

/ Descriptions

TO-220 Voltage Regulator in a TO-220 Plastic Package.

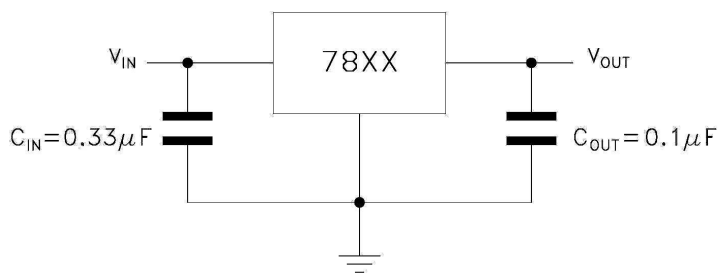
/ Features

1.5A,
3-Terminal regulators ,output current up to 1.5 A, internal thermal overload protection and short-circuit limiting.

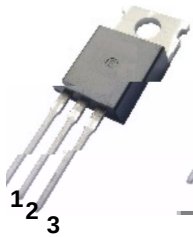
/ Applications

Voltage Regulator.

/ Equivalent Circuit or Application Circuit



/ Pinning



PIN1 IN PIN 2 GND PIN 3 OUT

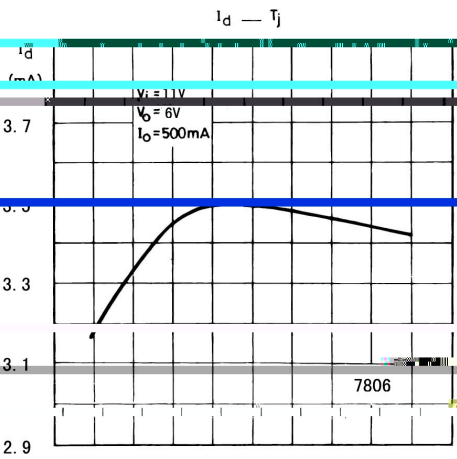
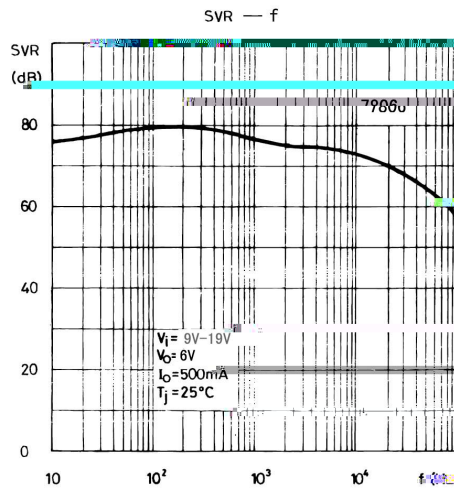
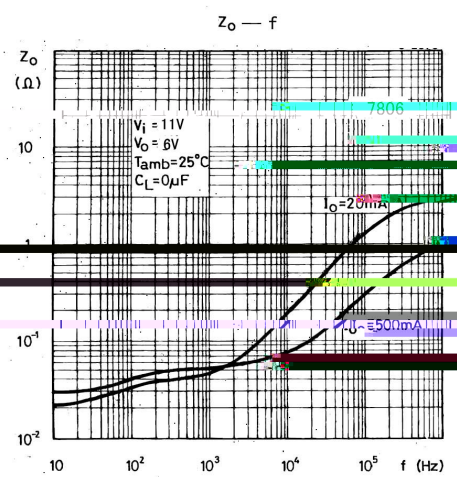
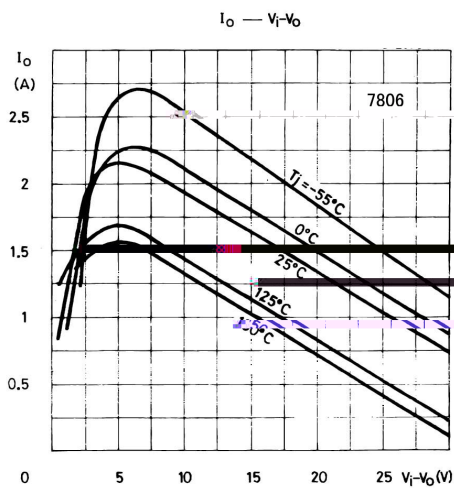
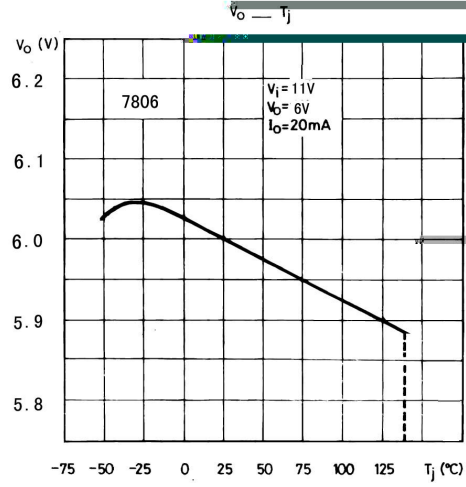
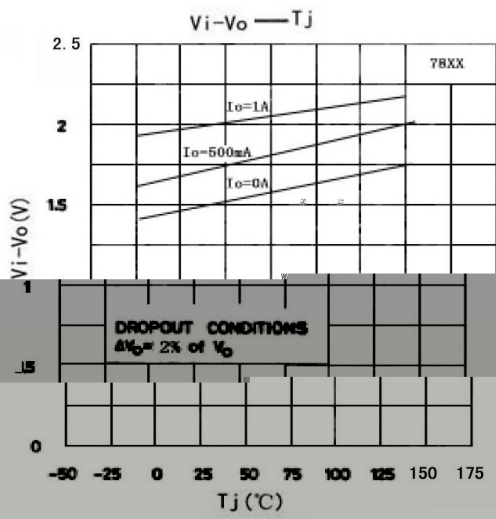
/ Marking

