

IBERO-AMERICANA: 23

THE CONFLICT BETWEEN
THE CALIFORNIA INDIAN AND
WHITE CIVILIZATION: III

S. F. COOK

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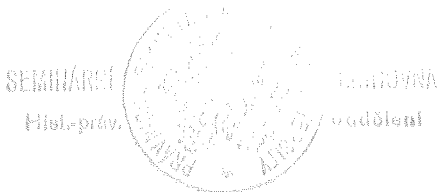
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THE CONFLICT BETWEEN
THE CALIFORNIA INDIAN AND
WHITE CIVILIZATION

III. THE AMERICAN INVASION, 1848-1870

BY

S. F. COOK



UNIVERSITY OF CALIFORNIA PRESS
BERKELEY AND LOS ANGELES

1943

IBERO-AMERICANA: 23

EDITORS: C. O. SAUER, LAWRENCE KINNAIRD, L. B. SIMPSON

115 pages

Submitted by editors February 13, 1942

Issued April 20, 1943

Price, \$1.25

UNIVERSITY OF CALIFORNIA PRESS
BERKELEY AND LOS ANGELES
CALIFORNIA

CAMBRIDGE UNIVERSITY PRESS
LONDON, ENGLAND

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PRINTED IN THE UNITED STATES OF AMERICA

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The American Invasion, 1848-1870

INTRODUCTION

WHEN THE CALIFORNIA INDIAN was confronted with the problem of contact and competition with the white race, his success was much less marked with the Anglo-American than with the Ibero-American branch. To be sure, his success against the latter had been far from noteworthy; both in the missions and in the native habitat the aboriginal population had declined, and the Indian had been forced to give ground politically and racially before the advance of Spanish colonization. However, the nonmission Indian had demonstrated a certain power of resilience and, in the realm of physical activity, had been able to evolve a new behavior pattern which, if he had been left alone, might have permitted him to cope on fairly even terms with the invading race. The valley and northern tribes were evincing a fair capacity for adaptation, in the strictly material sense, to the new environment imposed by the entrance of a new biological group. Furthermore, the native culture had by no means utterly collapsed. To a certain extent in the missions and predominantly in the aboriginal habitat the Indian had retained his primitive social and religious character and, indeed, had appropriated a few features of the white civilization, modifying them and incorporating them into his own system.

When the Indian was forced to withstand the shock and impact of the Anglo-Saxon invasion, his failure in all these respects was virtually complete. In the physical and demographic spheres his competitive inferiority was such as to come very close to bringing about his literal extermination. His social structure was not only utterly disorganized, but almost completely wiped out. Culturally, he has been forced to make a slow, painful adjustment, ending with the adoption of the alien system, and he has now lost all but fragments of the aboriginal pattern. The present study undertakes to describe some of the processes involved in this racial failure and some of the factors determining its extent.

Without embarking upon any attempt to analyze the differences

between the Anglo-American and Ibero-American personality, social order, or culture, certain points of divergence between the two groups may be mentioned briefly in so far as they affected Indian relations in California. Perhaps these points may be allocated to two prime categories: differences in mode of colonization and differences in economic and social attitude toward the aborigine.

The divergent Indian reaction to Spanish clerical authority, as demonstrated by the mission neophytes, and to Spanish civil authority, as shown by the unconverted interior tribes, is clear evidence that the two modes of interracial contact were fundamentally different. The opinion may be advanced that the determining factor was aggregation versus dissemination. The fatal effects of the altruistic mission lay, first, in the removal of the native from his original habitat and, second, in his subjection to continuous close association with the foreign environment and race. The relative preservation of the gentile element was due to the failure of the Spanish actually to occupy the territory of the Indian. This same distinction in the type of interracial contact appears when the Spanish system as a whole is contrasted with the American.

The great interior of the state was penetrated many times by the Spaniards. Repeatedly they entered the lands of the Indians, but they did not settle and stay on these lands. Between the frequent but still temporary foreign incursions the natives were able to maintain their life and social order more or less unaltered. At least they were not called upon to make any continuous and permanent adjustment to a change in their own environment. When the Americans arrived, they took over the Indian habitat and made it their own. The aborigines were forced, therefore, to adapt themselves, on their own ground, to a new environment. The final effect was precisely the same as if they had been bodily removed and set down in a strange region. They were subjected not to invasion but to inundation.

Another factor of significance here is that of numbers. Other things being equal, the intensity of conflict and the weight thrown against the primitive group will roughly follow the numerical strength of the new or invading species. This general principle has been demonstrated repeatedly with the lower organisms in their parasite-host or

predator-prey relationships, and it holds similarly for human beings. The Spanish type of colonization was such that the invading and ruling caste or race was always small in numbers. In California, for example, the whole coastal strip was taken and held by little more than one hundred persons. By 1845 the entire population of the *gente de razon* did not exceed 4,000. Against this may be set the native population of over 100,000. The Americans, on the other hand, entered the region in great numbers. Undoubtedly they would have continued to do so, for by 1848 they were already coming in by the hundreds. Owing to the fortuitous discovery of gold in that year, however, they poured in by thousands to flood the country. Furthermore, because of the nature of mining, they swarmed in hordes into those hill and mountain retreats which the Spaniards had never even penetrated. The Indians, therefore, were overwhelmed by tremendous numbers of aliens at all points and at much the same time. The conversion of their vast primitive range and habitat into a group of civilized communities was thus accomplished in an incredibly short period.

Both branches of the white race arrived on the Pacific Coast with a heritage of long experience with the Indian; both had developed a well-formulated mental attitude and a definite policy with respect to the natives. But these attitudes and policies were conditioned by the widely differing pioneering and colonial experience of the two branches in the preceding centuries. Both Anglo-Saxons and Spanish had pursued an avowed course of exploitation of New World resources. The Spanish, however, had systematically availed themselves of human resources, whereas the English had tapped only material wealth. Whatever the causes of the divergence, by the nineteenth century the Ibero-Americans consistently followed the procedure of utilizing the natives and incorporating them in their social and economic structure, whereas the Anglo-Americans rigidly excluded them from their own social order. It followed, therefore, that in opening up California the Spanish system undertook as far as possible to employ the Indians, even by force, in useful pursuits. This in turn meant that the aboriginal race was an economic asset and as such was to be conserved. Destruction of individual life occurred only when and if the Indian actively resisted the process of amal-

gamation or definitely failed to conform to the conqueror's scheme of existence. Wholesale slaughter or annihilation was definitely undesirable.

The Anglo-American system, on the other hand, had no place for the Indian. If the latter could of his own initiative find subsistence within its framework, there was a priori nothing to prevent such adjustment. But if there was any conflict whatsoever with the system, the native was to be eliminated ruthlessly, either by outright extermination or the slower method of segregation in ghettolike reservations. Accompanying this economic difference was another divergence of great social significance. The Spanish colonial system always envisaged the retention of the native as the basis of the population and simultaneously encouraged racial mixture. The result was naturally widespread hybridization, especially among the lower classes. Thorough and complete mestization, as in some parts of Spanish America, would have resulted in the disappearance of the California Indian as a pure line strain but would not have destroyed his race or eliminated it as a factor in the body politic. Nor would it necessarily have involved long and bloody physical conflict during the period of racial reorganization. The American civilization, on the contrary, viewed miscegenation with the greatest antipathy and relegated the mestizo, or half-breed, to the same status as his Indian parent. Consequently, no blood bond could ever become established which would mitigate the indifference and contempt with which the Indians were regarded.

These, and other differences, were reinforced by a powerful tradition relating to the Indian. Among the Ibero-Americans, the Indian was regarded, if not with definite attachment, at least with tolerance and sympathy, as perhaps not yet an equal but as a human being entitled to the rights and privileges of his class. His life was almost as sacred as that of a white man; his soul was entitled to salvation. He was permitted to testify in court. Theoretically, his property was inviolate. At best, he could participate in civic and political activity; at worst, he was deemed a child before the law. This fundamentally friendly attitude was seldom manifested by the Anglo-Americans. The latter, coming fresh from two centuries of bitter border warfare and intolerant aggression, brought with them an implacable hatred of

the red race, which made no discrimination between tribes or individuals. All Indians were vermin, to be treated as such. It is therefore not surprising that physical violence was the rule rather than the exception. The native's life was worthless, for no American could even be brought to trial for killing an Indian. What little property the Indian possessed could be taken or destroyed at the slightest provocation. He had no civil or legal rights whatever. Finally, since the quickest and easiest way to get rid of his troublesome presence was to kill him off, this procedure was adopted as standard for some years. Thus was carried on the policy which had wiped out *en masse* tribe after tribe across the continent.

In comparing the objective effects wrought by the Ibero-American and Anglo-Saxon civilizations on the native population, it must not be supposed that the differences just mentioned were absolute, for human nature is much the same everywhere, despite policies and tradition. The Spanish at times certainly resorted to barbaric physical violence, and the Americans frequently treated their Indians with humanity and justice. Nevertheless, the broad tendencies were apparent and were reflected in the details of the two types of racial contact.

MILITARY CASUALTIES, 1848-1865

During the early years of American occupation, the Indians were subjected to constant attrition through direct physical conflict. It would serve no useful purpose to recount in detail the multitude of minor wars and skirmishes which occurred in central and northern California. Some study of these, however, is necessary in order to derive an idea of the actual losses suffered from this cause.

The first stage of conflict lies between 1847 and 1852. During these five years, settlers began appearing in the interior valley and along the north coast. Their number was rapidly augmented by the hordes of adventurers during the days of '49. Action against the natives consisted almost entirely of small personal combats and fights between individuals and little groups. The only record they have left is in a few early newspapers, in diaries and reminiscences, and in such secondary works as county histories. A few affairs of sufficient magnitude to cause general comment found their way into these accounts. As

for the rest, they are covered by unspecific statements concerning the general state of affairs. Such incidents as can be actually localized have been included in the present compilation, but it is obvious that homicide was vastly more extensive than is indicated here. Subsequent to 1852 we are able to draw extensively on the contemporary press accounts. Indeed, the newspapers provide the principal source of information on Indian affairs for this period.

The use of diaries, later histories, and particularly newspapers as a basis for setting up a numerical compilation of Indian losses will be immediately subjected to the criticism that the information supplied by white men on the scene at the time or afterward from memory is likely to be highly inaccurate. It must be conceded that this is frequently true with respect to detail and to individual encounters. But this objection may lose some of its force when we deal with an aggregate covering a large territory and a long time.

Let us grant that usually the reported number of Indians killed, whether in private raids or military campaigns, was in excess of the actual immediate deaths, and let us further assume that the exaggeration amounted on the average to 100 per cent. Then the apparent total over a period of years would be double the real total. But here the compensating factors enter. In the first place, by no means all encounters were recorded in writing at the time or subsequently. Particularly in the confused days of the mining rush hundreds of natives must have perished without trace at the hands of lawless miners in the Sierra foothills or along the Trinity and Klamath rivers. Even later, countless small parties of farmers and other settlers fought off raiding Indians or attacked their villages. We have no means of estimating the mortality thus caused, but it must have constituted a material proportion of the total. In the second place, the reports invariably mention the Indians killed on the spot. There is never any reference to those who afterward died of wounds. In most military operations by civilized armies the fatalities from wounds equals those on the battlefield. Hence, this cause alone would compensate for most of the exaggeration. For these reasons it is justifiable to accept the aggregate recorded deaths as representing somewhere near the true mortality inflicted by force of arms.

The statistical data have been assembled in a series of tables, placed in the Appendix. Table 1 has been taken from a previous study which dealt with the Indians during the Spanish period.¹ It includes such figures as are available with reference to the population of the Indians from aboriginal times to 1880. To reports derived from the written literature have been added personal estimates by the author. Table 2 shows estimates for the population in 1848, 1852, and 1880. Statements or calculations from other writers have been used, when such exist. Most of the items, however, represent personal estimates, based upon outright interpolation. Although these estimates can lay no claim to absolute accuracy, they have been made with care and with reference to the known course of tribal history. They are the best we can obtain under the circumstances, and we may employ them with the assurance that they are sufficiently close to the facts to serve as indices to the general trend of events. In table 3 are placed the Indian losses from 1847 to 1865 for which specific record exists. The sources of these figures are also appended. The table includes only those stated to have been killed. Only those engagements are included for which there is at least one clear reference in the available literature. When more than one account exists, the estimates have been cross-checked. Under these circumstances, the lowest figure has been accepted, or else the statement from what appeared to be the most reliable account. When the report reads "few," "several," "many," it has been necessary to assign a numerical value. When other information has been lacking, a uniform system has been adopted: a "few" is taken as 5, "several" as 10, and "many" whatever a conservative evaluation of the circumstances has seemed to warrant. This is a makeshift method at best, but it is believed that the error in the final result lies on the side of understatement rather than overstatement. In table 4 certain parts of tables 2 and 3 are combined, in order to show the losses in relation to the population decline. The dates for population are 1848 and 1880, whereas the mortality by homicide is given for the period 1848 to 1865 inclusive. The error involved in attempting a population estimate for 1865, by interpolation in table 1, appears too great to warrant such

¹ S. F. Cook, *Conflict between the California Indian and White Civilization: II. The Physical and Demographic Reaction of the Nonmission Indians*, Univ. Calif. Publ., Ibero-Americana, No. 22 (Berkeley, 1943).

an attempt. On the other hand, since all acute fighting had ceased by 1865, it is not worth while to add the few scattering deaths from then to 1880. Therefore, the percentage of the diminution from 1848 to 1880 ascribed to warfare was actually incurred in the first half of this period.

From table 4 of the Appendix it may be observed that over the entire territory somewhat more than 4,000 Indians lost their lives in physical conflict with the Americans and that this number denotes approximately 7 per cent of the entire population decline up to 1880. Although we can attempt no detailed calculation by tribes of the population in 1865, we have two rough estimates of its value (see Appendix, table 1).² These are 27,800 and 16,800 for 1865 and 1866 respectively. If we use the average (22,300) as a rough approximation, the proportion of the decline due to warfare is found to be only slightly higher, 8.6 per cent. The corresponding value for the Spanish period (1800-1848) is somewhat, but not materially, greater, between 11 and 12 per cent.

The overall value for the entire territory, as thus presented, is not, however, a complete index to the severity of the losses suffered by the Indians in restricted regions. Table 4 of the Appendix includes certain tribes—in particular the Chumash, Salinans, Costanoans, and Coast Miwok—which were in an advanced stage of decay by 1848 and which were not so situated as to incur any American hostility whatever. They might, therefore, be omitted entirely. The Yokuts, part of the Sierra Miwok, the Southern Patwin, and the Pomo had been decimated and enfeebled by missionization and a long struggle with the Spanish. Consequently, they offered but a modicum of resistance to American settlement. Concerning the Western Mono, the Wappo, and the Lake Miwok we have no definite data, which accounts for the absence of any mortality records for these tribes. If we exclude all the tribes which for various reasons are doubtful or of marginal value, we may focus attention on those which had not been subjected to much or any Spanish influence and which encountered the American invasion in the fresh, aboriginal condition. These give the best index to the effect of the powerful physical blows struck by the American pioneer. Among the Maidu, Wintun, Yana, Achomawi, Shasta, and

² Made by D. W. Cooley in his reports to the Commissioner of the Bureau of Indian Affairs in 1865 and 1866.

the northwestern tribes, 12 per cent of the losses was due to homicide, rather than 7.

It is noteworthy, and perhaps significant, that the relative loss in population was substantially the same among those tribes which first encountered American invasion as among those which first met the Spanish. If any conclusions may be drawn from this fact, they are (1) that pressure exerted by force of arms was very much the same regardless of what race wielded them, and (2) that the more rapid and complete collapse of the native population when opposed to the Americans was due to factors other than purely physical assault.

SOCIAL HOMICIDE

The mortality discussed in the previous section pertains strictly to armed conflict between the races. It includes casualties sustained in formal campaigns and informal expeditions in which the avowed purpose of the whites was to kill, chastise, or otherwise subdue the natives. It also includes operations of a joint or individual character conducted for the purpose of defense against Indian raids and general native depredations.

There occurred, however, throughout the period we are considering, a continuous series of violent deaths among the Indians of a type which cannot be designated as military, but which is better regarded as social. To this category would be allocated killings directly attributable to the social conditions under which the natives were obliged to live and which would normally not occur either in aboriginal surroundings or, to a measurable extent, in a peaceful and well-ordered white community. Among such direct causes of death would be murders of Indians committed by whites or Indians as the result of quarrels, brawls, liquor, women, or revenge for injury, to which would be added executions or lynchings for various crimes, and internecine fighting among Indians arising immediately from the social conditions imposed by the whites. Sometimes it is pretty difficult to draw a clear line between military and social homicide but, if we eliminate obvious borderline cases, the two categories are reasonably distinct.

In absolute numbers, the significance of social homicide in reducing the Indian population was not great. The chief value in studying it,

however, rests upon the fact that it provides an interesting yardstick by which racial conflict can be measured and from which certain basic principles can be derived.

A total of 289 social homicides have been included in table 5 of the Appendix, covering the years 1852 to 1865 inclusive. Although this list cannot be regarded as definitive, it is representative and reasonably complete. The source in all cases was the daily press for the years studied. Whatever may be said concerning the unreliability of newspaper accounts of battles and raids, there is no good reason to question the accuracy of reporting in connection with purely local incidents, at least as far as the main facts are concerned. If an Indian was killed in a barroom brawl or was lynched by miners, that fact itself may be accepted, even though we eliminate all embroidery of detail. Moreover, if the participants were drunk at the time or quarreling over a squaw, a statement to that effect has a high probability of truth. It seems legitimate, therefore, to use the contemporary press as a running history of small, concrete events of social importance.

A further criticism of the method might be that many of the newspapers then printed have since been lost and that to get a complete picture covering the entire area is now impossible. To a certain extent, this objection has validity. However, it may be answered in the first place that the lack of completeness in our present files should not inhibit us from using what we have. In the second place, it should be pointed out that we have unbroken files of a few very important newspapers. These were the *Alta California*, *San Francisco Bulletin*, *Sacramento Union*, and *Marysville Appeal*. These journals, as was the habit with large city papers of the time, made a practice of systematically copying nearly every item of interest from the small country weeklies. As a result, we have remarkably good coverage of the local news in central and northern California. Since in the 'fifties and 'sixties any happening of a violent or fatal nature was of interest to readers, such occurrences were among the first to claim space. It is the belief of the writer, therefore, that a sound and adequate sampling of social killings has been secured from a careful page-by-page examination of the four journals mentioned. In addition, some papers of smaller circulation, which are available in the Bancroft Library and the State Library

at Sacramento, were examined, and it may be noted that very few additional items were thereby obtained.

It is now possible that these social homicides may be used directly to study the degree of conflict between the white and red races. Certain preliminary assumptions must be made. It may be postulated that interracial homicide³ is an outward manifestation and a tangible product of racial conflict and competition. Such a phenomenon could not occur if the two races were separate spatially from each other, nor would it occur if they were living together in a state of unanimity and concord. If this premise is allowed, then it follows that the more intense the conflict, the more extensive will be the social maladjustment and the greater will be the tendency for the latter to become manifest in deeds of violence.

To reinforce this train of reasoning and to place it upon more than a theoretical basis it would be desirable if some concrete relationship could be established between intensity of conflict and social homicide. For the latter variable we have moderately acceptable data, the material in table 5. We still need an expression for intensity of conflict. Obviously, many factors will be concerned here, not all of which can be formulated quantitatively or numerically. However, it is possible to make a very simple general assumption which will include most of the inherent factors: that the intensity of conflict depends upon both the number of white men and the number of Indians which compose any given social unit or community. Since the magnitude of the group contact is equivalent to the sum of the individual contacts and these depend upon the number of individuals present, it follows that the intensity of conflict may be represented by the arithmetical product of the two populations.

The reasoning employed here is at least superficially similar to that underlying the principles of chemical kinetics. According to classical physical chemistry, in a bimolecular reaction the velocity is a function of the product of the concentrations of the two reactants: i.e., the number of active particles of each per unit space. The analogy is carried still further by the implicit assumption that, as molecules or ions are

³ This would include also killing of Indians by other Indians as a result of social, moral, or economic conditions imposed by the propinquity of white men.

conceived by the kinetic theory to be in a constant state of vibratory motion, so the active units in a social test tube are likewise considered to be in continuous motion. Hence, the chemical reaction depends upon the probable number of collisions of particles, and, by analogy, the observed effect of the social reaction, here homicide, is a function of the collisions between personalities. The analogy, of course, breaks down in detail. In particular, with social kinetics the effect of collision is not equal and opposite but unilateral. The white man affects the Indian, but the Indian does not affect the white man. Since this is so, a simple product of populations is doubtless not an exact expression of the relationship. However, it is worth a trial as a purely empirical mode of expression and as a first approximation in a quantitative sense.⁴

The homicide data in table 5 includes the period from 1852 to 1865. The corresponding population data should, therefore, cover the same period. However, owing to the scattered and rather uncertain population statistics, this arrangement is not feasible. In the table, the killings are divided into eight groups, more or less along tribal lines. The Maidu, Miwok, Shasta, Wintun, Yokuts, and Pomo are designated by their tribal names. In the entries for the natives of northwestern California, the dislocation of ethnic units during the 'fifties makes it impossible to assign specific incidents to the proper tribes. Consequently, the area is considered as a whole. The same considerations apply to the former mission Indians of the central coast. Now from table 1 there can be derived a reasonable estimate for the population of each of these eight groups in 1848 and 1880. Since the intermediate values are not subject to close calculation, the best we can do is to take the mean of the 1848 and 1880 values, although this is admittedly unsatisfactory. For the white population the United States census for 1860 may be used. A good deal of error is introduced here also, because the population shifted considerably in many localities from 1852 to 1865, and the returns for 1860 do not necessarily signify mean values. However, no better data are available. Finally, it is necessary to allocate from the

⁴ Another possible approach would be that of the predator-prey relationship, which has been studied recently by biologists. However, this type of conflict includes an indirect effect on the predator through reduction of food supply. In the Indian-white complex, there is no reverse effect on the whites as a result of the reduction of Indians.

county census reports the proper number of white inhabitants to the area occupied by each of the eight groups. This must be a frank estimate in certain instances when the tribal boundaries did not coincide with county lines.

By means of the procedures here outlined, the totals for Indian and white populations were established as closely as possible. Then the products were tabulated. Finally, the social homicides were correlated with the population products. The value of the coefficient, r , was then determined by the customary method and was found to equal 0.906. Such a high value, which certainly possesses statistical significance,⁵ is remarkable in view of the relatively crude means of setting up the variables. It certainly indicates—although, of course, it does not prove—that the assumptions here made are reasonable. Until a more precise formulation can be advanced, we may conclude that intensity of conflict may be expressed in terms of population product and that at least some social and biological phenomena were a direct function of contact intensity.

The direct effect of social homicide on the Indian population decline was not great. For the eight groups tabulated, the percentage of the diminution from 1848 to 1880 attributable to this source was as follows: Maidu 2.1, Sierra Miwok 1.1, Shasta 0.73, Wintun 0.28, northwestern tribes 0.23, Pomo 0.34, Yokuts 0.10, mission Indians 1.45, the eight groups collectively 0.58. Since the general average is less than 1 per cent, it cannot be regarded as particularly significant when contrasted with the much greater mortality due to other causes.

DISEASE

The second primary or proximate cause of the high native mortality was undoubtedly disease. The present writer has had occasion to investigate the influence of disease on the population of three other groups. For the natives of Lower California from 1697 to 1773, this factor was found to account for approximately 35 per cent of the popu-

⁵ According to G. W. Snedecor (*Statistical Methods* [Ames, Iowa, 1937], p. 125), for a set of variables having 8 degrees of freedom, the value of r at the 5-per cent level is 0.602, and at the 1-per cent level is 0.735. A coefficient of 0.906 would, therefore, be regarded as "highly significant." The same data have yielded a chi-square value of 5.03, which is likewise definitely significant.

lation decline.⁶ In the missions of Upper California, the value was placed at 45 per cent for acute and epidemic disease, with a possible 60 per cent if the indirect effects of syphilis are included.⁷ Among the wild tribes in direct contact with Spanish colonial California, at least 60 per cent of the mortality was referable to sickness.⁸ It would be expected, therefore, that in the American period a similar ratio would hold.

Our evidence concerning illness among the Indians consists, as is common in such circumstances, of casual references by persons writing on other subjects, or of very general statements. In addition, there are a few news items in the daily press and a number of more or less specific comments by Indian-reservation agents. In order to adduce and organize the existing information, it is not practicable to consolidate data in the form of a comprehensive table, as was done with military and social killing. Numerous verbal statements must be abstracted or quoted.

We may consider first syphilis and gonorrhoea, since these maladies were universal and since, in their social implications, they stand apart from ordinary contagions. Venereal disease had already established a foothold among the native tribes before the advent of the Anglo-Americans. The mission Indians were very heavily infected—almost 100 per cent, if we may lend credence to the lamentations of the mission fathers. Carried by white men and neophyte fugitives, the infection had spread to the interior, possibly by 1800 and certainly by 1830. The central valley peoples and those of the north Bay country were well impregnated before 1845. The effect of the American influx, then, was merely to extend and intensify the existing condition by bringing in fresh sources of infection and spreading it, particularly in the north and northwest, to tribes which had previously escaped. No new principles would be brought out by following this process in detail. The primary consideration here is the intensity of the infestation.

Apart from numerous casual and uncritical persons, several highly

⁶ S. F. Cook, *The Extent and Significance of Disease among the Indians of Baja California, 1697-1773*, Univ. Calif. Publ., Ibero-Americana, No. 12 (Berkeley, 1937).

⁷ S. F. Cook, *The Conflict between the California Indian and White Civilization: I. The Indian versus the Spanish Mission*, Ibero-Americana, No. 21 (1943).

⁸ *Ibid.*: II. *Reaction of the Nonmission Indians*, Ibero-Americana, No. 22 (1943).

competent observers and students have left us their impressions. One of the earlier travelers, Bryant, says:

All these Indians . . . are weak and unvigorous. . . . But what most injures them, and prevents propagation, is the venereal disease, which most of them have very strongly.⁹

The modern ethnographer, Loud, thinks that these pests were introduced shortly after 1850 in the northwest.¹⁰ Gonorrhoea, according to him, was particularly bad¹¹ and was assertedly very widespread. Stephen Powers describes the introduction of syphilis among the Karok, and adds an interesting cultural note.¹² When the disease first appeared, the Karok deliberately infected themselves in order to communicate it to their enemies. The result of this novel method of warfare was, as Powers puts it, "disastrous in the highest degree." The full-blood Yurok Lucy Thompson, writing in 1916, thus describes the effect of syphilis on her people:

I have today looked among my tribe . . . and am deeply grieved to find but very few babies born of good, pure blood, that is not tainted with the virus of venereal diseases.¹³

T. T. Waterman in his careful study of the Yana states that in 1858, when the Southern Yana were removed to the Nome Lackee Reservation, "most of them were diseased, presumably with venereal ailments, judging from the phraseology used."¹⁴ The *New York Century* for May 12, 1860, printed an article on the California natives in which the following statement appeared:¹⁵

A gentleman who has spent much time in Mendocino County informs us that the intercourse of the whites with the Clear Lake Indians . . . has laid

⁹ E. Bryant, *What I Saw in California* (1846), p. 282.

¹⁰ L. L. Loud, *Ethnogeography and Archaeology of the Wiyot Territory*, Univ. Calif. Publ. Am. Arch. and Ethn. (1918), 14:302.

¹¹ Curiously there is no reference whatever to gonorrhoea in the Spanish literature. Venereal complaints are frequently mentioned but invariably as "el mal Galico," or syphilis. It is rather beyond credence that the Spanish should not have known the disease both from experience and by name, and that they should not have introduced it along with syphilis.

¹² Stephen Powers, *Tribes of California*, Contr. No. Amer. Ethnol. (1877), 3:23.

¹³ Lucy Thompson, *To the American Indian* (Eureka, 1916), p. 131.

¹⁴ T. T. Waterman, *The Yana Indians*, Univ. Calif. Publ. Am. Arch. and Ethn. (1918), 13:44.

¹⁵ Quoted in the *San Francisco Bulletin*, June 18, 1860.

the foundation for the ultimate extermination of the race by disease . . . Of five or six hundred squaws, from ten years old and upwards, he was assured not a solitary individual was exempt.

The reservation agents made such repeated reference to syphilis that reading their reports becomes monotonous. The following excerpts are merely samples:³⁰

The odious disease syphilis . . . has long been the destroyer of their health and numbers. (M. B. Lewis, 1858.)

In truth the troops . . . are a great curse to the Indian Service, for in spite of the vigilant efforts of their own officers and of the officers and employees on the reservation, soldiers will clandestinely mix and cohabit with the squaws, thereby spreading disease and death among them. (W. P. Dole, 1863.)

