

# XJ Series



## THE COMPLETE ROBUST & COMPACT EVERYDAY SERIES PRESSURE SYSTEM

### APPLICATION

Ideal for household and domestic water supply, farming and agricultural water systems, irrigation and turf watering systems and automatic general water transfer.

### FEATURES & BENEFITS

The XJ Pressure System consists of an XJ pump fitted with a Torrium2 controller. The Torrium2 is supplied connected electrically to the XJ pump motor for Easy non-tradesmen installation and assembly.

The combination of the high pressures supplied by the jet assisted XJ pump and constant flow control provided by the Torrium2 allows a strong comfortable shower from a pump that does not cycle, plus the reliability of adaptive technology.

The complete Everyday Series Pressure System is compact and quiet providing easy installation (especially where space is at a premium) and non-intrusive operation.

All parts of the entire system that are in contact with the water are manufactured from safe, corrosion resistant materials allowing for use on a variety of water qualities.

Compliance with the strict requirements of ISO 9001.2000 quality standards ensures consistency of quality of the system.

### PUMP

- Single stage centrifugal pump with closed vane impeller and jet assist, providing compact design and high pressure performance
- Made from corrosion resistant engineering plastic materials ensures long service life, low maintenance and reliable water quality
- Our high quality, low-drag mechanical shaft seal means a long life and reliable starting

### TORRIUM2 CONTROLLER

For more information visit [daveywater.com](http://daveywater.com)

### EASE OF INSTALLATION

For ease of installation, the plumbing can be connected to either the vertical or the right angle discharge outlet, which can rotate a full 360°. A spanner, sized to fit the coupling, is included in the box. Also, for increased draw off, an optional pressure tank, up to 18 litres, can be mounted on the vertical outlet.

### ELECTRICAL CONNECTION

For easy installation, Torrium2 comes with a 2 metre long power lead, fitted with an Australian three pin plug.

# Home Pressure Systems

## OPERATING LIMITS

Maximum system pressure*	480kPa
Capacities to	90 lpm
Maximum total head	48m
Maximum suction head	7m
Maximum ambient temperature	50°C
Maximum water temperature	50°C
Minimum water temperature	1°C

Torium2 cut-in pressure is normally 80% of the pumps last shut-off head.

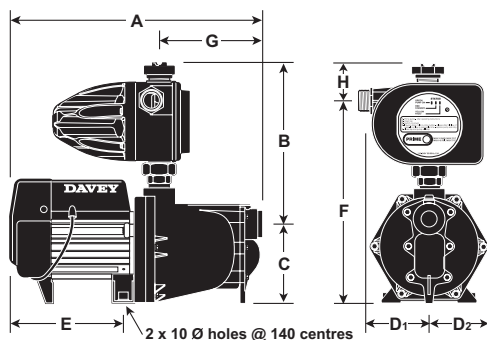
\*Note: See high pressure operation note on page 4.

## MATERIALS OF CONSTRUCTION

PART	MATERIAL
<b>Pump</b>	
Impellers	Glass filled polycarbonate
Pump casing	Glass filled noryl
Pump shaft	303 stainless steel
Seal ring (stationary)	Ceramic
Seal ring (rotating)	Carbon (synthetic)
Seal spring	304 stainless steel
O-rings	Nitrile rubber
Jet and venturi	Acetal
Priming plug	Glass filled polypropylene
Motor shell	Marine grade aluminium
Motor shell finish	Baked polyester
<b>Torium2</b>	
Housing	Glass fibre reinforced nylon
Pressure tank diaphragm	Santoprene 87
Pressure tank springs	Molybond coated tempered steel
Sensor plate	316 Stainless Steel
Inlet union	Glass fibre reinforced nylon
Orings	Nitrile

## DIMENSIONS (MM)

Model	A	B	C	D <sub>1</sub>	D <sub>2</sub>	E	F	G	H	Inlet	Outlet	Net Weight (kg)
XJ50T	430	265	146	115	102	185	335	185	75	1" F	1" M	10
XJ70T	455	265	146	115	102	210	335	185	75	1" F	1" M	12
XJ90T	505	265	146	115	102	260	335	185	75	1 1/4" F	1" M	15



## ELECTRICAL DATA

Model	XJ50T	XJ70T	XJ90T
Supply Voltage	220-240V ±6%		
Supply frequency	50Hz		
Phase	Single		
Speed	2850rpm		
Full load current	3.6A	5.1A	6.6A
Locked rotor current	12A	18A	28A
Input power (P1)	0.84kW	1.15kW	1.4kW
Output power (P2)	0.56kW	0.8kW	1.1kW
Enclosure class	IP55		
Insulation class	Class F		
Starting	P.S.C.		

Note: All performance at 240V 50Hz

## TORRIUM2

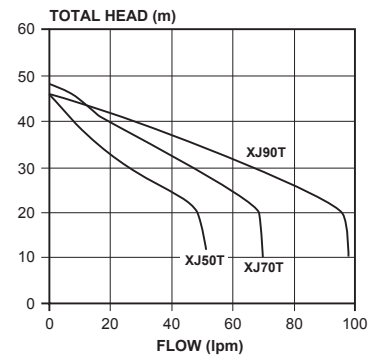
Voltage	110V-240V±10%
Phase	Single
Hz	50 / 60
IP rating	56
Maximum load current	10A
Maximum motor size*	1.8kW
Surge protection	Varistor

\*At 240V input

## INSTALLATION AND PRIMING

- Installations with suction lift require a good quality foot valve to avoid loss of prime - remove in-built check valve.
- To prime, fill pump body and suction line through priming plug hole located above suction inlet and replace plug.

## HYDRAULIC PERFORMANCE



## HIGH PRESSURE INSTALLATION AND NOTES

XJ pressure systems are intended to source water from wells, tanks, creeks, rivers or other low pressure water supplies. In some cases, XJ pumps may be required to be installed taking water directly from mains or municipal water sources.

In such circumstances all applicable local plumbing code requirements must be followed.

In addition the following limits apply to the XJ system:-

- For TOTAL system pressures of 600 kPa, the standard XJ system with or without Supercell 8C or 18C may be used provided the mains or municipal pressure does not exceed 100 kPa.
- For mains or municipal pressures exceeding 100 kPa, a break tank system is required or use a Davey HS system.

For further details consult the XJ Installation & Operating Instructions.