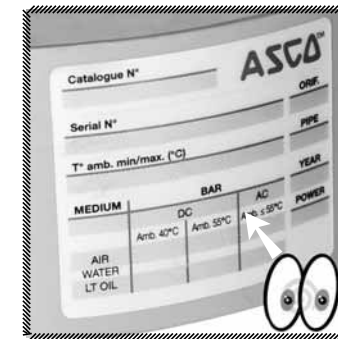
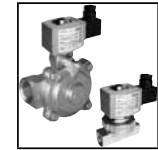
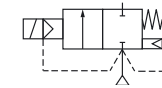
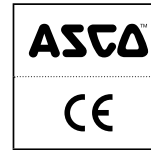


<b>ASCO</b>	INSTALLATION AND MAINTENANCE INSTRUCTIONS	GB
	INSTRUCTIONS D'INSTALLATION ET DE MAINTENANCE	FR
	INBETRIEBNAHME - UND WARTUNGSANLEITUNG	DE
	INSTRUCCIONES DE PUESTA EN MARCHA Y MANTENIMIENTO	ES
	ISTRUZIONI DI MESSA IN SERVIZIO E MANUTENZIONE	IT
	ALGEMENE INSTALLATIE- EN ONDERHOUDSINSTRUCTIES	NL
	INSTALLASJONS- OG VEDLIKEHOLDSINSTRUKSER	NO
	INSTALLATIONS- OCH UNDERHÅLLSINSTRUKTIONER	SE
	ASENNUS - JA HUOLTO-OHJEET	FI
	INSTALLATIONS - OG VEDLIGEHOLDSANVISNINGER	DK
	INSTRUÇÕES DE INSTALAÇÃO E MANUTENÇÃO	PT
	ΟΔΗΓΙΕΣ ΤΟΠΟΘΕΤΗΣΗΣ ΚΑΙ ΣΥΝΤΗΡΗΣΗΣ	GR
	POKRYNY PRO INSTALACI A ÚDRŽBU	CZ
	INSTRUKCJA MONTAŻU I KONSERWACJI	PL
TELEPÍTÉSI ÉS KARBANTARTÁSI ÚTMUTATÓ	HU	
Инструкция по установке и обслуживанию	RU	
설치 및유지 관리 지침	KR	

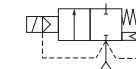


# hot water / steam solenoid valves

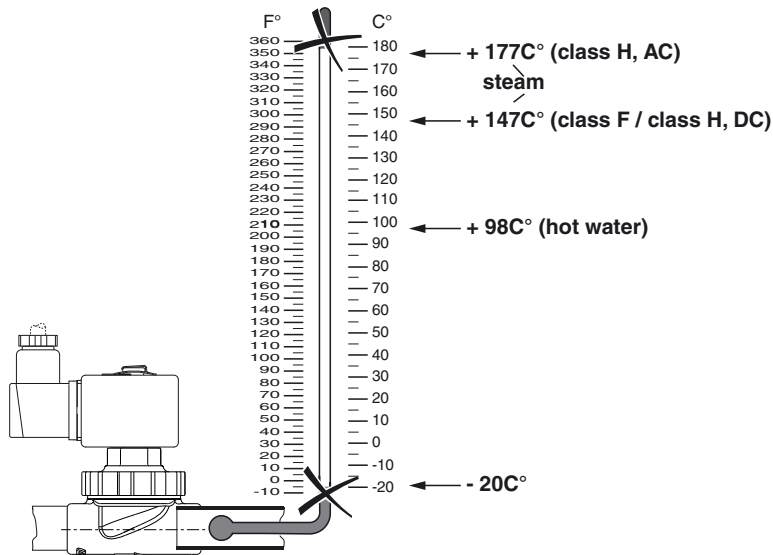
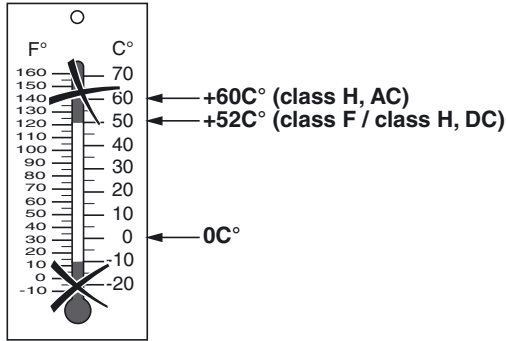
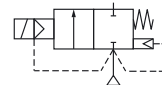
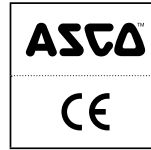
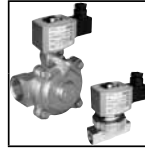
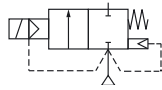
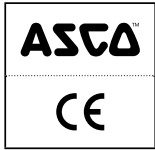


