DEDICATION TO PAUL A. ZIMMERMAN

The Society has added to its ranks of Fellows a very talented individual, Paul A. Zimmerman. Although trained as a theologian, he has also been an educator with a great deal of administrative experience. In addition he has received considerable formal training as a physical scientist.

Despite having served as president at three different Concordia Colleges consecutively, Paul Zimmerman also has had the ability and taken the time to write a number of books and articles on the topics of science and religion. He is well-known as a lecturer on the subjects of creation and evolution. In fact he once appeared on the Phil Donahue show, where he acquitted himself very well in a dialogue with Dr. William Meyer.

Dr. Zimmerman's most noteworthy literary contribution has been as co-author and editor of three classic works which were produced by Concordia Publishing House. The first was *Darwin, Evolution and Creation* which was published at the time of the Darwin Centennial in 1959. This publication was among the first of the creationist works which appeared in what might be considered as the Creation resurgence of the late 50s and early 60s. It was followed by *Creation, Evolution and God's Word* and a third book, *The Rock Strata and The Bible Record*.

Dr. Zimmerman was born June 25, 1918 in Danville, Illinois. After graduation from the local high school, he enrolled in Concordia College, Ft. Wayne, Indiana. After completion of the two year junior college program, he enrolled in Concordia Seminary in St. Louis, Missouri. Here he attained the B.A. in 1941 and the M.Div. in 1944. After graduation from the seminary he taught science and religion at Bethany College, Mankato, Minnesota. It was during this time that he earned the M.A. and then the Ph.D. in inorganic chemistry at the University of Illinois in 1951.

Shortly he was called as science professor in 1953 and then elected president of Concordia Teachers Col-



lege, Seward, Nebraska in 1954. In 1961 he was elected to the presidency of the new Concordia College at Ann Arbor, Michigan. This school was still on the drawing boards but under his direction it was dedicated in September of 1963. After serving for 12 years, he was elected president of Concordia Teachers College, River Forest, Illinois, in 1973. In 1983, he retired and now lives in Prudenville, Michigan with his wife, Genevieve. They are the parents of a daughter and a son.

Paul Zimmerman has served on the Board of Directors of the Society from 1963 to the present. In addition to serving the cause of creation with his numerous writings on the subject, he has been able to serve the Board in an advisory financial capacity, due to his many years of administrative experience. In this capacity he has given freely of his time whenever the need arises. The Society is pleased to recognize his many years of dedicated and exemplary service.

Wilbert Rusch, Sr., L. L. D.

GEOLOGICAL EVIDENCE OF EARLY MAN

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Abstract

In the previous century, much was written about the finding of Tertiary Man and his artifacts. This material is little noted or discussed today when Man is viewed as having an extremely short geological history. It is time to reexamine the evidence presented by competent scientists and experts of the past century, without allowing evolutionary bias to interfere.

Introduction

Much material has been written in recent years concerning fossil and artifact evidence of the earliest humans or possible human ancestors. The thrust of such material is on the most recent geological period called the Quaternary which consists of the Recent and the Pleistocene Epochs. In accordance with the *Robert E. Gentet, M. S., 4938 Lansdowne Ave., St. Louis, MO 63109. geological timetable, the Quaternary is only a short 1.6 million years in length in comparison with nearly 570 million years which are thought to have elapsed since the Cambrian Period.

W. E. LeGros Clark (1964, p. 59), former professor of anatomy at Oxford, wrote: "And it was during the Pleistocene period that hominid evolution gradually proceeded toward the final appearance of the genus *Homo* and the species *Homo sapiens.*" The same verdict is still generally held today. *Homo sapiens* and his remains and culture are not to be expected outside the bounds of the Quaternary, although his assumed animal roots would date in earlier geological times.

However, if one were to look back in geological writings of 100 years ago, the picture would be quite different. Then the search for Tertiary man was active around the world. The Tertiary and the Quaternary are the two geological periods of the Cenozoic Era. The Tertiary is by far reckoned to be the longest, comprising nearly 65 million years versus the mere 1.6 million years of the Quaternary. It is during the Tertiary that some scientists of 100 years ago felt that the traces of earliest man had been and would continue to be found.

