Since Secret Valley was at one time a Pleistocene lake and marsh, it is not surprising that this late te Pleistocene fossil faunal assemblage is present. It would be premature, however, to argue for an association between these fossil remains and the e stone artifact without having better information.

Continuing in the same speculative vein it might be well to mention the basal fragments of points which are similar to Plainview points (defined ined by Alex Krieger in personal communication). These basally thinned specimens mens from Lassen County exhibit lateral and basal edge grinding. They were collected by a local man and we have no site provenience for them.

Archaeological investigations in Owens Valley, Inyo County, primarily ly consist, as noted above, of site surveys and the excavation of a winter village by Mr. and Mrs. H. Riddell (Riddell and Riddell, 1956). While site Iny-2, the winter village, is representative of the late proto-historic period, surface collections produce evidence of an earlier occupation ion in this region. The recovery of heavy projectile points and an atlatl weight contribute to this evidence.

The pottery from the Owens Valley region recovered archaeologically is is the same as that made in the ethnographic period by the Mono and Yokuts. Corrugated pottery of the Anasazi tradition is represented by a few sherds ds probably introduced by trade. Puebloan contact in this region of California centers about the exploitation of turquoise mines in the northerm Mojave Desert (Heizer and Treganza, 1941), and possibly Owens Valley itself. elf.

The small triangular projectile points, so common on late sites in Owens Valley, may be related to the ones of the same type found to the west est in the San Joaquin Valley and on to the coast. Evidence produced at the Rose Spring site, a few miles south of Owens Valley, just north of the Stahl site (Little Lake), demonstrates coast trade relationship possibly several thousand years ago (see below).

The projectile points from Owens Valley, both those of the heavy and d those of the light tradition, are closely comparable to those from other sections of the western periphery to the north. Although not fully equatable a cultural series like that observable for the Honey Lake area seems indicated for Owens Valley. In addition, cross-dating of the Rose Spring site with coastal sites is possible, and this will aid greatly in the temporal ordering of the archaeological materials from Owens Valley.

The Rose Spring site was excavated by a crew sponsored by the Univer- rsity of California Archaeological Survey in 1956, with the result that four burials were obtained from a cultural deposit which had a maximum depth of about 10 feet. Fortunately the deposit was culturally and physically stratified and the points of origin of the burial pits could be ascertained.

Pottery fragments and small projectile points were numerous in the upper levels, but potsherds were practically absent in the 18 to 24 inchlevel, and except for one sherd, found in the 24 to 36 inch level, lacking from 24 inches to base. Although small points occur throughout most of the deposit their numerical emphasis is in the upper levels. The reverse trend is observable for the larger points.

The Rose Springs deposit has been divided into three levels, by observation of the physical stratigraphy. A burial removed from the first (i.e., lowest level had its point of origin in level two. This burial of a juvenile was accompanied by a large quantity of abalone disc beads which seem to have been sewn to a garment in a shingled fashion. These washer-like rings are of the green back abalone (Haliotis cracherodii) and have been found in the Santa Barbara coast and island region whence they may be assumed to be derived.

In the absence of means of obtaining direct dates for the two lower strata at Rose Spring it may be tentatively suggested that the three strata equate with the three periods of the Lovelock Culture. This need not imply identical cultural content, but merely close temporal equivalence. Dating the Rose Spring site by the radiocarbon method would provide an excellent series of dates for this stratified site. Particularly good samples of charcoal were obtained from the base of the cultural deposit. A number of Cl4 dates for the western periphery would be of considerable aid in arriving at temporal relationships along the border, east into the Great Basin, and west into California. From both Rose Spring and the Karlo site we have adequate samples of charcoal for radiocarbon dating.

In summation, it can be stated that archaeological research along the western periphery of the Great Basin has progressed sufficiently to allow at least a tentative chronology to be prepared. The presentation above has listed and discussed most of the major archaeological projects along the border, and an attempt to indicate both temporal and cultural relationships has been made. More site reports and a series of radiocarbon dates will contribute greatly to the growing clarification of the cultural and temporal affinities of the western periphery of the Great Basin.

#### Bibliography

Baumhoff, M. A. and A. B. Elsasser Summary of Archaeological Survey and Excavation in California. 1956 UCAS-R No. 33, pp. 1-27. Cressman, L. S. 19/12 Archaeological Researches in the Northern Great Basin. Carnegie Institution of Washington Publ. 538. Daugherty, R. D. 1956 Archaeology of the Lind Coulee Site. Proc. Amer. Phil. Soc., Vol. 100, No. 3, pp. 223-78. Hamilton, A. 1951 Exploring the Past: America's Oldest Houses. Nat. Hist. Vol. 60, No. 8 (October), pp. 361-64. Harrington, M. R. 1948 A New Pinto Site. Southwest Museum, Masterkey, Vol. 22, No. 4, pp. 116-18. 1957 A Pinto Site at Little Lake, California. Southwest Museum Papers, No. 17. Heizer, R. F. 1951 Preliminary Report on the Leonard Rockshelter Site, Pershing County, Nevada. American Antiquity, Vol. 17, No. 2, pp. 89-98. 1956 Recent Cave Explorations in the Lower Humboldt Valley, Nevada. UCAS-R No. 33, pp. 50-57. Heizer, R. F. and A. B. Elsasser Some Archaeological Sites and Cultures in the Central Sierra 1953 Nevada. UCAS-R No. 21, pp. 1-42. Heizer, R. F. and A. E. Treganza 19山 Mines and Quarries of the Indians of California. Calif. Jour. Mines and Geol., Vol. 40, pp. 291-359. Jennings, J. D. Danger Cave: A Progress Summary. El Palacio, Vol. 60, 1953 No. 5, pp. 179-213. Lathrap, D. W. and C. W. Meighan An Archaeological Reconnaissance in the Panamint Mountains. 1951 UCAS-R No. 11, pp. 11-32.

Lathrap, D. W. and D. Shutler, Jr. 1955 An Archaeological Site in the High Sierra of California. American Antiquity, Vol. 20, pp. 226-240.

Meighan, C. W.

- 1953 The Coville Rock Shelter, Inyo County, California. UC-AR Vol. 12, pp. 171-224.
- 1955 Notes on the Archaeology of Mono County, California. UCAS-R No. 28, pp. 6-28.

# Riddell, F. A.

- 1956a Archaeological Research in Lassen County, California. UCAS-R No. 33, pp. 44-49.
- 1956b Final Report on the Archaeology of Tommy Tucker Cave. UCAS-R No. 35, pp. 1-25.
- 1956c Summary Report of the Excavation of the Karlo Site. Univ. of Utah Anthro. Papers, No. 26, pp. 63-73.
- Riddell, H. S. 1951 The Archaeology of a Paiute Village Site. UCAS-R No. 12, pp. 14=28.
- Riddell, H. S. and F. A. Riddell 1956 The Current Status of Archaeological Investigations in Owens Valley, California. UCAS-R No. 33, pp. 28-33.
- Squier, R. J. 1956 Recent Excavation and Survey in Northeastern California. UCAS=R No. 33, pp. 34-38.
- Wallace, W. J. 1958 Archaeological Investigations in Death Valley National Monument, 1952-1957. UCAS-R No. 42, pp. 9-24.