15-DIGIT PRODUCT CODE							
brass	voltage code						
	24 V/50 Hz	48 V/50 Hz	115 V/50 Hz	230 V/50 Hz	24 V/DC	48 V/DC	
E220K402S1T00	FL	FR	FT	F8	-	-	
E220K403S1T00	HL	HR	HT	H8	-	-	
E220K405S1T00	FL	FR	FT	F8	-	-	H1 H9
E220K406S1T00	HL	HR	HT	H8	-	-	
E220K408S1T00	FL	FR	FT	F8	-	-	H1 H9
E220K409S1T00	HL	HR	HT	H8	-	-	
E220K410S1T00	FL	FR	FT	F8	-	-	
E220K411S1T00	HL	HR	HT	H8	-	-	

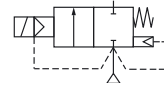
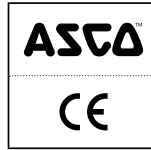
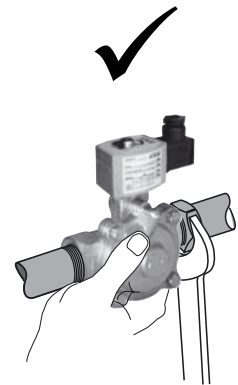
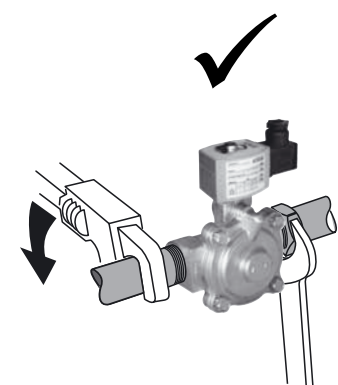
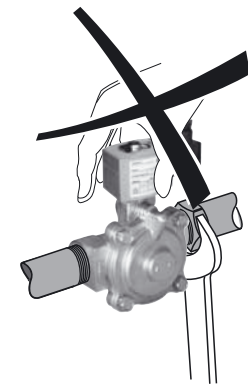
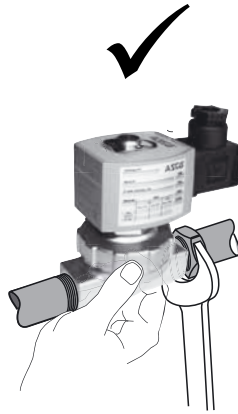
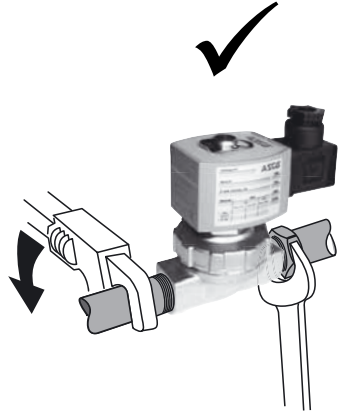
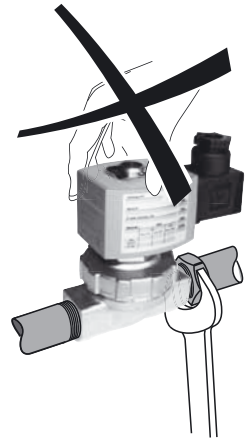
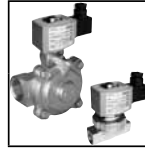
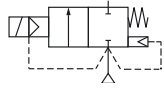
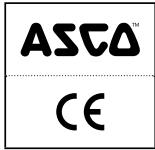
440169-001 / A  
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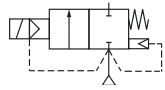
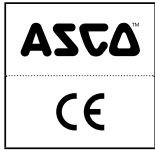
pipe size	flow coefficient Kv (m <sup>3</sup> /h) (l/min)	operating pressure differential (bar)						max. fluid temp. (°C)	power coil (W)	brass	15-DIGIT PRODUCT CODE								
		max. (PS)									class	voltage code							
		min.	steam (*)		water (*)		power coil (W)						brass	24 V/50 Hz	48 V/50 Hz	115 V/50 Hz	230 V/50 Hz	24 V/DC	48 V/DC
		~	=	~	=	~													
3/8	3,8 63,3	0	3	3,4	10	6,9	147	F	10,1	-	E220K402S1T00	FL	FR	FT	F8	-	-		
		0,3	9	-	10	-	177	H	10,1	-	E220K403S1T00	HL	HR	HT	H8	-	-		
1/2	4 66,6	0	3	3,4	10	6,9	147	F	10,1	-	E220K405S1T00	FL	FR	FT	F8	-	-		
		0,3	9	-	10	-	177	H	10,1	-	E220K406S1T00	HL	HR	HT	H8	-	-		
3/4	7,5 125	0	3	3,4	10	6,9	147	F	10,1	-	E220K408S1T00	FL	FR	FT	F8	-	-		
		0,3	9	-	10	-	177	H	10,1	-	E220K409S1T00	HL	HR	HT	H8	-	-		
1	10 166,6	0,3	3	-	10	-	147	F	10,1	-	E220K410S1T00	FL	FR	FT	F8	-	-		
		9	-	10	-	177	H	10,1	-	E220K411S1T00	HL	HR	HT	H8	-	-			



