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ESQUEMA ELECTRICO
WIRING DIAGRAM
SCHEMA ELECTRIQUE
SCHALTPLAN
ELECTRISCH SCHEMA

Elemento Opcional
Optional Element
Elément optionnel
Optionales bauteil
Optioneel element

A realizar por el instalador
To wire by the installer
A câbler par l'installateur
Verdrahtung durch den installateur
Installateurzijdig te bedraden

⚠ RETIRAR PUENTE SI SE MONTA ON/OFF REMOTO
 REMOVE LINK FOR REMOTE ON/OFF OPERATION
 RETIRER LE POND S'IL Y A MARCHÉ/ARRET A DISTANCE
 ENTFERNE DIE VERBINDUNG ZUM EIN/AUS FERNSCHALTER
 VERWIJDER LIK BIJ REMOTE ON/OFF

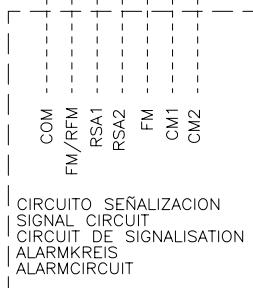
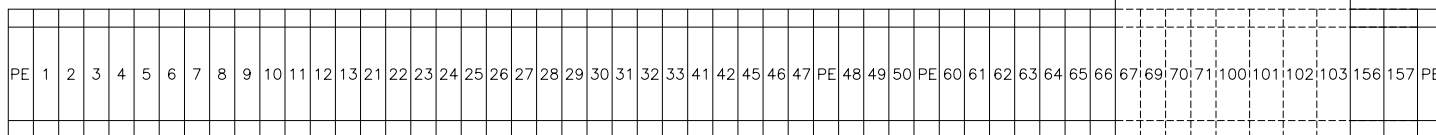
⚠ ESTAS BORNAS SOLAMENTE SE INCLUYEN CON SU OPCIONAL
 THESE TERMINALS ARE ONLY INCLUDED WITH ITS OPTIONAL
 CES CONTACTS SONT INSTALLES SEULEMENT SI ON DEMANDE LEUR OPTIONEL
 DIESE ANSCHLUSSKLEMMEN SIND NUR MIT ZUBEHÖR VERFÜGBAR IHREM
 DEZE AANSLUITKLEMMEN ZIJN ALLEEN VOORZIEN BIJ TOEPASSING VAN HUN OPTIONELE

C	---	24V(c)
R	---	24V
T	---	N/A
G	---	FM
O	---	RV
Y1	---	CM1
Y2	---	CM2
W3	---	EH

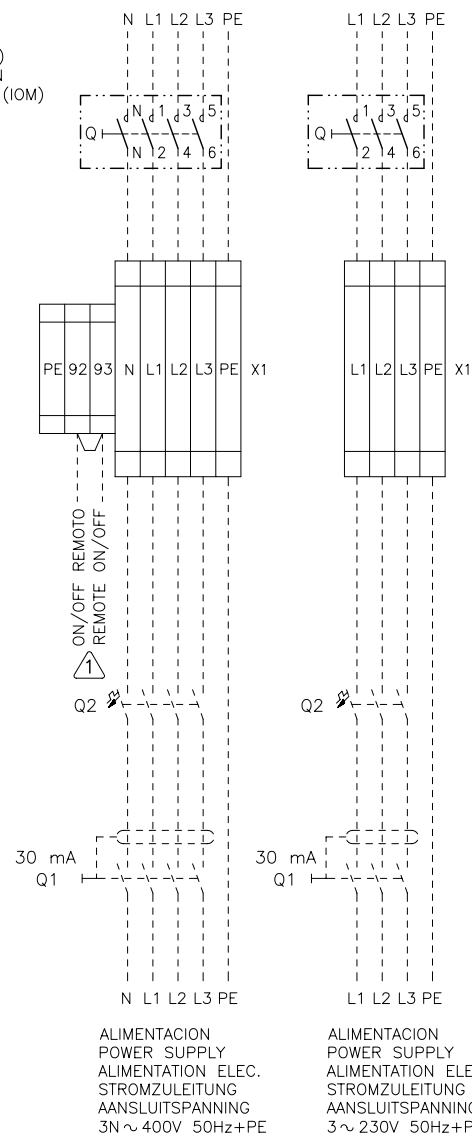
→ CUADRO ELECTRICO FREECOOLING
 FREECOOLING ELECTRICAL BOARD
 COFFRET ELECTRIQUE DU FREECOOLING
 PLATINE FÜR FREIE KÜHLUNG
 PRINT VOOR FREECOOLING

PCB 43041362

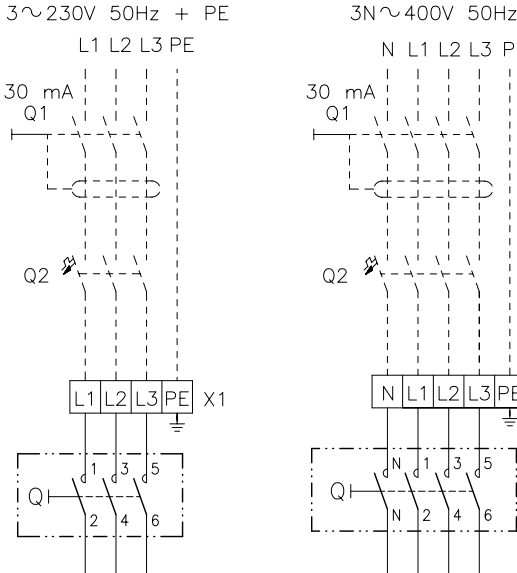
VER MANUAL INSTALACION
 SEE INSTALLATION MANUAL (IOM)
 VOIR LE MANUEL D'INSTALLATION
 SIEHE INSTALLATIONSHANDBUCH (IOM)
 ZIE INSTALLATION MANUAL (IOM)



VENTILADOR U. INTERIOR
 INDOOR UNIT FAN
 VENTILATEUR D'UNITE INTERIEUR
 LÜFTER INNENGERÄT
 BINNENUNIT VENTILATOR



Elemento Opcional
 Optional Element
 A Realizar por el Instalador
 To Wire by the Installer

