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Culture history of the German Gulch Chinese

Garren J. Meyer
The University of Montana

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A CULTURE HISTORY OF THE GERMAN GULCH CHINESE

by

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ABSTRACT

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The period 1850-1940 witnessed an extensive outmigration from the southeastern Chinese coastal provinces. These "overseas Chinese" migrated to nearly all corners of the globe, in the process becoming incorporated into new and varied social situations. After the Chinese settled in an area, internal segmentation often manifested itself. The segments were based on various criteria, including kinship, dialect, region of origin, surname, and occupation. Such internal differentiation among the overseas Chinese suggests that we should be cautious in our interpretations regarding Chinese "ethnicity", which is just as likely to have a "Chinese-Chinese" dimension as a "Chinese-Host Population" dimension.

A portion of this thesis focuses on the presence of segmentation within the German Gulch, Montana Chinese community and how this might be manifested in the documentary and archaeological record. Another issue addressed by this thesis examines the extent to which ethnic segmentation among the Chinese in Silver Bow county followed the pattern exhibited in California and elsewhere. Additional questions addressed herein include the nature of relations between the Chinese and Euroamericans, the role of socioeconomic class distinctions within the Chinese community, and the nature of settlement patterns and artifact variability both within German Gulch and with reference to other Chinese placer mining settlements. Perhaps the overriding aim of this study is simply to present a fuller culture-historical account of the German Gulch Chinese community.

Information derived from historical research and archaeological investigations tends to support the hypothesis that the social structure of the Chinese miners in the gulch was relatively egalitarian. While certain individuals sometimes provided all of the capital for mining ventures, entitling them to sole control, the forming of partnerships was perhaps most common. A type of entrepreneurial system is thus hypothesized. Based on documentary sources, it is apparent that the Chinese organized themselves on the basis of regional distinctions, a pattern which coincides with the situation found in the early stages of Chinese settlement in California. The increasing complexity of the Chinese community led to the later adoption of surname as a criteria of identification among the Chinese who later settled in nearby Butte.
ACKNOWLEDGMENTS

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CHAPTER 1. INTRODUCTION

Cultural resource studies in the German Gulch Historic District (24SB212) date from the 1980s, when mining companies began a renewed interest in developing lode mines at the head of the gulch. The renewed interest in mining prompted Section 106 studies and other activities designed to comply with federal and state regulations pertaining to environmental laws. Cultural resource studies by Steere (1982), Fredlund and Anderson (1984) and (Herbort 1984; 1988) led to a definition of the boundaries of the historic district, and the recordation of a total of over 50 cultural sites, mostly historic in age. The sites (denominated as "localities" within the district) are centered on a variety of cultural features including stone building foundations, placer workings, logging sites and the remains of mining-related structures. The cultural resource work in the 1980s also documented five localities with Chinese-affiliated artifacts. Mitigation work in 1988 and 1989 involved large-scale excavation at one Chinese-related site, along with small-scale excavations and recording at five other sites, most with Chinese associations (Fredlund et al 1991).

Investigations for this thesis included a review of the information collected by the previous studies, additional documentary research, additional fieldwork at
selected sites, and a review of the literature on the "overseas Chinese", Chinese-affiliated archaeological sites, and Chinese ethnicity. Some of the thought which helped shape the ideas for this study stemmed from anthropology graduate seminars that I participated in at the University of Montana. These courses dealt with ethnicity both as manifested in material culture and in social action.

The Physical Setting of German Gulch

German Gulch is a northeast trending valley within an unnamed range of mountains lying between Butte and Anaconda, Montana. German Gulch creek is a tributary of Silver Bow Creek, which joins with Warm Springs Creek a short distance downstream to form the Clark Fork River, a major tributary of the Columbia. The gulch lies west of the Continental Divide, which follows the high country to the immediate south and east. The valley of German Gulch is very narrow, and is bordered with steep, V-shaped slopes that rise nearly a thousand feet above the valley floor. The hills surrounding the gulch are generally heavily forested with lodgepole pine and Douglas fir. A few open areas are covered mainly in sagebrush. The terraces and flood plains are vegetated with a mixture of conifers, deciduous trees (primarily aspen), willows and a variety of riparian shrubs. Elevation in the area varies
from 6,000 to 8,000 feet (1,800 to 2,400 meters) above sea level.

At most times of the year, the day has elapsed to a significant extent before most areas receive direct sunlight. Because of the elevation and aspect, opportunities for crop production are probably non-existent, especially in the upper reaches of the gulch. Much of the annual precipitation comes in the form of snow. At the time of initial settlement in the nineteenth century, the gulch bottom was heavily forested and difficult to access. For the first few years, only a primitive trail connected the various settlements within the gulch (Edwards 1908).

German Gulch lies within the Boulder batholith. The ore deposits, which lie in the upper end of the gulch, are low grade, and contain gold, tellurides of gold, pyrite, chalcopyrite, malachite, melanterite, gypsum, serpentine, talc, limonite, quartz and hematite (Winchell 1914:101-102; Sahinen 1935:91-92).

The stream bottom has been severely disturbed as a result of historic placer mining. The placer deposits in German Gulch are classified as creek placers, bench placers and residual placers. The placers owe their existence to the weathering of the large bodies of low grade ore found near the head of the gulch. Originally, the placer deposits were approximately 150 feet in width
and overlay bedrock at an average depth of fifteen feet (Karvinen 1954:12).

The area surrounding the gulch is primarily within the jurisdiction of the Beaverhead-Deerlodge National Forest, although most of the property within the gulch itself is in private ownership as a result of mine patents.
Figure 1. Map of the area surrounding German Gulch. Based on the Deerlodge National Forest Visitor/Travel Map (1990).
Theoretical and Methodological Orientations

The theoretical and methodological orientations utilized in this thesis are difficult to locate precisely. The foundational literature includes works in ethnology, history, geography and archaeology, and the approach used here borrows from all of these disciplines to a certain extent. For the most part, I have a tendency to view various theoretical positions as complementary rather than oppositional, and to therefore be somewhat eclectic in the types of theory that might influence my thinking and approach. The theoretical underpinnings of many of the approaches used in this thesis may not at times be fully acknowledged. The reason for this may lie, in part, on the fact that one's thought process reflects all of life's experiences, and not simply the theoretical or methodological posturing of this school or that:

What then, is truth? A mobile army of metaphors, metonyms and anthropomorphisms- in short a sum of human relations, which have been enhanced, transposed and embellished poetically and rhetorically, and which after long use seem firm, canonical, and obligatory to a people: truths are illusions about which one has forgotten that this is what they are (Nietzsche 1873, quoted in Shennan 1994:1).

Like many archaeologists, I tend to be materialistic and ecological in my approach to material culture (after, for example, Steward 1955; White 1988[1949]), while acknowledging that other bases for elucidation, such as historical or cognitive approaches (e.g. Levi-Strauss
1962; Mahmood 1992), might be more appropriate for non-material aspects of culture. I also attempt to combine generalizing and particularistic approaches, and relate the isolated locale of German Gulch to the broader picture, which is really worldwide in its scope (see, for example, Wolf 1997[1982]). In a similar vein, I attempt to be macro-historical and macro-geographical in my approach while also paying close attention to localized and temporally limited patterns and how they might fit into the larger picture. Indeed, the pattern of Chinese ethnic and cultural differentiation has roots which extend back to the earliest history of the Chinese state. In large part, these cultural patterns migrated overseas with the worldwide dispersal of the southeastern Chinese people. In some ways what I am attempting here is akin to Schuyler's (1988) call for a "New Culture History" which emphasizes the utilization all sources of data (not just archaeological remains) in order to provide the fullest possible explication of cultural processes.

Research Objectives

The period 1850-1940 witnessed an extensive outmigraton from the southeastern Chinese coastal provinces. These "overseas Chinese" migrated to nearly all corners of the globe, in the process becoming incorporated into new and varied social situations. After the Chinese
settled in an area, internal segmentation often manifested itself. The segments were based on various criteria, including kinship, dialect, region of origin, surname, and occupation, to name the most salient. All of these principles of segmentation were used in Chinese cities as well as overseas communities (Crissman 1967; Hamilton 1977:338), but the presence or absence of segmentation and the basis for segmentation varied according to a host of influences impinging on the various Chinese communities (Coughlin 1960:35; Crissman 1967:189; Hamilton 1977:348; Armentrout-Ma 1983; Fei 1992:127). The interrelationships between the various segments were often marked by avoidance and intermittent conflict (Crissman 1967; Armentrout-Ma 1983).

Such internal differentiation among the overseas Chinese suggests that we should be cautious in our interpretations regarding Chinese "ethnicity", which is just as likely to have a "Chinese-Chinese" dimension as a "Chinese-Host Population" dimension. This depends also on one's definition of "ethnic". Many if not most works dealing with Chinese immigrants on the mining frontier include, at best, scant reference to such internal segmentation, and there is perhaps broad misunderstanding of the nature of internal segmentation or even an awareness that such boundaries existed. The entire volume of Wegars (1993), a collection of articles on the archaeology of the
overseas Chinese, contains hardly a reference to segmentation among the Chinese. Although two of the authors in the Wegars volume tangentially recognize "different groups of Chinese" (Stapp 1993:12) and "ascriptive and exclusive categories of kin" (Staski 1993:129-130), the vast majority of the studies done to date speak of "Chinese" ethnicity only with reference to the white majority. Perhaps a typical example is Felton et al (1984:84), who devote a short paragraph to "Ethnicity", discussing only the dimension of "Chinese" ethnicity as reflected in artifacts. The failure to consider the culturally diverse nature of the Chinese is not restricted to archaeology, but is symptomatic within the broad field of Chinese studies (Moser 1985).

A portion of this thesis focuses on the presence of segmentation within the German Gulch Chinese community and how this might be manifested in the documentary and archaeological record. A single historic document (Edwards 1908) indicates the presence of two Chinese ethnic groups in German Gulch- the Sze Yap and Sam Yup. These two groups came from a small area around the city of Canton in Kwangtung, a southeastern Chinese province. Relations between the Sam Yup and Sze Yaps were often marked by tension and avoidance, both social and economic (Edwards 1908; Cook 1931). At certain times and places, animosity between the two groups could deteriorate to the point of bloodshed, as exemplified by incidents such as the
Weaverville, California "war", in which as many as twenty people were killed (Barth 1964).

Although the documentary record on the German Gulch Chinese is scant with specific references to the two groups, there is evidence of social avoidance and animosity (Edwards 1908), as well as of homicides perpetrated on Chinese individuals by other Chinese (McCleery 1876; Edwards 1908; Butte Miner October 31, 1876). Additional evidence that could shed light on relations among the Chinese includes the presence of artifacts related to personal defense, residence clustering, variation in the archaeological assemblages, and records of commercial transactions which might indicate the nature of economic relations both among the Chinese and between the Chinese and Euroamericans.

Armentrout-Ma (1983), in pointing to the dynamic nature of social relationships among the overseas Chinese, describes various historic phases of ethnic segmentation among the California Chinese community in the nineteenth century. One question addressed by this thesis examines the extent to which the Chinese in Silver Bow county followed the California pattern. Other research questions addressed herein include the nature of relations between the Chinese and Euroamericans, and the role of socioeconomic class distinctions within the Chinese community.

Perhaps the overriding aim of this study is simply to present a fuller account of the German Gulch Chinese
community. Since the beginnings of this study, I have become increasingly aware of a general lack of knowledge concerning the important role of Chinese immigrants in Montana. However, I have also detected an increasing interest toward the subject. I have noted both tendencies among other anthropology students. Celebrations of the Chinese New Year in Butte in recent years perhaps exemplify the trend among the general public. With this situation in mind, I feel it is a worthwhile endeavor in its own right to "tell the story" of the Chinese in German Gulch (Pluciennik 1999).

**Thesis Organization**

The organization of this thesis is both thematic and roughly chronological. Chapter 2 summarizes the process of state building in China, ethnic incorporation, the spread of Chinese culture and the processes of Chinese identity formation over time. Chapter 3 describes salient aspects of Chinese social organization in Late Imperial times, when the migrations of the overseas Chinese primarily took place. Chapter 4 is a broad overview of the movements of the overseas Chinese, and the various principles of ethnic segmentation that were utilized in different times and places. Chapter 5 is an overview of the history of Chinese immigration on the American mining frontier along with a discussion of the social relations
of the Chinese in the western United States. Chapter 6 is an overview of the nineteenth century mining communities in German Gulch. Chapter 7 summarizes the development and decline of Chinese communities in Silver Bow county, Montana. Chapter 8 focuses on the German Gulch Chinese community, and summarizes available demographic data from the U.S. censuses, the pattern of Chinese claim ownership as revealed by the records of real estate transactions and other documents, and a discussion of social and ethnic relations pertaining to the Chinese community within German Gulch. Chapter 9 includes a summary of the results of previous and current fieldwork in German Gulch, and an analysis of certain aspects of the archaeological record in conjunction with the documentary record. Chapter 10 discusses salient aspects of the results of this study in an attempt at a synthesis of the available data from archaeological and documentary sources, and suggests possible avenues for further research. The main purpose of the earlier chapters is to contextualize the study of Chinese immigrants; and to demonstrate the complexity and situational basis of Chinese ethnicity and social organization. The later chapters attempt to describe the pattern of sociality among the German Gulch Chinese and locate them within this global and macrohistorical context while analyzing the extent to which they shared in the broader pattern.
CHAPTER 2. ETHIC INCORPORATION IN IMPERIAL CHINA

Despite the emphasis on internal divisions emphasized in this study, many elements of Sinitic culture have shown remarkable continuity over time. This is a fact often belabored in the extensive literature on Chinese history. For example, one would be hard-pressed to find parallels for the longevity of such elements of culture as the "Classical" Chinese script, which has endured for thousands of years. Researchers have discovered somewhat simplified but still largely recognizable characters of this script inscribed on tortoise shells and oracle bones dating from the Shang Dynasty (1766-1112 B.C.) (Fairbank et al 1978:22; Moser 1985:2; see also comparative illustration in Watson 1966:59). Indeed, no other modern state can trace its origins so far back in time as China. By comparison, the modern states of Egypt and Greece have little, if any, cultural connection with their ancient counterparts, and the written languages of the Egyptians and Sumerians were "lost until deciphered by scholars within the last 200 years. Classical European languages such as Latin, while bequeathing recognizable influences in modern European literary culture, are nevertheless dead except for certain specialized purposes such as ritual.

The longevity of the Chinese state and culture has often been attributed to its ability to incorporate
culturally diverse groups while promoting an official ideology of cultural unity. This effort has included the promulgation of a universal written language, an emphasis on certain common elements of culture, and a deemphasis on cultural diversity. Throughout its long history, the Chinese state has consistently sought unity within a culturally diverse people while promoting an ethnocentric worldview which places China (Zhongguo—the "Middle Kingdom") at the center of a barbarian periphery (Moser 1985:2; Wu 1994).

The Formation of the Chinese State

The roots of civilization in China are multiple and varied, with origins and cross influences throughout Eurasia (Fairbank et al 1978:17-32; Fagan 1996:137-141). Where it was once usual to speak of a "cradle" of civilization in central China, archaeological investigations since the 1970s have complicated the picture, and it is now clear that there were several loci of agricultural and subsequent urban development throughout China. Nevertheless, the central region of China was the scene of development of the earliest dynasties referred to in ancient texts. Archaeological investigations have shed further light on the matter, largely confirming the veracity of traditional accounts. The earliest historical dynasties are collectively known
as the Sandai triplet- the Xia, Shang and Zhou (Fagan 1996:137-141).

The Xia, known from traditional texts as the first Chinese dynasty, probably refers to an ethnic group or city state of limited power rather than an expansive empire (Moser 1985:13). The Xia may have a correlate in the site of Erlitou (post ca. 2000 B.C.), a walled city discovered in a district traditionally associated with the Xia (Fagan 1996:136-141). The terms "Xia" and its probable variant "Hua" have long been used singly or in combination (e.g. "Hua-Xia") as a term of identification among the Chinese (Moser 1985:14; Wu 1994; Wei-ming 1994:3).

**The Chinese Empire**

The decline of the last dynasty of the Sendai triplet, the Zhou, was marked by nearly 250 years of instability known as the Period of the Warring States (475-221 B.C.), during which several kingdoms vied for power. Over time, the field was narrowed to a few larger contenders that had absorbed rival states. Finally, the state of Qin, a non-Han "barbarian" state on the western periphery, gained control. The Qin Dynasty established hegemony over most of the warring states but did not outlive the Qin emperor, who had named himself Shihuangdi, or "First Emperor". A period of political chaos and
rebellion followed, until one of the contenders, Liu Bang, proclaimed the "Han" dynasty in 206 B.C. The Han was named after a tributary of the Yangtze River. Liu Bang was posthumously named Kao Tsu, or "High Progenitor". (Moser 1985:17-18; Fagan 1996:59, 143; Fairbank et al 1978:56-60).

The Han Dynasty

The long reign of the Han Dynasty (207 B.C.-220 A.D.) was formative in the development of Chinese culture and identity (Moser 1985; Fairbank et al 1978). In terms of power, longevity and historical significance, the Han Empire invites comparison with the Roman Empire, which rose to dominance at about the same time (see, for example, Fairbank et al 1978:59). Probably the most significant accomplishment of the Han Dynasty in terms of Chinese identity was the development of "Classical Chinese", which made it possible to transcribe the numerous Sinitic dialects into a form that could be comprehended by any literate person. Classical Chinese was invented about 200 A.D., but was derived from much older works such as the "Five Classics" of the first millenium B.C. The system thus represented a hybrid of both archaic and then-current linguistic structures, and was essentially an artificial language (Fairbank et al 1978:41; Moser 1985:20-21).
The implications of the development of Classical Chinese as a unifying factor and as a molder of identity cannot be overemphasized. Classical Chinese was the primary form of written communication in China from A.D. 200 to about 1920 and was also used at times in Korea, Japan and Vietnam. The writing system must have greatly simplified problems of bureaucratic administration and control, helping to establish a sense of unity within a far flung, polyglot empire. In addition, the development of Classical Chinese went hand in hand with reinterpretations (and misinterpretations) of "Classical" texts, which enabled the Han to inculcate a sense of continuity with a glorious past embodied in the "Great Tradition" of high Chinese culture. Even today, much resistance is encountered from attempts to simplify the more cumbersome aspects of the writing system. According to one author, "...such changes are likely not only to destroy continuity with the past but also bring out into the open the degree to which the various Sinitic forms differ when spoken" (Moser 1985:21).

Such perceived connections made it possible for Han Dynasty historians to create the useful fiction of a politically unified past that probably contributed more than any other factor toward the development of a conception of "China" as a cultural entity (Moser 1985:20; Wei-Ming 1994: 2-3). "Han" is a term still generally used
to distinguish "ethnic Chinese" from "minority nationalities" within the Chinese state such as Mongols, Tibetans, and Zhuangs (Moser 1985:2; Eastman 1988:8; Wu 1994).

**The Expansion of Chinese Culture**

Under the Han and its successors, Sinitic culture underwent a gradual expansion beyond the Chinese core area in the north. This was accomplished through conquest and/or through such political means as the use of marriage alliances and the education of non-Han elites in Chinese language and culture (Moser 1985:23-24). While Sinitic culture expanded more or less continuously, the area under control of any single polity fluctuated immensely, and long periods of instability usually attended dynastic decline. The plains of north China were particularly vulnerable to invasion by steppe peoples on the northern and western fringes of the empire. Such upheavals tended to bring about political divisions between north and south (Fairbank et al 1978) and produce cultural distinctions still in evidence today (Moser 1985; Wu 1994).

Those seeking power, whether of Sinitic or "barbarian" origins, sought legitimacy through the "Mandate of Heaven", a politico-religious ideology that bestowed divine status on China's emperors. Simultaneously, the conception of the "Middle Kingdom"
placed Chinese civilization firmly at the center of a system of tributary relationships with "barbarian" peoples astride the margins of Sinitic hegemony. During unstable periods, contenders for power sought to legitimize their rule in terms of this divine mandate over all the Sinitic realm, even though their cultural base might lie on the fringes (Moser 1985:23-25; Fairbank et al 1978).

Indeed, throughout its long history, the Chinese empire fell time and again under the control of invading non-Han "barbarians", who usually originated in the steppes to the north and west of the Chinese core territory in north China. These invaders nearly always underwent a process of "Sinification", becoming themselves "Hanren". Sinification thereby tended to lend force to claims of legitimacy among the ruling class, regardless of cultural origins (Moser 1985).

The last imperial dynasty came into being with the overthrow of the Ming - the last native Han dynasty - in 1644. Characteristically, the invaders were a confederation of non-Han Tungusic speakers from the north, in Manchuria. The new rulers named their dynasty the Ch'ing, which means "pure". Like previous invaders, the Manchus gradually adapted themselves to Sinitic culture, appropriating traditional symbols of imperial reign, and asserting themselves as protectors of the Great Tradition. Despite this, the Manchus were long despised as "barbarian" usurpers. As a symbol of
loyalty, the Manchus decreed shaving of the front portion of the head and the wearing of a long queue, a hairstyle that remained mandatory in China until the 1911 revolution which overthrew the Ch'ing and established a republican regime (Smith 1983:28-29; Moser 1985:42-43).
CHAPTER 3. CHINESE SOCIAL ORGANIZATION IN LATE IMPERIAL TIMES

Kin Relationships

Traditionally, the dominant form of Chinese social structure is based on patrilineages in which much of the decision-making power is held by elders. A "clan" is conceived as a collection of lineages with the same surname (Fei 1992:80-86). The use of the term "clan" is perhaps most appropriate for such groupings as surname groups, since they cannot usually demonstrate consanguinal relationships. In modern overseas communities, surname groups can even include surnames that merely sound alike when spoken in a particular dialect, such as Huang and Wang (Wong 1982:18).

To a large extent, single lineages are tied to specific localities such as a particular village, and there is generally a great deal of convergence between family ties and geographic locations (Wong 1982:17; Fei 1992:120-127). This pattern is especially pronounced in south China (Coughlin 1960:36-38; Potter 1970:130).

The Chinese term for family, jia, forms the root of a spectrum of words denoting social relationships, including zijiaren (my own people), a term which can be modified to fit any particular situation. The ambiguous nature of these terms is, in the opinion of one native Chinese
scholar, related to the traditional social structure of China. "Family" is viewed as a very flexible category that is situationally defined and potentially either expansive or contractive in terms of its inclusiveness (Fei 1992:62). Fei uses the metaphor of expanding ripples on a surface of water. He further describes rural families as lacking "...strict organizational boundaries. These groups can expand, as needed, by incorporating ever more distant categories of relatives." However, this flexibility is mostly, but not exclusively, in one direction- along patrilineal lines (Fei 1992:82-3).

The particular nature of kin ties in traditional Chinese society served to limit certain activities, especially those centered on conflict or competition. This was largely due to the fact that obligations among kin served to maintain familial relationships, and cooperation was promoted over competition in family matters. Debts and obligations among relatives helped to cement relations. For this and other reasons, certain activities were often conducted between patrilineages and not within them. For example, in certain areas of China, the zhong, a form of credit union, is common. These organizations specifically exclude relatives of the shareholders from receiving credit on the grounds that the debts would be difficult to collect. In contrast, friends of shareholders are not excluded. To a large extent,
relationships outside of one's lineage or clan would seem to be necessary for commercial activities (Fei 1992:80-86, 120-127). Fei (1992:126) explains the situation in terms of the requirements of generalized reciprocity (though not explicitly stated as such): "Commerce cannot exist in an intimate consanguinous society. Although exchanges take place in such a society, people exchange with renqing, by giving gifts to each other."

However, the nature of exchange relationships is complicated by the fact that a form of credit union called a Wui (common in modern overseas communities) specifically includes family members as part of a strategy of promoting capital formation (Wong 1982:18,45). Such cases may point up the inherent flexibility of Chinese family structure to adapt to diverse situations.

Social and Economic Classes

Wealth and occupational status comprised a second major theme of Chinese social organization. The Confucian ordering of social classes was ranked thus: scholar, farmer, artisan and merchant. In Late Imperial times, the ruling classes were comprised of three distinct strata—the upper gentry, the lower gentry, and non-titled local elites. The conventional route to power was through the obtainment of academic credentials or government posts. Traditionally, these perquisites had to be earned, but by
the mid-nineteenth century, the Manchu government, increasingly strapped for funds, began to sell degrees and academic posts. The main beneficiaries of this policy were the merchants, whose power was definitely on the rise by this time. While merchants were able to obtain gentry status, the opposite was also increasingly true— the traditional gentry class became merchants. Thus, China in late imperial times began to experience significant shifts in the balance of power, providing opportunities for the rise of new classes of elites (Eastman 1988:101, 192-95).

Mine Laborers

The southeastern coast provinces, in common with other areas in China, underwent significant economic displacement during the course of the eighteenth and nineteenth centuries. Low-status economic activities, such as mining, were increasingly promoted by the authorities in response to economic stresses that had increased the ranks of the landless poor. Mining was perhaps the archetypical low-status occupation— it did not warrant mention in the Confucian hierarchy, and was not even given its own category for the census, as was common for other occupations. In 1735, the imperial regime ordered that all mines in Kwangtung be shut down. The governor-general objected to the order, pointing out that the mines supported a responsible class of workers who
were not troublemaking "vagabonds". This anti-mining attitude existed in spite of the fact that mining played a very important role in providing necessary products and providing a livelihood for those who would be otherwise utterly impoverished. Miners as a class were viewed with suspicion by the imperial regime, and were seen as an undesirable element that threatened social upheaval. Over time, the regime expressed a certain ambivalence toward mining, perhaps coming to view it as a necessary evil (Sun 1967:45-48).

The shutdown of the Kwangtung mines in 1735, and the regime's attention to a proposal in 1744 to open additional mines in Kwangtung highlight a radical change in policy, and incidentally point to the importance of mining in Kwangtung for displaced and landless people. Administrators and provincial authorities argued that mines would aid the landless poor and assured the emperor that the mines would not siphon off farmers from the countryside. An earlier plan in 1689 proposed to group miners in Kwangtung province into groups of 10 under a foreman, highlighting the regime's obsession with controlling an element of the population which it deemed troublesome (Sun 1967:48, 52, 59).

Mining labor, especially before the advent of mechanization, was demanding and often brutalizing. Workers toiled for long hours in inconceivably difficult
working conditions, and for little pay. This was commonly true worldwide. China was no exception, and poor treatment was common. There were cases of forced and conscripted labor, and workers were sometimes made to literally work themselves to death (Ebrey 1981:233-234). Often, there was a type of "company store", which the miners were required to visit in order to obtain supplies at inflated prices (Sun 1967:62-65). Because of their difficult life and their relative isolation from the society at large, miners often formed various organizations for mutual protection. Sun (1967:65) has this to say of the social organization of miners in China:

Mining laborers were known for their tendency to form cliques, factions, or brotherhoods, leading to clannish behavior and feuds. The forming of semi-religious brotherhoods, complete with incense burning rituals, probably helped to establish a sense of solidarity among the miners and provided mutual help when needed. At the same time, this was exactly the sort of activity that set the officials' nerves on edge. Disciplinary measures dealt out to miners were as a rule brutal and severe; this was thought to be necessary for keeping public order....

In the search for new bodies of ore, miners often moved to various locales under the direction of a leader who furnished the capital for the enterprise. The leader assumed the title of "manager" and enjoyed certain privileges. The miners under him addressed each other as "brother" or "little comrade". Group solidarity was generally strong. Sometimes these bands of prospectors
formed companies whereby each person received a share of the profit. Within such arrangements, the company members addressed each other as "close brother", and distinguished themselves from those who worked for wages and were called simply "hired miners". Despite such distinctions, these groups of miners were relatively egalitarian compared with the hierarchical nature of the larger society. Unfortunately, such an idyllic state of affairs rarely survived official scrutiny. Established mines would soon come under the control of the regime, becoming incorporated into the system of bureaucracy and taxation. Institutionalized controls usually had the effect of replacing the nascent egalitarian structure with a system of authoritarian hierarchy (Sun 1967:57-61).

Ethnicity- Kwangtung and Canton

Defining ethnicity is a complex question, especially in relation to China. The broad category of "Chinese", at least as viewed in a nationalistic sense, is of recent derivation in China, and is intimately related to Chinese responses to the challenges posed by European expansion (Wu 1994). Much of the available literature on China tends to lump all Chinese into a single ethnic category with, at best, passing references to cultural diversity. Nevertheless, this deemphasis of diversity within China owes as much or more to Chinese ideology and worldview as
to Western conceptions. Linguistically, there are at least nine major "dialect" groupings and innumerable "subdialects" of Chinese, most of which are mutually unintelligible. One would be hard pressed to find another example of this type of lumping in the presence of such a high degree of linguistic diversity. By way of example, many Chinese dialects display more differences when spoken than can be found between certain distinct but related languages such as Swedish and Danish, or Spanish and Italian. Besides Mandarin, which is spoken by the majority of the Chinese people in north China, all of the principle Sinitic languages (at least eight in number) are spoken in the south. It is becoming more common, at least among linguists, to recognize the numerous Chinese "dialects" as related but distinctive "Sinitic" languages (Moser 1985:3-4). Leo Moser (1985) perhaps best summarizes the situation, and I shall quote at length:

Thick books are still being published, in both Chinese and Western languages, on the Taiping Rebellion without a single reference to the Hakka people. Some key monographs on the career of Mao Zedong do not even mention the significance of his Hunanese origins. Works on the Jiangxi soviet of the 1930s often ignore the subethnic groups that formed the basis for the survival of such regimes. Books on Taiwan and the Taiwanese community there make little or no reference to the history of the seagoing Minnan people who established that community. Studies of elite systems in China often miss much by analyzing the national leadership only in terms of province of origin rather than dialectical or other subethnic criteria. In some cases, major studies of language reform in modern China have almost totally overlooked the degree to
which the plethora of dialects makes adoption of an alphabet so difficult (Moser 1985:8).

Thus, while the state ideology bestowed by the Han Dynasty stressed cultural unity, the reality was (and remains) much more complex. Although the "Great Tradition" occupied the attentions of the elite scholar-officials, in everyday practice a number of "Little Traditions" were recognized, albeit usually in the context of dealing with the "semi-barbarian" on the Chinese periphery. This diversity has been (perhaps grudgingly) acknowledged by recent Chinese leaders such as Mao, who spoke of "contradictions among the people" (Moser 1985:2-8). The situation is undoubtably related to the long and complex history of the Chinese empire, which alternately expanded and contracted, influencing and being influenced by cultures and people on the cultural and geographical frontier of China.

Over time, the direction of much of the spread of Chinese cultural elements from the northern core area was to the south--into the Yangtze Valley of south-central China, southeastern China, and even present-day northern Vietnam, which remained part of the Chinese empire for over a thousand years (Eastman 1988:9; Wu 1994). Indeed, southern China was long considered on the margins of the empire, both geographically and culturally (Eastman 1988:9; Moser 1985:203). Before the Chinese incursions,
the area was most likely inhabited by people who spoke a Thai-related language, the descendants of whom (e.g. the Zhuang) still form a sizable minority of the population (Moser 1985). The Thai speaking state of Yue, which controlled the area along the Chinese coast north of Canton, resisted incorporation into the Sinitic sphere throughout the nearly 500 years of the Han Dynasty (Moser 1985:17).

