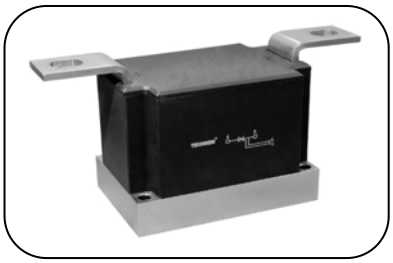


**Features：**

- Isolated mounting base 3000V~
- Pressure contact technology with Increased power cycling capability
- Space and weight saving

**Typical Applications：**

- AC/DC Motor drives
- Various rectifiers
- DC supply for PWM inverter

| $V_{DRM}$,$V_{RRM}$ | Type & Outline |
|---|---|
| 2000V | MT800-20-432F2 |
| 2200V | MT800-22-432F2 |
| 2500V | MT800-25-432F2 |

| SYMBOL | CHARACTERISTIC | TEST CONDITIONS | $T_j$(℃) | VALUE | | | UNIT |
|---|---|---|---|---|---|---|---|
| | | | | Min | Type | Max | |
| $I_{T(AV)}$ | Mean on-state current | 180° half sine wave 50Hz Single side cooled, $T_c$=85℃ | 125 | | | 800 | A |
| $I_{T(RMS)}$ | RMS on-state current | | | | | 1256 | A |
| $I_{DRM}$ $I_{RRM}$ | Repetitive peak current | at $V_{DRM}$ at $V_{RRM}$ | 125 | | | 50 | mA |
| $I_{TSM}$ | Surge on-state current | 10ms half sine wave $V_R$=60%$V_{RRM}$ | 125 | | | 22 | kA |
| $I^2t$ | $I^2t$ for fusing coordination | | | | | 2420 | $10^3A^2s$ |
| $V_{TO}$ | Threshold voltage | | 125 | | | 0.85 | V |
| $r_T$ | On-state slope resistance | | | | | 0.17 | mΩ |
| $V_{TM}$ | Peak on-state voltage | $I_{TM}$=2400A | 25 | | | 2.00 | V |
| dv/dt | Critical rate of rise of off-state voltage | $V_{DM}$=67%$V_{DRM}$ | 125 | | | 1000 | V/μs |
| di/dt | Critical rate of rise of on-state current | Gate source 1.5A $t_r$ ≤0.5μs Repetitive | 125 | | | 200 | A/μs |
| $I_{GT}$ | Gate trigger current | $V_A$=12V, $I_A$=1A | 25 | 30 | | 200 | mA |
| $V_{GT}$ | Gate trigger voltage | | | 0.8 | | 3.0 | V |
| $I_H$ | Holding current | | | 10 | | 200 | mA |
| $I_L$ | Latching current | | | | | 1000 | mA |
| $V_{GD}$ | Non-trigger gate voltage | $V_{DM}$=67%$V_{DRM}$ | 125 | | | 0.2 | V |
| $R_{th(j-c)}$ | Thermal resistance Junction to case | Single side cooled per chip | | | | 0.042 | ℃/W |
| $R_{th(c-h)}$ | Thermal resistance case to heat sink | Single side cooled per chip | | | | 0.030 | ℃/W |
| $V_{iso}$ | Isolation voltage | 50Hz,R.M.S,t=1min,$I_{iso}$:1mA(MAX) | | 3000 | | | V |
| $F_m$ | Terminal connection torque (M12) | | | 12.0 | | 14.0 | N·m |
| | Mounting torque (M6) | | | 4.5 | | 6.0 | N·m |
| $T_{vj}$ | Junction temperature | | | -40 | | 125 | ℃ |
| $T_{stg}$ | Stored temperature | | | -40 | | 125 | ℃ |
| $W_t$ | Weight | | | | 2700 | | g |
| Outline | 432F2 | | | | | | |

