

STORMFILTER™

High efficiency /
low maintenance
stormwater filter.

SIPHON-ACTUATED FILTRATION The Stormwater Management StormFilter® cleans stormwater through a patented passive filtration system, effectively removing pollutants to meet the most stringent regulatory requirements. Highly reliable, easy to install and maintain, and proven performance over time, StormFilter products are recognised as a versatile BMP for removing a variety of pollutants, such as sediments, oil and grease, metals, organics, and nutrients. These systems come in variable configurations to match local conditions and come with prolonged maintenance periods to ensure long-term performance and reduce operating costs.

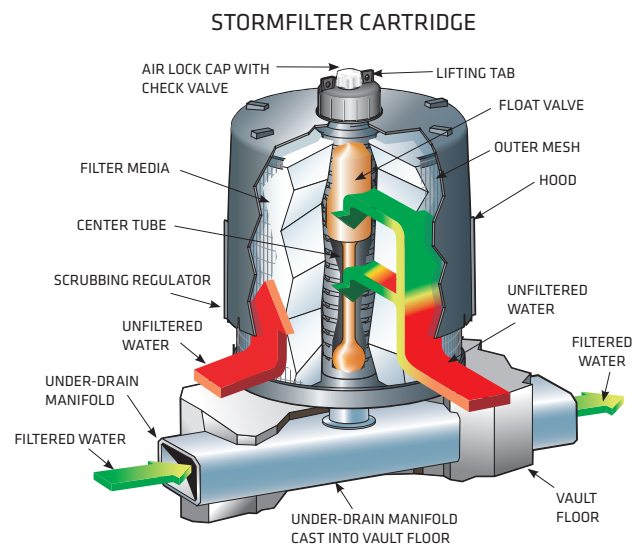
HOW DOES IT WORK?

During a storm, runoff passes through the filtration media and starts filling the cartridge center tube. Air below the hood is purged through a one-way check valve as the water rises. When water reaches the top of the float, buoyant forces pull the float free and allow filtered water to drain.

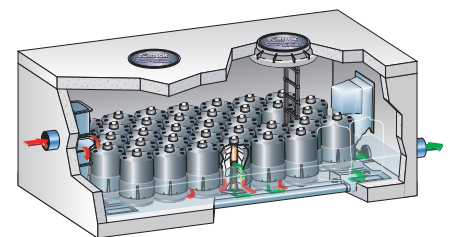
After the storm, the water level in the structure starts falling. A hanging water column remains under the cartridge hood until the water level reaches the scrubbing regulators. Air then rushes through the regulators releasing water and creating air bubbles that agitate the surface of the filter media, causing accumulated sediment to drop to the vault floor. This patented surface-cleaning mechanism helps restore the filter's permeability between storm events.

PROVEN PERFORMANCE

- **New Zealand's only independently verified filter** by Washington Department of Ecology, New Jersey Department of Environmental Protection and USEPA's Environmental Technology Verification program).
- **Approved Auckland Council** >75% TSS removal and approved on high trafficked roads (>20,000 V.P.D)
- **Over 550 x StormFilter's installed** throughout New Zealand-treating over 3.7 million m² of catchment area
- **8th generation of the product.** Design refined and perfected over two decades of research and experience



STORMFILTER VAULT



STORMFILTER BENEFITS

UNDERGROUND SYSTEMS MAXIMISE PROFITABILITY

- Save land space allowing denser developments reducing sprawl
- Add parking spaces and increase building size, increasing profitability
- Compact design reduces construction and installation costs by limiting excavation

RELIABLE LONGEVITY & LOWER MAINTENANCE COSTS

- Self cleaning hood prevents surface blinding, ensures use of all media and prolongs cartridge life
- 1-3 year maintenance cycles
- 8 years maintenance experience – 1-5 year contracts with cost guarantees
- Minimal or no standing water. Lower disposal costs

CONTACT DETAILS

Stormwater360

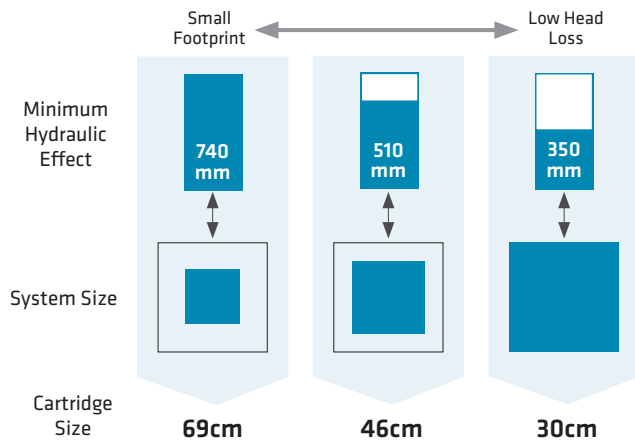
FREEPHONE:
0800 STORMWATER
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www.stormwater360.co.nz

Stormwater360®
BETWEEN SKY AND SEA

SUPERIOR HYDRAULICS

Multiple cartridge heights gives design solutions for site restraints.



Other hydraulic benefits

- Low hydraulic effect as low as 350 mm head loss
- Zero surcharge of inlet pipe unlike upward flowing filters
- Can be operated with tail water e.g tidal conditions
- Online and offline configurations can limit hydraulic effects

MEDIA CHOICES

Our filtration products can be customised using different filter media to target site-specific pollutants. A combination of media is often recommended to maximise pollutant removal effectiveness.



Perlite is naturally occurring puffed volcanic ash. Effective for removing TSS, oil and grease.



ZPG™ is a multi-purpose media option approved for highly trafficked sites or sites with high metal loadings. ZPG is a mixture of Zeolite, Perlite and GAC (granular activated carbon). ZPG is ideal for removing soluble metals, TSS, oils and grease, organics and ammonium.



Zeolite is a naturally occurring mineral used to remove soluble metals, ammonium and some organics.



GAC (Granular Activated Carbon) has a micro-porous structure with an extensive surface area to provide high levels of adsorption. It is primarily used to remove oil and grease and organics such as PAHs and phthalates.

CONFIGURATION

Stormfilter's can be configured in any drainage structure. Please contact SW360 for a customised design.



PRECAST VAULT

- Treats medium sized sites
- Simple installation – arrives on-site fully assembled

DRYWELL/SOAKAGE

- Provides treatment and infiltration in one structure
- Available for new construction and retrofit applications
- Easy installation
- Shallow and Rock soakage models available



HIGH FLOW

- Treats flows from large sites
- Consists of large, precast components designed for easy assembly on-site
- Several configurations available, including: Panel Vault, Box Culvert, or Cast-In-Place

DETENTION

- Meets volume-based stormwater treatment regulations
- Captures and treats site specific Water Quality and Quantity Volume
- StormFilter cartridges provide treatment and control the discharge rate
- Can be designed to capture all, or a portion, of the WQV
- Detention vault configured to provide pre-treatment



CATCHPIT/ CURB-INLET

- Provides a low cost, low drop, point-of-entry configuration
- Treats sheet flow from small sites
- Accommodates curb inlet openings from 1 to 3 metres long

PRECAST MANHOLE

- Provides a low drop, point-of-entry configuration
- Uses drop from the curb inlet to the conveyance pipe to drive the passive filtration cartridges
- No crane required (Hi-AB lifting for most sizes)
- 1050-2400mm diameter sizes available