What were the prevailing diseases among the aborigines in northern California previous to the coming of the whites I have not had an opportunity of ascertaining, but that some of the diseases from which they suffer most at present, and which are fast working their extermination, were unknown to them prior to the advent of the Caucasian race, is firmly attested by the older Indians and corroborated by early observers. The disease to which I have reference is venereal in its various forms . . . The different forms and stages of venereal diseases embrace in one contaminated mass old and young, male and female. The sufferings entailed upon these wandering savages from this cause alone are atrocious, and beyond description . . . The adage "prevention is better than cure" they know not, they heed not, and their rude practice of the healing art makes no pretension to curing these maladies . . . As to the cause of death among the Indians I may make the general statement that syphilis destroys many of the newly born and very young and also causes many abortions. (Charles Maltby, 1865.)

About 50 per cent of the whole number [on Hoopa Reservation] have venereal disease in some form. (J. V. Farwell, 1871.)

It is . . . a lamentable fact that a large number of grown-up Indians of both sexes have their system so tainted and poisoned with venereal disease that it is impossible for them to perpetuate their race. (C. G. Belknap, 1876.)

The diseases with which they are much affected are those of a syphilitic character . . . No physician, I care not how skillful he may be, can successfully treat the Indians on this reservation [Hoopa], affected and situated as they are. (E. P. Smith, 1875.)

³⁰ All are from the U. S. Dept. Int., *Reports of the Commissioner of Indian Affairs*.

To the above qualitative assertions may be subjoined one item of actual statistical value. From 1885 through 1890 the reports to the commissioner included a detailed breakdown of the medical reports for Hoopa Valley and Round Valley.³⁷ Although this period is twenty-five years later than that which is under consideration, the figures can scarcely show a greater degree of infection than existed in earlier times. During these six years, the average population of the two reservations was 1,020 (the population was quite stationary). The average annual number of cases treated was, for syphilis 32, for gonorrhoea 33. This would imply a total venereal incidence of 6 per cent annually. However, the medical reports distinguish between "primary syphilis" and "constitutional syphilis." The former category doubtless indicates fresh, new cases. Of these a total of 31 are recorded, or an average of about five per year. Now a record of 0.5 per cent for annual incidence and 3 per cent for advanced cases is certainly not bad. No civilized white nation can show a better one. The problem is whether the medical returns can be taken at face value. There is no doubt that they represent the number of Indians who went to see the doctor. But modern experience demonstrates that far from all our own afflicted citizens consult a physician. Furthermore, there is no reason to suppose that a reservation Indian would continue treatment after the period of active lesions passed. So we must increase these figures considerably, although we have no good guide to how much. Perhaps we may double the recorded value to account for cases which did not consult the reservation doctor and double it again to include those individuals in whom the disease existed in a latent form. This would yield a value of 12 per cent as the proportion of syphilitics in the population. Such an amount is certainly not excessive.

On the face of the records the incidence of gonorrhoea would appear to be higher. Most of the cases listed were very likely initial, acute, infectious, although some may have been chronic and refractory. The unmodified returns would suggest an initial incidence of 3 per cent of the population annually. This is not an excessive estimate, particularly

³⁷ It is probable that a careful search of the records of the Indian Bureau in Washington would reveal much more similar data. Unfortunately, however, I have not had opportunity to make such an investigation and must rely upon the few reports published by the commissioners.

if we remember the notorious indifference and laxity of ignorant populations everywhere toward this disease. In fact, it is probable that only the most extreme and painful cases were ever brought to the attention of the doctor. If this is true, it would appear that practically the entire population on the reservations at one time or another suffered from gonorrhoea. Another indication is derived from the category of "gonorrhoeal ophthalmia," which is listed through these years. This form of the disease almost invariably appears in the newly born, as a result of infection from the mother. Now a total of 37 such cases are listed. The total births in the same period were 137. Hence 27 per cent of the infants were infected. This is an enormous proportion, and the conclusion seems inescapable that gonorrhoea was substantially universal among these particular people.

The question of the effect of syphilis on birth rate is always troublesome. That the disease can reduce fertility and cause abortions seems generally admitted. Considerable doubt may be raised, however, as to the severity of its influence. Many people in the nineteenth century, both educated and ignorant, probably overestimated the direct effect of the disease on the birth rate. Unfortunately, we have no good statistical method for solving the problem for a primitive population. The mean annual birth rate for Hoopa Valley and Round Valley during the six years from 1885 to 1890 was 23 per thousand, a very low value. But whether the low birth rate can be ascribed exclusively to syphilis is dubious in view of the many other factors which also were conducive to a reduction in fecundity. It is probably wisest not to attempt any numerical assessment but to restrict ourselves to the opinion that syphilis may well have been in part responsible.

May the data obtained from two reservations twenty-five years afterward be applied to the Indians at large in the 'fifties and 'sixties? It is possible to do so, with certain corrections. Conditions—moral, economic, and physical—were better at the later date. The Indians were moderately well protected against external influences. They had been given nearly a generation in which to stabilize their society. They had been sufficiently well nourished. They had been exposed to medical education, propaganda, and actual treatment for years. Consequently, the extent and severity of venereal disease must have been less than

during the upheavals which immediately followed American occupation. Yet, under these relatively more favorable conditions, at least 10 per cent must have had syphilis and nearly all must have suffered gonorrhoeal infection. If we allow for only moderate improvement up to 1890, we have to admit an original incidence for syphilis of 20 per cent and for gonorrhoea of well-nigh 100 per cent.

Such an onslaught by venereal disease constitutes a tremendous blow to the physical stamina and moral fiber of any race. The dismay voiced by contemporaries interested in the welfare of the Indian does not after all seem exaggerated. In essence, even if not in detail, their statements must have depicted quite accurately existing conditions.

Turning now to the common epidemic and chronic diseases, we find that many of these had been brought in and established prior to 1850. Smallpox, measles, tuberculosis, pneumonia, and various forms of dysentery were, of course, prevalent in pre-American days, and probably spread rapidly to the interior. Any which had not yet arrived were certainly imported by the miners in 1849-1850. During the first fifteen years of American settlement, the whites themselves suffered greatly from illness despite the salubrious climate of California,¹⁸ and undoubtedly communicated all their diseases to the Indians.

One noteworthy aspect was the absence in this period of huge, sweeping epidemics such as the pandemic of 1833 or the smallpox epidemic of 1837. At least, there is no record of such universal devastations. Disease apparently attacked the Indians continuously, or at least frequently, in a chronic form or by small local flare-ups, thus exacting a steady toll of lives over a long period. This makes difficult the numerical assessment of the damage inflicted, particularly since no one ever undertook a serious estimate of mortality from the strictly numerical standpoint. There are, of course, many broad statements to the effect that disease was wiping out the native population, but these are of no value quantitatively.

¹⁸ Two good surveys of health conditions written at the time are those of Henry Gibbons (*Annual Address before the San Francisco County Medical Society*, 1857, in Pamphlets by California Authors, Medicine, Vol. 3, No. 1) and of T. M. Logan (*Medical History of the Year 1868 in California*, 1869, *ibid.*, Vol. 4, No. 6). Among the epidemics mentioned which afflicted the white population in San Francisco and Sacramento are cholera, 1851, bronchitis, 1851, scarlatina, 1851, smallpox, 1852, whooping cough, 1856, measles, 1856, smallpox, 1861, smallpox, 1868.

There are numerous references to the types of disease, other than venereal, which afflicted the Indians. Omitting as unnecessary the detailed citation of sources, we may summarize the types of disease as follows:

Dysentery was reported among the Wiyot, Hupa, Miwok, and at Round Valley and Smith River reservations.

Tuberculosis was found among the Wiyot, Hupa, Maidu, Miwok, and on all reservations. It seems to have been the most prevalent of all introduced diseases.

Cholera affected the Maidu in 1849.

Typhoid was reported by name among the Maidu in 1853.

Malaria was widespread, particularly in the valley, and was indicated by the symptoms described among the Yana, Maidu, and Yokuts.

Smallpox was noticed among the Maidu (1852, 1853, 1859), Miwok (1857), and Pomo (1853).

Whooping cough visited the Pomo.

Pneumonia was noticed among the Maidu.

Measles was found on the Round Valley and Smith River reservations.

Influenza and *diphtheria* were common among the whites and certainly must have afflicted the Indians.

It is evident that all types of disease were thoroughly established among the native population.

Apart from the reservation medical reports, we possess only fragmentary and isolated bits of information on the lethal and debilitating effects of disease. Of the individual tribes, the one for which health conditions are best recorded is the Maidu, which may serve as a type example. In 1849 the Indians below Yuba City were attacked by cholera¹⁹ "to a fearful extent," and many of them died. There may have been 500 Indians in these villages, of whom, let us say, 100 died. In the same year, among the Indians "at Sutter's Farm, on the Feather River and at the Ranchos on the Yuba" several deaths occurred from "periodical fever" (probably malaria).²⁰ This was a large territory and, since most of the natives were affected, the term "several" may denote at least 50. In 1852, an unknown epidemic attacked the Indians at Hock Farm,²¹ as a result of which in one month, according to General Sutter,

¹⁹ K. Webster, *The Gold Seekers of '49* (1850), p. 170.

²⁰ G. H. Derby, *First Report on the Sacramento Valley, 1849*. Reprinted in Calif. Hist. Soc., *Quarterly* (1932), 11:106-123.

²¹ *Sacramento Union*, Dec. 13 and 17, 1852.

40 had died, leaving only 8 survivors. The same year, smallpox struck around Nevada City and the "mortality is considerable."²² If there were 500 Indians in the vicinity and the "considerable" mortality amounted to 20 per cent (a reasonable value for a smallpox epidemic), 100 persons perished. The next season these same tribes were visited again by smallpox and by typhoid.²³ The mortality from smallpox was stated specifically as 400 deaths, mostly of children. Typhoid may have accounted for another 100. In Butte County, Mansfield quotes a pioneer to the effect that in 1853 forty Indians died of pneumonia at a little rancheria near Cherokee,²⁴ and there was the same scale of mortality from this cause throughout the county. If this were true—and there is no particular reason to doubt it—and if we make a conservative estimate of twenty rancherias in the county, then nearly 800 Maidu must have perished from pneumonia plus, probably, influenza and tuberculosis.

Various other statements are to be found in the next ten years, but no actual figures are given till 1863. At that time, 600 Maidu were collected at Pence's Ranch, Butte County, for shipment to Round Valley.²⁵ It was noted that 50 were sick with "bilious intermittent fever," undoubtedly malaria, and 30 had died in three weeks. At that rate, at least 100 must have perished before the removal to the reservation was complete.

If we now summarize the few actual figures given for mortality among the Maidu, we find a total of 1,690. Disregarding the fact that nothing like all the illness and death was reported, we note that the cases cited cover only the region of the present Butte, Yuba, Sutter, and Nevada counties—only about one-half the territory of the Maidu (excluding the Northeastern Maidu). Sacramento, Placer, and El Dorado counties are not included, but this region must have suffered just as severely as the northern part. It is then certainly legitimate to double the total of 1,690 and ascribe approximately 3,400 deaths by disease to the Maidu through the year 1863, or let us say 3,500 through 1865. The population decline of the Maidu is estimated as 6,000 from 1848 to 1880. The proportion referable to disease would then be 58 per cent.

²² *Nevada Journal*, Aug. 27, 1852.

²³ *Sacramento Union*, May 28 and July 23, 1853.

²⁴ G. E. Mansfield, *History of Butte County* (Los Angeles, 1918), p. 193.

²⁵ *Marysville Appeal*, Aug. 30, 1863.

There exists one other clue to the incidence of disease in the mid-nineteenth century. The reports to the Commissioner of the Bureau of Indian Affairs for certain years, as already mentioned, contain detailed medical reports. In addition, there are several other years for which the records give the number of Indians on the reservations who were taken sick and sought medical advice. In all, there are ten such reports from 1876 to 1890, inclusive. We may restrict the calculation to Round Valley, since that reservation contained many Maidu and since geographically and ecologically it is the reservation closest to the native Maidu habitat. The mean population from 1876 to 1890 was about 730. The total number of cases under care of the physician, for the ten recorded years, was 7,073, or an average of 707 annually. This means that 97 per cent of the Indians were ill every year. Since sanitary and health conditions were vastly better on a reservation in the 'eighties than in the wild state during the 'fifties, it is a safe assumption that among the Maidu in the earlier period the annual incidence of some kind of disease was 100 per cent; that is, every member of the community was at least mildly ill once a year.

Mortality is another matter. The mean annual deaths from all causes at Round Valley, as given by the same reports, was 22, or 3.1 per cent. This is a very good showing and indicates a definite control of disease. However, we may derive still further information from the medical reports. From 1885 to 1890, the diseases are designated by name. The serious communicable maladies may thus be segregated in a separate category.²⁰ When this is done, we find a mean annual incidence of 221 cases, or 31 per cent of the total cases seen by the physician. Otherwise expressed, 30 per cent of the population annually contracted a disease which in the wild state, under unfavorable general surroundings and with no medical attention, would be very likely to terminate fatally. Moreover, the annual incidence of these diseases among the native Maidu must have been much higher than 30 per cent. Without violating probability we may assume at least 50 per cent for the years 1850 to 1865. As for the morbidity of these diseases, apart from the illustrations known to us and cited previously, they must have been fatal in

²⁰ These include: cholera morbus, tuberculosis, pneumonia, pleurisy, other respiratory disorders, typhoid, typhus, malaria, dysenteries, measles, whooping cough, tonsillitis, influenza, and smallpox.

a large share of the cases. The population was nonimmune, the sanitary conditions were atrocious, the diet poor. Exposure and hardship were universal. It will not be violating any canons of epidemiology or commonsense, if we consider the death rate among those infected with these contagions to have been 20 per cent. Then, if 50 per cent of the population was annually infected, the net annual death rate due to disease would have been 10 per cent.

The value of 10 per cent thus derived may be applied to the estimated actual population. There were approximately 7,000 Maidu alive in 1848. If we disregard death from all other causes and apply a 12-per cent annual reduction beginning in 1850, we get 1,600 in 1865. The population of the Maidu probably became stabilized at or about this period. Since the estimated population in 1880 is 1,000 and since we must include a mortality of approximately 500 to account for homicide, we arrive at the conclusion that the decline of the Maidu was almost entirely due to disease. Actually, the value would be 90 per cent.

The two methods of calculation, one based on fragmentary statements of contemporaries, the other based on the Round Valley medical reports, thus yield respectively 58 and 90 per cent for the decline of Maidu population attributable to disease. Despite the many assumptions involved and despite a wide numerical disparity, both calculations agree with respect to the primary trend. There can be no question whatever concerning the tremendous influence of disease in the decimation of this tribe. As a compromise between the two values obtained, and in order to get a working figure for further calculation, we may put the weight of the disease factor at 80 per cent.

Considerable space has been devoted to the Maidu, first, because our best records pertain to them, and second, because, with the statistics for this tribe as a basis, it may be possible to formulate some conclusions for those tribes concerning which we have no actual data. We might invoke the general principle of intensity of racial conflict. However, the method of population products, which was useful in estimating the amount of social homicide, cannot be applied in an unmodified form. Homicide is a function of continued intercourse between the two groups. *Introduction* of disease is a similar function, but once established, disease exerts its effect quite independently of racial pro-

pinquity. The epidemics of the 1830's are examples. The Spanish had to be in contact with the Indians in order to get the infection going. Thereafter the pest ran its course among the Indians alone. We might expect, then, that during the American period those groups living in regions seldom or never entered by the white man would be relatively immune, whereas those which once came thoroughly into contact with him would suffer heavily.

The Maidu represent a people which was in close contact with the Americans. This is also true for the Yana, the Sierra Miwok, the Yokuts, and the valley divisions of the Wintun. In the same category might be placed also the Pomo, the Yuki, the Wiyot, and the Yurok. But the Hill Wintun, the Shasta, the Karok, many of the Athabascan tribes, and the Achomawi were very definitely less exposed, and undoubtedly felt to a lesser extent the ravages of disease. Just as a guess—for there is absolutely no basis for computation—we might say that in the latter group disease was responsible for 40 rather than 80 per cent of the population decline. Then, since the first tribal group was numerically the stronger, the general average over the entire region might be estimated at 65 per cent. It makes little difference whether we assign a value of 50 or 65 or 70 per cent. It is sufficiently clear that disease accounted for the vast majority of Indian deaths during the first years of American occupation.

At the outset of this discussion the prediction was made that at least 60 per cent of the population decline would be found to be due to disease. This prediction has been adequately substantiated. Thus we may conclude that in all the tribes from Cape San Lucas in Baja California to the Oregon line disease exerted much the same relative influence, irrespective of the type of civilization which introduced it.

There is, however, another line of approach. We should consider not only the relative significance of disease, but also its absolute striking power. To what extent did introduced contagions, of and by themselves alone, reduce the original population? A decline of, let us say, 1 per cent entirely due to disease would be far less serious to a species than a reduction of 50 per cent only one-half of which was attributable to disease. In the second reduction the significance of disease would be twenty-five times as great as in the first. In order to bring out this

difference, we may express the effect, in terms not of percentage of decline in population, but of percentage of the original native population destroyed. This has been done in the following brief tabulation.²⁷

The striking fact brought out by these figures is that, although the percentage of the population reduction due to disease did not differ very greatly, the annual absolute inroad on the native population due to the American contact was roughly three or four times as great as the decline due to any of the three types of Spanish contact. In other

Racial contact	Original population	Population decline	Number of years of contact	Percentage of decline due to disease	Percentage of original population killed by disease	Percentage of original population killed by disease per year
Lower California Indian-mission	40,000	36,000	70	35	31	0.44
Upper California Indian-mission	53,600	38,700	75	60	43	0.58
Wild Indian-Spanish	56,900	18,100	43	60	19	0.43
Wild Indian-American	69,100	57,000	32	65	53.5	1.67

words, the relative importance of disease to the Indians was fairly uniform, but its absolute significance was far greater for those tribes among which the Americans settled.

This wide difference in the influence exerted on the native stock by the two civilizations can be explained only in terms of numbers. Even if no simple mathematical formulation is possible, such a device is not necessary for an appreciation of the divergence. The whole scheme of Spanish colonization on the west coast implied settlement and control by a ruling caste composed of very few people. On the contrary, the advance of the Anglo-American frontier was a mass movement. The ratio of Spanish to natives may have been as one to ten, that of the Americans to natives as ten to one. Although the introduction and propagation of disease is no strict function of any ratio, nevertheless such a huge disproportion in relative populations must have determined in large measure the long-term severity of the disease effect.

²⁷ The population data have been taken from previous papers dealing with the appropriate groups. For the wild Indian-American contact, the period used is from 1848 to 1880. Here, also, the missionized and nearly extinct coastal tribes have been omitted.

FOOD AND NUTRITION

Under American domination, the problem of food supply became acute. It had arisen, to be sure, in a mild form among the mission Indians and among the wild Indian tribes in close propinquity to the Spanish. But, as has been pointed out elsewhere, the missionaries raised large crops and prevented anything approaching actual starvation, whereas the natural, or aboriginal, food supply of the interior wild Indians was not materially interfered with. The Americans, on the other hand, seriously depleted the aboriginal food sources.

From the standpoint of racial conflict, the subject of food presents itself in several aspects, some of which involve population changes and some of which pertain rather to cultural alterations. The first and perhaps most critical phase of the matter concerns the question whether the total Indian dietary was depleted and, if so, how and how much.

The aboriginal food supply was copious and extremely varied, since it included every edible plant and animal within the confines of California. The quantitative adjustment of the Indian population, both generally and locally, has been shown to be very precise.²⁸ On general ecological grounds, therefore, one would anticipate that any disturbance to this organism-environment relationship would be followed by serious repercussions. Such a disturbance did occur as a result of American occupation, and consequent upon it the primitive reservoir of wild food available to the Indian was sadly depleted. The effect was induced in two ways: the Indian was driven away from his food source, and the food source was removed from the Indian by destruction or otherwise.

The removal of the Indian from areas supplying food was the result of several processes, all more or less interrelated. Settlement by the whites was the initial agency. It was not by chance that small fertile valleys or rich river bottoms were selected by the incoming Americans as the site of new farms and villages. These were the spots best adapted geographically to the support of a large population. But the Indians as a rule had already long established their own rancherias in those very places. Hence, according to the inevitable rule of pioneer-

²⁸ Kroeber elaborates upon this theme in his *Handbook of the Indians of California* (Washington, 1925).

ing, the aboriginal owners were confronted with the alternative of moving out or being driven out. No matter which course they adopted, the result was the same. They were forced to retire to less prolific regions, where the available food supply was inadequate for their support. This sequence of events was particularly characteristic of the valleys of the north Coast Range and the headwaters of the Sacramento River system. Notably along the Klamath, Trinity, and Eel rivers and their tributaries, the natives were so dependent upon the river itself for support that normally they scarcely left it from one year to the next. Similarly, in the San Joaquin and Sacramento valleys, numerous groups had come to depend upon the river itself and the riparian biotic associations. But, as already suggested, the towns and ranches of the white men were located in those precise spots. Indeed, if one follows on the map the development of early American agrarian and commercial activity, he will find it concentrated in the exact regions most thickly populated by the aborigines. There was a similar distribution in the mining regions, for all along the Sierra foothill belt and on the tributaries of the Klamath, the miners followed the watercourses, and in so doing, drove out the heavy Indian population.

Partly as a result of this uprooting and the consequent dietary stringency, the natives resorted to some type of resistance. Warfare followed inevitably. Then, as a concomitant to hostilities, the Indians were driven farther and farther back into the barren hills and forests, making it still more difficult for them to gain access to the only food sources which they were equipped to utilize. As a result, the shortage frequently became very severe. Numerous are the references to the hard circumstances under which these displaced populations labored.²⁹

²⁹ The following items will give an idea of this condition:

"This river [Trinity] . . . is rated as the best in the country for salmon fish, which constitutes almost the whole subsistence of the Indians. The whites took the whole river and crowded the Indians into the sterile mountains, and when they came back for fish they were usually shot." (Gen. G. F. Beale to the governor, July 12, 1855.)

"Mr. Poole, a settler on Kings River, informs us that the Indians have recently been driven to the mountains and are not to be permitted to return, even if they showed an inclination to do so." (*Sacramento Union*, Sept. 5, 1856.)

Referring to the McCloud and Pit River Indians: "In winter they have great difficulty in procuring enough provisions to keep body and soul together." (*Sacramento Union*, Nov. 10, 1854.) It was admitted policy on the part of General Kibbe to drive these tribes into the mountains during the food-gathering season in order that they might starve.

Mere distance from food sources, however, was not the only factor involved in cutting down access to adequate subsistence. Perhaps an even more important by-product of warfare was the disruption of native food economy. As many ethnographers have pointed out, the Indians were dependent upon the natural supply of both plants and animals. Since this was available only for certain brief periods each year, the Indian method was to gather the material—acorns, salmon, grasshoppers, etc.—in bulk at the time of harvest and store it for future use. Most of the dietary items, furthermore, had to be processed both for immediate consumption and for preservation. Now it was vitally necessary that the entire man and woman power of a particular village devote itself without interruption to this pursuit while the season lasted. If, as frequently happened, the population had been driven off to some distance already and then, during the period of food preparation, was disturbed, attacked, or put to flight, the entire staple food supply for the year might be ruined. The loss of subsistence from this cause was particularly severe among the fish-and-acorn tribes of the northwest. To show the extent of such disruption of food economy, it may be worth while to introduce the following very sketchy paraphrase of events in the Klamath, Trinity, and Eel basins during the late 'fifties. This is taken direct from A. J. Bledsoe's *Indian Wars of the Northwest* (1885) and is correct in substance, if not in detail.

1855. Miners attack and burn "several" rancherias.
 Red Cap Rancheria attacked by miners.
 Volunteers attack two rancherias at Weitschpeck.
 A reservation is set up on the Klamath and all Indians of the region are removed to it.
1856. Hupa Indians under arms. Object to removal to reservation.
 A rancheria attacked on Redwood Creek.
 Another rancheria destroyed on Redwood Creek.
 A rancheria destroyed on Bear River.

(Footnote 29 concluded)

Referring to the Miwok, many of whom had retreated to the mountains: "Some were found far up in the snows, starving and freezing." (J. D. Mason, *History of Amador County* [1881], p. 260.)

In the Northwest: Some 200 to 300 Indians on the South Fork of the Trinity came in suing for peace. They agreed to stop raiding in return for the right to fish and hunt in the vicinity. (*Sacramento Union*, Sept. 20, 1852.) "Some of the poor savages, who are now being hunted by Massey's men on the Humboldt trail, are begging of the ranchmen for permission to fish. They don't dare to fish, hunt or make fire without permission." (*Ibid.*, Dec. 29, 1858.)

- The winter of 1856-1857 was hard. "It meant a struggle for self preservation by the Indians, a struggle against natural forces in which the whites were not a factor." Many whole tribes had been pushed into the mountains. The Indians were "chastened" by the winter and were quiet in 1857.
1858. The "Wintoons" on the headwaters of Redwood Creek, the Mad and Eel rivers begin depredations.
 Three expeditions go out.
 Rancheria attacked on Grouse Creek.
 Two expeditions ambushed.
 Indians withdraw entirely from the Mad River to the headwaters of Yaeger Creek.
 Three rancherias destroyed on Yaeger Creek.
 Indians are driven slowly into a small area on the headwaters of the Mad and Yaeger. There are seventeen camps. These attacked and destroyed.
 A rancheria attacked on Redwood Creek.
1859. One hundred women and children sent to Mendocino Reservation. A big storm occurs in January. "The hostiles, unable to hunt on the mountains and afraid to go down on the streams, were actually starved into submission within four weeks."
 February: all rancherias raided; 160 Indians sent to Mendocino. Sporadic raiding on Eel River and in Mattole Valley, also on the Van Duzen and Mad rivers.
1860. Most of the Wintoons escape from the reservation. Indian Island massacre—the Wiyot practically destroyed. A rancheria destroyed on Mad River.
 Four hundred and forty Indians sent to Klamath Reservation; in a few months all had escaped. They were now all dependent upon the whites for subsistence.
1861. A rancheria burned at Iaqua.
 A rancheria destroyed on Boulder Creek.
 Two rancherias destroyed on the Mad River.
 A rancheria destroyed on Larrabee Creek.
 Another rancheria destroyed on Larrabee Creek.
 September to December: fifteen engagements in Humboldt County, at least four rancherias destroyed.
1862. Conditions much the same. "The marching and countermarching was continuous throughout the year . . . The prisoners were mostly of friendly tribes, who willingly surrendered for the sake of temporary shelter and food."
 Camp near Arcata attacked.

- Camp on Little River destroyed.
Eight hundred captured Indians removed to Smith River Reservation. In two months all had escaped and returned.
1863. Conditions much the same.
Hupa destroy a friendly rancheria on Stone Lagoon.
A rancheria destroyed on north fork of Eel.
A battle on Redwood Creek.
A rancheria destroyed in Hoopa Valley.
A battle on south fork of the Trinity.
Another battle on Willow Creek.
Another battle, near Arcata, at Bald Mountain.
1864. Fighting on the South Salmon.
A rancheria burned in Hoopa Valley.
A battle in Mattole Valley.
A battle between Mad River and Redwood Creek.
Skirmishing now incessant. The policy was to wear down the Indians by "keeping them moving, and preventing them from laying in supplies of food and ammunition." Also by preventing the women and children from resting.
A rancheria destroyed on Elk River.
A "number" of rancherias destroyed in April.
A rancheria destroyed in July on the Mattole.
1865. By January, 1865, "Trinity County was cleared of all Indians who lived in rancherias and tribal relations. . . . The hostile tribes had been killed or captured, had been flooded by storms and driven by man, had been starved and beaten into absolute and final subjection."

This record speaks for itself. No further comment is necessary.⁸⁰

Apart from the broad effects of settlement and warfare was the temporary disturbance accompanying wholesale removals to reservations. The press from 1855 to 1865 was filled with a most acrimonious controversy concerning the mismanagement and malfeasance in office exhibited by the Federal agents. One does not need to delve deeply into these charges and countercharges to discover that the officers entrusted with the care of the Indians on the new reserves were a pretty bad lot. Among their other derelictions was a tendency to neglect the food supply of their wards—either through crookedness,

⁸⁰ The general and social implications of disruption by warfare are discussed in connection with other topics. The significance here is solely with respect to the breakdown of normal food sources, the processing and preservation of foodstuffs.

neglect, or plain stupidity. Not until the middle 'sixties was any consistent scheme set in operation to ensure an adequate year-round food supply. Meanwhile, thousands of Indians had been gathered in droves and herded like cattle from their homesites to some unfamiliar and unpromising locality. Many of these people escaped at their first opportunity and made their way across the wilderness toward home. The minority remained. In either event there was inevitably a period of wasted time during which a food supply was not available and when, even if the raw materials could have been obtained, there was no opportunity to process and store them.

