

WTP GENERATOR

DESIGN TEAM

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SHEET INDEX

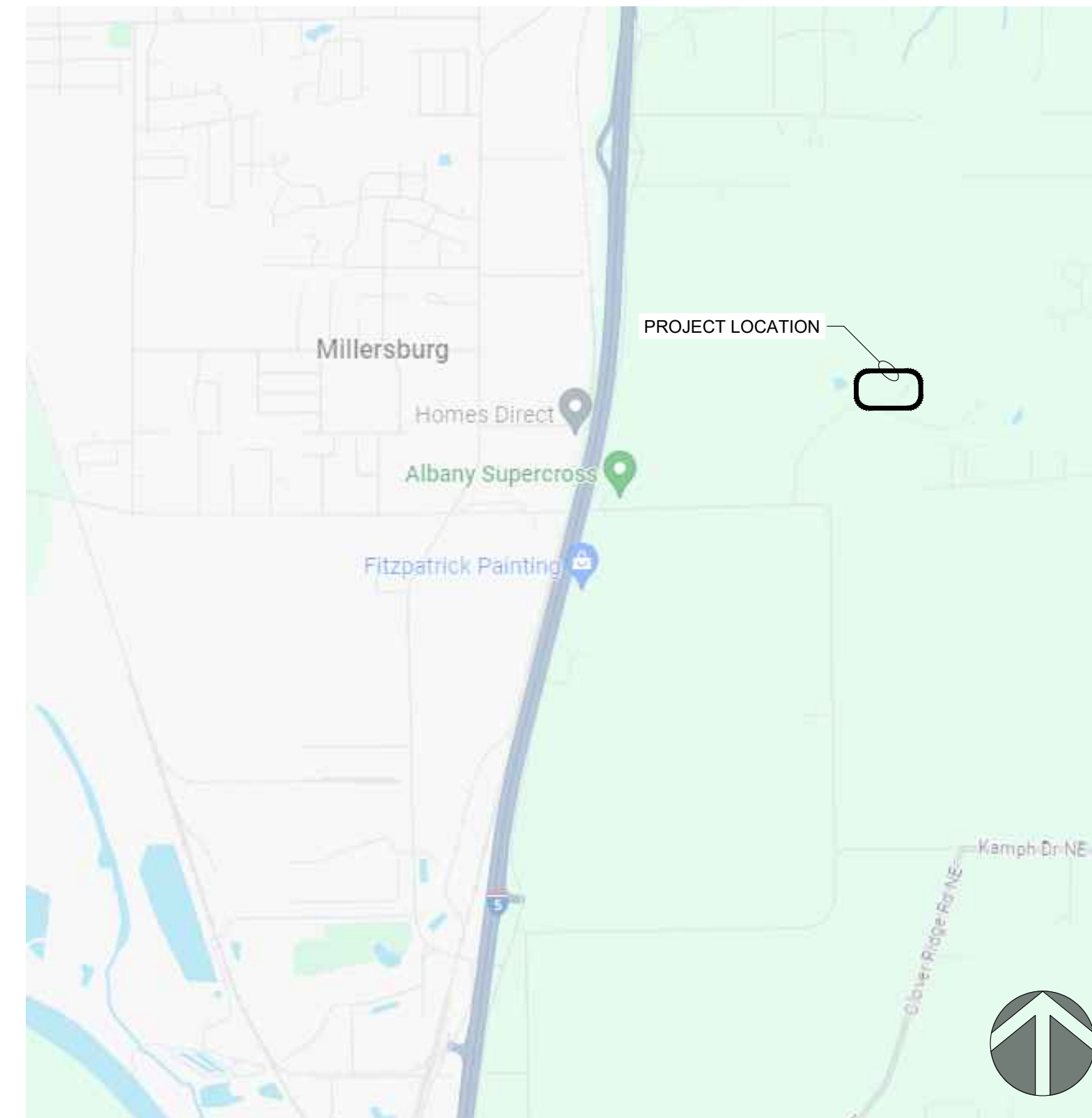
GENERAL

G001 - COVER SHEET & SHEET INDEX

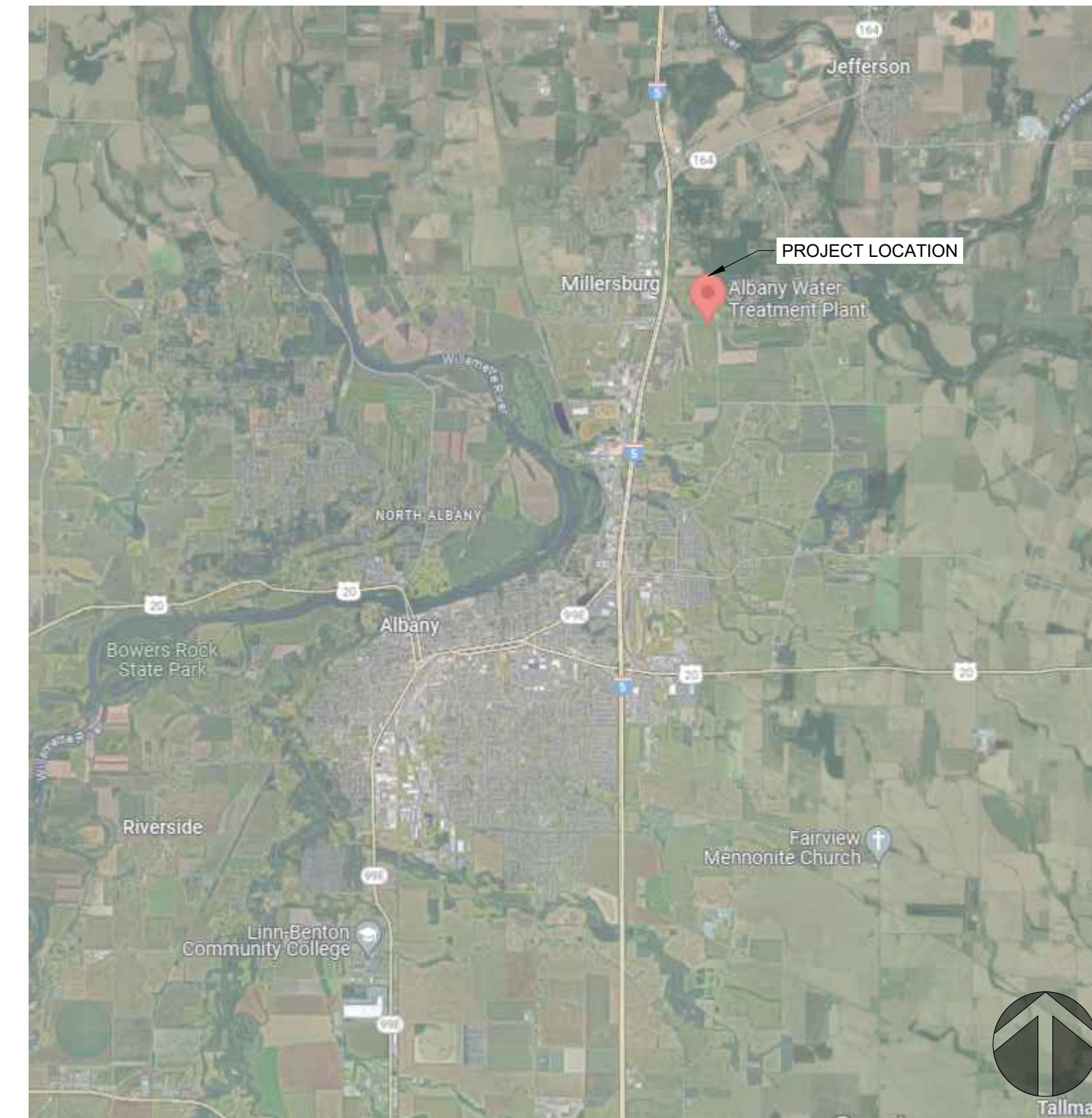
ELECTRICAL

E001 - ELECTRICAL SYMBOL LEGEND & ABBREVIATIONS
E002 - ELECTRICAL SYMBOL LEGEND
E010 - ONE-LINE DIAGRAM
E100 - ELECTRICAL SITE PLAN
E200 - ELECTRICAL ROOM PLAN

AREA MAP



VICINITY MAP



GENERAL NOTES:

- ATTENTION: OREGON LAW REQUIRES THE CONTRACTOR TO FOLLOW RULES ADOPTED BY THE OREGON UTILITY NOTIFICATION CENTER. THOSE RULES ARE SET FORTH ON OAR 952-001-0001 THROUGH OAR 952-001-0090. CONTRACTOR MAY OBTAIN COPIES OF THE RULES BY CALLING THE CENTER. (NOTE: THE TELEPHONE FOR THE OREGON UTILITY NOTIFICATION CENTER IS (503) 232-1987).
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROTECTING AND AND ALL EXISTING UTILITIES AND OBTAINING UTILITY LOCATIONS PRIOR TO START OF CONSTRUCTION. THE CONTRACTOR MUST CONTACT OREGON UTILITY NOTIFICATION CENTER 811 OR 1-800-332-2344, A MINIMUM OF 48 HOURS PRIOR TO START OF CONSTRUCTION.
- ALL EXCAVATED MATERIAL SHALL BE HAULED AND DISPOSED OF OFF SITE, UNLESS OTHERWISE NOTED.
- ANY INSPECTION BY THE CITY, COUNTY, STATE, FEDERAL AGENCY, OR ENGINEER SHALL NOT, IN ANY WAY, RELIEVE THE CONTRACTOR FOR ANY OBLIGATION TO PERFORM THE WORK IN COMPLIANCE WITH THE APPLICABLE CODES, REGULATIONS, CITY STANDARDS, AND PROJECT CONTRACT DOCUMENTS.
- THE CONTRACTOR IS RESPONSIBLE FOR POTHOLING TO VERIFY EXISTING UTILITY LOCATIONS AND ENSURE NO CONFLICTS EXIST PRIOR TO CONSTRUCTION.
- NOT ALL TREES, SHRUBS, AND HARDSCAPES ARE SHOWN ON THE PLANS. CONTRACTOR SHALL VISIT EACH LOCATION TO DETERMINE EXTEND OF REQUIRED CLEARING, GRUBBING AND RESTORATION.

