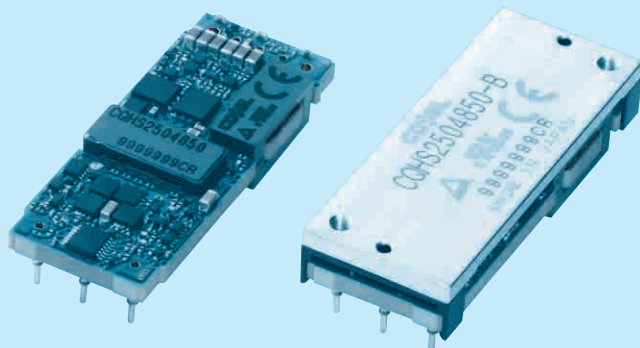


CQHS250

CQH S 250 48 50 -□

① ② ③ ④ ⑤ ⑥



- ① Series name
- ② Single output
- ③ Output wattage
- ④ Input voltage
48:DC36 - 76V
- ⑤ Output voltage
- ⑥ Optional
- R :with Remote ON/OFF
Positive logic control
- N :Auto restart in protection
circuit working
- B :Base plate option with
Mounting hole M3
- L2:Pin length 5.3mm

MODEL	CQHS2504832	CQHS2504850
MAX OUTPUT WATTAGE[W]	252.8	250
DC OUTPUT	32V 7.9A	50V 5.0A

SPECIFICATIONS

	MODEL	CQHS2504832	CQHS2504850
INPUT	VOLTAGE[V]	DC36 - 76	
	CURRENT[A]	*1 5.60typ	5.54typ
	EFFICIENCY[%]	*1 94typ	94typ
	START-UP VOLTAGE[V]	DC32 - 36	
	HYSTERESIS VOLTAGE[V]	DC2 min	
OUTPUT	VOLTAGE[V]	32	50
	CURRENT[A]	7.9	5.0
	LINE REGULATION[mV]	64max	100max
	LOAD REGULATION[mV]	64max	100max
	RIPPLE[mVp-p]	-20 to +85°C Vin=36-60V *2	255max
		-20 to +85°C Vin=60-76V *2	320max
		-40 to -20°C *2	320max
	RIPPLE NOISE[mVp-p]	-20 to +85°C *2	320max
		-40 to -20°C *2	410max
	TEMPERATURE REGULATION[mV]	-40 to +85°C	640max
	DRIFT[mV]	*3 120max	185max
	START-UP TIME[ms]	200max (DCIN 48V, Io=100%)	
	OUTPUT VOLTAGE ADJUSTMENT RANGE[V]	Fixed (TRM pin open), adjustable by external resistor	
		26.88 - 35.20	45.0 - 55.0
	OUTPUT VOLTAGE SETTING[V]*1	31.68 - 32.32	49.50 - 50.50
PROTECTION CIRCUIT AND OTHERS	OVERCURRENT PROTECTION	Works over 105% of rating, low voltage protection (shut down) function is built-in.	
	OVERVOLTAGE PROTECTION[V]	36.80 - 44.80	56.50 - 67.50
	REMOTE SENSING	Provided	
	REMOTE ON/OFF	Provided (Negative Logic L : ON, H :OFF)	
ISOLATION	INPUT-OUTPUT	DC1,500V or AC500V 1minute, Cutoff current = 10mA, DC500V 50MΩ min (20±15°C)	
	INPUT-BASE PLATE	*5 DC1,500V or AC500V 1minute, Cutoff current = 10mA, DC500V 50MΩ min (20±15°C)	
	OUTPUT-BASE PLATE	*5 AC500V 1minute, Cutoff current = 100mA, DC500V 50MΩ min (20±15°C)	
ENVIRONMENT	OPERATING TEMP.,HUMID.AND ALTITUDE	-40 to +85°C, 20 - 95%RH (Non condensing) (Refer to DERATING CURVE), 3,000m (10,000 feet) max	
	STORAGE TEMP.,HUMID.AND ALTITUDE	-40 to +100°C, 20 - 95%RH (Non condensing), 9,000m (30,000 feet) max	
	VIBRATION	10 - 55Hz, 49.0m/s ² (5G), 3minutes period, 60minutes each along X, Y and Z axis	
	IMPACT	196.1m/s ² (20G), 11ms, once each along X, Y and Z axis	
SAFETY	AGENCY APPROVALS	UL60950-1, C-UL (CSA60950-1), EN60950-1	
OTHERS	CASE SIZE/WEIGHT	57.9×10.5×22.76mm [2.28×0.41×0.9 inches] (W×H×D) / 30g max	
		58.4×12.7×23.26mm [2.3×0.5×0.92 inches] (W×H×D) / 45g max *5	
	COOLING METHOD	Convection / Forced air / Conduction	

*1 At rated input(DC48V), rated load. Ta= 25°C, 2m/s.

