

Date : Jan.31,2017

Temperature increase of main components

Model: MGFS1024□□

1. Conditions

- (1) Input :DC 24 [V]
- (2) Output :Rated output
- (3) Cooling method :Convection cooling
- (4) Mounting method :Shown as Fig.1.1

2. Result

Table 2.1 Temperature increase of main components

| Table 2.1 Temperature increase of main components | | | | | | | | |
|---|---------------------------|------------|-------------------------|----|-----|-----|------------------|--------------------|
| No. | Parts name | Symbol No. | Increase (ΔT) | | | | Rated temp. [°C] | Reference |
| | | | [deg] | | | | | |
| | | | 3.3V | 5V | 12V | 15V | | |
| 1 | Switching MOS-FET | TR11 | 50 | 49 | 47 | 50 | 150 | Junction Temp. |
| 2 | Switching MOS-FET | TR101 | 54 | 52 | 51 | 53 | 150 | Junction Temp. |
| 3 | Power control IC | IC201 | 56 | 53 | 51 | 53 | 150 | Junction Temp. |
| 4 | Rectified MOS-FET(Output) | TR201 | 60 | 56 | 53 | 57 | 150 | Junction Temp. |
| 5 | Photocoupler | PC11 | 49 | 47 | 45 | 48 | 125 | Junction Temp. |
| 6 | Transformer (PCB) | P2 | 55 | 53 | 51 | 54 | 130 | |
| 7 | CASE | CASE | 49 | 49 | 47 | 51 | 105 | Top Surface Center |
| 8 | | | | | | | | |
| 9 | | | | | | | | |
| 10 | | | | | | | | |
| 11 | | | | | | | | |
| 12 | | | | | | | | |
| 13 | | | | | | | | |
| 14 | | | | | | | | |
| 15 | | | | | | | | |
| 16 | | | | | | | | |
| 17 | | | | | | | | |
| 18 | | | | | | | | |
| 19 | | | | | | | | |
| 20 | | | | | | | | |

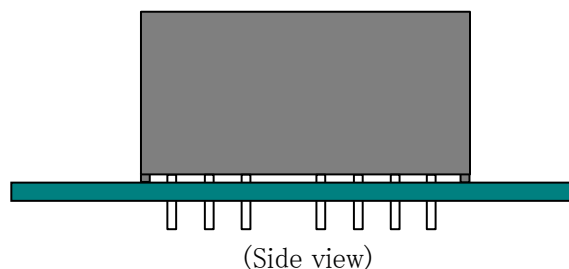


Fig.1.1 Mounting method
(Normal position)