



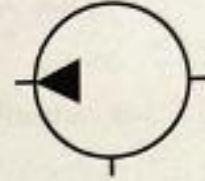
**SCHRUPP**

## Inoxihp Plunger Pumps

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Parker, Pa. 18048  
Telephone: 724-399-2938  
Telefax: 724-399-4263

Series **PF**  
Type Triplex - Quintuplex



Triplex



Quintuplex

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## Inoxihp Plunger Pumps

Parker, Pa. 16049

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### General Characteristics

The Inoxihp reciprocating horizontal triplex and quintuplex plunger pumps, Series PF100, 200 and 300 are designed for pumping high pressure fluids such as water, water emulsions, etc. Thanks to their highly robust and reliable construction, they are utilized in any applications that demand severe and continuous service, including:

- Steel Industry (Hot rolling mills, descaling systems)
- Metallurgical: (Forging, stamping, and extrusion)
- Manufacturing: (Rubber, wood, thermosetting)
- Metal working (Hydrostatic testers)
- Chemical and Automotive (Hydrodynamic cleaning)

### Construction

The use of the latest technology, constant inspection during manufacturing and assembly and modern design concepts have provided a high quality product, simple and quick to maintain, even by non-qualified personnel. The study of fluid mechanics within the hydraulic pumping section has led to the refinement of the pump design to eliminate dangerous dead space and to optimize the function of the suction and pressure valve assemblies to provide a high degree of hydraulic performance.

The series PF pumps are composed of two sections:

#### Crankshaft Drive section consisting of:

- Cast housing with wide finned surfaces for better heat dissipation.
- Crankshaft laterally and centrally supported by large roller bearings.
- Internal reduction gear unit with long-life, silent running helical gears.
- Crosshead with slide jackets and thrust rods.
- Connecting rods with thin wall bearings.

The basic version of the crank drive utilizes splash lubrication. For more demanding applications, the crank drive can be supplied with:

- Splash lubrication with filter or with filter and heat ex.
- Forced oil lubrication with a water or air cooled heat exchanger. In these applications, the lube gear pump is driven directly from the crankshaft of the main pump.

#### Hydraulic section consisting of:

- Hydraulic head includes the suction and delivery valve assemblies. The hydraulic connections can be located on either side of the head. Steel heads are standard but stainless steel is also available.
- Pumping group consisting of the plungers, cylinder, and self adjusting seat packing to ensure long life.

### Accessories

Bypass valve with electro-pneumatic control  
Check valve located on delivery side  
Adjustable relief or safety valve  
Simplex or duplex suction filter  
Pressure gauge  
Pressure switch for suction or pressure side  
Thermostat for crank drive  
Coupling with guard  
Electric Motor  
Complete pumping units

### Material Standards

Crankshaft  
42CrMo4 forged, hardened, and tempered, nitrided (UNI EN 10083-1)

Connecting rods  
GS 500/7 (UNI 4544) spheroidal graphite cast iron

Crosshead and jackets  
GS 400/7 (UNI4544)

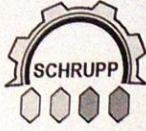
Hydraulic head  
C 45 forged with protective coating (UNI EN 10083-1)

Valves  
AISI 431 hardened and tempered

Valve seats  
AISI 431 hardened and tempered

Valve springs  
AISI 302

Plungers  
AISI 304 ceramic coating –up to 350bar, tungsten carbide coating, or ceramic



# Inoxihp Plunger Pumps

**SCHRUPP**

Parker, Pa. 18049  
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 Telefax: 724-399-4263

### Identification Code

PF	190	L	35	T35	S	1
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Size	Gear Ratio	Plunger Diameter	Hydraulic Head	Hydraulic Head Material	Lubrication
150 Triplex	E	30	Triplex	S Steel	1 Splash
190 Triplex	L	35	T35 (350bar)	A AISI 304	2 Splash plus oil filtration circuit
260 Triplex	V	40	T10 (1000bar)	D AISI 431B	3 Splash plus oil filtration and heat ex.
300 Quintupl		45	Quintuplex	X AISI 316L	4 Forced lubrication with heat ex.
330 Quintupl		50	Q35 (350bar)		
		55	Q10 (1000bar)		
		60	SPE (Special)		