In fact, the term "Yue" has long been used to refer to any number of "barbarian" peoples on the fringes of Chinese culture. The ideograph for Yue means "to go beyond", a meaning which can be extended to read "frontier" or "borderland". Modern usage of the term also refers to the Kwangtung and Kwangsi districts of southeastern China, known as the "two Kwangs" or "two Yues" (Moser 1985:203-204). Yue or "Yuehua" has also been adopted by linguists to refer to a related group of Sinitic languages spoken in Kwangtung province. "Cantonese", a particular Yue subdialect of the city of Canton, was taught by European missionaries in the 19th century, and is also taught and spoken in Hong Kong and elsewhere (Moser 1985:4, 203-205).

It may be surmised that many elements of southeastern Chinese culture arose as a result of cultural interactions unique to the area. Many cultural practices are considered alien in other parts of China, and have more in
common with the habits of Thai speakers (Moser 1985:206). In addition, lineage organizations seem to be more highly developed in the south than in most parts of China (Eastman 1988:235), though the situation is somewhat complicated by a lack of data pertaining to northern China (Potter 1970:130-131). Nonetheless, according to Leo Moser "...the Cantonese have a greater sense of their historical identity as a separate cultural group than most other subgroups among the Han" (Moser 1985:203). In fact, Yue speakers do not normally refer to themselves as "Hanren"- people of the Han- but as "Tangren"-people of the Tang (Moser 1985:206; Wu 1994). "Tang" is a reference to the Tang Dynasty (A.D 618-907), which first introduced effective governmental control into the southeastern region of China (Fairbank et al 1978:97-99). To this day, other Chinese make distinctions between themselves and the people of southeastern China, stereotyping them as "sharp businessmen" who are "clannish and aggressive", but also "egalitarian and open to new ideas" (Moser 1985:6, 211).

A seemingly limitless number of further distinctions divide various groups within Kwangtung itself. Another name for Yue speakers is Punti, which translates roughly as "natives". The term is used to draw a distinction between themselves and other cultural groups in Kwangtung such as the Thai-speaking Zhuang and the Sinitic-speaking
Hakka. The Hakka are a people of somewhat mysterious origin who began moving into the area from the north in the 3rd century A.D. Incidentally, "Hakka" is a word which literally means "guest family", and is therefore sometimes used to refer to any outsider (Moser 1985:235-254). There are a number of further divisions among the Punti. At least five major dialect groups, incorporating innumerable "subdialects", and generally corresponding to various locales and districts within Kwangtung, are recognized among the Punti (Moser 1985; Armentrout-Ma 1983).

Kwangtung province has been subjected to greater foreign influences through the port of Canton, the scene of international trade from an early date. Early-day traders travelled to Canton from as far away as Africa, and Arab traders regularly visited the port (Moser 1985:203; Wolf 1997:42, 254). In addition, Canton has had a long history of contact with the European maritime trade, beginning in 1514 with the arrival of the Portuguese to the area (Zhu 1999:46; Moser 1985:215). After 1760, when the emperor restricted the maritime trade, Canton remained the only port open to international trade (Wolf 1997:254).

Among western foreigners, "Cantonese" has come to refer both to the language and to the inhabitants of Kwangtung and environs. However, the term is somewhat
misleading, in terms of both linguistics and cultural identity. The Cantonese language, while widely taught and used, is only one dialect among many in Kwangtung and Canton, and properly refers only to a group of subdialects spoken in a small area around Canton. Similarly, the use of "Cantonese" to refer to any inhabitant of Kwangtung province is misleading, since there are a number of groups in the province who do not speak any variant of Cantonese and do not identify with the culture or inhabitants of Canton (Moser 1985:204-205).

Kwangtung and other provinces in southeastern China have a history of resistance to the Manchu dominated Ch'ing dynasty. Kwangtung was the scene of activity of various anti-Manchu organizations such as the Triad (see below). The Triad Society conducted numerous armed insurrections against the Ch'ing regime, four within Kwangtung province alone in the first half of the nineteenth century (Eastman 1988:225).

A trend that flowed from the demographic and economic pressures of Late Imperial times was the increasing concentration of the population in urban areas. Urbanization forced rural peasants into an alien environment far removed from the close kin ties and economic lifeways that they were accustomed to. In this new environment, the newcomers formed associations based on various distinctions, the most important of which were
those based on region of origin (Crissman 1967; Hamilton 1977:338). Since kin relationships were often tied to particular localities, there was normally a great deal of convergence between family groupings and geographic locations (Fei 1992:120-127). Despite being grounded to some extent in traditional kin ties, the main impetus to both the creation and maintenance of regionalism as a criterion of identity seems to have been the regulation of commercial activity. The Ch'ing regime did not directly intervene in commerce, a situation conducive to the establishment of regionally-based groups who attempted to regulate commerce among various elements while simultaneously monopolizing certain niches of the local economy (Hamilton 1977:339-340). According to Hamilton (1977:340), "...this tendency of regional groups to attempt to control the marketplace not only maintained the importance of making regional distinctions but also made these distinctions invidious."

The Ying/Yang of Chinese Society

Another aspect of Chinese society was what one scholar (Eastman 1988:217) has described as the ying (illegal, heterodox) side of Chinese society as opposed to the yang (legal orthodox) side. The ying side included anti-Manchu secret societies such as the Triad. The Triad, which operated primarily in Kwangtung and Kwangsi
provinces, drew its membership from among the lower levels of the social hierarchy. Organizations such as the Triad were said to provide "substitute clans" for marginal members of society as well as merchants and others of wealth who saw opportunity in such organizations. The raison d'être of the secret brotherhoods was, at least initially, political, and their avowed purpose was the overthrow of the Ch'ing Dynasty and the restoration of the Ming, the last native Chinese dynasty. Beyond this, and probably more importantly, the secret brotherhoods functioned to provide mutual aid and protection to their members, and to further collective aims (Eastman 1988:222-25).

The secret brotherhoods were composed of a number of lodges in different locales held together by a very loose structure, and the various lodges were often subject to internecine squabbles. Within each lodge, however, a tight structure maintained strict discipline among its members. Revealing secrets of the brotherhood was punishable by death, and there were prohibitions against adultery with member's wives, homosexuality, cheating at gambling and other offenses. The ethics of these organizations extended only to its members and did not apply to the traditional power establishment- the brotherhoods were deeply involved in gambling, narcotics, prostitution and smuggling (Eastman 1988:224-25).
CHAPTER 4. THE CHINESE DIASPORA

Between 1400 and 1850, China experienced a six-fold increase in population. This trend, in many ways mirrored elsewhere in the world, was especially pronounced in the 18th century. In part, this population explosion has been attributed to lower death rates made possible by agricultural adaptations such as the increased use of marginal lands and the introduction of new crop species from the New World and Africa, including maize, sweet potatoes and peanuts (Eastman 1988:3-14; Moser 1985:44).

The Chinese Frontier

In addition to agricultural adjustments, the population increases led to colonization of lands hitherto sparsely populated. The movement onto new lands came about both voluntarily and as a result of direct governmental action. Sometimes the regime forced settlers onto new lands, at other times settlers were enticed into new areas by governmental development of infrastructure (primarily dikes and irrigation systems), by tax exemptions, and by grants of draft animals, seeds and tools. The newly settled areas included the west and northwestern frontiers and the island of Taiwan, as well as undeveloped pockets of territory within more developed regions (Eastman 1988:10-11, 224).
The pioneers typically relied on group solidarity and often acted under the leadership of wealthy or well connected men, known as "settler-chiefs" or "mountain lords". These men moved into the new areas, laying claim to large parcels of land while subduing the non-Han natives. Such leaders would often invest money and manpower in infrastructure, recruiting new settlers to work the fields. Frontier life was often violent because of initial clashes with native populations and subsequent competition between the various Han groups over land, water and other resources. Violence took the form of fighting between armed and organized groups, kidnappings, assassinations, and the destruction of rivals' villages and ancestral tombs. Conflicts became more acute as the frontier became saturated with population, and were particularly rife in portions of Kwangtung, Fukien and Taiwan. Armed conflict between competing groups was a common occurrence even after the extension of bureaucratic control by the central government, and remained a problem well into the 20th century (Eastman 1988:12-14, 235).

**Emigration**

Emigration abroad provided another outlet for the surplus population. The majority of the emigrants went to southeast Asia, but appreciable numbers also migrated to the Pacific islands, the Americas, Madagascar, and the
Caribbean. The port city of Canton, with its connections to international trade, was the main point of departure (Freedman 1967; Tsien 1967; Hamilton 1977:337; Wolf 1997:374-79; Zhu 1999:45-46).

It has been said that events within China provided the "push" for these migrations, while the expansion of the capitalist system and its need for cheap labor provided the "pull" (Rohe 1982:4). Indeed, the migration of these "overseas Chinese" could be viewed as part of a global trend of population movements and urbanization associated with the demands of the labor market in the nineteenth century. Other examples would include the myriad European migrations to the United States, the migrations of German farmers to southern Russia, and the migrations of mine laborers to urban areas in Africa (Wolf 1997:354-79). Chinese had been migrating to other parts of southeast Asia as early as the 12th and 13th centuries, establishing trading colonies in the Philippines and Sumatra (Crissman 1967:185). However, most migrated in the period between 1850 and 1940. During this time, about five million Chinese from the southern coastal area left the country, and about a half million of these migrated to the U.S. (Wolf 1997:374-79; Swartout 1988:44; Hamilton 1977:337).

Factors within China itself had made a large pool of workers available for the overseas labor market. The
explosive growth in population from about 1700 which led to increased economic competition has been noted (Eastman 1988:3-4). Competition over land became intense. The population density in Kwangtung province reached four people per acre by the mid nineteenth century (Zhu 1999:46). Coupled with, and probably related to these economic pressures was the slow decline of the Ch'ing Dynasty. Declining state control led to political struggles marked by armed conflict. The well-known Taiping Rebellion (1850-1864) furnishes perhaps the most salient example. Armed conflicts between imperial forces and groups of rebels led by the Triad occurred primarily in Kwangtung, but flareups also occurred in Kwangsi, Hunan and Fukien (Eastman 1988:225).

The milieu of political and economic disorder which prompted migrations within China also led to the exodus abroad of large numbers of Chinese from southeastern China. This occurred in spite of the fact that the regime had a long standing policy which outlawed emigration (Sung 1967:10; Swartout 1987:44; Eastman 1988:12). In fact, laborers in southeast China were actively recruited for the overseas market. Some of these recruits were free emigrants, others left to escape official displeasure; a few were captives in "clan wars" who were sold to dealers. A great many were indentured through the "credit-ticket" system, whereby migrants were given their passage in
return for a stated term of labor (Freedman 1967:18; McLeod 1948:23; Rohe 1982:4). The political and economic disorder of Late Imperial times, the growth of European hegemony, and the expansion of the capitalist system in the nineteenth century had combined to form a historical crossroads which helped to bring about the massive migrations of the overseas Chinese.

**Ethnicity Among the Overseas Chinese**

Principles of social organization that had been employed by rural-urban emigrants within China were also utilized to a large extent in the constitution of ethnic and intraethnic segments within overseas Chinese communities (Crissman 1967; Hamilton 1977:338). However, the specific pattern of social organization in different communities arose in response to particular socio-economic circumstances. These adaptive responses also changed over time, as overseas Chinese communities became demographically more complex (Freedman 1967; Thompson 1979; Ng 1992), and as the political situation evolved (Armentrout-Ma 1983; Ng 1992; Chan 1998). There is widespread agreement that, while certain principles of classification used in overseas communities did indeed have close correlates in Chinese urban situations, ethnic identities were not fixed, "primordial" categories, but were instead a product of circumstances found both in

Urban dwellers in China, as well as overseas Chinese, made distinctions among themselves based on kinship, dialect, region of origin, surname, and occupation, to name the most salient. The categories were not mutually exclusive, but displayed a great deal of convergence. In fact, most of these distinctions usually also entailed regional criteria. Regionalism appears to have been the most important criterion of intraethnic identity, and usually subsumed other criteria which served, in effect, as bases for further segmentation (Crissman 1967; Hamilton 1977; Armentrout-Ma 1983; Fong 1989; Ng 1992).

Social organization was reflected in a number of so-called voluntary associations, including tongs, trade guilds, clan or surname associations and hui-kuan, or "same-country" associations (Hamilton 1977:339). Voluntary associations of various types were commonly called "companies" in the United States, and are often referred to in the sociological literature as Landsmanschaften (after Max Weber). All of these organizations had counterparts in China (Crissman 1967; Hamilton 1977; Armentrout-Ma 1983).

Lawrence Crissman (1967:195) points out that "...membership in a community must be clearly
distinguished analytically from participation in that community's organization." Not everyone became formal members of the associations, and only a few wealthy or ambitious individuals were active participants in association functions. However, the associations claimed to speak for everyone, and non-members, provided they met the requisite criteria, could appeal to the association for aid. Moreover, because the leaders of the associations tended also to be community leaders, the associations, according to Crissman (1967:195), provided "...an organizational hierarchy which parallel(ed) the segmentary community structure."

In theory, organizations without an explicit regional basis, such as tongs and trade guilds, opened their membership to any Chinese, though there was undoubtedly at least some convergence with region and dialect. This convergence obtained, in part, because people of the same occupation tended to come from a specific locale or even be associated with a particular family (Crissman 1967; Kiong and Kee 1998:78). Tongs, while ostensibly admitting any Chinese, were often internally segmented on a regional basis (Armentrout-Ma 1983). Clan and surname associations restricted membership to those with a certain surname, but were also one of the few organizations which crosscut regional ties to a significant degree, since surnames are limited in number and widely dispersed throughout China
(Crissman 1967). In fact, numerically weak surname groups often banded together into multi-surname associations such as the "Four Brothers Association", which united the Liu, Kwan, Chang and Chao surnames (Wong 1982:18). The hui-kuan varied in inclusiveness relative to the inclusiveness of overall regional identity, which varied with time and place. The voluntary associations generally excluded women, who were in any case underrepresented in most overseas Chinese communities until well into the 20th century (Thompson 1979; Armentrout-Ma 1983; Ng 1992).

Voluntary associations of all types provided temporary housing for indigent members, arranged for the return to China of the remains of deceased persons, obtained employment for their members, collected debts, and otherwise promoted the goals of the group or of its more elite segments. Operating capital was raised through annual dues (Barth 1964; McLeod 1947; Armentrout-Ma 1983; Ng 1992). Leadership of the hui-kuan was almost invariably provided by elite men, typically merchants, who often served in a number of organizations. Such interlocking leadership could be used in the mobilization of large segments of the Chinese community (Crissman 1967:195).

The various types of voluntary association alternately diminished in importance and reasserted their influence, depending on a variety of socioeconomic and
political factors. Often, intraethnic or class rivalry led to splintering and realignment of the organizations (Armentrout-Ma 1983). In general, the influence of the associations tended to wane somewhat with the increasing importance of Republican political parties after 1900 (Armentrout-Ma 1983) with higher numbers of family units as more people from different parts of China emigrated (Kiong and Kee 1998:77), and as governments became more involved in social service functions (Thompson 1979).

The criterion of region varied a great deal in terms of inclusiveness. In most overseas Chinese communities, all Punti tended to associate together and distinguished themselves only from people of other areas of southeastern China (e.g. Hokkiens, Teochius), and from Hakkas. In the United States, Singapore and Taiwan, the basis for regional distinctions tended to be much narrower. The narrower the regional basis, the greater the tendency for convergence between region and dialect (Freedman 1967:19; Crissman 1967; Armentrout-Ma 1983; Ng 1992).

As discussed previously, regionalism was also an important basis of distinction in China. Fei (1992:127), in reference to China, says that regionalism is "a social relationship that has developed out of commerce .... Blood ties provide the foundation for status in Chinese society, but regional ties provide the foundation for contractual obligations." Fei (1992:125-126) further points out the
difficulty in conducting business transactions within family units because of the presence of renqing.

The dynamics of the international situation over time and the relationship with the host countries profoundly affected the formation of ethnic identities. Hamilton (1977) see contrasts in different adaptations of the Chinese overseas communities in southeast Asia in the pre-1850 and post-1850 periods. The earlier period saw Chinese communities adapting to particular host countries primarily in terms of an overall "Chinese" identity or its lack, while in the latter period "subethnic" distinctions based primarily on regionalism were more important. In pre-1850 Thailand, a Chinese identity was all-important because of the close relationship between the Chinese community and a Thai elite which held Chinese culture and institutions in high regard. The Chinese were employed in government administration and tax farming, and held lucrative trading advantages. In the Spanish-controlled Philippines, in contrast, a Chinese identity of any kind was maladaptive, and the most successful strategy involved intermarriage with the indigenous population and conversion to Catholicism. In Dutch-controlled Java, the Chinese occupied a middle position between the exclusive Dutch minority and the indigenous population, and identified themselves as "Peranakans"—neither Chinese nor Javanese. Such an identity acknowledged their lack of
access into elite Dutch circles while simultaneously distancing themselves from the indigenous population (Hamilton 1977:342-345).

The post-1850 period saw the increasing dominance of an international market in which the Chinese became important middlemen between European traders and indigenous producers and consumers. Regional distinctions, which were so important to the regulation of commerce in Chinese cities, were transplanted to overseas communities where they generally performed the same function (Hamilton 1977:339-340).

Ethnicity Among Chinese in the United States, 1850-1899

At the start of Chinese immigration to California around 1850, all Punti (excluding Hakkas) tended to associate together. However, this situation rapidly changed as more people arrived. The Punti quickly split into three main factions, corresponding to three geographical areas within a small area of Kwantung province within and near the city of Canton (Armentrout-Ma 1983:110-111; Moser 1985:221). These groups were the Sze Yap, Sam Yup, and Zhongshan. The Zhongshan originated from Zhongshan district south of Canton, while the Sze Yap and Sam Yup came from the "Four District" and "Three District" areas, respectively (Armentrout-Ma 1983:111; Zhu 1999:48). The Sam Yup emigrated from the three districts of Namhoi,
Punyu and Shuntak, encompassing the city of Canton, while the Sze Yap came from the four districts of Yanping, Hoiping, Toishan and Sunwei, located in a rural area to the southwest of the city (Moser 1983:204-223).

The Sze Yap speak a related group of dialects. The most standardized and best known of these dialects is Toishanese, which was the dominant form of Chinese spoken among overseas Chinese in the United States (Moser 1983:221-224). In fact, the Toishanese dialect is virtually synonymous with "Chinese language" in the United States. According to one Chinese-American:

In any business dealing in the United States, not to speak or understand Toishanese can be a handicap. Even those who speak Mandarin or other dialects are sometimes ridiculed by the Toishanese as being unable to speak Chinese (Sung 1967:19).

People from Sam Yup and Zhongshan speak dialects of the Yuehai group, which includes a number of closely related dialects spoken around Canton. However, the two groups are considered distinct from each other (Moser 1985:205, 214-216). Zhongshan district supplied most of the Chinese population of Hawaii, besides forming an appreciable proportion of the Chinese population in the continental U.S. in the 19th century (Moser 1985:216; Armentrout-Ma 1983).

The Sam Yup formed a smaller proportion of the overseas Chinese in the United States. In 1855,
approximately 40% of the Chinese were Sze Yap, with an equal proportion of Zhongshan. About 18% were Sam Yup, and 2% were Hakka (Armentrout-Ma 1983:113). Despite their small numbers, the Sam Yup were economically powerful. Most of the early, large import-export firms in California were owned by Sam Yups, who had cultivated important business connections in southeast Asia and throughout the United States. This most likely arose from family and business connections in their home base of Canton (Armentrout-Ma 1983; McLeod 1947:223-225). It is related that Sam Yup store owners in San Francisco virtually monopolized the import-export trade in San Francisco in the late 19th century, and refused to sell goods to the Sze Yaps (Cook 1931). The Sam Yups, who originated from the city of Canton, looked down on the largely rural Sze Yap, who they characterized as "ridiculous rustics who cannot speak proper Cantonese" (Moser 1985:215-216).
Figure 2. Photographs depicting different styles of dress among nineteenth century Chinese in the United States. Photographs courtesy of the Montana Historical Society photographic archives.
As in other overseas Chinese communities, a number of voluntary associations were established. In the United States, the degree of inclusiveness, functions and relative influence of the various associations changed over time. Armentrout-Ma (1983) distinguishes two main phases of Chinese social organization between 1849 and 1898, mainly with reference to the California situation as reflected in the voluntary associations. A "Regional Phase", which lasted from 1849 to 1870, involved increasing differentiation of regional loyalties. A second phase, between 1870 and 1898, involved demographic changes associated with increasing numbers of Chinese immigrants, a movement from rural to urban areas which tended to concentrate the Chinese community in "Chinatowns", and increasing economic competition with the dominant Euroamerican community which had the effect of reducing employment opportunities for the Chinese. The establishment of "migration chains" resulted in closer grouping of relationships based more on kinship than on region. The reduction in employment opportunities meant a diminished importance in the regional association's function as employment brokers. In the face of these changes, regional associations lost influence relative to the surname associations and tongs (Armentrout-Ma 1983).

No sharp boundaries separated the different phases. In fact, the first organization established in San
Francisco was a tong which ostensibly admitted all Punti (i.e., it excluded Hakkas). This organization quickly declined in importance with the split of the Punti into district factions. Similarly, the regional associations did not disappear in the latter phase, but still retained some importance, in part because of protracted hostility between the Sam Yups and Sze Yaps (Armentrout-Ma 1983). Regional associations still retain some importance in certain North American cities, and subsume to an extent a number of other organizations based on surname, family and occupation (Wong 1982).

The well-known "Six Companies" organization, based in San Francisco, was a confederation of hui-kuan established to settle disputes between the various Chinese factions. The Six Companies seem to have been one of the few organizations which admitted Hakkas, although they were denied the top leadership position (Barth 1964:97; Wong 1982:16). Besides attempting to foster unity with the Chinese community, the Six Companies undertook to represent the Chinese in dealings with the federal and state governments. At times the Six Companies acted almost as a kind of consulate, especially prior to the installment of a resident Chinese ambassador in 1878 (Sung 1967:137; McLeod 1947:224). Leadership of the Six Companies was vested in a board of directors which included members from each segment. The office of
chairman rotated from among the various segments, excluding the Hakkas (Barth 1964:97). A descendant of the Six Companies, the Chinese Consolidated Benevolent Association, is still active in the United States (Wong 1982).

The Six Companies' largest and most famous endeavor (and consequently its biggest failure) was its organized opposition to the Geary Exclusion Act of 1892 (Armentrout-Ma 1983:120). The Six Companies levied an assessment on every member, raising over $200,000 for legal fees and expenses. They then advised their members not to register with the Commerce Department, as required under the act. Reportedly, only 10% of the Chinese registered, a fact which may indicate the degree of influence of the Six Companies. When the U.S. Supreme Court later declared the Geary Act constitutional, the organization lost face, leading to its decline (Armentrout-Ma 1983; McLeod 1947:213-225). The Six Companies also organized a legal challenge to a boycott of Chinese businesses in Butte, Montana in the 1890s (Flaherty 1987).

Tongs have been described as everything from benign mutual aid associations (Gardner 1998:4; Swartout 1988:49-50) to organized crime syndicates (McLeod 1947:238; Armentrout-Ma 1983:116). As in the case of Triad Societies in China, the tongs probably performed both functions. It is quite possible that the American media,
influenced by existing stereotypes of the Chinese, highlighted the more lurid aspects of tong activities in order to sell newspapers. On the other hand, some evidence strongly indicates that tongs were alive and well into the 1990s in the U.S., and heavily involved in organized crime. An anonymous tong member, inducted into a crime syndicate largely against his will, testified before a Senate subcommittee that tongs in several U.S. cities were active in drug dealing, prostitution, protection rackets, and vendetta-style assassinations (U.S. Senate 1991).

A clue to the character of the tongs' role in social control can be gleaned from the 1876 regulations of the "Chinese Free Masons" in Virginia City, Montana. These regulations prohibited the revealing of lodge secrets, and barred any member from compromising his "brothers" if arrested. The regulations also prohibited coveting another member's wife, stealing, and other offenses. Specific punishments, such as 306 strokes with a cane, were listed (translations in Swartout 1988:49-50). Perhaps not surprisingly, these regulations were similar to those of the Triad lodges based in China (Eastman 1988:224-25).
CHAPTER 5. CHINESE IMMIGRANTS ON THE AMERICAN MINING FRONTIER

In the United States, the immigration of the Chinese coincided with the 1849 California gold rush and the subsequent expansion of the American mining frontier. The largest emigration to California occurred in the period 1852-1854. It was during this time that the Chinese became heavily involved in placer mining, largely supplanting the Euroamerican miners in some California mining districts (Rohe 1982:4). Later, the Chinese began moving into other mining regions, reaching the present-day states of Oregon, Washington and Nevada in the 1850s, Idaho and Montana in the 1860s, and Colorado, Arizona and South Dakota by the 1870s (Zhu 1999:45).

The Chinese formed part of a population that was decidedly cosmopolitan. A typical mining camp included, besides Americans, miners from many parts of Europe, as well as from Chile, Mexico and many other places in addition to China. Moreover, the population in the camps, especially in the early days, was composed predominantly of young males (Greever 1963:47, 56, 163; Smith 1967:24-25, 28). Mining camps were urbanized almost immediately, in contrast to much of the former experience on the American frontier. Towns were established in most mining districts even before the establishment of agriculture, a fact which distinguished the mining regions from other
areas with more of an agricultural base such as the Midwest (Toole 1989:80-82; Smith 1967).

The first U.S. census in Montana territory in 1870 enumerated a Chinese population of 1,949 (nearly 10% of the total). Though the peak of Chinese residency in the state occurred around 1890, when there were 2,532 enumerated, the proportion of Chinese to the total population in Montana declined after 1870. Nevertheless, the proportion stayed well above the national average during this time. Chinese women were few- out of the nearly 2,000 Chinese in Montana, only about 120 were women (Swartout 1987:44; Wunder 1980:22).

The 1880 census listed 149 Chinese mining operations in Missoula County, 710 in Deer Lodge County (including present-day Silver Bow County), 265 in Madison County (Alder Gulch), and 359 in Lewis and Clark County (Helena) (Swartout 1988:46). Figures such as these indicate the importance of the Chinese in the early development of Montana.

In almost all mining regions in the West, the economic activity of the Chinese centered on the reworking of districts that were in the process of being deserted by other miners. In the popular mind, the influx of Chinese in a district was often associated with the "decline" of a placer mining district (Smith 1967:30). However, because they worked mines viewed as "played out", they actually
extended the economic life of many placer districts, and helped to maintain local economies longer than would otherwise have been the case. In Idaho's Oro Fino district, the miners actually adopted a resolution inviting the Chinese (Rohe 1982:11). White miners were undoubtably prompted by a desire to sell claims which they no longer deemed profitable, while local merchants often saw the influx of the Chinese as an opportunity to extend the longevity of their businesses.

Chinese miners generally worked for themselves in small groups or formed their own companies, though they were increasingly employed by Euroamerican companies (Rohe 1982:7). The cooperative activities of these informal Chinese groupings are reminiscent of the modus operandi of small groups of miners in China during Late Imperial times, whereby small groups of prospectors formed informal and relatively egalitarian relationships (Sun 1967:57-61). Chinese mining companies were often associated with large scale placer operations involving diversion of water from stream beds (river mining) or hydraulicking, a placer method whereby water was diverted into a system of heavy hoses and directed at alluvial deposits (Rohe 1982, 1996). See Figure 3. Though they commonly engaged in placer mining, the Chinese rarely became involved in lode mining, an activity that required large amounts of capital (Rowe 1982:2).
Figure 3. Hydraulic mining near Helena, Montana. Photograph by W.H. Jackson of the Hayden Survey (1869-1871), courtesy of the Montana Historical Society photographic archives.
Figure 4. A group of Chinese examining a sluice box near Helena, Montana. Photograph by W.H. Jackson of the Hayden Survey, courtesy of the Montana Historical Society photographic archives.
This may have been due to a lack of assets among Chinese entrepreneurs as well as discriminatory attitudes among the dominant population. The Chinese were sometimes employed by large mining companies, but resistance from white miners and their unions sometimes led to trouble, as in Rock Springs, Wyoming in the 1880s (Laurie 1990).

Rossiter Raymond (1869:140) estimated that in Montana in 1869, about two-thirds of the Chinese were placer miners, with the remainder employed as laundrymen, cooks and small shopkeepers. His description of the Montana Chinese population is worth quoting at length, because it points to a number of issues relating to their relationship with each other and with the dominant white community, and indicates an attitude towards them that probably sums up the feelings of many whites, even sympathetic ones such as Raymond, toward minority groups of all kinds in the nineteenth century:

As a class in the community, they are quiet, orderly and peaceable. Their mutual quarrels seldom or never require the arbitrament of the courts, and during the past year there has been among them but one arrest and conviction, on a charge of manslaughter. As far as my observation extends, public opinion seems, in regard to this people, to be apathetic and seldom demonstrative either for or against them; that there exists, however, a latent prejudice against them is highly probable. From time to time, it is true, we hear of outrages inflicted upon some one of them in the same manner, and perhaps as frequently, as dogs or cattle are maltreated. Otherwise they are as free from annoyance as any other class in the community. They do not compete with the whites, and, when mining, either buy claims, thus acquiring rights which are
respected, or take up abandoned ground. I am unacquainted with any locality, either placer or vein mine, where the Chinese are hired by the whites (Raymond 1869:140-141).

It is worth taking special note of certain passages in Raymond's description. The fact that their "mutual quarrels" seldom required the intervention of the courts is interesting, and points to the Chinese propensity to settle disputes among themselves while maintaining distance between themselves and the legally constituted authorities. That the whites were "apathetic" probably owes something to the fact that the Chinese kept to themselves and did not compete economically with the whites, and incidentally points to a degree of social distance necessary to avoid conflict. While Raymond speaks disapprovingly of "outrages" committed against them, he nevertheless equates the Chinese, at least tangentially, with "dogs or cattle". Such an attitude is reminiscent of what could be called a "Victorian" attitude which combines a moralistic abhorrence of violence and a concern with humanitarianism with, however, a conviction of superiority based on racist assumptions (Howe 1975).

In fact, in almost all areas, the Chinese were the victims of oppression of one form or another. In general, anti-Chinese activity became most pernicious in the face of perceived economic competition with Euroamerican labor.
Often, the primary adversaries of the Chinese were labor unions, who viewed Chinese labor as a threat to hard-won gains. Random acts ranging from bullying to mob violence were all too common (Smith 1967:30; Lee 1978:143-144; Laurie 1990). Anti-Chinese riots occurred in San Francisco in 1871, Los Angeles in 1877, Denver in 1880, and Rock Springs, Wyoming in 1885, mostly in connection with labor disturbances in which the Chinese were used as strikebreakers (Laurie 1990).

The troubles in Rock Springs had been brewing since the 1870s, when a strike by Euroamerican coal miners prompted the Union Pacific Railroad to fire most of the strikers, who were then replaced by Chinese who worked for about 75% of the prevailing wage for whites. Increasing tensions, exacerbated by high unemployment in the area, led to an 1885 riot which left 28 Chinese dead and caused an estimated $140,000 in damage (Laurie 1990).

