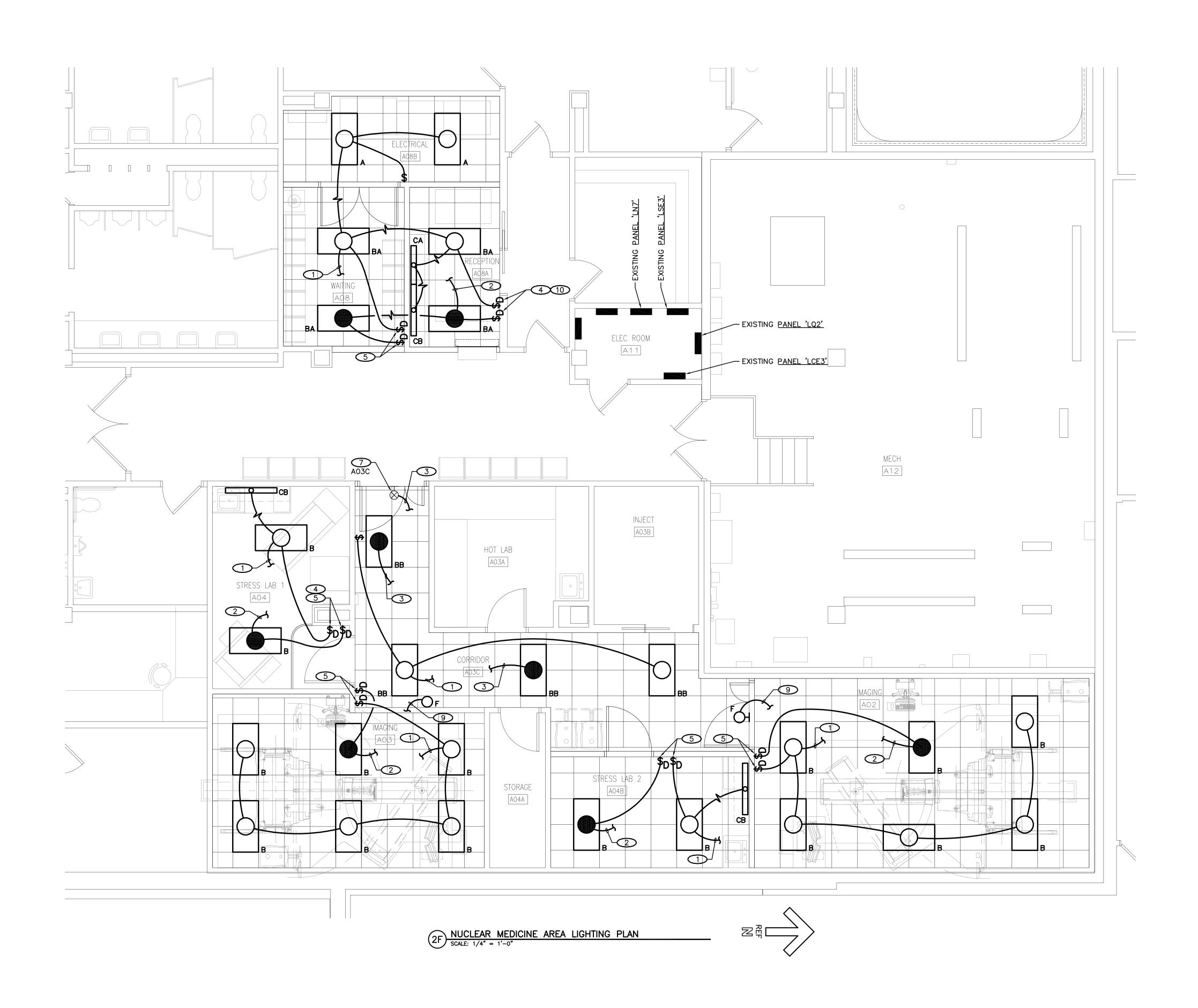
