

2.5-inch SATA SSD TLC SSD-xxxS-2TP series



* Specifications, color and design of the products are subject to change without notice.

Specifications

Item		Specifications
Host interface		SATA III (6.0Gbps)
Installed Memory		TLC NAND Flash memory
	Total capacity	SSD-128GS-2TP: 114,473 MB SSD-256GS-2TP: 228,936 MB SSD-512GS-2TP: 457,862 MB SSD-1TS-2TP: 915,715 MB
	LBA	SSD-128GS-2TP: 234,441,648 SSD-256GS-2TP: 468,862,128 SSD-512GS-2TP: 937,703,088 SSD-1TS-2TP: 1,875,385,008
Transfer velocity	Read*1	SSD-128GS-2TP: 430 MB/sec SSD-256GS-2TP: 550 MB/sec SSD-512GS-2TP: 550 MB/sec SSD-1TS-2TP: 550 MB/sec
	Write*1	SSD-128GS-2TP: 210 MB/sec SSD-256GS-2TP: 440 MB/sec SSD-512GS-2TP: 510 MB/sec SSD-1TS-2TP: 490 MB/sec
Input voltage		+5VDC (±5%)
Current consumption	Idle (Typ.)	SSD-128GS-2TP: 155mA SSD-256GS-2TP: 160mA SSD-512GS-2TP: 180mA SSD-1TS-2TP: 189mA
	Read (Typ.)	SSD-128GS-2TP: 285mA SSD-256GS-2TP: 303mA SSD-512GS-2TP: 310mA SSD-1TS-2TP: 310mA
	Write (Typ.)	SSD-128GS-2TP: 228mA SSD-256GS-2TP: 301mA SSD-512GS-2TP: 308mA SSD-1TS-2TP: 310mA
Environment Requirements	Operating temperature	0 - +70°C
	Storage temperature	-40 - +85°C
	Humidity	10 - 95%RH (With no condensation)
	Corrosive gases	None
	Swept sine vibration	20G or less (7 - 2,000Hz)
	Shock	1500G or less (0.5ms)
NAND Flash memory life span		3,000cycles
Physical dimensions (mm)		69.85(W)×100.0(D)×7.0(H)
Weight (Max.)		60g (approx.)

*1 It might differs depending on the software or host to be used.

Packing List

Product ...1

Product Guide ...1

Warranty Certificate ...1

Serial Number Label ... 1

This product is a solid state drive in accordance with 2.5-inch SATA standard.

Write Protect compatible.

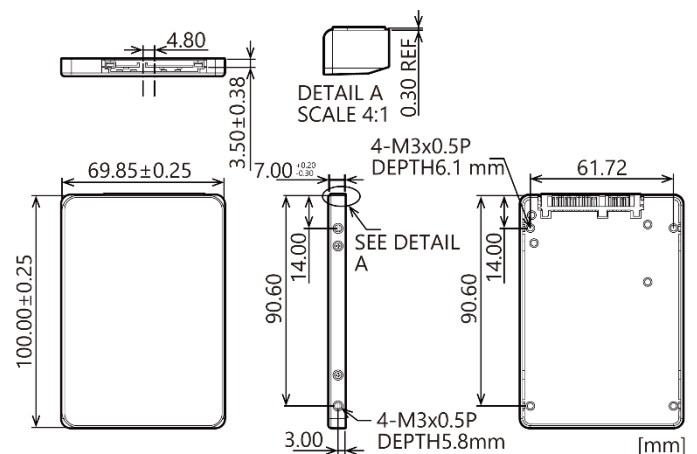
SSD-128GS-2TP	2.5inch 128GB SATA SSD TLC
SSD-256GS-2TP	2.5inch 256GB SATA SSD TLC
SSD-512GS-2TP	2.5inch 512GB SATA SSD TLC
SSD-1TS-2TP	2.5inch 1TB SATA SSD TLC

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* Visit the CONTEC website to check the latest details.

* The information in the data sheets is as of December 2025.

Physical Dimensions



Connector Pin Assignment

Pin	Signal	Pin	Signal	Pin	Signal	Pin	Signal
S1	GND	S2	A+	S3	A-	S4	GND
S5	B-	S6	B+	S7	GND		
P1	N.C.	P2	N.C.	P3	N.C.	P4	GND
P5	GND	P6	GND	P7	5V	P8	5V
P9	5V	P10	GND	P11	DAS/DSS	P12	GND
P13	N.C.	P14	N.C.	P15	N.C.		

*1 POWER NOT CONNECTED

About write endurance

SSD has write endurance which limits the number of times each memory may be writ-ten, due to the characteristic of the memory that is used. Write endurance can be calculated by the following formula as a reference value:

Write endurance (years) = Total rewrite life (cycles) / (The number of annual consumed blocks / The total number of blocks)

Example :

Capacity: 128GB, Rewrite life: 3,000cycles

When the file of 4MB is made, and it rewrites it once per 10 seconds.

The number of annual consumed blocks = (4 x (60 / 10) x 60 x 24 x 365) / 18 = 700,800(blocks)

Life = 3,000 / (700,800 / 7,200) ≈ 30.82 (years)

For other capacities, replace the number of annual consumed blocks and the total number of blocks with the following.

In the case of SSD-256GS-2TP, the number of annual consumed blocks: 700,800, the total number of blocks: 14,400

For the SSD-512GS-2TP, the number of annual consumed blocks: 700,800, total number of blocks: 28,800

For the SSD-1TS-2TP, the number of annual consumed blocks: 700,800, total number of blocks: 57,600

These are reference values. Confirm its longevity by the following S.M.A.R.T. after installing the specific software (*) and implement tentative writing.

* Life expectancy can be obtained by installing the self-diagnosis program that acquires S.M.A.R.T. information of SSD.