



# Tropical Rain Forest

**advantages** = the good sides of something (= **Vorteile**)

**although** = **obwohl**

**basin** = an area of land that is lower in the middle. Usually, a big river runs through it.

**despite** = the same as "although"

**evergreen** = when a plant or tree does not lose its leaves in the winter

**species** = a group of animals or plants that are like each other

**supply** = give

**surface** = **Oberfläche**

**timber** = the wood that you use to build houses

**throughout** = all over

Tropical rain forests are woodlands around the equator with a lot of vegetation that is **evergreen**. It is very warm and rain falls **throughout** the year.

**Although** only 7 % of the land **surface** are covered with rain forests , more than half of the world's plants and animal **species** live there.

Rain forests are very important for human beings. Plants produce food and medicine and we get industrial products out of some of them. Trees produce **timber**, help control the earth's climate and **supply** us with fresh air.

**Despite** these **advantages**, people cut down thousands of square kilometres of rain forest every year.



Half of the world's rain forests grow in the Amazon River **basin** in South America. Smaller rainforest areas lie in Central America and southern Mexico.

The western part of Africa has about 2 million square kilometres of rain forest in and around the Congo River **basin**.

Rainforests in Asia can be found in southern India, Malaysia and on many islands of Indonesia.



# Tropical Rain Forest

**clear up** = it becomes sunny again

**consist** = besteht aus

**create** = make

**evaporate** = to change from liquid to gas (= **verdunsten**)

**fertile** = fruchtbar

**hardly** = almost not (= **kaum**)

**height** = Höhe

**humid** = very wet

**layer** = Schichte

**liana** = long vines that grow up trees (= **Lianen**)

**nutrient** = a chemical or food that gives plants what they need to grow (= **Nährstoff**)

**reach** = get to

**rise** = to go up

**soil** = the top part of the earth on which plants grow (= **Boden**)

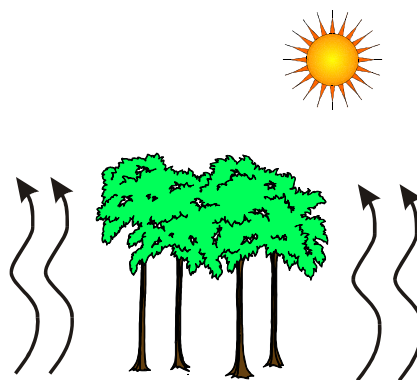
**species** = a group of animals or plants that are like each other

**throughout** = all over

## CLIMATE

Temperatures stay the same the whole year round—about 20 to 30 degrees Celsius. Around the equator there are two rainy seasons with heavy rainfall — up to 10 metres. When you move away from the equator it gets a bit drier in some months, but there is still more than 2 metres of rain a year.

The weather **hardly** changes from one day to the next. In the morning it is clear. The sun starts heating up the ground and warm, **humid** air starts to **rise**. In the afternoon clouds get blacker and there are thunderstorms for an hour or two before it starts to **clear up** again.



In the morning, the sun shines and heats up the ground. Hot and wet air rises.



In the afternoon, dark clouds bring rain and thunderstorms to the rain forest.

Most of the rain stays in the rain forest. It **evaporates**, **creates** clouds and falls down again.

Rain forest **soils** are not very **fertile** because the rain washes out most of the **nutrients**.

## STRUCTURE OF THE RAIN FOREST

Rain forests have four **layers**.

1. The top layer is the canopy. It **consists** of the tallest trees of the rain forest. They may get over 50 metres tall. But only very few **reach** this **height**. This is the part that gets most of the sunlight.
2. The subcanopy is a **layer** of trees that is below the canopy. More than 70 % of rain forest animals and plant **species** live in the canopy and subcanopy. **Lianas** often climb around trees.