In 1882, Butte, Montana's fourth mayor was elected with the slogan "Down with Chinese Cheap Labor" (Lee 1978:104). In 1884, a circular was distributed warning the Chinese to leave town. A boycott by organized labor in 1891-92 ended in failure, but was followed by a second attempt in 1896. As perceived by the labor unions and other elements of the dominant community, competition between the Chinese hand laundries and white-owned steam laundries was the primary source of the problem. Patrons
of Chinese businesses were accosted at the door by union pickets and told to go elsewhere or face "boycotting" themselves. Placards were distributed listing the names of white-owned businesses who employed Chinese help, and many Chinese laborers lost their jobs as a result. A wagon carrying anti-Chinese illustrations was drawn through the uptown area, including Chinatown. One painting depicted a Chinese dropping a rat into bread dough. Another was of a Chinese spitting water on clothes. These representations were meant to reinforce negative stereotypes, and were obviously directed at the most successful Chinese enterprises— the restaurants and laundries (Flaherty 1987).

Official sanctions, such as discriminatory taxes, fees and other governmental acts, became more onerous over time. California's "Foreign Miner's Tax" of 1850, directed primarily against Mexicans and Chinese, levied a monthly tax of four dollars— a considerable sum at the time (Rohe 1996:17). An 1872 Montana law, primarily directed against the Chinese, forbade mine ownership by non-citizens (Swartout 1988:46). The law was subsequently challenged, probably with the collusion of both Chinese and whites, and was overturned by the territorial Supreme Court because of obvious constitutional problems (Wunder 1980:24). The city of Butte passed an ordinance in 1894 which assessed a quarterly fee of five dollars on any male
employed in the laundry business. A year later, the Montana legislature enacted a measure which increased the fee to ten dollars. The fees were obviously directed against Chinese-owned laundries. White-owned steam laundries and female laundresses (usually white) were exempt from the law (Lee 1978:114).

Anti-Chinese sentiment in Butte extended well into the twentieth century, and manifested itself even among groups who then (as now) were viewed as more progressive elements of the community. For example, the Butte Socialist (February 13, 1915) contained an article entitled "How to Avoid Washday" which blamed the Chinese laundries for prostitution in Butte: "Do you realize that the restricted district is largely peopled by girls who have been forced there by the lack of legitimate employment, and that patronage of the alien has been one of the predominating factors in this?"

A more far-reaching legal setback was the Chinese Exclusion Act of 1882, and subsequent laws, including the Geary Act of 1892. The failed efforts of the Six Companies to challenge the Geary Act were described earlier. The original Exclusion Act outlawed immigration by Chinese laborers for a period of ten years, and denied the right to obtain citizenship. The act was extended until 1943, when it was finally repealed. A subsequent law in 1902 forbade the immigration of any Chinese for the
purpose of temporary settlement. Chinese already resident in the United States were required to register with the Department of Commerce. Approximately 90% of the Chinese in the U.S. were covered by the registration requirement. Because the law even outlawed the immigration of the wives of resident Chinese men, it almost certainly contributed to the delay in the development of families among the Chinese in the U.S. Ironically, the absence of women immeasurably retarded the "assimilation" of the Chinese—their supposed inability to join the American "melting pot" having been a common rationalization for denying them the right to emigrate in the first place (Wunder 1980:22; Armentrout-Ma 1983:125-126; Swartout 1988:499; Kinkead 1992:46).
Figure 5. Woodcut depicting a Chinese placer mining camp in Montana. The scene purports to illustrate the "friendly relations" obtaining between a group of Chinese, a Euroamerican and a Native American. Note also the simple board structures and other elements of material culture. From *Leslie's Illustrated Newspaper* (October 1889), courtesy of the Montana Historical Society photographic archives.
CHAPTER 6. THE GERMAN GULCH COMMUNITY

Historic settlement in German Gulch followed a familiar pattern repeated in numerous mining districts throughout the American West. The discovery of rich placers started the inevitable "rush" to the area, followed by a flurry of activity as the miners staked and developed their claims. Nearly instantaneous urbanization came in the form of commercial establishments representing nodes of a widespread logistical network which supplied the camps with goods and services (Smith 1967; Meyer 1980). The flush period began to wane as the placers gravels became more difficult to mine, leading to consolidation of claims and a transition to large-scale methods of production. The "decline" in the placers created opportunities for the Chinese, who set up their own operations or hired out to Euroamerican-owned companies. The arrival of the Chinese, far from heralding the end of the district, actually led to a more stable economic period that endured for several years after the initial "rush". Simultaneous with the development of large-scale placering were initial attempts to develop lode mines, which required heavy capitalization beyond the means of local interests acting alone.
The Discovery of Gold and the Initial Period of Settlement

Settlement in German Gulch began in 1864 when a group of German prospectors, acting on advice from the seemingly ubiquitous Granville Stuart, discovered a "paystreak" about 1,200 yards above the confluence of Beefstraight, Norton and German Gulch Creeks. The diggings yielded about $12 per man-day, a tidy sum at the time (Edwards 1908). Edwards (1908) estimates that by February, 1865, there were nearly 1,000 men working the placer gravels in the gulch, and that "by the last of May...nearly every claim of 100 feet had a cabin". At least three concentrations of settlement developed-- Lower Town (sometimes called "German Town"), near the confluence of the three creeks, Centerville, at the confluence of Edwards and German Gulches, and Upper Town, near the head of the gulch. By the summer of 1865, Lower Town contained about 80 cabins or other buildings (Edwards calls them "houses"), and Upper Town consisted of about 30 buildings (Edwards 1908). Later, the census of 1870 listed 199 dwellings in German Gulch, of which 55 were either abandoned or the residents were absent (9th U.S. Census).

The miners established three mining districts-- Siberia, Central and Old Frederick. The Siberia district encompassed German Gulch upstream from its confluence with Greenland Gulch (GLO Mineral Entry 954, Survey 119) while the Central District occupied the portion downstream to
about Lower Town. The Old Frederick district extended downstream from Lower Town (Edwards 1908; Fredlund, et al 1991).

Business establishments were set up at each of the three towns soon after the arrival of the miners. Edwards (1908) relates that these included at least three general stores, "a few pie stands", at least one restaurant, "a number of saloons", a brewery, "a few blacksmith shops", and "quite a lot of Armstrong's Patent sawmills". In addition, local ranchers made trips to the gulch to sell chickens and other stock (Edwards 1908). One operation included a brewery and bar along with a bakery (Deer Lodge County Deed Book E:208).

Prices of commodities were high, as were wages. Edwards (1908) writes that sugar cost $.80 per pound and butter about $1.00 per pound. A wheelbarrow cost $25.00, shovels went for $18.00 each, picks went for $14.00, and lumber cost $.50 per foot. A drink of whiskey cost $.25. Flour normally went for $25.00 per 100 pound sack, but the price could go as high as $100.00 in the spring— if it could be had at all. Gold could be sold for a maximum of $18.00 per ounce. Wages ran between $6.00 and $7.00 per day for miners, and between $8.00 and $12.00 per day for drifters. A drift shaft was a hazardous mining feature which was dug in placer deposits and designed to "drift" along the paystreak. Because they were dug in
unconsolidated alluvium, they were prone to cave-ins. An identical hardrock term refers to an underground cut which follows a vein of ore (Fay 1918).

The Consolidation of Claims and Introduction of Large-Scale Placering Methods

By the end of the 1860s, the more easily recovered placer gold had been extracted, and many of the white miners left for greener pastures. German Gulch, in common with other placer mining locales in Montana, then entered a new phase of development based on large-scale techniques such as hydraulic mining (Raymond 1875:327). Hydraulicking involves the diversion of water into high pressure hoses which are use to erode and wash placer deposits into sluices and other catchment devices. The method involves a greatly increased expenditure of labor and resources compared to simpler placering techniques, requiring the construction of extensive ditch and dam systems to collect and impound water. Hydraulic mining was introduced in Montana about 1865, and was utilized in various places throughout the territory. By 1870, nearly half of all hydraulic operations in Montana were located in Deer Lodge County. Because of the relatively massive scale of operations, hydraulicking requires the consolidation of several adjacent claims (Rohe 1985:31-33).
The Deer Lodge County General Real Estate Index partially illustrates a trend in which parcels of several claims were grouped into lots and bought and sold as a unit. In many cases, Chinese were involved in the transactions, despite prohibitions on Chinese ownership imposed by the territorial legislature (more on this below). As time went on, activity became increasingly centered on hydraulic placer mining by Chinese miners, either working for themselves as claim owners or lessees, or as wage earners for American-owned companies (Allen 1949:38).

By 1930, it was estimated that the placers in German Gulch had produced about $5,000,000 in gold (Sahinen 1935:91)

The Development of Lode Mines

While the placer claims underwent consolidation, lode claims at the head of the gulch began to be developed, primarily by the Beal family. George Beal Sr. held an M.D. degree and was active in the gulch from its earliest days as both a miner and as a doctor. He also served as third mayor of Butte in 1881-1882 (Edwards 1908). He became increasingly active in commercial affairs in Butte, and built the Centennial Hotel near the site of the present Finlen Hotel. Nevertheless, he and his son Perry and grandson George maintained their interests in the
gulch (Fredlund et al 1991). George Beal was killed in a carriage accident in German Gulch in 1901 (Edwards 1908).

In 1907, the Montana Gold Mountain Mining Company was formed, primarily to develop lode claims at the head of the gulch, but also to develop a series of placer claims which had been further consolidated. Perry Beal owned 50 shares of the company, which was capitalized at $2.5 million. The company built a concentrating mill which made only one run and was shut down in December 1907. Very little development work was done thereafter, though the company continued to issue annual reports through the 1930s. Exploratory and development work was conducted between the 1930s and 1970s by the Anaconda Company, United States Smelting and Refining Company and Placer Amex, but none of these companies followed up the initial studies (Fredlund et al 1991).

In 1983, Montoro Gold of Reno, Nevada proposed a large open pit mine at the head of the gulch. The project was planned to produce 50,000 troy ounces of gold and silver per year for ten years (Montana Standard [MS] November 15, 1983). However, the plans were abandoned. Pegasus Gold Corporation acquired the property from Montoro in 1984 and announced its own plans for a large mine utilizing cyanide heap leaching. The plan was to mine 8.7 million tons of the 11.8 million tons known to exist in the ore body (MS December 12, 1987). The mine
was subsequently developed, and operated into the late 1990s. At present (2001) Pegasus Gold is in bankruptcy, and active operations in German Gulch have ceased.

**Demographics and Population**

The population of German Gulch steadily declined after the initial flush period. Edwards' (1908) estimate of "nearly 1,000 men" in February, 1865, did not hold for long. The discovery of placer gold in French Gulch, over the mountains to the west, led to a "stampede" in July 1865 and "...a considerable portion of the Central district and lower part of German Gulch was almost deserted" (Edwards 1908). By 1870, the census enumerator counted only 241 people in German Gulch; in 1880 only 150 people were counted. The latter figure also includes the families of a few ranchers in the vicinity (9th U.S. Census 1870; 10th U.S. Census 1880). The 1890 census data was destroyed in a fire, and only aggregate statistics are available (Stapp 1993). The 1900 census is difficult to interpret, since the population within a wide area was counted, including residents at Gregson Hot Springs and employees of the Butte City Water Company, Anaconda Company Stone Quarry, and Northern Pacific Railroad. However, based on an analysis of the enumeration schedule, it is possible that only a few score people or fewer resided in German Gulch (12th U.S. Census 1900).
census of the area enumerated only 22 people, including a few who probably did not reside in German Gulch itself such as ranchers and their families and employees, and a forest ranger who was probably stationed at the High Rye station about 3/4 mile in an air line (over rugged terrain) west of German Gulch (13th U.S. Census 1910).

The population of German Gulch, especially during its heyday, was decidedly cosmopolitan. Residents of the gulch included, besides U.S. citizens, immigrants from Ireland, England, Scotland, Canada, China, Germany, Norway, Sweden, Denmark, France, Russia and Switzerland (9th and 10th U.S. Censuses 1870 and 1880). In the 1870 census, 49% of the population was foreign-born (9th U.S. Census 1870). By 1880, the figure had risen to 82%, reflecting the greatly increased presence of the Chinese, who formed 65% of the total population in the gulch (10th U.S Census 1880).

Though the population was cosmopolitan in terms of national origin, the sex ratio was severely lopsided. In 1870, the gulch only had 19 adult female residents—8% of the population (9th U.S. Census 1870). By 1880, there were only four adult women—only 2.7% of the total (10th U.S Census 1880). No Chinese women were enumerated in any census year, although the Butte Miner [BM] (October 30, 1877) reported that merchant Sam Fouk had "...indulged in the extravagance of a $1,200 wife last spring...".
Jealousy apparently ran high: "...a number of Chinamen living here have been trying first one priest, and then another, to get her out of his power." Sam Fouk had been accused, evidently falsely, of the killing of Hing Lee (see below).

**Seasonality**

Placer mining activity was confined for the most part to times when there was a sufficient flow of water to wash the gold-bearing deposits into catchment devices such as sluice boxes. The miners in German Gulch supplemented the water supply in the gulch by means of an extensive network of ditches which drew water from tributary drainages such as Beefstraight and Greenland gulches (Hydrometrics 1981). Raymond (1869:139) indicates that placer mining generally was possible about eight months of the year in most areas. The only hiatus was when the streams were frozen. In the case of the Chinese, the period of activity is confirmed by the 1880 census, which lists months of employment (10th U.S. Census). In dry years, there may not have been enough water even with the ditch systems. The Butte Miner of June 24, 1876 mentions that the "complaint has been too much water"- perhaps implying that the opposite complaint was usually raised.

Although a portion of the population may have relocated in the winter months, Edwards (1908) makes more
than one reference to people living in the gulch in the winter. In fact, he relates, regarding the Chinese population, that "...every winter quite a number of their unfortunate friends would come from Butte and other camps..."

**Violence, Mortality and Frontier Justice**

The camp saw its share of tragedy. There were at least five accidental deaths, four homicides, and a suicide between 1865 and 1885. In addition, two attempted murders happened during the same period. The first recorded fatality occurred in August of 1865, when James Blake killed a professional gambler named "Old California" over a gambling dispute. Later, in September of the same year, George McColloch died after falling into a drift shaft (Edwards 1908). An cave-in in one of these treacherous holes killed a German with the surname Small in 1868. Two more men, Ephraim Thorp and Timothy Driscoll, died in a drift shaft in 1869, despite the heroic efforts of comrades who tried to reach them. Another fatality, that of a German named John Krider, occurred as a result of an accidental gunshot wound (Edwards 1908).

At least four homicides were committed in German Gulch between 1865 and 1885. An additional death occurred as the result of a suicide. The suicide occurred in 1866,
and was said to involve "...unrequited love for a young girl in Racine, Wisconsin." (The Montana Post April 21, 1866). "Old California" was killed in 1865. The second murder in the camp was of Chinese merchant Hing Lee on October 27, 1876 (BM October 31, 1876). In 1885, a miner was shot to death during a disturbance between the miners and a flume company that planned to float timber for the Butte mines (Edwards 1908; Fredlund et al 1991).

In October 1877, a Chinese man was found dead in a cabin near Silver Bow, but the particulars surrounding his death were unknown at the time. The Butte Miner (October 30, 1877) cryptically remarked that the man "...either died very suddenly, or was murdered by the Celestials with whom he was stopping."

One attempted murder involved the stabbing of a miner named Dowd by his partner, Sam Gowan, around 1865. Another was the shooting of Perry H. Beal during a holdup in 1891 (Edwards 1908).

The attempted murder of Dowd in 1865 occasioned a vigilante-style miner's trial and subsequent lynching (Edwards 1908). A jury composed of "the most prominent and respected men in camp" was formed, and Gowan was furnished a lawyer. His trial was attended by about 400 people. Edwards says that the trial "...proceeded as fairly and quietly as it would have before the highest court in the land." A verdict of "guilty" was returned.
The miners then voted in favor of the hanging of Gowan, which was immediately carried out. At the time of trial, Dowd was in a coma, and "...it was hard for an inexperienced person to tell that he was alive." Ironically, Dowd later recovered. As for Gowan, "...the animus of the man had shown his intent and as it was not the prisoner's fault that Dowd did not die, neither the sheriff or anyone else...lost any sleep over what had happened" (Edwards 1908). Such impromptu trials were a common method of administering justice in the relative absence of peace officers, especially in the 1860s (Toole 1989 [1959]:78-79; Stuart 1957 [1925]).
CHAPTER 7. THE CHINESE COMMUNITIES IN SILVER BOW COUNTY

By 1868, Chinese miners had arrived in present Silver Bow county (then Deer Lodge county), apparently by way of Corrine, Utah (Lee 1978:152). Various nucleii of Chinese settlement developed, not only in German Gulch, but also at a number of nearby locales, including the towns of Gregson, Silver Bow, and Rocker, and the mining camp of French Gulch (Raymond 1873:272; Lee 1978:153). In fact, Rocker was known as "Foo Chow" for a time in the 1870s, but the Postal Service never officially recognized the name (MS November 29, 1942). The Chinese arrival in German Gulch coincided with the "decline" of placer mining in the area, and they began buying claims in German Gulch after about 1870 (Edwards 1908; Deer Lodge County Clerk and Recorder Deed and Mortgage Books).

In addition to miners, the early nucleii of Chinese settlement included merchants who dealt mainly with the Chinese residents, providing food and other goods from China. According to Edwards (1908), German Gulch included at least one Chinese-owned store. The establishment was run by Hing Lee who, in addition to his mercantile activities, "...acted as interpreter and agent for one of the tribes of Ya Ups or See Ups, I do not know which, for although they did not quarrel among themselves, they had little to do with each other". Edwards was probably referring to two distinctive groups from the Chinese
province of Kwangtung mentioned earlier in the discussion of Chinese ethnicity— the Sam Yup and the Sze Yap. These early Chinese immigrants had apparently organized themselves on the basis of geographic origin.

The placers in German Gulch slowly but surely became too poor to work any longer— even by the patient and hard-working Chinese. Over time, the Chinese left their settlements along Silver Bow Creek and German Gulch and either left the area entirely or moved to Butte, occupying new economic niches in the process. In addition, Chinese began to arrive in Butte from other areas. In 1879, hundreds of Chinese laborers were recruited by Butte woodcutting contractors (Lee 1978:153). By 1890, Butte had one of the largest Chinese communities in the Rocky Mountains, and a thriving Chinatown had become established in Butte's central business district. By the early 1890s, Chinese businesses included three restaurants, 20 laundries, four merchandise stores, one tailor and two doctors (Flaherty 1987:36). Interestingly, small numbers of other Asian ethnic groups settled within Butte's Chinatown. Japanese laborers who had worked on railroad construction moved to Butte and established a restaurant within Chinatown, and there were also a few Filipino and Korean residents (Lee 1978:154-55).

Reflecting a recurrent pattern among overseas Chinese communities in the U.S. and elsewhere at the time
(Armentrout-Ma 1983), the Chinese in Butte organized themselves largely along kin or quasi-kin lines through the device of the surname or clan association. Two "Four Clan Associations" were formed from eight of these clans, combining the surnames of To'om, Tom, Huie, and Chieh on the one hand, and Lau, Kwan, Chang and Chew on the other. These clan associations were ruled by a council of elders, who were generally also the leading businessmen (Lee 1978:227-232). The latter four-clan combination, known as the "Four Brothers Association" was imported directly from Kwangtung, with a main headquarters in San Francisco and branches throughout the United States (Armentrout-Ma 1983:121). The clan associations were often on unfriendly terms. According to one Chinese resident:

> When I first came to Butte about fifty years ago [1890s], there were about thirty-two laundries in the city. About twenty belonged to our clan cousins, while the others belonged to the members of the opposite four-clan association. There were then two large four-clan associations, but the members were not friendly toward each other. Many disputes arose between associations (anonymous, quoted in Lee 1978:229).

This description is similar to Edward's (1908) description of the two regional associations in German Gulch in the 1870s. In both cases, leadership was provided by the merchants. In addition, the presence of factions hostile or at least indifferent toward each other is striking.
Tongs were active in Butte beginning at least by the 1910s. The first Butte tong—-the Hip Sing—was established in 1917. The organization was reportedly involved in narcotics and liquor trafficking. A "Tong War", precipitated by the establishment of a rival tong, the Bing Kung Tong, claimed several lives before it was suppressed in the 1920s (Lee 1978:173; Everett 1997:7). The war which began in Butte then spread nationwide, and resulted in a total of at least 27 slayings in the cities of San Francisco, Seattle, San Jose and Chicago (Everett 1997:7). A peace settlement was finally negotiated in 1925 with the help of the Six Companies (Lee 1978:173).

The Chinese population in Butte gradually declined, until by the 1940s there were only a few families. The decline came about via a combination of economic downturns, prejudice in the community, and official sanctions. Many people were deported for violations of the various exclusion acts passed between 1882 and 1910. A boycott by the unions in the 1890s was a significant factor in the decline of the Butte Chinatown (Lee 1978:165-180). According to one Chinese resident: "...in 1895, there were about 800 Chinese here. The boycott by the unions and the lawsuits drove many away." (Private Document, quoted in Lee 1978:135). The 1900 census enumerated 280 Chinese residents in Butte (Lee 1978:149).
CHAPTER 8. THE GERMAN GULCH CHINESE COMMUNITY

Most of the available information on the Chinese community in German Gulch comes to us in the form of the U.S. census enumeration schedules, real estate records related to mining claims, brief mentions in anecdotal "pioneer" histories, occasional newspaper articles, and archaeological investigations. None of these sources provides anything close to a complete picture of life in the Chinese community. However, each source of information imparts at least a modicum of knowledge regarding different aspects of life, and they tend to complement each other.

Demographics and Population

The 1870 census listed only five Chinese in German Gulch, but it is probable that they were undercounted. Chinese are known to have avoided government workers because of previous experience with discriminatory taxes and other forms of official oppression (Stapp 1993:10). The five tallied if the census included two miners living in separate households, two laundrymen living in the same household, and a domestic servant in the household of William Moore. All of the Chinese are simply referred to as "Chinamen", and no ages or other information was collected (9th U.S. Census 1870). By 1873, it was reported that the Chinese had purchased $61,000 worth of
mining claims (Raymond 1873:272). Despite the influx of the Chinese, "...there (was) no perceptible falling off in the number of white men" (Raymond 1873:272). However, by the summer of 1876, there were reportedly in excess of 90 Chinese miners in German Gulch, and only eight white miners along with two families (BM July 5, 1876, August 5, 1876).

By 1880, the majority (at least 65%) of the population in German Gulch was Chinese. This figure probably understates the true proportion, since the census for German Gulch includes people who probably did not reside in the gulch proper, such as local farmers. Ninety-eight Chinese males, all listed as miners, were enumerated in the 1880 census. No female Chinese were counted, though one man was married—his wife was probably left behind in Kwangtung. The miners were employed an average of slightly less than eight months during the preceding year. The ages of the Chinese residents ranged from 13 to 68, and the average age was about 30. The majority were in their 20s and 30s, but six were less than 18 years old. Only three were aged 50 and over (10th U.S. Census 1880).

As noted above, the census data for 1900 is difficult to interpret, since the population within a wide area was counted. However, internal evidence within the enumeration schedule suggests that most of the Chinese
resided either in German Gulch or nearby in Beefstraight and Norton Creeks. For one thing, many of the Chinese names are clustered in two places— one immediately after entries for the George, Frederick and Perry Beal families, who were operating lode mines near Upper Town (Fredlund et al 1991:36), and also immediately after William Bevail, who is mentioned by Edwards (1908) as a resident of German Gulch. Another group is listed immediately before Thomas Ford, who placered the gulch below Lower Town (GLO Mineral Entry 87, Mineral Survey 76). In fact, three Chinese are associated with the Beal families. In addition, most list their occupations as miner or mine laborer. However, though a total of 25 Chinese are enumerated in "German Township", at least one individual— a cook for the Northern Pacific Railroad— can be excluded from the German Gulch population (12th U.S. Census 1900).

Of the remaining 24 Chinese residents, 12 list their occupation as mine laborer, seven are listed as placer miners, two are listed as cooks, two were merchants, and one was a gardener.* The gardener is a boarder in a household of four people headed by merchant Hing Chin and listed immediately after the Beal family entries in Upper Town (12th U.S. Census 1900). (If this household was located in German Gulch, then it opens up the possibility that at least small-scale gardening was practiced in the gulch.)
Merchant Hing Chin was 33 years old, and had been married four years (his wife was apparently left behind in China). He had emigrated in 1880, and was literate in English. He owned the boardinghouse. The other merchant's name is illegible. He was 56 years old, literate in English, and had been married 40 years (typically, his wife is not listed, and was apparently left behind). He emigrated in 1865, and owned the boardinghouse that included nine other persons, all Chinese.

The census data reveals an elderly Chinese population in 1900. The ages of the Chinese residents ranged from 30 to 62, with the average age about 49—nearly 20 years older than in 1880. Fifteen were aged 50 and over (60% of the total). They had emigrated between 1854 and 1887, but most had arrived in the 1860s and 1870s. Eleven were married an average of 23 years, though no women are listed, and it is probable that their wives resided in China (12th U.S. Census 1900). In fact, the Chinese Exclusion Act prohibited the emigration of most of the wives of resident Chinese.

In contrast to former censuses in the area, the 1900 census notes the literacy rate of the Chinese residents. A total of six Chinese individuals could read, write and speak English, and 10 others could at least speak English (64%). Several of the English speakers (some entries are
illegible) could speak and read English, but could not write in English (12th U.S. Census 1900).

By 1910, the population in German Gulch was down to probably only four people. Though the schedule lists a total population of 22 for "Precinct 38", it is apparent that most of the residents counted do not live within the mining district. These include ranchers and their extended families and employees. Two Chinese placer miners and two of the Beal brothers, Perry and Frederick, were apparently the only residents in the mining district by this time. The Chinese miners were 60 and 63 years of age, and neither was married. The schedule does not indicate whether either could speak English, but neither could read or write. They are listed in separate households. Though their Chinese names are illegible, one of them might have been the one nicknamed "Napoleon", "on account of his Napoleonic features" Edwards (1908). Napoleon was reportedly still mining in the gulch when Mineral Examiner F.R. Ingalsbe inspected the George Washington placer claim in 1916 (Ingalsbe 1916).

The Pattern of Chinese Mining Activity in German Gulch

The Deer Lodge County Clerk and Recorder General Index to Records of Real Estate lists a total of at least 26 transactions involving sales or mortgages between Euroamerican and Chinese miners between 1871 and 1882.
That the record of transactions is incomplete is illustrated by the fact that the general index shows sales or mortgages of claims in the absence of any records of when the claims were initially obtained. Furthermore, the earliest deed books (A through D) have been missing for many years, and some of the entries in the general index are illegible, confusing, and even seemingly contradictory. There are thus many gaps in the chains of ownership. The records also exclude any informal arrangements that might have existed, or transactions that were otherwise not recorded for one reason or another.

In 1881, German Gulch became part of Silver Bow county. A review of the real estate and mining claim records failed to yield any information on transactions involving Chinese beyond a reference in the Index to Mine Claims which listed a transaction between Dennis Driscoll and Wah Hum Ling regarding one of the lots in the gulch. Unfortunately, no entries could be found in the deed, mortgage or patent books regarding the entry.

The more detailed information in the GLO records of patented claims was indispensible in narrowing down where certain parcels of ground lay. For example, two of the plats of patented claims depict a "Chinese Company" situated between them. In addition, the patented claims are often referenced in transactions involving adjacent properties.
An additional difficult issue to contend with in analyzing the records is a lack of information concerning how the three districts in German Gulch (Old Frederick, Central, and Siberia) were laid out. Many of the transactions involved claims numbered in reference to their position above and below the place of discovery, and thus one must identify this point, at least approximately, in order to determine where the claims lay. A water rights investigation for the Beal Mining Company in 1981 attempted unsuccessfully to locate district maps at the Montana Historical Society, the Montana Tech library and the University of Montana Archives (Hydrometrics 1981), and none could be found during the current investigations. Nevertheless, the general areas occupied by the claims can sometimes be discerned indirectly. Edwards (1908), for example, mentions that the point of discovery for the Central District lay "...1,200 yards above the three forks of Norton, Beef Straight and German Gulch...". However, for a variety of reasons, including the fact that these three streams do not converge at a precise point, the point of discovery can only be located very approximately. Edwards and other sources also mention that claims ran 100 feet along the stream. The general areas of the claims can be further defined by reference to the few groups of claims whose boundaries are more accurately delineated, such as patented claims, when these also mention specific
claims above or below discovery. Perhaps the best example is furnished by Lot 37, patented in 1875, which is defined in the Deer Lodge County deed books as incorporating claims 32-58 above discovery in the Central District. If nothing else, the boundaries of the three districts are fairly well established, and most transactions mention the particular district involved.

A difficulty that has been noted by many researchers dealing with Chinese immigrants is the lack of coherence and consistency in the transliteration of Chinese names (e.g. Stapp 1990:343-346; Gardner 1998:19-22). This could be a problem even in China itself, with the profusion of dialects and different systems of transliteration (Gardner 1998:14). Chinese surnames are stated first, followed by the given name. This often led to confusion with courthouse clerks and census enumerators, among others. Chinese frequently also had two surnames. The extra surname was often obtained through falsified documents, whereby a person would take on a deceased person's identity in order to circumvent immigration laws. It was also common for Chinese in the United States and Canada to anglicize their surname or given name (Gardner 1998:20-21). One suspects also that the name order may have been transposed as part of the anglicization of the name. I suspect this may be especially common in the case of Chinese names which sound
similar to English names, such as "Sam" (i.e., is Sam Fouk's name really Fouk Sam?).

Another source of confusion in names is the Chinese use of the prefix "Ah". "Ah" is not a true name, but is roughly equivalent to "Mr." or "Mrs." in English, except that it precedes a given name, rather than a surname (Stapp 1993:12; Gardner 1998:15-6). "Ah" is particularly prevalent in the historical records relating to German Gulch. For example, most of the names recorded in the various censuses are prefixed with "Ah", as are a good many of the names in the real estate records and newspaper accounts. It appears there may also be variations on "Ah", depending on the transcriber. For example, there is mention in the real estate records of a "Wah Hing", and it seems possible that "Wah Hing" really meant "Ah Hing". If so, then the name may refer to a merchant otherwise known as Hing Lee. If "Hing Lee" is an anglicized version of "Lee Hing" (Lee is a common surname, whereas Hing does not appear to be nearly as common), then Wah Hing and Hing Lee may be the same person.

A word which often appears in deed transactions is "Hong". Hong often appears as a surname, but is also a term which literally means "row" (in reference to rows of windows on warehouses). In Canton and surrounding areas, "Hong" came gradually to mean a business establishment (Thomson 1909:27). Chinese company names in German Gulch
often include this term (e.g. Bo Hing Hong, Quong Wa Hong and Wah Shay Hong - see below).

