Aquaseal

Technical Guide D10.17

Aquaseal is a caulking gun applied water stop sealant designed to seal leaking structures and stop leaks instantly.



Applications

Used for water control, inflow and infiltration in manholes, vaults and other concrete, brick or stone structures above or below ground

Product Attributes

Designed to stop leaks in excess of 200 litres/minute and cracks > 0.05mm

Comes packaged in 600 ml dual component plastic cartridges

Specialist non-return static mixer and heavy duty dual component caulking guns are also available, making installation quick and easy

Approvals/Standards

AS2498 Methods of testing rigid cellular plastics

AS2282 Methods of testing flexible polyurethane

AS2122 Combustible characteristics of plastics

Quality

ISO 9001 Manufacturer

We are the supply partner of choice for New Zealand's civil construction industry, specialising in water and infrastructure based solutions.



Aquaseal is an extremely reactive two component hydrophobic polyurethane water stop system that can be injected into flowing water, reacting in 3 - 5 seconds. Infiltration is instantly stopped in its tracks, any void is rapidly filled without any absorption of water.

- Aquaseal is designed to stop high infiltration sources in concrete or brick structures, sealing leaks in excess of 200 litres/minute and cracks > 0.05mm. The cured polyurethane creates a mushroom like seal to permanently stop leaks, performs well in corrosive sewer environments and will resist wet/dry cycles.
- Aquaseal comes packaged in 600ml dual component plastic cartridges. Specialist non-return static mixers and heavy duty dual component caulking guns are also available, making installation quick and easy.

Advantages

- Extremely fast reacting and rapid sealing
- Will inject directly into flowing water and will not wash out
- Will inject into the finest of fractures, rather than just covering them up
- High early strength
- Re-sealable/reusable, use only what is needed
- Non-hazardous, no VOCs, CFC's or HFC's

How much money can Aquaseal save you?

One manhole leaking 10L/minute will leak 15m³ per day. If the cost of treating wastewater is \$2m³, then this single Manhole with a 10L/minute leak costs more than \$10,000 per year, forever!

TABLE 1 Annual Cost per m³ to Treat Wastewater

Size of Leak litres/minute	\$1.00	\$1.50	\$2.00	\$2.50	\$3.00
5	\$2,628	\$3,942	\$5,256	\$6,570	\$7,884
10	\$5,256	\$7,884	\$10,512	\$13,140	\$15,768
15	\$7,884	\$11,826	\$15,768	\$19,710	\$23,652
20	\$10,512	\$15,768	\$21,024	\$26,280	\$31,536

TABLE	2 I	Prod	uct	Code	•

Hynds Code	Description
AQUASEALCART600	Catridge 600mls Aquaseal
AQUASEALGUN	Caulking Dual Gun Aquaseal
AQUASEALMIXER	Mixer Aqua Seal

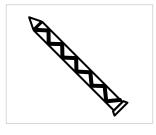


FIG. 1 Leaking MH

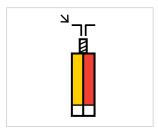


FIG. 2 Aquaseal being applied to permanently stop and seal leak

Installation







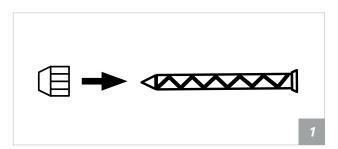


A - Static Mixer

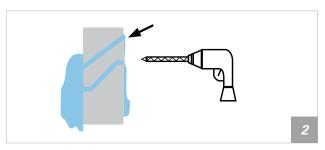
B - Nut

C – End Caps

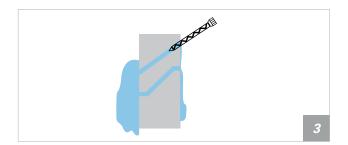
D - Dual Caulk Gun



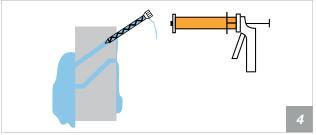




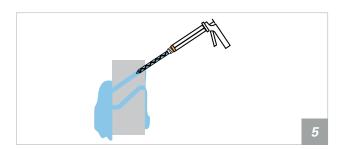
Locate leak and drill a 15mm hole, 150mm above the leak, at a 45 degree angle downward to intercept the leak. Drill completely through the wall of the structure.



Tap static mixer into hole (pointed end first) until snug. Prepare gun by pulling back plungers on E (dual caulk gun), insert D (tubes), while holding vertical, remove C (end caps) from threaded end of tubes.



Quickly align threads on D (tubes) with B (nut) and tighten to secure. Tubes must be 20°C or warmer, place in hot water to heat.



Pump gun vigorously to expel grout to refusal or foam shows. If there is a high velocity leak and grout is washing out, attach balloon onto end of static mixer with tape and insert mixer into hole and pump gun to expel the grout to refusal or seal.

Branches Nationwide Support Office & Technical Services 09 274 0316

Disclaimer: While every effort has been made to ensure that the information in this document is correct and accurate, users of Hynds product or information within this document must make their own assessment of suitability for their particular application. Product dimensions are nominal only, and should be verified if critical to a particular installation. No warranty is either expressed, implied, or statutory made by Hynds unless expressly stated in any sale and purchase agreement entered into between Hynds and the user.



