

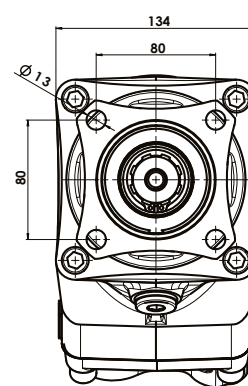
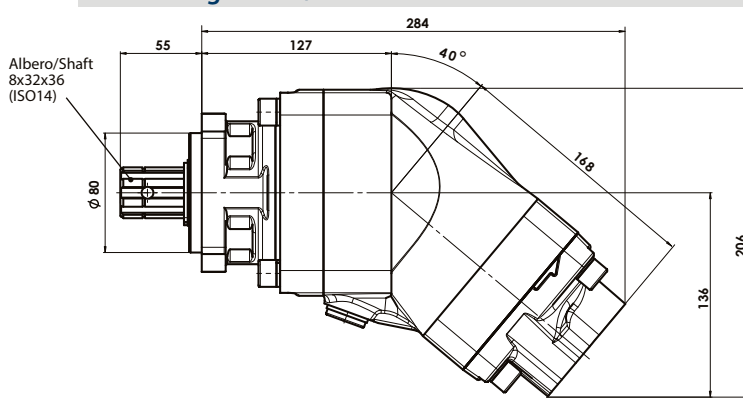
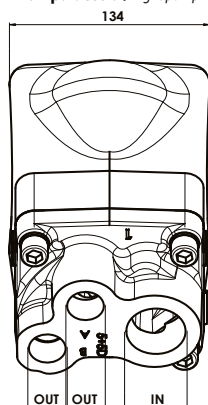


Flangia/Flange ISO
Albero/Shaft ISO14 8x32x36
Cilindrata/Displacement vedi tabella/see table

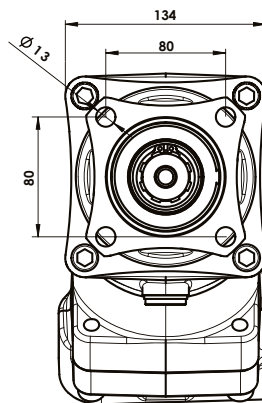
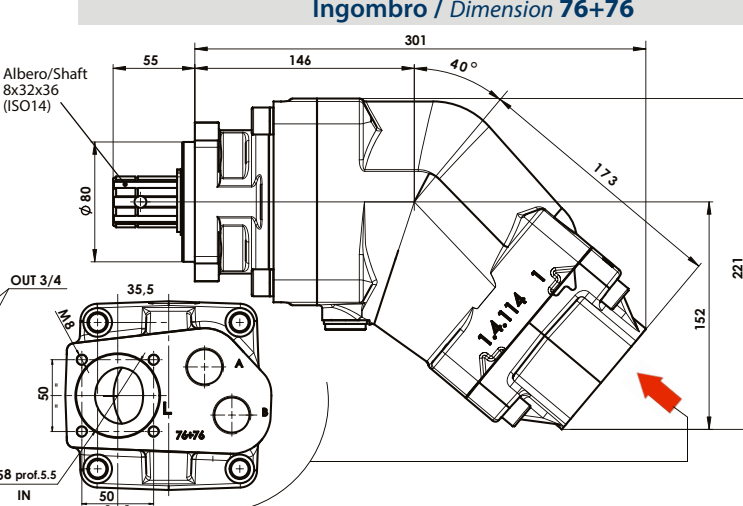
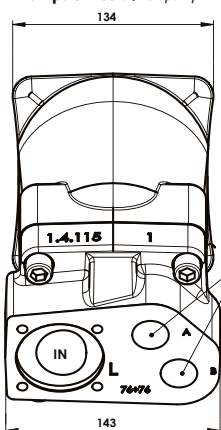
Fluido idraulico / Fluid	Minerale o sintetico compatibile con guarnizioni: <i>Mineral or synthetic compatible with the following seals: FKM, FPM, HNBR</i>				
Viscosità cinematica consigliata <i>Kinematic viscosity suggested</i>	T media ambiente (°C) <i>Average ambient temp. (°C)</i>	< -40	-40÷10	10÷35	> 35
	VG (cSt = mm²/s)	16	22	32	46
Viscosità cinematica ottimale di esercizio <i>Optimale kinematic viscosity</i>			VG= 10 cSt + 100 cSt		
Viscosità cinematica max consentita all'avviamento <i>Max kinematic viscosity suggested at the start-up</i>			VG= 750 cSt		
Indice di viscosità consigliato <i>Viscosity index suggested</i>	VI > 100	Temperatura di esercizio <i>Working temperature</i>		-40°C + 140°C	
Grado di filtrazione / Oil filtering		> 200 bar: 10 µm / < 200 bar: 25 µm			
Pres. di aspirazione / Inlet pressure		0,85 ÷ 2 bar assoluti/absolut			
Senso di rotazione / Pump rotation		Unidirezionale / Unidirectional			
Verificare che la pompa sia posizionata almeno 100 mm sotto il livello minimo del serbatoio olio. Prima di avviare la pompa effettuare spurgo aria. <i>Verify that pump is, at least, 100 mm under the minimum level of the tank. Before starting the pump bleed the air.</i>					

