

A problem with weeds

Weeds are often called 'plants growing in the wrong place'. Significantly, they are plants that compete for water, sunlight and nutrients in the soil. In some cases, their seeds contaminate the crop seed and lower its sale value.

Weeds are mostly controlled by mechanical or chemical methods. Genetically modified crop plants have been developed that are tolerant to herbicides (chemicals that kill plants).

At the end of this activity you will:

- compare amount of weeds to crop plants that can grow in an area
- know the most common ways of controlling weeds in Australian canola crops
- compare costs of these methods.

You will need:

- access to the internet
- *A problem with weeds – the canola story* from *Biotechnology Online*

What to do:

1. Find out the following:
 - a. What types of canola are found in Australia and where they are grown. Does the type of canola change in different regions?
 - b. The mass of canola plants that can grow in one hectare in a particular region of Australia
 - c. The types of weeds that grow in canola crops – are they the same everywhere?
 - d. The mass of weeds that can grow in one hectare in a particular region of Australia
 - e. The most common methods that farmers use to control weeds in canola crops
 - f. The costs to a farmer each year of using each of these methods
 - g. Which method farmers prefer and why
 - h. Some of the problems and benefits with current control methods.

What to do with your information:

1. Produce a report that shows:
 - a diagram to show where canola is grown in Australia
 - a diagram to show the mass of canola plants and mass of weed plants per hectare in one particular region
 - the most common methods of weed control
 - the costs per annum of each of these methods
 - benefits and problems of current control methods.
2. Show all the sources that you referred to.

Useful resources

Canola Information Service: www.canolainfo.org

Canola - Agriculture Western Australia:
http://www.agric.wa.gov.au/search/search.cgi?collection=external&form=custom&meta_y_and=0FCP0CO0&sort=date

Monsanto: www.monsanto.com.au/layout/canola/default.asp

Grains Research and Development Corporation:
http://www.grdc.com.au/director/events/researchupdates.cfm?item_id=AC8FE99900739A0353FD256B6C41D1C0&pageNumber=29

CRC for Australian Weed Management: www.weeds.crc.org.au/