TITAN®

TITAN FLOW CONTROL

290 CORPORATE DRIVE
LUMBERTON, NC 28358

WWW.TITANFCI.COM
TITAN@TITANFCI.COM

910.735.0000 TEL
910.738.3848 FAX

PRODUCT GUIDE

GO WITH THE FLOW!

TITAN FLOW CONTROL, INC.

YOUR PIPELINE TO THE FUTURE!

Welcome to Titan Flow Control where excellence meets innovations. Specializing in Check Valves, Butterfly Valves, Pipeline Strainers, Pump Products, Fabricated Designs, and Pipeline accessories, we cater to diverse industrial and commercial needs with top-notch solutions.

Established in the year 2000, Titan Flow Control is strategically located in the heart of southeastern North Carolina, cementing our status as a pivotal cornerstone of realibility and quality, now and for the years to come.

- "Y" STRAINERS
- BASKET STRAINERS
- DUPLEX STRAINERS
- STRAINING ELEMENTS
- FRP STRAINERS
- TEMPORARY STRAINERS
- FABRICATED STRAINERS
- "T" STRAINERS
- IN-LINE CHECK VALVES
- SILENT CHECK VALVES
- WAFER TYPE CHECK VALVES
- GLOBE TYPE CHECK VALVES
- SINGLE DISC CHECK VALVES
- DUAL DISC CHECK VALVES
- BALL VALVES
- BUTTERFLY VALVES
- SUCTION DIFFUSERS
- TRI-FLOW VALVES
- FOOT VALVES
- AUTOMATIC STRAINERS
- AND MUCH MORE...

TELEPHONE: 910.735.0000

TITAN FLOW CONTROL, INC.

"Y" Type Strainers

Cast & Ductile Iron

YS 12-CI
Class 250
Threaded
Sizes: 1/4 ~ 3"

YS 12-DI
Class 300
Threaded
Sizes: 1/4 ~ 3"

YS 58-CI
Class 125
Flanged
Sizes: 2 ~ 24"

YS 58-D-GG
WOG 300
Grooved
Sizes: 2 ~ 12"

YS 59-CI
Class 250
Flanged
Sizes: 2 ~ 12"

Bronze & Brass

YS 55-EB
YS 55-BZ
Class 125
Threaded
Sizes: 1/4 ~ 3"

YS 56-EB
YS 56-BZ
Class 125
Solder
Sizes: 1/4 ~ 3"

Lead Free!*

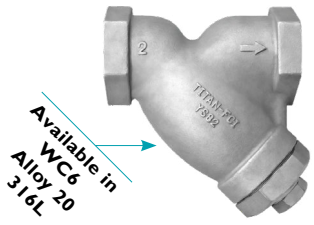
YS 52-AB
Class 250
Threaded
Sizes: 1/4 ~ 3"

YS 54-AB
Class 150
Flanged
Sizes: 2 ~ 12"

Carbon & Stainless Steel

YS 80T-SS
800 WOG
Threaded
Sizes: 1/4 ~ 3"

YS 80S-SS
800 WOG
Socket Weld
Sizes: 1/4 ~ 3"



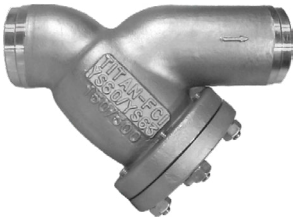
YS 81-CS
YS 81-SS
Class 600
Threaded
Sizes: 1/4 ~ 3"

YS 82-CS
YS 82-SS
Class 600
Socket Weld
Sizes: 1/4 ~ 3"

* Bolted Cover is standard on sizes 2 1/2" and 3" and is optional on size 2".

YS 61-CS
YS 61-SS
Class 150
Flanged
Sizes: 1/2 ~ 24"

YS 62-CS
YS 62-SS
Class 300
Flanged
Sizes: 1/2 ~ 12"



YS 63-CS
YS 63-SS
Class 300
Butt Weld
Sizes: 1/2 ~ 12"

YS 65-CS
YS 65-SS
Class 600
Butt Weld
Sizes: 1/2 ~ 12"

DID YOU KNOW

If we don't have it - we'll help you find it!

Titan Routinely Stocks:

- -Sizes 1/4" through 24"
- -Pressure Classes 125 ~ 2500
- -Standard Materials
- -Exotic Materials
- -All End Connections

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TITAN FLOW CONTROL, INC.

