Keeping Worm Farms

By starting a worm farm and passing them our food waste your household can go a long way to reducing your carbon footprint, while pampering your plants with the wonderful worm wee (and poo) produced!

How do we keep our worms?

We need to imitate the environment that worms inhabit naturally: cool, moist and dark spaces, which is not too hard to do. Choose a spot that is not affected by extreme temperature fluctuations or gets too much direct sun. Some worm lovers even keep their little friends inside the house, with cool laundries often proving to be a great worm rearing spots.

There are a couple of ways you can go about setting up the worm farm, whether using the low cost make-it-yourself polystyrene box method, or purchasing a ready made worm farm from your local garden centre. Whichever

accommodation you choose, the bedding material is of

utmost importance. Worm bedding should consist of mainly **carbon-based** materials and the easiest is shredded newspaper. Mix it together with some aged (not fresh) cow manure or compost and then lightly sprinkle it all with some fresh water. Don't wet it too much – just enough to dampen the contents. This should all be prepared **before** you put the worms in!

Let the worms settle for a couple of days, then add some food waste to the top box, under a 'blanket' such as a newspaper layer, 6 pages thick; or hessian. These scraps could include things such as:

- Kitchen scraps like leftovers (cooked vegetables and stewed fruit leftovers)
- Fruit peelings (avoid citrus fruits, peel or flesh the worms find their smell too strong)
- Grass clippings (lightly sprinkled)
- Autumn leaves (small amounts)
- Paper, cereal packets, pizza boxes, junk-mail (all torn up and soaked in water beforehand)
- Tea-bags, coffee grinds, tea leaves
- Hair clippings and vacuum cleaner dust
- Vegetable scraps and peelings (avoid onion)
- Crushed egg shells (these are excellent to help maintain the pH of the bedding)
- Aged manures

Do the worms a favour and chop this stuff up before you put it in the worm farm...after all, worms don't have teeth, so the easier it is for them to digest the waste, the happier the worm farm will be!



What makes worms squirm uncomfortably?

Worms are fairly low maintenance pets, but they are not no-maintenance.

- Don't forget about them and ensure that their bedding material doesn't dry out.

- The presence of ants in the farm is a sure indication that the moisture levels are

too low, so add some soft vegies and a bit of water.

- Overfeeding is a common issue too. The secret is small amounts of food more regularly and in different spots. If there is too much food in the farm, it will start to rot, making life unpleasant for your worms.

- Do not put meat, dairy products or processed (cooked) foods into the farm. This includes bread and cake scraps. Whilst the worms will eat these foods, they can attract vermin, including mice and flies.

Worm 'Wee'

After a few weeks, worm wee will begin to collect in the bottom box. Technically speaking, it isn't worm 'wee', but the liquid that leaches through the bedding. This stuff is liquid gold! Some of the best fertiliser around, worm wee is a lovely dark colour and needs to be diluted with water before use, ideally to about the golden colour of tea. This can then be applied to just about any type of plant. Worm wee is particularly great in the edible garden.



Vermicast – or Worm Poo

Vermicast has got to be one of the greatest fertilisers ever. But be careful, it's strong and needs to be used fairly sparingly! In your home worm farm, vermicast will collect in the top bin where the worms reside and it does need to be cleaned out every so often. To do this, carefully remove a small amount from the worm bedding. Mound it up into a cone shape. Any worms present will wriggle away from the light and collect in the centre of the vermicast and remaining bedding. Take the cone of vermicast away and put the worms back in to the farm. Then sprinkle the worm poo around your plants and lightly water it in.

How much will my worms eat?

This depends on how many worms you have, but grown up worms can eat half their body weight in food each day (most of which is converted to fertiliser and wee).

When should I water, and how much?

Sprinkle a bit of water into the worm farm every couple of weeks, as this will speed up the worm wee production, and keep the bedding moist. Don't let it get sodden and occasionally aerate the bedding lightly to loosen the contents with a small garden fork tool.





Can a worm farm have too many worms?

Worms self regulate their numbers based on food supply and space, so your worm farm will never be over-populated. Under optimum conditions, worms can double their population in 2-3 months. Life span is only about a year, depending on species.

How do they reproduce?

Some can breed from 2-3 months old. Most are hermaphroditic (they have both male and female sexual bits), though they are not self-fertile.

They mate every 7-10 days. An egg capsule is produced 27 days later. It may contain between 2 and 20 eggs, though usually only one juvenile worm hatches, in about 3 weeks.

Can I put worms from my farm in the garden?

Compost worms need moist, dark, damp situations in which to survive and thrive, so unless your soil is rich, damp and covered in a nice layer of mulch, don't send them out on a suicide mission.

All the worms are hanging out in the lid – why?

Generally, this is a response to too much water. The worms are just trying to move to higher ground so they don't drown. If your farm is out in the weather it may be collecting rain; if not, you are adding too much water in the farm. Or sometimes they are responding to climatic air pressure. If they can sense rain, they move to the top.

Don't overheat your worms!

Like all of us, worms are able to tolerate a fair range of temperatures, generally from about 10 - 30 degrees Celsius. During our summer, we are subject to some really hot days, often well over 30 degrees, which makes the worms very uncomfortable. In this type of weather, consider moving the system into a shady, cool position. Take the lid off and hose down the system (making sure the tap is turned on to allow the liquid to drain out). Freeze large block of ice and place them on top of the worm blanket to gradually melt and cool the contents.

There are flies or maggots in the farm!

Tiny little vinegar flies are occasionally present in worm farms (and compost bins) and are absolutely nothing to worry about. If larger flies or maggots are present, it is generally a sign that food (especially meat) is rotting rather than being eaten by your worms. Avoid meat in worm farms, and make sure you are not over-feeding your new pets. If maggots do turn up, get rid of them by placing a piece of bread soaked in milk on the surface of the farm and remove after a couple of days.

My worm farm stinks!

This will only happen if there is decomposing food and a build up of waste in the farm. The best thing to do in this situation is to stop feeding the worms for a while, add a handful of garden lime or wood ash to the top bed and lightly aerate the bedding. This should allow the worms more room to move and a happier home. Start feeding them again when the farm is free of smells. It may also happen if the worms have all died due to overheating.

Enjoy your worms, they really are a gardener's best friend, and they do make great pets!

Reference: <u>www.sgaonline.org.au</u>





