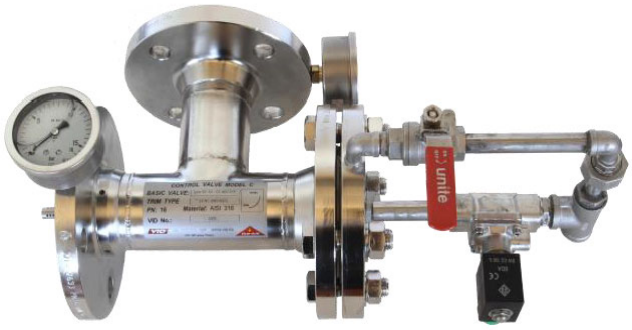
DATA SHEET

DuraQuench™ C-EL DELUGE CONTROL VALVE



Description

The C-EL deluge control valve is a robust and reliable deluge, angle positioned, pilot controlled valve created entirely in stainless steel (316L) which enables it to function under harsh conditions and to be connected to systems where no corrosion is allowed. The valve is designed for operating in open deluge systems as a zone valve or a full flooding/deluge valve.

The C-EL control valve features a smaller external trim than conventional control valves, making the valve easy to install, more economical and greatly diminishing the amount of space required for installation. The valve can be ordered with either ANSI flange or threaded inlet and outlet connections and can be easily disassembled for maintenance and refurbishment, without removing the valve housing from the connected system.

The valve trim provides two methods of system activation which includes a manual release lever and electrical release through a 24 VDC impulse solenoid valve. The impulse solenoid valve is designed to hold the C-EL valve in the open position once active. The valve will remain in the open position until a reverse polarity voltage is applied to the impulse solenoid allowing the C-EL valve to close.

Valve Sizes and Variations

Fike Part Number	Thread Sizes		KV-Value (pressure loss)
	Inlet	Outlet	
02-14873-1	2" NPT	2" NPT	119 g/min at 14.5 psi (450 l/min at 1 bar)
02-14873-2	3" NPT	3" NPT	476 g/min at 14.5 psi (1800 l/min at 1 bar)
Fike Part Number	**Flange Sizes**		**KV-Value**
	Inlet	**Outlet**	
02-14873-3	DN 50	DN 50	119 g/min at 14.5 psi (450 l/min at 1 bar)
02-14873-4	DN 80	DN 80	476 g/min at 14.5 psi (1800 l/min at 1 bar)

