
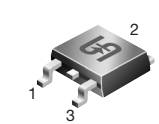
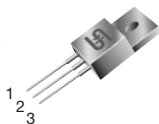

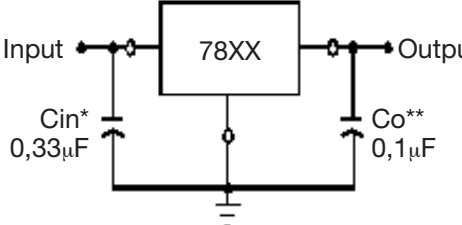


<div><div>TSC</div><div></div></div>		<div>TS7800</div> <div>3-Terminal Fixed Positive Voltage Regulators</div>																																										
<div><div>TO-220</div><div>ITO-220</div><div>D-PAK</div></div> <div></div> <div>Pin: 1. Input 2. Ground 3. Output (Heatsink surface connected to Pin 2.)</div>		<div>Voltage Range</div> <div>5 to 24 Volts</div> <div>Current</div> <div>1,5 Ampere</div>																																										
<div>Features</div> <div><div>✧ Output Current up to 1.5 Ampere</div><div>✧ No External Components Required</div><div>✧ Internal Thermal Overload Protection</div><div>✧ Internal Short-Circuit Current Limiting</div><div>✧ Output Transistor Safe-Area Compensation</div><div>✧ Output Voltage Offered in 2% Tolerance</div></div>		<div>Ordering Informations</div> <table><tr><th>Device</th><th>Operating Temperature (Ambient)</th><th>Package</th></tr><tr><td>TS78xxCZ</td><td rowspan="3">-20°C to +85°C</td><td>TO-220</td></tr><tr><td>TS78xxCI</td><td>TO-220F</td></tr><tr><td>TS78xxCP</td><td>TO-252</td></tr></table>		Device	Operating Temperature (Ambient)	Package	TS78xxCZ	-20°C to +85°C	TO-220	TS78xxCI	TO-220F	TS78xxCP	TO-252																															
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<div>Absolute Maximum Ratings (Ta=25°C)</div> <table><tr><th>Ratings</th><th>Symbol</th><th>TS7800 Series</th><th>Unit</th></tr><tr><td>Input Voltage</td><td>Vin *</td><td>35</td><td>V</td></tr><tr><td>Input Voltage</td><td>Vin **</td><td>40</td><td>V</td></tr><tr><td>Power Dissipation</td><td>TO-220</td><td>Without heatsink</td><td>2</td><td rowspan="4">°C/W</td></tr><tr><td></td><td>TO-220</td><td>Pt ***</td><td>15</td></tr><tr><td></td><td>TO-220F</td><td>With</td><td>10</td></tr><tr><td></td><td>TO-252</td><td>heatsink</td><td>10</td></tr><tr><td>Operating Ambient Temperature</td><td>Topr</td><td>-20 to +85</td><td>°C</td></tr><tr><td>Operating Junction Temperature</td><td>Tj</td><td>0 to +125</td><td>°C</td></tr><tr><td>Storage Temperature</td><td>Tstg</td><td>-25 to +150</td><td>°C</td></tr></table> <div>Note: * TS7805 to TS7818    ** TS7824    *** Follow the derating curve</div>				Ratings	Symbol	TS7800 Series	Unit	Input Voltage	Vin *	35	V	Input Voltage	Vin **	40	V	Power Dissipation	TO-220	Without heatsink	2	°C/W		TO-220	Pt ***	15		TO-220F	With	10		TO-252	heatsink	10	Operating Ambient Temperature	Topr	-20 to +85	°C	Operating Junction Temperature	Tj	0 to +125	°C	Storage Temperature	Tstg	-25 to +150	°C
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<div>Standard Application</div> <div>A common ground is required between the input and the output voltages. The input voltage must remain typically 2.0V above the output voltage even during the low point on the Input ripple voltage.</div>		<div></div> <div>XX = these two digits of the type number indicate voltage.</div> <div><div>* = Cin is required if regulator is located an appreciable distance from power supply filter.</div><div>** = Co is not needed for stability; however, it does improve transient response.</div></div>																																										

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### TS7805 Electrical Characteristics

