# Power System Study
## for the
# Clark County School District – Career and Technical Center
**Las Vegas, Nevada**

## Response to Short Circuit Study Submittal Comments

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**Response to Submittal Comments (Power System Study):**

MSA Submittal Comments (01/05/06)

a) *Revise calculations based on transformers with an impedance of at least 5%. Coordinate exact impedance with transformer re-submittal.*

The short circuit study was re-performed using transformer impedance of 5% for the 225kVA rated transformers. The impedances of the smaller transformers were not changed as they did not adversely affect the results of the short circuit study.

b) *Various panels, "THED" breaker is rated up to 65KAIC at 277V. Adjust calculation set points and recalculate violations.*

The short circuit study was re-performed using single phase THED breakers with 65KAIC rating at 277V.

c) *Panel "2LA1B" is submitted with THHQB breakers rated at 22KIAC. Adjust breaker in calculation.*

The short circuit study was re-performed using THHQB breakers on panel 2LA1B.

d) *Distribution panel "5HDPA" is submitted with 65KAIC.*

The Bill of Material dated 07/27/2005 indicated this board was rated 42KAIC. A newer Bill of Material has been supplied and reflects 65KAIC. The latter value has been used in the Short Circuit Study.

MSA Submittal Comments (01/06/06)

A. *The following AIC ratings for panelboards shall be revised as well as the breakers within the panel to be fully rated per the results of the Power System Study*

| *Panel* | *Ratings* |
|---|---|
| *1HA1C* | *22KAIC* |
| *5HA1A* | *42KAIC* |
| *5HA1B* | *42KAIC* |
| *5HA1C* | *42KAIC* |
| *5HA1D* | *42KAIC* |
| *5HA1E* | *42KAIC* |
| *6HA1A* | *42KAIC* |
| *6HA1B* | *42KAIC* |
| *6HA1C* | *42KAIC* |
| *9HA2A* | *42KAIC* |
| *9HA2B* | *42KAIC* |
| *2EH1* | *42KAIC* |
| *2EL1* | *Main Primary Breaker 42KAIC minimum* |

The short circuit study has been re-performed using updated panel AIC ratings per the submittal comments specifications.

## ***Summary and Recommendations***

Based on the specification changes by MSA Engineering, all switchboards, panelboards, and MCC's were found to be properly rated (or not in "VIOLATION").

It should be pointed out that the THQB breakers in four panels (3LB1A, 3LBC1A, 3LBC1B, and 3LBC1C) are in "VIOLATION" by less than 0.5% during ground fault calculations. At first glance, it is not apparent why the fault duty calculation for the branch circuit breakers is higher than the duty rating of the panelboard itself. However, in review of the methodology used for calculating fault current (per the ANSI Standard) reveals that X/R ratios and Power Factor considerations (based on KAIC *test* ratings of breakers) can have a significant impact on the equipment duty rating results when cable lengths are short (between a source and test point). Essentially, the X/R ratio is calculated higher for panelboard than the breaker itself.

It was after this research that a sensitivity analysis was performed to determine the impact of cable lengths on the THQB breaker and panelboard duty ratings. It was found that by increasing the cable length by one foot, the THQB breakers were no longer found to be in VIOLATION. And, as an aside, the breaker required duty rating was found to match the panelboard duty rating at a feeder cable length of approximately 25' (this is the point where the panelboard X/R ratio matches the breaker's default value.

Generally, it is recommended to select the next higher KAIC rating for panelboards and breakers that are determined to have a calculated duty rating requirement that is close to (within 10% of) the actual manufacturer's equipment interrupting duty rating. Therefore it is suggested (though not absolutely necessary) to increase the equipment KAIC ratings of 3LB1A, 3LBC1A, 3LBC1B, and 3LBC1C from 10KAIC to 14KAIC. The reason given for "not absolutely necessary" is that actual construction cable lengths may vary, and since the sensitivity report indicated a change in length of only one foot was sufficient to bring these devices out of "VIOLATION".

# APPENDIX

# Nevada Power
# Fault Data

## *FAULT CURRENT FOR 3-PH TRANSFORMERS (12,470 DELTA-WYE ) CALCULATED FOR THE EMERGENCY SPARE TRANSFORMER

| SUB IMPEDANCE (%) | SUB MVA | SYSTEM | TRANSFORMER | XFER IMPD | LINE TO LINE | LINE TO GRND | CURRENT BASE | 3-PH FAULT | LINE TO GRND |
|---|---|---|---|---|---|---|---|---|---|
| 2-138KV / 33MVA Banks in Parallel | BASE | IMPEDANCE | KVA - 3 PH | (%) | VOLTAGE | VOLTAGE | AMPS | AMPS | AMPS |
| 7.05 | 20 | 0.00026 | 75 | 3.24 | 208 | 120 | 208 | 11524 | 11581 |
| 7.05 | 20 | 0.00040 | 112.5 | 2.67 | 208 | 120 | 312 | 11819 | 11878 |
| 7.05 | 20 | 0.00053 | 150 | 3.47 | 208 | 120 | 416 | 27281 | 27599 |
| 7.05 | 20 | 0.00079 | 225 | 2.21 | 208 | 120 | 625 | 27162 | 27478 |
| 7.05 | 20 | 0.00106 | 300 | 2.96 | 208 | 120 | 833 | 31659 | 32295 |
| 7.05 | 20 | 0.00176 | 500 | 4.18 | 208 | 120 | 1388 | 31659 | 32295 |
| 7.05 | 20 | 0.00264 | 750 | 5.31 | 208 | 120 | 2082 | 49019 | 50058 |
| 7.05 | 20 | 0.00353 | 1000/1200 | 5.31 | 208 | 120 | 2776 | 49019 | 50059 |

1500-2500/2800 KVA TRANSFORMERS NOT AVAILABLE FOR 120/208 VOLTAGE SERIES

SEE NOTE BELOW THAT EXPLAINS THE EMERGENCY SPARE TRANSFORMER EXCEPT FOR THE 1000/1200 KVA 3-PH/208V 2500/2800 KVA 3-PH/480V AND 167 KVA 1-PH 120/240V TRANSFORMERS WHICH ARE THE LARGEST NPC CARRIES IN STOCK

| SUB IMPEDANCE (%) | SUB MVA | SYSTEM | TRANSFORMER | XFER IMPD | LINE TO LINE | LINE TO GRND | CURRENT BASE | 3-PH FAULT | LINE TO GRND |
|---|---|---|---|---|---|---|---|---|---|
| 2-138KV / 33MVA Banks in Parallel | BASE | IMPEDANCE | KVA - 3 PH | (%) | VOLTAGE | VOLTAGE | AMPS | AMPS | AMPS |
| 7.05 | 20 | 0.00026 | 75 | 3.24 | 480 | 277 | 90 | 5246 | 5273 |
| 7.05 | 20 | 0.00040 | 112.5 | 2.54 | 480 | 277 | 135 | 5271 | 5298 |
| 7.05 | 20 | 0.00053 | 150 | 3.37 | 480 | 277 | 180 | 12418 | 12571 |
| 7.05 | 20 | 0.00079 | 225 | 2.1 | 480 | 277 | 271 | 12250 | 12398 |
| 7.05 | 20 | 0.00106 | 300 | 2.84 | 480 | 277 | 361 | 14470 | 14677 |
| 7.05 | 20 | 0.00176 | 500 | 3.98 | 480 | 277 | 601 | 14470 | 14677 |
| 7.05 | 20 | 0.00264 | 750 | 5.31 | 480 | 277 | 902 | 21242 | 21692 |
| 7.05 | 20 | 0.00353 | 1000 | 5.31 | 480 | 277 | 1203 | 30901 | 31863 |
| 7.05 | 20 | 0.00529 | 1500 | 5.31 | 480 | 277 | 1804 | 39994 | 41620 |
| 7.05 | 20 | 0.00705 | 2000 | 5.31 | 480 | 277 | 2406 | 53484 | 56432 |
| 7.05 | 20 | 0.00987 | 2500/2800 | 5.31 | 480 | 277 | 3368 | 53484 | 56432 |

## *FAULT CURRENT FOR 1-PH TRANSFORMERS CALCULATED FOR THE EMERGENCY SPARE TRANSFORME
## ( ONLY FOR SINGLE PHASE INSTALLATIONS) CALL DISTRIBUTION PLANNING AND ANALYSIS FOR OPEN DELTA

| SUB IMPEDANCE (%) | SUB MVA | SYSTEM | TRANSFORMER | XFER | XFER | XFER IZ% + | LINE TO LINE | LINE TO GRND | HALF WINDINGS | 240 BOLTED | 120 BOLTED |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 2-138KV / 33MVA Banks in Parallel | BASE | IMPEDANCE | KVA - 1 PH | IR% | IX% | SYSTEM IMPD | VOLTAGE | VOLTAGE | IMPEDANCE | AMPS | AMPS |
| 7.05 | 20 | 0.00009 | 25 | 1.30 | 1.40 | 1.92% | 240 | 120 | 0.02583 | 12280 | 18970 |
| NO NEW TRANSFORMERS | | | ~~37.5~~ | | | | | | | | |
| 7.05 | 20 | 0.00018 | 50 | 0.92 | 1.40 | 1.70% | 240 | 120 | 0.02196 | 21186 | 32734 |
| 7.05 | 20 | 0.00026 | 75 | 0.80 | 1.21 | 1.48% | 240 | 120 | 0.01909 | 25816 | 40888 |
| 7.05 | 20 | 0.00035 | 100 | 0.72 | 1.40 | 1.61% | 240 | 120 | 0.02038 | 43302 | 67717 |
| 7.05 | 20 | 0.00059 | 167 | 0.81 | 1.32 | 1.61% | 240 | 120 | 0.02055 | 43302 | 67717 |

## *FAULT CURRENT ON THE 12 kV SYSTEM (FOR CUSTOMER OWNED PRIMARY SWITCHGEAR)

| 3-PH FAULT | LINE TO GRND |
|---|---|
| AMPS | AMPS |
| 12000 | 12000 |

*NOTE: THE EMERGENCY SPARE IS THE NEXT LARGEST TRANSFORMER FROM THE ACTUAL INSTALLATION AND USED IF THE SAME SIZE REPLACEMENT TRANSFORMER IS NOT IN STOCK. THE FAULT CURRENT LISTED WILL TAKE THIS INTO ACCOUNT.

Contact Distribution Planning and Analysis for more information concerning this table at (702) 252-4805.

JUL.21.2004 1:31PM NO.283 P.2/2

# E Sheet 5.01

# Database Report

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Equipment Database

**Summary**

| | | |
|---|---|---|
| 1 | Base MVA | 100 |
| 2 | Frequency | 60 |
| 3 | Buses | 69 |
| 4 | MCC Schedules | 0 |
| 5 | Panel Schedules | 0 |
| 6 | Utilities | 1 |
| 7 | Generators | 0 |
| 8 | UPS | 0 |
| 9 | Motors | 3 |
| 10 | Capacitors | 0 |
| 11 | Loads | 0 |
| 12 | Shunts | 0 |
| 13 | Filters | 0 |
| 14 | 2-Transformers | 10 |
| 15 | 3-Transformers | 0 |
| 16 | Zigzags | 0 |
| 17 | Cables | 58 |
| 18 | Busways | 0 |
| 19 | Xmission Lines | 0 |
| 20 | CL Reactors | 0 |
| 21 | HV Breakers | 0 |
| 22 | LV Breakers | 91 |
| 23 | Switches | 0 |
| 24 | Fuses | 0 |
| 25 | ATS | 0 |
| 26 | Meters | 0 |
| 27 | CTs | 0 |
| 28 | Relays | 0 |
| 29 | Notes | 1 |
| 30 | Lines | 0 |

**Buses**

| | ID Name | Status | Base kV | Area | Zone | AF Type | AF Option | Comment |
|---|---|---|---|---|---|---|---|---|
| 1 | 3DP1 | On | 0.208 | 1 | 1 | Other | Specified | |
| 2 | 3DP2 | On | 0.208 | 1 | 1 | Other | Specified | |
| 3 | 3HA1A | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 4 | 3HAIB | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 5 | 3HAIC | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 6 | 3HAID | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 7 | 3HDPA | On | 0.48 | 1 | 1 | Switchboard | Specified | |
| 8 | 3LA1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 9 | 3LAC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 10 | 3LAC1B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 11 | 3LB1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 12 | 3LBC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 13 | 3LBC1B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 14 | 3LBC1C | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 15 | 3LDPA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 16 | 3LDPB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 17 | 4DP1 | On | 0.208 | 1 | 1 | Other | Specified | |
| 18 | 4HAIA | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 19 | 4HAIB | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 20 | 4HAIC | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 21 | 4HAID | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 22 | 4LAIKA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 23 | 4LAIKB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 24 | 4LAIKC | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 25 | 4LAIKD | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 26 | 4LAIKE | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 27 | 4LAIKF | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 28 | 4LBCIA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 29 | 4LBIA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 30 | 4LBIB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 31 | 4LBIC | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 32 | 4LDPA | On | 0.208 | 1 | 1 | Switchboard | Specified | |
| 33 | 4LDPB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 34 | 8HA2A | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 35 | 8HA2B | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 36 | 8LA2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 37 | 8LAC2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 38 | 8LAC2B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 39 | 8LB2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 40 | 8LBC2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 41 | 8LBC2B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 42 | 8LDPA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 43 | 8LDPB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 44 | BH | On | 0.208 | 1 | 1 | Other | Specified | |
| 45 | BUS-1 | On | 0.208 | 1 | 1 | Other | Specified | |
| 46 | CA | On | 0.48 | 1 | 1 | Other | Specified | |
| 47 | ELEV | On | 0.48 | 1 | 1 | Other | Specified | |
| 48 | MDA | On | 0.48 | 1 | 1 | Switchboard | Specified | |
| 49 | MSA | On | 0.48 | 1 | 1 | Switchboard | Specified | |
| 50 | T3DP1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 51 | T3DP1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 52 | T3DP2 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 53 | T3DP2 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 54 | T3LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 55 | T3LDPA L | On | 0.208 | 1 | 1 | Other | Specified | |
| 56 | T3LDPB H | On | 0.48 | 1 | 1 | Other | Specified | |
| 57 | T3LDPB L | On | 0.208 | 1 | 1 | Other | Specified | |
| 58 | T4DP1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 59 | T4DP1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 60 | T4LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 61 | T4LDPA L | On | 0.208 | 1 | 1 | Other | Specified | |
| 62 | T4LDPB H | On | 0.48 | 1 | 1 | Other | Specified | |
| 63 | T4LDPB L | On | 0.208 | 1 | 1 | Other | Specified | |
| 64 | T8LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 65 | T8LDPA L | On | 0.208 | 1 | 1 | Other | Specified | |
| 66 | T8LDPB H | On | 0.48 | 1 | 1 | Other | Specified | |
| 67 | T8LDPB L | On | 0.208 | 1 | 1 | Other | Specified | |
| 68 | TX NPC H | Off | 12.47 | 1 | 1 | Other | Specified | |
| 69 | TX NPC L | On | 0.48 | 1 | 1 | Other | Specified | |

**Utilities**

| | ID Name | Status | To bus | Base kV | Util kV | Fault Unit | 3Ph SC1 | 3Ph SC2 | SLG SC1 | SLG SC2 | Model | MW | MVAR | CTL kV pu | MVAR Min | MVAR Max | kV pu Min | kV pu Max |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | NPC | On | TX NPC L | 0.48 | 0.48 | kA | 53.484 | 7 | 56.432 | 7 | Swing | 0 | 0 | 1 | -100000 | 100000 | 0.8 | 1.2 |

**Utilities**

| | ID Name | Ctl Angle | Ctl Bus | Ctl Base kV | R1 pu | X1 pu | R0 pu | X0 pu | Hrm RC Factor | Hrm RC Value | I Hrm Rating | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | NPC | 0 | TX NPC L | 0.48 | 0.31804 | 2.22631 | 0.26820 | 1.87741 | R-EXP | 0.5 | 120281. | |

**Motors**

| | ID Name | Status | To Bus | Base kV | Unit | Model | Motor kV | Hp or kW | Type | Load Class | RPM | FLA | Power Factor | Eff | kVA/Hp | ANSI Code | Connected |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | M BH | On | BH | 0.208 | U.S. | Individual | 0.2 | 30 | Induction | Non-essential | 1800 | | 0.82 | 0.91 | | < 50 | 100 |
| 2 | M CA | On | CA | 0.48 | U.S. | Individual | 0.2 | 25 | Induction | Non-essential | 1800 | | 0.82 | 0.91 | | < 50 | 100 |
| 3 | M ELEV 360 | On | ELEV | 0.48 | U.S. | Individual | 0.2 | 40 | Induction | Non-essential | 1800 | | 0.82 | 0.91 | | < 50 | 100 |

**Motors**

| | ID Name | X"dv or Xlr | X/R | Load Model | Motor kVA | Load Type | Load Scaling | SCADA kW | SCADA jkVar | SCADA Type | SCADA Scaling | Hrm RC Value | Hrm RC Factor | R1 pu | X1 pu | Int MF | Hrm R1 pu | Hrm X1 pu |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | M BH | 16.7 | 3.71225 | Spec | 29.9919 | kVA | 100 | 0 | 0 | kVA | 100 | 0.5 | R-EXP | 223.620 | 830.136 | 10000 | 133.904 | 497.087 |
| 2 | M CA | 16.7 | 3.28834 | Spec | 24.9933 | kVA | 100 | 0 | 0 | kVA | 100 | 0.5 | R-EXP | 56.3642 | 185.344 | 10000 | 33.7510 | 110.984 |
| 3 | M ELEV 360 | 16.7 | 4.55842 | Spec | 39.9892 | kVA | 100 | 0 | 0 | kVA | 100 | 0.5 | R-EXP | 25.9445 | 118.266 | 10000 | 15.5356 | 70.8180 |

**Motors**

| | ID Name | I Hrm Rating | TCC Starter | Plot TCC | Service Factor | Locked Rotor Mult | Asym Offset | Reduced Inrush Mult | Accel Time | Stall Time | Stall Time To | Largest Motor HP | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | M BH | 83.2493 | Full Volt | | 1 | 6 | 1.6 | 100 | 5 | 6 | 200 | 30 | |
| 2 | M CA | 30.0622 | Full Volt | | 1 | 6 | 1.6 | 100 | 5 | 6 | 200 | 25 | |
| 3 | M ELEV 360 | 48.0996 | Full Volt | | 1 | 6 | 1.6 | 100 | 5 | 6 | 200 | 40 | |

**2W-Xformers**

| | ID Name | Status | From bus | From Base kV | From Conn | To Bus | To Base kV | To Conn | Type | Class | Temp | Form | From Nom kV | From Tap kV | From Gnd R | From Gnd jX | To Nom kV |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | T3DP1 | On | T3DP1 H | 0.48 | D | T3DP1 L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 2 | T3DP2 | On | T3DP2 H | 0.48 | D | T3DP2 L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 3 | T3LDPA | On | T3LDPA H | 0.48 | D | T3LDPA L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 4 | T3LDPB | On | T3LDPB H | 0.48 | D | T3LDPB L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 5 | T4DP1 | On | T4DP1 H | 0.48 | D | T4DP1 L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 6 | T4LDPA | On | T4LDPA H | 0.48 | D | T4LDPA L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 7 | T4LDPB | On | T4LDPB H | 0.48 | D | T4LDPB L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 8 | T8LDPA | On | T8LDPA H | 0.48 | D | T8LDPA L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 9 | T8LDPB | On | T8LDPB H | 0.48 | D | T8LDPB L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 10 | TX NPC | Off | TX NPC H | 12.47 | D | TX NPC L | 0.48 | YG | Oil | OA | 65/80 | Core | 12.47 | 12.47 | 0 | 0 | 0.48 |

**2W-Xformers**

| | ID Name | To Tap kV | To Gnd R | To Gnd jX | MVA | MVA O/L | Z | Z0 | X/R | LTC Tap | LTC Step | LTC Min Tap | LTC Max Tap | Ctl Type | Ctl Value | Zps R1 pu | Zps X1 pu | Zps R0 pu | Zps X0 pu |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | T3DP1 | 0.208 | 0 | 0 | 0.075 | 0.075 | 5 | 4.25 | 1.75974 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 32.9376 | 57.9616 | 10000 | 1e+007 |
| 2 | T3DP2 | 0.208 | 0 | 0 | 0.075 | 0.075 | 5 | 4.25 | 1.75974 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 32.9376 | 57.9616 | 10000 | 1e+007 |
| 3 | T3LDPA | 0.208 | 0 | 0 | 0.1125 | 0.1125 | 5 | 4.25 | 1.88578 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 20.8217 | 39.2652 | 10000 | 1e+007 |
| 4 | T3LDPB | 0.208 | 0 | 0 | 0.225 | 0.225 | 5 | 4.25 | 3.15937 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 6.70585 | 21.1862 | 10000 | 1e+007 |
| 5 | T4DP1 | 0.208 | 0 | 0 | 0.075 | 0.075 | 5 | 4.25 | 1.75974 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 32.9376 | 57.9616 | 10000 | 1e+007 |
| 6 | T4LDPA | 0.208 | 0 | 0 | 0.5 | 0.5 | 5 | 4.25 | 4.60511 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 2.12204 | 9.77225 | 10000 | 1e+007 |
| 7 | T4LDPB | 0.208 | 0 | 0 | 0.225 | 0.225 | 5 | 4.25 | 3.15937 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 6.70585 | 21.1862 | 10000 | 1e+007 |
| 8 | T8LDPA | 0.208 | 0 | 0 | 0.1125 | 0.1125 | 5 | 4.25 | 1.88578 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 20.8217 | 39.2652 | 10000 | 1e+007 |
| 9 | T8LDPB | 0.208 | 0 | 0 | 0.1125 | 0.1125 | 5 | 4.25 | 1.88578 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 20.8217 | 39.2652 | 10000 | 1e+007 |
| 10 | TX NPC | 0.48 | 0 | 0 | 2.5 | 2.5 | 5.31 | 4.5135 | 7.12772 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 0.29510 | 2.1034 | 10000 | 1e+007 |

**2W-Xformers**

| | ID Name | Rps0+3Rpsg | Xps0+3Xpsg | From Gnd R1 pu | From Gnd jX pu | To Gnd R1 pu | To Gnd jX pu | TCC Standard | TCC FLA Based On | Freq Fault Curve | TCC Max Plot Time | TCC Inrush FLA Mult | TCC Inrush Cycles | Hrm RC Factor | Hrm RC Value |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | T3DP1 | 27.99699 | 49.26742 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 2 | T3DP2 | 27.99699 | 49.26742 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 3 | T3LDPA | 17.69851 | 33.37549 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 4 | T3LDPB | 5.699978 | 18.00834 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 5 | T4DP1 | 27.99699 | 49.26742 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 6 | T4LDPA | 1.803738 | 8.306415 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 7 | T4LDPB | 5.699978 | 18.00834 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 8 | T8LDPA | 17.69851 | 33.37549 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 9 | T8LDPB | 17.69851 | 33.37549 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 10 | TX NPC | 0.2508362 | 1.78789 | 0 | 0 | 0 | 0 | ANSI C57.109 | MVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |

**2W-Xformers**

| | ID Name | Hrm Pec-r % | Hrm From I Rating | Hrm To I Rating | Comment |
|---|---|---|---|---|---|
| 1 | T3DP1 | 15 | 90.2109 | 208.179 | Based PS e-Saver Tx |
| 2 | T3DP2 | 15 | 90.2109 | 208.179 | Based PS e-Saver Tx |
| 3 | T3LDPA | 15 | 135.316 | 312.268 | Based PS e-Saver Tx |
| 4 | T3LDPB | 15 | 270.633 | 624.537 | Based PS e-Saver Tx |
| 5 | T4DP1 | 15 | 90.2109 | 208.179 | Based PS e-Saver Tx |
| 6 | T4LDPA | 15 | 601.406 | 1387.86 | Based PS e-Saver Tx |
| 7 | T4LDPB | 15 | 270.633 | 624.537 | Based PS e-Saver Tx |
| 8 | T8LDPA | 15 | 135.316 | 312.268 | Based PS e-Saver Tx |
| 9 | T8LDPB | 15 | 135.316 | 312.268 | Based PS e-Saver Tx |
| 10 | TX NPC | 15 | 115.747 | 3007.03 | |

**Cables**

| | ID Name | Status | From Bus ID | From Base kV | To Bus ID | To Base kV | Unit | Type | No/Ph | Size | Length | Temp | Insulation | Rating (A) | Material |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | C 3DP1 | On | T3DP1 L | 0.208 | 3DP1 | 0.208 | U.S. | 1/C | 1 | 350 | 10 | 50 | THWN | 310 | Copper |
| 2 | C 3DP2 | On | T3DP2 L | 0.208 | 3DP2 | 0.208 | U.S. | 1/C | 1 | 350 | 10 | 50 | THWN | 310 | Copper |
| 3 | C 3HA1A | On | 3HDPA | 0.48 | 3HA1A | 0.48 | U.S. | 1/C | 1 | 4/0 | 15 | 50 | THWN | 230 | Copper |
| 4 | C 3HAIB | On | 3HDPA | 0.48 | 3HAIB | 0.48 | U.S. | 1/C | 1 | 500 | 15 | 50 | THWN | 380 | Copper |
| 5 | C 3HAIC | On | 3HDPA | 0.48 | 3HAIC | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 6 | C 3HAID | On | 3HDPA | 0.48 | 3HAID | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 7 | C 3HDPA | On | MSA | 0.48 | 3HDPA | 0.48 | U.S. | 1/C | 5 | 500 | 350 | 50 | THWN | 1900 | Copper |
| 8 | C 3LA1A | On | 3LDPA | 0.208 | 3LA1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 9 | C 3LAC1A | On | 3LDPA | 0.208 | 3LAC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 10 | C 3LAC1B | On | 3LDPA | 0.208 | 3LAC1B | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 11 | C 3LB1A | On | 3LDPB | 0.208 | 3LB1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 12 | C 3LBC1A | On | 3LDPB | 0.208 | 3LBC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 13 | C 3LBC1B | On | 3LDPB | 0.208 | 3LBC1B | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 14 | C 3LBC1C | On | 3LDPB | 0.208 | 3LBC1C | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 15 | C 3LDPA | On | T3LDPA L | 0.208 | 3LDPA | 0.208 | U.S. | 1/C | 1 | 500 | 10 | 50 | THWN | 380 | Copper |
| 16 | C 3LDPB | On | T3LDPB L | 0.208 | 3LDPB | 0.208 | U.S. | 1/C | 2 | 500 | 10 | 50 | THWN | 760 | Copper |
| 17 | C 4DP1 | On | T4DP1 L | 0.208 | 4DP1 | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 18 | C 4HAIA | On | MSA | 0.48 | 4HAIA | 0.48 | U.S. | 1/C | 1 | 500 | 20 | 50 | THWN | 380 | Copper |
| 19 | C 4HAIB | On | MSA | 0.48 | 4HAIB | 0.48 | U.S. | 1/C | 1 | 500 | 20 | 50 | THWN | 380 | Copper |
| 20 | C 4HAIC | On | MSA | 0.48 | 4HAIC | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 21 | C 4HAID | On | MSA | 0.48 | 4HAID | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 22 | C 4LAIKA | On | 4LDPA | 0.208 | 4LAIKA | 0.208 | U.S. | 1/C | 1 | 4/0 | 85 | 50 | THWN | 230 | Copper |
| 23 | C 4LAIKB | On | 4LDPA | 0.208 | 4LAIKB | 0.208 | U.S. | 1/C | 1 | 4/0 | 85 | 50 | THWN | 230 | Copper |
| 24 | C 4LAIKC | On | 4LDPA | 0.208 | 4LAIKC | 0.208 | U.S. | 1/C | 1 | 4/0 | 85 | 50 | THWN | 230 | Copper |
| 25 | C 4LAIKD | On | 4LDPA | 0.208 | 4LAIKD | 0.208 | U.S. | 1/C | 1 | 4/0 | 85 | 50 | THWN | 230 | Copper |
| 26 | C 4LAIKE | On | 4LDPA | 0.208 | 4LAIKE | 0.208 | U.S. | 1/C | 1 | 2 | 210 | 50 | THWN | 115 | Copper |
| 27 | C 4LAIKF | On | 4LDPA | 0.208 | 4LAIKF | 0.208 | U.S. | 1/C | 1 | 2 | 190 | 50 | THWN | 115 | Copper |
| 28 | C 4LBCIA | On | 4LDPB | 0.208 | 4LBCIA | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 29 | C 4LBIA | On | 4LDPB | 0.208 | 4LBIA | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 30 | C 4LBIB | On | 4LDPB | 0.208 | 4LBIB | 0.208 | U.S. | 1/C | 1 | 4/0 | 95 | 50 | THWN | 230 | Copper |
| 31 | C 4LBIC | On | 4LDPB | 0.208 | 4LBIC | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 32 | C 4LDPA | On | T4LDPA L | 0.208 | 4LDPA | 0.208 | U.S. | 1/C | 5 | 500 | 10 | 50 | THWN | 1900 | Copper |
| 33 | C 4LDPB | On | T4LDPB L | 0.208 | 4LDPB | 0.208 | U.S. | 1/C | 2 | 500 | 10 | 50 | THWN | 760 | Copper |
| 34 | C 8HA2A | On | 3HDPA | 0.48 | 8HA2A | 0.48 | U.S. | 1/C | 1 | 500 | 50 | 50 | THWN | 380 | Copper |
| 35 | C 8HA2B | On | 3HDPA | 0.48 | 8HA2B | 0.48 | U.S. | 1/C | 1 | 4/0 | 50 | 50 | THWN | 230 | Copper |
| 36 | C 8LA2A | On | 8LDPA | 0.208 | 8LA2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 25 | 50 | THWN | 230 | Copper |
| 37 | C 8LAC2A | On | 8LDPA | 0.208 | 8LAC2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 15 | 50 | THWN | 230 | Copper |
| 38 | C 8LAC2B | On | 8LDPA | 0.208 | 8LAC2B | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 39 | C 8LB2A | On | 8LDPB | 0.208 | 8LB2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 25 | 50 | THWN | 230 | Copper |
| 40 | C 8LBC2A | On | 8LDPB | 0.208 | 8LBC2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 15 | 50 | THWN | 230 | Copper |
| 41 | C 8LBC2B | On | 8LDPB | 0.208 | 8LBC2B | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 42 | C 8LDPA | On | T8LDPA L | 0.208 | 8LDPA | 0.208 | U.S. | 1/C | 1 | 500 | 15 | 50 | THWN | 380 | Copper |
| 43 | C 8LDPB | On | T8LDPB L | 0.208 | 8LDPB | 0.208 | U.S. | 1/C | 1 | 500 | 15 | 50 | THWN | 380 | Copper |
| 44 | C BH | On | 4LDPA | 0.208 | BH | 0.208 | U.S. | 1/C | 1 | 1 | 75 | 50 | THWN | 130 | Copper |
| 45 | C CA | On | 3HDPA | 0.48 | CA | 0.48 | U.S. | 1/C | 1 | 4 | 100 | 50 | THWN | 85 | Copper |
| 46 | C ELEV | On | 3HDPA | 0.48 | ELEV | 0.48 | U.S. | 1/C | 1 | 6 | 40 | 50 | THWN | 65 | Copper |
| 47 | C MDA | On | TX NPC L | 0.48 | MDA | 0.48 | U.S. | 1/C | 11 | 500 | 25 | 50 | THWN | 4180 | Copper |
| 48 | C MSA | On | MDA | 0.48 | MSA | 0.48 | U.S. | 1/C | 11 | 500 | 10 | 50 | THWN | 4180 | Copper |
| 49 | C T3DP1 | On | 3HA1A | 0.48 | T3DP1 H | 0.48 | U.S. | 1/C | 1 | 350 | 70 | 50 | THWN | 310 | Copper |
| 50 | C T3DP2 | On | 3HA1A | 0.48 | T3DP2 H | 0.48 | U.S. | 1/C | 1 | 350 | 170 | 50 | THWN | 310 | Copper |
| 51 | C T3LDPA | On | 3HDPA | 0.48 | T3LDPA H | 0.48 | U.S. | 1/C | 1 | 2/0 | 10 | 50 | THWN | 175 | Copper |
| 52 | C T3LDPB | On | 3HDPA | 0.48 | T3LDPB H | 0.48 | U.S. | 1/C | 1 | 500 | 140 | 50 | THWN | 380 | Copper |
| 53 | C T4DP1 | On | 4HAIA | 0.48 | T4DP1 H | 0.48 | U.S. | 1/C | 1 | 1 | 15 | 50 | THWN | 130 | Copper |
| 54 | C T4LDPA | On | MSA | 0.48 | T4LDPA H | 0.48 | U.S. | 1/C | 3 | 500 | 15 | 50 | THWN | 1140 | Copper |
| 55 | C T4LDPB | On | MSA | 0.48 | T4LDPB H | 0.48 | U.S. | 1/C | 1 | 500 | 15 | 50 | THWN | 380 | Copper |
| 56 | C T8LDPA | On | 3HDPA | 0.48 | T8LDPA H | 0.48 | U.S. | 1/C | 1 | 2/0 | 50 | 50 | THWN | 175 | Copper |
| 57 | C T8LDPB | On | 3HDPA | 0.48 | T8LDPB H | 0.48 | U.S. | 1/C | 1 | 2/0 | 175 | 50 | THWN | 175 | Copper |
| 58 | C-1 | On | 3LBC1A | 0.208 | BUS-1 | 0.208 | U.S. | 1/C | 1 | 12 | 10 | 50 | THWN | 25 | Copper |

**Cables**

| | ID Name | Raceway Type | Raceway Mtl | R1 | X1 | R0 | X0 | Xc | Xc0 | Gnd Num | Gnd Size | Gnd Mtl | Gnd Type | Gnd Insul | Neutral Num | Neutral Size | Neutral Rating |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | C 3DP1 | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 0 | 4/0 | Copper | Separate | Yes | 0 | Other | 10 |
| 2 | C 3DP2 | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 0 | 4/0 | Copper | Separate | Yes | 0 | Other | 10 |
| 3 | C 3HA1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 4 | C 3HAIB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 1 | 500 | 10 |
| 5 | C 3HAIC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 6 | C 3HAID | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 7 | C 3HDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 5 | 4/0 | Copper | Separate | Yes | 5 | 500 | 10 |
| 8 | C 3LA1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 9 | C 3LAC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 10 | C 3LAC1B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 11 | C 3LB1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 12 | C 3LBC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 13 | C 3LBC1B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 14 | C 3LBC1C | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 15 | C 3LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 2 | 500 | 10 |
| 16 | C 3LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 2 | 1/0 | Copper | Separate | Yes | 4 | 500 | 10 |
| 17 | C 4DP1 | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 18 | C 4HAIA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 1 | 500 | 10 |
| 19 | C 4HAIB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 1 | 500 | 10 |
| 20 | C 4HAIC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 21 | C 4HAID | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 22 | C 4LAIKA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 23 | C 4LAIKB | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 24 | C 4LAIKC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 25 | C 4LAIKD | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 26 | C 4LAIKE | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 27 | C 4LAIKF | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 28 | C 4LBCIA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 29 | C 4LBIA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 30 | C 4LBIB | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 31 | C 4LBIC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 32 | C 4LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 5 | 4/0 | Copper | Separate | Yes | 5 | 500 | 10 |
| 33 | C 4LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 2 | 1/0 | Copper | Separate | Yes | 4 | 500 | 10 |
| 34 | C 8HA2A | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 1 | 500 | 10 |
| 35 | C 8HA2B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 36 | C 8LA2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 37 | C 8LAC2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 38 | C 8LAC2B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 39 | C 8LB2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 40 | C 8LBC2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 41 | C 8LBC2B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 42 | C 8LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 2 | 500 | 10 |
| 43 | C 8LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 2 | 500 | 10 |
| 44 | C BH | Conduit | Steel | 0.14127 | 0.04157 | 0.56509 | 0.16629 | 0.00723 | 0.00723 | 1 | 6 | Copper | Separate | Yes | 1 | 1 | 10 |
| 45 | C CA | Conduit | Steel | 0.28320 | 0.04271 | 1.13283 | 0.17084 | 0.00814 | 0.00814 | 1 | 8 | Copper | Separate | Yes | 1 | 4 | 10 |
| 46 | C ELEV | Conduit | Steel | 0.45045 | 0.04222 | 1.80182 | 0.16890 | 0.00776 | 0.00776 | 1 | 10 | Copper | Separate | Yes | 1 | 6 | 10 |
| 47 | C MDA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 11 | 500 | Copper | Separate | Yes | 11 | 500 | 10 |
| 48 | C MSA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 11 | 500 | Copper | Separate | Yes | 11 | 500 | 10 |
| 49 | C T3DP1 | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 0 | 4/0 | Copper | Separate | Yes | 0 | Other | 10 |
| 50 | C T3DP2 | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 0 | 4/0 | Copper | Separate | Yes | 0 | Other | 10 |
| 51 | C T3LDPA | Conduit | Steel | 0.08883 | 0.03987 | 0.35532 | 0.15950 | 0.00588 | 0.00588 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 52 | C T3LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 0 | Other | 10 |
| 53 | C T4DP1 | Conduit | Steel | 0.14127 | 0.04157 | 0.56509 | 0.16629 | 0.00723 | 0.00723 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 54 | C T4LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 2 | 1/0 | Copper | Separate | Yes | 0 | Other | 10 |
| 55 | C T4LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 0 | Other | 10 |
| 56 | C T8LDPA | Conduit | Steel | 0.08883 | 0.03987 | 0.35532 | 0.15950 | 0.00588 | 0.00588 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 57 | C T8LDPB | Conduit | Steel | 0.08883 | 0.03987 | 0.35532 | 0.15950 | 0.00588 | 0.00588 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 58 | C-1 | Conduit | Steel | 1.81903 | 0.06737 | 7.27612 | 0.26948 | 0.00776 | 0.00776 | 1 | 4/0 | Copper | Separate | Yes | 1 | Other | 10 |

**Cables**

| | ID Name | Neutral Mtl | Neutral Insul | Conductor Lay | Conductor Form | Spacing | R1 pu | X1 pu | R0 pu | X0 pu | B1 pu | B0 pu | Hrm RC Factor | Hrm RC Value | I Hrm Rating | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | C 3DP1 | Copper | Yes | Triangle | Round | 0 | 0.82416 | 0.88044 | 3.29666 | 3.52177 | 9.69440 | 9.69440 | R-EXP | 0.5 | 310 | |
| 2 | C 3DP2 | Copper | Yes | Triangle | Round | 0 | 0.82416 | 0.88044 | 3.29666 | 3.52177 | 9.69440 | 9.69440 | R-EXP | 0.5 | 310 | |
| 3 | C 3HA1A | Copper | Yes | Triangle | Round | 0 | 0.36376 | 0.25049 | 1.45505 | 1.00197 | 7.24642 | 7.24642 | R-EXP | 0.5 | 230 | |
| 4 | C 3HAIB | Copper | Yes | Triangle | Round | 0 | 0.17014 | 0.24246 | 0.68059 | 0.96985 | 9.12916 | 9.12916 | R-EXP | 0.5 | 380 | |
| 5 | C 3HAIC | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 6 | C 3HAID | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 7 | C 3HDPA | Copper | Yes | Triangle | Round | 0 | 0.79402 | 1.1315 | 3.17609 | 4.52599 | 1.06506 | 1.06506 | R-EXP | 0.5 | 1900 | |
| 8 | C 3LA1A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 9 | C 3LAC1A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 10 | C 3LAC1B | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 11 | C 3LB1A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 12 | C 3LBC1A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 13 | C 3LBC1B | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 14 | C 3LBC1C | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 15 | C 3LDPA | Copper | Yes | Triangle | Round | 0 | 0.60407 | 0.86081 | 2.41630 | 3.44327 | 1.14283 | 1.14283 | R-EXP | 0.5 | 380 | |
| 16 | C 3LDPB | Copper | Yes | Triangle | Round | 0 | 0.30203 | 0.43040 | 1.20815 | 1.72163 | 2.28567 | 2.28567 | R-EXP | 0.5 | 760 | |
| 17 | C 4DP1 | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 18 | C 4HAIA | Copper | Yes | Triangle | Round | 0 | 0.22686 | 0.32328 | 0.90745 | 1.29314 | 1.21722 | 1.21722 | R-EXP | 0.5 | 380 | |
| 19 | C 4HAIB | Copper | Yes | Triangle | Round | 0 | 0.22686 | 0.32328 | 0.90745 | 1.29314 | 1.21722 | 1.21722 | R-EXP | 0.5 | 380 | |
| 20 | C 4HAIC | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 21 | C 4HAID | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 22 | C 4LAIKA | Copper | Yes | Triangle | Round | 0 | 10.9774 | 7.55929 | 43.9098 | 30.2372 | 7.71073 | 7.71073 | R-EXP | 0.5 | 230 | |
| 23 | C 4LAIKB | Copper | Yes | Triangle | Round | 0 | 10.9774 | 7.55929 | 43.9098 | 30.2372 | 7.71073 | 7.71073 | R-EXP | 0.5 | 230 | |
| 24 | C 4LAIKC | Copper | Yes | Triangle | Round | 0 | 10.9774 | 7.55929 | 43.9098 | 30.2372 | 7.71073 | 7.71073 | R-EXP | 0.5 | 230 | |
| 25 | C 4LAIKD | Copper | Yes | Triangle | Round | 0 | 10.9774 | 7.55929 | 43.9098 | 30.2372 | 7.71073 | 7.71073 | R-EXP | 0.5 | 230 | |
| 26 | C 4LAIKE | Copper | Yes | Triangle | Round | 0 | 86.5017 | 19.8256 | 346.005 | 79.3023 | 1.36454 | 1.36454 | R-EXP | 0.5 | 115 | |
| 27 | C 4LAIKF | Copper | Yes | Triangle | Round | 0 | 78.2634 | 17.9374 | 313.052 | 71.7497 | 1.23459 | 1.23459 | R-EXP | 0.5 | 115 | |
| 28 | C 4LBCIA | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 29 | C 4LBIA | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 30 | C 4LBIB | Copper | Yes | Triangle | Round | 0 | 12.2689 | 8.44861 | 49.0757 | 33.7945 | 8.61787 | 8.61787 | R-EXP | 0.5 | 230 | |
| 31 | C 4LBIC | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 32 | C 4LDPA | Copper | Yes | Triangle | Round | 0 | 0.12081 | 0.17216 | 0.48326 | 0.68865 | 5.71418 | 5.71418 | R-EXP | 0.5 | 1900 | |
| 33 | C 4LDPB | Copper | Yes | Triangle | Round | 0 | 0.30203 | 0.43040 | 1.20815 | 1.72163 | 2.28567 | 2.28567 | R-EXP | 0.5 | 760 | |
| 34 | C 8HA2A | Copper | Yes | Triangle | Round | 0 | 0.56716 | 0.80821 | 2.26864 | 3.23285 | 3.04305 | 3.04305 | R-EXP | 0.5 | 380 | |
| 35 | C 8HA2B | Copper | Yes | Triangle | Round | 0 | 1.21254 | 0.83498 | 4.85017 | 3.33993 | 2.41547 | 2.41547 | R-EXP | 0.5 | 230 | |
| 36 | C 8LA2A | Copper | Yes | Triangle | Round | 0 | 3.22867 | 2.22332 | 12.9146 | 8.89330 | 2.26786 | 2.26786 | R-EXP | 0.5 | 230 | |
| 37 | C 8LAC2A | Copper | Yes | Triangle | Round | 0 | 1.93720 | 1.33399 | 7.74879 | 5.33598 | 1.36071 | 1.36071 | R-EXP | 0.5 | 230 | |
| 38 | C 8LAC2B | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 39 | C 8LB2A | Copper | Yes | Triangle | Round | 0 | 3.22867 | 2.22332 | 12.9146 | 8.89330 | 2.26786 | 2.26786 | R-EXP | 0.5 | 230 | |
| 40 | C 8LBC2A | Copper | Yes | Triangle | Round | 0 | 1.93720 | 1.33399 | 7.74879 | 5.33598 | 1.36071 | 1.36071 | R-EXP | 0.5 | 230 | |
| 41 | C 8LBC2B | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 42 | C 8LDPA | Copper | Yes | Triangle | Round | 0 | 0.90611 | 1.29122 | 3.62445 | 5.16491 | 1.71425 | 1.71425 | R-EXP | 0.5 | 380 | |
| 43 | C 8LDPB | Copper | Yes | Triangle | Round | 0 | 0.90611 | 1.29122 | 3.62445 | 5.16491 | 1.71425 | 1.71425 | R-EXP | 0.5 | 380 | |
| 44 | C BH | Copper | Yes | Triangle | Round | 0 | 24.4904 | 7.20701 | 97.9621 | 28.8279 | 4.48189 | 4.48189 | R-EXP | 0.5 | 130 | |
| 45 | C CA | Copper | Yes | Triangle | Round | 0 | 12.2919 | 1.85377 | 49.1679 | 7.41506 | 2.82819 | 2.82819 | R-EXP | 0.5 | 85 | |
| 46 | C ELEV | Copper | Yes | Triangle | Round | 0 | 7.82041 | 0.73310 | 31.2816 | 2.93243 | 1.18752 | 1.18752 | R-EXP | 0.5 | 65 | |
| 47 | C MDA | Copper | Yes | Triangle | Round | 0 | 0.02578 | 0.03673 | 0.10312 | 0.14694 | 1.67368 | 1.67368 | R-EXP | 0.5 | 4180 | |
| 48 | C MSA | Copper | Yes | Triangle | Round | 0 | 0.01031 | 0.01469 | 0.04124 | 0.05877 | 6.69471 | 6.69471 | R-EXP | 0.5 | 4180 | |
| 49 | C T3DP1 | Copper | Yes | Triangle | Round | 0 | 1.08332 | 1.15729 | 4.33328 | 4.62917 | 3.61389 | 3.61389 | R-EXP | 0.5 | 310 | |
| 50 | C T3DP2 | Copper | Yes | Triangle | Round | 0 | 2.63092 | 2.81057 | 10.5236 | 11.2422 | 8.77659 | 8.77659 | R-EXP | 0.5 | 310 | |
| 51 | C T3LDPA | Copper | Yes | Triangle | Round | 0 | 0.38555 | 0.17307 | 1.54220 | 0.69228 | 3.91481 | 3.91481 | R-EXP | 0.5 | 175 | |
| 52 | C T3LDPB | Copper | Yes | Triangle | Round | 0 | 1.58805 | 2.26299 | 6.35219 | 9.05199 | 8.52055 | 8.52055 | R-EXP | 0.5 | 380 | |
| 53 | C T4DP1 | Copper | Yes | Triangle | Round | 0 | 0.91975 | 0.27066 | 3.67902 | 1.08265 | 4.77361 | 4.77361 | R-EXP | 0.5 | 130 | |
| 54 | C T4LDPA | Copper | Yes | Triangle | Round | 0 | 0.05671 | 0.08082 | 0.22686 | 0.32328 | 2.73874 | 2.73874 | R-EXP | 0.5 | 1140 | |
| 55 | C T4LDPB | Copper | Yes | Triangle | Round | 0 | 0.17014 | 0.24246 | 0.68059 | 0.96985 | 9.12916 | 9.12916 | R-EXP | 0.5 | 380 | |
| 56 | C T8LDPA | Copper | Yes | Triangle | Round | 0 | 1.92775 | 0.86535 | 7.71100 | 3.46141 | 1.95740 | 1.95740 | R-EXP | 0.5 | 175 | |
| 57 | C T8LDPB | Copper | Yes | Triangle | Round | 0 | 6.74713 | 3.02873 | 26.9885 | 12.1149 | 6.85092 | 6.85092 | R-EXP | 0.5 | 175 | |
| 58 | C-1 | Copper | Yes | Triangle | Round | 0 | 42.0448 | 1.55721 | 168.179 | 6.22887 | 5.57479 | 5.57479 | R-EXP | 0.5 | 25 | |

**LV Breakers**

| | ID Name | Status | On Bus | Base kV | Conn Type | Class | Options | Breaker Mfr | Breaker Type | Breaker Style | Cont Current (A) | SC Int kA | SC Test Std |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 3HA1A | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 2 | B 3HA1A-FDR | On | 3HA1A | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 3 | B 3HAIB | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 400 | 65 | ANSI-SYM |
| 4 | B 3HAIB-FDR | On | 3HAIB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 5 | B 3HAIC | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 6 | B 3HAIC-FDR | On | 3HAIC | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 7 | B 3HAID | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 8 | B 3HAID-FDR | On | 3HAID | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 9 | B 3HDPA | On | MSA | 0.48 | Feeder | ICCB | Breaker Onl | GE | Power Break II | SS-16 | 1600 | 65 | ANSI-SYM |
| 10 | B 3HDPA-MAIN | On | 3HDPA | 0.48 | Feeder | ICCB | Breaker Onl | GE | Power Break II | SS-16 | 1600 | 65 | ANSI-SYM |
| 11 | B 3LA1A | On | 3LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 12 | B 3LA1A-FDR | On | 3LA1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 13 | B 3LAC1A | On | 3LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 14 | B 3LAC1A-FDR | On | 3LAC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 15 | B 3LAC1B | On | 3LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 16 | B 3LAC1B-FDR | On | 3LAC1B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 17 | B 3LB1A | On | 3LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 18 | B 3LB1A-FDR | On | 3LB1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 0 | 10 | ANSI-SYM |
| 19 | B 3LBC1A | On | 3LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 20 | B 3LBC1A-FDR | On | 3LBC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 0 | 10 | ANSI-SYM |
| 21 | B 3LBC1B | On | 3LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 22 | B 3LBC1B-FDR | On | 3LBC1B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 0 | 10 | ANSI-SYM |
| 23 | B 3LBC1C | On | 3LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 24 | B 3LBC1C-FDR | On | 3LBC1C | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 0 | 10 | ANSI-SYM |
| 25 | B 3LDPA-FDR | On | 3LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 65 | ANSI-SYM |
| 26 | B 3LDPA-MAIN | On | 3LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGD | 400 | 65 | ANSI-SYM |
| 27 | B 3LDPB-FDR | On | 3LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 65 | ANSI-SYM |
| 28 | B 3LDPB-MAIN | On | 3LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKH8 | 800 | 65 | ANSI-SYM |
| 29 | B 4HAIA | On | MSA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 400 | 65 | ANSI-SYM |
| 30 | B 4HAIA-FDR | On | 4HAIA | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 31 | B 4HAIB | On | MSA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 400 | 65 | ANSI-SYM |
| 32 | B 4HAIB-FDR | On | 4HAIB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 20 | 65 | ANSI-SYM |
| 33 | B 4HAIC | On | MSA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 34 | B 4HAIC-FDR | On | 4HAIC | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 35 | B 4HAID | On | MSA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 36 | B 4HAID-FDR | On | 4HAID | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 37 | B 4LAIKA | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 38 | B 4LAIKA-FDR | On | 4LAIKA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 15 | 22 | ANSI-SYM |
| 39 | B 4LAIKB | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 40 | B 4LAIKB-FDR | On | 4LAIKB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 15 | 22 | ANSI-SYM |
| 41 | B 4LAIKC | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 42 | B 4LAIKC-FDR | On | 4LAIKC | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 43 | B 4LAIKD | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 65 | ANSI-SYM |
| 44 | B 4LAIKD-FDR | On | 4LAIKD | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 45 | B 4LAIKE | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 65 | ANSI-SYM |
| 46 | B 4LAIKE-FDR | On | 4LAIKE | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 47 | B 4LAIKF | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 65 | ANSI-SYM |
| 48 | B 4LAIKF-FDR | On | 4LAIKF | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 49 | B 4LBCIA | On | 4LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 50 | B 4LBCIA-FDR | On | 4LBCIA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 51 | B 4LBIA | On | 4LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 52 | B 4LBIA-FDR | On | 4LBIA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 53 | B 4LBIB | On | 4LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 54 | B 4LBIB-FDR | On | 4LBIB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 55 | B 4LBIB-MAIN | On | 4LBIB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 56 | B 4LBIC | On | 4LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 57 | B 4LBIC-FDR | On | 4LBIC | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 58 | B 4LDPA-MAIN | On | 4LDPA | 0.208 | Feeder | ICCB | Breaker Onl | GE | Power Break II | SS-16 | 1600 | 65 | ANSI-SYM |
| 59 | B 4LDPB-MAIN | On | 4LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKH8 | 800 | 65 | ANSI-SYM |
| 60 | B 8HA2A | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 400 | 65 | ANSI-SYM |
| 61 | B 8HA2A-FDR | On | 8HA2A | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 20 | 65 | ANSI-SYM |
| 62 | B 8HA2B | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 63 | B 8HA2B-FDR | On | 8HA2B | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 64 | B 8LA2A | On | 8LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 65 | B 8LA2A-FDR | On | 8LA2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 66 | B 8LAC2A | On | 8LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 67 | B 8LAC2A-FDR | On | 8LAC2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 68 | B 8LAC2B | On | 8LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 69 | B 8LAC2B-FDR | On | 8LAC2B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 70 | B 8LB2A | On | 8LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 71 | B 8LB2A-FDR | On | 8LB2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 72 | B 8LBC2A | On | 8LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 73 | B 8LBC2A-FDR | On | 8LBC2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 74 | B 8LBC2B | On | 8LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 75 | B 8LBC2B-FDR | On | 8LBC2B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 76 | B 8LDPA-MAIN | On | 8LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGD | 400 | 65 | ANSI-SYM |
| 77 | B 8LDPB-FDR | On | 8LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 65 | ANSI-SYM |

**LV Breakers**

| | ID Name | Normal State | Trip | Trip Mfr | Trip Type | Trip Style | Sensor/Frame | Plug/Tap/Trip | LTPU Setting | LTPU Mult | LTPU (A) | LTD Band |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 3HA1A | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 2 | B 3HA1A-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 3 | B 3HAIB | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 4 | B 3HAIB-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 5 | B 3HAIC | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 6 | B 3HAIC-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 7 | B 3HAID | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 8 | B 3HAID-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 9 | B 3HDPA | Closed | SST | GE | Power+ | ICCB | 1600 | 1600 | 1 | | 1600 | 1 |
| 10 | B 3HDPA-MAIN | Closed | SST | GE | Power+ | ICCB | 1600 | 1600 | 1 | | 1600 | 1 |
| 11 | B 3LA1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 12 | B 3LA1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 13 | B 3LAC1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 14 | B 3LAC1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 15 | B 3LAC1B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 16 | B 3LAC1B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 17 | B 3LB1A | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 18 | B 3LB1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 19 | B 3LBC1A | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 20 | B 3LBC1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 21 | B 3LBC1B | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 22 | B 3LBC1B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 23 | B 3LBC1C | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 24 | B 3LBC1C-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 25 | B 3LDPA-FDR | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 26 | B 3LDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 27 | B 3LDPB-FDR | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 28 | B 3LDPB-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 29 | B 4HAIA | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 30 | B 4HAIA-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 31 | B 4HAIB | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 32 | B 4HAIB-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (20AT) | 20 | 1 | 1 | 20 | Fixed |
| 33 | B 4HAIC | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 34 | B 4HAIC-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 35 | B 4HAID | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 36 | B 4HAID-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 37 | B 4LAIKA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 38 | B 4LAIKA-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 15 | | | | |
| 39 | B 4LAIKB | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 40 | B 4LAIKB-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 15 | | | | |
| 41 | B 4LAIKC | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 42 | B 4LAIKC-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 43 | B 4LAIKD | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 44 | B 4LAIKD-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 45 | B 4LAIKE | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 46 | B 4LAIKE-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 47 | B 4LAIKF | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 48 | B 4LAIKF-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 49 | B 4LBCIA | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 50 | B 4LBCIA-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 51 | B 4LBIA | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 52 | B 4LBIA-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 53 | B 4LBIB | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 54 | B 4LBIB-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 55 | B 4LBIB-MAIN | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 56 | B 4LBIC | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 57 | B 4LBIC-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 58 | B 4LDPA-MAIN | Closed | SST | GE | Power+ | ICCB | 1600 | 1600 | 1 | | 1600 | 1 |
| 59 | B 4LDPB-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 60 | B 8HA2A | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 61 | B 8HA2A-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (20AT) | 20 | 1 | 1 | 20 | Fixed |
| 62 | B 8HA2B | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 63 | B 8HA2B-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 64 | B 8LA2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 65 | B 8LA2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 66 | B 8LAC2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 67 | B 8LAC2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 68 | B 8LAC2B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 69 | B 8LAC2B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 70 | B 8LB2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 71 | B 8LB2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 72 | B 8LBC2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 73 | B 8LBC2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 74 | B 8LBC2B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 75 | B 8LBC2B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 76 | B 8LDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 77 | B 8LDPB-FDR | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |

**LV Breakers**

| | ID Name | STPU Setting | STPU Band | STPU I2T | STPU (A) | Inst Setting | Inst Override | Inst (A) | Gnd Pickup | Gnd Delay | Gnd I2T | Gnd (A) | Fuse Mfr | Fuse Type |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 3HA1A | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 2 | B 3HA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 3 | B 3HAIB | 4 | Fixed | In | 1200 | 4 | Pickup | 2400 | | | Out | | <None> | <None> |
| 4 | B 3HAIB-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 5 | B 3HAIC | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 6 | B 3HAIC-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 7 | B 3HAID | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 8 | B 3HAID-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 9 | B 3HDPA | | | Out | | 9 | Pickup | 14400 | | | Out | | <None> | <None> |
| 10 | B 3HDPA-MAIN | | | Out | | 9 | Pickup | 14400 | | | Out | | <None> | <None> |
| 11 | B 3LA1A | | | | | | | | | | | | <None> | <None> |
| 12 | B 3LA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 13 | B 3LAC1A | | | | | | | | | | | | <None> | <None> |
| 14 | B 3LAC1A-FDR | | | | | | | | | | | | <None> | <None> |
| 15 | B 3LAC1B | | | | | | | | | | | | <None> | <None> |
| 16 | B 3LAC1B-FDR | | | | | | | | | | | | <None> | <None> |
| 17 | B 3LB1A | 3 | Fixed | In | 562.5 | 3 | Pickup | 1080 | | | Out | | <None> | <None> |
| 18 | B 3LB1A-FDR | | | | | | | | | | | | <None> | <None> |
| 19 | B 3LBC1A | 3 | Fixed | In | 562.5 | 3 | Pickup | 1080 | | | Out | | <None> | <None> |
| 20 | B 3LBC1A-FDR | | | | | | | | | | | | <None> | <None> |
| 21 | B 3LBC1B | 3 | Fixed | In | 562.5 | 3 | Pickup | 1080 | | | Out | | <None> | <None> |
| 22 | B 3LBC1B-FDR | | | | | | | | | | | | <None> | <None> |
| 23 | B 3LBC1C | 3 | Fixed | In | 562.5 | 3 | Pickup | 1080 | | | Out | | <None> | <None> |
| 24 | B 3LBC1C-FDR | | | | | | | | | | | | <None> | <None> |
| 25 | B 3LDPA-FDR | | | | | | | | | | | | <None> | <None> |
| 26 | B 3LDPA-MAIN | 4 | Fixed | In | 1200 | 4 | Pickup | 2400 | | | Out | | <None> | <None> |
| 27 | B 3LDPB-FDR | | | | | | | | | | | | <None> | <None> |
| 28 | B 3LDPB-MAIN | 4 | Fixed | In | 2400 | 4 | Pickup | 4912 | | | Out | | <None> | <None> |
| 29 | B 4HAIA | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 30 | B 4HAIA-FDR | | | | | | | | | | | | <None> | <None> |
| 31 | B 4HAIB | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 32 | B 4HAIB-FDR | Max | Fixed | In | 137 | Max | Pickup | 250 | | | Out | | <None> | <None> |
| 33 | B 4HAIC | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 34 | B 4HAIC-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 35 | B 4HAID | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 36 | B 4HAID-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 37 | B 4LAIKA | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 38 | B 4LAIKA-FDR | | | | | | | | | | | | <None> | <None> |
| 39 | B 4LAIKB | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 40 | B 4LAIKB-FDR | | | | | | | | | | | | <None> | <None> |
| 41 | B 4LAIKC | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 42 | B 4LAIKC-FDR | | | | | | | | | | | | <None> | <None> |
| 43 | B 4LAIKD | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 44 | B 4LAIKD-FDR | | | | | | | | | | | | <None> | <None> |
| 45 | B 4LAIKE | | | | | | | | | | | | <None> | <None> |
| 46 | B 4LAIKE-FDR | | | | | | | | | | | | <None> | <None> |
| 47 | B 4LAIKF | | | | | | | | | | | | <None> | <None> |
| 48 | B 4LAIKF-FDR | | | | | | | | | | | | <None> | <None> |
| 49 | B 4LBCIA | | | | | | | | | | | | <None> | <None> |
| 50 | B 4LBCIA-FDR | | | | | | | | | | | | <None> | <None> |
| 51 | B 4LBIA | | | | | | | | | | | | <None> | <None> |
| 52 | B 4LBIA-FDR | | | | | | | | | | | | <None> | <None> |
| 53 | B 4LBIB | | | | | | | | | | | | <None> | <None> |
| 54 | B 4LBIB-FDR | | | | | | | | | | | | <None> | <None> |
| 55 | B 4LBIB-MAIN | | | | | | | | | | | | <None> | <None> |
| 56 | B 4LBIC | | | | | | | | | | | | <None> | <None> |
| 57 | B 4LBIC-FDR | | | | | | | | | | | | <None> | <None> |
| 58 | B 4LDPA-MAIN | | | Out | | 9 | Pickup | 14400 | | | Out | | <None> | <None> |
| 59 | B 4LDPB-MAIN | 4 | Fixed | In | 2400 | 4 | Pickup | 4912 | | | Out | | <None> | <None> |
| 60 | B 8HA2A | 4 | Fixed | In | 1200 | 4 | Pickup | 2400 | | | Out | | <None> | <None> |
| 61 | B 8HA2A-FDR | Max | Fixed | In | 137 | Max | Pickup | 250 | | | Out | | <None> | <None> |
| 62 | B 8HA2B | 4 | Fixed | In | 675 | 4 | Pickup | 1350 | | | Out | | <None> | <None> |
| 63 | B 8HA2B-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 64 | B 8LA2A | | | | | | | | | | | | <None> | <None> |
| 65 | B 8LA2A-FDR | | | | | | | | | | | | <None> | <None> |
| 66 | B 8LAC2A | | | | | | | | | | | | <None> | <None> |
| 67 | B 8LAC2A-FDR | | | | | | | | | | | | <None> | <None> |
| 68 | B 8LAC2B | | | | | | | | | | | | <None> | <None> |
| 69 | B 8LAC2B-FDR | | | | | | | | | | | | <None> | <None> |
| 70 | B 8LB2A | | | | | | | | | | | | <None> | <None> |
| 71 | B 8LB2A-FDR | | | | | | | | | | | | <None> | <None> |
| 72 | B 8LBC2A | | | | | | | | | | | | <None> | <None> |
| 73 | B 8LBC2A-FDR | | | | | | | | | | | | <None> | <None> |
| 74 | B 8LBC2B | | | | | | | | | | | | <None> | <None> |
| 75 | B 8LBC2B-FDR | | | | | | | | | | | | <None> | <None> |
| 76 | B 8LDPA-MAIN | 4 | Fixed | In | 1200 | 4 | Pickup | 2400 | | | Out | | <None> | <None> |
| 77 | B 8LDPB-FDR | | | | | | | | | | | | <None> | <None> |

**LV Breakers**

| | ID Name | Fuse Style | Fuse Size | Mtr O/L Mfr | Mtr O/L Type | Mtr O/L Style | Motor FLA | Service Factor | PCC kVA Demand | PCC Isc/ILoad | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 3HA1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 2 | B 3HA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 3 | B 3HAIB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 4 | B 3HAIB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 5 | B 3HAIC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 6 | B 3HAIC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 7 | B 3HAID | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 8 | B 3HAID-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 9 | B 3HDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 10 | B 3HDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | LI |
| 11 | B 3LA1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 12 | B 3LA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 13 | B 3LAC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 14 | B 3LAC1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 15 | B 3LAC1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 16 | B 3LAC1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 17 | B 3LB1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 18 | B 3LB1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 19 | B 3LBC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 20 | B 3LBC1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 21 | B 3LBC1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 22 | B 3LBC1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 23 | B 3LBC1C | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 24 | B 3LBC1C-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 25 | B 3LDPA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 26 | B 3LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 27 | B 3LDPB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 28 | B 3LDPB-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 29 | B 4HAIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 30 | B 4HAIA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 31 | B 4HAIB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 32 | B 4HAIB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 33 | B 4HAIC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 34 | B 4HAIC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 35 | B 4HAID | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 36 | B 4HAID-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 37 | B 4LAIKA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 38 | B 4LAIKA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 39 | B 4LAIKB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 40 | B 4LAIKB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 41 | B 4LAIKC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 42 | B 4LAIKC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 43 | B 4LAIKD | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 44 | B 4LAIKD-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 45 | B 4LAIKE | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 46 | B 4LAIKE-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 47 | B 4LAIKF | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 48 | B 4LAIKF-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 49 | B 4LBCIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 50 | B 4LBCIA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 51 | B 4LBIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 52 | B 4LBIA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 53 | B 4LBIB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 54 | B 4LBIB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 55 | B 4LBIB-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 56 | B 4LBIC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 57 | B 4LBIC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 58 | B 4LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | LI |
| 59 | B 4LDPB-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 60 | B 8HA2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 61 | B 8HA2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 62 | B 8HA2B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 63 | B 8HA2B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 64 | B 8LA2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 65 | B 8LA2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 66 | B 8LAC2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 67 | B 8LAC2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 68 | B 8LAC2B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 69 | B 8LAC2B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 70 | B 8LB2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 71 | B 8LB2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 72 | B 8LBC2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 73 | B 8LBC2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 74 | B 8LBC2B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 75 | B 8LBC2B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 76 | B 8LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 77 | B 8LDPB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |

**LV Breakers**

| | ID Name | Status | On Bus | Base kV | Conn Type | Class | Options | Breaker Mfr | Breaker Type | Breaker Style | Cont Current (A) | SC Int kA | SC Test Std |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 8LDPB-MAIN | On | 8LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGD | 400 | 65 | ANSI-SYM |
| 79 | B BH | On | 4LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 125 | 65 | ANSI-SYM |
| 80 | B CA | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 70 | 65 | ANSI-SYM |
| 81 | B ELEV | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 82 | B MDA | On | MDA | 0.48 | Feeder | ICCB | Breaker Onl | GE | Power Brk | TP40 | 4000 | 100 | ANSI-SYM |
| 83 | B T3DP1 | On | 3HA1A | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 125 | 65 | ANSI-SYM |
| 84 | B T3DP2 | On | 3HA1A | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 125 | 65 | ANSI-SYM |
| 85 | B T3LDPA | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 175 | 65 | ANSI-SYM |
| 86 | B T3LDPB | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 350 | 65 | ANSI-SYM |
| 87 | B T4DP1 | On | 4HAIA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 100 | 65 | ANSI-SYM |
| 88 | B T4LDPA | On | MSA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKL8 | 800 | 65 | ANSI-SYM |
| 89 | B T4LDPB | On | MSA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 350 | 65 | ANSI-SYM |
| 90 | B T8LDPA | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 175 | 65 | ANSI-SYM |
| 91 | B T8LDPB | On | 3HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 175 | 65 | ANSI-SYM |

