

DACouplings, Dry Aviation Couplings
According to ISO 45/ MS 24484/STANAG 3105





General information

The Dry Aviation Couplings are designed for use in aviation and military refueling systems with a maximum working pressure of 10 bar (150 psi). Working temperature range lies within -38 °C (-36 °F) to +60 °C (+140 °F), observe that special low temperature seals are used in cold environments. This coupling is not configured for under wing refueling.

All units can also be used as bottom loading or primary points refueling vehicles. All units are manufactured to accept the international standard: 2½" the point bayonet, hose end refueling nozzles, according to: ISO 45 / MS24484 / NATO STANAG 3105 / British Aerospace Specification 2C14.

The couplings consist of high strength aluminium body, coupling ring in gunmetal and bayonet flange and inner parts in stainless steel and aluminium. All wetted parts in aluminium and stainless steel.

Compatibility

ISO 45, MS24484, NATO STANAG 3105, British Aerospace Specification 2C14.

Option

- NPT threaded
- Handles
- Seals in NBR
- Colour RAL green NATO



Operation

The DACouplings include a bayonet-type connector and are flanged or threaded to suit installation requirements. Each Tank unit contains a "fail safe" springloaded valve seating on a tapered seat. The valve is controlled by the action of coupling and uncoupling the Hose unit.

Selectivity

Selective units are fitted with setting rings. These have slots cut into them to match up with the corresponding pins on the selective sleeve on the hose unit. Care must be taken when reassembling such units to ensure that the ring is returned to its original position.

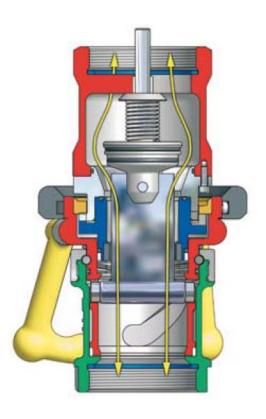




How it works

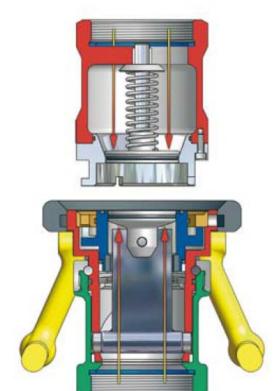
To connect

Push and turn - it's coupled - full flow

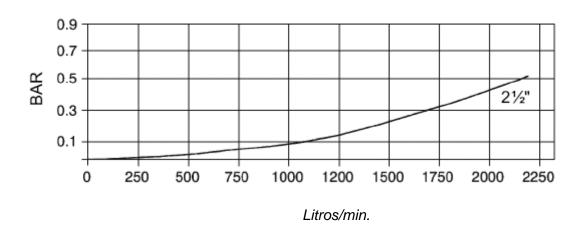


To disconnect

Turn and pull - it's released - no spillage



Pressure drop curve



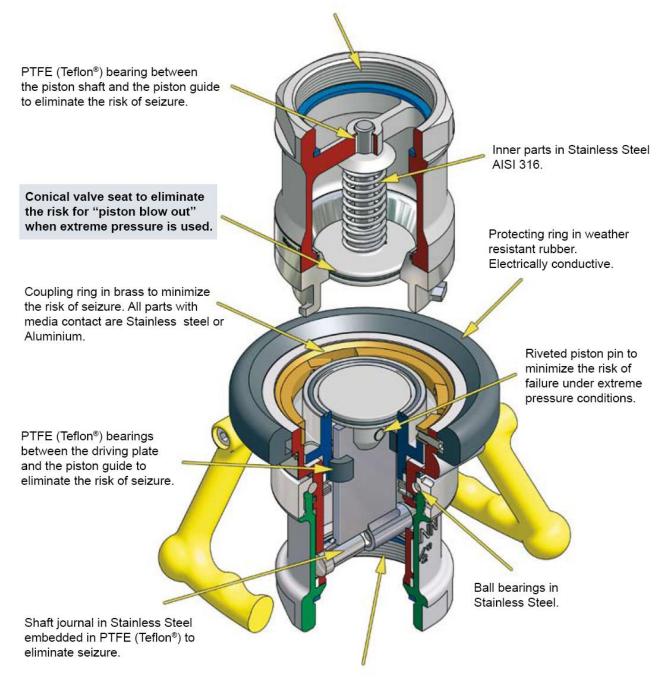




Advantages – All wetted parts in aluminium and stainless steel

No yellow parts (Brass and Bronze) in contact with the fuel.

