Model: ACWC-600-GC-DP[1]-__[2]-__[3]-__[4]

Description:

Four stage air-cooled portable water chiller system. Dual pump model includes one recirculating pump for the chiller circuit and a second pump dedicated for the process circuit. Process pump indicated on table is typical, with options available for different capacity. System capacity indicated on table is the approximate BTU/hr based on a leaving fluid temperature of 50°F with an ambient air temperature of 95°F.

CAPACITY ±5% AT 50° LCWT / 95°F AMBIENT		600,000 BTU /HR					
COMPRESSOR / REFRIGERANT		(4) HERMETIC SCROLLS / R410A					
CONDENSER FANS / AIRFLOW		4 / 41,800 CFM					
CONDENSER COILS TYPE		MICROCHANNEL					
EVAPORATOR TYPE		STAINLESS STEEL / COPPER BRAZED					
FLUID CONNECTIONS		3" 150# FLANGE (IN/OUT)					
ELECTRICAL:	V - Ø - HZ	COMP RLA / LRA (ea)		FAN FLA (ea)	(No*) PUMP FLA	MCA	MOCP
- 5	230 - 3 - 60	A1/A2	51.3 / 300	6.6	(1) 17.5 (2) 17.5	289.5	300
		B1/B2	55.8 / 340				
- 6	460 - 3 - 60	A1/A2	23.1 / 150	3.3	(1) 8.7 (2) 8.7	137.3	150
		B1/B2	26.9 / 179				
CHILLER PUMP HP / OUTPUT (1)		7.5 HP / 225 GPM @ 35 PSI					
PROCESS PUMP HP / OUTPUT (2)		7.5 HP / 225 GPM @ 35 PSI					
TANK SIZE / CONSTRUCTION		625 GALLON / HIGH-DENSITY POLYETHYLENE					
DIMENSIONS		188" L x 88 ¼" W x 73" H					
WEIGHT (APPROX.)		2900 LBS					

Note: All specifications subject to change without notice. Specify voltage and ambient condition upon ordering.
MCA: Minimum circuit amps per UL 1995. MOCP: Maximum overcurrent protective device per UL 1995.

STANDARD FEATURES:

- **Controls:** Electronic programmed temperature controller with constant (set point & process) temperature readout.
- **Refrigeration Components:** Efficient scroll compressors, sight glass/moisture indicators, balanced port expansion valves, filter drier, pump down valves, fan cycling head pressure controls.
- **Process Fluid Components:** PVC "Y" strainer with 20 mesh stainless steel screen. Pumps are stainless steel centrifugal. Tanks are insulated with fluid level sensor, spin on lid and drain. Portable systems will include a flow control valve.
- **Safety Controls:** High and low refrigerant pressure, high and low fluid temperature, freeze, low water flow, internal overloads, thermal overload circuit breakers and/or safety fuses for compressors, pumps, and fan motors, temperature relief fusible plug on liquid lines of each circuit.
- **Construction:** Galvanized steel frame, powder coated carbon steel cabinet, PVC flange connections.
- **Warranty:** One year parts / five year compressor.

SUITABLE AMBIENT CONDITIONS/FEATURES:

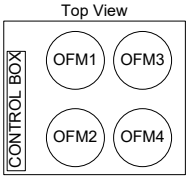
- **IND:** Indoor use only.
- **40:** Suitable for outdoor use with an ambient of 40°F ambient.
- **0:** Suitable for outdoor use to 0°F ambient. Includes Low ambient fan speed controls with (LT) models.
- **M20:** Suitable for outdoor use to -20°F ambient. Includes Low ambient fan speed controls.

[1] Flow Design (_=Portable, ST=Stationary, RF=Reverse Flow, EXCH=Extra Heat Exchanger, DP=Dual Pump, DR=Dual Return)
[2] Leaving Fluid Temperature (_=Standard, LT=Low Temperature-specify lowest temperature in °F)
[3] Ambient Temperature Conditions (see above)
[4] Electrical Power Code (see above)