The epitome of Bledsoe's chronicle given above shows how the northwestern tribes fared. One might add equally sad accounts of the fate of the Achomawi and Maidu, who were hauled all the way to Humboldt County by way of San Francisco or driven across into Round Valley. Tales of want and suffering among these unfortunates are too numerous for extended mention. Simply as an example, consider the hegira of certain Achomawi and Maidu (Hat Creeks and Concows). They were a part of the large body of Indians who had been shipped in a body to Round Valley about 1860. In 1862 Agent Storms reported that the survivors, four hundred of them, had "left" the reservation, headed eastward.⁸¹ Since there was no crop raised on the reservation, they had migrated to avoid starvation. We next hear of them at the moribund Nome Lackee Reservation, west of Tehama. The citizens thereabouts voted a set of resolutions requesting the removal of these Indians, "deposited at Nome Lackee by the authorities,"⁸² who had left the Indians totally destitute, with no means of support and with no agent to look after them. From Nome Lackee they evidently moved, or were moved, to the "Old Landing" on the Sacramento River, whence they were again pushed on to Major Bidwell's ranch near Chico.⁸³ At this time, the summer of 1863, there were three hundred left and there was among the children, as the *Appeal* quaintly put it, a "temporary" epidemic due "to a change of diet." Finally, the Indian Service got around to assembling them and dumping them once more at Round Valley, where they remained thereafter.

⁸¹ *Sacramento Union*, Sept. 30, 1862.

⁸² *San Francisco Bulletin*, Nov. 6, 1862.

⁸³ *Marysville Appeal*, June 24, 1863.

The reverse of the removal of Indians from their normal food supply was the reduction or elimination of that supply for those who were fortunate enough to be relatively unmolested. Closely associated with this matter is the quantitative significance of such depletion. There were two general processes which contributed to the final result. One was the direct destruction of stored provisions through warfare or maliciousness, the other was the long-term ecological change caused by advancing civilization.

We have few means for estimating with any degree of precision the actual quantity of food materials burned, thrown away, or stolen by the whites. One possible guide would be the number of rancherias looted or destroyed, since the stores were customarily kept in the villages. We know that the custom of wrecking all Indian commodities, including food and food-processing implements, was begun by the Spanish in the times of the valley expeditions. The method was adopted and elaborated by the miners of 1849 and 1850 and was invariably practiced by all military and private Indian-fighting parties thereafter. Even the inoffensive Yokuts were repeatedly subjected to this treatment, and the tribes of the mountain sections suffered enormous damage. There can be little doubt that every tribe which indulged in a so-called war against the Americans lost practically every rancheria at least once in its history, and some groups were subjected to this process repeatedly. For example, the Bledsoe account specifically mentions the destruction of 32 rancherias (with stored supplies) from 1855 to 1863. In connection with other incidents "several" and "all" were destroyed. In addition are mentioned the destruction of 19 "camps," i.e., temporary stopping places. If we allow 18 to cover the "several" and "all" rancherias, we get a total of 50. But Bledsoe, even if his account is very circumstantial, does not include every incident of the sort. In fact, we may double his number and still be conservative.

Now Kroeber and other ethnographers have studied carefully the number of village sites for part of this region. Their total for the Tolowa, Yurok, Wiyot, Karok, Chimariko, Hupa, and Chilula is 177. Since these are sites, not simultaneously existing villages, and since many of the latter were deserted for other causes after 1850, this number may be reduced to 100. But there must be added those of the

Trinity River Wintun and the small Athabascan tribes in Humboldt and northern Mendocino counties, say 50. The total, 150, is not far in excess of the estimated 100 destroyed. Indeed, it would not be unfair to state that every permanent village in the northwest was sacked, if not burned, at least once. The stored food supplies per village in this region would normally amount to a good many hundred pounds of fish and an equal amount of acorns, etc. Perhaps a total of 2 tons would not be excessive for an annual average. This means the destruction of at least 300 tons of provisions in 8 years, or about 40 tons per year. If all the northern and central California tribes are to be included, we must account for the Shasta, the Pit River tribes, the Yana, the Maidu, the Miwok, and the Yokuts, not to mention the Yuki, Wailaki, and Pomo. The 40 for the Klamath and Eel territory must be multiplied by a factor of at least three, perhaps more. However, using three as a factor, we find an annual food-destruction rate of 120 tons. This perhaps appears a small figure when compared to our modern consumption of thousands or millions of tons of food-stuffs. But it must be remembered that the aboriginal food supply at its maximum was but marginal, just great enough to support the existing population. If we say that the average population through the period 1850 to 1865 was 40,000, then the loss per person was 6 pounds per year; not a great quantity in the individual sense, but an appreciable loss when spread over a large population for a long time.

Far more significant in the long run, however, than temporary losses through hostile acts, was the rapid change which took place in the availability of the raw food materials, a change which, although most noticeable at first, has continued to this day. The four basic staples of Indian diet were fish, game, acorns, and various seeds. With respect to fish, the salmon run in particular was very adversely affected. This was owing not so much to American agriculture or occupation per se as to mining operations. Into the salmon-bearing streams of the Sierra Nevada and north coast ranges dirt and silt began very early to be washed in immense quantities, with the result that comparatively few salmon could get up the rivers to spawn. This state of affairs was commented on by Bledsoe⁸⁴ (who, by the way, ascribed the Indian

⁸⁴ A. J. Bledsoe, *Indian Wars* (San Francisco, 1885), p. 149.

wars to interference with food supply) and by Powers.³⁵ Bledsoe also pointed to a complaint by the Chimariko that not only were the salmon fewer, but the muddying of the water lowered the visibility of the fish so that it was impossible to spear them. The Yokuts, who also had depended heavily on fish as well as on waterfowl and other aquatic animals, suffered in another way. As agriculture advanced in the San Joaquin Valley, the vast swamps were drained for farming purposes. Also, as time went on, the diversion of mountain water for irrigation lowered the water table to such a point that the original fauna almost disappeared. Thus the Yokuts were completely cut off from a very prolific source of food. Finally, as is well known, the introduction of hydraulic mining silted up great areas of bottom lands and changed the entire face of the country. Today the water-borne food of California could not support the remnants of the Indian population which still survive, not to speak of the aboriginal number.

The Indians never did depend greatly for food on the larger fur-bearing animals or the deer. Therefore the depletion of these animals was not, in spite of many complaints, a serious loss. However, the destruction and disappearance of small rodents was a real calamity. The rabbit, particularly, was utilized, and, to some extent, ground squirrels. It is doubtful whether agriculture has much reduced the number of these animals, but it has prevented the Indians from getting them. Their method was to organize great drives and sweep over a big area. This procedure was practically eliminated as soon as valley farms developed, because the Americans refused to permit the natives to move through standing crops or plowed fields.

Perhaps the greatest anguish was caused by the white man's own domestic animals, particularly cattle and hogs. Their influence was felt in two ways. The first, and lesser, evil was the fencing-in of the free range. This made trespassers of people who from time immemorial had gone wherever they wished in search of food, particularly acorns, seeds, and green plants. As a rule, the best food-bearing land was thus preëmpted, forcing the natives to search in poorer and more distant preserves. This in turn increased the difficulty and labor in getting a unit quantity of food and indirectly reduced the total amount available.

³⁵ *Op. cit.*, 3:73, 94.

The second, and greater, evil was the activity of the stock and hogs. Indeed, these introduced animals entered into direct ecological competition with the Indians—a kind of man versus animal conflict. For, under the stern protection of the whites, the cattle ate the grasses which produced the Indians' seeds, and the hogs ate the acorns. There is no question that the Indians were able to succeed in competition with the animals themselves, but when they were prevented from exercising their normal biological reactions, a very serious situation was created for them. This was recognized by the white men themselves, although they preferred to sacrifice the Indians rather than their livestock. Witness the following statements:

The stock . . . consuming the clover, grass, acorns and wild oats, which they have hitherto subsisted on . . . there is hardly any food in the mountains the Indians can get.³⁶

. . . the hogs eat the acorns and roots, and the cattle take the clover, and therefore they kill the stock to subsist upon.³⁷

. . . their hunting grounds are all occupied by the farmers, whose hogs destroy their acorns and manzanita berries . . .³⁸

Their hunting grounds are destroyed, as game has been driven back to the mountains . . . acorns, their only dependence, now are scarce, and I think, on the whole, they are looking a rather hard winter in the face.³⁹

. . . their supplies in plains and foothills, provided by Providence for generations back, have been consumed by the stock of the white man. . . .⁴⁰

The acorns, the most important and most available breadstuff . . . are consumed by the hogs of the whites.

Their spring and summer food such as clover, wild lettuce, serrino, grass roots and various other kinds of vegetables . . . have [been] this season, and will hereafter be, consumed by cattle, horses and hogs before maturity.

The havoc raised by stock with the native food sources was of course but one manifestation of the larger racial conflict. Here, indeed, was a clean-cut focus of collision, the depletion of food supply, scarcely secondary to homicide or slaughter through disease.

³⁶ *Repts. Special Joint Committee on Mendocino War*, 1860, Pamphlets on Calif. Indians, Bancroft Library, testimony of W. T. Scott, p. 23.

³⁷ *Ibid.*, testimony of J. W. Burgess, p. 24.

³⁸ G. W. Applegate, Placer Co., 1856, in *Rept. Commr. Indian Affairs*, 1856, p. 243.

³⁹ G. H. Hoerchner, Calaveras Co. 1856, *Ibid.*, p. 240.

⁴⁰ This, and the following two statements are from M. B. Lewis, Fresno Indian Farm, 1856, *ibid.*, p. 254.

Naturally, the effect on population was largely indirect. It seldom happens that the immediate cause of death is complete lack of nourishment. Only following great famines does this occur, as it has for example from time to time in China, Russia, and the Near East. It is probable that seldom was food so scarce that the California Indians perished of actual starvation. However, partial starvation must have been quite common. The influence of this condition was to lower the vitality of the population in all respects. Particularly was resistance to disease so much reduced that many of the weaker members, such as children and old people, fell easy prey to whatever epidemic happened to strike them. Tuberculosis would also claim many victims in such a population. The physical weakness attending prolonged undernutrition would also contribute to mental and moral lassitude, thus preventing the group as a whole from bringing to bear its full energy in acquiring a new food supply. Moreover, the birth rate would tend to decrease, although we have no quantitative data concerning this matter. A very inadequate diet, as is well known, will prevent proper development of the fetus, make it more difficult for the mother to withstand delivery, and reduce the natural secretion of milk below the subsistence level of the newly born child. As a result of all these factors, the population would tend to decrease very rapidly.

As we know, the population did decrease materially during the years of most acute hardship, owing, among other causes, to the disturbance of food supply—a major environmental factor. Indeed, it is to be doubted whether the California Indian would have survived at all, if he had not been able, under this tremendous pressure, to evolve certain fairly effective responses to what may be termed the “starvation stimulus.” Let us not forget that, with the exception of direct physical attack, starvation constitutes the most powerful biotic urge known to the individual. By extension, acute or merely mild and chronic hunger will drive an entire race or species into a path of aggression into which it can be led by no other means. (This thesis predicates, of course, that inanition has not proceeded to the point where all physical and moral fiber has been sapped and the group becomes utterly impotent.) The first response, therefore, to present hunger and the obvious probability of future hunger is to fight. The

manner and form of the action are immaterial. The basic point is that the Indian, faced with the clear prospect of starvation, attacked the race responsible for his condition. The attempt was abortive in the long run, but for a period, until utterly defeated and exhausted, the Indians instinctively demonstrated the primitive, automatic struggle for *Lebensraum*. I think it may be maintained with assurance that the Indian wars and difficulties in California up to 1865 had as their basic cause the dislocation and depletion of the aboriginal food supply.

The battle to maintain primitive conditions failed. The strictly defensive reaction, that is, the attempt to drive out the invader and restore the *status quo ante* attained no measure of success, because of conditions beyond the defenders' control. Consequently, the Indian, if he were to survive at all, was forced to supplement the fundamental “fight” reaction by other responses better adapted to the circumstances. Some of these were tried, and some proved at least moderately effective.

We may look at the situation thus. Conceded that the aboriginal food sources were irretrievably diminished (not, of course, utterly eliminated) and that an irreducible minimum of food had to be obtained, then the Indian had but one recourse: to utilize the white man's supplies. The resistance or “fight” response, therefore, very quickly became coupled with a replacement response.

When first confronted with the problem of supplementing their diet with materials provided by the white man, there were two possible methods available. The first was simply to take the food, the second was to buy it. Let us grant that, in so far as the group response in general was concerned, considerations of expediency, not morality, were paramount. In terms of the individual, the Indian could feel no ethical objection to appropriating the white man's property when the white man had already forcibly dispossessed him of his original means of subsistence. Conduct, therefore, depended upon which course of action would most quickly relieve immediate needs and would be attended by the least severe retribution. In the long run the Indian found the method of purchase (by money or labor) the most satisfactory. At the beginning, however, normal economic channels were not open to him, and the starvation pressure was severe. As a result, within a very short time following the arrival of the heavy American

immigration, the Indian began to appropriate to his use the white man's food. It was not until he had suffered vicious castigation that he relinquished this form of relief and universally adopted the second type of response. Although this chain of events did not follow any strict temporal continuity, it nevertheless represents almost an experimental adaptive procedure. Thus, if we disregard accuracy in time, we see first the major upset in the external environment, the reduction of food sources. Second comes the natural, instinctive response, to fight the causative agent. This failing, in the third place arises the theft, raiding, or appropriation reaction. This, too, failing to bring about a favorable adaptation, the Indian managed to achieve the final step, conformity with white methods for obtaining subsistence.

The details of this process may be read in the accounts of the Indian troubles of the mid-nineteenth century. When the Indian turned to the white man for food, he found one admirable source ready at hand, livestock. The problem of stock raiding, to be sure, was one which had existed since earlier Spanish times. It had been the cause of great difficulty between the heathen tribes and the Mexican immigrants, and no essentially new features were introduced by the coming of the Americans. The whole question with its many ramifications cannot be discussed here, but it is of interest to examine the extent to which the natives came to depend upon horses and cattle to supplement their own vanishing dietary. Although it is not possible to determine with any accuracy the number of domestic animals eaten after the innumerable stock raids, the following statements and abstracts may be cited to give some idea of the universality of this mode of behavior.

"The Indians, I think, kill stock for the purpose of using it for food."⁴¹

"I have never been on an excursion against the Indians but what I found more or less meat in their camp, either horse, beef or sheep meat."⁴²

Referring to the Wailaki: "Much horse meat and pork was found and destroyed."⁴³

A rancharia was attacked at Kettinshou, Humboldt County. "Several hundred pounds of fresh pork" were found there.⁴⁴

⁴¹ *Repts. on Mendocino War*, testimony of W. T. Scott, p. 23.

⁴² *Ibid.*, testimony of C. H. Bourne, p. 48.

⁴³ *San Francisco Bulletin*, Oct. 23, 1861, letter from S. P. Storms, Round Valley.

⁴⁴ *Marysville Appeal*, July 4, 1861.

In Mendocino County Mr. Woodman lost 109 horses, 74 of which were found dead, "upon the bodies of which the Indians were having a good feast."⁴⁵

Referring to a fight at Round Valley: "The unusual severity of the winter has doubtless reduced the Indians to a condition bordering on starvation and the consequence is, they are committing serious depredations on the stock."⁴⁶

Horses stolen in Oak Run Valley. One horse returned, the others had been eaten.⁴⁷

The Yuki are especially fond of mule meat. Large quantities of horse and mule meat are being laid up in their rancherias, judging by the number of slaughtered animals found.⁴⁸

A band of Hayfork Indians (Hill Wintun) have raided cattle at Kenschaw's Flat. They jerked the meat and cooked it.⁴⁹

The Indians were caught jerking beef at Kneeland's Prairie (Humboldt County).⁵⁰

The Indians of Mariposa County "go in quest of mustang meat through necessity, as they must get that, or steal or starve."⁵¹

The Indians near Fiddletown shoot cows full of arrows. Then when the cows die, the Indians eat them.⁵²

"A large portion of the time they were half starved. They sometimes had to steal cattle from the whites for self preservation."⁵³

Referring to San Joaquin tribes: "These Indians . . . have become so habituated to living on horseflesh that it is now with them the principal means of subsistence."⁵⁴

"The Indians on the Trinity . . . were very fond of mule beef and never failed to obtain a supply of it, when they had an opportunity to do so."⁵⁵

Referring to the Sierra Indians, "[They] steal numbers of tame horses from the white settlers on or near the coast only to use for food—the Indian generally making no other use of the horse."⁵⁶

The Indians "also are fond of horse meat, and when hard pressed with hunger will occasionally steal a bullock."⁵⁷

⁴⁵ *San Francisco Bulletin*, Jan. 21, 1860.

⁴⁶ *Sacramento Union*, Aug. 13, 1861.

⁴⁷ *Ibid.*, Jan. 26, 1861.

⁴⁸ *Ibid.*, July 24, 1861.

⁴⁹ *Nevada Journal*, Dec. 9, 1853.

⁵⁰ *Ibid.*, May 11, 1858.

⁵¹ *San Francisco Bulletin*, March 1, 1861.

⁵² *Ibid.*, Sept. 18, 1854.

⁵³ R. T. Montgomery, "Recollections," MS, 1878, Bancroft Library, p. 8.

⁵⁴ E. Bryant, *op. cit.*, p. 435.

⁵⁵ J. Carr, *Pioneer Days in California* (Eureka, 1891), p. 119.

⁵⁶ J. W. Revere, *A Tour of Duty in California* (New York, 1849), p. 127.

⁵⁷ *Ibid.*, p. 121.

"If we had allowed the Indians to become accustomed to beef or horse meat, even capital punishment would not have held them in check." Speaking of the San Joaquin Valley people: "These ate mainly horse meat."⁶⁸

"The Indians had a habit of stealing all horses and mules that they could lay their hands on, driving them into the hills and butchering them . . . it always seemed to me as if they liked horseflesh better than beef and mule flesh better than either."⁶⁹

The Yana "probably visited the valley and stole livestock to escape famine and actual starvation."⁷⁰

One might easily find hundreds of references to stock raiding in the books, articles, and newspapers written between 1848 and 1870. Although many of the claims for losses advanced by the pioneers have been shown to be grossly exaggerated, no one can deny that an enormous quantity of stock was stolen or killed. Not all these animals were attacked for the purpose of obtaining food and by no means all were eaten, for stock raiding was carried on for many other reasons; but there can be little question that thousands of cattle, horses, mules, sheep, and hogs went to supply the Indian larder. It has been estimated previously that destruction of provisions by the white people reduced the annual individual food supply of the Indians by about six pounds. If we allow six hundred pounds of flesh to a steer, then this loss would be made up by only four hundred steers annually. The actual slaughter was probably far in excess of this figure. Consequently, the natives, on the average, more than made up the losses by destruction. Indeed, it is quite likely that on many occasions whole villages and tribes were saved from literal starvation by the livestock which they were able to steal from the whites.

Unfortunately for the natives, the devastation wrought by the whites in retaliation for stock thefts was so complete that this excellent replacement for the lost aboriginal diet served only as a temporary measure. In the long run it was far too costly. In making his final adaptation and in adopting socially recognized methods for obtaining food, the Indian was assured of a supply which, though inadequate at first, was ultimately sufficient for his support. In detail these

⁶⁸ T. Cordua, "Memoirs, 1855." In Calif. Hist. Soc., *Quarterly* (1933), 12:310-311.

⁶⁹ R. A. Anderson, *Fighting the Mill Creeks* (Chico, 1909), p. 7.

⁷⁰ T. T. Waterman, *op. cit.*, 13:43.

methods to which he eventually resorted were various, and, since they involve consideration of the entire cultural relationship between the races, can only be mentioned at the present juncture.

The most obvious and most peaceful means for obtaining food was for the Indian to perform labor, in exchange for which he would receive victuals or the money wherewith to purchase them. This in turn was contingent upon the existence of work for which Indians could be employed, and upon their capacity and willingness to do such work. A second method was mendicancy or dependence upon private charity, at best an inadequate and unsatisfactory source of steady support. Since both these devices together, in the early days, could not carry the Indian population, it was necessary for the Federal government to step in through the mediation of the Indian Service and undertake direct relief through food subvention on a large scale.

Although acceptance of food materials as a private or public gift may not appear on the surface an effective response to conflict with the invading race, it must nevertheless be regarded as such, for considerations of ethics and racial pride are totally extraneous when biological survival is concerned. If the native population can in any way maintain itself in conflict with the new civilization by forcing that civilization to support it, then the native population has succeeded measurably in adapting itself to its altered environment. Taking advantage of humanitarian scruples is entirely legitimate in the raw struggle for racial existence, for the underlying object is to meet the changed conditions imposed by racial conflict in the most effective Darwinian manner. Therefore, if the aboriginal population found by experience that making the whites give food was more conducive to ultimate survival than taking it from them by theft or physical force, then that population had worked out the best possible adaptation to the existing environment. Viewed in this light, the "slothful," "sinful" behavior of the California Indian becomes another of the not too numerous evidences that the Indian was able to compete adaptively with the white race.

The implication of these remarks is that after a period of hard adjustment the Indian was able to gain for himself a sufficient subsistence under the American occupation. A subsidiary question may

be raised in this connection: whether, from the point of view of dietetics and nutrition, the new food supply was as adequate as the old. Quantitatively, the individual native was probably as well off as before the Americans arrived; that is, he no doubt maintained at least a minimum calorific intake. But was the new diet qualitatively as good? This question cannot be answered completely because we do not know the actual consumption of different kinds of foodstuffs. Certain points, however, are suggestive.

1. Despite the marked reduction of native food sources, these were by no means eliminated entirely. Even though the natural supply was, in the aggregate, below the minimum subsistence level for many years, it still formed the basis of the Indian dietary. There are repeated references in the early accounts to large quantities of staple foods gathered. The following items are indicative of the amounts involved:

A man hired Indians to exterminate grasshoppers on his ranch. At the end of six hours part of the killed animals weighed 42 pounds. (*Nevada Journal*, May 31, 1861.)

There is a big acorn crop this year. (*Sacramento Union*, Oct. 4, 1864.)

The Indians at Nome Lackee had a rabbit hunt lately. They caught several hundred. (*Ibid.*, March 29, 1859.)

The lower end of Shasta Valley is overrun with crickets as large as mice, and the Indians have collected a pile as large as any haystack in that vicinity. (*Ibid.*, July 22, 1858.)

At Nome Lackee Reservation, the Indians gathered 2,000 bushels of acorns. (*Ibid.*, Oct. 2, 1857.)

The Nevada County Indians are reaping a rich harvest of manzanita berries. (*Ibid.*, Aug. 10, 1855.)

At Hock Farm a visitor saw inhabitants preparing a large meal of boiled minnows and acorn mush. (*Ibid.*, July 10, 1852.)

The Indians are now catching salmon at Colusa. (*Ibid.*, April 13, 1852.)

At Clear Lake, the Indians eat fish and water fowl. They have an "immense stock" of these laid up on their island. They also eat at least one meal a day of tule roots, and the women were busy collecting grass seeds. (*San Francisco Bulletin*, June 1, 1865.)

At Knight's Landing blackberries are very abundant on Cache Creek. Many Indians picking them. (*Ibid.*, June 26, 1862.)

Starving Indians in Siskiyou and Shasta counties are living on the sap of the sugar pine. They strip off the bark and scrape off the sap. "Thousands" of trees are thus destroyed annually. (*Ibid.*, Feb. 21, 1859.)

The Indians on the south fork of the Merced, using "soap root," narcotized and caught 2,000 trout. (*Ibid.*, Aug. 1, 1858.)

Indians at Hock Farm are eating grasshoppers and manzanita berries. (*Marysville Appeal*, Aug. 31, 1861.)

The Indians near Grass Valley are all out hunting fresh plants for food. (*San Francisco Bulletin*, April 22, 1858.)

Several Indians from Placer County have been catching fish at Sacramento. "They have secured a large amount." (*Sacramento Union*, Sept. 29, 1862.)

Hoopa Valley Reservation: "Their main dependence for food, exclusive of that furnished by the Government, is salmon, acorns, berries, deer, grouse, and other game. Though not so plentiful as in former times yet . . . they manage to have plenty." (J. V. Farwell, *Rept. Commr. Indian Affairs*, 1871, p. 157.)

One gets the impression that for perhaps twenty years after American settlement wild food constituted at least half the Indian dietary.

2. The great carbohydrate staple of the natives was the acorn, which took the place of the maize common to most other North American natives. As has been suggested, the supply of this vitally necessary food staple underwent progressive diminution as settlement and stock ranching increased. However, it is probable that its loss was largely superseded by the use of flour. There is much evidence to the effect that, when the Indians bought provisions or were given supplies by the government, the bulk consisted of flour, as the following accounts testify:

The Mariposa Indians are complaining that they are not receiving their flour according to the treaty. (*Sacramento Union*, Nov. 24, 1851.)

In Grass Valley in 1852, "the Indians came to town often to get flour, and occasionally a poor piece of meat." (D. C. Fletcher, *Reminiscences of California* [Ayer, Mass., 1894], pp. 41-44.)

Four hundred and eighty captives were brought by Kibbe to San Francisco in 1859. Their rations were beef and flour "which the Indians cooked as it suited them." (*San Francisco Bulletin*, Dec. 16, 1859.)

The Indians on Four Creeks are being fed by the agent. One thousand bags of flour and 1,200 cattle will be sent them. (*Nevada Journal*, Nov. 29, 1851.)

In the early mining days: "After a while the Indians would take a pan of flour and mix it up with water and . . . eat it without cooking." (D. P. Barstow, "Statement," MS, 1877, Bancroft Library, p. 10.)

At a "grand cry meeting" near Stringtown the food consisted of one ton of flour as flapjacks and several barrels of acorn mush. (*San Francisco Bulletin*, Aug. 1, 1865.)

If this was so, then from the dietary standpoint there was no net reduction in food value. That the Indians themselves came to regard the white man's grains as an adequate substitute for acorns is indicated by several occasions on which thefts of such material occurred:

The Indians burned Pardee's ranch (Humboldt County). They also dug up the potatoes and threshed out the oats. (*Sacramento Union*, Nov. 8, 1858.)

Indians stole 15 sacks of wheat from Mr. Riggs's ranch. (*Red Bluff Beacon*, Aug. 25, 1858.)

"As soon as these fiends have eaten what flour they were able to carry away from Cooper's Mill [Humboldt County], it is expected they will make another attack." (*Sacramento Union*, August 12, 1861.)

Indians stole two horses, one cow, and some potatoes from Mr. Dersech, 25 miles north of Red Bluff. (*Red Bluff Beacon*, Feb. 4, 1863.)

The Indians raided the ranch of Mr. Cromby in Antelope Valley. They threshed out and packed off 20 bushels of wheat. (*Red Bluff Beacon*, July 24, 1862.)

Indians raided Mr. Bacon's barn near Red Bluff and stole 18 bushels of wheat and 500 pounds of shorts. (*Marysville Appeal*, July 15, 1865.)

Moreover, the quantities involved in such pilfering seem to demonstrate definite dependence upon cereal crops.

3. One of the most interesting dietary changes is related to stock raiding. It has already been mentioned that, for the purpose of getting food as well as for other reasons, the natives stole and ate tremendous numbers of domestic animals. Previously the Indians had been pretty largely vegetarians, although local groups at certain seasons had been able to obtain moderate quantities of animal food. Now, however,

large groups of them became, for a while at least, heavy consumers of flesh. As a result, the intake of protein and fat increased, as compared with that of carbohydrate. Moreover, the intake of animal protein was greater, as compared with that of plant protein. With our present state of knowledge on nutrition, we cannot make any categorical statement of the effect of such a dietary change on the character of the people. Nevertheless, the possibility remains that the reactions and the behavior of the Indians may have been modified by the great increase in meat consumption.

4. Regarding such accessory factors as minerals and vitamins, the opinion may be hazarded that there was little material change. The very wide variety of food sources in the aboriginal diet, which involved some animal food (fish, small game, insects) and many types of plants (nuts, acorns, seeds, grasses, tubers, leaves, etc.), must have ensured a pretty adequate intake of the common inorganic elements and the essential vitamins. After American occupation, it must be remembered, these sources were reduced but not cut off entirely. Therefore, the Indian still had access to a fair amount of vitamin-containing material. Furthermore, the addition of large quantities of fresh meat would tend to replace any accessory factors lost from the aboriginal supply.

In this connection, it is quite significant that the natives, in contradistinction to the whites, consumed the carcass of an animal *in toto*. They ate the liver, stomach, intestines, kidneys, and other viscera, which we now know to be an excellent source of many accessory factors. This habit of the Indians was the cause of much disgusted comment by the whites, who, as ignorant as the Indians of modern dietary principles, regarded the omnivorous tendencies of the latter as a mere manifestation of innate barbarism and brutishness. It is rather ironical as we look back on it now to see how the whites were actually promoting the welfare of the Indians. The following may serve as examples:

Four steers drowned in the Yuba River. They were given to a group of Indians who consumed every scrap of them. (*San Francisco Bulletin*, Sept. 22, 1857.)