The Tank unit is supplied with parallel BSP threads and flat sealing surface. This allows the use of the full thread length for screwed-on parts. Also available with flange and tapered internal NPT threads.

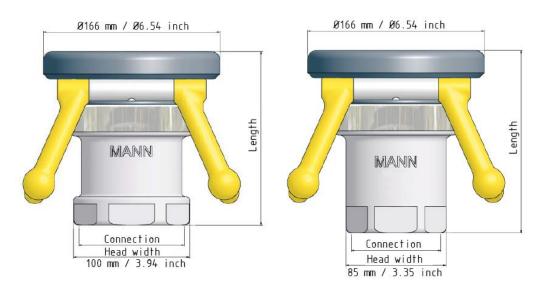


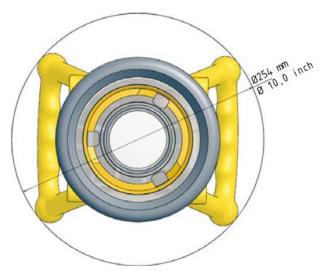
The Hose unit is supplied with parallel BSP threads and flat sealing surface. This allows the use of the full thread length for screwed-on parts. Also available with flange and tapered internal NPT threads.





Hose unit with female thread - Standard Handle





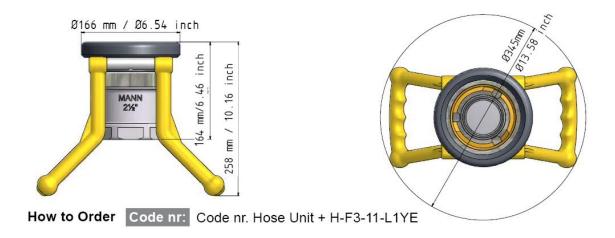
Threads		
BSP = ISO 228		
NPT = B1.20.3		

Code nr.	Length	Head width	Connection	Weight
F312B1101B	164 mm	85 mm	2 ½" BSP	3,4 kg
F314B1101B	164 mm	100 mm	3" BSP	3,5 kg
F313B1101B	172 mm	85 mm	2 ½" NPT	3,4 kg
F315B1101B	174 mm	100 mm	3" NPT	3,5 kg

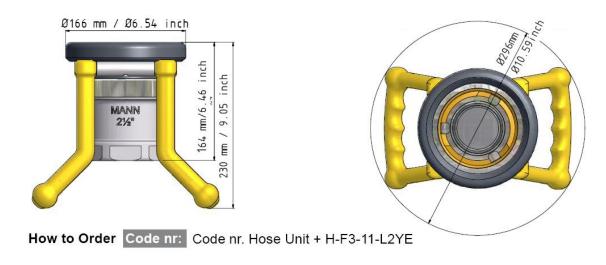




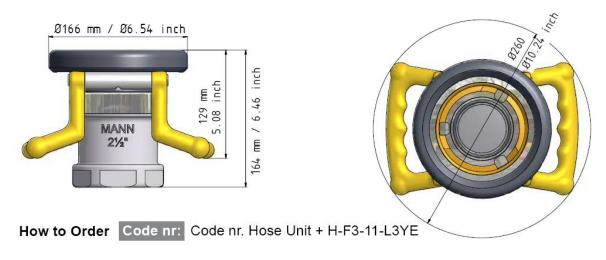
Hose unit option - Long Handle



Hose unit option – Half long Handle



Hose unit option – Depot Handle





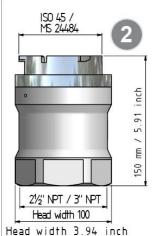


Tank unit with female thread

Code nr.	Connection	Weight
G312A1401B	1 2 ½" F.BSP	2,3 kg
G314A1401B	1 3" F.BSP	2,3 kg
G313A1401B	2 2 ½" F.NPT	2,3 kg
G315A1401B	2 3" F.NPT	2,3 kg

