earth's location; or (2) the process called evolution confined to the earth's location; or (3) either process accompanied by genetic transport from other locations in the universe.

Processes and events comprising genetic origins cannot be uniquely implied by appeal to one set of known "scientific" processes. It is claimed here that this uncertainty is "scientifically" fundamental. It is resolvable, at the present time, and perhaps for all time, only by a free will choice between the alternatives.

To the author, and other Biblical creationists, a written record, the Bible, reveals the one most plausible alternative concerning genetic origins. According to this alternative, "the beginning" was a remarkably abrupt and complete Creation set of events generated by one Creator.

Also, according to the Bible, the original highly ordered state continually proceeds toward disorder, when the order is not sustained and renewed by God, the Creator and Controller. The

second law of thermodynamics is one manifestation of this process.

Proponents of the "theories" now labelled as evolution deny that genetic origin and continuation processes are continually subject to the second law of thermodynamics. Yet after much effort, these proponents have been unable to demonstrate that order emerges spontaneously from disorder. They also continue to selectively ignore and belittle graphic records left by previous generations of human beings.

Belief in Creation or evolution is a matter of faith. From this point of view they are both religious positions. All of religion and science has always started, and the author expects will always start, from certain ideas, which are not subject to "scientific" observation by human beings in their "present" time. Hence uncertainty about origins will always be potentially great to many persons who want to ignore or deny the existence and necessity of faith.

FOSSIL MAN AND THE CREATION CONCEPT

HAROLD W. CLARK*

Anthropology is based on the evolutionary philosophy. Early discoveries in Europe were used to establish a "sequence of cultures" of prehistoric man which has been extended with variable success to other parts of the earth.

Glacial deposits and cave remains correlated with the glacial "period" have been related to the "pluvials" of non-glacial regions again with variable success.

This study contains a brief review of the discovery of Neanderthal Man, **Pithecanthropus** of Southeast Asia, and **Australopithecus** of South Africa. Evidence is given to show that these "races" were not evolutionary in nature, but degenerative.

Earliest cities of the Middle East show a surprisingly high degree of culture. It is noted that early man, as he led a nomadic life, faced adverse conditions that resulted in deterioration, particularly of the skull features, but as they settled down and established an agricultural and urban civilization, these primitive characteristics disappeared.

Discovery of modern-appearing skulls below "primitive" ones, or contemporaneous with them, disputes the claim that these crude forms were the result of "evolution."

It is suggested that anthropologists take a new look at the evidence, and align anthropology with the Genesis account of creation and the Flood. The creationist philosophy will give an interpretation that is superior to that of "evolution."

Introduction

Two philosophies have dominated science and theology since ancient times. In this study consideration will be given to the influence of these philosophies on the question of the origin of man.

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About 1500 B.C. the book of Genesis was written, containing the statement that man was created in the image of God. This concept became a basic doctrine of Hebrew theology, and was incorporated into Christianity.

About 500 B.C. Greek philosophers began their studies, and some developed the philosophy of naturalism. According to this concept, human life as well as animal life had arisen through natural processes. In modern times this philosophic background became the basis for the so-called theory of organic evolution, by which evolution-

ists assumed that man had arisen from animal ancestry.

These two views, creation and evolution, have been in conflict ever since they were first proposed, and no matter what changing interpretations may be derived from them, they deal with essentially the same idea—whether man arose by Divine flat or through evolutionary processes.

Greek philosophy exerted a profound influence on early Christianity, and many Greek notions were carried over into the Middle Ages, and into modern times. However, primary attention will be given to the problem of fossil man in this paper.

Beginnings of Anthropology

Anthropology, or the study of ancient man, arose in Europe as the result of discoveries made along rivers, in gravel beds, and in caves in limestone strata. Gravel beds, for many years, had been attributed to the Genesis Flood, but in the early part of the 19th century Louis Agassiz, the Swiss scientist, made extensive studies of glaciers. He observed that the same phenomena seen in the Alps below the glaciers extended far out into the river valleys and onto the plains of central Europe. In 1840 be published his *Etudes sur les Glaciers*, by which he convinced scientists that a glacial period had occurred in the past.

These glacial deposits afford a much clearer and more definite record of climatic changes than have been possible anywhere else in the world, and because of this fact, anthropologists have been able to work out the sequence of prehistoric cultures from bones and artifacts found in these deposits. After the chronology was developed for Europe, attempts to apply it to other areas were fraught with difficulty. Often all that could be done was to attempt to correlate human remains with the pluvials—rain-periods—and develop a rough chronology.