### Selection Tables Triplex

PF150		Speed (rpm)/ Gear Reduction - Flow Q=L/min											Max absorbed power: 75 KW	
Plunger	E	L	V	E	L	V	E	L	V	E	L	V	Press max bar	
	(1000)	(1000)	(1000)	(1200)	(1200)	(1200)	(1500)	(1500)	(1500)	(1800)	(1800)	(1800)	T35	T10
30	44	51	59	52	61	70	66	76	88	79	91	106	350	460
35	60	69	80	72	82	96	90	104	120	108	124	145	340	-
40	79	90	105	94	108	126	118	136	158	142	162	189	260	-
45	100	114	133	120	137	159	150	172	200	180	205	239	200	-
50	123	141	164	147	169	197	183	212	246	221	253	296	160	-
55	149	171	199	178	205	238	223	257	298	268	307	-	140	-
60	177	204	236	212	244	283	264	306	-	-	-	-	115	-

PF190		Speed (rpm)/Gear Reduction - Flow Q=L/min											Max absorbed power: 120 KW	
Plunger	E	L	V	E	L	V	E	L	V	E	L	V	Press max bar	
	(1000)	(1000)	(1000)	(1200)	(1200)	(1200)	(1500)	(1500)	(1500)	(1800)	(1800)	(1800)	T35	T10
30	44	51	59	52	61	70	66	76	88	79	91	106	350	730
35	60	69	80	72	82	96	90	104	120	108	124	145	350	540
40	79	90	105	94	108	126	118	136	158	142	162	189	350	410
45	100	114	133	120	137	159	150	172	200	180	205	239	320	-
50	123	141	164	147	169	197	183	212	246	221	253	296	260	-
55	149	171	199	178	205	238	223	257	298	268	-	-	220	-
60	177	204	236	212	244	283	264	306	-	-	-	-	180	-

PF260		Speed rpm/Gear Box Reduction - Flow Q=LPM											Max absorbed power: 160 KW	
Plunger	E	L	V	E	L	V	E	L	V	E	L	V	Press max bar	
	(1000)	(1000)	(1000)	(1200)	(1200)	(1200)	(1500)	(1500)	(1500)	(1800)	(1800)	(1800)	T35	T10
30	45	52	61	54	62	73	68	78	91	81	93	109	350	990
35	62	71	83	74	85	99	93	107	124	111	127	149	350	730
40	81	93	108	97	111	129	122	140	163	145	167	195	350	555
45	103	118	137	123	141	164	154	177	206	185	212	247	350	440
50	127	146	169	152	175	203	190	219	254	228	262	305	350	355
55	153	176	205	183	211	246	230	264	307	275	-	-	315	-
60	183	210	244	219	252	293	274	315	-	-	-	-	260	-



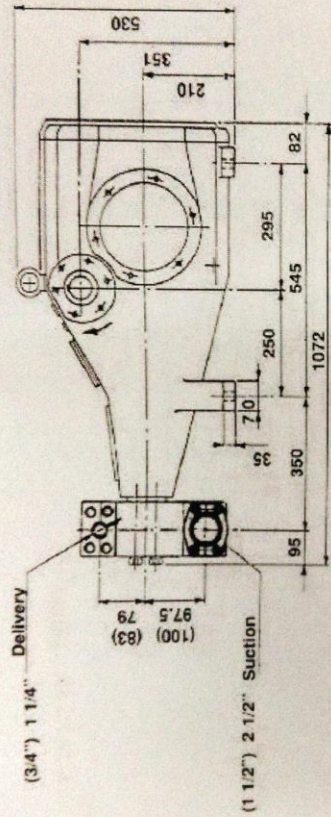
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## Inoxihp Plunger Pumps