"I butchered in Coloma one spring, and the Indians would hang

around to get the offal. They would take the intestines . . . and eat them with a great deal of gusto." (Barstow, "Statement," p. 10.)

"In Marysville, passing by one of the slaughter houses, I saw a collection of about twenty of these wretches waiting for the offal. They were in the habit of presenting themselves regularly every morning at the same place and at the same hour to gather the refuse of the slaughtering establishment." (H. R. Helper, *The Land of Gold* [Baltimore, 1855], p. 273.)

At dawn the Indians can be seen "prowling around in search of miserable offal for which they must compete with the dogs." (San Francisco *Bulletin*, Feb. 10, 1858.)

Indeed, the Indians who lived on the fringes of the settlements made a constant practice of collecting the viscera and other unwanted portions of slaughtered animals. On the whole, the evidence seems to indicate that in making the change from aboriginal to civilized diet, the natives suffered no material shortage in essential accessory factors.

LABOR

The preceding three environmental factors, homicide, disease, and diet, are those which determined in most direct and acute fashion the physical well-being and survival of the Indians as a race or biological entity. But with human beings, racial conflict and adjustment by no means end when the demands of pure physical survival have been met. In order for the final resolution of the competition to be successful, the group on the defensive must reconcile itself to the economic, social, and cultural changes wrought by the conquering order. It is to this group of relatively intangible factors that attention must now be directed.

Under modern civilized conditions the outstanding single problem confronting the individual, and by extension the group, is that of making a living. This naturally includes the entire range of phenomena embodied in the field of economics, a range so vast that it can scarcely be touched in a single brief survey. A good deal of reduction and simplification is therefore demanded. To this end the scope of discussion of these factors is narrowed to one primary aspect, labor. No clash between economic systems was involved, nor were any significant trade relationships or deep-seated financial considerations

concerned. The Indian touched the white economic civilization only in the capacity of laborer. It has been pointed out in the matter of elementary food procurement that the native attempted several responses to the disturbance of the aboriginal environment before he met with more than transitory success. He was finally forced to adopt the white man's system of obtaining subsistence, that is, working for it.

To understand the background of the Indian labor problem in California one must go back to the colonial era, for the economic system established by the Ibero-Americans made a profound impression upon that of the later Anglo-Americans. It must first be remembered that the settlers from New Spain were few in number and that they had been trained by centuries of colonial experience to depend upon subject races for a labor supply. A further consideration of importance to the development of the California labor problem was that they simultaneously introduced three systems of labor.

The first may be termed the "communal" system. Its governing principle was that the labor contributed by the individual went into a common pool from the resources of which the individual received his support—food, shelter, clothing, and other necessities. The missions, which were operated entirely according to this system, were remarkably successful. In theory the component units, the natives, worked for their own benefit, since all products and all income were to accrue to them and ultimately they were to inherit jointly the capital structure which they had built up. In practice, the neophytes were reasonably well supported through the efforts of conscientious missionaries. However, the method carried with it one fatal defect. The Indians, converted direct from barbarism, were wholly unable to appreciate the complex theory involved and could not be persuaded voluntarily to donate immediate labor for remote benefits. Consequently, in order to set up a workable scheme, the church administrators were obliged to exercise a coercion which rapidly induced the development of a full-scale forced-labor system. Furthermore, most unfortunately, they also utilized labor as a punitive device for all sorts of delinquency. As a result, over a period of years, the mission neophytes came to confuse economically valuable labor with duress and punishment, an effect which further intensified Indian aversion to

labor per se. This problem of mission labor has been discussed at length in another paper⁹¹ and need not be mentioned further.

The second may be called the "peonage" system, developed by the ranchers and other large landowners. Here the motive of mutual benefit was completely absent. To be sure, large groups of workers might be aggregated in a single economic unit, but the fruits of their efforts, particularly as regards capital improvements, were almost completely absorbed by the overlord himself. The workers supposedly received wages, usually in the form of homes, food, and commodities; yet the size of the wage—and, indeed, its payment at all—was entirely in the hands of the employer. Moreover, in order to maintain the flow of undependable and transient Indian labor, coercion was usually resorted to. This might take the form of innocent persuasion, or economic pressure through control of food reserves, or out-and-out kidnaping and slavery.

These were the two primary forms of labor open to natives prior to American rule. There was, to be sure, in existence the third, or "free," system, but this was in effect only on a small scale, among the poorest ranchers and in domestic service. The free system, obviously, is that whereby the individual receives fair compensation and is at entire liberty to accept or relinquish employment in the open competitive market. It stands thus in direct contrast to the communal and peonage systems which prevailed prior to 1835.

When the missions fell, the communal system disappeared, but peonage and free labor remained open to the Indian. They had grown up alongside the mission system but in point of numbers and economic importance had been subordinate to it. Subsequent to 1835, however, first the peonage and then the free system came to predominate.

Very shortly following the establishment of the missions, a moderate number of civilian colonists were brought up from Mexico, and the towns of San José and Los Angeles were founded. These "pobladores" were expected to draw upon the native stock for labor. But most of the available Indians were converted and absorbed by the missions for their own purposes. This left only the gentile population to serve as a reservoir of man power. The seriousness of the situation being

⁹¹ S. F. Cook, *The California Indian and White Civilization: I. The Indian versus the Spanish Mission*.

recognized, a rather elaborate code was formulated by the governors whereby, under certain restrictions, the colonists were permitted to employ unconverted Indians. In the beginning, the labor market thus created was free and competitive, since demand exceeded supply and inducements were necessary in order to get an adequate number of workmen. Moreover, at that stage the individual white men were on a more or less equal economic footing. Soon, however, two tendencies developed. The first was a growing reluctance on the part of wild natives to come in as day labor. This attitude was due to harsh treatment, lack of adequate remuneration, and fear of involuntary conversion. Insufficient voluntary labor meant that the civilian employers went into the field and compelled the natives to offer their services. After obtaining the workers desired the employers were obliged to detain them by force and to ensure competent performance by a system of punishment.⁹² The early advantage held by the natives due to a labor shortage was by this means eliminated, and free employment reduced to a minimum.

The second tendency, which accompanied the universal introduction of force, was the unequal financial advancement of the civilians. Although during the first few years of settlement the colonists were more or less equal in status, later, by virtue of numerous factors—birth, intelligence, social standing, political influence, and the like—two classes emerged. One was the "poor white," the man who tilled a small acreage and owned a few head of stock. He was unable either to bring much physical pressure to bear on the Indian or to remunerate him satisfactorily. Consequently, particularly after 1835, there did exist a restricted free labor market among this group. The other class was that of the *ranchero* who received a really large grant of land from the government and who required a big staff to develop it. It was this class which not only furnished the color of the California social background, but developed the peonage type of labor system. For these men the use of force was easy, and the award of compensation pos-

⁹² That a system of conscript labor was universally in vogue by 1790 is attested by the many official edicts and pronouncements, as well as by repeated protests on the part of missionaries. The abuses were recognized by all parties, but economic necessity as a rule took precedence over humanitarian considerations, in spite of formal decrees to the contrary.

sible. In short, the hacienda-peon society was introduced without much modification from Mexico to California and was impressed thoroughly upon the social thought of the state.

As a rule, the natives were brought to the ranches in large groups and maintained there in full-scale villages. Alternatively, they were left to inhabit their original rancherías and obliged to work whenever necessary. In return, they were kept supplied with food, clothing, and some useful utensils. The *ranchero* was the lord and master with full power of discipline. By 1840 there were some dozens of these feudal establishments, each maintaining from twenty to several hundred Indians—men, women and children—in all, perhaps from two to four thousand persons.

Now when, in the 'forties, foreigners began to drift in, they very characteristically fell into the ways of the country. Naturally aggressive, usually with a good business sense, they immediately began to imitate the ruling caste and to take out grants themselves. The very mention of such names as Sutter, Cordua, Savage, Yount, or Livermore calls to mind their vast estates and patriarchal way of life. More hundreds of Indians were gathered in, and it is highly probable that, had not the gold rush intervened, California would have become as thoroughly peonized as Old Mexico. It is indeed significant that well into the 'fifties nearly every wealthy American adopted without question the existing labor system. Bidwell and Redding, for instance, maintained serflike bands of Indian retainers until the Civil War period.

On the whole, the Indian adjusted himself with facility to the peonage system of labor. That he did so was demonstrated in two ways. In the first place, the retinue of servants and workers built up by certain *rancheros* was much larger than could have been held together by force alone. Consider for instance the examples furnished by M. G. Vallejo, Sutter, and Bidwell. The two former gathered around them, or controlled the activities of, entire tribes of natives. Their possessions included hundreds of square miles of territory. Their capital goods, primarily livestock, represented an enormous investment. In order to obtain and hold the necessary labor supply, they treated their peons well, kept them supplied with food and clothing, and paid them

what cash they could. As a result their Indians were reasonably contented and labored faithfully. A vivid picture of the peonage system at its best has been drawn by Salvador Vallejo, and is worth quoting:⁸³

... Many of the rich men of the country had from twenty to sixty Indian servants whom they dressed and fed . . . our friendly Indians tilled our soil, pastured our cattle, sheared our sheep, cut our lumber, built our houses, paddled our boats, made tiles for our homes, ground our grain, slaughtered our cattle, dressed their hides for market, and made our unburnt bricks; while the Indian women made excellent servants, took good care of our children, made every one of our meals . . . Those people we considered as members of our families. We loved them and they loved us; our intercourse was always pleasant . . .

Now it is clear, and mission experience stands as testimony, that physical power alone could not have drawn together and held together a relatively harmonious aggregate of a few white people and a horde of Indians like that of the Vallejo estate. Had the natives been unhappy, discontented, and rebellious, their labor would have been worthless, and the entire project would have disintegrated. This is precisely what did happen to the Kelseys. These Americans, endeavoring to establish themselves south of Clear Lake, adopted the most brutal and repressive measures, starving, beating and murdering their Indian workmen. In the end, not only was their attempt an economic failure, but the exasperated natives finally resorted to murder. There can be little question therefore that, when administered in a humane and rational manner, the peonage system was reasonably satisfactory to the Indians. In the second place, we find that remnants of the Indians persisted in staying with certain wealthy *rancheros* long after it became impossible for the latter to exert any physical pressure whatever.⁸⁴

⁸³ Salvador Vallejo, "Notas históricas sobre California," MS, 1874, Bancroft Library.

⁸⁴ The Marysville *Appeal* in an editorial on February 9, 1860, cited Major Bidwell of Chico, who maintained at least one hundred Indians on his ranch. They did good work, according to the editor, and were well cared for.

The Ukiah *Herald*, quoted by the Sacramento *Union*, Sept. 23, 1861, stated: "A good many Indians have heretofore been induced to retain their camps in squads of half a dozen to a dozen families on certain ranches so that the owners could have the benefit of their labor, making them such remuneration as the Indians would accept." (Italics mine.)

George Gibbs in 1851 (*Journal of the Expedition of Col. Redick M'Kee*, in Schoolcraft: *Archives of Aboriginal Knowledge*, 3:100) found numerous ranch Indians in the vicinity of Santa Rosa. He said: "These ranch Indians are . . . perfectly under the control of the

After 1848, civil law and public opinion completely put a stop to the practice of capturing masses of natives, of punishment by severe corporal methods, and of using military means to prevent escape. Nevertheless, for many years former Indian employees remained with the Vallejos. Sutter supported an Indian colony as long as he lived, and several other former "hacendados" maintained a semipeon establishment for one or two decades.⁶⁵ Obviously, if the particular natives under consideration had not become pretty well adjusted to their situation, they would simply have gone away.

For several reasons the peonage system, as administered by the more liberal landowners, seemed particularly well suited to the Indian.

1. In order to accomplish a successful transition from aboriginal society, no complex ideological adjustment was demanded, as it was for the communal system. The reward for effort was concrete and individual remuneration, presented in a form (commodities) readily comprehensible. No social consciousness was necessary, and no realization of the distinction between group and personal welfare.

2. No individual initiative was necessary, owing to the intrinsic compulsion of the system and to rigid supervision. Herein peonage differed from free labor, for with the latter the initiative and compulsion had to be generated within the person, rather than superposed from without. The Indian was thereby relieved of the arduous task of finding suitable employment in the first place and, subsequently, of acquiring sufficient skill to retain it. The often difficult process of learning new methods and handling strange tools was thus spared him because during his period of apprenticeship his material support was secure. His induction into the mysteries of the strange material civilization was made very easy for him, and strictly manual adaptation to new mechanical processes facilitated.

Spanish proprietors, who, in fact, have always treated them as peons and inculcated the idea of their obligation to labor."

In the 1870's Alexis Godey acquired a ranch in San Emigdio. He used all Indian labor. He gathered a group and formed a rancharia, which persisted as such for several years. (See F. F. Latta, "Alexis Godey in Kern County," in Kern Co. Hist. Soc., *Fifth Ann. Pub.* [1939], p. 38.)

⁶⁵ Major Bidwell retained his Indian rancharia till his death. Subsequently Mrs. Bidwell deeded in perpetuity to these Indians the rancharia lands on which they were living. Several families are still resident on this spot near Chico.

3. The type of work demanded was relatively congenial. All of it, for practical purposes, was outdoor manual labor. Although the California indigenes had never developed a complex agriculture, they had also never been far removed from the soil. They had depended upon wild plant products and were familiar with growth and seasons, drought and rainfall. The shift to simple agricultural procedures, such as ploughing, hoeing, and reaping, demanded no violent readjustment from the mechanical standpoint. Even more direct was the acquisition of knowledge concerning livestock. Here all testimony agrees that as a vaquero and stock tender the Indian displayed great natural aptitude. For the women, domestic service and household tasks were no more than an extension of the labor to which they had always been accustomed while in tribal relationship. The form was slightly altered, but the content was the same. In short, the peonage system almost automatically put the Indian at those tasks for which he was by nature and training best suited. Free labor, on the other hand, required him to explore a multitude of new avenues with which he was totally unfamiliar and to adopt many pursuits which he was at that time entirely unprepared to undertake. His ratio of actual success was, therefore, much higher as a peon than as a free agent.

4. The aboriginal living conditions were relatively unchanged. The custom of appropriating entire rancharias or of forming them where they did not already exist allowed the Indians to continue their home life undisturbed. Their dwellings remained the same, their families, and often their clans, remained united. Community life could proceed very much as it always had. They were not massed together as in the missions, nor were they split and scattered among an alien population.

5. The cultural, religious, ceremonial, and sexual life of the Indian was not disturbed to a material extent. As a rule, the white man who was lord of the domain permitted them to retain native custom, or at least he did not care if they did so, provided his own economic interests were unaffected. The Indian was thus relieved of the mental and emotional strain imposed by the necessity of suddenly acquiring a new religion and moral code, as in the missions. On the other hand, he did not have to force his ways into conformity with a host of new

customs and regulations as he was obliged to do when he lived in a town or a thickly settled farming district.

To summarize, it may be seen that peonage involved the least intense conflict of all three labor systems. The smallest degree of adjustment was necessary, and therefore the Indian found it the easiest road to economic adaptation.

The foregoing remarks apply to peonage almost in its ideal form. As previously pointed out, this ideal was most closely approached under most of the prominent California landowners who thoroughly understood the system and under the earlier, more enlightened foreigners. When the gold rush and Mexican War brought into California thousands of ordinary Anglo-Americans plus an enormous criminal element recruited from the scum of the earth, conditions changed greatly. Of primary importance was the disruption of the great landed estates and the disappearance of the pastoral economy which made them possible. A few survived for a while but, as the backbone of California society, the great estates vanished. The peonage system in its semi-ideal form likewise passed away, leaving essentially free labor as the only recourse for the native. However, the principle of forced labor, implicit in both the mission and pastoral labor systems, did not immediately die. It was absorbed and modified by the incoming Americans, perhaps subconsciously, and became manifested in certain phenomena of interest. These phenomena, although possibly not of vast quantitative importance, merit some consideration as showing how the Indian was the victim of the influence exerted by the Spanish on the American civilization.

The first manifestation was the typically Yankee attempt, through the California legislature, to legalize what amounted to the peonage system. The form of these statutes was derived from early American and English, not Iberian, sources. But the essence followed quite closely the tenor of Spanish and Mexican official decrees and public customs. There were three enactments of significance.⁶⁷ The first denied the right of Indians to testify in court, thereby shutting the door very effectively to any relief in the courts. The second decreed that

⁶⁷ The detailed process of lawmaking may be followed in the journals of the California legislature from 1850 to 1855. It does not appear worth while here to dissect this legislation from the legalistic standpoint.

any Indian, merely upon the word of a citizen, might be brought into court and declared a vagrant. Thereafter, he might be put up at auction and his services as a laborer sold to the highest bidder for a period not to exceed four months. No compensation, of course, was given, although the owner was expected to support the Indian. This act obviously made it possible for a native to be held not only as a peon, but as an actual slave, for any unemployed Indian could be proved a vagrant. The third statute was the so-called "indenture law," whereby any Indian adult or any child, with consent of the parents, could be legally bound over to a citizen for a long term of years. During this period his labor was available in return for subsistence.⁶⁷

The extent of application of these laws is impossible to determine without a minute examination of all the court records prior to 1860. It is likely that their use was not very extensive among the general population. The contemporary press makes frequent mention of them but almost invariably in an unfavorable tone and for the purpose of pointing out abuses. Thus in 1861 the *Humboldt Times*⁶⁸ reported several cases of apprentices absconding from masters to whom they were indentured. The *Marysville Appeal* for March 22, 1861, complained that persons in Humboldt and Tehama counties were binding out Indians over age and under age. The *Humboldt Times*⁶⁹ stated that the former Indian agent V. E. Geiger got eighty natives apprenticed to him to work for him in the Washoe mines. "We hear of many others who are having them bound in numbers to suit." In the same year there was considerable scandal because certain men "recently connected with the Nome Lackee Reservation" had persuaded the county judge of Tehama County to indenture to them "all the most valuable Indians on the Reservation."⁷⁰ In some instances various persons even claimed chattel rights over these natives. A particularly offensive case occurred in Ukiah in 1865.⁷¹ A man in that town hired an Indian to do a job. The latter met one Bob Hildreth, who claimed him as his property. When the Indian said he was work-

⁶⁷ The testimony law was subsequently repealed. The indenture law may still be in force. In a very cursory examination I have found no evidence of its repeal.

⁶⁸ Quoted by the *Marysville Appeal*, November 17, 1861.

⁶⁹ Quoted by San Francisco *Bulletin*, March 2, 1861.

⁷⁰ *Marysville Appeal*, January 4, 1861; *Sacramento Union*, February 4, 1861.

⁷¹ *Sacramento Union*, August 19, 1865, correspondence from Ukiah.

ing for another man, Hildreth tied him to his horse and dragged him to death. Now Hildreth's claim was based upon the fact that he had bought the property of the late notorious Captain Jarboe from the widow. She stated she had set Jarboe's Indians free subsequent to his death. But Hildreth claimed they were part of the estate, and hence inalienable *under the apprentice law*.

It is probable that these cases were exceptions sufficiently flagrant to interest the newspapers. But the fact that the exceptions were so few suggests the probability that the practice of wholesale indenturing was not very widespread in the aggregate but was limited to a relatively few wealthier persons. Nevertheless, the effect on the Indians must have been injurious, for even barring the abuses the uncertainty and the injustice of the entire system must have exerted a marked moral effect.

More serious and more vicious in American hands was the second direct carry-over from colonial custom. This was the habit of out-and-out kidnaping of individuals for subsequent sale. For many years prior to American occupation it had been the habit of the landed proprietors to make "raids" upon unconverted tribes and villages in order to "capture" Indians. The latter were then brought to the ranches and established as peons. This practice was continued by the rancheros during the troubled period between 1845 and 1850, and even subsequently. The chief sufferers at this time appear to have been the group of tribes surrounding Clear Lake. Thus Revere reported that in 1846 the Indians on the southeast shore assumed that his party was hostile because they had been so frequently raided by Californians who kidnaped persons of all ages.⁷² L. L. Palmer states that the Sanel and Anderson valleys were heavily raided for transient labor.

For instance the potato digging season was a time when help was most needed, and, as most of the local Indians were gone, assistance had to be had from some source, so a raid would be made on the upper valley tribes.⁷³

It should be noted here that the problem of transient or migratory agricultural labor had already arisen and was being solved by methods inimical to the interests of the workers. The activities of the infamous

Kelsey brothers have already been mentioned. The Kelseys' most sensational performance was the kidnaping of several score Clear Lake Indians, their transportation to Red Bluff to work in mines, and their desertion when the mining venture failed.⁷⁴ In 1855 Senator Sebastian read to the California legislature a letter from General E. F. Beale, written in 1852.⁷⁵ The general stated that numerous Indians were to be found at Rancho San Pablo in Contra Costa County who had been stolen from Clear Lake by Raymond Briones and Ramon Mesa. These persons "have for some time made a business of catching Indians and of disposing of them in various ways." This last statement is significant for it marks the transition from the earlier to the later system. The old Californian and to some extent early American ranchers captured Indian labor for their own use. The American variant which developed in the early 'fifties was to catch or kidnap the natives for sale. In other words, the boundary was at last crossed from technical peonage to actual slavery.

The extent of this Indian slave traffic, morally not one bit less offensive than the Negro slave trade, may have been greater than is now realized. It is therefore worth while to put certain evidence on review.

On October 2, 1854, the *Alta California* published an article in which it was stated:

Abducting Indian children has become quite a common practice. Nearly all the children belonging to some of the Indian tribes in the northern part of the state have been stolen. They are taken to the southern part of the state and there sold.

In the same year a Mexican, Marcus Vaca, was arrested in Sacramento on the charge of kidnaping Indian children for disposal in that town.⁷⁶ The case was dismissed because Vaca pleaded that he had no intention of selling the children. On May 23, 1857, the *Butte Record* noted the presence in Chico of a Mexican "who has been in the habit of stealing Indian children and selling them to Mexican rancheros in Southern

⁷⁴ There are numerous conflicting accounts of this episode, but the main outlines are reasonably clear. Probably between seventy-five and a hundred natives were taken to the valley, and probably not more than ten returned. The whole expedition was engineered with a brutality worthy of the *conquistadores* at their worst.

⁷⁵ In *Rept. Commr. Indian Affairs*, 1856.

⁷⁶ *Sacramento Union*, September 13 and 14, 1854.

⁷² J. W. Revere, *op. cit.*, pp. 88, 114.

⁷³ *History of Mendocino County* (San Francisco, 1880), p. 168.

California." The following year the San Francisco *Bulletin*⁷⁷ in an editorial claimed that the practice of enslaving Indian children was far from having stopped for there are "not a few of these servants in San Francisco today." Not long afterward W. H. Brewer averred:⁷⁸

It has been for years a regular business to steal Indian children and bring them down to the civilized parts of the state, even to San Francisco, and sell them—not as slaves but as servants to be kept as long as possible. Mendocino County has been the scene of many of these stealings . . .

In 1860 the Nevada *National*⁷⁹ stated that a band of whites had kidnaped a number of Washoe children on the Truckee and were bringing them into California. The *Petaluma Journal*⁸⁰ said:

The reason why the Indians on Eel River persist in killing the stock of the settlers is that children belonging to the Indians have been stolen and sold to the whites in the settlements below.

An editorial in the Marysville *Appeal* for December 6, 1861, contained the following full discussion of the problem:

But it is from these mountain tribes that white settlers draw their supplies of kidnapped children, educated as servants, and women for purposes of labor and of lust. . . . It is notorious that there are parties in the northern counties of this state, whose sole occupation has been to steal young children and squaws from the poor Diggers, who inhabit the mountains, and dispose of them at handsome prices to the settlers, who, being in the majority of cases unmarried but at housekeeping, willingly pay fifty or sixty dollars for a young Digger to cook and wait upon them, or a hundred dollars for a likely young girl. Recent developments in this vicinity are sufficient proof of this. . . .

Further enlightenment as to methods comes from Agent W. P. Dole in the same year:⁸¹

In the frontier portions of Humboldt and Mendocino Counties a band of desperate men have carried on a system of kidnapping for two years past. Indian children were seized and carried into the lower counties and sold into virtual slavery. These crimes against humanity so excited the

⁷⁷ January 2, 1858.

⁷⁸ *Up and Down California* (written about 1863; published in New Haven, 1930), p. 493.

⁷⁹ Quoted by Marysville *Appeal*, August 4, 1860.

⁸⁰ Quoted by Sacramento *Union*, March 7, 1861.

⁸¹ Yuba City, July 15, 1861, *Rept. Commr. Indian Affairs*, 1861, p. 149.

Indians that they began to retaliate by killing the cattle of the whites. At once an order was issued to chastise the guilty. Under this indefinite order a company of United States troops, attended by a considerable volunteer force, has been pursuing the poor creatures from one retreat to another. The kidnappers follow at the heels of the soldiers to seize the children, when their parents are murdered, and sell them to the best advantage.

The Sacramento *Union*⁸² made even more serious charges stating that there was a class of "pestilent" whites who systematically killed adults to get the children to sell. The latter brought from thirty to two hundred dollars and might be seen in every fourth white man's house. As late as 1867 L. V. Bogy, agent for Round Valley, found:

It was not uncommon for residents in want of a servant to buy, of a degraded class of mountaineers, known as "squaw men," children of tender years, who must have been stolen from their parents by these reckless outlaws.⁸³

A few of these crimes reached the courts. What happened then exposes only too clearly the general attitude of white society. Three cases may be mentioned as examples.⁸⁴

On October 16, 1861, two Marysville citizens found three men, Johnson, Wood, and Freak, with nine Indian children. They tried to sell the children (three to four years of age) for \$50 apiece. Four had already been sold at prices ranging from \$55 to \$80. The citizens reported to the Indian Agent, who arrested the men and had them lodged in the Yuba County jail at Marysville (there being no jail in Sutter County, across the river). On the eighteenth, J. A. McQuaid, their counsel, applied for a discharge under *habeas corpus*. Judge Bliss then held that they were not legally held in Yuba County, since there was no evidence that there was any charge against the men. The sheriff of Sutter County laid claim to them, but McQuaid said the sheriff had no authority to make an arrest in Yuba County. They were again arrested in Yuba County, but the next day McQuaid argued for a discharge on the ground "that the papers were incomplete and informal and that the statute of 1850 under which they had been arrested was

⁸² Editorial, July 19, 1862.

⁸³ *Rept. Commr. Indian Affairs*, 1867, p. 117.

⁸⁴ San Francisco *Bulletin*, October 21, 1861; Sacramento *Union*, October 18, 19, 1861; Marysville *Appeal*, October 17, 18, 19, 24, 1861.

repealed by the statute of 1860." Finally Judge Bliss held the men in \$500 bail to appear before a magistrate in Humboldt County, where the kidnaping had actually occurred. The three then promptly left town, jumped bail, and were never heard of officially again. Meanwhile the nine little waifs were "provided with comfortable homes, most of them in Marysville."

On March 27, 1861, it was reported that settlers in Long Valley, Mendocino County, had been kidnaping children.⁸⁵ This was admitted by one G. H. Woodman, who claimed it was done with consent of the parents. The next year there was a warrant out for Woodman's arrest.⁸⁶ He had been seen in Ukiah with twenty children. This time he evidently escaped, but the following spring he was actually taken into custody for having kidnaped thirteen children.⁸⁷ However, when he came up for trial he was acquitted.

In 1864 two men named John were arrested in Colusa County for kidnaping two Indian children from Long Valley, Mendocino County.⁸⁸ They were taken to Ukiah and brought before a magistrate, who immediately proceeded to discharge them.

From these three acquittals and from the total lack of any convictions it is clear that kidnaping of the natives was very lightly regarded by the American settlers. Such ethical numbness can be explained only by the general dislike of Indians, by the feeling that perhaps Indian children were better off in white homes than with their wild parents, and by a purely selfish desire to get cheap labor.

Aside from the cases just cited we have one bit of concrete data relating to the numbers concerned. The *Alta California* of October 6, 1862, recorded a statement by one August Hess that one hundred Indian children had been taken through Lake County that summer. In the light of other evidence this figure does not seem excessive. Now if one hundred went through Lake County, another hundred certainly went down the Sacramento Valley and another fifty were taken along the coast. This would indicate something like two hundred fifty kidnapings in 1862. The practice began about 1852 and continued at least

⁸⁵ *Napa Reporter*, quoted by *San Francisco Bulletin*.

⁸⁶ *Marysville Appeal*, April 3, 1862.

⁸⁷ *Sacramento Union*, March 13 and 26, 1863.

