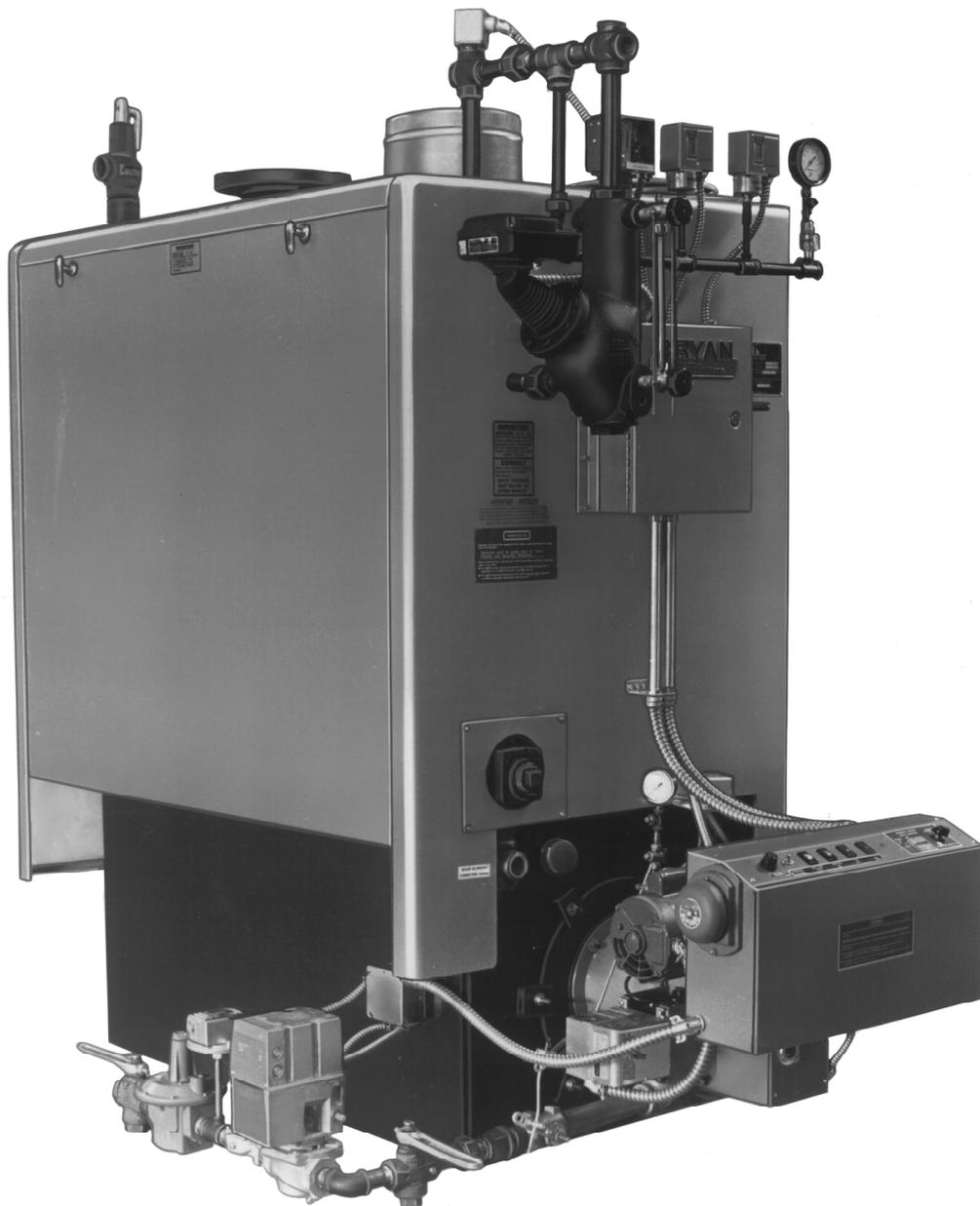


# Bryan "Flexible Water Tube" CL Series Steam Boilers

750,000 to 2,700,000 BTUH  
Forced draft gas, oil or dual fuel fired



**B** **BRYAN BOILERS**

*Originators of the "Flexible Water Tube" design*





# Bryan's CL Series gas, oil or dual fuel fired steam boilers for many commercial and industrial applications

Bryan flexible water tube steam boilers are ideally suited for steam space heating systems as well as either high or low pressure process steam. Hospitals, dairies, restaurants, laundries, dry cleaners, food processing, tire recapping and metal plating are just a few of the many applications.

All Bryan boilers are built in accordance with the requirements of the ASME Boiler and Pressure Vessel Code.