Ingombro / Dimension 53+35 53+53 70+35 70+53

Pompa destra / Right pump



Pompa sinistra / Left pump

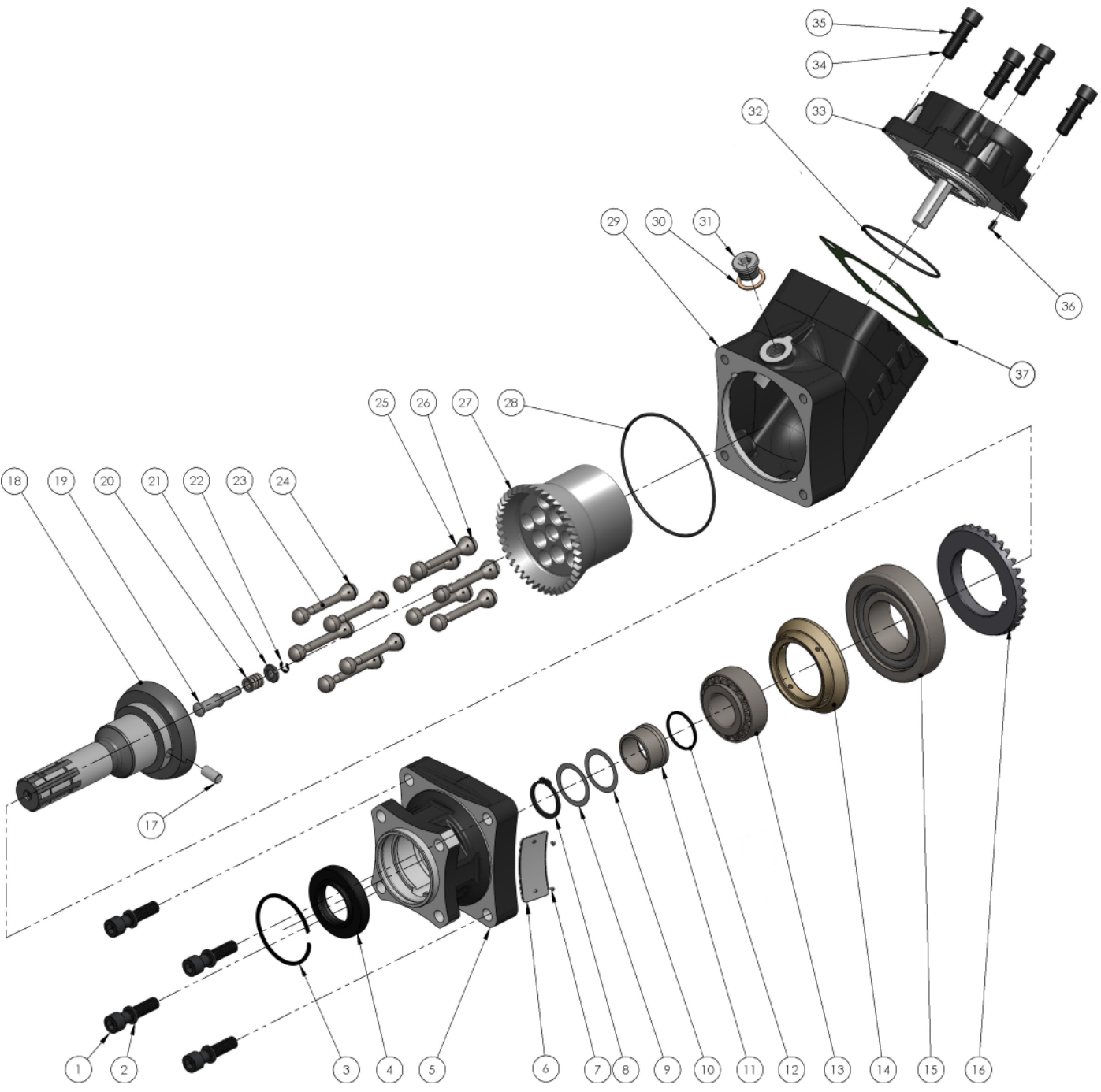


Tipo pompa Pump type	Rotazione Rotation	Codice Code	Gruppo corpo posteriore* Rear cover assembly*	IN ISO 228	OUT ISO 228	Peso Weight
TWIN FLOW 53+35	Destra / Right	60400115033	50002995101	G 1 1/4"	G 3/4"	19,5 kg
	Sinistra / Left	60400115039	50002995209			
TWIN FLOW 53+53	Destra / Right	60400115053	50002995307	G 1 1/4"		20 kg
	Sinistra / Left	60400115059	50002995405			
TWIN FLOW 70+35	Destra / Right	60400117033	50002997001	G 1 1/4"		20,5 kg
	Sinistra / Left	60400117039	50002997109			
TWIN FLOW 70+53	Destra / Right	60400117053	50002997403	G 1 1/2"		21 kg
	Sinistra / Left	60400117059	50002997501			
TWIN FLOW 76+76	Destra / Right	60400117673	50002997618	Ø58 		24,5 kg
	Sinistra / Left	60400117679	50002997609			

