**Essential Vocab for L3 Human Evolution Trends**

Taken from the achievement standard and the exam marking schedules

Skull

cranium

sagittal crest.

brow ridge

zygomatic arch

foramen magnum

face

prognathic

Brain

Brain/cranium capacity

Broca’s area

Wernicke’s area

 frontal lobe

 endocranial

Selection pressures

less forest, more savannah

change of diet

working in teams

avoiding predators

Skeleton

 bowl-shaped pelvis

 forward-facing big toe

 foot arch

 valgus angle

 s-shaped spine

 centre of gravity

long femur

arm shorter than leg

Hand

 straight shorter fingers

 long thumb

 precision grip

 power grip

bipedal

arboreal

brachiate

quadrupedal

reproductive success

thermoregulation

primate

great ape

hominin

hominid

biological evolution

cultural evolution

tool

domestication

abstract thought

settlement

hunter-gatherer

australopithecine

*Homo habilis*

oldowan/chopper tools

bone marrow

*Homo erectus*

acheulian tools

fire

*Homo neanderthalensis*

mousterian tools

clothes

shelter

burial

*Homo sapiens*

upper paleolithic tools

art

out of Africa theory

(multiregional hypothesis)

nuclear DNA

mitochondrial DNA

Note:

* several exam reports noted students not understanding that all primates have opposable thumbs, so not a bipedal feature
* while several other species were mentioned, they were examples to show trends, whereas students were expected to know a bit more about the 4-5 listed above, e.g. their tool culture, and the ‘firsts’ (e.g. first to use fire)
* if organised as a cluster, these words may also be useful:

bigger, smaller, smaller, thinner, forward, flatter, larger, lower

* most evidence now supports out of Africa theory so multiregional hypothesis has not featured for a couple of years

Page 2 : cluster for bipedal features and biological evolution

Page 3 : cluster & matching list instructions

Page 4 : cluster for classification & cultural evolution

Page 5 : definitions matching list

|  |  |  |
| --- | --- | --- |
| cranium | sagittal crest | brow ridge |
| zygomatic arch | foramen magnum | face |
| Brain/cranium capacity | Broca’s area | Wernicke’s area |
| frontal lobe | pelvis | foot arch |
| big toe | valgus angle | spine |
| centre of gravity | long femur | arm shorter than leg |
| straight shorter fingers | long thumb | precision grip |
| power grip | bigger | smaller |
| smaller | lower | thinner |
| s-shaped | forward-facing | bowl-shaped |
| larger | forward | flatter |

**Cluster Instructions** for page 2

**This strategy provides students with an opportunity to think about and discuss / debate the meanings of words and the relationship between words. Students are reminded of words they already know and may be introduced to new vocabulary.**

* Print onto card (different colours for different groups). Cut out. Put in envelopes.
* Put students into small groups and give each group an envelope
* Have student groups arrange words in clusters (groups) according to the meaning of the words. It’s okay to have a pile of ‘don’t knows’. Aim for at least 6 clusters.
* Encourage students to discuss and negotiate where/how/why words should be grouped. A key part of this strategy is the discussion around grouping the terms.
* Ask students to give each cluster a heading (supply blank pieces of paper for this).
* Each group can then share/justify how they have prepared their clusters.
* Try to lead on from this to a writing activity using (some of) these words

Spare blanks for headings

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**Matching List instructions** for page 4

* Print onto paper or card – if you use different colours they don’t get mixed up
* Cut out the boxes carefully to make a set of cards
* Make 10 such sets for the class
* Students are asked to work in groups to match term and definition
* For revision can give students just the definition cards and they have to remember the term (easier) or they can be given just the term cards and they are asked to remember the definition s (harder)

|  |  |  |
| --- | --- | --- |
| bipedal | arboreal | brachiate |
| quadrupedal | primate | great ape |
| hominin | hominid | australopithecine |
| Lucy | *Homo habilis* | oldowan/chopper tools |
| *Homo erectus* | acheulian tools | first to make fire |
| *Homo neanderthalensis* | mousterian tools | first out of Africa |
| first to bury their dead | *Homo sapiens* | upper paleolithic tools |
| first to create art | knuckle walker | chimpanzee |
| modern human | first to make stone tools | first to use shelter |
| gorilla | orangutan | Squirrel monkey |
|  |  |  |
| biological evolution | The family of great apes (including humans) & their ancestors. [beware older definition - all *Homo* spp] |
| cultural evolution | *Homo erectus populations* left Africa and dispersed into other parts of the world, slowly evolving into *Homo sapiens* in each place. |
| prognathic | Physical, physiological & behavioural adaptations are passed on from parent to offspring in their genes |
| out of Africa theory | Live mainly in the trees |
| multiregional hypothesis | The family of modern humans and their ancestors  |
| endocranial | Walk on all fours |
| selection pressures | Walk on two feet  |
| hominid | The internal features of the skull that can tell some things about brain structure  |
| brachiate | External agents which affect an organism's ability to survive in a given environment, cause a phenotype to be selected for or against |
| quadrupedal | *Homo sapiens* evolved relatively recently in Africa, migrated into Eurasia & replaced all populations which had descended from *Homo erectus*. |
| bipedal | Snout-like face  |
| arboreal | Swing by the arms from branch to branch  |
| hominin | Ideas and behaviours are passed from individual to individual by learning (can be unrelated) |