( $V_{in}=10V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_j \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions	Min.	Typ.	Max.	Unit
Output Voltage	$V_{out}$	$T_j=25^{\circ}C$	4.90	5	5.10	V
		$7V \leq V_{in} \leq 20V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$	4.85	--	5.15	V
Line Regulation	REGline	$T_j=25^{\circ}C$ $7.5V \leq V_{in} \leq 25V$	--	3	100	mV
		$8V \leq V_{in} \leq 12V$	--	1	50	mV
Load Regulation	REGload	$T_j=25^{\circ}C$ $5mA \leq I_{out} \leq 1.5A$	--	15	100	mV
		$250mA \leq I_{out} \leq 750mA$	--	5	50	mV
Quiescent Current	$I_q$	$I_{out}=0$ , $T_j=25^{\circ}C$	--	4.2	8	mA
Quiescent Current Change	$\Delta I_q$	$7V \leq V_{in} \leq 25V$	--	--	1.3	mA
		$5mA \leq I_{out} \leq 1.5A$	--	--	0.5	mA
Output Noise Voltage	$V_n$	$10Hz \leq f \leq 100KHz$ , $T_j=25^{\circ}C$	--	40	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $8V \leq V_{in} \leq 18V$	62	78	--	dB
Voltage Drop	$V_{drop}$	$I_{out}=1.0A$ , $T_j=25^{\circ}C$	--	2	--	V
Output Resistance	$R_{out}$	$f=1KHz$	--	17	--	$m\Omega$
Output Short Circuit Current	$I_{os}$	$T_j=25^{\circ}C$	--	750	--	mA
Peak Output Current	$I_{o peak}$	$T_j=25^{\circ}C$	--	2.2	--	A
Temperature Coefficient Output Voltage	$\Delta V_{out}/\Delta T_j$	$I_{out}=5mA$ , $0^{\circ}C \leq T_j \leq 125^{\circ}C$	--	-0.6	--	$mV/^{\circ}C$

### TS7806 Electrical Characteristics

( $V_{in}=11V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_j \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions	Min.	Typ.	Max.	Unit
Output Voltage	$V_{out}$	$T_j=25^{\circ}C$	5.88	6	6.12	V
		$8V \leq V_{in} \leq 21V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$	5.82	--	6.18	V
Line Regulation	REGline	$T_j=25^{\circ}C$ $8V \leq V_{in} \leq 25V$	--	5	120	mV
		$9V \leq V_{in} \leq 13V$	--	1.5	60	mV
Load Regulation	REGload	$T_j=25^{\circ}C$ $5mA \leq I_{out} \leq 1.5A$	--	14	120	mV
		$250mA \leq I_{out} \leq 750mA$	--	4	60	mV
Quiescent Current	$I_q$	$I_{out}=0$ , $T_j=25^{\circ}C$	--	4.3	8	mA
Quiescent Current Change	$\Delta I_q$	$8V \leq V_{in} \leq 25V$	--	--	1.3	mA
		$5mA \leq I_{out} \leq 1.5A$	--	--	0.5	mA
Output Noise Voltage	$V_n$	$10Hz \leq f \leq 100KHz$ , $T_j=25^{\circ}C$	--	45	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $9V \leq V_{in} \leq 19V$	59	75	--	dB
Voltage Drop	$V_{drop}$	$I_{out}=1.0A$ , $T_j=25^{\circ}C$	--	2	--	V
Output Resistance	$R_{out}$	$f=1KHz$	--	19	--	$m\Omega$
Output Short Circuit Current	$I_{os}$	$T_j=25^{\circ}C$	--	550	--	mA
Peak Output Current	$I_{o peak}$	$T_j=25^{\circ}C$	--	2.2	--	A
Temperature Coefficient of Output Voltage	$\Delta V_{out}/\Delta T_j$	$I_{out}=5mA$ , $0^{\circ}C \leq T_j \leq 125^{\circ}C$	--	-0.7	--	$mV/^{\circ}C$

Pulse testing techniques are used to maintain the junction temperature as close to the ambient temperature as possible, and thermal effects must be taken into account separately. This specification applies only for DC power dissipation permitted by absolute maximum ratings.