**LV Breakers**

| | ID Name | Normal State | Trip | Trip Mfr | Trip Type | Trip Style | Sensor/Frame | Plug/Tap/Trip | LTPU Setting | LTPU Mult | LTPU (A) | LTD Band |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 8LDPB-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 79 | B BH | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 125 | 1 | | 125 | Fixed |
| 80 | B CA | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (70AT) | 70 | 1 | 1 | 70 | Fixed |
| 81 | B ELEV | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 82 | B MDA | Closed | SST | GE | Power+ | ICCB | 4000 | 4000 | 1 | | 4000 | 1 |
| 83 | B T3DP1 | Closed | SST | GE | Spectra RMS | MCCB SE | 150A (125AT) | 125 | 1 | 1 | 125 | Fixed |
| 84 | B T3DP2 | Closed | SST | GE | Spectra RMS | MCCB SE | 150A (125AT) | 125 | 1 | 1 | 125 | Fixed |
| 85 | B T3LDPA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 175 | 1 | | 175 | Fixed |
| 86 | B T3LDPB | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 350 | 1 | 1 | 350 | Fixed |
| 87 | B T4DP1 | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (100AT) | 100 | 1 | 1 | 100 | Fixed |
| 88 | B T4LDPA | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 89 | B T4LDPB | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 350 | 1 | 1 | 350 | Fixed |
| 90 | B T8LDPA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 175 | 1 | | 175 | Fixed |
| 91 | B T8LDPB | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 175 | 1 | | 175 | Fixed |

**LV Breakers**

| | ID Name | STPU Setting | STPU Band | STPU I2T | STPU (A) | Inst Setting | Inst Override | Inst (A) | Gnd Pickup | Gnd Delay | Gnd I2T | Gnd (A) | Fuse Mfr | Fuse Type |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 8LDPB-MAIN | 4 | Fixed | In | 1200 | 4 | Pickup | 2400 | | | Out | | <None> | <None> |
| 79 | B BH | 4 | Fixed | In | 375 | 4 | Pickup | 750 | | | Out | | <None> | <None> |
| 80 | B CA | 4 | Fixed | In | 210 | 4 | Pickup | 413 | | | Out | | <None> | <None> |
| 81 | B ELEV | 4 | Fixed | In | 180 | 4 | Pickup | 354 | | | Out | | <None> | <None> |
| 82 | B MDA | | | Out | | 9 | Pickup | 36000 | 0.2 | Min | Out | 800 | <None> | <None> |
| 83 | B T3DP1 | Max | Fixed | In | 875 | Max | Pickup | 1562.5 | | | Out | | <None> | <None> |
| 84 | B T3DP2 | Max | Fixed | In | 875 | Max | Pickup | 1562.5 | | | Out | | <None> | <None> |
| 85 | B T3LDPA | 4 | Fixed | In | 525 | 4 | Pickup | 1050 | | | Out | | <None> | <None> |
| 86 | B T3LDPB | 4 | Fixed | In | 1050 | 4 | Pickup | 2100 | | | Out | | <None> | <None> |
| 87 | B T4DP1 | Max | Fixed | In | 660 | Max | Pickup | 1250 | | | Out | | <None> | <None> |
| 88 | B T4LDPA | Max | Fixed | In | 4000 | Max | Pickup | 8144 | | | Out | | <None> | <None> |
| 89 | B T4LDPB | Max | Fixed | In | 1750 | Max | Pickup | 3542 | | | Out | | <None> | <None> |
| 90 | B T8LDPA | 4 | Fixed | In | 525 | 4 | Pickup | 1050 | | | Out | | <None> | <None> |
| 91 | B T8LDPB | 4 | Fixed | In | 525 | 4 | Pickup | 1050 | | | Out | | <None> | <None> |

**LV Breakers**

| | ID Name | Fuse Style | Fuse Size | Mtr O/L Mfr | Mtr O/L Type | Mtr O/L Style | Motor FLA | Service Factor | PCC kVA Demand | PCC Isc/ILoad | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 8LDPB-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 79 | B BH | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 80 | B CA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 81 | B ELEV | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 82 | B MDA | <None> | <None> | <None> | <None> | <None> | | 1 | | | LIG with Power+ Prog |
| 83 | B T3DP1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 84 | B T3DP2 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 85 | B T3LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 86 | B T3LDPB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 87 | B T4DP1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 88 | B T4LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 89 | B T4LDPB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 90 | B T8LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 91 | B T8LDPB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |

# Equipment Duty Ratings

# Summary – Three Phase and Ground Fault

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Summary Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 3LB1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LB1A | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |
| 3LBC1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LBC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LBC1A | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |
| 3LBC1B | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LBC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LBC1B | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |
| 3LBC1C | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LBC1C-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LBC1C | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Summary Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 3LB1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LB1A | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |
| 3LBC1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LBC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LBC1A | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |
| 3LBC1B | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LBC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LBC1B | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |
| 3LBC1C | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 3LBC1C-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LBC1C | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |

# Three Phase Bolted Fault

# Equipment Duty Ratings

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3HA1A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HA1A-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 31.71( -51.2%) | | |
| B T3DP2 | GE | /SEL | ANSI-SYM | 65.00 | | 31.71( -51.2%) | | |
| B T3DP1 | GE | /SEL | ANSI-SYM | 65.00 | | 31.71( -51.2%) | | |
| 3HA1A | | / | ANSI-SYM | 42.00 | | 31.71( -24.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
3HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 32.37( -50.2%) | | |
| 3HAIB | | / | ANSI-SYM | 42.00 | | 32.37( -22.9%) | | |

**********

Equipment Duty Comparison Report For Bus:
3HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HAIC-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 30.70( -52.8%) | | |
| 3HAIC | | / | ANSI-SYM | 42.00 | | 30.70( -26.9%) | | |

**********

Equipment Duty Comparison Report For Bus:
3HAID Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HAID-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 30.70( -52.8%) | | |
| 3HAID | | / | ANSI-SYM | 42.00 | | 30.70( -26.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HDPA-MAIN | GE | /SS-16 | ANSI-SYM | 65.00 | | | 33.49( -48.5%) | | |
| B 3HA1A | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B 3HAIB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B 8HA2A | GE | /SGL4 | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B 8HA2B | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B T8LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B T8LDPB | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B T3LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B T3LDPB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B ELEV | GE | /SEL | ANSI-SYM | 65.00 | | | 34.09( -47.6%) | | |
| B CA | GE | /SEL | ANSI-SYM | 65.00 | | | 34.46( -47.0%) | | |
| B 3HAIC | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| B 3HAID | GE | /SFL | ANSI-SYM | 65.00 | | | 35.06( -46.1%) | | |
| 3HDPA | | / | ANSI-SYM | 42.00 | | | 35.06( -16.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
3LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LA1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.49( -45.1%) | | |
| 3LA1A | | / | ANSI-SYM | 10.00 | | | 5.49( -45.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
3LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LAC1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.49( -45.1%) | | |
| 3LAC1A | | / | ANSI-SYM | 10.00 | | | 5.49( -45.1%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3LAC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LAC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.49( -45.1%) | | |
| 3LAC1B | / | ANSI-SYM | 10.00 | | | 5.49( -45.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
3LB1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LB1A | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |

**********

Equipment Duty Comparison Report For Bus:
3LBC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LBC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LBC1A | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |

**********

Equipment Duty Comparison Report For Bus:
3LBC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LBC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.82( -1.8%) | | Warning |
| 3LBC1B | / | ANSI-SYM | 10.00 | | | 9.22( -7.8%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3LBC1C Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | Comments |
|---|---|---|---|---|---|---|---|---|
| B 3LBC1C-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 9.82( -1.8%) | | Warning |
| 3LBC1C | | / | ANSI-SYM | 10.00 | | 9.22( -7.8%) | | Warning |

**********

Equipment Duty Comparison Report For Bus:
3LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | Comments |
|---|---|---|---|---|---|---|---|---|
| B 3LAC1A | GE | /THQD | ANSI-SYM | 22.00 | | 5.64( -74.4%) | | |
| B 3LAC1B | GE | /THQD | ANSI-SYM | 22.00 | | 5.64( -74.4%) | | |
| B 3LA1A | GE | /THQD | ANSI-SYM | 22.00 | | 5.64( -74.4%) | | |
| B 3LDPA-FDR | GE | /TEY | ANSI-SYM | 65.00 | | 5.64( -91.3%) | | |
| B 3LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | 5.64( -91.3%) | | |
| 3LDPA | | / | ANSI-SYM | 22.00 | | 5.64( -74.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
3LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | Comments |
|---|---|---|---|---|---|---|---|---|
| B 3LBC1A | GE | /SFH | ANSI-SYM | 65.00 | | 9.63( -85.2%) | | |
| B 3LBC1B | GE | /SFH | ANSI-SYM | 65.00 | | 9.63( -85.2%) | | |
| B 3LBC1C | GE | /SFH | ANSI-SYM | 65.00 | | 9.63( -85.2%) | | |
| B 3LDPB-FDR | GE | /TEY | ANSI-SYM | 65.00 | | 9.63( -85.2%) | | |
| B 3LB1A | GE | /SFH | ANSI-SYM | 65.00 | | 9.63( -85.2%) | | |
| B 3LDPB-MAIN | GE | /SKH8 | ANSI-SYM | 65.00 | | 9.63( -85.2%) | | |
| 3LDPB | | / | ANSI-SYM | 42.00 | | 9.63( -77.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
4HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | Comments |
|---|---|---|---|---|---|---|---|---|
| B 4HAIA-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 46.36( -28.7%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | | |
|---|---|---|---|---|---|---|
| B T4DP1 | GE | /SEL | ANSI-SYM | 65.00 | 46.36( -28.7%) | |
| 4HAIA | | / | ANSI-SYM | 65.00 | 46.36( -28.7%) | |

**********

Equipment Duty Comparison Report For Bus:
4HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 46.36( -28.7%) | | |
| 4HAIB | | / | ANSI-SYM | 65.00 | | 46.36( -28.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
4HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAIC-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 44.97( -30.8%) | | |
| 4HAIC | | / | ANSI-SYM | 65.00 | | 44.97( -30.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
4HAID Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAID-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 44.97( -30.8%) | | |
| 4HAID | | / | ANSI-SYM | 65.00 | | 44.97( -30.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKA-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | 11.63( -47.2%) | | |
| 4LAIKA | | / | ANSI-SYM | 22.00 | | 11.63( -47.2%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
4LAIKB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKB-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 11.63( -47.2%) | | |
| 4LAIKB | | / | ANSI-SYM | 22.00 | | | 11.63( -47.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKC Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKC-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 11.63( -47.2%) | | |
| 4LAIKC | | / | ANSI-SYM | 22.00 | | | 11.63( -47.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKD Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKD-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 11.63( -47.2%) | | |
| 4LAIKD | | / | ANSI-SYM | 22.00 | | | 11.63( -47.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKE Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKE-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 2.93( -86.7%) | | |
| 4LAIKE | | / | ANSI-SYM | 22.00 | | | 2.93( -86.7%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
4LAIKF Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKF-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 3.22( -85.4%) | | |
| 4LAIKF | | / | ANSI-SYM | 22.00 | | | 3.22( -85.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LBCIA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBCIA-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 10.49( -52.3%) | | |
| 4LBCIA | | / | ANSI-SYM | 22.00 | | | 10.49( -52.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LBIA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIA-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 10.49( -52.3%) | | |
| 4LBIA | | / | ANSI-SYM | 22.00 | | | 10.49( -52.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LBIB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIB-MAIN | GE | /THQD | ANSI-SYM | 22.00 | | | 7.29( -66.9%) | | |
| B 4LBIB-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 7.29( -66.9%) | | |
| 4LBIB | | / | ANSI-SYM | 22.00 | | | 7.29( -66.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
4LBIC Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIC-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | 10.49( -52.3%) | | |
| 4LBIC | | / | ANSI-SYM | 22.00 | | 10.49( -52.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B BH | GE | /SFH | ANSI-SYM | 65.00 | | 22.17( -65.9%) | | |
| B 4LAIKA | GE | /SFH | ANSI-SYM | 65.00 | | 22.49( -65.4%) | | |
| B 4LAIKB | GE | /SFH | ANSI-SYM | 65.00 | | 22.49( -65.4%) | | |
| B 4LAIKC | GE | /SFH | ANSI-SYM | 65.00 | | 22.49( -65.4%) | | |
| B 4LAIKD | GE | /SFH | ANSI-SYM | 65.00 | | 22.49( -65.4%) | | |
| B 4LAIKE | GE | /TEY | ANSI-SYM | 65.00 | | 22.49( -65.4%) | | |
| B 4LAIKF | GE | /TEY | ANSI-SYM | 65.00 | | 22.49( -65.4%) | | |
| B 4LDPA-MAIN | GE | /SS-16 | ANSI-SYM | 65.00 | | 22.17( -65.9%) | | |
| 4LDPA | | / | ANSI-SYM | 42.00 | | 22.49( -46.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIA | GE | /THQD | ANSI-SYM | 22.00 | | 11.01( -50.0%) | | |
| B 4LBIB | GE | /THQD | ANSI-SYM | 22.00 | | 11.01( -50.0%) | | |
| B 4LBIC | GE | /THQD | ANSI-SYM | 22.00 | | 11.01( -50.0%) | | |
| B 4LBCIA | GE | /THQD | ANSI-SYM | 22.00 | | 11.01( -50.0%) | | |
| B 4LDPB-MAIN | GE | /SKH8 | ANSI-SYM | 65.00 | | 11.01( -83.1%) | | |
| 4LDPB | | / | ANSI-SYM | 22.00 | | 11.01( -50.0%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
8HA2A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8HA2A-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 27.42( -57.8%) | | |
| 8HA2A | | / | ANSI-SYM | 42.00 | | | 27.42( -34.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
8HA2B Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8HA2B-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 25.63( -60.6%) | | |
| 8HA2B | | / | ANSI-SYM | 42.00 | | | 25.63( -39.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LA2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LA2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.08( -49.2%) | | |
| 8LA2A | | / | ANSI-SYM | 10.00 | | | 5.08( -49.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LAC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LAC2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.22( -47.8%) | | |
| 8LAC2A | | / | ANSI-SYM | 10.00 | | | 5.22( -47.8%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
8LAC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | |
|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LAC2B-FDR | GE /THQB | ANSI-SYM | 10.00 | | 5.15( -48.5%) | | |
| 8LAC2B | / | ANSI-SYM | 10.00 | | 5.15( -48.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LB2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | |
|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LB2A-FDR | GE /THQB | ANSI-SYM | 10.00 | | 4.70( -53.0%) | | |
| 8LB2A | / | ANSI-SYM | 10.00 | | 4.70( -53.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LBC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | |
|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LBC2A-FDR | GE /THQB | ANSI-SYM | 10.00 | | 4.82( -51.8%) | | |
| 8LBC2A | / | ANSI-SYM | 10.00 | | 4.82( -51.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LBC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | |
|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LBC2B-FDR | GE /THQB | ANSI-SYM | 10.00 | | 4.76( -52.4%) | | |
| 8LBC2B | / | ANSI-SYM | 10.00 | | 4.76( -52.4%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
8LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LAC2A | GE | /THQD | ANSI-SYM | 22.00 | | | 5.44( -75.3%) | | |
| B 8LAC2B | GE | /THQD | ANSI-SYM | 22.00 | | | 5.44( -75.3%) | | |
| B 8LA2A | GE | /THQD | ANSI-SYM | 22.00 | | | 5.44( -75.3%) | | |
| B 8LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | | 5.44( -91.6%) | | |
| 8LDPA | | / | ANSI-SYM | 22.00 | | | 5.44( -75.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LBC2A | GE | /THQD | ANSI-SYM | 22.00 | | | 5.01( -77.2%) | | |
| B 8LBC2B | GE | /THQD | ANSI-SYM | 22.00 | | | 5.01( -77.2%) | | |
| B 8LB2A | GE | /THQD | ANSI-SYM | 22.00 | | | 5.01( -77.2%) | | |
| B 8LDPB-FDR | GE | /TEY | ANSI-SYM | 65.00 | | | 5.01( -92.3%) | | |
| B 8LDPB-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | | 5.01( -92.3%) | | |
| 8LDPB | | / | ANSI-SYM | 22.00 | | | 5.01( -77.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
MDA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B MDA | GE | /TP40 | ANSI-SYM | 100.00 | | | 55.17( -44.8%) | | |
| MDA | | / | ANSI-SYM | 65.00 | | | 54.21( -16.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
MSA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B T4LDPA | GE | /SKL8 | ANSI-SYM | 65.00 | | | 56.17( -13.6%) | | |
| B T4LDPB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 56.32( -13.4%) | | |
| B 4HAIA | GE | /SGL4 | ANSI-SYM | 65.00 | | | 56.32( -13.4%) | | |

(Serial #34798)
Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | |
|---|---|---|---|---|---|
| B 4HAIB | GE | /SGL4 | ANSI-SYM | 65.00 | 56.32( -13.4%) |
| B 4HAIC | GE | /SFL | ANSI-SYM | 65.00 | 56.32( -13.4%) |
| B 4HAID | GE | /SFL | ANSI-SYM | 65.00 | 56.32( -13.4%) |
| B 3HDPA | GE | /SS-16 | ANSI-SYM | 65.00 | 54.72( -15.8%) |
| MSA | | / | ANSI-SYM | 65.00 | 53.84( -17.2%) |

# Three Phase Bolted Fault

# Low Voltage Momentary Report

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3DP1 | 0.208 | 3794.8 | 3794.8 | 1.75 | 1.04 | 3958.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 3794.8 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 3794.8 | | | | | | | | |
| | | | | | | | C 3DP1 | T3DP1 L | 3794.8 | 1.75 |
| 3DP2 | 0.208 | 3683.7 | 3683.7 | 1.72 | 1.04 | 3836.0 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 3683.7 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 3683.7 | | | | | | | | |
| | | | | | | | C 3DP2 | T3DP2 L | 3683.7 | 1.72 |
| 3HA1A | 0.480 | 31710.9 | 31710.9 | 2.40 | 1.09 | 34665.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 31710.9 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 31710.9 | | | | | | | | |
| | | | | | | | C 3HA1A | 3HDPA | 31710.9 | 2.40 |
| | | | | | | | C T3DP2 | T3DP2 H | 0.0 | 0.94 |
| | | | | | | | C T3DP1 | T3DP1 H | 0.0 | 0.94 |
| 3HAIB | 0.480 | 32373.6 | 32373.6 | 2.76 | 1.12 | 36316.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 32373.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 32373.6 | | | | | | | | |
| | | | | | | | C 3HAIB | 3HDPA | 32373.6 | 2.76 |
| 3HAIC | 0.480 | 30703.2 | 30703.2 | 2.27 | 1.08 | 33243.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 30703.2 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 30703.2 | | | | | | | | |
| | | | | | | | C 3HAIC | 3HDPA | 30703.2 | 2.27 |
| 3HAID | 0.480 | 30703.2 | 30703.2 | 2.27 | 1.08 | 33243.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 30703.2 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 30703.2 | | | | | | | | |
| | | | | | | | C 3HAID | 3HDPA | 30703.2 | 2.27 |
| 3HDPA | 0.480 | 35063.2 | 35063.2 | 2.97 | 1.14 | 39900.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 35063.2 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 35063.2 | | | | | | | | |
| | | | | | | | C 3HDPA | MSA | 33488.9 | 2.96 |
| | | | | | | | C 3HA1A | 3HA1A | 0.0 | 1.34 |
| | | | | | | | C 3HAIB | 3HAIB | 0.0 | 3.42 |
| | | | | | | | C 8HA2A | 8HA2A | 0.0 | 150.00 |
| | | | | | | | C 8HA2B | 8HA2B | 0.0 | 150.00 |
| | | | | | | | C T8LDPA | T8LDPA H | 0.0 | 0.57 |
| | | | | | | | C T8LDPB | T8LDPB H | 0.0 | 0.66 |
| | | | | | | | C T3LDPA | T3LDPA H | 0.0 | 2.23 |
| | | | | | | | C T3LDPB | T3LDPB H | 0.0 | 0.03 |
| | | | | | | | C ELEV | ELEV | 972.4 | 3.52 |
| | | | | | | | C CA | CA | 603.2 | 2.73 |
| | | | | | | | C 3HAIC | 3HAIC | 0.0 | 150.00 |
| | | | | | | | C 3HAID | 3HAID | 0.0 | 150.00 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3LA1A | 0.208 | 5485.6 | 5485.6 | 1.84 | 1.05 | 5757.0 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 5485.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 5485.6 | | | | | | | | |
| | | | | | | | C 3LA1A | 3LDPA | 5485.6 | 1.84 |
| 3LAC1A | 0.208 | 5485.6 | 5485.6 | 1.84 | 1.05 | 5757.0 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 5485.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 5485.6 | | | | | | | | |
| | | | | | | | C 3LAC1A | 3LDPA | 5485.6 | 1.84 |
| 3LAC1B | 0.208 | 5485.6 | 5485.6 | 1.84 | 1.05 | 5757.0 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 5485.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 5485.6 | | | | | | | | |
| | | | | | | | C 3LAC1B | 3LDPA | 5485.6 | 1.84 |
| 3LB1A | 0.208 | 9223.1 | 9223.1 | 2.55 | 1.10 | 10191.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 9223.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 9223.1 | | | | | | | | |
| | | | | | | | C 3LB1A | 3LDPB | 9223.1 | 2.55 |
| 3LBC1A | 0.208 | 9223.1 | 9223.1 | 2.55 | 1.10 | 10191.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 9223.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 9223.1 | | | | | | | | |
| | | | | | | | C-1 | BUS-1 | 0.0 | 0.04 |
| | | | | | | | C 3LBC1A | 3LDPB | 9223.1 | 2.55 |
| 3LBC1B | 0.208 | 9223.1 | 9223.1 | 2.55 | 1.10 | 10191.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 9223.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 9223.1 | | | | | | | | |
| | | | | | | | C 3LBC1B | 3LDPB | 9223.1 | 2.55 |
| 3LBC1C | 0.208 | 9223.1 | 9223.1 | 2.55 | 1.10 | 10191.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 9223.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 9223.1 | | | | | | | | |
| | | | | | | | C 3LBC1C | 3LDPB | 9223.1 | 2.55 |
| 3LDPA | 0.208 | 5641.0 | 5641.0 | 1.90 | 1.05 | 5946.8 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 5641.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 5641.0 | | | | | | | | |
| | | | | | | | C 3LDPA | T3LDPA L | 5641.0 | 1.90 |
| | | | | | | | C 3LAC1A | 3LAC1A | 0.0 | 150.00 |
| | | | | | | | C 3LAC1B | 3LAC1B | 0.0 | 150.00 |
| | | | | | | | C 3LA1A | 3LA1A | 0.0 | 150.00 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| Name | Bus kV | Total Fault Duties: Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Bus Contributions: Branch | Bus | Symmetrical Amps | X/R Ratio |
|---|---|---|---|---|---|---|---|---|---|---|
| 3LDPB | 0.208 | 9634.8 | 9634.8 | 2.80 | 1.12 | 10834.8 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 9634.8 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 9634.8 | | | | | | | |
| | | | | | | | C 3LDPB | T3LDPB L | 9634.8 | 2.80 |
| | | | | | | | C 3LBC1A | 3LBC1A | 0.0 | 150.00 |
| | | | | | | | C 3LBC1B | 3LBC1B | 0.0 | 150.00 |
| | | | | | | | C 3LBC1C | 3LBC1C | 0.0 | 150.00 |
| | | | | | | | C 3LB1A | 3LB1A | 0.0 | 150.00 |
| 4DP1 | 0.208 | 3895.4 | 3895.4 | 1.73 | 1.04 | 4057.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 3895.4 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 3895.4 | | | | | | | |
| | | | | | | | C 4DP1 | T4DP1 L | 3895.4 | 1.73 |
| 4HAIA | 0.480 | 46355.6 | 46355.6 | 4.36 | 1.23 | 57158.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 46355.6 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 49763.7 | | | | | | | |
| | | | | | | | C 4HAIA | MSA | 46355.6 | 4.36 |
| | | | | | | | C T4DP1 | T4DP1 H | 0.0 | 0.00 |
| 4HAIB | 0.480 | 46355.6 | 46355.6 | 4.36 | 1.23 | 57158.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 46355.6 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 49763.7 | | | | | | | |
| | | | | | | | C 4HAIB | MSA | 46355.6 | 4.36 |
| 4HAIC | 0.480 | 44971.8 | 44971.8 | 3.03 | 1.14 | 51362.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 44971.8 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 44971.8 | | | | | | | |
| | | | | | | | C 4HAIC | MSA | 44971.8 | 3.03 |
| 4HAID | 0.480 | 44971.8 | 44971.8 | 3.03 | 1.14 | 51362.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 44971.8 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 44971.8 | | | | | | | |
| | | | | | | | C 4HAID | MSA | 44971.8 | 3.03 |
| 4LAIKA | 0.208 | 11625.2 | 11625.2 | 1.44 | 1.02 | 11900.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 11625.2 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 11625.2 | | | | | | | |
| | | | | | | | C 4LAIKA | 4LDPA | 11625.2 | 1.44 |
| 4LAIKB | 0.208 | 11625.2 | 11625.2 | 1.44 | 1.02 | 11900.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 11625.2 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 11625.2 | | | | | | | |
| | | | | | | | C 4LAIKB | 4LDPA | 11625.2 | 1.44 |
| 4LAIKC | 0.208 | 11625.2 | 11625.2 | 1.44 | 1.02 | 11900.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 11625.2 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 11625.2 | | | | | | | |
| | | | | | | | C 4LAIKC | 4LDPA | 11625.2 | 1.44 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | _____ Total Fault Duties _____ | | | | | _____ Bus Contributions _____ | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4LAIKD | 0.208 | 11625.2 | 11625.2 | 1.44 | 1.02 | 11900.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 11625.2 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 11625.2 | | | | | | | | |
| | | | | | | | C 4LAIKD | 4LDPA | 11625.2 | 1.44 |
| 4LAIKE | 0.208 | 2932.2 | 2932.2 | 0.36 | 1.00 | 2932.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 2932.2 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 2932.2 | | | | | | | | |
| | | | | | | | C 4LAIKE | 4LDPA | 2932.2 | 0.36 |
| 4LAIKF | 0.208 | 3217.3 | 3217.3 | 0.37 | 1.00 | 3217.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 3217.3 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 3217.3 | | | | | | | | |
| | | | | | | | C 4LAIKF | 4LDPA | 3217.3 | 0.37 |
| 4LBCIA | 0.208 | 10487.0 | 10487.0 | 2.83 | 1.13 | 11816.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 10487.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 10487.0 | | | | | | | | |
| | | | | | | | C 4LBCIA | 4LDPB | 10487.0 | 2.83 |
| 4LBIA | 0.208 | 10487.0 | 10487.0 | 2.83 | 1.13 | 11816.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 10487.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 10487.0 | | | | | | | | |
| | | | | | | | C 4LBIA | 4LDPB | 10487.0 | 2.83 |
| 4LBIB | 0.208 | 7291.4 | 7291.4 | 1.64 | 1.04 | 7553.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 7291.4 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 7291.4 | | | | | | | | |
| | | | | | | | C 4LBIB | 4LDPB | 7291.4 | 1.64 |
| 4LBIC | 0.208 | 10487.0 | 10487.0 | 2.83 | 1.13 | 11816.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 10487.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 10487.0 | | | | | | | | |
| | | | | | | | C 4LBIC | 4LDPB | 10487.0 | 2.83 |
| 4LDPA | 0.208 | 22485.6 | 22485.6 | 4.59 | 1.25 | 28035.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 22485.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 24401.9 | | | | | | | | |
| | | | | | | | C 4LAIKA | 4LAIKA | 0.0 | 0.31 |
| | | | | | | | C 4LAIKB | 4LAIKB | 0.0 | 1.45 |
| | | | | | | | C 4LAIKC | 4LAIKC | 0.0 | 1.45 |
| | | | | | | | C 4LAIKD | 4LAIKD | 0.0 | 1.45 |
| | | | | | | | C 4LAIKE | 4LAIKE | 0.0 | 0.23 |
| | | | | | | | C 4LAIKF | 4LAIKF | 0.0 | 150.00 |
| | | | | | | | C 4LDPA | T4LDPA L | 22168.6 | 4.61 |
| | | | | | | | C BH | BH | 317.8 | 3.37 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4LDPB | 0.208 | 11007.8 | 11007.8 | 3.20 | 1.15 | 12711.0 | | | | |
| Molded Case Breakers Rated > 20 kA : 11007.8 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 11020.2 | | | | | | | | | | |
| | | | | | | | C 4LBIA | 4LBIA | 0.0 | 150.00 |
| | | | | | | | C 4LBIB | 4LBIB | 0.0 | 1.45 |
| | | | | | | | C 4LBIC | 4LBIC | 0.0 | 150.00 |
| | | | | | | | C 4LBCIA | 4LBCIA | 0.0 | 150.00 |
| | | | | | | | C 4LDPB | T4LDPB L | 11007.8 | 3.20 |
| 8HA2A | 0.480 | 27422.6 | 27422.6 | 2.44 | 1.10 | 30068.4 | | | | |
| Molded Case Breakers Rated > 20 kA : 27422.6 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 27422.6 | | | | | | | | | | |
| | | | | | | | C 8HA2A | 3HDPA | 27422.6 | 2.44 |
| 8HA2B | 0.480 | 25634.2 | 25634.2 | 1.77 | 1.04 | 26784.1 | | | | |
| Molded Case Breakers Rated > 20 kA : 25634.2 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 25634.2 | | | | | | | | | | |
| | | | | | | | C 8HA2B | 3HDPA | 25634.2 | 1.77 |
| 8LA2A | 0.208 | 5083.0 | 5083.0 | 1.68 | 1.04 | 5277.4 | | | | |
| Molded Case Breakers Rated > 20 kA : 5083.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5083.0 | | | | | | | | | | |
| | | | | | | | C 8LA2A | 8LDPA | 5083.0 | 1.68 |
| 8LAC2A | 0.208 | 5218.8 | 5218.8 | 1.72 | 1.04 | 5435.4 | | | | |
| Molded Case Breakers Rated > 20 kA : 5218.8 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5218.8 | | | | | | | | | | |
| | | | | | | | C 8LAC2A | 8LDPA | 5218.8 | 1.72 |
| 8LAC2B | 0.208 | 5150.1 | 5150.1 | 1.70 | 1.04 | 5355.2 | | | | |
| Molded Case Breakers Rated > 20 kA : 5150.1 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5150.1 | | | | | | | | | | |
| | | | | | | | C 8LAC2B | 8LDPA | 5150.1 | 1.70 |
| 8LB2A | 0.208 | 4703.6 | 4703.6 | 1.50 | 1.03 | 4829.6 | | | | |
| Molded Case Breakers Rated > 20 kA : 4703.6 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4703.6 | | | | | | | | | | |
| | | | | | | | C 8LB2A | 8LDPB | 4703.6 | 1.50 |
| 8LBC2A | 0.208 | 4822.4 | 4822.4 | 1.53 | 1.03 | 4961.2 | | | | |
| Molded Case Breakers Rated > 20 kA : 4822.4 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4822.4 | | | | | | | | | | |
| | | | | | | | C 8LBC2A | 8LDPB | 4822.4 | 1.53 |
| 8LBC2B | 0.208 | 4762.3 | 4762.3 | 1.51 | 1.03 | 4894.5 | | | | |
| Molded Case Breakers Rated > 20 kA : 4762.3 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4762.3 | | | | | | | | | | |
| | | | | | | | C 8LBC2B | 8LDPB | 4762.3 | 1.51 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 8LDPA | 0.208 | 5435.0 | 5435.0 | 1.81 | 1.05 | 5691.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5435.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5435.0 | | | | | | | |
| | | | | | | | C 8LDPA | T8LDPA L | 5435.0 | 1.81 |
| | | | | | | | C 8LAC2A | 8LAC2A | 0.0 | 150.00 |
| | | | | | | | C 8LAC2B | 8LAC2B | 0.0 | 150.00 |
| | | | | | | | C 8LA2A | 8LA2A | 0.0 | 150.00 |
| 8LDPB | 0.208 | 5011.3 | 5011.3 | 1.58 | 1.03 | 5172.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5011.3 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5011.3 | | | | | | | |
| | | | | | | | C 8LDPB | T8LDPB L | 5011.3 | 1.58 |
| | | | | | | | C 8LBC2A | 8LBC2A | 0.0 | 150.00 |
| | | | | | | | C 8LBC2B | 8LBC2B | 0.0 | 150.00 |
| | | | | | | | C 8LB2A | 8LB2A | 0.0 | 150.00 |
| BH | 0.208 | 8565.4 | 8565.4 | 0.75 | 1.00 | 8574.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 8565.4 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 8565.4 | | | | | | | |
| | | | | | | | M BH | | 322.9 | 3.71 |
| | | | | | | | C BH | 4LDPA | 8313.2 | 0.72 |
| BUS-1 | 0.208 | 4571.6 | 4571.6 | 0.56 | 1.00 | 4572.0 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 4571.6 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 4571.6 | | | | | | | |
| | | | | | | | C-1 | 3LBC1A | 4571.6 | 0.56 |
| CA | 0.480 | 8770.2 | 8770.2 | 0.45 | 1.00 | 8770.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 8770.2 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 8770.2 | | | | | | | |
| | | | | | | | M CA | | 620.9 | 3.29 |
| | | | | | | | C CA | 3HDPA | 8374.4 | 0.39 |
| ELEV | 0.480 | 12851.6 | 12851.6 | 0.53 | 1.00 | 12852.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 12851.6 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 12851.6 | | | | | | | |
| | | | | | | | M ELEV 360 | | 993.4 | 4.56 |
| | | | | | | | C ELEV | 3HDPA | 12231.1 | 0.46 |
| MDA | 0.480 | 54210.2 | 54210.2 | 6.37 | 1.33 | 72307.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 56913.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 62590.5 | | | | | | | |
| | | | | | | | C MSA | MSA | 1683.5 | 3.14 |
| | | | | | | | C MDA | TX NPC L | 52547.0 | 6.58 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| MSA | 0.480 | 53844.7 | 53844.7 | 6.23 | 1.33 | 71511.8 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 56315.9 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 61933.8 | | | | | | | |
| | | | | | | | C T4LDPA | T4LDPA H | 136.1 | 3.38 |
| | | | | | | | C T4LDPB | T4LDPB H | 0.0 | 0.70 |
| | | | | | | | C 4HAIA | 4HAIA | 0.0 | 0.70 |
| | | | | | | | C 4HAIB | 4HAIB | 0.0 | 0.70 |
| | | | | | | | C 4HAIC | 4HAIC | 0.0 | 1.45 |
| | | | | | | | C 4HAID | 4HAID | 0.0 | 1.45 |
| | | | | | | | C 3HDPA | 3HDPA | 1547.9 | 3.12 |
| | | | | | | | C MSA | MDA | 52180.2 | 6.43 |
| T3DP1 H | 0.480 | 22665.0 | 22665.0 | 1.83 | 1.05 | 23782.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 22665.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 22665.0 | | | | | | | |
| | | | | | | | T3DP1 | T3DP1 L | 0.0 | 0.53 |
| | | | | | | | C T3DP1 | 3HA1A | 22665.0 | 1.83 |
| T3DP1 L | 0.208 | 3856.6 | 3856.6 | 1.77 | 1.04 | 4027.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 3856.6 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 3856.6 | | | | | | | |
| | | | | | | | T3DP1 | T3DP1 H | 3856.6 | 1.77 |
| | | | | | | | C 3DP1 | 3DP1 | 0.0 | 150.00 |
| T3DP2 H | 0.480 | 15993.3 | 15993.3 | 1.54 | 1.03 | 16468.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 15993.3 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 15993.3 | | | | | | | |
| | | | | | | | T3DP2 | T3DP2 L | 0.0 | 0.49 |
| | | | | | | | C T3DP2 | 3HA1A | 15993.3 | 1.54 |
| T3DP2 L | 0.208 | 3742.1 | 3742.1 | 1.74 | 1.04 | 3900.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 3742.1 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 3742.1 | | | | | | | |
| | | | | | | | T3DP2 | T3DP2 H | 3742.1 | 1.74 |
| | | | | | | | C 3DP2 | 3DP2 | 0.0 | 150.00 |
| T3LDPA H | 0.480 | 32244.5 | 32244.5 | 2.32 | 1.09 | 35024.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 32244.5 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 32244.5 | | | | | | | |
| | | | | | | | T3LDPA | T3LDPA L | 0.0 | 0.32 |
| | | | | | | | C T3LDPA | 3HDPA | 32244.5 | 2.32 |
| T3LDPA L | 0.208 | 5763.1 | 5763.1 | 1.91 | 1.06 | 6081.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5763.1 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5763.1 | | | | | | | |
| | | | | | | | T3LDPA | T3LDPA H | 5763.1 | 1.91 |
| | | | | | | | C 3LDPA | 3LDPA | 0.0 | 0.92 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| T3LDPB H | 0.480 | 19615.7 | 19615.7 | 2.06 | 1.07 | 20909.3 | | | | |
| Molded Case Breakers Rated > 20 kA : 19615.7 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 19615.7 | | | | | | | | | | |
| | | | | | | | T3LDPB | T3LDPB L | 0.0 | 0.04 |
| | | | | | | | C T3LDPB | 3HDPA | 19615.7 | 2.06 |
| T3LDPB L | 0.208 | 9807.2 | 9807.2 | 2.84 | 1.13 | 11062.5 | | | | |
| Molded Case Breakers Rated > 20 kA : 9807.2 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 9807.2 | | | | | | | | | | |
| | | | | | | | T3LDPB | T3LDPB H | 9807.2 | 2.84 |
| | | | | | | | C 3LDPB | 3LDPB | 0.0 | 0.00 |
| T4DP1 H | 0.480 | 37868.0 | 37868.0 | 1.87 | 1.05 | 39822.5 | | | | |
| Molded Case Breakers Rated > 20 kA : 37868.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 37868.0 | | | | | | | | | | |
| | | | | | | | T4DP1 | T4DP1 L | 0.0 | 0.49 |
| | | | | | | | C T4DP1 | 4HAIA | 37868.0 | 1.87 |
| T4DP1 L | 0.208 | 3974.3 | 3974.3 | 1.76 | 1.04 | 4150.4 | | | | |
| Molded Case Breakers Rated > 20 kA : 3974.3 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 3974.3 | | | | | | | | | | |
| | | | | | | | T4DP1 | T4DP1 H | 3974.3 | 1.76 |
| | | | | | | | C 4DP1 | 4DP1 | 0.0 | 150.00 |
| T4LDPA H | 0.480 | 51788.3 | 51788.3 | 5.57 | 1.30 | 67246.7 | | | | |
| Molded Case Breakers Rated > 20 kA : 53083.2 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 58378.6 | | | | | | | | | | |
| | | | | | | | T4LDPA | T4LDPA L | 136.1 | 3.38 |
| | | | | | | | C T4LDPA | MSA | 51653.0 | 5.58 |
| T4LDPA L | 0.208 | 22833.4 | 22833.4 | 4.74 | 1.26 | 28662.5 | | | | |
| Molded Case Breakers Rated > 20 kA : 22833.4 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 24941.2 | | | | | | | | | | |
| | | | | | | | T4LDPA | T4LDPA H | 22516.7 | 4.76 |
| | | | | | | | C 4LDPA | 4LDPA | 317.8 | 3.37 |
| T4LDPB H | 0.480 | 48044.0 | 48044.0 | 4.67 | 1.25 | 60134.4 | | | | |
| Molded Case Breakers Rated > 20 kA : 48044.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 52333.3 | | | | | | | | | | |
| | | | | | | | T4LDPB | T4LDPB L | 0.0 | 0.05 |
| | | | | | | | C T4LDPB | MSA | 48044.0 | 4.67 |
| T4LDPB L | 0.208 | 11230.7 | 11230.7 | 3.27 | 1.16 | 13029.8 | | | | |
| Molded Case Breakers Rated > 20 kA : 11230.7 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 11304.8 | | | | | | | | | | |
| | | | | | | | T4LDPB | T4LDPB H | 11230.7 | 3.27 |
| | | | | | | | C 4LDPB | 4LDPB | 0.0 | 0.15 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| T8LDPA H | 0.480 | 23554.6 | 23554.6 | 1.36 | 1.02 | 24011.3 | | | | |
| Molded Case Breakers Rated > 20 kA : 23554.6 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 23554.6 | | | | | | | | | | |
| | | | | | | | T8LDPA | T8LDPA L | 0.0 | 0.55 |
| | | | | | | | C T8LDPA | 3HDPA | 23554.6 | 1.36 |
| T8LDPA L | 0.208 | 5607.2 | 5607.2 | 1.82 | 1.05 | 5877.8 | | | | |
| Molded Case Breakers Rated > 20 kA : 5607.2 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5607.2 | | | | | | | | | | |
| | | | | | | | T8LDPA | T8LDPA H | 5607.2 | 1.82 |
| | | | | | | | C 8LDPA | 8LDPA | 0.0 | 0.70 |
| T8LDPB H | 0.480 | 11973.4 | 11973.4 | 0.80 | 1.00 | 11991.6 | | | | |
| Molded Case Breakers Rated > 20 kA : 11973.4 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 11973.4 | | | | | | | | | | |
| | | | | | | | T8LDPB | T8LDPB L | 0.0 | 0.55 |
| | | | | | | | C T8LDPB | 3HDPA | 11973.4 | 0.80 |
| T8LDPB L | 0.208 | 5158.0 | 5158.0 | 1.59 | 1.03 | 5325.8 | | | | |
| Molded Case Breakers Rated > 20 kA : 5158.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5158.0 | | | | | | | | | | |
| | | | | | | | T8LDPB | T8LDPB H | 5158.0 | 1.59 |
| | | | | | | | C 8LDPB | 8LDPB | 0.0 | 0.70 |
| TX NPC L | 0.480 | 55143.8 | 55357.6 | 6.76 | 1.35 | 74386.8 | | | | |
| Molded Case Breakers Rated > 20 kA : 58465.2 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 64297.5 | | | | | | | | | | |
| | | | | | | | NPC | | 53484.0 | 7.00 |
| | | | | | | | C MDA | MDA | 1682.5 | 3.13 |

# Three Phase Bolted Fault

# Low Voltage Interrupting Report

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3DP1 | 0.208 | 3786.3 | 2.02 | 1.00 | 3786.3 | | | | |
| | | | | | | C 3DP1 | T3DP1 L | 3786.3 | 1.8 |
| 3DP2 | 0.208 | 3675.7 | 1.99 | 1.00 | 3675.7 | | | | |
| | | | | | | C 3DP2 | T3DP2 L | 3675.7 | 1.7 |
| 3HA1A | 0.480 | 30376.1 | 2.62 | 1.00 | 30376.1 | | | | |
| | | | | | | C 3HA1A | 3HDPA | 30376.1 | 2.4 |
| | | | | | | C T3DP2 | T3DP2 H | 0.0 | 0.3 |
| | | | | | | C T3DP1 | T3DP1 H | 0.0 | 0.2 |
| 3HAIB | 0.480 | 30981.4 | 2.94 | 1.00 | 30981.4 | | | | |
| | | | | | | C 3HAIB | 3HDPA | 30981.4 | 2.8 |
| 3HAIC | 0.480 | 29451.9 | 2.50 | 1.00 | 29451.9 | | | | |
| | | | | | | C 3HAIC | 3HDPA | 29451.9 | 2.3 |
| 3HAID | 0.480 | 29451.9 | 2.50 | 1.00 | 29451.9 | | | | |
| | | | | | | C 3HAID | 3HDPA | 29451.9 | 2.3 |
| 3HDPA | 0.480 | 33435.8 | 3.13 | 1.00 | 33435.8 | | | | |
| | | | | | | C 3HDPA | MSA | 33435.7 | 3.0 |
| | | | | | | C 3HA1A | 3HA1A | 0.0 | 0.3 |
| | | | | | | C 3HAIB | 3HAIB | 0.0 | 3.1 |
| | | | | | | C 8HA2A | 8HA2A | 0.0 | 150.0 |
| | | | | | | C 8HA2B | 8HA2B | 0.0 | 150.0 |
| | | | | | | C T8LDPA | T8LDPA H | 0.0 | 0.7 |
| | | | | | | C T8LDPB | T8LDPB H | 0.0 | 0.9 |
| | | | | | | C T3LDPA | T3LDPA H | 0.0 | 2.2 |
| | | | | | | C T3LDPB | T3LDPB H | 0.0 | 0.0 |
| | | | | | | C ELEV | ELEV | 0.0 | 4.6 |
| | | | | | | C CA | CA | 0.0 | 3.3 |
| | | | | | | C 3HAIC | 3HAIC | 0.0 | 150.0 |
| | | | | | | C 3HAID | 3HAID | 0.0 | 150.0 |
| 3LA1A | 0.208 | 5467.8 | 2.09 | 1.00 | 5467.8 | | | | |
| | | | | | | C 3LA1A | 3LDPA | 5467.8 | 1.8 |
| 3LAC1A | 0.208 | 5467.8 | 2.09 | 1.00 | 5467.8 | | | | |
| | | | | | | C 3LAC1A | 3LDPA | 5467.8 | 1.8 |
| 3LAC1B | 0.208 | 5467.8 | 2.09 | 1.00 | 5467.8 | | | | |
| | | | | | | C 3LAC1B | 3LDPA | 5467.8 | 1.8 |
| 3LB1A | 0.208 | 9172.3 | 2.74 | 1.00 | 9172.3 | | | | |
| | | | | | | C 3LB1A | 3LDPB | 9172.3 | 2.6 |
| 3LBC1A | 0.208 | 9172.3 | 2.74 | 1.00 | 9172.3 | | | | |
| | | | | | | C-1 | BUS-1 | 0.0 | 0.0 |
| | | | | | | C 3LBC1A | 3LDPB | 9172.3 | 2.6 |
| 3LBC1B | 0.208 | 9172.3 | 2.74 | 1.00 | 9172.3 | | | | |
| | | | | | | C 3LBC1B | 3LDPB | 9172.3 | 2.6 |
| 3LBC1C | 0.208 | 9172.3 | 2.74 | 1.00 | 9172.3 | | | | |
| | | | | | | C 3LBC1C | 3LDPB | 9172.3 | 2.6 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3LDPA | 0.208 | 5622.1 | 2.15 | 1.00 | 5622.1 | | | | |
| | | | | | | C 3LDPA | T3LDPA L | 5622.1 | 1.9 |
| | | | | | | C 3LAC1A | 3LAC1A | 0.0 | 150.0 |
| | | | | | | C 3LAC1B | 3LAC1B | 0.0 | 150.0 |
| | | | | | | C 3LA1A | 3LA1A | 0.0 | 150.0 |
| 3LDPB | 0.208 | 9579.2 | 2.97 | 1.00 | 9579.2 | | | | |
| | | | | | | C 3LDPB | T3LDPB L | 9579.2 | 2.8 |
| | | | | | | C 3LBC1A | 3LBC1A | 0.0 | 150.0 |
| | | | | | | C 3LBC1B | 3LBC1B | 0.0 | 150.0 |
| | | | | | | C 3LBC1C | 3LBC1C | 0.0 | 150.0 |
| | | | | | | C 3LB1A | 3LB1A | 0.0 | 150.0 |
| 4DP1 | 0.208 | 3892.0 | 2.00 | 1.00 | 3892.0 | | | | |
| | | | | | | C 4DP1 | T4DP1 L | 3892.0 | 1.7 |
| 4HAIA | 0.480 | 45131.5 | 4.59 | 1.00 | 45131.6 | | | | |
| | | | | | | C 4HAIA | MSA | 45131.5 | 4.5 |
| | | | | | | C T4DP1 | T4DP1 H | 0.0 | 0.0 |
| 4HAIB | 0.480 | 45131.5 | 4.59 | 1.00 | 45131.6 | | | | |
| | | | | | | C 4HAIB | MSA | 45131.5 | 4.5 |
| 4HAIC | 0.480 | 43846.5 | 3.27 | 1.00 | 43846.5 | | | | |
| | | | | | | C 4HAIC | MSA | 43846.5 | 3.1 |
| 4HAID | 0.480 | 43846.5 | 3.27 | 1.00 | 43846.5 | | | | |
| | | | | | | C 4HAID | MSA | 43846.5 | 3.1 |
| 4LAIKA | 0.208 | 11522.4 | 1.77 | 1.00 | 11522.4 | | | | |
| | | | | | | C 4LAIKA | 4LDPA | 11522.4 | 1.5 |
| 4LAIKB | 0.208 | 11522.4 | 1.77 | 1.00 | 11522.4 | | | | |
| | | | | | | C 4LAIKB | 4LDPA | 11522.4 | 1.5 |
| 4LAIKC | 0.208 | 11522.4 | 1.77 | 1.00 | 11522.4 | | | | |
| | | | | | | C 4LAIKC | 4LDPA | 11522.4 | 1.5 |
| 4LAIKD | 0.208 | 11522.4 | 1.77 | 1.00 | 11522.4 | | | | |
| | | | | | | C 4LAIKD | 4LDPA | 11522.4 | 1.5 |
| 4LAIKE | 0.208 | 2929.0 | 1.06 | 1.00 | 2929.0 | | | | |
| | | | | | | C 4LAIKE | 4LDPA | 2929.0 | 0.4 |
| 4LAIKF | 0.208 | 3213.3 | 1.07 | 1.00 | 3213.3 | | | | |
| | | | | | | C 4LAIKF | 4LDPA | 3213.3 | 0.4 |
| 4LBCIA | 0.208 | 10460.1 | 3.01 | 1.00 | 10460.1 | | | | |
| | | | | | | C 4LBCIA | 4LDPB | 10460.1 | 2.8 |
| 4LBIA | 0.208 | 10460.1 | 3.01 | 1.00 | 10460.1 | | | | |
| | | | | | | C 4LBIA | 4LDPB | 10460.1 | 2.8 |
| 4LBIB | 0.208 | 7279.6 | 1.93 | 1.00 | 7279.6 | | | | |
| | | | | | | C 4LBIB | 4LDPB | 7279.6 | 1.6 |
| 4LBIC | 0.208 | 10460.1 | 3.01 | 1.00 | 10460.1 | | | | |
| | | | | | | C 4LBIC | 4LDPB | 10460.1 | 2.8 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4LDPA | 0.208 | 22054.2 | 4.74 | 1.00 | 22054.2 | | | | |
| | | | | | | C 4LAIKA | 4LAIKA | 0.0 | 0.7 |
| | | | | | | C 4LAIKB | 4LAIKB | 0.0 | 1.5 |
| | | | | | | C 4LAIKC | 4LAIKC | 0.0 | 1.5 |
| | | | | | | C 4LAIKD | 4LAIKD | 0.0 | 1.5 |
| | | | | | | C 4LAIKE | 4LAIKE | 0.0 | 0.2 |
| | | | | | | C 4LAIKF | 4LAIKF | 0.0 | 150.0 |
| | | | | | | C 4LDPA | T4LDPA L | 22054.2 | 4.6 |
| | | | | | | C BH | BH | 0.0 | 3.7 |
| 4LDPB | 0.208 | 10977.8 | 3.36 | 1.00 | 10977.8 | | | | |
| | | | | | | C 4LBIA | 4LBIA | 0.0 | 150.0 |
| | | | | | | C 4LBIB | 4LBIB | 0.0 | 1.5 |
| | | | | | | C 4LBIC | 4LBIC | 0.0 | 150.0 |
| | | | | | | C 4LBCIA | 4LBCIA | 0.0 | 150.0 |
| | | | | | | C 4LDPB | T4LDPB L | 10977.8 | 3.2 |
| 8HA2A | 0.480 | 26418.4 | 2.65 | 1.00 | 26418.4 | | | | |
| | | | | | | C 8HA2A | 3HDPA | 26418.4 | 2.5 |
| 8HA2B | 0.480 | 24766.7 | 2.06 | 1.00 | 24766.7 | | | | |
| | | | | | | C 8HA2B | 3HDPA | 24766.7 | 1.8 |
| 8LA2A | 0.208 | 5067.8 | 1.95 | 1.00 | 5067.8 | | | | |
| | | | | | | C 8LA2A | 8LDPA | 5067.8 | 1.7 |
| 8LAC2A | 0.208 | 5202.8 | 2.00 | 1.00 | 5202.8 | | | | |
| | | | | | | C 8LAC2A | 8LDPA | 5202.8 | 1.7 |
| 8LAC2B | 0.208 | 5134.5 | 1.97 | 1.00 | 5134.5 | | | | |
| | | | | | | C 8LAC2B | 8LDPA | 5134.5 | 1.7 |
| 8LB2A | 0.208 | 4690.7 | 1.80 | 1.00 | 4690.7 | | | | |
| | | | | | | C 8LB2A | 8LDPB | 4690.7 | 1.5 |
| 8LBC2A | 0.208 | 4808.9 | 1.83 | 1.00 | 4808.9 | | | | |
| | | | | | | C 8LBC2A | 8LDPB | 4808.9 | 1.5 |
| 8LBC2B | 0.208 | 4749.1 | 1.81 | 1.00 | 4749.1 | | | | |
| | | | | | | C 8LBC2B | 8LDPB | 4749.1 | 1.5 |
| 8LDPA | 0.208 | 5417.6 | 2.07 | 1.00 | 5417.6 | | | | |
| | | | | | | C 8LDPA | T8LDPA L | 5417.6 | 1.8 |
| | | | | | | C 8LAC2A | 8LAC2A | 0.0 | 1.5 |
| | | | | | | C 8LAC2B | 8LAC2B | 0.0 | 150.0 |
| | | | | | | C 8LA2A | 8LA2A | 0.0 | 150.0 |
| 8LDPB | 0.208 | 4996.6 | 1.88 | 1.00 | 4996.6 | | | | |
| | | | | | | C 8LDPB | T8LDPB L | 4996.6 | 1.6 |
| | | | | | | C 8LBC2A | 8LBC2A | 0.0 | 150.0 |
| | | | | | | C 8LBC2B | 8LBC2B | 0.0 | 150.0 |
| | | | | | | C 8LB2A | 8LB2A | 0.0 | 150.0 |
| BH | 0.208 | 8303.6 | 1.23 | 1.00 | 8303.6 | | | | |
| | | | | | | M BH | | 0.0 | 3.7 |
| | | | | | | C BH | 4LDPA | 8303.5 | 0.7 |
| BUS-1 | 0.208 | 4562.2 | 1.15 | 1.00 | 4562.2 | | | | |
| | | | | | | C-1 | 3LBC1A | 4562.2 | 0.6 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| CA | 0.480 | 8333.3 | 1.07 | 1.00 | 8333.3 | | | | |
| | | | | | | M CA | | 0.0 | 3.3 |
| | | | | | | C CA | 3HDPA | 8333.3 | 0.4 |
| ELEV | 0.480 | 12175.5 | 1.10 | 1.00 | 12175.5 | | | | |
| | | | | | | M ELEV 360 | | 0.0 | 4.6 |
| | | | | | | C ELEV | 3HDPA | 12175.5 | 0.5 |
| MDA | 0.480 | 52547.1 | 6.66 | 1.00 | 52551.3 | | | | |
| | | | | | | C MSA | MSA | 0.2 | 4.0 |
| | | | | | | C MDA | TX NPC L | 52547.0 | 6.6 |
| MSA | 0.480 | 52180.3 | 6.51 | 1.00 | 52183.7 | | | | |
| | | | | | | C T4LDPA | T4LDPA H | 0.0 | 3.7 |
| | | | | | | C T4LDPB | T4LDPB H | 0.0 | 0.7 |
| | | | | | | C 4HAIA | 4HAIA | 0.0 | 0.7 |
| | | | | | | C 4HAIB | 4HAIB | 0.0 | 0.7 |
| | | | | | | C 4HAIC | 4HAIC | 0.0 | 1.5 |
| | | | | | | C 4HAID | 4HAID | 0.0 | 1.5 |
| | | | | | | C 3HDPA | 3HDPA | 0.2 | 4.0 |
| | | | | | | C MSA | MDA | 52180.2 | 6.4 |
| T3DP1 H | 0.480 | 21982.6 | 2.11 | 1.00 | 21982.6 | | | | |
| | | | | | | T3DP1 | T3DP1 L | 0.0 | 0.5 |
| | | | | | | C T3DP1 | 3HA1A | 21982.6 | 1.9 |
| T3DP1 L | 0.208 | 3847.8 | 2.03 | 1.00 | 3847.8 | | | | |
| | | | | | | T3DP1 | T3DP1 H | 3847.8 | 1.8 |
| | | | | | | C 3DP1 | 3DP1 | 0.0 | 150.0 |
| T3DP2 H | 0.480 | 15655.6 | 1.85 | 1.00 | 15655.6 | | | | |
| | | | | | | T3DP2 | T3DP2 L | 0.0 | 0.5 |
| | | | | | | C T3DP2 | 3HA1A | 15655.6 | 1.6 |
| T3DP2 L | 0.208 | 3733.8 | 2.00 | 1.00 | 3733.8 | | | | |
| | | | | | | T3DP2 | T3DP2 H | 3733.8 | 1.7 |
| | | | | | | C 3DP2 | 3DP2 | 0.0 | 150.0 |
| T3LDPA H | 0.480 | 30866.6 | 2.54 | 1.00 | 30866.6 | | | | |
| | | | | | | T3LDPA | T3LDPA L | 0.0 | 0.4 |
| | | | | | | C T3LDPA | 3HDPA | 30866.6 | 2.3 |
| T3LDPA L | 0.208 | 5743.4 | 2.16 | 1.00 | 5743.4 | | | | |
| | | | | | | T3LDPA | T3LDPA H | 5743.4 | 1.9 |
| | | | | | | C 3LDPA | 3LDPA | 0.0 | 0.6 |
| T3LDPB H | 0.480 | 19099.2 | 2.30 | 1.00 | 19099.2 | | | | |
| | | | | | | T3LDPB | T3LDPB L | 0.0 | 0.0 |
| | | | | | | C T3LDPB | 3HDPA | 19099.2 | 2.1 |
| T3LDPB L | 0.208 | 9749.7 | 3.02 | 1.00 | 9749.7 | | | | |
| | | | | | | T3LDPB | T3LDPB H | 9749.7 | 2.8 |
| | | | | | | C 3LDPB | 3LDPB | 0.0 | 0.0 |
| T4DP1 H | 0.480 | 37121.6 | 2.16 | 1.00 | 37121.6 | | | | |
| | | | | | | T4DP1 | T4DP1 L | 0.0 | 0.5 |
| | | | | | | C T4DP1 | 4HAIA | 37121.6 | 1.9 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| T4DP1 L | 0.208 | 3970.7 | 2.03 | 1.00 | 3970.7 | | | | |
| | | | | | | T4DP1 | T4DP1 H | 3970.7 | 1.8 |
| | | | | | | C 4DP1 | 4DP1 | 0.0 | 150.0 |
| T4LDPA H | 0.480 | 50241.1 | 5.83 | 1.00 | 50242.2 | | | | |
| | | | | | | T4LDPA | T4LDPA L | 0.0 | 3.7 |
| | | | | | | C T4LDPA | MSA | 50241.1 | 5.7 |
| T4LDPA L | 0.208 | 22398.6 | 4.89 | 1.00 | 22398.6 | | | | |
| | | | | | | T4LDPA | T4LDPA H | 22398.5 | 4.8 |
| | | | | | | C 4LDPA | 4LDPA | 0.0 | 3.7 |
| T4LDPB H | 0.480 | 46726.4 | 4.91 | 1.00 | 46726.5 | | | | |
| | | | | | | T4LDPB | T4LDPB L | 0.0 | 0.0 |
| | | | | | | C T4LDPB | MSA | 46726.4 | 4.8 |
| T4LDPB L | 0.208 | 11199.4 | 3.43 | 1.00 | 11199.4 | | | | |
| | | | | | | T4LDPB | T4LDPB H | 11199.4 | 3.3 |
| | | | | | | C 4LDPB | 4LDPB | 0.0 | 0.7 |
| T8LDPA H | 0.480 | 22840.1 | 1.71 | 1.00 | 22840.1 | | | | |
| | | | | | | T8LDPA | T8LDPA L | 0.0 | 0.6 |
| | | | | | | C T8LDPA | 3HDPA | 22840.1 | 1.4 |
| T8LDPA L | 0.208 | 5588.7 | 2.08 | 1.00 | 5588.7 | | | | |
| | | | | | | T8LDPA | T8LDPA H | 5588.7 | 1.8 |
| | | | | | | C 8LDPA | 8LDPA | 0.0 | 0.7 |
| T8LDPB H | 0.480 | 11806.9 | 1.29 | 1.00 | 11806.9 | | | | |
| | | | | | | T8LDPB | T8LDPB L | 0.0 | 0.5 |
| | | | | | | C T8LDPB | 3HDPA | 11806.9 | 0.8 |
| T8LDPB L | 0.208 | 5142.5 | 1.88 | 1.00 | 5142.5 | | | | |
| | | | | | | T8LDPB | T8LDPB H | 5142.5 | 1.6 |
| | | | | | | C 8LDPB | 8LDPB | 0.0 | 1.4 |
| TX NPC L | 0.480 | 53484.2 | 7.07 | 1.00 | 53491.6 | | | | |
| | | | | | | NPC | | 53484.0 | 7.0 |
| | | | | | | C MDA | MDA | 0.2 | 4.0 |

# Ground Fault

# Equipment Duty Ratings

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3HA1A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HA1A-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 21.68( -66.6%) | | |
| B T3DP2 | GE | /SEL | ANSI-SYM | 65.00 | | | 21.68( -66.6%) | | |
| B T3DP1 | GE | /SEL | ANSI-SYM | 65.00 | | | 21.68( -66.6%) | | |
| 3HA1A | | / | ANSI-SYM | 42.00 | | | 21.68( -48.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
3HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 22.45( -65.5%) | | |
| 3HAIB | | / | ANSI-SYM | 42.00 | | | 22.45( -46.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
3HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HAIC-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 20.70( -68.2%) | | |
| 3HAIC | | / | ANSI-SYM | 42.00 | | | 20.70( -50.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
3HAID Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HAID-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 20.70( -68.2%) | | |
| 3HAID | | / | ANSI-SYM | 42.00 | | | 20.70( -50.7%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3HDPA-MAIN | GE | /SS-16 | ANSI-SYM | 65.00 | | | 24.43( -62.4%) | | |
| B 3HA1A | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B 3HAIB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B 8HA2A | GE | /SGL4 | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B 8HA2B | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B T8LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B T8LDPB | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B T3LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B T3LDPB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B ELEV | GE | /SEL | ANSI-SYM | 65.00 | | | 24.72( -62.0%) | | |
| B CA | GE | /SEL | ANSI-SYM | 65.00 | | | 24.90( -61.7%) | | |
| B 3HAIC | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| B 3HAID | GE | /SFL | ANSI-SYM | 65.00 | | | 25.19( -61.3%) | | |
| 3HDPA | | / | ANSI-SYM | 42.00 | | | 25.19( -40.0%) | | |

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Equipment Duty Comparison Report For Bus:
3LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LA1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.60( -44.0%) | | |
| 3LA1A | | / | ANSI-SYM | 10.00 | | | 5.60( -44.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
3LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LAC1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.60( -44.0%) | | |
| 3LAC1A | | / | ANSI-SYM | 10.00 | | | 5.60( -44.0%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
3LAC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LAC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.60( -44.0%) | | |
| 3LAC1B | / | ANSI-SYM | 10.00 | | | 5.60( -44.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
3LB1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LB1A | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |

**********

Equipment Duty Comparison Report For Bus:
3LBC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LBC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LBC1A | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |

**********

Equipment Duty Comparison Report For Bus:
3LBC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LBC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 10.03( 0.3%) | | VIOLATION |
| 3LBC1B | / | ANSI-SYM | 10.00 | | | 9.65( -3.5%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
3LBC1C Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LBC1C-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 10.03( 0.3%) | | VIOLATION |
| 3LBC1C | | / | ANSI-SYM | 10.00 | | 9.65( -3.5%) | | Warning |

**********

Equipment Duty Comparison Report For Bus:
3LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LAC1A | GE | /THQD | ANSI-SYM | 22.00 | | 5.93( -73.0%) | | |
| B 3LAC1B | GE | /THQD | ANSI-SYM | 22.00 | | 5.93( -73.0%) | | |
| B 3LA1A | GE | /THQD | ANSI-SYM | 22.00 | | 5.93( -73.0%) | | |
| B 3LDPA-FDR | GE | /TEY | ANSI-SYM | 65.00 | | 5.93( -90.9%) | | |
| B 3LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | 5.93( -90.9%) | | |
| 3LDPA | | / | ANSI-SYM | 22.00 | | 5.93( -73.0%) | | |

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Equipment Duty Comparison Report For Bus:
3LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3LBC1A | GE | /SFH | ANSI-SYM | 65.00 | | 10.60( -83.7%) | | |
| B 3LBC1B | GE | /SFH | ANSI-SYM | 65.00 | | 10.60( -83.7%) | | |
| B 3LBC1C | GE | /SFH | ANSI-SYM | 65.00 | | 10.60( -83.7%) | | |
| B 3LDPB-FDR | GE | /TEY | ANSI-SYM | 65.00 | | 10.60( -83.7%) | | |
| B 3LB1A | GE | /SFH | ANSI-SYM | 65.00 | | 10.60( -83.7%) | | |
| B 3LDPB-MAIN | GE | /SKH8 | ANSI-SYM | 65.00 | | 10.60( -83.7%) | | |
| 3LDPB | | / | ANSI-SYM | 42.00 | | 10.60( -74.8%) | | |

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Equipment Duty Comparison Report For Bus:
4HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAIA-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 41.04( -36.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | | |
|---|---|---|---|---|---|---|
| B T4DP1 | GE | /SEL | ANSI-SYM | 65.00 | 41.04( -36.9%) | |
| 4HAIA | | / | ANSI-SYM | 65.00 | 41.04( -36.9%) | |

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Equipment Duty Comparison Report For Bus:
4HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 41.04( -36.9%) | | |
| 4HAIB | | / | ANSI-SYM | 65.00 | | 41.04( -36.9%) | | |

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Equipment Duty Comparison Report For Bus:
4HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAIC-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 38.36( -41.0%) | | |
| 4HAIC | | / | ANSI-SYM | 65.00 | | 38.36( -41.0%) | | |

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Equipment Duty Comparison Report For Bus:
4HAID Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4HAID-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 38.36( -41.0%) | | |
| 4HAID | | / | ANSI-SYM | 65.00 | | 38.36( -41.0%) | | |