American Tertiary Evidence

What are some of the previously reported fossil and artifact finds of human remains or activity in Tertiary strata? What follows is not a complete list, but rather a representation of what can be culled out of old scientific journals and books. Obviously, even then, such findings in ancient layers were highly questioned. Today, they are never mentioned seriously and are almost entirely forgotten except as filed in some ancient book or magazine report. The purpose of this article is not to attempt to demonstrate whether these reports of ancient findings of man are valid, but rather to ask the question: "Have these findings been given a fair shake, or have they rather been explained away without proper scientific reason?" Undeniably they are devastating to the commonly-held evolutionary theory of man's origin, for they would place man too far back in the fossil record.

The 1849 gold rush to the state of California was the beginning of some of the most unusual reported finds of early man in North America. The gold-bearing gravels in California are recognized as being Tertiary in age, ranging from oldest to youngest Tertiary, depending upon the exact geological setting. At the time these gravels were deposited, volcanic eruptions also laid down lava beds, often tens or scores of feet thick. This occurred a number of times, and together with much erosion since then, have now resulted in table mountains, that is, lava-capped hills where the harder lava has better withstood erosion stresses while surrounding softer material has been swept away. It is under the hard lava beds, in the gold-bearing (auriferous) gravels, where the reported human bones and artifacts were found. Such artifacts were found not just once or twice, but hundreds of times by miners during the span of time from the 1850s through the 1890s while engaged in mining operations. Findings were spread over a wide geographical area. It is not within the scope of this article to cite all of

It is not within the scope of this article to cite all of the findings, but a few will be given so the reader will have a better estimation of what these miners of the past century reported uncovering in their diggings.

The classic report on this matter of ancient human remains and artifacts in the auriferous gravels of the Sierra Nevada in California is by none other than the California State geologist of that day, J. D. Whitney. His 569 page book *The Auriferous Gravels of the Sierra Nevada of California* (Whitney, 1880) devotes 30 pages to the question of "Human Remains and Works of Art in the Auriferous Gravel Series:"



Figure 1. Stone ball found in auriferous gravel, Tuolumne County, California. University of California, Berkeley designation 1-4202.

Whitney gives a comprehensive review, county by county, of these unusual finds by miners from the early 1850s up to the book's publication in 1880. Perhaps the most spectacular entry is that of a reported find in February 1866 by a Mr. Mattison in his mine in Calaveras County of a partial human skull. It was found "... one hundred and thirty feet from the surface, and beneath the lava, in the cement, and in close proximity to a completely petrified oak" (p. 267). Furthermore,

when delivered into the writer's hands its base was imbedded in a conglomerate mass of ferruginous earth, water-worn pebbles of much altered volcanic rock, calcareous tufa, and fragments of bones (p. 268).

The skull was in a "fossilized condition" with nearly all its organic matter having been replaced by carbonate (p. 269).

Whitney did extensive research on the skull and the circumstances surrounding its discovery and those who had the skull in their possession before it reached the Geological Survey. Whitney found absolutely no reason to doubt the truthfulness of any of the statements of those who had the skull in their possession prior to the time he first saw it:

We have the independent testimony of three witnesses, two of whom were previously known to the writer as men of intelligence and veracity, while in regard to the third there is no reason for doubting his truthfulness (p. 272).



Figure 2. Pestle found in auriferous gravel, Kincates Flat, Tuolumne County, California. University of California, Berkeley designation 1-4208A.

However, since the skull represented that of a modern-type man, the idea that such a skull truly was found in such an ancient stratum was repeatedly rejected by many later scientists. And yet, Whitney, the state geologist and himself an evolutionist, one who lived at the time of the find and did the original research, summed up his findings on this skull and the many other evidences of man found in the goldbearing gravels by concluding:

Figure 3. Cover Photograph

That there is a large body of evidence, the strength of which it is impossible to deny, which seems to prove that man existed in California previous to the cessation of volcanic activity in the Sierra Nevada, to the epoch of the greatest extension of the glaciers in that region, and to the erosion of the present river canyons and valleys, at a time when the animal and vegetable creations differed entirely from what they now are, and when the topographical features of the State were extremely unlike those exhibited by the present surface.

That man existing even at that very remote epoch, which goes back at least as far as the Pliocene, was still the same as we now find him to be in that region, and the same that he was in the intermediate period after the cessation of volcanic activity, and while the erosion of the present river canyons was going on.

That the discoveries in California, and those in other parts of the world, notably in Portugal and India, present a strong body of evidence going to prove the existence, during an immensely long period, of the human race in its primitive condition,—that is to say, in the simplest and rudest condition in which man could exist and be man.

That, so far as we now know, there is no evidence of the existence of any primordial stock from which man may have been derived, as far back at least as the Pliocene. Man, thus far, is nothing but man, whether found in Pliocene, Postpliocene, or Recent formations (p. 288).