In 1749 Buffon, the French naturalist, spoke of the likeness of man to the apes. In 1809, another French scientist, Lamarck, in his *Philosophie Zoologique*, declared that man was, indeed, a descendant of the apes. And so, when human bones were discovered, a natural result was the development of the science of anthropology based on the "evolution" concept.

First Discoveries of Ancient Man

The first discovery of ancient cave life was made in France and Belgium in 1833. In 1839 Boucher de Perthes explored the Somme River area and found implements of stone. In 1862 Lubbock published a report on the Somme Valley and divided prehistory into four periods, Paleolithic (Old Stone), Neolithic (New Stone), Bronze, and Iron ages.

When Perthes first found artifacts made by ancient man in the gravels of the Somme, controversy arose as to their meaning. But as more and more discoveries were made, the idea of the "evolutionary" changes of man became increasingly popular.

The first human fossil, a skull, was discovered at Gibraltar in 1848. No one had any idea of its significance, and it was laid aside until after 1856, when portions of a human skeleton were found near Dusseldorf, Germany.

These remains were found in a cave on the side of the river in the Neander Valley, and became known as Neanderthal Man. Up to the present, about 100 different fragments have been found of this same type, some of them questionable, but others fairly complete and typical. They have been found mostly in central and western Europe, but some farther east and even in Africa.

Enough remains of Neanderthals have been unearthed to establish the fact that a "race" of similar characteristics had spread over much of central and western Europe in ancient times. The remains are all much alike in skull form.

While the first reconstructions presented a slouched posture, more recent studies have shown that they walked as fully upright as does modern man. The jaws were not protruding, and the face was essentially Caucasoid.

Also the face was as flat as that of modern man, and the teeth were a variant of the Mongoloid type. The outstanding feature was the presence of prominent brow-ridges over the eyes, and the sloping forehead.

The popular conception of the slouched posture, imagined shuffling gait, etc., was due to a misconception regarding the limb bones. In the early days of anthropology the obsession with ape ancestry of man was so strong that it influenced all descriptions of such finds. Current authorities declare that Neanderthal was as intelligent as modern man, and most likely mingled with others that came into the country, and was lost by absorption rather than by conquest.

The "primitive" features have been much overemphasized, and should not be recognized as indicating more than a subspecies. Recent studies have given this race the name of *Homo sapiens* neanderthalensis.

At first there was a temptation to associate Neanderthal Man's receding forehead with a small brain capacity, but the facts do not support that conclusion. The capacity of the skulls vary from 1220 cc to 1610 cc, which in general exceeds that of modern man in both range and average.

Where does Neanderthal Man come in the geologic sequence?

The Pleistocene was the time of the glaciers, which extended far down onto the plains of Europe. These have been classified as shown in Table 1.

Table 1. Correlation of the names given to the supposed glacial periods in Europe and in America.

European		American
Upper	Wurm	Wisconsin
Riss-Wurm		. Third Interglacial
Middle	Riss	Illinoian
Mindel-Riss		.Second Interglacial
Lower	Mindel	Kansan
Gunz-Mindel .		. First Interglacial
	Gunz	Nebraskan

Neanderthal Man has been located generally in the Third Interglacial.

Incidentally, readers should note that there is now serious question as to validity of these separate glacial "ages." Some authorities believe that the divisions are merely stages in one general glacial epoch, and that the fourth, the Wisconsin, was the only true glacial "age."

However that may be, location of Neanderthal in the Third Interglacial puts him in Europe very early. Advocates of the Flood geology recognize that the glacial phenomena were the result of changing climatic conditions that came as the result of the Flood; it is not necessary to assume hundreds of thousands of years for the glacial period.

As other discoveries were made in the latter part of the 19th century, the hope of interpreting Neanderthal as an "evolutionary" ancester of present men became less and less evident. And so the search turned to other parts of the world.

Another Ancient Man Discovered

About 1890 Eugene Dubois, lecturer on anatomy at the University of Rotterdam resigned his position and joined the Royal Dutch East Indian Army, in the hope that he might have the opportunity of doing excavation in Southeast Asia. In 1894 he announced the discovery of a skull in a terrace of the Solo River near Trinil, Java.

The skull was somewhat smaller than Neanderthal, but showed the same characteristics, possibly a bit more "primitive" in appearance. Dubois named it *Pithecanthropus erectus*, the erect ape-man. An avalanche of discussion followed this find, and anthropologists were hopeful that the problem of man's origin was soon to be solved.

