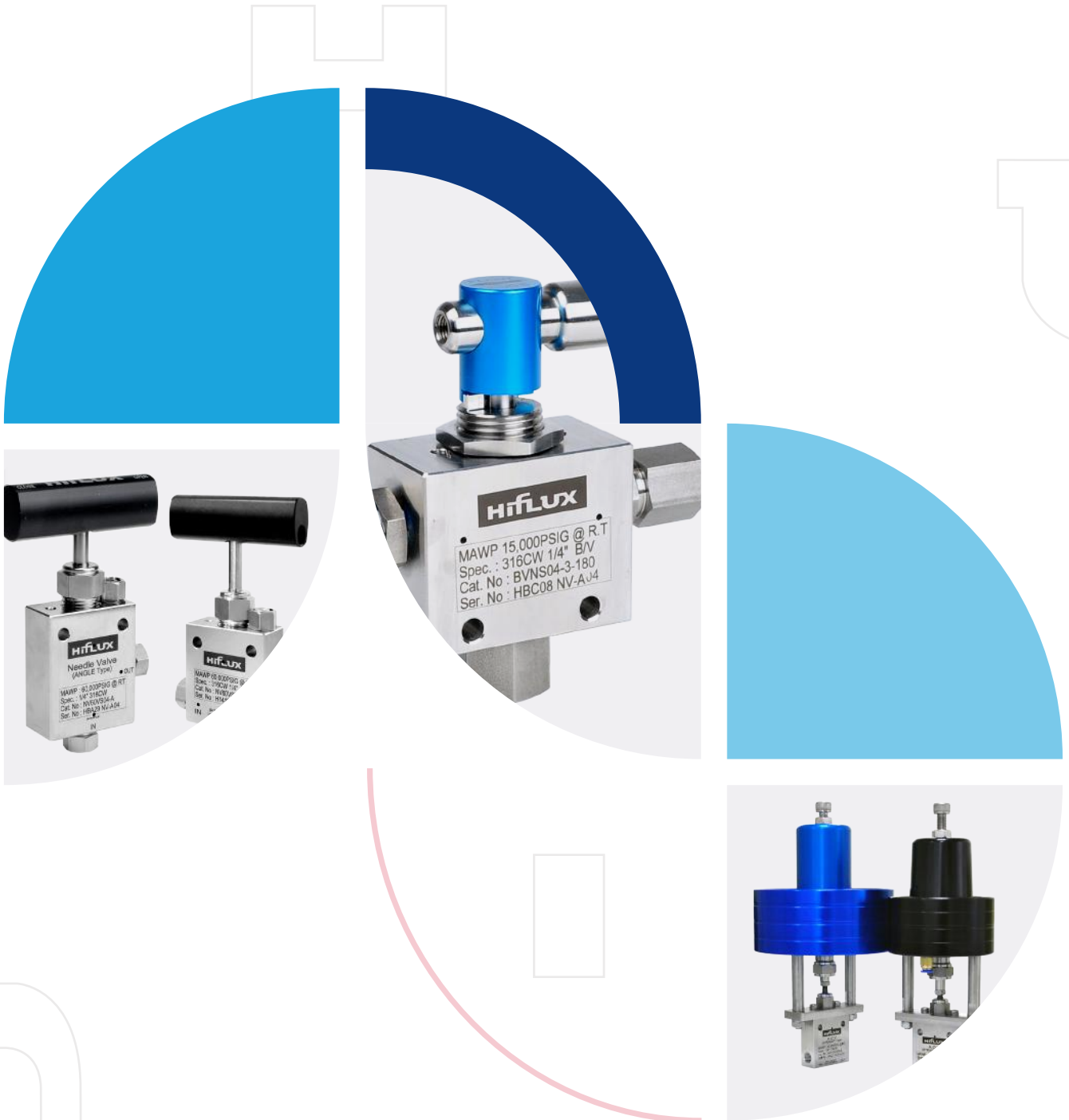


HIFLUX

High Pressure Valves & Fittings



HIFLUX is based on the accumulated precision engineering & technological know-hows, high pressure equipment, required for plant valve, fitting, pressure regulator etc., manufacturing and sells.



**HIGH SERVICE
HIGH QUALITY
HIGH PERFORMANCE!**

High Pressure equipment



CEO'S Message



Based on years of sophisticated engineering technology, Hiflux has been working hard to localize high-temperature, high-pressure industries and open new markets and developed a range of high-pressure products to meet the needs of our customers through constant research and facility investment.

Our products are applied to general pressure to special industry applications which require up to 150,000psig ultra high pressure.

In order to become a global leader in ultra-high pressure, We will do our best to become 'HIFLUX' a company that listens carefully to customers and consistently improves products and service and contributes to enhancing quality and productivity in order to develop and grow together with our customers. Thank you.

CEO ***Kim Hyeon-hyo***

HIGH PRESSURE HISTORY

PASSION FOR THE FUTURE, CONSTANT CHALLENGE AND INNOVATION

Our company has been recognized for its technology by succeeding in various localization of high-pressure instruments which are difficult to manufacture in Korea through continuous research and development and facility investment for new market exploration in ultra-high pressure instruments material field. Based on technology and price competitiveness differentiated from overseas manufacturers such as Europe and USA, we are growing into a global brand by supplying domestic OEM and supplying OEM with overseas Global Waterjet manufacturer.



DEVELOP VARIOUS HIGH PRESSURE VALVES EXPAND OVERSEAS MARKET

- Signed supply contract with Denmark and France.
- Development of High Pressure Bleed Valve, Wellhead Gauge Valve, Double Block & Bleed Valve.
- Development of high pressure ball valve 2Way / 3Way Trunnion Ball Valve.
- Development of high pressure relief valve (factory set, field adjustable, proportional type).
- Development of high pressure needle valve 3way 2stem valve.
- Signed OEM supply contract with Global Waterjet Pump manufacturer in China and Austria.
- Russia and Singapore signed contract for supply of goods.



