# REZNOR®

**Trusted Heating Solutions** 

# COMET+

Gas and Oil Fired Cabinet Heaters







# COMET+

## **Gas and Oil Fired Cabinet Heaters**

The COMET+ range incorporates the latest generation of heat exchanger technology to become an industry benchmark for design and performance.

High efficiency condensing versions are available for all natural gas fired models giving 101% efficiency and significant fuel savings.

Vertical freestanding models are available from 45kW to 300kW. Cabinets suitable for external use are available as an option. Units can be provided in flat pack format upon request. Contact Reznor for larger outputs and alternative options.

Gas fired cabinet heaters are suitable for use with Natural Gas (G20). Units can also be specified for use with Propane (G31). A high efficiency condensing version (natural gas models only) is available.

Oil fired cabinet heaters are suitable for use with Class D gas oil (35 sec) or Class C2 kerosene (28 sec). Oil fired models are supplied complete with a fire valve and oil filter as loose components.

EC plug fan(s) circulate large air volumes evenly across the full heat exchanger surface for enhanced life expectancy.

The heaters can be supplied with loose long throw discharge nozzles for mounting on the top of the unit, complete with horizontal louvres which can be rotated through 360°. The rear nozzles are raised to assist with air circulation.

Alternatively, the heaters can be supplied for a ducted discharge - suitably sized ductwork can be fitted directly to the top of the heater.

All heaters are suitable for a ducted inlet - suitably sized ductwork can be fitted directly to the unit air inlet opening on the front of the casing.

# **Specification**

#### Cabinet

Cabinets are constructed from a sheet metal frame with galvanised powder coated panels to form a rigid and durable casework. Panels for the heating section are provided with internal insulation along with inner heat shields manufactured from aluminised steel. A cabinet suitable for external use is available as an option.

#### **Fans and Motors**

Plug fans with EC motors are used to provide a good overall electrical efficiency and a consistent airflow across the heat exchanger to improve the heat exchanger efficiency.

#### Heat Exchanger

An inversion combustion chamber with four pass heat exchanger assembly provides improved thermal efficiency with extended life expectancy. The condensing version gives even greater thermal efficiencies and significant fuel savings.

The 304 stainless steel combustion chamber is combined with a high efficiency flat tube heat exchanger to achieve combustion efficiencies of up to 94% (ncv).

The complete heat exchanger assembly is mounted to allow for thermal expansion, thereby avoiding undue thermal stress and premature failure.

#### Burner

Gas fired units are supplied with a fitted high / low fully automatic forced draught burner complete with full safety controls to EN676. Heaters are CE certified and UKCA approved.

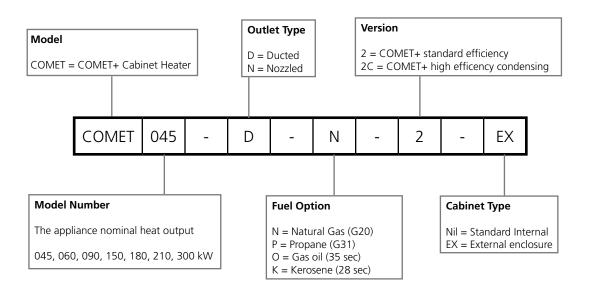
Oil fired units are supplied with a fitted high / low fully automatic burner including safety controls. A fire valve and oil filter are supplied as loose components. An additional external fire valve may be required in accordance with BS 5410:Part2:2018.

#### Controls

Units are controlled via a standard SmartCom controller supplied loose.



COMET+ cabinet heaters are available in a number of different sizes and variants:-



