



**I-CAN**  
INTERNATIONAL CLIMATE  
ACTION NETWORK

2021

# **I-CAN IO1 CLIMATE ACTION GUIDE**



**Thinking critically**

**Collaborating sustainably**

**Acting justly**

# ABOUT THIS GUIDE

The aim of this Climate Action Guide is to explore how we as educationalists help young people think critically about and respond positively to what is now widely understood to be an existential issue for humanity: the Climate Crisis.

The guide is written by partners of the International Climate Action Network project (I-CAN) and at its core is our response to this challenge in the context of secondary school education. It is intended for teachers and educationalists [including senior leadership teams, local authorities, and policy makers] working across curriculum areas as they foster the skills and competencies that young people need, not for a distant future but for a world that is already being impacted by climate change.

**Part One explores content:** we want to help teachers make the topic of climate change more prominent. The guide will draw out critical thinking about the Climate Crisis and the role of schools and teachers, offering both theoretical links and a 'map-room' of selected resources.

**Part Two provides methodological knowledge** that also helps to understand climate change but can be applied in discussing any topic. These practical tools that will allow your learners to explore and understand injustices and contention, dilemmas and complexities in a safe space.

Each section ends with a reflection task as a way for you to: appraise the material; think about both the issues it raises; and how you foresee using the themes and methodologies of each section with students. By reflecting on and helping us reframe the themes and approaches where needed, we hope you will be in a strong position to use and share the guide in your own educational setting.

Our thanks to all of the contributors to this guide and especially to Babett Vasvári who created many of the cartoons included here.

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# INTRODUCTION

At the end of the 20th century, technological development reached a level, and in the wake of this, comprehensive cultural and social changes began or accelerated, radically transforming the lives of all of us. Life on planet Earth has changed and no matter where we live or which segment of the society we belong to, we cannot avoid facing these changes.

Strong voices of young climate activists such as Greta Thunberg have brought about a climate consciousness for students around the world. For very many young people, as with almost 97% of the world's scientists, there is no doubt that climate change is a reality.

The challenge from young leaders has been in their questions to themselves, "**What can I do about the Climate Crisis?**" and through school climate strikes and many other campaigns, their cry to adults, "**What are you doing about it?**".

This International Climate Action Network, or "I-CAN", project draws together teachers wanting to engage children to think critically about climate change, collaborate sustainably and act justly. By using a lens of acting justly we have set out a number of themes with which to support students to engage critically with these two key questions. The themes can be read briefly or investigated at greater length using the links provided.

I-CAN starts at a hugely significant year (2021) as UK and Italy co-host the Conference of the Parties (COP26) of the United Nations Framework Convention on Climate Change (UNFCCC), at a point in time where all nations have to significantly 'ratchet-up' the ambition of their emission-reduction commitments.

We have called this a Climate Action Guide because it is our understanding, as with the Paris Agreement itself, that knowledge about the facts is not enough. The authors of this publication represent an educational approach which introduces the facts of global changes with students, explores all sides and emphasizes that the process also provides opportunities to take action against global injustices and to take an active role for a sustainable future.

Our best outcome is that the guide helps build confidence in how we as educationalists support and facilitate young people's own creative and critical thinking, involvement in dialogue and passion for change in this most essential of all active citizenship engagement: Climate Action. [Ref SDG 13].



# GLOSSARY

Definition of the Climate Crisis and other key terms



## **ADAPTATION**

Ways to reduce how vulnerable we are to the effects of the many negative changes brought about climate change.

## **CLIMATE ACTION**

Stepping up what we do, including increasing awareness and education, to reduce greenhouse gas emissions and to adapt to the impact climate change is already having.

## **CLIMATE CRISIS**

The serious danger and damage being caused by climate change and the need for special measures to provide adequate response.

## **CLIMATE JUSTICE**

Imperative to consider climate change as a moral not purely scientific issue : where those most vulnerable to its impacts, whether that means whole countries, or people with the fewest options to adapt and survive, are at the heart of the matter.

## **GLOBALISATION**

The term 'globalisation' is widely used to describe a variety of economic, cultural, social, and political changes that have shaped the world over the past 50-odd years. Because it is a complex and multifaceted phenomenon, globalisation has been credited with a wide range of powers and effects.

## **COP26 (Conference of the Parties)**

197 countries and the European Union will participate in COP26 in 2021 - the 26th annual conference of the 'parties' or signatories of the United Nations treaty on climate change, called the Framework Convention on Climate Change (UNFCCC)

# GLOSSARY

Definition of the Climate Crisis and other key terms

## GREENHOUSE GAS (GHG)

A gas that contributes to the greenhouse effect by absorbing infra-red radiation. Carbon dioxide (CO<sup>2</sup>), methane (CH<sub>4</sub>) and nitrous oxide (N<sub>2</sub>O) are all examples of greenhouse gases.

## INTERGENERATIONAL JUSTICE

Ethical consideration in regard to climate change : how we manage the world's resources so that our children and children's children are not denied their future rights to life.

## MITIGATION

Actions that tackle the causes of climate change, intending to limit, stop or reverse the extent and/or rate of it long-term.

## NET ZERO CO<sup>2</sup> EMISSIONS

Reaching a point where we take the same amount of carbon pollution from the atmosphere as we add to it for example by swapping renewable energy for fossil fuels and using tree planting and carbon capture to 'offset' the remaining greenhouse gases.

## RESILIENCE

Capacity of our world's complex social and environmental systems to absorb the stresses brought about by climate change, to adapt and be better prepared for future effects.



# PART 1

# STORMY GLOBAL CHANGE

Part One of this guide is intended to help teachers make the topic of climate change more prominent as the impact of global warming becomes ever more critical. The climate crisis raises challenging questions both in how we understand the issues ourselves and how we help young people to critically engage.

Here, we first explore the role of schools and teachers, before looking at how we navigate complexity with young people. Each section offers comments, theoretical links and reflection activities and this part concludes with a 'map-room' of selected resources.

## Section 1. School in the 21st Century

**Objective:** to reflect on change and continuity for schools in the 21st century.

School in the 21st century must present globalisation to students in its entirety, emphasizing that we, as active citizens, can take the opportunities offered by globalisation, and help reduce the negative effects of the process. Adaptation to global change requires both a change in content and methodological renewal in schools:

- **School curriculum must include knowledge and facts essential to understanding the global world**
- **A fresh approach to methodologies is inevitable** in order that school can perform one of its basic functions effectively in the conditions of the 21st century: knowledge transfer

### 1.1 Global challenges

**Access to the benefits of change is unequal**, just as its disadvantages do not affect us all to the same extent. Accelerating globalisation is producing new injustices while also giving us the means to take action against injustices. It is thought-provoking that more people now have a mobile device than have access to clean drinking water. Increasingly, climate change and how it disproportionately affects the poorest and most vulnerable in our own countries, and across the world, is seen to be at the heart of the matter (see also Section 3).

**The scale and pace of the global challenge can seem overwhelming**, resulting in real fear that the world is being pushed beyond its ecological limits. The presence of constant threat



is detrimental to our mental health. The psychiatric and psychological communities have names for the phenomenon of worrying about the Earth's fate: "climate distress," "climate grief," "climate anxiety" or "eco-anxiety". Younger people may be particularly at risk, but feelings of helplessness have been expressed by climate scientists as well as young and very young children alike as the depths and scale of breakdown are absorbed.

### COMMENT: Reflecting on the impact of media images



Due to its nature, the media overemphasizes the negatives and makes an impact with iconic images. The image of an emaciated polar bear drifting on an ice floe is apt to draw attention to the problem of climate change.

The emotions it evokes, however, may be a feeling of boredom on one hand due to repetition, and feelings of anxiety and helplessness on the other as a response to fear. If we keep saying that humanity is rushing to its loss, we transmit hopelessness.

**Anxiety can provoke an instinctive response to act, and to act together:** Global challenges may not be seen purely as threats, however, but at least as equally as opportunities. We know that Greta Thunberg provides a strong role model as a responsible global citizen and there are many others (it is worth reflecting the extent to which a Swedish teenager as a global phenomenon is also a consequence of globalisation).

**IT tools are essential in schools of the 21st century** but this doesn't mean that the proper response to change is to focus exclusively on integrating information technology as much as possible into educational practice. In addition, methods that do not use technology (unless when it is necessary) are becoming more and more important, with face-to-face encounters and communication in strong focus.

### COMMENT: From Gutenberg-galaxy to Google-galaxy



*"I told you, with so many gadgets, we have no chance for survival."*

Like all change, the emergence of the global information-communication society has its winners and losers. The universal change brought by new technologies has not left untouched such a basic institution of society as the school. Information technology (IT), like a black hole drawn and sucked in the Gutenberg-galaxy, radically changes the daily lives of school users and operators.

However, adapting to change is not easy. School is still operating on the foundations laid in the age of enlightenment hundreds of years ago and is visibly struggling to pick up the pace of stormy change.

## 1.2 Educational approach

**Empowering young people,** A key question is the extent to which it is up to us teachers and educators to ensure that next generations do not see their future as despairing?



It has been seen through the emergence of the Climate Change Strikes that across the world many young people are “deeply concerned about the climate crisis” (Climate Change Education, 2021). Many young people are becoming increasingly passionate about the topic and feel frustration and even rising anger at the lack of action being taken by older generations and politicians. Teachers can help arm young people with knowledge and enable them to feel empowered to head out into the world to act on climate change and protect nature.

**Where to start:** In the UK, as with other countries, many organisations are producing materials and lesson resources to support educators in their teaching, and to encourage climate action in school as an institution. This is becoming more widely known as the four ‘C’s: curriculum, campus, community and culture. Often the factual resources are easily accessible from numerous sources for each of the ‘C’s. Even so, it can be difficult to know where to start without guidance and practice in using these in an effective and safe way. Teachers may be concerned to approach these issues in ways that are both empowering to young people and give them the skills and tools to approach the challenges of climate change in forward-thinking ways. According to the Oxfam Guide on Teaching Controversial Issues {2018}:

**“In increasingly divisive and polarised times, the need for young people to feel confident in tackling controversial issues is more pressing than ever. Advances in technology and the rise of social media mean that it is more important than ever for young people to think critically to become effective global citizens.”**

**What does climate action mean?** The educational approach we represent recognises our need to understand the complicated ever-changing political and social context within which we live. It also acknowledges that there can be externally placed constraints on what teachers can do or say on issues such as climate change and this can limit the work done in schools. Climate action, as termed in this guide, is not campaigning in a political sense. Rather it focuses on education’s part, and responsibility, in ensuring that climate change discussions and perspectives are integrated into learning. Student-led campaigns such as Teach the Future are pushing for climate education throughout the curriculum. An 11-year-old student in UK put it this way:

**“Why aren’t we learning about climate change in every subject and talking about what we can do?”**

From our perspective, this means:

- **encouraging open and critical thinking** in students as they approach complex, and perhaps contentious, topics
- finding all opportunities for **sharing good practice** and knowledge, joint planning, and taking effective action
- supporting young people to consider **responding positively and justly** (fig.1) as an individual and collectively as part of wider 'community' responses

fig.1 *Responding positively and justly*

**There may be solutions offered  
by new technologies**

**We are all part of solution and can  
take action now**

**Through our own actions, we can  
mobilise others to act collectively**

**There can be different  
possible futures**

**There will be a range of different  
perspectives to consider**





## Your reflections

### What has changed and what has stayed constant in learning?

By the 21st century many elements of the learning process have changed but there are also those that have hardly changed or are constant.

#### Task (10 minutes):

1. Take a few minutes now to reflect on your own activities and experience as a teacher, even thinking back to your time as a student
2. Make a note in two columns of what do you consider to be the most significant changes in school life, and what has remained constant for young people's learning
3. Compare your reflections with our thoughts overleaf and see if there are any you would want to include or might perhaps disagree with

#### MOST SIGNIFICANT CHANGES

#### MOST CONSTANT ELEMENTS

Our thoughts on what has changed and what has stayed constant in learning.

### MOST SIGNIFICANT CHANGES

- The proportion of personal and online communication
  - The pace of feedback requested
  - Availability of information, opportunities and exposure to uncontrolled sources
  - Screen-usage habits
  - Cognitive strategies for processing information
  - Competence in using devices
  - Content, form, quantity and availability of intercultural experiences
- Factors influencing the development of
- the self-image, the amount of selectable identities

### MOST CONSTANT ELEMENTS

- Need for love and care
- Need for feedback
- Need for information
- Need for social relationships
- Belonging to a group
- Thirst for knowledge
- The need for intercultural experience
- Need for self-identity, stable self-image.

