

Ventilation Strategies:

Chilled Water Fan
Powered Terminal Units

TECHNICAL AIR SYSTEMS, INC.
A Comfortable Choice

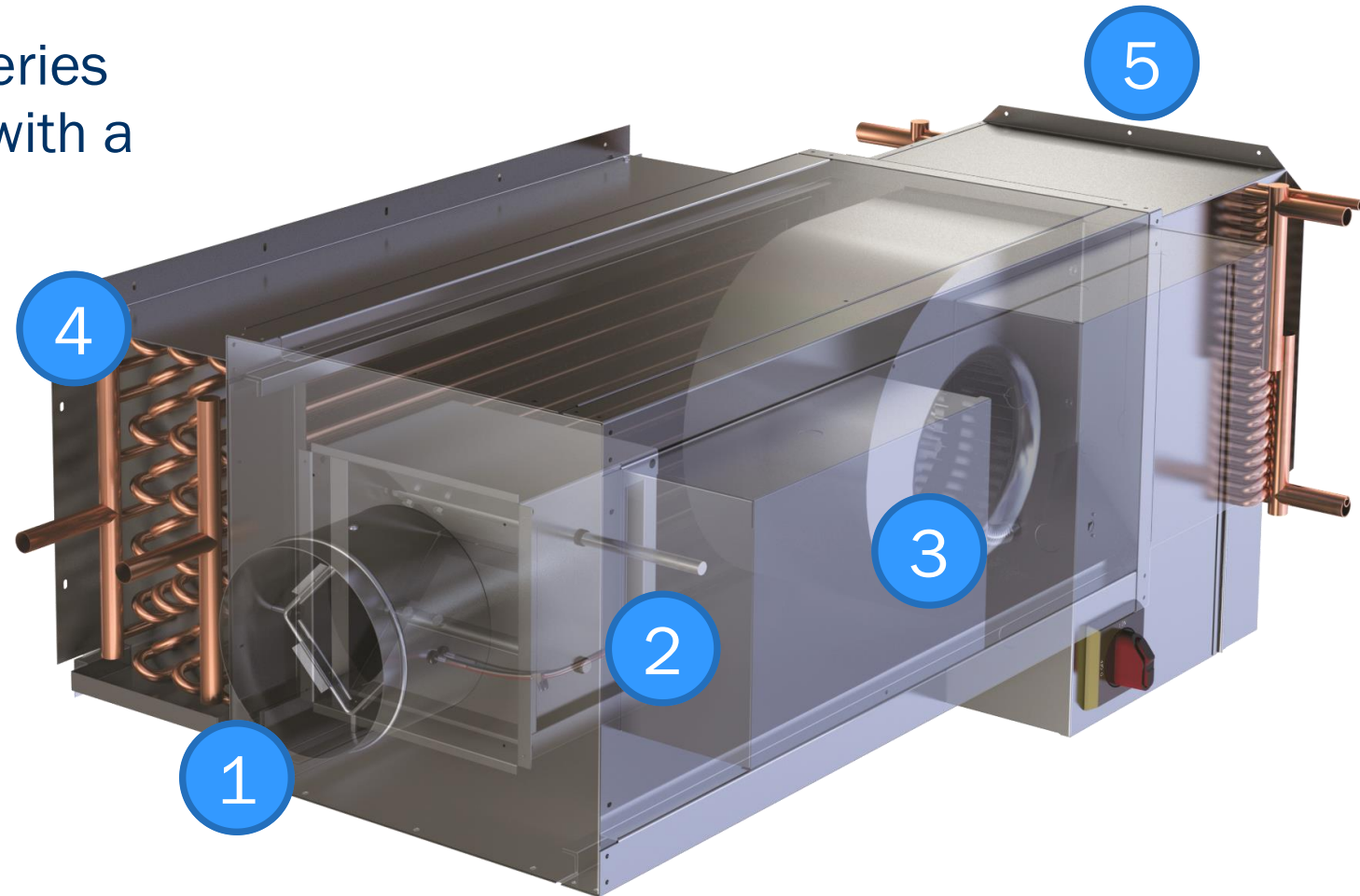
 **Nailor**[®]



Construction

Chilled Water Fan Powered Terminal Units combine a Series Fan Powered Terminal Unit with a Sensible Cooling Coil. The Components include:

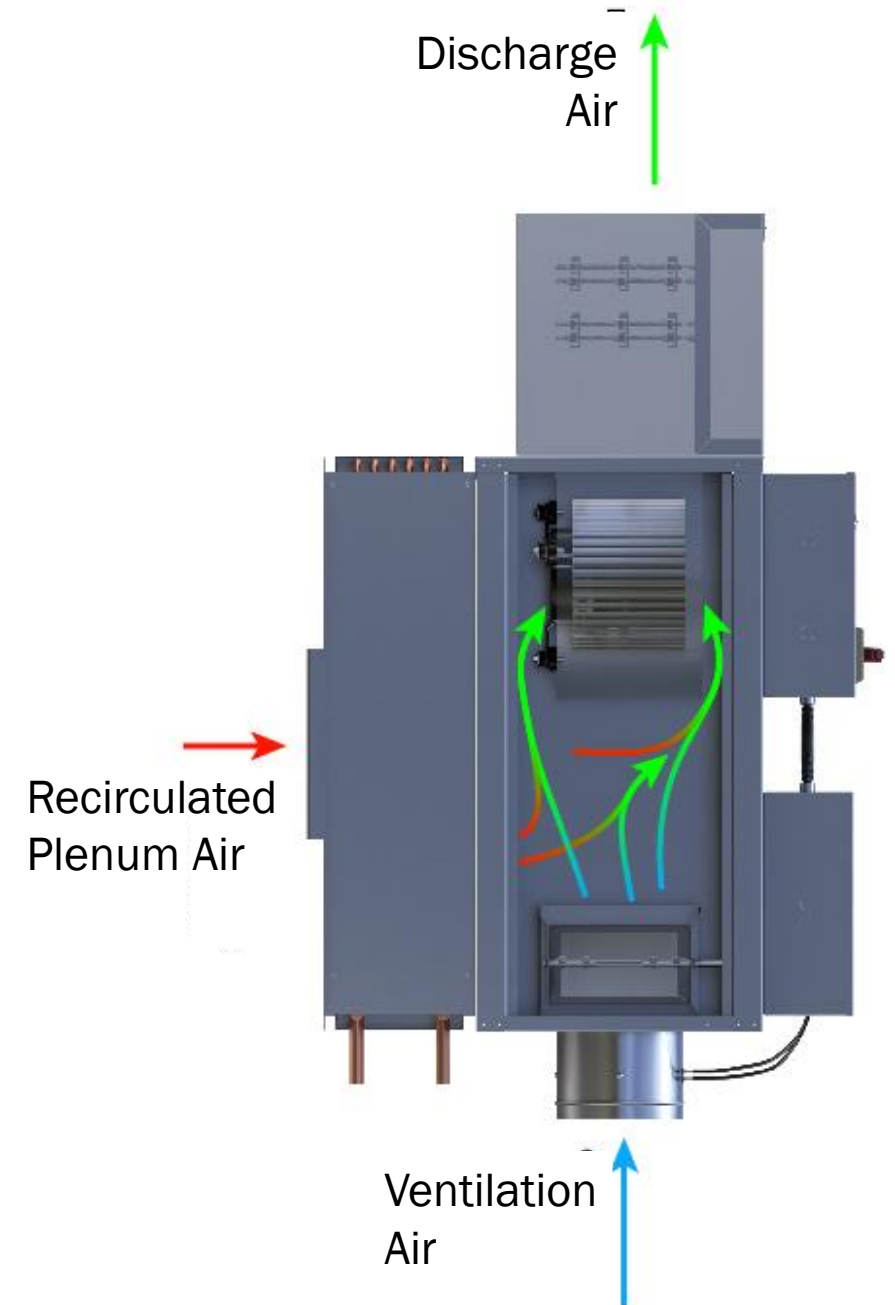
1. Flow Sensor
2. Damper
3. Fan
4. Sensible Cooling Coil
5. Optional Heating Coil



