



Joining the Dots

competition Because climate change is not just about the environment



CONTENTS	Page 1	Introduction for teachers
	Page 2	Links to the New Zealand curriculum
	Page 2	Competition details
	Page 3	Background information Our changing climate How Government works Why is this useful? Engaging with Government
	Page 9	How to <i>Join the Dots</i>; an example
	Page 10	Activities
	Page 13	Wrapping it up

INTRODUCTION FOR TEACHERS

Climate change is not just about the environment. The ‘Joining the Dots Competition’ is an opportunity for students to learn about the climate through the lens of a specific government agency, and to learn about government through the lens of climate change. Our hope is that in using these resources students will feel equipped to engage with the decision makers who are setting the direction of their future. As they create their artwork the students should be able to articulate the connections between their chosen agency and climate change. Their art may even educate others when exhibited in parliament at the end of the year. Art work from a previous competition is still being exhibited around the country.

We hope that this resource kit will give you a good starting point for ‘joining the dots’. By no means does it cover all aspects of either climate change or the government so we encourage you to explore the additional resources page, or just get in touch with us. We are happy to help out by email, phone or skype.

‘Joining the Dots’ comes under the umbrella of the ‘Civics in Schools Competition’. Each year, the competition is shaped around a contemporary civics issue as a way of engaging, teaching and mobilising students. For further information on the Civics in Schools Competitions, please contact Grace at joiningthedots2016@gmail.com

LINKS TO THE NEW ZEALAND CURRICULUM

The Civics Education model is primarily linked to the social science curriculum. Social Science focuses on “*how societies work and how people can participate as critical, active, informed, and responsible citizens*”¹. In understanding the ways in which our government system works and interacts with issues such as climate change, students gain an insight into how societies function, are organised, and how they can get involved.

This resource also contributes to *The New Zealand Curriculum*'s vision, values and key competencies of: ‘relating to others’, ‘participating and contributing’, and ‘thinking critically’. Our vision for students is that they are actively involved as participants in their communities, and are better equipped to have their voice heard in civic matters. To this end, the competition material this year is quite focused on how government works and the different ways to be involved.

COMPETITION DETAILS

Who? Anyone school aged can enter. Entries can come from individuals, groups or classes.

When? The competition closes on Friday 21st October. But we'll take your completed entries at any point in the year.

Why? We encourage you to enter. We think it's pretty worthwhile, and hopefully will act as an effective tool for learning. It's free to enter. Entries can come from individuals, or as a class.

What? Before you get those creative juices flowing, flick an email to joiningthedots2016@gmail.com to let us know. That way we can keep you in the loop with exciting updates.

To enter, entrants will need to:

1. Create a piece of artwork demonstrating how climate change connects with and impacts a government agency of their choice. See the example on page 7.

The piece of art can come in whatever form you feel best conveys the theme and your message. From a painted picture to a clay model – it's your choice.

Research the work and responsibilities of your chosen agency. Look up their websites,

ring them, and get in touch with the national and local libraries who can point you towards more information. Knowing your subject well will help you make those connections.

2. Once you are done, take up to three photos of your artwork. Please ensure that when you take the photos, they are in high resolution. One photo should have the artwork filling the frame, and a second photo with an object or person next to it to give us an idea of size. The third photo is optional.
3. Write an explanation. This should include which government agency was chosen, and how the artwork connects that agency to the impacts of climate change. Diagrams are cool too. Keep it short and sweet – no more than 500 words.
4. You'll need to email us the following to Grace at joiningthedots2016@gmail.com
 - Photos
 - Written explanation
 - Names of students/classroom who produced artwork
 - What school you are from
 - Teacher's contact details

JUDGING CRITERIA

1. Creativity

Is your entry a real masterpiece? Does it catch the viewer's eye and engage them?

2. Conveys the message

Does your entry clearly show the connections between your chosen government agency and climate change? Does it demonstrate a deep level of comprehension?

PRIZES

There are two categories – Primary and Secondary. A first and second place will be awarded in both.

1st prize: \$500 in book vouchers

2nd prize: \$300 in book vouchers

As well, you'll receive much kudos, glory and pats-on-the-back...

BACKGROUND INFORMATION

The following information is roughly divided into three areas – climate change, how the NZ government functions, and how we engage in government's decisions around climate change.

OUR CHANGING CLIMATE

What is Climate Change?