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### TS7808 Electrical Characteristics

( $V_{in}=14V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_j \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions		Min.	Typ.	Max.	Unit
Output Voltage	Vout	$T_j=25^{\circ}C$		7.84	8	8.16	V
		$10.5V \leq V_{in} \leq 23V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$		7.76	--	8.24	V
Line Regulation	REGline	$T_j=25^{\circ}C$	$10.5V \leq V_{in} \leq 25V$	--	6	160	mV
			$11V \leq V_{in} \leq 17V$	--	2	80	mV
Load Regulation	REGload	$T_j=25^{\circ}C$	$10mA \leq I_{out} \leq 1.5A$	--	12	160	mV
			$250mA \leq I_{out} \leq 750mA$	--	4	80	mV
Quiescent Current	Iq	$I_{out}=0$ , $T_j=25^{\circ}C$		--	4.3	8	mA
Quiescent Current Change	$\Delta Iq$	$10.5V \leq V_{in} \leq 25V$		--	--	1	mA
		$5mA \leq I_{out} \leq 1.5A$		--	--	0.5	mA
Output Noise Voltage	Vn	$10Hz \leq f \leq 100KHz$ , $T_j=25^{\circ}C$		--	52	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $11V \leq V_{in} \leq 21V$		56	72	--	dB
Voltage Drop	Vdrop	$I_{out}=1.0A$ , $T_j=25^{\circ}C$		--	2	--	V
Output Resistance	Rout	$f=1KHz$		--	16	--	$m\Omega$
Output Short Circuit Current	Ios	$T_j=25^{\circ}C$		--	450	--	mA
Peak Output Current	I <sub>o peak</sub>	$T_j=25^{\circ}C$		--	2.2	--	A
Temperature Coefficient of Output Voltage	$\Delta V_{out}/\Delta T_j$	$I_{out}=5mA$ , $0^{\circ}C \leq T_j \leq 125^{\circ}C$		--	-0.8	--	$mV/^{\circ}C$

### TS7809 Electrical Characteristics

( $V_{in}=15V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_j \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions		Min.	Typ.	Max.	Unit
Output Voltage	Vout	$T_j=25^{\circ}C$		8.82	9	9.18	V
		$11.5V \leq V_{in} \leq 24V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$		8.73	--	9.27	V
Line Regulation	REGline	$T_j=25^{\circ}C$	$11.5V \leq V_{in} \leq 26V$	--	6	180	mV
			$11.5V \leq V_{in} \leq 17V$	--	2	90	mV
Load Regulation	REGload	$T_j=25^{\circ}C$	$5mA \leq I_{out} \leq 1.5A$	--	12	180	mV
			$250mA \leq I_{out} \leq 750mA$	--	4	90	mV
Quiescent Current	Iq	$I_{out}=0$ , $T_j=25^{\circ}C$		--	4.3	8	mA
Quiescent Current Change	$\Delta Iq$	$11.5V \leq V_{in} \leq 26V$		--	--	1	mA
		$5mA \leq I_{out} \leq 1.5A$		--	--	0.5	mA
Output Noise Voltage	Vn	$10Hz \leq f \leq 100KHz$ , $T_j=25^{\circ}C$		--	52	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $11.5V \leq V_{in} \leq 21.5V$		55	72	--	dB
Voltage Drop	Vdrop	$I_{out}=1.0A$ , $T_j=25^{\circ}C$		--	2	--	V
Output Resistance	Rout	$f=1KHz$		--	16	--	$m\Omega$
Output Short Circuit Current	Ios	$T_j=25^{\circ}C$		--	450	--	mA
Peak Output Current	I <sub>o peak</sub>	$T_j=25^{\circ}C$		--	2.2	--	A
Temperature Coefficient of Output Voltage	$\Delta V_{out}/\Delta T_j$	$I_{out}=5mA$ , $0^{\circ}C \leq T_j \leq 125^{\circ}C$		--	-1	--	$mV/^{\circ}C$

Pulse testing techniques are used to maintain the junction temperature as close to the ambient temperature as possible, and thermal effects must be taken into account separately. This specification applies only for DC power dissipation permitted by absolute maximum ratings.

