

AXSERIES

INTERCHANGE > ISO 16028 - NFPA T3.20.15 - HTMA (size 3/8")



Stucchi®

ISO 16028



TECHNICAL FEATURES AND OPTIONS



Interchange

ISO 16028
NFPA T3.20.15
HTMA (size 3/8")



Sealing description

FKM
(VITON®)



Connection system

Push



Available sizes

from 1/4"
to 1"



Material

Stainless steel
(AISI 316L)



Available threads

BSP - METRIC



Operating pressure

Up to 350 bar



Locking mechanism

Locking ball +
Safety Lock



Flow rate

Up to 378 L/Min



Temperature (°C)

-15° / +180°



Valving style

Flat face



Connection under pressure

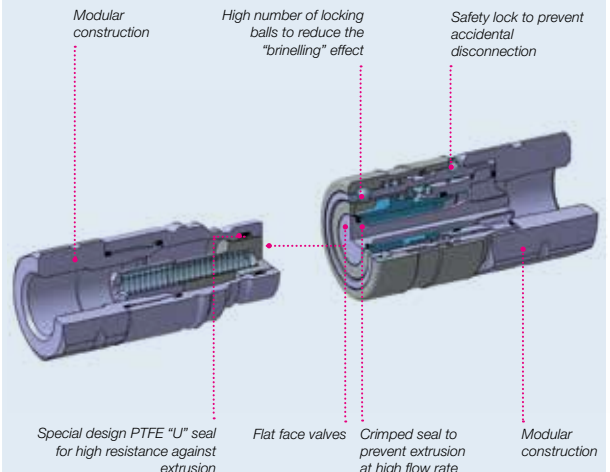
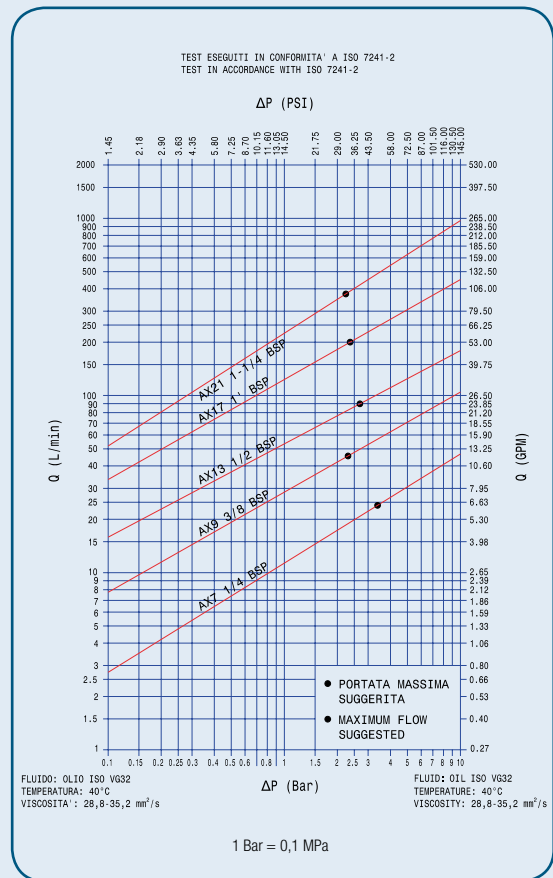
Connection: not allowed
Disconnection: not allowed

BENEFITS

- Flat face is easy to clean, reducing the inclusion of contamination inside the hydraulic circuit.
- Minimal fluid spillage during disconnection, reducing fluid spillage to the environment.
- Minimal air inclusion during connection.
- Internal valve design creates minimal pressure drop, maintaining circuit efficiency in the system.
- The modular design allows flexibility with a wide range of configurations.
- Optimal corrosion resistance.
- Compact slim design.
- Safe and simple to use.

HOW TO USE

- Before to connect, clean the mating surface of the couplings to avoid dirt inclusion in the circuit.
- To connect push the male half towards the female half or vice versa.
- After connection turn the external sleeve to engage safety lock function, to prevent accidental disconnection.
- To disconnect turn the external sleeve until the sleeve lock notch match the safety lock ball and push back the sleeve.



