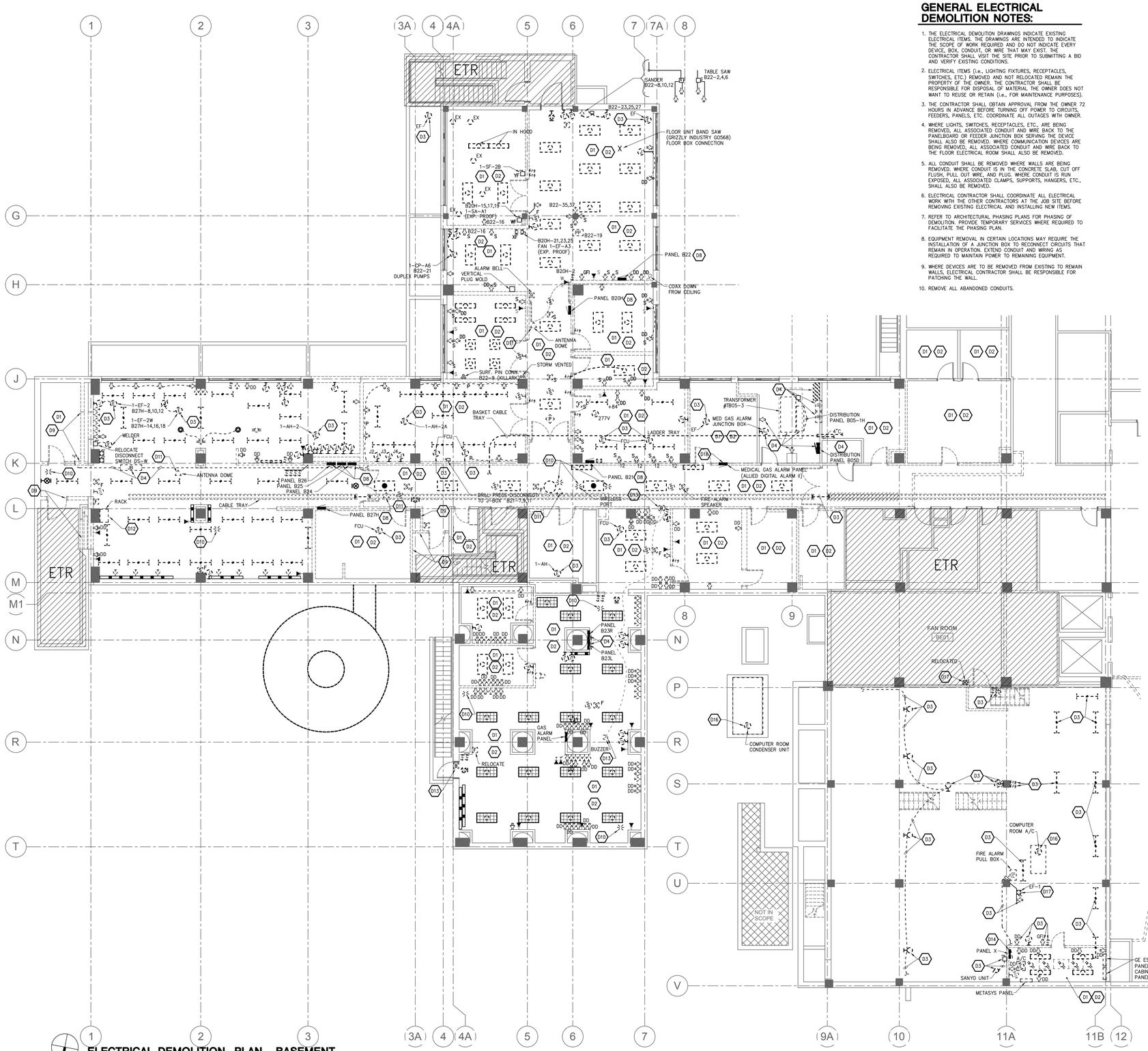
GENERAL ELECTRICAL DEMOLITION NOTES:

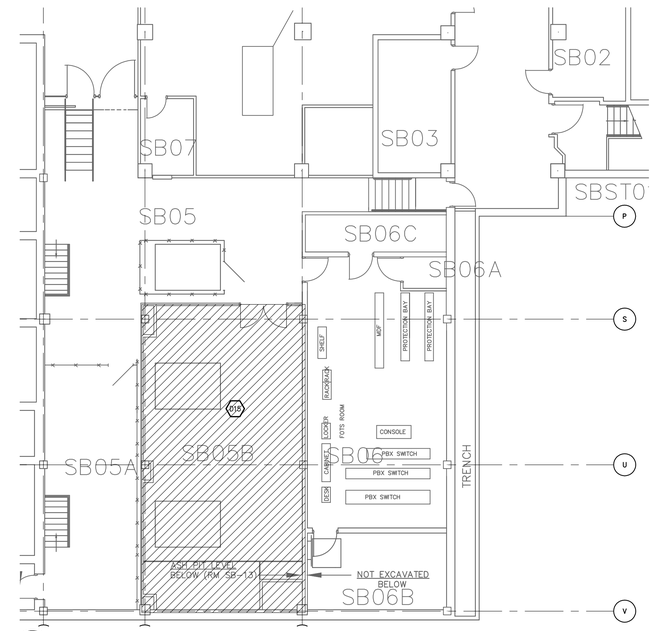
1. THE ELECTRICAL DEMOLITION DRAWINGS INDICATE EXISTING ELECTRICAL ITEMS. THE DRAWINGS ARE INTENDED TO INDICATE THE SCOPE OF WORK REQUIRED AND DO NOT INDICATE EVERY DEVICE, BOX, CONDUIT, OR WIRE THAT MAY EXIST. THE CONTRACTOR SHALL VISIT THE SITE PRIOR TO SUBMITTING A BID AND VERIFY EXISTING CONDITIONS.
2. ELECTRICAL ITEMS (i.e., LIGHTING FIXTURES, RECEPTACLES, SWITCHES, ETC.) REMOVED AND NOT RELOCATED REMAIN THE PROPERTY OF THE OWNER. THE CONTRACTOR SHALL BE RESPONSIBLE FOR DISPOSAL OF MATERIAL THE OWNER DOES NOT WANT TO REUSE OR RETAIN (i.e., FOR MAINTENANCE PURPOSES).
3. THE CONTRACTOR SHALL OBTAIN APPROVAL FROM THE OWNER 72 HOURS IN ADVANCE BEFORE TURNING OFF POWER TO CIRCUITS, FEEDERS, PANELS, ETC. COORDINATE ALL OUTAGES WITH OWNER.
4. WHERE LIGHTS, SWITCHES, RECEPTACLES, ETC., ARE BEING REMOVED, ALL ASSOCIATED CONDUIT AND WIRE BACK TO THE PANELBOARD OR FEEDER JUNCTION BOX SERVING THE DEVICE SHALL ALSO BE REMOVED. WHERE COMMUNICATION DEVICES ARE BEING REMOVED, ALL ASSOCIATED CONDUIT AND WIRE BACK TO THE FLOOR ELECTRICAL ROOM SHALL ALSO BE REMOVED.
5. ALL CONDUIT SHALL BE REMOVED WHERE WALLS ARE BEING REMOVED. WHERE CONDUIT IS IN THE CONCRETE SLAB, CUT OFF FLUSH, PULL OUT WIRE, AND PLUG. WHERE CONDUIT IS RUN EXPOSED, ALL ASSOCIATED CLAMPS, SUPPORTS, HANGERS, ETC., SHALL ALSO BE REMOVED.
6. ELECTRICAL CONTRACTOR SHALL COORDINATE ALL ELECTRICAL WORK WITH THE OTHER CONTRACTORS AT THE JOB SITE BEFORE REMOVING EXISTING ELECTRICAL AND INSTALLING NEW ITEMS.
7. REFER TO ARCHITECTURAL PHASING PLANS FOR PHASING OF DEMOLITION. PROVIDE TEMPORARY SERVICES WHERE REQUIRED TO FACILITATE THE PHASING PLAN.
8. EQUIPMENT REMOVAL IN CERTAIN LOCATIONS MAY REQUIRE THE INSTALLATION OF A JUNCTION BOX TO RECONNECT CIRCUITS THAT REMAIN IN OPERATION. EXTEND CONDUIT AND WIRING AS REQUIRED TO MAINTAIN POWER TO REMAINING EQUIPMENT.
9. WHERE DEVICES ARE TO BE REMOVED FROM EXISTING TO REMAIN WALLS, ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR PATCHING THE WALL.
10. REMOVE ALL ABANDONED CONDUITS.

REFERENCED ELECTRICAL DEMOLITION NOTES:

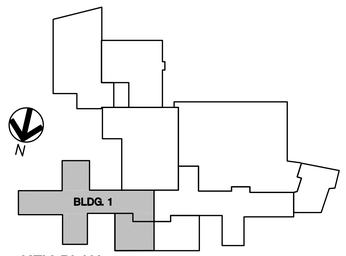
- D1 REMOVE LIGHT FIXTURES, ASSOCIATED LIGHT SWITCH, SPEAKERS, FIRE ALARM DEVICES, COMMUNICATIONS DEVICES AND BACKBOXES FROM THE INDICATED ROOM/CORRIDOR OR BOUNDED AREA CEILING(S) UNLESS NOTED OTHERWISE.
- D2 REMOVE ALL RECEPTACLES, PLUGSTRIPS, POWER POLES, MECHANICAL UNIT POWER CONNECTIONS, POWER OUTLETS, COMMUNICATION DEVICES, BACKBOXES AND JUNCTION BOXES FROM THE INDICATED ROOM/CORRIDOR OR BOUNDED AREA UNLESS NOTED OTHERWISE.
- D3 REMOVE THE INDICATED ITEM, BACKBOX, CONDUIT AND WIRE BACK TO THE SOURCE EXCEPT WHERE MAINTAINING CONTINUITY TO EXISTING TO REMAIN ACTIVE DEVICES.
- D4 EXISTING DEVICE(S) SHALL REMAIN AS CURRENTLY INSTALLED.
- D5 THE INDICATED DEVICE SHALL BE REMOVED AND SALVAGED FOR RELOCATION IN THE NEW WORK. EXTEND CONDUIT/CABLING TO NEW LOCATION. SEE SHEET E2.01 FOR NEW LOCATION.
- D6 DISCONNECT THE INDICATED EQUIPMENT. REMOVE THE BACKBOX, CONDUIT AND WIRE BACK TO THE SOURCE EXCEPT WHERE MAINTAINING CONTINUITY TO EXISTING TO REMAIN ACTIVE DEVICES.
- D7 DISCONNECT POWER AND CONTROL WIRING FROM THE INDICATED COMBINATION STARTER/DISCONNECT SWITCH AND REMOVE. RELOCATE ITEMS TO THE EAST 5'-0". WIRING SHALL BE REMOVED TO THE CEILING SPACE AND EXTENDED TO THE NEW LOCATION. COORDINATE WORK WITH MECHANICAL DRAWINGS.
- D8 DISCONNECT PANEL FEEDER AND REMOVE BACK TO DISTRIBUTION PANEL. DISCONNECT ALL BRANCH CIRCUIT CONDUCTORS AND REMOVE TO THE CEILING SPACE. REMOVE ALL ABANDONED BRANCH CIRCUITS IN THEIR ENTIRETY. ALL EXISTING TO REMAIN BRANCH CIRCUITS SHALL BE EXTENDED TO THE NEW REPLACEMENT PANEL LOCATION, ROUTED CONCEALED.
- D9 REMOVE ALL RECEPTACLES, PLUGSTRIPS, POWER POLES, MECHANICAL UNIT POWER CONNECTIONS, POWER OUTLETS, COMMUNICATION DEVICES, BACKBOXES AND JUNCTION BOXES FROM THE INDICATED ROOM WALL SHOWN AS DEMO'D UNLESS NOTED OTHERWISE.
- D10 AT THE INDICATED WIRELESS PORT LOCATIONS, REMOVE DEVICE AND REMOVE CABLING BACK TO GRID LINES 10 & L. CABLING SHALL BE RE-INSTALLED IN NEW WORK AND DEVICE SHALL BE RE-INSTALLED AND OPERATIONAL.
- D11 AT THE INDICATED ANTENNA DOME LOCATIONS, REMOVE THE DEVICE AND REMOVE CABLING BACK TO GRID LINES 10 & L. CABLING SHALL BE RE-INSTALLED IN NEW WORK AND DEVICE SHALL BE RE-INSTALLED AND OPERATIONAL.
- D12 AFTER DEMOLITION PHASE, CONTRACTOR SHALL REMOVE AND TURN OVER THE INDICATED RACK TO THE OWNER.
- D13 REMOVE THE MAGNETIC CONTACTS AT THE INDICATED DOORS AND THE CEILING MOUNTED BUZZER. RELOCATE AS SHOWN ON SHEET 1-B-E2.
- D14 EXISTING PANEL X IS A 100 AMP, 208 VOLT, SINGLE PHASE PANEL BOARD, 16 CIRCUITS (SQUARE D QO LOAD CENTER). PANEL X IS FED FROM PANEL ELP, CIRCUITS 28,30 IN ROOM SB06B. REMOVE PANEL FEEDER.
- D15 REMOVE ALL LIGHT FIXTURES AND CEILING MOUNTED DEVICES WITHIN CROSS-HATCHED AREA. REMOVE ALL BRANCH CIRCUIT CONDUITS, COMMUNICATION CONDUITS AND CABLES WITHIN THE INDICATED CROSS-HATCHED AREA. REMOVE ALL FIRE ALARM CONDUITS WITHIN THE INDICATED CROSS-HATCHED AREA. AFTER THE STRUCTURAL WORK IS COMPLETED AND THE CEILING RE-INSTALLED. CONTRACTOR SHALL RE-INSTALL ALL REMOVED WORK.
- D16 DISCONNECT AND REMOVE POWER FEED TO COMPUTER ROOM AIR CONDITIONER UNIT AND ASSOCIATED EXTERIOR CONDENSER UNIT. NEW SYSTEM SHALL BE OPERATIONAL PRIOR TO DEMO WORK. COORDINATE SCHEDULING W/MECHANICAL CONTRACTOR.
- D17 EXISTING EXHAUST FAN STARTER/DISCONNECT SWITCH UNIT SHALL BE REMOVED AND RELOCATED TO FAN ROOM BE01. POWER FEED AND CONTROLS FEED CONDUITS SHALL BE REMOVED TO THE CEILING SPACE AND EXTENDED TO THE NEW LOCATION OF THE STARTER/DISCONNECT SWITCH UNIT.
- D18 DISCONNECT THE EMERGENCY POWER CIRCUIT FEEDING THE INDICATED MEDICAL GAS ALARM PANEL. COORDINATE SCHEDULING WITH THE MECHANICAL CONTRACTOR. REMOVE THE BRANCH CIRCUIT WIRING.



ELECTRICAL DEMOLITION PLAN - BASEMENT
1/8" = 1'-0"



ELECTRICAL DEMOLITION PLAN - SUB-BASEMENT
1/8" = 1'-0"



KEY PLAN
NOT TO SCALE

1-B

Revisions	Date

SHIVEHATTERY ARCHITECTURE + ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri Illinois Firm Number: 184-000214

Drawing Title: ELECTRICAL DEMOLITION PLAN

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12-17-2012 CONSTRUCTION DOCUMENTS

Project No. DVA#636-311 S-H#110240-0

Approved: Division Chief

Approved: Service Director

Building Number 1 | Checked TRF | Drawn MSJ

Location: IOWA CITY VA HEALTH CARE SYSTEM, IOWA CITY, IOWA

DRAWING NO. 1-B-ED1

Dwg. 1 Of 7

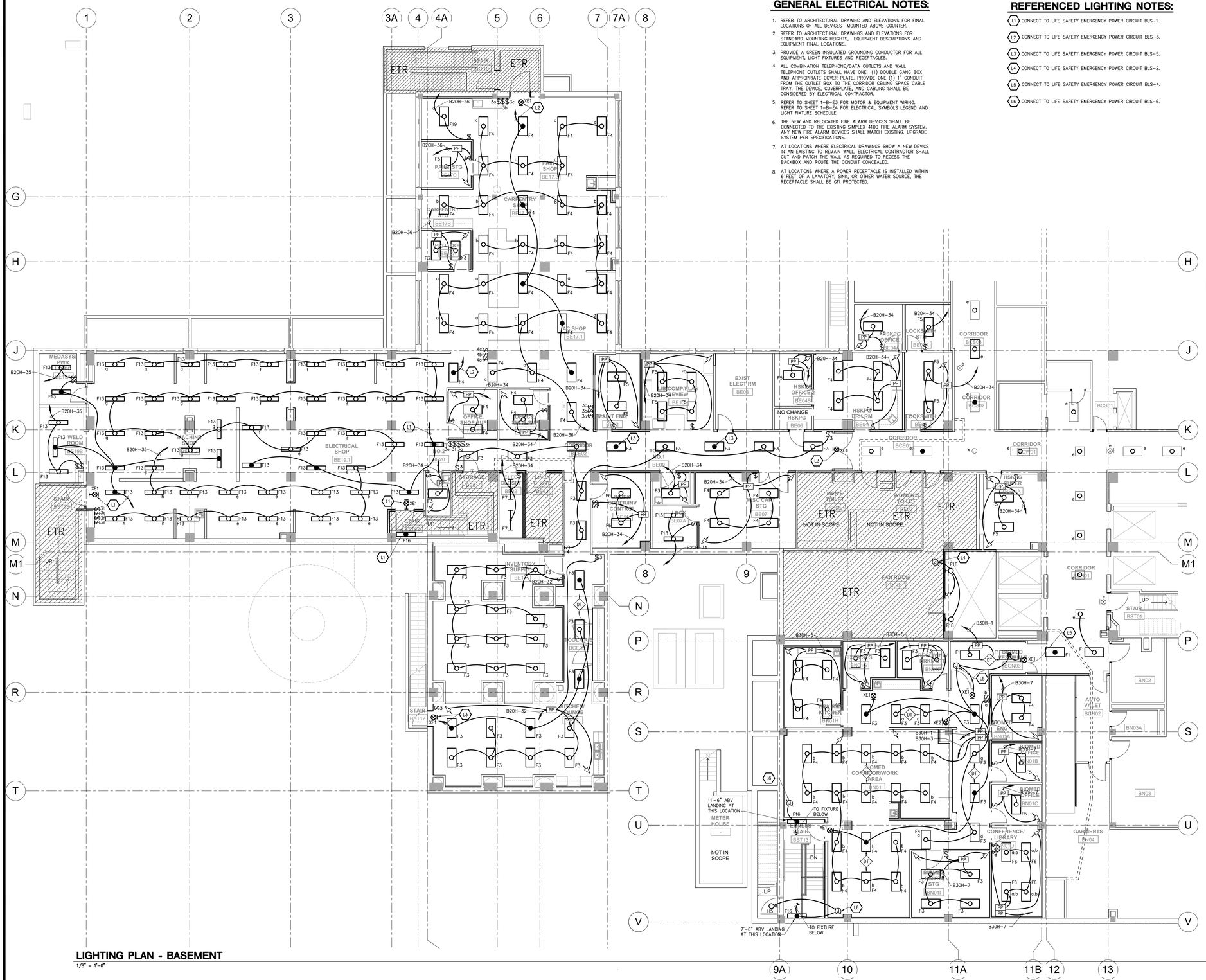
Veterans Administration

GENERAL ELECTRICAL NOTES:

1. REFER TO ARCHITECTURAL DRAWING AND ELEVATIONS FOR FINAL LOCATIONS OF ALL DEVICES MOUNTED ABOVE COUNTER.
2. REFER TO ARCHITECTURAL DRAWINGS AND ELEVATIONS FOR STANDARD MOUNTING HEIGHTS. EQUIPMENT DESCRIPTIONS AND EQUIPMENT FINAL LOCATIONS.
3. PROVIDE A GREEN INSULATED GROUNDING CONDUCTOR FOR ALL EQUIPMENT, LIGHT FIXTURES AND RECEPTACLES.
4. ALL COMBINATION TELEPHONE/DATA OUTLETS AND WALL TELEPHONE OUTLETS SHALL HAVE ONE (1) DOUBLE GANG BOX AND APPROPRIATE COVER PLATE. PROVIDE ONE (1) 1" CONDUIT FROM THE OUTLET BOX TO THE CORRIDOR CEILING SPACE CABLE TRAY. THE DEVICE, COVERPLATE, AND CABLING SHALL BE CONSIDERED BY ELECTRICAL CONTRACTOR.
5. REFER TO SHEET 1-B-E3 FOR MOTOR & EQUIPMENT WIRING. REFER TO SHEET 1-B-E4 FOR ELECTRICAL SYMBOLS LEGEND AND LIGHT FIXTURE SCHEDULE.
6. THE NEW AND RELOCATED FIRE ALARM DEVICES SHALL BE CONNECTED TO THE EXISTING SIMPLEX 4100 FIRE ALARM SYSTEM. ANY NEW FIRE ALARM DEVICES SHALL MATCH EXISTING. UPGRADE SYSTEM PER SPECIFICATIONS.
7. AT LOCATIONS WHERE ELECTRICAL DRAWINGS SHOW A NEW DEVICE IN AN EXISTING TO REMAIN WALL, ELECTRICAL CONTRACTOR SHALL CUT AND PATCH THE WALL AS REQUIRED TO RECESS THE BACKBOX AND ROUTE THE CONDUIT CONCEALED.
8. AT LOCATIONS WHERE A POWER RECEPTACLE IS INSTALLED WITHIN 6 FEET OF A LAVATORY, SINK, OR OTHER WATER SOURCE, THE RECEPTACLE SHALL BE GFI PROTECTED.