Figure 4. Pestle found in auriferous gravel, El Dorado County, California. University of California, Berkeley designation 1-4204A.

In a report entitled "Antiquities from under Tuolumne Table Mountain in California" (Becker, 1891), read by the author before the Geological Society of America on December 30, 1890, we read further of the finding of implements and human bones beneath the mreat lava-flows which cover the gold-bearing gravel deposits of California.



Figure 5. Pestle found in auriferous ravel, Forest Home, Amador County, California. University of California, Berkeley designation 1-4210A.

Becker's interesting report says (p. 191), in part:

Mr. Paul K. Hubbs, once state superintendent of public instruction in California, was present in July, 1857, when a small piece of a human skull was taken from a sluice in which pay gravel was being washed at the Valentine shaft, near Shaw's flat. The gravel still adhered to this fragment when Mr. Hubbs received it, and the shaft through which the material was brought to the surface was a boarded one, so that the bone (it is believed) could not have dropped into the shaft from near the surface, where also there was no gravel. Mr. Albert Walton, one of the owners of this claim, also states that a mortar was found in the gravel. Mr. Oliver W. Stevens,



Figure 6. Mortar found in auriferous gravel, Buckeye Hill, Nevada County, California. University of California, Berkeley designation 1-4213.

about 1853; picked from a car-load of dirt at the Sonara Tunnel a mastodon tooth containing pyrite and a large perforated marble bead, which came into Professor Whitney's possession and shows that pyrite had filled the encrusted hole. Stevens made an affidavit as to this discovery. Mr. Llewellyn Pierce made a sworn statement that about 1862 he dug up a mortar in a tunnel on the Boston Tunnel Company's claim, 1800 feet from the mouth of the tunnel and 200 feet beneath the surface, the basalt cap being here over 60 feet in thickness . . . That practical jokes were in vogue in California in early days is certain, and it is unquestionable that Mr. Pierce's affidavit was taken with the express purpose of guarding against the objection that he might not be in earnest.

Becker gives account after account of discoveries in these gold-bearing gravels in California. In 1877 the



Figure 7. Flat barbed pendant found at Marysville, Yuba County, California. University of California, Berkeley designation 1-4550.

superintendent of the Montezuma Tunnel Company found "several spear-heads, of some dark rock and nearly one foot in length" (p. 192), "a small mortar three or four inches in diameter and of irregular shape" (p. 192), "a large, well-formed pestle. . . and nearby a large and very regular mortar" (p. 192), and in the statement made before a notary public on August 2, 1890, the superintendent, Mr. Neale, declared upon oath that "all of these relics were found the same afternoon, and were within a few feet of one another and close to the bed-rock" (p. 192) and that it was

utterly impossible that these relics can have reached the position in which they were found excepting at the time the gravel was deposited, and before the lava cap formed. There was not the slightest trace of any disturbance of the mass or of any natural fissure into it by which access could have been obtained, either there or in the neighborhood (p. 192).

Becker also goes to some length to defend the power of the miners, especially the superintendents, to be well-aware of the character of the geological layers and being able to tell more readily of "salting" a claim, even more competent that the average geological visitor who

cannot fully acquaint himself with the ground, and he is usually unfamiliar with tricks. It is therefore an argument in favor of the authenticity of implements that they have been found by miners (Becker, p. 193).

Perhaps the most significant gold-bearing gravel find was that of Clarence King, geologist and director of the Survey of the Fortieth Parallel. This particular find, because it was found by a well-known geologist of the time, has remained one of the greatest enigmas of the whole question of these most interesting California finds.

For whatever reason, Mr. King failed to publish the amazing discovery he made that spring day in 1869 while searching for fossils in the auriferous gravels southeast of Tuttletown. Years later, Dr. G. F. Becker published the discovery which, in part, reads as follows (Holmes, 1919, p. 63):

At one point, close to the high bluff of basalt capping, a recent wash had swept away all talus and exposed the underlying compact, hard, auriferous gravel beds, which were beyond all question in place. In examining this exposure for fossils he observed a fractured end of what appeared to be a cylindrical mass of stone. This mass he forced out of its place with considerable difficulty on account of the hardness of the gravel in which it was tightly wedged. It left behind a perfect cast of its shape in the matrix and proved to be a part of a polished stone implement, no doubt a pestle. It seems to be made of a fine-grained diabase. This implement was presented to the Smithsonian Institution on January 20,1870... Mr. King is perfectly sure that this implement was in place, and that it formed an original part of the gravels in which he found it. It is difficult to imagine more satisfactory evidence than this of the occurrence of implements in the auriferous, preglacial, sub-basaltic gravels. . . . That human remains are really associated with an extinct fauna in these gravels seems to me thoroughly established.

