

# Alienware 15 R3

## Setup and Specifications

Computer Model: Alienware 15 R3  
Regulatory Model: P69F  
Regulatory Type: P69F001

A L I E N W A R E 

# Notes, cautions, and warnings

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**NOTE:** A NOTE indicates important information that helps you make better use of your product.



**CAUTION:** A CAUTION indicates either potential damage to hardware or loss of data and tells you how to avoid the problem.



**WARNING:** A WARNING indicates a potential for property damage, personal injury, or death.

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# Set up your computer

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Connect the power adapter and press the power button.



# Views

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## Base



### 1 **Power button (Alienhead)**

Press to turn on the computer if it is turned off, in sleep state, or in hibernate state.

Press to put the computer in sleep state if it is turned on.

Press and hold for 4 seconds to force shut-down the computer.



**NOTE:** You can customize the power-button behavior in Power Options.

### 2 **Macro keys**

Run pre-defined Macros.

Define the macro keys using the Alienware Command Center.

# Display



**1 Left microphone**

Provides digital sound input for audio recording and voice calls.

**2 Infrared emitter**

Emits infrared light, which enables the infrared camera to sense depth and track motion.

**3 Infrared camera**

Depth-sensing feature of the camera enhances security when paired with Windows Hello face authentication.

**4 Camera**

Enables you to video chat, capture photos, and record videos.

**5 Camera-status light**

Turns on when the camera is in use.

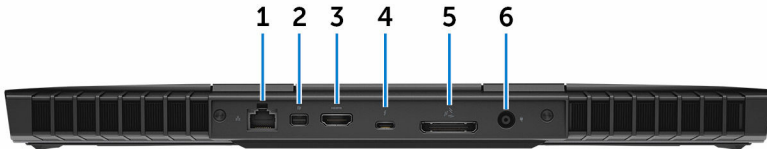
**6 Right microphone**

Provides digital sound input for audio recording and voice calls.

## 7 **Service Tag label**

The Service Tag is a unique alphanumeric identifier that enables Dell service technicians to identify the hardware components in your computer and access warranty information.

# Back



### 1 **Network port (with lights)**

Connect an Ethernet (RJ45) cable from a router or a broadband modem for network or internet access.

The two lights next to the connector indicate the connectivity status and network activity.

### 2 **Mini DisplayPort**

Connect a TV or another DisplayPort-in enabled device. Provides video and audio output.

### 3 **HDMI port**

Connect a TV or another HDMI-in enabled device. Provides video and audio output.

### 4 **Thunderbolt 3 (USB Type-C) port**

Supports USB 3.1 Gen 2, DisplayPort 1.2, Thunderbolt 3 and also enables you to connect to an external display using a display adapter.

Provides data transfer rates up to 10 Gbps for USB 3.1 Gen 2 and up to 40 Gbps for Thunderbolt 3.

### 5 **External graphics port**

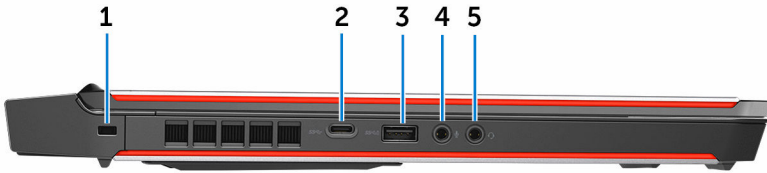
Connect an Alienware Graphics Amplifier to enhance the graphics performance.

### 6 **Power-adaptor port**

Connect a power adapter to provide power to your computer and charge the battery.



# Left




## 1 **Security-cable slot**

Connect a security cable to prevent unauthorized movement of your computer.

## 2 **USB 3.0 (Type-C) port**

Connect peripherals such as external storage devices, printers, and external displays.


Provides data transfer speeds up to 5 Gbps. Supports Power Delivery that enables power supply to devices. Provides up to 15 W power output that enables faster charging.


