



## N745-M80 | M.2 PCIe SSD



The N745-M80 SSD of TEAMGROUP's industrial product line - the PCIe series - supports the ultra-fast NVMe 1.3 protocol, PCIe Gen3x4 slots, and the latest BiCS 112-layer 3D NAND technology, increasing I/O efficiency by 50% more than 96-layer 3D NANDs. The product supports SLC caching technology and drastically increases computing efficiency and is also equipped with LDPC ECC, global wear leveling technology, and bad block management. TEAMGROUP testing reveals that the SSD is a durable-grade SSD that supports up to 3,000 wear leveling counts, which also delivers low latency and high efficiency. The SSD can be applied to 5G, edge computing, smart monitoring, smart healthcare, and future metaverse applications and can become the most reliable, optimal storage solution for industrial clients.

### Main Feature

- Adopts a 112-layer 3D NAND to increase I/O efficiency by nearly 50% (\*compared to the 96-layer 3D NAND)
- PCI-e interface - supports the latest NVMe 1.3 protocol and is compatible with the latest M.2 specifications (length: 80mm)
- Supports SLC caching technology & drastically increases computing efficiency
- Built-in LDPC ECC for error correction
- Supports S.M.A.R.T. function (exclusive smart tool software developed by TEAMGROUP)
- Great durability with 3,000 wear-leveling counts to effectively support high workloads

### Ordering Information

N745-M80	Capacity	Team P/N
Standard Temp.	256GB	TE256GN745KM80
	512GB	TE512GN745KM80
	1TB	TE1TN745KM80

### Specification

Interface	PCIe 3.0 x4
Flash Type	3D TLC
Capacity	256GB / 512GB / 1TB <sup>[1]</sup>
Sequential R/W	R/W: 2,100 / 1,700MB/s (Max.) <sup>[2]</sup>
Max. Power Consumption	3.3V x 775mA (operation)
Dimension	80.0(L) x 22.0(W) x 3.8(H) mm
Shock	<ul style="list-style-type: none"><li>• Operation: 50G/11ms (compliant with MIL-STD-202G Test condition A)</li><li>• Non-operation: 1500G/0.5ms (compliant with MIL-STD-883K Test condition B)</li></ul>
Vibration	<ul style="list-style-type: none"><li>• Operation: 7.69 Grms, 20~2000 Hz/random (compliant with MIL-STD-810G General)</li><li>• Non-operation: 4.02 Grms, 15 ~ 2000 Hz/sine (compliant with MIL-STD-810G General)</li></ul>
MTBF	> 3 million hours
Storage Temperature	-55°C ~ +95°C
Operation Temperature	Standard Temp.: 0°C (32°F) ~ 70°C (158°F)
P/E Cycle	3K
Thermal Sensor	✓
External DRAM Buffer	X
TRIM	✓
S.M.A.R.T.	✓
Warranty	3-year limited warranty <sup>[3]</sup>

[1] 1GB=1,000,000,000 Bytes. In OS system, it would be displayed as 1,000,000,000 Bytes/1024/1024/1024 ≈0.93GB

[2] Transmission speed will vary according to different hardware/software conditions, therefore the data can only use for basic reference.

[3] The warranty period of solid-state drives (SSD) products is divided into a warranty of years and a warranty of the number of disk writes. One of the two conditions [the earlier one is the standard]. Any improper action that causes the flash to exceed the lifespan limitation will not be warranted. (Erase Count MLC: 3,000 times, SLC: 60,000 times, High Endurance 3D TLC(10K): 10,000 times, Industrial 3D TLC: 3,000 times) The erase count judge standard is to use TEAMGROUP official released S.M.A.R.T. Tool.

※ We reserve the right to modify product specifications without prior notice.