## Section 2. The changing role of the teacher

**Objective:** to reflect on the implications of changing and constant elements for teachers' identity, roles, and methodologies

In the school of the 21st century, teachers' knowledge is being re-evaluated and the role of frontal knowledge-transfer is diminishing. The teacher is no longer able to stand in front of the class as the unquestionable, exclusive source of knowledge, since any student has a device in their pocket that provides instant access to an almost unlimited amount of information.

This, however, does not downplay the role of the teacher in the learning process but re-evaluates it. A good teacher not only owns the knowledge itself, but also knows where to find information and most importantly, is able to teach how to interpret, apply and systematize that information.

### 2.1 Exploring teacher identity and values

**Teacher identity and personal values:** It is important to recognize that all teachers develop a 'Teacher Identity' as they grow as educators. This can be understood as a combination of their own lived experiences, personal and political beliefs, and more philosophical ideas about how they perceive their role. As shown in research surveyed by Rushton and Reiss (2020), teacher identity is often shared between groups of teachers, with the example here of trainee Geography teachers.



**Teacher identity and climate change:** Based on their work in the UK education system Glackin and King (2020) have said:

**“Where the environment is present, the focus is on education about or in the environment, rather than a holistic approach that includes education for the environment.”**

This can be problematic as although there is an overwhelming scientific consensus on the reality of anthropogenic climate change, in England as in other EU countries, climate change education is persistently peripheral. Teacher identity will influence an individual's approach to their work on climate change: inevitably the debate about sustainability challenges and the impact of climate change concern some individual teachers more than others. Some teachers may, for example, feel strongly that climate change teaching in school should be purely the preserve of science subjects.

“This can be problematic as although there is an overwhelming scientific consensus on the reality of anthropogenic climate change, in England as in other EU countries, climate change education is persistently peripheral. Teacher identity will influence an



individual's approach to their work on climate change: inevitably the debate about sustainability challenges and the impact of climate change concern some individual teachers more than others. Some teachers may, for example, feel strongly that climate change teaching in school should be purely the preserve of science subjects.

Many, however, would consider that supporting young people as 'critical thinkers' is an essential element for learning, and going further, may want to enable young people to bring about change to their lives and communities. At times, this may be at odds with the mission and strategic positioning of their school. In many country contexts, priorities are seen in relation to exam success and meeting narrow curriculum targets which restricts time or energy for other educational or societal priorities.

**What is my 'teacher identity' and what are my values?** Teachers involved in this "I Can" project may find it useful to stop and ask themselves about their own 'teacher identity' and how this identity fits with teaching about Climate Change (see Reflection at the end of this section). As project leads in school, it is also important to understand the barriers and be able to navigate these in a positive, forward thinking way, as explored in Section 4.

### RESEARCH: Teacher Identity

Research by Elizabeth Rushton (2021), who leads a PGCE course at King's College London highlights the development of teacher identity in Geography students. These students are introduced to and share 'the ethos of environmental justice' which 'provides teachers with the freedom to use their own skills, training and education to think through what matters for the lives of the children they teach'. One student teacher from this research commented that there was an 'emotional load' experienced when teaching Environmental and Sustainability Education (ESE) and the pressure she placed upon herself to "ensure that she provided a safe, open space in her classroom where students could ask questions and share their opinions of and responses to difficult topics relating to ESE including migration and resource use." However, once in their placement schools they often found that despite their motivation and enthusiasm they met barriers that impacted on the success of their teaching about climate change.

## 2.2 Exploring teacher roles

**Teacher as facilitator:** The attention of the digital generation is less focused on verbal explanations and traditional illustrative tools. Teaching young people who are accustomed to a predominantly visual culture, frequently changing stimuli, and constant communication is a methodological challenge for teachers. New methods are needed in which students' activity is in focus and where the teacher facilitates the learning process which is based on joint action. The teacher's role as leader and facilitator will remain, but **students will have a greater role in the learning process than before**, because one of the important goals of teaching is educating a critical approach and the ability of self-assessment.

**Teacher as partner:** The teacher must help his/her students to understand and evaluate the learning process. What mistakes did they make, where were they wrong, how did they perform? What are the short- and long-term effects of the process, what are the lessons learned? Such external feedback is perhaps even more needed by students than it was before. Prensky (2010) calls this kind of helpful, guiding, but non-prescriptive teacher behaviour “pedagogy of partnering”. The knowledge gained is the result of a **process in which both the student and the teacher learn and develop**. This partnership is based on cooperation, and on similar attitudes of the two parties.



**Teacher as learner (digital and social competences):** Today’s school is attended by digital natives (Prensky, 2001). Students who live among digital devices from birth and use and manage those devices without any problems. Compared to them educators are digital immigrants who have mostly entered the world of digital devices as an adult. Therefore, occasionally the teacher needs the help of the students in an educational situation, for example when using certain tools and applications. So, the roles of ‘teacher’ and ‘taught’ are sometimes interchanged. Students can be digitally superior to their teachers, and to accept this presupposes tolerance and adaptive skills on both sides.

**Teacher as role-model:** Students, who are usually more confident in the digital space than their teachers, may lose their confidence in the social space. It seems that today’s young people do not have good strategies for coping with the tensions and problems that arise in real-life social situations. When they face a problem or task in a group, they often feel I anxious and helpless. To support cooperation, we need to actively develop students’ social skills and their attitudes towards social relationships often through our own modelling of behaviours. Developing students’ social competencies is a priority for the school of the 21st century.

### COMMENT: Changing pedagogies

Best pedagogical practice, teaching and motivational tools that worked well with previous generations, for example where the teacher is the originator and transmitter of all knowledge, have less of an impact on 21st century students. The teaching community, (pedagogical society) is adapting to the new situation to provide professionally sound and effective answers to new challenges to develop in young people their social competences and critical thinking skills. In relation to engaging students with climate change, it is important to recognise the need for new methodologies that promote collaborative learning and develop skills for the 21st Century.

## 2.3 Developing social competences and critical thinking

### Dialogue as a key social competence:

We have seen that digital natives do not seem to be more mature in the social sphere than once today's adult generation. However, it is a question, whether the increasingly digitalized interactions and forms of communication give students enough opportunities to develop their social skills properly, to master the rules of living together in an "offline" world, and to find constructive ways to solve social problems and conflicts. In Part Two of this publication, one such method, "Communities of Enquiry" is presented in detail. This dialogue-based method is one way to develop social competencies and critical thinking at the same time.



**Critical thinking:** As mentioned earlier, the role of the teacher as a mediator of knowledge in the digital age is somewhat relegated to the background. Information is available not only from the teacher but also from several readily available sources. Therefore, it is extremely important that teachers help their students facing the unstoppable flow of information. What is real and valuable, what is not? Which information is incorrect or deliberately misleading? It is therefore essential to teach children the critical use of resources. Draw their attention to the difference between the original source and the interpretation. Ask them the question: can I judge something if I only have information interpreted by another person? Furthermore, even if an original source is available, what types of conclusions can be drawn from it (see Section 6 below).

## Your reflections

### 1. Teacher identity and bringing about change in society

Teachers involved in this "I-Can" project may find it useful to stop and ask themselves about their own "teacher identity" and how this identity fits with teaching about Climate Change. Think about your original motivations to become a teacher and your ongoing reasons for carrying on in this role.

#### Task (10 minutes):

1. What are the top values that underpin your work as a teacher?
2. How far does the work you do (around sustainability) reflect your values and ideas

Now write a short reflection on how you see your own identity as a teacher

### 2. What does it mean to be an adaptive teacher?

There is no indication that the pace of change in the world will stop accelerating. We may have different strategies for how to respond to this, but the ability to adapt is essential both in private life and at work.

#### Task (10 minutes):

1. Immediately after reading the list of attributes below (feel free to add your own), write down what you believe to be the challenges of being an 'adaptive' teacher
2. From your experience, think of one example of a time when this has worked best
3. Where do you think there is more opportunity / where can you make room in your teaching for a more 'adaptive' approach?

An adaptive teacher who adapts to the situation must have the following attributes:

- Dares to make mistakes
- Sees change as a challenge
- Is not afraid of children's success
- Dares to ask his/her colleagues
- Learns new things with children
- Doesn't want to be perfect
- Is not ashamed when doesn't know something
- Let the children teach each other
- Deals with things that interest children today

## Section 3. Navigating the Climate Crisis

**Objective:** to explore the multiple perspectives of the global climate crisis.

Climate change is a global phenomenon that is the subject of intense debate in a wide variety of public spaces, from the scientific to the tabloid level. Meanwhile, we all have first-hand experience of the weather, and can read daily about the far-reaching process of climate change around the world from the devastation of more frequent and more extreme weather events, to rising sea levels brought about when land-based ice melts (see NASA). Young people look for inspiration and guidance from trusted decision-makers and school is often their foremost source of information and help in exploring these complex issues.

### 3.1 Complexity of the global climate crisis

**Taking responsibility for the Climate Crisis:** One of the fundamental difficulties with the Climate Crisis is attributing responsibility: just who is responsible for the existing and still increasing rates of global carbon emissions? Arguments about the historic responsibility of industrialised nations, and their duty to pay for its effects, hampered progress on the United Nations Framework Convention on Climate Change (UNFCCC) for over two decades as industrialised nations were bound by the Kyoto Protocol to make reductions in their emissions and to provide finance to limit or mitigate climate change.

#### COMMENT: Who is responsible for this crisis?

**Fossil fuel companies?** Over 80% of all our energy comes from fossil fuels. Since 2000, 70% of the world's emissions have come from 100 fossil fuel producers. It is estimated that \$3.8tn has been invested by 60 of the world's leading banks in coal, oil, and gas firms since the 2015 Paris Agreement.

**Rich countries?** A quarter of all emissions since the Industrial Revolution have been in the USA. The yearly average carbon footprint for a person in Australia is 17 tons when the global average in 2019 was 4.9 tons (EC Joint Research Centre link, Section 6). The ten largest emitters contribute 68% emissions. Developing countries are living with a crisis they have done very little to create.

**Rich people?** Just 7% of the world's population (approx. 500 million people) are responsible for 50% of all greenhouse gas emissions in the world. The richest 10% of people consume around 20 times more energy than the poorest 10%.

**Politicians?** Governments have known about the devastating effects of global warming for decades but have not effectively tackled the problem. Many still support high carbon economies.

**All of us?** The amount of energy we use is increasing at a faster rate every year. This means that our ways of life and daily choices directly contribute to the increase in greenhouse gases.

ICN 2021, COP26 Classroom Resource: *The Climate Crisis* (Section 9)



**Everyone must contribute to reducing carbon emissions:** Fossil fuels have powered economic development and fuel much of our lives. The historic Paris Agreement made by world leaders in 2015 at the United Nations Conference of the Parties (COP21) represented the world's determination to separate global economic growth from the growth of greenhouse gases. By submitting their own 'Nationally Determined Contributions', all nations could sign up.

It was well understood even in 2015, however, that these national targets would not even keep the world to the 2C rise even if they were immediately implemented. The meeting of the UN at the Conference of the Parties COP26, postponed from 2020 due to the COVID Pandemic, is vital as the first of the five-year cycles built in for nations to be held to account, and to 'ratchet-up' their commitments to act. The reality was put starkly by Christiana Figueres, architect of the Paris Agreement (Figueres and Rivett-Carnac 2020, p.8),

**“We are in the critical decade. It is no exaggeration to say that what we do regarding emissions reductions between now and 2030 will determine the quality of human life on this planet for hundreds of years to come, if not more. If we do not halve our emissions by 2030, we are highly unlikely to be able to halve emissions every decade until we reach net-zero by 2050.”**

*That is our final limit. we cannot exceed it.*

## Postcard from Paris 2015

The Paris Agreement is a historic treaty made at COP21 in 2015 between 197 countries

### AIMS :

- Global temperature rises to be kept **well below 2°C**
- Aim to keep within **1.5°C** rise above pre-industrial levels
- Countries to work to 'Net Zero' greenhouse emissions by 2050

### RATCHET:

- All countries must report back every year
- More ambitious targets to be set every 5 years
- COP26 in 2021 is a **vital world conference for global ambition**



To : All of us

At : Every nation

One World

**Climate Justice: inequalities between countries:** The impacts of climate change are a matter of life and death for many people but not every country or every group within countries experiences the same risks. When asked in an ICN Climate Action Survey (InterClimate Trust , 2020) about the differences between our responses to the Covid pandemic and the climate crisis, one UK student said that we're often so busy with our lives that we don't look at what's happening around us.