Certificate of patent
10-2136732



Certificate of patent
10-2103737



Certificate of patent
10-2080599



Certificate of patent
10-2080603



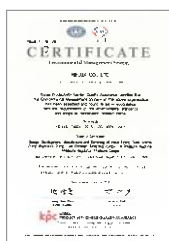
Certificate of patent
10-2225407



Certificate of patent
10-1151733



ISO 9000



ISO 14001



European Integrated
Standard Certification (CE)



Research laboratory
certification



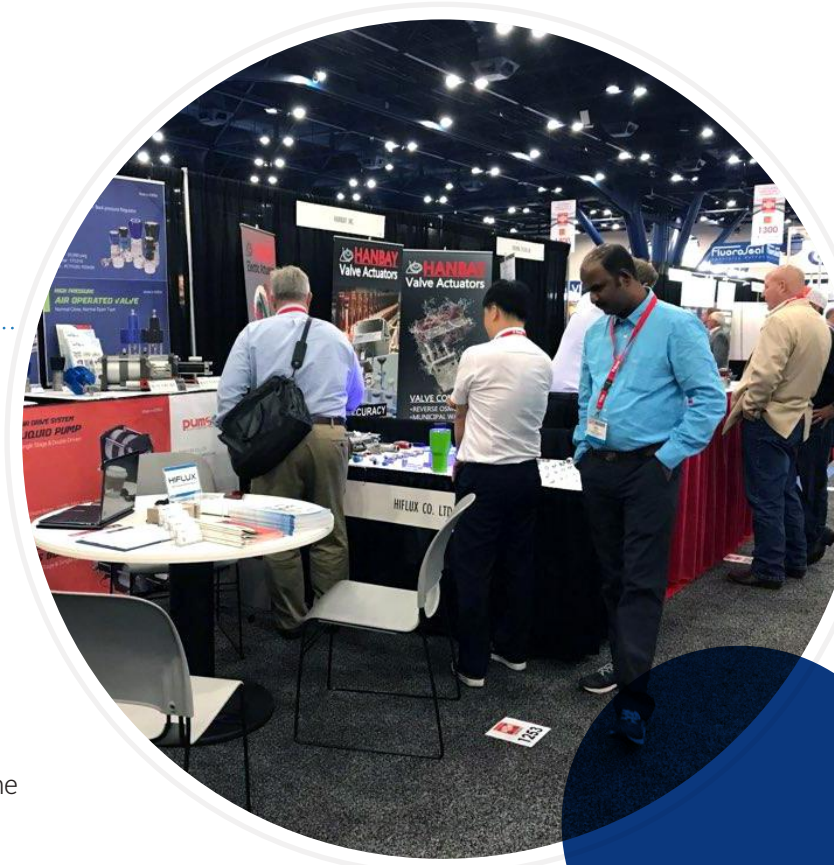
Venture company
confirmation



Trademark
(HIFLUX)

OPENING THE ONLINE MARKET PARTICIPATING IN THE DOMESTIC AND OVERSEAS FAIR

- Participated in Valve World EXPO & CONFERENCE exhibition in USA and China.
- Participated in China International Petrochemical Technology Exhibition (Cippe).
- Participated in international parts and materials industry exhibition / International nanotechnology exhibition / International marine plant exhibition every year.
- Join Open Market(Auction, Gmarket, 11st, Naver Shopping, ebay).
- Opened 'HIFLUX Shopping Mall' for the first time in the high pressure piping materials industry.



ESTABLISHED R & D CENTER HIGH PRESSURE TECHNOLOGY LOCALIZATION

- Transfer of head office and factory to Daedeok Techno Valley.
- Acquiring 'Venture Company Certification'.
- Acquired European Integrated Standard Certification (CE).
- Acquired ISO 9001, ISO 14001 certification.
- Trademark Registration 'HIFLUX, FLUXLOK'.
- Patent Registration (7 types of high pressure valves).
- Establishment and certification of affiliated research institute.

Catalog Numbering System



Simply indicate catalog number and specify option or special requirement

NV	60	V	S	06	A
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Product Value	Pressure	Type of Components	Material	Tube Size	Options
NV : Needle Valve	03 : 3,000psi	Needle Valve V : Vee Stem R : Regulating Stem	S : Stainless steel 316	02 : 1/8"	Needle Valve Control Valve Air Operated Valve
CV : Check Valve	07 : 7,500psi	Check Valve O : O-Ring Type B : Ball Type	H : Hastelloy	04 : 1/4"	S : Straight Type A : Angle Type O : 3way/1on pressure Type T : 3way/2on pressure Type
BV : Ball Valve	15 : Sleeve Type Refer to Valve Select	Ball Valve 03 : Orifice 4.8mm 05 : Orifice 8mm	HC : Hastelloy C276 wetted part	06 : 3/8"	
AOV : Air Operated Valve	20 : 20,000psi	Control Valve Air Operated Valve O : Normal-Open Type C : Normal-Closed Type	IN : Inconel 600	08 : 1/2"	Ball Valve 2-90 : 2WAY 3-180 : 3WAY Switching Type 3-90 : 3WAY Diverting Type
CON : Control Valve	30 : 30,000psi	Relief Valve FS : Factory Set FA : Field Adjustable PP : Proportional Type	IN625 : Inconel 625	09 : 9/16"	Fitting Accessory AV : Anti-Vibration Type
GV : Wellhead Gauge Valve	60 : 60,000psi	Fitting E : Elbow Type T : Tee Type C : Cross Type	IN825 : Inconel 825	12 : 3/4"	
BLV : Bleed Valve	100 : 100,000psi		NI : Nickel 200	16 : 1"	GPR N : Normal Type P : Panel Type
DBBV : Double Block & Bleed Valve	150 : 150,000psi		TI : Titanium	15 : 15A 25 : 25A	
RV : Relief Valve					
FT : Fitting					
FA : Fitting Accessory					
MF : Manifold Block					
T : Tube					
N : Nipple					
GPR : General Pressure Regulator					
HPR : High Pressure Regulator					
BPR : Back Pressure Regulator					
AD : Adapter					
TS : Tube Support					