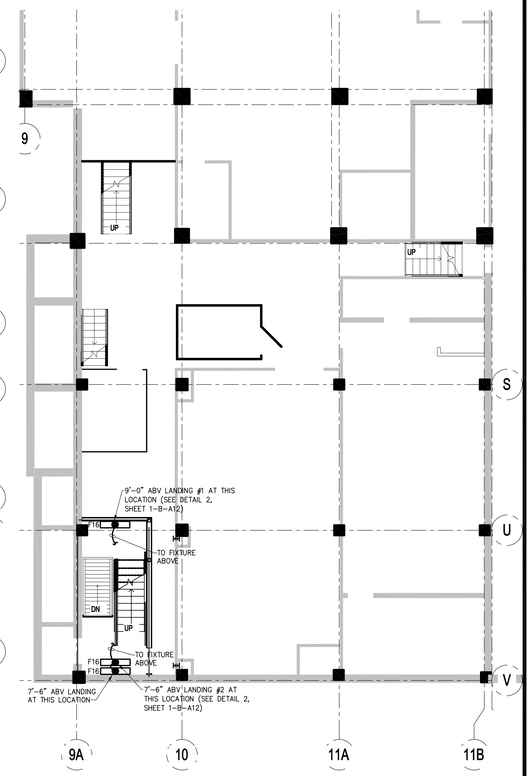
REFERENCED LIGHTING NOTES:

- L1 CONNECT TO LIFE SAFETY EMERGENCY POWER CIRCUIT BLS-1.
- L2 CONNECT TO LIFE SAFETY EMERGENCY POWER CIRCUIT BLS-3.
- L3 CONNECT TO LIFE SAFETY EMERGENCY POWER CIRCUIT BLS-5.
- L4 CONNECT TO LIFE SAFETY EMERGENCY POWER CIRCUIT BLS-2.
- L5 CONNECT TO LIFE SAFETY EMERGENCY POWER CIRCUIT BLS-4.
- L6 CONNECT TO LIFE SAFETY EMERGENCY POWER CIRCUIT BLS-6.



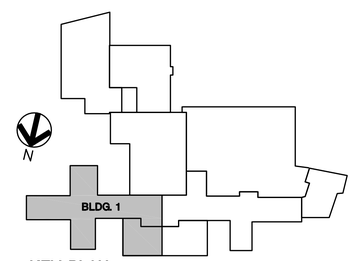
LIGHTING PLAN - BASEMENT

1/8" = 1'-0"



LIGHTING PLAN - SUB-BASEMENT

1/8" = 1'-0"



KEY PLAN

NOT TO SCALE

1-B

Revisions	Date

SHIVEHATTERY
ARCHITECTURE + ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri

Drawing Title: BASEMENT & SUB-BASEMENT LIGHTING PLAN

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12-17-2012 CONSTRUCTION DOCUMENTS

Project No. DVA#636-311 S-H#110240-0

Approved: Division Chief

Approved: Service Director

Building Number 1 | Checked JJH | Drawn DMM

Location: IOWA CITY VA HEALTH CARE SYSTEM, IOWA CITY, IOWA

DRAWING NO. 1-B-E1

Dwg. 2 Of 7

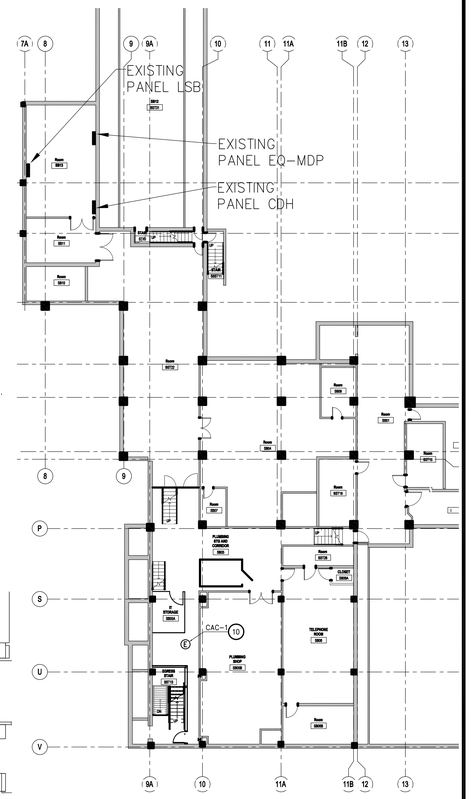
Veterans Administration

GENERAL ELECTRICAL NOTES:

1. REFER TO ARCHITECTURAL DRAWING AND ELEVATIONS FOR FINAL LOCATIONS OF ALL DEVICES MOUNTED ABOVE COUNTER.
2. REFER TO ARCHITECTURAL DRAWINGS AND ELEVATIONS FOR STANDARD MOUNTING HEIGHTS, EQUIPMENT DESCRIPTIONS AND EQUIPMENT FINAL LOCATIONS.
3. PROVIDE A GREEN INSULATED GROUNDING CONDUCTOR FOR ALL EQUIPMENT, LIGHT FIXTURES AND RECEPTACLES.
4. ALL COMBINATION TELEPHONE/DATA OUTLETS AND WALL TELEPHONE OUTLETS SHALL HAVE ONE (1) DOUBLE GANG BOX AND APPROPRIATE COVER PLATE. PROVIDE ONE (1) 1" CONDUIT FROM THE OUTLET BOX TO THE CORRIDOR CEILING SPACE CABLE TRAY. THE DEVICE, COVERPLATE, AND CABLING SHALL BE CONSIDERED BY ELECTRICAL CONTRACTOR.
5. REFER TO SHEET 1-B-E3 FOR MOTOR & EQUIPMENT WIRING. REFER TO SHEET 1-B-E4 FOR ELECTRICAL SYMBOLS LEGEND AND LIGHT FIXTURE SCHEDULE.
6. THE NEW AND RELOCATED FIRE ALARM DEVICES SHALL BE CONNECTED TO THE EXISTING SIMPLEX 4100 FIRE ALARM SYSTEM. ANY NEW FIRE ALARM DEVICES SHALL MATCH EXISTING. UPGRADE SYSTEM PER SPECIFICATIONS.
7. AT LOCATIONS WHERE ELECTRICAL DRAWINGS SHOW A NEW DEVICE IN AN EXISTING TO REMAIN WALL, ELECTRICAL CONTRACTOR SHALL CUT AND PATCH THE WALL AS REQUIRED TO RECESS THE BACKBOX AND ROUTE THE CONDUIT CONCEALED.
8. AT LOCATIONS WHERE A POWER RECEPTACLE IS INSTALLED WITHIN 6 FEET OF A LAVATORY, SINK, OR OTHER WATER SOURCE, THE RECEPTACLE SHALL BE GFI PROTECTED.
9. ELECTRICAL CONTRACTOR IS RESPONSIBLE FOR ALL CEILING REMOVAL AND RE-INSTALLATION AS REQUIRED FOR THE SHOWN ELECTRICAL WORK IN AREAS WHERE EXISTING CEILINGS REMAIN.

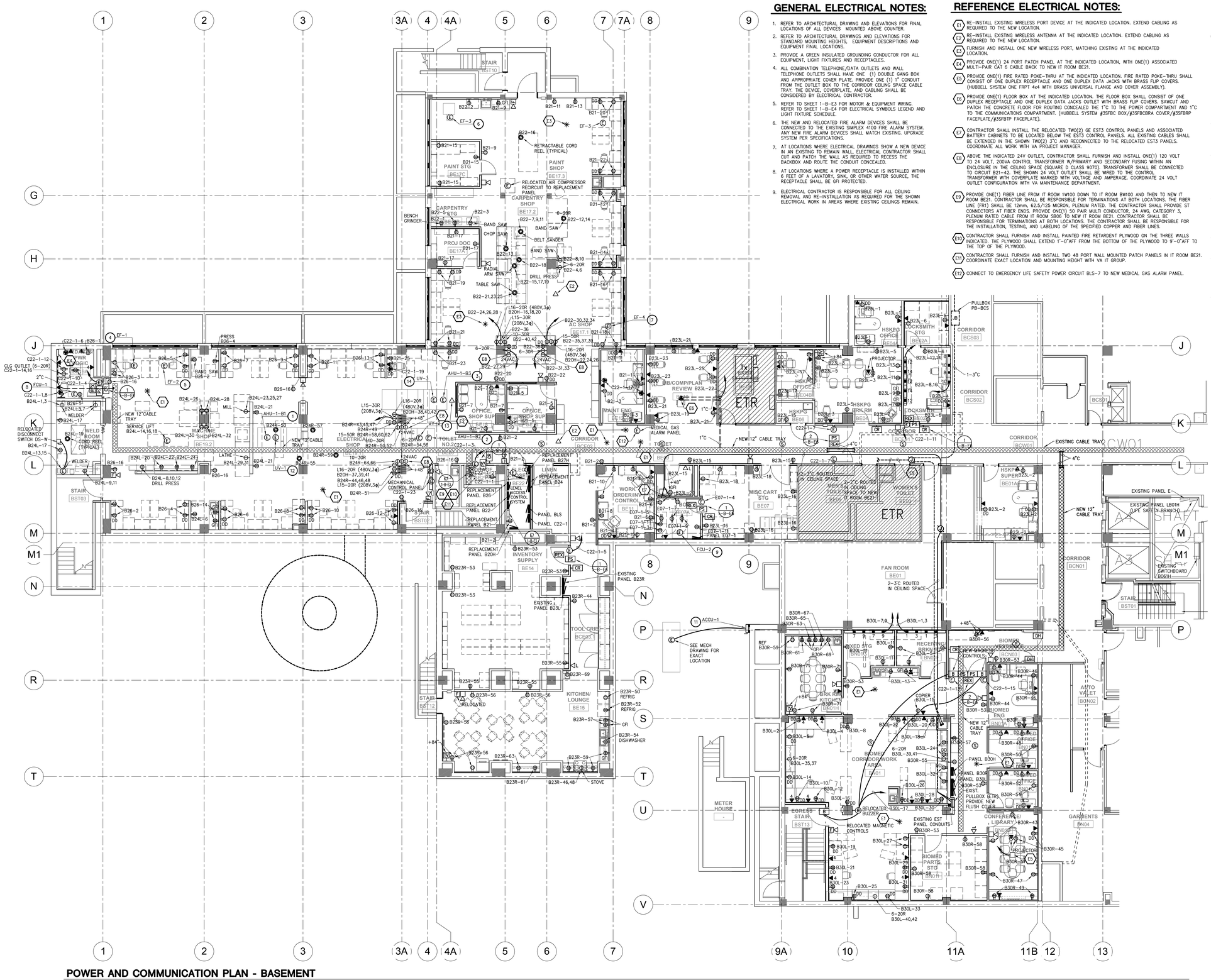
REFERENCE ELECTRICAL NOTES:

- E1 RE-INSTALL EXISTING WIRELESS PORT DEVICE AT THE INDICATED LOCATION. EXTEND CABLING AS REQUIRED TO THE NEW LOCATION.
- E2 RE-INSTALL EXISTING WIRELESS ANTENNA AT THE INDICATED LOCATION. EXTEND CABLING AS REQUIRED TO THE NEW LOCATION.
- E3 FURNISH AND INSTALL ONE NEW WIRELESS PORT, MATCHING EXISTING AT THE INDICATED LOCATION.
- E4 PROVIDE ONE(1) 24 PORT PATCH PANEL AT THE INDICATED LOCATION, WITH ONE(1) ASSOCIATED MULTI-PAIR CAT 6 CABLE BACK TO NEW IT ROOM BE21.
- E5 PROVIDE ONE(1) FIRE RATED POKE-THRU AT THE INDICATED LOCATION. FIRE RATED POKE-THRU SHALL CONSIST OF ONE DUPLEX RECEPTACLE AND ONE DUPLEX DATA JACKS WITH BRASS FLIP COVERS. (HUBBELL SYSTEM ONE FRPT 4x4 WITH BRASS UNIVERSAL FLANGE AND COVER ASSEMBLY).
- E6 PROVIDE ONE(1) FLOOR BOX AT THE INDICATED LOCATION. THE FLOOR BOX SHALL CONSIST OF ONE DUPLEX RECEPTACLE AND ONE DUPLEX DATA JACKS OUTLET WITH BRASS FLIP COVERS. SAWCUT AND PATCH THE CONCRETE FLOOR FOR ROUTING CONCEALED THE 1"C TO THE POWER COMPARTMENT AND 1"C TO THE COMMUNICATIONS COMPARTMENT. (HUBBELL SYSTEM #3SFBC BOX/#3SFBCBRA COVER/#3SFBRP FACEPLATE/#3SFBTP FACEPLATE).
- E7 CONTRACTOR SHALL INSTALL THE RELOCATED TWO(2) GE EST3 CONTROL PANELS AND ASSOCIATED BATTERY CABINETS TO BE LOCATED BELOW THE EST3 CONTROL PANELS. ALL EXISTING CABLES SHALL BE EXTENDED IN THE SHOWN TWO(2) 3"C AND RECONNECTED TO THE RELOCATED EST3 PANELS. COORDINATE ALL WORK WITH VA PROJECT MANAGER.
- E8 ABOVE THE INDICATED 24V OUTLET, CONTRACTOR SHALL FURNISH AND INSTALL ONE(1) 120 VOLT TO 24 VOLT, 200VA CONTROL TRANSFORMER W/PRIMARY AND SECONDARY FUSING WITHIN AN ENCLOSURE IN THE CEILING SPACE (SQUARE D CLASS 9070). TRANSFORMER SHALL BE CONNECTED TO CIRCUIT B21-42. THE SHOWN 24 VOLT OUTLET SHALL BE WIRED TO THE CONTROL TRANSFORMER WITH COVERPLATE MARKED WITH VOLTAGE AND AMPERAGE. COORDINATE 24 VOLT OUTLET CONFIGURATION WITH VA MAINTENANCE DEPARTMENT.
- E9 PROVIDE ONE(1) FIBER LINE FROM IT ROOM 1W100 DOWN TO IT ROOM BW100 AND THEN TO NEW IT ROOM BE21. CONTRACTOR SHALL BE RESPONSIBLE FOR TERMINATIONS AT BOTH LOCATIONS. THE FIBER LINE (TR1) SHALL BE 12mm, 62.5/125 MICRON, PLENUM RATED. THE CONTRACTOR SHALL PROVIDE ST CONNECTORS AT FIBER ENDS. PROVIDE ONE(1) 50 PAIR MULTI CONDUCTOR, 24 AWG, CATEGORY 3, PLENUM RATED CABLE FROM IT ROOM SB06 TO NEW IT ROOM BE21. CONTRACTOR SHALL BE RESPONSIBLE FOR TERMINATIONS AT BOTH LOCATIONS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE INSTALLATION, TESTING, AND LABELING OF THE SPECIFIED COPPER AND FIBER LINES.
- E10 CONTRACTOR SHALL FURNISH AND INSTALL PAINTED FIRE RETARDENT PLYWOOD ON THE THREE WALLS INDICATED. THE PLYWOOD SHALL EXTEND 1'-0"AFF FROM THE BOTTOM OF THE PLYWOOD TO 9'-0"AFF TO THE TOP OF THE PLYWOOD.
- E11 CONTRACTOR SHALL FURNISH AND INSTALL TWO 48 PORT WALL MOUNTED PATCH PANELS IN IT ROOM BE21. COORDINATE EXACT LOCATION AND MOUNTING HEIGHT WITH VA IT GROUP.
- E12 CONNECT TO EMERGENCY LIFE SAFETY POWER CIRCUIT BLS-7 TO NEW MEDICAL GAS ALARM PANEL.