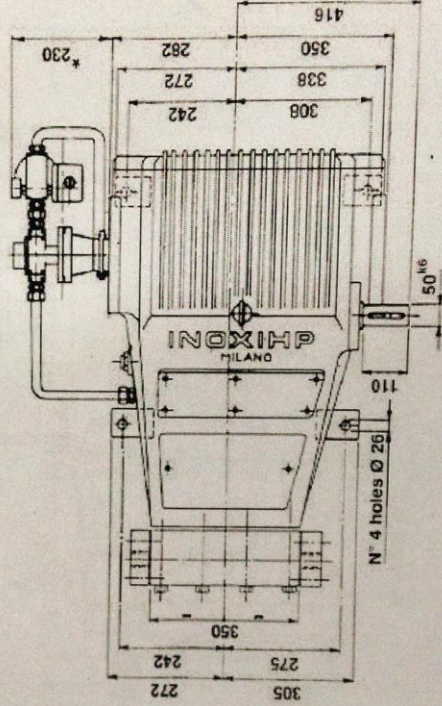
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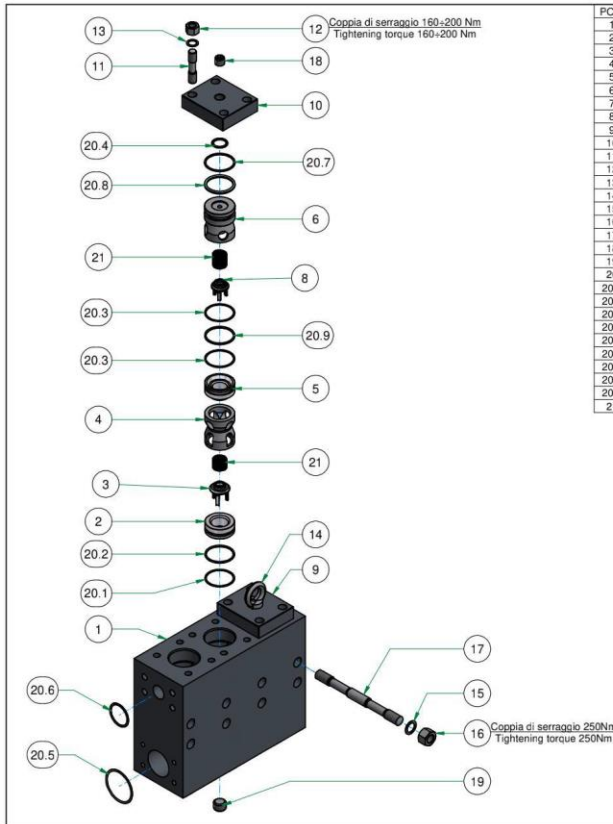
### Dimensions Triplex pumps



PF 150 Kg. 605  
PF 190 Kg. 620  
PF 260 Kg. 680



Dimensions T35 (T10)



POS.	N. PCS	DESCRIZIONE	DESCRIPTION	CODICE
1	1	CORPO TESTATA T35	BODY	B510108
2	3	SEDE VALVOLA DI ASPIRAZIONE	SEAT SUCTION VALVE	B520302
3	3	VALVOLA DI ASPIRAZIONE	SUCTION VALVE	B310050
4	3	DISTANZIALE VALVOLE	VALVE SPACER	B510401
5	3	SEDE VALVOLA DI MANDATA	SEAT DELIVERY VALVE	B520303
6	1	FERMO PER VALVOLA DI MANDATA	LIFT LIMIT DELIVERY VALVE	B310402
7	2	FERMO PER VALVOLA DI MANDATA	LIFT LIMIT DELIVERY VALVE	B310401
8	3	VALVOLA DI MANDATA	DELIVERY VALVE	B510012
9	2	COPERCHIO SUPERIORE	UPPER COVER	B310403
10	1	COPERCHIO SUPERIORE PER MANOMETRO	UPPER COVER FOR MANOMETER	B310404
11	12	TIRANTE M16	TIE ROD M16	K601678
12	12	DADO M16	NUT M16	U962210
13	12	RONDELLA ZIGRINATA Ø16	WASHER Ø16	U493410
14	2	GOLFARE	EYE BOLT	U470005
15	8	RONDELLA ZIGRINATA Ø20	WASHER Ø20	U493412
16	8	DADO M 20	NUT M20	U962212
17	8	TIRANTE M20	TIE ROD M20	K602029
18	1	TAPPO 1/2" GAS	PLUG 1/2" GAS	U361209
19	3	GRANO 3/4" GAS	DOWEL 3/4" GAS	U360210
20	1	KIT GUARNIZIONI	GASKET KIT	L012524
20.1	3	ANELLO ANTI ESTRUSIONE	ANTI-EXTRUSION RING	L830156
20.2	3	GUARNIZIONE	GASKET	L810156P
20.3	6	ANELLO ANTI ESTRUSIONE	ANTI-EXTRUSION RING	L834213
20.4	1	GUARNIZIONE	GASKET	L810134T
20.5	2	GUARNIZIONE	GASKET	L814275P
20.6	2	GUARNIZIONE	GASKET	L814187P
20.7	3	ANELLO ANTI ESTRUSIONE	ANTI-EXTRUSION RING	L836213
20.8	3	GUARNIZIONE	GASKET	L816212P
20.9	3	GUARNIZIONE	GASKET	L814212P
21	6	MOLLA VALVOLA	VALVE SPRING	H510035

