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ELECTRCIAL ABBREVIATIONS

AAP	AREA ALARM PANEL
AFC	ABOVE FINISHED COUNTER
AFF	ABOVE FINISHED FLOOR
ATS	AUTOMATIC TRANSFER SWITCH
BFC	BELOW FINISHED CEILING
BOF	BOTTOM OF FIXTURE
C	CONDUIT
CB,C/B OR CKT BKR	CIRCUIT BREAKER
CKT	CIRCUIT
CCTV	CLOSED CIRCUIT T.V.
CLG	CEILING
CUH	CABINET HEATER
EC	EMPTY CONDUIT
ELEC	ELECTRIC
E	EMERGENCY
EMS	ENERGY MANAGEMENT SYSTEM
EP	EXPLOSION PROOF
EWC	ELECTRIC WATER COOLER
EX	EXISTING
F	FUSE
FA	FIRE ALARM
FACP, FAP	FIRE ALARM CONTROL PANEL
FCU	FAN COIL UNIT
FIXT	FIXTURE
FLR	FLOOR
FLUOR	FLUORESCENT
FTP, FTS	FAN TERMINAL UNIT
FTU	FAN TERMINAL UNIT
FUT	FUTURE
G, GND	GROUND (EQUIPMENT)
GEF	GENERAL EXHAUST FAN
GEN	GENERATOR
GFCI, GFI	GROUND FAULT CIRCUIT INTERRUPTER
HP	HORSE POWER
HV	HIGH VOLTAGE
HWAT	HEAT TRACE
IC	INTERRUPTING CAPACITY
ICAND	INCANDESCENT
IG	ISOLATED GROUND
JB	JUNCTION BOX
KEF	KITCHEN EXHAUST FAN
LTG	LIGHTING
LTS	LIGHTS
LV	LOW VOLTAGE
MATV	MASTER ANTENNA
MCB	MAIN CIRCUIT BREAKER
MCC	MOTOR CONTROL CENTER
MDP	MAIN DISTRIBUTION PANEL
MH	MANHOLE
MLO	MAIN LUGS ONLY
MTD	MOUNT OR MOUNTED
N	NEW DEVICE
NC (N.C.)	NORMALLY CLOSED
NEC	NATIONAL ELECTRIC CODE
NF	NONFUSED
NIC	NOT IN CONTRACT
NL	NIGHT LIGHT
NO (N.O.)	NORMALLY OPEN
PB	PULL BOX
PNL	PANEL
PWR	POWER
R	REMOVE DEVICES
RL	RELOCATED DEVICE
RCPT(S) OR RECEPT	RECEPTACLE(S)
RF	RETURN AIR FAN
SEF	SMOKE EXHAUST FAN
SF	SUPPLY AIR FAN
SO (S.O.)	SPACE ONLY
SP	SPARE
ST (S.T.)	SHUNT TRIP
SW	SWITCH
TEL	TELEPHONE
TF	TRANSFER FAN
TP	TAMPER PROOF
TV	TELEVISION
TVSS	TRANSIENT VOLTAGE SURGE SUPPRESSION
UF	UNDERFLOOR
UG	UNDERGROUND
UH	UNIT HEATER
UNO (U.N.O.)	UNLESS NOTED OR INDICATED OTHERWISE
V	VOLTAGE
VFD	VARIABLE FREQUENCY DRIVE
VP	VAPOR PROOF
VV	VARIABLE VOLUME UNIT
W	WIRE
W/	WITH
WG	WIRE GUARD
WP	WEATHER PROOF
WT	WATER TIGHT
XFMR	TRANSFORMER
+xx	MOUNTING HEIGHT IN INCHES. AFF UNO.

KEY TO GENERAL NOTATIONS AND MOUNTING HEIGHTS

48" AFF INDICATES TO TOP OF DEVICE;
18" AFF INDICATES TO CENTER OF DEVICE;
60" AFF INDICATES TO BOTTOM OF DEVICE;
80" AFF INDICATES TO BOTTOM OF DEVICE;
ALL OTHER MOUNTING HEIGHTS REFER TO CENTERLINE OF DEVICE.

(2) – LEGEND NOTES: DENOTES "SEE LEGEND NOTE NO. 2"

(7) – EQUIPMENT (ID) NUMBER FOR FOOD SERVICE EQUIPMENT. REFER TO FOOD SERVICE DOCUMENTS FOR DEFINITION AND REQUIREMENTS.

(717620) OR 717620 – EQUIPMENT (ID) NUMBER FOR OWNER PROVIDED EQUIPMENT. REFER TO OWNER'S EQUIPMENT BOOK / FF&E DOCUMENTS FOR DEFINITION AND REQUIREMENTS.

02/E-202 – DENOTES: REFERENCE 2 IN DRAWING (SHEET) E-202

20.4 – FEEDER TAG. FEEDER SIZES ARE DETERMINED BY THE FEEDER SCHEDULE ON E-6000.

DEMOLITION/RENOVATION SYMBOLS NOTES

1. SYMBOLS WHEN SHOWN DASHED INDICATE EXISTING TO BE REMOVED.
2. SUBSCRIPT 'EX' NEXT TO ANY OF THE ABOVE SYMBOLS INDICATES EXISTING TO REMAIN.
3. SUBSCRIPT 'R' NEXT TO A SYMBOL INDICATES EXISTING TO BE REMOVED.

MISC. HOSPITAL SYMBOLS LEGEND

SYMBOL	DESCRIPTION	MTG. HT. UNO (SEE NOTE 1)
TV	COMBINATION POWER AND MATV OUTLET FOR WALL MOUNTED TELEVISION. PROVIDE THREE GANG BOX WITH (1) 20A DUPLEX RCPT & MATV SIGNAL OUTLET AND TV CONTROLS. COORDINATE WITH VENDOR SHOP DRAWINGS.	REFER TO ARCH. ELEVS.
HE	HEAD-END EQUIPMENT	AS REQUIRED
MPR	MUSIC AND PAGING SYSTEM CENTRAL EQUIPMENT CABINET	AS REQUIRED
TVJ	MATV SYSTEM JUNCTION BOARD (SIZE AS REQUIRED)	–
SSA	STEREO CABINET. WALL MOUNTED – STUB 3/4" C. ABOVE ACCESSIBLE CEILING FROM OUTLET BOX.	60" AFF
C	CLOCK OUTLET. CONFIRM BACKBOX SIZE WITH VENDOR SHOP DRAWINGS. PROVIDE 3/4" CONDUIT STUBBED ABOVE NEAREST ACCESSIBLE CEILING WITH NYLON PULLCORD.	80" AFF
	ELAPSE TIME CLOCK OUTLET. CONFIRM BACKBOX SIZE WITH VENDOR SHOP DRAWINGS. PROVIDE 3/4" CONDUIT STUBBED ABOVE NEAREST ACCESSIBLE CEILING WITH NYLON PULLCORD.	80" AFF
EMS	EMS RADIO CONSOLE	X
H	EMERGENCY RADIO HEAR CONSOLE	X
HB	HEAR BASE STATION	X
AAP	MEDICAL GAS AREA ALARM PANEL	X

FIRE ALARM SYMBOLS LEGEND

SYMBOL	DESCRIPTION	MTG. HT. UNO (SEE NOTE 1)
F	FIRE ALARM PULL STATION	48"AFF
F	FIRE ALARM AUDIBLE VISUAL SIGNAL	80"AFF
F	FIRE ALARM AUDIBLE SIGNAL	80"AFF
F	FIRE ALARM VISUAL SIGNAL	80"AFF
FS	FIRE ALARM SPRINKLER FLOW SWITCH	–
TS	FIRE ALARM SPRINKLER TAMPER SWITCH	–
PS	FIRE ALARM SPRINKLER PRESSURE SWITCH	–
FD	SMOKE DETECTOR CEILING OR WALL MOUNTED	–
FD P	SMOKE DETECTOR PATIENT SLEEPING ROOM CEILING OR WALL MOUNTED	–
FH	HEAT DETECTOR CEILING OR WALL MOUNTED	–
FD	DUCT SMOKE DETECTOR	–
S	FIRE ALARM SPEAKER CEILING OR WALL MOUNTED	–
MHO	SMOKE DOOR MAGNETIC HOLD OPEN, CONNECT TO FIRE ALARM SYSTEM – STUB 3/4" C. ABOVE ACCESSIBLE CEILING FROM OUTLET	–
FACP	FIRE ALARM CONTROL PANEL	–
FAAP	FIRE ALARM ANNUNCIATOR PANEL	–
FP	TELEPHONE JACK FOR FIREMAN'S PHONE (BY FIRE ALARM CONTRACTOR). CONTRACTOR TO PROVIDE BACKBOX AND CONDUIT TO ABOVE ACCESSIBLE CEILING ONLY.	48" AFF
FPH	WARDEN STATION TELEPHONE FOR FIREMAN'S PERMANENT HANDSET (BY FIRE ALARM CONTRACTOR)	48" AFF
FPAP	FIRE PUMP ANNUNCIATOR PANEL	–
FCP	FIREFIGHTER'S CONTROL PANEL	–

NURSE CALL SYMBOLS LEGEND

SYMBOL	DESCRIPTION	MTG. HT. UNO
NCC	NURSE CALL CABINET	–
NCS	NURSE CALL CONTROL STATION	–
N	NURSE CALL PATIENT STATION	–
N S	NURSE CALL STAFF STATION	–
N D	NURSE CALL DUTY STATION	–
N SD	NURSE CALL STAFF DUTY STATION	–
N CB	NURSE CALL CODE BLUE STATION	–
N T	NURSE CALL EMERGENCY TOILET STATION	–
	NURSE CALL CORRIDOR DOME LIGHT	–
	NURSE CALL CORRIDOR ZONE LIGHT	–
S	CEILING SPEAKER	–

CONFIRM ALL BACKBOX SIZES WITH VENDOR SHOP DRAWINGS PRIOR TO ELECTRICAL ROUGH-IN. PROVIDE 3/4" CONDUIT FROM BOX TO ABOVE ACCESSIBLE CEILING.

LIGHTING SYMBOLS LEGEND

SYMBOL	DESCRIPTION	MTG. HT. UNO (SEE NOTE 1)
	2'x4' FLUORESCENT LIGHT FIXTURE ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x4' FLUORESCENT LIGHT FIXTURE ON LIFE SAFETY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	2'x4' FLUORESCENT LIGHT FIXTURE ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	2'x4' FLUORESCENT LIGHT FIXTURE W/INBOARD LAMPS ON NORMAL CIRCUIT AND OUTBOARD LAMPS ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x4' FLUORESCENT LIGHT FIXTURE W/INBOARD LAMPS ON LIFE SAFETY CIRCUIT AND OUTBOARD LAMPS ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x4' FLUORESCENT LIGHT FIXTURE W/INBOARD LAMPS ON CRITICAL CIRCUIT AND OUTBOARD LAMPS ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x2' FLUORESCENT LIGHT FIXTURE ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x2' FLUORESCENT LIGHT FIXTURE ON LIFE SAFETY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	2'x2' FLUORESCENT LIGHT FIXTURE ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	2'x2' FLUORESCENT LIGHT FIXTURE W/INBOARD LAMPS ON NORMAL CIRCUIT AND OUTBOARD LAMPS ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x2' FLUORESCENT LIGHT FIXTURE W/INBOARD LAMPS ON LIFE SAFETY CIRCUIT AND OUTBOARD LAMPS ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	2'x2' FLUORESCENT LIGHT FIXTURE W/INBOARD LAMPS ON CRITICAL CIRCUIT AND OUTBOARD LAMPS ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	WALL MOUNTED LINEAR FIXTURE ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	WALL MOUNTED LINEAR FIXTURE ON LIFE SAFETY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	WALL MOUNTED LINEAR FIXTURE ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	RECESSED/SURFACE MOUNTED LINEAR FIXTURE ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	RECESSED/SURFACE MOUNTED LINEAR FIXTURE ON LIFE SAFETY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	RECESSED/SURFACE MOUNTED LINEAR FIXTURE ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	RECESSED/SUSPENDED DOWNLIGHT FIXTURE ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	WALL MOUNTED FIXTURE ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	RECESSED/SUSPENDED DOWNLIGHT FIXTURE ON LIFE SAFTEY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	WALL MOUNTED FIXTURE ON LIFE SAFETY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	RECESSED/SUSPENDED DOWNLIGHT FIXTURE ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	WALL MOUNTED FIXTURE ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	RECESSED DOWNLIGHT FIXTURE WITH WALL WASH TRIM ON NORMAL CIRCUIT.	SEE FIXTURE SCHEDULE
	RECESSED DOWNLIGHT FIXTURE WITH WALL WASH TRIM ON LIFE SAFETY CIRCUIT OR LEGALLY REQUIRED STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	RECESSED DOWNLIGHT FIXTURE WITH WALL WASH TRIM ON CRITICAL CIRCUIT OR NON-ESSENTIAL STANDBY SYSTEM.	SEE FIXTURE SCHEDULE
	WALL MOUNTED FIXTURE OR DECORATIVE SCONCE.	SEE FIXTURE SCHEDULE
	CEILING MOUNTED EXIT SIGN. SHADING INDICATES DOUBLE OR SINGAL FACE. ARROW INDICATE CHEVRON DIRECTIONS.	SEE FIXTURE SCHEDULE
	END MOUNTED EXIT SIGN. SHADING INDICATES DOUBLE OR SINGAL FACE. ARROW INDICATE CHEVRON DIRECTIONS.	SEE FIXTURE SCHEDULE
	WALL MOUNTED EXIT SIGN. SHADING INDICATES DOUBLE OR SINGAL FACE ARROW INDICATE CHEVRON DIRECTIONS.	SEE FIXTURE SCHEDULE
	WALL MOUNTED 90-MINUTE BATTERY-POWERED EGRESS LIGHTING.	SEE FIXTURE SCHEDULE
	EXTERIOR LIGHT POLE FIXTURE.	SEE FIXTURE SCHEDULE
	EXISTING EXTERIOR LIGHT POLE FIXTURE.	SEE FIXTURE SCHEDULE
X	SPOT LIGHT SWITCHED ON NORMAL CIRCUIT. LETTER INDICATES FIXTURE TYPE.	SEE FIXTURE SCHEDULE
X	FLOOD LIGHT SWITCHED ON NORMAL CIRCUIT. LETTER INDICATES FIXTURE TYPE.	SEE FIXTURE SCHEDULE
	TRACK LIGHTING	SEE FIXTURE SCHEDULE
$	WALL SWITCH SPST, 20A, 120/277V	48" AFF
$2	DOUBLE POLE TOGGLE SWITCH, 20A/208/480V	48" AFF
$3	3-WAY WALL SWITCH, 20A, 120/277V	48" AFF
$4	4-WAY WALL SWITCH, 20A, 120/277V	48" AFF
$DA	WALL BOX DIMMER SWITCH (A=600W, B=1000, C=1500, D=2000)	48" AFF
$K	KEY OPERATED WALL SWITCH	48" AFF
$T	WALL SWITCH WITH ADJUSTABLE COUNTDOWN TIMER	48" AFF
$3D	3-WAY WALL DIMMER SWITCH, 20A, 120/277V	48" AFF
$3K	3-WAY, KEY OPERATED WALL SWITCH, 20A, 120/277V	48" AFF
$MC	MOMENTARY WALL SWITCH, 20A, 120/277V	48" AFF
$B	LIGHTING CONTROL SWITCH BANK FOR MUTIPLE SWITCHES, REFER TO DETAIL FOR QUANTITY OF SWITCHES IN BANK.	48" AFF
$LV	LOW VOLTAGE WALL SWITCH	48" AFF
$OS	WALL MOUNTED OCCUPANCY SENSOR SWITCH, PASSIVE TECHNOLOGY	48" AFF
OS	CEILING MOUNTED OCCUPANCY SENSOR, PASSIVE TECHNOLOGY	–
OS D	CEILING MOUNTED OCCUPANCY SENSOR, DUAL TECHNOLOGY	–

WIRING DEVICE SYMBOLS LEGEND

SYMBOL	DESCRIPTION	MTG. HT. UNO (SEE NOTE 1)
	SINGLE RECEPTACLE – 20A/125V/2P/3W/G NEMA 5-20R	18" AFF
	DUPLEX RECEPTACLE – 20A/125V/2P/3W/G NEMA 5-20R	18" AFF
	DUPLEX RCPT. SPLIT-WIRED – 20A/125V/2P/3W/G NEMA 5-20R	18" AFF
GFCI	DUPLEX RCPT. GFCI – 20A/125V/2P/3W/G NEMA 5-20R	18" AFF
TH	QUADRAPLEX RECEPTACLE (TWO DUPLEX RCPTS. UNDER ONE COVERPLATE)	18" AFF
H	DUPLEX RECEPTACLE MOUNTED HORIZONTALLY IN SPLASHGAURD	18" AFF
E	DUPLEX RECEPTACLE ON EMERGENCY CIRCUIT	18" AFF
S	DUPLEX RECEPTACLE, SAFETY TYPE (TAMPERPROOF)	18" AFF
TP	DUPLEX RCPT, TAMPER PROOF-20A/125V/2P/3W/G NEMA 5-20R	18" AFF
	SPECIAL PURPOSE RECEPTACLE (NEMA NO. AS INDICATED)	18" AFF
	DUPLEX RECEPTACLE MOUNTED ABOVE COUNTERTOP	8" AFC OR 42" AFF
	QUADRAPLEX RECEPTACLE (TWO DUPLEX RCPTS. UNDER ONE COVERPLATE) MOUNTED 8" ABOVE COUNTERTOP	8" AFC OR 42" AFF
E	DUPLEX RECEPTACLE MOUNTED 8" ABOVE COUNTERTOP ON EMERGENCY CIRCUIT	8" AFC OR 42" AFF
TE	QUADRAPLEX RECEPTACLE (TWO DUPLEX RCPTS. UNDER ONE COVERPLATE) MOUNTED 8" ABOVE COUNTERTOP ON EMERG. CIRC.	8" AFC OR 42" AFF
	FLOOR MOUNTED RECEPTACLE – FLUSH MOUNTED, UNO	–
PM	DUPLEX RCPT FOR PATIENT MONITORING – PROVIDE AT SAME HEIGHT AS DATA OUTLET – REFER TO COMM. PLANS FOR MOUNTING HEIGHT	–
PROX CAB	DUPLEX RCPT FOR PROXIMITY CABINET – PROVIDE AT SAME HEIGHT AS DATA OUTLET – REFER TO COMM. PLANS FOR MOUNTING HEIGHT	–
	JUNCTION BOX – SIZE & MOUNTING AS REQUIRED	AS REQUIRED
	MULTIOUTLET ASSEMBLY – LENGTH AND OUTLET SPACING AS INDICATED	AS REQUIRED
	PUSHBUTTON	48" AFF
PP	POWER POLE	–
30/3/3	DISCONNECT SWITCH – 30/30/3 INDICATES 30A, 30AMP FUSED, 3-POLE.	AS REQUIRED
30/-/3	DISCONNECT SWITCH – 30/-/3 INDICATES 30A, NONFUSED, 3-POLE.	AS REQUIRED
CB 30/3	CIRCUIT BREAKER DISCONNECT SWITCH – THERMAL MAGNETIC CB IN NEMA 1 ENCLOSURE; AMPS/POLES AS INDICATED	AS REQUIRED
2	MOTOR STARTER FVNR UNO; NUMBER INDICATES NEMA SIZE	AS REQUIRED
CB	COMBINATION MOTOR CONTROLLER/DISCONNECT SWITCH	AS REQUIRED
M	MANUAL MOTOR STARTER SWITCH WITH THERMAL OVERLOAD AND PILOT LIGHT	AS REQUIRED
	MOTOR	–
	208/120V PANELBOARD	–
	480/277V PANELBOARD	–
	DISTRIBUTION PANELBOARD	–
	EQUIPMENT CONNECTION	–
	CIRCUIT CONDUCTOR INDICATION (NEUTRAL, PHASE, EQUIPMENT GROUND, ISOLATED GROUND, SWITCH LEG)	–
	CIRCUIT HOMERUN TO PANELBOARD (2 #12, 1#12G, 3/4"C. 20A/1P CB UNO)	–
	CONDUIT INSTALLED IN CEILING SPACE OF FLOOR BELOW.	–
X,X,X	THREE SINGLE POLE DEVICE CIRCUIT NUMBERS	–
X/X/X	MULTI-POLE DEVICE CIRCUIT NUMBERS	–
RG	ROOM GROUND	AS REQUIRED
PG	PATIENT GROUND	AS REQUIRED
	EMERGENCY POWER OFF BUTTON. WALL MOUNTED – REFER TO VENDOR DRAWINGS FOR ADDITIONAL REQUIREMENTS	AS REQUIRED
DHTA	DECONTAMINATION HOLDING TANK ALARM – PANEL PROVIDED UNDER DIV 22	AS REQUIRED
GAP	GENERATOR ANNUNCIATOR PANEL	AS REQUIRED
MGAP	MEDICAL GAS ALARM PANEL – PANEL PROVIDED UNDER DIV 22	AS REQUIRED
AAP	AREA ALARM PANEL – PANEL PROVIDED UNDER DIV 22	AS REQUIRED
	GROUND BAR	–
T	STEP-DOWN TRANSFORMER	–
TVSS	TRANSIENT VOLTAGE AND SURGE SUPPRESSOR DEVICE	–

MECHANICAL/ELECTRICAL SYSTEM COORDINATION SCHEDULE

SYSTEM	FURNISHED BY	INSTALLED BY	POWER WIRING BY	CONTROL OR SUPERVISION WIRING BY
LIFE SAFETY SYSTEM	---	---	---	---
SMOKE DAMPER/ACTUATOR	DIV 15	DIV 15	DIV 16	DIV 16
FIRE/SMOKE DAMPER/ ACTUATOR	DIV 15	DIV 15	DIV 16	DIV 16
DUCT SMOKE DETECTOR	DIV 16	DIV 15	----	DIV 16

THIS TABLE IS PROVIDED AS A GUIDE TO THE DOCUMENT PREPARATION AND IN NO WAY INDICATES CONTRACTOR MEANS AND METHODS

THIS SHEET OF DRAWINGS HAS NOT BEEN REVIEWED FOR CODE COMPLIANCE.

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PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

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ELECTRICAL SYMBOLS & LEGENDS

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WHEN PLOTTED AT FULL SIZE THIS SHEET MEASURES 24"x36"

GENERAL NOTES

GENERAL CONDITIONS

A1 THE DRAWINGS ARE GENERALLY DIAGRAMMATIC AND IT IS THE INTENT AND MEANING OF THE CONTRACT DOCUMENTS THAT THE CONTRACTOR SHALL PROVIDE AN ELECTRICAL INSTALLATION THAT IS COMPLETE AND ALL ITEMS AND APPURTENANCES NECESSARY, REASONABLE INCIDENTAL, OR CUSTOMARILY INCLUDED, EVEN THOUGH EACH AND EVERY ITEM IS NOT SPECIFICALLY CALLED OUT OR SHOWN. THE CONTRACTOR SHALL PROVIDE ALL EQUIPMENT, MATERIALS, LABOR, SUPERVISION AND SERVICE NECESSARY SO AS TO PROVIDE A COMPLETE, FUNCTIONING ELECTRICAL SYSTEM IN SAFE WORKING ORDER.

A2 SYMBOLS FOR VARIOUS ELEMENTS AND SYSTEMS ARE SHOWN ON THE DRAWINGS. SHOULD THERE BE ANY DOUBT REGARDING THE MEANING OR INTENT OF THE SYMBOLS USED, AN INTERPRETATION SHALL BE OBTAINED FROM THE ARCHITECT IN WRITING. THE DECISION OF THE ARCHITECT SHALL BE FINAL.

A3 IT SHALL BE THE RESPONSIBILITY OF EACH CONTRACTOR TO EXAMINE THE CONTRACT DOCUMENTS CAREFULLY BEFORE SUBMITTING HIS BID, WITH PARTICULAR ATTENTION TO ERRORS, OMISSIONS, CONFLICTS WITH PROVISIONS OF LAWS AND CODES HAVING JURISDICTION, CONFLICTS BETWEEN DRAWINGS OR DRAWINGS AND SPECIFICATIONS, AND AMBIGUOUS DEFINITION OF THE EXTENT OF COVERAGE BETWEEN CONTRACTS. ANY SUCH DISCREPANCY SHALL BE BROUGHT IMMEDIATELY TO THE ATTENTION OF THE ARCHITECT FOR CORRECTION. SHOULD ANY OF THESE ERRORS, OMISSIONS, CONFLICTS, OR AMBIGUITIES EXIST, THE CONTRACTOR SHALL HAVE THEM EXPLAINED AND ADJUSTED IN WRITING BEFORE SIGNING THE CONTRACT OR PROCEEDING WITH THE WORK; OTHERWISE, HE SHALL, AT HIS OWN EXPENSE, SUPPLY THE PROPER MATERIALS AND LABOR TO MAKE GOOD ANY DAMAGE OR DEFECTS IN HIS WORK OR THE RESULTS OBTAINED THEREFROM, CAUSED BY SUCH DISCREPANCY.

