

GENERAL NOTES

- NOT ALL SYMBOLS INDICATED IN THE LEGEND APPEAR ON THE DRAWINGS. COORDINATE WORK ACCORDINGLY. COMPLY WITH SPECIFICATIONS AND NOTES BELOW AS APPLICABLE.
- ALL RECEPTACLES SHALL BE INSTALLED 18" AFF TO CENTERLINE OF BOX UNLESS NOTED OTHERWISE.
- PROVIDE PANELBOARDS AS MANUFACTURED BY SQUARE D, GENERAL ELECTRIC, SIEMENS, CUTLER HAMMER OR APPROVED EQUAL.
- ALL WIRING SHALL BE COPPER UNLESS DESIGNATED AS "AL". UNLESS OTHERWISE NOTED ALL WIRING SHALL BE 2*12 AWG, AND 1*12 EQUIPMENT GROUNDING CONDUCTOR. HOMERUNS FED FROM A 20A-1P, 120V CIRCUIT IN EXCESS OF 70' SHALL BE *10 AWG.
- CONNECT BATTERY BACKED EMERGENCY AND EXIT LIGHTING TO NEAREST LIGHTING CIRCUIT AHEAD OF ANY SWITCHING. CONNECT REMOTE HEADS WITH *10 AWG COPPER CONDUCTORS. AC EXIT FIXTURES SHALL BE CONNECTED TO NEAREST EMERGENCY CIRCUIT OR AS INDICATED.
- TEST ALL EMERGENCY LIGHTING UNITS FOR PROPER OPERATION OF LAMPS AND BATTERIES.
- SEE MECHANICAL PLAN FOR HVAC UNITS, PUMPS AND FANS CONTROLLED BY THERMOSTATS (PROVIDED BY ATC CONTRACTOR).
- FUSES AND OVERLOAD UNITS FOR MOTORS SHALL BE SIZED BASED ON ACTUAL MOTOR NAMEPLATE DATA AND IN ACCORDANCE WITH NEC. CIRCUIT BREAKERS FOR MOTORS ARE SUPPLIED AT MAX VALUE PER NEC (2.5 x FLA). SIZE IN THE FIELD IN ACCORDANCE WITH MFR. RECOMMENDATION.
- ALL WORK SHALL COMPLY WITH NFPA70, NFPA72, NFPA101 & ALL FEDERAL, STATE & LOCAL REGULATIONS.
- ALL PENETRATIONS THROUGH FLOORS, RATED WALLS AND PARTITIONS SHALL BE SEALED WITH UL APPROVED FIRE SEALANT MATERIAL TO MAINTAIN FIRE RATING FOR THE SEPARATION.
- ALL ENCLOSURES, CONDUIT BODIES AND THEIR COVERS CONTAINING FIRE ALARM SYSTEM CONDUCTORS SHALL BE PAINTED RED.
- AN EQUIPMENT GROUNDING CONDUCTOR SHALL BE INSTALLED WITH ALL FEEDERS AND BRANCH CIRCUITS. SIZE IN ACCORDANCE WITH NFPA 70 ARTICLE 250.
- PROVIDE TWO BALLASTS FOR EACH FIXTURE INDICATED AS REQUIRING DUAL LEVEL SWITCHING. ONE BALLAST TO CONTROL OUTER LAMPS AND THE SECOND BALLAST TO CONTROL INNER LAMP(S).
- COORDINATE INSTALLATION OF VOICE/DATA OUTLETS WITH OWNER, MIS OR COMMUNICATIONS CONTRACTOR.
- LOCATE DISCONNECTS AT EQUIPMENT AS REQUIRED BY MANUFACTURER. LOCATIONS ON DRAWINGS ARE APPROXIMATE.
- OPERATE ALL FLUORESCENT AND METAL HALIDE LAMPS FROM INITIAL INSTALLATION FOR 100 HOURS AT FULL OUTPUT (NO DIMMING) TO SEASON LAMPS AND STABILIZE LAMP COLOR.
- PROVIDE RISER OR PLENUM RATED CABLES ABOVE SUSPENDED CEILING.
- THE CONTRACTOR SHALL SET ALL ELECTRONIC BREAKERS TO SPECIFIED TRIP SETTINGS BEFORE ENERGIZING EQUIPMENT.
- PROVIDE EXPANSION FITTINGS FOR ALL UNDERGROUND RACEWAYS ENTERING ENCLOSURES ATTACHED TO FIXED STRUCTURES.
- OUTDOOR RECEPTACLE COVERS SHALL COMPLY WITH NFPA 70 - ARTICLE 406.9.
- ALL CONDUCTOR INSULATION FOR BUILDING WIRE SHALL BE THWN UNLESS NOTED OTHERWISE.
- PROVIDE LABEL ON SERVICE EQUIPMENT INDICATION AVAILABLE SHORT CIRCUIT CURRENT ADD TO MASTER AND DATE.
- PROVIDE ARCH FLASH LABELS IN ACCORDANCE WITH NFPA 70, ARTICLE 110.

