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ETAP
12.6.0H

Study Case: ULF

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Unbalanced Load Flow Report

| Bus | | Phase | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|-------|---------|--------|------------|-------|------|------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| * Bus1 | 33.000 | A | 99.999 | 0.0 | 1.071 | 0.452 | 0 | 0 | Bus2 | A | 1.071 | 0.452 | 61.0 | 92.1 | |
| | | B | 99.986 | -120.0 | 1.038 | 0.474 | 0 | 0 | | B | 1.038 | 0.474 | 59.9 | 90.9 | |
| | | C | 100.016 | 120.0 | 1.035 | 0.435 | 0 | 0 | | C | 1.035 | 0.435 | 58.9 | 92.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus2 | 33.000 | A | 99.992 | 0.0 | 0 | 0 | 0 | 0 | Bus3 | A | 0.371 | 0.167 | 21.3 | 91.1 | |
| | | B | 99.979 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.354 | 0.178 | 20.8 | 89.3 | |
| | | C | 100.009 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.353 | 0.159 | 20.3 | 91.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus21 | A | 0.700 | 0.285 | 39.7 | 92.6 | |
| | | | | | | | | | | B | 0.683 | 0.296 | 39.1 | 91.8 | |
| | | | | | | | | | | C | 0.682 | 0.276 | 38.6 | 92.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus1 | A | -1.071 | -0.452 | 61.0 | 92.1 | |
| | | | | | | | | | | B | -1.037 | -0.474 | 59.9 | 90.9 | |
| | | | | | | | | | | C | -1.035 | -0.435 | 58.9 | 92.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus3 | 33.000 | A | 99.989 | 0.0 | 0 | 0 | 0 | 0 | Bus2 | A | -0.371 | -0.167 | 21.3 | 91.1 | |
| | | B | 99.976 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.354 | -0.178 | 20.8 | 89.3 | |
| | | C | 100.006 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.353 | -0.159 | 20.3 | 91.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus4 | A | 0.371 | 0.167 | 21.3 | 91.1 | |
| | | | | | | | | | | B | 0.354 | 0.178 | 20.8 | 89.3 | |
| | | | | | | | | | | C | 0.353 | 0.159 | 20.3 | 91.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus4 | 33.000 | A | 99.982 | 0.0 | 0 | 0 | 0 | 0 | Bus3 | A | -0.370 | -0.167 | 21.3 | 91.1 | |
| | | B | 99.969 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.354 | -0.178 | 20.8 | 89.3 | |
| | | C | 99.999 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.353 | -0.159 | 20.3 | 91.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus6 | A | 0.354 | 0.160 | 20.4 | 91.1 | |
| | | | | | | | | | | B | 0.342 | 0.169 | 20.0 | 89.7 | |
| | | | | | | | | | | C | 0.341 | 0.154 | 19.6 | 91.1 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus5 | A | 0.017 | 0.007 | 0.9 | 92.4 | |
| | | | | | | | | | | B | 0.012 | 0.010 | 0.8 | 78.7 | |
| | | | | | | | | | | C | 0.012 | 0.005 | 0.7 | 93.3 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|------|--------|-------|---------|--------|------------|------|-------|-------|-----------|--------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus5 | 0.400 | A | 99.169 | 29.6 | 0 | 0 | 0.018 | 0.009 | Bus4 | A | -0.018 | -0.009 | 87.0 | 90.0 | |
| | | B | 99.581 | -90.2 | 0 | 0 | 0.009 | 0.004 | | B | -0.009 | -0.004 | 43.4 | 90.0 | |
| | | C | 99.399 | 149.7 | 0 | 0 | 0.013 | 0.007 | | C | -0.013 | -0.007 | 65.2 | 90.0 | |
| | | | | | | | | | | N | | | 37.8 | | |
| Bus6 | 33.000 | A | 99.969 | 0.0 | 0 | 0 | 0 | 0 | Bus4 | A | -0.354 | -0.160 | 20.4 | 91.1 | |
| | | B | 99.956 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.342 | -0.169 | 20.0 | 89.7 | |
| | | C | 99.987 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.341 | -0.154 | 19.6 | 91.1 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus7 | A | 0.354 | 0.160 | 20.4 | 91.1 | |
| | | | | | | | | B | | 0.342 | 0.169 | 20.0 | 89.7 | | |
| | | | | | | | | C | | 0.341 | 0.154 | 19.6 | 91.1 | | |
| | | | | | | | | N | | | | 0.0 | | | |
| Bus7 | 33.000 | A | 99.940 | 0.0 | 0 | 0 | 0 | 0 | Bus9 | A | 0.307 | 0.132 | 17.5 | 91.8 | |
| | | B | 99.928 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.306 | 0.141 | 17.7 | 90.8 | |
| | | C | 99.959 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.299 | 0.136 | 17.3 | 91.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus6 | A | -0.354 | -0.160 | 20.4 | 91.1 | |
| | | | | | | | | B | | -0.342 | -0.169 | 20.0 | 89.7 | | |
| | | | | | | | | C | | -0.341 | -0.154 | 19.6 | 91.1 | | |
| | | | | | | | | N | | | | 0.0 | | | |
| | | | | | | | | Bus8 | A | 0.047 | 0.028 | 2.9 | 85.8 | | |
| | | | | | | | B | | 0.035 | 0.028 | 2.4 | 78.9 | | | |
| | | | | | | | C | | 0.042 | 0.018 | 2.4 | 92.0 | | | |
| | | | | | | | N | | | | 0.0 | | | | |
| Bus8 | 0.400 | A | 99.263 | 29.6 | 0 | 0 | 0.037 | 0.025 | Bus7 | A | -0.037 | -0.025 | 195.7 | 82.7 | |
| | | B | 99.301 | -90.3 | 0 | 0 | 0.033 | 0.025 | | B | -0.033 | -0.025 | 181.3 | 80.0 | |
| | | C | 99.371 | 149.4 | 0 | 0 | 0.053 | 0.019 | | C | -0.053 | -0.019 | 244.7 | 94.1 | |
| | | | | | | | | | | N | | | 76.1 | | |
| Bus9 | 33.000 | A | 99.938 | 0.0 | 0 | 0 | 0 | 0 | Bus7 | A | -0.307 | -0.132 | 17.5 | 91.8 | |
| | | B | 99.925 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.306 | -0.141 | 17.7 | 90.8 | |
| | | C | 99.957 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.299 | -0.136 | 17.3 | 91.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus10 | A | 0.070 | 0.042 | 4.3 | 85.7 | |
| | | | | | | | | B | | 0.060 | 0.030 | 3.5 | 89.3 | | |
| | | | | | | | | C | | 0.075 | 0.027 | 4.2 | 94.2 | | |
| | | | | | | | | N | | | | 0.0 | | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|--------|---------|--------|------------|------|------|-------|-----------|--------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus10 | 33.000 | A | 99.933 | 0.0 | 0 | 0 | 0 | 0 | Bus145 | A | 0.237 | 0.090 | 13.3 | 93.5 | |
| | | | | | | | | | B | 0.247 | 0.111 | 14.2 | 91.2 | | |
| | | | | | | | | | C | 0.224 | 0.109 | 13.1 | 89.8 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | B | 99.922 | -120.0 | 0 | 0 | 0 | 0 | Bus11 | A | 0.019 | 0.020 | 1.4 | 69.1 | |
| | | | | | | | | | B | 0.009 | 0.005 | 0.5 | 87.5 | | |
| | | | | | | | | | C | 0.026 | 0.003 | 1.4 | 99.2 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | C | 99.953 | 120.0 | 0 | 0 | 0 | 0 | Bus9 | A | -0.070 | -0.042 | 4.3 | 85.7 | |
| | | | | | | | | | B | -0.060 | -0.030 | 3.5 | 89.3 | | |
| | | | | | | | | | C | -0.075 | -0.027 | 4.2 | 94.2 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | N | | | | | | | Bus13 | A | 0.052 | 0.023 | 3.0 | 91.5 | |
| | | | | | | | | | B | 0.051 | 0.025 | 3.0 | 89.6 | | |
| | | | | | | | | | C | 0.049 | 0.024 | 2.9 | 90.0 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| A | 99.932 | 0.0 | 0 | 0 | 0 | 0 | 0 | Bus10 | A | -0.019 | -0.020 | 1.4 | 69.1 | | |
| | | | | | | | | B | -0.009 | -0.005 | 0.5 | 87.5 | | | |
| | | | | | | | | C | -0.026 | -0.003 | 1.4 | 99.2 | | | |
| | | | | | | | | N | | | 0.0 | | | | |
| B | 99.921 | -120.0 | 0 | 0 | 0 | 0 | 0 | Bus12 | A | 0.019 | 0.020 | 1.4 | 69.1 | | |
| | | | | | | | | B | 0.009 | 0.005 | 0.5 | 87.5 | | | |
| | | | | | | | | C | 0.026 | 0.003 | 1.4 | 99.2 | | | |
| | | | | | | | | N | | | 0.0 | | | | |
| C | 99.952 | 120.0 | 0 | 0 | 0 | 0 | 0 | Bus11 | A | -0.009 | -0.004 | 43.5 | 90.0 | | |
| | | | | | | | | B | -0.008 | -0.004 | 39.1 | 90.0 | | | |
| | | | | | | | | C | -0.036 | -0.017 | 176.4 | 90.0 | | | |
| | | | | | | | | N | | | 135.1 | | | | |
| N | | | | | | | | Bus15 | A | 0.040 | 0.020 | 2.4 | 89.6 | | |
| | | | | | | | | B | 0.040 | 0.020 | 2.3 | 89.7 | | | |
| | | | | | | | | C | 0.040 | 0.020 | 2.4 | 90.0 | | | |
| | | | | | | | | N | | | 0.0 | | | | |
| A | 99.930 | 0.0 | 0 | 0 | 0 | 0 | 0 | Bus10 | A | -0.052 | -0.023 | 3.0 | 91.5 | | |
| | | | | | | | | B | -0.051 | -0.025 | 3.0 | 89.6 | | | |
| | | | | | | | | C | -0.049 | -0.024 | 2.9 | 90.0 | | | |
| | | | | | | | | N | | | 0.0 | | | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|-------|---------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus14 | 0.400 | A | 99.484 | 29.7 | 0 | 0 | 0.012 | 0.004 | Bus14 | A | 0.011 | 0.003 | 0.6 | 97.2 | |
| | | | | | | | | | | B | 0.011 | 0.006 | 0.7 | 89.1 | |
| | | | | | | | | | | C | 0.009 | 0.004 | 0.5 | 90.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | B | 99.486 | -90.2 | 0 | 0 | 0.009 | 0.005 | Bus13 | A | -0.012 | -0.004 | 54.4 | 95.4 | |
| | | | | | | | | | | B | -0.009 | -0.005 | 46.3 | 87.5 | |
| | | | | | | | | | | C | -0.009 | -0.002 | 42.1 | 97.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | C | 99.643 | 149.7 | 0 | 0 | 0.009 | 0.002 | Bus17 | A | 0.008 | 0.006 | 0.5 | 81.6 | |
| | | | | | | | | | | B | 0.007 | 0.004 | 0.4 | 85.5 | |
| | | | | | | | | | | C | 0.009 | 0.004 | 0.5 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus15 | 33.000 | A | 99.928 | 0.0 | 0 | 0 | 0 | 0 | Bus13 | A | -0.040 | -0.020 | 2.4 | 89.6 | |
| | | | | | | | | | | B | -0.040 | -0.020 | 2.3 | 89.7 | |
| | | | | | | | | | | C | -0.040 | -0.020 | 2.4 | 90.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | B | 99.917 | -120.0 | 0 | 0 | 0 | 0 | Bus20 | A | 0.032 | 0.014 | 1.9 | 91.4 | |
| | | | | | | | | | | B | 0.033 | 0.016 | 1.9 | 90.5 | |
| | | | | | | | | | | C | 0.032 | 0.016 | 1.9 | 89.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | C | 99.948 | 120.0 | 0 | 0 | 0 | 0 | Bus15 | A | -0.008 | -0.006 | 0.5 | 81.6 | |
| | | | | | | | | | | B | -0.007 | -0.004 | 0.4 | 85.5 | |
| | | | | | | | | | | C | -0.009 | -0.004 | 0.5 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus17 | 33.000 | A | 99.928 | 0.0 | 0 | 0 | 0 | 0 | Bus18 | A | 0.008 | 0.006 | 0.5 | 81.6 | |
| | | | | | | | | | | B | 0.007 | 0.004 | 0.4 | 85.5 | |
| | | | | | | | | | | C | 0.009 | 0.004 | 0.5 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | B | 99.916 | -120.0 | 0 | 0 | 0 | 0 | Bus17 | A | -0.008 | -0.006 | 0.5 | 81.6 | |
| | | | | | | | | | | B | -0.007 | -0.004 | 0.4 | 85.5 | |
| | | | | | | | | | | C | -0.009 | -0.004 | 0.5 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | C | 99.948 | 120.0 | 0 | 0 | 0 | 0 | Bus19 | A | 0.008 | 0.006 | 0.5 | 81.6 | |
| | | | | | | | | | | B | 0.007 | 0.004 | 0.4 | 85.5 | |
| | | | | | | | | | | C | 0.009 | 0.004 | 0.5 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|---------|---------|--------|------------|------|-------|-------|-----------|-------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus19 | 0.400 | A | 99.569 | 29.8 | 0 | 0 | 0.007 | 0.004 | Bus18 | A | -0.007 | -0.004 | 34.7 | 86.7 | |
| | | B | 99.629 | -90.1 | 0 | 0 | 0.007 | 0.003 | | B | -0.007 | -0.003 | 32.5 | 90.3 | |
| | | C | 99.507 | 149.8 | 0 | 0 | 0.009 | 0.005 | | C | -0.009 | -0.005 | 45.6 | 88.0 | |
| | | | | | | | | | | N | | | 10.0 | | |
| Bus20 | 0.400 | A | 99.170 | 29.4 | 0 | 0 | 0.034 | 0.014 | Bus15 | A | -0.034 | -0.014 | 161.0 | 92.5 | |
| | | B | 99.215 | -90.5 | 0 | 0 | 0.032 | 0.014 | | B | -0.032 | -0.014 | 151.8 | 91.8 | |
| | | C | 99.211 | 149.5 | 0 | 0 | 0.030 | 0.015 | | C | -0.030 | -0.015 | 147.5 | 90.0 | |
| | | | | | | | | | | N | | | 17.0 | | |
| Bus21 | 33.000 | A | 99.984 | 0.0 | 0 | 0 | 0 | 0 | Bus2 | A | -0.700 | -0.285 | 39.7 | 92.6 | |
| | | B | 99.971 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.683 | -0.296 | 39.1 | 91.8 | |
| | | C | 100.001 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.682 | -0.276 | 38.6 | 92.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus24 | A | 0.675 | 0.277 | 38.3 | 92.5 | |
| | | | | | | | | | | B | 0.659 | 0.287 | 37.7 | 91.7 | |
| | | | | | | | | | | C | 0.658 | 0.269 | 37.3 | 92.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus22 | A | 0.025 | 0.008 | 1.4 | 95.4 | |
| | | | | | | | | | | B | 0.024 | 0.009 | 1.3 | 93.4 | |
| | | | | | | | | | | C | 0.024 | 0.007 | 1.3 | 95.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus22 | 0.400 | A | 99.084 | 29.4 | 0 | 0 | 0.024 | 0.008 | Bus21 | A | -0.024 | -0.008 | 109.7 | 94.7 | |
| | | B | 99.090 | -90.6 | 0 | 0 | 0.023 | 0.008 | | B | -0.023 | -0.008 | 108.4 | 94.0 | |
| | | C | 99.206 | 149.3 | 0 | 0 | 0.025 | 0.006 | | C | -0.025 | -0.006 | 112.3 | 97.5 | |
| | | | | | | | | | | N | | | 12.2 | | |
| Bus24 | 33.000 | A | 99.948 | 0.0 | 0 | 0 | 0 | 0 | Bus28 | A | 0.657 | 0.265 | 37.2 | 92.7 | |
| | | B | 99.935 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.641 | 0.278 | 36.7 | 91.8 | |
| | | C | 99.966 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.639 | 0.258 | 36.2 | 92.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus26 | A | 0.009 | 0.005 | 0.5 | 86.2 | |
| | | | | | | | | | | B | 0.009 | 0.004 | 0.5 | 90.2 | |
| | | | | | | | | | | C | 0.010 | 0.005 | 0.6 | 90.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus21 | A | -0.675 | -0.276 | 38.3 | 92.5 | |
| | | | | | | | | | | B | -0.659 | -0.287 | 37.7 | 91.7 | |
| | | | | | | | | | | C | -0.658 | -0.268 | 37.3 | 92.6 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|-------|---------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus25 | | | | | | | | | | A | 0.009 | 0.006 | 0.6 | 83.6 | |
| | | | | | | | | | | B | 0.009 | 0.005 | 0.5 | 87.6 | |
| | | | | | | | | | | C | 0.010 | 0.005 | 0.6 | 87.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus25 | 0.400 | A | 99.814 | 29.9 | 0 | 0 | 0.008 | 0.004 | Bus24 | A | -0.008 | -0.004 | 39.0 | 90.0 | |
| | | B | 99.820 | -90.1 | 0 | 0 | 0.009 | 0.004 | | B | -0.009 | -0.004 | 43.3 | 90.0 | |
| | | C | 99.822 | 149.9 | 0 | 0 | 0.010 | 0.005 | | C | -0.010 | -0.005 | 47.7 | 90.0 | |
| | | | | | | | | | | N | | | 7.5 | | |
| Bus26 | 33.000 | A | 99.948 | 0.0 | 0 | 0 | 0 | 0 | Bus24 | A | -0.009 | -0.005 | 0.5 | 86.2 | |
| | | B | 99.935 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.009 | -0.004 | 0.5 | 90.2 | |
| | | C | 99.966 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.010 | -0.005 | 0.6 | 90.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus27 | | | | | | | | | | A | 0.009 | 0.005 | 0.5 | 86.2 | |
| | | | | | | | | | | B | 0.009 | 0.004 | 0.5 | 90.2 | |
| | | | | | | | | | | C | 0.010 | 0.005 | 0.6 | 90.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus27 | 0.400 | A | 99.290 | 29.8 | 0 | 0 | 0.008 | 0.004 | Bus26 | A | -0.008 | -0.004 | 39.1 | 90.0 | |
| | | B | 99.238 | -90.2 | 0 | 0 | 0.009 | 0.004 | | B | -0.009 | -0.004 | 43.5 | 90.0 | |
| | | C | 99.181 | 149.7 | 0 | 0 | 0.010 | 0.005 | | C | -0.010 | -0.005 | 47.9 | 90.0 | |
| | | | | | | | | | | N | | | 7.5 | | |
| Bus28 | 33.000 | A | 99.930 | 0.0 | 0 | 0 | 0 | 0 | Bus31 | A | 0.638 | 0.260 | 36.2 | 92.6 | |
| | | B | 99.917 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.622 | 0.271 | 35.6 | 91.7 | |
| | | C | 99.949 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.621 | 0.252 | 35.2 | 92.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus24 | | | | | | | | | | A | -0.657 | -0.265 | 37.2 | 92.7 | |
| | | | | | | | | | | B | -0.641 | -0.278 | 36.7 | 91.8 | |
| | | | | | | | | | | C | -0.638 | -0.258 | 36.2 | 92.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus30 | | | | | | | | | | A | 0.019 | 0.005 | 1.0 | 96.9 | |
| | | | | | | | | | | B | 0.020 | 0.007 | 1.1 | 94.8 | |
| | | | | | | | | | | C | 0.018 | 0.006 | 1.0 | 94.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus30 | 0.400 | A | 99.546 | 29.6 | 0 | 0 | 0.021 | 0.006 | Bus28 | A | -0.021 | -0.006 | 95.5 | 96.5 | |
| | | B | 99.633 | -90.3 | 0 | 0 | 0.019 | 0.004 | | B | -0.019 | -0.004 | 82.9 | 97.4 | |
| | | C | 99.634 | 149.7 | 0 | 0 | 0.016 | 0.005 | | C | -0.016 | -0.005 | 74.2 | 95.0 | |
| | | | | | | | | | | N | | | 24.1 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|---------|--------|--------|------------|------|-------|-------|-----------|-------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus31 | 33.000 | A | 99.921 | 0.0 | 0 | 0 | 0 | 0 | Bus32 | A | 0.046 | 0.018 | 2.6 | 92.9 | |
| | | B | 99.908 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.046 | 0.017 | 2.6 | 93.7 | |
| | | C | 99.940 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.047 | 0.018 | 2.7 | 93.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus28 | A | -0.638 | -0.260 | 36.2 | 92.6 | |
| | | | | | | | | | | B | -0.622 | -0.271 | 35.6 | 91.7 | |
| | | | | | | | | | | C | -0.620 | -0.252 | 35.2 | 92.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus38 | A | 0.591 | 0.242 | 33.6 | 92.6 | |
| | | | | | | | | | | B | 0.575 | 0.254 | 33.0 | 91.5 | |
| | | | | | | | | | | C | 0.573 | 0.234 | 32.5 | 92.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus32 | 33.000 | A | 99.920 | 0.0 | 0 | 0 | 0 | 0 | Bus31 | A | -0.046 | -0.018 | 2.6 | 92.9 | |
| | | B | 99.908 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.046 | -0.017 | 2.6 | 93.7 | |
| | | C | 99.939 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.047 | -0.018 | 2.7 | 93.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus35 | A | 0.007 | 0.005 | 0.4 | 82.7 | |
| | | | | | | | | | | B | 0.008 | 0.005 | 0.5 | 86.4 | |
| | | | | | | | | | | C | 0.008 | 0.006 | 0.5 | 80.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus34 | A | 0.039 | 0.014 | 2.2 | 94.4 | |
| | | | | | | | | | | B | 0.038 | 0.013 | 2.1 | 95.0 | |
| | | | | | | | | | | C | 0.040 | 0.012 | 2.2 | 95.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus34 | 0.400 | A | 99.219 | 29.3 | 0 | 0 | 0.038 | 0.011 | Bus32 | A | -0.038 | -0.011 | 174.0 | 96.0 | |
| | | B | 99.238 | -90.6 | 0 | 0 | 0.038 | 0.011 | | B | -0.038 | -0.011 | 171.8 | 95.8 | |
| | | C | 99.188 | 149.3 | 0 | 0 | 0.040 | 0.013 | | C | -0.040 | -0.013 | 184.9 | 95.5 | |
| | | | | | | | | | | N | | | 13.8 | | |
| Bus35 | 33.000 | A | 99.920 | 0.0 | 0 | 0 | 0 | 0 | Bus32 | A | -0.007 | -0.005 | 0.4 | 82.7 | |
| | | B | 99.907 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.008 | -0.005 | 0.5 | 86.4 | |
| | | C | 99.939 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.008 | -0.006 | 0.5 | 80.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus37 | A | 0.007 | 0.005 | 0.4 | 82.7 | |
| | | | | | | | | | | B | 0.008 | 0.005 | 0.5 | 86.4 | |
| | | | | | | | | | | C | 0.008 | 0.006 | 0.5 | 80.0 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | | XFMR |
|-------|--------|-------|---------|--------|------------|------|-------|-------|-----------|-------|--------|--------|-------|------|-------|------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap | |
| Bus37 | 0.400 | A | 99.538 | 29.8 | 0 | 0 | 0.008 | 0.004 | Bus35 | A | -0.008 | -0.004 | 37.8 | 87.7 | | |
| | | B | 99.520 | -90.2 | 0 | 0 | 0.008 | 0.005 | | B | -0.008 | -0.005 | 40.8 | 86.5 | | |
| | | C | 99.546 | 149.9 | 0 | 0 | 0.007 | 0.005 | | C | -0.007 | -0.005 | 36.5 | 80.0 | | |
| | | | | | | | | | | N | | | 3.1 | | | |
| Bus38 | 33.000 | A | 99.910 | 0.0 | 0 | 0 | 0 | 0 | Bus42 | A | 0.090 | 0.031 | 5.0 | 94.5 | | |
| | | B | 99.897 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.079 | 0.035 | 4.5 | 91.5 | | |
| | | C | 99.929 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.081 | 0.024 | 4.5 | 96.1 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus31 | A | -0.591 | -0.242 | 33.6 | 92.6 | | |
| | | | | | | | | | | B | -0.575 | -0.254 | 33.0 | 91.5 | | |
| | | | | | | | | | | C | -0.573 | -0.234 | 32.5 | 92.6 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus53 | A | 0.501 | 0.211 | 28.6 | 92.2 | | |
| | | | | | | | | | | B | 0.496 | 0.219 | 28.5 | 91.5 | | |
| | | | | | | | | | | C | 0.492 | 0.211 | 28.1 | 91.9 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| Bus41 | 0.400 | A | 99.080 | 29.2 | 0 | 0 | 0.068 | 0.027 | Bus42 | A | -0.068 | -0.027 | 318.3 | 92.7 | | |
| | | B | 99.431 | -90.6 | 0 | 0 | 0.050 | 0.014 | | B | -0.050 | -0.014 | 225.5 | 96.0 | | |
| | | C | 99.274 | 149.3 | 0 | 0 | 0.063 | 0.021 | | C | -0.063 | -0.021 | 287.0 | 95.0 | | |
| | | | | | | | | | | N | | | 73.9 | | | |
| Bus42 | 33.000 | A | 99.909 | 0.0 | 0 | 0 | 0 | 0 | Bus38 | A | -0.090 | -0.031 | 5.0 | 94.5 | | |
| | | B | 99.897 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.079 | -0.035 | 4.5 | 91.5 | | |
| | | C | 99.929 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.081 | -0.024 | 4.5 | 96.1 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus43 | A | 0.023 | 0.007 | 1.2 | 95.9 | | |
| | | | | | | | | | | B | 0.024 | 0.007 | 1.3 | 96.1 | | |
| | | | | | | | | | | C | 0.023 | 0.008 | 1.3 | 94.6 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus41 | A | 0.067 | 0.024 | 3.8 | 94.0 | | |
| | | | | | | | | | | B | 0.055 | 0.028 | 3.2 | 89.2 | | |
| | | | | | | | | | | C | 0.058 | 0.016 | 3.2 | 96.6 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| Bus43 | 33.000 | A | 99.907 | 0.0 | 0 | 0 | 0 | 0 | Bus42 | A | -0.023 | -0.007 | 1.2 | 95.9 | | |
| | | B | 99.895 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.024 | -0.007 | 1.3 | 96.1 | | |
| | | C | 99.927 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.023 | -0.008 | 1.3 | 94.6 | | |