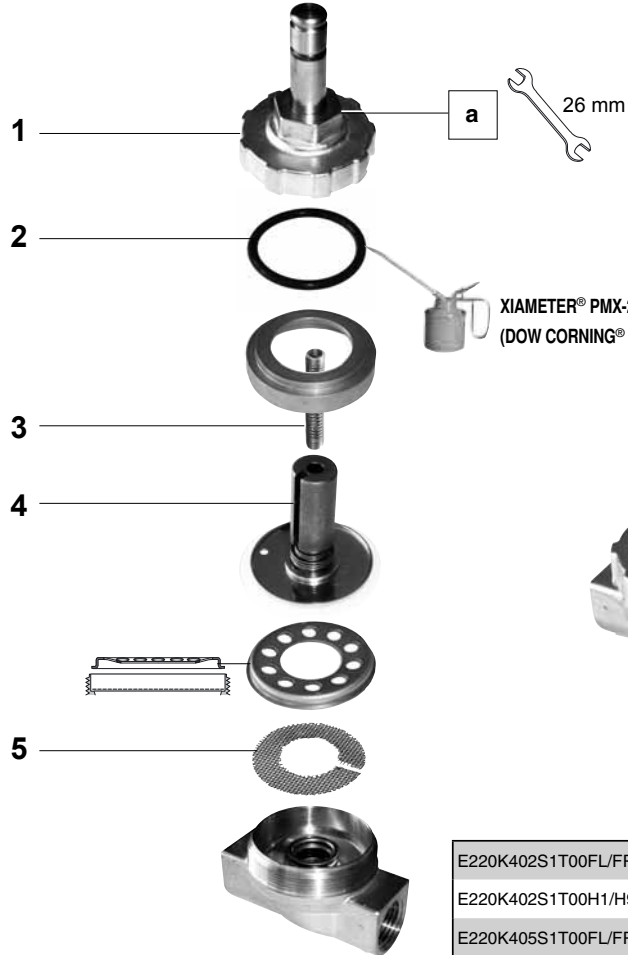
	GB	FR	DE	ES
	<p>Maximum operating pressure differentials are based on temperature-related material limitations. therefore, do not use valves with a steam source of higher pressure than the nameplate maximum operating pressure differential.</p> <p>Also do not use a pressure reducing valve to reduce steam source to rated pressure because this would result in superheated steam of excessive temperature entering the valve.</p>	<p>Les pressions différentielles maximales sont établies sur les limitations de température des matériaux utilisés. Par conséquent, ne pas utiliser les vannes sur une alimentation de vapeur d'une pression supérieure à la pression différentielle maximale de fonctionnement indiquée sur l'étiquette.</p> <p>De même, ne pas utiliser de réducteur de pression pour réduire l'alimentation de vapeur à la pression nominale car ceci aboutirait à de la vapeur surchauffée qui créerait une température excessive dans la vanne.</p>	<p>Die max. Differenzdrücke sind abhängig von den Temperaturgrenzen der verwendeten Werkstoffe. Die Ventile sind deshalb nicht für Dampfversorgungen zu verwenden, bei denen der Druck über den auf dem Typenschild angegebenen maximalen Differenzdruck liegt.</p> <p>Es ist auch kein Druckminderer zu verwenden, um die Dampfversorgung auf den angegebenen Nominaldruckwert abzusenken, da dies überhitzten Dampf und somit überhöhte Temperaturen im Ventil zur Folge hätte.</p>	<p>Las presiones diferenciales máximas se establecen dentro de los límites de temperatura de los materiales utilizados. Por este motivo, no utilice las válvulas con una alimentación de vapor a una presión superior a la presión diferencial máxima de funcionamiento indicada en la etiqueta.</p> <p>Asimismo, no utilice reductor de presión para reducir la alimentación de vapor a la presión nominal ya que esto daría como resultado vapor recalentado que crearía una temperatura excesiva en la válvula.</p>
⚠	<p>Maximum operating pressure differentials are based on temperature-related material limitations. therefore, do not use valves with a steam source of higher pressure than the nameplate maximum operating pressure differential.</p> <p>Also do not use a pressure reducing valve to reduce steam source to rated pressure because this would result in superheated steam of excessive temperature entering the valve.</p>	<p>De maximale werkdrukdifferenties zijn gebaseerd op de materiële beperkingen die gerelateerd zijn aan de temperatuur. Gebruik daarom geen kleppen met een stoombron die een hogere druk hebben dan de maximale werkdrukdifferentie van het naamplaatje.</p> <p>Gebruik ook geen drukvermindingsklep om de stoombron te reduceren tot een nominale druk omdat hierdoor hoog oververhitte stoom met een te hoge temperatuur de klep in kan stromen.</p>	<p>As pressões diferenciais máximas são baseadas nas limitações de temperatura dos materiais utilizados. Por consequência, não utilizar as válvulas com uma alimentação de vapor com pressão superior à pressão diferencial máxima de funcionamento indicado na etiqueta.</p> <p>Além disso, não utilizar um redutor de pressão para reduzir a alimentação de vapor a uma pressão nominal, porque resultaria em vapor sobreaquecido que criaria uma temperatura excessiva na válvula</p>	<p>Максимальные перепады рабочего давления зависят от температурных ограничений материалов. По этой причине запрещается использовать клапаны с источником пара более высокого давления, чем указанный на паспортной табличке максимальный перепад рабочего давления.</p> <p>Также запрещено применять редукционный клапан для снижения давления источника пара до номинального давления из-за опасности попадания в клапан перегретого пара.</p>