LIGHT FIXTURE SCHEDULE

- A1** COLUMBA *4PS24-332G-FA12-3EBBLH120 RECESSED 2x4 STATIC FLUORESCENT TROFFER WITH FLUSH FRAME FOR GRID CEILING. ACRYLIC PRISMATIC DIFFUSER, ELECTRIC LOW HARMONIC BALLAST. LAMP: (3) F032/835/XP/ECO
- A2** COLUMBA *4PS23-317G-FA12-3EBBLH120 RECESSED 2x2 STATIC FLUORESCENT TROFFER WITH FLUSH FRAME FOR GRID CEILING. ACRYLIC PRISMATIC DIFFUSER, ELECTRIC LOW HARMONIC BALLAST. LAMP: (3) F40TT
- A3** COLUMBA *4PS24-332G-FA12-3EBBLH120 RECESSED 2x4 STATIC FLUORESCENT TROFFER WITH FLUSH FRAME FOR GRID CEILING. OUTSIDE LAMPS SWITCHED SEPARATELY. ACRYLIC PRISMATIC DIFFUSER, ELECTRIC LOW HARMONIC BALLAST. LAMP: (3) F032/835/XP/ECO
- B1** PRESCOLITE *FCB642THEB 6" RECESSED OPEN DOWN-LIGHT WITH CROSS BAFFLE AND ELECTRONIC NON-DIMMING BALLAST. LAMP: (1) CF42
- EV** DUAL LITE *LZ35-12V I WALL MOUNTED (2) HEAD EMERGENCY LIGHT WITH SELF DIAGNOSTICS, UNLESS NOTED FOR EXTERIOR REMOTE FUNCTION, THEN PROVIDE LZ55 UNIT AND CPR-D-B-12V-10W REMOTE AS INDICATED. BLACK TWIN HEAD W/10W HALOGEN LAMPS, WEATHER PROOF. LAMP: (2) SUPPLIED WITH UNIT SEE SYMBOL LEGEND FOR MORE INFORMATION
- J1** COLUMBA *WC4-232-EBB120 CEILING MOUNTED FLUORESCENT WITH PRISMATIC ACRYLIC LENS. PROVIDE ELECTRONIC LOW HARMONIC BALLAST LAMP: (2) F032/835/XP/ECO

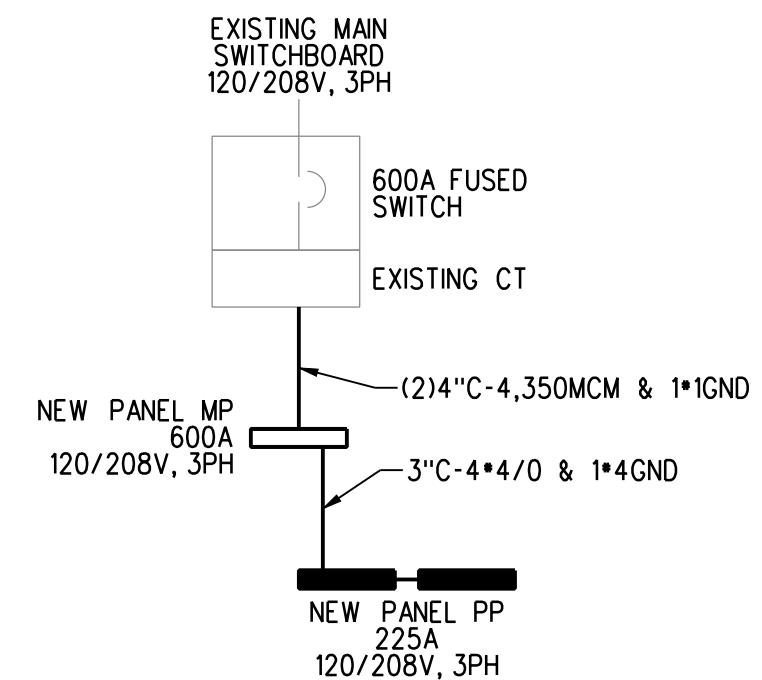
ALL LIGHTING FIXTURES SHALL BE ENERGY STAR RATED OR HAVE HIGH PERFORMANCE ELECTRONIC T8 BALLAST AND LAMPS TO MEET EFFICIENCY MAINE CRITERIA. ALL FLUORESCENT LAMPS 3500K.