| | | | | | | | | | | N | | | 0.0 | | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|---------|--------|------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus44 | 33.000 | A | 99.904 | 0.0 | 0 | 0 | 0 | 0 | Bus44 | A | 0.023 | 0.007 | 1.2 | 95.9 | |
| | | | | | | | | | | B | 0.024 | 0.007 | 1.3 | 96.1 | |
| | | | | | | | | | | C | 0.023 | 0.008 | 1.3 | 94.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus44 | 33.000 | A | 99.904 | 0.0 | 0 | 0 | 0 | 0 | Bus47 | A | 0.004 | 0.002 | 0.2 | 89.5 | |
| | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.9 | |
| | | | | | | | | | | C | 0.005 | 0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus46 | 0.400 | A | 98.653 | 29.4 | 0 | 0 | 0.018 | 0.006 | Bus44 | A | -0.018 | -0.006 | 84.3 | 95.4 | |
| | | | | | | | | | | B | -0.019 | -0.004 | 85.5 | 97.6 | |
| | | | | | | | | | | C | -0.017 | -0.003 | 76.7 | 98.1 | |
| | | | | | | | | | | N | | | 15.7 | | |
| Bus47 | 33.000 | A | 99.903 | 0.0 | 0 | 0 | 0 | 0 | Bus44 | A | -0.004 | -0.002 | 0.2 | 89.5 | |
| | | | | | | | | | | B | -0.005 | -0.002 | 0.3 | 95.9 | |
| | | | | | | | | | | C | -0.005 | -0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus51 | 33.000 | A | 99.902 | 0.0 | 0 | 0 | 0 | 0 | Bus47 | A | -0.004 | -0.002 | 0.2 | 89.5 | |
| | | | | | | | | | | B | -0.005 | -0.002 | 0.3 | 95.9 | |
| | | | | | | | | | | C | -0.005 | -0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus51 | 33.000 | A | 99.902 | 0.0 | 0 | 0 | 0 | 0 | Bus52 | A | 0.004 | 0.002 | 0.2 | 89.5 | |
| | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.9 | |
| | | | | | | | | | | C | 0.005 | 0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|---------|--------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus52 | 0.400 | A | 99.609 | 29.9 | 0 | 0 | 0.004 | 0.001 | Bus51 | A | -0.004 | -0.001 | 18.7 | 95.8 | |
| | | B | 99.462 | -90.2 | 0 | 0 | 0.006 | 0.002 | | B | -0.006 | -0.002 | 27.8 | 92.3 | |
| | | C | 99.576 | 149.9 | 0 | 0 | 0.004 | 0.002 | | C | -0.004 | -0.002 | 20.4 | 89.0 | |
| | | | | | | | | | | N | | | 5.6 | | |
| Bus53 | 33.000 | A | 99.899 | 0.0 | 0 | 0 | 0 | 0 | Bus54 | A | 0.501 | 0.211 | 28.6 | 92.2 | |
| | | B | 99.887 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.496 | 0.219 | 28.5 | 91.5 | |
| | | C | 99.919 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.492 | 0.210 | 28.1 | 91.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus38 | A | -0.501 | -0.211 | 28.6 | 92.2 | |
| | | | | | | | | | | B | -0.496 | -0.219 | 28.5 | 91.5 | |
| | | | | | | | | | | C | -0.492 | -0.210 | 28.1 | 91.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus54 | 33.000 | A | 99.890 | 0.0 | 0 | 0 | 0 | 0 | Bus57 | A | 0.495 | 0.208 | 28.2 | 92.2 | |
| | | B | 99.877 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.491 | 0.216 | 28.2 | 91.5 | |
| | | C | 99.910 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.486 | 0.209 | 27.8 | 91.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus53 | A | -0.501 | -0.211 | 28.6 | 92.2 | |
| | | | | | | | | | | B | -0.496 | -0.219 | 28.5 | 91.5 | |
| | | | | | | | | | | C | -0.491 | -0.210 | 28.1 | 91.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus56 | A | 0.006 | 0.002 | 0.3 | 93.7 | |
| | | | | | | | | | | B | 0.005 | 0.003 | 0.3 | 89.5 | |
| | | | | | | | | | | C | 0.005 | 0.002 | 0.3 | 95.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus56 | 0.400 | A | 99.449 | 29.8 | 0 | 0 | 0.006 | 0.002 | Bus54 | A | -0.006 | -0.002 | 26.9 | 92.8 | |
| | | B | 99.571 | -90.1 | 0 | 0 | 0.005 | 0.002 | | B | -0.005 | -0.002 | 21.3 | 94.9 | |
| | | C | 99.538 | 149.8 | 0 | 0 | 0.006 | 0.002 | | C | -0.006 | -0.002 | 25.2 | 95.9 | |
| | | | | | | | | | | N | | | 3.2 | | |
| Bus57 | 33.000 | A | 99.884 | 0.0 | 0 | 0 | 0 | 0 | Bus54 | A | -0.495 | -0.208 | 28.2 | 92.2 | |
| | | B | 99.872 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.491 | -0.216 | 28.2 | 91.5 | |
| | | C | 99.904 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.486 | -0.209 | 27.8 | 91.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus63 | A | 0.405 | 0.172 | 23.1 | 92.0 | |
| | | | | | | | | | | B | 0.410 | 0.177 | 23.5 | 91.8 | |
| | | | | | | | | | | C | 0.403 | 0.179 | 23.2 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR | | | | | | | |
|--------|--------|--------|---------|-------|------------|-------|-------|-------|-----------|--------|--------|--------|-------|-------|-------|--------|--------|--------|--------|------|------|--|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap | | | | | | | |
| Bus59 | 0.400 | A | 99.055 | 29.2 | 0 | 0 | 0.068 | 0.027 | Bus60 | A | 0.022 | 0.012 | 1.3 | 88.5 | | | | | | | | |
| | | | | | | | | | | B | 0.026 | 0.011 | 1.5 | 91.8 | | | | | | | | |
| | | | | | | | | | | C | 0.025 | 0.014 | 1.5 | 86.7 | | | | | | | | |
| | | | | | | | | | | N | | | | 0.0 | | | | | | | | |
| | | B | 99.407 | -90.6 | 0 | 0 | 0.050 | 0.014 | Bus59 | A | 0.067 | 0.024 | 3.8 | 94.0 | | | | | | | | |
| | | | | | | | | | | B | 0.055 | 0.028 | 3.2 | 89.2 | | | | | | | | |
| | | | | | | | | | | C | 0.058 | 0.016 | 3.2 | 96.6 | | | | | | | | |
| | | | | | | | | | | N | | | | 0.0 | | | | | | | | |
| | C | 99.249 | 149.3 | 0 | 0 | 0.063 | 0.021 | Bus57 | A | -0.068 | -0.027 | 318.3 | 92.7 | | | | | | | | | |
| | | | | | | | | | B | -0.050 | -0.014 | 225.5 | 96.0 | | | | | | | | | |
| | | | | | | | | | C | -0.063 | -0.021 | 287.1 | 95.0 | | | | | | | | | |
| | | | | | | | | | N | | | | 73.9 | | | | | | | | | |
| | 33.000 | A | 99.883 | 0.0 | 0 | 0 | 0 | 0 | Bus57 | A | -0.022 | -0.012 | 1.3 | 88.5 | | | | | | | | |
| | | | | | | | | | | B | 99.871 | -120.0 | 0 | 0 | 0 | 0 | B | -0.026 | -0.011 | 1.5 | 91.8 | |
| | | | | | | | | | | C | 99.903 | 120.0 | 0 | 0 | 0 | 0 | C | -0.025 | -0.014 | 1.5 | 86.7 | |
| | | | | | | | | | | N | | | | | 0.0 | | | | | | | |
| B | | 99.871 | -120.0 | 0 | 0 | 0 | 0 | Bus62 | A | 0.022 | 0.012 | 1.3 | 88.5 | | | | | | | | | |
| | | | | | | | | | B | 0.026 | 0.011 | 1.5 | 91.8 | | | | | | | | | |
| | | | | | | | | | C | 0.025 | 0.014 | 1.5 | 86.7 | | | | | | | | | |
| | | | | | | | | | N | | | | 0.0 | | | | | | | | | |
| C | 98.871 | 29.5 | 0 | 0 | 0.022 | 0.011 | Bus60 | A | -0.022 | -0.011 | 109.0 | 90.0 | | | | | | | | | | |
| | | | | | | | | B | 98.716 | -90.6 | 0 | 0 | 0.027 | 0.012 | B | -0.027 | -0.012 | 130.9 | 91.0 | | | |
| | | | | | | | | C | 98.885 | 149.5 | 0 | 0 | 0.022 | 0.011 | C | -0.022 | -0.011 | 109.0 | 89.0 | | | |
| | | | | | | | | N | | | | | 20.2 | | | | | | | | | |
| 33.000 | A | 99.879 | 0.0 | 0 | 0 | 0 | 0 | Bus57 | A | -0.405 | -0.172 | 23.1 | 92.0 | | | | | | | | | |
| | | | | | | | | | B | 99.866 | -120.0 | 0 | 0 | 0 | 0 | B | -0.410 | -0.177 | 23.5 | 91.8 | | |
| | | | | | | | | | C | 99.899 | 120.0 | 0 | 0 | 0 | 0 | C | -0.403 | -0.179 | 23.2 | 91.4 | | |
| | | | | | | | | | N | | | | | 0.0 | | | | | | | | |
| | B | 99.866 | -120.0 | 0 | 0 | 0 | 0 | Bus64 | A | 0.405 | 0.172 | 23.1 | 92.0 | | | | | | | | | |
| | | | | | | | | | B | 0.410 | 0.177 | 23.5 | 91.8 | | | | | | | | | |
| | | | | | | | | | C | 0.403 | 0.179 | 23.2 | 91.4 | | | | | | | | | |
| | | | | | | | | | N | | | | 0.0 | | | | | | | | | |
| C | 99.879 | 120.0 | 0 | 0 | 0 | 0 | Bus69 | A | 0.023 | 0.007 | 1.3 | 95.5 | | | | | | | | | | |
| | | | | | | | | B | 0.024 | 0.007 | 1.3 | 95.5 | | | | | | | | | | |
| | | | | | | | | C | 0.023 | 0.008 | 1.3 | 94.0 | | | | | | | | | | |
| | | | | | | | | N | | | | 0.0 | | | | | | | | | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|--------|---------|-------|------------|-------|-------|-------|-----------|--------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus66 | 0.400 | A | 98.933 | 29.3 | 0 | 0 | 0.040 | 0.018 | Bus63 | A | -0.405 | -0.172 | 23.1 | 92.0 | |
| | | | | | | | | | | B | -0.410 | -0.177 | 23.5 | 91.8 | |
| | | | | | | | | | | C | -0.403 | -0.179 | 23.2 | 91.4 | |
| | | | | | | | | | | N | | | | 0.0 | |
| | | B | 99.111 | -90.6 | 0 | 0 | 0.036 | 0.014 | Bus70 | A | 0.343 | 0.147 | 19.6 | 91.9 | |
| | | | | | | | | | | B | 0.349 | 0.151 | 20.0 | 91.7 | |
| | | | | | | | | | | C | 0.342 | 0.154 | 19.7 | 91.2 | |
| | | | | | | | | | | N | | | | 0.0 | |
| | | C | 99.000 | 149.4 | 0 | 0 | 0.038 | 0.018 | Bus66 | A | 0.039 | 0.018 | 2.3 | 90.9 | |
| | | | | | | | | | | B | 0.037 | 0.019 | 2.2 | 89.6 | |
| | | | | | | | | | | C | 0.038 | 0.016 | 2.2 | 91.7 | |
| | | | | | | | | | | N | | | | 0.0 | |
| | A | 99.381 | 29.6 | 0 | 0 | 0.023 | 0.009 | Bus64 | A | -0.040 | -0.018 | 193.1 | 91.5 | | |
| | | | | | | | | | B | -0.036 | -0.014 | 168.0 | 93.0 | | |
| | | | | | | | | | C | -0.038 | -0.018 | 181.2 | 90.6 | | |
| | | | | | | | | | N | | | | 29.4 | | |
| B | 99.440 | -90.5 | 0 | 0 | 0.026 | 0.007 | Bus69 | A | -0.023 | -0.009 | 106.1 | 93.6 | | | |
| | | | | | | | | B | -0.026 | -0.007 | 116.4 | 97.0 | | | |
| | | | | | | | | C | -0.020 | -0.005 | 91.6 | 96.8 | | | |
| | | | | | | | | N | | | | 33.2 | | | |
| C | 99.540 | 149.6 | 0 | 0 | 0.020 | 0.005 | Bus68 | A | 0.023 | 0.007 | 1.3 | 95.5 | | | |
| | | | | | | | | B | 0.024 | 0.007 | 1.3 | 95.5 | | | |
| | | | | | | | | C | 0.023 | 0.008 | 1.3 | 94.0 | | | |
| | | | | | | | | N | | | | 0.0 | | | |
| A | 99.869 | 0.0 | 0 | 0 | 0 | 0 | Bus64 | A | -0.023 | -0.007 | 1.3 | 95.5 | | | |
| | | | | | | | | B | -0.024 | -0.007 | 1.3 | 95.5 | | | |
| | | | | | | | | C | -0.023 | -0.008 | 1.3 | 94.0 | | | |
| | | | | | | | | N | | | | 0.0 | | | |
| B | 99.856 | -120.0 | 0 | 0 | 0 | 0 | Bus68 | A | 0.023 | 0.007 | 1.3 | 95.5 | | | |
| | | | | | | | | B | 0.024 | 0.007 | 1.3 | 95.5 | | | |
| | | | | | | | | C | 0.023 | 0.008 | 1.3 | 94.0 | | | |
| | | | | | | | | N | | | | 0.0 | | | |
| C | 99.888 | 120.0 | 0 | 0 | 0 | 0 | Bus83 | A | 0.262 | 0.118 | 15.1 | 91.2 | | | |
| | | | | | | | | B | 0.273 | 0.119 | 15.6 | 91.6 | | | |
| | | | | | | | | C | 0.266 | 0.128 | 15.5 | 90.1 | | | |
| | | | | | | | | N | | | | 0.0 | | | |
| A | 99.855 | 0.0 | 0 | 0 | 0 | 0 | Bus64 | A | -0.343 | -0.147 | 19.6 | 91.9 | | | |
| | | | | | | | | B | -0.349 | -0.151 | 20.0 | 91.7 | | | |
| | | | | | | | | C | -0.342 | -0.154 | 19.7 | 91.2 | | | |
| | | | | | | | | N | | | | 0.0 | | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | | XFMR | |
|-------|--------|--------|---------|--------|------------|-------|------|-------|-----------|-------|--------|--------|--------|--------|-------|------|--|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap | | |
| | | | | | | | | | Bus73 | A | 0.042 | 0.015 | 2.4 | 94.0 | | | |
| | | | | | | | | | | B | 0.038 | 0.020 | 2.2 | 88.9 | | | |
| | | | | | | | | | | C | 0.036 | 0.014 | 2.0 | 93.6 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | | Bus72 | A | 0.039 | 0.014 | 2.2 | 94.4 | | |
| | | | | | | | | | | | B | 0.038 | 0.013 | 2.1 | 95.0 | | |
| | | | | | | | | | | | C | 0.040 | 0.012 | 2.2 | 95.5 | | |
| | | | | | | | | | | | N | | | 0.0 | | | |
| | | Bus72 | 0.400 | A | 99.152 | 29.3 | 0 | 0 | 0.038 | 0.011 | Bus70 | A | -0.038 | -0.011 | 174.1 | 96.0 | |
| | | | | B | 99.172 | -90.7 | 0 | 0 | 0.038 | 0.011 | | B | -0.038 | -0.011 | 171.9 | 95.8 | |
| | | | | C | 99.123 | 149.3 | 0 | 0 | 0.040 | 0.013 | | C | -0.040 | -0.013 | 185.0 | 95.5 | |
| | | | | | | | | | | N | | | | 13.8 | | | |
| | Bus73 | 33.000 | A | 99.851 | 0.0 | 0 | 0 | 0 | 0 | Bus76 | A | 0.025 | 0.011 | 1.4 | 92.0 | | |
| | | | B | 99.839 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.021 | 0.010 | 1.2 | 89.6 | | |
| | | | C | 99.871 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.023 | 0.007 | 1.3 | 96.0 | | |
| | | | | | | | | | N | | | | 0.0 | | | | |
| | | | | | | | | | Bus70 | A | -0.042 | -0.015 | 2.4 | 94.0 | | | |
| | | | | | | | | | | B | -0.038 | -0.020 | 2.2 | 88.9 | | | |
| | | | | | | | | | | C | -0.036 | -0.014 | 2.0 | 93.6 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | | Bus75 | A | 0.017 | 0.005 | 0.9 | 96.5 | | |
| | | | | | | | | | | | B | 0.017 | 0.009 | 1.0 | 88.0 | | |
| | | | | | | | | | | | C | 0.013 | 0.007 | 0.8 | 88.5 | | |
| | | | | | | | | | | | N | | | 0.0 | | | |
| | Bus75 | 0.400 | A | 99.388 | 29.6 | 0 | 0 | 0.020 | 0.008 | Bus73 | A | -0.020 | -0.008 | 96.1 | 92.4 | | |
| | | | B | 99.544 | -90.3 | 0 | 0 | 0.015 | 0.006 | | B | -0.015 | -0.006 | 70.3 | 94.0 | | |
| | | | C | 99.619 | 149.8 | 0 | 0 | 0.011 | 0.005 | | C | -0.011 | -0.005 | 52.9 | 92.5 | | |
| | | | | | | | | | N | | | | 40.6 | | | | |
| Bus76 | 33.000 | A | 99.850 | 0.0 | 0 | 0 | 0 | 0 | Bus79 | A | 0.019 | 0.006 | 1.0 | 95.2 | | | |
| | | B | 99.837 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.016 | 0.005 | 0.9 | 94.8 | | | |
| | | C | 99.870 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.018 | 0.003 | 1.0 | 98.7 | | | |
| | | | | | | | | N | | | | 0.0 | | | | | |
| | | | | | | | | | Bus73 | A | -0.025 | -0.011 | 1.4 | 92.0 | | | |
| | | | | | | | | | | B | -0.021 | -0.010 | 1.2 | 89.6 | | | |
| | | | | | | | | | | C | -0.023 | -0.007 | 1.3 | 96.0 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|-------|---------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus78 | | | | | | | | | | A | 0.006 | 0.005 | 0.4 | 80.3 | |
| | | | | | | | | | | B | 0.005 | 0.005 | 0.4 | 70.6 | |
| | | | | | | | | | | C | 0.005 | 0.004 | 0.3 | 79.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus78 | 0.400 | A | 99.466 | 29.9 | 0 | 0 | 0.006 | 0.005 | Bus76 | A | -0.006 | -0.005 | 34.3 | 80.0 | |
| | | B | 99.592 | -90.1 | 0 | 0 | 0.004 | 0.003 | | B | -0.004 | -0.003 | 23.9 | 78.8 | |
| | | C | 99.553 | 149.9 | 0 | 0 | 0.005 | 0.004 | | C | -0.005 | -0.004 | 29.1 | 79.3 | |
| | | | | | | | | | | N | | | 9.2 | | |
| Bus79 | 33.000 | A | 99.849 | 0.0 | 0 | 0 | 0 | 0 | Bus76 | A | -0.019 | -0.006 | 1.0 | 95.2 | |
| | | B | 99.837 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.016 | -0.005 | 0.9 | 94.8 | |
| | | C | 99.870 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.018 | -0.003 | 1.0 | 98.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus82 | | | | | | | | | | A | 0.019 | 0.006 | 1.0 | 95.2 | |
| | | | | | | | | | | B | 0.016 | 0.005 | 0.9 | 94.8 | |
| | | | | | | | | | | C | 0.018 | 0.003 | 1.0 | 98.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus81 | 0.400 | A | 99.232 | 29.5 | 0 | 0 | 0.018 | 0.005 | Bus82 | A | -0.018 | -0.005 | 82.2 | 97.0 | |
| | | B | 99.439 | -90.4 | 0 | 0 | 0.014 | 0.002 | | B | -0.014 | -0.002 | 62.6 | 98.5 | |
| | | C | 99.185 | 149.5 | 0 | 0 | 0.020 | 0.006 | | C | -0.020 | -0.006 | 90.1 | 96.3 | |
| | | | | | | | | | | N | | | 25.9 | | |
| Bus82 | 33.000 | A | 99.849 | 0.0 | 0 | 0 | 0 | 0 | Bus79 | A | -0.019 | -0.006 | 1.0 | 95.2 | |
| | | B | 99.836 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.016 | -0.005 | 0.9 | 94.8 | |
| | | C | 99.869 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.018 | -0.003 | 1.0 | 98.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus81 | | | | | | | | | | A | 0.019 | 0.006 | 1.0 | 95.2 | |
| | | | | | | | | | | B | 0.016 | 0.005 | 0.9 | 94.8 | |
| | | | | | | | | | | C | 0.018 | 0.003 | 1.0 | 98.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus83 | 33.000 | A | 99.850 | 0.0 | 0 | 0 | 0 | 0 | Bus70 | A | -0.262 | -0.118 | 15.1 | 91.2 | |
| | | B | 99.837 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.273 | -0.119 | 15.6 | 91.6 | |
| | | C | 99.869 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.266 | -0.128 | 15.5 | 90.1 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus87 | | | | | | | | | | A | 0.243 | 0.113 | 14.1 | 90.7 | |
| | | | | | | | | | | B | 0.254 | 0.114 | 14.6 | 91.3 | |
| | | | | | | | | | | C | 0.248 | 0.123 | 14.6 | 89.6 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|-------|---------|--------|------------|------|-------|-------|-----------|--------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| | | | | | | | | | Bus86 | A | 0.019 | 0.005 | 1.0 | 96.8 | |
| | | | | | | | | | B | 0.018 | 0.005 | 1.0 | 95.9 | | |
| | | | | | | | | | C | 0.018 | 0.005 | 1.0 | 96.3 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus85 | 0.400 | A | 99.171 | 29.5 | 0 | 0 | 0.018 | 0.006 | Bus86 | A | -0.018 | -0.006 | 84.0 | 95.4 | |
| | | B | 99.243 | -90.5 | 0 | 0 | 0.019 | 0.004 | B | -0.019 | -0.004 | 85.3 | 97.4 | | |
| | | C | 99.345 | 149.5 | 0 | 0 | 0.017 | 0.003 | C | -0.017 | -0.003 | 76.5 | 98.1 | | |
| | | | | | | | | N | | | 15.3 | | | | |
| Bus86 | 33.000 | A | 99.849 | 0.0 | 0 | 0 | 0 | 0 | Bus83 | A | -0.019 | -0.005 | 1.0 | 96.8 | |
| | | B | 99.836 | -120.0 | 0 | 0 | 0 | 0 | B | -0.018 | -0.005 | 1.0 | 95.9 | | |
| | | C | 99.868 | 120.0 | 0 | 0 | 0 | 0 | C | -0.018 | -0.005 | 1.0 | 96.3 | | |
| | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | Bus85 | A | 0.019 | 0.005 | 1.0 | 96.8 | |
| | | | | | | | | | B | 0.018 | 0.005 | 1.0 | 95.9 | | |
| | | | | | | | | | C | 0.018 | 0.005 | 1.0 | 96.3 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus87 | 33.000 | A | 99.840 | 0.0 | 0 | 0 | 0 | 0 | Bus83 | A | -0.243 | -0.113 | 14.1 | 90.7 | |
| | | B | 99.826 | -120.0 | 0 | 0 | 0 | 0 | B | -0.254 | -0.114 | 14.6 | 91.3 | | |
| | | C | 99.859 | 120.0 | 0 | 0 | 0 | 0 | C | -0.248 | -0.123 | 14.6 | 89.6 | | |
| | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | Bus90 | A | 0.226 | 0.108 | 13.1 | 90.2 | |
| | | | | | | | | | B | 0.239 | 0.106 | 13.7 | 91.4 | | |
| | | | | | | | | | C | 0.234 | 0.118 | 13.8 | 89.2 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus89 | A | 0.017 | 0.005 | 0.9 | 95.5 | |
| | | | | | | | | | B | 0.015 | 0.008 | 0.9 | 89.4 | | |
| | | | | | | | | | C | 0.014 | 0.005 | 0.8 | 94.8 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus89 | 0.400 | A | 99.111 | 29.5 | 0 | 0 | 0.019 | 0.007 | Bus87 | A | -0.019 | -0.007 | 87.5 | 94.5 | |
| | | B | 99.379 | -90.3 | 0 | 0 | 0.013 | 0.004 | B | -0.013 | -0.004 | 58.2 | 95.3 | | |
| | | C | 99.284 | 149.6 | 0 | 0 | 0.015 | 0.006 | C | -0.015 | -0.006 | 67.8 | 93.4 | | |
| | | | | | | | | N | | | 29.0 | | | | |
| Bus90 | 33.000 | A | 99.824 | 0.0 | 0 | 0 | 0 | 0 | Bus113 | A | 0.112 | 0.050 | 6.5 | 91.2 | |
| | | B | 99.810 | -120.0 | 0 | 0 | 0 | 0 | B | 0.116 | 0.043 | 6.5 | 93.7 | | |
| | | C | 99.842 | 120.0 | 0 | 0 | 0 | 0 | C | 0.120 | 0.050 | 6.8 | 92.4 | | |
| | | | | | | | | N | | | 0.0 | | | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|-------|--------|---------|--------|-------|------------|------|-------|-------|-----------|-------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus92 | 0.400 | A | 99.322 | 29.5 | 0 | 0 | 0.028 | 0.008 | Bus93 | A | 0.087 | 0.047 | 5.2 | 87.9 | |
| | | | | | | | | | | B | 0.092 | 0.053 | 5.6 | 86.7 | |
| | | | | | | | | | | C | 0.085 | 0.054 | 5.3 | 84.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus87 | A | -0.226 | -0.108 | 13.1 | 90.2 | |
| | | | | | | | | | | B | -0.239 | -0.106 | 13.7 | 91.4 | |
| | | | | | | | | | | C | -0.234 | -0.118 | 13.8 | 89.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus92 | A | 0.026 | 0.010 | 1.5 | 93.4 | |
| | | | | | | | | | | B | 0.031 | 0.010 | 1.7 | 95.0 | |
| | | | | | | | | | | C | 0.029 | 0.014 | 1.7 | 89.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus92 | 0.400 | A | 99.322 | 29.5 | 0 | 0 | 0.028 | 0.008 | Bus90 | A | -0.028 | -0.008 | 126.5 | 96.5 | |
| | | B | 99.152 | -90.5 | 0 | 0 | 0.031 | 0.013 | | B | -0.031 | -0.013 | 146.2 | 92.6 | |
| | | C | 99.240 | 149.5 | 0 | 0 | 0.026 | 0.012 | | C | -0.026 | -0.012 | 125.7 | 91.5 | |
| | | | | | | | | | | N | | | 7.5 | | |
| Bus93 | 33.000 | A | 99.819 | 0.0 | 0 | 0 | 0 | 0 | Bus96 | A | 0.080 | 0.043 | 4.8 | 88.4 | |
| | | | | | | | | | | B | 0.084 | 0.048 | 5.1 | 86.8 | |
| | | | | | | | | | | C | 0.077 | 0.048 | 4.8 | 84.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus90 | A | -0.087 | -0.047 | 5.2 | 87.9 | |
| | | | | | | | | | | B | -0.092 | -0.053 | 5.6 | 86.7 | |
| | | | | | | | | | | C | -0.085 | -0.054 | 5.3 | 84.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus95 | A | 0.007 | 0.005 | 0.4 | 82.7 | |
| | | | | | | | | | | B | 0.008 | 0.005 | 0.5 | 86.4 | |
| | | | | | | | | | | C | 0.008 | 0.006 | 0.5 | 80.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus95 | 0.400 | A | 99.436 | 29.8 | 0 | 0 | 0.008 | 0.004 | Bus93 | A | -0.008 | -0.004 | 37.8 | 87.7 | |
| | | B | 99.418 | -90.2 | 0 | 0 | 0.008 | 0.005 | | B | -0.008 | -0.005 | 40.8 | 86.5 | |
| | | C | 99.446 | 149.8 | 0 | 0 | 0.007 | 0.005 | | C | -0.007 | -0.005 | 36.5 | 80.0 | |
| | | | | | | | | | | N | | | 3.1 | | |
| Bus96 | 33.000 | A | 99.818 | 0.0 | 0 | 0 | 0 | 0 | Bus93 | A | -0.080 | -0.043 | 4.8 | 88.4 | |
| | | | | | | | | | | B | -0.084 | -0.048 | 5.1 | 86.8 | |
| | | | | | | | | | | C | -0.077 | -0.048 | 4.8 | 84.8 | |
| | | | | | | | | | | N | | | 0.0 | | |