MAIN APPLICATIONS



Agriculture



Oil & Gas



Industry



High Pressure



Cooling



Refrigeration



Earth Moving



Vehicles



Hydraulic Equipment



Chemical & Food Industry

PERFORMANCES

Size		Series/Size	Max. flow suggested		Connect force		Disconnect force		Spillage*
Inch	mm (ISO)		l/min	GPM	N	lbf	N	lbf	ml
3/8	10	AX9	46	12,19	200	45	45	10,12	0,01
1/2	12,5	AX13	90	23,85	165	37,12	58	13,05	0,02
3/4	19	AX17	200	53	255	57,37	80	18	0,03
1	25	AX21	378	100,17	285	64,12	110	24,75	0,03

Size	Series/Size	Max. operating pressure					
		Coupled		Male		Female	
Inch		MPa	psi	MPa	psi	MPa	psi
3/8	AX9	35	5075	35	5075	35	5075
1/2	AX13	33	4785	33	4785	33	4785
3/4	AX17	33	4785	33	4785	33	4785
1	AX21	30	4350	30	4350	30	4350

*Spillage is an indicative value of the fluid loss during disconnection (according to ISO norm test method)

Different possible configurations:

Standard seal in VITON® (different seal available upon request)

Size AX7 and AX15 upon request

Different male thread upon request

Material:

-Construction: Stainless steel AISI 316L

-Springs: AISI 302

-Locking ball: AISI 316



WARNING

A defect, a wrong choice or an improper use of products, can cause injury to persons, animals and objects.

Never connect or disconnect with dynamic pressure (e.g. pump on).

Do not use the female coupling disconnected with high impulse pressure.

Do not couple-uncouple with flow and/or pressure in the circuit.

Do not couple-uncouple when the temperature inside of the circuit is higher than 80 °C (176 °F).

Check the maximum allowable working pressure of the port in use.

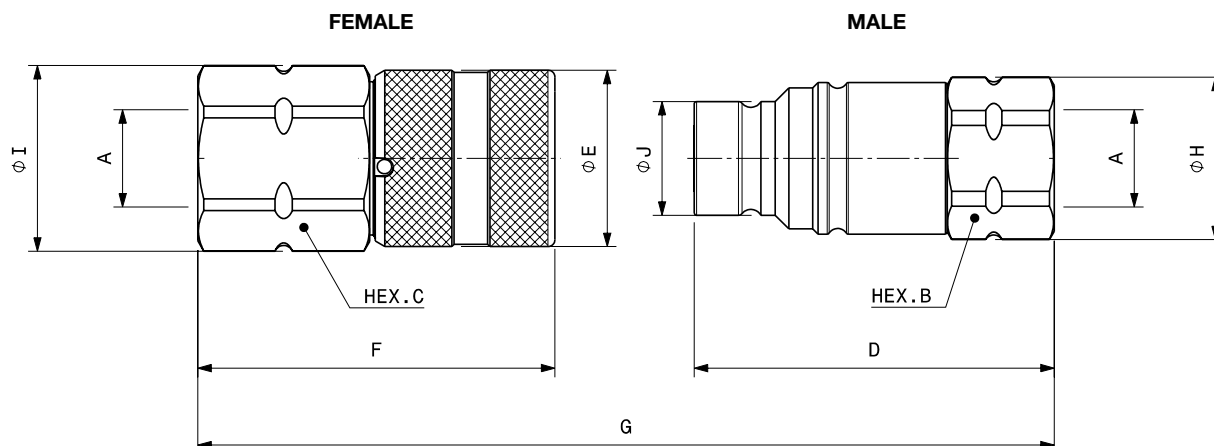
Make sure that the medium used is compatible with seal and material as indicated for each series.

In case of doubt please contact Stucchi Technical Support.

The interchangeability is mentioned under the assumption that the manufacturer of the considered products has not changed any dimension.

It is MANDATORY to read and closely follow the instructions. Last updated version always apply at time of installation, see latest written Instructions on Stucchi website (www.stucchi.it) before selecting or using Stucchi products.

OVERALL DIMENSIONS



Port description: FEMALE THREAD SAE (SAE J1926-1 or ISO 11926-1)

BODY SIZE	Descriptive Code	Item Code	ISO DN	PORT (A)	Overall Length		Length		Hex		Diameter		Diameter		Weight			
					mm	inch	mm	inch	mm	inch	mm	inch	mm	inch	Kg	Lbs		
3/8"	F AX9 3/8 SAE	Female 808504104	10	9/16-18UNF	G	118,8	4,68	F	69,4	2,73	C	30,0	1,18	I	32,0	1,26	0,30	0,66
	M AX9 3/8 SAE	Male 808504105						D	65,4	2,57	B	27,0	1,06	H	29,0	1,14	J	19,7
3/8"	F AX9 1/2 SAE	Female 808504106	10	3/4-16UNF	G	125,8	4,95	F	74,4	2,93	C	30,0	1,18	I	32,0	1,26	0,33	0,72
	M AX9 1/2 SAE	Male 808504107						D	67,4	2,65	B	27,0	1,06	H	29,0	1,14	J	19,7
3/4"	F AX17 3/4 SAE	Female 808504114	18	1-1/16-12UN	G	167,3	6,59	F	103,8	4,09	C	46,0	1,81	I	49,8	1,96	1,08	2,37
	M AX17 3/4 SAE	Male 808504115						D	85,7	3,37	B	46,0	1,81	H	49,5	1,95	J	30,0
3/4"	F AX17 1" SAE	Female 808504120	19	1-5/16-12UN	G	170,3	6,70	F	103,8	4,09	C	46,0	1,81	I	49,8	1,96	1,08	-
	M AX17 1" SAE	Male 808504121						D	88,7	3,49	B	46,0	1,81	H	49,5	1,95	J	30,0
1"	F AX21 1 1/4 SAE	Female 808504122	25	1-5/8-12UN	G	185,8	7,31	F	108,3	4,26	C	55,0	2,17	I	59,8	2,35	1,42	3,13
	M AX21 1 1/4 SAE	Male 808504123						D	100,2	3,94	B	55,0	2,17	H	59,8	2,35	J	36,0

