

Planting the cuttings

- Let each child push their cutting gently into the soil to just below the lowest leaf and firm it in by gently pressing on the soil around it.
- Cover the cuttings with a transparent cover. Half lemonade bottles are ideal. Polythene bags can be used but should be arranged so that they are not touching the cutting.
- Place the cuttings in a warm light place, preferably not in full sun. They do well under a light bank (see page 14).

After one week, water the pots by standing them in dishes of water. Repeat after about 10 days by which time the cuttings should have rooted and new leaves should have started to develop.

Looking after the cuttings

Keep the plants in a place where there is plenty of light. If kept indoors, trays filled with wet gravel keep them sufficiently moist. If you wish to keep the plants out of doors, either in pots or planted into beds or hanging baskets, they need to be hardened off. As long as there is no frost, put them outside during the daytime and bring them indoors at night (or at the end of the school day). After one to two weeks, they can be left outside permanently, providing there is no risk of night-time frosts.

Plants can be kept over winter somewhere with a dry atmosphere and where the temperature does not fall below 10 °C. Water sparingly about once a week.

Activity 2b: Growing potatoes in a bucket

Resources

- suitable containers, such as buckets or large pots (not less than 25 cm diameter). Make sure the containers have holes in the bottom to allow for drainage.
- 'Seed' potatoes – usually available in garden centres in January and should be purchased then. Choose one of the 'first early' varieties, such as Arran Pilot. **(Note that these 'seed' potatoes are actually stem tubers, not seeds – see page 48.)** The stem tubers have buds in small depressions next to leaf scars (eyes). These are usually concentrated at one end, often known as the 'rose' end.
- compost – use a multipurpose compost, peat-free if possible (see page 42)
- trowels
- egg trays

Sprouting the potatoes. In January or early February place the seed potatoes on an egg tray with the rose end uppermost. Leave them under a table at room temperature to sprout. They are ready for planting when the sprouts are about 2 cm long. This takes about 4 to 5 weeks.

Planting the potatoes. Place some crocks or gravel in the container to help drainage and nearly fill it with moist compost. Put one potato in the container with the sprouts uppermost. Cover the potato with 2 to 3 cm of compost.

Keep the container indoors or put it in a sheltered place outside, where it is free from frost. Water it regularly (the compost needs to be just damp). As the potato grows you may need to add a bit more soil to keep the underground parts covered. Potatoes should have formed 12 to 14 weeks after planting. Carefully lift the plant and have a look. Pick off the largest potatoes and then replace the plant in the soil so that the potato plant can continue growing.

Further activities

1. Try growing some different varieties of potato. Here are some names for you to try and find: Duke of York, Charlotte, Anya, Belle de Fontenay, King Edward, Pink Fir Apple.
2. Make a list of the different ways in which potatoes can be cooked.

Further activities: growing plants by vegetative reproduction

Here are some more ideas that can be fun for children to do.

- 1. A hanging basket** – Plant up a hanging basket with cuttings the children have grown. Fuchsias are easy to grow from cuttings and look good mixed with zonal and trailing geraniums. Wandering Jew (*Tradescantia fluminensis*) has attractive foliage and also grows well from cuttings. If you have a local Botanic Garden with an Education Unit they may be prepared to help your class grow a wider range of cuttings and also set up the hanging baskets.
- 2. Plants from the supermarket** – Grow carrot, beetroot and other root vegetable tops. Pineapple tops also sprout well.
- 3. Mint (or ginger) from its underground stem** – Plant a small piece of underground mint stem with buds (a rhizome) in a pot and watch it produce new shoots in a few weeks. You can do the same thing with ginger from a supermarket.
- 4. Growing plantlets** – Take small plants from the ends of above ground shoots (stolons). Good plants to try are the spider plant (*Chlorophytum comosum*) and ground ivy, especially the variegated form (*Glechoma hederacea variegata*). Ground ivy produces long trailing shoots and is a good plant for hanging baskets. The Mexican hat plant (*Kalanchoe daigremontiana*) produces lots of little plantlets along the edges of its leaves and these can be picked off and grown.
- 5. Growing pussy willow** – Find a male willow tree (the male catkins are the ‘pussies’). Cut willow shoots in the spring before they come into leaf (make sure you have permission before you do this). Plant the sticks outside in a good garden soil in a moist shady place. They quickly develop roots and begin to grow. Some primary schools develop this activity further and make a living willow fence or grow a willow dome (see Figure 22).
- 6. Growing bulbs and corms in lemonade bottles or film pots** – Fill the bottle (or film pot) with water and balance the bulb or corm on the top. Suitable plants to try are amaryllis, crocuses, cyclamen, daffodils, garlic, hyacinth and tulips. Some bulbs may need special treatment (e.g. a period of very cold temperature) before they grow. It is, therefore, advisable to buy pre-treated bulbs for growing indoors. See also notes on vegetative reproduction on page 47 in Background information for teachers.
- 7. Activities in the school garden** – For teachers who wish to extend their activities outside the classroom, use the Field Studies Council publication *Gardening for Primary Schools*. This guide gives practical advice on how to set up a horticultural garden in the school grounds, and also shows how to make links between gardening activities outside and investigations on growing plants in the classroom.



Figure 22. A willow arch, grown from cuttings – fun to create in school grounds.