## ASUS FA608WI-AB96

# ASUS TUF Gaming A16 (2025) Laptop User Manual

Model: FA608WI-AB96

| Overview | Setup | Operating | Maintenance | Troubleshooting | Specifications |
| --- | --- | --- | --- | --- | --- |

Warranty & Support

## 1. PRODUCT OVERVIEW

The ASUS TUF Gaming A16 (2025) is a high-performance gaming laptop designed for demanding tasks and immersive gaming experiences. It features a 16-inch display, powered by an AMD Ryzen AI 9 HX 370 processor and an NVIDIA GeForce RTX 4070 Laptop GPU. This model is built for durability and optimized for efficient cooling, making it suitable for various environments.

Figure 1: ASUS TUF Gaming A16 Laptop, top-down view.

Key features include Windows 11 with Microsoft Copilot integration, a 16:10 aspect ratio display with a 165Hz refresh rate, and military-grade durability standards. The cooling system incorporates Arc Flow Fans, multiple heat pipes, and exhaust vents to maintain stable temperatures during intensive use.

## 2. INITIAL SETUP

Before using your ASUS TUF Gaming A16 laptop, please follow these steps for initial setup:

1. **Unboxing:** Carefully remove the laptop, power cord, adapter, and user guide from the packaging.

2. **Power Connection:** Connect the power adapter to the laptop's power input port and then plug it into a wall outlet.

3. **First Boot:** Open the laptop lid and press the power button. The system will guide you through the initial Windows 11 setup process.

4. **Network Connection:** During setup, connect to a Wi-Fi network or use an Ethernet cable for internet

access.

5. **Software Updates:** After completing the initial Windows setup, ensure all operating system and driver updates are installed for optimal performance and security.
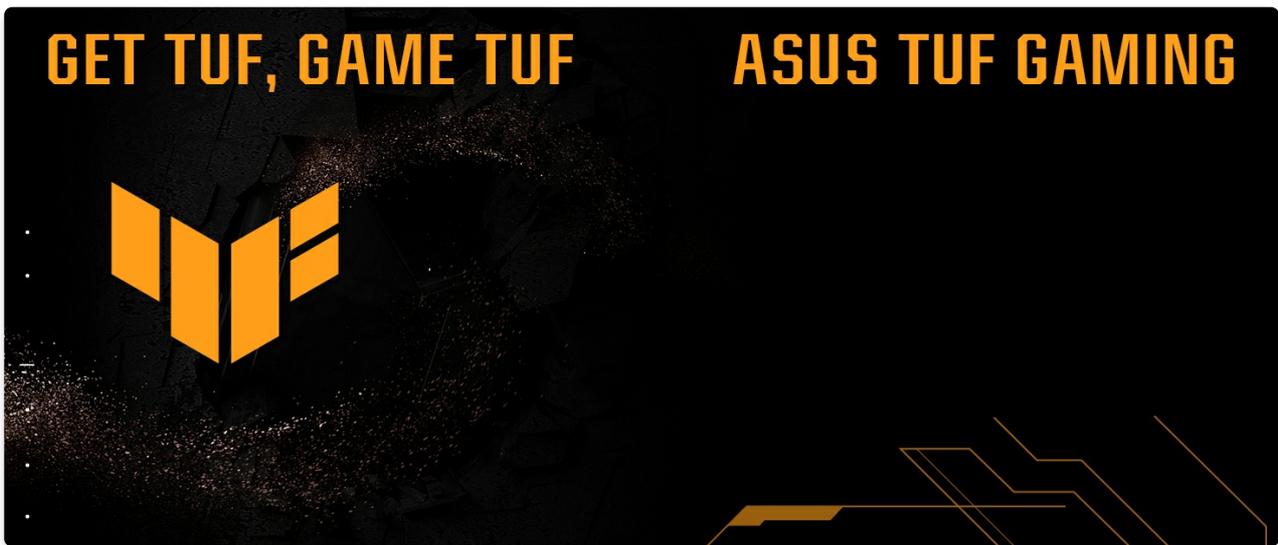


Figure 2: Laptop and included accessories for initial setup.