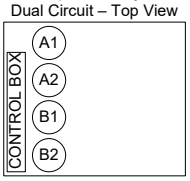
TECHNICAL SPECIFICATION

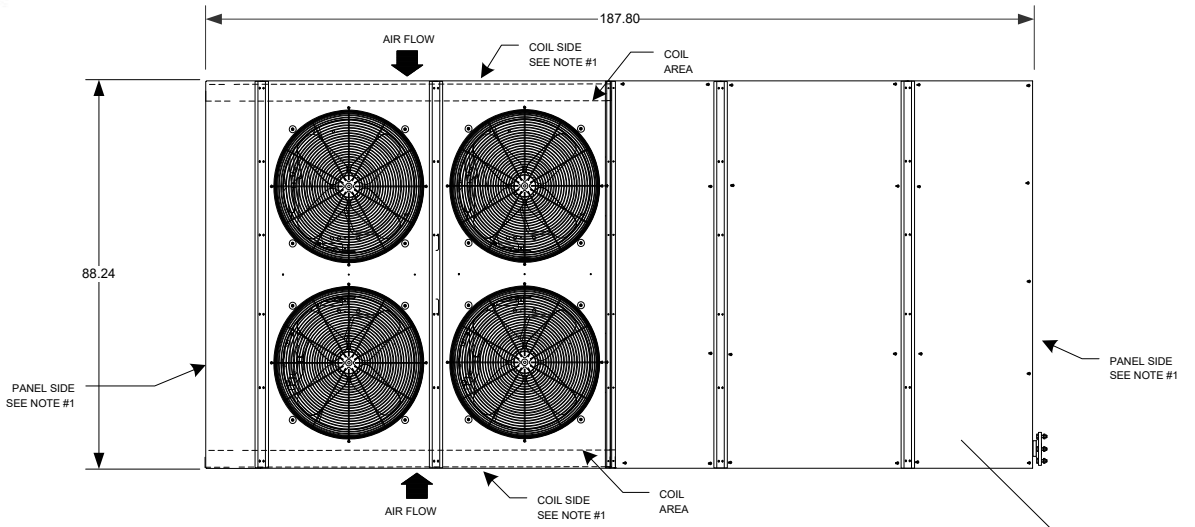
WWW.WATERCHILLERS.COM

Outdoor Fan Layout
Top View

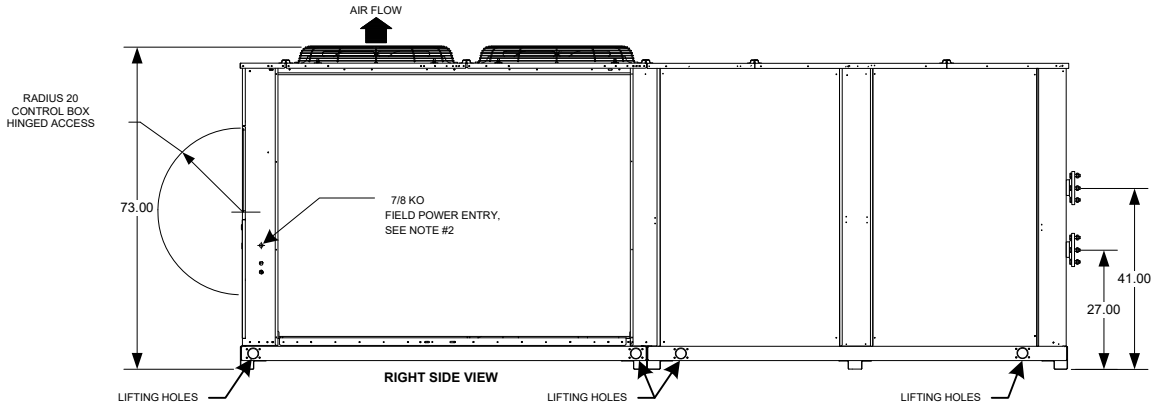


Compressor Layout
Dual Circuit – Top View

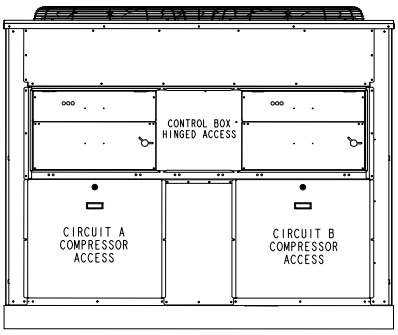




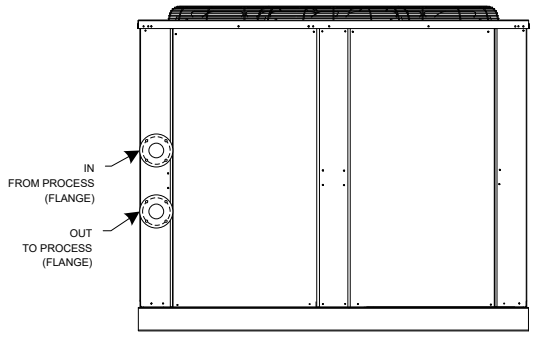
TOP VIEW



RIGHT SIDE VIEW



FRONT VIEW



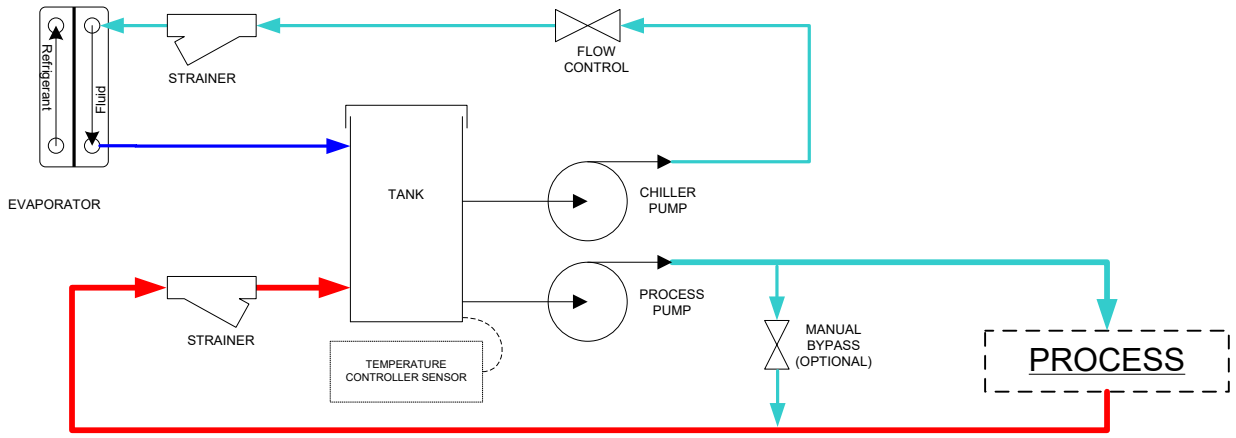
BACK VIEW

PAGE NOTES

1. Unit must have minimum clearances for air flow/service access as follows: (air must be directed away from machine to prevent re-circulating air back into machine coil sides.)
   Top — Do not restrict in any way over condenser fan area.
   Panel End — 4 ft per NEC.
   Sides and End — 6 ft from solid surface for airflow.
   Side — 8 ft required for coil service area.
2. Field power supply connection: two 7/8 pilot holes provided. Actual hole required depend on field wire sizing.
3. Temperature relief device located on suction line, liquid line and filter drier of each circuit are equipped with a 1/4" flare field connection.
4. All chilled fluid piping should be insulated.
5. Dimensions are in inches unless otherwise specified.