A4 WHEREVER CONFLICTS OCCUR BETWEEN DIFFERENT PARTS OF THE CONTRACT DOCUMENTS, THE GREATER QUANTITY, THE BETTER QUALITY, OR LARGER SIZE SHALL PREVAIL UNLESS THE ARCHITECT INFORMS THE CONTRACTOR OTHERWISE IN WRITING.

A5 THE SCALE OF EACH DRAWING IS RELATIVELY ACCURATE; ANY DIMENSIONS SHOWN ARE APPROXIMATE TO CENTERLINE FROM ASSUMED BUILDING PERIMETER. THE CONTRACTOR SHALL OBTAIN THE NECESSARY DIMENSIONS FOR ANY EXACT TAKEOFFS FROM THE ARCHITECT. NO ADDITIONAL COST TO THE OWNER WILL BE CONSIDERED FOR FAILURE TO OBTAIN EXACT DIMENSIONS WHERE NOT CLEAR OR IN ERROR ON THE DRAWINGS. ANY DEVICE OR FIXTURE ROUGHED IN IMPROPERLY AND NOT POSITIONED ON IMPLIED CENTER-LINES OR AS REQUIRED BY GOOD PRACTICE MUST BE REPOSITIONED AT NO COST TO THE OWNER.

A6 ALL WORK AND MATERIALS SHALL BE GUARANTEED FREE FROM DEFECTS FOR A MINIMUM PERIOD OF ONE YEAR UNLESS NOTED OTHERWISE. THE WARRANTY PERIOD SHALL BEGIN AT THE DATE OF BENEFICIAL OCCUPANCY OF THE FACILITY.

A7 THE CONTRACTOR IS RESPONSIBLE FOR FILING AND PAYING ALL FEES AND OBTAINING NECESSARY PERMITS AND CERTIFICATES OF INSPECTION. THE CONTRACTOR SHALL DELIVER ALL CERTIFICATES OF INSPECTION TO OWNER/CONSTRUCTION MANAGER INCLUDING COPIES WITH MAINTENANCE MANUALS.

A8 ONLY EXPERIENCED CRAFTSMEN KNOWLEDGEABLE IN THEIR RESPECTIVE TRADE SHALL PERFORM THE WORK DESCRIBED IN THE CONSTRUCTION DOCUMENTS.

A9 ALL WORK SHALL BE DONE IN ACCORDANCE WITH THE LATEST ADDITION OF NFPA STANDARD 70 (NATIONAL ELECTRICAL CODE). CONTRACTOR SHALL ALSO CONFORM TO ALL APPLICABLE LOCAL CODES AND AMENDMENTS.

A10 ALL ELECTRICAL EQUIPMENT, INCLUDING BUT NOT LIMITED TO SWITCHGEAR, CONDUIT, WIRE, BOXES AND FITTINGS SHALL BE NEW AND SHALL MEET NEMA AND ANSI STANDARDS AND SHALL BEAR THE UL LABEL.

A11 PROVIDE SHOP DRAWINGS FOR ENGINEER'S REVIEW FOR ALL ELECTRICAL EQUIPMENT, DEVICES, AND MATERIALS PROPOSED TO BE PROVIDED UNDER THIS CONTRACT. ANY DEVIATIONS FROM ITEMS SPECIFIED SHALL BE CLEARLY IDENTIFIED AND SEPARATELY SUBMITTED WITH A FORMAL SUBSTITUTION REQUEST. REFER TO SPECIFICATIONS (PROJECT MANUAL) FOR REQUIREMENTS.

ELECTRICAL EQUIPMENT

B1 PROVIDE AN IDENTIFICATION NAMEPLATE FOR EACH ELECTRICAL EQUIPMENT, APPURTENANCE DEPICTING THE DESIGNATION INDICATED ON THE DRAWINGS. REFER TO SPECIFICATIONS FOR EXACT REQUIREMENTS.

B2 CONTRACTOR SHALL COORDINATE AND SCHEDULE ALL POWER OUTAGES WITH OWNER'S REPRESENTATIVE.

B3 CONTRACTOR SHALL NOT USE PERMANENT INK WHEN MAKING FIELD MARKINGS OR TEMPORARY CIRCUIT LABELS ON PANELS. CONTRACTOR SHALL USE REMOVABLE TAPE/TAGS FOR ALL TEMPORARY MARKINGS AND SHALL REMOVE THESE TEMPORARY MARKINGS AT THE CONCLUSION OF THIS PROJECT.

CONDUIT & RACEWAY

C1 ALL WORK SHALL BE COORDINATED SO THAT INTERFERENCES ARE AVOIDED. PROVIDE ALL NECESSARY OFFSETS IN CONDUITS, RACEWAYS, ETC., REQUIRED TO PROPERLY INSTALL THE WORK. EXPOSED WORK MUST BE KEPT AS CLOSE AS POSSIBLE TO WALLS, CEILINGS, COLUMNS, ETC., SO AS TO TAKE UP MINIMUM AMOUNT OF SPACE; ALL OFFSETS, FITTINGS, ETC., REQUIRED SHALL BE PROVIDED WITHOUT ADDITIONAL EXPENSE TO THE OWNER. WORK SHALL BE COORDINATED WITH OTHER TRADES.

C2 CONDUIT RUNS ARE DIAGRAMMATIC IN NATURE. CONTRACTOR IS RESPONSIBLE FOR SIZING AND LOCATING PULL BOXES PER N.E.C. AND FOR COORDINATION WITH OTHER DISCIPLINES.

C3 PENETRATIONS OF WALLS, FLOORS, AND ROOFS FOR THE PASSAGE OF ELECTRICAL RACEWAYS SHALL BE APPROVED BY THE STRUCTURAL ENGINEER OF RECORD PRIOR TO THE COMMENCEMENT OF WORK. ALL SUCH PENETRATIONS SHALL BE PROPERLY SEALED OFF AFTER INSTALLATION OF RACEWAY SO AS TO MAINTAIN THE STRUCTURAL, WATER PROOF, AND FIRE PROOF INTEGRITY OF THE WALL, FLOOR, OR ROOF SYSTEM PENETRATED.

C4 ALL EMPTY CONDUIT SYSTEMS SHALL CONTAIN A PULL WIRE FOR FUTURE PULLING OF CONDUCTORS.

BRANCH CIRCUITS AND FEEDERS

D1 UNLESS NOTED OTHERWISE, ALL CIRCUITS 100' OR LESS SHALL BE MINIMUM #12 AWG WIRE SIZE. CIRCUITS OVER 100' BUT LESS THAN 200' SHALL BE MINIMUM #10 AWG WIRE SIZE. CIRCUITS OVER 200' SHALL BE MINIMUM #8 AWG WIRE SIZE.

D2 ALL POWER WIRING SHALL BE INSTALLED IN CONDUIT. CONDUCTOR SIZES #12 AWG AND SMALLER SHALL BE SOLID. CONDUCTOR SIZES #10 AWG AND LARGER MAY BE STRANDED.

D3 A SEPARATE INSULATED EQUIPMENT GROUNDING CONDUCTOR SHALL BE PULLED WITH THE CIRCUIT CONDUCTORS FOR GROUNDING WHETHER OR NOT INDICATED ON THE DRAWINGS. METAL RACEWAY, OR A CABLE ARMOR OR SHEATH SHALL NOT BE USED AS AN EQUIPMENT GROUNDING CONDUCTOR.

D4 CONTRACTOR SHALL GROUND ALL EQUIPMENT AND ELECTRICAL SYSTEM PER N.E.C.

WIRING DEVICES

E1 REFER TO ARCHITECTURAL DRAWINGS AND SPECIFICATIONS FOR LOCATION AND MOUNTING HEIGHT OF ALL WALL AND FLOOR MOUNTED ELEMENTS (OUTLETS, LIGHT SWITCHES, CONTROLLERS, POKE-THRU, ETC). ALL WALL/FLOOR MOUNTED ITEMS SHALL BE INSTALLED IN ACCORDANCE WITH THE ARCHITECTURAL DIMENSIONED DRAWINGS. IF LOCATION FOR AN ITEM IS NOT SHOWN ON THE ARCHITECTURAL DRAWINGS, VERIFY THE EXACT LOCATION OF THE ITEM WITH THE ARCHITECT PRIOR TO INSTALLATION. THESE REQUIREMENTS APPLY TO ALL WALL/FLOOR TYPES IN ALL AREAS. DO NOT SCALE OR DIMENSION LOCATIONS FROM THESE DRAWINGS.

E2 CONTRACTOR SHALL COORDINATE THE LOCATION AND INSTALLATION DETAIL OF OUTLETS IN MILLWORK WITH ARCHITECTURAL DRAWINGS (WALL ELEVATIONS, MILLWORK DETAILS, ETC.) AND WITH MILLWORK MANUFACTURER PRIOR TO ELECTRICAL ROUGH-IN.

E3 WALL AND FLOOR MOUNTED POWER RECEPTACLES SHOWN NEAR DATA OUTLETS SHALL BE LOCATED WITHIN SIX (6) INCHES OF THE DATA OUTLET. LOCATE AT SAME MOUNTING HEIGHT UNLESS NOTED OTHERWISE.

E4 PROVIDE METAL BACKBOX MOUNTING BRACKET (CADDY #RBS SERIES OR SIMILAR) TO MOUNT DEVICE BETWEEN METAL/WOOD STUDS AT SAME ELEVATION AND EQUAL SPACING.

E5 CONTRACTOR SHALL VERIFY THE EXACT POWER CONNECTION TYPE AND NEMA CONFIGURATION OF RECEPTACLES FOR EQUIPMENT FURNISHED BY THE OWNER, OTHER TRADES, OR UNDER A SEPARATE SECTION OF THIS CONTRACT PRIOR TO ELECTRICAL ROUGH-IN.

E6 MOUNT ALL RECEPTACLES THROUGHOUT THE PROJECT WITH THE GROUND POLE AT THE TOP OF THE CONFIGURATION WHEN MOUNTED VERTICALLY, AND ON THE RIGHT WHEN MOUNTED HORIZONTALLY.

E7 ALL RECEPTACLES WITHIN SIX FEET OF ANY PLUMBING FIXTURE AND/OR SINK SHALL BE EQUIPPED WITH GFCI FOR PERSONNEL PROTECTION.

E8 ALL GFCI RECEPTACLES SHALL BE CONNECTED SO THAT ALL DEVICES ON THE SAME CIRCUIT AS THE GFCI RECEPTACLE DO NOT DE-ENERGIZE UPON TRIPPING. ALL GFCI RECEPTACLES SHALL INCLUDE A LOCK-OUT FUNCTION TO PROTECT AGAINST THE USE OF MISWIRED DEVICES OR DEVICES THAT HAVE BEEN DAMAGED DUE TO DISABLING SURGES.

E9 FINISH COLORS OF DEVICES AND CORRESPONDING COVER PLATES SHALL BE SELECTED AND APPROVED BY THE ARCHITECT. SPECIALTY RECEPTACLES AND COVERPLATES (I.E. ISOLATED GROUND, EMERGENCY, CRITICAL BRANCH, SURGE SUPPRESSION, ETC.) SHALL BE THE COLOR NOTED IN ELECTRICAL CONSTRUCTION DOCUMENTS.

E10 POKE-THRU DEVICES SHALL BE BE LISTED AND LABLED FOR FIRE RATING OF FLOOR-CEILING ASSEMBLY. ALL FLOOR CORES SHALL BE LOCATED/SPACED IN A MANNER THAT DOES NOT DECREASE THE FIRE RATING OF THE FLOOR-CEILING ASSEMBLY BASED ON THE LATEST NFPA AND UL STANDARDS FOR FLOOR-CEILING ASSEMBLIES.

E11 PROVIDE SAFETY (TAMPER-PROOF) RECEPTACLES IN ALL DAY-CARE ROOMS AND PUBLIC WAITING SPACES.

LIGHTING SYSTEM

G1 REFER TO ARCHITECTURAL DRAWINGS AND SPECIFICATIONS FOR LOCATION OF ALL CEILING ELEMENTS (LIGHTS, SPRINKLERS, DIFFUSERS, ETC). ALL CEILING MOUNTED ITEMS SHALL BE INSTALLED IN ACCORDANCE WITH THE ARCHITECTURAL DIMENSIONED DRAWINGS. IF LOCATION FOR AN ITEM IS NOT SHOWN ON THE ARCHITECTURAL DRAWINGS, VERIFY THE EXACT LOCATION OF THE ITEM WITH THE ARCHITECT PRIOR TO INSTALLATION. THESE REQUIREMENTS APPLY TO ALL CEILING TYPES IN ALL AREAS. DO NOT SCALE OR DIMENSION LOCATIONS FROM THESE DRAWINGS.

G2 CONTRACTOR SHALL PROVIDE AND INSTALL ALL SUPPORTS FOR LIGHT FIXTURES. SUPPORTS SHALL BE INDEPENDENT OF THE CEILING GRID SUPPORT SYSTEM.

G3 LIGHT SWITCHES LOCATED IN A ROOM SHALL CONTROL ALL THE LIGHT FIXTURES IN THAT ROOM UNLESS NOTED OTHERWISE. CONTRACTOR SHALL GANG TOGETHER ALL SWITCHES/DIMMERS UNDER A SINGLE COVER PLATE IN ALL AREAS THAT REQUIRE MORE THAN ONE SWITCH TO CONTROL ELECTRICAL DEVICES.

G4 WALLBOX DIMMERS SHALL BE INSTALLED IN A MANNER SUCH THAT THEIR LISTED WATTAGE IS NOT DERATED DUE TO HEAT. SPACE ACCORDING TO DIMMER MANUFACTURER'S RECOMMENDATIONS AND PROVIDE 'WIDE-FIN' DESING DIMMERS WHERE REQUIRED.

G5 IN INSTANCES WHERE A TRACK LIGHTING SYSTEM, DIMMING SYSTEM, AND/OR LIGHTING CONTROL SYSTEM IS SPECIFIED, THE CONTRACTOR SHALL COORDINATE ALL NECESSARY COMPONENTS OF SUCH SYSTEM(S) WITH THE MANUFACTURER PRIOR TO BID AND INCLUDE ALL NECESSARY ACCESSORIES TO INSTALL A COMPLETE AND FUNCTIONING SYSTEM.

G6 ALL LIGHT FIXTURES SHALL BE INSTALLED WITH APPROPRIATE LAMPS AS INDICATED. FIXTURES SHALL ALSO BE INSTALLED WITH BALLASTS WHERE NECESSARY.

OCCUPANCY SENSOR NOTES:

G7 ALL SENSOR LOCATIONS ARE APPROXIMATE. REFER TO MANUFACTURER'S INSTALLATION INSTRUCTIONS PRIOR TO INSTALLATION.

G8 ULTRASONIC CEILING MOUNT SENSORS SHOULD BE LOCATED A MINIMUM OF SIX (6) FEET FROM HVAC SUPPLY/RETURN VENTS.

G9 CONTRACTOR IS RESPONSIBLE FOR PROPER SENSITIVITY AND TIME DELAY SETTINGS FOR NON-ADAPTIVE PRODUCTS, FOLLOWING THE MANUFACTURER'S RECOMMENDED PLACEMENT, AND FIELD VERIFICATION OF CIRCUITS WITH RESPECT TO POWER PACK PLACEMENT.

G10 CONTRACTOR IS RESPONSIBLE FOR FIELD VERIFICATION OF REQUIRED NUMBER OF POWER PACKS:
A. ONE POWER PACK IS REQUIRED FOR EACH CONTROLLED CIRCUIT;
B. SEVERAL SENSORS AND ADD-A-RELAYS CAN BE WIRED IN PARALLEL TO A SINGLE POWER PACK, NOT TO EXCEED 150mA TOTAL POWER CONSUMPTION;
C. IF MULTIPLE CIRCUITS ARE TO BE CONTROLLED BY A SINGLE SENSOR, AUXILIARY RELAYS MAY BE USED IN CONJUNCTION WITH A POWER PACK.

G11 SENSORS MOUNTED OVER DOORWAYS SHOULD BE PLACED ONE (1) FOOT INSIDE THRESHOLD.

MECHANICAL & PLUMBING COORDINATION

H1 CONTRACTOR SHALL REFERENCE THE MECHANICAL AND PLUMBING DRAWINGS FOR ALL EQUIPMENT NEEDING ELECTRICAL CONNECTIONS. MAKE ALL CONNECTIONS AND PROVIDE APPROPRIATE WIRE, CONDUIT, AND OVERCURRENT PROTECTION FOR ALL EQUIPMENT.

H2 DISCONNECTING MEANS FOR ALL MECHANICAL AND PLUMBING EQUIPMENT SHALL BE MOUNTED INDEPENDENTLY OF THE EQUIPMENT.

H3 ALL CIRCUIT BREAKERS SERVING MECHANICAL EQUIPMENT SHALL BEAR AN 'HACR' RATING.

H4 CONTRACTOR SHALL COORDINATE BETWEEN TRADES AND PROVIDE CONTROL POWER FOR ALL VAV BOXES/DAMPERS/ETC, AS REQUIRED TO ENSURE A COMPLETE, FULLY FUNCTIONAL HVAC SYSTEM. SHOULD AN EXACT CIRCUIT NUMBER NOT BE INDICATED ON ELECTRICAL DRAWINGS, CONTRACTOR SHALL UTILIZE AVAILABLE 20A/1P SPACE FROM THE NEAREST 208V/120V PANEL OR FROM BUILDING CONTROL POWER DISTRIBUTION SYSTEM.

H5 CONTRACTOR SHALL COORDINATE MOTOR DISCONNECT AND CONTROL WITH MECHANICAL DRAWINGS AND BETWEEN TRADES.

H6 COORDINATE ALL REQUIRED ENERGY MANAGEMENT SYSTEM POINTS AND CONTACT CONNECTIONS TO ENSURE THE COMPLETE AND PROPER OPERATION OF ALL SYSTEMS.

H7 ALL DISCONNECTS DOWN STREAM OF VFDs SHALL BE PROVIDED WITH AUXILIARY CONTACTS TO SHUT DOWN UPSTREAM VFD WHEN SWITCH IS OPENED.

EMERGENCY POWER SYSTEM

I1 ALL EMERGENCY SYSTEMS SHALL BE RUN IN A SEPARATE RACEWAY/CONDUIT SYSTEM AND SHALL BE CLEARLY LABELED AS SUCH.

ELEVATOR

J1 N/A

MISC

K1 CONTRACTOR IS RESPONSIBLE FOR PULLING CABLE FOR THE FOLLOWING SYSTEMS: VOICE/DATA/FIBER CABLE, NURSE CALL, COORDINATE WITH OWNER'S REPRESENTATIVE FOR REQUIREMENTS.

K2 THE ENGINEERED SYSTEMS, INCLUDING: NURSE CALL, DICTATION, CODE BLUE, SOUND SYSTEMS, TELEVISION, RADIO, ETC. SHALL BE OWNER PROVIDED WITH STANDARD BACK BOXES AND CONDUITS STUBBED ABOVE THE CEILING, FURNISHED AND INSTALLED BY THE CONTRACTOR. SPECIAL BOXES WILL BE PROVIDED BY THE VENDOR AND INSTALLED BY THE CONTRACTOR. THE CONTRACTOR SHALL PULL ALL CABLE PROVIDED BY OTHERS, FOR THESE SYSTEMS.

K3 REFER TO AND COORDINATE WITH MEDICAL EQUIPMENT PRODUCT DATA BOOKS FOR ELECTRICAL CONNECTION REQUIREMENTS FOR ALL MEDICAL EQUIPMENT. COORDINATE EXACT REQUIREMENTS PRIOR TO INSTALLATION.

K4 PROVIDE 120V LIFE SAFETY CIRCUIT CONNECTIONS TO ALL FIRE ALARM EXTENDER PANELS. COORDINATE WITH VENDOR SHOP DRAWINGS EXACT QUANTITY AND LOCATION OF ALL PANELS.

K5 PROVIDE 120V EQUIPMENT POWER CIRCUIT TO ALL PNEUMATIC TUBE TRANSFER STATIONS. COORDINATE WITH VENDOR SHOP DRAWINGS EXACT QUANTITY AND LOCATIONS OF ALL STATIONS.

K6 PROVIDE BACKBOX AND CONDUIT PATHWAYS FOR ALL CM DRAWINGS. REFER TO CM DRAWINGS FOR EXACT QUANTITIES AND LOCATIONS OF SLEEVES, DEVICE BACKBOXES AND CONDUITS.

ELECTRICAL DEMOLITION NOTES

1. PROVIDE UPDATED, TYPE WRITTEN DIRECTORY OF ALL CORRECT CIRCUITS WITH LOAD DEFINITIONS FOR EACH PANEL BOARD. DIRECTORY SHALL BE LOCATED INSIDE PANEL DOOR.
2. INFORMATION PROVIDED ON THESE DRAWINGS HAVE BEEN TAKEN FROM DESIGN DRAWING AND FIELD OBSERVATIONS. CONTRACTOR SHALL VERIFY ALL EXISTING CONDITIONS PRIOR TO PRICING AND COMMENCEMENT OF WORK.
3. WHERE EXISTING WALLS ARE DEMOLISHED, REMOVE ALL EXISTING ELECTRICAL DEVICES AND THEIR ASSOCIATED CONDUITS AND WIRING BACK TO THE POINT OF ORIGINATION. ENERGIZE ALL EXISTING DEVICES THAT WERE INTERRUPTED DURING DEMOLITION. WHERE ENTIRE CIRCUITS ARE REMOVED, TURN THE CIRCUIT BREAKER OFF AND LABEL AS "SPARE".
4. PROVIDE FOR ANY AND ALL DEMOLITION WORK NECESSARY TO ACCOMMODATE ALL NEW CONSTRUCTION, INCLUDING ARCHITECTURAL, MECHANICAL, PLUMBING OR ELECTRICAL WORK.
5. IF DEMOLITION IS REQUIRED TO INSTALL AN ITEM, THE CONTRACTOR SHALL RESTORE THE AREA TO PREVIOUS CONDITION, OR REPLACE DAMAGED ITEMS WITH NEW ITEMS TO MATCH EXISTING.
6. DESIGNATION 'EX' REPRESENTS EXISTING DEVICE OR LIGHT FIXTURE TO REMAIN AS CIRCUITED AND SWITCHED UNLESS NOTED OTHERWISE. EXISTING LIGHT FIXTURES SHALL BE CLEANED AND REPAIRED AS REQUIRED.
7. A DEVICE WITH AN 'R' INDICATES EXISTING DEVICE TO BE REMOVED INCLUDING ALL ASSOCIATED CONDUIT AND WIRING.
8. CONTRACTOR SHALL REMOVE ALL CONDUIT AND WIRING ASSOCIATED WITH DEVICES AND EQUIPMENT TO BE REMOVED AND/OR RELOCATED UNLESS NOTED OTHERWISE. PROVIDE AND INSTALL ALL NECESSARY DEVICES, EQUIPMENT AND ACCESSORIES REQUIRED TO MAINTAIN SERVICE TO ALL "EXISTING TO REMAIN" DEVICES AND EQUIPMENT THAT MAY BE INTERRUPTED DURING DEMOLITION.
9. WHERE EXISTING MECHANICAL/PLUMBING EQUIPMENT IS DEMOLISHED, REMOVE ALL RELATED ELECTRICAL FEEDS TO THE EQUIPMENT AND THEIR ASSOCIATED CONDUITS BACK TO THE POINT OF ORIGINATION.
10. SPACE ALLOCATIONS FOR MATERIALS, EQUIPMENT AND DEVICES HAVE BEEN MADE ON THE BASIS OF PRESENT AND KNOWN FUTURE REQUIREMENTS AND THE DIMENSIONS OF ITEMS OF EQUIPMENT OR DEVICES OF A PARTICULAR MANUFACTURER WHETHER INDICATED OR NOT. THE CONTRACTOR SHALL VERIFY THAT ALL MATERIALS, EQUIPMENT AND DEVICES PROPOSED FOR USE ON THIS PROJECT ARE WITHIN THE CONSTRAINTS OF THE ALLOCATED SPACE.
11. REFER TO ARCHITECTURAL PLANS FOR AREAS WHERE CEILING IS DEMOLISHED. REMOVE ALL LIGHTING FIXTURES AND ASSOCIATED CONDUIT AND WIRING FROM THESE LOCATIONS.
12. ALL RECEPTACLES WITHIN THE PROJECT SCOPE SHALL BE HOSPITAL GRADE TYPE. IF A DEVICE IS INDICATED AS EXISTING TO REMAIN AND IS NOT A HOSPITAL GRADE RECEPTACLE, REPLACE THE EXISTING DEVICE WITH A HOSPITAL GRADE RECEPTACLE AND RECONNECT TO EXISTING CIRCUIT.
13. ALL LIGHTING FIXTURES DEMOLISHED UNDER THESE DRAWINGS SHALL BE RETURNED TO THE OWNER.