"Y" Type Strainers

Carbon & Stainless Steel

YS 64-CS
YS 64-SS
Class 600
Flanged
Sizes: $^{1}/_{2}$ ~ 12"

YS 66-CS
YS 66-SS
Class 900
Butt Weld
Sizes: 1 ~ 12"

YS 67-CS
YS 67-SS
Class 900
Butt Weld
Sizes: 2 ~ 10"

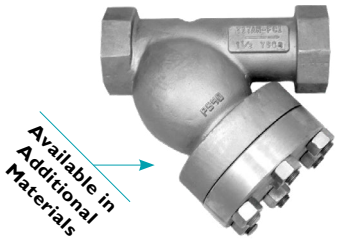
YS 68-CS
YS 68-SS
Class 1500
Flanged
Sizes: 2 ~ 8"

HIGH PRESSURE

YS 69-CS
YS 69-SS
Class 1500
Butt Weld
Sizes: 2 ~ 8"

YS 70-CS
YS 70-SS
Class 2500
Flanged
Sizes: 2 ~ 8"

YS 71-CS
YS 71-SS
Class 2500
Butt Weld
Sizes: 1 $^{1}/_{2}$ ~ 10"



YS 83-CS
YS 83-SS
Class 1500
Threaded
Sizes: $^{1}/_{2}$ ~ 3"

YS 84-CS
YS 84-SS
Class 1500
Socket Weld
Sizes: $^{1}/_{2}$ ~ 3"

YS 86-CS
YS 86-SS
Class 2500
Socket Weld
Sizes: $^{3}/_{4}$ ~ 2"

DID YOU KNOW

In Addition To Titan's **LEAD-FREE** Options-

Titan Can Provide NSF/ASME And FDA Approved Coatings; Making The Product Suitable For Potable Water Applications. Numerous Options Are Available, Please Contact Us For More Details.

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TITAN FLOW CONTROL, INC.

"Y" Type Strainers

Ductile Iron

NEW

YS 58N-DI
Class 150
Flanged
Sizes: 2 ~ 12"

NEW

YS 58U-DI
Class 150
Flanged
Sizes: 2 ~ 12"

DID YOU KNOW

Titan's NSF Strainer are **UL CERTIFIED?**

Titan NSF Strainers are UL certified and listed per UL subject 321 for use in the United States and Canada. Standard units are tested and certified per NSF 61 and NSF 372. These Products are Suitable For Potable Water Applications. Please Contact Us For More Details.

NSF Approved

TITAN FLOW CONTROL, INC.

Press-connect Strainers

Naval Brass

NEW

YS 57NB
200 WOG
Press-To-Connect
Sizes: 1/2" ~ 2"

NEW

CV 37NB
200 WOG
Press-To-Connect
Sizes: 1/2" ~ 2"

DID YOU KNOW

Titan's Press-Connect Products are **NSF CERTIFIED?**

Titan's Press Connect Products are certified per NSF 61 and NSF 372. Press-Connect ends quick installation helps complete project up to 3 times faster than customary methods. Please Contact Us For More Details.

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TITAN FLOW CONTROL, INC.
Basket Strainers (Simplex)

Cast Iron

BS 25-CI
Class 125
Threaded
Quick-Open Cover
Sizes: $^{3}/_{8}$ ~ 3"

BS 25F-CI
Class 125
Flanged
Quick-Open Cover
Sizes: 1 ~ 8"

Available with bolted and clamped cover

BS 55-CI
Class 125
Flanged
Clamp Cover
Sizes: 2 ~ 12"

BS 65-CI
Class 125
Flanged
Bolted Cover
Sizes: 2 ~ 12"

Carbon & Stainless Steel

BS 35-CS
BS 35-SS
Class 150/300
Threaded
Sizes: $^{3}/_{8}$ ~ 3"

BS 35F-CS
BS 35F-SS
Class 150
Flanged
Sizes: 1 ~ 8"

Available with bolted and clamped cover

BS 85-CS
BS 85-SS
Class 150
Flanged
Sizes: 2 ~ 12"

BS 86-CS
BS 86-SS
Class 300
Flanged
Sizes: 2 ~ 12"

Fiberglass & Aluminum Bronze

BS 87F-CS
BS 87F-SS
Class 150
Flanged
Sizes: 1 ~ 16"

BS 89-CS
BS 89-SS
Class 600
Flanged
Sizes: 2 ~ 12"

Optional Cover Designs

Most Basket Strainer models can be constructed with various cover designs including bolted, clamped, and hinged.