6. Design and layout may change depending on parts or manufacturing without notice. Notify Cold Shot Chillers for any details needed based on construction.
7. Contact Cold Shot Chillers for details or other information.
8. Lifting: a. System can be rigged with a crane. Approximate weights noted.
   See lifting points on diagram below located on each side of chiller.
   b. Not recommended for lifting with a forklift.

COLD SHOT CHILLERS	SIZE	DIMENSION NOTES	DWG NO	REV
DRAWN ENGINEERING	A	Dimensions are in inches unless otherwise specified. +-¼"	**INSTALLATION DRAWING** **ACWC-600-GC-DP (Typical - Front-Back-Side-Top)**	1
ISSUED 4/12/2022	SCALE NONE	DWG-INST-600-GC-DP-(041222).vsd	SHEET 1	

DUAL PUMP (DP)



Line Guide

- COLD CHILLED FLUID
- HOT FLUID
- COLD FLUID
- WARM FLUID

NOTES

- All designs are subject to change without notice.
- The diagrams are to be used as a basic flow diagram only.
- Color Code is for relative temperature comparison.
- Additional components may be included.
- Evaporator may be located in tank.

COLD SHOT CHILLERS	SIZE	DESCRIPTION		REV
DRAWN: ENGINEERING	A	Typical FLOW OPTIONS for Chiller Circuits		1
ISSUED: 5/2020	SCALE: NONE	DWG-CKT_ChillerCircuitFlowOptions-Typical_(0520).vsd	SHEET: 6 / Dual Pump (DP)	