 **NOTE:** Adapters (sold separately) are required to connect standard USB and DisplayPort devices.

## 3 **USB 3.0 port with PowerShare**

Connect peripherals such as storage devices and printers.

Provides data transfer speeds up to 5 Gbps. PowerShare enables you to charge your USB devices even when your computer is turned off.

 **NOTE:** If the charge on your computer's battery is less than 10 percent, you must connect the power adapter to charge your computer, and USB devices connected to the PowerShare port.

 **NOTE:** If a USB device is connected to the PowerShare port before the computer is turned off or in Hibernate state, you must disconnect and connect it again to enable charging.

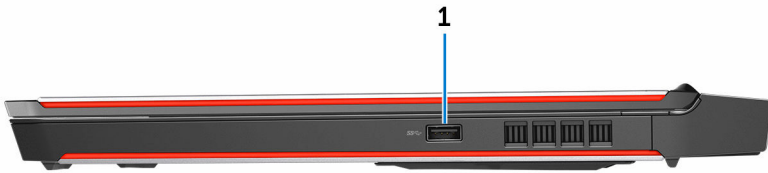
## 4 **Microphone/headphone port (configurable)**

Connect an external microphone for sound input or a headphone for sound output.

## 5 **Headset port**

Connect a headphone or a headset (headphone and microphone combo).

# Right



## 1 **USB 3.0 port**

Connect peripherals such as storage devices and printers. Provides data transfer speeds up to 5 Gbps.

# Specifications

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## Dimensions and weight

|        |                   |
|--------|-------------------|
| Height | 25.40 mm (1 in)   |
| Width  | 389 mm (15.31 in) |
| Depth  | 305 mm (12 in)    |
| Weight | 3.49 kg (7.69 lb) |



**NOTE:** The weight of your computer varies depending on the configuration ordered and the manufacturing variability.

## System information

Computer model Alienware 15 R3

Processor

- 6<sup>th</sup> generation Intel Core i5
- 6<sup>th</sup> generation Intel Core i7/i7k



**NOTE:** If your computer is shipped with an Intel Core i7k processor, you can overclock the processing speed beyond the standard specifications.

Chipset

Intel CM236 chipset

## Memory

Slots

Two SODIMM slots

Type

DDR4

Speed

2133 MHz, 2400 MHz, and 2667 MHz  
(8 GB x 2)

Configurations supported

8 GB, 16 GB, and 32 GB

# Ports and connectors

|             |                                                                                                                                                                                                                       |
|-------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Network     | One RJ-45 port                                                                                                                                                                                                        |
| USB         | <ul style="list-style-type: none"><li>• One USB 3.0 port</li><li>• One USB 3.0 port with PowerShare</li><li>• One USB 3.0 (Type-C) port</li><li>• Thunderbolt 3 (USB Type-C) port</li></ul>                           |
| Audio/Video | <ul style="list-style-type: none"><li>• One HDMI port</li><li>• One microphone/headphone port (configurable)</li><li>• One headset port</li><li>• One Mini DisplayPort</li><li>• One external graphics port</li></ul> |

# Communications

|          |                                                                                                             |
|----------|-------------------------------------------------------------------------------------------------------------|
| Ethernet | 10/100/1000 Mbps Ethernet controller integrated on system board                                             |
| Wireless | <ul style="list-style-type: none"><li>• Wi-Fi 802.11ac</li><li>• Bluetooth 4.1</li><li>• Miracast</li></ul> |

# Audio

|                 |                                                                                    |
|-----------------|------------------------------------------------------------------------------------|
| Controller      | Realtek ALC 3266                                                                   |
| Speakers        | Stereo                                                                             |
| Speaker output  | <ul style="list-style-type: none"><li>• Average: 4 W</li><li>• Peak: 5 W</li></ul> |
| Microphone      | Digital-array microphones                                                          |
| Volume controls | Media-control shortcut keys                                                        |

# Storage

Interface

- SATA 6 Gbps
- PCIe up to 32 Gbps

Hard drive

One 2.5-inch drive

Solid-state drive (SSD)

- Two full-size M.2 PCIe/SATA drives
- One half-size M.2 PCIe/SATA drive

# Keyboard

Type

Backlit keyboard

Shortcut keys

Some keys on your keyboard have two symbols on them. These keys can be used to type alternate characters or to perform secondary functions. To type the alternate character, press Shift and the desired key. To perform secondary functions, press Fn and the desired key.