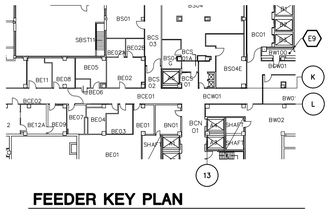
POWER PLAN - SUB-BASEMENT

1/16" = 1'-0"



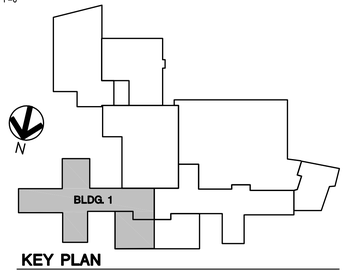
POWER AND COMMUNICATION PLAN - BASEMENT

1/8" = 1'-0"



FEEDER KEY PLAN

1/32" = 1'-0"



KEY PLAN

NOT TO SCALE

1-B

Revisions	Date

SHIVEHATTERY
ARCHITECTURE + ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri

Drawing Title: POWER AND COMMUNICATION PLAN – BASEMENT

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12-17-2012 CONSTRUCTION DOCUMENTS

Project No. DVA#636-311 S-H#110240-0

Approved: Division Chief

Approved: Service Director

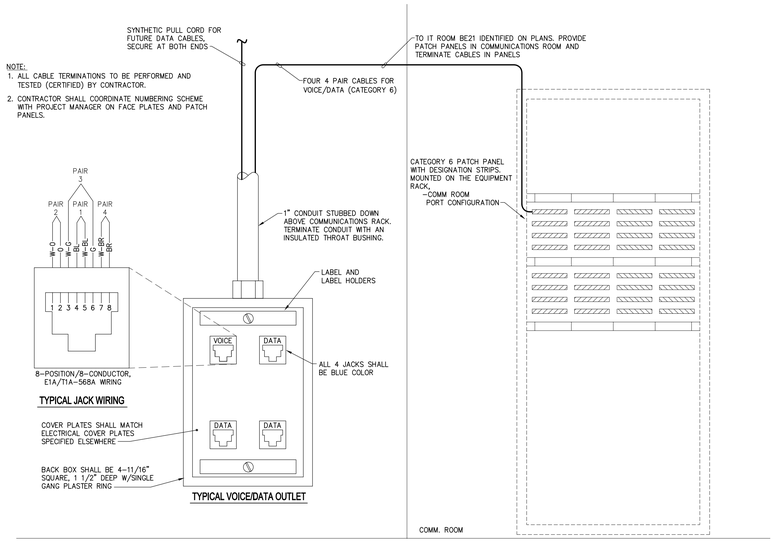
Building Number 1 | Checked JJH | Drawn DMM

Location: IOWA CITY VA HEALTH CARE SYSTEM, IOWA CITY, IOWA

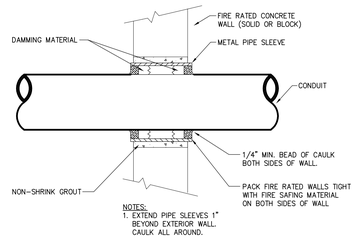
DRAWING NO. 1-B-E2

Dwg. 3 Of 7

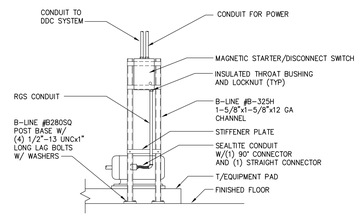
Veterans Administration



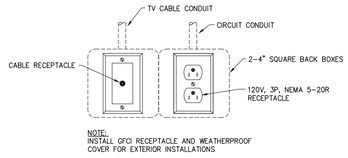
1 CONNECTION DIAGRAM - VOICE/DATA
NOT TO SCALE



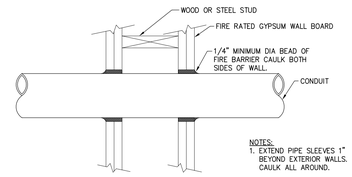
2 WALL PENETRATION DETAIL - UL91
NO SCALE



3 LOCAL DISCONNECT SWITCH AND CONTROL STATION DETAIL
NOT TO SCALE



4 MULTI-RECEPTACLE DETAIL FOR TV LOCATIONS
NO SCALE



5 WALL PENETRATION DETAIL - UL147
NO SCALE

MOTOR AND EQUIPMENT SCHEDULE

PLAN MARK	DESIGNATION	LOAD	VOLTS PHASE	CIRCUIT NUMBER	DISCONNECT DEVICE/ FUSE SIZE AT MOTOR LOCATION	WIRE SIZE	CONDUIT SIZE	DISC BY	MS BY	CONTROLS TYPE	CONTROLS BY	REMARKS
1	AHU–1–B1	2HP	480/3	B27H–2,4,6	30A/8A	3–#12AWG+1–#12AWG GND	3/4"	E	E	VFD	E	PROVIDE/INSTALL SMOKE DETECTOR IN RETURN DUCT
2	AHU–1–B2	2HP	480/3	B27H–8,10,12	30A/8A	3–#12AWG+1–#12AWG GND	3/4"	E	E	VFD	E	PROVIDE/INSTALL SMOKE DETECTOR IN RETURN DUCT
3	AHU–1–B3	2HP	480/3	B27H–14,16,18	30A/8A	3–#12AWG+1–#12AWG GND	3/4"	E	E	VFD	E	PROVIDE/INSTALL SMOKE DETECTOR IN RETURN DUCT
4	EF–1	1/2HP	120/1	B26–22	20A/20A	2–#12AWG+1–#12AWG GND	3/4"	E	E	MS	E	WELDING HOOD EXHAUST
5	EF–2	735W	120/1	B26–24	20A/9A	2–#12AWG+1–#12AWG GND	3/4"	E	E	MS	E	AHU–1–B1 RELIEF
6	EF–3	1HP	480/3	B27H–1,3,5	30A/4A	3–#12AWG+1–#12AWG GND	3/4"	E	E	TS	E	AHU–1–B1,B2,B3 RELIEF
7	EF–4	735W	120/1	B22–41	20A/9A	2–#12AWG+1–#12AWG GND	3/4"	E	E	MS	E	AHU–1–B3 RELIEF
8	FCU–1	3.1FLA	120/1	C22–1–2	20A/6A	2–#12AWG+1–#12AWG GND	3/4"	E	M	–	M	
9	FCU–2	3.1FLA	120/1	E07–1–2	30A/6A	2–#12AWG+1–#12AWG GND	3/4"	E	M	–	M	
10	CAC–1	37.3FLA	480/3	SEE NOTE 7	60A/45A	3–#8AWG+1–#10AWG GND	3/4"	M	M	–	M	SERVES EXISTING TELEPHONE ROOM (LOCATED OUTSIDE). SEE NOTE 8.
11	ACCU–1	5.6FLA	480/3	SEE NOTE 7	30A/15A	3–#12AWG+1–#12AWG GND	3/4"	M	M	–	M	LOCATED IN SUB–BASEMENT (SERVES CAC–1)
12	UV–1	6A	120/1	B26–26	20A/9A	2–#12AWG+1–#12AWG GND	3/4"	E	M	–	M	SERVES AHU–1–B1
13	UV–2	6A	120/1	B26–28	20A/9A	2–#12AWG+1–#12AWG GND	3/4"	E	M	–	M	SERVES AHU–1–B2
14	UV–3	6A	120/1	B26–30	20A/9A	2–#12AWG+1–#12AWG GND	3/4"	E	M	–	M	SERVES AHU–1–B3

MOTOR & EQUIPMENT SCHEDULE NOTES

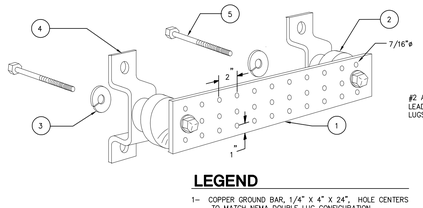
1. LOAD: A = AMPERES; FHP = FRACTIONAL HORSEPOWER; HP = HORSEPOWER; KW = KILOWATTS; W = WATTS.
2. OVERCURRENT PROTECTION: 3P–60 = 3 POLE, 60 AMPERE CIRCUIT BREAKER; 60AF = 60 AMPERE FUSE(S).
3. RESPONSIBILITY: E = ELECTRICAL CONTRACTOR; EX = EXISTING; G = GENERAL CONTRACTOR; INT = INTEGRAL WITH EQUIPMENT; M = MECHANICAL CONTRACTOR; O = OWNER. FURNISH AND INSTALL: XF= INDICATES FURNISHED BY X AND YI INDICATES INSTALLED BY Y. (EXAMPLE: MFEI = MECHANICAL CONTRACTOR TO FURNISH AND ELECTRICAL CONTRACTOR TO INSTALL). SINGLE RESPONSIBILITY INDICATES BOTH FURNISH AND INSTALL.
4. CONTROLS: A = AQUASTAT; ATCP = AUTOMATIC TEMPERATURE CONTROL PANEL; C/P = CORD AND PLUG; F = FLOAT SWITCH; FACP = FIRE ALARM CONTROL PANEL; H = HUMIDISTAT; MAN = MANUAL; MS = AUXILIARY CONTACT ON MOTOR STARTER; PBS = PUSHBUTTON STATION; PS = PRESSURE SWITCH; STP = MANUAL MOTOR STARTER WITH THERMAL PROTECTION AND PILOT LIGHT; SWL = SWITCH WITH LIGHTING; T = THERMOSTAT; H.O.A. = MAGNETIC STARTER WITH HANDS–OFF–AUTO; TS = TWO SPEED STARTER W/ HANDS–OFF–AUTO; VFD = VARIABLE FREQUENCY DRIVE WITH BYPASS AND HOA.
5. MINIMUM WIRE SIZE SHALL BE NO. 12 AWG AND MINIMUM RACEWAY SHALL BE 3/4". MINIMUM SHALL APPLY WHERE SUCH IS OMITTED ON SCHEDULE.
6. INCLUDE A SEPARATE, GREEN, GROUNDING CONDUCTOR IN ALL FEEDER AND BRANCH CIRCUIT CONDUIT.
7. EXISTING PANEL EQ–MDP IS AN EQUIPMENT BRANCH EMERGENCY POWER PANEL RATED AT 400A, 480/277VOLT, 3–PHASE, 4–WIRE PANELBOARD WITH A 400A MCB AND FED FROM ATS–3 IN ESS SWITCHGEAR. (SQUARE D HCP I–LINE). PROVIDE ONE 45 AMP, 3–POLE CIRCUIT BREAKER IN PANEL EQ–MDP MATCHING EXISTING TO FEED MOTOR CAC–1. PROVIDE ONE 15 AMP, 3–POLE CIRCUIT BREAKER INPANEL EQ–MDP MATCHING EXISTING TO FEED MOTOR ACCU–1.
8. FURNISH AND INSTALL SMOKE DETECTOR IN RETURN DUCT.

FEEDER SCHEDULE

PLAN MARK	NO. OF SETS	CONDUCTORS	CONDUIT SIZE	DESIGN AMPACITY	REMARKS
A	1	4–#2AWG+1–#8AWG GND	1 1/4"	100A	
B	1	4–#6AWG+1–#10AWG GND	1"	70A	
C	1	4–#8AWG+1–#12AWG GND	1"	50A	
D	1	4–#2/0AWG+1–#4AWG GND	2"	150A	
E	1	4–#4/0AWG+1–#2AWG GND	2 1/2"	225A	
F	1	4–#4AWG+1–#8AWG GND	1 1/4"	60A	

ONE LINE SYMBOL LEGEND

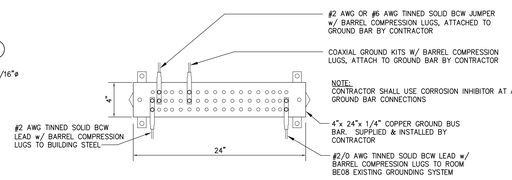
	CIRCUIT BREAKER: GFP = GROUND FAULT PROTECTION
Δ Y	UTILITY TRANSFORMER
——	SOLID LINE STYLE INDICATES NEW ELECTRICAL WORK
- - - -	DASHED LINE STYLE INDICATES EXISTING ELECTRICAL WORK
	DEMOLITION WORK
	DISCONNECT SWITCH
T45	STEP DOWN TRANSFORMER



LEGEND

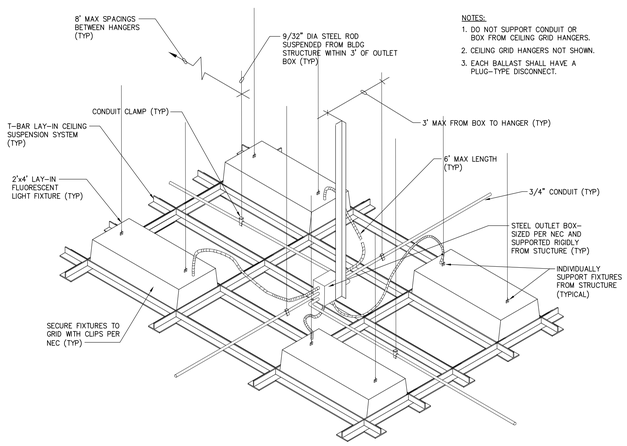
1– COPPER GROUND BAR, 1/4" X 4" X 24", HOLE CENTERS TO MATCH NEMA DOUBLE LUG CONFIGURATION.
2– INSULATORS
3– 5/8" LOCKWASHERS
4– WALL MOUNTING BRACKET
5– 5/8–11 X 1" H.H.C.S.BOLTS

6 GROUND BAR (GB)
SCALE: NONE



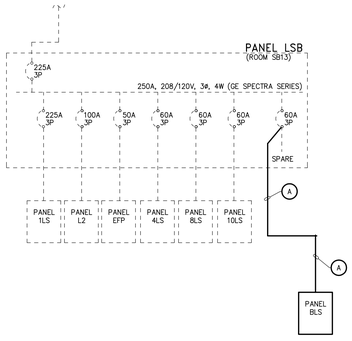
NOTES:
1. HARDWARE SHALL BE STAINLESS STEEL INCLUDING BELLVILLE WASHERS. COAT SURFACES WITH KOPR–SHIELD
2. BOND GROUND TO STEEL ONLY: INSERT TOOTHED WASHER BETWEEN LUG AND STEEL. COAT SURFACES WITH KOPR–SHIELD BEFORE MATING.
3. HOLES SHALL BE COUNTERSUNK 1/16".
4. GROUND LEADS AND CONNECTIONS SHALL HAVE SECURE ATTACHMENTS.

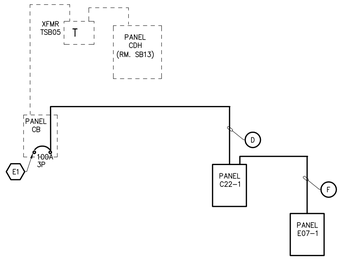
7 GROUND BAR (GB)
SCALE: NONE

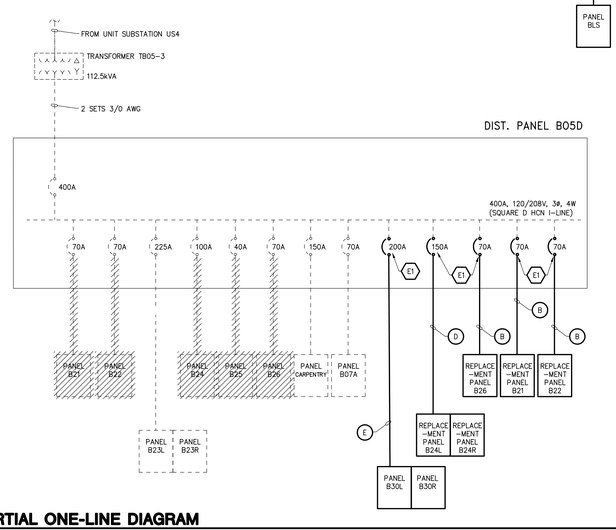


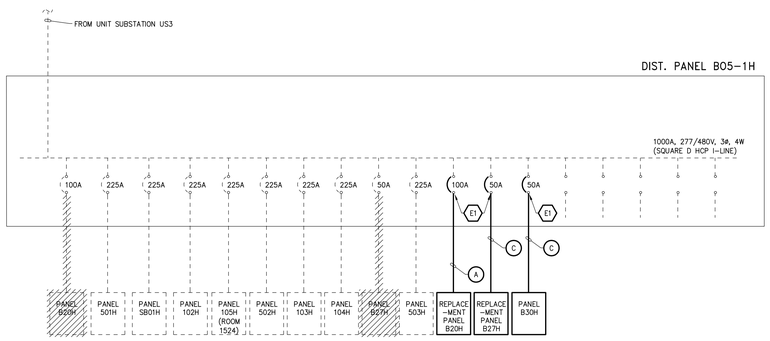
NOTES:
1. DO NOT SUPPORT CONDUIT OR BOX FROM CEILING GRID HANGERS.
2. CEILING GRID HANGERS NOT SHOWN.
3. EACH BALLAST SHALL HAVE A PLUG–TYPE DISCONNECT.

8 RECESSED 2X4 INSTALLATION DETAIL
NOT TO SCALE









PARTIAL ONE-LINE DIAGRAM
NOT TO SCALE

REFERENCED ELECTRICAL NOTES:

E1 PROVIDE A NEW 3–POLE CIRCUIT BREAKER TO SPACES INDICATED AND OF THE AMPERAGE SHOWN. CIRCUIT BREAKERS SHALL MATCH EXISTING.

1-B

Revisions	Date

SHIVEHATTERY
ARCHITECTURE + ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri

Drawing Title: ELECTRICAL SCHEDULES, DETAILS, & ONE–LINE

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12–17–2012
CONSTRUCTION DOCUMENTS

Project No. DVA#636–311
S–H#110240–0

Approved: Division Chief

Approved: Service Director

Building Number: 1
Checked: JJH
Drawn: DMM

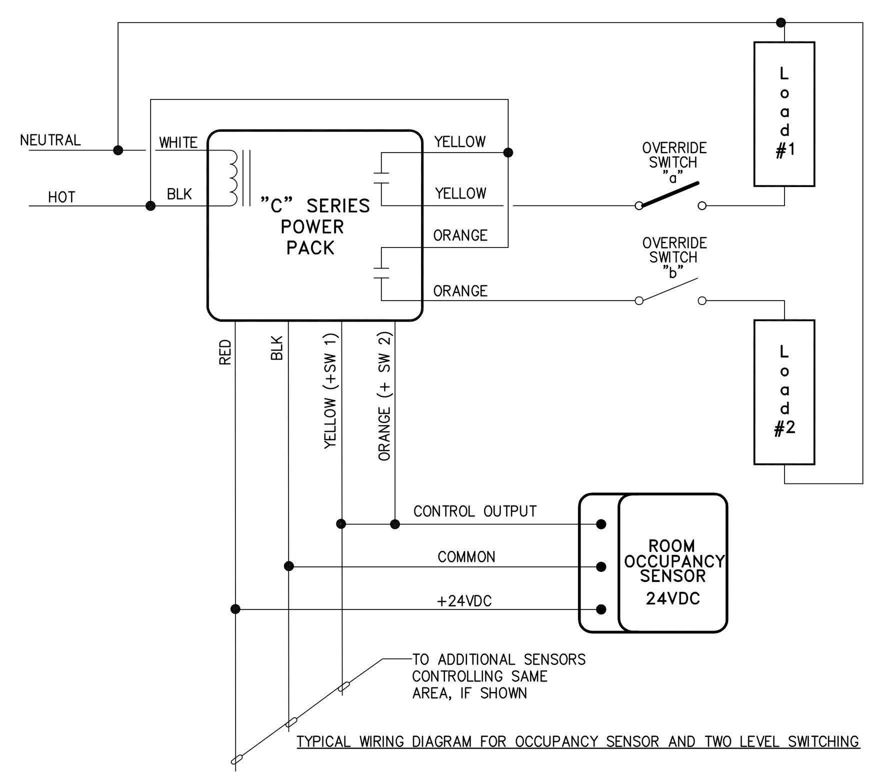
Location: IOWA CITY VA HEALTH CARE SYSTEM, IOWA CITY, IOWA

DRAWING NO. 1–B–E3
Dwg. 4 Of 7

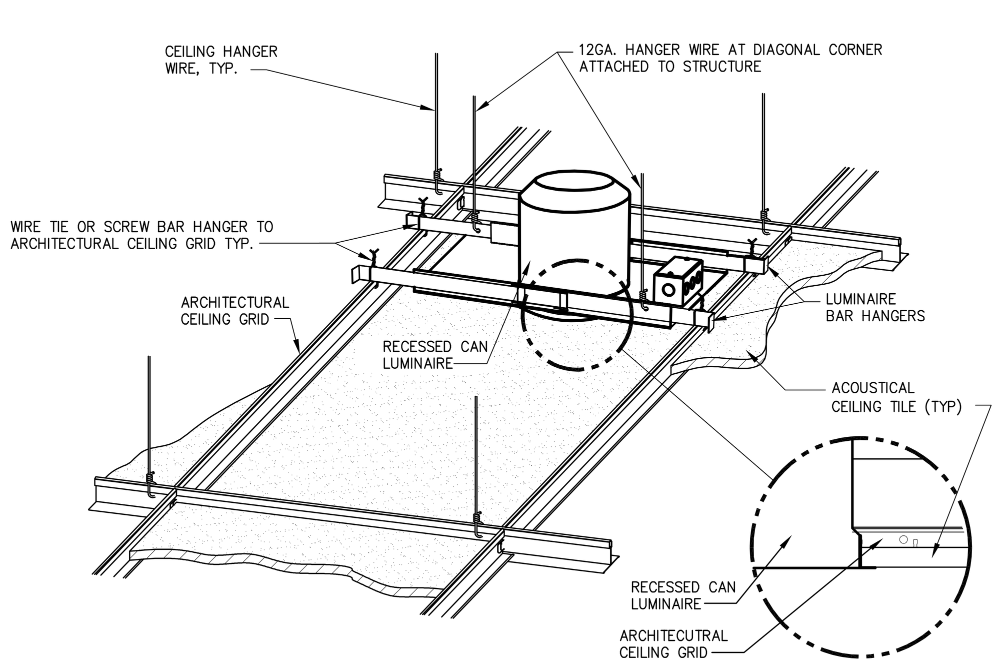
Veterans Administration

GENERAL ELECTRICAL NOTES:

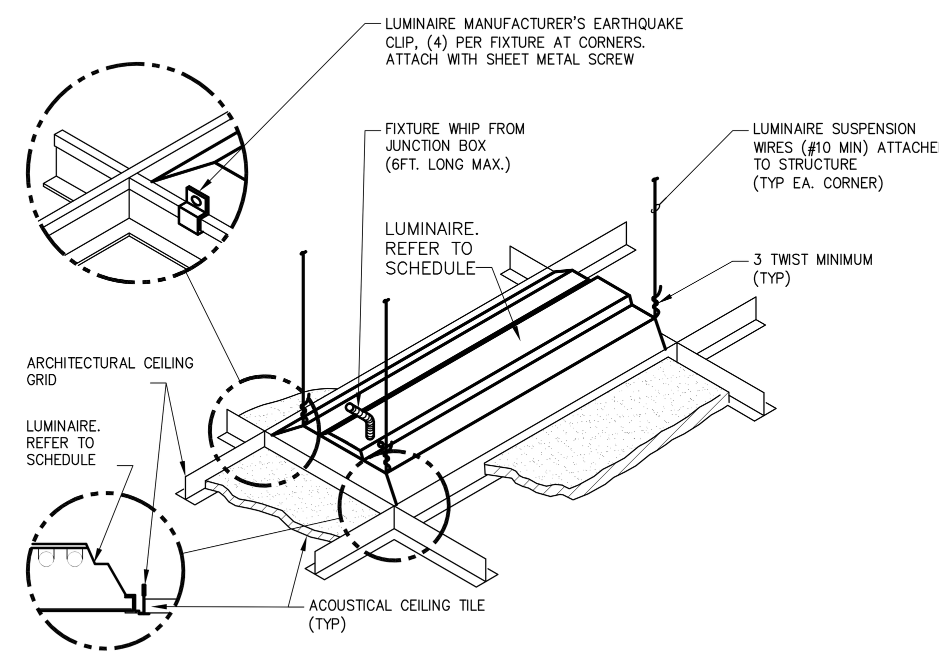
1. EMERGENCY LIGHTING AND EXIT LIGHTS ARE FED FROM LIFE SAFETY PANEL CIRCUITS, AND CAN BE 120V OR 277V. UNIVERSAL VOLTAGE IS REQUIRED FOR ALL NEW LIGHT FIXTURES AND EXIT LIGHTS. NORMAL LIGHTING FIXTURES ARE FED FROM 277V NORMAL POWER CIRCUITS. NEW CIRCUITS ARE SHOWN TO ALLOW PHASE WORK TO BE COMPLETED WITHOUT DISRUPTION TO AREAS NOT INCLUDED IN PROJECT OR CURRENT PHASE, HOWEVER IT IS PERMISSIBLE TO RE-USE EXISTING CIRCUITS IF NORMAL AND LIFE SAFETY ARE IN SEPARATE RACEWAYS AND DOING SO WILL NOT DISRUPT AN AREA NOT INCLUDED IN THE PRESENT PHASE OF CONSTRUCTION. PROVIDE ALL NECESSARY NEW CONDUITS. UNDER NO CIRCUMSTANCES WILL LIFE SAFETY AND NORMAL CIRCUITS BE ACCEPTABLE IN THE SAME RACEWAY REGARDLESS IF SO FOUND IN EXISTING CONDITIONS.
2. USING NEW OR EXISTING CIRCUITS WITHIN EACH WORK AREA OF THE PHASE BEING CONSTRUCTED, EXTEND NEW CONDUIT AND CONDUCTORS FROM EXISTING LIGHTING CIRCUITS CEILING J-BOX TO NEW LIGHT FIXTURES. PROVIDE ALL NECESSARY CONTROL CONDUCTORS. EXISTING CONDUIT MAY BE REUSED IN PLACE, BUT NOT RELOCATED AND RE-USED.
3. SERVICE INTERRUPTION TO EXISTING LIGHTING SHALL BE COORDINATED TO OCCUR ONLY BEFORE 6AM AND AFTER 5PM DAILY, OR DURING WEEKENDS, AND SHALL BE AS BRIEF AS POSSIBLE, ONLY AS NECESSARY FOR CUT-OVER TO NEW LIGHTING IN EACH PHASE OF CONSTRUCTION.
4. THESE DRAWINGS ARE DIAGRAMMATIC – FOLLOW AS CLOSELY AS POSSIBLE. CONTRACTOR SHALL PROVIDE ALL BRANCH CIRCUITS, CONTROLS, JUNCTION BOXES, PULL BOXES, OFF-SETS, ETC FOR A COMPLETE AND ELECTRICAL CODE COMPLIANT INSTALLATION.
5. ALL FINAL LOCATIONS AND ARRANGEMENTS OF LIGHTING FIXTURES SHALL BE COORDINATED WITH THE ARCHITECTURAL REFLECTED CEILING PLAN.
6. PROVIDE A GREEN INSULATED GROUNDING CONDUCTOR FOR ALL EQUIPMENT, LIGHT FIXTURES AND RECEPTACLES, #12 AWG UNLESS NOTED OTHERWISE.
7. LIGHTING FIXTURES INDICATED AS DOUBLE SWITCHED SHALL HAVE OUTER LAMPS CONTROLLED WITH ONE SWITCH AND INNER LAMP(S) CONTROLLED BY A SECOND SWITCH.
8. NEW CIRCUITS SHOWN ARE INDICATED AS "SPARE" ON DIRECTORIES. IF THE DESIGNATED CIRCUIT HAS BEEN USED, ANOTHER SPARE APPEARS AVAILABLE. IF NEW CIRCUIT BREAKER IS REQUIRED IT WILL BE INDICATED ON THE DRAWINGS. UPDATE PANEL DIRECTORY.
9. EACH BRANCH CIRCUIT HOMERUN SHALL HAVE NO MORE THAN THREE CIRCUITS. EACH BRANCH CIRCUIT HOMERUN SHALL HAVE A SEPARATE GREEN INSULATED EQUIPMENT GROUNDING CONDUCTOR. EACH BRANCH CIRCUIT SHALL HAVE A SEPARATE DEDICATED NEUTRAL CONDUCTOR.
10. SURFACE MOUNTED LIGHT FIXTURES SPECIFIED TO BE ATTACHED TO T-BAR CEILING SHALL BE SECURED USING CADDY CLIP "IDS" SERIES, OR EQUAL, PROVIDING SUPPORT CABLE TO STRUCTURE. SUPPORTING FIXTURE BY CONDUIT OR ONLY BY SUSPENDED CEILING GRID WILL NOT BE ACCEPTED. USE OFFSET POWER FEED INTO FIXTURE TO ALLOW FIXTURE TO ATTACH LEVEL.
11. ALL CONDUCTORS SHALL BE INSTALLED IN AN APPROVED RACEWAY, EXCEPT COMMUNICATIONS/DATA CABLES, NURSE CALL CABLES, AND ACCESS CONTROL WHICH ARE PERMITTED IN EXISTING OR NEW CABLE TRAY.
12. PENETRATIONS OF FIRE RATED WALLS, FLOORS, AND CEILINGS SHALL BE RESTORED TO THE REQUIRED RATING USING U.L. APPROVED METHODS. THIS WORK SHALL BE COMPLETED AT THE TIME THE WORK THROUGH THE PENETRATION IS MADE, WITHOUT DELAY.
13. WORKING SPACE AND CLEARANCES ABOVE CEILINGS ARE LIMITED DUE TO HOT/COLD WATER PIPING, FIRE SPRINKLERS, CABLE TRAY, HVAC DUCTS, PIPE RACKS AND ROD SUPPORTS AND OTHER OBSTRUCTIONS. MOST BUT NOT ALL EXISTING CONDITIONS ARE SHOWN ON THE DEMOLITION DRAWINGS. CONDUIT INSTALLATION MAY OFTEN BE DIFFICULT AND MAY REQUIRE ADDITIONAL ROUTING AROUND OBSTRUCTIONS. COORDINATE ALL LIGHT FIXTURE LOCATIONS WITH THE CEILING INSTALLER OR WITH EXISTING GRID TO ENSURE THAT SPACE IS ADEQUATE FOR THE INSTALLATION. RELOCATE ANY LOW VOLTAGE CABLES, CONDUIT SUPPORTS AND BRANCH CIRCUIT CONDUITS AS NECESSARY AT NO ADDED COST. ALTHOUGH MANY CONDITIONS ARE SHOWN ON THE DRAWINGS IT IS NOT INTENDED TO BE COMPLETE. VERIFY SITE CONDITIONS AND INCLUDE ALL COSTS IN BID.
14. EXISTING LINE VOLTAGE OUTLET BOXES DISCOVERED WITHOUT COVERS SHALL BE PROVIDED WITH A COVER AND NO ADDED COST TO THE CONTRACT. CONDUITS FOUND WITHOUT CODE REQUIRED SUPPORTS SHALL BE PROVIDED WITH SUPPORT AT NO ADDED COST. KNOWN EXISTING CONDITIONS ARE DOCUMENTED HOWEVER ADDITIONAL WORK MAY BE REQUIRED.
15. INSTALL LIGHT FIXTURES AS RECOMMENDED BY THE MANUFACTURER FOR BEST POSSIBLE PERFORMANCE. CLOSE ALL LENSES TIGHT TO FIXTURE BODY, WITHOUT ALLOWING "LIGHT LEAKS". MAKE SURE GASKETED FIXTURES ARE PROPERLY CLOSED WITH TIGHT SEAL. CLEAN ALL SPECULAR REFLECTORS ACCORDING TO MANUFACTURER'S INSTRUCTIONS TO REMOVE ALL FINGERPRINTS, MARKS AND DUST.
16. ALL JUNCTION BOX COVERS SHALL BE LABELED WITH APPROPRIATE PANEL, CIRCUIT NUMBERS, AND TYPE OF SYSTEM. ALL ELECTRICAL DEVICES SUCH AS RECEPTACLES, SWITCHES, DISCONNECTS, ETC., SHALL BE LABELED WITH APPROPRIATE PANEL AND CIRCUIT NUMBER.
17. ANY IMPACTED EXISTING PANELBOARDS SHALL BE FURNISHED AND INSTALLED WITH A NEW UPDATED TYPEWRITTEN PANEL CIRCUIT DIRECTORY.



