# **Tempering Valves** 12/15/20mm



## APPLICATION

Used in hot water supply systems to mix hot and cold water to a controlled outlet temperature, reducing the risk of exposure to excessively hot water.

## FEATURES/BENEFITS

- Extremely High flow rates (20 L/min at only 2m head) make the valve (TV20) suitable to both low and high pressure installations
- Valve can be installed in any orientation
- Failsafe shutdown in the event of failure of hot and cold supplies
- Tamperproof cap-less call outs for readjustment by plumber (TV20TP)
- Forged, high quality, corrosion resistant DR brass body
- Machined, assembled and 100% tested in NZ
- Advanced temperature control ideal for direct connection to a sanitary fixture e.g. hand basin (TV15P)

### SPECIFICATIONS

•	Sizes: TV15, TV15P	Inlet	15mm male,	½" BSP
		Outlet	15mm male,	½" BSP
	TV20	Inlet	20mm male,	34" BSP
		Outlet	20mm male,	34" BSP
	TV12	Inlet cold	12mm	John Guest fitting
		Inlet hot	15mm,	1⁄2" BSP
		Outlet	12mm,	John Guest fitting
•	Length: TV15		110mm	
	TV15P		110mm	
	TV20, TV20P		105mm	
	TV12		110mm	

- Factory set to give 53°C outlet. Can be adjusted from 35°C to 60°C
- Maximum inlet temperature 99°C
- Stored water temperature must be at least 10°C above the tempering valve setting and over 60°C (G12)
- Inlet water pressures:

TV15P

TV15, TV15P	30 to 1000 kPa (3m head)			
TV20, TV20D, TV20TP	20 to 1000 kPa (2m head)			
water a				

 Flow rates: TV15

20 L/min at 30 kPa inlet pressure 9 L/min at 30 kPa inlet pressure 20 L/min at 20 kPa inlet pressure

TV20, TV20D, TV20TP 20 L/min at 20 kPa inlet pressure
 Operating Pressure: Balanced hot and cold pressure. For unequal water pressure of up to 5:1 (Cold to Hot), non-return must be fitted to hot inlet unless included (TV20D, TV15).

# STANDARDS

- Complies with NZ Building Code G12 (2014)
- Complies with NZS 4617:1989
- NZ Patent No. 517764,

Aust. Patent No. 2003200856 RSA. Patent No. 2003/1992

## **PRODUCT CODES**

TV15	15mm	(Non-return on both inlets)
TV15P	15mm	Point of use Tempering Valve
TV20	20mm	
TV20D	20mm	Ring main installation (Non-return on both inlets)
TV20TP	20mm	Tamper proof
TV12	15mm	BSP Hot
	12mm	John Guest Speed Fit cold and Mix





### INSTALLATION

• Refer page 31 for installation guide

- Valve must be fitted by a qualified plumber
- Installation must comply with local authority requirements
- Valve may be installed in any orientation
- Flush pipes prior to fitting
- Valve must be protected by a line strainer
- Non-return valves are required at hot and cold inlets in Ring
  Main Installations
- Connections are H (hot inlet), C (cold inlet) and OUT (mixed temperature outlet)
- Do not apply heat near valve during installation this may damage the mechanism
- Do NOT install valve directly into outlet of cylinder
- 1m MIN copper pipe length from cylinder to tempering valve, THIS IS A MANDATORY REQUIREMENT OF G12

## TEMPERATURE ADJUSTMENT

Refer to page 15 overleaf



NOTE: All installations must comply with NZBC Clause G12