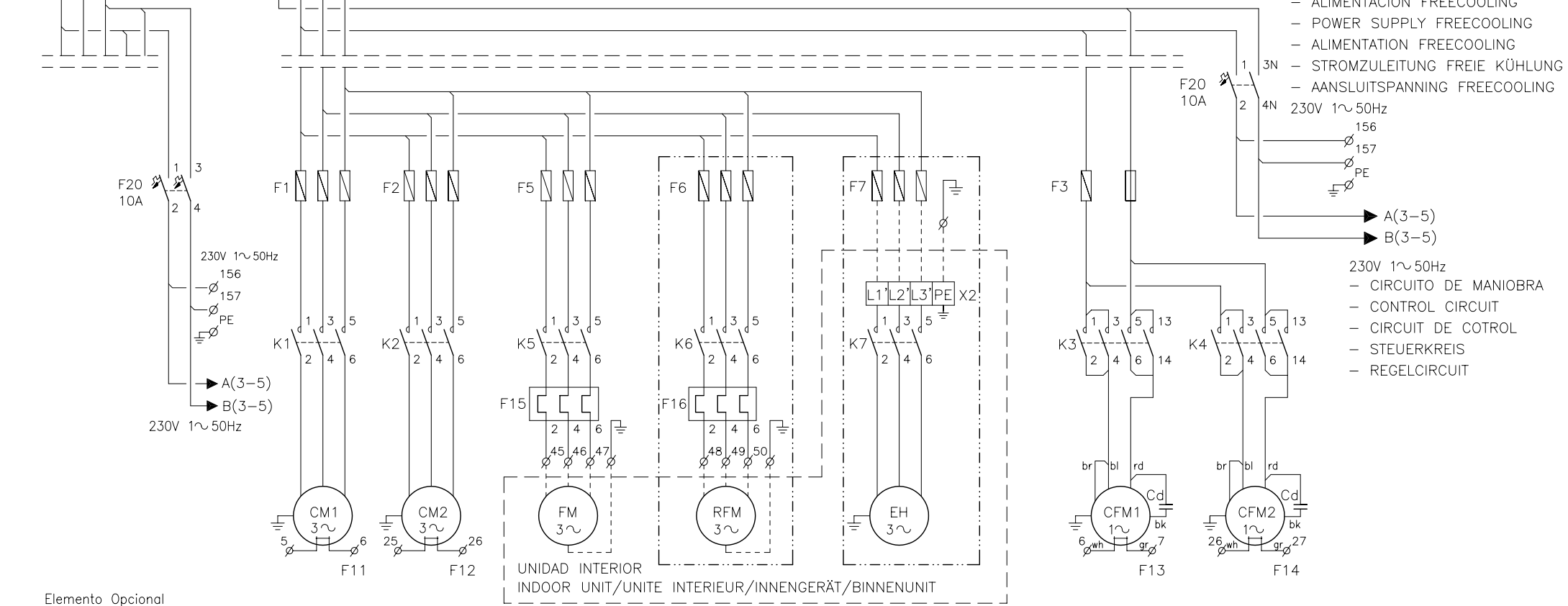


VER MANUAL INSTALACION
SEE INSTALLATION MANUAL (IOM)
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SIEHE INSTALLATIONSHANDBUCH (IOM)
ZIE INSTALLATION MANUAL (IOM)

FUSIBLES FUSES FUSIBLES SICHERUNGEN ZEKERINGEN	ANHK 48D-64D-76D-86D			
	48D	64D	76D	86D
400V 3~50Hz	F1-2(CM1-2) 6x20A	6x25A	6x32A	6x40A
	F5(FM) 3x10A	3x10A	3x10A	3x16A
	F6(RFM) 3x10A	3x10A	3x10A	3x16A
230V 3~50Hz	F1-2(CM1-2) 6x40A	6x50A	6x63A	6x80A
	F5(FM) 3x16A	3x16A	3x16A	3x25A
	F6(RFM) 3x16A	3x16A	3x16A	3x25A
230V 1~50Hz	F3(CFM1-2) 1x10A	1x10A	1x10A	1x10A

INTENSIDAD CURRENT INTENSITÉ STROM STROOM		ANHK 48D		ANHK 64D		ANHK 76D		ANHK 86D	
		Im(MCC)	Ia(LRA)	Im(MCC)	Ia(LRA)	Im(MCC)	Ia(LRA)	Im(MCC)	Ia(LRA)
400V 3~50Hz	CM(1-2)	15,1A	94,0A	20,7A	127A	25,6A	158A	29,8A	189A
	FM	5,1A	—	7,2A	—	7,2A	—	11,9A	—
	RFM	5,1A	—	7,2A	—	7,2A	—	11,9A	—
230V 3~50Hz	CM(1-2)	27,2A	166A	37,2A	224A	46,1A	279A	53,6A	330A
	FM	8,9A	—	12,5A	—	12,5A	—	20,6A	—
	RFM	8,9A	—	12,5A	—	12,5A	—	20,6A	—
230V 1~50Hz	CFM(1-2)	3,5A	—	4,5A	—	4,5A	—	4,5A	—

FUSIBLES BATERIA ELEC. FUSES ELEC. HEATER FUSIBLES RESISTENCE ÉLEC. SICHERUNGEN E.-HEIZUNG ZEKRING ELECTRICISCHE VERHITTER	ANHK 48D-64D-76D-86D		
	48D-64D-76D	48D-64D-76D-86D	48D-64D-76D-86D
400V 3~50Hz	F7(EH)	3x16A	3x32A
230V 3~50Hz	F7(EH)	3x25A	3x50A

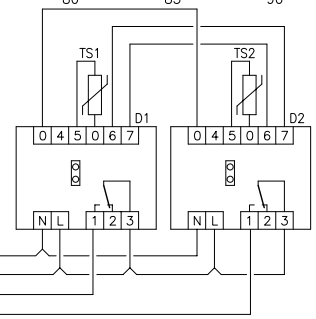
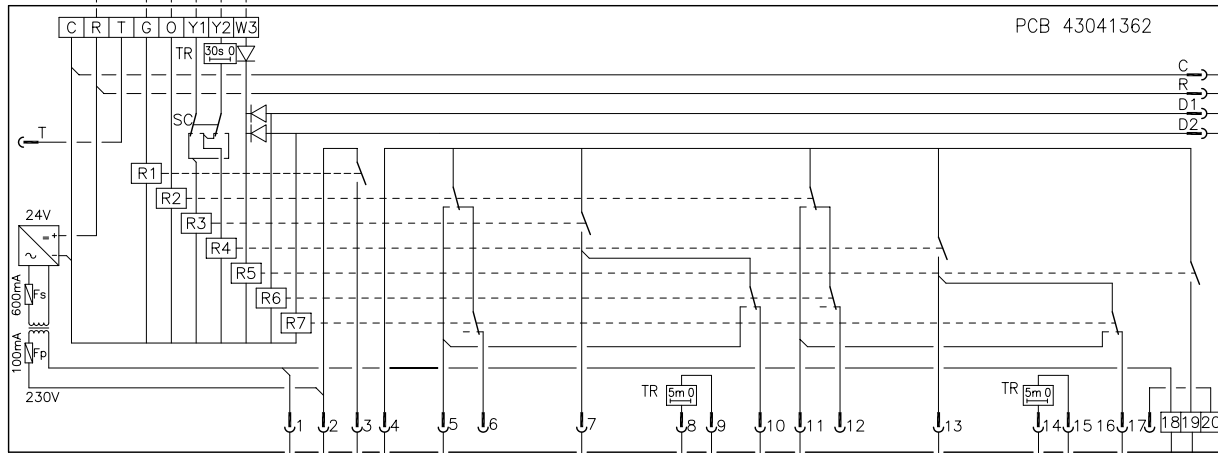


- ALIMENTACION FREECOOLING
 - POWER SUPPLY FREECOOLING
 - ALIMENTATION FREECOOLING
 - STROMZULEITUNG FREIE KÜHLUNG
 - AANSLUITSPANNING FREECOOLING
- 230V 1~50Hz
- CIRCUITO DE MANIOBRA
 - CONTROL CIRCUIT
 - CIRCUIT DE COTROL
 - STEUERKREIS
 - REGELCIRCUIT