BS 55-FRP
Class 150
Flanged
Sizes: 4 ~ 20"

BS 95-AB
Class 150
Flanged
Sizes: 2 ~ 12"

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TITAN FLOW CONTROL, INC.

Duplex Strainers

Cast Iron

DS 595-CI
Class 125
Threaded
Cast Iron
Sizes: 3/4 ~ 2 1/2"

DS 695-CI
Class 125
Flanged
Cast Iron
Sizes: 1 ~ 4"

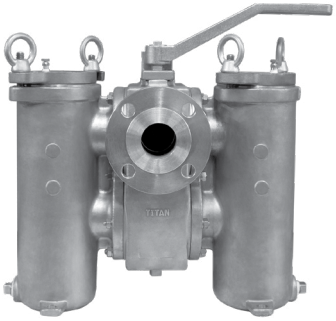
DS 695-CI
Class 125
Flanged
Cast Iron
Sizes: 6 ~ 8"

Aluminum Bronze

DS 596-AB
Class 150
Threaded
Aluminum
Bronze
Sizes: 3/4 ~ 2 1/2"

DS 696-AB
Class 150
Flanged
Aluminum
Bronze
Sizes: 1 ~ 4"

Stainless & Carbon Steel



DS 596-CS/SS
Class 150
Threaded
Carbon Steel
Stainless Steel
Sizes: 3/4 ~ 2 1/2"

DS 696-CS/SS
Class 150
Flanged
Carbon Steel
Stainless Steel
Sizes: 1 ~ 4"

DS 696-CS
Class 150
Flanged
Carbon Steel
Sizes: 6 ~ 8"

DS 696-SS
Class 150
Flanged
Stainless Steel
Sizes: 6 ~ 8"

DS 796-CS/SS
Class 300
Threaded
Carbon Steel
Stainless Steel
Sizes: 3/4 ~ 3"

DS 896-CS/SS
Class 300
Flanged
Carbon Steel
Stainless Steel
Sizes: 1 ~ 4"

Pump Products

Tri-Flow Valve
TF 21-CI
Class 125
Flanged
Cast Iron
Sizes: 2 ~ 20"

Suction Diffuser
SD 22-CI
Class 125
Flanged
Cast Iron
Sizes: 2 x 1 1/4 ~ 18 x 18"

Ball Valves

BV 25-SS
Male x Female
3000 WOG
Full Port Sizes: 1/4 ~ 1 1/2"
Reduced Port Size: 2"

BV 60-BZ
600 WOG
Male x Female
Full Port Design
Sizes: 1/4 ~ 2"

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TITAN FLOW CONTROL, INC.
Specialty Products & Check Valves

Foot Valve
FV 50-DI
Class 150
Flanged
Ductile Iron
Sizes: 2 ~ 12"

Cast Tee Strainer

Titan now has Cast Tee strainers!
Carbon and Stainless Steel,
ASME class 150
Raised face Flanged.
Size 2" to 24"

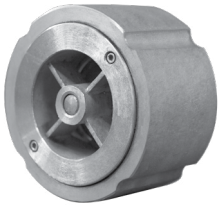
Foot Valves

Check Valve Models
CV 80-SS and CV 20-BZ can also
be designed as Foot Valves

Center Guided

Available with soft and metal seats

CV 90-DI
Class 150/300
Wafer Type - Silent
Ductile Iron
Sizes: 2 ~ 12"



Available with soft and metal seats

CV 91-SS
Class 150/300
Wafer Type - Silent
Stainless Steel
Sizes: 2 ~ 12"

Available with soft and metal seats

CV 50-DI
Class 150
Flanged - Globe Style
Ductile Iron
Sizes: 2 ~ 36"

Available with soft and metal seats

CV 51-CS / CV 51-SS
Class 150
Flanged - Globe Style
Carbon & Stainless Steel
Sizes: 2 ~ 36"

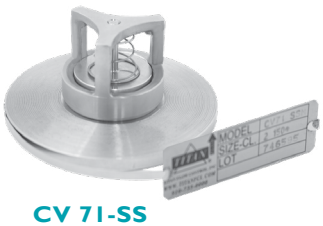
DID YOU KNOW

A Properly Sized **Check Valve** Is The Best Defense Against **Water Hammer**.

