



A COMPLETE FAMILY OF AUTOMATIC LUBRICATION SYSTEMS  
SOLUTION FOR MINING & MOBILE EQUIPMENTS



AUTOMATIC LUBRICATION SYSTEMS

# HARTEX Quality By Design

## BLACK STAR 10:1 - HYDRAULIC GREASE PUMP

### Superior System Performance

Heavy-duty and mining equipment rely on fresh lubricant to flush contaminants from critical pivot points. An automatic lubrication system from HARTEX provides constant lube replenishment, preventing expensive and catastrophic component failures. Divider valves and injectors accurately distribute lubricant to multiply lube points and are designed to accept a variety of system accessories which include electronic controllers and pressure switches.

#### *HX Injectors Series*

- Exclusive seal design for up to 30% longer life
- Field adjustable output for most every application



#### *Divider Valve Assembly*

- Accurately meters lubrication to each point
- Adds performance indicators to ensure vital components have been lubricated



#### *Rugged Digital Controller*

- Full featured performance, time- or pressure-based control to monitor reservoir level and system pressure

#### *Compact Pressure Switch*

- The new design of the pressure switch allows for easy and maintenance - free use



#### *Center-Feed Vent and Refill Port*

- Located at the bottom of cylinder tank for trouble-free venting and refilling

#### *Electric Vent Valve*

- Design to make it simple to install in injector - based lube system
- Built to last, few moving parts & little maintenance required

#### *Built-In Gauge*

- Conveniently monitor hydraulic output pressure

#### *Oil Pressure Control*

- Ability to adjust oil pressure, puts you in control



# Typical Applications

## Mobile

- Front-end loaders - 12 cu. yd. or higher
- Mining trucks - 100 ton capacity or higher
- Shovel fronts
- Drag lines
- Bucket wheel excavators

## Stationary

- Cement plant
- Jaw and gyratory crushers
- Grinding mill seals
- Mineral sizers
- Ship loaders - slew bearings
- Sludge pumps



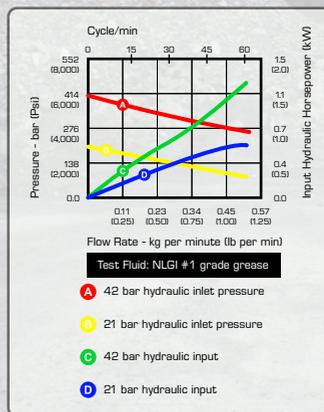
## Technical Specification

### BLACK STAR 10:1 PUMPS

Part Number	811152000
Drum Size	27 Kg (60 Lb) & 41 Kg (90 Lb)
Overall Pump Length	860 mm (33.8 in)
Pump Lower Length	500 mm (19.68 in)
Maximum Hydraulic Input Pressure	41 bar (600 Psi)
Recommended Hyd. Input Pressure	22 bar (330 Psi)
Maximum Hydraulic Fluid Input Volume	10 lpm (2.6 gpm)
Maximum Flow Output Rate	0.17 kg/min (0.37 lb/min)
Maximum CPM	20
Maximum Fluid Output Pressure	413 bar (6,000 Psi)
Hydraulic Supply Inlet	9/16"-18 UNF
Hydraulic Return Outlet	9/16"-18 UNF
Fluid Outlet	9/16"-18 UNF
Maximum Incoming Hydraulic Fluid Temp.	121° C (250° F)
Minimum Incoming Hydraulic Fluid Temp.	90° C (200° F)

811152002
180 Kg (400 Lb)
1,230 mm (48.4 in)
857 mm (33.75 in)
41 bar (600 Psi)
22 bar (330 Psi)
10 lpm (2.6 gpm)
0.17 kg/min (0.37 lb/min)
20
413 bar (6,000 Psi)
9/16"-18 UNF
9/16"-18 UNF
9/16"-18 UNF
121° C (250° F)
90° C (200° F)

### Typical Pump Performance



# Ordering Information

			
BLACK STAR, 10:1 - PUMP MODULE - 27 KG	BLACK STAR, 10:1 - PUMP MODULE - 41 KG	BLACK STAR, 10:1 - PUMP MODULE - 181 KG	BLACK STAR, 10:1 - PUMP MODULE - 27 KG
PN: 821152000	PN: 821152001	PN: 821152002	( DIVIDER ) PN: 821152003