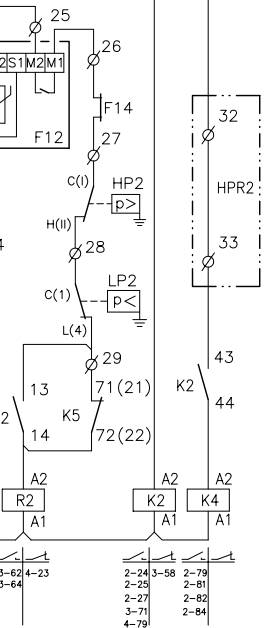
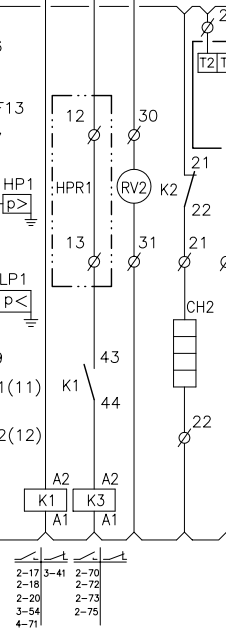
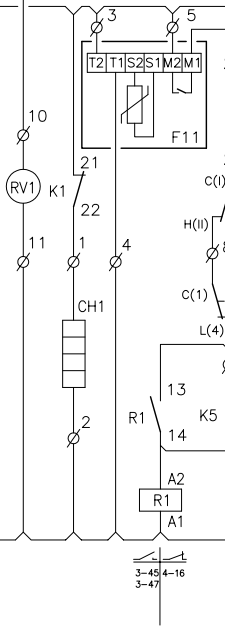
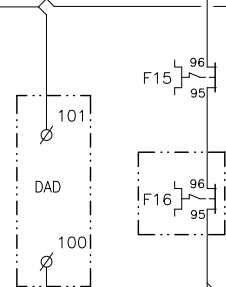
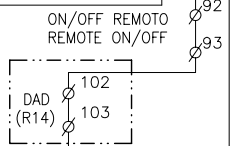
Elemento Opcional
Optional Element
A Realizar por el Instalador
To Wire by the Installer

CUADRO ELECTRICO FREECOOLING
 FREECOOLING ELECTRICAL BOARD
 COFFRET ELECTRIQUE DU FREECOOLING
 PLATINE FÜR FREIE KÜHLUNG
 PRINT VOOR FREECOOLING

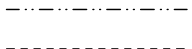
- C --- 24V(c)
- R --- 24V
- T --- N/A
- G --- FM
- O --- RV
- Y1 --- CM1
- Y2 --- CM2
- W3 --- EH



A(2-90) ←
 B(2-90) ←



Elemento Opcional
 Optional Element
 A Realizar por el Instalador
 To Wire by the Installer