Landis Consulting
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ALBANY MILLERSBURG WATER TREATMENT PLANT

WTP GENERATOR

405 NE DAVIDSON ST, LINN COUNTY
ALBANY, OREGON

Rev	Description

COVER SHEET & SHEET INDEX

Design MEH

Drawn EJC

Checked MEH

Date 10/08/2024

Proj. No. 7022301

Drawing No.

G001

Electrical Abbreviations, General Notes, & Symbol Legend

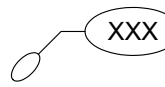
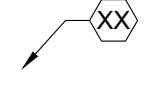
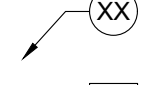

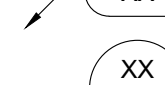
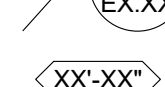

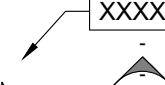


Abbreviations

A	AMPERE	LAN	LOCAL AREA NETWORK	V	VOLTS, VOLTAGE
AC	ALTERNATING CURRENT, AIR CONDITIONING UNIT	LCP	LOCAL CONTROL PANEL	VA	VOLT-AMPERE
AHJ	AUTHORITY HAVING JURISDICTION	LCS	LOCAL CONTROL STATION	VFD	VARIABLE FREQUENCY DRIVE
AI	ANALOG INPUT	LED	LIGHT EMITTING DIODE	W	WATT, WIRE
AIC	AVAILABLE INTERRUPTING CAPACITY	LEL	LOWER EXPLOSIVE LEVEL	WCR	WITHSTAND CURRENT RATING
AF	AMPERE FRAME / AMPERE FUSED	LRG	LOW RESISTANCE GROUND	WAP	WIRELESS ACCESS POINT
AFC	ABOVE FINISHED CEILING	LS	LIMIT SWITCH	WI-FI	WIRELESS FIDELITY
AFF	ABOVE FINISHED FLOOR	LSI	ELECTRONIC TRIP UNIT ADJUSTABLE LONG TIME DELAY, SHORT TIME DELAY, INSTANTANEOUS TRIP	W/	WITH
AFG	ABOVE FINISHED GRADE	LSIG	ELECTRONIC TRIP UNIT WITH ADJUSTABLE LONG TIME DELAY, SHORT TIME DELAY, INSTANTANEOUS TRIP, AND GROUND FAULT	W/O	WITHOUT
AL	ALUMINUM	LV	LOW VOLTAGE	XFMR	TRANSFORMER
ANSI	AMERICAN NATIONAL STANDARDS INSTITUTE	MCA	MINIMUM CIRCUIT AMPACITY	XMTR	TRANSMITTER
AO	ANALOG OUTPUT	MCC	MOTOR CONTROL CENTER	Y	WYE
ARMS	ARC FLASH REDUCTION MAINTENANCE SYSTEM	MCP	MOTOR CIRCUIT PROTECTOR	1P	ONE POLE
AT	AMPERE TRIP	MDF	MAIN DISTRIBUTION FRAME	2P	TWO POLE
AV	AUDIO / VIDEO	MHz	MEGAHERTZ	3P	THREE POLE
AWG	AMERICAN WIRE GAUGE	MISC	MISCELLANEOUS	4P	FOUR POLE
BAS	BUILDING AUTOMATION SYSTEM	MLO	MAIN LUGS ONLY		
BFG	BELOW FINISHED GRADE	MOCP	MAXIMUM OVERCURRENT PROTECTION		
BLDG	BUILDING	MSC	MANUFACTURER SUPPLIED CABLE		
C	CONDUIT	MV	MEDIUM VOLTAGE		
CAT#	CATEGORY #	MVA	MEGAVOLT AMPERES		
CB	CIRCUIT BREAKER	MW	MEGAWATT		
CFM	CUBIC FEET PER MINUTE	N	NEUTRAL		
CFCI	CONTRACTOR FURNISHED, CONTRACTOR INSTALLED	NAC	NOTIFICATION APPLIANCE CIRCUIT		
CFOI	CONTRACTOR FURNISHED, OWNER INSTALLED	N/A	NOT APPLICABLE		
CKT	CIRCUIT	NC	NORMALLY CLOSED		
CP	CONTROL PANEL	NEC	NATIONAL ELECTRICAL CODE		
CPT	CONTROL POWER TRANSFORMER	NEMA	NATIONAL ELECTRICAL MANUFACTURERS ASSOCIATION		
CR	CONTROL RELAY	NEX	REPLACE EXISTING WIRING DEVICE AND FACEPLATE WITH NEW. BACK BOX AND CONDUIT SHALL REMAIN.		
CSC	CONTRACTOR SUPPLIED CABLE	NL	NIGHT LIGHT		
CU	COPPER	NO	NORMALLY OPEN		
dB	DECIBAL	NTS	NOT TO SCALE		
DC	DIRECT CURRENT	OC	ON CENTER		
DI	DIGITAL INPUT	OFCI	OWNER FURNISHED, CONTRACTOR INSTALLED		
DIM	DIMENSION	OFOI	OWNER FURNISHED, OWNER INSTALLED		
DIV	DIVISION	Ø	PHASE		
DO	DIGITAL OUTPUT	PB	PULL BOX, PANIC BUTTON, PUSH BUTTON		
DTL	DETAIL	PCP	PUMP CONTROL PANEL		
DWG	DRAWING	PDP	PUMP DISCONNECT PANEL		
E/IP	ETHERNET IP	PE	PHOTO EYE		
EF	EXHAUST FAN	PLC	PROGRAMMABLE LOGIC CONTROLLER		
EL	ELEVATION	PNL	PANEL		
EMT	ELECTRICAL METALLIC TUBING	POE	POWER OVER ETHERNET		
EOLR	END OF LINE RESISTOR	PPM	PARTS PER MILLION		
FACP	FIRE ALARM CONTROL PANEL	PTZ	PAN, TILT, ZOOM		
FE	FLOWMETER ELEMENT	RF	RADIO FREQUENCY		
FF	FINISH FLOOR	RFI	REQUEST FOR INFORMATION		
FIT	FLOWMETER TRANSMITTER	SCADA	SUPERVISORY CONTROL AND DATA ACQUISITION		
FLA	FULL LOAD AMPERES	SLC	SIGNALING LINE CIRCUIT		
FT	FOOT, FEET	SPD	SURGE PROTECTION DEVICE		
FBO	FURNISHED BY OTHERS	STD	STANDARD		
G, GND	GROUND	SW	SWITCH		
GFCI	GROUND FAULT CIRCUIT INTERRUPTER	SWBD	SWITCHBOARD		
HH	HAND HOLE	SWGR	SWITCHGEAR		
HP	HORSEPOWER	T/M	THERMAL MAGNETIC CIRCUIT BREAKER		
HRG	HIGH RESISTANCE GROUND	TBD	TO BE DETERMINED		
H2S	HYDROGEN SULFIDE	TSP	TWISTED SHIELDED PAIR		
ID	IDENTIFICATION	TV	TELEVISION / MONITOR OUTLET		
IDC	INITIATING DEVICE CIRCUIT	TVSS	TRANSIENT VOLTAGE SURGE SUPPRESSOR		
IDF	INTERMEDIATE DISTRIBUTION FRAME	TYP	TYPICAL		
IEEE	INSTITUTE OF ELECTRICAL AND ELECTRONICS ENGINEERS	UH	UNIT HEATER		
IG	ISOLATED GROUND	UG	UNDERGROUND		
IT	INFORMATION TECHNOLOGY	UL	UNDERWRITERS LABORATORIES		
I/O	INPUT / OUTPUT	UPS	UNINTERRUPTIBLE POWER SUPPLY		
JB	JUNCTION BOX	UON	UNLESS OTHERWISE NOTED		
KAIC	THOUSAND AMPS INTERRUPTING CURRENT	USB	UNIVERSAL SERIAL BUS		
KCMIL	THOUSAND CIRCULAR MILS				
KVA	KILOVOLT-AMPERE				
KW	KILOWATT				

General Electrical Notes

- ALL LIGHTING BRANCH CIRCUITS SHALL BE 2#10, 1#10G IN 3/4" CONDUIT, UON.
- ALL 20-AMP RECEPTACLE AND HARDWIRED BRANCH CIRCUITS SHALL BE 2#12, 1#12G IN 3/4" CONDUIT, UON.
- ALL EXIT SIGNS SHALL BE WIRED TO THE LOCAL LIGHTING BRANCH CIRCUIT AHEAD OF ALL SWITCHING.
- PROVIDE 0-10V DIMMING CONDUCTORS TO ALL LUMINAIRES WHICH ARE CONTROLLED BY 0-10V DIMMERS SHOWN ON THE DRAWINGS.
- ALL ELEVATION HEIGHTS SHALL BE TO CENTERLINE OF EQUIPMENT OR DEVICE UNLESS OTHERWISE NOTED.

Annotation

- (N) INDICATES NEW EQUIPMENT.
- (E) INDICATES EXISTING EQUIPMENT TO REMAIN.
- (D) INDICATES EXISTING EQUIPMENT TO BE DEMOLISHED.
- (RR)/(RD) INDICATED EXISTING EQUIPMENT OR DEVICE TO BE REMOVED AND REINSTALLED.
-  CONDUIT & CONDUCTOR CALLOUT. REFER TO CONDUIT & CONDUCTOR SCHEDULE.
-  KEYED NOTE CALLOUT. REFER TO CORRESPONDING SHEET KEYNOTES.
-  KEYED NOTE CALLOUT. REFER TO CORRESPONDING SHEET KEYNOTES.
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-  MECHANICAL EQUIPMENT CALLOUT. REFER TO MECHANICAL EQUIPMENT CONNECTION SCHEDULE.
-  DETAIL CALLOUT. REFER TO DETAIL AND SHEET AS INDICATED ON CALLOUT.
-  FIXTURE MOUNTING CALLOUT. HEIGHT ABOVE FINISHED FLOOR (A.F.F.) FOR INTERIOR OR GRADE (A.F.G.) FOR EXTERIOR
-  EQUIPMENT CALLOUT. REFER TO NEMA CONNECTION SCHEDULE.
-  SECTION CALLOUT. REFER TO SECTION AND SHEET AS INDICATED ON CALLOUT.
-  ELEVATION CALLOUT. REFER TO ELEVATION AND SHEET AS INDICATED ON CALLOUT.



