

# B860MT2-E DJ Motherboard



- Supports Intel Core Ultra 9/7/5 Processor
- Intel B860 single chip architecture
- Supports 2-DIMM DDR5 up to 128 GB Memory
- Supports PCle 4.0
- Supports HDMI Ports & Dual Display Port
- Supports 2.5 GbE LAN
- Supports USB 3.2 Gen1 Type C
- Supports WiFi 7 & 6E module (No WiFi card included)

|  |                  | Specifcation   |  |
|--|------------------|--|--|
|  | CPU SUPPORT      | Support for Intel Core™ Ultra 9 / 7 / 5 processors in the LGA1851 package * Please refer to www.biostar.com.tw for CPU support list.   |  |
|  | MEMORY           | Supports Dual Channel DDR5 - 8000+(OC) MT/s, Non-ECC, Un-buffered ,Clocked Unbuffered DIMM (CUDIMM) Memory 2 x DDR5 DIMM Memory Slot, Max. Supports up to 128 GB Memory Support Intel Extreme Memory Profile (XMP) memory modules * Please refer to www.biostar.com.tw for Memory support list.  |  |
|  | INTEGRATED VIDEO | By CPU model Supports DX12 Supports HDCP   |  |
|  | STORAGE          | Total supports 2 x M.2 socket and 4 x SATA III (6Gb/s) ports Intel Core Ultra Processors 1 x M.2 (M Key) Socket (M2M_CPU): Supports M.2 Type 2280 SSD module Supports PCle 4.0 x4 (64Gb/s) - NVMe SSD Intel B860 Chipset 1 x M.2 (M Key) Socket (M2M_SB): Supports M.2 Type 2280 SSD module Supports PCle 4.0 x4 (64Gb/s) - NVMe SSD 4 x SATA III Connector (6Gb/s): Supports AHCI, RAID 0, 1, 5, 10 & Intel® Rapid Storage Technology |  |
|  | LAN              | Realtek RTL8125D<br>10/ 100/ 1000/ 2500 Mb/s auto negotiation, Half / Full duplex capability   |  |
|  | AUDIO CODEC      | Realtek ALC897<br>7.1 Channels, High Definition Audio, Hi-Fi (front/rear)  |  |
|  | USB              | 1 x USB 3.2 (Gen1) Type-C port (1 via internal header) 5 x USB 3.2 (Gen1) port (3 on rear I/O and 2 via internal header) 7 x USB 2.0 port (3 on rear I/O and 4 via internal header)  |  |

|  | Intel Core Ultra Processors   |
|--|---|
|  | 1 x PCIe 4.0 x16 Slot (x16 mode or x8/x8 mode) Intel B860 Chipset   |
| 1  | 1 x PCIe 4.0 x4 Slot  |
|  | 2 x WIFI Antenna Ports  |
|  | 1 x HDMI Port (HDMI2.1)<br>1 x DP Port (DP1.2)  |
|  | 3 x USB 3.2 (Gen1) Ports  |
|  | 3 x USB 2.0 Ports<br>1 x 2.5 Gigabit LAN port   |
|  | 3 x Audio Jack  |
| 1  | 4 x SATA III Connector (6Gb/s) 1 x M.2 (E Key) Socket : Supports 2230 type Wi-Fi & Bluetooth module and Intel®                  |
|  | GEN2 CNVi   |
|  | 1 x USB 3.2 (Gen1) Type-C Header  |
|  | (each header supports 1 USB 3.2 (Gen1) Type-C ports) 1 x USB 3.2 (Gen1) Header  |
|  | (each header supports 2 USB 3.2 (Gen1) ports)   |
|  | 2 x USB 2.0 Header  |
|  | (each header supports 2 USB 2.0 ports)  |
|  | 1 x 8-Pin Power Connector<br>1 x 24-Pin Power Connector   |
| INTERNALI/()   | 1 x CPU Fan Connector   |
| I I  | 2 x System Fan Connector  |
|  | 1 x Front Panel Header  |
| The state of the s | 1 x Front Audio Header  |
|  | 2 x Internal Stereo Speaker Header<br>1 x Clear CMOS Header   |
|  | 1 x COM Port Header   |
|  | 1 x TPM Header  |
|  | 2 x LED Header (5V)   |
| I I  | 1 x LED Header (12V)<br>* M.2 (E Key) Wi-Fi card is not provided  |
|  | Supports RAID 0, 1, 5, 10 for SATA storage devices  |
| DIMENSION I  | Micro ATX Form Factor Dimension: 19.8cm x 22.8cm ( W x L )  |
|  | Supports Windows 10(64bit) / Windows 11(64bit)  *Biostar reserves the right to add or remove support for any OS with or without |
| 1  | notice.   |
|  | 2 x SATA Cable  |
|  | 1 x I/O Shield<br>1 x WiFi antenna accessories  |

## **OVERVIEW**



## Intel B860 chipset

With the Intel® B860 chipset and the Intel® Core™ Ultra 9/7/5 processors, you will immediately be at the forefront of the battlefield, fueled by mind-blowing power and performance. From content creation to gaming, the Intel B860 chipset provides you with the power and performance you need.



#### Hi-Fi AMP

The built-in amplifier can drive major high-end headphones with over 100dB loads and offer wide band-width, low noise, high slew rate and low distortion audio source from front panel I/O. Gaming enthusiasts can enjoy a fuller range of dynamic sound with crisper details and less distortion.



