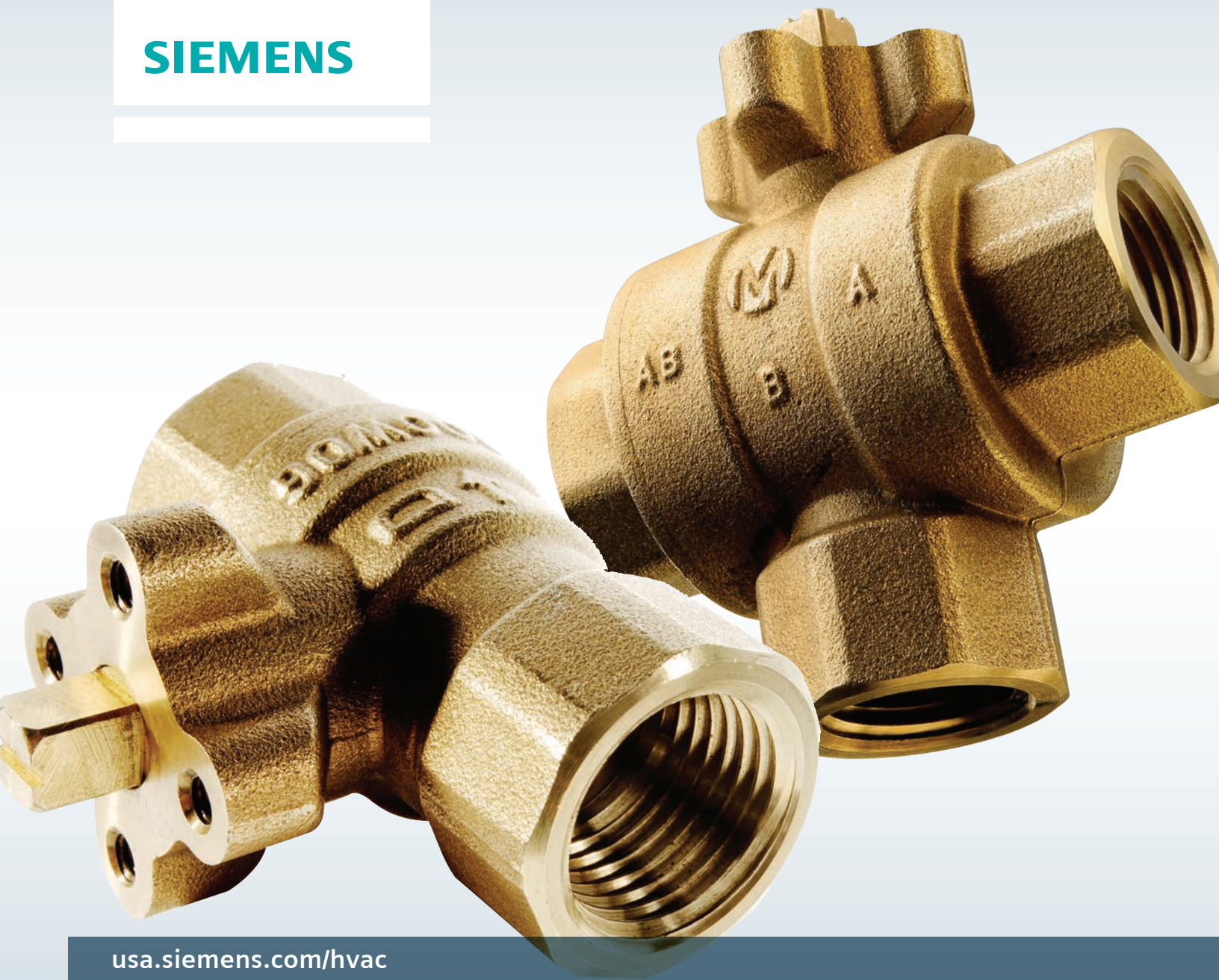


SIEMENS



[usa.siemens.com/hvac](http://usa.siemens.com/hvac)

## 2- & 3-Way Ball Valves with Stainless Steel or Chrome Trim

599 Series ball valves couple with OpenAir™ actuators to offer you more: expanded Cv range, higher close-off, better sizing, long-life reliability, and economical pricing.

Answers for Infrastructure.