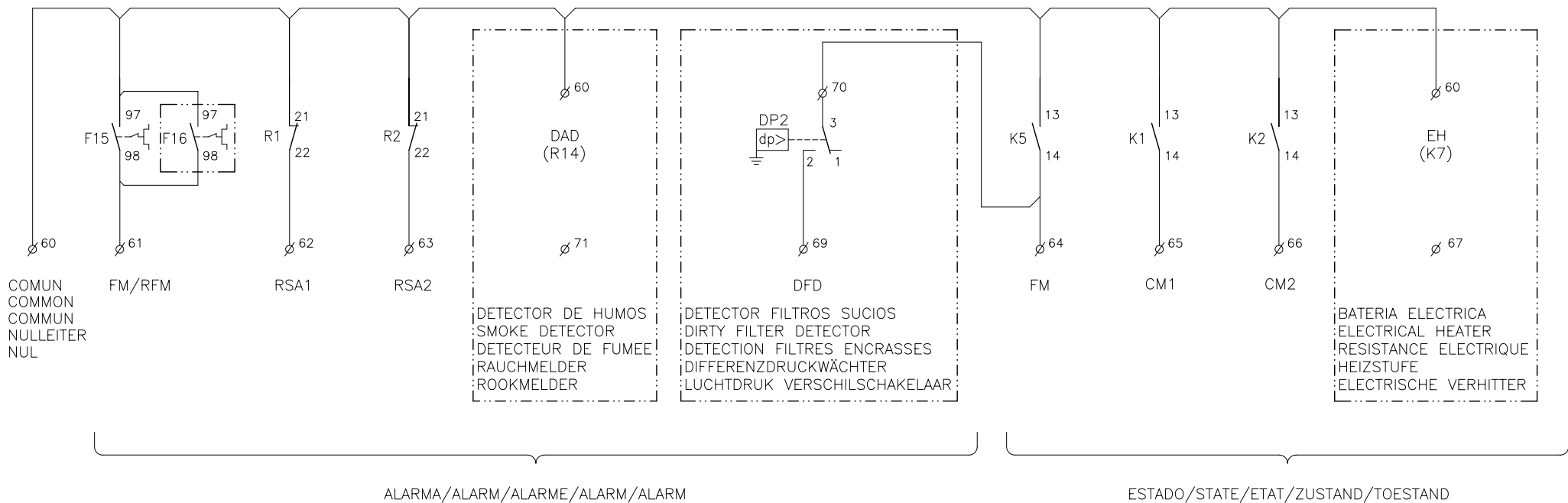
3/9

Lennox Refac S.A. ESQUEMA ELECTRICO
 ELECTRIC DIAGRAM

ANHK VFC + FREECOOLING
 48D-64D-76D-86D

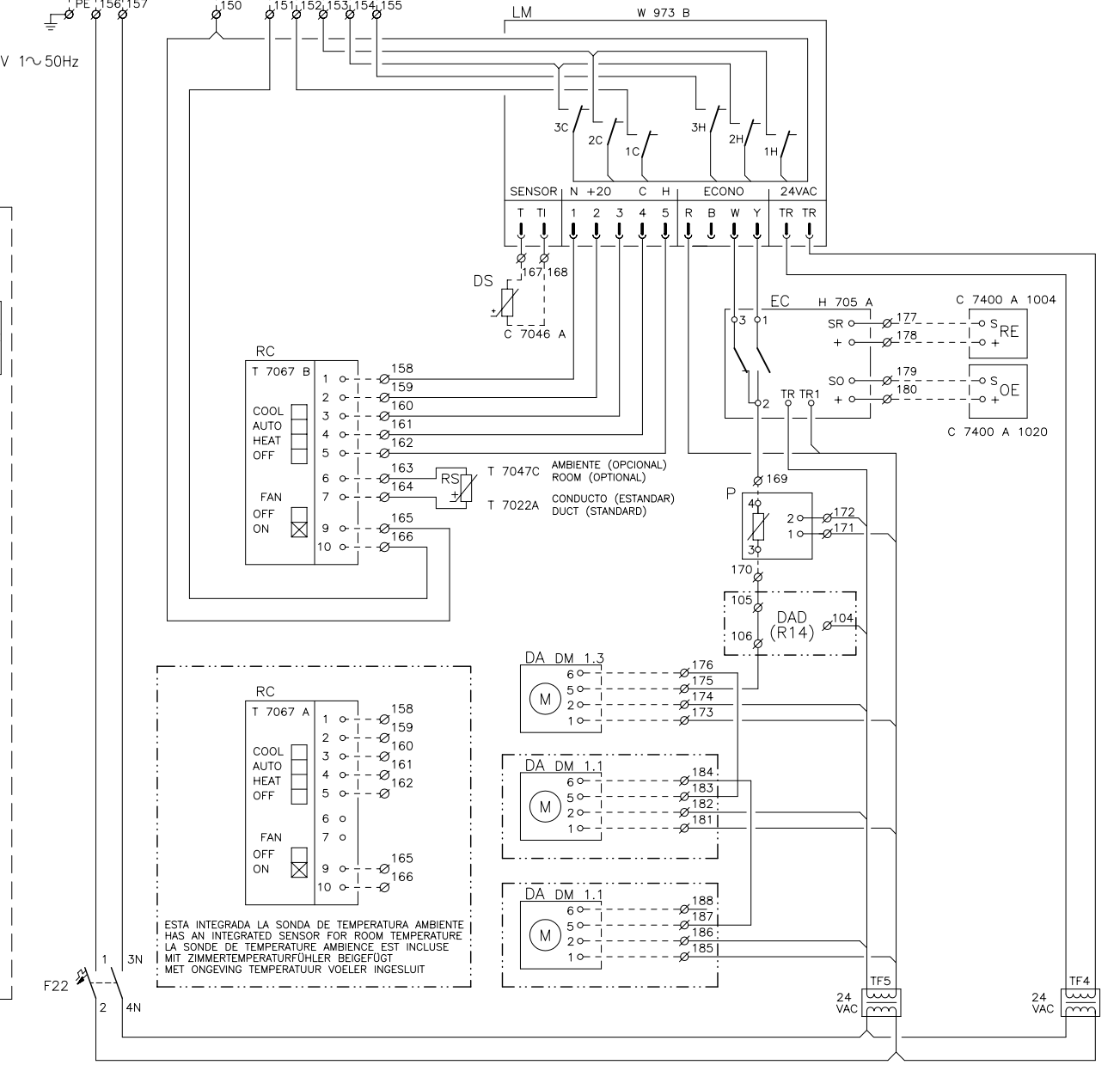
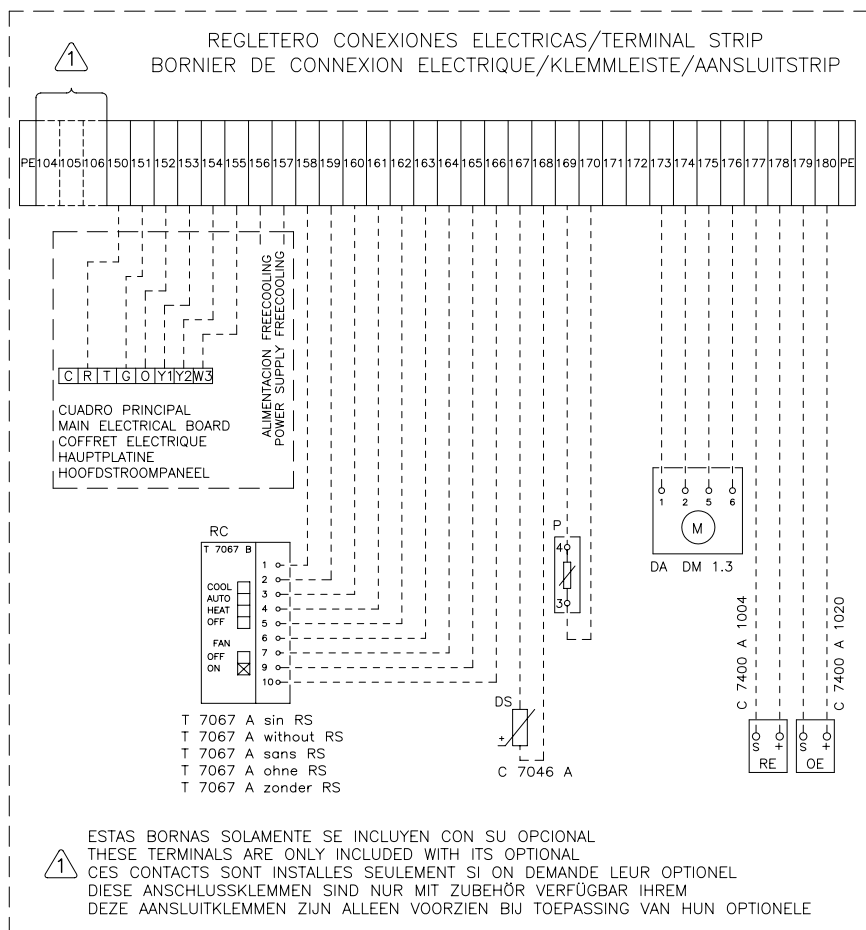
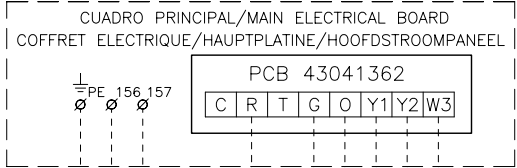
4Z-33-439-511 11E
 3N 400V 50Hz + PE
 3 ~ 230V 50Hz + PE

CIRCUITO SEÑALIZACION
 SIGNAL CIRCUIT
 CIRCUIT DE SIGNALISATION
 ALAMKREIS
 ALARMCIRCUIT



Elemento Opcional
 Optional Element
 A Realizar por el Instalador
 To Wire by the Installer