Working pressure	10 bar / 150 psi
Test pressure	15 bar / 225 psi
Threads	BSP = ISO 228





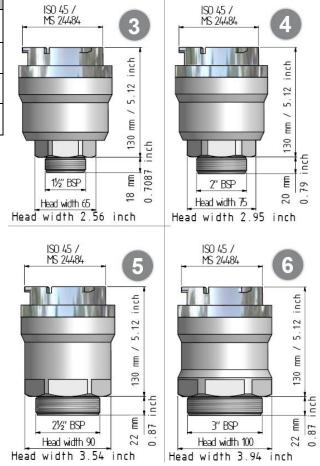
Tank unit with male thread

Code nr.	de nr. Connection	
G375A1401	3 _{1-1/2} " M.BSP	2,1 kg
G378A1404	4 2" M.BSP	2,2 kg
G380A1401	5 2 ½" M.BSP	2,2 kg
G382A1401	6 _{3" M.BSP}	2,3 kg

NPT = B1.20.3

NPT = B1.20.3

Working pressure	10 bar / 150 psi	
Test pressure	15 bar / 225 psi	
Threads BSP = ISO 2		

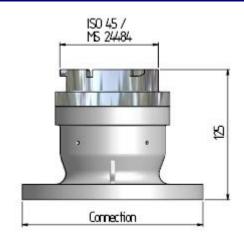






Tank unit with standard flange

Code nr.	Connection	Weight
G359D1401	2-1/2" ASA 150 psi	2,7 kg
G361D1401	3" ASA 150 psi	2,9 kg
G333B1401	DN65 PN10/16	2,8 kg
G336D1401	DN80 PN10/16	3,0 kg
G365D1401	TW1 (DIN 28459)	2,5 kg
G366B1401	TW3 (DIN 28459)	2,9 kg
G367D1401	3" TTMA	2,4 kg
G368D1401	4" TTMA	2,6 kg



Dust cap (for tank unit)

Code nr.	Material	Weight
K300A1101	Aluminium	0,5 kg
K300A2201	Composite *	0,2 kg

A dust cap should be used to prevent the ingress of dirt or water.

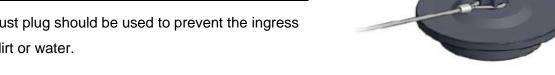




Dust plug (for hose unit)

Code nr.	Material	Weight
I300A1101	Aluminium	0,4 kg
I300A2201	Composite *	0,2 kg

A dust plug should be used to prevent the ingress of dirt or water.



^{*} Lowest operation temperature is -20 °C / -4 °F





Other products



DDCouplings

Dry Disconnect couplings 3/4" to 6", PN 16 - PN 25.
Aluminium, brass-gunmetal, stainless steel and PEEK. Other materials on request.
According to NATO standard STANAG 3756.



SBCouplings, bolt series

Industrial and Marine Safety Break-away, breaking bolts. Aluminium, brass, stainless steel. PN 16.1" to 6", female/male threads and with flanges, with breaking pins.



Full Flow - ball valves

2" to 4", PN 10, Aluminium. Ball valve and 2-way ball valve. Made for petroleum tank trucks. Variations of flange connections.



SBCouplings, cable release

Industrial and Marine Safety Break-away, cable release. Stainless steel PN25. 1 ½" to 4", female threads. 6" to 8" with flanged connection.



DACouplings

2 ½" Dry aviation couplings PN10.
Body in aluminium, trims in stainless steel and aluminium.
Conections: flanges or male/female BSP or NPT threads.
Available in military green colour.
According to ISO 45, MS24484,
NATO STANAG3105.
British Aerospace Spec.2 C14.



Swivel joints

3/4" to 8", PN 10 - PN 25. Aluminium, brass-gunmetal, stainless steel. Other materials on request. Connection: BSP, NPT and flanges



Tel.: (+34) 93 308 36 77 Fax.: (+34) 93 308 36 78 E-mail: coh@marlia-ing.com web: www.marlia-ing.com

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