See Marking Instructions

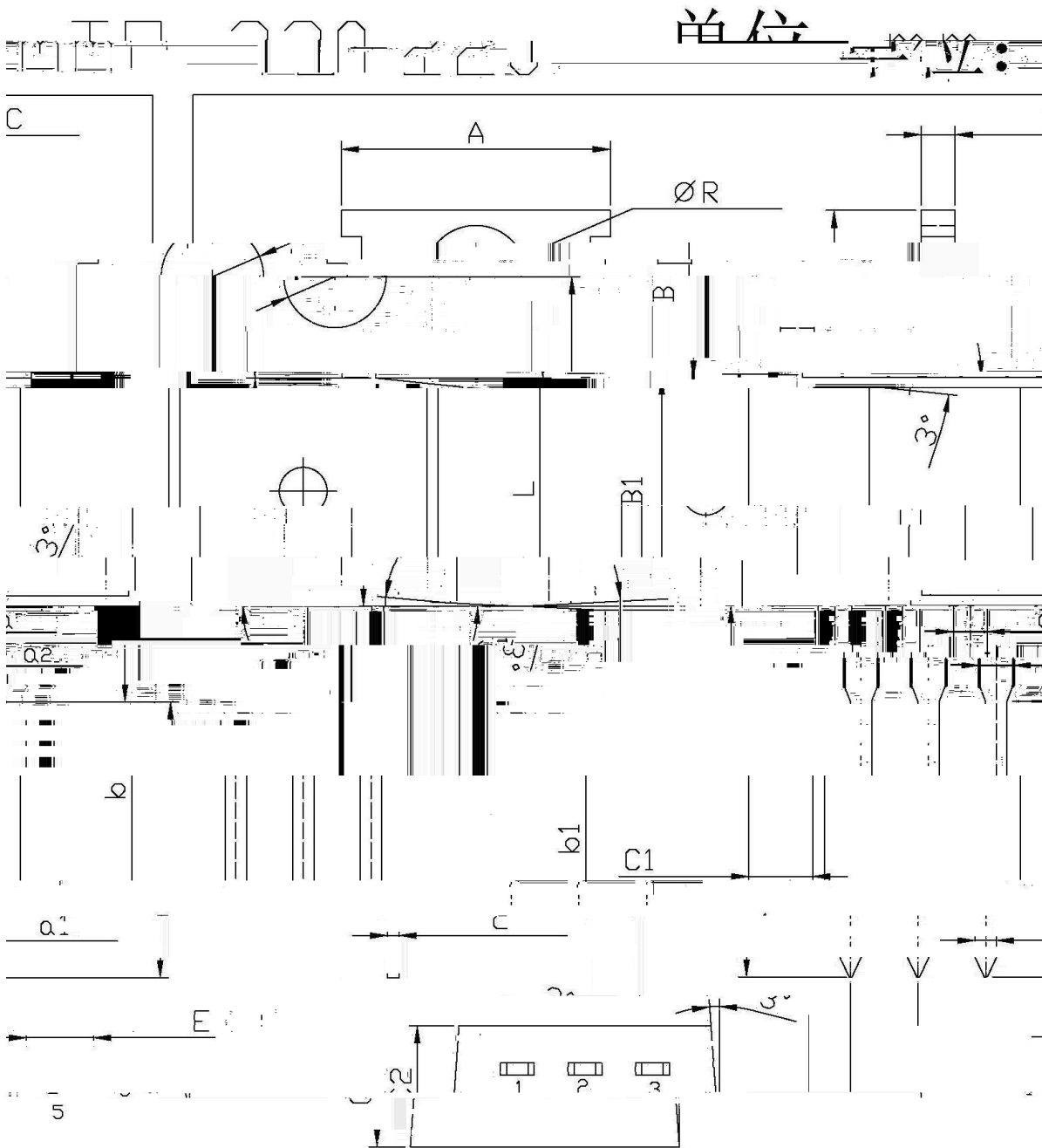
	Symbol	Rating	Unit
	V_I	35	V
	$R_{\theta JA}$	50	$^{\circ}\text{C}/\text{W}$
	$R_{\theta JC}$	5.0	$^{\circ}\text{C}/\text{W}$
	T_{OPR}	0~125	$^{\circ}\text{C}$
	T_{stg}	-65~150	$^{\circ}\text{C}$