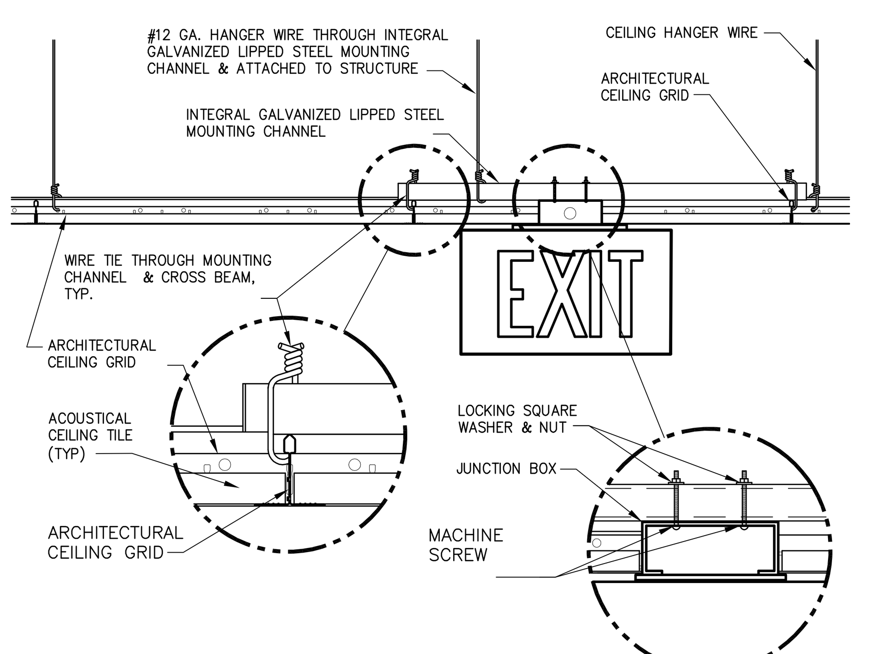
3 OCCUPANCY SENSOR INSTALLATION DIAGRAMS
NOT TO SCALE



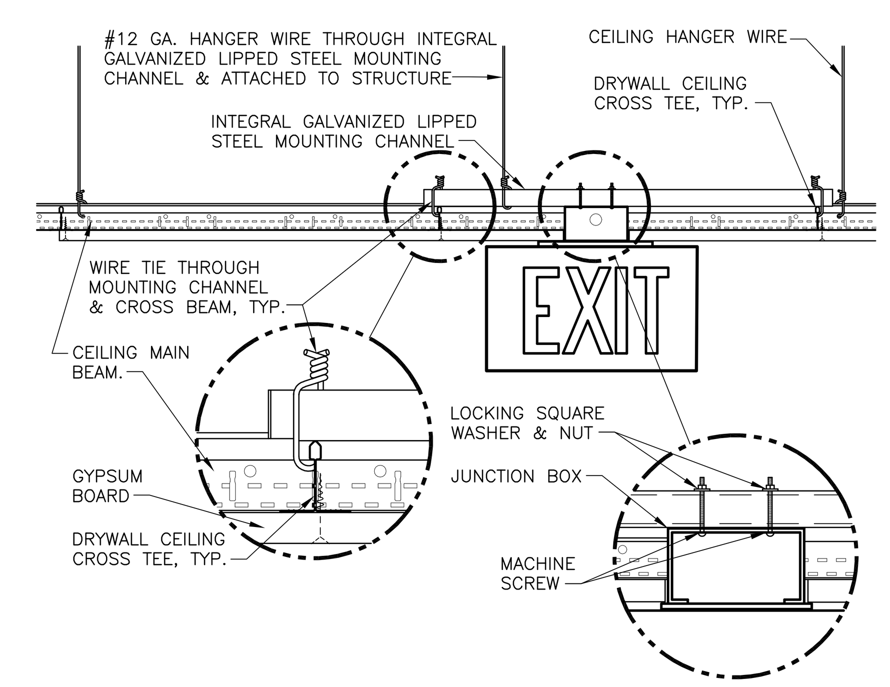
5 DOWNLIGHT MOUNTING IN ACT CEILING
NOT TO SCALE



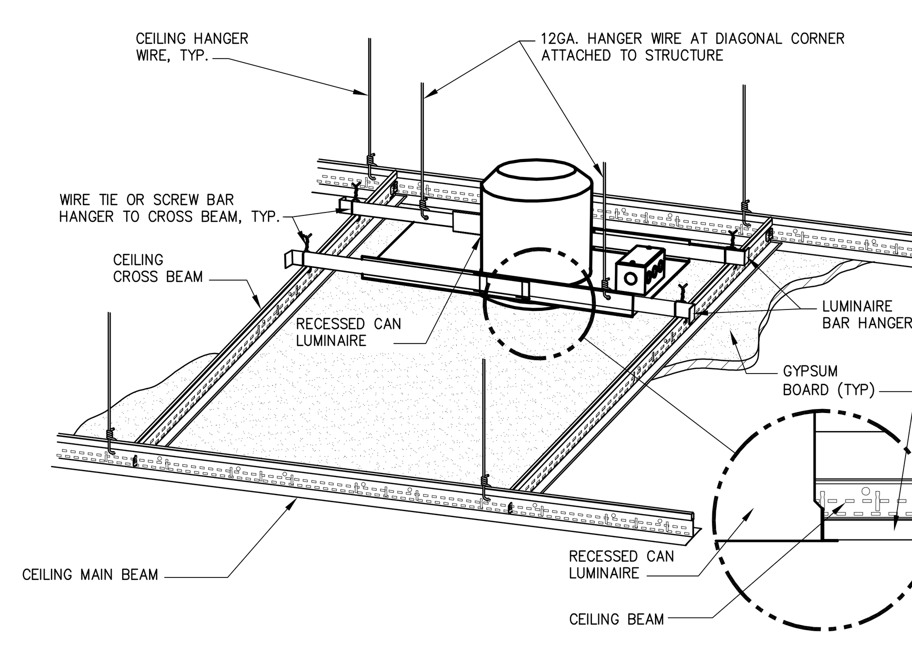
1 LAY IN TYPE LIGHT FIXTURE DETAIL
NOT TO SCALE



2 EXIT LIGHT MOUNTING IN ACT CEILING
NOT TO SCALE



4 EXIT LIGHT MOUNTING IN HARD CEILING
NOT TO SCALE



6 DOWNLIGHT MOUNTING IN HARD CEILING
NOT TO SCALE

LIGHTING FIXTURE SCHEDULE

PLAN MARK	MANUFACTURER AND MODEL NUMBER	LAMPS #/FXT	LAMPS WATTAGE	LAMPS TYPE	INPUT WATTS	BALLAST	VOLTS	MOUNTING	MOUNTING HEIGHT	DESCRIPTION
F1 (2) (3)	MARK ARCHITECTURAL LIGHTING # POR 24 DF/GP* 2 T5 EBPR 120/277 (UNV) PERF AND -SWS ACRYLIC LENS LIGHTOLIER#CDS2GPF228UNV-PG-GE-GLR OR APPROVED EQUAL	2	28	F28,T5 SPX 4100K	48	(1)	120/ 277	RE	N/A	2X4 SHALLOW SEMI-RECESSED, 2-3/16" MAX RECESSED DEPTH, WITH PROGRAMMED START NORMAL POWER FACTOR BALLAST, UNIVERSAL VOLTAGE REQUIRED, DROPPED BASKET (2.75" MAXIMUM BELOW CEILING) PERFORATED DIFFUSER WITH SOLID ENDCAPS AND ACRYLIC OVERLAY. BASKET IS HINGED FROM EITHER SIDE TO ALLOW LAMP REPLACEMENT. INSTALLATION OF THE FIXTURE MAY REQUIRE TEMPORARY DISCONNECTION OF OBSTACLES TO SHIFT INTO PLACE
F2 (3)	MARK ARCHITECTURAL LIGHTING # MD 24 DF/GP* 3 T8 EBPR 120/277 (UNV) PERF AND -SWS ACRYLIC LENS LIGHTOLIER #CFS2 GPF 232 UNV H1 (GE) OR APPROVED EQUAL	3	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 3" MAX RECESSED DEPTH, WITH PROGRAMMED START NORMAL POWER FACTOR BALLAST, UNIVERSAL VOLTAGE, DROPPED BASKET (2.75" MAXIMUM BELOW CEILING) PERFORATED DIFFUSER BASKET WITH ACRYLIC OVERLAY. BASKET IS HINGED FROM EITHER SIDE TO ALLOW LAMP REPLACEMENT.
F3	LITHONIA #2SP 232 A12125 EB UNV EQUIVALENT BY DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	2	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 MID-DEPTH TROFFER WITH 2 LAMPS. PRISMATIC ACRYLIC LENS, SPRING LOADED LATCHES ON FLAT STEEL DOOR FRAME.
F4	LITHONIA #2SP 332 A12125 EB UNV EQUIVALENT BY DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	3	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 MID-DEPTH TROFFER WITH 3 LAMPS. PRISMATIC ACRYLIC LENS, SPRING LOADED LATCHES ON FLAT STEEL DOOR FRAME.
F5	LITHONIA #2SP 432 A12125 EB UNV EQUIVALENT BY DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	4	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 MID-DEPTH TROFFER WITH 4 LAMPS. PRISMATIC ACRYLIC LENS, SPRING LOADED LATCHES ON FLAT STEEL DOOR FRAME.
F6	LITHONIA #2SP 432 A12125 EB UNV 2/2 EQUIVALENT BY DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	4	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 MID-DEPTH TROFFER WITH 4 LAMPS. PRISMATIC ACRYLIC LENS, SPRING LOADED LATCHES ON FLAT STEEL DOOR FRAME, DOUBLE SWITCHED.
F7	LITHONIA #EJA 232 WGEJ EB UNV HC36 EQUIVALENT BY DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	2	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	SP	8'-0" AFF	INDUSTRIAL STRIP LIGHT FIXTURE WITH 2 LAMPS. WIREGUARD, CHAIN.
F8	LITHONIA #N2S 32 EB UNV SWRC EQUIVALENT BY DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	1	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	O	N/A	4' TASK LIGHT FIXTURE WITH 1 LAMP AND ROCKER SWITCH ON RIGHT END.
F9	DAYBRITE #2DLG-44L-840-2-D-UNV EQUIVALENT BY LITHONIA, COLUMBIA, COOPER OR APPROVED EQUAL			LED SYSTEM INCLUDED 4000k	–	(1)	120/ 277	RE	N/A	2X2 MID-DEPTH TROFFER WITH LED SOURCE. OPAL DIFFUSER, SPRING LOADED LATCHES ON FLAT STEEL DOOR FRAME. 4400 DELIVERED LUMENS AT 4000K WITH 80 CRI. LED TECHNOLOGY WITH MODULAR COMPONENTS TO ALLOW FUTURE REPLACEMENT
F10	KIRLIN #FRR 07015 45 UNV EQUIVALENT BY DAYBRITE, LITHONIA, COOPER OR APPROVED EQUAL	2	32	PL-L 4100K PHILLIPS	–	(1)	120/ 277	RE	N/A	7" ROUND BY 10" DEEP MAXIMUM COMPACT FLUORESCENT OPEN DOWNLIGHT WITH SELF FLANGED SPECULAR DIFFUSE REFLECTOR CONE AND OPTICS. TWO 32 WATT TRIPLE TUBE LAMPS
F11	FOCAL POINT #FL4D 20LED L40 RO T BH L4 RO DN CD EQUIVALENT BY DAYBRITE, LITHONIA, COOPER OR LIGHTOLIER			LED SYSTEM INCLUDED 4000k	–	(1)	277	RE	N/A	4.5" ROUND BY 5" DEEP MAXIMUM LED DOWNLIGHT WITH SELF FLANGED CLEAR DIFFUSE REFLECTOR CONE AND OPTICS TO PRODUCE MEDIUM DISTRIBUTION. 2000 DELIVERED LUMENS AT 4000K WITH 80 CRI. REMOTE PHOSPHOR TECHNOLOGY WITH MODULAR COMPONENTS TO ALLOW FUTURE REPLACEMENT
F12	OCL #FB1-P1AV-24-BC/GW-BAL -4TT32-30-DMA OR APPROVED EQUAL	4	32	PL-L 4100K PHILLIPS	–	(1)	120/ 277	SP	N/A	SUSPENDED FABRIC ROUND, 24" DIAMETER,
F13	KENALL #MLRS12 48 R MW CIA 332 SB 1 UNV PH EQUIVALENT BY LITHONIA, DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	3	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	SP	N/A	1X4 MID-DEPTH SURFACE MOUNTED LIGHT FIXTURE WITH 3 LAMPS. CONCAVE HIGH IMPACT ACRYLIC LENS, SPRING LOADED LATCHES ON DOOR FRAME.
F14 (3)	TIVOLI #CLL-SF-6.0-WH-12 LENGTHS AS REQUIRED/#CLL-LENS-C /#CLL-CHAN AND REMOTE AD-UL--XX-1-X-12D DRIVERS, QUANTITY AS REQUIRED. OR APPROVED EQUAL			LED SYSTEM INCLUDED 4000k	–	–	120/ 277	IN LIGHT COVE	N/A	LED STRIP LIGHTING INSTALLED COMPLETE WITH MOUNTING CLIPS @ 6"OC & CORNER CONNECTORS FOR 90 DEGREE BENDS, MOUNTED IN LIGHTING COVE PER PLANS. USE END CAPS AT THE END OF EACH RUN. REFER TO ARCHITECTURAL SOFFIT DETAILS
F15 (3)	MARK ARCHITECTURAL LIGHTING # MD 24 DF/GP* 3 T8 EBPR 120/277 (UNV) PERF &-SWS ACRYLIC LENS/DOUBLE SW LIGHTOLIER #CFS2 GPF 232 UNV H1 (GE) OR APPROVED EQUAL	3	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 3" MAX RECESSED DEPTH, WITH PROGRAMMED START NORMAL POWER FACTOR BALLAST, UNIVERSAL VOLTAGE, DROPPED BASKET (2.75" MAXIMUM BELOW CEILING) PERFORATED DIFFUSER BASKET WITH ACRYLIC OVERLAY. BASKET IS HINGED FROM EITHER SIDE TO ALLOW LAMP REPLACEMENT. DOUBLE SWITCHED – PROVIDE TWO BALLAST.
F16	LITECONTROL #WID 46 34T8 SGL CWM ILO/FP UNV EQUIVALENT BY LITHONIA, DAYBRITE, COLUMBIA, COOPER OR APPROVED EQUAL	3	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	WL	N/A	6"X48"X4"DEPTH SURFACE MOUNTED LIGHT FIXTURE WITH 3 LAMPS. WALL MOUNTED WITH ACRYLIC LENS.
F17	PHOENIX #DLA-16LED-LH-CP/ DL-60-ARM OR APPROVED EQUAL			LED SYSTEM INCLUDED	–	(1)	120	WL	N/A	LED DOCK LIGHT HEAD WITH 60" HINGED STRUT ARM
F18	HUBBELL #VLED15/VW1/VL15LG/VCG-15 W/ CREE XPG LEDS EQUIVALENT BY COOPER, LITHONIA, STONCO OR APPROVED EQUAL			LED SYSTEM INCLUDED 5000K	–	(1)	120	WL	N/A	PIT LIGHT FIXTURE WITH LED LIGHT SOURCE, GLASS GLOBE AND GUARD.
F19	GUTH #BA 24 4 F32 7 AP3 UNV OR APPROVED EQUAL	4	32	F32,T8 SPX 4100K,	–	(1)	120/ 277	RE	N/A	2X4 MID-DEPTH SEALED TROFFER WITH 4 LAMPS. PRISMATIC ACRYLIC LENS, OVERLAP ALUMINUM DOOR FRAME WITH CAPTIVE STAINLESS STEEL SCREWS.
H5	GARDCO #102L-2-55LA-CW-UNIV-BRP -PCB 277VOLT EQUIVALENT BY DAYBRITE, LITHONIA, COOPER			LED	–	(1)	120/ 277	WL	9'-0"	LED ROUNDED WEDGE HIGH PERFORMANCE WALL SCONCE EXTERIOR FIXTURE
XE1	LITHONIA #LE S 1 R 120/277 EQUIVALENT BY COOPER, McPHILBEN, DUAL-LITE OR APPROVED EQUAL			LED	–	–	120/ 277	O	N/A	LOW PROFILE DIE CAST ALUMINUM LED SINGLE FACE EXIT LIGHT, WHITE FINISH ON HOUSING AND RED LETTERS, UNIVERSAL MOUNT
XE2	LITHONIA #LE S 2 R 120/277 EQUIVALENT BY COOPER, McPHILBEN, DUAL-LITE OR APPROVED EQUAL			LED	–	–	120/ 277	O	N/A	LOW PROFILE DIE CAST ALUMINUM LED DOUBLE FACE EXIT LIGHT, WHITE FINISH ON HOUSING AND RED LETTERS, UNIVERSAL MOUNT

LIGHTING FIXTURE SCHEDULE ABREVIATIONS:

MOUNTING AND FINISH:
- RE RECESSED
- SP SUSPENDED
- CL CEILING SURFACE
- WL WALL
- PL POLE
- O OTHER (SEE DESCRIPTION)

BALLAST:
- EPS ELECTRONIC PROGRAMMED START
- EIS ELECTRONIC INSTANT START
- HO HIGH OUTPUT
- DIM DIMMING BALLAST
- ML MULTI-LEVEL SWITCHING
- HPF HIGH POWER FACTOR
- O OTHER (SEE DESCRIPTION)

LIGHTING FIXTURE GENERAL NOTES:

LAMP AND BALLAST INPUT WATTAGES SHOWN MAY BE REQUIRED FOR IECC COMPLIANCE. ANY SUBSTITUTIONS REQUIRE EQUAL OR LOWER WATTAGE RATINGS WITHOUT REDUCED LUMEN OUTPUT. PROVIDE LAMPS WITH THE SPECIFIED COLOR TEMPERATURE OF 4100K. SUBMIT SHOP DRAWINGS INCLUDING ALL DATA FOR REVIEW.

CATALOG NUMBER SHALL NOT BE CONSIDERED COMPLETE AND MATERIAL SHALL NOT BE ORDERED BY MANUFACTURER AND CATALOG NUMBER ONLY. THE COMPLETE DESCRIPTION AND THE SPECIFICATION SHALL BE COORDINATED WITH THE CATALOG NUMBER TO DETERMINE THE EXACT MATERIAL AND ACCESSORIES TO BE ORDERED. THE FIRST MANUFACTURER LISTED IS THE BASIS FOR DESIGN.

ALL LAMPS FOR THIS PROJECT SHALL BE FURNISHED AND INSTALLED BY THE ELECTRICAL CONTRACTOR UNLESS OTHERWISE NOTED. ALL LINEAR FLUORESCENT LIGHT FIXTURES SHALL BE PROVIDED WITH INTEGRAL BALLAST DISCONNECT(S) FACTORY INSTALLED.

REFER TO SPECIFICATION FOR LAMP AND BALLAST REQUIREMENTS, SHOP DRAWING SUBMITTAL REQUIREMENTS AND ADDITIONAL INFORMATION.

ALL FLUORESCENT LUMINAIRES WITH DOUBLE ENDED LAMPS AND CONTAINING BALLASTS THAT CAN BE SERVICED IN PLACE SHALL HAVE AN INTEGRAL DISCONNECTING MEANS IN COMPLIANCE WITH NEC 410.73 (G).

LIGHTING FIXTURE SCHEDULE KEYNOTES:

1. ELECTRONIC PROGRAMMED START BALLAST WITH .98 MINIMUM BALLAST FACTOR, 10% OR LESS THD. FOR T5 LAMPS, USE GE T5 HIGH EFFICIENCY PROGRAMMED START.
2. CEILING CONDITIONS MAY NOT PERMIT USE OF ALTERNATE FIXTURES WITHOUT RELOCATION OF CONDUITS, DUCTS, SPRINKLER OR STEAM PIPES THAT PRESENTLY LAY ACROSS GRID. CONTRACTOR IS RESPONSIBLE FOR ALL ADDITIONAL WORK IF ALTERNATE FIXTURE IS PROPOSED.
3. PROPOSED ALTERNATE FIXTURE MUST BE SUBMITTED WITH AN OPERATING SAMPLE LIGHT FIXTURE HAVING ALL OPTIONS AS SPECIFIED, NO LATER THAN 15 BUSINESS DAYS PRIOR TO BID DATE.

ELECTRICAL SYMBOLS LEGEND

LIGHTING & CONTROL SYMBOLS

ab LA1	NEW RECESSED OR SEMI-RECESSED OR SURFACE MOUNT FLUORESCENT LIGHT FIXTURES, TYPE AS INDICATED ON LIGHTING FIXTURE SCHEDULE INDICATES FIXTURE TYPE. REFER TO SCHEDULE. TYPICAL INDICATES CONTROL SWITCHLEGS, TYPICAL
	INDICATES FIXTURE CIRCUITED TO LIFE SAFETY BRANCH EMERGENCY POWER CIRCUIT. INDICATES FIXTURE CIRCUITED TO CRITICAL BRANCH EMERGENCY POWER CIRCUIT.
	FLUORESCENT STRIP OR INDUSTRIAL FIXTURE TYPE AS NOTED
	RECESSED ADJUSTABLE OR DOWNLIGHT LIGHTING FIXTURE; TYPE AS NOTED
	LIGHTING FIXTURE MOUNTED ON WALL; TYPE AS NOTED
$ab	WALL MOUNT LIGHT SWITCH, NEW OR EXISTING AS SHOWN. SUBSCRIPT LETTERS INDICATE SWITCHLEGS CONTROLLED 3 = THREE-WAY 4 = FOUR-WAY D = DIMMER (1500W) K/S = KEYED SWITCH
	PASSIVE INFRARED WALL/CEILING OCCUPANCY SENSOR (WATTSTOPPER CX-100, COVERAGE 2000 SF)
	DUAL TECHNOLOGY (PIR AND ULTRASOUND) WALL/CEILING OCCUPANCY SENSOR (WATTSTOPPER DT-200, COVERAGE 2000 SF)
DT	DUAL TECHNOLOGY (PIR AND ULTRASOUND) CEILING OCCUPANCY SENSOR – 360° (WATTSTOPPER DT-300, COVERAGE 1000 SF)
EMS	PASSIVE INFRARED HVAC/BAS CEILING OCCUPANCY SENSOR – 360° (WATTSTOPPER C-24, COVERAGE 1000 SF) NOT CONNECTED TO LIGHTING CONTROL. USE FOR HVAC CONTROLS ONLY
PI	DUAL TECHNOLOGY (PIR AND ULTRASOUND) CEILING OCCUPANCY SENSOR – 360° (WATTSTOPPER DT-300, COVERAGE 1000 SF) WIRE TO ALLOW MULTILEVEL SWITCHING AND PREVENT FIXTURE NEAREST WINDOW FROM OPERATING ONCE DAYLIGHTING SETPOINT IS ACHIEVED. REQUIRES ADDED COMMISSIONING
6	LINE VOLTAGE ULTRASONIC CEILING OCCUPANCY SENSOR – ONE SIDE (WATTSTOPPER UT-355-1, COVERAGE 500 SF)
PW	PASSIVE INFRARED (PIR) WALL SWITCH OCCUPANCY SENSOR WITH MANUAL CONTROL (WATTSTOPPER WI-200)
a,b PW	PASSIVE INFRARED (PIR) DUAL LEVEL (SWITCHLEGS CONTROLLED INDICATED BY SUBSCRIPT) RELAYS WALL SWITCH OCCUPANCY SENSOR WITH MANUAL CONTROL (WATTSTOPPER PW-200)
PP	POWER PACK FOR OCCUPANCY SENSOR, 120V INPUT VOLTAGE, 24DC OUTPUT. CONTACT RATED 20 AMP BALLAST LOAD, UL LISTED. MOUNT ABOVE ACCESSIBLE CEILING ADJACENT TO OCCUPANCY SENSOR.
	EXISTING LIGHT FIXTURES AS DESCRIBED BELOW AND BY PLAN MARK. TO REMAIN, BE SERVICED OR RETROFIT AS NOTED ON PLANS
	EXISTING SURFACE MOUNT 2X4 LIGHT FIXTURE TO BE REMOVED EXISTING RECESSED MOUNT 2X4 LIGHT FIXTURE TO BE REMOVED
	EXISTING CHAIN OR PENDANT INDUSTRIAL STRIP LIGHT FIXTURE TO BE REMOVED
	EXISTING SURFACE MOUNT 4X4 LIGHT FIXTURE TO BE REMOVED
	EXISTING SURFACE MOUNT 2X2 LIGHT FIXTURE TO BE REMOVED EXISTING RECESSED MOUNT 2X2 LIGHT FIXTURE TO BE REMOVED
	EXISTING SURFACE MOUNT 1X4 LIGHT FIXTURE TO BE REMOVED EXISTING RECESSED MOUNT 1X4 LIGHT FIXTURE TO BE REMOVED
	EXISTING RECESSED MOUNT CAN LIGHT FIXTURE TO BE REMOVED
	EXISTING WALL MOUNT LIGHTING FIXTURE TO BE REMOVED
	EXISTING TRACK AND LIGHT FIXTURES, AS NOTED
PLAN MARK:	EXISTING FIXTURE DESCRIPTIONS:
LT/4 (4)	LENSED RECESSED TROFFER, 4 LAMP. "#" INDICATES # LAMPS. TYPICAL OR NOTED OTHERWISE. (#) IDENTIFIES QTY IN SPACE
PT/4	PARABOLIC LENSED RECESSED TROFFER, 4 LAMP.
SW/4	SURFACE MOUNT WRAPAROUND LENS FLUORESCENT.
PW/4	PENDANT MOUNT WRAPAROUND LENS FLUORESCENT.
SWW/2	SURFACE WALL MOUNT WRAPAROUND LENS FLUOR.
SMWC/8	SURFACE MOUNT FLUORESCENT WITH WOOD CLAD BODY
IRS	INDUSTRIAL REFLECTOR FLUORESCENT STRIP
SS	STANDARD FLUORESCENT STRIP
RCF	RECESSED CAN FLUORESCENT OPEN
RCFL	RECESSED CAN FLUORESCENT LENSED (SQUARE)
RCI	RECESSED CAN INCANDESCENT OPEN
RCIL	RECESSED CAN INCANDESCENT LENSED (SQUARE)
INS	INCANDESCENT SURFACE MOUNTED
EXTS/1	EXTERIOR SURFACE MOUNTED
EXTR/1	EXTERIOR RECESSED MOUNTED
(E)	EXISTING, TO REMAIN, OR AS NOTED
PROVIDE	FURNISH, INSTALLED AND CONNECTED, COMPLETE
C.O.	CONDUIT ONLY WITH PULL ROPE INSTALLED

POWER

	MOTOR CONNECTION
	MOTOR WITH COMBINATION MAGNETIC MOTOR STARTER AND DISCONNECT
	SAFETY DISCONNECT SWITCH
	PANELBOARD, SURFACE MOUNTED
	PANELBOARD, FLUSH MOUNTED
E	EQUIPMENT/MOTOR CONNECTION

FIRE ALARM

F	FIRE ALARM MANUAL STATION +48" UNO
	FIRE ALARM AUDIO AND VISUAL COMBINATION STATION +80" UNO
F	FIRE ALARM AUDIO AND VISUAL COMBINATION STATION +80" W/MANUAL PULL STATION BELOW AT 48", UNO
L	FIRE ALARM STROBE LIGHT +80" UNO
H	FIRE ALARM HEAT DETECTOR 190 DEGREES UNO
P	FIRE ALARM PHOTOELECTRIC DETECTOR SUBSCRIPT A = AUXILIARY CONTACTS
P D	FIRE ALARM DUCT TYPE PHOTOELECTRIC DETECTOR
DR	MAGNETIC DAMPER RELEASE CONNECTION
DH	DOOR HOLDER FIRE ALARM CONNECTION

