

# Perfect for Preheating Non-Hygroscopic Materials

For non-hygroscopic materials (like Polyethylene and Polypropylene) compressed air drying and desiccant drying is not necessary. Using simple heated air can remove the surface moisture from the pellets. Hot Air Dryers are a simple system, consisting of a heater, a blower, a temperature controller, and a filter. This system is typically paired with a drying hopper for effective drying of non-hygroscopic resins. The system can also be used for pre- or post-drying of hygroscopic resins that have been, or will be thoroughly dried by a desiccant dehumidifying dryer.

Using a modular design, the HAD system can be easily configured to work with various plant layouts and drying configurations.



HAD Hot Air Dryer

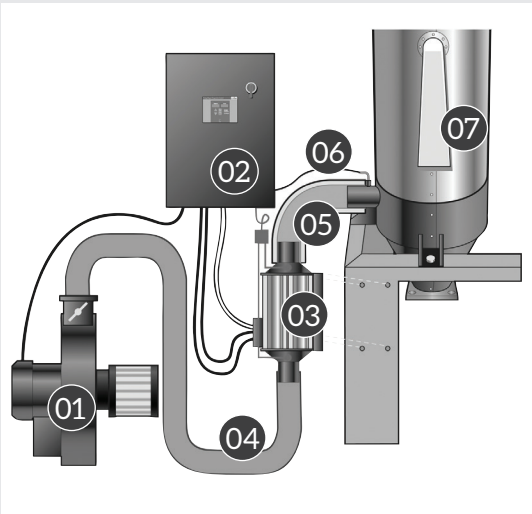
## Remove Surface Moisture with Simple Heated Air

Hot Air Dryers for drying resin use exactly the same drying hoppers as dehumidifying desiccant dryers, and rely on a constant flow of heated air through the hopper to predictably remove surface moisture from the pellets. The only difference is that HAD dryers do not recirculate the air that passes through the hopper. The expelled air passes through an exhaust filter sock.

Conair also offers an integrated housing package, similar to Conair's desiccant dryers, utilizing the heater, blower, inlet filter, and control, into a single, floor standing unit with casters for user portability. These integrated units have CFM capabilities from 75 to 250 cfm, providing throughputs from 150 to 400 lbs/hr.

- ▶ **Designed for preheating non-hygroscopic pellets**  
The HAD was designed to convey continuous heated air for removing surface moisture from pellets that only capture moisture on the pellet surface.
- ▶ **Modular construction**  
Adapting easily to every plant environment is just one advantage of the modular construction. Additionally, the modular construction allows for designing perfect sizing configurations for your process needs.
- ▶ **Throughputs from 600-5000 lbs per hour in the modular units**  
Available in five models to best suit your requirements.
- ▶ **Throughputs from 150-400 lbs per hour in the integrated frame units**  
Available in four models for mobility and smaller throughput needs.
- ▶ **Temperatures up to 250°F**  
Designed to blow the perfect heated air for removing the surface moisture from the pellet without unnecessarily over drying material.

# Features



**01**  
Centrifugal Blower Assembly

**02**  
Control Center

**03**  
Electrical Heater Assembly

**04**  
Hose

**05**  
Insulated Hose

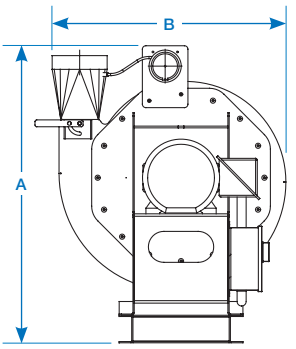
**06**  
Process Temperature RTD

**07**  
Outlet Filter Sock (optional)

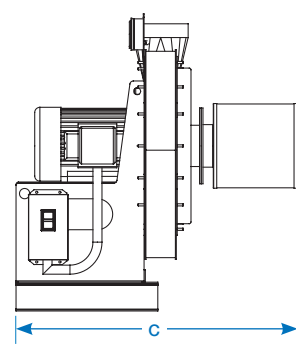
# Specifications

Hot Air Dryer model (HAD)	600	800	1000	1600	2400	3200	5000
Included Model HTC *	HTC-30B †		HTC-30A †	HTC-60A †	HTC-90A †	HTC-120A †	HTC-180A †
<b>Performance characteristics</b>							
Flow rate cfm	300	400	500	800	1200	1600	2500
Disc. pressure @ flow rate							
inches {mm} WC ‡	25 {635}	32 {813}	30 {762}		28 {711}	30 {762}	33 {762}
Motor Hp {kW}	5 {3.7}	7.5 {5.6}			10 {7.5}	15 {11.2}	25 {18.6}
<b>Dimensions inches {cm}</b>							
Outlet size selection (OD)	5			8		12	
A - Height				42 {107}			
B - Width				33 {84}			
C - Length	39 {99}				42 {107}	80 {203}	82 {208}
<b>Approximate weight lb {kg}</b>							
Installed	250 {113}	320 {145}	380 {172}	500 {227}	700 {317}	900 {408}	
<b>Voltages full load amps of blower only §</b>							
400V/3 phase/50 Hz	9.1		13.2		16.8	25.2	40.8
460 V/3 phase/60 Hz	7.6		11.0		14.0	21.0	34.0
575 V/3 phase/60 Hz	6.1		9.0		11.0	17.0	27.0
<b>Noise level **</b>							
with standard soundproofing	< 90 dbA @ 5 ft.						