ABBREVIATIONS

A	AMP	LC	LIGHTING CONTACTORS
AC	ALTERNATING CURRENT, ABOVE COUNTER	LCP	LATERAL CONTROL PIT
ADA	AMERICANS WITH DISABILITIES ACT	LED	LIGHT EMITTING DIODE
AF	AMP FRAME	LP	LIGHTING PANELBOARD
AFCI	ARC FAULT CIRCUIT INTERRUPTER	LTG	LIGHTING
AFF	ABOVE FINISHED FLOOR	LSIG	LONG TIME, SHORT TIME, INSTANTANEOUS, GROUND FAULT CIRCUIT BREAKER TRIP FUNCTIONS AS INDICATED
AFG	ABOVE FINISHED GRADE	MCC	MOTOR CONTROL CENTER
AIC	AMPERES INTERRUPTING CAPACITY	MCCB	MOLDED CASE CIRCUIT BREAKER
AL	ALUMINUM	MCB	MAIN CIRCUIT BREAKER
AT	AMP TRIP	MDP	MAIN DISTRIBUTION PANEL
ATC	AUTOMATIC TEMPERATURE CONTROL	MH	MANHOLE
ATS	AUTOMATIC TRANSFER SWITCH	MLO	MAIN LUGS ONLY
AWG	AMERICAN WIRE GAUGE	MTS	MANUAL TRANSFER SWITCH
BLDG	BUILDING	NC	NORMALLY CLOSED OF NURSE CALL
C	CONDUIT	NEC	NATIONAL ELECTRICAL CODE
CB	CIRCUIT BREAKER	NFPA	NATIONAL FIRE PROTECTION ASSOCIATION
CI	CAST IRON	NL	NIGHT LIGHT
CKT	CIRCUIT	NO	NORMALLY OPEN
CL	CENTERLINE	NO.	NUMBER
CMP	CENTRAL MAINE POWER (ELECTRIC UTILITY)	OL	OVERLOAD
CMU	CONCRETE MASONRY UNIT	P	POLE
CT	CURRENT TRANSFORMER	PA	PUBLIC ADDRESS
CONC	CONCRETE	PB	PUSH BUTTON
CS	CARBON STEEL	PF	POWER FACTOR
CU	COPPER	PH	PHASE
CUH	CABINET UNIT HEATER	PNL	PANEL
EC	ELECTRICAL CONTRACTOR	TP1-2	TELE-POWER POLE - POLE AND CIRCUIT NUMBER AS INDICATED
EF	EXHAUST FAN	PSNH	PUBLIC SERVICE OF NEW HAMPSHIRE (ELECTRIC UTILITY)
ER	EXISTING REMAINS IN PLACE	PT	POTENTIAL TRANSFORMER
ERL	EXISTING RELOCATE	PVC	POLYVINYL CHLORIDE
ERM	EXISTING REMOVE	RSC	RIGID STEEL CONDUIT
EUH	ELECTRIC UNIT HEATER	RTU	ROOF TOP UNIT
EWC	ELECTRICAL WATER COOLER	SF	SUPPLY FAN
FACP	FIRE ALARM CONTROL PANEL	SLD	SINGLE LINE DIAGRAM
FAPS	FIRE ALARM PULL STATION	SM	MANUAL MOTOR STARTER SWITCH WITH THERMAL OVERLOAD DEVICE, MOUNTED AT UNIT
FRP	FIBER REINFORCED PLASTIC	SS	SOLID STATE
FVNR	FULL VOLTAGE, NON-REVERSING REDUCED VOLTAGE, NON-REVERSING	SWBD-1	SWITCHBOARD NUMBER AS DESIGNATED
RVNR	REDUCED VOLTAGE, NON-REVERSING	TC	TIME CLOCK
DC	DIRECT CURRENT	TS	TRANSFER SWITCH
GFI	GROUND FAULT INTERRUPTER	T&B	TOP AND BOTTOM
GND	GROUND	TYP	TYPICAL
HID	HIGH INTENSITY DISCHARGE	UG	UNDERGROUND
HOA	HAND-OFF-AUTOMATIC	V	VOLT
HP	HORSEPOWER	VA	VOLT-AMPERE
HPS	HIGH PRESSURE SODIUM	VFD	VARIABLE FREQUENCY DRIVE
HZ	HERTZ	W	WATT
ICB	INSULATED CASE CIRCUIT BREAKER	W/	WITH
JB	JUNCTION BOX	WP	WEATHERPROOF
KAC	THOUSAND AMP INTERRUPTING CAPACITY	XFMR	TRANSFORMER
KCMIL	THOUSAND CIRCULAR MIL	XP	EXPLOSION PROOF
KV	THOUSAND VOLTS	3PH	THREE PHASE
KVA	THOUSAND VOLT-AMPS	4W	FOUR WIRE
KW	THOUSAND WATTS (KILOWATT)	3W	THREE WIRE