'Climate' describes the long-term conditions of a wider region – it looks at the big picture. It takes into account the average temperatures, rainfall and other conditions. Weather, on the other hand, is local and temporary. Rain, snow, wind and hurricanes happen at a particular time and place.

Climate change can describe any process which modifies the climate system, but today the phrase is mostly used in reference to man-made global warming.

So what's happening to the world?

Have you ever walked into a glass greenhouse and been surprised at how warm it is in there? The glass lets the sun in but keeps the heat inside ensuring perfect growing conditions. Within the atmosphere that surrounds the earth,

there are certain gases naturally present. Like a glass greenhouse, these gases let the sun pass through but absorb the heat. Without these gases, the earth's surface would freeze.

However, due to human activities, more of these gases are being released. The industrial revolution saw many exciting innovations. However, more coal, oil, natural gases and resources were needed to power homes, factories, vehicles, and other activities. This increased the amount of greenhouse gases in the atmosphere. With more gases absorbing heat, more heat is retained, warming the earth's surface. Since the late 19th century, the earth's temperature has risen at a quicker rate than any other time in recorded history.

There are consequences for a warmer earth. Rising sea levels, retreating glaciers, increased floods and droughts, and shifting wildlife are indicators of a world which is heating up. Each of the last three decades has successively been the warmest on record.²

Climate change isn't just an issue for environmental scientists. It presents a challenge to everyone. Whether directly or indirectly, it spins a web of interconnected challenges which impact all areas of life.

HOW GOVERNMENT WORKS

Every day we are affected by decisions that the government makes – from going to school, how old we have to be to get a driver’s licence, and even how many public holidays there are! When it comes to climate change, there’s much that individuals can do in their homes and communities. But it’s important to understand that our government also has a big say in how we address climate change. Good news though – we can have a say in this. Understanding how the government works makes us better able to be involved.

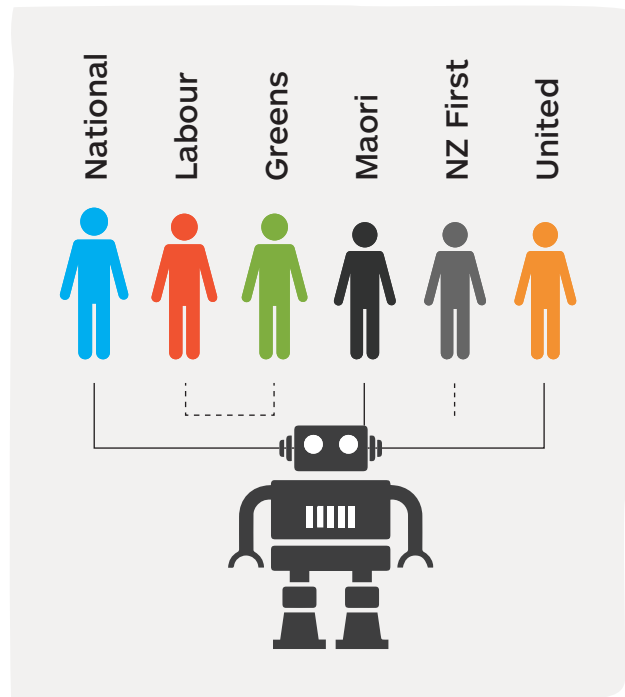
The breakdown

What we think of as ‘the New Zealand Government’ is actually three different parts working together. Like any good team, each part has a different role with their own powers and abilities.

1: Parliament:

Have you ever seen a movie or television show with a big robot which is actually controlled by just a few small people inside the robot’s head? Parliament is somewhat like this. The different political parties make up Parliament – which is like the big robot. How we vote dictates how the proportional size of each political party within Parliament. After the elections, the political party, or the group of parties who get together, who make up the majority of Parliament, can form the government. Government is a little bit like those people sitting inside the robot’s head. They can decide what will be discussed. However, only Parliament, not the government, can actually make laws. There are checks and balances on power within our system. The smaller political parties keep an eye on the government, try to work out better ways to run the robot, and occasionally complains that they are not in control...

The job of Parliament is to use their powers to make strategic decisions and set direction. Heightened senses tell them when the public is becoming unhappy or when the wind changes direction – they’re a sensitive sort of robot.

