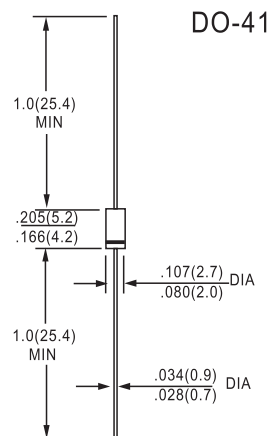


**TAYCHIPST****FAST SWITCHING PLASTIC RECTIFIER****SRP600A THRU SRP600K****50V-800V 6.0A****FEATURES**

- ◆ Plastic package has Underwriters Laboratory Flammability Classification 94V-0
- ◆ High surge current capability
- ◆ Construction utilizes void-free molded plastic technique
- ◆ Fast switching for high efficiency
- ◆ High temperature soldering guaranteed:
250°C/10 seconds, 0.375" (9.5mm) lead length,
5 lbs. (2.3kg) tension

MECHANICAL DATA**Case:** Void-free molded package body**Terminals:** Plated axial leads, solderable per MIL-STD-750, Method 2026**Polarity:** Color band denotes cathode end**Mounting Position:** Any**Weight:** 0.07 ounce, 2.1 grams

Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

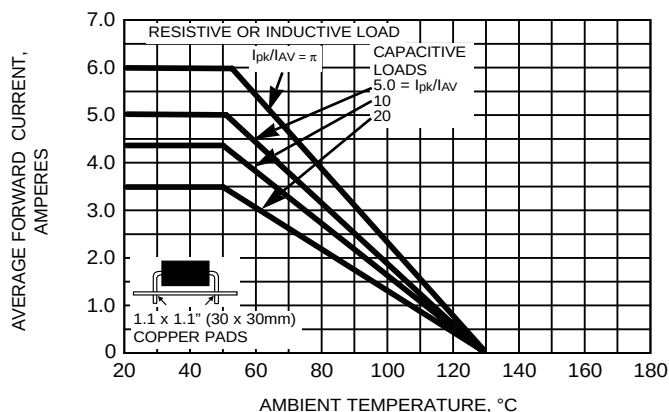
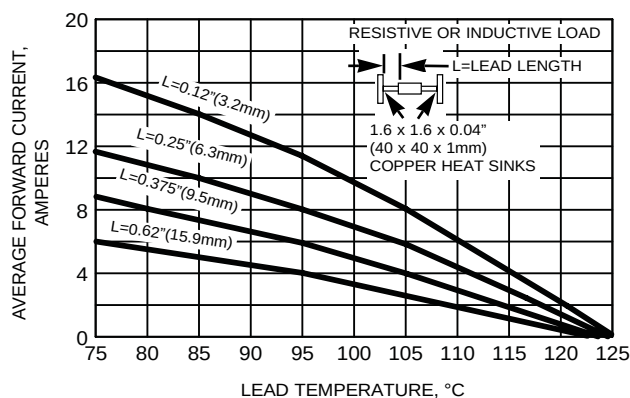
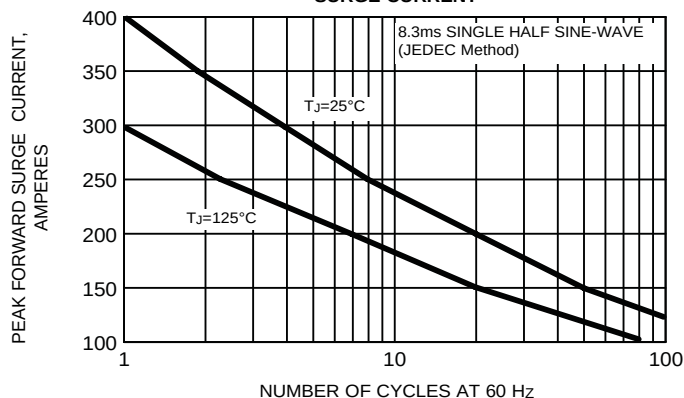
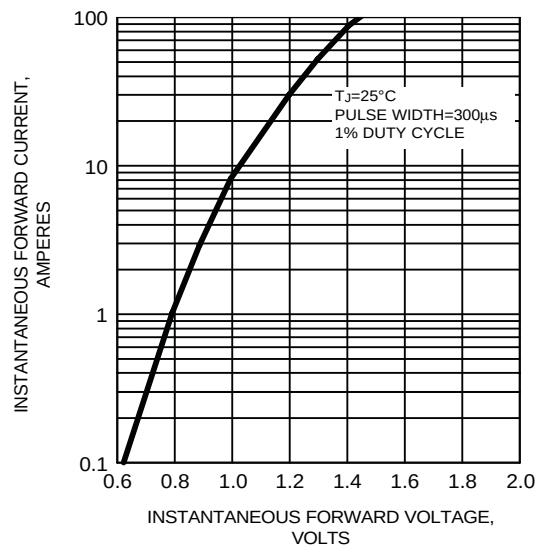
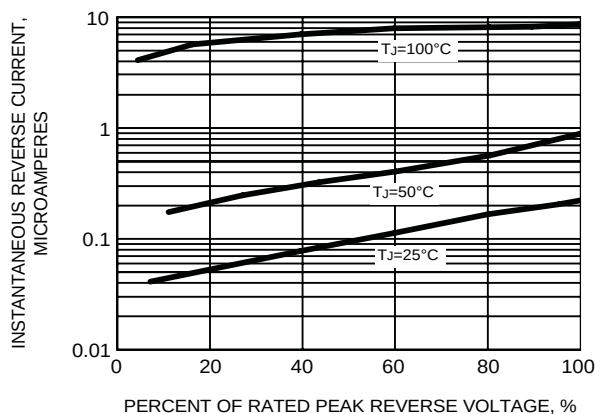
Ratings at 25°C ambient temperature unless otherwise specified.