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Equipment Duty Comparison Report For Bus:
4LAIKA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKA-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | 7.75( -64.8%) | | |
| 4LAIKA | | / | ANSI-SYM | 22.00 | | 7.75( -64.8%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
4LAIKB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKB-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 7.75( -64.8%) | | |
| 4LAIKB | / | ANSI-SYM | 22.00 | | | 7.75( -64.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKC Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKC-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 7.75( -64.8%) | | |
| 4LAIKC | / | ANSI-SYM | 22.00 | | | 7.75( -64.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKD Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKD-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 7.75( -64.8%) | | |
| 4LAIKD | / | ANSI-SYM | 22.00 | | | 7.75( -64.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LAIKE Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKE-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 1.52( -93.1%) | | |
| 4LAIKE | / | ANSI-SYM | 22.00 | | | 1.52( -93.1%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
4LAIKF Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LAIKF-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 1.67( -92.4%) | | |
| 4LAIKF | | / | ANSI-SYM | 22.00 | | | 1.67( -92.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LBCIA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBCIA-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 10.54( -52.1%) | | |
| 4LBCIA | | / | ANSI-SYM | 22.00 | | | 10.54( -52.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LBIA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIA-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 10.54( -52.1%) | | |
| 4LBIA | | / | ANSI-SYM | 22.00 | | | 10.54( -52.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LBIB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIB-MAIN | GE | /THQD | ANSI-SYM | 22.00 | | | 5.47( -75.1%) | | |
| B 4LBIB-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 5.47( -75.1%) | | |
| 4LBIB | | / | ANSI-SYM | 22.00 | | | 5.47( -75.1%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
4LBIC Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIC-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | 10.54( -52.1%) | | |
| 4LBIC | | / | ANSI-SYM | 22.00 | | 10.54( -52.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B BH | GE | /SFH | ANSI-SYM | 65.00 | | 24.29( -62.6%) | | |
| B 4LAIKA | GE | /SFH | ANSI-SYM | 65.00 | | 24.52( -62.3%) | | |
| B 4LAIKB | GE | /SFH | ANSI-SYM | 65.00 | | 24.52( -62.3%) | | |
| B 4LAIKC | GE | /SFH | ANSI-SYM | 65.00 | | 24.52( -62.3%) | | |
| B 4LAIKD | GE | /SFH | ANSI-SYM | 65.00 | | 24.52( -62.3%) | | |
| B 4LAIKE | GE | /TEY | ANSI-SYM | 65.00 | | 24.52( -62.3%) | | |
| B 4LAIKF | GE | /TEY | ANSI-SYM | 65.00 | | 24.52( -62.3%) | | |
| B 4LDPA-MAIN | GE | /SS-16 | ANSI-SYM | 65.00 | | 24.29( -62.6%) | | |
| 4LDPA | | / | ANSI-SYM | 42.00 | | 24.52( -41.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
4LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4LBIA | GE | /THQD | ANSI-SYM | 22.00 | | 11.67( -46.9%) | | |
| B 4LBIB | GE | /THQD | ANSI-SYM | 22.00 | | 11.67( -46.9%) | | |
| B 4LBIC | GE | /THQD | ANSI-SYM | 22.00 | | 11.67( -46.9%) | | |
| B 4LBCIA | GE | /THQD | ANSI-SYM | 22.00 | | 11.67( -46.9%) | | |
| B 4LDPB-MAIN | GE | /SKH8 | ANSI-SYM | 65.00 | | 11.67( -82.0%) | | |
| 4LDPB | | / | ANSI-SYM | 22.00 | | 11.67( -46.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
8HA2A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8HA2A-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 17.89( -72.5%) | | |
| 8HA2A | | / | ANSI-SYM | 42.00 | | | 17.89( -57.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
8HA2B Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8HA2B-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 16.16( -75.1%) | | |
| 8HA2B | | / | ANSI-SYM | 42.00 | | | 16.16( -61.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LA2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LA2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 4.97( -50.3%) | | |
| 8LA2A | | / | ANSI-SYM | 10.00 | | | 4.97( -50.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LAC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LAC2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.24( -47.6%) | | |
| 8LAC2A | | / | ANSI-SYM | 10.00 | | | 5.24( -47.6%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
8LAC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LAC2B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.10( -49.0%) | | |
| 8LAC2B | / | ANSI-SYM | 10.00 | | | 5.10( -49.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LB2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LB2A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 4.72( -52.8%) | | |
| 8LB2A | / | ANSI-SYM | 10.00 | | | 4.72( -52.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LBC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LBC2A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 4.96( -50.4%) | | |
| 8LBC2A | / | ANSI-SYM | 10.00 | | | 4.96( -50.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LBC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LBC2B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 4.84( -51.6%) | | |
| 8LBC2B | / | ANSI-SYM | 10.00 | | | 4.84( -51.6%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
8LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LAC2A | GE | /THQD | ANSI-SYM | 22.00 | | 5.70( -74.1%) | | |
| B 8LAC2B | GE | /THQD | ANSI-SYM | 22.00 | | 5.70( -74.1%) | | |
| B 8LA2A | GE | /THQD | ANSI-SYM | 22.00 | | 5.70( -74.1%) | | |
| B 8LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | 5.70( -91.2%) | | |
| 8LDPA | | / | ANSI-SYM | 22.00 | | 5.70( -74.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
8LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 8LBC2A | GE | /THQD | ANSI-SYM | 22.00 | | 5.38( -75.5%) | | |
| B 8LBC2B | GE | /THQD | ANSI-SYM | 22.00 | | 5.38( -75.5%) | | |
| B 8LB2A | GE | /THQD | ANSI-SYM | 22.00 | | 5.38( -75.5%) | | |
| B 8LDPB-FDR | GE | /TEY | ANSI-SYM | 65.00 | | 5.38( -91.7%) | | |
| B 8LDPB-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | 5.38( -91.7%) | | |
| 8LDPB | | / | ANSI-SYM | 22.00 | | 5.38( -75.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
MDA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B MDA | GE | /TP40 | ANSI-SYM | 100.00 | | 56.62( -43.4%) | | |
| MDA | | / | ANSI-SYM | 65.00 | | 55.56( -14.5%) | | |

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Equipment Duty Comparison Report For Bus:
MSA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B T4LDPA | GE | /SKL8 | ANSI-SYM | 65.00 | | 56.44( -13.2%) | | |
| B T4LDPB | GE | /SGL4 | ANSI-SYM | 65.00 | | 56.53( -13.0%) | | |
| B 4HAIA | GE | /SGL4 | ANSI-SYM | 65.00 | | 56.53( -13.0%) | | |

(Serial #34798)
Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | |
|---|---|---|---|---|---|
| B 4HAIB | GE | /SGL4 | ANSI-SYM | 65.00 | 56.53( -13.0%) |
| B 4HAIC | GE | /SFL | ANSI-SYM | 65.00 | 56.53( -13.0%) |
| B 4HAID | GE | /SFL | ANSI-SYM | 65.00 | 56.53( -13.0%) |
| B 3HDPA | GE | /SS-16 | ANSI-SYM | 65.00 | 55.46( -14.7%) |
| MSA | | / | ANSI-SYM | 65.00 | 54.75( -15.8%) |

# Ground Fault

# Low Voltage Momentary Report

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | ____ Total Fault Duties ____ | | | | | ____ Bus Contributions ____ | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3DP1 | 0.208 | 4010.1 | 4010.1 | 1.73 | 1.04 | 4178.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 4010.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 4010.1 | | | | | | | | |
| | | | | | | | C 3DP1 | T3DP1 L | 4010.1 | 1.73 |
| 3DP2 | 0.208 | 3926.7 | 3926.7 | 1.71 | 1.04 | 4086.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 3926.7 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 3926.7 | | | | | | | | |
| | | | | | | | C 3DP2 | T3DP2 L | 3926.7 | 1.71 |
| 3HA1A | 0.480 | 21683.7 | 21683.7 | 1.84 | 1.05 | 22756.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 21683.7 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 21683.7 | | | | | | | | |
| | | | | | | | C 3HA1A | 3HDPA | 21683.7 | 1.84 |
| | | | | | | | C T3DP2 | T3DP2 H | 0.0 | 0.94 |
| | | | | | | | C T3DP1 | T3DP1 H | 0.0 | 0.94 |
| 3HAIB | 0.480 | 22448.4 | 22448.4 | 2.14 | 1.07 | 24079.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 22448.4 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 22448.4 | | | | | | | | |
| | | | | | | | C 3HAIB | 3HDPA | 22448.4 | 2.14 |
| 3HAIC | 0.480 | 20698.0 | 20698.0 | 1.74 | 1.04 | 21580.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 20698.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 20698.0 | | | | | | | | |
| | | | | | | | C 3HAIC | 3HDPA | 20698.0 | 1.74 |
| 3HAID | 0.480 | 20698.0 | 20698.0 | 1.74 | 1.04 | 21580.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 20698.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 20698.0 | | | | | | | | |
| | | | | | | | C 3HAID | 3HDPA | 20698.0 | 1.74 |
| 3HDPA | 0.480 | 25185.0 | 25185.0 | 2.27 | 1.08 | 27266.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 25185.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 25185.0 | | | | | | | | |
| | | | | | | | C 3HDPA | MSA | 24431.1 | 2.26 |
| | | | | | | | C 3HA1A | 3HA1A | 0.0 | 1.13 |
| | | | | | | | C 3HAIB | 3HAIB | 0.0 | 2.60 |
| | | | | | | | C 8HA2A | 8HA2A | 0.0 | 150.00 |
| | | | | | | | C 8HA2B | 8HA2B | 0.0 | 150.00 |
| | | | | | | | C T8LDPA | T8LDPA H | 0.0 | 0.57 |
| | | | | | | | C T8LDPB | T8LDPB H | 0.0 | 0.79 |
| | | | | | | | C T3LDPA | T3LDPA H | 0.0 | 2.23 |
| | | | | | | | C T3LDPB | T3LDPB H | 0.0 | 0.10 |
| | | | | | | | C ELEV | ELEV | 465.6 | 2.60 |
| | | | | | | | C CA | CA | 288.9 | 2.11 |
| | | | | | | | C 3HAIC | 3HAIC | 0.0 | 150.00 |
| | | | | | | | C 3HAID | 3HAID | 0.0 | 150.00 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3LA1A | 0.208 | 5597.0 | 5597.0 | 1.75 | 1.04 | 5841.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5597.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5597.0 | | | | | | | |
| | | | | | | | C 3LA1A | 3LDPA | 5597.0 | 1.75 |
| 3LAC1A | 0.208 | 5597.0 | 5597.0 | 1.75 | 1.04 | 5841.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5597.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5597.0 | | | | | | | |
| | | | | | | | C 3LAC1A | 3LDPA | 5597.0 | 1.75 |
| 3LAC1B | 0.208 | 5597.0 | 5597.0 | 1.75 | 1.04 | 5841.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5597.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5597.0 | | | | | | | |
| | | | | | | | C 3LAC1B | 3LDPA | 5597.0 | 1.75 |
| 3LB1A | 0.208 | 9646.7 | 9646.7 | 2.33 | 1.09 | 10490.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 9646.7 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 9646.7 | | | | | | | |
| | | | | | | | C 3LB1A | 3LDPB | 9646.7 | 2.33 |
| 3LBC1A | 0.208 | 9646.7 | 9646.7 | 2.33 | 1.09 | 10490.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 9646.7 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 9646.7 | | | | | | | |
| | | | | | | | C-1 | BUS-1 | 0.0 | 0.01 |
| | | | | | | | C 3LBC1A | 3LDPB | 9646.7 | 2.33 |
| 3LBC1B | 0.208 | 9646.7 | 9646.7 | 2.33 | 1.09 | 10490.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 9646.7 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 9646.7 | | | | | | | |
| | | | | | | | C 3LBC1B | 3LDPB | 9646.7 | 2.33 |
| 3LBC1C | 0.208 | 9646.7 | 9646.7 | 2.33 | 1.09 | 10490.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 9646.7 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 9646.7 | | | | | | | |
| | | | | | | | C 3LBC1C | 3LDPB | 9646.7 | 2.33 |
| 3LDPA | 0.208 | 5932.5 | 5932.5 | 1.88 | 1.05 | 6244.8 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5932.5 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5932.5 | | | | | | | |
| | | | | | | | C 3LDPA | T3LDPA L | 5932.5 | 1.88 |
| | | | | | | | C 3LAC1A | 3LAC1A | 0.0 | 150.00 |
| | | | | | | | C 3LAC1B | 3LAC1B | 0.0 | 150.00 |
| | | | | | | | C 3LA1A | 3LA1A | 0.0 | 150.00 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| Name | Bus kV | Total Fault Duties Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Bus Contributions Branch | Bus | Symmetrical Amps | X/R Ratio |
|---|---|---|---|---|---|---|---|---|---|---|
| 3LDPB | 0.208 | 10604.7 | 10604.7 | 2.81 | 1.13 | 11937.8 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 10604.7 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 10604.7 | | | | | | | | |
| | | | | | | | C 3LDPB | T3LDPB L | 10604.7 | 2.81 |
| | | | | | | | C 3LBC1A | 3LBC1A | 0.0 | 150.00 |
| | | | | | | | C 3LBC1B | 3LBC1B | 0.0 | 150.00 |
| | | | | | | | C 3LBC1C | 3LBC1C | 0.0 | 150.00 |
| | | | | | | | C 3LB1A | 3LB1A | 0.0 | 150.00 |
| 4DP1 | 0.208 | 4064.9 | 4064.9 | 1.68 | 1.04 | 4222.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 4064.9 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 4064.9 | | | | | | | | |
| | | | | | | | C 4DP1 | T4DP1 L | 4064.9 | 1.68 |
| 4HAIA | 0.480 | 41044.1 | 41044.1 | 3.40 | 1.17 | 48007.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 41044.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 41695.8 | | | | | | | | |
| | | | | | | | C 4HAIA | MSA | 41044.1 | 3.40 |
| | | | | | | | C T4DP1 | T4DP1 H | 0.0 | 0.04 |
| 4HAIB | 0.480 | 41044.1 | 41044.1 | 3.40 | 1.17 | 48007.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 41044.1 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 41695.8 | | | | | | | | |
| | | | | | | | C 4HAIB | MSA | 41044.1 | 3.40 |
| 4HAIC | 0.480 | 38364.6 | 38364.6 | 2.11 | 1.07 | 41049.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 38364.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 38364.6 | | | | | | | | |
| | | | | | | | C 4HAIC | MSA | 38364.6 | 2.11 |
| 4HAID | 0.480 | 38364.6 | 38364.6 | 2.11 | 1.07 | 41049.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 38364.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 38364.6 | | | | | | | | |
| | | | | | | | C 4HAID | MSA | 38364.6 | 2.11 |
| 4LAIKA | 0.208 | 7749.3 | 7749.3 | 1.07 | 1.01 | 7804.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 7749.3 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 7749.3 | | | | | | | | |
| | | | | | | | C 4LAIKA | 4LDPA | 7749.3 | 1.07 |
| 4LAIKB | 0.208 | 7749.3 | 7749.3 | 1.07 | 1.01 | 7804.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 7749.3 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 7749.3 | | | | | | | | |
| | | | | | | | C 4LAIKB | 4LDPA | 7749.3 | 1.07 |
| 4LAIKC | 0.208 | 7749.3 | 7749.3 | 1.07 | 1.01 | 7804.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 7749.3 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 7749.3 | | | | | | | | |
| | | | | | | | C 4LAIKC | 4LDPA | 7749.3 | 1.07 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | _____ Total Fault Duties _____ | | | | | _____ Bus Contributions _____ | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4LAIKD | 0.208 | 7749.3 | 7749.3 | 1.07 | 1.01 | 7804.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 7749.3 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 7749.3 | | | | | | | |
| | | | | | | | C 4LAIKD | 4LDPA | 7749.3 | 1.07 |
| 4LAIKE | 0.208 | 1519.4 | 1519.4 | 0.29 | 1.00 | 1519.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 1519.4 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 1519.4 | | | | | | | |
| | | | | | | | C 4LAIKE | 4LDPA | 1519.4 | 0.29 |
| 4LAIKF | 0.208 | 1674.0 | 1674.0 | 0.29 | 1.00 | 1674.0 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 1674.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 1674.0 | | | | | | | |
| | | | | | | | C 4LAIKF | 4LDPA | 1674.0 | 0.29 |
| 4LBCIA | 0.208 | 10540.8 | 10540.8 | 2.46 | 1.10 | 11573.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 10540.8 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 10540.8 | | | | | | | |
| | | | | | | | C 4LBCIA | 4LDPB | 10540.8 | 2.46 |
| 4LBIA | 0.208 | 10540.8 | 10540.8 | 2.46 | 1.10 | 11573.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 10540.8 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 10540.8 | | | | | | | |
| | | | | | | | C 4LBIA | 4LDPB | 10540.8 | 2.46 |
| 4LBIB | 0.208 | 5468.1 | 5468.1 | 1.24 | 1.01 | 5542.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5468.1 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5468.1 | | | | | | | |
| | | | | | | | C 4LBIB | 4LDPB | 5468.1 | 1.24 |
| 4LBIC | 0.208 | 10540.8 | 10540.8 | 2.46 | 1.10 | 11573.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 10540.8 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 10540.8 | | | | | | | |
| | | | | | | | C 4LBIC | 4LDPB | 10540.8 | 2.46 |
| 4LDPA | 0.208 | 24516.0 | 24516.0 | 4.39 | 1.24 | 30280.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 24516.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 26362.0 | | | | | | | |
| | | | | | | | C 4LAIKA | 4LAIKA | 0.0 | 0.16 |
| | | | | | | | C 4LAIKB | 4LAIKB | 0.0 | 1.45 |
| | | | | | | | C 4LAIKC | 4LAIKC | 0.0 | 1.45 |
| | | | | | | | C 4LAIKD | 4LAIKD | 0.0 | 1.45 |
| | | | | | | | C 4LAIKE | 4LAIKE | 0.0 | 0.21 |
| | | | | | | | C 4LAIKF | 4LAIKF | 0.0 | 150.00 |
| | | | | | | | C 4LDPA | T4LDPA L | 24285.6 | 4.41 |
| | | | | | | | C BH | BH | 231.0 | 3.26 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4LDPB | 0.208 | 11674.5 | 11674.5 | 3.09 | 1.15 | 13387.5 | | | | |
| Molded Case Breakers Rated > 20 kA : 11674.5 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 11674.5 | | | | | | | | | | |
| | | | | | | | C 4LBIA | 4LBIA | 0.0 | 150.00 |
| | | | | | | | C 4LBIB | 4LBIB | 0.0 | 1.45 |
| | | | | | | | C 4LBIC | 4LBIC | 0.0 | 150.00 |
| | | | | | | | C 4LBCIA | 4LBCIA | 0.0 | 150.00 |
| | | | | | | | C 4LDPB | T4LDPB L | 11674.5 | 3.09 |
| 8HA2A | 0.480 | 17889.5 | 17889.5 | 1.96 | 1.06 | 18933.7 | | | | |
| Molded Case Breakers Rated > 20 kA : 17889.5 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 17889.5 | | | | | | | | | | |
| | | | | | | | C 8HA2A | 3HDPA | 17889.5 | 1.96 |
| 8HA2B | 0.480 | 16157.9 | 16157.9 | 1.39 | 1.02 | 16493.2 | | | | |
| Molded Case Breakers Rated > 20 kA : 16157.9 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 16157.9 | | | | | | | | | | |
| | | | | | | | C 8HA2B | 3HDPA | 16157.9 | 1.39 |
| 8LA2A | 0.208 | 4969.4 | 4969.4 | 1.57 | 1.03 | 5123.7 | | | | |
| Molded Case Breakers Rated > 20 kA : 4969.4 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4969.4 | | | | | | | | | | |
| | | | | | | | C 8LA2A | 8LDPA | 4969.4 | 1.57 |
| 8LAC2A | 0.208 | 5239.0 | 5239.0 | 1.65 | 1.04 | 5429.6 | | | | |
| Molded Case Breakers Rated > 20 kA : 5239.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5239.0 | | | | | | | | | | |
| | | | | | | | C 8LAC2A | 8LDPA | 5239.0 | 1.65 |
| 8LAC2B | 0.208 | 5101.0 | 5101.0 | 1.61 | 1.03 | 5272.2 | | | | |
| Molded Case Breakers Rated > 20 kA : 5101.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 5101.0 | | | | | | | | | | |
| | | | | | | | C 8LAC2B | 8LDPA | 5101.0 | 1.61 |
| 8LB2A | 0.208 | 4717.9 | 4717.9 | 1.46 | 1.02 | 4834.0 | | | | |
| Molded Case Breakers Rated > 20 kA : 4717.9 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4717.9 | | | | | | | | | | |
| | | | | | | | C 8LB2A | 8LDPB | 4717.9 | 1.46 |
| 8LBC2A | 0.208 | 4964.0 | 4964.0 | 1.52 | 1.03 | 5105.0 | | | | |
| Molded Case Breakers Rated > 20 kA : 4964.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4964.0 | | | | | | | | | | |
| | | | | | | | C 8LBC2A | 8LDPB | 4964.0 | 1.52 |
| 8LBC2B | 0.208 | 4838.1 | 4838.1 | 1.49 | 1.03 | 4965.8 | | | | |
| Molded Case Breakers Rated > 20 kA : 4838.1 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4838.1 | | | | | | | | | | |
| | | | | | | | C 8LBC2B | 8LDPB | 4838.1 | 1.49 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 8LDPA | 0.208 | 5696.2 | 5696.2 | 1.81 | 1.05 | 5965.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5696.2 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5696.2 | | | | | | | |
| | | | | | | | C 8LDPA | T8LDPA L | 5696.2 | 1.81 |
| | | | | | | | C 8LAC2A | 8LAC2A | 0.0 | 150.00 |
| | | | | | | | C 8LAC2B | 8LAC2B | 0.0 | 150.00 |
| | | | | | | | C 8LA2A | 8LA2A | 0.0 | 150.00 |
| 8LDPB | 0.208 | 5380.3 | 5380.3 | 1.64 | 1.04 | 5574.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5380.3 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5380.3 | | | | | | | |
| | | | | | | | C 8LDPB | T8LDPB L | 5380.3 | 1.64 |
| | | | | | | | C 8LBC2A | 8LBC2A | 0.0 | 150.00 |
| | | | | | | | C 8LBC2B | 8LBC2B | 0.0 | 150.00 |
| | | | | | | | C 8LB2A | 8LB2A | 0.0 | 150.00 |
| BH | 0.208 | 4889.0 | 4889.0 | 0.51 | 1.00 | 4889.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 4889.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 4889.0 | | | | | | | |
| | | | | | | | M BH | | 122.9 | 2.12 |
| | | | | | | | C BH | 4LDPA | 4792.7 | 0.48 |
| BUS-1 | 0.208 | 2778.3 | 2778.3 | 0.31 | 1.00 | 2778.3 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 2778.3 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 2778.3 | | | | | | | |
| | | | | | | | C-1 | 3LBC1A | 2778.3 | 0.31 |
| CA | 0.480 | 4412.7 | 4412.7 | 0.33 | 1.00 | 4412.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 4412.7 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 4412.7 | | | | | | | |
| | | | | | | | M CA | | 208.3 | 2.34 |
| | | | | | | | C CA | 3HDPA | 4278.4 | 0.26 |
| ELEV | 0.480 | 6612.9 | 6612.9 | 0.36 | 1.00 | 6612.9 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 6612.9 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 6612.9 | | | | | | | |
| | | | | | | | M ELEV 360 | | 340.8 | 2.64 |
| | | | | | | | C ELEV | 3HDPA | 6397.3 | 0.29 |
| MDA | 0.480 | 55555.0 | 55555.0 | 6.05 | 1.32 | 73345.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 57799.3 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 63565.2 | | | | | | | |
| | | | | | | | C MSA | MSA | 1150.2 | 3.05 |
| | | | | | | | C MDA | TX NPC L | 54418.5 | 6.24 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| MSA | 0.480 | 54753.4 | 54753.4 | 5.80 | 1.31 | 71673.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 56532.9 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 62172.5 | | | | | | | | |
| | | | | | | | C T4LDPA | T4LDPA H | 92.3 | 3.24 |
| | | | | | | | C T4LDPB | T4LDPB H | 0.0 | 0.70 |
| | | | | | | | C 4HAIA | 4HAIA | 0.0 | 0.70 |
| | | | | | | | C 4HAIB | 4HAIB | 0.0 | 0.70 |
| | | | | | | | C 4HAIC | 4HAIC | 0.0 | 1.45 |
| | | | | | | | C 4HAID | 4HAID | 0.0 | 1.45 |
| | | | | | | | C 3HDPA | 3HDPA | 1049.3 | 2.99 |
| | | | | | | | C MSA | MDA | 53624.8 | 5.97 |
| T3DP1 H | 0.480 | 13901.0 | 13901.0 | 1.49 | 1.03 | 14269.7 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 13901.0 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 13901.0 | | | | | | | | |
| | | | | | | | T3DP1 | T3DP1 L | 0.0 | 0.67 |
| | | | | | | | C T3DP1 | 3HA1A | 13901.0 | 1.49 |
| T3DP1 L | 0.208 | 4150.9 | 4150.9 | 1.76 | 1.04 | 4334.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 4150.9 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 4150.9 | | | | | | | | |
| | | | | | | | T3DP1 | T3DP1 H | 4150.9 | 1.76 |
| | | | | | | | C 3DP1 | 3DP1 | 0.0 | 150.00 |
| T3DP2 H | 0.480 | 9151.7 | 9151.7 | 1.33 | 1.02 | 9312.1 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 9151.7 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 9151.7 | | | | | | | | |
| | | | | | | | T3DP2 | T3DP2 L | 0.0 | 0.57 |
| | | | | | | | C T3DP2 | 3HA1A | 9151.7 | 1.33 |
| T3DP2 L | 0.208 | 4061.7 | 4061.7 | 1.74 | 1.04 | 4235.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 4061.7 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 4061.7 | | | | | | | | |
| | | | | | | | T3DP2 | T3DP2 H | 4061.7 | 1.74 |
| | | | | | | | C 3DP2 | 3DP2 | 0.0 | 150.00 |
| T3LDPA H | 0.480 | 22138.6 | 22138.6 | 1.75 | 1.04 | 23096.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 22138.6 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 22138.6 | | | | | | | | |
| | | | | | | | T3LDPA | T3LDPA L | 0.0 | 0.44 |
| | | | | | | | C T3LDPA | 3HDPA | 22138.6 | 1.75 |
| T3LDPA L | 0.208 | 6209.5 | 6209.5 | 1.91 | 1.05 | 6548.4 | | | | |
| Molded Case Breakers Rated > 20 kA : | | 6209.5 | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | 6209.5 | | | | | | | | |
| | | | | | | | T3LDPA | T3LDPA H | 6209.5 | 1.91 |
| | | | | | | | C 3LDPA | 3LDPA | 0.0 | 0.76 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| T3LDPB H | 0.480 | 11728.5 | 11728.5 | 1.74 | 1.04 | 12231.6 | | | | |
| Molded Case Breakers Rated > 20 kA : 11728.5 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 11728.5 | | | | | | | | | | |
| | | | | | | | T3LDPB | T3LDPB L | 0.0 | 0.11 |
| | | | | | | | C T3LDPB | 3HDPA | 11728.5 | 1.74 |
| T3LDPB L | 0.208 | 11031.2 | 11031.2 | 2.92 | 1.13 | 12505.9 | | | | |
| Molded Case Breakers Rated > 20 kA : 11031.2 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 11031.2 | | | | | | | | | | |
| | | | | | | | T3LDPB | T3LDPB H | 11031.2 | 2.92 |
| | | | | | | | C 3LDPB | 3LDPB | 0.0 | 0.18 |
| T4DP1 H | 0.480 | 28077.7 | 28077.7 | 1.26 | 1.01 | 28479.3 | | | | |
| Molded Case Breakers Rated > 20 kA : 28077.7 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 28077.7 | | | | | | | | | | |
| | | | | | | | T4DP1 | T4DP1 L | 0.0 | 0.74 |
| | | | | | | | C T4DP1 | 4HAIA | 28077.7 | 1.26 |
| T4DP1 L | 0.208 | 4241.0 | 4241.0 | 1.76 | 1.04 | 4428.5 | | | | |
| Molded Case Breakers Rated > 20 kA : 4241.0 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 4241.0 | | | | | | | | | | |
| | | | | | | | T4DP1 | T4DP1 H | 4241.0 | 1.76 |
| | | | | | | | C 4DP1 | 4DP1 | 0.0 | 150.00 |
| T4LDPA H | 0.480 | 50612.3 | 50612.3 | 4.78 | 1.26 | 63654.6 | | | | |
| Molded Case Breakers Rated > 20 kA : 50612.3 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 55385.2 | | | | | | | | | | |
| | | | | | | | T4LDPA | T4LDPA L | 88.7 | 3.06 |
| | | | | | | | C T4LDPA | MSA | 50524.1 | 4.79 |
| T4LDPA L | 0.208 | 25377.9 | 25377.9 | 4.70 | 1.25 | 31806.8 | | | | |
| Molded Case Breakers Rated > 20 kA : 25377.9 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 27679.1 | | | | | | | | | | |
| | | | | | | | T4LDPA | T4LDPA H | 25143.2 | 4.73 |
| | | | | | | | C 4LDPA | 4LDPA | 235.4 | 3.36 |
| T4LDPB H | 0.480 | 43831.5 | 43831.5 | 3.71 | 1.19 | 52233.9 | | | | |
| Molded Case Breakers Rated > 20 kA : 43831.5 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 45440.8 | | | | | | | | | | |
| | | | | | | | T4LDPB | T4LDPB L | 0.0 | 0.01 |
| | | | | | | | C T4LDPB | MSA | 43831.5 | 3.71 |
| T4LDPB L | 0.208 | 12188.6 | 12188.6 | 3.24 | 1.16 | 14113.3 | | | | |
| Molded Case Breakers Rated > 20 kA : 12188.6 | | | | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : 12241.3 | | | | | | | | | | |
| | | | | | | | T4LDPB | T4LDPB H | 12188.6 | 3.24 |
| | | | | | | | C 4LDPB | 4LDPB | 0.0 | 0.03 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| T8LDPA H | 0.480 | 14310.7 | 14310.7 | 1.06 | 1.01 | 14407.2 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 14310.7 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 14310.7 | | | | | | | |
| | | | | | | | T8LDPA | T8LDPA L | 0.0 | 0.73 |
| | | | | | | | C T8LDPA | 3HDPA | 14310.7 | 1.06 |
| T8LDPA L | 0.208 | 6088.0 | 6088.0 | 1.84 | 1.05 | 6389.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 6088.0 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 6088.0 | | | | | | | |
| | | | | | | | T8LDPA | T8LDPA H | 6088.0 | 1.84 |
| | | | | | | | C 8LDPA | 8LDPA | 0.0 | 0.70 |
| T8LDPB H | 0.480 | 6461.6 | 6461.6 | 0.68 | 1.00 | 6464.8 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 6461.6 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 6461.6 | | | | | | | |
| | | | | | | | T8LDPB | T8LDPB L | 0.0 | 0.66 |
| | | | | | | | C T8LDPB | 3HDPA | 6461.6 | 0.68 |
| T8LDPB L | 0.208 | 5729.9 | 5729.9 | 1.66 | 1.04 | 5942.5 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 5729.9 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 5729.9 | | | | | | | |
| | | | | | | | T8LDPB | T8LDPB H | 5729.9 | 1.66 |
| | | | | | | | C 8LDPB | 8LDPB | 0.0 | 0.70 |
| TX NPC L | 0.480 | 57652.8 | 57978.3 | 6.83 | 1.35 | 77929.6 | | | | |
| Molded Case Breakers Rated > 20 kA : | | | 61232.9 | | | | | | | |
| Molded Case Breakers Rated 10-20 kA : | | | 67341.3 | | | | | | | |
| | | | | | | | NPC | | 56495.8 | 7.08 |
| | | | | | | | C MDA | MDA | 1172.8 | 3.15 |

# Ground Fault

# Low Voltage Interrupting Report

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | _____ Total Fault Duties _____ | | | | _____ Bus Contributions _____ | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3DP1 | 0.208 | 4007.0 | 2.00 | 1.00 | 4007.0 | | | | |
| | | | | | | C 3DP1 | T3DP1 L | 4007.0 | 1.7 |
| 3DP2 | 0.208 | 3923.6 | 1.98 | 1.00 | 3923.6 | | | | |
| | | | | | | C 3DP2 | T3DP2 L | 3923.6 | 1.7 |
| 3HA1A | 0.480 | 21471.1 | 2.10 | 1.00 | 21471.1 | | | | |
| | | | | | | C 3HA1A | 3HDPA | 21471.1 | 1.8 |
| | | | | | | C T3DP2 | T3DP2 H | 0.0 | 0.9 |
| | | | | | | C T3DP1 | T3DP1 H | 0.0 | 0.9 |
| 3HAIB | 0.480 | 22218.8 | 2.36 | 1.00 | 22218.8 | | | | |
| | | | | | | C 3HAIB | 3HDPA | 22218.8 | 2.1 |
| 3HAIC | 0.480 | 20505.0 | 2.01 | 1.00 | 20505.0 | | | | |
| | | | | | | C 3HAIC | 3HDPA | 20505.0 | 1.7 |
| 3HAID | 0.480 | 20505.0 | 2.01 | 1.00 | 20505.0 | | | | |
| | | | | | | C 3HAID | 3HDPA | 20505.0 | 1.7 |
| 3HDPA | 0.480 | 24895.8 | 2.48 | 1.00 | 24895.8 | | | | |
| | | | | | | C 3HDPA | MSA | 24523.2 | 2.3 |
| | | | | | | C 3HA1A | 3HA1A | 0.0 | 1.1 |
| | | | | | | C 3HAIB | 3HAIB | 0.0 | 2.6 |
| | | | | | | C 8HA2A | 8HA2A | 0.0 | 150.0 |
| | | | | | | C 8HA2B | 8HA2B | 0.0 | 150.0 |
| | | | | | | C T8LDPA | T8LDPA H | 0.0 | 0.6 |
| | | | | | | C T8LDPB | T8LDPB H | 0.0 | 0.8 |
| | | | | | | C T3LDPA | T3LDPA H | 0.0 | 2.2 |
| | | | | | | C T3LDPB | T3LDPB H | 0.0 | 0.1 |
| | | | | | | C ELEV | ELEV | 230.2 | 2.6 |
| | | | | | | C CA | CA | 142.8 | 2.1 |
| | | | | | | C 3HAIC | 3HAIC | 0.0 | 150.0 |
| | | | | | | C 3HAID | 3HAID | 0.0 | 150.0 |
| 3LA1A | 0.208 | 5590.9 | 2.02 | 1.00 | 5590.9 | | | | |
| | | | | | | C 3LA1A | 3LDPA | 5590.9 | 1.8 |
| 3LAC1A | 0.208 | 5590.9 | 2.02 | 1.00 | 5590.9 | | | | |
| | | | | | | C 3LAC1A | 3LDPA | 5590.9 | 1.8 |
| 3LAC1B | 0.208 | 5590.9 | 2.02 | 1.00 | 5590.9 | | | | |
| | | | | | | C 3LAC1B | 3LDPA | 5590.9 | 1.8 |
| 3LB1A | 0.208 | 9628.1 | 2.54 | 1.00 | 9628.1 | | | | |
| | | | | | | C 3LB1A | 3LDPB | 9628.1 | 2.3 |
| 3LBC1A | 0.208 | 9628.1 | 2.54 | 1.00 | 9628.1 | | | | |
| | | | | | | C-1 | BUS-1 | 0.0 | 0.0 |
| | | | | | | C 3LBC1A | 3LDPB | 9628.1 | 2.3 |
| 3LBC1B | 0.208 | 9628.1 | 2.54 | 1.00 | 9628.1 | | | | |
| | | | | | | C 3LBC1B | 3LDPB | 9628.1 | 2.3 |
| 3LBC1C | 0.208 | 9628.1 | 2.54 | 1.00 | 9628.1 | | | | |
| | | | | | | C 3LBC1C | 3LDPB | 9628.1 | 2.3 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 3LDPA | 0.208 | 5925.6 | 2.13 | 1.00 | 5925.6 | | | | |
| | | | | | | C 3LDPA | T3LDPA L | 5925.6 | 1.9 |
| | | | | | | C 3LAC1A | 3LAC1A | 0.0 | 150.0 |
| | | | | | | C 3LAC1B | 3LAC1B | 0.0 | 150.0 |
| | | | | | | C 3LA1A | 3LA1A | 0.0 | 150.0 |
| 3LDPB | 0.208 | 10582.2 | 2.98 | 1.00 | 10582.2 | | | | |
| | | | | | | C 3LDPB | T3LDPB L | 10582.2 | 2.8 |
| | | | | | | C 3LBC1A | 3LBC1A | 0.0 | 150.0 |
| | | | | | | C 3LBC1B | 3LBC1B | 0.0 | 150.0 |
| | | | | | | C 3LBC1C | 3LBC1C | 0.0 | 150.0 |
| | | | | | | C 3LB1A | 3LB1A | 0.0 | 150.0 |
| 4DP1 | 0.208 | 4063.7 | 1.96 | 1.00 | 4063.7 | | | | |
| | | | | | | C 4DP1 | T4DP1 L | 4063.7 | 1.7 |
| 4HAIA | 0.480 | 40723.3 | 3.58 | 1.00 | 40723.3 | | | | |
| | | | | | | C 4HAIA | MSA | 40723.3 | 3.4 |
| | | | | | | C T4DP1 | T4DP1 H | 0.0 | 0.0 |
| 4HAIB | 0.480 | 40723.3 | 3.58 | 1.00 | 40723.3 | | | | |
| | | | | | | C 4HAIB | MSA | 40723.3 | 3.4 |
| 4HAIC | 0.480 | 38100.0 | 2.37 | 1.00 | 38100.0 | | | | |
| | | | | | | C 4HAIC | MSA | 38100.0 | 2.1 |
| 4HAID | 0.480 | 38100.0 | 2.37 | 1.00 | 38100.0 | | | | |
| | | | | | | C 4HAID | MSA | 38100.0 | 2.1 |
| 4LAIKA | 0.208 | 7735.4 | 1.48 | 1.00 | 7735.4 | | | | |
| | | | | | | C 4LAIKA | 4LDPA | 7735.4 | 1.1 |
| 4LAIKB | 0.208 | 7735.4 | 1.48 | 1.00 | 7735.4 | | | | |
| | | | | | | C 4LAIKB | 4LDPA | 7735.4 | 1.1 |
| 4LAIKC | 0.208 | 7735.4 | 1.48 | 1.00 | 7735.4 | | | | |
| | | | | | | C 4LAIKC | 4LDPA | 7735.4 | 1.1 |
| 4LAIKD | 0.208 | 7735.4 | 1.48 | 1.00 | 7735.4 | | | | |
| | | | | | | C 4LAIKD | 4LDPA | 7735.4 | 1.1 |
| 4LAIKE | 0.208 | 1519.1 | 1.04 | 1.00 | 1519.1 | | | | |
| | | | | | | C 4LAIKE | 4LDPA | 1519.1 | 0.3 |
| 4LAIKF | 0.208 | 1673.7 | 1.04 | 1.00 | 1673.7 | | | | |
| | | | | | | C 4LAIKF | 4LDPA | 1673.7 | 0.3 |
| 4LBCIA | 0.208 | 10531.9 | 2.67 | 1.00 | 10531.9 | | | | |
| | | | | | | C 4LBCIA | 4LDPB | 10531.9 | 2.5 |
| 4LBIA | 0.208 | 10531.9 | 2.67 | 1.00 | 10531.9 | | | | |
| | | | | | | C 4LBIA | 4LDPB | 10531.9 | 2.5 |
| 4LBIB | 0.208 | 5466.1 | 1.61 | 1.00 | 5466.1 | | | | |
| | | | | | | C 4LBIB | 4LDPB | 5466.1 | 1.2 |
| 4LBIC | 0.208 | 10531.9 | 2.67 | 1.00 | 10531.9 | | | | |
| | | | | | | C 4LBIC | 4LDPB | 10531.9 | 2.5 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4LDPA | 0.208 | 24343.2 | 4.51 | 1.00 | 24343.2 | | | | |
| | | | | | | C 4LAIKA | 4LAIKA | 0.0 | 0.2 |
| | | | | | | C 4LAIKB | 4LAIKB | 0.0 | 1.5 |
| | | | | | | C 4LAIKC | 4LAIKC | 0.0 | 1.5 |
| | | | | | | C 4LAIKD | 4LAIKD | 0.0 | 1.5 |
| | | | | | | C 4LAIKE | 4LAIKE | 0.0 | 0.2 |
| | | | | | | C 4LAIKF | 4LAIKF | 0.0 | 150.0 |
| | | | | | | C 4LDPA | T4LDPA L | 24228.8 | 4.4 |
| | | | | | | C BH | BH | 114.7 | 3.3 |
| 4LDPB | 0.208 | 11663.2 | 3.25 | 1.00 | 11663.2 | | | | |
| | | | | | | C 4LBIA | 4LBIA | 0.0 | 150.0 |
| | | | | | | C 4LBIB | 4LBIB | 0.0 | 1.5 |
| | | | | | | C 4LBIC | 4LBIC | 0.0 | 150.0 |
| | | | | | | C 4LBCIA | 4LBCIA | 0.0 | 150.0 |
| | | | | | | C 4LDPB | T4LDPB L | 11663.2 | 3.1 |
| 8HA2A | 0.480 | 17744.1 | 2.20 | 1.00 | 17744.1 | | | | |
| | | | | | | C 8HA2A | 3HDPA | 17744.1 | 2.0 |
| 8HA2B | 0.480 | 16043.0 | 1.72 | 1.00 | 16043.0 | | | | |
| | | | | | | C 8HA2B | 3HDPA | 16043.0 | 1.4 |
| 8LA2A | 0.208 | 4964.5 | 1.86 | 1.00 | 4964.5 | | | | |
| | | | | | | C 8LA2A | 8LDPA | 4964.5 | 1.6 |
| 8LAC2A | 0.208 | 5233.7 | 1.93 | 1.00 | 5233.7 | | | | |
| | | | | | | C 8LAC2A | 8LDPA | 5233.7 | 1.6 |
| 8LAC2B | 0.208 | 5095.9 | 1.89 | 1.00 | 5095.9 | | | | |
| | | | | | | C 8LAC2B | 8LDPA | 5095.9 | 1.6 |
| 8LB2A | 0.208 | 4713.6 | 1.77 | 1.00 | 4713.6 | | | | |
| | | | | | | C 8LB2A | 8LDPB | 4713.6 | 1.5 |
| 8LBC2A | 0.208 | 4959.2 | 1.82 | 1.00 | 4959.2 | | | | |
| | | | | | | C 8LBC2A | 8LDPB | 4959.2 | 1.5 |
| 8LBC2B | 0.208 | 4833.6 | 1.79 | 1.00 | 4833.6 | | | | |
| | | | | | | C 8LBC2B | 8LDPB | 4833.6 | 1.5 |
| 8LDPA | 0.208 | 5689.8 | 2.06 | 1.00 | 5689.8 | | | | |
| | | | | | | C 8LDPA | T8LDPA L | 5689.8 | 1.8 |
| | | | | | | C 8LAC2A | 8LAC2A | 0.0 | 150.0 |
| | | | | | | C 8LAC2B | 8LAC2B | 0.0 | 150.0 |
| | | | | | | C 8LA2A | 8LA2A | 0.0 | 150.0 |
| 8LDPB | 0.208 | 5374.6 | 1.92 | 1.00 | 5374.6 | | | | |
| | | | | | | C 8LDPB | T8LDPB L | 5374.6 | 1.6 |
| | | | | | | C 8LBC2A | 8LBC2A | 0.0 | 150.0 |
| | | | | | | C 8LBC2B | 8LBC2B | 0.0 | 150.0 |
| | | | | | | C 8LB2A | 8LB2A | 0.0 | 150.0 |
| BH | 0.208 | 4856.7 | 1.12 | 1.00 | 4856.7 | | | | |
| | | | | | | M BH | | 61.0 | 2.1 |
| | | | | | | C BH | 4LDPA | 4808.8 | 0.5 |
| BUS-1 | 0.208 | 2777.4 | 1.06 | 1.00 | 2777.4 | | | | |
| | | | | | | C-1 | 3LBC1A | 2777.4 | 0.3 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| CA | 0.480 | 4371.1 | 1.04 | 1.00 | 4371.1 | | | | |
| | | | | | | M CA | | 103.2 | 2.3 |
| | | | | | | C CA | 3HDPA | 4303.9 | 0.3 |
| ELEV | 0.480 | 6543.1 | 1.05 | 1.00 | 6543.1 | | | | |
| | | | | | | M ELEV 360 | | 168.6 | 2.6 |
| | | | | | | C ELEV | 3HDPA | 6435.1 | 0.3 |
| MDA | 0.480 | 54961.7 | 6.20 | 1.00 | 54963.9 | | | | |
| | | | | | | C MSA | MSA | 569.1 | 3.1 |
| | | | | | | C MDA | TX NPC L | 54399.4 | 6.3 |
| MSA | 0.480 | 54169.0 | 5.95 | 1.00 | 54170.3 | | | | |
| | | | | | | C T4LDPA | T4LDPA H | 45.7 | 3.3 |
| | | | | | | C T4LDPB | T4LDPB H | 0.0 | 0.7 |
| | | | | | | C 4HAIA | 4HAIA | 0.0 | 0.7 |
| | | | | | | C 4HAIB | 4HAIB | 0.0 | 0.7 |
| | | | | | | C 4HAIC | 4HAIC | 0.0 | 1.5 |
| | | | | | | C 4HAID | 4HAID | 0.0 | 1.5 |
| | | | | | | C 3HDPA | 3HDPA | 519.1 | 3.0 |
| | | | | | | C MSA | MDA | 53610.5 | 6.0 |
| T3DP1 H | 0.480 | 13815.1 | 1.80 | 1.00 | 13815.1 | | | | |
| | | | | | | T3DP1 | T3DP1 L | 0.0 | 0.7 |
| | | | | | | C T3DP1 | 3HA1A | 13815.1 | 1.5 |
| T3DP1 L | 0.208 | 4147.5 | 2.03 | 1.00 | 4147.5 | | | | |
| | | | | | | T3DP1 | T3DP1 H | 4147.5 | 1.8 |
| | | | | | | C 3DP1 | 3DP1 | 0.0 | 150.0 |
| T3DP2 H | 0.480 | 9115.0 | 1.66 | 1.00 | 9115.0 | | | | |
| | | | | | | T3DP2 | T3DP2 L | 0.0 | 0.6 |
| | | | | | | C T3DP2 | 3HA1A | 9115.0 | 1.3 |
| T3DP2 L | 0.208 | 4058.4 | 2.01 | 1.00 | 4058.4 | | | | |
| | | | | | | T3DP2 | T3DP2 H | 4058.4 | 1.7 |
| | | | | | | C 3DP2 | 3DP2 | 0.0 | 150.0 |
| T3LDPA H | 0.480 | 21917.9 | 2.02 | 1.00 | 21917.9 | | | | |
| | | | | | | T3LDPA | T3LDPA L | 0.0 | 0.4 |
| | | | | | | C T3LDPA | 3HDPA | 21917.9 | 1.8 |
| T3LDPA L | 0.208 | 6201.8 | 2.15 | 1.00 | 6201.8 | | | | |
| | | | | | | T3LDPA | T3LDPA H | 6201.8 | 1.9 |
| | | | | | | C 3LDPA | 3LDPA | 0.0 | 0.8 |
| T3LDPB H | 0.480 | 11666.3 | 2.01 | 1.00 | 11666.3 | | | | |
| | | | | | | T3LDPB | T3LDPB L | 0.0 | 0.1 |
| | | | | | | C T3LDPB | 3HDPA | 11666.3 | 1.7 |
| T3LDPB L | 0.208 | 11006.8 | 3.08 | 1.00 | 11006.8 | | | | |
| | | | | | | T3LDPB | T3LDPB H | 11006.8 | 2.9 |
| | | | | | | C 3LDPB | 3LDPB | 0.0 | 0.2 |
| T4DP1 H | 0.480 | 27954.3 | 1.64 | 1.00 | 27954.3 | | | | |
| | | | | | | T4DP1 | T4DP1 L | 0.0 | 0.7 |
| | | | | | | C T4DP1 | 4HAIA | 27954.3 | 1.3 |

Project Name: CCSD Career & Tech Center E-Sh 5.01
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| T4DP1 L | 0.208 | 4239.6 | 2.03 | 1.00 | 4239.6 | | | | |
| | | | | | | T4DP1 | T4DP1 H | 4239.6 | 1.8 |
| | | | | | | C 4DP1 | 4DP1 | 0.0 | 150.0 |
| T4LDPA H | 0.480 | 50112.3 | 4.93 | 1.00 | 50112.5 | | | | |
| | | | | | | T4LDPA | T4LDPA L | 43.9 | 3.1 |
| | | | | | | C T4LDPA | MSA | 50068.7 | 4.8 |
| T4LDPA L | 0.208 | 25196.7 | 4.81 | 1.00 | 25196.8 | | | | |
| | | | | | | T4LDPA | T4LDPA H | 25080.2 | 4.7 |
| | | | | | | C 4LDPA | 4LDPA | 116.9 | 3.4 |
| T4LDPB H | 0.480 | 43463.4 | 3.89 | 1.00 | 43463.4 | | | | |
| | | | | | | T4LDPB | T4LDPB L | 0.0 | 0.0 |
| | | | | | | C T4LDPB | MSA | 43463.4 | 3.7 |
| T4LDPB L | 0.208 | 12176.3 | 3.39 | 1.00 | 12176.3 | | | | |
| | | | | | | T4LDPB | T4LDPB H | 12176.3 | 3.2 |
| | | | | | | C 4LDPB | 4LDPB | 0.0 | 0.0 |
| T8LDPA H | 0.480 | 14224.9 | 1.46 | 1.00 | 14224.9 | | | | |
| | | | | | | T8LDPA | T8LDPA L | 0.0 | 0.7 |
| | | | | | | C T8LDPA | 3HDPA | 14224.8 | 1.1 |
| T8LDPA L | 0.208 | 6080.7 | 2.09 | 1.00 | 6080.7 | | | | |
| | | | | | | T8LDPA | T8LDPA H | 6080.7 | 1.8 |
| | | | | | | C 8LDPA | 8LDPA | 0.0 | 0.7 |
| T8LDPB H | 0.480 | 6446.2 | 1.21 | 1.00 | 6446.2 | | | | |
| | | | | | | T8LDPB | T8LDPB L | 0.0 | 0.7 |
| | | | | | | C T8LDPB | 3HDPA | 6446.2 | 0.7 |
| T8LDPB L | 0.208 | 5723.5 | 1.94 | 1.00 | 5723.5 | | | | |
| | | | | | | T8LDPB | T8LDPB H | 5723.5 | 1.7 |
| | | | | | | C 8LDPB | 8LDPB | 0.0 | 0.7 |
| TX NPC L | 0.480 | 57036.1 | 7.00 | 1.00 | 57043.2 | | | | |
| | | | | | | NPC | | 56463.5 | 7.2 |
| | | | | | | C MDA | MDA | 580.2 | 3.2 |

# E Sheet 5.02

# Database Report

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Equipment Database

**Summary**

| | | |
|---|---|---|
| 1 | Base MVA | 100 |
| 2 | Frequency | 60 |
| 3 | Buses | 112 |
| 4 | MCC Schedules | 0 |
| 5 | Panel Schedules | 0 |
| 6 | Utilities | 1 |
| 7 | Generators | 1 |
| 8 | UPS | 2 |
| 9 | Motors | 3 |
| 10 | Capacitors | 0 |
| 11 | Loads | 0 |
| 12 | Shunts | 0 |
| 13 | Filters | 0 |
| 14 | 2-Transformers | 15 |
| 15 | 3-Transformers | 0 |
| 16 | Zigzags | 0 |
| 17 | Cables | 89 |
| 18 | Busways | 0 |
| 19 | Xmission Lines | 0 |
| 20 | CL Reactors | 0 |
| 21 | HV Breakers | 0 |
| 22 | LV Breakers | 170 |
| 23 | Switches | 1 |
| 24 | Fuses | 0 |
| 25 | ATS | 1 |
| 26 | Meters | 0 |
| 27 | CTs | 0 |
| 28 | Relays | 0 |
| 29 | Notes | 4 |
| 30 | Lines | 0 |

**Buses**

| | ID Name | Status | Base kV | Area | Zone | AF Type | AF Option | Comment |
|---|---|---|---|---|---|---|---|---|
| 1 | 1EH1 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 2 | 1EL1 | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 3 | 1HAIA | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 4 | 1HAIB | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 5 | 1HAIC | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 22k |
| 6 | 1HDPA | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 7 | 1LA1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 8 | 1LA2A | On | 0.208 | 1 | 1 | Other | Specified | |
| 9 | 1LAC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 10 | 1LAC2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 11 | 1LDPA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 12 | 2EH1 | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 42k |
| 13 | 2EHDP | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 14 | 2EL1 | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 15 | 2HAIA | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 16 | 2HAIB | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 17 | 2HAIC | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 18 | 2HDPA | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 19 | 2HS1 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 20 | 2HS2 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 21 | 2LA1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 22 | 2LA1B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 23 | 2LA1KA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 24 | 2LA1KB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 25 | 2LA1KC | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 26 | 2LAC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 27 | 2LDPA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 28 | 3EH1 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 29 | 3EL1 | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 30 | 4EH1 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 31 | 4EL1 | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 32 | 5EH1 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 33 | 5EL1 | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 34 | 5HA1A | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 42k |
| 35 | 5HA1B | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 42k |
| 36 | 5HA1C | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 42k |
| 37 | 5HA1D | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 42k |
| 38 | 5HA1E | On | 0.48 | 1 | 1 | Panelboard | Specified | 10k to 42k |
| 39 | 5HDPA | On | 0.48 | 1 | 1 | Switchboard | Specified | 42k to 65k |
| 40 | 5LA1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 41 | 5LAC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 42 | 5LAC1B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 43 | 5LB1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 44 | 5LB1B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 45 | 5LB1C | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 46 | 5LBC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 47 | 5LBC1B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 48 | 5LDPA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 49 | 5LDPB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 50 | 6EH1 | On | 0.48 | 1 | 1 | Panelboard | Specified | |
| 51 | 6EL1 | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 52 | 6HAIA | On | 0.48 | 1 | 1 | Panelboard | Specified | 10k to 42k |
| 53 | 6HAIB | On | 0.48 | 1 | 1 | Panelboard | Specified | 10k to 42k |
| 54 | 6HAIC | On | 0.48 | 1 | 1 | Panelboard | Specified | 10k to 42k |
| 55 | 6HDPA | On | 0.48 | 1 | 1 | Panelboard | Specified | 42k to 65k |
| 56 | 6LAC1A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 57 | 6LAIA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 58 | 9HA2A | On | 0.48 | 1 | 1 | Panelboard | Specified | 10k to 42k |
| 59 | 9HA2B | On | 0.48 | 1 | 1 | Panelboard | Specified | 14k to 42k |
| 60 | 9LA2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 61 | 9LAC2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 62 | 9LAC2B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 63 | 9LB2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 64 | 9LBC2A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 65 | 9LBC2B | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 66 | 9LDPA | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 67 | 9LDPB | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 68 | CA | On | 0.48 | 1 | 1 | Other | Specified | |
| 69 | EGH1 | On | 0.48 | 1 | 1 | Other | Specified | |
| 70 | ELEV 160 | On | 0.48 | 1 | 1 | Other | Specified | |
| 71 | ELEV 560 | On | 0.48 | 1 | 1 | Other | Specified | |
| 72 | MCCA | On | 0.48 | 1 | 1 | MCC | Specified | |
| 73 | MDB | On | 0.48 | 1 | 1 | Switchboard | Specified | |
| 74 | MSB | On | 0.48 | 1 | 1 | Switchboard | Specified | |
| 75 | TX 1EL1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 76 | TX 1EL1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 77 | TX 2EL1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 78 | TX 2EL1 L | On | 0.208 | 1 | 1 | Other | Specified | |

**Buses**

| | ID Name | Status | Base kV | Area | Zone | AF Type | AF Option | Comment |
|---|---|---|---|---|---|---|---|---|
| 79 | TX 3EL1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 80 | TX 3EL1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 81 | TX 4EL1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 82 | TX 4EL1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 83 | TX 5EL1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 84 | TX 5EL1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 85 | TX 6EL1 H | On | 0.48 | 1 | 1 | Other | Specified | |
| 86 | TX 6EL1 L | On | 0.208 | 1 | 1 | Other | Specified | |
| 87 | TX NPC H | Off | 12.47 | 1 | 1 | Other | Specified | |
| 88 | TX NPC L | On | 0.48 | 1 | 1 | Other | Specified | |
| 89 | TX T1LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 90 | TX T1LDPA T1 | On | 0.208 | 1 | 1 | Other | Specified | |
| 91 | TX T2LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 92 | TX T2LDPA T2 | On | 0.208 | 1 | 1 | Other | Specified | |
| 93 | TX T5LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 94 | TX T5LDPA L | On | 0.208 | 1 | 1 | Other | Specified | |
| 95 | TX T5LDPB H | On | 0.48 | 1 | 1 | Other | Specified | |
| 96 | TX T5LDPB L | On | 0.208 | 1 | 1 | Other | Specified | |
| 97 | TX T6LAC1A H | On | 0.48 | 1 | 1 | Other | Specified | |
| 98 | TX T6LAC1A L | On | 0.208 | 1 | 1 | Other | Specified | |
| 99 | TX T6LAIA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 100 | TX T6LAIA L | On | 0.208 | 1 | 1 | Other | Specified | |
| 101 | TX T9LDPA H | On | 0.48 | 1 | 1 | Other | Specified | |
| 102 | TX T9LDPA L | On | 0.208 | 1 | 1 | Other | Specified | |
| 103 | TX T9LDPB H | On | 0.48 | 1 | 1 | Other | Specified | |
| 104 | TX T9LDPB L | On | 0.208 | 1 | 1 | Other | Specified | |
| 105 | UPS 5I | On | 0.208 | 1 | 1 | UPS | Specified | |
| 106 | UPS 5O | On | 0.208 | 1 | 1 | UPS | Specified | |
| 107 | UPS 8I | On | 0.208 | 1 | 1 | UPS | Specified | |
| 108 | UPS 8O | On | 0.208 | 1 | 1 | UPS | Specified | |
| 109 | UPS3A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 110 | UPS5A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 111 | UPS8A | On | 0.208 | 1 | 1 | Panelboard | Specified | |
| 112 | UPS9A | On | 0.208 | 1 | 1 | Panelboard | Specified | |

**Utilities**

| | ID Name | Status | To bus | Base kV | Util kV | Fault Unit | 3Ph SC1 | 3Ph SC2 | SLG SC1 | SLG SC2 | Model | MW | MVAR | CTL kV pu | MVAR Min | MVAR Max | kV pu Min | kV pu Max |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | NPC | On | TX NPC L | 0.48 | 0.48 | kA | 53.484 | 7 | 56.432 | 7 | Swing | 0 | 0 | 1 | -100000 | 100000 | 0.8 | 1.2 |

**Utilities**

| | ID Name | Ctl Angle | Ctl Bus | Ctl Base kV | R1 pu | X1 pu | R0 pu | X0 pu | Hrm RC Factor | Hrm RC Value | I Hrm Rating | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | NPC | 0 | TX NPC L | 0.48 | 0.31804 | 2.22631 | 0.26820 | 1.87741 | R-EXP | 0.5 | 120281. | |

### Generators

| | ID Name | Status | To bus | Base kV | Gen kV | Conn | MVA | Type | Power Factor | Efficiency | RPM | X/R | Model | MW | MVAR | Ctl kV pu | MVAR Min | MVAR Max |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | GEN EGH1 | On | EGH1 | 0.48 | 0.48 | YG | 0.125 | SYN-SP | 0.8 | 0.95 | 3600 | 9.79946 | PV | 0 | 0 | 1 | -100000 | 100000 |

**Generators**

| | ID Name | kV pu Min | kV pu Max | Ctl Angle | Ctl Bus | Ctl Base kV | X"dv | X'dv | X0 | Xlr | RG OHM | XG OHM | R1 pu | X1 pu | R0 pu | X0 pu | R Gnd pu | X Gnd pu |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | GEN EGH1 | 0.8 | 1.2 | 0 | EGH1 | 0.48 | 8.8 | 14.7 | 1 | | 0 | 0 | 7.18406 | 70.4 | 0.81637 | 8 | 0 | 0 |

### Generators

| | ID Name | Hrm RC Factor | Hrm RC Value | I Hrm Rating | Comment |
|---|---|---|---|---|---|
| 1 | GEN EGH1 | R-EXP | 0.5 | 150.351 | Specs Based on Typ |

**UPSs**

| | ID Name | Status | Input Bus | Output Bus | kVA | X/R | 1/2 Cycle SC | Int SC | 30 Cycle SC | Ctl kV PU | Ctl Angle | % Efficiency | % Battery | Input PF | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | UPS 5 | On | UPS 5I | UPS 5O | 40 | 4.55842 | 3 | 0 | 0 | 1 | 0 | 90 | 1 | 0.8 | |
| 2 | UPS 8 | On | UPS 8I | UPS 8O | 40 | 4.55842 | 3 | 0 | 0 | 1 | 0 | 90 | 1 | 0.8 | |

**Motors**

| | ID Name | Status | To Bus | Base kV | Unit | Model | Motor kV | Hp or kW | Type | Load Class | RPM | FLA | Power Factor | Eff | kVA/Hp | ANSI Code | Connected |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | M CA | On | CA | 0.48 | U.S. | Individual | 0.46 | 25 | Induction | Non-essential | 1800 | | 0.82 | 0.91 | | < 50 | 100 |
| 2 | M ELEV 160 | On | ELEV 160 | 0.48 | U.S. | Individual | 0.46 | 40 | Induction | Non-essential | 1800 | | 0.82 | 0.91 | | < 50 | 100 |
| 3 | M ELEV 560 | On | ELEV 560 | 0.48 | U.S. | Individual | 0.46 | 40 | Induction | Non-essential | 1800 | | 0.82 | 0.91 | | < 50 | 100 |

**Motors**

| | ID Name | X"dv or Xlr | X/R | Load Model | Motor kVA | Load Type | Load Scaling | SCADA kW | SCADA jkVar | SCADA Type | SCADA Scaling | Hrm RC Value | Hrm RC Factor | R1 pu | X1 pu | Int MF | Hrm R1 pu | Hrm X1 pu |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | M CA | 16.7 | 3.28834 | Spec | 24.9933 | kVA | 100 | 0 | 0 | kVA | 100 | 0.5 | R-EXP | 298.166 | 980.473 | 10000 | 178.542 | 587.109 |
| 2 | M ELEV 160 | 16.7 | 4.55842 | Spec | 39.9892 | kVA | 100 | 0 | 0 | kVA | 100 | 0.5 | R-EXP | 137.246 | 625.627 | 10000 | 82.1836 | 374.627 |
| 3 | M ELEV 560 | 16.7 | 4.55842 | Spec | 39.9892 | kVA | 100 | 0 | 0 | kVA | 100 | 0.5 | R-EXP | 137.246 | 625.627 | 10000 | 82.1836 | 374.627 |

**Motors**

| | ID Name | I Hrm Rating | TCC Starter | Plot TCC | Service Factor | Locked Rotor Mult | Asym Offset | Reduced Inrush Mult | Accel Time | Stall Time | Stall Time To | Largest Motor HP | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | M CA | 30.0622 | Full Volt | | 1 | 6 | 1.6 | 100 | 5 | 6 | 200 | 25 | |
| 2 | M ELEV 160 | 48.0996 | Full Volt | | 1 | 6 | 1.6 | 100 | 5 | 6 | 200 | 40 | |
| 3 | M ELEV 560 | 48.0996 | Full Volt | | 1 | 6 | 1.6 | 100 | 5 | 6 | 200 | 40 | |

**2W-Xformers**

| | ID Name | Status | From bus | From Base kV | From Conn | To Bus | To Base kV | To Conn | Type | Class | Temp | Form | From Nom kV | From Tap kV | From Gnd R | From Gnd jX | To Nom kV |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | TX 1EL1 | On | TX 1EL1 H | 0.48 | D | TX 1EL1 L | 0.208 | YG | Dry | OA | 150 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 2 | TX 2EL1 | On | TX 2EL1 H | 0.48 | D | TX 2EL1 L | 0.208 | YG | Dry | OA | 150 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 3 | TX 3EL1 | On | TX 3EL1 H | 0.48 | D | TX 3EL1 L | 0.208 | YG | Dry | OA | 150 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 4 | TX 4EL1 | On | TX 4EL1 H | 0.48 | D | TX 4EL1 L | 0.208 | YG | Dry | OA | 150 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 5 | TX 5EL1 | On | TX 5EL1 H | 0.48 | D | TX 5EL1 L | 0.208 | YG | Dry | OA | 150 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 6 | TX 6EL1 | On | TX 6EL1 H | 0.48 | D | TX 6EL1 L | 0.208 | YG | Dry | OA | 150 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 7 | TX NPC | Off | TX NPC H | 12.47 | D | TX NPC L | 0.48 | YG | Oil | OA | 65 | Core | 12.47 | 12.47 | 0 | 0 | 0.48 |
| 8 | TX T1LDPA | On | TX T1LDPA H | 0.48 | D | TX T1LDPA T1L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 9 | TX T2LDPA | On | TX T2LDPA H | 0.48 | D | TX T2LDPA T2L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 10 | TX T5LDPA | On | TX T5LDPA H | 0.48 | D | TX T5LDPA L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 11 | TX T5LDPB | On | TX T5LDPB H | 0.48 | D | TX T5LDPB L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 12 | TX T6LAC1A | On | TX T6LAC1A H | 0.48 | D | TX T6LAC1A L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 13 | TX T6LAIA | On | TX T6LAIA H | 0.48 | D | TX T6LAIA L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 14 | TX T9LDPA | On | TX T9LDPA H | 0.48 | D | TX T9LDPA L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |
| 15 | TX T9LDPB | On | TX T9LDPB H | 0.48 | D | TX T9LDPB L | 0.208 | YG | Dry | OA | 115 | Core | 0.48 | 0.48 | 0 | 0 | 0.208 |

**2W-Xformers**

| | ID Name | To Tap kV | To Gnd R | To Gnd jX | MVA | MVA O/L | Z | Z0 | X/R | LTC Tap | LTC Step | LTC Min Tap | LTC Max Tap | Ctl Type | Ctl Value | Zps R1 pu | Zps X1 pu | Zps R0 pu | Zps X0 pu |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | TX 1EL1 | 0.208 | 0 | 0 | 0.015 | 0.015 | 2.75 | 2.3375 | 1.55252 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 99.2759 | 154.127 | 10000 | 1e+007 |
| 2 | TX 2EL1 | 0.208 | 0 | 0 | 0.015 | 0.015 | 2.75 | 2.3375 | 1.55252 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 99.2759 | 154.127 | 10000 | 1e+007 |
| 3 | TX 3EL1 | 0.208 | 0 | 0 | 0.015 | 0.015 | 2.75 | 2.3375 | 1.55252 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 99.2759 | 154.127 | 10000 | 1e+007 |
| 4 | TX 4EL1 | 0.208 | 0 | 0 | 0.0225 | 0.0225 | 2.75 | 2.3375 | 1.57431 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 65.5325 | 103.168 | 10000 | 1e+007 |
| 5 | TX 5EL1 | 0.208 | 0 | 0 | 0.015 | 0.015 | 2.75 | 2.3375 | 1.55252 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 99.2759 | 154.127 | 10000 | 1e+007 |
| 6 | TX 6EL1 | 0.208 | 0 | 0 | 0.015 | 0.015 | 2.75 | 2.3375 | 1.55252 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 99.2759 | 154.127 | 10000 | 1e+007 |
| 7 | TX NPC | 0.48 | 0 | 0 | 2.5 | 2.5 | 5.31 | 4.5135 | 7.12772 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 0.29510 | 2.1034 | 10000 | 1e+007 |
| 8 | TX T1LDPA | 0.208 | 0 | 0 | 0.1125 | 0.1125 | 5 | 4.25 | 1.88578 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 20.8217 | 39.2652 | 10000 | 1e+007 |
| 9 | TX T2LDPA | 0.208 | 0 | 0 | 0.225 | 0.225 | 5 | 4.25 | 3.15937 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 6.70585 | 21.1862 | 10000 | 1e+007 |
| 10 | TX T5LDPA | 0.208 | 0 | 0 | 0.1125 | 0.1125 | 5 | 4.25 | 1.88578 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 20.8217 | 39.2652 | 10000 | 1e+007 |
| 11 | TX T5LDPB | 0.208 | 0 | 0 | 0.225 | 0.225 | 5 | 4.25 | 3.15937 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 6.70585 | 21.1862 | 10000 | 1e+007 |
| 12 | TX T6LAC1A | 0.208 | 0 | 0 | 0.075 | 0.075 | 5 | 4.25 | 1.75974 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 32.9376 | 57.9616 | 10000 | 1e+007 |
| 13 | TX T6LAIA | 0.208 | 0 | 0 | 0.075 | 0.075 | 5 | 4.25 | 1.75974 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 32.9376 | 57.9616 | 10000 | 1e+007 |
| 14 | TX T9LDPA | 0.208 | 0 | 0 | 0.1125 | 0.1125 | 5 | 4.25 | 1.88578 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 20.8217 | 39.2652 | 10000 | 1e+007 |
| 15 | TX T9LDPB | 0.208 | 0 | 0 | 0.15 | 0.15 | 5 | 4.25 | 2.41647 | None | 0.625 | 0.1 | 1500 | V (PU) | 1 | 12.7459 | 30.8001 | 10000 | 1e+007 |