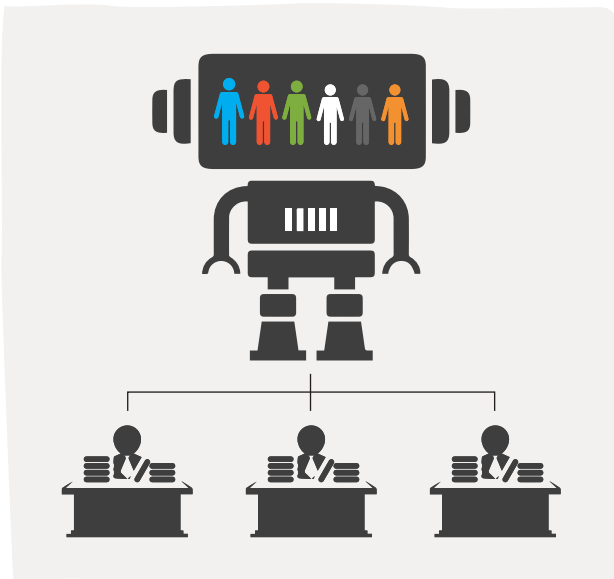


2: The Agencies (Departments and Ministries)

The government agencies do all the heavy-lifting, and pay microscopic attention to how the laws work in practice. The Agencies are like Ant-man, controlling the workers and getting the work done. They are not aligned with any political party. They just get on with the work set for them. Within the strategic direction set by Parliament, the departments are sometimes told to work out how they will go about their work.



Whichever party or parties are in charge of the robot, gets to choose one person to oversee each government agency. These are the ministers.

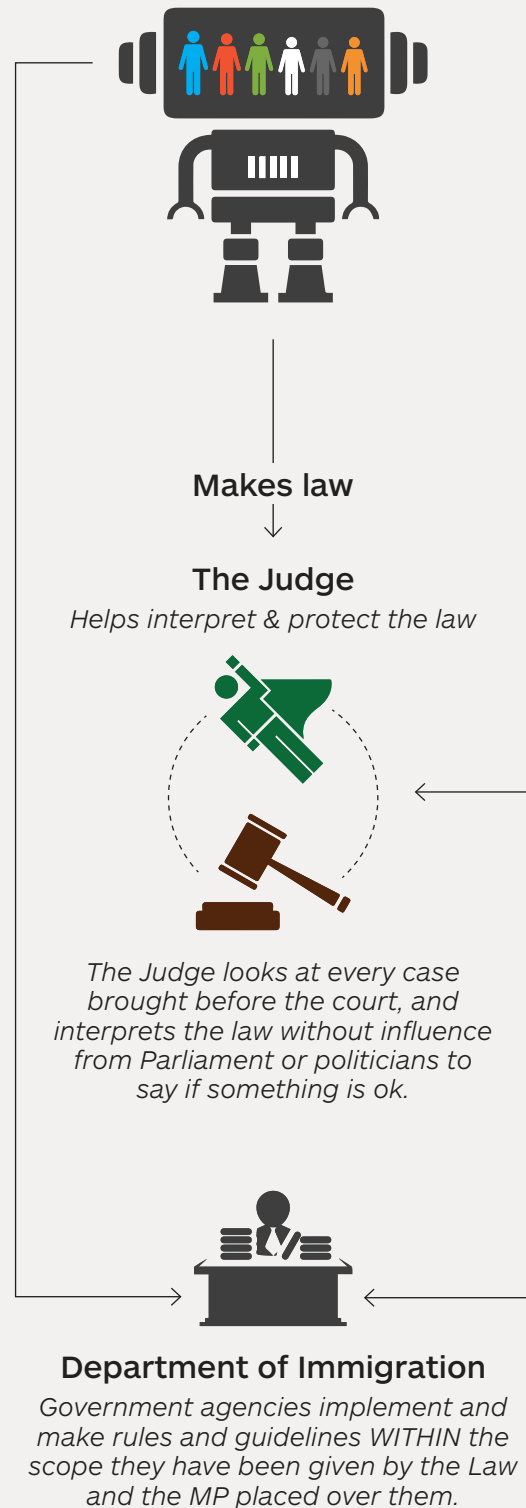


3: Legal system

Once the robot (Parliament) sets laws, the legal system makes sure they are being followed. Even the robot cannot break laws once they are set. The legal system is independent and free from interference from Parliament. Judges decide on every case that comes before them to determine if it is inside the law or not. Let's call this hero 'the Judge' – standing in the corner looking mysterious. If Parliament makes a law, and the agencies start to put it into action, it is possible for someone to take them to the Judge to make sure their interpretation is right.

So to sum up...