Rev	Description

ELECTRICAL SYMBOL
LEGEND &
ABBREVIATIONS

Design MEH

Drawn EJC

Checked MEH

Date 10/08/2024

Proj. No. 7022301

Drawing No.

E001

Electrical Symbol Legend

Power Distribution

	DUPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	SIMPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	QUADPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	GFCI DUPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	GFCI QUADPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	TAMPER RESISTANT DUPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	TAMPER RESISTANT QUADPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	SWITCHED DUPLEX RECEPTACLE, MOUNTED AT 18" AFF, UON.
	NEMA SPECIAL RECEPTACLE, MOUNTED AT 18" AFF, UON. NEMA CONFIGURATION AS INDICATED.
	CENTER HATCHED RECEPTACLE TO BE WIRED TO EMERGENCY CIRCUIT.
	RECEPTACLE MOUNTED ON CEILING.
	RECEPTACLE MOUNTED IN-COUNTER.
	DISCONNECT SWITCH.
	FUSED DISCONNECT SWITCH.
	ENCLOSED CIRCUIT BREAKER.
	COMBINATION STARTER.
	FLOORBOX COMBINATION POWER & DATA.
	FLOORBOX POWER.
	POKETHRU COMBINATION POWER & DATA.
	POKETHRU POWER.
	POWER/DATA POLE.
	PANELBOARD SURFACE MOUNT.
	PANELBOARD FLUSH MOUNT.
	MAIN DISTRIBUTION PANEL.
	UTILITY CT METER.
	UTILITY TRANSFORMER.

Drawing Symbol Variables

3	THREE WAY SWITCH.
4	FOUR WAY SWITCH.
#J	QUANTITY OF JACKS AND HORIZONTAL CABLES. J = CAT6, JA = CAT6A, JE = CAT5E
+XX	MOUNTING UNITS EXPRESSED IN INCHES TO CENTERLINE ABOVE FINISHED FLOOR OR GRADE.
C	MOUNTED HORIZONTALLY AT 4" ABOVE COUNTERTOP.
CL	CLOCK.
DR	DUAL RELAY.
E	RED EMERGENCY SWITCH.
EL	ELEVATOR RECALL.
ETR	EXISTING DEVICE SHALL REMAIN.
G	GLASS BREAK SENSOR.
K	KEYED SWITCH.
LF	LOW FREQUENCY.
LV	LOW VOLTAGE SWITCH.
M	MOTOR RATED TOGGLE SWITCH.
NEX	REPLACE EXISTING WIRING DEVICE AND FACEPLATE WITH NEW. BACK BOX AND CONDUIT SHALL REMAIN.
O	INTEGRAL OCCUPANCY SENSOR.
P	ADA PHONE. VERIFY HEIGHT WITH ARCHITECT / OWNER.
REX	REMOVE EXISTING DEVICE / EQUIPMENT.
TK	MOUNTED IN TOE KICK OF CASEWORK.
TV	MOUNTED ADJACENT TO TV AT 60" AFF, UON.
V	VANDAL RESISTANT.
WG	WIREGUARD.
WP	WEATHERPROOF.

Lighting

	TROFFER LUMINAIRE, SURFACE OR RECESS MOUNTED AS INDICATED ON THE DRAWINGS.
	DOWNLIGHT LUMINAIRE, SURFACE, RECESS, OR PENDANT MOUNTED AS INDICATED ON THE DRAWINGS.
	UNDERCABINET LUMINAIRE.
	EMERGENCY BATTERY PACK LUMINAIRE, WALL OR CEILING MOUNTED.
	LINEAR PENDANT MOUNTED LUMINAIRE.
	LINEAR WALL MOUNTED LUMINAIRE.
	BOLLARD LUMINAIRE.
	SITE LUMINAIRE POLE MOUNTED. NUMBER OF HEADS AS SHOWN.
	TRACK LUMINAIRE.
	SPOT LUMINAIRE.
	WALL MOUNTED LUMINAIRE.
	EXIT SIGN, WALL OR CEILING MOUNTED, SINGLE FACE WITH DIRECTIONAL CHEVRONS AS INDICATED ON DRAWINGS.
	EXIT SIGN, WALL OR CEILING MOUNTED, DOUBLE FACE WITH DIRECTIONAL CHEVRONS AS INDICATED ON DRAWINGS.
	HALF HATCHED LUMINAIRE TO BE WIRED TO EMERGENCY CIRCUIT.
	FULL HATCHED LUMINAIRE TO BE WIRED TO NIGHTLIGHT CIRCUIT.
	WALL WASH LUMINAIRE POINTED IN DIRECTION AS SHOWN

Raceways

	CONDUIT AND/OR CONDUCTORS INSTALLED ABOVE GRADE, CONCEALED IN WALL OR CEILING SPACE.
	CONDUIT AND/OR CONDUCTORS INSTALLED BELOW GRADE, BELOW SLAB.
	CONDUIT TURNED DOWN.
	CONDUIT TURNED UP.
	CONDUIT STUBBED AND CAPPED.
	CONDUIT DIRECT CONNECTION TO EQUIPMENT.
	FLEXIBLE CONNECTION TO EQUIPMENT.
	CONDUIT / WIRING CONTINUATION.
	HOMERUN TO PANELBOARD.
	CABLE TRAY. SIZE AND TYPE AS INDICATED ON DRAWINGS.

Switches

	SINGLE POLE SWITCH - MOUNTED AT 42" AFF, UON.
	LOW VOLTAGE 0-10 VOLT DIMMING SWITCH - MOUNTED AT 42" AFF, UON.
	OCCUPANCY SENSOR - CEILING OR WALL MOUNTED.
	OCCUPANCY SENSOR POWER PACK.
	PHOTOCELL - CEILING OR WALL MOUNTED.
	ADA DOOR PUSHPLATE.
	EMERGENCY STOP SWITCH, MUSHROOM HEAD.
	PUSHBUTTON, SINGLE OR DOUBLE.

One-Line Diagram

	CIRCUIT BREAKER.
	DRAWOUT CIRCUIT BREAKER.
	ENCLOSED CIRCUIT BREAKER.
	MOTOR STARTER CONTACT.
	DISCONNECT SWITCH.
	ENCLOSED DISCONNECT SWITCH.
	FUSED DISCONNECT SWITCH.
	ENCLOSED FUSED DISCONNECT SWITCH.
	CURRENT TRANSFORMER METER.
	FUSE, RATING AS SHOWN ON DRAWINGS.
	GENERATOR, CONFIGURATION AS INDICATED ON DRAWING.
	GROUND ROD.
	EQUIPMENT GROUND.
	MOTOR, RATED AS INDICATED ON DRAWINGS.
	NEMA CONNECTION.
	PANEL.
	MINI POWER CENTER.
	SHUNT TRIP.
	HEATER.
	REMOTE ANNUNCIATOR.
	BATTERY CHARGER.
	SURGE PROTECTION DEVICE.
	DIGITAL METER.
	KIRK KEY.
	VARIABLE FREQUENCY DRIVE.
	SOFT STARTER.
	TRANSFER SWITCH, WITH FUSES OR BREAKERS AS SHOWN ON DRAWINGS.
	TRANSFORMER.

Miscellaneous

	JUNCTION BOX (ROUND, SQUARE).
	THERMOSTAT.
	RELAY.
	CORD REEL.
	MOTOR / EXHAUST FAN.
	CEILING FAN.
	UTILITY POLE.
	WEATHERHEAD.
	GROUND ROD.
	GROUND ROD WITH TEST WELL.
	SURFACE RACEWAY / WIREMOLD.
	FIRE RATED BACKBOARD.
	GROUND BUS BAR.

Access Control & Security

	ACCESS CONTROL - DOOR CONTACT. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - CARD READER. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - ELECTRIC STRIKE. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - KEY PAD. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - MAGNETIC LOCK. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - REQUEST TO EXIT. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - ELECTRIFIED PANIC BAR. PROVIDE 3/4" CONDUIT FROM DOOR FRAME TO ACCESSIBLE CEILING OR SECURITY JUNCTION BOX AS SHOWN ON THE DRAWINGS.
	ACCESS CONTROL - SECURITY JUNCTION BOX. SIZED AS RECOMMENDED BY SECURITY SYSTEM MANUFACTURER.
	ACCESS CONTROL - CAMERA / INTERCOM.
	ACCESS CONTROL - PANIC BUTTON.
	SECURITY CAMERA - CEILING MOUNTED. PROVIDE ONE (1) CAT6.
	SECURITY CAMERA - WALL MOUNTED. PROVIDE ONE (1) CAT6.
	INTRUSION SENSOR - CEILING MOUNTED.
	INTRUSION SENSOR - WALL MOUNTED.
	INTRUSION KEYPAD.

Low Voltage

	ETHERNET OUTLET MOUNTED AT 18" AFF, UON.
	COAXIAL OUTLET MOUNTED AT 18" AFF, UON.
	PHONE OUTLET MOUNTED AT 18" AFF, UON.
	LOW VOLTAGE OUTLET CEILING MOUNTED.
	WIRELESS ACCESS POINT CEILING MOUNTED.
	WIRELESS ACCESS POINT WALL MOUNTED.
	DIGITAL CLOCK.
	FLOORBOX DATA.
	POKETHRU DATA.
	IT RACK.
	VERTICAL WIRE MANAGEMENT.

Consultants



ALBANY MILLERSBURG WATER TREATMENT PLANT

WTP GENERATOR

405 NE DAVIDSON ST, LINN COUNTY
ALBANY, OREGON

Rev	Description

ELECTRICAL SYMBOL LEGEND

Design	MEH
Drawn	EJC
Checked	MEH
Date	10/08/2024
Proj. No.	7022301
Drawing No.	E002

GENERAL SHEET NOTES

1. PACIFIC POWER & LIGHT PROJECT NUMBER IS 7317489.
2. PROVIDE RELAY FOR SELECTIVE COORDINATION. SET AMP SENTRY RELAY TO 1200-AMP.
3. INTERCEPT EXISTING UNDERGROUND CONDUITS AND EXTEND TO NEW ATS-1 ENCLOSURE. COORDINATE REMOVAL AND INSTALLATION OF NEW CONDUCTORS WITH UTILITY.
4. INTERCEPT EXISTING SERVICE CONDUITS AND EXTEND TO NEW ATS-1 ENCLOSURE. COORDINATE WITH UTILITY FOR INSTALLATION OF NEW SECONDARY CONDUCTORS.
5. COORDINATE WITH UTILITY TO DISCONNECT AND REMOVE EXISTING CONDUCTORS. THE EXISTING CONDUITS ARE CONCRETE ENCASED. CUT CONDUIT AND REMOVE ENOUGH CONDUIT TO FACILITATE WORK. CAP AND ABANDON CONDUIT IN THE CONCRETE STRUCTURE IN THE BUILDING.
6. DISCONNECT EXISTING CONDUIT AT NEAREST FITTING BENEATH THE SWITCHBOARD AND INSTALL JUNCTION BOX AS SHOWN.
7. CONNECT NEW GROUNDING ELECTRODE INTO EXISTING GROUND RING AS SHOWN.
8. EXISTING PLC CABINET FLT-FC-01.

