Material name :	Evaluation data
Customer's product name :	
TDK product name :	DC-DC converter CC1R5-1205SF-E , CC1R5-1205SR-E

TDK·Lambda

TDK Corporation
Power Systems Business Group

DWG.No.	TRSC-1507-2

Revised 2006/12/01

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＊ The measurement has been done without external output capacitor.

(Product specification)

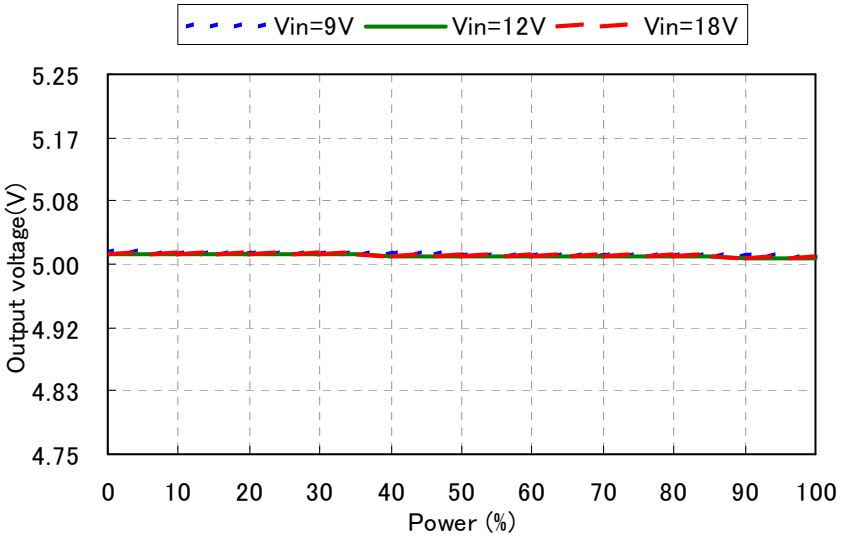
Product name	Input voltage(V)	Output voltage(V)	Output current(mA)	The maximum output power(W)	Ambient temperature(℃)
CC1R5-1205SF-E	9～18	5 ±3%	0～300	1.5	-40 ～ +85 *2
CC1R5-1205SR-E		6 ±3% *1	0～250		

*1 TRM and -Vout are short-circuited.

*2 At 50℃ or more, output power derating is necessary.