The controlling party/s in parliament sets direction and puts a Member of Parliament (MP) from their team over each agency. Then all of Parliament debates and makes laws.



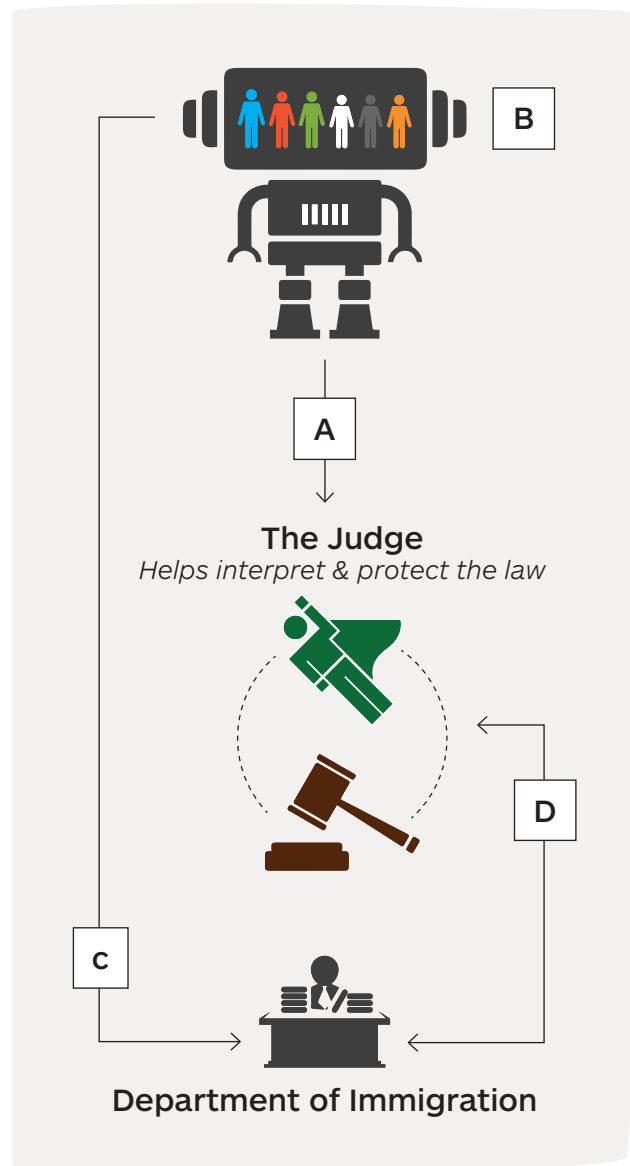
Applying this to the classroom... If robots and diagrams aren't your thing, try this... In a class, the teacher might create a law that 'we will respect each other'. The teacher might not name everything you can't do, nor everything you can do that would be respectful. The teacher may then ask the class to work out how 'respect' will work in practice, and to roll this out school wide. As a class you then decide that ignoring people, spitting, and rolling your eyes is not allowed (rules) because they are not respectful (the law). To roll it out school wide, because there hasn't been clear instructions, you decide to make posters. As a class you are making decisions within the framework given to you. The teacher is acting like parliament and the class like the government agencies.

Someone in another class is fined for rolling their eyes. This person disagrees that this is disrespectful, so they go to the Judge. The Judge looks at the law of respect including the definition, and decides if eye-rolling really breaks the law, or if the class were wrong. Not even the teacher can influence that decision. The teacher could, however, make a new law banning eye rolling, or amend the law defining respect to include eye rolling. Then the Judge would have to make a different decision.

SO WHAT? WHY IS THAT USEFUL TO KNOW?

Knowing how government works is useful because there are ways to get involved in decision making in New Zealand and have your voice heard. Whenever you try to convince anyone of something, yelling your opinion doesn't work. We need to learn to say things in a way which meshes with the concerns of the person we are speaking to. For example, speaking to someone concerned about popularity might be very different to speaking to someone concerned about efficiency. There are different ways we can be involved in this decision making process. It helps to know who you are speaking to.

- A: Submissions: Parliament invites public opinion on issues they are currently making laws about
- B: Convincing Parliament that there is something they should prioritise making a law about
- C: Meeting or writing to the MP responsible for the agency you are concerned about
- D: A specialist area - having a look at an agency or government action and checking it against existing laws



Have a think about how you might change the way in which you present your view in each of these different areas because of who you are talking to, what their job is, and what their superpower is.

A: Submissions

A submission happens when there is a particular law that the government is working on.