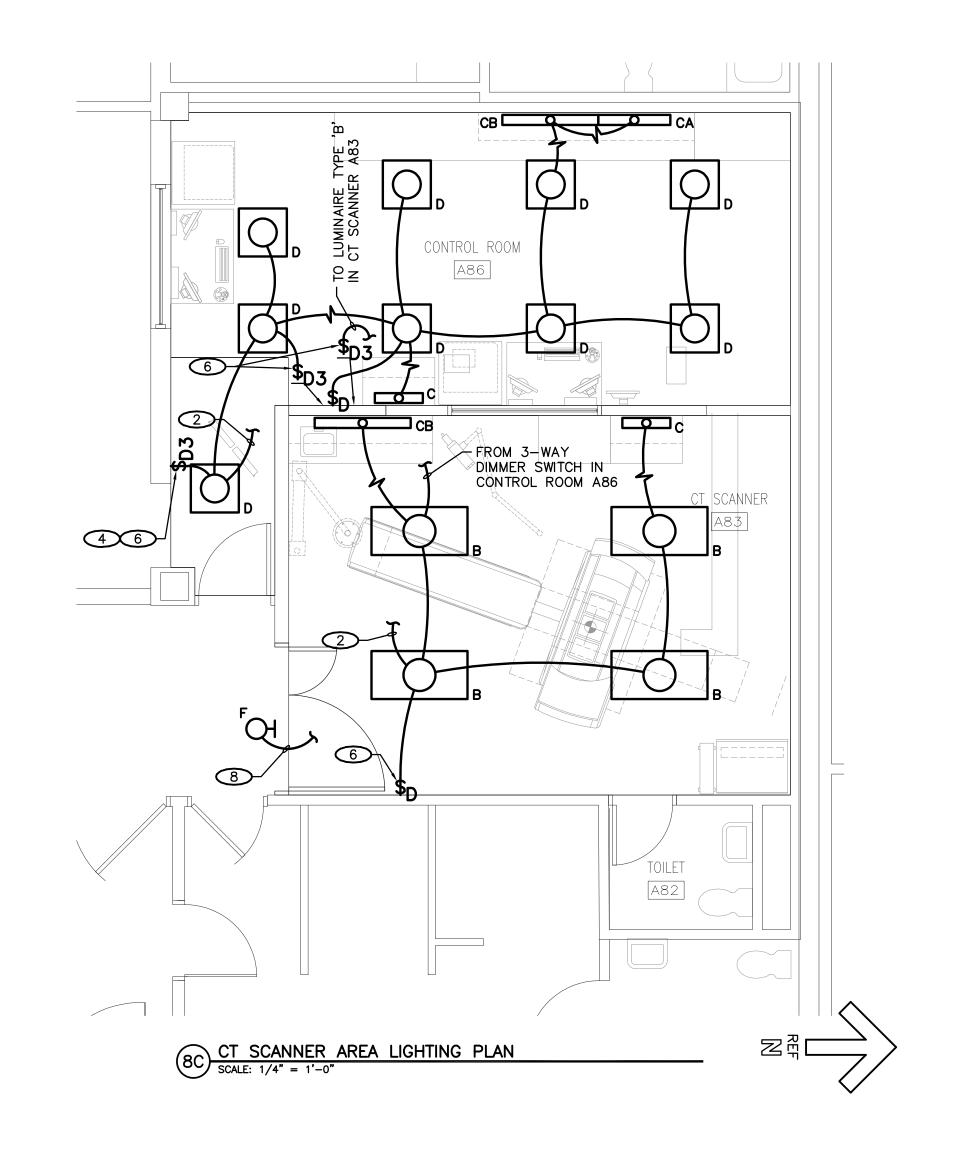
## ELECTRICAL KEYNOTES: (()

