YORK®	*MILLENNIUM®* **REMOTE CONTROL CENTER** **FOR STYLE F AIR-COOLED SCREW CHILLER**	
INSTALL., OPERATION & MAINT.	New Release	Form 201.18-NM1.2 (300)

28376A

NEW
EXPANDED USER GUIDE INCLUDED

See Section 3

TABLE OF CONTENTS

LIST OF FIGURES

SECTION 1 – RCC HARDWARE AND SETUP

GENERAL

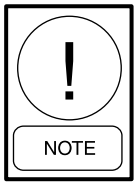
The YORK Remote Control Center option (371-02485-102) provides chiller operating data and control from a remote location. This data includes system status, operating information, fault information, and chiller operating history at the push of a key.

All data is displayed on a 40 character backlit LCD display (2 lines of 20 characters) and is accessed by a soft touch keypad. The keypad and display are built into an 8" x 10" x 2-1/2" (203 mm x 254 mm x 64 mm) NEMA-1 enclosure to be wall mounted indoors.

The Remote Control Center is also designed to enable the user to obtain a printout directly from the remote panel, simplifying the data logging procedure.

One (1) Remote Control Center (RCC) is needed for remote control and monitoring of each screw chiller.

This RCC manual must be used in conjunction with the chiller **Installation, Operation, Maintenance Manual, (IOM) Form 210.18-NM1,** which is included with each chiller. Additional copies can be purchased through the (York) Baltimore Parts Center, Baltimore MD. Phone 1-800-932-1701.



The Remote Control Center can not be used with a Millennium ISN System.

MOUNTING

Mount the Remote Control Center at the desired location and attach it securely. The panel may be mounted away from the chiller as far as 4000 ft. (1219 m) of wiring will allow.

PRINTER CONNECTION

The printer communicates through the RCC RS 232 port, which are terminals at TB2 marked TXD, RXD, and DGND, as shown on page 6.

INSTALLATION CHECKLIST

REFER TO INSTALLATION/CONNECTION DIAGRAMS, PAGES 6-7.

- 24VAC Power Supply (included)
- 2 conductor shielded cable with shield connected at RCC only. (user supplied)
- At RCC, red wire on 485+ and black wire on 485–.
- At RCC, shield and grnd connected and jumpered.
- 180 ohm resistor installed at RCC or micro; never at both.
- At chiller, red wire on BAS+ and black wire on BAS–.
- At chiller, use “PROGRAM’ and ‘ENTER” to access and select REMOTE as type of control mode.
- Correct eprom installed at chiller and RCC

  See page 4 for eprom versions.

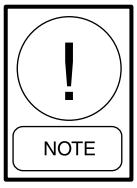
WIRING

Operating voltage requirement for the remote panel is 24VAC, supplied by a wall mounted transformer (included with RCC). The transformer is wired into the remote panel at TB1, as shown in Fig. 1.

A communications cable must connect the chiller to the remote panel. This cable should be a twisted pair shielded cable, type Alpha 4562, Beldon 9320, or Quabbin 930421-2. The cable length must not exceed 4000 ft. (1219 m).

At the RCC, assure that the 180 ohm resistor is connected between terminals 1 and 2 of the TB2 connector. Also, assure that a jumper connects terminals 3 and 4. See Fig. 1.

Place the J19 jumper on the Microprocessor Board in the RS-485 position.



Never run the communication cable in close proximity to any power wiring. For best results, it should be run in dedicated, grounded conduit.

RCC HARDWARE AND SETUP – CONT'D

COMMUNICATIONS

Communications between the chiller and the remote chiller will be limited to once every 16 seconds. This results in a time lag in displays as well as time lags in commands to the chiller from the Remote Control Center. Keep this in mind when using the remote panel. In addition, when power is first applied to the remote panel, a time lag of 30 sec. to 2 min. may be required before initial communications is established.

KEYPAD OPERATION

↑ ↓ **ARROW KEYS**

During programming, these keys will increase or decrease the numerical value appearing on the display.

During normal viewing of data, the arrow keys are used to scroll up or down through the data fields.

ENTER/ ADV

Enter key is used to store new values into memory. Other keys on the unit are self explanatory.

PARTS LIST FOR RCC OPTION - YCAS CHILLER

QTY.	DESCRIPTION	YORK PART NO.	REMARKS
1	RCC Unit	371-02485-102	Included
1	RCC EPROM	031-02016-001	Included*
2	LTP Trans. Protect Mod.	031-01586-000	Included
Ft	Commun. Cable Alpha 4562 or Beldon 9320		User Supplied
1	15V/24VAC Trans.	025-29917-001	Included
1	220V/24VAC Trans.	025-29917-002	YORK Option
OPTIONAL PRINTER			
1	Printer, Dot Matrix	Model 1220	Weight-Tronix**

* RCC option requires new chiller eprom 031-01798-RCC, included

** Weigh-Tronix, Inc., Santa Rosa, CA. Phone: 1 (800) 982-6622 Fax: 1 (800) 847-6743 See page 8 for more info.

PROGRAMMING SETUP AT THE CHILLER

Press the PROGRAM key and scroll by repeatedly touching the ENTER key. At the display titled "COMMUNICATIONS MODE" select LOCAL or REMOTE using the arrow keys.

AT THE RCC

No programming setup is required.

EPROM VERSION DISPLAY

At the RCC, touch the HISTORY key followed by the down arrow. Press arrow key 2x to see chiller eprom version.

At the chiller, touch the OPER DATA and the * key to display the eprom version.

The RCC should have the number 12 in the version format CXXX. 12.XX A two compressor chiller should have the number 09; and a chiller that has three or four compressors should have the number 10 in the version format.

Note that the last two digits will vary as changes are made to the software.