**2W-Xformers**

| | ID Name | Rps0+3Rpsg | Xps0+3Xpsg | From Gnd R1 pu | From Gnd jX pu | To Gnd R1 pu | To Gnd jX pu | TCC Standard | TCC FLA Based On | Freq Fault Curve | TCC Max Plot Time | TCC Inrush FLA Mult | TCC Inrush Cycles | Hrm RC Factor | Hrm RC Value |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | TX 1EL1 | 84.38454 | 131.0087 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 2 | TX 2EL1 | 84.38454 | 131.0087 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 3 | TX 3EL1 | 84.38454 | 131.0087 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 4 | TX 4EL1 | 55.70268 | 87.69328 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 5 | TX 5EL1 | 84.38454 | 131.0087 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 6 | TX 6EL1 | 84.38454 | 131.0087 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 7 | TX NPC | 0.2508362 | 1.78789 | 0 | 0 | 0 | 0 | ANSI C57.109 | MVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 8 | TX T1LDPA | 17.69851 | 33.37549 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 9 | TX T2LDPA | 5.699978 | 18.00834 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 10 | TX T5LDPA | 17.69851 | 33.37549 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 11 | TX T5LDPB | 5.699978 | 18.00834 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 12 | TX T6LAC1A | 27.99699 | 49.26742 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 13 | TX T6LAIA | 27.99699 | 49.26742 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 14 | TX T9LDPA | 17.69851 | 33.37549 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |
| 15 | TX T9LDPB | 10.83405 | 26.18016 | 0 | 0 | 0 | 0 | ANSI C57.12.59 | kVA O/L | Yes | 500 | 8 | 6 | R-EXP | 0 |

**2W-Xformers**

| | ID Name | Hrm Pec-r % | Hrm From I Rating | Hrm To I Rating | Comment |
|---|---|---|---|---|---|
| 1 | TX 1EL1 | 15 | 18.0422 | 41.6358 | |
| 2 | TX 2EL1 | 15 | 18.0422 | 41.6358 | |
| 3 | TX 3EL1 | 15 | 18.0422 | 41.6358 | |
| 4 | TX 4EL1 | 15 | 27.0633 | 62.4537 | |
| 5 | TX 5EL1 | 15 | 18.0422 | 41.6358 | |
| 6 | TX 6EL1 | 15 | 18.0422 | 41.6358 | |
| 7 | TX NPC | 15 | 115.747 | 3007.03 | |
| 8 | TX T1LDPA | 15 | 135.316 | 312.268 | Based PS e-Saver Tx |
| 9 | TX T2LDPA | 15 | 270.633 | 624.537 | Based PS e-Saver Tx |
| 10 | TX T5LDPA | 15 | 135.316 | 312.268 | Based PS e-Saver Tx |
| 11 | TX T5LDPB | 15 | 270.633 | 624.537 | Based PS e-Saver Tx |
| 12 | TX T6LAC1A | 15 | 90.2109 | 208.179 | Based PS e-Saver Tx |
| 13 | TX T6LAIA | 15 | 90.2109 | 208.179 | Based PS e-Saver Tx |
| 14 | TX T9LDPA | 15 | 135.316 | 312.268 | Based PS e-Saver Tx |
| 15 | TX T9LDPB | 15 | 180.422 | 416.358 | Based PS e-Saver Tx |

**Cables**

| | ID Name | Status | From Bus ID | From Base kV | To Bus ID | To Base kV | Unit | Type | No/Ph | Size | Length | Temp | Insulation | Rating (A) | Material |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | C 1EH1 | On | 2EHDP | 0.48 | 1EH1 | 0.48 | U.S. | 1/C | 1 | 2 | 435 | 50 | THWN | 115 | Copper |
| 2 | C 1EL1 | On | 1EH1 | 0.48 | TX 1EL1 H | 0.48 | U.S. | 1/C | 1 | 10 | 10 | 50 | THWN | 35 | Copper |
| 3 | C 1HAIA | On | 1HDPA | 0.48 | 1HAIA | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 4 | C 1HAIB | On | 1HDPA | 0.48 | 1HAIB | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 5 | C 1HAIC | On | 1HDPA | 0.48 | 1HAIC | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 6 | C 1HDPA | On | MSB | 0.48 | 1HDPA | 0.48 | U.S. | 1/C | 2 | 500 | 475 | 50 | THWN | 760 | Copper |
| 7 | C 1LA1A | On | 1LDPA | 0.208 | 1LA1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 8 | C 1LA2A | On | 1LDPA | 0.208 | 1LA2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 9 | C 1LAC1A | On | 1LDPA | 0.208 | 1LAC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 30 | 50 | THWN | 230 | Copper |
| 10 | C 1LAC2A | On | 1LDPA | 0.208 | 1LAC2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 11 | C 1LDPA | On | TX T1LDPA T1L | 0.208 | 1LDPA | 0.208 | U.S. | 1/C | 1 | 500 | 10 | 50 | THWN | 380 | Copper |
| 12 | C 2EH1 | On | 2EHDP | 0.48 | 2EH1 | 0.48 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |
| 13 | C 2EHDP | On | ATS EH2A1 | 0.48 | 2EHDP | 0.48 | U.S. | 1/C | 1 | 3/0 | 10 | 50 | THWN | 200 | Copper |
| 14 | C 2EL1 | On | 2EH1 | 0.48 | TX 2EL1 H | 0.48 | U.S. | 1/C | 1 | 10 | 10 | 50 | THWN | 35 | Copper |
| 15 | C 2HAIA | On | 2HDPA | 0.48 | 2HAIA | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 16 | C 2HAIB | On | 2HDPA | 0.48 | 2HAIB | 0.48 | U.S. | 1/C | 1 | 500 | 10 | 50 | THWN | 380 | Copper |
| 17 | C 2HAIC | On | 2HDPA | 0.48 | 2HAIC | 0.48 | U.S. | 1/C | 1 | 4/0 | 15 | 50 | THWN | 230 | Copper |
| 18 | C 2HDPA | On | MSB | 0.48 | 2HDPA | 0.48 | U.S. | 1/C | 4 | 250 | 20 | 50 | THWN | 1020 | Copper |
| 19 | C 2HS1 | On | 2HDPA | 0.48 | 2HS1 | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 20 | C 2HS2 | On | 2HDPA | 0.48 | 2HS2 | 0.48 | U.S. | 1/C | 1 | 4/0 | 15 | 50 | THWN | 230 | Copper |
| 21 | C 2LA1A | On | 2LDPA | 0.208 | 2LA1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 22 | C 2LA1B | On | 2LDPA | 0.208 | 2LA1B | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 23 | C 2LA1KA | On | 2LDPA | 0.208 | 2LA1KA | 0.208 | U.S. | 1/C | 1 | 4/0 | 100 | 50 | THWN | 230 | Copper |
| 24 | C 2LA1KB | On | 2LDPA | 0.208 | 2LA1KB | 0.208 | U.S. | 1/C | 1 | 4/0 | 120 | 50 | THWN | 230 | Copper |
| 25 | C 2LA1KC | On | 2LDPA | 0.208 | 2LA1KC | 0.208 | U.S. | 1/C | 1 | 4/0 | 110 | 50 | THWN | 230 | Copper |
| 26 | C 2LAC1A | On | 2LDPA | 0.208 | 2LAC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 27 | C 2LDPA | On | TX T2LDPA T2L | 0.208 | 2LDPA | 0.208 | U.S. | 1/C | 2 | 500 | 10 | 50 | THWN | 760 | Copper |
| 28 | C 3EH1 | On | 2EHDP | 0.48 | 3EH1 | 0.48 | U.S. | 1/C | 1 | 2 | 250 | 50 | THWN | 115 | Copper |
| 29 | C 3EL1 | On | 3EH1 | 0.48 | TX 3EL1 H | 0.48 | U.S. | 1/C | 1 | 6 | 10 | 50 | THWN | 65 | Copper |
| 30 | C 4EH1 | On | 2EHDP | 0.48 | 4EH1 | 0.48 | U.S. | 1/C | 1 | 2 | 340 | 50 | THWN | 115 | Copper |
| 31 | C 4EL1 | On | 4EH1 | 0.48 | TX 4EL1 H | 0.48 | U.S. | 1/C | 1 | 6 | 10 | 50 | THWN | 65 | Copper |
| 32 | C 5EH1 | On | 2EHDP | 0.48 | 5EH1 | 0.48 | U.S. | 1/C | 1 | 2 | 265 | 50 | THWN | 115 | Copper |
| 33 | C 5EL1 | On | 5EH1 | 0.48 | TX 5EL1 H | 0.48 | U.S. | 1/C | 1 | 6 | 10 | 50 | THWN | 65 | Copper |
| 34 | C 5HA1A | On | 5HDPA | 0.48 | 5HA1A | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 35 | C 5HA1B | On | 5HDPA | 0.48 | 5HA1B | 0.48 | U.S. | 1/C | 1 | 350 | 20 | 50 | THWN | 310 | Copper |
| 36 | C 5HA1C | On | 5HDPA | 0.48 | 5HA1C | 0.48 | U.S. | 1/C | 1 | 350 | 20 | 50 | THWN | 310 | Copper |
| 37 | C 5HA1D | On | 5HDPA | 0.48 | 5HA1D | 0.48 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 38 | C 5HA1E | On | 5HDPA | 0.48 | 5HA1E | 0.48 | U.S. | 1/C | 1 | 4/0 | 80 | 50 | THWN | 230 | Copper |
| 39 | C 5HDPA | On | MSB | 0.48 | 5HDPA | 0.48 | U.S. | 1/C | 6 | 500 | 250 | 50 | THWN | 2280 | Copper |
| 40 | C 5LA1A | On | 5LDPA | 0.208 | 5LA1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 25 | 50 | THWN | 230 | Copper |
| 41 | C 5LAC1A | On | 5LDPA | 0.208 | 5LAC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 42 | C 5LAC1B | On | 5LDPA | 0.208 | 5LAC1B | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 43 | C 5LB1A | On | 5LDPB | 0.208 | 5LB1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 44 | C 5LB1B | On | 5LDPB | 0.208 | 5LB1B | 0.208 | U.S. | 1/C | 1 | 4/0 | 40 | 50 | THWN | 230 | Copper |
| 45 | C 5LB1C | On | 5LDPB | 0.208 | 5LB1C | 0.208 | U.S. | 1/C | 1 | 4/0 | 140 | 50 | THWN | 230 | Copper |
| 46 | C 5LBC1A | On | 5LDPB | 0.208 | 5LBC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 47 | C 5LBC1B | On | 5LDPB | 0.208 | 5LBC1B | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 48 | C 5LDPA | On | TX T5LDPA L | 0.208 | 5LDPA | 0.208 | U.S. | 1/C | 1 | 500 | 10 | 50 | THWN | 380 | Copper |
| 49 | C 5LDPB | On | TX T5LDPB L | 0.208 | 5LDPB | 0.208 | U.S. | 1/C | 2 | 500 | 10 | 50 | THWN | 760 | Copper |
| 50 | C 6EH1 | On | 2EHDP | 0.48 | 6EH1 | 0.48 | U.S. | 1/C | 1 | 2 | 150 | 50 | THWN | 115 | Copper |
| 51 | C 6EL1 | On | 6EH1 | 0.48 | TX 6EL1 H | 0.48 | U.S. | 1/C | 1 | 10 | 30 | 50 | THWN | 35 | Copper |
| 52 | C 6HAIA | On | 6HDPA | 0.48 | 6HAIA | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 53 | C 6HAIB | On | 6HDPA | 0.48 | 6HAIB | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 54 | C 6HAIC | On | 6HDPA | 0.48 | 6HAIC | 0.48 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 55 | C 6HDPA | On | MSB | 0.48 | 6HDPA | 0.48 | U.S. | 1/C | 4 | 250 | 135 | 50 | THWN | 1020 | Copper |
| 56 | C 6LAC1A | On | TX T6LAC1A L | 0.208 | 6LAC1A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 57 | C 6LAIA | On | TX T6LAIA L | 0.208 | 6LAIA | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 58 | C 9HA2A | On | 5HDPA | 0.48 | 9HA2A | 0.48 | U.S. | 1/C | 1 | 350 | 50 | 50 | THWN | 310 | Copper |
| 59 | C 9HA2B | On | 5HDPA | 0.48 | 9HA2B | 0.48 | U.S. | 1/C | 1 | 4/0 | 50 | 50 | THWN | 230 | Copper |
| 60 | C 9LA2A | On | 9LDPA | 0.208 | 9LA2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 20 | 50 | THWN | 230 | Copper |
| 61 | C 9LAC2A | On | 9LDPA | 0.208 | 9LAC2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 10 | 50 | THWN | 230 | Copper |
| 62 | C 9LAC2B | On | 9LDPA | 0.208 | 9LAC2B | 0.208 | U.S. | 1/C | 1 | 4/0 | 15 | 50 | THWN | 230 | Copper |
| 63 | C 9LB2A | On | 9LDPB | 0.208 | 9LB2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 11 | 50 | THWN | 230 | Copper |
| 64 | C 9LBC2A | On | 9LDPB | 0.208 | 9LBC2A | 0.208 | U.S. | 1/C | 1 | 4/0 | 11 | 50 | THWN | 230 | Copper |
| 65 | C 9LBC2B | On | 9LDPB | 0.208 | 9LBC2B | 0.208 | U.S. | 1/C | 1 | 4/0 | 11 | 50 | THWN | 230 | Copper |
| 66 | C 9LDPA | On | TX T9LDPA L | 0.208 | 9LDPA | 0.208 | U.S. | 1/C | 1 | 500 | 15 | 50 | THWN | 380 | Copper |
| 67 | C 9LDPB | On | TX T9LDPB L | 0.208 | 9LDPB | 0.208 | U.S. | 1/C | 2 | 250 | 15 | 50 | THWN | 510 | Copper |
| 68 | C CA | On | 5HDPA | 0.48 | CA | 0.48 | U.S. | 1/C | 1 | 4 | 160 | 50 | THWN | 85 | Copper |
| 69 | C EGH1-ATS E | On | EGH1 | 0.48 | ATS EH2A1 | 0.48 | U.S. | 1/C | 1 | 3/0 | 50 | 50 | THWN | 200 | Copper |
| 70 | C ELEV 160 | On | 1HDPA | 0.48 | ELEV 160 | 0.48 | U.S. | 1/C | 1 | 4 | 165 | 50 | THWN | 85 | Copper |
| 71 | C ELEV 560 | On | 5HDPA | 0.48 | ELEV 560 | 0.48 | U.S. | 1/C | 1 | 6 | 35 | 50 | THWN | 65 | Copper |
| 72 | C MCCA | On | MSB | 0.48 | MCCA | 0.48 | U.S. | 1/C | 1 | 500 | 50 | 50 | THWN | 380 | Copper |
| 73 | C MDB | On | TX NPC L | 0.48 | MDB | 0.48 | U.S. | 1/C | 11 | 500 | 35 | 50 | THWN | 4180 | Copper |
| 74 | C MSB | On | MDB | 0.48 | MSB | 0.48 | U.S. | 1/C | 11 | 500 | 10 | 50 | THWN | 4180 | Copper |
| 75 | C MSB-ATS EH | On | MSB | 0.48 | ATS EH2A1 | 0.48 | U.S. | 1/C | 1 | 3/0 | 25 | 50 | THWN | 200 | Copper |
| 76 | C TX T1LDPA | On | 1HDPA | 0.48 | TX T1LDPA H | 0.48 | U.S. | 1/C | 1 | 2/0 | 10 | 50 | THWN | 175 | Copper |
| 77 | C TX T2LDPA | On | 2HDPA | 0.48 | TX T2LDPA H | 0.48 | U.S. | 1/C | 1 | 500 | 30 | 50 | THWN | 380 | Copper |

**Cables**

| | ID Name | Raceway Type | Raceway Mtl | R1 | X1 | R0 | X0 | Xc | Xc0 | Gnd Num | Gnd Size | Gnd Mtl | Gnd Type | Gnd Insul | Neutral Num | Neutral Size | Neutral Rating |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | C 1EH1 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 2 | C 1EL1 | Conduit | Steel | 1.13918 | 0.04271 | 4.55673 | 0.17084 | 0.00814 | 0.00814 | 1 | 10 | Copper | Separate | Yes | 0 | Other | 10 |
| 3 | C 1HAIA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 4 | C 1HAIB | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 5 | C 1HAIC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 6 | C 1HDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 2 | 1/0 | Copper | Separate | Yes | 2 | 500 | 10 |
| 7 | C 1LA1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 8 | C 1LA2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 9 | C 1LAC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 10 | C 1LAC2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 11 | C 1LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 2 | 500 | 10 |
| 12 | C 2EH1 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 13 | C 2EHDP | Conduit | Steel | 0.07046 | 0.03914 | 0.28184 | 0.15658 | 0.00530 | 0.00530 | 1 | 6 | Copper | Separate | Yes | 1 | 3/0 | 10 |
| 14 | C 2EL1 | Conduit | Steel | 1.13918 | 0.04271 | 4.55673 | 0.17084 | 0.00814 | 0.00814 | 1 | 10 | Copper | Separate | Yes | 0 | Other | 10 |
| 15 | C 2HAIA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 16 | C 2HAIB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 1 | 500 | 10 |
| 17 | C 2HAIC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 18 | C 2HDPA | Conduit | Steel | 0.04860 | 0.03903 | 0.19442 | 0.15612 | 0.00521 | 0.00521 | 4 | 2/0 | Copper | Separate | Yes | 4 | 250 | 10 |
| 19 | C 2HS1 | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 20 | C 2HS2 | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 21 | C 2LA1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 22 | C 2LA1B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 23 | C 2LA1KA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 24 | C 2LA1KB | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 25 | C 2LA1KC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 26 | C 2LAC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 27 | C 2LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 2 | 1/0 | Copper | Separate | Yes | 4 | 500 | 10 |
| 28 | C 3EH1 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 29 | C 3EL1 | Conduit | Steel | 0.45045 | 0.04222 | 1.80182 | 0.16890 | 0.00776 | 0.00776 | 1 | 10 | Copper | Separate | Yes | 0 | Other | 10 |
| 30 | C 4EH1 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 31 | C 4EL1 | Conduit | Steel | 0.45045 | 0.04222 | 1.80182 | 0.16890 | 0.00776 | 0.00776 | 1 | 10 | Copper | Separate | Yes | 0 | Other | 10 |
| 32 | C 5EH1 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 33 | C 5EL1 | Conduit | Steel | 0.45045 | 0.04222 | 1.80182 | 0.16890 | 0.00776 | 0.00776 | 1 | 10 | Copper | Separate | Yes | 0 | Other | 10 |
| 34 | C 5HA1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 35 | C 5HA1B | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 1 | 4 | Copper | Separate | Yes | 1 | 350 | 10 |
| 36 | C 5HA1C | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 1 | 4 | Copper | Separate | Yes | 1 | 350 | 10 |
| 37 | C 5HA1D | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 38 | C 5HA1E | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 39 | C 5HDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 6 | 250 | Copper | Separate | Yes | 6 | 500 | 10 |
| 40 | C 5LA1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 41 | C 5LAC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 42 | C 5LAC1B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 43 | C 5LB1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 44 | C 5LB1B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 45 | C 5LB1C | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 46 | C 5LBC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 47 | C 5LBC1B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 48 | C 5LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 2 | 500 | 10 |
| 49 | C 5LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 2 | 1/0 | Copper | Separate | Yes | 4 | 500 | 10 |
| 50 | C 6EH1 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 8 | Copper | Separate | Yes | 1 | 2 | 10 |
| 51 | C 6EL1 | Conduit | Steel | 1.13918 | 0.04271 | 4.55673 | 0.17084 | 0.00814 | 0.00814 | 1 | 10 | Copper | Separate | Yes | 0 | Other | 10 |
| 52 | C 6HAIA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 53 | C 6HAIB | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 54 | C 6HAIC | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 55 | C 6HDPA | Conduit | Steel | 0.04860 | 0.03903 | 0.19442 | 0.15612 | 0.00521 | 0.00521 | 4 | 2/0 | Copper | Separate | Yes | 4 | 250 | 10 |
| 56 | C 6LAC1A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 57 | C 6LAIA | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 58 | C 9HA2A | Conduit | Steel | 0.03565 | 0.03809 | 0.14262 | 0.15236 | 0.00446 | 0.00446 | 1 | 4 | Copper | Separate | Yes | 1 | 350 | 10 |
| 59 | C 9HA2B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 60 | C 9LA2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 61 | C 9LAC2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 62 | C 9LAC2B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 63 | C 9LB2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 1 | 4/0 | 10 |
| 64 | C 9LBC2A | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 65 | C 9LBC2B | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 2 | 4/0 | 10 |
| 66 | C 9LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 2 | 500 | 10 |
| 67 | C 9LDPB | Conduit | Steel | 0.04860 | 0.03903 | 0.19442 | 0.15612 | 0.00521 | 0.00521 | 2 | 2 | Copper | Separate | Yes | 4 | 250 | 10 |
| 68 | C CA | Conduit | Steel | 0.28320 | 0.04271 | 1.13283 | 0.17084 | 0.00814 | 0.00814 | 1 | 8 | Copper | Separate | Yes | 1 | 4 | 10 |
| 69 | C EGH1-ATS E | Conduit | Steel | 0.07046 | 0.03914 | 0.28184 | 0.15658 | 0.00530 | 0.00530 | 1 | 6 | Copper | Separate | Yes | 1 | 3/0 | 10 |
| 70 | C ELEV 160 | Conduit | Steel | 0.28320 | 0.04271 | 1.13283 | 0.17084 | 0.00814 | 0.00814 | 1 | 8 | Copper | Separate | Yes | 1 | 4 | 10 |
| 71 | C ELEV 560 | Conduit | Steel | 0.45045 | 0.04222 | 1.80182 | 0.16890 | 0.00776 | 0.00776 | 1 | 10 | Copper | Separate | Yes | 1 | 6 | 10 |
| 72 | C MCCA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 0 | Other | 10 |
| 73 | C MDB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 11 | 500 | Copper | Separate | Yes | 11 | 500 | 10 |
| 74 | C MSB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 11 | 500 | Copper | Separate | Yes | 11 | 500 | 10 |
| 75 | C MSB-ATS EH | Conduit | Steel | 0.07046 | 0.03914 | 0.28184 | 0.15658 | 0.00530 | 0.00530 | 1 | 6 | Copper | Separate | Yes | 1 | 3/0 | 10 |
| 76 | C TX T1LDPA | Conduit | Steel | 0.08883 | 0.03987 | 0.35532 | 0.15950 | 0.00588 | 0.00588 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 77 | C TX T2LDPA | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 0 | Other | 10 |

**Cables**

| | ID Name | Neutral Mtl | Neutral Insul | Conductor Lay | Conductor Form | Spacing | R1 pu | X1 pu | R0 pu | X0 pu | B1 pu | B0 pu | Hrm RC Factor | Hrm RC Value | I Hrm Rating | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | C 1EH1 | Copper | Yes | Triangle | Round | 0 | 33.6464 | 7.71154 | 134.585 | 30.8461 | 1.50526 | 1.50526 | R-EXP | 0.5 | 115 | |
| 2 | C 1EL1 | Copper | Yes | Triangle | Round | 0 | 4.94435 | 0.18537 | 19.7774 | 0.74150 | 2.82819 | 2.82819 | R-EXP | 0.5 | 35 | |
| 3 | C 1HAIA | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 4 | C 1HAIB | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 5 | C 1HAIC | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 6 | C 1HDPA | Copper | Yes | Triangle | Round | 0 | 2.69401 | 3.83901 | 10.7760 | 15.3560 | 5.78180 | 5.78180 | R-EXP | 0.5 | 760 | |
| 7 | C 1LA1A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 8 | C 1LA2A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 9 | C 1LAC1A | Copper | Yes | Triangle | Round | 0 | 3.87440 | 2.66798 | 15.4976 | 10.6719 | 2.72143 | 2.72143 | R-EXP | 0.5 | 230 | |
| 10 | C 1LAC2A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 11 | C 1LDPA | Copper | Yes | Triangle | Round | 0 | 0.60407 | 0.86081 | 2.41630 | 3.44327 | 1.14283 | 1.14283 | R-EXP | 0.5 | 380 | |
| 12 | C 2EH1 | Copper | Yes | Triangle | Round | 0 | 0.77348 | 0.17727 | 3.09391 | 0.70910 | 3.46038 | 3.46038 | R-EXP | 0.5 | 115 | |
| 13 | C 2EHDP | Copper | Yes | Triangle | Round | 0 | 0.30582 | 0.16990 | 1.22329 | 0.67963 | 4.34361 | 4.34361 | R-EXP | 0.5 | 200 | |
| 14 | C 2EL1 | Copper | Yes | Triangle | Round | 0 | 4.94435 | 0.18537 | 19.7774 | 0.74150 | 2.82819 | 2.82819 | R-EXP | 0.5 | 35 | |
| 15 | C 2HAIA | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 16 | C 2HAIB | Copper | Yes | Triangle | Round | 0 | 0.11343 | 0.16164 | 0.45372 | 0.64657 | 6.08610 | 6.08610 | R-EXP | 0.5 | 380 | |
| 17 | C 2HAIC | Copper | Yes | Triangle | Round | 0 | 0.36376 | 0.25049 | 1.45505 | 1.00197 | 7.24642 | 7.24642 | R-EXP | 0.5 | 230 | |
| 18 | C 2HDPA | Copper | Yes | Triangle | Round | 0 | 0.10548 | 0.08470 | 0.42193 | 0.33881 | 3.53652 | 3.53652 | R-EXP | 0.5 | 1020 | |
| 19 | C 2HS1 | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 20 | C 2HS2 | Copper | Yes | Triangle | Round | 0 | 0.36376 | 0.25049 | 1.45505 | 1.00197 | 7.24642 | 7.24642 | R-EXP | 0.5 | 230 | |
| 21 | C 2LA1A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 22 | C 2LA1B | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 23 | C 2LA1KA | Copper | Yes | Triangle | Round | 0 | 12.9146 | 8.89328 | 51.6586 | 35.5732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 24 | C 2LA1KB | Copper | Yes | Triangle | Round | 0 | 15.4976 | 10.6719 | 61.9903 | 42.6878 | 1.08857 | 1.08857 | R-EXP | 0.5 | 230 | |
| 25 | C 2LA1KC | Copper | Yes | Triangle | Round | 0 | 14.2061 | 9.78261 | 56.8245 | 39.1305 | 9.97859 | 9.97859 | R-EXP | 0.5 | 230 | |
| 26 | C 2LAC1A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 27 | C 2LDPA | Copper | Yes | Triangle | Round | 0 | 0.30203 | 0.43040 | 1.20815 | 1.72163 | 2.28567 | 2.28567 | R-EXP | 0.5 | 760 | |
| 28 | C 3EH1 | Copper | Yes | Triangle | Round | 0 | 19.3370 | 4.43192 | 77.3478 | 17.7276 | 8.65097 | 8.65097 | R-EXP | 0.5 | 115 | |
| 29 | C 3EL1 | Copper | Yes | Triangle | Round | 0 | 1.95510 | 0.18327 | 7.8204 | 0.73310 | 2.96882 | 2.96882 | R-EXP | 0.5 | 65 | |
| 30 | C 4EH1 | Copper | Yes | Triangle | Round | 0 | 26.2983 | 6.02741 | 105.193 | 24.1096 | 1.17653 | 1.17653 | R-EXP | 0.5 | 115 | |
| 31 | C 4EL1 | Copper | Yes | Triangle | Round | 0 | 1.95510 | 0.18327 | 7.8204 | 0.73310 | 2.96882 | 2.96882 | R-EXP | 0.5 | 65 | |
| 32 | C 5EH1 | Copper | Yes | Triangle | Round | 0 | 20.4972 | 4.69783 | 81.9887 | 18.7913 | 9.17003 | 9.17003 | R-EXP | 0.5 | 115 | |
| 33 | C 5EL1 | Copper | Yes | Triangle | Round | 0 | 1.95510 | 0.18327 | 7.8204 | 0.73310 | 2.96882 | 2.96882 | R-EXP | 0.5 | 65 | |
| 34 | C 5HA1A | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 35 | C 5HA1B | Copper | Yes | Triangle | Round | 0 | 0.30952 | 0.33065 | 1.23808 | 1.32262 | 1.03254 | 1.03254 | R-EXP | 0.5 | 310 | |
| 36 | C 5HA1C | Copper | Yes | Triangle | Round | 0 | 0.30952 | 0.33065 | 1.23808 | 1.32262 | 1.03254 | 1.03254 | R-EXP | 0.5 | 310 | |
| 37 | C 5HA1D | Copper | Yes | Triangle | Round | 0 | 0.48501 | 0.33399 | 1.94007 | 1.33597 | 9.66189 | 9.66189 | R-EXP | 0.5 | 230 | |
| 38 | C 5HA1E | Copper | Yes | Triangle | Round | 0 | 1.94007 | 1.33596 | 7.76027 | 5.34389 | 3.86475 | 3.86475 | R-EXP | 0.5 | 230 | |
| 39 | C 5HDPA | Copper | Yes | Triangle | Round | 0 | 0.47263 | 0.67351 | 1.89053 | 2.69404 | 9.12916 | 9.12916 | R-EXP | 0.5 | 2280 | |
| 40 | C 5LA1A | Copper | Yes | Triangle | Round | 0 | 3.22867 | 2.22332 | 12.9146 | 8.89330 | 2.26786 | 2.26786 | R-EXP | 0.5 | 230 | |
| 41 | C 5LAC1A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 42 | C 5LAC1B | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 43 | C 5LB1A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 44 | C 5LB1B | Copper | Yes | Triangle | Round | 0 | 5.16587 | 3.55731 | 20.6634 | 14.2292 | 3.62857 | 3.62857 | R-EXP | 0.5 | 230 | |
| 45 | C 5LB1C | Copper | Yes | Triangle | Round | 0 | 18.0805 | 12.4506 | 72.3221 | 49.8025 | 1.27000 | 1.27000 | R-EXP | 0.5 | 230 | |
| 46 | C 5LBC1A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 47 | C 5LBC1B | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 48 | C 5LDPA | Copper | Yes | Triangle | Round | 0 | 0.60407 | 0.86081 | 2.41630 | 3.44327 | 1.14283 | 1.14283 | R-EXP | 0.5 | 380 | |
| 49 | C 5LDPB | Copper | Yes | Triangle | Round | 0 | 0.30203 | 0.43040 | 1.20815 | 1.72163 | 2.28567 | 2.28567 | R-EXP | 0.5 | 760 | |
| 50 | C 6EH1 | Copper | Yes | Triangle | Round | 0 | 11.6022 | 2.65915 | 46.4087 | 10.6365 | 5.19058 | 5.19058 | R-EXP | 0.5 | 115 | |
| 51 | C 6EL1 | Copper | Yes | Triangle | Round | 0 | 14.8330 | 0.55613 | 59.3324 | 2.22451 | 8.48459 | 8.48459 | R-EXP | 0.5 | 35 | |
| 52 | C 6HAIA | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 53 | C 6HAIB | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 54 | C 6HAIC | Copper | Yes | Triangle | Round | 0 | 0.24250 | 0.16699 | 0.97003 | 0.66798 | 4.83094 | 4.83094 | R-EXP | 0.5 | 230 | |
| 55 | C 6HDPA | Copper | Yes | Triangle | Round | 0 | 0.71201 | 0.57174 | 2.84808 | 2.28697 | 2.38715 | 2.38715 | R-EXP | 0.5 | 1020 | |
| 56 | C 6LAC1A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 57 | C 6LAIA | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 58 | C 9HA2A | Copper | Yes | Triangle | Round | 0 | 0.77380 | 0.82664 | 3.09520 | 3.30655 | 2.58135 | 2.58135 | R-EXP | 0.5 | 310 | |
| 59 | C 9HA2B | Copper | Yes | Triangle | Round | 0 | 1.21254 | 0.83498 | 4.85017 | 3.33993 | 2.41547 | 2.41547 | R-EXP | 0.5 | 230 | |
| 60 | C 9LA2A | Copper | Yes | Triangle | Round | 0 | 2.58293 | 1.77865 | 10.3317 | 7.11464 | 1.81429 | 1.81429 | R-EXP | 0.5 | 230 | |
| 61 | C 9LAC2A | Copper | Yes | Triangle | Round | 0 | 1.29146 | 0.88932 | 5.16586 | 3.55732 | 9.07144 | 9.07144 | R-EXP | 0.5 | 230 | |
| 62 | C 9LAC2B | Copper | Yes | Triangle | Round | 0 | 1.93720 | 1.33399 | 7.74879 | 5.33598 | 1.36071 | 1.36071 | R-EXP | 0.5 | 230 | |
| 63 | C 9LB2A | Copper | Yes | Triangle | Round | 0 | 1.42061 | 0.97826 | 5.68245 | 3.91305 | 9.97859 | 9.97859 | R-EXP | 0.5 | 230 | |
| 64 | C 9LBC2A | Copper | Yes | Triangle | Round | 0 | 1.42061 | 0.97826 | 5.68245 | 3.91305 | 9.97859 | 9.97859 | R-EXP | 0.5 | 230 | |
| 65 | C 9LBC2B | Copper | Yes | Triangle | Round | 0 | 1.42061 | 0.97826 | 5.68245 | 3.91305 | 9.97859 | 9.97859 | R-EXP | 0.5 | 230 | |
| 66 | C 9LDPA | Copper | Yes | Triangle | Round | 0 | 0.90611 | 1.29122 | 3.62445 | 5.16491 | 1.71425 | 1.71425 | R-EXP | 0.5 | 380 | |
| 67 | C 9LDPB | Copper | Yes | Triangle | Round | 0 | 0.84262 | 0.67661 | 3.37051 | 2.70647 | 2.49030 | 2.49030 | R-EXP | 0.5 | 510 | |
| 68 | C CA | Copper | Yes | Triangle | Round | 0 | 19.6670 | 2.96603 | 78.6687 | 11.8641 | 4.52511 | 4.52511 | R-EXP | 0.5 | 85 | |
| 69 | C EGH1-ATS E | Copper | Yes | Triangle | Round | 0 | 1.52911 | 0.84954 | 6.11647 | 3.39817 | 2.17180 | 2.17180 | R-EXP | 0.5 | 200 | |
| 70 | C ELEV 160 | Copper | Yes | Triangle | Round | 0 | 20.2816 | 3.05872 | 81.1271 | 12.2348 | 4.66652 | 4.66652 | R-EXP | 0.5 | 85 | |
| 71 | C ELEV 560 | Copper | Yes | Triangle | Round | 0 | 6.84286 | 0.64146 | 27.3714 | 2.56587 | 1.03908 | 1.03908 | R-EXP | 0.5 | 65 | |
| 72 | C MCCA | Copper | Yes | Triangle | Round | 0 | 0.56716 | 0.80821 | 2.26864 | 3.23285 | 3.04305 | 3.04305 | R-EXP | 0.5 | 380 | |
| 73 | C MDB | Copper | Yes | Triangle | Round | 0 | 0.03609 | 0.05143 | 0.14436 | 0.20572 | 2.34315 | 2.34315 | R-EXP | 0.5 | 4180 | |
| 74 | C MSB | Copper | Yes | Triangle | Round | 0 | 0.01031 | 0.01469 | 0.04124 | 0.05877 | 6.69471 | 6.69471 | R-EXP | 0.5 | 4180 | |
| 75 | C MSB-ATS EH | Copper | Yes | Triangle | Round | 0 | 0.76455 | 0.42477 | 3.05823 | 1.69908 | 1.08590 | 1.08590 | R-EXP | 0.5 | 200 | |
| 76 | C TX T1LDPA | Copper | Yes | Triangle | Round | 0 | 0.38555 | 0.17307 | 1.54220 | 0.69228 | 3.91481 | 3.91481 | R-EXP | 0.5 | 175 | |
| 77 | C TX T2LDPA | Copper | Yes | Triangle | Round | 0 | 0.34029 | 0.48492 | 1.36118 | 1.93971 | 1.82583 | 1.82583 | R-EXP | 0.5 | 380 | |

**Cables**

| | ID Name | Status | From Bus ID | From Base kV | To Bus ID | To Base kV | Unit | Type | No/Ph | Size | Length | Temp | Insulation | Rating (A) | Material |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | C TX T5LDPA | On | 5HDPA | 0.48 | TX T5LDPA H | 0.48 | U.S. | 1/C | 1 | 2/0 | 10 | 50 | THWN | 175 | Copper |
| 79 | C TX T5LDPB | On | 5HDPA | 0.48 | TX T5LDPB H | 0.48 | U.S. | 1/C | 1 | 500 | 105 | 50 | THWN | 380 | Copper |
| 80 | C TX T6LAC1A | On | 6HDPA | 0.48 | TX T6LAC1A H | 0.48 | U.S. | 1/C | 1 | 1 | 10 | 50 | THWN | 130 | Copper |
| 81 | C TX T6LAIA | On | 6HDPA | 0.48 | TX T6LAIA H | 0.48 | U.S. | 1/C | 1 | 1 | 15 | 50 | THWN | 130 | Copper |
| 82 | C TX T9LDPA | On | 5HDPA | 0.48 | TX T9LDPA H | 0.48 | U.S. | 1/C | 1 | 2/0 | 50 | 50 | THWN | 175 | Copper |
| 83 | C TX T9LDPB | On | 5HDPA | 0.48 | TX T9LDPB H | 0.48 | U.S. | 1/C | 1 | 4/0 | 160 | 50 | THWN | 230 | Copper |
| 84 | C UPS 5 | On | 5EL1 | 0.208 | UPS 5I | 0.208 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |
| 85 | C UPS 8 | On | 3EL1 | 0.208 | UPS 8I | 0.208 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |
| 86 | C UPS3A | On | UPS8A | 0.208 | UPS3A | 0.208 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |
| 87 | C UPS5A | On | UPS 5O | 0.208 | UPS5A | 0.208 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |
| 88 | C UPS8A | On | UPS 8O | 0.208 | UPS8A | 0.208 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |
| 89 | C UPS9A | On | UPS5A | 0.208 | UPS9A | 0.208 | U.S. | 1/C | 1 | 2 | 10 | 50 | THWN | 115 | Copper |

**Cables**

| | ID Name | Raceway Type | Raceway Mtl | R1 | X1 | R0 | X0 | Xc | Xc0 | Gnd Num | Gnd Size | Gnd Mtl | Gnd Type | Gnd Insul | Neutral Num | Neutral Size | Neutral Rating |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | C TX T5LDPA | Conduit | Steel | 0.08883 | 0.03987 | 0.35532 | 0.15950 | 0.00588 | 0.00588 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 79 | C TX T5LDPB | Conduit | Steel | 0.02613 | 0.03724 | 0.10453 | 0.14897 | 0.00378 | 0.00378 | 1 | 2 | Copper | Separate | Yes | 0 | Other | 10 |
| 80 | C TX T6LAC1A | Conduit | Steel | 0.14127 | 0.04157 | 0.56509 | 0.16629 | 0.00723 | 0.00723 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 81 | C TX T6LAIA | Conduit | Steel | 0.14127 | 0.04157 | 0.56509 | 0.16629 | 0.00723 | 0.00723 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 82 | C TX T9LDPA | Conduit | Steel | 0.08883 | 0.03987 | 0.35532 | 0.15950 | 0.00588 | 0.00588 | 1 | 6 | Copper | Separate | Yes | 0 | Other | 10 |
| 83 | C TX T9LDPB | Conduit | Steel | 0.05587 | 0.03847 | 0.22349 | 0.15390 | 0.00476 | 0.00476 | 1 | 4 | Copper | Separate | Yes | 0 | Other | 10 |
| 84 | C UPS 5 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 6 | Copper | Separate | Yes | 2 | Other | 10 |
| 85 | C UPS 8 | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 6 | Copper | Separate | Yes | 2 | Other | 10 |
| 86 | C UPS3A | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 6 | Copper | Separate | Yes | 2 | Other | 10 |
| 87 | C UPS5A | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 6 | Copper | Separate | Yes | 2 | Other | 10 |
| 88 | C UPS8A | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 6 | Copper | Separate | Yes | 2 | Other | 10 |
| 89 | C UPS9A | Conduit | Steel | 0.17821 | 0.04084 | 0.71283 | 0.16337 | 0.00665 | 0.00665 | 1 | 6 | Copper | Separate | Yes | 2 | Other | 10 |

**Cables**

| | ID Name | Neutral Mtl | Neutral Insul | Conductor Lay | Conductor Form | Spacing | R1 pu | X1 pu | R0 pu | X0 pu | B1 pu | B0 pu | Hrm RC Factor | Hrm RC Value | I Hrm Rating | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | C TX T5LDPA | Copper | Yes | Triangle | Round | 0 | 0.38555 | 0.17307 | 1.54220 | 0.69228 | 3.91481 | 3.91481 | R-EXP | 0.5 | 175 | |
| 79 | C TX T5LDPB | Copper | Yes | Triangle | Round | 0 | 1.19103 | 1.69724 | 4.76414 | 6.78899 | 6.39041 | 6.39041 | R-EXP | 0.5 | 380 | |
| 80 | C TX T6LAC1A | Copper | Yes | Triangle | Round | 0 | 0.61316 | 0.18044 | 2.45268 | 0.72176 | 3.18240 | 3.18240 | R-EXP | 0.5 | 130 | |
| 81 | C TX T6LAIA | Copper | Yes | Triangle | Round | 0 | 0.91975 | 0.27066 | 3.67902 | 1.08265 | 4.77361 | 4.77361 | R-EXP | 0.5 | 130 | |
| 82 | C TX T9LDPA | Copper | Yes | Triangle | Round | 0 | 1.92775 | 0.86535 | 7.71100 | 3.46141 | 1.95740 | 1.95740 | R-EXP | 0.5 | 175 | |
| 83 | C TX T9LDPB | Copper | Yes | Triangle | Round | 0 | 3.88014 | 2.67193 | 15.5205 | 10.6877 | 7.72951 | 7.72951 | R-EXP | 0.5 | 230 | |
| 84 | C UPS 5 | Copper | Yes | Triangle | Round | 0 | 4.11912 | 0.94407 | 16.4764 | 3.77630 | 6.49784 | 6.49784 | R-EXP | 0.5 | 115 | |
| 85 | C UPS 8 | Copper | Yes | Triangle | Round | 0 | 4.11912 | 0.94407 | 16.4764 | 3.77630 | 6.49784 | 6.49784 | R-EXP | 0.5 | 115 | |
| 86 | C UPS3A | Copper | Yes | Triangle | Round | 0 | 4.11912 | 0.94407 | 16.4764 | 3.77630 | 6.49784 | 6.49784 | R-EXP | 0.5 | 115 | |
| 87 | C UPS5A | Copper | Yes | Triangle | Round | 0 | 4.11912 | 0.94407 | 16.4764 | 3.77630 | 6.49784 | 6.49784 | R-EXP | 0.5 | 115 | |
| 88 | C UPS8A | Copper | Yes | Triangle | Round | 0 | 4.11912 | 0.94407 | 16.4764 | 3.77630 | 6.49784 | 6.49784 | R-EXP | 0.5 | 115 | |
| 89 | C UPS9A | Copper | Yes | Triangle | Round | 0 | 4.11912 | 0.94407 | 16.4764 | 3.77630 | 6.49784 | 6.49784 | R-EXP | 0.5 | 115 | |

**LV Breakers**

| | ID Name | Status | On Bus | Base kV | Conn Type | Class | Options | Breaker Mfr | Breaker Type | Breaker Style | Cont Current (A) | SC Int kA | SC Test Std |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 1EH1 | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 2 | B 1EH1-FDR | On | 1EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 20 | 14 | ANSI-SYM |
| 3 | B 1EL1 | On | 1EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 30 | 14 | ANSI-SYM |
| 4 | B 1EL1- HI MAI | On | TX 1EL1 H | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TED (600V) | 40 | 18 | ANSI-SYM |
| 5 | B 1EL1-FDR | On | 1EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 20 | 10 | ANSI-SYM |
| 6 | B 1EL1-MAIN | On | 1EL1 | 0.208 | Bus Tie | MCCB | Breaker Onl | GE | Q Line | THQL | 50 | 10 | ANSI-SYM |
| 7 | B 1HAIA | On | 1HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 35 | ANSI-SYM |
| 8 | B 1HAIA-FDR | On | 1HAIA | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 9 | B 1HAIB | On | 1HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 35 | ANSI-SYM |
| 10 | B 1HAIB-FDR | On | 1HAIB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 11 | B 1HAIC | On | 1HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 225 | 35 | ANSI-SYM |
| 12 | B 1HAIC-FDR | On | 1HAIC | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 13 | B 1HDPA | On | MSB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKL8 | 800 | 65 | ANSI-SYM |
| 14 | B 1HDPA-MAIN | On | 1HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKH8 | 800 | 50 | ANSI-SYM |
| 15 | B 1LA1A | On | 1LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 16 | B 1LA1A-FDR | On | 1LA1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 17 | B 1LA2A | On | 1LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 18 | B 1LA2A-FDR | On | 1LA2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 19 | B 1LAC1A | On | 1LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 20 | B 1LAC1A-FDR | On | 1LAC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 21 | B 1LAC2A | On | 1LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 22 | B 1LDPA-FDR | On | 1LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEB | 100 | 10 | ANSI-SYM |
| 23 | B 1LDPA-MAIN | On | 1LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGD | 400 | 65 | ANSI-SYM |
| 24 | B 2EH1 | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 25 | B 2EH1-FDR | On | 2EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 26 | B 2EH1-MAIN | On | 2EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 100 | 65 | ANSI-SYM |
| 27 | B 2EHDP-MAIN | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 200 | 65 | ANSI-SYM |
| 28 | B 2EL1 | On | 2EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 30 | 65 | ANSI-SYM |
| 29 | B 2EL1- HI MAI | On | TX 2EL1 H | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TED (600V) | 40 | 18 | ANSI-SYM |
| 30 | B 2EL1-FDR | On | 2EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 20 | 10 | ANSI-SYM |
| 31 | B 2EL1-MAIN | On | 2EL1 | 0.208 | Bus Tie | MCCB | Breaker Onl | GE | Q Line | THQL | 50 | 10 | ANSI-SYM |
| 32 | B 2HAIA | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 33 | B 2HAIA-FDR | On | 2HAIA | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 34 | B 2HAIB | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 400 | 65 | ANSI-SYM |
| 35 | B 2HAIB-FDR | On | 2HAIB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 36 | B 2HAIC | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 37 | B 2HAIC-FDR | On | 2HAIC | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 15 | 65 | ANSI-SYM |
| 38 | B 2HDPA | On | MSB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKL12 | 1000 | 65 | ANSI-SYM |
| 39 | B 2HDPA-MAIN | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKL12 | 1000 | 65 | ANSI-SYM |
| 40 | B 2HS1 | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 41 | B 2HS1-FDR | On | 2HS1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 42 | B 2HS2 | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 43 | B 2HS2-FDR | On | 2HS2 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 44 | B 2LA1A | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 45 | B 2LA1A-FDR | On | 2LA1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 46 | B 2LA1B | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 47 | B 2LA1B-FDR | On | 2LA1B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 48 | B 2LA1KA | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 49 | B 2LA1KA-FDR | On | 2LA1KA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 50 | B 2LA1KB | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 51 | B 2LA1KB-FDR | On | 2LA1KB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 52 | B 2LA1KC | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 53 | B 2LAC1A | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 54 | B 2LAC1A-FDR | On | 2LAC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THHQB | 20 | 22 | ANSI-SYM |
| 55 | B 2LDPA-FDR | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 150 | 22 | ANSI-SYM |
| 56 | B 2LDPA-MAIN | On | 2LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKH8 | 800 | 65 | ANSI-SYM |
| 57 | B 3EH1 | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 100 | 65 | ANSI-SYM |
| 58 | B 3EH1-FDR | On | 3EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 20 | 14 | ANSI-SYM |
| 59 | B 3EH1-MAIN | On | 3EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 14 | ANSI-SYM |
| 60 | B 3EL1 | On | 3EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 60 | 14 | ANSI-SYM |
| 61 | B 3EL1- HI MAI | On | TX 3EL1 H | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TED (600V) | 40 | 18 | ANSI-SYM |
| 62 | B 3EL1-FDR | On | 3EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 20 | 10 | ANSI-SYM |
| 63 | B 3EL1-MAIN | On | 3EL1 | 0.208 | Bus Tie | MCCB | Breaker Onl | GE | Q Line | THQL | 50 | 10 | ANSI-SYM |
| 64 | B 4EH1 | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 65 | B 4EH1-FDR | On | 4EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 20 | 14 | ANSI-SYM |
| 66 | B 4EL1 | On | 4EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 60 | 14 | ANSI-SYM |
| 67 | B 4EL1- HI MAI | On | TX 4EL1 H | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TED (600V) | 70 | 18 | ANSI-SYM |
| 68 | B 4EL1-FDR | On | 4EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 20 | 10 | ANSI-SYM |
| 69 | B 4EL1-MAIN | On | 4EL1 | 0.208 | Bus Tie | MCCB | Breaker Onl | GE | Q Line | THQL | 70 | 10 | ANSI-SYM |
| 70 | B 5EH1 | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 71 | B 5EH1-FDR | On | 5EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 20 | 14 | ANSI-SYM |
| 72 | B 5EH1-MAIN | On | 5EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 14 | ANSI-SYM |
| 73 | B 5EL1 | On | 5EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 60 | 14 | ANSI-SYM |
| 74 | B 5EL1- HI MAI | On | TX 5EL1 H | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TED (600V) | 40 | 18 | ANSI-SYM |
| 75 | B 5EL1-FDR | On | 5EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 20 | 10 | ANSI-SYM |
| 76 | B 5EL1-MAIN | On | 5EL1 | 0.208 | Bus Tie | MCCB | Breaker Onl | GE | Q Line | THQL | 70 | 10 | ANSI-SYM |
| 77 | B 5HA1A | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |

**LV Breakers**

| | ID Name | Normal State | Trip | Trip Mfr | Trip Type | Trip Style | Sensor/Frame | Plug/Tap/Trip | LTPU Setting | LTPU Mult | LTPU (A) | LTD Band |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 1EH1 | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 2 | B 1EH1-FDR | Closed | TMGN | GE | E150 | TEY | 100A (20A) | 20 | | | | |
| 3 | B 1EL1 | Closed | TMGN | GE | E150 | TEY | 100A (30A) | 30 | | | | |
| 4 | B 1EL1- HI MAI | Closed | TMGN | GE | E150 | TED (600V) | 150A(15-50AT) | 40 | | | | |
| 5 | B 1EL1-FDR | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 20 | | | | |
| 6 | B 1EL1-MAIN | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 50 | | | | |
| 7 | B 1HAIA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 8 | B 1HAIA-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 9 | B 1HAIB | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 10 | B 1HAIB-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 11 | B 1HAIC | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 12 | B 1HAIC-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 13 | B 1HDPA | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 14 | B 1HDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 15 | B 1LA1A | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 16 | B 1LA1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 17 | B 1LA2A | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 18 | B 1LA2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 19 | B 1LAC1A | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 20 | B 1LAC1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 21 | B 1LAC2A | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 22 | B 1LDPA-FDR | Closed | TMGN | GE | E150 | TEB | 150A(90-100AT) | 100 | | | | |
| 23 | B 1LDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 24 | B 2EH1 | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 25 | B 2EH1-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 26 | B 2EH1-MAIN | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (100AT) | 100 | 1 | 1 | 100 | Fixed |
| 27 | B 2EHDP-MAIN | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 200 | 1 | | 200 | Fixed |
| 28 | B 2EL1 | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (30AT) | 30 | 1 | 1 | 30 | Fixed |
| 29 | B 2EL1- HI MAI | Closed | TMGN | GE | E150 | TED (600V) | 150A(15-50AT) | 40 | | | | |
| 30 | B 2EL1-FDR | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 20 | | | | |
| 31 | B 2EL1-MAIN | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 50 | | | | |
| 32 | B 2HAIA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 33 | B 2HAIA-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 34 | B 2HAIB | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 35 | B 2HAIB-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 36 | B 2HAIC | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 37 | B 2HAIC-FDR | Closed | SST | GE | Spectra RMS | MCCB SE | 30A (15AT) | 15 | 1 | 1 | 15 | Fixed |
| 38 | B 2HDPA | Closed | SST | GE | Spectra RMS | MCCB SK | 1200 | 1000 | 1 | | 1000 | Fixed |
| 39 | B 2HDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 1200 | 1000 | 1 | | 1000 | Fixed |
| 40 | B 2HS1 | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 41 | B 2HS1-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 42 | B 2HS2 | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 43 | B 2HS2-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 44 | B 2LA1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 45 | B 2LA1A-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 46 | B 2LA1B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 47 | B 2LA1B-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 48 | B 2LA1KA | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 49 | B 2LA1KA-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 50 | B 2LA1KB | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 51 | B 2LA1KB-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 52 | B 2LA1KC | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 53 | B 2LAC1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 54 | B 2LAC1A-FDR | Closed | TMGN | GE | Q Line | THHQB | 100A (15-50AT) | 20 | | | | |
| 55 | B 2LDPA-FDR | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 150 | | | | |
| 56 | B 2LDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 57 | B 3EH1 | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (100AT) | 100 | 1 | 1 | 100 | Fixed |
| 58 | B 3EH1-FDR | Closed | TMGN | GE | E150 | TEY | 100A (20A) | 20 | | | | |
| 59 | B 3EH1-MAIN | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 60 | B 3EL1 | Closed | TMGN | GE | E150 | TEY | 100A (60A) | 60 | | | | |
| 61 | B 3EL1- HI MAI | Closed | TMGN | GE | E150 | TED (600V) | 150A(15-50AT) | 40 | | | | |
| 62 | B 3EL1-FDR | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 20 | | | | |
| 63 | B 3EL1-MAIN | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 50 | | | | |
| 64 | B 4EH1 | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 65 | B 4EH1-FDR | Closed | TMGN | GE | E150 | TEY | 100A (20A) | 20 | | | | |
| 66 | B 4EL1 | Closed | TMGN | GE | E150 | TEY | 100A (60A) | 60 | | | | |
| 67 | B 4EL1- HI MAI | Closed | TMGN | GE | E150 | TED (600V) | 150A(60-80AT) | 70 | | | | |
| 68 | B 4EL1-FDR | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 20 | | | | |
| 69 | B 4EL1-MAIN | Closed | TMGN | GE | Q Line | THQL | 100A(60-100AT) | 70 | | | | |
| 70 | B 5EH1 | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 71 | B 5EH1-FDR | Closed | TMGN | GE | E150 | TEY | 100A (20A) | 20 | | | | |
| 72 | B 5EH1-MAIN | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 73 | B 5EL1 | Closed | TMGN | GE | E150 | TEY | 100A (60A) | 60 | | | | |
| 74 | B 5EL1- HI MAI | Closed | TMGN | GE | E150 | TED (600V) | 150A(15-50AT) | 40 | | | | |
| 75 | B 5EL1-FDR | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 20 | | | | |
| 76 | B 5EL1-MAIN | Closed | TMGN | GE | Q Line | THQL | 100A(60-100AT) | 70 | | | | |
| 77 | B 5HA1A | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |

**LV Breakers**

| | ID Name | STPU Setting | STPU Band | STPU I2T | STPU (A) | Inst Setting | Inst Override | Inst (A) | Gnd Pickup | Gnd Delay | Gnd I2T | Gnd (A) | Fuse Mfr | Fuse Type |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 1EH1 | Max | Fixed | In | 456 | Max | Pickup | 750 | | | Out | | <None> | <None> |
| 2 | B 1EH1-FDR | | | | | | | | | | | | <None> | <None> |
| 3 | B 1EL1 | | | | | | | | | | | | <None> | <None> |
| 4 | B 1EL1- HI MAI | | | | | | | | | | | | <None> | <None> |
| 5 | B 1EL1-FDR | | | | | | | | | | | | <None> | <None> |
| 6 | B 1EL1-MAIN | | | | | | | | | | | | <None> | <None> |
| 7 | B 1HAIA | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 8 | B 1HAIA-FDR | | | | | | | | | | | | <None> | <None> |
| 9 | B 1HAIB | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 10 | B 1HAIB-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 11 | B 1HAIC | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 12 | B 1HAIC-FDR | | | | | | | | | | | | <None> | <None> |
| 13 | B 1HDPA | Max | Fixed | In | 4000 | Max | Pickup | 8144 | | | Out | | <None> | <None> |
| 14 | B 1HDPA-MAIN | Max | Fixed | In | 4000 | Max | Pickup | 8144 | | | Out | | <None> | <None> |
| 15 | B 1LA1A | | | | | | | | | | | | <None> | <None> |
| 16 | B 1LA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 17 | B 1LA2A | | | | | | | | | | | | <None> | <None> |
| 18 | B 1LA2A-FDR | | | | | | | | | | | | <None> | <None> |
| 19 | B 1LAC1A | | | | | | | | | | | | <None> | <None> |
| 20 | B 1LAC1A-FDR | | | | | | | | | | | | <None> | <None> |
| 21 | B 1LAC2A | | | | | | | | | | | | <None> | <None> |
| 22 | B 1LDPA-FDR | | | | | | | | | | | | <None> | <None> |
| 23 | B 1LDPA-MAIN | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 24 | B 2EH1 | Max | Fixed | In | 456 | Max | Pickup | 750 | | | Out | | <None> | <None> |
| 25 | B 2EH1-FDR | | | | | | | | | | | | <None> | <None> |
| 26 | B 2EH1-MAIN | Max | Fixed | In | 660 | Max | Pickup | 1250 | | | Out | | <None> | <None> |
| 27 | B 2EHDP-MAIN | Max | Fixed | In | 1000 | Max | Pickup | 2000 | | | Out | | <None> | <None> |
| 28 | B 2EL1 | Max | Fixed | In | 243 | Max | Pickup | 375 | | | Out | | <None> | <None> |
| 29 | B 2EL1- HI MAI | | | | | | | | | | | | <None> | <None> |
| 30 | B 2EL1-FDR | | | | | | | | | | | | <None> | <None> |
| 31 | B 2EL1-MAIN | | | | | | | | | | | | <None> | <None> |
| 32 | B 2HAIA | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 33 | B 2HAIA-FDR | | | | | | | | | | | | <None> | <None> |
| 34 | B 2HAIB | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 35 | B 2HAIB-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 36 | B 2HAIC | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 37 | B 2HAIC-FDR | Max | Fixed | In | 90 | Max | Pickup | 187.5 | | | Out | | <None> | <None> |
| 38 | B 2HDPA | Max | Fixed | In | 5000 | Max | Pickup | 10180 | | | Out | | <None> | <None> |
| 39 | B 2HDPA-MAIN | Max | Fixed | In | 5000 | Max | Pickup | 10180 | | | Out | | <None> | <None> |
| 40 | B 2HS1 | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 41 | B 2HS1-FDR | | | | | | | | | | | | <None> | <None> |
| 42 | B 2HS2 | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 43 | B 2HS2-FDR | | | | | | | | | | | | <None> | <None> |
| 44 | B 2LA1A | | | | | | | | | | | | <None> | <None> |
| 45 | B 2LA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 46 | B 2LA1B | | | | | | | | | | | | <None> | <None> |
| 47 | B 2LA1B-FDR | | | | | | | | | | | | <None> | <None> |
| 48 | B 2LA1KA | | | | | | | | | | | | <None> | <None> |
| 49 | B 2LA1KA-FDR | | | | | | | | | | | | <None> | <None> |
| 50 | B 2LA1KB | | | | | | | | | | | | <None> | <None> |
| 51 | B 2LA1KB-FDR | | | | | | | | | | | | <None> | <None> |
| 52 | B 2LA1KC | | | | | | | | | | | | <None> | <None> |
| 53 | B 2LAC1A | | | | | | | | | | | | <None> | <None> |
| 54 | B 2LAC1A-FDR | | | | | | | | | | | | <None> | <None> |
| 55 | B 2LDPA-FDR | | | | | | | | | | | | <None> | <None> |
| 56 | B 2LDPA-MAIN | Max | Fixed | In | 4000 | Max | Pickup | 8144 | | | Out | | <None> | <None> |
| 57 | B 3EH1 | Max | Fixed | In | 660 | Max | Pickup | 1250 | | | Out | | <None> | <None> |
| 58 | B 3EH1-FDR | | | | | | | | | | | | <None> | <None> |
| 59 | B 3EH1-MAIN | | | | | | | | | | | | <None> | <None> |
| 60 | B 3EL1 | | | | | | | | | | | | <None> | <None> |
| 61 | B 3EL1- HI MAI | | | | | | | | | | | | <None> | <None> |
| 62 | B 3EL1-FDR | | | | | | | | | | | | <None> | <None> |
| 63 | B 3EL1-MAIN | | | | | | | | | | | | <None> | <None> |
| 64 | B 4EH1 | Max | Fixed | In | 456 | Max | Pickup | 750 | | | Out | | <None> | <None> |
| 65 | B 4EH1-FDR | | | | | | | | | | | | <None> | <None> |
| 66 | B 4EL1 | | | | | | | | | | | | <None> | <None> |
| 67 | B 4EL1- HI MAI | | | | | | | | | | | | <None> | <None> |
| 68 | B 4EL1-FDR | | | | | | | | | | | | <None> | <None> |
| 69 | B 4EL1-MAIN | | | | | | | | | | | | <None> | <None> |
| 70 | B 5EH1 | Max | Fixed | In | 456 | Max | Pickup | 750 | | | Out | | <None> | <None> |
| 71 | B 5EH1-FDR | | | | | | | | | | | | <None> | <None> |
| 72 | B 5EH1-MAIN | | | | | | | | | | | | <None> | <None> |
| 73 | B 5EL1 | | | | | | | | | | | | <None> | <None> |
| 74 | B 5EL1- HI MAI | | | | | | | | | | | | <None> | <None> |
| 75 | B 5EL1-FDR | | | | | | | | | | | | <None> | <None> |
| 76 | B 5EL1-MAIN | | | | | | | | | | | | <None> | <None> |
| 77 | B 5HA1A | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |

**LV Breakers**

| | ID Name | Fuse Style | Fuse Size | Mtr O/L Mfr | Mtr O/L Type | Mtr O/L Style | Motor FLA | Service Factor | PCC kVA Demand | PCC Isc/ILoad | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | B 1EH1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 2 | B 1EH1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 3 | B 1EL1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 4 | B 1EL1- HI MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 5 | B 1EL1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 6 | B 1EL1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 7 | B 1HAIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 8 | B 1HAIA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 9 | B 1HAIB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 10 | B 1HAIB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 11 | B 1HAIC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 12 | B 1HAIC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 13 | B 1HDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 14 | B 1HDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 15 | B 1LA1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 16 | B 1LA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 17 | B 1LA2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 18 | B 1LA2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 19 | B 1LAC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 20 | B 1LAC1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 21 | B 1LAC2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 22 | B 1LDPA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 23 | B 1LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 24 | B 2EH1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 25 | B 2EH1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 26 | B 2EH1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 27 | B 2EHDP-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 28 | B 2EL1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 29 | B 2EL1- HI MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 30 | B 2EL1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 31 | B 2EL1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 32 | B 2HAIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 33 | B 2HAIA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 34 | B 2HAIB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 35 | B 2HAIB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 36 | B 2HAIC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 37 | B 2HAIC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 38 | B 2HDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 39 | B 2HDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 40 | B 2HS1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 41 | B 2HS1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 42 | B 2HS2 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 43 | B 2HS2-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 44 | B 2LA1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 45 | B 2LA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 46 | B 2LA1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 47 | B 2LA1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 48 | B 2LA1KA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 49 | B 2LA1KA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 50 | B 2LA1KB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 51 | B 2LA1KB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 52 | B 2LA1KC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 53 | B 2LAC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 54 | B 2LAC1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 55 | B 2LDPA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 56 | B 2LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 57 | B 3EH1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 58 | B 3EH1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 59 | B 3EH1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 60 | B 3EL1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 61 | B 3EL1- HI MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 62 | B 3EL1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 63 | B 3EL1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 64 | B 4EH1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 65 | B 4EH1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 66 | B 4EL1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 67 | B 4EL1- HI MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 68 | B 4EL1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 69 | B 4EL1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 70 | B 5EH1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 71 | B 5EH1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 72 | B 5EH1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 73 | B 5EL1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 74 | B 5EL1- HI MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 75 | B 5EL1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 76 | B 5EL1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 77 | B 5HA1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |

**LV Breakers**

| | ID Name | Status | On Bus | Base kV | Conn Type | Class | Options | Breaker Mfr | Breaker Type | Breaker Style | Cont Current (A) | SC Int kA | SC Test Std |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 5HA1A-FDR | On | 5HA1A | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 79 | B 5HA1B | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 300 | 65 | ANSI-SYM |
| 80 | B 5HA1B-FDR | On | 5HA1B | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 81 | B 5HA1C | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 300 | 65 | ANSI-SYM |
| 82 | B 5HA1C-FDR | On | 5HA1C | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 83 | B 5HA1D | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 84 | B 5HA1D-FDR | On | 5HA1D | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 85 | B 5HA1E | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 86 | B 5HA1E-FDR | On | 5HA1E | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 87 | B 5HDPA | On | MSB | 0.48 | Feeder | ICCB | Breaker Onl | GE | Power Break II | SS-20 | 2000 | 65 | ANSI-SYM |
| 88 | B 5HDPA-MAIN | On | 5HDPA | 0.48 | Feeder | ICCB | Breaker Onl | GE | Power Break II | SS-20 | 2000 | 65 | ANSI-SYM |
| 89 | B 5LA1A | On | 5LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 90 | B 5LA1A-FDR | On | 5LA1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 91 | B 5LAC1A | On | 5LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 92 | B 5LAC1A-FDR | On | 5LAC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 93 | B 5LAC1B | On | 5LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 94 | B 5LAC1B-FDR | On | 5LAC1B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 95 | B 5LB1A | On | 5LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 96 | B 5LB1A-FDR | On | 5LB1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 97 | B 5LB1B | On | 5LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 98 | B 5LB1B-FDR | On | 5LB1B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 99 | B 5LB1C | On | 5LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 100 | B 5LB1C-FDR | On | 5LB1C | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 15 | 10 | ANSI-SYM |
| 101 | B 5LBC1A | On | 5LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 102 | B 5LBC1A-FDR | On | 5LBC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 103 | B 5LBC1B | On | 5LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 104 | B 5LBC1B-FDR | On | 5LBC1B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 105 | B 5LDPA-FDR | On | 5LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 100 | 65 | ANSI-SYM |
| 106 | B 5LDPA-MAIN | On | 5LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGD | 400 | 65 | ANSI-SYM |
| 107 | B 5LDPB-MAIN | On | 5LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKH8 | 800 | 65 | ANSI-SYM |
| 108 | B 6EH1 | On | 2EHDP | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 109 | B 6EH1-FDR | On | 6EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 20 | 14 | ANSI-SYM |
| 110 | B 6EL1 | On | 6EH1 | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TEY | 30 | 14 | ANSI-SYM |
| 111 | B 6EL1- HI MAI | On | TX 6EL1 H | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | TED (600V) | 40 | 18 | ANSI-SYM |
| 112 | B 6EL1-FDR | On | 6EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 20 | 10 | ANSI-SYM |
| 113 | B 6EL1-MAIN | On | 6EL1 | 0.208 | Bus Tie | MCCB | Breaker Onl | GE | Q Line | THQL | 70 | 10 | ANSI-SYM |
| 114 | B 6HAIA | On | 6HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 115 | B 6HAIA-FDR | On | 6HAIA | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 116 | B 6HAIB | On | 6HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 117 | B 6HAIB-FDR | On | 6HAIB | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 118 | B 6HAIC | On | 6HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 119 | B 6HAIC-FDR | On | 6HAIC | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 20 | 65 | ANSI-SYM |
| 120 | B 6HDPA | On | MSB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKL12 | 1000 | 65 | ANSI-SYM |
| 121 | B 6HDPA-MAIN | On | 6HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SKH12 | 1000 | 50 | ANSI-SYM |
| 122 | B 6LA1A -MAIN | On | 6LAIA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 123 | B 6LA1A-FDR | On | 6LAIA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 124 | B 6LAC1A-MAI | On | 6LAC1A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 125 | B 9HA2A | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 300 | 65 | ANSI-SYM |
| 126 | B 9HA2A-FDR | On | 9HA2A | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 127 | B 9HA2B | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 128 | B 9HA2B-FDR | On | 9HA2B | 0.48 | Feeder | MCCB | Breaker Onl | GE | E150 | THED (277V) | 15 | 65 | ANSI-SYM |
| 129 | B 9LA2A | On | 9LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 130 | B 9LA2A-FDR | On | 9LA2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 131 | B 9LAC2A | On | 9LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 132 | B 9LAC2A-FDR | On | 9LAC2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 133 | B 9LAC2B | On | 9LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 134 | B 9LAC2B-FDR | On | 9LAC2B | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 135 | B 9LB2A | On | 9LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 136 | B 9LB2A-FDR | On | 9LB2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 137 | B 9LBC2A | On | 9LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 138 | B 9LBC2A-FDR | On | 9LBC2A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 139 | B 9LBC2B | On | 9LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 225 | 22 | ANSI-SYM |
| 140 | B 9LDPA-MAIN | On | 9LDPA | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGD | 400 | 65 | ANSI-SYM |
| 141 | B 9LDPB | On | 9LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQD | 150 | 22 | ANSI-SYM |
| 142 | B 9LDPB-MAIN | On | 9LDPB | 0.208 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGH6 | 500 | 65 | ANSI-SYM |
| 143 | B CA | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 70 | 65 | ANSI-SYM |
| 144 | B EGH1-ATS E | On | EGH1 | 0.48 | Feeder | MCCB | Breaker Onl | <None> | <None> | <None> | 0 | 0 | ANSI-SYM |
| 145 | B ELEV 160 | On | 1HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 70 | 65 | ANSI-SYM |
| 146 | B ELEV 560 | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 60 | 65 | ANSI-SYM |
| 147 | B LBIC MAIN | On | 5LB1C | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | TQD | 225 | 10 | ANSI-SYM |
| 148 | B MCCA | On | MSB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 400 | 65 | ANSI-SYM |
| 149 | B MDB | On | MDB | 0.48 | Feeder | ICCB | Breaker Onl | GE | Power Brk | TP40 | 4000 | 100 | ANSI-SYM |
| 150 | B MSB-ATS EH | On | MSB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 200 | 65 | ANSI-SYM |
| 151 | B SPARE | On | MSB | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 100 | 65 | ANSI-SYM |
| 152 | B TX T1LDPA | On | 1HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFH | 175 | 35 | ANSI-SYM |
| 153 | B TX T2LDPA | On | 2HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 350 | 65 | ANSI-SYM |
| 154 | B TX T5LDPA | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 175 | 65 | ANSI-SYM |

**LV Breakers**

| | ID Name | Normal State | Trip | Trip Mfr | Trip Type | Trip Style | Sensor/Frame | Plug/Tap/Trip | LTPU Setting | LTPU Mult | LTPU (A) | LTD Band |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 5HA1A-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 79 | B 5HA1B | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 300 | 1 | 1 | 300 | Fixed |
| 80 | B 5HA1B-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 81 | B 5HA1C | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 300 | 1 | 1 | 300 | Fixed |
| 82 | B 5HA1C-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 83 | B 5HA1D | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 84 | B 5HA1D-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 85 | B 5HA1E | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 86 | B 5HA1E-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 87 | B 5HDPA | Closed | SST | GE | Power+ | ICCB | 2000 | 2000 | 1 | | 2000 | 2 |
| 88 | B 5HDPA-MAIN | Closed | SST | GE | Power+ | ICCB | 2000 | 2000 | 1 | | 2000 | 2 |
| 89 | B 5LA1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 90 | B 5LA1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 91 | B 5LAC1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 92 | B 5LAC1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 93 | B 5LAC1B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 94 | B 5LAC1B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 95 | B 5LB1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 96 | B 5LB1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 97 | B 5LB1B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 98 | B 5LB1B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 99 | B 5LB1C | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 100 | B 5LB1C-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 15 | | | | |
| 101 | B 5LBC1A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 102 | B 5LBC1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 103 | B 5LBC1B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 104 | B 5LBC1B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 105 | B 5LDPA-FDR | Closed | TMGN | GE | E150 | TEY | 100A (100A) | 100 | | | | |
| 106 | B 5LDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 107 | B 5LDPB-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 800 | 800 | 1 | | 800 | Fixed |
| 108 | B 6EH1 | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 109 | B 6EH1-FDR | Closed | TMGN | GE | E150 | TEY | 100A (20A) | 20 | | | | |
| 110 | B 6EL1 | Closed | TMGN | GE | E150 | TEY | 100A (30A) | 30 | | | | |
| 111 | B 6EL1- HI MAI | Closed | TMGN | GE | E150 | TED (600V) | 150A(15-50AT) | 40 | | | | |
| 112 | B 6EL1-FDR | Closed | TMGN | GE | Q Line | THQL | 100A (15-50AT) | 20 | | | | |
| 113 | B 6EL1-MAIN | Closed | TMGN | GE | Q Line | THQL | 100A(60-100AT) | 70 | | | | |
| 114 | B 6HAIA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 115 | B 6HAIA-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 116 | B 6HAIB | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 117 | B 6HAIB-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 118 | B 6HAIC | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 119 | B 6HAIC-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 20 | | | | |
| 120 | B 6HDPA | Closed | SST | GE | Spectra RMS | MCCB SK | 1200 | 1000 | 1 | | 1000 | Fixed |
| 121 | B 6HDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SK | 1200 | 1000 | 1 | | 1000 | Fixed |
| 122 | B 6LA1A -MAIN | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 123 | B 6LA1A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 124 | B 6LAC1A-MAI | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 125 | B 9HA2A | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 300 | 1 | 1 | 300 | Fixed |
| 126 | B 9HA2A-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 127 | B 9HA2B | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 128 | B 9HA2B-FDR | Closed | TMGN | GE | E150 | THED (277V) | 150A(15-30AT) | 15 | | | | |
| 129 | B 9LA2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 130 | B 9LA2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 131 | B 9LAC2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 132 | B 9LAC2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 133 | B 9LAC2B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 134 | B 9LAC2B-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 135 | B 9LB2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 136 | B 9LB2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 137 | B 9LBC2A | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 138 | B 9LBC2A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 139 | B 9LBC2B | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 225 | | | | |
| 140 | B 9LDPA-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 141 | B 9LDPB | Closed | TMGN | GE | Q Line | THQD | 225A(100-225AT) | 150 | | | | |
| 142 | B 9LDPB-MAIN | Closed | SST | GE | Spectra RMS | MCCB SG | 600 | 500 | 1 | 1 | 500 | Fixed |
| 143 | B CA | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (70AT) | 70 | 1 | 1 | 70 | Fixed |
| 144 | B EGH1-ATS E | Closed | SST | | | | | | | | | |
| 145 | B ELEV 160 | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (70AT) | 70 | 1 | 1 | 70 | Fixed |
| 146 | B ELEV 560 | Closed | SST | GE | Spectra RMS | MCCB SE | 60A (60AT) | 60 | 1 | 1 | 60 | Fixed |
| 147 | B LBIC MAIN | Closed | TMGN | GE | Q Line | TQD | 225A(100-225AT) | 225 | | | | |
| 148 | B MCCA | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 400 | 1 | 1 | 400 | Fixed |
| 149 | B MDB | Closed | SST | GE | Power+ | ICCB | 4000 | 4000 | 1 | | 4000 | 1 |
| 150 | B MSB-ATS EH | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 200 | 1 | | 200 | Fixed |
| 151 | B SPARE | Closed | SST | GE | Spectra RMS | MCCB SE | 100A (100AT) | 100 | 1 | 1 | 100 | Fixed |
| 152 | B TX T1LDPA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 175 | 1 | | 175 | Fixed |
| 153 | B TX T2LDPA | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 350 | 1 | 1 | 350 | Fixed |
| 154 | B TX T5LDPA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 175 | 1 | | 175 | Fixed |

**LV Breakers**

| | ID Name | STPU Setting | STPU Band | STPU I2T | STPU (A) | Inst Setting | Inst Override | Inst (A) | Gnd Pickup | Gnd Delay | Gnd I2T | Gnd (A) | Fuse Mfr | Fuse Type |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 5HA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 79 | B 5HA1B | Max | Fixed | In | 1500 | Max | Pickup | 3036 | | | Out | | <None> | <None> |
| 80 | B 5HA1B-FDR | | | | | | | | | | | | <None> | <None> |
| 81 | B 5HA1C | Max | Fixed | In | 1500 | Max | Pickup | 3036 | | | Out | | <None> | <None> |
| 82 | B 5HA1C-FDR | | | | | | | | | | | | <None> | <None> |
| 83 | B 5HA1D | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 84 | B 5HA1D-FDR | | | | | | | | | | | | <None> | <None> |
| 85 | B 5HA1E | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 86 | B 5HA1E-FDR | | | | | | | | | | | | <None> | <None> |
| 87 | B 5HDPA | | | Out | | 9 | Pickup | 18000 | | | Out | | <None> | <None> |
| 88 | B 5HDPA-MAIN | | | Out | | 9 | Pickup | 18000 | | | Out | | <None> | <None> |
| 89 | B 5LA1A | | | | | | | | | | | | <None> | <None> |
| 90 | B 5LA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 91 | B 5LAC1A | | | | | | | | | | | | <None> | <None> |
| 92 | B 5LAC1A-FDR | | | | | | | | | | | | <None> | <None> |
| 93 | B 5LAC1B | | | | | | | | | | | | <None> | <None> |
| 94 | B 5LAC1B-FDR | | | | | | | | | | | | <None> | <None> |
| 95 | B 5LB1A | | | | | | | | | | | | <None> | <None> |
| 96 | B 5LB1A-FDR | | | | | | | | | | | | <None> | <None> |
| 97 | B 5LB1B | | | | | | | | | | | | <None> | <None> |
| 98 | B 5LB1B-FDR | | | | | | | | | | | | <None> | <None> |
| 99 | B 5LB1C | | | | | | | | | | | | <None> | <None> |
| 100 | B 5LB1C-FDR | | | | | | | | | | | | <None> | <None> |
| 101 | B 5LBC1A | | | | | | | | | | | | <None> | <None> |
| 102 | B 5LBC1A-FDR | | | | | | | | | | | | <None> | <None> |
| 103 | B 5LBC1B | | | | | | | | | | | | <None> | <None> |
| 104 | B 5LBC1B-FDR | | | | | | | | | | | | <None> | <None> |
| 105 | B 5LDPA-FDR | | | | | | | | | | | | <None> | <None> |
| 106 | B 5LDPA-MAIN | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 107 | B 5LDPB-MAIN | Max | Fixed | In | 4000 | Max | Pickup | 8144 | | | Out | | <None> | <None> |
| 108 | B 6EH1 | Max | Fixed | In | 456 | Max | Pickup | 750 | | | Out | | <None> | <None> |
| 109 | B 6EH1-FDR | | | | | | | | | | | | <None> | <None> |
| 110 | B 6EL1 | | | | | | | | | | | | <None> | <None> |
| 111 | B 6EL1- HI MAI | | | | | | | | | | | | <None> | <None> |
| 112 | B 6EL1-FDR | | | | | | | | | | | | <None> | <None> |
| 113 | B 6EL1-MAIN | | | | | | | | | | | | <None> | <None> |
| 114 | B 6HAIA | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 115 | B 6HAIA-FDR | | | | | | | | | | | | <None> | <None> |
| 116 | B 6HAIB | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 117 | B 6HAIB-FDR | | | | | | | | | | | | <None> | <None> |
| 118 | B 6HAIC | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 119 | B 6HAIC-FDR | | | | | | | | | | | | <None> | <None> |
| 120 | B 6HDPA | Max | Fixed | In | 5000 | Max | Pickup | 10180 | | | Out | | <None> | <None> |
| 121 | B 6HDPA-MAIN | Max | Fixed | In | 5000 | Max | Pickup | 10180 | | | Out | | <None> | <None> |
| 122 | B 6LA1A -MAIN | | | | | | | | | | | | <None> | <None> |
| 123 | B 6LA1A-FDR | | | | | | | | | | | | <None> | <None> |
| 124 | B 6LAC1A-MAI | | | | | | | | | | | | <None> | <None> |
| 125 | B 9HA2A | Max | Fixed | In | 1500 | Max | Pickup | 3036 | | | Out | | <None> | <None> |
| 126 | B 9HA2A-FDR | | | | | | | | | | | | <None> | <None> |
| 127 | B 9HA2B | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 128 | B 9HA2B-FDR | | | | | | | | | | | | <None> | <None> |
| 129 | B 9LA2A | | | | | | | | | | | | <None> | <None> |
| 130 | B 9LA2A-FDR | | | | | | | | | | | | <None> | <None> |
| 131 | B 9LAC2A | | | | | | | | | | | | <None> | <None> |
| 132 | B 9LAC2A-FDR | | | | | | | | | | | | <None> | <None> |
| 133 | B 9LAC2B | | | | | | | | | | | | <None> | <None> |
| 134 | B 9LAC2B-FDR | | | | | | | | | | | | <None> | <None> |
| 135 | B 9LB2A | | | | | | | | | | | | <None> | <None> |
| 136 | B 9LB2A-FDR | | | | | | | | | | | | <None> | <None> |
| 137 | B 9LBC2A | | | | | | | | | | | | <None> | <None> |
| 138 | B 9LBC2A-FDR | | | | | | | | | | | | <None> | <None> |
| 139 | B 9LBC2B | | | | | | | | | | | | <None> | <None> |
| 140 | B 9LDPA-MAIN | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 141 | B 9LDPB | | | | | | | | | | | | <None> | <None> |
| 142 | B 9LDPB-MAIN | Max | Fixed | In | 2500 | Max | Pickup | 5060 | | | Out | | <None> | <None> |
| 143 | B CA | Max | Fixed | In | 441 | Max | Pickup | 875 | | | Out | | <None> | <None> |
| 144 | B EGH1-ATS E | | | | | | Pickup | | | | | | <None> | <None> |
| 145 | B ELEV 160 | Max | Fixed | In | 441 | Max | Pickup | 875 | | | Out | | <None> | <None> |
| 146 | B ELEV 560 | Max | Fixed | In | 456 | Max | Pickup | 750 | | | Out | | <None> | <None> |
| 147 | B LBIC MAIN | | | | | | | | | | | | <None> | <None> |
| 148 | B MCCA | Max | Fixed | In | 2000 | Max | Pickup | 4048 | | | Out | | <None> | <None> |
| 149 | B MDB | | | Out | | 7 | Pickup | 28000 | 0.2 | Min | Out | 800 | <None> | <None> |
| 150 | B MSB-ATS EH | Max | Fixed | In | 1000 | Max | Pickup | 2000 | | | Out | | <None> | <None> |
| 151 | B SPARE | Max | Fixed | In | 660 | Max | Pickup | 1250 | | | Out | | <None> | <None> |
| 152 | B TX T1LDPA | Max | Fixed | In | 875 | Max | Pickup | 1750 | | | Out | | <None> | <None> |
| 153 | B TX T2LDPA | Max | Fixed | In | 1750 | Max | Pickup | 3542 | | | Out | | <None> | <None> |
| 154 | B TX T5LDPA | Max | Fixed | In | 875 | Max | Pickup | 1750 | | | Out | | <None> | <None> |

**LV Breakers**

| | ID Name | Fuse Style | Fuse Size | Mtr O/L Mfr | Mtr O/L Type | Mtr O/L Style | Motor FLA | Service Factor | PCC kVA Demand | PCC Isc/ILoad | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 78 | B 5HA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 79 | B 5HA1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 80 | B 5HA1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 81 | B 5HA1C | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 82 | B 5HA1C-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 83 | B 5HA1D | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 84 | B 5HA1D-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 85 | B 5HA1E | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 86 | B 5HA1E-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 87 | B 5HDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 88 | B 5HDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 89 | B 5LA1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 90 | B 5LA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 91 | B 5LAC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 92 | B 5LAC1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 93 | B 5LAC1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 94 | B 5LAC1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 95 | B 5LB1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 96 | B 5LB1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 97 | B 5LB1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 98 | B 5LB1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 99 | B 5LB1C | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 100 | B 5LB1C-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 101 | B 5LBC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 102 | B 5LBC1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 103 | B 5LBC1B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 104 | B 5LBC1B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 105 | B 5LDPA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 106 | B 5LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 107 | B 5LDPB-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 108 | B 6EH1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 109 | B 6EH1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 110 | B 6EL1 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 111 | B 6EL1- HI MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 112 | B 6EL1-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 113 | B 6EL1-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 114 | B 6HAIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 115 | B 6HAIA-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 116 | B 6HAIB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 117 | B 6HAIB-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 118 | B 6HAIC | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 119 | B 6HAIC-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 120 | B 6HDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 121 | B 6HDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 122 | B 6LA1A -MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 123 | B 6LA1A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 124 | B 6LAC1A-MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 125 | B 9HA2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 126 | B 9HA2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 127 | B 9HA2B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 128 | B 9HA2B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 129 | B 9LA2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 130 | B 9LA2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 131 | B 9LAC2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 132 | B 9LAC2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 133 | B 9LAC2B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 134 | B 9LAC2B-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 135 | B 9LB2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 136 | B 9LB2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 137 | B 9LBC2A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 138 | B 9LBC2A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 139 | B 9LBC2B | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 140 | B 9LDPA-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 141 | B 9LDPB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 142 | B 9LDPB-MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 143 | B CA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 144 | B EGH1-ATS E | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 145 | B ELEV 160 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 146 | B ELEV 560 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 147 | B LBIC MAIN | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 148 | B MCCA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 149 | B MDB | <None> | <None> | <None> | <None> | <None> | | 1 | | | LIG Power+ Trip Unit |
| 150 | B MSB-ATS EH | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 151 | B SPARE | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 152 | B TX T1LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 153 | B TX T2LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 154 | B TX T5LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |

**LV Breakers**

| | ID Name | Status | On Bus | Base kV | Conn Type | Class | Options | Breaker Mfr | Breaker Type | Breaker Style | Cont Current (A) | SC Int kA | SC Test Std |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 155 | B TX T5LDPB | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SGL4 | 350 | 65 | ANSI-SYM |
| 156 | B TX T6LAC1A | On | 6HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 125 | 65 | ANSI-SYM |
| 157 | B TX T6LAIA | On | 6HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SEL | 125 | 65 | ANSI-SYM |
| 158 | B TX T9LDPA | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 175 | 65 | ANSI-SYM |
| 159 | B TX T9LDPB | On | 5HDPA | 0.48 | Feeder | MCCB | Breaker Onl | GE | Spectra | SFL | 225 | 65 | ANSI-SYM |
| 160 | B UPS 3A-MAI | On | UPS3A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 100 | 10 | ANSI-SYM |
| 161 | B UPS 5 | On | 5EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 100 | 10 | ANSI-SYM |
| 162 | B UPS 5A-MAI | On | UPS5A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 100 | 10 | ANSI-SYM |
| 163 | B UPS 8 | On | 3EL1 | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQL | 100 | 10 | ANSI-SYM |
| 164 | B UPS 8A-MAI | On | UPS8A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 100 | 10 | ANSI-SYM |
| 165 | B UPS 9A-MAI | On | UPS9A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 100 | 10 | ANSI-SYM |
| 166 | B UPS3A-FDR | On | UPS3A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 167 | B UPS5A-FDR | On | UPS5A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 168 | B UPS8A-FDR | On | UPS8A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 169 | B UPS9A-FDR | On | UPS9A | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |
| 170 | KC 2LA1KC-FD | On | 2LA1KC | 0.208 | Feeder | MCCB | Breaker Onl | GE | Q Line | THQB | 20 | 10 | ANSI-SYM |

**LV Breakers**

| | ID Name | Normal State | Trip | Trip Mfr | Trip Type | Trip Style | Sensor/Frame | Plug/Tap/Trip | LTPU Setting | LTPU Mult | LTPU (A) | LTD Band |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 155 | B TX T5LDPB | Closed | SST | GE | Spectra RMS | MCCB SG | 400 | 350 | 1 | 1 | 350 | Fixed |
| 156 | B TX T6LAC1A | Closed | SST | GE | Spectra RMS | MCCB SE | 150A (125AT) | 125 | 1 | 1 | 125 | Fixed |
| 157 | B TX T6LAIA | Closed | SST | GE | Spectra RMS | MCCB SE | 150A (125AT) | 125 | 1 | 1 | 125 | Fixed |
| 158 | B TX T9LDPA | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 175 | 1 | | 175 | Fixed |
| 159 | B TX T9LDPB | Closed | SST | GE | Spectra RMS | MCCB SF | 250 | 225 | 1 | | 225 | Fixed |
| 160 | B UPS 3A-MAI | Closed | TMGN | GE | Q Line | THQB | 100A(60-100AT) | 100 | | | | |
| 161 | B UPS 5 | Closed | TMGN | GE | Q Line | THQL | 100A(60-100AT) | 100 | | | | |
| 162 | B UPS 5A-MAI | Closed | TMGN | GE | Q Line | THQB | 100A(60-100AT) | 100 | | | | |
| 163 | B UPS 8 | Closed | TMGN | GE | Q Line | THQL | 100A(60-100AT) | 100 | | | | |
| 164 | B UPS 8A-MAI | Closed | TMGN | GE | Q Line | THQB | 100A(60-100AT) | 100 | | | | |
| 165 | B UPS 9A-MAI | Closed | TMGN | GE | Q Line | THQB | 100A(60-100AT) | 100 | | | | |
| 166 | B UPS3A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 167 | B UPS5A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 168 | B UPS8A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 169 | B UPS9A-FDR | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |
| 170 | KC 2LA1KC-FD | Closed | TMGN | GE | Q Line | THQB | 100A (15-50AT) | 20 | | | | |

**LV Breakers**

| | ID Name | STPU Setting | STPU Band | STPU I2T | STPU (A) | Inst Setting | Inst Override | Inst (A) | Gnd Pickup | Gnd Delay | Gnd I2T | Gnd (A) | Fuse Mfr | Fuse Type |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 155 | B TX T5LDPB | Max | Fixed | In | 1750 | Max | Pickup | 3542 | | | Out | | <None> | <None> |
| 156 | B TX T6LAC1A | Max | Fixed | In | 875 | Max | Pickup | 1562.5 | | | Out | | <None> | <None> |
| 157 | B TX T6LAIA | Max | Fixed | In | 875 | Max | Pickup | 1562.5 | | | Out | | <None> | <None> |
| 158 | B TX T9LDPA | Max | Fixed | In | 875 | Max | Pickup | 1750 | | | Out | | <None> | <None> |
| 159 | B TX T9LDPB | Max | Fixed | In | 1125 | Max | Pickup | 2250 | | | Out | | <None> | <None> |
| 160 | B UPS 3A-MAI | | | | | | | | | | | | <None> | <None> |
| 161 | B UPS 5 | | | | | | | | | | | | <None> | <None> |
| 162 | B UPS 5A-MAI | | | | | | | | | | | | <None> | <None> |
| 163 | B UPS 8 | | | | | | | | | | | | <None> | <None> |
| 164 | B UPS 8A-MAI | | | | | | | | | | | | <None> | <None> |
| 165 | B UPS 9A-MAI | | | | | | | | | | | | <None> | <None> |
| 166 | B UPS3A-FDR | | | | | | | | | | | | <None> | <None> |
| 167 | B UPS5A-FDR | | | | | | | | | | | | <None> | <None> |
| 168 | B UPS8A-FDR | | | | | | | | | | | | <None> | <None> |
| 169 | B UPS9A-FDR | | | | | | | | | | | | <None> | <None> |
| 170 | KC 2LA1KC-FD | | | | | | | | | | | | <None> | <None> |

**LV Breakers**

| | ID Name | Fuse Style | Fuse Size | Mtr O/L Mfr | Mtr O/L Type | Mtr O/L Style | Motor FLA | Service Factor | PCC kVA Demand | PCC Isc/ILoad | Comment |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 155 | B TX T5LDPB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 156 | B TX T6LAC1A | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 157 | B TX T6LAIA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 158 | B TX T9LDPA | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 159 | B TX T9LDPB | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 160 | B UPS 3A-MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 161 | B UPS 5 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 162 | B UPS 5A-MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 163 | B UPS 8 | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 164 | B UPS 8A-MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 165 | B UPS 9A-MAI | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 166 | B UPS3A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 167 | B UPS5A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 168 | B UPS8A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 169 | B UPS9A-FDR | <None> | <None> | <None> | <None> | <None> | | 1 | | | |
| 170 | KC 2LA1KC-FD | <None> | <None> | <None> | <None> | <None> | | 1 | | | |

**Switches**

| | ID Name | Status | On Bus | Base kV | Conn Type | Normal State | Manufacturer | Type | Style | Cont Current (A) | SC Mom kA | SC Test Std | PCC kVA Demand |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | ATS EH2A1:Sw | On | ATS EH2A1 | 0.48 | Feeder | Closed | <None> | <None> | <None> | 0 | 0 | ANSI-SYM | |

**Switches**

| | ID Name | PCC Isc/ILoad | Comment |
|---|---|---|---|
| 1 | ATS EH2A1:Sw | | |

**ATSs**

| | ID Name | Status | Base kV | Area | Zone | AF Type | AF Option | Source Connection | Model | Comment |
|---|---|---|---|---|---|---|---|---|---|---|
| 1 | ATS EH2A1 | On | 0.48 | 1 | 1 | ATS | Specified | Source 2 Bus | Switch | |

# Equipment Duty Ratings

# Summary – Three Phase and Ground Fault

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Summary Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 5LB1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 5LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.60( -4.0%) | | Warning |
| 5LB1A | / | ANSI-SYM | 10.00 | | | 9.15( -8.5%) | | Warning |
| 5LBC1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 5LBC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.60( -4.0%) | | Warning |
| 5LBC1A | / | ANSI-SYM | 10.00 | | | 9.15( -8.5%) | | Warning |
| 5LBC1B | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 5LBC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.60( -4.0%) | | Warning |
| 5LBC1B | / | ANSI-SYM | 10.00 | | | 9.15( -8.5%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Summary Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 5LB1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 5LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.08( -9.2%) | | Warning |
| 5LB1A | / | ANSI-SYM | 10.00 | | | 9.03( -9.7%) | | Warning |
| 5LBC1A | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 5LBC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.08( -9.2%) | | Warning |
| 5LBC1A | / | ANSI-SYM | 10.00 | | | 9.03( -9.7%) | | Warning |
| 5LBC1B | Area: 1 Zone: 1 Bus kV: 0.21 kV | | | | | | | |
| B 5LBC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.08( -9.2%) | | Warning |
| 5LBC1B | / | ANSI-SYM | 10.00 | | | 9.03( -9.7%) | | Warning |

# Three Phase Bolted Fault

# Equipment Duty Ratings

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
1EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | 3.28( -76.6%) | | |
| B 1EL1 | GE | /TEY | ANSI-SYM | 14.00 | | 3.28( -76.6%) | | |
| 1EH1 | | / | ANSI-SYM | 14.00 | | 3.28( -76.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
1EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 1.29( -87.1%) | | |
| B 1EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 1.29( -87.1%) | | |
| 1EL1 | | / | ANSI-SYM | 22.00 | | 1.29( -94.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
1HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HAIA-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 17.11( -73.7%) | | |
| 1HAIA | | / | ANSI-SYM | 35.00 | | 17.11( -51.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
1HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 17.11( -73.7%) | | |
| 1HAIB | | / | ANSI-SYM | 35.00 | | 17.11( -51.1%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
1HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HAIC-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 17.11( -73.7%) | | |
| 1HAIC | | / | ANSI-SYM | 22.00 | | 17.11( -22.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
1HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HDPA-MAIN | GE | /SKH8 | ANSI-SYM | 50.00 | | 17.59( -64.8%) | | |
| B 1HAIA | GE | /SFH | ANSI-SYM | 35.00 | | 17.77( -49.2%) | | |
| B 1HAIB | GE | /SFH | ANSI-SYM | 35.00 | | 17.77( -49.2%) | | |
| B 1HAIC | GE | /SFH | ANSI-SYM | 35.00 | | 17.77( -49.2%) | | |
| B ELEV 160 | GE | /SEL | ANSI-SYM | 65.00 | | 17.59( -72.9%) | | |
| B TX T1LDPA | GE | /SFH | ANSI-SYM | 35.00 | | 17.77( -49.2%) | | |
| 1HDPA | | / | ANSI-SYM | 30.00 | | 17.77( -40.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
1LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LA1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 5.14( -48.6%) | | |
| 1LA1A | | / | ANSI-SYM | 10.00 | | 5.14( -48.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
1LA2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LA2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 5.01( -49.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
1LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LAC1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 4.89( -51.1%) | | |
| 1LAC1A | | / | ANSI-SYM | 10.00 | | | 4.89( -51.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
1LAC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 1LAC2A | | / | ANSI-SYM | 10.00 | | | 5.01( -49.9%) | | |

**********

Equipment Duty Comparison Report For Bus:
1LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | | 5.28( -91.9%) | | |
| B 1LDPA-FDR | GE | /TEB | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |
| B 1LAC1A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |
| B 1LAC2A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |
| B 1LA1A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |
| B 1LA2A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |
| 1LDPA | | / | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
2EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2EH1-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 32.00( -50.8%) | | |
| B 2EL1 | GE | /SEL | ANSI-SYM | 65.00 | | | 32.00( -50.8%) | | |
| B 2EH1-MAIN | GE | /SEL | ANSI-SYM | 65.00 | | | 32.00( -50.8%) | | |
| 2EH1 | | / | ANSI-SYM | 42.00 | | | 32.00( -23.8%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2EHDP Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2EHDP-MAIN | GE | /SFL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| B 2EH1 | GE | /SEL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| B 1EH1 | GE | /SEL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| B 3EH1 | GE | /SEL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| B 4EH1 | GE | /SEL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| B 5EH1 | GE | /SEL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| B 6EH1 | GE | /SEL | ANSI-SYM | 65.00 | | 37.54( -42.2%) | | |
| 2EHDP | | / | ANSI-SYM | 42.00 | | 37.54( -10.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
2EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 1.46( -85.4%) | | |
| B 2EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 1.46( -85.4%) | | |
| 2EL1 | | / | ANSI-SYM | 22.00 | | 1.46( -93.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
2HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HAIA-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 42.15( -35.2%) | | |
| 2HAIA | | / | ANSI-SYM | 65.00 | | 42.15( -35.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
2HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 46.56( -28.4%) | | |
| 2HAIB | | / | ANSI-SYM | 65.00 | | 46.56( -28.4%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HAIC-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 43.97( -32.4%) | | |
| 2HAIC | | / | ANSI-SYM | 65.00 | | 43.97( -32.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
2HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HDPA-MAIN | GE | /SKL12 | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| B 2HAIA | GE | /SFL | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| B 2HAIB | GE | /SGL4 | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| B 2HAIC | GE | /SFL | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| B TX T2LDPA | GE | /SGL4 | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| B 2HS1 | GE | /SFL | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| B 2HS2 | GE | /SFL | ANSI-SYM | 65.00 | | 50.33( -22.6%) | | |
| 2HDPA | | / | ANSI-SYM | 65.00 | | 50.08( -23.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
2HS1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HS1-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 45.89( -29.4%) | | |
| 2HS1 | | / | ANSI-SYM | 65.00 | | 45.89( -29.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
2HS2 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HS2-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 43.97( -32.4%) | | |
| 2HS2 | | / | ANSI-SYM | 65.00 | | 43.97( -32.4%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1A-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 9.84( -55.3%) | | |
| 2LA1A | / | ANSI-SYM | 22.00 | | | 9.84( -55.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LA1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1B-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 9.84( -55.3%) | | |
| 2LA1B | / | ANSI-SYM | 22.00 | | | 9.84( -55.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LA1KA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1KA-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 7.07( -29.3%) | | |
| 2LA1KA | / | ANSI-SYM | 10.00 | | | 7.07( -29.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LA1KB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1KB-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 6.58( -34.2%) | | |
| 2LA1KB | / | ANSI-SYM | 10.00 | | | 6.58( -34.2%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
2LA1KC Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| KC 2LA1KC-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 6.82( -31.8%) | | |
| 2LA1KC | | / | ANSI-SYM | 10.00 | | | 6.82( -31.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LAC1A-FDR | GE | /THHQB | ANSI-SYM | 22.00 | | | 9.84( -55.3%) | | |
| 2LAC1A | | / | ANSI-SYM | 22.00 | | | 9.84( -55.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LDPA-MAIN | GE | /SKH8 | ANSI-SYM | 65.00 | | | 10.81( -83.4%) | | |
| B 2LDPA-FDR | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| B 2LAC1A | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| B 2LA1A | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| B 2LA1B | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| B 2LA1KA | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| B 2LA1KB | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| B 2LA1KC | GE | /THQD | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |
| 2LDPA | | / | ANSI-SYM | 22.00 | | | 10.81( -50.9%) | | |

**********

Equipment Duty Comparison Report For Bus:
3EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3EH1-MAIN | GE | /TEY | ANSI-SYM | 14.00 | | | 5.46( -61.0%) | | |
| B 3EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | | 5.46( -61.0%) | | |
| B 3EL1 | GE | /TEY | ANSI-SYM | 14.00 | | | 5.46( -61.0%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | | |
|---|---|---|---|---|---|---|
| 3EH1 | | / | ANSI-SYM | 14.00 | 5.46( -61.0%) | |

**********

Equipment Duty Comparison Report For Bus:
3EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 1.37( -86.3%) | | |
| B 3EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 1.37( -86.3%) | | |
| B UPS 8 | GE | /THQL | ANSI-SYM | 10.00 | | 1.37( -86.3%) | | |
| 3EL1 | | / | ANSI-SYM | 22.00 | | 1.37( -93.8%) | | |

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Equipment Duty Comparison Report For Bus:
4EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | 4.13( -70.5%) | | |
| B 4EL1 | GE | /TEY | ANSI-SYM | 14.00 | | 4.13( -70.5%) | | |
| 4EH1 | | / | ANSI-SYM | 14.00 | | 4.13( -70.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
4EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 1.89( -81.1%) | | |
| B 4EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 1.89( -81.1%) | | |
| 4EL1 | | / | ANSI-SYM | 22.00 | | 1.89( -91.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
5EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EH1-MAIN | GE | /TEY | ANSI-SYM | 14.00 | | 5.18( -63.0%) | | |
| B 5EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | 5.18( -63.0%) | | |
| B 5EL1 | GE | /TEY | ANSI-SYM | 14.00 | | 5.18( -63.0%) | | |
| 5EH1 | | / | ANSI-SYM | 14.00 | | 5.18( -63.0%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | | 1.36( -86.4%) | | |
| B 5EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | | 1.36( -86.4%) | | |
| B UPS 5 | GE | /THQL | ANSI-SYM | 10.00 | | | 1.36( -86.4%) | | |
| 5EL1 | | / | ANSI-SYM | 22.00 | | | 1.36( -93.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
5HA1A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1A-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 34.14( -47.5%) | | |
| 5HA1A | | / | ANSI-SYM | 42.00 | | | 34.14( -18.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
5HA1B Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1B-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 34.78( -46.5%) | | |
| 5HA1B | | / | ANSI-SYM | 42.00 | | | 34.78( -17.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
5HA1C Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1C-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 34.78( -46.5%) | | |
| 5HA1C | | / | ANSI-SYM | 42.00 | | | 34.78( -17.2%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5HA1D Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1D-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 34.14( -47.5%) | | |
| 5HA1D | | / | ANSI-SYM | 42.00 | | | 34.14( -18.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
5HA1E Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1E-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 23.63( -63.6%) | | |
| 5HA1E | | / | ANSI-SYM | 42.00 | | | 23.63( -43.7%) | | |

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Equipment Duty Comparison Report For Bus:
5HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1A | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B 5HA1B | GE | /SGL4 | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B 9HA2A | GE | /SGL4 | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B 9HA2B | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B TX T9LDPB | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B TX T9LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B TX T5LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B TX T5LDPB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B ELEV 560 | GE | /SEL | ANSI-SYM | 65.00 | | | 39.25( -39.6%) | | |
| B CA | GE | /SEL | ANSI-SYM | 65.00 | | | 39.32( -39.5%) | | |
| B 5HA1C | GE | /SGL4 | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B 5HA1D | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B 5HA1E | GE | /SFL | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |
| B 5HDPA-MAIN | GE | /SS-20 | ANSI-SYM | 65.00 | | | 39.13( -39.8%) | | |
| 5HDPA | | / | ANSI-SYM | 65.00 | | | 39.43( -39.3%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LA1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.31( -46.9%) | | |
| 5LA1A | / | ANSI-SYM | 10.00 | | | 5.31( -46.9%) | | |

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Equipment Duty Comparison Report For Bus:
5LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LAC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.38( -46.2%) | | |
| 5LAC1A | / | ANSI-SYM | 10.00 | | | 5.38( -46.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
5LAC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LAC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.38( -46.2%) | | |
| 5LAC1B | / | ANSI-SYM | 10.00 | | | 5.38( -46.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
5LB1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.60( -4.0%) | | Warning |
| 5LB1A | / | ANSI-SYM | 10.00 | | | 9.15( -8.5%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
5LB1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LB1B-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 8.51( -14.9%) | | |
| 5LB1B | | / | ANSI-SYM | 10.00 | | 8.41( -15.9%) | | |

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Equipment Duty Comparison Report For Bus:
5LB1C Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B LBIC MAIN | GE | /TQD | ANSI-SYM | 10.00 | | 5.87( -41.3%) | | |
| B 5LB1C-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 5.87( -41.3%) | | |
| 5LB1C | | / | ANSI-SYM | 10.00 | | 5.87( -41.3%) | | |

**********

Equipment Duty Comparison Report For Bus:
5LBC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LBC1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 9.60( -4.0%) | | Warning |
| 5LBC1A | | / | ANSI-SYM | 10.00 | | 9.15( -8.5%) | | Warning |

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Equipment Duty Comparison Report For Bus:
5LBC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LBC1B-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 9.60( -4.0%) | | Warning |
| 5LBC1B | | / | ANSI-SYM | 10.00 | | 9.15( -8.5%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LDPA-FDR | GE | /TEY | ANSI-SYM | 65.00 | | 5.69( -91.3%) | | |
| B 5LAC1A | GE | /THQD | ANSI-SYM | 22.00 | | 5.69( -74.1%) | | |
| B 5LAC1B | GE | /THQD | ANSI-SYM | 22.00 | | 5.69( -74.1%) | | |
| B 5LA1A | GE | /THQD | ANSI-SYM | 22.00 | | 5.69( -74.1%) | | |
| B 5LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | 5.69( -91.3%) | | |
| 5LDPA | | / | ANSI-SYM | 22.00 | | 5.69( -74.1%) | | |

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Equipment Duty Comparison Report For Bus:
5LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LBC1A | GE | /THQD | ANSI-SYM | 22.00 | | 10.00( -54.5%) | | |
| B 5LBC1B | GE | /THQD | ANSI-SYM | 22.00 | | 10.00( -54.5%) | | |
| B 5LB1A | GE | /THQD | ANSI-SYM | 22.00 | | 10.00( -54.5%) | | |
| B 5LB1C | GE | /THQD | ANSI-SYM | 22.00 | | 10.00( -54.5%) | | |
| B 5LB1B | GE | /THQD | ANSI-SYM | 22.00 | | 10.00( -54.5%) | | |
| B 5LDPB-MAIN | GE | /SKH8 | ANSI-SYM | 65.00 | | 10.00( -84.6%) | | |
| 5LDPB | | / | ANSI-SYM | 22.00 | | 10.00( -54.5%) | | |

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Equipment Duty Comparison Report For Bus:
6EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | 8.50( -39.3%) | | |
| B 6EL1 | GE | /TEY | ANSI-SYM | 14.00 | | 8.50( -39.3%) | | |
| 6EH1 | | / | ANSI-SYM | 14.00 | | 8.50( -39.3%) | | |

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Equipment Duty Comparison Report For Bus:
6EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | | |
|---|---|---|---|---|---|---|
| B 6EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | 1.36( -86.4%) | |
| B 6EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | 1.36( -86.4%) | |
| 6EL1 | | / | ANSI-SYM | 22.00 | 1.36( -93.8%) | |

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Equipment Duty Comparison Report For Bus:
6HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | | | | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / | Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA | ( % ) | Interrupting kA | ( % ) | | | |
| B 6HAIA-FDR | GE | | /THED (277V) | ANSI-SYM | 65.00 | | | 36.61( -43.7%) | | | | | | |
| 6HAIA | | | / | ANSI-SYM | 42.00 | | | 36.61( -12.8%) | | | | | | |

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Equipment Duty Comparison Report For Bus:
6HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | | | | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / | Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA | ( % ) | Interrupting kA | ( % ) | | | |
| B 6HAIB-FDR | GE | | /THED (277V) | ANSI-SYM | 65.00 | | | 36.61( -43.7%) | | | | | | |
| 6HAIB | | | / | ANSI-SYM | 42.00 | | | 36.61( -12.8%) | | | | | | |

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Equipment Duty Comparison Report For Bus:
6HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | | | | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / | Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA | ( % ) | Interrupting kA | ( % ) | | | |
| B 6HAIC-FDR | GE | | /THED (277V) | ANSI-SYM | 65.00 | | | 36.61( -43.7%) | | | | | | |
| 6HAIC | | | / | ANSI-SYM | 42.00 | | | 36.61( -12.8%) | | | | | | |

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Equipment Duty Comparison Report For Bus:
6HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | | | | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / | Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA | ( % ) | Interrupting kA | ( % ) | | | |
| B 6HDPA-MAIN | GE | | /SKH12 | ANSI-SYM | 50.00 | | | 39.58( -20.8%) | | | | | | |
| B 6HAIA | GE | | /SFL | ANSI-SYM | 65.00 | | | 39.58( -39.1%) | | | | | | |
| B 6HAIB | GE | | /SFL | ANSI-SYM | 65.00 | | | 39.58( -39.1%) | | | | | | |
| B 6HAIC | GE | | /SFL | ANSI-SYM | 65.00 | | | 39.58( -39.1%) | | | | | | |
| B TX T6LAIA | GE | | /SEL | ANSI-SYM | 65.00 | | | 39.58( -39.1%) | | | | | | |
| B TX T6LAC1A | GE | | /SEL | ANSI-SYM | 65.00 | | | 39.58( -39.1%) | | | | | | |
| 6HDPA | | | / | ANSI-SYM | 65.00 | | | 39.58( -39.1%) | | | | | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
6LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6LAC1A-MAIN | GE | /TQD | ANSI-SYM | 10.00 | | | 3.88( -61.2%) | | |
| 6LAC1A | | / | ANSI-SYM | 10.00 | | | 3.88( -61.2%) | | |

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Equipment Duty Comparison Report For Bus:
6LAIA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6LA1A -MAIN | GE | /TQD | ANSI-SYM | 10.00 | | | 3.87( -61.3%) | | |
| B 6LA1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 3.87( -61.3%) | | |
| 6LAIA | | / | ANSI-SYM | 10.00 | | | 3.87( -61.3%) | | |

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Equipment Duty Comparison Report For Bus:
9HA2A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9HA2A-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 29.41( -54.7%) | | |
| 9HA2A | | / | ANSI-SYM | 42.00 | | | 29.41( -30.0%) | | |

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Equipment Duty Comparison Report For Bus:
9HA2B Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9HA2B-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 28.05( -56.8%) | | |
| 9HA2B | | / | ANSI-SYM | 42.00 | | | 28.05( -33.2%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
9LA2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LA2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.19( -48.1%) | | |
| 9LA2A | | / | ANSI-SYM | 10.00 | | | 5.19( -48.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
9LAC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LAC2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.33( -46.7%) | | |
| 9LAC2A | | / | ANSI-SYM | 10.00 | | | 5.33( -46.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
9LAC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LAC2B-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.26( -47.4%) | | |
| 9LAC2B | | / | ANSI-SYM | 10.00 | | | 5.26( -47.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
9LB2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LB2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 6.48( -35.2%) | | |
| 9LB2A | | / | ANSI-SYM | 10.00 | | | 6.48( -35.2%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
9LBC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LBC2A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 6.48( -35.2%) | | |
| 9LBC2A | / | ANSI-SYM | 10.00 | | | 6.48( -35.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
9LBC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 9LBC2B | / | ANSI-SYM | 10.00 | | | 6.48( -35.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
9LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LAC2A | GE /THQD | ANSI-SYM | 22.00 | | | 5.48( -75.1%) | | |
| B 9LAC2B | GE /THQD | ANSI-SYM | 22.00 | | | 5.48( -75.1%) | | |
| B 9LA2A | GE /THQD | ANSI-SYM | 22.00 | | | 5.48( -75.1%) | | |
| B 9LDPA-MAIN | GE /SGD | ANSI-SYM | 65.00 | | | 5.48( -91.6%) | | |
| 9LDPA | / | ANSI-SYM | 22.00 | | | 5.48( -75.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
9LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LDPB | GE /THQD | ANSI-SYM | 22.00 | | | 6.71( -69.5%) | | |
| B 9LBC2A | GE /THQD | ANSI-SYM | 22.00 | | | 6.71( -69.5%) | | |
| B 9LBC2B | GE /THQD | ANSI-SYM | 22.00 | | | 6.71( -69.5%) | | |
| B 9LB2A | GE /THQD | ANSI-SYM | 22.00 | | | 6.71( -69.5%) | | |
| B 9LDPB-MAIN | GE /SGH6 | ANSI-SYM | 65.00 | | | 6.71( -89.7%) | | |
| 9LDPB | / | ANSI-SYM | 22.00 | | | 6.71( -69.5%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
MCCA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| MCCA | | / | ANSI-SYM | 65.00 | | 37.39( -42.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
MDB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B MDB | GE | /TP40 | ANSI-SYM | 100.00 | | 54.81( -45.2%) | | |
| MDB | | / | ANSI-SYM | 65.00 | | 52.66( -19.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
MSB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B MSB-ATS EH2A | GE | /SFL | ANSI-SYM | 65.00 | | 54.73( -15.8%) | | |
| B 6HDPA | GE | /SKL12 | ANSI-SYM | 65.00 | | 54.73( -15.8%) | | |
| B 1HDPA | GE | /SKL8 | ANSI-SYM | 65.00 | | 54.54( -16.1%) | | |
| B SPARE | GE | /SEL | ANSI-SYM | 65.00 | | 54.73( -15.8%) | | |
| B 2HDPA | GE | /SKL12 | ANSI-SYM | 65.00 | | 54.73( -15.8%) | | |
| B MCCA | GE | /SGL4 | ANSI-SYM | 65.00 | | 54.73( -15.8%) | | |
| B 5HDPA | GE | /SS-20 | ANSI-SYM | 65.00 | | 54.42( -16.3%) | | |
| MSB | | / | ANSI-SYM | 65.00 | | 52.30( -19.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 1EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1EL1- HI MAIN | GE | /TED (600V) | ANSI-SYM | 18.00 | | 2.90( -83.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
TX 1EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 1EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.29( -87.1%) | | | |

**********

Equipment Duty Comparison Report For Bus:
TX 2EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 15.33( -14.8%) | | | |

**********

Equipment Duty Comparison Report For Bus:
TX 2EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.46( -85.4%) | | | |

**********

Equipment Duty Comparison Report For Bus:
TX 3EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 3EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 5.03( -72.1%) | | | |

**********

Equipment Duty Comparison Report For Bus:
TX 3EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 3EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.37( -86.3%) | | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
TX 4EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 3.87( -78.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 4EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.89( -81.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 5EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 4.79( -73.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 5EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.36( -86.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 6EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 4.22( -76.6%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
TX 6EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.36( -86.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 5I Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| UPS 5I | / | ANSI-SYM | 10.00 | | | 1.34( -86.6%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 5O Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| UPS 5O | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 8I Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| UPS 8I | / | ANSI-SYM | 10.00 | | | 1.35( -86.5%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 8O Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| UPS 8O | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
UPS3A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS3A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS 3A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS3A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS5A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS5A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS 5A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS5A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS8A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS8A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS 8A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS8A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS9A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS 9A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS9A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS9A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

# Three Phase Bolted Fault

# Low Voltage Momentary Report

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 1EH1 | 0.480 | 3282.8 | 3282.8 | 0.30 | 1.00 | 3282.8 | | | | |
| | | | | | | | C 1EH1 | 2EHDP | 3282.8 | 0.30 |
| | | | | | | | C 1EL1 | TX 1EL1 H | 0.0 | 0.81 |
| 1EL1 | 0.208 | 1285.9 | 1285.9 | 1.18 | 1.01 | 1300.3 | | | | |
| | | | | | | | B 1EL1-MAIN | TX 1EL1 L | 1285.9 | 1.18 |
| 1HAIA | 0.480 | 17112.8 | 17112.8 | 1.91 | 1.06 | 18056.4 | | | | |
| | | | | | | | C 1HAIA | 1HDPA | 17112.8 | 1.91 |
| 1HAIB | 0.480 | 17112.8 | 17112.8 | 1.91 | 1.06 | 18056.4 | | | | |
| | | | | | | | C 1HAIB | 1HDPA | 17112.8 | 1.91 |
| 1HAIC | 0.480 | 17112.8 | 17112.8 | 1.91 | 1.06 | 18056.4 | | | | |
| | | | | | | | C 1HAIC | 1HDPA | 17112.8 | 1.91 |
| 1HDPA | 0.480 | 17767.4 | 17767.4 | 2.01 | 1.06 | 18879.0 | | | | |
| | | | | | | | C 1HDPA | MSB | 17586.1 | 2.00 |
| | | | | | | | C 1HAIA | 1HAIA | 0.0 | 2.67 |
| | | | | | | | C 1HAIB | 1HAIB | 0.0 | 2.67 |
| | | | | | | | C 1HAIC | 1HAIC | 0.0 | 2.67 |
| | | | | | | | C ELEV 160 | ELEV 160 | 185.6 | 3.99 |
| | | | | | | | C TX T1LDPA | TX T1LDPA H | 0.0 | 2.23 |
| 1LA1A | 0.208 | 5141.4 | 5141.4 | 1.81 | 1.05 | 5385.7 | | | | |
| | | | | | | | C 1LA1A | 1LDPA | 5141.4 | 1.81 |
| 1LA2A | 0.208 | 5010.8 | 5010.8 | 1.76 | 1.04 | 5230.1 | | | | |
| | | | | | | | C 1LA2A | 1LDPA | 5010.8 | 1.76 |
| 1LAC1A | 0.208 | 4885.9 | 4885.9 | 1.71 | 1.04 | 5083.4 | | | | |
| | | | | | | | C 1LAC1A | 1LDPA | 4885.9 | 1.71 |
| 1LAC2A | 0.208 | 5010.8 | 5010.8 | 1.76 | 1.04 | 5230.1 | | | | |
| | | | | | | | C 1LAC2A | 1LDPA | 5010.8 | 1.76 |
| 1LDPA | 0.208 | 5278.1 | 5278.1 | 1.87 | 1.05 | 5551.2 | | | | |
| | | | | | | | C 1LDPA | TX T1LDPA T1L | 5278.1 | 1.87 |
| | | | | | | | C 1LAC1A | 1LAC1A | 0.0 | 1.45 |
| | | | | | | | C 1LAC2A | 1LAC2A | 0.0 | 150.00 |
| | | | | | | | C 1LA1A | 1LA1A | 0.0 | 150.00 |
| | | | | | | | C 1LA2A | 1LA2A | 0.0 | 150.00 |
| 2EH1 | 0.480 | 31998.7 | 31998.7 | 1.38 | 1.02 | 32646.1 | | | | |
| | | | | | | | C 2EH1 | 2EHDP | 31998.7 | 1.38 |
| | | | | | | | C 2EL1 | TX 2EL1 H | 0.0 | 0.81 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 2EHDP | 0.480 | 37539.6 | 37539.6 | 2.00 | 1.06 | 39850.4 | | | | |
| | | | | | | | C 2EHDP | ATS EH2A1 | 37539.6 | 2.00 |
| | | | | | | | C 2EH1 | 2EH1 | 0.0 | 0.81 |
| | | | | | | | C 1EH1 | 1EH1 | 0.0 | 0.81 |
| | | | | | | | C 3EH1 | 3EH1 | 0.0 | 4.07 |
| | | | | | | | C 4EH1 | 4EH1 | 0.0 | 1.10 |
| | | | | | | | C 5EH1 | 5EH1 | 0.0 | 4.07 |
| | | | | | | | C 6EH1 | 6EH1 | 0.0 | 0.81 |
| 2EL1 | 0.208 | 1461.2 | 1461.2 | 1.48 | 1.03 | 1498.8 | | | | |
| | | | | | | | B 2EL1-MAIN | TX 2EL1 L | 1461.2 | 1.48 |
| 2HAIA | 0.480 | 42150.3 | 42150.3 | 2.82 | 1.13 | 47467.0 | | | | |
| | | | | | | | C 2HAIA | 2HDPA | 42150.3 | 2.82 |
| 2HAIB | 0.480 | 46555.1 | 46555.1 | 4.32 | 1.23 | 57318.8 | | | | |
| | | | | | | | C 2HAIB | 2HDPA | 46555.1 | 4.32 |
| 2HAIC | 0.480 | 43966.1 | 43966.1 | 3.13 | 1.15 | 50557.5 | | | | |
| | | | | | | | C 2HAIC | 2HDPA | 43966.1 | 3.13 |
| 2HDPA | 0.480 | 50081.0 | 50081.0 | 5.03 | 1.27 | 63657.5 | | | | |
| | | | | | | | C 2HDPA | MSB | 50081.0 | 5.03 |
| | | | | | | | C 2HAIA | 2HAIA | 0.0 | 1.45 |
| | | | | | | | C 2HAIB | 2HAIB | 0.0 | 0.70 |
| | | | | | | | C 2HAIC | 2HAIC | 0.0 | 1.45 |
| | | | | | | | C TX T2LDPA | TX T2LDPA H | 0.0 | 3.50 |
| | | | | | | | C 2HS1 | 2HS1 | 0.0 | 1.45 |
| | | | | | | | C 2HS2 | 2HS2 | 0.0 | 1.45 |
| 2HS1 | 0.480 | 45893.3 | 45893.3 | 3.55 | 1.18 | 54164.5 | | | | |
| | | | | | | | C 2HS1 | 2HDPA | 45893.3 | 3.55 |
| 2HS2 | 0.480 | 43966.1 | 43966.1 | 3.13 | 1.15 | 50557.5 | | | | |
| | | | | | | | C 2HS2 | 2HDPA | 43966.1 | 3.13 |
| 2LA1A | 0.208 | 9835.4 | 9835.4 | 2.52 | 1.10 | 10845.4 | | | | |
| | | | | | | | C 2LA1A | 2LDPA | 9835.4 | 2.52 |
| 2LA1B | 0.208 | 9835.4 | 9835.4 | 2.52 | 1.10 | 10845.4 | | | | |
| | | | | | | | C 2LA1B | 2LDPA | 9835.4 | 2.52 |
| 2LA1KA | 0.208 | 7068.5 | 7068.5 | 1.61 | 1.03 | 7307.4 | | | | |
| | | | | | | | C 2LA1KA | 2LDPA | 7068.5 | 1.61 |
| 2LA1KB | 0.208 | 6583.5 | 6583.5 | 1.51 | 1.03 | 6764.2 | | | | |
| | | | | | | | C 2LA1KB | 2LDPA | 6583.5 | 1.51 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 2LA1KC | 0.208 | 6818.1 | 6818.1 | 1.55 | 1.03 | 7025.2 | | | | |
| | | | | | | | C 2LA1KC | 2LDPA | 6818.1 | 1.55 |
| 2LAC1A | 0.208 | 9835.4 | 9835.4 | 2.52 | 1.10 | 10845.4 | | | | |
| | | | | | | | C 2LAC1A | 2LDPA | 9835.4 | 2.52 |
| 2LDPA | 0.208 | 10810.6 | 10810.6 | 3.13 | 1.15 | 12429.6 | | | | |
| | | | | | | | C 2LDPA | TX T2LDPA T2L | 10810.6 | 3.13 |
| | | | | | | | C 2LAC1A | 2LAC1A | 0.0 | 150.00 |
| | | | | | | | C 2LA1A | 2LA1A | 0.0 | 150.00 |
| | | | | | | | C 2LA1B | 2LA1B | 0.0 | 150.00 |
| | | | | | | | C 2LA1KA | 2LA1KA | 0.0 | 1.45 |
| | | | | | | | C 2LA1KB | 2LA1KB | 0.0 | 1.45 |
| | | | | | | | C 2LA1KC | 2LA1KC | 0.0 | 150.00 |
| 3EH1 | 0.480 | 5463.6 | 5463.6 | 0.35 | 1.00 | 5463.6 | | | | |
| | | | | | | | C 3EH1 | 2EHDP | 5463.6 | 0.35 |
| | | | | | | | C 3EL1 | TX 3EL1 H | 0.0 | 4.07 |
| 3EL1 | 0.208 | 1370.8 | 1370.8 | 1.32 | 1.02 | 1394.8 | | | | |
| | | | | | | | C UPS 8 | UPS 8I | 0.0 | 1.81 |
| | | | | | | | B 3EL1-MAIN | TX 3EL1 L | 1370.8 | 1.32 |
| 4EH1 | 0.480 | 4130.1 | 4130.1 | 0.32 | 1.00 | 4130.1 | | | | |
| | | | | | | | C 4EH1 | 2EHDP | 4130.1 | 0.32 |
| | | | | | | | C 4EL1 | TX 4EL1 H | 0.0 | 1.10 |
| 4EL1 | 0.208 | 1885.8 | 1885.8 | 1.18 | 1.01 | 1906.5 | | | | |
| | | | | | | | B 4EL1-MAIN | TX 4EL1 L | 1885.8 | 1.18 |
| 5EH1 | 0.480 | 5184.9 | 5184.9 | 0.34 | 1.00 | 5184.9 | | | | |
| | | | | | | | C 5EH1 | 2EHDP | 5184.9 | 0.34 |
| | | | | | | | C 5EL1 | TX 5EL1 H | 0.0 | 4.07 |
| 5EL1 | 0.208 | 1364.7 | 1364.7 | 1.31 | 1.02 | 1387.8 | | | | |
| | | | | | | | C UPS 5 | UPS 5I | 0.0 | 1.79 |
| | | | | | | | B 5EL1-MAIN | TX 5EL1 L | 1364.7 | 1.31 |
| 5HA1A | 0.480 | 34136.2 | 34136.2 | 2.49 | 1.10 | 37543.4 | | | | |
| | | | | | | | C 5HA1A | 5HDPA | 34136.2 | 2.49 |
| 5HA1B | 0.480 | 34775.7 | 34775.7 | 2.87 | 1.13 | 39287.3 | | | | |
| | | | | | | | C 5HA1B | 5HDPA | 34775.7 | 2.87 |
| 5HA1C | 0.480 | 34775.7 | 34775.7 | 2.87 | 1.13 | 39287.3 | | | | |
| | | | | | | | C 5HA1C | 5HDPA | 34775.7 | 2.87 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 5HA1D | 0.480 | 34136.2 | 34136.2 | 2.49 | 1.10 | 37543.4 | | | | |
| | | | | | | | C 5HA1D | 5HDPA | 34136.2 | 2.49 |
| 5HA1E | 0.480 | 23628.3 | 23628.3 | 1.54 | 1.03 | 24327.3 | | | | |
| | | | | | | | C 5HA1E | 5HDPA | 23628.3 | 1.54 |
| 5HDPA | 0.480 | 39434.8 | 39434.8 | 3.54 | 1.18 | 46514.7 | | | | |
| | | | | | | | C 5HDPA | MSB | 39131.6 | 3.54 |
| | | | | | | | C 5HA1A | 5HA1A | 0.0 | 1.45 |
| | | | | | | | C 5HA1B | 5HA1B | 0.0 | 0.94 |
| | | | | | | | C 9HA2A | 9HA2A | 0.0 | 0.94 |
| | | | | | | | C 9HA2B | 9HA2B | 0.0 | 150.00 |
| | | | | | | | C TX T9LDPB | TX T9LDPB H | 0.0 | 3.21 |
| | | | | | | | C TX T9LDPA | TX T9LDPA H | 0.0 | 0.26 |
| | | | | | | | C TX T5LDPA | TX T5LDPA H | 0.0 | 150.00 |
| | | | | | | | C TX T5LDPB | TX T5LDPB H | 0.0 | 1.29 |
| | | | | | | | C ELEV 560 | ELEV 560 | 187.2 | 4.35 |
| | | | | | | | C CA | CA | 116.4 | 3.09 |
| | | | | | | | C 5HA1C | 5HA1C | 0.0 | 0.94 |
| | | | | | | | C 5HA1D | 5HA1D | 0.0 | 1.45 |
| | | | | | | | C 5HA1E | 5HA1E | 0.0 | 1.45 |
| 5LA1A | 0.208 | 5307.0 | 5307.0 | 1.76 | 1.04 | 5539.5 | | | | |
| | | | | | | | C 5LA1A | 5LDPA | 5307.0 | 1.76 |
| 5LAC1A | 0.208 | 5379.5 | 5379.5 | 1.78 | 1.05 | 5625.5 | | | | |
| | | | | | | | C 5LAC1A | 5LDPA | 5379.5 | 1.78 |
| 5LAC1B | 0.208 | 5379.5 | 5379.5 | 1.78 | 1.05 | 5625.5 | | | | |
| | | | | | | | C 5LAC1B | 5LDPA | 5379.5 | 1.78 |
| 5LB1A | 0.208 | 9149.4 | 9149.4 | 2.41 | 1.09 | 10009.7 | | | | |
| | | | | | | | C 5LB1A | 5LDPB | 9149.4 | 2.41 |
| 5LB1B | 0.208 | 8407.8 | 8407.8 | 2.10 | 1.07 | 8990.5 | | | | |
| | | | | | | | C 5LB1B | 5LDPB | 8407.8 | 2.10 |
| 5LB1C | 0.208 | 5874.5 | 5874.5 | 1.43 | 1.02 | 6008.9 | | | | |
| | | | | | | | C 5LB1C | 5LDPB | 5874.5 | 1.43 |
| 5LBC1A | 0.208 | 9149.4 | 9149.4 | 2.41 | 1.09 | 10009.7 | | | | |
| | | | | | | | C 5LBC1A | 5LDPB | 9149.4 | 2.41 |
| 5LBC1B | 0.208 | 9149.4 | 9149.4 | 2.41 | 1.09 | 10009.7 | | | | |
| | | | | | | | C 5LBC1B | 5LDPB | 9149.4 | 2.41 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 5LDPA | 0.208 | 5687.5 | 5687.5 | 1.91 | 1.05 | 5999.4 | | | | |
| | | | | | | | C 5LDPA | TX T5LDPA L | 5687.5 | 1.91 |
| | | | | | | | C 5LAC1A | 5LAC1A | 0.0 | 150.00 |
| | | | | | | | C 5LAC1B | 5LAC1B | 0.0 | 150.00 |
| | | | | | | | C 5LA1A | 5LA1A | 0.0 | 1.45 |
| 5LDPB | 0.208 | 9999.6 | 9999.6 | 2.91 | 1.13 | 11328.4 | | | | |
| | | | | | | | C 5LDPB | TX T5LDPB L | 9999.6 | 2.91 |
| | | | | | | | C 5LBC1A | 5LBC1A | 0.0 | 150.00 |
| | | | | | | | C 5LBC1B | 5LBC1B | 0.0 | 150.00 |
| | | | | | | | C 5LB1A | 5LB1A | 0.0 | 150.00 |
| | | | | | | | C 5LB1C | 5LB1C | 0.0 | 0.29 |
| | | | | | | | C 5LB1B | 5LB1B | 0.0 | 150.00 |
| 6EH1 | 0.480 | 8495.6 | 8495.6 | 0.42 | 1.00 | 8495.6 | | | | |
| | | | | | | | C 6EH1 | 2EHDP | 8495.6 | 0.42 |
| | | | | | | | C 6EL1 | TX 6EL1 H | 0.0 | 0.81 |
| 6EL1 | 0.208 | 1357.1 | 1357.1 | 1.26 | 1.01 | 1376.7 | | | | |
| | | | | | | | B 6EL1-MAIN | TX 6EL1 L | 1357.1 | 1.26 |
| 6HAIA | 0.480 | 36610.6 | 36610.6 | 2.28 | 1.08 | 39676.7 | | | | |
| | | | | | | | C 6HAIA | 6HDPA | 36610.6 | 2.28 |
| 6HAIB | 0.480 | 36610.6 | 36610.6 | 2.28 | 1.08 | 39676.7 | | | | |
| | | | | | | | C 6HAIB | 6HDPA | 36610.6 | 2.28 |
| 6HAIC | 0.480 | 36610.6 | 36610.6 | 2.28 | 1.08 | 39676.7 | | | | |
| | | | | | | | C 6HAIC | 6HDPA | 36610.6 | 2.28 |
| 6HDPA | 0.480 | 39577.3 | 39577.3 | 2.64 | 1.11 | 44021.4 | | | | |
| | | | | | | | C 6HDPA | MSB | 39577.3 | 2.64 |
| | | | | | | | C 6HAIA | 6HAIA | 0.0 | 1.60 |
| | | | | | | | C 6HAIB | 6HAIB | 0.0 | 1.60 |
| | | | | | | | C 6HAIC | 6HAIC | 0.0 | 1.60 |
| | | | | | | | C TX T6LAIA | TX T6LAIA H | 0.0 | 0.55 |
| | | | | | | | C TX T6LAC1A | TX T6LAC1A H | 0.0 | 3.40 |
| 6LAC1A | 0.208 | 3879.8 | 3879.8 | 1.72 | 1.04 | 4040.5 | | | | |
| | | | | | | | C 6LAC1A | TX T6LAC1A L | 3879.8 | 1.72 |
| 6LAIA | 0.208 | 3867.2 | 3867.2 | 1.71 | 1.04 | 4024.2 | | | | |
| | | | | | | | C 6LAIA | TX T6LAIA L | 3867.2 | 1.71 |
| 9HA2A | 0.480 | 29413.9 | 29413.9 | 2.35 | 1.09 | 32021.4 | | | | |
| | | | | | | | C 9HA2A | 5HDPA | 29413.9 | 2.35 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 9HA2B | 0.480 | 28052.6 | 28052.6 | 1.85 | 1.05 | 29459.9 | | | | |
| | | | | | | | C 9HA2B | 5HDPA | 28052.6 | 1.85 |
| 9LA2A | 0.208 | 5189.2 | 5189.2 | 1.70 | 1.04 | 5397.6 | | | | |
| | | | | | | | C 9LA2A | 9LDPA | 5189.2 | 1.70 |
| 9LAC2A | 0.208 | 5330.4 | 5330.4 | 1.76 | 1.04 | 5563.2 | | | | |
| | | | | | | | C 9LAC2A | 9LDPA | 5330.4 | 1.76 |
| 9LAC2B | 0.208 | 5259.0 | 5259.0 | 1.73 | 1.04 | 5479.1 | | | | |
| | | | | | | | C 9LAC2B | 9LDPA | 5259.0 | 1.73 |
| 9LB2A | 0.208 | 6475.2 | 6475.2 | 1.93 | 1.06 | 6840.3 | | | | |
| | | | | | | | C 9LB2A | 9LDPB | 6475.2 | 1.93 |
| 9LBC2A | 0.208 | 6475.2 | 6475.2 | 1.93 | 1.06 | 6840.3 | | | | |
| | | | | | | | C 9LBC2A | 9LDPB | 6475.2 | 1.93 |
| 9LBC2B | 0.208 | 6475.2 | 6475.2 | 1.93 | 1.06 | 6840.3 | | | | |
| | | | | | | | C 9LBC2B | 9LDPB | 6475.2 | 1.93 |
| 9LDPA | 0.208 | 5478.4 | 5478.4 | 1.81 | 1.05 | 5739.6 | | | | |
| | | | | | | | C 9LDPA | TX T9LDPA L | 5478.4 | 1.81 |
| | | | | | | | C 9LAC2A | 9LAC2A | 0.0 | 150.00 |
| | | | | | | | C 9LAC2B | 9LAC2B | 0.0 | 150.00 |
| | | | | | | | C 9LA2A | 9LA2A | 0.0 | 150.00 |
| 9LDPB | 0.208 | 6712.3 | 6712.3 | 2.03 | 1.06 | 7139.7 | | | | |
| | | | | | | | C 9LDPB | TX T9LDPB L | 6712.3 | 2.03 |
| | | | | | | | C 9LBC2A | 9LBC2A | 0.0 | 150.00 |
| | | | | | | | C 9LBC2B | 9LBC2B | 0.0 | 150.00 |
| | | | | | | | C 9LB2A | 9LB2A | 0.0 | 150.00 |
| ATS EH2A1 | 0.480 | 41163.8 | 41163.8 | 2.39 | 1.09 | 44958.2 | | | | |
| | | | | | | | C 2EHDP | 2EHDP | 0.0 | 2.59 |
| | | | | | | | C MSB-ATS EH2A | MSB | 41163.8 | 2.39 |
| CA | 0.480 | 5702.8 | 5702.8 | 0.31 | 1.00 | 5702.8 | | | | |
| | | | | | | | M CA | | 117.4 | 3.29 |
| | | | | | | | C CA | 5HDPA | 5638.0 | 0.29 |
| EGH1 | 0.480 | 1699.7 | 1802.0 | 9.80 | 1.44 | 2446.7 | | | | |
| | | | | | | | GEN EGH1 | | 1699.7 | 9.80 |
| | | | | | | | C EGH1-ATS EH2A | ATS EH2A1 | 0.0 | 0.02 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| ELEV 160 | 0.480 | 4903.2 | 4903.2 | 0.43 | 1.00 | 4903.2 | | | | |
| | | | | | | | M ELEV 160 | | 187.8 | 4.56 |
| | | | | | | | C ELEV 160 | 1HDPA | 4796.2 | 0.39 |
| ELEV 560 | 0.480 | 14306.9 | 14306.9 | 0.48 | 1.00 | 14307.3 | | | | |
| | | | | | | | M ELEV 560 | | 187.8 | 4.56 |
| | | | | | | | C ELEV 560 | 5HDPA | 14192.0 | 0.47 |
| MCCA | 0.480 | 37394.5 | 37394.5 | 3.31 | 1.16 | 43496.7 | | | | |
| | | | | | | | C MCCA | MSB | 37394.5 | 3.31 |
| MDB | 0.480 | 52664.7 | 52664.7 | 6.39 | 1.33 | 70289.6 | | | | |
| | | | | | | | C MSB | MSB | 487.0 | 3.83 |
| | | | | | | | C MDB | TX NPC L | 52180.2 | 6.43 |
| MSB | 0.480 | 52302.5 | 52302.5 | 6.25 | 1.33 | 69506.2 | | | | |
| | | | | | | | C MSB | MDB | 51817.8 | 6.29 |
| | | | | | | | C MSB-ATS EH2A | ATS EH2A1 | 0.0 | 1.27 |
| | | | | | | | C 6HDPA | 6HDPA | 0.0 | 0.32 |
| | | | | | | | C 1HDPA | 1HDPA | 184.3 | 3.95 |
| | | | | | | | C 2HDPA | 2HDPA | 0.0 | 1.25 |
| | | | | | | | C MCCA | MCCA | 0.0 | 150.00 |
| | | | | | | | C 5HDPA | 5HDPA | 302.7 | 3.76 |
| TX 1EL1 H | 0.480 | 2902.1 | 2902.1 | 0.27 | 1.00 | 2902.1 | | | | |
| | | | | | | | TX 1EL1 | TX 1EL1 L | 0.0 | 0.81 |
| | | | | | | | C 1EL1 | 1EH1 | 2902.1 | 0.27 |
| TX 1EL1 L | 0.208 | 1285.9 | 1285.9 | 1.18 | 1.01 | 1300.3 | | | | |
| | | | | | | | TX 1EL1 | TX 1EL1 H | 1285.9 | 1.18 |
| | | | | | | | B 1EL1-MAIN | 1EL1 | 0.0 | 0.00 |
| TX 2EL1 H | 0.480 | 15329.8 | 15329.8 | 0.45 | 1.00 | 15330.0 | | | | |
| | | | | | | | TX 2EL1 | TX 2EL1 L | 0.0 | 0.81 |
| | | | | | | | C 2EL1 | 2EH1 | 15329.8 | 0.45 |
| TX 2EL1 L | 0.208 | 1461.2 | 1461.2 | 1.48 | 1.03 | 1498.8 | | | | |
| | | | | | | | TX 2EL1 | TX 2EL1 H | 1461.2 | 1.48 |
| | | | | | | | B 2EL1-MAIN | 2EL1 | 0.0 | 0.00 |
| TX 3EL1 H | 0.480 | 5027.4 | 5027.4 | 0.33 | 1.00 | 5027.4 | | | | |
| | | | | | | | TX 3EL1 | TX 3EL1 L | 0.0 | 4.07 |
| | | | | | | | C 3EL1 | 3EH1 | 5027.4 | 0.33 |
| TX 3EL1 L | 0.208 | 1370.8 | 1370.8 | 1.32 | 1.02 | 1394.8 | | | | |
| | | | | | | | TX 3EL1 | TX 3EL1 H | 1370.8 | 1.32 |
| | | | | | | | B 3EL1-MAIN | 3EL1 | 0.0 | 1.00 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX 4EL1 H | 0.480 | 3874.6 | 3874.6 | 0.31 | 1.00 | 3874.6 | | | | |
| | | | | | | | TX 4EL1 | TX 4EL1 L | 0.0 | 1.10 |
| | | | | | | | C 4EL1 | 4EH1 | 3874.6 | 0.31 |
| TX 4EL1 L | 0.208 | 1885.8 | 1885.8 | 1.18 | 1.01 | 1906.5 | | | | |
| | | | | | | | TX 4EL1 | TX 4EL1 H | 1885.8 | 1.18 |
| | | | | | | | B 4EL1-MAIN | 4EL1 | 0.0 | 0.00 |
| TX 5EL1 H | 0.480 | 4790.0 | 4790.0 | 0.32 | 1.00 | 4790.0 | | | | |
| | | | | | | | TX 5EL1 | TX 5EL1 L | 0.0 | 4.07 |
| | | | | | | | C 5EL1 | 5EH1 | 4790.0 | 0.32 |
| TX 5EL1 L | 0.208 | 1364.7 | 1364.7 | 1.31 | 1.02 | 1387.8 | | | | |
| | | | | | | | TX 5EL1 | TX 5EL1 H | 1364.7 | 1.31 |
| | | | | | | | B 5EL1-MAIN | 5EL1 | 0.0 | 2.31 |
| TX 6EL1 H | 0.480 | 4216.8 | 4216.8 | 0.22 | 1.00 | 4216.8 | | | | |
| | | | | | | | TX 6EL1 | TX 6EL1 L | 0.0 | 0.81 |
| | | | | | | | C 6EL1 | 6EH1 | 4216.8 | 0.22 |
| TX 6EL1 L | 0.208 | 1357.1 | 1357.1 | 1.26 | 1.01 | 1376.7 | | | | |
| | | | | | | | TX 6EL1 | TX 6EL1 H | 1357.1 | 1.26 |
| | | | | | | | B 6EL1-MAIN | 6EL1 | 0.0 | 0.00 |
| TX NPC L | 0.480 | 53967.8 | 54429.4 | 6.95 | 1.36 | 73193.0 | | | | |
| | | | | | | | NPC | | 53484.0 | 7.00 |
| | | | | | | | C MDB | MDB | 486.9 | 3.83 |
| TX T1LDPA H | 0.480 | 16937.6 | 16937.6 | 1.83 | 1.05 | 17773.5 | | | | |
| | | | | | | | TX T1LDPA | TX T1LDPA T1L | 0.0 | 0.74 |
| | | | | | | | C TX T1LDPA | 1HDPA | 16937.6 | 1.83 |
| TX T1LDPA T1L | 0.208 | 5385.0 | 5385.0 | 1.88 | 1.05 | 5668.0 | | | | |
| | | | | | | | TX T1LDPA | TX T1LDPA H | 5385.0 | 1.88 |
| | | | | | | | C 1LDPA | 1LDPA | 0.0 | 0.70 |
| TX T2LDPA H | 0.480 | 40725.9 | 40725.9 | 3.51 | 1.18 | 47962.9 | | | | |
| | | | | | | | TX T2LDPA | TX T2LDPA T2L | 0.0 | 3.22 |
| | | | | | | | C TX T2LDPA | 2HDPA | 40725.9 | 3.51 |
| TX T2LDPA T2L | 0.208 | 11025.9 | 11025.9 | 3.20 | 1.15 | 12733.7 | | | | |
| | | | | | | | TX T2LDPA | TX T2LDPA H | 11025.9 | 3.20 |
| | | | | | | | C 2LDPA | 2LDPA | 0.0 | 2.28 |
| TX T5LDPA H | 0.480 | 36041.3 | 36041.3 | 2.56 | 1.11 | 39842.1 | | | | |
| | | | | | | | TX T5LDPA | TX T5LDPA L | 0.0 | 1.27 |
| | | | | | | | C TX T5LDPA | 5HDPA | 36041.3 | 2.56 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX T5LDPA L | 0.208 | 5811.7 | 5811.7 | 1.92 | 1.06 | 6136.1 | | | | |
| | | | | | | | TX T5LDPA | TX T5LDPA H | 5811.7 | 1.92 |
| | | | | | | | C 5LDPA | 5LDPA | 0.0 | 0.70 |
| TX T5LDPB H | 0.480 | 23799.6 | 23799.6 | 2.29 | 1.08 | 25808.4 | | | | |
| | | | | | | | TX T5LDPB | TX T5LDPB L | 0.0 | 2.02 |
| | | | | | | | C TX T5LDPB | 5HDPA | 23799.6 | 2.29 |
| TX T5LDPB L | 0.208 | 10184.8 | 10184.8 | 2.96 | 1.14 | 11578.4 | | | | |
| | | | | | | | TX T5LDPB | TX T5LDPB H | 10184.8 | 2.96 |
| | | | | | | | C 5LDPB | 5LDPB | 0.0 | 0.70 |
| TX T6LAC1A H | 0.480 | 34737.7 | 34737.7 | 1.79 | 1.05 | 36341.7 | | | | |
| | | | | | | | TX T6LAC1A | TX T6LAC1A L | 0.0 | 0.46 |
| | | | | | | | C TX T6LAC1A | 6HDPA | 34737.7 | 1.79 |
| TX T6LAC1A L | 0.208 | 3958.0 | 3958.0 | 1.76 | 1.04 | 4132.6 | | | | |
| | | | | | | | TX T6LAC1A | TX T6LAC1A H | 3958.0 | 1.76 |
| | | | | | | | C 6LAC1A | 6LAC1A | 0.0 | 150.00 |
| TX T6LAIA H | 0.480 | 32529.7 | 32529.7 | 1.56 | 1.03 | 33529.6 | | | | |
| | | | | | | | TX T6LAIA | TX T6LAIA L | 0.0 | 0.42 |
| | | | | | | | C TX T6LAIA | 6HDPA | 32529.7 | 1.56 |
| TX T6LAIA L | 0.208 | 3945.1 | 3945.1 | 1.75 | 1.04 | 4115.5 | | | | |
| | | | | | | | TX T6LAIA | TX T6LAIA H | 3945.1 | 1.75 |
| | | | | | | | C 6LAIA | 6LAIA | 0.0 | 150.00 |
| TX T9LDPA H | 0.480 | 25616.6 | 25616.6 | 1.38 | 1.02 | 26134.2 | | | | |
| | | | | | | | TX T9LDPA | TX T9LDPA L | 0.0 | 0.29 |
| | | | | | | | C TX T9LDPA | 5HDPA | 25616.6 | 1.38 |
| TX T9LDPA L | 0.208 | 5653.4 | 5653.4 | 1.83 | 1.05 | 5929.0 | | | | |
| | | | | | | | TX T9LDPA | TX T9LDPA H | 5653.4 | 1.83 |
| | | | | | | | C 9LDPA | 9LDPA | 0.0 | 0.62 |
| TX T9LDPB H | 0.480 | 16425.8 | 16425.8 | 1.19 | 1.01 | 16614.2 | | | | |
| | | | | | | | TX T9LDPB | TX T9LDPB L | 0.0 | 1.53 |
| | | | | | | | C TX T9LDPB | 5HDPA | 16425.8 | 1.19 |
| TX T9LDPB L | 0.208 | 6874.7 | 6874.7 | 2.09 | 1.07 | 7343.7 | | | | |
| | | | | | | | TX T9LDPB | TX T9LDPB H | 6874.7 | 2.09 |
| | | | | | | | C 9LDPB | 9LDPB | 0.0 | 1.25 |
| UPS 5I | 0.208 | 1343.1 | 1343.1 | 1.28 | 1.02 | 1363.7 | | | | |
| | | | | | | | C UPS 5 | 5EL1 | 1343.1 | 1.28 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| UPS 5O | 0.208 | 333.1 | 333.1 | 4.56 | 1.25 | 414.7 | | | | |
| | | | | | | | UPS 5 | | 333.1 | 4.56 |
| | | | | | | | C UPS5A | UPS5A | 0.0 | 4.36 |
| UPS 8I | 0.208 | 1349.1 | 1349.1 | 1.29 | 1.02 | 1370.4 | | | | |
| | | | | | | | C UPS 8 | 3EL1 | 1349.1 | 1.29 |
| UPS 8O | 0.208 | 333.1 | 333.1 | 4.56 | 1.25 | 414.7 | | | | |
| | | | | | | | UPS 8 | | 333.1 | 4.56 |
| | | | | | | | C UPS8A | UPS8A | 0.0 | 4.36 |
| UPS3A | 0.208 | 331.6 | 331.6 | 4.37 | 1.23 | 409.2 | | | | |
| | | | | | | | C UPS3A | UPS8A | 331.6 | 4.37 |
| UPS5A | 0.208 | 332.4 | 332.4 | 4.46 | 1.24 | 411.9 | | | | |
| | | | | | | | C UPS5A | UPS 5O | 332.4 | 4.46 |
| | | | | | | | C UPS9A | UPS9A | 0.0 | 0.04 |
| UPS8A | 0.208 | 332.4 | 332.4 | 4.46 | 1.24 | 411.9 | | | | |
| | | | | | | | C UPS8A | UPS 8O | 332.4 | 4.46 |
| | | | | | | | C UPS3A | UPS3A | 0.0 | 0.04 |
| UPS9A | 0.208 | 331.6 | 331.6 | 4.37 | 1.23 | 409.2 | | | | |
| | | | | | | | C UPS9A | UPS5A | 331.6 | 4.37 |

