

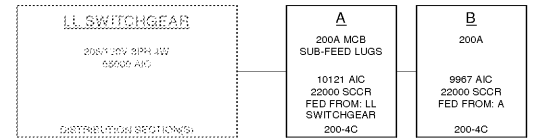
EQUIPMENT	PHASE	EQUIPMENT TYPE	SUPPLY FROM	SPACE NUMBER	SPACE NAME	VOLTAGE	POLES	WIRES	DEMAND (kVA)	DEMAND (A)	MAINS RATING (A)	MAINS FRAME RATING (A)	MAINS TYPE	FEEDER ID	FEEDER	VD %	LGUS TYPE	SPD	ULSE	ENCLOSURE TYPE	NEUTRAL	K-RATING	FAULT CURRENT (A)	SHORT CIRCUIT RATING (A)	NOTES
LL SWITCHGEAR	Existing	Switchboard	LL SWITCHGEAR	100	Sales Area	208	3	4	42.7 kVA	119 A	200	200	THERMAL MAGNETIC	200-4C	(4) #3/0 AWG CU, (1) #6 AWG CU GND IN 2" CONDUIT	1.261	SUB-FEED / DOUBLE			NEVA 1	NEVA 1		85000	22000	LANDLORD TO SUPPLY 2" TO TENANT SPACE
---	New Construction	Branch Panelboard	A	100	Sales Area	208	3	4	18.6 kVA	52 A	200	200		200-4C	(4) #3/0 AWG CU, (1) #6 AWG CU GND IN 2" CONDUIT	1.261				NEVA 1			9967	22000	

NOTES:  
 ALL CONDUIT SIZES INDICATED ARE MINIMUM SIZES. INCREASE SIZES AS REQUIRED TO ACCOMMODATE CONDUCTOR PULLING EASE, FIELD CONDITIONS, ETC.  
 "CU" = COPPER CONDUCTOR, "AL" = ALUMINUM CONDUCTOR

TYPICAL EQUIPMENT NAME NOMENCLATURE:  
 1 - POWER DISTRIBUTION SYSTEM (BLANK - NORMAL, E - EMERGENCY, S - STANDBY, L - LIFE SAFETY)  
 2 - DESCRIPTION (H - 480Y/277V, L - 208Y/120V)  
 3 - FLOOR / LEVEL  
 4 - SEQUENCE

FEEDER ID NOMENCLATURE:  
 1 - INDICATES FEEDER SIZED TO COMPENSATE FOR VOLTAGE DROP  
 U = EQUIPMENT GROUND CONDUCTOR REMOVED FOR SERVICE ENTRANCE FROM UTILITY  
 P = PARTLY-SIZED EQUIPMENT GROUND CONDUCTOR  
 X = EXISTING FEEDER TO REMAIN UNLESS OTHERWISE NOTED  
 T = UPSIZED GROUND CONDUCTORS FOR TRANSFORMER SECONDARY

2 - CONDUCTOR AMPACITY  
 3 - TOTAL NUMBER OF PHASE AND GROUND ("NEUTRAL") CONDUCTORS  
 4 - CONDUCTOR MATERIAL: C = COPPER, A = ALUMINUM  
 5 - SPECIAL (MAY BE BLANK)  
 6 - ISOLATED GROUND (PROVIDE CONTINUOUS INSULATED EQUIPMENT GROUNDING CONDUCTOR(S) FROM INSULATED ISOLATED GROUND BAR(S) TO RESPECTIVE UPSTREAM SERVICE ENTRANCE OR DERIVED SYSTEM GROUNDING ELECTRODE CONDUCTOR AS APPLICABLE)



SINGLE LINE DIAGRAM  
 SCALE: NONE

**GENERAL NOTES**

- PROVIDE NEW 200A/3P OCP AND A NEW ELECTRIC METER IN LANDLORD ELECTRICAL GEAR.
- GO TO INSTALL TENANT ID SIGN ON THE TENANT'S ELECTRICAL DISCONNECT IN THE METER ROOM.
- LANDLORD TO PROVIDE EMPTY 2" CONDUIT FROM LANDLORD'S ELECTRIC METER ROOM TO TENANT SPACE.
- LANDLORD TO PROVIDE EMPTY 1/2" CONDUIT TO TELECOMM ROOM.