In spite of the difficulties noted, the available deed and mortgage records, GLO records of patented claims, and newspaper accounts indicate that the Chinese worked most of German Gulch from near the head of the gulch to its confluence with Silver Bow Creek, sometimes under contract with American-owned mining companies, but usually as owners of claims. See Table 1, a summary of claim transactions involving the Chinese between 1871 and 1880. The transactions also typically involved partial interest in one or more ditches conveying water to the claims, as well as tools, equipment and buildings located on the claims. Many of the transactions involved substantial sums of money. The largest transaction mentioned in the deed books is the sale of several claims or partial claims and varying interests in three large ditches for the sum of $42,000. These properties were sold by George Beal to Wah Hing in November, 1875 (Deer Lodge County Deed Book J:562).

Despite the prohibition of Chinese ownership of mining claims promulgated by the Montana legislature in 1872 (but struck down in 1874 - see above), the Chinese and white miners in German Gulch apparently found ways to ignore the law and evade prosecution (which may have been lax in any case). In fact, at least five transactions
<table>
<thead>
<tr>
<th>Chinese Co. or Individual/Dates</th>
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</tr>
</thead>
<tbody>
<tr>
<td>Lee Fouk (post-1872)</td>
<td>Sampson Stevens &amp; Matthew Hodge</td>
<td>Lee Fouk</td>
<td>3000' at German/S.B. Creek- Liberty Bar; special warranty deed for $1,350</td>
<td>9/5/72</td>
<td>runs &quot;down 400 feet below China cabin&quot;</td>
</tr>
<tr>
<td>Quang Wing Tong Co. (post 1874)</td>
<td>Keating, Martin James Kerr</td>
<td>Quang Wing Tong Co.</td>
<td>claims 30 to 56 in Old Frederick district, included; two log cabins; quit claim deed for $5,500</td>
<td>7/13/74</td>
<td></td>
</tr>
<tr>
<td>Fouey Jee Sung Co. (post-1871)</td>
<td>Henstel, WS. F.J. Hamois, RC Hancock</td>
<td>Fouey Jee Sung Co.</td>
<td>Index: &quot;Gulch claims in G.G. com at mouth of Norton G. &amp; extending up G.G. to lower line of ground formerly owned by Thomas Ford&quot;; (no entry found in deed or mortgage books; index states it was an &quot;agreement&quot;)</td>
<td>8/30/71</td>
<td>includes archaeological locality 48</td>
</tr>
<tr>
<td>Ah Chung Co. (1870 to post-1871)</td>
<td>Keating, Martin Martin Joyce, Thomas Ford</td>
<td>Ah Chung</td>
<td>Commencing at upper line of German Gulch claim #13 above disc, Central District &amp; extending down gulch to lower line #6 below disc, except 400' east side opposite 30, 50 and 6, special warranty deed for $10,000; includes &quot;cabins, mining tools&quot;, etc.</td>
<td>9/7/70</td>
<td>includes archaeological locality 48</td>
</tr>
<tr>
<td>&quot;Ah Tung &amp; Co&quot;</td>
<td>Jefferson McCauley et al</td>
<td>3800' mining ground Central District between claims 14 and 52; mortgage for unknown amount (cannot find entry in mortgage book)</td>
<td>6/21/71</td>
<td>probably above discovery- too much ground for below discovery; within Lots 37, 38 and Centerville area</td>
<td></td>
</tr>
<tr>
<td>Ah On, Wing Look Tong (post-1878)</td>
<td>Ford, Thomas</td>
<td>Ah On</td>
<td>Lot 37 and 38, Central District; cabins, tools, etc.; special warranty deed for $9,000</td>
<td>8/28/78</td>
<td></td>
</tr>
<tr>
<td>Ah On Winglook Tong</td>
<td>Thomas Ford</td>
<td>Ah On</td>
<td>In Old Frederick district- &quot;Driscoll &amp; Kerr placer ground 4000' more or less&quot;; mortgage for $1,500</td>
<td>12/19/78</td>
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Table 1. Summary of claim transactions involving the Chinese between 1871 and 1880, from the Deer Lodge county real estate records.
<table>
<thead>
<tr>
<th>Chinese Co. or Individual/Dates</th>
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<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quong Wa Hong Co. (ca. 1871-1889)</td>
<td>Quong Wa</td>
<td>Spier, Evans, Erhart</td>
<td>undivided 1/2 of claim 8 &amp; all claim</td>
<td>8/8/71</td>
<td></td>
</tr>
<tr>
<td>Ah Gou &amp; Gank (Yank) ? Chau</td>
<td></td>
<td></td>
<td>10-28, below discovery Siberia Dist.; special warranty deed for unknown amount (in deed book B- missing)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Stone, John</td>
<td>Quong Wah Hong Co.</td>
<td></td>
<td>2/3 clms 28-32 in Siberia Dist. (above or below?); 1/3 &quot;Stone and Gardiner ground&quot;; spec. warranty deed for $1,000 in gold dust</td>
<td>6/23/75</td>
<td>claims 28-32 possibly &quot;panhandle&quot; of Lot 40 mentioned in other transactions as sold to Eureka Co.</td>
</tr>
<tr>
<td>Ah Gow, Quong Wah Hong Yok Chow - Eureka Co.</td>
<td>E. Spier, Wm. Stolte</td>
<td></td>
<td>undivided 1/2 claim #8 &amp; all claims</td>
<td>9/28/75</td>
<td></td>
</tr>
<tr>
<td>Quong Wa Hong &amp; Bo Hing Hong Companies (see also below)</td>
<td>E. Spier, E. Miller, B. Dudden</td>
<td></td>
<td>Lot 40 in Siberia &amp; Central Districts 40 90/100 (acres), 1/2 claim 8 and all of claims 10-28 below discovery, included various tools, etc; Chinese indebted 533 ounces of gold ($9,600); mortgage paid by November 1879 (see also below)</td>
<td>3/28/76</td>
<td>Co. grantors: Ah Sing, Hing Lee, Gee Sam-Calif. Mining Co., Yank Chow, Ah Gow. Eureka Mining Co.</td>
</tr>
<tr>
<td>Bo Hing Hong Co. (ca. 1873-1880)</td>
<td>Hing Lee, Ah Sing, Yee Sam</td>
<td>Muller et al Muller &amp; wife, J.H. Ellerhorst Mining ground (Lot 40) in Central &amp; Siberia District (except lower 200' of lot), includes various tools but no buildings mentioned; mortgage for 1,000 44/100 ounces of gold dust</td>
<td>9/24/73</td>
<td>Mort. grantees-Erst Muller &amp; wife, W.M. Stolte, Frederick H. Ellerhorst, Ernest Spier &amp; wife WF Ben Dudden &amp; wife</td>
<td></td>
</tr>
<tr>
<td>Bo Hing Hong &amp; Quong Wa Hong Companies (see also above)</td>
<td>E. Spier, E. Muller, B. Dudden</td>
<td></td>
<td>Lot 40 in Siberia &amp; Central Districts (40 90/100 acres), 1/2 claim 8 and all of claims 10-28 below discovery, included various tools, etc; Chinese indebted 533 ounces of gold ($9,600); mortgage paid by November 1879 (see also above)</td>
<td>3/28/76</td>
<td>Co. grantors: Ah Sing, Hing Lee, Gee Sam-Bo Hing Hong Co. Yank (Yok) Chow, Ah Gow. Quong Wa Hong Co.</td>
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<tbody>
<tr>
<td>Bo Hing</td>
<td>Bo Hing Hong Co. or Calif. Co.</td>
<td>Morgan Evans</td>
<td>Lot 40, except 200' at lower end and &quot;so much as was sold to Eureka Co.&quot;; mortgage for $788.45 @ 1.5% interest/month</td>
<td>11/2/76</td>
<td></td>
</tr>
<tr>
<td>Edwards, et al</td>
<td>Hing Lee, Ah Hing, Ah Kee Calif. Co.</td>
<td>Central District, commencing at &quot;upper line of pat. grd of Moore, Hansel and Co. and running up 200' above lower line Lot 40&quot;, 1,700 feet, includes misc. tools and three cabins; special warranty deed for $7,000 cash</td>
<td>5/28/77</td>
<td>Grantors-W.R. H. Edwards &amp; wife, Benjamin Notestein, Edward Fairfield; Hing Lee deceased at time of transaction</td>
<td></td>
</tr>
<tr>
<td>Ah Hing, Ah Kee, Hop Lee Ah Kee, Ah Hing, Hop Lee</td>
<td>W.R.H. Edwards B.F. Notestein E.B. Fairfield</td>
<td>property described above mortgaged for 372 4/18 ounces of gold dust (about $6,700) 3 1/2 ounces paid per week</td>
<td>5/28/77</td>
<td></td>
<td></td>
</tr>
<tr>
<td>&quot;Calif Co. (debtor)&quot;</td>
<td>Morgan Evans</td>
<td>Lot 40, transaction type unknown (listed in index as &quot;Attach&quot;, no entry for deed or mortgage book) probable deed as result of civil judgement (Calif. Co. listed as &quot;debtor&quot; and &quot;defendant&quot;)</td>
<td>10/19/80</td>
<td></td>
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</tr>
<tr>
<td>Bo Hing Hong Company</td>
<td>Morgan Evans</td>
<td>Lot 40 re-obtained via mortgage of $2,310 @ 1% interest/month; second mortgage the following day between two groups of Chinese (see below)</td>
<td>12/17/80</td>
<td>Co-mortgagers are Den Len, Teng Deb, Chung Ming, Jung Di Mun Fung, Ye Sam, Wo Tak Lok Chung, Chung Sing Deb Sen, Ye Sam, Wo Tak, Ah Deng, Ah Pou, Ah Che, Ah Fuy, Ah Ang, Ah Jeng, Ah Yen, Ang Ging, Ah Eng. &quot;et al&quot; all of &quot;Calif. Co.&quot;</td>
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Table 1 (continued).
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<tr>
<th>Chinese Co. or Individual/Dates</th>
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<tbody>
<tr>
<td>Bo Hing Hong Co. (continued)</td>
<td>Bo Hing Hong Company</td>
<td>Kim Kee, Buck Jeng, Tom Hoy &amp; Gen ____(illegible)</td>
<td>Lot 40 &quot;except that part thereof sold to Eureka Co.&quot;; mortgage of $4,318.70, must pay by 11-18-82</td>
<td>12/18/80</td>
<td>Co. mortgagors are Deb Len, Ten Deb, Ye Sam, Chung Ming, Jung Di, Mung Fung, Ye Sam, Wo Tak, Lok Chung, Chung Sing, Deb Sen, Ah Yen, Ang Sing, Ah Eng, Ah Che &quot;et al&quot;</td>
</tr>
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<td></td>
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<td></td>
<td>Lot 40 &quot;reserving therefrom the part heretofore sold to Eureka Co. also all mining gr in G.G. owned by grantors or any of them&quot; (possibly including &quot;Moore, Hausel and Co. ground&quot; obtained in 1877); deeded to Evans for $3,000</td>
<td>4/17/83</td>
<td></td>
</tr>
<tr>
<td>Sing Wah Hong</td>
<td>Driscoll, Dennis</td>
<td>Morgan Evans</td>
<td>Index, &quot;600' of mining ground immediately above the Eureka Co. mining gr. in Siberia mining dist. (illegible) of said gulch from place aforesaid to a point opposite the store of Foster and Ray&quot; (probably includes Lot 41); mortgage (?) for unknown amount</td>
<td>12/8/73</td>
<td>could not find entry in mortgage or deed books; only apparent Chinese-Euroamerican mortgage; mineral certificate for Lot 41 says it was purchased in 1873)</td>
</tr>
<tr>
<td>(pre-ca. 1874)</td>
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<tr>
<td>Wah Shay Hong Co.</td>
<td>Moore W. L., W.S. McCleery</td>
<td>&quot;Wah Shaw &amp; Co.&quot;</td>
<td>Claims 8-10, 2/3 of claims 11-15 &amp; all of clms 16-27 above discovery in Siberia district &quot;also six log cabins&quot; (from index—cannot find entry in mortgage or deed books; index states transaction is &quot;agreement&quot;)</td>
<td>6/25/71</td>
<td>grantees, along with W.L. Moore, are owners of Union Co. (see below); vicinity of archaeological localities 18 and 30</td>
</tr>
<tr>
<td>(ca. 1871 to post-1875)</td>
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<td></td>
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<tr>
<td></td>
<td>W. L. Moore, H.B. McCleery &amp; W.S. McCleery</td>
<td>Wah Shay Hong Co.</td>
<td>Claims #8-10, 2/3 11-15, full interest in 16-27 above discovery in Siberia district misc. tools; special warranty deed for $21,000 in cash and notes and mortgage on same day for Table 1 (continued).</td>
<td>6/13/73</td>
<td>same property as above; mentions June 1871 &quot;agreement&quot;</td>
</tr>
</tbody>
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Table 1 (continued).
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<tr>
<td>Wah Shay Hong Co. (continued)</td>
<td>Wah Shay Hong Co.</td>
<td>W L. Moore et al Co.</td>
<td>108 33/100 ounces of gold dust; mortgage paid off by September 1875</td>
<td>5/24/75</td>
<td>no entry could be found in mortgage or deed books; would extend to lower line of claim 8-portion of property listed above (i.e. contiguous)</td>
</tr>
<tr>
<td></td>
<td>Evans, Henry &amp; Co.</td>
<td>&quot;Wah See Hong &amp; Co.&quot;</td>
<td>Index-<em>In Siberia dis. about 700' com at dis &amp; extending up gulch to lower line Union Co.</em>. bill of sale for unknown amount;</td>
<td>11/4/75</td>
<td>1/3 interest in claims 11-15 coincide with 2/3 interest of Wah Shay Hong Co. in same claims; 28-32 contiguous with Wah Shay ground; largest transaction found in records; is &quot;Wah Hing&quot; actually Hing Lee?</td>
</tr>
<tr>
<td>Wah Hing (1875-1876)</td>
<td>Wah Hing *</td>
<td>Geo Beal</td>
<td>1/3 clm #11-15, 28-32 &amp; all clm 33-56 inclusive 60,61 above discovery in Siberia district, included blacksmith shop and carpenter shop; deeded for $42,000</td>
<td>9/18/76</td>
<td>same interest as Wah Hing, Wah Shay Hong in claims 11-15 mortgaged to Thomas Gardner as a result of prior debt of $200 (?)</td>
</tr>
<tr>
<td></td>
<td>Wah Hing</td>
<td>Geo Beal</td>
<td>same property described above; deeded to Beal for $5,000; sold next day to Thomas B. Gardner for $2,000</td>
<td>7/27/77</td>
<td></td>
</tr>
<tr>
<td>Sin Faun, Tua Goen (ca. 1877)</td>
<td>Sin Faun, Tua Goen</td>
<td>Thomas B Gardner</td>
<td>Und 1/3 clms 11-15 above discovery in Siberia district; mortgaged for $200</td>
<td>7/27/77</td>
<td></td>
</tr>
</tbody>
</table>

Table 1 (continued).
involving Chinese occurred between 1872 and 1874. Two of these transactions involved outright deeds of mining claims to Chinese from white ownership. Two others involved mortgages in which whites held the note to the mortgage while the Chinese worked the ground and made payments. One involved the sale of a claim to a Euroamerican from a Chinese person.

Most of the financial dealings in German Gulch throughout the 1870s and 1880s involved mortgages in which a group of whites held the note to the mortgage while the Chinese worked the ground. Many of these first involved a transaction wherein the ground was deeded to the whites for a nominal sum—typically one dollar. According to the Silver Bow county clerk and recorder's office, the valuation of a deed, however nominal, is required under law. The whites would then trade the lot back to the Chinese under the terms of a mortgage whereby the Chinese made regular payments on the money owed, which accrued interest at a rate varying from 1-2 percent per month. Stapp (1990:329) mentions similar transactions in the Pierce mining district in Idaho. Such an arrangement evidently allowed the Chinese to continue working their claims, even in the face of prejudice or official sanctions. Fredlund et al (1991:29-30) surmise that a working arrangement between the whites and Chinese allowed the latter to continue working their claims when it was
illegal to do so. Stapp (1990:61, quoting French 1891) gives an account of an 1889 legal decision in Idaho, barring the Chinese from owning claims, and its aftermath. French (1891) states that "...many of the Chinese [continued] to work and hold their ground by paying white men a suitable salary to live upon and hold the property."

From what can be inferred from the mining records and other documents, it appears there may have been at least five groups of Chinese mining in the gulch at one point during the 1870s. This occurred about 1875, when transactions were recorded involving the Quang Wing Tong, Quong Wa Hong, Bo Hing Hong, and Wah Shay Hong companies as well an individual named Wah Hing. Other groups or individual Chinese may also have been active in 1875, but there simply are no transactions involving those groups, or other evidence that they were operating in that year. Most of the operations on record were apparently owned by more than one individual, although six transactions mention only one individual. One company- the California, or Bo Hing Hong, Company appears to have been owned by over 20 people, at least by a certain point in time. Most of the other operations mention only two or three names in the transaction records. The longest-lived Chinese company was the Eureka, or Quong Wa Hong, Company, which operated from as early as 1871 to as late as 1889. Another relatively long-lived operation was the Bo Hing
Hong Company, which operated from as early as 1873 until about 1880. The Quong Wa Hong and Bo Hing Hong companies mined in the same general area, on adjacent parcels of land, and are mentioned together in one mortgage transaction with a group of whites. Nearly all of the recorded transactions involve deeds or mortgages between Chinese and Euroamericans. Only one, between the Bo Hing Hong Company and a small group of Chinese, involved a transaction between two groups of Chinese.

At least one company, and possibly another, were owned by whites but the labor was furnished by Chinese under contract (BM Sept. 12, 1876; Deer Lodge County General Real Estate Index). In addition, it appears that a Chinese-owned company (Eureka or Quong Wa Hong) may have cooperated with two other Euroamerican-owned firms (BM August 5, 1876). Regardless of ownership, by 1876 most of the mines in the gulch seem to have been worked mostly by Chinese. During the summer of 1876, the Butte Miner reported 90-100 Chinese at work in the gulch compared to only about 8-15 whites (BM July 25, August 5, 1876). On August 5, the Butte Miner reported that German Gulch:

still continues to yield a fair compensation to the different companies now operating, though mostly owned and operated by Chinese. There are six companies, employing ninety-three men in all. Commencing at the Lower Town, the Hensley Co. have a flume and two strings of sluices, just above is the Ford Co., with two strings of sluices, next to them is the California, with a like outfit, then comes
Since only 8-15 whites were reported living in the gulch, it seems likely that most of the "ninety-three men" must have been Chinese.

**Old Frederick District**

Beginning at the mouth of German Gulch where it enters Silver Bow Creek was the placer mining operation of Lee Fouk, who acquired 3,000 feet of ground, known as Liberty Bar, from Sampson Stevens and Matthew Hodge in September 1872. The claim began 400 feet below a "China Cabin" (Deer Lodge County Deed Book L:165).

An extensive area upstream, beginning about one-half mile upstream from the confluence of German Gulch and Silver Bow creek and extending a short distance past the confluence of Norton, Beefstraight and German Gulches, was patented by Thomas Ford, Hugh B. McCleery, Dennis Driscoll and Martin Keating in 1874. The ground was known as Lot 39, and occupied the majority of the Old Frederick District (Mineral Entry 1446). In 1874, Martin Keating and James Kerr sold 27 claims in the Frederick District (about 2,700 feet of ground) to the Quong Wing Tong Company for $5,500. The property included a number of miscellaneous tools, sluices, flume boxes, hydraulic hoses and nozzles, and two log cabins. In 1878, Thomas Ford
sold 4,000 feet of placer ground in Old Frederick district, "known as Driscoll and Kerr placer ground", to Ah On and Wing Look Tong under the terms of a mortgage in the amount of $1,500. The debt was payable in installments of $35 per week. The parcel included "cabins and other buildings" (Mortgage Book E:448). This parcel corresponds well with Lot 39, both in overall length, and in terms of the individuals associated with it (Ford, Driscoll and Kerr).

Central District

The next parcel associated with the Chinese (Lot 36) began at the mouth of Norton Creek and extended to the "lower line of ground formerly owned by Thomas Ford". This ground, which lay all or mostly in the Central District, was apparently worked by the Fouey Jee Sung Co. under an agreement with W.S. Hensley and Company made in 1871 (General Index to Real Estate). No entry corresponding to the information in the index could be found in either the deed or mortgage books. In 1876, the Hensley Company operation was reported to include a flume and two strings of sluices (BM August 5, 1876). This area may include the a portion of the settlement at archaeological Locality 48.

The next parcel, encompassing Lots 37 and 38 immediately above the Hensley and Company ground, was
patented by Thomas Ford (Lot 37) and Elijah W. Moore and Charles C. Housel (Lot 38) in 1875 (Mineral Entries 1163 and 1192). In 1870, a parcel of ground which appears to lay within this area was sold by Martin Keating, Martin Joyce and Thomas Ford for $10,000 to Ah Chung. The parcel included eight claims, or about 800 feet of ground (Deed Book H:449). Ford subsequently bought Lot 38 and sold both Lots 37 and 38 to Ah On in 1878 for $9,000 (Deed Book P:397). By 1878, Ah On, in combination with his partner Wing Look Tong, apparently controlled a large extent of mining ground in the lower reaches of the gulch (i.e., all of Lots 37, 38 and 39). In 1876, the "Ford Co." operation was reported to include two strings of sluices, probably operated primarily by Chinese labor (BM August 5, 1876). The lower boundary of Lot 37 lies about 100 meters upstream from the settlement at archaeological Locality 48.

The Bo Hing Hong (California) Company

The next group of claims was located in the vicinity of Centerville and the mouth of Edwards Gulch in the Central District. This area, along with 200 feet of the lower end of Lot 40, was sold by W.R.H. Edwards, B.F. Notestein and E.B. Fairfield in May 1877 for $7,000 cash and a mortgage of 372 4/18 ounces of gold dust (approximately $6,700) to Hop Lee, Ah Hing and Ah Kee.
The mortgage was payable in weekly installments of 3 1/2 ounces. The parcel included ditches, three cabins, derricks, flumes, pipe, hose and mining tools (Deed Book M:181; Mortgage Book D:545). Hop Lee and the others are identified as members of the California, or Bo Hing Hong Company, which is also listed in several transactions involving Lot 40 just upstream. In 1876, the California Company was described as immediately above "Ford Co.", and included a "like outfit" (BM August 5, 1876).

Lot 40, which straddles the line between the Central and Siberia Districts, is mentioned in several transactions throughout the 1870s. Most transactions involve the Bo Hing Hong (California) Company. One transaction also involves the Quong Wa Hong (Eureka) Company, which appears to have bought the western "panhandle" of Lot 40. The Quong Wa Hong Company mined in the area immediately upstream of the Bo Hing Hong Company ground in Lot 40.

A number of mortgage transactions in the 1870s between the Bo Hing Hong company on the one hand, and various Euroamericans and another group of Chinese on the other hand, suggests that the Bo Hing Hong Company was falling increasingly heavily into debt. Some of the transactions appear to have involved attempts at refinancing the debt. Lot 40 is first mentioned specifically in the 1873 transaction noted earlier between Hing Lee, Ah Sing and
Gee Sam and a group including Ernst Muller and others. This transaction involved the Chinese selling Lot 40 for one dollar, but continuing to work the claim while Muller et al held a mortgage in the amount of 1,000 44/100 ounces of gold dust (roughly $18,000). The claim was watered by a ditch from Greenland Gulch (Mortgage Book C:320).

Members of this Euroamerican group which included Ernst Muller, William Stolte, Frederick Ellerhorst, Ernst Spier and Joseph Ehrhard patented Lot 40 in 1874 (Mineral Entry 954). In February 1876, William Stolte sold his share (?) of the mortgage to Ernst Spier. The amounts listed include a mortgage against the California Company for $2,000 and another against the Eureka Company for $1,250 (General Real Estate Index). No entry involving this transaction could be found in either the deed or mortgage books.

Another mortgage transaction in March, 1876 mentions both the California and Eureka companies. As before, Hing Lee, Ah Sing and Gee Sam are listed as "members comprising the California Company" and "Ah Gow and Yank Chow compris(e) the Eureka Company". Lot 40 is described as "the mining ground mined by the California Chinese Company". Another adjacent piece of ground, consisting of 1/2 of claim eight and all of claims 10-28 below discovery, is described as "the mining ground owned by the Eureka Mining Company."

Ernst Spier, E. Miller and B. Dudden put up $10,000
dollars for Lot 40, in return for which the Chinese were required to remit 533 ounces of gold dust at the rate of 13 16/18 ounces per week. Meanwhile, the Chinese retained the right to work the ground. A notation indicates that the mortgage was satisfied by November 5, 1879 (Mortgage Book D:166). Yet another mortgage transaction in November, 1876 between the "Bo Hing Hong Co. or Calif. Co." and Morgan Evans, specifically excludes "so much as was sold to Eureka Company." The mortgage was in the amount of $788.45, accruing interest at the rate of 1 1/2% per month (Mortgage Book D:373).

The lot is next mentioned, after a four year hiatus, in an October, 1880 transaction listed in the real estate index between the California Company and Morgan Evans. Apparently, a judgement had been entered against the California Company, which is listed as "debtor" and "defendant". The entry for the requisite transaction book is missing (General Index to Real Estate). Shortly thereafter, in December 1880, are two mortgage transactions in succession, firstly between the California Company and Morgan Evans, and secondly between the California Company and another group of Chinese. In the first transaction, Morgan Evans put up $2,310.86, which the California Company was required to pay back at the rate of $60 per week. In the second transaction, a group of three Chinese put up $4,318.70, which was due to be
paid off by November 18, 1882. Approximately 20 Chinese are listed as members of the California Company in one of the entries (Mortgage Book G:176-180). In the last entry, transacted in April 1883, Lot 40 is deeded to Morgan Evans in return for $3,000 (Deed Book T:648).

The Quong Wa Hong (Eureka) Company

The area immediately up-gulch from the Bo Hing Hong Company ground was worked by the Quong Wa Hong, or Eureka, Company. The area is identified in the mineral entry plats for both Lots 40 and 41 as belonging to a "Chinese Company" (Mineral Entry Patent 954; Mineral Entry Patent 2213). See Figures 6 and 7, copies of the mineral entry plats. In addition, a December 1873 transaction between Dennis Driscoll, who owned Lot 41, and Sing Wa Hong, mentions that the parcel is "immediately above the Eureka Co." (General Index). This area appears to include claims 8-28 below discovery, which are mentioned numerous times, not only in relation to the Quong Wa Hong Company, but also in the transaction described above involving both the Bo Hing Hong and Quong Wa Hong Companies. The parcel might also include four claims obtained by the Quong Wa Hong Company from John Stone in 1875 (Deed Book J:270), although it is not clear if the latter claims are above or below discovery. If they are below discovery, they would appear to conflict with Lot 40, and would also create too
Figure 6. Mineral Entry plat for Lot 40. Note the legend "Chinese Company" immediately west of the claim.
Figure 7. Mineral Entry plat for Lot 41. The legend "Chinese Company" is immediately east of the claim. The western "panhandle of Lot 40 is also shown.
large of a piece of ground to lie between Lots 40 and 41, the latter of which was patented by Dennis Driscoll (GLO Mineral Certificate 100). It seems likely that the western "panhandle" of Lot 40 was also included in the Quong Wa Hong Company ground (the part specifically mentioned as excluded in the later transactions involving Lot 40). This would allow for approximately 2,000 feet of ground, which would match the length of the 20 claims mentioned in the deed and mortgage books. Like the Bo Hing Hong Company, the Quong Wa Hong Company eventually fell into debt, not paying off the balance until about 18 years after the initial purchase of ground.

The ground between Lots 40 and 41 was purchased by Ah Gou and "Gauk Chou" (referred to elsewhere as Yok Chow) in August, 1871 from Ernst Spier, H. Evans and Joseph Erhard for $28,000. The parcel included 1/2 of claim eight and all of claims 10-28 below discovery. Located on the claims were flumes, sluices, derricks, miscellaneous tools and three cabins. Spier, Evans and Erhard were "known as the Eureka Gulch Mining Company", which probably explains why the Quong Wa Hong Company was also known as Eureka Company (Deed Book G:469). In 1875, the ground was mortgaged to Ernst Spier and William Stolte for $1,356.07 at 1 1/2% interest per month. The Chinese are referred to as "Quong Wa Hong, Ah Gow, Yok Chow, comprising the company of Quong Wa Hong and known as the Eureka Company,"
Chinamen of German Gulch." A notation in the deed book indicates that the mortgage was not paid off until November, 1889 (Mortgage Book D:10). In 1876, the Quong Wa Hong Company apparently mortgaged its claims again, in company with the Bo Hing Hong Company in the transaction noted above between the Chinese and Ernst Spier and the others. A notation indicates that this mortgage was satisfied by November 1879 (Mortgage Book D:166).

Lot 41- Sing Wa Hong

Lot 41, immediately above the Quong Wa Hong Company ground, was patented by Dennis Driscoll in 1877. The lot was small, encompassing only 7 44/100 acres (Mineral Entry 2213). Driscoll apparently obtained the ground through a mortgage from Sing Wa Hong (General Index to Real Estate). No entry in either the mortgage or deed books could be found. However, the Mineral Certificate for the patent (No. 100) states that the ground was purchased in 1873. This would appear to be the only mortgage transaction found in which a Chinese person held the note for the mortgage. The transaction, whatever it entailed, occurred during a period when it was illegal for Chinese to own claims in Montana.
Wah Shay Hong Company

Lot 42 borders Lot 41 on the west. The ground in the lower portion of Lot 42 (beginning about 800 feet above Lot 41—see below) appears to have been worked by the Wah Shay Hong Company. In June of 1871, "Wah Shaw and Co." entered into an agreement with W.L. Moore and W.S. McCleery concerning claims 8-10, a one-third interest in claims 11-15, and all of claims 16-27, all above discovery in the Siberia District (General Index). No entry corresponding specifically to this agreement was found in the deed or mortgage books, but an 1873 transaction references "an agreement to the Wah Shay Hong Company made by H.B. McCleery, W.S. McCleery and W.L. Moore upon the (23) day of June A.D. 1871" (Deed Book E:281). Two transactions on the same day in June 1873 involve first the sale by Moore and the McCleerys of the same claims mentioned above (about 2,000 feet of ground) to the Wah Shay Hong Company for the sum of $21,000, and then the mortgaging of the same parcel for a sum of 108 33/100 ounces of gold dust (about $1,950). The $21,000 was paid in cash and notes. The property included "flumes, hose, hydraulic pipes, picks, shovels, wheelbarrows, crowbars, pans, etc. also one set of blacksmith tools and six log cabins" (Deed Book J:248; Mortgage Book C:217).
The precise location of the claims worked by the Wah Shay Hong company is somewhat difficult to pinpoint. The question is of some importance since archaeological Locality 30, which includes a substantial Chinese occupation, lies a short distance west of Lot 41. However, by referencing the claims adjacent to Lot 41, it is possible to surmise a general location for the claims of the Wah Shay Hong Company, which may be associated with Locality 30. All of the claims in question are described as being located above discovery, while the claims below Lot 41 are all described as below discovery. This alone narrows down the area encompassing the discovery point to a few hundred feet. By further referencing from the postulated location of the east end of the Quong Wa Hong Company ground it is possible to narrow down the range even further. The "shoulder" of the panhandle of Lot 40 is thought to correspond to the eastern border of the Quong Wa Hong Company ground. The highest numbered claim associated with this company appears to be claim 28 (but could be as high as claim 32- see above). Since claims measured 100 feet long, multiplying the claim number by 100 should indicate how far the claim is from the discovery point. About 2,800 feet up the gulch from the "shoulder" of Lot 40 is the approximate boundary between Lots 41 and 42. This would put the Wah Shay Hong ground about 800 feet west of the boundary, more or less,
depending on the degree of error, which could be as much as a few hundred feet.

