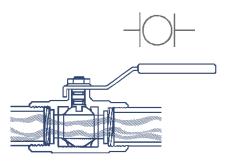


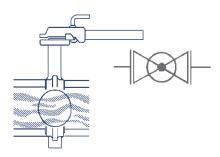
Valves and Accessories

Valve Selection Guide



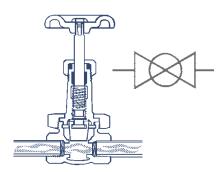
Ball Valve

- · Can be used for on and off service or throttling
- · When positive shut-off is necessary
- · Where a low valve profile is necessary
- Only 90° rotation from open to fully closed (quick opening)
- Handle position is a quick indication of whether valve is open or closed.
- · Full port ball valves do not resist flow



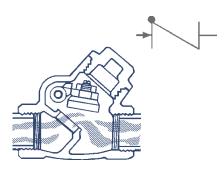
Butterfly Valve

- · Where positive shut-off is necessary
- Primarily for fully open or fully closed applications
- · May be used for throttling
- Only 90° rotation from open to fully closed
- Liahtweiaht
- Easy to install
- · Less costly than an Iron body gate valve



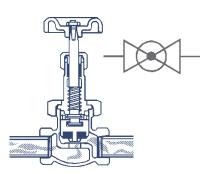
Gate Valve

- For fully open or fully closed service NOT FOR THROTTLING
- For minimum line pressure drop
- · For minimum fluid entrapment in the line
- For relatively infrequent operation



Check Valve

- To control the direction of flow and for quick, automatic reactions to flow change. Swing check valves are used when a minimum resistance to flow is required.
- Swing check valves are recommended for use in conjunction with gate valves. They should not be used in a rapid recycling system such as reciprocating pumps or air compressor service where they could cause chatter and damaging vibration.



Globe Valve

- · For regulation (throttling) of flow
- For frequent operation; short stem travel reduces operator's time.
- · Where some line resistance is acceptable

SAFETY

- Use Dixon couplings, retention devices and accessory products only for their intended service.
- All recommendations of the Hose Manufacturer, and the Coupling Manufacturer, must be employed with regards to Size, Temperature, Application, Media, and Pressure when selecting the components for a hose assembly.
- All finished hose assemblies should be tested in accordance with the Rubber Manufacturers Association recommendations.
- All hose assemblies should be thoroughly inspected prior to each use to insure they are undamaged, and properly coupled.
- Use safety clips on couplings, and King Safety Cables on assemblies where required by the manufacturer, as well as State and Federal regulations.
- Call Dixon
 (1-877-963-4966) for advice on couplings, retention devices, and accessories for your application.



Full Flow Aluminum Ball Valves

Female NPT x Female NPT

Features

- · High flow rate; low pressure drop
- · Wetted parts are aluminum and stainless steel
- Seals are FPM (Viton® and PTFE)
- Spindle can be disassembled even when ball valve is installed
- Working pressure: 150 PSI
- · Female NPT outlets are standard
- · Optional flanges are available
- 2", 3" and 4" available in one-way and two-way flow
- One-way (1WAYBV...) and two-way (2WAYBV...)



Two-way ball valve shown

Domestic Brass Ball Valves

Female NPT x Female NPT

Features

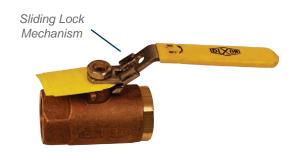
- For control of air, water, oil and gas in hose or pipe lines.
 For other services, please contact the factory.
- Rated to 600 PSI WOG; 150 PSI saturated steam
- · Brass valve bodies, balls and stems
- · Blow-out proof stems
- Glass-filled reinforced PTFE seats and stuffing box ring; stem seals and washers.
- Plated steel handles and nuts with vinyl sleeves, both styles repairable
- Meets WW-V 35C, Type II Composition
- Ball valve handle replacements available, consult factory for pricing.
- 1/4" 1/2" available in full port design (BBV...)
- 3/4" 2" available in standard port design (BBV...)



Locking Handle Brass Ball Valves

Female NPT x Female NPT

- For control of air, water, oil and gas in hose or pipe lines. For other services, please contact the factory.
- Rated to 600 PSI WOG; 150 PSI steam
- · Blow-out proof RPTFE stem
- · Chrome-plated brass ball
- Stainless steel sliding lock mechanism secures handle in open or closed position; can be padlocked opened or closed.
- 1/4" 1/2" available in full port design (BBLV..)
- 3/4" 2" available in standard port design (BBLV...)