## Efficient "Flexible Water Tube" design

The Bryan bent water tube provides rapid internal circulation — for maximum heat transfer and operating efficiency. Flexible — no thermal shock.

## Easily replaceable tubes

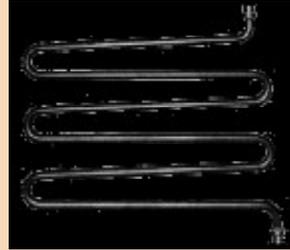
Tubes are easily removable and replaceable without welding or rolling. Requires little service space.

## Steam release area

Large, full-size steam drum provides for dry steam and stable water level.

## Natural internal circulation

Water tube design and the large downcomer legs provide positive internal circulation.



*Featuring Bryan's exclusive "Flexible Water Tube" design*

## Compact — minimum floor space

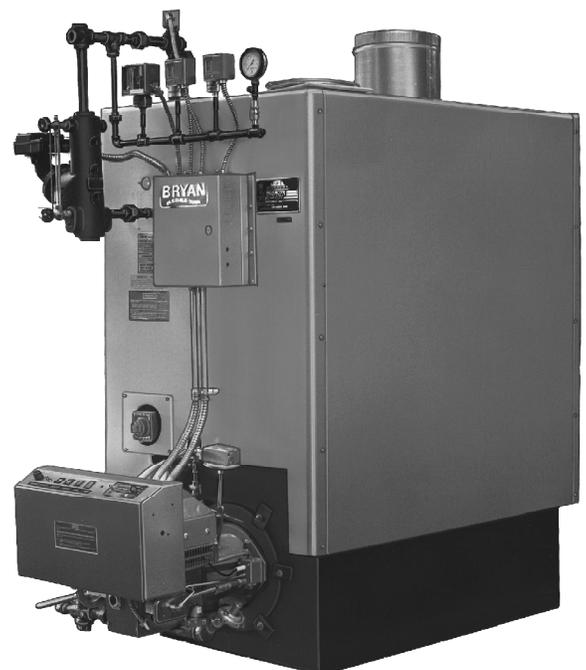
Unit requires less floor space than most boilers, permitting minimum boiler room size. Shipped completely assembled and wired.

## High or low pressure construction

Boiler is constructed as standard for either 15 psi or 150 psi maximum working pressure. Also available for higher pressures to 300 psi.

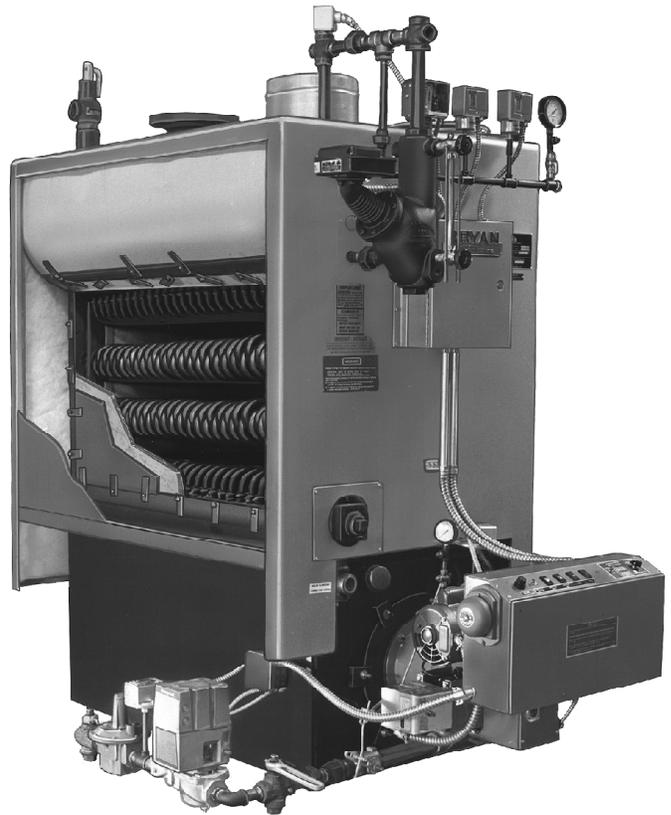
## Bryan CL Series Steam Boiler Specifications