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|--------|--------|--------|---------|-------|------------|-------|--------|--------|-----------|--------|--------|-------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus98 | 0.400 | A | 99.434 | 29.6 | 0 | 0 | 0.021 | 0.006 | Bus103 | A | 0.041 | 0.013 | 2.3 | 95.4 | |
| | | | | | | | | | B | 0.038 | 0.018 | 2.2 | 91.0 | | |
| | | | | | | | | | C | 0.036 | 0.013 | 2.0 | 94.1 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | B | 99.519 | -90.3 | 0 | 0 | 0.019 | 0.004 | Bus99 | A | 0.020 | 0.025 | 1.7 | 63.1 | |
| | | | | | | | | | B | 0.026 | 0.024 | 1.8 | 73.3 | | |
| | | | | | | | | | C | 0.024 | 0.029 | 2.0 | 62.9 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | C | 99.522 | 149.7 | 0 | 0 | 0.016 | 0.005 | Bus98 | A | 0.019 | 0.005 | 1.0 | 96.9 | |
| | | | | | | | | | B | 0.020 | 0.007 | 1.1 | 94.8 | | |
| | | | | | | | | | C | 0.018 | 0.006 | 1.0 | 94.4 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | A | 99.434 | 29.6 | 0 | 0 | 0.021 | 0.006 | Bus96 | A | -0.021 | -0.006 | 95.6 | 96.5 | | |
| | | | | | | | | B | -0.019 | -0.004 | 82.9 | 97.4 | | | |
| | | | | | | | | C | -0.016 | -0.005 | 74.3 | 95.0 | | | |
| | | | | | | | | N | | | 24.1 | | | | |
| 33.000 | A | 99.818 | 0.0 | 0 | 0 | 0 | 0 | Bus102 | A | 0.020 | 0.025 | 1.7 | 63.1 | | |
| | | | | | | | | B | 0.026 | 0.024 | 1.8 | 73.3 | | | |
| | | | | | | | | C | 0.024 | 0.029 | 2.0 | 62.9 | | | |
| | | | | | | | | N | | | 0.0 | | | | |
| | B | 99.804 | -120.0 | 0 | 0 | 0 | 0 | Bus96 | A | -0.020 | -0.025 | 1.7 | 63.1 | | |
| | | | | | | | | B | -0.026 | -0.024 | 1.8 | 73.3 | | | |
| | | | | | | | | C | -0.024 | -0.029 | 2.0 | 62.9 | | | |
| | | | | | | | | N | | | 0.0 | | | | |
| C | 99.836 | 120.0 | 0 | 0 | 0 | 0 | Bus102 | A | -0.022 | -0.022 | 134.8 | 71.6 | | | |
| | | | | | | | B | -0.026 | -0.026 | 161.5 | 70.8 | | | | |
| | | | | | | | C | -0.020 | -0.026 | 145.8 | 60.9 | | | | |
| | | | | | | | N | | | 3.9 | | | | | |
| 33.000 | A | 99.817 | 0.0 | 0 | 0 | 0 | 0 | Bus99 | A | -0.020 | -0.025 | 1.7 | 63.1 | | |
| | | | | | | | | B | -0.026 | -0.024 | 1.8 | 73.3 | | | |
| | | | | | | | | C | -0.024 | -0.029 | 2.0 | 62.9 | | | |
| | | | | | | | | N | | | 0.0 | | | | |
| | B | 99.802 | -120.0 | 0 | 0 | 0 | 0 | Bus101 | A | 0.020 | 0.025 | 1.7 | 63.1 | | |
| | | | | | | | | B | 0.026 | 0.024 | 1.8 | 73.3 | | | |
| | | | | | | | | C | 0.024 | 0.029 | 2.0 | 62.9 | | | |
| | | | | | | | | N | | | 0.0 | | | | |