DOAS Ventilation Control

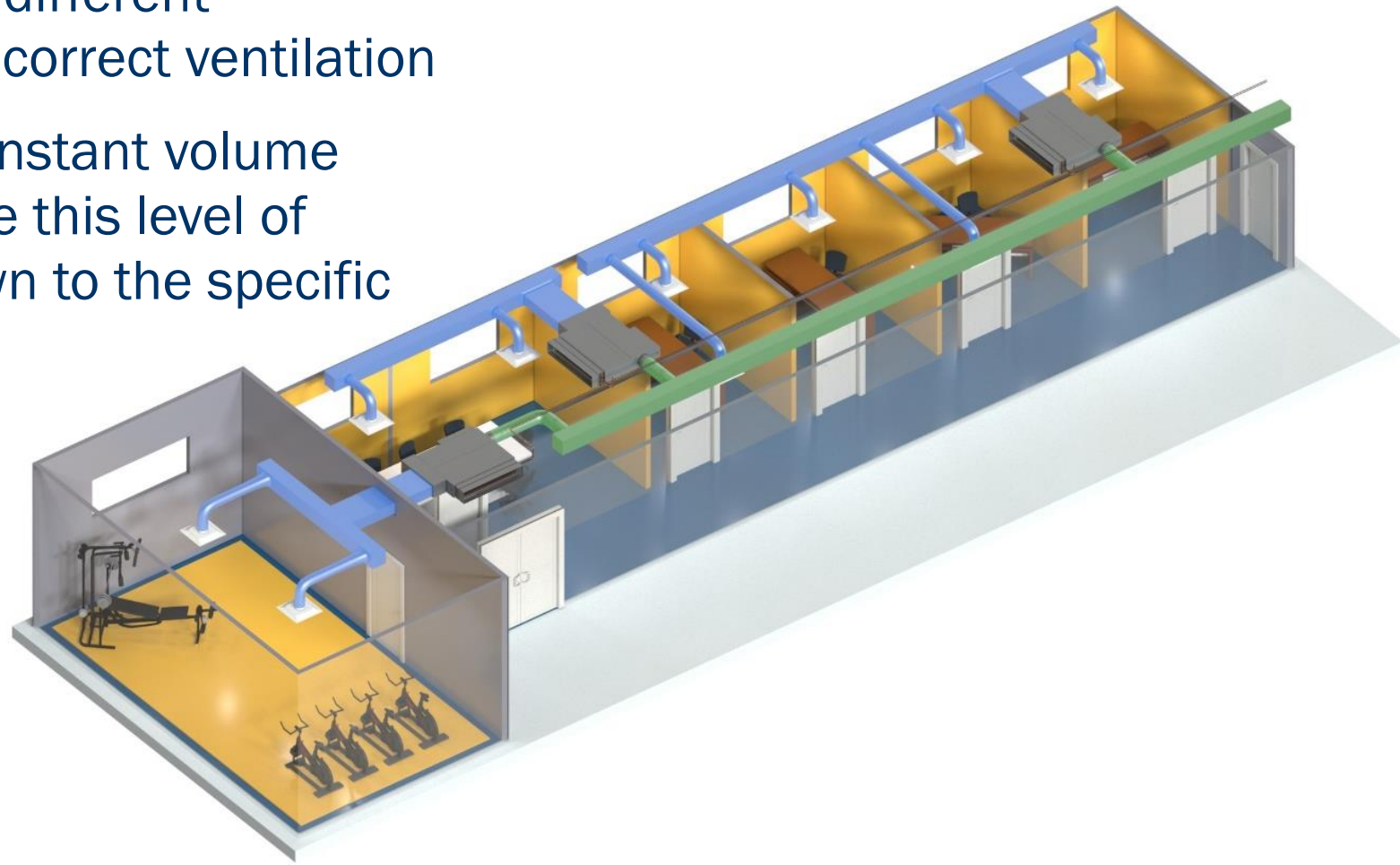
The ventilation supply from the DOAS is ducted directly to the inlet of the Terminal Unit.

- The Flow Sensor and Damper respond to controls in the room to ensure the proper amount of ventilation is delivered to the space.
- Used across an entire system, the Terminal Units ensure different occupancies have the correct ventilation



