

## COMPOST EXTRACTS

Compost extracts, commonly known as compost teas, are liquid versions of solid compost material. They contain soluble plant nutrients and a complex community of beneficial microorganisms. While there are an infinite number of ways to prepare compost extracts, basically all extracts begin by mixing compost in water in order to extract plant nutrients and microorganisms. Liquid extracts can be applied as soil drenches, foliar sprays or incorporated into irrigation systems. There are two diverging methods for preparing compost extracts: aerated or non-aerated. The costs and benefits for each method are described below as well as instructions for at-home preparation.

	Pros	Cons
<b>Aerated compost extracts</b>	Higher microbial population	Higher costs
	Shorter production time (hours to five days)	Higher energy inputs
		Lower stability (shelf-life)
		More mechanics, plumbing, and equipment
<b>Non-aerated compost extracts</b>	Lower costs	Lower microbial population
	Greater stability (shelf-life)	Longer production time (seven to 10 days)
	Lower energy inputs	

### How to prepare aerate compost extracts (ACE)

1. Obtain the materials for preparing ACE.
2. Add tap water to the bucket and let sit over night to remove chlorine or else use rain water.
3. Start aerating the water.
4. Put mature compost in the bag and place the bag in the bucket.
5. Initially stir or gently massage the contents of the bag.
6. Let sit and aerate for 1 hour to 3 days. The longer the extraction period the greater the potential for nutrients and microbes to be released into the water.
7. After extraction, filter the liquid through cheesecloth, strainer, or a new nylon stocking.
8. Apply the liquid immediately after preparation as a soil drench or as a foliar application. The liquid can also be further diluted with dechlorinated water as needed.

#### Materials for preparing ACE:

- 5 gallon bucket with lid
- Aquarium air pump
- 3 to 6 feet of aquarium hose/tubing
- One T-valve or cross-valve (to increase the number of available air streams)
- Aquarium airstones or bubblers
- 3.5 gallons of water (let sit overnight to dechlorinate)
- 0.5 to 1 gallon of mature compost, sieved through ½" mesh or smaller
- One nylon stocking, sock, or another porous bag-like material to hold the compost

## How to prepare non-aerated compost extracts

1. Obtain the materials for preparing NCE.
2. Add tap water to the bucket and let sit over night to remove chlorine or else use rain water.
3. Put mature compost in the water
4. Vigorously stir the solution for about 2 minutes.
5. Stir daily or twice daily for 7 to 10 days.
6. After extraction, filter the liquid through cheesecloth, strainer, or a nylon stocking.
7. Apply the liquid as a soil drench or as a foliar application. The liquid can also be further diluted with dechlorinated water as needed.

### Materials for preparing ACE:

- 5 gallon bucket with lid
- 3.5 gallons of water (let sit overnight to dechlorinate)
- 0.5 to 1 gallon of mature compost, sieved through ½" mesh or smaller
- Long-handled instrument for stirring

## Non-aerated compost extracts



## Aerated compost extracts