	GB	FR	DE	ES
	<p>Prior to all maintenance work or putting into operation, cut off electrical power, depressurize the valve and vent it in order to prevent injury to life or property. Maintenance of ASCO products is dependent on service conditions. Periodic cleaning is recommended, the timing of which will depend on the fluids used and the service conditions. During servicing, the components must be checked for excessive wear. A complete set of internal parts is available as a spare parts or rebuild kit. If a problem occurs during installation/maintenance or in case of doubt, please contact ASCO or authorised representatives.</p>	<p>Avant toute opération d'entretien ou de remise en marche, couper l'alimentation électrique, dépressuriser la vanne et la purger, pour prévenir tout risque d'accident corporel ou matériel.</p> <p>L'entretien nécessaire aux produits ASCO varie avec leurs conditions d'utilisation. Il est souhaitable de procéder à un nettoyage périodique dont l'intervalle varie suivant la nature du fluide, les conditions de fonctionnement et le milieu ambiant. Lors de l'intervention, les composants doivent être examinés pour détecter toute usure excessive. Un ensemble de pièces internes est proposé en pièces de rechange pour procéder à la réparation. En cas de problème lors du montage/entretien ou en cas de doute, veuillez contacter ASCO ou ses représentants officiels.</p>	<p>Um Personen- und Sachschäden zu vermeiden, muss vor der Wartung oder Inbetriebnahme die Versorgung des Ventils unterbrochen sowie das Ventil drucklos geschaltet und entlüftet werden. Die Wartung hängt von den Betriebsbedingungen ab. Das Ventil ist in regelmäßigen Zeitabständen zu reinigen, wobei die Zeitabstände von den Betriebsbedingungen und dem verwendeten Medium abhängen. Während der Wartung sind alle Teile auf Verschleiß zu untersuchen. Die Innenteile sind komplett als Ersatzteile bzw. Ersatzteilsatz erhältlich. Treten Schwierigkeiten beim Einbau oder bei der Wartung oder sonstige Unklarheiten auf, ist mit ASCO oder deren zugelassenen Vertretern Rücksprache zu halten.</p>	<p>Antes de cualquier operación de mantenimiento o de puesta en marcha, cortar la alimentación eléctrica, despresurizar la válvula y purgarla, para prevenir cualquier riesgo de accidente corporal o material.</p> <p>El mantenimiento necesario para los productos ASCO, varía con sus condiciones de utilización. Sería conveniente realizar una limpieza periódica cuyo intervalo varíe según la naturaleza del fluido, las condiciones de funcionamiento y el medio ambiente.</p> <p>Durante la intervención, se deberán examinar los componentes para detectar desgastes excesivos. Se ofrece como piezas de recambio un conjunto de piezas internas para proceder a la reparación. En caso de problemas durante el montaje/mantenimiento o en caso de duda, contacte con ASCO o sus representantes oficiales.</p>
⚠	IT	NL	PT	RU
	<p>Prima di qualsiasi intervento di manutenzione o riattivazione, togliere l'alimentazione del pilota, depressurizzare la valvola e spurgarla, per prevenire ogni rischio di incidente a persone e cose.</p> <p>La manutenzione dei prodotti ASCO dipende dalle condizioni di servizio. È raccomandata la pulizia periodica la cui frequenza dipende dai fluidi utilizzati e dalle condizioni di servizio. Durante la manutenzione, deve essere verificata l'usura dei componenti. È disponibile una serie completa di componenti interni da utilizzare come kit di ricambio o di ricostruzione. In caso di problemi durante l'installazione/la manutenzione o in caso di dubbio, contattare ASCO o un suo rappresentante autorizzato.</p>	<p>Schakel voorafgaand aan alle onderhouds- en inbedrijfstellingswerkzaamheden de stuurdruktoevoer uit, maak de afsluiter drukloos en ontluft de afsluiter om elk risico op persoonlijk letsel of materiële schade uit te sluiten.</p> <p>Het onderhoud van producten van ASCO is afhankelijk van de gebruiksvoorwaarden. Het wordt aanbevolen periodiek te reinigen volgens een tijdschema dat afhankelijk is van de gebruikte vloeistoffen en de gebruiksvoorwaarden. Tijdens het onderhoud dienen de componenten te worden gecontroleerd op bovenmatige slijtage. Een complete set interne onderdelen is beschikbaar als reserveonderdelenkit of revisiekit. Als zich een probleem voordoet tijdens de installatie of het onderhoud of in geval van twijfel kunt u contact opnemen met ASCO of de erkende vertegenwoordigers.</p>	<p>Antes de de qualquer manutenção ou colocação em funcionamento, cortar a alimentação elétrica, depressurizar e purgar a válvula, para prevenir qualquer risco de acidente corporal ou material. A manutenção necessária dos produtos ASCO varia de acordo com as condições de utilização. É aconselhável proceder a uma limpeza periódica, tendo em conta que o intervalo varia de acordo com a natureza do fluido, as condições de funcionamento e com o meio ambiente. Durante a intervenção, os componentes devem ser examinados para detetar qualquer utilização excessiva. Um conjunto de peças internas é proposto em peças de substituição para proceder à reparação. Em caso de problema durante a montagem/manutenção ou em caso de dúvida, por favor contacte a ASCO ou os seus representantes oficiais.</p>	<p>Перед выполнением работ по обслуживанию или вводу в действие отключите питание управляющего клапана, сбросьте давление в клапане и провентилируйте его, чтобы предотвратить травмы или повреждение имущества.</p> <p>Обслуживание изделий ASCO зависит от условий эксплуатации. Рекомендуется проводить периодическую очистку, сроки которой зависят от используемых рабочих сред и условий эксплуатации. Во время обслуживания необходимо проверять компоненты на предмет чрезмерного износа. Полный набор компонентов доступен в виде запчастей или комплекта для восстановления изделия. В случае возникновения проблем при установке или обслуживании, либо при появлении каких-либо сомнений обратитесь в ASCO или к официальным представителям компании.</p>



