

LET'S SAVE OUR PLANET!

Understanding Climate Change,
Nature, & How to Protect It
(For Ages 10-14)

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COSTRUIRE UN MONDO MIGLIORE



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Green Lens

Visualise it!



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What is Climate Change?

Climate change means the weather is changing all around the world. The Earth is getting hotter, and this is causing problems.

Causes of Climate Change

- **Cars and Factories:** Cars and factories release gases into the air that trap heat from the sun, making the Earth warmer.
- **Cutting Down Trees:** Trees clean the air by taking in carbon dioxide. When trees are cut down, there are fewer to clean the air, so it gets dirtier.
- **Burning Fossil Fuels:** When we burn coal, oil, and gas, it releases a gas called carbon dioxide. This gas traps heat in the air and warms the Earth.
- **Livestock Farming:** Cows and other animals release a gas called methane when they digest food. Methane traps heat and makes the air warmer.





Causes of Climate Change

- **Deforestation:** Cutting down forests reduces the number of trees that clean the air by taking in carbon dioxide, making the air dirtier.
- **Waste and Landfills:** When food and other garbage break down in landfills, they release gases like methane, which can warm the air.
- **Industrial Processes:** Some factories release gases that trap heat in the air, making it warmer.
- **Mining:** Digging for minerals and metals can release gases like methane, which trap heat and warm the Earth.





Effects of Climate Change

- **Hotter Days:** Children may find it harder to play outside for long periods because of the hot weather. They might need more water and shade to stay cool.
- **Heavy Rains and Floods:** When heavy rains cause floods, children's homes, schools, and playgrounds can get damaged or become unsafe. They may have to stay indoors more often.
- **Droughts:** In areas with droughts, children might not have enough water for drinking and washing. This can affect their health and make it difficult to grow food.
- **Crop Changes:** If farmers change the crops they grow due to climate changes, it could affect the food children eat. Some favorite fruits and vegetables might not be as easy to find.





Effects of Climate Change

- **Lake Levels:** Lakes like Lake Victoria might change because of climate change, affecting fishing and the lives of people who depend on the lake.
- **Health Issues:** Hot weather can make children feel sick or tired, especially if they play outside a lot. They might need to drink more water and take breaks in the shade.
- **Water Shortages:** When there's not enough rain, it can lead to water shortages. Children might have to walk farther to get clean water, or their families might not have enough for washing clothes or bathing.
- **Wildlife:** Climate change can affect wildlife in Uganda, forcing some animals to move to different areas or struggle to find food and shelter.





How Does Climate Change Affect Us?

Climate change can make it harder for plants, animals, and even people to live their normal lives.

Examples in Uganda

- **Melting Ice:** In colder parts like the Rwenzori Mountains, the ice is melting.
- **Droughts:** In places like Karamoja, it's getting harder for farmers to grow food because it's too dry.

Interactive Activity

Draw your favorite animal and think about how climate change might make it hard for that animal to live.



What Can We Do to Help?

- **Plant Trees:** Trees are like nature's air purifiers! Planting fruit trees like mangoes, avocados, and guavas not only gives us yummy fruits but also helps keep the air clean and cool.
- **Use Less Energy:** Remember to turn off lights when you leave a room, and ask adults to use energy-saving bulbs. It's like giving our planet a break and saving energy for more fun activities!
- **Walk or Bike:** Instead of always riding in a car, try walking or biking to nearby places. It's like having an adventure while helping to keep our air clean and fresh.
- **Reduce, Reuse, Recycle:** Try using things more than once, like turning old jars into cool craft projects. Recycling paper, plastic, and glass is like giving them a new life instead of throwing them away.
- **Save Water:** Turn off taps tightly so they don't drip and use a bucket when washing your bike or watering plants. Every drop saved helps protect our water for animals and plants.





What Can We Do to Help?



- **Eat Local and Seasonal Foods:** Enjoy fruits and veggies that are grown nearby and are in season. It's like eating the freshest and yummiest foods while helping the environment by reducing how far food travels.
- **Conserve Forests:** Help protect forests where animals and plants live. Forests are like giant homes for animals, and they also help clean the air we breathe.
- **Reduce Plastic Use:** Choose reusable bags and metal straws instead of using plastic ones. It's like being a superhero for the planet by reducing plastic waste and keeping our oceans clean.
- **Educate Others:** Share what you learn about taking care of the Earth with your friends and family.
Together, we can all make a big difference in keeping our planet healthy and happy!