**“Because the countries that create the most carbon emissions are richer, these are the main countries that have the money to prevent climate change. However, in these countries the effects of climate change are not as obvious compared to poorer countries in Africa or Southern Asia that are suffering with droughts and floods and are dying because of climate change ”**

It is estimated that in 2019, **24 million people** around the world had to move because of weather related disasters including fires, floods, and hurricanes (Brookings, 2019). Low-lying countries such as Bangladesh are at high risk of extensive flooding with sea level rise and some states such as The Maldives could disappear completely. Other vulnerable nations like Barbados are facing ever intensifying weather events. These nations have gained strength at the United Nations by joining together to form the Climate Vulnerable Group and repeatedly bring to the fore the moral imperative for the world to act.

**Climate Justice: inequalities within countries:** It is the poorest, most disadvantaged people and communities who are least equipped to adapt to the realities of climate change. The most vulnerable groups often have the fewest choices about where they live or how to deal with daily struggles. After the death of a “9 year”old girl in London was proven to be precipitated by air pollution in 2013, teenage friends set up the Choked-Up campaign. They have campaigned using research (Environmental Defense Fund, March 2021) that shows people of colour are more likely to live in an area with illegal levels of air pollution, and people living in deprived areas of London are six times more likely to be living in areas of high pollution.

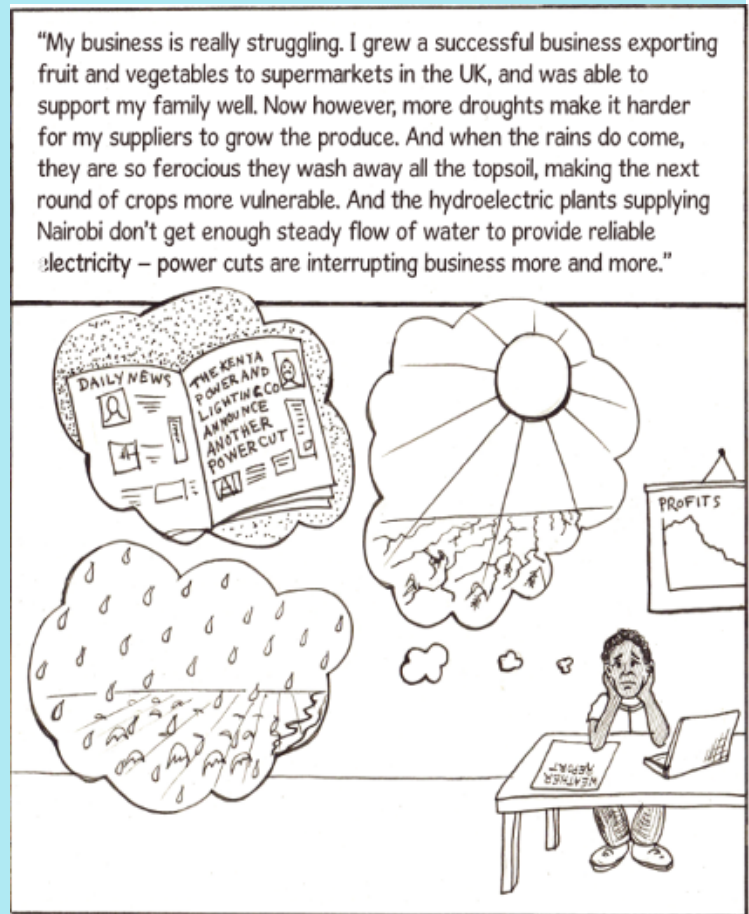
For families worldwide whose homes and livelihoods, surrounding environments and ways of life have already been affected by climate change, the anxiety is acute. Around half a billion children are living in areas with extremely high levels of flood. Nearly 160 million children live in areas of high or extremely high drought severity (UNICEF, 2019). Women and girls shoulder a great burden around the world due to their roles in the family such as collecting water and growing food.

One of the **three key pillars** of the United Nations climate conference, COP26 (hosted jointly by the UK and Italy - Youth) is **Adaptation and Resilience**. There is recognition of the vital role of women, young people, and indigenous populations, highlighting their leadership at local levels. It is also known that the scale of the emergency and exacerbated inequalities means, 'Adaptation is central to their own survival' (UK COP26 Unit call, 31 March). There is acknowledgement, however, that this has not easily been translated into more power for the most vulnerable groups.

## COMMENT: Climate Justice

Mary Robinson, when speaking to World Economic Forum (2015), said that Climate Justice is an argument in two parts: compelling us to **understand what is being faced by people and communities on the front lines** of climate change and to respond swiftly by reducing emissions; and at the same time, making sure that our **shift to Net Zero emissions still enables people's rights to develop**.

Speaking on the fifth anniversary of the Paris Agreement, the Hon Mia Mottley QC MP Prime Minister of Barbados remembers that the mantra from that time was, '1.5 to stay alive' and now regrets that it has proved short lived. The Prime Minister said **she would like to believe that the major emitters of the world "are not capable of what would be in essence close to climate genocide"** but that we would act together on the responsibility that the Climate Crisis imposes on all nations (Climate Ambition Summit, 2020).



### 3.2 Multiple perspectives

**Intergenerational Justice: what about our future?** We may all remember when as a young person a social issue struck us with an all-encompassing sense of 'that's just not fair'. The Swedish activist Greta Thunberg, described as politically and socially the most revered and most recognizable face of the international climate change movement (Haynes, 2019), has inspired young people around the world to organise their own youth climate strikes and activism. The overwhelming message from young people is that the Climate Crisis is a burning injustice that is robbing them of their future.

**Young people's rights:** At a local level young people's engagement has helped to push this issue into the forefront, including in local decision-making (see Appendix I). Groups of young people around the world are also leading climate litigation cases against their governments and corporations as the law is increasingly being used in the search for justice and increasing frustration at the very slow pace of change (London School of Economics, 2020). Here are just three examples:

In **Columbia**, 26 young people successfully brought their case, *Future Generations v. Ministry of the Environment and Others* to enforce fundamental rights to a healthy environment, under threat by climate change and deforestation (National Geographic, 2019).

Following intense and devastating wildfires, six young people from **Portugal** filed the first climate change case at the European Court of Human Rights in Strasbourg in September 2020 demanding 33 countries take urgent action (Youth for Climate Justice, 2021).

A new case has been brought in the **UK** involving a youth climate activist, Mikaela Loach to ensure that the facts about the Government's continuing support of fossil fuel companies is brought to the public (Paid to Pollute, 2021).

### COMMENT: Acting on Intergenerational Justice

Writing for UNICEF-IRC, Schuppert (2012) from the University of Zurich's Centre for Ethics, says there are particularly pressing issues raised by intergenerational justice and climate change :

- " **Which risks those living today are allowed to impose on future generations**, and how available natural resources can be used without threatening the sustainable functioning of the planet's ecosystems. "
- " **How to balance the rights** " claims of those alive today against the rights' " claims of future generations. "
- " Without binding standards and international multi-level governance, existing resource-use practices, as well as the effects of climate change, threaten both environmental sustainability and the basic rights of people now and in the future.



Intergenerational justice has begun to inform policy making. The Welsh government was the first in the world to officially recognise this moral obligation through its Well-being and Future Generations (Wales) Act (2015). The Future Generations Commissioner is charged with overseeing how well public bodies are meeting seven well-being goals, and how the Act impacts decisions from major new roads to local plans.

**Does everyone believe it is important right now?** For many people living in countries seemingly unaffected by climate change, discussions have seemed too distant, overstated and a " future issue ". The consequences of seeing climate change as a future issue is known as the Giddens Paradox (Giddens, 2017). This is where climate change is seen as too far away and too abstract to do anything about but by the time the issues are visible and significantly affecting people's lives, it will be too late to take action.



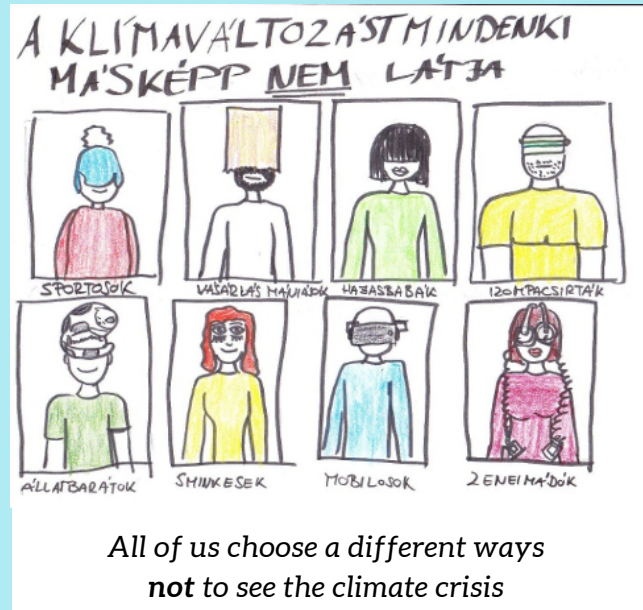
## COMMENT: Conceptualising climate change

"We, as humans, are very bad at conceptualising abstract issues such as climate change. Though changes to the environment have been happening all around us, in western countries it's easy to overlook and explain away the effects.

We have forgotten how to pay attention to the natural world, and in that, we have lost touch with it. People feel helpless to make significant changes on their own, and so they choose, consciously or unconsciously, to ignore how their actions can contribute.

Climate change, though it requires a similar reckoning [to COVID pandemic], has not been able to force people to figure out what's most important and what they're willing to give up."

UK Student (ICN Climate Action Survey Pilot, 2020)



**Does everyone agree?** Clear and overwhelming as the Climate Crisis may seem through one political lens, it has been highly contended when viewed through another. The populist movement has been openly hostile in its opposition to climate science, to the structural changes that are taking place and to the establishment who are seen to represent values that are not universally shared. According to an article by Lockwood for the Oxford Research Group (discussed in Medium.com),

**Scepticism for the climate agenda comes from their perception that the climate agenda is principally espoused by 'a socially liberal and cosmopolitan elite' corrupted by 'special interest environmentalists and climate scientist groups', seeking an exercise essentially involving "politicians, bureaucrats or experts."**

Actions by governments can then inadvertently create a backlash from groups who feel that decisions to safeguard future generations have negative impacts on their lives and livelihoods here and now. This includes the Gilets Jeune movement in France, and in the UK, local councillors have voted to continue with plans for a new coal mine in Cumbria to secure jobs in a low-employment area, despite huge pressure from environmentalists locally and nationally.

**COMMENT: Knowledge base**

For teachers about to deliver activities in school, it might be useful to think about the following four areas in terms of the knowledge base and what else needs to be considered (see Section 9 for workshop link):

	KNOWLEDGE	CONSIDERATIONS
<b>What are the causes and effects?</b>	<p>Do my students understand climate change fully?</p> <p>Is there an understanding of different impacts on people around the world?</p>	<p>What more knowledge is needed?</p> <p>Which resources do I use and share?</p> <p>How do I approach difficult and potentially upsetting issues?</p>
<b>Why is this crisis so difficult?</b>	<p>What do humans need to do to "mitigate" the impact of climate change and "adapt" to changes?</p> <p>What does it mean for our own lives?</p>	<p>What is "political" and potentially controversial?</p> <p>How to link between our own choices and emissions reductions?</p>
<b>Who can make positive change happen?</b>	<p>What are the levels of change: practical; political; personal?</p> <p>Who is already pushing for change?</p> <p>Who has it in their power / who has the responsibility to do more?</p>	<p>What is already happening across the world that gives great hope?</p> <p>How are young people involved?</p> <p>How can we support young people to have a say in decisions?</p>
<b>What actions can we do ourselves and with others?</b>	<p>What can we each do individually?</p> <p>What more can we do together, especially in school?</p> <p>What would help us?</p>	<p>How are students already taking action e.g. at home?</p> <p>What is school community already offering?</p> <p>What part can students play in decision-making?</p>

## Your reflections

### What do we understand by the Climate Crisis?

The climate crisis raises challenging questions both in how we understand the issues ourselves and how we help young people to critically engage with such complexity.

