

ACTIVITY!

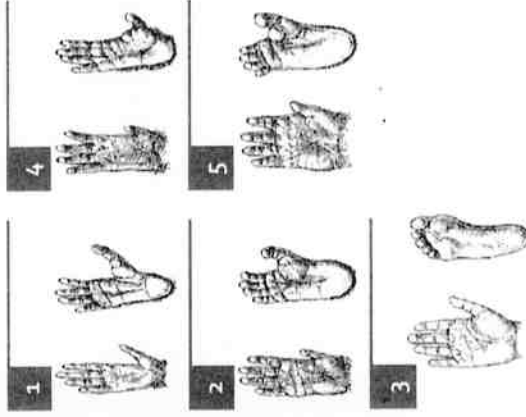
All primates have bodies adapted to a climbing way of life, yet their hands and feet have been modified depending on their different lifestyles.

All apes have relatively longer fingers and a smaller thumb than humans. Apes who move around in trees by swinging under branches with a hand-over-hand motion, such as siamangs, gibbons, and orangutans, have developed long, strong fingers that act like hooks for hanging and swinging. Their thumbs, however, are not well-developed, possibly because it hinders movement. In contrast, chimpanzees and gorillas, have thumbs that are well-developed and agile. They allow for a precise grasp as the thumb and fingers are opposed to each other. The hands of humans, not used any longer for climbing, have developed into perfect "grasping instruments".

Apes use hands and feet not only for moving, but for many other things. It's as if they have four hands, as their feet have long little toes and a thumb-like agile big toe. This big toe is much shorter than the other toes, and can actively grasp things. In humans, the feet have lost their ability to grasp in adaptation to a walking upright manner. Our feet are well-adapted to bear the whole body weight whereas in other apes the body weight is borne by all four limbs.

Who is who?

Which of the following hands and feet belong to the **gibbon, orangutan, chimpanzee, gorilla, and human**? How are their hands and feet adapted to their lifestyles?



1.
2.
3.
4.
5.

Thumbs Up!

Thanks to opposable thumbs, primates can grasp objects better than other animals, which allows them to easily perform tasks that would be hard or impossible otherwise. What would your life be like without an opposable thumb?

- Try writing your name or drawing a picture without using your thumb.
- How about buttoning your shirt or tying your shoes?
- What else would be tough to do without thumbs?

gorilla = 4 | orangutan = 2 | chimpanzee = 3
gibbon = 1 | siamang = 5

Solution:

by courtesy of Zoo Zürich, Switzerland