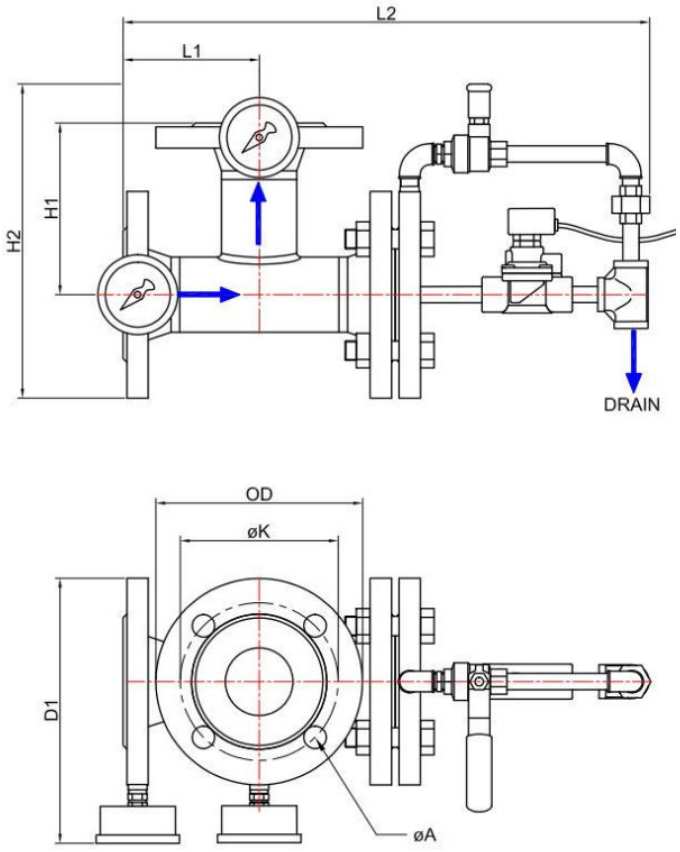
Specifications

Weight	02-14873-1 / 46 lbs.(20.8 kg) 02-14873-2 / 74 lbs. (33.6 kg) 02-14873-3 / 32 lbs. (14.5 kg) 02-14873-4 / 49.6 lbs. (22.5 kg)
Working Pressure	232 psi (16 bar) maximum 29 psi (2 bar) minimum
Factory Tested Pressure	348 psi (24 bar) maximum
Materials	Stainless Steel, ANSI 316L
Gasket Materials	EPDM
Pressure Gauge Locations	Valve Inlet and Primary Valve Outlet
Activation Options	– Manual Release Lever – Electric Impulse Solenoid (24 VDC, 10W, NC)
Listing / Approvals	Factory Mutual

Spare Parts

Fike Part Number	Description
02-15258-1	Valve Wrench
02-15258-2	Basic Valve Service Kit (2" and DN 50 C-EL Valves)
02-15258-3	Full Valve Service Kit (2" and DN 50 C-EL Valves)
02-15258-4	Basic Valve Service Kit (3" and DN 80 C-EL Valves)
02-15258-5	Full Valve Service Kit (3" and DN 80 C-EL Valves)
02-15258-6	Valve Core Kit (2" and DN 50 C-EL Valves)
02-15258-7	Valve Core Kit (3" and DN 80 C-EL Valves)

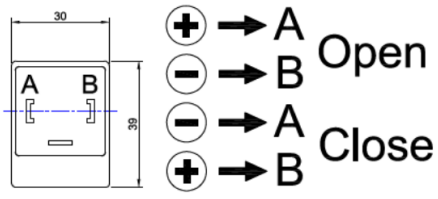
Dimensions

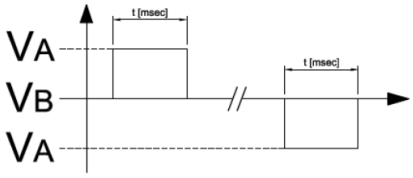


	02-14873-3 DN 50-50	02-14873-1 BSP 2"–2"	02-14873-4 DN 80-80	02-14873-2 BSP 3"-3"
L1	4.29 in. (109 mm)	5.39 in. (137 mm)	5.20 in. (132 mm)	7.48 in. (190 mm)
L2	16.54 in. (420 mm)	17.68 in. (449 mm)	18.54 in. (471 mm)	20.87 in. (530 mm)
H1	5.39 in. (137 mm)	6.50 in. (165 mm)	6.58 in. (167 mm)	8.86 in. (225 mm)
H2	9.88 in. (251 mm)	9.88 in. (251 mm)	12.68 in. (322 mm)	12.80 in. (325 mm)
D1	8.35 in. (212 mm)	8.35 in. (212 mm)	9.84 in. (250 mm)	9.84 in. (250 mm)
OD	6.50 in. (165 mm)	6.50 in. (165 mm)	7.87 in. (200 mm)	7.87 in. (200 mm)
ØK	4.92 in. (125 mm)	4.92 in. (125 mm)	6.30 in. (160 mm)	6.30 in. (160 mm)
ØA	4 x Ø0.70 in. (18 mm)	4 x Ø0.70 in. (18 mm)	8 x Ø0.70 in. (18 mm)	8 x Ø0.70 in. (18 mm)

Impulse Solenoid Valve

Impulse feed from 24 VDC for a period lasting from 20 to 100 milliseconds.





NOTE: To ensure correct operation, the fluid should be filtered to eliminate all traces of impurity subject to magnetic attraction, which would inevitably deposit on the cores of the solenoid valve, which are always magnetized causing the formation of oxide as well as a contact problem.