



**Animated PowerPoints**

**Ecosystems & Biodiversity - Video Script**



The Earth has many different Landscapes, such as deserts and forests.

These landscapes have different weather.

And in these different landscapes and weather, there are different species or kinds of living things. The different species that live in each area have learned how to survive in that landscape, in that weather, and with each other.

We call each environment, with its own weather and community of living things, an ecosystem.

Each plant, insect, bird, animal and sea creature has a job to do in helping the other living things survive. So that all the jobs get done, it is generally a good thing to have a lot of different species or kinds of living things in an area. This is called biodiversity.

**Look back at this image and explain to yourself what an ecosystem is, and what biodiversity is. If you are watching with someone else, take it in turns to explain. When you are ready, play the video again. It's time to pause the video.**

The Earth is getting warmer. Many *ecosystems* are changing quickly. And this is affecting biodiversity too. We are going to look at different ways this is happening.

Global warming is causing there to be more **extreme weather events**. Such as  
Droughts and heatwaves.

Wild Fires.

Storms.

And Intense rainfall and flooding.

These events can harm or kill the things that live there or make them leave.

These events can change the ecosystems they affect for a short time, or they can change them for a long time.

If temperatures continue to rise at this rate, then many scientists believe... That the risk of extreme weather events will become even higher. The changes to ecosystems will become bigger.



This will mean there are fewer safe places for living things, to live, including humans.

This will mean that there will be more problems with the supply of food for all living things, including humans.

And that there will be more problems with the supply of clean air and clean water, needed for all life on Earth.

**Look back at this image and explain to yourself some of the extreme weather events that are caused by global warming, and the consequences for nature. If you are watching with someone else, take it in turns to explain to each other. When you are ready, play the video again. It's time to pause the video.**

The coldest areas of the Earth are changing very quickly as the Earth gets warmer.

the areas covered by snow and ice are getting smaller, changing the places where many things live. Many animals are having to move closer to the poles as the planet gets warmer. If there is a smaller area for animals to live on, then there will be fewer animals.

As the Earth and the oceans get warmer, the ice on mountains and near the north and the south poles is melting quickly, and it is getting quicker.

The water from this melted ice goes into the oceans, and the result of this is that sea levels are rising around the world.

Coastal areas around the Earth are changing as the sea level rises.

One example of a coastal area affected by rising water is the wetlands. There are wetlands around many coasts. They are areas of land partly or fully covered by water. Many species of living things live in the ecosystems of wetlands. Around 400 million people live near or depend on wetlands.

Rising sea levels have already destroyed around 5/10s or half of the wetlands on Earth.

If temperatures continue to rise at this rate, then many scientists believe... That sea levels could rise as much as 2 metres by 2100.



Rising sea levels will flood places where many living things live, including humans, making them less safe to live in. Many villages, towns and cities around the world will be at risk.

There will be a greater threat to the supply of food for all living things, including humans.

And that there will be a greater threat to the supply of clean air and clean water, needed for all life on Earth.

**Look back at this image and explain to yourself how rising sea levels will affect the Earth. If you are watching with someone else, take it in turns to explain. When you are ready, play the video again. It's time to pause the video.**

Coral reefs are important areas near the coasts of some countries.

Nearly 3/10 of all sea life lives on coral reefs.

Global warming is causing the water to become more acidic. As the water becomes more acidic, the coral is killed. Almost 5/10 or half of coral reefs have already been destroyed as a result of more acidic water.

This means that the creatures that live on the coral are being killed.

The acidic water is killing other things that live in the sea, affecting the supply of food for many things, including humans.

If temperatures continue to rise at this rate, then many scientists believe...

That as much as 9/10 of coral reefs, and the things that live there, will disappear

This, with the increased acidity in the oceans, means that many species are at risk of only living in smaller numbers, and even extinction.

And smaller numbers of sea creatures affect the supply of food for all living things, including humans.

**Look back at this image and explain to yourself how global warming is affecting sea life. If you are watching with someone else, take it in turns to explain to each other. When you are ready, play the video. It's time to pause the video.**



Global warming is causing permanent change to some ecosystems on land. Some areas are changing from one kind of ecosystem to another.

Deserts are getting bigger.

Cold areas like tundra are getting smaller.

Ecosystems are getting more hot, or more wet, or more dry. Changes to the seasons are happening at different times. Food for many living things is not as plentiful.

There are fewer native living things now than there were 100 years ago. There are at least 2/10 fewer examples of native species that live on land.

As the Earth gets warmer, the risk of extinction - gets bigger.

Lots of species of living things are at risk. Between 2/10 and 3/10 of all species are at greater risk right now.

If temperatures continue to rise at this rate, then many scientists believe That between 1/10 and 3/10 of ecosystems will change from one kind to another.

That the risk gets bigger of entire species of living things becoming extinct.

There will be fewer safe places for things to live, including humans

There will be problems with the supply of food for all living things, including humans.

And that there will be more problems with the supply of clean air and clean water, needed for all life on Earth.

I am now going to go back over all the main points from this presentation.

The Earth is getting warmer.

There are different **ecosystems** on Earth, such as wetlands and forests. Each ecosystem is a community of living things that have learned to live in that environment and with each other.



All living things in each ecosystem need each other in some way. The more different species of living things there are in an ecosystem, the healthier and stronger that ecosystem is. This is called **biodiversity**.

Global warming is changing ecosystems.

Global warming is causing there to be more extreme weather events.

Global warming is causing places to become hotter, or wetter, or drier.

Global warming is causing the ice in cold places to melt. This is causing sea levels to rise.

Global warming is changing the water in the oceans. It is becoming more acidic. Through all these changes, Global warming is harming biodiversity.

Life is getting much harder for many living things. There are fewer native plants, and insects, and animals, and fish, and birds.

and many species are at risk of extinction, which means they disappear forever. PAUSE Earth's ecosystems and biodiversity are being harmed. This means there are

Fewer safe places to live for all living things.

This means that there is less food in the food chain for all living things, including humans.

And as biodiversity and healthy ecosystems create clean air and water, this is also at risk. PAUSE And it is getting worse.

**Look back at this image and explain to yourself the different ways global warming is affecting ecosystems and biodiversity. It's time to pause the video.**