POWER LOSS

In the event of a power loss to the Remote Control Center, the microprocessor in the chiller control panel will continue to adhere to the setpoints and commands dictated from the Remote Control Center prior to the power loss for five minutes. At the end of the five-minute period, the chiller will revert to local control if communication is not re-established. When communications are re-established after power is returned, the chiller will honor all commands programmed into the Remote Control Center.

In the case of a remote shutdown before the power loss occurred, the chiller may start on local control, if de-

RCC HARDWARE AND SETUP – CONT'D

mand exists, after five minutes. The chiller will continue to run until demand shuts it off or until communication is re-established. When communication returns, the chiller will shut down, honoring the remote shutdown that was commanded prior to the communications loss. The ability to do this is built into the chiller micro, which remembers the setpoints/control commands established before the communications loss.

A LOSS OF COMM LINK TO AC SCREW PANEL message indicates that the communications link between the chiller MicroComputer Control Center and the Remote Control Center has been lost. This loss of communications can be the result of a disconnect in the communications cable between the two panels; the loss of power to the chiller control panel; or a faulty communications driver chip. These driver chips are located on the chiller microboard at location U24, and on the RCC microboard at location U15. On the chiller, RS-485 and RS-232 driver chips at U24 and U59 respectively, can be interchanged when the RS-232 printer port is not being utilized. At RCC, board replacement is required. If communications are lost and not re-established after 5 minutes, local chiller setpoints (those programmed at the chiller panel) will command the chiller.