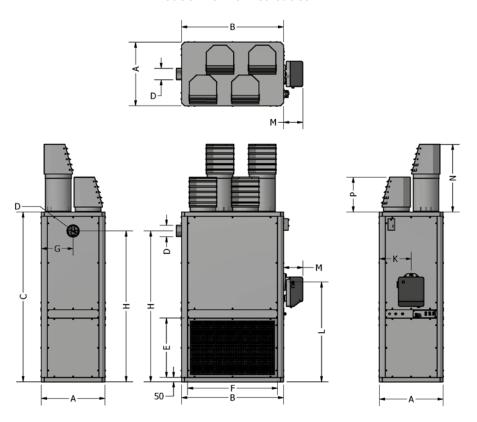
Technical Data							
COMET	045	060	090	150	180	210	300
Heating Data							
Nominal Heat Output (kW)	45	60	90	150	180	210	300
Heat Input (kW)	48	64	96	160	193	225	321
Temperature Rise (°C)	41	41	41	41	41	41	41
Thermal Efficiencies (Nett CV %)	Minimum 93.5%						
NOx Seasonal (mg/kW)	58.2	62.3	65.3	65.9	61	63.5	66.2
Gas Fired							
Gas Consumption Natural Gas (G20) (m³/hr)	4.50	6.00	9.00	14.99	17.99	20.99	29.99
Gas Consumption Propane Gas (G31) (m³/hr)	1.86	2.48	3.72	6.20	7.44	8.67	12.39
Minimum Dynamic Inlet Pressure Nat Gas (G20)	17.5	17.5	17.5	17.5	17.5	17.5	17.5
Minimum Dynamic Inlet Pressure Propane (G31)	37	37	37	37	37	37	37
Gas Connection (Rc)	3/4"	3/4″	3/4″	3/4″	11⁄4″	1¼"	1½"
Oil Fired							
Oil Consumption (Class D gas oil 35 sec)	4.44	5.91	8.87	14.79	17.74	20.70	29.57
Oil Consumption (Class C2 kerosene 28 sec)	TBA						
Oil Connection (Rc)	<sup>3</sup> / <sub>8</sub> "						
Air Handling Data							
Airflow (m³/hr)	3276	4392	6552	10944	13104	15264	21816
Airflow (m³/sec)	0.91	1.22	1.82	3.04	3.64	4.24	6.06
Number of Nozzles	4	4	4	4	4	4	4
Nozzle Throw (m)	26	26	29	38	44	46	48
External Static Pressure (Ducted) (Pa)	250	250	250	250	250	250	250
Fan (kW)	0.65	0.80	1.20	2.50	3.00	3.50	7.50
Full Load Current (A)	1.2	2.3	3.9	4.5	4.8	5.5	11.5
General Data							
Electrical Supply	415 V / 3 Ph / 50 Hz						
Nominal Flue Diameter (mm)	130	130	130	130	200	250	250
Noise Level @ 5m dB(A)	58	62	72	75	76	77	79
Net Weight (kg)	338	343	354	458	497	543	598



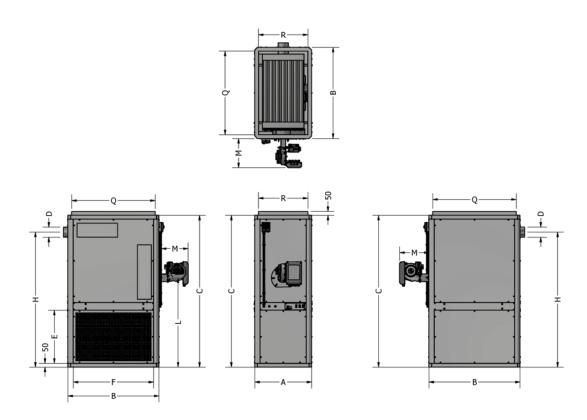
Dimension (mm)							
COMET	045	060	090	150	180	210	300
A - Unit Width	800	800	800	800	950	950	1100
B - Unit Depth	950	950	950	1200	1400	1400	1520
C - Unit Height	2000	2000	2000	2000	2250	2250	2250
D - Flue Diameter	130	130	130	130	200	250	250
E - Intake Duct	650	650	650	650	650	650	650
F - Intake Duct	850	850	850	1100	1300	1300	1420
G - Flue Centre	375	375	375	375	475	475	575
H - Flue Height	1777	1777	1777	1777	1970	1970	1970
K - Burner Centre	375	375	375	375	475	475	575
L - Burner Height	1176	1176	1176	1176	1250	1250	1250
M - Burner Protrusion	230	230	230	230	560	560	560
N - Ext Nozzle Height	798	798	798	798	949	949	949
P - Nozzle Height	409	409	409	409	547	547	547
Q - Duct Outlet	850	850	850	1100	1300	1300	1420
R - Duct Outlet	700	700	700	700	850	850	1000
S - Condensate Size (if fitted)	1"	1"	1"	1"	1"	1"	1"