Ventilation By Occupancy

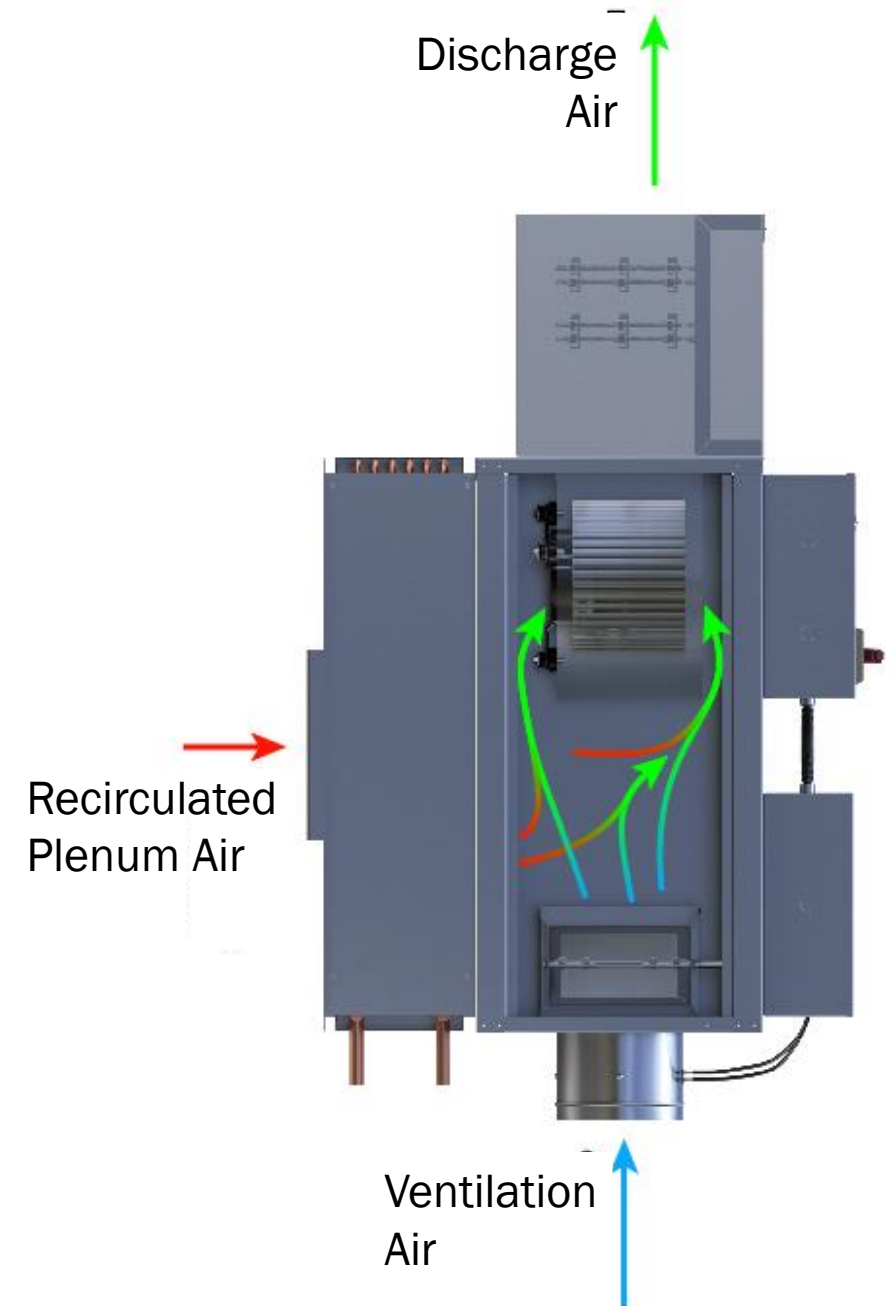
- Used across an entire system, the Terminal Units ensure different occupancies have the correct ventilation
- Traditional VAV and constant volume systems do not provide this level of ventilation control down to the specific occupancy



Distributed Cooling

Placing the coil on the terminal unit distributes the cooling load into the space, eliminating the need for a central air handler.

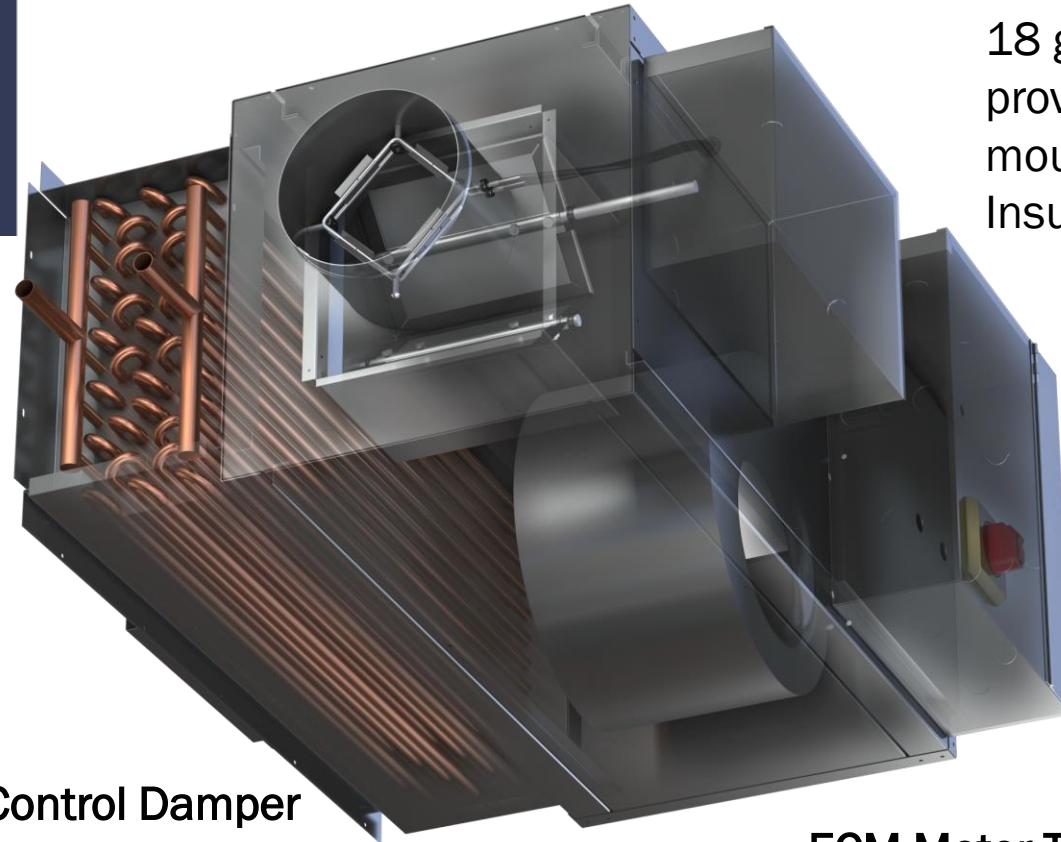
- When needed, additional air will be induced through the sensible cooling coil to satisfy the zone.
- The coil utilizes 57 °F water, eliminating the need for a condensate drain
- The airflows mix in the unit and are distributed evenly throughout the zone



