

Commercial Expansion Tanks

TK300 Series Expansion Tanks—Heating



Expansion Tanks absorb hot water expansion in closed heating systems. They are equipped with butyl diaphragms to separate the air from the system water. Pre-pressurized, the tank keeps fluids circulating and maintains minimum pressure.

- Butyl/EPDM diaphragm - 9 times better than natural rubber
- Deep-drawn steel tank
- Controls system pressure
- Air-tight cushion—factory pre-charged to 12 psig and 100% tested
- 7 year warranty for units with date code 1901 or newer.

Maximum Safe Operating Pressure (psi): 100 psi
Maximum Safe Operating Pressure (kPa): 689 kPa

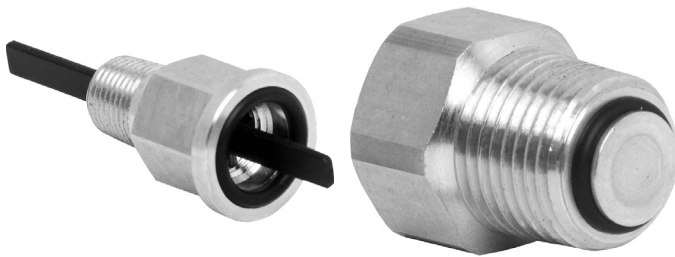
Operating Temperature Range: 240°F Maximum (115°C Maximum)
Comments: Heating

Material Number	Connection Size (in.)	Connection Type	Diameter	Height	Volume	Weight	Maximum Acceptance Volume	Materials
TK300-15/U	1/2 in.	Male NPT	8 in. (203.2 mm)	12 5/8 in. (321 mm)	2.0 gal (7.6 L)	5 lb (2.3 kg)	1 gal (3.8 L)	Steel shell; Heavy duty Butyl diaphragm
TK300-30/U	1/2 in.	Male NPT	11 in. (279 mm)	15 1/2 in. (394 mm)	4.4 gal (16.7 L)	9 lb (4.1 kg)	2.5 gal (9.5 L)	Steel shell; Heavy duty Butyl diaphragm
TK300-60/U	1/2 in.	Male NPT	11 in. (279 mm)	23 in. (584 mm)	7.6 gal (28.8 L)	14 lb (6.4 kg)	2.5 gal (9.5 L)	Steel shell; Heavy duty Butyl diaphragm
TK300-90/U	1/2 in.	Male NPT	15 3/8 in. (390.5 mm)	21 in. (533 mm)	14.0 gal (53.1 L)	23 lb (10.4 kg)	11.5 gal (40.1 L)	Steel shell; Heavy duty Butyl diaphragm

Expansion Tank Sizing based on BTU's

Boiler Net Output in 1000's of BTU/Hr	Type of Radiation			
	Finned Tube Baseboard or Radiant Panel	Convectors or Unit Heaters	Radiators Cast Iron	Baseboard Cast Iron
	Use Model	Use Model	Use Model	Use Model
25	TK300-15	TK300-15	TK300-15	TK300-15
50	TK300-15	TK300-15	TK300-30	TK300-30
75	TK300-30	TK300-30	TK300-30	TK300-60
100	TK300-30	TK300-30	TK300-60	TK300-60
125	TK300-30	TK300-60	TK300-60	TK300-90
150	TK300-30	TK300-60	TK300-90	TK300-90
175	TK300-60	TK300-60	XPS-030V	XPS-030V
200	TK300-60	TK300-60	XPS-030V	XPS-030V
250	TK300-60	TK300-90	XPS-030V	XPS-040V
300	TK300-90	XPS-030V	XPS-030V	XPS-040V
350	XPS-030V	XPS-030V	XPS-040V	XPS-060V
400	XPS-030V	XPS-040V	XPS-040V	XPS-060V

Service Check Valves



Service Check Valves for air vents and expansion tanks allow easy field service without draining system.

CAUTION: Reduce system temperature to ambient and pressure to 0 psi before servicing component. Failure to do so may result in injuries.

