

■ Miniature Type DC-DC Converter DC511C1, C2, C3, DC211C4

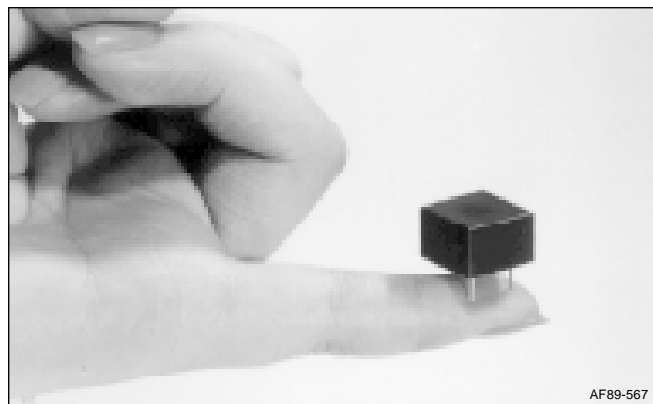
This unit is a high-performance DC-DC converter employing a unique structure and a case made of magnetic material, realizing miniaturized design and low noise operation.

Features

- Adoption of shield case made of magnetic material
- Low noise leakage flux
- Low noise and high efficiency
- Wide range of input voltage (8 to 35V)

Applications

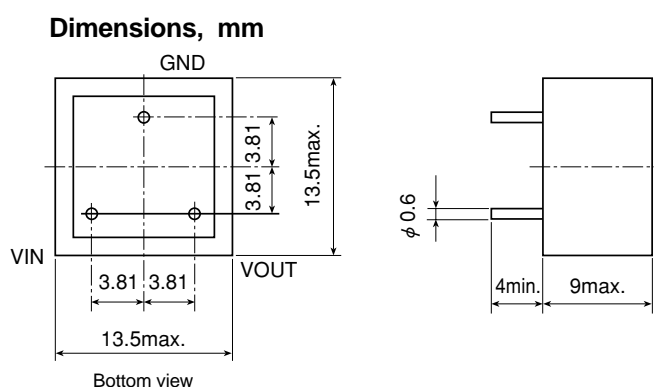
- Industrial devices: For control units and LED indication
- Battery devices: For lamps and vehicle devices
- AV devices: For monitoring cameras and audio devices



Ratings and characteristics

Absolute maximum rating

Item	Symbol	Ratings	Unit
Input voltage	V _{IN}	35	V
Operating temp. range	T _{opr}	-10 to +60	°C
Storage temp. range	T _{stg}	-25 to +85	°C



Electrical characteristics

Item	Symbol	Condition	Type				Unit
			DC511C1	DC511C2	DC511C3	DC211C4	
Rated input voltage			24	24	24	9.6	V
Rated output voltage			5	12	6	5	V
Rated output current			0.3	0.24	0.4	0.35	A
Input voltage range	V _{IN}		15 to 30	15 to 30	15 to 35	8 to 14	V
Output current range	I _o		0.01 to 0.3	0.001 to 0.24	0.2 to 0.4	0.2 to 0.5	A
Line regulation	ΔV _{Line}	Rated output	100 max.	100 max.	100 max.	50 max.	mV
Load regulation	ΔV _{Load}	Rated input	100 max.	100 max.	100 max.	50 max.	mV
Efficiency	η	Rated operation	80 typ.	85 typ.	80 typ.	84 typ.	%
Output ripple* (Including spike)	V _{ripp}	Rated operation	100 typ.	100 typ.	100 typ.	50 typ.	mVp-p

* Output ripple(Including spike): Appropriate capacitor is connected to the input and output side.

Recommendable capacitor: More than 100 μ F, less than 0.8 Ω (400kHz, -10 $^{\circ}$ C)