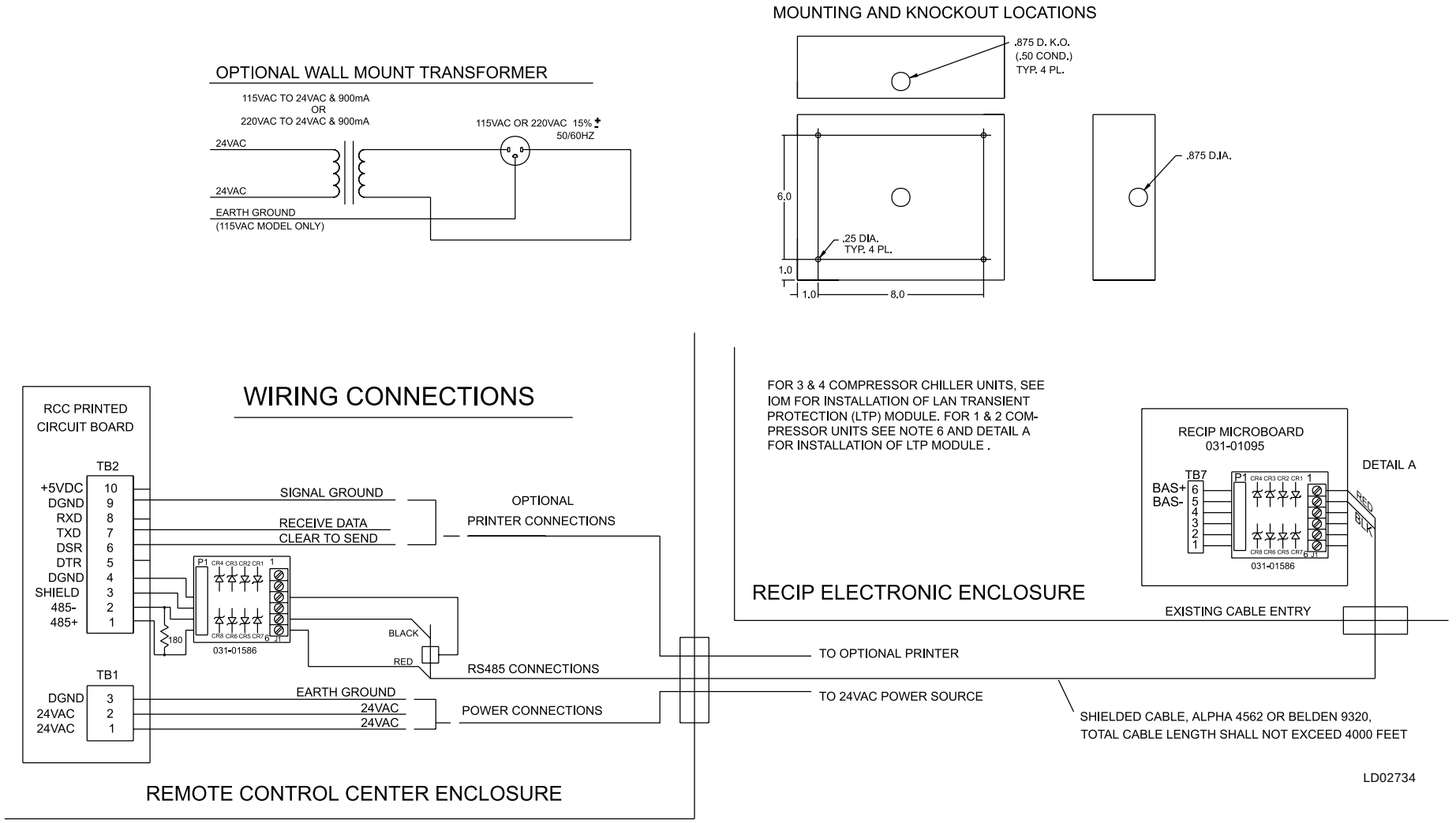


FIG. 1 – RCC WIRING CONNECTIONS

RCC HARDWARE AND SETUP – CONT'D

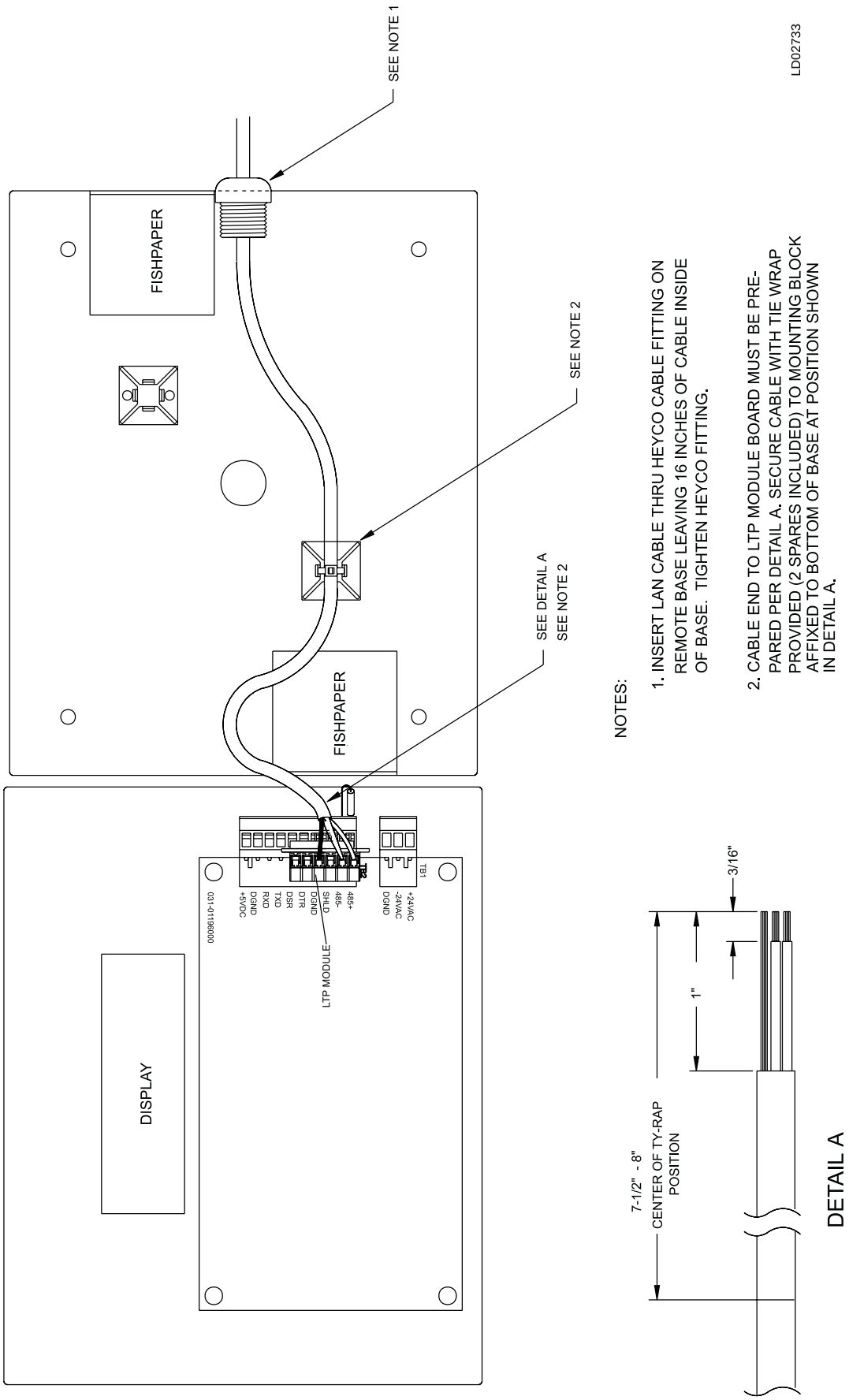


FIG. 2 – REMOTE CONTROL CENTER INSTALLATION DETAILS

RCC HARDWARE AND SETUP – CONT'D

PRINTER

The optional printer combined with the RCC option allows the operator to obtain a remote printout through the RCC device. The printer to RCC distance should be limited to 25 ft.

A Weigh-Tronix 1220 Dot Matrix printer, No. 950915576 is recommended. Est. cost $179.40

Cable part 287040018 (25' Long) must also be ordered also. Est. cost $40. 00

Note: Part of this cable includes a 6" pigtail plug adapter which connects to screw terminals at TB2 of the RCC, or to TB8 on the chiller when no RCC is used. Extra pigtails can be ordered and then left in the chiller to allow quick printer connect/disconnect feature. Order extra adapter 957012582. Cost is $10.

Printer specs: Default settings are 1200 Baud, 8 data bits, no parity, 1500 character buffer. Replacement paper: Std. adding machine, non-thermal, 2-1/4W x 2-3/4D, inner roll is .44" ID; No. 223350026. Replacement Ribbon: Recommend change every second roll of paper: Epson ERC-09; No. 223320029. Weight-Tronix has a 'Handipak' combination which includes 4 rolls and 2 ribbons at approx. $11.50.

Printer and parts are sold through Weigh-Tronix only. Contact information:

Weigh-Tronix, Inc.
2320 Airport Blvd.
Santa Rosa, CA 95403
Ph. 1-800-982-6622 Domestic
Fax 1-800-847-6743 Domestic
Ph. +1 707-527-5555 International
Fax +1 707-579-0180 International

Note: Prices reflect 1999 and may change with time.