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| Bus | | Phase | Voltage | | Generation | | Load | | ID | Load Flow | | | | XFMR | |
|--------|--------|-------|---------|--------|------------|------|-------|-------|--------|-----------|--------|--------|-------|------|-------|
| ID | kV | | % Mag. | Ang. | MW | Mvar | MW | Mvar | | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus103 | 33.000 | A | 99.816 | 0.0 | 0 | 0 | 0 | 0 | Bus96 | A | -0.041 | -0.013 | 2.3 | 95.4 | |
| | | B | 99.802 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.038 | -0.018 | 2.2 | 91.0 | |
| | | C | 99.835 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.036 | -0.013 | 2.0 | 94.1 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus106 | A | 0.024 | 0.008 | 1.3 | 94.3 | |
| | | | | | | | | | | B | 0.021 | 0.008 | 1.2 | 92.9 | |
| | | | | | | | | | | C | 0.023 | 0.006 | 1.2 | 96.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus105 | A | 0.017 | 0.004 | 0.9 | 96.8 | |
| | | | | | | | | | | B | 0.017 | 0.009 | 1.0 | 88.3 | |
| | | | | | | | | | | C | 0.013 | 0.007 | 0.8 | 89.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus105 | 0.400 | A | 98.966 | 29.5 | 0 | 0 | 0.020 | 0.008 | Bus103 | A | -0.020 | -0.008 | 96.3 | 92.4 | |
| | | B | 99.233 | -90.4 | 0 | 0 | 0.015 | 0.006 | | B | -0.015 | -0.006 | 70.5 | 94.0 | |
| | | C | 99.372 | 149.7 | 0 | 0 | 0.011 | 0.005 | | C | -0.011 | -0.005 | 53.0 | 92.5 | |
| | | | | | | | | | | N | | | 40.8 | | |
| Bus106 | 33.000 | A | 99.815 | 0.0 | 0 | 0 | 0 | 0 | Bus103 | A | -0.024 | -0.008 | 1.3 | 94.3 | |
| | | B | 99.800 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.021 | -0.008 | 1.2 | 92.9 | |
| | | C | 99.833 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.023 | -0.006 | 1.2 | 96.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus108 | A | 0.024 | 0.008 | 1.3 | 94.3 | |
| | | | | | | | | | | B | 0.021 | 0.008 | 1.2 | 92.9 | |
| | | | | | | | | | | C | 0.023 | 0.006 | 1.2 | 96.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus108 | A | -0.022 | -0.007 | 100.6 | 95.0 | |
| | | | | | | | | | | B | -0.020 | -0.008 | 94.5 | 93.7 | |
| | | | | | | | | | | C | -0.025 | -0.006 | 114.1 | 97.0 | |
| | | | | | | | | | | N | | | 19.9 | | |
| Bus108 | 0.400 | A | 98.995 | 29.4 | 0 | 0 | 0.022 | 0.007 | Bus106 | A | -0.022 | -0.007 | 100.6 | 95.0 | |
| | | B | 99.027 | -90.5 | 0 | 0 | 0.020 | 0.008 | | B | -0.020 | -0.008 | 94.5 | 93.7 | |
| | | C | 99.000 | 149.3 | 0 | 0 | 0.025 | 0.006 | | C | -0.025 | -0.006 | 114.1 | 97.0 | |
| | | | | | | | | | | N | | | 19.9 | | |
| | | | | | | | | | Bus106 | A | -0.022 | -0.007 | 100.6 | 95.0 | |
| | | | | | | | | | | B | -0.020 | -0.008 | 94.5 | 93.7 | |
| | | | | | | | | | | C | -0.025 | -0.006 | 114.1 | 97.0 | |
| | | | | | | | | | | N | | | 19.9 | | |
| | | | | | | | | | Bus108 | A | -0.022 | -0.007 | 100.6 | 95.0 | |
| | | | | | | | | | | B | -0.020 | -0.008 | 94.5 | 93.7 | |
| | | | | | | | | | | C | -0.025 | -0.006 | 114.1 | 97.0 | |
| | | | | | | | | | | N | | | 19.9 | | |
| Bus113 | 33.000 | A | 99.821 | 0.0 | 0 | 0 | 0 | 0 | Bus90 | A | -0.112 | -0.050 | 6.5 | 91.2 | |
| | | B | 99.807 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.116 | -0.043 | 6.5 | 93.7 | |
| | | C | 99.839 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.120 | -0.050 | 6.8 | 92.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus114 | A | 0.112 | 0.050 | 6.5 | 91.2 | |
| | | | | | | | | | | B | 0.116 | 0.043 | 6.5 | 93.7 | |
| | | | | | | | | | | C | 0.120 | 0.050 | 6.8 | 92.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus114 | A | 0.112 | 0.050 | 6.5 | 91.2 | |
| | | | | | | | | | | B | 0.116 | 0.043 | 6.5 | 93.7 | |
| | | | | | | | | | | C | 0.120 | 0.050 | 6.8 | 92.4 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | | XFMR | |
|--------|--------|-------|---------|--------|------------|------|-------|-------|-----------|--------|--------|--------|-------|-------|-------|------|--|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap | | |
| Bus114 | 33.000 | A | 99.817 | 0.0 | 0 | 0 | 0 | 0 | Bus113 | A | -0.112 | -0.050 | 6.5 | 91.2 | | | |
| | | B | 99.803 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.116 | -0.043 | 6.5 | 93.7 | | | |
| | | C | 99.835 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.120 | -0.050 | 6.8 | 92.4 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | | Bus120 | A | 0.006 | 0.003 | 0.4 | 91.6 | | |
| | | | | | | | | | | | B | 0.009 | 0.002 | 0.5 | 98.7 | | |
| | | | | | | | | | | | C | 0.009 | 0.005 | 0.5 | 88.9 | | |
| | | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | | | Bus121 | A | 0.096 | 0.041 | 5.5 | 92.0 | |
| | | | | | | | | | | B | | 0.096 | 0.039 | 5.5 | 92.7 | | |
| | | | | | | | | | | C | | 0.098 | 0.040 | 5.6 | 92.5 | | |
| | | | | | | | | | | N | | | | 0.0 | | | |
| | | | | | | | | | | | Bus116 | A | 0.009 | 0.007 | 0.6 | 81.5 | |
| | | | | | | | | | | B | | 0.010 | 0.002 | 0.5 | 97.0 | | |
| | | | | | | | | | | C | | 0.013 | 0.005 | 0.7 | 93.5 | | |
| | | | | | | | | | | N | | | | 0.0 | | | |
| Bus116 | 0.400 | A | 99.534 | 29.8 | 0 | 0 | 0.006 | 0.003 | Bus114 | A | -0.006 | -0.003 | 30.4 | 92.8 | | | |
| | | B | 99.345 | -90.3 | 0 | 0 | 0.012 | 0.005 | | B | -0.012 | -0.005 | 55.6 | 93.3 | | | |
| | | C | 99.275 | 149.6 | 0 | 0 | 0.014 | 0.006 | | C | -0.014 | -0.006 | 64.8 | 92.7 | | | |
| | | | | | | | | | | N | | | 30.0 | | | | |
| Bus119 | 0.400 | A | 99.541 | 29.8 | 0 | 0 | 0.007 | 0.002 | Bus120 | A | -0.007 | -0.002 | 32.1 | 95.3 | | | |
| | | B | 99.475 | -90.3 | 0 | 0 | 0.011 | 0.002 | | B | -0.011 | -0.002 | 49.5 | 98.0 | | | |
| | | C | 99.551 | 149.8 | 0 | 0 | 0.006 | 0.003 | | C | -0.006 | -0.003 | 29.5 | 89.0 | | | |
| | | | | | | | | | | N | | | 17.7 | | | | |
| Bus120 | 33.000 | A | 99.816 | 0.0 | 0 | 0 | 0 | 0 | Bus114 | A | -0.006 | -0.003 | 0.4 | 91.6 | | | |
| | | B | 99.802 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.009 | -0.002 | 0.5 | 98.7 | | | |
| | | C | 99.834 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.009 | -0.005 | 0.5 | 88.9 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | | Bus119 | A | 0.006 | 0.003 | 0.4 | 91.6 | | |
| | | | | | | | | | | | B | 0.009 | 0.002 | 0.5 | 98.7 | | |
| | | | | | | | | | | | C | 0.009 | 0.005 | 0.5 | 88.9 | | |
| | | | | | | | | | | | N | | | 0.0 | | | |
| Bus121 | 33.000 | A | 99.810 | 0.0 | 0 | 0 | 0 | 0 | Bus124 | A | 0.027 | 0.009 | 1.5 | 95.4 | | | |
| | | B | 99.797 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.030 | 0.010 | 1.7 | 95.1 | | | |
| | | C | 99.828 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.028 | 0.012 | 1.6 | 91.6 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|------|------------|------|-------|-------|-----------|-------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus124 | 33.000 | A | 99.810 | 0.0 | 0 | 0 | 0 | 0 | Bus126 | A | 0.069 | 0.032 | 4.0 | 90.6 | |
| | | | | | | | | | | B | 0.066 | 0.029 | 3.8 | 91.5 | |
| | | | | | | | | | | C | 0.070 | 0.028 | 4.0 | 92.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus114 | A | -0.096 | -0.041 | 5.5 | 92.0 | |
| | | | | | | | | | | B | -0.096 | -0.039 | 5.5 | 92.7 | |
| | | | | | | | | | | C | -0.098 | -0.040 | 5.6 | 92.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | A | 99.810 | 0.0 | 0 | 0 | 0 | 0 | Bus121 | A | -0.027 | -0.009 | 1.5 | 95.4 | |
| | | | | | | | | | | B | -0.030 | -0.010 | 1.7 | 95.1 | |
| | | | | | | | | | | C | -0.028 | -0.012 | 1.6 | 91.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus125 | 0.400 | A | 99.210 | 29.5 | 0 | 0 | 0.029 | 0.007 | Bus125 | A | 0.027 | 0.009 | 1.5 | 95.4 | |
| | | | | | | | | | | B | 0.030 | 0.010 | 1.7 | 95.1 | |
| | | | | | | | | | | C | 0.028 | 0.012 | 1.6 | 91.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | A | 99.210 | 29.5 | 0 | 0 | 0.029 | 0.007 | Bus124 | A | -0.029 | -0.007 | 129.2 | 97.2 | |
| | | | | | | | | | | B | -0.029 | -0.011 | 135.8 | 93.3 | |
| | | | | | | | | | | C | -0.027 | -0.010 | 123.1 | 94.0 | |
| | | | | | | | | | | N | | | 5.7 | | |
| | | A | 99.806 | 0.0 | 0 | 0 | 0 | 0 | Bus127 | A | 0.044 | 0.024 | 2.6 | 87.4 | |
| | | | | | | | | | | B | 0.042 | 0.020 | 2.5 | 90.4 | |
| | | | | | | | | | | C | 0.047 | 0.021 | 2.7 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus126 | 33.000 | A | 99.804 | 0.0 | 0 | 0 | 0 | 0 | Bus121 | A | -0.069 | -0.032 | 4.0 | 90.6 | |
| | | | | | | | | | | B | -0.066 | -0.029 | 3.8 | 91.5 | |
| | | | | | | | | | | C | -0.070 | -0.028 | 4.0 | 92.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus142 | A | 0.025 | 0.008 | 1.4 | 95.4 | |
| | | | | | | | | | | B | 0.024 | 0.009 | 1.3 | 93.4 | |
| | | | | | | | | | | C | 0.024 | 0.007 | 1.3 | 95.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | A | 99.804 | 0.0 | 0 | 0 | 0 | 0 | Bus126 | A | -0.044 | -0.024 | 2.6 | 87.4 | |
| | | | | | | | | | | B | -0.042 | -0.020 | 2.5 | 90.4 | |
| | | | | | | | | | | C | -0.047 | -0.021 | 2.7 | 91.4 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Phase | Voltage | | Generation | | Load | | ID | Load Flow | | | | | XFMR | | | | | | | | | | |
|--------|--------|--------|---------|--------|------------|------|-------|-------|--------|-----------|--------|--------|--------|--------|-------|---|-------|-------|--------|-----|--------|--------|------|------|--|
| ID | kV | | % Mag. | Ang. | MW | Mvar | MW | Mvar | | Phase | MW | Mvar | Amp | % PF | % Tap | | | | | | | | | | |
| | | | | | | | | | | Bus132 | A | 0.035 | 0.019 | 2.1 | 87.8 | | | | | | | | | | |
| | | | | | | | | | | | B | 0.033 | 0.016 | 1.9 | 90.6 | | | | | | | | | | |
| | | | | | | | | | | | C | 0.037 | 0.016 | 2.1 | 91.8 | | | | | | | | | | |
| | | | | | | | | | | | N | | | 0.0 | | | | | | | | | | | |
| | | | | | | | | | | Bus129 | A | 0.009 | 0.005 | 0.5 | 85.7 | | | | | | | | | | |
| | | | | | | | | | | | B | 0.009 | 0.004 | 0.5 | 89.7 | | | | | | | | | | |
| | | | | | | | | | | | C | 0.010 | 0.005 | 0.6 | 89.7 | | | | | | | | | | |
| | | | | | | | | | | | N | | | 0.0 | | | | | | | | | | | |
| | | | | | | | | | | Bus129 | 0.400 | A | 99.425 | 29.8 | 0 | 0 | 0.008 | 0.004 | Bus127 | A | -0.008 | -0.004 | 39.1 | 90.0 | |
| | | | | | | | | | | | | B | 99.403 | -90.2 | 0 | 0 | 0.009 | 0.004 | | B | -0.009 | -0.004 | 43.5 | 90.0 | |
| | | | | | | | | | | | | C | 99.378 | 149.7 | 0 | 0 | 0.010 | 0.005 | | C | -0.010 | -0.005 | 47.8 | 90.0 | |
| | | | | | | | | | | | | N | | | | | | | | 7.5 | | | | | |
| | | | | | | | | | | Bus132 | 33.000 | A | 99.800 | 0.0 | 0 | 0 | 0 | 0 | Bus135 | A | 0.022 | 0.012 | 1.3 | 87.5 | |
| | | | | | | | | | | | | B | 99.787 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.022 | 0.012 | 1.3 | 87.5 | |
| | | | | | | | | | | | | C | 99.818 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.022 | 0.012 | 1.3 | 88.0 | |
| | | | | | | | | | | | | N | | | | | | | | 0.0 | | | | | |
| Bus127 | A | -0.035 | -0.019 | 2.1 | 87.8 | | | | | | | | | | | | | | | | | | | | |
| | B | -0.033 | -0.016 | 1.9 | 90.6 | | | | | | | | | | | | | | | | | | | | |
| | C | -0.037 | -0.016 | 2.1 | 91.8 | | | | | | | | | | | | | | | | | | | | |
| | N | | | 0.0 | | | | | | | | | | | | | | | | | | | | | |
| Bus134 | A | 0.000 | 0.000 | 0.0 | 0.0 | | | | | | | | | | | | | | | | | | | | |
| | B | 0.000 | 0.000 | 0.0 | 0.0 | | | | | | | | | | | | | | | | | | | | |
| | C | 0.000 | 0.000 | 0.0 | 0.0 | | | | | | | | | | | | | | | | | | | | |
| | N | | | 0.0 | | | | | | | | | | | | | | | | | | | | | |
| Bus133 | A | 0.013 | 0.007 | 0.7 | 88.2 | | | | | | | | | | | | | | | | | | | | |
| | B | 0.011 | 0.003 | 0.6 | 95.7 | | | | | | | | | | | | | | | | | | | | |
| | C | 0.015 | 0.004 | 0.8 | 96.6 | | | | | | | | | | | | | | | | | | | | |
| | N | | | 0.0 | | | | | | | | | | | | | | | | | | | | | |
| Bus133 | 0.400 | A | 99.382 | 29.7 | 0 | 0 | 0.010 | 0.004 | Bus132 | A | -0.010 | -0.004 | 45.6 | 92.1 | | | | | | | | | | | |
| | | B | 99.356 | -90.3 | 0 | 0 | 0.013 | 0.004 | | B | -0.013 | -0.004 | 58.2 | 96.2 | | | | | | | | | | | |
| | | C | 99.256 | 149.6 | 0 | 0 | 0.016 | 0.005 | | C | -0.016 | -0.005 | 71.3 | 95.5 | | | | | | | | | | | |
| | | N | | | | | | | | 19.1 | | | | | | | | | | | | | | | |
| Bus134 | 33.000 | A | 99.800 | 0.0 | 0 | 0 | 0 | 0 | Bus132 | A | 0.000 | 0.000 | 0.0 | 0.0 | | | | | | | | | | | |
| | | B | 99.787 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.000 | 0.000 | 0.0 | 0.0 | | | | | | | | | | | |
| | | C | 99.818 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.000 | 0.000 | 0.0 | 0.0 | | | | | | | | | | | |
| | | N | | | | | | | | 0.0 | | | | | | | | | | | | | | | |