⁸⁸ *Marysville Appeal*, December 17, 1864.

till 1867. During these fifteen years, then, perhaps between three and four thousand children were stolen. This estimate would not include squaws taken for concubinage or adults for field labor. The northern tribes must have suffered really heavy losses.

The effect on the Indians of this peculiarly Yankee kidnaping industry was exasperating to the highest degree, as is suggested by some of the contemporary reports.⁸⁹ It was not only an irritant which drove some of them to physical and violent retaliation, but it intensified and prolonged their aversion to the type of labor in which the kidnaped persons were employed. To that extent, therefore, whatever the reaction may have been, the Indian was retarded in his adoption of white labor customs.

It will be observed, in the outline given above, how the scope of physical compulsion changed with the coming of the Americans. Quite clearly, in the beginning the latter merely took over and utilized the existing practice of mass raids for farm labor. But in the early 'fifties this procedure altered to one of individual kidnaping, primarily of children for domestic and farm service—almost a bootlegging enterprise. The reason doubtless lies in the fact that the large-scale demand for Indian adult labor almost entirely ceased. This in turn was caused, first, by the replacement of the great cattle ranches by a vast number of small subsistence farms, on which Indian labor could not profitably be employed. Second, the labor market in the 'fifties was glutted by thousands of white ex-miners and particularly by Chinese. The demand for Indian labor, with the exception of domestic servants, thus disappeared entirely, and with it the profit of the slave trade.

One is tempted from this point to follow through the persistence of the forced-labor idea in subsequent years. It would be possible to show how the cheap labor market passed from the Indian to the Chinese and how the same rationale of peonage and compulsion was applied to the latter. One might then pass on to the new groups, each of which gradually replaced the other—the Italians of the 'eighties, the Mexicans and Filipinos of the early nineteenth century, down to the "Okies"

⁸⁹ One need only refer to the kidnapings of the past decade to appreciate the feeling of modern Californians with respect to this crime when perpetrated on themselves. In view of the strong current public opinion it is even more difficult to understand the callousness of the early immigrants toward wholesale stealing of native children.

of our own times. Simultaneously, one could trace the rise of great agricultural interests, dependent upon masses of unskilled, transient workers, which utilized these groups one after another. Finally, there could be delineated the thread of peonage or force in some aspect as applied by the landowners to all these systems. The influence of Iberian on Anglo-American civilization, as derived from primitive Spanish-Indian labor relations, could be demonstrated by such a survey.

A combination of circumstances—disintegration of large feudal estates, relative decline of the stock industry, reduction of native population, influx of new subservient races, and perhaps a more enlightened public opinion—all combined to destroy the preëminence of the peonage system and to force the Indian into free labor. His success or failure in this field must now be considered.

Since this essay is concerned primarily with the adaptation of the Indians to the conditions imposed by the white race, it is necessary to inquire briefly into the kind of employment utilized, the extent of such employment, and the difficulties encountered by the natives in taking advantage of their opportunities. The kind of work engaged in by Indians has always been determined, apart from sheer number of jobs available, by their capacity to do the work and by the opinion of white employers as to their capacity. In the early period, and indeed until recently, the opinion has been universally held that the native was fitted only for manual tasks and personal or domestic service. Such a feeling has been quite natural, since the transition from primitive economy to the more complex types of civilized labor was too great for the Indian race to encompass immediately. Nevertheless, quite early the Indians showed their ability to handle a great diversity of the less intellectual pursuits. In agriculture they quickly became familiar with most of the processes known to and employed by the whites. They did any kind of farm or ranch work, including planting, cultivating, and harvesting any crop. As stock tenders and vaqueros they were admittedly unexcelled. In the northern counties they were widely used as sheep shearers. As miners, in the 'fifties, they did very well, since they appeared able to assimilate readily the entire technique of both prospecting and panning gold. Freighters and expressmen found them very valuable as muleteers and packers, as well as guides in more

difficult country. They found jobs on the river packets as deckhands and longshoremen. In short, Indians fully penetrated that segment of the labor field which included unskilled work out-of-doors. In addition, the natives frequently capitalized their knowledge of primitive crafts. Large quantities of fur-bearing animals were caught and the pelts sold by them, and they sold fish, game, and wild crops as well. To a small extent, for the demand was slight, they manufactured basketry and native drygoods. Finally, the women were widely employed in domestic service. It may thus be perceived that the field into which the Indians might fit was of considerable scope and was undoubtedly adequate to absorb all the labor which they were in a position to supply.

The degree to which these opportunities were utilized is difficult to determine. A more extensive investigation than is here possible might reveal the exact extent to which Indian labor was responsible for the progress accomplished between 1850 and 1870. However, a few facts may be cited to serve as a first approximation. With respect to general farm labor the majority opinion seemed to be that the Indians were quite widely employed. The following statements are representative:

Most of the able-bodied men from Mendocino Reservation worked for farmers.⁶⁰

The whites would employ only one-fifth the Indians at Fresno Indian Farm, except at harvest time.⁶¹

In Mendocino County the men worked occasionally for farmers.⁶²

The farmers needed them for labor and they worked well.⁶³

In 1862 a "large number" of Clear Lake Indians came to the Napa Valley to harvest. The exodus to the northern mines threatened a scarcity of hands "but these Indians are helping to fill the gap." In 1865 it was noted that the "usual" number of Indians from Lake County were again in Napa.⁶⁴

In Mendocino County the settlers employed "many" local Indians.⁶⁵

⁶⁰ H. L. Ford, *Rept. Commr. Indian Affairs*, 1856.

⁶¹ M. B. Lewis, *ibid.*

⁶² T. J. Henley, *ibid.*

⁶³ *San Francisco Bulletin*, Oct. 21, 1861.

⁶⁴ *San Francisco Bulletin*, July 7, 1862; *Sacramento Union*, July 17, 1865.

⁶⁵ D. W. Cooley, *Rept. Commr. Indian Affairs*, 1806.

At Little Lake and Walker's Valley, Mendocino County, three to four hundred local Indians were engaged as harvesters.⁹⁹

"Seeding and harvesting the crops are the periods of the year at which a large amount of Indian labor is required."¹⁰⁷

"They already do a large share of the work that is done for the people of this vicinity."¹⁰⁸

With regard to sheep shearing the following items may be added:

"The Indians can and do . . . render efficient service to the citizens of the vicinity [Tule River] as herders and shearers of sheep . . ."¹⁰⁹

"The Indians of this vicinity [Round Valley] . . . form the 'laboring class' of that part of California. They are relied on by the citizens in the vicinity . . . especially in shearing sheep, in which, on account of their skill and carefulness they are decidedly preferred to white laborers and are sent for from far and near. They shear as many as forty thousand sheep semi-annually at five and six cents per head."¹⁰⁰

"Sheep shearing in this part of the country [Tule River] is done almost exclusively by Indians and lasts nearly six weeks both in the spring and fall. It is not difficult for a good shearer to earn \$100 at each shearing."¹⁰¹

It is possible from these statements—principally by reservation agents—to get an idea of the wage scale under which the Indians labored. The majority of the reports place the daily wage at from fifty cents to two dollars, depending on the skill required and the shortage or excess of workers. If we assume one dollar a day as a fair average, we find that this amount conforms quite closely to the usual standard of the time for unskilled labor. Certainly it is no less than that received by other racial groups for the same work and, allowing for differences in standard of living, is fully equivalent to that paid today.

In the field of mining, particularly during the first two or three years after the discovery of gold, the Indians participated to a very great extent. The natives worked the placers both as hired help and as independent operators. Frequently large groups of Indians were employed

⁹⁹ L. V. Bogy, *ibid.*, 1867.

⁹⁷ N. G. Taylor, referring to Tule River, *ibid.*, 1868.

⁹⁸ H. B. Sheldon, *ibid.*, 1884.

⁹⁹ E. P. Smith, *ibid.*, 1875.

¹⁰⁰ *Rept. Commr. Indian Affairs*, 1875. At five cents per head the total income would have been \$2,000.

¹⁰¹ C. G. Belknap, *ibid.*, 1886.

by white men, sometimes with the use of force, sometimes as a free venture. Many of these persons broke away and worked for themselves, or even hired others to work for them. The local foothill tribes operated as a rule independently, but often found employment with white miners. The distinction between hired laborers and independent miners was, therefore, so confused and so fluctuating that any attempt to segregate the natives into two classes appears both futile and unnecessary.

To convey some idea of the scope of Indian mining and also to bring out certain subsidiary points it appears desirable again to resort to the use of concrete statements and examples, although no exhaustive recapitulation is feasible.

Lieutenant J. W. Revere¹⁰² says that Colonel Mason reported that Suñil and Company on Weber's Creek, American River, employed 30 Indians. Daly and McCoon on the same creek employed 100. Sinclair on the North Fork of the American employed 50 for five weeks. At that time (August, 1848) upwards of 4,000 men were working in the gold district (primarily the American River watershed) "of whom more than one half were Indians."

In August, 1848, C. S. Lyman says that on the Stanislaus there were "not many digging yet besides Indians."¹⁰³

Earl Ramey deposes as follows: "The first miners on the Yuba in 1848, much more than is usually understood, depended upon the natives to do the actual extraction. . . . The natives at first were content to work by the day for negligible wages, but when they learned more about the real value of gold they began to mine it independently." He cites the case of one Sicard who married an Indian girl and received \$75,000 in gold from members of the tribe.¹⁰⁴

James Clyman asserted that in December, 1848, there were 2,000 white men, "and more than double that number of Indians" working gold at the rate of two ounces a day.¹⁰⁵

C. W. Harlan mentions a certain trader who sold \$1,200 worth of serapes to the Indians in exchange for their gold.¹⁰⁶

¹⁰² *Op. cit.*, pp. 230-240, quoting a letter from Col. R. B. Mason to the adjutant general in Washington, Aug. 17, 1848.

¹⁰³ *Around the Horn*, F. J. Teggart, ed. (New Haven, 1924).

¹⁰⁴ "The Beginnings of Marysville," *Calif. Hist. Soc., Quarterly* (1935), 14:211.

¹⁰⁵ In the James Clyman Docs., edited by Charles L. Camp, *Calif. Hist. Soc., Quarterly* (1927), 6:62.

¹⁰⁶ C. W. Harlan, *California, '46 to '48* (1888), p. 131.

According to L. L. Palmer¹⁰⁷ the Kelsey brothers, prior to their famous trip to Red Bluff, had taken out an expedition of 26 Indians, who had panned a great deal of gold in the summer of 1848. It was in an attempt to better this record that they took 100 Indians to starve at Red Bluff.

In 1848 Weber of Stockton trained 25 Siakumne Indians and sent them prospecting on the Tuolumne and Stanislaus.¹⁰⁸ When they found gold, he organized a mining company with "a small army" of Indians for laborers.

R. G. McClellan¹⁰⁹ stated that in 1848 there were "several thousand" Indians working as miners.

J. Q. Thornton in a letter to the *Journal of Commerce*, August 29, 1849, cited the case of seven white men on the Feather River who worked 44 days.¹¹⁰ They employed on an average 50 Indians and panned a total of 275 pounds of gold. Another man is mentioned who had 60 Indians working for him.

Major James D. Savage, working the Big Oak Flat in 1849 hired every Indian who would work for him, a total which was said to reach between two and three hundred.¹¹¹

R. G. McClellan (*op. cit.*, p. 143) mentions a trader who sold \$50,000 worth of goods to Indians in exchange for gold in 1849.

Murphy of Murphy's Camp in 1850 got "many thousands" worth of dust from a "tribe" of Indians whom he forced to work for him.¹¹²

The Sacramento *Union* for June 24, 1851, contains an account of the tremendous business done at Sacramento in beads. The money was obtained by Indians digging gold on the Cosumnes.

Even allowing considerable leeway for exaggeration and misstatement, it is clear that in 1848 and 1849 the natives, either under direction or independently, worked in vast numbers and took thousands, perhaps millions, in gold from the streams. During these two years practically the entire native population of the Sierra foothills from the Feather to the Merced must have pursued the occupation of gold mining at least sporadically. To be sure, they derived little permanent

¹⁰⁷ *History of Napa and Lake Counties* (San Francisco, 1881), p. 59.

¹⁰⁸ Lewis Publishing Co., *An Illustrated History of San Joaquin County* (Chicago, 1890), p. 61.

¹⁰⁹ *The Golden State* (1876), p. 143.

¹¹⁰ Quoted in J. Q. Thornton, *Oregon and California in 1848* (New York, 1849), 2:302-303.

¹¹¹ P. E. Vandor, *History of Fresno County* (Los Angeles, 1919), p. 77.

¹¹² Heckendorn and Wilson, *Directory of Tuolumne County* (Columbia, 1856), p. 96.

economic gain for they were universally robbed of their winnings, but the phenomenon, brief as it was, demonstrates that the natives could labor and did labor when the opportunity arose.

Their prosperity was short-lived. Practically no mention is made of them as miners after 1851. In fact, the decline of the industry was noted by contemporaries. Thus Dr. G. H. Hoerchner of Calaveras County wrote on June 22, 1856:¹¹³

Their condition at the present time is rather bad; from 1849 to the spring of 1854 their mode of living and condition were, all in all, tolerably comfortable; they then had facilities for digging gold and were doing remarkably well . . . but since that time they are in a rather poor condition, as their gold mining is almost gone, surface diggings being scarce.

The analysis given by Dr. Hoerchner is probably correct. In the mid-'fifties all the easily accessible stream-bed gold had been exhausted. The white miners were free to move elsewhere. The local Indians were forced to remain in the region without benefit of gold.

It is noteworthy, in passing, that there is little record of mining operations by the natives on the Trinity and Klamath. There must have been some activity of the sort, but it seems to have been conducted on an insignificant scale. Perhaps the reason lies in the greater degree of hostility existing between the white miners and the Indians in the north than in the Sierra foothills.

On the whole, the Indian race gave evidence of considerable adaptability with respect to mining. Within a very short time they had assimilated not only the idea of the value of gold, but also the methods of obtaining it, and were able to make wide use of the new knowledge. From the standpoint of material culture it is of interest to note that the aboriginal implements and tools already available served the natives in this contingency. Several observers remarked upon the use of horn scrapers and shovels and crowbars of native manufacture. The earlier Indian miners used wicker baskets exclusively for panning, and not for some years did they adopt the tin or iron pan of the whites. The fact that their own existing industry supplied all the essential machinery for getting gold may have contributed to the ease with which they took up the pursuit.

¹¹³ Quoted by T. J. Henley, *Rept. Commr. Indian Affairs*, 1856.

In the realm of business enterprise we find that the Indian who could take advantage of the opportunities of the day was exceedingly rare. There were a few persons who made a living by selling wild products, such as fur or game.¹¹⁴ Probably quite a number of the more intelligent and industrious natives acquired title to or squatted on small plots of land where they made a living of sorts by subsistence farming and gardening.¹¹⁵ On the other hand, there were few if any individuals who engaged in an enterprise entailing the ownership of capital. In addition to cutthroat competition the native labored under the disadvantage of a lack of the requisite knowledge and experience to embark upon any such venture.

To recapitulate, under the free labor system, in the earlier years of racial contact, the Indian was limited to unskilled employment. With the exception of the brief gold-mining interlude this meant that he was forced into the field of agriculture, both as a permanent and tran-

¹¹⁴ In 1858 (*San Francisco Bulletin*, Feb. 10, 1858) some Indians brought a boatload of furs to Stockton and soon sold them. Later that year (*ibid.*, May 27, 1858) certain strange tribesmen sold buckskins from door to door in Stockton. In 1861 a party brought two canoe-loads of beaverskins to Sacramento and sold sixty pelts (*Sacramento Union*, April 20, 1861). This journal for July 12, 1853, mentions twelve natives, who were arrested and brought into court for violating the ordinance on selling fish. The judge discharged them. On several occasions the Indians are noted as selling wild berries of various kinds. There may have been more of this small-scale backdoor peddling than ever received attention in the press. Even so, it can hardly have amounted to much in the aggregate.

¹¹⁵ Most of the examples of this type of endeavor which I have found have been from the period subsequent to the gold rush. It was not until the turbulent mining days had given way to more stable times that an Indian could settle down peacefully among white neighbors. The *San Andreas Independent* (quoted by *San Francisco Bulletin*, Sept. 1, 1860) commented on two families who were cultivating four acres and doing well. There was a rancharia on the Mokelumne (*San Francisco Bulletin*, October 21, 1861) where fifty Indians "purchased" eighty acres whereby they supported themselves. The *Marysville Appeal*, for Nov. 18, 1865, carried an obituary of Chief Olas of the "Olas" tribe near Nicolaus. He was described as "the proprietor of a small vineyard and orchard which he cultivated with industry and skill." These instances were, however, the exceptions which emphasize the rule.

In connection with independent industry on the part of the wholly uncivilized natives a curious item may be mentioned which is contained in the Los Angeles County Archives (1:410). This is a decree by the prefect of Los Angeles in 1841 granting a petition by certain gentile chiefs of Castac to be allotted horses "as property" and to "establish crops" in the Tejon. The decree states that these chiefs are reliable and the prefect considers it an unusual but valuable experiment, "y así pueden civilizarse aunque gentiles a ser utiles a la sociedad." Perhaps if the Anglo-Americans of 1860 had possessed the breadth of understanding of some Ibero-Americans of 1840, the problem of existence for the natives would have been easier.

sient laborer. In the physical, material sense, his adaptation to the new economic order may be regarded as adequate, even if not brilliant. At least he mastered enough of the new methods to permit him an existence in white society. That he did not exploit this advantage to its fullest and that he did not become suitable for employment in the skilled trades, professions, and business is referable to a failure to carry out an intellectual adaptation comparable to the physical response. This failure in turn may be traced to certain features of the aboriginal cultural background and to certain traits of Indian psychology.

1. It must be remembered that the majority of the nonmission Indians were obliged to make their economic transition from the aboriginal to the civilized with extraordinary rapidity. Varying with the locality, the period they were given in which to effect a complete re-orientation was not more than ten years and sometimes less than one year. In such a brief interval no primitive race can be expected to achieve perfect success. Indeed, had it not been for the buffers provided by the peonage labor system and for the small aid afforded by the Indian Service, the Indians' failure would have been worse than it actually was.

The first, and possibly the basic obstacle to a quick adaptation was psychosocial: the inability to grasp the necessity, under the white man's system, of steady, consistent labor coupled with sufficient foresight to perceive the need for saving and accumulation of assets. This defect was immediately due to mental habit, which in turn was derived originally from the primitive social structure.

As has been frequently pointed out by students, the Indian in the wild state worked hard. But he worked only at intervals, those intervals being determined by the seasons of the year and the cyclical appearance of natural food crops, both plant and animal. Under the capitalistic system as the Indian met it, the average individual was forced to labor continuously for a daily stipend or was obliged in times of plenty to accumulate sufficient goods to provide a period of idleness. The Indian fresh from the native background failed to comprehend this inherent difference between the two economic orders. Partly through the power of long custom and training, partly through lack of instruction he tended to carry over into white society the meth-

ods which had served him in his own community. Hence is derived much of the comment concerning the so-called "fickleness" of the native disposition. Thus De Lambertie might remark:¹¹⁰ "... étant peu laborieux, ils ne travaillent guère qu'au fur et à mesure de leurs besoins," and one reservation agent says, "They take no thought about provision for the future . . . the great majority of them are idle, listless, careless and improvident."¹¹⁷

2. A closely related characteristic derived from prehistoric times was the tendency to spend wages for any commodity which appealed to the fancy, irrespective of its ultimate social worth. It would be pointless to quote from the scores of comments and lamentations which have come down to us describing how the natives poured out gold for articles of clothing, trinkets, decorations, and liquor. Whenever primitive man has encountered European civilization, this has occurred, and the California Indian thus stands merely as another illustration of a universal human trait.

Looking at the matter a little more closely, one perceives without difficulty that the entire phenomenon, as exemplified by the Indians, is derived from a divergent system of values. Here is a series of material items, arranged in a row: bright cloth, beads, a gun, a bottle of whiskey, a sack of flour, a pair of trousers, a banking account. An experienced white man knows which of these will be the most valuable to him now and in the long run. The raw native knows which are the most valuable to him now, but he has no concept of the long run. Each accordingly chooses; each derives satisfaction from his choice; each thinks the other is a fool. Given the millenium and rigid racial equality in all respects, each turns out to be right. But in the situation we are considering no millenium was in prospect, and the white man controlled the Indian. Consequently the latter, following the tastes and desires and artistic values of his forefathers, turns out to be wrong after all. For it is the white man's standards of value which are imposed upon the Indian.

Particularly in the realm of property and exchange medium the Indian was deficient. Take, for example, gold. In 1849, let us say, an

¹¹⁰ *Voyage Pittoresque en Californie* (Paris, 1853), p. 271.

¹¹⁷ E. P. Smith, *Rept. Commr. Indian Affairs*, 1875.

ounce of gold was worth x dollars. Therefore at prevailing prices an ounce would buy z pounds of flour. Just what did the Indian have to assimilate by way of new ideas in order to consummate this simple transaction? (1) He had to learn the meaning of "ounce" and "pound." This included familiarity with weights and measures of which he was totally ignorant. (2) He had to discover the meaning of "dollar," an intangible concept with which he had never had the slightest acquaintance. (3) He had to transmute weight of gold into weight of flour by arithmetic, using a yardstick the significance of which he could not comprehend. The mental processes involved, which seem to us childish in their simplicity, had to be developed *de novo* by the Indian, under the most adverse conditions. As a result, he was forced to a method of trial and error which appeared to spectators either comic or tragic, according to their emotions. During the trial-and-error stage he was, of course, universally and beautifully cheated out of most of his earnings.

In essence, the Indian applied his own primitive standard of intrinsic value to material objects and at the same time was completely incapable of comprehending the theoretical principles underlying the simplest civilized economy. His reaction was absolutely in accordance with expectation. No primitive mind can make the transition in a moment. That the Indian did in so short a time achieve any measure of success is testimony to his innate intelligence.

3. Another difficulty encountered by the Indian which demanded intelligence for its solution pertained to the learning of new mechanical processes. His facility in acquiring the relatively easy technique of gold panning has already been mentioned. This alone stamps him as a person not without normal dexterity and mental agility, despite the simplicity of the process. Moreover, we have the testimony of farmers and reservation agents (the latter perhaps of doubtful value) that the natives, under favorable conditions, were able to operate agricultural machinery. Such procedures as pertained to the care of animals were also picked up with little effort. There seems no intrinsic reason, therefore, to hold that the Indian was constitutionally incapable of entering the skilled trades. (Indeed, more modern experience has utterly disproved any such theory.) Why, then, was he so

rigidly confined to unskilled lines of effort? I believe the answer lies not in lack of ability on the part of the Indian, but in the refusal of white society to permit him to develop along this line. Only in the missions was any attempt made to provide an opportunity. Since those institutions, both because of social policy and because of entire absence of white labor, were dependent upon the Indians for all work of every kind, an intensive effort was made to train them as carpenters, tailors, shoemakers, metal workers, and the like. The opinion of the church fathers was that the experiment was definitely successful. The natives could be taught rather complex processes with relative ease. American civil society, however, was adequately supplied with white workmen of this type and hence felt no need for encouraging the native. Moreover, racial prejudice and contempt on the part of the whites for all things aboriginal prevented the Indian from learning a trade in the first place, not to speak of practicing it after his apprenticeship. Any adaptation which might have been possible was thus blocked at the start.¹¹⁸

4. Written and oral expression by all classes of white society, from clergy and educators to the riffraff of the waterfront, has always been replete with accusations against the innate moral and mental character of the Indian, in so far as it pertains to his habits of work. We find most often repeated the words "laziness" and "unreliability." If these charges are well founded, they constitute a very serious indictment of the Indian and point to a constitutional flaw in his nature which would predestine to failure any effective adjustment to civilized economy. Such a problem perhaps admits of no definitive solution. The present writer, however, holds an opinion in the negative, based upon the thesis that the manifestations of Indian behavior which impressed the early white men so forcibly arose not from genetic traits,

¹¹⁸ A very characteristic expression of opinion is that of William Kelly (*An Excursion to California* [London, 1851], p. 189) who compares the Indian with the Negro much to the disadvantage of the former. He considers the Indian to be incapable of "acquiring any art or handicraft that involves the slightest exercise of mind and judgment." This type of superficial evaluation was universal at the time, particularly in California, where the indigenes were regarded as the lowest sort of two-legged animals in existence. Unfortunately, this view was inculcated by those who should have known better in the minds of the mass of white settlers. Under such conditions, any effort to allow the natives scope for development in the trades and professions was, and has been since, stifled by public opinion.

but from the interaction of primitive tradition and American social compulsions. The Indian has been the victim of a clash between two social philosophies, his own and that of the Yankee. This clash occurs at two focal points: the abstract concept of work and the concrete method of work.

The aboriginal philosophy envisaged labor of all kinds as merely a means to an end, the end being, first, physical existence, and second, as comfortable and calm an existence as possible. Since manual labor—the only kind the Indian knew—involved in itself a certain degree of effort and discomfort, it was not cultivated for its own sake. Thus a feeling of the futility of exertion per se was ingrained in the native character through generations of instruction and practice. On the other hand, the dominant, invading civilization was represented by a pioneer element which had always been obliged to work hard and in which the old Puritan fetish of work for work's sake had been intensified through two centuries of stern necessity. "The Devil finds some mischief still for idle hands to do" was a proverb which carried almost the power of a religious creed. Coupled with this sentiment was an underlying intolerance of peoples and races which adopted any other point of view. The freely exhibited tendency of the Indian, derived from his forefathers, to do nothing at all unless some immediate need kept him busy appeared to these people positively immoral. The conflict on the economic plane thus became sublimated to the realm of ethics and intrenched firmly in the mind of the dominant race a misconception of the ideals of the suppressed race.¹¹⁹

With respect to the manner of performing set tasks it has already been pointed out how the Indian method, based upon cyclical natural changes and envisaging short spurts of very strenuous effort alternating with periods of complete idleness, was wholly foreign to the American doctrine of continuous, consistent labor. But perhaps a deeper and more significant divergence lay in the Indian concept of time. To the aborigine, with no specific social or economic goal beyond the satis-

¹¹⁹ A modern and very unfortunate misconception of the same type colors the average American's notions concerning the habits of Latin Americans, again united with ignorance and intolerance. Much of the Indian philosophy of labor has persisted in Mexico and Central America. The American, perceiving only that the Mexican way of labor differs from his own, immediately concludes that the latter cannot and does not work; what is worse, the American expresses this opinion freely.

faction of current physical demands, time was not a factor of importance. Hence as slow a pace was maintained as was consistent with getting a job accomplished at all. Quite naturally, therefore, when the native began to work for hire, he could not appreciate the incessant pressure exerted by an employer for speed and quick results. His vision reached no further than the day's wages. It did not embrace such totally unfamiliar intangibles as constructing a town, developing a mine, growing an orchard, getting ahead in business, or repaying a loan in ninety days. As a result, he did not immediately recast his view of the time element in economy, and therefore acquired a reputation for indolence and laziness.

Some degree of intellectual and psychological adaptation was indispensable before the native could render the kind of service regarded as satisfactory by the great majority of white men. But for a group to achieve a complete reorientation of its traditional concept of the nature of labor and of time within a very few years implies superhuman responsiveness and superhuman analytical power and intelligence.

We may sum up briefly the ideas here set forth concerning the reaction of the Indian to the free-labor system during the 'fifties and 'sixties. Although adjustment to the peonage system was much easier for the native, he did make an adequate adaptation to an environment of free labor. In so doing he was limited to the simpler types of unskilled work, but here he filled a real need and carved out a definite niche in the social hierarchy. The obstacles which prevented a complete readjustment which would embrace all forms of economic activity were primarily historical and environmental, not inherent or genetic. These obstacles were (1) traditional unfamiliarity with any need for continuous labor and accumulation of means; (2) complete incomprehension of the mechanics of European economy; (3) a traditional set of values at variance with that of the invading culture; (4) lack of opportunity (due largely to race prejudice) to learn new mechanical processes; and (5) a traditionally inculcated philosophy of labor and of the time element which diametrically opposed the philosophy of Anglo-America. Such was the force of cultural background that he was barely able to readjust himself to the new economic con-

ditions. In the earlier years he was thus able to survive, but even today his adaptation is far from perfect. The interracial conflict on the economic front is still in progress.¹²⁰

SEX AND FAMILY RELATIONS

One aspect of interracial contact of both biological and social interest relates to sex.

I have pointed out in connection with life in the missions that a serious irritant was the imposition on the neophytes of rigid sexual restrictions, such as obligatory monogamy, insistence on the Christian marriage ceremony, and the virtual monasticizing of the young men and women prior to actual matrimony. The trend toward inhibition and compulsion, which gave rise to strong resistance and flight reactions among the converted Indians, does not appear to any marked extent in the conflict between the aborigines and the society introduced by the Americans. In fact the tendency was entirely in the opposite direction, toward complete disintegration of Indian sexual custom and unlimited license with respect to such relations both between the races and within the Indian race.