Example

If we all plant one tree, we can have many new forests in Uganda.



Environmental Issues

Deforestation

What is Deforestation?

Deforestation happens when people cut down trees to make space for farms, towns, and buildings.

Why Does Deforestation Happen?

Deforestation happens when people cut down trees to make space for farms, towns, and buildings.

What Happens When Trees are Cut Down?

- **Loss of Habitats:** Many animals, including birds, monkeys, and insects, lose their homes, sources of food etc. when trees are cut down.
- **Soil Erosion:** Tree roots hold soil in place. Without trees, rain can wash away soil, making the ground less stable and causing landslides.
- **Climate Change:** Trees absorb carbon dioxide, a gas that makes the Earth warmer.
- **Less Rain:** Trees help make rain by releasing moisture into the air. Cutting down too many trees can lead to less rain, affecting farmers who need water for their crops.



Water Pollution

What is Water Pollution?

Water pollution is when dirt, chemicals, or trash get into rivers, lakes, and even our drinking water.

Where Does Water Pollution Come From?

It can come from factories that release dirty water, farms where chemicals are used, and even from our homes when we throw trash in rivers.

Why is Clean Water Important?

Effects: Fish and other animals in the water can get sick. If we drink polluted water, it can make us sick too.

Let's Compare!

Look at these two cups of water. One is clean and clear, and the other is dirty. Which one would you want to drink?



Air Pollution

What is Air Pollution?

Air pollution happens when cars, trucks, and factories make smoke and gases that go into the air.

How Does Air Get Polluted?

When we drive cars or make things in factories, they release smoke and chemicals. These can make the air dirty and hard to breathe.

Why is Clean Air Important?

Effects: Breathing dirty air can make people cough or feel sick. It also makes our planet hotter.

Stay Healthy!

Imagine playing outside in **clean air** *versus* **smoky air**. Which one would you prefer?





Plastic Pollution

What is Plastic Pollution?

Plastic pollution is when plastic waste, like bottles, bags, and wrappers, ends up in the environment, harming our land, water, and animals.

Plastics take a very long time to break down, sometimes staying in the environment for hundreds of years.

Effects

- **Harm to Animals:** Animals can get tangled in plastic or eat it by mistake, which can make them very sick or even cause them to die. For example, birds and fish often mistake plastic pieces for food.
- **Dirty Water:** Plastics can end up in rivers and lakes, making the water dirty and harmful for both people and animals. This can also affect the fish we eat.
- **Ugly Environment:** Plastic waste makes places look messy and unclean. It can spoil the beauty of our parks, playgrounds, and streets.





Loss of Biodiversity

What is Biodiversity?

Biodiversity means having many different plants and animals in one place. It's like having a big family of living things!

Why Does Biodiversity Matter?

Importance: It helps animals and plants stay healthy. We get things like food and medicine from different plants and animals.

Why Should We Protect Animals and Plants?

Examples: Animals like elephants and gorillas in Uganda need forests to live. If we protect their homes, they can live longer.

Let's Protect Our Friends!

Imagine a world where animals have safe homes in forests. What can we do to help them?





Sustainable Practices

Tree Planting

Tree planting is a great way to help our planet. Trees give us oxygen, shade, clean the air, and provide homes for birds and animals.

Why Plant Trees?

- **Clean Air:** Trees take in carbon dioxide and give out oxygen.
- **Prevent Erosion:** Tree roots hold the soil together, preventing it from washing away.
- **Provide Food:** Some trees give us fruits like avocados, mangoes, guavas, and jackfruits.

Examples of Trees to Plant

- **Indigenous Trees:** Like Mvule and Mahogany.
- **Fruit Trees:** Like avocados, mangoes, guavas, and jackfruits.