* Per modificare il senso di rotazione della pompa, da rotazione DESTRA IN SINISTRA, O VICEVERSA, è necessario sostituire il corpo posteriore.

* To change the pump rotation, the rear body must be replaced.

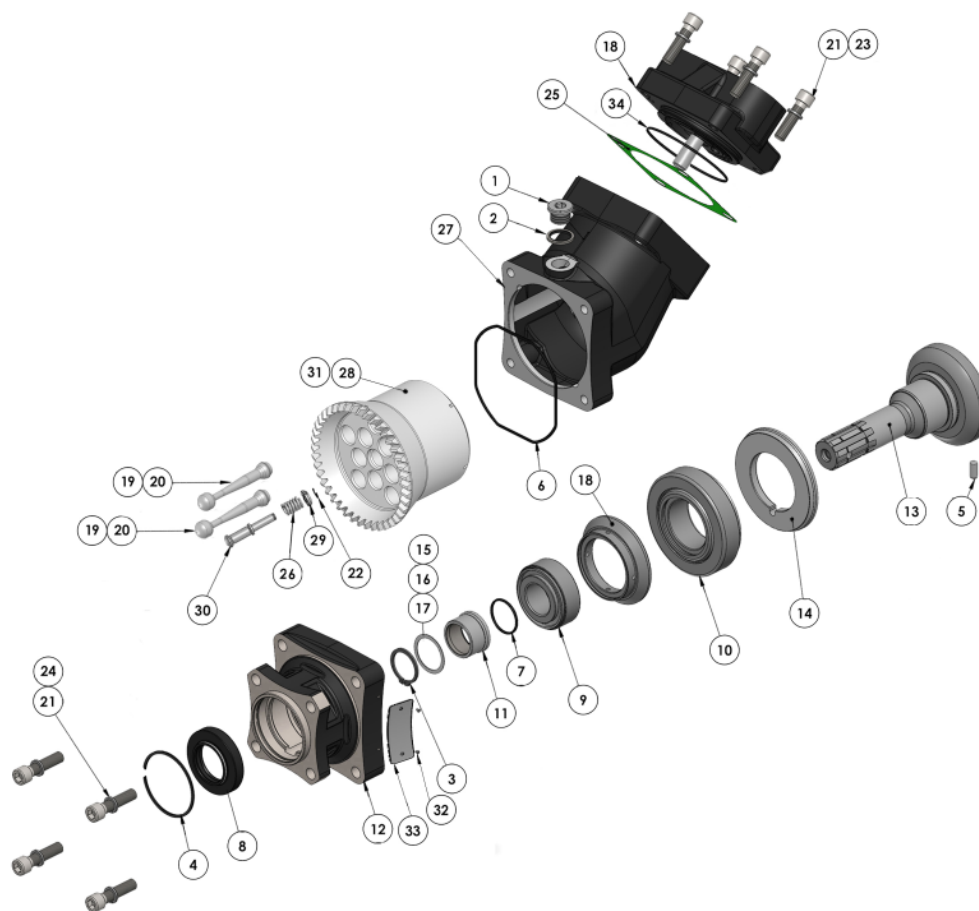
Esploso / Spare parts **53+53 70+35 70+53**