※ Catalog number can be changed without any notification

Example

- NV60VS06-A : Needle Valve, 60,000psi, Vee Stem, 3/8", Angle Type.
- NV15VS04-O : Needle Valve, 15,000psi, Vee Stem, 1/4", 3Way/1on Pressure Type.
- CON07CS15-S : Control Valve, 7,500psi, Normal-Closed, 15A, Straight Type.
- AOV60CS04-A : Air Operated Valve, 60,000psi, Normal-Closed, 1/4", Angle Type.
- FT60ES06 : Fitting, 60,000psi, Elbow Type, 3/8".
- FA60GS04-AV : Fitting Accessory, 60,000psi, Gland, 1/4", Anti-Vibration Type.

07. Control Valve



Regulate flow of fluid automatically according to the signal from positioner

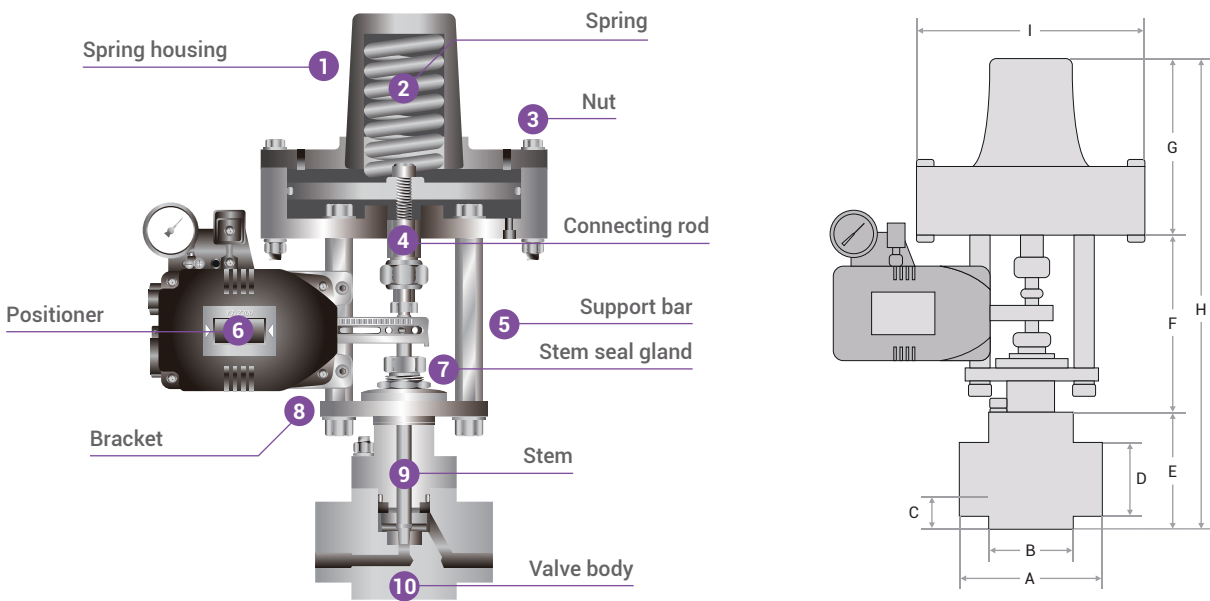
When electricity is transferred to the positioner of the control valve, the positioner controls the flow by changing the position of the stem, which regulates the flow by opening and closing the orifice.
 The hiflux control valve is designed with the properties of both gas and fluid as well as the operational pressure and temperature in mind for stability and safety in operation and resistance to corrosion.

I Features

- Minimum required air pressure : 5kgf/cm²
- Non-spinning stem prevents galling.
- Package designed for maximum sealing.
- Metal to metal seating type to lengthen the life of the seat.
- Regulating stem for better flow control.
- Max Working Pressure : 3,000psi, 7,500psi
- Pipe Size : 15A, 25A
- Cold-formed stainless steel.



I Exploded View & Dimensions



(Unit : mm)

Catalog No.	Pressure Rating	Port Type	Orifice Size	Cv	A	B	C	D	E	F	G	H	I
CON03CS15-S	3,000 psi	15A	0	9	136	80	30	75	110	166.6	171	448	219
CON03CS25-S	3,000 psi	25A	0	9	136	80	30	75	110	166.6	171	448	219
CON07CS15-S	7,500 psi	15A	0	9	136	80	30	75	110	166.6	171	448	219

As all sizes are for reference, they can be changed without any notification.