Fredlund et al (1991) hypothesize in the abstract to their report that the ground containing Locality 30 was owned by the Union Company, which was headed by W.L. Moore and the McCleerlys. In a map figure on page 203 the entire area of Lot 42, which extends some 4,600 feet along the gulch, is identified as "Union Co. Ground". However, this is contradicted on page 32 where it is surmised that Lot 43, immediately west of Lot 42, is associated with the Union Company. In addition, the Butte Miner (August 5, 1876) mentions the "Eureka, Driscal, and Union Co's sluices" above the California company works, and it is reasonable to surmise that this included the lower portion of Lot 42 (however, the article does not say "next to" or anything similar, as it does in other places in the text). In addition, W.L. Moore and the McCleerlys, who sold the claims under mortgage to Wah Shay Hong Company, were the owners of the Union Company, and it is possible that Wah Shay Hong defaulted on the mortgage. However, the only references that I could find place the Union Company ground considerably further up the gulch. When W.L. Moore sold a 1/4 interest in the company to H.B. McCleery in 1872, the Union Company ground was described as "commencing at lower line of no. 57 above discovery (Siberia), and extending to head of gulch" (Deed Book
An 1879 transaction between H.B. McCleery and Brandt Tace describes the Union Company ground as "Lot 44". I can find nothing in the mineral survey plats or other records that depict where Lot 44 lay. However, it seems reasonable to assume that it was situated upstream of Lot 43, the location of which is known from a survey plat (Mineral Entry 4955). This would place the ground at the head of the gulch, which is consistent with the description in Deed Book I. Later transactions do not specifically state which claims are owned by the company.

An 1882 copy of a decree related to the estate of Hugh McCleery states only that the Union Company ground measured 2,900 feet along the gulch (Miscellaneous Records H:683).

It is possible that Moore and the McCleerys re-acquired the ground at the lower end of Lot 42 through an unrecorded transaction or agreement with the Wah Shay Hong Company or another group sometime before the summer of 1876. The Butte Miner of September 12, 1876 relates that "the Chinamen at work on the Union Company's ground in German Gulch have ceased operations and state they will throw up the contract made with owners."

Wah Hing/Sin Faun, Tua Goen

George Beal appears to have owned the 1/3 interest in claims 11-15 which were not sold to Wah Shay Hong Company.
In 1875 he sold his interest in the claims to Wah Hing, as part of a large, multi-claim transaction—see below (Deed Book J:562). In September of the next year, he repurchased all of the claims and sold them the next day to Thomas B. Gardner (Deed Book K:593). In July 1877, Sin Faun and Tua Goen purchased the 1/3 interest in claims 11-15 from Gardner for the amount of $200. The terms of the mortgage stipulated that they pay $100 by July 1, 1878 and the remainder by August 1, 1878 (Mortgage Book D:557).

George Beal sold a number of claims to Wah Hing in November 1875 that apparently represents the largest purchase of placer ground made by Chinese, or possibly anyone else, in German Gulch. The claims, all above discovery in Siberia District, sold for $42,000. The property included a 1/3 interest in claims 11-15 and 28-32 (a total of 10), and all of claims 33-56 and 60-61 (a total of 26). The purchase also included a 1/3 interest in Greenland Ditch and a 4/9 interest in Siberia ditch. Also sold were an assortment of tools, a carpenter shop, and a blacksmith shop. There was no mortgage (Deed Book J:562). As noted above, Wah Shay Hong Co. and, later, Sin Faun and Tua Goen, owned 1/3 interests in claims 11-15.

In September of the following year Wah Hing sold the identical property back to Beal for $5,000. One wonders if Wah Hing was able to extract enough value from the claim in the short time he owned it to make the purchase
worthwhile. The day after, Beal sold the property to Thomas Gardner for only $2,000. The reason he did this is inexplicable, unless it was in consideration of some other factor, or was simply a miscalculation (Deed Book K:593).
Figure 8. Map of the northern portion of German Gulch, depicting the locations of patented lots, the general areas associated with Chinese individuals or companies, and the locations of Chinese-affiliated archaeological sites. The figure is based on the USGS 7.5 Minute topographic maps Opportunity (Provisional 1969) and Burnt Mountain (1961).
Figure 9. Map of the central portion of German Gulch, depicting the locations of patented lots, the general areas associated with Chinese individuals or companies, and the locations of Chinese-affiliated archaeological sites. The figure is based on the USGS 7.5 Minute topographic maps Opportunity (Provisional 1989) and Burnt Mountain (1961).
Figure 10. Map of the western portion of German Gulch, depicting the locations of patented lots, the general areas associated with Chinese individuals or companies, and the locations of Chinese-affiliated archaeological sites. The figure is based on the USGS 7.5 Minute topographic map *Burnt Mountain* (1961).
The Murder of Hing Lee

Merchant Hing Lee was murdered on the night of October 27, 1876. His body was discovered the next day by Harry Evans, who had come to deliver a load of chickens. He was believed to have had $5,000 in gold. The gold was taken along with 30 cases of opium, a watch, and some jewelry (BM October 31, 1876; New Northwest [Deer Lodge] [NN] November 3, 1876). A coroner's jury determined that his death was caused by:

...a blow with some instrument like the pole of a carpenter's hatchet just above the left temple, a dirk knife stab below the left nipple, and a severe cut above the abdomen, on the left side. The deed, it is thought, must have been committed by some person or persons intimately acquainted with deceased (BM October 31, 1876).

The account of the coroner's jury seems to indicate that more than one weapon was used— at least one for the blunt trauma and one for the cut and stab wounds— and it seems possible that more than one murderer was responsible.

In October 1877, Hing Lee's business partner Sam Fouk was arrested for the crime. It was rumored (apparently by the Euroamerican population in the area) that Sam Fouk was falsely implicated by other Chinese because of jealousy over "a $1,200 wife" (BM October 30, 1877). However, an alibi was established and he was subsequently released (BM December 18, 1877). Another Chinese man was arrested, bailed out by his "associates", and subsequently
disappeared. The bail, which amounted to $5,000, was forfeited, but was subsequently returned since "...they had produced their man and were not responsible afterwards." This man "belonged to" and was a "partner" in, the Quong Wa Hong Company (Edwards 1908). As discussed above, the Quong Wa Hong Company mined a placer claim adjacent to ground mined by the Bo Hing Hong Company, in which Hing Lee owned an interest (Deer Lodge County Deed Books).

An item in the Deer Lodge newspaper New Northwest written by H.B. McCleery (November 3, 1876), a mine owner in the area, contains additional information which provides several clues, not only regarding the circumstances of Hing Lee's death, but also regarding details of his life and his relationship with the other Chinese. I shall quote at length:

Sometime during last night, or early this morning, some blood-thirsty villain or villains murdered Hing Lee, the Chinese merchant of this place- a straightforward business person respected and trusted by everybody....After closing his store, he, like all Chinamen who can do so, was accustomed to spending considerable time smoking his opium pipe, and the store remained closed until late the next day unless some customer needed something from the store. Today, the 28th, the place remained closed until nearly 1 o'clock p.m., when Harry Evans came to deliver some chickens. The house not being open he made considerable noise when some Chinamen came from an adjoining mining claim, in which deceased had an interest, and opened the store. Seeing no one around they commenced search and found him in his opium room curled up on his bed. The Chinamen said 'he sleep.'....Hing Lee was the wealthiest Chinaman in the upper country. He was believed to
have had some $5,000 gold in his cabin, and was
preparing to return to China-only awaiting the
arrival of a friend 'Sam' who was expected in a few
days to depart for the Flowery Kingdom. He was
somewhat peculiar in his habits; not fraternizing
with other Chinamen nor allowing them to loaf around
his cabin. It is generally believed he was murdered
by Chinamen, a supposition sustained by the use of a
knife to despatch him after he had been stunned by a
blow on the head. If this is so, it will be
difficult to ascertain or convict the perpetrators
unless fortuituous circumstances shall lead
unmistakably to that end (McCleery 1876).

"Sam" may have been Gee Sam, who is mentioned along with
Hing Lee in real estate transactions in German Gulch (see
below in the discussion of Chinese claim ownership).

Edwards' and McCleery's accounts (however much they
may be biased) provide several clues to social
organization in German Gulch. Hing Lee was evidently a
man of some importance- "the wealthiest Chinaman in the
upper country" (McCleery 1876). He acted as "interpreter
and agent" for a group organized along regional lines
(Edwards 1908). He spent considerable time smoking opium
"like all Chinamen who can do so"- implying that there
were those who could not afford the luxury (McCleery
1876). He carried on trade with local ranchers, who
supplied the store with chickens, and probably other
livestock and goods (Edwards 1908). He was apparently
well-liked and respected by the whites in the area
(McCleery 1876; Edwards 1908). However, he was "peculiar"
in his habits, not generally socializing with the other Chinese (McCleery 1876).

It is evident that McCleery and Edwards strongly suspect that Hing Lee was murdered by other Chinese. The Chinese in McCleery's account seem strangely indifferent to Hing Lee's welfare. It may be significant that a visiting Euroamerican discovered his body. Both Hing Lee's business partner, Sam Fouk, and an employee or partner in the Quong Wa Hong Company were accused of his murder. Sam Fouk was cleared, but the other man was not. The fact that he skipped bail suggests that he may have been guilty, but this must remain in the realm of speculation.

Unfortunately, all attempts to obtain legal documents relating to Hing Lee's murder have not been successful. The murder occurred in what at the time was Deer Lodge county, now Silver Bow county (after 1881). However, Deer Lodge, which was the county seat at the time, was where the trial of Sam Fouk took place. Deer Lodge is now the seat of Powell County. Inquiries were made at the Clerk of Court offices of Deer Lodge, Silver Bow and Powell counties, the archives of the Montana Historical Society, and the Butte Archives, which holds many of the early Silver Bow county records. Deer Lodge county shows no record of the proceedings, and Silver Bow county court records do not extend back to 1877. Powell County also
has no records of the proceedings- all Deer Lodge county court documents have long since been sent to Anaconda, the current Deer Lodge county seat. The Montana Historical Society archives only hold records on Supreme Court cases. It seems likely that the court records in the case have been lost.

According to Edwards (1908), a hatchet was left near Hing Lee's body. This *modus operandus*- using a hatchet and leaving it near the body- has all the hallmarks of a vendetta-style assassination typically carried out by Chinese fighting men. This form of "calling card" led to the American nickname of "Hatchet Men" for Chinese assassins (Armentrout-Ma 1983), and was apparently meant as a warning to others to stay in line- or else. Available contemporary accounts do not mention the hatchet, except in connection with the "pole of a carpenter's hatchet" mentioned in the account of the coroner's jury. Edwards wrote his account over 30 years after the murder, and it is possible that certain details were confused or forgotten. (For instance, Edwards was wrong by two years on the date of the murder, writing that it occurred in 1878.)

If the man from the Quong Wa Hong Company committed the deed, it would seem to suggest the possibility of a rivalry or dispute between the Quong Wa Hong and the Bo Hing Hong Companies, the latter partially owned by Hing
Lee. A certain Quong Hing Foo Kee had set himself up as a merchant by the Spring of 1877. This person could be Ah Quong, "the contractor" mentioned in an 1881 newspaper article (Intermountain Freeman [IF] May 8, 1881). Ah Quong was also probably associated with the Quong Wa Hong Company, perhaps its principle owner. It is even possible that one of the companies was composed of Sam Yup people while the other was composed of Sze Yap people. However, these possibilities, while intriguing, remain unconfirmed.
CHAPTER 9. ARCHAEOLOGICAL INVESTIGATIONS AT CHINESE-AFFILIATED SITES IN GERMAN GULCH

Cultural resource investigations in German Gulch date back to 1981, when the Beal Mining Company began explorations in German Gulch. The company contracted with the Mineral Research Center of Butte, Montana to conduct cultural resource investigations (Steere 1982). In 1983, Beal Mining Company was purchased by the Montoro Gold Company. Montoro enlarged the scope of mine development and contracted for additional cultural resource investigations by GCM Services of Butte, Montana. Fredlund and Anderson (1984) inventoried and proposed boundaries for the German Gulch Historic District (24SB212). The 1984 study identified 30 sites with historic features and artifacts. These were denominated "Localities" within the historic district. The localities are centered on a variety of cultural features including stone building foundations, placer workings, logging sites and the remains of mining-related structures. Later, supplementary cultural resource investigations along proposed haul road and powerline corridors were conducted (Herbort 1984; 1988). These endeavors recorded additional localities within the historic district, and led to amendments in the district boundaries. Subsequent work
was undertaken in 1988 and 1989 to mitigate the effects of proposed construction along an existing forest road. The improved road was needed to accommodate large haul trucks (Fredlund et al 1991). The cultural resource work in the 1980s documented five localities with definite Chinese associations.

The 1988 and 1989 work involved large-scale excavation at one site (Locality 48), along with small-scale excavations and recording at Localities 9, 18, 19, 21 and 30 (Fredlund et al 1991). Localities 30 and 48 had earlier been identified as extensive sites with Chinese-affiliated artifacts. Locality 48 was surmised to represent part of Lower Town (Herbort 1988:110). Locality 30 was denominated "Chinatown", probably as a result of information obtained from local informants (Fredlund and Anderson 1984:35). Locality 9 included two log structures (Fredlund and Anderson 1984:18) and a large section of pipe (Fredlund et al 1991:68). One of the features resembled a log structure depicted in the Montana Standard (August 20, 1953) captioned "Nissler Brewery". The 1988 testing program failed to substantiate that the feature was a brewery, but instead recovered Chinese ceramics (Fredlund et al 1991:69). Locality 18, which is adjacent to Locality 30 ("Chinatown") includes the deteriorated remains of a log cabin as well as one additional feature thought to represent a former building location. Locality
19 included the remains of a rather elaborate log building in association with Chinese artifacts (Fredlund and Anderson 1984). Locality 21 included a "log and stone walled cabin" (Fredlund et al 1991:80) with an apparent fireplace. Because of the "construction and shape of the stone foundation", the locality was thought to have a possible Chinese association (Fredlund and Anderson 1984:29). However, the testing program in 1988 failed to recover any Chinese artifacts (Fredlund et al 1991:80.)

The 2000 fieldwork for this thesis, which took place primarily at Locality 30, was initiated after permission was granted by Pegasus Gold Corporation, the owner of the claim which encompasses Locality 30.

**Locality 48**

Fredlund et al (1991:98), following Herbort (1988), surmise that Locality 48 was part of Lower Town "with the major settlement 100 yards further downstream at the junction of German Gulch with Beefstraight and Norton Creeks." This statement is somewhat inexplicable since the confluence of the three creeks is some 900 meters downstream from the site. In fact, the location of Lower Town presents somewhat of a puzzle. A wide flat area on the west bank of German Gulch creek which begins about 600 meters downstream from Locality 48 would seem to be a logical location for a settlement. However, relatively
few cultural remains have been found in this area. A local informant related that this area was known as "Circus Flat" because a travelling circus set up their show there (Local Informant August 2000). W.R.M. Edwards (1908) relates that Lower Town was "near the three forks", and that by 1908 the structures at the town "had long since been torn down". A very likely possibility is that many of the structures were torn down in order to placer mine the ground beneath them. It is perhaps significant that Edwards describes Lower Town as "near" the three forks, rather than "at" the forks. Edwards (1908) further states that the original discovery of gold in the gulch was made 1,200 yards above the confluence of the three streams. Perhaps coincidentally, this would place Locality 48 in the vicinity of the discovery point. Fredlund et al (1991:5), in a map figure, draw a wide circle around the stream confluence which they identify as Lower Town. Lower Town may have included fairly widely scattered loci of settlement, and it seems probable that Locality 48 formed at least a considerable portion of the town.

It seems probable that the site was originally inhabited by EuroAmericans in the 1860s, with the Chinese moving in after ca. 1870. The Fouey Jee Sung Company was mining in the area which includes a portion of Locality 48 after 1871. The Ah Chung Company and Ah On mined a short
distance up the gulch (within Lot 37) in the 1870s. Other Chinese companies mined the area in the Old Frederick district, a relatively short distance down the gulch from the site. See Figure 9 in Chapter 8 above, which depicts the location of Locality 48 in relation to the locations of patented lots and the general areas associated with Chinese individuals and companies. As further discussed in the discussion and conclusions chapter in this thesis, it is possible that the remains of a Chinese store at Locality 48 are associated with a household of nine people headed by a merchant who lived in the area in 1900 (12th U.S. Census 1900).

In 1988, 64 square meters of site area was excavated. This occurred mostly in an area of proposed road construction in the central portion of the site. An additional 14.5 square meters was excavated in 1989. Twenty-eight (28) features were recorded, 12 of which underwent excavation or testing. The features represented at least 20 house sites and four wells and/or privies. See Figure 11 below, a sketch map of Locality 48.

During a tour of Locality 48 in June 2000, it became apparent that little remained of the site. Road construction had either destroyed or covered over much of it since the 1980s fieldwork. Only a few levelled areas in the upper (southern) portion of the site were extant. The area was surveyed in October 2000 with a metal
detector in an effort to determine if the site boundary extended beyond what was documented in the 1980s. High metallic concentrations were apparent in the vicinity of the remaining levelled areas, but nothing was found which would expand the known site perimeter.

Locality 48 is on the south bank of German Gulch. Fredlund et al (1991:98) state that the site occupied "a small flat terrace" as well as adjacent slopes. In 2000, nothing could be seen of the small terrace area, and it appears that the improved road has covered it. Most of the site is located on a fairly steep slope. A small stream flows along the western boundary of the locality. At least two old roads passed through the site along with the Forest Service road which was later improved. A faint trail (perhaps a game trail) runs up a small drainage which encompasses most of the site, extending upslope (southwest) of the site.

There were 20 features at the site thought to represent dwellings (Fredlund et al 1991:98). However, two of the features may in fact represent one large dwelling (see below). The size of the depressions or levelled areas marking these features ranged between 6 square meters (20 square ft.) and 36 square meters (118 square ft.) with a mean area of about 21 square meters (69 square ft.). Twelve (12) of these features had areas above the mean. Two features (Features 22 and 23) stood
well above the mean at 36 square meters (118 square ft.). Two features (Features 14 and 17) had areas of only 6 square meters (20 square ft.) and one (Feature 7) had an area of only 8 square meters (26 square feet).

Features 5 and 6- Chinese Business Establishment

There is evidence that two levelled areas, Features 5 and 6, may represent a single large, substantial building. Excavations revealed that the two features were joined by a large plank (Fredlund et al 1991:98-101). A plank running at a right angle to the joining plank appears to represent merely a partition within what was probably a single building measuring roughly 5 x 12 m (16 x 39 square ft.) for an area of 50 square meters (164 square ft.). This would make it the largest building-related feature documented at the site.

The planks at Features 5 and 6 (Figure 12) were deteriorated but probably measured 4 x 12 in. In the southwest corner of Feature 6 were the remains of apparently smaller planks which probably represent a floor. The outline of the exterior planks reveals a rectangular structure with at least one partition which separates Features 5 and 6. The intersection of planks in the northwest corner of Feature 6 was supported by a large stream cobble. This would have helped to level the building against the slope of the hillside.
Figure 12. Map of the area encompassing Features 5 and 6 from Fredlund et al (1991), showing the layout of the timbers and stones, and the 1988 and 1989 excavation units. Reprinted with permission.
The assemblage of artifacts recovered from excavation units in the area of Feature 5 and 6 strongly suggests that the structure was a Chinese business establishment. Several types of activity are indicated, including gambling, opium smoking, food preparation, record-keeping, and commercial transactions. In addition, the great number of rifle and shotgun cartridges found within and adjacent to the features indicates the firing of a number of types of firearms.

A partial list of artifacts recovered from Features 5 and 6 would include Chinese and U.S. coins, ink bottles, opium cans, opium pipe and lamp parts, Chinese ceramic liquor bottle glass along with a variety of Euroamerican liquor bottle glass, scale parts, abacus parts, two padlock keys, a door key, a variety of ceramics including Four Seasons, Celadon, and Sweet Pea ware in addition to European ceramics, gaming pieces, and a small wok. In addition were found more mundane items such as square nails, horseshoe nails, rubber boot parts, rubberized canvas, food jar fragments, toothbrush and toothpaste jar, a fishhook, handgun and rifle cartridges, shotgun shells, and handgun slugs. The possible presence of children is indicated by a rubber ball (Fredlund et al 1991:Volume II, Appendix B, Locality 48 excavation notes 1989).

Coins were recovered from both of the features—three from Feature 5 and one from Feature 6. The coins included
an 1888 "Sitting Liberty" quarter, an "Indian Head" penny, and two Chinese coins. Curiously, the penny was perforated by a 79 mm hole in the center, possibly by a .30 caliber bullet. Its date could therefore not be determined. Both of the Chinese coins were recovered from Feature 5. The various Chinese coins are not differentiated by provenience in the artifact descriptions in the 1991 report (that is, one cannot match up a particular coin with a particular provenience). However, a total of three, all from Locality 48, were recovered. Besides the two recovered from Feature 5, one was recovered from Feature 28. One of these coins was too fragmented for analysis. One dates from the reign of K'ang Xi (1662-1722) and was issued by the Beijing mint. The other was issued during the reign of Qian Long from Kunming in Yunnan province. The coins measured between 19 and 25.5 mm in diameter (Fredlund et al 1991:162, Vol. II, Appendix B). The mixture of coins is similar to what was encountered in the Yreka, California Chinatown, where Chinese coins were found in association with low denomination U.S., Annamese and Hong Kong coins (Farris 1979:51). Farris (1979:51, referencing Kleeb 1976), suggests that a mixture of Chinese and U.S. coins might indicate that the coins were used as media of exchange.

In the southeast portion of Feature 6 was a 60 x 125 cm artifact concentration (denominated Feature 6-1). From
this concentration was recovered the toothbrush and toothpaste jar, four buttons from jean trousers, two Prosser buttons, the fish hook, the ink bottle fragments, fragments from three liquor bottles, fragments from two food jars, a large concentration of glass fragments from bitters bottles, a small medicine vial, thin clear glass (probably from a lamp chimney), and fragments from three wine or ale bottles.

Floral remains recovered from the vicinity of Features 5 and 6 include a coconut shell and peach pits (Fredlund et al 1991:Volume II, Appendix B). Faunal remains from the area of Feature 5 include three bone fragments from a cow, a deer, and a pig. More of a variety of faunal remains was recovered from Feature 6, including bones from unidentified mammal and large mammal, pig, cow, hare, rodent, unidentified bird, chicken, hawk, duck, and blue grouse.

A great number of handgun and rifle cartridges and shotgun shells were found within, adjacent and between Features 5 and 6. At least 81 cartridges or shotgun shells and two handgun slugs were found inside or within about three meters of the features (an area measuring about 10 x 15 meters). A .32 caliber slug was found in unit 3S9W, between Features 6 and 7, and a .45 caliber slug was found in unit ON10W, in the southeastern corner of Feature 6. Most of the cartridges, shotgun shells and
slugs appear to have been recovered at depths below 10 cm (Locality 48 excavation notes 1988-1989; Ferguson 1990). See also the general discussion below on the cartridges found at Locality 48.

**Feature 28- Dump**

Immediately southwest of Feature 6 was a six meter diameter dump area. Modern construction along the Forest Service road had apparently removed part of the dump prior to the 1980s fieldwork. The trash midden measured between about 10 and 25 cm thick and began just below the surface. Sixteen (16) square meters were excavated in the dump in 1989 (Fredlund et al 1991:104). The assemblage of artifacts and faunal remains recovered from these units provides further evidence for a commercial function for Features 5 and 6, and also indicates that a far-flung network of trade extended to German Gulch. Interestingly, Feature 28 also included a few apparently prehistoric artifacts, including seven flakes, two projectile point fragments, two split cobbles and one hammerstone. This could represent a small portion of a larger site that was destroyed by historic mining activity. An alternate possibility is that the Chinese or others collected the artifacts from the vicinity and deposited them in the dump.
A partial list of recovered artifacts would include a wok handle, chopstick cap, a penny weight, opium pipe parts, opium can fragments, metal wick holders, a fragmented Chinese coin, Chinese olive pits, rubberized canvas fragments, rubber boots, bucket fragments, a metal box fragment, a wire handle, a ladle handle, horseshoe nails, parts of a suitcase, a tobacco can top, food cans, both square and wire nails, bolts, a triangle file fragment, tool head wedges, a fan-tan game piece, wine bottle fragments, bitters and beer bottle fragments, lamp chimney glass, brass, porcelain and metal-post buttons, "Chinese" ball buttons, food jar fragments and lids, a Four Seasons spoon fragment, Celadon ware (wine cups, teacups and serving bowl fragments), European of Euroamerican ceramics, liquor bottle fragments, flat (window?) glass, and handgun, rifle and shotgun cartridges as well as slugs (Fredlund et al 1991:104, Locality 48 excavation notes; Ferguson 1990, 2001).

Forty-eight (48) cartridges and shotgun shells and one round of buckshot were recovered from the excavation units at Feature 28. Most appear to have been at least 10 cm below the surface, extending to 30 cm below the surface (Locality 48 excavation notes 1989; Ferguson 1990).

An extensive collection of faunal remains was recovered from Feature 28. A large number of fragments could be identified, including bones from a variety of
mammals, birds and fish. Mammals represented in the assemblage include: pig, hare, marmot, cattle, cat, ground squirrel, lynx, beaver, red squirrel, weasel, coyote, and mice. Identified bird remains include: chicken, grouse, duck, goose, ptarmigan, hawk, Clark’s nutcracker, loon, and 2 egg shell fragments. Fish remains include: flatfish, rockfish, herring, jackfish, perch, puffer, sheepshead, rockfish, flounder, croaker, Salmonid, and drum. Most of the fish species are from ocean environments, some from Asian waters (Fredlund et al. 1991: 104,182). The fish remains provide perhaps the best evidence that a far-flung trading network extended to German Gulch. Some of the remains from locally-available fauna lacked evidence of butchering, indicating that their presence in the dump may be fortuitous. Notable examples include the Clark’s Nutcracker, loon, hawk, ground and red squirrels, marmot, lynx, and weasel. Most of the other species were either non-native and obviously imported or exhibited butchering marks (Fredlund et al. 1991: 179-201).

Feature 23- Opium Pipe Mender’s Shop and/or Dwelling

Feature 23 was a levelled area measuring about four by nine meters (12 x 31 ft.). At 36 square meters (118 square ft.), it is one of the larger features at the site. A total of five square meters were excavated in the feature in 1988 and 1989. The excavations revealed a
small (about 1 x 1.5 m), but thick midden of artifacts toward the northwest corner of the feature. The midden was designated as Feature 23-1. Recovered from the excavation units (or found on the surface within the feature?) was a variety of artifacts including fragments of flat (window?) glass, parts of five beer or ale bottles, a blue perfume bottle, three beer bottles, three bitters bottles, three square nails, one wire nail, stove parts, fragments of a cooking pot, a 7 in. triangle file, parts of 10 opium cans, ten opium pipe bowl connectors, a decorative brass strip from a trunk, small gears from a clock, rubberized canvas, rubber boots, cloth, clothing rivets, 23 glass and porcelain buttons, a felt strip, shouldered food jars, food crocks, cans, "metal boxes", four door knobs, a trigger or hammer part from a firearm of unknown make. Nine of the opium pipe bowl connectors were found inside an opium can. (Fredlund et al 1991:103,173 Vol. II, Appendix B).

Weapon-Related Artifacts at Locality 48

A total of 132 firearm cartridges and 4 slugs were recovered from Locality 48. The cartridges and slugs were found within or near Features 5 and 6 (the Chinese business establishment), Feature 28 (the trash midden), and Features 2, 3 and 16. Feature 2 is a small depression thought to have been created by bottle hunters. Feature 3
is a four meter square levelled area. Feature 16 is a levelled area with a probable modern hearth and artifacts. The vast majority of the cartridges and slugs (98%) were recovered from Features 5, 6 and 28 (Ferguson 1990). These features are close together, and it is readily apparent that most of the cartridges at the site came from a fairly small area measuring about 20 meters long by 10 meters wide (about 160 square meters). Only two .22 shells were found at Feature 16, and these are probably modern. Features 2 and 3 combined yielded three rifle cartridges and a handgun slug. In addition to the cartridges and slugs was the hammer or trigger part found at Feature 23 (the opium pipe mender's shop and/or dwelling) (Fredlund et al 1991). See Table 2, a list of the cartridges and slugs recovered from Locality 48.
Table 2. List of cartridges recovered from Locality 48. The table is revised from Ferguson (1990), an unpublished artifact analysis table.