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<b>TS7810 Electrical Characteristics</b>						
(Vin=16V, Iout=500mA, 0°C≤Tj≤125°C, Cin=0.33μF, Cout=0.1μF; unless otherwise specified.)						
Characteristics	Symbol	Test Conditions		Min.	Typ.	Max. Unit
Output Voltage	Vout	Tj=25°C		9.8	10	10.2 V
		12.5V≤Vin≤25V, 5mA≤Iout≤1.5A, PD ≤15W		9.7	--	10.3 V
Line Regulation	REGline	Tj=25°C	12.5V≤Vin≤28V	--	7	200 mV
			13V≤Vin≤17V	--	2	100 mV
Load Regulation	REGload	Tj=25°C	10mA≤Iout≤1.5A	--	12	200 mV
			250mA≤Iout≤750mA	--	4	100 mV
Quiescent Current	Iq	Iout=0, Tj=25°C		--	4.3	8 mA
Quiescent Current Change	ΔIq	12.5V≤Vin≤28V		--	--	1 mA
		5mA≤Iout≤1.5A		--	--	0.5 mA
Output Noise Voltage	Vn	10Hz≤f≤100KHz, Tj=25°C		--	70	-- μV
Ripple Rejection Ratio	RR	f=120Hz, 13V≤Vin≤23V		55	71	-- dB
Voltage Drop	Vdrop	Iout=1.0A, Tj=25°C		--	2	-- V
Output Resistance	Rout	f=1KHz		--	18	-- mΩ
Output Short Circuit Current	Ios	Tj=25°C		--	400	-- mA
Peak Output Current	I <sub>o peak</sub>	Tj=25°C		--	2.2	-- A
Temperature Coefficient of Output Voltage	ΔVout/ΔTj	Iout=5mA, 0°C≤Tj≤125°C		--	-1	-- mV/°C

<b>TS7812 Electrical Characteristics</b>						
(Vin=19V, Iout=500mA, 0°C≤Tj≤125°C, Cin=0.33μF, Cout=0.1μF; unless otherwise specified.)						
Characteristics	Symbol	Test Conditions		Min.	Typ.	Max. Unit
Output Voltage	Vout	Tj=25°C		11.76	12.0	12.24 V
		14.5V≤Vin≤27V, 5mA≤Iout≤1.5A, PD ≤15W		11.64	--	12.36 V
Line Regulation	REGline	Tj=25°C	14V≤Vin≤30V	--	10	240 mV
			15V≤Vin≤19V	--	3	120 mV
Load Regulation	REGload	Tj=25°C	10mA≤Iout≤1.5A	--	12	240 mV
			250mA≤Iout≤750mA	--	4	120 mV
Quiescent Current	Iq	Tj=25°C, Iout=0		--	4.3	8 mA
Quiescent Current Change	ΔIq	14.5V≤Vin≤30V		--	--	1 mA
		5mA≤Iout≤1.5A		--	--	0.5 mA
Output Noise Voltage	Vn	10Hz≤f≤100KHz, Tj=25°C		--	75	-- μV
Ripple Rejection Ratio	RR	f=120Hz, 15V≤Vin≤25V		55	71	-- dB
Voltage Drop	Vdrop	Iout=1.0A, Tj=25°C		--	20	-- V
Output Resistance	Rout	f=1KHz		--	18	-- mΩ
Output Short Circuit Current	Ios	Tj=25°C		--	350	-- mA
Peak Output Current	I <sub>o peak</sub>	Tj=25°C		--	2.2	-- A
Temperature Coefficient of Output Voltage	ΔVout/ΔTj	Iout=5mA, 0°C≤Tj≤125°C		--	-1	-- mV/°C

Pulse testing techniques are used to maintain the junction temperature as close to the ambient temperature as possible, and thermal effects must be taken into account separately. This specification applies only for DC power dissipation permitted by absolute maximum ratings.

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### TS7815 Electrical Characteristics

( $V_{in}=23V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_j \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions	Min.	Typ.	Max.	Unit
Output Voltage	$V_{out}$	$T_j=25^{\circ}C$	14.7	15	15.3	V
		$17.5V \leq V_{in} \leq 30V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$	14.55	--	15.45	V
Line Regulation	REG <sub>line</sub>	$T_j=25^{\circ}C$ , $17.5V \leq V_{in} \leq 30V$	--	12	300	mV
		$18V \leq V_{in} \leq 22V$	--	3	150	mV
Load Regulation	REG <sub>load</sub>	$T_j=25^{\circ}C$ , $10mA \leq I_{out} \leq 1.5A$	--	12	300	mV
		$250mA \leq I_{out} \leq 750mA$	--	4	150	mV
Quiescent Current	$I_q$	$T_j=25^{\circ}C$ , $I_{out}=0$	--	4.3	8	mA
Quiescent Current Change	$\Delta I_q$	$17.5V \leq V_{in} \leq 30V$	--	--	1	mA
		$5mA \leq I_{out} \leq 1.5A$	--	--	0.5	mA
Output Noise Voltage	$V_n$	$10Hz \leq f \leq 100KHz$ , $T_j=25^{\circ}C$	--	90	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $18V \leq V_{in} \leq 28V$	54	70	--	dB
Voltage Drop	$V_{drop}$	$I_{out}=1.0A$ , $T_j=25^{\circ}C$	--	2	--	V
Output Resistance	$R_{out}$	$f=1KHz$	--	19	--	$m\Omega$
Output Short Circuit Current	$I_{os}$	$T_j=25^{\circ}C$	--	230	--	mA
Peak Output Current	$I_{o peak}$	$T_j=25^{\circ}C$	--	2.1	--	A
Temperature Coefficient of Output Voltage	$\Delta V_{out}/\Delta T_j$	$I_{out}=5mA$ , $0^{\circ}C \leq T_j \leq 125^{\circ}C$	--	-1	--	$mV/^{\circ}C$