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PLAN NORTH

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ELECTRICAL GENERAL & DEMO NOTES

sheet number

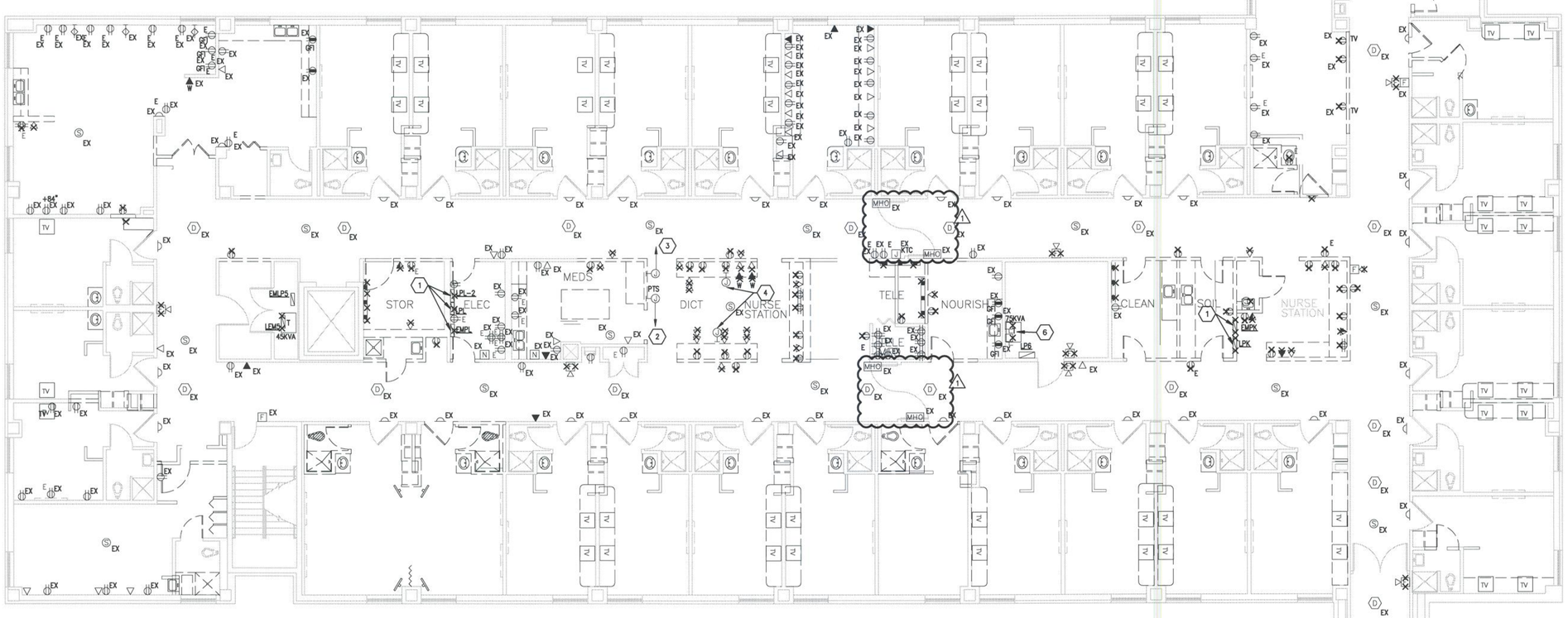
E0.01

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LEGEND NOTES

1. PANEL TO BE RELOCATED. REFER TO NEW FLOOR PLANS FOR ADDITIONAL INFORMATION. AT A MINIMUM A NEW PANEL WILL NEED TO BE PROVIDED AND ALL EXISTING CIRCUITS WILL NEED TO BE INTERCEPTED AND RE-FED TO NEW PANEL LOCATION. CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL NECESSARY CONDUIT AND CONDUCTORS TO EXTEND EXISTING CIRCUITS TO NEW LOCATION.
2. RELOCATE EXISTING TUBE STATION CIRCUIT. REFER TO SHEET E2.01 FOR EXACT LOCATION OF NEW TUBE STATION.
3. RELOCATE EXISTING FIRE ALARM ANNUNCIATOR PANEL. REFER TO E4.01 FOR NEW LOCATION.
4. RELOCATE EXISTING 120V LIFE SAFETY CIRCUIT PREVIOUSLY FEEDING MEDICAL GAS AREA ALARM PANEL. REFER TO SHEET E2.01 FOR EXACT LOCATION OF NEW WORK.
5. NOT USED
6. DEMOLISH EXISTING DISCONNECT SWITCHES & WIREWAY ON SECONDARY SIDE OF TRANSFORMER.

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1 ADDENDUM #4	08.05.09

PLAN NORTH

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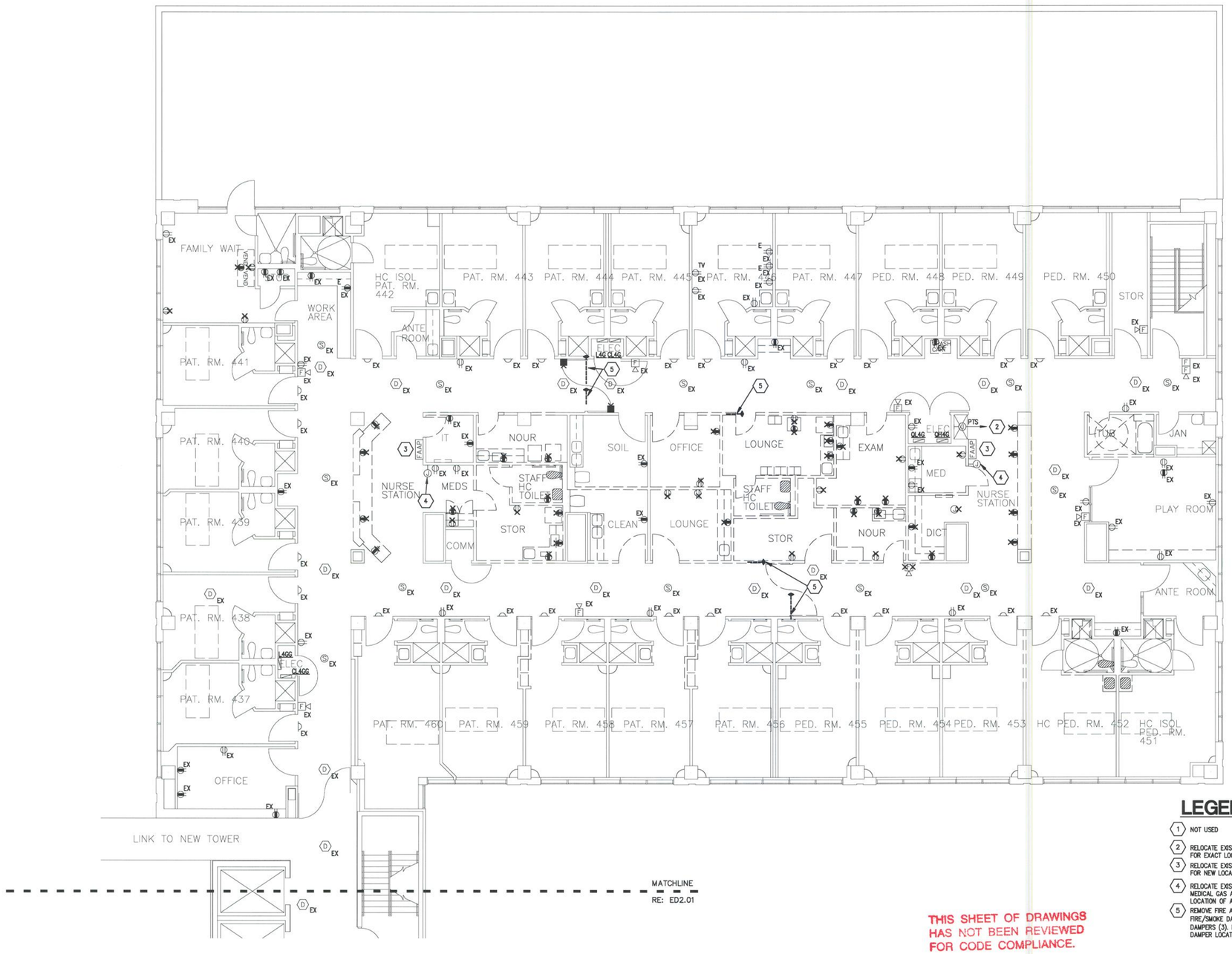
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sheet title

FOUR WEST POWER PLAN DEMOLITION

sheet number
ED2.01

drawn by CW checked by MM

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LEGEND NOTES

1. NOT USED
2. RELOCATE EXISTING TUBE STATION CIRCUIT. REFER TO SHEET E2.01 FOR EXACT LOCATION OF NEW TUBE STATION.
3. RELOCATE EXISTING FIRE ALARM ANNUNCIATOR PANEL. REFER TO E4.01 FOR NEW LOCATION.
4. RELOCATE EXISTING 120V LIFE SAFETY CIRCUIT PREVIOUSLY FEEDING MEDICAL GAS AREA ALARM PANEL. REFER TO SHEET E2.01 FOR EXACT LOCATION OF AREA ALARMS.
5. REMOVE FIRE ALARM CONNECTION AND ASSOCIATED POWER WIRING TO FIRE/SMOKE DAMPERS. RELOCATE 120V CIRCUIT TO NEW FIRE/SMOKE DAMPERS (3). REMOVED DAMPERS = 9. REFER TO E2.01 FOR NEW DAMPER LOCATIONS.

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PLAN NORTH

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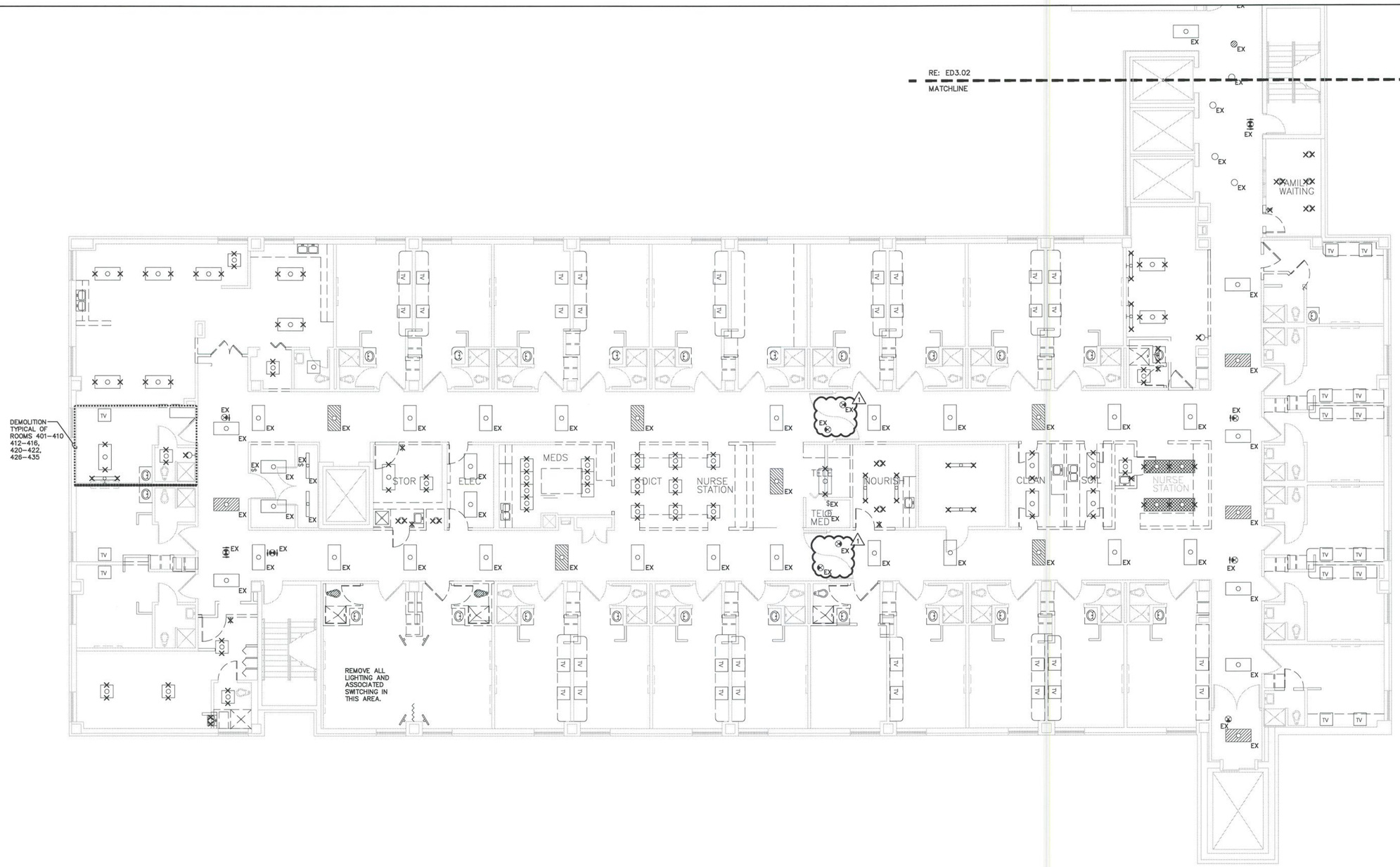
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FOUR EAST POWER PLAN DEMOLITION

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FOUR WEST LIGHTING PLAN DEMOLITION

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FOUR EAST LIGHTING PLAN DEMOLITION

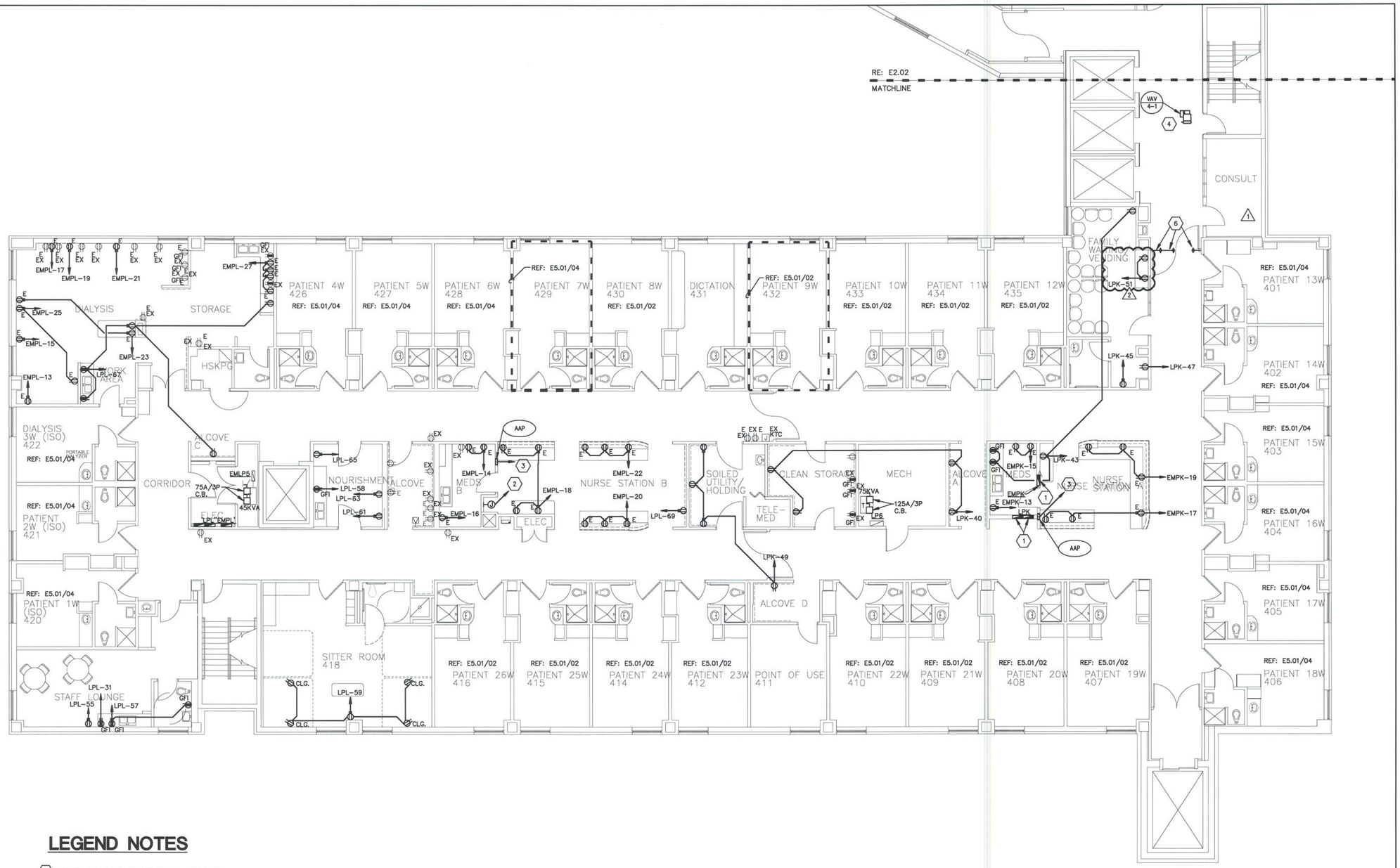
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LEGEND NOTES

1. PROVIDE NEW PANEL IN THIS LOCATION. MIGRATE EXISTING CIRCUITS PREVIOUSLY FED FROM REMOVED PANEL TO NEW PANEL. CONTRACTOR SHALL PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS TO EXTEND EXISTING CIRCUITS TO NEW PANEL LOCATION.
2. RELOCATE EXISTING PNUEMATIC TUBE STATION CIRCUIT TO NEW TUBE STATION LOCATION. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS FOR EXTENSION OF THE EXISTING CIRCUIT.
3. RELOCATE EXISTING 120V LIFE-SAFETY AREA ALARM CIRCUIT TO AAP LOCATION. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS FOR EXTENSION OF THE EXISTING CIRCUIT.
4. PROVIDE 120V CONTROLS CIRCUIT FROM EXISTING CONTROLS CIRCUIT FEEDING OTHER VAV BOXES WITHIN SPACE. PROVIDE FEED VIA 2#12,1#12G,3/4"C.
5. REPLACE EXISTING RECEPTACLE WITH GFCI RECEPTACLE. CONNECT TO EXISTING CIRCUIT.
6. PROVIDE 120V, EQUIPMENT BRANCH CONNECTION FROM REMOVED FIRE/SMOKE DAMPERS. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS FOR THE EXTENSION OF THE EXISTING CIRCUIT PREVIOUSLY FEEDING FIRE/SMOKE DAMPERS.

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
DATE APPROVED AUG 13 2009

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0906700

AA 0002293
EB 0005176

MEDICAL CENTER OF AURORA

FOURTH FLOOR RENOVATION

1501 S. POTOMAC ST.
AURORA, CO 80012

consultants/construction managers

CCRD Partners
8301 E. Prentice Ave.
Suite 200
Greenwood Village, CO 80111

303-694-4755

Howel Construction
550 Lipan St.
Denver, CO 80204

303-899-4787

seal/signature

08-05-09
COLORADO LICENSED
JOSEPH LEE
PROFESSIONAL ENGINEER

issued for	date
CONSTRUCTION	07/15/2009

item	date
1 PLAN REVIEW RESPONSE	07.29.09
2 ADDENDUM #4	08.05.09

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan
sheet title

FOUR WEST POWER PLAN

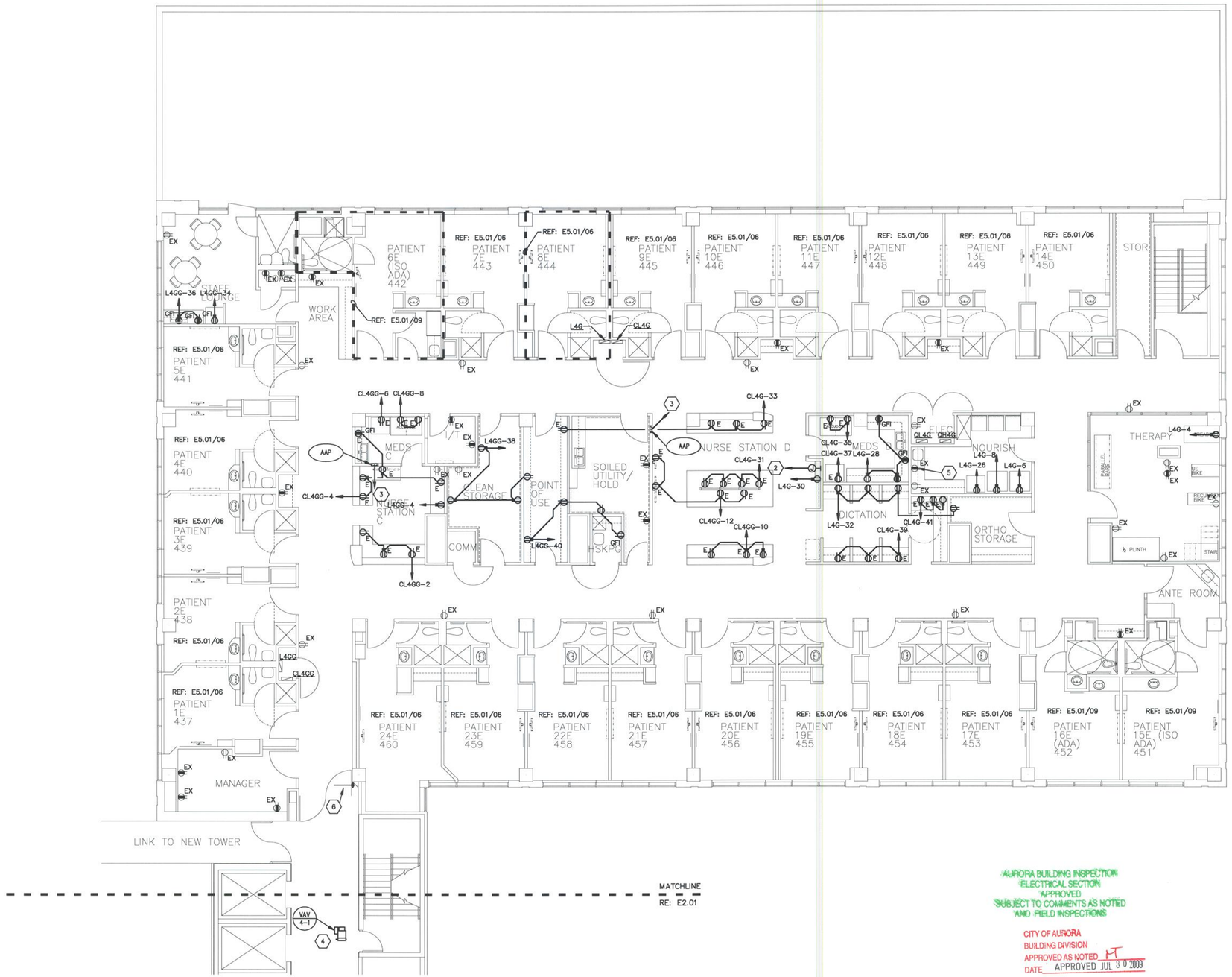
sheet number
E2.01

drawn by CW checked by MM

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WHEN PLOTTED AT FULL SIZE THIS SHEET MEASURES 24"x36"

LEGEND NOTES

1. PROVIDE NEW PANEL IN THIS LOCATION. MIGRATE EXISTING CIRCUITS PREVIOUSLY FED FROM REMOVED PANEL TO NEW PANEL. CONTRACTOR SHALL PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS TO EXTEND EXISTING CIRCUITS TO NEW PANEL LOCATION.
2. RELOCATE EXISTING PNUEMATIC TUBE STATION CIRCUIT TO NEW TUBE STATION LOCATION. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS FOR EXTENSION OF THE EXISTING CIRCUIT.
3. RELOCATE EXISTING 120V LIFE-SAFETY AREA ALARM CIRCUIT TO AAP LOCATION. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS FOR EXTENSION OF THE EXISTING CIRCUIT.
4. PROVIDE 120V CONTROLS CIRCUIT FROM EXISTING CONTROLS CIRCUIT FEEDING OTHER VAV BOXES WITHIN SPACE. PROVIDE FEED VIA 2#12,1#12G,3/4"C.
5. REPLACE EXISTING RECEPTACLE WITH GFCI RECEPTACLE. CONNECT TO EXISTING CIRCUIT.
6. PROVIDE 120V, EQUIPMENT BRANCH CONNECTION FROM REMOVED FIRE/SMOKE DAMPERS. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS FOR THE EXTENSION OF THE EXISTING CIRCUIT PREVIOUSLY FEEDING FIRE/SMOKE DAMPERS.