Available with soft and metal seats

CV 52-DI
CV 52-CS / CV 52-SS
Class 300
Flanged - Globe Style
Ductile Iron, Carbon & Stainless
Sizes: 2 ~ 36"

CV 80-SS
Class 300
Threaded / In-Line
Stainless Steel
Sizes: $^{3}/_{8}$ ~ 3"



CV 71-SS
Class 150/300
Wafer - Insert Check Valve
Stainless Steel
Sizes: $^{1}/_{2}$ ~ 6"

CV 88T-SS
CV 88S-SS
Class 300
Threaded / Socket Weld
Stainless Steel
Sizes: $^{1}/_{2}$ ~ 3"

CV 20-BR
400 WOG
Threaded / In-Line
Brass
Sizes: $^{1}/_{4}$ ~ 2"

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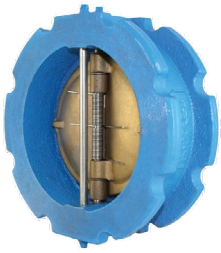
Single & Dual Disc

CV 12-CS / CV 12-SS
Class 150
Short Pattern - Wafer Type
Carbon & Stainless Steel
Sizes: 2 ~ 24"

CV 31-DI
Class 150
Wafer - Swing Type
Ductile Iron
Sizes: 2 ~ 12"

CV 32-CS / CV 32-SS
Class 150
Wafer - Swing Type
Carbon & Stainless Steel
Sizes: 2 ~ 12"

CV 34-CS / CV 34-SS
Class 300
Wafer - Swing Type
Carbon & Stainless Steel
Sizes: 2 ~ 12"



CV 41-DI
Class 150
Wafer - Dual Disc
Ductile Iron
Sizes: 2 ~ 48"

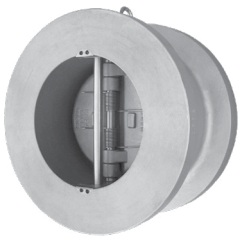
CV 41A-DI
Class 150
Wafer - Dual Disc
Ductile Iron
Sizes: 2 ~ 48"

CV 42-CS / CV 42-SS
Class 150/300
Wafer - Dual Disc
Carbon & Stainless Steel
Sizes: 2 ~ 48"

CV 42L-CS / CV42L-SS
Class 150
Wafer - Dual Disc
Ductile Iron
Sizes: 2 ~ 48"

CV 44-CS / CV 44-SS
Class 300
Wafer - Dual Disc
Carbon & Stainless Steel
Sizes: 2 ~ 48"

CV 46-CS / CV 46-SS
Class 600
Wafer - Dual Disc
Carbon & Stainless Steel
Sizes: 2 ~ 48"



CV 47-CS / CV 47-SS
Class 900
Wafer - Dual Disc
Carbon Steel & Stainless Steel
Sizes: 2 ~ 48"

CV 31F-CI / CV31WF-CI
Class 125
Wafer - Dual Disc
Ductile Iron
Sizes: 2 ~ 12"

DID YOU KNOW

Titan Check Valves Are Designed With Features To Minimize **Head Loss**:

-Large Cross Sectional Area
-Specially Contoured Bodies
-Short, Straight Flow Paths
-Compression Springs
-Low Cracking Pressure

All Titan Check Valves Meet Or Exceed API 598 Valve Inspection & Testing Standards

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Ductile Iron

CV 31G-UL-DI
WOG 300
Wafer - Swing Type
Ductile Iron
Sizes: 2 ~ 12"

BF 77G-UL-DI
WOG 300
Grooved End - BFV
Ductile Iron
Sizes: 2 ~ 12"

YS 58G-UL-DI
WOG 300
Grooved End - "Y" Type
Ductile Iron
Sizes: 2 ~ 12"

Fire Protection

YS 58U-DI
Class 150
Flanged
Sizes: 2 ~ 12"

Titan Fire - line Product Features:

- AWWA C606 Grooved and Shouldered Joints
- Sizes 2" through 12" in Stock
- Rated for 300 WOG
- Ductile Iron body material
- EPDM seats and O-rings
- Grooved End design allow for quick and easy Installation
- Approved and listed as required in NFPA Standards
- Following Standards are refrenced in design:
    - UL Subject 321 Pipeline Strainers
    - ULC / ORD-C 321 Pipline Strainers (Canda)
    - NSF/ANSI 61 Drinking water system components - Health effects
    - NSF/ANSI 372 Drinking water system components - lead effects
    - ANSI/CAN/UL/ULC 312 Check Valves for Fire protection
    - ANSI/CAN/UL/ULC 1091 Butterfly valves for Fire protection
    - ASME B16.41 Ductile Iron Pipe Flanges and Flanged Fittings
    - MSS SP-67, MSS SP-67 Type II Valve design and testing
    - MSS SP-55 Quality standard for valve castings
    - MSS SP-25 Standard Marking system for Valves
    - API 598 Valve inspection and Testing

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Cast & Ductile Iron

BF 75-CI
200 PSI
Wafer Type
Cast Iron
Sizes: 2 ~ 12"

BF 75-CI
150 PSI
Wafer Type
Cast Iron
Sizes: 14" ~ 48"

BF 76-DI
200 PSI
Lug Type
Ductile Iron
Sizes: 2 ~ 12"

BF 76-DI
150 PSI
Lug Type
Ductile Iron
Sizes: 14" ~ 48"

Mounting Options

Butterfly Valves are available with 10-position, actuator, gear box, and chain wheel mounting. Stem Extensions are also available.

Chain Wheel

Gear Box

Butterfly Valve Features:

- Seat is Phenolic Backed Cartridge
- Sizes 2" through 12" in Stock
- Valve Bodies are Epoxy Painted
- Rated for 200 psi Bidirectional Service (2" ~ 12")
- Extended Neck provides 2" of Piping Clearance
- Alignment Holes for easy Installation
- Designed in Accordance with ASME Class 125/150
- Titan Butterfly Valves meet the requirements for **Lead Free** use in potable water systems. The lead content in the wetted surfaces of Titan Butterfly Valves with AB discs is 0.25% or less as determined by a weighted average. For more information on lead free requirements, contact Titan Flow Control, Inc.

Package with Titan Suction Diffuser and Triple-Duty Valves for Pump Packages.

Butterfly Valve - Stem Extension

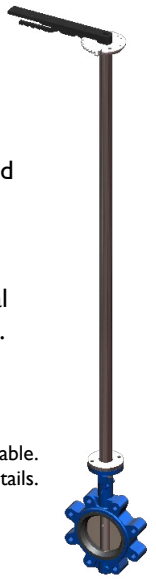
These custom fabricated units extend the shaft of units BF75 and BF76.

YOUR SPECS. OUR DESIGN.

Ideal for easy maintenance, additional torque and additional pipe clearance.

Size Range: (2" ~ 24")

Larger sizes available.
Contact factory for details.



Universal Mounting Flange

The cast-in actuator flange is universally designed in accordance with ISO 5211 standard dimensions. The mounting flange can accommodate all types of operators such as: 10-position handle kits, gear operators, electric actuators, and pneumatic actuators.

For actuators, Titan FCI may provide both direct mount and bracket mount designs. Please contact Titan FCI about your specific automation requirements.

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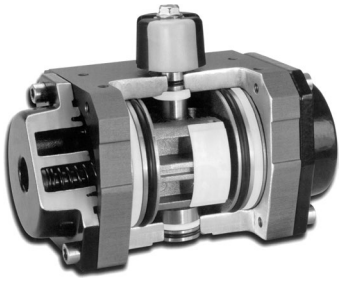
Butterfly Valve Actuation

Titan FCI offers a complete line of Pneumatic Actuators and Electric Actuators.



Pneumatic Actuator with Travel Indicator

Electric Actuator for Sizes 3" & Smaller

Electric Actuator for Sizes 4" & Larger

Actuator Accessories:

- Three and Four-Way Direct Mount Solenoid Valves
- Pneumatic & Electro-Pneumatic Positioners
- Limit Switches
- Speed Controls
- Manual Override
- Lock Out Devices
- 4-20 mA/0-10V and 3-15 PSI

Stay Tuned For NEW TITAN PRODUCTS!

Electric Actuator Mounting

Pneumatic Actuator Mounting

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TITAN FLOW CONTROL, INC.
Fabricated Products

Fabricated Products

Titan FCI has the capability of designing and fabricating a variety of products to your exact specifications. Our fabricated products include:

- *"Y" Strainers*
- *Basket Strainers*
- *Temporary Strainers*
- *Plate Strainers*
- *"T" Strainers*
- *Duplex Strainers*
- *Orifice Plates*
- *Spectacle Flanges*
- *Single Blinds*
- *Ring Spacers*
- *Steam Jacketed Strainers*
- *Fiberglass Reinforced Plastic Strainers*
- *And much more ....*

Please contact the factory directly for any special projects or applications you may require.