# 3. OPERATING YOUR LAPTOP

The ASUS TUF Gaming A16 is designed for high-performance computing and gaming. It runs on Windows 11 and includes Microsoft Copilot for AI-powered assistance.

### 3.1 Performance and AI Capabilities

Equipped with an AMD Ryzen AI 9 HX 370 processor, the laptop delivers up to 50 TOPs of AI performance. The NVIDIA GeForce RTX 4070 Laptop GPU further enhances gaming and content creation with NVIDIA Advanced Optimus technology.

Figure 3: Visual representation of AI performance metrics for the ASUS TUF Gaming A16.

**3.2 Display Features**

The 16-inch display offers a 2.5K resolution (2560x1600 pixels) with a 165Hz refresh rate and NVIDIA G-SYNC support. This combination ensures smooth, tear-free visuals and a highly immersive experience with a 90% screen-to-body ratio.

Figure 4: The laptop's display showcasing its high refresh rate and resolution for gaming.

### 3.3 Keyboard and Touchpad

The laptop features a full-size RGB backlit keyboard with number keys and a 1.7mm key travel distance for comfortable typing and gaming. The touchpad is 10% larger than previous models, offering enhanced precision.

Figure 5: Close-up of the laptop's RGB backlit keyboard and large touchpad.

### 3.4 Connectivity

The TUF Gaming A16 offers comprehensive connectivity options:

- 1 x Audio jack: Mic-in & Headphone
- 2 x USB 3.2 Gen2 Type A ports
- 1 x USB 3.2 Type-C port (supports DisplayPort 1.4, Gsync, Power Delivery 3.0)
- 1 x USB4 Type-C port (supports DisplayPort 2.1)
- 1 x HDMI 2.1 port
- 1 x RJ45 LAN port
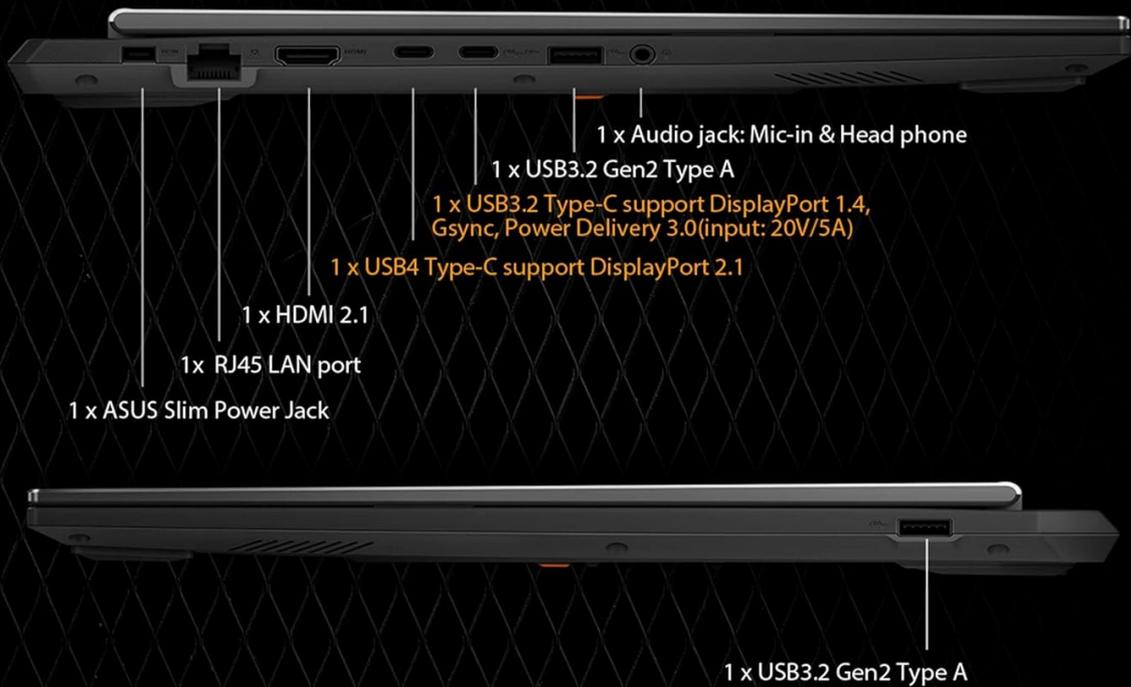- Wi-Fi 6E (802.11ax) for high-speed wireless internet