Government forms a committee called a *select committee* drawn from all political parties, not just the team currently at the controls. They invite you to tell them what you think. It is a vital part of a working democracy.

Writing a submission to parliament can be a rewarding and empowering experience. The proposed law is called a Bill. They will debate and rewrite it three times before a final vote. You can have a say between each rewrite. If something comes up, and you feel that your opinions on the changing climate would contribute to the discussion, why not write in?

It really is easy, there are just a few things that need to be included:

- Name the Bill you are writing about
- Say who you are, how many people you represent and who you have spoken to.
- Whether you want to speak about your submission in person or on the phone if the opportunity arises. This gives you a chance to talk directly to the politicians making the decision. Definitely do this. It is a great experience.
- Say clearly what you think should be in the law.

Two copies should be sent to parliament. All the Bills coming up for debate and submissions can be found here www.parliament.nz/en-nz/pb/sc/make-submission. We will also be putting them up on our *Joining the Dots* Facebook page in simplified language. Also, if you let us know in advance what agency (department or ministry) your class is going to look at we will email you if anything comes up you could submit on.

B: Convince government they *should* work on an issue.

1) Talk to your *local* MP.

Part of their job is to listen to you and take your concerns back to Parliament. If it is an opposition MP, your goal is to convince them it would be a good issue for their team to take up on your behalf in parliament – they have many more ways to do this than we do. You could also make an appointment to go to their office if they can't come to your class.

If you invite the local MP from the team in charge of parliament, you'd want to convince them to take it directly back to their team-mates.

Before you meet, you will need to make a plan. Politicians are very good at saying what they want to say, and convincing you of their point rather than hearing yours.

So practice in advance:

- What is the problem?
- What is your solution?
- Why do you care about it?
- What you want them to do?

You should be able clearly say these 4 things in 59 seconds! You can talk further, but this clear summary is vital. So practice, practice, practice! Get it under the minute mark!

Afterwards it is useful to ask yourself:

- Who actually set the agenda for what was discussed?
- Did you feel heard?
- Did you get answers to questions you asked?

There is a contact list for all the MPs and the areas they represent here: www.parliament.nz/en-nz/MPP/

2) Start a petition

The idea behind a petition is to show government that so many people care about an issue, that they should make it a priority.

Something like this won't work straight away, but it will get many more people talking about your idea. The more people who know about it and talk about it, the more chance that government will talk about it.

Your petition has to be signed by at least one person and addressed to Parliament (no age restrictions!).

- Clearly state what action you would like to happen.
- Using a petition website like www.change.org or www.avaas.org will help focus your petition
- Start taking it around to gather signatures! Ask family, friends, school mates, teachers, neighbours... anyone! Be willing to discuss and tell them why you're passionate.
- Have more information available so people can ask for more details.

3) Protest

It is worth mentioning that even protests are a necessary part of democracy. There are times when a mass movement of people have put pressure on a government (who are our public servants) to act. Gandhi, Martin Luther King and Te Whiti O Rongamai are historic examples. Even when we disagree with what protests are about, it is fantastic to be in a country that allows and takes them seriously.

C. Contact the MP directly responsible for the issue you are concerned about

By writing to the MP who is responsible for the issue you are concerned about, you are trying to present them with a solution to a problem. Hopefully, the MP will then direct the department they are responsible for, to look into your concern and give them advice. If enough people do this, the MP may also report back to the rest of government that lots of people are concerned.

The biggest barrier is that MPs are busy. Crazy busy. So your letter should be clear and brief.

- What is the problem?
- What good idea have you had which could be a solution?
- Is there any research to show it would work?
- Keep it clear, short and polite.

Do some research on the MP. What are they trying to achieve? What arguments have they made about the issue? Writing how your idea would benefit them or their party in your letter, is a really good idea. And to do that, you need to know about them.

