

2.5" SATA Enterprise SSD ASD+SDC12 Series

2.5" SATA SSD for
Enterprise Applications



Features

- Advanced Flash Management including static and dynamic wear leveling, bad block management, TRIM, SMART, over-provision, and firmware update
- Thermal Throttling to keep the optimal performance in the safe range of the temperature
- TCG OPAL 2.0 with Physical Presence SID (PSID)
- Operating temperature range: 0°C ~ 70°C
- MTBF of more than 1,500,000 hours
- Vibration and shock resistance
- RoHS compliant

Introduction

ADLINK's enterprise 2.5" SATA SSD Series delivers all the advantages of today's flash disk technologies with SATA 6Gb/s interface, and is fully compliant with the standard 2.5" 7mm form factor.

Capacities of 480GB to 7680GB are available and read/write speeds of up to 530 MB/s and 500 MB/s respectively are supported.

Ordering Information

| | |
|-------------------|---|
| ASDXS25SMC-480GTF | 2.5" SSD ASD+SDC12 Series, BiCS5 3D TLC, 1 DWPD, 480GB, 0°C ~ 70°C |
| ASDXS25SMC-960GTF | 2.5" SSD ASD+SDC12 Series, BiCS5 3D TLC, 1 DWPD, 960GB, 0°C ~ 70°C |
| ASDXS25SMC-1920TF | 2.5" SSD ASD+SDC12 Series, BiCS5 3D TLC, 1 DWPD, 1920GB, 0°C ~ 70°C |
| ASDXS25SMC-3840TF | 2.5" SSD ASD+SDC12 Series, BiCS5 3D TLC, 1 DWPD, 3840GB, 0°C ~ 70°C |
| ASDXS25SMC-7680TF | 2.5" SSD ASD+SDC12 Series, BiCS5 3D TLC, 1 DWPD, 7680GB, 0°C ~ 70°C |

Specifications

| Model | ASD+SDC12 Series | |
|--------------------------------|--|-----------------------------------|
| Capacity ¹ | 480, 920, 1920, 3840, 7680GB | |
| Form Factor | 2.5" SATA 100.00mm(L) x69.85mm(W)x 7.00mm(H) | |
| SATA Interface | SATA Revision 3.2 SATA 1.5Gb/s, 3Gb/s, and 6Gb/s interface | |
| Flash Type | BiCSS 3D TLC | |
| Performance ² | Read: up to 530 MB/s Write: up to 500 MB/s Random 4K Read: up to 98K IOPS Random 4K Write: up to 50K IOPS | |
| Power Consumption | Active mode: < 3.8W Idle mode: < 1.6W | |
| MTBF | More than 1,500,000 hours | |
| DWPD | 1 | |
| Advanced Flash Management | Advanced Wear Leveling Bad Block Management TRIM S.M.A.R.T Over Provision Firmware Update | |
| Advanced Device Security | Secure Erase Crypto Erase Physical Presence SID (PSID) | |
| Temperature Range ³ | Operating ⁴ | 0°C ~ 70°C with specified airflow |
| | Storage | -40°C to 85°C |
| Environment | Vibration: 20Hz to 80Hz / 1.52mm 80Hz to 2000Hz / 20Gp-p Shock (operation/non-operating): 1500G @0.5ms | |
| RoHS compliant | Yes | |

Notes:

1. Other capacities may be supported in the future.
2. Performance benchmarked by CrystalDiskMark.
3. As measured by SMART temperature. Active airflow is recommended within the system for maintaining proper device operating temperature on heavier workloads.
4. Actual operating temperature specification may vary by model.