*2 Ripple and ripple noise is measured by using measuring board. Refer to the manual.

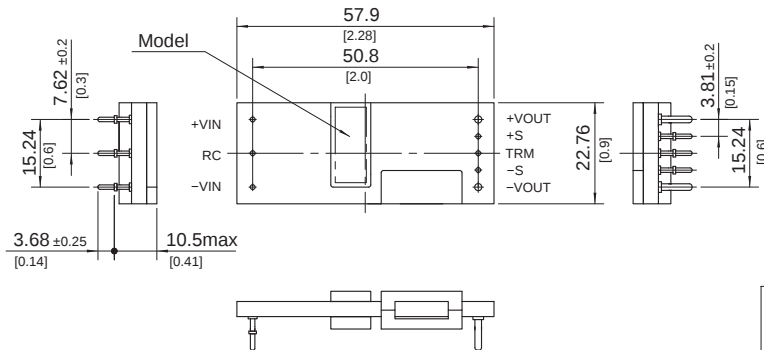
*3 Drift is the change in DC output for an eight hour period after a half-hour warm-up at 25°C, with the input voltage held constant at the rated input/output.

*4 When the input voltage is in the range of DC36-40V, output voltage is limited. Refer to the manual.

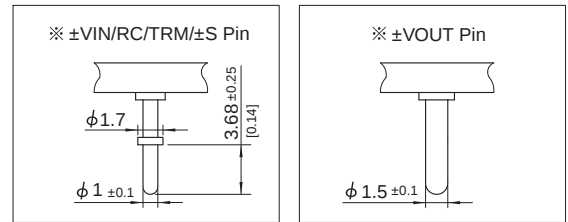
*5 Base Plate Option.

External view

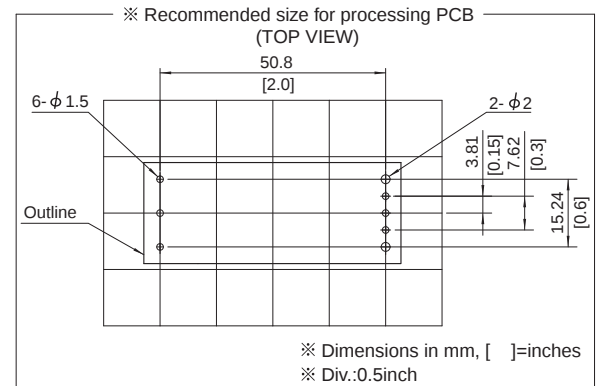
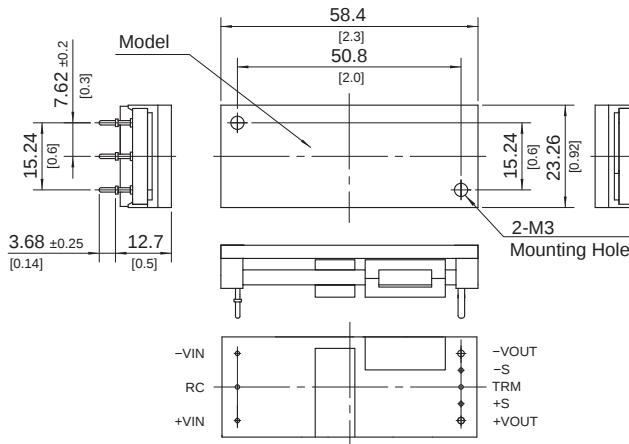
1. DIP



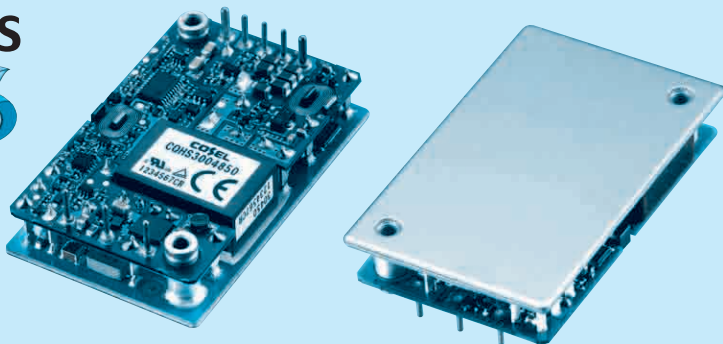
- ※ Tolerance : ± 0.5 [± 0.02]
- ※ Weight : 30g max(DIP)
45g max(Base Plate)
- ※ Dimensions in mm, []=inches