			
BLACK STAR 10:1 HYDRAULIC PUMP	VENT VALVE ELECTRIC KIT	HYDRAULIC CONTROL ASSEMBLY	HLC 3300
PN: 811152000 (27 & 41 Kg)	PN: 821302400	PN: 821152500	PN: 820312010 (CONTROLLER)
PN: 811152002 (181 Kg)			PN: 870351006 (CONNECTOR 12 PINS)
PN: 821152131 (Repair Kit Pump Grease)			
PN: 821152230 (Repair Kit Reciprocator)			

			
PISTON PRESSURE SWITCH	OIL PRESSURE GAUGE 1500 PSI	GREASE PRESSURE GAUGE 6000 PSI	OUTLET MANIFOLD
PN: 811343647	PN: 820312014	PN: 820312013	PN: 821343912

# HARTEX Quality By Design

## FIRE LUBE 300 - 50:1 - PNEUMATIC GREASE PUMP

### Superior System Performance

Heavy-duty and mining equipment rely on fresh lubricant to flush contaminants from critical pivot points. An automatic lubrication system from HARTEX provides constant lube replenishment, preventing expensive and catastrophic component failures. Divider valves and injectors accurately distribute lubricant to multiply lube points and are designed to accept a variety of system accessories which include electronic controllers and pressure switches.

#### *HX Injectors Series*

- Exclusive seal design for up to 30% longer life
- Field adjustable output for most every application



#### *Rugged Digital Controller*

- Full featured performance, time- or pressure-based control to monitor reservoir level and system pressure



#### *Divider Valve Assembly*

- Accurately meters lubrication to each point
- Adds performance indicators to ensure vital components have been lubricated



#### *Compact Pressure Switch*

- The new design of the pressure switch allows for easy and maintenance - free use



#### *Center-Feed Vent and Refill Port*

- Located at the bottom of cylinder tank for trouble-free venting and refilling

#### *Electric Vent Valve*

- Design to make it simple to install in injector - based lube system
- Built to last, few moving parts & little maintenance required



#### *Air Control*

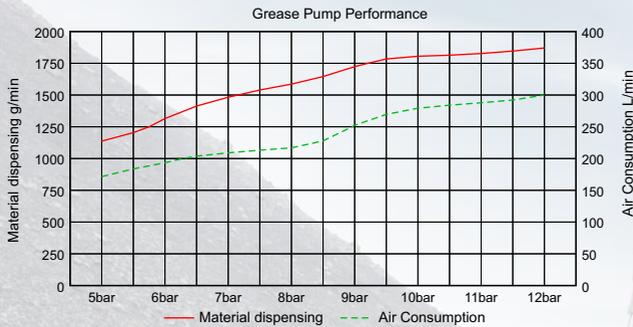
- Air Solenoid with Air Filter Regulator & Lubricator

# HARTEX Quality By Design

## Grease Pump - Fire Lube 300 - 50:1

Designed for manufacturing or automotive service facilities

- 50:1 ratio allows grease to be pumped up to NLGI 02 (Refer to appendix 2)
- Double acting pump provides continuous flow operation
- Rugged inlet cage withstands demanding shop environments
- Full line of stationary and portable package configurations
- High flow capability, stable function



## Technical Specification

Part No	821252004
Drum Application	27 & 41 kg / 60 & 90 lbs
Pressure Ratio	50 : 1
Air Inlet Pressure	5 - 12 bar / 70-175 psi
MAX. Fluid Pressure	600 bar / 8700 psi
Air Motor Effective Diameter	76 mm / 3"
Air Consumption (min)	@ 8 bar 230 L @115 psi / 8.1 CFM
MAX. Free Flow Rate (min)	1800 g / 4 lbs
Suction Tube Diameter	32 mm / 1 -1/4"
Suction Tube Length	445 mm / 19 "
Air Inlet Connection	1/4" Quick plug 1/4" NPT Female
Grease Inlet Connection	1/4" BSP/ 1/4" NPT Female
Weight	8 kgs / 17 lbs
Packaging Dimension	92 x 25 x 20 cm / 36.2" x 9.8" x 7.8"



Part No	821252005
Drum Application	180 kg / 397 lbs
Pressure Ratio	50 : 1
Air Inlet Pressure	5 - 12 bar / 70-175 psi
MAX. Fluid Pressure	600 bar / 8700 psi
Air Motor Effective Diameter	76 mm / 3"
Air Consumption (min)	@ 8 bar 230 L @115 psi / 8.1 CFM
MAX. Free Flow Rate (min)	1800 g / 4 lbs
Suction Tube Diameter	32 mm / 1 -1/4"
Suction Tube Length	855 mm / 37"
Air Inlet Connection	1/4" Quick plug 1/4" NPT Female
Grease Inlet Connection	1/4" BSP/ 1/4" NPT Female
Weight	10.5 kgs / 22 lbs
Packaging Dimension	139 x 25 x 20cm / 54.7"x9.8"x7.8"