# Tropical Rain Forest

**benefit** = if something helps you  
**branch** = part of the tree that grows out from the trunk ( = **Ast**)  
**crown** = **Krone**  
**cure** = **heilen**  
**decompose** = to decay ( = **verfallen , verwesen** )  
**drought** = a long period of very dry weather  
**ecosystem** = all the animals and plants that live in an area  
**environment** = the world around us  
**evaporate** = to change from liquid to gas ( = **verdunsten**)  
**fern** = a plant with green leaves that look like feathers , but with no flowers  
**flood** = **Überschwemmung**  
**furniture** = large objects in the house that are mostly made of wood , like chairs, tables, cupboards etc..  
**gap** = a small space between two objects  
**immediately** = at once, very quickly  
**nectar** = the liquid that insects collect from flowers  
**pollinate** = to give a flower or a plant pollen so that it can produce seeds ( = **bestäuben**)  
**regulate** = to control  
**reptile** = an animal like a snake, whose body temperature always changes  
**seed** = a small hard object that is in a fruit or plant  
**shadowy** = very dark  
**species** = a group of animals or plants that are like each other  
**survive** = **überleben**  
**valuable** = very important  
**vapour** = **Dampf**

- The understory is the **shadowy** lower area. It has young trees and plants like **ferns** or palms that do not need much light. Only 1 or 2 per cent of the sunlight reaches the understory.
- The floor has a thin layer of leaves, **seeds** or fruits and **branches** that fall from the trees. It **decomposes** fast and new material takes its place.

When large , tall trees die and fall to the ground they leave a **gap** in the rain forest. Very quickly, smaller trees take this place and their **crowns** grow larger. That's why the layers of the rain forest always change.

## PLANTS AND ANIMALS

About half of the world's plant **species** can be found in the rain forest. Because it is warm and rains the whole year, forests stay green. Trees lose their leaves and **immediately** grow new ones. The rain forest is the home of many plants : lianas, ferns, orchids and many kinds of tropical trees.

Fish, **reptiles**, birds and insects also live in the rain forest and its rivers. Plants and animals need each other to **survive**. Insects **pollinate** the flowers of the rain forest. Animals get food from the flowers' **nectar** . **Seeds** from trees are often taken away by other animals and birds and dropped in far away areas.

## VALUE OF THE RAIN FOREST

People **benefit** from the rain forest in many ways :

- Economic value**  
Wood is the most important product of the rain forest. About 80 % of it is used for energy and 20 % is sold to make **furniture**. The forests produce other **valuable** goods like fruits, nuts, different kinds of oils and rubber.
- Scientific value**  
Scientists study the rain forest as an **ecosystem**. They learn a lot about how plants and animals live together. Tropical plants are used to **cure** diseases like malaria.
- Environmental value**  
Rain forests help to **regulate** our **environment**. Trees control the water that reaches the ground. They also take up a lot of rain. Much of this water **evaporates** and gets into the atmosphere again as **vapour** . Then it turns into rain and comes down to earth. Without rain forests, **floods** and **droughts** would be very extreme. Rain forests also help our atmosphere from becoming too warm.

# Tropical Rain Forest



**cattle** = cows that are kept on a farm (= **Rinder**)

**chop down** = to make a tree fall

**create** = make

**crops** = plants like corn, wheat or rice that are grown by farmers and used as food

**dam** = a wall built across a river. Most dams are built to make electricity

**deforestation** = the cutting or burning down of all trees in an area

**depend** = if you need the help of something (= **abhängen von**)

**environment** = the world around us

**firewood** = wood that you collect to make a fire

**indigenous** = people who have always been in the same place all the time

**iron ore** = **Eisenerz**

**mine** = to dig big holes in the earth and get out coal, gold or other things

**protected** = **geschützt**

**public** = **Öffentlichkeit**

**raise** = to look after animals and help them grow, so that they can be sold (= **züchten**)

**rate** = speed ( **Geschwindigkeit** )

**raw materials** = **Rohstoffe**

**shifting cultivation** = **Wanderefeldbau**

**soil** = the top part of the earth on which plants grow (= **Boden**)

**survival** = **Überleben**

**tribe** = **Stamm**

**valuable** = very important

## PEOPLE OF THE RAIN FOREST

Most of the world's rain forests are populated by **indigenous** people. These are people who have been living there for thousands of years. They **depend** on the rain forests for **survival**. Some people live in places that you can get to only by boat.

Many people collect fruits, nuts and **firewood**. They hunt and fish for food to stay alive. They burn down small areas of rain forest and grow **crops** there. When the **soil** gets too bad, they go to other places and plant new crops. This method of farming is called **shifting cultivation**.