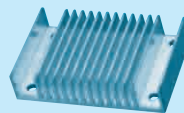
2. Base Plate (option B)



CQHS300

CQH S 300 48 50 -□
① ② ③ ④ ⑤ ⑥

*Providing heat sink as option



- ① Series name
② Single output
③ Output wattage
④ Input voltage
48:DC36 - 76V
⑤ Output voltage
⑥ Optional
R :with Remote ON/OFF
Positive logic control
T :with Mounting hole
φ 3.4 thru

MODEL	CQHS3004832	CQHS3004850
MAX OUTPUT WATTAGE[W]	300.8	300
DC OUTPUT	32V 9.4A	50V 6A

SPECIFICATIONS

	MODEL	CQHS3004832	CQHS3004850
INPUT	VOLTAGE[V]	DC36 - 76	
	CURRENT[A]	*1 6.67typ	6.65typ
	EFFICIENCY[%]	*1 94typ	94typ
	START-UP VOLTAGE[V]	DC32 - 36	
	HYSTERESIS VOLTAGE[V]	DC2 min	
OUTPUT	VOLTAGE[V]	32	50
	CURRENT[A]	9.4	6.0
	LINE REGULATION[mV]	64max	100max
	LOAD REGULATION[mV]	64max	100max
	RIPPLE[mVp-p]	-20 to +100°C *2	255max
		-40 to -20°C Vin=36-60V *2	320max
		-40 to -20°C Vin=60-76V *2	400max
	RIPPLE NOISE[mVp-p]	-20 to +100°C *2	320max
		-40 to -20°C *2	410max
	TEMPERATURE REGULATION[mV]	0 to +65°C	320max
		-40 to +100°C	640max
	DRIFT[mV]	*3 120max	185max
	START-UP TIME[ms]	200max (DCIN 48V, Io=100%)	
PROTECTION CIRCUIT AND OTHERS	OUTPUT VOLTAGE ADJUSTMENT RANGE[V]	Fixed (TRM pin open), adjustable by external resistor 27.2 - 35.2	45.0 - 55.0
	OUTPUT VOLTAGE SETTING[V]	*1 31.68 - 32.32	49.50 - 50.50
	OVERCURRENT PROTECTION	Works over 105% of rating, low voltage protection (shut down) function is built-in.	
	OVERVOLTAGE PROTECTION[V]	36.80 - 44.80	56.50 - 67.50
	REMOTE SENSING	Provided	
ISOLATION	REMOTE ON/OFF	Provided (Negative Logic L : ON, H :OFF)	
	INPUT-OUTPUT	DC1,500V or AC500V 1minute, Cutoff current = 10mA, DC500V 50MΩ min (20±15°C)	
	INPUT-BASE PLATE	DC1,500V or AC500V 1minute, Cutoff current = 10mA, DC500V 50MΩ min (20±15°C)	
ENVIRONMENT	OUTPUT-BASE PLATE	AC500V 1minute, Cutoff current = 100mA, DC500V 50MΩ min (20±15°C)	
	OPERATING TEMP., HUMID. AND ALTITUDE	-40 to +100°C (On aluminum base plate), 20 - 95%RH (Non condensing) (Refer to DERATING CURVE), 3,000m (10,000 feet) max	
	STORAGE TEMP., HUMID. AND ALTITUDE	-40 to +100°C, 20 - 95%RH (Non condensing), 9,000m (30,000 feet) max	
	VIBRATION	10 - 55Hz, 49.0m/s ² (5G), 3minutes period, 60minutes each along X, Y and Z axis	
SAFETY	IMPACT	196.1m/s ² (20G), 11ms, once each along X, Y and Z axis	
	AGENCY APPROVALS	UL60950-1, C-UL (CSA60950-1), EN60950-1	
OTHERS	CASE SIZE/WEIGHT	57.9×12.7×36.8mm [2.28×0.5×1.45 inches] (W×H×D) / 75g max	
	COOLING METHOD	Conduction cooling (e.g. heat radiation from the aluminum base plate to the attached heat sink)	