But as time passed and more specimens of the pithccanthropoid type were found, the evidence became more and more perplexing. Some specimens were more primitive in appearance, others more modern, and no sequential arrangement could be determined.

The controversy raged for years, but Dubois would not allow anyone to view the original skull. Finally, when he did allow experts to see the skull, 30 years after discovery, they were disappointed, for it did not reveal evidence of "evolution" to the degree expected. It was not so small nor so ape-like as they had been led to believe.

More than that, Dubois revealed the fact that his first discovery, that of the Wadjak skull, which he had not yet reported, was so human in appearance that he had kept it in seclusion, apparently because he could not harmonize it with his concepts of what "primitive" man should look like.

Over-all results of explorations in Southeast Asia have been so confusing that anthropologists have about given up hope of solving the problem of the origin of man by specimens found in that region. And so the search turned to another region, south and east Africa.

Ancient African Man Found

In 1924 Raymond Dart of the University of Johannesburg announced the finding of a skull in a quarry north of Kimberley. The features were described as ape-like, with a very slanting forehead and low cranial vault. Although the face looked like that of a chimpanzee, other features resembled those of modern man. This was named *Australopithecus africanus*, the African southern-ape.

This discovery aroused much interest in the possibility of man's origin in South Africa, and in the next few years many more fragments were unearthed. These were described as small "hominids," man-like creatures, the size of pigmies, and much controversy took place regarding them.

While some of the facial features were apelike, the dentition was human, and the limb-bones were generally human in shape. One authority called them relatives of the gorilla and chimpanzee, while other scientists regarded them as human. At the present day there is still much disagreement as how to interpret them.

One writer describes the bones as being as fragmentary as the refuse "from a lamb stew" and consisting largely of teeth, which are most easily preserved. Several hundred fragments of bones and teeth have been found, but all in all the evidence is confusing.

At Broken Hill, Rhodesia, in a mine of lead and zinc ore, a pocket full of animal bones was found, mostly modern in appearance. In this location was a human cranium, with a confusing mixture of Neanderthal, Egyptian, and Negroid features. Various other fragments were scattered, but not positively identifiable as to origin.

Dubois thought that the skull fragments were like modern Australian aborigines skulls. Still others believe that there is close resemblance between the African, Neanderthal, and Australian skulls. So the idea of man's origin in Africa is very much an open question. The evidence is so meager that not much can be made of it.

Doubtless the discovery that has attracted the most attention in recent years was that made by Mr. and Mrs. Louis S. B. Leakey in 1959. For years they had been looking for evidence of prehistoric man in East Africa. They had done excavations in Olduvail Gorge in Tanzania. One day Mrs. Leakey saw some teeth protruding from the ground, and excavation unearthed about 400 fragments which, upon being assembled, formed a peculiarly shaped skull. The next year other bones were found nearby, which were assumed to belong to the same creature.

This specimen was named Zinjanthropus africanus, East African man. The face was high, and the forehead sloped sharply from above the eyes. Heavy brow-ridges were present. A peculiar crest stood out above the skull. The face was ape-like in appearance, but with many human features. The teeth were like those of Australopithecus. No conclusion could be drawn from the leg bones. The creature had a peculiar mingling of ape and human features.

Problems of Specimen Dating

The scientific world was startled when potassium-argon tests gave a date of 1,750,000 years for the material in which the bones were found. This at once raised questions as to the antiquity of man, for nothing of such extreme antiquity had ever been known. However, it is worth noting that carbon-14 tests on mammal bones nearby gave a date of about 10,000 years.

This problem of dating has given much perplexity to the anthropologists. Potassium-argon tests in one layer of basalt in the region showed 1,300,000 years and another 4,000,000. At Lake Rudolph, Ethiopia, 40 teeth and two lower jaws of *Australopithecus* were found in rock that dated 4,000,000 years.

A number of other finds have been announced from East Africa, but they give no particular information as to the problem of man's origin. The French anthropologist M. Boule, in his Fossil Man (New York, Dryden Press, 1957), says that the majority of specimens found in East Africa belong to Homo sapiens. They do not differ much, he asserts, from the present inhabitants. Their culture was like that of ancient European men

The greatest reason why some authorities classed the African specimens as ape-like was their small size. Yet intelligence does not necessarily correlate with brain-size. *Australopithecus* was a small creature, about four feet high, and weighing only about 70-80 pounds, somewhat like the Bushmen or Pigmies.