This process of disintegration became externally manifest in three phenomena sufficiently objective and universal to warrant description. These were common-law marriages, prostitution, and forced cohabitation or outright rape.

1. The term "common-law marriage" requires some amplification. When an aboriginal couple proposed to live together, even for a short period, with the possible intention of rearing children and assuming a familial status in the community, the union was sanctioned by the social organism, with or without various ceremonies, as an "Indian Custom marriage." The crucial feature of this procedure was public sanction and consent. Any promiscuous or casual intercourse which did not bear this sanction was regarded, in theory at least, as undesirable and reprehensible. At the other extreme, during the period of

¹²⁰ Certain aspects of this conflict have been presented in detail in a recent paper by the author, *The Mechanism and Extent of Dietary Adaptation among Certain Groups of California and Nevada Indians*, Univ. Calif. Publ., Ibero-Americana, No. 18 (1941). It is there shown how poor economic adjustment is correlated with poor dietary adjustment.

acute interracial conflict, there was the familiar white marriage, endorsed by the law and usually by the church. This may be termed "legal" marriage. Now, when large numbers of American men penetrated the Indian country, many of them began to consort with native women. The character of such relations varied all the way from pure promiscuity to the establishment of families and permanent homes. We are here concerned primarily with the latter form, that is, with those unions in which the white man and Indian woman lived together in the same abode as man and wife for a minimum of several weeks or months. It is impossible to draw any exact line, for the essence of the matter is intent, not time. These extemporized adventures in matrimony could follow any one of three patterns. The marriage could be solemnized by the rites of the law and church and hence be legal according to white standards. Such unions did occur, and some were eminently successful. However, in the early days legal marriage between whites and Indians was quite the exception.¹²¹ On the other hand, the marriage could be consummated according to whatever custom was prevalent in the tribe concerned. There were certain difficulties here, however. On the native side, such a union demanded public sanction, which the Indian community, often in a hostile mood, was not always willing to grant. On the white side, neither the individual white man nor his society at large was disposed to recognize the validity of Indian custom or to regard such a relationship as a marriage at all. The net result was that the majority of Indian-white matrimonial affairs were of the third pattern, that is, they carried the approval of neither racial group. Owing to the exigencies of the time, however, they were admitted *de facto* and tolerated by both groups as an inevitable concomitant to the period of racial and social adjustment. This type of union has been designated, for lack of a better term, a "common-law marriage."

The numerical extent of common-law marriage is difficult to de-

¹²¹ Prior to 1845 generally—and subsequently in unions involving persons of Latin descent—interracial legal marriage was not only customary but universal. This divergence from Anglo-Saxon habit was due first to the long tradition of mixed marriages running back to the sixteenth century in Mexico, second to the smaller number of white men and hence more rigid control, third to the powerful influence of the Catholic Church, and fourth to the general acquiescence of the white women. All these factors were absent in orthodox American society.

termine, but all the available evidence tends to show that it was very great. The contemporary and historical literature is replete with rather vague generalizations to the effect that there were at least a few thousand white men who consorted habitually with Indian women.¹²² Thus, if we assume several hundred, or roughly one thousand, at any given time, then over the entire period of settlement, say from 1850 to 1870, there may have been a total of three thousand.

There are few reliable, concrete data on this subject. Apparently no one at the time or since has felt it worth while to attempt an accurate or complete enumeration. Mrs. Lucy Thompson, in discussing the problem, mentions four storekeepers at one spot on the middle Klamath, all of whom had Indian wives, and implies that this condition was typical of the whole Yurok part of the river.¹²³ At that time there were at least twenty similar small settlements from the mouth of the Klamath to the line between Karok and Shasta territory. The four storekeepers must be multiplied by at least three to account for other permanent residents, such as miners and ranchers. A sum of 240 such unions is then indicated for the Klamath, Yurok, and Karok. To this total there should be added that of the coast settlement between Arcata and Crescent City. A reasonable guess would be 100. If we add another hundred for the interior and the tributaries of the Klamath, we get 440 as a possible total. Now the aboriginal population of these two tribes was approximately 4,500. By 1878 this had dimin-

¹²² Typical statements of this sort are the following. (Italics mine.)

a) "Indian women have intermarried with white men *quite frequently* in Fresno County." (Sacramento Union, Mar. 10, 1859.)

b) There are "*hundreds of white men* living with their Digger wives." (San Francisco Bulletin, Apr. 8, 1857.)

c) "In Humboldt County there are as many halfbreeds as pure-blooded children of both races together." (W. H. Brewer, *op. cit.*, pp. 545-546.) Mr. Brewer adds also the following enlightening comment: "It is a noteworthy fact that nearly all the 'squaw men' . . . are rank secessionists—in fact, I have never met a Union man living in that way . . ."

d) There were "*quite a number*" of these men. They were usually men of means. So says L. L. Palmer in the *History of Mendocino County*, p. 169.

e) "Living among them are *many* white settlers. . . . The settlers and Indians have *generally* intermarried, so a *considerable* part of the Lower Klamath population is of mixed blood." (W. E. Dougherty, *Rept. Commr. Indian Affairs*, 1894.)

f) "In the mining counties during the early years *hundreds if not thousands* of white men throughout the state took Indian wives." (L. L. Loud, *op. cit.*, p. 324.)

¹²³ *Op. cit.*, pp. 11-25, 130-131.

ished to nearly 2,000. If an intermediate figure, say 3,250, represents the mean population during the interval 1850 to 1870, we may assume one-quarter, or 800, to have been women between sixteen and forty years of age. According to this calculation, 55 per cent, or over half the available women, had been appropriated by white men.

Another item, which is suggestive rather than numerically specific, is the following:

The miners and ranchmen around Cottonwood, Shasta County, are in the habit, it is said, of taking their Digger Indian concubines and collecting once or twice a week at the houses about in the neighborhood, where they hold balls in imitation of white people.¹²⁴

Utilizing the purest assumption, let us say that these people all lived within a half-day's ride, or ten miles, of Cottonwood, and that the entire group amounted to twenty-five couples. In 1858 the total Indian population of this area could not have exceeded 500. If so, there might have been 125 women. Hence the number attached to white men might have constituted 20 per cent of the total.

A third item is derived from an account which appeared in the San Francisco *Bulletin* on August 21, 1861, to the effect that the employees at Round Valley were having much trouble with "squaw men." About 50 such persons were at that time settled on the reservation. The Indian population at Round Valley was fluctuating considerably but tended to approximate 1,000. Again using one-fourth as the proportion of marriageable women, we get 20 per cent for those attached to white men.

From the three very shaky estimates given above we thus get values of 55, 20, and 20 per cent for the proportion of native women in mixed marriages. A possible compromise would be 30 per cent for the entire area. The general Indian population was roughly 80,000 in 1848 and 15,000 in 1880. If the available women at any moment constituted one-quarter of the whole population, then during one generation (taken as thirty years) the total number would have reached the vicinity of 40,000. If the 30-per cent proportion held, then 12,000 Indian women at one time or another lived as the wives or concubines of white men.

We have one other line of approach to the problem. This is derived from certain data contained in the probate records of the United States

Indian Service. Among these documents are several thousand reports on heirship, in each of which is a statement concerning the marital status of the individual. An examination of these reports shows that they mention 1,050 persons who died subsequently to 1895 and who had married between the years 1850 and 1880. Of these 1,013 married in accordance with Indian custom and 37 married legally. The sexes are about equally represented. Therefore 525 women are included. Of the latter, 75, or 14 per cent of the total, married white men. This gives us an absolutely definite figure, for the records are accurate as far as they go and the sample included, while rather small, is representative from the standpoint of both time and area. Fourteen per cent must be regarded as a minimum, however, for the complete marital history of those persons who died in old age was not always known to the descendants. Many of them had contracted unions of relatively short duration with white men, which resulted in no offspring. Furthermore, the records include only unions which were recognized by the families as being sanctioned by either Indian or white law. Numerous marriages of the "common-law" type must have been ignored or forgotten. If we allow for such unrecorded marriages, then we are entirely justified in doubling the sure minimal value of 14 per cent. This yields 28 per cent or very nearly the estimate derived from the three isolated bits of information discussed previously. Since it can be no coincidence that calculations based upon two widely different methods conform in their result so clearly, we may accept the proportion of Indian women consorting with white men as 30 per cent and the total number of these women as approximately 12,000.

The entrance of thousands of white strangers into the most intimate relations with Indian women could not fail to exert a really profound influence upon native society. The full extent of such an impact can never be fully appreciated, for its ramifications must have penetrated the physical and psychological life of nearly every individual. We can merely point out briefly certain of the more obvious effects.

a) Much of the native home life was destroyed. When the white men took Indian wives or concubines, they did not enter into and become members of the native community. Almost invariably the couple withdrew to a new locale, to a purely white circle, to some isolated

¹²⁴ San Francisco *Bulletin*, Mar. 16, 1858.

spot, or to some group of similar mixed couples. No matter which course was pursued, the woman was effectively removed from the Indian group and thereby prevented from marrying a man of her own race. The net result was to reduce the number of reproducing females and ultimately that of full-blooded children, while the native males were forced into an abnormally keen competition for the remaining females. The aboriginal mating equilibrium was thus disturbed.

Further complications arose when, as frequently happened, the woman in question was already the wife of an Indian. The "squaw men" as a rule were totally indifferent to the previous marital state of the squaw and hesitated not at all to break up already established homes. Whenever such an event occurred, one more cohesive bond among the natives was broken, leaving the human fragments to drift at random. Even the threat of a white man was often sufficient to strain family ties to the point of open rupture. Thus a universal state of uneasiness and apprehension was created. No Indian family could ever be sure that the wife and mother would not run away with or be appropriated by some white man.

b) Insecurity of normal family life was associated with a disintegration of the binding force in marriage itself. When such vast numbers of Indian women entered into a kind of twilight relationship with white men, the validity of the true Indian Custom marriage disappeared. In its place arose the system of mere cohabitation, with no social sanction from either race. In the south, among the Luiseños and Diegueños the Catholic Church, through general clerical control and through the missions, was able to enforce a fairly complete transition from genuine Indian custom to full legal matrimony. Among these tribes the prestige of marriage as an institution, irrespective of ceremonial form, was maintained. But in the central and northern part of the state, the moral obligation inherent in tribal custom was swept away and nothing offered in its place. This loss of moral compulsion was attended, as would be anticipated, by an increase in divorce, adultery, and general sexual promiscuity. The evil was propagated by hundreds of semi-outcast, half-breed children, for whom no ethical or moral standards were ever set up. Indeed the universal laxness in sex morals so vociferously denounced by many righteous white men

may be ascribed in large part to the destruction of uniform marital responsibility suffered because of the white men themselves.

c) A psychological, emotional effect of serious proportions was induced by the system of common-law marriage. This was based upon the loss of caste suffered by both parties. The contempt which his own people visited on the white partner was universal and severe. Even the solemnization of the union by legal wedlock did not entitle the couple to acceptance among the Anglo-Americans. Any other type of association was regarded as adulterous and sinful without qualification. On the other side, white men were rarely accepted unreservedly by the native community, although the latter was usually forced to accord respect to any white man, simply because he was white. As a result a very large outcast group was formed which incurred the social obloquy of both races.

d) One curious effect was observed which gave rise to much complaint on the part of the native male population. As a result of wholesale association of the women with white men a spontaneous feminist movement developed. Aboriginally, the woman was not only physically, but economically and spiritually, subservient to the man. The squaw performed most of the hard manual labor associated with village life while her husband and father loafed away their time. She was obliged to obey every command and whim of her lord and master. To do otherwise was to invite stern and inevitable retribution. With the influx of thousands of white men, unmarried and on the hunt for females, the situation altered. The woman was now to a certain extent vested with bargaining power. She could confront the Indian male with the choice of better treatment or loss of his spouse to some white suitor. Moreover, the Indian woman was undoubtedly influenced profoundly by the enviable position which her sex occupied in the newly established white communities. Although no contemporary sociologist ever gave the matter attention, we get inklings of a pretty formidable feminine revolt. The agent at the Fresno Indian Farm reported:¹²⁵

Though the men are, or once were, absolute masters of the women, many of them at this time . . . have found shelter among the whites, and are consequently independent of the men.

¹²⁵ M. B. Lewis, *Rept. Commr. Indian Affairs*, 1856.

A statement also appeared at about the same period to the effect that "white men have taken the Indians' wives from their lodges and taught them to despise the lazy creatures who used to make them slaves."¹²⁶ If this state of mind was characteristic of a large body of female opinion, it is easy to see how, although no vast social upheaval was involved, the change could act as an irritant and thereby serve as another factor in the disruption of aboriginal family life.

e) An extensive secondary effect of miscegenation in the early phases of American-Indian conflict was the creation of a large group of half-breeds. When any two races come into physical contact, a certain degree of interbreeding inevitably follows. In this particular instance, however, the social problems were intensified by the unusually large number of children who were born very soon after the initial invasion by the whites.¹²⁷ Almost without exception, these offspring were absorbed into the Indian, rather than the white, community. They there occupied the place so frequently reserved for the half-breed, a place definitely inferior in caste to that held by the full bloods. At the other extreme, they were generally repudiated by the white people. A formidable class thus grew to adulthood in the 'seventies and 'eighties, which was cursed with the usual inferiority complex of the mixed blood but which was attached culturally to the Indian race. Thus was generated still another strain upon the already weakened native social organism.

2. Prostitution, according to most ethnographers, was unknown to the California aboriginal peoples. Although much latitude existed in sex matters—at least according to our own standards—the actual sale of female favors was not in vogue. There seem to have been no formal ethical scruples against the practice. Rather, it was unnecessary in the Indian community; adequate satisfaction was provided by the normal operation of society. Since the demand was thus practically nonexistent, no economic end was served by attempting to furnish the supply.

When the white race entered, however, a demand was immediately

¹²⁶ Sacramento *Union*, March 4, 1858.

¹²⁷ The genetic aspect of miscegenation constitutes a problem in itself, which it is hoped will ultimately receive consideration. In the present connection only the social aspect is pertinent.

created. Both in colonial times and subsequently there was an excess of both unmarried males and males of other circumstances, who wished to take advantage of the opportunity offered by numerous native women. The very bad economic condition of the native furnished a powerful incentive, which was coupled with the total lack of traditional or religious social taboo. It is easy to appreciate, therefore, how readily the native race might adopt this new means of improving its material condition.

Prostitution was apparently common in the later mission period, although its origin is obscure.¹²⁸ R. H. Dana describes the situation at this time as follows:¹²⁹

Indeed to show the entire want of any sense of morality or domestic duty among them, I have frequently known an Indian to bring his wife . . . down to the beach, and carry her back again, dividing with her the money she got from the sailors.

Gomez, who appears to have been something of an expert in such matters, states that "Los indios no tenian escrupulo en traficar con sus mujeres, ni los vecinos en admitirselas."¹³⁰ He then describes in some detail the method of solicitation by Indian men with respect to the use of their women. The price was usually a small amount of money or some trivial commodity. Frequently, according to Gomez, the white men concerned took back by force the money they had given in advance, or even went so far as to rape the women outright.

It is clear that by 1848 prostitution by Indians was a well-established custom near all the settlements and other centers of white population. The Indians of the interior, although probably still not practicing the custom among themselves, were doubtless quite familiar with it. When the great mass of gold miners poured in, accompanied by other

¹²⁸ Some of the early correspondence of the missionaries and officials mentions immoral relations between the soldiers or *vecinos* and the native women. Indeed, the problem was one of deep concern to the Church. But whether technical prostitution beyond mere random promiscuity was involved is not very clear. It is a safe assumption, however, that, as soon as the soldiers and civilians began consorting with native women, they also sought to win the favor of the latter by offering inducements of a material if not pecuniary nature. From this stage to one of open sale and solicitation the transition is simple and rapid.

¹²⁹ *Two Years before the Mast* (Boston, 1873), p. 199.

¹³⁰ V. Gomez, "Lo que sabe," MS, 1876, Bancroft Library, p. 162.

unattached males of all social and racial complexions, the natives were fully prepared to supply the enormous demand for women. Beginning doubtless with the arrival of the first miners, the trade in sex did not reach sufficient proportions to excite much comment before 1854 to 1856. In the latter year and thereafter, it was noted by several individuals. After referring to the complete demoralization of the Yosemite Miwok caused by reservation life between 1850 and 1854, Galen Clark states:¹³¹

In these straitened and desperate circumstances many of their young women were used as commercial property and peddled out to the mining camps and gambling saloons.

In 1856 the reports of the Indian Service contained several references to the same condition. J. W. Gilbert of El Dorado County spoke of the "almost general prostitution of their women."¹³² M. B. Lewis, of the Fresno Indian Farm, painted a very sad picture, perhaps somewhat overdrawn, as follows:¹³³

They [the women] have no chance for employment of a praiseworthy character; consequently, from necessity and an inclination to gratify their craving appetite for food and their fancy for dress and trinkets, in the absence of all words of moral advice, at the same time sought for by white men, and encouraged by those who ought to be their protectors, they have been led astray at an early age, and soon thereafter become the sport and traffic of worthless Indian men. In one or two brief years they become diseased and at the age of twenty wear the features of thirty-five to forty; outcasts among their own people; and as a general thing before they arrive at the age of thirty, die a shameful and miserable death.

Robert McAdam of Yuba County reported that the Maidu supported themselves by prostitution "to a very great extent,"¹³⁴ and Alexander Taylor in an article in the *Golden Era* for April, 1856, made similar statements with reference to the Indians of the north coast.¹³⁵ The contemporary press also carried comment on native prostitution. The *Butte Record* for May 23, 1857, printed the story of an Indian who

¹³¹ *Indians of the Yosemite Valley* (San Francisco, 1904), p. 19.

¹³² Letter to T. J. Henley, *Rept. Commr. Indian Affairs*, 1856, p. 242.

¹³³ M. B. Lewis, *ibid.*, p. 253.

¹³⁴ R. McAdam, *ibid.*, p. 244.

¹³⁵ A. S. Taylor, *Indianology* (1864), Ser. II, fol. 6-F.

prostituted his squaw to a Negro for a bottle of whiskey. The San Francisco *Bulletin* for June 10, 1858, quoted a complaint by the Yreka *Union* against numerous "low-grade white men" who supplied the local Indians liquor in return for their women. The Shasta *Courier* (quoted by the Nevada *Journal* for Nov. 12, 1858) stated that in Redding the recent rains had brought to town a "great increase" in the number of squaws, who gathered along the sidewalks in the evening and who were "forced to procure their bread and clothing in a manner the most infamous." Even as late as 1871 the Indian agent at Eureka stated that "their women prostituted themselves to the soldiers and officers from sheer necessity."¹³⁰

The foregoing citations are sufficient evidence of the widespread occurrence of prostitution. It is clear, furthermore, that the evil flourished primarily because of economic necessity, and not because the natives were any more prone to adopt the custom than other races under similar circumstances. Indeed, it is noteworthy that every recorded comment points to the Indians themselves as the direct beneficiaries. I know of no instance in which white men acted as procurers or used Indian women for their own pecuniary profit. The traffic was conducted as strictly individual enterprise by the Indians alone and apparently was utilized only as a last resort to avert want and starvation.

The effect of the evil was undoubtedly similar to that observed in any social group. Apart from the spread of venereal disease, it tended still further to loosen sex restrictions and added to the domestic demoralization already existing among the natives.

3. The point at which sex relations between the races became sharp-est and most irritating to the natives was that at which promiscuity and prostitution graded into open violence. Frequently, white men could not obtain a squaw as a common-law wife or were unable to buy her services. Then the temptation arose to use outright force and compel submission. Such a procedure was rendered shamefully easy because the general bad feeling of the Americans toward Indians was so strong that no personal crime by a white man against a native was likely to result in punishment of the offender. As a matter of fact, ordinary human resistance to such outrages was usually followed by

¹³⁰ J. V. Farwell, *Rept. Commr. Bur. Indian Affairs*, 1871, p. 157.

further persecution of the offended parties. In view of the notoriously bad character of many early settlers it is not surprising that rape and rapine were common frontier phenomena.

Several statements have been placed on record which describe these conditions in general terms. They are of value inasmuch as they emanate from members of the white race who, on other grounds, were not necessarily friendly to the natives. In December, 1859, the *Shasta Courier*¹³⁷ deplored the state of affairs on the Upper Sacramento:

There is also a set of white men living with them, debauching the squaws on every occasion, often going to the rancherias at midnight and dragging the women from their hovels.

L. H. Irvine makes the following statement:¹³⁸

They [certain white men] hunted down good-looking young squaws, as if the squaws had been mere animals created for their own enjoyment and often forced these young women to submit to their passionate desires. A number of half-white children resulted from the forays of the men who thus violated Indian maidens, who were often regarded as worthless creatures except for rapes of this character. It is said that bands of white men, consisting of three or four depraved wretches, would often catch a young squaw or two and detain them for several days or weeks at their cabins . . .

Such accusations might be regarded as gross exaggeration were they not borne out by the universal testimony of many persons who were thoroughly acquainted with the situation, and by a long series of actual cases. One of the best evidential items is a series of resolutions passed by a citizens' meeting at Frenchtown, Butte County, on February 14, 1854, which read thus:¹³⁹

Whereas the peace and quietude of this neighborhood has been disturbed by the frequent outrages committed on Indian women by lawless characters, and whereas the Indians have been driven from their ranches . . . and whereas children from ten to twelve years of age have not been spared by these fiends in human shape; therefore we . . . do resolve . . .

Then followed the announcement that, if the forces of law and order did not punish these offenders, the citizens "would mete out to them

the punishment they deserved." It is self-evident that, when murder and rape attained such proportions as to provoke action by the white people themselves, the situation must have become extremely bad.

I have collected from the local press twenty-seven cases of rape so flagrant that comment was evoked from newspapers (1851-1860) which were already surfeited with violence. Although actual citation of these would serve no useful purpose, it may be pointed out that for every instance so well known and so vicious as to justify a press account there were probably a hundred others which passed unnoticed by all except the victims. No concrete estimate is justifiable, but there can be no question that crimes of violence perpetrated on Indian women by white men were numbered by hundreds and very likely by thousands.¹⁴⁰

The effect on the Indians of attacks on women was probably out of proportion to the damage actually inflicted. The extremely personal character of these clashes, together with the exasperating nature of the attendant circumstances, aroused hatred where nothing else would. Both the individual and mass response of the red race to this type of persecution, therefore, exceeded in intensity the response to more serious but less concrete factors.

The reaction of the Indians included both the white race and their own people. The most obvious and violent response was usually directed toward the white perpetrators of individual outrages. Quite naturally, when Indian males witnessed an attack on a wife, daughter, or friend, they resisted by every means available. No race, no matter how backward or primitive, could be expected to do otherwise, and by common human consent any group is regarded as within its legal and moral rights in so doing. Such resistance, however, usually entailed injury or death to the Indians concerned and also to the white attackers. From the tabulation of social homicide, introduced in a previous connection, it appears that out of 289 recorded Indian deaths of this type 18 were directly attributable to brawls involving attacks on native women. The unrecorded mortality was no doubt much greater,

¹⁴⁰ To the cases of actual rape should be added those involving the kidnaping of squaws for sale as "servants," a trade which flourished along with the kidnaping of children as laborers. Indeed, it would not be overstating the situation to say that during the decade 1850-1860 no single squaw in northern California could consider herself absolutely safe from violence at the hands of white men.

¹³⁷ Quoted by the *Sacramento Union*, January 3, 1860.

¹³⁸ *History of Humboldt County, California* (Los Angeles, 1915), p. 70.

¹³⁹ Quoted by H. L. Wells and W. L. Chambers, *History of Butte County* (San Francisco, 1882), p. 218.

as were the injuries not resulting in death. The fact that more white men were not killed or wounded during attempted rape was due without question to the profound fear, on the part of the Indians, of stirring up a so-called war, which could only result disastrously to themselves.¹⁴¹

Although immediate, armed resistance was thus the primary instinctive response, it did not constitute the entire reaction pattern. Abortive or frustrated resistance and, more often, involuntary compulsory acquiescence did not relieve the feelings of the offended persons or their community. A long series of violations or an occasional single vicious crime was adequate to stir in the native soul the most bitter rancor and animosity. More often perhaps than is realized these emotions built up to a point where some individuals, or perhaps the whole tribe, could no longer inhibit them. Then a desire for revenge became predominant and manifested itself in depredations on the whites or even in open warfare. This secondary or delayed response was more significant to native welfare than blind resistance at the scene of the crime. For the majority of sober white men sympathized with the outraged sentiments of the natives when the latter were directly defending their homes and families against criminals. But this sympathy vanished very quickly when innocent white people began to suffer for the derelictions of the guilty. For the sake of immediate protection and by virtue of pure racial solidarity revenge upon the community at large was not tolerated, no matter how extreme the original provocation. The final result, inevitably, was further punishment of the natives.

These considerations apply, to be sure, to many other types of outrage committed on the Indians. But in this instance the initial cause of trouble was so flagrant, so inexcusable, and so offensive to social decency that its effect on Indian sentiment was much greater than the actual harm done would appear to justify. The failure of both intuitive responses—immediate resistance and subsequent revenge—left a permanent scar upon the Indian nature. It forced him back to a silent,

¹⁴¹ Resistance through legal channels, that is by the arrest and trial of offenders, was completely eliminated by the refusal of any white jury to convict a fellow countryman of any crime upon the Indian. But no case, to my knowledge, ever reached a jury, for no officer would make an arrest under such circumstances, nor would public opinion support a prosecution. Finally, owing to the law throwing out Indian testimony, no native, even the injured party herself, could be heard as a witness. Physical resistance on the spot was therefore the only means open to the Indians for the prevention of assault on women.

ineradicable, suppressed animosity against all things American which was not forgotten long after other wrongs had passed into oblivion. As a focus for hatred and emotional conflict between the races the wholesale rape of Indian women stands unique.¹⁴²

There is some evidence that the reaction of the native males was not directed exclusively toward the whites. When outright abduction or rape was involved, resentment probably was felt only against the perpetrator, not the victim. But on the frequent occasions when the circumstances were not wholly clear, the possibility of consent existed. Then jealousy might incite the husband or brother to take action against the woman. Even more serious was the reaction when the female was not directly assaulted but yielded to moral or financial pressure. Reference has already been made to the expression of M. B. Lewis that prostitutes were "outcasts among their own people," and the same idea is set forth in different words by the Yurok, Mrs. Lucy Thompson. A few extreme cases are on record, such as that mentioned

¹⁴² In connection with offenses against Indian women it is pertinent to inquire briefly concerning the attacks by Indians on white women, for one might anticipate that the Indians would seek revenge in this manner. However, the facts do not bear out any such hypothesis. Molestation of white women by natives was a relatively rare phenomenon. In a survey of the press I have been able to find only five cases of the sort. The first was in 1852 (*Sacramento Union*, February 24), when Indians merely insulted a woman near Sacramento. The second was in 1859 (*San Francisco Bulletin*, July 2; *Sacramento Union*, June 28), when two drunken Indians made "insulting proposals" to a small girl at Yreka. The third was in 1861 (*Sacramento Union*, July 15), when a former mission Indian at San José attempted to rape a girl. The fourth, in 1861 (*Sacramento Union*, September 24), was a case of actual rape near Cache Creek. The fifth (*Marysville Appeal*, March 29, 1864) was an "attempted rape" on a woman on Bear River. Since an attack on a white woman was the most heinous crime an Indian could commit, every such case was certain to be reported in the metropolitan press. This means that in nearly fifteen years only four white females actually suffered sexual violence from Indian men, and it is not clear that in three of these the deed was actually consummated. (In the 1852 case, the woman was not physically disturbed.) This is a remarkable record, particularly when we consider the number of rapes by white men on white women during the same period and the number of Indian men who were in a position to perpetrate the crime. The fact that in three of the four cases the Indians were summarily lynched and in the fourth the attacker was shot by a parent might lead to the supposition that fear of consequences acted as a deterrent. However, Indians committed plenty of other crimes for which the punishment was just as certain, and must have foregone many opportunities for rape when escape was easy. The explanation must lie elsewhere. As a matter of fact, the entire long and bloody history of Indian warfare in the United States is remarkably free from accounts of Indian sex assaults on white women. Unless the chroniclers and historians have been deliberately suppressing the facts, the American Indian, who has been distinguished for his ferocity and cruelty, has shown himself singularly free from the urge to commit sexual violence on his enemies.

by Mason in which "a squaw was stoned to death in Sacramento County in 1850 for yielding to a white man,"¹⁴³ or that in which a jealous Indian husband murdered his wife for cohabiting with a white man.¹⁴⁴ Such actions were infrequent, but they are indicative of the deep animosity which burned in the hearts of many Indians and which could find partial release in retaliation on their own kind. The emotional strain engendered by all types of interracial sexual congress is impossible to evaluate in concrete terms, but nevertheless it must have constituted a serious obstacle to rapid adaptation by the native to the American social order.