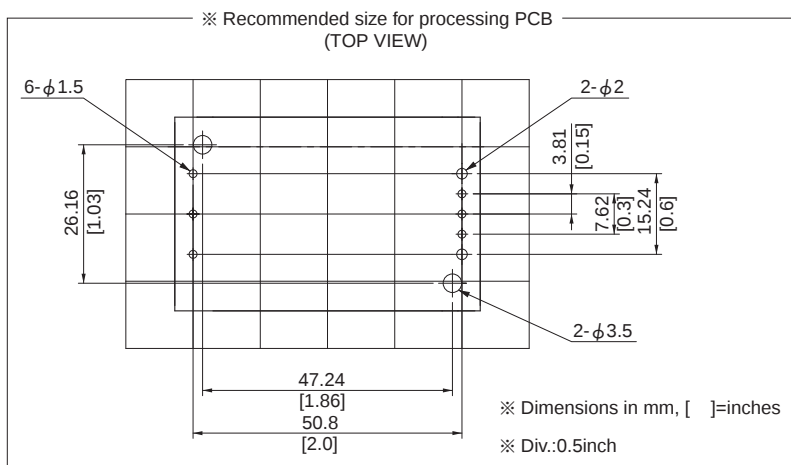
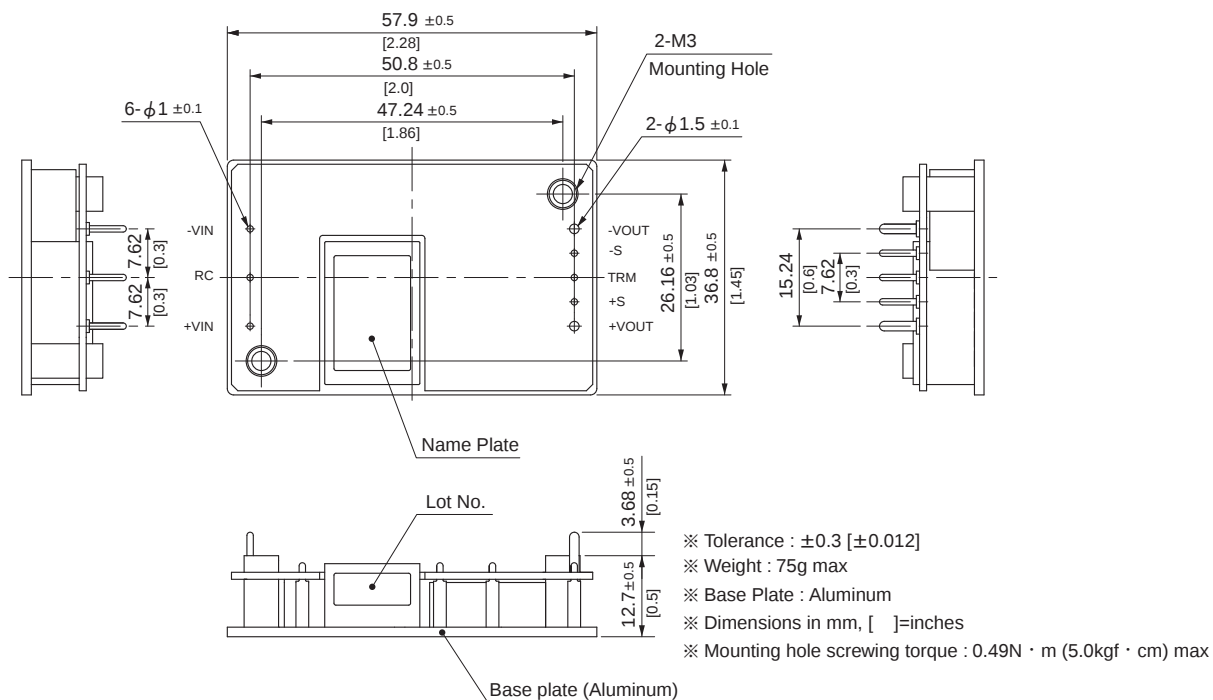
*1 At rated input(DC48V), rated load, and aluminum base plate temperature 25°C.

*2 Ripple and ripple noise is measured by using measuring board with recommended capacitor Co & the film capacitor 0.1μF.

*3 Drift is the change in DC output for an eight hour period after a half-hour warm-up at 25°C, with the input voltage held constant at the rated input/output.

*4 When the input voltage is in the range of DC36-40V, output voltage is limited. Refer to the manual.

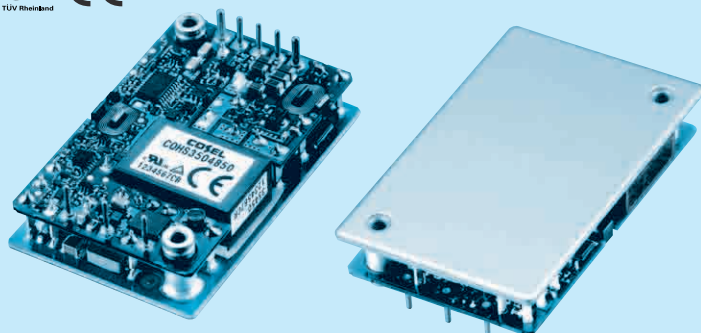
External view



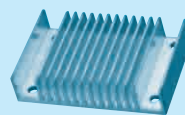
CQHS350

CQH S 350 48 50 -□

① ② ③ ④ ⑤ ⑥



*Providing heat sink as option



- ① Series name
- ② Single output
- ③ Output wattage
- ④ Input voltage
48:DC36 - 65V
- ⑤ Output voltage
- ⑥ Optional
- R :with Remote ON/OFF
Positive logic control
- T :with Mounting hole
φ 3.4 thru