33SZ Chilled Water Fan Powered Terminal Units

Sensible Cooling Coil
Coils available up to
8 rows to meet the
needs of any
application

Control Damper
Inclined opposed
blade damper
provides superior
control



Cabinet
18 ga. Frame
provides strength for
mounting 20 ga.
Insulated panels

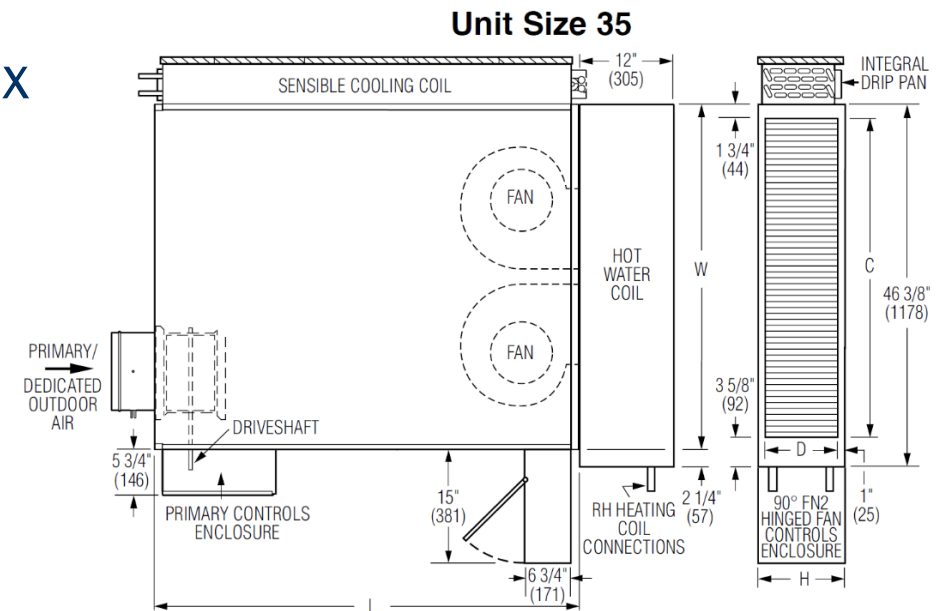
Line Voltage Enclosure
Several mounting
options ensure meeting
NEC code requirements
in tight spaces

ECM Motor Technology
Highly efficient motors
+blower combinations
for handling advanced
VAV control sequences

Nailor: The Comfort of Quality

Nailor has been a leader in this technology since its inception. We have a full portfolio of Chilled Water Fan Powered Terminal Units including:

- Units from 100 CFM min to 2,000 CFM Max
- Low Profile Options with 11" Heights
- Up to 3 tons of cooling



Dimensional Data

Unit Size	W	H	L	Outlet Duct Size C x D
35	44 (1118)	11 (279)	54 (1372)	41 x 9 (1041 x 229)

Contact the Experts

- Learn more about Nailor Industries, Inc. entire air handling/ air distribution line by going to <http://www.technicalair.com/nailor>
- Contact the Technical Air Systems' Sales Engineering Team at **973-285-0333** or by email at solutions@technicalair.com
- Check out more Air Handling & Air Distribution articles along with Building Control & Performance and Commercial Kitchen articles at [Technical Air Systems' Engineering Corner!](#)