# Ordering Information

			
FIRE LUBE 300, 50:1 - PUMP MODULE - 27 KG	FIRE LUBE 300, 50:1 - PUMP MODULE - 41 KG	FIRE LUBE 300, 50:1 - PUMP MODULE - 181 KG	FIRE LUBE 300, 50:1 - PUMP MODULE - 27 KG
PN: 821252000	PN: 821252001	PN: 821252002	( DIVIDER ) PN: 821252003

			
FIRE LUBE 300 50:1 PNEUMATIC GREASE PUMP	VENT VALVE ELECTRIC KIT	SELENOID & FRL ( FILTER, REGULATOR, LUBRICATOR)	HLC 3300
PN: 821252004 (27 & 41 Kg)	PN: 821302400	PN: 821252600	PN: 820312010 (CONTROLLER)
PN: 821252005 (181 Kg)			PN: 870351006 (CONNECTOR 12 PINS)
PN: 811252100 (Repair Kit - Air Motor)			
PN: 811152200 (Repair Kit - Displacement Pump)			

		
PISTON PRESSURE SWITCH	OIL PRESSURE GAUGE 1500 PSI	GREASE PRESSURE GAUGE 6000 PSI
PN: 811343647	PN: 820312014	PN: 820312013

# HARTEX Quality By Design

## COMPACT BLACK STAR ( CBS ) - ELECTRIC GREASE PUMP

### Superior System Performance

The Black Star Compact Pump (CBS) presents an alternative to electric pumps with large grease capacity, high flow and strong durability in a compact dimension to extend the working life of equipment and users in extreme environments.

#### *HX Injectors Series*

- Exclusive seal design for up to 30% longer life
- Field adjustable output for most every application



#### *Divider Valve Assembly*

- Accurately meters lubrication to each point
- Adds performance indicators to ensure vital components have been lubricated



#### *Rugged Digital Controller*

- Full featured performance, time- or pressure-based control to monitor reservoir level and system pressure

#### *Tough Power Train*

- 24 VDC, brush-less motor and zero maintenance gear drive deliver lubricants on time, even at -40° F ( -40° C )

#### *Compact Pressure Switch*

- The new design of the pressure switch allows for easy and maintenance - free use

#### *Built to Last*

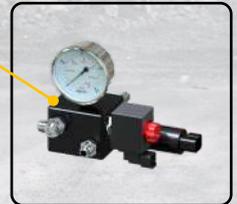
- Metal construction ensures reliable operation in the most extreme environment

#### *Electric Vent Valve*

- Design to make it simple to install in injector - based lube system
- Built to last, few moving parts & little maintenance required

#### *Center-Feed Vent and Refill Port*

- Located at the bottom of cylinder tank for trouble-free venting and refilling



## Compact Black Star

### Superior System Performance

The Black Star Compact Pump (CBS) presents an alternative to electric pumps with large grease capacity, high flow and strong durability in a compact dimension to extend the working life of equipment and users in extreme environments.

### Typical Application

- Mining
- Construction
- Hydraulic Fracturing Units
- Aggregates

## Technical Specification

Part No	811343600
Reservoir Size	27 & 41 Kg
Maximum Working Pressure	3,500 psi (241 bar)
Pressure Relief Valve Set	4,000 psi (276 bar/28 Mpa)
Maximum Flow Output Rate	74 cm <sup>3</sup> /min (4.5 in <sup>3</sup> /min)
Grease Type	Up to NLGI #2
Ratings	IP69K
Electric Motor	
Voltage	24 VDC
Maximum Power	250 w
Maximum Current	12,5 A
Rotation/minute	1500+10%
Maximum Torque	1,59 Nm



Part No	811343800
Reservoir Size	181 Kg
Maximum Working Pressure	3,500 psi (241 bar)
Pressure Relief Valve Set	4,000 psi (276 bar/28 Mpa)
Maximum Flow Output Rate	74 cm <sup>3</sup> /min (4.5 in <sup>3</sup> /min)
Grease Type	Up to NLGI #2
Ratings	IP69K
Electric Motor	
Voltage	24 VDC
Maximum Power	250 w
Maximum Current	12,5 A
Rotation/minute	1500+10%
Maximum Torque	1,59 Nm