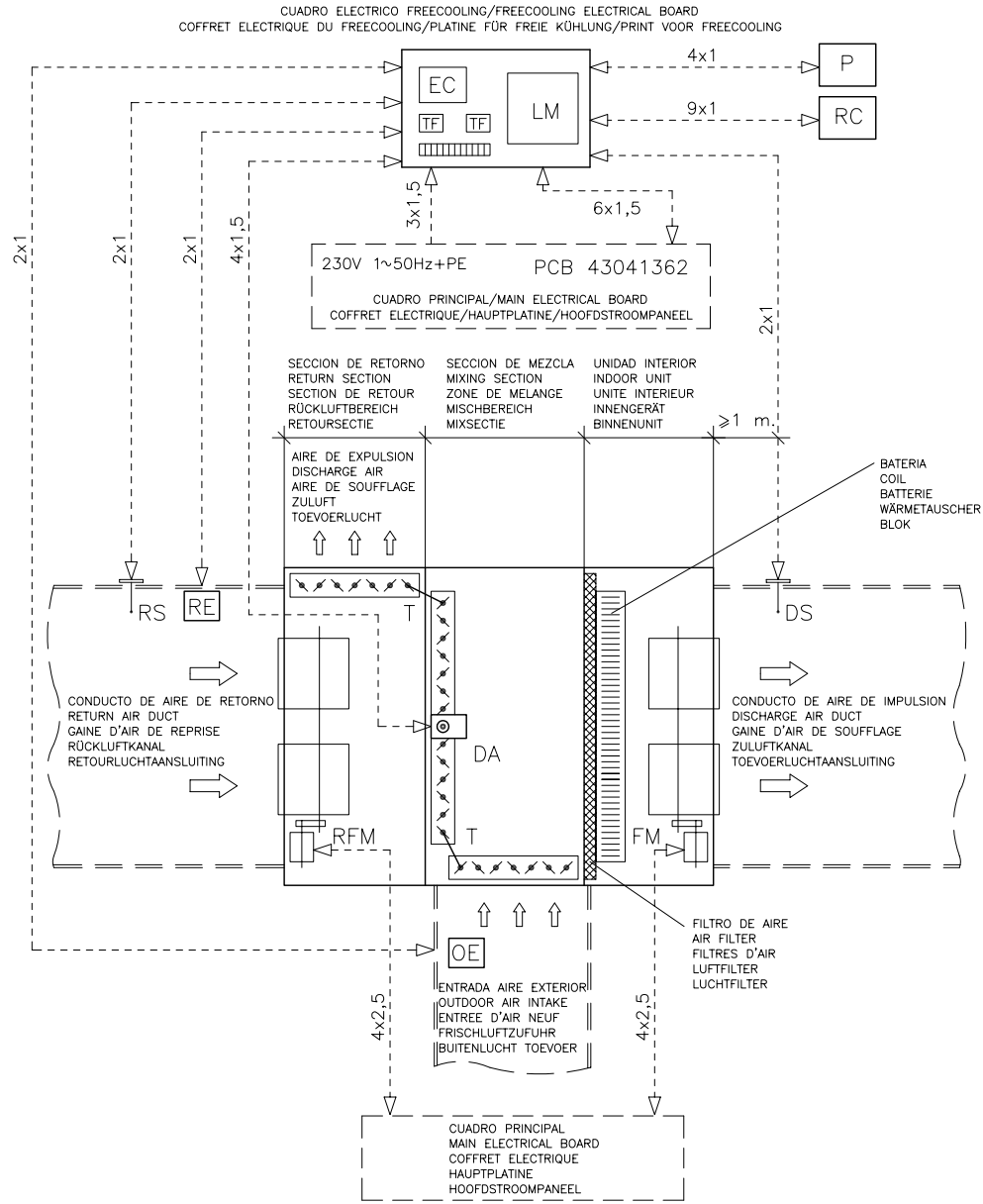
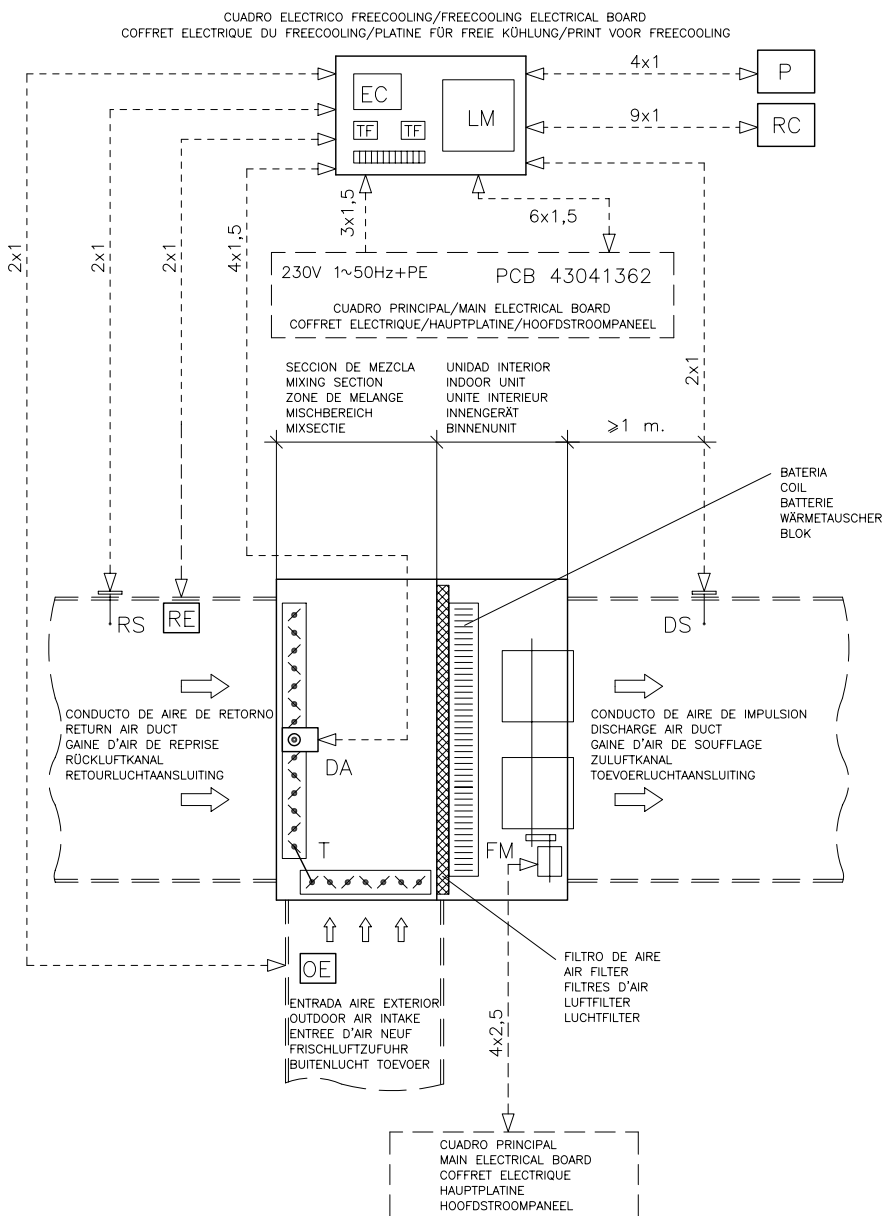
CUADRO ELECTRICO FREECOOLING
 FREECOOLING ELECTRICAL BOARD
 COFFRET ELECTRIQUE DU FREECOOLING
 PLATINE FÜR FREIE KÜHLUNG
 PRINT VOOR FREECOOLING



Elemento Opcional
 Optional Element
 A Realizar por el Instalador
 To Wire by the Installer

ESQUEMA FREECOOLING ENTALPICO SIN VENTILADOR DE RETORNO
 OUTLINE FOR ENTHALPY FREECOOLING WITHOUT RETURN AIR FAN
 SCHEMA FREECOOLING ENTHALPIQUE SANS VENTILATEUR DE REPRISE
 FÜR FREIE KÜHLUNG OHNE ZUSATZVENTILATOR
 SCHEMA VOOR FREECOOLING ZONDER RETOURLUCHTVENTILATOR

ESQUEMA FREECOOLING ENTALPICO CON VENTILADOR DE RETORNO
 OUTLINE FOR ENTHALPY FREECOOLING WITH RETURN AIR FAN
 SCHEMA FREECOOLING ENTHALPIQUE AVEC VENTILATEUR DE REPRISE
 FÜR FREIE KÜHLUNG MIT ZUSATZVENTILATOR
 SCHEMA VOOR FREECOOLING MET RETOURLUCHTVENTILATOR



---- A realizar por el instalador
 ---- To wire by the installer

2x1:N° DE CABLES POR SECCION (mm²)
 2x1:Nr OF CABLES X SECTION (mm²)
 2x1:N° DE CABLES PAR SECTION (mm²)
 2x1:KABELANZAHL PRO BEREICH (mm²)
 2x1:AANTAL KABELS PER SECTIE (mm²)

