



## ***RAINWATER TANK SYSTEMS (USING ROOF WATER) IN RETICULATED WATER SERVICE AREAS POLICY***

### **POLICY SUMMARY STATEMENT**

Rainwater tanks that use roof water are an acceptable means for residents and infrastructure providers in the Emerald Shire Council (ESC) area to help:

- reduce demand from the reticulated water supply;
- reduce stormwater runoff; and,
- achieve more sustainable development.

Additionally, to the extent that demand from the reticulated water supply is reduced by the installation of rainwater tanks, the frequency, severity and duration of water supply restrictions should be reduced. However, whenever the imposition of water supply restrictions is considered necessary by Council, they will apply equally to all premises, whether or not a rainwater tank has been installed at those premises.

### **POLICY CONDITIONS**

Rainwater tank installations are supported and encouraged by Council in its area subject to the following conditions:

#### **Installation**

In reticulated water service areas, rainwater tanks shall be installed generally in accordance with Council's Guidelines for the Installation of Rainwater Tanks in Reticulated Service Water Areas. These guidelines require that the rainwater tank be provided with a back-up supply from the reticulated town water supply. This back-up ensures that the rainwater tank will never empty as long as the reticulated supply remains available.

#### **Uses**

There are no restrictions on the uses to which water supplied by a rainwater tank are put. A decision on such uses is undertaken at the risk and responsibility of the property owner. Current information indicates that, in urban areas, roof water collected and stored in rainwater tanks is of a quality suitable for toilet flushing, laundry and garden watering, car washing and other outdoor uses. Notwithstanding this absence of restrictions, the use of water supplied from a rainwater tank for drinking or other potable purposes is **not recommended** by Council. Council considers that where a treated, public water supply is available, it should be used exclusively for all potable purposes. Council further considers that people with weakened immune systems should contact their Doctor or Local Health Unit for additional advice about the potential risks of using water sourced from rainwater tanks for potable purposes.

## Statutory and Council Requirements

It is the responsibility of the property owner to comply with all health, building, amenity, plumbing and drainage requirements of relevant State/Local regulations, Australian Standards and Council's Guidelines for the Installation of Rainwater Tanks in Reticulated Service Water Areas.

Emphasis is placed on the following requirements:

- Building Approvals for tanks that exceed certain size limitations and for most underground tanks and tanks on elevated stands;
- Prevention of mosquito and vermin breeding through appropriate system design, the use of barrier screens and regular maintenance as required by Queensland Health Regulations;
- Management of overflows from tanks to prevent stormwater nuisance to neighbouring properties;
- Plumbing Approval from Council for plumbing works; and,
- Siting and Amenity: Rainwater tanks and their associated support structures, plumbing and drainage to be of a suitable appearance that is in keeping with surrounding dwelling, building, streetscapes or environment and not to cause undue visual, noise (from pumps) or other nuisances to neighbours. Underground tanks to be sited well away from septic tank systems, sanitary sewer mains and sewer house drains.

## Protection of Council's Reticulated Water Supply

- The water pipe system that supplies water from the rainwater tank to the various points of use shall be kept entirely separate from the water pipe system that supplies mains water. That is, there shall be two separate water supply pipe systems with no physical interconnections between them.
- The rainwater tank shall be provided with a back-up supply from the reticulated water supply to ensure that as long as the reticulated water supply is available the tank will not run dry. At the point of entry of the back-up supply to the tank, an air gap complying with Australian Standard AS/NZS 3500.1 shall be provided above the highest possible water level in the tank to prevent backflow.
- Water quality in the reticulated water supply shall be protected through the appropriate design and use of rainwater tank systems that ensure water does not stagnate within the reticulated water system.
- All external hose tap outlets which continue to be supplied from the reticulated water supply system after the rainwater tank is installed shall be fitted with an approved 'Vacuum breaker' complying with AS/NZS 3500.1 Council would prefer that all external hose tap outlets be supplied from the tank with signage stating **RAINWATER TANK SUPPLY**.

## Development Assessment

- Council will give preference to rainwater tank systems that are configured to optimally reduce demand on reticulated water supply and stormwater infrastructure. Optimal sizing comprises balancing the system cost against the desired uses for a tank, desired retention and detention of stormwater, the desired reduction in demand for reticulated water supply, and available space; and,
- Council encourages the energy efficiency benefits of including rainwater tanks into building structures to improve the thermal properties of the building.

## **Uptake of Rainwater Tanks**

In recognition of the potential infrastructure related and environmental benefits of rainwater tanks, Council will facilitate the uptake of tanks through:

- Providing Guidelines for the Installation of Rainwater Tanks in Reticulated Water Service Areas and other information to help inform consumers on the selection, design and maintenance of tank systems.
- Undertaking community education and awareness building.
- Considering measures to make tanks a more cost-effective and viable water supply and stormwater management option; and,
- Utilising monitoring information on tank performance and users' perceptions to refine and improve this Policy and the associated Guidelines and implementation processes.

## **Other Water Saving Strategies**

In conjunction with this policy on rainwater tanks, Council also encourages the adoption by its residents of other water and cost saving strategies such as:

- The installation of water efficient toilet cisterns;
- The installation of water efficient shower heads;
- The installation of tap flow regulators/aerators;
- The installation of flow limiting valves;
- The installation of micro or drip-irrigation systems for gardens and landscaped areas; and,
- The use of water and energy efficient washing machines and dishwashers.