### TS7818 Electrical Characteristics

( $V_{in}=27V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_j \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions	Min.	Typ.	Max.	Unit
Output Voltage	$V_{out}$	$T_j=25^{\circ}C$	17.64	18	18.36	V
		$21V \leq V_{in} \leq 33V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$	17.46	--	18.54	V
Line Regulation	REG <sub>line</sub>	$T_j=25^{\circ}C$ , $21V \leq V_{in} \leq 33V$	--	15	360	mV
		$22V \leq V_{in} \leq 26V$	--	5	180	mV
Load Regulation	REG <sub>load</sub>	$T_j=25^{\circ}C$ , $10mA \leq I_{out} \leq 1.5A$	--	12	360	mV
		$250mA \leq I_{out} \leq 750mA$	--	4	180	mV
Quiescent Current	$I_q$	$T_j=25^{\circ}C$ , $I_{out}=0$	--	4.5	8	mA
Quiescent Current Change	$\Delta I_q$	$21V \leq V_{in} \leq 33V$	--	--	1	mA
		$5mA \leq I_{out} \leq 1.5A$	--	--	0.5	mA
Output Noise Voltage	$V_n$	$10Hz \leq f \leq 100KHz$ , $T_j=25^{\circ}C$	--	110	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $21V \leq V_{in} \leq 31V$	54	70	--	dB
Voltage Drop	$V_{drop}$	$I_{out}=1.0A$ , $T_j=25^{\circ}C$	--	2	--	V
Output Resistance	$R_{out}$	$f=1KHz$	--	22	--	$m\Omega$
Output Short Circuit Current	$I_{os}$	$T_j=25^{\circ}C$	--	200	--	mA
Peak Output Current	$I_{o peak}$	$T_j=25^{\circ}C$	--	2.1	--	A
Temperature Coefficient of Output Voltage	$\Delta V_{out}/\Delta T_j$	$I_{out}=5mA$ , $0^{\circ}C \leq T_j \leq 125^{\circ}C$	--	-1	--	$mV/^{\circ}C$

Pulse testing techniques are used to maintain the junction temperature as close to the ambient temperature as possible, and thermal effects must be taken into account separately. This specification applies only for DC power dissipation permitted by absolute maximum ratings.

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## TS7824 Electrical Characteristics

( $V_{in}=33V$ ,  $I_{out}=500mA$ ,  $0^{\circ}C \leq T_J \leq 125^{\circ}C$ ,  $C_{in}=0.33\mu F$ ,  $C_{out}=0.1\mu F$ ; unless otherwise specified.)

Characteristics	Symbol	Test Conditions	Min.	Typ.	Max.	Unit
Output Voltage	$V_{out}$	$T_J=25^{\circ}C$	23.52	24	24.48	V
		$26V \leq V_{in} \leq 38V$ , $5mA \leq I_{out} \leq 1.5A$ , $PD \leq 15W$	23.28	--	24.72	V
Line Regulation	REGline	$26V \leq V_{in} \leq 38V$	--	18	480	mV
		$T_J=25^{\circ}C$ , $27V \leq V_{in} \leq 32V$	--	6	240	mV
Load Regulation	REGload	$10mA \leq I_{out} \leq 1.5A$	--	12	480	mV
		$T_J=25^{\circ}C$ , $250mA \leq I_{out} \leq 750mA$	--	4	240	mV
Quiescent Current	$I_q$	$I_{out}=0$ , $T_J=25^{\circ}C$	--	4.6	8	mA
Quiescent Current Change	$\Delta I_q$	$26V \leq V_{in} \leq 38V$	--	--	1	mA
		$5mA \leq I_{out} \leq 1.5A$	--	--	0.5	mA
Output Noise Voltage	$V_n$	$10Hz \leq f \leq 100KHz$ , $T_J=25^{\circ}C$	--	170	--	$\mu V$
Ripple Rejection Ratio	RR	$f=120Hz$ , $26V \leq V_{in} \leq 36V$	54	70	--	dB
Voltage Drop	$V_{drop}$	$I_{out}=1.0A$ , $T_J=25^{\circ}C$	--	2	--	V
Output Resistance	$R_{out}$	$f=1KHz$	--	28	--	$m\Omega$
Output Short Circuit Current	$I_{os}$	$T_J=25^{\circ}C$	--	150	--	mA
Peak Output Current	$I_{o peak}$	$T_J=25^{\circ}C$	--	2.1	--	A
Temperature Coefficient of Output Voltage	$\Delta V_{out}/\Delta T_J$	$I_{out}=5mA$ , $0^{\circ}C \leq T_J \leq 125^{\circ}C$	--	-1.5	--	$mV/^{\circ}C$

