ZOTAC ZT-B50800J2-10P

ZOTAC Gaming GeForce RTX 5080 Solid CORE OC User Manual

Model: ZT-B50800J2-10P | Brand: ZOTAC

1. Introduction

The ZOTAC Gaming GeForce RTX 5080 Solid CORE OC graphics card is engineered for high-performance gaming, leveraging the NVIDIA Blackwell architecture and DLSS 4 technology. Designed with a focus on robust durability and efficient cooling, this card features IceStorm 3.0 Advanced Cooling, SPECTRA RGB Lighting, and a reinforced frame structure. This manual will guide you through the essential steps to install, operate, and maintain your new graphics card, ensuring optimal performance and longevity.



Image: The ZOTAC Gaming GeForce RTX 5080 Solid CORE OC graphics card displayed alongside its retail packaging, highlighting the product's design and branding.

2. What's in the Box

Upon opening your ZOTAC Gaming GeForce RTX 5080 Solid CORE OC package, please verify that all the following components are included:

- ZOTAC GAMING GeForce RTX 5080 SOLID CORE OC graphics card
- GPU Support Stand
- 3x 8-pin-to-16-pin cable
- User Manual
- Quick Start Guide



Image: A comprehensive view of the ZOTAC Gaming GeForce RTX 5080 Solid CORE OC package contents, including the graphics card, GPU support stand, power cables, and various user guides and documentation.

3. Setup and Installation

3.1 Physical Installation

1. **Prepare Your System:** Power off your computer and disconnect all cables. Open your PC case.
2. **Locate PCIe Slot:** Identify an available PCIe 5.0 x16 slot on your motherboard. Remove any expansion slot covers that obstruct the installation.
3. **Insert Graphics Card:** Carefully align the graphics card with the PCIe slot and press down firmly until it is securely seated. Ensure the retention clip on the motherboard clicks into place.
4. **Secure the Card:** Fasten the graphics card to the PC case using the screws from the expansion slot covers.
5. **Connect Power Cables:** Connect the provided 3x 8-pin-to-16-pin power cable(s) from your power supply unit (PSU) to the graphics card's power connectors. Ensure all connections are firm.
6. **Install GPU Support Stand:** Due to the size and weight of the card, it is highly recommended to install the bundled GPU Support Stand to prevent sag and ensure long-term stability. Refer to the Quick Start Guide for detailed instructions on adjusting and securing the stand.
7. **Close Case and Reconnect:** Close your PC case, reconnect all peripherals and power cables, and power on your system.



Image: Front view of the ZOTAC Gaming GeForce RTX 5080 Solid CORE OC, showcasing its triple-fan IceStorm 3.0 Advanced Cooling system.



Image: Side view of the graphics card, highlighting the display output ports (DisplayPort and HDMI) for monitor connections.

3.2 Driver and Software Installation

After physical installation, you will need to install the latest NVIDIA drivers for your graphics card. Visit the official NVIDIA website to download the most current drivers for the GeForce RTX 5080 series. For additional control over your graphics card's performance, cooling, and SPECTRA RGB lighting, you can download and install ZOTAC's FireStorm utility. While FireStorm offers extensive customization, some users have reported mixed experiences; alternative third-party utilities may also be compatible for monitoring and control.

4. Operating Your Graphics Card

4.1 Key Features

- **NVIDIA Blackwell Architecture & DLSS 4:** Experience next-generation performance and AI-powered graphics for enhanced frame rates and image quality.
- **IceStorm 3.0 Advanced Cooling:** Features a massive heatsink, vapor chamber, composite heatpipes, and 3x 90mm BladeLink fans for superior thermal management.
- **Pass-thru Airflow Design:** Optimizes airflow through the heatsink for improved cooling efficiency.
- **FREEZE Fan Stop:** Fans intelligently stop spinning during low load conditions to reduce noise and extend fan lifespan.
- **Active Fan Control:** Allows independent control over individual fan speeds for customized cooling performance.
- **SPECTRA RGB Lighting:** Customize the aesthetic of your graphics card with vibrant RGB lighting effects.
- **Display Outputs:** Equipped with 3x DisplayPort 2.1b and 1x HDMI 2.1b, supporting 8K resolution and up to 4 displays simultaneously.



Image: An angled view of the ZOTAC Gaming GeForce RTX 5080 Solid CORE OC, showcasing its robust build and the intricate design of its cooling fins.

5. Maintenance

5.1 Cleaning

Regular cleaning of your graphics card is essential for maintaining optimal performance and preventing overheating. Use compressed air to gently clear dust from the fans, heatsink fins, and other components. Ensure the system is powered off and unplugged before cleaning. Avoid using liquid cleaners directly on the card.

5.2 Fan Control

The IceStorm 3.0 cooling system features FREEZE Fan Stop and Active Fan Control. You can monitor and adjust fan curves using the ZOTAC FireStorm utility to optimize cooling performance and noise levels based on your usage. Ensure fans are free from obstructions for efficient operation.

6. Troubleshooting

6.1 Common Issues

- **No Display/Black Screen:** Ensure the graphics card is fully seated in the PCIe slot and all power cables are securely connected. Verify your monitor cable is connected to the graphics card, not the motherboard's integrated graphics port.
- **Performance Issues (Stuttering, FPS Drops):** Ensure you have the latest NVIDIA drivers installed. Check for background applications consuming resources. Verify your system meets the recommended specifications for the games/applications you are running. Monitor GPU temperatures to ensure it's not thermal throttling.
- **Fan Noise/Malfunction:** Check for dust buildup on fans and heatsink. Ensure no cables are obstructing fan blades. If a fan is not spinning or making unusual noises, contact ZOTAC support.

6.2 Diagnostic Indicators

The ZOTAC Gaming GeForce RTX 5080 Solid CORE OC features a 12VHPWR safety light on the backplate near the power connector. This light provides a quick visual indicator of the power connection status:

- **Green Light:** Indicates the 12VHPWR connector is secure and properly seated, and the card is receiving adequate power.
- **Red Light:** Indicates the 12VHPWR connector is loose or not properly connected. Please check the connection and ensure it is fully inserted.



Image: Rear view of the graphics card, showing the metal backplate and the area where the 12VHPWR safety light is located.

7. Specifications

Feature	Specification
Graphics Coprocessor	NVIDIA GeForce RTX 5080
Video Memory	16 GB GDDR7
Memory Interface	256-bit
Memory Speed	30 Gbps
PCIe Interface	PCIe 5.0
Boost Clock	2640 MHz
Max Screen Resolution	7680x4320 Pixels
Video Output Interface	3x DisplayPort 2.1b, 1x HDMI 2.1b
Item Model Number	ZT-B50800J2-10P
Item Weight	4.53 pounds
Product Dimensions (LxWxH)	11.9 x 2.2 x 0.1 inches

8. Warranty and Support

ZOTAC provides a warranty for its products. Please refer to the official ZOTAC website or the warranty card included in your product packaging for specific warranty terms and conditions, including registration requirements and duration. Keeping your proof of purchase is essential for any warranty claims.
For technical support, driver updates, and community engagement, please visit the official ZOTAC website or join their official Discord community. These resources can provide valuable assistance for troubleshooting, performance optimization, and general inquiries.

ZOTAC Official Website: www.zotac.com

ZOTAC Store on Amazon: Visit the ZOTAC Store

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