ABBREVIATIONS

ABBREV.	DESCRIPTION
ADO	AUTOMATIC DOOR OPENER
AF	AMPERE FRAME
AFF	ABOVE FINISHED FLOOR
AT	AMPERE TRIP
ATS	AUTOMATIC TRANSFER SWITCH
BC	BARE COPPER
BRIP	BOILER PLANT INSTRUMENTATION PANEL
C	CONDUIT
CB, C/B	CIRCUIT BREAKER
CKT BKR	–
CKT	CIRCUIT
CCTV	CLOSED CIRCUIT T.V.
CLG	CEILING
DB	DIRECT BURIAL
EC	EMPTY CONDUIT
EG	EQUIPMENT GROUND
EX	EXISTING
EJ	EXPANSION JOINT
EXP, XP	EXPLOSION PROOF
EMERG	EMERGENCY
ELEC	ELECTRIC
EWC	ELECTRIC WATER COOLER
ESM	ELECTRIC STRIP MOLD
FA	FIRE ALARM
FACP	FIRE ALARM CONTROL PANEL
FI	FILM ILLUMINATOR
FCU	FAN COIL UNIT
FIXT	FIXTURE
FLUOR	FLUORECENT
FSS	FUSED SAFETY SWITCH
ESCP	FLAME SAFEGUARD CONTROL PANEL
G, GND	GROUND
GEN	GENERATOR
GTB	GROUND TERMINAL BOX
GFI	GROUND FAULT INTERRUPTER
HOA	HAND OFF AUTOMATIC
HH	HANDHOLE
HP	HORSE POWER
HV	HIGH VOLTAGE
INCAND	INCANDESCENT
JB	JUNCTION BOX
LTCP	LOCAL TEMPERATURE CONTROL PANEL
LTS	LIGHTS
LTG	LIGHTING
LV	LOW VOLTAGE
MATV	MASTER ANTENNA TELEVISION
MCB	MAIN CIRCUIT BREAKER
MCC	MOTOR CONTROL CENTER
MDP	MAIN DISTRIBUTION PANEL
MLO	MAIN LUGS ONLY
MH	MANHOLE
MTD	MOUNTED
MTG HGT	MOUNTING HEIGHT
NFSS	NON-FUSED SAFETY SWITCH
P	POLE
PB	PULL BOX
PBPU	PREFABRICATED BEDSIDE PATIENT POWER UNIT
PNL	PANEL
POD	POWER OPERATED DAMPER
PTRV	POWER TYPE ROOF VENTILATION
PWR	POWER
RECEPT	RECEPTACLE
RGIP	REMOTE GROUND INDICATOR PANEL
SIG	SIGNAL
SS	SAFETY SWITCH
STA	STATION
TEL	TELEPHONE
TV	TELEVISION
TVSS	TRANSIENT VOLTAGE SURGE SUPPRESSOR
UH	UNIT HEATER
V	VOLTAGE
VFD	VARIABLE FREQUENCY DRIVE
VP	VAPOR PROOF
W	WIRE
W/	WITH
WP.	WEATHER PROOF
WPIU	WEATHER PROOF IN USE
WT	WATER TIGHT
XFMR	TRANSFORMER

SYMBOLS - REWIRING AND DEMOLITION

CLG.	WALL	DESCRIPTION
	S_R	EXISTING SWITCH
O_E	$-O_E$	OUTLET AND INCANDESCENT FIXTURE IN PLACE
O_{ER}	$-O_{ER}$	OUTLET IN PLACE – RELOCATE EXISTING FIXTURE
(N)	–(N)	OUTLET IN PLACE – NEW INCANDESCENT FIXTURE
(B)	–(B)	OUTLET IN PLACE – REMOVE INCANDESCENT FIXTURE AND INSTALL BLANK COVER
(R)	–(R)	EXISTING INCANDESCENT FIXTURE RELOCATED W/NEW OUTLET
	–(F)B	EXISTING PAN – REMOVE FAN AND BLANK OUTLET
E	E	EXISTING FLUORESCENT FIXTURE
R	R	EXISTING FLUORESCENT FIXTURE RELOCATED W/NEW OUTLET
E		EXISTING CONDUIT IN PLACE – REMOVE EXISTING WIRES AND INSTALL NEW WIRES AS INDICATED
EX		EXISTING CONDUIT AND WIRE TO REMAIN
X		EXISTING CONDUIT AND WIRE TO BE ABANDONED OR REMOVED
E		CONNECTION OF NEW CONDUIT TO EXISTING CONDUIT W/APPROVED TYPE COUPLINGS – INSTALL NEW WIRES
		CONDUIT SEAL FOR EXPLOSIONPROOF INSTALLATION
B		PLACED ADJACENT TO DEVICE SYMBOL DENOTES EQUIPMENT SHALL BE REMOVED AND OUTLET BLANKED
X		PLACED ADJACENT TO DEVICE SYMBOL DENOTES EQUIPMENT SHALL BE REMAIN
XR		PLACED ADJACENT TO DEVICE SYMBOL DENOTES EQUIPMENT SHALL BE REMOVED