Fabricated "Y" Strainer

Fabricated Basket Strainer

Fabricated Duplex Strainer

YOUR SPECS. OUR DESIGN.

Titan Fabrications is an ASME coded facility. Let us fabricate your custom solution!

Titan FCI is a proud American Society of Mechanical Engineers (ASME) code certified shop. We provide authorized repair and fabrication.

Don't Forget To Check Out Titan's FABRICATION CATALOG

YOUR SPECS. OUR DESIGN.

Download at: www.titanfci.com

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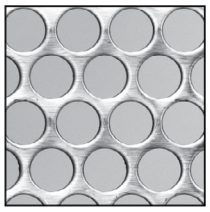
Replacement Screens & Baskets

Titan FCI can manufacture straining elements for all types of strainers including:

• "Y" Strainers • "T" Strainers • Basket Strainers • Duplex Strainers

Titan FCI can manufacture straining elements in a wide variety of perforations, meshes, and materials (Type 304, Type 316, Alloy 20, Monel).



Perforated Screen

Wire Mesh with Perforated Backing

Wire Mesh

We can also provide replacement screens and baskets for our competitor's strainers.

Just send us your prints, samples, or simply give us your requirements and let us design a straining element that is right for your application. In most cases, straining elements can be ordered by referencing Titan FCI's or any other manufacturers' strainer model number.

Temporary Strainers

Titan FCI can also manufacture Temporary / Conical Strainers.

Temporary Strainer 'Pilgrim's Hat' Type

Temporary Strainer 'Witch's Hat' Type

Spectacle Blinds, Open & Closed Blinds (Ring Spacer) Restriction Orifice Plates Bleed Rings

Titan Blind Benefits:

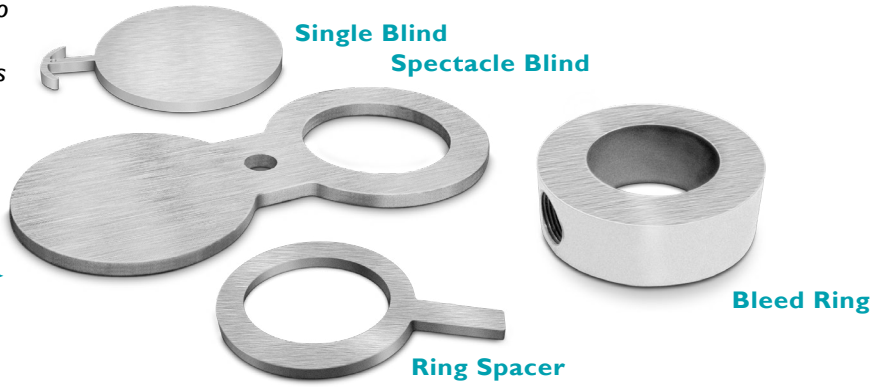
- *Provides permanent - positive shutoff.*
- *Promotes safety during downstream service operations.*
- *Spectacle Blinds provide visible shutoff.*
- *Economical solution when compared to Isolation Valves.*
- *Can be used with liquids, solids, slurries and gases.*

Various Finishes Available

Titan Bleed Ring Benefits:

- *The ability to safely drain pipeline liquid.*
- *Easy access for taking samples.*
- *Can often be used in place of orifice flanges.*
- *Convenient method of attaching equipment.*
- *Can be used as pressure relief rings.*
- *Standard sizes stocked for quick delivery.*

Venting, purging, and blind storage racks are also available. Please contact Titan for more information.



Single Blind
Spectacle Blind
Bleed Ring
Ring Spacer

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Why Use a Y or Basket Strainer?

As we talk about strainers, this might be a good time to review the general purpose of a strainer. A strainer is used to "strain" or "filter" contaminates in a piping system that could flow down the pipeline and damage more expensive pieces of equipment, or spoil a manufacturing process. In effect, a strainer could be viewed as a very inexpensive "insurance policy" to help protect the overall piping systems. Strainers are available in many materials, types, and end connections. These various options are designed to help the end user obtain the best possible straining device for their specific applications.

