TOOL-LESS M.2 NVMe SERIES
PCIe 3.0/ 4.0 M.2 in 2230 2242 2260 2280

V3

M.2 NVMe SSD Backplane Cage
Support PCIe3.0 / PCIe4.0

GM3-102M2-Fr

nvm EXPRESS

Model	GM3-102M2-Fr
SSD Type	2 x M.2 NVMe SSD(PCIe 3.0/4.0)
SSD Spec	M Key in 2230 / 2242 / 2260 / 2280
LED	Power: Green / Access: Orange
M.2 SSD Installation	Tool-less installation or Built-in Screw installation
Security	Tri-angle Keylock
Fan	1 x 7010 Cooling Fan (2800rpm)
PCB	Optimized layout for PCIe4.0
Power	2 x Mini 4pin Power connector
Data	2 x SlimSAS SFF-8654 4i connector (SFF-9402 rev1.1 spec)
Dimension	159(L) x 101.2(W) x 25.4mm(H)

GM3-102M2-Fr

TOOL-LESS

![JOUJYE logo]

TOOL-LESS M.2 NVMe SERIES (OCuLink Connector)
V3
PCIe 3.0/ 4.0 M.2 in 2230 2242 2260 2280

M.2 NVMe SSD Backplane Cage
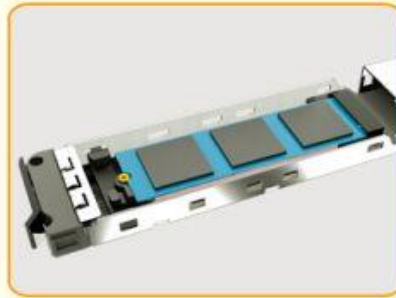Support PCIe3.0 / PCIe4.0

GO3-102M2-Fr   nvm EXPRESS

| Model	GO3-102M2-Fr
SSD Type	2 x M.2 NVMe SSD(PCIe 3.0/4.0)
SSD Spec	M Key in 2230 / 2242 / 2260 / 2280
LED	Power: Green / Access: Orange
M.2 SSD Installation	Tool-less installation or Built-in Screw installation
Security	Tri-angle Keylock
Fan	1 x 7010 Cooling Fan (2800rpm)
PCB	Optimized layout for PCIe4.0
Power	2 x Mini 4pin Power connector
Data	2 x OCuLink SFF-8611 4i connector (SFF-9402 rev1.1 spec)
Dimension	159(L) x 101.2(W) x 25.4mm(H)

GO3-102M2-Fr

TOOL-LESS

Push the front angle hook and press downard the M.2 SSD

The installation of M.2 SSD is finished easily.
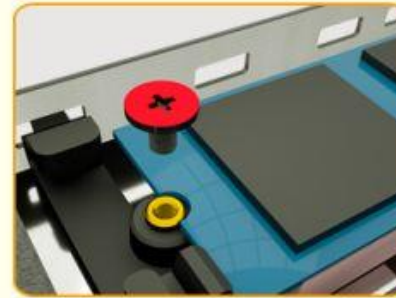
A fastened screw is also provided for some extreme anti-vibration concern

(3.5HDD Floppy Size)

25.4mm(H)

Dual M.2 NVMe SSD Cage in 3.5" HDD (Floppy) Size

Support 2 x PCIe 3.0 / PCIe 4.0 M.2 NVMe SSD with M key (PCIe 3.0/4.0 x4) or B+M Key (PCIe 3.0 x2) and in length of 2230 / 2242 / 2260 / 2280 and can fit in 3.5HDD (floppy) space.

Sucurity Tri-angle Keylock

The front Tri-angle Metal Keylock help you lock the bezel and protect your confidential data.

Made by Stainless & Aluminum

Stainless material frame, aluminum heat sink, aluminum bezel & stainless tray with anti-vibration springs --- All make it solid and reliable to swap in/out the installed M.2 NVMe SSD.
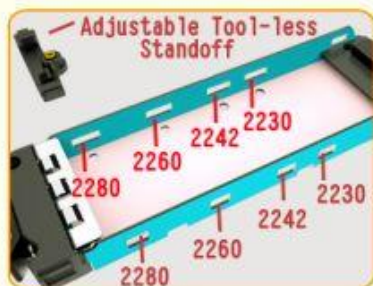
LED Indication

The high brightness of LED light is directed to the front, easy to know the status of M.2 SSD from the outside. (Better visual solution, comparing to the M.2 installation on the mainboard)