### Feature 28-Handgun Cartridges

<table>
<thead>
<tr>
<th>Description</th>
<th>Headstamp or brand</th>
<th>Unit</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>.41 short rimfire case</td>
<td>no head stamp</td>
<td>2S 16W</td>
<td>used with derringer-type handguns</td>
</tr>
<tr>
<td>.45 Smith and Wesson</td>
<td>U.M.C. Co.</td>
<td>1S 19W</td>
<td>obsolete black powder cartridge</td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC</td>
<td>1S 19W</td>
<td></td>
</tr>
<tr>
<td>.45 Smith and Wesson</td>
<td>UMC</td>
<td>1S 19W</td>
<td>see above</td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>no head stamp</td>
<td>1S 19W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC</td>
<td>0N 17W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>.38 short (rimfire)</td>
<td>H</td>
<td>0N 19W</td>
<td>manufactured ca. 1865-1940</td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC Co.</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>.50 Remington Navy</td>
<td>U</td>
<td>0N 19W</td>
<td>manufactured to ca. World War I</td>
</tr>
<tr>
<td>.45 Smith and Wesson</td>
<td>UMC</td>
<td>0N 19W</td>
<td>obsolete black powder cartridge</td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC</td>
<td>0N 20W</td>
<td></td>
</tr>
<tr>
<td>.38 short (rimfire)</td>
<td>H</td>
<td>0N 20W</td>
<td>manufactured ca. 1865-1940</td>
</tr>
<tr>
<td>.38 short (rimfire)</td>
<td>no head stamp</td>
<td>1N 18W</td>
<td>firing pin struck twice in almost same position, suggests this shell was never ejected after first shot.</td>
</tr>
<tr>
<td>.50 Remington Navy</td>
<td>U</td>
<td>1N 18W</td>
<td>manufactured to ca. World War I</td>
</tr>
<tr>
<td>.32 extra short rimfire</td>
<td>H</td>
<td>1N 19W</td>
<td>used in &quot;palm pistols&quot; ca. 1871-1920</td>
</tr>
<tr>
<td>.38 Smith &amp; Wesson</td>
<td>UMC</td>
<td>1N 19W</td>
<td></td>
</tr>
<tr>
<td>.38 short rimfire</td>
<td>H</td>
<td>1N 19W</td>
<td>manufactured ca. 1865-1940</td>
</tr>
</tbody>
</table>

### Feature 28-Shotgun shells and shot

<table>
<thead>
<tr>
<th>Description</th>
<th>Headstamp or brand</th>
<th>Unit</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>10 gauge base</td>
<td>Peters Cartridge Co.</td>
<td>5S 20W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>headstamp corroded</td>
<td>5S 20W</td>
<td></td>
</tr>
<tr>
<td>section of shot shell base (rim)</td>
<td>no marking</td>
<td>5S 20W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base fragment</td>
<td>head stamp corroded</td>
<td>5S 20W</td>
<td></td>
</tr>
<tr>
<td>12 gauge base</td>
<td>head stamp corroded</td>
<td>5S 20W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>head stamp corroded</td>
<td>5S 20W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>&quot;new club&quot; UMC</td>
<td>1S 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>P.C. Co.</td>
<td>1S 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>WRA Co. &quot;Rival&quot;</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>P.C. Co. &quot;Prize&quot;</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>W.R.A. Co. &quot;Rival&quot;</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co. &quot;New Club&quot;</td>
<td>0N 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester &quot;Leader&quot;</td>
<td>1N 15W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co. New Club</td>
<td>1N 19W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co. New Club</td>
<td>1N 19W</td>
<td></td>
</tr>
<tr>
<td>00 buckshot (.33 caliber)</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Feature 28- Rifle Cartridge

<table>
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<tr>
<th>Description</th>
<th>Headstamp or brand</th>
<th>Unit</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>.45-70</td>
<td>UMC</td>
<td>0N 19W</td>
<td></td>
</tr>
</tbody>
</table>
### Feature 28- Rifle/Handgun Cartridges

<table>
<thead>
<tr>
<th>Description</th>
<th>Headstamp or brand</th>
<th>Unit</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>.22 long rifle</td>
<td>&quot;Super X&quot; (Winchester)</td>
<td>2S 16W</td>
<td>modern</td>
</tr>
<tr>
<td>.25-20 W.C.F.</td>
<td>WRA</td>
<td>1S 11W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>&quot;Super X&quot; (Winchester)</td>
<td>1S 19W</td>
<td>modern</td>
</tr>
<tr>
<td>.22 short</td>
<td>U.</td>
<td>1S 19W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>H.S. corroded</td>
<td>ON 16W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>badly corroded case</td>
<td>ON 16W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>U.</td>
<td>ON 17W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>U.</td>
<td>ON 18W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>&quot;Super X&quot; (Winchester)</td>
<td>ON 19W</td>
<td>modern</td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>U.</td>
<td>ON 19W</td>
<td></td>
</tr>
<tr>
<td>.22 short</td>
<td>U</td>
<td>ON 20W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>U</td>
<td>1N 18W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td></td>
<td>1N 19W</td>
<td></td>
</tr>
</tbody>
</table>

### Features 5 and 6-Handgun Cartridges/Slugs

<table>
<thead>
<tr>
<th>Description</th>
<th>Headstamp or brand</th>
<th>Unit</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>.32 caliber slug (probably)</td>
<td></td>
<td>3S 9W</td>
<td>badly deformed</td>
</tr>
<tr>
<td>.45 caliber slug</td>
<td></td>
<td>0N 10W</td>
<td>too heavy for .45 Smith and Wesson</td>
</tr>
<tr>
<td></td>
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<td>probably .45-70 or similar rifle cartridge</td>
</tr>
<tr>
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<td>2N 8W</td>
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</tr>
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<td>UMC</td>
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<td>UMC</td>
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<td>UMC</td>
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<td>UMC</td>
<td>8N 5W</td>
<td></td>
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<tr>
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<td>UMC</td>
<td>8N 5W</td>
<td></td>
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<tr>
<td>.38 Smith and Wesson</td>
<td>UMC</td>
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<td>.38 Smith and Wesson</td>
<td>UMC</td>
<td>9N 7W</td>
<td></td>
</tr>
<tr>
<td>.38 short rim fire</td>
<td>H</td>
<td>9N 7W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith and Wesson</td>
<td>WRA Co</td>
<td>9N 7W</td>
<td></td>
</tr>
<tr>
<td>.38 short rim fire</td>
<td>H *</td>
<td>10N 5W</td>
<td>used with derringer-type handguns</td>
</tr>
<tr>
<td>.41 short rimfire</td>
<td>no headstamp</td>
<td>10N 5W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith and Wesson</td>
<td>UMC</td>
<td>10N 5W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith and Wesson</td>
<td>WRA Co</td>
<td>11N 5W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith and Wesson</td>
<td>WRA Co</td>
<td>11N 5W</td>
<td></td>
</tr>
<tr>
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<td>UMC</td>
<td>11N 5W</td>
<td></td>
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<tr>
<td>.38 Smith and Wesson</td>
<td>UMC</td>
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<td></td>
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<tr>
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<td>UMC</td>
<td>11N 9W</td>
<td></td>
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<tr>
<td>.38 Smith and Wesson</td>
<td>UMC</td>
<td>11N 9W</td>
<td></td>
</tr>
<tr>
<td>.38 Smith and Wesson</td>
<td>WRA Co</td>
<td>11N 13W</td>
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Table 2 (continued).
### Features 5 and 6 - Shotgun shells

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<th>Unit</th>
<th>Comments</th>
</tr>
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<tbody>
<tr>
<td>10 gauge base</td>
<td>UMC Co. Nitro Club</td>
<td>5N 8W</td>
<td></td>
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<tr>
<td>10 gauge base</td>
<td>UMC &quot;Nitro Club&quot;</td>
<td>5N 8W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co &quot;Nitro club&quot;</td>
<td>6N 7W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester Leader</td>
<td>6N 8W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co &quot;Nitro club&quot;</td>
<td>6N 8W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester Leader</td>
<td>6N 8W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMÇ Co. &quot;Nitro club&quot;</td>
<td>6N 9W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co. &quot;Nitro club&quot;</td>
<td>6N 9W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Co. &quot;Nitro club&quot;</td>
<td>6N 9W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester Leader</td>
<td>7N 9W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC &quot;Nitro club&quot;</td>
<td>7N 9W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester leader</td>
<td>7N 10W</td>
<td></td>
</tr>
<tr>
<td>12 gauge base</td>
<td>Winchester New Rival</td>
<td>8N 5W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester Leader</td>
<td>9N 5W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester Leader</td>
<td>10N 4W</td>
<td></td>
</tr>
<tr>
<td>12 gauge base</td>
<td>Winchester - New Rival</td>
<td>10N 4W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>Winchester Leader</td>
<td>10N 5W</td>
<td></td>
</tr>
<tr>
<td>12 gauge base</td>
<td>Winchester Leader</td>
<td>10N 5W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Black Club</td>
<td>10N 6W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Nitro Club</td>
<td>10N 6W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>P.C. Co Prize</td>
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<td></td>
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<tr>
<td>10 gauge base</td>
<td>UMC Co. Nitro Club</td>
<td>11N 5W</td>
<td></td>
</tr>
<tr>
<td>10 gauge base</td>
<td>UMC Nitro Club</td>
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### Features 5 and 6 - Rifle Cartridges

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<tr>
<td>.45-70</td>
<td>S H UMC</td>
<td>2N 10W</td>
<td></td>
</tr>
<tr>
<td>.40-60</td>
<td>UMC SH</td>
<td>6N 7W</td>
<td>unsure of head stamp</td>
</tr>
<tr>
<td>.40-60</td>
<td>S H UMC</td>
<td>6N 7W</td>
<td></td>
</tr>
<tr>
<td>.44 Henry center fire</td>
<td>no head stamp</td>
<td>6N 7W</td>
<td>introduced ca. 1873</td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>no headstamp</td>
<td>6N 9W</td>
<td></td>
</tr>
<tr>
<td>.45-70</td>
<td>SH UMC</td>
<td>8N 5W</td>
<td></td>
</tr>
<tr>
<td>.30 WCF</td>
<td>WRA Co</td>
<td>8N 9W</td>
<td>commonly known as .30-30 Winchester (Intro.1894)</td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>R B</td>
<td>10N 4W</td>
<td>unsure of head stamp</td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>WRA Co</td>
<td>10N 6W</td>
<td>no rifles available since 1930s</td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>UMC S H</td>
<td>10N 6W</td>
<td></td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>UMC</td>
<td>10N 6W</td>
<td></td>
</tr>
<tr>
<td>.40-60</td>
<td>UMC S H</td>
<td>10N 6W</td>
<td></td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>UMC</td>
<td>10N 9W</td>
<td>see above</td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>UMC S H</td>
<td>11N 4W</td>
<td></td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>UMC Co S H</td>
<td>11N 5W</td>
<td></td>
</tr>
<tr>
<td>.45-70 gov’t</td>
<td>base corroded</td>
<td>11N 5W</td>
<td></td>
</tr>
<tr>
<td>.40-60</td>
<td>UMC S H</td>
<td>11N 5W</td>
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Table 2 (continued).
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<tr>
<td>.25-20 WCF</td>
<td>WRA Co</td>
<td>3N 9W</td>
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</tr>
<tr>
<td>.22 WRF or Remington Special</td>
<td>U</td>
<td>4N 12W</td>
<td></td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>P</td>
<td>5N 8W</td>
<td></td>
</tr>
<tr>
<td>.22 short</td>
<td>H</td>
<td>5N 11W</td>
<td>loaded cartridge</td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>US</td>
<td>5N 10W</td>
<td>unsure of head stamp</td>
</tr>
<tr>
<td>.22 long rifle</td>
<td>U</td>
<td>6N 10W</td>
<td></td>
</tr>
<tr>
<td>25-20 Winchester center fire</td>
<td>WRA</td>
<td>6N 11W</td>
<td></td>
</tr>
<tr>
<td>.22 short</td>
<td>US</td>
<td>7N 9W</td>
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<th>Unit</th>
<th>Comments</th>
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<tr>
<td>.38 slug</td>
<td>unjacketed</td>
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<tr>
<td>.401 self-loading rifle</td>
<td>Rem-umc</td>
<td>Feature 3</td>
<td>SLR= self-loading rifle-</td>
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<tr>
<td>.22 long rifle</td>
<td>U</td>
<td>Feature 2-</td>
<td>Unit 1</td>
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<tr>
<td>.22 Winchester rimfire</td>
<td></td>
<td>Feature 2-</td>
<td>Unit 1</td>
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Table 2 (continued).
Handgun and shotgun cartridges together dominate the assemblage, combining for 67% of the site total. Rifle cartridges account for 15%, and cartridges for either rifles or handguns (mostly .22 shells) account for 18%. See Figure 13, a pie chart which graphically illustrates the above proportions.

Of the 81 cartridges and shotgun shells found within or adjacent to Features 5 and 6 (a 10 x 15 m area), 30 (37%) were designed for handguns, 17 (21%) were for rifles, 8 (9.8%) were for both handguns and rifles, and 26 (32%) were shotgun shells. The cartridges and shells from the area encompassing Features 5 and 6 accounts for 61% of the site total. Both of the slugs that were found came from handguns. Calibers/types found in this area include a probable .32 caliber slug, a .45 slug, 10 and 12 gauge shotgun shells, Smith and Wesson .38 cartridges, three other handgun cartridges (.38 and .41 shorts), a number of .45-70, .40-60, .44 Henry and .30-06 rifle cartridges, and eight small caliber (either .22 or .25-20) rifle or handgun rounds. Nearly all of the handgun cartridges (27 out of 30) were the .38 caliber Smith and Wesson type. Five .38 cartridges were recovered from a single excavation unit (11N5W) (Ferguson 1990).
Figure 13. Pie chart showing the proportions of different types of cartridges recovered from Locality 48.
Of the 48 cartridges recovered from the excavation units at Feature 28, 19 (40%) came from handgun rounds, one (2%) was designed for a rifle, 13 (27%) were designed for either rifles or handguns, and 15 (31%) were shotgun shells or parts. The cartridges and shotgun shells recovered from Feature 28 account for 36% of the site total. In addition, a round of 00 buckshot was recovered. Calibers/types recovered from Feature 28 include a variety of handgun rounds, including the rather rare .50 caliber Remington Navy, .38 short, and .41 short, along with a number of .38 and .45 caliber Smith and Wesson cartridges. Shotgun shells include 10 and 12 gauge sizes. One large-caliber rifle cartridge, a .45-70, was found, along with a number of small caliber rifle or handgun cartridges (.22 and .25-20 calibers) (Ferguson 1990).

Apparently all of the shotgun shells found in German Gulch were of the paper and brass type which was introduced ca. 1864 (Fredlund et al 1991:173). The .45-70 cartridge was introduced ca. 1873 and is still in use. The .50 caliber Remington Navy was introduced in 1865 and obsolete by the 1870s. However, the rounds were sold up until World War I. The .32 "Extra Short" rimfire cartridge was probably introduced ca. 1871, and was advertised in the Remington Company catalogue until about 1920. The round was designed for a rare Remington tubular magazine pistol, and also for a "palm pistol", the Chicago
Firearms Company's "Protector". The Remington pistol was manufactured from ca. 1871 to 1888, and the "Protector" was introduced sometime in the 1880s. The .50 Remington Navy was designed for the single shot, rolling block Remington Navy pistol introduced in 1865. Many of the handgun rounds were designed specifically for up-close self-defense, and would have been practically useless for hunting (Barnes 1972; Ferguson 2001). Barnes (1972:279) says that the .41 short "is so underpowered as to be worthless.... Nevertheless, it was a popular self-defense cartridge and at point-blank range could inflict a severe wound or kill a human being." Ferguson (2001) likens the probable effect to striking someone in the forehead with a hammer.

Probably most of the cartridges found at the site relate to target practice. The perforated penny suggests a high degree of competency (see also the newspaper account of the "Chinese Sharpshooter" below). However, handgun rounds designed specifically for self-defense tend to dominate the assemblage. This indicates a concern with self-defense even if the cartridges stem mainly from target shooting. In addition, some of the cartridges could have been introduced into the site deposits after the site was abandoned, but others can be dated to relatively short periods of time and are probably associated with the site's occupation. Depth proveniences
for many of the cartridges are lacking, but most appear to have been buried at least 10 cm below the surface, and were found in association with other artifacts and feature components that are obviously associated with the site's occupation period.

Based on dates of introduction and archaeological associations, most of the weapon-related artifacts appear to be associated with the period of Chinese occupation after ca. 1870. That at least some of the Chinese in German Gulch were proficient in firearms is confirmed from the following item in the Intermountain Freeman (Butte) of May 8, 1881 entitled "A Chinese Sharpshooter":

The other afternoon while a few of the Carson Guard were practicing...a Chinaman was observed to take great interest in the proceedings. Presently, one of the members jokingly asked him if he would like to try a shot....The heathen fired and scorer marked a bullseye, which had the effect of checking the hilarity somewhat....he fired four more shots and each was a bullseye....The man works for Ah Quong, the contractor [probably an owner of Quong Wah Hong Co. in German Gulch]....and is the same man who made ten successive bullseyes in Oak park about four years ago....He informed an Appeal reporter that he intended forming a Chinese team, as his countrymen liked the sport, and several, he said, could do as well as he (IF May 8, 1881).

Stapp (1990:359, quoting Goulder 1909:254-255) mentions an episode in Pierce, Idaho of escalating tension between the Euroamericans and Chinese. At one point the Chinese "gather(ed) in groups behind their cabins and (began) to practice at a mark with their revolvers....Others would
bring out their long knives... and begin to sharpen (the) blades." Practicing with firearms may have served a dual purpose—to hone individual skills and to communicate a warning to others.

**Localities 18 and 30**

Localities 18 and 30 are two of the five localities in the German Gulch Historic District with definite Chinese affiliations. The initial cultural resource investigations in the 1980s considered the two localities as separate entities. However, there is very little distance between the two localities, and it seems very likely that they are related. Both include Chinese artifacts, although the remains of the cabin at Locality 18 includes modifications or repairs that may post-date the main period of occupation at Locality 30 (i.e. the cabin remains include some wire nails). For the purposes of this discussion, the two localities will be considered as one site. Features at the site include the deteriorated remains of a log cabin, stone foundations, a variety of cairns, depression features, a ditch system, and levelled areas where structures of some kind (either buildings or tent platforms) once stood. The site also contains a wealth of late nineteenth century artifacts, many of Chinese affiliation (despite past looting). According to Fredlund and Anderson (1984:35), a local
informant had collected numerous artifacts from the locality over the years.

The site is situated on or near placer ground mined by Wah Shay Hong Company ca. 1871 to post-1875, by Wah Hing 1875-1876, and by Sin Faun and Tua Goen after ca. 1877. In addition, the ground of the Quong Wa Hong Company began about 300 meters downstream from the site. In June 1873, W.L. Moore, H.B. McCleery and W.S. McCleery sold a full or partial interest in several claims which appear to either encompass or lie very near to Locality 30. The ground included "six log cabins" (Real Estate Index; Deed Book E:281). See Figure 10 in Chapter 8, which depicts the location of Localities 18 and 30 in relation to the patented claims and general areas associated with Chinese individuals and companies.

Previous mitigation efforts at Locality 30 in 1988 and 1989 included test excavations at Feature 8 (a stone foundation), which was to be impacted by road construction, and testing and mapping of other selected features. Work at the features beyond the construction zone was done in order to determine function and ethnic affiliation which might aid in site interpretation. Twenty-three (23) features were recorded in 1988 and 1989 at the two localities. In 1989, 10 of the features at Locality 30 were tested. In October 2000, the site was surveyed with a metal detector in an attempt to locate
subsurface metal concentrations. Small-scale testing was then conducted in selected areas of high resistivity readings. These efforts were part of an attempt to more thoroughly define the function and extent of certain features at the site. Four of the features were tested.

The nomenclature and system of feature numbering used here follows the original 1980s fieldwork. In particular, a series of levelled areas at the site were denominated "terraces" during the earlier fieldwork. The apparent reason for this was that the edges of the various levelled areas were rather indistinct, and it was not thought proper to label them as distinctive features (Fredlund et al 1991-Appendix E). A secondary reason was that it apparently was thought possible (prior to the 1989 fieldwork) that the terraces were small gardens (Fredlund et al 1991:208), such as were found in Idaho (Fee 1993 [1986]). This may have led to the "terrace" designations.

In fact, during the current fieldwork, only one distinct boundary, separating two vaguely depressed and levelled areas, could be discerned. This may be due to poorer conditions of visibility in October 2000, or due to the fact that portions of the "terraces" have been destroyed or buried by road construction. See the feature descriptions below. All feature numbers used here are the same as those used in the earlier investigations.
The site is located on the north side of German Gulch creek. It is situated on the first terrace above the placer gravels, on an east-projecting bench lobe to the west of the terrace, and on slopeland adjacent to the terrace. The bench lobe stands approximately 20 feet above the terrace, and about 40 feet above the stream bed. The site occupies one of the few extant "level" areas in the gulch.

An old abandoned road and an upgraded road pass through the site area. The abandoned road diverges from the current modern road bed toward the east end of the site, rejoining the modern road bed at the west end. Upgrades to the modern road bed after 1989 have destroyed or covered up at least one feature, a stone foundation which was recorded and tested in 1989 prior to construction. At least one other feature appears to have been destroyed as a result of archaeological excavations in 1989. These features are depicted on the sketch map (Figure 14) accompanying this discussion, although no trace of them was found during the October 2000 fieldwork. The sketch map included herein is based on the original sketch map but also incorporates information collected during the fieldwork portion of the current investigation.

Of the 23 features recorded at the site (including Localities 30 and 18), at least seven (7) may represent former buildings, such as cabins. These include Features
Figure 14. Sketch map of Localities 18 and 30. The figure incorporates information from Fredlund et al (1991) and information from the current fieldwork. Parts or all of the features along the modern road are either buried or destroyed.
2, 8, 12, 16, 17 at Locality 30 and Structures A and B at Locality 18. The "terrace" features could also represent building locations. However, based on the metal detector survey and subsurface test data, it seems more likely that the terraces were the site of tent platforms. The seven features thought to represent possible building locations occupy between 15 and 98 square meters (49 and 322 square ft.), with a mean area of 38 square meters (125 square ft.). Only two features (8 and 16) have areas above the mean. Structure A, the only feature with some architectural elements still intact, has an area of about 28 square meters (92 square ft.).

The top of the bench lobe and the terrace are relatively level. The sloped portion of the site includes the two features at Locality 18. The site has a southern exposure, but is bordered to the north and south by high ridges which prevent the site from receiving direct sunlight throughout a varying portion of the day, depending on the season. In October 2000, it was noon or later before the majority of the site area received any direct solar exposure. The eastern portion of the site, on the terrace and slope, is relatively open while the upper area on the bench lobe includes more tree growth. However, the trees on the site are relatively small, and it is likely that the site area was more open at the time of occupation. The site and surrounding area is covered
with aspen, lodgepole, sagebrush, skunkbrush sumac, other shrubs, grasses and willows (in the floodplain of the creek). The lower area on the terrace is thickly covered with grasses. The portion on the bench lobe has shorter grasses with a fairly thick layer of duff and pine needles. The soils consist of sandy to gravelly loam with a relatively heavy sod cover. On the bench lobe, the soil appears to grade into weathering bedrock at shallow depth.

An informal tour of the site taken in June 2000 revealed that the site was substantially as originally recorded, except for the disturbances noted above from the earlier investigations and from road construction. See also below in the feature descriptions. The original site datum was easily found, however a datum station ("Datum 2") could not be found during the tour or during subsequent field work in October 2000. A temporary station (Station 1) was set up for mapping purposes at a vehicle pullout. The following is a summary of investigations undertaken in the 1980s and in October 2000 at the site. The summary includes a discussion of methods and techniques used during the 2000 fieldwork, a description of the artifacts and features at the site, and the results of testing during both the 1980s and 2000 fieldwork episodes.
The 2000 Metal Detector Survey

The metal detector survey was undertaken in an attempt to locate concentrations of metal objects that may be located subsurficially or merely obscured by duff and vegetation. Select areas of high readings could then be subsurface tested. The limited-scope 1980s investigations achieved inconclusive results regarding the function of some of the features at the site. For example, the function of Feature 1 was described as "unknown", and it was unclear whether Feature 2, which appeared to represent a portion of a rather substantial stone foundation, even represented a finished building. Fredlund et al (1991:87) state "...the structure probably was never completed." By locating subsurface metal objects, nails for example, it was thought that questions related to the functions and dates of features at the site could be answered. It was also surmised that the site boundaries might be enlarged or additional features located. In addition, the particular metal detector that was used is capable of distinguishing between iron objects and objects made of other metals such as brass. It was thought possible that particular objects that might shed light on activity at the site, such as rifle cartridges, opium cans and the like, could be distinguished from the mass of iron objects expected to be found at the site.
The technique used was somewhat informal, but designed to be relatively exhaustive in its coverage. All of the site area received some coverage, but particular attention was paid to identified features. When an area of strong readings was encountered, it was followed up with more sweeps. In general, the survey transects probably averaged less than five meters in width, and certain zones were completely swept. The survey also extended beyond the known site perimeter in an attempt to locate previously undetected features. The site was first surveyed with the metal detector set to find all metal. The detector was moved in slow, level sweeps generally about 1-2 inches above the ground. The detector was then fine-tuned in order to locate areas of possible non-iron objects. With sufficient practice, it was possible to distinguish areas were it was thought cans etc. were buried from areas containing nails, for example. With the fine-tuned setting, it was possible to pinpoint the locations of opium cans. The intensiveness of metallic readings cannot be precisely quantified, but only subjectively described.

In general, metallic readings at all of the identified features ranged from moderate to very high intensity. Areas of metal concentration corresponded quite well with identified features, except that subsurface metal associated with some of the features was
found in perimeters of varying size around the features, and a possible activity locus associated with metal working was defined (see below and in the feature descriptions). No metal was detected beyond the known site perimeter. (In fact, this is not surprising in light of the fact that the site occupies nearly all of the available "level" area in the vicinity.) Select areas of particularly high readings were marked with pin flags and were later subsurface tested. In some cases, locations with readings of obvious high intensity and limited area, thought to indicate single artifacts located in the duff or immediately below surface, were first probed with a pin flag in order to ascertain the depth of the object, and then exposed with a trowel. If nothing was detected with the pin flag within about 2-3 cm of the surface, the effort was abandoned—except in cases where subsurface tests were later conducted. If the object was determined to be merely below the duff layer or just below the sod, it was exposed and its provenience mapped in relation to the datum or a datum station. Artifacts found in this way were either sketched and/or described, left in situ, and reburied (e.g. segments of bar iron or cans), or were collected (opium cans). In addition, a concentration of square nails in the vicinity of Feature 2 was partially exposed beneath the duff layer. The exposed area measured about 30 cm across within an area of high readings.
measuring about three meters across (see the Feature 2 description below). The maximum depth of any of these mentioned items was two centimeters. Artifacts detected by the metal detector and subsequently exposed are discussed in the feature descriptions below.

As mentioned, anomalies found by the metal detector corresponded quite well with the locations of previously identified features. However, strong indications were also discovered in the area near the datum, between Features 1 and 2. Strong readings were encountered in the center of Feature 1 and immediately outside the feature to east and downslope to the south. Very strong readings indicated substantial subsurface metal immediately west and south of Feature 1, a partial stone foundation. Strong readings were also detected in Feature 12, a rectangular level area, and in a small (about two meter diameter) area southwest of Feature 12 along the old abandoned road. In addition, strong indications were encountered in two small (about three meter diameter) areas in two of the levelled "terrace" features recorded by Fredlund et al (1991) on the lower, terrace portion of the site. The results of the metal detector survey are discussed in more detail below in connection with the feature descriptions.
Subsurface Testing in 2000

All of the subsurface tests conducted in 2000 were placed in areas of high metal concentration. The tests included a one meter square unit immediately east of Feature 2, a 50 cm square unit immediately east of an opening in the wall of Feature 1, a 50 cm square unit in the center of Feature 1, a 50 cm square unit in Terrace E, and a 50 square cm unit in Terrace C. Soil from the tests was passed through a 1/4 inch mesh screen. The results of testing are described in connection with the feature descriptions below.

Feature 1/Tool Repair Activity Locus

Feature 1 was minimally recorded during the 1988 investigation and was not tested during the 1989 investigation. Its function was described as "unknown" (Fredlund et al 1989). Feature 1 is 12 meters at 222 degrees from the datum. The metal detector survey indicated strong metallic readings in the area around the datum and immediately outside the opening of Feature 1 and for a distance of about two meters to the south (downslope). Feature 1 is a squarish alignment of stones measuring about two meters square with a 30 cm wide opening on the east side and a 40 cm deep depression in the center. It is located on the bench lobe above (north
of) the ditch. The ground in the vicinity slopes southward toward the creek. A low earthen mound surrounds and is incorporated with the feature stones, and probably represents fill from the pit.

Two segments of bar iron were found about five meters south and east of the site datum and one segment was found about one meter to the south and downslope of the opening of Feature 1. In addition, four shovel heads were found within an area north and east of the datum measuring approximately 15 meters across. The segments of bar iron were detected with the metal detector and exposed with a trowel. One of the shovel heads was indicated by the metal detector and exposed by sweeping away a covering of duff. The others were observed lying on the ground. All of the iron bars were located immediately below the sod, at a depth of about 2 cm. The bar iron segments all measured 1/2 inch thick by 1 to 1 1/8 inches wide by 4 1/4 to 4 1/2 inches long. One of the bar segments is slightly curved with one end which comes to a dull "point", and may represent a portion of a pick. All of the bar iron segments appear to have been modified while in a semi-molten state. One has a "lip" that appears to represent where the end was pinched off when the iron was hot. The discovery of these segments of bar iron suggested that Feature 1 might represent the remains of a forge. The area generally between Features 1 and 2, incorporating the
datum area, appears to represent an activity locus associated with tool repair and possibly also with blacksmithing.

In addition to the bar metal, a lozenge-shaped can was found immediately below the surface (less than 1 cm deep) about three meters directly downslope from the metal bar found near Feature 1. The can was severely deformed and deteriorated, but was recognizably a type of can associated with canned seafood such as sardines or smoked oysters. The can was replaced and recovered.

Two small test units were placed within and adjacent to Feature 1. Test unit XU-2 was placed immediately outside of the eastern opening of Feature 1. The test measured 50 cm square and was dug to a depth of 30 cm. Numerous small chunks of charcoal were recovered from throughout the depth of the test. In addition, the edges of two large stones, which may represent a continuation of Feature 1, were encountered at a depth of 9 cm. The stones were left in place and the soil and charcoal was returned to the pit.

XU-3 was placed in the center of Feature 1. The test measured 50 cm square and was dug to a depth of 40 cm. One fragment of white paste, clear glaze ceramic and a curved fragment of clear glass were found in the upper 10 cm. In addition, a machine soldered, lap seam hole-in-top
can was recovered at a depth of 30 cm. Small chunks of charcoal were found throughout the unit.

The can was somewhat deformed, but measured about 3 1/2 inches diameter by 4 1/2 inches tall with a 1 1/2 inch cap. The can has machine soldered lap seams, indicated by a uniform, rectangular shaped bead of solder along the seam. According to Rock (1984:103), a machine for soldering side seams was introduced in 1883 by the Norton Brothers of Chicago, Illinois. An improvement on this type of side seam, the crimped, double seam, was introduced in 1888 by the Ams Company of New York, becoming common by the late 1890s (Rock 1984:105). This would appear to date the can sometime after 1883, but before ca. 1900. The ceramic fragment is a maximum of about 3 mm thick and has a curved edge marking an apparent rim, possibly of a cup. No trademarks or decoration is present.

The results of testing at Feature 1 failed to reveal any pieces of slag or formerly-molten iron that would tend to support the evidence for blacksmithing provided by the bar iron. However, the ubiquitous presence of charcoal might indicate the feature's use as some kind of hearth, and it is possible that the feature served as a forge. The opening on the east side would have allowed a draft to stoke the embers in the fire. The presence of charcoal immediately outside this opening indicates that charcoal
was raked out of the hearth. It is also possible that the feature was associated with some type of building that burned down, although the absence of nails seems to discount the possibility. A few pieces of apparent garbage within and adjacent to the feature indicate that the general area was utilized for waste disposal. In any case, the general area between Features 1 and 2 appears to have served as an activity locus for the repair of mining tools such as picks and shovels. The pieces of bar iron are similar to artifacts recovered by Stapp and Longenecker (1983:53-54) at a blacksmith shop in Pierce, Idaho.

Feature 13
Feature 13 is a shallow pit about two meters north of Feature 1. The pit is roughly rectangular, measuring about two by three meters. The pit is barely discernable at the south end, but deepens to a depth of about 40 cm at the north end. Adjacent and within the pit are approximately 10 stones with a few additional stones scattered downslope. No metallic readings were registered by the metal detector in the feature. Fredlund et al (1991:97) speculate that the feature is a bottle hunter's disturbance.

Feature 2- Possible Business Establishment
The most visible portion of Feature 2 consists of an "L" shaped rock wall that measures on the outside 1.3 m north-south by 1.7 m east-west (Figure 15). Presently, the maximum wall height is about 70 cm. It is difficult to discern how thick the wall was originally. At present, portions of the wall are over a meter thick, but many of the stones have collapsed. The stones were apparently laid without mortar in at least four courses. Thin rocks were wedged in certain places to stabilize the larger and more rounded stones. In 1989, shovel probing of a duff covered mound on the west end of the feature revealed a 1.1 m north-south x 0.8 m east-west cairn.

