

Features

- Straight through piping connections
- Unaffected by sudden or wide pressure changes
- Responds quickly to condensate load changes
- Continuous discharge
- Function is not impaired by high back pressure
- Energy efficient
- Simple construction
- On-line repair
- Large air handling capacity
- Conforms to Federal Spec. WWT-696

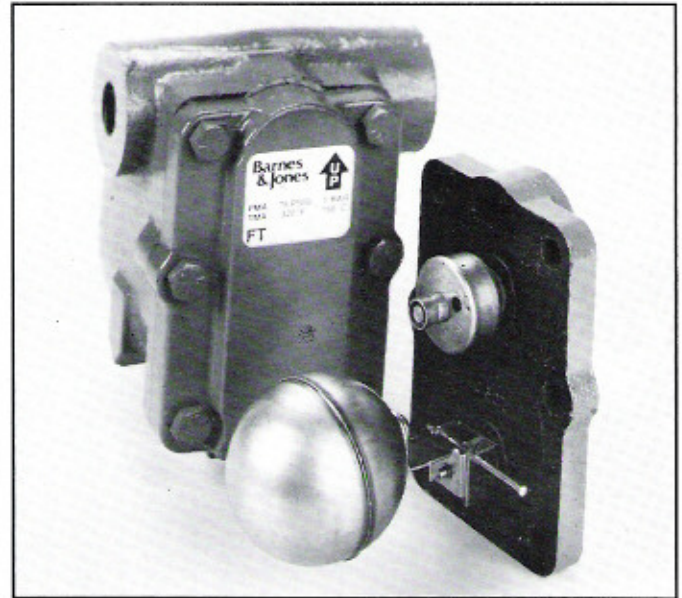
Description

The Barnes & Jones In-line float & thermostatic traps Series FTI-2000 are designed for all types of low pressure or vacuum steam heating systems and steam process equipment. Typical applications include; unit heaters, space heaters, water heaters, pressing machines, low pressure mains and risers, and replacement of inefficient inverted bucket traps.

In-line float and thermostatic traps are especially well suited for apartments, hospitals, office buildings, and schools or wherever quiet operation is necessary.

Operation

The opening and closing of the valve is caused by changes in the condensate level within the trap shell.



When the water level drops, the weight of the float closes the valve. As condensate enters the traps, the float rises and opens the valve, allowing the condensate to be discharged. The float is designed to provide sufficient buoyancy to overcome the differential pressure across the valve. The internal float and valve configuration is such that the condensate level is always above the valve, creating a continuous water seal at the seat.

Air and other gases are freely discharged as they reach the trap through the air vent. The calibrated thermostatic element will close the air vent immediately when the temperature surrounding the element reaches saturated steam temperature.

MATERIALS

| Part | Description |
|---------|-------------------------------|
| Head | Cast Iron, ASTM-A278 Class 30 |
| Body | Cast Iron, ASTM-A278 Class 30 |
| Bolting | Steel, Grade 5 |
| Gaskets | Compressed Graphite |
| Float | Stainless Steel |
| Plug | Stainless Steel |
| Seat | Stainless Steel |

Construction

Barnes & Jones In-line float and thermostatic traps are compact, of rugged design, with easy access to all interior parts. The body is cast with in-line pipe connections for simple straight through pipe hook-ups. The air vent valve, seat, and the complete valve mechanism are manufactured from stainless steel. The repair kit consists of a complete, factory assembled head which simply bolts on to the body for ease of repair. No pipe connections need to be broken.