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Engineer:
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| Bus | | Phase | Voltage | | Generation | | Load | | ID | Load Flow | | | | | XFMR | |
|--------|--------|-------|---------|--------|------------|------|-------|-------|--------|-----------|--------|--------|-------|------|-------|--|
| ID | kV | | % Mag. | Ang. | MW | Mvar | MW | Mvar | | Phase | MW | Mvar | Amp | % PF | % Tap | |
| Bus135 | 33.000 | A | 99.799 | 0.0 | 0 | 0 | 0 | 0 | Bus132 | A | -0.022 | -0.012 | 1.3 | 87.5 | | |
| | | B | 99.786 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.022 | -0.012 | 1.3 | 87.5 | | |
| | | C | 99.817 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.022 | -0.012 | 1.3 | 88.0 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus138 | A | 0.022 | 0.012 | 1.3 | 87.5 | | |
| | | | | | | | | | | B | 0.022 | 0.012 | 1.3 | 87.5 | | |
| | | | | | | | | | | C | 0.022 | 0.012 | 1.3 | 88.0 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| Bus138 | 33.000 | A | 99.796 | 0.0 | 0 | 0 | 0 | 0 | Bus135 | A | -0.022 | -0.012 | 1.3 | 87.5 | | |
| | | B | 99.783 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.022 | -0.012 | 1.3 | 87.5 | | |
| | | C | 99.814 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.022 | -0.012 | 1.3 | 88.0 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus139 | A | 0.022 | 0.012 | 1.3 | 87.5 | | |
| | | | | | | | | | | B | 0.022 | 0.012 | 1.3 | 87.5 | | |
| | | | | | | | | | | C | 0.022 | 0.012 | 1.3 | 88.0 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| Bus139 | 0.400 | A | 98.746 | 29.5 | 0 | 0 | 0.022 | 0.012 | Bus138 | A | -0.022 | -0.012 | 109.1 | 88.0 | | |
| | | B | 98.782 | -90.5 | 0 | 0 | 0.022 | 0.011 | | B | -0.022 | -0.011 | 109.1 | 89.0 | | |
| | | C | 98.797 | 149.5 | 0 | 0 | 0.022 | 0.011 | | C | -0.022 | -0.011 | 109.0 | 89.0 | | |
| | | | | | | | | | | N | | | 2.3 | | | |
| | | | | | | | | | | | | | | | | |
| Bus142 | 33.000 | A | 99.803 | 0.0 | 0 | 0 | 0 | 0 | Bus126 | A | -0.025 | -0.008 | 1.4 | 95.4 | | |
| | | B | 99.789 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.024 | -0.009 | 1.3 | 93.4 | | |
| | | C | 99.821 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.024 | -0.007 | 1.3 | 95.5 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus143 | A | 0.025 | 0.008 | 1.4 | 95.4 | | |
| | | | | | | | | | | B | 0.024 | 0.009 | 1.3 | 93.4 | | |
| | | | | | | | | | | C | 0.024 | 0.007 | 1.3 | 95.5 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| Bus143 | 0.400 | A | 98.901 | 29.4 | 0 | 0 | 0.024 | 0.008 | Bus142 | A | -0.024 | -0.008 | 109.8 | 94.7 | | |
| | | B | 98.908 | -90.6 | 0 | 0 | 0.023 | 0.008 | | B | -0.023 | -0.008 | 108.5 | 94.0 | | |
| | | C | 99.024 | 149.3 | 0 | 0 | 0.025 | 0.006 | | C | -0.025 | -0.006 | 112.4 | 97.5 | | |
| | | | | | | | | | | N | | | 12.3 | | | |
| | | | | | | | | | | | | | | | | |
| Bus145 | 33.000 | A | 99.925 | 0.0 | 0 | 0 | 0 | 0 | Bus146 | A | 0.237 | 0.090 | 13.3 | 93.5 | | |
| | | B | 99.911 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.247 | 0.111 | 14.2 | 91.2 | | |
| | | C | 99.943 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.224 | 0.109 | 13.1 | 89.8 | | |
| | | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | | | | | | | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus146 | 33.000 | A | 99.922 | 0.0 | 0 | 0 | 0 | 0 | Bus9 | A | -0.237 | -0.090 | 13.3 | 93.5 | |
| | | | | | | | | | | B | -0.247 | -0.111 | 14.2 | 91.2 | |
| | | | | | | | | | | C | -0.224 | -0.109 | 13.1 | 89.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | B | 99.908 | -120.0 | 0 | 0 | 0 | 0 | Bus152 | A | 0.032 | 0.014 | 1.9 | 91.3 | |
| | | | | | | | | | | B | 0.029 | 0.016 | 1.7 | 88.2 | |
| | | | | | | | | | | C | 0.030 | 0.012 | 1.7 | 92.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | C | 99.940 | 120.0 | 0 | 0 | 0 | 0 | Bus145 | A | -0.237 | -0.090 | 13.3 | 93.5 | |
| | | | | | | | | | | B | -0.247 | -0.111 | 14.2 | 91.2 | |
| | | | | | | | | | | C | -0.224 | -0.109 | 13.1 | 89.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus172 | A | 0.180 | 0.064 | 10.0 | 94.3 | |
| | | | | | | | | | | B | 0.192 | 0.082 | 11.0 | 91.9 | |
| | | | | | | | | | | C | 0.170 | 0.083 | 9.9 | 89.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus151 | A | 0.006 | 0.002 | 0.3 | 95.3 | |
| | | | | | | | | | | B | 0.006 | 0.003 | 0.3 | 89.8 | |
| | | | | | | | | | | C | 0.005 | 0.002 | 0.3 | 91.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus148 | A | 0.018 | 0.010 | 1.1 | 87.7 | |
| | | | | | | | | | | B | 0.020 | 0.010 | 1.2 | 89.2 | |
| | | | | | | | | | | C | 0.019 | 0.012 | 1.2 | 85.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus148 | 0.400 | A | 99.078 | 29.5 | 0 | 0 | 0.019 | 0.009 | Bus146 | A | -0.019 | -0.009 | 91.4 | 90.6 | |
| | | B | 98.993 | -90.4 | 0 | 0 | 0.020 | 0.011 | | B | -0.020 | -0.011 | 98.1 | 88.1 | |
| | | C | 99.056 | 149.6 | 0 | 0 | 0.018 | 0.010 | | C | -0.018 | -0.010 | 90.4 | 86.2 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus150 | 0.400 | A | 99.685 | 29.8 | 0 | 0 | 0.006 | 0.002 | Bus151 | A | -0.006 | -0.002 | 26.7 | 95.0 | |
| | | B | 99.704 | -90.1 | 0 | 0 | 0.005 | 0.002 | | B | -0.005 | -0.002 | 23.7 | 91.1 | |
| | | C | 99.762 | 149.9 | 0 | 0 | 0.005 | 0.001 | | C | -0.005 | -0.001 | 23.0 | 96.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus151 | 33.000 | A | 99.921 | 0.0 | 0 | 0 | 0 | 0 | Bus146 | A | -0.006 | -0.002 | 0.3 | 95.3 | |
| | | B | 99.907 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.006 | -0.003 | 0.3 | 89.8 | |
| | | C | 99.940 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.005 | -0.002 | 0.3 | 91.5 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|--------|------------|-------|--------|--------|-----------|--------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus152 | 33.000 | A | 99.922 | 0.0 | 0 | 0 | 0 | 0 | Bus150 | A | 0.006 | 0.002 | 0.3 | 95.3 | |
| | | | | | | | | | B | 0.006 | 0.003 | 0.3 | 89.8 | | |
| | | | | | | | | | C | 0.005 | 0.002 | 0.3 | 91.5 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | B | 99.908 | -120.0 | 0 | 0 | 0 | 0 | Bus146 | A | -0.032 | -0.014 | 1.9 | 91.3 | |
| | | | | | | | | | B | -0.029 | -0.016 | 1.7 | 88.2 | | |
| | | | | | | | | | C | -0.030 | -0.012 | 1.7 | 92.2 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | C | 99.940 | 120.0 | 0 | 0 | 0 | 0 | Bus155 | A | 0.030 | 0.013 | 1.7 | 91.1 | |
| | | | | | | | | | B | 0.027 | 0.014 | 1.6 | 88.9 | | |
| | | | | | | | | | C | 0.028 | 0.012 | 1.6 | 92.2 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | N | | | | | | | Bus154 | A | 0.003 | 0.001 | 0.2 | 93.8 | |
| | | | | | | | | | B | 0.002 | 0.002 | 0.1 | 79.6 | | |
| | | | | | | | | | C | 0.002 | 0.001 | 0.1 | 93.2 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| A | 99.791 | 29.9 | 0 | 0 | 0.003 | 0.001 | Bus152 | A | -0.003 | -0.001 | 11.9 | 91.6 | | | |
| | | | | | | | B | -0.002 | -0.001 | 8.1 | 89.6 | | | | |
| | | | | | | | C | -0.002 | 0.000 | 10.2 | 99.5 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| B | 99.839 | -90.0 | 0 | 0 | 0.002 | 0.001 | Bus158 | A | 0.024 | 0.012 | 1.4 | 90.0 | | | |
| | | | | | | | B | 0.022 | 0.011 | 1.3 | 88.6 | | | | |
| | | | | | | | C | 0.023 | 0.010 | 1.3 | 92.3 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| C | 99.871 | 149.9 | 0 | 0 | 0.002 | 0 | Bus152 | A | -0.030 | -0.013 | 1.7 | 91.1 | | | |
| | | | | | | | B | -0.027 | -0.014 | 1.6 | 88.9 | | | | |
| | | | | | | | C | -0.028 | -0.012 | 1.6 | 92.2 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| N | | | | | | | Bus157 | A | 0.006 | 0.002 | 0.3 | 95.3 | | | |
| | | | | | | | B | 0.006 | 0.003 | 0.3 | 89.8 | | | | |
| | | | | | | | C | 0.005 | 0.002 | 0.3 | 91.5 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| A | 99.682 | 29.8 | 0 | 0 | 0.006 | 0.002 | Bus155 | A | -0.006 | -0.002 | 26.7 | 95.0 | | | |
| | | | | | | | B | -0.005 | -0.002 | 23.7 | 91.1 | | | | |
| | | | | | | | C | -0.005 | -0.001 | 23.0 | 96.8 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| B | 99.702 | -90.1 | 0 | 0 | 0.005 | 0.002 | Bus155 | A | -0.006 | -0.002 | 26.7 | 95.0 | | | |
| | | | | | | | B | -0.005 | -0.002 | 23.7 | 91.1 | | | | |
| | | | | | | | C | -0.005 | -0.001 | 23.0 | 96.8 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| C | 99.760 | 149.9 | 0 | 0 | 0.005 | 0.001 | Bus155 | A | -0.006 | -0.002 | 26.7 | 95.0 | | | |
| | | | | | | | B | -0.005 | -0.002 | 23.7 | 91.1 | | | | |
| | | | | | | | C | -0.005 | -0.001 | 23.0 | 96.8 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |
| N | | | | | | | Bus155 | A | -0.006 | -0.002 | 26.7 | 95.0 | | | |
| | | | | | | | B | -0.005 | -0.002 | 23.7 | 91.1 | | | | |
| | | | | | | | C | -0.005 | -0.001 | 23.0 | 96.8 | | | | |
| | | | | | | | N | | | 0.0 | | | | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus158 | 33.000 | A | 99.918 | 0.0 | 0 | 0 | 0 | 0 | Bus155 | A | -0.024 | -0.012 | 1.4 | 90.0 | |
| | | B | 99.904 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.022 | -0.011 | 1.3 | 88.6 | |
| | | C | 99.937 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.023 | -0.010 | 1.3 | 92.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus159 | A | 0.024 | 0.012 | 1.4 | 90.0 | |
| | | | | | | | | | | B | 0.022 | 0.011 | 1.3 | 88.6 | |
| | | | | | | | | | | C | 0.023 | 0.010 | 1.3 | 92.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus159 | 33.000 | A | 99.916 | 0.0 | 0 | 0 | 0 | 0 | Bus160 | A | 0.024 | 0.012 | 1.4 | 90.0 | |
| | | B | 99.902 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.022 | 0.011 | 1.3 | 88.6 | |
| | | C | 99.935 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.023 | 0.010 | 1.3 | 92.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus158 | A | -0.024 | -0.012 | 1.4 | 90.0 | |
| | | | | | | | | | | B | -0.022 | -0.011 | 1.3 | 88.6 | |
| | | | | | | | | | | C | -0.023 | -0.010 | 1.3 | 92.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus160 | 33.000 | A | 99.914 | 0.0 | 0 | 0 | 0 | 0 | Bus163 | A | 0.016 | 0.006 | 0.9 | 93.3 | |
| | | B | 99.900 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.015 | 0.007 | 0.9 | 90.0 | |
| | | C | 99.934 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.015 | 0.006 | 0.8 | 93.1 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus159 | A | -0.024 | -0.012 | 1.4 | 90.0 | |
| | | | | | | | | | | B | -0.022 | -0.011 | 1.3 | 88.6 | |
| | | | | | | | | | | C | -0.023 | -0.010 | 1.3 | 92.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus162 | 0.400 | | | | | | | | Bus162 | A | 0.008 | 0.005 | 0.5 | 82.3 | |
| | | | | | | | | | | B | 0.007 | 0.004 | 0.4 | 85.5 | |
| | | | | | | | | | | C | 0.008 | 0.004 | 0.5 | 90.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | A | 99.555 | 29.8 | 0 | 0 | 0.007 | 0.004 | Bus160 | A | -0.007 | -0.004 | 34.7 | 86.7 | |
| | | B | 99.614 | -90.2 | 0 | 0 | 0.007 | 0.003 | | B | -0.007 | -0.003 | 32.6 | 90.3 | |
| | | C | 99.515 | 149.8 | 0 | 0 | 0.009 | 0.005 | | C | -0.009 | -0.005 | 43.4 | 88.0 | |
| | | | | | | | | | | N | | | 7.9 | | |
| Bus163 | 33.000 | A | 99.913 | 0.0 | 0 | 0 | 0 | 0 | Bus160 | A | -0.016 | -0.006 | 0.9 | 93.3 | |
| | | B | 99.899 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.015 | -0.007 | 0.9 | 90.0 | |
| | | C | 99.933 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.015 | -0.006 | 0.8 | 93.1 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR | | |
|--------|--------|--------|---------|--------|------------|--------|------|------|-----------|--------|--------|--------|--------|--------|-------|------|--|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap | | |
| | | | | | | | | | Bus166 | A | 0.004 | 0.002 | 0.2 | 89.5 | | | |
| | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.9 | | | |
| | | | | | | | | | | C | 0.005 | 0.003 | 0.3 | 85.3 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |
| | | | | | | | | | | Bus165 | A | 0.012 | 0.004 | 0.7 | 94.4 | | |
| | | | | | | | | | | | B | 0.009 | 0.006 | 0.6 | 85.9 | | |
| | | | | | | | | | | | C | 0.010 | 0.003 | 0.5 | 96.4 | | |
| | | | | | | | | | | | N | | | 0.0 | | | |
| | | Bus165 | 0.400 | A | 99.421 | 29.7 | 0 | 0 | 0.012 | 0.005 | Bus163 | A | -0.012 | -0.005 | 56.5 | 93.6 | |
| | | | | B | 99.612 | -90.2 | 0 | 0 | 0.007 | 0.003 | | B | -0.007 | -0.003 | 34.7 | 92.7 | |
| | | | | C | 99.526 | 149.7 | 0 | 0 | 0.011 | 0.004 | | C | -0.011 | -0.004 | 50.8 | 95.3 | |
| | | | | | | | | | | N | | | | 16.9 | | | |
| | Bus166 | 33.000 | A | 99.913 | 0.0 | 0 | 0 | 0 | 0 | Bus167 | A | 0.004 | 0.002 | 0.2 | 89.5 | | |
| | | | B | 99.899 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.005 | 0.002 | 0.3 | 95.9 | | |
| | | | C | 99.932 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.005 | 0.003 | 0.3 | 85.3 | | |
| | | | | | | | | | N | | | | 0.0 | | | | |
| | | | | | | | | | Bus163 | A | -0.004 | -0.002 | 0.2 | 89.5 | | | |
| | | | | | | | | | | B | -0.005 | -0.002 | 0.3 | 95.9 | | | |
| | | | | | | | | | | C | -0.005 | -0.003 | 0.3 | 85.3 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |
| | | Bus167 | 33.000 | A | 99.913 | 0.0 | 0 | 0 | 0 | 0 | Bus166 | A | -0.004 | -0.002 | 0.2 | 89.5 | |
| | | | | B | 99.899 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.005 | -0.002 | 0.3 | 95.9 | |
| | | | | C | 99.932 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.005 | -0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | | 0.0 | | | |
| | | | | | | | | | | Bus168 | A | 0.004 | 0.002 | 0.2 | 89.5 | | |
| | | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.9 | | |
| | | | | | | | | | | | C | 0.005 | 0.003 | 0.3 | 85.3 | | |
| | | | | | | | | | | | N | | | 0.0 | | | |
| Bus168 | 33.000 | A | 99.913 | 0.0 | 0 | 0 | 0 | 0 | Bus167 | A | -0.004 | -0.002 | 0.2 | 89.5 | | | |
| | | B | 99.899 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.005 | -0.002 | 0.3 | 95.9 | | | |
| | | C | 99.932 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.005 | -0.003 | 0.3 | 85.3 | | | |
| | | | | | | | | N | | | | 0.0 | | | | | |
| | | | | | | | | | Bus171 | A | 0.004 | 0.002 | 0.2 | 89.5 | | | |
| | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.9 | | | |
| | | | | | | | | | | C | 0.005 | 0.003 | 0.3 | 85.3 | | | |
| | | | | | | | | | | N | | | 0.0 | | | | |