# Ready for the challenge

With higher close-offs, a wider Cv range, and two trim finishes to choose from, Siemens 599 Series ball valves provide exact control in all types of applications — even harsh environments

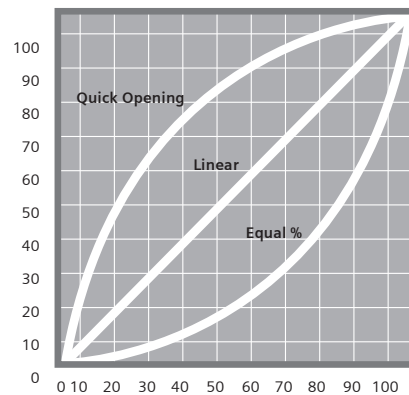
Schools, universities, medical facilities, office buildings, commercial properties: creating comfortable and efficient environments begins with the consistently precise performance of HVAC systems featuring Siemens ball valves. 200 psi close-off gives these valves the ability to close-off against very high differential pressure, enabling them to meet specifications for more applications. With chrome or stainless steel trim choices, you'll find a complete range of valves that deliver cost-effective, reliable control.

Designed to provide excellent equal percentage flow control and so much more:

- Available with chrome-plated brass ball and brass stem or stainless steel ball and stem to withstand harsh conditions
- 0.4 to 160 Cv range enables better sizing of valves to the job requirements
- 200 psi close-off
- Low ANSI Class IV leakage (0.01% of Cv) at rated close-off pressure reduces energy consumption
- 600 WOG/ANSI 250 pressure rating meets the specifications of more applications
- Blow-out proof stem withstands high pressure
- Double o-ring stem packing prevents leaking and ensures long-lasting performance
- Universal actuator mounting bracket with standoffs provide a thermal barrier between the actuator and the mounting plate
- 3-way valves can be used for mixing or diverting
- All 3-way valves have positive close-off on bypass port

## Better Flow Control

The integrated flow characterizer provides an equal percentage flow characteristic. Equal movements of the valve stem at any point of the flow range changes the existing flow an equal percentage regardless of the existing flow. The ball valve equal percentage flow curve mirrors the coil heat output curve, resulting in linear heat transfer.



## A Winning Combination

Siemens 599 Series ball valves and valve actuators deliver comprehensive control solutions. Available in spring return, non-spring return, 2-position, floating, and proportional control to suit a wide variety of control specifications and strategies, Siemens OpenAir™ electronic actuators are known for their reliability. They require no special programming or tools, saving on installation time and delivering immediate results.

- Actuators with choices of control signals
- Universal actuator mounting bracket
- Actuator and bracket can be rotated (90 degree increments)
- Operating handle for manual operation
- Quickly and easily installs in the field
- Direct-coupled connection

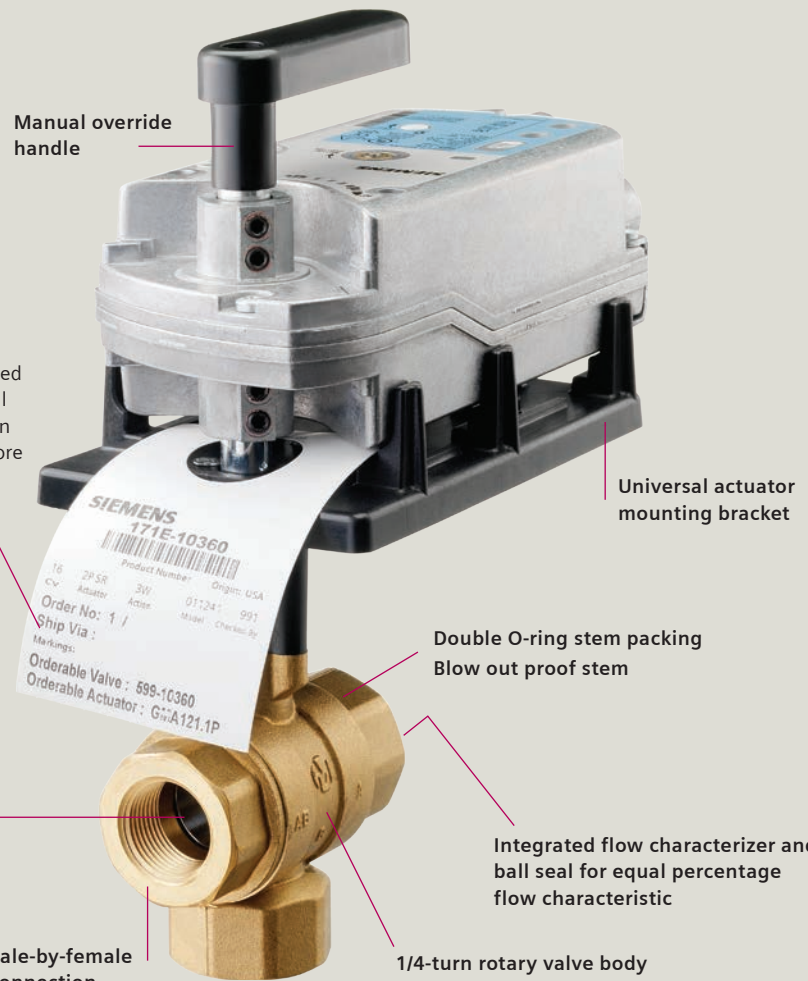
## VALVE BODY FEATURES

### FREE VALVE TAGGING

Valves and valve actuators are assembled and tagged for direct delivery to any job-site, free of charge. All you have to do is specify each valve's location when placing your initial order and we will tag them before shipping, saving you time and expense.