- CONNECT EXISTING UNSWITCHED, NORMAL LIGHTING CIRCUIT PRESERVED AT PREVIOUS, APPROXIMATE LUMINAIRE LOCATION.
- CONNECT EXISTING UNSWITCHED, EMERGENCY LIGHTING CIRCUIT (CRITICAL) PRESERVED AT PREVIOUS, APPROXIMATE LUMINAIRE LOCATION.
- CONNECT EXISTING UNSWITCHED, EMERGENCY LIGHTING CIRCUIT (LIFE SAFETY) PRESERVED AT PREVIOUS, APPROXIMATE LUMINAIRE LOCATION.
- REMOVE EXISTING SINGLE POLE SWITCH(ES) AND INSTALL DEVICES IN EXISTING BACKBOX.
- PROVIDE 0-10V WALL BOX DIMMER COMPATIBLE WITH LED LOAD TO BE CONTROLLED. DIMMER SHALL BE PRESET SWITCH WITH SLIDE ADJUSTABLE DIMMING FROM 1% TO 100% OF CONNECTED LUMINAIRE LUMEN OUTPUT. SWITCH SHALL HAVE POSITIVE OFF POSITION.
- PROVIDE 3-WAY, 0-10V WALL BOX DIMMER COMPATIBLE WITH LED LOAD TO BE CONTROLLED. DIMMER SHALL BE PRESET SWITCH WITH SLIDE ADJUSTABLE DIMMING FROM 1% TO 100% OF CONNECTED LUMINAIRE LUMEN OUTPUT. SWITCH SHALL HAVE POSITIVE OFF POSITION.
- 7 RELOCATED, EXISTING SALVAGED LUMINAIRE FROM PREVIOUS ROOM NOTED.
- PROVIDE CONNECTIONS FOR THE 'X-RAY IN USE' LUMINAIRE TO THE PDC OR LINE CONNECTION BOX PER SIEMENS FINAL SITE PREPARATION SUPPORT DOCUMENTS.
- PROVIDE CONNECTIONS FOR THE 'X-RAY IN USE' LUMINAIRE TO THE WARNING LIGHT CONTROL BOX AND CT GANTRY PER GE HEALTHCARE FINAL SITE PREPARATION SUPPORT DOCUMENTS.
- PROVIDE 0-10V WALL BOX DIMMER COMPATIBLE WITH LED LOAD TO BE CONTROLLED. SWITCH SHALL HAVE PASSIVE INFRARED OCCUPANCY SENSOR FOR MANUAL (LAST NON-ZERO STATE) OR AUTOMATIC 'ON' FEATURE. DIMMER SHALL HAVE PRESET 'ON' LEVEL OPTION WITH UP/DOWN BUTTONS ADJUSTABLE DIMMING FROM 1% TO 100% OF CONNECTED LUMINAIRE LUMEN OUTPUT.