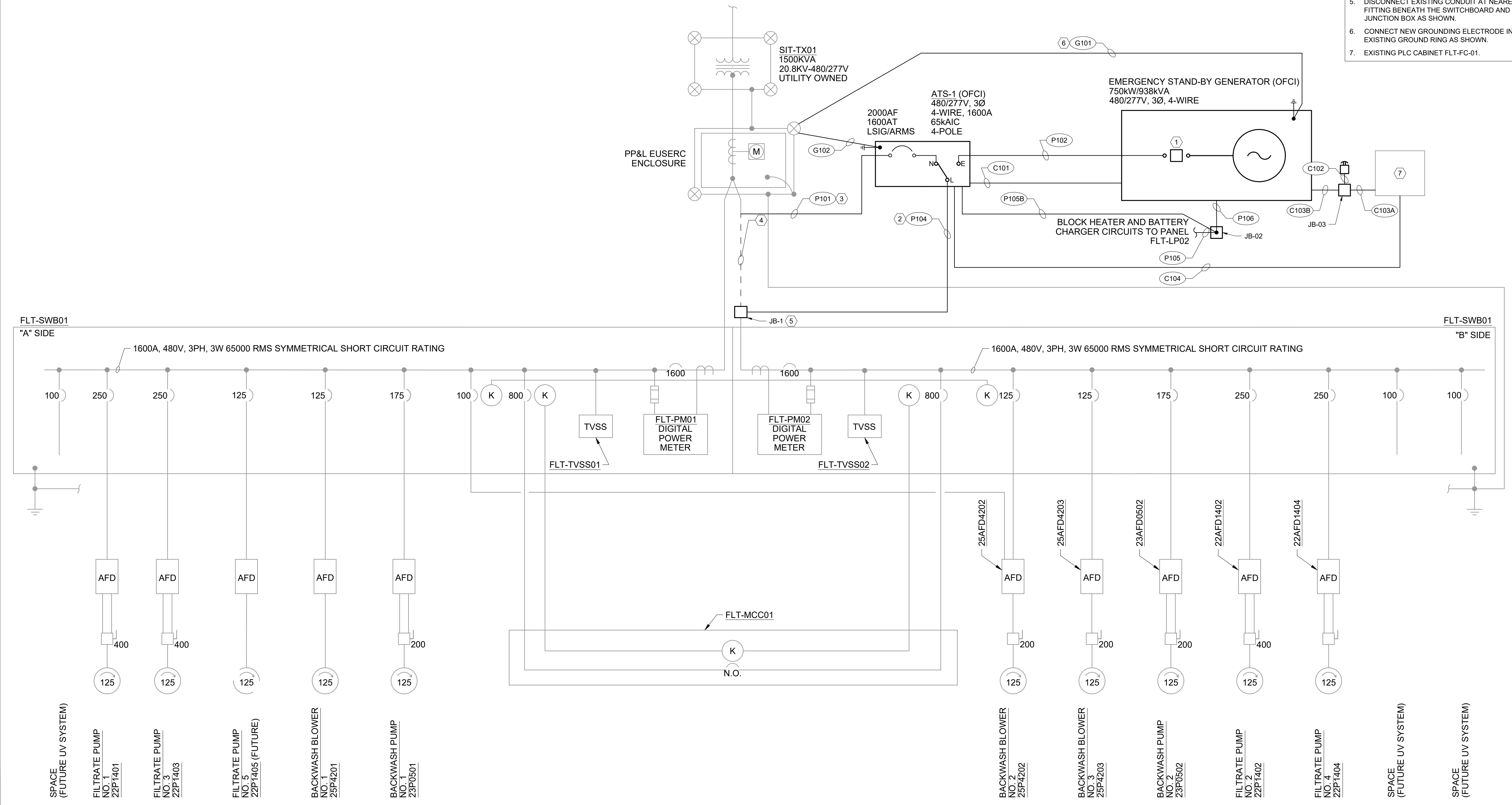
SHEET KEY NOTES

Landis Consulting
 ENGINEERING SERVICES
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Consultants



CONTINUATION



ALBANY MILLERSBURG WATER TREATMENT PLANT
WTP GENERATOR
 405 NE DAVIDSON ST, LINN COUNTY
 ALBANY, OREGON

Rev	Description

ONE-LINE DIAGRAM

Design: MEH
 Drawn: EJC
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E010



POWER CONDUIT / CONDUCTOR SCHEDULE

CONDUIT ID NO.	CONDUIT		CONDUCTORS PER CONDUIT					FROM	TO	DESCRIPTION	NOTES
	QUANTITY	SIZE	UNGROUND	GROUND	GROUNDING	CABLE	SPARE				
P101	4	4.0 INCH	3 - #600	1 - #600	-	-	-	(E) PP&L EUSERC SWITCHBOARD	(N) MCB/ATS-1	INSTALL PER PP&L REQUIREMENTS	-
P102	4	4.0 INCH	3 - #350	3 - #350	1 - #3/0	-	-	GENERATOR	(N) MCB/ATS-1	-	-
PXXX	-	-	-	-	-	-	-	-	-	-	-
P104	4	4.0 INCH	3 - #600	3 - #600	1 - #250	-	-	MCB/ATS-1	JB-1	-	-
P105	1	0.75 INCH	2 - #10 1 - #10 1 - #10	- 1 - #10 1 - #10	1 - #10 1 - #10 1 - #10	-	-	(E) PANEL FLT LP02	GENERATOR BLOCK HEATER GENERATOR BATTERY CHARGER ATS SPACE HEATER	CIRCUITS #35,37 (VIA JB-02) CIRCUIT #39 (VIA JB-02) CIRCUIT #16 (VIA JB-02)	-
P105B	1	0.75 INCH	1 - #10	1 - #10	1 - #10	-	-	(E) PANEL FLT LP02	ATS SPACE HEATER	CIRCUIT #16	-
P106	1	0.75 INCH	2 - #10 1 - #10	- 1 - #10	1 - #10 1 - #10	-	-	(E) PANEL FLT LP02	GENERATOR BLOCK HEATER GENERATOR BATTERY CHARGER	CIRCUITS #35,37 (VIA JB-02) CIRCUIT #39 (VIA JB-02)	-

CONTROL CONDUIT / CONDUCTOR SCHEDULE

CONDUIT ID NO.	CONDUIT		CONDUCTORS PER CONDUIT					FROM	TO	DESCRIPTION	NOTES
	QUANTITY	SIZE	UNGROUND	GROUND	GROUNDING	CABLE	SPARE				
C101	1	0.75 INCH	2 - #14	-	1 - #14	-	-	(N) GENERATOR	(N) ATS-1	GENERATOR START COMMAND	-
C102	1	1.0 INCH	4 - #14	-	1 - #14	-	-	(N) GENERATOR	E-STOP	GENERATOR E-STOP	-
C103A	1	1.0 INCH	2 - #14 2 - #14 2 - #14 2 - #14	-	1 - #14	-	-	(E) PLC CABINET FLT-CP01	(N) JUNCTION BOX JB-03	EXISTING CONDUIT TO BE RE-USED GENERATOR ALARM GENERATOR RUNNING GENERATOR NOT IN AUTO GENERATOR LOW FUEL ALARM	-
C103B	1	1.0 INCH	2 - #14 2 - #14 2 - #14 2 - #14 2 - #14	-	1 - #14	-	-	(N) JUNCTION BOX JB-03	(N) GENERATOR	GENERATOR E-STOP GENERATOR ALARM GENERATOR RUNNING GENERATOR NOT IN AUTO GENERATOR LOW FUEL ALARM	-
C104	1	0.75 INCH	2 - #14 2 - #14	-	1 - #14	-	-	(N) ATS-1	(E) PLC CABINET FLT-CP01	ATS ON UTILITY POWER ATS ON GENERATOR POWER	-
C105	-	0.75 INCH	-	-	-	1 - #18TSP	-	(N) GENERATOR	(E) PLC CABINET FLT-CP01	GENERATOR FUEL LEVEL SENSOR	-

GROUNDING CONDUIT / CONDUCTOR SCHEDULE

CONDUIT ID NO.	CONDUIT		CONDUCTORS PER CONDUIT					FROM	TO	DESCRIPTION	NOTES
	QUANTITY	SIZE	UNGROUND	GROUND	GROUNDING	CABLE	SPARE				
G101	1	-	-	-	1 - #4/0	-	-	EMERGENCY STAND-BY GENERATOR	(E) GROUNDING ELECTRODE SYSTEM	-	-
G102	1	-	-	-	1 - #4/0	-	-	ATS-1	(E) GROUNDING ELECTRODE SYSTEM	-	-