N°	TWIN FLOW 53+53	TWIN FLOW 70+35	TWIN FLOW 70+53	Codice P. Number	Descrizione / Description		Q.
1	.	.	.	50200500582	Vite TCE M 12x50 UNI 5931	Socket head capscrew M12x50 UNI 5931	4
2	.	.	.	50100800063	Rosetta elastica x M12 DIN 7980	Washer x M12 DIN 7980	4
3	.	.	.	50100002729	Anello elastico E-SB 72x2	Circlip E-SB 72x2	1
4	.	.	.	50600024272	Paraolio HNBR	Oil seal HNBR	1
5	.	.	.	51700201047	Corpo anteriore	Front housing	1
6	.	.	.	513	Targhetta completa	Plate	1
7	.	.	.	51300000011	Chiodino fissaggio targhetta	Plate nail	2
8	.	.	.	50100001355	Anello seeger rinforzato AS 35x2.5 E.UNI 7436	Retaining ring AS 35x2.5 E.UNI 7436	1
9	.	.	.	52900700217	Rondella 45X35X0.1	Washer 45X35X0.1	1
10	.	.	.	52900700226	Rondella 45X35X0.2	Washer 45X35X0.2	1
11	.	.	.	51100200200	Bussola Øi 35	Bushing Øi 35	1
12	.	.	.	50600013137	Guarnizione OR 3137 HNBR	O-Ring 3137 HNBR	1
13	.	.	.	51000200364	Cuscinetto a rulli conici 35x72x28 EUR 33207	Tapered roller bearing 35x72x28 EUR 33207	1
14	.	.	.	53000400271	Anello distanziale cuscinetti	Bearing spacer ring	1
15	.	.	.	51000255115	Cuscinetto a rulli conici 55x115x34 EUR. T7FC055	Tapered roller bearing 55x115x34 EUR. T7FC055	1
16	.	.	.	52501100291	Corona dentata	Crown	1
17	.	.	.	50100308202	Spina UNI 6364-A Ø8x20	Pin UNI 6364-A Ø8x20	1
18	.			52200500571	Albero	Shaft	1
			.	52200500599			
		.		52200500580			
19	.	.	.	54200100304	Perno guida molla	Shaft guide pin	1
20	.	.	.	51200500812	Molla di carico corpo cilindri	Spring	1
21	.	.	.	54200100171	Anello guida molla	Spring guide ring	1
22	.	.	.	50101500028	Anello seeger RS 6 DIN6799	Retaining ring RS 6 DIN6799	1
23	.		.	53200500123	Pistone sferico	Piston	5
				53200500258			
		.		53200500132			
24	.			50102300126	Fasce elastiche	Spring rings	15
			.	50102300019			
		.		50102300037			
25	.			53200500132	Pistone sferico	Piston	5
		.		53200500123			
			.	53200500034			
26	.		.	50102300037	Fasce elastiche	Spring rings	15
		.		50102300126			
				50002916505			
27	.			50002916703	Gruppo cilindri sede pistoni	Piston barrel assembly	1
		.		50002916705			
			.	50600012425			
28	.	.	.	50600012425	Guarnizione ORM 1240-25 HNBR	OR M 1240-25 HNBR	1
29	.	.	.	51700201930	Corpo intermedio	Int. housing	1
30	.	.	.	11600910129	Rondella acciaio/gomma 1/2"	Copper washer 1/2"	1
31	.	.	.	11500600135	Tappo cieco 1/2" DIN 908	Blank plug 1/2" DIN 908	1
32	.	.	.	50600018525	Guarnizione ORM 850-25 HNBR	OR M 850-25 HNBR	1
33	.			50002995307 DX (Right)	Gruppo corpo posteriore	Rear cover assembly	1
	.			50002995405 SX (Left)			
		.		50002997001 DX (Right)			
		.		50002997109 SX (Left)			
			.	50002997403 DX (Right)			
			.	50002997501 SX (Left)			
34	.	.	.	50200500573	Vite TCE M 12x45 UNI 5931	Socket head capscrew M12x45 UNI 5931	4
35	.	.	.	50100800063	Rosetta elastica x M12 DIN 7980	Washer x M12 DIN 7980	4
36	.	.	.	50100480123	Spina Ø 5X10 UNI 6873	Pin Ø 5X10 UNI 6873	1
37	A	A	A	50700000283	Guarnizione piatta 0,3mm	Gasket 0,3mm	1
	A	A	A	50700000407	Guarnizione piatta 0,5mm	Gasket 0,5mm	