Imported Brass Ball Valves

Female NPT x Female NPT











Features

- For control of air, water, oil and gas in hose or pipe lines. For other services, please contact the factory.
- Rated to 600 PSI WOG; 100 PSI steam
- Forged brass bodies
- · Blow-out proof stems
- PTFE seats, seals and thrust washers
- · Chrome-plated brass balls and plated steel handles
- Temperature range to 320°F
- Underwriters, Factory Mutual, American Gas Association and Canadian Gas Association approved
- 1/4" 4" available in full port design (FBV···, FBV···)

Global Brass Ball Valves

Female NPT x Female NPT





Features

- For control of air, water, oil and gas in hose or pipe lines.
- · Rated to 600 PSI WOG
- Body: forged brass, UNS#C37700
- · Adjustable stem packing nut
- · Silicone free
- Temperature range to 300°F
- · Underwriters approved
- · CSA (Canadian Standards Association) approved
- ½" 2" available in full port design (FBVG., FBVG...)

Imported Brass Ball Valves

Female NPT x Female NPT



Standard design

- For control of air, water, oil and gas in hose or pipe lines. For other services, please contact the factory.
- Rated to 600 PSI WOG; 100 PSI steam
- · Forged brass bodies
- · Blow-out proof stems
- PTFE seats, seals and thrust washers
- Chrome-plated brass balls and plated steel handles
- Temperature range to 320°F
- ½" 2" available in standard port design (**BV···**, **BV····**)

Features



Full port design

- For control of air, water, oil and gas in hose or pipe lines. For other services, please contact the factory.
- Rated to 400 PSI WOG; 125 PSI steam
- Blow-out proof stems
- · PTFE seats, double O-ring stem packing
- Chrome-plated brass ball
- Temperature range to 266°F
- · Underwriters approved
- ½" 2" available in full port design (FBVI--, FBVI---)



Brass Mini Ball Valves

Female NPT x Female NPT





Features

- Rated to 450 PSI
- · Nickel plated brass body
- · PTFE seats and Buna-N stem seal
- · Blow-out proof stem
- Temperature range to 200°F
- American Gas Association and Canadian Gas Association approved
- 1/8" 1/2" available in standard port design (MBV...)
- 1/4" 3/8" available in full port design (MBV..)



Safety Vented Ball Valves

Female NPT x Female NPT

Features

- · For air service only
- Rated to 600 PSI WOG; 150 PSI saturated steam
- Lockable ball valves vent downstream air in accordance with new OSHA regulations for pneumatic systems.
- Brass valve
- · Chromium plated ball
- · RTFE seats and stuffing box ring
- · Blow-out proof stem design
- Temperature range to 50°F 200°F
- · Adjustable packing gland
- 1/4" 1/2" available in full port design (BBV--LV)
- 3/4" 2" available in standard port design (BBV...LV)



Bronze "Deadman" Spring Return Handle Ball Valves

Female NPT x Female NPT

- Rated to 600 PSI WOG; 150 PSI saturated steam
- · Vacuum service to 29 inches Hg
- · Threaded bronze valve
- Stainless steel lever
- Chromium plated ball
- · RTFE seats and stuffing box ring
- Blow-out proof stem design
- · Adjustable packing gland
- Spring return to close and open valve
- Operating torque approximately three times standard valve torque.
- 1/4" 3/4 available in full port design (BBV--SR)
- 1" 2" available in standard port design (BBV...SR)



Bronze Ball Valves with NPT Tap for Drain

Female NPT x Female NPT



Features

- · Recommended for water and air service
- · Rated to 125 PSI WOG
- Bronze ball valves vent downstream air in accordance with OSHA regulations for pneumatic systems.
- · Chromium plated ball
- · RTFE seats and stuffing box ring
- · Blow-out proof stem design
- · Adjustable packing gland
- · Auto-drain / Auto-vent
- Features a ¼" NPT tapped port for additional options such as an air venting elbow or noise muffler.
- 1/4" 1" available in full port design (BBV--VT)

3-Way Diversion Ball Valves

Female NPT x Female NPT



Brass Valves

- · Can be used with gasoline and diesel fuel
- Rated to 400 PSI WOG
- · Bronze body
- Chromium-plated ball
- · RPTFE seats and stuffing box ring
- Stainless steel handle and nut with vinyl sleeve
- · Adjustable packing gland
- Female NPT
- ½" 1" available in full and standard port design (BBV:-TW)

