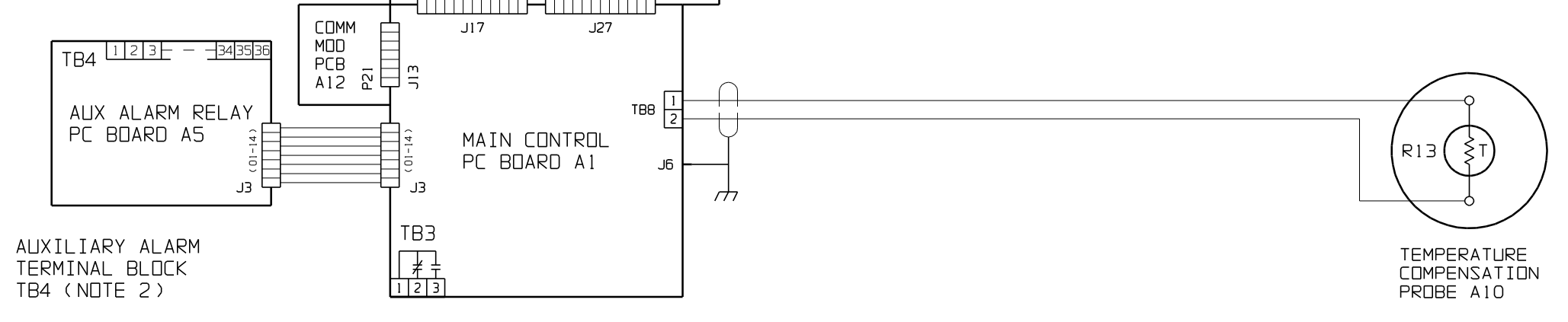
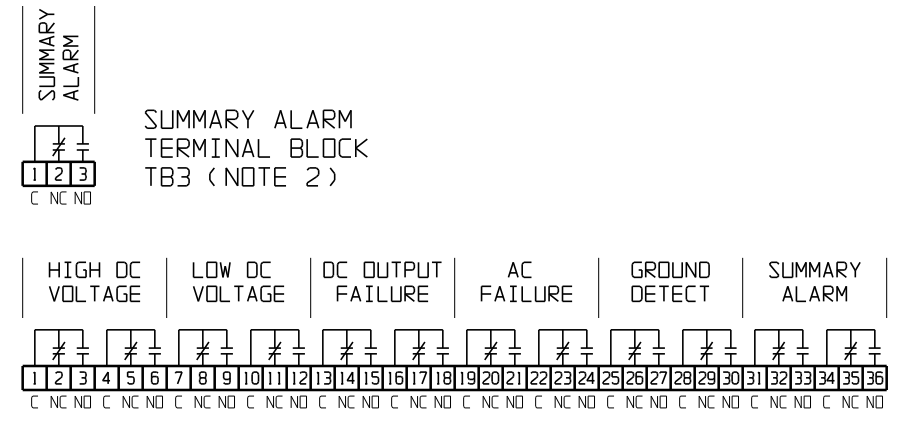


- NOTES:**
- 1) FOR COMPONENT DETAILS OF ALL PC BOARDS (A1, A15, A17, etc.) SEE DRAWING JE5091-3#.
 - 2) ALL ALARM CONTACTS SHOWN IN NON-ALARM STATE. CONTACT RATING IS 0.5A @ 125VAC/VDC RESISTIVE.
 - 3) SIX (6) SCRs (Q1-Q6) ARE CONTAINED WITHIN ONE MODULE (A16), PRODUCING 6-PULSE RECTIFICATION.
 - 4) RESISTORS R4, R6 & R14 FEATURED INTERNALLY ON GATE DRIVE PC BOARD (A15).
 - 5) BALLAST RESISTORS (R3A/R3B) ARE FEATURED EXTERNALLY AS SHOWN FOR 130VDC UNITS.
 - 6) C1, CR1, L2 & R9 ARE ONLY SUPPLIED IN UNITS WITH DC OUTPUT FILTERING.
 - 7) C2 IS ONLY SUPPLIED IN UNITS WITH BATTERY ELIMINATOR DC OUTPUT FILTERING.