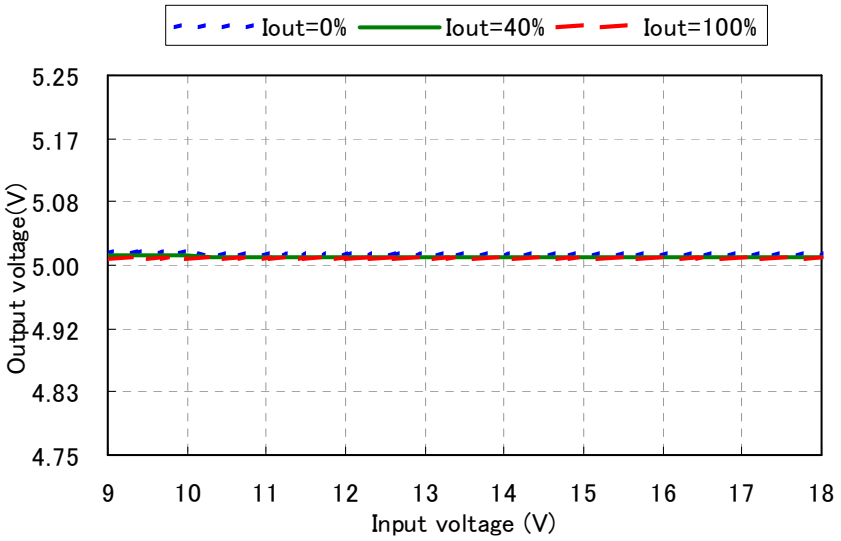
1. Load regulation

Condition Ta : 25℃



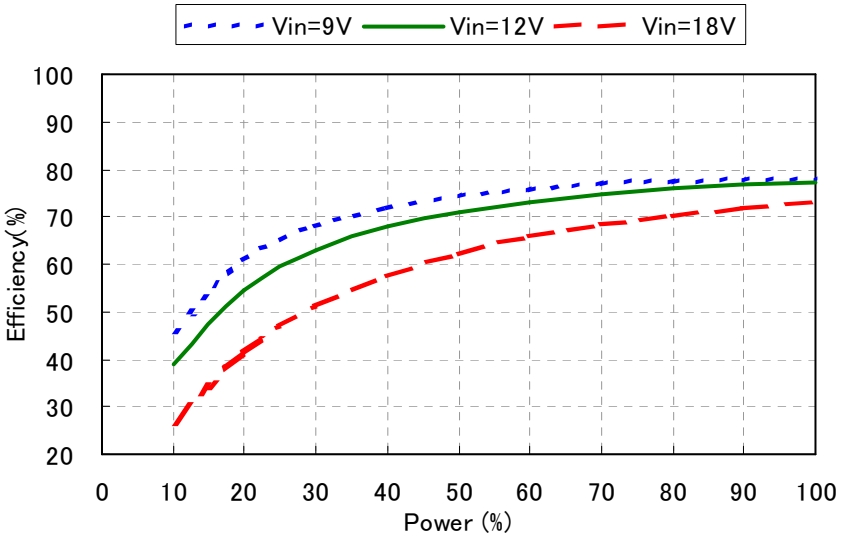
2. Line regulation

Condition Ta : 25℃



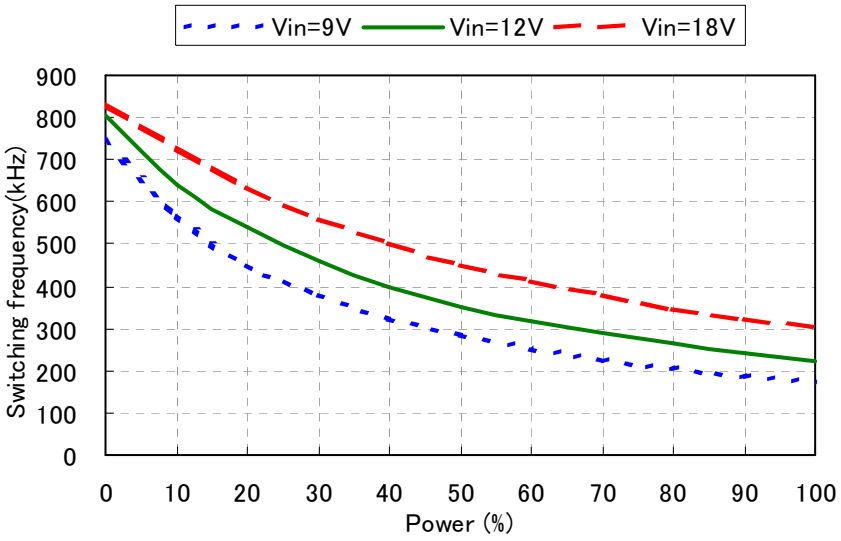
3. Efficiency

Condition Ta : 25℃



4. Switching frequency vs. output power

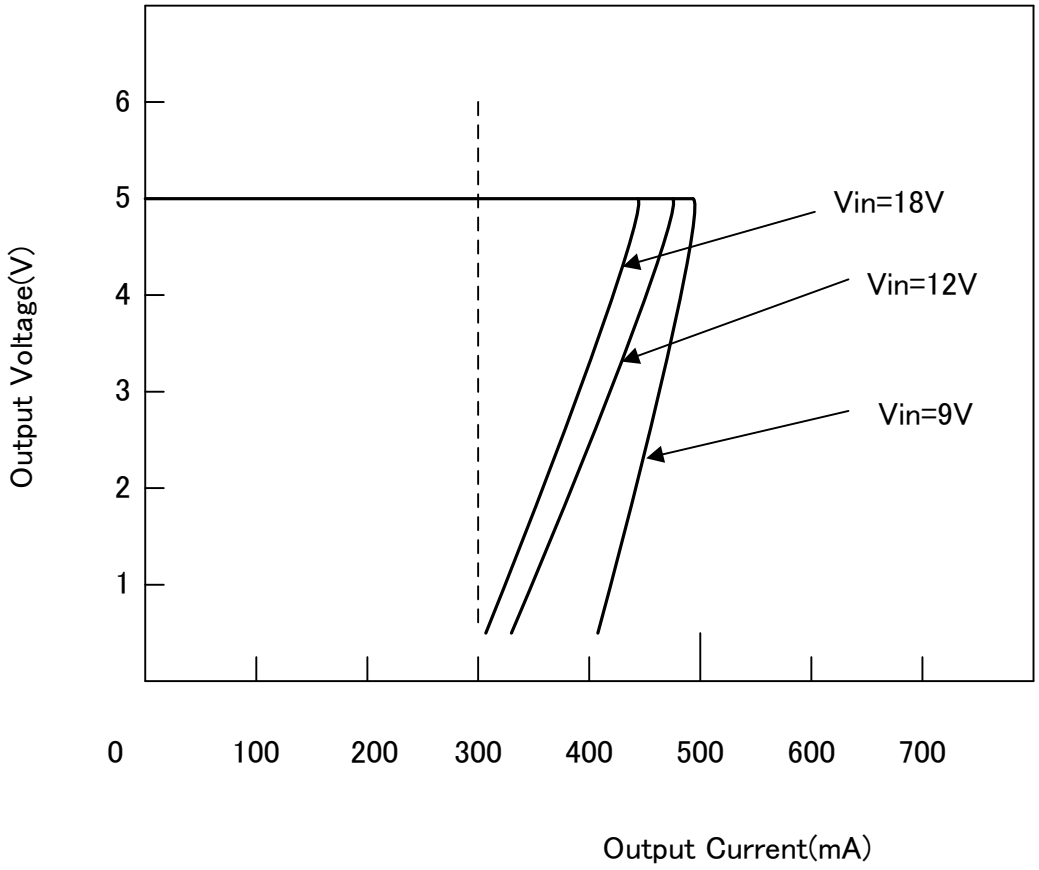
Condition Ta : 25℃



	Product name or model, title		
	DC-DC converter CC1R5-1205SF-E , CC1R5-1205SR-E		