Today, the living areas of these **indigenous tribes** are in danger, because other people have come here to **chop** down trees, **raise cattle** or **mine** gold and silver.

## DEFORESTATION

People are destroying the world's rain forests at a very fast **rate**. One of the reasons is **deforestation**. More and more trees are cut down every year because

1. the world's population needs more and more wood
2. people in the tropical rain forest need energy. They can't buy oil or gas because it's too expensive.
3. governments find valuable **raw materials** in these areas—like **iron ore**, gold or silver.
4. **dams** are built along tropical rivers.
5. big companies get land to grow meat and produce food.



## HOW WE CAN SAVE THE RAIN FORESTS

Many **environmental** organisations like the World Wildlife Fund, are working to save rain forests all over the world. They help to **create** national parks or other **protected** areas. But this costs a lot of money and not all governments want to spend it. It is also important to tell the **public** how **valuable** rain forests are and what will happen if they are completely destroyed.



# Tropical Rain Forest

## PLANTS AND TREES OF THE RAIN FOREST

**bark** = the outer part of a tree

**branch** = part of the tree that grows out from the trunk (= **Ast**)

**building material** = materials like wood or stone, that you use to build huts, houses or buildings

**carry** = tragen

**fluid** = the same as "liquid" (= **Flüssigkeit**)

**juice** = a liquid that comes from a fruit, tree or vegetable

**mixture** = a combination of two or more

**plantation** = a large group of trees that are grown to produce rubber

**raw materials** = Rohstoffe

**smooth** = glatt

**species** = a group of animals or plants that are like each other

**straight** = gerade

**trunk** = the thick, middle stem of a tree (= **Stamm**)

### PALM TREE

Palm trees grow in the hot and wet climate of the tropics. They give us food, drink and sometimes **building material**. Most palm trees are found in southeast Asia, South America and on islands in the Pacific.

There are over 2,000 kinds of palms. They grow **straight** and tall and most of them **carry** fruits, like the coconut, which can be up to two feet big.



### RUBBER TREE

Rubber is one of our most important **raw materials**. Natural rubber comes from the **juice** of the rubber tree. It grows best in hot climates.

The tree can be about 20 metres tall. It has **smooth**, shiny leaves. A white, milky **fluid** comes out of the **bark** if you cut into it. This is called latex.

Today, most rubber comes from **plantations** in southeast Asia.

### ORCHID

Wild orchids grow in places with a lot of rainfall. Most **species** grow on **trunks** or **branches** of trees. In cooler regions, orchids are grown in greenhouses.

Most of them grow in a **mixture** of fascinating colours





# Tropical Rain Forest

**although** = obwohl

**attack** = angreifen

**attract** = to make themselves interesting for other birds

**bill** = the hard, pointed mouth of a bird

**flat** = flach

**hollow** = an object with a hole inside

**huge** = very big

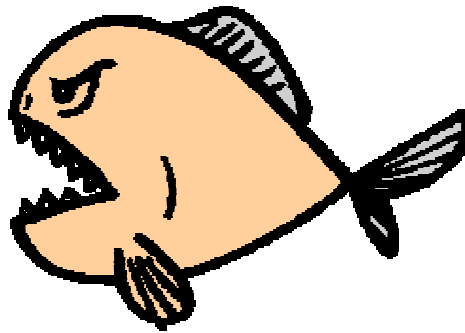
**rare** = you can't see it very often or it something doesn't happen very often

**shoulders** = a part of the body between your neck and your arm

**weigh** = wiegen

**wild** = in nature

## LIFE IN THE RAIN FOREST



### PIRANHA

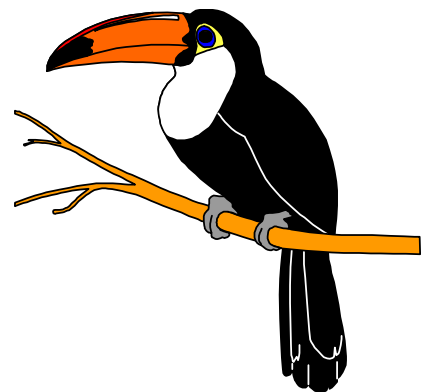
The piranha is a fish with sharp teeth that lives in the lakes and rivers of the Amazon valley. It **attacks** and eats other fish and water animals. In some cases, it even attacks humans.

