10 Easy Steps to Start-up Your New G&D Chiller

Standard Chillers: GD-20H & GD-27H
Modular Series: GD-20H-MS & GD-27H-MS
Please view install videos online at www.gdchillers.com/installation-videos

1. **Your chiller includes one (1) free year of Tera service for remote control and monitoring**. Internet access is needed. Run an ethernet cable from facility LAN router to electrical enclosure of chiller before proceeding.
2. Chiller must be positioned **with at least 30 inches of clearance on air intake side** (opposite louvered access panels) and **open to free air on exhaust side** (louvered panel side) **with no obstructions**. Adequate airflow is critical. Refer to CHILLER CLEARANCE REQUIREMENTS for more details. Securely anchor chiller to pad.
3. Install Wye-strainer (required) one size larger than mainline and purge valve on return line at chiller.
4. With the door switches in the OFF position, ensure all breakers are in the ON position. **The chiller must then be supplied with power for at least 4 hours**. **Verify there is a visible oil level in the compressor sight glass before proceeding**.
5. Flush all piping lines with water, then fill reservoir and piping with a 35% glycol to water mixture. **The chiller start/stop door switch must remain OFF during this step:**
    a. Open supply valve, close return valve, and open purge valve on return line. **Ensure all glycol pump isolation valves are open**.
    b. Fill reservoir with water. Turn control power door switch ON, then process pump door switch ON, and **verify correct pump rotation.**
    c. Flush facility piping loop. Add water while flushing system (keep chiller reservoir topped-up). Once all debris has been flushed out, remove as much water from system as possible.
    d. Open return valve and close purge valve on return line.
    e. Fill reservoir/piping loop with 35% propylene glycol mixture. **Inhibited glycol is required** to prevent rust and corrosion in the piping system.
6. Temporarily close the supply valve and **confirm glycol pressure is at 20 PSI** (refer to #10 if a lower pump pressure is required). Open supply valve and circulate glycol through entire piping loop for at least 30 minutes. Re-verify glycol mixture using a refractometer. The glycol mixture MUST be 35 to 40%. Correct as needed before proceeding.
7. **Re-verify oil levels in compressor sight glasses. Do not proceed unless an oil level is visible in the sight glass of every compressor in the chiller.**
8. **Open all service valves in chiller marked with tags**. Remove black plastic cap, use wrench on squared-off end of valve stem that protrudes furthest, and rotate until valve is fully open. See demonstration video on website or contact Tech Support for more details: 800-555-0973.
9. Turn chiller start/stop door switch to the RUN position. Compressors should start to run. Fans to follow shortly.
10. Adjusting set points on Carel controller: Press the up/down arrows until SET displays in bottom right corner. Press enter and change temperature to desired set point. Pump pressure adjustment for the VFD is also located here. If decreasing glycol pressure is required for tank jacket ratings, do so using the Carel controller at this time.

PLEASE VISIT GDCHILLERS.COM TO VIEW OUR INSTALLATION VIDEOS & FAQS

*G&D Chillers welcomes any questions or concerns. We can be reached at **800-555-0973** or **541-345-3903**

LOCATION

Air cooled units must sit outside on a solid level surface. A concrete pad is recommended. Location should be free of grass and other debris that could plug condenser fins. Chiller must be securely anchored to pad.

*AIR INTAKE SIDE MINIMUM CLEARANCE REQUIREMENTS	
30"	GD-20H, GD-27H, GD-20H-MS, GD-27H-MS

Ensure minimum clearance* between condenser intake side and any buildings, walls, etc.

No walls or obstructions in front of the unit: Louvered access side must be open to free air.

Liquid cooled chillers may be installed on a concrete pad indoors or outdoors. A properly sized pump and liquid cooling system for the chiller condenser must be supplied by the end user. Contact G&D Chillers for additional information and assistance with sizing.

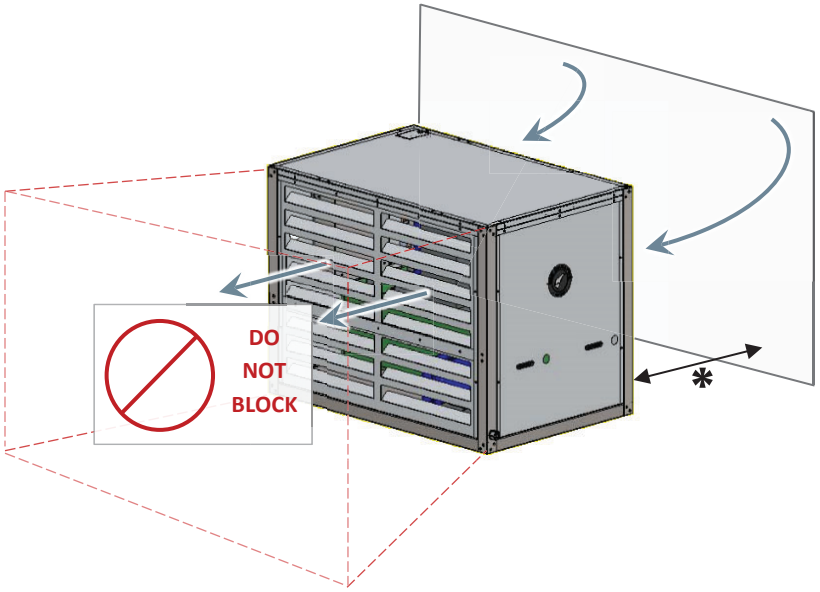

FIGURE 1. CHILLER CLEARANCE REQUIREMENTS