#### Task (10 minutes):

1. Choose either one of the specific issues raised above (e.g., Intergenerational Justice) or watch one of the videos linked below of most relevance to your own subject / of most interest to you
2. Make a note as you re-read the paragraph or are watching of how you respond i.e.  
What are your impressions?  
Is anything confusing for you?  
What are your feelings?
3. Then think about where the challenges and opportunities might be in facilitating your students' engagement with this issue in your own work.

**Related videos:** Please go to Section 6 and select from the videos lists.

## Section 4. Creating safe ports for thinking critically about the Climate Crisis

**Objective:** to give support as teachers consider and plan for productive sessions where all their participants feel able to engage and contribute to their fullest ability.

This section will explore the key ideas and questions that need to be considered by educators and facilitators to develop their ability to create safe spaces for dialogue about climate change within a school setting. It gives an overview of practice at Liverpool World Centre and draws on a range of perspectives. Above all it is aimed at empowering teachers to explore this theme in a safe, supportive, and productive manner.



### 4.1 Considering our school contexts

**Whole school dilemmas and strategies:** As we consider teacher identity and roles (see Section 2 above) we need to think about the context for the workshops within the individual school. It can quickly be seen that across many school settings there are different responses to the need for more education for sustainability or the need to facilitate conversations about the consequences of climate change. Some school settings are keen to develop these opportunities. This may be because of proactive educational leadership and government policy in our country contexts or because of key staff members recognising the serious nature of the topic. However, this can cause problems for consistency across schools as it means guidance is ad hoc and each school is responding on a case-by-case basis.

**School leaders' awareness:** Before the classroom teacher can embark on work on climate change, it is important to establish that the school setting is supportive of the topic of climate change being discussed and is aware of the wider implications for the school. School management teams need to be prepared for young people to question many existing practices related to the running of the school and the carbon footprint of the institution. These could range from questions about the school canteen, the heating system, the school grounds, through to the procurement policy for purchasing. Many school leaders are very aware of the issue of climate change and will accept that there is a responsibility on educators to prepare young people for the future. The potential positive outcomes of the project, shown here, can be emphasised to help school leaders to see the benefits for students.



## COMMENT: Potential impact of I-CAN to share with school leaders

### *I-Can project will help students to:*

- Develop critical thinking skills
- Develop questioning skills
- Develop thinking in systems
- Be reflective and resilient
- Be better able to practice deep listening
- Share opinions and actively listen to each other
- Think creatively
- Develop compassion and empathy
- Develop student agency and empowerment
- Promote individual autonomy and the use of imagination to be able to think and reason
- Identify and exercise their choices in how to live a more sustainable life
- Understand more about their own potential as a creative and productive citizen the context of the global economy and culture
- Develop greater understanding of relationships between society and nature

*Lambert, D.; Solem, M.; Tani, S. (2015)*

**Acceptable action:** There may also need to be a discussion around students' climate action. Schools have been seen to take quite different positions regarding School Climate Strikes ranging from sanctions for those students who got involved to enabling students to participate. If this is seen as an area of potential conflict it would be sensible to have an outline of what would be acceptable to enable action to be taken in a consensual way.

### 4.1 Considering our school contexts

**The classroom as a safe space:** We will now consider how teachers can support students to discuss different aspects of climate change and how the classroom can be developed as a safe place for dialogue, debate, and collaboration. Discussing the future will provoke different responses and feelings from young people. As facilitators we need to feel confident about how to encourage them to engage in the often sensitive and controversial aspects of this challenging subject. As Oxfam [2018] states, learning spaces must be safe spaces for learners to share and explore their thinking. This means setting up ...



“**Space, which is collaborative, respectful and provides an opportunity for open dialogue where... people can test out their views in an open forum for critical, in-depth and respectful discussion.**”



**Encouraging empathy and involvement:** The space and parameters in which we function as educators can have an enormous impact on the engagement of students. Traditional ‘chalk and board’ methods of learning are linear and do not place enough importance on the knowledge and experience of learners. Within this project we have the ambition to encourage conversation and learning together as often this process enables people to come to a deeper understanding of a complex issue. The shared conversations help to build empathy between young people; a developing appreciation of complexity; realisation of the impact on people’s lives in many ways, both negative and positive; understanding of the implications of their own choices and behaviours. Thus, the process must be clearly defined.

**Effective dialogue:** There have been several toolkits developed to support effective dialogue and in a recent publication by Liverpool World Centre (Ref LWC) true dialogue is when “all speakers are recognised as distinct thinkers, whose engagement and contributions can lead to new and shared understandings.”

According to Thoughtbox Education (2021),

“Some of the challenges of this focus can feel big and scary and we need to offer young people a safe, guided space to be talking about what’s happening around the world, providing the space to reflect with their thoughts and feelings and develop a broader sense of knowledge, compassion, empathy and values.”

Here are key questions to consider as we start to work with young people to safely debate these issues:



- What are age-appropriate ways to engage young people in the climate change debate?
- What information do they already have, and do we need to explore with students?
- What do we want them to do after finding out this information?
- What skills or information is going to be beneficial to their futures?

**COMMENT: Teachers' views and experience**

Teachers taking part in an I-CAN training (3 July 2021) shared videos that they use to stimulate discussions in the classroom (see Section 6). Key points across the countries were :

Global warming?



What global warming?

It is most important to reflect on the whole process of climate change to motivate students. This means using resources that are balanced with both the consequences of climate change and the solutions.

Even with this level of seriousness, humour can be useful to convey messages that otherwise might be overpowering.

Children speaking to adults is powerful, and it is motivating to know that young people are taking action.

Technology means that young people all around the world can connect so they may be better able to relate to issues raised in other countries, and then care and emphasise with others.

It is also important for young people to see themselves reflected, whatever their age and backgrounds. This might mean finding out about the impacts of climate change locally or hearing the messages from a relatable source such as a known rap artist.

### 4.3 A model for delivering on climate change

The following is a model that suggests one way of ordering this approach in schools

#### Where is the school-starting point?

##### Stage 1 - Test the water

Find out what they know first, it is useful to find out what reaction an idea or action will get before you start the series of workshops. This can be done using an initial stimulus to test knowledge and understanding.

##### Stage 2 - Introduce Key information

It is important that young people have a good understanding of ecosystems and the interconnectedness of all things.

##### Stage 3

Explain the science of Climate Change.

##### Stage 4 - Examine impact

Examine what climate change really means-explore the impact on humans around the planet.

##### Stage 5 - Develop Empathy

Use stories and real examples.

##### Stage 6 - Reassure

Provide reassurance that we can make changes and find solutions.

##### Stage 7 - Links to actions

Explore how we can make a difference, individual, collective and political action.

##### Stage 8 - Personal Choices and individual Actions

Explore how we can make a difference and act.

## Your reflections

### Creating safe ports for thinking critically about the Climate Crisis?

Developing a school approach for talking about Climate Change is an important step in the process of creating a safe space for dialogue. It is useful to reflect on the positive benefits of this process for your young people and to have thought about your practical approach for delivery.

#### Task (20 minutes):

##### 1. Think first about where to start with this project

- Consider what you are hoping will be the positive benefits for your young people in your school setting. Write down the top three benefits. Can you share these with school leadership in a concise and positive way?
- Where will you deliver this project? EG in your curriculum area or as part of a wider school focus on climate change?
- How will you go about implementing your climate action initiative?

##### 2. As you develop your plan, think about possible different responses in school to this project and how you might bring people on board including:

- Students and student leadership
- School leaders
- Other staff including the canteen, procurement, school grounds
- Parents and the wider community supportive of the school

Related information : See the planning sheet in Section 10



## Section 5. Changing our direction

**Objective:** to explore how change happens and school's part in supporting young people's engagement as active 'climate conscious' citizens.

To limit global temperature rises we must drastically cut our greenhouse gas emissions by 2030 and to do this we need to end our reliance on fossil fuels. Whilst governments and industry might make many of the big 'systems' decisions, we cannot achieve a net-zero transition without everyone being involved. Thinking carefully about the impact of what we do and changing our behaviours to more positive actions can make a massive difference, especially if taken up by many people.

What has also become clear from the world's response to the coronavirus pandemic is that we really can radically change our behaviour if it is widely agreed that what's at stake is vitally important and valued by everyone.

### 5.1 Climate-friendly action

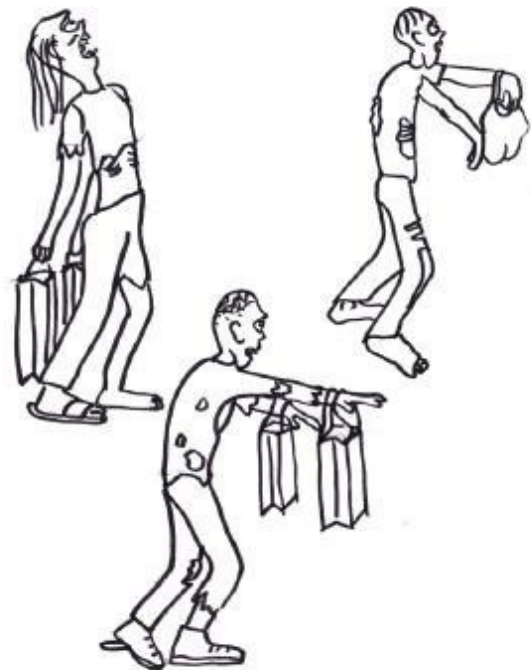
#### Ways to make a difference:

Scientists forming the United Nations International Panel on Climate Change stressed in their Special Report (IPCC 2018, C) that we need rapid and far-reaching transfer to low carbon in our energy, land, urban living, and infrastructure (including transport and buildings), and industrial systems. This involves major change in relation to all our lifestyles and consumption patterns.

We may already be reducing our own carbon footprint through our own day to day choices such as eating less meat each week or switching to an energy supplier that uses renewable energy. Other changes will require us to work together, in our different groups (as teachers, parents, neighbours) and in a range of contexts including work, school and in our local communities.

There is some concern however, described by Norgaard (2018, p174), that putting the responsibility for change wholly on the individual, "has the political function of leaving government and corporations unaccountable." Many agree with Norgaard (op.cit) that larger scale social change is far more likely if there is cohesion - where people exert pressure about collective actions they want to make happen.

**STOP brainless buying!**



## COMMENT: Examples of "spheres of change"

### Practical

**Cities lead the way:** Mayors and city leaders have ambitious targets for carbon reduction. Planning, renewable energy and transport through to new technology has a real impact.

**Making good choices easier:** Investment in new technologies such as wind and solar energy and batteries (e.g., for electric cars) means they have become cheaper. Everything from bike lanes to food waste collection helps us to change what we do and the way we do it.



**Companies join Race to Zero:** Many businesses and companies around the world are working to reach net zero carbon emissions by 2050. Together with cities and universities, they make up nearly 25% of global CO2 emissions and 50% of our global economy.

### Political

**Changing the law:** UK set a law (Climate Change Act) to reduce GHG emissions by 2050. Over 60 other countries now have such laws in place. Regulations and checks are used so everyone is clear what needs to be done and has to stick with it.

**Councils declare Climate Emergency:** Nearly 1,800 local authorities in over 30 countries have made this declaration. Many intend to become carbon neutral by 2030 and their plans of action reach over 820 million people.

### Personal

**Daily choices each of us makes:** Thinking carefully about the impact of what we do and changing our own behaviours to more positive low-carbon actions can make a massive difference, especially if taken up by many people – individuals, in our families, schools, work and communities.

**Financial risks:** Increasing pressure is being put on banks and investors by showing that putting money in fossil fuel production means high risk. Anyone with any savings or a pension can make (and ask for) more sustainable choices.

*After IPCC 2014 Spheres of change: Practical; Political; Personal (See ICN Workshop The Climate Crisis*

**Does knowledge lead to action?** Studies reveal most people believe climate change is happening now, that it is a global emergency, and the vast majority acknowledge a human component in climate change. Yet this knowledge, and even an understanding of what to do, does not automatically lead to taking action -we have not yet experienced the compulsions to radically change our behaviours. Results from InterClimate Network's Climate Action Survey (2021) show this:

- 86% of 3532 students saw the link between climate change and emissions caused by human activity
- 84% of students expressed their concern
- 56% of the same students said they are taking some form of action

Furthermore, just telling people what to do does not always appear to be that effective. The Centre for Climate Change and Social Transformation (2021) says ;



**Crucially, we can't impose solutions on people; we know from the gilets jaunes, fuel duty and other protests that this won't work. We need to start from where people are now and work closely with them to create and test out bold visions of the society we want. Mobilising people requires understanding how their values translate into both action and inaction. "**

**What helps us change direction?** To understand how to motivate people to alter their behaviour, there should be an understanding of what is preventing change in the first place: why do people act as they do? Behavioural Science helps us to understand the underlying reasons and this understanding informs the design of interventions (a coordinated set of activities) that can help people to change their routines and habits and, crucially, to sustain that change for the long-term (see Transtheoretical Model).