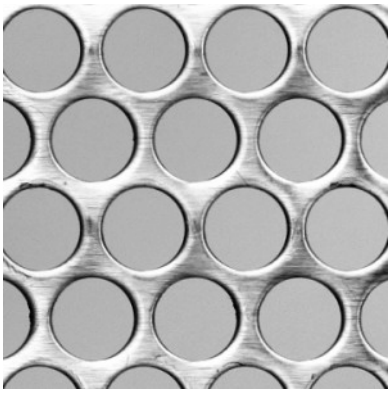
BS25
Basket Strainer

Strainers can be obtained in threaded ends, socket weld, butt weld and flanged ends. Higher pressures are also available in other special end connections. Body materials can range from iron, carbon steel, stainless steel, bronze and many special alloys. Some manufacturers even offer FRP units (fiberglass reinforced plastic) bodies, for significant corrosion resistance, at a lower cost and with a greatly reduced installed weight.

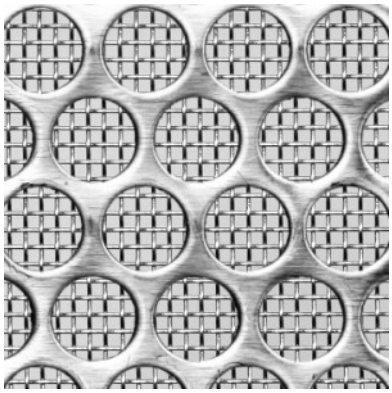
The selection of the straining element (screen or basket) is typically based on the line media (what's going through the pipeline). The term "screen" is typically used in wye strainers, while "basket" is the term that is used in a basket type strainer. The internals of a strainer are really the internal screening, or filtering element. Additional factors include what may be flowing through the line, and the degree of straining that the customer has determined needs to take place. Pressure drops, line pressure, flow rate are just a few of the considerations that may be factored in. For more information regarding the selection of straining elements, see the section "Choosing the Right Straining Element".

Straining Element Removal

The straining elements are generally made from a wire mesh type screen material or a perforation in sheet metal. In some cases, depending on size and pressure rating, a mesh unit may additionally include a perforation. Using a perforated material in conjunction with a mesh, may be best in providing greater strength and stability to the straining element.



Perforated Screen



Mesh Lined Screen

The standard basket or screen material in most strainers today is 304 series stainless steel. 316 stainless steel is also common (often used for additional corrosion resistance). Monel is also a material that can easily be provided by most manufacturers. There are many variations of mesh and perforations that are available along with various methods of construction, and support methods, based on specific applications.

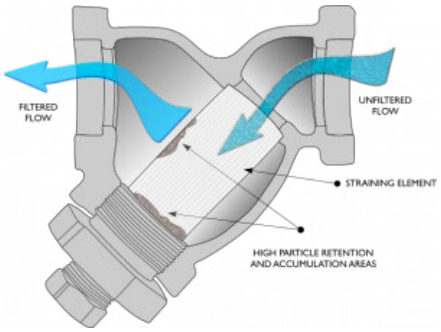
910.735.0000 TEL | 910.738.3848 FAX | TITAN@TITANFCI.COM | WWW.TITANFCI.COM

Choosing the Right Straining Element

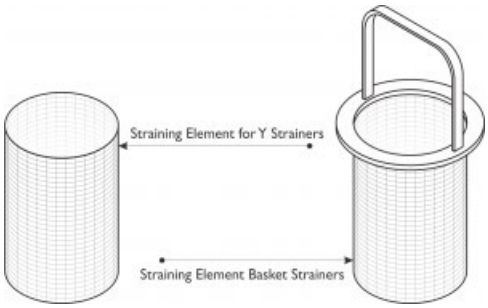
This article is based upon Titan Flow Control's Screen and Basket Selection Guide. This section focuses on choosing the correct opening size,

Introduction:

A strainer is installed into a pipeline and functions as a mechanical filter removing and retaining particles too large to pass through yet allowing the flowing media to pass unobstructed. By cleaning the flowing media, pipeline strainers help to protect expensive downstream equipment such as pumps, meters, spray nozzles, compressors, and turbines. Straining of the pipeline flow is accomplished via a perforated or mesh lined straining element, internal to the strainer.
This is shown in the illustration to the right.