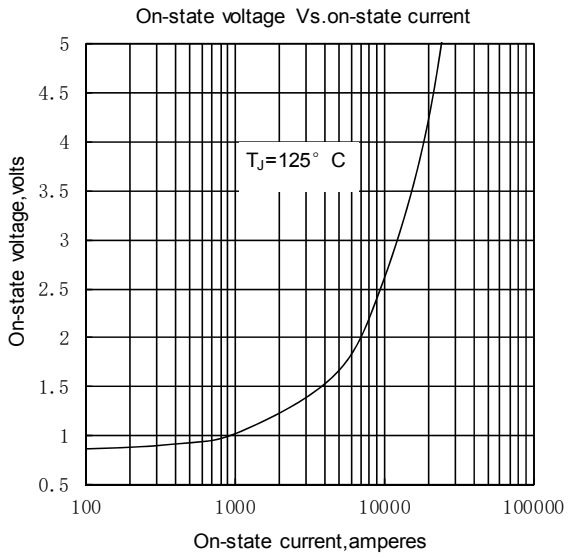



Fig.1

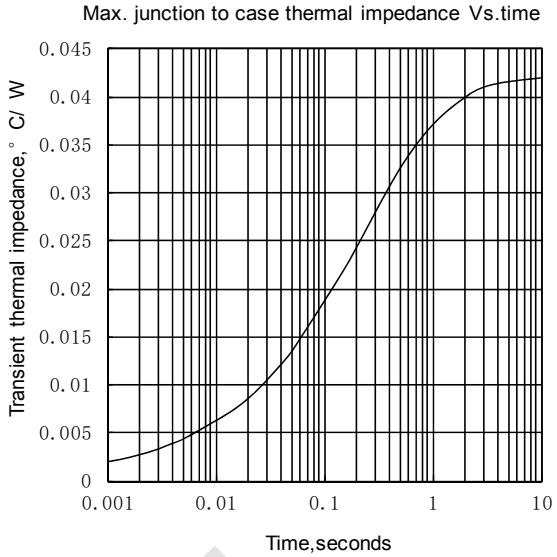



Fig.2

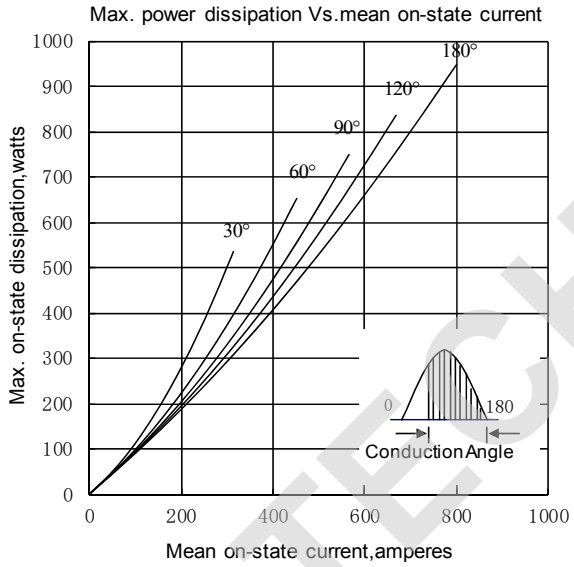



Fig.3

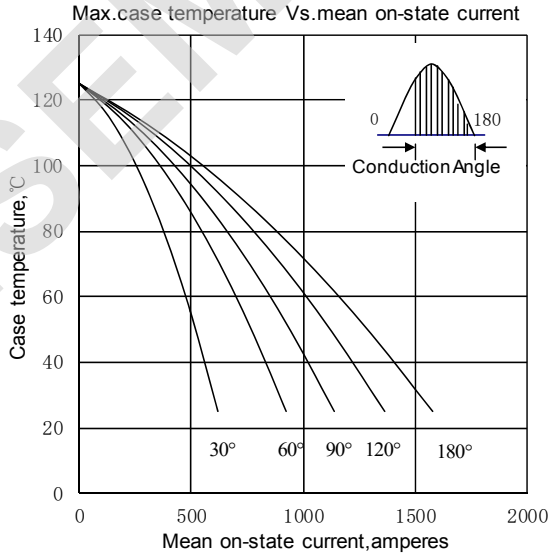



