X FEEDER SCHEDULE

FEEDER ID	OCPD	PHASE WIRES (AWG)	NEUTRAL WIRES (AWG)	EQUIP. GND (AWG)	MIN. CONDUIT SIZE
G3	100	(3)1/0	--	8	1-1/4
G4	100	(3)1/0	(1)1/0	8	1-1/2
G5	100	(3)1/0	(1)3/0	8	2
H3	125	(3)1/0	--	6	1-1/2
H4	125	(3)1/0	(1)1/0	6	1-1/2
H5	125	(3)1/0	(1)250KCMIL	6	2
J3	150	(3)1/0	--	6	1-1/2
J4	150	(3)1/0	(1)1/0	6	1-1/2
J5	150	(3)1/0	(2)1/0	6	2
K3	175	(3)2/0	--	6	1-1/2
K4	175	(3)2/0	(1)2/0	6	2
K5	175	(3)2/0	(2)2/0	6	2
L3	200	(3)3/0	--	6	2
L4	200	(3)3/0	(1)3/0	6	2
L5	200	(3)3/0	(2)3/0	6	2-1/2
M3	225	(3)4/0	--	4	2
M4	225	(3)4/0	(1)4/0	4	2-1/2
M5	225	(3)4/0	(2)4/0	4	2-1/2
N3	250	(3)250KCMIL	--	4	2
N4	250	(3)250KCMIL	(1)250KCMIL	4	2-1/2
N5	250	(3)250KCMIL	(2)250KCMIL	4	3

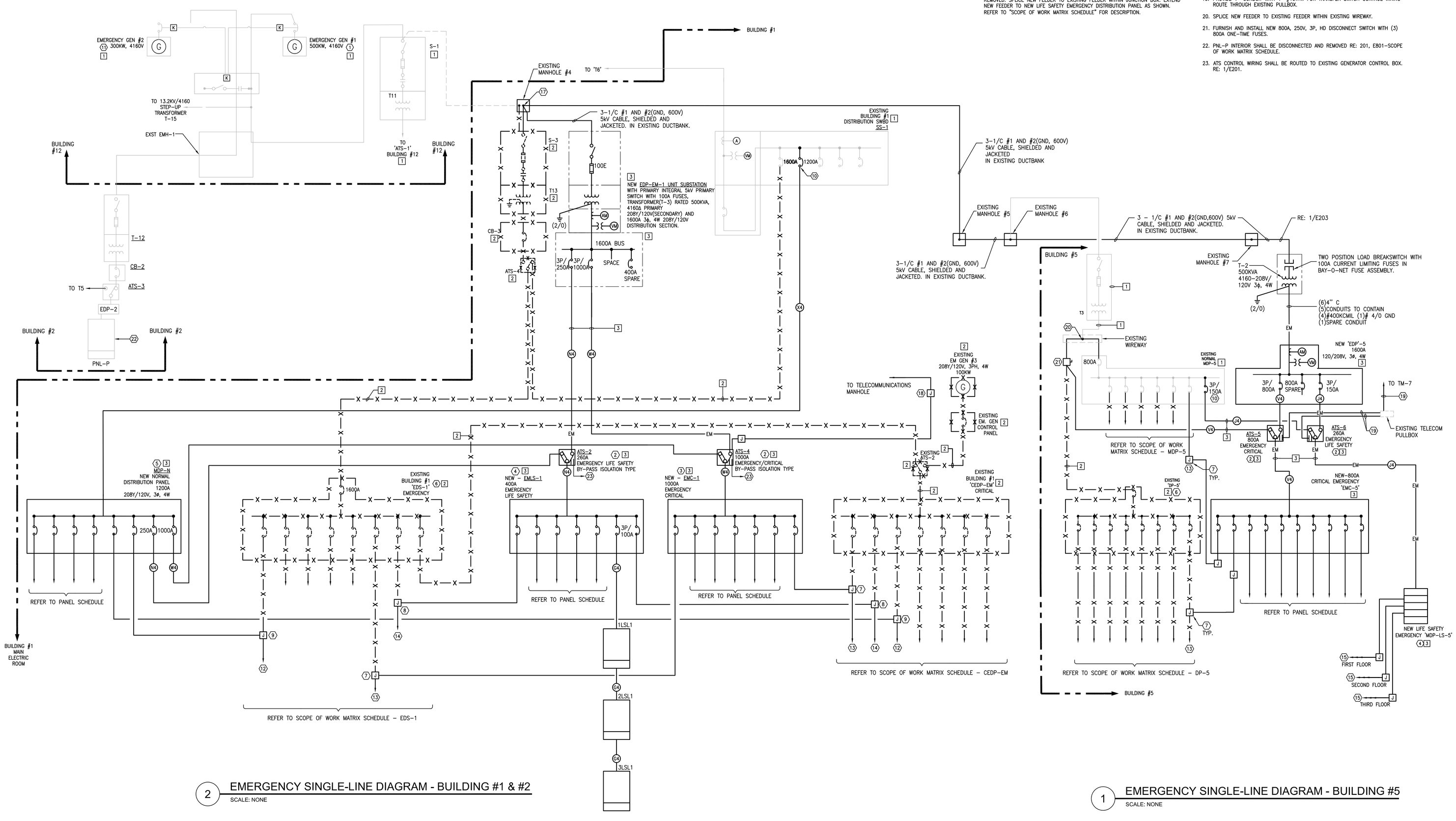
FEEDER ID	OCPD	PHASE WIRES (AWG)	NEUTRAL WIRES (AWG)	EQUIP. GND (AWG)	MIN. CONDUIT SIZE
V3	800	(9)300KCMIL	--	(3)1/0	(3)2-1/2
V4	800	(9)300KCMIL	(3)300KCMIL	(3)1/0	(3)3
V5	800	(9)300KCMIL	(6)300KCMIL	(3)1/0	(3)3
W3	1000	(9)400KCMIL	--	(3)2/0	(3)3
W4	1000	(9)400KCMIL	(3)400KCMIL	(3)2/0	(3)4
W5	1000	(9)400KCMIL	(6)400KCMIL	(3)2/0	(3)4
X3	1200	(12)350KCMIL	--	(4)3/0	(4)2-1/2
X4	1200	(12)350KCMIL	(4)350KCMIL	(4)3/0	(4)3
X5	1200	(12)350KCMIL	(8)350KCMIL	(4)3/0	(4)4