Features

Stainless Steel Valves

- Rated to 800 PSI WOG
- Stainless steel body and ball
- · Blow out proof stem
- · RPTFE seats and stuffing box ring
- · Stainless steel handle and nut with vinyl sleeve
- · Adjustable packing gland
- Meets NACE MR-01-75
- Female NPT
- ½" 1" available in full and standard port design (SSBV::TW)

3-Way Diverting Ball Valves

Female NPT x Female NPT x Female NPT



- Rated to 400 PSI WOG; 100 PSI saturated steam
- Brass body
- · Blow out proof stem
- · Chrome plated brass ball
- PTFE seats, seals, and thrust washer
- Adjustable stem packing
- Temperature range to 320°F
- Female NPT
- ½" 2" available in standard port design (BBV-DTW)

Domestic Full Port Ball Valves

Female NPT x Female NPT

Features

- Rated to 600 PSI WOG: 150 PSI saturated steam
- · Machined solid chrome-plated ball
- · Multi-fill PTFE seats and seals
- · Adjustable packing
- · Blow-out proof stem design
- · Bronze castings
- · Vacuum service to 29 inches Hg
- 1/4" 4" available in full port design (BBV--FP, BBV---FP)



250 Lb. Steam Ball Valves

Female NPT x Female NPT

Features

Recommended for use with fluids with widely varying temperatures

and/or thermal expansion rates.

- · Rated to 600 PSIG; 250 PSI saturated steam
- · Vacuum service to 29 inches Hg
- · Threaded bronze valve
- 316 stainless steel ball and stem
- Multi-filled RPTFE seats
- · Multi-filled stuffing box ring
- · High-temperature MTFE stem packing
- · Blow-out proof stem design
- · Adjustable packing gland
- Maximum temperature rating 406°F
- 1/2" 2" available in standard port design (BBV--ST)



Carbon Steel Ball Valves

Female NPT x Female NPT

- 1/4" to 1" are rated to 2000 PSI WOG
- 11/4" to 2" are rated to 1500 PSI WOG
- Rated to 150 PSI saturated steam
- For control of air, water, oil and gas in hose or pipe lines.
 For other services contact the factory.
- RPTFE seats and seals
- Blow-out proof stem design
- Adjustable packing gland
- Chromium plated ball
- 1/4" 3/8" available in full port design (IBV...)
- 1/2" 2" available in standard port design (IBV...)



High Pressure Full-Bore Hydraulic Ball Valves

Female NPTF x Female NPTF



Features

- Blow-out proof stems
- · Rugged carbon steel construction
- Viton® shaft seals
- 1/4" 2" available, (*HPBV*...)

Dual Y Valves

Female NPT x Female NPT



Features

- Dual action valve, ideal for compressor applications
- Female NPT threads
- Non-vented rated to 600 PSI WOG
- Vented rated to 125 CWP (Cold Working Pressure)
- 1" and 11/4" available in non-vented and vented flow
- Non-vented (**BBV···DW**) and vented (**BBV···DWV**)

Stainless Steel Ball Valves

Female NPT x Female NPT



- For use in water, oil and gas
- $\frac{1}{4}$ " 2" rated to **1000 PSI** WOG (CWP); $\frac{2}{2}$ " 3" rated to **800 PSI** WOG (CWP); **100 PSI** saturated steam
- 316 stainless steel body, ball and stem
- PTFE seat, joint gasket and thrust washer
- · Plastic cover on handle
- Blow-out proof stem design
- Temperature range -60°F to 450°F
- 1/4" 3" available in full port design (SSBV--, SSBV---)

Stainless Steel Ball Valves

Female NPT x Female NPT

Features

- · For use in water, oil and gas
- ½" 1" rated to 2000 PSI (CWP);
 1½" 2" rated to 1500 PSI (CWP)
- Body conforms to ASTM A-351 Grade CF8M
- · Ball is 316 stainless steel
- · PTFE, glass filled seat
- · Blow-out proof stem design
- 1/4" 2" available in reduced port design (SSBV--RP, SSBV---RP)



Locking Handle Stainless Steel Ball Valves

Female NPT x Female NPT

Features

- · For use in water, oil and gas
- Rated to 1000 PSI WOG; 100 PSI saturated steam
- · 316 stainless steel body, ball and stem
- · PTFE seat, joint gasket and thrust washer
- · Plastic cover on handle
- · Blow-out proof stem design
- Temperature range -60°F to 450°F
- 1/4" 2" available in full port design (SSLBV..., SSLBV...)