Maximum Safe Operating Pressure (psi): 100 psi
Maximum Safe Operating Pressure (kPa): 689 kPa
Operating Temperature Range: 240°F Maximum (115°C Maximum)

Material Number	Connection Size (in.)	Connection Type
SCV-0125/U	1/8 in.	Inlet FNPT, Outlet MNPT
SCV-050/U	1/2 in.	Inlet FNPT, Outlet MNPT

Expansion Tank Sizing based on BTU's

Boiler Net Output in 1000's of BTU/Hr	Type of Radiation			
	Finned Tube Baseboard or Radiant Panel	Convectors or Unit Heaters	Radiators Cast Iron	Baseboard Cast Iron
MBH	Use Model	Use Model	Use Model	Use Model
25	TK300-15	TK300-15	TK300-15	TK300-15
50	TK300-15	TK300-15	TK300-30	TK300-30
75	TK300-30	TK300-30	TK300-30	TK300-60
100	TK300-30	TK300-30	TK300-60	TK300-60
125	TK300-30	TK300-60	TK300-60	TK300-90
150	TK300-30	TK300-60	TK300-90	TK300-90
175	TK300-60	TK300-60	XPS-030V	XPS-030V
200	TK300-60	TK300-60	XPS-030V	XPS-030V
250	TK300-60	TK300-90	XPS-030V	XPS-040V
300	TK300-90	XPS-030V	XPS-030V	XPS-040V
350	XPS-030V	XPS-030V	XPS-040V	XPS-060V
400	XPS-030V	XPS-040V	XPS-040V	XPS-060V

TAXV Series Expansion Tanks—Commercial Usage



TAX Series (commercial) Expansion Tanks are designed to absorb hot water expansion in closed heating systems of large installations. TAX tanks are equipped with butyl diaphragms to separate the air from the system water (glycol).

- ASME construction: Horizontal TAX Series tanks.

Maximum Safe Operating Pressure (psi): 125 psi

Maximum Safe Operating Pressure (kPa): 862 kPa

Precharge (psi): 12 psi

Materials: Steel shell; Heavy duty Butyl diaphragm

Operating Temperature Range: 240°F Maximum (115°C Maximum)

Comments: ASME Construction

Material Number	Connection Size (in.)	Diameter	Height	Volume	Weight	Maximum Acceptance Volume
TAXV-015/U	1/2 in.	12 in. (304.8 mm)	19 1/4 in. (489 mm)	7.8 gal (29.6 L)	48 lb (21.8 kg)	2.5 gal (9.5 L)
TAXV-020/U	1/2 in.	12 in. (304.8 mm)	26 in. (660 mm)	10.9 gal (40.2 L)	61 lb (27.7 kg)	2.5 gal (9.5 L)
TAXV-040/U	1/2 in.	16 1/4 in. (412.7 mm)	29 1/2 in. (749 mm)	21.7 gal (82.2 L)	116 lb (52.7 kg)	11.3 gal (42.8 L)
TAXV-060/U	1/2 in.	16 1/4 in. (412.7 mm)	45 1/8 in. (1146 mm)	33.6 gal (127.3 L)	145 lb (65.9 kg)	11.3 gal (42.8 L)
TAXV-080/U	1/2 in.	16 1/4 in. (412.7 mm)	56 in. (1422 mm)	44.4 gal (168.3 L)	70 lb (89.1 kg)	22.6 gal (85.6 L)
TAXV-100/U	1/2 in.	16 1/4 in. (412.7 mm)	68 1/4 in. (1734 mm)	55.7 gal (211 L)	231 lb (105 kg)	22.6 gal (85.6 L)
TAXV-120/U	1 in.	24 in. (609.6 mm)	44 1/4 in. (1124 mm)	68 gal (257.7 L)	233 lb (105.9 kg)	34 gal (128.9 L)
TAXV-144/U	1 in.	24 in. (609.6 mm)	49 1/8 in. (1247.8 mm)	77.0 gal (291.8 L)	256 lb (116.4 kg)	34 gal (128.9 L)
TAXV-180/U	1 in.	24 in. (609.6 mm)	56 1/2 in. (1435 mm)	90 gal (341.1 L)	286 lb (130 kg)	34 gal (128.9 L)
TAXV-200/U	1 in.	24 in. (609.6 mm)	63 in. (1600 mm)	110 gal (416.9 L)	326 lb (148.2 kg)	34 gal (128.9 L)
TAXV-240/U	1 in.	30 in. (762 mm)	49 1/8 in. (1368.4 mm)	132.0 gal (500.3 L)	456 lb (207.3 kg)	46 gal (174.3 L)
TAXV-260/U	1 in.	30 in. (762 mm)	49 1/8 in. (1247.8 mm)	158.0 gal (500.3 L)	435 lb (207.3 kg)	56 gal (174.3 L)
TAXV-280/U	1 in.	30 in. (762 mm)	49 1/8 in. (1247.8 mm)	211.0 gal (500.3 L)	435 lb (207.3 kg)	84 gal (174.3 L)