402/405/408



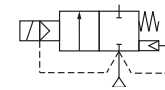
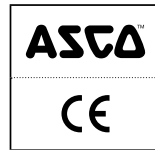
items	N.m	Inch.pounds
a	54,2 <sup>±5,4</sup>	480 <sup>±48</sup>

XIAMETER® PMX-200 SILICONE FLUID .65 CS  
(DOW CORNING® 200 FLUID .65 CS)

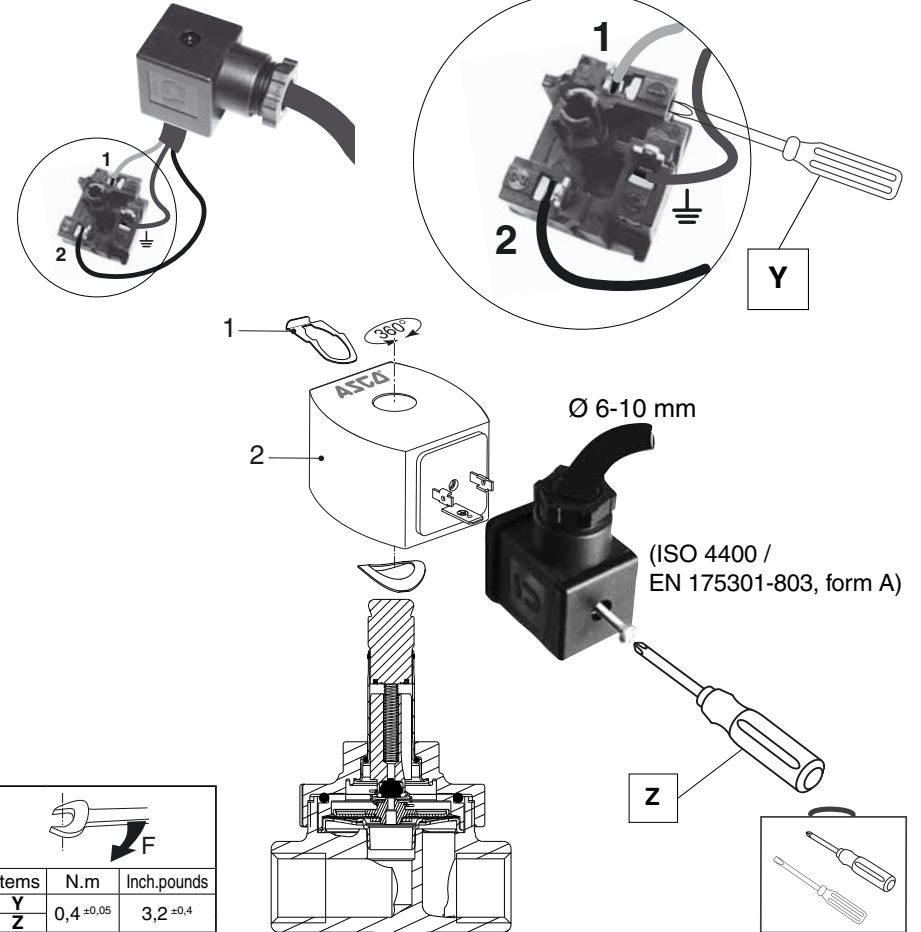


	CODE	
	AC (-)	DC (=)
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E220K402S1T00H1/H9	-	M200308 T00
E220K405S1T00FL/FR/FT/F8	M200307 T00	-
E220K405S1T00H1/H9	-	M200308 T00
E220K408S1T00FL/FR/FT/F8	M200310 T00	-