3 CONSTRUCTION SCOPE X

1. EXISTING EQUIPMENT/FEEDER TO REMAIN AND BE REUSED.
2. EXISTING EQUIPMENT/FEEDER TO BE DISCONNECTED AND REMOVED.
3. NEW EQUIPMENT/FEEDER TO BE INSTALLED WITHIN SCOPE OF CONTRACT.

4 CONSTRUCTION NOTES V

1. EXISTING 500KW EMERGENCY GENERATOR SHALL BE RECONNECTED TO PROVIDE EMERGENCY STANDBY POWER FOR BUILDINGS NO. 1, NO. 5, AND NO. 12.
2. BYPASS ISOLATION TRANSFER SWITCH INSTALLATION SHALL BE AS OUTLINED IN NEC 41 (NURSING HOME AND LIMITED HEALTH CARE FACILITIES). DESIGNATED EMERGENCY SYSTEMS SHALL BE CLASSIFIED AS "ESSENTIAL ELECTRICAL SYSTEMS".
3. NEW CRITICAL EMERGENCY DISTRIBUTION PANEL. ALL EXISTING CRITICAL EMERGENCY DESIGNATED LOADS SHALL BE RECIRCUITED TO THIS PANEL. REFER TO "SCOPE OF WORK MATRIX SCHEDULE" FOR CIRCUITING DETAILS.
4. NEW LIFE SAFETY EMERGENCY DISTRIBUTION PANEL. ALL EXISTING LIFE SAFETY EMERGENCY DESIGNATED LOADS SHALL BE RE-CONNECTED TO THIS PANEL.
5. NEW NORMAL SYSTEM DISTRIBUTION PANEL 'MDP-N'. ALL EXISTING NORMAL SYSTEM LOADS SHALL BE DISCONNECTED FROM EXISTING 'EDS-1 AND CEDP-EM' AND TRANSFERRED TO NEW NORMAL SYSTEMS PANEL MDP-N.
6. ALL EXISTING NORMAL SYSTEMS LOADS SHALL BE DISCONNECTED FROM EXISTING PANEL AND TRANSFERRED TO NEW NORMAL DISTRIBUTION PANEL 'MDP-N'(BUILDING #1) OR EMC-5(BUILDING #5). ALL EXISTING CRITICAL EMERGENCY LOADS SHALL BE DISCONNECTED FROM EXISTING PANEL AND TRANSFERRED TO NEW CRITICAL EMERGENCY PANEL 'EMC-1'.
7. INSTALL NEW CODE COMPLIANT JUNCTION BOX ON EXISTING FEEDER. DISCONNECT AND REMOVE ASSOCIATED EXISTING FEEDER TO OLD EXISTING PANEL BEING REMOVED. SPLICE NEW FEEDER TO EXISTING FEEDER WITHIN JUNCTION BOX. EXTEND NEW FEEDER TO NEW CRITICAL EMERGENCY DISTRIBUTION PANEL AS SHOWN. REFER TO "SCOPE OF WORK MATRIX SCHEDULE" FOR DESCRIPTION.
8. INSTALL NEW CODE COMPLIANT JUNCTION BOX ON EXISTING FEEDER. DISCONNECT AND REMOVE ASSOCIATED EXISTING FEEDER TO OLD EXISTING PANEL BEING REMOVED. SPLICE NEW FEEDER TO EXISTING FEEDER WITHIN JUNCTION BOX. EXTEND NEW FEEDER TO NEW LIFE SAFETY EMERGENCY DISTRIBUTION PANEL AS SHOWN. REFER TO "SCOPE OF WORK MATRIX SCHEDULE" FOR DESCRIPTION.