These interventions can be delivered at different levels, from individuals and households, through to community or whole populations. Importantly, recent research by the Calouste Gulbenkian Foundation (2021) highlighted that any measures need to be accepted by the public as fair, which again requires effective participation and collaboration. People often do things the way they do because they enjoy it that way or it makes their life easier.

## RESEARCH: Transtheoretical Model

The transtheoretical model details stages of change, highlighting stages individuals move through when modifying behaviour, from precontemplation where individuals do



not intend to act, to contemplation with intention to change and preparation where an individual plans to act soon. The action stage takes place when modifications in lifestyles have occurred. The ultimate stage is when there is no temptation to relapse, and behaviour has then changed (Prochaska, Redding and Evers, 2015:127-8).

These stages require principles of decisional balance, self-efficiency, and processes of change to enable each stage to work and reduce resistance, facilitate progress, and prevent relapse (Pro-change, n.d.). Prochaska, Redding, and Evers (2015:127) suggest individuals in the preparation stage should be recruited for action-oriented programmes, such as young people in the fight for climate action. However, this requires young individuals to self-identify as ready to participate in behavioural change and this may be prevented by a lack of maturity and self-awareness. Therefore, this model may require school-based education and preparation for young people for action.

## 5.2 Climate-friendly schools

**Key role of school:** As shown throughout this guide, school has a clear role in the development of knowledge and skills regarding climate change. This message was reinforced by UK students' answers in the Climate Action Survey of 3532 students (InterClimate Network, 2021). School was the top choice for these three questions:

- Where do you hear climate change talked about the most (in a positive or negative way)?
- Which places provide you with information you trust?
- Which places inspire you to get involved?

At the same time, schools are called on to understand young people's views and behaviours around climate action, to listen carefully and show through actions that their views matter. ICN's survey (op.cit) found the top reason why students said they were not already taking climate action was 'I feel powerless to make a difference' (32%) followed by, 'I don't feel individual actions will make a difference' (31%) reflected here.

***"I would like to but too afraid, I have no power, too young"***

***"I just don't feel like it would make a difference, or it would truly be worth making my life slightly more difficult"***

***"I'm told not to by parents as it is deemed as pointless. Also, there will be no difference in such small actions until everyone else does them"***

***"Don't see the point in throwing your life away to fix something that will never change."***

Crucially, schools provide support and opportunity to young people to act collectively and consequently feel positive about taking action as a crucial part in overcoming powerlessness. The survey showed the importance of groups working together, with their teachers and older students as role models. In this way young people are motivated to bring about positive change and show how their peers, and teachers, can contribute to action on climate change in school communities. It may be beneficial for project leaders to consider the different levels they start to engage the school community shown here.



### Level 1

#### **Exploring the needs of the students**

How informed and motivated are our students?

**Action :** Do a baseline assessment to understand the young people's starting point.

- Climate Action Survey
  - School Carbon Footprint
  - Individual Carbon Footprint
- 

### Level 2

#### **The Whole School Context**

What matters to our school community?

How informed and motivated is our school community?

**Action :** Share objectives with school staff, governors, and young people.

- Launch the project  
e.g., Newsletter, Instagram page
- 

### Level 3

#### **What about the community context?**

How will parents feel about their child engaging in the topic of climate change?

What are the views of the local community?

How far has climate change impacted on people's lives and livelihoods?

What examples from the local area can I use?

**Action :** Do an initial survey to consider the starting point for the school community.

- Letter / parents' pack
  - Short survey for home
- 

**Making "climate friendly" action easy:** People often do things the way they do because they enjoy it that way or it makes their life easier in some way. New actions should therefore: be made just as easy as existing actions; be appealing; and clearly show how they do more good. Therefore, for example, in order to encourage people to drive less to school, what are the current alternatives and how complicated are they? Is it practical for people living at a distance or in rural environments? What needs to be in place to make it safer and easier to cycle or walk? Which messages, such as benefits to health, will appeal to different groups?



### COMMENT: Model of change

There is a long-standing debate in social sciences over what shapes human behaviour: Do we make decisions freely? Or are they defined by the structures in place?



- Agency: capacity of individuals to act independently and to make their own free choices
- Structure: recurrent patterned arrangements influencing or limiting choices and opportunities .g., political, or economic structures, social and material influences. A useful way to look at how to encourage change is the COM-B model from the Behaviour Change Wheel.

The COM-B model of behaviour is widely used to identify what needs to change in order for a behaviour change intervention to be effective. It represents the observation that at any given moment, a particular behaviour will occur only when the person concerned has a combination of:

- Capability: meaning the physical strength, knowledge, skills, stamina etc
- Opportunity: in terms of a conducive physical and social environment. Is it physically accessible, affordable, socially acceptable and is there sufficient time?
- Motivation: there must be sufficiently strong 'motivation' to favour one way of acting over another.

**Top Tips** in supporting behaviour change are thought to be:

- Move from telling people what to do to helping them do it.
- Target specific groups, address their views and be relevant to their needs.
- **Make it easy, make it compelling!**



## Your reflections

### Climate friendly action and climate friendly schools

Thinking about the outcomes of this project, imagine your school in 5- or 10-years' time and reflect on the differences you would like to see for school, young people, and your wider school community.

#### Task (10 minutes):

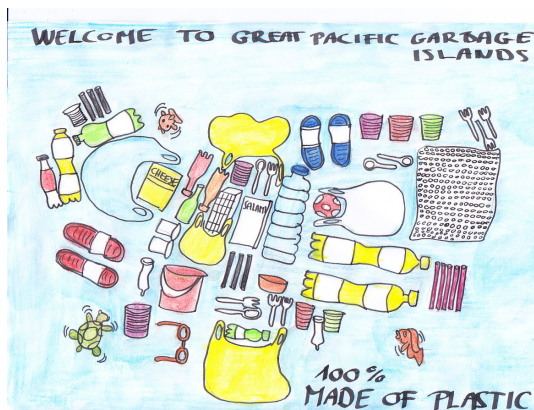
1. The actions and voices of the young people
2. The impact of action and the issue of climate change in your school
3. The wider impact of collective action in your country?

**Related information:** Jamboard for training



## Section 6. Map room

**Objective:** to bring together trusted sources of information and references that teachers and partners would recommend to others.



There are very many resources available from multiple sources and within this section, partners have recommended just a few useful links. Importantly, participating teachers have provided links to videos that they use and recommend.

Please do visit the I-CAN website for more links and see the references at the end of this guide.

### I-CAN PROJECT WEBSITE



International Climate Action Network (I-CAN)

<https://www.icanproject.eu>

### CLIMATE CHANGE VIDEOS RECOMMENDED BY I-CAN EDUCATORS



An alarming report from the Intergovernmental Panel on Climate Change (IPCC)

<https://www.youtube.com/watch?v=rRD6g5A4hko&t=32s>

Young people finding a way to act

<https://www.youtube.com/watch?v=2oGKKAMjRfQ&t=5s>

Humanity's impact in time-lapse

<https://www.youtube.com/watch?v=5W-zPqrGQWA&t=13s>





### Hungary

News report on Copenhagen conference on Climate change (2014, Euronews)

<https://www.youtube.com/watch?v=HOzi--QerBc>

AR campaign for the Oceans on the World Oceans Day

<https://www.youtube.com/watch?v=RKEchAMtnVM&t=2s>



### Italy

Little Lies and Big Truths - how much weight do we have on the planet?

<https://www.youtube.com/watch?v=N3an4pRs18c>

The story of Alex Bellini, lone navigator raising the alarm against pollution

[https://www.raiplay.it/video/2020/02/Sapiens---Lesploratore-in-un-mare-di-plastica-8010235f-8172-4cc4-bf6b-052e1c98cc49.html?wt\\_mc=2.www.wzp.raiplay](https://www.raiplay.it/video/2020/02/Sapiens---Lesploratore-in-un-mare-di-plastica-8010235f-8172-4cc4-bf6b-052e1c98cc49.html?wt_mc=2.www.wzp.raiplay)

The ABC of waste, from A to RECYCLING

<https://youtu.be/X2J9gui16zI>

Plastic heart: children show you how your actions will destroy their future

[www.youtube.com/watch?v=OVNsx7MGffA](http://www.youtube.com/watch?v=OVNsx7MGffA)



### United Kingdom

No Point Going Halfway: why we have the SDGs (emotive)

<https://www.youtube.com/watch?v=DdLqiTvFwJk>

Prince EA, Sorry future generations: (rap) on challenges and solutions

<https://www.youtube.com/watch?v=B-nEYsyRIYo>

BBC Biodiversity heroes: Teenagers working on sustainable farming practices in Madagascar

<https://www.bbc.co.uk/news/science-environment-48113501>

UNICEF project for young people using digital mapping	<a href="https://www.youtube.com/watch?v=b0O-kC1HsyE">https://www.youtube.com/watch?v=b0O-kC1HsyE</a>
Waters of Paradise: solutions focused in Maldives	<a href="https://www.youtube.com/watch?v=YdKQSAfy7G8">https://www.youtube.com/watch?v=YdKQSAfy7G8</a>
Kai Tempest, Visions for our future: poem	<a href="https://www.youtube.com/watch?v=CjtcNGGkKIA">https://www.youtube.com/watch?v=CjtcNGGkKIA</a>

### Others videos and resources

BBC – Our Planet Matters: Climate change explained (short film)	<a href="https://www.bbc.co.uk/news/av/science-environment-51129250">https://www.bbc.co.uk/news/av/science-environment-51129250</a>
David Nelles and Christian Serrer, 2018	Small Gases, Big Effect This is Climate Change Particular Books ISBN 978-0-24146188-4
InterClimate Network	<a href="https://interclimate.org/resources/">https://interclimate.org/resources/</a>
Le Partenariat	<a href="https://www.lepartenariat.org/ressources/">https://www.lepartenariat.org/ressources/</a>
Leeds Development Education Centre	<a href="https://leedsdec.org.uk/climate-action-resources/">https://leedsdec.org.uk/climate-action-resources/</a>
Liverpool World Centre	<a href="https://liverpoolworldcentre.org/resources/">https://liverpoolworldcentre.org/resources/</a>
National Aeronautics and Space Administration (NASA)	<a href="https://climate.nasa.gov/vital-signs/global-temperature/">https://climate.nasa.gov/vital-signs/global-temperature/</a>
UNFCCC	<a href="https://unfccc.int/resource/bigpicture/">https://unfccc.int/resource/bigpicture/</a>

### United Nations (UN) and other international bodies acting on climate change

Climate Action Tracker	<a href="https://climateactiontracker.org/countries/">https://climateactiontracker.org/countries/</a>
COP26 and Pre-COP Youth Summit	<a href="https://www.ukcop26.org/">https://www.ukcop26.org/</a> <a href="https://all4climate2021.org">https://all4climate2021.org</a>
C40 Cities Climate Leadership Group	<a href="https://www.c40.org/">https://www.c40.org/</a>
EC Joint Research Centre – The Emissions Database for Global Atmospheric Research (EDGAR)	<a href="https://edgar.jrc.ec.europa.eu">https://edgar.jrc.ec.europa.eu</a>
European Climate Foundation	<a href="https://europeanclimate.org/why-ecf">https://europeanclimate.org/why-ecf</a>

Intergovernmental Panel on Climate Change (Reports to UN)

<https://www.ipcc.ch/>

International Energy Agency

<https://www.iea.org/reports/key-world-energy-statistics-2020>

UN Development Programme (Sustainable Development Goals)

<https://www.undp.org/sustainable-development-goals#climate-action>

UN Framework Convention on Climate Change (UNFCCC)

<https://unfccc.int/>  
Follow on Twitter: @UNFCCC

UNFCCC Race to Zero

<https://racetozero.unfccc.int>

World Meteorological Organisation (State of the Global Climate 2020)

<https://public.wmo.int>

## Your reflections

### Fact or fiction?

This reflection is one that can be used between teachers in a training session or with students to help think about the way that the issues around climate change are presented.