SYMBOLS - GENERAL

CLG.	WALL	DESCRIPTION
		NOTE: MOUNTING HEIGHT FOR THE FOLLOWING SWITCHES SHALL BE 40" (1100 MM) AFF: IN ELECTRICAL CLOSET, MECHANICAL ROOMS, MOUNTING HEIGHT SHALL BE 4'-6" (1400 MM) AFF.
	S	SINGLE POLE SWITCH WITH SUFFIX A,B,C. ETC. INDICATES CONTROL OF FIXTURE(S) WITH SAME DESIGNATION(S).
	S_2	DOUBLE POLE SWITCH
	S_3	THREE-WAY SWITCH.
	S_4	FOUR-WAY SWITCH.
	S_D	DIMMER SWITCH – WITH SILICON CONTROLLED RECTIFIER.
	S_T	TIME SWITCH.
	S_R	ROCKER TYPE SWITCH.
	S_{LV}	LOW VOLTAGE SWITCH WITH SUFFIX a,b,c ETC. INDICATES CONTROL OF FIXTURE(S) WITH SAME DESIGNATION(S).
		NOTE: MOUNTING HEIGHT FOR THE FOLLOWING SWITCHES SHALL BE 4'-6" (1400 MM) AFF UNLESS OTHERWISE NOTED.
	S_K	KEY OPERATED SWITCH.
	S_L	LOCK TYPE SWITCH.
	S_M	MANUAL MOTOR STARTING SWITCH
	S_{MC}	MOMENTARY CONTACT SWITCH.
	S_{MP}	MOTOR SNAP SWITCH (THERMAL TYPE) WITH PILOT LIGHT.
	S_{PB}	PUSH BUTTON STATION.
	S_P	SWITCH WITH PILOT LIGHT.
	S_{WP}	WEATHERPROOF SWITCH.
	S_{MD}	MOTION DETECTOR SWITCH. – WALL MOUNTED – INFRARED
(OS)		OCCUPANCY SENSOR – DUAL TECHNOLOGY
(P)		OCCUPANCY SENSOR POWER SUPPLY

NOTE: ALSO SEE VA CONSTRUCTION STANDARD CD-28.

SYMBOLS - TELEPHONE AND DATA SYSTEM

WALL	DESCRIPTION
▶	TELEPHONE OUTLET (PAY STATION), MTD. 4'-0" (1220 MM) A.F.F.
#▶	COMBINATION TELEPHONE/DATA OUTLET, MTD. 18" (460 MM) A.F.F. UNLESS OTHERWISE NOTED. # INDICATES QUANTITY OF EACH SYSTEMS JACK PRESENT AND WIRED.
J ▷	TELEPHONE OUTLET (JACK TYPE), MTD 18" (460 MM) A.F.F. UNLESS OTHERWISE NOTED.
W ▷	TELEPHONE OUTLET (WALL TYPE), MTD 54" (1400 MM) A.F.F. UNLESS OTHERWISE NOTED.
	TELEPHONE TERMINAL CABINET.
T	EMPTY 1" (25 MM) TELEPHONE CONDUIT UNLESS OTHERWISE NOTED
	TELEPHONE BACKBOARD (WALL MOUNTED)

DESK PHONES – MOUNT OUTLET 1'-6" (460 MM) ABOVE FINISHED FLOOR

PAY PHONES – MOUNT OUTLET 4'-0" (1220 MM) ABOVE FINISHED FLOOR

HEIGHT OF TELECART OUTLETS SHALL BE AS INDICATED ON BEDWALLS OR PBPU DETAILS.