BOILER MODEL NUMBER	INPUT		NOMINAL OUTPUT		LBS. STEAM PER HOUR FROM & AT 212°F	HEATING SURFACE SQ. FT.	SHIPPING WEIGHTS (POUNDS)
	MBH	OIL GALLONS PER HOUR	MBH	BOILER H.P.			
CL-90-S	900	6.4	720	21	740	110	2,200
CL-120-S	1,200	8.6	960	29	990	145	2,600
CL-150-S	1,500	10.7	1,200	36	1,235	180	3,100
CL-210-S	2,100	15.0	1,680	50	1,730	251	4,200
CL-270-S	2,700	19.3	2,160	64	2,225	322	5,200



## Construction features

- A. Heavy steel boiler frame, built and stamped in accordance with the ASME boiler code. Constructed as standard for operating pressures of 15 psi or 150 psi. Also available for higher operating pressures. Large steam release area for dry steam.
- B. Water leg downcomers to insure rapid internal circulation.
- C. Bryan bent water tubes, flexible, easily replaceable, requiring no welding or rolling. Tubes installed from one side.
- D. Boiler tube access panel. Constructed of high temperature insulation in steel framework.
- E. Access panels. Interior of boiler easily accessible for service and inspection. Entire tube assembly completely accessible.
- F. Boiler jacket, heavy gauge zinc coated, and attractive enamel.
- G. Flange-mounted forced draft gas, oil or dual-fuel fired burner.
- H. Jacket insulation, heavy fiberglass to insure cool jacket surfaces.
- I. All controls factory installed and wired.
- J. Steel plate boiler base with high temperature insulating firebrick — designed for maximum combustion efficiency.



## Bryan CL Series Boilers Standard and Optional Equipment

### STANDARD EQUIPMENT FURNISHED

#### Gas fired, forced draft

Combination low water cutoff and pump control, auxiliary low water cutoff, high limit pressure control, ASME-rated safety valve, water glass set, electronic pilot safety controls, automatic operating gas valve, safety gas valve, pilot solenoid valve, flame rod and pilot ignition assembly, main manual shutoff valve, pilot cock, pilot and main gas pressure regulators, air safety switch, steam pressure gauge, steam pressure control, heavy ga. jacket with heavy fiberglass insulation, all controls mounted and wired to terminal strip.

#### Oil fired, forced draft

Combination low water cutoff and pump control, auxiliary low water cutoff, high limit pressure control, ASME-rated safety valve, water glass set, electronic combustion safety control, oil valve, oil ignition transformer, two-stage fuel unit, oil ignition and nozzle assembly,

bly, steam pressure gauge, steam pressure control, heavy ga. jacket with heavy fiberglass insulation, all controls mounted and wired to terminal strip.

#### Combination gas-oil forced draft

Combination low water cutoff and pump control, auxiliary low water cutoff, high limit pressure control, ASME-rated safety valve, water glass set, electronic combustion safety control, automatic operating gas valve, safety gas valve, pilot solenoid valve, flame rod and pilot ignition assembly, main manual gas shutoff valve, pilot cock, pilot and main gas pressure regulators, air safety switch, manual fuel selector switch, oil valve, oil ignition transformer, two-stage fuel unit, oil ignition and nozzle assembly, steam pressure gauge, steam pressure control, heavy ga. jacket with heavy fiberglass insulation, all controls mounted and wired to terminal strip