#### **Smart Ear**

Smart EAR is a windows-based audio utility which allows you to easily adjust system volume. With its user-friendly GUI, you can also increase or decrease impedance setting (Low/High Gain) to optimize your headphone performance. You can easily enjoy high-quality and awesome sound.



#### HDMI 4K2K

The new 4K2K resolution enables high-definition image display with four times the resolution of full HD, 4K2K display is faithfully express bright, highly detailed content that fills the entire screen with lifelike images. Connectivity with PCs via a single HDMI cable for displaying 4K2K data.



## **DisplayPort**

DisplayPort is a digital display interface developed by the Video Electronics Standards Association (VESA). The interface is primarily used to connect a video source to a display device such as a computer monitor, though it can also be used to carry audio.



#### DX12

DirectX 12 introduces the next version of Direct3D, the graphics API at the heart of DirectX. Direct3D is one of the most critical pieces of a game or game engine, and we've redesigned it to be faster and more efficient than ever before. Direct3D 12 enables richer scenes, more objects, and full utilization of modern GPU hardware.



#### DDR5

DDR5 provides 50% higher bandwidth than DDR4, the frequency can be up to 6000+(OC)MHz, and can boasts the largest memory capacity available. It also supports dual channels and has lower power consumption, which can provide better performance and experience for overclockers.



#### **PCIe 4.0**

PCIe 4.0 is the ubiquitous and general-purpose PCI Express I/O standard. At 16GT/s bit rate, the interconnect performance bandwidth is doubled over PCIe 3.0, while preserving compatibility with software and mechanical interfaces.



#### PCIe 4.0 M.2

PCle  $4.0\ M.2$  delivers the highest bandwidth and lower latency. It is 2 times faster compared with PCle  $3.0\ M.2$  .



## USB 3.2 Gen1 Type-A

USB 3.2 Gen1 delivers a compelling performance boosts and can be used to connect multiple devices without worrying about compatibility. It is capable of data transfer speeds up to 5Gbps and backwards compatible with all existing USB products.



#### WiFi 7

The latest version of WiFi utilizes three different frequency bands: 2.4GHz, 5GHz, and 6GHz. It offers lower latency, improved performance, and enhanced security, allowing more devices to smoothly operate on wireless networks simultaneously under optimal conditions.



#### 2.5 GbE LAN

The 2.5 GbE LAN offers faster transmission speeds compared to traditional 1 GbE LAN and is currently the mainstream transmission speed. It enhances data transmission speeds among devices within a local area network, making it particularly suitable for scenarios requiring large-scale data transfer.



#### **ESD Protection**

ESD (Electrostatic Discharge) is the major factor to destroy the PC by electrical overstress (EOS) condition. ESD occurred by PC users when touch any devices connect to a PC, which may result in damage to the motherboard or parts. ESD protection is designed to protect the motherboard and equipment from damage by EOS.



## OC / OV / OH Protection

OC / OV / OH Protection design detects overvoltage conditions and prevents voltage surges from spreading in real time. It also actively cuts off the overvoltage supply to protect your system.



#### 2.5Guard

2.5GUARD features 2.5G having higher data transfer speeds and can strengthen electrical stability and prevent damage from lightning strikes and electrical surges. It's 2.5X improvement than standard Ethernet connections.



## **VIVID LED DI**

New VIVID LED DJ with more customizability and options to control multiple RGB/ARGB LED lighting zones independently. Users can control color, speed and brightness for different modes at ease.



#### **UEFI BIOS**

Unified Extensible Firmware Interface (UEFI) is a brand new framework that provides a revolutionary interface. It is a modern clear and easy-to-use graphical user interface. The UEFI comes with a colorful easy-understand icons leads users into the setup layer directly.



#### **BIO-Flasher**

BIO-Flasher is a convenient BIOS update tool. Just launch this tool and put the BIOS on USB pen driver before entering the OS. You can update your BIOS with only a few clicks without preparing an additional floppy disk or other complicated flash utility.



#### A.I FAN

With A.I FAN users can ensure that their gaming PC can maintain its performance while staying cool. According to different cooling needs and usage scenarios, users can control speed modes. Allows users to have more customizability of fan modes and automatically detects different temperatures to make fan operate at defined speed for optimal cooling performance.



### LED ROCK ZONE

LED ROCK ZONE comes with the RGB 12V LED header and Digital 5V LED header which offer more colorful lighting options to DIY lovers. Adjusting the color of LED and changing system colors by VIVID LED DJ will make you fully enjoy the process of PC modding developing your personal style.



## **Debug LED**

Debug LED helps you identify any issues going with your board or hardware. When error occurs, the corresponding LED lights will inform you on the status of your board or hardware to shorten the test time effectively.



#### A.I TP Control

A.I TP Control is designed for overclockers. It provides a user-friendly BIOS environment that overclockers can adjust the temperature setting to keep your PC safe and enjoy extreme overclocking performance.



## **Smart Update**

Biostar Smart Update is a utility that can help users run online update. It can download the drivers for your motherboard from Biostar official website and install them automatically.



#### Auto Installer

The Auto Installer is capable of automatically installing the required drivers on Windows OS, providing users with a more intuitive and convenient experience, eliminating the hassle of manually searching for drivers.



### **HDMI**

The terms HDMI and HDMI High-Definition Multimedia Interface, and the HDMI Logo are trademarks or registered trademarks of HDMI Licensing Administrator, Inc. in the United States and other countries.

\*The specification and pictures are subject to change without notice and the package contents may differ by area or your motherboard version!