NOTES:

1. FOR WHEELCHAIR PATIENT USE MOUNT TELEPHONE OUTLET 36" (915 MM) A.F.F. TO BOTTOM OF OUTLET BOX.
2. ALSO SEE VA "BARRIER FREE DESIGN HANDBOOK"
3. PROVIDE 1"(25MM) CONDUIT FROM EACH TELEPHONE OUTLET TO NEAREST POINT OF CABLE TRAY SYSTEM.

LIGHTING FIXTURE SCHEDULE

TYPE	DESCRIPTION	LAMPS
A	WALL MOUNTED, FULL CUTOFF, LED FIXTURE; CAST ALUMINUM HOUSING WITH BRONZE FINISH; TEMPERED GLASS LENS; 26 WATT, ELECTRONIC DRIVER; UNIVERSAL VOLTAGE 120-277; INTEGRAL PHOTOCELL. METALUX #XTOR3/A-PC1; LITHONIA #CSXW LED-X0C-700-50K-T3M-MVOLT-PE-ODBXD; DAYBRITE #LPW16-58BZ-PHOTOCELL	2800 LUMEN LED 5000K
B	4' LED LENSED STRIPLIGHT; STEEL CHANNEL WITH PAINTED WHITE ENAMEL FINISH; OPAQUE LENS; INTEGRAL 14 WATT EMERGENCY BATTERY; 22 WATT, 0-10V DIMMING DRIVER; UNIVERSAL VOLTAGE 120-277. METALUX #4SNLED-L04-26SL-LN-UNV-EL14W-L840- CD1; LITHONIA #ZL2N-L48-3000LM-MDD-MVOLT-49K-80CRI-BSL722-WH; DAYBRITE #LF4FR304/0LDZTEMLED	2800 LUMEN LED 4000K
	UNIVERSAL MOUNTED, LED EMERGENCY LIGHTING FIXTURE; WHITE POLYCARBONATE HOUSING; TWO LED LIGHT HEADS; NICKEL CADMIUM BATTERY; TEST SWITCH; UNIVERSAL VOLTAGE 120-277. METALUX #SEL; LITHONIA #ELU2 LED M12; DAYBRITE #VLLU	INCLUDED WITH FIXTURE

SYMBOLS - SINGLE LINE

	DESCRIPTION
+ –	BATTERY
O.C.B.	HIGH VOLTAGE OIL CIRCUIT BREAKER
	HIGH VOLTAGE DRAWOUT AIR CIRCUIT BREAKER
	SWITCH AND FUSE UNIT
	MOLDED CASE CIRCUIT BREAKER
	LOW VOLTAGE DRAWOUT AIR CIRCUIT BREAKER
	FUSED DRAWOUT POTENTIAL TRANSFORMER
(A)	AMMETER
(V)	VOLTMETER
(W)	WATTMETER
(K)	KEYED INTERLOCK
(50)	INSTANTANEOUS OVERCURRENT OR RATE-OF-RISE RELAY
(51)	AC-TIME OVERCURRENT RELAY
(67)	AC-DIRECTIONAL OVERCURRENT RELAY
(86)	LOCKING OUT RELAY
	LIGHTNING ARRESTOR
	GROUND CONNECTION
	POTHEAD
	STRESS CONE
PB	PUSH-BUTTON STATION
	CURRENT TRANSFORMER

