

ETD29 core 20 layers with no additional isolation secondary, gaps 100um and 4-turn primary
 Double cascade is used with 16 BY6 diodes and 16 1nF capacitors (8 per side)
 18650: the usage of battery with measured battery voltage during the measurements (3.5V-4.1V)
 LTspice: simulation results
 PS: power supply is used with 2A current limit

| freq [kHz] | Vout [kV] 3.96V 18650 | Vout [kV] LTspice 3.96V | Vout [kV] 3.53V 18650 | Vout [kV] 3.7V DC PS | Vout [kV] 7.4V DC PS |
|------------|-----------------------------|-------------------------------|-----------------------------|----------------------------|----------------------------|
| 1 | 3.7 | 4.4 | 3.0 | 4.4 | 5.2 |
| 2 | 4.9 | 5.3 | 4.0 | 6.0 | 8.7 |
| 3 | 5.6 | 5.8 | 4.5 | 6.7 | 9.8 |
| 4 | 7.2 | 5.8 | 5.8 | 8.3 | 14.3 |
| 5 | 5.9 | 8.4 | 4.7 | 7.4 | 10.0 |
| 6 | 6.3 | 12.7 | 5.1 | 8.0 | 11.4 |
| 7 | 6.3 | 7.6 | 5.1 | 8.6 | 11.9 |
| 8 | 6.9 | 6.3 | 5.7 | 9.1 | 14.3 |
| 9 | 8.5 | 6.4 | 7.0 | 10.2 | 21.0 |
| 10 | 10.9 | 7.2 | 9.2 | 12.3 | 26.7 |
| 11 | 13.3 | 8.4 | 11.5 | 13.8 | 32.5 |
| 12 | 14.7 | 10.3 | 12.7 | 14.6 | 33.4 |
| 13 | 14.1 | 12.9 | 11.6 | 13.5 | 29.9 |
| 14 | 11.8 | 16.0 | 9.5 | 12.1 | 21.3 |
| 15 | 9.3 | 18.8 | 7.4 | 10.5 | 13.7 |
| 16 | 7.5 | 20.2 | 5.8 | 8.7 | 9.6 |
| 17 | 5.9 | 20.3 | 4.8 | 7.5 | 7.2 |
| 18 | 5.2 | 19.8 | 3.9 | 6.3 | 5.8 |
| 19 | 4.2 | 19.0 | 3.2 | 5.5 | 4.6 |
| 20 | 3.6 | 18.1 | 2.6 | 4.6 | 3.6 |