How to Plant a Tree

Planting a tree is easy and fun! Here's how you can do it:

Steps to Plant a Tree:

1. **Choose a Spot:** Find a sunny spot with enough space for the tree to grow.
2. **Dig a Hole:** Make a hole twice as wide as the tree's roots.
3. **Plant the Tree:** Place the tree in the hole, cover the roots with soil, and press it down gently.
4. **Water the Tree:** Give the tree plenty of water right after planting.
5. **Take Care of the Tree:** Water it regularly, especially when it's dry.

Get Involved

1. **Tree Planting Events:** Join or organize tree planting events.
2. **School Projects:** Start a tree planting project at your school.
3. **Community Gardens:** Help plant and take care of trees in your community.





Recycling

What is Recycling?

Recycling means turning old things into new things instead of throwing them away.

Why Recycle?

- **Less Trash:** It keeps our planet cleaner.
- **Saves Resources:** We use less of Earth's materials.

Example

- Turning old plastic bottles into new toys or containers.

How to Recycle at Home or School

You can recycle many things at home. Here's how:

Steps to Recycle:

1. **Sort Your Trash:** Separate paper, plastic, and cans into **different bins**.
2. **Clean Items:** Rinse out food containers before recycling **them**.
3. **Reuse:** Use old jars to store things or make crafts.

Example

Use a used soda bottle to make a pencil holder.



Fun Recycling Activities

Here's a fun way to recycle and make something beautiful!

DIY Project

Planting Flowers in a Recycled Tin

Materials

Clean tin can, potting soil, flower seeds or small flowering plant, small stones (optional).

Instructions

- a. Clean the tin can thoroughly.
- b. Fill it with potting soil about halfway.
- c. Plant flower seeds or place a small flowering plant into the soil.
- d. Add a few small stones around the plant for decoration (optional).
- e. Place your tin can garden in a sunny spot and water it gently.



What is Clean Cooking?

Clean cooking means using cookstoves and fuels that produce little or no smoke. This is better for our health and the environment.

Clean Cooking Technologies & Fuels

- **Electric Pressure Cookers (EPCs):** Use electricity instead of wood.
- **Gas Stoves:** Use LPG (Liquid Petroleum Gas) which burns cleaner than wood or charcoal.
- **Improved Cookstoves:** Use less charcoal/firewood and produce little or no smoke
- **Briquettes:** Made from organic waste like sawdust and are cleaner than charcoal.