Features

- For use in water, oil and gas
- Rated to 800 PSI WOG; 100 PSI saturated steam
- · 316 stainless steel body, ball and stem
- · PTFE seat, joint gasket and thrust washer
- · Plastic cover on handle
- · Blow-out proof stem design
- Temperature range -60°F to 450°F
- 1/4" 2" available in standard port design (SSLBV:-SP, SSLBV:--SP)



Pneumatically Actuated Stainless 3 Piece Ball Valves

Full Port

Female NPT x Female NPT

- · 3-piece rack and pinion design
- · Hard anodized aluminum body actuator
- NAMUR mounting
- · Swing out in-line easy maintenance
- · Self-adjusting stem packing with Belleville washers
- ½" 2" rated to 1000 PSI WOG;
 2½" 3" rated to 800 PSI WOG
- Media temperature range: -40°F to 400°F
- Minimum operating pressure: 70 PSI
- Maximum operating pressure: 150 PSI
- · Material: 316 stainless steel



Pneumatically Actuated 2 Piece Ball Valves

Direct Mount - Full Port Female NPT x Female NPT





Features

316 Stainless Steel Valves

- · Precise stem alignment
- NAMUR interface
- Actuator temperature -4°F to +185°F
- Ball valve rated to 1,000 WOG/150 PSI steam
- Ball valve maximum temperature to 366°F
- Minimum operating pressure: 70 PSI
- Maximum operating pressure: 150 PSI
- · Compact, no brackets required
- · O-ring backed seats for lowest torque
- Double Viton® O-ring stem seals
- ISO 5211 pad

Features

Brass Valves

- · Precise stem alignment
- NAMUR interface
- Actuator temperature -4°F to +185°F
- Ball valve rated to 600 WOG/150 PSI steam
- Ball valve maximum temperature to 366°F
- Operating air pressure: 80 PSI minimum, 120 PSI maximum
- Minimum operating pressure: 40 PSI
- · Compact, no brackets required
- O-ring backed seals for lowest torque
- Double Viton® O-ring seals
- ISO 5211 pad

Pneumatically Actuated 3-Way L Port Ball Valves

Direct Mount - Standard Port Female NPT x Female NPT



Features

316 Stainless Steel Valves

- Precise stem alignment
- Diverting valve only
- 4-seat design can use any port as an inlet
- 1/4" 1" rated to 1,000 WOG
- 11/4" 2" rated to 800 WOG
- · Live loaded stem seal
- Temperature to 400°F
- Minimum operating pressure: 70 PSI
- Maximum operating pressure: 150 PSI
- ISO 5211 actuator pad

Pneumatically Actuated 3-Way L Port Ball Valves

Direct Mount - Standard Port Female NPT x Female NPT

Features

Brass Valves

- · Precise stem alignment
- Diverting valve only
- · 4 seat design can use any port as an inlet
- · O-ring backed seats for lowest torque
- Double Viton® O-ring stem seals
- Temperature to 350°F
- Minimum operating pressure: 40 PSI
- Maximum operating pressure: 150 PSI
- 90° with off position
- 400 WOG 100 PSI steam
- ISO 5211 actuator pad



Pneumatically Actuated 3-Way T Port Ball Valves

Direct Mount - Standard Port Female NPT x Female NPT

Features

316 Stainless Steel Valves

- · Precise stem alignment
- · Diverting valve only
- · 4-seat design can use any port as an inlet
- 1/4" 1" rated to 1,000 WOG
- 11/4" 2" rated to 800 WOG
- · Live loaded stem seals
- Minimum operating pressure: 70 PSI
- Temperature to 400°F
- · Can be used as a shut-off
- ISO 5211 actuator pad
- 90° and 180° flow paths

Bradford TA WOOL FASA-SIGE TOWN TOWN TOWN TOWN TO TOWN

Features

Brass Valves

- Precise stem alignment
- · Diverting valve only
- 90° and 180° flow paths
- O-ring backed seats for lowest torque
- Double Viton® stem seals
- 400 WOG 100 PSI steam
- Minimum operating pressure: 40 PSI
- ISO 5211 actuator pad
- · 4-seat design can use any port as an inlet
- · Can be used as a shut-off