AURORA BUILDING INSPECTION
ELECTRICAL SECTION
APPROVED
SUBJECT TO COMMENTS AS NOTED
AND FIELD INSPECTIONS

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
DATE APPROVED JUL 30 2009

2009411495

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HEERY design

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720.946.0276

project number
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EB 0005176

MEDICAL CENTER OF AURORA

FOURTH FLOOR RENOVATION

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seal/signature

COLORADO LICENSED
MARK A. MATTSON
41665
PROFESSIONAL ENGINEER
07/14/09

issued for	date
CONSTRUCTION	07/15/2009

item	date

PLAN NORTH

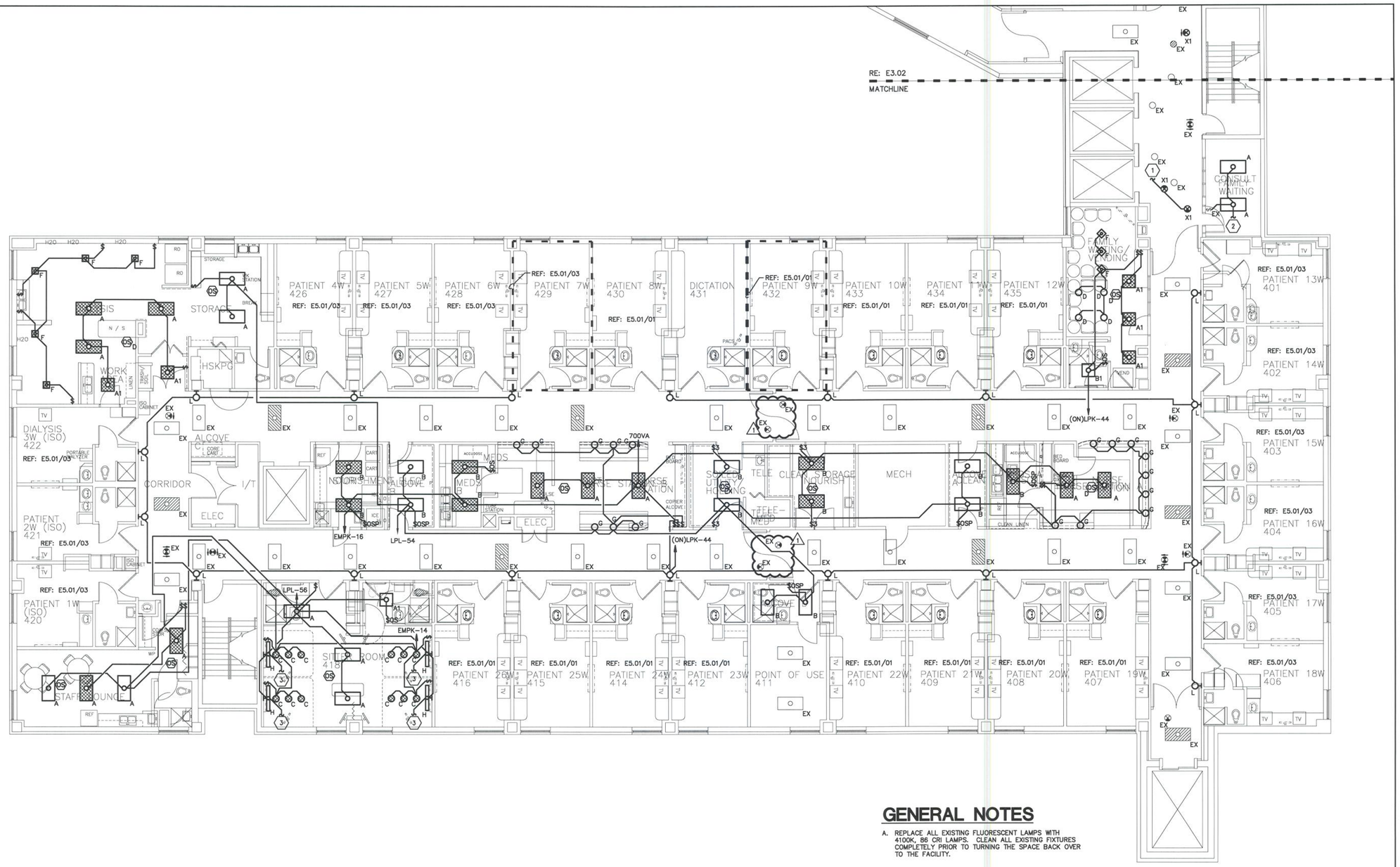
SCALE: 1/8" = 1'-0"

key plan
sheet title

FOUR EAST POWER PLAN

sheet number
E2.02

drawn by CW checked by MM



GENERAL NOTES

A. REPLACE ALL EXISTING FLUORESCENT LAMPS WITH 4100K, 86 CRI LAMPS. CLEAN ALL EXISTING FIXTURES COMPLETELY PRIOR TO TURNING THE SPACE BACK OVER TO THE FACILITY.

LEGEND NOTES

1. PROVIDE ADDITIONAL SWITCH PACK FOR CONTROL OF UNDERCOUNTER LIGHTS WITH OCCUPANCY SENSOR.
2. CONNECT TO EXISTING LIGHTING CIRCUIT PREVIOUSLY SERVING ROOM. MAINTAIN EXISTING SWITCH AND SWITCHING SCHEME.
3. FOR CONNECTION TO PILLOW SWITCH VIA INTEGRAL, FIXTURE MOUNTED, LOW-VOLTAGE CONTROLLER.

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
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FOURTH FLOOR RENOVATION

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MICHAEL LEE MCCLELLAND
PROFESSIONAL ENGINEER
08-03-09

issued for	date
CONSTRUCTION	07/15/2009

item	date
1 ADDENDUM #4	08.05.09

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan
sheet title

FOUR WEST LIGHTING PLAN

sheet number
E3.01

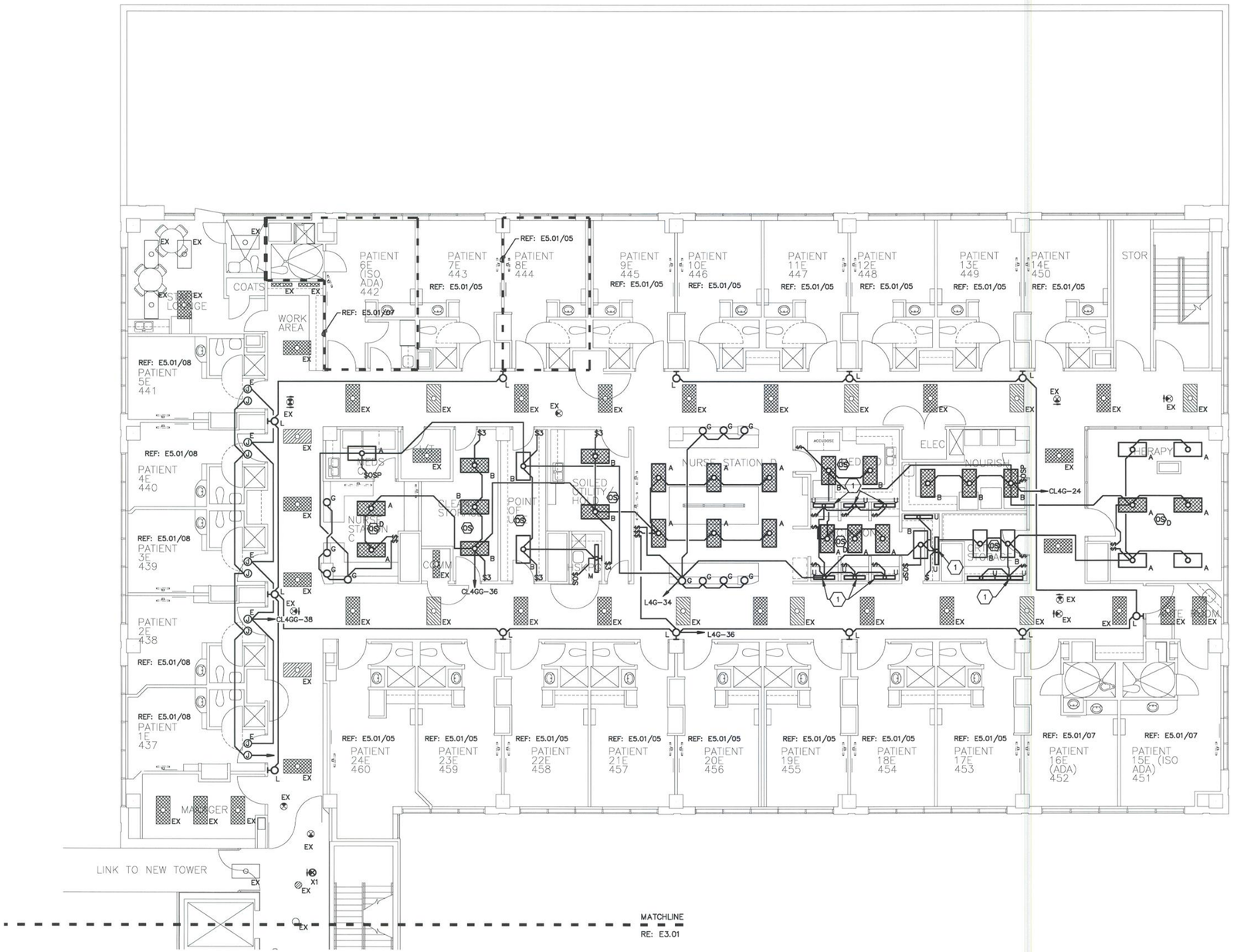
drawn by CW checked by MM

LEGEND NOTES

(1) PROVIDE ADDITIONAL SWITCH PACK FOR CONTROL OF UNDERCOUNTER LIGHTS WITH OCCUPANCY SENSOR.

GENERAL NOTES

A. REPLACE ALL EXISTING FLUORESCENT LAMPS WITH 4100K, 86 CRI LAMPS. CLEAN ALL EXISTING FIXTURES COMPLETELY PRIOR TO TURNING THE SPACE BACK OVER THE THE FACILITY.



AURORA BUILDING INSPECTION
ELECTRICAL SECTION
APPROVED
SUBJECT TO COMMENTS AS NOTED
AND FIELD INSPECTIONS

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
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Denver, CO 80202-3219
720.946.0276

project number
0906700

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EB 0005176

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FOURTH FLOOR RENOVATION

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07/14/09

issued for	date
CONSTRUCTION	07/15/2009

item	date

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

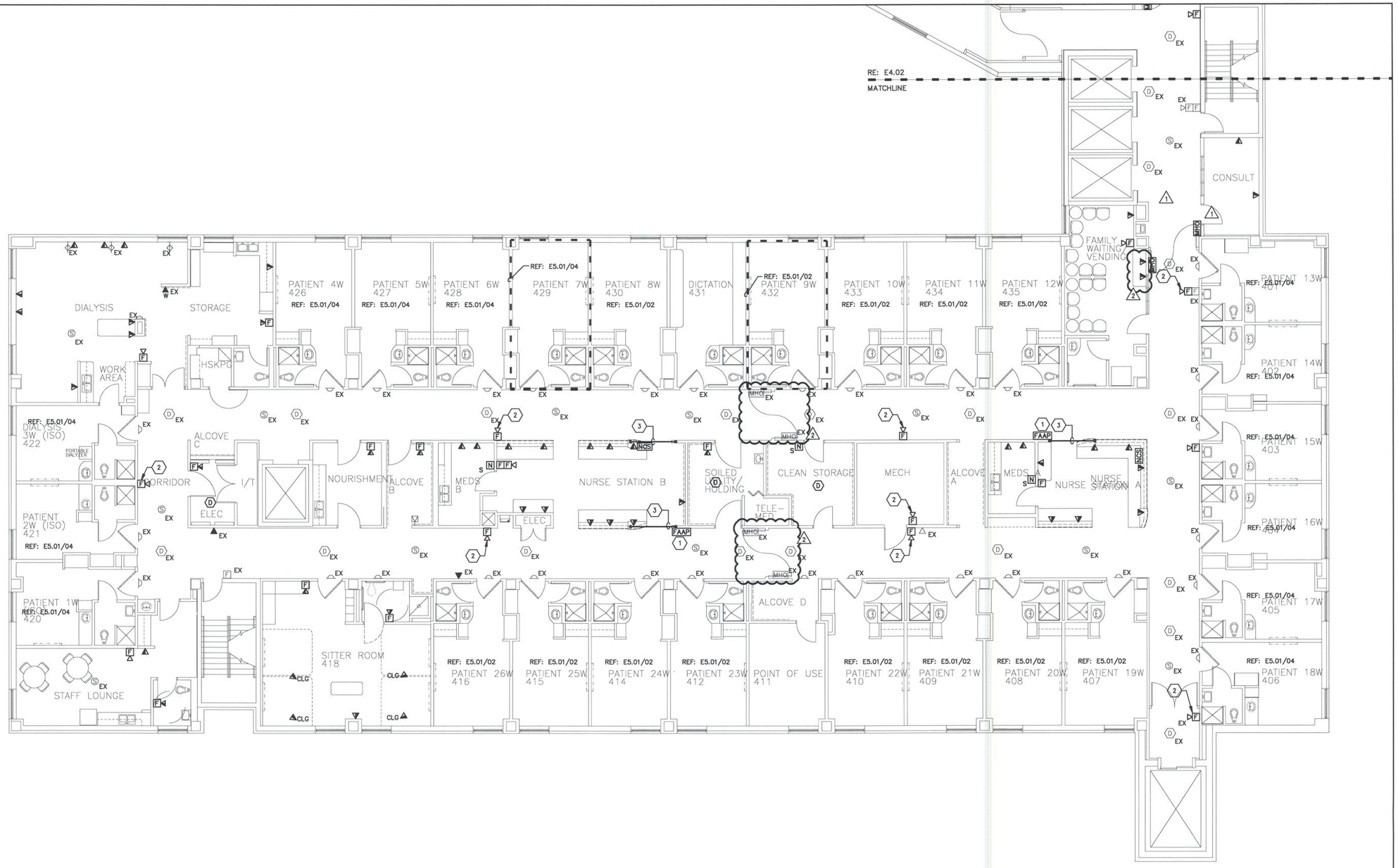
sheet title

FOUR EAST LIGHTING PLAN

sheet number
E3.02

drawn by CW checked by MM

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Subject to LIFE SAFETY Approval under separate permit

THIS SHEET OF DRAWINGS HAS NOT BEEN REVIEWED FOR CODE COMPLIANCE

09-411495

LEGEND NOTES

1. RELOCATE EXISTING FIRE ALARM ANNUNCIATOR PANEL TO THIS LOCATION. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS TO EXTEND EXISTING CIRCUIT PREVIOUSLY SERVING PANEL.
2. PROVIDE NEW ADDRESSABLE FIRE ALARM DEVICE IN EXISTING FIRE ALARM DEVICE LOCATION.
3. PROVIDE PATHWAYS FOR V/D AND NURSE CALL FROM CASEWORK BELOW 4TH FLOOR SLAB TO UP ABOVE 4TH FLOOR CEILING. PROVIDE (1)2"C FOR V/D AND (1)2"C FOR NURSE CALL.

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08-07-09
COLORADO LICENSED
KAREN LEE REED
#37878
PROFESSIONAL ENGINEER

issued for	date
CONSTRUCTION	07/15/2009

item		date
1	PLAN REVIEW RESPONSE	07.29.09
2	ADDENDUM #4	08.05.09

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

sheet title
FOUR WEST SPECIAL SYSTEMS PLAN

sheet number
E4.01

drawn by CW checked by MM

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LEGEND NOTES

1. RELOCATE EXISTING FIRE ALARM ANNUNCIATOR PANEL TO THIS LOCATION. PROVIDE ALL NECESSARY CONDUIT/CONDUCTORS TO EXTEND EXISTING CIRCUIT PREVIOUSLY SERVING PANEL.
2. PROVIDE PATHWAYS FOR V/D AND NURSE CALL FROM CASEWORK BELOW 4TH FLOOR SLAB TO UP ABOVE 4TH FLOOR CEILING. PROVIDE (1)2"C FOR V/D AND (1)2"C FOR NURSE CALL.



THIS SHEET OF DRAWINGS HAS NOT BEEN REVIEWED FOR CODE COMPLIANCE.

* SUBJECT TO LIFE SAFETY APPROVAL UNDER SEPARATE PERMIT.

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HEERY design

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720.946.0276

project number
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COLORADO LICENSED MICHAEL MONTGOMERY 37488 PROFESSIONAL ENGINEER 07/14/09

issued for	date
CONSTRUCTION	07/15/2009

item	date

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

sheet title
FOUR EAST SPECIAL SYSTEMS PLAN

sheet number
E4.02

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COMcheck Software Version 3.6.1

Interior Lighting Compliance Certificate

2006 IECC

Section 1: Project Information

Project Type: **New Construction**
Project Title : TMCA - 4th Floor Renovations

Construction Site:
1501 Potomac St
Aurora, CO

Owner/Agent:

Designer/Contractor:
Tyler Fritz
ccrd partners
8301 E. Prentice Ave
Suite 200
Greenwood Village, CO 80111
303.694.4755

Section 2: General Information

Building Use Description by: **Activity Type**

Activity Type(s)	Floor Area
Hospital	30464

Section 3: Requirements Checklist

Interior Lighting:

☑ 1. Total proposed watts must be less than or equal to total allowed watts.

Allowed Watts	Proposed Watts	Complies
36557	29230	YES

Controls, Switching, and Wiring:

☑ 2. Independent controls for each space (switch/occupancy sensor).
Exceptions:

Areas designated as security or emergency areas that must be continuously illuminated.

Lighting in stairways or corridors that are elements of the means of egress.

ATTACH TO SHEET E5.01 (3 pages)

N/A ☐ 3. Master switch at entry to hotel/motel guest room.

N/A ☐ 4. Individual dwelling units separately metered.

☑ 5. Each space provided with a manual control to provide uniform light reduction by at least 50%.
Exceptions:

Only one luminaire in space;

An occupant-sensing device controls the area;

The area is a corridor, storeroom, restroom, public lobby or sleeping unit.

Areas that use less than 0.6 Watts/sq.ft.

2009411495

☑ 6. Automatic lighting shutoff control in buildings larger than 5,000 sq.ft.
Exceptions:

Sleeping units, patient care areas; and spaces where automatic shutoff would endanger safety or security.

N/A ☐ 7. Photocell/astronomical time switch on exterior lights.
Exceptions:

Lighting intended for 24 hour use.

☑ 8. Tandem wired one-lamp and three-lamp ballasted luminaires (No single-lamp ballasts).
Exceptions:

Electronic high-frequency ballasts; Luminaires on emergency circuits or with no available pair.

Section 4: Compliance Statement

Compliance Statement: The proposed lighting design represented in this document is consistent with the building plans, specifications and other calculations submitted with this permit application. The proposed lighting system has been designed to meet the 2006 IECC requirements in COM*check* Version 3.6.1 and to comply with the mandatory requirements in the Requirements Checklist.

Tyler Fritz, PE - Associate		07.29.09
Name - Title	Signature	Date

2009411495

COMcheck Software Version 3.6.1

Interior Lighting Application Worksheet

2006 IECC

Section 1: Allowed Lighting Power Calculation

A Area Category	B Floor Area (ft2)	C Allowed Watts / ft2	D Allowed Watts (B x C)
Hospital	30464	1.2	36557
		Total Allowed Watts =	36557

Section 2: Proposed Lighting Power Calculation

A Fixture ID : Description / Lamp / Wattage Per Lamp / Ballast	B Lamps/ Fixture	C # of Fixtures	D Fixture Watt.	E (C X D)
Hospital (30464 sq.ft.)				
Linear Fluorescent 1: A: 2X4 D/I / 48" T8 32W / Electronic	2	37	57	2109
Linear Fluorescent 2: A1: 2X2 D/I / 24" T8 17W / Electronic	2	6	30	180
Linear Fluorescent 3: B: 2X4 / 48" T8 32W / Electronic	2	30	57	1710
Linear Fluorescent 4: B1: 2X2 / 24" T8 17W / Electronic	2	1	30	30
Compact Fluorescent 1: D: 6" DOWNLIGHT / Triple 4-pin 26W / Electronic	1	4	26	104
Compact Fluorescent 2: D1: 6" LENSED DOWNLIGHT / Triple 4-pin 26W / Electronic	1	50	26	1300
Compact Fluorescent 3: F: 1X1 / Triple 4-pin 32W / Electronic	1	154	32	4928
Compact Fluorescent 4: F1: 1X1 / Triple 4-pin 32W / Electronic	1	50	32	1600
Incandescent 2: G: LED PENDANT / Other	1	28	5	140
Linear Fluorescent 5: H: D/I / 46" T5 HO 54W / Electronic	2	54	108	5832
Linear Fluorescent 6: J: VANITY / 24" T8 17W / Electronic	1	50	15	750
Incandescent 3: K: LED STEP LIGHT / Other	1	50	5	250
Compact Fluorescent 5: L: WALL SCONCE / Triple 4-pin 13W / Electronic	1	30	13	390
Linear Fluorescent 7: M: 4' INDUSTRIAL STRIP / 48" T8 32W / Electronic	2	1	57	57
Linear Fluorescent 9: U3: 3' UNDERCABINET / 36" T8 25W / Electronic	1	6	22	132
Linear Fluorescent 10: U4: 4' UNDERCABINET / 48" T8 32W / Electronic	1	4	28	112
Linear Fluorescent 10: EX: EXISTING CORRIDOR / 48" T8 32W / Electronic	2	78	57	4446
Incandescent 4: X1: EXIT / Other	1	3	5	15
Incandescent 5: EX EXIT: EXISTING EXIT / Other	1	17	5	85
Compact Fluorescent 6: EX D: EXISTING DOWNLIGHT / Triple 4-pin 26W / Electronic	1	6	26	156
Linear Fluorescent 11: EX U: EXISTING UNDERCABINET / 36" T8 25W / Electronic	1	2	22	44
Incandescent 6: C: LED DOWNLIGHT / Other	1	162	30	4860
			Total Proposed Watts =	29230

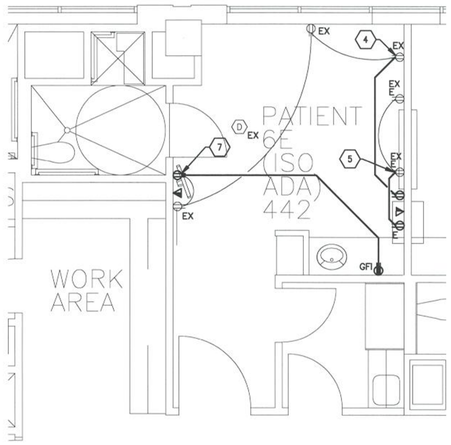
Section 3: Compliance Calculation

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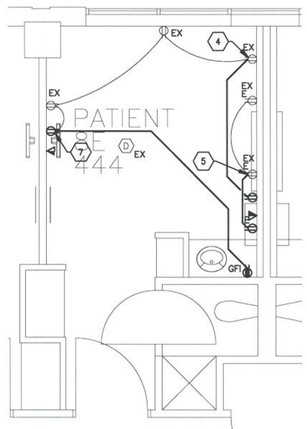
If the Total Allowed Watts minus the Total Proposed Watts is greater than or equal to zero, the building complies.

Total Allowed Watts =	36557
Total Proposed Watts =	29230
Project Compliance =	7327

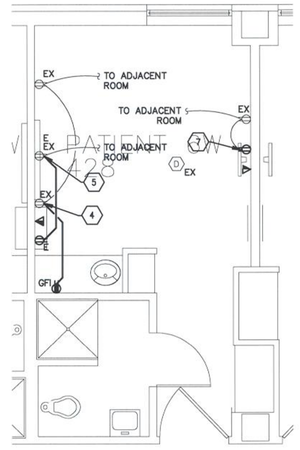
Interior Lighting PASSES: Design 20% better than code.