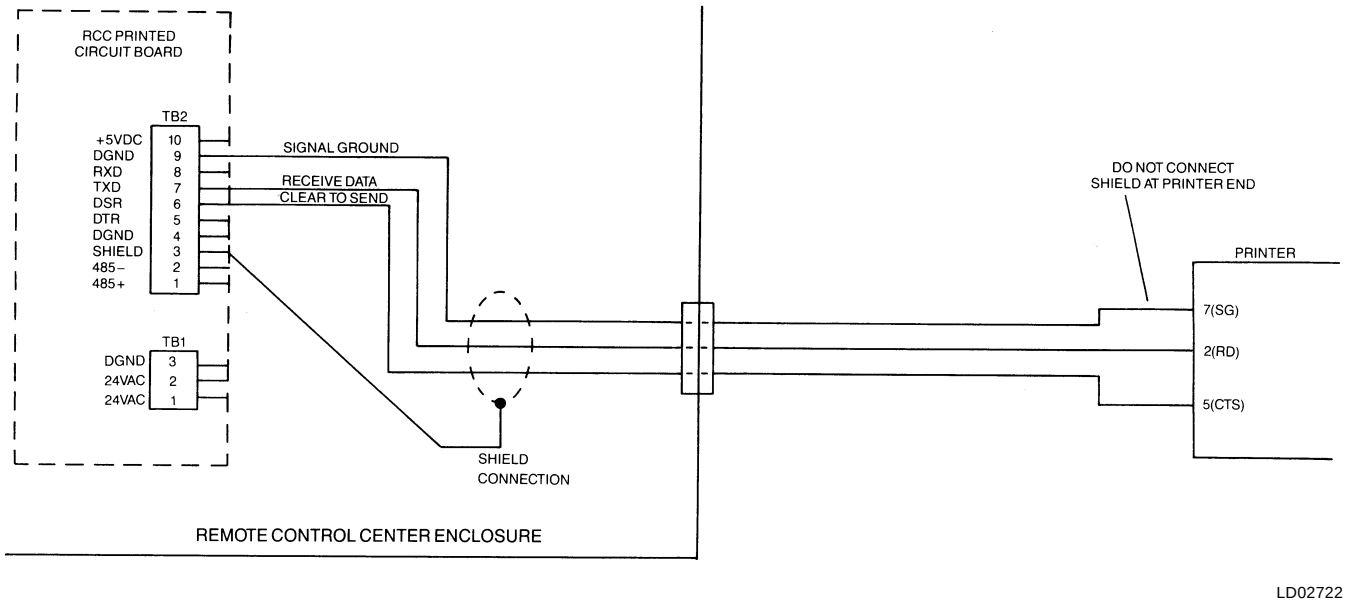


FIG. 3 – PRINTER WIRING

SECTION 2 – RCC OPERATION

GETTING STARTED

When first powered, the message LOSS OF COMM LINK TO AC SCREW PANEL will appear on the RCC display. It will disappear when communications are established in 30 seconds or less. (If backlight is on but no display message appears, ribbon cable to display may be on incorrectly or display is faulty.)

The PLEASE WAIT,,,,, INITIALIZING REMOTE message will appear next. When this step is completed, a status message will appear. Unit is then ready for operation. See page 38 of IOM for chiller operation.

REMOTE PROGRAMMING

Chilled liquid temperatures (Cooling setpoints), Daily/Holiday Schedule (key not shown), and Load Limiting (High Motor Current Unload) setpoints and On/Off control can be programmed from the RCC unit.

All other parameters may only be monitored from the RCC; programming must be done at the chiller.

Full details of the above programmable features are found near pages 126-131 of the Installation, Operation, Maintenance Manual, Form 201.18-NM1.*

* A copy of this manual is provided with each chiller. Extra manuals can be obtained through the (York) Baltimore Parts Center, Baltimore MD. Ph 1-800-9321701.

SYSTEM STATUS

The STATUS KEY will display a **single message** relating to the control status of the chiller or the RCC. 'General' status messages are shown below. Additional details are provided in the IOM.

General status messages can be the following:

UNIT SWITCH OFF (switch located on front panel)

DAILY SCHEDULE SHUTDOWN (daily schedule pre-programmed function)

REMOTE CONTROLLED SHUTDOWN (chiller shut down by manual OFF signal initiated from RCC)

NO RUN PERMISSIVE (flow switch open; no water flow OR external device in series when flow switch is open)

SYS SWITCH OFF (system toggle switches located on microboard in *off* position)

NO COOL LOAD (indicates cooling demand rate does not yet warrant running this system OR loading sequence has not progressed far enough to start this system – often seen during the first few minutes of operation)

COMP RUNNING (compressor on)

PUMPING DOWN (pumpdown sequence at start up or after shutdown in progress)

AR TIMER (6 minute anti-recycle timer allows time for motor to cool sufficiently between compressor starts)

AC TIMER (2 minute anti-coincident timer prevents two compressors from starting at same time)

DISCH LIMITING (discharge pressure has reached the programmable 'discharge pressure unload' setpoint)

SUCT LIMITING (suction temperature has reached a point where icing may occur on the evap tubes)

CURR LIMITING (motor current has reached the programmable 'high motor current unload' setpoint)

EMS LIMITING (motor current has reached the motor current unload setpoint determined by an external signal. See pg. 130 of IOM)

MANUAL OVERRIDE (manual override function initiated at chiller keypad; setpoints at chiller will control)

RCC OPERATION – CONT'D

SYSTEM OPERATING DATA

OPER DATA

Touching the OPER DATA key will allow the operator to display current chiller operating conditions shown below. To scroll through the data, repetitively press the up arrow key to scroll forward, or the down key to go back. An RCC READOUT DIAGRAM provided on page 14 shows the RCC readout source locations.