Pipeline Straining Example

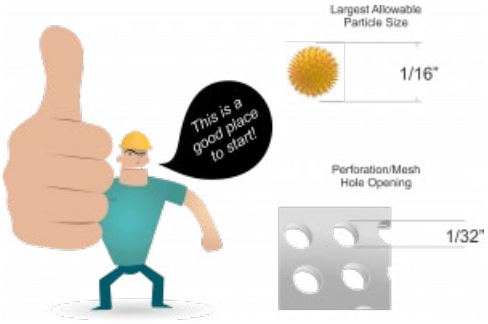


Straining Element Types

One of the more common questions asked when specifying a pipeline strainer is: "What perforation or mesh should be used for this application?" Before we go any further, I think it would be wise to discuss the terminology used when talking about pipeline strainers. Typically, the internal perforation or mesh material is referred to as a screen, when talking about "Y" strainers, and a basket, when talking about basket strainers. However, this can cause some confusion since the term "basket" can be used for both the strainer housing and the internal perforated or mesh material. To avoid this confusion, this article will use the term "straining element" when referring to the perforation or mesh material internal to the strainer housing.

Determining Opening Size:

The first decision that needs to be made is the hole size of the perforation or mesh. The general rule of thumb is the hole opening size should be one-half the diameter of the largest allowable particle. The largest allowable particle is defined as the size of particle that can pass through downstream equipment without causing damage. For example, if the maximum allowable particle is 1/16 inch than the perforation/mesh opening would be specified at 1/32 inch. In addition to the size of particles, the quantity of debris in the flowing media must also be considered when determining the appropriate opening size. Straining elements can only be used to remove insoluble floating impurities.



Determine Hole Size

The most common range of particle retention is 1 inch down to 40 microns (.0015 inch).

A common mistake is to specify a hole opening that is to small for the application. This can lead to over-straining and should be avoided for the following reasons:

- Maintenance costs are significantly increased due to excessive cleaning requirements.
- Pressure drop is increased dramatically.
- The straining element may become damaged and fail.

In some applications requiring finer filtration, it may be advisable to strain in gradual steps. This is accomplished by placing progressively smaller straining elements in series.

Important:

Straining elements are not designed to withstand the same pressure as the strainer housing. If the straining element becomes fully clogged, it will be exposed to the same pressure as the housing. In most cases, this will cause the straining element to fail. A convenient way to monitor the differential pressure is to install pressure gauges on both the inlet and outlet sides of the strainer. It is not recommended to allow the differential pressure to exceed 20 psi.

910.735.0000 TEL | 910.738.3848 FAX | TITAN@TITANFCI.COM | WWW.TITANFCI.COM

290 CORPORATE DRIVE
LUMBERTON, NC 28358

WWW.TITANFCI.COM
TITAN@TITANFCI.COM

910.735.0000 TEL
910.738.3848 FAX

TITAN FLOW CONTROL

Titan Flow Control, Inc.

A Letter from our President

Titan Flow Control, Inc. manufactures a complete line of very high quality pipeline strainers, double disc check valves, globe type silent check valves, and soft seated butterfly valves. Our product offerings include both a high quality import line as well as units crafted to meet full domestic requirements whenever needed.

Our management team has been designing and manufacturing industrial strainers for over 30 years. We have the ability to custom design units to conform to even the most complicated piping configurations imaginable. Our screen fabrication shop can quickly provide special screens in a wide selection of both perforated and wire mesh materials in sizes ranging from 20 through 500 mesh. We offer products fabricated from numerous alloys including bronze, ductile and cast iron, carbon steel, stainless steel, monel, alloy 20, nickel and hastelloy, as well as many others.

Every Titan unit is fabricated with premium components from certified vendors. The components that go into making a Titan FCI valve must conform to Titan's rigid standards. To test for meeting conformity, on arrival, every component is subjected to and must pass multiple, rigorous quality inspection procedures. Every casting carries a foundry heat number for immediate identification and for subsequent traceability. All parts are precision machined on the newest and most modern numerical control machinery - all manufactured in strict adherence to internationally recognized standards and specifications, including ASME/API/NACE and ISO. All products manufactured by Titan FCI are 100% hydrostatically tested in accordance with applicable ASME API, MSS standards and customer specifications.

Titan FCI is proud to have earned one of the highest quality/price ratios of any reputable strainer/valve company in the world.

You will find the most impressive fact about a Titan FCI product is the product itself. Titan will be more than pleased to provide you with a sample of any product you request.

Martin Gibbons
President

Titan FCI's new manufacturing facility - right off of Interstate 95, Exit 17.