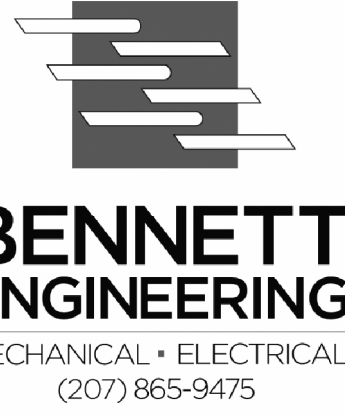
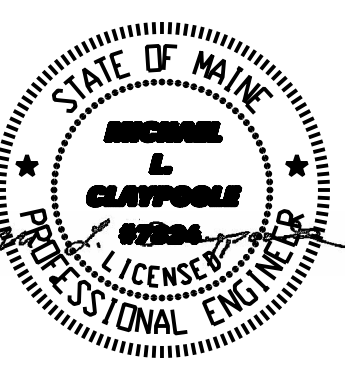
SYMBOL LEGEND

- POWER PANEL, 120/208V, 3PHS, 4WIRE
- ELECTRIC MOTOR DRIVEN EQUIPMENT, HP SHOWN
- JUNCTION BOX - "H" DENOTES RANGE HOOD, "DS" DENOTES DISPOSAL, "DW" DENOTES DISHWASHER
- LIGHTING FIXTURES - CAPITAL LETTERS DENOTE TYPE AS PER LIGHTING FIXTURE SCHEDULE. LOWER CASE LETTERS INDICATE SWITCH CONTROL. DIAGONAL LINE INDICATES NIGHT LIGHT - UNSWITCHED
- DISCONNECT SWITCH - 250 VOLT - SIZE AND NUMBER OF POLES AS INDICATED ON DRAWING PROVIDED AND INSTALLED BY E.C. - UNLESS OTHERWISE NOTED. PROVIDE FUSES WHERE RECOMMENDED BY MANUFACTURER.
- COMBINATION MOTOR STARTER/ DISCONNECT SWITCH - WITH AUXILIARY CONTACTS AND PROVIDED AND INSTALLED BY E.C. - UNLESS OTHERWISE NOTED.
- VARIABLE FREQUENCY DRIVE - PROVIDED BY M.C., INSTALLED AND WIRED BY E.C.
- RACEWAY & WIRING OR MC CABLE RUN CONCEALED IN WALLS/CEILING.
- RACEWAY & WIRING RUN EXPOSED
- RACEWAY & WIRING RUN CONCEALED UNDER FLOOR OR BURIED 30" BELOW FINISH GRADE
- HOME RUN TO PANEL - ARROWS INDICATE QUANTITY OF CIRCUITS - NUMERALS DENOTE CIRCUIT NUMBERS
- BRANCH CIRCUIT WIRING SHALL CONSIST OF 4*12, 1*12G, 3/4" C UNLESS OTHERWISE NOTED. ASTERISK INDICATES *10 AWG FOR ALL CIRCUITS CONTAINED IN HOMERUN. DOUBLE ASTERISK INDICATES 4, *8 & 1, *10, 1" C PROVIDE EQUIPMENT GROUNDS IN ACCORDANCE WITH NFPA 70, ARTICLE 250.
- SINGLE POLE SWITCH, 120 VOLT, 20 AMP, SPEC GRADE, GROUNDING TYPE, MOUNT 48" AFF, 3-3-WAY, 4-4-WAY, P-PILOT LOWER CASE LETTER INDICATES FIXTURE OR CONTROLLED LOAD. PILOT LIGHT SWITCHES SHALL BE PROVIDED W/ ENGRAVED
- BURNER SAFETY SWITCH - PROVIDE WITH RED PLATE - MOUNTED 72" AFF
- SELF CONTAINED EMERGENCY LIGHTING UNIT W/2 HEADS, SEE SCHEDULE
- DUAL-LITE CPR AT DOORS (EXTERIOR)
- DUAL-LITE LZ55 WITH REMOTE EXT. HEADS (2)
- EXIT LIGHT FIXTURE - UNSWITCHED - SEE LIGHTING FIXTURE SCHEDULE
- TEMPERATURE CONTROL PANEL - PROVIDED BY M.C. WIRED BY E.C.
- DUPLEX RECEPTACLE - 20A, 125V SPEC GRADE GROUNDING TYPE, TAMPER PROOF AND MATCHING PLATE - MOUNT 18" AFF
- "R" DENOTES REFRIGERATOR, "D" DENOTES DOUBLE DUPLEX
- DUPLEX RECEPTACLE - 20A, 125V SPEC GRADE GROUNDING TYPE, TAMPER PROOF AND MATCHING PLATE - MOUNT 18" AFF
- BOTTOM RECEPTACLE SWITCHED
- DUPLEX RECEPTACLE - GROUND FAULT OUTLET 20A, 125V - TAMPER PROOF WITH MATCHING PLATE FURNISHED W/ OUTLET, FLUSH MOUNTED 45" AFF EXCEPT AS NOTED.