RECEPTACLES & DEVICES

	DUPLEX RECEPTACLE WITH GROUND 3 WIRE, 120V, +18" UNO GFI = GROUND FAULT CURRENT INTERRUPTER WP = WEATHER PROOF DD = DOUBLE DUPLEX
	DUPLEX RECEPTACLE WITH GROUND 3 WIRE, 120V, MTD ABV COUNTER
	DUPLEX RECEPTACLE WITH GROUND 3 WIRE, 120V, FLUSH MOUNTED IN CEILING
	DUPLEX RECEPTACLE WITH GROUND 3 WIRE, 120V (UNO), FLUSH MOUNTED IN CEILING
	POWER/COMMUNICATIONS SURFACE RACEWAY (WIREMOLD 4000)
EWC	GFI RECEPTACLE CONCEALED BEHIND OR BELOW ELECTRIC WATER COOLER – VERIFY EXACT REQUIREMENTS WITH MECHANICAL CONTRACTOR
	SPECIAL RECEPTACLE, WALL MOUNTED TYPE AS NOTED
	DUPLEX RECEPTACLE WITH GROUND 3 WIRE, 120V OR VOLTAGE AS NOTED, +18" UNO (CIRCUITED TO EMERGENCY POWER – CRITICAL BRANCH POWER) GFI = GROUND FAULT CURRENT INTERRUPTER DD = DOUBLE DUPLEX
	RETRACTABLE CORD REEL WITH ONE DUPLEX RECEPTACLE WITH GROUND 3 WIRE, 120V. (HUBBELL, HANNEY, OR APPROVED EQUIVALENT)
	COMBINATION TELEPHONE/DATA AND POWER OUTLET FLOOR BOX ASSEMBLY, FLUSH MTD IN FLOOR.
W	TELEPHONE OUTLET. WALL MOUNTED AT 48"
	COMBINATION TELEPHONE OUTLET AND DATA OUTLET IN A COMMON DOUBLE GANG BOX, AT 16" A.F.F.
	COMBINATION TELEPHONE OUTLET AND DATA OUTLET IN A COMMON DBL GANG BOX, MTD ABV COUNTER
	DATA CONNECTION, FLUSH MOUNTED IN CEILING.
CR	SECURITY CARD READER ACCESS STATION, +48" UNO
ES	ELECTRIC DOOR STRIKE
TV	TELEVISION OUTLET, +18" UNO
J	JUNCTION BOX, WALL MOUNTED
J	JUNCTION BOX
	PUSHPLATE CONTROL SWITCH
S	PAGING SYSTEM SPEAKER (MATCH EXISTING TYPE)

ELECTRICAL SYMBOLS NOTES

1. THIS IS A STANDARD SYMBOL LIST, NOT ALL SYMBOLS MAY BE USED ON PLANS.
2. CONDUIT AND CONDUCTORS ARE SHOWN TO INDICATE CIRCUITING AND SWITCHING. THE EXACT ROUTING OF CONDUIT AND THE EXACT QUANTITIES OF CONDUCTORS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.
3. WHERE USED, LOWER CASE LETTERS AT LIGHT FIXTURE AND SWITCHES INDICATE ASSOCIATED UNITS FOR SWITCHING. UPPER CASE LETTERS AT LIGHT FIXTURES INDICATE THE TYPE OF FIXTURES. NUMBERS AT AT FIXTURES INDICATE PANELBOARD CIRCUIT.
4. A LOWER CASE "e" NEXT TO A DEVICE INDICATES THE DEVICE IS EXISTING TO REMAIN.
5. A LOWER CASE "s" NEXT TO A DEVICE INDICATES THE DEVICE IS SURFACE MOUNTED.

1-B

Revisions | Date

SHIVEHATTERY
ARCHITECTURE + ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri

Drawing Title: ELECTRICAL SYMBOLS, SCHEDULE AND DETAILS

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12-17-2012 CONSTRUCTION DOCUMENTS

Project No. DVA#636-311 S-H#110240-0

Approved: Division Chief

Approved: Service Director

Building Number 1 | Checked JJH | Drawn DMM

Location: IOWA CITY VA HEALTH CARE SYSTEM IOWA CITY, IOWA

DRAWING NO. 1-B-E4

Veterans Administration

PANELBOARD SCHEDULE - EXISTING — B21

LOCATION: ROOM BE14
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: 150A MCB TYPE: SQUARE D NQOB MOUNTING: SURFACE AIC:
REMARKS: SECTION 1 OF 1

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE15 RCPTS	1	20A/1	–	A	–	30A/3	2	RM BE15 OUTLET
RM BE15 RCPTS	3	20A/1	–	B	–	--	4	---
RM BE15 RCPTS	5	20A/1	–	C	–	--	6	---
DRILL PRESS	7	20A/3	–	A	–	20A/1	8	RM BE14 RCPTS
---	9	--	–	B	–	20A/1	10	RM BE14 RCPTS
---	11	--	–	C	–	20A/1	12	RM BE14 RCPTS
RM BE14 RCPTS	13	20A/1	–	A	–	20A/1	14	RM BE15 RCPTS
RM BE14 TEST PANEL OUTLET	15	30A/2	–	B	–	20A/1	16	RM BE15 RCPTS
---	17	--	–	C	–	20A/1	18	RM BE15 RCPTS
RM BE14 TEST PANEL OUTLET	19	30A/3	–	A	–	20A/1	20	RM BE15 RCPTS
---	21	--	–	B	–	20A/1	22	RM BE15 RCPTS
---	23	--	–	C	–	20A/2	24	SPECIAL OUTLET
RM BE14 TEST PANEL OUTLET	25	40A/3	–	A	–	--	26	---
---	27	--	–	B	–	20A/2	28	SPECIAL OUTLET
---	29	--	–	C	–	--	30	---

NOTE: EXISTING CIRCUIT LOAD DESCRIPTIONS (SHOWN IN LIGHTER WEIGHT TEXT) FOR EXISTING PANELBOARD SCHEDULES SHOWN ARE TAKEN FROM THE PANEL DIRECTORY AT THE PANEL AND ARE SHOWN FOR REFERENCE ONLY.

PANELBOARD SCHEDULE - REPLACEMENT (NEW) — B21

LOCATION: RM BE22
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: 150A MCB TYPE: SQUARE D NQOD MOUNTING: SURFACE AIC: 22K
REMARKS: SECTION 1 OF 1 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE12 RCPTS	1	20A/1	0.7	A	0.6	20A/1	2	CORR RCPTS
RM BE12 RCPTS	3	20A/1	0.7	B	0.6	20A/1	4	RM BE11 RCPTS
RM BE16 RCPTS	5	20A/1	0.9	C	0.6	20A/1	6	RM BE11 RCPTS
RM BE18 RCPT	7	20A/1	0.9	A	0.6	20A/1	8	RM BE11 RCPTS
RM BE17.3 RCPT	9	20A/1	0.4	B	0.6	20A/1	10	RM BE11 RCPTS
RM BE17.3 RCPT	11	20A/1	0.4	C	0.6	20A/1	12	RM BE17.2 RCPTS
RM BE17.3 RCPT	13	20A/1	0.4	A	0.6	20A/1	14	RM BE17.2 RCPTS
RM BE17C RCPT	15	20A/1	0.6	B	0.6	20A/1	16	RM BE17.3 RCPTS
RM BE17A RCPT	17	20A/1	0.6	C	0.6	20A/1	18	RM BE17.3 RCPTS
RM BE17.1 RCPT	19	20A/1	0.6	A	0.6	20A/1	20	RM BE17.3 RCPTS
RM BE17.1 RCPT	21	20A/1	0.6	B	0.6	20A/1	22	RM BE17.3 RCPTS
RM BE17.1 RCPT	23	20A/1	0.6	C	0	20A/1	24	SPARE
RM BE17.1 RCPT	25	20A/1	0.6	A	0	20A/1	26	SPARE
SPARE	27	20A/1	0	B	0	20A/1	28	SPARE
SPARE	29	20A/1	0	C	0	20A/1	30	SPARE
SPARE	31	20A/1	0	A	0	20A/1	32	SPARE
SPARE	33	20A/1	0	B	0	20A/1	34	SPARE
SPARE	35	20A/1	0	C	0	20A/1	36	SPARE
SPACE	37	20A/1	0	A	0	20A/1	38	SPACE
SPARE	39	20A/1	0	B	0	20A/1	40	SPARE
SPACE	41	20A/1	0	C	0.1	20A/1	42	RM BE19.1, BE17.1 CONTROL TX

PANELBOARD SCHEDULE - EXISTING — B22

LOCATION: RM BE19
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: SURFACE AIC: 10K
REMARKS: SECTION 1 OF 1 FED FROM B05D #4

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
LTCP	1	20A/1	–	A	–	20A/3	2	RM BE19 TABLE SAW
DDC	3	20A/1	–	B	–	--	4	---
(ACTIVE)	5	20A/1	–	C	–	--	6	---
RM BE19 RCPT	7	20A/1	–	A	–	20A/3	8	SANDER
RM BE17 RCPT	9	20A/1	–	B	–	--	10	--
(ACTIVE)	11	20A/1	–	C	–	--	12	---
(ACTIVE)	13	20A/1	–	A	–	20A/1	14	RCPT
RCPT	15	20A/1	–	B	–	20A/1	16	RM BE20 DRYER RCPT
WATER FOUNTAIN & CPU RCPT	17	20A/1	–	C	–	20A/1	18	RM BE17 LIGHTS
RCPT	19	20A/1	–	A	–	20A/1	20	RM BE16 RCPT, LIGHTS
1-CP-A6	21	20A/1	–	B	–	20A/1	22	RM BE20 LIGHTS
RADIAL ARM SAW	23	20A/3	–	C	–	20A/1	24	RM BE20 LIGHTS
---	25	--	–	A	–	20A/1	26	LTCP
---	27	--	–	B	–	20A/1	28	DDC
SPARE (OFF)	29	15A/3	–	C	–	20A/1	30	(ACTIVE)
---	31	--	–	A	–	20A/2	32	(ACTIVE)
---	33	--	–	B	–	--	34	---
RM BE19 DRILL PRESS	35	20A/2	–	C	–	20A/1	36	RM BE19 RCPT (OFF)
---	37	--	–	A	–	15A/3	38	(ACTIVE)
RM BE19 RCPT	39	20A/1	–	B	–	--	40	---
SPACE	41	/1	0	C	–	--	42	---

PANELBOARD SCHEDULE - REPLACEMENT (NEW) — B22

LOCATION: RM BE22
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOD MOUNTING: SURFACE AIC: 22K
REMARKS: SECTION 1 OF 1 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE17B BENCH GRINDER	1	20A/1	1.0	A	0.8	20A/1	2	RM BE17.3 PAINT SHAKER
RM BE17B PORTABLE BAND SAW	3	20A/1	1.0	B	1.0	20A/2	4	RM BE17.2 DRILL PRESS
RM BE17B RCPT	5	20A/1	0.4	C	1.0	--	6	---
RM BE17.2 BELT SANDER	7	20A/3	1.0	A	1.0	20A/2	8	RM BE17.2 BAND SAW
---	9	--	1.0	B	1.0	--	10	---
---	11	--	1.0	C	1.0	20A/2	12	RM BE17.2 BAND SAW
RM BE17.2 CHOP SAW	13	20A/1	1.0	A	1.0	--	14	---
RM BE17.2 RADIAL ARM SAW	15	20A/3	1.0	B	0.4	20A/1	16	RM BE17.3 CORD REEL RCPT
---	17	--	1.0	C	0.4	20A/1	18	RM BE17.3 CORD REEL RCPT
---	19	--	1.0	A	0.4	20A/1	20	RM BE17.1 CORD REEL RCPT
RM BE17.2 TABLE SAW	21	20A/3	1.0	B	0.4	20A/1	22	RM BE17.1 CORD REEL RCPT
---	23	--	1.0	C	0	30A/3	24	RM BE17.1 TEST OUTLET
---	25	--	1.0	A	0	--	26	---
RM BE17.1 TEST OUTLET	27	20A/2	0	B	0	--	28	---
---	29	--	0	C	0	30A/3	30	RM BE17.1 TEST OUTLET
RM BE17.1 TEST OUTLET	31	30A/2	0	A	0	--	32	---
---	33	--	0	B	0	--	34	---
RM BE17.1 TEST OUTLET	35	50A/3	0	C	0	20A/1	36	RM BE17.1 TEST OUTLET
---	37	--	0	A	0	20A/1	38	RM BE17.1 TEST OUTLET
---	39	--	0	B	0	30A/2	40	RM BE17.1 TEST OUTLET
ROOF EF-4	41	20A/1	0	C	0	--	42	---

PANELBOARD SCHEDULE - EXISTING — B26

LOCATION: AC SHOP
120/208 VOLTS 3 PHASE 4 WIRE 100 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: SURFACE AIC: 22K
REMARKS: SECTION 1 OF 1 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RCPT	1	20A/1	–	A	–	20A/1	2	BOTH SIDES OF SINK RCPT
BOB'S WORKBENCH RCPT	3	20A/1	–	B	–	20A/2	4	SPECIAL OUTLET
RCPT	5	20A/1	–	C	–	--	6	---
MARY'S COMPUTER RCPT	7	20A/1	–	A	–	20A/1	8	GRINDER RCPT
RANGE	9	30A/3	–	B	–	20A/1	10	SPARE
---	11	--	–	C	–	20A/2	12	SPECIAL OUTLET
---	13	--	–	A	–	--	14	---
HALL RCPT	15	20A/1	–	B	–	20A/2	16	SPECIAL OUTLET
WORKBENCH RCPT	17	20A/1	–	C	–	--	18	---
DRILL	19	30A/2	–	A	–	20A/2	20	RCPT BOTH SIDES OF SINK
---	21	--	–	B	–	--	22	---
SPACE	23	/1	–	C	–	/1	24	SPACE

NOTE: EXISTING CIRCUIT LOAD DESCRIPTIONS (SHOWN IN LIGHTER WEIGHT TEXT) FOR EXISTING PANELBOARD SCHEDULES SHOWN ARE TAKEN FROM THE PANEL DIRECTORY AT THE PANEL AND ARE SHOWN FOR REFERENCE ONLY.

PANELBOARD SCHEDULE - REPLACEMENT (NEW) — B26

LOCATION: RM BE22
120/208 VOLTS 3 PHASE 4 WIRE 100 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOD MOUNTING: SURFACE AIC: 22k
REMARKS: SECTION 1 OF 1 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE19A RCTPS	1	20A/1	0.4	A	0.6	20A/1	2	RM BE19.2 NE RCPTS
RM BE19.2 S. RCPTS	3	20A/1	0.6	B	0.6	20A/1	4	RM BE19.2 NE RCPTS
RM BE19.2 S. RCPTS	5	20A/1	0.6	C	0.6	20A/1	6	RM BE19.2 N. CENTRAL RCPTS
RM BE19.2 SOUTH CENT. RCPTS	7	20A/1	0.6	A	0.6	20A/1	8	RM BE19.2 N. CENTRAL RCPTS
RM BE19.2 SOUTH CENT. RCPTS	9	20A/1	0.6	B	0.6	20A/1	10	RM BE19.2 NW RCPTS
RM BE19.2 SW RCPTS	11	20A/1	0.6	C	0.6	20A/1	12	RM BE19.2 NW RCPTS
RM BE19.2 SW RCPTS	13	20A/1	0.6	A	0.4	20A/1	14	RM BE19.2 N RCPTS
SPARE	15	20A/1	0	B	0.9	20A/1	16	RM BE19.2 GENERAL RCPTS
SPARE	17	20A/1	0	C	0	20A/1	18	SPARE
SPARE	19	20A/1	0	A	0	20A/1	20	SPARE
SPARE	21	20A/1	0	B	1.6	20A/1	22	RM BE19.1 EF-1
SPARE	23	20A/1	0	C	0.4	20A/1	24	RM BE19.1 EF-2
REFEED CIRCUIT B25-8,10,12 (OUTSIDE PLUG EAST PATIO)	25	50A/3	–	A	0.8	20A/1	26	RM BE19.1 UV-1
---	27	--	–	B	0.8	20A/1	28	RM BE19.1 UV-2
---	29	--	–	C	0.8	20A/1	30	RM BE19.1 UV-3

PANELBOARD SCHEDULE - EXISTING — B23L

LOCATION: CORRIDOR BCE03
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: FLUSH AIC: 22K
REMARKS: SECTION 1 OF 2 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE12F SW RCPT	1	20A/1	0	A	0	20A/1	2	RM BE12F WC RCPT
RM BE12F SW RCPT	3	20A/1	0	B	0	20A/1	4	RM BE12F WC RCPT
RM BE12F NW RCPT	5	20A/1	0	C	0	20A/1	6	RM BE12D RCPT
RM BE12F NW RCPT	7	20A/1	0	A	0	20A/1	8	RM BE12D RCPT
RM BE12C RCPT	9	20A/1	0	B	0	20A/1	10	RM BE12B RCPT
RM BE12C RCPT	11	20A/1	0	C	0	20A/1	12	RM BE12B RCPT
RM BE12F CS RCPT	13	20A/1	0	A	0	20A/1	14	RM BE12F CN RCPT
RM BE12F CS RCPT	15	20A/1	0	B	0	20A/1	16	RM BE12F CN RCPT
RM BE12F CS RCPT	17	20A/1	0	C	0	20A/1	18	RM BE12F NC RCPT
RM BE12B RCPT	19	20A/1	0	A	0	20A/1	20	RM BE12E RCPT
RM BE12C HOOD	21	20A/1	0	B	0	20A/1	22	SPARE
SPARE	23	20A/1	0	C	0	20A/1	24	SPARE
RM BE12F SW SPEC. RCPT	25	30A/2	0	A	0	30A/2	26	RM BE12D,F,C SPEC. RCPT
– – –	27	--	0	B	0	--	28	– – –
RM BE12F CW SPEC. RCPT	29	30A/2	0	C	0	30A/2	30	RM BE12C F-N RCPT
– – –	31	--	0	A	0	--	32	– – –
RM BE12F NW SPEC. RCPT	33	30A/2	0	B	0	30A/2	34	RM BE12F CS,CN SPEC. RCPT
– – –	35	--	0	C	0	--	36	– – –
RM BE12F SW,CS SPEC. RCPT	37	20A/2	0	A	0	20A/2	38	RM BE12F WN SPEC. RCPT
– – –	39	--	0	B	0	--	40	– – –
SPACE	41	/1	0	C	0	/1	42	SPACE

PANELBOARD SCHEDULE - EXISTING — B23R

LOCATION: CORRIDOR BCE03
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: FLUSH AIC: 22K
REMARKS: SECTION 2 OF 2

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
SPARE	43	20A/1	0	A	0	20A/1	44	SPARE
RM BE12,13 LINEN CHUTE RCPTS	45	20A/1	0	B	0	20A/2	46	RM BE12C SPEC. RCPT
RM BE12A RCPT	47	20A/1	0	C	0	--	48	– – –
RM BE21, 22 RCPTS	49	20A/1	0	A	0	20A/1	50	SPARE
SITE LIGHTING, VA SIGN (FRONT)	51	20A/1	0	B	0	20A/1	52	SPARE
RM BE13F-C RCPTS	53	20A/1	0	C	0	20A/1	54	SPARE
RM BE13F-C RCPTS	55	20A/1	0	A	0	20A/1	56	SPARE
RM BE12F-N RCPTS	57	20A/1	0	B	0	30A/2	58	RM BE12B SPEC. RCPT
RM BE12F-N RCPTS	59	20A/1	0	C	0	--	60	– – –
SPARE	61	20A/1	0	A	0	20A/2	62	RM BE12B SPEC. RCPT
SPARE	63	20A/1	0	B	0	--	64	– – –
RM BE12D 12F-N SPEC. RCPTS	65	20A/2	0	C	0	20A/1	66	RM BE12F-S J-BOX
– – –	67	--	0	A	0	20A/1	68	RM BE12F-S J-BOX
SPARE	69	20A/1	0	B	0	20A/1	70	SPARE
RM BE12F-CN,WC SPEC. RCPTS	71	20A/2	0	C	0	20A/1	72	SPARE
– – –	73	--	0	A	0	30A/2	74	SPARE
SPARE	75	20A/1	0	B	0	--	76	– – –
SPARE	77	20A/1	0	C	0	30A/3	78	RM BE12F-CS SPEC. RCPT
RM BE12F-CN SPEC. RCPTS	79	30A/2	0	A	0	--	80	– – –
– – –	81	--	0	B	0	--	82	– – –
RM BE12F-CN RCPT	83	20A/1	0	C	0	/1	84	SPACE