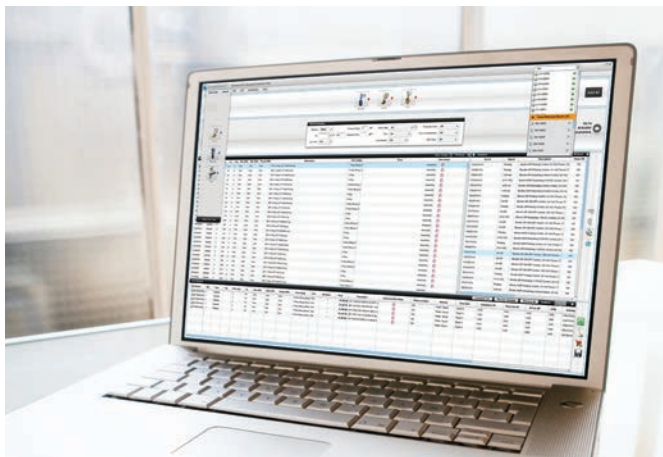


NPT female-by-female thread connection



## SimpleSelect™ Valve Sizing and Selection Tool

With new enhancements and time saving features, SimpleSelect is an incredibly easy and invaluable tool you'll want to use every day.



Search from our complete portfolio of valves and actuators with SimpleSelect -- the fast, efficient, and easy way to size and select the right valve, actuator, or assembly for the job.

It now includes PICVs and their associated actuators and a comprehensive cross-reference that searches through 8,000 competitive or obsolete Siemens part numbers to find the replacement you need.

### Effortless installation and intuitive navigation

Start saving time right away! SimpleSelect's intuitive platform requires minimal training and makes building a Valve Schedule easier than ever.

- Valve and Actuator Parameter Windows help you determine correct sizing and selection criteria.
- Drop down menu options and calculator tools help ensure you meet specific valve sizing requirements.

Go to [www.usa.siemens.com/simpleselect](http://www.usa.siemens.com/simpleselect)



## BALL VALVE SELECTION GUIDE

Our expanded selection offers a complete Cv range for all types of applications. Siemens Ball Valves are excellent for automated flow control of hot or chilled water and up to 50% water-glycol solution for HVAC control applications.



2-Way Ball Valve Description	Old Chrome Part No.	Chrome Trim Part No.	Stainless Steel Trim Part No.
0.5" 0.4 Cv	599-10203	599-10300	599-10300S
0.5" 0.63 Cv	599-10204	599-10301	599-10301S
0.5" 1 Cv	—	599-10302	599-10302S
0.5" 1.6 Cv	599-10205	599-10303	599-10303S
0.5" 2.5 Cv	599-10206	599-10304	599-10304S
0.5" 4 Cv	599-10207	599-10305	599-10305S
0.5" 6.3 Cv	—	599-10306	599-10306S
0.5" 10 Cv	599-10208	599-10307	599-10307S
0.75" 6.3 Cv	—	599-10308	599-10308S
0.75" 10 Cv	599-10209	599-10309	599-10309S
0.75" 16 Cv	—	599-10310	599-10310S
0.75" 25 Cv	599-10210	599-10311	599-10311S
1" 10 Cv	599-10211	599-10312	599-10312S
1" 16 Cv	599-10213	599-10313	599-10313S
1" 25 Cv	599-10212	599-10314	599-10314S
1" 40 Cv	—	599-10315	599-10315S
1" 63 Cv	599-10214	599-10316	599-10316S
1.25" 16 Cv	599-10215	599-10317	599-10317S
1.25" 25 Cv	—	599-10318	599-10318S
1.25" 40 Cv	599-10216	599-10319	599-10319S
1.25" 63 Cv	—	599-10320	599-10320S
1.25" 100 Cv	599-10217	599-10321	599-10321S
1.5" 25 Cv	599-10218	599-10322	599-10322S
1.5" 40 Cv	599-10220	599-10323	599-10323S
1.5" 63 Cv	599-10219	599-10324	599-10324S
1.5" 100 Cv	—	599-10325	599-10325S
1.5" 160 Cv	599-10221	599-10326	599-10326S
2" 40 Cv	599-10222	599-10327	599-10327S
2" 63 Cv	599-10224	599-10328	599-10328S
2" 100 Cv	599-10223	599-10329	599-10329S
2" 160 Cv	—	599-10330	599-10330S
2" 250 Cv	599-10225	Replaced by 160 Cv	