Wilfrid E. Le Gros Clark, one of the greatest anatomists, states in his article on "Man" in the *Encyclopelia Britannica*, 1966 edition, that in the Australopithecines the skull features were such as were never seen in apes. Not one of the features of the pelvis is like that of the apes, but human in appearance, and adapted to erect posture. Even *Zinjanthropus*, Clark adds, in spite of its so-called "primitive" features, is distinctly "hominid," that is, human-like.

Although the South African specimens were different in many features of skull, teeth, and limbs, they were far outside the range of modern apes. The most outstanding characteristic is that of the teeth. The front premolar is hominid, the molars are within the hominid range, and there is no diastema, or gap between the teeth to allow the canines of one jaw to project between the teeth of the other. The teeth are distinctly human.

Some readers may question the validity of these statements, because they have read statements that seem to contradict what has just been said. But it should be noted that the most recent works on anthropology give quite a different picture than earlier works; and it is very interesting to note that the latest material is strongly against the "evolutionary" interpretation.

The general results of many studies on the South African fragments has led authorities to conclude that the fragments were nothing but "genetically different" groups, and not real races or transition forms between man and apes. Serious doubt has been thrown on the validity of the supposed origin of man in Africa.

Discussion

With all the perplexing problems associated with the materials found in Europe, Asia, and Africa regarding the meaning of the fossil remains of man, what can be done to bring a satisfactory solution to the situation? The answer seems to lie primarily in Europe and the Near East. Recent discoveries and their significance must now be noted.

Several skeletal remains have been found in Europe that indicate that a re-appraisal of anthropological theory is necessary. Among these are skulls from Steinheim, Germany; Saccapastores, Italy; and Fontechevade, France. At Steinheim a skull was found in a gravel pit with many animal bones. The deposit was classified as

Mindel-Riss interglacial, which is below the level of Neanderthal Man.

However, it was typically Caucasoid, with a brain capacity of 1000 cc, and was essentially modern in appearance. Two skulls found at Saccapastores appeared primitive in some respects, but the brow ridges were not large and the general shape and morphology of the brain and of the attachments of the neck muscle resembled that of modern man.

The skull found at Fontechevade is the most significant of all the so-called pre-Neanderthal remains. In a cave several feet of typical Neanderthal remains—bones, artifacts—were found, until the excavators reached a hard limy floor, which appeared to be the bottom of the cave. However, researchers broke through the hard floor, and at a depth of eight feet below it, they found fragments of a human skull. When assembled, it showed all the characteristics of modern skulls.

Animal bones found in this lower deposit included those of many mammals and other organisms characteristic of the climate that exists in Europe today. But there were also bones of rhinoceros and wild dog of the type that is now found only in southern Asia.

Results of the fluorine test showed that the bones were definitely older than the typical Neanderthal bones found above them. The very fact that these lower bones were of animals quite modern in appearance makes it impossible to believe that long periods of time were involved in the formation of the deposits.

Now to consider western Asia, in the regions of Palestine and Asia Minor. The latter includes what is known as the Anatolian Plateau, or Anatolia. Here many evidences of Paleolithic culture have been found, mostly circles of stones which may have marked the sites of shelters of some kind. Very few bones have been found, except in a few caves, and their meaning is not clear.

Skulls, which without doubt are of the Neanderthal age or earlier, show a slight tendency toward the variation characteristics of that race. It has been noted that there were several migration routes from this region into Europe, one on the south shores of the Mediterranean and two or three on the north. There is also evidence of migrations into Africa and southward.

The first permanent settlements of which there is a clear record were in Palestine, Anatolia, and Mesopotamia. Jericho, 825 feet below sea level, is reported as the first city ever built. This conclusion is doubtless derived from the fact that the artifacts are Neolithic; yet the conclusion may not be as sure as is generally believed.

In Anatolia, north of the Taurus Mountains, was the city of Catal Huyuk, another Neolithic

city. Both these had brick houses with plastered walls and evidently thatched roofs. Many kinds of Neolithic stone implements have been found in these ruins, with evidence of a number of industries such as agriculture, cattle raising, weaving, etc. Many of the houses were beautifully decorated with mosaics and sculptures and painting.

In Mesopotamia remnants of such cities as Ur, Abram's city, and several other similar cities were found. These had Neolithic implements at the bottom, which were followed by layers with gold and silver and bronze implements. Chariots were beautifully decorated with gold and silver and lapis lazuli.

Apparently the plateau was habitable before the valleys, and most likely Jericho, being in an arid region close to the Dead Sea, became habitable very early. It is interesting to note that when Jericho was flourishing, the Dead Sea was only about a mile away.