Electrically Actuated Ball Valves

Dual Acting - Full Port - Electrical On/Off Control (115 volts)
Female NPT x Female NPT



Features

316 Stainless Steel Valves

- 3-piece rack and pinion design
- Hard anodized aluminum body
- NAMUR mounting
- Swing out in-line easy maintenance
- Self-adjusting stem packing with Belleville washers
- 3" clearance required for cover removal
- 1/4" 2" rated to 1000 PSI WOG; 21/2" - 3" rated to 800 PSI WOG
- Media temperature range: -40°F to 400°F



Features

Brass Valves

- 2-piece
- Direct mount for low-profile, cost efficient applications
- NAMUR mounting
- Manual override
- Nema 4 housing
- 3" clearance required for cover removal
- Rated to 600 PSI WOG; 100 PSI Steam
- Media temperature: 300°F

Actuated Valve Accessories

3 and 4 Way Combination NAMUR Solenoids

 CSA (Canadian Standards Association) and Underwriters certified



Mounting type	Part #	Description
Nema 4X	XSO-4S4D-0A	115 volts, alternating current
Nema 4X	XSO-4S4B-0A	24 volts, direct current



Limit Switches

- Beacon indicator
- (2) SPDT electro-mechanical switches
- Direct mount

Mounting type	Part #
Nema 4X	XLS-B4A0120P





mounting kit

Pneumatic Positioners

- 3-15 PSI modulating signal for proportional control
- Mounting hardware included

Mounting type	Part #
Nema 4X	XPO-P4F





mounting kit

Electro-Pneumatic Positioners

- Electronic 4-20ma modulating signal for proportional control
- Mounting hardware included

Mounting type	Part #
Nema 4X	XPO-E4F





mounting kit

Compact High Pressure Grooved End Ball Valves

Grooved End x Grooved End



Features

- Suitable for many applications in high pressure pipeline systems, including petroleum, process systems, water, oil and gas.
- Rated to 600 PSI
- · Epoxy coated high strength ductile iron body
- · 316 stainless steel ball and stem
- 15% glass reinforced PTFE seats
- Temperature rated to 450°F

Iron Butterfly Valves

Threaded Lug Style

NOT RECOMMENDED FOR STEAM SERVICE

Pictures are representative, different size valves have different hole patterns.



Features

- For use between two 150 lb. flanges
- Will lock "open" or "closed"
- Rated to 200 PSI
- · Ductile iron body, ASTM A126, class B
- Aluminum bronze disc, ASTM B148, ALY.954
- Buna-N seal and stem seals and liner
- PTFE bushing
- · Stainless steel top and bottom stems

Iron Butterfly Valves

Wafer Style



Features

- For use between two 150 lb. flanges
- Will lock "open" or "closed"
- Rated to 200 PSI
- Ductile iron body, ASTM A126, class B
- Aluminum bronze disc, ASTM B148, ALY.954
- · Buna-N seal and stem seals and liner
- · PTFE bushing
- · Stainless steel top and bottom stems



- For use between two 150 lb. flanges
- Will lock "open" or "closed"
- Rated to 200 PSI
- Ductile iron body, ASTM A126, class B
- Stainless steel disc, ASTM A351, GR. CF-8M
- · Buna-N seal and stem seals and liner
- PTFE bushing
- · Stainless steel top and bottom stems

Flow Control Valves

Series MV

Features

With these high-precision metering and shutoff valves, you can readily make fine adjustments and reset with the exclusive color code 5000 that shows when you reach the desired setting.

- · Body components are precision-turned from solid barstock
- All models have 416 stainless steel needles
- Steel maximum operating pressure: 5000 PSI



Brass Needle Valves

NPT x NPT

Features

- Metal-to-metal seats allow positive sealing and flow adjustment
- · Designed for air and water applications
- Maximum working pressure is 150 PSI



Mini Needle Valves

NPT x NPT

Features

Mini needle valves are available in a variety of materials, and handle options. All are equipped with both a Viton® O-ring seal and a PTFE back-up ring below the threads to protect the mini valve from corrosion and galling. The stem threads are rolled for strength and ease of operation, and the metal-to-metal hard seat design is 100% helium leak tested to 1 x 10-4 ml/s at 200 PSI on each mini valve.