The 1989 fieldwork at Feature 2 (Fredlund et al 1991) included excavation of a 0.5 x 2 m trench along the inside of the north wall that extended to the interior of the east wall. The trench revealed a concentration of charcoal at apparent shallow depth that was judged to be from a recent hearth. It was further judged that approximately 15 cm of soil had accumulated in this area of the feature since its construction. Below this was a 2.5 cm thick layer of ash-stained soil which contained fragments of charcoal and artifacts. Artifacts included "36 cut (square) nails, fragments of flat glass (window glass?), metal fragments, tool head wedges, fragments of a possible chemical bottle and its glass stopper, fragments of olive and aqua glass, as well as a fragment of celadon
ware and pieces of a food jar." Below this 2.5 cm thick cultural level was a layer of yellowish brown soil that was thought to mark the original ground surface. The feature stones rested on this surface (Fredlund et al 1991:83).

Three 20 cm square shovel tests were dug in addition to the trench. These were located at 9N 13 E, 8N 13E, and 7N 13E from datum, respectively. The purpose of the shovel tests was to determine the extent of the ash stained soil layer. The shovel tests revealed that the ash stained soil extended to 8N 13E but not to 7N 13 E (Fredlund et al 1991:83, 87)

Fredlund et al (1991:87) state that "the function of Feature 2 was not determined" and that..."the structure probably was never completed." It was surmised that the cairn on the west side of the feature represented a supply of stones that were intended for use in the construction of the foundation. The ash stained soil level was thought to have been the result of a fire that was set to burn debris that had accumulated within the feature. An alternate possibility put forth was that materials from the feature were salvaged.

In 2000, the metal detector survey indicated strong readings in an area extending from just south of the "L" shaped wall to a distance of about two meters to the east and about five meters to the south. A concentration of
square nails in the area extending between about two and five meters south of the wall was partially exposed beneath the duff layer. The exposed area measured about 30 cm across within an area of high readings measuring about three meters across. A cursory examination indicated that the strong readings in the area of Feature 2 were primarily the result of a great number of square nails which were either shallowly buried or situated within the duff layer (i.e., essentially on the surface).

Immediately south of this heavy concentration of nails is an apparently constructed area of stones and soil, forming a mound whose top stands about 30 to 50 cm above the natural surface. The mound probably measures at least 1.5 m in diameter, but only the southeastern portion is discernable. The southern edge of the built-up area is roughly five meters south of the eastern leg of the "L" wall. A tree and a juniper bush are are growing out of the stones and soil, largely obscuring details of its construction. The 1991 GCM report (Fredlund et al 1991:83) refers to "a "terrace edge" (apparently where the terrain begins to slope down to the creek). It is further related that "the terrace edge had been modified by rocks and dirt piled on top of it." This description apparently refers to a mound of soil and stones which supports the wall of Feature 2, but may also be in reference to the built-up area south of the wall (referred to herein). The
presence of the heavy concentration of nails and the built-up area immediately to the south leads to the possibility that this mounded area in fact marks the southeastern corner of a former structure represented by Feature 2. If so, then Feature 2 might represent the remains of a building that originally measured roughly three by five meters.

When the metal detector was fine-tuned to disregard iron objects, two fairly strong but discretely bounded "hits" were recorded adjacent to the "L" wall of Feature 2. These proved to be opium can parts located about one centimeter below the surface. One of the can parts (Opium Can #1) was located at 14.5 meters at 60 degrees from datum, and the other was located at 20 meters at 68 degrees (Opium Can #2). The two cans were 75 cm southwest and one meter east of the "L" wall, respectively. In addition, during the excavation of XU-1 (see below), a brass strip was found immediately below the duff layer about 2 cm southwest of the southwest corner of the unit. The strip measures about 11 mm wide by 16.5 cm long. This strip may be a part from an opium can (see Figure 15 below).

Both of the other brass objects represent the top panel of an opium can lid. All three of the opium can parts found at the site in 2000 bear the same stamps (Figure 17). The symbol on the cans is identical to a
symbol on an opium can lid, illustrated in Sando and Felton (1993:168), which bears the brand name "Source of Beauty". This can was found at the Opera House site in Woodland California. "Source of Beauty" was the most common brand sold at the Kwong Tai Wo store in Marysville, California, and cans bearing this brand's stamp seem to be the most common recovered from archaeological sites (Sando and Felton 1993:171).

Immediately south and downslope of Feature 2 is an amorphous area of scattered artifacts that probably represents the dumping of refuse down the hill. In 1988, GCM Services excavated a one meter square test unit in this area (about 10 meters northeast of Feature 2) which yielded "can fragments, fragments of opium cans, olive green glass from wine or ale bottles, a large cut nail, fragments of brown food jars, globular jars, liquor bottles, Four Seasons serving bowl and celadon fragments, a boot toe, and some aqua and clear glass" (Fredlund et al 1991:97). In 2000, this area included a number of bottle glass fragments and machine soldered, lap-seam hole-in-top cans. The bottle fragments included portions of two dark green glass bottle bases and a portion of one aqua bottle base. No trademarks were observed on the bottle bases. The cans are of the same type described earlier in relation to Feature 1. That is, they were probably manufactured between ca. 1883 and the late 1890s (Rock

A one meter square excavation unit, XU-1, was placed immediately east of the "L" wall at Feature 2. The northwest corner of the unit is 19 m at 64 degrees from the site datum (about 30 cm east of the east wall of the "L"). See Figure 16 below. The unit was placed within the area of strong indications of subsurface metal revealed by the metal detector sweep. The purpose of the test was to aid in the clarification of the function of Feature 2, which was felt to have some potential to assist in the interpretation of the site as a whole. The unit was dug with a trowel and a square shovel and the soil was passed through a 1/4 inch mesh screen. As the unit was being excavated, it became apparent that the unit could probably be dug by natural levels.

All of the cultural material was found in the upper soil stratum, which consisted of a dark, charcoal and ash stained sand loam. This upper level extended from the surface (i.e. below the duff layer) to a depth of between 4 and 14 cm below the surface. This cultural level gradually deepened toward Feature 2 (Figure 16). Below the cultural level was a stratum of brown loamy sand and gravel. This level extended to a depth of about 35 cm. Below this was a zone of pale gray, compact sand and
Figure 15. The "L" wall of Feature 2 in relation to XU-1. The figure is expanded and revised from Fredlund et al (1991).
gravels. The proportion of gravels increased with depth, suggesting that the soil grades into weathering bedrock at a relatively shallow depth. No cultural material was found in the lower two levels. The majority of the excavation unit was dug to a depth of about 25 cm. However, a probe about 20 cm square was dug to a depth of 40 cm along the north wall. The purpose of the probe was to confirm that there were no additional cultural levels, and to aid in profiling the soil strata.

The test unit yielded a variety of artifacts including at least 79 square nails, six ceramic sherds, at least two food cans, a probable key for a sardine can, two thin brass (?) metal fragments (probably from an opium can), two buttons, five fragments of leather, six shards of bottle
Figure 16. Profile of the north wall of XU-1.
glass, six shards of flat (window?) glass, seven ceramic sherds, 28 bone fragments, a portion of a probable cooking implement, and a well-preserved Chinese coin of the K'ang Xi reign (1662-1772).

The square nails were separated into four categories, based on the size of the head and overall length. However, many of the nails were deteriorated, and their overall length was inferred based on the size of the head and extant portion of the shaft. The largest nails had a head varying in size between 1/4 and 5/16 inch and a length of about three inches (based on an extrapolation from the most complete specimens). These large nails were the most numerous, numbering 50. A medium sized type of nail had a 1/4 inch head and a length of about two inches. Six (6) nails fell into this category. A third size of nail had a head of 3/16 inches and a length of about 1 1/2 inches. There were two (2) of these. A fourth type was a large finishing nail with a rectangular head of 3/16 by 5/32 inches and a length of three inches. This type was represented by only one example. Thirty-three (33) other specimens consisted only of a portion of the shaft. Of these, it was judged that approximately 20 included enough of the shaft that they could be considered as representing a single nail each, making a total of at least 79 nails recovered from the unit. The number of nails recovered from XU-1, combined with the concentration of nails to the
south found by the metal detector, leads to the conclusion that much, perhaps most, of the metal in the area of Feature 2 consists of nails. A rough extrapolation based on the quantity of nails found in XU-1 and the overall area of high metal concentration suggests that there may be more than 1,000 nails in the vicinity of Feature 2. This quantity of nails would appear to indicate that a substantial building once stood at the location. The volume of nails might indicate that the structure was built of lumber, rather than logs. Although some the nails could be from a roof, window and door frames, the quantity of large nails suggests that they were used to hold a frame structure together.

A number of severely deteriorated food can parts were recovered. One part is from the edge of a lozenge shaped can typically used for sardines or other seafood. Another part consists of a portion of a soldered cap for a hole-in-top can. The cap measures approximately 2 1/4 inches in diameter. The other parts are portions of a can body along with one rim fragment. The rim and most of the body fragments appear to have come from a cylindrical can or cans. A key which is probably associated with a key-opened sardine can was also recovered. In addition to the food can parts were two deteriorated fragments of thin sheet made from a non-ferrous metal. These probably represent opium can parts. The parts could be associated
with either of the two opium cans found in close proximity to Feature 2, or could represent an additional one or more opium cans.

Six glass shards from bottles or other containers were recovered from XU-1. One of these is a large body fragment of an amethyst-colored square bottle. The glass is faintly amethyst tinted, suggesting that it spent some time exposed to ultraviolet light. The glass measures 1/4 inch thick. In addition were found three shards of dark olive green glass. One of these is a fairly large body fragment, and the other is a portion of the base. The olive green fragments, which measure about 3/16 inch thick, probably represent a single bottle. Other glass shards which probably came from containers include a single piece of amber glass, and a pale green shard.

Six (6) small shards of clear, faintly green-tinted flat glass recovered from the unit probably came from a window. These shards, along with additional specimens recovered by GCM Services in the trench along the "L" wall, provide further evidence that a rather substantial structure—one with windows—stood at the location of Feature 2.

Seven ceramic sherds were recovered from XU-1. All are rather small, and all but one appear to be body sherds. Six (6) sherds have a orange tinted paste with a dark red glaze. One, an apparent rim sherd, has a buff
paste with a black glaze. Based on the color of the glazes, none would appear to represent typical Chinese ceramics, most of which either have a clear (e.g. Four Seasons ware) or green glaze (e.g. Celadon ware).

Artifacts related to clothing recovered from XU-1 include two buttons and five scraps of leather. The leather scraps are all small, measuring at a maximum about 2.5 cm across. Two are cut into an irregular triangle shape. The leather scraps may be a result of repairing shoes. One of the buttons is made of white milky glass with four holes. The button measures 7/16 inch in diameter. The other button is made of a non-ferrous metal (perhaps brass), has four holes, and is 1/2 inch in diameter.

Thirteen fragments of bone were recovered from the unit. At least five of these exhibit butchering marks. Three of the fragments appear to come from a small animal, perhaps a chicken (one scapula and two limb elements). One of the limb elements is cut into a length of about 2.5 cm. Two rib fragments appear to come from a small or possibly medium sized animal. Five other fragments (one possible vertebra fragment, one rib fragment and three limb elements) appear to come from either a medium or large sized mammal. The remainder of the fragments appear unidentifiable.
One artifact, which appears to represent a portion of handle for a small tool (perhaps a cooking tool), was recovered. The object is deteriorated, and made of a ferrous material. It measures about 4 1/2 inches long, and consists of a rod which tapers into a broad, thin "tongue" which includes two small rivets. The "tongue" tapers to between 3/8 and 5/8 inches in width. It is surmised that the artifact could represent a handle for a spatula or other type of cooking implement.

The Chinese coin recovered from XU-1 is well-preserved (Figure 17). It is made of a non-ferrous metal and measures 27.5 mm in diameter by 1 mm in cross section. The coin has a square hole in the center (known as a hao) which measures about 5 mm across. The obverse side has four characters of Chinese script alongside each of the four sides of the hao. The reverse side has two Chinese characters along two of the sides. The obverse side on Chinese coins identifies the emperor's reign title when the coin was issued, and the reverse side denotes the mint which issued the coin (Beals 1980:58).
Figure 17. Sketch of the K'ang Xi reign (1662-1772) coin, recovered from XU-1, and the stamp found on all of the opium can parts found at Locality 30.
The hao served three functions- to provide a means of holding the coin on a square rod during the finishing process, to conserve metal, and to allow the coins to be strung together (Olsen 1983:44). Both sides appear to be identical to a coin illustrated in Beals (1980:63) which is identified as a K'ang Xi reign (1662-1772) coin issued from Shanxi province. This coin is from the Trojan site, a site along the Columbia River with aboriginal associations which is thought to date to the Fur Trade Era (Beals 1980:62).

According to Beals (1980:62), this particular type of coin, with a wider than normal diameter of 27 mm, was highly prized as a talismanic device. K'ang Xi period coins in general were considered particularly powerful charms. They were typically strung together in groups of twenty as a protection against ill-fortune while travelling, and were often affixed to rings (Olsen 1983:43). In fact, the coins appear to have been more prized for their value as talismans rather than for any monetary value, which was typically valued in fractions of a penny (Beals 1980; Olsen 1983). However, Farris (1979) offers the suggestion that in certain contexts the coins could have been used as a medium of exchange. This would include situations where the coins would not circulate outside of a small community, and would essentially be used as "tokens" for local exchange. Farris (1979:51,
referencing Kleeb 1976), suggests that a mixture of Chinese and U.S. coins might indicate that the coins were used as media of exchange. A mixture of Chinese and low denomination U.S. coins was found in the Yreka Chinatown (Farris 1979:51). Chinese coins were also found in association with U.S. coins at Locality 48 in German Gulch (see below).

Ritchie (1986:570) refutes the idea of the coins acting as currency, pointing out that such a "closed economy" would have been subject to debasement of the currency by someone importing large quantities of the coins, and suggests that they were mainly used as gambling tokens. Akin (1992) mirrors Ritchie in refuting the theory that the coins served as currency, and points out other uses, in addition to gambling, including their use in folk remedies, as decoration, and even as hardware (door hinges).

Feature 2 is tentatively interpreted as a special purpose feature, perhaps a small business establishment or elite household. The feature appears to be associated with (in the face of an admittedly incomplete data set) the greatest variety of artifacts at the site. Certain attributes of the feature, such as the stone foundation and the large number of nails, suggests that it probably represents one of the more substantial buildings that once stood on the site. In addition, its prominent position at
the highest point of the site, suggests that it may have been located in order to supervise work in the gulch below or the activities of the camp. In New Zealand, small gambling/opium smoking establishments were more common than Chinese stores. Such establishments tended to be small-scale affairs, requiring only a minimum amount of start-up capital (Ritchie 1986:38-41). The opium cans, Chinese coin, and liquor bottle glass at Locality 30, Feature 2 may indicate that one of these small-scale businesses operated at the site.

Features 12, 16 and 17- Possible Building or Tent Platform Locations

Feature 16 is a levelled area with a berm along the northern edge. The feature measures about seven by eight meters. In 1989, two one meter square units were dug in the interior of the feature. Volume I of the GCM report (Fredlund et al 1991:97) states that the two units yielded "fragments of a cover for an opium lamp, bottle glass and cut nails." However, the artifact table in Appendix B of Volume II of the report also lists one metal can, one bitters bottle, a metal cup, cotton twill or jean clothing, and a lantern mantle. No counts of nails are available (the original notes could not be found in the files), but the 2000 metal detector survey indicates that there is a relatively substantial deposit of metallic
objects in the interior of the feature which could be nails. The metal detector registered "hits" that could be described as "moderately strong" but somewhat "scattering". This suggests the possibility of a number of small objects such as nails in contrast to readings that would be picked up from larger objects such as cans. Admittedly, this "evidence" is tentative, and additional excavations would be necessary to confirm the function of the feature. However, based on the available evidence from the 1989 excavation units, Feature 16 can be at least be identified as a dwelling location, albeit possibly only a tent platform or something similar.

Feature 12 is a slight rectangular depression measuring about four by six meters. Immediately north of the feature is a rock pile measuring about four meters in diameter by one meter high. Feature 17 is a depression measuring about five meters square by 20-70 cm deep. Both of these features are described by Fredlund et al (1991:97) as possible dwelling locations. No test units were dug in the features during the 1980s or the 2000 fieldwork. However, the 2000 metal detector survey resulted in similar readings to those obtained at Feature 17, indicating the possible presence of nails along with other metallic objects.
Feature 8 - Possible Foundation, Building Location

Fredlund et al (1991:93) "believed (Feature 8) to be a stone foundation." The feature measured 7 by 14 meters and had "an open area in the east wall". One corner was reported as 40 to 90 cm high. An apparent photograph of this corner (Fredlund et al 1991:95) indicates that this portion of the foundation was constructed in at least three unmortared courses. In 1989, "two test units 10 cm deep were placed on opposite ends of the feature". There is no indication of the area of the test units in the 1991 report, nor could the original notes be located in the project files. However, the tests were probably one meter square. Recovered artifacts included "a small brass cap, possibly from a pencil, bitters bottle fragments, liquor bottle fragments, seven cut nails, a post button from jeans, and white earthenware fragments" (Fredlund et al 1991:93). In 2000, this feature could not be relocated. Fredlund et al (1991:83) state that the feature "was to be impacted by road improvements." Construction of the improved road has evidently buried or destroyed the feature. The 2000 metal detector survey located an opium can part (Opium Can 3) along the old road about six meters southeast of the reported location of Feature 8.
"Terraces" A-H and Feature 18- Possible Building or Tent Platform Locations

Fredlund and Anderson (1984) described an area of "eight terraces" on the terrace portion of Locality 30. They describe them as:

...artificially constructed areas, generally .5 m above the other. The have levelled surfaces. The edges have eroded and so the divisions are not sharply defined in some cases (Fredlund and Anderson 1984:35).

Apparently, it was thought possible at one point that the terraces were small gardens (Fredlund et al 1991:208), such as were found in Idaho (Fee 1993[1986]). This may have led to the "terrace" designations.

In the 1991 report (Fredlund et al 1991:93) the terraces are denominated A through H. In 2000, it was difficult to discern all but one of these boundaries. This separation was apparently between two terrace clusters which include Terrace D and E on the one hand and Terraces A, B, C, F, G and H on the other hand. It is possible that road construction has buried portions of the northern terraces (F, G and H), or that the tall grasses in the area in October 2000 obscured the boundaries. The 2000 metal detector survey indicated two small (about three meter diameter) areas of metal concentration corresponding to at least two of the terraces. Based on
mapping and plotting, the areas appear to correspond to Terraces C and E, which border the old road on the north.

Feature 18 is a levelled area measuring about two by five meters with a with a one meter wide berm along the eastern and western edges. Fredlund et al (1991:93,97) state that "Terraces A to H were probably locations of housing for the miners" and that Feature 18's "use is unknown, but it is probably a cleared area for a dwelling, possibly a tent platform". In 1989, five one meter square test units were dug in the terraces. Two were dug in Terrace G, one was placed on the boundary between Terraces B and C, and one each were placed in Terraces D and E, near the boundary between the two. Artifacts recovered from Terrace A included a cooking pot, fragments from two hole-in-top cans, about 30 square nails, a triangle file fragment, ten square spikes, a metal drinking cup, fragments from two opium pipe bowls, and aqua glass from bitters or liquor bottles. The 1991 report is silent on the results of the other testing. There is no references to Terraces A-H in the artifact tables in Volume II, and the original notes could not be located in the files. Perhaps the results of the other tests were negative. Nevertheless, the artifacts recovered from Terrace A led the researchers to surmise "that dwellings were located here" and that "the presence of nails and the close
proximity to one another may indicate tents on plank platforms" (Fredlund et al 1991:93).

In 2000, a 50 cm square by 50 cm deep unit, XU-4, was placed amid a concentration of metal that apparently lies in Terrace E (based on mapping and plotting). The unit was placed at a point 19 m at 130 degrees from the temporary station (Station 1) established at the vehicle pullout, and about four meters north of the old road which courses through the site. XU-4 was dug in arbitrary 10 cm levels and all soil was passed through a 1/4 inch mesh screen. However, all of the arbitrary levels are probably associated with a single occupation. All three levels contained pieces of charcoal. The upper 10 cm yielded two large square nails, a small square nail and a .38-55 center-fire rifle cartridge. One square nail and a heavy-duty staple (such as used in fencing, construction and the like) was recovered between 10 and 20 cm below the surface. The bottom level (20-30 cm below the surface) yielded a single square nail. One of the large nails is severely deteriorated. The other large nail has a 1/4 by 5/16 inch head and measures about 3 1/4 inches long (at least a small portion of the lower part of the shaft has oxidized away). Both of the small nails are also deteriorated but each has a head of about 3/16 inch and the longest specimen is just shy of 1 1/4 inches long.
The staple measures about 1 1/8 inches across and has "tines" measuring about 3/4 inches long.

According to Barnes (1972:60), the .38-55 cartridge was introduced ca. 1884. The ammunition was available up to 1970, but rifles firing the cartridge were discontinued around 1940. The round was initially designed for target shooting. The two sizes of nail recovered from XU-4 suggest that frame and possibly also auxiliary construction (such as roofing, door frames, etc.) is represented at the feature. The charcoal may indicate that the structure was burned down. The rifle cartridge could be indicative of target shooting, hunting, or even defensive action. However, the cartridge is not necessarily associated with the Chinese occupation.

XU-5 appears to have been dug in Terrace C (based on mapping and plotting). The unit was placed at a point 29 m at 216 degrees from Station 1 and about five meters north of the old road. XU-5 measured 50 cm square and was dug to a depth of 30 cm. The unit was dug in arbitrary 10 cm levels, and all soil was passed through a 1/4 inch mesh screen. No cultural material was recovered from either the upper or the lower 10 cm levels. The level between 10 and 20 cm below the surface yielded three square nail fragments. All of the fragments are severely deteriorated, but a widening toward the end of one
fragment may indicate a nail head. It is possible that all three fragments represent a single nail. However, such a nail would measure about four inches long. The metal detector indicated about a three meter diameter area of "hits", and it is possible that XU-5 failed to intersect the heaviest concentration of metal. Nevertheless, the metallic concentration is felt to represent mostly nails. At a minimum, the results of the test indicate some sort of structure once stood in this vicinity, albeit possibly only a tent platform.

Structures A and B at Locality 18- Cabin Remains and Foundation

Both Structures A and B are situated in small areas levelled into the rather steep hillside at the location (above both the modern, improved road and the old, abandoned road). Structure A consists of the severely deteriorated remains of a log cabin. The structure measures about 23 ft (7 m) east-west by 13 ft (4 m) north-south. The logs are saddle notched, and average about 6 inches in diameter. In 2000, the structure was nearly entirely collapsed with the exceptions of portions of the east and west walls. Fredlund et al (1991:71) report that the structure once had a gabled roof covered with one inch lumber. A south-facing door was located just west of the center of the south wall. The researchers surmised that
the roof was once covered with sod (presumably in the absence of shingles). About five meters south of Structure A was a depression and backdirt pile that was thought to be a bottle hunter's disturbance. In 2000, the cut of the improved road extended to within about three meters of Structure A, and the bottle hunters pit and backdirt have apparently been destroyed. It was noticed that a few large-size wire nails are included in the structure along with square nails.

In 1989, Structure B consisted of a stone foundation with interior dimensions of 18 ft (5.5 m) north-south by 15 ft (4.5 m) east-west at the north end and 10 ft (3 m) at the south end. The feature was described as roughly circular in shape. Below, and about two meters south of the main portion of the feature was a retaining wall measuring about 6.5 ft (2 m) long. The wall was made of stones, apparently stacked without mortar. The wall measured between 1.5 and 3 ft in height (Fredlund et al 1991:71). In 2000, very little of the structure described in the 1991 report could be discerned. A vaguely-defined levelled area with a scattering of stones was observed immediately above the cut of the improved road. The retaining wall was apparently destroyed by road construction, and remainder of the feature appears to be disturbed and/or partially destroyed.
In 1989, five shovel tests totaling 1.5 square meters were excavated at Locality 18. Two each were dug at each of the two structures, and one was dug in the bottle hunter's backdirt. Only one of the tests placed in the structures yielded cultural material. This was Test 2, a 50 by 100 cm test which was placed immediately outside and southwest of the door of Structure A. The test yielded three square nails and "three glass fragments" (Fredlund et al 1991:71). There is no indication as to the type of glass in the narrative description in Volume I of the 1991 report, and the artifact table in Volume II does not list proveniences. Amber glass from a liquor bottle is listed in Volume II, but this may have come from the bottle hunter's backdirt. The test (Test 5) placed in the bottle hunter's backdirt yielded a variety of artifacts, including 2.9 lbs of square nails, a Celadon ware fragment, fragments of an opium pipe bowl, a musket ball, brown glazed ware, a medicine bottle neck, window glass, white earthen ware, bottle glass, a leather fragment, pants rivets, flattened opium cans, and wire nails (Fredlund et al 1991:71). The artifact assemblage tends to confirm that the locality was occupied by Chinese.

The 2000 metal detector survey registered strong indications in the interior of Structure A, and much weaker indications at Structure B. The indications in Structure A appear to indicate that the interior of the
feature contains a fair amount of cans along with nails and other metallic objects. In fact, the indications of metal are so strong that it was not possible to tune out the ferrous material. The more scattering indications at Structure B may indicate the scant presence of nails or other small objects.

Possible Ovens- Features 4, 5 and 6

Features 4 and 5 are located about four meters apart on the terrace portion of Locality 30. Feature 5 was completely excavated during the 1989 investigations. Feature 4 was described as "a pit...which measures 6 ft x 1/3 ft deep (1.77 m x .4 m) and may have served the same purpose as Feature 5,... a possible oven". Feature 6 was described as a rock-lined pit with an inside diameter of 4.2 ft and an outside diameter of 14.7 ft (4.5 m) and was surmised to "have served the same purpose as Feature 5" (Fredlund et al 1991:87, 93). In 2000, no sign of either Features 4 or 5 was found. However, Feature 6 was located. Since Feature 6 is closer to the improved road, it seems unlikely that the other features were disturbed by construction. Feature 5 was either destroyed or obscured by backfill as a result of the archaeological excavations. Feature 4 is relatively small, and may simply be obscured by vegetation.
All three of these possible ovens lie on the terrace portion of the site within about a 50 meter wide area north of the old road and on both sides of the western cluster of "terraces". If all three indeed served as ovens, it would seem to indicate that some sort of specialized function occurred in this area of the site.

Feature 5 was one of the more interesting cultural manifestations at the site. A three by four meter block excavation in 1989 revealed a circular, rock-bordered pit with two parallel lines of stones extending to the southeast. The feature "measure(d) at the orifice 6.2 ft by 5.9 ft (1.9 x 1.8 m) ". The stones were laid in courses without mortar. The upper 45 cm of soil inside the feature contained charcoal. Below this was a deep basin-shaped pit filled with ash stained soil and a high concentration of charcoal fragments. At the contact between the upper and lower soils were seven burnt aspen logs situated in sub-parallel fashion. Generally, only the outsides of the logs were charred. Covering the logs was a blanket of charred pine boughs with the charred needles still intact. Mixed in the soil from the upper level were two bovine phalanges and five large mammal bones. Other cultural remains included a .44 caliber Henry cartridge and fragments from three 3.25 in long cut nails that were found at the lower level. A concentration of charcoal was found about 4.5 meters south of Feature 5.
A pair of one meter square test units placed in the concentration yielded no artifacts were encountered. The charcoal concentration was interpreted as a dump related to Feature 5 (Fredlund et al 1991: 87-93).

The implication seems to have been that Feature 5, and possibly also Features 4 and 6, may have been domed rock ovens of a type popularly associated with the Chinese (Wegars 1991).

Fredlund et al (1991:92-93) surmise that Feature 5 was an oven which, however, could have been used for a variety of purposes. The researchers, citing Wegars (1991) discount the possibility that the oven was used by the Chinese for the purpose of baking bread or other baked goods. Other possible activities put forth in association with the feature include making charcoal, roasting meat, melting gold and retorting amalgam. Wegars (1991:50) located a photograph showing Italians baking bread in a stone oven in French Gulch, just a few miles away from Locality 30. Wegars discounts the possibility that the Chinese used ovens for baking purposes, since the baking of food was not included in the cultural repertoire of southeastern China. She attributes the majority of domed oven structures in the West with Italian or Greek immigrants. Another possibility is that the feature was used as a forge similar to Feature 1, although the area of Feature 5 seems to lack the types of artifacts (tool
fragments, bar metal, etc.) that would support such a proposition. It is suggested here that the Features 4, 5 and 6 might have served as open-air hearths for the purpose of roasting meat. The large ungulate bones found in Feature 5 would seem to support this possibility. The nails found in the feature may be from lumber from a salvaged or demolished building which was used as fuel in the hearth. In any case, if the nearby "terrace" features served as tent platforms, then it seems likely that food preparation and cooking would have taken place out-of-doors.

**Cairns- Features 3, 7, and Cairn Portion of Feature 12**

Feature 3 is a 3.3 m north-south by 2.25 east-west by 40 cm high rock cairn located about 15 m southwest of Feature 2. In 1989, a 1 by 1.3 m test unit was placed in the approximate center of the feature, after soil removal and the mapping the exposed stones. Artifacts recovered from the unit included "a horseshoe fragment, some cast iron fragments, a cut nail, tool head wedge, chain link, melted olive green colored glass, a piece of chimney glass and a liquor bottle fragment" (Fredlund et al 1991:87). Feature 3 is near Features 16 and 17, rectangular levelled areas that may represent former dwelling locations. Fredlund et al (1991:87) surmise that Feature 3, as well as other cairns at the site near levelled areas such as
Features 7, and the cairn at Feature 12 (a levelled area with an adjacent cairn), probably represent merely the piling of stones and soil as a result of constructing the levelled areas. The artifacts recovered from the test in Feature 3 suggest that the cairns were probably also used as refuse disposal areas.

Features 10 and 11- Possible Privys

Feature 10 is a pit located about five meters northeast of Feature 2, a stone foundation on the higher, bench portion of the site. The pit measures about 1.5 m in diameter and is at least 50 cm deep. Fredlund et al (1991:93) surmise that the feature represents a privy. They state that "there is a great quantity of artifacts such as brown ware and celadon on the surface around it". The 2000 metal detector survey found strong indications of metal in the pit consistent with a deposit containing mostly cans.

Feature 11 was described in the 1991 report as a pit measuring 1.5 m in diameter by 50 cm deep. It was stated that "its use is unknown, but it may be related to the ditch system which runs alongside it" (Fredlund et al 1991:97). This feature was not found in 2000, although the area of the feature was surveyed with the metal detector with negative results. Feature 11 would seem to have very similar attributes to Feature 10, and may served
as a privy for the residents of the terrace portion of the site.