**NOTE:** You can define the primary behavior of the function keys (F1–F12) by changing **Function Key Behavior** in BIOS setup program.

[Keyboard shortcuts](#)

# Camera

Resolution

1280 x 720 (HD)

Diagonal viewing angle

75 degrees

# Touch pad

Resolution

- Horizontal: 1727

- Vertical: 1092
- Height: 56 mm (2.20 in)
- Width: 100 mm (3.94 in)

Dimensions

## Battery

|                              |                                                                                                                 |                                     |
|------------------------------|-----------------------------------------------------------------------------------------------------------------|-------------------------------------|
| Type                         | 4-cell “smart” lithium-ion (68 WHr)                                                                             | 6-cell “smart” lithium-ion (99 WHr) |
| Weight (maximum)             | 0.32 kg (0.71 lb)                                                                                               | 0.42 kg (0.93 lb)                   |
| Voltage                      | 15.20 VDC                                                                                                       | 11.40 VDC                           |
| Life span (approximate)      | 300 discharge/charge cycles                                                                                     |                                     |
| Temperature range: Operating | 0°C to 35°C (32°F to 95°F)                                                                                      |                                     |
| Temperature range: Storage   | −20°C to 60°C (−4°F to 140°F)                                                                                   |                                     |
| Coin-cell battery            | CR-2032                                                                                                         |                                     |
| Dimensions:                  |                                                                                                                 |                                     |
| Height                       | 13.50 mm (0.53 in)                                                                                              |                                     |
| Width                        | 89.20 mm (3.51 in)                                                                                              |                                     |
| Depth                        | 259.60 mm (10.22 in)                                                                                            |                                     |
| Operating time               | Varies depending on operating conditions and can significantly reduce under certain power-intensive conditions. |                                     |

## Video

|            | Integrated            | Discrete                                                                                                 |
|------------|-----------------------|----------------------------------------------------------------------------------------------------------|
| Controller | Intel HD Graphics 530 | <ul style="list-style-type: none"> <li>• AMD Radeon RX 470</li> <li>• NVIDIA GeForce GTX 1060</li> </ul> |

|        | Integrated           | Discrete                                                                         |
|--------|----------------------|----------------------------------------------------------------------------------|
|        |                      | <ul style="list-style-type: none"> <li>NVIDIA GeForce GTX 1070</li> </ul>        |
| Memory | Shared system memory | <ul style="list-style-type: none"> <li>6 GB GDDR5</li> <li>8 GB GDDR5</li> </ul> |

## Power adapter

|                              |                                |         |
|------------------------------|--------------------------------|---------|
| Type                         | 180 W                          | 240 W   |
| Input current (maximum)      | 2.34 A/ 2.50 A                 | 3.50 A  |
| Output current (continuous)  | 9.23 A                         | 12.30 A |
| Input voltage                | 100 VAC–240 VAC                |         |
| Input frequency              | 50 Hz–60 Hz                    |         |
| Rated output voltage         | 19.50 VDC                      |         |
| Temperature range: Operating | 0°C to 40°C (32°F to 104°F)    |         |
| Temperature range: Storage   | –40°C to 70°C (–40°F to 158°F) |         |