### Task (15 minutes) :

1. Select articles from different media sources. You might access different websites you know e.g.:
  - Subject associations articles and conference proceedings
  - News, television programmes and social media
  - Charities' campaigns and resources
  - Blogs
2. Or use any of the links provided in this guide
3. Read the article and use the table below to assess whether they are presented factually, as verifiable opinion, or are unsupported. This can be used for group-work in class

## FACT AND OPINION IN THE MEDIA

### Factual public information

Objective  
Authentic, verifiable  
Clear  
Author's point of view is not recognizable

### Informed and reasoned opinion

Based on a personal point of view, opinion, judgment  
Presents the facts in the context of its own interpretation  
Substantiated by arguments, examples, evidence  
Open to interpretations, debate  
Not always verifiable

### Unsupported opinion

Unsupported by facts or evidence (or they are not relevant to the message)  
Assumptions, speculations, rumours  
May mislead recipients  
Highly subjective  
Can never be checked or verified



# PART 2

# NAVIGATION TOOLS

This second part of the Climate Action Guide provides practical tools that can be used with students to help understand climate change. It starts with a well-known methodology to explore injustices and contention, dilemmas, and complexities in a safe space, and can also be used in discussing any topic.

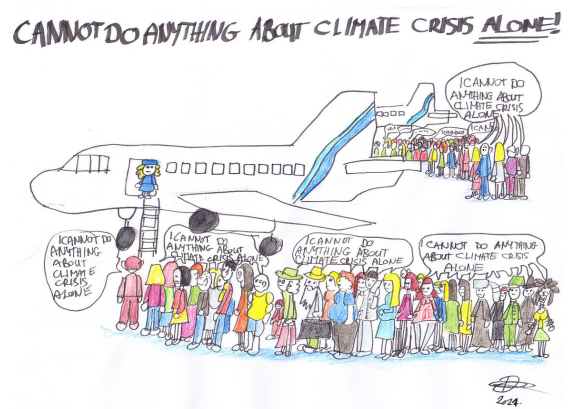
## Section 7. Introduction to Communities of Enquiry

Critical thinking and social competencies cannot be taught but can be developed. We have seen that in today's school the development in both areas is inevitable. In the following, we present a method by which students' critical thinking and social competences can be developed alongside offering a tool to embed the topic of global climate change in the everyday practice of education.

**Dialogue in education:** An active citizen who wants to work for their community can only be born when members of the community develop a sense of responsibility for their common future. Together they define the issue they want to work for and can build consensus on what to do, and how to do that.

**Creating safe spaces:** Sincere dialogue cannot be practiced without mutual trust among parties. The speaker should be sure that they are free to express their thoughts, they will not be disadvantaged within the community due to their opinion. At the same time, one cannot offend another member of the community when expressing opinion. The space that allows open dialogue is called safe space. Making a safe space is the responsibility of the teacher / facilitator, but it involves the students too.

**Rules of cooperation:** A safe space works properly if its rules are developed by the group under the guidance of a teacher or trainer. This ensures that the rules reflect the reality of the group. Following rules is also easier if they are created together. The rules and the process of making them should also be adjusted to the age of the group members. Some rules may only be relevant below or above a certain age.



**Setting up the rules:** Setting up the rules of cooperation can be completely spontaneous. This is slightly more time consuming than when the trainer / teacher proposes certain rules. The rules should be discussed one by one, covering every detail if necessary. Each rule must be voted on by each member of the group. A rule cannot be included in the common set of standards that is not based on the agreement of all members of the group. As the trainer / teacher is also part of the rulemaking process, he / she can also vote or propose a rule, thus preventing the group from adopting any rule that would make it impossible for the group to function.

In general, the following rules should be the basis for cooperation. You can add to the list above but try not to have more than 6-7 rules!

- Everyone pays attention to the speaker
- Contribute so that you support the community
- We react to each other's words and thoughts (not to the person)
- Everyone has a say
- We listen to each other (we don't cut into each other's words)

The rules should be put on a flipchart paper after members have voted on them one by one. Finally, the full list of rules is signed by each member of the group. (This is optional, not necessary for children.)The rules apply to all group members. When a new member arrives or old leaves the group the rules must be voted on again by everyone.

### COMMENT: Rules in practice

The flip chart containing the rules should be placed at a clearly visible point in the room at the beginning of the session and left there throughout. If a group member violates any of the rules, the facilitator / trainer or any group member may point out the relevant part of the posted flip chart, reminding the “offender” to behave according to the norms.

If you work with a group for the long term, you don't have to re-create the rules every time, when having a session. It is enough to remind the members of the group at the beginning of the session about the previously agreed rules. However, every time we work with a group, the rules should be clearly visible on the wall of the room.



In the case of a long-term cooperation, the rules may need to be reassured by the group from time to time. In doing so, team members reaffirm their commitment to function according to the framework, and on the other hand, they could adapt the framework to the circumstances from time to time. Exceptionally, the rules may change even during a session, when the change is agreed by everyone and confirmed by a vote.

**A dialogue-based method – Communities of Enquiry:** Once we have created a safe space for dialogue by setting up the framework, the group is ready for a structured conversation. The method we describe here is called Communities of Enquiry. The method transforms the group into a philosophical community in which members democratically decide for themselves the content and the course of the conversation.

- The teacher is a facilitator in the process
- The participants manage the conversation themselves, according to the rules
- Everyone has a chance to speak, so everyone can experience that their opinion matters
- In the process, communication skills and social competencies as well as critical thinking develop

During the conversation the members of the group get to know each other and themselves better. They can meet opinions and thoughts that are different from theirs and share their own opinions and thoughts with the community, which they could not do otherwise. Participants receive responses from their peers to their articulated thoughts thus satisfying students' need for immediate feedback, which is natural for those growing up in the online world. These are the skills and abilities needed, if we want our students to become active citizens who can face global challenges such as climate change.

**Community of enquiry and climate action:** Protecting the climate can only be achieved with students who recognize their own role in shaping global processes and are able to work together for a change. Dialogue between members of the community is essential for this. The community of inquiry allows group members to learn about each other's thoughts and attitudes about climate change. They experience that everyone's opinion matters, which creates the basis for joint action. At the same time, they find that there are no easy answers to complex questions such as climate change. During the sessions, their critical thinking develops as they learn about multiple perspectives and meanwhile their own perspectives can be challenged by the community they belong to.

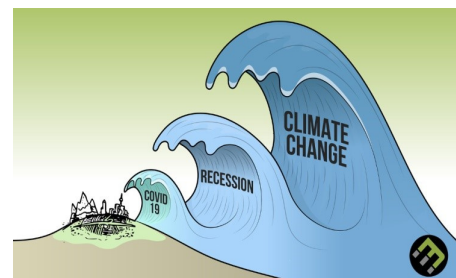
### Activity details

The method is based on 10 steps:

- |                             |                               |
|-----------------------------|-------------------------------|
| 1. Preparation              | 6. Airing the question        |
| 2. Stimulus                 | 7. Voting                     |
| 3. Private reflection       | 8. Discussion ;               |
| 4. Shared reflections       | 9. Final thoughts, summing up |
| 5. Formulating the question | 10. Reflection                |

### Time needed:

You can easily take them in 45 minutes, the length of a class. A seat can be longer or even shorter. An activity can easily be held within the school hours.



**1. Preparation:** Form a circle with the chairs. If there are benches in the room, they should be pushed against the wall outside the circle. The circle should be designed so that all participants can see each other and move freely within the circle.

**2. Stimulus:** We provoke the thinking of group members by presenting a stimulus. The chosen stimulus can be almost anything, but when the group has no experience with the method yet, the stimulus should be a simple short story, film, or newspaper article. Here are a few ideas for stimuli:

- song or rap - text can be handed out
- cartoon - works well in any age group, almost always controversial
- story - fiction or personal, written or narrated
- comics - engage the group quickly and enjoyably
- film - fiction or documentary
- artwork - paintings, sculptures, etc
- newspaper article / blog / twitter post
- photo - 1 picture is worth up to 1000 words
- data - facts can be provocative
- poem - interpretations may differ

**3. Private reflection:** After presenting the thought-provoking stimulus, allow time for participants to process what they have seen (heard). They can even write down their first thoughts, which they only formulate for themselves, on a piece of paper. We can help formulating first thoughts with questions like:

- What are your first impressions?
- Was anything confusing for you?
- What are your feelings?

**4. Shared reflections:** Once members of the group have individually reflected on the stimulus, it's time to share their thoughts with others, but not yet with the entire community! They can form pairs or groups of 3-4 people, where they are free to discuss their feelings and impressions provoked by the stimulus. We can ask those sitting next to each other to form smaller groups by pulling their chairs together.

**5. Formulating the question:** After sharing their thoughts, every group should come up with a question about the stimulus. The question must be a "philosophical" or "open" question. One that is not directly related to the text and there is no answer to it in the text or beyond the text (can't be answered by an expert). A question around an issue, which concerns us all (including those who do not know the stimulus). A universal question, which everyone must formulate their own answer, because there is no single right or wrong answer to it. The teacher should walk around in the room and help the groups formulate their question if necessary, and to check whether the question is philosophical or not (i.e., an open, relevant, important question for everyone).

**6. Airing the question:** Once the small groups have agreed on a common question, write it down on a sheet of paper (in large letters to make it easy to read remotely)! The teacher collects the questions, reading each of them before placing the questions in the middle of



the circle for everyone to see. Those sitting in small groups return to the large circle where they originally sat.

**7. Voting:** The members of the group must decide individually, which question they want to discuss plenary. Clarify that all questions are clear and give the group members some time to think! Participants can vote in secret or openly. The teacher/trainer must decide which voting system fits the group best. Participants can vote with sticks or by putting a pen stroke on the paper next to the issue that concerns.

**8. Discussion:** Time wise the conversation makes up most of the session. As the discussion is student led, it is important that they listen to each other and that everyone has a say. Those who want to speak must make a sign so that he/she gets permission to speak by the current speaker. (The group can also develop their own hand-signal.) It is always up to the speaker to decide to whom to pass on the opportunity to speak.

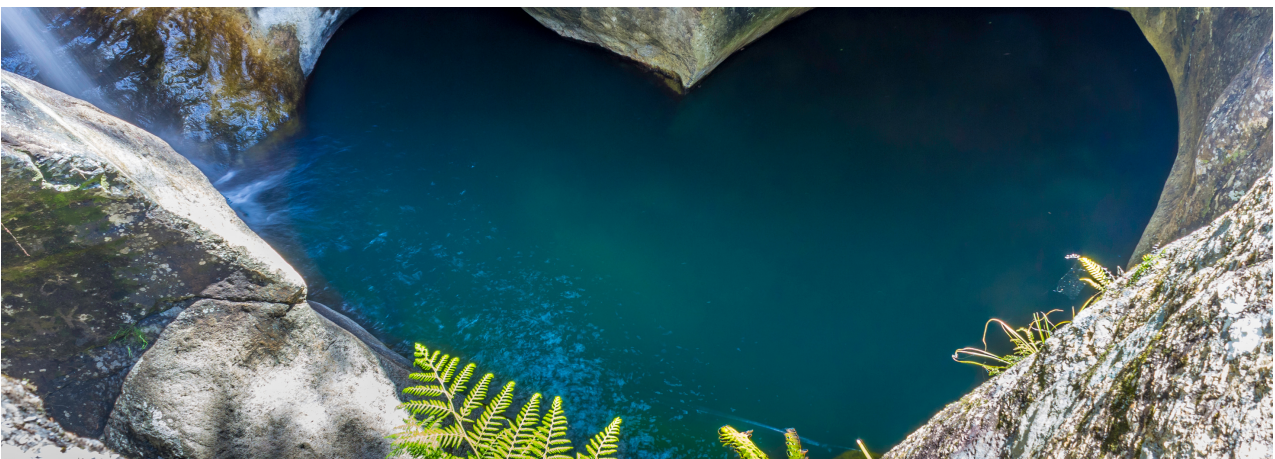
Speakers should always respond to what was said, never to the speaker! The teacher facilitates the conversation, intervening only if necessary. Warn group members when they violate accepted rules. If you see that a group member is misunderstood, you can ask him/her to explain in other words what he/she means. (“Do you mean...?” “Could you explain this a bit more?” Etc.) You can give a new impetus to the conversation, when you feel that it is stuck for some reason. In this case, you can ask questions to restart the conversation. (“So, Peter says... What do you think about this?” Etc.)

