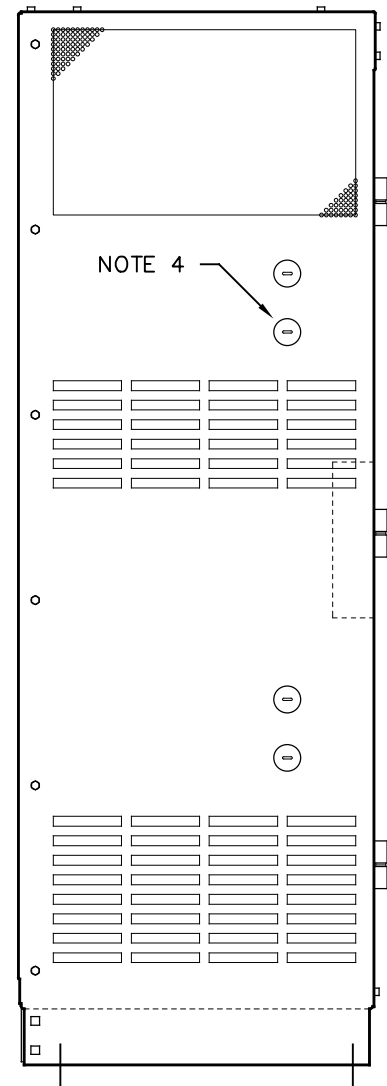
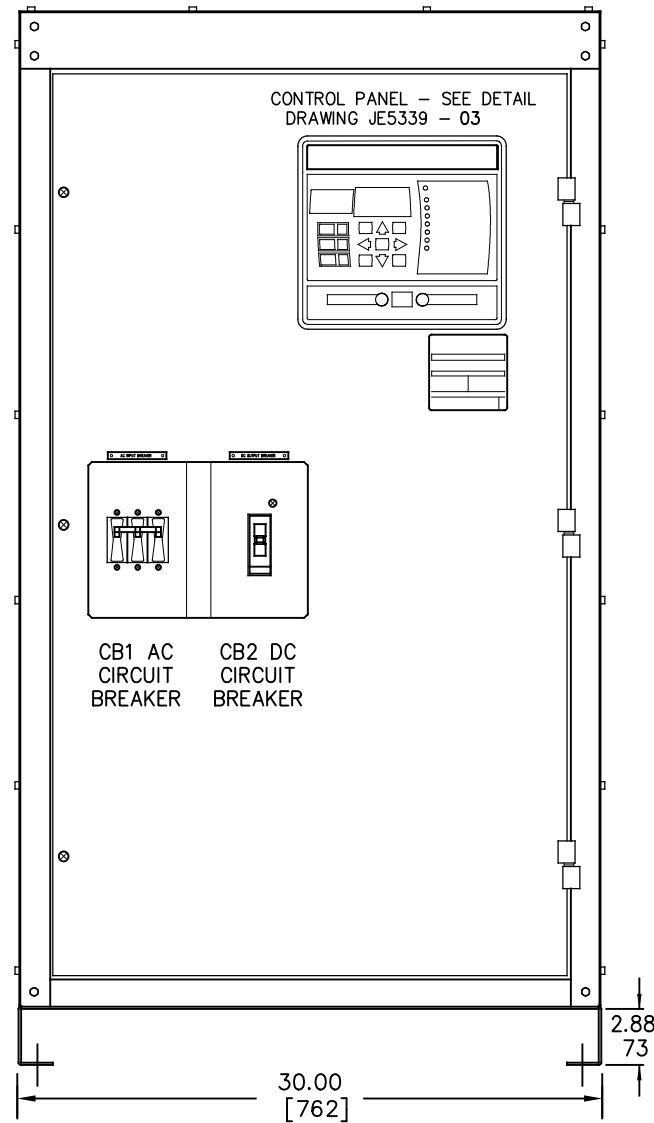


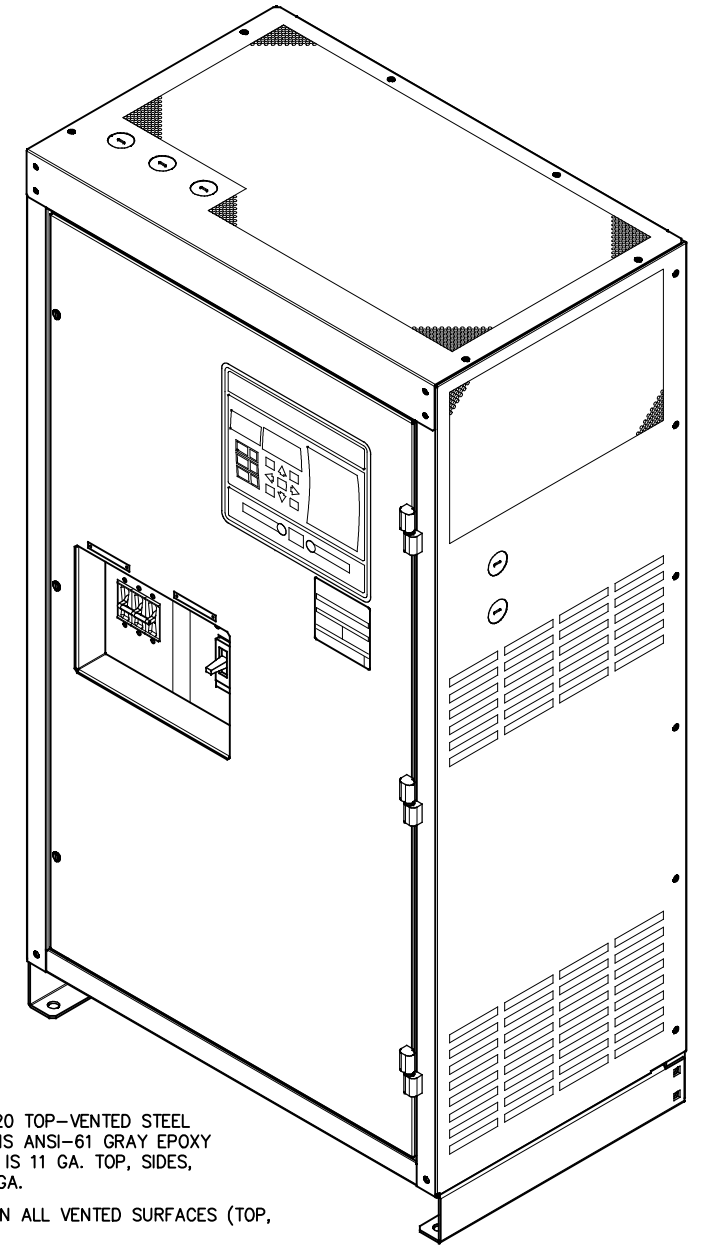
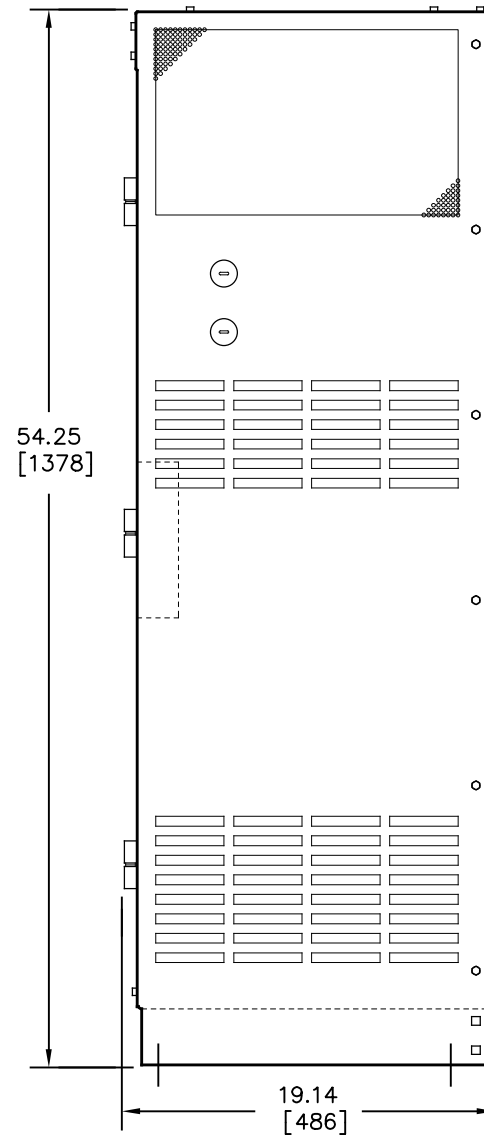
SIDE VIEW