**HAD Blower**



**Front view**



**Side view**

**Specification Notes**

- \* For single hopper system.
- † The HTC model number reflects the kilowatts of each unit. For example, HTC-60 has a 60 kilowatt heater.
- ‡ The unit of measure WC is water column.
- § Full load amps apply to the Hot Air Dryer (blower) only, see reverse side for heater amp draw.

FLA data for reference purposes only. Does not include any options or accessories on equipment. For full FLA detail for power circuit design of specific machines and systems, refer to the electrical diagrams of the equipment order and the nameplate applied to the machine.

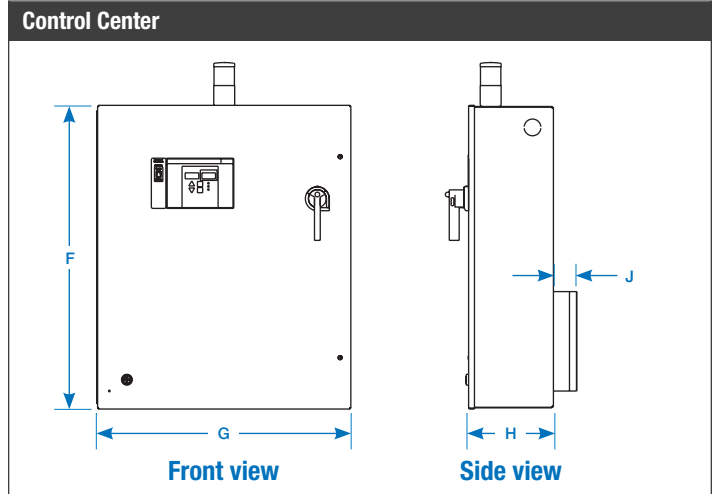
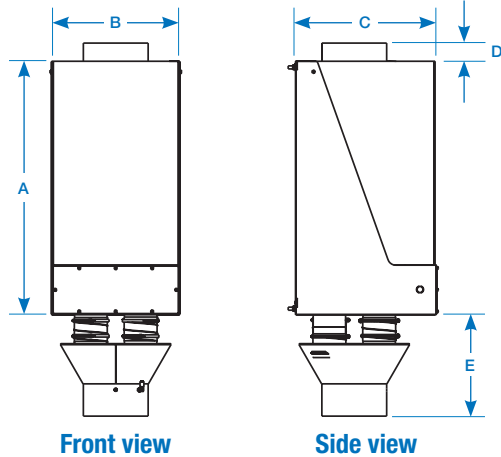
\*\* Standard soundproofing will be included only when the rating exceeds 90 dbA.

Specifications may change without notice. Consult a Conair representative for the most current information.



# Specifications

## HTC for HAD



Model HTC	HTC-30B*		HTC-30A*	HTC-60A*	HTC-90A*	HTC-120A*	HTC-180A*
Hot air dryer model	600 and 800		1000	1600	2400	3200	5000
<b>Performance characteristics</b>							
Temperature range	120° - 250°F {49° - 121°C}						
Flow rate cfm	300	400	500	800	1200	1600	2500
Pressure drop @ flow rate inches {mm} WC †	3.0 {76.2}	5.0 {127.0}	3.2 {81.2}	5.4 {137.2}	6.1 {155.0}	6.4 {163.0}	8.0 {203.2}
<b>Dimensions – Heater box inches {cm}</b>							
Inlet size (OD)	5				8		12
Outlet size selection (OD)	5				8		12
A - Height	31.4 {79.8}		27.5 {69.9}		32.0 {81.3}	31.0 {79.0}	34.0 {86.3}
B - Width	10.1 {25.7}		13.6 {34.5}		15.9 {40.4}	16.0 {40.6}	18.0 {45.7}
C - Depth	10.7 {27.2}		10.9 {28.0}		16.0 {40.6}	17.0 {43.2}	20.0 {50.8}
D - Height of discharge nozzle above heater box	0 {0}		5.9 {15.0}		2.0 {5.1}	1.0 {2.5}	2.0 {5.1}
E - Height of inlet nozzle below the heater box	8.0 {20.3}		11.4 {30.0}		8.0 {20.3}	11.0 {27.9}	13.0 {33.0}
<b>Approximate weight – Heater box lb {kg}</b>							
Installed	37 {17}		58 {26}		78 {35}	93 {42}	102 {46}
<b>Dimensions – Control center inches {cm}</b>							
F - Height	24.0 {61.0}				36.0 {91.4}	48.0 {122.0}	60.0 {152.4}
G - Width	24.0 {61.0}				30.0 {76.2}	36.0 {91.4}	42.0 {106.7}
H - Depth			10.0 {25.4}				12.0 {30.5}
J - Clearance for heat sink					3.0 {7.6}		
<b>Approximate weight – Control center lb {kg}</b>							
Installed	150.0 {68.0}				180.0 {81.6}	250.0 {113.0}	consult Conair
<b>Voltages full load amps ‡</b>							
400V/3 phase/50 Hz	44		87		131	175	261
460 V/3 phase/60 Hz	38		76		114	152	227
575 V/3 phase/60 Hz	30		61		91	122	182

### Specification Notes

\* The HTC model number reflects the kilowatts of each unit. For example, HTC-60 has a 60 kilowatt heater.

† The unit of measure WC is water column.

‡ Full load amps apply to the Hopper Temperature Controller (heater) only, see reverse side for blower amp draw.

FLA data for reference purposes only. Does not include any options or accessories on equipment. For full FLA detail for power circuit design of specific machines and systems, refer to the electrical diagrams of the equipment order and the nameplate applied to the machine.

Specifications may change without notice. Consult a Conair representative for the most current information.

