Meggitt Fuelling Products Avery-Hardoll Whittaker Controls

PRODUCTS - Couplings

CCMY8500M2 SERIES FOUR-INCH A.P.I. COUPLER



The CCMY8500M2 Series Four-inch A.P.I. Coupler has been designed to comply with all the operational and test requirements of the A.P.I. Standard Specification (A.P.I. 1584) for Four-inch Hydrant system components and arrangements.

- RUGGED CONSTRUCTION AND ROBUST DESIGN FOR LONG LIFE
- LOW WEIGHT
- LOW PRESSURE DROP
- ADJUSTABLE SMOOTH OPENING AND CLOSING CHARACTERISTICS
- HIGH STABILITY



Operation

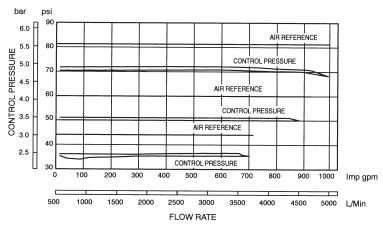
Four-inch Pressure Control Valve with deadman. This valve has been designed for use with aviation kerosenes and gasolines on refuelling vehicles.

It regulates downstream pressure regardless of input pressure or flow rate and incorporates a deadman facility.

The valve is air referenced and has a typical bias of 10-12 psi at full flow,(1000 gpm - 1200 US gpm). The total pressure drop through the valves approximately 14 psi at 1000 Imp gpm (1200 US gpm).

A pressure relief valve between coupler and pressure control valve automatically breaks the hydraulic lock on closure of the coupler.

OPERATING PRESSURE CONTROL



PRESSURE DROP psi bar 16-15-14-13-12-11-1.0 4" Intake Pressure Control Valve with Dead-0.9 man, including 4" API 0.8 Coupler + CC8000 tank 10⊘s 4" pipework + 90° 0.7 9-0.6 PRESSURE DROP 0.5 0.4 0.3 0.2 4" Coupler elbow and swivel + CC8000 tank 2 unit + 10Øs pipework + bend. 0.1 L/Min 4000 5000

Imp gpm

300

400

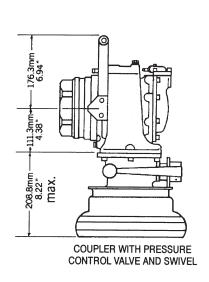
500 600 700 800

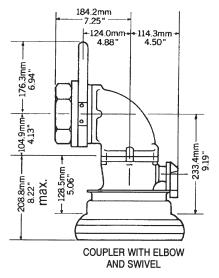
FLOW RATE

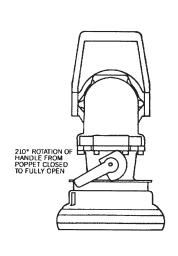
1000

900

Dimensions









General Information

COUPLER

POLYURETHANE BUMPER

Resists abrasion.

LOCKING AND INTERLOCKING

Positive connection between Pit Valve and Coupler by

means of 10 catches.

The poppet valve is prevented from opening when the

Coupler is disconnected.

The Coupler cannot be disconnected when the poppet

valve is open.

EASY SERVICING

The Coupler may be completely dismantled and serviced from the A.P.I. end thus avoiding the need for removal

from the pressure controller.

The nose seal may be renewed while the unit is under

system pressure.

ALTERNATIVE OPERATING

HANDLES

A choice of short or wrap-round handle.

ASSOCIATED EQUIPMENT

Pressure control valve with deadman or 90 deg. elbow.

Construction throughout is mainly of high strength aluminium alloy and stainless steel.

All wetted parts are of anodised aluminium and stainless

steel incorporating fuel resistant seals.

All other components are protected against corrosion.

SMOOTH OPENING AND

CLOSING

Approximately ten seconds to 'full flow'. Approximately five seconds to 'no flow'.

Precise ramped closure prevents vacuum within coupler

hose.

+ 2 psi

PRESSURE CONTROL

LOW BIAS Typically 10-12 psi

LOW HYSTERESIS For details, see graphs.

Rapid response to surge pressures.

FAIL / SAFE Valve will close even if controlling diaphragm ruptures.



Specification

WEIGHT, PRESSURE DROP, PRESSURE RATING		COUPLER	COUPLER, Pressure Control Valve with Deadman & Swivel	COUPLER Elbow & Swivel
WEIGHT		5.7 Kg 12.5 lbs	13 Kg 28lb	9.1 Kg 20 lb
PRESSURE DROP		-	less than 1.16 bar at 4500 l/min less than 17 psi at 1000 lmp gpm (1200 US gpm)	less than 0.65 bar at 4500 l/min less than 9.5 psi at1000 Imp gpm (1200 US gpm)
PRESSURE RATING	MAX. WORKING	-	15 bar 225 psi	15 bar 225 psi
	TEST PRESSURE	-	23 bar 338 psi	23 bar 338 psi
	PROOF PRESSURE COUPLED	-	76 bar 1100 psi	68 bar 1000 psi

Ordering Information

CONFIGURATIONS	CODE NO.	
COUPLER with short handle COUPLER with wrap-around handle with Pressure Control Valve / Deadman with Elbow with Trolley Thread forms	CCMY8500M2 CCMY8501M2 add suffix R2 add suffix E add suffix T add suffix B for BSP or N for NPT	
Selectivity 1-6	add suffix S1-S6	

 $\label{eq:comple} \textbf{Example}: \textbf{CCMY8501M2R2BS1} \ (\textbf{coupler with wrap round handle, pressure control with deadman, BSP thread and selective position 1.)}$

Avery-Hardoll fluid management equipment is developed as a private venture and the policy of the company is one of continuing improvement; therefore the right to change prices, specification and equipment at any time without notice is reserved.

Avery-Hardoll Whittaker Controls
Holland Way
Blandford Forum
Dorset DT11 7BJ
UK
Whittaker Controls
12838 Saticoy St
North Hollywood
California 91605-3505
USA

Tel: +44 (0) 1258 486600 Tel: +1 818 765 8160 Fax: +44 (0) 1258 486601 Fax: +1 818 759 2194

> www.wkr.com meggitt.com