# Ordering Information

			
COMPACT BLACK STAR - PUMP MODULE - 27 KG	COMPACT BLACK STAR - PUMP MODULE - 41 KG	COMPACT BLACK STAR - PUMP MODULE - 181 KG	COMPACT BLACK STAR - PUMP MODULE - 27 KG
PN: 821343600	PN: 821343700	PN: 821343800	( DIVIDER ) PN: 821343900

			
COMPACT BLACK STAR - PUMP ONLY	VENT VALVE ELECTRIC KIT	HLC 3300	PISTON PRESSURE SWITCH
PN: 811343600 (27 & 41 Kg)	PN: 821302400	PN: 820312010 (CONTROLLER)	PN: 811343647
PN: 811343800 (181 Kg)		PN: 870351006 (CONNECTOR 12 PINS)	
PN: 811152200 (Repair Kit - Displacement Pump)			

	
GREASE PRESSURE GAUGE 6000 PSI	OUTLET MANIFOLD
PN: 820312013	PN: 821343912

# HARTEX Quality By Design

## Hartex Electric Pump

Electrically - Powered Lubrication Pump



### FEATURES AND BENEFITS

- Pump body can be configured to operate one to four fixed displacement pump cartridges that can feed four different zones or be combined for maximum output;
- Designed to deliver NLGI #000 - #2 greases to a maximum pressure of up to 5075 psi (350 bar, 35 Mpa) and up to 4350 psi (300 bar, 30 Mpa) with a Safety Valve
- Remote controller connection offers more functionality and options.
- The integrated one-way valve inside pump element prevents grease from being sucked back from the main line.
- A stir plate pushes the grease through the strainer plate to reduce air bubbles and allow visual inspection of the volume of grease in the reservoir.
- Additional top mounts enable both top and bottom mounting for exceptional strength.
- Reservoir capacities of 4L, 8L and 12L;

# Ordering Information

			
HARTEX ELECTRIC PUMP 12 L	HARTEX ELECTRIC PUMP 8 L	HARTEX ELECTRIC PUMP 4 L	DIVIDER VALVE ASSEMBLY
PN: 821343500	PN: 821343300	PN: 821343200	PN: 821057109 (6 Outlets)
			PN: 821057209 (8 Outlets)
			PN: 821057309 (10 Outlets)
			PN: 821057409 (12 Outlets)
			PN: 821057509 (14 Outlets)
			PN: 821057511 (7 Outlets Type A)
			PN: 821057512 (7 Outlets Type B)

# Injector Technical Specification

## HARTEX HX Series Injectors

### Automatic Lubrication Systems

HARTEX quality provides consistent performance in rugged environments.

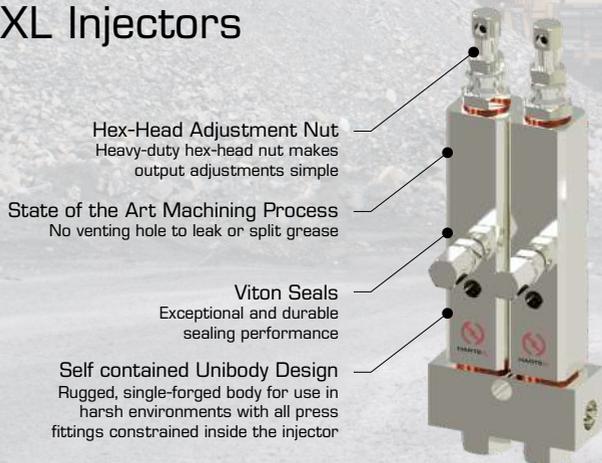
- \* Higher operating pressure to grease point
- \* No vent holes to leak lubricant
- \* Fully-enclosed press fittings