FRONT VIEW

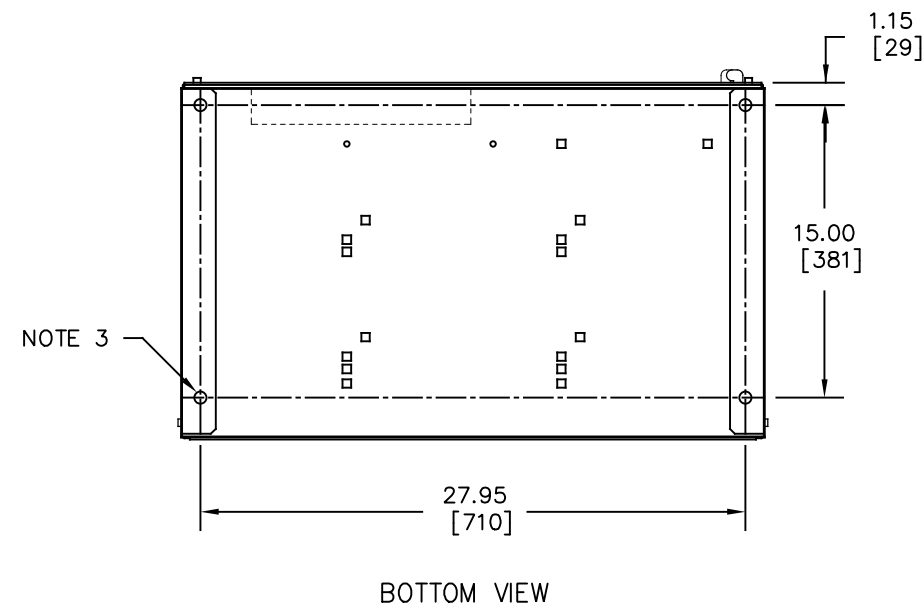


SIDE VIEW



NOTES:

- ENCLOSURE IS A NEMA TYPE 1 / IP20 TOP-VENTED STEEL CABINET WITHOUT GASKETS. FINISH IS ANSI-61 GRAY EPOXY POWDERCOAT. BASE IS 7 GA. FRAME IS 11 GA. TOP, SIDES, AND BACK ARE 16 GA. DOOR IS 14 GA.
- ALLOW 6in / 152mm OF FREE AIR ON ALL VENTED SURFACES (TOP, SIDES & REAR) FOR COOLING.
- FOUR (4) 0.625in / 16mm FLOOR-MOUNTING HOLES ARE PROVIDED ON BOTTOM OF ENCLOSURE AS SHOWN.
- NINE (9) 1.31in / 33mm DIA STANDARD PRE-FAB KEY-SLOT KNOCKOUTS ARE PROVIDED AS SHOWN FOR 1in / 25mm CONDUIT ENTRY. IF ADDITIONAL CONDUIT ENTRANCES ARE REQUIRED, ENCLOSURE SHOULD BE FIELD-MODIFIED BY INSTALLER.
- BATTERY CHARGER SHIPPING WEIGHT: APPROXIMATELY TBD lbs / TBD kg