A = alternative

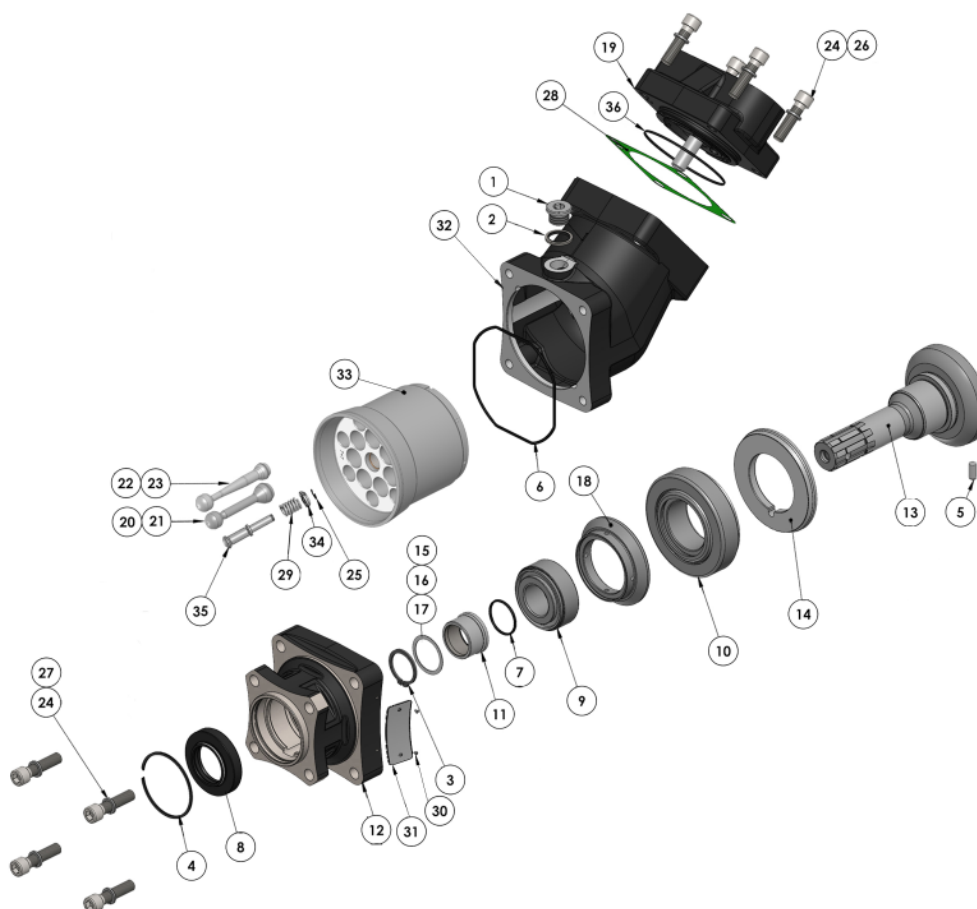
Esploso / Spare parts 53+35



TWIN FLOW 53+35				
N°	Codice / P. Number	Descrizione / Description		Q.
1	11500600135	Tappo cieco 1/2" DIN 908	Blank plug 1/2" DIN 908	1
2	11600910129	Rondella acciaio/gomma 1/2"	Copper washer 1/2"	1
3	50100001355	Anello seeger rinforzato AS 35x2.5 E.UNI 7436	Retaining ring AS 35x2.5 E.UNI 7436	1
4	50100002729	Anello elastico E-SB 72x2	Circlip E-SB 72x2	1
5	50100308202	Spina UNI 6364-A Ø8x20	Pin UNI 6364-A Ø8x20	1
6	50600012425	Guarnizione ORM 1240-25 HNBR	OR M 1240-25 HNBR	1
7	50600013137	Guarnizione OR 3137 HNBR	O-Ring 3137 HNBR	1
8	50600024272	Paraolio HNBR	Oil seal HNBR	1
9	51000200364	Cuscinetto a rulli conici 35x72x28 EUR 33207	Tapered roller bearing 35x72x28 EUR 33207	1
10	51000255115	Cuscinetto a rulli conici 55x115x34 EUR. T7FC055	Tapered roller bearing 55x115x34 EUR. T7FC055	1
11	51100200200	Bussola Øi 35	Bushing Øi 35	1
12	51700201047	Corpo anteriore	Front housing	1
13	52200500580	Albero	Shaft	1
14	52501100291	Corona dentata	Crown	1
15	52900700217	Rondella 45X35X0.1	Washer 45X35X0.1	1
16	52900700226	Rondella 45X35X0.2	Washer 45X35X0.2	1
17	53000400271	Anello distanziale cuscinetti	Bearing spacer ring	1
18	50002995209	Gruppo corpo posteriore SX.	LEFT rear cover assembly	1
	50002995101	Gruppo corpo posteriore DX.	RIGHT rear cover assembly	
19	50102300126	Fasce elastiche	Spring rings	30
20	52300500123	Pistone sferico Ø17	Piston	10
21	50100800063	Rosetta elastica x M12 DIN 7980	Washer x M12 DIN 7980	8
22	50101500028	Anello seeger RS 6 DIN6799	Retaining ring RS 6 DIN6799	1
23	50200500573	Vite TCE M 12x45 UNI 5931	Socket head capscREW M12x45 UNI 5931	4
24	50200500582	Vite TCE M 12x50 UNI 5931	Socket head capscREW M12x50 UNI 5931	4
25	A 50700000283	Guarnizione corpo 0.3mm	Gasket 0.3mm	1
	A 50700000407	Guarnizione corpo 0.5mm	Gasket 0.5mm	1
26	51200500812	Molla di carico corpo cilindri	Spring	1
27	51700201930	Corpo intermedio	Int. housing	1
28	51700300887	Gruppo cilindri sede piston	Piston barrel assembly	1
29	54200100171	Anello guida molla	Spring guide ring	1
30	54200100304	Perno guida molla	Shaft guide pin	1
31	53300400337	Boccola DU 16x18x25	Bushing 16x18x25	2
32	51300000011	Chiodino fissaggio targhetta	Plate nail	2
33	513	Targhetta completa	Plate	1
34	50600018525	Guarnizione ORM 850-25 HNBR	OR M 850-25 HNBR	1

