

# LIQUID FEEDS AND SPRAYS

Whilst it is a basic tenet of organic cultivation that one feeds the soil not the plant, it is nevertheless useful at certain times to use liquid feeds, and some preparations are useful sprayed on foliage;

To encourage heavy cropping, the right liquid feed at the right time can help. The feed must be applied during good growing conditions (warm/sunny) before the plant is mature. For example, feed tomatoes when they start to flower; cabbages before heading up.

It is also important to remember to apply on to wet soil, or after crop has received sufficient watering, so that feed does not leech away and can effectively be absorbed by plant root hairs.

- Ø Liquid feeds especially useful when container-growing, where plant roots are restricted and available nutrients may become exhausted.
- Ø Liquid feeds can in most cases be used as foliar sprays, to supply nutrients through the leaves, especially on ailing, stressed plants.
- Ø Specific preparations can be made up to use as plant tonics, or to ward off/discourage the onset of pests and diseases.
- Ø Dilution: 10 parts water to 1 part preparation as starting point. Too strong concentration can harm plant or have detrimental effect on taste.

**SEAWEED** Widest range of available nutrients plus growth hormones. As liquid feed use on transplanted seedlings, and crops at flowering/heading up stage. Use as spray on plants suffering any form of stress. Home made from seaweed meal; ferment 1 kg in 25litres ~8 weeks. Dilute 20 - 1 for liquid feed, or strain and dilute 5 - 1 for foliar spray.

**MANURE/COMPOST** Infuse half a hessian-sack full of manure or compost in a large barrel of (rain) water. Steep for 2 - 4 weeks. Dilute 10 - 1. Especially useful for heavy feeder crops, leaf crops such as brassicas. Strained, can be used as spray; good all-purpose tonic for stressed crops. Different manures have specific benefits. (See handout on Manures)

**COMFREY** High potash levels make it ideal for heavy feeder fruiting crops such as tomatoes, aubergines and peppers. Made by nearly filling a container with comfrey leaves and topping up with water. Leave to ferment for a few weeks, stirring daily if possible. Dilute 5 - 1. Very smelly! Alternatively a concentrate can be made by filling a lidded container with comfrey, and collecting the juice from a tap or hole in the bottom of the container. Dilute 15 - 1. will store for a long time, and preserves more of the available nitrogen.

**NETTLE** Collect in spring for best quality. Contains useful amounts of nitrogen, plus some phosphate and potash. Also useful amounts of magnesium, sulphur and iron. A general-purpose liquid feed. Good combined with comfrey for heavy feeder crops. Prepare and apply similar to comfrey. As a spray, applied frequently, nettle can make crops taste unattractive to sap-sucking bugs.

**WORM BIN LEACHATE** Excellent general purpose feed, especially container grown plants. As strength and consistency can vary, dilute 15 - 1; use less dilute upon appraisal.

**HORSETAIL TEA** (*Equisetum arvense*) Spray onto crops during dull, damp cool days; silica content helps bring light into plant tissues and ward off infection from fungi/mildews. Boil spring-collected horsetail for 20 mins. Store in bottles.

**CHAMOMILE TEA** Infusion sprayed on seedlings to protect from damping-off and mildew.

**CHIVE/GARLIC JUICE** Diluted juice as spray against mildew on crops such as cucumbers.

**VALERIAN FLOWERS** (*Valeriana officinalis*) Infuse the flowers. Can be used against mildew on maturing crops at end of season, especially tomatoes.

**QUASSIA CHIPS** Spray on crops affected by aphids; renders aphids unable to feed - quassia extremely bitter. Boil chips in plenty of water for 30 mins.