

THE BEE DANCE

This activity needs lots of room. Try it outside!

Materials

- 4–5 treat bags (treats selected at your discretion)
- "Honey, I'd Love to Dance" handout
- Written directions to each hidden treat bag

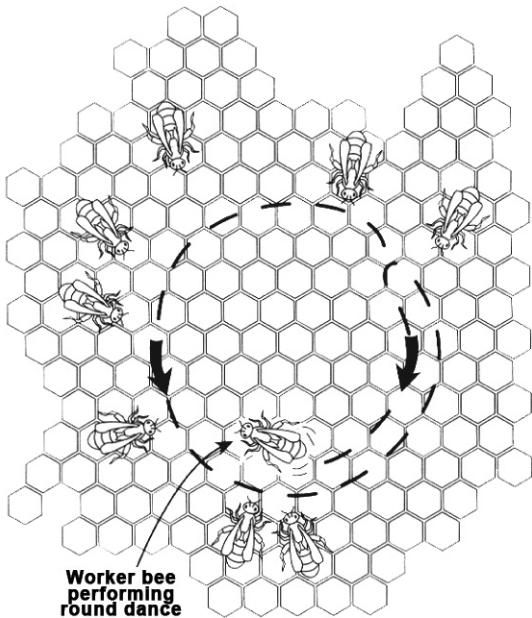
Procedure

1. Ask students how humans communicate non-verbally (body language, hand signals, facial expressions). Demonstrate a few in a charades-type manner.
2. Review the "Honey, I'd Love To Dance" handout. Discuss both dances and what each movement means.
3. Divide the class into teams of 4–5, depending on class size. Have each team choose a scout. This student/bee will find the food source (treat bag) and communicate its whereabouts through bee dances to the team members.
4. Give each scout written directions to a different treat bag (that you have hidden), and then send the scouts out to find them. Do not let the other students witness their search.
5. When the scouts return, have them communicate the direction and distance of the treat bag to their team members using either the round dance or the waggle dance. No verbal or "human" body language allowed!
6. Once all the teams have found their reward, follow up with a class discussion about the ease or difficulty of communicating through dance. Is it difficult to judge distance without a tape measure or other tools? Do they believe honey bees are intelligent creatures?

Source: National Agriculture in the Classroom - <https://www.agclassroom.org/matrix/lesson/223/>

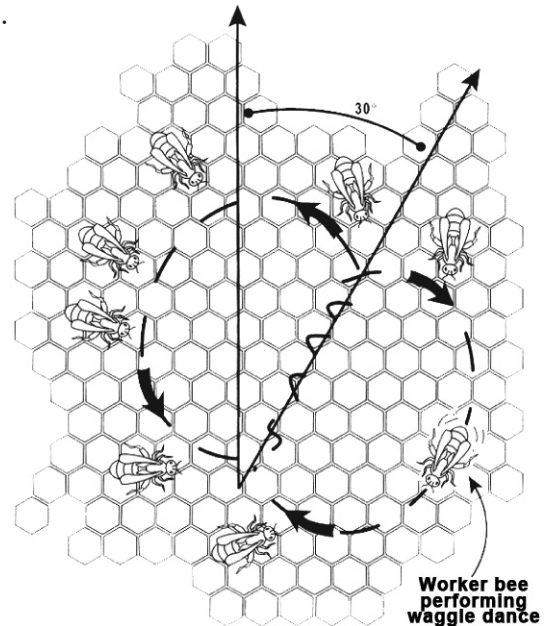
Honey, I'd Love to Dance!

Honey bees communicate with each other by dancing. There are several bee dances, but the most common are the round dance and the waggle dance.



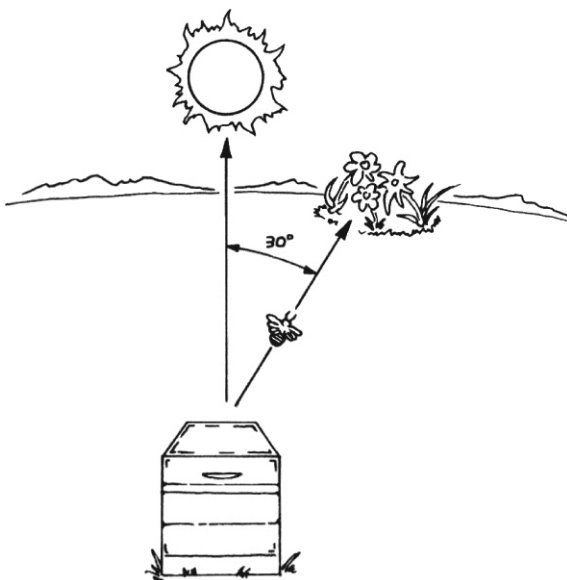
Round Dance

When food is close to the hive (less than 100 yards), a worker bee performs the round dance. She goes round and round, first one way and then the other. The round dance does not show the exact location of the flowers, so fellow worker bees must fly out in many directions looking for them.



Waggle Dance

If the flowers are more than 100 yards away from the hive, the returning bee performs the waggle dance. The bee dances a half circle in one direction, turns, and runs straight while wagging her abdomen. Then she dances a half circle in the other direction. These two half circles form a figure eight.



If the food is in the same direction as the sun, the central run of the dance is straight up the comb. If the food is to the left or the right of the sun, the bee alters the direction of the dance by the correct amount to the left or right of the central line.

The distance between the hive and the food is communicated by the speed of the dance and the buzzing sound made by the dancing bee. The faster the worker dances, the closer the food. The waggle dance shows both location and distance of the flowers, so the bees know where to fly.