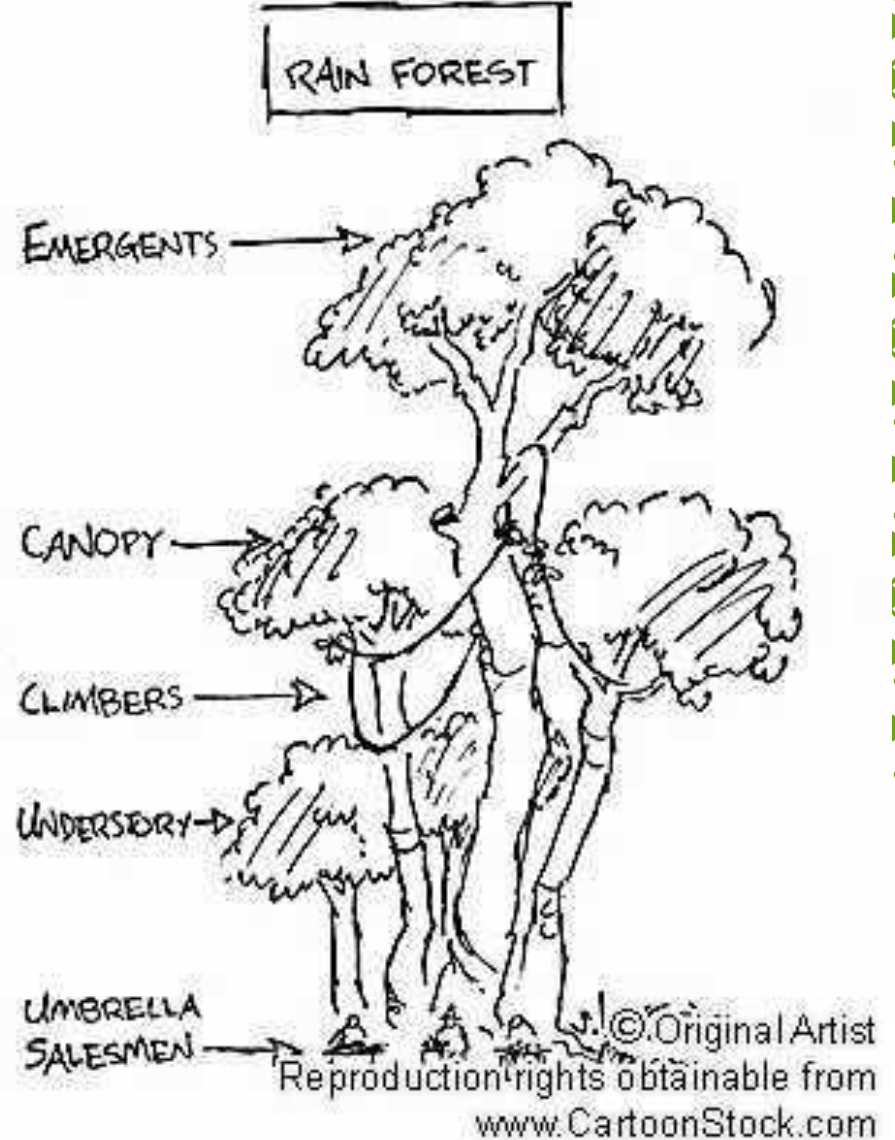
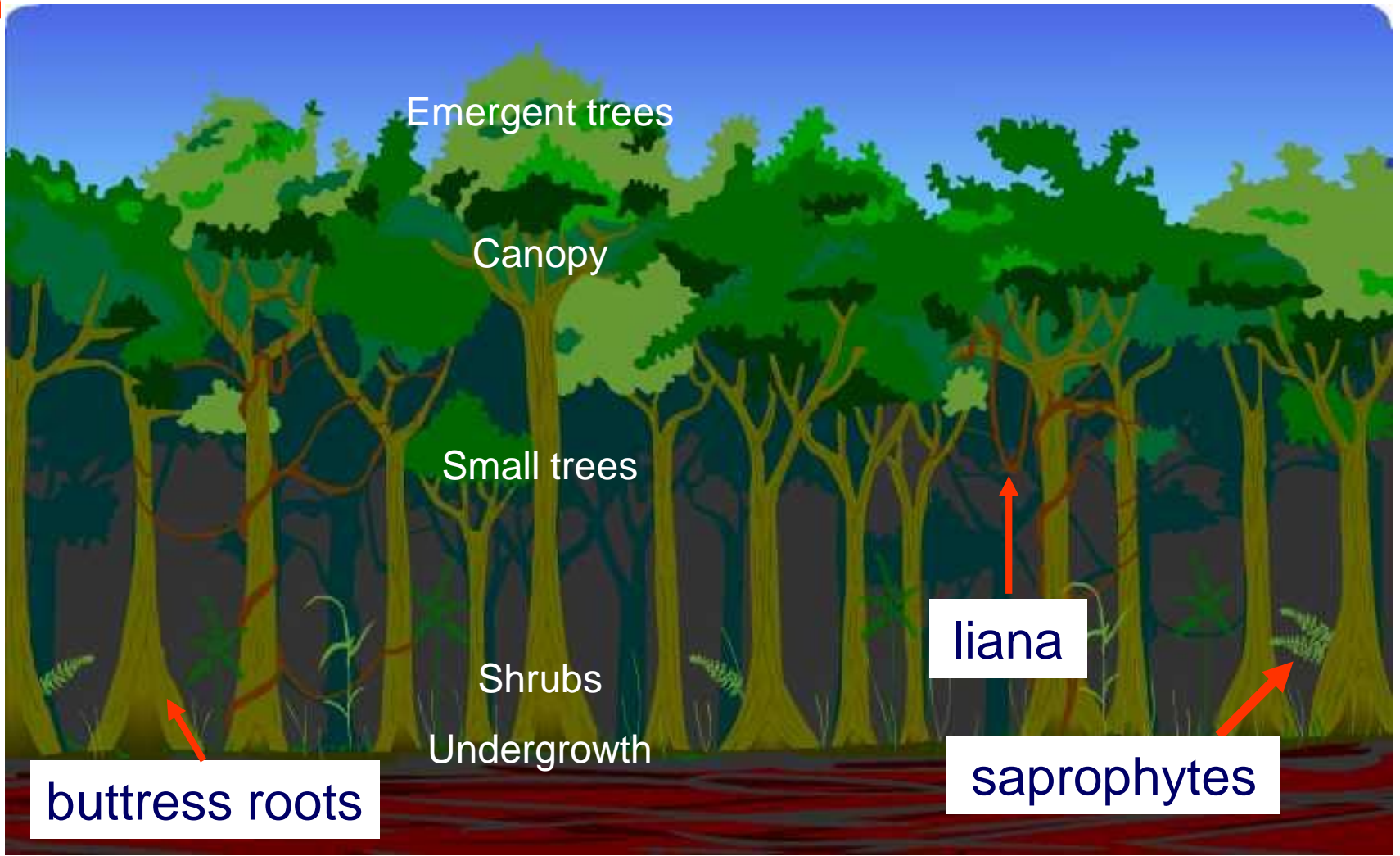