Before we leave the field of sex relations, a brief consideration of abortion is desirable. This phenomenon, although not strictly sexual in nature, reflects a state of unrest among the female population which may be associated with sexual factors as well as with other elements of the social order.

There is a cumulative mass of evidence to show that both abortion and infanticide were known and practiced by many of the California tribes, prior to the coming of the whites.¹⁴⁵ It is not surprising therefore that the custom should have continued even to modern times. It is impossible to determine statistically whether the number of these crimes increased after 1848, for no quantitative data whatever are available. Nevertheless, the opinion may be held that such an increase did occur.

One tribe among whom the habit of abortion was rather highly developed was the Pomo. Thus when Gifford and Kroeber studied the northern valley tribes their informants for the River Patwin, Hill Patwin, Hill Wintun, and Lake Miwok denied the aboriginal existence of both abortion and infanticide, whereas for the Pomo, six out of sixteen groups admitted abortion and seven admitted infanticide.¹⁴⁶ Aginsky has made a detailed study¹⁴⁷ of the custom as a means of birth

¹⁴³ J. D. Mason, *op. cit.*, p. 258.

¹⁴⁴ Sacramento *Union*, May 30, 1859.

¹⁴⁵ Numerous recent ethnographic studies contain information on this point, particularly many of those which have appeared in the University of California Publications in American Archaeology and Ethnology.

¹⁴⁶ *Culture Element Distributions, IV: Pomo*, Univ. Calif. Publ. Am. Arch. and Ethn. (1937), 37:150.

¹⁴⁷ "Population Control in the Shanel (Pomo) Tribe," *Amer. Sociol. Rev.* (1939), 4:209-216.

control. He concluded that such procedure "was a traditionally accepted pattern of behavior and an integral aspect of their culture." The basis of such behavior he thinks was a somewhat limited aboriginal food supply and consequent mild population pressure. With the mechanism of control thus already in operation, it is entirely logical to expect its amplification and extension when the inflow of the white race further reduced the food supply and rendered existence precarious in all respects. At least two observers commented on the prevalence of these methods among the Pomo or their neighbors. Thus George Yount stated with reference to the Napa Valley Indians:¹⁴⁸ "... they murder their offspring at birth to rid themselves of the care and toil of nursing and raising them into life." Stephen Powers was even more explicit:¹⁴⁹

Neither was it [infanticide] caused, *as in later years*, by that deep and despairing melancholy which came over the hapless race when they saw themselves perishing so hopelessly and so miserably before the face of the American. [*Italics mine.*]

Powers (*op. cit.*, p. 416) agrees with Aginsky in his opinion that "the very presence of the crime of infanticide points to an over-fruitfulness and an over-population." Regarding the effect of the white invasion, he also states (p. 207) that the Clear Lake Pomo asserted they had not known infanticide before the whites came. This tribe, moreover, during the early period of settlement killed all half-breed infants at birth (p. 214). In another connection Powers (pp. 183-184) maintains that the Russian River Pomo commit this crime "to this day [1877] for they say they do not wish to rear any more children among the whites."

It is quite apparent from these citations that at least one tribe, the Pomo, showed an increase in the abortion and infanticide rate and, furthermore, that they rationalized their behavior with respect to the presence of the whites. The killing of half-white children indicates that not only were general economic conditions responsible, but that sexual factors, through miscegenation, were also involved. A statement of

¹⁴⁸ C. L. Camp, "The Chronicles of George C. Yount," *Calif. Hist. Soc., Quarterly* (1923), 2:56.

¹⁴⁹ *Op. cit.*, 3:178.

Mason regarding the Sierra Miwok shows that similar factors operated:¹⁰⁰

They did not hesitate to commit infanticide when the means of living was scarce, believing . . . that an infant had better die than grow up to starvation.

Elimination of infants by murder or abortion must thus have been a material factor in population decline. Unfortunately, we have no way of determining its relative significance, nor can we set up regional or tribal comparisons. From the social standpoint, the prevalence of the custom must be regarded as a spontaneous response by individuals of the group to the unfavorable living conditions created through racial conflict.

SUMMARY AND COMPARISONS

In these pages, and in two previous essays, the attempt has been made to analyze the conflict between the California aborigines and the white race in terms of the material factors involved. From these studies certain similarities and differences in the Indian response emerge with respect to the mission type of culture, to the pre-American settlers of Latin extraction, and to the Yankee invasion after the Mexican War.

The fundamental clue to success in interracial competition is the change in population. Under the relatively favorable control of the missions the natives suffered considerable diminution. From the mission records it is ascertained that approximately 53,600 Indians underwent conversion. At the end of the mission period (1834) there were 14,900 left, a reduction of 72 per cent. This signifies a mean annual reduction of 0.9 per cent. The six wild tribes which came into direct contact with the California civil and military civilization between 1800 and 1848 were reduced from approximately 58,900 to 35,950, or 0.8 per cent annually. The surviving mission Indians together with the remainder of the wild tribes which were subjected to Anglo-American influence from 1848 to 1865 diminished from 72,000 to 23,000, a mean annual depletion of 2.9 per cent. From these figures alone, it is apparent that the impact of the settlement from the United States was three times as severe as that of pre-American colonization.

¹⁰⁰ J. D. Mason, *op. cit.*, p. 258.

The triad of factors which brings about a decline in population is war; disease, and starvation. In the missions, war was of negligible consequence. A study of expeditions and sporadic fighting shows that for the six wild tribes mentioned above, roughly 11.5 per cent of the decline may be attributed to casualties suffered in armed conflict. The corresponding value for the period after 1848 is 8.6 per cent. Hence, although the absolute effect of warfare was greater in the American period, its relative influence on population decline was substantially the same as in the years of Ibero-American domination.

The relative effect of disease was also quite uniform, since in the missions, in the valley before 1848, and generally after 1848, approximately 60 per cent of the decline may be attributed to this cause. Such a result is not surprising, since most of the mortality was due to introduced epidemic maladies and the action of these upon a nonimmune population is entirely independent of the culture which introduces them. It is probable that the spread of disease was intensified in the missions by the crowded living conditions there but, on the other hand, this factor may have been nullified by the hygienic, sanitary, and curative measures adopted by the missionaries.

The effect of dietary maladjustment cannot be evaluated in strictly numerical terms. This factor operates on both birth rate and death rate; moreover, very few persons actually died of direct starvation. In the missions the subsistence level seems to have been low, and, because of a tendency to rely upon cereal crops, there may have been vitamin and mineral deficiencies. The nonconverted Indians encountered the problem of depletion rather than alteration of diet. Until 1848, the reduction of food supply was not serious because the few settlers in the interior did not materially alter the natural flora and fauna. After the gold rush, however, the universal conversion of fertile valleys into farms, the widespread cattle ranching on the hills, and the pollution of the streams all combined to destroy the animal and plant species used for food. The transition to a white dietary, although ultimately accomplished, was rendered difficult by economic and social obstacles. During the interim a great deal of malnutrition was present. From the nutritional standpoint, therefore, the natives suffered most under Anglo-Saxon domination.

Certain quasicultural items were undoubtedly significant in intensifying the effect of the primary lethal factors. Among these were, in particular, labor and sex relations. In the missions a great deal of unrest and maladjustment was caused by the current system of forced labor and of drastically restricted liberty in sex matters. In both these, the basic difficulty was not physical but emotional and was derived from the compulsion which forced activity into new and unaccustomed channels. Under the Americans, compulsion was of a different character, but even more disruptive in its effects. The native was compelled to labor by economic necessity rather than by personal command. In acquiring the tools and the facility for work he was obstructed by a hostile society, rather than aided by a paternal government. Hence his progress was slow and his entire material welfare—diet and health—suffered in consequence. From the sexual inhibitions of the mission environment he was carried by the Americans to the most violent and brutal excesses and his women subjected to universal outrage. The hatred and despair thus generated found expression in still further retardation of his material adjustment.

On the whole, therefore, and for many causes, the conflict of the native with the settlers from the United States was characterized by far greater violence than the conflict with the invaders from Latin America. This violence was reflected in greater relative population decline and in more difficult adjustment in all material respects under the American occupation.

APPENDIX

TABLE 1

INDIAN POPULATION FROM THE END OF THE MISSION PERIOD TO MODERN TIMES

(Reproduced from S. F. Cook, *The California Indian and White Civilization: II. The Nonmission Indians*, Univ. Calif. Publ., Ibero-Americana, No. 22 [1943]).

Tribe or group	Aboriginal population	1832-1850		1851-1860		1861-1870		1871-1880		1881-1940	
		Year	Population	Year	Population	Year	Population	Year	Population	Year	Population
All tribes	111,900 (1)	1832	83,000 (2)	1851	59,000 (6)	1865	27,800 (11)	1873	17,000 (16)		
		1848	73,000 (3)	1852	60,750 (118)	1866	16,800 (12)	1880	16,500 (17)	....	....
		1849	85,000 (4)	1856	53,100 (8)	1870	25,000 (14)	1880	12,500 (118)	....	....
		1850	85,000 (5)	1856	42,000 (9)	1870	23,000 (15)	....	....	....	....
		....	....	1860	28,000 (10)	....	....	....	....	....	....
Costanoans	11,000 (18)	1832	1,942 (99)	1852	1,000 (97)	1865	570 (99)	1880	281 (99)	1920	56 (99)
		1842	1,287 (99)	1852	864 (99)	....	....	....	....	....	....
Salinans	3,600 (18)	1832	1,065 (100)	1852	478 (100)	1861	50 (47)	1880	150 (100)	1912	41 (47)
		1842	712 (100)	....	....	1865	383 (100)	1880	12 (47)	1920	20 (41)
		....	....	....	....	....	....	....	....	1920	31 (100)
Chumash	8,000 (18)	1832	2,471 (101)	1852	1,000 (98)	1865	659 (101)	1880	40 (52)	1920	74 (101)
		1842	1,656 (101)	1852	1,107 (101)	....	....	1880	336 (101)	....	....
Yokuts Below the Fresno River	12,000 (64)	1848	6,000 (63)	1851	12,400 (62)	1870	1,200 (15)	....	....	1918	696 (70)
		1850	5,000 (91)	1852	8,400 (58)	....	....	1872	1,600 (63)	1930	271 (69)
		....	....	1852	9,400 (96)	....	....	1872	1,000 (77)	....	....
		....	....	1856	2,930 (8)	....	....	1873	1,600 (78)	....	....
		....	....	1858	2,500 (73)	....	....	1875	990 (80)	....	....
		....	....	....	....	....	....	1876	1,200 (81)	....	....
		....	....	....	....	....	....	1878	720 (82)	....	....
	
Entire tribe	18,000 (18)	....	....	1852	6,000 (86)	....	....	....	....	1910	600 (40)
		....	....	1856	7,000 (92)	....	....	....	....	....	....

Western Mono	1,800 (18)	....	....	1858	600 (73)	....	....	....	....	1920	500 (42)
Wintun	14,250 (18)	....	....	1852	5,700 (102)	....	....	1880	1,460 (84)	1910	1,000 (37)
		....	....	....	....	....	....	1880	2,000 (103)	1915	701 (71)
		....	....	....	....	....	....	....	....	1918	940 (104)
Maidu, excluding Northeastern Maidu	8,000 (18)	1846	8,000 (105)	1852	5,000 (106)	1865	1,550 (108)	1880	1,000 (84)	1910	900 (38)
		1850	3,500 (90)	1856	2,300 (107)	....	....	....	....	....	....
		1850	4,500 (109)	....	....	....	....	....	....	....	....
Yana and Yahi	1,900 (18)	....	....	1852	1,800 (111)	....	....	1880	12 (51)	1884	35 (52)
Achomawi and Atsugewi	3,000 (18)	....	....	1860	2,000 (93)	....	....	....	....	1910	1,100 (36)
Tolowa	450 (18)	....	....	1856	316 (85)	....	....	1871	35 (54)	1910	120 (24)
		....	....	....	....	....	....	1880	214 (85)	....	....
Wiyot	1,500 (18)	....	....	1853	1,000 (23)	....	....	....	....	1910	150 (23)
		....	....	1853	800 (48)	....	....	....	....	....	....
Wintun . . . . .	....	....	....	1860	450 (48)	....	....	....	....	....	....
		....	....	1860	440 (93)	....	....	....	....	....	....
Yurok	2,500 (18)	....	....	1851	2,250 (112)	1870	1,350 (53)	1875	1,125 (80)	1910	668 (20)
		....	....	1852	2,500 (19)	....	....	1880	900 (20)	....	....

NOTE.—Population values are given from estimates and records. The figures in parentheses refer to the numbered list of sources, pp. 101-104.

TABLE 1—*Concluded*

Tribe or group	Aboriginal population	1832-1850		1851-1860		1861-1870		1871-1880		1881-1940	
		Year	Population	Year	Population	Year	Population	Year	Population	Year	Population
Karok.....	2,000 (18)	.....	.....	1851	1,050 (61)	1866	1,800 (12)	1876	1,300 (88)	1910	775 (21)
		.....	.....	.....	.....	.....	.....	.....	.....	1915	870 (71)
Hupa.....	1,000 (18)	.....	.....	1851	920 (112)	1861	1,000 (95)	1871	725 (76)	1891	461 (52)
		.....	.....	.....	.....	1866	650 (25)	1875	571 (80)	1903	450 (27)
		.....	.....	.....	.....	1866	600 (46)	.....	.....	1910	600 (27)
		.....	.....	.....	.....	1870	641 (26)	.....	.....	.....	.....
Chilula.....	600 (18)	.....	.....	.....	.....	.....	.....	.....	.....	1914	20 (50)
Wailaki.....	1,500 (18)	.....	.....	.....	.....	1867	400 (114)	1876	115 (81)	1910	200 (29)
Chimariko.....	250 (18)	.....	.....	.....	.....	.....	.....	1877	6 (55)	1889	2 (52)
		.....	.....	.....	.....	.....	.....	1880	6 (45)	1906	2 (22)
Yuki.....	3,500 (18)	.....	.....	1858	3,000 (74)	.....	.....	1873	500 (79)	1908	250 (43)
		1859	2,250 (113)	1875	509 (80)	1910	100 (30)
Other Atha- bascans.....	4,700 (18)	1910	100 (28)
Shasta.....	3,300 (18)	1920	100 (35)

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Miwok Coast.....	2,000 (18)	1851	250 (87)	1880	60 (84)	1888	6 (52)
		1908	11 (43)
		1920	5 (34)
Lake.....	400 (18)	1850	100 (115)	1800	20 (115)	1908	25 (43)
		.....	.....	.....	.....	.....	.....	.....	.....	1920	20 (34)
Sierra.....	9,000 (18)	.....	.....	1852	4,500 (110)	.....	.....	.....	.....	1910	670 (89)
		.....	.....	1856	3,000 (8)	.....	.....	.....	.....	1930	763 (69)
Pomo, excluding Southern		.....	.....	.....	.....	.....	.....	.....	.....	1908	705 (43)
Pomo.....	6,500 (18)	.....	.....	.....	.....	.....	.....	.....	.....	1908	42 (43)
Southern Pomo	1,500 (18)	.....	.....	1856	473 (72)	.....	.....	1877	25 (57)	1908	42 (43)
Entire tribe...	8,000 (18)	.....	.....	1851	5,000 (33)	.....	.....	1880	1,450 (117)	1908	747 (43)
		.....	.....	1851	3,500 (87)	.....	.....	.....	.....	1910	1,200 (32)
		.....	.....	1858	3,600 (116)	.....	.....	.....	.....	1923	1,318 (68)
Wappo.....	1,650 (18)	.....	.....	1855	750 (89)	1861	100 (60)	.....	.....	1908	20 (31)
		.....	.....	1856	188 (72)	.....	.....	.....	.....	1908	15 (43)
		.....	.....	.....	.....	.....	.....	.....	.....	1910	73 (31)

NOTE.—Population values are given from estimates and records. The figures in parentheses refer to the numbered list of sources, pp. 100-104.

The American Invasion, 1848-1870

SOURCES FOR TABLE I

1. S. F. Cook, *The Conflict Between the California Indian and White Civilization: I. The Indian versus the Spanish Mission*, Univ. Calif. Publ., Ibero-Americana, No. 21 (1943), Appendix.
2. *Ibid.*, p. 194. Minus an estimated 15,000 for southern California.
3. *Ibid.* Minus an estimated 15,000 for southern California.
4. C. H. Merriam, "The Indian Population of California," *Amer. Anthro.* n.s. (1905), 7:594-606. Minus an estimated 15,000 for southern California.
5. T. B. King, *Rept. to U. S. Govt.*, 1850. Minus an estimated 15,000 for southern California.
6. J. D. Savage in H. Dixon's "California Indians," MS, 1875.
7. C. H. Merriam. Minus an estimated 10,000 for southern California.
8. T. J. Henley, *Rept. Commr. Indian Affairs*, 1856, No. 100, p. 245. Includes reports of subagents.
9. C. H. Merriam. Minus an estimated 8,000 for southern California.
10. C. H. Merriam. Minus an estimated 7,000 for southern California.
11. D. W. Cooley, *Rept. Commr. Indian Affairs*, 1865, p. 115. Minus an estimated 6,000 for southern California.
12. *Ibid.*, 1866, No. 16, p. 94. Minus an estimated 5,000 for southern California.
13. L. V. Bogy, *ibid.*, 1867, pp. 126-132.
14. C. H. Merriam. Minus an estimated 5,000 for southern California.
15. E. S. Parker, *Rept. Commr. Indian Affairs*, 1870, pp. 81 and 330.
16. *Rept. Commr. Indian Affairs*, 1873, pp. 342, 344. Minus an estimated 5,000 for southern California.
17. C. H. Merriam. Minus an estimated 4,000 for southern California.
18. S. F. Cook, Appendix.
19. A. L. Kroeber, *Handbook of the Indians of California*, Smithsonian. Inst. Bur. Amer. Ethnol. Bull. 78 (Washington, 1925), p. 17.
20. *Ibid.*, p. 19.
21. *Ibid.*, p. 101.
22. *Ibid.*, p. 109.
23. *Ibid.*, p. 116.
24. *Ibid.*, p. 125.
25. *Ibid.*, p. 130, based on C. Maltby, *Rept. Commr. Indian Affairs*, 1866, p. 95.
26. *Ibid.*, p. 131, based on E. S. Parker, *Rept. Commr. Indian Affairs*, 1870, p. 82.
27. *Ibid.*, p. 130.
28. *Ibid.*, p. 883.
29. *Ibid.*, p. 154.
30. *Ibid.*, p. 168.
31. *Ibid.*, p. 221.
32. *Ibid.*, p. 237.
33. *Ibid.*, p. 237, based on McKee's report.
34. *Ibid.*, p. 275.
35. *Ibid.*, p. 288.
36. *Ibid.*, pp. 308, 316.
37. *Ibid.*, p. 357.
38. *Ibid.*, p. 395. Minus 200 Northeastern Maidu.
39. *Ibid.*, p. 445.
40. *Ibid.*, pp. 489, 883.
41. *Ibid.*, p. 546.
42. *Ibid.*, p. 586.
43. S. A. Barrett, *Ethno-geography of the Pomo and Neighboring Indians*, Univ. Calif. Publ. Am. Arch. and Ethn. (1908), VI:43.
44. P. J. Delay, *History of Yuba and Sutter Counties* (Los Angeles, 1924), pp. 223-224.
45. R. B. Dixon, *The Chimariko Indians and Language*, Univ. Calif. Publ. Am. Arch. and Ethn. (1910), V:297.
46. P. E. Goddard, *Life and Culture of the Hupa*, *ibid.* (1903), I:9.
47. J. A. Mason, *The Ethnology of the Salinan Indians*, *ibid.* (1912), X:117.
48. L. L. Loud, *Ethnogeography and Archaeology of the Wiyot Territory*, *ibid.* (1918), XIV:301-302.
49. J. A. Mason, *The Mutsun Dialect of Costanoan*, *ibid.* (1916), XI:470.
50. P. E. Goddard, *Notes on the Chilula Indians of Northwestern California*, *ibid.* (1914), X:265.
51. T. T. Waterman, *The Yana Indians*, *ibid.* (1918), XIII:35-102.
52. J. W. Powell, *Indian Linguistic Families of America North of Mexico*, 7th Ann. Rept. Bur. Ethnol. (Washington, 1891).
53. Stephen Powers, *Tribes of California*, Contr. No. Amer. Ethnol., III (1877):59. He says 2,700, but this is one-half the aboriginal number.
54. *Ibid.*, p. 65.
55. *Ibid.*, p. 97.
56. *Ibid.*, p. 127.
57. *Ibid.*, p. 175.
58. D. B. Wilson, Report in Hayes Coll., Bancroft Library, Vol. 38, No. 7 (1852).
59. J. Bidwell, McKinstry Docs. No. 12 (1846), Bancroft Library.
60. A. S. Taylor, *Indianology*, (1864), III:3.
61. *Ibid.*, I:4. Quotes G. W. Taggart, who says territory originally had 36 rancherias, now has 19. By proportion population would equal 1,050.
62. H. Dixon, "California Indians," MS, 1875. Quotes J. D. Savage (1851).
63. C. Maltby, "Indians," MS, 1872.
64. Estimate, taking this area as having two-thirds of the aboriginal population.
65. Anonymous, Vallejo Docs. (1848), XII:326.
66. J. Sutter, McKinstry Docs., No. 28 (1847).
67. M. G. Vallejo, St. Pap. Mis. Col. (1833), 2:97.
68. *Census Report for 1923*, Round Valley Agency, at office of Sacramento Indian Agency.
69. *Ibid.*, 1930, by counties, at Sacramento Indian Agency.
70. *Ibid.*, 1918, Tole River Agency at Sacramento Indian Agency.
71. *Ibid.*, 1915, Redding District, Roseburg Agency at Sacramento Indian Agency.
72. H. L. Ford, *Rept. Commr. Indian Affairs*, 1856, No. 105.
73. M. B. Lewis, *ibid.*, 1858, No. 105.
74. V. E. Seiger, *ibid.*, 1858, No. 104.
75. L. V. Bogy, *ibid.*, 1867, p. 128.
76. Anon., *ibid.*, 1871, No. 85.
77. B. C. Whiting, *ibid.*, 1872, No. 84.
78. E. P. Smith, *ibid.*, 1873, No. 77.
79. *Ibid.*, 1873, No. 76.
80. *Rept. Commr. Indian Affairs*, 1875 (reports of various subagents consolidated).
81. C. G. Belknap, *ibid.*, 1876, pp. 14-17.
82. *Ibid.*, 1878, p. 280.
83. *Ibid.*, 1880, p. 9.
84. *Ibid.*, p. 238, from census of 1880.
85. A. J. Bledsoe, *History of Del Norte County* (Eureka, 1881), pp. 44, 101.

86. S. P. Elias, *Stories of Stanislaus* (Modesto, 1924), p. 196.
87. George Gibbs, "Journal," 1851, in Schoolcraft *Indian Tribes* (Philadelphia, 1853), 3:112. His estimate for the Pomo, exclusive of Northern and Central Pomo, is about 2,500. Add an estimated 1,000 for these two groups, making 3,500. He says that from Fort Ross to the Bay there were 500. Estimate one-half of these Coast Miwok.
88. Based on Lucy Thompson (*To The American Indian* [Eureka, 1916], p. 12), who says 3,000 for Hupa plus Yurok plus Karok at Weitspu at a dance. Subtract 575 Hupa (No. 80 above) and 1,125 Yurok (No. 80 above).
89. C. L. Camp, "The Chronicles of George C. Yount," Calif. Hist. Soc., *Quarterly*, 1923, II:56.
90. G. H. Derby, "First Report on the Sacramento Valley, 1849," *ibid.*, pp. 106-123.
91. *Idem*, "Second Report on the Tulare Valley of California, 1850," *ibid.*, 1932, II: 247-265. Gives 4,000 from Kings River south. Add 1,000 for San Joaquin River making 5,000.
92. San Francisco *Bulletin*, May 8, 1856.
93. San Francisco *Bulletin*, Jan. 6, 1860. There were 1,500 at Big Bend driven down by the winter. Assume all the western group there and one-half the eastern, that is, 1,000 westerners and 500 easterners. Then add 500 for the remaining easterners, making a total of 2,000.
94. San Francisco *Bulletin*, Apr. 23, 1860. Quoting D. E. Buel, Agent.
95. Sacramento *Union*, Apr. 23, 1861.
96. Placer *Herald*, Dec. 11, 1852. Quotes census agent of Mariposa County.
97. Estimate. Based on: State Census, 1852, Contra Costa County, 278; *ibid.*, Santa Clara County, 990; San Francisco *Bulletin*, Nov. 12, 1856, Monterey County, 200; San Benito County, estimated, 200; Alameda County, estimated, 300; San Francisco and San Mateo counties, estimated, 50; total, approximately 2,000. Take half these as being Costanoans, making 1,000. Balance, Tulare Indians.
98. Estimate. Based on D. B. Wilson in Hayes Coll. Vol. 38, No. 7, Santa Barbara County, 600; Ventura County, estimated, 300; San Luis Obispo County, 100; total, approximately 1,000.
99. Estimate. Based on mission populations. Take the population at the end of local conversions for each tribe. Calculate probable population in any year on the assumption that the birth or replacement rate was 4 per cent per annum and the death rate was 8 per cent. Then if y is the population at the end of time t and y_0 is the initial population, $y = y_0 e^{-0.04t}$.
100. Estimate. Calculated as in No. 99 above. San Luis Obispo taken as half Salinans, half Chumash.
101. Estimate. Calculated as in No. 99.
102. Estimate. Based on: J. H. Rogers, *Colusa County* (Orland, 1891), p. 29, Colusa and Glenn counties, 1,000 and *The Western Shore Gazetteer* (Woodland, 1870), p. 5, Yolo County, 200. There are three methods of extension to the entire tribe: (1) pure estimate, 2,200; (2) proportion of villages according to Kroeber, 1,650; (3) proportion of area, 2,135. The average for the Hill and River Wintun and Hill and River Patwin is, therefore, about 2,000. To this add 3,500 for the Shasta and Trinity Wintun and 200 for the remnants of the Southern Patwin. The total is approximately 5,700.
103. Estimate. The population of Colusa and Glenn counties in 1880 according to McCornish and Lambert (*History of Colusa and Glenn Counties* [1918], p. 45), was 500. Cutting the 1852 estimate in half gives 1,000 for the four intermediate groups. By direct-area comparisons it is 1,150. If the former value is used and a

- population of 1,000 is assumed for the Wintu, the total is approximately 2,000. The Southern Patwin may be regarded as extinct.
104. Estimate. McCornish and Lambert (p. 189) give 150 for Colusa and Glenn counties in 1918. By simple proportion the four intermediate groups would then amount to 300. The Patwin or Cache Creek, etc., according to S. A. Barrett (*op. cit.*, p. 43), had a population of 140 in 1908. The whole group would thus equal 440. Assume a reduction in the Wintu from 1,000 to 500. The total tribal count would then be 940.
105. Estimate. Based on a count by John Bidwell (McKinstry Docs., No. 12), who says the population from Sacramento to Honcut was 1,750. In this region, Kroeber shows 34 villages, which at 45 persons per village gives 1,530. Bidwell's count must, therefore, represent practically the aboriginal number.
106. Estimate. The state census of 1852 gives Sutter County 514, Sacramento County 80. *Alta California*, Apr. 20, 1855, gives 300 for the valley Indians in Yuba County. Estimate these as 500 in 1852. Then the total for the territory of the Valley Nisenan is 1,100. Bidwell in 1846 gave 1,750 for the same region. Assuming a proportionate reduction for all the Maidu, the total would be approximately 5,000.
107. Estimate. (1) *Alta California*, Apr. 20, 1855, gives 300 for the valley in Yuba County; San Francisco *Bulletin*, Dec. 5, 1856, gives 150 for Sutter County. Add 50 for Sacramento County. Then the Valley Nisenan region would total 500. By proportion the Maidu would equal 2,300. (2) San Francisco *Bulletin*, Feb. 23, 1857, gives 700 for Sutter, Yuba, and Nevada counties. Add an estimated 50 for Sacramento County, 300 for El Dorado County, 1,000 for Butte County, and 200 for Plumas and Sierra counties. The total is 2,250.
108. Estimate. T. T. Waterman (p. 43), says that in 1863-1864 there were 300 at Berry Creek and 350 at Yankee Hill. There were 200 at Stringtown according to San Francisco *Bulletin*, Aug. 1, 1865.
109. Estimate. P. J. Delay (p. 233), puts the Valley Nisenan plus the Hill Nisenan from Honcut to Bear Creeks at approximately 2,000. Assume 500 Hill Nisenan from Bear Creeks to Cosumnes River and estimate the Valley and Hill Maidu at 2,000. Total = 4,500.
110. Estimate. If we assume that the rate of decrease of the Miwok was the same as that of the Maidu and that the Plains Miwok were practically extinct at this time (let us say 300 for Plains Miwok), the total Miwok would be approximately 4,500.
111. Estimate. The Yana had scarcely been touched at this time. Arbitrarily assume a reduction from 1,900 to 1,800.
112. Estimate. G. Gibbs (Schoolcraft, *op. cit.*, pp. 135, 139), says the Yurok rancherias from 1848 to 1851 were reduced from 18 to 16 and those of the Hupa from 12 to 11. This would indicate a corresponding reduction of population.
113. Estimate. The *Report on the Mendocino War* puts 450 at Round Valley (*Repts. Special Joint Committee on Mendocino War* [1860], in Pamphlets on Calif. Indians, Bancroft Library, p. 15). There were 300 in Eden Valley (Sacramento *Union*, Jan. 10, 1859). Assuming these two valleys contained one-third of the Yukian population, the total would be about 2,250.
114. Estimate. There were 400 reported on Round Valley Reservation by L. V. Bogy, *Rept. Commr. Indian Affairs*, 1867, p. 121. This must have included nearly all the existing Wailaki.
115. L. L. Palmer, *History of Napa and Lake Counties* (San Francisco, 1881), pp. 34-36. Verbal communication by a Lakeport Indian.
116. Estimate. L. L. Palmer's informant gave 2,270 as the Pomo population of Lake County. This is excessive and may be reduced to 1,700 for 1850 and 1,500 for

1858. The Sacramento *Union*, Aug. 10, 1858, placed the population of Mendocino County at 3,820. From this may be deducted 2,250 Yurok (see No. 113), leaving 1,570 Pomo. Another 500 Pomo may be added for Sonoma County. The total is 3,570 or, roughly, 3,600.