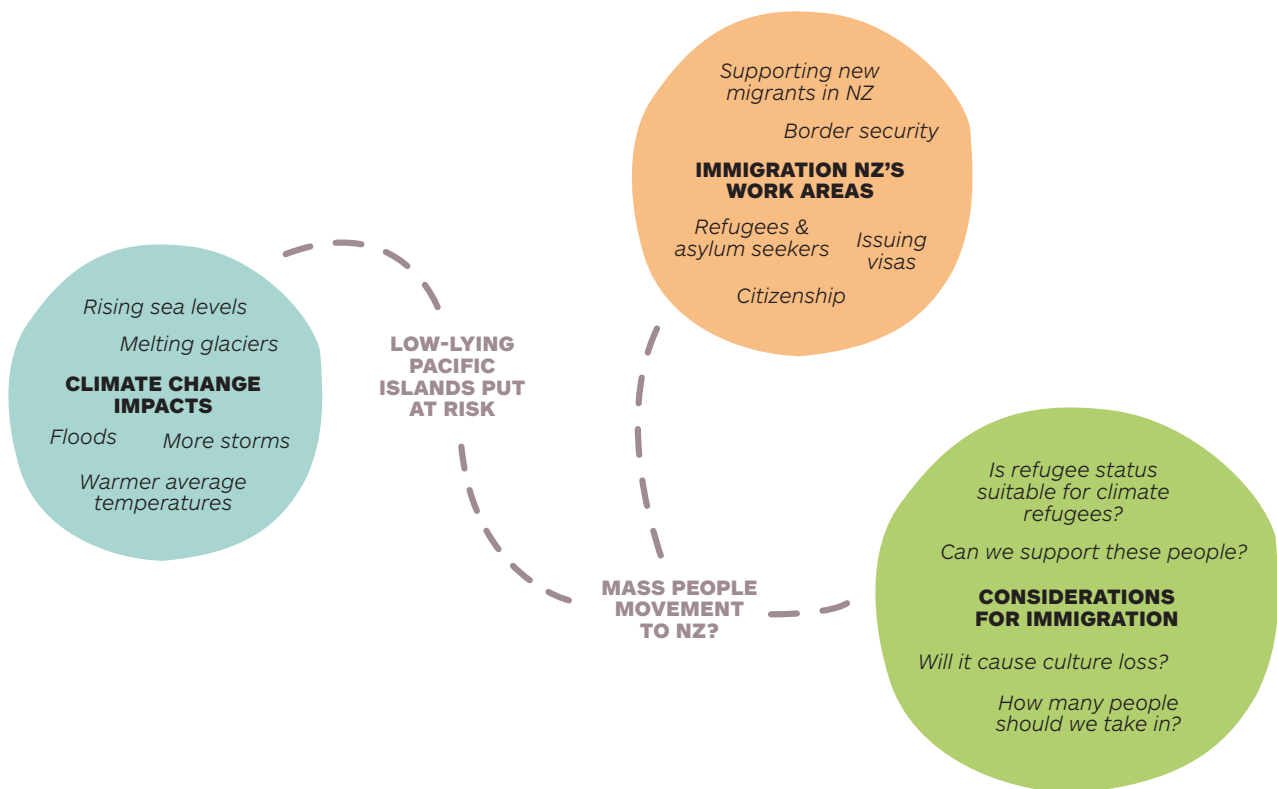
The other possible reason to write is to offer encouragement. MPs do a difficult job and often only hear complaints. So if you like something they've done, tell them!

D. Analyse a Department's policies

Departments need to follow the laws which are set by Parliament. To do this, they create policies which translate the law into practical guidelines for the way that their agency runs. Some people specialise in looking at what Parliament and government departments are doing and seeing if it is in line with what they are allowed to do. If not, they take it to court for a judge's ruling.

If you have an idea for a policy which would better reflect the law, you can email that agency. If you are unsure of how agencies go about creating policies, or keeping them aligned with the law, why not email them? This element of engagement, may be beyond the scope of students, but it is good to clarify that contacting government agencies for information is very possible.

HOW TO JOIN THE DOTS; AN EXAMPLE



This diagram is by no means a piece of art. But these are the sort of connections that we're looking for in the competition. We choose Immigration NZ as an example. The trick now would be turning this into art... perhaps a nice collage of news articles and photos would do the trick? Or maybe a painting?

To help you pick a government agency we have listed some of the key ones. This isn't a complete list. Feel free to have a scout around for other ones. There are some agencies who are currently more engaged with climate change issues. The Ministry of Environment is an obvious one. They lead the coordination and development of the government's climate change policy. As well, the Ministry of Transport leads work around investigating alternative fuels, and more efficient transport. The Ministry of Primary Industries is involved in administering the Emissions Trading Scheme. And there are

other agencies like these ones. However, there are agencies which are a little more left of the climate change field. Picking the IRD or the Ministry of Justice would be a good out-of-the-box choice! Hey... it might even win you some bonus points.

