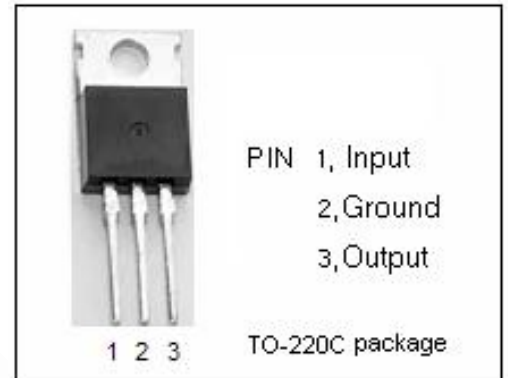


**isc Three Terminal Positive Voltage Regulator**

**L7805CV**

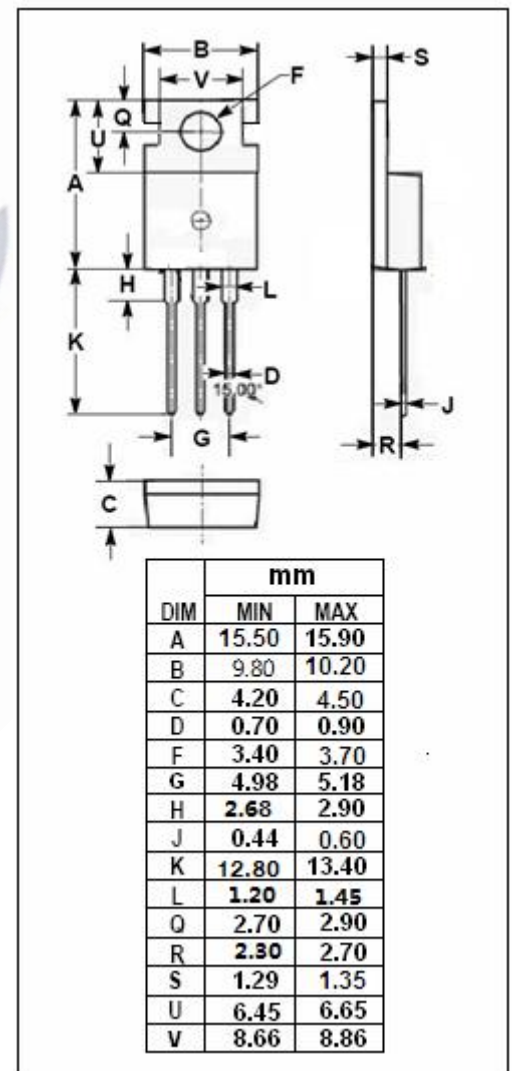
**FEATURES**

- Output current in excess of 1.5A
- Output voltage of 5V
- Internal thermal overload protection
- Output transition Safe-Area compensation



**ABSOLUTE MAXIMUM RATINGS(T<sub>a</sub>=25°C)**

SYMBOL	PARAMETER	RATING	UNIT
V <sub>i</sub>	DC input voltage	35	V
I <sub>o</sub>	Output current	internally limited	
P <sub>tot</sub>	Power dissipation	internally limited	
T <sub>OP</sub>	Operating junction temperature	-40~125	°C
T <sub>stg</sub>	Storage temperature	-55~150	°C



**THERMAL CHARACTERISTICS**

SYMBOL	PARAMETER	MAX	UNIT
R <sub>th j-c</sub>	Thermal Resistance, Junction to Case	3	°C/W
R <sub>th j-a</sub>	Thermal Resistance, Junction to Ambient	50	°C/W

**isc Three Terminal Positive Voltage Regulator**

**L7805CV**

• ELECTRICAL CHARACTERISTICS

T<sub>j</sub>=25°C (V<sub>i</sub>=10V, I<sub>o</sub>=0.5A, C<sub>i</sub>=0.33 μF, C<sub>o</sub>=0.1 μF unless otherwise specified)

SYMBOL	PARAMETER	CONDITIONS	MIN	MAX	UNIT
V <sub>o</sub>	Output Voltage	V <sub>in</sub> =20V; I <sub>o</sub> =500mA	4.8	5.2	V
ΔV <sub>v</sub>	Line Regulation	7.5V ≤ V <sub>in</sub> ≤ 20V; I <sub>o</sub> =0.5A		50	mV
ΔV <sub>i</sub>	Load Regulation	5.0mA ≤ I <sub>o</sub> ≤ 1.5A; V <sub>in</sub> =10V		100	mV
I <sub>q</sub>	Quiescent Current	V <sub>in</sub> =10V; I <sub>o</sub> =1.5A		6.0	mA
Δ <sub>q1</sub>	Quiescent Current Change	5.0mA ≤ I <sub>o</sub> ≤ 1.0A; V <sub>in</sub> =10V		0.5	mA
Δ <sub>q2</sub>	Quiescent Current Change	7V ≤ V <sub>in</sub> ≤ 25V; I <sub>o</sub> =500mA		1.3	mA