



Home of the solid poured concrete tank

**OPERATION AND PROCEDURES MANUAL
FOR 3,700 TO 22,500 LITRE CONCRETE
WATER DETENTION AND RETENTION TANKS**

Thank you for choosing a KP Concrete Water Tank.

Your property will be installed with an In Ground or Above Ground water tank supplied by KP Concrete Tanks. All KP concrete tanks have a guarantee for a period of 25 years as long as the installation and connections are in accordance with the conditions on our guarantee card.

The specifications for this range of tanks are available on our website www.kpconcrete.co.nz under the 'Stormwater Tanks' tab.

Why a Concrete Water Tank?

Collection and storage of rainwater in concrete tanks for domestic water usage is common in New Zealand. Rainwater of course is basically pure water with little, if any, dissolved solids. This makes the water very soft and slightly acidic, therefore it will readily dissolve a variety of elements it comes into contact with. This includes the cement in the concrete of tanks which will to varying degrees, depending on construction and sealing processes, dissolve into the water. Brand new tanks are usually the most affected. These dissolved elements are not harmful but consist of naturally occurring carbonates and hydroxides. These are basically alkaline and will tend to buffer the water along with elevating alkalinity and pH. This is in fact a very beneficial phenomenon because it makes the water a lot less aggressive and corrosive on metal plumbing and fixtures within the house. Water remains 6 degrees cooler in your tank during the summer time than other types of tanks.

Why then a KP Concrete Water Tank?

KP Concrete Tanks is the home of the solid poured concrete tank. As a founder member of the New Zealand Concrete Tank Manufacturers Association Inc (NZCTMA) we produce our concrete tanks to a very high quality which exceeds the rigorous standards with a main focus on the materials used, and the methods in how the tanks are manufactured. This ensures the finished product is of a high quality standard giving current and potential customers' peace of mind satisfaction. Check out the association's website for further information by going to www.nzctma.co.nz.

In 2015 KP Concrete has been producing concrete water tanks for 37 years. Combined with experience and quality standards you can be assured of the very best investment for your water storage budget.



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How Does it Work?

Once the water tank is installed on your property, it is connected up to your house, barn or other building with a good sized roof area, which acts as a water catchment area. The rain water is collected via the guttering on those roofs and piped into your water tank.

A water pump is installed and this then supplies your home with a water supply with good water pressure.

In rural areas, where the water tank is supplying water for livestock, the water reticulation is often gravity fed when the water troughs for stock are at a lower level than the water tank. Thereby the water flows freely without the assistance of a water pump into the water troughs. In some cases where the land is not flat and the water tank is located at a lower level than some paddocks, a water pump is installed in order to pump water up to those troughs and areas.

Are Water Filters Necessary?

For drinking (potable) water, yes they are. It is advisable to have a water filter system installed at your KP tank so that every tap in your house is safe for drinking water. There many different types of modern water filters available ranging from membrane filters and high quality water filtration cartridge systems removing micron sized matter, through to ultraviolet (UV) light filters to remove bio matter.

Clean drinking water is essential to the health of every New Zealander. With our water supply affected by growing water problems you can't afford to take the risk with your family.

Water filter systems available are designed to combat potentially harmful micro-organisms, germs and diseases that may live in your water supply. So what you are left with is a pure taste, safe water and peace of mind. There are many excellent water filter solutions available in the market. We recommend you shop around for what solution is best for your family situation.

Maintenance and Inspection Procedure

KP stormwater detention/retention tanks are designed to trap silt on the bottom of the tank and stop it entering the storm water system. Over time silt may accumulate in the tank and will need to be removed. In addition the outlet orifice(s) may become blocked with debris.

We recommend that the tank be maintained every 12 months, mainly after autumn leaf fall.



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- Inspect the gutters and remove any leaves to prevent them entering the water tank. KP Concrete recommends Leafbusters Gutter Guard products for your home to further enhance your water quality.
- Using the T-Bar handle provided, screw handle into the lid of the tank and remove the lid.
- Using a torch if necessary, inspect the outlet orifice(s) to ensure they are not blocked with debris as this may affect the rate at which water can exit the tank.
- Clear debris from the orifice if necessary.
- Remove floating debris from the tank.
- Replace lid and unfasten the T-Bar handle. Store the handle in a safe place.
- Please ensure tank lid is firmly in place in correct position.

Caution

- ❖ DO NOT inspect the tank if it is raining or has recently rained. It is recommended to allow for the water level to be at a minimum level.
- ❖ If it is necessary to climb inside the detention tank to undertake inspection or maintenance, you must follow appropriate Health and Safety guidelines before entering the tank. Always have someone standing by if you climb inside the tank.
- ❖ We recommend you do not use detergents or cleaning products to clean the inside of your tank.
- ❖ Do not leave the manhole lid open and unattended at anytime.