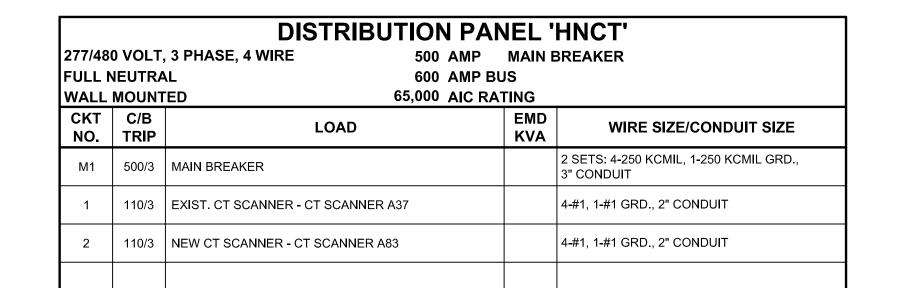


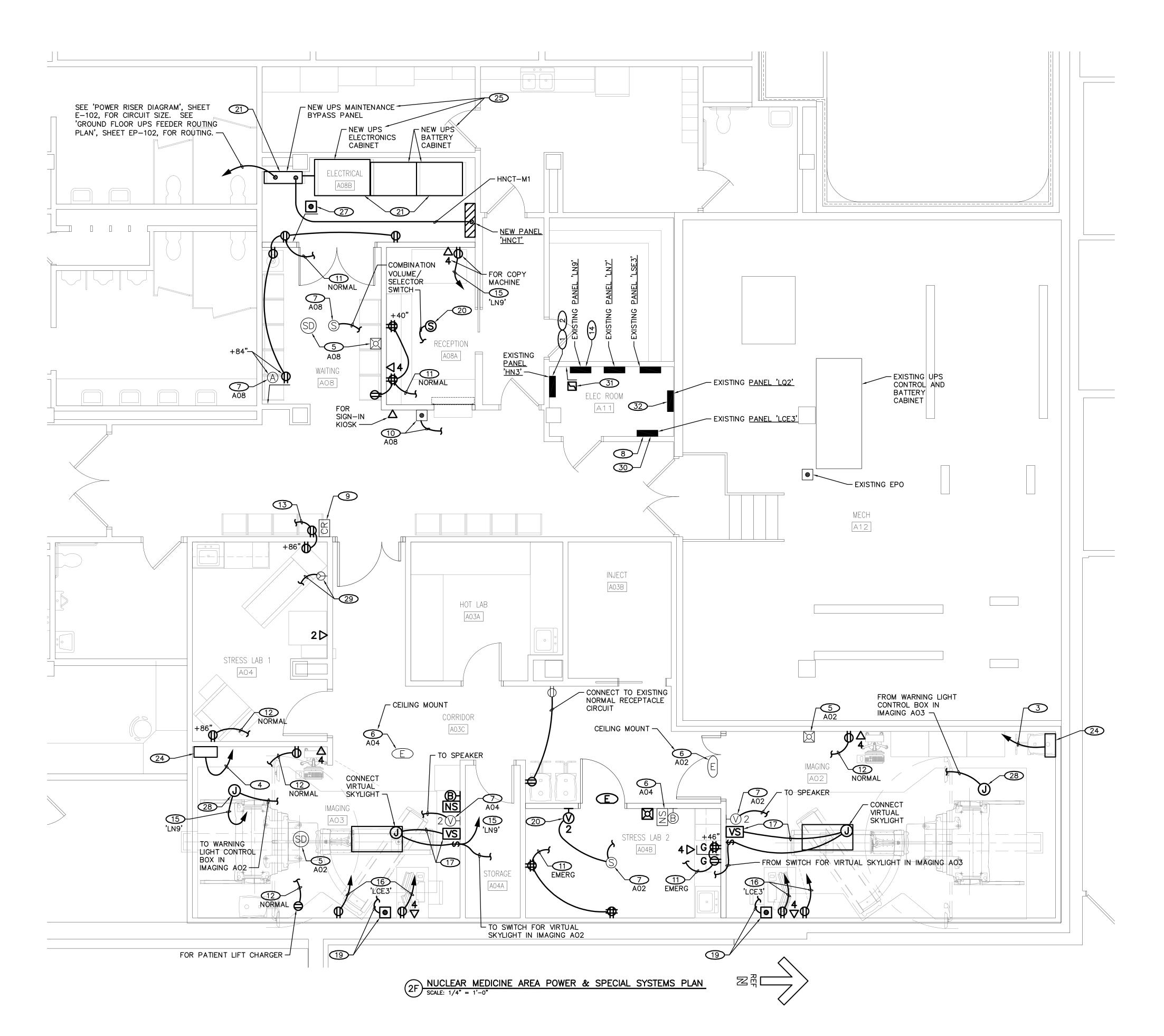




		CONSULTANT		ARCHITECT/ENGINEER OF RECORD		Office of	Drawing Title Lighting Plans	Phase BID DOCUMENTS	Project Title Second CT Scanner		Project Number 438-18-103
BID DOCUMENTS  CONSTRUCTION DOCUMENTS 100% SUBMITTAL — UPDATE	10/10/2018 9/28/2018	Mechanical / Electrical Engineering: Farris Engineering 12700 W Dodge Road	ring: Structural Engineering: Shaffer & Stevens, P.C. 9910 N 48th Street Omaha, NE 68152 (402) 455-7698	A/E: CLH Architects 3705 N 200th St Elkhorn, NE 68022 (402) 291-6941  Calvin L. Hinz	A D D D String S	Construction and Facilities			Site Prep Design		Building Number 5
CONSTRUCTION DOCUMENTS 100% SUBMITTAL  DESIGN DEVELOPMENT 90% SUBMITTAL  SCHEMATIC DESIGN 36% SUBMITTAL 2	9/7/2018 8/3/2018 7/5/2018	Omaha, NE 68154 (402) 330-5900 Robert Hotovy			Calvin L. Hinz	Management	Approved: Project Director		Location Sioux Falls, SD		Drawing Number
SCHEMATIC DESIGN 35% SUBMITTAL  SCHEMATIC DESIGN 35% SUBMITTAL  Revisions:	6/6/2018 Date:		Donn Shaffer	Tim Werner	ARCHITECTS. P.C.	U.S. Department of Veterans Affairs		FULLY SPRINKLERED	Issue Date October 10, 2018 RJ	Drawn JH DMM	EL101

VA FORM 08-6231





ARCHITECT/ENGINEER OF RECORD | STAMP

ARCHITECTS, P.C.

CONSULTANT

Farris Engineering

Omaha, NE 68154

(402) 330-5900

Robert Hotovy

12700 W Dodge Road

10/10/2018

9/28/2018

9/7/2018

8/3/2018

7/5/2018

6/6/2018

**Mechanical / Electrical Engineering** 

Structural Engineering:

Shaffer & Stevens, P.C.