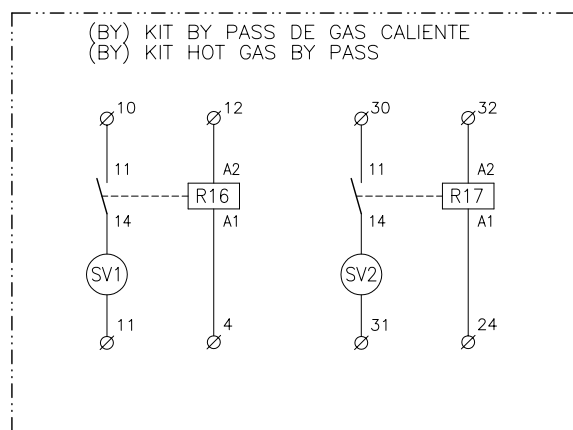
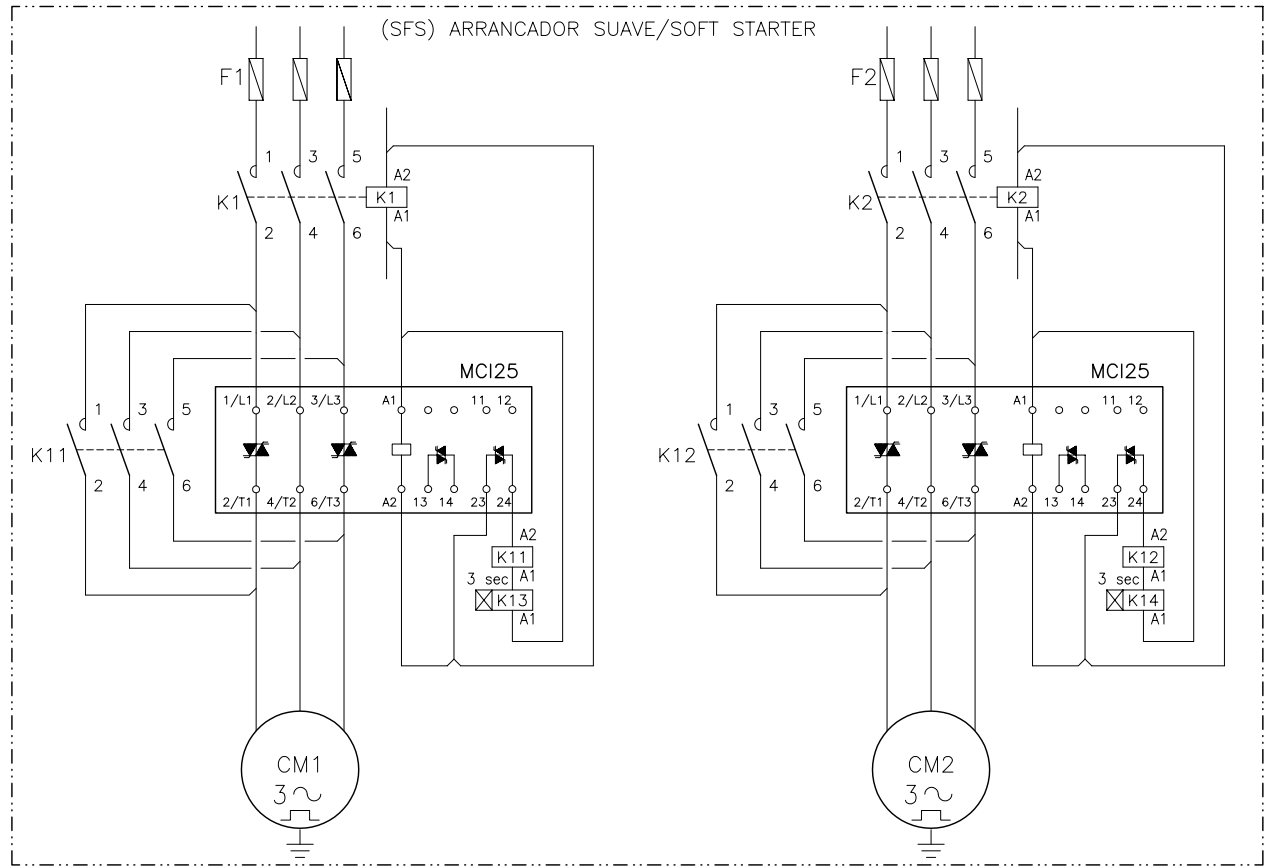
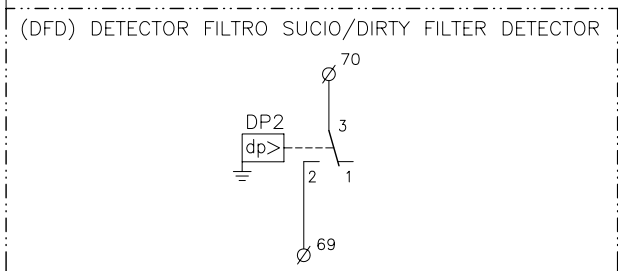
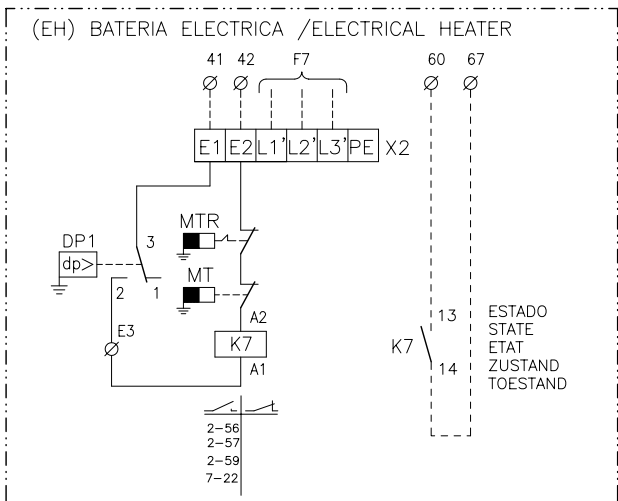
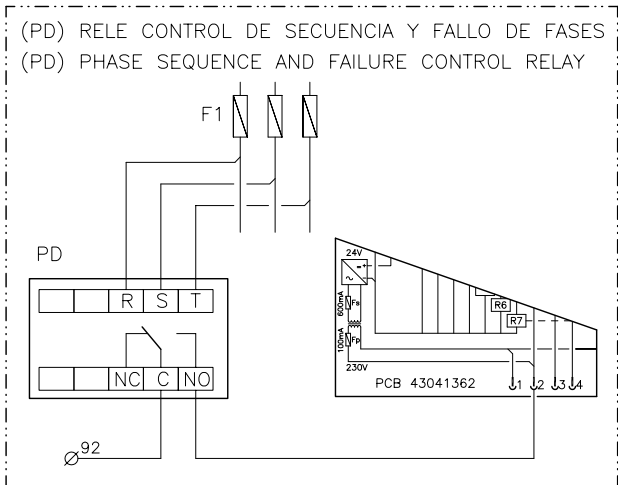
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Lennox Refac S.A.

