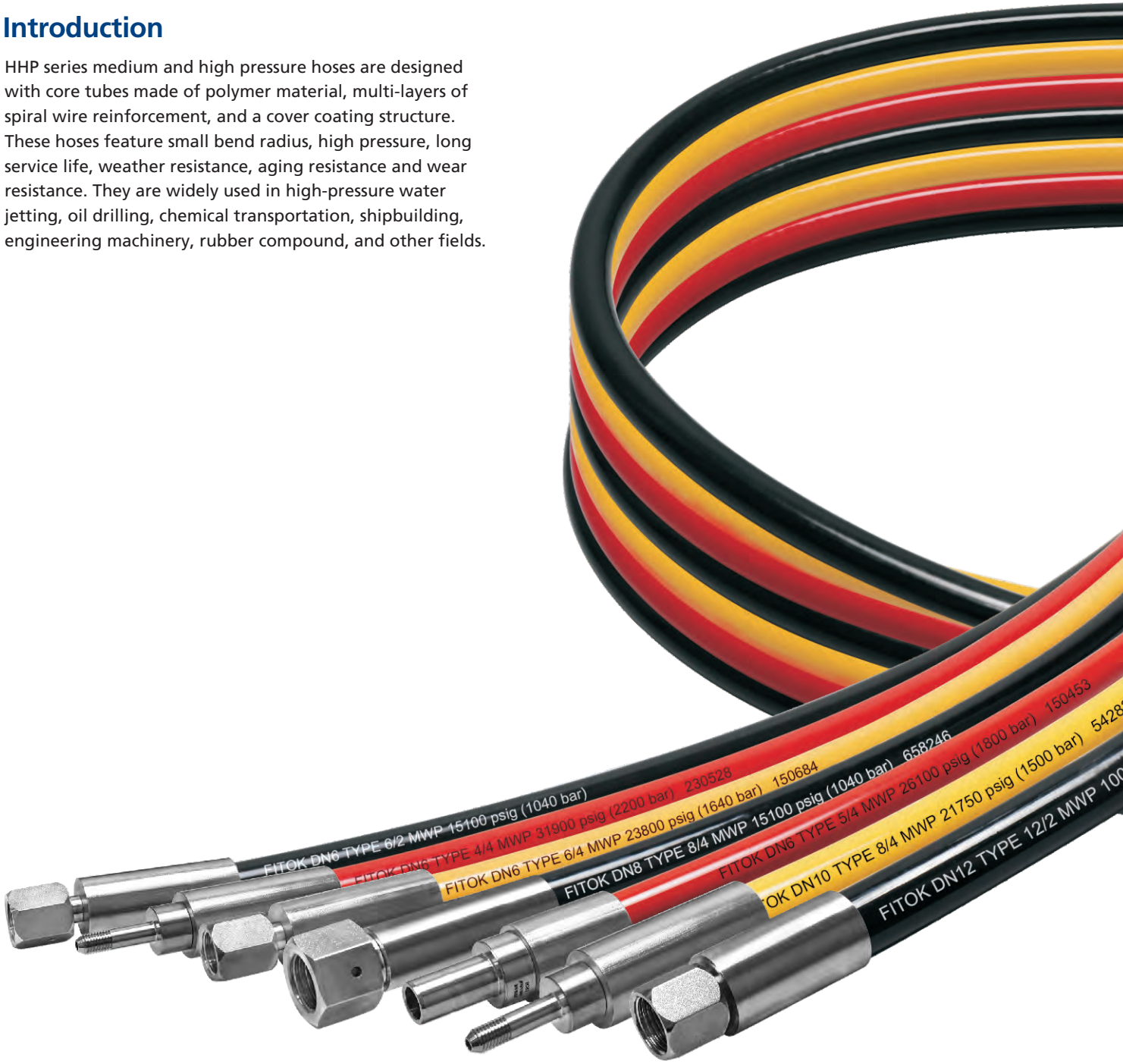


Medium and High Pressure Hoses HHP Series

Introduction

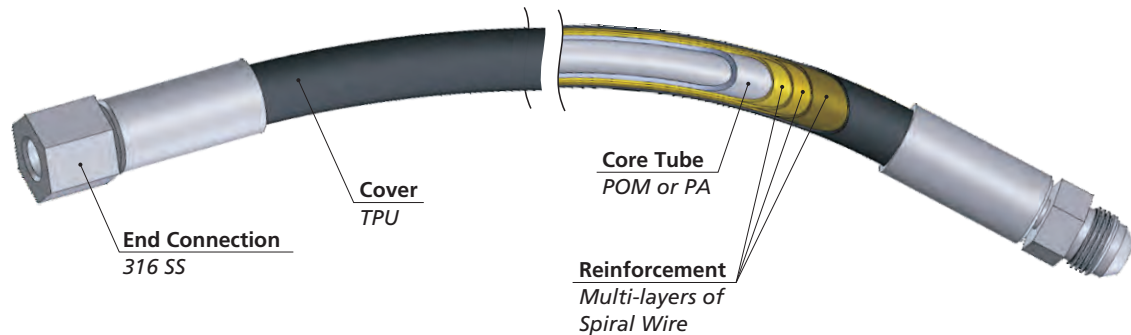
HHP series medium and high pressure hoses are designed with core tubes made of polymer material, multi-layers of spiral wire reinforcement, and a cover coating structure. These hoses feature small bend radius, high pressure, long service life, weather resistance, aging resistance and wear resistance. They are widely used in high-pressure water jetting, oil drilling, chemical transportation, shipbuilding, engineering machinery, rubber compound, and other fields.



Features

- ⦿ Core tube materials: Polyoxymethylene(POM) or Polyamide(PA)
- ⦿ Reinforcement: Multi-layers of spiral wire
- ⦿ Cover materials: Thermoplastic Polyurethane(TPU)
- ⦿ Nominal hose sizes: DN4 ~ DN12
- ⦿ Working pressure up to: 31900 psig (2200 bar)
- ⦿ Working temperature: -22 °F ~ 176 °F (-30 °C ~ 80 °C)
- ⦿ Custom lengths and wide range of end connections available