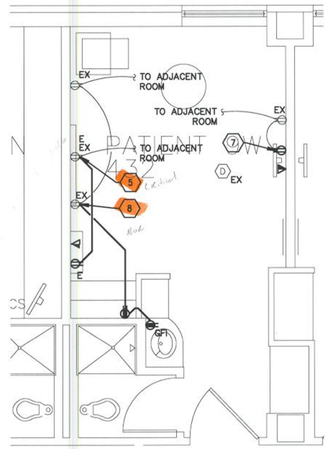
09 ENLARGED ADAPATIENT ROOM - POWER AND SPECIAL SYSTEMS
SCALE: 1/4" = 1'-0"



06 ENLARGED PATIENT ROOM - POWER AND SPECIAL SYSTEMS
SCALE: 1/4" = 1'-0"



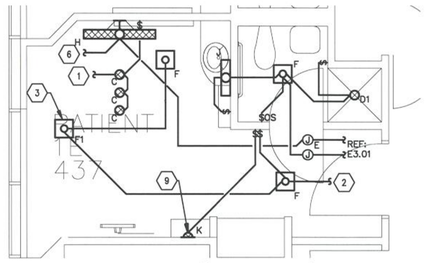
04 ENLARGED PATIENT ROOM - POWER AND SPECIAL SYSTEMS
SCALE: 1/4" = 1'-0"



02 ENLARGED PATIENT ROOM - POWER AND SPECIAL SYSTEMS
SCALE: 1/4" = 1'-0"

LEGEND NOTES

1. CONNECT TO EXISTING 120V, CRITICAL LIGHTING CIRCUIT PREVIOUSLY SERVING PATIENT ROOM.
2. CONNECT TO EXISTING 120V, NORMAL LIGHTING CIRCUIT PREVIOUSLY SERVING PATIENT ROOM.
3. FIXTURE TO HAVE INTEGRAL PHOTOCELL. FIXTURE SHALL TURN OFF WHEN AMBIENT LIGHTING EXCEEDS 30FC. PROVIDE ALTERNATE PRICING FOR A DIMMABLE BALLAST TO MAINTAIN 30FC.
4. CONNECT TO EXISTING 120V NORMAL RECEPTACLE CIRCUIT SERVING PATIENT ROOM. ADDED LOAD: 180VA (1.5A)
5. CONNECT TO EXISTING 120V CRITICAL RECEPTACLE CIRCUIT SERVING PATIENT ROOM. ADDED LOAD: 180VA (1.5A)
6. FOR CONNECTION TO PILLOW SWITCH VIA INTEGRAL, FIXTURE MOUNTED, LOW-VOLTAGE CONTROLLER.
7. PROVIDE NEW RECEPTACLE FOR TELEVISION. RELOCATE EXISTING RECEPTACLE PREVIOUSLY SERVING TELEVISION TO NEW LOCATION. PROVIDE ALL NECESSARY CONDUCTOR/CONDUIT FOR EXTENSION OF THE EXISTING CIRCUIT.
8. CONNECT TO EXISTING 120V NORMAL RECEPTACLE CIRCUIT SERVING PATIENT ROOM. ADDED LOAD: 360VA (3.0A)
9. REPLACE EXISTING NIGHT LIGHT WITH NEW. CONNECT TO EXISTING CRITICAL CIRCUIT.



PATIENT (437-441) 08 ROOMS - LIGHTING
SCALE: 1/4" = 1'-0"

NOTE: Comply with '08 NEC Article 517.13 Grounding of Recpts.

NOTE: Comply with '08 NEC Article 517.18(B) Minimum of 4 Recpts. for patient bed location

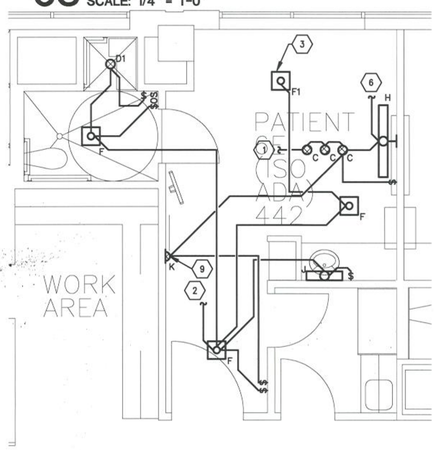
.ocate receptacles a minimum of 15" AFF nd locate light switches, pull boxes and hermostats etc. a maximum of 44" AFF per 2003 ANSI A117.1 308.

'06 Lighting Compliance Report attached (3pages)

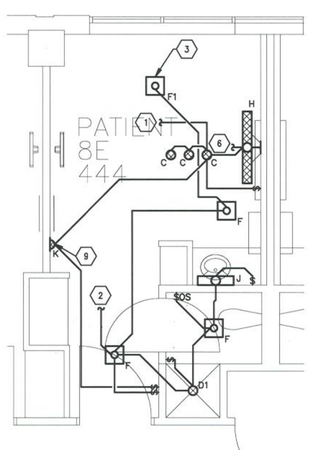
AURORA BUILDING INSPECTION
ELECTRICAL SECTION
APPROVED
SUBJECT TO COMMENTS AS NOTED
AND FIELD INSPECTIONS

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED MT
DATE APPROVED JUL 30 2009

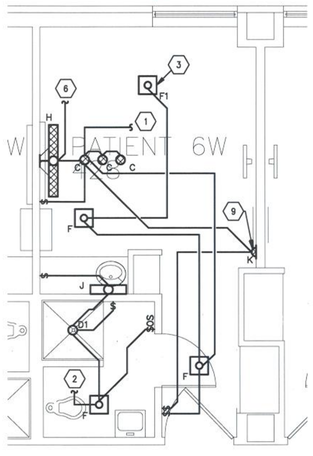
2009411495



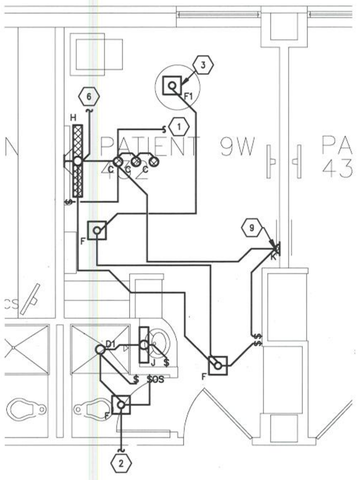
07 ENLARGED ADA PATIENT ROOM - LIGHTING
SCALE: 1/4" = 1'-0"



05 ENLARGED PATIENT ROOM - LIGHTING
SCALE: 1/4" = 1'-0"



03 ENLARGED PATIENT ROOM - LIGHTING
SCALE: 1/4" = 1'-0"



01 ENLARGED PATIENT ROOM - LIGHTING
SCALE: 1/4" = 1'-0"

EAST PATIENT ROOM LIGHTING
(C)=CRITICAL POWER (N)=NORMAL POWER
RECOVERED LOAD:

HEADWALL FIXTURE:	128VA(C)
EXAM LIGHT:	128VA(C)
DOWNLIGHTS:	130VA(N)+26VA(C)
RESTROOM LIGHTING:	52VA(N)
NIGHT LIGHT:	18VA(C)
VANITY FIXTURE:	18VA(N)
TOTAL RECOVERED:	200VA(N)+300VA(C)
ADDED LOAD:	177VA(N)+203VA(C)
NET LOAD:	(-33)VA(N)+(-97)VA(C)

WEST PATIENT ROOM LIGHTING
(C)=CRITICAL POWER (N)=NORMAL POWER
RECOVERED LOAD:

HEADWALL FIXTURE:	256VA(C)
EXAM LIGHT:	128VA(C)
RESTROOM LIGHTING:	57VA(N)
NIGHT LIGHT	26VA(C)
VANITY FIXTURE:	26VA(N)
TOTAL RECOVERED:	83VA(N)+410VA(C)
ADDED LOAD:	81VA(N)+299VA(C)
NET LOAD:	(-2)VA(N)+(-111)VA(C)

EAST PATIENT ROOMS (437-441) LIGHTING
(C)=CRITICAL POWER (N)=NORMAL POWER
RECOVERED LOAD:

HEADWALL FIXTURE:	32VA(C)
EXAM LIGHT:	64VA(C)
DOWNLIGHTS:	52VA(N)
RESTROOM LIGHTING:	52VA(N)
NIGHT LIGHT:	18VA(C)
TOTAL RECOVERED:	104VA(N)+114VA(C)
ADDED LOAD:	96VA(N)+90VA(C)
NET LOAD:	(-8)VA(N)+(-24)VA(C)

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HEERY design

Heery International Inc.
820 16th Street Mall,
Suite 200,
Denver, CO 80202-3219
720.946.0276

project number
0906700

AA 0002293
EB 0005176

MEDICAL CENTER OF AURORA

FOURTH FLOOR RENOVATION

1501 S. POTOMAC ST.
AURORA, CO 80012

consultants/construction managers

CCRD Partners
8301 E. Prentice Ave.
Suite 200
Greenwood Village, CO 80111

303-694-4755

Howel Construction
550 Lipan St.
Denver, CO 80204

303-899-4787

seal/signature

COLORADO LICENSED
Mark A. Mathiesen
41488
07/14/09
PROFESSIONAL ENGINEER

issued for	date
CONSTRUCTION	07/15/2009

item	date

PLAN NORTH
SCALE: 1/8" = 1'-0"

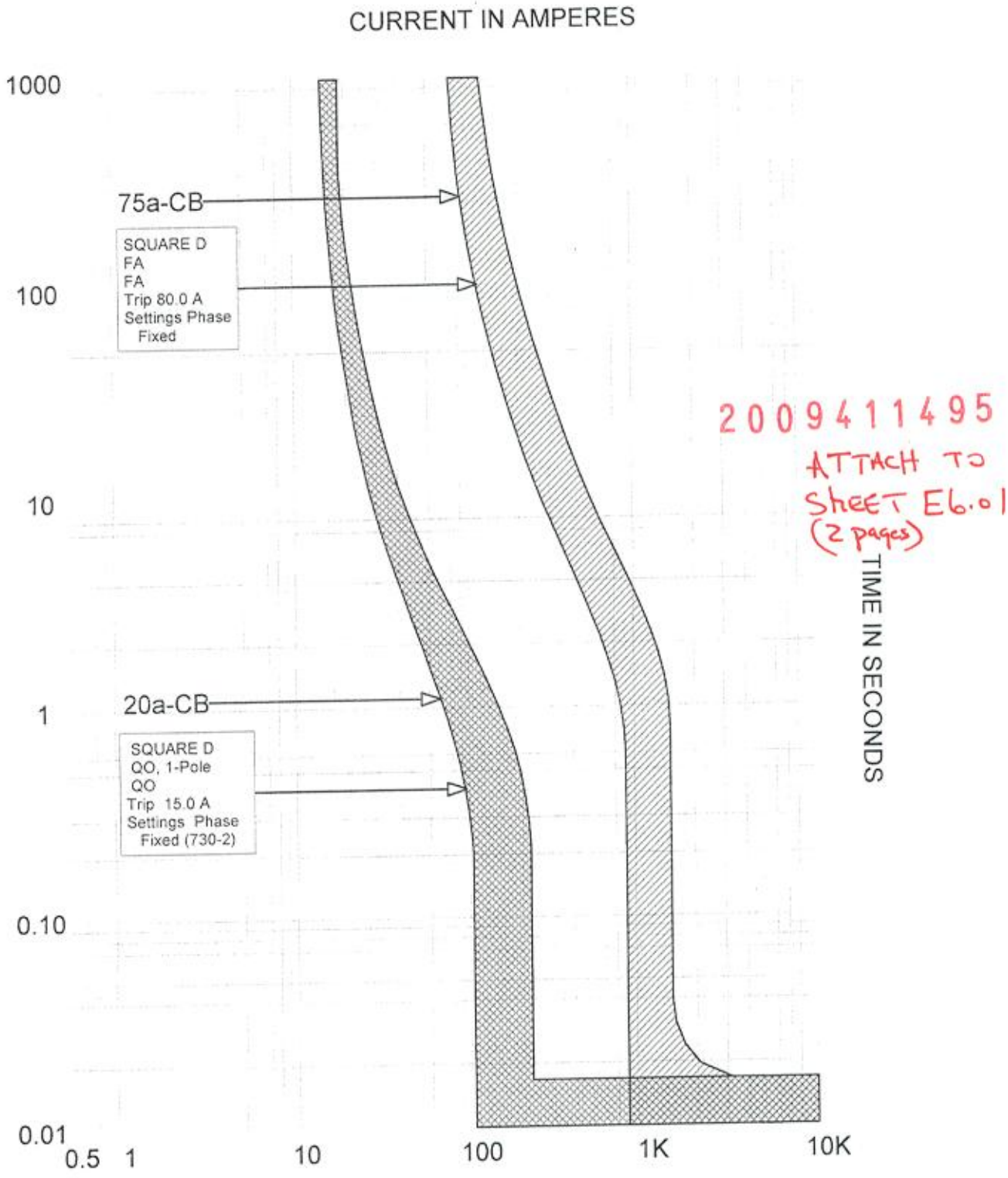
key plan
sheet title

ENLARGED PATIENT ROOMS

sheet number
E5.01

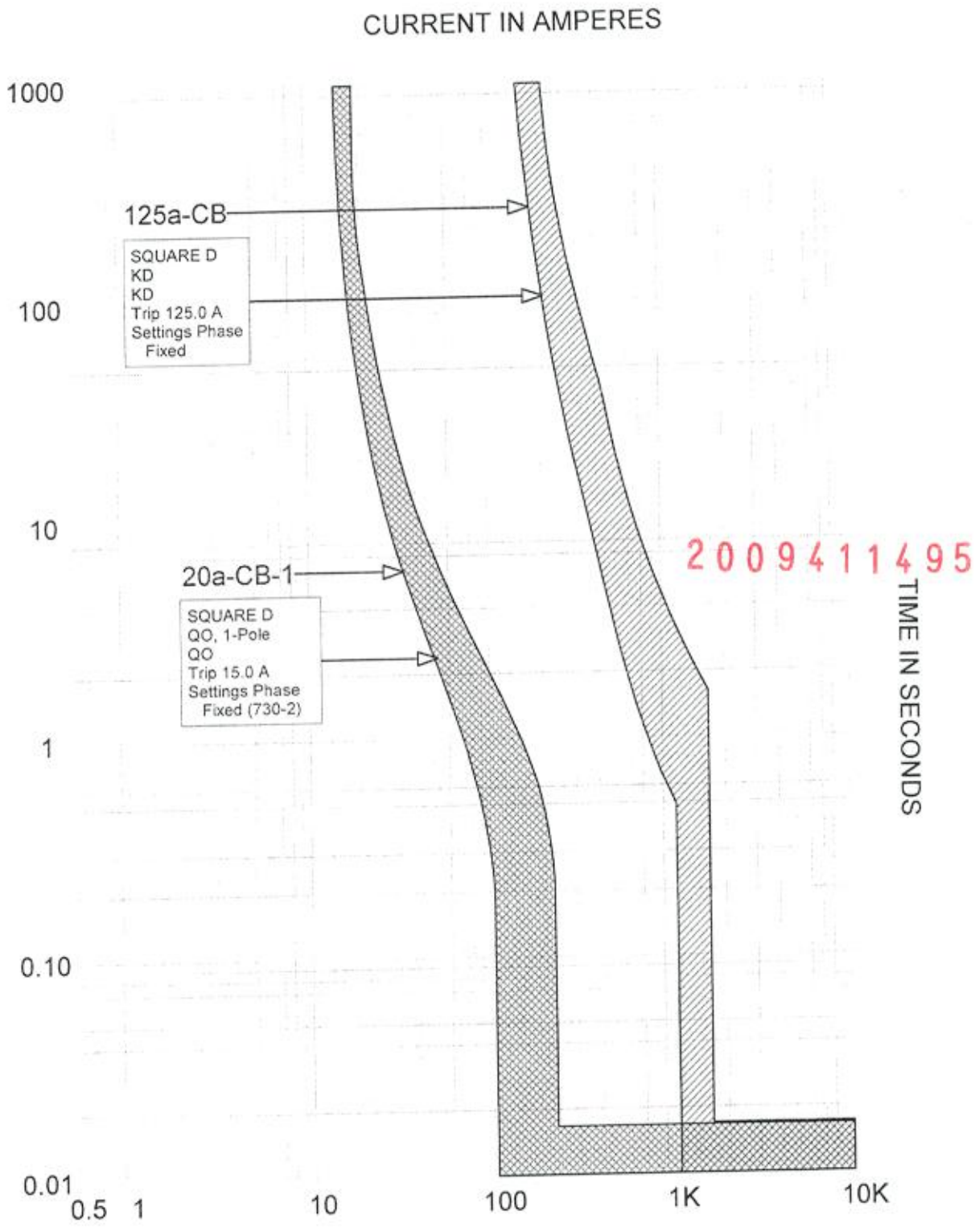
drawn by MM checked by MM

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2009411495
ATTACH TO
SHEET E6.01
(2 pages)

75-20 COORDINATION.tcc Ref. Voltage: 208V Current in Amps x 1 1Lin



2009411495

125-20 COORDINATION.tcc Ref. Voltage: 208V Current in Amps x 1

MEDICAL CENTER OF AURORA

********** FAULT ANALYSIS SUMMARY **********

BUS NAME	VOLTAGE L-L	AVAILABLE FAULT CURRENT 3 PHASE	X/R	LINE/GRND	X/R
B-CBDP	480.	17235.7	4.4	0.03	1.0
B-CHDP	480.	16617.5	1.1	0.03	1.0
B-CL3G	208.	5139.5	1.3	5156.75	1.4
B-CL4G	208.	3648.9	0.8	3411.74	0.9
B-CL4GG	208.	2137.1	0.5	1877.60	0.6
B-CR	480.	40052.6	4.2	0.03	1.0
B-DP1	480.	18200.0	8.0	0.03	1.0
B-EMLP5	480.	13723.0	2.0	0.03	1.0
B-EMPK	208.	1838.9	0.5	1414.11	0.4
B-EMPL	208.	2931.5	0.7	2782.38	0.6
B-EX-MDP2	480.	44487.7	5.8	0.03	1.0
B-EX-MSB	480.	40117.4	4.3	0.03	1.0
B-EX-MSBA	480.	46121.9	6.7	0.03	1.0
B-EX-NPDP	480.	18200.0	8.0	0.03	1.0
B-EX-SSB	480.	44807.0	5.9	0.03	1.0
B-L3G	208.	4710.6	1.4	4645.64	1.5
B-L4G	208.	3486.4	0.9	2928.66	0.8
B-L4GG	208.	3139.7	0.8	2522.91	0.7
B-LPC	208.	5662.4	1.0	5856.83	1.0
B-LPK	208.	4340.1	0.7	3751.87	0.6
B-LPL	208.	2716.7	0.6	1993.75	0.5
B-NHDP	480.	12892.7	1.1	0.03	1.0
B-TLEM5	208.	3331.2	0.8	3449.39	0.8
B-TLP6	208.	5866.2	0.9	6063.00	0.9
LP6	480.	26825.1	1.7	0.03	1.0

********** FAULT ANALYSIS REPORT COMPLETED **********

ATTACH To Sheet E6.01 (1of1)

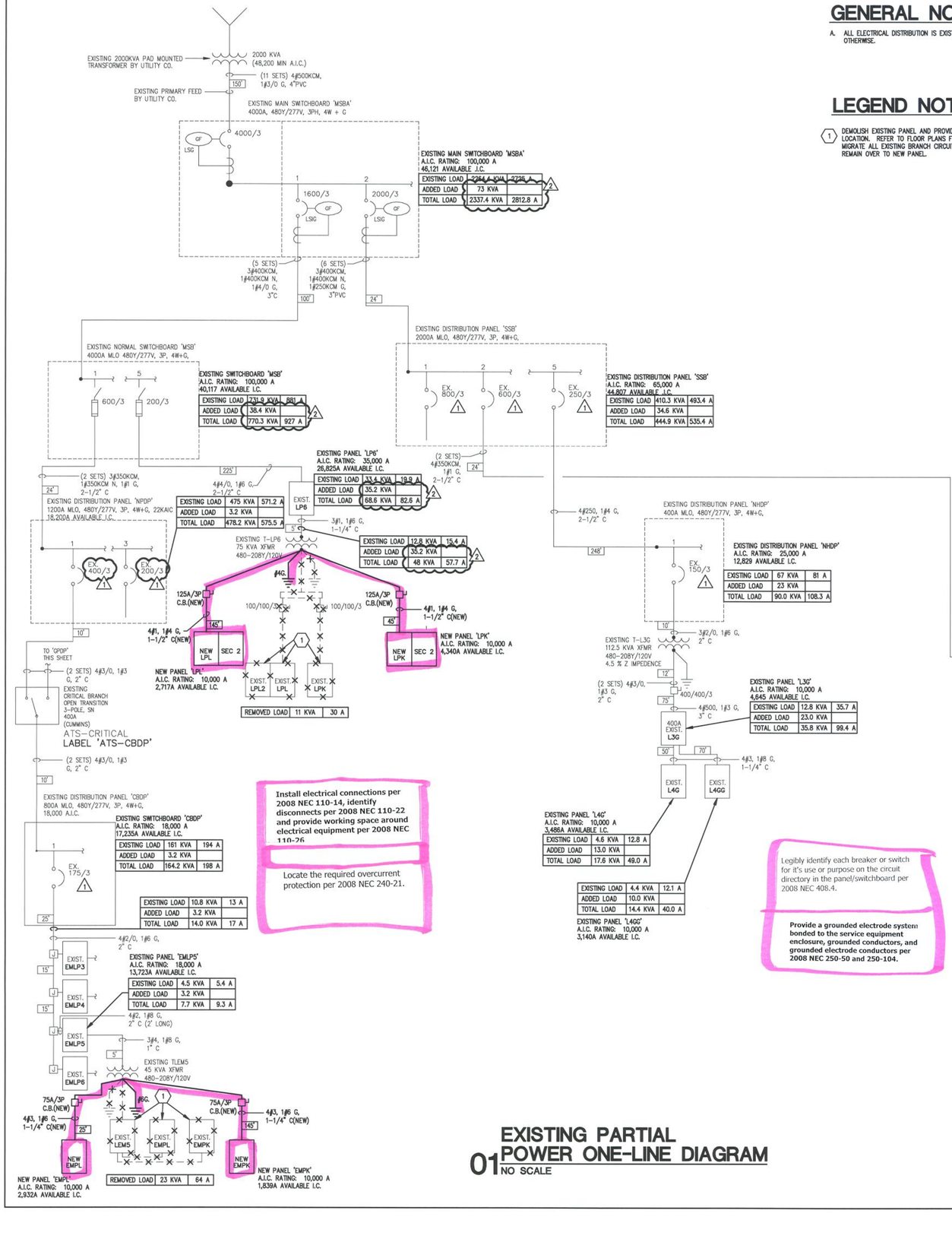
2009411495

GENERAL NOTES

A. ALL ELECTRICAL DISTRIBUTION IS EXISTING TO REMAIN UNLESS NOTED OTHERWISE.

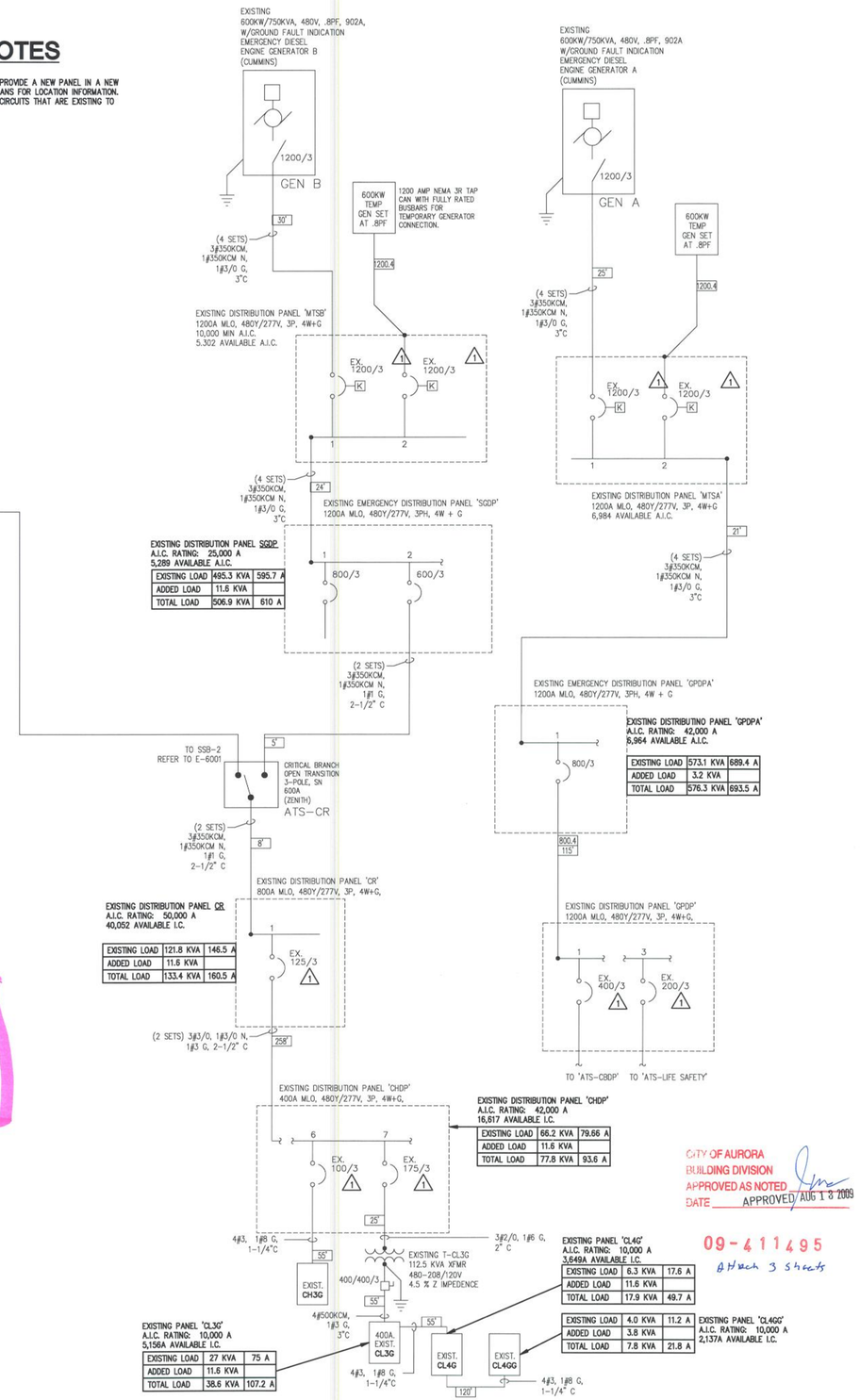
LEGEND NOTES

1 DEMOLISH EXISTING PANEL AND PROVIDE A NEW PANEL IN A NEW LOCATION. REFER TO FLOOR PLANS FOR LOCATION INFORMATION. MIGRATE ALL EXISTING BRANCH CIRCUITS THAT ARE EXISTING TO REMAIN OVER TO NEW PANEL.