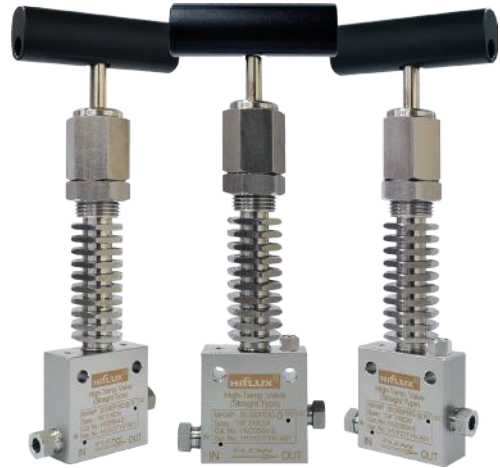
12. High Temperature Valve

Usable up to 500°C

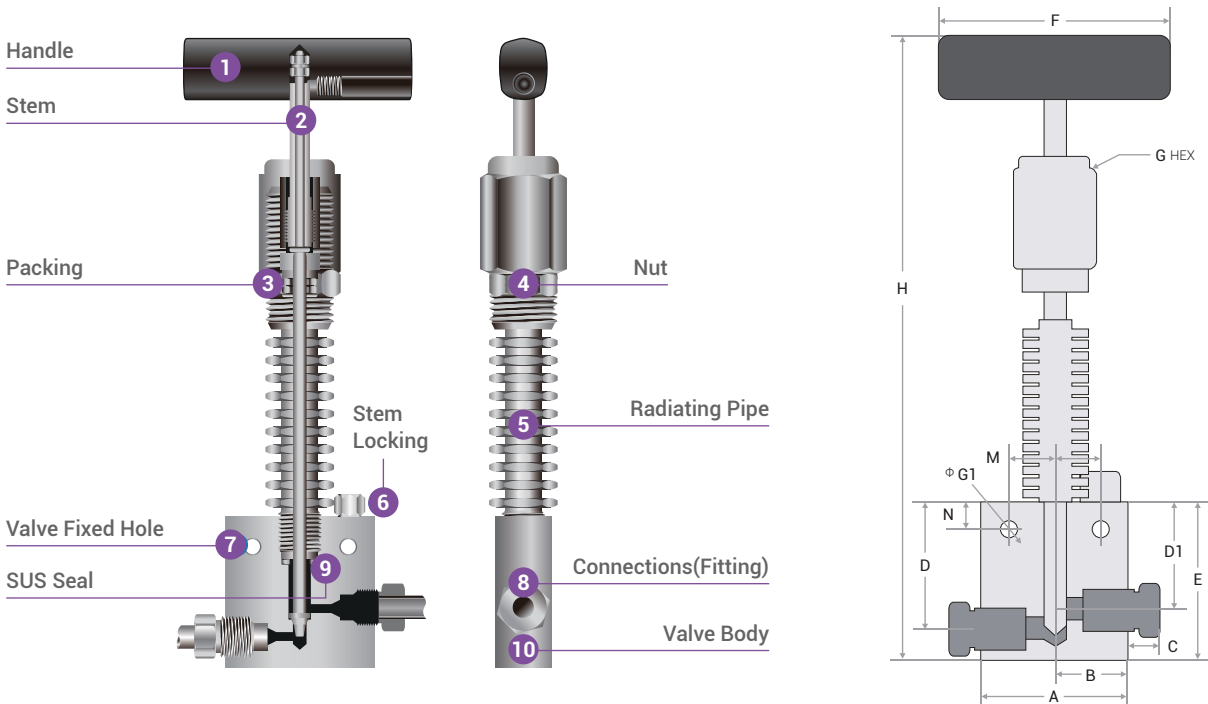
The high temperature valves reduce the temperature for packing material by separating the packings materials from the hot area where the fluid flows.

I Features

- Max Working Pressure : 20,000psi
- Prevents galling due to the no-rotation stem.
- Packing designed for reliable sealing.
- Metal to Metal sealing type.
- Excellent corrosion resistant.
- Packing zone is located out of Hot zone.
- Reduce the heating conduction with using radiating pipe.
- 4-Pattern Body Type.
(Straight, Angle, 3Way/1on pressure, 3Way/2on pressure)



I Exploded View & Dimensions



(Unit : mm)

Catalog No.	STEM	Port Type	Pressure Rating	Tube Size	Orifice Size	Dimensions											Block Thickness	
						A	B	C	D	D1	E	F	G	G1	H	M		N
HV20S04-S	Vee	H2004	20,000 psi	1/4"	2.8	50	25	11	40	30	50	80	28	6	211	16.7	9.7	20
HV20S06-S	Vee	H2006		3/8"	5.2	50	25	13	40	30	50	80	28	6	211	16.7	9.7	20
HV20S09-S	Vee	H2009		9/16"	9.1	63	31.5	16	60	44	73	80	32	8	235	17.6	12.7	25

- G : The main top of the hole size
- G1 : Hole size of the main positive
- H : Height of the valve is fully closed

As all sizes are for reference, they can be changed without any notification.

14. Wellhead Gauge Valve



Needle valves for sampling and calibration of measuring instruments

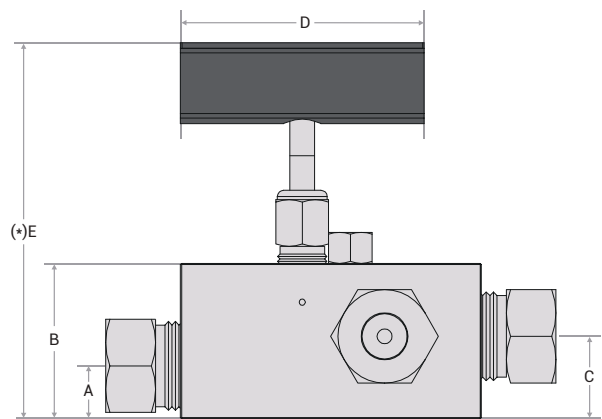
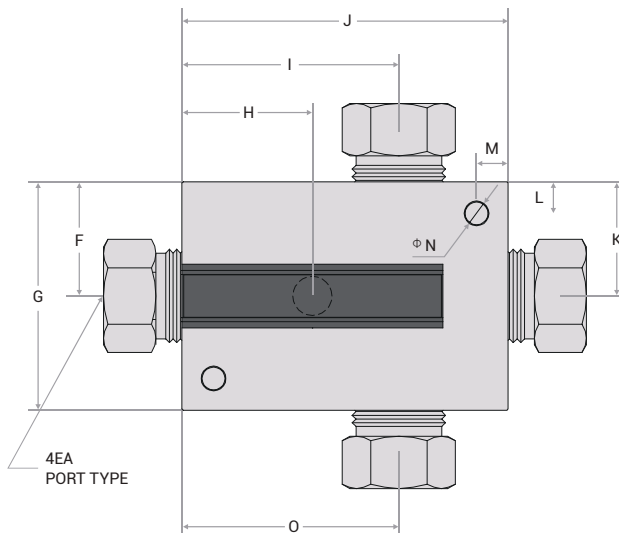


