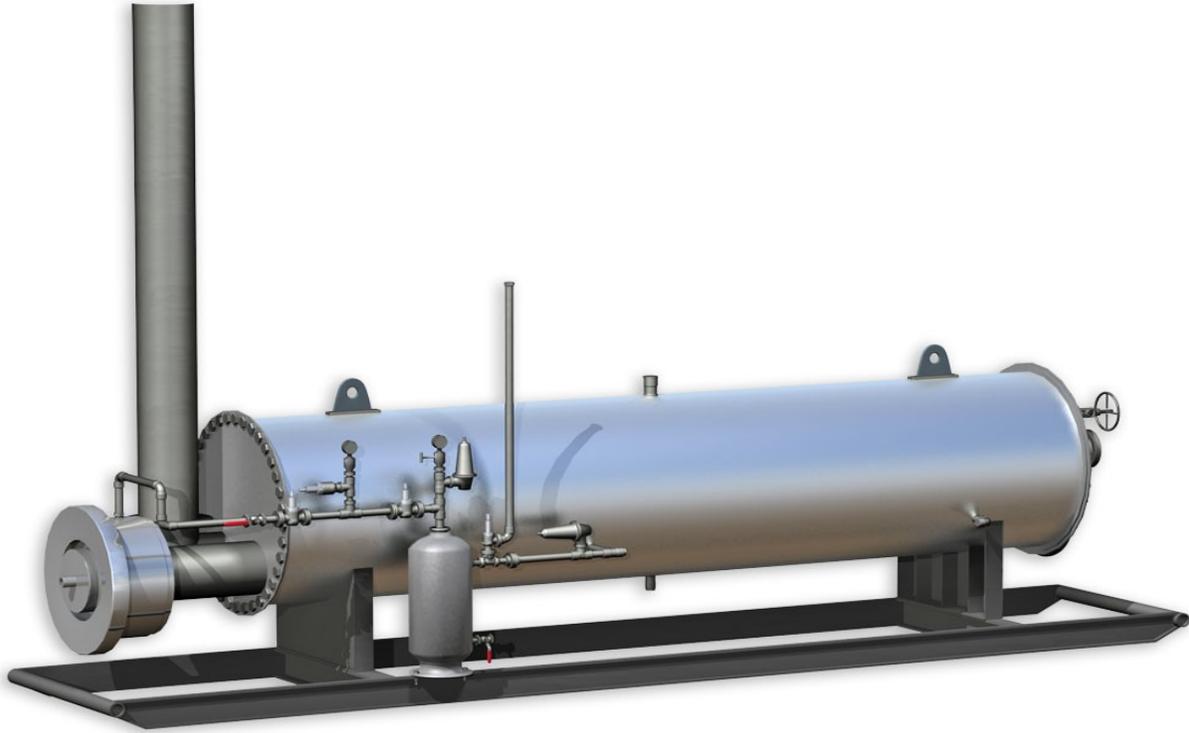


# Indirect Line Heater



## How it Works

The Line Heater consists of three components: shell, firetube and coil. The process stream flows through the coil, which is immersed in the upper portion of the liquid media bath of the shell. The coil preheats the flow stream before reducing the pressure across a restricting choke followed by post-heating coils. Fuel gas is burned in the firetube and indirectly transfers heat to the media, then to the coil, and finally to the process stream.

# Line Heater

Exterran Line Heaters help you maintain an optimal temperature in your well stream as pressures are rapidly reduced to sales line requirements. They counteract the effect of abrupt temperature drop that occurs when the well stream passes through the pressure-reducing choke. They can also be used to heat gas transmission lines. Exterran Line Heaters can also be used for heating crude oil. Standard pre-assembled packages include coil, heater and fuel gas system and have rated capacities up to 4.0 MM BTU/hr. We can also customize a variety of coil arrangements and design pressures up to 15,000 psig, to help you achieve the most economical and efficient combination.

## Performance

- Helps to prevent formation of hydrates during wellstream pressure reduction
- Regulates process temperature to increase performance of downstream equipment

## Value

- Engineered lifting lugs for ease of installation and safety
- In-stock inventory of pre-assembled units allows fast delivery, installation and startup
- Latest API design and construction standards help ensure high performance and safety

## Confidence

- Added assurance of a warranty that runs 12 months from startup or 18 months from delivery, whichever comes first
- Prompt, professional service, support and spare parts from local technicians in or near every major oil & gas producing region in the U.S. and numerous areas around the world