Symbol	Test Conditions	Min	Typ	Max	Unit
V_o	$T_j=25^{\circ}\text{C}$	5.75	6.0	6.25	V
	$V_i=9\text{V}-21\text{V}$ $I_o=5\text{mA}-1\text{A}$ $P_o \leq 15\text{W}$	5.7	6.0	6.3	
V_o	$T_j=25^{\circ}\text{C}$ $I_o=5\text{mA}-1.5\text{A}$			120	mV
	$T_j=25^{\circ}\text{C}$ $I_o=250\text{mA}-750\text{mA}$			60	
V_o	$T_j=25^{\circ}\text{C}$ $V_i=8\text{V}-25\text{V}$			120	mV
	$T_j=25^{\circ}\text{C}$ $V_i=9\text{V}-13\text{V}$			60	
I_d	$T_j=25^{\circ}\text{C}$			8.0	mA
I_d	$V_i=9\text{V}-25\text{V}$			0.8	mA
	$I_o=5\text{mA}-1\text{A}$			0.5	mA
$V/\Delta T$	$I_o=5\text{mA}$		-0.8		mV/ $^{\circ}\text{C}$
N	$B=10\text{Hz}-100\text{KHz}$ $T_j=25^{\circ}\text{C}$		45		$\mu\text{V}/V_o$
YR	$V_i=9\text{V}-19\text{V}$ $f=120\text{Hz}$	59	75		dB
I_d	$I_o=1\text{A}$ $T_j=25^{\circ}\text{C}$		2.0		V
ρ	$f=1\text{KHz}$		19		m Ω
Short Circuit Current Limit	I_{sc} $V_i=35\text{V}$ $T_j=25^{\circ}\text{C}$		0.55		A

/ Electrical Characteristic Curve

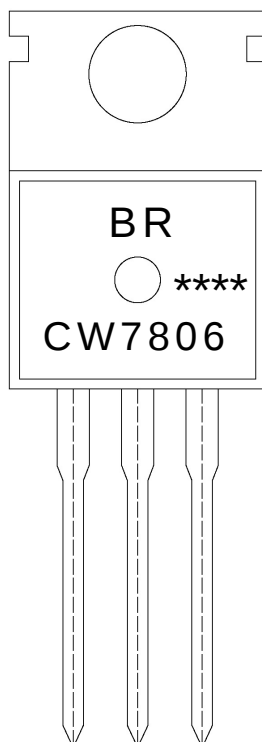


/ Package Dimensions



Dimensions in Millimeters			Dimensions in Millimeters		
Symbol	Min	Max	Symbol	Min	Max
A	9.8	10.2	C	1.2	1.4
R	3.56	3.64	B	6.3	6.7
L	15.7	16.1	B1	9.0	9.4
b	2.6	3.6	C1	2.2	2.6
b1	9.6	10.6	a1	0.7	0.9
a1	1.22	1.32	e	0.4	0.6
E	1.34	1.44	CC	4.0	4.7
0.2	1.25	1.45			

/ Marking Instructions



BR

CW7806

Note:

BR: Company Code.

CW7806: Product Type.

****: Lot No. Code, code change with Lot No.