117. Estimate. The U. S. census for 1880 (see *Rept. Commr. Indian Affairs*, 1880, p. 238), gives Mendocino County 1,181. Deduct 500 for Yuki, leaving 681 Pomo. Palmer's informant gives 440 Pomo in Lake County and the census shows 150 in Sonoma County. Total is 1,271 or, roughly, 1,300. However, Palmer (*History of Mendocino County* [1880], p. 173), gives 850 as the population of Mendocino County, the localities all being in Pomo territory. This would raise the estimate to 1,450.

118. Estimate. This estimate represents an attempt to get a cross check on the accuracy of the foregoing individual estimates or calculations. Two critical years were selected, 1852 and 1880. For each, the separate items for the tribes were added. Where no specific item was available, an interpolation was made so as to conform as closely as possible with the known tendency of the tribe. The results indicate a considerable degree of uniformity. Thus for 1852, the calculated 60,750 is definitely within the range of the figures of Savage and Merriam, 59,000 and 75,000 respectively. For 1880 the calculated 12,500 is less than Merriam's 16,500 for the same year, but is within the same order of magnitude.

TABLE 2
ESTIMATED POPULATION IN 1848, 1852, AND 1880

Tribe	1848	1852	1880
Costanoan.....	1,000	900	300
Salinan.....	500	500	100
Chumash.....	1,150	1,050	200
Yokuts.....	14,000	13,000	600
Western Mono.....	1,300	1,200	600
Wintun.....	8,000	5,700	1,500
Sierra Miwok.....	6,000	4,500	1,000
Maidu.....	7,000	4,300	1,000
Yana.....	1,900	1,800	20
Achomawi.....	3,000	3,000	1,500
Tolowa.....	450	450	200
Wiyot.....	1,400	1,000	200
Yurok.....	2,500	2,400	900
Karok.....	2,000	1,800	1,000
Hupa.....	1,000	900	500
Chilula.....	600	500	30
Wailaki.....	1,500	1,200	150
Chimariko.....	250	200	20
Yuki.....	3,500	3,400	400
Other Athabascans.....	4,600	4,300	200
Shasta.....	3,100	3,000	500
Coast Miwok.....	300	250	60
Lake Miwok.....	200	100	20
Pomo.....	5,000	4,200	1,450
Wappo.....	800	800	50
Total.....	71,050	60,450	12,500

TABLE 3
INDIAN LOSSES FROM MILITARY OPERATIONS, 1847-1865*

Tribe	1847	1848	1849	1850	1851	1852	1853	1854	1855	1856	1857	1858	1859	1860	1861	1862	1863	1864	1865	Total
Yokuts	...	...	...	...	...	...	...	...	...	107	...	...	...	...	...	...	...	...	...	212
Wintun	13	...	...	50	2	180	49	125	25	...	15	4	...	...	12	11	8	...	...	506
Miwok	15	...	30	74	49	1	33	...	...	...	...	1	1	3	...	20	20	...	...	207
Maidu	...	...	120	41	...	15	70	...	5	...	10	...	79	4	...	...	3	...	...	347
Yana	...	...	...	...	...	...	13	9	...	34	...	19	10	...	...	20	28	23	65	221
Tolowa	...	...	...	...	...	...	30	7	...	7	10	4	...	...	...	...	...	...	...	47
Wiyot	...	...	...	20	...	25	...	...	...	...	...	...	...	120	...	...	...	...	...	176
Yurok	...	...	...	5	6	...	...	...	26	...	...	...	...	...	...	2	30	3	...	67
Karok	...	...	...	50	...	15	...	...	75	...	...	...	...	...	...	...	...	3	...	98
Athabascans†	...	...	...	...	...	...	...	...	...	...	...	...	16	103	270	130	5	57	...	751
Hupa	...	...	...	...	...	...	...	...	8	...	...	...	1	11	...	...	...	...	...	20
Chilula	...	...	...	...	...	...	17	...	...	...	...	...	...	...	...	...	...	...	...	117
Wailaki	100	...	...	...	...	...	...	...	...	...	...	...	60	33	...	...	...	...	...	251
Chimariko	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	15
Yuki	...	...	...	...	...	...	25	75	125	300	...	...	...	...	...	...	...	...	...	573
Shasta	...	...	88	28	5	15	5	...	...	200	1	...	...	...	...	...	...	...	...	179
Achomawi‡	3	34	...	...	45	...	...	112	40	...	...	...	15	...	...	...	...	...	...	412
Pomo	68	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	68
Totals	199	34	238	268	249	251	242	328	304	648	36	316	182	282	282	163	94	86	65	4,267

* Figures include recorded deaths from military operations, including private expeditions. All figures should be taken as approximate.

† For the Hupa, Chilula, and Wailaki only those casualties which can be clearly ascribed to these tribes are so recorded. Otherwise they are allocated to the Athabascans.

‡ Here are included deaths among the so-called "Pit Rivers," which consisted predominantly, if not exclusively, of Achomawi and Atsugewi.

SOURCES FOR TABLE 3

The following tabulation includes the sources not only for the entries in table 3 but all significant sources for the tribes discussed in this period.

YEAR	TRIBE	SOURCE
1847	Wintun	Sutter, Calif. Arch., unbound docs., MS, No. 89, Bancroft Library.
	Miwok	Lewis Publishing Co., <i>An Illustrated History of San Joaquin County</i> (Chicago, 1890), p. 31; G. H. Tinkham, <i>History of San Joaquin County</i> (1923), p. 51.
	Pomo	<i>California Star</i> , July 24, 1847.
1849	Miwok	J. W. Connor, "Statement," MS, 1878, Bancroft Library, p. 2; <i>Placer Times</i> , May 5 and 12, 1849.
	Maidu	A. F. Coronel, "Cosas de California," MS, 1878, Bancroft Library, p. 173; T. T. Johnson, <i>California and Oregon</i> (Philadelphia, 1851), pp. 158, 180; <i>Placer Times</i> , Apr. 28, May 5, 1849.
1850	Wintun	W. Kelly, <i>An Excursion to California</i> (London, 1851), pp. 143-147; E. de Massey, <i>A Frenchman in the Gold Rush</i> (1927), p. 100.
	Miwok	W. Shaw, <i>Golden Dreams and Waking Realities</i> (London, 1851), pp. 101-112; Heckendorn and Wilson, <i>Directory of Tuolumne County</i> (1856), p. 91; <i>Alta California</i> , July 1, 1850, Jan. 21, 1851.
	Maidu	J. D. Barthwick, <i>Three Years in California</i> (London, 1857), p. 132; E. F. Morse, "The Story of a Gold Miner," Calif. Hist. Soc., <i>Quarterly</i> (1927), 6:235; G. C. Mansfield, <i>History of Butte County</i> (Los Angeles, 1918), pp. 185-188; A. Barstow, "Statement," MS, 1877, Bancroft Library, p. 5; P. J. Delay, <i>History of Yuba and Sutter Counties</i> (Los Angeles, 1924), p. 234; M. Angell, <i>History of Placer County</i> (Oakland, 1882), p. 359; <i>Placer Times</i> , May 20 and 29, 1850; <i>Sacramento Union</i> , May 27, June 2, 1850.
	Wiyot	H. D. LaMotte, "Statement," MS, 1878, Bancroft Library, p. 6.
	Karok	A. J. Bledsoe, <i>History of Del Norte County</i> (Eureka, 1881), p. 8.
	Athabascans	P. E. Goddard, <i>Notes on the Chilula Indians of Northwestern California</i> , Univ. Calif. Publ. Am. Arch. and Ethn. (1914), 10:269. <i>Ibid.</i>
	Chilula	H. L. Wells, <i>History of Siskiyou County</i> (Oakland, 1881), p. 121.
	Shasta	L. L. Palmer, <i>History of Napa and Lake Counties</i> (San Francisco, 1881), p. 62; P. Campbell to Vallejo, Vallejo Docs., Bancroft Library, 13:38; <i>Alta California</i> , May 27, June 5, 1850.
	Pomo	
1851	Yokuts	J. Outcalt, <i>History of Merced County</i> (Los Angeles, 1925), p. 851; E. L. Menefee and F. A. Dodge, <i>History of Tulare and Kings Counties</i> (Los Angeles, 1913), p. 8; <i>Alta California</i> , Feb. 14, 1851; <i>Sacramento Union</i> , Mar. 25, 1851.
	Wintun	<i>Sacramento Union</i> , Aug. 16, 1851.
	Miwok	F. W. C. Gerstaecker, <i>Narrative of a Journey round the World</i> (London, 1853), pp. 351-356; P. E. Vandor, <i>History of Fresno</i>

YEAR	TRIBE	
		County (Los Angeles, 1919), p. 70; <i>Alta California</i> , Jan. 26, Feb. 7, 1851.
	Yurok Shasta	H. L. Wells, <i>op. cit.</i> , pp. 126-129. <i>Ibid.</i> , p. 127; <i>Sacramento Union</i> , June 27, July 21, 1851.
1852	Wintun	F. A. Buck, <i>A Yankee Trader in the Gold Rush</i> (Boston, 1930), p. 107; I. Cox, <i>The Annals of Trinity County</i> (San Francisco, 1858), p. 115; J. Carr, <i>Pioneer Days in California</i> (1891), pp. 195-197; <i>Alta California</i> , Feb. 29, May 4, 1852; <i>Sacramento Union</i> , Feb. 28, Mar. 9, May 3, June 28, 1852.
	Miwok	<i>Nevada Journal</i> , June 12, 1852.
	Maidu	<i>Sacramento Union</i> , Feb. 20, Mar. 21, 1852; <i>Alta California</i> , May 14, 1852.
	Wiyot	L. L. Loud, <i>Ethnogeography and Archaeology of the Wiyot Territory</i> , Univ. Calif. Publ. Am. Arch. and Ethn., 14:324; A. J. Bledsoe, <i>Indian Wars of the Northwest</i> (San Francisco, 1885), p. 186.
	Karok Shasta	<i>Sacramento Union</i> , Oct. 4, 1852. <i>Alta California</i> , Apr. 5, 1852; <i>Nevada Journal</i> , Aug. 14, 1852; <i>Sacramento Union</i> , Mar. 9, Apr. 6, July 19, Dec. 4, 1852.
1853	Wintun	I. Cox, <i>op. cit.</i> , p. 122; H. L. Wells, <i>op. cit.</i> , p. 133; <i>Alta California</i> , Mar. 6 and 30, 1853; <i>Nevada Journal</i> , Dec. 2, 1853; <i>Sacramento Union</i> , Mar. 5, 29, and 30, 1853.
	Miwok	<i>Alta California</i> , Mar. 2, 1853; <i>Sacramento Union</i> , Feb. 3, 5, and 12, 1853.
	Maidu	H. L. Wells and W. L. Chambers, <i>History of Butte County</i> (San Francisco, 1882), p. 217; <i>Nevada Journal</i> , Dec. 9, 1853.
	Yana Tolowa Shasta	<i>Alta California</i> , Mar. 6, 1853. <i>Ibid.</i> , Jan. 18, 1853. <i>Nevada Journal</i> , Aug. 26, 1853; <i>Sacramento Union</i> , Aug. 9 and 18, Oct. 10, 1853.
1854	Wintun	I. Cox, <i>op. cit.</i> , p. 85; <i>Nevada Journal</i> , Mar. 10, 1854; <i>Butte Record</i> , Mar. 11, 1854; <i>Alta California</i> , Mar. 15, Apr. 12, 1854; <i>Sacramento Union</i> , July 24, Apr. 29, 1854.
	Yana Tolowa Chimariko Yuki	<i>Alta California</i> , Mar. 3, 1854; <i>Sacramento Union</i> , Feb. 25, 1854. <i>Alta California</i> , Feb. 1, 1854. <i>Ibid.</i> L. L. Palmer, <i>History of Mendocino County</i> (San Francisco, 1880), p. 459.
	Shasta Achomawi	<i>Sacramento Union</i> , Nov. 27, 1854. <i>Nevada Journal</i> , Feb. 24, 1854; <i>Alta California</i> , Apr. 12, 1854.
1855	Wintun Maidu Yurok Karok Shasta	<i>Alta California</i> , Oct. 25, 1855. <i>San Francisco Bulletin</i> , Dec. 29 and 31, 1855. A. J. Bledsoe, <i>op. cit.</i> , p. 169. <i>Alta California</i> , Feb. 20, 1855. H. L. Wells, <i>op. cit.</i> , p. 138; <i>Sacramento Union</i> , Aug. 3, 6, and 9, 1855.

YEAR	TRIBE	
1856	Yokuts	F. F. Latta in the <i>Livingstone Chronicle</i> , No. 3, July 29, 1937, and No. 7, Sept. 2, 1937; E. L. Menefee and F. A. Dodge, <i>op. cit.</i> , p. 23; <i>San Francisco Bulletin</i> , May 5, 7, 8, 16, 21 and 23, June 12, Aug. 25, 1856; <i>Sacramento Union</i> , Aug. 11 and 27, 1856.
	Yana	<i>San Francisco Bulletin</i> , Apr. 22, 1856; <i>Sacramento Union</i> , Apr. 19, 1856.
	Wiyot	A. J. Bledsoe, <i>op. cit.</i> , p. 209; L. L. Loud, <i>op. cit.</i> , p. 326; <i>San Francisco Bulletin</i> , Nov. 29, 1856.
	Chilula Yuki Shasta	A. J. Bledsoe, <i>op. cit.</i> , pp. 207, 208. <i>Butte Record</i> , Oct. 18, 1856. <i>Nevada Journal</i> , Jan. 18, 1856.
1857	Wintun	A. S. Taylor, <i>Indianology</i> (1864), Ser. II, fol. 44; <i>San Francisco Bulletin</i> , Apr. 9, 1857.
	Maidu	<i>San Francisco Bulletin</i> , Nov. 9, 1857; <i>Sacramento Union</i> , June 5, 1857.
	Tolowa Yuki	<i>San Francisco Bulletin</i> , Dec. 5, 1857. <i>Majority and Minority Reports of the Special Joint Committee on the Mendocino War</i> , Appendix to Journals of the Assembly of the Eleventh Session of the California Legislature 1860 (hereinafter referred to as <i>Repts. Com. Mend. War</i>), testimony of B. Arthur, 32:51.
	Achomawi	<i>Sacramento Union</i> , Apr. 28, May 12, June 20, July 20, Aug. 3, 1857.
1858	Wintun Miwok Yana	I. Cox, <i>op. cit.</i> , p. 129. <i>San Francisco Bulletin</i> , Apr. 6, 1858. <i>Ibid.</i> , May 8, 1858; <i>Sacramento Union</i> , May 21, 1858; <i>Red Bluff Beacon</i> , Aug. 25 and 31, 1858.
	Wiyot	L. L. Loud, <i>op. cit.</i> , p. 327; A. J. Bledsoe, <i>op. cit.</i> , p. 282; <i>San Francisco Bulletin</i> , June 22, 1858.
	Athabascans	A. J. Bledsoe, <i>op. cit.</i> , pp. 233, 256, 257, 265, 278, 285; L. L. Loud, <i>op. cit.</i> , p. 319; <i>Sacramento Union</i> , Jan. 27, June 10, 1858; <i>San Francisco Bulletin</i> , Jan. 5, July 26, Aug. 4, 1858.
	Yuki	<i>Repts. Com. Mend. War</i> , testimony of B. Arthur, p. 51; <i>Sacramento Union</i> , June 7, Aug. 16, Dec. 7, 1858.
	Hupa Achomawi	<i>San Francisco Bulletin</i> , Nov. 9, 1858. <i>Sacramento Union</i> , May 6, 1858.
1859	Miwok Maidu	<i>San Francisco Bulletin</i> , Feb. 10, 1859. R. A. Anderson, <i>Fighting the Mill Creeks</i> (Chico, 1909), pp. 21-24; T. T. Waterman, <i>The Yana Indians</i> , Univ. Calif. Publ. Am. Arch. and Ethn., 13:144; <i>San Francisco Bulletin</i> , Aug. 6 and 8, 1859; <i>Sacramento Union</i> , Sept. 2, 1859.
	Yana Athabascans Yuki	<i>Red Bluff Beacon</i> , Feb. 2, 1859. <i>San Francisco Bulletin</i> , July 11, Dec. 31, 1859. <i>Repts. Com. Mend. War</i> , testimony of the following persons: W. Frazier, p. 19; W. T. Scott, p. 21; L. Bataille, p. 26; H. H. Buckles, p. 29; J. C. Hastings, p. 29; W. C. Hildreth, p. 32; M. Corbett, p. 34; S. P. Storms, p. 38; G. W. Henley, p. 39; H. L. Hall, pp. 41-44; T. B. Henley, p. 44; <i>Sacramento Union</i> ,

- Jan. 10 and 21, 1859; San Francisco *Bulletin*, Nov. 7, Dec. 12, 1859, Jan. 4 and 21, 1860.
- Achomawi W. C. Kibbe, *Report to the Governor* (Sacramento, 1860); Sacramento *Union*, Oct. 19, 1859; San Francisco *Bulletin*, Aug. 31, Sept. 8 and 28, Oct. 5, 1859, Jan. 21, 1860.
- 1860 Miwok San Francisco *Bulletin*, Aug. 1, 1860.
Maidu Marysville *Appeal*, July 3 and 8, 1860; San Francisco *Bulletin*, July 1, 1860.
Wiyot A. J. Bledsoe, *op. cit.*, pp. 307-308; L. L. Loud, *op. cit.*, pp. 329-334; San Francisco *Bulletin*, Feb. 28, Mar. 2 and 13, 1860.
Athabascans A. J. Bledsoe, *op. cit.*, p. 318; Sacramento *Union*, Jan. 26, 1860; San Francisco *Bulletin*, Mar. 13, Apr. 11, June 23, 1860.
Shasta San Francisco *Bulletin*, Oct. 11, 1860.
- 1861 Wintun Sacramento *Union*, June 12, Aug. 20, Sept. 18, 1861; Marysville *Appeal*, June 12, 1861.
Athabascans A. J. Bledsoe, *op. cit.*, pp. 338, 342, 344, 345, 357-359; San Francisco *Bulletin*, Jan. 17, Feb. 4, Mar. 2, Apr. 24, May 29, June 11 and 19, 1861; Marysville *Appeal*, July 3, 4, and 9, 1861.
Wailaki W. P. Dole, *Rept. Commr. Indian Affairs*, 1861, No. 63; San Francisco *Bulletin*, Jan. 26, 1861; Marysville *Appeal*, Oct. 22, 1861; Red Bluff *Beacon*, Oct. 24, 1861.
Chimariko Sacramento *Union*, Aug. 13, 1861.
Yana Marysville *Appeal*, May 7, 1861; San Francisco *Bulletin*, May 15, 1861.
- 1862 Wintun Marysville *Appeal*, Aug. 7 and 30, 1862.
Yana R. A. Anderson, *op. cit.*, p. 54; Marysville *Appeal*, Aug. 9, 1862; Red Bluff *Beacon*, Aug. 21, 1862.
Yurok San Francisco *Bulletin*, Apr. 22, 1862.
Athabascans A. J. Bledsoe, *op. cit.*, pp. 394, 396; San Francisco *Bulletin*, Feb. 27, June 27, July 12, Aug. 6 and 30, 1862; Sacramento *Union*, May 10, 1862; Marysville *Appeal*, Apr. 16, Sept. 2, 1862.
Hupa Marysville *Appeal*, Apr. 16, 1862.
Wailaki W. P. Dole, *Rept. Commr. Indian Affairs*, 1862, Nos. 62, 65; San Francisco *Bulletin*, Aug. 18, 1862.
Achomawi J. H. Rogers, *Colusa County* (Orland, 1891), p. 91; San Francisco *Bulletin*, May 6, 1862; Red Bluff *Beacon*, May 10, 1862.
- 1863 Yokuts San Francisco *Bulletin*, Apr. 27, May 26, 1863.
Wintun Sacramento *Union*, July 3, 1863; Marysville *Appeal*, Oct. 7, Nov. 28, 1863.
Maidu Sacramento *Union*, Mar. 16, 1863.
Yana R. A. Anderson, *op. cit.*, pp. 64-70; T. T. Waterman, *op. cit.*, pp. 35-102; San Francisco *Bulletin*, Aug. 6, 1863; Sacramento *Union*, June 11, 1863; Marysville *Appeal*, July 29, 1863.
Yurok A. J. Bledsoe, *op. cit.*, p. 406.
Athabascans *Ibid.*, pp. 409, 415.
Hupa *Ibid.*, pp. 425-427; Sacramento *Union*, Sept. 30, 1863.
Wailaki W. P. Dole, *Rept. Commr. Indian Affairs*, 1863, No. 31; Marysville *Appeal*, Sept. 26, 1863.
Yuki San Francisco *Bulletin*, Aug. 14, 1863.

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- 1864 Yana Sacramento *Union*, Sept. 26, Oct. 10, 1864; Marysville *Appeal*, Sept. 30, 1864.
Yurok San Francisco *Bulletin*, Mar. 26, 1864.
Karok *Ibid.*, Feb. 19, 1864.
Athabascans A. J. Bledsoe, *op. cit.*, pp. 441-444; Sacramento *Union*, May 18, June 7, 1864; San Francisco *Bulletin*, Apr. 30, July 15, 1864.
- 1865 Yana G. C. Mansfield, *op. cit.*, pp. 219-223; T. T. Waterman, *op. cit.*, pp. 52-53; Sacramento *Union*, July 24, Aug. 16, Sept. 4 and 26, 1865.

TABLE 4
POPULATION DECLINE DUE TO MILITARY CASUALTIES, 1848-1880

Tribe	Population in 1848	Population reduction up to 1880	Mortality due to warfare		
			Losses	Percentage of population in 1848	Percentage of population decline
Costanoan.....	1,000	700	none*	00.0	00.0
Salinan.....	500	400	none	00.0	00.0
Chumash.....	1,150	950	none	00.0	00.0
Yokuts.....	14,000	13,400	212	1.5	1.6
Western Mono.....	1,300	700	none	00.0	00.0
Wintun.....	8,000	6,500	506	6.3	7.9
Sierra Miwok.....	6,000	5,000	207	3.4	4.1
Maidu.....	7,000	6,000	347	5.0	5.8
Yana.....	1,900	1,880	221	11.6	11.9
Achomawi.....	3,000	1,500	412	13.7	27.4
Tolowa.....	450	250	47	10.4	18.8
Wiyot.....	1,400	1,200	176	12.6	14.7
Yurok.....	2,500	1,600	67	2.7	4.2
Karok.....	2,000	1,000	98	4.9	10.9
Yuki.....	3,500	3,100	573	16.4	18.5
Other Athabascans†.....	7,950	5,990	1,154	14.5	16.5
Shasta.....	3,100	2,600	179	5.8	6.9
Coast Miwok.....	300	240	none	00.0	00.0
Lake Miwok.....	200	180	none	00.0	00.0
Pomo.....	5,000	3,550	80	1.6	2.3
Wappo.....	800	750	none	00.0	00.0
Total.....	71,050	57,490	4,279	6.0	7.4

* The notation "none" signifies no mortality of specific record.

† Includes the Hupa, Chilula, Wailaki, Chimariko, and "Other Athabascans" of table 2.

TABLE 5
SOCIAL HOMICIDE, 1852-1865*

Year	Maidu	Miwok	Shasta	Wintun	Northwestern Tribes	Pomo	Yokuts	Mission	Total
1852.....	3 M 7 E 11 T	1 M 1 E	1 E			1 E 1 L		2 M 1 L 2 E	
Total.....	21	2	1			2		5	31
1853.....	4 M 2 M-i 3 E 10 T	1 M-i		2 M 1 M-i 4 E					
Total.....	19	1		7					27
1854.....	1 M-i 2 L-i 4 E 1 S	1 M			1 M-i	1 E	1 S	2 M	
Total.....	8	1			1	1	1	2	14
1855.....	2 M-i 1 E		2 M 1 S	2 E			1 E		
Total.....	3		3	2			1		9

1856.....	1 L-i 1 S-i 2 T	3 L-i 1 E 10 T							
Total.....	4	14							18
1857.....	7 M 12 M-i 2 L-i 5 S 2 E	3 L-i	1 M-i			1 M-i 4 E		2 L-i	
Total.....	28	3	1			5		2	39
1858.....	1 M-i 2 L-i 2 E 1 T	2 M 1 M-i 1 S 1 E			2 M	1 M 1 E	2 L-i 1 E		
Total.....	6	5			2	2	3		18

* Data from newspapers only.

NOTE.—The following abbreviations are used in the table:

M Murders of Indians by whites, cause unknown; total, 48.
M-i Murders of Indians by Indians, cause unknown; total, 42.
L Murders of Indians by whites, liquor involved; total, 11.
L-i Murders of Indians by Indians, liquor involved; total, 38.

S Murders of Indians by whites, women involved; total, 18.
S-i Murders of Indians by Indians, women involved; total, 3.
E Executions or lynchings after or during a crime or misdemeanor; total, 73.
T Intertribal feuds and warfare; total, 56.

TABLE 5—Concluded

Year	Maidu	Miwok	Shasta	Wintun	Northwestern Tribes	Pomo	Yokuts	Mission	Total
1859.....	4 M 2 M-i 2 L-i 2 S 2 S-i 2 E	2 M 4 M-i 1 E	1 M-i 2 S 1 E	1 E	10 T	2 M	2 E	1 M	
Total.....	14	7	4	1	10	2	2	1	41
1860.....	1 L-i 3 E 1 T	2 M-i 8 L 1 E		1 M-i 1 S 1 E	1 S 2 E			1 L-i 1 E	
Total.....	5	11		3	3			2	24
1861.....	2 M-i 4 L-i 2 E 2 T	1 E	2 L-i 1 E 3 T	1 E				1 L-i 1 E	
Total.....	10	1	6	1				2	20

1862.....	1 M-i 1 L-i 2 E 2 T	2 L-i 3 E	2 M-i	1 M 2 L-i	1 M 2 T		1 L	1 M	
Total.....	6	5	2	3	3		1	1	21
1863.....	1 M-i 1 E	1 M 1 L-i 1 E			2 S 2 T		1 E		
Total.....	2	3			4		1		10
1864.....	1 M-i 1 E	1 L-i 1 E	1 M 1 E				1 M 2 L-i	1 L-i	
Total.....	2	2	2				3	1	10
1865.....	1 M 1 M-i 1 E	1 M		1 S			2 M		
Total.....	3	1		1			2		7
Total all years.....	131	56	19	18	23	12	14	16	289

* Data from newspapers only.

NOTE.—The following abbreviations are used in the table:

M Murders of Indians by whites, cause unknown; total, 48.
M-i Murders of Indians by Indians, cause unknown; total, 42.
L Murders of Indians by whites, liquor involved; total, 11.
L-i Murders of Indians by Indians, liquor involved; total, 38.

S Murders of Indians by whites, women involved; total, 18.
S-i Murders of Indians by Indians, women involved; total, 3.
E Executions or lynchings after or during a crime or misdemeanor; total, 73.
T Intertribal feuds and warfare; total, 56.