

RD Number: RD076

RD Title: TB67S179FTG Evaluation circuit BOM

| Item No. | Designator | Quantity | Value          | Part Number | Manufacturer | Description                     | Package | Not Mount |
|----------|------------|----------|----------------|-------------|--------------|---------------------------------|---------|-----------|
| 1        | IC1        | 1        | TB67S179FTG    | TB67S179FTG | TOSHIBA      | Motor driver IC                 | QFN48   |           |
| 2        | VM         | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 3        | GND        | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 4        | VREF       | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 5        | VDD        | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 6        | ERR        | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 7        | ALM        | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 8        | MO         | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 9        | LOUT       | 0        | Check terminal | —           | —            | Check terminal for oscilloscope |         | ✓         |
| 10       | COUT       | 0        | Check terminal | —           | —            | Check terminal for oscilloscope |         | ✓         |
| 11       | DOUT       | 0        | Check terminal | —           | —            | Check terminal for oscilloscope |         | ✓         |
| 12       | 45         | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 13       | 46         | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 14       | 47         | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 15       | 48         | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 16       | 3          | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 17       | 5          | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 18       | 6          | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 19       | 7          | 1        | Check terminal | —           | —            | Check terminal for oscilloscope |         |           |
| 20       | OUTA+      | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 21       | OUTA-      | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 22       | OUTB+      | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 23       | OUTB-      | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 24       | COMA       | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |
| 25       | COMB       | 1        | Check terminal | —           | —            | Check terminal for logic        |         |           |

|    |      |   |               |       |         |                          |             |   |
|----|------|---|---------------|-------|---------|--------------------------|-------------|---|
| 26 | ZD   | 1 | CMZ36         | CMZ36 | TOSHIBA | Zener diode Vz=36V       | M-FLAT      |   |
| 27 | R351 | 0 | Not mount     | —     | —       | Leaded resistor          |             | ✓ |
| 28 | R352 | 0 | Not mount     | —     | —       | Leaded resistor          |             | ✓ |
| 29 | R37  | 1 | 10kΩ          | —     | —       | Leaded resistor          |             |   |
| 30 | R38  | 1 | 10kΩ          | —     | —       | Leaded resistor          |             |   |
| 31 | R39  | 1 | 10kΩ          | —     | —       | Leaded resistor          |             |   |
| 32 | R40  | 1 | 10kΩ          | —     | —       | Leaded resistor          |             |   |
| 33 | C312 | 1 | 0.1μF 50V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm |   |
| 34 | C33  | 1 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm |   |
| 35 | C35  | 1 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm |   |
| 36 | CDD  | 1 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm |   |
| 37 | C13  | 0 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm | ✓ |
| 38 | C17  | 0 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm | ✓ |
| 39 | C19  | 0 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm | ✓ |
| 40 | C23  | 0 | 0.1μF 25V     | —     | —       | Chip capacitor           | 3.2mm×1.6mm | ✓ |
| 41 | C311 | 1 | 100μF 50V     | —     | —       | Electrolytic capacitor   |             |   |
| 42 | SW3  | 0 | Pin header 3P | —     | —       | Single row plugs         |             | ✓ |
| 43 |      | 0 | Jump socket   | —     | —       | Position Shunt Connector |             | ✓ |
| 44 | SW5  | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 45 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |
| 46 | SW6  | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 47 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |
| 48 | SW7  | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 49 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |
| 50 | SW45 | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 51 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |
| 52 | SW46 | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 53 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |
| 54 | SW47 | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 55 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |
| 56 | SW48 | 1 | Pin header 3P | —     | —       | Single row plugs         |             |   |
| 57 |      | 1 | Jump socket   | —     | —       | Position Shunt Connector |             |   |



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