Orifice size: 0.172"
Flow coefficient: 0.42
O-ring seal: Viton®
Back-up ring: PTFE

• 1/8" and 1/4" available in knurled knob and T design handles,





Brass Gate Valves

Female NPT x Female NPT



- Rated 200 PSI non-shock cold water, oil or gas
- · Brass body
- Female NPT threaded ends
- Threaded bonnet
- · Integral seat
- · Adjustable packing nut
- Non-rising stem
- · Solid wedge disc
- Iron handwheel
- · 100% factory tested

Self-Closing Gate Valves

Male NPT

Features

• Features a gray iron body, brass sliding gate and machine lapped

sealing surface.

- · Gate closes automatically when handle is released, cleaning discharge surface.
- Ideal for dispensing viscous liquids such as oil, grease, paint, varnish and syrups from drums and tanks.
- · Can be padlocked



Male NPT

Features

- Manually operated
- · Ideal for drawing non-flammable liquids from drums and tanks
- Iron body
- · Machined and lapped brass faceplate designed for oval dis-

to ensure no splashing and smooth operation.

- · Black Japanned finish
- · Can be padlocked

Aluminum Drum Gate Valve

Male NPT



- · Lightweight, durable aluminum body provides improved corro
 - resistance for certain fluids.
- Sturdy 2" handle is stamped metal with black enamel finish.
- · Can be padlocked







Compression Bibb Faucets Male NPT

Features

- · Rough brass finish
- Nozzle end is GHT
- · Do not use light oil



Drum Faucets

Features

- Gold polyethylene
- Faucets are not to be used in applications where temperatures exceed 140°F (60°C)
- No wrench needed for screwing into drum opening
- 2" faucet is shipped with a gasket; the 3/4" does not require a gasket



Bronze Drum Plug Wrench

- Sparkproof, natural finish is safe around flammables
- Offset handle design reduces user stress and minimizes knuckle injury.



Single Union Polypropylene Ball Valves

Female NPT x Female NPT



Features

- Rated to 125 PSI at 70°F
- · Corrosion resistant polypropylene
- · PTFE ball seats
- EPDM O-rings
- FDA approved material
- ½" 3" available (*SUBV*...)

Bolted Polypropylene Ball Valves

Female NPT x Female NPT



Features

- Rated to 125 PSI at 70°F
- Chemically-resistant, reinforced polypropylene
- · FDA approved material
- PTFE ball seats
- EPDM O-ring body seals, Viton® O-ring stem seals
- 304 stainless steel nuts and bolts
- ½" 4" available (*PVFP*...)

Compact Bolted Polypropylene Ball Valves



- Rated to 125 PSI at 70°F
- Full port
- Chemically-resistant, reinforced polypropylene
- FDA approved material
- PTFE ball seats
- EPDM O-ring body seals, Viton® O-ring stem seals
- 304 stainless steel nuts and bolts
- 2" available (PVFPS...)

Bolted Polypropylene Ball Valves with Nozzles

Female NPT x Nozzle

Features

- Rated to 125 PSI at 70°F
- Chemically-resistant, reinforced polypropylene
- PTFE ball seat
- EPDM O-ring body seals, Viton® O-ring stem seals
- 304 stainless steel nuts and bolts
- Body-to-flange design allows for low torque operation
- · FDA approved material
- 1½" 2" available (*PVFPN*...)



45° Single Union Polypropylene Nozzle Valves

Features

- Rated to 125 PSI at 70°F
- · Corrosion resistant polypropylene
- PTFE ball seats
- EPDM O-rings
- FDA approved material
- 1" available (SUBVN100)



Flange Ball Valves and Fittings

Features

- · Quick and easy assembly, no pipe or sealant necessary
- Positive seals
- · Easy on/off hose connections
- 360° orientation
- Valves and fittings are manufactured from glass re-inforced polypropylene for strength and durability — will not rust or corrode.

Recommended operating pressure for valves:

- 100 PSI at 0°F
- 125 PSI at 70°F
- 70 PSI at 150°F



Accessories:

- · stainless steel worm screw clamps
- EPDM flange gaskets
- · assorted flanged fittings

Through its divisions and affiliated companies, Dixon is recognized as the premier manufacturer and supplier of hose fittings and accessories spanning a wide range of industrial uses. Dixon's reach includes products for food, dairy processing, beverage and brewery, mobile tankers, mining, construction, chemical processing, petroleum, oilfields, refining and manufacturing.



The Right Connection™