ALBANY MILLERSBURG WATER TREATMENT PLANT

WTP GENERATOR

405 NE DAVIDSON ST, LINN COUNTY
 ALBANY, OREGON

Rev	Description

ELECTRICAL SCHEDULES

Design MEH

Drawn EJC

Checked MEH

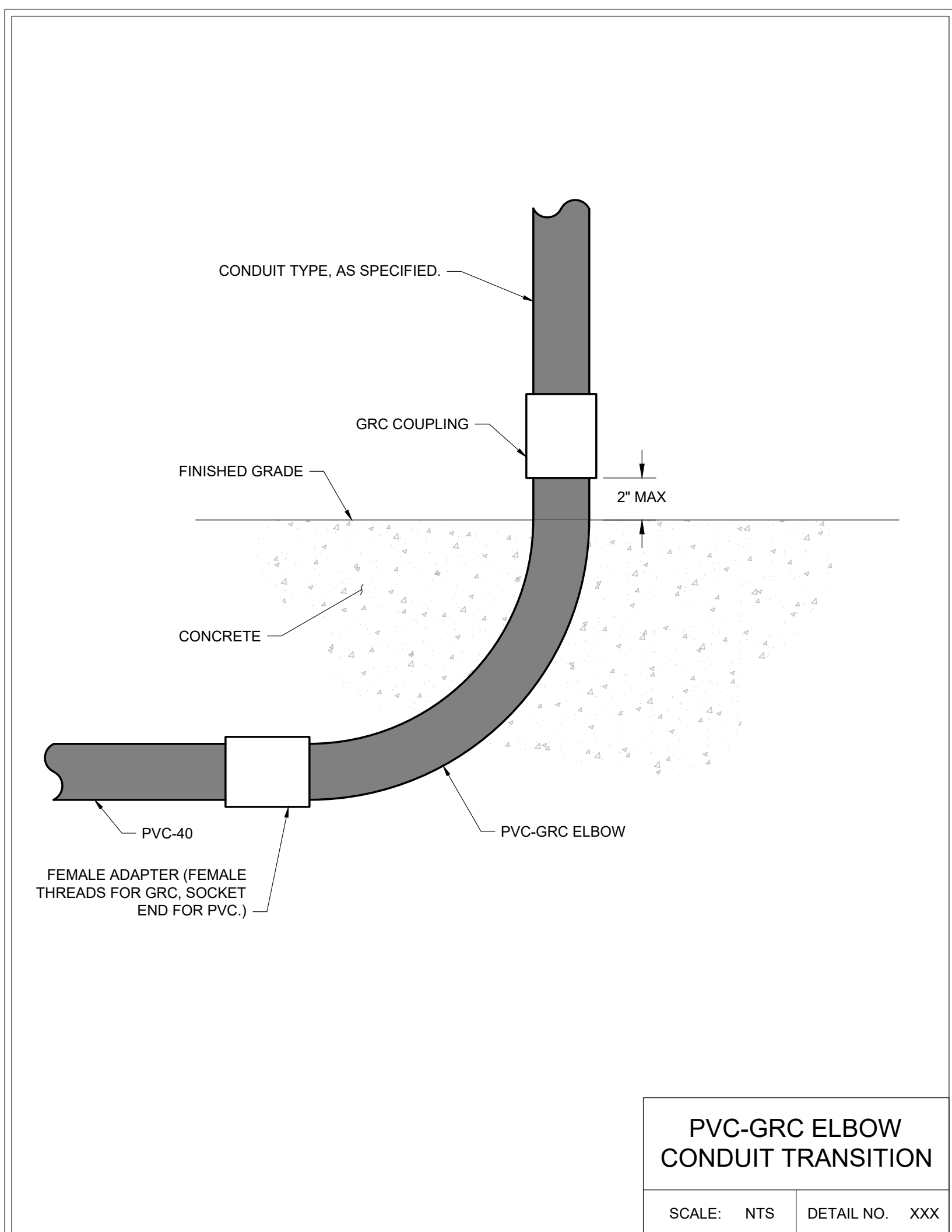
Date 10/08/2024

Proj. No. 7022301

Drawing No.

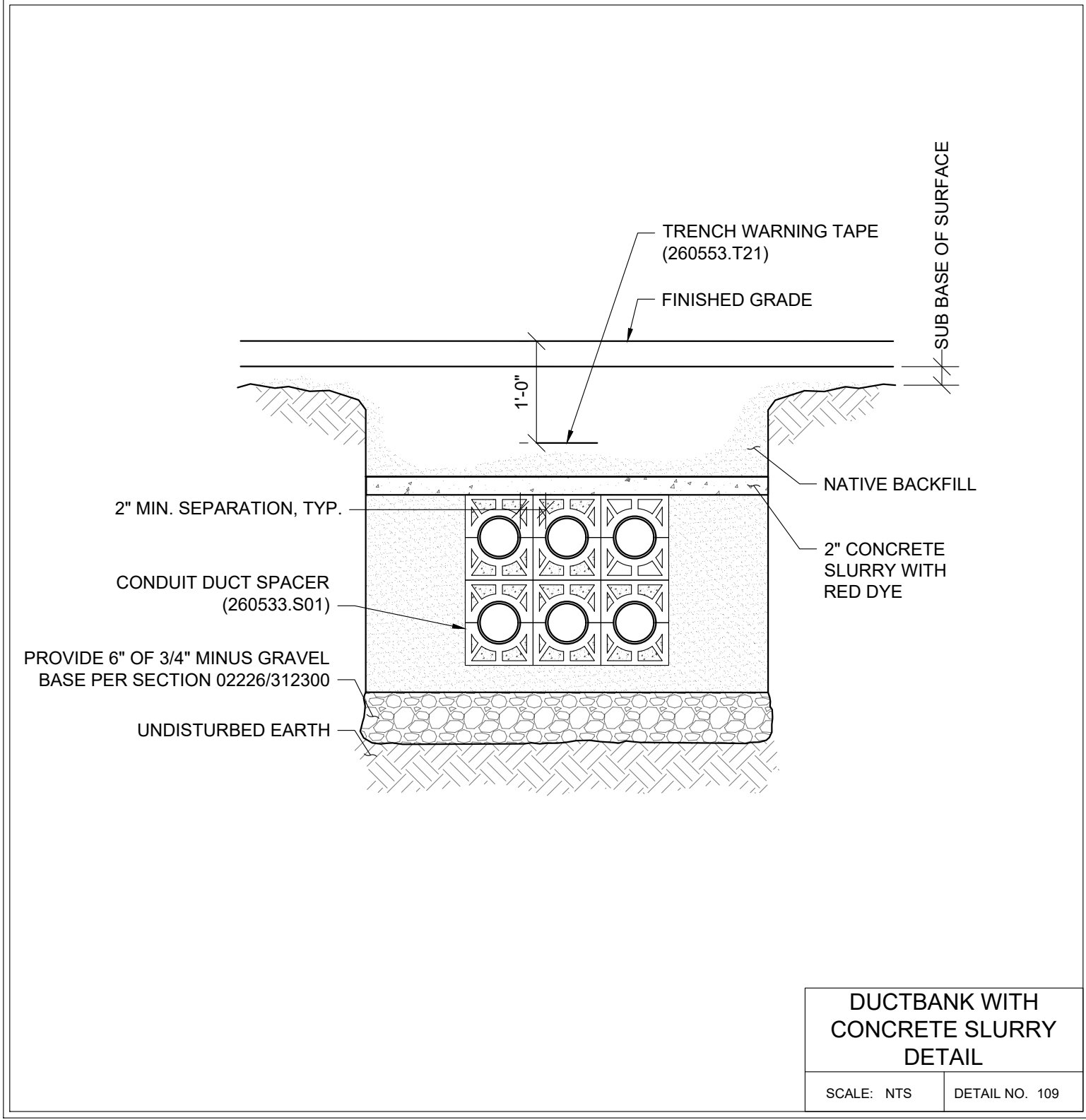
E030

SHEET KEY NOTES
 1. DIMENSIONS PER SPECIFICATION.



**PVC-GRC ELBOW
 CONDUIT TRANSITION**

SCALE: NTS DETAIL NO. XXX

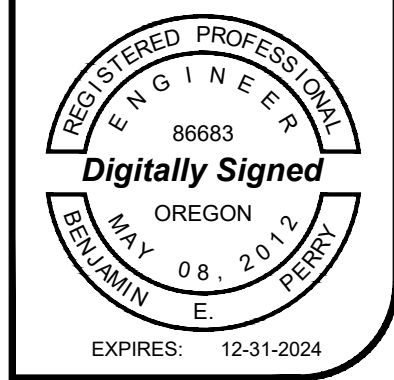


**DUCTBANK WITH
 CONCRETE SLURRY
 DETAIL**

SCALE: NTS DETAIL NO. 109

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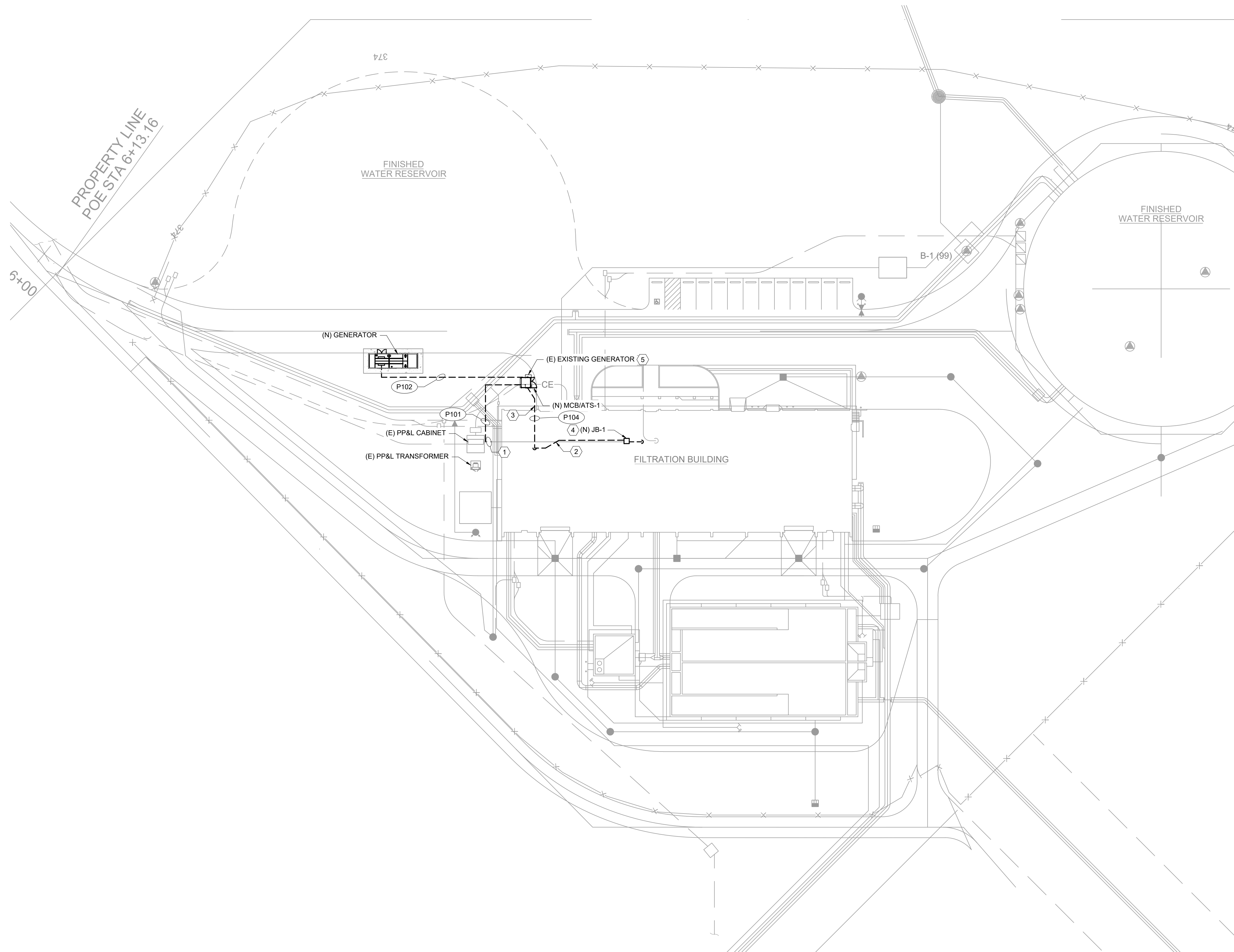
ALBANY MILLERSBURG WATER TREATMENT PLANT
WTP GENERATOR
 405 NE DAVIDSON ST, LINN COUNTY
 ALBANY, OREGON