**9. Final thoughts and summing up:** When the conversation comes to an end (or the time for the session runs out), the teacher ends the session and asks students to write on a piece of paper for themselves the first thought they have after the enquiry.

The teacher / trainer might want to sum up the process, giving feedback on the session, where the conversation started, and how far it got.

The teacher / trainer might want to sum up the process, giving feedback on the session, where the conversation started, and how far it got.

**10. Reflection:** At the end of the session, the group evaluates the session. They can think through and discuss how effective the conversation was, whether they managed to keep the framework, how relevant the question was, whether they really managed to think together, and so on.



## Section 8. Creative strategies and resources

The following activities are aimed at introducing the subject of climate change in your class. They last between 15 and 30 minutes and are adapted for either large classes or smaller groups. They deal with various subjects such as what we buy and use, sustainability, causes and effects of climate change or carbon footprint.

These activities are an opportunity for students to familiarize with some concepts related to climate change, to start thinking critically and to speak up. They can be used as icebreakers or as introductory sessions before running a climate conference.

### ACTIVITY 1 WHAT DO YOU THINK ?



#### Objectives:

- Start thinking processes amongst participants regarding climate change
- Learn how to give an opinion through constructive arguments
- Explore how to run and be part of a debate

Time needed: 20-30 minutes

#### Activity details:

1. Mark one side of the room as “agree” and the other as “disagree”
2. Read out some statements (see examples below) related to climate change and ask the pupils to stand on either the “agree” or “disagree” side
3. After each statement, ask them why they are standing where they are. Each team can provide arguments to the other and debate around the subject

#### Example of statements:

- There is nothing we can do about climate change
- We all need to change our lifestyles to reverse climate change
- We can still stop climate change
- Global warming is not scientifically proven
- Industrialised countries are the major contributors to climate change
- Poor countries are the most impacted by climate change
- Climate change is mainly due to human activities

#### Taking it further:

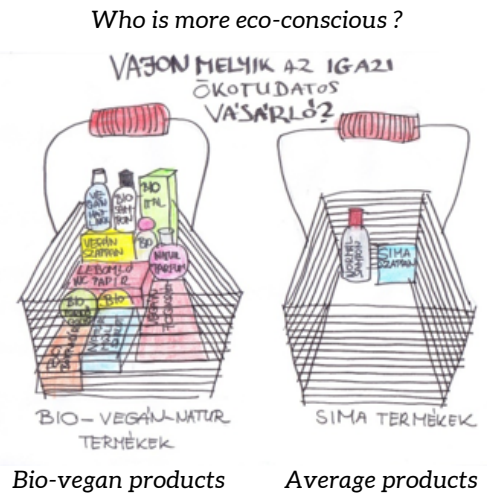
You can also create a third group in the middle for those who doubt and can't take a stand. The teams “agree” and “disagree” then have to try to convince them to win the round.

## ACTIVITY 2 YES, OR NO?

### Objectives:

- Introduce the topic of our rates of consumption (what we buy and use) and sustainability
- Reflect on the main causes of climate change

**Time needed:** 15 minutes



### Activity details:

1. The participants sit on chairs in a circle. One person has no chair and stands in the middle
2. The person in the middle says an activity that contributes to climate change (see examples below)
3. All the participants who answer **YES need to change places**. Those who answer **NO stay in their seats**
4. The person in the middle must try to get a chair while the others are changing places
5. Once the person who was in the middle managed to find a seat, the person who remains standing at the end then goes in the middle and the game starts again with another activity

### Example of activities:

- You like eating food from other countries
- You have been abroad by aeroplane
- Your parents / carers own a car
- You eat meat
- You don't always recycle paper, cans, or bottles
- You have a tumble dryer at home
- You have several TVs or computers at home
- You don't compost
- You buy new clothes every month
- You don't always eat seasonal vegetables

### Taking it further

You can list the statements during the game and then discuss together on which activity we can individually act, on what specific subject efforts could be made.

## ACTIVITY 3 THE CLIMATE WEB



### **Objectives:**

- Introduce the topic of our rates of consumption (what we buy and use) and sustainability
- Reflect on the main causes of climate change.

### **Material needed:**

- A ball of wool or string
- Stick-on labels

**Time needed:** 20 minutes

### **Preparation:**

It can be useful to define the terms chosen before the activity.

### **Activity details:**

1. Write some words related to climate change on stick-on labels and distribute them among the participants, standing in a circle
2. The person who begins keeps the end of the string in their hands and throws the ball to another player, precisely explaining the link between them
3. The next person holds the string and throws the ball again to someone that they are related to, in one way or another
4. The participants can receive the ball several times, but they cannot throw it twice to the same person
5. All along the game, each player keeps the string in their hands so that the group ends up with a complex web representing the interdependence between the causes and effects of climate change

### **Example of words:**

Drought, industry, ice-melt, hurricane, conflicts, flooding, road transport, food waste, coastal erosion, terrestrial biodiversity, agriculture, migration, chemical fertilizers, marine biodiversity, forest fire, sea-level rise, water shortage, animal husbandry, diseases, agriculture, CO<sub>2</sub>, famine, oceans, animals, pollution, deforestation...

### **Taking it further**

In a second phase, you can ask the students to search images representing the words and to create a fresco showing the causes and consequences of each item. Using both words and pictures will make it more visual.



## ACTIVITY 4

### WHO POLLUTES THE MOST?

#### Objectives:

- Introduce the concept of a “carbon footprint”
- Discuss the impact of different actions on our carbon footprint
- Raise awareness about the necessity to act individually but also on a political level

#### Material needed:

- Paper and markers to create the cards

**Time needed:** 20-30 minutes

#### Preparation:

It is important to define the term “carbon footprint” before playing this game. Before forming the line, you might want to ask the students to form groups of 3 and to decide who has the card with the highest carbon footprint. It should make the next step easier.

#### Activity details:

1. Write the items/activities below on cards and distribute them among the participants
2. Ask everyone to form a line from the lowest carbon footprint item to the highest. They should discuss with each other while trying to form an order
3. When they have decided on a line, ask everyone to say what they are and what quantity of CO<sub>2</sub> they think they represent
4. Give the answers (below) and discuss the results.

All figures are taken from the book "How Bad are Bananas?" (Berners-Lee, 2010). Make it clear that the measurements are estimates of Carbon Dioxide 'equivalents' (CO<sub>2</sub>e), also considering other greenhouse gases

LIST OF ITEMS / ACTIVITIES	CO <sub>2</sub> e	LIST OF ITEMS / ACTIVITIES	CO <sub>2</sub> e
A plastic bag	= 10g	1kg of tomatoes	= 9.1kg
An apple	= 80g	Using a mobile phone one hour per day during one year	= 1250kg
A banana	= 80g	Flying from London to Hong-Kong return ;	= 4.6 tonnes
One mile by bus	= 50g	A swimming pool	= 400 tonnes
One mile by train	= 150g	1 hectare of deforestation	= 500 tonnes
500 ml bottled water	= 160g	A car driving 28 times around the world	= 500 tonnes
A shower	= 500g	A space shuttle flight	= 4,600 tonnes
1kg of rubbish	= 700g	The World Cup	= 2.8 million tonnes
One mile by car	= 710g		
A veggie burger	= 1kg		
A cheeseburger	= 2.5kg		
A pair of cotton jeans	= 6kg		



## ACTIVITY 5 ON-LINE DEBATE



### Objectives:

- Learn how to give opinion through constructive arguments
- Reflect on our consumption patterns
- Identify concrete solutions to act.l.

**Time needed:** 15 minutes

### Preparation:

- You can run this online activity by videoconference using a collaborative tool like Jamboard or BigBlueButton for example
- You need to prepare a presentation with a few slides (see example below) picking out some of the following actions:

Buy local and seasonal food.	Reduce your consumption of meat.
Give unwanted items to a charity shop.	Reduce aeroplane flights.
Walk, cycle, or use public transport instead of car.	Buy products with less packaging.
Make compost in your garden.	Take part in a climate change action school strike.
Recycle everything you can.	Say no to plastic bags and packaging.
Become vegetarian.	Become vegan.
Collect rainwater to use it in your garden.	Switch off the lights when you leave a room.
Reduce food waste.	

### Activity details (with example slides)

1. First slide: ask the participants if they think the action has an impact on climate change or not. They can simply use their mouse to point whether they agree or disagree or use a post it notes to write down an argument and put it in the right box.

*It is important to note that both options are anonymous. The first one only reflects the opinions among the students while the second one gives them a chance to formulate an argument to justify their choice.*



Recycling everything you can has an impact on climate change



AGREE	DISAGREE

2. Second slide: ask them if it is something they already do: they must choose between yes or no, pointing out the appropriate box.



Recycling everything you can has an impact on climate change



AGREE

DISAGREE

3. Third slide: ask them if it is an action, they are willing to take or not. Once again, they choose between yes or no.



Recycling everything you can has an impact on climate change



AGREE

DISAGREE

4. Start over with a few other actions from the list and then discuss:

- Are they surprised about some factors contributing to climate change?
- Do they think sufficient efforts are made? Are they willing to do more?
- Is there a gap between what they are willing to do and what they actually do?
- Why? What are the obstacles?

### **Taking it further**

You can also ask the participants to classify the actions:

- From the least to the most impacting on climate change in their opinion
- From the one they are the most willing to take to the one they think they will never be able to take

## Section 9. COP26 comes to school

**COP26 comes to school** : In November 2021, the United Nations Climate Conference (COP26) will take place in Glasgow, UK and the pre-COP Youth Summit in Milan, Italy.

*This COP Classroom resource brings a UN-style climate conference to school and can also be run virtually. Student teams represent a range of countries and must research, present, and debate their country pledges and climate challenges, then collaborate to raise global ambition.*



### **Activity details:**

This curriculum enrichment resource brings COP26 to life in the classroom via a sequence of three sessions:

1. **The Climate Crisis** which poses 6 questions for students to critically discuss the climate emergency
2. **From Paris to Glasgow** outlines these vital stages of UN decision making and sets out country roles
3. **COP26 comes to school** guides you and your students through your own UN-style climate conference

First requiring independent research, students will be fully immersed in the challenges, impact and urgency of the global climate crisis whilst developing soft skills (teamwork, public speaking, and collaboration) in their own conference. A teacher pack explains the detail and notes, and film links accompany each of the session power points. The student pack gives an overview of COP26 and separate country briefings.

**Time needed:** 3 x 1 hours

### **How to access and run this resource:**



- ICN provides this free resource and updates via their website resources page: <https://interclimate.org/resources/>
- To be run by a teacher with your students either in class or across tutor groups or a year group
- Make use of an on-line Pledge Board for students to say one action they will take / and one action they want to see in school as a result of taking part.

## **Benefits for students**

Through supporting students and schools to participate in model climate conference events teachers have given feedback about the benefits that extend beyond increased awareness and action on climate change:

- Confidence and ability to articulate views with peers and in a public setting
- Motivation to find out more about the topic and the impact of climate change globally
- Focus for further action in schools either as part of an eco-group or individually
- Engagement with teachers across subject areas including geography, sciences, and other humanities
- Ability to speak directly to and influence local politicians and strategic planning
- Increased in interest and experience that is relevant to further education and careers in green jobs



### **Example Agenda : COP26 comes to school (off-curriculum)**

#### **Welcome and Introductions**

1. COP26 in three parts:
  - a. Progress since Paris 2015
  - b. Raising global ambition
  - c. Action on Cities, Energy, Forests & food, and Oceans

#### **Break**

2. Local Action session: Questions to a selected panel (optional) and Pledges for action
3. Closing of Plenary: Conclusions; Observer and student feedback; Evaluation and close

## Section 10. Climate Action Log

Changes we want to help bring about in our school (look back to Reflection 6)

- 1.
- 2.
- 3.

**A. Benefits for students**

*Positive benefits including hard and soft skills*

Climate Actions:

- 
- 
- 
- 

**B. Specific benefits for schools**

*Such as curriculum enhancement, whole schools engagement*

Steps:

- 
- 
- 
- 

**C. Staff & other**

*Senior leaders and others to be involved*

Who is involved:

- 
- 
- 
- 

**D. Achievements**

*NB: Please use the I-CAN website tool to help track changes*

Target Date: (change to actual)

- 
- 
- 
- 

Please continue to expand this planning sheet as you achieve one action and move to the next.