Layers of the rainforest



Layers of the rainforest

50m



Emergent trees

Canopy

Small trees

Shrubs

Undergrowth

liana

buttress roots

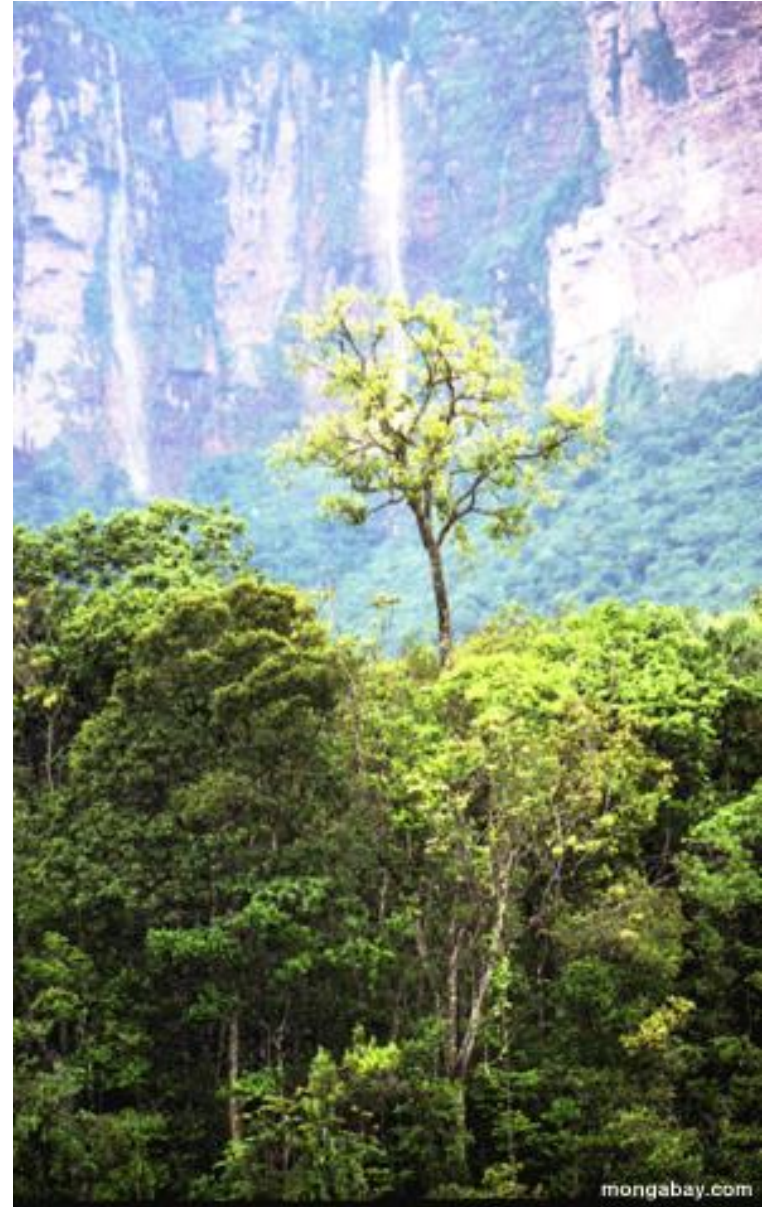
saprophytes

0m

Emergents

Emergents are the tallest trees, growing 50 to 65 metres in height. There are only 1 or 2 emergent trees in every acre of forest.

Between rainstorms, the climate here is often dry because of the bright sun and strong winds. Emergent trees cope with this dryness by producing tough little leaves whose small surface area and waxy coating keep evaporation to a minimum.





Many emergent trees produce seeds with wings, so the wind can carry them away from the ground directly below, where they would be competing with the parent tree for food and water.

Animals commonly found here are eagles, monkeys, bats and butterflies.



Canopy