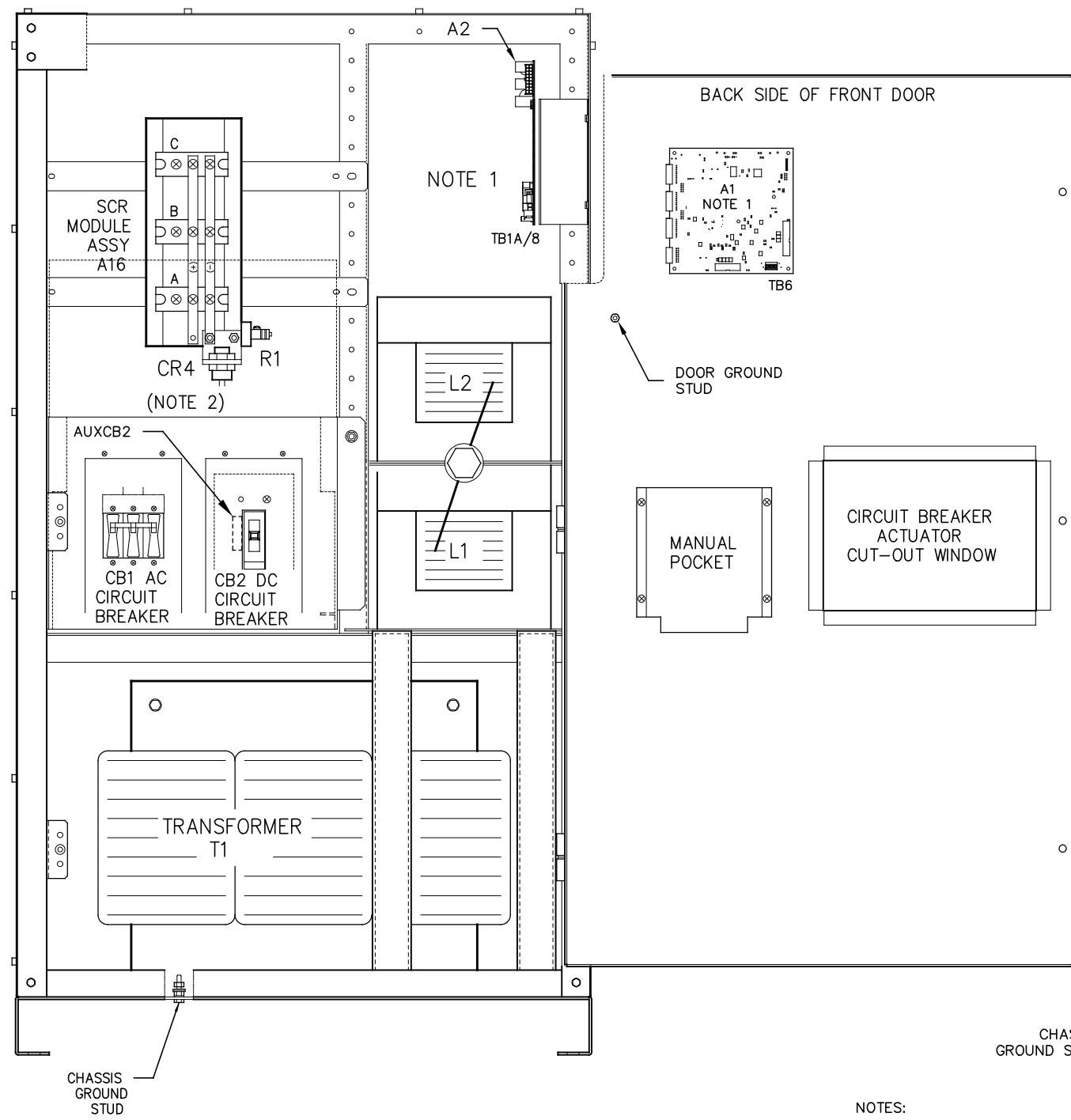
DUAL DIMENSIONS in mm

REV. 0	DRN BY KJB	CHK BY MCR	APP BY MCR	DATE 10/26/2021	DRN BY KJB	DATE 10/26/2021		1075 Saint John Street Easton, PA 18042-6661 PH 610-330-9000 FAX 610-330-8510 www.hindlepowerinc.com	
DESCRIPTION STANDARD DRAWINGS.					CHK BY MCR	DATE 10/26/2021			
ECN NO. N/A					CHK BY MCR	DATE 10/26/2021	TITLE ATEVO 3PH BATTERY CHARGER OUTLINE: NEMA-1 STYLE-5030 ENCL 3Ø W/O OPTIONS 50-100A		
							SCALE B NTS	DWG No JE5337-03	REV 0 SHEET 1 OF 1

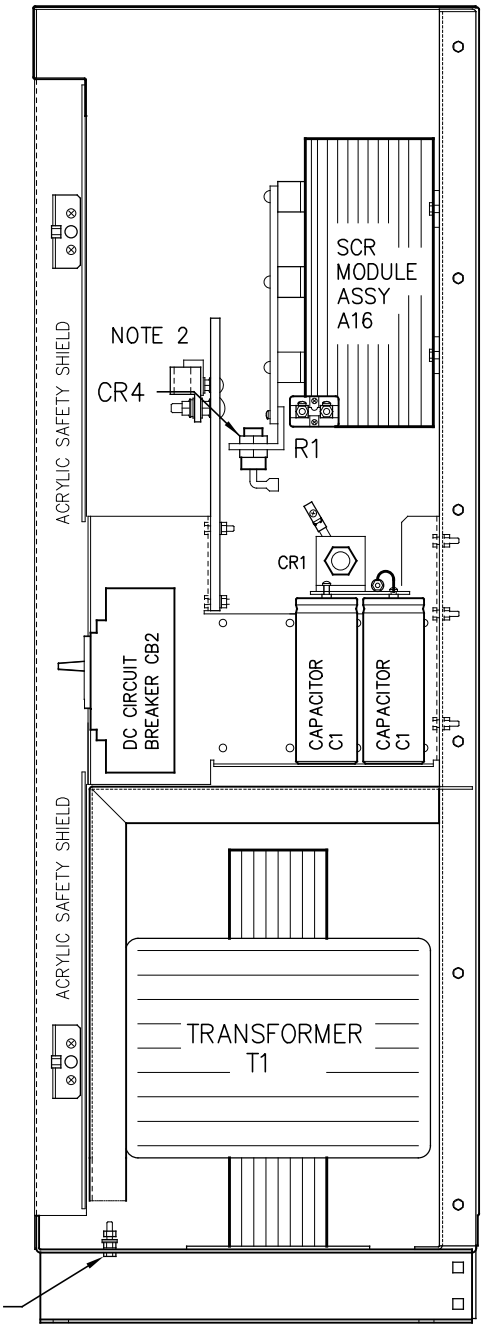
SYM STANDARD COMPONENT DESCRIPTION

- A1 MAIN CONTROL PC BOARD
- A2 THREE PHASE POWER BOARD
- A9 MOV PC BOARD
- A16 6-PULSE SCR MODULE HEATSINK ASSY
- C1x DC OUTPUT FILTER CAPACITOR
- CB1 AC INPUT CIRCUIT BREAKER (CD3)
- CB2 DC OUTPUT CIRCUIT BREAKER (Hx2)
- AUXCB2 DC CKT BKR (CB2) AUXILIARY CONTACTS
- CR1 POLARITY DIODE
- CR4 FREE-WHEELING DIODE
- L1 MAIN INDUCTOR
- L2 FILTER INDUCTOR
- R1 MAIN DC SHUNT, NEG(-) BUS
- R9 FILTER CAP (C1) BLEED RESISTOR
- T1 POWER ISOLATION TRANSFORMER
- TB1A REMOTE SENSE (A2)
- TB6 SUMMARY ALARM CONTACTS
- TB8 TEMPCO PROBE TERMINAL BLOCK

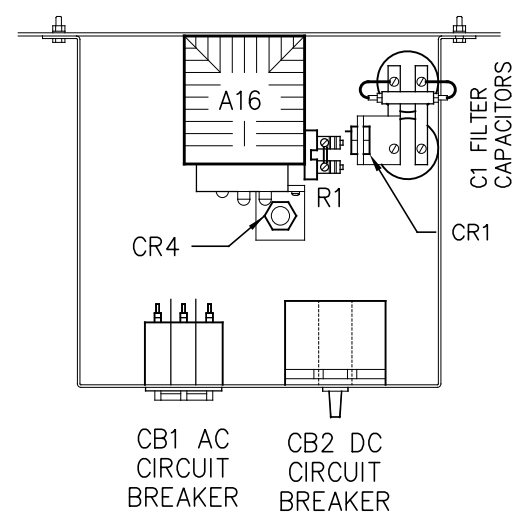
FRONT VIEW



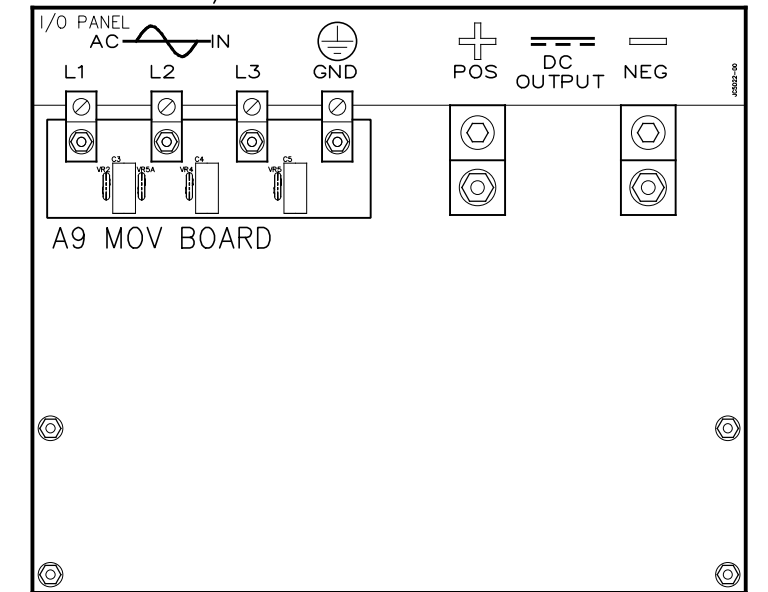
SIDE SECTION



TOP VIEW OF CIRCUIT BREAKER MOUNTING BRACKET



I/O TERMINAL BOARD DETAIL



NOTES:

1. FOR DETAIL VIEWS OF ALL PC BOARDS (A1, A2, A4, A12, A22, etc.) SEE DRAWING JE5339-03
2. I/O PANEL TERMINAL BOARD NOT SHOWN FOR CLARITY OF VIEW. SEE DETAIL TO RIGHT.