- Ministry of Primary Industries
- Ministry of Transport
- Ministry of Justice
- Department of Internal Affairs
- Ministry of Civil Defence and Emergency Management
- Ministry of Foreign Affairs and Trade
- Ministry of Health
- Ministry of Defence
- Ministry of Business, Innovation and Employment
- Ministry of Social Development
- Ministry of Education
- Inland Revenue Department

ACTIVITIES

These activities and games are a mix of learning about climate change effects, civic engagement, and understanding the complexities of issues such as climate change.

MORE ABOUT CLIMATE CHANGE

There's an abundance of quality games and activities on-line which explore climate change. Instead of reinventing the wheel, we've gone through these games and given you our very top picks.

Connections between climate change and human activity:

- Explore the web of connections between the natural and built environment (Secondary) scied.ucar.edu/activity/connections

To learn more about the power of solar energy and the glasshouse effect:

- Make some s'mores (Primary): climatekids.nasa.gov/smares/
- Glasshouse in a jar (Secondary): forces.si.edu/atmosphere/pdf/Atmo-Activity-7.pdf

Learn more about your carbon footprint:

- Carbon footprint calculator (Primary): calc.zerofootprint.net/
- Carbon footprint calculator (Secondary): www.carbonzero.co.nz/calculators/
- Genesis energy education resource on carbon footprints: www.schoolgen.co.nz/pdf/EE_L5-6_FS_Carbon.footprint.pdf

Short clips to watch:

- www.youtube.com/watch?v=ko6GNA58YOA
 - The Great Barrier Reef is just one example of how an ecosystem is affected by climate change. Can you think of some other examples of ecosystems (especially here in New Zealand) which are being affected?

- If people could see greenhouse gases like in the film, do you think people would be quicker or slower to react to the causes of climate change?

- www.youtube.com/watch?v=r6uMUJfYiM4
 - Before watching this short clip, give students the two titles: "Human actions contributing to Climate Change" and "Effects of Climate Change". As they watch this film, have them note down anything which they see which fits under these headings. And yes, we know the film is a wee bit cheesy but there's some goodness in it.
 - As a class, compile a big list of all the ideas under these two headings. Next to the human activities, think about ways that the government could influence peoples' decisions. If they offered better public transport systems could that change the way we travel? What would happen if they offered subsidies on eco-friendly appliances? If businesses had to recycle and reduce their emissions? Bike paths were built all over the city?

For more videos, activities, & information make sure to keep tabs on our Pinterest page at pinterest.com/joiningthedots6

Other:

- From Action Aid UK, PowerDown is a great set of climate change resources for teachers: powerdown.actionaid.org.uk/
- Check out the *Climate Challenge* online-game. As the president you need to create laws to tackle climate change while managing to stay in power. Do you reckon you'll have what it takes? A good way to get students discussing different government climate laws and policies, and to gain a perspective of the different costs of each change. Perhaps being a politician is trickier than we thought? www.bbc.co.uk/sn/hottopics/climatechange/climate_challenge/

COGS IN THE MACHINE

A simple game to induce a bit of chaos and teach about the domino impacts of climate change.

Each person in the class picks two other people, keeping their choices secret. Pick a space such as the classroom which the students can move around in. Tell the group that they need to move around. As they do this, the teacher is able to go around a tap somebody on the shoulder. If tapped, this person sits down. If someone else in the classroom chose this person, they also need to sit down. As more and more people are tapped and sit down, there'll come a point when the game ends.

The point at which everyone sits down may change with each game depending on who the teacher taps.

Teaching: Imagine that each of your students represents a cog in the ecological system. Perhaps one is rainfall, another a desert, another the sea level. As the teacher comes along and taps a student, this represents climate change impacting this cog. But just like a machine, there's more than one cog, and these cogs impact the way that the others function. So as one student sits down, others have to too. The duration of the game depends on who the teacher taps and in what order. Climate change impacts ecological systems differently. It is hard to predict the exact flow-on effects, and the timeframe which these will happen within. Bit by bit, as climate change wears down our world, all areas will be increasingly affected.

ELEVATOR PITCH

Think of a problem. It could be anything from not having a long enough lunch break, not being able to find lost homework, sea-level rises for communities, or anything. Now think of a way to solve that problem. Solutions could involve the development of an app, a charity, an invention, or just a new way of doing something.

If these students were stuck in an elevator with someone who could make their solution reality, how would they quickly communicate to them? An elevator pitch is being able to convey a message and convince someone in the time it takes to ride an elevator to the top of a building. Students need to explain the problem, their solution, why this person should support them, and what they want them to do now.