### Standard Features & Options

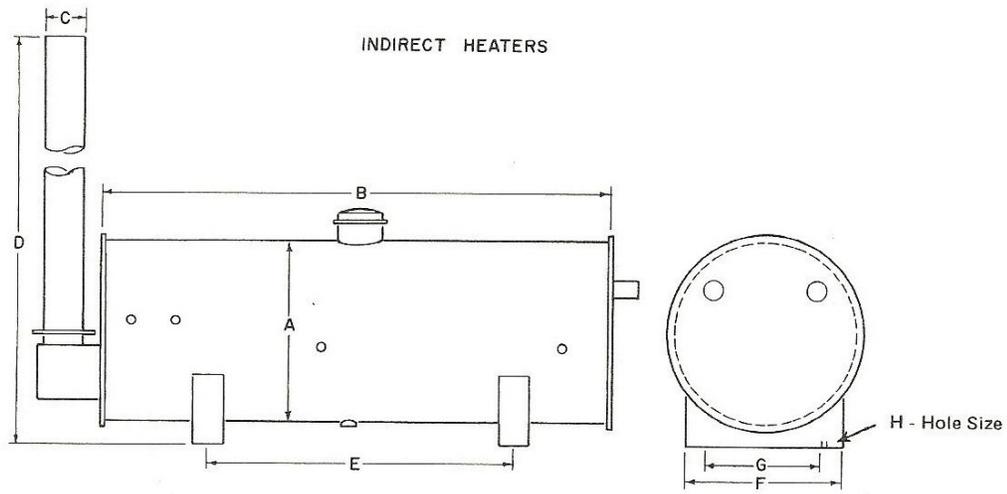
#### Standard Features

- ▶ Heater shell with support saddles and lifting lugs
- ▶ Removable U-bend type firetube
- ▶ Removable firetube stack
- ▶ Removable wellstream flow coil
- ▶ High efficiency burner with pilot light and removable flame arrestor
- ▶ ASME code-stamped, 250 psig fuel gas scrubber with internal high level safety shutdown valve
- ▶ Fuel gas manifold with preheat coil and high and low pressure regulators
- ▶ Pre-piped fuel gas manifold with preheat coil
- ▶ Pressure gauge with isolating valve
- ▶ Temperature controller with thermowell
- ▶ Thermometer with thermowell
- ▶ Shell fill connection
- ▶ High quality enamel paint system

#### Options

- ▶ Down-draft diverter
- ▶ Stack arrestor
- ▶ High bath temperature shutdown
- ▶ Energy conserving shop-installed fiberglass shell insulation with aluminum jacketing and vapor barrier
- ▶ Dry leg fuel gas thief to source fuel for remote locations
- ▶ Burner safety low (BSL)/igniter with optional solar panel
- ▶ Pilot and diaphragm actuated choke valve
- ▶ Special wellstream coils include multi-well and working pressures up to 15,000 psig
- ▶ Inlet/outlet connections may be flanged, beveled for welding, or threaded
- ▶ Heavy-duty oil-field type, I-beam skid
- ▶ Containment skid
- ▶ Expansion tank
- ▶ Special paints and coatings
- ▶ Sour gas service designed and built to NACE standards
- ▶ Customization to meet additional specifications

NOTE: Pre-engineered designs may not be suitable for all operating and gas conditions, which must be accurately and completely provided at the time of order placement.



**NOMINAL DIMENSIONAL DATA**

Heater	A	B	C	D	E	F	G	H
BTU HR.	Ft. In.	In.						
250,000	2'-0"	7'-6"	0'-8"	12'-1"	5'-6"	1'-9"	1'-5"	3/4"
500,000	2'-6"	10'-0"	0'-10"	17'-3"	6'-0"	1'-9"	1'-5"	11/16"
750,000	3'-0"	12'-0"	0'-12"	17'-9"	6'-0"	2'-2"	1'-10"	11/16"
1,000,000	3'-6"	14'-4"	1'-2"	17'-7"	11'-0"	3'-0"	2'-4"	3/4"
1,500,000	4'-0"	17'-6"	1'-4"	23'-0"	12'-6"	3'-6"	3'-0"	3/4"
2,000,000	5'-0"	20'-0"	1'-8"	18'-5"	12'-6"	4'-4"	3'-0"	7/8"

**SPECIFICATIONS**

Heater Furnace Input BTU/HR.	Shell Size O.D. x Lgt.	Std. No. & Size Tubes	Coil W.P. PSI	Std. Mean Coil Area Sq. Ft.	Approx. Coil Lin. Ft.	Water Fill Vol. Bbls.	Shipping Weight Pounds
250,000	24" x 7'-6"	8-2"XH	3372	29.5	54	2.9	1,400
250,000	24" x 7'-6"	8-2"XXH	6747	26.5	54	2.9	1,610
500,000	30" x 10'-0"	8-2"XH	3372	42.6	76	6.0	2,210
500,000	30" x 10'-0"	8-2"XXH	6747	38.3	76	6.0	2,510
750,000	36" x 12'-0"	10-2"XH	3372	64.4	114	10.5	2,875
750,000	36" x 12'-0"	10-2"XXH	6747	58.0	114	10.5	3,325
750,000	36" x 12'-0"	6-3"XH	3150	59.4	70.9	10.3	3,030
750,000	36" x 12'-0"	6-3"XXH	6300	58.8	70.9	10.3	3,615
1,000,000	42" x 14'-4"	12-2"XH	3372	93.4	166	17.9	4,060
1,000,000	42" x 14'-4"	12-2"XXH	6747	85.9	166	17.9	4,725
1,000,000	42" x 14'-4"	8-3"XH	3150	94.8	113.2	17.5	4,390
1,000,000	42" x 14'-4"	8-3"XXH	6300	85.9	113.2	17.5	5,335
1,500,000	48" x 17'-6"	14-2"XH	3372	134.0	237	28.7	5,650
1,500,000	48" x 17'-6"	14-2"XXH	6747	120.5	237	28.7	6,600
1,500,000	48" x 17'-6"	10-3"XH	3150	145.0	173.1	28.0	6,235
1,500,000	48" x 17'-6"	10-3"XXH	6300	131.4	173.1	28.0	7,675
2,000,000	60" x 20'-0"	16-2"XH	3372	175.7	311	51.8	10,110
2,000,000	60" x 20'-0"	16-2"XXH	6747	158.0	311	51.8	11,360
2,000,000	60" x 20'-0"	10-3"XH	3150	165.9	198.1	51.2	10,580
2,000,000	60" x 20'-0"	10-3"XXH	6300	150.4	198.1	51.2	12,240