I/O TERMINAL	DESCRIPTION - TYPE	CONNECTION
I/O(+/-)	POS/NEG DC OUTPUT TERMS - CU-ALUMINUM COMPRESSION LUG	#6 AWG-350 MCM
I/O-GND	USER GROUND TERMINAL - CU-ALUMINUM COMPRESSION LUG	#14-AWG-550 MCM
I/O-L1/L2/L3	AC INPUT TERMINALS - CU-ALUMINUM COMPRESSION LUG	#14-1/0 AWG
(A1) TB6	SUMMARY ALARM TERMINAL BLOCK (A1) - SOLDERLESS COMPRESSION SCREW	#22-14 AWG
(A2) TB1	POS/NEG REMOTE SENSE TERMS (A2) - SOLDERLESS COMPRESSION SCREW	#22-14 AWG
(A2) TB8	TEMPCO PROBE (A10) TERM BLK - SOLDERLESS COMPRESSION SCREW	#22-14 AWG

REV. DRN BY 0 KJB	CHK BY MCR	APP BY MCR	DATE 10/26/2021	DRN BY KJB	DATE 10/26/2021
DESCRIPTION STANDARD DRAWINGS.				CHK BY MCR	DATE 10/26/2021
ECN NO. N/A				CHK BY MCR	DATE 10/26/2021

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TITLE

ATEVO 3PH BATTERY CHARGER
INTERNAL COMPONENT LAYOUT: STYLE-5030
3Ø W/O OPTIONS 50-100A

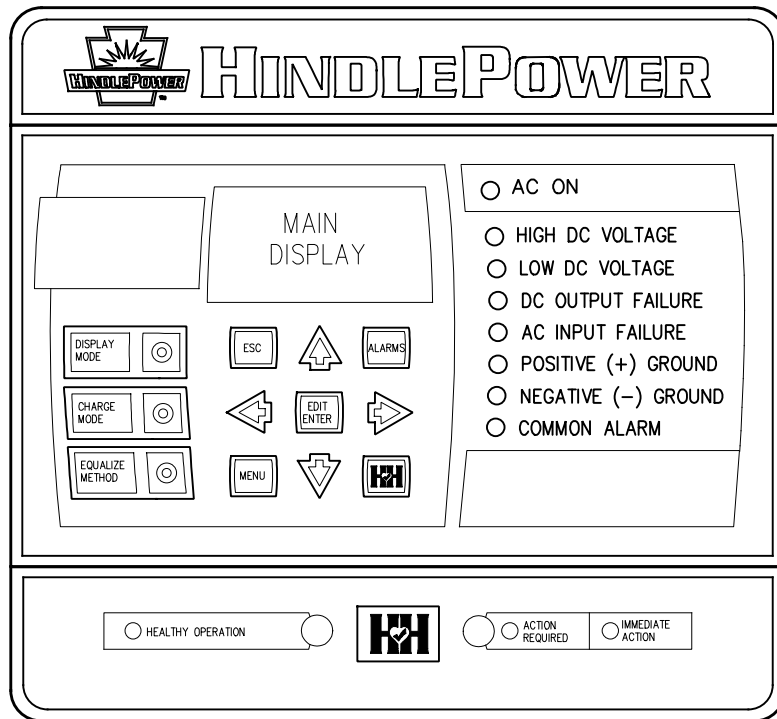
B

SCALE
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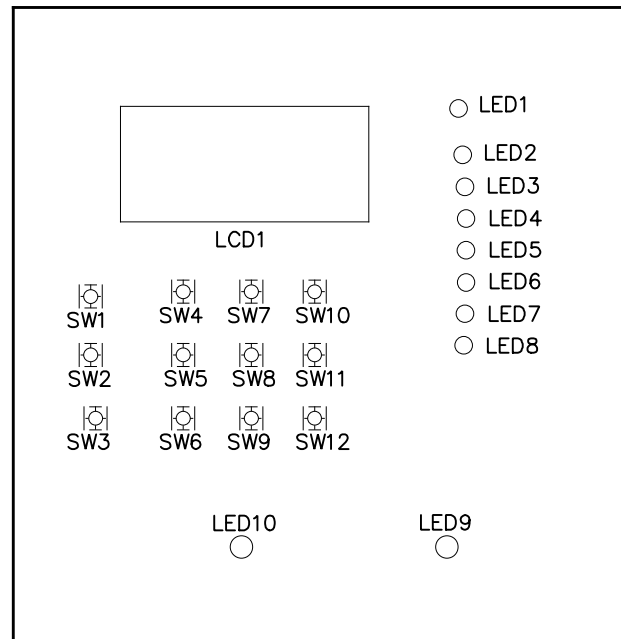
DWG No
JE5338-03

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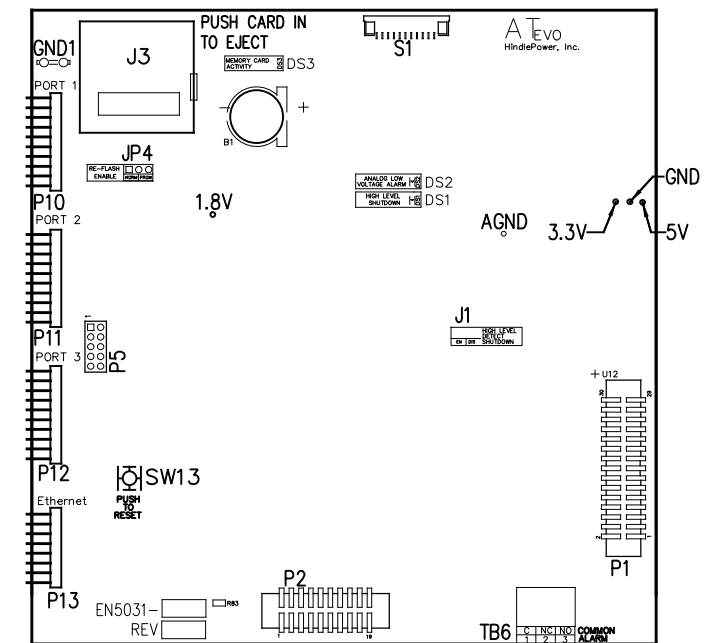
SHEET
1 OF 1



CONTROL PANEL
(PART No. FK5047-00)



MAIN CONTROL PC BOARD (A1)
FRONT VIEW - FACING CHARGER DOOR WHEN INSTALLED



MAIN CONTROL PC BOARD (A1)
BACK VIEW - FACING CHARGER COMPONENTS WHEN INSTALLED

NOTE: ALL ALARM CONTACTS ARE ENERGIZED WHEN IN THE NON-ALARM STATE (FAIL SAFE). ALL ALARM CONTACTS WILL CHANGE STATE WHEN CHARGER IS POWERED DOWN. CONTACT RATING IS 0.5A @ 125VAC/VDC RESISTIVE.