I Features

- Tube Size : 1/4", 3/8", 9/16"
- Max allowed working pressure : 30,000 psig.
- Prevents galling due to the no-rotation stem.
- Packing designed for reliable sealing.
- Metal to Metal sealing type.
- One inlet port with 3 outlet port.
- Stainless steel 316 cold material for excellent corrosion resistant.
- Packing located below stem threads.

Wellhead gauge valve can be installed for sampling and calibration instruments, it is possible to take a sample from the line with installed bleed valve and possible to assemble and disassemble the instrument for calibration. The maximum working pressure is 30,000 psig with one inlet port and 3 outlet ports and bleed valve, gauge or other instruments can be assembled for special purpose. (Application - Sampling Lines, Calibration for Instruments)

I Exploded View & Dimensions



N: Hole Size, (*): The height when valve is fully closed

(Unit : mm)

Catalog No.	STEM	Port Type	Pressure Rating	Tube Size	Orifice Size	Dimensions														
						A	B	C	D	(*)E	F	G	H	I	J	K	L	M	N	O
GV20VS04	Vee	H2004	20,000 psi	1/4"	3.2	10	50	22.5	80	118.6	25	50	30	51.5	80	25	6.4	6.4	7	51.5
GV20VS06	Vee	H2006		3/8"	3.2	10	50	22.5	80	118.6	25	50	30	51.5	80	25	6.4	6.4	7	51.5
GV30VS09	Vee	H6009	30,000 psi	9/16"	3.2	17	50	26.5	80	121	35	70	40	66.5	100	35	9.7	9.7	7	66.5

As all sizes are for reference, they can be changed without any notification.

15. Bleed Valve



Valves used for pressure venting on the line and for sampling small quantities

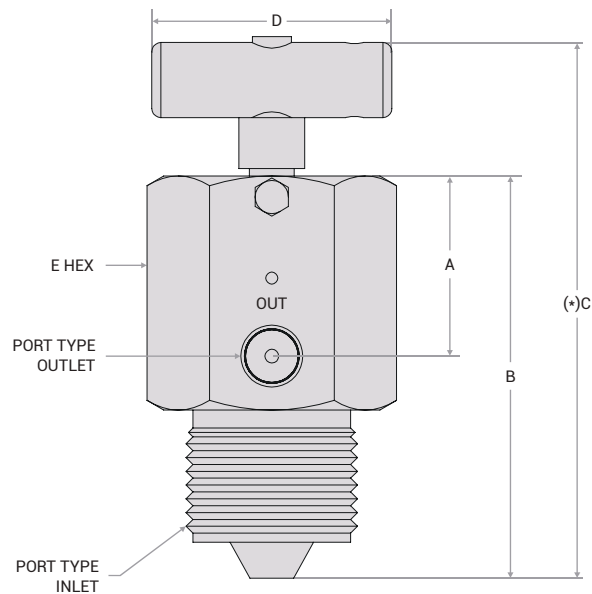
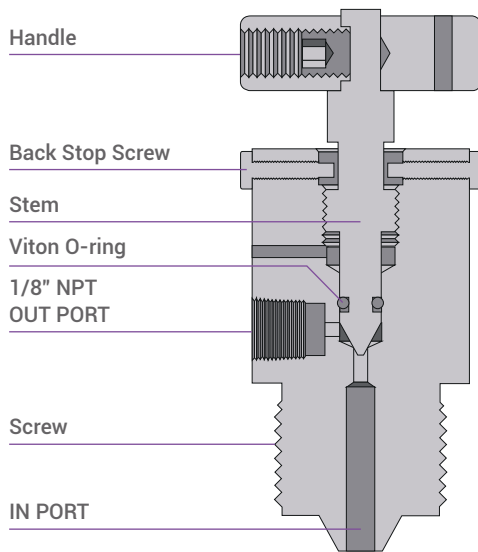
Bleed valve can be used before removing the instrument from the pressure line with the venting. It can be used for calibration instrument or sampling. (Application - Pressure bleed, Sampling small amount)

I Features

- One piece hex construction supply easy installation.
- Max allowed working pressure : 30,000 psig.
- Vent port tapped for safe plumbing.
- Easy operation with tee handle.
- Metal to Metal sealing.



I Exploded View & Dimensions



(*): The height when valve is fully closed

(Unit : mm)

Catalog No.	Port Type		Pressure Rating		Dimensions				
	INLET	OUTLET	INLET	OUTLET	A	B	(*C)	D	E(HEX)
BLV20VS04	H2004	1/8" NPT	20,000 psi	10,000 psi	33	59	78.24	40	46
BLV20VS06	H2006					63	82.24		
BLV20VS09	H2009					67	86.24		
BLV30VS04	H6004	1/8" NPT	30,000 psi	10,000 psi	33	57	76.24	40	36
BLV30VS06	H6006					65.5	84.74		
BLV30VS09	H6009					70	89.24		

As all sizes are for reference, they can be changed without any notification.

