



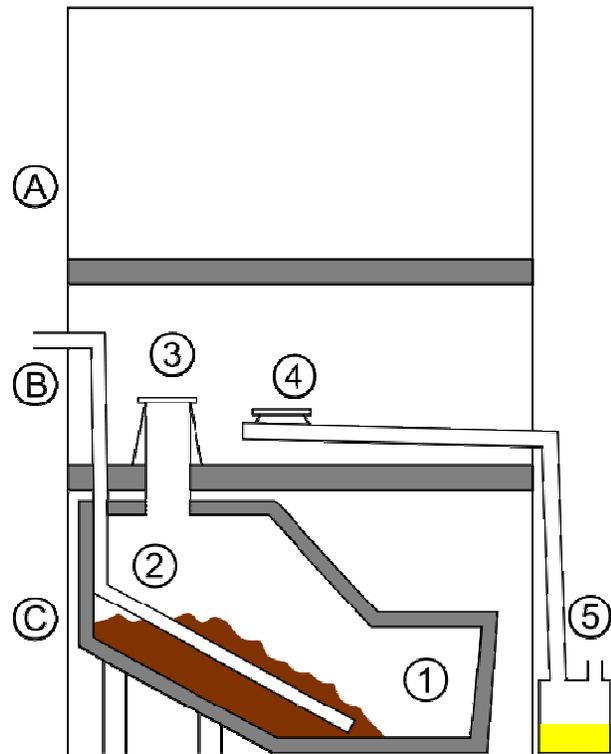
Waterless Toilets



A waterless toilet or a composting toilet is a dry toilet that uses an aerobic process to treat human waste on site. The primary use of the waste is for composting. These toilets may be used as an alternative to traditional flush toilets.

Typically these toilets are used where the water supply is not sufficient, there is no waste-water treatment facility or people have the desire to use humanure. If you have used a restroom in a national park you probably have used a waterless toilet.

There are many designs when it comes to a waterless toilet but the process used by each design is the same. The waste is placed in a basin and heated to temperatures where bacteria will begin to break down the waste into its components. The processed waste can, once the pathogens have been eliminated via heat, be used for compost. Some models require a manual method of aeration to the solid mass. This can be performed using a hand-cranked drum inside the storage compartment. Once the waste has been “cooked” sufficiently the removal of the compost can be done in small volumes to ensure that the mixture is still adequate for the aerobic process. If you are going to install a waterless toilet it is important to review local health department regulations prior to installation.



A urine-diverting-dehydration toilet. 1:Storage compartment, 2:Ventilation pipe, 3:Toilet seat, 4:Urinal, 5:Urine collection and dehydration, A:Second floor, B:First floor, C:Ground floor

The annual water savings associated with a composting toilet would be somewhere around 3,650 gallons per person. This is calculated assuming the average toilet uses approximately 2 gallons per flush and the average person flushes the toilet 5 times per day. **If** every person in Utah were to switch to a composting toilet we would stop using 10 billion gallons (31,000 acre-feet) of

water every year to move human waste. Now the health hazards with this probably outweigh the water savings benefits. We use a lot of water to move our human waste around. This does not include the amount of water and energy we use to treat our waste to acceptable standards.

As we plan for the future of Utah's water it is important to remember that every drop counts. If we each save a little we'll all save a lot!