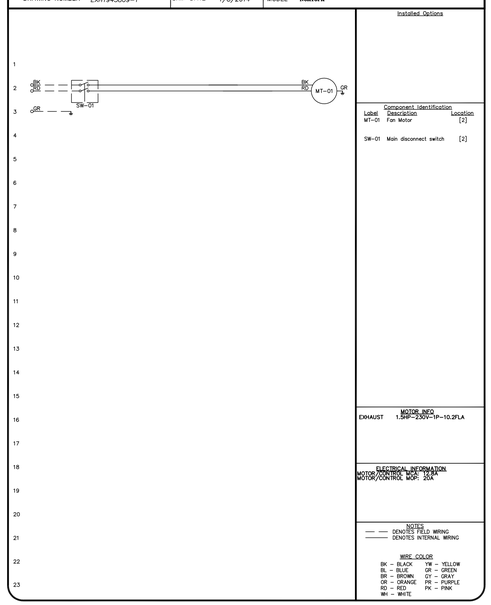
Exhaust Fan Wiring

JOB: 1943809 – Riverside Golf Course r1
DRAWING NUMBER: EXH1943809-1 | SHIP DATE: 1/8/2014 | MODEL: **NCA10FA**



Installed Options

Component Identification

Label	Description	Location
MT-01	Fan Motor	[2]
SW-01	Main disconnect switch	[2]

MOTOR INFO
EXHAUST 1.5HP–230V–1P–10.2FLA

ELECTRICAL INFORMATION
MOTOR/CONTROL BOX: 125A
MOTOR/CONTROL MOP: 20A

NOTES
—— DENOTES FIELD WIRING
—— DENOTES INTERNAL WIRING

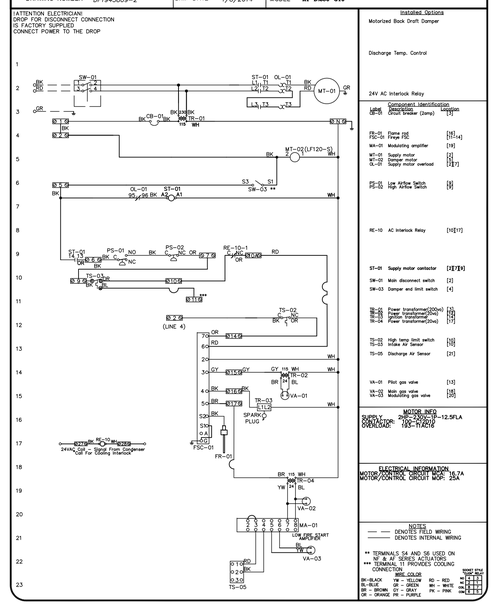
WIRE COLOR

BK – BLACK	YW – YELLOW		
BL – BLUE	GR – GREEN		
BR – BROWN	GY – GRAY		
OR – ORANGE	PR – PURPLE		
RD – RED	PK – PINK		
WH – WHITE			

Direct Fired Heater Wiring

JOB: 1943809 – Riverside Golf Course r1
DRAWING NUMBER: DF1943809-2 | SHIP DATE: 1/8/2014 | MODEL: **A1–D.050–G10**

ATTENTION ELECTRICIAN!
DROP FOR DISCONNECT CONNECTION IS FACTORY SUPPLIED
CONNECT POWER TO THE DROP



Installed Options
Motorized Back Draft Damper
Discharge Temp. Control
24V AC Interlock Relay

Component Identification

Label	Description	Location
CB-01	Circuit breaker (2amp)	[1]
FR-01	Flame rod	[10]
FSC-01	Flame RE	[10]
SW-01	Modulating amplifier	[19]
MT-01	Supply motor	[2]
MT-02	Damper motor	[3]
OL-01	Supply motor overload	[1][7]
PS-01	Low Airflow Switch	[9]
PS-02	High Airflow Switch	
RE-10	AC Interlock Relay	[10][17]
ST-01	Supply motor contactor	[1][7][X]
SW-01	Main disconnect switch	[2]
SW-03	Damper end limit switch	[4]
TB-01	Power transformer(200va)	[2]
TB-02	Power transformer(40va)	[18]
TB-03	Ignition transformer	[12]
TR-04	Power transformer(20va)	
TS-01	High temp limit switch	[10]
TS-03	Intake Air Sensor	[10]
TS-05	Discharge Air Sensor	[21]
VA-01	Pilot gas valve	[13]
VA-01	Main gas valve	[18]
VA-03	Modulating gas valve	[20]