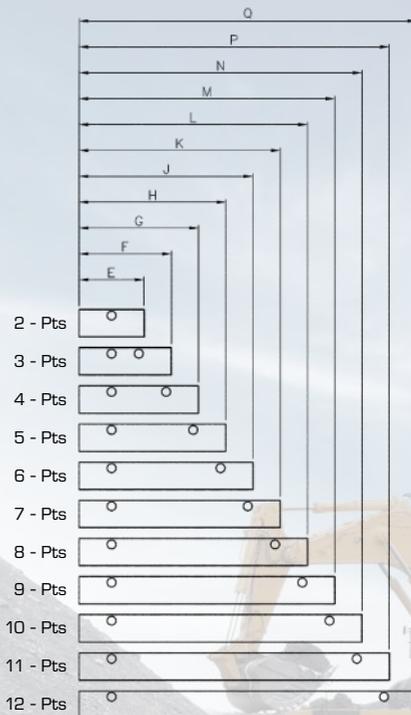
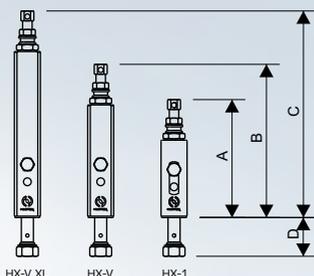
### Technical Specifications

	HX-1	HX-V	HX-V XL
Maximum operating pressure	3,500 psi (421 bar)	6,000 psi (414 bar)	6,000 psi (414 bar)
Minimum operating pressure	1,850 psi (128 bar)	1,850 psi (128 bar)	1,850 psi (128 bar)
Reset pressure	600 psi (41 bar)	1,000 psi (69 bar)	1,000 psi (69 bar)
Outcome volume per cycle	0.008 -0.08 in3 (0.013-1.31 cc)	0.015 -0.08 in3 (0.25-1.31 cc)	0.035 -0.305 in3 (0.57-5.0 cc)

## HARTEX HX-V & XL Injectors



# Injector Ordering Information



## Legends

A	5.35 in (136 mm)	J	7.97 in (202.5 mm)
B	6.96 in (176.8 mm)	K	9.22 in (234.2 mm)
C	9.38 in (238.4 mm)	L	10.47 in (266 mm)
D	1.75 in (44.7 mm)	M	11.72 in (297.7 mm)
E	2.97 in (75.5 mm)	N	12.97 in (329.5 mm)
F	4.22 in (107.2 mm)	P	14.22 in (361.2 mm)
G	5.47 in (139 mm)	Q	15.47 in (393 mm)
H	6.72 in (170.7 mm)		

## Ordering Information

HX-1

HX-V

HX-V XL

Injectors & Manifold Assemblies					
Single Replacement Injectors		821024000	821025000	821026000	
Injectors Assemblies					
Injectors Cover Kit, Plastisol		821024010			821024010
Injectors Crossport Kit		821024011	821025010		821026010
Bare Injector Manifolds (By Number of Ports)					
1	2	3	4	5	6
-	821024210	821024310	821024410	821024510	821024610
7	8	9	10	11	12
821024710	821024810	821024910	821024930	821024950	821024970

# Ordering Information

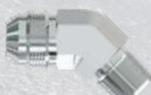
			
HARTEX REPLACEMENT INJECTOR HX-1	HARTEX REPLACEMENT INJECTOR HX-V	HARTEX REPLACEMENT INJECTOR HX-V XL	PLASTISOL
PN: 821024000 (Replacement)	PN: 821025000 (Replacement)	PN: 821026000 (Replacement)	PN: 821024010
PN: 821024011 (Repair Kit)	PN: 821025010 (Repair Kit)	PN: 821026010 (Repair Kit)	

			
HARTEX INJECTOR HX-1	HARTEX INJECTOR HX-V	HARTEX INJECTOR HX-V XL	BARE INJECTOR MANIFOLD BLOCK
PN: 821024200 (2 Points)	PN: 821025200 (2 Points)	PN: 821026200 (2 Points)	PN: 821024210 (2 Ports)
PN: 821024300 (3 Points)	PN: 821025300 (3 Points)	PN: 821026300 (3 Points)	PN: 821024310 (3 Ports)
PN: 821024400 (4 Points)	PN: 821025400 (4 Points)	PN: 821026400 (4 Points)	PN: 821024410 (4 Ports)
PN: 821024500 (5 Points)	PN: 821025500 (5 Points)	PN: 821026500 (5 Points)	PN: 821024510 (5 Ports)
PN: 821024600 (6 Points)	PN: 821025600 (6 Points)	PN: 821026600 (6 Points)	PN: 821024610 (6 Ports)
PN: 821024700 (7 Points)	PN: 821025700 (7 Points)	PN: 821026700 (7 Points)	PN: 821024710 (7 Ports)
PN: 821024800 (8 Points)	PN: 821025800 (8 Points)	PN: 821026800 (8 Points)	PN: 821024810 (8 Ports)
PN: 821024900 (9 Points)	PN: 821025900 (9 Points)	PN: 821026900 (9 Points)	PN: 821024910 (9 Ports)
PN: 821024901 (10 Points)	PN: 821025901 (10 Points)	PN: 821026901 (10 Points)	PN: 821024930 (10 Ports)
PN: 821024902 (11 Points)	PN: 821025902 (11 Points)	PN: 821026902 (11 Points)	PN: 821024950 (11 Ports)
PN: 821024903 (12 Points)	PN: 821025903 (12 Points)	PN: 821026903 (12 Points)	PN: 821024970 (12 Ports)