## APPENDIX 1 – Country and subject case studies

### UK CASE STUDY: Supporting student to have a say

InterClimate Network (ICN) has worked with secondary students through engagement with model climate conference events, local action summits and in small group workshops. Young people have been supported to have a voice, act, and make decisions that are influential for themselves, in their schools and in their wider communities in relation to acting on climate change. The examples below describe the experience of two students in Reading (UK) as they engaged with ICN's activities and support.

#### Emily Smith, 6th Form Student, Kendrick School

Following participation in the Reading Model Climate Conference in 2019, a group of sixth formers from Kendrick School in Reading developed their interest and understanding further with support from ICN working to support the school eco-group

**What happened and what type of change occurred?** With support from ICN Emily and other engaged students from Kendrick School sixth form made the opening speech at Reading Climate Change Partnership's 3rd Strategy Day, June 2019, with over 100 community representatives and decision-makers present. Emily was then invited to speak at Reading Youth Cabinet's climate debate on 31 January 2020, as the cabinet shifted their focus towards climate action and broader pro-environmental work in Reading. In a Question & Answer style presentation she described how her interest and involvement in climate change and climate action had developed. Following this Emily took part in a podcast with ICN's Executive Chairman of the Board to speak about getting involved in climate action. Within this group Emily Smith described how the support from ICN and exposure to the initial conference resulted in her changing her university choice and orienting her outside school activities towards climate action and a career in this area.

**What change happened in school?** Emily described how her involvement with the school eco-committee, work which was supported by ICN sharing ideas and awareness of further sources of support locally, has led to change in school and is moving towards influencing climate action locally as a young leader :

***“ I am on my school's eco-committee, and we are working towards becoming an eco-school. Additionally, through my role on the youth council I help am on the Reading Climate Action Network carbon committee, where we are focusing on helping to make Reading carbon neutral by 2030, 20 years before the rest of the country. ”***

**What contributed to this change?** From the initial engagement through to ongoing support Emily described her participation, and the significant role played by her teacher as well as InterClimate Network:

***My Geography teacher recommended that I attend an ICN Climate Change Conference with the school. The reading and debating that we did and the speeches that I listened to started my interest in climate change."***

***[The Climate Conference] gave me a much bigger interest in climate change than I already had and inspired me to want to study it at university and go into research for my job. I changed from applying for an engineering degree to applying to a geography degree."***

#### **Muhammed El-Beik, Reading School**

ICN has worked with Reading School over the last five years to engage students in Model Climate Conferences and support climate action work directly in the school, particularly focusing on work with the Environment Lead Prefect. In 2019-20 ICN supported Muhammed El-Beik to work with a group of four students from across the year groups at Reading School to participate in Reading's Climate Change Partnership climate emergency strategy meeting in June 2019.

**How did change happen?** Muhammed led environmental action within the school which added momentum to the support that ICN was able to provide. There was also keen interest to get involved at a local level in local issues around climate action :

***On a personal level, my involvement in the event has struck a chord in this respect. Ideas such as networks across different schools address this ... These are things I intend to invest time in. The future Reading Climate Strategy must also be able to move in tandem with developments in technology. We can see this abundantly with electric cars. An increase in charging points and relevant facilities is a prime example. It is imperative that we keep up with advancements in technology to maximise the scope of future climate-related action."***

**What support helped this?** Muhammed led a team of Reading School participants at the 2019 Reading Model Climate conference, supported with resources from ICN. This followed Reading School's and Muhammed's involvement in the RCCP event. Feedback on participation was positive, building the confidence of the group enough to be able to provide a plenary speech to conclude the event :

***[The event was] tremendous in and of itself by laying the initial ground for a [Reading] plan. But it has also had an impact by affecting individuals, such as myself, to move forward with a clearer mentality of how we need to achieve our goal in making Reading eco-friendlier."***

Beyond the climate conferences Muhammed provided feedback as ICN developed its Climate Action Survey, thinking about how to increase the uptake of the survey in schools.

**What happened as a result of engagement?** Reading's Climate Emergency Strategy launched in Autumn 2020 following on from this consultation event, with firm commitments around engaging schools, students, and young people in climate action.

# REFERENCES

## Introduction

- United Nations Development Programme: SDG 13 [Goal 13 : Climate action \(undp.org\)](#) [Accessed 11-03-21].

## Section 1

- Climate Change Education (2021). [online] Available at: [www.campaigncc.org/schoolresources](http://www.campaigncc.org/schoolresources) [Accessed 1-04-21]
- InterClimate Trust (2021) Explore the Facts: The Paris Agreement. [online] Available at: <https://interclimate.org/wp-content/uploads/2019/09/EtF-Paris-Agreement-ICN-Sept-2019.pdf> [Accessed 21-03-21]
- Oxfam Guide (2018) Teaching Controversial Issues: A guide for teachers. [online] Available at: <https://policy-practice.oxfam.org/resources/teaching-controversial-issues-a-guide-for-teachers-620473/> [Accessed 21-03-21]
- Teach the Future. [online] Available at: <https://www.teachthefuture.uk> [Accessed 1-12-20]

## Section 2

- Glackin, M.; King, H. Taking stock of environmental education policy in England—The what, the where and the why. *Environ. Educ. Res.* 2020, 26, 305–323
- Prensky (2001): Digital Natives, Digital Immigrants Part 1. *On the Horizon*, 9.5
- Prensky, M.R. (2010): *Teaching Digital Natives: Partnering for Real Learning*. Thousand Oaks, Calif: Corwin
- Rushton, E.A.C. Building Teacher Identity in Environmental and Sustainability Education: The Perspectives of Preservice Secondary School Geography Teachers. *Sustainability* 2021, 13, 5321. [online] Available at: <https://www.mdpi.com/2071-1050/13/9/5321> [Accessed 14-05-21]
- Rushton, E.A.; Reiss, M.J. Middle and high school science teacher identity considered through the lens of the social identity approach: A systematic review of the literature. *Stud. Sci. Educ.* 2020

## Section 3

- BBC News guide for young people What has the Future Generations Act done for Wales?. [online] Available at: <https://www.futuregenerations.wales/wp-content/uploads/2017/01/160401-wfg-accessible-guide-for-young-people-en.pdf> [Accessed 24-03-21].
- Climate & Development Ministerials Chair's Summary (31 March 2021). [online] Available at: <https://ukcop26.org/climate-development-ministerial-chairs-summary/> [Accessed 04-04-21].

- Environmental Defense Fund (March 2021) Young activists and NHS doctors warn 'breathing kills' as London air pollution hits deprived areas and communities of colour. [online] Available at: <https://www.edf.org/media/young-activists-and-nhs-doctors-warn-breathing-kills-london-air-pollution-hits-deprived-areas> [Accessed 23-07-21]
- Figueres, C and Rivett-Carnac, T (2020) *The Future We Choose: Surviving the Climate Crisis*, Manilla Press p.8
- Giddens, A. and Sutton, P., 2017. *Sociology*. Cambridge: Polity Press
- Hon Mia Mottley, QC, MP Prime Minister of Barbados, Climate Ambition Summit (2020). [online] Available at: <https://www.climateambitions summit2020.org/ondemand.php> [Accessed 15-03-21]
- InterClimate Trust, 2020. *Climate Action Survey Pilot*. Unpublished
- Jylhä, Kirsti M.; Hellmer, Kahl *Analyses of Social Issues and Public Policy*, Volume 20, Number 1, 1 December 2020, pp. 315-335(21) Wiley-Blackwell
- NASA (2021) Facts - Climate Change: Vital Signs of the Planet. [online] Available at: <https://climate.nasa.gov/effects/> [Accessed 24-03-21]
- National Geographic (2019) Kids suing governments about climate is a global trend. [online] Available at: <https://www.nationalgeographic.com> [Accessed 24-03-21]
- Paid to Pollute The Case Against Public Money for Oil and Gas. [online] Available at: <https://paidtopollute.org.uk> [Accessed 23-07-21]
- Podesta, J. (2019) The climate crisis, migration and refugees. [online] Available at <https://www.brookings.edu/research/the-climate-crisis-migration-and-refugees/> [Accessed 23-07-21]
- Robinson, M. (2015) What is climate justice? [online] Available at: <https://www.weforum.org> [Accessed 15-03-21]
- Schuppert, F. (2012 ) University of Zurich's Centre for Ethics with UNICEF-IRC. [online] Available at: <https://www.unicef-irc.org/article/920-climate-change-and-intergenerational-justice.html> [Accessed 24-03-21]
- Setzer, J. and Byrnes, R. (2020) *Global trends in climate change litigation: 2020 snapshot*. London: Grantham Research Institute on Climate Change and the Environment and Centre for Climate Change Economics and Policy, London School of Economics and Political Science. [online] Available at: <https://www.lse.ac.uk/granthaminstitute/wp-content/uploads/2020/07/Global-trends-in-climate-change-litigation-2020-snapshot.pdf> [Accessed 24-03-21]
- UNICEF (2019) FACT SHEET: The climate crisis is a child rights crisis. [online] Available at: <https://www.unicef.org/press-releases/fact-sheet-climate-crisis-child-rights-crisis> [Accessed 24-03-21]
- Well-being of Future Generations (Wales) Act 2015. [online] Available at: <https://www.futuregenerations.wales>[Accessed 24-03-21]
- Youth Climate Case v 33 Countries Portuguese young people versus 33 countries. [online] Available at: <https://youth4climatejustice.org> [Accessed 24-03-21]

## Section 4

- Lambert, D.; Solem, M.; Tani, S.(2015) *Achieving Human Potential through Geography Education: A Capabilities Approach to Curriculum Making in Schools*. *Ann. Assoc. Am. Geogr.* 2015, 105, 723-735
- Oxfam Guide (2018) *Teaching Controversial Issues: A guide for teachers*. [op.cit]

- Thoughtbox Education (2021) Climate Curriculum. [online] Available at: <https://www.thoughtboxeducation.com/climatecurriculum> [Accessed 14-04-21]

## Section 5

- Gulbenkian.pt (2021). [online] Available at: <https://gulbenkian.pt/uk-branch/wp-content/uploads/sites/18/2021/04/Public-Engagement-for-Net-Zero-A-Literature-Review.pdf> [Accessed 26 July 2021]
- InterClimate Trust, 2020. Climate Action Survey Pilot. Unpublished
- International Panel on Climate Change (2014) Synthesis Report Summary for Policymakers, p.27 [online] Available at: [https://www.ipcc.ch/site/assets/uploads/2018/02/AR5\\_SYR\\_FINAL\\_SPM.pdf](https://www.ipcc.ch/site/assets/uploads/2018/02/AR5_SYR_FINAL_SPM.pdf) (ipcc.ch) [Accessed 17-03-21]
- International Panel on Climate Change (2018) Special Report on Global Warming of 1.5°C Summary for Policymakers, Section C. [online] Available at: <https://www.ipcc.ch/sr15/chapter/spm/> (ipcc.ch) [Accessed 17-03-21]
- Michie, S., Atkins, L. and West, R., 2014. The Behaviour Change Wheel. [S.l.]: Silverback Publishing
- Norgaard, K., 2018. The Sociological Imagination in a Time of Climate Change. Global and Planetary Change, 163, pp.171-176
- prochange.com (2021) Transtheoretical Model (or Stages of Change) - Health Behavior Change. [online] Available at: <https://www.prochange.com/transtheoretical-model-of-behavior-change> [Accessed 26-07-21]
- The Centre for Climate Change and Social Transformation (2021). [online] Available at: <https://cast.ac.uk/> [Accessed 26 July 2021]

## Section 8

- Michie, S., Atkins, L. and West, R., 2014. The Behaviour Change Wheel. [S.l.]: Silverback Publishing
- Norgaard, K., 2018. The Sociological Imagination in a Time of Climate Change. Global and Planetary Change, 163, pp.171-176.
- prochange.com (2021) Transtheoretical Model (or Stages of Change) - Health Behavior Change. [online] Available at: <https://www.prochange.com/transtheoretical-model-of-behavior-change> [Accessed 26-07-21]
- The Centre for Climate Change and Social Transformation (2021). [online] Available at: <https://cast.ac.uk/> [Accessed 26 July 2021]