Rev	Description

ELECTRICAL DETAILS

Design MEH
 Drawn EJC
 Checked MEH
 Date 10/08/2024
 Proj. No. 7022301
 Drawing No.

E040



- SHEET KEY NOTES**
1. REMOVE EXISTING CONDUCTORS AND CUT EXISTING CONCRETE ENCASED CONDUIT AND EXTEND TO MCB/ATS-1 ENCLOSURE AS SHOWN. REMOVE THE CONCRETE ENCASED DUCTBANK AND CONDUIT SO THAT THE NEW SERVICE CONDUITS MAY BE INSTALLED.
 2. REMOVE EXISTING CONDUCTORS AND ABANDON CONCRETE ENCASED CONDUITS. CAP EACH END.
 3. CONDUIT TO STUB INTO BUILDING AND TRANSITION TO LOWER LEVEL. CONDUIT TO RUN AGAINST CONCRETE CEILING TO NEW JB-1.
 4. DEMOLISH EXISTING JUNCTION BOXES AND PROVIDE NEW JUNCTION BOX AS SHOWN TO ACCEPT THE NEW CONDUITS FROM P104 AND TRANSITION TO THE EXISTING CONDUITS THAT FEED SWITCHBOARD.
 5. EXISTING GENERATOR TO BE REMOVED BY OWNER.

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 WTP GENERATOR
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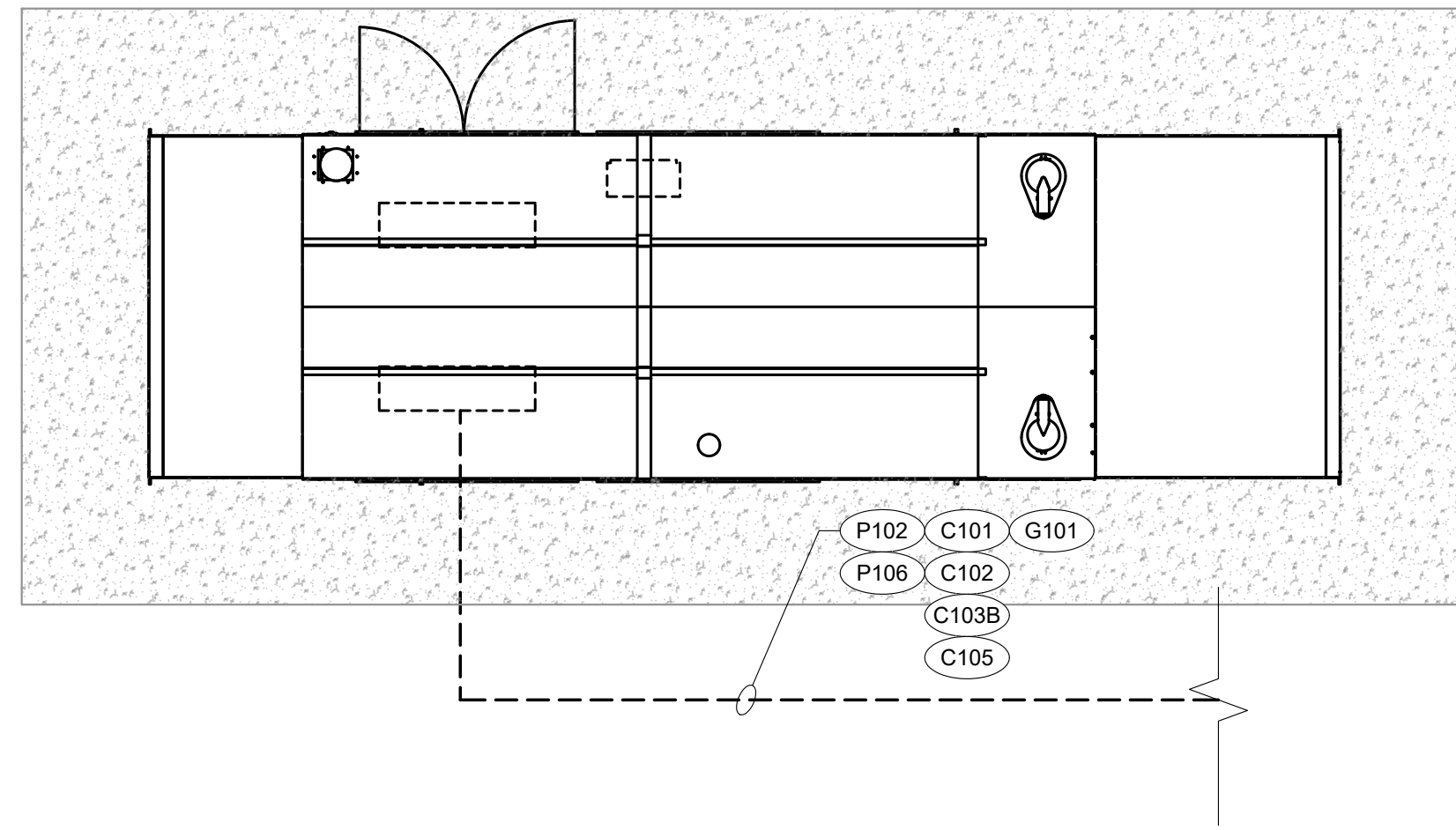
Rev	Description

ELECTRICAL SITE PLAN

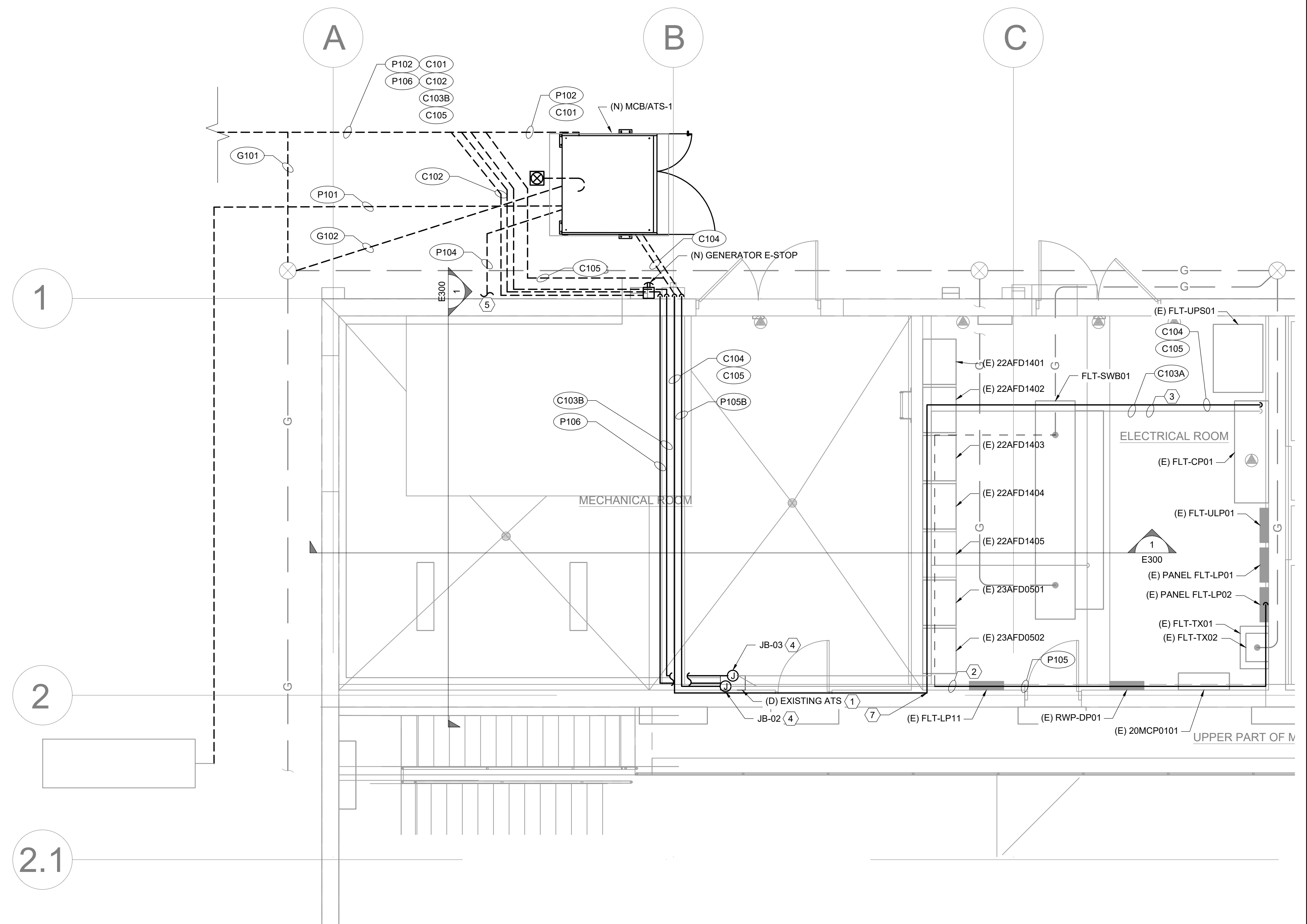
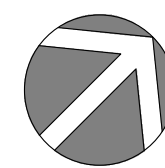
Design MEH
 Drawn EJC
 Checked MEH
 Date 10/08/2024
 Proj. No. 7022301
 Drawing No.