I/O TERMINAL	DESCRIPTION - TYPE	CONNECTION
(A1) TB6	SUMMARY ALARM TERMINAL BLOCK (A1) - SOLDERLESS COMP SCREW	#22-14 AWG

MAIN CONTROL PC BOARD (A1)

INDICATOR LIGHTS (LEDs):

- LED1 - GREEN - AC ON
- LED2 - RED - HIGH DC VOLTAGE ALARM
- LED3 - RED - LOW DC VOLTAGE ALARM
- LED4 - RED - DC OUTPUT FAILURE ALARM
- LED5 - RED - AC INPUT FAILURE ALARM
- LED6 - RED - POSITIVE (+) GROUND ALARM
- LED7 - RED - NEGATIVE (-) GROUND ALARM
- LED8 - RED - COMMON ALARM
- LED9 - RED - ACTION REQUIRED ALARM
- LED10 - GREEN - HEALTHY OPERATION
- DS1 - RED - HIGH LEVEL SHUTDOWN (HLD)
- DS2 - RED - ANALOG LOW VOLTAGE ALARM (LLD)
- DS3 - RED - MEMORY CARD ACTIVITY

JUMPERS:

- J1 - ANALOG HIGH VOLTAGE SHUTDOWN JUMPER
- J3 - SD CARD PORT
- JP4 - RE-FLASH (FIELD PROGRAMMING) JUMPER
- TERMINAL BLOCKS:
- TB6 - COMMON ALARM RELAY CONTACTS
- TEST POINTS:
- 1.8V - 1.8 VOLTS
- 3.3V - 3.3 VOLTS
- 5V - 5.0 VOLTS
- GND - GROUND
- AGND - ANALOG GROUND
- SDA - MAIN BOARD 12C DATA
- SCL - MAIN BOARD 12C CLOCK

SWITCHES:

- S1 - DISPLAY BUTTON
- S2 - CHARGE MODE BUTTON
- S3 - EQUALIZE METHOD BUTTON
- S4 - ESCAPE (ESC) BUTTON
- S5 - LEFT ARROW BUTTON
- S6 - MENU BUTTON
- S7 - UP ARROW BUTTON
- S8 - EDIT / ENTER BUTTON
- S9 - DOWN ARROW BUTTON
- S10 - ALARM BUTTON
- S11 - RIGHT ARROW BUTTON
- S12 - HINDLE HEALTH (HHS) BUTTON
- S13 - SYSTEM RESET BUTTON (BACK OF BOARD)

CONNECTORS:

- P1 - POWER BOARD RIBBON
- P2 - 3 PHASE RECTIFIER RIBBON
- P3 - USB EXPANSION PORT
- P4 - SPI & I2C EXPANSION PORT #1
- P5 - SPI & I2C EXPANSION PORT #2
- P6 - DISPLAY SPI PORT
- P7 - DISPLAY JTAG PORTS
- P10 - SERIAL INTERFACE PORT #1
- P11 - SERIAL INTERFACE PORT #2
- P12 - SERIAL INTERFACE PORT #3
- P13 - ETHERNET INTERFACE PORT
- P17 - GENERAL EXPANSION PORT

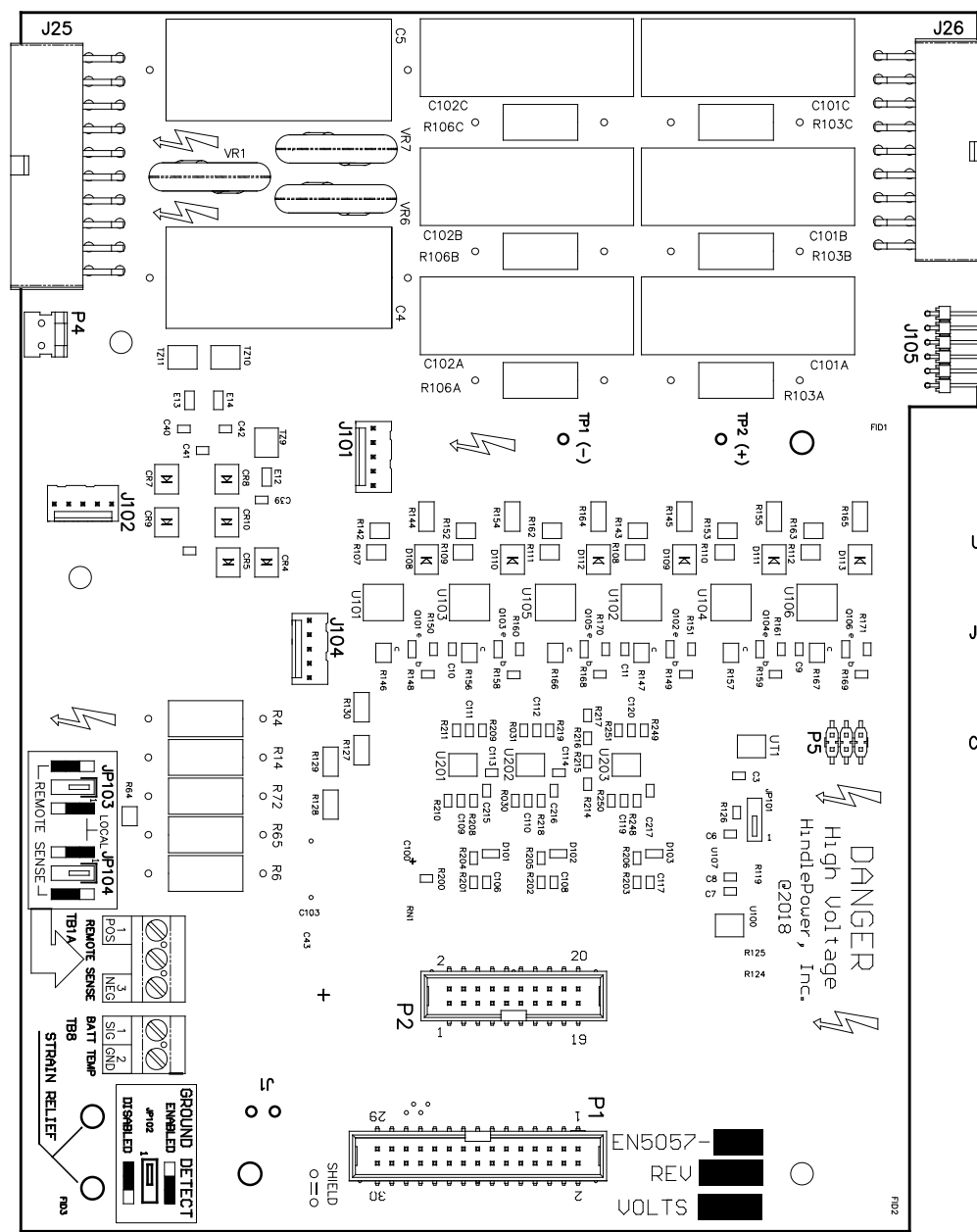
REV.	DRN BY	CHK BY	APP BY	DATE	DRN BY	DATE:		
0	KJB	MCR	MCR	10/26/2021	KJB	10/26/2021		
DESCRIPTION				STANDARD DRAWINGS.	CHK BY:	MCR	DATE:	10/26/2021
ECN NO. N/A				CHK BY:	MCR	DATE:	10/26/2021	