Power ON : Solid Green / Access : Orange blinking / No indication when M.2 NVMe SSD is not installed
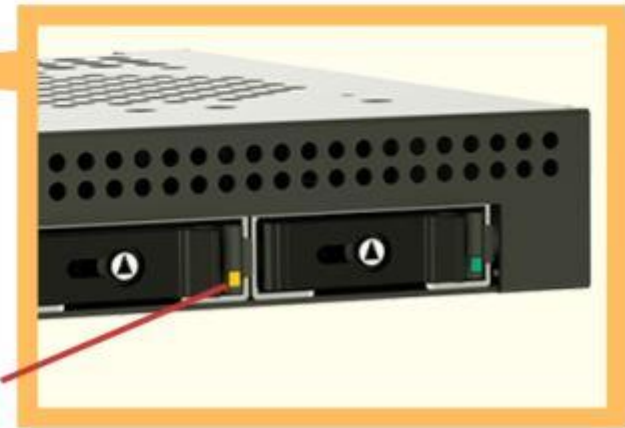
Adjustable Tool-Less Standoff, Easy for 2230, 2242, 2260, 2280 Installation

Check the size of M.2 SSD for the corresponding square holes

Insert the left bump into the left square hole at 45° angle, press side angle hook, the right bump is fixed

Make sure the both bumps are all fixed

## EMI Grounding Design

★ The stainless spring can conduct the EMI to the frame and grounded with the case to avoid the static interference.

★ In the meantime, the spring can also reduce the vibration during the operation and/or the transportation on the set of the device.

Optional: 5.25 Bay Size Bracket

★ With the optional bracket: BF-17, any 3.5HDD floppy size item can easily fit in any 1 x 5.25 standard bay size space.

★ For the detail of GM3-102M2-Fr with BF-17 bracket, please refer to GM3-102M2-F17r.
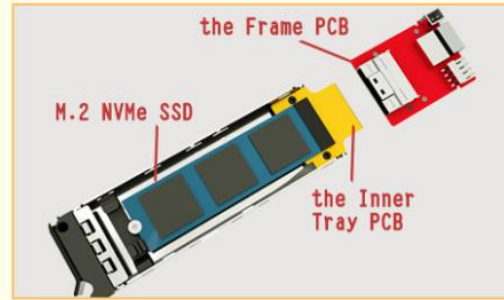

5.25 standard bay size

JOUJYE
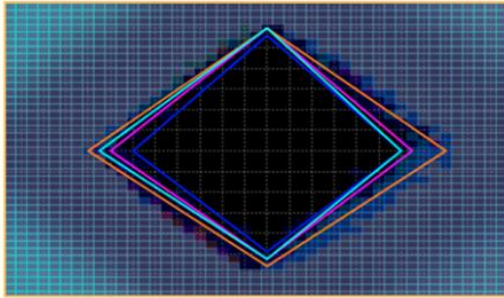
No Interference & Signal Leakage

The diagram shows the Eye Pattern Test is fully passed under the PCIe 3.0 and PCIe 4.0 environment without error from ISI.
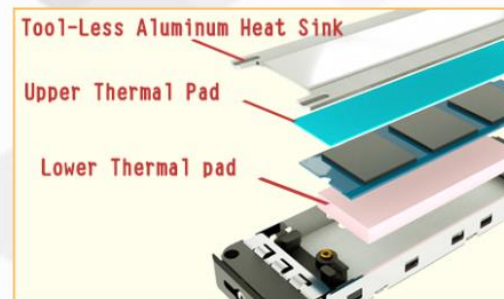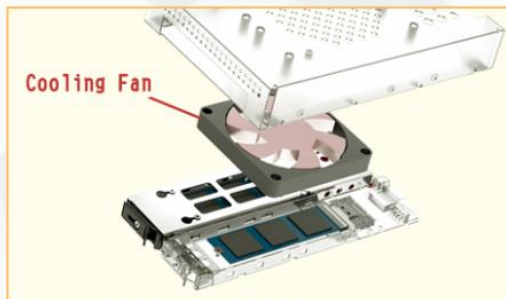
*Different test conditions lead to various results. contact with us for detail

Inner Tray PCB, Protect M.2 SSD

The gold fingers of M.2 SSD are precise and not sustained for multiple insertions. So, we use the Inner Tray PCB to insert with the Frame PCB to protect and reduce the worn-out of the M.2 NVMe SSD.