# Three Phase Bolted Fault

# Low Voltage Interrupting Report

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___3 PHASE Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 1EH1 | 0.480 | 3282.1 | 1.04 | 1.00 | 3282.1 | | | | |
| | | | | | | C 1EH1 | 2EHDP | 3282.1 | 0.3 |
| | | | | | | C 1EL1 | TX 1EL1 H | 0.0 | 0.8 |
| 1EL1 | 0.208 | 1285.8 | 1.55 | 1.00 | 1285.8 | | | | |
| | | | | | | B 1EL1-MAIN | TX 1EL1 L | 1285.8 | 1.2 |
| 1HAIA | 0.480 | 16914.7 | 2.15 | 1.00 | 16914.7 | | | | |
| | | | | | | C 1HAIA | 1HDPA | 16914.7 | 1.9 |
| 1HAIB | 0.480 | 16914.7 | 2.15 | 1.00 | 16914.7 | | | | |
| | | | | | | C 1HAIB | 1HDPA | 16914.7 | 1.9 |
| 1HAIC | 0.480 | 16914.7 | 2.15 | 1.00 | 16914.7 | | | | |
| | | | | | | C 1HAIC | 1HDPA | 16914.7 | 1.9 |
| 1HDPA | 0.480 | 17554.4 | 2.24 | 1.00 | 17554.4 | | | | |
| | | | | | | C 1HDPA | MSB | 17554.4 | 2.0 |
| | | | | | | C 1HAIA | 1HAIA | 0.0 | 0.7 |
| | | | | | | C 1HAIB | 1HAIB | 0.0 | 0.7 |
| | | | | | | C 1HAIC | 1HAIC | 0.0 | 0.7 |
| | | | | | | C ELEV 160 | ELEV 160 | 0.0 | 4.6 |
| | | | | | | C TX T1LDPA | TX T1LDPA H | 0.0 | 4.7 |
| 1LA1A | 0.208 | 5133.5 | 2.07 | 1.00 | 5133.5 | | | | |
| | | | | | | C 1LA1A | 1LDPA | 5133.5 | 1.8 |
| 1LA2A | 0.208 | 5003.3 | 2.02 | 1.00 | 5003.3 | | | | |
| | | | | | | C 1LA2A | 1LDPA | 5003.3 | 1.8 |
| 1LAC1A | 0.208 | 4878.8 | 1.98 | 1.00 | 4878.8 | | | | |
| | | | | | | C 1LAC1A | 1LDPA | 4878.8 | 1.7 |
| 1LAC2A | 0.208 | 5003.3 | 2.02 | 1.00 | 5003.3 | | | | |
| | | | | | | C 1LAC2A | 1LDPA | 5003.3 | 1.8 |
| 1LDPA | 0.208 | 5269.9 | 2.12 | 1.00 | 5269.9 | | | | |
| | | | | | | C 1LDPA | TX T1LDPA T1L | 5269.9 | 1.9 |
| | | | | | | C 1LAC1A | 1LAC1A | 0.0 | 1.5 |
| | | | | | | C 1LAC2A | 1LAC2A | 0.0 | 150.0 |
| | | | | | | C 1LA1A | 1LA1A | 0.0 | 150.0 |
| | | | | | | C 1LA2A | 1LA2A | 0.0 | 150.0 |
| 2EH1 | 0.480 | 31844.1 | 1.71 | 1.00 | 31844.1 | | | | |
| | | | | | | C 2EH1 | 2EHDP | 31844.1 | 1.4 |
| | | | | | | C 2EL1 | TX 2EL1 H | 0.0 | 0.8 |
| 2EHDP | 0.480 | 37308.0 | 2.25 | 1.00 | 37308.0 | | | | |
| | | | | | | C 2EHDP | ATS EH2A1 | 37308.0 | 2.0 |
| | | | | | | C 2EH1 | 2EH1 | 0.0 | 0.8 |
| | | | | | | C 1EH1 | 1EH1 | 0.0 | 0.8 |
| | | | | | | C 3EH1 | 3EH1 | 0.0 | 0.4 |
| | | | | | | C 4EH1 | 4EH1 | 0.0 | 1.1 |
| | | | | | | C 5EH1 | 5EH1 | 0.0 | 0.4 |
| | | | | | | C 6EH1 | 6EH1 | 0.0 | 0.8 |
| 2EL1 | 0.208 | 1461.0 | 1.79 | 1.00 | 1461.0 | | | | |
| | | | | | | B 2EL1-MAIN | TX 2EL1 L | 1461.0 | 1.5 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 2HAIA | 0.480 | 41845.6 | 3.01 | 1.00 | 41845.6 | | | | |
| | | | | | | C 2HAIA | 2HDPA | 41845.6 | 2.8 |
| 2HAIB | 0.480 | 46174.1 | 4.47 | 1.00 | 46174.2 | | | | |
| | | | | | | C 2HAIB | 2HDPA | 46174.1 | 4.4 |
| 2HAIC | 0.480 | 43631.9 | 3.31 | 1.00 | 43631.9 | | | | |
| | | | | | | C 2HAIC | 2HDPA | 43631.9 | 3.2 |
| 2HDPA | 0.480 | 49638.4 | 5.16 | 1.00 | 49638.6 | | | | |
| | | | | | | C 2HDPA | MSB | 49638.4 | 5.1 |
| | | | | | | C 2HAIA | 2HAIA | 0.0 | 1.5 |
| | | | | | | C 2HAIB | 2HAIB | 0.0 | 0.7 |
| | | | | | | C 2HAIC | 2HAIC | 0.0 | 1.5 |
| | | | | | | C TX T2LDPA | TX T2LDPA H | 0.0 | 3.4 |
| | | | | | | C 2HS1 | 2HS1 | 0.0 | 1.5 |
| | | | | | | C 2HS2 | 2HS2 | 0.0 | 1.5 |
| 2HS1 | 0.480 | 45526.4 | 3.71 | 1.00 | 45526.4 | | | | |
| | | | | | | C 2HS1 | 2HDPA | 45526.4 | 3.6 |
| 2HS2 | 0.480 | 43631.9 | 3.31 | 1.00 | 43631.9 | | | | |
| | | | | | | C 2HS2 | 2HDPA | 43631.9 | 3.2 |
| 2LA1A | 0.208 | 9828.2 | 2.72 | 1.00 | 9828.2 | | | | |
| | | | | | | C 2LA1A | 2LDPA | 9828.2 | 2.5 |
| 2LA1B | 0.208 | 9828.2 | 2.72 | 1.00 | 9828.2 | | | | |
| | | | | | | C 2LA1B | 2LDPA | 9828.2 | 2.5 |
| 2LA1KA | 0.208 | 7065.1 | 1.89 | 1.00 | 7065.1 | | | | |
| | | | | | | C 2LA1KA | 2LDPA | 7065.1 | 1.6 |
| 2LA1KB | 0.208 | 6580.6 | 1.81 | 1.00 | 6580.6 | | | | |
| | | | | | | C 2LA1KB | 2LDPA | 6580.6 | 1.5 |
| 2LA1KC | 0.208 | 6815.0 | 1.85 | 1.00 | 6815.0 | | | | |
| | | | | | | C 2LA1KC | 2LDPA | 6815.0 | 1.6 |
| 2LAC1A | 0.208 | 9828.2 | 2.72 | 1.00 | 9828.2 | | | | |
| | | | | | | C 2LAC1A | 2LDPA | 9828.2 | 2.5 |
| 2LDPA | 0.208 | 10801.8 | 3.29 | 1.00 | 10801.8 | | | | |
| | | | | | | C 2LDPA | TX T2LDPA T2L | 10801.8 | 3.1 |
| | | | | | | C 2LAC1A | 2LAC1A | 0.0 | 150.0 |
| | | | | | | C 2LA1A | 2LA1A | 0.0 | 150.0 |
| | | | | | | C 2LA1B | 2LA1B | 0.0 | 150.0 |
| | | | | | | C 2LA1KA | 2LA1KA | 0.0 | 1.5 |
| | | | | | | C 2LA1KB | 2LA1KB | 0.0 | 1.5 |
| | | | | | | C 2LA1KC | 2LA1KC | 0.0 | 150.0 |
| 3EH1 | 0.480 | 5461.5 | 1.06 | 1.00 | 5461.5 | | | | |
| | | | | | | C 3EH1 | 2EHDP | 5461.5 | 0.4 |
| | | | | | | C 3EL1 | TX 3EL1 H | 0.0 | 0.4 |
| 3EL1 | 0.208 | 1370.7 | 1.66 | 1.00 | 1370.7 | | | | |
| | | | | | | C UPS 8 | UPS 8I | 0.0 | 0.7 |
| | | | | | | B 3EL1-MAIN | TX 3EL1 L | 1370.7 | 1.3 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4EH1 | 0.480 | 4129.0 | 1.05 | 1.00 | 4129.0 | | | | |
| | | | | | | C 4EH1 | 2EHDP | 4129.0 | 0.3 |
| | | | | | | C 4EL1 | TX 4EL1 H | 0.0 | 1.1 |
| 4EL1 | 0.208 | 1885.6 | 1.55 | 1.00 | 1885.6 | | | | |
| | | | | | | B 4EL1-MAIN | TX 4EL1 L | 1885.6 | 1.2 |
| 5EH1 | 0.480 | 5183.1 | 1.06 | 1.00 | 5183.1 | | | | |
| | | | | | | C 5EH1 | 2EHDP | 5183.1 | 0.3 |
| | | | | | | C 5EL1 | TX 5EL1 H | 0.0 | 0.4 |
| 5EL1 | 0.208 | 1364.5 | 1.65 | 1.00 | 1364.5 | | | | |
| | | | | | | C UPS 5 | UPS 5I | 0.0 | 0.7 |
| | | | | | | B 5EL1-MAIN | TX 5EL1 L | 1364.5 | 1.3 |
| 5HA1A | 0.480 | 33835.0 | 2.69 | 1.00 | 33835.0 | | | | |
| | | | | | | C 5HA1A | 5HDPA | 33835.0 | 2.5 |
| 5HA1B | 0.480 | 34461.4 | 3.04 | 1.00 | 34461.4 | | | | |
| | | | | | | C 5HA1B | 5HDPA | 34461.4 | 2.9 |
| 5HA1C | 0.480 | 34461.4 | 3.04 | 1.00 | 34461.4 | | | | |
| | | | | | | C 5HA1C | 5HDPA | 34461.4 | 2.9 |
| 5HA1D | 0.480 | 33835.0 | 2.69 | 1.00 | 33835.0 | | | | |
| | | | | | | C 5HA1D | 5HDPA | 33835.0 | 2.5 |
| 5HA1E | 0.480 | 23490.3 | 1.84 | 1.00 | 23490.3 | | | | |
| | | | | | | C 5HA1E | 5HDPA | 23490.3 | 1.5 |
| 5HDPA | 0.480 | 39029.4 | 3.68 | 1.00 | 39029.4 | | | | |
| | | | | | | C 5HDPA | MSB | 39029.3 | 3.5 |
| | | | | | | C 5HA1A | 5HA1A | 0.0 | 150.0 |
| | | | | | | C 5HA1B | 5HA1B | 0.0 | 0.9 |
| | | | | | | C 9HA2A | 9HA2A | 0.0 | 0.9 |
| | | | | | | C 9HA2B | 9HA2B | 0.0 | 150.0 |
| | | | | | | C TX T9LDPB | TX T9LDPB H | 0.0 | 3.3 |
| | | | | | | C TX T9LDPA | TX T9LDPA H | 0.0 | 0.2 |
| | | | | | | C TX T5LDPA | TX T5LDPA H | 0.0 | 150.0 |
| | | | | | | C TX T5LDPB | TX T5LDPB H | 0.0 | 1.3 |
| | | | | | | C ELEV 560 | ELEV 560 | 0.0 | 4.6 |
| | | | | | | C CA | CA | 0.0 | 3.3 |
| | | | | | | C 5HA1C | 5HA1C | 0.0 | 0.9 |
| | | | | | | C 5HA1D | 5HA1D | 0.0 | 150.0 |
| | | | | | | C 5HA1E | 5HA1E | 0.0 | 150.0 |
| 5LA1A | 0.208 | 5303.9 | 2.02 | 1.00 | 5303.9 | | | | |
| | | | | | | C 5LA1A | 5LDPA | 5303.9 | 1.8 |
| 5LAC1A | 0.208 | 5376.3 | 2.05 | 1.00 | 5376.3 | | | | |
| | | | | | | C 5LAC1A | 5LDPA | 5376.3 | 1.8 |
| 5LAC1B | 0.208 | 5376.3 | 2.05 | 1.00 | 5376.3 | | | | |
| | | | | | | C 5LAC1B | 5LDPA | 5376.3 | 1.8 |
| 5LB1A | 0.208 | 9140.0 | 2.61 | 1.00 | 9140.0 | | | | |
| | | | | | | C 5LB1A | 5LDPB | 9140.0 | 2.4 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 5LB1B | 0.208 | 8399.9 | 2.33 | 1.00 | 8399.9 | | | | |
| | | | | | | C 5LB1B | 5LDPB | 8399.9 | 2.1 |
| 5LB1C | 0.208 | 5870.9 | 1.74 | 1.00 | 5870.9 | | | | |
| | | | | | | C 5LB1C | 5LDPB | 5870.9 | 1.4 |
| 5LBC1A | 0.208 | 9140.0 | 2.61 | 1.00 | 9140.0 | | | | |
| | | | | | | C 5LBC1A | 5LDPB | 9140.0 | 2.4 |
| 5LBC1B | 0.208 | 9140.0 | 2.61 | 1.00 | 9140.0 | | | | |
| | | | | | | C 5LBC1B | 5LDPB | 9140.0 | 2.4 |
| 5LDPA | 0.208 | 5683.9 | 2.16 | 1.00 | 5683.9 | | | | |
| | | | | | | C 5LDPA | TX T5LDPA L | 5683.9 | 1.9 |
| | | | | | | C 5LAC1A | 5LAC1A | 0.0 | 150.0 |
| | | | | | | C 5LAC1B | 5LAC1B | 0.0 | 150.0 |
| | | | | | | C 5LA1A | 5LA1A | 0.0 | 1.5 |
| 5LDPB | 0.208 | 9988.2 | 3.08 | 1.00 | 9988.2 | | | | |
| | | | | | | C 5LDPB | TX T5LDPB L | 9988.2 | 2.9 |
| | | | | | | C 5LBC1A | 5LBC1A | 0.0 | 150.0 |
| | | | | | | C 5LBC1B | 5LBC1B | 0.0 | 150.0 |
| | | | | | | C 5LB1A | 5LB1A | 0.0 | 150.0 |
| | | | | | | C 5LB1C | 5LB1C | 0.0 | 0.3 |
| | | | | | | C 5LB1B | 5LB1B | 0.0 | 150.0 |
| 6EH1 | 0.480 | 8489.8 | 1.09 | 1.00 | 8489.8 | | | | |
| | | | | | | C 6EH1 | 2EHDP | 8489.8 | 0.4 |
| | | | | | | C 6EL1 | TX 6EL1 H | 0.0 | 0.8 |
| 6EL1 | 0.208 | 1357.0 | 1.61 | 1.00 | 1357.0 | | | | |
| | | | | | | B 6EL1-MAIN | TX 6EL1 L | 1357.0 | 1.3 |
| 6HAIA | 0.480 | 36385.8 | 2.51 | 1.00 | 36385.8 | | | | |
| | | | | | | C 6HAIA | 6HDPA | 36385.8 | 2.3 |
| 6HAIB | 0.480 | 36385.8 | 2.51 | 1.00 | 36385.8 | | | | |
| | | | | | | C 6HAIB | 6HDPA | 36385.8 | 2.3 |
| 6HAIC | 0.480 | 36385.8 | 2.51 | 1.00 | 36385.8 | | | | |
| | | | | | | C 6HAIC | 6HDPA | 36385.8 | 2.3 |
| 6HDPA | 0.480 | 39310.3 | 2.84 | 1.00 | 39310.3 | | | | |
| | | | | | | C 6HDPA | MSB | 39310.3 | 2.7 |
| | | | | | | C 6HAIA | 6HAIA | 0.0 | 1.5 |
| | | | | | | C 6HAIB | 6HAIB | 0.0 | 1.5 |
| | | | | | | C 6HAIC | 6HAIC | 0.0 | 1.5 |
| | | | | | | C TX T6LAIA | TX T6LAIA H | 0.0 | 0.5 |
| | | | | | | C TX T6LAC1A | TX T6LAC1A H | 0.0 | 3.4 |
| 6LAC1A | 0.208 | 3878.7 | 1.99 | 1.00 | 3878.7 | | | | |
| | | | | | | C 6LAC1A | TX T6LAC1A L | 3878.7 | 1.7 |
| 6LAIA | 0.208 | 3866.2 | 1.98 | 1.00 | 3866.2 | | | | |
| | | | | | | C 6LAIA | TX T6LAIA L | 3866.2 | 1.7 |
| 9HA2A | 0.480 | 29190.8 | 2.56 | 1.00 | 29190.8 | | | | |
| | | | | | | C 9HA2A | 5HDPA | 29190.8 | 2.4 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 9HA2B | 0.480 | 27853.6 | 2.11 | 1.00 | 27853.6 | | | | |
| | | | | | | C 9HA2B | 5HDPA | 27853.6 | 1.9 |
| 9LA2A | 0.208 | 5186.3 | 1.98 | 1.00 | 5186.3 | | | | |
| | | | | | | C 9LA2A | 9LDPA | 5186.3 | 1.7 |
| 9LAC2A | 0.208 | 5327.3 | 2.02 | 1.00 | 5327.3 | | | | |
| | | | | | | C 9LAC2A | 9LDPA | 5327.3 | 1.8 |
| 9LAC2B | 0.208 | 5255.9 | 2.00 | 1.00 | 5255.9 | | | | |
| | | | | | | C 9LAC2B | 9LDPA | 5255.9 | 1.7 |
| 9LB2A | 0.208 | 6470.6 | 2.17 | 1.00 | 6470.6 | | | | |
| | | | | | | C 9LB2A | 9LDPB | 6470.6 | 1.9 |
| 9LBC2A | 0.208 | 6470.6 | 2.17 | 1.00 | 6470.6 | | | | |
| | | | | | | C 9LBC2A | 9LDPB | 6470.6 | 1.9 |
| 9LBC2B | 0.208 | 6470.6 | 2.17 | 1.00 | 6470.6 | | | | |
| | | | | | | C 9LBC2B | 9LDPB | 6470.6 | 1.9 |
| 9LDPA | 0.208 | 5475.1 | 2.07 | 1.00 | 5475.1 | | | | |
| | | | | | | C 9LDPA | TX T9LDPA L | 5475.1 | 1.8 |
| | | | | | | C 9LAC2A | 9LAC2A | 0.0 | 150.0 |
| | | | | | | C 9LAC2B | 9LAC2B | 0.0 | 1.5 |
| | | | | | | C 9LA2A | 9LA2A | 0.0 | 150.0 |
| 9LDPB | 0.208 | 6707.3 | 2.26 | 1.00 | 6707.3 | | | | |
| | | | | | | C 9LDPB | TX T9LDPB L | 6707.3 | 2.0 |
| | | | | | | C 9LBC2A | 9LBC2A | 0.0 | 150.0 |
| | | | | | | C 9LBC2B | 9LBC2B | 0.0 | 150.0 |
| | | | | | | C 9LB2A | 9LB2A | 0.0 | 150.0 |
| ATS EH2A1 | 0.480 | 40878.2 | 2.61 | 1.00 | 40878.2 | | | | |
| | | | | | | C 2EHDP | 2EHDP | 0.0 | 0.8 |
| | | | | | | C MSB-ATS EH2A | MSB | 40878.2 | 2.4 |
| CA | 0.480 | 5635.1 | 1.04 | 1.00 | 5635.1 | | | | |
| | | | | | | M CA | | 0.0 | 3.3 |
| | | | | | | C CA | 5HDPA | 5635.1 | 0.3 |
| EGH1 | 0.480 | 1699.7 | 9.85 | 1.00 | 1702.6 | | | | |
| | | | | | | GEN EGH1 | | 1699.7 | 9.8 |
| | | | | | | C EGH1-ATS EH2A | ATS EH2A1 | 0.0 | 0.0 |
| ELEV 160 | 0.480 | 4795.1 | 1.07 | 1.00 | 4795.1 | | | | |
| | | | | | | M ELEV 160 | | 0.0 | 4.6 |
| | | | | | | C ELEV 160 | 1HDPA | 4795.1 | 0.4 |
| ELEV 560 | 0.480 | 14175.8 | 1.10 | 1.00 | 14175.8 | | | | |
| | | | | | | M ELEV 560 | | 0.0 | 4.6 |
| | | | | | | C ELEV 560 | 5HDPA | 14175.8 | 0.5 |
| MCCA | 0.480 | 37151.5 | 3.48 | 1.00 | 37151.5 | | | | |
| | | | | | | C MCCA | MSB | 37151.5 | 3.3 |
| MDB | 0.480 | 52180.2 | 6.51 | 1.00 | 52183.6 | | | | |
| | | | | | | C MSB | MSB | 0.0 | 4.1 |
| | | | | | | C MDB | TX NPC L | 52180.2 | 6.4 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| MSB | 0.480 | 51817.9 | 6.37 | 1.00 | 51820.6 | | | | |
| | | | | | | C MSB | MDB | 51817.8 | 6.3 |
| | | | | | | C MSB-ATS EH2A | ATS EH2A1 | 0.0 | 0.1 |
| | | | | | | C 6HDPA | 6HDPA | 0.0 | 0.3 |
| | | | | | | C 1HDPA | 1HDPA | 0.0 | 4.6 |
| | | | | | | C 2HDPA | 2HDPA | 0.0 | 11.9 |
| | | | | | | C MCCA | MCCA | 0.0 | 150.0 |
| | | | | | | C 5HDPA | 5HDPA | 0.0 | 4.0 |
| TX 1EL1 H | 0.480 | 2901.6 | 1.04 | 1.00 | 2901.6 | | | | |
| | | | | | | TX 1EL1 | TX 1EL1 L | 0.0 | 0.8 |
| | | | | | | C 1EL1 | 1EH1 | 2901.6 | 0.3 |
| TX 1EL1 L | 0.208 | 1285.8 | 1.55 | 1.00 | 1285.8 | | | | |
| | | | | | | TX 1EL1 | TX 1EL1 H | 1285.8 | 1.2 |
| | | | | | | B 1EL1-MAIN | 1EL1 | 0.0 | 0.0 |
| TX 2EL1 H | 0.480 | 15310.1 | 1.10 | 1.00 | 15310.1 | | | | |
| | | | | | | TX 2EL1 | TX 2EL1 L | 0.0 | 0.8 |
| | | | | | | C 2EL1 | 2EH1 | 15310.1 | 0.5 |
| TX 2EL1 L | 0.208 | 1461.0 | 1.79 | 1.00 | 1461.0 | | | | |
| | | | | | | TX 2EL1 | TX 2EL1 H | 1461.0 | 1.5 |
| | | | | | | B 2EL1-MAIN | 2EL1 | 0.0 | 0.0 |
| TX 3EL1 H | 0.480 | 5025.7 | 1.05 | 1.00 | 5025.7 | | | | |
| | | | | | | TX 3EL1 | TX 3EL1 L | 0.0 | 0.4 |
| | | | | | | C 3EL1 | 3EH1 | 5025.7 | 0.3 |
| TX 3EL1 L | 0.208 | 1370.7 | 1.66 | 1.00 | 1370.7 | | | | |
| | | | | | | TX 3EL1 | TX 3EL1 H | 1370.7 | 1.3 |
| | | | | | | B 3EL1-MAIN | 3EL1 | 0.0 | 0.0 |
| TX 4EL1 H | 0.480 | 3873.7 | 1.05 | 1.00 | 3873.7 | | | | |
| | | | | | | TX 4EL1 | TX 4EL1 L | 0.0 | 1.1 |
| | | | | | | C 4EL1 | 4EH1 | 3873.7 | 0.3 |
| TX 4EL1 L | 0.208 | 1885.6 | 1.55 | 1.00 | 1885.6 | | | | |
| | | | | | | TX 4EL1 | TX 4EL1 H | 1885.6 | 1.2 |
| | | | | | | B 4EL1-MAIN | 4EL1 | 0.0 | 0.0 |
| TX 5EL1 H | 0.480 | 4788.5 | 1.05 | 1.00 | 4788.5 | | | | |
| | | | | | | TX 5EL1 | TX 5EL1 L | 0.0 | 0.4 |
| | | | | | | C 5EL1 | 5EH1 | 4788.5 | 0.3 |
| TX 5EL1 L | 0.208 | 1364.5 | 1.65 | 1.00 | 1364.5 | | | | |
| | | | | | | TX 5EL1 | TX 5EL1 H | 1364.5 | 1.3 |
| | | | | | | B 5EL1-MAIN | 5EL1 | 0.0 | 0.0 |
| TX 6EL1 H | 0.480 | 4215.9 | 1.02 | 1.00 | 4215.9 | | | | |
| | | | | | | TX 6EL1 | TX 6EL1 L | 0.0 | 0.8 |
| | | | | | | C 6EL1 | 6EH1 | 4215.9 | 0.2 |
| TX 6EL1 L | 0.208 | 1357.0 | 1.61 | 1.00 | 1357.0 | | | | |
| | | | | | | TX 6EL1 | TX 6EL1 H | 1357.0 | 1.3 |
| | | | | | | B 6EL1-MAIN | 6EL1 | 0.0 | 0.0 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX NPC L | 0.480 | 53484.0 | 7.07 | 1.00 | 53491.4 | | | | |
| | | | | | | NPC | | 53484.0 | 7.0 |
| | | | | | | C MDB | MDB | 0.0 | 4.1 |
| TX T1LDPA H | 0.480 | 16743.2 | 2.09 | 1.00 | 16743.2 | | | | |
| | | | | | | TX T1LDPA | TX T1LDPA T1L | 0.0 | 0.7 |
| | | | | | | C TX T1LDPA | 1HDPA | 16743.2 | 1.8 |
| TX T1LDPA T1L | 0.208 | 5376.4 | 2.13 | 1.00 | 5376.4 | | | | |
| | | | | | | TX T1LDPA | TX T1LDPA H | 5376.4 | 1.9 |
| | | | | | | C 1LDPA | 1LDPA | 0.0 | 4.0 |
| TX T2LDPA H | 0.480 | 40436.8 | 3.67 | 1.00 | 40436.8 | | | | |
| | | | | | | TX T2LDPA | TX T2LDPA T2L | 0.0 | 3.2 |
| | | | | | | C TX T2LDPA | 2HDPA | 40436.8 | 3.5 |
| TX T2LDPA T2L | 0.208 | 11016.7 | 3.35 | 1.00 | 11016.7 | | | | |
| | | | | | | TX T2LDPA | TX T2LDPA H | 11016.7 | 3.2 |
| | | | | | | C 2LDPA | 2LDPA | 0.0 | 1.8 |
| TX T5LDPA H | 0.480 | 35705.3 | 2.76 | 1.00 | 35705.3 | | | | |
| | | | | | | TX T5LDPA | TX T5LDPA L | 0.0 | 1.3 |
| | | | | | | C TX T5LDPA | 5HDPA | 35705.3 | 2.6 |
| TX T5LDPA L | 0.208 | 5807.9 | 2.17 | 1.00 | 5807.9 | | | | |
| | | | | | | TX T5LDPA | TX T5LDPA H | 5807.9 | 1.9 |
| | | | | | | C 5LDPA | 5LDPA | 0.0 | 0.6 |
| TX T5LDPB H | 0.480 | 23653.4 | 2.51 | 1.00 | 23653.4 | | | | |
| | | | | | | TX T5LDPB | TX T5LDPB L | 0.0 | 1.9 |
| | | | | | | C TX T5LDPB | 5HDPA | 23653.4 | 2.3 |
| TX T5LDPB L | 0.208 | 10173.0 | 3.12 | 1.00 | 10173.0 | | | | |
| | | | | | | TX T5LDPB | TX T5LDPB H | 10173.0 | 3.0 |
| | | | | | | C 5LDPB | 5LDPB | 0.0 | 0.7 |
| TX T6LAC1A H | 0.480 | 34543.3 | 2.06 | 1.00 | 34543.3 | | | | |
| | | | | | | TX T6LAC1A | TX T6LAC1A L | 0.0 | 0.4 |
| | | | | | | C TX T6LAC1A | 6HDPA | 34543.3 | 1.8 |
| TX T6LAC1A L | 0.208 | 3956.9 | 2.03 | 1.00 | 3956.9 | | | | |
| | | | | | | TX T6LAC1A | TX T6LAC1A H | 3956.9 | 1.8 |
| | | | | | | C 6LAC1A | 6LAC1A | 0.0 | 150.0 |
| TX T6LAIA H | 0.480 | 32364.4 | 1.86 | 1.00 | 32364.4 | | | | |
| | | | | | | TX T6LAIA | TX T6LAIA L | 0.0 | 0.5 |
| | | | | | | C TX T6LAIA | 6HDPA | 32364.4 | 1.6 |
| TX T6LAIA L | 0.208 | 3944.0 | 2.01 | 1.00 | 3944.0 | | | | |
| | | | | | | TX T6LAIA | TX T6LAIA H | 3944.0 | 1.7 |
| | | | | | | C 6LAIA | 6LAIA | 0.0 | 150.0 |
| TX T9LDPA H | 0.480 | 25457.7 | 1.71 | 1.00 | 25457.7 | | | | |
| | | | | | | TX T9LDPA | TX T9LDPA L | 0.0 | 0.3 |
| | | | | | | C TX T9LDPA | 5HDPA | 25457.7 | 1.4 |
| TX T9LDPA L | 0.208 | 5649.9 | 2.08 | 1.00 | 5649.9 | | | | |
| | | | | | | TX T9LDPA | TX T9LDPA H | 5649.9 | 1.8 |
| | | | | | | C 9LDPA | 9LDPA | 0.0 | 0.3 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Three Phase Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| 3 PHASE Fault On | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX T9LDPB H | 0.480 | 16362.4 | 1.56 | 1.00 | 16362.4 | | | | |
| | | | | | | TX T9LDPB | TX T9LDPB L | 0.0 | 1.6 |
| | | | | | | C TX T9LDPB | 5HDPA | 16362.4 | 1.2 |
| TX T9LDPB L | 0.208 | 6869.5 | 2.31 | 1.00 | 6869.5 | | | | |
| | | | | | | TX T9LDPB | TX T9LDPB H | 6869.5 | 2.1 |
| | | | | | | C 9LDPB | 9LDPB | 0.0 | 1.2 |
| UPS 5I | 0.208 | 1343.0 | 1.62 | 1.00 | 1343.0 | | | | |
| | | | | | | C UPS 5 | 5EL1 | 1343.0 | 1.3 |
| UPS 5O | 0.208 | 0.0 | 4.67 | 1.00 | 0.0 | | | | |
| | | | | | | UPS 5 | | 0.0 | 4.6 |
| | | | | | | C UPS5A | UPS5A | 0.0 | 0.3 |
| UPS 8I | 0.208 | 1349.0 | 1.63 | 1.00 | 1349.0 | | | | |
| | | | | | | C UPS 8 | 3EL1 | 1349.0 | 1.3 |
| UPS 8O | 0.208 | 0.0 | 4.67 | 1.00 | 0.0 | | | | |
| | | | | | | UPS 8 | | 0.0 | 4.6 |
| | | | | | | C UPS8A | UPS8A | 0.0 | 0.3 |
| UPS3A | 0.208 | 0.0 | 4.67 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS3A | UPS8A | 0.0 | 4.6 |
| UPS5A | 0.208 | 0.0 | 4.67 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS5A | UPS 5O | 0.0 | 4.6 |
| | | | | | | C UPS9A | UPS9A | 0.0 | 0.0 |
| UPS8A | 0.208 | 0.0 | 4.67 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS8A | UPS 8O | 0.0 | 4.6 |
| | | | | | | C UPS3A | UPS3A | 0.0 | 0.0 |
| UPS9A | 0.208 | 0.0 | 4.67 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS9A | UPS5A | 0.0 | 4.6 |

# Ground Fault

# Equipment Duty Ratings

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
1EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | | 1.66( -88.1%) | | |
| B 1EL1 | GE | /TEY | ANSI-SYM | 14.00 | | | 1.66( -88.1%) | | |
| 1EH1 | | / | ANSI-SYM | 14.00 | | | 1.66( -88.1%) | | |

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Equipment Duty Comparison Report For Bus:
1EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | | 1.42( -85.8%) | | |
| B 1EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | | 1.42( -85.8%) | | |
| 1EL1 | | / | ANSI-SYM | 22.00 | | | 1.42( -93.5%) | | |

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Equipment Duty Comparison Report For Bus:
1HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HAIA-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 10.05( -84.5%) | | |
| 1HAIA | | / | ANSI-SYM | 35.00 | | | 10.05( -71.3%) | | |

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Equipment Duty Comparison Report For Bus:
1HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HAIB-FDR | GE | /SEL | ANSI-SYM | 65.00 | | | 10.05( -84.5%) | | |
| 1HAIB | | / | ANSI-SYM | 35.00 | | | 10.05( -71.3%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
1HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HAIC-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 10.05( -84.5%) | | |
| 1HAIC | | / | ANSI-SYM | 22.00 | | 10.05( -54.3%) | | |

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Equipment Duty Comparison Report For Bus:
1HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1HDPA-MAIN | GE | /SKH8 | ANSI-SYM | 50.00 | | 10.45( -79.1%) | | |
| B 1HAIA | GE | /SFH | ANSI-SYM | 35.00 | | 10.53( -69.9%) | | |
| B 1HAIB | GE | /SFH | ANSI-SYM | 35.00 | | 10.53( -69.9%) | | |
| B 1HAIC | GE | /SFH | ANSI-SYM | 35.00 | | 10.53( -69.9%) | | |
| B ELEV 160 | GE | /SEL | ANSI-SYM | 65.00 | | 10.45( -83.9%) | | |
| B TX T1LDPA | GE | /SFH | ANSI-SYM | 35.00 | | 10.53( -69.9%) | | |
| 1HDPA | | / | ANSI-SYM | 30.00 | | 10.53( -64.9%) | | |

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Equipment Duty Comparison Report For Bus:
1LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LA1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 5.35( -46.5%) | | |
| 1LA1A | | / | ANSI-SYM | 10.00 | | 5.35( -46.5%) | | |

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Equipment Duty Comparison Report For Bus:
1LA2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LA2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 5.07( -49.3%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
1LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LAC1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 4.82( -51.8%) | | |
| 1LAC1A | | / | ANSI-SYM | 10.00 | | | 4.82( -51.8%) | | |

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Equipment Duty Comparison Report For Bus:
1LAC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 1LAC2A | | / | ANSI-SYM | 10.00 | | | 5.07( -49.3%) | | |

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Equipment Duty Comparison Report For Bus:
1LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1LDPA-MAIN | GE | /SGD | ANSI-SYM | 65.00 | | | 5.66( -91.3%) | | |
| B 1LDPA-FDR | GE | /TEB | ANSI-SYM | 10.00 | | | 5.66( -43.4%) | | |
| B 1LAC1A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.66( -43.4%) | | |
| B 1LAC2A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.66( -43.4%) | | |
| B 1LA1A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.66( -43.4%) | | |
| B 1LA2A | GE | /TQD | ANSI-SYM | 10.00 | | | 5.66( -43.4%) | | |
| 1LDPA | | / | ANSI-SYM | 10.00 | | | 5.66( -43.4%) | | |

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Equipment Duty Comparison Report For Bus:
2EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2EH1-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 21.64( -66.7%) | | |
| B 2EL1 | GE | /SEL | ANSI-SYM | 65.00 | | | 21.64( -66.7%) | | |
| B 2EH1-MAIN | GE | /SEL | ANSI-SYM | 65.00 | | | 21.64( -66.7%) | | |
| 2EH1 | | / | ANSI-SYM | 42.00 | | | 21.64( -48.5%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2EHDP Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2EHDP-MAIN | GE /SFL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| B 2EH1 | GE /SEL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| B 1EH1 | GE /SEL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| B 3EH1 | GE /SEL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| B 4EH1 | GE /SEL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| B 5EH1 | GE /SEL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| B 6EH1 | GE /SEL | ANSI-SYM | 65.00 | | 28.27( -56.5%) | | | |
| 2EHDP | / | ANSI-SYM | 42.00 | | 28.27( -32.7%) | | | |

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Equipment Duty Comparison Report For Bus:
2EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2EL1-FDR | GE /THQL | ANSI-SYM | 10.00 | | 1.55( -84.5%) | | | |
| B 2EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | 1.55( -84.5%) | | | |
| 2EL1 | / | ANSI-SYM | 22.00 | | 1.55( -92.9%) | | | |

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Equipment Duty Comparison Report For Bus:
2HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2HAIA-FDR | GE /THED (277V) | ANSI-SYM | 65.00 | | 34.91( -46.3%) | | | |
| 2HAIA | / | ANSI-SYM | 65.00 | | 34.91( -46.3%) | | | |

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Equipment Duty Comparison Report For Bus:
2HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2HAIB-FDR | GE /SEL | ANSI-SYM | 65.00 | | 42.28( -35.0%) | | | |
| 2HAIB | / | ANSI-SYM | 65.00 | | 42.28( -35.0%) | | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HAIC-FDR | GE | /SEL | ANSI-SYM | 65.00 | | 37.71( -42.0%) | | |
| 2HAIC | | / | ANSI-SYM | 65.00 | | 37.71( -42.0%) | | |

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Equipment Duty Comparison Report For Bus:
2HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HDPA-MAIN | GE | /SKL12 | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| B 2HAIA | GE | /SFL | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| B 2HAIB | GE | /SGL4 | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| B 2HAIC | GE | /SFL | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| B TX T2LDPA | GE | /SGL4 | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| B 2HS1 | GE | /SFL | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| B 2HS2 | GE | /SFL | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |
| 2HDPA | | / | ANSI-SYM | 65.00 | | 48.65( -25.2%) | | |

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Equipment Duty Comparison Report For Bus:
2HS1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HS1-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 40.90( -37.1%) | | |
| 2HS1 | | / | ANSI-SYM | 65.00 | | 40.90( -37.1%) | | |

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Equipment Duty Comparison Report For Bus:
2HS2 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2HS2-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 37.71( -42.0%) | | |
| 2HS2 | | / | ANSI-SYM | 65.00 | | 37.71( -42.0%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1A-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 9.47( -57.0%) | | |
| 2LA1A | / | ANSI-SYM | 22.00 | | | 9.47( -57.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LA1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1B-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 9.47( -57.0%) | | |
| 2LA1B | / | ANSI-SYM | 22.00 | | | 9.47( -57.0%) | | |

**********

Equipment Duty Comparison Report For Bus:
2LA1KA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1KA-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |
| 2LA1KA | / | ANSI-SYM | 10.00 | | | 5.28( -47.2%) | | |

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Equipment Duty Comparison Report For Bus:
2LA1KB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LA1KB-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 4.73( -52.7%) | | |
| 2LA1KB | / | ANSI-SYM | 10.00 | | | 4.73( -52.7%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
2LA1KC Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| KC 2LA1KC-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 4.99( -50.1%) | | |
| 2LA1KC | / | ANSI-SYM | 10.00 | | | 4.99( -50.1%) | | |

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Equipment Duty Comparison Report For Bus:
2LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LAC1A-FDR | GE /THHQB | ANSI-SYM | 22.00 | | | 9.47( -57.0%) | | |
| 2LAC1A | / | ANSI-SYM | 22.00 | | | 9.47( -57.0%) | | |

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Equipment Duty Comparison Report For Bus:
2LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 2LDPA-MAIN | GE /SKH8 | ANSI-SYM | 65.00 | | | 11.53( -82.3%) | | |
| B 2LDPA-FDR | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| B 2LAC1A | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| B 2LA1A | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| B 2LA1B | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| B 2LA1KA | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| B 2LA1KB | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| B 2LA1KC | GE /THQD | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |
| 2LDPA | / | ANSI-SYM | 22.00 | | | 11.53( -47.6%) | | |

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Equipment Duty Comparison Report For Bus:
3EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 3EH1-MAIN | GE /TEY | ANSI-SYM | 14.00 | | | 2.80( -80.0%) | | |
| B 3EH1-FDR | GE /TEY | ANSI-SYM | 14.00 | | | 2.80( -80.0%) | | |
| B 3EL1 | GE /TEY | ANSI-SYM | 14.00 | | | 2.80( -80.0%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | | |
|---|---|---|---|---|---|---|
| 3EH1 | | / | ANSI-SYM | 14.00 | 2.80( -80.0%) | |

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Equipment Duty Comparison Report For Bus:
3EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 3EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 1.49( -85.1%) | | | |
| B 3EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 1.49( -85.1%) | | | |
| B UPS 8 | GE | /THQL | ANSI-SYM | 10.00 | | 1.49( -85.1%) | | | |
| 3EL1 | | / | ANSI-SYM | 22.00 | | 1.49( -93.2%) | | | |

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Equipment Duty Comparison Report For Bus:
4EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 4EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | 2.10( -85.0%) | | | |
| B 4EL1 | GE | /TEY | ANSI-SYM | 14.00 | | 2.10( -85.0%) | | | |
| 4EH1 | | / | ANSI-SYM | 14.00 | | 2.10( -85.0%) | | | |

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Equipment Duty Comparison Report For Bus:
4EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 4EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 2.09( -79.1%) | | | |
| B 4EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 2.09( -79.1%) | | | |
| 4EL1 | | / | ANSI-SYM | 22.00 | | 2.09( -90.5%) | | | |

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Equipment Duty Comparison Report For Bus:
5EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 5EH1-MAIN | GE | /TEY | ANSI-SYM | 14.00 | | 2.65( -81.1%) | | | |
| B 5EH1-FDR | GE | /TEY | ANSI-SYM | 14.00 | | 2.65( -81.1%) | | | |
| B 5EL1 | GE | /TEY | ANSI-SYM | 14.00 | | 2.65( -81.1%) | | | |
| 5EH1 | | / | ANSI-SYM | 14.00 | | 2.65( -81.1%) | | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | | 1.48( -85.2%) | | |
| B 5EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | | 1.48( -85.2%) | | |
| B UPS 5 | GE | /THQL | ANSI-SYM | 10.00 | | 1.48( -85.2%) | | |
| 5EL1 | | / | ANSI-SYM | 22.00 | | 1.48( -93.3%) | | |

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Equipment Duty Comparison Report For Bus:
5HA1A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1A-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 24.94( -61.6%) | | |
| 5HA1A | | / | ANSI-SYM | 42.00 | | 24.94( -40.6%) | | |

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Equipment Duty Comparison Report For Bus:
5HA1B Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1B-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 25.81( -60.3%) | | |
| 5HA1B | | / | ANSI-SYM | 42.00 | | 25.81( -38.5%) | | |

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Equipment Duty Comparison Report For Bus:
5HA1C Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1C-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 25.81( -60.3%) | | |
| 5HA1C | | / | ANSI-SYM | 42.00 | | 25.81( -38.5%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5HA1D Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1D-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 24.94( -61.6%) | | |
| 5HA1D | | / | ANSI-SYM | 42.00 | | | 24.94( -40.6%) | | |

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Equipment Duty Comparison Report For Bus:
5HA1E Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1E-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 14.79( -77.2%) | | |
| 5HA1E | | / | ANSI-SYM | 42.00 | | | 14.79( -64.8%) | | |

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Equipment Duty Comparison Report For Bus:
5HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5HA1A | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B 5HA1B | GE | /SGL4 | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B 9HA2A | GE | /SGL4 | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B 9HA2B | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B TX T9LDPB | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B TX T9LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B TX T5LDPA | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B TX T5LDPB | GE | /SGL4 | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B ELEV 560 | GE | /SEL | ANSI-SYM | 65.00 | | | 31.47( -51.6%) | | |
| B CA | GE | /SEL | ANSI-SYM | 65.00 | | | 31.51( -51.5%) | | |
| B 5HA1C | GE | /SGL4 | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B 5HA1D | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B 5HA1E | GE | /SFL | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |
| B 5HDPA-MAIN | GE | /SS-20 | ANSI-SYM | 65.00 | | | 31.41( -51.7%) | | |
| 5HDPA | | / | ANSI-SYM | 65.00 | | | 31.57( -51.4%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5LA1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LA1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.18( -48.2%) | | |
| 5LA1A | / | ANSI-SYM | 10.00 | | | 5.18( -48.2%) | | |

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Equipment Duty Comparison Report For Bus:
5LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LAC1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.32( -46.8%) | | |
| 5LAC1A | / | ANSI-SYM | 10.00 | | | 5.32( -46.8%) | | |

**********

Equipment Duty Comparison Report For Bus:
5LAC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LAC1B-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 5.32( -46.8%) | | |
| 5LAC1B | / | ANSI-SYM | 10.00 | | | 5.32( -46.8%) | | |

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Equipment Duty Comparison Report For Bus:
5LB1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LB1A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 9.08( -9.2%) | | Warning |
| 5LB1A | / | ANSI-SYM | 10.00 | | | 9.03( -9.7%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5LB1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LB1B-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 7.64( -23.6%) | | |
| 5LB1B | | / | ANSI-SYM | 10.00 | | 7.64( -23.6%) | | |

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Equipment Duty Comparison Report For Bus:
5LB1C Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B LBIC MAIN | GE | /TQD | ANSI-SYM | 10.00 | | 4.20( -58.0%) | | |
| B 5LB1C-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 4.20( -58.0%) | | |
| 5LB1C | | / | ANSI-SYM | 10.00 | | 4.20( -58.0%) | | |

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Equipment Duty Comparison Report For Bus:
5LBC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LBC1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 9.08( -9.2%) | | Warning |
| 5LBC1A | | / | ANSI-SYM | 10.00 | | 9.03( -9.7%) | | Warning |

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Equipment Duty Comparison Report For Bus:
5LBC1B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LBC1B-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 9.08( -9.2%) | | Warning |
| 5LBC1B | | / | ANSI-SYM | 10.00 | | 9.03( -9.7%) | | Warning |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
5LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LDPA-FDR | GE /TEY | ANSI-SYM | 65.00 | | | 5.97( -90.8%) | | |
| B 5LAC1A | GE /THQD | ANSI-SYM | 22.00 | | | 5.97( -72.9%) | | |
| B 5LAC1B | GE /THQD | ANSI-SYM | 22.00 | | | 5.97( -72.9%) | | |
| B 5LA1A | GE /THQD | ANSI-SYM | 22.00 | | | 5.97( -72.9%) | | |
| B 5LDPA-MAIN | GE /SGD | ANSI-SYM | 65.00 | | | 5.97( -90.8%) | | |
| 5LDPA | / | ANSI-SYM | 22.00 | | | 5.97( -72.9%) | | |

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Equipment Duty Comparison Report For Bus:
5LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5LBC1A | GE /THQD | ANSI-SYM | 22.00 | | | 10.90( -50.5%) | | |
| B 5LBC1B | GE /THQD | ANSI-SYM | 22.00 | | | 10.90( -50.5%) | | |
| B 5LB1A | GE /THQD | ANSI-SYM | 22.00 | | | 10.90( -50.5%) | | |
| B 5LB1C | GE /THQD | ANSI-SYM | 22.00 | | | 10.90( -50.5%) | | |
| B 5LB1B | GE /THQD | ANSI-SYM | 22.00 | | | 10.90( -50.5%) | | |
| B 5LDPB-MAIN | GE /SKH8 | ANSI-SYM | 65.00 | | | 10.90( -83.2%) | | |
| 5LDPB | / | ANSI-SYM | 22.00 | | | 10.90( -50.5%) | | |

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Equipment Duty Comparison Report For Bus:
6EH1 Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6EH1-FDR | GE /TEY | ANSI-SYM | 14.00 | | | 4.43( -68.4%) | | |
| B 6EL1 | GE /TEY | ANSI-SYM | 14.00 | | | 4.43( -68.4%) | | |
| 6EH1 | / | ANSI-SYM | 14.00 | | | 4.43( -68.4%) | | |

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Equipment Duty Comparison Report For Bus:
6EL1 Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

| | | | | | |
|---|---|---|---|---|---|
| B 6EL1-FDR | GE | /THQL | ANSI-SYM | 10.00 | 1.48( -85.2%) |
| B 6EL1-MAIN | GE | /THQL | ANSI-SYM | 10.00 | 1.48( -85.2%) |
| 6EL1 | | / | ANSI-SYM | 22.00 | 1.48( -93.3%) |

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Equipment Duty Comparison Report For Bus:
6HAIA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6HAIA-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 27.57( -57.6%) | | |
| 6HAIA | | / | ANSI-SYM | 42.00 | | | 27.57( -34.4%) | | |

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Equipment Duty Comparison Report For Bus:
6HAIB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6HAIB-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 27.57( -57.6%) | | |
| 6HAIB | | / | ANSI-SYM | 42.00 | | | 27.57( -34.4%) | | |

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Equipment Duty Comparison Report For Bus:
6HAIC Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6HAIC-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | | 27.57( -57.6%) | | |
| 6HAIC | | / | ANSI-SYM | 42.00 | | | 27.57( -34.4%) | | |

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Equipment Duty Comparison Report For Bus:
6HDPA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6HDPA-MAIN | GE | /SKH12 | ANSI-SYM | 50.00 | | | 31.40( -37.2%) | | |
| B 6HAIA | GE | /SFL | ANSI-SYM | 65.00 | | | 31.40( -51.7%) | | |
| B 6HAIB | GE | /SFL | ANSI-SYM | 65.00 | | | 31.40( -51.7%) | | |
| B 6HAIC | GE | /SFL | ANSI-SYM | 65.00 | | | 31.40( -51.7%) | | |
| B TX T6LAIA | GE | /SEL | ANSI-SYM | 65.00 | | | 31.40( -51.7%) | | |
| B TX T6LAC1A | GE | /SEL | ANSI-SYM | 65.00 | | | 31.40( -51.7%) | | |
| 6HDPA | | / | ANSI-SYM | 65.00 | | | 31.40( -51.7%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
6LAC1A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6LAC1A-MAIN | GE | /TQD | ANSI-SYM | 10.00 | | 4.05( -59.5%) | | |
| 6LAC1A | | / | ANSI-SYM | 10.00 | | 4.05( -59.5%) | | |

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Equipment Duty Comparison Report For Bus:
6LAIA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6LA1A -MAIN | GE | /TQD | ANSI-SYM | 10.00 | | 4.04( -59.6%) | | |
| B 6LA1A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | 4.04( -59.6%) | | |
| 6LAIA | | / | ANSI-SYM | 10.00 | | 4.04( -59.6%) | | |

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Equipment Duty Comparison Report For Bus:
9HA2A Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9HA2A-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 20.17( -69.0%) | | |
| 9HA2A | | / | ANSI-SYM | 42.00 | | 20.17( -52.0%) | | |

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Equipment Duty Comparison Report For Bus:
9HA2B Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9HA2B-FDR | GE | /THED (277V) | ANSI-SYM | 65.00 | | 18.65( -71.3%) | | |
| 9HA2B | | / | ANSI-SYM | 42.00 | | 18.65( -55.6%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
9LA2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LA2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.13( -48.7%) | | |
| 9LA2A | | / | ANSI-SYM | 10.00 | | | 5.13( -48.7%) | | |

