



The Crab Colony Activity

Student's Name: _____

Group members: 1. _____

2. _____

3. _____

4. _____

Group Number: _____

Class: _____

A HOUSE FOR HERMIT CRAB STORY¹



Your teacher will play the YouTube video “A House for Hermit Crab” by Eric Carle.

The story is about Hermit Crab travelling the seabed and creating a new house as he has outgrown his current house.

After watching the story, your teacher will discuss the story with you and ask you some questions.

¹ A house for Hermit Crab: <https://www.youtube.com/watch?v=ICV7txTqbUE>

PHASE 1: DISCUSSING SHAPES

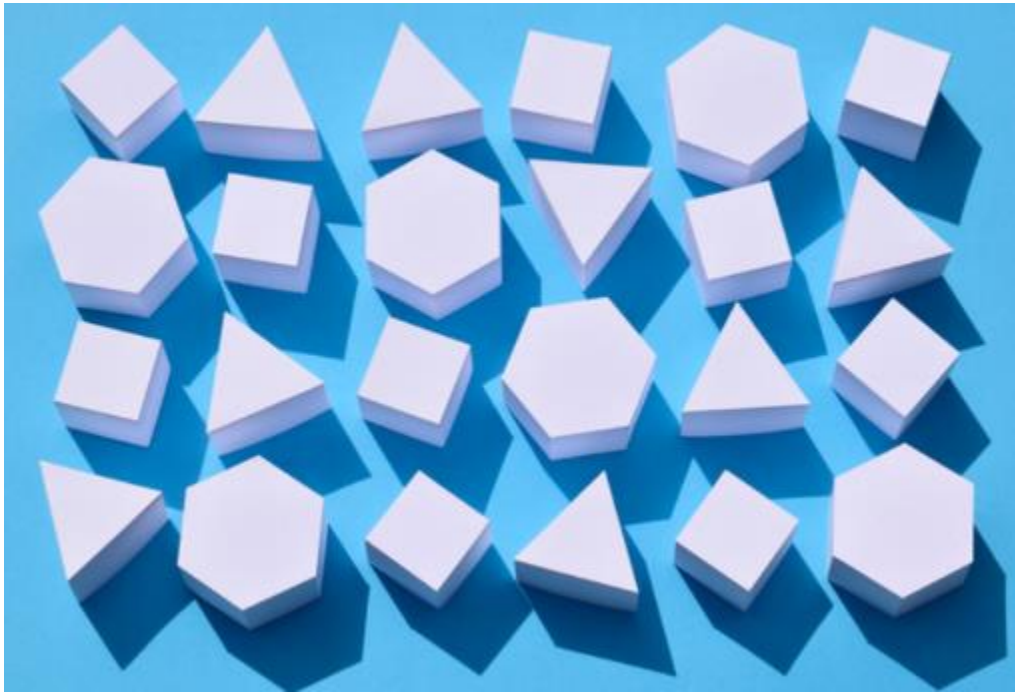


Figure 1: Shapes

After watching the video and discussing it with your teacher, you will share your knowledge and experiences of various shapes. This will help your group with the activity.

You will need to build a home for a colony of crabs so that as many crabs as possible can live there.

PHASE 2: LET'S CREATE YOUR FIRST CRAB COLONY!



A colony of crabs has found a nice spot in the ocean bed to form a new home colony. Each crab will bring a Catappa (Indian Almond) leaf on which to rest its shell. You will have various shapes (in different sizes) which represent Catappa leaves to build your colony.

Let's now plan the new crab colony. Your group has a large sheet of paper that you are to use for your new crab colony. As there is not much space in your colony, you need to think about the following rules when planning your new crab colony:

- *there are crabs of various shapes and sizes.*
- *as many crabs as possible (resting on their leaves) need to fit into the new colony.*
- *the crabs must fit together as closely as possible without large gaps between their leaves.*

Criteria:

- *your group will be provided with leaves of different sizes and shapes.*
- *Your group should have **at least 5 large leaves** in your colony.*
- *the leaves must not overlap otherwise the crabs become grumpy.*
- *the leaves must not go outside the colony.*
- *Each group member must take turns to select and place a leaf.*

Your task is to find the best way to place as many of your crabs as possible into the colony, without large gaps between each crab's leaf and without overlapping leaves. **Remember to work as a group and discuss your ideas together.**



THINKING SPACE

... Drawings, diagrams, observations, notes, reflections ...

Answer the questions below after completing your group activity:

1. Which shapes fit best into the colony?

2. Why were they better than some other shapes?

3. What were some problems you had in arranging the crabs in your colony?

4. What did you do to fix these problems?

5. Is there more than one way you could have arranged the crabs into the colony, without gaps and without overlapping?

PHASE 3: REFLECTION



Think about how your group decided on your crab colony design and answer these questions:

1. What *ideas* did your group have in deciding on which shapes to use to have as many crabs as possible fit inside the new colony?

2. How would you change the colony or colonies made by your group?



THINKING SPACE

... Drawings, diagrams, observations, notes, reflections ...

PHASE 4: COLONY SHARING

You will now write a letter telling your classmates how you created the best colony for your crabs.

First, _____

Then, _____

Next, _____

Finally, _____