Table 1 — Power Flow Results of 6-Bus Base Case

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|  | **OpenDSS** | **GridLab-D** | **Simscape** |
| **Node-2** |  |  |  |
| V1 | 7096.5 / -0.3 | 7097.4 / -0.31 | 7095.8 / -0.30 |
| V2 | 7123.4 / -120.4 | 7122.7 / -120.39 | 7122.8 / -120.40 |
| V3 | 7108.4 / 119.5 | 7106.8 / 119.53 | 7107.7 / 119.54 |
| **Node-3** |  |  |  |
| V1 | 2220.1 / -34.3 | 2219.6 / -34.26 | 2219.3 / -34.27 |
| V2 | 2241.1 / -153.8 | 2240.8 / -153.83 | 2240.6 / -153.83 |
| V3 | 2234.4 / 85.9 | 2234.0 / 85.86 | 2233.8 / 85.85 |
| **Node-4** |  |  |  |
| V1 | 1832.9 / -40.7 | 1828.9 / -40.73 | 1828.6 / -40.73 |
| V2 | 2011.2 / -159.5 | 2008.5 / -159.47 | 2008.3 / -159.48 |
| V3 | 1917.9 / 79.5 | 1914.7 / 79.55 | 1914.4 / 79.54 |
| **Node-5** |  |  |  |
| V1 | 1817.7 / -41.1 | 1813.6 / -41.04 | 1813.2 / -41.05 |
| V2 | 2002.4 / -159.7 | 1999.6 / -159.72 | 1999.4 / -159.73 |
| V3 | 1905.5 / 79.2 | 1902.2 / 79.25 | 1901.9 / 79.25 |
| **Node-6** |  |  |  |
| V1 | 1802.5 / -41.4 | 1798.2 / -41.37 | 1797.8 / -41.38 |
| V2 | 1993.7 / -160.0 | 1990.8 / -159.98 | 1990.5 / -159.98 |
| V3 | 1893.2 / 78.9 | 1889.8 / 78.96 | 1889.4 / 78.95 |
| **Current 1-2** |  |  |  |
| Ia | 384.68 / -37.6 | 384.21 / -37.40 | 386.17 / -37.63 |
| Ib | 379.88 / -155.1 | 379.78 / -155.33 | 381.24 / -155.10 |
| Ic | 396.61 / 84.2 | 399.24 / 84.30 | 398.26 / 84.24 |
| **Current 3-4** |  |  |  |
| Ia | 1214.3 / -66.6 | 1217.10 / -66.63 | 1217.35 / -66.64 |
| Ib | 1106 / 174.6 | 1107.37 / 174.64 | 1107.51 / 174.63 |
| Ic | 1160.1 / 53.6 | 1162.16 / 53.65 | 1162.34 / 53.64 |
| **Current 4-5** |  |  |  |
| Ia | 123.27 / -67.2 | 123.58 / -67.21 | 123.61 / -67.22 |
| Ib | 111.48 / 174.2 | 111.63 / 174.18 | 111.64 / 174.14 |
| Ic | 117.37 / 53.1 | 117.59 / 53.11 | 117.61 / 53.11 |
| **Current 5-6** |  |  |  |
| Ia | 123.27 / -67.2 | 123.58 / -67.21 | 123.61 / -67.22 |
| Ib | 111.48 / 174.2 | 111.63 / 174.18 | 111.64 / 174.14 |
| Ic | 117.37 / 53.1 | 117.59 / 53.11 | 117.61 / 53.11 |