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| Bus | | Phase | Voltage | | Generation | | Load | | ID | Load Flow | | | | XFMR | |
|--------|--------|-------|---------|--------|------------|------|-------|-------|--------|-----------|--------|--------|------|------|-------|
| ID | kV | | % Mag. | Ang. | MW | Mvar | MW | Mvar | | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus170 | 0.400 | A | 99.619 | 29.8 | 0 | 0 | 0.004 | 0.001 | Bus171 | A | -0.004 | -0.001 | 18.7 | 95.8 | |
| | | B | 99.472 | -90.2 | 0 | 0 | 0.006 | 0.002 | | B | -0.006 | -0.002 | 27.8 | 92.3 | |
| | | C | 99.586 | 149.9 | 0 | 0 | 0.004 | 0.002 | | C | -0.004 | -0.002 | 20.4 | 89.0 | |
| | | | | | | | | | | N | | | 5.6 | | |
| Bus171 | 33.000 | A | 99.912 | 0.0 | 0 | 0 | 0 | 0 | Bus168 | A | -0.004 | -0.002 | 0.2 | 89.5 | |
| | | B | 99.898 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.005 | -0.002 | 0.3 | 95.9 | |
| | | C | 99.931 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.005 | -0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus170 | A | 0.004 | 0.002 | 0.2 | 89.5 | |
| | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.9 | |
| | | | | | | | | | | C | 0.005 | 0.003 | 0.3 | 85.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus172 | 33.000 | A | 99.917 | 0.0 | 0 | 0 | 0 | 0 | Bus146 | A | -0.180 | -0.064 | 10.0 | 94.3 | |
| | | B | 99.902 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.192 | -0.082 | 11.0 | 91.9 | |
| | | C | 99.936 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.170 | -0.083 | 9.9 | 89.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus173 | A | 0.180 | 0.064 | 10.0 | 94.3 | |
| | | | | | | | | | | B | 0.192 | 0.082 | 11.0 | 91.9 | |
| | | | | | | | | | | C | 0.170 | 0.083 | 9.9 | 89.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus173 | 33.000 | A | 99.893 | 0.0 | 0 | 0 | 0 | 0 | Bus176 | A | 0.161 | 0.058 | 9.0 | 94.1 | |
| | | B | 99.876 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.174 | 0.075 | 9.9 | 91.9 | |
| | | C | 99.912 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.153 | 0.077 | 9.0 | 89.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus172 | A | -0.180 | -0.064 | 10.0 | 94.3 | |
| | | | | | | | | | | B | -0.192 | -0.082 | 11.0 | 91.9 | |
| | | | | | | | | | | C | -0.170 | -0.083 | 9.9 | 89.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus175 | A | 0.019 | 0.006 | 1.0 | 95.8 | |
| | | | | | | | | | | B | 0.018 | 0.008 | 1.0 | 92.2 | |
| | | | | | | | | | | C | 0.017 | 0.006 | 0.9 | 94.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus175 | 0.400 | A | 98.624 | 29.3 | 0 | 0 | 0.020 | 0.005 | Bus173 | A | -0.020 | -0.005 | 88.6 | 96.6 | |
| | | B | 98.737 | -90.5 | 0 | 0 | 0.015 | 0.007 | | B | -0.015 | -0.007 | 73.3 | 92.1 | |
| | | C | 98.667 | 149.4 | 0 | 0 | 0.019 | 0.006 | | C | -0.019 | -0.006 | 85.1 | 95.5 | |
| | | | | | | | | | | N | | | 17.8 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | XFMR | |
|--------|--------|---------|--------|--------|------------|------|-------|-------|-----------|-------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus176 | 33.000 | A | 99.887 | 0.0 | 0 | 0 | 0 | 0 | Bus173 | A | -0.161 | -0.058 | 9.0 | 94.1 | |
| | | B | 99.869 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.174 | -0.075 | 9.9 | 91.9 | |
| | | C | 99.905 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.153 | -0.077 | 9.0 | 89.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus179 | A | 0.014 | 0.005 | 0.8 | 94.5 | |
| | | | | | | | | | | B | 0.014 | 0.005 | 0.8 | 94.0 | |
| | | | | | | | | | | C | 0.013 | 0.005 | 0.7 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus180 | A | 0.148 | 0.053 | 8.2 | 94.1 | |
| | | | | | | | | | | B | 0.160 | 0.070 | 9.2 | 91.7 | |
| | | | | | | | | | | C | 0.140 | 0.072 | 8.3 | 88.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus178 | 0.400 | A | 98.946 | 29.5 | 0 | 0 | 0.014 | 0.004 | Bus179 | A | -0.014 | -0.004 | 62.3 | 95.2 | |
| | | B | 98.951 | -90.4 | 0 | 0 | 0.013 | 0.005 | | B | -0.013 | -0.005 | 62.0 | 94.4 | |
| | | C | 99.000 | 149.6 | 0 | 0 | 0.013 | 0.004 | | C | -0.013 | -0.004 | 60.9 | 94.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus179 | 33.000 | A | 99.886 | 0.0 | 0 | 0 | 0 | 0 | Bus176 | A | -0.014 | -0.005 | 0.8 | 94.5 | |
| | | B | 99.868 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.014 | -0.005 | 0.8 | 94.0 | |
| | | C | 99.904 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.013 | -0.005 | 0.7 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus178 | A | 0.014 | 0.005 | 0.8 | 94.5 | |
| | | | | | | | | | | B | 0.014 | 0.005 | 0.8 | 94.0 | |
| | | | | | | | | | | C | 0.013 | 0.005 | 0.7 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus176 | A | -0.148 | -0.053 | 8.2 | 94.1 | |
| | | | | | | | | | | B | -0.160 | -0.070 | 9.2 | 91.7 | |
| | | | | | | | | | | C | -0.140 | -0.072 | 8.3 | 88.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus180 | 33.000 | A | 99.874 | 0.0 | 0 | 0 | 0 | 0 | Bus176 | A | -0.148 | -0.053 | 8.2 | 94.1 | |
| | | B | 99.854 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.160 | -0.070 | 9.2 | 91.7 | |
| | | C | 99.892 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.140 | -0.072 | 8.3 | 88.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus194 | A | 0.077 | 0.030 | 4.4 | 93.1 | |
| | | | | | | | | | | B | 0.072 | 0.033 | 4.2 | 91.1 | |
| | | | | | | | | | | C | 0.073 | 0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus181 | A | 0.055 | 0.018 | 3.0 | 95.0 | |
| | | | | | | | | | | B | 0.065 | 0.033 | 3.8 | 89.4 | |
| | | | | | | | | | | C | 0.047 | 0.034 | 3.1 | 81.4 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|------|------------|------|-------|-------|-----------|-------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus181 | 33.000 | A | 99.867 | 0.0 | 0 | 0 | 0 | 0 | Bus208 | A | 0.015 | 0.005 | 0.8 | 95.3 | |
| | | | | | | | | | | B | 0.023 | 0.004 | 1.2 | 98.2 | |
| | | | | | | | | | | C | 0.019 | 0.011 | 1.2 | 86.3 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus181 | 33.000 | A | 99.867 | 0.0 | 0 | 0 | 0 | 0 | Bus184 | A | 0.010 | 0.004 | 0.6 | 93.9 | |
| | | | | | | | | | | B | 0.009 | 0.005 | 0.6 | 86.7 | |
| | | | | | | | | | | C | 0.008 | 0.003 | 0.5 | 92.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus181 | 33.000 | A | 99.867 | 0.0 | 0 | 0 | 0 | 0 | Bus180 | A | -0.055 | -0.018 | 3.0 | 95.0 | |
| | | | | | | | | | | B | -0.065 | -0.033 | 3.8 | 89.4 | |
| | | | | | | | | | | C | -0.047 | -0.034 | 3.1 | 81.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus181 | 33.000 | A | 99.867 | 0.0 | 0 | 0 | 0 | 0 | Bus183 | A | 0.045 | 0.014 | 2.5 | 95.3 | |
| | | | | | | | | | | B | 0.056 | 0.027 | 3.3 | 89.8 | |
| | | | | | | | | | | C | 0.039 | 0.030 | 2.6 | 78.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus183 | 0.400 | A | 97.958 | 28.6 | 0 | 0 | 0.053 | 0.016 | Bus181 | A | -0.053 | -0.016 | 245.5 | 95.9 | |
| | | | | | | | | | | B | -0.047 | -0.032 | 253.8 | 83.3 | |
| | | | | | | | | | | C | -0.037 | -0.019 | 183.6 | 88.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus184 | 33.000 | A | 99.867 | 0.0 | 0 | 0 | 0 | 0 | Bus181 | A | -0.010 | -0.004 | 0.6 | 93.9 | |
| | | | | | | | | | | B | -0.009 | -0.005 | 0.6 | 86.7 | |
| | | | | | | | | | | C | -0.008 | -0.003 | 0.5 | 92.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus184 | 33.000 | A | 99.867 | 0.0 | 0 | 0 | 0 | 0 | Bus185 | A | 0.010 | 0.004 | 0.6 | 93.9 | |
| | | | | | | | | | | B | 0.009 | 0.005 | 0.6 | 86.7 | |
| | | | | | | | | | | C | 0.008 | 0.003 | 0.5 | 92.5 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus185 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus189 | A | 0.005 | 0.002 | 0.3 | 92.0 | |
| | | | | | | | | | | B | 0.004 | 0.002 | 0.2 | 81.5 | |
| | | | | | | | | | | C | 0.004 | 0.001 | 0.2 | 93.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus185 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus184 | A | -0.010 | -0.004 | 0.6 | 93.9 | |
| | | | | | | | | | | B | -0.009 | -0.005 | 0.6 | 86.7 | |
| | | | | | | | | | | C | -0.008 | -0.003 | 0.5 | 92.5 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | | Voltage | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|-------|---------|--------|------------|------|-------|-------|-----------|--------|--------|--------|------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus188 | | | | | | | | | A | 0.006 | 0.002 | 0.3 | 95.3 | | |
| | | | | | | | | | B | 0.006 | 0.003 | 0.3 | 89.8 | | |
| | | | | | | | | | C | 0.005 | 0.002 | 0.3 | 91.5 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus188 | 0.400 | A | 99.625 | 29.8 | 0 | 0 | 0.006 | 0.002 | Bus185 | A | -0.006 | -0.002 | 26.7 | 95.0 | |
| | | B | 99.643 | -90.1 | 0 | 0 | 0.005 | 0.002 | | B | -0.005 | -0.002 | 23.7 | 91.1 | |
| | | C | 99.709 | 149.8 | 0 | 0 | 0.005 | 0.001 | | C | -0.005 | -0.001 | 23.0 | 96.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus189 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus193 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | B | 99.844 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | C | 99.883 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus185 | | | | | | | | | A | -0.005 | -0.002 | 0.3 | 92.0 | | |
| | | | | | | | | | B | -0.004 | -0.002 | 0.2 | 81.5 | | |
| | | | | | | | | | C | -0.004 | -0.001 | 0.2 | 93.8 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus192 | | | | | | | | | A | 0.005 | 0.002 | 0.3 | 92.0 | | |
| | | | | | | | | | B | 0.004 | 0.002 | 0.2 | 81.5 | | |
| | | | | | | | | | C | 0.004 | 0.001 | 0.2 | 93.8 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus191 | 0.400 | A | 99.655 | 29.9 | 0 | 0 | 0.005 | 0.002 | Bus192 | A | -0.005 | -0.002 | 22.6 | 94.7 | |
| | | B | 99.758 | -90.1 | 0 | 0 | 0.002 | 0.001 | | B | -0.002 | -0.001 | 10.8 | 91.9 | |
| | | C | 99.702 | 149.9 | 0 | 0 | 0.004 | 0.002 | | C | -0.004 | -0.002 | 19.5 | 91.0 | |
| | | | | | | | | | | N | | | 12.2 | | |
| Bus192 | 33.000 | A | 99.865 | 0.0 | 0 | 0 | 0 | 0 | Bus189 | A | -0.005 | -0.002 | 0.3 | 92.0 | |
| | | B | 99.844 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.004 | -0.002 | 0.2 | 81.5 | |
| | | C | 99.883 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.004 | -0.001 | 0.2 | 93.8 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus191 | | | | | | | | | A | 0.005 | 0.002 | 0.3 | 92.0 | | |
| | | | | | | | | | B | 0.004 | 0.002 | 0.2 | 81.5 | | |
| | | | | | | | | | C | 0.004 | 0.001 | 0.2 | 93.8 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus193 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus189 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | B | 99.844 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | C | 99.883 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|--------|------------|------|------|------|-----------|-------|--------|--------|-----|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus194 | 33.000 | A | 99.872 | 0.0 | 0 | 0 | 0 | 0 | Bus180 | A | -0.077 | -0.030 | 4.4 | 93.1 | |
| | | B | 99.852 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.072 | -0.033 | 4.2 | 91.1 | |
| | | C | 99.890 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.073 | -0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus195 | A | 0.077 | 0.030 | 4.4 | 93.1 | |
| | | | | | | | | | | B | 0.072 | 0.033 | 4.2 | 91.1 | |
| | | | | | | | | | | C | 0.073 | 0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus195 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus196 | A | 0.077 | 0.030 | 4.4 | 93.1 | |
| | | B | 99.847 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.072 | 0.033 | 4.2 | 91.1 | |
| | | C | 99.885 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.073 | 0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus194 | A | -0.077 | -0.030 | 4.4 | 93.1 | |
| | | | | | | | | | | B | -0.072 | -0.033 | 4.2 | 91.1 | |
| | | | | | | | | | | C | -0.073 | -0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus196 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus195 | A | -0.077 | -0.030 | 4.4 | 93.1 | |
| | | B | 99.847 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.072 | -0.033 | 4.2 | 91.1 | |
| | | C | 99.885 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.073 | -0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus197 | A | 0.077 | 0.030 | 4.4 | 93.1 | |
| | | | | | | | | | | B | 0.072 | 0.033 | 4.2 | 91.1 | |
| | | | | | | | | | | C | 0.073 | 0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus197 | 33.000 | A | 99.866 | 0.0 | 0 | 0 | 0 | 0 | Bus198 | A | 0.039 | 0.017 | 2.2 | 91.8 | |
| | | B | 99.846 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.038 | 0.019 | 2.3 | 89.8 | |
| | | C | 99.884 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.037 | 0.017 | 2.1 | 90.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus209 | A | 0.038 | 0.013 | 2.1 | 94.3 | |
| | | | | | | | | | | B | 0.034 | 0.014 | 1.9 | 92.5 | |
| | | | | | | | | | | C | 0.036 | 0.010 | 2.0 | 96.4 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus196 | A | -0.077 | -0.030 | 4.4 | 93.1 | |
| | | | | | | | | | | B | -0.072 | -0.033 | 4.2 | 91.1 | |
| | | | | | | | | | | C | -0.073 | -0.027 | 4.1 | 93.7 | |
| | | | | | | | | | | N | | | 0.0 | | |