01 EXISTING PARTIAL POWER ONE-LINE DIAGRAM

NO SCALE



CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
DATE APPROVED AUG 13 2009

09-411495
Attach 3 sheets

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HEERY design

Heery International Inc.
820 16th Street Mall,
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720.946.0276

project number
0906700

AA 0002293
EB 0005176

MEDICAL CENTER OF AURORA

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Denver, CO 80204
303-899-4787

seal/signature

08-05-09
COLORADO LICENSED
CHRISTOPHER LEE
PROFESSIONAL ENGINEER

issued for	date
CONSTRUCTION	07/15/2009

item	date
1 PLAN REVIEW RESPONSE	07.29.09
2 ADDENDUM #4	08.05.09

PLAN NORTH

SCALE: 1/8" = 1'-0"

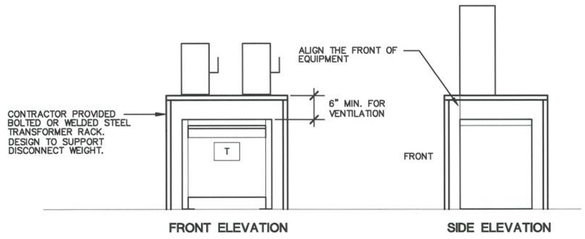
key plan
sheet title

ELECTRICAL PARTIAL ONE-LINE DIAGRAM

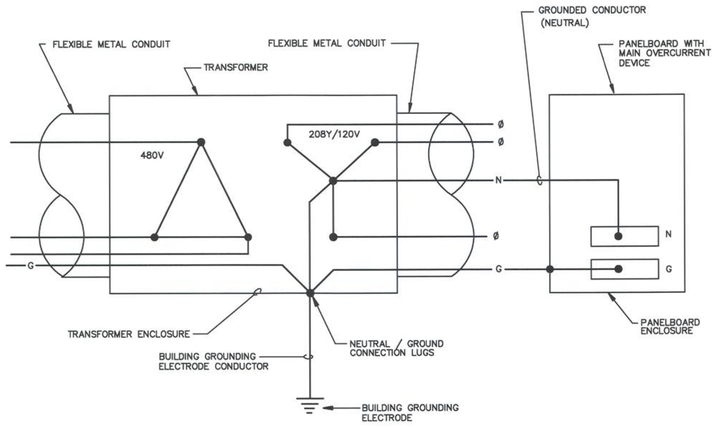
sheet number
E6.01

drawn by MM checked by MM

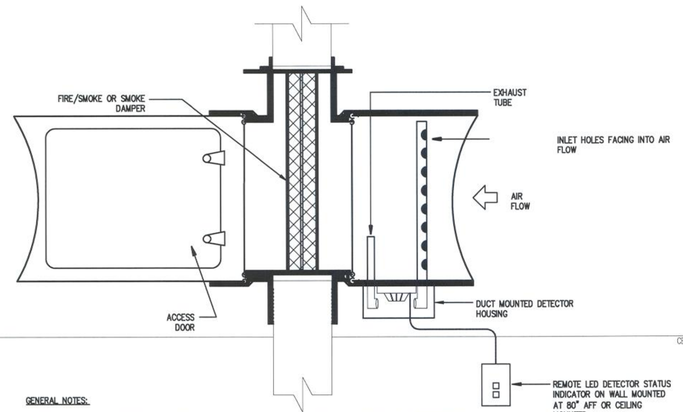
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06 STACKED TRANSFORMER/DISC. DETAIL
NO SCALE



04 480 VOLT TO 208Y/120 VOLT LIGHTING & DISTRIBUTION TRANSFORMER GROUNDING DETAIL
NO SCALE



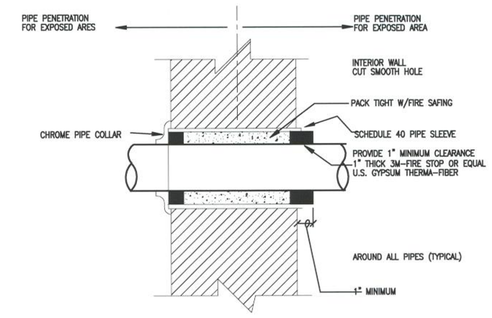
GENERAL NOTES:

A. THIS DETAIL SHALL PERTAIN TO DAMPERS INSTALLED IN SUPPLY AIR DUCTS, RETURN AIR DUCTS, AND RETURN AIR OPENINGS AS REQUIRED BY THE SPECIFICATIONS AND GOVERNING CODES.

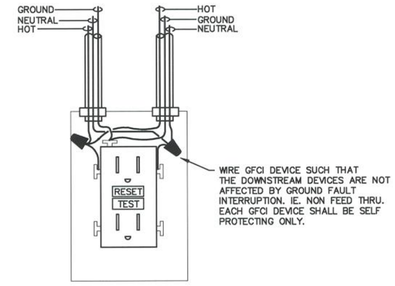
B. PROVIDE SMOKE DETECTORS AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS. COORDINATE EXACT LOCATION OF ALL FIRE/SMOKE AND SMOKE DAMPERS WITH DIVISION 15 FLOOR PLANS. AS REQUIRED BY LOCAL AUTHORITY HOUSING JURISDICTION.

C. INSTALL DUCT DETECTORS IN ACCORDANCE WITH DUCT MOUNTED SMOKE DETECTOR DETAIL.

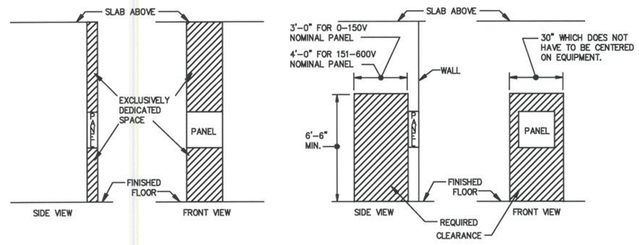
05 FIRE/SMOKE DAMPER INSTALLATION DETAIL
NO SCALE



01 FIRE PENETRATION DETAIL
NO SCALE



02 GFCI RECEPTACLE - WIRING DIAGRAM
NO SCALE



03 TYPICAL PANELBOARD REQUIRED CLEARANCE DETAIL
NO SCALE

THIS SHEET OF DRAWINGS HAS NOT BEEN REVIEWED FOR CODE COMPLIANCE.

2009411495

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HEERY design

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720.946.0276

project number
0906700

AA 0002293
EB 0005176

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Denver, CO 80204

303-899-4787

seal/signature

COLORADO LICENSED MARK A. MATHIEU 41486 PROFESSIONAL ENGINEER 07/14/09

issued for	date
CONSTRUCTION	07/15/2009

item	date

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

sheet title

ELECTRICAL DETAILS

sheet number
E7.01

drawn by MM checked by MM

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GENERAL NOTES

A. IT IS THE INTENT OF THESE DOCUMENTS THAT THE OCCUPANCY SENSOR SYSTEM SHALL COVER THE ENTIRE ROOM. THE CONTRACTOR SHALL HAVE THE SELECTED DEVICE MANUFACTURER LAYOUT AND ADJUST SENSOR TYPES OR QUANTITIES AS NEEDED TO PROVIDE COMPLETE COVERAGE. SHOP DRAWINGS SHALL BE SUBMITTED AS DESCRIBED IN THE SPECIFICATIONS ON THIS PAGE FOR ENGINEERS REVIEW PRIOR TO PROCUREMENT. COST FOR ANY ADJUSTMENTS OR ADDITIONS TO THE SENSOR LAYOUT SHALL BE INCLUDED IN THE CONTRACTOR BID PRICE. NO ADDITIONAL COSTS WILL BE CONSIDERED FOR THESE PRODUCT SPECIFIC ADJUSTMENTS.

B. THESE WIRING DETAILS ARE A GENERAL REPRESENTATION OF TYPICAL INSTALLATION PRACTICES. THE CONTRACTOR SHALL COORDINATE ALL DEVICE PLACEMENT, COVERAGE PATTERNS, WIRING DETAILS, SWITCH PACK QUANTITIES AND CONDUIT REQUIREMENTS DURING THE SHOP DRAWING PROCESS WITH THE SELECTED LIGHTING CONTROLS VENDOR.

C. NO MORE THAN (3) LOW VOLTAGE DEVICES SHOULD BE POWERED FROM A SINGLE SWITCH PACK. VERIFY REQUIREMENTS WITH SYSTEM MANUFACTURER DURING SHOP DRAWING PHASE..

D. SWITCH PACK CONTACTS SHOULD FAIL TO THE CLOSED("ON") POSITION TO ALLOW LIGHTING OPERATION IN THE EVENT OF A RELAY OR SENSOR FAILURE.

E. WHEN MULTIPLE POWER SOURCES ARE BEING CONTROLLED THE EMERGENCY POWER SOURCE SHALL BE THE "MASTER" SWITCH PACK.

SUBMITTALS

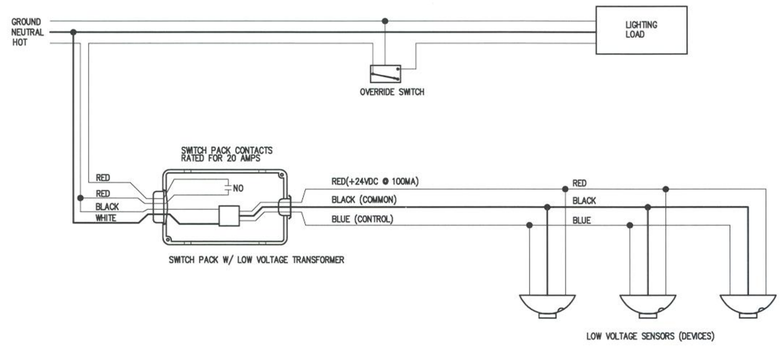
A. SUBMIT THE FOLLOWING IN ACCORDANCE WITH DIVISION 1 SUBMITTAL PROCEDURES.

B. COMPLETE BILL OF MATERIALS LISTING ALL PARTS NEEDED TO FULLY INSTALL SELECTED SENSOR SYSTEM.

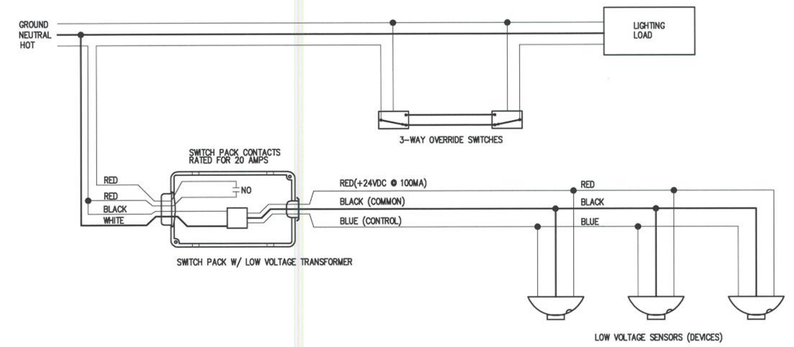
C. PRODUCT DATA SHEETS FOR EACH PRODUCT SPECIFIED. DATA SHEETS SHOULD INCLUDE CATALOG CUT SHEETS WITH TECHNICAL SPECIFICATIONS AND INSTALLATION INSTRUCTIONS..

D. SHOP DRAWINGS DETAILING ALL MECHANICAL AND ELECTRICAL EQUIPMENT REQUIRED TO INSTALL COMPETE SENSOR SYSTEM. SHOP DRAWINGS SHOULD BE 1/8"=1'-0" SCALE OR LARGER. DRAWINGS SHOULD INCLUDE ONE-LINE DIAGRAMS, WIRE COUNTS, COVERAGE PATTERNS, AND PHYSICAL DIMENSIONS OF EACH ITEM.

E. SUBMIT SAMPLES FOR FINISH, COLOR, AND TEXTURE TO ARCHITECT FOR APPROVAL.

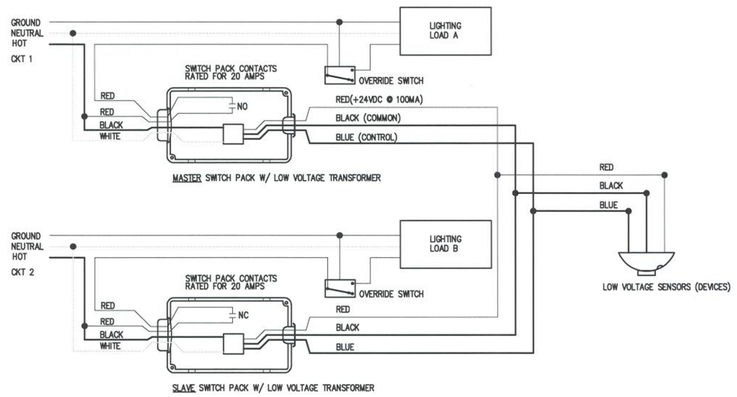


LOW VOLTAGE OCCUPANCY SENSORS
05 W/ LINE-VOLTAGE OVERRIDE SWITCH
NO SCALE



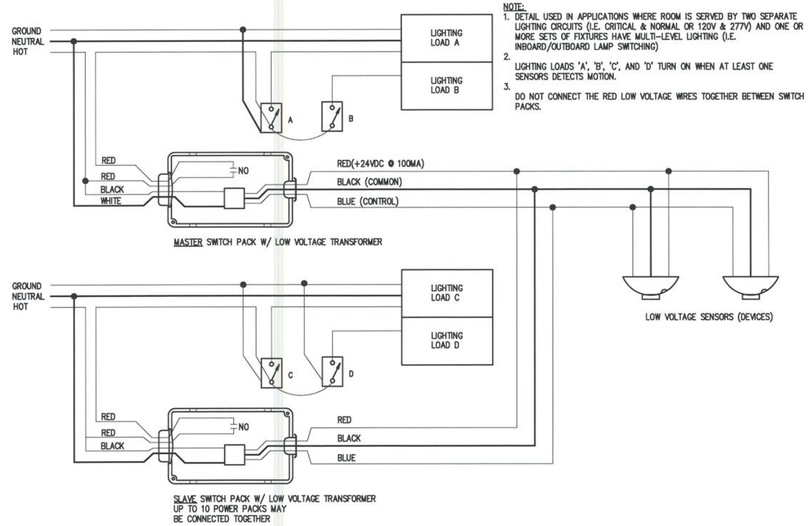
LOW VOLTAGE OCCUPANCY SENSORS
03 W/ 3-WAY LINE-VOLTAGE OVERRIDE SWITCH
NO SCALE

NOTE:
1. DETAIL USED IN APPLICATIONS WHERE ROOM IS SERVED BY TWO SEPARATE LIGHTING CIRCUITS (I.E. CRITICAL & NORMAL OR 120V & 277V).
2. LIGHTING LOADS 'A' AND 'B' TURN ON WHEN AT LEAST ONE SENSORS DETECTS MOTION.
3. DO NOT CONNECT THE RED LOW VOLTAGE WIRES TOGETHER BETWEEN SWITCH PACKS.



LOW VOLTAGE OCCUPANCY SENSORS
06 W/ 2-CIRCUITS & LINE-VOLTAGE OVERRIDE SWITCH
NO SCALE

NOTE:
1. DETAIL USED IN APPLICATIONS WHERE ROOM IS SERVED BY TWO SEPARATE LIGHTING CIRCUITS (I.E. CRITICAL & NORMAL OR 120V & 277V) AND ONE OR MORE SETS OF FIXTURES HAVE MULTI-LEVEL LIGHTING (I.E. INBOARD/OUTBOARD LAMP SWITCHING)
2. LIGHTING LOADS 'A', 'B', 'C', AND 'D' TURN ON WHEN AT LEAST ONE SENSORS DETECTS MOTION.
3. DO NOT CONNECT THE RED LOW VOLTAGE WIRES TOGETHER BETWEEN SWITCH PACKS.



LOW VOLTAGE OCCUPANCY SENSORS
04 W/ DUAL LEVEL LINE-VOLTAGE OVERRIDE SWITCHES
NO SCALE

AURORA BUILDING INSPECTION
ELECTRICAL SECTION
APPROVED
SUBJECT TO COMMENTS AS NOTED
AND FIELD INSPECTIONS

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED PT
DATE APPROVED JUL 30 2009

2009411495

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seal/signature

COLORADO LICENSED
MARK MONTOYA
41486
07/14/09
PROFESSIONAL ENGINEER

issued for	date
CONSTRUCTION	07/15/2009

item	date

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

sheet title
ELECTRICAL DETAILS

sheet number
E7.02

drawn by MM checked by MM

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EXISTING PANEL: EMPK — CRITICAL

LOCATION: SOILED UTILITY
MAIN BUS: 100A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: LEM5
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	500	20	1	A	20	1	500	EXISTING LOAD	2
3	EXISTING LOAD	500	20	1	B	20	1	500	EXISTING LOAD	4
5	EXISTING LOAD	500	20	1	C	20	1	720	EXISTING LOAD	6
7	EXISTING LOAD	500	20	1	A	20	1	360	EXISTING LOAD	8
9	EXISTING LOAD	360	20	1	B	20	1	360	EXISTING LOAD	10
11	EXISTING LOAD	360	20	1	C	20	1	360	EXISTING LOAD	12

NOTES:

EXISTING PANEL: EMPL — CRITICAL

LOCATION: SOILED UTILITY
MAIN BUS: 100A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: LEM5
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Recessed
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: No

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	500	20	1	A	20	1	720	EXISTING LOAD	2
3	EXISTING LOAD	500	20	1	B	20	1	1080	EXISTING LOAD	4
5	EXISTING LOAD	720	20	1	C	20	1	1000	EXISTING LOAD	6
7	EXISTING LOAD	720	20	1	A	20	1	1080	EXISTING LOAD	8
9	EXISTING LOAD	1080	20	1	B	20	1	1080	EXISTING LOAD	10
11	EXISTING LOAD	1080	20	1	C	20	1	1080	EXISTING LOAD	12

NOTES:

EXISTING PANEL: LEM5 — NORMAL

LOCATION: WEST IT CLOSET
MAIN BUS: 100A
MCB: 100A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: EMLP-5
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Circuit Breaker

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	540	20	1	A	20	1	540	EXISTING LOAD	2
3	EXISTING LOAD	540	20	1	B	20	1	540	EXISTING LOAD	4
5	EXISTING LOAD	540	20	1	C	20	1	540	EXISTING LOAD	6
7	EXISTING LOAD	540	20	1	A	20	1	540	EXISTING LOAD	8
9	EXISTING LOAD	540	20	1	B	20	1	540	EXISTING LOAD	10
11	EXISTING LOAD	540	20	1	C	20	1	540	EXISTING LOAD	12
13	EXISTING LOAD	540	20	1	A	20	1	540	EXISTING LOAD	14
15	EXISTING LOAD	540	20	1	B	20	1	720	EXISTING LOAD	16
17	EXISTING LOAD	540	20	1	C	20	1	720	EXISTING LOAD	18
19	PANEL "EMPL"	3020	30	3	A	20	1	720	EXISTING LOAD	20
21		3740			B	20	1	720	EXISTING LOAD	22
23		3880			C	20	1	720	EXISTING LOAD	24
25	PANEL "EMPK"	1860	30	3	A	20	1	720	EXISTING LOAD	26
27		1720			B	20	1	720	EXISTING LOAD	28
29		1940			C	20	1	720	EXISTING LOAD	30

NOTES:

EXISTING PANEL: LPK — NORMAL

LOCATION: SOILED UTILITY
MAIN BUS: 225A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: LP6
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	500	20	1	A	20	1	500	EXISTING LOAD	2
3	EXISTING LOAD	500	20	1	B	20	1	500	EXISTING LOAD	4
5	EXISTING LOAD	500	20	1	C	20	1	500	EXISTING LOAD	6
7	EXISTING LOAD	500	20	1	A	20	1	500	EXISTING LOAD	8
9	EXISTING LOAD	500	20	1	B	20	1	1080	EXISTING LOAD	10
11	EXISTING LOAD	720	20	1	C	20	1	1080	EXISTING LOAD	12
13	EXISTING LOAD	1080	20	1	A	20	1	1080	EXISTING LOAD	14
15	EXISTING LOAD	1080	20	1	B	20	1	1080	EXISTING LOAD	16
17	EXISTING LOAD	1080	20	1	C	20	1	1080	EXISTING LOAD	18
19	EXISTING LOAD	1080	20	1	A	20	1	1080	EXISTING LOAD	20
21	EXISTING LOAD	1080	20	1	B	20	1	1080	EXISTING LOAD	22
23	EXISTING LOAD	1080	20	1	C	20	1	1080	EXISTING LOAD	24
25	EXISTING LOAD	1080	20	1	A	20	1	1080	EXISTING LOAD	26
27	EXISTING LOAD	1080	20	1	B	20	1	500	EXISTING LOAD	28
29	EXISTING LOAD	1080	20	1	C	20	1	720	EXISTING LOAD	30
31	EXISTING LOAD	1080	20	1	A	20	1	720	EXISTING LOAD	32
33	EXISTING LOAD	720	20	1	B	20	1	720	EXISTING LOAD	34
35	EXISTING LOAD	1080	20	1	C	20	1	720	EXISTING LOAD	36
37	EXISTING LOAD	500	20	1	A	20	1	720	EXISTING LOAD	38
39	EXISTING LOAD	180	20	1	B	30	2	--	SPARE	40
41	EXISTING LOAD	1080	20	1	C			--		42

NOTES:

EXISTING PANEL: LPL — NORMAL

LOCATION: 4W MECH RM
MAIN BUS: 225A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: TLP6
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	500	20	1	A	20	1	500	EXISTING LOAD	2
3	EXISTING LOAD	500	20	1	B	20	1	500	EXISTING LOAD	4
5	EXISTING LOAD	500	20	1	C	20	1	500	EXISTING LOAD	6
7	EXISTING LOAD	500	20	1	A	20	1	1440	EXISTING LOAD	8
9	EXISTING LOAD	500	20	1	B	20	1	1080	EXISTING LOAD	10
11	EXISTING LOAD	500	20	1	C	20	1	1080	EXISTING LOAD	12
13	EXISTING LOAD	1080	20	1	A	20	1	1080	EXISTING LOAD	14
15	EXISTING LOAD	1080	20	1	B	20	1	720	EXISTING LOAD	16
17	EXISTING LOAD	1080	20	1	C	20	1	720	EXISTING LOAD	18
19	EXISTING LOAD	540	20	1	A	20	1	720	EXISTING LOAD	20
21	EXISTING LOAD	1080	20	1	B	20	1	720	EXISTING LOAD	22
23	EXISTING LOAD	1080	20	1	C	20	1	720	EXISTING LOAD	24
25	EXISTING LOAD	1080	20	1	A	20	1	1080	EXISTING LOAD	26
27	EXISTING LOAD	1080	20	1	B	20	1	540	EXISTING LOAD	28
29	EXISTING LOAD	1080	20	1	C	20	1	540	EXISTING LOAD	30
31	PANEL "LPL-2"	3800	80	3	A	20	1	720	EXISTING LOAD	32
33		2680			B	20	1	720	EXISTING LOAD	34
35		2720			C	20	1	720	EXISTING LOAD	36
37	EXISTING LOAD	720	20	1	A	20	1	720	EXISTING LOAD	38
39	EXISTING LOAD	540	20	1	B	20	1	1080	EXISTING LOAD	40
41	EXISTING LOAD	720	20	1	C	20	1	1080	EXISTING LOAD	42

NOTES:

EXISTING PANEL: LPL-2 — NORMAL

LOCATION: WEST ELEC. RM
MAIN BUS: 125A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: LPL
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	1000	40	3	A	20	1	720	EXISTING LOAD	2
3		1000			B	20	1	500	EXISTING LOAD	4
5		1000			C	20	1	1000	EXISTING LOAD	6
7	EXISTING LOAD	1080	20	1	A	30	2	1000	EXISTING LOAD	8
9	EXISTING LOAD	180	20	1	B			1000	EXISTING LOAD	10
11	EXISTING LOAD	720	20	1	C	20	1	--	S.O.	12

NOTES:

THIS SHEET OF DRAWINGS HAS NOT BEEN REVIEWED FOR CODE COMPLIANCE.

