

# THE BIG PICTURE

OUR WORLD, OUR FUTURE







"But I've learned you are never too small to make a difference. And if a few children can get headlines all over the world just by not going to school, then imagine what we could all do together if we really wanted to."

#### Greta Thunberg

#### PREPARING FOR YOUR VISIT - A CHECKLIST

- Please confirm your schedule with West End in Schools and share it with all class teachers participating in the day.
- Share this resource pack with all teachers.
- For in person visits, check that the projector and sound system are set up and ready to go before the first workshop.
- Have a wonderful day and share your experience with us:

You can tweet us @WestEndInSchool

or find us on Facebook @WestEndInSchools

#### **HOW TO USE THIS PACK**

This pack has been divided into three sections to guide you through your unit on Climate Change and the Environment:

#### • Background information.

We have compiled some fact sheets, videos and reading lists that you may find helpful for building knowledge.

#### Pre-Workshop Plans

There are a series of activities we recommend for before your visit. The aim of these activities is to build background knowledge and engage children in the big issues around climate change and the environment.

#### • Post-Workshop Plans

We also have a range of activities for your class to enjoy after their visit from West End in Schools. The post-workshop activities focus on consolidating what they have learned and taking action.

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# BACKGROUND INFORMATION



#### WHAT IS THE GREENHOUSE EFFECT?

The greenhouse effect is an entirely natural process whereby specific gases - greenhouse gases - trap the sun's heat within the Earth's atmosphere. Without this the planet would be too cold for anything to survive.

However, humans have caused a huge increase in the production of greenhouse gases. This has caused the Earth's atmosphere to trap more heat, like a blanket around the earth that is getting tighter. As a result, the Earth's temperature is increasing to a dangerous level.

#### WHAT ARE GREENHOUSE GASES AND WHERE DO THEY COME FROM?

Carbon Dioxide is widely described as the most prevelant and dangerous greenhouse gas. Burning fossil fuels, such as oil and coal, releases carbon dioxide into our atmosphere. The majority of our transportation, electricity and building machines are powered by burning fossil fuels.

#### WHAT DOES DEFORESTATION HAVE TO DO WITH IT?

Plants and trees breathe in carbon and breathe out oxygen. The ocean and the earth do a similar thing. They are called Carbon Sinks, absorbing and removing carbon from our atmosphere.

When we cut down trees several things happen: we reduce the plants' potential to clean carbon from the air, we release more carbon in the process, and we destroy homes for both humans and animals.

#### THE DECLINE IN BIODIVERSITY AND WHAT IT MEANS.

Biodiversity is the huge variety of plants, animals and habitats on Earth. Biodiversity provides us with essentials for living such as food, clean water and medicine.

However, as habitats are destroyed and species threatened, the biodiversity we need to survive is challenged. Removing one plant or animal from a food chain can have disastrous consequences.

#### **HOW WE CAN MAKE CHANGE**

As individuals and communities we can make lifestyle choices that can have an impact on the planet:

- Reduce waste.
- Travel responsibly.
- Eat sustainably.

But for wider change we need to use more sustainable sources of energy. Those in power need to make changes to stop burning fossil fuels and fund more sustainable methods of producing power.

#### **READ MORE ON THE BIG ISSUES FACING OUR PLANET:**



https://www.nationalgeographic.com/environment/global-warming/global-warming-effects/



