RAY OIL BURNER COMPANY

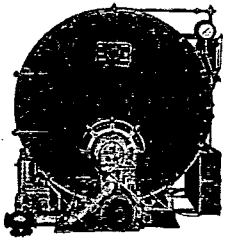
1301 SAN JOSE AVENUE
SAN FRANCISCO 12, CALIFORNIA

Distributors in all principal cities

Plants in: San Francisco, California
Lancaster, Pennsylvania
Toronto, Canada
Wiesbaden, Germany

MANUFACTURERS AND COMBUSTION ENGINEERS SINCE 1872

PACKAGED BOILERS



RAY PACKAGED BOILERS—IMMEDIATE PERFECT PERFORMANCE

Now you can meet your special heating requirements fast and inexpensively with a new, factory-integrated packaged boiler from Ray.

Ray Packaged Boilers come completely wired and piped to cut installation costs. And in a wide range of types and sizes to fit every specification: 20 to 700 hp; fired by oil (No. 2 to No. 6), gas (all types), or combination firing; low or high pressure operation; hot water or steam service; pressure or air atomizing burners; direct or belt driven rotary burners; scotch marine or compact.

ALL RAY PACKAGED BOILERS OFFER THESE FEATURES—

Unmatched efficiency of compact 3-pass boiler design; fully automatic self-monitoring electronic controls; full modulation for high fuel economy; easy access to all firing surfaces without breaking fuel or electrical connections; tubes rolled and beaded for easy cleaning and replacement; forced-draft system that eliminates over-fire draft controls and tall stacks; instant fuel change-over for combination gas-oil firing units; factory tested and ready for immediate utility attachment.

RAY SERIES E

Fully automatic forced draft operation with air-atomizing burner; low or high pressure; dryback design; 40 to 300 hp.*; 80 plus % guaranteed efficiency; self-cleaning fuel nozzle; five to one turn-down ratio; built-in dual fuel pump and reservoir; Viscosity Valve oil metering; complete safety and programming controls. For light or heavy oil, gas or combination gas-oil firing.

RAY HUSKY

Fully automatic forced draft operation; low or high pressure; dryback design with forced draft pressure atomizing burner. 20 to 150 hp.*; low electrical power requirements; full modulation available; complete safety and programming controls; exclusive Ray Ir-RAY-diator; hinged doors. For light oil, gas or combination gas-light oil firing.

BURNHAM-RAY TYPES WB3 & WR3 FORCED DRAFT

Fully automatic forced draft operation with time-tested Ray rotary burner; low pressure wetback or high pressure dryback design; no draft regulating equipment required; hinged doors; 40 to 700 hp.*; large furnace volume; Viscosity Valve and dual pump and reservoir system; complete safety and programming controls. For light or heavy oil, gas or combination gas-light oil firing.

BURNHAM-RAY LOPACT

Space-saving fire-box type; unitized construction; fully automatic forced draft operation; all safety and programming controls standard equipment; exclusive Ray Ir-RAY-diator; 34 to 150 hp.*; large furnace volume. For light oil, No. 4 or light No. 5 oil, gas or combination gas-light oil firing.

* NOTE: special sizes available on request.

BURNERS

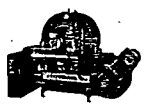
(Oil, Gas and Combination for Domestic, Commercial, Industrial and Marine Uses)



Horizontal Rotary-Direct Drive. Automatic, Semi-automatic or manual. Models to fire any grade fuel oil, or combination gas-oil. 11 sizes with max. capacities 18 to 1150 bhp.



Horizontal Rotary-Belt Drive. Automatic, semi-automatic or manual. Models to fire any grade fuel oil, gas or combination gas-oil. 8 sizes with max. capacities 18 to 465 bhp.



Forced Draft Packaged Burners. Automatic for all grades fuel oil, gas or combination. Factory piped, wired and tested. 9 sizes with max. capacities 40 to 750 bhp.



Pressure Atomizing Burners. Automatic for light oil, No. 4 or Light No. 5 oil (to 100 bhp), or light oil and gas. Flange or pedestal mounting. Electronic controls. 100% air through burner. 5 sizes. Max. capacities 10 to 150 bhp.



Type IG, Inshot Gas Burners. Multi-jet atmospheric type gas burners. Great flexibility. High input ratings. 36 jet arrangements with capacities from 99 to 7512 cfh.



Power Pressure Gas Burners. Automatic for natural gas. Electronic control. 100% air through burner. Excellent flame stability. 4 sizes. Max. capacities 1000 to 6300 cfh.



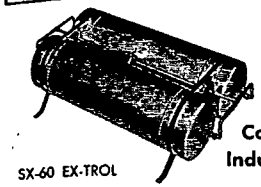
High Pressure Gas Burner. Multi-jet for high pressure natural or manufactured gas. No power needed for mixture of air and gas. 10 sizes. Capacities to 48,000 cfh.



Steam Turbine Driven Horizontal Rotary Burners. Fires any grade of fuel oil. Operated by high pressure steam. 8 sizes with maximum capacities of 90 to 1150 bhp.

