



CHENMKO ENTERPRISE CO.,LTD

HIGH EFFICIENCY RECTIFIER

VOLTAGE RANGE 50 - 600 Volts CURRENT 8 Amperes

Lead free devices

H08A05PT

THRU

H08A60PT

FEATURES

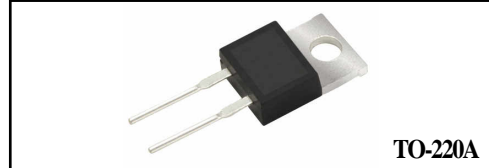
- * Plastic package has Underwriters Laboratory Flammability Classification 94V-0
- * Dual rectifier construction, positive centertap
- * Glass passivated chip junctions
- * Low power loss
- * Low forward voltage, high current capability
- * High surge current capability
- * Fast recovery times for high efficiency
- * High temperature soldering guaranteed : 260°C/10 seconds at terminals

MECHANICAL DATA

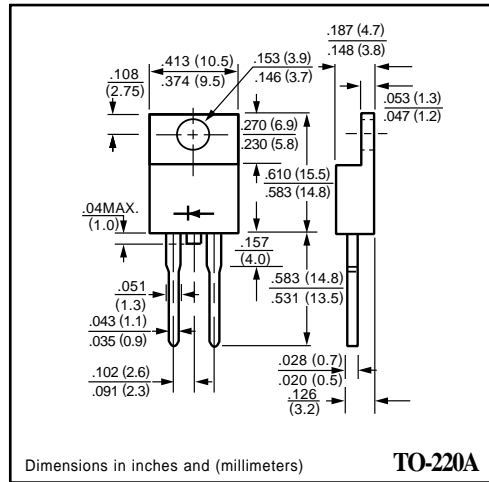
Case: JEDEC TO-220A molded plastic
Terminals: Lead solderable per MIL-STD-750, Method 2026
Polarity: As marked
Weight: 1.81 grams (Approximately)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.
 Single phase, half wave, 60 Hz, resistive or inductive load.
 For capacitive load, derate current by 20%.



TO-220A



TO-220A

MAXIMUM RATINGS (At TA = 25°C unless otherwise noted)

| RATINGS | SYMBOL | H08A05PT | H08A10PT | H08A15PT | H08A20PT | H08A30PT | H08A40PT | H08A50PT | H08A60PT | UNITS |
|---|----------|-------------|----------|----------|----------|----------|----------|----------|----------|--------|
| Maximum Recurrent Peak Reverse Voltage | VRRM | 50 | 100 | 150 | 200 | 300 | 400 | 500 | 600 | Volts |
| Maximum RMS Voltage | VRMS | 35 | 70 | 105 | 140 | 210 | 280 | 350 | 420 | Volts |
| Maximum DC Blocking Voltage | Vdc | 50 | 100 | 150 | 200 | 300 | 400 | 500 | 600 | Volts |
| Maximum Average Forward Rectified Current | Io | 8.0 | | | | | | | | Amps |
| Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC method) | IFSM | 125 | | | | | | | | Amps |
| Typical Junction capacitance per leg (NOTE 1) | CJ | 120 | | | | 70 | | | | pF |
| Typical thermal resistance (NOTE 2) | R θJC | 5.0 | | | | | | | | °C / W |
| Operating and Storage Temperature Range | TJ, TSTG | -65 to +150 | | | | | | | | °C |

ELECTRICAL CHARACTERISTICS (At TA = 25°C unless otherwise noted)

| CHARACTERISTICS | SYMBOL | H08A05PT | H08A10PT | H08A15PT | H08A20PT | H08A30PT | H08A40PT | H08A50PT | H08A60PT | UNITS |
|---|--------|----------|----------|----------|----------|----------|----------|----------|----------|-------|
| Maximum Instantaneous Forward Voltage at 8.0A DC | VF | 1.00 | | | | 1.25 | | 1.50 | | Volts |
| Maximum DC reverse current at rated DC blocking voltage per leg | IR | 10.0 | | | | | | | | uAmps |
| | | 500 | | | | | | | | |
| Maximum reverse recovery time (NOTE 3) per leg | trr | 50 | | | | 75 | | | | nS |