MODEL	CQHS3504832	CQHS3504850
MAX OUTPUT WATTAGE[W]	352	350
DC OUTPUT	32V 11A	50V 7A

SPECIFICATIONS

	MODEL	CQHS3504832	CQHS3504850
INPUT	VOLTAGE[V]	DC36 - 65	
	CURRENT[A]	*1 7.8typ	7.76typ
	EFFICIENCY[%]	*1 94typ	94typ
	START-UP VOLTAGE[V]	DC32 - 36	
	HYSTERESIS VOLTAGE[V]	DC2 min	
OUTPUT	VOLTAGE[V]	32	50
	CURRENT[A]	11.0 *5	7.0
	LINE REGULATION[mV]	64max	100max
	LOAD REGULATION[mV]	64max	100max
	RIPPLE[mVp-p]	-20 to +100°C *2	255max
		-40 to -20°C Vin=36-60V *2	320max
		-40 to -20°C Vin=60-65V *2	400max
	RIPPLE NOISE[mVp-p]	-20 to +100°C *2	320max
		-40 to -20°C *2	410max
	TEMPERATURE REGULATION[mV]	0 to +65°C	320max
		-40 to +100°C	640max
	DRIFT[mV]	*3 120max	185max
	START-UP TIME[ms]	200max (DCIN 48V, Io=100%)	
PROTECTION CIRCUIT AND OTHERS	OUTPUT VOLTAGE ADJUSTMENT RANGE[V]	Fixed (TRM pin open), adjustable by external resistor 26.88 - 35.20	
	OUTPUT VOLTAGE SETTING[V]	*1 31.68 - 32.32	45.0 - 55.0
	OVERCURRENT PROTECTION	Works over 105% of rating, low voltage protection (shut down) function is built-in.	
	OVERVOLTAGE PROTECTION[V]	36.80 - 44.80	56.50 - 67.50
	REMOTE SENSING	Provided	
ISOLATION	REMOTE ON/OFF	Provided (Negative Logic L : ON, H :OFF)	
	INPUT-OUTPUT	DC1,500V or AC500V 1minute, Cutoff current = 10mA, DC500V 50MΩ min (20±15°C)	
	INPUT-BASE PLATE	DC1,500V or AC500V 1minute, Cutoff current = 10mA, DC500V 50MΩ min (20±15°C)	
ENVIRONMENT	OUTPUT-BASE PLATE	AC500V 1minute, Cutoff current = 100mA, DC500V 50MΩ min (20±15°C)	
	OPERATING TEMP.,HUMID.AND ALTITUDE	-40 to +100°C (On aluminum base plate), 20 - 95%RH (Non condensing) (Refer to DERATING CURVE), 3,000m (10,000 feet) max	
	STORAGE TEMP.,HUMID.AND ALTITUDE	-40 to +100°C, 20 - 95%RH (Non condensing), 9,000m (30,000 feet) max	
	VIBRATION	10 - 55Hz, 49.0m/s ² (5G), 3minutes period, 60minutes each along X, Y and Z axis	
SAFETY	IMPACT	196.1m/s ² (20G), 11ms, once each along X, Y and Z axis	
	AGENCY APPROVALS	UL60950-1, C-UL (CSA60950-1), EN60950-1	
OTHERS	CASE SIZE/WEIGHT	57.9×12.7×36.8mm [2.28×0.5×1.45 inches] (W×H×D) / 75g max	
	COOLING METHOD	Conduction cooling (e.g. heat radiation from the aluminum base plate to the attached heat sink)	

*1 At rated input(DC48V), rated load, and aluminum base plate temperature 25°C.

*2 Ripple and ripple noise is measured by using measuring board with recommended capacitor Co & the film capacitor 0.1μF.

*3 Drift is the change in DC output for an eight hour period after a half-hour warm-up at 25°C, with the input voltage held constant at the rated input/output.

*4 When the input voltage is in the range of DC36-40V, output voltage is limited. Refer to the manual.

*5 Rated current is increased adjusting output voltage to lower than rated output voltage. Refer to the manual.

External view

