

The McDonnell & Miller

Self-Cleaning

Duplex Boiler Feeder

McDonnell & Miller

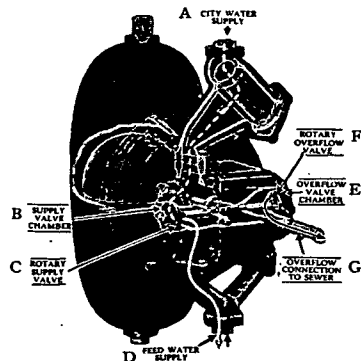


General Offices
Wrigley Building, Chicago
Grand Central Terminal, New York

Dependable Boiler Protection:

The McDonnell & Miller Self-Cleaning Duplex Boiler Feeder automatically maintains the correct water level in steam, vapor or vacuum heating boilers regardless of how hard the boiler is being pushed and even in the event that the condensation pump stops. Its action is totally independent of operating skill and attention.

By keeping the boiler water line where it belongs the McDonnell & Miller Duplex Feeder is a positive, mechanical protection against burned boilers or cracked sections.



How it operates:

City water enters feeder at (A), passes through large strainer and then to valve chamber (B).

When boiler water line drops, causing corresponding drop in float chamber, the float, in dropping, turns the rotary valve disc, thus opening the supply valve (C), allowing city water to pass through the manifold and into the boiler feed line connected at (D).

If condensation returning to the boiler causes water line to rise abnormally, a corresponding rise occurs in feeder float chamber. The float, in rising opens the rotary overflow valve (F) in overflow valve chamber (E), permitting excess water to discharge to sewer at (G).

Positive, Continuous Operation:

Continuous and dependable operation of the McDonnell & Miller Duplex Boiler Feeder is assured by these exclusive features:

1. Self-Cleaning Valves—cast bronze discs turning on Monel metal seats which grind and clean themselves every time float moves.
2. Full adjustment after installation—permitting a change in water line of one inch higher or lower, and an adjustment of differentials between supply and overflow levels of from 1 to 5 in.

3. Large Capacity—full city water pressure is put into the boiler feed line. The feeder will supply the entire requirements of any boiler even when condensation pump is not operating.

4. Greatest Simplicity—only one moving unit; fewer parts more finely made.

5. Complete oscillating movement on two bronze bearings, instead of sliding movement. Therefore, no possibility of sticking.

Service Conditions:

The McDonnell & Miller Self-Cleaning Duplex Feeder is adaptable to all low pressure heating boiler conditions.

The standard type is suitable for all boilers up to and including 14,500 sq. ft. where differential pressure is 30 lb. or above. For larger boilers, and where the

differential pressure is low the McDonnell & Miller Special Type will be furnished.

Maximum allowable steam pressure is 20 lb. Water pressure should always be at least 5 lb. higher than steam pressure.

Each feeder is packed in sturdy, individual crate with complete instructions for installation.

Typical Specifications:

Furnish and install on each (low pressure heating) boiler One McDONNELL & MILLER Self-Cleaning Rotary Valve Duplex Boiler Feeder.

Rotary Valves to be adjustable to provide for a differential of from one to five inches between feed and overflow levels.

Self-Cleaning Duplex Feeders to have sufficient capacity for furnishing the entire amount of feed water required by the boiler when all of the condensation is wasted to the sewer, and at _____ lb. steam pressure and _____ lb. city water pressure.

Installation to be made in accordance with diagrams and detailed instruction sheet furnished by the manufacturers.

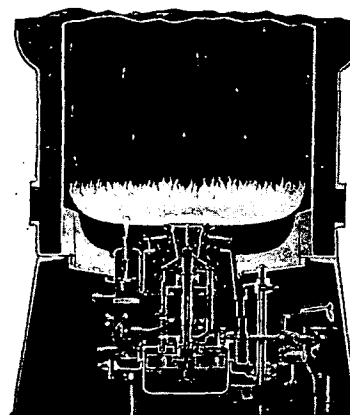
Automatic Burner Corporation

312 North May Street, Chicago, Ill.



The Automatic Burner Corporation are leading manufacturers of the rotary, in-the-ashpit type of oil burner. This principal—now acknowledged to be the simplest and most efficient for domestic oil burning—was originated seven years ago. Thousands of dollars have been expended in developing ABC, and its little brother, the Heat King, to their present simplicity and economical efficiency.

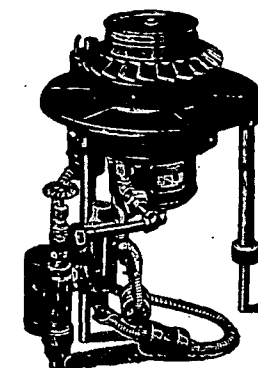
The Department of Engineering Research, University of Michigan, made some efficiency tests on June 15, 1928, with ABC installed in a DuBrie warm air furnace. ABC developed the high efficiency of 84.44 per cent.



Cross section of ABC in a round boiler



Heat King is the burner for every man—
for every man can afford the Heat King.



Heat King is the climax of seven years of concentrated research. Simple, rigidly built, economical to operate. Heat King is the burner for the man who counts his dollars and demands in return for them guaranteed satisfaction.

Write for more detailed information

	ABC	Heat King
Maximum Steam Radiation	3000	800
Price	\$500 to \$1000	\$350 to \$600