**The Locality 30 Ditch System**

Fredlund and Anderson (1984:35) state that a ditch from Beefstraight Gulch provided water for Locality 30. The source of the information is Hydrometric's (1981) report on the water rights in German Gulch. However, the ditch in question, WRA 143, terminates about 1/4 mile downstream from the locality (Hydrometrics 1981:map attachment). The ditch system coursing through Locality 30 was not extensively traced during the 2000 fieldwork. Parts of it appear to have been destroyed by the improved road. For example, a portion of the feeder ditches on the western end of the site is covered over by the road. These ditches may have drawn water from an officially unnamed gulch which enters German Gulch about 300 meters upstream. This gulch includes a small cemetery, and may be the "Graveyard Gulch" mentioned by Edwards (1908).

The ditch system at the site is fed from a ditch that courses along the bench, entering the locality at the western end. At this point, a pair of feeder ditches which may originate from Graveyard Gulch enters the main ditch. This feeder ditch has a meander which courses northeastward, toward Feature 1 (a possible forge). This meander is quite deep (about one meter in depth), and may
have been impounded at some point to supply a reservoir of water for the upper, bench portion of the site. The main ditch then curves around the bench below Features 2 and 10 before striking the old abandoned road, where it is obscured. In the past, the ditch probably curved around the slope to the north and east, toward an apparent reservoir, Feature 14. Feature 14 was not located during the 2000 fieldwork, and was probably destroyed by road construction. Fredlund et al (1991:97) describe it as a possible "pond related to the ditch system". It was reported to measure 5 m x 2.5 m x 1.8 m deep. Two 1 meter square test units were placed within the feature. The tests did not produce any artifacts, but revealed soil which was described as "pond sediments". It was surmised that Feature 14 was a reservoir designed to impound water for dry times (Fredlund et al 1991:97).

**Locality 19**

Locality 19 includes a relatively elaborate, two-roomed log structure along with ditches and a dense scatter of artifacts. The site is situated in fir-lodgepole forest on a bench or high terrace on the south side of German Gulch. The site lies on the opposite side of the stream and about 200 meters east of Localities 18 and 30. Fredlund and Anderson (1984) and Fredlund et al (1991) describe a variety of artifacts including oil cans,
machinery parts, hydraulic nozzles, pulleys, wagon axles and other industrial artifacts, at least seven cooking oil cans, the fragments of two woks and a steamer lid, fragments of two large wash basins, food storage containers, and eating utensils. The woks were described as large in size, measuring 30 inches in diameter by 9 inches deep (Fredlund and Anderson 1984: 27-28; Fredlund et al 1991:73-74).

The building includes two rooms. These consist of a 7 x 11 m (22 x 36 ft.) room on the western side and a 7 x 16 m (22 x 52 ft.) on the east side (Fredlund et al 1991:73). The total area of the building is thus about 189 square meters (620 square feet). This would make it by far the largest Chinese-associated structure recorded in German Gulch. See Figure 19 in Chapter 10. The logs are V-notched, and some are pinned together with 2 inch wooden dowels. A few notches, set off about 1-1.5 ft from the ends, were interpreted as an aid in skidding the logs to the site. The building includes five windows which are framed with 2 x 8 inch lumber. The logs are chinked and daubed with mud and denim cloth. Two exterior doors open to the north (toward the creek) and an interior door it situated in the partition between the two rooms. Numerous 1-2 inch holes, usually drilled in pairs, are situated around the interior of the building. These were interpreted as holes to accommodate some paddle-shaped
supports surmised to support benches, tables, and beds. Certain of the logs in the north wall (next to a window) were carved in such a manner that it was considered likely that they supported shelves. The roof of the building has collapsed. Subsurface probing in the corners and along the base of the logs revealed rock foundation stones that were placed under the logs at the corners. A hearth, thought to be of recent origin, was found on top of some roofing material in the eastern room. Fredlund et al (1991: Exhibit A) produced a detailed map of the building according to the guidelines established by the Historic American Building Record (Fredlund et al 1991:73).

Five small shovel tests were dug at the site in 1988—one between the two doors on the north side, another about four meters south of the building and three along the inside of the exterior walls. Recovered artifacts included two opium cans, square nails, brown ware ceramics, Celadon ware, a piece of .25 inch iron roundstock, a piece of 1/8 inch iron wire, a meat cleaver, a metal bar or slat, and a possible rock drill (Fredlund et al 1991:73-74).

Locality 19 was briefly visited and informally surveyed with a metal detector in October 2000. The site, including the log building, appeared to be substantially as originally recorded. The walls of the building may be slumping a bit more than they were in the 1980s. An area
beginning about 3-4 meters north of the main doors of the log structure registered numerous hits on the metal detector. This area lies toward the edge of the bench or terrace above the stream. A green glass liquor bottle and an opium can were observed on the surface in this area. It appears likely that a high concentration of debris, representing a dump, is situated not far from the main door. The area generally behind and to the south of the building seemed to be relatively devoid of metal concentration. An exception was a small area near the base of a large tree about 20 meters east of the cabin. This may represent a dump containing numerous cans.

It was noticed that all of the nails used in construction of the log building appeared to be of the square (cut) type. A circular stone structure measuring about 1.5-2 m in diameter was observed situated just inside the partition wall in the western room. This may be the recent hearth mentioned in the 1991 report. In the eastern room was observed a machine part consisting of a steel shaft measuring about 80 cm (about 2.5 ft.) long. There was a ring-like fitting on one end. The opposite end tapered into a square shape. About three meters south of the log building was a "crane hook" with an attached wheel, a part such as is used to transport heavy loads along a beam. The mechanical parts are probably
associated with hydraulic mining activities. The "crane" may have been used to lift and move large stones.

Locality 19 is situated adjacent to Lot 41, mined before 1874 by Sing Wah Hong, and also near a group of claims mined by the Quong Wa Hong Company between ca. 1871 and 1889. The site is also relatively close to ground which encompasses Localities 18 and 30. A group of claims in this latter area was mined by Wah Hing, Wah Shay Hong Company, Sin Faun, and Tua Goen in the 1870s and possibly after.

**Locality 9**

This site was originally recorded in 1984 by Fredlund and Anderson (1984:18). The site is located on a south-facing hillslope toward the upper end of the gulch, about 1.2 km upstream from Locality 30. The site includes two log structures, denominated Structure B and Structure C, that were the focus of the 1980s investigations. A photograph and description in the *Montana Standard* of August 30, 1953 led to the hypothesis that Structure C might represent the remains of the Nissler Brewery. Locality 9 is in a restricted mine area, and was not visited during the present investigation.

Structure (B) was built into the hillside. In 1988, the structure was reported as badly deteriorated. It measured about 5 m (16 ft) east-west by 4.5 m (14.5 ft)
north-south, encompassing an area of about 23 square meters (75 square ft.). The logs are described as square notched, chinked with wooden slats. Inside the feature was a dugout area about 50 cm lower than the surface. It was surmised that the dugout area might represent a root cellar. Square nails and heavy wire nails were used in construction of the building (Fredlund et al 1991:68).

Structure C was apparently in better condition than Structure B, and was the focus of testing in the 1980s. This log structure was also built into the hillside. It included a door on the south side. The building measured about 6 m (20 ft.) east-west by 5.5 m (18 ft.) north-south for a total area of 33 square meters (108 square ft.). In addition to the door, a square hole, possibly a window, was apparent in the west wall. All the observed nails were of the wire type.

Three subsurface tests totaling one square meter of area were excavated in and around Structure C. Recovered artifacts included wire and square nails, window glass, stove fragments, an unfired .41 caliber round, white earthenware, opium pipe bowl fragments, bottle glass, a lid embossed "Hazards Powder," Four Seasons and Celadon tableware, brown glazed storage jars, and a few unidentifiable bone fragments. The testing failed to confirm that Structure C was a brewery, but instead indicated that the building served as a dwelling for
Chinese (Fredlund et al 1991:69). According to Barnes (1972:165), the .41 caliber round was introduced in 1877. Both long and short varieties were produced. No revolvers have been manufactured for this ammunition since the 1930s. Barnes (1972:165) describes the round as "obsolete for a long time".
CHAPTER 10. SUMMARY DISCUSSION AND CONCLUSIONS

The Pattern of Chinese Settlement in German Gulch

While the five Chinese-associated sites located in German Gulch seem adequate to account for the population of Chinese in German Gulch known from historical sources, it is possible that other Chinese-affiliated features exist now or existed in the past. Although the population of Chinese never exceeded 100 in any census year (the 1880 census lists 98), Edwards states that at some point during the 1870s there were 150 in the gulch.

There are around 30 features at the five Chinese-affiliated localities with attributes consistent with the remains of buildings. The number is not precise because of the number of ill-defined features that could have served other purposes. There are also other features, such as the large log structure at Locality 19, that probably had additional functions beyond providing living space. See Figures 18 and 19 below, which graphically illustrate the areas of selected features in German Gulch. If we take Edward's estimate of the population as a maximum, this would proportion out to about five individuals per feature, assuming (however without justification) that all were inhabited simultaneously. The rough areas of the features totaled together, but omitting the anomalously large log
Figure 18. Bar graphs of selected feature areas at Localities 30 and 48.
Figure 19. Bar graphs of selected feature areas at Localities 9 and 19, and a graph comparing the largest features at the various Chinese-affiliated localities.
structure at Locality 19, would average about 25 square meters (around 80 square ft.) of living space for each individual. This figure seems ample and perhaps excessive, and should be considered a rough estimate intended merely to suggest the possibility that the Chinese-related features found so far could account for the total population in the gulch at any one time. In fact it is probable that many of the features were not occupied by the Chinese or were occupied at different times. The decline of the Euroamerican population probably meant that a large number of uninhabited buildings were available to the Chinese. Stapp's (1990) study, while lacking hard numbers related to the living space of the Chinese inhabitants of Pierce, Idaho, references anecdotal evidence which suggests that many individuals (up to a dozen) shared small "shacks".

**Chinese Business Establishments**

The historical sources mention four Chinese merchants in or near German Gulch, two or which apparently operated their businesses at the same time. Unfortunately, in most cases it is possible only to offer suggestions and speculations regarding the possible locations of Chinese business establishments in the gulch. Although Features 5 and 6 at Locality 48 appear to almost certainly represent a Chinese store, it is not possible to offer any firm
conclusions regarding which historically-known merchants may be associated with the features.

Edwards (1908) and other sources (BM October 31, 1876; NN November 3, 1876) mention a store operated by Hing Lee. The Butte Miner mentions a merchant named Quong Hing Foo Kee operating a store after Hing Lee's death (BM May 15, 1877). In addition, the 1900 census mentions two merchants. The placement of names in the enumeration schedule suggest that both resided in German Gulch. One household of four people headed by merchant Hing Chin is listed immediately after the Beal family entries in Upper Town. The other lived along with nine other persons, all of which listed their occupation as "mine laborer". The latter group is listed immediately before Thomas Ford, who is known to have placered the gulch below Lower Town (GLO Mineral Entry 87, Mineral Survey 76).

It is possible that Thomas Ford lived somewhere near Silver Bow Creek or another nearby location other than German Gulch. However, the description of the household of mine laborers headed by the merchant offers the distinct possibility that the group resided at Locality 48, and that Features 5 and 6 represent the remains of a store operated by the merchant listed in the 1900 census and possibly others before him.

The large log structure at Locality 19, with an area of 189 square meters (620 square ft) is the best-preserved
of the Chinese-affiliated features in the gulch. Its large size and two-room layout suggests that it may have served as a boardinghouse and/or possibly as a store. The feature could be considered a possible candidate for Hing Lee's store. An 1876 account of his murder suggests that his store included at least two rooms, one of which was his "opium room" (McCleery 1876). Hing Lee owned an interest in the placer mines in Lot 40 (Deer Lodge County deed and mortgage books). A newspaper account relates that his store was located near an "adjoining" claim in which he had an interest (NN November 3, 1876). Although Hing Lee may have owned an interest in other claims besides Lot 40, it seems very possible that his store was in the Lot 40 area, near Centerville. However, Locality 19 is about 700 meters from Lot 40, which seems too far to be considered "adjoining" Lot 40. If Hing Lee's store was near Lot 40, then it may have been long since torn down, or is yet undiscovered.

Structure C at Locality 9 was at one point hypothesized to represent the Nissler Brewery. Testing at the feature failed to recover supporting evidence for this hypothesis, but did recover evidence of a Chinese occupation. It is possible that the structure once served as a brewery, and was later sold to the Chinese, who could have removed many of the brewery-related artifacts. The 1900 census mentions a household of four people headed by
the merchant Hing Chin. This household was listed immediately after the Beals. Since the Beals were known to have lived in Upper Town, it is possible that Locality 9 is associated with Hing Chin and his boarders.

The store represented by Features 5 and 6 and the nearby dump (Feature 28) at Locality 48 provides great insight into the nature of commercial activity in German Gulch and the great variety of goods that would have been available to the residents of the gulch. The archaeological record supplements the somewhat limited historical record that is available. The Butte Miner of August 5, 1876 stated that a store run by "an almond-eyed Celestial" kept "a fair assortment of Chinese notions and many articles that are needed among miners."

Several types of activity are indicated, including gambling, opium smoking, food preparation, record-keeping, and commercial transactions. The rich assemblage of faunal material in Feature 28, which includes the bones of imported fish, indicates the extensive trade network that the store participated in. Floral remains include a coconut shell, and "Chinese olive" pits. Artifacts recovered from the store area and dump also indicate that a wide variety of merchandise was either sold from the store or used by its occupants, including opium, liquor, medicine, clothing, toiletries, mining tools, tableware, hardware and other items.
The Chinese store in German Gulch mirrors the situation pertaining to Chinese commercial establishments in more urbanized settings. The Kwong Wo Tai store in Marysville, California carried a variety of goods, including food, tools, hardware, opium, opium pipes, clothing, ceramics, and other items (Sando and Felton 1993:152-174). The most popular brand of opium carried by the Marysville store was "Source of Beauty", a brand name stamped on all the opium cans found at Locality 30.

Ritchie (1986:570), mirrored by Akins (1992) draws attention to the common use of Chinese coins as gambling tokens. In New Zealand, where Ritchie (1986:38-41) conducted his research, small gambling/opium smoking establishments were more common than Chinese stores. Such establishments tended to be small-scale affairs, requiring only a small amount of capital. The opium cans, Chinese coin, and liquor bottle glass at Locality 30, Feature 2 may indicate that one of these small-scale businesses operated at the site.

Chinese Placer Mine Ownership

The extant information in the Deer Lodge county real estate records indicates that Chinese mined along virtually the entire length of German Gulch at one time or another. Because of the difficulty in determining precisely where the various numbered claims lay, it was
not possible in some cases to determine the exact parcels of ground mined by specific groups of Chinese. However, parcels of land which correspond to Lots 39, 40, and the ground between Lots 40 and 41 can be associated with specific groups or individuals, although in most cases for only limited spans of time. It seems very likely that an 1878 transaction between Thomas Ford and Ah On and Wing Look Tong corresponds to Lot 39. The transaction mentions cabins, but no cultural resource inventory that I am aware of has taken place in this area, which is still patented private ground. Lot 40 is a parcel of patented ground specifically mentioned in numerous transactions, mostly involving the Bo Hing Hong Company. The ground between patented Lots 40 and 41 was almost certainly worked by the Quong Wa Hong Company, and is identified on the mineral survey plats as "Chinese Company" ground. No Chinese affiliated sites have been found on either Lot 40 or the Quong Wa Hong Company ground, although Localities 18, 19 and 30 are nearby.

The ground worked by other Chinese individuals and companies can only be generally delineated. The claim of Lee Fouk lay near the confluence of German Gulch and Silver Bow creek. The Quang Wing Tong company mined in an area which appears to correspond to a portion of Lot 39 in the Old Frederick district.
A transaction involving the Fouey Jee Sung Company mentions a parcel of ground which begins at the confluence of German and Norton Gulches, and extends to the "lower line of ground formerly owned by Thomas Ford" (Deer Lodge County Real Estate Index). Although the lower line of this claim can be ascertained with relative certainty, the upper line is unknown. Thomas Ford owned Lot 37 after 1875, and may have "formerly owned" it. If so, the Fouey Jee Sung Company ground may have encompassed all of Lot 36, which includes a portion of Locality 48.

The Ah Chung Company and an individual named Ah On (mentioned earlier with Wing Look Tong) mined in an area which appears to lie within Lots 37 and 38 in the Central District. Wah Hing and the Wah Shay Hong Company worked ground which lay in the Siberia District above the discovery point, which appears to lie somewhere in the vicinity of Lot 41. Sin Faun and Tua Goen mined in the same general area after 1877. Locality 30 lies within this area.

A series of transactions between 1871 and 1873 involving W.L. Moore and the two McCleerys on the one hand, and the Wah Shay Hong Company on the other hand, mentions "six log cabins" (Deed Book J:248; Mortgage Book C:217). If the parcel of land involved includes Locality 30, then it would provide some insight into the archaeological remains. There are seven features at
Locality 30 which are thought to possibly represent former building locations. The number of features would thus seem to correspond rather well with the real estate records. However, since the parcel cannot be precisely delimited, there is some question as to this correspondence.

**The Social Structure of the Chinese Community**

Information derived from historical research and archaeological investigations tends to support the hypothesis that the social structure of the Chinese miners in the gulch was relatively egalitarian. While certain individuals, such as the merchants and some mine owners, undoubtedly wielded more economic power than others in the community, there is evidence that wealth and power were shared to a significant extent.

The distribution of wealth and control over production is partially reflected in the real estate records. Most of the transactions involving Chinese mention more than one name, suggesting that most of the operations were partnerships. The Bo Hing Hong Company apparently included over 20 partners at one point. Most of the other transactions involved two or more individuals. Only nine of 28 transactions mention just one name, and four of these are listed as some form of "company" which may imply that other partners were
involved. In addition, no single company seems to have controlled any really large portion of the gulch. At one time in the 1870s, there were probably at least five different groups of Chinese mining in the gulch.

The pattern of multiple owners is reminiscent of Sun's (1967) description of groups of miners in China. While certain individuals sometimes provided all of the capital for mining ventures, entitling them to sole control, the forming of partnerships was also common. A type of entrepreneurial system thus obtained. Stapp (1990) hypothesizes that the same sort of entrepreneurial system existed in Pierce, Idaho, where the pattern of claim ownership tended to be diffuse, with the control of production spread among several individuals or groups.

The archaeological evidence in German Gulch also generally supports the hypothesis of an entrepreneurial system. Certain features are larger in area than others, and some features seem to include a richer assortment of artifacts. These would include Feature 5/6 at Locality 48, Feature 2 at Locality 30 and the building at Locality 19. Some of the larger features may well represent multiple-individual households such as boardinghouses run by elite persons. At least two of the localities, 30 and 48, seem to cluster around possible elite households, although the pattern is more pronounced at Locality 48. This may reflect the site's closer proximity to the local
network of trade and communications, and may further suggest the possibility of a particular Chinese ethnic group inhabiting the site.

Some of the features and artifact concentrations probably represent a degree of social stratification consistent with the historical record of several individuals of high status. Feature 5/6 at Locality 48 contained a rich assortment of material remains, and probably served as a business operation that may have included a restaurant and general mercantile. The log structure at Locality 19, while large, may have functioned as a boardinghouse and possibly as a store. Feature 2 at Locality 30 seems to be associated with a richer concentration of material remains, both in terms of density and in economic terms. Such a pattern is consistent with an entrepreneurial system of a few economically dominant individuals, but is nonetheless far from the pattern exhibited in towns associated with lode mining, where social stratification is manifested in different styles of architecture and the presence of run-down areas representing social or ethnic ghettos (Francaviglia 1991:99-115).

Sando and Felton's (1993) study of the mercantile records of the Kwong Tai Wo store indicates that certain types of Chinese ceramics were more valuable than others. Expensive styles include Four Seasons, Four Flower,
Wintergreen (Celadon) and others, while the cheaper brands include Bamboo, Green, and Double Happiness (Sando and Felton 1993:163). The most common Chinese ceramic style recovered to date in German Gulch is Four Seasons ware (Fredlund et al 1991:122). However, nearly all of the specimens were recovered from the area of the Chinese store and adjacent dump at Locality 48. This could be additional evidence of high-status occupants at the store, or could simply mean that a possible restaurant served food in the finest wares. Fredlund et al (1991:129) state that no Bamboo ware, one of the cheaper styles, was recovered. This was thought to be significant in light of its relative abundance at other historic Chinese sites. Its absence from German Gulch may be an indication that the Chinese population as a whole was relatively affluent.

McCleery (1876) states that merchant Hing Lee spent considerable time smoking opium, "like all Chinamen who can do so". McCleery may be implying that there were some who could not afford the habit. Wylie and Higgins (1987:318) cite "knowledgeable but disinterested" nineteenth century sources that estimate that 20-45% of the Chinese community in California indulged in the drug. The Kwong Tai Wo store in Marysville, California sold more value in opium than in any other commodity (Sando and Felton 1993:167), and its use was probably widespread in many areas besides California. Opium was available in a
number of different grades, ranging from recycled opium bowl scrapings to superior grades that offered either good flavor and/or a high morphine content (Wylie and Higgins 1987:323). Two of the more costly brands were "Source of Beauty" and "Abundant Luck". "Source of Beauty" was the most common brand sold at the Kwong Tai Wo store (Sando and Felton 1993:171).

All of the opium cans found in 2000 at Locality 30 were stamped with the "Source of Beauty" brand name. This might suggest a relative degree of affluence among the Chinese at Locality 30. Wylie and Higgins (1987:362-365) relate that opium use was related to a variety of behaviors including social smoking, and therapeutic treatment to ameliorate the effects of hard labor. They note a higher proportion of opium pipe parts to culinary ceramics in rural sites vs. urban sites, and tentatively suggest that opium use was more widespread in work camps located in rural settings. This might account for the apparent high incidence of opium-associated artifacts in German Gulch.

A relatively even distribution of wealth in the Chinese placer camps of German Gulch mirrors nineteenth century placer camps in general. The varying fortunes of placer mining in the early camps tended to level out class or status distinctions. According to Greever (1963:57), the miners did not "...think that any honest occupation,
however menial, affected a man's social standing. Theirs was a very democratic country where strokes of fortune often placed many in far different positions than they had previously occupied. Social stratification tended to become more ingrained with the rise of hard rock mining, which required a degree of capitalization that was often beyond the capacity of individual or even united local interests (Greever 1963:86; Smith 1967:199-201).

**Ethnic Relations**

Edwards' (1908) mention of two Chinese groups in German Gulch, the "Ya Ups" and "See Ups", provides an important clue to the nature of social relations in German Gulch. In fact, the groups Edwards refers to were most likely the Sam Yups and Sze Yaps, two distinctive groups from Kwangtung province. The fact that "they did not quarrel among themselves [but] had little to do with each other" suggests that peaceable relations depended to a large extent on avoidance.

The fact that the groups were divided on a regional basis perhaps facilitates comparison with Armentrout-Ma's (1983) differentiation of phases in the evolution of Chinese social organization in California between 1849 and 1898. Armentrout-Ma's "Regional Phase" lasted from 1849 to 1870. The latter date corresponds with the approximate date of arrival of the Chinese to German Gulch, which
suggests some lag time between the California and Montana pattern. The Regional phase involved increasing differentiation of regional loyalties as more Chinese from different districts in China moved into an area. Hui-kuan, or regional associations, proliferated. Between 1870 and 1898, "things became considerably more complicated" and regional associations lost influence relative to the surname associations and tongs. The changes came about due to a variety of factors, including an increase in the numbers and complexity of the Chinese community, a movement from rural to urban areas, and increasing economic competition with the Euroamerican community which had the effect of reducing employment opportunities for the Chinese (Armentrout-Ma 1983:119-120).

The fact that the German Gulch Chinese seem to have made regional distinctions among themselves suggests a lack of the types of factors which led to Armentrout-Ma's second phase. That is, the Chinese community was still relatively small, was rural-oriented, and not in economic competition with the dominant society. Armentrout-Ma's second stage seems to correspond rather well with the pattern exhibited by the Chinese community in Butte in the period ca. 1880-1930, when the Chinese were differentiated mainly by surname and tong membership (Lee 1978:173,227-232).
The Sam Yup, despite representing a small proportion of the Chinese in the U.S., were economically powerful. They reportedly controlled many of the large import-export firms in California as a result of business connections in southeast Asia and throughout the United States (McLeod 1947:223-225; Armentrout-Ma 1983). Cook (1931) states that the Sam Yups in San Francisco refused to sell goods to the Sze Yaps. It is possible that the rather exotic fish and floral remains and Chinese ceramics recovered in German Gulch reflect these trade connections. However, in the absence of detailed information on the store owners in German Gulch, such suggestions, while intriguing, must remain in the realm of speculation. In short, there appears to be little that can be conclusively stated regarding the internal segmentation of the Chinese as reflected in material culture.

However, numerous types of artifacts and other remains can be used to differentiate Euroamerican from Chinese occupations. These include opium cans, Chinese styles of ceramics, Chinese coins, and some types of faunal remains such as exotic fishes and butchered cat bones found at Locality 48. Though it is certainly possible that some of these remains could be associated with Euroamericans, their association with Chinese appears far more likely.
A tantalizing bit of evidence for ethnic conflict exists in the accounts of the murder of Hing Lee. If Edwards (1908) is correct in his account of the hatchet "calling card", it would strongly suggest the presence of at least some intraethnic conflict in the gulch (see accounts and descriptions in McLeod 1948; Armentrout-Ma 1983). In addition, McCleery's (1876) description of a particular form of killing—"the use of a knife... after he had been stunned by a blow on the head", suggests that McCleery considered this a distinctly Chinese modus operandus. Nevertheless, the theft of a significant value of property and money also suggests robbery as a motive (Edwards 1908; McCleery 1876; BM October 31, 1876).

Relations between the Euroamericans and Chinese in German Gulch seem to have been mostly amicable. W.R.H. Edwards lived for many years in German Gulch, and conducted business transactions with the Bo Hing Hong Company (Deed Book M:181; Mortgage Book D:545). Edwards had a high opinion of the Chinese:

I must in truthfulness say they are industrious, liberal, hospitable, and honest, and for frugality, cooperativeness and industry they can give some of the white race cards and spades and win cut (Edwards 1908).

In another passage, Edwards heaps more praise on the Chinese, and incidentally indicates the degree of mutual
aid and cooperation that existed within at least certain segments of the Chinese community:

Though not of our race, yet I must say they were mostly honest and quiet law abiding citizens. Their charitable acts toward one another also stood out. Every winter quite a number of their unfortunate friends would come from Butte and other camps to these companies in the gulch, and would be cared for, fed and clothed with commendable kindness, showing us who claim superior civilization that we are not the only followers of the lowly Son of Galilee (Edwards 1908).

Despite these sentiments, the high number of handgun cartridges at Locality 48 strongly indicates that self-defense was a definite concern among at least some of the Chinese in German Gulch. In addition, the murder of Hing Lee and others offers strong hints that the threat of violence was a fact of life in the gulch. No acts of violence or oppression stemming from the dominant white society are documented in German Gulch specifically, but it must be noted that the Chinese formed a clear majority of the camp's residents by the mid 1870s, and were perhaps not viewed as economic competitors. However, the threat of violence need not have stemmed from ethnic conflict. Due to the nature of the business they were engaged in, the Chinese at times probably possessed considerable quantities of gold, and may have been targeted by robbers.

An important question relates to the theoretical basis for analyzing segmentation among the Chinese community. To a large extent, this depends on one's
definition of ethnicity. Fredrik Barth (quoted in Jenkins 1997:12) offers a rather general definition of ethnicity as the "social organization of cultural differences" constructed and reified. Comaroff (1987), who offers a more explicit definition, draws a distinction between what he calls "totemic consciousness" and "ethnic consciousness". Both are seen sets of social relations which, while utilizing similar principles in the "marking" of relations, differ significantly in substance. Totemism "...refers to the subjective classification...into social entities according to cultural differences..." while ethnicity not only involves subjective classification, but also "...the stereotypic assignment of these groupings-often hierarchically- to niches within the social division of labor" (Comaroff 1987:304). While the marking of relations is seen as primordial in nature, the form of consciousness which is dominant at any one time is seen as contingent, and largely historically specific. In general, totemism is defined as a system of classification among peoples in non-state societies, while ethnicity is associated with the rise of state power. Comaroff however does note the presence of state societies constructed of totemic segments (Comaroff 1987).

Moser (1985:215-216) is explicit in pointing out the stereotyping, avoidance and intermittent conflicts that marked relations between the Sam Yup and Sze Yap peoples.
in China. The Sam Yups, who resided in the city of Canton, looked down on the largely rural Sze Yap, who they characterized as "ridiculous rustics". Armentrout-Ma (1983) and Cook (1931) point to a degree of conflict and economic inequality between the two groups in California. Edwards (1908) states that the two groups in German Gulch "...had little to do with each other." Utilizing Comaroff's distinctions, it seems likely that the Chinese groups in German Gulch could be defined as ethnic in nature. However, in the absence of more specific documentation of relations between the Sam Yups and Sze Yaps in the gulch, such a characterization must be offered tentatively.

The reader will note that I have used several terms interchangeably in reference to "internal divisions" within the Chinese community (e.g. "intraethnic", "segment", etc.). This perhaps reflects the contingent and indistinct nature of ethnic categorization in reference to the Chinese immigrants. For it seems apparent that to the dominant society, the Chinese were (and are) viewed as a single group, regardless of how they categorized themselves. There therefore seems to be a dual aspect regarding the identity of the overseas Chinese in the United States, and probably elsewhere.

Immigrants typically recreate their sense of identity, becoming neither what they once were nor what
the host society wills, but something entirely new (Banks 1996:66). While the dominant society viewed the Asian newcomers as "Chinese", it seems likely that they also viewed themselves according to other categories with which the host society was not conversant. "Chinese" is expected to have been a category of some meaning, especially in connection with twentieth century Chinese nationalism and also vis a vis the dominant society. However, in the context of "Chinese-Chinese" relations, it is apparent that other principles of segmentation, of a more "local" character, asserted their dominance.

Possible Avenues of Future Research

This study has undoubtably raised more questions than it has answered. The cherished goal of finding conclusive evidence regarding the possibility of discreet clusters of intraethnic-related settlement (i.e., the hypothesized Sam Yup/Sze Yup sites/claims) was not accomplished. However, certain issues which arose during the research suggest several avenues and approaches to future research. It is hoped that archaeologists studying Chinese communities in the future will deal head-on with questions of ethnic divisions among the Chinese.

The area in the Old Frederick district, at the north end of German Gulch, has not been inventoried for archaeological sites. The real estate records mention the
presence of structures in the area (including a "China Cabin"), and it is likely that Chinese-affiliated remains would be found in this area.

The metal detector proved particularly adept at finding non-ferrous artifacts, such as opium cans. Additional Chinese sites could be found in German Gulch simply by detecting the presence of opium cans. This approach could be tried in the Lot 40 area, which was known to have been worked by Chinese but which has so far failed to yield evidence of Chinese occupation. Lot 40 apparently includes at least a portion of the settlement of Centerville. Localities documented in this area include two stone foundations (Localities 21 and 22), and a "collapsed shed" (Locality 23), as well as mining-related features such as placer tailings (Herbert 1988). A metal detector survey in the Lot 40/Centerville area could locate opium cans, Chinese coins, or other artifacts indicative of Chinese occupation.
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