SYSTEM OPERATING DATA READOUTS

LCHLT = _____	°F (°C) (actual)
RCHLT = _____	°F (°C) (actual)
AMBIENT AIR TEMP _____	°F (°C) (actual)
EVAP WATER PUMP STATUS	ON/OFF
EVAP HEATER STATUS	ON/OFF
COMP (MC) _____	% FLA
HOURS = _____	(cumulative total)
STARTS = _____	(cumulative total)
SYS RUN TIME (DAYS, HOURS, MIN, SEC)	
(run time since last off cycle)	
OIL PRESSURE = _____	PSIG (BAR G)
SUCTION PRESSURE (SP) _____	PSIG (BAR G)
DISCHARGE PRESSURE (DP) ___	PSIG (BAR G)
SUCTION TEMP (ACTUAL) = _____	°F (°C)
DISCH TEMP (ACTUAL) = _____	°F (°C)
OIL TEMP = _____	°F (°C)
SUCT TEMP (SATURATED) = _____	°F (°C)
SUCT SUPER HEAT = _____	°F (°C)
DISCH TEMP (SATURATED) = _____	°F (°C)
DISCH SUPER HEAT = _____	°F (°C)
SLIDE VALVE STEP = _____	
COOLER INLET REFRIG TEMP _____	(R-407C only)
LLSV STATUS	ON / OFF
ECONO TXVSOL STATUS	ON / OFF
FAN STAGE (see page 134 of IOM)	
COMPRESSOR HEATER	ON / OFF
WYE- DELTA	ON / OFF

PRINTING

A printout of the operating data can be obtained when the optional printer is purchased and installed. Printouts or recordings should be taken on a regular basis as part of a normal maintenance schedule. They should then be reviewed by a competent technician for abnormal trends or parameters.

When the PRINT key is pressed, the display will prompt the operator to select either the OPER DATA or the HISTORY to print. Selection is made by touching either key. A history print command will print all 6 faults, described below. When a printer is connected and a fault occurs, a printout will be initiated automatically.

OPER DATA HISTORY

SYSTEM FAULTS / SHUTDOWNS

When the HISTORY key is pressed, the display will prompt the operator to choose a number 1-6. These numbers represent 'safety shutdowns,' which are events (fault shutdowns) that caused the chiller to shut down. The chiller can store up 6 events, with number 1 event being the most recent.

To select which event to display, press the ↑ key until the desired event number appears, followed by the ENTER key. To scroll through the data, repetitively press the up arrow key to scroll forward, or the down arrow key to go back.

Automatic restart will normally occur after a shutdown. However, the operating data should be reviewed for system trends and abnormalities. Should a fault reoccur 3 times within a 90 minute period, the unit will NOT restart. In this event, a service technician should be called to investigate and correct the problem.

The history data provides a snapshot of the operating conditions at the instant the fault shutdown occurred. This data is often valuable information when determining the root cause of a shutdown and in making timely repairs.

A 'LOCKED OUT' fault message may appear at the RCC when fault information is not available or when a data transmission error occurs.

Full details on fault messages and resetting are given in the IOM near pages 107-110. Troubleshooting guide is found near pages 140-142.

SECTION 3 – REFRIGERATION OVERVIEW

CHECKING FOR PROPER OPERATION

Recognition of normal and abnormal trends in system pressures, temperatures, motor current percentage, and slide valve position can help ensure reliable operation and avoid costly equipment down time. The RCC option allows owners/operators/maintenance to easily monitor the system data and spot these trends. When abnormalities are suspected, easy access to system data can help identify the root cause of the problem and speed the repair process.

Maintaining a record of system data unique to your chiller on a weekly basis, or even a daily basis on critical applications, is recommended. A form is provided on page 15 that can be copied and used for data recording. Records should be kept in a secure binder.

Normal readings taken under several various ambient and load conditions should be identified and marked as a baseline reference. These can then be used for comparison and trend spotting purposes.

A printer can also be used for maintaining records. Hand written entries should be made on the printouts to help identify particular variables and trends of interest.

A better understanding of the system data provided by the RCC can be had when the refrigeration cycle is understood. A review of the cycle is provided.

REFRIGERATION CYCLE

The refrigeration cycle description that follows can be traced on the refrigerant flow diagram, Figure 4, page 13, for an R-22 YCAS F water chiller.

The refrigerant 'change of state,' as it changes from liquid to vapor, then back to liquid, is the key component in this heat transfer process. How is this accomplished? A simplified answer is given.

The mechanics of a typical refrigerating machine include these four main components.

A. Evaporator
B. Compressor
C. Condenser
D. Expansion Valve

These components have the following basic functions:

A. In the evaporator, cold refrigerant travels through hundreds of copper tubes. Water passes over the cold outer surface of these tubes, thus chilling the water.

B. The compressor acts like a pump. It increases the pressure of the refrigerant vapor, and moves the refrigerant through the system.

C. The condenser acts like a radiator in an automobile, in that it removes heat from the engine and transfers it to the outside air. In a refrigeration cycle, the condenser cools (removes heat) the refrigerant vapor which is heated as a result of the intense compression (pumping) process of the compressor.

D. The expansion valve acts like a **pressure reducing, flow control nozzle.** The expansion valve will automatically regulate the flow of refrigerant based on the superheat value at the compressor inlet. This is very important in order to ensure that only cool **vapor** goes back into the compressor, and not liquid, as liquid refrigerant intake will cause damage to the compressor and/or oil dilution.

REFRIGERATION OVERVIEW – CONT'D

Follow the flow diagram on page 13:

1. Cold, low pressure refrigerant, (low is typically 55-75 PSI for example) in a mix form of liquid and vapor, enters the cooler tubes and evaporates (vaporizes) as it chills the tubes and absorbs heat from the water passing over the tubes. During this transfer of energy, the water temperature drops, accomplishing the system objective.

2. Cool, low pressure vapor is drawn from the evaporator and into the compressor, where pressure, and subsequently the temperature, are increased. (High pressure typically is in the 150-340 + PSI range).