MOTOR INFO
BLOWER MOTOR 2HP–230V–1P–12.5FLA
OPERATION 1725–1140RPM

ELECTRICAL INFORMATION
MOTOR/CONTROL CIRCUIT MOP: 16.7A
MOTOR/CONTROL CIRCUIT MOP: 25A

NOTES
—— DENOTES FIELD WIRING
—— DENOTES INTERNAL WIRING

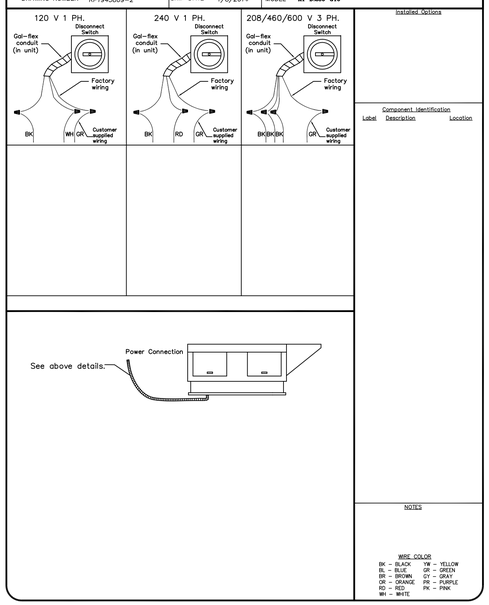
** TERMINALS S4 AND S5 USED ON NF & AF SERIES ACTUATORS
*** TERMINAL 11 PROVIDES COOLING CONNECTION

WIRE COLOR

BK–BLACK	YW – YELLOW		
BL–BLUE	GR – GREEN	WH – WHITE	
BR – BROWN	GY – GRAY	PK – PINK	
OR – ORANGE	PR – PURPLE		

Installation Wiring

JOB: 1943809 – Riverside Golf Course r1
DRAWING NUMBER: RP1943809-2 | SHIP DATE: 1/8/2014 | MODEL: **A1–D.050–G10**



Installed Options

Component Identification

Label	Description	Location

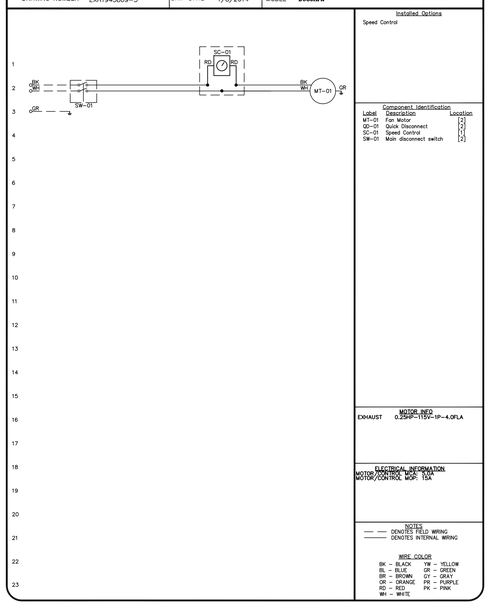
NOTES

WIRE COLOR

BK – BLACK	YW – YELLOW		
BL – BLUE	GR – GREEN		
BR – BROWN	GY – GRAY		
OR – ORANGE	PR – PURPLE		
RD – RED	PK – PINK		
WH – WHITE			

Exhaust Fan Wiring

JOB: 1943809 – Riverside Golf Course r1
DRAWING NUMBER: EXH1943809-3 | SHIP DATE: 1/8/2014 | MODEL: **DU30HFA**



Installed Options
Speed Control

Component Identification

Label	Description	Location
MT-01	Fan Motor	
SC-01	Quick Disconnect	
SC-01	Speed Control	
SW-01	Main disconnect switch	

MOTOR INFO
EXHAUST 0.25HP–115V–1P–4.0FLA

ELECTRICAL INFORMATION
MOTOR/CONTROL BOX: 125A
MOTOR/CONTROL MOP: 15A

NOTES
—— DENOTES FIELD WIRING
—— DENOTES INTERNAL WIRING

WIRE COLOR

BK – BLACK	YW – YELLOW		
BL – BLUE	GR – GREEN		
BR – BROWN	GY – GRAY		
OR – ORANGE	PR – PURPLE		
RD – RED	PK – PINK		
WH – WHITE			

REVISIONS

	DESCRIPTION	DATE:
△		
△		
△		
△		

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MAINE OFFICE
www.captivaire.com
PO Box 86, 179 South Rd., Topsfield, ME, 04490 PHONE: (207) 796-2590 FAX: (919) 227-5946 EMAIL: reg21@captivaire.com

Riverside Golf Course r1
PORTLAND, ME

DATE: 1/8/2014

DWG.#: 1943809

DRAWN BY: BFC–21

SCALE: 3/4" = 1'–0"

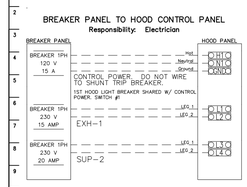
MASTER DRAWING

SHEET NO. 5

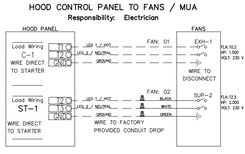
JOB NO 1943809
MODEL NUMBER SC–211110FP
JOB NAME Riverside Golf Course r1
DRAWN BY
DATE 1/8/2014
SCHEMATIC TYPE INSTALL
DWG NO ECP #1–1

DESCRIPTION OF OPERATION:
220V 1 Phase w/ 1 Exhaust Fan, 1 Supply Fan, Exhaust on In Fire, Lights out in Fire, Fan(s) On/Off Thermostatically Controlled. Room temperature sensor shipped loose for field installation.