The canopy is a thick layer of vegetation 20 to 40 metres high. The leaves of the trees in the canopy generally have pointed shapes so that water will run off of them, this keeps the leaf surface dry and discourages the growth of mildew and mould. The leaves on these tree are also enormous to absorb as much sunlight as possible, some leaves can be 7 meters across.





Insects hum and nibble on plants, reptiles slither along the branches and trunks of trees, monkeys chatter back and forth as they swing through the branches, and brightly coloured birds dart among leaves. Tree frogs and toucans are also found here. The canopy offers such an abundance of shelter and food that many of the animals living in this layer never need to descend from it.



Under-canopy or understory

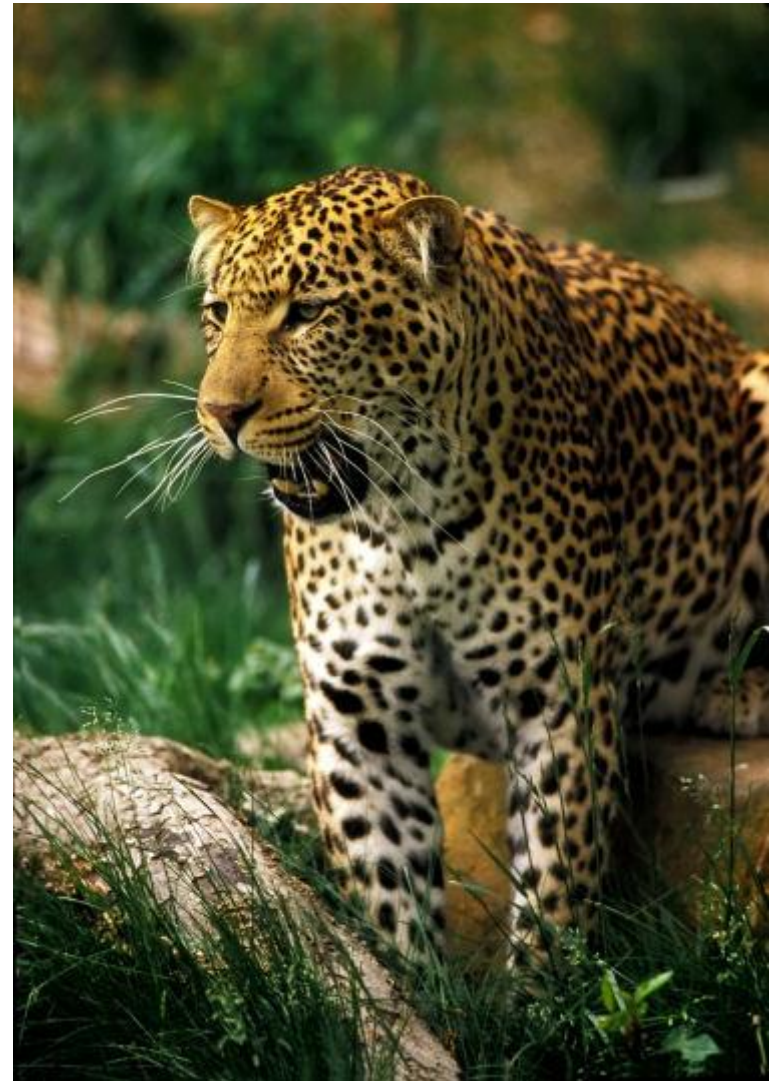
The understory usually reaches about 12 metres. It receives only 2 to 15% of the sunlight that the canopy gets.

