Wonder Project Power Challenge

How to be an online ambassador

Our priority is to make sure that every ambassador can participate in the Wonder Project safely, and that we can find a match for all our kura. That's why we offer the option to participate as an online ambassador.

What is an online ambassador?

The role of a Wonder Project Ambassador, whether online or in person, is to support a class as they work through a Wonder Project challenge and inspire rangatahi with their passion for STEM.

Our online ambassadors will inspire a class via video chat. While the challenge itself is largely hands-on, there are still plenty of teaching points you can cover on screen. Before the challenge, please pānui/read through the challenge guide. It covers your role as an ambassador, and which parts of this role can be carried out online. In the challenge guide overview tables for each module, find the 'ambassador role' section. Anything with a computer icon can be delivered online.

How to get started

Just like our in-person ambassadors, it's between you and your matched kaiako/teacher to decide how you spend your time in the classroom. Connect with them before the challenge and cover:

- What video chat software you'll use. We suggest Zoom, Microsoft Teams or Google Meet.
- Lesson plans.
- At what point of the lesson your volunteer time will be most valuable:
  - You might choose to be present for the first 30 minutes of each lesson to introduce the module and cover off any of the trickier STEM concepts. Then, be on call to answer any pātai/questions that might pop up throughout the lesson.
  - You could remain online for the duration of each lesson.
  - Or, you can pick and choose which parts of the challenge will require your support. We have outlined some suggestions below.

As you get to know your matched class better, you may adapt your approach to suit their learning style.

The Power Challenge

The Power Challenge is split into six modules to structure the ākonga learning journey. Modules 1, 2 and 3 are largely theory-focused and are the most important modules for you to be present in.

Modules 4, 5 and 6 consist of mostly hands-on activities and can be skipped if your matched class feels confident enough on their own.

How to make the most of each module online

The following lists cover the parts of each module we suggest online ambassadors focus on. Each list should take around 30 minutes to complete. This may not seem like a lot of time, but the priority is being concise and impactful. The tamariki will be so excited to meet you, however it is worth remembering that their attention spans are shorter than ours!

These suggestions are taken from the challenge guide. You are welcome to choose alternative activities to focus on – please ask your kaiako which parts of the challenge would benefit most from your support.

Module 1

- Meet the class and share your career story presentation – please ensure you are present for this.
- Run a pātai time session. We suggest a maximum of 10 pātai that ākonga have pre-decided.
- Explain forms or energy. Support the explanation by sharing a video or pictures on your screen. You could share pictures of you at mahi or pictures that show the concept in an Aotearoa context.
  - Less is more – videos should be under 3 minutes and if you're showing pictures, pick 1–10.
- Ask the kaiako to email you the learning or photos from each rōpū. Reply with some kupu/words of encouragement to grow your connection with the class beyond each module.

Module 2

- Start by sharing something significant you've done at mahi this week or recently.
- Share your screen with the class and show any Module 1 mahi or pictures the class sent through. Share positive constructive comments that relate to the Engineering Design Process for each.
  - Eg "I love the teamwork shown in this picture" or "I can see that you persevered in solving this problem".
- Ask ākonga 2–3 pātai on Module 1 learnings.
- Explain how STEM powers our hapori OR give a brief overview on renewable and non-renewable energy.
- Run another pre-decided pātai time session (maximum of 5 pātai).
- Ask the kaiako to email you the Module 2 learning or photos from each rōpū.

Module 3

- Share something significant you've done at mahi recently.
- Share your screen with the class and show any Module 2 mahi or pictures the class sent through. Share positive constructive comments for each one. Try to highlight different rōpū than you did the week prior.
- Support ākonga to understand how a turbine works, including drag and lift, and aerodynamics. For example, ask pātai on force:
  - When you put your hand out of a car window, what do you feel? Is this drag or lift?

- When a kite is pulled into the air, is this drag or lift?
- How might these forces impact a turbine's performance?
- Ask ākonga to share what aerodynamic features they might test on their wind turbine blade designs.
- Ask the kaiako to email you the Module 3 learning or photos from each rōpū.

Module 4

- Share a fun fact about yourself or play two truths and lie. Your class will love learning more personal facts about their role model.
- Share your screen with the class and show any Module 3 mahi or pictures the class sent through.
- Explain how the National Grid connects our homes with power OR give a brief overview on turbine pitch.
- Explain the importance of iterating and improving as a STEM professional and wish ākonga well with their turbine creation and testing.
- Ask the kaiako to email you the Module 4 learning or photos from each rōpū.

Module 5

- Ask ākonga a 'would you rather' pātai.
  - Eg, would you rather… study animals or lava?
- Share your screen with the class and show any Module 4 mahi or pictures the class sent through.
- Explain a time that you've improved on an idea at mahi.
  - Ask pātai: Why do you think it's helpful to test and improve your ideas? How will you improve your turbines?
- Ask the kaiako to email you the Module 5 learning or photos from each rōpū.

Module 6

- Do a 'show and tell' with a prop from your mahi and explain how it works.
- Share your screen with the class and show any Module 5 mahi or pictures the class sent through.
- Get each group to share their final wind turbine design and their favourite part about it.
- Reflect on your favourite moments from across the challenge and wish them well for the final competition!
- Send a follow-up email thanking the class and sharing one final photo of yourself in any STEM based context. Ākonga will love sharing this as a class and be inspired by your career in STEM.

Tips for engaging ākonga over video

We know it's a lot harder to engage over video. So here are some tips to make the most of it:

- **Share your screen.** Switching it up between your face and relevant STEM content will keep the class hooked.
- **Have fun with virtual backgrounds.** Change your background before each lesson to something STEM related. You can ask ākonga to guess what it is or tell a story about it.
- **Live quiz/trivia.** Ask ākonga some pātai about the mahi they covered in the previous module.

Karawhiua!

The support of online ambassadors is just as valuable as those who are present in the classroom. Thank you for everything you do to inspire the next generation of STEM superstars.