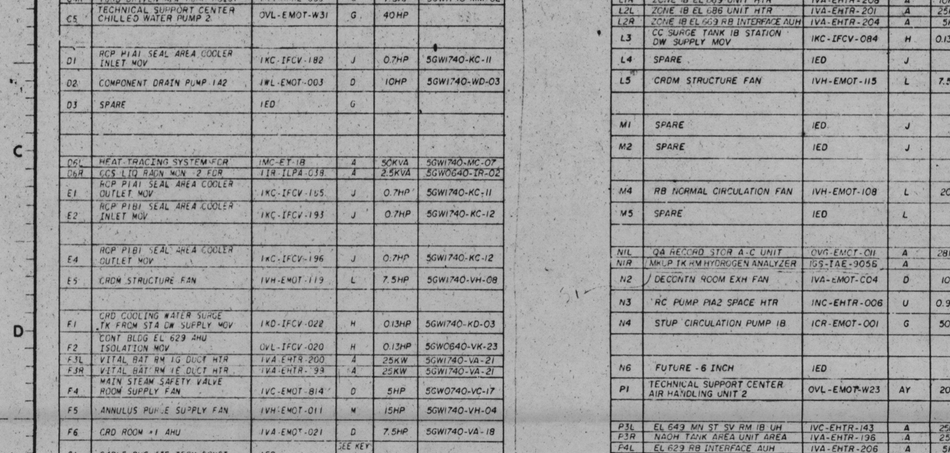
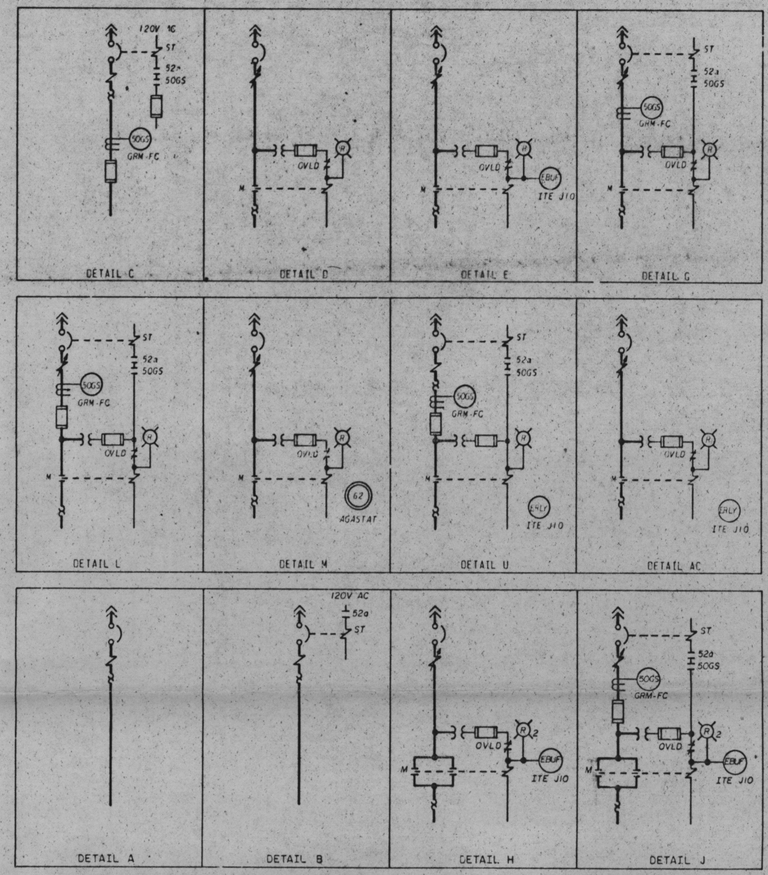
COMPT NO.	LOAD	UNID	DETAIL	LOAD SIZE	SCHEMATIC DWG REFERENCE
A1	MAIN BREAKER	1ED-52NA-52F	SEE KEY DIAG		
B1	CONT BLDG EL 610 AHU ISOLATION MOV	OVL-IFCV-269	H	0.13HP	5GW0640-VK-23
B2L	TENDON PMP DISTR PNL B	1AE-ETR-286	A	37.5KVA	5GW1740-WE-06
B2R	SPARE	1ED	A		
B3	ST GEN 1B STUP ISLN MOV	ICR-IFCV-033	H	1.6HP	5GW1640-CR-04
B4	TECHNICAL SUPPORT CENTER CHILLER ROOM AHU 2	OVL-EMOT-W25	D	2HP	5GW0640-VK-16
B5	CONT BLDG EL 610 AHU	OVL-EMOT-206	G	30HP	5GW0640-VK-20
C1	ANNULUS PURGE EXH FAN	IVH-EMOT-004	AC	15HP	5GW1740-VH-02
C2	RB PREHEAT SECONDARY PUMP	IVU-EMOT-073	D	2HP	5GW0740-VU-05
C3L	26V DC BAT CHGR 1B NOR FDR	1ES-EDC-11	A	6KVA	5GW0640-EP-02
C3R	26V DC BAT CHGR 1A ALT FDR	1ES-EDC-10	A	6KVA	5GW0640-EP-02
C4L	ZONE 1B EL 649 UNIT HTR	IVA-EHTR-210	A	10KW	5GW1740-VA-20
C4R	TURB DRIVEN AFW PMP HOIST	TMM-MHE-005	A	7.5HP	5GW1740-MM-02
C5	TECHNICAL SUPPORT CENTER CHILLED WATER PUMP 2	OVL-EMOT-W31	G	40HP	
D1	RCP P1A1 SEAL AREA COOLER INLET MOV	1KC-IFCV-182	J	0.7HP	5GW1740-KC-11
D2	COMPONENT DRAIN PUMP 1A2	1WL-EMOT-003	D	10HP	5GW1740-WD-03
D3	SPARE	1ED	G		
D5L	HEAT-TRACING SYSTEM FDR	1MC-ET-1B	A	50KVA	5GW1740-MC-07
D5R	QCS LTD RADN MON 2 FDR	1IR-ILPA-039	A	2.5KVA	5GW0640-IR-02
E1	RCP P1A1 SEAL AREA COOLER OUTLET MOV	1KC-IFCV-155	J	0.7HP	5GW1740-KC-11
E2	RCP P1B1 SEAL AREA COOLER INLET MOV	1KC-IFCV-193	J	0.7HP	5GW1740-KC-12
E4	RCP P1B1 SEAL AREA COOLER OUTLET MOV	1KC-IFCV-196	J	0.7HP	5GW1740-KC-12
E5	CRDM STRUCTURE FAN	IVH-EMOT-119	L	7.5HP	5GW1740-VH-08
F1	CRD COOLING WATER SURGE TK FROM ST4 DW SUPPLY MOV	1KD-IFCV-022	H	0.13HP	5GW1740-KD-03
F2	CONT BLDG EL 629 AHU ISOLATION MOV	OVL-IFCV-020	H	0.13HP	5GW0640-VK-23
F3L	VITAL BAT RM 1G DUCT HTR	IVA-EHTR-200	A	25KW	5GW1740-VA-21
F3R	VITAL BAT RM 1E DUCT HTR	IVA-EHTR-93	A	25KW	5GW1740-VA-21
F4	MAIN STEAM SAFETY VALVE ROOM SUPPLY FAN	IVC-EMOT-814	D	5HP	5GW0740-VC-17
F5	ANNULUS PURGE SUPPLY FAN	IVH-EMOT-011	M	15HP	5GW1740-VH-04
F6	CRD ROOM #1 AHU	IVA-EMOT-021	D	7.5HP	5GW1740-VA-18
G1	CABLE BUS TIE TERM COMPT	1ED	SEE KEY DIAG		
G2	SEC G BUS GRD RLY	1ED-50GS-52B	SEE KEY DIAG		
G4L	AB 480V PWR RCPT A,B,C,D,E	1ED-ERCP-008	B		5GW1740-ED-19
G4R	AB 480V PWR RCPT A,B,C,D	1ED-ERCP-009	B		5GW1740-ED-19
G5	CONT BLDG EL 629 AHU	OVL-EMOT-207	G	40HP	5GW0640-VK-22
H1	MCC LOSS OF VOLTAGE RLY		SEE KEY DIAG		
H2	120V 1P CKT BKR COMPT		SEE KEY DIAG		
H4	FUSE COMPT		SEE KEY DIAG		
H5	MCC CONTROL TRANSFORMER AND DISCONNECT SWITCH		SEE KEY DIAG		
J1	CABLE BUS TIE TERM COMPT	1ED	SEE KEY DIAG		
J2	ST GEN B START UP & RECIRC MAIN STEAM LINE DRAIN	1SM-IFCV-322	J	1.6HP	5GW1640-SM-03