https://www.wwf.org.uk/what-we-do/area-of-work/climate-change-and-energy



https://www.ourplanet.com/en/



https://friendsoftheearth.uk

### BRILLIANT BOOKS



#### PICTURE BOOKS AND YOUNGER READERS

A Hole in the Bottom of the Sea by Jessica Law

Compost Stew by Mary McKenna Siddals

Dear Greenpeace by Simon James

Dinosaurs and All That Rubbish by Michael Foreman

Flotsam By David Wiesner

George Saves the World by Lunchtime by Jo Readman

I Can Save the Earth! by Alison Inches

Litterbug Doug by Ellie Bethel

Michael Recycle by Ellie Bethel

One World by Michael Foreman

The Day the Ocean Went Away by Sam Haynes & Volvo

The Great Green Forest by Paul Geraghty

The Great Kapok Tree by Lynne Cherry

The Promise by Nicola Davies

The Snail and the Whale by Julia Donaldson

The Tin Forest by Helen Ward

Varmints by Helen Ward

Where the Forest Meets the Sea by Jeannie Baker

Where's the Elephant? by Barroux

Window by Jeannie Baker

World Without Fish by Mark Kurlansky

#### **BOOKS FOR OLDER STUDENTS AND MORE ADVANCED READERS**

**Exodus** by Julie Bertagna

One Plastic Bag by Miranda Paul

The Adventures of a Plastic Bottle by Alison Inches

The Flower by John Light

The Green Mother Goose by David Davis and Jan Peck

The Lorax by Dr. Seuss

The Wild Series by Piers Torday

There's a Rang-Tan in My Bedroom by James Sellick

This Morning I Met a Whale by Michael Morpurgo

Under the Weather by Tony Bradman

What a Waste by Jess French

White Dolphin by Gill Lewis

# TEACHER'S GUIDE



#### **PRE-WORKSHOP ACTIVITIES**

#### 1. KWL Chart on Climate Change

#### Materials:

One copy of the KWL chart (Page 8) for the class to complete together.

#### Aim:

To establish shared learning goals and to allow children to guide their learning by creating their own goals.

#### **Process:**

- As a class discuss what you already know, or believe to be true, about issues facing the planet today. This could range from detailed ideas about single use plastics and the impact of non-recylable material to broader, more general, ideas about global warming.
- Next, ask the class to come up with a list of questions or ideas they
  want to discover more about. From this you may generate ideas for
  experiments or for individual research projects that your class want to
  undertake.
- Finally, once you have completed your unit of study on the environment and climate change, ask your class to collate some of the facts and ideas they have discovered. They can also revisit their initial responses to the topic to see if they have learned everything that they had hoped to, or if any of their previous ideas have changed.

#### 2. Pre-existing knowledge: True or False

#### Materials:

Debate statements on (Page 9).

#### Aim:

To engage children in some of the big ideas surrounding this unit.

#### **Process:**

- · Ask all the children to stand in the centre of the room.
- Designate one end of the room to be 'agree' and the other to be 'disagree'. For older students you may want to include 'strongly agree', 'strongly disagree' or 'unsure'.
- As you read out a statement ask the children to walk to the corner that matches their opinion (i.e. do they agree or disagree with what you have said).

- When they are standing in their area ask them why they chose that side / why do they think that?
- This may be a good opportunity to share a video with the class or to read a book together on the topic.
- Once they have heard more about the topic have any of their previous opinions changed?

#### 3. Melting ice - Science Experiment

#### Materials:

A tub, a ball of Play-Doh, ice cubes, pen and science worksheet (Page 10).

#### Aim:

To discover first-hand what happens when the ice in Antarctica melts.

#### **Process:**

- To give the children some background information for the experiment you may wish to first talk about Antarctica, what the South Pole is like and what animals live there.
- The South Pole is very cold! In fact, a lot of the land is covered with a sheet of ice. But as our planet gets hotter the ice is melting. What happens when that ice melts?
- Place the lump of Play-Doh in the centre of your tub this represents the land.
- Around the Play-Doh (but not covering it) fill the tub with some water this represents the sea.
- With your pen mark on the side of the tub where the water level is.
- On top of the playdoh now place your ice cubes, make sure they are stuck in and won't fall off but that it's not going to create a well as it melts!
- Leave it somewhere undisturbed and check it again later in the day.
   Has the ice melted? Has the water level risen above the mark on your box, what level is it at now?
- Discuss with the class why they think the water level has gone up.
   What might be the consequences if the water level keeps rising?