9910 N 48th Street

**Omaha, NE 68152** 

(402) 455-7698

Donn Shaffer

<u>A/E:</u>

**CLH Architects** 

3705 N 200th St

(402) 291-6941

Tim Werner

Elkhorn, NE 68022

## **ELECTRICAL KEYNOTES:**

1 REPLACE EXISTING 100 AMP, 3 POLE, SPARE CIRCUIT BREAKER WITH A NEW 30 AMP, 3 POLE CIRCUIT BREAKER COMPATIBLE WITH EXISTING PANEL (GE, NHB). RETURN REMOVED CIRCUIT BREAKER TO THE COR. NEW CIRCUIT BREAKER AIC RATING SHALL MATCH EXISTING.

WITH 4-#6, 1-#6 GROUND IN 1 1/4" CONDUIT.

2 PROVIDE A 30 AMP, 3 POLE CIRCUIT BREAKER COMPATIBLE WITH EXISTING PANEL (GE, NHB) AND INSTALL IN AVAILABLE SPACE. NEW CIRCUIT BREAKER AIC RATING SHALL MATCH EXISTING.

3 CONNECT 30 AMP, 3 POLE CIRCUIT BREAKER ADDED TO PANEL 'HN3' BY KEYNOTE 1

WITH 4-#6, 1-#6 GROUND IN 1 1/4" CONDUIT. 4 CONNECT 30 AMP, 3 POLE CIRCUIT BREAKER ADDED TO PANEL 'HN3' BY KEYNOTE 2

5 RELOCATED, EXISTING SALVAGED, FIRE ALARM (FA) SYSTEM DEVICE FROM PREVIOUS ROOM NOTED. PROVIDE NEW CIRCUITING TO MATCH EXISTING THAT IS COMPATIBLE WITH EXISTING FA SYSTEM AND CONNECT EXISTING SYSTEM CIRCUITING PRESERVED AT PREVIOUS DEVICE LOCATION.

6 RELOCATED, EXISTING SALVAGED, NURSE CALL SYSTEM DEVICE FROM PREVIOUS ROOM NOTED. PROVIDE NEW CIRCUITING TO MATCH EXISTING THAT IS COMPATIBLE WITH EXISTING NURSE CALL SYSTEM AND CONNECT EXISTING SYSTEM CIRCUITING PRESERVED AT PREVIOUS DEVICE

7 RELOCATED, EXISTING SALVAGED, SOUND/COMMUNICATION SYSTEM DEVICE FROM PREVIOUS ROOM NOTED. PROVIDE NEW CIRCUITING TO MATCH EXISTING THAT IS COMPATIBLE WITH SOUND/COMMUNICATION SYSTEM AND CONNECT EXISTING SYSTEM CIRCUITING PRESERVED AT PREVIOUS DEVICE LOCATION.

8 REPLACE TWO EXISTING 30 AMP, 2 POLE, CIRCUIT BREAKERS AT CIRCUIT POSITIONS 18 AND 22 WITH FOUR NEW 20 AMP, SINGLE POLE CIRCUIT BREAKERS COMPATIBLE WITH EXISTING PANEL (GE, NLAB). RETURN REMOVED CIRCUIT BREAKER TO THE COR. NEW CIRCUIT BREAKER AIC RATING SHALL MATCH EXISTING.

9 RELOCATED, EXISTING SALVAGED, SECURITY SYSTEM DEVICE. PROVIDE NEW CIRCUITING TO MATCH EXISTING THAT IS COMPATIBLE WITH EXISTING ACCESS CONTROL SYSTEM AND CONNECT EXISTING SYSTEM CIRCUITING PRESERVED AT PREVIOUS DEVICE LOCATION.

10 RELOCATED, EXISTING SALVAGED, WALL MOUNTED, DOORBELL PUSHBUTTON. PROVIDE NEW CIRCUITING TO MATCH EXISTING THAT IS COMPATIBLE WITH EXISTING DOORBELL SYSTEM AND

CONNECT EXISTING SYSTEM CIRCUITING PRESERVED AT PREVIOUS DEVICE LOCATION. 11) CONNECT EXISTING 20 AMP CIRCUIT BREAKER (DEDICATED) IN NORMAL OR EMERGENCY

12 CONNECT EXISTING NORMAL OR EMERGENCY RECEPTACLE CIRCUIT AS INDICATED IN THIS AREA WITH CAPACITY CREATED BY THE DEMOLITION OF ADJACENT RECEPTACLES.

CONNECT TO PREVIOUS RECEPTACLE CIRCUIT SERVING THIS SPACE. SEE KEYNOTE 16, SHEET

(EMERG) PANEL SERVING THIS AREA MADE SPARE BY DEMOLITION WORK.