## Display

|                          |                      |                      |
|--------------------------|----------------------|----------------------|
| Type                     | 15.6-inch FHD        | 15.6-inch UHD        |
| Resolution (maximum)     | 1920 x 1080          | 3840 x 2160          |
| Viewing angle            | 50/60/80 degrees     | 80 degrees           |
| Pixel pitch              | 0.17925 mm           | 0.090 mm             |
| Height (including bezel) | 344.16 mm (13.54 in) | 345.60 mm (13.60 in) |
| Width (including bezel)  | 193.59 mm (7.62 in)  | 194.40 mm (7.65 in)  |
| Diagonal                 | 15.60 mm (0.61 in)   | 15.60 mm (0.61 in)   |

(excluding bezel)

Refresh rate

60 Hz/120 Hz

60 Hz

Controls

Brightness can be controlled using shortcut keys

## Computer environment

**Airborne contaminant level:** G2 or lower as defined by ISA-S71.04-1985

|                             | Operating                                                                 | Storage                                                                       |
|-----------------------------|---------------------------------------------------------------------------|-------------------------------------------------------------------------------|
| Temperature range           | 5°C to 35°C (41°F to 95°F)                                                | −40°C to 65°C (−40°F to 149°F)                                                |
| Relative humidity (maximum) | 10% to 90% (non-condensing)                                               | 0% to 95% (non-condensing)                                                    |
| Vibration (maximum)         | 0.26 GRMS                                                                 | 1.37 GRMS                                                                     |
| Shock (maximum)*            | 40 G for 2 ms with a change in velocity of 20 in/s (51 cm/s) <sup>†</sup> | 105 G for 2 ms with a change in velocity of 52.5 in/s (133 cm/s) <sup>‡</sup> |
| Altitude (maximum)          | −15.20 m to 3048 m (−50 ft to 10,000 ft)                                  | −15.20 m to 10,668 m (−50 ft to 35,000 ft)                                    |

\* Measured using a random vibration spectrum that simulates user environment.

















† Measured using a 2 ms half-sine pulse when the hard drive is in use.


‡ Measured using a 2 ms half-sine pulse when the hard-drive head is in parked position.



# Keyboard shortcuts

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| Keys                                                                                         | Description                             |
|----------------------------------------------------------------------------------------------|-----------------------------------------|
|  FN + F1    | Disconnect Alienware Graphics Amplifier |
|  FN + F2    | Disable/enable wireless                 |
|  FN + F3    | Mute audio                              |
|  FN + F4    | Decrease volume                         |
|  FN + F5    | Increase volume                         |
|  FN + F7    | Toggle integrated/discrete graphics     |
|  FN + F8    | Switch to external display              |
|  FN + F9    | Decrease brightness                     |
|  FN + F10   | Increase brightness                     |
|  FN + F11  | Disable/enable touch pad                |
|  FN + F12 | Disable/enable AlienFX                  |
|  1        | Macro keys                              |
|  2        |                                         |
|  3        |                                         |
|  4        |                                         |
|  5        |                                         |

 **NOTE:** You can configure modes and assign multiple tasks for the macro keys on the keyboard

| Keys | Description |
|------|-------------|
| ↵6   |             |
| ↵7   |             |
| ↵8   |             |
| ↵9   |             |
| ↵x   |             |

# Getting help and contacting Alienware

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## Self-help resources

You can get information and help on Alienware products and services using these online self-help resources:



Information about Alienware products and services [www.alienware.com](http://www.alienware.com)

Troubleshooting information, user manuals, setup instructions, product specifications, technical help blogs, drivers, software updates, and so on [www.alienware.com/gamingservices](http://www.alienware.com/gamingservices)

Videos providing step-by-step instructions to service your computer [www.youtube.com/alienwareservices](http://www.youtube.com/alienwareservices)

## Contacting Alienware

To contact Alienware for sales, technical support, or customer service issues, see [www.alienware.com](http://www.alienware.com).

-  **NOTE:** Availability varies by country and product, and some services may not be available in your country.
-  **NOTE:** If you do not have an active internet connection, you can find contact information on your purchase invoice, packing slip, bill, or Dell product catalog.