Our Distant Ancestors

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According to today's science, humans are a product of evolution. It has been accepted by the researchers that humans are biologically the most developed form of animals. They have certain scientific evidence that supports their claim. Newly discovered drugs have been tested on monkeys, guinea pigs, and rats, and the results reveal that man possesses the same physiology as other animals have. The available fossil record shows that man has descended from a line of primates, a group that comprises all species related to apes, monkeys, and lemurs.

Chimpanzee is considered to be the closest living relative of man (Campbell, 2017). Another piece of evidence is the similarity of reaction of the anti-human sera to the blood of humans and apes. This sera are positive with blood of both almost with the same strength. It has also been noted in Phylogenic studies of Primates that the reaction of this antihuman sera is not as stronger with other primates as it is with the chimpanzees, gradually becoming weaker with apes, monkeys, baboons, and lemurs respectively. This supports the above-said idea of closeness between humans and chimpanzees.

Phylogeny is the study of relationships between organisms of the same group, based on evolutionary lines (Steel, 2016). Based on the scientific or phylogenic research conducted on Primates, humans have been classified in the sub-group of primates, the 'Hominidae' or ‘the great apes’. The great apes have larger bodies and larger brains than other primates. They remain active during the day-time. The subgroup, ‘the great apes’ comprises orangutans, gorillas, chimpanzees, and humans (Cartmill, 2018). The first primitive primates evolved around 55 million years ago. Gorillas emerged about 8-6 million years ago. Lineages of chimpanzees and humans diverged later. Orrorin tugenensis came to being 5.8 million years ago, and those are thought to be the oldest human ancestors who started walking on two legs. Ardipithecus, 5.5 million years ago, dwelt in forests, and shared characteristics with gorillas and chimps.

Later appeared Australopithecines, Lucy, Paranthropus, Homo habilis, Homo Ergaster, Homo erectus, and Homo Heidelbergensis. Homo habilis retained many features of earlier apes. However, their face jutted out lesser than those earlier hominids. They are identified to be the ones who used to split pebbles and make stone tools. Homo Ergaster had a little bigger brain than Homo habilis. Homo erectus is considered to be the first true ancestor of humans, characterized as hunter-gatherers (Antón, 2003). They possessed a brain size of 1000 cubic centimeter. They were the first who migrated from Africa in search of new lands. Homo Heidelbergensis lived six hundred thousand years ago in Africa and Europe. They demonstrated similar brain capacity to modern humans (Manzi, 2016). Early humans are thought to exist around 400,000 years ago who started hunting for food with the use of spears. On the slopes of a volcano in Italy, footprints of the early humans have been found.

Around two hundred thousand years ago, the first Homo sapiens appear on the face of earth. The evidence exists in Ethiopia in the form of two skulls that have been estimated to belong to that period. Their brain size was 1350 cm3. After their appearance, they began to migrate towards Europe and Asia. Mitochondrial Eve existed 170,000 years ago. She has been accepted to be the mother, the direct ancestor, of all humans living today, through the inheritance lines based on their mothers. The period150,000 years back is thought to be characterized by initiation of speech and related symbolism that humans developed for their use, as evident in the jewelry made of old shells in that era. Gradually developing several specialized traits, through the line of evolutionary descent, humans were capable to develop the world’s first civilization around 4000 BC.

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