- NOTES : 1. Measured at 1.0 MHz and applied reverse voltage of 4.0 Volts
 2. Thermal resistance from junction to case per leg mounted on heatsink
 3. Reverse recovery test conditions : IF = 0.5 A, IR = -1.0 A, IRR = -0.25 A.
 4. Suffix " P " = Case Positive, Suffix " R " = Case Negative.

RATING CHARACTERISTIC CURVES (H08A05PT THRU H08A60PT)

FIG. 1 - TYPICAL FORWARD CURRENT DERATING CURVE

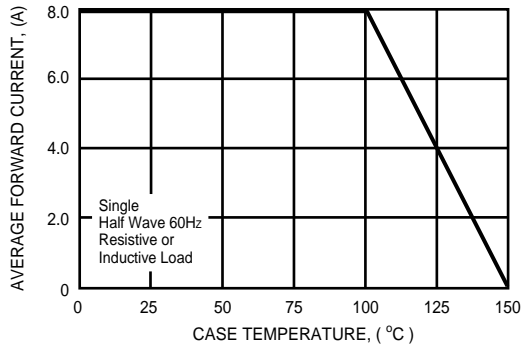


FIG. 2 - MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

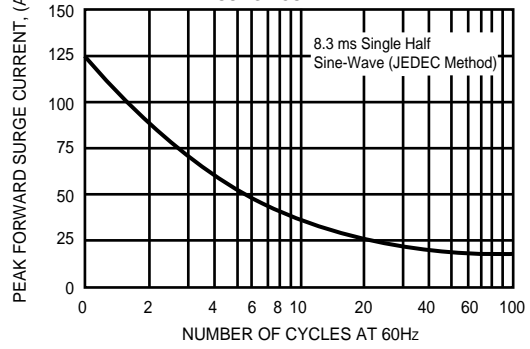


FIG. 3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

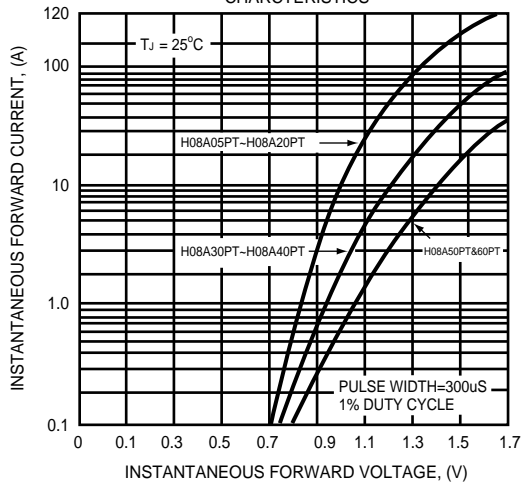


FIG. 4 - TYPICAL REVERSE CHARACTERISTICS

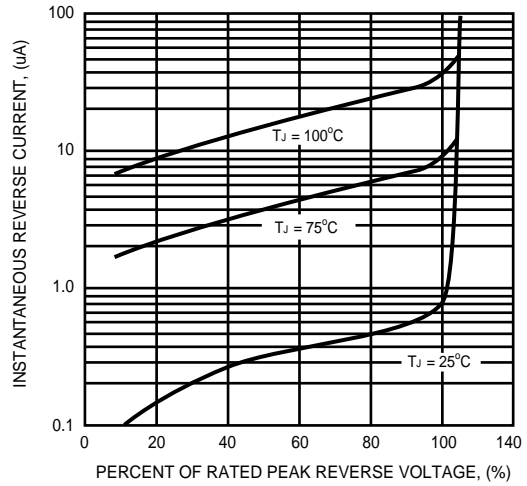


FIG. 5 - TYPICAL JUNCTION CAPACITANCE