Pulse testing techniques are used to maintain the junction temperature as close to the ambient temperature as possible, and thermal effects must be taken into account separately.  
This specification applies only for DC power dissipation permitted by absolute maximum ratings.

FIG. 1 - WORST CASE POWER DISSIPATION versus AMBIENT TEMPERATURE

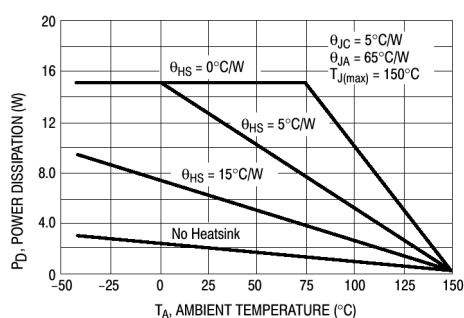
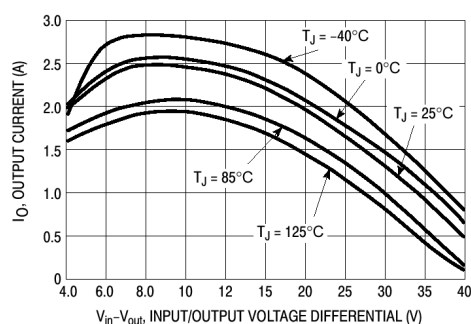


