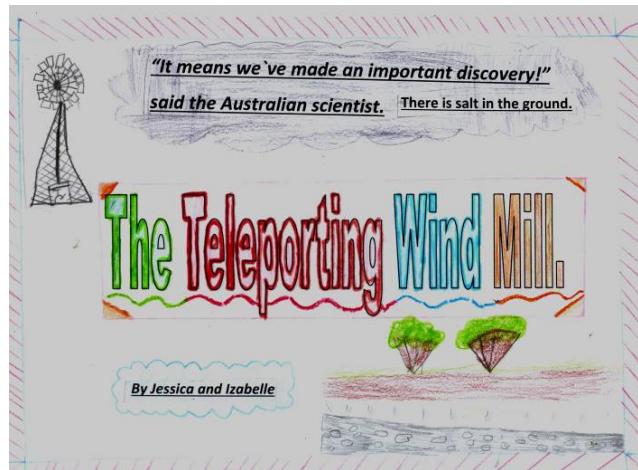# Sustainability and our Farmlands

Farms grow **crops** and **stock** on the land. From these, we get **food** and **fibre**. **Native** and **introduced plants** and **creatures** live on farms too. These are all **living** things. There are also **non-living** things on farms, both **natural (soil, water, air)** and **man-made (infrastructure, machinery)**. All these parts may be in a **farming environment**.

This story is about a farm and **a 20th Century Australian Science discovery** that is used on farms. It may be new knowledge and/or an **invention**. How did this help the farmer and change his farmwork?
Use the text, details in the pictures, and Key Science Ideas pages to find the answers to the questions below. (Some, but not all, help is given.)

1   a   What sort of farm is this?
      b   What living things are there on this farm?

2   a   What 'problem' did Mary have in this story? (pages 1-4)
      b   What new knowledge did Mary get about the land of her farm?
      c   How could that new knowledge change farming? (pages 12 & 16)

3   a   Name the Australian Scientist who discovered this knowledge?
      b   Where did he live?
      c   What experience did he have with farming and Science?

4   a   Explain how people helped this problem appear. (pages 11 & 14)
      b   How long has it been since it was first understood in Australia?
      c   Describe the newer knowledge of the history of the land that helped make this problem that was hidden from the first settlers.

Sustainable farming is looking after the whole environment, so that
1 crops and stock grow well (and the farmer makes a profit), and
2 all the other parts also continue well into the future.

5   Do you think the Scientific discovery in this story helped make farms more sustainable? Why/not?