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(XIAMETER® or DOW CORNING® is a registered trademark of Dow Corning Corporation)



402/405/408

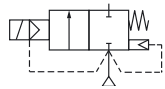
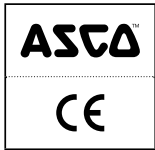


Ø 6-10 mm

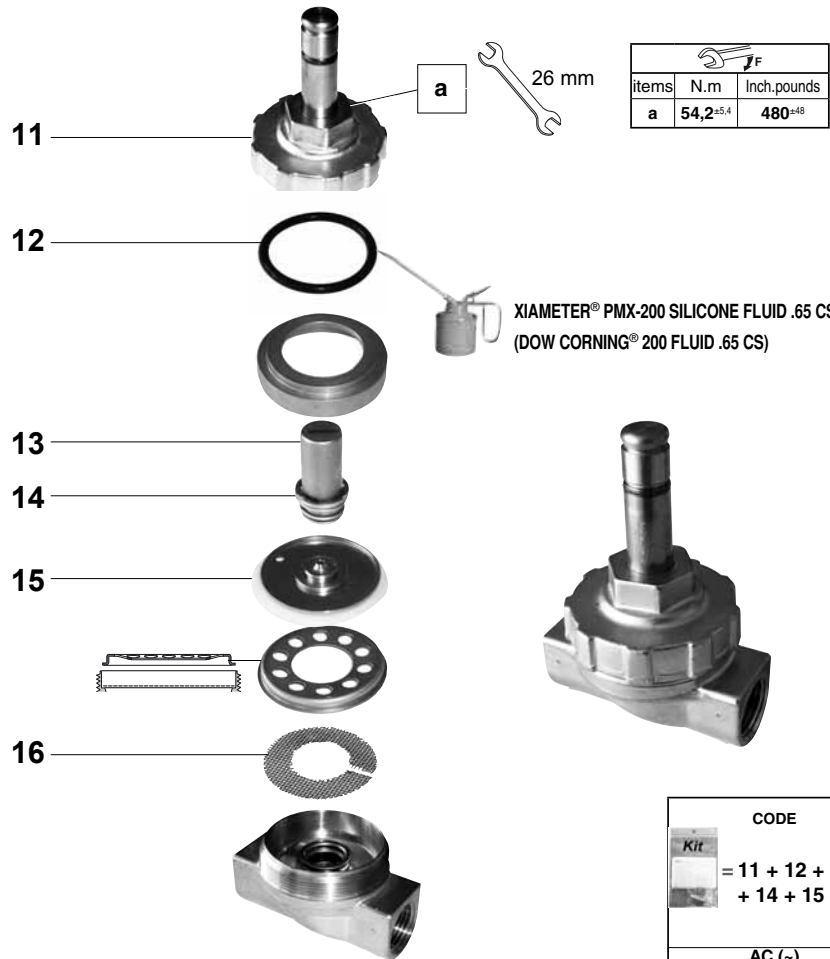
(ISO 4400 / EN 175301-803, form A)

items	N.m	Inch.pounds
Y	0,4 <sup>±0,05</sup>	3,2 <sup>±0,4</sup>
Z		

		24 V ~	48 V ~	115 V ~	230 V ~	24 V =	48 V =
		(FL)	(FR)	(FT)	(F8)	(H1)	(H9)
	MXX II -FT	10,1 W	238613-006	238613-016	238613-033	238613-059	-
	MXX II -HT	15,6 W	-	-	-	238913-206	238913-217