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| Bus | | Phase | Voltage | | Generation | | Load | | ID | Load Flow | | | | XFMR | |
|--------|--------|-------|---------|--------|------------|------|-------|-------|--------|-----------|--------|--------|-------|------|-------|
| ID | kV | | % Mag. | Ang. | MW | Mvar | MW | Mvar | | Phase | MW | Mvar | Amp | % PF | % Tap |
| Bus198 | 33.000 | A | 99.864 | 0.0 | 0 | 0 | 0 | 0 | Bus197 | A | -0.039 | -0.017 | 2.2 | 91.8 | |
| | | B | 99.845 | -120.0 | 0 | 0 | 0 | 0 | | B | -0.038 | -0.019 | 2.3 | 89.8 | |
| | | C | 99.882 | 120.0 | 0 | 0 | 0 | 0 | | C | -0.037 | -0.017 | 2.1 | 90.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus200 | A | 0.039 | 0.017 | 2.2 | 91.8 | |
| | | | | | | | | | | B | 0.038 | 0.019 | 2.3 | 89.8 | |
| | | | | | | | | | | C | 0.037 | 0.017 | 2.1 | 90.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus200 | 0.400 | A | 98.967 | 29.3 | 0 | 0 | 0.039 | 0.017 | Bus198 | A | -0.039 | -0.017 | 185.9 | 91.8 | |
| | | B | 98.987 | -90.6 | 0 | 0 | 0.037 | 0.017 | | B | -0.037 | -0.017 | 178.7 | 90.6 | |
| | | C | 99.067 | 149.3 | 0 | 0 | 0.038 | 0.015 | | C | -0.038 | -0.015 | 177.7 | 92.6 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus201 | 33.000 | A | 99.862 | 0.0 | 0 | 0 | 0 | 0 | Bus204 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | B | 99.843 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | C | 99.881 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus209 | A | -0.004 | -0.003 | 0.3 | 81.7 | |
| | | | | | | | | | | B | -0.005 | -0.002 | 0.3 | 95.1 | |
| | | | | | | | | | | C | -0.006 | -0.003 | 0.3 | 90.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus203 | A | 0.004 | 0.003 | 0.3 | 81.7 | |
| | | | | | | | | | | B | 0.005 | 0.002 | 0.3 | 95.1 | |
| | | | | | | | | | | C | 0.006 | 0.003 | 0.3 | 90.9 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus203 | 0.400 | A | 99.672 | 29.9 | 0 | 0 | 0.004 | 0.002 | Bus201 | A | -0.004 | -0.002 | 18.4 | 91.6 | |
| | | B | 99.679 | -90.1 | 0 | 0 | 0.005 | 0.001 | | B | -0.005 | -0.001 | 24.0 | 97.1 | |
| | | C | 99.636 | 149.9 | 0 | 0 | 0.005 | 0.003 | | C | -0.005 | -0.003 | 24.7 | 87.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| Bus204 | 33.000 | A | 99.862 | 0.0 | 0 | 0 | 0 | 0 | Bus201 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | B | 99.843 | -120.0 | 0 | 0 | 0 | 0 | | B | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | C | 99.881 | 120.0 | 0 | 0 | 0 | 0 | | C | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | N | | | 0.0 | | |
| | | | | | | | | | Bus205 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | B | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | C | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | | N | | | 0.0 | | |