	DIVIDER VALVE ASSEMBLY	PN: 821057409 (12 Outlets)
	PN: 821057109 (6 Outlets)	PN: 821057509 (14 Outlets)
	PN: 821057209 (8 Outlets)	PN: 821057511 (7 Outlets Type A)
	PN: 821057309 (10 Outlets)	PN: 821057512 (7 Outlets Type B)

# Ordering Information

			
FITTING STRAIGHT JIC	FITTING 45 JIC	FITTING 90 JIC	FERRULE
PN : 022512-04-04 (1/4" - 7/16")	PN : 022542-04-04 (1/4" - 7/16")	PN : 022592-04-04 (1/4" - 7/16")	PN : 003400-04 (SIZE 1/4")
PN : 022512-06-06 (3/8" - 9/16")	PN : 022542-06-06 (3/8" - 9/16")	PN : 022592-06-06 (3/8" - 9/16")	PN : 003400-06 (SIZE 3/8")
PN : 022512-08-08 (1/2" - 3/4")	PN : 022542-08-08 (1/2" - 3/4")	PN : 022592-08-08 (1/2" - 3/4")	PN : 003400-08 (SIZE 1/2")

			
ADAPTOR STRAIGHT JIC - NPT	ADAPTOR 45° JIC - NPT	ADAPTOR 90° JIC - NPT	MALE PLUG NPT
PN : 0502528-04-02 (7/16" - 1/8")	PN : 0532528-04-02 (7/16" - 1/8")	PN : 0562528-04-02 (7/16" - 1/8")	PN : 0402800-06 (3/8")
PN : 0502528-04-04 (7/16" - 1/4")	PN : 0532528-04-04 (7/16" - 1/4")	PN : 0562528-04-04 (7/16" - 1/4")	PN : 0402800-08 (1/2")
PN : 0502528-06-06 (9/16" - 3/8")	PN : 0532528-06-06 (9/16" - 3/8")	PN : 0562528-06-06 (9/16" - 3/8")	
PN : 0502528-08-06 (3/4" - 3/8")	PN : 0532528-08-06 (3/4" - 3/8")	PN : 0562528-08-06 (3/4" - 3/8")	

		
HYDRAULIC HOSE 1SN	HYDRAULIC HOSE 2SN	SPIRAL GUARD
PN: 08-BRAID1SN (SIZE 1/2")	PN: 04-BRAID2SN (SIZE 1/4")	PN: 800001031 (13-17mm)
	PN: 06-BRAID2SN (SIZE 3/8")	PN: 800001032 (16-22mm)
	PN: 08-BRAID2SN (SIZE 1/2")	

# Ordering Information

			
HOSE STUD, ELBOW 90° (Ø 6,8 mm)	HOSE STUD, ELBOW 45° (Ø 6,8 mm)	HOSE STUD, STRAIGHT (Ø 6,8 mm)	SCREW SLEEVE HOSE OD. 8,6 mm
PN : 821210001	PN : 821310001	PN : 821110001	PN : 821070001

			
STRAIGHT ADAPTOR M10x1 (6mm)	ELBOW ADAPTOR 90° M10x1 (6mm)	BRIDGE CONNECTORS (6mm)	SWIVEL ADAPTOR MF 1/8"
PN : 821121301	PN : 821222301	PN : 821133301	PN : 821821201 (NPT-NPT) PN : 821825601 (BSPT-BSPT)

			
ADAPTOR MF 1/8" NPT STANDARD	ADAPTOR MF 1/8" NPT 30 mm	HOSE 840 Bar OD. 8,6 mm	SPRING & ARMOUR GUARD
PN : 821141201	PN : 821441201	PN : 821060001	PN: 800001058 (SPRING GUARD) PN: 800001059 (ARMOUR GUARD)



**HARTEX**

Distributor :

## HARTEX GLOBAL INDUSTRIAL

### Factory :

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