

# Cold Shot Chillers

"ECONOMICALLY PRICED DEPENDABILITY"



## TECHNICAL SPECIFICATION

Model: ACWC-1080-GC-ST<sup>1</sup>-\_\_<sup>2</sup>-\_\_<sup>3</sup>-\_\_<sup>4</sup>

### Description:

Six stage portable air-cooled water chiller system. 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<br>±5% AT 50° LCWT / 95°F AMBIENT |              | 1080,000 BTU/HR                       |      |     |               |       |      |
|--------------------------------------------|--------------|---------------------------------------|------|-----|---------------|-------|------|
| COMPRESSORS / REFRIGERANT                  |              | (6) ROTARY SCROLLS / PURON R-410A     |      |     |               |       |      |
| CONDENSER FANS / AIRFLOW                   |              | 6 / 61,500 CFM                        |      |     |               |       |      |
| CONDENSER COILS TYPE                       |              | MICROCHANNEL HEAT EXCHANGER           |      |     |               |       |      |
| EVAPORATOR TYPE                            |              | STAINLESS STEEL / COPPER BRAZED PLATE |      |     |               |       |      |
| FLUID CONNECTIONS                          |              | 4" 150# FLANGE (IN/OUT)               |      |     |               |       |      |
| ELECTRICAL:                                | V - Ø - HZ   | COMP RLA / LRA (ea.)                  |      |     | FAN FLA (ea.) | MCA   | MOCP |
| - 5                                        | 230 - 3 - 60 | A1-A3                                 | 55.8 | 340 | 6.6           | 388.4 | 400  |
|                                            |              | B1-B3                                 | 55.8 | 340 |               |       |      |
| - 6                                        | 460 - 3 - 60 | A1-A3                                 | 26.9 | 179 | 3.3           | 187.9 | 200  |
|                                            |              | B1-B3                                 | 26.9 | 179 |               |       |      |
| DIMENSIONS (APPROX.)                       |              | 151.1" L x 88.3" W x 73" H            |      |     |               |       |      |
| WEIGHT (APPROX.)                           |              | 3094 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:** Scroll compressors, sight glass/moisture indicators, balanced port expansion valves, filter driers, pump down valves, fan cycling head pressure controls.
- **Process Fluid Components:** PVC "Y" strainer with 20 mesh stainless steel screen is standard.
- **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.
- **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.
- **M20:** Suitable for outdoor use to -20°F ambient. Includes with low ambient fan speed controls.

<sup>1</sup> Flow Design (\_\_=Portable, ST=Stationary, RF=Reverse Flow, EXCH=Extra Heat Exchanger, DP=Dual Pump, DR=Dual Return)

<sup>2</sup> Leaving Fluid Temperature (\_\_=Standard, LT=Low Temperature-specify lowest temperature in °F)

<sup>3</sup> Ambient Temperature Conditions (see above)

<sup>4</sup> Electrical Power Code (see above)

Marrone & Co., Inc.

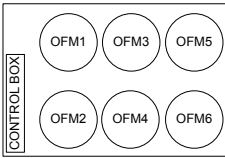
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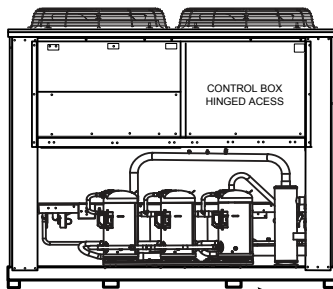
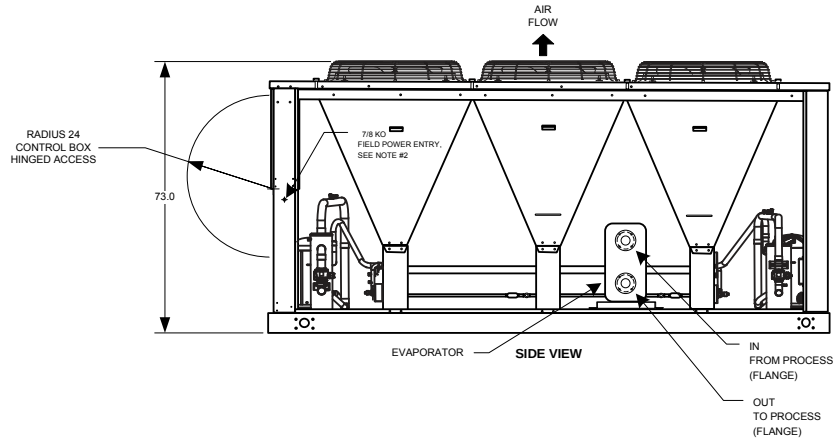
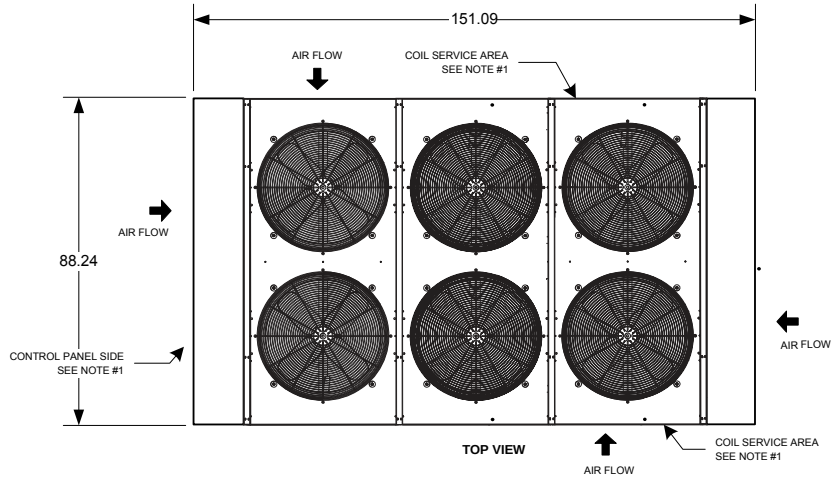
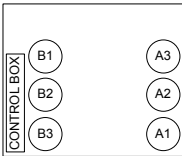
# PAGE NOTES