PROVIDE THREE NEW 20 AMP, SINGLE POLE CIRCUIT BREAKERS COMPATIBLE WITH EXISTING PANEL (GE, NLAB) AND INSTALL IN AVAILABLE SPACE. NEW CIRCUIT BREAKER AIC RATING SHALL MATCH EXISTING.

BY KEYNOTE 14 VIA FILTER AND SURGE PROTECTIVE DEVICE (KEYNOTE 31). 16 CONNECT 20 AMP, SINGLE POLE CIRCUIT BREAKER (DEDICATED) ADDED IN PANEL INDICATED

15) CONNECT 20 AMP, SINGLE POLE CIRCUIT BREAKER (DEDICATED) ADDED IN PANEL INDICATED

17) INSTALL AND CONNECT VIRTUAL SKYLIGHT CONTROLLER FURNISHED AS PART OF VIRTUAL SKYLIGHT EQUIPMENT. WALL MOUNT TOUCHSCREEN CONTROLLER PER MANUFACTURER'S

RECOMMENDATIONS. FIELD VERIFY MOUNTING HEIGHT.

BY KEYNOTE 8.

Office of

Construction

and Facilities

Management

18 PROVIDE EMERGENCY POWER 'OFF' (EPO) DEVICE. PROVIDE RED 'MUSHROOM' HEAD, SHUNT TRIP PUSHBUTTON WITH GUARD TO PREVENT ACCIDENTAL ACTIVATION. CONNECT TO ENCLOSED CIRCUIT BREAKER. COORDINATE FINAL LOCATION OF EPO DEVICE WITH THE VA COR AND TYPE TO BE CAPABLE OF FUNCTION/OPERATION AS REQUIRED WHEN CONNECTED PER SIEMENS FINAL SITE PREPARATION SUPPORT DOCUMENTS.

19 PROVIDE EMERGENCY POWER 'OFF' (EPO) DEVICE. PROVIDE RED 'MUSHROOM' HEAD, SHUNT TRIP PUSHBUTTON WITH GUARD TO PREVENT ACCIDENTAL ACTIVATION. CONNECT TO MAIN DISCONNECT PANEL. COORDINATE FINAL LOCATION OF EPO DEVICE WITH THE VA COR AND TYPE TO BE CAPABLE OF FUNCTION/OPERATION AS REQUIRED WHEN CONNECTED PER GE HEALTHCARE FINAL SITE PREPARATION SUPPORT DOCUMENTS.

20 PROVIDE NEW SOUND/COMMUNICATION SYSTEM DEVICE TO MATCH AND BE COMPATIBLE WITH EXISTING SYSTEM CURRENTLY OPERATIONAL IN EXISTING FACILITY. PROVIDE NEW

CIRCUITING TO MATCH EXISTING AND CONNECT SYSTEM DEVICE(S) INDICATED. 21 EQUIPMENT INDICATED IS OWNER FURNISHED AND CONTRACTOR INSTALLED. INSTALL AND MAKE CONNECTIONS PER THE RESPECTIVE EQUIPMENT MANUFACTURER'S INSTRUCTIONS/RECOMMENDATIONS.

FEEDER CIRCUIT FROM UPS TO EXISTING OR NEW CT SCANNER'S POWER DISTRIBUTION CABINET MAIN DISCONNECT SHALL NOT PASS ABOVE THE MRI OR OTHER EXISTING

X-RAY SPACES. COORDINATE ROUTING WITH THE COR PRIOR TO BID. 23 REMOVE EMERGENCY POWER 'OFF' (EPO) CONNECTIONS BETWEEN THE EXISTING CT SCANNER'S POWER DISTRIBUTION CABINÉT AND THE EPO STATION INSTALLED AT THE

UPS EQUIPMENT IN MECH A12. 24 INSTALL AND CONNECT MAIN DISCONNECT PANEL PROVIDED AS PART OF THE SCAN

25 INSTALL THIS EQUIPMENT AS FAR SOUTH AS PRACTICAL TO PROVIDE THE PROPER

CODE CLEARANCE(S) FOR PANEL 'HNCT'. CONNECT 20 AMP, SINGLE POLE CIRCUIT BREAKER ADDED IN PANEL INDICATED BY

KEYNOTE 32 USING 2-#10, 1-#10 GROUND IN 1/2" CONDUIT. PROVIDE EMERGENCY POWER 'OFF' (EPO) DEVICE. PROVIDE RED 'MUSHROOM' HEAD, SHUNT TRIP PUSHBUTTON WITH GUARD TO PREVENT ACCIDENTAL ACTIVATION. CONNECT TO UPS ELECTRONICS CABINET ONLY. COORDINATE FINAL LOCATION OF EPO DEVICE WITH THE VA COR