SYMBOLS - RECEPTACLES

CLG.	WALL	DESCRIPTION
		COMBINATION SWITCH & DUPLEX RECEPTACLE (4'-6" (1400 MM) AFF UNLESS OTHERWISE NOTED).
(J)		DROP CORD, SINGLE CONVENIENCE OUTLET, 3-WIRE, GROUNDING TYPE, 20A, W/#12 CONDUCTORS IN FLEXIBLE CORD (CENTER LINE OF OUTLET: 6'-6" (2000 MM) AFF-MINIMUM).
		ELECTRICAL STRIP MOLD (OUTLETS ON 2'-0" (610 MM) CENTERS OR AS DESIGNATED ON DRAWINGS), MTD 3'-6" (1100 MM) AFF OR AS INDICATED.
		FLOOR OUTLET.
		SINGLE RECEPTACLE – 20A, MTD 18" (460 MM) AFF UNLESS OTHERWISE NOTED.
	GFI	DUPLEX RECEPTACLE (HOSPITAL GRADE) – 20A, MTD. 18" (460 MM) AFF. SUBSCRIPT "GFI" INDICATES GROUND FAULT TYPE; "N" INDICATES NOT HOSPITAL GRADE; "ST" INDICATES (15A) SAFETY TYPE: AND "I" INDICATES ISOLATED GROUND (IF USED).
		DUPLEX RECEPTACLE SWITCHED 18" (460 MM) AFF UNLESS OTHERWISE NOTED.
	V	3-GANG COMPARTMENT BOX IN FLOOR FOR TELEPHONE, SIGNAL & RECEPTACLE.
		DUPLEX RECEPTACLE ON EMERGENCY CIRCUIT – 20A, MTD 18" (460 MM) AFF WITH 1/4" (6.5 MM) "EMERGENCY" ENGRAVED LETTERS FILLED WITH RED ENAMEL. SUBSCRIPT "P" INDICATES RECEPTACLE WITH INTERNAL NEON LIGHT.
A		120V, 20A, 1 PHASE, 2-POLE, 3W, NEMA 5-20R.
B		208V, 20A, 1 PHASE, 2-POLE, 3W, NEMA 6-20R.
C		120V, 30A, 1 PHASE, 2-POLE, 3W, NEMA L5-30R
D		208V, 30A, 1 PHASE, 2-POLE, 3W, NEMA 6-30R
E		208V, 60A, 1 PHASE, 3-POLE, 4W, NEMA 14-60R.
F		208V, 30A, 3 PHASE, 3-POLE 4W, NEMA 15-30R
G		208V, 50A, 3 PHASE, 3 POLE, 4W, NEMA 15-30R
H		208V, 60A, 3 PHASE, 3 POLE, 4W, NEMA 15-60R.

NOTE: ALSO SEE VA CONSTRUCTION STANDARD CD-28.

	GJ	GROUND JACK
	GFI	DOUBLE DUPLEX RECEPTACLE (HOSPITAL GRADE) – 20A, MTD. 18" (460 MM) AFF. SUBSCRIPT "GFI" INDICATES GROUND FAULT TYPE "N" INDICATES NOT HOSPITAL GRADE: "ST" INDICATES (15A) SAFETY TYPE: AND "I" INDICATES ISOLATED GROUND (IF USED).
	*	MOUNT DEVICES 6" ABOVE COUNTERTOP BACKSPLASH

SYMBOLS - GENERAL

CLG.	WALL	DESCRIPTION
(J)	–(J)	JUNCTION BOX, MTD 1'-6" (450 MM) A.F.F. UNLESS NOTED OTHERWISE
(3)		MOTOR NUMBER DENOTES HORSEPOWER
(G)		GENERATOR
	PB	PULL BOX
		LIGHTING OR LIGHTING/POWER PANELBOARD
		DISTRIBUTION OR POWER PANELBOARD
		CONTROLLER, MAGNETIC
		COMBINATION CONTROLLER AND DISCONNECT SWITCH
	100/3/80	FUSED DISCONNECT SWITCH – SWITCH SIZE/POLES/FUSE SIZE
	100/3/NF	UNFUSED DISCONNECT SWITCH – SWITCH SIZE/POLES/NF (NON-FUSED)
	VFD	VARIABLE FREQUENCY DRIVE
	K	KEYPAD
		CONDUIT TERMINATED 6" (150 MM) A.F.F. IN STANDARD BOX FOR EXTENSION TO EQUIPMENT AS DIRECTED
		CONDUIT TERMINATED W/COUPLING (FLUSH W/FINISHED FLOOR) FOR EXTENSION TO EQUIPMENT AS DIRECTED
		UNDERFLOOR DUCT AND JUNCTION BOX (DOUBLE SYSTEM: 2 LINES, SINGLE SYSTEM 1 LINE)
		FLEXIBLE CONDUIT – 1/2" (15 MM), W/3 #12 WIRES
		BRANCH CIRCUIT EXPOSED
	SD	SMOKE DAMPER
	F/SD	FIRE/SMOKE DAMPER