ESQUEMA ELECTRICO
 ELECTRIC DIAGRAM

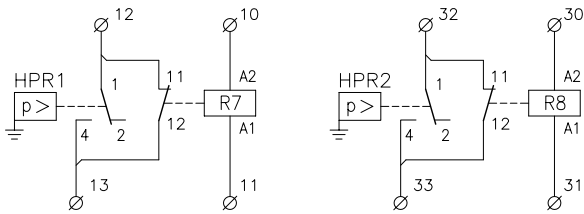
ANHK VFC + FREECOOLING
 48D-64D-76D-86D

4Z-33-439-511 11E
 3N 400V 50Hz + PE
 3 ~ 230V 50Hz + PE



Elemento Opcional
Optional Element
A Realizar por el Instalador
To Wire by the Installer

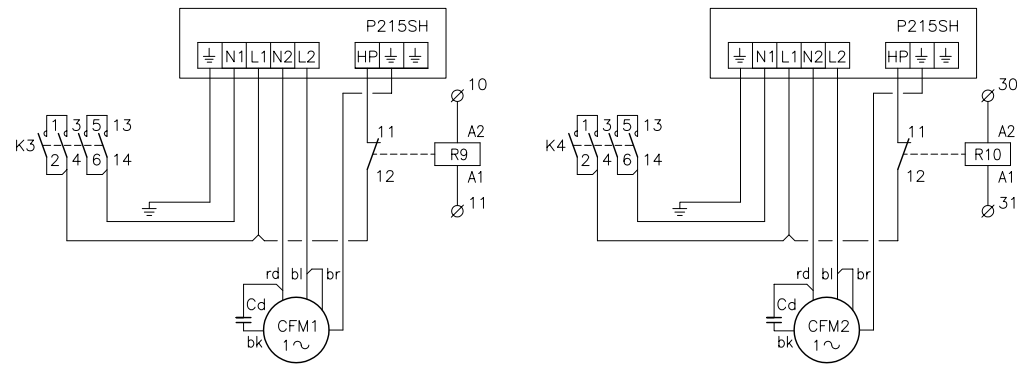
(HPR) CONTROL CONDENSACION TODO/NADA
(HPR) WINTER CONTROL ON/OFF



TARADO DE HPR: CORTE 14BAR REARME 17BAR / HPR SETPOINT: OFF 14BAR RESET 17BAR
 REGLAGE HPR: COUPURE 14BAR REARMEMENT 17BAR / HD-PRESSOSTAT: AUS BEI 14BAR RESET BEI 17BAR
 HD SETPOINT: OFF 14BAR RESET 17BAR

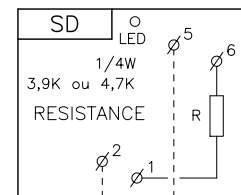
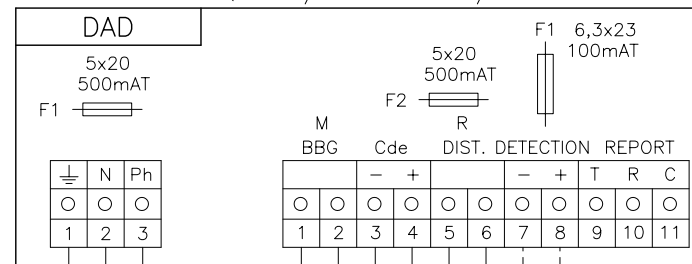
RETIRAR PUENTE SI SE MONTA HPR / REMOVE LINK FOR HPR OPERATION / RETIRER LE POND S'IL Y A HPR /
 ENTFERNE DIE VERBINDUNG ZUM HD-PRESSOSTAT / VERWIJDER LINK BIJ HD BEDRIJF

(FSC) CONTROL DE CONDENSACION/FAN SPEED CONTROL

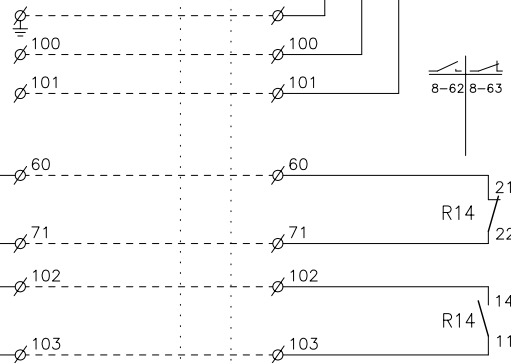


(DAD) CONTROL DETECCION DE HUMOS/SMOKE DETECTION CONTROL

CUADRO ELECTRICO DAD/ELECTRICAL BOARD DAD
 COFFRET ELECTRIQUE DAD/PLATINE FÜR DAD/PRINT VOOR DAD



CUADRO PRINCIPAL/MAIN ELECTRICAL BOARD/COFFRET ELECTRIQUE/HAUPTPLATINE/HOOFDSTROOMPANEEL

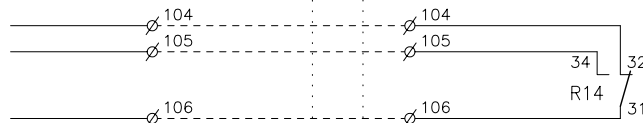


RETIRAR PUENTE (102-103) SI SE MONTA DAD
 REMOVE LINK (102-103) FOR DAD OPERATION
 RETIRER LE POND (102-103) S'IL Y A DAD
 ENTFERNE DIE VERBINDUNG (102-103) ZUM DAD
 VERWIJDER LIK (102-103) BIJ DAD

SEÑAL DE ALARMA
 ALARM SIGNAL
 SIGNALISATION D'ALARME
 ALARMMELDUNG
 ALARM SIGNAL

PARO UNIDAD
 SHUT-DOWN UNIT
 ARRÊT UNITE
 GÉRAT ABSCHALTEN
 UNIT AFSCHAKELEN

CUADRO ELECTRICO FREECOOLING/ELECTRICAL BOARD FREECOOLING
 COFFRET ELECTRIQUE DU FREECOOLING/PLATINE FÜR FREIE KÜHLUNG/PRINT VOOR FREECOOLING



RETIRAR PUENTE (105-106) SI SE MONTA DAD
 REMOVE LINK (105-106) FOR DAD OPERATION
 RETIRER LE POND (105-106) S'IL Y A DAD
 ENTFERNE DIE VERBINDUNG (105-106) ZUM DAD
 VERWIJDER LIK (105-106) BIJ DAD

ABRIR COMPUERTA (ENTRADA AIRE FRESCO 100%)
 OPEN DAMPER ACTUATOR (FRESH AIR INLET 100%)
 OUVRIER MOTEUR DU VOLET (ENTREE AIR NEUF A 100%)
 ÖFFNE FRISCHLUFTKLAPPE (100% FRISCHLUFTZUFUHR)
 OPENENE KLEPMOTOR (100% BUITENLUCHT)

Elemento Opcional
 Optional Element
 A Realizar por el Instalador
 To Wire by the Installer