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**ATEVO 3PH BATTERY CHARGER
CONTROL PANEL / PC BOARD DETAIL
3Ø W/O OPTIONS 50-100A**

B	SCALE	NTS	DWG No	JE5339-03	REV	0	SHEET	1 OF 2
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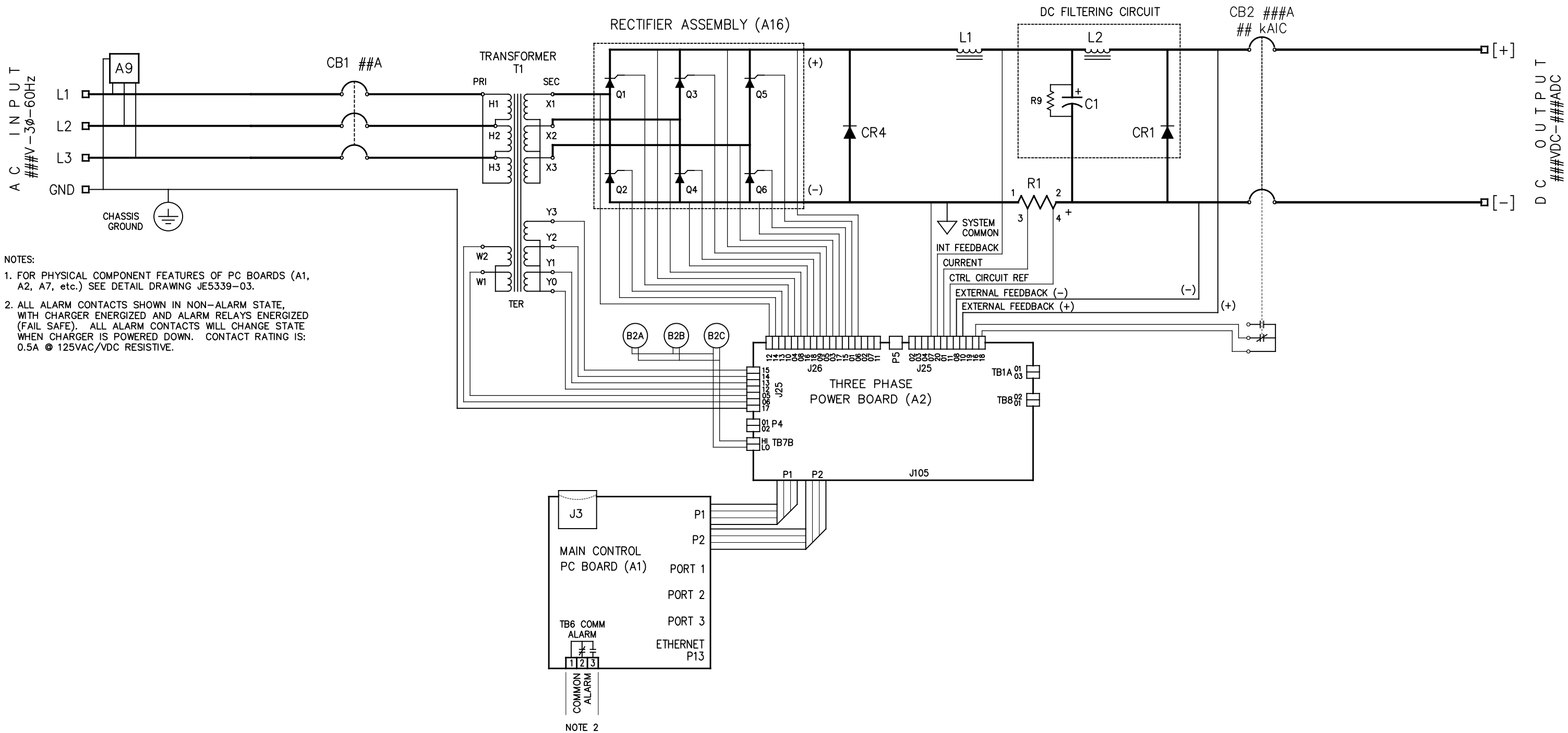


- USER TERMINALS ON POWER BOARD (A2):**
 TB1 - REMOTE VOLTAGE SENSE
 TB8 - BATTERY TEMPERATURE COMPENSATION
- JUMPERS ON POWER BOARD (A2):**
 JP102 - GROUND DETECT CIRCUIT ENABLE / DISABLE
 JP103 - REMOTE OR LOCAL SENSE SELECTOR (+)
 JP104 - REMOTE OR LOCAL SENSE SELECTOR (-)
- CONNECTORS ON POWER BOARD (A2):**
 J1 - POWER OUT
 J25 - MAIN CONTROL SIGNAL HARNESS
 J26 - SCR FIRING CONTROL HARNESS
 J101 - DC POWER SUPPLY
 J102 - DC POWER SUPPLY
 J104 - BATTERY SHUNT
 J105 - AUXILIARY I/O BOARD
 P1 - MAIN CONTROL BOARD RIBBON 1
 P2 - MAIN CONTROL BOARD RIBBON 2
 P4 - CB1 AUX
 P5 - RECTIFIER TEMP SENSOR INTERFACE
- TEST POINTS ON POWER BOARD (A2):**
 TP1 - PRE-FILTERED DC BUS (-)
 TP2 - PRE-FILTERED DC BUS (+)

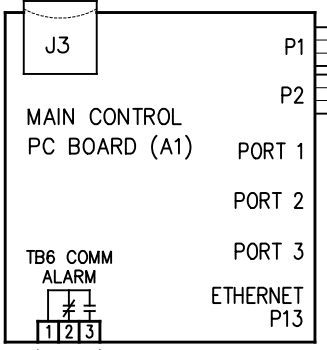
POWER BOARD (A2)

I/O TERMINAL	DESCRIPTION - TYPE	CONNECTION
(A2) TB1A	POS/NEG REMOTE SENSE TERMS (A2) - SOLDERLESS COMPRESSION SCREW	#22-14 AWG
(A2) TB8	TEMPCO PROBE (A10) TERM BLK - SOLDERLESS COMPRESSION SCREW	#22-14 AWG

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CHK BY MCR	DATE: 10/26/2021		TITLE ATEVO BATTERY CHARGER CONTROL PANEL / PC BOARD DETAIL 3Ø W/O OPTIONS 50-100A		
CHK BY MCR	DATE: 10/26/2021				
		B SCALE NTS	DWG No JE5339-03	REV 0	SHEET 2 OF 2