W. H. Holmes (p. 65) who does a fairly thorough treatment of the gold-bearing gravel artifacts lists as objections against the great antiquity of these artifacts, among other things, the thought that since these artifacts "duplicate modern implements in every essential respect," then, "they are such as may have fallen in from Indian camp sites or been carried into caverns by the Indians themselves."

The objection that these objects somehow found their way into the gravels from modern-day Indian cultures on the surface was used for many years against any idea that they are ancient artifacts. Yet, S. Skertchly (1888, p. 334-35) says that

they cannot have come from the surface, for none are ever found there, and many of them have been seen by Mr. Glass with the original gravel adhering to them... Occasionally mortars are found on the surface in the neighboring gulches, but only where the gulch has intersected the gravels, and these mortars are clearly derived from the old white gravels.

Furthermore, Skertchly (p. 335) reports that:

This country was inhabited by the Digger Indians until about the year 1865. My friend, Mr. Glass, was well acquainted with them, and assures me that they did not use such mortars; they hollowed out rocks **in situ**, and therein pounded the



Figure 8. Small point mortar found near Georgetown, El Dorado County, California. University of California, Berkeley designation 1-4556.

CREATION RESEARCH SOCIETY QUARTERLY



Figure 9. Object found near Crimea House, Tuolumne County, California. University of California, Berkeley designation 1-4558.

acorns on which they so largely subsisted. They were acquainted with these mortars, but knew nothing about the makers of them, and held them in such superstitious dread that on no account could they be induced to touch one. This dread of the relics of past ages seems to be everywhere common and is of itself proof of antiquity.

A more recent book by The American Museum of Natural History (Hester, 1962, p. 178) makes the following comments regarding the earlier mentioned C. J. King find:

If the gravels in which the pestle was found and the lava which lay just above it were indeed products of the Pliocene period which preceded the Great Ice Age, then we have to face a staggering idea. We have to believe that a strain of *Homo* sapiens originated in the New World long before Java man. We have to believe that he acquired the skills of the New Stone Age far ahead of man in the Old World, and that he then disappeared. It is easier—but not too easy—to think that the lava flowed in recent times, after glacial water had worked a pestle of early man into the gold-bearing gravels, which would push the seed-grinders of Čalifornia far, far back in time. It is still easier to believe that King was out of his head. It should be noted that California Indians, except along the Colorado River, never did develop a neolithic, or agricultural, level of technology.

These implements found in the gold-bearing gravels are therefore astounding in many ways. Skertchly reports (p. 337) that 300 of them have been found. They were found by many people over a span of at least 40 years while mining operations were most active. They were found in sites distributed over a vast area of country. Their appearance is found in the goldbearing gravels, except when it was obvious that they had been eroded out of such a gravel layer. They are not from the Digger Indians who would have nothing to do with them. They are not reported to be found on the uppermost soil layers. The implements are associated with fossil flora and fauna which is preglacial in nature.

The fact that the gravels are of such ancient age and the implements are of such advanced nature contradict the commonly held theories of human evolution. The finds, if valid, present major problems for all commonly held ideas of how and when man evolved. A recent article in *Nature* (Bray, 1988, p. 107) says that many archaeologists do not think humans lived in either North or South America until 11,500 years ago, and the serious debates concerning early man in the Americas focus on just a few sites dated between 20,000 and 40,000 years ago.

Findings of implements and fossils of early man in pre-glacial rock layers were cited by scientists of the last century not only in the gold-bearing layers of California, but around the world. But before leaving the United States for other fossil sites, it would be good to recall the so-called Nampa image found at Nampa, Idaho, in 1889. Holmes (p. 70) reports that this minute clay figurine is said to have been brought up, by an artesian well sand-pump, from late Tertiary or early Quaternary age. Laing's (1893, p. 385) more lengthy report says that the image was brought up from an Artesian well which had a lava-cap 15 ft. thick and about 200 ft. of quicksand and clays.

Laing's detailed account of the finding of the Nampa image relates how the ancient land surface now covered over by more than 200 feet of sands, clays, and lava corresponds to the California gravels in geologic age. The small, clay figurine was incrusted with grains of iron oxide like the clay balls found in the sand, which seems to bear conclusive evidence of its great antiquity.