403/406/409



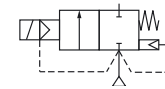
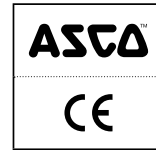
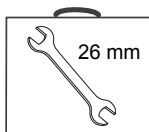
items	N.m	Inch.pounds
a	54,2 <sup>±5,4</sup>	480 <sup>±48</sup>

XIAMETER® PMX-200 SILICONE FLUID .65 CS  
(DOW CORNING® 200 FLUID .65 CS)

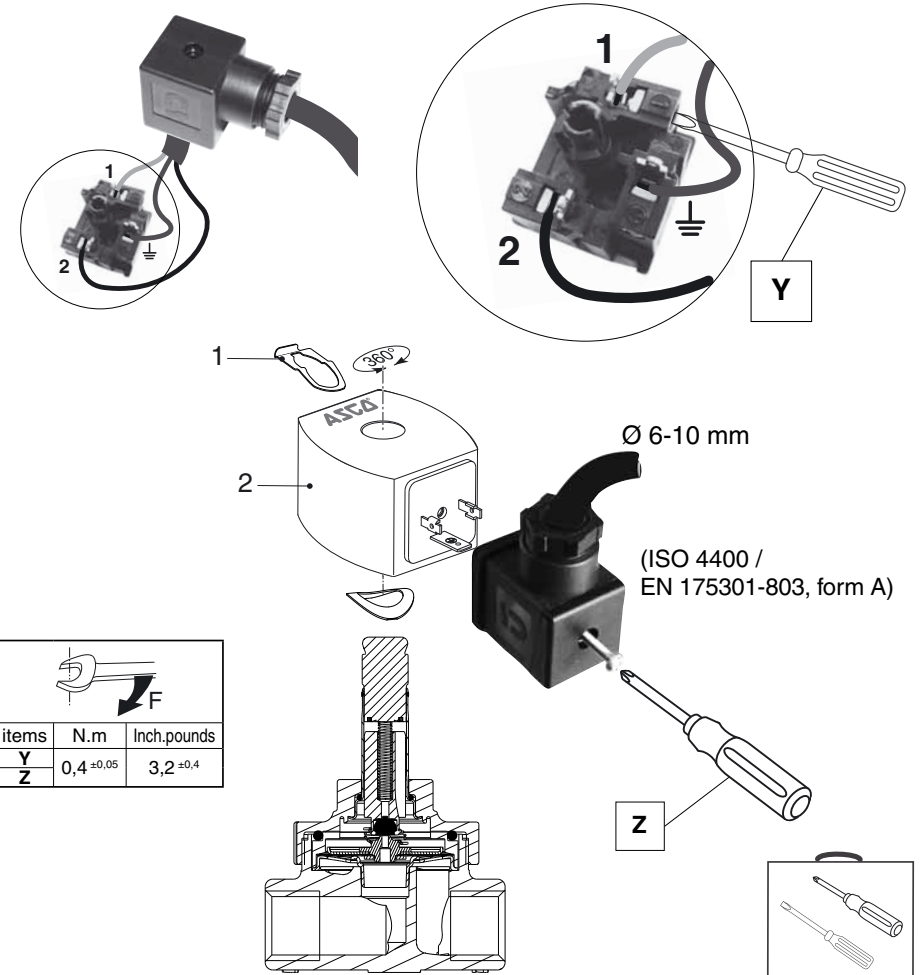
CODE	
Kit	= 11 + 12 + 13 + 14 + 15 + 16
AC (~)	