**FIELD VERIFY ALL CONDITIONS**

DESIGN DRAWINGS ARE SCHEMATIC. THIS CONTRACTOR SHALL VISIT THE SITE PRIOR TO BIDDING OR AWARD OF CONTRACT TO INSPECT EXISTING FIELD CONDITIONS. THIS CONTRACT SHALL INCLUDE ALL LABOR AND MATERIALS NECESSARY FOR FIELD MODIFICATIONS DUE TO EXISTING CONDITIONS. THE CONTRACTOR SHALL CONTACT THE ARCHITECT, ENGINEER OR OWNER PRIOR TO BIDDING FOR INTERPRETATIONS AND CLARIFICATIONS OF THE DESIGN AND INCLUDE IN HIS BID ALL COSTS TO MEET THE DESIGN INTENT. CLARIFICATIONS MADE BY THE ARCHITECT, ENGINEER OR OWNER AFTER BIDDING WILL BE FINAL AND SHALL BE IMPLEMENTED AT CONTRACTOR'S COST.

BIDDING CONTRACTORS SHALL HAVE A WORKING KNOWLEDGE OF LOCAL CODES AND ORDINANCES AND SHALL INCLUDE IN THEIR BIDS ALL COSTS FOR ALL WORK INSTALLED IN STRICT ACCORDANCE WITH GOVERNMENT CODES, THE PLANS AND SPECIFICATIONS NOTWITHSTANDING. THE CONTRACTOR SHALL ALERT ARCHITECT, ENGINEER OR OWNER OF ANY CONFLICT DISCREPANCIES BETWEEN GOVERNMENT CODES AND DESIGN INTENT.

CKT	CIRCUIT DESCRIPTION	VD%	AWG	GND	TRIP	POLE	A	B	C	POLE	TRIP	GND	AWG	VD%	CIRCUIT DESCRIPTION	CKT
1	WH1 NON-CONTINUOUS RESTROOM 102	0.579	#12	#12	20 A	1	1.25	0.62							AH-1 HEATING STOCKROOM 105	2
3	RTU RECEPTACLE RECEPTACLE STOCKROOM 105	0.222	#12	#12	20 A	1		0.62							AH-1 HEATING STOCKROOM 105	4
5	SPARE				20 A	1		0.68							AH-1 HEATING STOCKROOM 105	6
7	SPARE				20 A	1		0.00	4.68						AH-1 HEATING STOCKROOM 105	8
9	SPARE				20 A	1		0.00	4.68						AH-1 HEATING STOCKROOM 105	10
11	SPARE				20 A	1		0.00	4.68						AH-1 HEATING STOCKROOM 105	12
13	SPARE				20 A	1		0.00	0.00						SPARE	14
15	SPARE				20 A	1		0.00	0.00						SPARE	16
17	SPARE				20 A	1		0.00	0.00						SPARE	18
19	SPARE				20 A	1		0.00	0.00						SPARE	20
21	SPARE				20 A	1		0.00	0.00						SPARE	22
23	SPARE				20 A	1		0.00	0.00						SPARE	24
25	SPARE				20 A	1		0.00	0.00						SPARE	26
27	SPARE				20 A	1		0.00	0.00						SPARE	28
29	SPARE				20 A	1		0.00	0.00						SPARE	30

LOAD CLASSIFICATION	CONNECTED LOAD	DEMAND FACTOR	ESTIMATED DEMAND	NOTES:	BREAKER QUANTITIES:
Heating	15923 VA	100.00%	15923 VA	LANDLORD TO SUPPLY 2" TO TENANT SPACE	(1) 15A / 3P (2) 20A / 1P (1) 20A / 2P (1) 60A / 3P
Lighting	6234 VA	125.00%	7793 VA		
Misc	1475 VA	113.59%	1675 VA		
Non-Continuous	7800 VA	100.00%	7800 VA		
Receptacle	9540 VA	100.00%	9540 VA		