A = alternative

Esploso / Spare parts 76+76

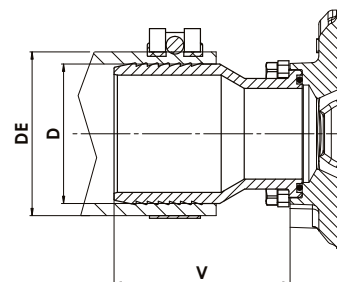
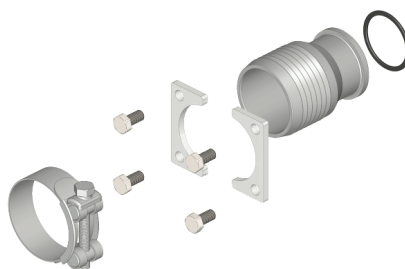


TWIN FLOW 76+76				
N°	Codice / P. Number	Descrizione / Description		Q.
1	11500600135	Tappo cieco 1/2" DIN 908	Blank plug 1/2" DIN 908	1
2	11600910129	Rondella acciaio/gomma 1/2"	Copper washer 1/2"	1
3	50100001355	Anello seeger rinforzato AS 35x2.5 E.UNI 7436	Retaining ring AS 35x2.5 E.UNI 7436	1
4	50100002729	Anello elastico E-SB 72x2	Circlip E-SB 72x2	1
5	50100308202	Spina UNI 6364-A Ø8x20	Pin UNI 6364-A Ø8x20	1
6	50600012425	Guarnizione ORM 1240-25 HNBR	OR M 1240-25 HNBR	1
7	50600013137	Guarnizione OR 3137 HNBR	O-Ring 3137 HNBR	1
8	50600024272	Paraolio HNBR	Oil seal HNBR	1
9	51000200364	Cuscinetto a rulli conici 35x72x28 EUR 33207	Tapered roller bearing 35x72x28 EUR 33207	1
10	51000255115	Cuscinetto a rulli conici 55x115x34 EUR. T7FC055	Tapered roller bearing 55x115x34 EUR. T7FC055	1
11	51100200200	Bussola Øi 35	Bushing Øi 35	1
12	51700201047	Corpo anteriore	Front housing	1
13	52200500839	Albero	Shaft	1
14	52501100291	Corona dentata	Crown	1
15	52900700217	Rondella 45X35X0.1	Washer 45X35X0.1	1
16	52900700226	Rondella 45X35X0.2	Washer 45X35X0.2	1
17	52900701449	Rondella speciale	Special washer	1
18	53000400271	Anello distanziale cuscinetti	Bearing spacer ring	1
19	50002997609	Gruppo corpo posteriore SX.	LEFT rear cover assembly	1
	50002997618	Gruppo corpo posteriore DX.	RIGHT rear cover assembly	
20	50102300037	Fasce elastiche	Spring rings	21
21	53200500132	Pistone sferico Ø19	Piston	7
22	50102300046	Fasce elastiche	Spring rings	21
23	53200500310	Pistone sferico Ø15,5	Piston	7
24	50100800063	Rosetta elastica x M12 DIN 7980	Washer x M12 DIN 7980	8
25	50101500028	Anello seeger RS 6 DIN6799	Retaining ring RS 6 DIN6799	1
26	50200500573	Vite TCE M 12x45 UNI 5931	Socket head capscREW M12x45 UNI 5931	4
27	50200500582	Vite TCE M 12x50 UNI 5931	Socket head capscREW M12x50 UNI 5931	4
28	A 50700000612	Guarnizione corpo 0.3mm	Gasket 0.3mm	1
	A 50700000621	Guarnizione corpo 0.5mm	Gasket 0.5mm	1
29	51200500812	Molla di carico corpo cilindri	Spring	1
30	51300000011	Chiodino fissaggio targhetta	Plate nail	2
31	513	Targhetta completa	Plate	1
32	51700201958	Corpo intermedio	Int. housing	1
33	50002916767	Gruppo cilindri sede pistoncini	Piston barrel assembly	1
34	54200100171	Anello guida molla	Spring guide ring	1
35	54200100304	Perno guida molla	Shaft guide pin	1
36	50600019622	Guarnizione ORM 0960-20 HNBR	OR M 0960-20 HNBR	1

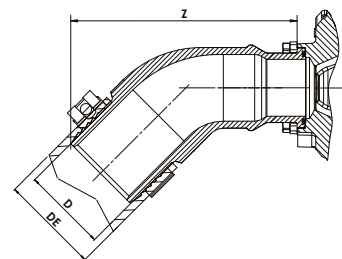
A = alternative

Raccordi validi SOLO per Twinflow 76+76 / Fittings suitable for Twinflow 76+76 ONLY