Fig.4

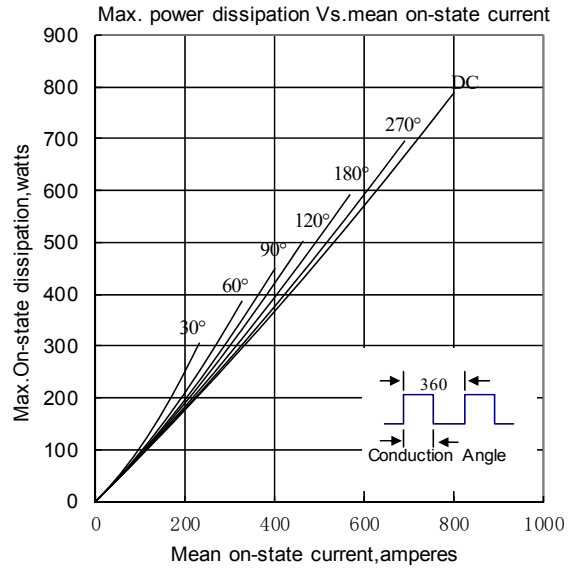



Fig.5

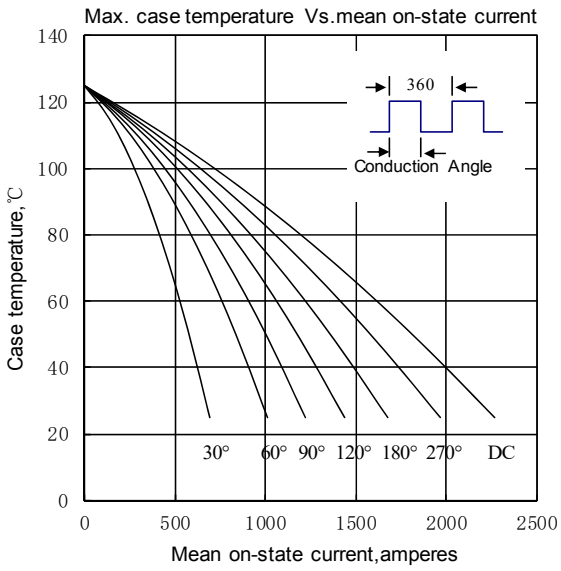



Fig.6

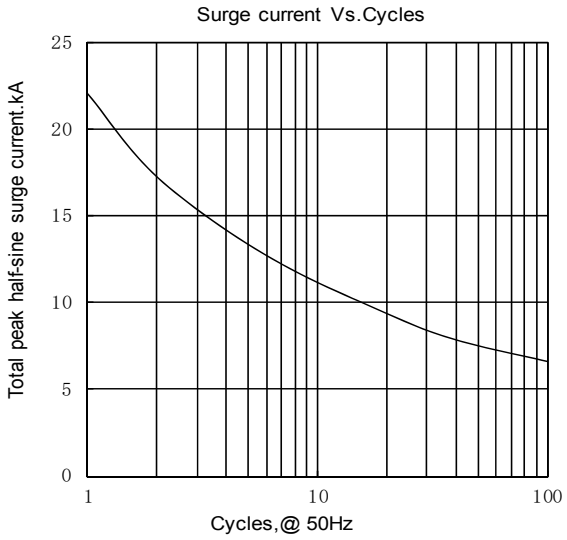



Fig.7