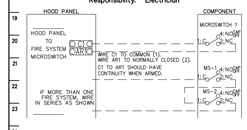
BREAKER PANEL TO HOOD CONTROL PANEL
Responsibility: Electrician

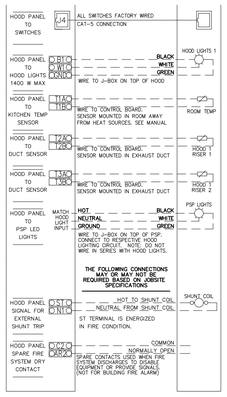


HOOD CONTROL PANEL TO FANS / MUA
Responsibility: Electrician

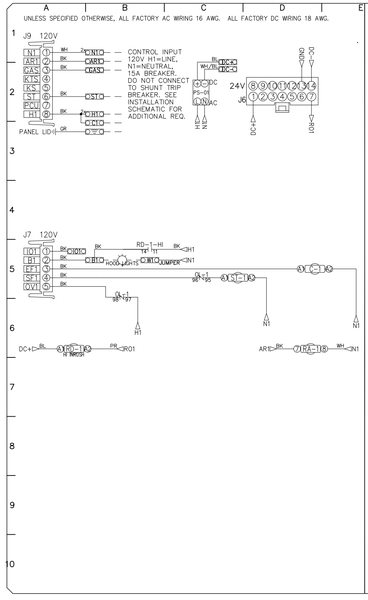


HOOD CONTROL PANEL TO ACCESSORY ITEMS
Responsibility: Electrician



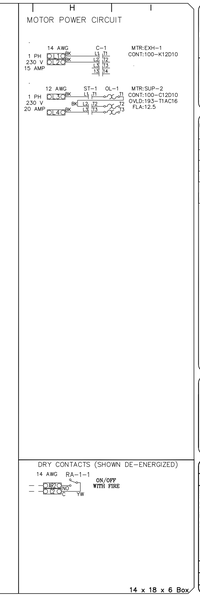


UNLESS SPECIFIED OTHERWISE, ALL FACTORY AC WIRING 16 AWG. ALL FACTORY DC WIRING 18 AWG.



SWITCHES
HM 1
PUT END OF LINE PLUG IN EMPTY RJ45 JACKS, PN: EOL120A
CAT–5 CABLE, LENGTH AS REQUIRED.
CPM03

MOTOR POWER CIRCUIT



DRY CONTACTS (SHOWN DE–ENERGIZED)
14 AWG RA–1–1
ON/OFF WITH FIRE

14 x 18 x 6 Box

FACTORY WIRING SCHEMATIC CIRCUIT BOARDS ECPM03 Rev. 1.29 HMI Rev. 1.05

RA–1 120 VAC RELAY		RD–18 24 VDC RELAY
NO	4 | 11	14 NO
NC	2 | 1	12 NC
COIL	8 | 9	4/13 COIL
COM	6 | 5	11 COM

COMPONENT LIST

LABEL	DESCRIPTION
ST–1	Supply Motor Starter
OL–X	Overload Phrases
C–1	Contactor Phrases
PS–1	Power Sply 24VDC PHOR–15–24
RA–1	120V Relay SPDT PICAL15DS24V
RD–1–18	24VDC High Inrush PN:788–529–High In.

LEGEND
—— FIELD WIRING
—— FACTORY WIRING
BK– BLACK YW– YELLOW
BL– BLUE GY– GREY
BR– BROWN PR– PURPLE
OR– ORANGE RD– RED
WH– WHITE
BK/BL– BK/BL STRIPE
BL/RD– BL/RD STRIPE
RD/OR– RD/OR STRIPE
WH/BL– WH/BL STRIPE

JOB NAME: Riverside Golf C.
DRAWING: SC–211110FP
DESCRIPTION OF OPERATION:
220V 1 Phase w/ 1 Exhaust Fan, 1 Supply Fan, Exhaust on In Fire, Lights out in Fire, Fan(s) On/Off Thermostatically Controlled. Room temperature sensor shipped loose for field installation.

JOB NO	DRAWN BY
1943809	BFC
DATE	SCH
FACTORY 1/8/2014	
DWG NO ECP #1–2	