#### 4. A Written Response - Informative Posters

#### **Materials:**

Poster templates for younger classes (Page 11-13) and example poster (Page 14).

#### Aim:

For children to combine their knowledge of climate change with their written and artistic skills by creating an informative poster about the issues facing the planet.

#### **Process:**

- Show your class the example poster provided and take a look at some of the key features of an informative poster - headline, facts, bold images, labels and diagrams.
- Discuss what key points they may want to highlight in their informative poster. It may be helpful to think about some popular environmental slogans:
  - There is no planet B.
  - Can we fix it? Yes we can!
  - We are nature defending itself.
  - The Earth is what we all have in common.
  - Be the change you want to see.
  - The world doesn't belong to us, we belong to it.
- Ask children to create their own informative posters.
- For older classes: ask children, either in groups or one-by-one, to present their poster back to the class and highlight some of the key points. Focus on speaking clearly and facing their audience.
- For younger classes: children can create a poster which is either their own pictures and doesn't focus on text or is from one of the templates.
   If using a template you may want to think about what materials they use to add colour. It could be pens, paint or even a collage!

#### **POST-WORKSHOP ACTIVITIES**

#### 1. What I can do and what we can do

#### Materials:

My Promise to the Planet sheet (Page 15)

#### Aim:

To consolidate what the children have learned about issues facing our planet into clear actions that they can take.

#### **Process:**

- As a class discuss what actions you could take, both as individuals and as a class.
- If you are setting goals as a class you may wish to create one promise poster, or individuals can design their own.
- Examples of promises they might want to think about: 'I promise to always organise my rubbish into recyclable and non-recyclable items', 'I promise to walk to school instead of taking a car' or 'I promise to make sure that when I am finished with technology I will turn it off and not leave it on standby'.
- Encourage the children to think about why they are making these promises and what impact they could have.
- For younger children you can cut and stick the 'promises' from page 16.

#### 2. What 'you' should do

#### Materials:

Letter template (page 17) or postcard template (page 18).

#### Aim:

To to encourage wider change.

#### **Process:**

- Discuss who might be in a position of power to make decisions that impact the environment. This could be the school principal, your local mayor or MP, or even the Prime Minister.
- Consider what you are going to ask them to do is it to look at ways to reduce emissions from public transport? Or perhaps to fund more initiatives for renewable energy? You may wish to research what other young people are doing and saying. You can find some examples on Letters to the President:

https://letters2president.org/letters?issue=climate+change

- Depending on your children's writing level they can use one of the postcard templates or the letter template.
- Take action send the letters to the addressees and ask for a response to allow your class to continue their dialogue.

#### 3. What needs to change - A spoken response

#### Materials:

Sentence starters (Page 19).

#### Aim:

To develop command of spoken English and to create personal responses to this unit on climate change.

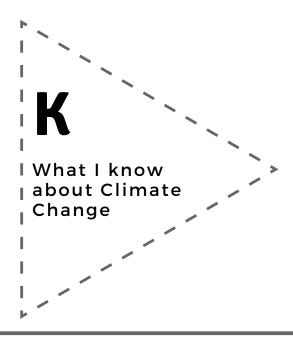
#### **Process:**

- Read through the example of a spoken response at the top of the page.
- Ask children to think, either individually or in groups, about how they feel about the issues that they have explored in this topic.
- Depending on their writing ability you may want to give them time to make some notes on what they'd like to say, or to create a presentation.
- Have children, either individually or in groups, come to the front of the class and share their ideas and thoughts. Focus on speaking loudly and clearly.
- For younger classes you may wish to ask them stimulus questions and elicit a spoken response/discussion as a whole group activity.
  - Do you think that the planet heating up is a good or bad thing? Why?
  - What can we do to help the planet?
  - If you were an animal in the forest and had to deal with your home being cut down, how would you feel?
  - Why should everybody try their best to help the planet?

# **Before Workshop**

### **KWL CHART**

What is climate change? What problems is it causing? How can you help?