Piranhas have **flat** bodies and can grow up to 30 cm long.

### TOUCAN

Toucans are typical birds of the tropical rain forests. They have big and long **bills** that are brightly coloured, so that they can **attract** other birds.

The largest toucans can get up to 65 cm long. Most of them live in **hollow** trees.

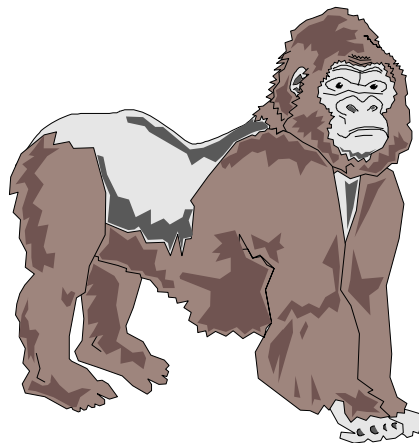


### GORILLA

Gorillas are the largest members of the ape family. They have **huge shoulders**, long arms and short legs. They may **weigh** up to 200 kg.

Gorillas live in Africa near the equator. **Although** most of them live in the lowlands there are some highland types.

People have hunted gorillas for a long time. As a result, they have become very **rare** and only about 1,000 gorillas live in the **wild** today.





# Tropical Rain Forest

**ANSWER THE FOLLOWING QUESTIONS !**

Where can you find tropical rain forests ? \_\_\_\_\_

Which part of the land surface do they cover ? \_\_\_\_\_

Why are rain forests important for our world. Give at least four reasons !

1. \_\_\_\_\_
2. \_\_\_\_\_
3. \_\_\_\_\_
4. \_\_\_\_\_

Describe the climate of the tropical rain forest ! \_\_\_\_\_

How good are the soils ? \_\_\_\_\_

The rain forest is made up of four layers .Describe them in the box below !

<b>Canopy</b>	
<b>Subcanopy</b>	
<b>Understory</b>	
<b>Floor</b>	

How do plants and animals need each other to survive ? \_\_\_\_\_

Why do people destroy the rain forests . Name five reasons !

