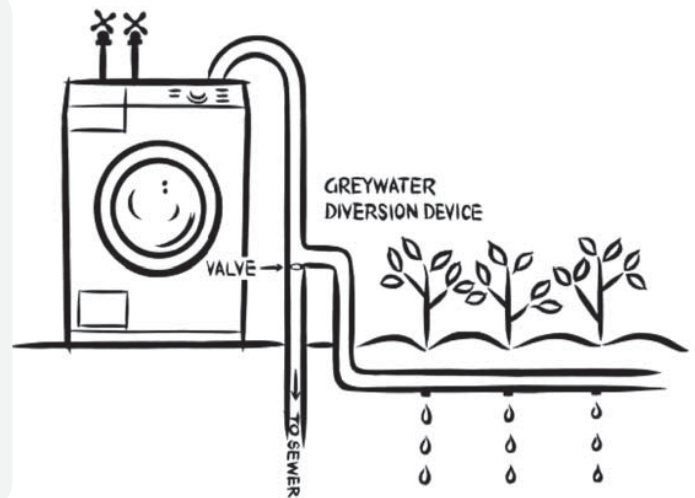


On-site Sewage Management

USE OF GREYWATER

Greywater is classified as domestic wastewater excluding toilet waste and may include wastewater arising from washing machines, laundry tubs, showers, hand basins and baths. Most households generate, on average, approximately 350 litres per day that, unless redirected, is discharged directly to onsite sewage management systems or reticulated sewerage treatment plants. Greywater can contain pollutants such as micro-organisms, chemicals and other materials that can be a health risk to the public and the environment.



WHY REUSE GREYWATER?

With water being an ever-precious resource, it is becoming increasingly important to explore opportunities to reuse greywater for domestic purposes where health and environmental impacts will not result. Due to ongoing water restrictions, you may wish to consider the reuse of greywater from within your house to place less of a strain on Sydney's potable water supply.

GREYWATER DIVERSION DEVICES

Diversion devices allow the re-direction of household greywater through specialised plumbing fixtures to sub-surface irrigation pipes within your garden. Flows are usually controlled by a tap or switch, allowing the discharge to be directed to sewer during wet weather or when water is not required in the garden. These devices can be gravity fed or can rely on a pump and surge tank arrangement which will automatically regulate flows. These systems do not allow storage or treatment/disinfection.

Greywater diversion devices do not require an Approval to Install or an Approval to Operate if

the system meets the following requirements:

- Your property is in a sewered area
- It is installed in accordance with the Plumbing Code of Australia
- It is installed in accordance with the requirements of NSW Health, Greywater Reuse in Sewered Single Domestic Premises, April 2000; and
- The following performance standards are achieved:
 - a. prevention of the spread of disease by micro-organisms
 - b. prevention of the spread of foul odours
 - c. prevention of contamination of water
 - d. prevention of degradation of soil and vegetation
 - e. the discouragement of insects and vermin
 - f. ensuring that people do not come into contact with untreated sewage or effluent in ordinary activities on the premises concerned
 - g. the minimisation of any adverse impacts on the amenity of the property and surrounding lands

On-site Sewage Management

USE OF GREYWATER

If a property has an existing on-site sewage management system, an Approval to Operate from Council is required under the Local Government Act 1993 and its Regulations, for a greywater diversion device.

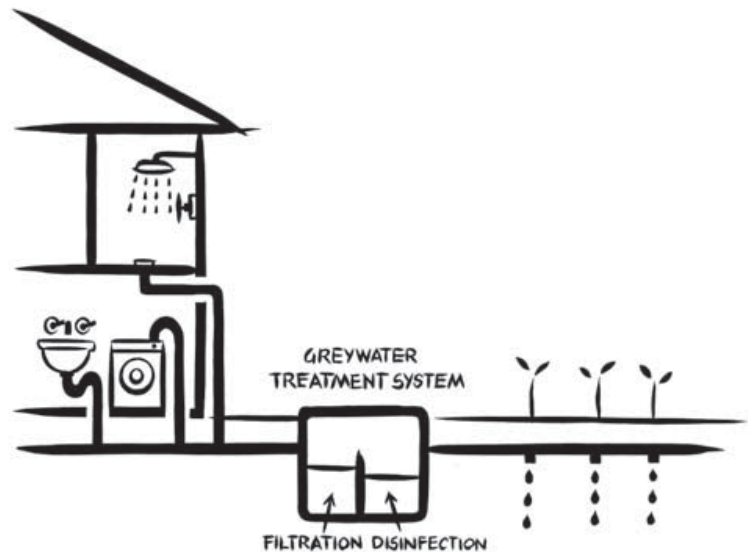
GREYWATER TREATMENT SYSTEMS

Treatment systems collect, store and treat greywater to a quality which will allow discharge directly onto the surface of your lawn or garden, or for toilet or laundry reuse. The treatment process involves the settling of solids, flotation of lighter materials, anaerobic digestion, aeration, clarification and disinfection. Disinfection is the last process, usually consisting of chlorination of clarified water, and is undertaken to eliminate pathogenic micro-organisms. This type of system must be accredited by NSW Health and requires Council approval to install and operate under the Local Government Act 1993 and its Regulations. Once a greywater reuse system is set up, the greywater must not leave the premises or be discharged where it can flow into a stormwater drainage line or waterway, as this is an offence under the Protection of the Environment Operations Act 1997.

PREVENTING HEALTH AND ENVIRONMENTAL IMPACTS FROM GREYWATER REUSE

Points for consideration when using recycled greywater:

- Greywater, although not the same as sewage, is still wastewater that contains contaminants
- Gastro-intestinal illness can be transmitted through improper use



- Treated greywater cannot be re-used for domestic drinking purposes
- Untreated greywater cannot be distributed through spray irrigation or by hose onto the ground surface
- Greywater must not be stored due to the potential for it to turn septic, odorous, and attract vermin
- Use signs to indicate areas where treated greywater is used for surface irrigation
- Do not allow surges to overflow into stormwater drains or other properties
- Try to use products low in nutrient and chemical additives. Some chemicals change the nature of soils, reducing their ability to absorb nutrients and water

FURTHER INFORMATION

Sydney Water sydneywater.com.au

NSW Health health.nsw.gov.au

Approval to Install and Operate Application forms

hornsby.nsw.gov.au/wastewater

General information on greywater systems can be obtained from Council's Regulatory Services Branch on 9847 6829, or via email to compliance@hornsby.nsw.gov.au