# VR-8L Direct Current Volt. Regulator

## Introductions

VR-8L Volt. Regulator is a direct-direct linear regulator, with built in battery status LED. It will convert the input voltage to a safe output voltage which conforms to the demand of the electrical equipment. It has many advantages, such as low voltage difference, large output electrical current, consistent of voltage, indication of input voltage, and non-radiation of electromagnetism. It is widely applied to aero models and other model power systems.

## Principal Technical Parameters:

Environment temperature:

-10-- +40°C

Relative humidity:

≤80%

Atmospheric pressure:

860hpa-1060hpa

Input voltage:

DC 6V-8.4V MAX 10V

Output voltage:

DC 5V-6V Adjustable

Output electrical current:

DC 0--8A

( Vin-Vout≤1V)

Regulating rate of power supply:

0.5%

Regulating rate of load:

0.5%

Over heat protection:

IC.Ti:90°C cut off

Ripple:

≤20mv

The battery status monitor is located on the top left of the VR-8L. Indication of input voltage: Red Led on when the input voltage under 6.5v; Yellow Led on when input voltage between 6.5v and 7v (including 6.5v); Green Led on when input voltage above 7v (including 7v). Tolerance ±3%.

#### How To Use:

There are four Dupont 3P wire connectors on the regulator, the power input are Futaba female, while the output are JR male. The short Dupont 3P Futaba (female one) is a switch plug. The VR-8L can be powered by 2 batteries for maximum run times. To maximize the current of the VR-8L, plug both output leads into 1 receiver, this will allow for 8-10A of current.

Notes: If you don't use the regulator in 24 hours, you'd better disconnect it from the battery because it remains a 4mA quiescent current.

### Overheat Protection:

When the product of the difference of regulator's input and output voltage and the output current is under 10W, the regulator works normally; if the product is above 10W, due to the increase of heat dissipation, the surface temperature of the IC will exceed 90°C and the regulator will turn into over heat protection Status by cutting off the output automatically. When it cools down to the limited temperature, the output resumes. Please pay special attention to that.