Figure 6: Diagram illustrating the various input/output ports on the ASUS TUF Gaming A16.

### 3.5 Battery and Charging

The laptop is equipped with a 90Whr battery and supports 100W Type-C fast-charging technology, allowing it to reach 50% charge in approximately 30 minutes. This provides extended usage for gaming or work on the go.

Figure 7: Illustration highlighting the 90Whr battery and fast-charging capability.

### 3.6 Audio System

Experience immersive audio with Dolby Atmos and Hi-Res audio certification. The laptop also features Two-Way AI Noise-Cancelling Technology for clear communication.

Figure 8: Visuals indicating Dolby Atmos, Hi-Res Audio, and AI Noise-Cancelling features.

### 3.7 Software and Features

The laptop comes with Windows 11 and integrates Microsoft Copilot for AI-powered tasks. The Armoury Crate software provides control over fan profiles, lighting, and performance modes, allowing users to customize their experience.

Figure 9: Information regarding included PC Game Pass subscription.

## 4. Maintenance

Proper maintenance ensures the longevity and optimal performance of your ASUS TUF Gaming A16 laptop.

### 4.1 Cooling System Care

The laptop's efficient cooling system includes Arc Flow Fans and an anti-dust filter. Regularly clean the exhaust vents and fan areas to prevent dust buildup, which can impede airflow and lead to overheating. Use compressed air to gently clear dust from the vents.
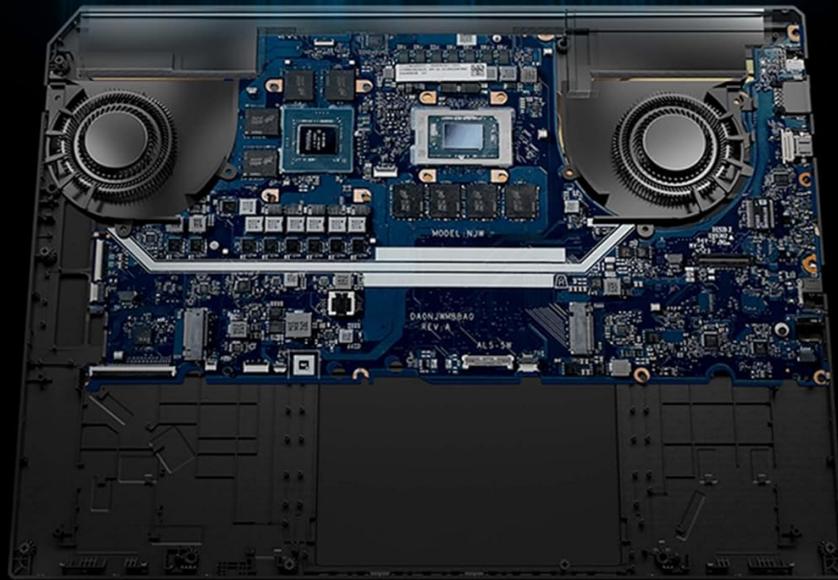
Figure 10: Internal view of the laptop's cooling components, including Arc Flow Fans and heat pipes.

### 4.2 General Cleaning

- **Screen:** Use a soft, lint-free cloth slightly dampened with water or a screen cleaner.
- **Keyboard and Chassis:** Wipe surfaces with a soft, dry cloth. Avoid harsh chemicals.