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AA 0002293
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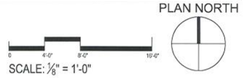
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issued for	date
CONSTRUCTION	07/15/2009

item		date
1	PLAN REVIEW RESPONSE	07.29.09

PLAN NORTH



SCALE: 1/8" = 1'-0"

key plan
sheet title

ELECTRICAL PANEL SCHEDULES

sheet number
E8.01

drawn by MM checked by MM

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WHEN PLOTTED AT FULL SIZE THIS SHEET MEASURES 24"x36"

EXISTING PANEL: L4GG — NORMAL

LOCATION: ELEC. RM. 4–0200
MAIN BUS: 100A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: L3G
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	720	20	1	A	20	1	720	EXISTING LOAD	2
3	EXISTING LOAD	720	20	1	B	20	1	360	EXISTING LOAD	4
5	EXISTING LOAD	1080	*20	1	C	20	1	720	EXISTING LOAD	6
7	EXISTING LOAD	1080	*20	1	A	20	1	1000	EXISTING LOAD	8
9	EXISTING LOAD	1080	*20	1	B	20	1	500	EXISTING LOAD	10
11	EXISTING LOAD	1080	*20	1	C	20	1	500	EXISTING LOAD	12
13	EXISTING LOAD	1080	*20	1	A	20	1	720	EXISTING LOAD	14
15	EXISTING LOAD	1080	*20	1	B	20	1	720	EXISTING LOAD	16
17	EXISTING LOAD	1080	*20	1	C	20	1	500	EXISTING LOAD	18
19	EXISTING LOAD	1080	*20	1	A	20	1	500	EXISTING LOAD	20
21	EXISTING LOAD	1080	*20	1	B	20	1	500	EXISTING LOAD	22
23	EXISTING LOAD	1080	*20	1	C	20	1	500	EXISTING LOAD	24
25	EXISTING LOAD	1080	*20	1	A	20	1	500	EXISTING LOAD	26
27	EXISTING LOAD	1080	*20	1	B	20	1	500	EXISTING LOAD	28
29	EXISTING LOAD	1080	*20	1	C	20	1	500	EXISTING LOAD	30
31	EXISTING LOAD	1080	*20	1	A	**20	1	1000	N.S. COPIER	32
33	EXISTING LOAD	1080	*20	1	B	**20	1	500	STAFF FRIDGE	34
35	S.O.	–	–	1	C	**20	1	360	R – STAFF LOUNGE	36
37	S.O.	–	–	1	A	–	1	720	R – CLEAN STOR	38
39	S.O.	–	–	1	B	–	1	720	R – SOILED/POU	40
41	S.O.	–	–	1	C	–	1	–	S.O.	42

NOTES:
1. RELOCATED LOADS SHOWN ON THIS SCHEDULE WERE TAKEN FROM RECORD DRAWINGS.
*DENOTES CIRCUIT FEEDING PATIENT ROOM, LOAD REFLECTS ADDED RECEPTACLES
**PROVIDE NEW CIRCUIT BREAKER IN EXISTING SPACE ONLY.

"L4GG" LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	0.0	0.4	22.8	6.5	29.7	82.4
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	0.0	0.0	9.2	6.0	15.2	42.2
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	0.0	0.0	9.2	6.0	15.2	42.2

EXISTING PANEL: L4G — NORMAL

LOCATION: ELEC. RM. 04–0225
MAIN BUS: 125A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: L3G
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	1080	***20	1	A	20	1	720	EXISTING LOAD	2
3	EXISTING LOAD	1080	***20	1	B	**20	1	960	TREADMILL	4
5	EXISTING LOAD	1080	***20	1	C	**20	1	1000	NOURISH ICE	6
7	EXISTING LOAD	1080	***20	1	A	**20	1	1000	NOURISH ICE	8
9	EXISTING LOAD	1080	***20	1	B	**20	1	540	R – PHARM.	10
11	EXISTING LOAD	1080	***20	1	C	20	1	500	EXISTING LOAD	12
13	EXISTING LOAD	1080	***20	1	A	20	1	500	EXISTING LOAD	14
15	EXISTING LOAD	1080	***20	1	B	20	1	500	EXISTING LOAD	16
17	EXISTING LOAD	1080	***20	1	C	20	1	500	EXISTING LOAD	18
19	EXISTING LOAD	1080	***20	1	A	20	1	500	EXISTING LOAD	20
21	EXISTING LOAD	1080	***20	1	B	20	1	500	EXISTING LOAD	22
23	EXISTING LOAD	1080	***20	1	C	20	1	500	EXISTING LOAD	24
25	EXISTING LOAD	1080	***20	1	A	**20	1	500	NOURISH FRIDGE	26
27	EXISTING LOAD	1080	***20	1	B	**20	1	720	R– MEDS	28
29	EXISTING LOAD	1080	***20	1	C	**20	1	1000	N.S. COPIER	30
31	EXISTING LOAD	1080	***20	1	A	**20	1	720	R – DICTATION	32
33	EXISTING LOAD	1080	***20	1	B	**20	1	1215	L – CORE	34
35	S.O.	–			C	**20	1	156	L – WALL SCONCE	36
37	S.O.	–			A		–		S.O.	38
39	S.O.	–			B		–		S.O.	40
41	S.O.	–			C		–		S.O.	42

NOTES:
*DENOTES CIRCUIT RECOVERED FROM DEMOLITION. NOTIFY ENGINEER IF RECOVERED QUANTITEIS DIFFERS FROM THIS SCHEDULE.
** PROVIDE NEW CIRCUIT BREAKER IN EXISTING SPACE ONLY
***DENOTES CIRCUIT SERVING PATIENT ROOM, LOADS REFLECT ADDED RECEPTACLES

"L4G" LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	1.4	0.0	21.1	8.0	30.4	84.4
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	1.0	0.0	8.4	8.0	17.4	48.3
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	1.3	0.0	8.4	8.0	17.6	49.0

EXISTING PANEL: CL4G — CRITICAL

LOCATION: ELEC. RM. 04–0225
MAIN BUS: 100A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: CL3G
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	740	*20	1	A	20	1	720	EXISTING LOAD	2
3	EXISTING LOAD	740	*20	1	B	**20**	1	–	RECOVERED	4
5	EXISTING LOAD	740	*20	1	C	**20**	1	–	RECOVERED	6
7	EXISTING LOAD	740	*20	1	A	**20**	1	–	RECOVERED	8
9	EXISTING LOAD	740	*20	1	B	20	1	720	EXISTING LOAD	10
11	EXISTING LOAD	740	*20	1	C	20	1	720	EXISTING LOAD	12
13	EXISTING LOAD	740	*20	1	A	**20**	1	–	RECOVERED	14
15	EXISTING LOAD	740	*20	1	B	**20**	1	–	RECOVERED	16
17	EXISTING LOAD	740	*20	1	C	**20**	1	–	RECOVERED	18
19	EXISTING LOAD	740	*20	1	A	**20**	1	–	RECOVERED	20
21	EXISTING LOAD	740	*20	1	B	20	1	720	EXISTING LOAD	22
23	EXISTING LOAD	740	*20	1	C	**20**	1	560	L – SOUTH SIDE	24
25	EXISTING LOAD	740	*20	1	A	20	1	–	SPARE	26
27	EXISTING LOAD	740	*20	1	B	20	1	–	SPARE	28
29	EXISTING LOAD	740	*20	1	C	20	1	1000	EXISTING LOAD	30
31	R – NURSE STATION	720	20	1	A	20	1	–	SPARE	32
33	R – NURSE STATION	720	20	1	B	20	1	–	SPARE	34
35	MEDS ACCUDOSE	500	20	1	C	20	1	–	SPARE	36
37	MEDS FRIDGE	500	20	1	A	100	3	5315	PANEL "CL4GG"	38
39	R – DICTATION	540	20	1	B			5780		40
41	R – PHARM.	540	20	1	C			5650		42

NOTES:
*DENOTES CIRCUIT FEEDING PATIENT ROOM, LOAD INCLUDES ADDED RECEPTACLES
1. EXISTING LOADS WERE TAKEN FROM RECORD DRAWINGS.

"CL4G" LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	1.9	0.4	30.5	3.0	35.8	99.4
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	2.0	0.0	12.4	3.0	17.4	48.3
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	2.5	0.0	12.4	3.0	17.9	49.7

Legibly identify each breaker or switch for it's use or purpose on the circuit directory in the panel/switchboard per 2008 NEC 408.4

EXISTING PANEL: LP6 — NORMAL

LOCATION: 4W MECH RM
MAIN BUS: 125A
MCB: 125A
VOLTAGE: 480/277
AIC: 10,000A

FED FROM: MSB
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Circuit Breaker

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	CENTER LTS	–	20	1	A	–	1	–	S.O.	2
3	HALL LTS	–	20	1	B	–	1	–	S.O.	4
5	EXISTING LOAD	–	20	1	C	–	1	–	S.O.	6
7	AHU–4	–	15	3	A	20	3	–	EXISTING LOAD	8
9	---	–			B			–	---	10
11	---	–			C			–	---	12
13	SPARE	–	20	1	A	15	3	–	EXISTING LOAD	14
15	9	–	20	1	B			–	---	16
17	SPARE	–	20	1	C			–	---	18

NOTES:

"LP6" LOAD SUMMARY

	LTS	RCPTS	MTRS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	0.0	0.0	0.0	0.0	0.0	0.0	0.0
DEMAND FACTOR	SEE DEMAND FACTOR TABLE						
TOTAL DEMAND LOAD	0.0	0.0	0.0	0.0	0.0	0.0	0.0
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00	1.00		
TOTAL DESIGN LOAD	0.0	0.0	0.0	0.0	0.0	0.0	0.0

EXISTING PANEL: EMLP–5 — CRITICAL

LOCATION: WEST IT CLOSET
MAIN BUS: 100A
MCB: 100A
VOLTAGE: 480/277
AIC: 14,000A

FED FROM: CBDP
WIRES: 4W + G
ENCLOSURE: To Be Selected
BUS TYPE: To Be Selected
MOUNTING: To Be Selected
PANEL LUGS: Main Circuit Breaker

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	HAU LTG	–	20	1	A	25	3	–	EXISTING LOAD	2
3	SPARE	–	20	1	B			–		4
5	SPARE	–	20	1	C			–		6
7	SPARE	–	20	1	A	70	3	–	45 KVX XFWR	8
9	SPARE	–	20	1	B			–		10
11	SPARE	–	20	1	C			–		12

NOTES:

"EMLP–5" LOAD SUMMARY

	LTS	RCPTS	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	0.0	0.0	0.0	0.0	0.0
DEMAND FACTOR	SEE DEMAND FACTOR TABLE				
TOTAL DEMAND LOAD	0.0	0.0	0.0	0.0	0.0
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00		
TOTAL DESIGN LOAD	0.0	0.0	0.0	0.0	0.0

EXISTING PANEL: CL4GG — CRITICAL

LOCATION: RM 4–0225
MAIN BUS: 100A
MCB: N/A
VOLTAGE: 208/120
AIC: 10,000A

FED FROM: CL4G
WIRES: 4W + G
ENCLOSURE: NEMA 1
BUS TYPE: Copper
MOUNTING: Surface
PANEL LUGS: Main Lugs Only

NEUTRAL BUS: Yes
GROUND BUS: Yes
ISOLATED GROUND BUS: No
200% NEUTRAL: No
FEED THROUGH LUGS: Yes

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	EXISTING LOAD	500	20	1	A	*20	1	540	R – NURSE STATION	2
3	EXISTING LOAD	500	20	1	B	*20	1	900	R – NURSE STATION/MEDS	4
5	EXISTING LOAD	540	**20	1	C	*20	1	500	MEDS FRIDGE	6
7	EXISTING LOAD	540	**20	1	A	*20	1	500	MEDS ACCUDOSE	8
9	EXISTING LOAD	500	20	1	B	*20	1	540	R – NURSE STATION	10
11	EXISTING LOAD	500	20	1	C	*20	1	720	R – NURSE STATION	12
13	EXISTING LOAD	540	**20	1	A	20	1	–	RECOVERED	14
15	EXISTING LOAD	500	20	1	B	20	1	–	RECOVERED	16
17	EXISTING LOAD	540	**20	1	C	20	1	720	EXISTING LOAD	18
19	EXISTING LOAD	500	20	1	A	20	1	–	RECOVERED	20
21	EXISTING LOAD	540	**20	1	B	20	1	360	EXISTING LOAD	22
23	EXISTING LOAD	500	20	1	C	20	1	180	EXISTING LOAD	24
25	EXISTING LOAD	540	**20	1	A	20	1	720	EXISTING LOAD	26
27	EXISTING LOAD	500	20	1	B	20	1	720	EXISTING LOAD	28
29	EXISTING LOAD	540	**20	1	C	20	1	–	RECOVERED	30
31	EXISTING LOAD	500	20	1	A	20	1	–	RECOVERED	32
33	SPARE	–	20	1	B	20	1	720	EXISTING LOAD	34
35	SPARE	–	20	1	C	20	1	910	L – NORTH SIDE	36
37	SPARE	–	20	1	A	20	1	435	L – PTNT RMS 437–441	38
39	SPARE	–	20	1	B	20	1	–	SPARE	40
41	SPARE	–	20	1	C	20	1	–	SPARE	42

NOTES:
*DENOTES CIRCUIT RECOVERED FROM DEMOLITION. NOTIFY ENGINEER IF RECOVERED QUANTITIES DIFFERS FROM THIS SCHEDULE.
**DENOTES CIRCUITS FEEDING PATIENT ROOMS, LOADS REFLECT ADDED RECEPTACLES.
1. LOADS SHOWN ON RELOCATED CIRCUITS WERE TAKEN FROM RECORD DRAWINGS

"CL4GG" LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	1.3	0.4	14.0	1.0	16.7	46.5
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	1.0	0.0	5.6	1.0	7.6	21.1
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	1.3	0.0	5.6	1.0	7.8	21.8

AURORA BUILDING INSPECTION
ELECTRICAL SECTION
APPROVED
SUBJECT TO COMMENTS AS NOTED
AND FIELD INSPECTIONS

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
DATE APPROVED JUL 30 2009

2009411495

GENERAL NOTES

A. LOADS SHOWN ON THESE SCHEDULES ARE 'ADDED' OR NEW LOADS. LOADS SHOWN ON THESE SCHEDULES DO NOT REFLECT EXISTING LOADS
B. ALL RECOVERED CIRCUITS SHALL BE UPDATED ON THE PANEL SCHEDULES AND LABELED AS "SPARE".
C. CONTRACTOR SHALL CAREFULLY TRACE ALL EXISTING/RELOCATED CIRCUITS FEEDING PANELS WITHIN THE SCOPE OF WORK. PROVIDE UPDATED PANEL DIRECTORIES INDICATING ACTUAL LOADS SERVED. (1)

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HEERY design

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720.946.0276

project number
0906700

AA 0002293
EB 0005176

MEDICAL CENTER OF AURORA

FOURTH FLOOR RENOVATION

1501 S. POTOMAC ST.
AURORA, CO 80012

consultants/construction managers

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Suite 200
Greenwood Village, CO 80111

303-694-4755

Howel Construction
550 Lipan St.
Denver, CO 80204

303-899-4787

seal/signature

COLORADO LICENSE — LARSON MONTGOMERY — 41466 — 07/15/09 — PROFESSIONAL ENGINEER

issued for — date
CONSTRUCTION — 07/15/2009

item		date
1	PLAN REVIEW RESPONSE	07.29.09

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan
sheet title
ELECTRICAL PANEL SCHEDULES

sheet number
E8.02

drawn by MM — checked by MM

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WHEN PLOTTED AT FULL SIZE THIS SHEET MEASURES 24"x36"

PANEL: LPL — NORMAL

LOCATION: WEST ELEC. | **FED FROM:** T-LP6 | **NEUTRAL BUS:** Yes
MAIN BUS: 125A | **WIRES:** 4W + G | **GROUND BUS:** Yes
MCB: N/A | **ENCLOSURE:** NEMA 1 | **ISOLATED GROUND BUS:** No
VOLTAGE: 208/120 | **BUS TYPE:** Copper | **200% NEUTRAL:** No
AIC: 10,000A | **MOUNTING:** Surface | **FEED THROUGH LUGS:** Yes
PANEL LUGS: Main Lugs Only

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	RELOCATED CIRCUIT 'LPL'	500	20	1	A	20	1	500	RELOCATED CIRCUIT 'LPL'	2
3	RELOCATED CIRCUIT 'LPL'	500	20	1	B	20	1	500	RELOCATED CIRCUIT 'LPL'	4
5	RELOCATED CIRCUIT 'LPL'	500	20	1	C	20	1	500	RELOCATED CIRCUIT 'LPL'	6
7	RELOCATED CIRCUIT 'LPL'	500	20	1	A	20	1	1440	RELOCATED CIRCUIT 'LPL'	8
9	RELOCATED CIRCUIT 'LPL'	500	20	1	B	*20	1	1440	RELOCATED CIRCUIT 'LPL'	10
11	RELOCATED CIRCUIT 'LPL'	500	20	1	C	*20	1	1440	RELOCATED CIRCUIT 'LPL'	12
13	RELOCATED CIRCUIT 'LPL'	1440	*20	1	A	*20	1	1440	RELOCATED CIRCUIT 'LPL'	14
15	RELOCATED CIRCUIT 'LPL'	1440	*20	1	B	*20	1	1080	RELOCATED CIRCUIT 'LPL'	16
17	RELOCATED CIRCUIT 'LPL'	1080	20	1	C	*20	1	1080	RELOCATED CIRCUIT 'LPL'	18
19	RELOCATED CIRCUIT 'LPL'	720	*20	1	A	*20	1	1080	RELOCATED CIRCUIT 'LPL'	20
21	RELOCATED CIRCUIT 'LPL'	1080	20	1	B	*20	1	1080	RELOCATED CIRCUIT 'LPL'	22
23	RELOCATED CIRCUIT 'LPL'	1440	*20	1	C	*20	1	1080	RELOCATED CIRCUIT 'LPL'	24
25	RELOCATED CIRCUIT 'LPL'	1440	*20	1	A	20	1	1080	RELOCATED CIRCUIT 'LPL'	26
27	RELOCATED CIRCUIT 'LPL'	1440	*20	1	B	*20	1	720	RELOCATED CIRCUIT 'LPL'	28
29	RELOCATED CIRCUIT 'LPL'	1440	*20	1	C	*20	1	720	RELOCATED CIRCUIT 'LPL'	30
31	R – STAFF LOUNGE	500	20	1	A	20	1	720	RELOCATED CIRCUIT 'LPL'	32
33	SPARE	–	20	1	B	20	1	720	RELOCATED CIRCUIT 'LPL'	34
35	SPARE	–	20	1	C	20	1	720	RELOCATED CIRCUIT 'LPL'	36
37	RELOCATED CIRCUIT 'LPL'	720	20	1	A	20	1	720	RELOCATED CIRCUIT 'LPL'	38
39	RELOCATED CIRCUIT 'LPL'	720	*20	1	B	20	1	1080	RELOCATED CIRCUIT 'LPL'	40
41	RELOCATED CIRCUIT 'LPL'	720	20	1	C	20	1	1080	RELOCATED CIRCUIT 'LPL'	42

NOTES:
* DENOTES CIRCUITS FEEDING PATIENT ROOMS, LOADS SHOWN REFLECT ADDED RECEPTACLES
1. LOADS SHOWN ON RELOCATED CIRCUITS WERE TAKEN FROM RECORD DRAWINGS.

PANEL: LPL (SECTION 2) — NORMAL

LOCATION: WEST ELEC. | **WIRES:** 4W + G | **NEUTRAL BUS:** Yes
MAIN BUS: 125A | **ENCLOSURE:** NEMA 1 | **GROUND BUS:** Yes
MCB: N/A | **BUS TYPE:** Copper | **ISOLATED GROUND BUS:** No
VOLTAGE: 208/120 | **MOUNTING:** Surface | **200% NEUTRAL:** No
AIC: 10,000A | **PANEL LUGS:** Main Lugs Only | **FEED THROUGH LUGS:** No

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
43	RELOCATED CIRCUIT 'LPL2'	1000	40	3	A	20	1	720	RELOCATED CIRCUIT 'LPL2'	44
45		1000			B	20	1	500	RELOCATED CIRCUIT 'LPL2'	46
47		1000			C	20	1	1000	RELOCATED CIRCUIT 'LPL2'	48
49	RELOCATED CIRCUIT 'LPL2'	1080	20	1	A	30	2	1000	RELOCATED CIRCUIT 'LPL2'	50
51	RELOCATED CIRCUIT 'LPL2'	180	20	1	B			1000		52
53	RELOCATED CIRCUIT 'LPL2'	720	20	1	C	20	1	785	L – CORE	54
55	LOUNGE FRIDGE	500	20	1	A	20	1	817	L – SITTER ROOM	56
57	R – STAFF LOUNGE	540	20	1	B	20	1	180	R – NOURISH	58
59	R – SITTER ROOM	900	20	1	C	20	1	–	SPARE	60
61	NOURISH – ICE	960	20	1	A	20	1	–	SPARE	62
63	NOURISH – ICE	960	20	1	B	20	1	–	SPARE	64
65	R – NOURISH	680	20	1	C	20	1	–	SPARE	66
67	R – DIALYSIS	900	20	1	A	20	1	–	SPARE	68
69	COPIER	1000	20	1	B	20	1	–	SPARE	70
71	SPARE	–	20	1	C	20	1	–	SPARE	72
73	SPARE	–	20	1	A	20	1	–	SPARE	74
75	SPARE	–	20	1	B	20	1	–	SPARE	76
77	SPARE	–	20	1	C	20	1	–	SPARE	78
79	SPARE	–	20	1	A	20	1	–	SPARE	80
81	SPARE	–	20	1	B	20	1	–	SPARE	82
83	SPARE	–	20	1	C	20	1	–	SPARE	84

NOTES:
1. LOADS SHOWN ON RELOCATED CIRCUITS WERE TAKEN FROM RECORD DRAWINGS.

'LPL' LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	1.6	0.0	42.3	10.9	54.8	152.2
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	2.0	0.0	16.8	11.0	29.8	82.7
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	2.5	0.0	16.8	11.0	30.3	84.1

PANEL: LPK — NORMAL

LOCATION: MEDS | **FED FROM:** LP6 | **NEUTRAL BUS:** Yes
MAIN BUS: 125A | **WIRES:** 4W + G | **GROUND BUS:** Yes
MCB: N/A | **ENCLOSURE:** NEMA 1 | **ISOLATED GROUND BUS:** No
VOLTAGE: 208/120 | **BUS TYPE:** Copper | **200% NEUTRAL:** No
AIC: 10,000A | **MOUNTING:** Recessed | **FEED THROUGH LUGS:** Yes
PANEL LUGS: Main Lugs Only

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	RELOCATED CIRCUIT 'LPK'	500	20	1	A	20	1	500	RELOCATED CIRCUIT 'LPK'	2
3	RELOCATED CIRCUIT 'LPK'	500	20	1	B	20	1	500	RELOCATED CIRCUIT 'LPK'	4
5	RELOCATED CIRCUIT 'LPK'	500	20	1	C	20	1	500	RELOCATED CIRCUIT 'LPK'	6
7	RELOCATED CIRCUIT 'LPK'	500	20	1	A	20	1	500	RELOCATED CIRCUIT 'LPK'	8
9	RELOCATED CIRCUIT 'LPK'	500	20	1	B	20	1	1080	RELOCATED CIRCUIT 'LPK'	10
11	RELOCATED CIRCUIT 'LPK'	720	20	1	C	*20	1	1440	RELOCATED CIRCUIT 'LPK'	12
13	RELOCATED CIRCUIT 'LPK'	1080	20	1	A	*20	1	1440	RELOCATED CIRCUIT 'LPK'	14
15	RELOCATED CIRCUIT 'LPK'	1440	*20	1	B	*20	1	1440	RELOCATED CIRCUIT 'LPK'	16
17	RELOCATED CIRCUIT 'LPK'	1440	*20	1	C	*20	1	1440	RELOCATED CIRCUIT 'LPK'	18
19	RELOCATED CIRCUIT 'LPK'	1440	*20	1	A	*20	1	1440	RELOCATED CIRCUIT 'LPK'	20
21	RELOCATED CIRCUIT 'LPK'	1440	*20	1	B	*20	1	1440	RELOCATED CIRCUIT 'LPK'	22
23	RELOCATED CIRCUIT 'LPK'	1440	*20	1	C	20	1	1080	RELOCATED CIRCUIT 'LPK'	24
25	RELOCATED CIRCUIT 'LPK'	1440	*20	1	A	20	1	1080	RELOCATED CIRCUIT 'LPK'	26
27	RELOCATED CIRCUIT 'LPK'	1080	20	1	B	20	1	500	RELOCATED CIRCUIT 'LPK'	28
29	RELOCATED CIRCUIT 'LPK'	1440	*20	1	C	20	1	720	RELOCATED CIRCUIT 'LPK'	30
31	RELOCATED CIRCUIT 'LPK'	1080	20	1	A	20	1	720	RELOCATED CIRCUIT 'LPK'	32
33	RELOCATED CIRCUIT 'LPK'	720	20	1	B	20	1	720	RELOCATED CIRCUIT 'LPK'	34
35	RELOCATED CIRCUIT 'LPK'	1080	20	1	C	20	1	720	RELOCATED CIRCUIT 'LPK'	36
37	RELOCATED CIRCUIT 'LPK'	500	20	1	A	20	1	720	RELOCATED CIRCUIT 'LPK'	38
39	RELOCATED CIRCUIT 'LPK'	180	20	1	B	20	1	720	R – CLEAN STORAGE	40
41	RELOCATED CIRCUIT 'LPK'	1080	20	1	C	20	1	–	SPARE	42

NOTES:
* DENOTES CIRCUITS FEEDING PATIENT ROOMS, LOADS SHOWN REFLECT ADDED RECEPTACLES
1. LOADS SHOWN ON RELOCATED CIRCUITS WERE TAKEN FROM RECORD DRAWINGS.