What I have learned about Climate Change

### TRUE OR FALSE?

1.	Trees are really helpful for cleaning the air.
2.	The Earth is getting hotter and causing the ice in arctic to melt.
3.	Everything that is made of plastic can be recycled.
4.	Walking or cycling is better for the environment than using a car.
5.	Climate change only affects animals and nature, not humans.
6.	One person cannot make a difference to climate change.

### **ARCTIC ICE EXPERIMENT**

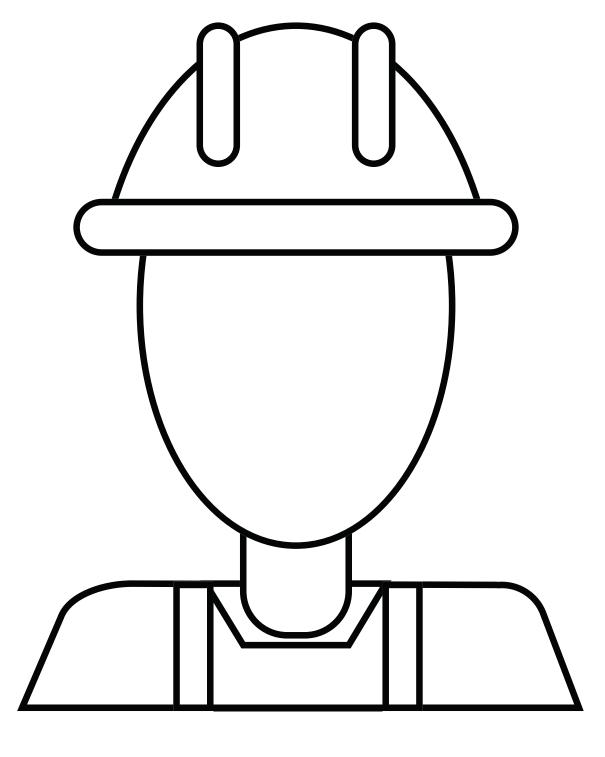
Arctic Ice Experiment				
Environment at the beginning:				
Draw or describe what your experiment looks like at the start, try to label your drawing.				
What I think will happen:				
Water level after two hours:				
Water level after a day:				
Environment at the end:				
Draw or describe what your experiment looks like at the start, try to label your drawing.				
braw or describe what your experiment looks like at the start, if y to label your arawing.				
Why did the environment change?				
Why did the environment change?				

# THERE'S NO



PLANET B

### CAN WE FIX IT?



YES WE CAN!

### BE THE CHANGE



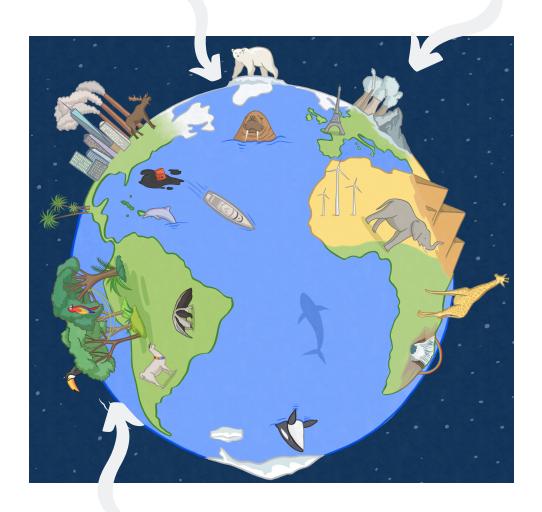
YOU WANT TO SEE

### THERE'S NO PLANET B!

#### **ANTARCTICA**

The Earth is getting hotter and the ice is melting.

GREENHOUSE GASES
Humans pollute the air
releasing dangerous
gases!



#### **DEFORESTATION**

We are cutting down trees, but trees help to clean the air!