Conclusions

Although only a sketchy account has been possible, it would seem that enough data are now on hand from which to draw a reasonable picture of the relation of so-called "primitive" men to city builders of the Near and Middle East.

Apparently as men multiplied after the Flood, they migrated rapidly, doubtless exploring and following a nomadic life until they found suitable places of abode. The fact that the pre-Neanderthal characteristics show up in the very region where the first cities were built indicates that the early nomads underwent a certain amount of deterioration, doubtless due to unfavorable environmental conditions and probably poor food.

As these people migrated westward and southward these characteristic were accentuated during in-breeding, resulting in Neanderthal Man as he was first discovered in Europe. And as the migration continued southward, those who eventually reached South Africa showed the most degeneracy of all. Very possibly the same development took place among those who migrated eastward into Southeast Asia, Australia, and the islands of the Pacific.

When men settled in cities and villages and began agricultural pursuits, their conditions improved, and the later cultures showed little or no sign of the deterioration manifested by the earliest inhabitants of the region.

Wave after wave of invasions from the east have reached Europe. Neolithic man moved into the areas first inhabited by Paleolithic man on both sides of the Mediterranean. There are clear remnants of this culture in the Alps and in central and northern Europe. Most outstanding, perhaps, were the Cro-Magnons who followed the Neanderthals. They were completely modern in appearance. There is no evidence of the kind of dwellings they built. However, in the Alps, remnants of the dwellings of the Swiss lake people are found, which are obviously well advanced Neolithic communities.

The question will be asked: If deterioration or degeneracy could produce men who looked like apes, does that not indicate that they were revert-

ing back to their ape ancestry?

In answer to this question it is important to note the statements of some of the leading authorities to the effect that even the crudest of the fossil men, the Australopithecines, show features never found among apes.

Brow ridges are not necessarily ape features, neither are sloping foreheads or projecting jaws. These features are found in variable degrees in modern man, but anthropologists do not claim that such features of modern man represent ape ancestry.

The author recently saw a hospital patient whose deficient development made him a perfect picture of the most extreme Neanderthal ever found. All of these "degenerate" features may have been produced by faulty fetal development. Furthermore, the nature of the teeth of fossil man shows that they were human and not apes or descendants of apes.

Anthropologists have been guided, since the beginning of their science over a hundred years ago, by the "evolutionary" philosophy. Every interpretation as to origin, movements, anatomy, cultures, etc., has been formulated from that point of view.

The Creation-Flood interpretation has not received the attention that it deserves from most competent anthropologists. Is it not about time that anthropologists took a new look at the evidence, and began to interpret the evidence in a new light, under the frame of reference of a different philosophy—the creation philosophy?

THE FLOOD AND THE ARK

J. Е. Schmich*

There are many questions which could be asked about the Flood, the greatest crisis which the human race has ever faced; and about the Ark, the means whereby some were saved. In this article the author attempts to answer some of these questions, and to suggest possible ways of investigating others.

Because of archeological excavations, numerous ancient civilizations have been identified. Artifacts of human handicrafts, bricks stamped with cuneiform inscriptions, pieces of pottery, ruins of cities have been used to develop stories of these people. Nothing of this sort can be found of the work of antediluvians. All has been destroyed.

Only the story in the Bible remains, which includes two very important facts. First, the moral confusion of that time is reported. Second, the account of the ark contains evidence of high level productive ability of that race of people. And aspects of the present natural environment can be used to corroborate the Biblical account of the flood of Genesis.

The Flood and Available Water

For someone to accept the fact that there was a flood, availability of sufficient water to cover this planet must seem creditable. A modern evolutionist, Heinz Haber, has made this relevant comment:

Were it not for a peculiarity in the earth's

evolution, its entire surface would consist of water extending from pole to pole without a speck of land. If the earth were a smooth sphere the quantity of water in the oceans would be sufficient to envelop the entire globe with a depth of 7,500 feet, in which case this planet would have a truly liquid surface.¹

Today, however, the oceans cover only 71 percent of the earth's area. If there was a flood, then a transition affecting the distribution of water must have taken place some time in the past. Haber has this to say about the present condition of our planet:

The altitude level of about a thousand feet above sea level is found in the wide plains of all continents and it is interrupted only to a small degree by hills and even less frequently by high mountains. The underwater level is represented by the ocean floor which extends over millions of square miles at an average depth of about three miles. It is mostly flat, but it is interspersed at many places by submarine mountain ranges and deep sea trenches.

This surprising partition into two altitude levels has been known for a number of

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