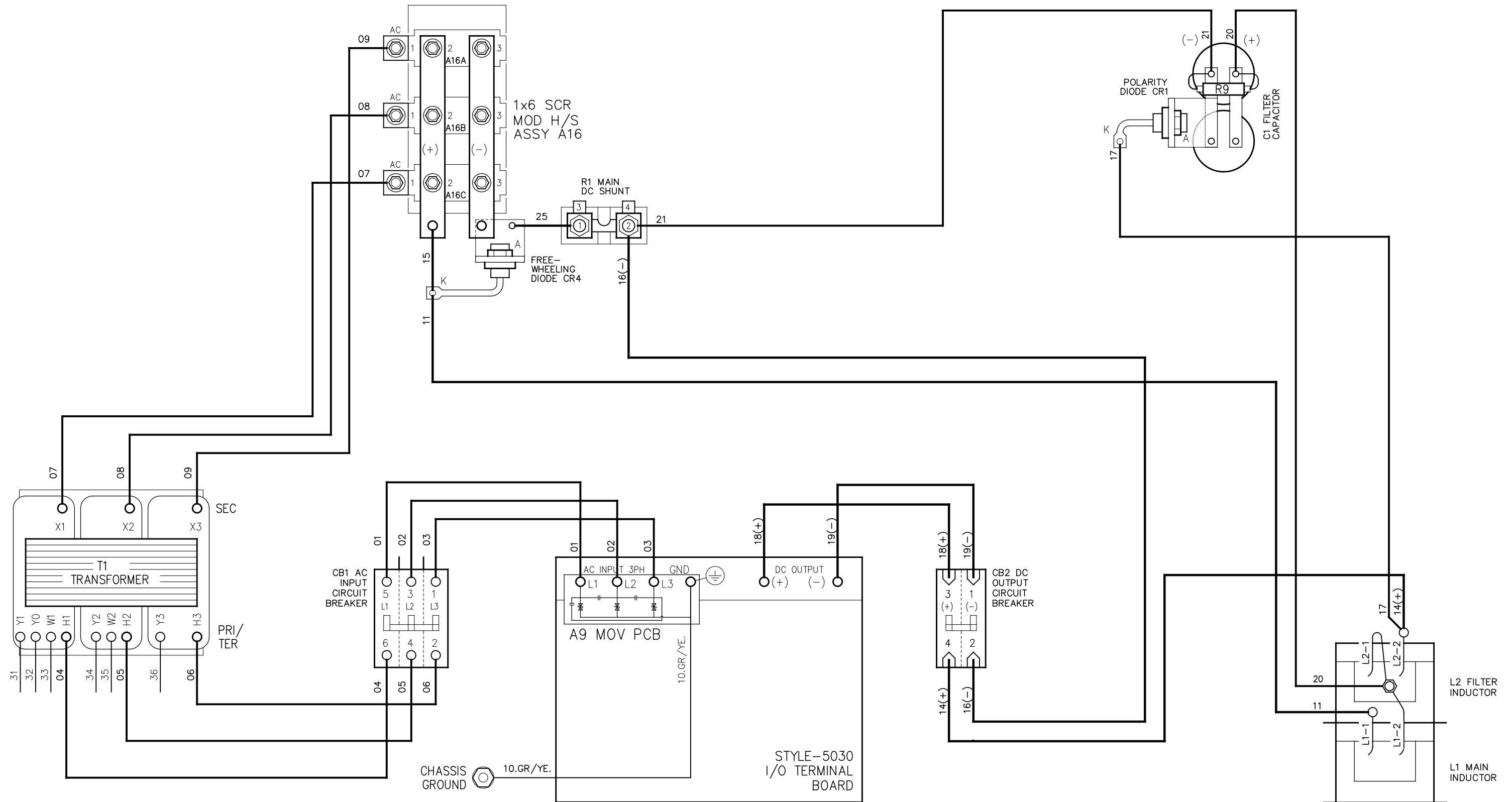


NOTES:
 1. FOR PHYSICAL COMPONENT FEATURES OF PC BOARDS (A1, A2, A7, etc.) SEE DETAIL DRAWING JE5339-03.
 2. ALL ALARM CONTACTS SHOWN IN NON-ALARM STATE, WITH CHARGER ENERGIZED AND ALARM RELAYS ENERGIZED (FAIL SAFE). ALL ALARM CONTACTS WILL CHANGE STATE WHEN CHARGER IS POWERED DOWN. CONTACT RATING IS: 0.5A @ 125VAC/VDC RESISTIVE.



