

- Full port design - same I.D. as Sch 80 pipe minimizes turbulence at high flow rates.
- PVC with EPDM O-rings and PTFE or POM seats.
- **Alternative to brass or bronze gate valves for irrigation uses.**
- Thermoplastic construction eliminates process and atmospheric corrosion.
- True Union End Connectors allow for easy and quick removal from line.
- Dual Stem o-rings for extra protection against leaks.
- End connections meet ASTM requirement: PVC D 2467. Valves are supplied with socket and FIPT connectors
- Repairable: A complete inventory of repair parts is readily available.
- Assembled in USA.
- 3 – Year Limited Warranty
- Handle features a cross to accept standard sprinkler key wrench (or Lasco plastic key Valve Key-1) for buried service actuation.

Part Number:  
Valve Key-1



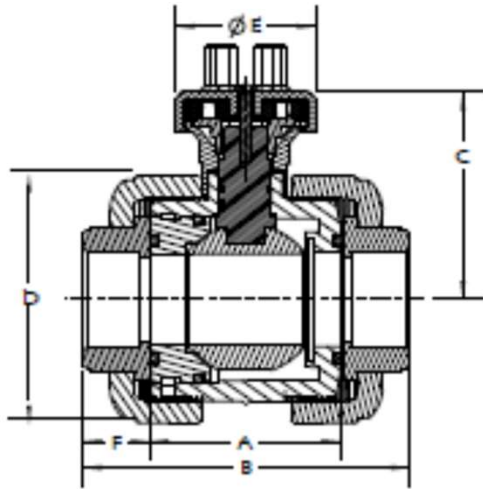
Designed for turf irrigation, and many other applications. Patented gear drive thermoplastic handle mechanism allows for a 360° rotation of the handle to achieve a 90° turn of the ball. This gradual open/close actuation greatly reduces the opportunity for shock or hammer experienced by the sudden open/closure of a standard quarter-turn ball valve.



R-Series also available with purple operating-nut / handle for use with Reclaimed Water (see part numbers on opposite page)



Revised 1/10/24



Dimensions (in.)

	1"	1- 1/4" & 1- 1/2"	2"	2- 1/2"	3"
A	2.79	3.38	4.20	5.85	5.85
B	5.38	6.49	7.75	11.51	10.31
C	4.00	5.00	5.54	7.00	7.00
D	2.84	4.09	5.30	7.25	7.25
E	2.88	2.88	2.88	2.88	2.88
F	1.78	1.78	1.78	2.50	1.94

**PART NUMBERS FOR VALVES**

Size	Part Number	"R" Series with Purple operating nut for Reclaimed water
Soc & Thrd End Connectors		
1"	V10101N-SC	V10101N-SC-R
1-1/4"	V14101N-SC	V14101N-SC-R
1-1/2"	V17101N-SC	V17101N-SC-R
2"	V20101N-SC	V20101N-SC-R
Socket x Socket		
2-1/2"	V27101N-SC	V27101N-SC-R
3"	V30101N-SC	V30101N-SC-R
Thread x Thread		
2-1/2"	V27111N-SC	V27111N-SC-R
3"	V30111N-SC	V30111N-SC-R

**INSTALLATION PRECAUTIONS:**

- Colonial recommends a minimum installation distance of 5 x the pipe diameter from a pump or other source of turbulence.
- Slo-Close Valves are designed for use in the Open or Closed position. Moderate throttling has been successful in systems with LOW flow rates (< 3 ft per second) such as in geexchange systems. Throttling is not recommended for Heavy-turf irrigation or other systems with high flow rates.
- The maximum recommended flow rate for any Colonial Valve product is 5 feet per second.
- Follow published guidelines to re-rate pressure for elevated process temperature. Avoid prolonged exposure to direct sunlight during and after installation.
- Proper pipe alignment must be maintained. Union nuts should be hand-tightened for proper O-ring sealing.
- In buried applications, valves should be installed such that the centerline of the pipe is a minimum of 18" below grade. We recommend a double valve box allowing access to the union nuts to facilitate simple future maintenance or repair.

Do not use with compressed air or gas.

**CUSTOMER SERVICE:** 6400 Corporate Ave., Portage, MI 49002  
 Toll-free (800)374 0234, Phone (269)323 2495, Fax (269) 323 0630 www.colonialengineering.com

Pressure Rating	
1 - 2"	235 psi, non-shock water at 73° F
2-1/2 - 3"	150 psi, non-shock water at 73° F

GPM of water at 1 psi pressure drop, calculated from Hazen-Williams equation.

Size	Cv
1"	112
1-1/4"	178
1-1/2"	285
2"	540
2-1/2"	721
3"	1348

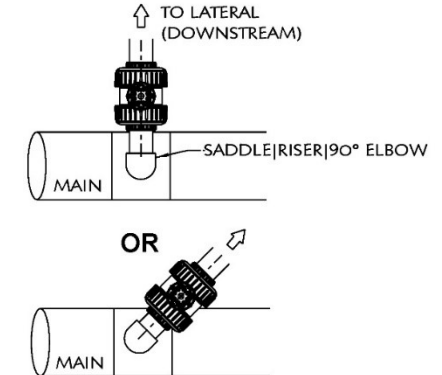
De-rate pressure for elevated process temps per the chart below:

Temp (°F)	PVC
73	1.00
80	0.88
90	0.75
100	0.62
110	0.50
120	0.40
130	0.30
140	0.22
150	NR

**Sample Engineering Specifications:**

True Union Ball Valves shall be produced of PVC Type 1, cell class 12454. Valve handle shall have a gear mechanism allowing for a 360° rotation of the handle to achieve a 90° turn of the ball, and shall be activated manually by hand or by use of an approved key wrench. O-rings shall be made of EPDM material. Valve stem shall have two O-rings. Valve seats shall be made of PTFE and POM material. End connectors shall be PVC Sch 80 socket or female NPT. Valves shall have a pressure rating of 235 psi ( 1 – 2" ), 150 psi (2-1/2 – 3" ), non-shock water at 73° F. **LASCO / Colonial Slo-Close Series TUBV.**

**Recommended Installation Layout**



**Recommended Burial Depth**