16. Double Block and Bleed Valve



Valve that is installed on line that uses gas or oil and maintains maintenance by blocking only Leak occurrence when leaking

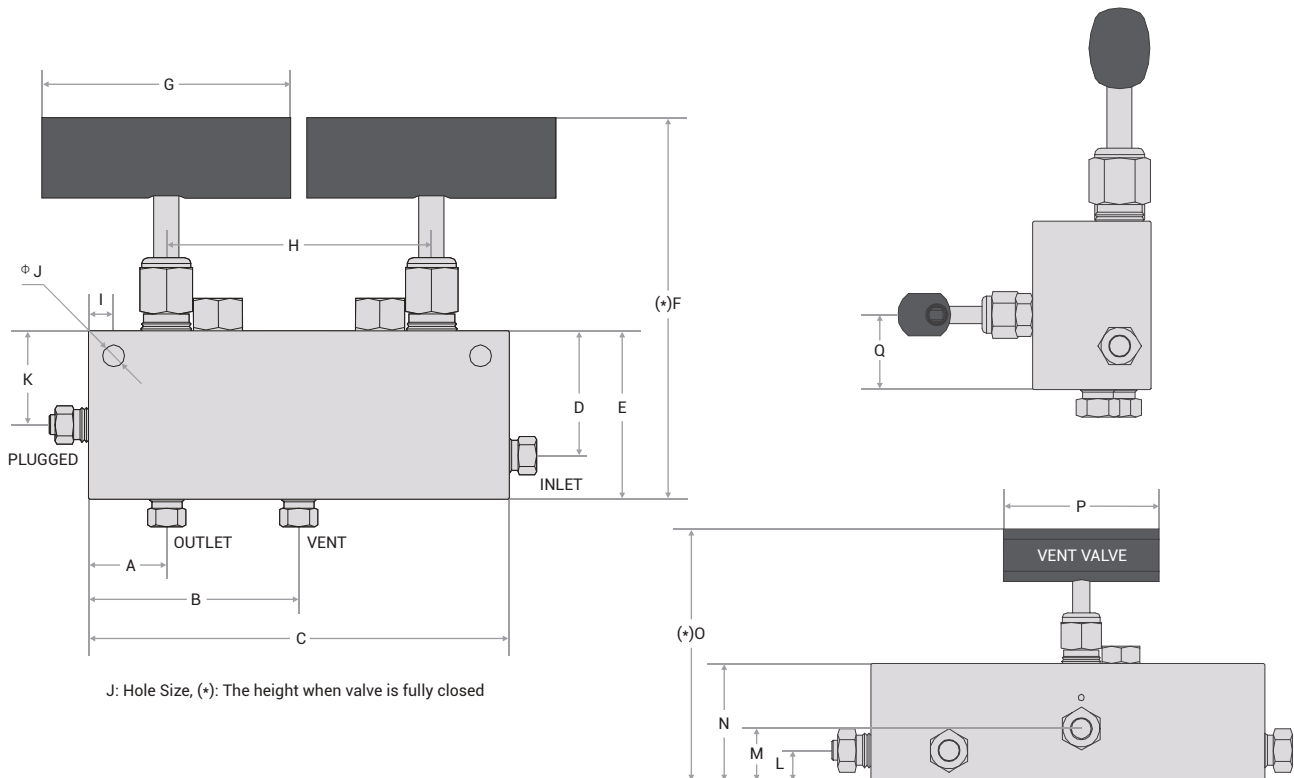
I Features

- Tube size : 1/4", 3/8"
- Prevents galling due to the no-rotation stem.
- Packing designed for reliable sealing.
- Metal to Metal sealing type.
- A valve using stainless steel 316 cold material for excellent corrosion resistant.
- Cone and thread connection to prevent gas or liquid leaking.



Double block and bleed valve is installed gas or oil line and it is expeditious to check the leakage. If the leakage is occurred, shut-off the leakage line and help to maintenance easily. It also can be used to inject the chemical to the line or can be used for sampling process from the line.
(Application - Pressure monitoring, Pressure Test, chemical injection, Sampling, Drain line isolation)

I Exploded View & Dimensions



(Unit : mm)

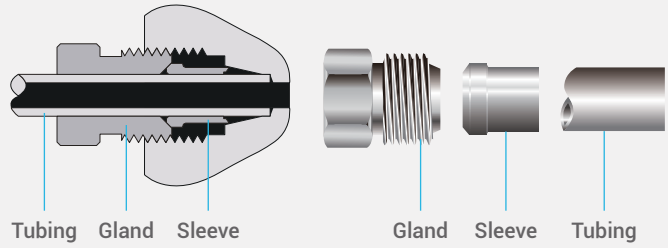
Catalog No.	STEM	Port Type	Pressure Rating	Tube Size	Orifice Size	Dimensions															
						A	B	C	D	E	(*)F	G	H	I	J	K	L	M	N	O	P
DBBV20VS04	Vee	H2004	20,000 psi	1/4"	3.2	25	67.5	135	40	54	122.6	80	85	8	7	30	10	17	38	81.2	50
DBBV20VS06	Vee	H2006		3/8"	5.5																