- Unit must have 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.  
Sides and End — 6 ft from solid surface for airflow.  
Side — 8 ft required for coil service area.
- Field power supply connection: two 7/8 pilot holes provided. Actual hole required depend on field wire sizing.
- Temperature relief device located on suction line, liquid line and filter drier of each circuit are equipped with a 1/4" flare field connection.
- All chilled fluid piping should be insulated.
- Dimensions are in inches unless otherwise specified.
- Design and layout may change depending on parts or manufacturing without notice. Notify Cold Shot Chillers for any details needed based on construction.
- Contact Cold Shot Chillers for details or other information.

Outdoor Fan Layout  
Top View

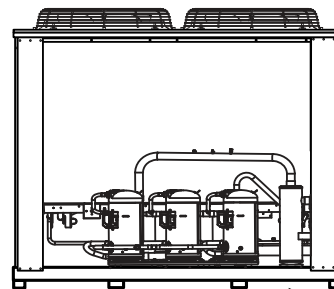


Compressor Layout  
Dual Circuit – Top View



FRONT VIEW

SEE NOTE #1 FOR SERVICE  
CLEARANCE



BACK VIEW

SEE NOTE #1 FOR SERVICE  
CLEARANCE

## COLD SHOT CHILLERS

DRAWN ENGINEERING

ISSUED 7/2/2018

SIZE

A

DIMENSION NOTES

Dimensions are in inches  
unless otherwise specified.

SCALE

NONE

DWG NO

**INSTALLATION DRAWING**  
**ACWC-1080-GC (Typical - Front-Back-Top-Side)**

DWG-INST\_-1080-GC-ST\_-(0718) .vsd

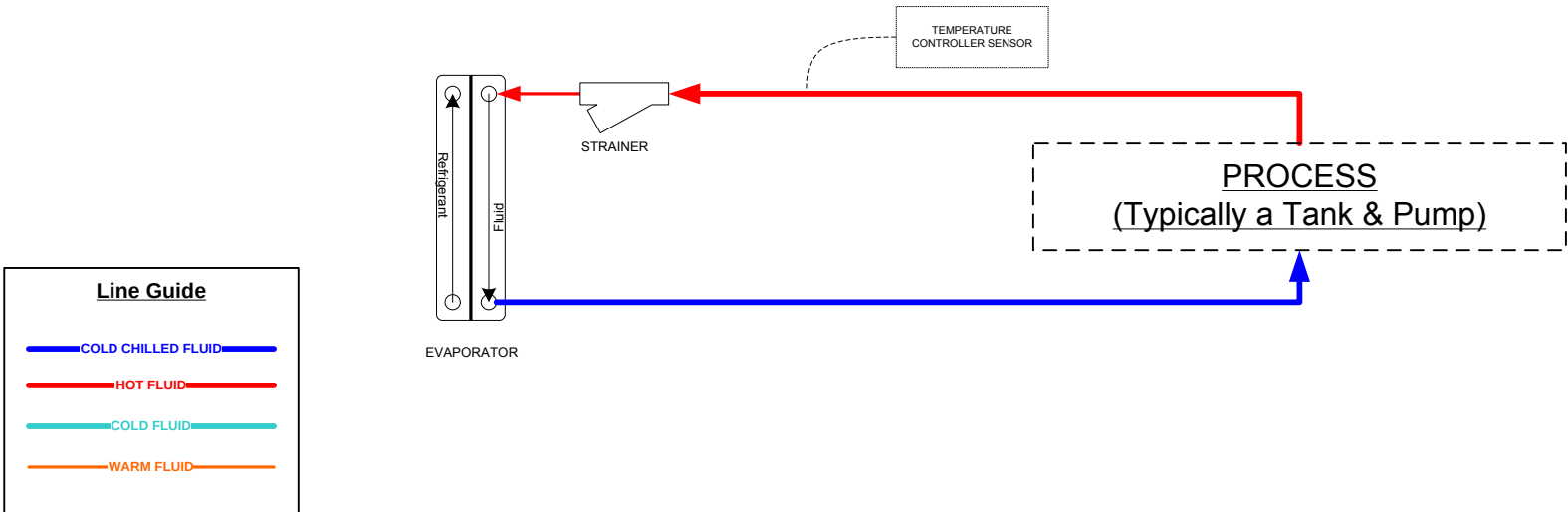
SHEET

1

REV

1

**STATIONARY (ST)**



**COLD SHOT CHILLERS**

DRAWN ENGINEERING

ISSUED 6/21/2018

SIZE

A

SCALE NTS

**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.

DESCRIPTION

**Typical FLOW OPTIONS for Chiller Circuits**

REV

1

DWG-CKT\_ChillerCircuitFlowOptions-Typical\_062218.vsd

SHEET

5 / Stationary (ST)