Port description: FEMALE THREAD BSPP (ISO 1179-1)

BODY SIZE	Descriptive Code	Item Code	ISO DN	PORT (A)	Overall Length		Length		Hex		Diameter		Diameter		Weight			
					mm	inch	mm	inch	mm	inch	mm	inch	mm	inch	Kg	Lbs		
3/8"	F AX9 3/8 BSP	Female 808500104	10	3/8"	G	118,8	4,67	F	69,4	2,73	C	30,0	1,18	I	32,0	1,26	0,30	0,66
	M AX9 3/8 BSP	Male 808500105						D	65,4	2,57	B	27,0	1,06	H	29,0	1,14	J	19,7
1/2"	F AX13 1/2 BSP	Female 808500108	12,5	1/2"	G	137,1	5,40	F	76,9	3,03	C	36,0	1,42	I	40,0	1,57	0,48	1,05
	M AX13 1/2 BSP	Male 808500109						D	77,5	3,05	B	32,0	1,26	H	35,0	1,38	J	24,5
3/4"	F AX17 3/4 BSP	Female 808500114	19	3/4"	G	167,5	6,59	F	103,8	4,09	C	46,0	1,81	I	49,8	1,96	1,06	2,33
	M AX17 3/4 BSP	Male 808500115						D	85,7	3,37	B	46,0	1,81	H	49,5	1,95	J	30,0

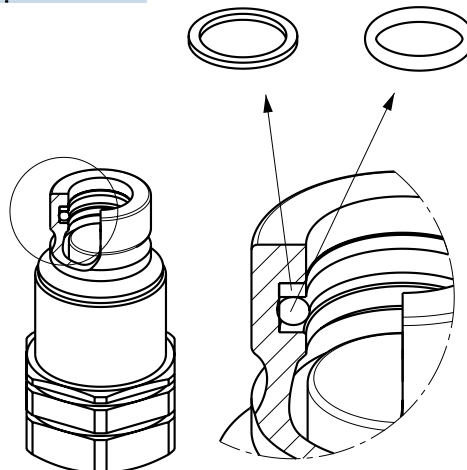


SPARE KIT SEAL FOR MALE

Repair kit / OR+BK		
Body Size	Description	Part Number
3/8"	M AX9	815700247
1/2"	M AX13	815700249
3/4"	M AX17	815700253
1"	M AX21	815700255

Back-up ring
(Teflon®)

o-ring

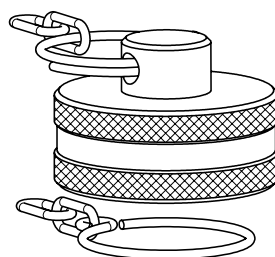


O-Ring in VITON®
BackUp in Teflon®

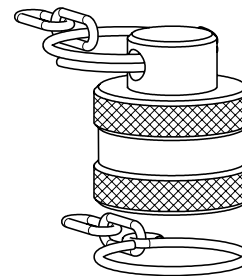
PROTECTIVE CAPS FOR AX SERIES

Protective caps are always recommended to protect the couplings from damage, dirt inclusion, and will increase the product life. This is particularly important in mobile applications where exposure to weather and aggregate materials are common. The protective caps for AX couplings are manufactured in aluminum with lanyard (colors: natural aluminum).

Cap for FEMALE coupling
Aluminum



Cap for MALE coupling
Aluminum



Protective Cap				
Body Size/Description		Part Number		Material/Color
		Cap for Female	Cap for Male	
3/8"	AX9	816005004	816005005	Aluminum/Natural
1/2"	AX13	816005006	816005007	Aluminum/Natural
3/4"	AX17	816005010	816005011	Aluminum/Natural
1"	AX21	816005012	816005013	Aluminum/Natural