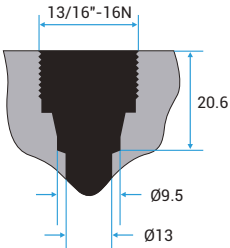
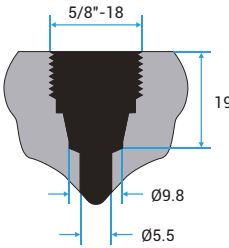
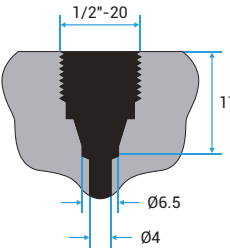
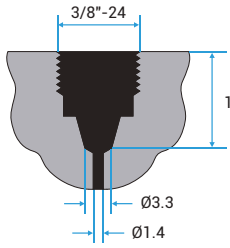
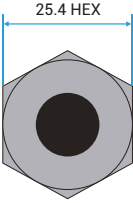
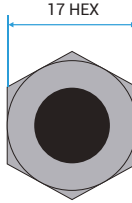
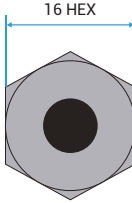
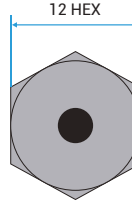
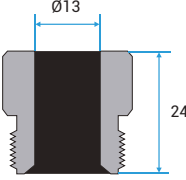
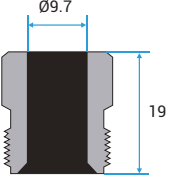
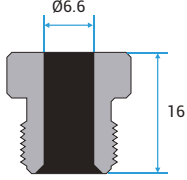
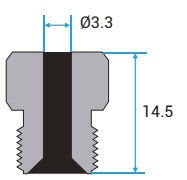
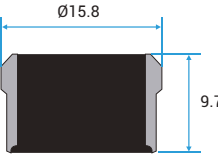
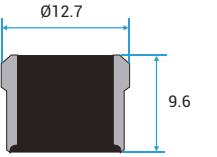
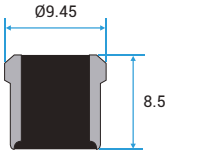
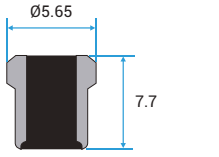
As all sizes are for reference, they can be changed without any notification.

Port Type Low Pressure Port Type

Sleeve Type Connections - 10,000 psi / 15,000 psi

Sleeve Type can be used in 1/8", 1/4", 3/8", 1/2" piping by fastening sleeve in gland. Tube required for connection between products can be ordered from Hiflux. Stainless steel material ensures optimum performance in high pressure environment.

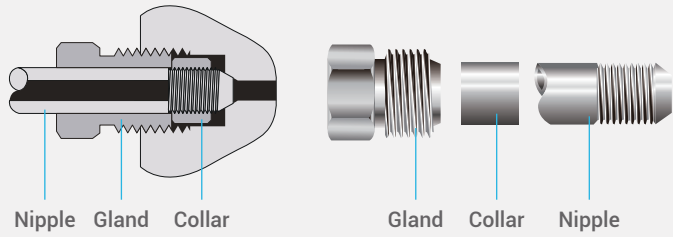


H1008 10,000psi - 1/2"	H1506 15,000psi - 3/8"	H1504 15,000psi - 1/4"	H1502 15,000psi - 1/8"
			
			
			
			

Port Type Medium Pressure Port Type

Medium Pressure Connections - 20,000 psi

The Nipple required for connection between the products by using Collar and Nipple in the Gland can be ordered by user's desired length. you can also process directly using our Tooling Set tool.

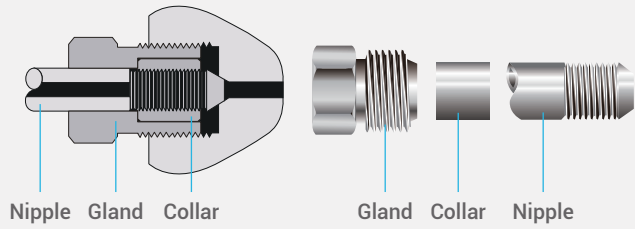


H2004 20,000psi - 1/4"	H2006 20,000psi - 3/8"	H2009 20,000psi - 9/16"	H2012 20,000psi - 3/4"	H2016 20,000psi - 1"

Port Type High Pressure Port Type

High Pressure Connections - 30,000 psi / 60,000 psi

The Nipple required for connection between the products by using Collar and Nipple in the Gland can be ordered by user's desired length. you can also process directly using our Tooling Set tool. This cone and threaded connection is the standard for easy and fast high-pressure equipment configuration with optimum sealing and reliable performance for both liquid and gas at high pressure and temperature.

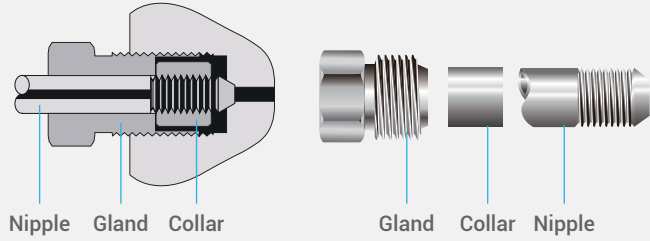


H3002 30,000psi - 1/8"	H3016 30,000psi - 1"	H6004 60,000psi - 1/4" (M : Metric)	H6006 60,000psi - 3/8" (M : Metric)	H6009 60,000psi - 9/16" (M : Metric)

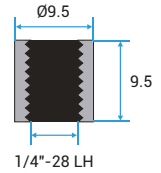
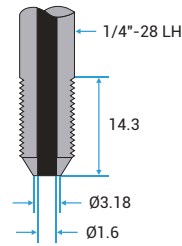
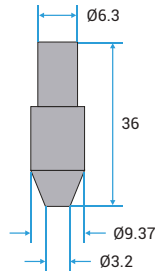
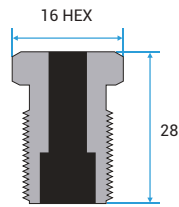
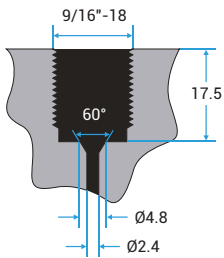
Port Type Ultra High Pressure Port Type

Ultra High Pressure Connections - 100,000 psi

The product is tightened with collar and nipple in Gland. The applicable pipe size is as follows. This cone and threaded connection is the standard for easy and fast high-pressure equipment configuration with optimum sealing and reliable performance for both liquid and gas at high pressure and temperature.