3. The hot, high pressure vapor exits the compressor and flows through an oil separator, then into the condenser, warming the coils. The hot coils then transfer heat from the vapor to the outside air that is travelling through the coils. As the gas cools, it condenses into a liquid. (Visible through the system sight glass).

4. With sufficient cooling, a stream of warm, high pressure pure liquid refrigerant exits the condenser. It is then fed to an expansion valve, which controls the flow of liquid refrigerant that is fed to the evaporator.

5. A large change in system pressure, and subsequently, a change in temperature, occurs as the liquid flows through the expansion valve. (See P-T chart, page 16. Note temperature change as pressure changes from 200 PSI to 60 PSI). This results in a spray of cold, low pressure refrigerant, part liquid, part vapor, exiting the expansion valve. This cool mix then enters the cooler tubes, evaporates completely, and the cycle is then repeated.

6. On some models, a small percentage of the of refrigerant is drawn off the main liquid refrigerant stream, and fed to a small heat exchanger, called an economizer. This objective is to further cool the main stream of liquid refrigerant being fed to the TXV. This adds more load capacity to the system (at high loads only).

REFRIGERANT FLOW DIAGRAM

YCAS STYLE F SCREW CHILLER

Single refrigerant circuit shown for simplicity.

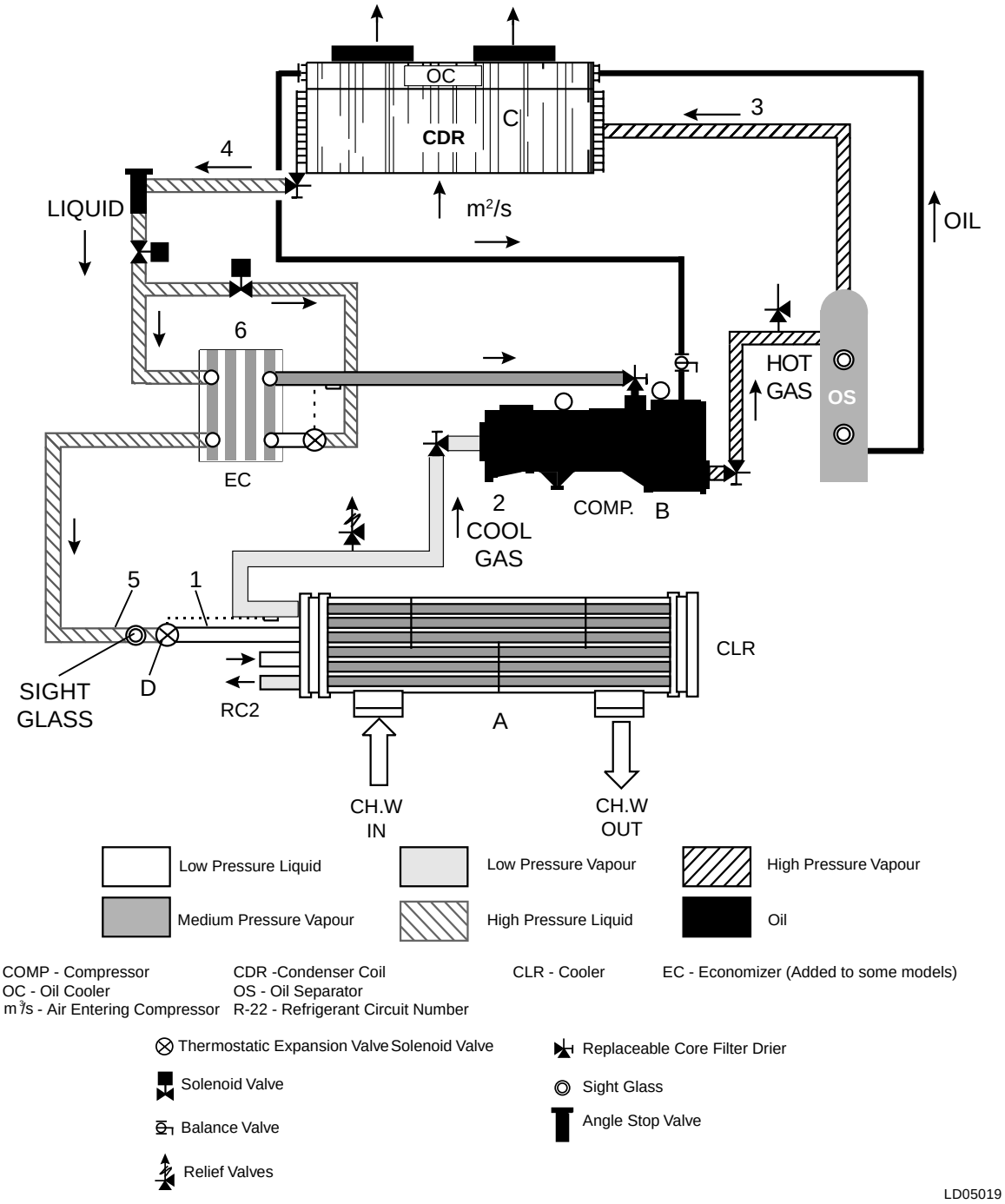


FIG. 4 – YCAS F REFRIGERANT FLOW DIAGRAM

SYSTEM DATA MONITORED BY THE RCC

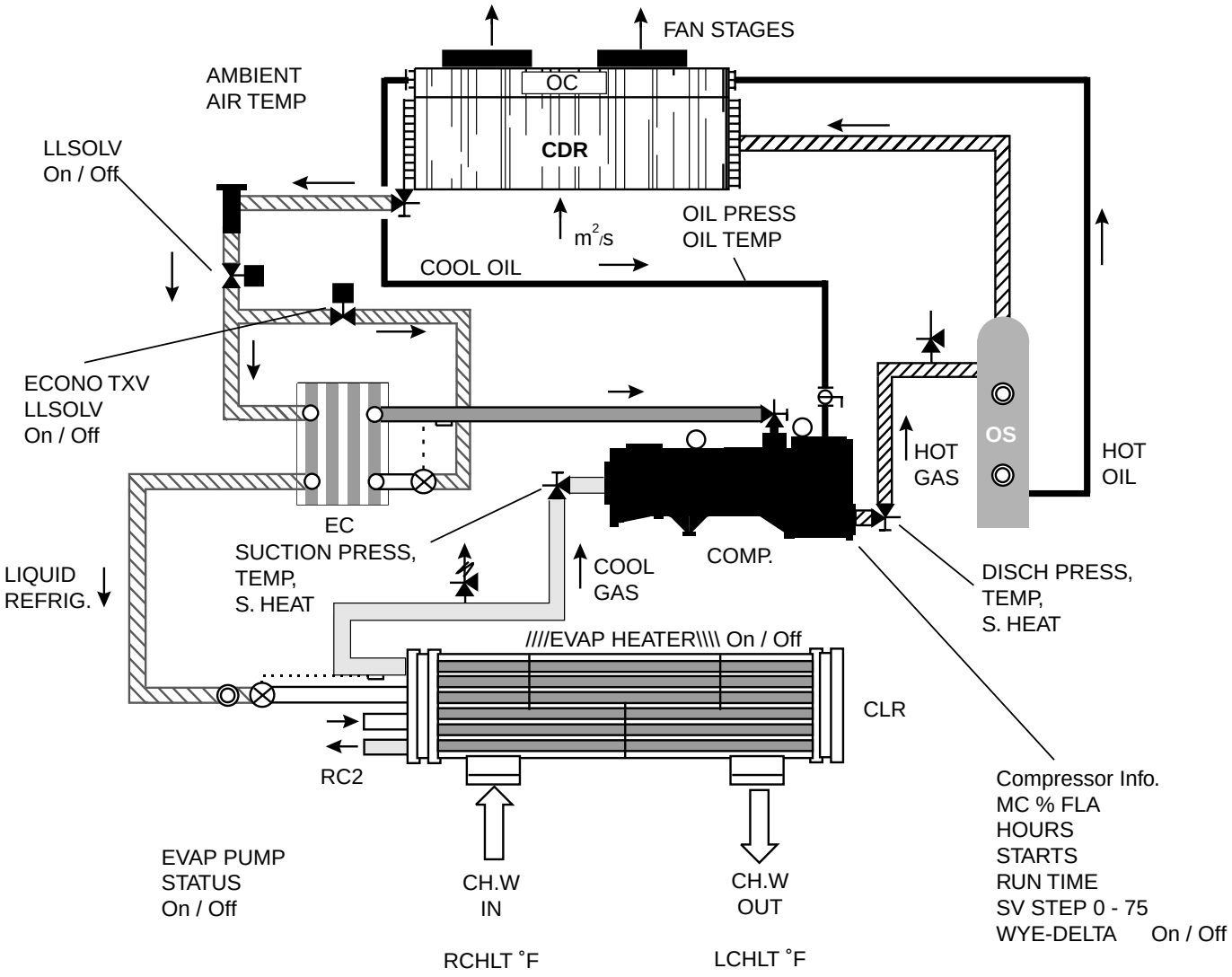


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FIG. 5 – SYSTEM DATA MONITORED BY RCC

SYSTEM OPERATING DATA FORM