TDK CORPORATION	Name of drawing	Drawing No.	PAGE
	Evaluation data	TRSC-1507-2	3/ 8

5. Over current protection characteristics

Condition Ta : 25℃



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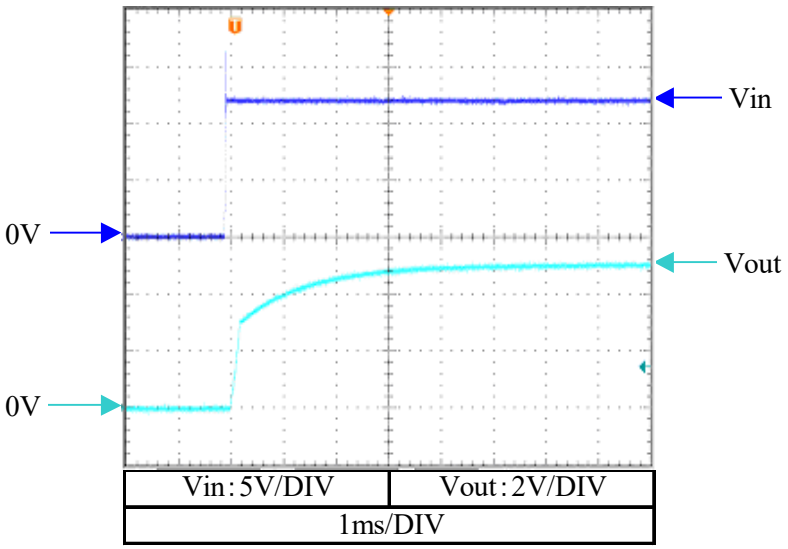
	Product name or model, title		
	DC-DC converter CC1R5-1205SF-E , CC1R5-1205SR-E		
TDK CORPORATION	Name of drawing	Drawing No.	PAGE
	Evaluation data	TRSC-1507-2	4/ 8