FIG. 2 - PEAK OUTPUT CURRENT AS A FUNCTION OF INPUT-OUTPUT DIFFERENTIAL VOLTAGE



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FIG. 3 - QUIESCENT CURRENT AS A FUNCTION OF TEMPERATURE

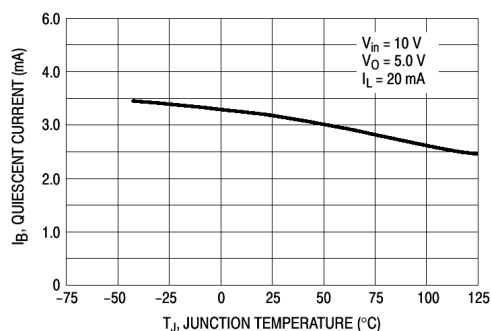


FIG. 4 - INPUT-OUTPUT DIFFERENTIAL AS A FUNCTION OF JUNCTION TEMPERATURE

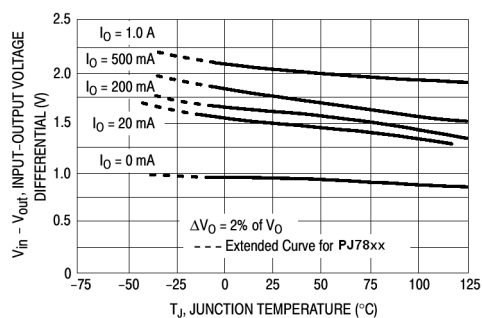


FIG. 5 - OUTPUT VOLTAGE AS A FUNCTION OF JUNCTION TEMPERATURE

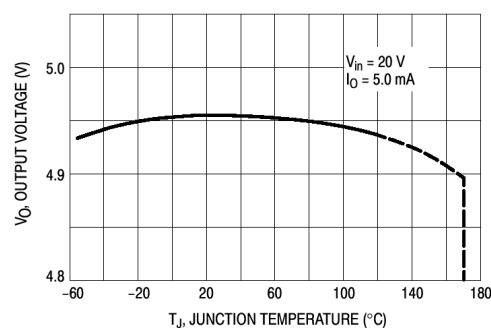


FIG. 6 - OUTPUT IMPEDANCE AS A FUNCTION OF OUTPUT VOLTAGE

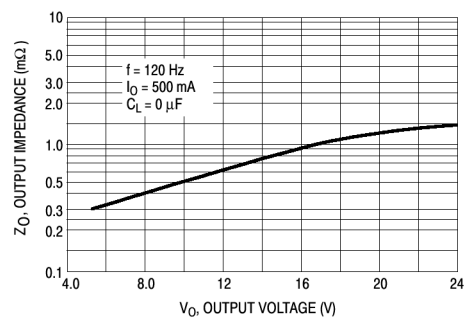


FIG. 7 - RIPPLE REJECTION AS A FUNCTION OF OUTPUT VOLTAGE

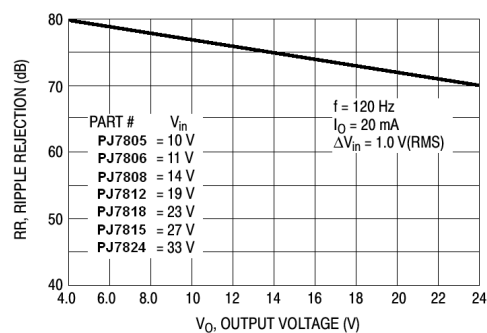
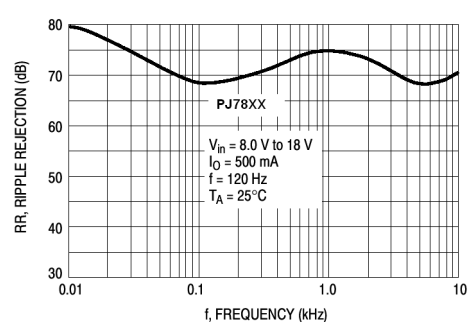


FIG. 8 - RIPPLE REJECTION AS A FUNCTION OF FREQUENCY



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TO-220 Mechanical drawing		TO-220 DIMENSION			
DIM		MILLIMETERS		INCHES	
		MIN	MAX	MIN	MAX
A		10.00	10.50	0.394	0.413
B		3.24	4.44	0.128	0.175
C		2.44	2.94	0.096	0.116
D		3.565	4.315	0.140	0.170
E		0.68	0.92	0.027	0.036
F		1.115	1.485	0.044	0.058
G		2.345	2.715	0.092	0.107
H		13.49	14.31	0.531	0.563
I		4.475	5.225	0.176	0.206
J		1.15	1.39	0.045	0.055
K		27.78	29.62	1.094	1.166
L		2.175	2.925	0.086	0.115
M		0.297	0.477	0.012	0.019
N		8.28	8.80	0.326	0.346
O		14.29	15.31	0.563	0.603
P		6.01	6.51	0.237	0.256

TO-220F Mechanical drawing		TO-220F DIMENSION			
DIM		MILLIMETERS		INCHES	
		MIN	MAX	MIN	MAX
A		9.9	10.1	0.390	0.398
B		6.2	6.2	0.244	0.244
C		2.2	2.2	0.087	0.087
D		φ1.4	φ1.4	φ0.055	φ0.055
E		15.0	15.2	0.591	0.598
F		0.48	0.72	0.019	0.028
G		2.355	2.725	0.093	0.107
H		13.49	14.31	0.531	0.563
I		1.115	1.485	0.044	0.058
J		2.6	2.8	0.102	0.110
K		4.4	4.6	0.173	0.181
L		1.115	1.15	0.045	0.045
M		2.95	3.15	0.116	0.124
N		2.6	2.8	0.102	0.110
O		6.55	6.65	0.258	0.262

TO-252 Mechanical drawing		TO-252 DIMENSION			
DIM		MILLIMETERS		INCHES	
		MIN	MAX	MIN	MAX
A		10.23	10.28	0.403	0.405
B		9.92	9.96	0.391	0.392
C		0.50	0.54	0.020	0.021
D		1.83	1.96	0.072	0.077
E		4.59	4.61	0.180	0.181
F		0.49	0.51	0.019	0.020
G		1.15	1.22	0.045	0.048
H		0.43	0.47	0.017	0.019
I		5.37	5.40	0.211	0.213
J		1.33	1.39	0.052	0.055

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