AND TYPE TO BE CAPABLE OF FUNCTION/OPERATION AS REQUIRED WHEN CONNECTED PER SIEMENS UPS FINAL SITE PLANNING GUIDE DOCUMENTS. 28) PROVIDE WARNING LIGHT CONTROL BOX TO CONSIST OF A 120 VOLT PRIMARY TO 24 VOLT SECONDARY TRANSFORMER (VERIFY SECONDARY VOLTAGE REQUIREMENTS WITH EQUIPMENT

PROVIDER) AND RELAY WITH NORMALLY OPEN 24 VOLT, AC COIL IN NEMA 1 ENCLOSURE. MOUNT BOX AT AN ACCESSIBLE LOCATION ABOVE THE CEILING PER EQUIPMENT PROVIDER'S RECOMMENDATIONS. CONNECT X-RAY WARNING LIGHT AND CT GANTRY PER GE HEALTHCARE FINAL SITE PREPARATION SUPPORT DOCUMENTS.

29 RELOCATED, EXISTING SALVAGED, SPECIAL RECEPTACLE (FOR TREADMILL). CONNECT TO BRANCH CIRCUIT SERVING DEVICE AT PREVIOUS LOCATION. SEE KEYNOTE 17, SHEET ED101 FOR EXISTING LOCATION.

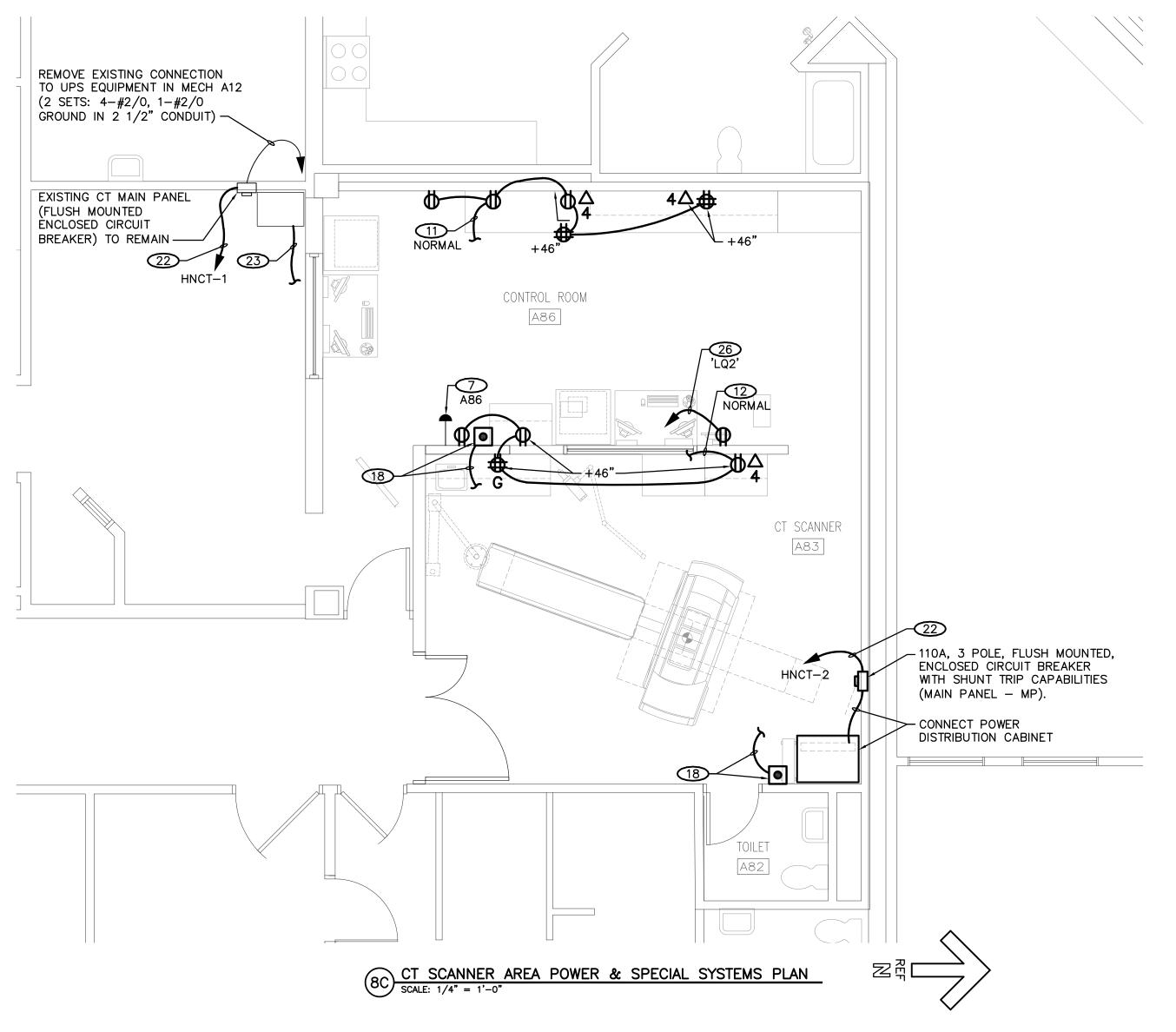
30 REPLACE EXISTING 30 AMP, 2 POLE, CIRCUIT BREAKER AT CIRCUIT POSITION 21 WITH A NEW 20 AMP, 2 POLE CIRCUIT BREAKER COMPATIBLE WITH EXISTING PANEL (GE, NLAB). RETURN REMOVED CIRCUIT BREAKER TO THE COR. NEW CIRCUIT BREAKER AIC RATING SHALL MATCH EXISTING.