PANELBOARD SCHEDULE - EXISTING (REUSED) — B23L

LOCATION: CORRIDOR BCE03
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: FLUSH AIC: 22K
REMARKS: SECTION 1 OF 2 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
(RM BE04A RCPTS)	1	20A/1	0.7	A	0.9	20A/1	2	(RM BE01A RCPTS)
(RM BE04 RCPTS)	3	20A/1	0.7	B	0.4	20A/1	4	(RM BE02 RCPTS)
(RM BE04 RCPTS)	5	20A/1	0.6	C	0.6	20A/1	6	(RM BE02,A RCPTS)
(RM BE04 RCPTS)	7	20A/1	0.4	A	0.4	20A/1	8	(RM BE02 WIREMOLD)
(RM BE04 RCPTS)	9	20A/1	0.4	B	0.4	20A/1	10	(RM BE02 WIREMOLD)
(RM BE04 REFRIG)	11	20A/1	1.0	C	0.6	20A/1	12	(RM BE02 WIREMOLD)
(RM BE04 REFRIG)	13	20A/1	1.0	A	0.4	20A/1	14	(RM BE02 WIREMOLD)
(CORR, BE06,9 RCPTS)	15	20A/1	0.7	B	0.7	20A/1	16	(RM BE07 WIREMOLD)
(RM BE04B RCPTS)	17	20A/1	0.7	C	0.6	20A/1	18	(RM BE07 WIREMOLD)
(RM BE10 RCPTS)	19	20A/1	0.4	A	0.4	20A/1	20	(RM BE07A WIREMOLD)
(RM BE10 RCPTS)	21	20A/1	0.7	B	0.2	20A/1	22	(RM BE10 FLOOR RECPT)
(RM BE10 RCPTS)	23	20A/1	0.7	C	0	20A/1	24	SPARE
(RM BE10 RCPTS)	25	30A/2 *	0.7	A	0	30A/2 *	26	SPARE
SPARE	27	-- *	0	B	0	-- *	28	SPARE
SPARE	29	30A/2 *	0	C	0	30A/2 *	30	SPARE
SPARE	31	-- *	0	A	0	-- *	32	SPARE
SPARE	33	30A/2	0	B	0	30A/2	34	SPARE
(– – –)	35	--	0	C	0	--	36	– – –
SPARE	37	20A/2	0	A	0	20A/2	38	SPARE
(– – –)	39	--	0	B	0	--	40	– – –
SPACE	41	/1	0	C	0	/1	42	SPACE

* REMOVE INDICATED TWO POLE CIRCUIT BREAKERS AND REPLACE WITH EIGHT NEW, 20A SINGLE POLE CIRCUIT BREAKERS MATCHING EXISTING.

PANELBOARD SCHEDULE - EXISTING (REUSED) — B23R

LOCATION: CORRIDOR BCE03
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: FLUSH AIC: 22K
REMARKS: SECTION 2 OF 2

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RECIRCUIT EXISTING TO REMAIN CIRCUITS	43	20A/1	–	A	0.4	20A/1	44	(RM BCE03 RCPTS)
LINEN CHUTE RCPT	45	20A/1	–	B	3.0	* 20A/2	46	(RM BE15 STOVE)
RECIRCUIT EXISTING TO REMAIN CIRCUITS	47	20A/1	–	C	3.0	* --	48	(– – –)
RECIRCUIT EXISTING TO REMAIN CIRCUITS	49	20A/1	–	A	1.0	20A/1	50	(RM BE15 REFRIG)
SITE LIGHTING, VA SIGN (FRONT)	51	20A/1	–	B	1.0	20A/1	52	(RM BE15 REFRIG)
(RM BE14 RCPTS)	53	20A/1	0.6	C	1.0	20A/1	54	(RM BE15 DW)
(RM BE14 RCPTS)	55	20A/1	0.6	A	0.7	20A/1	56	(RM BE15 RCPTS)
(RM BE15 RCPTS)	57	20A/1	0.4	B	0	30A/2	58	SPARE
(RM BE15 RCPTS)	59	20A/1	0.4	C	0	--	60	SPARE
(RM BE15 RCPTS)	61	20A/1	0.4	A	0	20A/2	62	SPARE
(RM BE15 RCPTS)	63	20A/1	0.4	B	0	--	64	SPARE
SPARE	65	20A/2	0	C	0	20A/1	66	SPARE
SPARE	67	--	0	A	0	20A/1	68	SPARE
(RM BE15 EWC)	69	20A/1	1.0	B	0	20A/1	70	SPARE
SPARE	71	20A/2	0	C	0	20A/1	72	SPARE
SPARE	73	--	0	A	0	30A/2	74	SPARE
SPARE	75	20A/1	0	B	0	--	76	SPARE
SPARE	77	20A/1	0	C	0	30A/3	78	SPARE
SPARE	79	30A/2	0	A	0	--	80	SPARE
SPARE	81	--	0	B	0	--	82	SPARE
SPACE	83	/1	0	C	0	/1	84	SPACE

* REMOVE INDICATED CIRCUIT BREAKER AND REPLACE WITH ONE NEW, 50A TWO POLE CIRCUIT BREAKER MATCHING EXISTING

PANELBOARD SCHEDULE - NEW — E07-1

LOCATION: RM BE07A
120/208 VOLTS 3 PHASE 4 WIRE 50 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOD MOUNTING: SURFACE AIC: 22K
REMARKS: SECTION 1 OF 1 FED FROM PANEL C22-1

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE07A RECEPTACLE	1	20A/1	0.4	A	0.4	20A/1	2	RM BE07A FCU-2
RM BE07A RECEPTACLE	3	20A/1	0.4	B	1.0	20A/1	4	RM BE07A ACCESS CONTROL
RM BE07A RECEPTACLE	5	20A/1	0.4	C	0	20A/1	6	SPARE
RM BE07A RECEPTACLE	7	20A/1	0.4	A	0	20A/1	8	SPARE
RM BE07A RECEPTACLE	9	20A/1	0.4	B	0	20A/1	10	SPARE
RM BE07A RECEPTACLE	11	20A/1	0.4	C	0	20A/1	12	SPARE
SPARE	13	20A/1	0	A	0	20A/1	14	SPARE
SPARE	15	20A/1	0	B	0	20A/1	16	SPARE
SPARE	17	20A/1	0	C	0	20A/2	18	SPARE
SPARE	19	20A/1	0	A	0	--	20	---
SPARE	21	20A/1	0	B	0	20A/2	22	SPARE
SPARE	23	20A/1	0	C	0	--	24	---

PANELBOARD SCHEDULE - EXISTING — B24

LOCATION: AC SHOP
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: TYPE: SQUARE D NQOB MOUNTING: AIC:
REMARKS: SECTION 1 OF 1 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
LATHE	1	30A/2	–	A	–	30A/3	2	MILLING MACHINE
---	3	--	–	B	–	--	4	---
SAW	5	20A/1	–	C	–	--	6	---
SAW	7	20A/1	–	A	–	20A/1	8	SPARE
WELDER EAST WALL	9	100A/2	–	B	–	20A/1	10	SPARE
---	11	--	–	C	–	20A/1	12	SPARE
SPACE	13	/1	–	A	–	20A/1	14	SPARE
SPARE (OFF)	15	50A/3	–	B	–	/1	16	NOT AVAILABLE
---	17	--	–	C	–	/1	18	NOT AVAILABLE
---	19	--	–	A	–	/1	20	NOT AVAILABLE
SPECIAL OUTLET	21	20A/2	–	B	–	20A/1	22	RCPT
---	23	--	–	C	–	20A/1	24	RCPT
SPECIAL OUTLET	25	30A/2	–	A	–	30A/1	26	CORD RCPT
---	27	--	–	B	–	50A/2	28	WELDER
SPACE	29	/1	–	C	–	--	30	---

PANELBOARD SCHEDULE - REPLACEMENT (NEW) — B24L

LOCATION: RM BE22
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOD MOUNTING: AIC: 22K
REMARKS: SECTION 1 OF 2 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE19.2 EAST WLDING OUTLET	1	50A/2	2.8	A	1.0	20A/1	2	RM BE19.2 BAND SAW
– – –	3	--	2.8	B	1.0	20A/1	4	RM BE19.2 GREENERD ARBOR PRESS
RM BE19.2 EAST WLDING OUTLET	5	50A/2	2.8	C	1.0	20A/1	6	RM BE19.2 PARTS WASHER
– – –	7	--	2.8	A	0.5	20A/3	8	RM BE19.2 DRILL PRESS
RM BE19.2 EAST WLDING OUTLET	9	50A/2	2.8	B	0.5	--	10	– – –
– – –	11	--	2.8	C	0.5	--	12	– – –
RM BE19.2 EAST WLDING OUTLET	13	100A/2	4.1	A	0.6	20A/3	14	RM BE19.2 SERVICE RCPT
– – –	15	--	4.1	B	0.6	--	16	– – –
RM BE19.2 RCPT	17	20A/1	0.6	C	0.6	--	18	– – –
RM BE19.2 RCPT	19	20A/1	0.6	A	0.4	20A/1	20	RM BE19.2 COUNTER RCPT
RM BE19.2 RCPT	21	20A/1	0.4	B	0.4	20A/1	22	RM BE19.2 COUNTER RCPT
RM BE19.2 MILLING MACHINE	23	30A/3	–	C	0.4	20A/1	24	RM BE19.2 COUNTER RCPT
– – –	25	--	–	A	0.4	20A/1	26	RM BE19.2 RCPT
– – –	27	--	–	B	0.4	20A/1	28	RM BE19.2 RCPT
RM BE19.2 LATHE	29	30A/2	0	C	0.4	20A/1	30	RM BE19.2 RCPT
– – –	31	--	0	A	0.4	20A/1	32	RM BE19.2 RCPT
SPARE	33	20A/1	0	B	0	20A/1	34	SPARE
SPARE	35	20A/1	0	C	0	20A/1	36	SPARE
SPARE	37	20A/1	0	A	0	20A/1	38	SPARE
SPARE	39	20A/1	0	B	0	20A/1	40	SPARE
SPARE	41	20A/1	0	C	0	20A/1	42	SPARE

PANELBOARD SCHEDULE - REPLACEMENT (NEW) — B24R

LOCATION: RM. BE22
120/208 VOLTS 3 PHASE 4 WIRE 225 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOD MOUNTING: SURFACE AIC: 22K
REMARKS: SECTION 2 OF 2

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE19.1 TEST OUTLET	43	30A/3	0	A	0	20A/3	44	RM BE19.1 TEST OUTLET
– – –	45	--	0	B	0	--	46	– – –
– – –	47	--	0	C	0	--	48	– – –
RM BE19.1 RCPT	49	20A/1	0.4	A	0	30A/2	50	RM BE19.1 TEST OUTLET
RM BE19.1 RCPT	51	20A/1	0.4	B	0	--	52	– – –
RM BE19.1 CORD REEL RCPT	53	20A/1	0.4	C	0	20A/2	54	RM BE19.1 TEST OUTLET
RM BE19.1 CORD REEL RCPT	55	20A/1	0.4	A	0	--	56	– – –
RM BE19.1 CORD REEL RCPT	57	20A/1	0.4	B	0	50A/3	58	RM BE19.1 TEST OUTLET
RM BE19.1 CORD REEL RCPT	59	20A/1	0.4	C	0	--	60	---
SPARE	61	20A/1	0	A	0	--	62	---
SPARE	63	20A/1	0	B	0	30A/2	64	RM BE19.1 TEST OUTLET
SPARE	65	20A/1	0	C	0	--	66	---
SPARE	67	20A/1	0	A	0	20A/1	68	SPARE
SPARE	69	20A/1	0	B	0	20A/1	70	SPARE
SPARE	71	20A/1	0	C	0	20A/1	72	SPARE

PANELBOARD SCHEDULE - NEW — BLS

LOCATION: RM BE22
120/208 VOLTS 3 PHASE 4 WIRE 100 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOD MOUNTING: SURFACE AIC: 22K
REMARKS: SECTION 1 OF 1 LIFE SAFETY EMERGENCY POWER BRANCH PANEL

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
SHOPS LIGHTS AND EXIT SIGNS	1	20A/1	0.7	A	0.4	20A/1	2	RM. BE01 LIGHTS
SHOPS LIGHTS AND EXIT SIGNS	3	20A/1	0.7	B	0.8	20A/1	4	RM. BN01 LIGHTS AND EXIT SIGNS
SHOPS LIGHTS AND EXIT SIGNS	5	20A/1	0.6	C	0.4	20A/1	6	STAIRS BST13 LIGHTS AND EXIT
RM. BCE02 MEDICAL GAS ALARM PANEL	7	20A/1	0.4	A	0	20A/1	8	SPARE
SPARE	9	20A/1	0	B	0	20A/1	10	SPARE
SPARE	11	20A/1	0	C	0	20A/1	12	SPARE
SPARE	13	20A/1	0	A	0	20A/1	14	SPARE
SPARE	15	20A/1	0	B	0	20A/1	16	SPARE
SPARE	17	20A/1	0	C	0	20A/1	18	SPARE
SPARE	19	20A/1	0	A	0	20A/1	20	SPARE
SPARE	21	20A/1	0	B	0	20A/1	22	SPARE
SPARE	23	20A/1	0	C	0	20A/1	24	SPARE

PANELBOARD SCHEDULE - EXISTING — B25

LOCATION: AC SHOP
120/208 VOLTS 3 PHASE 4 WIRE 100 AMPERES
MAIN DISCONNECT: MLO TYPE: SQUARE D NQOB MOUNTING: SURFACE AIC: 10K
REMARKS: SECTION 1 OF 1 FED FROM B05D

LOAD: PHASE A kVA PHASE B kVA PHASE C kVA TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
SPARE	1	20A/1	–	A	–	20A/1	2	RCPTS
SPARE	3	20A/1	–	B	–	20A/1	4	GRINDER, HOIST, BAND SAW
SPARE	5	20A/1	–	C	–	20A/1	6	SPARE
SPARE	7	20A/1	–	A	–	50A/3	8	OUTSIDE PLUG EAST PATIO
SPARE	9	20A/1	–	B	–	--	10	---
SPACE	11	/1	–	C	–	--	12	---
SPACE	13	/1	–	A	–	/1	14	SPACE
SPACE	15	/1	–	B	–	/1	16	SPACE
SPACE	17	/1	–	C	–	/1	18	SPACE
SPACE	19	/1	–	A	–	/1	20	SPACE
SPACE	21	/1	–	B	–	/1	22	SPACE
SPACE	23	/1	–	C	–	/1	24	SPACE

1-B

Revisions | Date

SHIVEHATTERY
ARCHITECTURE+ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri

Drawing Title: ELECTRICAL SCHEDULES

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12-17-2012 CONSTRUCTION DOCUMENTS

Project No. DVA#636-311 S-H#110240-0

Approved: Division Chief

Approved: Service Director

Building Number 1 | Checked JJH | Drawn DMM

Location: IOWA CITY VA HEALTH CARE SYSTEM IOWA CITY, IOWA

DRAWING NO. 1-B-E5

Veterans Administration

PANELBOARD SCHEDULE - EXISTING

B20H

LOCATION:

277/480 VOLTS | 3 PHASE | 4 WIRE | 225 AMPERES

MAIN DISCONNECT: | TYPE: SQUARE D NEHB | MOUNTING: SURFACE | AIC:

REMARKS: SECTION 1 OF 1
FED FROM B051H

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
LIGHTS	1	20A/1	–	A	–	20A/1	2	LIGHTS
BE24AC, 23,22,13,12,21 LTS	3	20A/1	–	B	–	20A/3	4	TEST RM BE15 RCPT
BIO MED SHOP LTS	5	20A/1	–	C	–	--	6	---
RCPT	7	20A/1	–	A	–	--	8	---
FAN 1-SF-2B	9	20A/3	–	B	–	20A/3	10	FAN 1-EF-2A
---	11	--	–	C	–	--	12	---
---	13	--	–	A	–	--	14	---
FAN 1-SA-A1	15	20A/3	–	B	–	20A/3	16	FAN 1-SF-2A
---	17	--	–	C	–	--	18	---
---	19	--	–	A	–	--	20	---
FAN 1-EF-A31	21	40A/3	–	B	–	20A/1	22	SPARE
---	23	--	–	C	–	20A/1	24	SPARE
---	25	--	–	A	–	20A/1	26	SPARE
SPARE	27	20A/1	–	B	–	20A/1	28	SPARE
SPARE	29	20A/1	–	C	–	20A/1	30	SPARE
SPARE	31	20A/1	–	A	–	20A/2	32	SPARE
SPARE	33	20A/1	–	B	–	20A/2	34	SPARE
SPARE	35	20A/1	–	C	–	20A/1	36	SPARE
SPACE	37	/1	–	A	–	/1	38	SPACE
SPACE	39	/1	–	B	–	/1	40	SPACE
SPACE	41	/1	–	C	–	/1	42	SPACE

PANELBOARD SCHEDULE - REPLACEMENT (NEW)

B20H

LOCATION: BE22

277/480 VOLTS | 3 PHASE | 4 WIRE | 225 AMPERES

MAIN DISCONNECT: MLO | TYPE: SQUARE D NEHB | MOUNTING: | AIC:14k

REMARKS: SECTION 1 OF 1
FED FROM B051H

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
SPACE	1	/1	–	A	–	/1	2	SPACE
SPACE	3	/1	–	B	–	/3	4	SPACE
SPACE	5	/1	–	C	–	--	6	---
SPACE	7	/1	–	A	–	--	8	---
RECIRCUITED FAN 1-SF-2B	9	20A/3	–	B	–	20A/3	10	SPARE
---	11	--	–	C	–	--	12	---
---	13	--	–	A	–	--	14	---
RECIRCUITED FAN 1-SA-A1	15	20A/3	–	B	–	20A/3	16	RMBE17 RCPT
---	17	--	–	C	–	--	18	---
---	19	--	–	A	–	--	20	---
SPACE	21	/3	–	B	–	20A/3	22	RM BE17 RCPT
---	23	--	–	C	–	--	24	---
---	25	--	–	A	–	--	26	---
SPARE	27	20A/1	0	B	0	20A/1	28	SPARE
SPARE	29	20A/1	0	C	0	20A/1	30	SPARE
SPARE	31	20A/1	0	A	–	20A/1	32	RM BE14,BE15 LTS
SPARE	33	20A/1	0	B	–	20A/1	34	RM BE2,4,1A,7,11,9,10,12,16 LTS
RM BE19 LTS	35	20A/1	–	C	–	20A/1	36	RM BE17 LTS
RM BE19 RCPT	37	20A/3	–	A	–	20A/3	38	RM BE19 RCPT
---	39	--	–	B	–	--	40	---
---	41	--	–	C	–	--	42	---

