



Choreograph a Waggle Dance!

Background Information

Bees are known as “**pollinators**”. This means that they work together with plants to help them make seeds, which can then grow into brand new plants. Bees do this by **carrying pollen** from flower to flower.

Not only are bees and pollinators important for keeping all our flowering plants alive, but they also help pollinate lots of the **fruits and vegetables** we eat, making them important for keeping humans healthy too! But pollinators, such as bees, need help from humans to make sure they have enough flowers to eat from. The first step to helping animals is always to **learn** more about them.



What better way to learn about bees than to choreograph your very own **waggle dance**! Bees are able to communicate with each other by performing a type of waggle dance for their fellow workers. Once the bee **scouts** (the bees that go outside the hive in search of **nectar**) get back to the hive, they use this dance to tell other scouts where they can find more yummy **flowers**! The dance is a way of communicating how far away the nectar is and in which direction other worker bees need to fly to find it.

Instructions

Start off by asking your class:

“How do we communicate with each other?”

Most students will say that we talk, but ask them if we **communicate** in any other ways (sign language, body posture, facial expressions, other noises, etc.)

Then tell your class that humans aren't the only species that communicate. Most species actually need to communicate **information** to each other.



Ask them:

“How do other animals communicate with each other?”

Some may say cats arch their backs when they are scared or that dogs growl when they are angry.

Now ask them:

“How do insects communicate with each other?”

Most will probably not know much about insects. As such, you might want to summarise the background information above.

You can then task the students to come up with their very own waggle dance! Split them up into groups of around 3 and ask them to come up with a dance that will let their group know **how far the nectar is** and in which **direction it is**. We recommend limiting distance to 1, 2 or 3 km/mi and directions to North, South, East or West for simplicity.

For example the nectar could be 2 km/mi south or 3 km/mi west. The students should be able to tell by just seeing the dance. So ideally **each distance has its own dance and each direction should have its own dance too**.

After 15 minutes, the class should gather and each group should take turns **performing** their waggle dance. You can **test their knowledge** by whispering a distance and direction to a group member, have them perform their dance and then have the other group members guess the distance and direction.

After the activity, we encourage you to bring the class together to discuss the **importance** of bees and all pollinators (including wasps and flies!) and why we need to help protect them.

We welcome feedback and would be delighted to hear your thoughts on this activity. Feel free to send an email to schools@climatescience.org and we'll be sure to get back to you soon :)