STANDARD AT30 COMPONENTS

A1	MAIN CONTROL PC BOARD	(NOTE 1)
A15	THREE PHASE GATE DRIVE PC BOARD	(NOTE 1)
A16	6-PULSE SCR (Q1-Q6) MODULE	(NOTE 3)
A17A	SCR SNUBBER ASSY PC BOARD	(NOTE 1)
A17B	SCR SNUBBER ASSY PC BOARD	(NOTE 1)
A17C	SCR SNUBBER ASSY PC BOARD	(NOTE 1)
C4	DC OUTPUT EMI FILTER CAPACITOR (-) TO GROUND	
C5	DC OUTPUT EMI FILTER CAPACITOR (+) TO GROUND	
CB1	AC INPUT CIRCUIT BREAKER	
CB2	DC OUTPUT CIRCUIT BREAKER	
CR4	FREE-WHEELING DIODE	
L1	MAIN INDUCTOR	
Q1	SILICON-CONTROLLED RECTIFIER (A16A)	(NOTE 3)
Q2	SILICON-CONTROLLED RECTIFIER (A16A)	(NOTE 3)
Q3	SILICON-CONTROLLED RECTIFIER (A16B)	(NOTE 3)
Q4	SILICON-CONTROLLED RECTIFIER (A16B)	(NOTE 3)
Q5	SILICON-CONTROLLED RECTIFIER (A16C)	(NOTE 3)
Q6	SILICON-CONTROLLED RECTIFIER (A16C)	(NOTE 3)

STANDARD AT30 COMPONENTS

R1	MAIN DC SHUNT	
R2	CURRENT RATING RESISTOR	
R3	POWER SUPPLY BALLAST RESISTOR	(NOTE 5)
R4	EXTERNAL SCALING RESISTOR (+)	(NOTE 4)
R6	INTERNAL SCALING RESISTOR	(NOTE 4)
R14	EXTERNAL SCALING RESISTOR (-)	(NOTE 4)
T1	POWER ISOLATION TRANSFORMER	
TB1	INPUT/OUTPUT TERMINAL BLOCK	
TB3	SUMMARY ALARM TERMINAL BLOCK	(NOTE 2)
TB8	OPTIONAL TEMPCO PROBE (A10) INTERCONNECTOR	
VR1	DC OUTPUT SURGE SUPPRESSOR (-) TO (+)	
VR2	AC INPUT SURGE SUPPRESSOR (LINE 1)	
VR4	AC INPUT SURGE SUPPRESSOR (LINE 2)	
VR5	AC INPUT SURGE SUPPRESSOR (LINE 3)	
VR6	DC OUTPUT SURGE SUPPRESSOR (-) TO GROUND	
VR7	DC OUTPUT SURGE SUPPRESSOR (+) TO GROUND	

OPTIONAL AT30 COMPONENTS

A5	AUXILIARY ALARM RELAY PC BOARD	(NOTE 1)
TB4	AUXILIARY ALARM TERMINAL BLOCK	(NOTE 2)
A10	EXTERNAL TEMPERATURE COMPENSATION PROBE	
R13	TEMPCO PROBE (A10) RESISTOR	
T	TEMPCO PROBE (A10) THERMISTOR	
A12	COMMUNICATIONS MODULE PC BOARD	(NOTE 1)
F1A	AC INPUT FUSE (LINE 1)	
F1B	AC INPUT FUSE (LINE 2)	
F1C	AC INPUT FUSE (LINE 3)	
F3	DC OUTPUT FUSE (+)	
F4	DC OUTPUT FUSE (-)	

OPTIONAL AT30 COMPONENTS

DC FILTERING ASSEMBLY	(NOTE 6)	
C1	DC OUTPUT FILTERING CAPACITOR	
CR1	POLARITY DIODE	
E13	INDUCTOR INTERCONNECTION POINT	
L2	FILTERING INDUCTOR	
R9	FILTER CAPACITOR (C1) BLEED RESISTOR	(NOTE 7)
C2	BATTERY ELIMINATOR FILTER CAP	
VR3	AC INPUT LIGHTING ARRESTOR	
R28	THERMOSTAT (S2) SENSING RESISTOR	
S2	SCR MODULE THERMOSTAT(S)	(PART OF A16)
B2	SCR MODULE (Q1-Q6) COOLING FAN	(PART OF A16)

SPECIAL NOTES:

- 1) SCR MODULE THERMOSTAT (S2) AND SENSING RESISTOR (R28) ARE ONLY SUPPLIED WITH AT30 UNITS HOUSED IN ENCLOSURE STYLES 5030, 163 AND 198.
- 2) SCR MODULE FAN (B2) AND TRANSFORMER WINDING TAPS (T1-Z1/Z2) ARE ONLY SUPPLIED WITH AT30 UNITS RATED 400 ADC OR HIGHER.

THIRD ANGLE PROJECTION		DRAWN BY MCR 051706		TITLE AT30 BATTERY CHARGER MAINFRAME SCHEMATIC: WITH COMMON OPTIONS	
APPROVED MCT 051706		DRAWING No JE5092-99		REV 1 B	
1	20530	013007		UNLESS OTHERWISE NOTED DIMENSIONS ARE IN INCHES. TOLERANCES ARE:	
0	20211	051706	MCT	SCALE NTS	PART No JE5092-99
REV	ECN No	DATE	APP	SHEET 1 OF 1	