LEYENDA	LEGEND	REFERENCE	LEGENDE	LEGENDA	
BY Kit by pass de gas caliente	Kit hot gas by pass	By-pass de gaz chaud	Heissgasbypass	Hot gas by-pass	
Cd Condensador	Condenser	Condenseur	Kondensator	Condensator	
CH Resistencia de carter	Crankcase heater	Résistance de carter	Kurbelwannenheizung	Carterverwarming	
CFM Motor ventilador exterior	Compressor fan motor	Moteur ventilateur extérieur	Kondensatorlüftermotor	Condensator ventilador motor	
CM Motor compresor	Compressor motor	Compresseur	Kompressor	Compressor motor	
D1-2 Control desescarche	Defrost control	Contrôleur de dégivrage	Abtauregler	Ontdooi regeling	
DA Actuador de compuertas (freecooling)	Damper actuator (freecooling)	Moteurs volets (freecooling)	Klappenantrieb (freie kühlung)	Klep motor (freecooling)	
DAD Control detección de humos	Smoke detection control	Détecteur fumée	Rauchmelder	Rookdetector	
DFD Detector filtros sucios	Dirty filter detector	Détection filtres encrassés	Differenzdruckwächter	Luchtdruk verschiischakelaar	
DP Presostato diferencial aire	Air pressure differential switch	Pressostat diferencial d'air	differentialluftdruckschalter	Luft druck difereciaal schalter	
DS Sonda temperatura impulsión	Discharge temperature sensor	Sonde de temp. de soufflage	Ablufttemperaturfühler	Uitblaas temperatuur sensor	
EC Analizador entalpía	Enthalpy measure	Mesure d'enthalpie	Enthalpie-Meßgerät	Enthalpie meting	
EH Batería eléctrica	Electrical heater	Résistance électrique	Heizstufe	Electrische verhitter	
FM Motor ventilador interior	Indoor fan motor	Moteur du ventilateur intérieur	Innenventilatormotor	Verdamper ventilatormotor	
Fp/Fs Fusibles PCB	Fusibles PCB	Fusibles de la plaque électronique	Steuerplatinensicherung	PCB zekeringen	
FSC Control de condensación	Fan speed control	Variateur de vitesse du ventilateur	Kondensationsdruckregelung	Ventilator snelheidsregelaar	
F1-7 Fusibles	Fuses	Fusibles	Sicherungen	Zekeringen	
F11-12 Módulo protección compresor	Compressor protector module	Module protection du compresseur	Therm. compressorrelais	Compressor beveiligings module	
F13-16 Protección térmica	Thermal protection	Protection thermique	Therm. kompressorrelais	Compressor thermische beveiliging	
F20,22 Magnetotérmico	Circuitbraker	Magneto thermique	Motorschutzschalter	Thermisch relais	
HP1-2 Presostato de alta	High pressure pressostat	Pressostat HP	Hochdruckpressostat	Hoge druck pressostat	
HPR1-2 Control condensación TODO/NADA	Winter control ON/OFF	C. pression condensation ON/OFF	K. druckregelung ON/OFF	Winter regeling AAN/UIT	
Ia(LRA) Intensidad de arranque	Starting current	Intensité de démarrage	Anlaufstrom	Opstart stroom	
Im(MCC) Intensidad máxima	Maximum current	Intensité maximum	Maximale stromstärke	Maximaal stroom	
K Contactor	Contacteur	Contacteur	schütz	Relais	
LM Módulo lógico	Logic module	Module de control	Logicmodul	Processor	
LP1-2 Presostato baja	Low pressure pressostat	Pressostat BP	Niederdruckpressostat	Lagedruk beveiling	
MT Termostato seguridad (70°C automático)	Safety thermostat (open 70°C autom. reset)	T. securité (70°C automatique)	Sicherheitsther. (70°C automatisch)	T. beveiliging (70°C autoreset)	
MTR Termostato seguridad (105°C manual)	Safety thermostat (open 105°C manu. reset)	T. securité (105°C manuel)	Sicherheitsther. (150°C manuell)	T. beveiliging (105°C handreset)	
OE Sonda entalpía exterior	Outdoor enthalpy sensor	Capteur d'enthalpie extérieure	Enthalpiefühler aussen (freie K.)	Buiten enthalpie opnemer	
P Potenciómetro	Potentiometer	Potentiomètre	Drehwiderstand	Potentiometer	
PCB Placa control	Printed circuit board	Carte électronique	Steuerplatine	Printboard	
PD Relé control de secuencia=fallo de fases	Phase sequence and failure control relay	Détecteur de phase	Phasenfolgenüberwachung+Störemel	Fasevolgorde=foutcontrole relais	
Q Interruptor general	Main switch	Interrupteur général	Hauptschalter	Hoofdschakelaar	
Q1 Interruptor diferencial	Ground safety switch	Interrupteur différentiel	Schalter	Aardlekschakelaar	
Q2 Interruptor magnetotérmico	Circuit breaker	Interrupteur magneto thermique	Motorschutzschalter	Magneetschakelaar	
R7-17 Relé auxiliar	Auxiliary relay	Relais auxiliaire	Hilfsrelais	Aux. relais	
RC Control remoto	Remote control	Contrôle à distance	Fernbedienung	Afstandsbediening	
RE Sonda entalpía retorno	Return enthalpy sensor	Sonde d'enthalpie de retour	Rückluftenthalpiefühler	Retour enthalpie opnemer	
RFM Ventilador de retorno	Return fan motor	Ventilateur de retour	Rückluftventilator	Retour ventilatormotor	
RS Sonda remota conducto	Duct remote sensor	Sonde conduite à distance	Kanalfernfühler	Afstand voeler voor kanaalwerk	
RSA1-2 Relé señal alarma	Alarm signal relay	Relais défaut à distance	Störmelderelais	Storingrelais	
RV1-2 Válvula inversora (frío ON)	Reverse valve (cooling ON)	Vanne renversée (refroidissement)	Umschaltrelais (kühlen ON)	Omkeerlep (koel=bekrachtigd)	
SC Selección prioridad compresores etapa1/2	Switching sequence compressors stage1/2	Selection priorite compresseurs1/2	Vorrangschaltung kompressor 1/2	Compressoromkeerschakeling	
SFS Arrancador suave	Soft starter	Démarrreur progressif	Softstarter/Sanftanlauf	Soft starter	
SD Sensor detector de humos	Smoke detection sensor	Sonde de détection de fumée	Rauchmelder	Rookmelder	
SV1-2 Válvula solenoide	Solenoid valve	Vanne solénoïde	Magnetventil	Magneet ventiel	
T Transmisión por varilla	Transmission	Transmission par tringle	Transmission	Transmissie	
TF4-5 Transformador	Transformer	Transformateur	Transformator	Transformator	
TR Retardo compresor OFF-ON	Delay compressor OFF-ON	Retard du compresseur OFF-ON	Wiederanlaufverzögerung K. OFF-ON	Compressorvertraging UIT-AAN	
TS1-2 Sonda temp. batería unidad exterior	Outdoor unit coil temperature sensor	Sonde temp. de batterie extérieur	Temperaturfühler kondensator	Buitennunit bloktemp. opnemer	
CODIGO DE COLORES		CODE COLEUR		KLEURCODE	
bk negro	black	noir	FARBKENNUNG	zwart	
br marrón	brown	brun	schwarz	bruin	
rd rojo	red	rouge	braun	rood	
or naranja	orange	orange	rot	oranje	
yl amarillo	yellow	jaune	orange	geel	
gn verde	green	vert	gelb	groen	
bl azul	blue	bleu	grün	blauw	
vi violeta	violet	violet	blau	violet	
gr gris	gray	gris	violett	grijs	
wh blanco	white	blanc	grau	wit	
			weiss		