#### Models with nozzled outlet



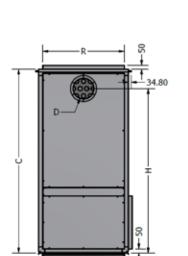
#### Models with ducted outlet

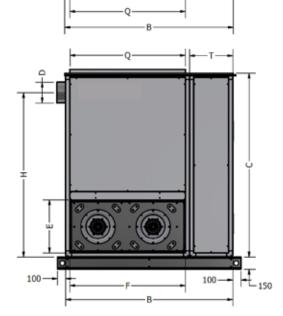


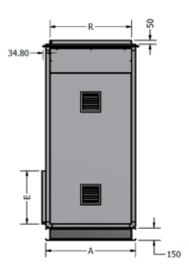


#### **External Vertical Models**









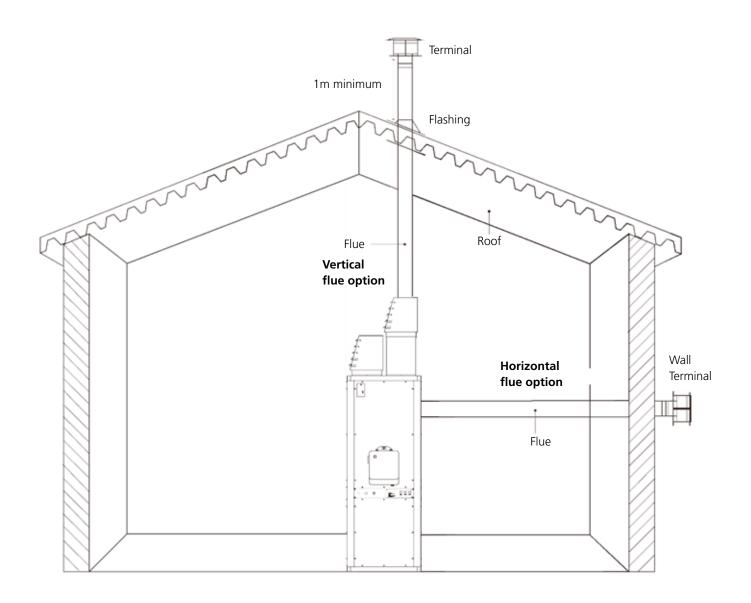
Dimension (mm)							
Models	45	60	90	150	180	210	300
A - Unit Width	800	800	800	800	950	950	1100
B - Unit Depth	950	950	950	1200	1400	1520	1520
C - Unit Height	2000	2000	2000	2000	2250	2250	2250
D - Flue Diameter	130	130	130	130	200	250	250
E - Intake Duct	650	650	650	650	650	650	650
F - Intake Duct	850	850	850	1100	1300	1300	1420
G - Flue Centre	375	375	375	375	475	475	575
H - Flue Height	1777	1777	1777	1777	1970	1970	1970
Q - Duct Outlet	N/A	850	850	1100	1300	1300	1420
R - Duct Outlet	N/A	700	700	700	850	850	1000
S - Condensate Size (if Fitted)	1"	1"	1"	1"	1"	1"	1"
T - Weatherproof Extension	400	400	400	550	550	550	550



#### **Flue Arrangement**

All models are suitable for a vertical flue installation. Alternatively, for models up to size 150 a horizontal flue system can be used. The diagram below shows details. A Ø130mm horizontal flue termination (wall terminal) option is available up to model 150.

The flue connection is located at the rear of the unit as standard. A front flue connection can be provided as an option which must be specified at the time of ordering.



A horizontal flue installation allows for a reduced flue run as there is no requirement to install the flue to the top of the building as with normal conventional flue systems, saving on time and flue materials for the installing contractor.

For further information please see the heater installation manual.

## **About Us**

We are Reznor: We deliver sustainable HVAC products and solutions that improve the environment in which we live and work. We offer the widest and most complete range of HVAC products in the market. Our extensive product range and wealth of knowledge allows us to work with our customers to design the most efficient HVAC solutions to meet their unique requirements.

What does it mean to choose Reznor? With our forward-thinking approach, we're dedicated to fulfilling our customers' needs in the best way possible. We not only design and engineer, we are always ready to support you and truly listen.

## **Our Products**

#### **Unit Heaters**

Suspended gas fired unit heaters with a technically advanced range designed to deliver outstanding energy efficiency and performance for reduced operating and life cycle costs.

#### **Radiant Heaters**

Continuous radiant tube heating systems are created specifically for the application to provide uniform heat coverage over the entire floor area with the ability for the system to cater for distinct zones.

#### Air Curtains

Air curtains are designed for recessed or surface mounting in the doorways of retail commercial premises creating comfortable conditions by providing a powerful downflow of heated ambient air.

#### Controls

Integrated controls
designed to improve
heating performance
and satisfy the growing
need for higher
efficiencies, in turn
aiding the development
of more efficient
heating systems.

### www.reznor.co.uk

We know it's more important than ever to have reliable access to HVAC products and parts. At Reznor, we've listened to our customers needs and now provide an efficient, speedy way of purchasing with a purpose built e-commerce system. This is like no other on the market, with the option to order core range heater units from site as well as a comprehensive range of spare parts.

### **Contact Us**



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