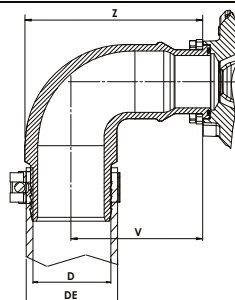
Codice Code	D	DE	V	Peso Weigth
	mm	mm	mm	Kg
15511200507	50	60-63	59	0,59
15511200516	50	64-67	59	0,6
15511200605	60	68-73	79	0,77
15511200632	63	74-79	79	0,8
15511200767	76	86-91	94	1



Codice Code	D	DE	Z	Peso Weigth
	mm	mm	mm	Kg
15511245639	63	74-79	163	1,75
15511245764	76	86-91	167	2,1

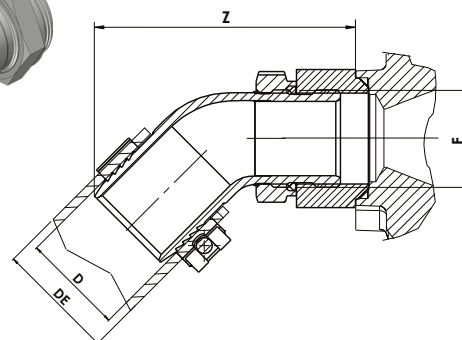
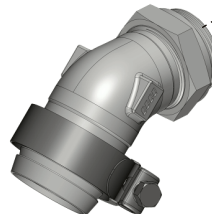
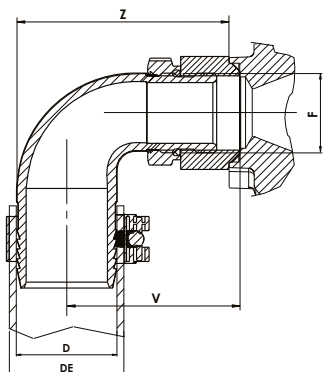
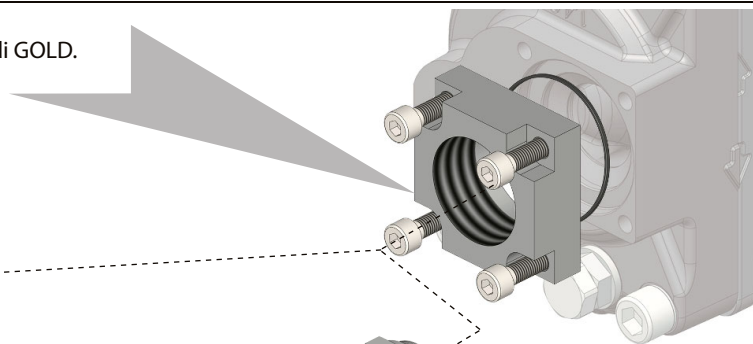


Codice Code	D	DE	V	Z	Peso Weigth
	mm	mm	mm	mm	Kg
15511290634	63	74-79	103	139	1,9
15511290769	76	86-91	103	140	2,3



15511300408

Kit flangia foro filettato G1-1/2, per montaggio raccordi GOLD.
Flange kit G1-1/2 threaded hole, for mounting GOLD fittings.



Codice Code	F	D	DE	V	Z	Peso Weigth
	ISO 228	mm	mm	mm	mm	Kg
15510000592	G1-1/2	50	60-63	85	114	0,99
15510000609			64-67			1
15510000654		60	68-73	88	123	1,06

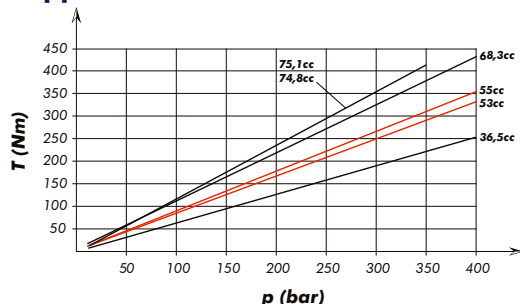
Codice Code	F	D	DE	Z	Peso Weigth
	ISO 228	mm	mm	mm	Kg
15509000540	G1-1/2	50	60-63	133	0,79
15509000559			64-67		0,82
15509000611		60	68-73	153	1

Caratteristiche tecniche funzionamento Technical features	53+35	53+53	70+35	70+53	76+76
Cilindrata A / Displacement (cc/rev)	36,5	53	36,5	53	75,1
Cilindrata B / Displacement (cc/rev)	55	55	68,3	66,2	74,8
Pressione massima continua / Max. continuous pressure (bar)	350	350	350	300	300
Pressione massima picco / Max. peak pressure (bar)	400	400	400	350	350
Velocità massima a vuoto / Max. speed without load (rpm)	2550	2550	2550	2550	2550
Velocità massima con uscita A e B in press. Max. speed with load on A and B outputs (*)	1800	1800	1800	1650	1500
Velocità massima con 1 porta in press. Max. speed with load on 1 output only (*)	2100	2100	2100	2100	2100
Potenza massima continua / Max. continuous power (kW)	94	111	108	98	110
Potenza massima intermittente / Max. intermittent power (kW)	107	127	123	114	129

Pressione massima continua / Max. continuous pressure (100%)
Pressione massima di punta / Max. peak pressure (6 sec.max)

(*) Velocità con tubo diam. interno 63mm (2"1/2) minimo.
Speed with pipe internal diameter 63mm (2"1/2) minimum.