	SYMBOLS	SRP 600A	SRP 600B	SRP 600D	SRP 600G	SRP 600J	SRP 600K	UNITS
Maximum repetitive peak reverse voltage	V_{RRM}	50	100	200	400	600	800	Volts
Maximum RMS voltage	V_{RMS}	35	70	140	280	420	560	Volts
Maximum DC blocking voltage	V_{DC}	50	100	200	400	600	800	Volts
Maximum average forward rectified current 0.375" (9.5mm) lead length at $T_A=55^\circ\text{C}$	$I_{(AV)}$	6.0						Amps
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)	I_{FSM}	300.0						Amps
Maximum instantaneous forward voltage at 6.0A	V_F	1.3						Volts
Maximum DC reverse current at rated DC blocking voltage $T_A=25^\circ\text{C}$ $T_A=100^\circ\text{C}$	I_R	10.0 1.0						μA mA
Maximum reverse recovery time (NOTE 1)	t_{rr}	100	100	150	150	200	200	ns
Typical junction capacitance (NOTE 2)	C_J	300.0						pF
Typical thermal resistance (NOTE 3)	$R_{\theta JA}$	10.0						$^\circ\text{C/W}$
Operating junction temperature range	T_J	-50 to +125						$^\circ\text{C}$
Storage temperature range	T_{STG}	-50 to +150						$^\circ\text{C}$

NOTES:(1) Reverse recovery test conditions: $I_F=0.5\text{A}$, $I_R=1.0\text{A}$, $I_{rr}=0.25\text{A}$

(2) Measured at 1.0 MHz and applied reverse voltage of 4.0 Volts

(3) Thermal resistance from junction to ambient at 0.375" (9.5mm) lead length, with both leads equally to heat sink

**TAYCHIPST****FAST SWITCHING PLASTIC RECTIFIER****SRP600A THRU SRP600K****50V-800V 6.0A****RATINGS AND CHARACTERISTIC CURVES****SRP600A THRU SRP600K****FIG. 1 - FORWARD CURRENT DERATING CURVE****FIG. 2 - FORWARD CURRENT DERATING CURVE****FIG. 3 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT****FIG. 4 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS****FIG. 5 - TYPICAL REVERSE CHARACTERISTICS****FIG. 6 - TYPICAL THERMAL RESISTANCE**