SYSTEM OPERATING DATA

LCHLT = _____ °F (°C)
RCHLT = ____ °F (°C) _____ °F (°C) TD
AMBIENT AIR TEMP _____ °F (°C)
EVAP WATER PUMP STATUS ON / OFF
EVAP HEATER STATUS ON / OFF
COMP 1 (MC) _____ % FLA
COMP 2 (MC) _____ % FLA
HOURS 1 = _____
STARTS 1 = _____
HOURS 2 = _____
STARTS 2 = _____
RUN TIME
SYS 1 _____ - _____ - _____ - _____
DAYS HOURS MIN SEC
SYS 2 _____ - _____ - _____ - _____
DAYS HOURS MIN SEC

CHILLER _____ R-22
SETPOINT _____
RANGE +/- _____
Notes:

SYSTEM 1

1 OIL PRESSURE = _____ PSIG (BAR G)
1 SUCTION PRESSURE _____ PSIG (BAR G)
1 DISCHARGE PRESSURE ____ PSIG (BAR G)
1 SUCTION TEMP = _____ °F (°C)
1 DISCH TEMP = _____ °F (°C)
1 OIL TEMP = _____ °F (°C)
1 SAT SUCT TEMP = _____ °F (°C)
1 SUCT SUPER HEAT = _____ °F (°C)
1 SAT DISCH TEMP = _____ °F (°C)
1 DISCH SUPER HEAT = _____ °F (°C)
1 SLIDE VALVE STEP = _____
1 COOLER INLET REFRIG TEMP
= _____ °F (°C) (R-407C only)
1 LLSV STATUS ON / OFF
1 ECON TXVSOL STATUS ON / OFF
1 FAN STAGE _____
1 COMPRESSOR HEATER ON / OFF
1 WYE-DELTA ON / OFF

SYSTEM 2

2 OIL PRESSURE = _____ PSIG (BAR G)
2 SUCTION PRESSURE _____ PSIG (BAR G)
2 DISCHARGE PRESSURE ____ PSIG (BAR G)
2 SUCTION TEMP = _____ °F (°C)
2 DISCH TEMP = _____ °F (°C)
2 OIL TEMP = _____ °F (°C)
2 SAT SUCT TEMP = _____ °F (°C)
2 SUCT SUPER HEAT = _____ °F (°C)
2 SAT DISCH TEMP = _____ °F (°C)
2 DISCH SUPER HEAT = _____ °F (°C)
2 SLIDE VALVE STEP = _____
2 COOLER INLET REFRIG TEMP
= _____ °F (°C) (R-407C only)
2 LLSV STATUS ON / OFF
2 ECON TXVSOL STATUS ON / OFF
2 FAN STAGE _____
2 COMPRESSOR HEATER ON / OFF
2 WYE-DELTA ON / OFF

PRESSURE / TEMPERATURE CHART

This chart shows characteristics of Refrigerant R-22 (Monochlorodifluoromethane) when in the ‘saturated’ state.