ABBREVIATIONS	CONTRACTOR TYPE	MOTOR CONTROL TYPE	CONTROL TYPE
DC LOCAL DISCONNECT	EC ELECTRICAL CONTRACTOR	CS COMBINATION STARTER	TC TIMELOCK
MC MOTOR CONTROL (POWER)	EX EXISTING	MCC MOTOR CONTROL STARTER	CPT CONTROL POWER TRANSFORMER
SD DUCT SMOKE DETECTOR	FC FIRE PROTECTION CONTRACTOR	MG MAGNETIC STARTER OR CONTACT	BAS BUILDING AUTOMATION SYSTEM
CN CONTROLS	GC GENERAL CONTRACTOR	MS MANUAL STARTER	LOW LOW VOLTAGE CONTROLS
TS TOGGLE SWITCH	HC HVAC CONTRACTOR	VFD VARIABLE FREQUENCY DRIVE	LINE LINE VOLTAGE CONTROLS
C/B H.A.C.R. CIRCUIT BREAKER AT SOURCE PANELBOARD	MFR MANUFACTURER	MSR MANUAL STARTER W/ CONTROL RELAY	RLINE REVERSE ACTING LINE VOLTAGE THERMOSTAT
FUSE FUSE AT LOCAL DISCONNECT (VERIFY FIELD RATING)	PC PLUMBING CONTRACTOR	OV OVERCURRENT PROTECTION	MAN MANUAL
FLA OPERATING FULL LOAD AMPS	OR OWNER OR OTHERS		FA FIRE ALARM
MCA MINIMUM CIRCUIT AMPACITY			CO CARBON MONOXIDE SENSOR
CP CORD AND PLUG CONNECTION			INT INTEGRAL TO EQUIPMENT

EQUIPMENT MARK	DESCRIPTION	VOLTS (V)	PHASE	EMERGENCY	BHP (HP)	HP (HP)	HTG KW (kW)	WATTS (W)	FLA (A)	MCA (A)	OCP (A)	DC TYPE	DC FURN	DC INST	DC WIRE	MC TYPE	MC FURN	MC INST	MC WIRE	CN TYPE	CN FURN	CN INST	CN WIRE	SD TYPE
WH1	ELECTRIC DOMESTIC WATER HEATER	208	1				2.5					EC												

EX	(#)	(G)	(GE)	(ST)	(A)	(L)	(LT)	(->)

**PANEL SCHEDULE GENERAL NOTES**

- PROVIDE HACR RATED BREAKERS ON ALL MOTOR LOADS.
- PROVIDE LOCKING TYPE BREAKER FOR ALL LIFE SAFETY AND NIGHT LIGHTING BRANCH CIRCUITS.
- UNLESS INDICATED OTHERWISE ON PLANS OR SCHEDULES, PROVIDE NEW BRANCH OVERCURRENT PROTECTIVE DEVICE (OPD) BREAKER OR FUSED SWITCH, WITH FUSE, AS APPLICABLE) IN CASES WHERE NEW CIRCUITS OR FEEDERS ARE SHOWN CONNECTED TO EXISTING POWER DISTRIBUTION EQUIPMENT. PROVIDE OPD MANUFACTURED BY THE SAME MANUFACTURER AS THE EXISTING EQUIPMENT IN WHICH IT WILL BE INSTALLED. PROVIDE A.I.C. RATINGS THAT MEET OR EXCEED THE RATINGS OF THE EXISTING EQUIPMENT AND OPD'S.
- ALL VOLTAGE DROP CALCULATIONS AND COMPENSATED WIRE SIZES ARE BASED ON RIGHT ANGLE CIRCUIT LENGTHS TO THE LAST DEVICE. ACTUAL VOLTAGE DROP VARIES BASED ON INSTALLED WIRE LENGTH.

MECHANICAL/ELECTRICAL ENGINEERS  
 WWW.KLHENGERS.COM  
 1538 ALEXANDRIA PIKE, SUITE 11 FT. THOMAS, KENTUCKY 41075 800-354-9783 859-442-8050 859-442-8052  
 LEXINGTON, KENTUCKY COLUMBUS, OHIO CINCINNATI, OHIO NEW YORK

REVISIONS	DATE
ISSUE FOR DESIGN	10/27/2017
LANDLORD AND PERMIT	
ISSUE FOR PERMIT	11/17/2017

**robert g. lyon + associates, inc.**  
 18181 Arch Street  
 9500 Shiloh Road, Suite 200  
 Schiller Park, IL 60176  
 P: 847.671.7452  
 F: 847.671.7400  
 www.rgla.com

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AVENTURA MALL  
 19501 BISCAYNE BLVD  
 SPACE #327  
 AVENTURA, FL 33180

ELECTRIC POWER SINGLE LINE DIAGRAM AND SCHEDULES

DRAWN BY	LAH
CHECKED BY	LGf
JOB NUMBER	19811
SHEET NAME	E3.1

**Order Plans @**

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