3-Way Ball Valve Description	Old Chrome Part No.	Chrome Trim Part No.	Stainless Steel Trim Part No.
0.5" 0.4 Cv	599-10250	599-10350	599-10350S
0.5" 0.63 Cv	599-10251	599-10351	599-10351S
0.5" 1.0 Cv	599-10252	599-10352	599-10352S
0.5" 1.6 Cv	—	599-10353	599-10353S
0.5" 2.5 Cv	599-10253	599-10354	599-10354S
0.5" 4.0 Cv	599-10254	599-10355	599-10355S
0.5" 6.3 Cv	—	599-10356	599-10356S
0.5" 10 Cv	599-10255	599-10357	599-10357S
0.75" 6.3 Cv	—	599-10358	599-10358S
0.75" 10 Cv	—	599-10359	599-10359S
0.75" 16 Cv	599-10256	599-10360	599-10360S
1" 10 Cv	599-10257	599-10361	599-10361S
1" 16 Cv	599-10258	599-10362	599-10362S
1" 25 Cv	599-10259	599-10363	599-10363S
1.25" 16 Cv	599-10260	599-10364	599-10364S
1.25" 25 Cv	—	599-10365	599-10365S
1.25" 40 Cv	599-10261	599-10366	599-10366S
1.5" 16 Cv	599-10262	Not Replaced	—
1.5" 25 Cv	599-10263	599-10367	599-10367S
1.5" 40 Cv	—	599-10368	599-10368S
1.5" 63 Cv	599-10264	599-10369	599-10369S
2" 25 Cv	599-10265	Not Replaced	—
2" 40 Cv	599-10266	599-10370	599-10370S
2" 63 Cv	—	599-10371	599-10371S
2" 100 Cv	599-10267	599-10372	599-10372S

## VALVE ASSEMBLIES SELECTION GUIDE

### SPRING RETURN ACTUATORS

Replace 599 in the valve part number with an Actuator Prefix Code listed below.

Actuator Prefix Code	Control Signal
171E, 171H	On/off, Normally Open, 24V
171F, 171J	Floating, Normally Open
171G, 171K	0-10V, 2-10V, Normally Open
171L, 171M	On/off, Normally Open, 120V
171N, 171P	On/off, Aux. Switches, Normally Open, 24V
172E, 172H	On/off, Normally Closed, 24V
172F, 172J	Floating, Normally Closed
172G, 172K	0-10V, 2-10V, Normally Closed
172L, 172M	On/off, Normally Open, 120V
172N, 172P	On/off, Aux. Switches, Normally Closed, 24V

**Note:** H, J, K, L, N for ½ & ¾ inch valve;

E, F, G, M, P for 1 - 2 inch 2-way valve and all 3-way

### NON-SPRING RETURN ACTUATORS

Replace 599 in the valve part number with an Actuator Prefix Code listed below.

Actuator Prefix Code	Control Signal
171A, 171B, 173A, 173B	Floating, normally open
171C, 171D, 173C, 173D	0-10V, normally open

**Note:** A & C for ½ - 1¼ inch valve; B & D for 1½ - 2 inch valve

173 includes conduit adapter and 6' cable



**Siemens Building Technologies, Ltd.**  
**Building Technologies Division**  
1000 Deerfield Parkway  
Buffalo Grove, IL 60089-4513  
USA  
Tel. 888-593-7876

**Siemens Building Technologies, Ltd.**  
2 Kenview Blvd.  
Brampton, Ontario L6T 5E4  
Canada  
Tel. 905-799-6649

All rights reserved. Printed in USA 599-099 (8/13)  
©2013 Siemens Industry, Inc.

The information in this document contains general descriptions of technical options available, which are not always present in individual cases. The required features should be specified in each individual case at the time at the time of purchase.

**Ready to place an order?**

Contractor or Wholesalers, call 1-888-593-7876  
Siemens Solution Partners, call 1-800-516-9964  
Canadian Customers, call 1-800-236-2967  
All other customers, call your local Siemens branch  
Siemens Online Ordering, go online to  
[www.usa.siemens.com/buildingtechnologiesonlineordering](http://www.usa.siemens.com/buildingtechnologiesonlineordering)