Many of the plants living in this level have adapted to growing in the shade and don't need much light for photosynthesis.



Understory plants have to find ways to advertise their flowers, so that the animals and insects that carry their pollen, can find them in the dim light.

Jaguars, leopards and an abundance of insects reside in the undercanopy.



Shrub layer

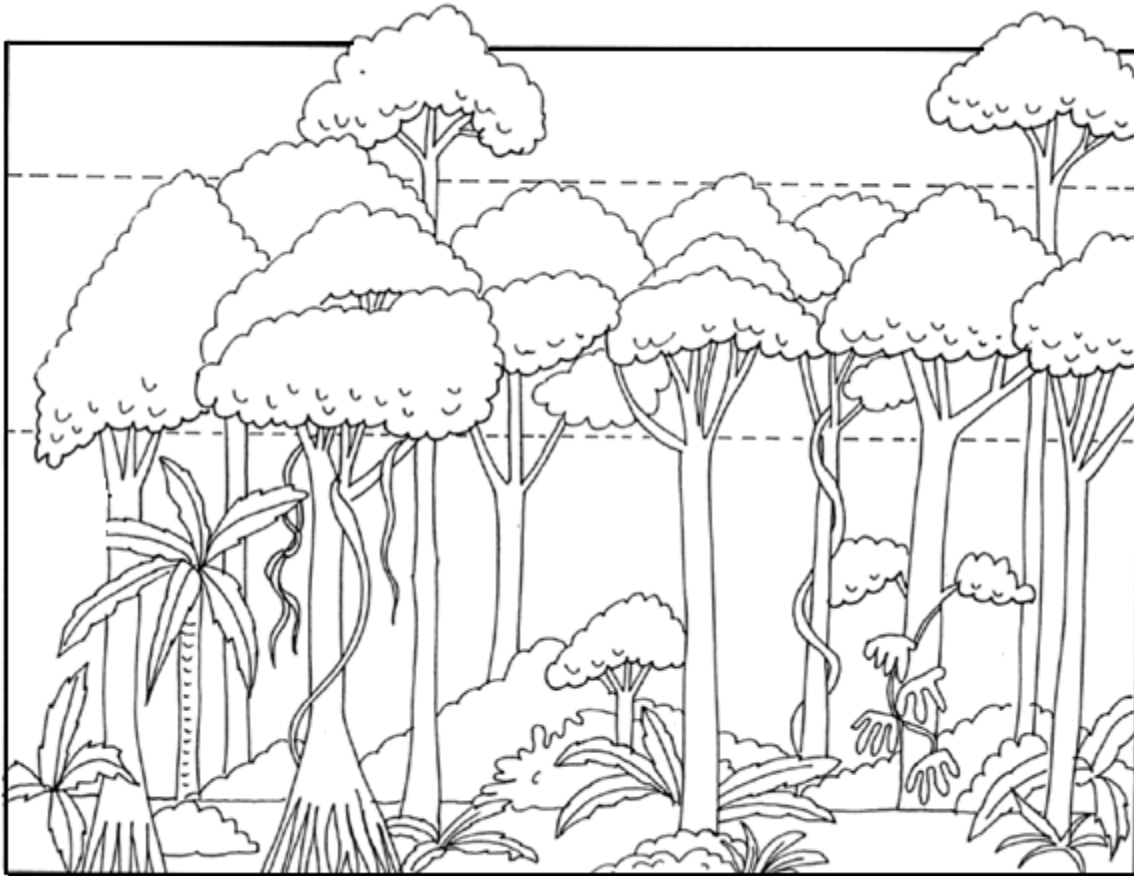
Little grows here except plants adapted to very low light. On the floor is a thin layer of fallen leaves, seeds, fruits and branches that very quickly decomposes. A leaf that might take a year to break down in normal climates will be gone in 6 weeks





The smallest animals generally live alongside the largest animals here. The smallest include countless centipedes, cockroaches, scorpions, slugs, earthworms, and beetles. The largest include gorillas, anteaters and people.