4	ASSEMBLATO DESCRITTO	2016-08-09	D. SGRO	TOMASELLI
3	CORRETTA DISTINCA BASE	2006/01/19	Ghezzi	TOMASELLI
2	TOLTO IL MANOMETRO ED INSERITO UN GRANO	11/12/2000	D. SGRO	TOMASELLI
1	...	06-08-24	VISMARA	L

REVISIONE	DESCRIZIONE	DATA	DISegnATO	CONTROLLATO	APPROVATO
1	...	...	...	...	...

SPESIFICAZIONE QUANTITÀ	RUGOSITÀ Ra (µm)	TRATTAMENTO TERMICO	TRATTAMENTO SUPERFICIALE
UNEFINITE O-AMBERS	...	HEAT TREATMENT	SUPERFICIAL TREATMENT

MATERIALE	RICAVATO DA	STATO MATERIALE ALL'ACQUISTO
MATERIAL	MANUFACTURED BY	STATE OF PURCHASED MATERIAL

DISIGNATO	CONTROLLATO	APPROVATO	TOLLERANZE GENERALI	MASSA IN	SCALA	FORMATO
PREPARED	CHECKED	APPROVED	GENERAL TOLERANCE	MASS IN	SCALE	FORMAT
DATE	19/02/2010			96	1:6	A3
FIRMA	Ghezzi					

TESTATA IDRAULICA T35	
HYDRAULIC HEAD T35	
NUMERO DEL DISEGNO / DESIGN NUMBER	REVISIONE
B001312	4

INOXIHP ABOUT USING WATER

**insig**

Management of Ordering Department



Order No. : 24-56928

**Material Request**

IRAN National Steel Industrial Group

Page...2...of...2.....

4	8997613360	VALVE SEAT D 35 MM MARK : INOXIHP PART NO : B310302	ولو سیت یا قطر ۳۵ م م (مربوط به پمپ های دی اسکیلر)	20	PCS
5	8997613400	OIL SEAL 30*42*7 MARK : INOXIHP PART NO : L840071	پکینگ ۳۰*۴۲*۷ (مربوط به پمپ های دی اسکیلر)	20	PCS
6	8997613450	SPRING HEAD VALVE PF MARK : INOXIHP PART NO : H510035	فتر سر ولو (مربوط به پمپ های دی اسکیلر)	10	PCS
		6 ITEMS			

Remarks :

Specialist : M.Godazi

Ordering Dep : M.Asadi

Confirmed By : H.Akidi

Akidi 2.09

**insig**

Management of Ordering Department



Order No. : 24-56928

**Material Request**

IRAN National Steel Industrial Group

Page...1....of...2.....

Item	ID Code	Descriptive and detailed technical specification	شرح فارسی کالا	Qty	Unit
1	8997613300	VALVE D 30 MM MARK : INOXIHP PART NO : B510012	ولو ۳۰ م م (مربوط به پمپ های دی اسکیلر)	20	PCS
2	8997613310	VALVE SEAT D 30 MM MARK : INOXIHP PART NO : B510015	ولو سیت با قطر ۳۰ م م (مربوط به پمپ های دی اسکیلر)	20	PCS
3	8997613350	VALVE D 35 MM MARK : INOXIHP PART NO : B310050	ولو ۳۵ م م (مربوط به پمپ های دی اسکیلر)	20	PCS

F 86-07 (1/1) R2

Specialist : M.Godazi

Ordering Dep : M.Asadi

Confirmed By : H.Akidi