NOTE 2

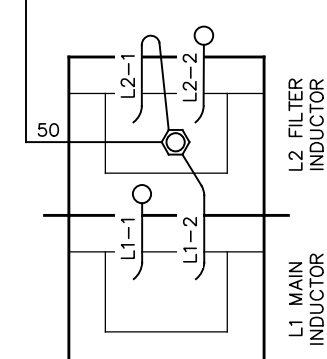
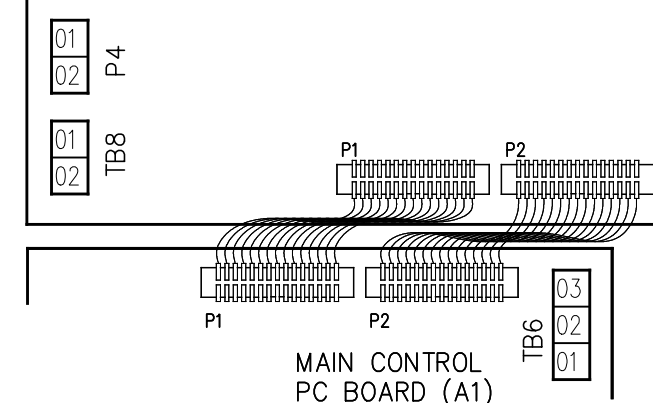
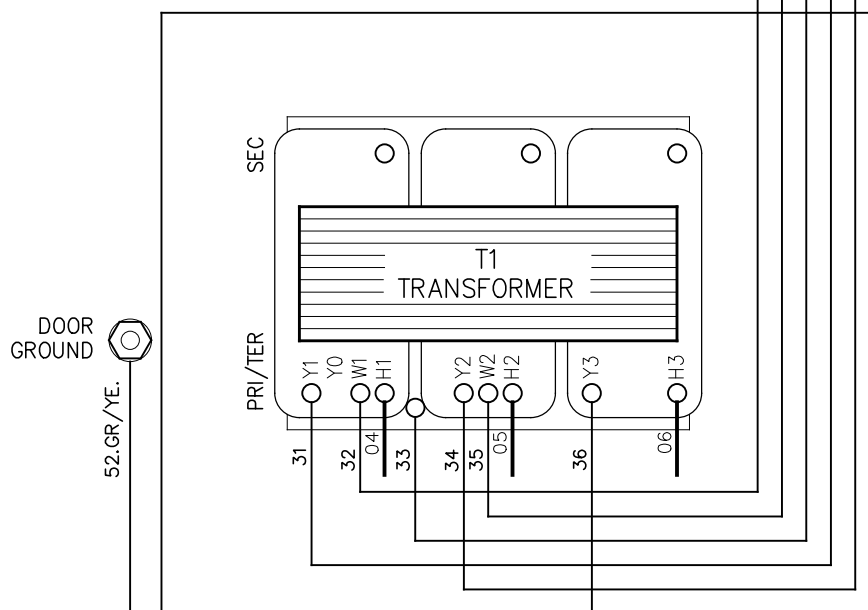
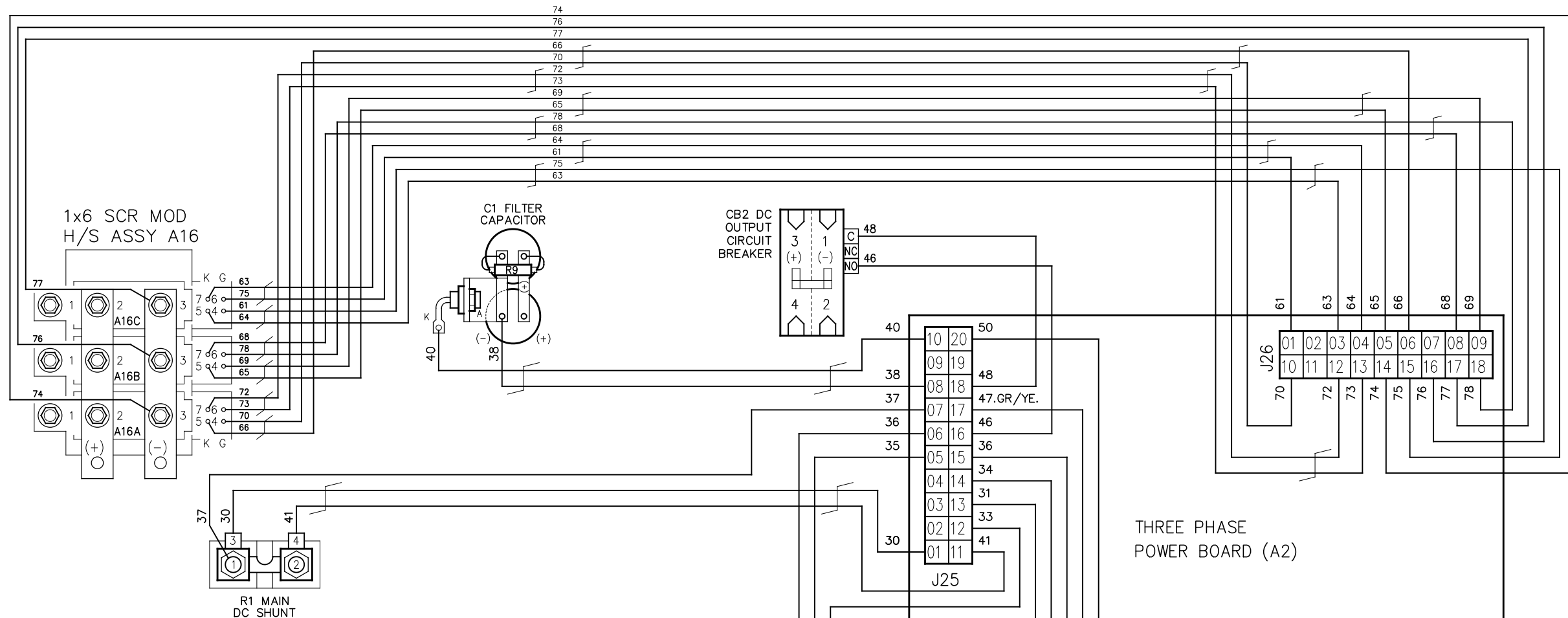
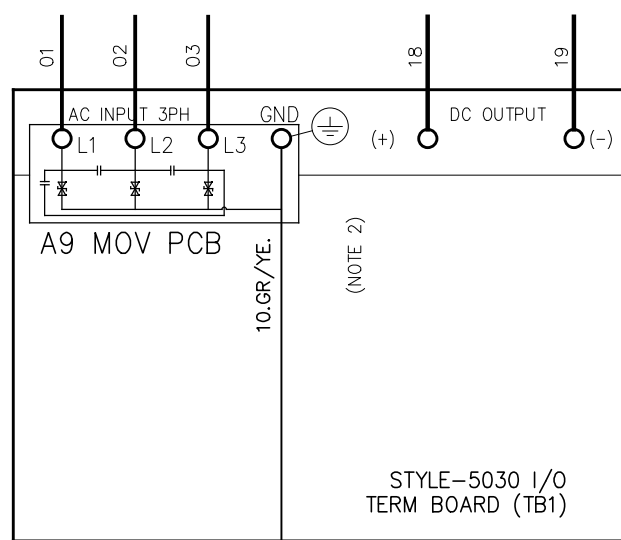
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DESCRIPTION STANDARD DRAWINGS.					CHK BY MCR	DATE 10/26/2021	
ECN NO. N/A					CHK BY MCR	DATE 10/26/2021	
TITLE BATTERY CHARGER SCHEMATIC: STYLE 5030 3Ø W/O OPTIONS 50-100A							SCALE B
DWG No JE5340-03							REV 0 SHEET 1 OF 1



NOTES:

1. CHARGER COMPONENTS ARE CONNECTED WITH BLACK FLAME-RETARDANT SWITCHBOARD INSULATION SYSTEM (SIS) TYPE WIRING, IDENTIFIED ON EACH END WITH NUMBER-CODED MARKERS. GROUND WIRES ARE GREEN WITH YELLOW STRIPE.
2. THIS DRAWING (SHEET 1) SHOWS THE MAINFRAME POWER WIRING AND USER CONNECTION CONTACTS TO CONTROL PC BOARDS (A1 & A2). SEE SHEET 2 FOR ALL CONTROL (SIGNAL) WIRING.

REV. 1	DRN BY KJB	CHK BY MCR	APP BY MCR	DATE 9/11/2023	DRN BY KJB	DATE: 10/26/2021	HINDLEPOWER 1075 Saint John Street Easton, PA 18042-6661 PH 610-330-9000 FAX 610-330-8510 www.hindlepowerinc.com
DESCRIPTION REVISED T1 SINGAL WIRING ORDER.					CHK BY MCR	DATE: 10/26/2021	
ECN NO. N/A					CHK BY MCR	DATE: 10/26/2021	TITLE BATTERY CHARGER CONNECTION DIAGRAM: STYLE 5030 3Ø W/O OPTIONS 50-100A
						B SCALE NTS	DWG No JE5341-03 REV 1 SHEET 1 OF 2



NOTES:
 1. CHARGER COMPONENTS ARE CONNECTED WITH BLACK FLAME-RETARDANT SWITCHBOARD INSULATION SYSTEM (SIS) TYPE WIRING, IDENTIFIED ON EACH END WITH NUMBER-CODED MARKERS. GROUND WIRES ARE GREEN WITH YELLOW STRIPE.

DRN BY KJB	DATE: 10/26/2021
CHK BY MCR	DATE: 10/26/2021
CHK BY MCR	DATE: 10/26/2021

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TITLE
BATTERY CHARGER
 CONNECTION DIAGRAM: STYLE 5030
 3Ø W/O OPTIONS 50-100A

	B	SCALE NTS	DWG No JE5341-03	REV 1	SHEET 2 OF 2
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