PANELBOARD SCHEDULE - NEW

B30L

LOCATION: CORRIDOR BN01

120/208 VOLTS | 3 PHASE | 4 WIRE | 225 AMPERES

MAIN DISCONNECT: MLO | TYPE: SQUARE D NQOD | MOUNTING: | AIC: 22k

REMARKS: SECTION 1 OF 2
PROVIDE DOUBLE LUGS
PROVIDE PANEL SKIRT TO 6" ABOVE CLG

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BN01F WIREMOLD	1	20A/1	0.4	A	0.4	20A/1	2	RM BN01 STATION 1 RCPT
RM BN01F WIREMOLD	3	20A/1	0.4	B	0.4	20A/1	4	RM BN01 STATION 1 RCPT
RM BN01F RCPT	5	20A/1	0.6	C	0.4	20A/1	6	RM BN01 STATION 1 RCPT
RM BN01G WIREMOLD	7	20A/1	0.4	A	0.4	20A/1	8	RM BN01 STATION 1 RCPT
RM BN01G WIREMOLD	9	20A/1	0.4	B	0.4	20A/1	10	RM BN01 STATION 2 RCPT
RM BN01G RCPT	11	20A/1	0.6	C	0.4	20A/1	12	RM BN01 STATION 2 RCPT
RM BN01 RCPT	13	20A/1	0.4	A	0.4	20A/1	14	RM BN01 STATION 2 RCPT
RM BN01 COPIER	15	20A/1	1.0	B	0.4	20A/1	16	RM BN01 STATION 2 RCPT
RM BN01 BUZZER	17	20A/1	0.2	C	0.4	20A/1	18	RM BN01 STATION 3 RCPT
RM BN01 STATION 5 RCPT	19	20A/1	0.4	A	0.4	20A/1	20	RM BN01 STATION 3 RCPT
RM BN01 STATION 5 RCPT	21	20A/1	0.4	B	0.4	20A/1	22	RM BN01 STATION 3 RCPT
RM BN01 STATION 5 RCPT	23	20A/1	0.4	C	0.4	20A/1	24	RM BN01 STATION 3 RCPT
RM BN01 STATION 5 RCPT	25	20A/1	0.4	A	0.4	20A/1	26	RM BN01 STATION 4 RCPT
RM BN01 STATION 6 RCPT	27	20A/1	0.4	B	0.4	20A/1	28	RM BN01 STATION 4 RCPT
RM BN01 STATION 5 RCPT	29	20A/1	0.4	C	0.4	20A/1	30	RM BN01 STATION 4 RCPT
RM BN01 STATION 5 RCPT	31	20A/1	0.4	A	0.6	20A/1	32	RM BN01 STATION 4 RCPT
RM BN01 STATION 5 RCPT	33	20A/1	0.4	B	0	20A/1	34	SPARE
RM BN01 SPECIAL OUTLET	35	20A/2	0.6	C	0	20A/1	36	SPARE
---	37	--	0.6	A	0	20A/1	38	SPARE
RM BN01 SPECIAL OUTLET	39	20A/2	0.6	B	0.6	20A/2	40	RM BN01 SPECIAL OUTLET
---	41	--	0.6	C	0.6	--	42	---

PANELBOARD SCHEDULE - NEW

B30R

LOCATION: CORRIDOR BN01

120/208 VOLTS | 3 PHASE | 4 WIRE | 225 AMPERES

MAIN DISCONNECT: MLO | TYPE: SQUARE D NQOD | MOUNTING: | AIC: 22k

REMARKS: SECTION 2 OF 2
PROVIDE DOUBLE LUGS
PROVIDE PANEL SKIRT TO 6" ABOVE CLG

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BN01D RCPT	43	20A/1	0.4	A	0.6	20A/1	44	RM BN01A RCPT
RM BN01D RCPT	45	20A/1	0.6	B	0.6	20A/1	46	RM BN01A RCPT
RM BN01D RCPT	47	20A/1	0.4	C	0.7	20A/1	48	RM BN01B RCPT
RM BN01D RCPT	49	20A/1	0.4	A	0.6	20A/1	50	RM BN01B RCPT
RM BN01D FLOOR BOX	51	20A/1	0.4	B	0.7	20A/1	52	RM BN01C RCPT
CORRIDOR RCPT	53	20A/1	0.9	C	0.6	20A/1	54	RM BN01C RCPT
CORRIDOR NOTCH RCPT	55	20A/1	0.4	A	0.4	20A/1	56	RM BCN03 RCPT
CORRIDOR NOTCH RCPT	57	20A/1	0.4	B	0.7	20A/1	58	RM BN01I RCPT
RM BN01H EQUIP RCPT	59	20A/1	1.0	C	0	20A/1	60	SPARE
RM BN01H EQUIP RCPT	61	20A/1	1.0	A	0	20A/1	62	SPARE
RM BN01H EQUIP RCPT	63	20A/1	1.0	B	0	20A/1	64	SPARE
RM BN01H EQUIP RCPT	65	20A/1	1.0	C	0	20A/1	66	SPARE
RM BN01H EQUIP RCPT	67	20A/1	1.0	A	0	20A/1	68	SPARE
RM BN01H EQUIP RCPT	69	20A/1	0.9	B	0	20A/1	70	SPARE
RM BN01H RCPT	71	20A/1	0.7	C	0	20A/1	72	SPARE
SPARE	73	20A/1	0	A	0	20A/1	74	SPARE
SPARE	75	20A/1	0	B	0	20A/1	76	SPARE
SPARE	77	20A/1	0	C	0	20A/1	78	SPARE
SPARE	79	20A/1	0	A	0	20A/1	80	SPARE
SPARE	81	20A/1	0	B	0	20A/1	82	SPARE
SPARE	83	20A/1	0	C	0	20A/1	84	SPARE

PANELBOARD SCHEDULE - EXISTING

B27H

LOCATION: AC SHOP

277/480 VOLTS | 3 PHASE | 4 WIRE | 225 AMPERES

MAIN DISCONNECT: MLO | TYPE: SQUARE D NEHB | MOUNTING: SURFACE | AIC:

REMARKS: SECTION 1 OF 1
FED FROM B05-1H

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RCPT	1	20A/1	–	A	–	20A/3	2	RCPT
RCPT	3	20A/1	–	B	–	--	4	---
FAN 1-SF-2	5	15A/3	–	C	–	--	6	---
---	7	--	–	A	–	15A/3	8	FAN 1-EF-2
---	9	--	–	B	–	--	10	---
SPARE (OFF)	11	20A/1	–	C	–	--	12	---
SPARE (OFF)	13	20A/1	–	A	–	15A/3	14	FAN 1-EF-2W
SPARE (OFF)	15	20A/1	–	B	–	--	16	---
SPARE (OFF)	17	20A/1	–	C	–	--	18	---
SPARE (OFF)	19	20A/1	–	A	–	30A/1	20	SPARE (OFF)
SPARE (OFF)	21	20A/1	–	B	–	20A/1	22	SPARE (OFF)
FAN 1-SF-4	23	20A/3	–	C	–	20A/1	24	SPARE (OFF)
---	25	--	–	A	–	/1	26	SPACE
---	27	--	–	B	–	/1	28	SPACE
SPACE	29	/1	–	C	–	/1	30	SPACE

NOTE: EXISTING CIRCUIT LOAD DESCRIPTIONS (SHOWN IN LIGHTER WEIGHT TEXT) FOR EXISTING PANELBOARD SCHEDULES SHOWN ARE TAKEN FROM THE PANEL DIRECTORY AT THE PANEL AND ARE SHOWN FOR REFERENCE ONLY.

PANELBOARD SCHEDULE - NEW

B30H

LOCATION: ROOM BN01

277/480 VOLTS | 3 PHASE | 4 WIRE | 100 AMPERES

MAIN DISCONNECT: MLO | TYPE: SQUARE D NEHB | MOUNTING: SURFACE | AIC: 14k

REMARKS: SECTION 1 OF 1
FED FROM B05-1H
PROVIDE PANEL SKIRT TO 6" ABOVE CLG

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
ROOM BN01 LIGHTS	1	20A/1	0.8	A	0	20A/1	2	SPARE
ROOM BN01 LIGHTS	3	20A/1	0.8	B	0	20A/1	4	SPARE
ROOM BN01F,G,H LIGHTS	5	20A/1	0.6	C	0	20A/1	6	SPARE
ROOM BN01A,B,C,D,BN011 LIGHTS	7	20A/1	0.6	A	0	20A/1	8	SPARE
SPARE	9	20A/1	0	B	0	20A/1	10	SPARE
SPARE	11	20A/1	0	C	0	20A/1	12	SPARE
SPARE	13	20A/1	0	A	0	20A/1	14	SPARE
SPARE	15	20A/1	0	B	0	20A/1	16	SPARE
SPARE	17	20A/1	0	C	0	20A/1	18	SPARE
SPACE	19	/1	0	A	0	/1	20	SPACE
SPACE	21	/1	0	B	0	/1	22	SPACE
SPACE	23	/1	0	C	0	/1	24	SPACE

PANELBOARD SCHEDULE - NEW

C22-1

LOCATION: RM BE22

120/208 VOLTS | 3 PHASE | 4 WIRE | 100 AMPERES

MAIN DISCONNECT: 100A MCB | TYPE: SQUARE D NQOD | MOUNTING: SURFACE | AIC: 22K

REMARKS: SECTION 1 OF 1
FED FROM CB

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
RM BE22 LENAL ACC. CTRL PNLS	1	20A/1	0.8	A	0.4	20A/1	2	RM BE19A FCU-1
RM BE21 ACCESS CONTROL	3	20A/1	0.8	B	0.8	20A/1	4	RM BE19A ACCESS CONTROL
RM BE14 ACCESS CONTROL	5	20A/1	0.8	C	0.4	20A/1	6	RM BE19A RECEPTACLE
CORR BCE02 ACCESS CONTROL	7	20A/1	0.8	A	0.4	20A/1	8	RM BE19A RECEPTACLE
CORR BCE02 ACCESS CONTROL	9	20A/1	0.8	B	0.4	20A/1	10	RM BE19A RECEPTACLE
RM BE02 ACCESS CONTROL	11	20A/1	0.8	C	0.4	20A/1	12	RM BE19A RECEPTACLE
RM BCN03 ACCESS CONTROL	13	20A/1	0.8	A	0.4	20A/2	14	RM BE19A RECEPTACLE
RM BCN03 ACCESS CONTROL	15	20A/1	0.8	B	0.4	--	16	---
RM BE12 RECEPTACLE	17	20A/1	0.4	C	0	20A/1	18	SPARE
RM BE19.1 RECEPTACLE	19	20A/1	0.4	A	0	20A/1	20	SPARE
RM BE21 RECEPTACLE	21	20A/1	0.4	B	0	20A/1	22	SPARE
RM BE19.1 MECHANICAL PANELS	23	20A/1	1.0	C	0	20A/1	24	SPARE
SPARE	25	20A/1	0	A		50A/3	26	PANEL E07-1
SPARE	27	20A/1	0	B		--	28	- - -
SPARE	29	20A/1	0	C		--	30	- - -

PANELBOARD SCHEDULE - REPLACEMENT (NEW)

B27H

LOCATION: ROOM BE22

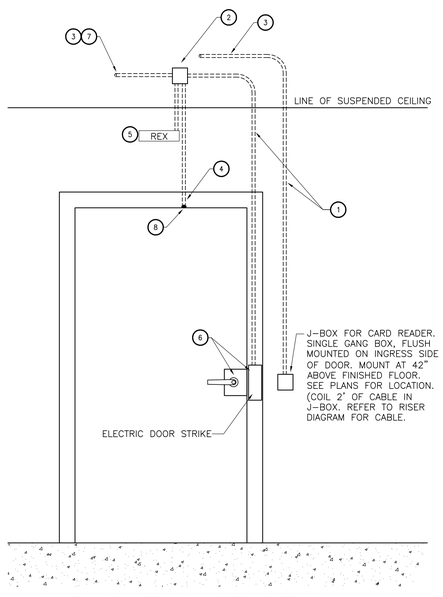
277/480 VOLTS | 3 PHASE | 4 WIRE | 225 AMPERES

MAIN DISCONNECT: MLO | TYPE: SQUARE D NEHB | MOUNTING: SURFACE | AIC: 14k

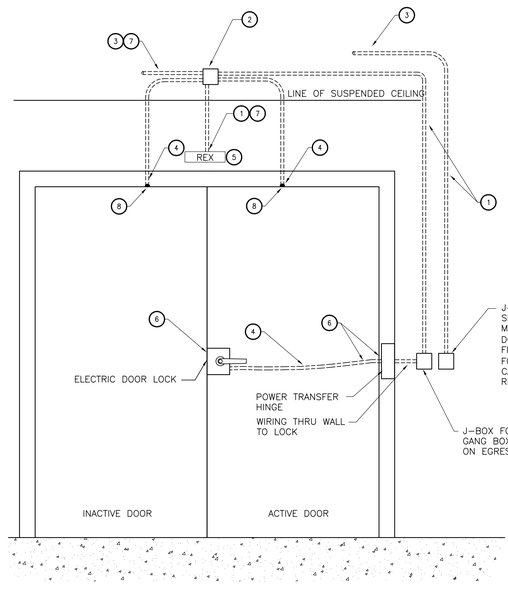
REMARKS: SECTION 1 OF 1
FED FROM B05-1H

LOAD: PHASE A kVA | PHASE B kVA | PHASE C kVA | TOTAL kVA

LOAD DESCRIPTION	CKT NO.	O.C.P. DEVICE	kVA LOAD	PH.	kVA LOAD	O.C.P. DEVICE	CKT NO.	LOAD DESCRIPTION
ROOF EF-3	1	20A/3	0.6	A	1.0	20A/3	2	RM BE19.1 AHU-1-B1
---	3	--	0.6	B	1.0	--	4	---
---	5	--	0.6	C	1.0	--	6	---
SPARE	7	20A/3	0	A	1.0	20A/3	8	RM BE19.1 AHU-1-B2
---	9	--	0	B	1.0	--	10	---
---	11	--	0	C	1.0	--	12	---
SPARE	13	20A/3	0	A	1.0	20A/3	14	RM BE19.1 AHU-1-B3
---	15	--	0	B	1.0	--	16	---
---	17	--	0	C	1.0	--	18	---
SPACE	19	/1	0	A	0	/1	20	SPACE
SPACE	21	/1	0	B	0	/1	22	SPACE
SPACE	23	/1	0	C	0	/1	24	SPACE
SPACE	25	/1	0	A	0	/1	26	SPACE
SPACE	27	/1	0	B	0	/1	28	SPACE
SPACE	29	/1	0	C	0	/1	30	SPACE



1 ACCESS CONTROL SYSTEM DETAIL



2 ACCESS CONTROL SYSTEM DETAIL

NOTES:

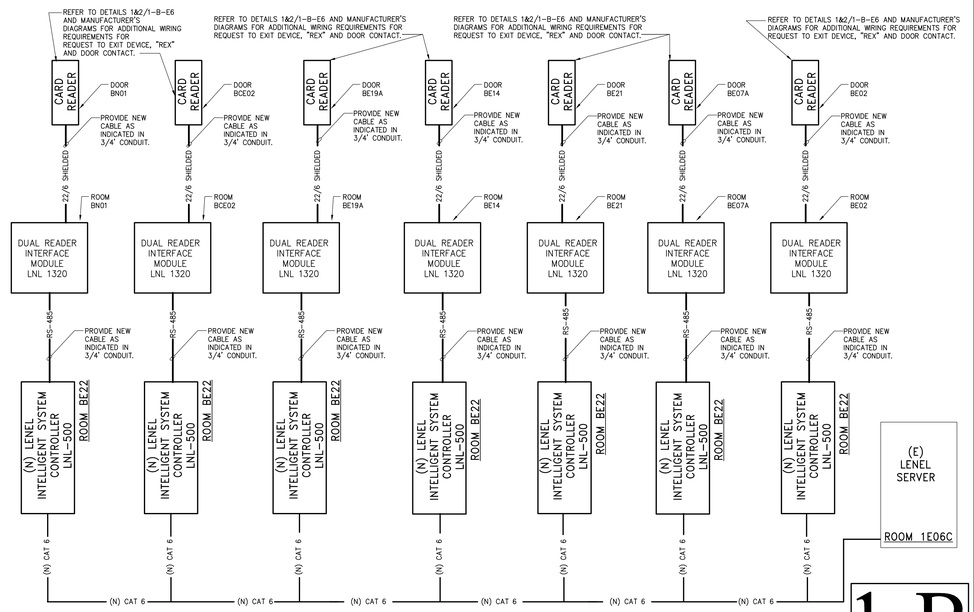
1. CONCEAL 3/4" CONDUIT IN WALL.
2. 24V LOCK POWER SUPPLY. COORDINATE WITH HARDWARE SUPPLIER.
3. TO LENEL CARD INTERFACE MODULE AT CONTROL PANEL. REFER TO RISER DIAGRAM, DETAIL 3 THIS SHEET.
4. FISH CABLE THROUGH HOLE DRILLED BY HARDWARE INSTALLER.
5. MOUNT REQUEST TO EXIT DEVICE OVER EGRESS SIDE OF DOOR.
6. EXISTING DOORS TO RECEIVE NEW DOOR HARDWARE AS SCHEDULED.
7. PROVIDE 22/6 SHIELDED CABLE FROM LENEL CARD READER INTERFACE MODULE TO POWER SUPPLY AND TO ELECTRIC STRIKE. PROVIDE 4 CONDUCTOR CABLE TO "REX" AND 2 CONDUCTOR CABLE TO DOOR CONTACT STATUS MONITOR DEVICE.
8. PROVIDE RECESSED DOOR CONTACT, GE #1076 SERIES FOR DOOR STATUS MONITOR. PS

CABLE NOTES:

1. DOOR CONTACT CABLE = WHT 2C/22 AWG
2. REQUEST TO EXIST CABLE = BLUE 4C/22 AWG
3. READER CABLE = ORANGE 6C/22 AWG
4. LOCK POWER CABLE = GRAY 4C/18 AWG
5. X = 4C/18 AWG – EXIT DEVICE ALARM SIGNAL TRANSMISSION
6. A = 6C/22 AWG – ACCESS CONTROL SIGNAL TRANSMISSION

NOTES:

1. CONCEAL 3/4" CONDUIT IN WALL.
2. 24V LOCK POWER SUPPLY. COORDINATE WITH HARDWARE SUPPLIER.
3. TO LENEL CARD INTERFACE MODULE AT CONTROL PANEL. REFER TO RISER DIAGRAM, DETAIL 3 THIS SHEET.
4. FISH CABLE THROUGH HOLE DRILLED BY HARDWARE INSTALLER.
5. MOUNT REQUEST TO EXIT DEVICE OVER EGRESS SIDE OF DOOR.
6. EXISTING DOORS TO RECEIVE NEW DOOR HARDWARE AS SCHEDULED.
7. PROVIDE 22/6 SHIELDED CABLE FROM LENEL CARD READER INTERFACE MODULE TO POWER SUPPLY AND TO ELECTRIC STRIKE. PROVIDE 4 CONDUCTOR CABLE TO "REX" AND 2 CONDUCTOR CABLE TO DOOR CONTACT STATUS MONITOR DEVICE.
8. PROVIDE RECESSED DOOR CONTACT, GE #1076 SERIES FOR DOOR STATUS MONITOR. PS



3 PHYSICAL ACCESS CONTROL SYSTEM RISER DIAGRAM
NOT TO SCALE

1-B

Revisions	Date

SHIVEHATTERY
ARCHITECTURE + ENGINEERING
2834 Northgate Drive | Iowa City, Iowa 52245
319.354.3040 | fax: 319.354.6921 | shive-hattery.com
Iowa | Illinois | Missouri

Drawing Title: ELECTRICAL SCHEDULES AND DETAILS

Project Title: RENOVATE AND EXPAND SPACE FOR PATIENT SUPPORT AREAS

Date 12-17-2012 CONSTRUCTION DOCUMENTS

Project No. DVA#636-311 S-H#110240-0

Approved: Division Chief

Building Number 1 | Checked JJH | Drawn DMM

DRAWING NO. 1-B-E6

Approved: Service Director

Location: IOWA CITY VA HEALTH CARE SYSTEM, IOWA CITY, IOWA

Dwg. 7 Of 7

Veterans Administration