Construction

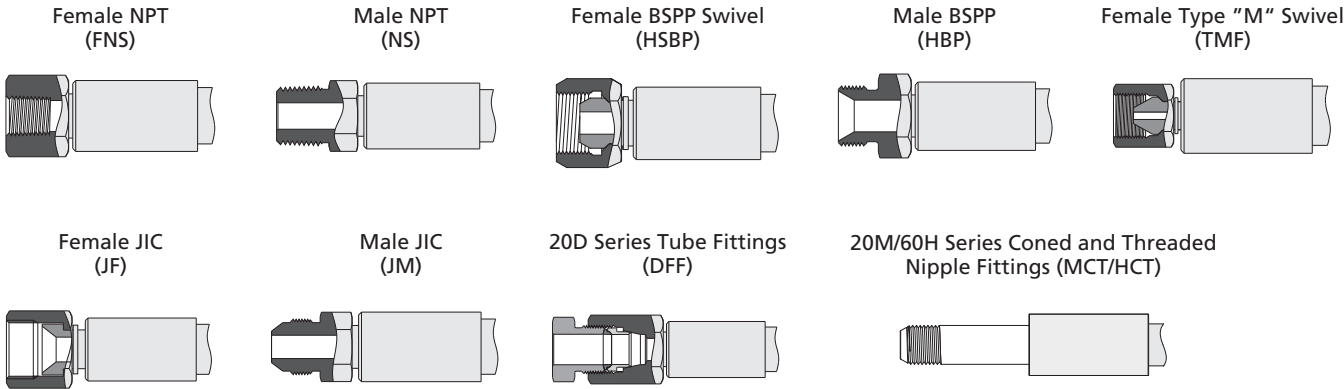


Technical Data of Hoses

Nominal Hose Size (DN)	Inside Diameter in. (mm)	Outside Diameter in. (mm)	Core Tube Material	Reinforcement (layers of spiral wire)	Cover Material	Max. Working Pressure psig (bar)		Burst Pressure psig (bar)	Min. Inside Bend Radius in. (mm)	Weight lbs/ft (kg/m)	Color
						For Liquid	For Gas				
4	0.16 (4.1)	0.39 (9.8)	POM	2	TPU	17400 (1200)	10880 (750)	43500 (3000)	2.95 (75)	0.141 (0.21)	Yellow
	0.17 (4.4)	0.48 (12.1)	POM	4	TPU	31900 (2200)	19940 (1380)	79750 (5500)	2.56 (65)	0.276 (0.41)	Red
5	0.2 (5.2)	0.43 (10.8)	POM	2	TPU	15100 (1040)	9430 (650)	37700 (2600)	2.76 (70)	0.188 (0.28)	Black
	0.2 (5.0)	0.5 (12.7)	POM	4	TPU	26100 (1800)	16330 (1130)	65300 (4500)	3.74 (95)	0.235 (0.35)	Red
6	0.24 (6.1)	0.45 (11.5)	POM	2	TPU	15100 (1040)	9430 (650)	37700 (2600)	4.33 (110)	0.168 (0.25)	Black
	0.24 (6.0)	0.55 (13.9)	POM	4	TPU	23800 (1640)	14880 (1030)	59500 (4100)	6.1 (155)	0.47 (0.7)	Yellow
8	0.31 (7.9)	0.53 (13.4)	POM	2	TPU	15100 (1040)	9430 (650)	37700 (2600)	3.94 (100)	0.282 (0.42)	Black
	0.32 (8.1)	0.65 (16.6)	POM	4	TPU	21750 (1500)	13600 (940)	54400 (3750)	4.13 (105)	0.45 (0.67)	Yellow
10	0.39 (10.0)	0.65 (16.4)	POM	2	TPU	10000 (690)	6250 (430)	25000 (1725)	6.3 (160)	0.343 (0.51)	Black
	0.39 (10.0)	0.72 (18.2)	POM	4	TPU	16000 (1100)	10000 (690)	39900 (2750)	7.87 (200)	0.417 (0.62)	Yellow
12	0.5 (12.8)	0.8 (20.4)	PA	2	TPU	10000 (690)	6250 (430)	25000 (1725)	7.87 (200)	0.464 (0.69)	Black
	0.51 (13.0)	0.87 (22.1)	PA	4	TPU	16000 (1100)	10000 (690)	39900 (2750)	7.87 (200)	0.578 (0.86)	Yellow

Note: The safety factor is 2.5:1 for liquid applications and 4:1 for gas applications, in compliance with ISO 7751 standards.

End Connections



Accessories

The accessories will be assembled onto the finished product for supply.



PVC Sleeves

Transparent PVC sleeve provides effective protection for the hose against surface abrasion or scratches. PVC sleeve is not a hose anti-burst layer thus can not be used as burst protection device for the operator.



Bend Restrictors

Bend restrictors can avoid connection kinking or bending between hoses and hose connectors in harsh working conditions.



Safety Cables

Safety cables help protect operators and nearby equipment by limiting hose whipping as much as possible in the event of a high pressure hose burst.