COMPT NO	LOAD	UNID	DETAIL	LOAD SIZE	SCHEMATIC DWG REFERENCE
J3	STARTUP DISCHARGE TO CONDENSER ISLN MOV	ICR-IFCV-049	H	3.94HP	5GW1640-CR-05
J4	RB INSTR ROOM AHU	IWJ-EMOT-002	L	3HP	5GW1740-WJ-06
J5L	COM DECONTN RM HOT WTR HTR	OYP-EHTR-762	A	9KW	5GW0740-YP-02
J5R	SPARE	1ED	H		
K1	CR EQF MECH EQPT ROOM EXHAUST FAN	OVK-EMOT-311	E	0.75HP	5GW0640-VK-18
K2	SPARE	1ED	H		
K3	ST GEN 1B STUP MFW ISLN MOV	ICR-IFCV-030	H	2.6HP	5GW1640-CR-06
K4	OIL PUMP FOR WATER CHILLER # 2	OVL-EMOT-021	D	0.25HP	
K5	PURGE COMPR FOR WATER CHILLER # 2	OVL-EMOT-022	D	0.5HP	
K6	FUTURE -12 INCH	1ED			
L1L	ZONE 1B CCS CLR AREA UH	IVA-EHTR-212	A	10KW	5GW1740-VA19
L1R	ZONE 1B EL 669 UNIT HTR	IVA-EHTR-208	A	10KW	5GW1740-VA-20
L2L	ZONE 1B EL 686 UNIT HTR	IVA-EHTR-201	A	25KW	5GW1740-VA-20
L2R	ZONE 1B EL 663 RB INTERFACE AUH	IVA-EHTR-204	A	5KW	5GW1740-VA-20
L3	CC SURGE TANK 1B STATION DW SUPPLY MOV	1KC-IFCV-084	H	0.13HP	5GW1740-KC-05
L4	SPARE	1ED	J		
L5	CRDM STRUCTURE FAN	IVH-EMOT-115	L	7.5HP	5GW1740-VH-07
M1	SPARE	1ED	J		
M2	SPARE	1ED	J		
M4	RB NORMAL CIRCULATION FAN	IVH-EMOT-108	L	20HP	5GW1740-VH-05
M5	SPARE	1ED	L		
N1L	QA RECORD STOR A-C UNIT	OVG-EMCT-011	A	28HP	5GW0740-VG-01
N1R	MKUP TK HM HYDROGEN ANALYZER	1GS-TAE-3055	A		5GW1640-GS-04
N2	DECONTN 400M EXH FAN	IVA-EMOT-C04	D	10HP	5GW1740-VA-28
N3	RC PUMP P1A2 SPACE HTR	1NC-EHTR-006	U	0.94KW	5GW1740-NC-03
N4	STUP CIRCULATION PUMP 1B	ICR-EMOT-001	G	50HP	5GW1640-CR-02
N6	FUTURE - 6 INCH	1ED			
P1	TECHNICAL SUPPORT CENTER AIR HANDLING UNIT 2	OVL-EMOT-W23	AY	20HP	
P3L	EL 649 MN ST SV RM 1B UH	IVC-EHTR-143	A	25KW	5GW0740-VC-05
P3R	NAOH TANK AREA UNIT AREA	IVA-EHTR-196	A	25KW	5GW1740-VA-19
P4L	EL 629 RB INTERFACE AUH	IVA-EHTR-206	A	5KW	5GW1740-VA-20
P4R	AIRBORNE RADN MON FDR	1IR-ILPA-008	A	3.4KVA	5GW0640-IR-02
P5	SMALL TOOL DECONTAMINATION ROOM EXH FAN	IVA-EMOT-334	D	5HP	5GW1740-VA-28
P6	CONT BLDG BATTERY BOARD RM AHU	OVL-EMOT-S66	D	15HP	5GW0640-VK-22





