

## Greywater tolerant plants

In general, tough drought-tolerant plants will do best with greywater irrigation. Greywater is typically alkaline, so avoid using it on acid-loving plants such as azaleas, begonias, gardenias, hibiscus, camellias and ferns. Greywater should not be used on fynbos or proteas either.

Plants watered with greywater will benefit from an occasional flushing of rainwater or tapwater to remove any greywater residue on the plant leaves, especially if you've used the "sprayer" system.

Pay attention to what your plants are telling you. Dry, wilted or curled leaves can be signs of lack of water, while wilted shoot tips or soft plant tissue can mean overwatering.

Examples of some plants that thrive on greywater irrigation include olives, rosemary, bougainvillea, lavender, Cape honeysuckle, Italian cypress, bearded iris and petunias.



## Additional greywater resources:

<http://enchantrix.co.za>

<http://www.oasisdesign.net/greywater/>

[http://www.gardenResQ.co.za/reuse\\_water.html](http://www.gardenResQ.co.za/reuse_water.html)

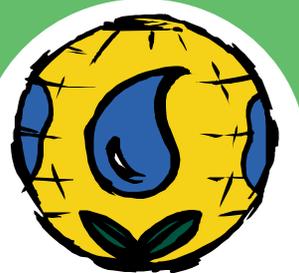
<http://www.waterrhapsody.co.za/>

<http://www.waterwise.co.za/site/home.html>

## Tips for greywater use:

'Using environmentally friendly soaps, detergents and cleaning products will positively improve the quality of your greywater and be an advantage to your garden. Also, don't always irrigate in the same place with greywater. Constantly move the sprinkler watering system in the garden.'

! Do not allow greywater to pool.



Water  
Wise



RAND WATER



For more information on becoming a Water Wise gardener, please visit the Rand Water website at [www.randwater.co.za](http://www.randwater.co.za) and click on the Water Wise logo. Alternatively, call us at 0860 10 10 60 or email us on [waterwise@randwater.co.za](mailto:waterwise@randwater.co.za).

Produced by EMS Department in conjunction with Elize van Staden (UNISA)

# Greywater Use in Gardens



Water  
Wise



RAND WATER



Be Water Wise!

! Do not use greywater if it contains oil, faeces or urine.

## Benefits of greywater to plants:

- Greywater contains small amounts of nitrogen and phosphorus, which are potential sources of plant nutrients.
- The soapy nature of greywater can act as a pest repellent.



## South Africa's water situation

South Africa is a semi-arid country that receives an average of 490 mm of rain every year. Currently, South Africa is experiencing a water shortage because there is only 1 000 m<sup>3</sup> of water available per person per year. This figure will decrease as our population expands, pushing us into a greater water crisis.

Municipal water use, which includes domestic water and water used in the garden, makes up an average of 27% of the total water used in the country. A major component of domestic water consumption is gardening, estimated at 31-50% of total household water use.



### How can you reduce your water use in the garden?

- use of water-wise gardening concepts and drought-resistant indigenous plants;
- mulching of soil to preserve soil moisture;
- efficient irrigation systems and irrigation scheduling;
- rainwater harvesting and
- **the reuse of wastewater (greywater);** and
- soil improvement process e.g. composting.

### Why should I re-use greywater?

There are many reasons why using greywater is beneficial. You will use less of our valuable potable water and save thousands of litres of drinking water. You will reduce the impact on natural water resources by reducing your water consumption. Also, you will save money on your water bill.

## What is greywater?

Source	Description
 Laundry water	Laundry water contains soaps, detergents, bleaches, water softeners, lint, dirt and small amounts of skin or faecal matter from clothes. Recently, many detergents have become biodegradable and safe to the environment. <i>This water is suitable for irrigation use if your detergent is biodegradable.</i>
 Kitchen water	Kitchen sink or dishwasher greywater may contain soap, detergents, grease, oils, blood, small traces of pesticides and food scraps. <i>It should not be used for irrigation unless the water does not contain grease, blood, pesticides or oils.</i>
 Shower and bath water	Shower and bath water may contain small amounts of soaps and shampoo as well as hair, skin, oil, faecal matter and urine, but can also contain residues of cleaning products. <i>This water is suitable for irrigation use.</i>
 Handbasin water	Handbasin water can contain soap, toothpaste, mouthwash, hair and shaving cream as well as residues of cleaning products. <i>This water is suitable for irrigation use.</i>

**TIP:**  
Store your greywater for a maximum of 24 hours.



Don't let kids or pets play in or around greywater.

## Greywater systems

A greywater system can be very simple. For example, you can use a bucket to carry your bath water outside to water the garden. Or, you can install a state-of-the-art system that does everything for you. The goal is to find a system that makes maximum use of your greywater, while minimising costs for the purchase, installation and maintenance of your system.

Have a look at these systems and decide what would suit you best\*:

- 1. Bucket system:** Use a bucket to transport the greywater, by hand, from the bathroom to garden. It is the cheapest system but may be slightly inconvenient.
- 2. DIY pipe system:** Connect a pipe from the outlet of your bathroom to a hose-pipe. Lay the hose-pipe in the part of your garden that needs watering.
- 3. Commercial greywater system:** The greywater system is connected directly to the outlet pipes of the bathroom and the greywater is collected in a closed storage tank. The greywater is filtered to remove hair and lint. From the storage tank, the greywater is pumped to irrigation pipes and distributed to the garden.

\*Consult a professional if you want to re-use highly contaminated greywater, or blackwater. Always use your discretion when re-using greywater.

Don't use greywater in a mist system (pathogens can be dispersed in the mist) or in a drip system (particles will clog the drip nozzles).

Rand Water and UNISA research shows that the quality of greywater from sample homes in suburbs are all within the parameters of the South African water quality guidelines for irrigation. This means that greywater from your bathroom is safe to use for irrigation in your garden.

### TIP:

Use a nylon stocking or a sock on the end of your drainage hose to filter out lint and hair