The Zephyr burner is ideal for baking, drying and curing applications. The Zephyr has a 30+ year reputation of being dependable as well as simple to start up and operate. The basic burner includes a flame rod, igniter with 5 foot cable, and integral fan. Three capacities are available with built-in air and fuel control as options. Larger Zephyr sizes are also available (4, 6, and 9 million Btu/hr--see Bulletin 4988).

VALUE-ADDED FEATURES

— Cast iron burner housing
— "Silicone Free" for demanding automotive applications
— Fires natural gas, propane or butane
— Less than 7"wc (178 mm H₂O) gas pressure required at burner inlet
— 50:1 turndown
— Standard tile suitable for 800 F (425 C) chamber temp.
— 304 stainless steel tile (optional) for 1200 F (650 C) chamber temperature
— Low NOx performance - less than 0.1 lb NOx/million Btu (161 mg/m³ at 3% O₂)
— 50/60 Hz integral blower or external blower
— Flame rod and spark plug (with cable) included (UV adapter optional)

BURNER ACCESSORIES

— Blower filter (paper or washable element)
— Control actuators and mounting bracket kits
— Adapter mounting plates and flame protection tubes
— Flame supervision accessories
— 1597 compact fuel train

CONTROL VERSATILITY (options)

— Manual air setting with remote fuel flow control
— Manual air setting with fuel flow control on burner
— Linked air and fuel flow control on burner
Dependable — Easy-to-Use — Rugged Construction

### Capacities

<table>
<thead>
<tr>
<th>Model</th>
<th>Input million Btu/hr (kW)</th>
<th>Flame Length (see note 1) inches (mm)</th>
</tr>
</thead>
<tbody>
<tr>
<td>500-L</td>
<td>0.5 (147)</td>
<td>22 (560)</td>
</tr>
<tr>
<td>500-H</td>
<td>1.0 (293)</td>
<td>26 (660)</td>
</tr>
<tr>
<td>2500-L</td>
<td>2.5 (733)</td>
<td>32 (810)</td>
</tr>
</tbody>
</table>

#### Flame Length

<table>
<thead>
<tr>
<th>Model</th>
<th>Input million Btu/hr (kW)</th>
<th>Flame Length (see note 1) inches (mm)</th>
</tr>
</thead>
<tbody>
<tr>
<td>500</td>
<td>1 (25)</td>
<td>22 (560)</td>
</tr>
<tr>
<td>1000</td>
<td>1.0 (293)</td>
<td>26 (660)</td>
</tr>
<tr>
<td>2500</td>
<td>2.5 (733)</td>
<td>32 (810)</td>
</tr>
</tbody>
</table>

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1. Blower and burner nominal capacity is based on 1" (25 mm) air pressure differential across flame retainer. -L blowers are used for neutral pressure or suction applications.

2. Blower motors are suitable for 50 or 60 Hz operation. Operation with 50 Hz (190/380 V, 3 phase) will decrease the speed, and capacity of the blower. For neutral or suction applications having 50 Hz, select -H model to maintain burner capacity.

3. For the 500 and 1000-L and -H size burners, a 115 V, single phase motor is an option.

4. A UV-based flame supervision system must be designed to ignore spark detection by use of an appropriate flame relay, or other code-compliant means, to prevent interruption of the ignition sequence.

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**AIR and FUEL CONTROL Options**

(specify when ordering)

- internal air damper
  - with manual adjustment
- fuel connection
- fuel flow control components are remote from burner and sold as accessories.

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**Blower SP Power Sound (dBA at 1 m)*

<table>
<thead>
<tr>
<th>Model</th>
<th>SP in. (mm)</th>
<th>Power hp (kW)</th>
<th>Sound (dBA at 1 m)*</th>
</tr>
</thead>
<tbody>
<tr>
<td>500-L</td>
<td>1 (25)</td>
<td>0.33 (0.25)</td>
<td>74</td>
</tr>
<tr>
<td>500-H</td>
<td>3 (76)</td>
<td>0.50 (0.37)</td>
<td>82</td>
</tr>
<tr>
<td>2500-L</td>
<td>1 (25)</td>
<td>1.0 (0.75)</td>
<td>82</td>
</tr>
<tr>
<td>2500-H</td>
<td>4.5 (114)</td>
<td>2.0 (1.49)</td>
<td>87</td>
</tr>
</tbody>
</table>

* Does not include combustion noise.

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**WARNING:** Situations dangerous to personnel and property may exist with the operation and maintenance of any combustion equipment. The presence of fuels, oxidants, hot and cold combustion products, hot surfaces, electrical power in control and ignition circuits, etc., are inherent with any combustion application. Parts of this product may exceed 160°F in operation and present a contact hazard. Fives North American Combustion, Inc. urges compliance with National Safety Standards and Insurance Underwriters’ recommendations, and care in operation.