PANEL: LPK (SECTION 2) — NORMAL

LOCATION: MEDS | **WIRES:** 4W + G | **NEUTRAL BUS:** Yes
MAIN BUS: 125A | **ENCLOSURE:** NEMA 1 | **GROUND BUS:** Yes
MCB: N/A | **BUS TYPE:** Copper | **ISOLATED GROUND BUS:** No
VOLTAGE: 208/120 | **MOUNTING:** Recessed | **200% NEUTRAL:** No
AIC: 10,000A | **PANEL LUGS:** Main Lugs Only | **FEED THROUGH LUGS:** No

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
43	R – MEDS/WAITING	720	20	1	A	20	1	469	L – SCONCES/WAITING	44
45	VENDING MACHINE	960	20	1	B	20	1	–	SPARE	46
47	WATER COOLER	500	20	1	C	20	1	–	SPARE	48
49	R – SCALES	720	20	1	A	20	1	–	SPARE	50
51	R – FAMILY WAIT	360	20	1	B	20	1	–	SPARE	52
53	SPARE	–	20	1	C	20	1	–	SPARE	54
55	SPARE	–	20	1	A	20	1	–	SPARE	56
57	SPARE	–	20	1	B	20	1	–	SPARE	58
59	SPARE	–	20	1	C	20	1	–	SPARE	60
61	SPARE	–	20	1	A	20	1	–	SPARE	62
63	SPARE	–	20	1	B	20	1	–	SPARE	64
65	SPARE	–	20	1	C	20	1	–	SPARE	66
67	SPARE	–	20	1	A	20	1	–	SPARE	68
69	SPARE	–	20	1	B	20	1	–	SPARE	70
71	SPARE	–	20	1	C	20	1	–	SPARE	72
73	SPARE	–	20	1	A	20	1	–	SPARE	74
75	SPARE	–	20	1	B	20	1	–	SPARE	76
77	SPARE	–	20	1	C	20	1	–	SPARE	78
79	SPARE	–	20	1	A	20	1	–	SPARE	80
81	SPARE	–	20	1	B	20	1	–	SPARE	82
83	SPARE	–	20	1	C	20	1	–	SPARE	84

NOTES:

'LPK' LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	0.5	0.0	39.6	2.5	42.5	118.0
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	0.0	0.0	16.0	2.0	18.0	50.0
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	0.0	0.0	16.0	2.0	18.0	50.0

PANEL: EMPK — CRITICAL

LOCATION: MEDS | **FED FROM:** | **NEUTRAL BUS:** Yes
MAIN BUS: 100A | **WIRES:** 4W + G | **GROUND BUS:** Yes
MCB: N/A | **ENCLOSURE:** NEMA 1 | **ISOLATED GROUND BUS:** No
VOLTAGE: 208/120 | **BUS TYPE:** Copper | **200% NEUTRAL:** No
AIC: 10,000A | **MOUNTING:** Surface | **FEED THROUGH LUGS:** Yes
PANEL LUGS: Main Lugs Only

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	RELOCATED CIRCUIT 'EMPK'	500	20	1	A	20	1	500	RELOCATED CIRCUIT 'EMPK'	2
3	RELOCATED CIRCUIT 'EMPK'	500	20	1	B	20	1	500	RELOCATED CIRCUIT 'EMPK'	4
5	RELOCATED CIRCUIT 'EMPK'	500	20	1	C	20	1	720	RELOCATED CIRCUIT 'EMPK'	6
7	RELOCATED CIRCUIT 'EMPK'	500	20	1	A	20	1	360	RELOCATED CIRCUIT 'EMPK'	8
9	RELOCATED CIRCUIT 'EMPK'	360	20	1	B	20	1	360	RELOCATED CIRCUIT 'EMPK'	10
11	RELOCATED CIRCUIT 'EMPK'	360	20	1	C	20	1	360	RELOCATED CIRCUIT 'EMPK'	12
13	MEDS FRIDGE	500	20	1	A	20	1	500	L – SITTING/STAFF	14
15	MEDS ACCUDOSE	500	20	1	B	20	1	840	L – CORE	16
17	R – NURSE STATION	540	20	1	C	20	1	360	FMS	18
19	R – NURSE STATION	540	20	1	A	20	1	–	SPARE	20
21	RELOCATED CIRCUIT 'LEM5'	720	*20	1	B	*20	1	720	RELOCATED CIRCUIT 'LEM5'	22
23	RELOCATED CIRCUIT 'LEM5'	720	*20	1	C	*20	1	720	RELOCATED CIRCUIT 'LEM5'	24
25	RELOCATED CIRCUIT 'LEM5'	720	*20	1	A	*20	1	720	RELOCATED CIRCUIT 'LEM5'	26
27	RELOCATED CIRCUIT 'LEM5'	720	*20	1	B	*20	1	720	RELOCATED CIRCUIT 'LEM5'	28
29	RELOCATED CIRCUIT 'LEM5'	720	*20	1	C	*20	1	720	RELOCATED CIRCUIT 'LEM5'	30
31	RELOCATED CIRCUIT 'LEM5'	720	*20	1	A	*20	1	720	RELOCATED CIRCUIT 'LEM5'	32
33	RELOCATED CIRCUIT 'LEM5'	720	*20	1	B	*20	1	720	RELOCATED CIRCUIT 'LEM5'	34
35	RELOCATED CIRCUIT 'LEM5'	720	*20	1	C	*20	1	720	RELOCATED CIRCUIT 'LEM5'	36
37	SPARE	–	20	1	A	20	1	–	SPARE	38
39	SPARE	–	20	1	B	20	1	–	SPARE	40
41	SPARE	–	20	1	C	20	1	–	SPARE	42

NOTES:
1. ALL RELOCATED LOADS ON THIS SCHEDULE WERE TAKEN FROM RECORD DRAWINGS.
* DENOTES CIRCUIT FEEDING PATIENT ROOMS, LOADS REFLECT ADDED RECEPTACLES

'EMPK' LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	1.3	1.8	15.8	1.9	20.8	57.8
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	1.0	2.0	6.4	2.0	11.4	31.6
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	1.3	2.0	6.4	2.0	11.7	32.3

PANEL: EMPL — CRITICAL

LOCATION: ALCOVE | **FED FROM:** TLEM5 | **NEUTRAL BUS:** Yes
MAIN BUS: 100A | **WIRES:** 4W + G | **GROUND BUS:** Yes
MCB: N/A | **ENCLOSURE:** NEMA 1 | **ISOLATED GROUND BUS:** No
VOLTAGE: 208/120 | **BUS TYPE:** Copper | **200% NEUTRAL:** No
AIC: 10,000A | **MOUNTING:** Surface | **FEED THROUGH LUGS:** Yes
PANEL LUGS: Main Lugs Only

CKT NO.	DESCRIPTION	TOTAL LOAD (VA)	CIRCUIT BREAKER AMPS	POLES	PHASE	CIRCUIT BREAKER AMPS	POLES	TOTAL LOAD (VA)	DESCRIPTION	CKT NO
1	RELOCATED CIRCUIT 'EMPL'	500	20	1	A	20	1	720	RELOCATED CIRCUIT 'EMPL'	2
3	RELOCATED CIRCUIT 'EMPL'	500	20	1	B	20	1	1080	RELOCATED CIRCUIT 'EMPL'	4
5	RELOCATED CIRCUIT 'EMPL'	720	20	1	C	20	1	1000	RELOCATED CIRCUIT 'EMPL'	6
7	RELOCATED CIRCUIT 'EMPL'	720	20	1	A	20	1	1080	RELOCATED CIRCUIT 'EMPL'	8
9	RELOCATED CIRCUIT 'EMPL'	1080	20	1	B	20	1	1080	RELOCATED CIRCUIT 'EMPL'	10
11	RELOCATED CIRCUIT 'EMPL'	1080	20	1	C	20	1	1080	RELOCATED CIRCUIT 'EMPL'	12
13	DIALYSIS	1000	20	1	A	20	1	500	MEDS – ACCUDOSE	14
15	DIALYSIS	1000	20	1	B	20	1	500	MEDS FRIDGE	16
17	DIALYSIS	1000	20	1	C	20	1	720	R – NURSE STATION	18
19	DIALYSIS	1000	20	1	A	20	1	540	R – NURSE STATION	20
21	DIALYSIS	1000	20	1	B	20	1	540	R – NURSE STATION	22
23	R – DIALYSIS	360	20	1	C	20	1	720	RELOCATED CIRCUIT 'LEM5'	24
25	R – DIALYSIS	360	20	1	A	20	1	–	SPARE	26
27	R – DIALYSIS	720	20	1	B	20	1	–	SPARE	28
29	RELOCATED CIRCUIT 'LEM5'	720	20	1	C	20	1	–	SPARE	30
31	RELOCATED CIRCUIT 'LEM5'	720	20	1	A	20	1	–	SPARE	32
33	RELOCATED CIRCUIT 'LEM5'	720	20	1	B	20	1	–	SPARE	34
35	RELOCATED CIRCUIT 'LEM5'	720	20	1	C	20	1	–	SPARE	36
37	RELOCATED CIRCUIT 'LEM5'	720	20	1	A	20	1	–	SPARE	38
39	RELOCATED CIRCUIT 'LEM5'	720	20	1	B	20	1	–	SPARE	40
41	RELOCATED CIRCUIT 'LEM5'	720	20	1	C	20	1	–	SPARE	42

NOTES:
1. RELOCATED LOADS ON THIS SCHEDULE WERE TAKEN FROM RECORD DRAWINGS.

'EMPL' LOAD SUMMARY

	LTS	RCPTS	HSPTL	MISC	TOTAL (KVA)	TOTAL (AMPS)
TOTAL CONNECTED LOAD	0.0	0.0	18.6	7.0	25.6	71.2
DEMAND FACTOR	SEE DEMAND FACTOR TABLE					
TOTAL DEMAND LOAD	0.0	0.0	7.6	7.0	14.6	40.5
CONTINUOUS (DESIGN) FACTOR	1.25	1.00	1.00	1.00		
TOTAL DESIGN LOAD	0.0	0.0	7.6	7.0	14.6	40.5

DEMAND FACTOR TABLE

LOAD TYPES	FACTORS										NEC REFERENCE
LIGHTS	1.00										220.42
RECEPTACLES	0–10kVA	>10kVA									
	1.00	0.50									220.44
MOTORS	MAX	ALL OTHERS									
	1.25	1.00									220.50
HOSPITAL	0–50kVA	>50kVA									
	0.40	0.20									220.42 & 220.44
DIAGNOSTIC	1 PIECE OF EQUIPMENT		OVER 1 PIECE OF EQUIPMENT								
	1		1	2	3 or more						
	1.00		0.50	0.25	0.10						517.73(2)
ELEVATOR	1	2	3	4	5	6	7	8	9	10 or more	
	1.00	0.95	0.9	0.85	0.82	0.79	0.77	0.75	0.73	0.72	620.14
KITCHEN	1	2	3	4	5	6 or more					
	1.00	1.00	0.90	0.80	0.70	0.65					220.56
HEAT	1.00										220.51
MISCELLANEOUS	1.00										210.19
MISCELLANEOUS 2	1.00										

Legibly identify each breaker or switch for it's use or purpose on the circuit directory in the panel/switchboard per 2008 NEC 408.4.

CITY OF AURORA
BUILDING DIVISION
APPROVED AS NOTED
DATE APPROVED AUG 13 2009

09-411495

GENERAL NOTES

A. CONTRACTOR SHALL CAREFULLY TRACE ALL EXISTING/RELOCATED CIRCUITS FEEDING PANELS WITHIN THE SCOPE OF WORK. PROVIDE UPDATED PANEL DIRECTORIES INDICATING ACTUAL LOADS SERVED.

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HEERY design

Heery International Inc.
820 16th Street Mall,
Suite 200,
Denver, CO 80202-3219
720.946.0276

project number
0906700

AA 0002293
EB 0005176

MEDICAL CENTER OF AURORA

FOURTH FLOOR RENOVATION

1501 S. POTOMAC ST.
AURORA, CO 80012

consultants/construction managers

CCRD Partners
8301 E. Prentice Ave.
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Greenwood Village, CO 80111

303-694-4755

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Denver, CO 80204

303-899-4787

seal/signature

08-07-09
COLORADO LICENSED
LEE
MARK
MARTINEZ
PROFESSIONAL ENGINEER

issued for | date
CONSTRUCTION | 07/15/2009

Item	date
1 PLAN REVIEW RESPONSE	07.29.09
2 ADDENDUM #4	08.05.09

PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan
sheet title

ELECTRICAL PANEL SCHEDULES

sheet number
E8.03

drawn by MM | checked by MM

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WHEN PLOTTED AT FULL SIZE THIS SHEET MEASURES 24"x36"

LUMINAIRE SCHEDULE

TYPE		DESCRIPTION
A	DESCRIPTION:	2' X 4' DIRECT/INDIRECT FLUORESCENT, RECESSED MOUNT WITH FLUSH BRACKET, STATIC, DIE FORMED 20GA STEEL HOUSING, 20GA STEEL REFLECTOR WITH MATTE WHITE POWDERCOAT FINISH, LAMP COMPARTMENT CONSISTING OF 25GA PERFORATED REFRACTOR "BASKET" WITH .11" THICK WHITE ACRYLIC LENS INSERT, REMOVABLE BALLAST/LAMP MODULE TRAY, DUST COVER.
	LAMP(S):	2– F032/841/ECO
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD, U.N.O.
	VOLTAGE:	120
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	FOCAL POINT #FLU–24–B–2–TB–S–XXX–G–PS–DC–WH
	ACCEPT. MFR:	COLUMBIA LIGHTOLIER
A1	DESCRIPTION:	SAME AS 'A' BUT 2' X 2'
	LAMP(S):	2– F017/841/ECO
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD, U.N.O.
	VOLTAGE:	120
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	FOCAL POINT #FLU–22–B–2–TB–S–XXX–G–PS–DC–WH
	ACCEPT. MFR:	COLUMBIA LIGHTOLIER
B	DESCRIPTION:	2' X 4' K12.125 PATTERN ACRYLIC LENSED TROFFER, SPECIFICATION PREMIUM STATIC TROFFER, 20GA ROLLED EDGE DIE–FORMED STEEL HOUSING, HINGED AND LATCHED FROM EITHER SIDE, ENCLOSED SPRING LOADED CAM LATCH, WHITE REGRESSED ALUMINUM DOOR WITH MITERED CORNERS, PAINT AFTER FABRICATION
	LAMP(S):	2 – F032/841/ECO
	BALLAST(S):	120
	VOLTAGE:	277
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	COLUMBIA #4PS24–232G–FAA12–3E120–PAF
	ACCEPT. MFR:	METALUX LIGHTOLIER
B1	DESCRIPTION:	2' X 2' K12.125 PATTERN ACRYLIC LENSED TROFFER, SPECIFICATION PREMIUM STATIC TROFFER, 20GA ROLLED EDGE DIE–FORMED STEEL HOUSING, HINGED AND LATCHED FROM EITHER SIDE, ENCLOSED SPRING LOADED CAM LATCH, WHITE REGRESSED ALUMINUM DOOR WITH MITERED CORNERS, PAINT AFTER FABRICATION
	LAMP(S):	2 – F017/841/ECO
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD
	VOLTAGE:	277
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	COLUMBIA #4PS24–217G–FAA12–3E120–PAF
	ACCEPT. MFR:	METALUX LIGHTOLIER
C	DESCRIPTION:	6" LED DOWNLIGHT, SELF FLANGED REFLECTOR, ANONDIZED LOW IRIDESCENT SEMI–SPECULAR RELFECTOR FINISH, 20GA STEEL HOUSING, 18GA SUPPORTING YOKE ASSEMBLY, JUNCTION BOX FOR THRU WIRING, MAX CANDELA/SQUARE METER IN 45–DEGREE CONE.
	LAMP(S):	10 – 3W LED, 5500K
	BALLAST(S):	N/A, PROVIDE WITH INTEGRAL LED DRIVER
	VOLTAGE:	120
	INSTALLATION:	RECESSED
	MANF:	PRESCOLITE #D6LED–120V–6D9–WT
D	DESCRIPTION:	6" FLUORESCENT DOWNLIGHT WITH VERTICAL LAMP, SELF FLANGED REFLECTOR, ANONDIZED LOW IRIDESCENT SEMI–SPECULAR RELFECTOR FINISH, 20GA STEEL HOUSING, 18GA SUPPORTING YOKE ASSEMBLY, JUNCTION BOX FOR THRU WIRING, WITH MINIMUM EFFICIENCY OF 55% AND MAX CANDELA/SQUARE METER IN 65–DEGREE CONE.
	LAMP(S):	1 – CFTR26W/GX24Q/841
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD
	VOLTAGE:	120
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	PRESCOLITE #CFT632EB–WTF602HMFC–WRL26
	ACCEPT. MFR:	CALCULITE ZUMTOBEL
D1	DESCRIPTION:	6" FLUORESCENT DOWNLIGHT WITH VERTICAL LAMP, SELF FLANGED REFLECTOR, CLEAR GLASS LENS, ANONDIZED LOW IRIDESCENT SEMI–SPECULAR RELFECTOR FINISH, 20GA STEEL HOUSING, 18GA SUPPORTING YOKE ASSEMBLY, JUNCTION BOX FOR THRU WIRING, WITH MINIMUM EFFICIENCY OF 55% AND MAX CANDELA/SQUARE METER IN 65–DEGREE CONE.
	LAMP(S):	1 – CFTR26W/GX24Q/841
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD
	VOLTAGE:	120
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	PRESCOLITE #CFT632EB–WTF602HMFC–CL–WRL26 CALCULITE ZUMTOBEL
F	DESCRIPTION:	1' X 1' RECESSED, MINIMUM 65% EFFICIENT, FLAT ACRYLIC PANELS WITH ACRYLIC LENS. 22 GA. C.R.S. ALL PARTS PAINTED AFTER FABRICATION
	LAMP(S):	1 – CFTR26W/GX24Q/841
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD
	VOLTAGE:	120
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	LEDALITE #9711–D1–ST–C132–S–1–2
F1	DESCRIPTION:	1' X 1' RECESSED, MINIMUM 65% EFFICIENT, FLAT ACRYLIC PANELS WITH ACRYLIC LENS. 22 GA. C.R.S. ALL PARTS PAINTED AFTER FABRICATION PROVIDE FIXTURE WITH INTEGRAL PHOTOCELL. PROVIDE ADD ALTERNATE PRICING TO PROVIDE FIXTURE WITH DIMMABLE BALLAST.
	LAMP(S):	1 – CFTR32W/GX24Q/841
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10%THD
	VOLTAGE:	120
	INSTALLATION:	RECESSED LAY–IN GRID (OR DRYWALL CEILING INSTALL. REF. ARCH. PLANS TO COORDINATE TRIM)
	MANF:	LEDALITE #9711–D1–ST–C132–S–1–2–DS
G	DESCRIPTION:	NURSE STATION PENDANT FIXTURE, WHITE W/ SILVER FLAKES GLOBE, BRONZE CORD.
	LAMP(S):	LED
	BALLAST(S):	N/A, PROVIDE WITH INTEGRAL DRIVER
	VOLTAGE:	120
	INSTALLATION:	PENDANT MOUNTED (CONFIRM MOUNTING HEIGHT WITH ARCHITECT)
	MANF:	BRUCK #22810BZ/MP
H	DESCRIPTION:	WALL MOUNTED DIRECT/INDIRECT HOSPITAL OVERBED LIGHT WITH EXTRUDED ALUMINUM HOUSING AND CLEAR POLYCARBONATE TOP COVER AND TRANSLUCENT POLYCARBONATE BOTTOM COVER. CONTROLLED VIA NURSE CALL PILLOW SIWTCH.
	LAMP(S):	2 – F054T5HO/841/ECO
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10% THD
	VOLTAGE:	120
	INSTALLATION:	WALL (COORDINATE FIXTURE HEIGHT WITH ARCH. ELEVATIONS)
	MANF:	DERUNGS #AMADEA WLS D13 946–000
J	DESCRIPTION:	ASYMMETRIC WALL MOUNT VANITY FIXTURE, BRUSHED ALUMINUM FINISH, CLEAR LENS WITH LINEAR PRISMS
	LAMP(S):	1 – F017/841/ECO
	BALLAST(S):	PROGRAM START ELECTRONIC BALLAST, <10% THD
	VOLTAGE:	120/277 UNIVERSAL
	INSTALLATION:	WALL MOUNTED (COORDINATE FIXTURE HEIGHT WITH ARCH. ELEVATIONS)
	MANF:	ALKCO #TAB117–ASY–120–BA–CL–LS
K	DESCRIPTION:	LED STEP LIGHT, DIE–CAST ALUMINUM ALLOY LOUVER FACE, CLEAR POLY–CARB. LENS, ZINC SCREWS, STEEL BACK BOX.
	LAMP(S):	LED
	BALLAST(S):	N/A, PROVIDE WITH INTEGRAL LED DRIVER
	VOLTAGE:	120V
	INSTALLATION:	RECESSED IN WALL
	MANF:	VISTA #VSP–LED–ST–L–C–ZN–WT–UNV–X
L	DESCRIPTION:	WALL SCONCE, FAUX FINISH, COORDINATE EXACT FINISH WITH ARCHITECT PRIOR TO ORDERING.
	LAMP(S):	1 – 13W/PL/841
	BALLAST(S):	RAPID START ELECTRONIC BALLAST, <10% THD
	VOLTAGE:	120V
	INSTALLATION:	WALL MOUNTED (COORDINATE MOUNTING HEIGHT WITH ARCH. ELEVATIONS)
	MANF:	A–19# ANSEL – MB1 FINISH
M	DESCRIPTION:	4' INDUSTRIAL STRIP FIXTURE, C.R.S. HOUSING
	LAMP(S):	2 – F032/841/ECO
	BALLAST(S):	RAPID START ELECTRONIC BALLAST, <10% THD
	VOLTAGE:	120/277 UNIVERSAL
	INSTALLATION:	WALL MOUNTED 84" AFF
	MANF:	COLUMBIA #CSR4–2–32–EP–U
U	DESCRIPTION:	(2',3',4') UNDERCABINET LIGHT FIXTURE, SOLID FRONT, PRISMATIC ACRYLIC LENS.
	LAMP(S):	1 – F0(17,25,32)/841/ECO
	BALLAST(S):	RAPID START ELECTRONIC BALLAST, <10% THD
	VOLTAGE:	120/277 UNIVERSAL
	INSTALLATION:	UNDERCABINET
	MANF:	KENALL #UCSL–(24,36,48)–SB
X1	DESCRIPTION:	SINGLE FACE, RED LED EDGE–LIT EXIT SIGN, EXTRUDED ALUMINUM HOUSING, SATIN ALUMINUM FINISH
	LAMP(S):	LED
	BALLAST(S):	N/A
	VOLTAGE:	120
	INSTALLATION:	CEILING MOUNTED
	MANF:	DUAL–LITE #LECSRNA INFINITY LIGHTOLIER

LIGHTING FIXTURE SCHEDULE:

1. FAILURE TO PROVIDE PROPER LAMP AND BALLAST INFORMATION WITH LIGHT FIXTURE SUBMITTAL WILL RESULT IN AN AUTOMATIC REJECTION OF FIXTURE SUBMITTAL.
2. CONTRACTOR SHALL VERIFY ALL CEILING TYPES AND TRIM KITS PRIOR TO ORDERING FIXTURES.
3. CONFORMANCE TO A PARTICULAR LIGHT FIXTURE PACKAGE SHALL NOT BE THE SOLE REASON FOR SUBSTITUTIONS.

THIS SHEET OF DRAWINGS HAS NOT BEEN REVIEWED FOR CODE COMPLIANCE.

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PLAN NORTH

SCALE: 1/8" = 1'-0"

key plan

sheet title

ELECTRICAL LIGHT FIXTURE SCHEDULE

sheet number

E8.04

drawn by MM checked by MM

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