### WE NEED TO HELP!

### MY PROMISE TO THE PLANET...



#### I PROMISE TO RECYCLE!

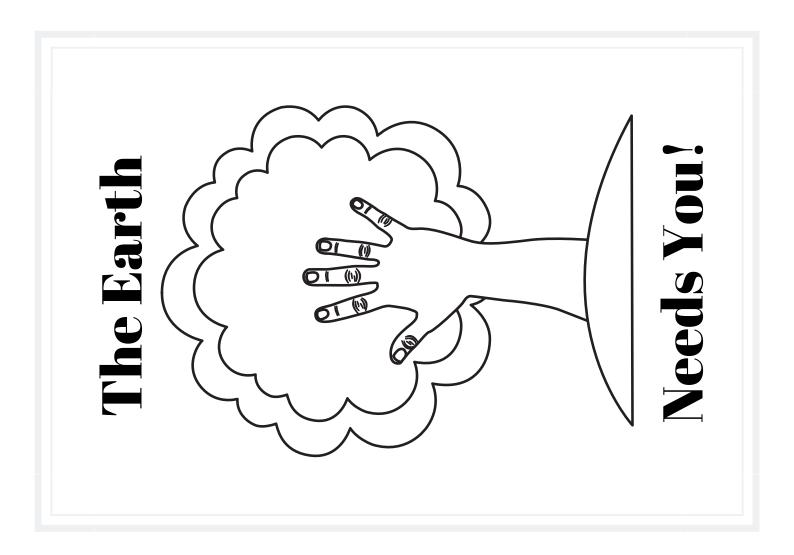
## I PROMISE TO LOOK AFTER THE NATURAL ENVIRONMENT!

# I PROMISE TO LEARN MORE ABOUT WHERE MY FOOD COMES FROM.

I PROMISE TO WALK OR CYCLE WHEN I CAN.

I PROMISE TO SAVE ELECTRICITY.

Dear,
I am writing today because our planet is in danger and we need your
help.
Using too many single-use plastics, burning fossil fuels and cutting
down trees is destroying the Earth. Did you know that
?
To help the planet I have promised to
·
But we need grown-ups, like you, to take action as well.
If you care about our beautiful planet, as I'm sure you do, then you need
to help. To make a change you need to
·
It is not too late, we can still save Earth. If we don't start to make
changes now then
·
I want to protect our planet and you should too,
Sincerely,



Dear,	
I am writing today because our planet is in danger and we need your help.	
Using too many single use plastics,	
burning fossil fuels and cutting down	
trees is destroying the Earth.	
I want to protect our planet and you	
should too!	
Sincerely,	

# ENVIRONMENTALLY SPEAKING...

Take a look at the short speech below. Try reading it aloud. Can you use a loud clear voice?

Use the sentence starters at the bottom of the page to create your own speech.

#### **EXAMPLE:**

I think that the biggest problem facing the planet is that we use to much plastic. This is a problem because some plastics cannot be recycled. They pollute the natural environment, especially the ocean, and can harm the animals which live there.

To fix this we can reduce our plastic use and find alternatives that are recyclable - like paper or cardboard.

#### **SENTENCE STARTERS:**

I think that the biggest problem that is facing the planet is...

This is a problem because...

To fix this we can...



#### **OUR MISSION**

Every child's imagination should be inspired by the arts. Our shows and workshops are highly creative cultural experiences - which children will remember for ever.

#### **WORLD BOOK DAY**

https://westendinschools.org.uk/world-book-day

Celebrate World Book Day with our online or in person literacy workshops exploring popular children's books, fairytales, or Shakespeare.



#### **DANCE WORKSHOPS**

https://westendinschools.org.uk/dance

From popular children's books and poetry to cultural celebrations, mini musicals and themes such as friendship and teamwork, our dance workshops encourage children to use their imaginations while engaging with the topic from a new, active perspective.



#### DRAMA WORKSHOPS

https://westendinschools.org.uk/drama

Bring learning to life with the highest quality drama available in schools today. With the guidance of an expert drama facilitator the children develop their feelings and thoughts about your chosen story or topic.