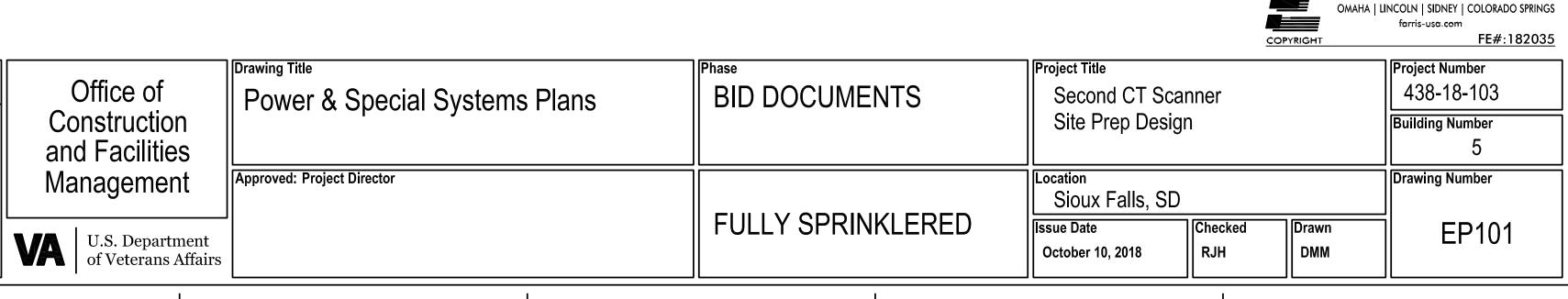
31) PROVIDE POWER FILTER AND SURGE PROTECTION DEVICE EQUAL TO EATON INNOVATIVE TECHNOLOGY MODEL ITCF12030. INSTALL DEVICE IN JUNCTION BOX ADJACENT TO PANEL 'LN9'. SIZE JUNCTION BOX PER THE N.E.C. FOR THE DEVICE, AND LINE AND LOAD CONNECTIONS. PROVIDE LABEL AFFIXED TO JUNCTION BOX COVER INDICATING

'IMAGING ROOMS VIDEO SKYLIGHT'.

PROVIDE ONE NEW 20 AMP, SINGLE POLE CIRCUIT BREAKER COMPATIBLE WITH EXISTING PANEL (GE, NLAB) AND INSTALL IN AVAILABLE SPACE. NEW CIRCUIT BREAKER AIC RATING SHALL

FARRIS ENGINEERING





VA FORM 08-6231

G: \2018\182035\CAD\Electrical\182035\_EP101.dwg EP101 10/11/18 9:24am DMM

BID DOCUMENTS

Revisions:

CONSTRUCTION DOCUMENTS 100% SUBMITTAL - UPDATE

CONSTRUCTION DOCUMENTS 100% SUBMITTAL

DESIGN DEVELOPMENT 90% SUBMITTAL

SCHEMATIC DESIGN 36% SUBMITTAL 2

SCHEMATIC DESIGN 35% SUBMITTAL