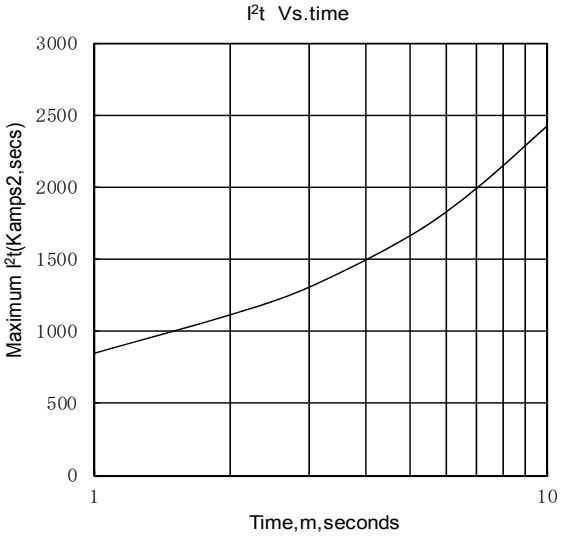



Fig.8

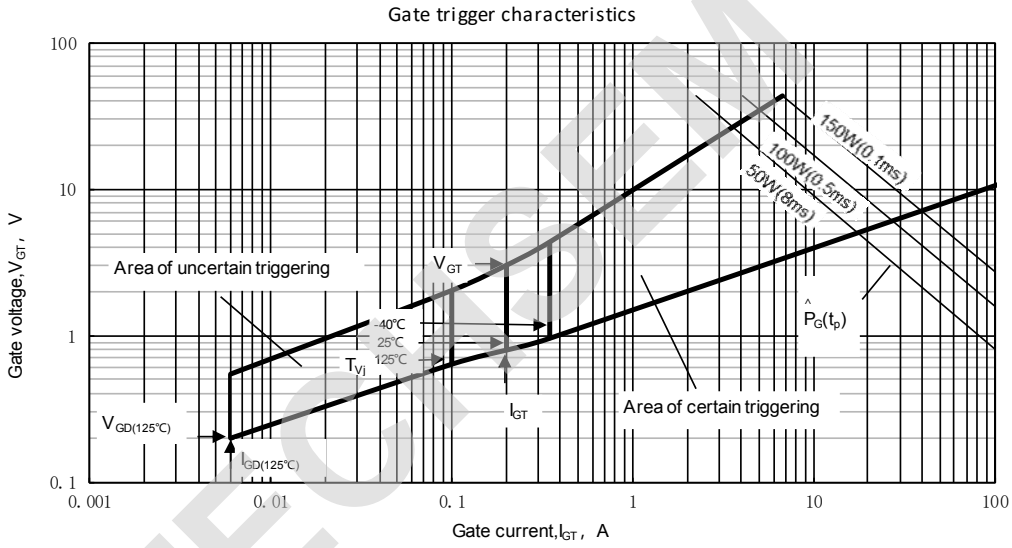
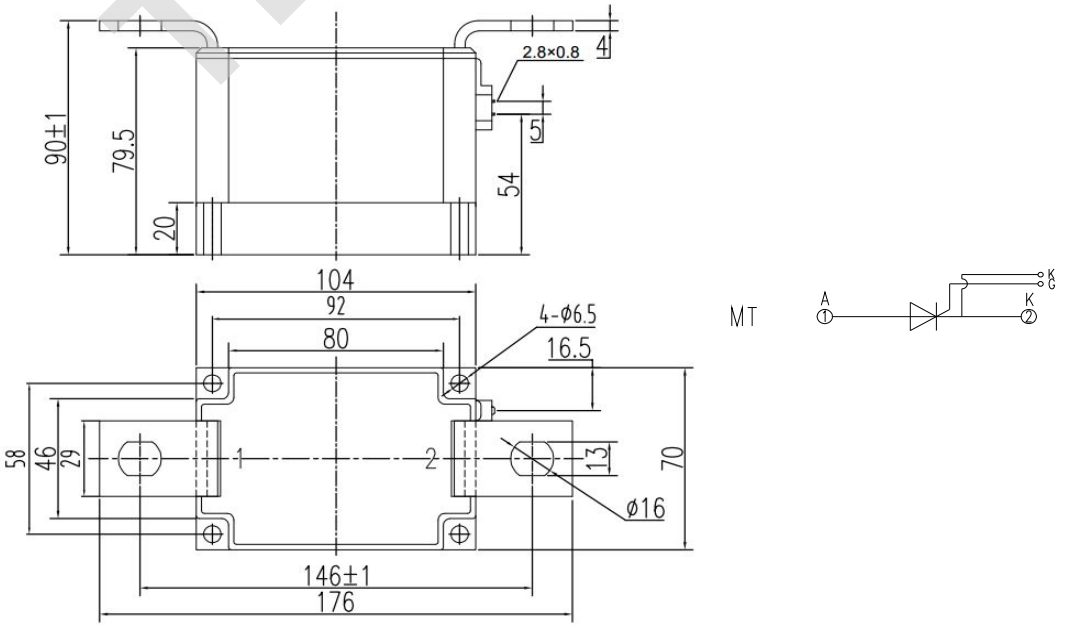



Fig.9

**Outline:**




Unmarked dimensional tolerance：±0.5mm