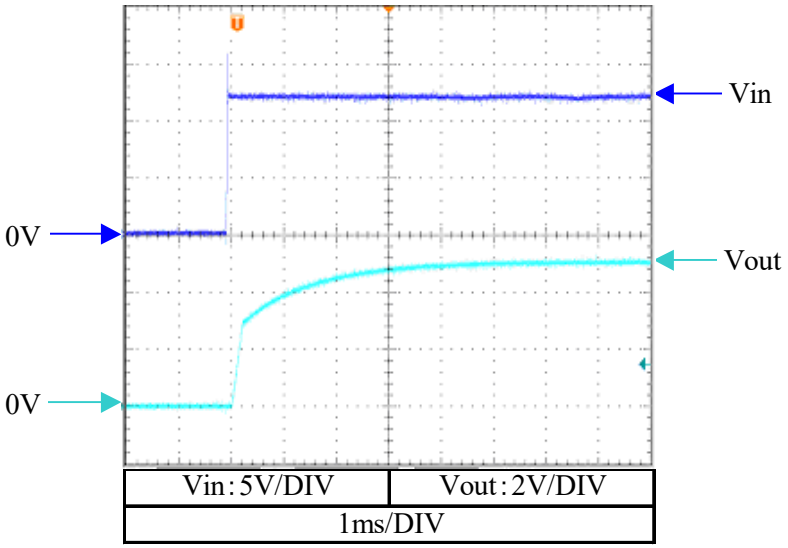
6. Output rise characteristics

Condition　　Vin　:　12V
Ta　:　25℃

Iout　:　0%



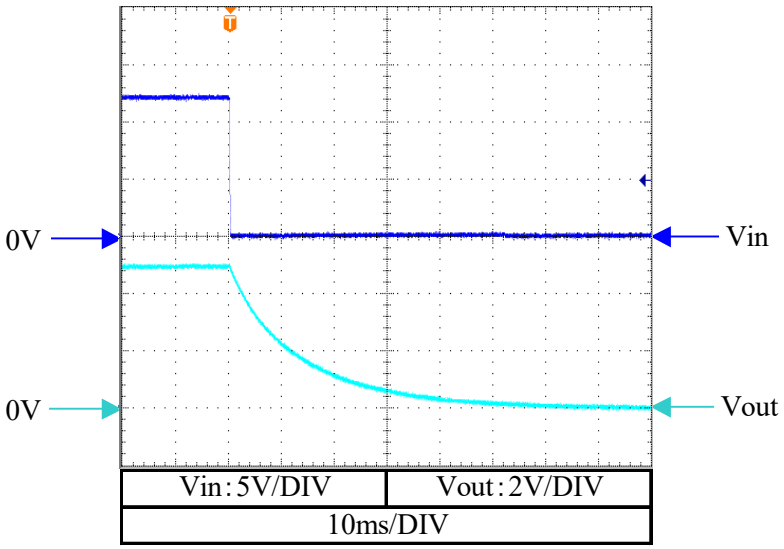
Iout　:　100%



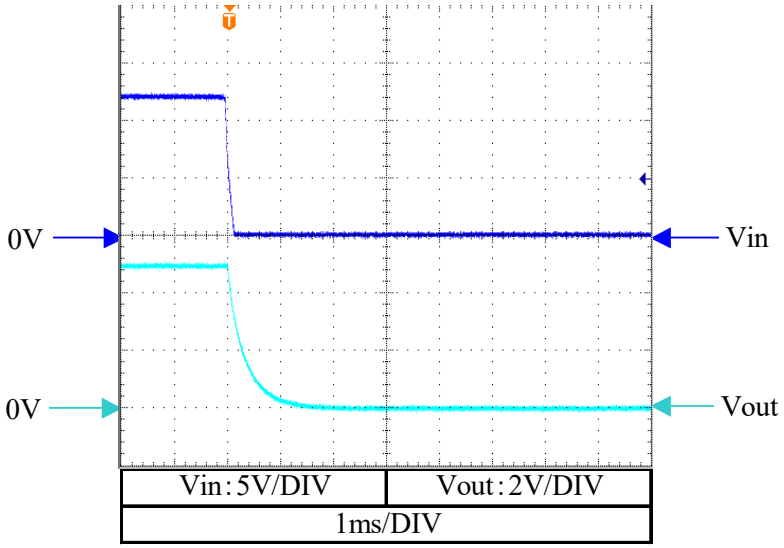
7. Output fall characteristics

Condition　　Vin　:　12V
Ta　:　25℃

Iout　:　0%



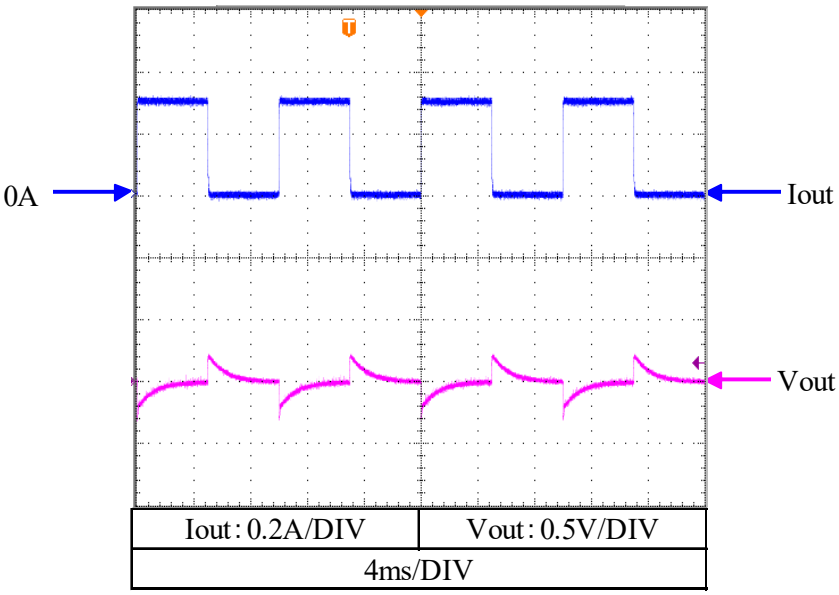
Iout　:　100%



8. Dynamic load response characteristics

Condition

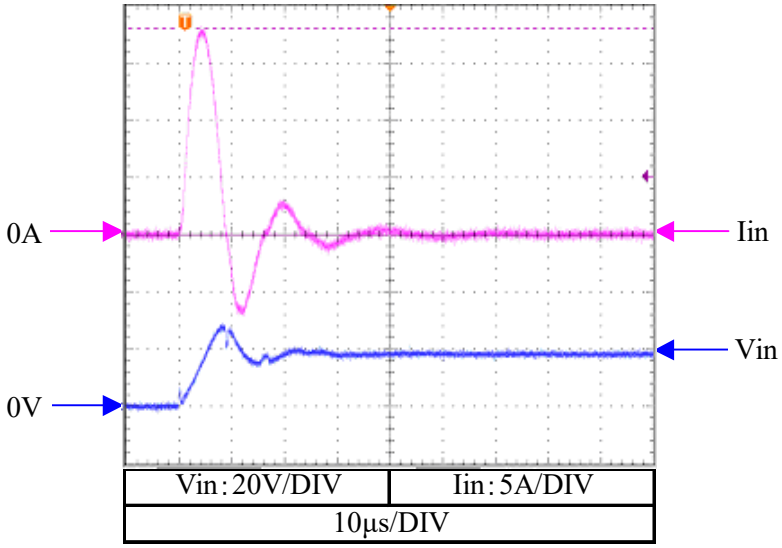
Vin : 12V
Vout : 5V
Iout : 0% ⇔ 100%
Tr=Tf : 100 μ s
f : 100Hz
Ta : 25℃



