## Plant Patterns

Charlotte, Huia, and Peter were each given 3 native plants (a rātā, a kōwhai, and a flax) to plant in their gardens. In each garden, there is only enough room to plant the 3 plants in a straight line.


1. Huia doesn't want the gardens to look the same. Peter thinks that they can plant them in 3 different ways so that each garden will look a little bit different. Charlotte thinks that it's possible to plant them in 6 different ways.
a. Who is right?
b. List all the different ways these plants could be planted.

2. What happens if each person is given a hebe to plant as well? List all the different ways that the 4 plants can now be planted.
3. Investigate what happens with 5 or 6 plants. Describe what is happening each time you add a new type of plant.
