

AUXILIARY HOT WATER HEAT - LC AND LCQ PACKAGED UNITS

OPTIONAL HOT WATER HEATING OPTIONS

Desert Aire provides auxiliary heating options for its ExpertAire™ Series product line that are sized to meet the winter heating requirements of the zone.

Desert Aire sizes the heating elements to precisely match the load requirement of the system. This internal heating coil is a two row coil. The heaters are automatically controlled by the unit's microprocessor to maintain zone temperature. A customer supplied hot water control valve is modulated from the controller with a 0 to 10 VDC direct acting signal. Please refer to figure 1 for a typical installation.

HWC Design Inputs

The coil is selected for each customer's particular application based on the following criteria:

- **Entering water temperature (EWT), typically between 140°F and 180°F**
- **Leaving water temperature (LWT), typically 20 degrees less than the EWT**
- **MBH capacity desired**
- **Entering air temperature (EAT), winter design for your area**
- **Leaving air temperature (LAT), typically neutral to a maximum of 100°F**
- **GPM flow rate desired**
- **If there are fluid pressure drop restrictions to be aware of.**
- **Type and concentration of glycol used**

For freeze protection Desert Aire uses a capillary type temperature sensor which is attached across the down-stream face of the coil. Freezestat is set at 38°F with an auto reset switch. If engaged the unit controls would respond by closing the outdoor air damper, open the hot water coil valve 100%, and log the alarm on the controller.

To size the control valve, please provide a qualified vendor the water temperature, flow rate (gpm) and the requirement for a 0 to 10VDC signal and they will select the appropriate valve to purchase.

Optional ElectroFin® coil coating is available.

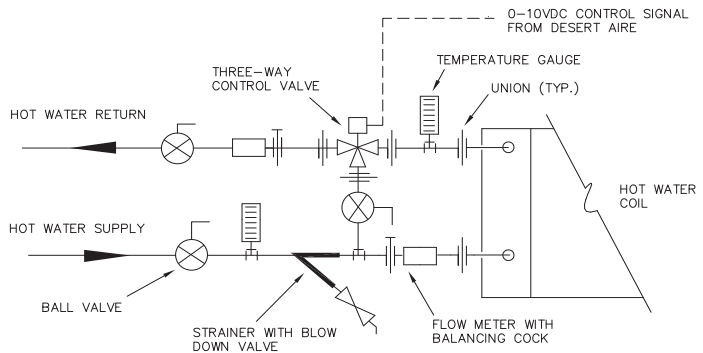


Figure 1 - Hot Water Piping Detail

OPTIMIZING SOLUTIONS THROUGH SUPERIOR DEHUMIDIFICATION TECHNOLOGY

N120 W18485 Friestadt Road, Germantown, WI 53022 sales@desert-aire.com

Ph: (262) 946-7400 - www.desert-aire.com



 **WARNING:** Cancer and Reproductive Harm - www.P65Warnings.ca.gov