CAPACITIES (Gross) lbs. condensate per hour

| Pipe Size | Model No. | Pressure Differential (PSIG) | | | | | | | | | | | | | | |
|-----------|------------|------------------------------|------|------|------|------|------|-------|------|------|-------|------|------|------|------|------|
| | | ½ | ¾ | 1 | 2 | 5 | 10 | 15 | 20 | 25 | 30 | 40 | 50 | 75 | 100 | 125 |
| ½" | FTI-2015-2 | 293 | 387 | 513 | 683 | 824 | 1050 | 1129 | - | - | - | - | - | - | - | - |
| ¾" | FTI-2015-3 | 293 | 387 | 513 | 683 | 824 | 1050 | 1129 | - | - | - | - | - | - | - | - |
| 1" | FTI-2015-4 | 293 | 387 | 513 | 683 | 824 | 1050 | 1129 | - | - | - | - | - | - | - | - |
| 1¼" | FTI-2015-5 | 630 | 808 | 1029 | 1302 | 1722 | 2100 | 2457 | - | - | - | - | - | - | - | - |
| 1½" | FTI-2015-6 | 1155 | 1785 | 2520 | 3465 | 5250 | 6930 | 7980 | - | - | - | - | - | - | - | - |
| 2" | FTI-2015-8 | 2415 | 2940 | 3780 | 4883 | 7245 | 9450 | 11445 | - | - | - | - | - | - | - | - |
| ½" | FTI-2030-2 | 293 | 387 | 513 | 683 | 824 | 1050 | 1129 | 1271 | 1375 | 1439 | - | - | - | - | - |
| ¾" | FTI-2030-3 | 293 | 387 | 513 | 683 | 824 | 1050 | 1129 | 1271 | 1375 | 1439 | - | - | - | - | - |
| 1" | FTI-2030-4 | 293 | 387 | 513 | 683 | 824 | 1050 | 1129 | 1271 | 1375 | 1439 | - | - | - | - | - |
| 1¼" | FTI-2030-5 | 394 | 525 | 725 | 956 | 1260 | 1575 | 1764 | 1890 | 1995 | 2100 | - | - | - | - | - |
| 1½" | FTI-2030-6 | 1050 | 1365 | 1785 | 2415 | 3570 | 4830 | 5775 | 6300 | 6930 | 7350 | - | - | - | - | - |
| 2" | FTI-2030-8 | 1365 | 1890 | 2625 | 3570 | 5460 | 7140 | 8190 | 9030 | 9765 | 10500 | - | - | - | - | - |
| ½" | FTI-2075-2 | 168 | 224 | 294 | 383 | 546 | 735 | 835 | 919 | 977 | 1019 | 1176 | 1292 | 1523 | - | - |
| ¾" | FTI-2075-3 | 168 | 224 | 294 | 383 | 546 | 735 | 835 | 919 | 977 | 1019 | 1176 | 1292 | 1523 | - | - |
| 1" | FTI-2075-4 | 168 | 224 | 294 | 383 | 546 | 735 | 835 | 919 | 977 | 1019 | 1176 | 1292 | 1523 | - | - |
| 1¼" | FTI-2075-5 | 410 | 578 | 667 | 956 | 1397 | 1943 | 2258 | 2520 | 2730 | 2940 | 3203 | 3465 | 3990 | - | - |
| 1½" | FTI-2075-6 | 557 | 761 | 1008 | 1365 | 1995 | 2783 | 3203 | 3570 | 3885 | 4200 | 4620 | 4988 | 5670 | - | - |
| 2" | FTI-2075-8 | 893 | 1155 | 1575 | 2100 | 3255 | 4358 | 4987 | 5460 | 5775 | 6090 | 6720 | 7140 | 8085 | - | - |
| ½" | FTI-2125-2 | 105 | 142 | 184 | 242 | 347 | 436 | 525 | 593 | 651 | 698 | 788 | 872 | 1019 | 1166 | 1249 |
| ¾" | FTI-2125-3 | 105 | 142 | 184 | 242 | 347 | 436 | 525 | 593 | 651 | 698 | 788 | 872 | 1019 | 1166 | 1249 |
| 1" | FTI-2125-4 | 105 | 142 | 184 | 242 | 347 | 436 | 525 | 593 | 651 | 698 | 788 | 872 | 1019 | 1166 | 1249 |
| 1¼" | FTI-2125-5 | 294 | 389 | 504 | 662 | 956 | 1260 | 1523 | 1733 | 1864 | 1995 | 2179 | 2363 | 2783 | 3098 | 3308 |
| 1½" | FTI-2125-6 | 420 | 546 | 714 | 935 | 1365 | 1785 | 2153 | 2415 | 2625 | 2835 | 3150 | 3360 | 3990 | 4410 | 4725 |
| 2" | FTI-2125-8 | 578 | 709 | 924 | 1286 | 2048 | 2730 | 3150 | 3413 | 3675 | 3990 | 4410 | 4850 | 5775 | 6405 | 6930 |

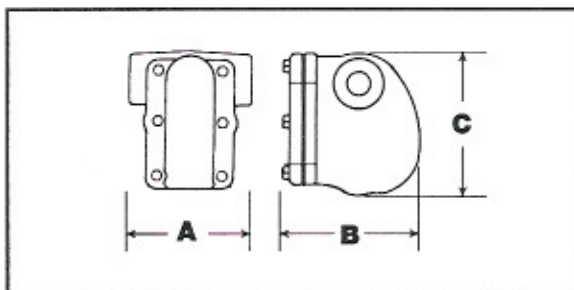
Note on capacity: Trap capacities are based on continuous discharge at steam temperatures. The published figures are the result of an extensive testing program conducted in accordance with ANSI/ASME PTC 39.1-1980, *Condensate Removal Devices for Steam Systems*, at the Barnes and Jones factory. Significantly greater applications are realized when condensate temperature is below saturated steam temperature. A safety factor between 2-4 should be applied to these ratings.

NOTE: FLOAT TRAPS are available for those applications where draining liquids is the only requirement of the trap. In those instances the thermostatic air vent is replaced by a solid plug. To order, use the previous model number with the prefix "FI" instead of "FTI". All pipe sizes and pressure ratings are available.

DIMENSIONS

| Size | Models | A | B | C | WT. |
|-------|----------|----|-------|------|-----|
| ½"-1" | FTI-2015 | 5" | 6.25" | 6.5" | 11# |
| ¾"-1" | FTI-2030 | 5" | 6.25" | 6.5" | 11# |
| ½"-1" | FTI-2075 | 5" | 6.25" | 6.5" | 11# |
| ½"-1" | FTI-2125 | 5" | 6.25" | 6.5" | 11# |
| 1¼" | FTI-2015 | 5" | 6.25" | 6.5" | 11# |
| 1¼" | FTI-2030 | 5" | 6.25" | 6.5" | 11# |

FTI-2000



DIMENSIONS

| Size | Models | A | B | C | WT. |
|--------|----------|------|-------|-------|-----|
| 1¼" | FTI-2075 | 7.5" | 10.5" | 11.5" | 48# |
| 1¼" | FTI-2125 | 7.5" | 10.5" | 11.5" | 48# |
| 1½"-2" | FTI-2015 | 7.5" | 10.5" | 11.5" | 47# |
| 1½"-2" | FTI-2030 | 7.5" | 10.5" | 11.5" | 47# |
| 1½"-2" | FTI-2075 | 7.5" | 10.5" | 11.5" | 47# |
| 1½"-2" | FTI-2125 | 7.5" | 10.5" | 11.5" | 47# |

FTI-2000