NOTES

1. 480V MOTOR CONTROL CENTER PROVIDED ON TVA CONTRACT NO. 76K5-86242 BY GOULD/ITE.
2. ALL MOLDED CASE 480V CIRCUIT BREAKERS ARE 30, 600V WITH AN INTERRUPTING RATING OF NOT LESS THAN 25,000 RMS SYMMETRICAL AMPS AT 480V. CIRCUIT BREAKERS SHOWN WITH SHUNT TRIP COILS HAVE A TRIP COIL CAPABLE OF OPERATING AT 55 PERCENT RATED VOLTAGE. ALL 100A FRAME 480V CIRCUIT BREAKERS ARE ITE "HE" SERIES AND THE 400A FRAME 480V CIRCUIT BREAKERS ARE ITE "JL" SERIES.
3. ALL MOLDED CASE 120V CIRCUIT BREAKERS 4A, 1P, 100A FRAME, THERMAL MAGNETIC WITH 15A TRIP, ITE "BQ" SERIES.
4. ALL 5A AND 10A FUSES ARE GOULD/SHAWMUT, AMP-TRAP, FORM 600, MIDGET TYPE 2.
5. FUSES IN THE POWER CIRCUITS ARE GOULD/SHAWMUT CLASS "J" CURRENT LIMITING. FUSES ARE REQUIRED TO PROVIDE REDUNDANT PROTECTION FOR PRIMARY CONTAINMENT PENETRATIONS.
6. ALL CONTROL TRANSFORMERS ARE 1Φ, 480-120V WITH GROUNDED SECONDARY. THE SECONDARY OF THE 150 VA TRANSFORMER IS FUSED WITH A 1.5A DUAL-ELEMENT TIME-DELAY, BUSSMAN TYPE FNQ FUSE. THE SECONDARY OF THE 350 VA TRANSFORMER IS FUSED WITH A 3.5A DUAL-ELEMENT TIME-DELAY GOULD/SHAWMUT TYPE TAM FUSE.
7. GROUND FAULT PROTECTION (50GS), ITE TYPE GRM-FC, PICKS UP AT APPROXIMATELY 10 AMPS PRIMARY CURRENT WITH NO INTENTIONAL TIME DELAY.
8. THE PRIMARY OF THE 5KVA CONTROL POWER TRANSFORMER IS FUSED WITH A 15A TIME DELAY, BUSSMAN TYPE JHC-15 FUSE.
9. THE MOTOR CONTROL CENTER ARRANGEMENT IS CONTROLLED BY THE FRONT VIEW LOCATED ON THIS DRAWING. COMPARTMENT CONFIGURATION CONTROL DRAWINGS ARE REFERENCED IN THE MOTOR CONTROL CENTER COMPUTERIZED CIRCUIT SCHEDULE. THE MOTOR CONTROL CENTER COMPUTERIZED CIRCUIT SCHEDULE DOCUMENTS DEVICE RATING(S) AND ADJUSTABLE CIRCUIT BREAKER SETTINGS.
10. THIS MCC IS NON-CLASS 1E LOCATED IN A CATEGORY I STRUCTURE.
11. ALL AGASTAT RELAYS ARE OF THE 7000 SERIES.

