

Bokashi: Production of solid fertiliser

Making fermented organic fertilisers is the process of decomposition of organic waste by microorganisms in controlled and favourable conditions. This produces a stable material known as bokashi (organic fertiliser), able to fertilise plants and nourish the earth at the same time.



Ingredients

- Poultry manure
- Fertile soil
- Cow manure
- Rice or coffee husks
- Sawdust
- Ash
- Lime
- Baker's yeast
- Liquid mountain microorganisms
- Barrel with water

Tools

- Machete
- Shovel
- Large wooden pestle or log
- Sacks or bags
- 3 metres of heavy plastic
- Metal pitchforks
- Plastic buckets
- Thermometer
- Dust mask
- Boots



To produce 240 sacks of bokashi, you need:

Inputs	Cantidades
Bags of poultry manure	26
Sacks of fertile soil	75
Bags of cow manure	35
Bags of coffee husks	30
Bags of sawdust	40
Bags of ashes	30
Bags of lime	1
Baker's yeast	1
Barrels of liquid mountain microorganisms	3
Barrels of water	8

Note: bokashi should not be kept for more than six months.

Recommended doses

In depleted soils, apply between 4 and 10 pounds per square metre. Basic grains, cassava and sugar cane need a second application, between 15 and 25 days after the seeds have germinated, in a dose of 2 pounds per square metre. For fruit trees, you apply a pound per plant at the time of planting and three applications of one pound per year during the first two years. When they go into production they'll need two pounds, three times a year.



Step by step: Making bokashi

Step 1

Measure the amount of each ingredient.



Step 2

Layer and mix all ingredients until uniform.



Step 3

Little by little add the water needed to moisten the mixture.



Step 4

Pass the mixture from one place to another with the shovel three times. On each pass gather the mixture and moisten with the diluted yeast..



Step 5

Check the humidity by doing the **fist test**. Take samples from several sides of the mixture and squeeze them. If the sample crumbles it's too dry, if it drips it's too wet. But if you can feel the dampness and it keeps its shape when you let go, it's ready.



Step 6

14 hours after preparation the fertiliser should reach temperatures between 50 and 70° degrees Centigrade (°C).

Measure the temperature with a thermometer or by doing the machete test. If you stick the machete in the pile and it comes out really hot, turn it twice a day, morning and evening, for seven days, and moisten a bit.

If the fertiliser is too cold, add fertile soil, bokashi or vermicompost to activate the fermentation process.

After the second week, the maturation stage begins. It's recommended to turn once a day.

After 21 days it will be ready to apply.