E100

1 ELECTRICAL SITE PLAN
 SCALE: 1" = 30'



2 ELECTRICAL ROOM PLAN
SCALE: 1/4" = 1'-0"

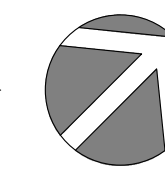


1

2

2.1

1 ELECTRICAL ROOM PLAN
SCALE: 1/4" = 1'-0"



GENERAL SHEET NOTES

1. PROVIDE MODULAR WALL SLEEVES (16131.S10) ON ALL NEW CONDUIT PENETRATIONS OF THE EXTERIOR WALL.
2. ALL INTERIOR WALL PENETRATIONS SHALL BE FULLY SEALED WITH GROUT.

SHEET KEY NOTES

1. REMOVE EXISTING ATS AND CONDUCTORS. CONDUIT TO BE REUSED AS SHOWN.
2. REMOVE LB FITTING AND CONDUIT AS SHOWN. EXTEND CONDUIT TO EXISTING PANEL FLT-LP02 FOR BATTERY CHARGER AND BLOCK HEATER POWER CIRCUITS. SEE PHOTO ON SHEET E301 FOR MORE INFORMATION.
3. REUSE EXISTING CONDUIT TO PLC.
4. INSTALL JUNCTION BOX TO INTERCEPT EXISTING CONDUIT AND EXTEND NEW CONDUIT AS SHOWN.
5. INSTALL CONDUIT IN THE LOWER FLOOR, BELOW THE MECHANICAL ROOM REFER TO SHEET E300 FOR ADDITIONAL INFORMATION.
6. OWNER TO REMOVE EXISTING POWER CONDUCTORS TO EXISTING GENERATOR. REMOVE CONDUIT AS SHOWN FROM FLT-SWB01. CUT CONDUIT AND REUSE PORTION AS SHOWN. EXTEND TO PANEL AND CONNECT COMPLETE.
7. CORE DRILL EXISTING WALL AND PROVIDE MODULAR FLOOR AND WALL SLEEVES (16131.S10).

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WTP GENERATOR

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Rev Description

ELECTRICAL ROOM PLAN

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Drawn EJC

Checked MEH

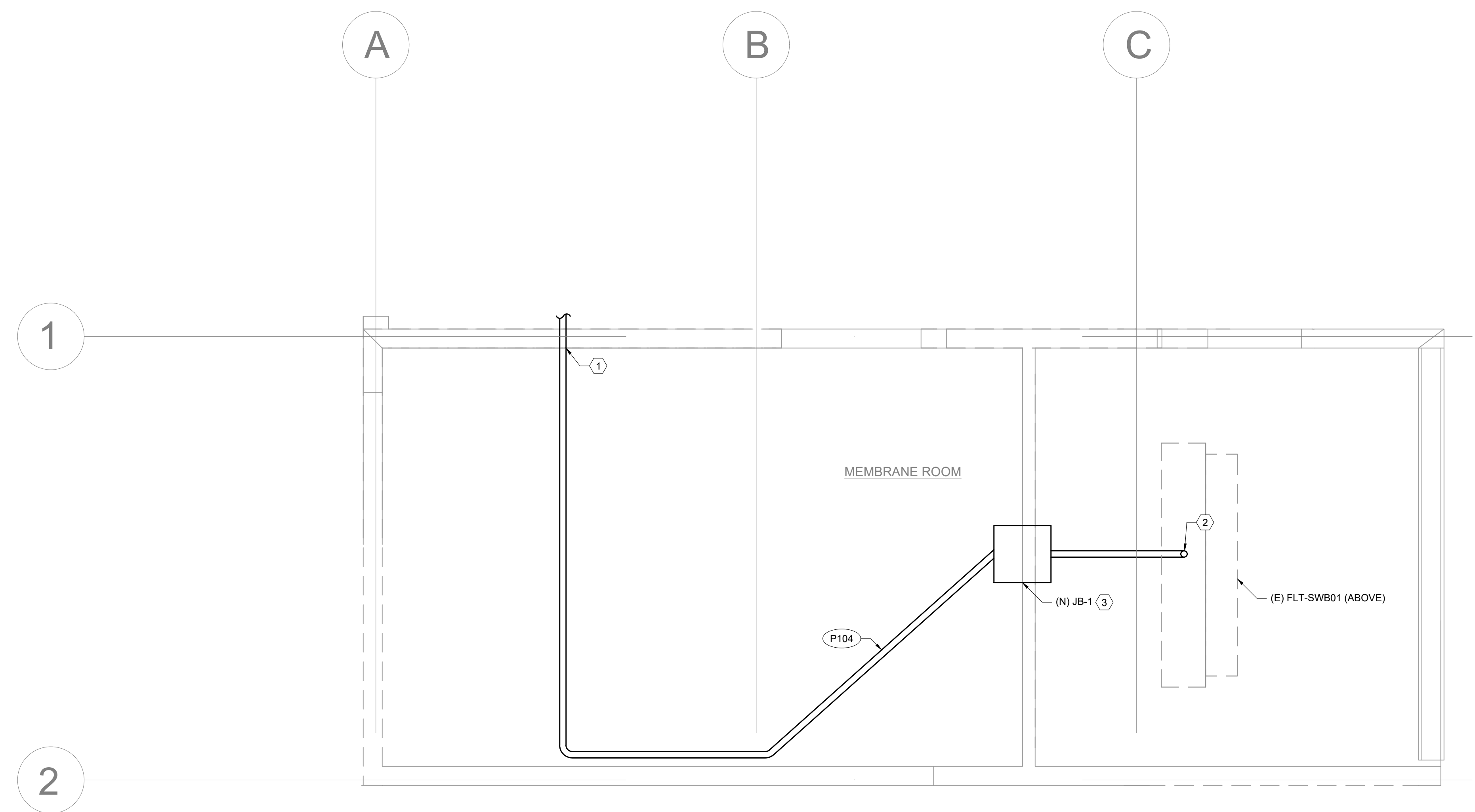
Date 10/08/2024

Proj. No. 7022301

Drawing No.

E200

- SHEET KEY NOTES**
1. CORE DRILL EXISTING WALL AND PROVIDE MODULAR FLOOR AND WALL SLEEVES (16131.S10).
 2. CONDUIT UP TO FLT-SWBD01.
 3. DEMOLISH EXISTING JUNCTION BOXES AND PROVIDE NEW 36"W X 36"L X 24"D JUNCTION BOX AS SHOWN TO ACCEPT THE NEW CONDUITS FROM P104 AND TRANSITION TO THE EXISTING CONDUITS THAT FEED SWITCHBOARD.



1 LOWER FLOOR PLAN
SCALE: 1/4" = 1'-0"

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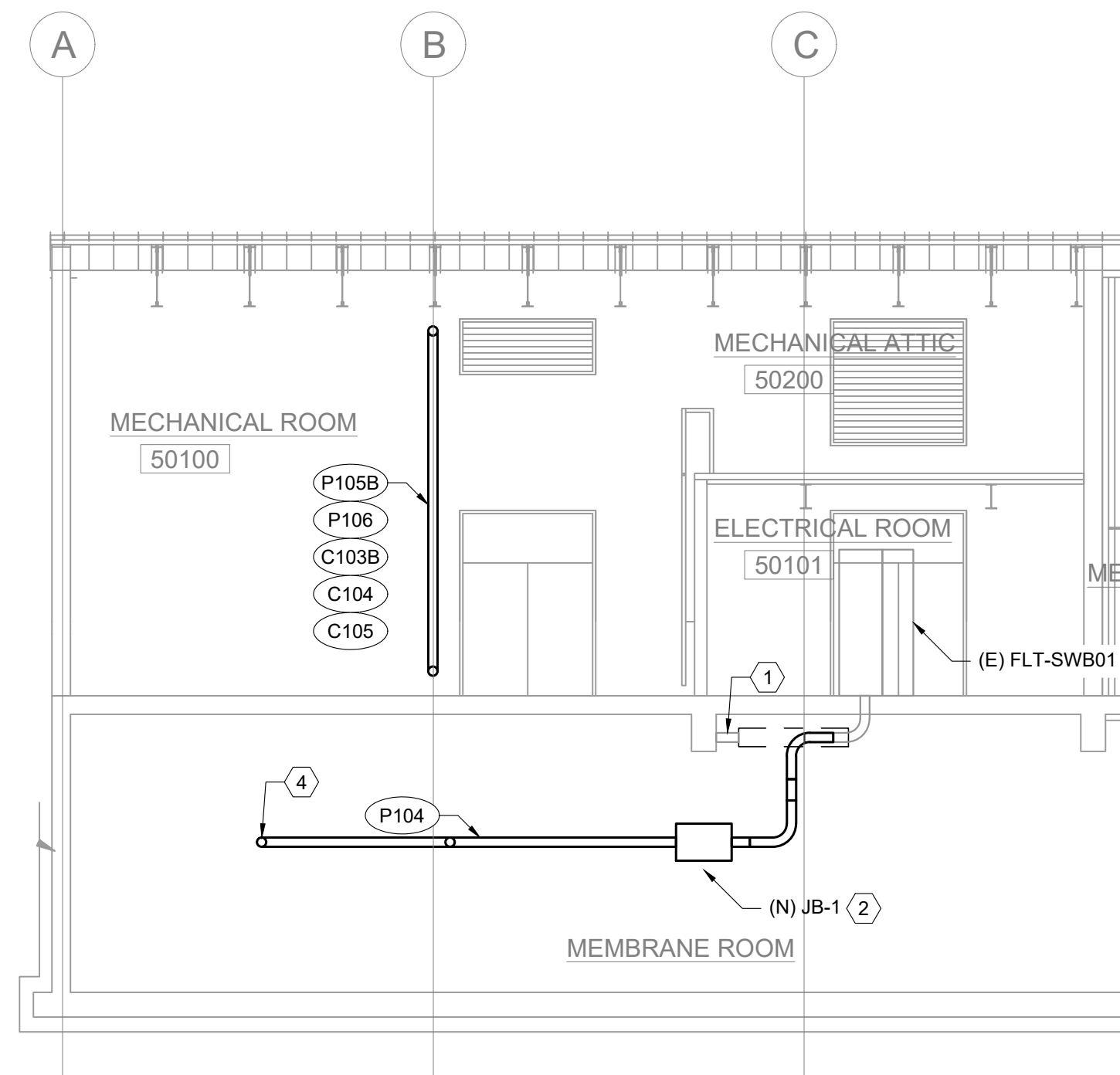
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WTP GENERATOR
405 NE DAVIDSON ST, LINN COUNTY
ALBANY, OREGON

