Early Hominids

Homo neanderthalensis

Characteristics:

- first early human fossils ever found
- closest extinct human relative
- large middle part of the face, angled cheek bones, and nose for humidifying and warming cold, dry air
- shorter and stockier bodies
- brains as large as and often larger than modern humans
- made and used sophisticated tools: controlled fire, lived in shelters, made and wore clothing
- occasionally made symbolic or ornamental objects
- deliberately buried dead and occasionally marked graves with offerings, such as flowers

Year of Discovery: 1829

Height: Males: average 5 ft 5 in; Females: average 5 ft 1 in **Weight:** Males: average 143 lbs; Females: average 119 lbs **How They Survived:**

• specialized seasonal hunters, ate plants

Homo sapiens

Characteristics:

- gathered and hunted food
- evolved behaviors to respond to survival challenges
- lighter build of skeletons
- very large brains
- a thin-walled, high vaulted skull; flat, near vertical forehead
- smaller teeth.

Discovery: no particular *Homo sapiens* individual **Height:** Males: average 5' 9"; Females: average 5' 4" **Weight:** Males: avg. 172 lbs; Females: avg. 137 lbs **How They Survived:**

- made, used, and specialized Prehistoric stone tools
- composite stone tools, fishhooks and harpoons, bows and arrows, spear throwers and sewing needles
- farming and herding animals
- settlements
- interaction with each other and surroundings
- broad social networks
- exchanged resources over wide areas
- created art, music, adornment, rituals, and symbols

Evolutionary Tree Information:

- did *not* evolve from any of the apes living today
- most likely evolved from *Homo heidelbergensis*, common ancestor shared with Neanderthals

- big game animal remains hunted and butchered
- exploited marine resources such as mollusks, seals, dolphins and fish
- tools chipped down by removal of flakes off the surface.
- hunted with thrusting (rather than throwing) spears
- high frequency of fractures, like injuries among professional rodeo riders
- scrapers and awls (larger stone/ bone versions of sewing)

Evolutionary Tree Information:

- little direct interaction for tens of thousands of years with modern humans until during one very cold period, modern humans spread across Europe
- most recently dated Neanderthal fossils come from western Europe



Homo sapiens Where Lived:

Evolved in Africa, now worldwide When Lived: About 200,000 years ago to present

Homo habilis	Homo erectus			
Characteristics:	Characteristics:			
 slightly larger braincase and smaller face and 	 with relatively elongated legs and shorter arms 			
teeth than in older hominid species	(modern human-like body proportions)			
 long arms & projecting lower jaw 	 lived on the ground, with the ability to walk and 			
Year of Discovery: 1960	possibly run long distances			
Height: average 3 ft 4 in - 4 ft 5 in	• expanded braincase relative to the size of the face			
Weight: average 70 lbs	 cared for old and weak individuals 			
How They Survived:	• used hand axes, the first major innovation in stone			
 thick tooth enamel 	tool technology			
 strong jaws 	Year of Discovery: 1891			
 flexible and versatile diet, including some tougher 	Height: Ranges from 4 ft 9 in - 6 ft 1 in			
foods like leaves, woody plants, and some animal	Weight: Ranges from 88 - 150 lbs			
tissues	How They Survived:			
 no routine eating of hard foods like brittle nuts or 	honey and underground tubers may have been			
seeds, dried meat, or very hard tubers.	significant food sources			
 butchery of large animals, direct evidence of meat 	earliest evidence of campfires			
and marrow eating	Evolutionary Tree Information:			
Evolutionary Tree Information:	• coexisted with <i>Homo rudolfensis, Homo habilis,</i>			
 one of the earliest members of the genus Homo 	and Paranthropus boisei			

- co-existed with Homo erectus in Eastern Africa for almost half a million years.
- and Paranthropus boisei
- coexisted with Homo sapiens and possibly Homo heidelbergensis

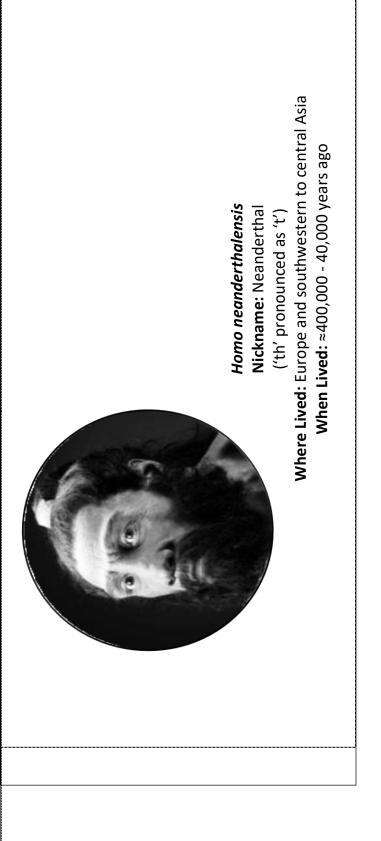
Early Humans Chart							
	When 1 st lived	When last lived	When 1 st discovered	Weight range	Height range		
Homo erectus							
Homo floresiensis							
Homo habilis							
Homo heidelbergensis							
Homo neanderthalensis							
Homo sapiens							



Homo habilis Nickname: Handy Man Where Lived: Eastern and Southern Africa When Lived: 2.4 million to 1.4 million years ago



Homo floresiensis Nickname: the Hobbit Where Lived: Asia When Lived: About 100,000 – 50,000 years ago



Homo heidelbergensis

Characteristics:

- very large browridge
- larger braincase and flatter face than older early human species
- first early human species to live in colder climates
- oldest definite control of fire and use of wooden spears
- first early human species to routinely hunt large animals
- first species to build shelters, creating simple dwellings out of wood and rock

Year of Discovery: 1908

Height: Males: average 5 ft 9 in (175 cm); Females: average 5 ft 2 in

Weight: Males: average 136 lbs (62 kg); Females: average 112 lbs

How They Survived:

- capable of controlling fire by building early fireplaces (evidence found in Israel)
- first to build simple shelters
- first hunter of large game animals
- evidence of what may be human ritual: individuals deliberately thrown inside a pit.

Evolutionary Tree Information:

• includes early humans from Spain, England, Italy

Homo floresiensis

Characteristics:

- more recently discovered early human species, found only on Island of Flores, Indonesia.
- made and used stone tools
- tiny brains
- large teeth for size
- shrugged-forward shoulders
- no chins
- receding foreheads
- relatively large feet due to their short legs
- coped with predators such as giant Komodo dragons
- may have used fire
- island dwarfism—from long-term isolation with limited food resources and lack of predators

Year of Discovery: 2003

Height: 3 ft 6 in - estimate from a female skeleton **Weight:** 66 lbs - estimate from a female skeleton **How They Survived:**

- selectively hunted Stegodon (extinct type of elephant)
- hunted small elephants and large rodents **Evolutionary Tree Information:**
- debate over how *H. floresiensis* is related to other species in the genus (evolve from an earlier population of *H. erectus* or from a smaller species?)



Homo heidelbergensis Where Lived: Europe; possibly Asia; Africa When Lived: About 700,000 to 200,000 years ago



Homo erectus Where Lived: Northern, Eastern, and Southern Africa; Western Asia; East Asia When Lived: Between about 1.89 million and 143,000 years ago