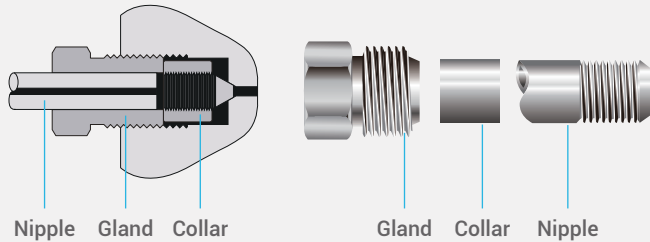
H10004 100,000psi - 1/4"



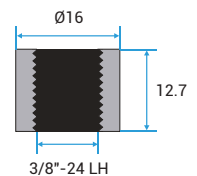
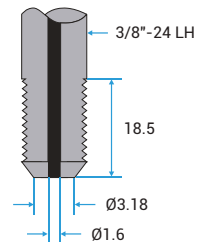
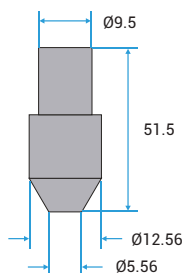
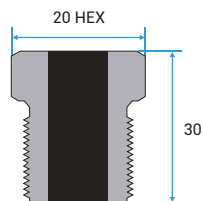
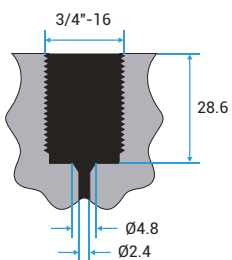
Port Type Ultra High Pressure Port Type

Ultra High Pressure Connections - 150,000 psi

The product is tightened with collar and nipple in Gland. The applicable pipe size is as follows. This cone and threaded connection is the standard for easy and fast high-pressure equipment configuration with optimum sealing and reliable performance for both liquid and gas at high pressure and temperature.



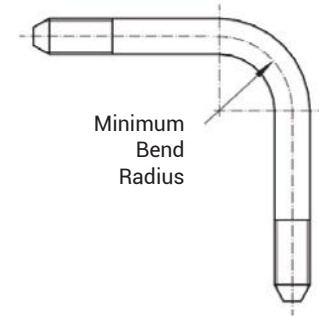
H15006 150,000psi - 3/8"



Technical Information Recommended Torque

[Recommended Minimum Bend Radius]

Tubing Size O.D. x I.D. in. (mm)	Tubing Pressure psi (bar) @ R.T.	Recommended Minimum Bend Radius in. (mm)
1/4 inch (6.35 x 2.77)	20,000 (1,370)	1.25 (31.8)
3/8 inch (9.53 x 5.16)	20,000 (1,370)	1.75 (44.5)
9/16 inch (14.29 x 7.92)	20,000 (1,370)	2.63 (66.8)
3/4 inch (19.05 x 11.13)	20,000 (1,370)	3.50 (88.9)
1 inch (25.4 x 14.27)	20,000 (1,370)	4.63 (117.6)
1 inch (25.4 x 11.13)	30,000 (2,060)	4.63 (117.6)
1/4 inch (6.35 x 2.11)	60,000 (4,130)	1.25 (31.8)
3/8 inch (9.53 x 3.18)	60,000 (4,130)	1.75 (44.5)
9/16 inch (14.29 x 4.78)	60,000 (4,130)	2.63 (66.8)



As all sizes are for reference, they can be changed without any notification.

HIFLUX - Recommended Torque (Valves Minimum Packing Stem Gland Torque)

Valve Pressure Series	Port Type	Tube Size (PSI)	Stem Gland HEX (mm)	Minimum Torque (kg.f-cm)
10,000 PSI 15,000 PSI	H1502	1/8 Inch (15,000)	13	170
	H1504	1/4 Inch (15,000)	17	550
	H1506	3/8 Inch (15,000)	17	550
	H1008	1/2 Inch (10,000)	24	800
20,000 PSI	H2004	1/4 Inch (20,000)	17	550
	H2006	3/8 Inch (20,000)	17	550
	H2009	9/16 Inch (20,000)	22	1100
	H2010	3/4 Inch (20,000)	30	3,500
	H2012	1 Inch (20,000)	41	5,000
30,000 PSI	H3002	1/8 Inch (30,000)	13	500
	H6004	1/4 Inch (30,000)	20	550
	H6006	3/8 Inch (30,000)	20	550
	H6009	9/16 Inch (30,000)	20	550
60,000 PSI	H6004	1/4 Inch (60,000)	20	670
	H6006	3/8 Inch (60,000)	20	670
	H6009	9/16 Inch (60,000)	20	670
100,000 PSI	H10004	1/4 Inch (100,000)	24	1250
150,000 PSI	H15006	3/8 Inch (150,000)	24	1870
10,000 & 15,000 PSI NPT TYPE	HFN02	1/8 Inch (15,000)	13	500
	HFN04	1/4 Inch (15,000)	17	550
	HFN06	3/8 Inch (15,000)	17	550
	HFN08	1/2 Inch (15,000)	22	1100
	HFN10	3/4 Inch (10,000)	41	-
	HFN12	1 Inch (10,000)	41	-

All dimensions and values are for reference only and subject to change.

HiFLUX[®]

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