9. Inrush current waveform

Condition

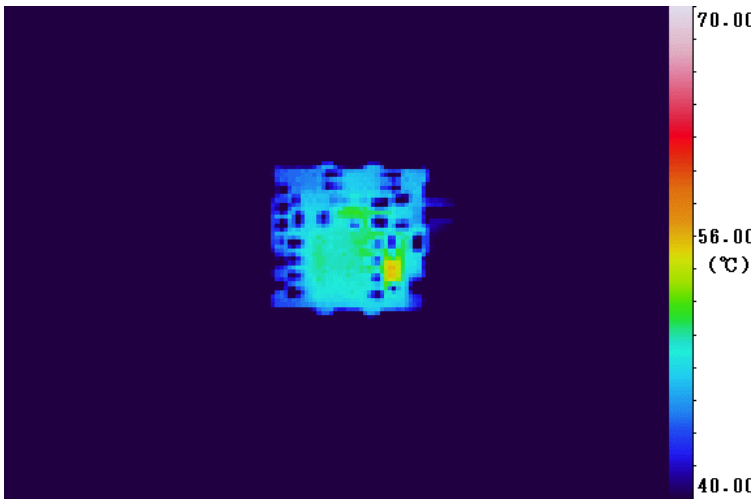
Vin : 18V
Iout : 100%
Ta : 25℃



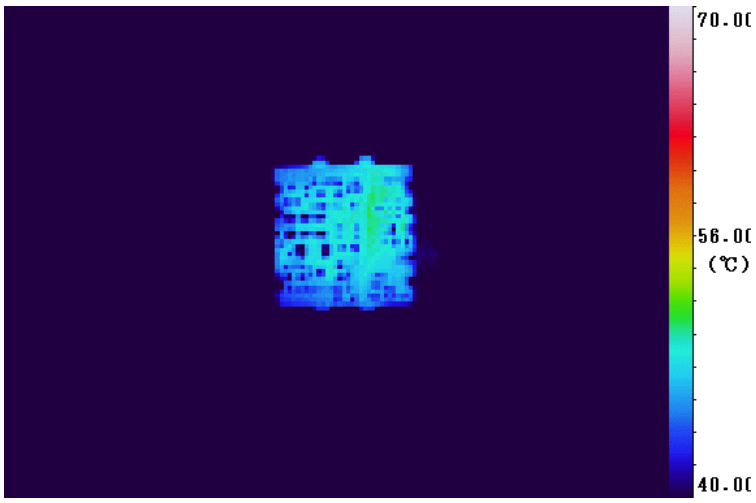
10. Temperature distribution

Condition
Vin : 12V
Vout : 5V
Iout : 100%
Ta : 25℃
Wind velocity : 0m/s

Top View



Bottom View



(＊)・This test was done on our evaluation board. (Glass epoxy substrate, Size:100x100x1.6mm)
・We measured the temperatures of parts without the case by using the thermography.
Therefore, it might be different a little from the actual temperature.