Rev	Description

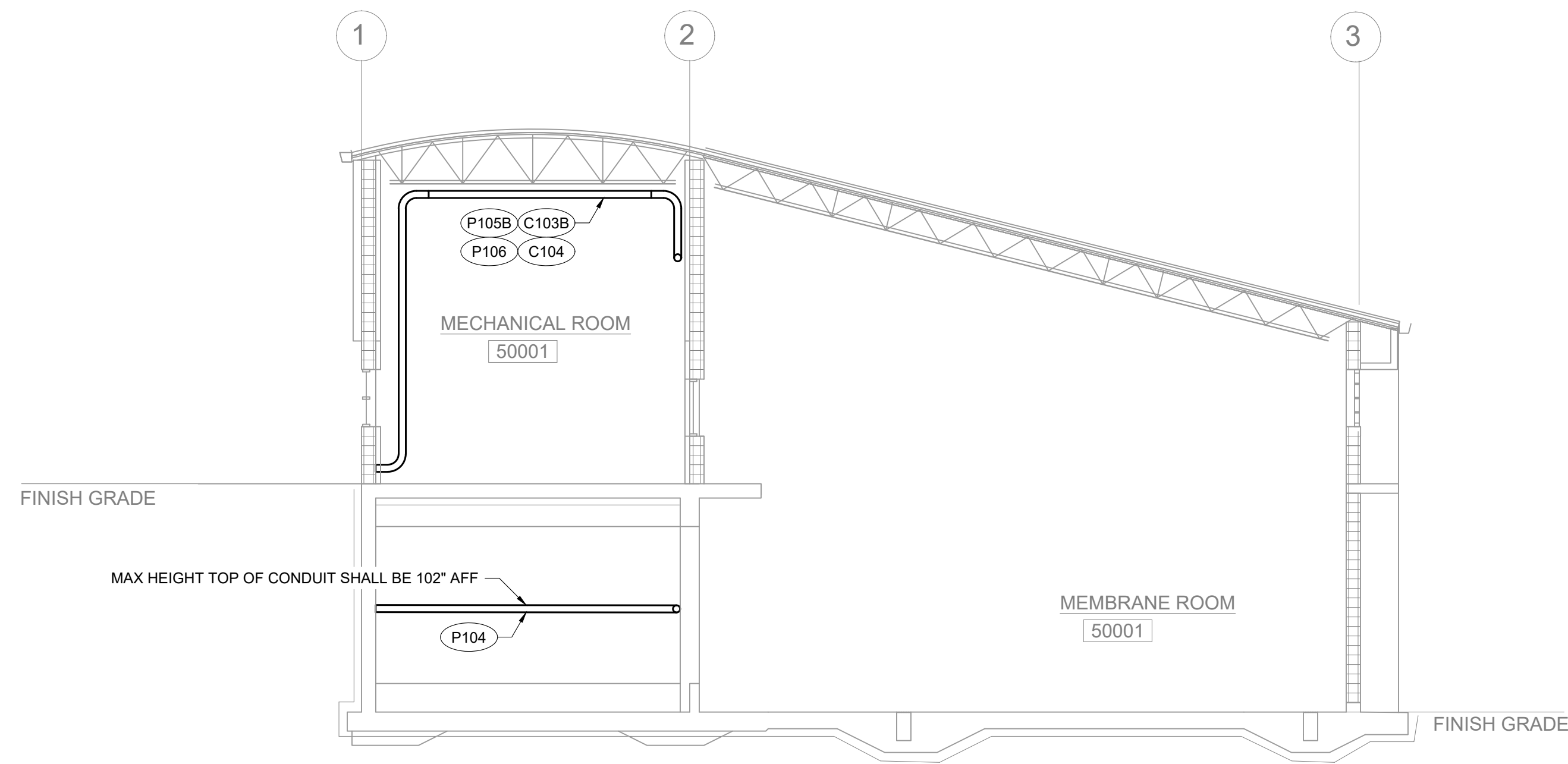
LOWER ELECTRICAL FLOOR PLAN

Design: MEH
Drawn: EJC
Checked: MEH
Date: 10/08/2024
Proj. No.: 7022301
Drawing No.:

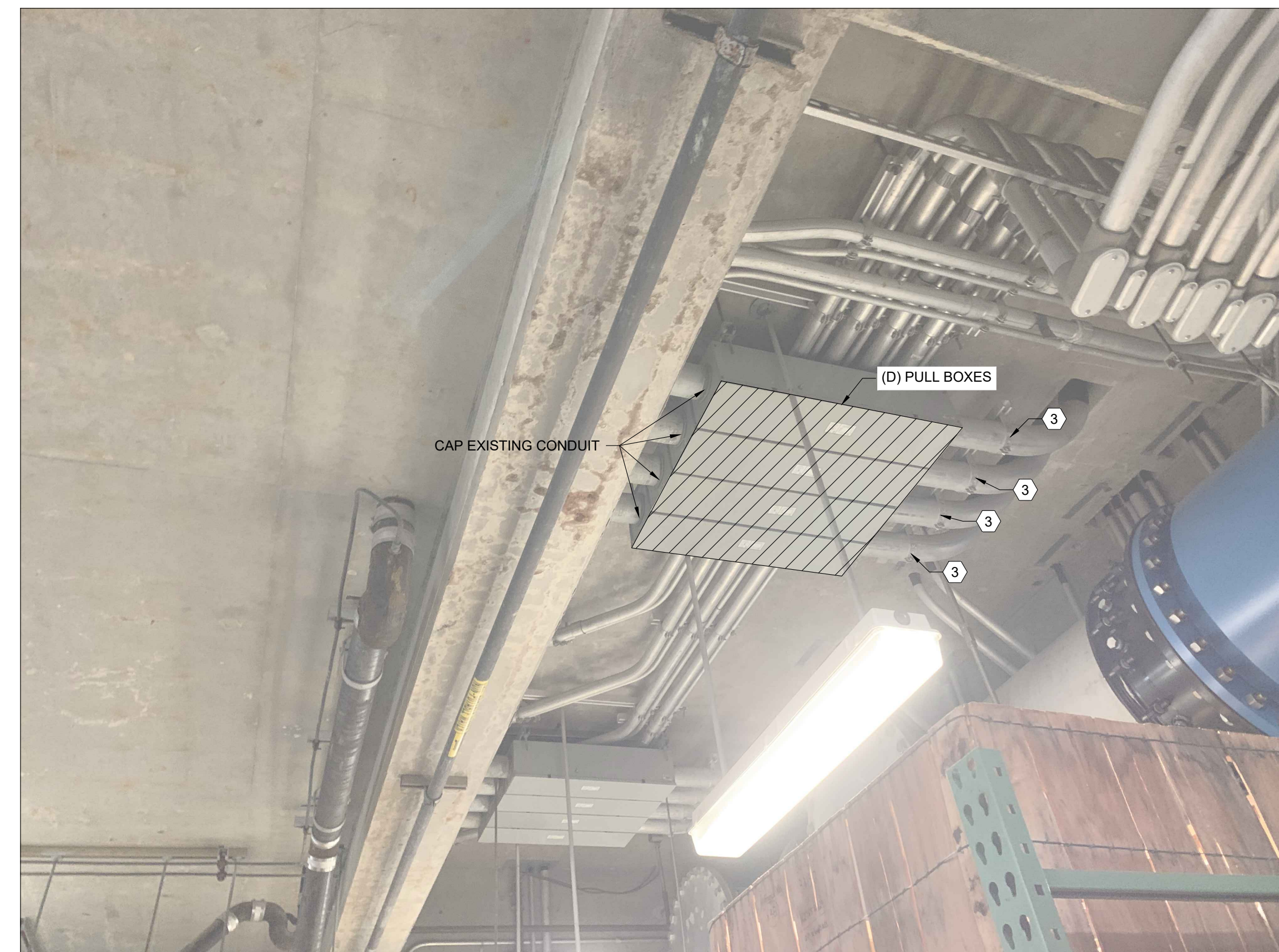
E201



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



2 ELECTRICAL SECTION
SCALE: 1/8" = 1'-0"



3 ELECTRICAL DEMOLITION PHOTO
SCALE: NTS

- SHEET KEY NOTES**
1. REMOVE EXISTING CONDUCTORS AND ABANDON CONCRETE ENCASED CONDUITS. CAP EACH END.
 2. DEMOLISH EXISTING JUNCTION BOXES AND PROVIDE NEW 36"W X 36"L X 24"D JUNCTION BOX AS SHOWN TO ACCEPT THE NEW CONDUITS FROM P104 AND TRANSITION TO THE EXISTING CONDUITS THAT FEED SWITCHBOARD.
 3. REMOVE EXISTING CONDUIT AT FITTING SHOWN.
 4. CONDUIT TO EXTERIOR WALL.

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ELECTRICAL SECTION

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Drawn: EJC
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Date: 10/08/2024
Proj. No.: 7022301
Drawing No.:

E300



1 ELECTRICAL DETAIL PHOTO
SCALE: NTS

SHEET KEY NOTES
 1. REMOVE LB FITTING AND CONDUIT AS SHOWN. EXTEND CONDUIT TO EXISTING PANEL FLT-LP02 FOR BATTERY CHARGER AND BLOCK HEATER POWER CIRCUITS.

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ELECTRICAL DETAIL PHOTO

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E301