Improved Cookstove



LPG



Electric Pressure Cooker

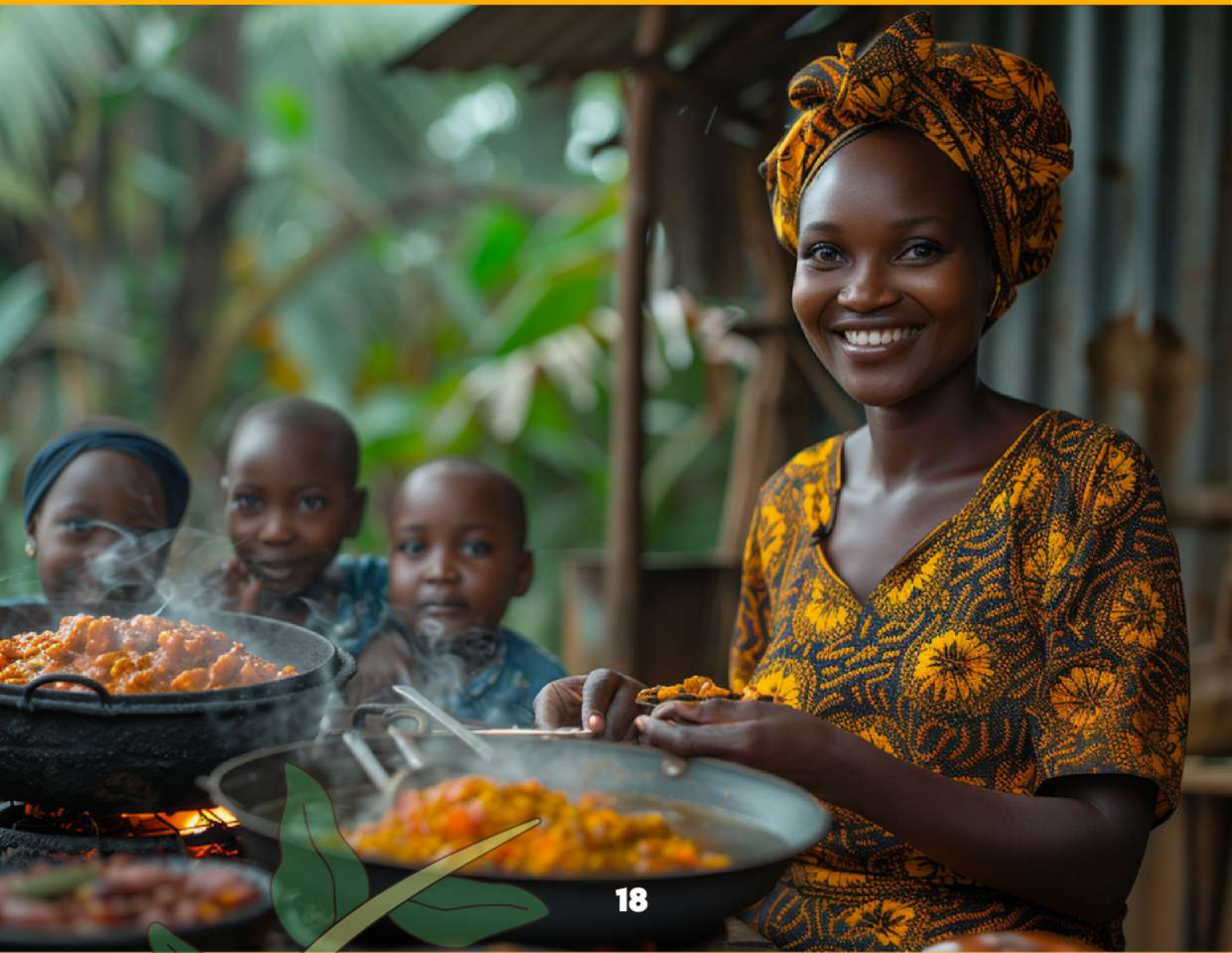
Example

Imagine cooking your favorite meal with your parent using LPG. What delicious dish would you choose to make together?



Advantages of Clean Cooking

- **Better Health:** Clean cooking means less smoke in the kitchen, so children won't suffer from sickness caused by breathing in smoke.
- **Saves Time:** With clean cooking methods like using gas or electric stoves, children don't have to walk long distances to gather firewood. This gives them more time for homework and to go to school.
- **Saves Trees:** Using clean fuels like LPG and briquettes means we don't need to cut down as many trees for firewood.





Making Briquettes

Briquettes are made from waste materials like sawdust, charcoal dust, leaves, and paper. They are a cleaner and more efficient fuel for cooking and heating.

Why Make Briquettes?

- **Saves Trees:** Using briquettes reduces the need to cut down trees for firewood.
- **Less Smoke:** Briquettes produce less smoke than traditional wood, making it healthier to cook with.
- **Waste Recycling:** Making briquettes uses waste materials, helping to clean up our environment.





How to Make Briquettes

- **Collect Materials:** Gather sawdust, leaves, paper, and other organic waste.
- **Mix with Water:** Combine the materials with water to create a thick paste.
- **Press into Shapes:** Use a briquette press or mold to shape the paste into small blocks.
- **Dry in the Sun:** Let the shaped briquettes dry in the sun until they are hard.

Example

Imagine turning the leaves from your backyard into fuel for cooking your favorite meals!





Green Lens
Visualise it!

This project was implemented by Green Lens International on behalf of Insieme Si Puo (ISP) in Africa, with funding from Maratona Dles Dolomites.

Green Lens International is a Ugandan non-profit organization focused on raising awareness about environmental conservation, climate action, and clean energy through visual content creation. Our mission is to use the power of visual content to promote environmental conservation, clean energy, and action against climate change.

We conduct educational workshops and training sessions on environmental issues, create visual content like documentaries and social media campaigns to raise awareness, and partner with schools, NGOs, and government bodies to promote environmental conservation and fight climate change.

Let's work together to protect our environment and make Uganda a cleaner, healthier place for everyone.



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