The entire eleventh chapter of Laing's book is on the subject of Tertiary man. In it are covered not only the California and Idaho finds, but reports from around the world of Tertiary remains of man and his works.

International Tertiary Evidence

In France, Laing (p. 352) reports of flint knives "unmistakeable of the usual palaeolithic type" being found in Pliocene layers.

The 1887 book *Histoire des Races Humanines*, reports Laing (p.354), contains

the latest summary of the evidence generally accepted by French geologists as to Tertiary man . . . [saying] that, omitting doubtful cases, the presence of man has been signalized in deposits undoubtedly Tertiary in five different localities.



Figure 10. Double-headed stone with a convex bottom and concave (polisher?) found at Indian Gulch, El Dorado County, California. University of California, Berkeley designation 1-4559.



Figure 11. Smooth double-headed stone found at Indian Gulch, El Dorado County, California. University of California, Berkeley designation 1-4561.

These deposits range in age from Lower Miocene to Pliocene. Laing (pp. 371-72) further relates a remarkable find of some human fossils in the Lower Pliocene:

The bones of four (sic) individuals, a woman and two children were found at Castelnedolo, near Brescia, in a bed identified by its fossils as Lower Pliocene. The excavations were made with the utmost care, in undisturbed strata, by M. Ragazzoni, a well-known scientific man, assisted by M. Germani, and the results confirmed by M. Sergi, a well-known geologist, after a minute personal investigation. The deposit was removed in successive horizontal layers, and not the least trace was found of the beds having been mixed or disturbed. The human bones presented the same fossilized appearance as those of the extinct animals in the same deposit. The female skeleton was almost entire, and the fragments of the skull were sufficiently perfect to admit of their being pieced together so as to show almost its entire form.

The first conjecture naturally was that it must have been a case of subsequent interment, a conjecture which was strengthened by the fact of the female skeleton being so entire; but this is negatived by the undisturbed nature of the beds, and by the fact that the other bones were found scattered at considerable distances throughout the stratum. M. Quatrefages sums up the evidence by saying, "that there exists no serious reason for doubting the discovery, and that if made in a Quaternary deposit, no one would have thought of contesting its accuracy. Nothing can be opposed to it but theoretical *a priori* objections similar to those which so long repelled the existence of Quaternary man.'

But if we accept this discovery, it leads to the remarkable conclusion that Tertiary man not only existed, but has undergone little change in the thousands of centuries which have since elapsed.

... The great objection to Tertiary man has been, that as all other species had changed, and many had become extinct two or three times over since the Miocene, it was unlikely that an animal so highly specialized as man should alone have had a continuous existence. And this argument of course becomes stronger the more it can be shown that the oldest skeletons differed little if at all from man of the Quaternary and Recent ages.

Obermaier (1924, p. 4) reports the discovery in 1871 by Carlos Ribeiro of flints and quartzite at Otta, a Portuguese Upper Miocene site. In 1973, a colleague of the author (Lain) requested more information from the Los Angeles Portuguese Consulate about this dis-covery of "cut flints" in this Miocene deposit under 1,200 ft. of strata which were turned up into a vertical position. The response, sent in August of 1973 and

originating from the Portuguese Head-Office in Lisbon was as follows:

The study of split silex and quartzite was made by Carlos Ribeiro in his work called 'Description of Some Split Silex and Quartzites,' which, despite the fact of being written in 1871, is considered absolutely up-to-date.

Conclusion

It is time to reinvestigate what these nineteenth century men of science found and see what light can be shed on the history of man. Many voices which sounded loud and clear then told a story quite different from what is now said about the early remains of man and his artifacts. These reports of Tertiary man deserve a modern day unbiased and comprehensive study, using all of science's latest technology to discern their true relationship to man's history, regardless of presently accepted evolutionary concepts.

Auriferous Gravel Artifacts of California

The classic book on the human remains and artifacts found in the Tertiary, gold-bearing gravels of California in the latter half of the nineteenth century was J. D. Whitney's book *The Auriferous Gravels of the Sierra Nevada of California* (Cambridge: University Press, John Wilson & Son, 1880). It was through this book that the author learned of the collection now housed at the University of California at Berkeley. These photographs were taken in April of 1973 by the author while visiting the University. Its museum staff was kind enough to allow the author, and others, to see and photograph these relics which are normally in storage. The numbers are University identification.



Figure 12. Sinkers found at Indian Gulch, El Dorado County, California, Berkeley designations 1-4584, 1-4570 and 1-4585.

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