Project:
Location:
Contract:
Engineer:
Filename: unbalance

ETAP
12.6.0H

Study Case: ULF

Page: 33
Date: 05-02-2017
SN:
Revision: Base
Config.: Normal

| Bus | | Voltage | | | Generation | | Load | | Load Flow | | | | | | XFMR |
|--------|--------|---------|--------|--------|------------|------|-------|-------|-----------|--------|--------|--------|-------|------|-------|
| ID | kV | Phase | % Mag. | Ang. | MW | Mvar | MW | Mvar | ID | Phase | MW | Mvar | Amp | % PF | % Tap |
| | | | | | | | | | Bus206 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | | | | | | | | B | 0.000 | 0.000 | 0.0 | 0.0 | | |
| | | | | | | | | | C | 0.000 | 0.000 | 0.0 | 0.0 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus205 | 33.000 | A | 99.862 | 0.0 | 0 | 0 | 0 | 0 | Bus204 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | B | 99.843 | -120.0 | 0 | 0 | 0 | 0 | B | 0.000 | 0.000 | 0.0 | 0.0 | | |
| | | C | 99.881 | 120.0 | 0 | 0 | 0 | 0 | C | 0.000 | 0.000 | 0.0 | 0.0 | | |
| | | N | | | | | | | N | | | 0.0 | | | |
| Bus206 | 33.000 | A | 99.862 | 0.0 | 0 | 0 | 0 | 0 | Bus204 | A | 0.000 | 0.000 | 0.0 | 0.0 | |
| | | B | 99.843 | -120.0 | 0 | 0 | 0 | 0 | B | 0.000 | 0.000 | 0.0 | 0.0 | | |
| | | C | 99.881 | 120.0 | 0 | 0 | 0 | 0 | C | 0.000 | 0.000 | 0.0 | 0.0 | | |
| | | N | | | | | | | N | | | 0.0 | | | |
| Bus208 | 0.400 | A | 99.643 | 29.6 | 0 | 0 | 0.019 | 0.002 | Bus180 | A | -0.019 | -0.002 | 81.0 | 99.6 | |
| | | B | 99.418 | -90.4 | 0 | 0 | 0.023 | 0.008 | B | -0.023 | -0.008 | 105.2 | 94.4 | | |
| | | C | 99.487 | 149.7 | 0 | 0 | 0.015 | 0.009 | C | -0.015 | -0.009 | 75.4 | 87.1 | | |
| | | N | | | | | | | N | | | 0.0 | | | |
| Bus209 | 33.000 | A | 99.862 | 0.0 | 0 | 0 | 0 | 0 | Bus201 | A | 0.004 | 0.003 | 0.3 | 81.7 | |
| | | B | 99.843 | -120.0 | 0 | 0 | 0 | 0 | B | 0.005 | 0.002 | 0.3 | 95.1 | | |
| | | C | 99.881 | 120.0 | 0 | 0 | 0 | 0 | C | 0.006 | 0.003 | 0.3 | 90.9 | | |
| | | N | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus197 | A | -0.038 | -0.013 | 2.1 | 94.3 | |
| | | | | | | | | | B | -0.034 | -0.014 | 1.9 | 92.5 | | |
| | | | | | | | | | C | -0.036 | -0.010 | 2.0 | 96.4 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| | | | | | | | | | Bus211 | A | 0.034 | 0.011 | 1.9 | 95.6 | |
| | | | | | | | | | B | 0.029 | 0.012 | 1.7 | 92.1 | | |
| | | | | | | | | | C | 0.030 | 0.007 | 1.6 | 97.3 | | |
| | | | | | | | | | N | | | 0.0 | | | |
| Bus211 | 0.400 | A | 99.188 | 29.4 | 0 | 0 | 0.032 | 0.012 | Bus209 | A | -0.032 | -0.012 | 148.8 | 93.8 | |
| | | B | 99.344 | -90.5 | 0 | 0 | 0.028 | 0.009 | B | -0.028 | -0.009 | 127.5 | 95.6 | | |
| | | C | 99.386 | 149.4 | 0 | 0 | 0.033 | 0.007 | C | -0.033 | -0.007 | 146.0 | 98.0 | | |
| | | N | | | | | | | N | | | 0.0 | | | |

* Indicates a voltage regulated bus (voltage controlled or swing type machine connected to it)

Indicates a bus with a load mismatch of more than 0.1 MVA

+ The power flows across center-tap transformers correspond to the phases of the From side.