Best Heat Dissipation with 7010 Coolin Fan

GM3-102M2-Fr has the best design for heat dissipation:

★ Two Side Covering Thermal Pad and All Metal Body Design:
The M.2 SSD is covered by the upper thermal pad and the lower thermal pad, transferring the heat quickly to the aluminum heat sink and the stainless tray.

★ 7010 Cooling Fan with 2800rpm:
The cold wind from the fan can quickly decrease the temperature and take away the heat through ventilated holes.

Tool-Less Aluminum Heat Sink

JJ JOUJYE
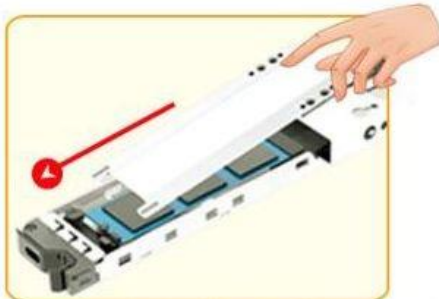
Insert the heat sink at 45° angle

Press down the rear side till the latch
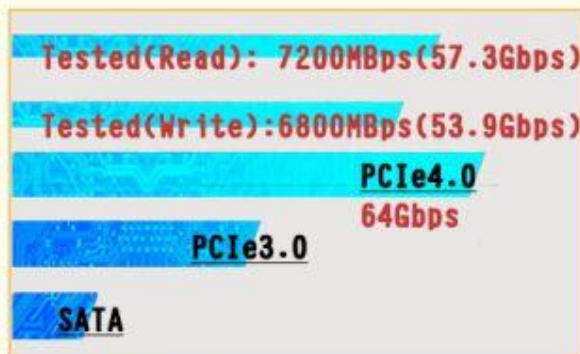is fastened, the installation is finished

Press the plastic holders
and release the heat sink

PCB Upgrade, New Optimized Design
Much Faster and More Stable Transmission

⊕ Much Faster ⊕
New Layout, Tested Performance Upto 7200MBps

Tested(Read): 7200MBps(57.3Gbps)

Tested(Write):6800MBps(53.9Gbps)

PCIe4.0
64Gbps

PCIe3.0

SATA

★ New optimized PCB layout for PCIe4.0, supports
PCIe3.0 or 4.0 M.2 NVMe SSD.

★ We tested the new PCB ande the performance is
reading: 7163MBps / writing: 6732MBps, almost
reaching the limit speed of PCIe4.0 M.2 SSD.

*The actual performance may differ from Motherboard
and M.2 NVMe SSD, please contact us for details

*Testing detail:
Motherboard: GigaByte MZ72-HB0 V1.1; CPU: AMD EPYC 7502 32-Core Processor; test software: iometer;
SSD: Seagate FireCuda 530 PCIe4.0 SSD(2TB) ; System: Microsoft Windows Server 2019

JJ JOUJYE

M.2 NVMe Series Hot-Swap Instructions

The NVMe Hot-Swap function is determined by the Motherboard, NVMe HBA/ RAID Card.

★No chip controller inside, so the product itself cannot provide the NVMe hot-swap.

★Because most NVMe Motherboards provide only limited Hot-Plug now, we suggest use a PCIe 3.0 or PCIe 4.0 NVMe HBA Card or NVMe RAID card to enjoy NVMe Hot-Swap.

If your system environment does not support NVMe hot-plugging, you must turn off the power of the hardware system before you pull out the M.2 SSD to avoid the unexpected system problems.

Suggestions of NVMe Hot-Swap

M.2 Series supports PCIe 3.0/ 4.0., the tested suggestions as followed:

For PCIe3.0 NVMe Hot-Swap Solutions:

   ★ Broadcom NVMe HBA Card : 9400-8i or 9400-16i

   ★ Broadcom NVMe MegaRAID Card : 9460-8i or 9460-16i

   ★ LinkReal NVMe HBA Card: LRNV9324-2I or LRNV9324-4I

For PCIe4.0 NVMe Hot-Swap Solutions:

   ★ Broadcom NVMe HBA Card : 9500-8i or 9500-16i

   ★ Broadcom NVMe MegaRAID Card : 9560-8i or 9560-16i

PS:

The Hot-Swap of the above HBA cards are working smoothly. But, with different mainboard, BIOS, M2 NVMe SSD, cables or even the pin difinition of connectors may have distinct impacts on it.