Colour/ draw the diagram and put the following labels in the right place:

Shrub

Emergent

Canopy

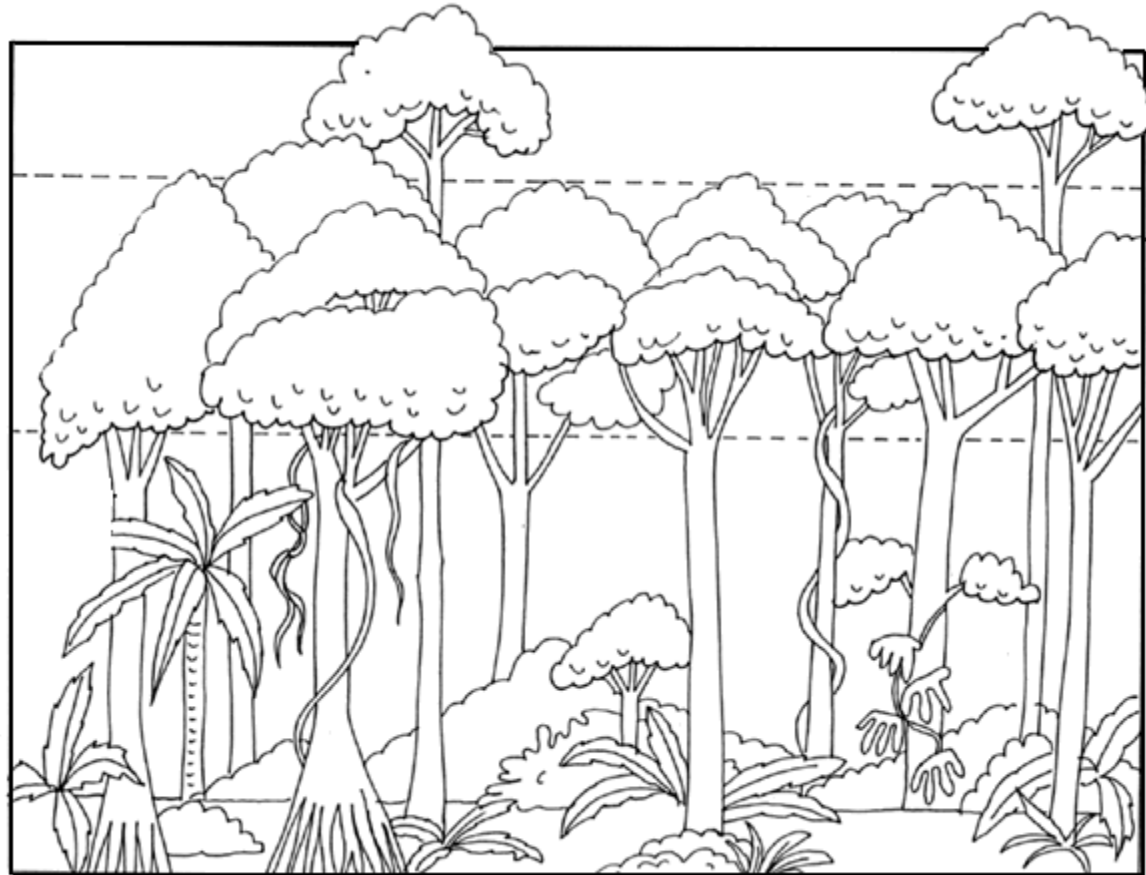
Undercanopy

Emergent

Canopy

Undercanopy

Shrub



40

rain

animals

undercanopy

canopy

The highest layer of the rainforest is the _____ layer. Trees here can reach _____ m high and need to be very tough. To cope with the wind and _____.

Next is the _____ layer where most of the _____ live.

Next is the _____. Trees here only grow to _____ m high as there is not much sunlight.

At the very bottom is the _____, where it is very _____ and not much grows.

dark

10

Shrub layer

emergent