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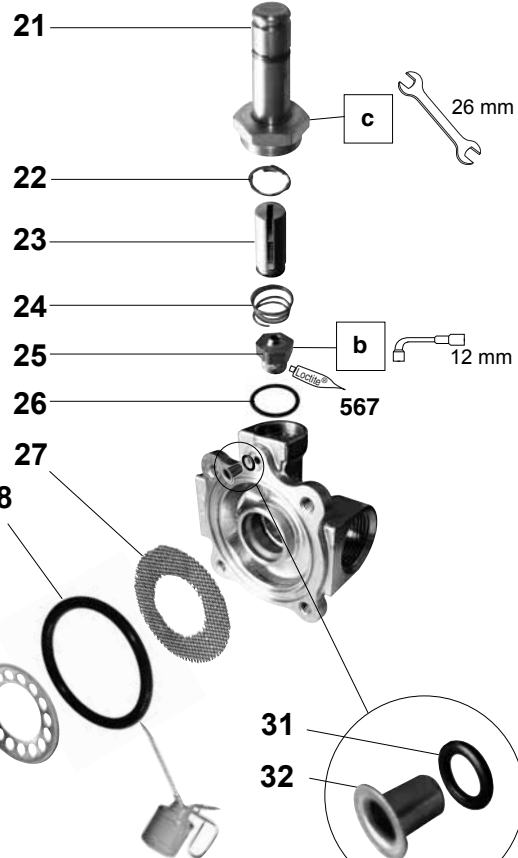
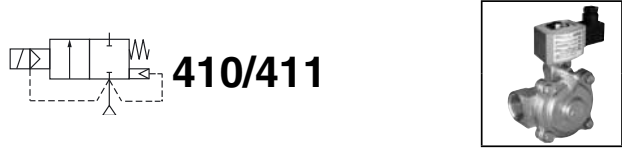
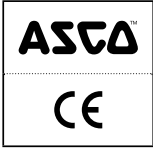
403/406/409



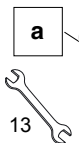
items	N.m	Inch.pounds
Y	0,4 ±0,05	3,2 ±0,4
Z		

ASCO	MXX II -HC 10,1 W	24 V ~ (HL)	48 V ~ (HR)	115 V ~ (HT)	230 V ~ (H8)
		238813-006	238813-016	238813-033	238813-059



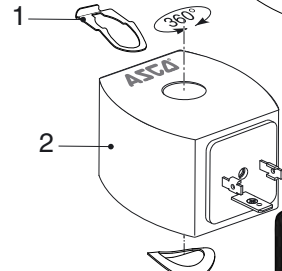
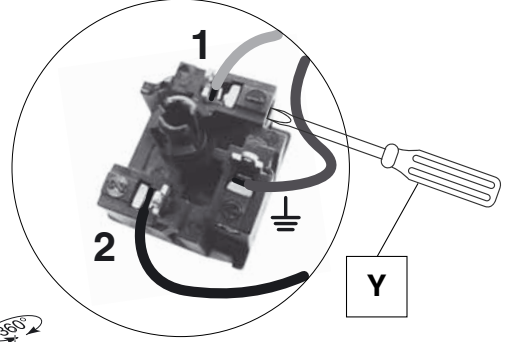
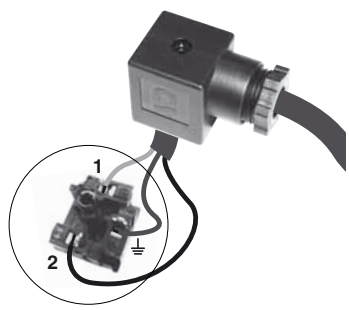
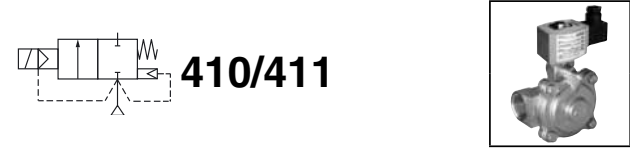
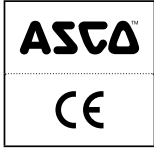
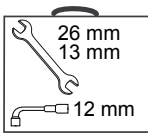


XIAMETER® PMX-200 SILICONE FLUID .65 CS  
(DOW CORNING® 200 FLUID .65 CS)



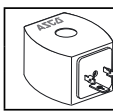
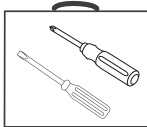
CODE	
	= 21 .. 32
AC (-)	

items	N.m	Inch.pounds
a	16,3 <sup>+1,7</sup>	144 <sup>+15</sup>
b	8,5 <sup>+1,7</sup>	75 <sup>+15</sup>
c	19,8 <sup>+2,8</sup>	175 <sup>+25</sup>



Ø 6-10 mm  
(ISO 4400 / EN 175301-803, form A)

items	N.m	Inch.pounds
Y	0,4 ±0,05	3,2 ±0,4
Z		



			24 V ~ (FL)	48 V ~ (FR)	115 V ~ (FT)	230 V ~ (F8)	
	MXX II - FT	10,1 W	E220K410S1T00FL/FR/FT/F8	238613-006	238613-016	238613-033	238613-059
				(HL)	(HR)	(HT)	(H8)
	MXX II - HT	10,1 W	E220K411S1T00HL/HR/HT/H8	238813-006	238813-016	238813-033	238813-059