EXTROL® PRESSURIZED EXPANSION TANKS and Other Hot Water Heating Specialties

by AMERICAN TUBE AND CONTROLS



SX-60 EX-TROL

SX Series EX-TROL Designed for Commercial and Industrial Systems

The SX EX-TROL Tank is a pressurized diaphragm-type expansion tank that offers positive control of expansion, air, pressure and filling in commercial and industrial hydronic systems. Features include:

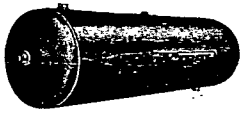
- A permanent air cushion for system expansion.
- Diaphragm is sealed in, preventing air-water contact. Eliminates causes of air contamination and noise in radiation and piping.
- Compact size allows easy installation anywhere on the system, weighs less than conventional tanks, uses fewer fittings and connections.

The SX Series includes the following sizes:

Model Number	Overall Length	Overall Width
SX-20	31"	16"
SX-30	46½"	16"
SX-40	62½"	16"
SX-60	46"	28"
SX-80	62"	28"

Specifications: Max. Working Pressure — 75 PSI; Test Pressure — 100 PSI; Max. Operating Temp. — 240°F; Models SX-60 and SX-80 are preassembled.

ASK FOR BULLETINS 117-E and 118-E



AX EX-TROL

AX Series EX-TROL (ASME)

The AX Series combines the proven advantages of EX-TROL tanks with special construction to conform with requirements of the ASME Unfired Pressure Vessel Code. It may be stamped with the appropriate Code Symbol. The AX Series includes these 11 sizes:

Model No.	Acceptance Vol. (Gals.)	Tank Volume (Gals.)	Length (In.)	Width (In.)
AX-15	3	8	27	10
AX-20	4	11	25	12
AX-40	8	22	48	12
AX-60	12	33	56	14
AX-80	16	44	55	16
AX-100	20	55	68	16
AX-120	24	66	81	16
AX-144	28	77	97	16
AX-180	32	88	51	24
AX-200	40	110	63	24
AX-240	48	132	75	24

Specifications: Max. Working Pressure — 80 PSI; Test Pressure — 200 PSI; Max. Operating Temp. — 240°F; furnished with appropriate ASME Code Stamp.

ASK FOR BULLETIN 117-E

FLOAT TYPE AIR VENTS

American #700 Series Float Vents, with new solid float, are designed for venting all hydronic heating and cooling systems. Unique construction assures fast venting through the entire pressure range with positive shut-off. No separate air chamber is required. Ideal installation includes use of this vent with American Air Purger (see below). Vents are available in two pressure ranges — 0-30 and 0-100 PSI.



Model 700



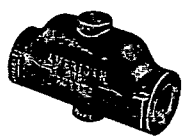
Model 701

Model Number	Pipe Size and Type	Installation Location
700	⅛" MPS — Float Vent up to 30 PSI	Connectors, Mains, Risers
701	⅛" MPS — Float Vent up to 100 PSI	

ASK FOR BULLETIN 700-M

AIR PURGERS

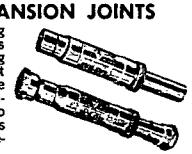
American Air Purgers are of one-piece cast iron construction, scientifically designed to continuously separate and collect any air from circulating water so that it may then be vented automatically by an American Float Vent (above). It eliminates the need for frequent manual venting. It is available in sizes up to 12". Sizes to 3" are threaded, 4" to 12" sizes have standard ASA flange connections.



ASK FOR BULLETIN 400-E

"BASE SLIDE" EXPANSION JOINTS

A piston type, smooth sliding joint suitable for temperatures from 40° to 240° and working pressure up to 125 PSI on hot water and 10 PSI on low pressure steam systems. Available in nominal copper tube sizes from ½" to 2" and nominal female pipe sizes from ¾" to 2". Expansion movement minimum of 2".

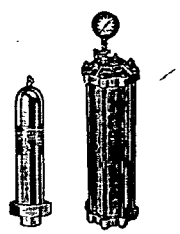


ASK FOR BASE SLIDE BULLETIN

HAMMERTROL® Shock Suppressors

Eliminates water hammer in all piping systems. Combination of permanent air cushion and bronze free-floating piston accepts line surges before damaging shock waves can develop. Available in 3 series, 33 sizes.

Specifications: Copper Cylinder, Bronze Piston, Bronze NPT Connection.
Charge Pressure: 20 PSI (unless otherwise specified).
Working Pressure: 150 PSI.
Test Pressure: 375 PSI.
Max. Operating Temp.: 240°F.
Can be supplied for higher pressures on special order.



504 Series 511 Series

ASK FOR BULLETIN 511-E

AMERICAN TUBE AND CONTROLS

West Warwick, Rhode Island. Tel. 401 828-0100

SPECIALISTS IN THE MANUFACTURE OF HYDRO-PNEUMATIC AND HEAT TRANSFER PRODUCTS FOR THE PLUMBING AND HEATING INDUSTRY