- DUPLEX RECEPTACLE - 15A, 125V SPEC. GRADE GROUNDING TYPE - FLUSH FLOOR MOUNTED.
- RANGE OUTLET 50 AMP, 250 VOLT, GROUNDING TYPE FLUSH MOUNTED 18" AFF
- DRYER OUTLET 30 AMP, 250 VOLT, GROUNDING TYPE FLUSH MOUNTED 18" AFF
- FIRE ALARM CONTROL PANEL
- FIRE ALARM AUDIO/VISUAL, MOUNT 6'-8" AFF - NUMERAL DENOTES CANDELA RATING "MH" DENOTES MINIHORN, NO DESIGNATION EQUILS A 15cd.
- FIRE ALARM VISUAL STROBE ONLY - FLUSH MOUNT 6'-8" AFF NUMERALS DENOTE CANDELA RATINGS.
- SYSTEM CONNECTED FIXED TEMPERATURE HEAT DETECTOR
- SMOKE DETECTOR, PHOTOELECTRIC TYPE - SYSTEM CONNECTED. "ER" - ELEV. RECALL
- SYSTEM CONNECTED SMOKE DETECTOR, PHOTOELECTRIC TYPE - W/ SOUNDER BASE - "SB" DENOTES SOUNDER BASE.
- DUCT SMOKE DETECTOR & TEST STATION
- FIRE ALARM PULL STATION - MOUNT 48" AFF
- CABLE TV JUNCTION BOX "CTV" - SIZE AS REQUIRED BY CABLE TV CO.
- TV OUTLET LOCATION - CABLE AND JACKS BY E.C.
- TELEPHONE/DATA DUAL JACK LOCATION MOUNT 18" AFF - TWO CAT 5E CABLES BACK TO TBB.
- DATA JACK LOCATION MOUNT 18" AFF - TWO CAT 5E CABLES BACK TO TBB. NUMBER DENOTES THE NUMBER OF CONNECTIONS AT THIS LOCATION
- TELEPHONE JACK LOCATION MOUNT 18" AFF - ONE CAT 5E CABLE BACK TO TBB.
- PHOTOCELL
- LIGHTING CONTACTOR
- TIMECLOCK
- PUSHBUTTON FOR ELECTRICALLY OPERATED DOOR - FURN. W/ DOOR OPERATOR - WIRED BY E.C.
- DOOR PUSHBUTTON
- INTERCOM PANEL IN UNIT
- DOOR ELECTRIC STRIKE
- INTERCOM PANEL AT RECEPTION
- SPRINKLER SYSTEM FLOW SWITCH - SUPPLIED BY SPRINKLER CONTRACTOR WIRED BY E.C.
- SPRINKLER SYSTEM TAMPER SWITCH - VERIFY LOCATIONS WITH SPRINKLER CONTRACTOR.
- MOTION SENSOR (WATTSTOPPER OR EQUAL) CORRIDORS: WT-2255 SENSOR & B120E-P POWER PACK OTHER COMMON SPACES: WT-605 SENSOR & B120E-P POWER PACK
- SMOKE DAMPER



ONE-LINE

NOTE: PROVIDE 1-0 SERVICE GROUPUND AS REQUIRED BY NFPA 70, 250.



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PROJECT TITLE
NEPHROLOGY ASSOCIATES - RENOVATIONS
 1600 CONGRESS STREET
 PORTLAND, MAINE

DRAWING TITLE
NOTES, SCHEDULE, AND ABBREVIATIONS AND SYMBOL LEGEND AND ONE-LINE
 CWS PROJ. NO.: 11422

REVISION DESCRIPTION	DATE
ISSUED FOR CONSTRUCTION	12/22/11

DRAWING NUMBER

E3.0

SCALE: AS NOTED
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NOTES, SCHEDULE, ABBREVIATIONS AND SYMBOL LEGEND

REFERENCED FROM:

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