

Water Motor Alarm

The Water Motor Alarm is a hydromechanical automatic sound warning device actuated by water flow.

It sounds a continuous alarm while a Deluge or Water Control Valve operates.

This unit is designed for wall or pipe mounting and is suitable for outdoor installation.

The Water Motor Alarm gong assembly package is supplied loose and includes a 3/4" strainer.

Features

- Self contained, line pressure operated
- Quick and positive operation
- Weather proof
- No cover needed, suited for outdoor installation

Approvals

- UL Listed
- Optional: FM Approved

Materials

- Gong: Aluminum
- Housing: Aluminum
- Fasteners: Galvanized Steel
- Impeller: Delrin
- Nozzle: Brass

End Connections

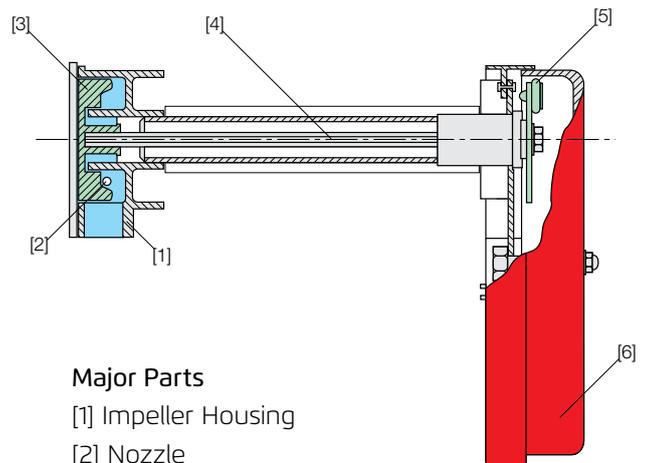
- Inlet: 3/4" BSPT (F)
- Outlet drain: 1" BSPT (F)

Operation

When a Deluge Valve is activated, water flows through the valve's trim, supplying water pressure through the strainer and into the water motor inlet. From the inlet, the water flows through a nozzle [2] which directs the stream to the impeller [3]. The stream turns the impeller and drive shaft [4], causing the striker arm [5] to rotate and strike the gong, thus producing a continuous alarm. The water is discharged through a 1" (25mm) drain outlet at the bottom of the impeller housing. The discharged water must be piped through the wall to the atmosphere or to a suitable open drain.



(for Illustration Only)



Major Parts

- [1] Impeller Housing
- [2] Nozzle
- [3] Impeller
- [4] Drive Shaft
- [5] Alarm Arm Assembly
- [6] Gong

Technical Data

Gong Specifications

- Outlet Sound: 90dB
- Diameter: 233mm (9")

Water Working Pressure

- Max: 17.2bar (250psi)
- Min: 2bar (30psi)

Shipping Weight

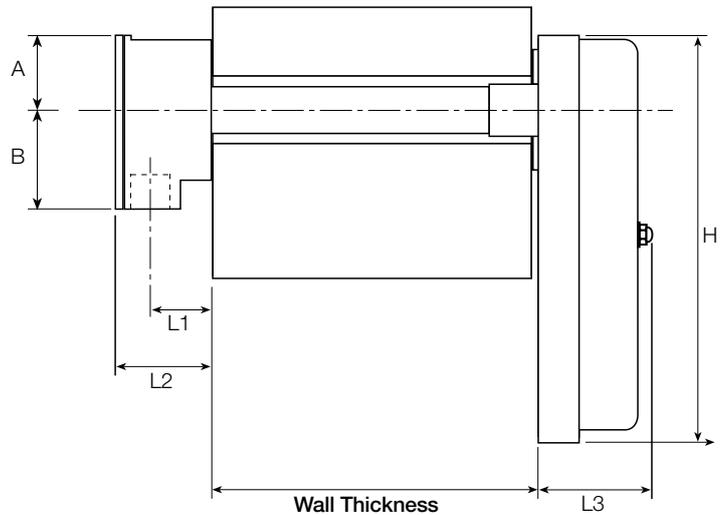
- 3.3kg (7.5lbs)

Accessories

- The package also includes the required 3/4" BSP strainer for installation on the alarm line.

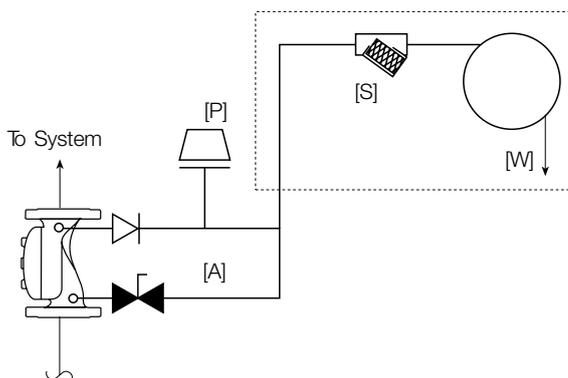
Design Requirements

- Locate the Water Motor Alarm on an exterior wall as close as practical to the valve being monitored for water flow. A strainer (3/4", included in package) is required on the alarm line. The location must be easily accessible for cleaning.
- The alarm line pipe must be 3/4" in size with a maximum total length of 22.8m (75ft) and a minimum number of fittings. If the length of the pipe exceeds 22.8m (75ft), then a larger pipe size must be used to reduce hydraulic friction loss. The sprinkler alarm should not be located more than 1.8m (6ft) above alarm valve.



* Wall thickness up to 10" (250mm) as standard, for higher wall thickness contact BERMAD

	mm	inch
A	57	2 ¹ / ₄
B	70	2 ³ / ₄
H	233	9
L1	41	1 ⁵ / ₄
L2	71	2 ³ / ₄
L3	89	3 ¹ / ₂



Major Parts

- [A] Valve Trim Accessories
- [P] Pressure Switch
- [S] Strainer
- [W] Water Motor Alarm