## 5. TROUBLESHOOTING

This section addresses common issues you might encounter with your ASUS TUF Gaming A16 laptop.

### 5.1 System Instability or Random Shutdowns

- **BIOS Update:** Ensure your laptop's BIOS is updated to the latest version. Outdated BIOS can sometimes cause system instability. Refer to the ASUS support website for instructions and downloads.
- **Overheating:** Check if the laptop is overheating. Ensure vents are clear and the cooling system is functioning correctly.

## 5.2 Wi-Fi Connectivity Issues

- **Driver Update:** Update your Wi-Fi drivers to the latest version from the ASUS support website.
- **Network Reset:** Try resetting your network adapter through Windows settings.
- **Router Check:** Ensure your Wi-Fi router is functioning correctly and within range.

## 5.3 Sluggish Performance

- **Remove Bloatware:** Uninstall unnecessary pre-installed software (bloatware) that may consume system resources.
- **G Helper:** Consider using third-party tools like G Helper (if compatible) for more granular control over performance and fan profiles, potentially replacing Armoury Crate for some users.
- **Disk Space:** Ensure sufficient free space on your SSD.

# 6. TECHNICAL SPECIFICATIONS

| Feature | Specification |
| --- | --- |
| Brand | ASUS |
| Model Name | TUF Gaming A16 |
| Item Model Number | FA608WI-AB96 |
| Operating System | Windows 11 Home |
| Standing Screen Display Size | 16 Inches |
| Screen Resolution | 2560 x 1600 pixels |
| Max Screen Resolution | 2560x1440 |
| Processor | AMD Ryzen AI 9 HX 370 (5.1 GHz) |
| Number of Processors | 12 |
| RAM | 32 GB LPDDR5 |
| Computer Memory Type | DDR5 SDRAM |
| Hard Drive | 1 TB SSD (PCIe Gen 4.0) |
| Graphics Coprocessor | NVIDIA GeForce RTX 4070 |
| Card Description | Dedicated |
| Wireless Type | 802.11ax (Wi-Fi 6E) |
| Number of USB 3.0 Ports | 2 |
| Special Feature | Microsoft Copilot, NVIDIA Advanced Optimus |
| Item Weight | 8.91 pounds |
| Product Dimensions | 13.94 x 0.7 x 10.59 inches |
| Color | Jaeger Gray |

## 7. WARRANTY AND SUPPORT

ASUS is committed to providing reliable support for your TUF Gaming A16 laptop.

### 7.1 Standard Warranty

Every ASUS TUF laptop includes a **12-month warranty** as standard. This warranty covers expert support, thorough diagnostics, and genuine parts if a repair is needed. Additionally, a **90-day warranty** is provided on all warranty replacement parts, ensuring continued satisfaction.

### 7.2 Accidental Damage Protection (ADP)

ASUS offers one year of free Accidental Damage Protection (ADP) for new laptops registered within 60 days of purchase. This protection covers liquid spills, drops, and electrical surges, providing peace of mind against unforeseen accidents.
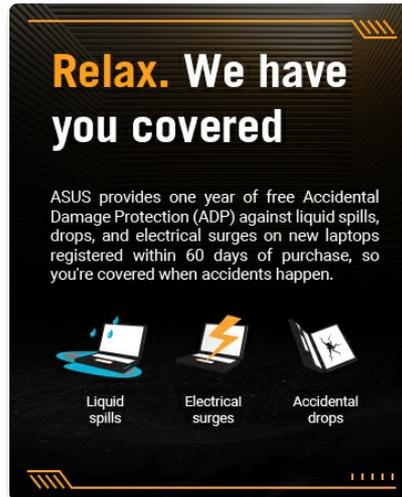


Figure 11: Information on ASUS Accidental Damage Protection (ADP).

### 7.3 Contact Support

For further assistance, please visit the official ASUS support website or refer to the contact information provided in your product's documentation.