1. \_\_\_\_\_
2. \_\_\_\_\_
3. \_\_\_\_\_
4. \_\_\_\_\_
5. \_\_\_\_\_



English Across the Curriculum

# Tropical Rain Forest

**COLOUR THE AREAS WITH TROPICAL RAIN FORESTS**



**HOW DOES THE WEATHER CHANGE IN THE RAIN FOREST ? GIVE A SHORT DESCRIPTION !**

Morning

Afternoon



# Tropical Rain Forest

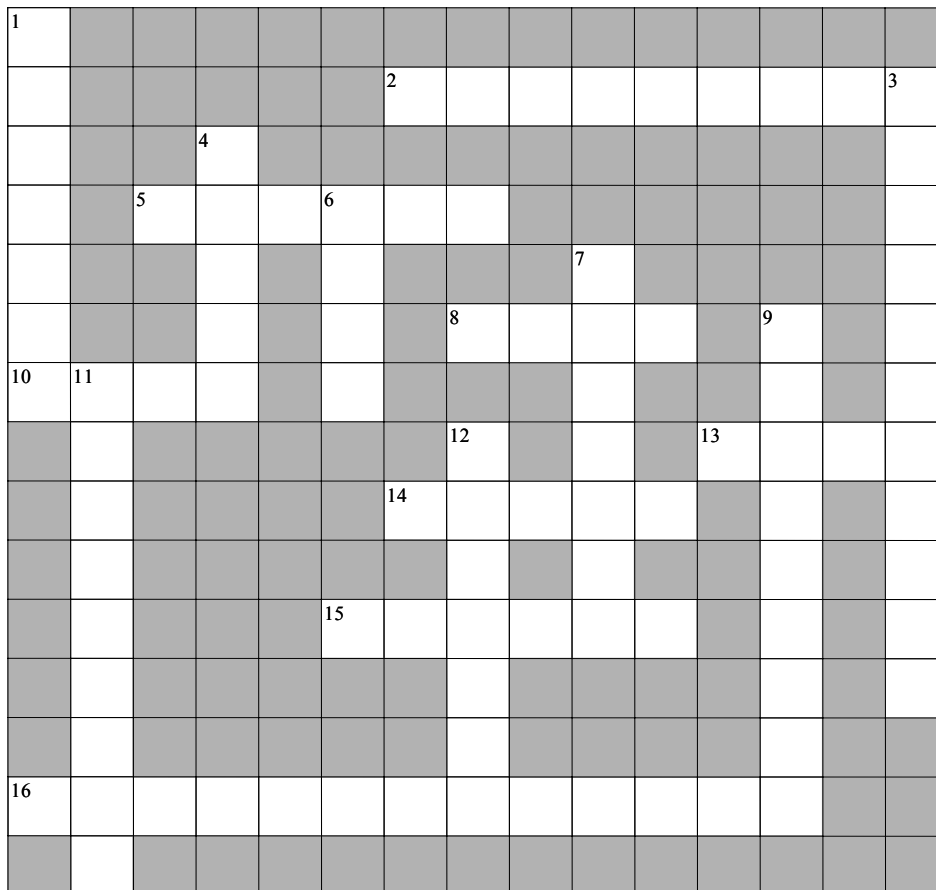
**MATCH THE WORDS ON THE LEFT WITH THE DEFINITIONS ON THE RIGHT !**

<b>A</b>	evaporate		the liquid that comes from a fruit, tree or vegetable
<b>B</b>	deforestation		when a plant or tree does not lose its leaves in the winter
<b>C</b>	branch		very wet
<b>D</b>	crops		part of a tree that grows out from the trunk
<b>E</b>	juice		the cutting or burning down of all trees in an area
<b>F</b>	basin		to dig big holes in the earth and get raw materials out of them
<b>G</b>	cattle		a large group of trees that are grown to produce rubber
<b>H</b>	evergreen		the top part of the earth on which plants grow
<b>I</b>	humid		to change from liquid to gas
<b>J</b>	plantation		plants like corn, wheat or rice that are grown by farmers and used as food
<b>K</b>	nutrient		a group of animals or plants that are like each other
<b>L</b>	nectar		something that can't be found very often
<b>M</b>	mine		cows that are kept on a farm
<b>N</b>	soil		an area of land that is lower in the middle. Usually a big river flows through it
<b>O</b>	species		a chemical or food that gives plants what they need to grow
<b>P</b>	rare		the liquid that insects collect from flowers



# Tropical Rain Forest

## CROSSWORD



### Across

2. to change from liquid to gas
5. a raw material that you get out of a tree
8. the top part of the earth on which plants grow
10. a small hard object that is in a fruit or a plant
13. a plant with green leaves that look like feathers, but with no flowers
14. the thick middle part of the tree
15. typical bird of the tropics with brightly coloured bills
16. the cutting or burning down of all trees in an area

### Down

1. a group of animals or plants that are like each other
3. the world around us
4. very wet
6. the outer part of a tree
7. dangerous fish that lives in the Amazon River
9. when a plant or tree does not lose its leaves in the winter
11. all the animals and plants that live in a certain area
12. a long period of very dry weather



# Tropical Rain Forest

CROSSWORD SOLUTION

1	S																				
	P					2	E	V	A	P	O	R	A	T	3	E					
	E		4	H																N	
	C		5	R	U	B	6	B	E	R										V	
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16		D	E	F	O	R	E	S	T	A	T	I	O	N							
		M																			



# Tropical Rain Forest

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**FIND 15 WORDS FROM THE GRID BELOW**  
**THAT HAVE SOMETHING TO DO WITH**  
**THE RAIN FOREST**

S Y V W T O U C A N  
M E V E R G R E E N  
F N E C Q U E R W K  
T V H L Z M B O M L  
O I J S X M O B W G  
D R M N P J S E E G  
K O W B W E Y Q M R  
U N N Q E V C U J K  
L M J D E R A I N G  
D E C O M P O S E R  
W N P I R A N H A S  
N T G O R I L L A S  
P L A N T A T I O N  
V F N C G F N I U E  
T N L H P A L M Y D



# Tropical Rain Forest

SOLUTION