Temperature (F)	Pressure (PSIG)
0	24.0
2	25.6
4	27.3
6	29.1
8	30.9
10	32.8
12	34.7
14	36.7
16	38.7
18	40.9
20	43.0
22	45.3
24	47.6
26	50.0
28	52.4
30	54.9
32	57.5
34	60.1
36	62.8
38	65.6
40	68.5
42	71.5
44	74.5
46	77.6
48	80.8
50	84.0
52	87.4
54	90.2
56	94.3
58	97.9
60	101.6
62	105.4
64	109.3
66	113.2
68	117.3
70	121.4
72	125.7
74	130.0
76	134.5
78	139.0
80	143.6
82	148.4
84	153.2
86	158.2
88	163.2
90	168.4

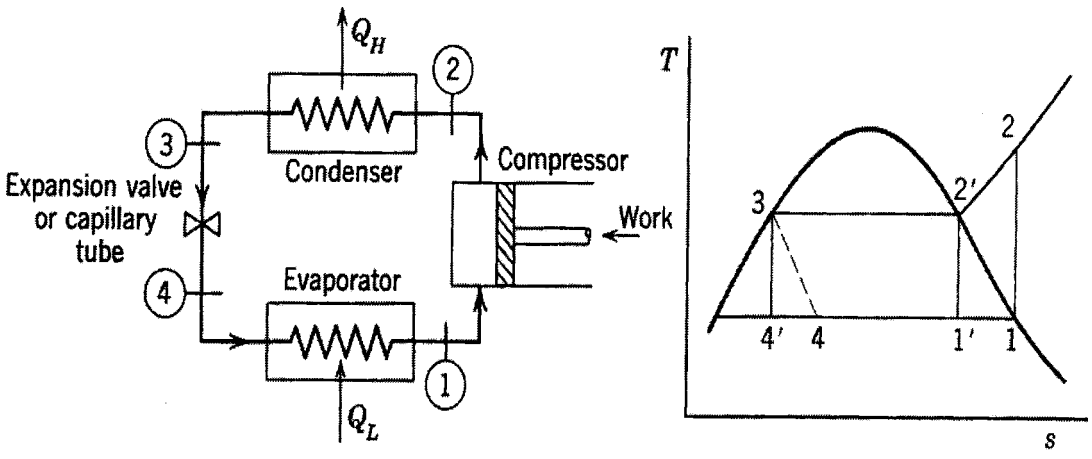
SUCTION

Temperature (F)	Pressure (PSI
92	173.7
94	179.1
96	184.6
98	190.2
100	195.9
102	201.8
104	207.7
106	213.8
108	220.0
110	226.4
112	232.8
114	239.4
116	246.1
118	252.9
120	259.9
122	267.0
124	274.3
126	281.6
128	289.1
130	296.8
132	304.6
134	321.5
136	320.6
138	328.3
140	337.3
142	345.8
144	354.5
146	363.3
148	372.3
150	381.5
152	390.8
154	400.3
156	410.0
158	419.8
160	429.8

DISCHARGE

Borders mark typical operating ranges that can be expected for suction and discharge pressures under moderate to full load, 44°F setpoint, with ambient air temperatures between 90-100°F. This is only a guideline and readings beyond these ranges will occur.

Vapor entering compressor should be superheated 12-15°F. Liquid from condenser should be subcooled 12-15°F. Economizer heat exchanger will provide up to an additional 20-28°F of sub-cooling when in operation.



The Ideal vapor-compression refrigeration cycle.

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FIG. 6 – VAPOR-COMPRESSION REFRIGERATION CYCLE

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SECTION 4 – YORK SERVICES OFFICES (NORTH AMERICAN)

ALABAMA
Birmingham
YORK International Corp.
(205) 987-0458

ARIZONA
Phoenix
YORK International Corp.
(602) 220-9400

CALIFORNIA
Los Angeles
YORK International Corp.
(714) 897-0997
San Francisco
YORK International Corp.
(510) 426-1166

COLORADO
Denver
YORK International Corp.
(303) 649-1500

CONNECTICUT
Danbury
YORK International Corp.
(203) 730-8100

FLORIDA
Miami
YORK International Corp.
(305) 389-9675
Tampa
YORK International Corp.
(381) 621-1323
Orlando
YORK International Corp.
(407) 444-2261

GEORGIA
Atlanta
YORK International Corp.
(404) 925-0346

HAWAII
Honolulu
YORK International Corp.
(808) 596-0761

ILLINOIS
Chicago
YORK International Corp.
(708) 520-1910

INDIANA
Indianapolis
YORK International Corp.
(317) 595-3050

KENTUCKY
Louisville
YORK International Corp.
(502) 499-6020

LOUISIANA
New Orleans
YORK International Corp.
(504) 464-6941

MARYLAND
Baltimore/Washington
YORK International Corp.
(410) 720-6383

MASSACHUSETTS
Boston
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