Testing

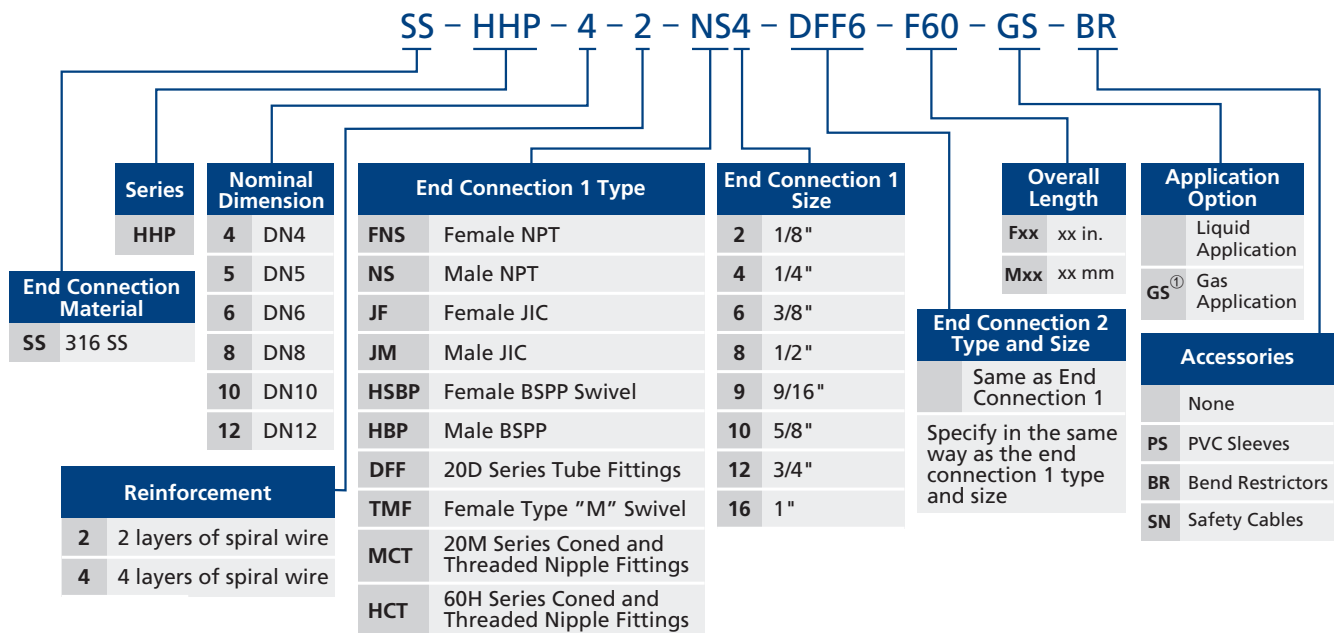
- ⦿ For liquid applications, each hose assembly is tested with clean water at 1.5 times the maximum working pressure.
- ⦿ For gas applications, in addition to testing with clean water at 1.5 times the maximum working pressure, each hose assembly will also be tested with compressed air or nitrogen at the maximum working pressure.

Hose Assembly Ordering Information

Basic Ordering Number	Hose Information		End Connection Type and Size	Pressure at 100 °F (38 °C) psig (bar)
	Specification	Reinforcement (layers of spiral wire)		
-HHP-4-2-DFF2-	DN4	2	1/8" 20D Series Tube Fittings	15000 (1034)
-HHP-4-4-TMF9-		4	9/16 Female Type "M" Swivel	31900 (2200)
-HHP-5-2-FNS4-	DN5	2	1/4 Female NPT	15000 (1034)
-HHP-5-2-HSBP4-			1/4 Female BSPP	15100 (1040)
-HHP-5-4-TMF9-		4	9/16 Female Type "M" Swivel	26100 (1800)
-HHP-6-2-DFF4-	DN6	2	1/4" 20D Series Tube Fittings	15100 (1040)
-HHP-6-2-HSBP6-			3/8 Female BSPP	15100 (1040)
-HHP-6-2-MCT4-		4	1/4" 20M Series Coned and Threaded Nipple Fittings	15100 (1040)
-HHP-6-4-HCT4-			1/4" 60H Series Coned and Threaded Nipple Fittings	23800 (1640)
-HHP-8-2-DFF6-	DN8	2	3/8" 20D Series Tube Fittings	15100 (1040)
-HHP-8-4-TMF12-		4	3/4 Female Type "M" Swivel	21800 (1500)
-HHP-8-4-JF8-			1/2 Female JIC	21800 (1500)
-HHP-10-2-NS6-	DN10	2	3/8 Male NPT	10000 (690)
-HHP-10-4-DFF8-		4	1/2" 20D Series Tube Fittings	16000 (1100)
-HHP-10-4-HSBP8-			1/2 Female BSPP Swivel	16000 (1100)
-HHP-12-2-FNS8-	DN12	2	1/2 Female NPT	10000 (690)
-HHP-12-4-DFF8-		4	1/2" 20D Series Tube Fittings	16000 (1100)
-HHP-12-4-HSBP12-			3/4 Female BSPP Swivel	16000 (1100)

Note: The working pressure is determined by the lower value between the end connection rating and the hose pressure rating.

Ordering Number Description



Notes:

- ① When used in gas application, the cover is pin-pricked due to permeation. The system designer must evaluate potential hazards caused by permeation during hose selection.
- ② "Ordering Number Description" is a reference to understand the combination rules of FITOK product part number. Not all combinations are available.