REFERENCED DRAWINGS AND DOCUMENTS

PLANT AC AUXILIARY POWER SYSTEM SINGLE LINE	2GW0720-RP-01
SINGLE LINE DIAGRAM 480V SWITCHGEAR 1.X02	2-1W1727-ED-1
480V NORMAL AC AUXILIARY POWER DISTRIBUTION SYSTEM SCHEMATIC	5GW1740-ED-19
480V MCC COMPARTMENT TYPICALS	5GW0747-RP
480V MCC 1B3 COMPUTERIZED CIRCUIT SCHEDULE	5AC1763-ED

SYMBOLS

MAGNETIC TRIP ONLY CIRCUIT BREAKER (ADJUSTABLE)

REV NO	ECN NO	DATE	DSGN	DFTG	CHK	SUPV	CHUM	NSP	TURB	PCSL	APPD
4	10, 886, S1 10017										
	ADDED "VL" SYSTEM LOAD TO COMPT B4. ADDED "VL" SYSTEM LOADS TO COMPTS C5, K4, K5, P1 & P6. MINOR CHANGES. ADDED LOAD SIZE AND SCHEMATIC DWG REF COLUMN TO TABLES REVISED NOTES 8 AND 9 AND MOVED KEY DIAGRAM TO SHEET 3. ADDED WE LOAD TO COMPT B2L.										
3	9, 899, 1299, S1	1-25-83	AH	RGL	NRT	CF					
	CHANGED UNID OF LOAD IN COMPT F4. ADDED "VC" SYSTEM LOAD TO COMPT D6L. MINOR CHANGES.										
2	S1										
	RECORD DWG REV FOR THE MCC COMPUTERIZED CKT SCH HISTORICAL DATA BASE R4										
1	62, 70, S1	1-25-82	AH	RGL	NRT	CF					
	ADDED AHU 1M CB NON-VITAL BAT. BD ROOM PER ECN 62, INTERCHANGED RCP MOTOR'S SP. HTR SUPPLIES PER ECN 70. INCORPORATED UNID SYS. GEN REV PER ECN 3, 1281, 1003.										

DSGN: ROGER D. HALL
DFTG: A. HOLLAND
CHKD: L.P. MCCLEY
SUPV: R.L. ADDISON
INSP:
ENGINEER: C.T. Garner

SCALE: NTS — EXCEPT AS NOTED

AUXILIARY BUILDING UNIT 1

SINGLE LINE
480V MCC 1B3
1ED-EMCC-52

BELLEFONTE NUCLEAR PLANT
TENNESSEE VALLEY AUTHORITY
DIVISION OF ENGINEERING DESIGN

N

SUBMITTED	RECOMMENDED	APPROVED
C.T. Garner	J.L. Forrester	R.M. Hodges

KNOXVILLE 267 | 88 E | 5AW1733-ED-1 R4

RECORD DRAWING AS CONSTRUCTED

COMPANION DWG:
5AW1733-ED-03
5AW1733-ED-02 HAS BEEN VOIDED

INSPECTED AND APPROVED FOR ISSUE

Docket # 50-438
Control # 830405036
Date 3-25-83 of Document:
REGULATORY DOCKET FILE

PRC APERTURE CARD