The key to nailing your elevator pitch is to practice, practice, practice. Pitch it to your teacher, your friends, your principal, and your family. Being clear and concise is so important for engaging with civic life, getting a job, or getting people to invest in your solution.

PROBLEM TREE

Break students up into smaller groups. They'll either need to draw a tree or find an online template.

On the trunk of the tree have them write the problem under discussion. In this case: 'Climate Change.'

On the roots, have them write some examples of what is causing climate change.

- Examples: Human activities (deforestation, burning fossil fuels, transport, household emissions..), Natural activities (forest fires, ocean currents..)

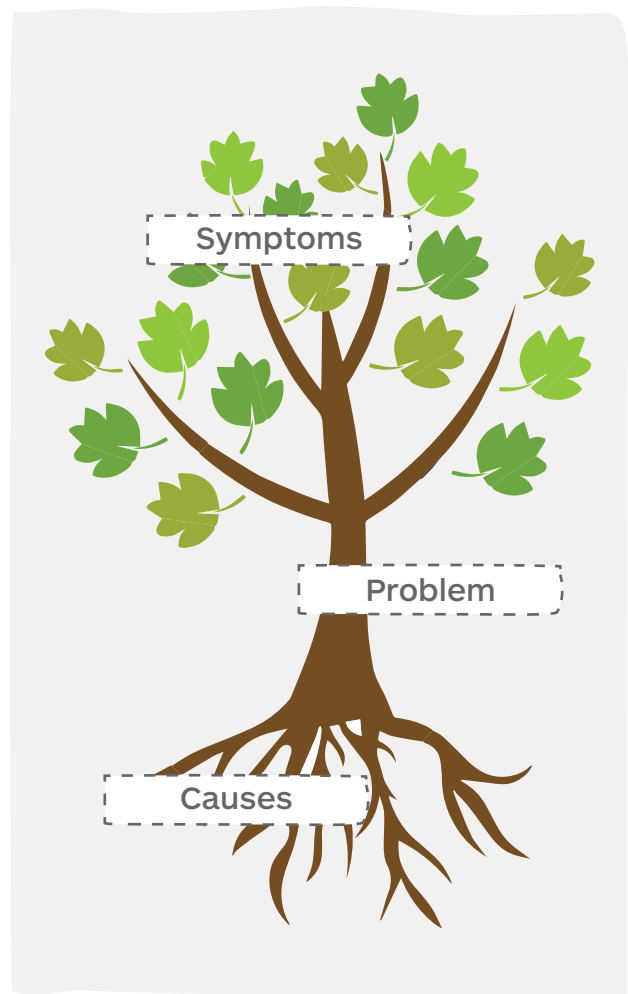
To show how connected things can be continue to ask questions like *"why is that happening?"* and *"what will happen because of this?"*.

- Examples: Deforestation might be caused by pressure to grow food, which in turn might be caused by an increasing population or possibly even greed.

On the branches have the students brainstorm ways in which climate change affects the earth, and how this affects people and societies.

- Examples: Rising sea levels, desertification, more extreme weather events, raising temperatures, glaciers melting.

If you want to do this exercise as a class, sticky notes are great as then can be moved around, and everyone can add their ideas. This exercise shows there are lots of ways to be involved in the same problem, either at the level of a symptom or cause depending on your resources and skills.



WRAPPING IT ALL UP

It felt a bit abrupt to just finish off the teacher's pack without a last comment. We realise that this pack and competition is heavy on the politics. Lots of explanations of how the government functions use the 'executive, legislative and judicial' language, and it's important to understand these terms. But let's face it, understanding them in terms of robots or in the classroom environment is a lot more fun, and hopefully a little easier for students to understand. Below are some further resources to check out which give more depth on New Zealand's system of government:

- www.newzealandnow.govt.nz/living-in-nz/history-government/central-government
- www.elections.org.nz/voting-system/new-zealands-system-government
- www.govt.nz/browse/engaging-with-government/government-in-new-zealand/
- www.teara.govt.nz/en/nation-and-government/page-4
- www.parliament.nz/en-nz/about-parliament/how-parliament-works/fact-sheets

We are available to help – whether you need help picking a good government agency, you'd like further resources, or simply you want to chat something through. All the best with your competition entry and learning process!

Contact:

joiningthedots2016@gmail.com

Facebook:

www.facebook.com/joiningthedotscompetition

Pinterest:

www.pinterest.com/joiningthedots6