### OPTIONAL EQUIPMENT, EXTRA COST

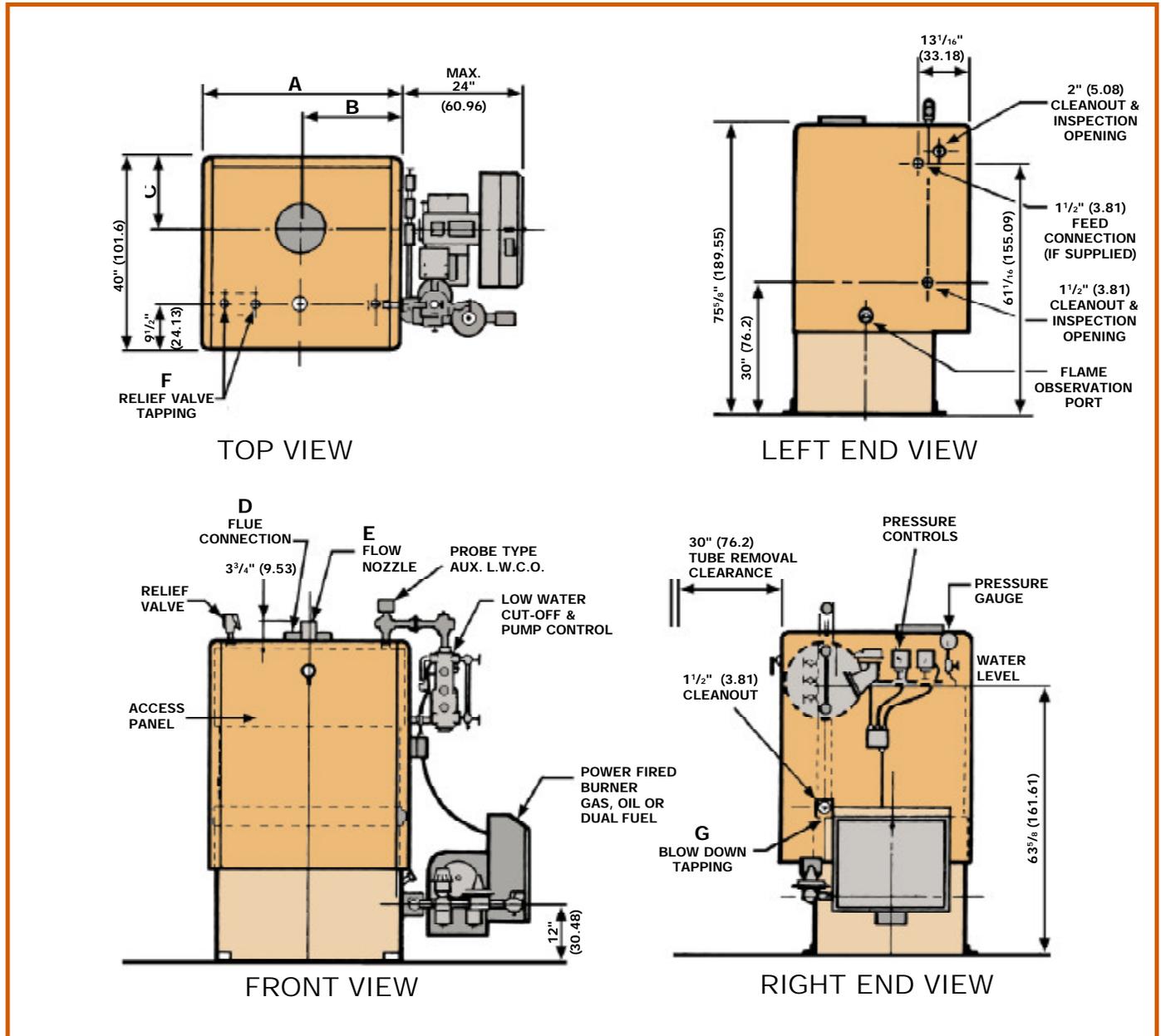
- [1] Extra pressure control for high limit, manual reset, installed.
- [2] High-Low-Off, two-stage firing controls, one fuel-two fuels

- [3] Low fire start
- [4] Low water alarm bell
- [5] FM, IRI or other insurance-approved control systems
- [6] Electrical power—other than standard (specify voltage)
- [7] Indicating lights—as desired
- [8] Condensate return and boiler feed systems
- [9] Boiler and control blow-down assembly
- [10] Induced draft fans
- [11] Heat exchanger coils for domestic water or other purposes (with 15 PSI-rated units only).

#### When ordering, please specify:

- [1] Electric power voltage and frequency
- [2] Low pressure 15 psi, or high pressure, 150 psi construction
- [3] Type of fuel, BTU content, specific gravity and pressure(s) available
- [4] Optional extra equipment or construction and special approvals required (FM, IRI, CSD-1, etc.)

# Bryan CL Series Gas, Oil, or Dual Fuel Fired Steam Boilers



## DIMENSIONS (IN INCHES)

BOILER MODEL NUMBER	A	B	C	D	E		F		G	
	LENGTH OVER JACKET	FLUE LOCATION	FLUE LOCATION	FLUE SIZE	Flow Nozzle		Relief Valve Tapping		Blowdown Tapping	
					15 PSI	150 PSI	15 PSI	150 PSI	15 PSI	150 PSI
CL-90-S	41 1/2	20 3/4	12	10	4" Flg.	2" NPT	2"	2"	1	1
CL-120-S	50 3/4	25 3/8	12	10	6" Flg.	3" NPT	2"	2"	1 1/4	1
CL-150-S	59 3/4	29 7/8	12	12	6" Flg.	3" NPT	2"	2"	1 1/4	1
CL-210-S	78 1/4	39 1/8	12	14	6" Flg.	3" NPT	Two 2"	Two 2"	1 1/2	1
CL-270-S	96 3/4	48 3/8	12	16	6" Flg.	3" NPT	Two 2"	Two 2"	1 1/2	1

Dimensions and specifications are subject to change without notice. Consult factory for certified dimensions.



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