SYMBOLS - NURSE CALL SYSTEM

CLG	WALL	DESCRIPTION
	NCS	NURSE'S CALL MASTER STATION MTD ON NURSE'S COUNTER TOP UNLESS OTHERWISE NOTED.
	NCT	NURSE'S CALL TERMINAL CABINET
	N E	NURSE'S CALL STATION – MTD 6'-0" (1830 MM) AFF FOR SHOWER LOCATION MTD 4'-6" (1400 MM) AFF FOR TUB LOCATION MTD 3'-0" (915 MM) AFF FOR TOILET LOCATION.
	N S	NURSE'S CALL AUDIO VISUAL WALL STATION (STAFF) MTD 5'-0" (1530 MM) AFF UNLESS OTHERWISE NOTED.
	N D	NURSE'S CALL DUTY STATION. MTD 5'-0" (1530 MM) AFF UNLESS NOTED OTHERWISE.
N S		PSYCHIATRIC SECURITY SPEAKER / MICROPHONE
	N P	PSYCHIATRIC CORRIDOR STATION WITH KEY SWITCH.
	N 2	NURSE'S CALL DOME LIGHT (SUFFIX INDICATES No OF LAMP) MTD 6" (150 MM) ABOVE DOOR.
N I		NURSE'S CALL AUXILIARY INTERSECTIONAL DOME LIGHT.
N D		NURSE'S CALL CORRIDOR DOME LIGHT.
	N	NURSE'S CALL CONDUIT RUN, MINIMUM 3/4" (20 MM) CONDUIT.
	H T	SECURITY TYPE PANIC BUTTON. MTD 4'-6" (1400 MM) AFF

NOTE: ALSO SEE VA CONSTRUCTION STANDARD CD-28.

SYMBOLS - TELEVISION SYSTEM

CLG.	WALL	DESCRIPTION
		4 11/16" (120 MM) MASTER ANTENNA OUTLET BOX W/BLANK COVER FOR TV INSTALLATION, MTD. 18" (460 MM) A.F.F. UNLESS OTHERWISE NOTED.
	C	OUTLET FOR TV CAMERA (CCTV SYSTEM), MTD 18" (460 MM) A.F.F.
	M	OUTLET FOR TV MONITOR (CCTV SYSTEM)
	TV	TV CONDUIT RUN, MINIMUM 3/4" (20 MM) CONDUIT
	CCTV	CCTV CONDUIT RUN, MINIMUM 1" (25 MM) CONDUIT

SYMBOLS - LIGHTING

	FLUORESCENT FIXTURE ON NORMAL POWER-LETTER DESIGNATES TYPE.
	FLUORESCENT FIXTURE ON EMERGENCY POWER (CRITICAL BRANCH)-LETTER DESIGNATES TYPE.
	FLUORESCENT FIXTURE ON EMERGENCY POWER (LIFE SAFETY BRANCH)-LETTER DESIGNATES TYPE.
	LED EXIT SIGN-DARKENED AREA INDICATES FACE LIGHTING WITH DIRECTIONAL ARROWS.

SYMBOLS - GENERAL

	DESCRIPTION
	BRANCH CIRCUIT CONCEALED IN FLOOR.
	BRANCH CIRCUIT CONCEALED IN CEILING OR WALL.
PHASE CONDUCTORS / NEUTRAL / GROUND	HOME RUN TO PANEL – ARROWHEADS INDICATE CIRCUITS. WIRE INDICATED ARE GREEN GROUND, NEUTRAL AND THREE HOT LEGS (A DIFFERENT PHASE FOR EACH CIRCUIT) MAXIMUM THREE CIRCUITS PER CONDUIT.
	RISER UP.
	RISER DOWN.

SYMBOLS - MISCELLANEOUS COMMUNICATONS SYSTEMS

CLG	WALL	DESCRIPTION
		REMOTE DICTATING OUTLET MTD 1'-6" (460 MM) A.F.F. UNLESS OTHERWISE NOTED.
	R M	3-POLE TWIST-LOCK RECEPTACLE FOR MICROPHONE, MTD. 4'-6" (1400 MM) A.F.F.
		INTERCOM STATION (REFER TO SPECS. FOR FUNCTIONAL OPERATION OF INSTRUMENT & TYPE REQUIRED)
	IC	INTERCOM CONDUIT RUN. MINIMUM 3/4" (20 MM) CONDUIT
	S	INTERCOM STAFF STATION.
		SPEAKER

NOTE: ALSO SEE VA CONSTRUCTION STANDARD CD-28

CONSTRUCTION SET

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