

# Ripples of Change



## THE RIPPLE EFFECT

Activity

All Ages

*This activity is suitable for classroom learning, and can also be used in a less structured setting like a club or team meeting, regulation room, or at home!*

### Learning Outcomes

After completing this activity, learners will be able to:

- understand that while climate change is happening and it can feel scary, we can still make positive ripples of change for our world.
- create a beautiful nature mandala inspired by a ripple

### Length of Activity

90 - 120 minutes

### Materials Required

- Internet-enabled device

### Step 1: Introduction

Have a discussion with your class about how they feel when they think about climate change. Use the following chart to help guide the discussion:

Anxious	Sad	Angry	Determined
Bored	Scared	Frustrated	Excited
Defeated	Confused	Bitter	Optimistic
Disbelief	Overwhelmed	Apathetic (I don't care)	Empowered

Hearing about climate change can feel pretty scary, but we can't lose sight of the impact we can make if we all work together and make ripples of change for our world.

### Step 2: The Power of the Ripple

Have learners think about dropping a stone into a pond, lake or bucket. What happens to the water?

Watch this video of a water drop:

<https://www.youtube.com/watch?v=m0TUeHS8gJw>

Discuss as a class what happens to the ripples? How would you describe how the ripples move? Can you describe how a tiny water drop creating ripples is like a single person fighting for change?

Read the poem below for inspiration:

#### A Drop in the Bucket

By James W Foley

Drop a pebble in the water: just a splash, and it is gone;  
But there's half-a-hundred ripples circling on and on and on,

Spreading, spreading from the centre, flowing on out to the sea.

And there is no way of telling where the end is going to be.

Drop a pebble in the water: in a minute you forget,  
But there's little waves a-flowing, and there's ripples circling yet,

And those little waves a-flowing to a great big wave have grown;

You've disturbed a mighty river just by dropping in a stone.

## Step 3: Explain What a Nature Mandala Is

Tell your learners that they are going to be making their own nature-inspired ripple art. To do this they are going to design a mandala.

According to 100 Mandalas “ We often associate the word mandala with the circular designs that have repeating colors, shapes, and patterns radiating from the center. Mandalas can be precise, carefully measured, geometric, and perfectly symmetrical, or in contrast, free flowing, organic, and asymmetrical. Mandalas are often drawn in circles but they can also be drawn in squares.”

<https://100mandalas.com/what-is-a-mandala/>

Explain to your learners that the benefits of creating mandalas include:

- Relaxing the body and mind
- Cultivates the feeling of happiness, inner peace, and general well-being
- Eases feelings of stress, anxiety, worry, overwhelm, fear, and depression
- Activates creativity and improves focus
- Enhances self-esteem and self-acceptance
- Fosters a sense of connectedness with one’s self and others
- Improves sleep
- It’s fun!

Show your learners these examples of nature-inspired mandalas for inspiration:



And one more:



(Source: <https://www.shellypjohnson.com/creating-nature-mandalas-a-contemplative-practice/>)

Here are some examples from a class that took part in a GreenLearning workshop on this activity:



## Step 4: Create Your Nature Mandala Ripple Art

Now that your learners are inspired by the examples, explain to them that they will be going outside to create their own ripple art.

### Provide learners with the following directions:

- The boundaries for finding nature items
- If they are to work individually or in small groups

# Waves of Change

- They can only use items that have fallen on the ground and are not attached to something
- They cannot use living animals (ex. Worms, ladybugs, etc.)
- Provide guidelines to participants about what to do if they come across litter. If picking it up is allowed and safe to do so, remind participants about appropriate disposal sites.
- The length of time they have to collect their nature items

Once they have collected all their items, have learners sort and then arrange their items into a mandala of their own design.



Source: Childhood by Nature



Source: CBC

## Step 5: Reflect

Now that the ripple art is complete, have students reflect back on the positive ripple effect they can make in their lives.

In writing, for example a poem or pledge, or as a class discussion have your learners answer the following question:

What is your ripple going to be this week? This year?

Here are some possible examples:

- My ripple this year will be to learn more about renewable energy, and share what I learned with 3 friends
- My ripple this week will be to repurpose some of the plastic from the recycling bin into something new that I can use
- My ripple this year will be to organize a school earth hour

## Variations: Adaptations for Learners

### Physical Activity:

- Amp up the **friendly competition** to get bodies moving! Can learners **work in teams** for specified time periods (ex. 2 minutes, 5 minutes) to gather as many materials as possible? *Which team gathers the most nature items? Which team creates the largest mandala?*

- Consider **gathering nature items in advance** if some of your learners may have **accessibility barriers** to gathering materials outside in a short time frame- items can be scattered across a desk within reach for learners to choose from. A variety of colours, shapes, sizes and textures to choose from can lead to a fun **sensory activity!**

## Materials:

- Don't let winter stop you! Weather and temperature permitting, **head out into the snow!** Icicles, snowballs, and footprints can all contribute to some unique nature mandalas. **Dress warm** and see what you can create.
- Outside exploration unavailable? Consider **materials you have on hand!** Participants can investigate their lockers, binders and backpacks for **recyclable material**, or head to the nearest recycling bin. This makes for a great opportunity to remind participants where the various components of their mandala should go when it's time to clean up- point out recycling and compost receptacles where available.

## Math Connections:

- For younger learners, this is a great opportunity to practice **counting, adding** and **subtracting!** Encouraging students to record the number of items they've gathered can make for a fun class discussion **comparing** and **contrasting** the makeup of each learner/group's mandala. *Who gathered the most pinecones? Why might rocks be a popular find?*
- At the middle school level, what **numeric relationships** can we find? Consider using **ratios** to help design mandalas (ex. *3 organic items : 2 inorganic items*), or asking students to calculate **percentages** and **fractions** (ex. *What percent of your mandala is made of twig? What fraction is made of leaves?*). Consider asking students to create an **algebraic expression** to guide the design of their mandala (ex.  $3n+2$ )

## Team Building and Emotional Regulation:

- Consider making this a **collaborative group** activity. Within a group of 2 to 5, participants add their collected nature items to a shared pile, and then sort the pile into groups based on criteria they choose (colour, origin, shape, etc.). Each participant takes ownership of a group, and adds items from that group to the mandala as it takes shape! **By each contributing our own small part, can something much more complex and beautiful take shape?**
- For learners seeking an opportunity to **take a break** from something or trying to **regulate their emotions**, consider offering this as an **independent activity**. This might be a great opportunity for the learner to play a favourite song while they work on their mandala, or to try out some breathing exercises as they trace the mandala with their hands and/or eyes.

## Extension

If your learners are passionate about taking further action consider signing your class up for one of GreenLearning's challenges <https://greenlearning.ca/challenges> .