9. INSTALL NEW CODE COMPLIANT JUNCTION BOX ON EXISTING NORMAL FEEDER. DISCONNECT AND REMOVE ASSOCIATED EXISTING FEEDER TO OLD EXISTING PANEL BEING REMOVED. SPLICE NEW FEEDER TO EXISTING FEEDER WITHIN JUNCTION BOX. EXTEND NEW FEEDER TO NEW DISTRIBUTION PANEL AS SHOWN. REFER TO "SCOPE OF WORK MATRIX SCHEDULE" FOR DESCRIPTION.
10. INSTALL NEW CIRCUIT BREAKER IN EXISTING PANELBOARD. CIRCUIT BREAKER TO MATCH INTERRUPTING RATING OF EXISTING PANELBOARD.
11. EXISTING 300KW EMERGENCY GENERATOR SHALL BE RECIRCUITED TO PROVIDE EMERGENCY STANDBY POWER FOR BUILDING #2.
12. TYPICAL FOR ALL NORMAL DESIGNATED LOADS, CONNECTED TO EXISTING PANEL.
13. TYPICAL FOR ALL CRITICAL EMERGENCY DESIGNATED LOADS, CONNECTED TO EXISTING PANEL.
14. TYPICAL FOR ALL LIFE SAFETY EMERGENCY DESIGNATED LOADS, CONNECTED TO EXISTING PANEL.
15. INSTALL CODE COMPLIANT JUNCTION BOX AND EXTEND 3-1P/20A CIRCUITS TO EACH FLOOR WITH 2-#12AWG AND 1-12AWG(GRD) #3/4" C, FOR FUTURE LIFE SAFETY CONNECTION. COORDINATE BOX LOCATION WITH BATAVIA ENGINEERING STAFF PRIOR TO ROUGH IN.
16. RE-USE EXISTING 3P/800A CIRCUIT BREAKER.
17. INTERCEPT EXISTING 5kV CONDUCTOR AND INSIDE MANHOLE TAP FOR CONNECTION TO BUILDING 1 AND 5.
18. EXISTING TO REMAIN GENERATOR CONTROL WIRING AND RACEWAYS. RE-USE EXISTING CONDUCTORS AND CONNECT TO NEW ATS-2 AND ATS-4.
19. PROVIDE 1" CONDUIT WITH 4" #10THW FOR TRANSFER SWITCH CONTROL WIRING ROUTE THROUGH EXISTING PULLBOX.
20. SPLICE NEW FEEDER TO EXISTING FEEDER WITHIN EXISTING WIREWAY.
21. FURNISH AND INSTALL NEW 800A, 250V, 3P, HD DISCONNECT SWITCH WITH (3) 800A ONE-TIME FUSES.
22. PNL-P INTERIOR SHALL BE DISCONNECTED AND REMOVED RE: 201, EB01-SCOPE OF WORK MATRIX SCHEDULE.
23. ATS CONTROL WIRING SHALL BE ROUTED TO EXISTING GENERATOR CONTROL BOX. RE: 1/E201.



2 EMERGENCY SINGLE-LINE DIAGRAM - BUILDING #1 & #2
SCALE: NONE

1 EMERGENCY SINGLE-LINE DIAGRAM - BUILDING #5
SCALE: NONE

NOTES:

KEY PLAN NTS

100% SUBMISSION	07/18/08
Revisions:	Date

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Drawing Title: **EMERGENCY SINGLE LINE DIAGRAM**

Approved: Project Director

Project Title: **Batavia Buildings 1,5&6 Electrical System Up-Grades**

Location: **Batavia, New York**

Date: Sept 5, 2008 | Checked: P.Mc. | Drawn: J.P.R.

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Building Number: **1, 5 & 6**

Drawing Number: **E-701**

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