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Equipment Duty Comparison Report For Bus:
9LAC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LAC2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.41( -45.9%) | | |
| 9LAC2A | | / | ANSI-SYM | 10.00 | | | 5.41( -45.9%) | | |

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Equipment Duty Comparison Report For Bus:
9LAC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LAC2B-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 5.27( -47.3%) | | |
| 9LAC2B | | / | ANSI-SYM | 10.00 | | | 5.27( -47.3%) | | |

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Equipment Duty Comparison Report For Bus:
9LB2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LB2A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 6.71( -32.9%) | | |
| 9LB2A | | / | ANSI-SYM | 10.00 | | | 6.71( -32.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
9LBC2A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LBC2A-FDR | GE /THQB | ANSI-SYM | 10.00 | | | 6.71( -32.9%) | | |
| 9LBC2A | / | ANSI-SYM | 10.00 | | | 6.71( -32.9%) | | |

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Equipment Duty Comparison Report For Bus:
9LBC2B Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| 9LBC2B | / | ANSI-SYM | 10.00 | | | 6.71( -32.9%) | | |

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Equipment Duty Comparison Report For Bus:
9LDPA Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LAC2A | GE /THQD | ANSI-SYM | 22.00 | | | 5.73( -74.0%) | | |
| B 9LAC2B | GE /THQD | ANSI-SYM | 22.00 | | | 5.73( -74.0%) | | |
| B 9LA2A | GE /THQD | ANSI-SYM | 22.00 | | | 5.73( -74.0%) | | |
| B 9LDPA-MAIN | GE /SGD | ANSI-SYM | 65.00 | | | 5.73( -91.2%) | | |
| 9LDPA | / | ANSI-SYM | 22.00 | | | 5.73( -74.0%) | | |

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Equipment Duty Comparison Report For Bus:
9LDPB Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 9LDPB | GE /THQD | ANSI-SYM | 22.00 | | | 7.25( -67.1%) | | |
| B 9LBC2A | GE /THQD | ANSI-SYM | 22.00 | | | 7.25( -67.1%) | | |
| B 9LBC2B | GE /THQD | ANSI-SYM | 22.00 | | | 7.25( -67.1%) | | |
| B 9LB2A | GE /THQD | ANSI-SYM | 22.00 | | | 7.25( -67.1%) | | |
| B 9LDPB-MAIN | GE /SGH6 | ANSI-SYM | 65.00 | | | 7.25( -88.8%) | | |
| 9LDPB | / | ANSI-SYM | 22.00 | | | 7.25( -67.1%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
MCCA Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| MCCA | | / | ANSI-SYM | 65.00 | | 29.08( -55.3%) | | |

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Equipment Duty Comparison Report For Bus:
MDB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B MDB | GE | /TP40 | ANSI-SYM | 100.00 | | 55.52( -44.5%) | | |
| MDB | | / | ANSI-SYM | 65.00 | | 53.94( -17.0%) | | |

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Equipment Duty Comparison Report For Bus:
MSB Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B MSB-ATS EH2A | GE | /SFL | ANSI-SYM | 65.00 | | 54.66( -15.9%) | | |
| B 6HDPA | GE | /SKL12 | ANSI-SYM | 65.00 | | 54.66( -15.9%) | | |
| B 1HDPA | GE | /SKL8 | ANSI-SYM | 65.00 | | 54.53( -16.1%) | | |
| B SPARE | GE | /SEL | ANSI-SYM | 65.00 | | 54.66( -15.9%) | | |
| B 2HDPA | GE | /SKL12 | ANSI-SYM | 65.00 | | 54.66( -15.9%) | | |
| B MCCA | GE | /SGL4 | ANSI-SYM | 65.00 | | 54.66( -15.9%) | | |
| B 5HDPA | GE | /SS-20 | ANSI-SYM | 65.00 | | 54.45( -16.2%) | | |
| MSB | | / | ANSI-SYM | 65.00 | | 53.17( -18.2%) | | |

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Equipment Duty Comparison Report For Bus:
TX 1EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 1EL1- HI MAIN | GE | /TED (600V) | ANSI-SYM | 18.00 | | 1.47( -91.9%) | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
TX 1EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 1EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | 1.42( -85.8%) | | | |

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Equipment Duty Comparison Report For Bus:
TX 2EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | 8.25( -54.1%) | | | |

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Equipment Duty Comparison Report For Bus:
TX 2EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 2EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | 1.55( -84.5%) | | | |

**********

Equipment Duty Comparison Report For Bus:
TX 3EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 3EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | 2.57( -85.7%) | | | |

**********

Equipment Duty Comparison Report For Bus:
TX 3EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 3EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | 1.49( -85.1%) | | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
TX 4EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 1.97( -89.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 4EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 4EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 2.09( -79.1%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 5EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 2.44( -86.4%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 5EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 5EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.48( -85.2%) | | |

**********

Equipment Duty Comparison Report For Bus:
TX 6EL1 H Area: 1 Zone: 1 Bus kV: 0.48 kV

| Equipment | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B 6EL1- HI MAIN | GE /TED (600V) | ANSI-SYM | 18.00 | | | 2.14( -88.1%) | | |

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

**********

Equipment Duty Comparison Report For Bus:
TX 6EL1 L Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| B 6EL1-MAIN | GE /THQL | ANSI-SYM | 10.00 | | | 1.48( -85.2%) | | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 5I Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| UPS 5I | / | ANSI-SYM | 10.00 | | | 1.43( -85.7%) | | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 5O Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| UPS 5O | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 8I Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| UPS 8I | / | ANSI-SYM | 10.00 | | | 1.44( -85.6%) | | | |

**********

Equipment Duty Comparison Report For Bus:
UPS 8O Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer / Style | Test Standard | 1/2 Cycle Interrupting (kA) | (kA) | Cyc | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | | |
| UPS 8O | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | | |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Equipment Duty Report

EQUIPMENT DUTY VIOLATION AND WARNING DETAILED REPORTS
Driving Point Voltage (P.U.) = 1.00000

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Equipment Duty Comparison Report For Bus:
UPS3A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS3A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS 3A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS3A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS5A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS5A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS 5A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS5A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS8A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS8A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS 8A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS8A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

**********

Equipment Duty Comparison Report For Bus:
UPS9A Area: 1 Zone: 1 Bus kV: 0.21 kV

| Equipment | | | | Ratings | | | Duties | | Comments |
|---|---|---|---|---|---|---|---|---|---|
| ID | Manufacturer | / Style | Test Standard | 1/2 Cycle (kA) | Interrupting (kA) Cyc | | 1/2 Cycle kA ( % ) | Interrupting kA ( % ) | |
| B UPS 9A-MAIN | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| B UPS9A-FDR | GE | /THQB | ANSI-SYM | 10.00 | | | 0.40( -96.0%) | | |
| UPS9A | | / | ANSI-SYM | 10.00 | | | 0.33( -96.7%) | | |

# Ground Fault

# Low Voltage Momentary Report

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 1EH1 | 0.480 | 1663.1 | 1663.1 | 0.27 | 1.00 | 1663.1 | | | | |
| | | | | | | | C 1EH1 | 2EHDP | 1663.1 | 0.27 |
| | | | | | | | C 1EL1 | TX 1EL1 H | 0.0 | 0.76 |
| 1EL1 | 0.208 | 1419.6 | 1419.6 | 1.27 | 1.01 | 1440.7 | | | | |
| | | | | | | | B 1EL1-MAIN | TX 1EL1 L | 1419.6 | 1.27 |
| 1HAIA | 0.480 | 10054.7 | 10054.7 | 1.64 | 1.04 | 10412.9 | | | | |
| | | | | | | | C 1HAIA | 1HDPA | 10054.7 | 1.64 |
| 1HAIB | 0.480 | 10054.7 | 10054.7 | 1.64 | 1.04 | 10412.9 | | | | |
| | | | | | | | C 1HAIB | 1HDPA | 10054.7 | 1.64 |
| 1HAIC | 0.480 | 10054.7 | 10054.7 | 1.64 | 1.04 | 10412.9 | | | | |
| | | | | | | | C 1HAIC | 1HDPA | 10054.7 | 1.64 |
| 1HDPA | 0.480 | 10525.7 | 10525.7 | 1.72 | 1.04 | 10957.3 | | | | |
| | | | | | | | C 1HDPA | MSB | 10454.1 | 1.71 |
| | | | | | | | C 1HAIA | 1HAIA | 0.0 | 1.81 |
| | | | | | | | C 1HAIB | 1HAIB | 0.0 | 1.81 |
| | | | | | | | C 1HAIC | 1HAIC | 0.0 | 1.81 |
| | | | | | | | C ELEV 160 | ELEV 160 | 73.3 | 3.10 |
| | | | | | | | C TX T1LDPA | TX T1LDPA H | 0.0 | 2.23 |
| 1LA1A | 0.208 | 5352.9 | 5352.9 | 1.74 | 1.04 | 5581.0 | | | | |
| | | | | | | | C 1LA1A | 1LDPA | 5352.9 | 1.74 |
| 1LA2A | 0.208 | 5074.4 | 5074.4 | 1.64 | 1.04 | 5257.8 | | | | |
| | | | | | | | C 1LA2A | 1LDPA | 5074.4 | 1.64 |
| 1LAC1A | 0.208 | 4820.9 | 4820.9 | 1.56 | 1.03 | 4970.4 | | | | |
| | | | | | | | C 1LAC1A | 1LDPA | 4820.9 | 1.56 |
| 1LAC2A | 0.208 | 5074.4 | 5074.4 | 1.64 | 1.04 | 5257.8 | | | | |
| | | | | | | | C 1LAC2A | 1LDPA | 5074.4 | 1.64 |
| 1LDPA | 0.208 | 5659.6 | 5659.6 | 1.86 | 1.05 | 5948.0 | | | | |
| | | | | | | | C 1LDPA | TX T1LDPA T1L | 5659.6 | 1.86 |
| | | | | | | | C 1LAC1A | 1LAC1A | 0.0 | 1.45 |
| | | | | | | | C 1LAC2A | 1LAC2A | 0.0 | 150.00 |
| | | | | | | | C 1LA1A | 1LA1A | 0.0 | 150.00 |
| | | | | | | | C 1LA2A | 1LA2A | 0.0 | 150.00 |
| 2EH1 | 0.480 | 21644.5 | 21644.5 | 0.92 | 1.00 | 21719.5 | | | | |
| | | | | | | | C 2EH1 | 2EHDP | 21644.5 | 0.92 |
| | | | | | | | C 2EL1 | TX 2EL1 H | 0.0 | 0.52 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 2EHDP | 0.480 | 28272.7 | 28272.7 | 1.35 | 1.02 | 28800.4 | | | | |
| | | | | | | | C 2EHDP | ATS EH2A1 | 28272.6 | 1.35 |
| | | | | | | | C 2EH1 | 2EH1 | 0.0 | 0.55 |
| | | | | | | | C 1EH1 | 1EH1 | 0.0 | 0.55 |
| | | | | | | | C 3EH1 | 3EH1 | 0.0 | 2.27 |
| | | | | | | | C 4EH1 | 4EH1 | 0.0 | 0.78 |
| | | | | | | | C 5EH1 | 5EH1 | 0.0 | 2.27 |
| | | | | | | | C 6EH1 | 6EH1 | 0.0 | 0.55 |
| 2EL1 | 0.208 | 1554.3 | 1554.3 | 1.50 | 1.03 | 1596.3 | | | | |
| | | | | | | | B 2EL1-MAIN | TX 2EL1 L | 1554.3 | 1.50 |
| 2HAIA | 0.480 | 34905.2 | 34905.2 | 1.95 | 1.06 | 36916.7 | | | | |
| | | | | | | | C 2HAIA | 2HDPA | 34905.2 | 1.95 |
| 2HAIB | 0.480 | 42282.3 | 42282.3 | 3.27 | 1.16 | 49068.4 | | | | |
| | | | | | | | C 2HAIB | 2HDPA | 42282.3 | 3.27 |
| 2HAIC | 0.480 | 37709.9 | 37709.9 | 2.18 | 1.08 | 40547.5 | | | | |
| | | | | | | | C 2HAIC | 2HDPA | 37709.9 | 2.18 |
| 2HDPA | 0.480 | 48651.8 | 48651.8 | 3.97 | 1.21 | 58803.4 | | | | |
| | | | | | | | C 2HDPA | MSB | 48651.8 | 3.97 |
| | | | | | | | C 2HAIA | 2HAIA | 0.0 | 1.45 |
| | | | | | | | C 2HAIB | 2HAIB | 0.0 | 0.70 |
| | | | | | | | C 2HAIC | 2HAIC | 0.0 | 1.45 |
| | | | | | | | C TX T2LDPA | TX T2LDPA H | 0.0 | 3.87 |
| | | | | | | | C 2HS1 | 2HS1 | 0.0 | 1.45 |
| | | | | | | | C 2HS2 | 2HS2 | 0.0 | 1.45 |
| 2HS1 | 0.480 | 40904.9 | 40904.9 | 2.51 | 1.10 | 45055.2 | | | | |
| | | | | | | | C 2HS1 | 2HDPA | 40904.9 | 2.51 |
| 2HS2 | 0.480 | 37709.9 | 37709.9 | 2.18 | 1.08 | 40547.5 | | | | |
| | | | | | | | C 2HS2 | 2HDPA | 37709.9 | 2.18 |
| 2LA1A | 0.208 | 9466.3 | 9466.3 | 2.09 | 1.07 | 10111.6 | | | | |
| | | | | | | | C 2LA1A | 2LDPA | 9466.3 | 2.09 |
| 2LA1B | 0.208 | 9466.3 | 9466.3 | 2.09 | 1.07 | 10111.6 | | | | |
| | | | | | | | C 2LA1B | 2LDPA | 9466.3 | 2.09 |
| 2LA1KA | 0.208 | 5278.1 | 5278.1 | 1.22 | 1.01 | 5344.9 | | | | |
| | | | | | | | C 2LA1KA | 2LDPA | 5278.1 | 1.22 |
| 2LA1KB | 0.208 | 4733.4 | 4733.4 | 1.15 | 1.01 | 4780.0 | | | | |
| | | | | | | | C 2LA1KB | 2LDPA | 4733.4 | 1.15 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | _____ Total Fault Duties _____ | | | | | _____ Bus Contributions _____ | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 2LA1KC | 0.208 | 4991.5 | 4991.5 | 1.18 | 1.01 | 5046.9 | | | | |
| | | | | | | | C 2LA1KC | 2LDPA | 4991.5 | 1.18 |
| 2LAC1A | 0.208 | 9466.3 | 9466.3 | 2.09 | 1.07 | 10111.6 | | | | |
| | | | | | | | C 2LAC1A | 2LDPA | 9466.3 | 2.09 |
| 2LDPA | 0.208 | 11525.4 | 11525.4 | 3.05 | 1.14 | 13178.7 | | | | |
| | | | | | | | C 2LDPA | TX T2LDPA T2L | 11525.4 | 3.05 |
| | | | | | | | C 2LAC1A | 2LAC1A | 0.0 | 150.00 |
| | | | | | | | C 2LA1A | 2LA1A | 0.0 | 150.00 |
| | | | | | | | C 2LA1B | 2LA1B | 0.0 | 150.00 |
| | | | | | | | C 2LA1KA | 2LA1KA | 0.0 | 1.45 |
| | | | | | | | C 2LA1KB | 2LA1KB | 0.0 | 1.45 |
| | | | | | | | C 2LA1KC | 2LA1KC | 0.0 | 150.00 |
| 3EH1 | 0.480 | 2797.3 | 2797.3 | 0.30 | 1.00 | 2797.3 | | | | |
| | | | | | | | C 3EH1 | 2EHDP | 2797.3 | 0.30 |
| | | | | | | | C 3EL1 | TX 3EL1 H | 0.0 | 3.36 |
| 3EL1 | 0.208 | 1485.7 | 1485.7 | 1.38 | 1.02 | 1516.1 | | | | |
| | | | | | | | C UPS 8 | UPS 8I | 0.0 | 1.92 |
| | | | | | | | B 3EL1-MAIN | TX 3EL1 L | 1485.7 | 1.38 |
| 4EH1 | 0.480 | 2100.6 | 2100.6 | 0.28 | 1.00 | 2100.6 | | | | |
| | | | | | | | C 4EH1 | 2EHDP | 2100.6 | 0.28 |
| | | | | | | | C 4EL1 | TX 4EL1 H | 0.0 | 1.02 |
| 4EL1 | 0.208 | 2094.6 | 2094.6 | 1.27 | 1.01 | 2125.6 | | | | |
| | | | | | | | B 4EL1-MAIN | TX 4EL1 L | 2094.6 | 1.27 |
| 5EH1 | 0.480 | 2650.8 | 2650.8 | 0.29 | 1.00 | 2650.8 | | | | |
| | | | | | | | C 5EH1 | 2EHDP | 2650.8 | 0.29 |
| | | | | | | | C 5EL1 | TX 5EL1 H | 0.0 | 3.39 |
| 5EL1 | 0.208 | 1480.9 | 1480.9 | 1.38 | 1.02 | 1510.6 | | | | |
| | | | | | | | C UPS 5 | UPS 5I | 0.0 | 1.91 |
| | | | | | | | B 5EL1-MAIN | TX 5EL1 L | 1480.9 | 1.38 |
| 5HA1A | 0.480 | 24939.3 | 24939.3 | 1.84 | 1.05 | 26176.4 | | | | |
| | | | | | | | C 5HA1A | 5HDPA | 24939.3 | 1.84 |
| 5HA1B | 0.480 | 25814.8 | 25814.8 | 2.17 | 1.07 | 27735.3 | | | | |
| | | | | | | | C 5HA1B | 5HDPA | 25814.8 | 2.17 |
| 5HA1C | 0.480 | 25814.8 | 25814.8 | 2.17 | 1.07 | 27735.3 | | | | |
| | | | | | | | C 5HA1C | 5HDPA | 25814.8 | 2.17 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 5HA1D | 0.480 | 24939.3 | 24939.3 | 1.84 | 1.05 | 26176.4 | | | | |
| | | | | | | | C 5HA1D | 5HDPA | 24939.3 | 1.84 |
| 5HA1E | 0.480 | 14790.0 | 14790.0 | 1.20 | 1.01 | 14963.3 | | | | |
| | | | | | | | C 5HA1E | 5HDPA | 14790.0 | 1.20 |
| 5HDPA | 0.480 | 31569.0 | 31569.0 | 2.67 | 1.11 | 35188.8 | | | | |
| | | | | | | | C 5HDPA | MSB | 31407.1 | 2.67 |
| | | | | | | | C 5HA1A | 5HA1A | 0.0 | 1.45 |
| | | | | | | | C 5HA1B | 5HA1B | 0.0 | 0.94 |
| | | | | | | | C 9HA2A | 9HA2A | 0.0 | 0.94 |
| | | | | | | | C 9HA2B | 9HA2B | 0.0 | 150.00 |
| | | | | | | | C TX T9LDPB | TX T9LDPB H | 0.0 | 3.07 |
| | | | | | | | C TX T9LDPA | TX T9LDPA H | 0.0 | 0.20 |
| | | | | | | | C TX T5LDPA | TX T5LDPA H | 0.0 | 150.00 |
| | | | | | | | C TX T5LDPB | TX T5LDPB H | 0.0 | 1.26 |
| | | | | | | | C ELEV 560 | ELEV 560 | 99.9 | 3.14 |
| | | | | | | | C CA | CA | 62.1 | 2.40 |
| | | | | | | | C 5HA1C | 5HA1C | 0.0 | 0.94 |
| | | | | | | | C 5HA1D | 5HA1D | 0.0 | 1.45 |
| | | | | | | | C 5HA1E | 5HA1E | 0.0 | 1.45 |
| 5LA1A | 0.208 | 5179.0 | 5179.0 | 1.61 | 1.03 | 5355.0 | | | | |
| | | | | | | | C 5LA1A | 5LDPA | 5179.0 | 1.61 |
| 5LAC1A | 0.208 | 5321.2 | 5321.2 | 1.66 | 1.04 | 5517.5 | | | | |
| | | | | | | | C 5LAC1A | 5LDPA | 5321.2 | 1.66 |
| 5LAC1B | 0.208 | 5321.2 | 5321.2 | 1.66 | 1.04 | 5517.5 | | | | |
| | | | | | | | C 5LAC1B | 5LDPA | 5321.2 | 1.66 |
| 5LB1A | 0.208 | 9026.9 | 9026.9 | 2.05 | 1.07 | 9617.0 | | | | |
| | | | | | | | C 5LB1A | 5LDPB | 9026.9 | 2.05 |
| 5LB1B | 0.208 | 7637.6 | 7637.6 | 1.67 | 1.04 | 7927.6 | | | | |
| | | | | | | | C 5LB1B | 5LDPB | 7637.6 | 1.67 |
| 5LB1C | 0.208 | 4195.3 | 4195.3 | 1.10 | 1.01 | 4229.6 | | | | |
| | | | | | | | C 5LB1C | 5LDPB | 4195.3 | 1.10 |
| 5LBC1A | 0.208 | 9026.9 | 9026.9 | 2.05 | 1.07 | 9617.0 | | | | |
| | | | | | | | C 5LBC1A | 5LDPB | 9026.9 | 2.05 |
| 5LBC1B | 0.208 | 9026.9 | 9026.9 | 2.05 | 1.07 | 9617.0 | | | | |
| | | | | | | | C 5LBC1B | 5LDPB | 9026.9 | 2.05 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 5LDPA | 0.208 | 5966.8 | 5966.8 | 1.89 | 1.05 | 6283.3 | | | | |
| | | | | | | | C 5LDPA | TX T5LDPA L | 5966.8 | 1.89 |
| | | | | | | | C 5LAC1A | 5LAC1A | 0.0 | 150.00 |
| | | | | | | | C 5LAC1B | 5LAC1B | 0.0 | 150.00 |
| | | | | | | | C 5LA1A | 5LA1A | 0.0 | 1.45 |
| 5LDPB | 0.208 | 10896.4 | 10896.4 | 2.89 | 1.13 | 12332.5 | | | | |
| | | | | | | | C 5LDPB | TX T5LDPB L | 10896.4 | 2.89 |
| | | | | | | | C 5LBC1A | 5LBC1A | 0.0 | 150.00 |
| | | | | | | | C 5LBC1B | 5LBC1B | 0.0 | 150.00 |
| | | | | | | | C 5LB1A | 5LB1A | 0.0 | 150.00 |
| | | | | | | | C 5LB1C | 5LB1C | 0.0 | 0.38 |
| | | | | | | | C 5LB1B | 5LB1B | 0.0 | 150.00 |
| 6EH1 | 0.480 | 4425.3 | 4425.3 | 0.34 | 1.00 | 4425.3 | | | | |
| | | | | | | | C 6EH1 | 2EHDP | 4425.3 | 0.34 |
| | | | | | | | C 6EL1 | TX 6EL1 H | 0.0 | 0.69 |
| 6EL1 | 0.208 | 1475.6 | 1475.6 | 1.33 | 1.02 | 1501.9 | | | | |
| | | | | | | | B 6EL1-MAIN | TX 6EL1 L | 1475.5 | 1.33 |
| 6HAIA | 0.480 | 27572.1 | 27572.1 | 1.61 | 1.03 | 28505.0 | | | | |
| | | | | | | | C 6HAIA | 6HDPA | 27572.1 | 1.61 |
| 6HAIB | 0.480 | 27572.1 | 27572.1 | 1.61 | 1.03 | 28505.0 | | | | |
| | | | | | | | C 6HAIB | 6HDPA | 27572.1 | 1.61 |
| 6HAIC | 0.480 | 27572.1 | 27572.1 | 1.61 | 1.03 | 28505.0 | | | | |
| | | | | | | | C 6HAIC | 6HDPA | 27572.1 | 1.61 |
| 6HDPA | 0.480 | 31404.8 | 31404.8 | 1.86 | 1.05 | 33000.9 | | | | |
| | | | | | | | C 6HDPA | MSB | 31404.8 | 1.86 |
| | | | | | | | C 6HAIA | 6HAIA | 0.0 | 1.43 |
| | | | | | | | C 6HAIB | 6HAIB | 0.0 | 1.43 |
| | | | | | | | C 6HAIC | 6HAIC | 0.0 | 1.43 |
| | | | | | | | C TX T6LAIA | TX T6LAIA H | 0.0 | 0.44 |
| | | | | | | | C TX T6LAC1A | TX T6LAC1A H | 0.0 | 3.40 |
| 6LAC1A | 0.208 | 4053.5 | 4053.5 | 1.68 | 1.04 | 4210.0 | | | | |
| | | | | | | | C 6LAC1A | TX T6LAC1A L | 4053.5 | 1.68 |
| 6LAIA | 0.208 | 4044.3 | 4044.3 | 1.67 | 1.04 | 4198.2 | | | | |
| | | | | | | | C 6LAIA | TX T6LAIA L | 4044.3 | 1.67 |
| 9HA2A | 0.480 | 20165.9 | 20165.9 | 1.81 | 1.05 | 21127.7 | | | | |
| | | | | | | | C 9HA2A | 5HDPA | 20165.9 | 1.81 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 9HA2B | 0.480 | 18653.5 | 18653.5 | 1.39 | 1.02 | 19045.4 | | | | |
| | | | | | | | C 9HA2B | 5HDPA | 18653.5 | 1.39 |
| 9LA2A | 0.208 | 5126.6 | 5126.6 | 1.61 | 1.03 | 5299.5 | | | | |
| | | | | | | | C 9LA2A | 9LDPA | 5126.6 | 1.61 |
| 9LAC2A | 0.208 | 5412.4 | 5412.4 | 1.70 | 1.04 | 5627.8 | | | | |
| | | | | | | | C 9LAC2A | 9LDPA | 5412.4 | 1.70 |
| 9LAC2B | 0.208 | 5266.0 | 5266.0 | 1.65 | 1.04 | 5458.6 | | | | |
| | | | | | | | C 9LAC2B | 9LDPA | 5266.0 | 1.65 |
| 9LB2A | 0.208 | 6713.7 | 6713.7 | 1.84 | 1.05 | 7045.7 | | | | |
| | | | | | | | C 9LB2A | 9LDPB | 6713.7 | 1.84 |
| 9LBC2A | 0.208 | 6713.7 | 6713.7 | 1.84 | 1.05 | 7045.7 | | | | |
| | | | | | | | C 9LBC2A | 9LDPB | 6713.7 | 1.84 |
| 9LBC2B | 0.208 | 6713.7 | 6713.7 | 1.84 | 1.05 | 7045.7 | | | | |
| | | | | | | | C 9LBC2B | 9LDPB | 6713.7 | 1.84 |
| 9LDPA | 0.208 | 5727.9 | 5727.9 | 1.81 | 1.05 | 6000.5 | | | | |
| | | | | | | | C 9LDPA | TX T9LDPA L | 5727.9 | 1.81 |
| | | | | | | | C 9LAC2A | 9LAC2A | 0.0 | 150.00 |
| | | | | | | | C 9LAC2B | 9LAC2B | 0.0 | 150.00 |
| | | | | | | | C 9LA2A | 9LA2A | 0.0 | 150.00 |
| 9LDPB | 0.208 | 7247.6 | 7247.6 | 2.03 | 1.06 | 7710.1 | | | | |
| | | | | | | | C 9LDPB | TX T9LDPB L | 7247.6 | 2.03 |
| | | | | | | | C 9LBC2A | 9LBC2A | 0.0 | 150.00 |
| | | | | | | | C 9LBC2B | 9LBC2B | 0.0 | 150.00 |
| | | | | | | | C 9LB2A | 9LB2A | 0.0 | 150.00 |
| ATS EH2A1 | 0.480 | 33148.5 | 33148.5 | 1.60 | 1.03 | 34251.7 | | | | |
| | | | | | | | C 2EHDP | 2EHDP | 0.0 | 4.77 |
| | | | | | | | C MSB-ATS EH2A | MSB | 33148.4 | 1.60 |
| CA | 0.480 | 2892.0 | 2892.0 | 0.24 | 1.00 | 2892.0 | | | | |
| | | | | | | | M CA | | 39.7 | 2.67 |
| | | | | | | | C CA | 5HDPA | 2870.0 | 0.22 |
| EGH1 | 0.480 | 2412.5 | 2557.7 | 9.80 | 1.44 | 3472.8 | | | | |
| | | | | | | | GEN EGH1 | | 2412.5 | 9.80 |
| | | | | | | | C EGH1-ATS EH2A | ATS EH2A1 | 0.0 | 0.02 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| ELEV 160 | 0.480 | 2472.5 | 2472.5 | 0.36 | 1.00 | 2472.5 | | | | |
| | | | | | | | M ELEV 160 | | 63.1 | 3.49 |
| | | | | | | | C ELEV 160 | 1HDPA | 2436.3 | 0.32 |
| ELEV 560 | 0.480 | 7642.9 | 7642.9 | 0.33 | 1.00 | 7642.9 | | | | |
| | | | | | | | M ELEV 560 | | 66.9 | 2.76 |
| | | | | | | | C ELEV 560 | 5HDPA | 7601.9 | 0.32 |
| MCCA | 0.480 | 29076.4 | 29076.4 | 2.52 | 1.10 | 32047.7 | | | | |
| | | | | | | | C MCCA | MSB | 29076.4 | 2.52 |
| MDB | 0.480 | 53935.9 | 53935.9 | 5.90 | 1.31 | 70845.0 | | | | |
| | | | | | | | C MSB | MSB | 332.5 | 3.64 |
| | | | | | | | C MDB | TX NPC L | 53605.1 | 5.93 |
| MSB | 0.480 | 53166.7 | 53166.7 | 5.66 | 1.30 | 69266.9 | | | | |
| | | | | | | | C MSB | MDB | 52838.1 | 5.69 |
| | | | | | | | C MSB-ATS EH2A | ATS EH2A1 | 0.0 | 1.31 |
| | | | | | | | C 6HDPA | 6HDPA | 0.0 | 0.47 |
| | | | | | | | C 1HDPA | 1HDPA | 124.9 | 3.70 |
| | | | | | | | C 2HDPA | 2HDPA | 0.0 | 1.25 |
| | | | | | | | C MCCA | MCCA | 0.0 | 150.00 |
| | | | | | | | C 5HDPA | 5HDPA | 205.1 | 3.53 |
| TX 1EL1 H | 0.480 | 1466.9 | 1466.9 | 0.24 | 1.00 | 1466.9 | | | | |
| | | | | | | | TX 1EL1 | TX 1EL1 L | 0.0 | 0.76 |
| | | | | | | | C 1EL1 | 1EH1 | 1466.9 | 0.24 |
| TX 1EL1 L | 0.208 | 1419.6 | 1419.6 | 1.27 | 1.01 | 1440.7 | | | | |
| | | | | | | | TX 1EL1 | TX 1EL1 H | 1419.6 | 1.27 |
| | | | | | | | B 1EL1-MAIN | 1EL1 | 0.0 | 0.00 |
| TX 2EL1 H | 0.480 | 8254.8 | 8254.8 | 0.30 | 1.00 | 8254.8 | | | | |
| | | | | | | | TX 2EL1 | TX 2EL1 L | 0.0 | 0.60 |
| | | | | | | | C 2EL1 | 2EH1 | 8254.8 | 0.30 |
| TX 2EL1 L | 0.208 | 1554.3 | 1554.3 | 1.50 | 1.03 | 1596.3 | | | | |
| | | | | | | | TX 2EL1 | TX 2EL1 H | 1554.3 | 1.50 |
| | | | | | | | B 2EL1-MAIN | 2EL1 | 0.0 | 0.00 |
| TX 3EL1 H | 0.480 | 2567.0 | 2567.0 | 0.28 | 1.00 | 2567.0 | | | | |
| | | | | | | | TX 3EL1 | TX 3EL1 L | 0.0 | 3.40 |
| | | | | | | | C 3EL1 | 3EH1 | 2567.0 | 0.28 |
| TX 3EL1 L | 0.208 | 1485.7 | 1485.7 | 1.38 | 1.02 | 1516.1 | | | | |
| | | | | | | | TX 3EL1 | TX 3EL1 H | 1485.7 | 1.38 |
| | | | | | | | B 3EL1-MAIN | 3EL1 | 0.0 | 1.06 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX 4EL1 H | 0.480 | 1967.7 | 1967.7 | 0.27 | 1.00 | 1967.7 | | | | |
| | | | | | | | TX 4EL1 | TX 4EL1 L | 0.0 | 1.03 |
| | | | | | | | C 4EL1 | 4EH1 | 1967.7 | 0.27 |
| TX 4EL1 L | 0.208 | 2094.6 | 2094.6 | 1.27 | 1.01 | 2125.6 | | | | |
| | | | | | | | TX 4EL1 | TX 4EL1 H | 2094.6 | 1.27 |
| | | | | | | | B 4EL1-MAIN | 4EL1 | 0.0 | 0.00 |
| TX 5EL1 H | 0.480 | 2443.0 | 2443.0 | 0.28 | 1.00 | 2443.0 | | | | |
| | | | | | | | TX 5EL1 | TX 5EL1 L | 0.0 | 3.43 |
| | | | | | | | C 5EL1 | 5EH1 | 2443.0 | 0.28 |
| TX 5EL1 L | 0.208 | 1480.9 | 1480.9 | 1.38 | 1.02 | 1510.6 | | | | |
| | | | | | | | TX 5EL1 | TX 5EL1 H | 1480.9 | 1.38 |
| | | | | | | | B 5EL1-MAIN | 5EL1 | 0.0 | 3.92 |
| TX 6EL1 H | 0.480 | 2137.5 | 2137.5 | 0.18 | 1.00 | 2137.5 | | | | |
| | | | | | | | TX 6EL1 | TX 6EL1 L | 0.0 | 0.74 |
| | | | | | | | C 6EL1 | 6EH1 | 2137.5 | 0.18 |
| TX 6EL1 L | 0.208 | 1475.6 | 1475.6 | 1.33 | 1.02 | 1501.9 | | | | |
| | | | | | | | TX 6EL1 | TX 6EL1 H | 1475.6 | 1.33 |
| | | | | | | | B 6EL1-MAIN | 6EL1 | 0.0 | 0.00 |
| TX NPC L | 0.480 | 56790.1 | 57296.1 | 6.96 | 1.36 | 77052.4 | | | | |
| | | | | | | | NPC | | 56450.7 | 7.02 |
| | | | | | | | C MDB | MDB | 341.6 | 3.83 |
| TX T1LDPA H | 0.480 | 9920.5 | 9920.5 | 1.57 | 1.03 | 10229.3 | | | | |
| | | | | | | | TX T1LDPA | TX T1LDPA T1L | 0.0 | 0.86 |
| | | | | | | | C TX T1LDPA | 1HDPA | 9920.5 | 1.57 |
| TX T1LDPA T1L | 0.208 | 5911.3 | 5911.3 | 1.88 | 1.05 | 6222.8 | | | | |
| | | | | | | | TX T1LDPA | TX T1LDPA H | 5911.3 | 1.88 |
| | | | | | | | C 1LDPA | 1LDPA | 0.0 | 0.70 |
| TX T2LDPA H | 0.480 | 33374.5 | 33374.5 | 2.62 | 1.11 | 37060.4 | | | | |
| | | | | | | | TX T2LDPA | TX T2LDPA T2L | 0.0 | 2.45 |
| | | | | | | | C TX T2LDPA | 2HDPA | 33374.5 | 2.62 |
| TX T2LDPA T2L | 0.208 | 12026.9 | 12026.9 | 3.19 | 1.15 | 13880.4 | | | | |
| | | | | | | | TX T2LDPA | TX T2LDPA H | 12026.9 | 3.19 |
| | | | | | | | C 2LDPA | 2LDPA | 0.0 | 2.95 |
| TX T5LDPA H | 0.480 | 27058.5 | 27058.5 | 1.86 | 1.05 | 28441.8 | | | | |
| | | | | | | | TX T5LDPA | TX T5LDPA L | 0.0 | 1.00 |
| | | | | | | | C TX T5LDPA | 5HDPA | 27058.5 | 1.86 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX T5LDPA L | 0.208 | 6247.0 | 6247.0 | 1.91 | 1.06 | 6590.8 | | | | |
| | | | | | | | TX T5LDPA | TX T5LDPA H | 6247.0 | 1.91 |
| | | | | | | | C 5LDPA | 5LDPA | 0.0 | 0.70 |
| TX T5LDPB H | 0.480 | 15238.9 | 15238.9 | 1.87 | 1.05 | 16034.0 | | | | |
| | | | | | | | TX T5LDPB | TX T5LDPB L | 0.0 | 2.53 |
| | | | | | | | C TX T5LDPB | 5HDPA | 15238.9 | 1.87 |
| TX T5LDPB L | 0.208 | 11345.9 | 11345.9 | 3.01 | 1.14 | 12941.4 | | | | |
| | | | | | | | TX T5LDPB | TX T5LDPB H | 11345.9 | 3.01 |
| | | | | | | | C 5LDPB | 5LDPB | 0.0 | 0.70 |
| TX T6LAC1A H | 0.480 | 24975.2 | 24975.2 | 1.23 | 1.01 | 25298.5 | | | | |
| | | | | | | | TX T6LAC1A | TX T6LAC1A L | 0.0 | 0.70 |
| | | | | | | | C TX T6LAC1A | 6HDPA | 24975.2 | 1.23 |
| TX T6LAC1A L | 0.208 | 4228.6 | 4228.6 | 1.76 | 1.04 | 4415.0 | | | | |
| | | | | | | | TX T6LAC1A | TX T6LAC1A H | 4228.6 | 1.76 |
| | | | | | | | C 6LAC1A | 6LAC1A | 0.0 | 150.00 |
| TX T6LAIA H | 0.480 | 22459.1 | 22459.1 | 1.07 | 1.01 | 22620.4 | | | | |
| | | | | | | | TX T6LAIA | TX T6LAIA L | 0.0 | 0.66 |
| | | | | | | | C TX T6LAIA | 6HDPA | 22459.1 | 1.07 |
| TX T6LAIA L | 0.208 | 4218.7 | 4218.7 | 1.75 | 1.04 | 4402.0 | | | | |
| | | | | | | | TX T6LAIA | TX T6LAIA H | 4218.7 | 1.75 |
| | | | | | | | C 6LAIA | 6LAIA | 0.0 | 150.00 |
| TX T9LDPA H | 0.480 | 16215.6 | 16215.6 | 1.02 | 1.01 | 16308.9 | | | | |
| | | | | | | | TX T9LDPA | TX T9LDPA L | 0.0 | 0.13 |
| | | | | | | | C TX T9LDPA | 5HDPA | 16215.6 | 1.02 |
| TX T9LDPA L | 0.208 | 6124.2 | 6124.2 | 1.84 | 1.05 | 6429.9 | | | | |
| | | | | | | | TX T9LDPA | TX T9LDPA H | 6124.2 | 1.84 |
| | | | | | | | C 9LDPA | 9LDPA | 0.0 | 0.68 |
| TX T9LDPB H | 0.480 | 9445.8 | 9445.8 | 0.98 | 1.00 | 9490.2 | | | | |
| | | | | | | | TX T9LDPB | TX T9LDPB L | 0.0 | 1.88 |
| | | | | | | | C TX T9LDPB | 5HDPA | 9445.8 | 0.98 |
| TX T9LDPB L | 0.208 | 7635.9 | 7635.9 | 2.16 | 1.07 | 8203.2 | | | | |
| | | | | | | | TX T9LDPB | TX T9LDPB H | 7635.9 | 2.16 |
| | | | | | | | C 9LDPB | 9LDPB | 0.0 | 1.25 |
| UPS 5I | 0.208 | 1431.7 | 1431.7 | 1.30 | 1.02 | 1454.6 | | | | |
| | | | | | | | C UPS 5 | 5EL1 | 1431.7 | 1.30 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Momentary Report

Momentary (First Cycle) Low Voltage Currents Using Momentary Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | Bkr Duty Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| UPS 5O | 0.208 | 333.1 | 333.1 | 4.56 | 1.25 | 414.7 | | | | |
| | | | | | | | UPS 5 | | 333.1 | 4.56 |
| | | | | | | | C UPS5A | UPS5A | 0.0 | 4.36 |
| UPS 8I | 0.208 | 1436.2 | 1436.2 | 1.30 | 1.02 | 1459.7 | | | | |
| | | | | | | | C UPS 8 | 3EL1 | 1436.2 | 1.30 |
| UPS 8O | 0.208 | 333.1 | 333.1 | 4.56 | 1.25 | 414.7 | | | | |
| | | | | | | | UPS 8 | | 333.1 | 4.56 |
| | | | | | | | C UPS8A | UPS8A | 0.0 | 4.36 |
| UPS3A | 0.208 | 330.2 | 330.2 | 4.19 | 1.22 | 403.8 | | | | |
| | | | | | | | C UPS3A | UPS8A | 330.2 | 4.19 |
| UPS5A | 0.208 | 331.6 | 331.6 | 4.37 | 1.23 | 409.2 | | | | |
| | | | | | | | C UPS5A | UPS 5O | 331.6 | 4.37 |
| | | | | | | | C UPS9A | UPS9A | 0.0 | 0.03 |
| UPS8A | 0.208 | 331.6 | 331.6 | 4.37 | 1.23 | 409.2 | | | | |
| | | | | | | | C UPS8A | UPS 8O | 331.6 | 4.37 |
| | | | | | | | C UPS3A | UPS3A | 0.0 | 0.03 |
| UPS9A | 0.208 | 330.2 | 330.2 | 4.19 | 1.22 | 403.8 | | | | |
| | | | | | | | C UPS9A | UPS5A | 330.2 | 4.19 |

# Ground Fault

# Low Voltage Interrupting Report

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 1EH1 | 0.480 | 1663.0 | 1.05 | 1.00 | 1663.0 | | | | |
| | | | | | | C 1EH1 | 2EHDP | 1663.0 | 0.3 |
| | | | | | | C 1EL1 | TX 1EL1 H | 0.0 | 0.8 |
| 1EL1 | 0.208 | 1419.6 | 1.62 | 1.00 | 1419.6 | | | | |
| | | | | | | B 1EL1-MAIN | TX 1EL1 L | 1419.6 | 1.3 |
| 1HAIA | 0.480 | 10031.6 | 1.92 | 1.00 | 10031.6 | | | | |
| | | | | | | C 1HAIA | 1HDPA | 10031.6 | 1.6 |
| 1HAIB | 0.480 | 10031.6 | 1.92 | 1.00 | 10031.6 | | | | |
| | | | | | | C 1HAIB | 1HDPA | 10031.6 | 1.6 |
| 1HAIC | 0.480 | 10031.6 | 1.92 | 1.00 | 10031.6 | | | | |
| | | | | | | C 1HAIC | 1HDPA | 10031.6 | 1.6 |
| 1HDPA | 0.480 | 10500.4 | 1.99 | 1.00 | 10500.4 | | | | |
| | | | | | | C 1HDPA | MSB | 10464.7 | 1.7 |
| | | | | | | C 1HAIA | 1HAIA | 0.0 | 1.8 |
| | | | | | | C 1HAIB | 1HAIB | 0.0 | 1.8 |
| | | | | | | C 1HAIC | 1HAIC | 0.0 | 1.8 |
| | | | | | | C ELEV 160 | ELEV 160 | 36.6 | 3.1 |
| | | | | | | C TX T1LDPA | TX T1LDPA H | 0.0 | 2.2 |
| 1LA1A | 0.208 | 5350.1 | 2.01 | 1.00 | 5350.1 | | | | |
| | | | | | | C 1LA1A | 1LDPA | 5350.1 | 1.7 |
| 1LA2A | 0.208 | 5071.8 | 1.93 | 1.00 | 5071.8 | | | | |
| | | | | | | C 1LA2A | 1LDPA | 5071.8 | 1.6 |
| 1LAC1A | 0.208 | 4818.6 | 1.86 | 1.00 | 4818.6 | | | | |
| | | | | | | C 1LAC1A | 1LDPA | 4818.6 | 1.6 |
| 1LAC2A | 0.208 | 5071.8 | 1.93 | 1.00 | 5071.8 | | | | |
| | | | | | | C 1LAC2A | 1LDPA | 5071.8 | 1.6 |
| 1LDPA | 0.208 | 5656.5 | 2.11 | 1.00 | 5656.5 | | | | |
| | | | | | | C 1LDPA | TX T1LDPA T1L | 5656.5 | 1.9 |
| | | | | | | C 1LAC1A | 1LAC1A | 0.0 | 1.5 |
| | | | | | | C 1LAC2A | 1LAC2A | 0.0 | 150.0 |
| | | | | | | C 1LA1A | 1LA1A | 0.0 | 150.0 |
| | | | | | | C 1LA2A | 1LA2A | 0.0 | 150.0 |
| 2EH1 | 0.480 | 21624.3 | 1.39 | 1.00 | 21624.3 | | | | |
| | | | | | | C 2EH1 | 2EHDP | 21624.3 | 0.9 |
| | | | | | | C 2EL1 | TX 2EL1 H | 0.0 | 0.5 |
| 2EHDP | 0.480 | 28232.6 | 1.71 | 1.00 | 28232.6 | | | | |
| | | | | | | C 2EHDP | ATS EH2A1 | 28232.6 | 1.4 |
| | | | | | | C 2EH1 | 2EH1 | 0.0 | 0.6 |
| | | | | | | C 1EH1 | 1EH1 | 0.0 | 0.6 |
| | | | | | | C 3EH1 | 3EH1 | 0.0 | 2.3 |
| | | | | | | C 4EH1 | 4EH1 | 0.0 | 0.8 |
| | | | | | | C 5EH1 | 5EH1 | 0.0 | 2.3 |
| | | | | | | C 6EH1 | 6EH1 | 0.0 | 0.6 |
| 2EL1 | 0.208 | 1554.3 | 1.81 | 1.00 | 1554.3 | | | | |
| | | | | | | B 2EL1-MAIN | TX 2EL1 L | 1554.3 | 1.5 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 2HAIA | 0.480 | 34838.5 | 2.22 | 1.00 | 34838.5 | | | | |
| | | | | | | C 2HAIA | 2HDPA | 34838.5 | 2.0 |
| 2HAIB | 0.480 | 42178.5 | 3.44 | 1.00 | 42178.5 | | | | |
| | | | | | | C 2HAIB | 2HDPA | 42178.5 | 3.3 |
| 2HAIC | 0.480 | 37630.6 | 2.42 | 1.00 | 37630.6 | | | | |
| | | | | | | C 2HAIC | 2HDPA | 37630.6 | 2.2 |
| 2HDPA | 0.480 | 48512.9 | 4.11 | 1.00 | 48512.9 | | | | |
| | | | | | | C 2HDPA | MSB | 48512.9 | 4.0 |
| | | | | | | C 2HAIA | 2HAIA | 0.0 | 1.5 |
| | | | | | | C 2HAIB | 2HAIB | 0.0 | 0.7 |
| | | | | | | C 2HAIC | 2HAIC | 0.0 | 1.5 |
| | | | | | | C TX T2LDPA | TX T2LDPA H | 0.0 | 3.9 |
| | | | | | | C 2HS1 | 2HS1 | 0.0 | 1.5 |
| | | | | | | C 2HS2 | 2HS2 | 0.0 | 1.5 |
| 2HS1 | 0.480 | 40810.0 | 2.73 | 1.00 | 40810.0 | | | | |
| | | | | | | C 2HS1 | 2HDPA | 40810.0 | 2.5 |
| 2HS2 | 0.480 | 37630.6 | 2.42 | 1.00 | 37630.6 | | | | |
| | | | | | | C 2HS2 | 2HDPA | 37630.6 | 2.2 |
| 2LA1A | 0.208 | 9464.2 | 2.32 | 1.00 | 9464.2 | | | | |
| | | | | | | C 2LA1A | 2LDPA | 9464.2 | 2.1 |
| 2LA1B | 0.208 | 9464.2 | 2.32 | 1.00 | 9464.2 | | | | |
| | | | | | | C 2LA1B | 2LDPA | 9464.2 | 2.1 |
| 2LA1KA | 0.208 | 5277.5 | 1.59 | 1.00 | 5277.5 | | | | |
| | | | | | | C 2LA1KA | 2LDPA | 5277.5 | 1.2 |
| 2LA1KB | 0.208 | 4732.9 | 1.53 | 1.00 | 4732.9 | | | | |
| | | | | | | C 2LA1KB | 2LDPA | 4732.9 | 1.1 |
| 2LA1KC | 0.208 | 4990.9 | 1.56 | 1.00 | 4990.9 | | | | |
| | | | | | | C 2LA1KC | 2LDPA | 4990.9 | 1.2 |
| 2LAC1A | 0.208 | 9464.2 | 2.32 | 1.00 | 9464.2 | | | | |
| | | | | | | C 2LAC1A | 2LDPA | 9464.2 | 2.1 |
| 2LDPA | 0.208 | 11522.0 | 3.21 | 1.00 | 11522.0 | | | | |
| | | | | | | C 2LDPA | TX T2LDPA T2L | 11522.0 | 3.0 |
| | | | | | | C 2LAC1A | 2LAC1A | 0.0 | 150.0 |
| | | | | | | C 2LA1A | 2LA1A | 0.0 | 150.0 |
| | | | | | | C 2LA1B | 2LA1B | 0.0 | 150.0 |
| | | | | | | C 2LA1KA | 2LA1KA | 0.0 | 1.5 |
| | | | | | | C 2LA1KB | 2LA1KB | 0.0 | 1.5 |
| | | | | | | C 2LA1KC | 2LA1KC | 0.0 | 150.0 |
| 3EH1 | 0.480 | 2797.1 | 1.05 | 1.00 | 2797.1 | | | | |
| | | | | | | C 3EH1 | 2EHDP | 2797.1 | 0.3 |
| | | | | | | C 3EL1 | TX 3EL1 H | 0.0 | 3.4 |
| 3EL1 | 0.208 | 1485.6 | 1.71 | 1.00 | 1485.6 | | | | |
| | | | | | | C UPS 8 | UPS 8I | 0.0 | 1.9 |
| | | | | | | B 3EL1-MAIN | TX 3EL1 L | 1485.6 | 1.4 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 4EH1 | 0.480 | 2100.5 | 1.05 | 1.00 | 2100.5 | | | | |
| | | | | | | C 4EH1 | 2EHDP | 2100.5 | 0.3 |
| | | | | | | C 4EL1 | TX 4EL1 H | 0.0 | 1.0 |
| 4EL1 | 0.208 | 2094.5 | 1.62 | 1.00 | 2094.5 | | | | |
| | | | | | | B 4EL1-MAIN | TX 4EL1 L | 2094.5 | 1.3 |
| 5EH1 | 0.480 | 2650.7 | 1.05 | 1.00 | 2650.7 | | | | |
| | | | | | | C 5EH1 | 2EHDP | 2650.7 | 0.3 |
| | | | | | | C 5EL1 | TX 5EL1 H | 0.0 | 3.4 |
| 5EL1 | 0.208 | 1480.9 | 1.70 | 1.00 | 1480.9 | | | | |
| | | | | | | C UPS 5 | UPS 5I | 0.0 | 1.9 |
| | | | | | | B 5EL1-MAIN | TX 5EL1 L | 1480.9 | 1.4 |
| 5HA1A | 0.480 | 24886.6 | 2.11 | 1.00 | 24886.6 | | | | |
| | | | | | | C 5HA1A | 5HDPA | 24886.6 | 1.8 |
| 5HA1B | 0.480 | 25757.5 | 2.40 | 1.00 | 25757.5 | | | | |
| | | | | | | C 5HA1B | 5HDPA | 25757.5 | 2.2 |
| 5HA1C | 0.480 | 25757.5 | 2.40 | 1.00 | 25757.5 | | | | |
| | | | | | | C 5HA1C | 5HDPA | 25757.5 | 2.2 |
| 5HA1D | 0.480 | 24886.6 | 2.11 | 1.00 | 24886.6 | | | | |
| | | | | | | C 5HA1D | 5HDPA | 24886.6 | 1.8 |
| 5HA1E | 0.480 | 14772.8 | 1.57 | 1.00 | 14772.8 | | | | |
| | | | | | | C 5HA1E | 5HDPA | 14772.8 | 1.2 |
| 5HDPA | 0.480 | 31482.3 | 2.86 | 1.00 | 31482.3 | | | | |
| | | | | | | C 5HDPA | MSB | 31401.6 | 2.7 |
| | | | | | | C 5HA1A | 5HA1A | 0.0 | 1.5 |
| | | | | | | C 5HA1B | 5HA1B | 0.0 | 0.9 |
| | | | | | | C 9HA2A | 9HA2A | 0.0 | 0.9 |
| | | | | | | C 9HA2B | 9HA2B | 0.0 | 150.0 |
| | | | | | | C TX T9LDPB | TX T9LDPB H | 0.0 | 3.1 |
| | | | | | | C TX T9LDPA | TX T9LDPA H | 0.0 | 0.2 |
| | | | | | | C TX T5LDPA | TX T5LDPA H | 0.0 | 150.0 |
| | | | | | | C TX T5LDPB | TX T5LDPB H | 0.0 | 1.3 |
| | | | | | | C ELEV 560 | ELEV 560 | 49.8 | 3.1 |
| | | | | | | C CA | CA | 31.0 | 2.4 |
| | | | | | | C 5HA1C | 5HA1C | 0.0 | 0.9 |
| | | | | | | C 5HA1D | 5HA1D | 0.0 | 1.5 |
| | | | | | | C 5HA1E | 5HA1E | 0.0 | 1.5 |
| 5LA1A | 0.208 | 5178.0 | 1.90 | 1.00 | 5178.0 | | | | |
| | | | | | | C 5LA1A | 5LDPA | 5178.0 | 1.6 |
| 5LAC1A | 0.208 | 5320.2 | 1.94 | 1.00 | 5320.2 | | | | |
| | | | | | | C 5LAC1A | 5LDPA | 5320.2 | 1.7 |
| 5LAC1B | 0.208 | 5320.2 | 1.94 | 1.00 | 5320.2 | | | | |
| | | | | | | C 5LAC1B | 5LDPA | 5320.2 | 1.7 |
| 5LB1A | 0.208 | 9023.9 | 2.29 | 1.00 | 9023.9 | | | | |
| | | | | | | C 5LB1A | 5LDPB | 9023.9 | 2.0 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 5LB1B | 0.208 | 7635.5 | 1.96 | 1.00 | 7635.5 | | | | |
| | | | | | | C 5LB1B | 5LDPB | 7635.5 | 1.7 |
| 5LB1C | 0.208 | 4194.7 | 1.50 | 1.00 | 4194.7 | | | | |
| | | | | | | C 5LB1C | 5LDPB | 4194.7 | 1.1 |
| 5LBC1A | 0.208 | 9023.9 | 2.29 | 1.00 | 9023.9 | | | | |
| | | | | | | C 5LBC1A | 5LDPB | 9023.9 | 2.0 |
| 5LBC1B | 0.208 | 9023.9 | 2.29 | 1.00 | 9023.9 | | | | |
| | | | | | | C 5LBC1B | 5LDPB | 9023.9 | 2.0 |
| 5LDPA | 0.208 | 5965.5 | 2.14 | 1.00 | 5965.5 | | | | |
| | | | | | | C 5LDPA | TX T5LDPA L | 5965.5 | 1.9 |
| | | | | | | C 5LAC1A | 5LAC1A | 0.0 | 150.0 |
| | | | | | | C 5LAC1B | 5LAC1B | 0.0 | 150.0 |
| | | | | | | C 5LA1A | 5LA1A | 0.0 | 1.5 |
| 5LDPB | 0.208 | 10891.9 | 3.06 | 1.00 | 10891.9 | | | | |
| | | | | | | C 5LDPB | TX T5LDPB L | 10891.9 | 2.9 |
| | | | | | | C 5LBC1A | 5LBC1A | 0.0 | 150.0 |
| | | | | | | C 5LBC1B | 5LBC1B | 0.0 | 150.0 |
| | | | | | | C 5LB1A | 5LB1A | 0.0 | 150.0 |
| | | | | | | C 5LB1C | 5LB1C | 0.0 | 0.4 |
| | | | | | | C 5LB1B | 5LB1B | 0.0 | 150.0 |
| 6EH1 | 0.480 | 4424.8 | 1.06 | 1.00 | 4424.8 | | | | |
| | | | | | | C 6EH1 | 2EHDP | 4424.8 | 0.3 |
| | | | | | | C 6EL1 | TX 6EL1 H | 0.0 | 0.7 |
| 6EL1 | 0.208 | 1475.5 | 1.67 | 1.00 | 1475.5 | | | | |
| | | | | | | B 6EL1-MAIN | TX 6EL1 L | 1475.5 | 1.3 |
| 6HAIA | 0.480 | 27532.0 | 1.92 | 1.00 | 27532.0 | | | | |
| | | | | | | C 6HAIA | 6HDPA | 27532.0 | 1.6 |
| 6HAIB | 0.480 | 27532.0 | 1.92 | 1.00 | 27532.0 | | | | |
| | | | | | | C 6HAIB | 6HDPA | 27532.0 | 1.6 |
| 6HAIC | 0.480 | 27532.0 | 1.92 | 1.00 | 27532.0 | | | | |
| | | | | | | C 6HAIC | 6HDPA | 27532.0 | 1.6 |
| 6HDPA | 0.480 | 31351.3 | 2.13 | 1.00 | 31351.3 | | | | |
| | | | | | | C 6HDPA | MSB | 31351.3 | 1.9 |
| | | | | | | C 6HAIA | 6HAIA | 0.0 | 1.4 |
| | | | | | | C 6HAIB | 6HAIB | 0.0 | 1.4 |
| | | | | | | C 6HAIC | 6HAIC | 0.0 | 1.4 |
| | | | | | | C TX T6LAIA | TX T6LAIA H | 0.0 | 0.4 |
| | | | | | | C TX T6LAC1A | TX T6LAC1A H | 0.0 | 3.4 |
| 6LAC1A | 0.208 | 4053.1 | 1.96 | 1.00 | 4053.1 | | | | |
| | | | | | | C 6LAC1A | TX T6LAC1A L | 4053.1 | 1.7 |
| 6LAIA | 0.208 | 4043.9 | 1.95 | 1.00 | 4043.9 | | | | |
| | | | | | | C 6LAIA | TX T6LAIA L | 4043.9 | 1.7 |
| 9HA2A | 0.480 | 20131.5 | 2.08 | 1.00 | 20131.5 | | | | |
| | | | | | | C 9HA2A | 5HDPA | 20131.5 | 1.8 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| 9HA2B | 0.480 | 18625.3 | 1.73 | 1.00 | 18625.3 | | | | |
| | | | | | | C 9HA2B | 5HDPA | 18625.3 | 1.4 |
| 9LA2A | 0.208 | 5125.6 | 1.90 | 1.00 | 5125.6 | | | | |
| | | | | | | C 9LA2A | 9LDPA | 5125.6 | 1.6 |
| 9LAC2A | 0.208 | 5411.3 | 1.97 | 1.00 | 5411.3 | | | | |
| | | | | | | C 9LAC2A | 9LDPA | 5411.3 | 1.7 |
| 9LAC2B | 0.208 | 5265.0 | 1.93 | 1.00 | 5265.0 | | | | |
| | | | | | | C 9LAC2B | 9LDPA | 5265.0 | 1.7 |
| 9LB2A | 0.208 | 6712.1 | 2.09 | 1.00 | 6712.1 | | | | |
| | | | | | | C 9LB2A | 9LDPB | 6712.1 | 1.8 |
| 9LBC2A | 0.208 | 6712.1 | 2.09 | 1.00 | 6712.1 | | | | |
| | | | | | | C 9LBC2A | 9LDPB | 6712.1 | 1.8 |
| 9LBC2B | 0.208 | 6712.1 | 2.09 | 1.00 | 6712.1 | | | | |
| | | | | | | C 9LBC2B | 9LDPB | 6712.1 | 1.8 |
| 9LDPA | 0.208 | 5726.7 | 2.07 | 1.00 | 5726.7 | | | | |
| | | | | | | C 9LDPA | TX T9LDPA L | 5726.7 | 1.8 |
| | | | | | | C 9LAC2A | 9LAC2A | 0.0 | 150.0 |
| | | | | | | C 9LAC2B | 9LAC2B | 0.0 | 150.0 |
| | | | | | | C 9LA2A | 9LA2A | 0.0 | 150.0 |
| 9LDPB | 0.208 | 7245.7 | 2.26 | 1.00 | 7245.7 | | | | |
| | | | | | | C 9LDPB | TX T9LDPB L | 7245.7 | 2.0 |
| | | | | | | C 9LBC2A | 9LBC2A | 0.0 | 150.0 |
| | | | | | | C 9LBC2B | 9LBC2B | 0.0 | 150.0 |
| | | | | | | C 9LB2A | 9LB2A | 0.0 | 150.0 |
| ATS EH2A1 | 0.480 | 33090.7 | 1.92 | 1.00 | 33090.7 | | | | |
| | | | | | | C 2EHDP | 2EHDP | 0.0 | 4.7 |
| | | | | | | C MSB-ATS EH2A | MSB | 33090.7 | 1.6 |
| CA | 0.480 | 2885.7 | 1.03 | 1.00 | 2885.7 | | | | |
| | | | | | | M CA | | 19.8 | 2.7 |
| | | | | | | C CA | 5HDPA | 2874.6 | 0.2 |
| EGH1 | 0.480 | 2412.5 | 9.85 | 1.00 | 2416.6 | | | | |
| | | | | | | GEN EGH1 | | 2412.5 | 9.8 |
| | | | | | | C EGH1-ATS EH2A | ATS EH2A1 | 0.0 | 0.0 |
| ELEV 160 | 0.480 | 2462.6 | 1.05 | 1.00 | 2462.6 | | | | |
| | | | | | | M ELEV 160 | | 31.4 | 3.4 |
| | | | | | | C ELEV 160 | 1HDPA | 2444.4 | 0.3 |
| ELEV 560 | 0.480 | 7628.9 | 1.05 | 1.00 | 7628.9 | | | | |
| | | | | | | M ELEV 560 | | 33.4 | 2.7 |
| | | | | | | C ELEV 560 | 5HDPA | 7608.4 | 0.3 |
| MCCA | 0.480 | 29028.4 | 2.72 | 1.00 | 29028.4 | | | | |
| | | | | | | C MCCA | MSB | 29028.4 | 2.5 |
| MDB | 0.480 | 53765.8 | 5.99 | 1.00 | 53767.3 | | | | |
| | | | | | | C MSB | MSB | 165.8 | 3.6 |
| | | | | | | C MDB | TX NPC L | 53600.8 | 5.9 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| MSB | 0.480 | 52999.0 | 5.76 | 1.00 | 53000.0 | | | | |
| | | | | | | C MSB | MDB | 52835.2 | 5.7 |
| | | | | | | C MSB-ATS EH2A | ATS EH2A1 | 0.0 | 1.3 |
| | | | | | | C 6HDPA | 6HDPA | 0.0 | 0.5 |
| | | | | | | C 1HDPA | 1HDPA | 62.3 | 3.7 |
| | | | | | | C 2HDPA | 2HDPA | 0.0 | 1.2 |
| | | | | | | C MCCA | MCCA | 0.0 | 150.0 |
| | | | | | | C 5HDPA | 5HDPA | 102.3 | 3.5 |
| TX 1EL1 H | 0.480 | 1466.9 | 1.04 | 1.00 | 1466.9 | | | | |
| | | | | | | TX 1EL1 | TX 1EL1 L | 0.0 | 0.8 |
| | | | | | | C 1EL1 | 1EH1 | 1466.8 | 0.2 |
| TX 1EL1 L | 0.208 | 1419.6 | 1.62 | 1.00 | 1419.6 | | | | |
| | | | | | | TX 1EL1 | TX 1EL1 H | 1419.6 | 1.3 |
| | | | | | | B 1EL1-MAIN | 1EL1 | 0.0 | 0.0 |
| TX 2EL1 H | 0.480 | 8253.4 | 1.05 | 1.00 | 8253.4 | | | | |
| | | | | | | TX 2EL1 | TX 2EL1 L | 0.0 | 0.6 |
| | | | | | | C 2EL1 | 2EH1 | 8253.4 | 0.3 |
| TX 2EL1 L | 0.208 | 1554.3 | 1.81 | 1.00 | 1554.3 | | | | |
| | | | | | | TX 2EL1 | TX 2EL1 H | 1554.3 | 1.5 |
| | | | | | | B 2EL1-MAIN | 2EL1 | 0.0 | 0.0 |
| TX 3EL1 H | 0.480 | 2566.8 | 1.05 | 1.00 | 2566.8 | | | | |
| | | | | | | TX 3EL1 | TX 3EL1 L | 0.0 | 3.4 |
| | | | | | | C 3EL1 | 3EH1 | 2566.8 | 0.3 |
| TX 3EL1 L | 0.208 | 1485.6 | 1.71 | 1.00 | 1485.6 | | | | |
| | | | | | | TX 3EL1 | TX 3EL1 H | 1485.6 | 1.4 |
| | | | | | | B 3EL1-MAIN | 3EL1 | 0.0 | 1.1 |
| TX 4EL1 H | 0.480 | 1967.6 | 1.04 | 1.00 | 1967.6 | | | | |
| | | | | | | TX 4EL1 | TX 4EL1 L | 0.0 | 1.0 |
| | | | | | | C 4EL1 | 4EH1 | 1967.6 | 0.3 |
| TX 4EL1 L | 0.208 | 2094.5 | 1.62 | 1.00 | 2094.5 | | | | |
| | | | | | | TX 4EL1 | TX 4EL1 H | 2094.5 | 1.3 |
| | | | | | | B 4EL1-MAIN | 4EL1 | 0.0 | 0.0 |
| TX 5EL1 H | 0.480 | 2442.9 | 1.04 | 1.00 | 2442.9 | | | | |
| | | | | | | TX 5EL1 | TX 5EL1 L | 0.0 | 3.4 |
| | | | | | | C 5EL1 | 5EH1 | 2442.9 | 0.3 |
| TX 5EL1 L | 0.208 | 1480.9 | 1.70 | 1.00 | 1480.9 | | | | |
| | | | | | | TX 5EL1 | TX 5EL1 H | 1480.9 | 1.4 |
| | | | | | | B 5EL1-MAIN | 5EL1 | 0.0 | 3.9 |
| TX 6EL1 H | 0.480 | 2137.4 | 1.02 | 1.00 | 2137.4 | | | | |
| | | | | | | TX 6EL1 | TX 6EL1 L | 0.0 | 0.7 |
| | | | | | | C 6EL1 | 6EH1 | 2137.4 | 0.2 |
| TX 6EL1 L | 0.208 | 1475.5 | 1.67 | 1.00 | 1475.5 | | | | |
| | | | | | | TX 6EL1 | TX 6EL1 H | 1475.5 | 1.3 |
| | | | | | | B 6EL1-MAIN | 6EL1 | 0.0 | 0.0 |

Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

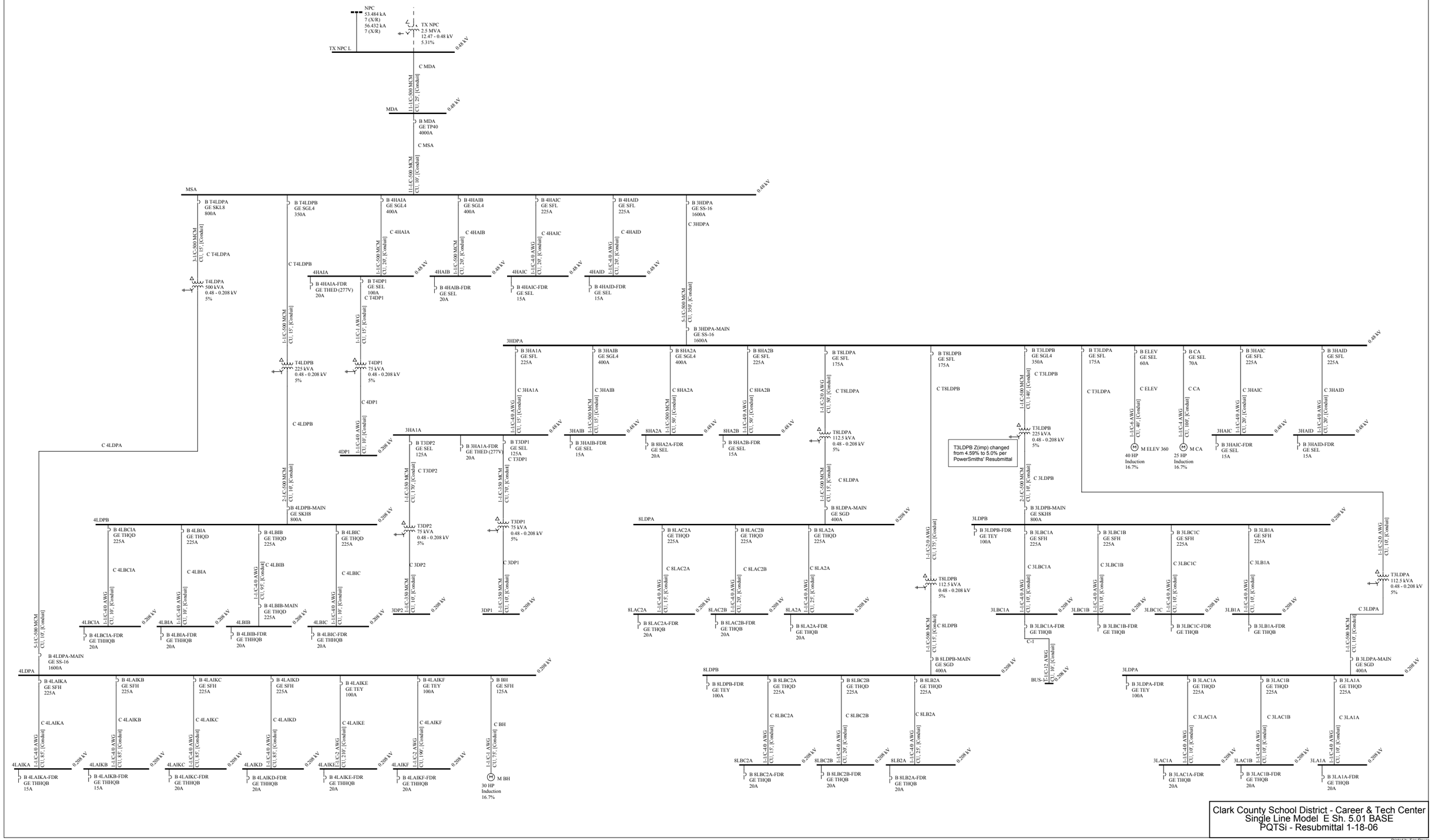
| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX NPC L | 0.480 | 56610.5 | 7.05 | 1.00 | 56618.2 | | | | |
| | | | | | | NPC | | 56441.3 | 7.0 |
| | | | | | | C MDB | MDB | 170.3 | 3.8 |
| TX T1LDPA H | 0.480 | 9897.9 | 1.86 | 1.00 | 9897.9 | | | | |
| | | | | | | TX T1LDPA | TX T1LDPA T1L | 0.0 | 0.9 |
| | | | | | | C TX T1LDPA | 1HDPA | 9897.9 | 1.6 |
| TX T1LDPA T1L | 0.208 | 5907.8 | 2.13 | 1.00 | 5907.8 | | | | |
| | | | | | | TX T1LDPA | TX T1LDPA H | 5907.8 | 1.9 |
| | | | | | | C 1LDPA | 1LDPA | 0.0 | 0.7 |
| TX T2LDPA H | 0.480 | 33311.0 | 2.82 | 1.00 | 33311.0 | | | | |
| | | | | | | TX T2LDPA | TX T2LDPA T2L | 0.0 | 2.5 |
| | | | | | | C TX T2LDPA | 2HDPA | 33311.0 | 2.6 |
| TX T2LDPA T2L | 0.208 | 12023.3 | 3.34 | 1.00 | 12023.3 | | | | |
| | | | | | | TX T2LDPA | TX T2LDPA H | 12023.3 | 3.2 |
| | | | | | | C 2LDPA | 2LDPA | 0.0 | 2.9 |
| TX T5LDPA H | 0.480 | 26996.4 | 2.13 | 1.00 | 26996.4 | | | | |
| | | | | | | TX T5LDPA | TX T5LDPA L | 0.0 | 1.0 |
| | | | | | | C TX T5LDPA | 5HDPA | 26996.4 | 1.9 |
| TX T5LDPA L | 0.208 | 6245.5 | 2.16 | 1.00 | 6245.5 | | | | |
| | | | | | | TX T5LDPA | TX T5LDPA H | 6245.5 | 1.9 |
| | | | | | | C 5LDPA | 5LDPA | 0.0 | 0.7 |
| TX T5LDPB H | 0.480 | 15219.2 | 2.13 | 1.00 | 15219.2 | | | | |
| | | | | | | TX T5LDPB | TX T5LDPB L | 0.0 | 2.5 |
| | | | | | | C TX T5LDPB | 5HDPA | 15219.2 | 1.9 |
| TX T5LDPB L | 0.208 | 11341.1 | 3.17 | 1.00 | 11341.1 | | | | |
| | | | | | | TX T5LDPB | TX T5LDPB H | 11341.1 | 3.0 |
| | | | | | | C 5LDPB | 5LDPB | 0.0 | 0.7 |
| TX T6LAC1A H | 0.480 | 24944.9 | 1.61 | 1.00 | 24944.9 | | | | |
| | | | | | | TX T6LAC1A | TX T6LAC1A L | 0.0 | 0.7 |
| | | | | | | C TX T6LAC1A | 6HDPA | 24944.9 | 1.2 |
| TX T6LAC1A L | 0.208 | 4228.2 | 2.03 | 1.00 | 4228.2 | | | | |
| | | | | | | TX T6LAC1A | TX T6LAC1A H | 4228.2 | 1.8 |
| | | | | | | C 6LAC1A | 6LAC1A | 0.0 | 150.0 |
| TX T6LAIA H | 0.480 | 22435.8 | 1.49 | 1.00 | 22435.8 | | | | |
| | | | | | | TX T6LAIA | TX T6LAIA L | 0.0 | 0.7 |
| | | | | | | C TX T6LAIA | 6HDPA | 22435.8 | 1.1 |
| TX T6LAIA L | 0.208 | 4218.3 | 2.02 | 1.00 | 4218.3 | | | | |
| | | | | | | TX T6LAIA | TX T6LAIA H | 4218.3 | 1.8 |
| | | | | | | C 6LAIA | 6LAIA | 0.0 | 150.0 |
| TX T9LDPA H | 0.480 | 16195.8 | 1.44 | 1.00 | 16195.8 | | | | |
| | | | | | | TX T9LDPA | TX T9LDPA L | 0.0 | 0.1 |
| | | | | | | C TX T9LDPA | 5HDPA | 16195.8 | 1.0 |
| TX T9LDPA L | 0.208 | 6122.8 | 2.10 | 1.00 | 6122.8 | | | | |
| | | | | | | TX T9LDPA | TX T9LDPA H | 6122.8 | 1.8 |
| | | | | | | C 9LDPA | 9LDPA | 0.0 | 0.7 |

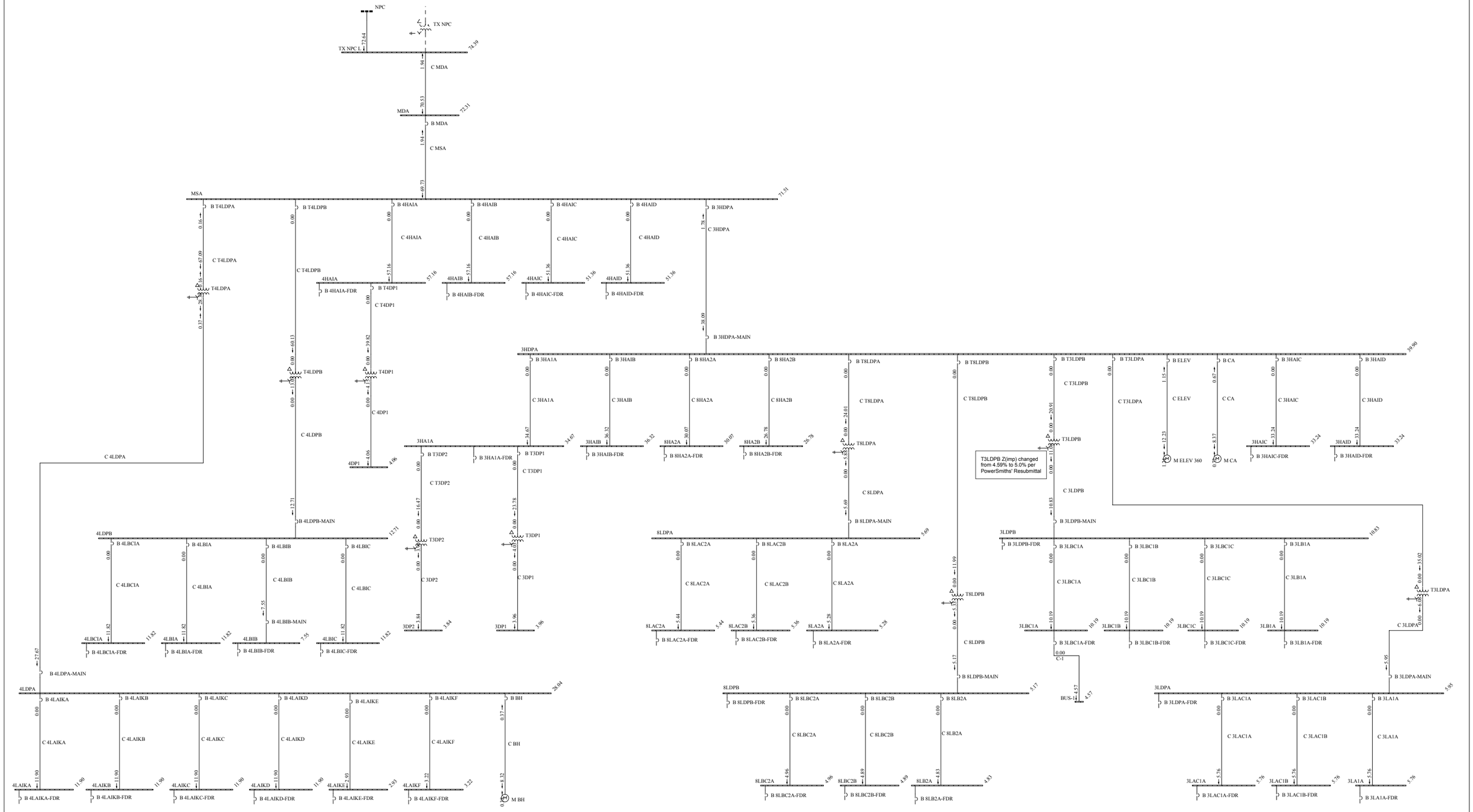
Project Name: CCSD Career & Tech Center E-Sh 5.02
Comment: Ground Fault - Low Voltage Interrupting Report

Interrupting Low Voltage Currents Using Interrupting Impedance Circuit
Driving Point Voltage (P.U.) = 1.00000

| ___S L-GND Fault On ___ | | Total Fault Duties | | | | Bus Contributions | | | |
|---|---|---|---|---|---|---|---|---|---|
| Name | Bus kV | Symmetrical Amps | X/R Ratio | Mult Factor | Asymmetrical Amps | Branch | Bus | Symmetrical Amps | X/R Ratio |
| TX T9LDPB H | 0.480 | 9439.2 | 1.41 | 1.00 | 9439.2 | | | | |
| | | | | | | TX T9LDPB | TX T9LDPB L | 0.0 | 1.9 |
| | | | | | | C TX T9LDPB | 5HDPA | 9439.1 | 1.0 |
| TX T9LDPB L | 0.208 | 7633.7 | 2.39 | 1.00 | 7633.7 | | | | |
| | | | | | | TX T9LDPB | TX T9LDPB H | 7633.7 | 2.2 |
| | | | | | | C 9LDPB | 9LDPB | 0.0 | 1.2 |
| UPS 5I | 0.208 | 1431.6 | 1.64 | 1.00 | 1431.6 | | | | |
| | | | | | | C UPS 5 | 5EL1 | 1431.6 | 1.3 |
| UPS 5O | 0.208 | 0.0 | 2.33 | 1.00 | 0.0 | | | | |
| | | | | | | UPS 5 | | 0.0 | 4.6 |
| | | | | | | C UPS5A | UPS5A | 0.0 | 4.4 |
| UPS 8I | 0.208 | 1436.1 | 1.65 | 1.00 | 1436.1 | | | | |
| | | | | | | C UPS 8 | 3EL1 | 1436.1 | 1.3 |
| UPS 8O | 0.208 | 0.0 | 2.33 | 1.00 | 0.0 | | | | |
| | | | | | | UPS 8 | | 0.0 | 4.6 |
| | | | | | | C UPS8A | UPS8A | 0.0 | 4.4 |
| UPS3A | 0.208 | 0.0 | 2.33 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS3A | UPS8A | 0.0 | 4.6 |
| UPS5A | 0.208 | 0.0 | 2.33 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS5A | UPS 5O | 0.0 | 4.6 |
| | | | | | | C UPS9A | UPS9A | 0.0 | 0.1 |
| UPS8A | 0.208 | 0.0 | 2.33 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS8A | UPS 8O | 0.0 | 4.6 |
| | | | | | | C UPS3A | UPS3A | 0.0 | 0.1 |
| UPS9A | 0.208 | 0.0 | 2.33 | 1.00 | 0.0 | | | | |
| | | | | | | C UPS9A | UPS5A | 0.0 | 4.6 |

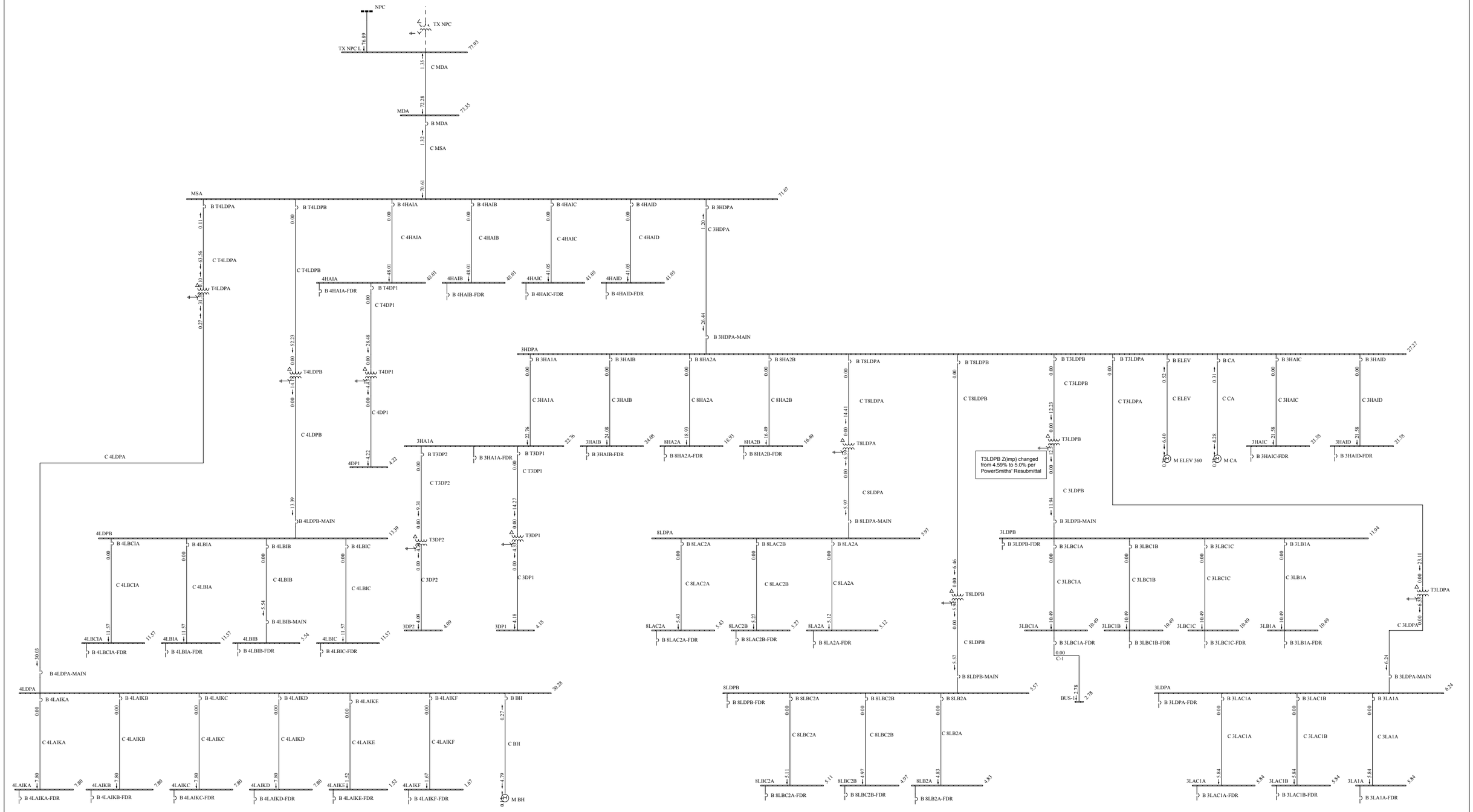
# Single Line Diagrams


NPC
53.484 kA
7 (X/R)
56.432 kA
7 (X/R)
TX NPC
2.5 MVA
12.47 - 0.48 kV
5.31%
TX NPC L
0.48 kV
C MDA
1-1/C-500 MCM
CU, 25', [Conduit]
MDA
0.48 kV
B MDA
GE TP40
4000A
C MSA
1-1/C-500 MCM
CU, 10', [Conduit]
MSA
0.48 kV
B T4LDPA
GE SKL8
800A
3-1/C-500 MCM
CU, 15', [Conduit]
C T4LDPA
T4LDPA
500 kVA
0.48 - 0.208 kV
5%
B T4LDPB
GE SGL4
350A
C T4LDPB
1-1/C-500 MCM
CU, 15', [Conduit]
T4LDPB
225 kVA
0.48 - 0.208 kV
5%
1-1/C-500 MCM
CU, 15', [Conduit]
C 4LDPB
2-1/C-500 MCM
CU, 10', [Conduit]
B 4LDPB-MAIN
GE SKH8
800A
0.208 kV
B 4HA1A
GE SGL4
400A
C 4HA1A
1-1/C-500 MCM
CU, 20', [Conduit]
4HA1A
0.48 kV
B 4HA1A-FDR
GE THED (277V)
20A
B T4DP1
GE SEL
100A
C T4DP1
1-1/C-1 AWG
CU, 15', [Conduit]
T4DP1
75 kVA
0.48 - 0.208 kV
5%
C 4DP1
1-1/C-4 AWG
CU, 10', [Conduit]
4DP1
0.208 kV
B 4HA1B
GE SGL4
400A
C 4HA1B
1-1/C-500 MCM
CU, 20', [Conduit]
4HA1B
0.48 kV
B 4HA1B-FDR
GE SEL
20A
B 4HA1C
GE SFL
225A
C 4HA1C
1-1/C-4/0 AWG
CU, 20', [Conduit]
4HA1C
0.48 kV
B 4HA1C-FDR
GE SEL
15A
B 4HA1D
GE SFL
225A
C 4HA1D
1-1/C-4/0 AWG
CU, 20', [Conduit]
4HA1D
0.48 kV
B 4HA1D-FDR
GE SEL
15A
B 3HDPA
GE SS-16
1600A
C 3HDPA
5-1/C-500 MCM
CU, 350', [Conduit]
B 3HDPA-MAIN
GE SS-16
1600A
3HDPA
0.48 kV
B 3HA1A
GE SFL
225A
C 3HA1A
1-1/C-4/0 AWG
CU, 15', [Conduit]
3HA1A
0.48 kV
B T3DP2
GE SEL
125A
C T3DP2
1-1/C-350 MCM
CU, 170', [Conduit]
T3DP2
75 kVA
0.48 - 0.208 kV
5%
C 3DP2
1-1/C-350 MCM
CU, 10', [Conduit]
3DP2
0.208 kV
B 3HA1A-FDR
GE THED (277V)
20A
B T3DP1
GE SEL
125A
C T3DP1
1-1/C-350 MCM
CU, 70', [Conduit]
T3DP1
75 kVA
0.48 - 0.208 kV
5%
C 3DP1
1-1/C-350 MCM
CU, 10', [Conduit]
3DP1
0.208 kV
B 3HA1B
GE SGL4
400A
C 3HA1B
1-1/C-500 MCM
CU, 15', [Conduit]
3HA1B
0.48 kV
B 3HA1B-FDR
GE SEL
15A
B 8HA2A
GE SGL4
400A
C 8HA2A
1-1/C-500 MCM
CU, 50', [Conduit]
8HA2A
0.48 kV
B 8HA2A-FDR
GE SEL
20A
B 8HA2B
GE SFL
225A
C 8HA2B
1-1/C-4/0 AWG
CU, 50', [Conduit]
8HA2B
0.48 kV
B 8HA2B-FDR
GE SEL
15A
B T8LDPA
GE SFL
175A
C T8LDPA
1-1/C-2/0 AWG
CU, 50', [Conduit]
T8LDPA
112.5 kVA
0.48 - 0.208 kV
5%
C 8LDPA
1-1/C-500 MCM
CU, 15', [Conduit]
B 8LDPA-MAIN
GE SGD
400A
0.208 kV
8LDPA
B 8LAC2A
GE THQD
225A
C 8LAC2A
1-1/C-4/0 AWG
CU, 15', [Conduit]
8LAC2A
0.208 kV
B 8LAC2A-FDR
GE THQB
20A
B 8LAC2B
GE THQD
225A
C 8LAC2B
1-1/C-4/0 AWG
CU, 20', [Conduit]
8LAC2B
0.208 kV
B 8LAC2B-FDR
GE THQB
20A
B 8LA2A
GE THQD
225A
C 8LA2A
1-1/C-4/0 AWG
CU, 25', [Conduit]
8LA2A
0.208 kV
B 8LA2A-FDR
GE THQB
20A
B T8LDPB
GE SFL
175A
C T8LDPB
1-1/C-500 MCM
CU, 140', [Conduit]
T3LDPB
225 kVA
0.48 - 0.208 kV
5%
T3LDPB Z(imp) changed from 4.59% to 5.0% per PowerSmiths' Resubmittal
C 3LDPB
2-1/C-500 MCM
CU, 10', [Conduit]
B 3LDPB-MAIN
GE SKH8
800A
0.208 kV
1-1/C-2/0 AWG
CU, 175', [Conduit]
T8LDPB
112.5 kVA
0.48 - 0.208 kV
5%
C 8LDPB
1-1/C-500 MCM
CU, 15', [Conduit]
B 8LDPB-MAIN
GE SGD
400A
0.208 kV
3LDPB
B 3LDPB-FDR
GE TEY
100A
B 3LBC1A
GE SFH
225A
C 3LBC1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LBC1A
0.208 kV
B 3LBC1A-FDR
GE THQB
C-1
BUS-1
1-1/C-12 AWG
CU, 10', [Conduit]
0.208 kV
B 3LBC1B
GE SFH
225A
C 3LBC1B
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LBC1B
0.208 kV
B 3LBC1B-FDR
GE THQB
B 3LBC1C
GE SFH
225A
C 3LBC1C
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LBC1C
0.208 kV
B 3LBC1C-FDR
GE THQB
B 3LB1A
GE SFH
225A
C 3LB1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LB1A
0.208 kV
B 3LB1A-FDR
GE THQB
B T3LDPA
GE SFL
175A
C T3LDPA
1-1/C-6 AWG
CU, 40', [Conduit]
M ELEV 360
40 HP
Induction
16.7%
B ELEV
GE SEL
60A
C ELEV
1-1/C-4 AWG
CU, 100', [Conduit]
M CA
25 HP
Induction
16.7%
B CA
GE SEL
70A
C CA
1-1/C-4 AWG
CU, 100', [Conduit]
B 3HAIC
GE SFL
225A
C 3HAIC
1-1/C-4/0 AWG
CU, 20', [Conduit]
3HAIC
0.48 kV
B 3HAIC-FDR
GE SEL
15A
B 3HAID
GE SFL
225A
C 3HAID
1-1/C-4/0 AWG
CU, 20', [Conduit]
3HAID
0.48 kV
B 3HAID-FDR
GE SEL
15A
1-1/C-2/0 AWG
CU, 10', [Conduit]
T3LDPA
112.5 kVA
0.48 - 0.208 kV
5%
C 3LDPA
1-1/C-500 MCM
CU, 10', [Conduit]
B 3LDPA-MAIN
GE SGD
400A
0.208 kV
3LDPA
B 3LDPA-FDR
GE TEY
100A
B 3LAC1A
GE THQD
225A
C 3LAC1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LAC1A
0.208 kV
B 3LAC1A-FDR
GE THQB
20A
B 3LAC1B
GE THQD
225A
C 3LAC1B
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LAC1B
0.208 kV
B 3LAC1B-FDR
GE THQB
20A
B 3LA1A
GE THQD
225A
C 3LA1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
3LA1A
0.208 kV
B 3LA1A-FDR
GE THQB
20A
5-1/C-500 MCM
CU, 10', [Conduit]
B 4LDPA-MAIN
GE SS-16
1600A
4LDPA
0.208 kV
B 4LBC1A
GE THQD
225A
C 4LBC1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
4LBC1A
0.208 kV
B 4LBC1A-FDR
GE THHQB
20A
B 4LBIA
GE THQD
225A
C 4LBIA
1-1/C-4/0 AWG
CU, 10', [Conduit]
4LBIA
0.208 kV
B 4LBIA-FDR
GE THHQB
20A
B 4LBIB
GE THQD
225A
C 4LBIB
1-1/C-4/0 AWG
CU, 85', [Conduit]
B 4LBIB-MAIN
GE THQD
225A
4LBIB
0.208 kV
B 4LBIB-FDR
GE THHQB
20A
B 4LBIC
GE THQD
225A
C 4LBIC
1-1/C-4/0 AWG
CU, 10', [Conduit]
4LBIC
0.208 kV
B 4LBIC-FDR
GE THHQB
20A
B 4LAIKA
GE SFH
225A
C 4LAIKA
1-1/C-4/0 AWG
CU, 85', [Conduit]
4LAIKA
0.208 kV
B 4LAIKA-FDR
GE THHQB
15A
B 4LAIKB
GE SFH
225A
C 4LAIKB
1-1/C-4/0 AWG
CU, 85', [Conduit]
4LAIKB
0.208 kV
B 4LAIKB-FDR
GE THHQB
15A
B 4LAIKC
GE SFH
225A
C 4LAIKC
1-1/C-4/0 AWG
CU, 85', [Conduit]
4LAIKC
0.208 kV
B 4LAIKC-FDR
GE THHQB
20A
B 4LAIKD
GE SFH
225A
C 4LAIKD
1-1/C-4/0 AWG
CU, 85', [Conduit]
4LAIKD
0.208 kV
B 4LAIKD-FDR
GE THHQB
20A
B 4LAIKE
GE TEY
100A
C 4LAIKE
1-1/C-2 AWG
CU, 210', [Conduit]
4LAIKE
0.208 kV
B 4LAIKE-FDR
GE THHQB
20A
B 4LAIKF
GE TEY
100A
C 4LAIKF
1-1/C-2 AWG
CU, 190', [Conduit]
4LAIKF
0.208 kV
B 4LAIKF-FDR
GE THHQB
20A
B BH
GE SFH
125A
C BH
1-1/C-1 AWG
CU, 75', [Conduit]
M BH
30 HP
Induction
16.7%
B 8LBC2A
GE THQD
225A
C 8LBC2A
1-1/C-4/0 AWG
CU, 15', [Conduit]
8LBC2A
0.208 kV
B 8LBC2A-FDR
GE THQB
20A
B 8LBC2B
GE THQD
225A
C 8LBC2B
1-1/C-4/0 AWG
CU, 20', [Conduit]
8LBC2B
0.208 kV
B 8LBC2B-FDR
GE THQB
20A
B 8LB2A
GE THQD
225A
C 8LB2A
1-1/C-4/0 AWG
CU, 25', [Conduit]
8LB2A
0.208 kV
B 8LB2A-FDR
GE THQB
20A
8LDPB
B 8LDPB-FDR
GE TEY
100A
Clark County School District - Career & Tech Center
Single Line Model E Sh. 5.01 BASE
PQTSi - Resubmittal 1-18-06
Printed by EasyPower




Clark County School District - Career & Tech Center
Single Line Model E Sh. 5.01 Fault Current PHASE
PQTSi - Resubmittal 1-18-06

Printed by EasyPower




Clark County School District - Career & Tech Center
Single Line Model E Sh. 5.01 Fault Current GROUND
PQTSi - Resubmittal 1-18-06

Printed by EasyPower

NPC
53.484 kA
7 (X/R)
56.432 kA
7 (X/R)
TX NPC
2.5 MVA
12.47 - 0.48 kV
5.31%
TX NPC L
0.48 kV
C MDB
1-1/C-500 MCM
CU, 105', [Conduit]
MDB
0.48 kV
B MDB
GE TP40
4000A
C MSB
1-1/C-500 MCM
CU, 105', [Conduit]
GEN EGH1
0.125 MVA
8.8%
14.7%
1%
EGH1
0.48 kV
B EGH1-ATS EH2A
C EGH1-ATS EH2A
1-1/C-3/0 AWG
CU, 50', [Conduit]
MSB
B MSB-ATS EH2A
GE SFL
200A
C MSB-ATS EH2A
1-1/C-3/0 AWG
CU, 25', [Conduit]
ATS EH2A1
C 2EHDP
1-1/C-3 AWG
CU, 50', [Conduit]
B 2EHDP-MAIN
GE SFL
200A
2EHDP
0.48 kV
B 6HDPA
GE SKL12
1000A
4-1/C-250 MCM
CU, 115', [Conduit]
C 6HDPA
6HDPA
0.48 kV
B 6HAIA
GE SFL
225A
C 6HAIA
1-1/C-4/0 AWG
CU, 10', [Conduit]
6HAIA
0.48 kV
B 6HAIA-FDR
GE THED (277V)
20A
B 6HAIB
GE SFL
225A
C 6HAIB
1-1/C-4/0 AWG
CU, 10', [Conduit]
6HAIB
0.48 kV
B 6HAIB-FDR
GE THED (277V)
15A
B 6HAIC
GE SFL
225A
C 6HAIC
1-1/C-4/0 AWG
CU, 10', [Conduit]
6HAIC
0.48 kV
B 6HAIC-FDR
GE THED (277V)
20A
B TX T6LA1A
GE SEL
125A
C TX T6LA1A
1-1/C-3 AWG
CU, 15', [Conduit]
TX T6LA1A
75 kVA
0.48 - 0.208 kV
5%
C 6LA1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
6LA1A
0.208 kV
B 6LA1A -MAIN
GE TQD
225A
B 6LA1A-FDR
GE THQB
20A
B TX T6LAC1A
GE SEL
125A
C TX T6LAC1A
1-1/C-3 AWG
CU, 15', [Conduit]
TX T6LAC1A
75 kVA
0.48 - 0.208 kV
5%
C 6LAC1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
6LAC1A
0.208 kV
B 6LACTA-MAIN
GE TQD
225A
B 6LACTA-FDR
GE THQB
20A
B 1HDPA
GE SKL8
800A
C 1HDPA
2-1/C-500 MCM
CU, 85', [Conduit]
1HDPA
0.48 kV
B 1HDPA-MAIN
GE SKL08
800A
B 1HAIA
GE SFH
225A
C 1HAIA
1-1/C-4/0 AWG
CU, 10', [Conduit]
1HAIA
0.48 kV
B 1HAIA-FDR
GE THED (277V)
20A
B 1HAIB
GE SFH
225A
C 1HAIB
1-1/C-4/0 AWG
CU, 10', [Conduit]
1HAIB
0.48 kV
B 1HAIB-FDR
GE SEL
15A
B 1HAIC
GE SFH
225A
C 1HAIC
1-1/C-4/0 AWG
CU, 10', [Conduit]
1HAIC
0.48 kV
B 1HAIC-FDR
GE THED (277V)
15A
B ELEV 160
GE SEL
70A
C ELEV 160
1-1/C-4 AWG
CU, 80', [Conduit]
M ELEV 160
40 HP
Induction
16.7%
B TX T1LDPA
GE SFH
175A
C TX T1LDPA
1-1/C-0 AWG
CU, 15', [Conduit]
TX T1LDPA
112.5 kVA
0.48 - 0.208 kV
5%
C 1LDPA
4-1/C-500 MCM
CU, 105', [Conduit]
B 1LDPA-MAIN
GE SGD
400A
1LDPA
0.208 kV
B 1LAC1A
GE TQD
225A
C 1LAC1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
1LAC1A
0.208 kV
B 1LACTA-FDR
GE THQB
20A
B 1LAC2A
GE TQD
225A
C 1LAC2A
1-1/C-4/0 AWG
CU, 10', [Conduit]
1LAC2A
0.208 kV
B 1LA1A
GE TQD
225A
C 1LA1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
1LA1A
0.208 kV
B 1LA1A-FDR
GE THQB
20A
B 1LA2A
GE TQD
225A
C 1LA2A
1-1/C-4/0 AWG
CU, 10', [Conduit]
1LA2A
0.208 kV
B 1LDPA-FDR
GE TEB
100A
B 2HDPA
GE SKL12
1000A
4-1/C-350 MCM
CU, 130', [Conduit]
C 2HDPA
2HDPA
0.48 kV
B 2HDPA-MAIN
GE SKL12
1000A
B 2HAIA
GE SFL
225A
C 2HAIA
1-1/C-4/0 AWG
CU, 20', [Conduit]
2HAIA
0.48 kV
B 2HAIA-FDR
GE THED (277V)
20A
B 2HAIB
GE SGL4
400A
C 2HAIB
2-1/C-4/0 AWG
CU, 10', [Conduit]
2HAIB
0.48 kV
B 2HAIB-FDR
GE SEL
15A
B 2HAIC
GE SFL
225A
C 2HAIC
1-1/C-4/0 AWG
CU, 15', [Conduit]
2HAIC
0.48 kV
B 2HAIC-FDR
GE SEL
15A
B 2HS1
GE SFL
225A
C 2HS1
1-1/C-4/0 AWG
CU, 10', [Conduit]
2HS1
0.48 kV
B 2HS1-FDR
GE THED (277V)
20A
B 2HS2
GE SFL
225A
C 2HS2
1-1/C-4/0 AWG
CU, 15', [Conduit]
2HS2
0.48 kV
B 2HS2-FDR
GE THED (277V)
20A
B TX T2LDPA
GE SGL4
350A
C TX T2LDPA
1-1/C-500 MCM
CU, 10', [Conduit]
TX T2LDPA
225 kVA
0.48 - 0.208 kV
5%
C 2LDPA
2-1/C-500 MCM
CU, 10', [Conduit]
B 2LDPA-MAIN
GE SKH8
800A
2LDPA
0.208 kV
B 2LDPA-FDR
GE THQD
150A
B 2LAC1A
GE THQD
225A
C 2LAC1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
2LAC1A
0.208 kV
B 2LACTA-FDR
GE THHQB
20A
B 2LA1A
GE THQD
225A
C 2LA1A
1-1/C-4/0 AWG
CU, 10', [Conduit]
2LA1A
0.208 kV
B 2LA1A-FDR
GE THHQB
20A
B 2LA1B
GE THQD
225A
C 2LA1B
1-1/C-4/0 AWG
CU, 10', [Conduit]
2LA1B
0.208 kV
B 2LA1B-FDR
GE THHQB
20A
B 2LA1KA
GE THQD
225A
C 2LA1KA
1-1/C-4/0 AWG
CU, 10', [Conduit]
2LA1KA
0.208 kV
B 2LA1KA-FDR
GE THQB
20A
B 2LA1KB
GE THQD
225A
C 2LA1KB
1-1/C-4/0 AWG
CU, 10', [Conduit]
2LA1KB
0.208 kV
B 2LA1KB-FDR
GE THQB
20A
B 2LA1KC
GE THQD
225A
C 2LA1KC
1-1/C-4/0 AWG
CU, 10', [Conduit]
2LA1KC
0.208 kV
KC 2LA1KC-FDR
GE THQB
20A
B MCCA
GE SGL4
400A
C MCCA
2-1/C-600 MCM
CU, 50', [Conduit]
MCCA
0.480 kV
Confirm this breaker
Confirm this breaker
B 2EHDP-MAIN
GE SFL
200A
2EHDP
0.48 kV
B 2EH1
GE SEL
60A
C 2EH1
1-1/C-6 AWG
CU, 10', [Conduit]
B 2EH1-MAIN
GE SEL
100A
2EH1
0.48 kV
B 2EL1
GE SEL
30A
B 2EH1-FDR
GE THHD (277V)
20A
C 2EL1
1-1/C-10 AWG
CU, 10', [Conduit]
B 2EL1- HI MAIN
GE TED (600V)
40A
TX 2EL1
15 kVA
0.48 - 0.208 kV
2.75%
B 2EL1-MAIN
GE THQL
50A
2EL1
0.208 kV
B 2EL1-FDR
GE THQL
20A
B 1EH1
GE SEL
60A
C 1EH1
1-1/C-2 AWG
CU, 45', [Conduit]
B 1EH1-MAIN
GE TEY
100A
1EH1
0.48 kV
B 1EL1
GE TEY
30A
B 1EH1-FDR
GE TEY
20A
C 1EL1
1-1/C-10 AWG
CU, 30', [Conduit]
B 1EL1- HI MAIN
GE TED (600V)
40A
TX 1EL1
15 kVA
0.48 - 0.208 kV
2.75%
B 1EL1-MAIN
GE THQL
50A
1EL1
0.208 kV
B 1EL1-FDR
GE THQL
20A
B 3EH1
GE SEL
100A
C 3EH1
1-1/C-2 AWG
CU, 250', [Conduit]
B 3EH1-MAIN
GE TEY
100A
3EH1
0.48 kV
B 3EL1
GE TEY
60A
B 3EH1-FDR
GE TEY
20A
C 3EL1
1-1/C-6 AWG
CU, 30', [Conduit]
B 3EL1- HI MAIN
GE TED (600V)
40A
TX 3EL1
15 kVA
0.48 - 0.208 kV
2.75%
B 3EL1-MAIN
GE THQL
50A
3EL1
0.208 kV
B 3EL1-FDR
GE THQL
20A
B 4EH1
GE SEL
60A
C 4EH1
1-1/C-2 AWG
CU, 360', [Conduit]
B 4EH1-MAIN
GE TEY
100A
4EH1
0.48 kV
B 4EL1
GE TEY
60A
B 4EH1-FDR
GE TEY
20A
C 4EL1
1-1/C-6 AWG
CU, 10', [Conduit]
B 4EL1- HI MAIN
GE TED (600V)
70A
TX 4EL1
22.5 kVA
0.48 - 0.208 kV
2.75%
B 4EL1-MAIN
GE THQL
70A
4EL1
0.208 kV
B 4EL1-FDR
GE THQL
20A
B 5EH1
GE SEL
60A
C 5EH1
1-1/C-2 AWG
CU, 265', [Conduit]
B 5EH1-MAIN
GE TEY
100A
5EH1
0.48 kV
B 5EL1
GE TEY
60A
B 5EH1-FDR
GE TEY
20A
C 5EL1
1-1/C-6 AWG
CU, 30', [Conduit]
B 5EL1- HI MAIN
GE TED (600V)
40A
TX 5EL1
15 kVA
0.48 - 0.208 kV
2.75%
B 5EL1-MAIN
GE THQL
70A
5EL1
0.208 kV
B 5EL1-FDR
GE THQL
20A
B 6EH1
GE SEL
60A
C 6EH1
1-1/C-2 AWG
CU, 160', [Conduit]
B 6EH1-MAIN
GE TEY
100A
6EH1
0.48 kV
B 6EL1
GE TEY
30A
B 6EH1-FDR
GE TEY
20A
C 6EL1
1-1/C-10 AWG
CU, 30', [Conduit]
B 6EL1- HI MAIN
GE TED (600V)
40A
TX 6EL1
15 kVA
0.48 - 0.208 kV
2.75%
B 6EL1-MAIN
GE THQL
70A
6EL1
0.208 kV
B 6EL1-FDR
GE THQL
20A
B UPS 8
GE THQL
100A
C UPS 8
1-1/C-2 AWG
CU, 10', [Conduit]
UPS 8
C UPS8A
1-1/C-2 AWG
CU, 10', [Conduit]
B UPS 8A-MAIN
GE THQB
100A
UPS8A
0.208 kV
B UPS8A-FDR
GE THQB
20A
C UPS3A
1-1/C-2 AWG
CU, 10', [Conduit]
B UPS 3A-MAIN
GE THQB
100A
UPS3A
0.208 kV
B UPS3A-FDR
GE THQB
20A
B UPS 5
GE THQL
100A
C UPS 5
1-1/C-2 AWG
CU, 10', [Conduit]
UPS 5
C UPS5A
1-1/C-2 AWG
CU, 10', [Conduit]
B UPS 5A-MAIN
GE THQB
100A
UPS5A
0.208 kV
B UPS5A-FDR
GE THQB
20A
C UPS9A
1-1/C-2 AWG
CU, 10', [Conduit]
B UPS 9A-MAIN
GE THQB
100A
UPS9A
0.208 kV
B UPS9A-FDR
GE THQB
20A

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MSB - Continued

0.48 kV

B 5HDPA
GE SS-20
2000A

B SPARE
GE SFL
100A

6-1/C-500 MCM
CU, 250', [Conduit]

C 5HDPA

B 5HDPA-MAIN
GE SS-20
2000A

5HDPA

0.48 kV

B 5HA1A
GE SFL
225A

C 5HA1A

1-1/C-4/0 AWG
CU, 20', [Conduit]

5HA1A

0.48 kV

B 5HA1A-FDR
GE THED (277V)
20A

B 5HA1B
GE SGL4
300A

C 5HA1B

1-1/C-350 MCM
CU, 20', [Conduit]

5HA1B

0.48 kV

B 5HA1B-FDR
GE THED (277V)
15A

B 9HA2A
GE SGL4
300A

C 9HA2A

1-1/C-350 MCM
CU, 30', [Conduit]

9HA2A

0.48 kV

B 9HA2A-FDR
GE THED (277V)
15A

B 9HA2B
GE SFL
225A

C 9HA2B

1-1/C-4/0 AWG
CU, 35', [Conduit]

9HA2B

0.48 kV

B 9HA2B-FDR
GE THED (277V)
15A

B TX T9LDPB
GE SFL
225A

C TX T9LDPB

1-1/C-4/0 AWG
CU, 160', [Conduit]

TX T9LDPB
150 kVA
0.48 - 0.208 kV
5%

C 9LDPB

2-1/C-2/0 MCM
CU, 15', [Conduit]

B 9LDPB-MAIN
GE SGH6
500A

0.208 kV

9LDPB

B 9LBC2A
GE THQD
225A

C 9LBC2A

1-1/C-4/0 AWG
CU, 15', [Conduit]

9LBC2A

0.208 kV

B 9LBC2A-FDR
GE THQB
20A

B 9LBC2B
GE THQD
225A

C 9LBC2B

1-1/C-4/0 AWG
CU, 15', [Conduit]

9LBC2B

0.208 kV

B 9LR2A
GE THQD
225A

C 9LB2A

1-1/C-4/0 AWG
CU, 15', [Conduit]

9LB2A

0.208 kV

B 9LB2A-FDR
GE THQB
20A

B 9LDPB
GE THQD
150A

B TX T9LDPA
GE SFL
175A

C TX T9LDPA

1-1/C-2/0 AWG
CU, 50', [Conduit]

TX T9LDPA
112.5 kVA
0.48 - 0.208 kV
5%

C 9LDPA

B TX T5LDPB
GE SGL4
350A

C TX T5LDPB

1-1/C-500 MCM
CU, 165', [Conduit]

TX T5LDPB
225 kVA
0.48 - 0.208 kV
5%

T5LDPB Z(imp) changed from 4.59% to 5.0% per PowerSmiths' Resubmittal

C 5LDPB

2-1/C-500 MCM
CU, 10', [Conduit]

B 5LDPB-MAIN
GE SKH8
800A

5LDPB

0.208 kV

B 5LBC1A
GE THQD
225A

C 5LBC1A

1-1/C-4/0 AWG
CU, 20', [Conduit]

5LBC1A

0.208 kV

B 5LBC1A-FDR
GE THQB
20A

B 5LBC1B
GE THQD
225A

C 5LBC1B

1-1/C-4/0 AWG
CU, 20', [Conduit]

5LBC1B

0.208 kV

B 5LBC1B-FDR
GE THQB
20A

B 5LB1A
GE THQD
225A

C 5LB1A

1-1/C-4/0 AWG
CU, 20', [Conduit]

5LB1A

0.208 kV

B 5LB1A-FDR
GE THQB
20A

B 5LB1B
GE THQD
225A

C 5LB1B

1-1/C-4/0 AWG
CU, 40', [Conduit]

5LB1B

0.208 kV

B 5LB1B-FDR
GE THQB
20A

B 5LB1C
GE THQD
225A

C 5LB1C

1-1/C-4/0 AWG
CU, 140', [Conduit]

B LB1C MAIN
GE TQD
225A

5LB1C

0.208 kV

B 5LB1C-FDR
GE THQB
15A

B TX T5LDPA
GE SFL
175A

C TX T5LDPA

1-1/C-2/0 AWG
CU, 10', [Conduit]

TX T5LDPA
112.5 kVA
0.48 - 0.208 kV
5%

C 5LDPA

1-1/C-500 MCM
CU, 10', [Conduit]

B 5LDPA-MAIN
GE SGD
400A

5LDPA

0.208 kV

B 5LAC1A
GE THQD
225A

C 5LAC1A

1-1/C-4/0 AWG
CU, 20', [Conduit]

5LAC1A

0.208 kV

B 5LAC1A-FDR
GE THQB
20A

B 5LAC1B
GE THQD
225A

C 5LAC1B

1-1/C-4/0 AWG
CU, 20', [Conduit]

5LAC1B

0.208 kV

B 5LAC1B-FDR
GE THQB
20A

B 5LA1A
GE THQD
225A

C 5LA1A

1-1/C-4/0 AWG
CU, 25', [Conduit]

5LA1A

0.208 kV

B 5LA1A-FDR
GE THQB
20A

B 5LDPA-FDR
GE TEY
100A

B ELEV 560
GE SEL
60A

C ELEV 560

1-1/C-6 AWG
CU, 35', [Conduit]

M ELEV 560
40 HP
Induction
16.7%

B CA
GE SEL
70A

C CA

1-1/C-4 AWG
CU, 160', [Conduit]

M CA
25 HP
Induction
16.7%

B 5HA1C
GE SGL4
300A

C 5HA1C

1-1/C-350 MCM
CU, 20', [Conduit]

5HA1C

0.48 kV

B 5HA1C-FDR
GE THED (277V)
15A

B 5HA1D
GE SFL
225A

C 5HA1D

1-1/C-4/0 AWG
CU, 20', [Conduit]

5HA1D

0.48 kV

B 5HA1D-FDR
GE THED (277V)
15A

B 5HA1E
GE SFL
225A

C 5HA1E

1-1/C-4/0 AWG
CU, 80', [Conduit]

5HA1E

0.48 kV

B 5HA1E-FDR
GE THED (277V)
20A

1-1/C-500 MCM
CU, 15', [Conduit]

B 9LDPA-MAIN
GE SGD
400A

9LDPA

0.208 kV

B 9LAC2A
GE THQD
225A

C 9LAC2A

1-1/C-4/0 AWG
CU, 10', [Conduit]

9LAC2A

0.208 kV

B 9LAC2A-FDR
GE THQB
20A

B 9LAC2B
GE THQD
225A

C 9LAC2B

1-1/C-4/0 AWG
CU, 15', [Conduit]

9LAC2B

0.208 kV

B 9LAC2B-FDR
GE THQB
20A

B 9LA2A
GE THQD
225A

C 9LA2A

1-1/C-4/0 AWG
CU, 20', [Conduit]

9LA2A

0.208 kV

B 9LA2A-FDR
GE THQB
20A

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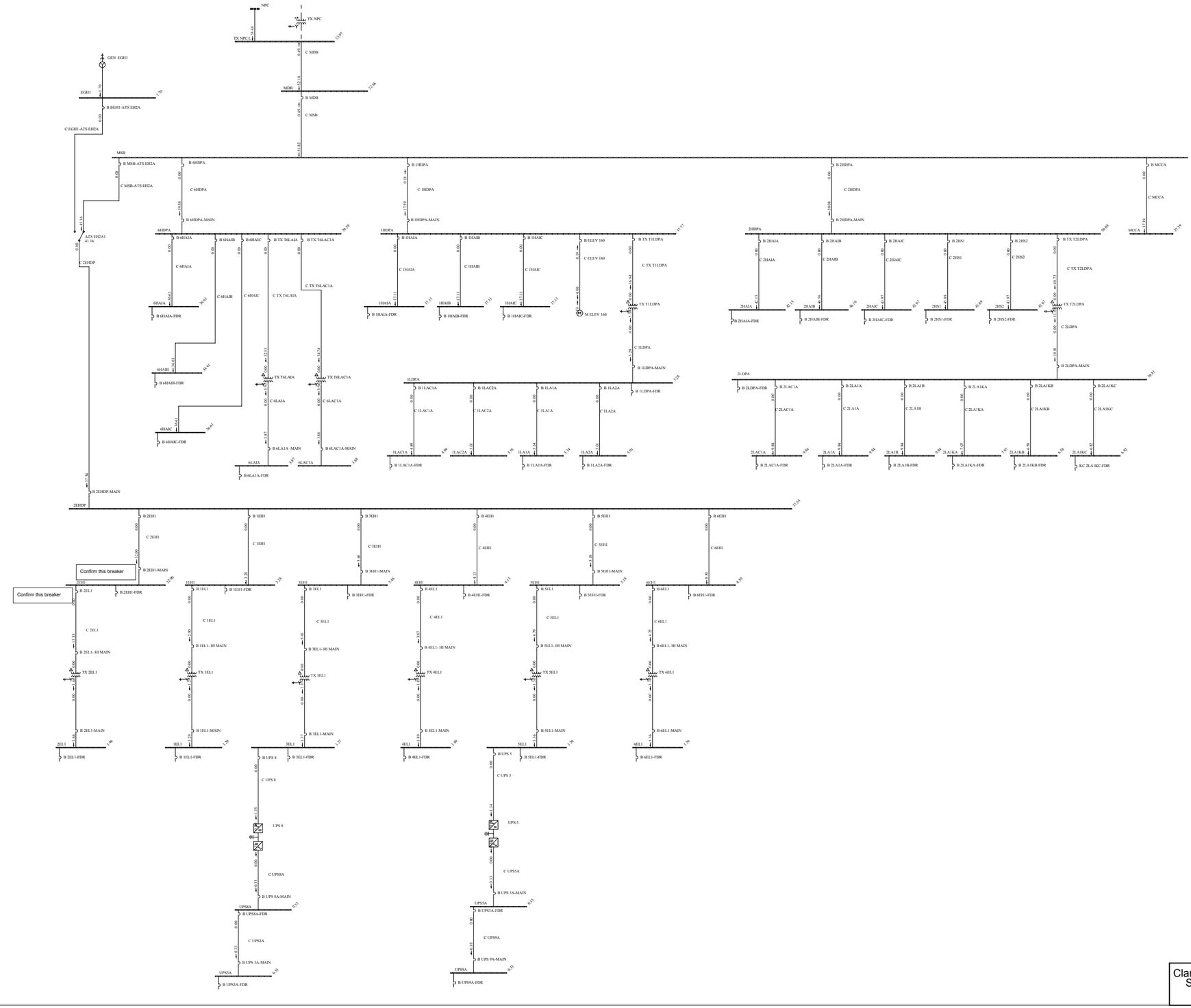


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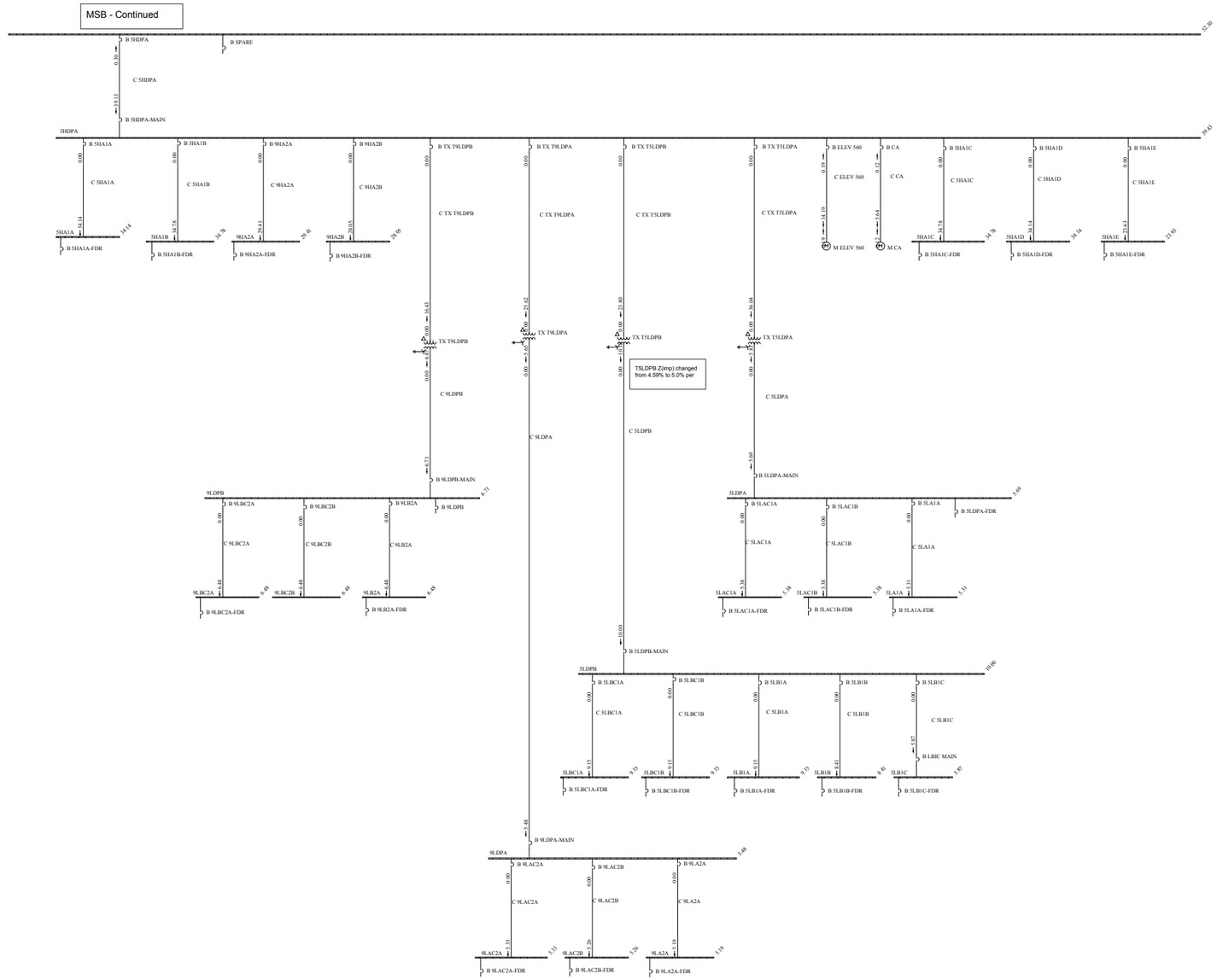
MSB - Continued

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NPC

TX NPC

TX NPC L1 4.43 — 96.79

C MDB 0.34

MDB 13.98 — 5.104

B MDB

C MSB 0.33

52.84

GEN EGH1

EGH1 2.41 — 3.41

B EGH1-ATS EH2A

C EGH1-ATS EH2A 0.00

ATS EH2A1 33.15 0.00 — 13.18

C 2EHDP 0.00

26.37

B 2EHDP-MAIN

2EHDP — 29.27

MSB

B MSB-ATS EH2A 0.00

C MSB-ATS EH2A 0.00

B 6HDPA 0.00

C 6HDPA 21.40

B 6HDPA-MAIN

6HDPA — 11.40

B 6HAIA 0.00 — C 6HAIA — 6HAIA 14.57 — 27.57 — B 6HAIA-FDR

B 6HAIB 0.00 — C 6HAIB — 6HAIB 14.57 — 27.57 — B 6HAIB-FDR

B 6HAIC 0.00 — C 6HAIC — 6HAIC 14.57 — 27.57 — B 6HAIC-FDR

B TX T6LAIA 0.00 — C TX T6LAIA — TX T6LAIA 21.46 — C 6LAIA 0.00 — 6LAIA 4.04 — B 6LA1A -MAIN 4.04 — 6LAIA — 4.04 — B 6LA1A-FDR

B TX T6LAC1A 0.00 — C TX T6LAC1A — TX T6LAC1A 24.98 — C 6LAC1A 0.00 — 6LAC1A 4.05 — B 6LAC1A-MAIN 4.05 — 6LAC1A — 4.05 — B 6LAC1A-FDR

B 1HDPA 0.12

C 1HDPA 10.45

B 1HDPA-MAIN

1HDPA — 10.53

B 1HAIA 0.00 — C 1HAIA — 1HAIA 10.05 — 10.05 — B 1HAIA-FDR

B 1HAIB 0.00 — C 1HAIB — 1HAIB 10.05 — 10.05 — B 1HAIB-FDR

B 1HAIC 0.00 — C 1HAIC — 1HAIC 10.05 — 10.05 — B 1HAIC-FDR

B ELEV 160 0.07 — C ELEV 160 2.01 — M ELEV 160

B TX T1LDPA 0.00 — C TX T1LDPA — TX T1LDPA 0.93 — 0.00 — C 1LDPA 1.06 — B 1LDPA-MAIN

1LDPA — 5.66

B 1LAC1A 0.00 — C 1LAC1A — 1LAC1A 1.82 — 1LAC1A — 1.82 — B 1LAC1A-FDR

B 1LAC2A 0.00 — C 1LAC2A — 1LAC2A 1.07 — 1LAC2A — 1.07 — B 1LAC2A-FDR

B 1LA1A 0.00 — C 1LA1A — 1LA1A 1.13 — 1LA1A — 1.13 — B 1LA1A-FDR

B 1LA2A 0.00 — C 1LA2A — 1LA2A 1.07 — 1LA2A — 1.07 — B 1LA2A-FDR

B 2HDPA 0.00

C 2HDPA 48.63

B 2HDPA-MAIN

2HDPA — 48.63

B 2HAIA 0.00 — C 2HAIA — 2HAIA 4.91 — 4.91 — B 2HAIA-FDR

B 2HAIB 0.00 — C 2HAIB — 2HAIB 4.28 — 4.28 — B 2HAIB-FDR

B 2HAIC 0.00 — C 2HAIC — 2HAIC 17.71 — 17.71 — B 2HAIC-FDR

B 2HS1 0.00 — C 2HS1 — 2HS1 40.90 — 40.90 — B 2HS1-FDR

B 2HS2 0.00 — C 2HS2 — 2HS2 17.71 — 17.71 — B 2HS2-FDR

B TX T2LDPA 0.00 — C TX T2LDPA — TX T2LDPA 13.17 — 0.00 — C 2LDPA 11.53 — B 2LDPA-MAIN

2LDPA — 11.53

B 2LDPA-FDR 0.00 — C 2LAC1A — 2LAC1A 0.47 — 0.47 — B 2LAC1A-FDR

B 2LA1A 0.00 — C 2LA1A — 2LA1A 0.47 — 0.47 — B 2LA1A-FDR

B 2LA1B 0.00 — C 2LA1B — 2LA1B 0.47 — 0.47 — B 2LA1B-FDR

B 2LA1KA 0.00 — C 2LA1KA — 2LA1KA 5.38 — 5.38 — B 2LA1KA-FDR

B 2LA1KB 0.00 — C 2LA1KB — 2LA1KB 5.73 — 5.73 — B 2LA1KB-FDR

B 2LA1KC 0.00 — C 2LA1KC — 2LA1KC 4.90 — 4.90 — KC 2LA1KC-FDR

B MCCA 0.00

C MCCA

MCCA — 29.08 — 29.08

B 2EH1 0.00 — C 2EH1 — 21.64 — B 2EH1-MAIN

Confirm this breaker

2EH1 — 21.64 — B 2EH1-FDR

B 1EH1 0.00 — C 1EH1 — 1EH1 1.06 — 1.46 — B 1EH1-FDR

B 3EH1 0.00 — C 3EH1 — 3EH1 1.80 — 1.80 — B 3EH1-FDR

B 4EH1 0.00 — C 4EH1 — 4EH1 2.30 — 2.30 — B 4EH1-FDR

B 5EH1 0.00 — C 5EH1 — 5EH1 2.63 — 2.55 — B 5EH1-MAIN

B 6EH1 0.00 — C 6EH1 — 6EH1 4.43 — 4.43 — B 6EH1-FDR

Confirm this breaker

B 2EL1 0.00 — C 2EL1 — 2EL1 1.25 — B 2EL1- HI MAIN

TX 2EL1 0.00 — 0.00 — B 2EL1-MAIN

2EL1 — 1.53 — B 2EL1-FDR

B 1EL1 0.00 — C 1EL1 — 1EL1 1.67 — B 1EL1- HI MAIN

TX 1EL1 0.00 — 0.00 — B 1EL1-MAIN

1EL1 — 1.42 — B 1EL1-FDR

B 3EL1 0.00 — C 3EL1 — 3EL1 1.67 — B 3EL1- HI MAIN

TX 3EL1 0.00 — 0.00 — B 3EL1-MAIN

3EL1 — 1.49 — B 3EL1-FDR

B 4EL1 0.00 — C 4EL1 — 4EL1 1.67 — B 4EL1- HI MAIN

TX 4EL1 0.00 — 0.00 — B 4EL1-MAIN

4EL1 — 2.09 — B 4EL1-FDR

B 5EL1 0.00 — C 5EL1 — 5EL1 1.44 — B 5EL1- HI MAIN

TX 5EL1 0.00 — 0.00 — B 5EL1-MAIN

5EL1 — 1.48 — B 5EL1-FDR

B 6EL1 0.00 — C 6EL1 — 6EL1 2.14 — B 6EL1- HI MAIN

TX 6EL1 0.00 — 0.00 — B 6EL1-MAIN

6EL1 — 1.48 — B 6EL1-FDR

B UPS 8 0.00 — C UPS 8 — UPS 8 1.44 — 0.00 — C UPS8A 0.33 — B UPS 8A-MAIN

UPS8A — 0.33 — B UPS8A-FDR

0.00 — C UPS3A 0.33 — B UPS 3A-MAIN

UPS3A — 0.33 — B UPS3A-FDR

B UPS 5 0.00 — C UPS 5 — UPS 5 1.43 — 0.00 — C UPS5A 0.33 — B UPS 5A-MAIN

UPS5A — 0.33 — B UPS5A-FDR

0.00 — C UPS9A 0.33 — B UPS 9A-MAIN

UPS9A — 0.33 — B UPS9A-FDR

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Single Line Model E Sh. 5.02 (a) GROUND Fault
PQTSi - January 19, 2006 Resubmittal

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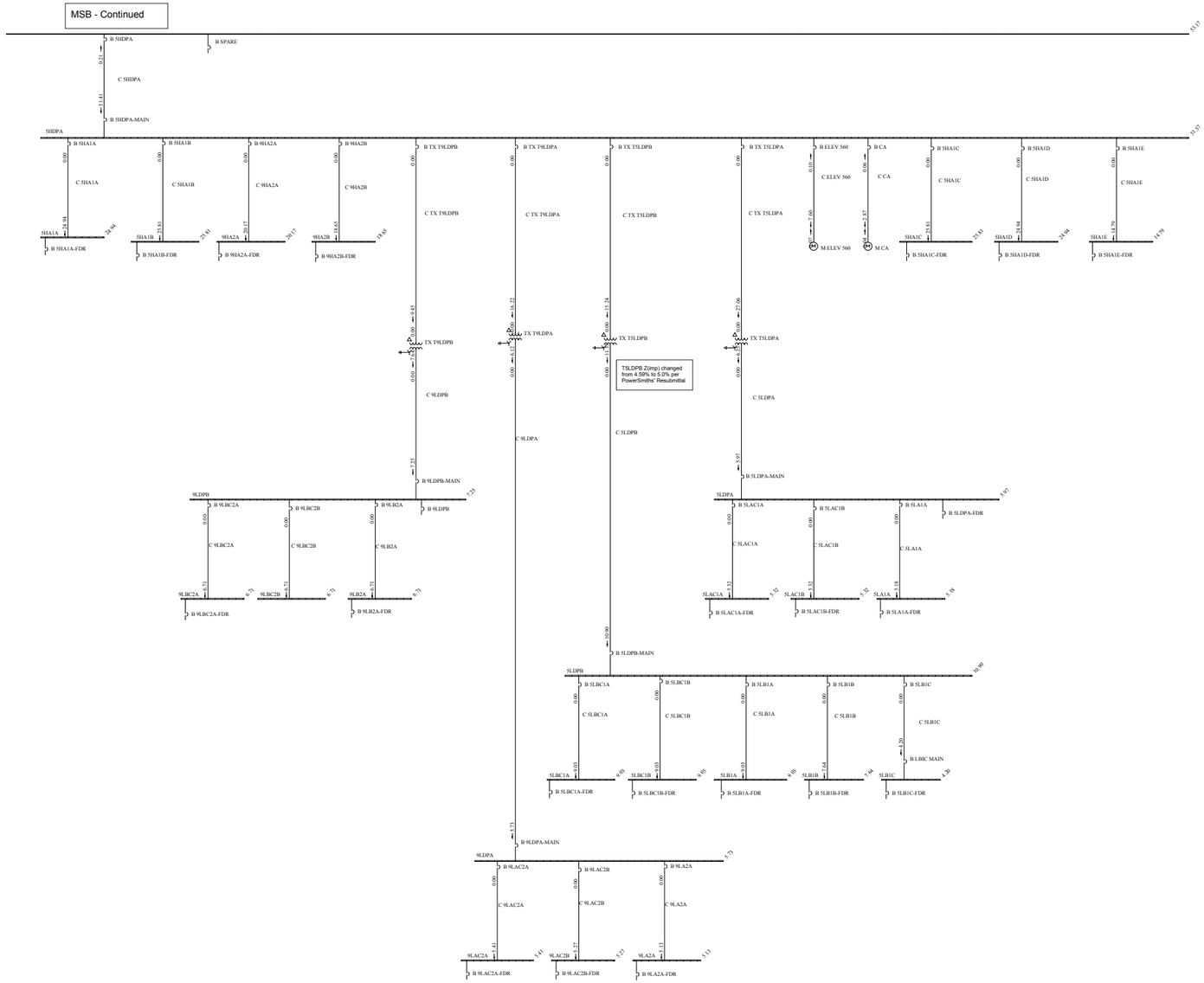
MSB - Continued

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