Coppia teorica assorbita / Theoretical drive torque



La coppia assorbita dalla pompa deve essere calcolata come somma delle coppie necessarie per mandare in pressione le 2 mandate.
The total torque absorbed by the pump is given by the sum of the torques necessary to give pressure to the pressure ports.

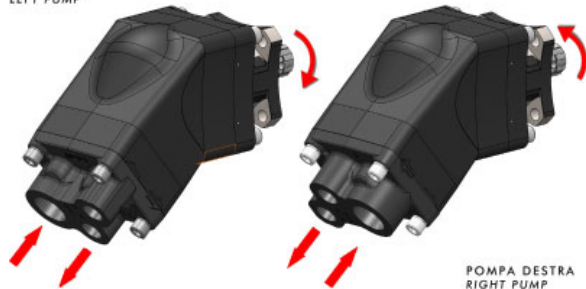
Potenza teorica assorbita / Theoretical power input

La potenza totale è pari alla somma delle potenze richieste dai singoli utilizzi sulle 2 mandate.
The total power absorbed by the pump is given by the sum of the power required by the two pressure ports.

$$P_{TOT} = P_A + P_B = \frac{(p_A \cdot Q_A + p_B \cdot Q_B)}{612}$$

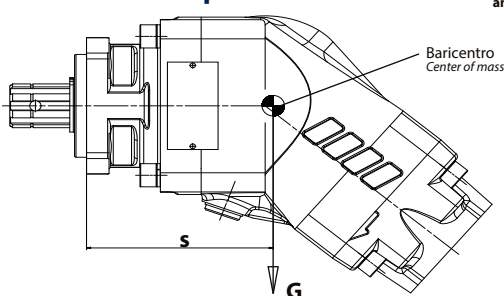
P [kW]
Q [l/min]
p [bar]

POMPA SINISTRA
LEFT PUMP



POMPA DESTRA
RIGHT PUMP

Momento peso / Mass moment $M_{amm.} = s \times G$ (Nm)

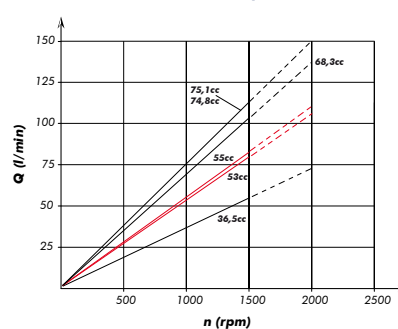


G=Peso in N
(Peso in Kg x 9,81)
G=Weight in N
(Weight in Kg x 9,81)

Pompa 53+53 e 70+35: con tubo diam. interno 50mm (2") velocità max. 1200rpm.
Pump 53+53 and 70+35: with pipe internal diameter 50mm (2") max. speed 1200rpm.

Pompa 70+53: solo con tubo diam. interno 63mm (2"1/2).
Pump 70+53: only with pipe internal diameter 63mm (2"1/2).

Portata teorica / Theoretical flow



La portata della pompa è pari alla somma delle portate delle 2 mandate.
The total pump flow is given by the sum of the flow of each pressure port.

Scelta del tubo di aspirazione How to choose the suction pipe size

Q Portata Flow	Ø interno min. tubo Minimum pipe diameter		Velocità flusso Flow speed
l/min	mm	inch	(m/s)
30	32	1" 1/4	0,62
40	32		0,83
50	38	1" 1/2	0,74
60	38		0,88
70	40	1" 9/16	0,93
80	45		0,84
90	45	1" 3/4	0,94
100	50		0,85
110	50	2"	0,93
120	60		0,71
130	60	2" 3/8	0,77
140	60		0,83
160	63	2" 1/2	0,86
170	63		0,91
180	63		0,96

Per garantire corrette condizioni di aspirazione la velocità del flusso non deve superare 1m/sec.
To ensure the proper suction pipe size the flow speed should not exceed 1mt/sec.

Kit guarnizioni / Seal Kit

53+35 / 53+53 / 70+35 / 70+53	10890353533
76+76	10890376769

	s
53+35	126,2
53+53	125,9
70+35	126
70+53	127,1
76+76	143