

Investigating Deforestation

I can investigate the effects and dangers of deforestation in Madagascar.

You will need:

- 3 plastic bottles with a rectangular hole cut in the side
- 3 bottom halves of plastic bottles with 2 small holes in opposite sides
- 3 25cm lengths of string
- Compost
- Seedlings or small plants
- Mulch such as bark, dried leaves or twigs



1. Place the three plastic bottles on their sides, with the rectangular holes facing upwards. Make sure that the bottle neck sticks out over the edge of the surface they are placed on.
2. Keeping the lids of the plastic bottles on for now, place the same amount of compost in each plastic bottle. Don't fill the bottles too high - the level of the compost should be just below the opening of the neck of the bottle. Pack the compost down well.
3. Leave one bottle like this. This will be bottle C.
4. Add a layer of mulch to the second bottle. This will be bottle B.
5. Plant the seedlings in the third bottle. Make sure they are very tightly packed together when you plant them, and that the compost is firmed down. This will be bottle A.
6. Take one of the bottom halves of the bottles. Thread a piece of string through the holes and knot it at each side so that it forms a handle like a bucket. Repeat for the other 2 bottom halves of bottles.
7. Unscrew the lids of bottles A, B and C. Hook one of the buckets you have made over each open bottle neck.

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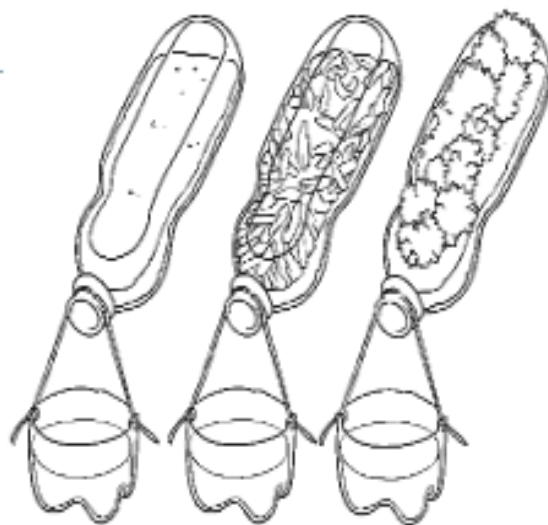
You are going to pour the same amount of water into bottle A, B and C. Bottle A is full of plants, just like the tropical rainforest. Bottle B has a layer of mulch, like the forest floor when the trees have just been cut down. Bottle C has no plants or mulch, and represents the area left when all the trees have been completely cut down and burnt.

What do you think you will see in each of the buckets when you pour water into the bottles?

Bottle A	
Bottle B	
Bottle C	

Try it! Pour the same amount of water into each bottle. Pour the water into the opposite end from the neck of the bottle.

Draw a picture of what you see in each bucket.



What do you notice about the differences between each bottle?

Can you give a reason for this?
