User Guide

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Product notice

This user guide describes features that are common to most models. Some features may not be available on your tablet.

Not all features are available in all editions of Windows. This computer may require upgraded and/or separately purchased hardware, drivers and/or software to take full advantage of Windows functionality. Go to http://www.microsoft.com for details.

To obtain the latest user guide, go to http://www.hp.com/support, and select your country. Select **Drivers & Downloads**, and then follow the on-screen instructions.

Software terms

By installing, copying, downloading, or otherwise using any software product preinstalled on this computer, you agree to be bound by the terms of the HP End User License Agreement (EULA). If you do not accept these license terms, your sole remedy is to return the entire unused product (hardware and software) within 14 days for a refund subject to the refund policy of your seller.

For any further information or to request a full refund of the computer, please contact your seller.

Safety warning notice

⚠ **WARNING!** To reduce the possibility of heat-related injuries or of overheating, do not allow the AC adapter to contact the skin or a soft surface, such as pillows or rugs or clothing, during operation. The tablet and the AC adapter comply with the user-accessible surface temperature limits defined by the International Standard for Safety of Information Technology Equipment (IEC 60950).

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1 Welcome

After you set up and register the tablet, it is important to take the following steps:

- Take a minute to browse the printed *Windows Basics* guide to explore the new Windows® features.
- **Connect to the Internet**—Set up your wireless network so that you can connect to the Internet. For more information, see Connecting to a network on page 10.
- **Update your antivirus software**—Protect your tablet from damage caused by viruses. The software is preinstalled on the tablet. For more information, see Using antivirus software on page 33.
- **Get to know your tablet**—Learn about your tablet features. Refer to Getting to know your tablet on page 4 and Navigating using touch gestures on page 16 for additional information.
- **Find installed software**—Access a list of the software preinstalled on the tablet:

  On the Start screen, swipe up from the center of the touch screen to display the Apps screen. For details about using the software included with the tablet, see the software manufacturer's instructions, which may be provided with the software or on the manufacturer's website.
- Back up your hard drive by creating a recovery flash drive. See Backup and recovery on page 37.

Finding information

The tablet comes with several resources to help you perform various tasks.

Resources	For information about
Setup Instructions poster	• How to set up the tablet • Help to identify tablet components
Windows Basics guide	Overview of using and navigating with Windows® 8.
HP Support Assistant To access HP Support Assistant on the Start screen, tap the **HP Support Assistant** app. To obtain the latest user guide, go to http://www.hp.com/support, and select your country. Select **Drivers & Downloads**, and then follow the on-screen instructions	• Operating system information • Software, driver, and BIOS updates • Troubleshooting tools • How to access support
Regulatory, Safety, and Environmental Notices To access this guide: 1. From the Start screen, type support, and then select the **HP Support Assistant** app. 2. Select **My computer**, and then tap **User guides**.	• Regulatory and safety information • Environmental information
Safety & Comfort Guide To access the user guides, tap the **HP Support Assistant** app on the Start screen, tap **My computer**, and then tap **User guides**. – or – Go to http://www.hp.com/ergo.	• Proper workstation setup, posture, health, and work habits • Electrical and mechanical safety information
Worldwide Telephone Numbers booklet This booklet is provided with your tablet.	HP support telephone numbers
HP website To obtain the latest user guide, go to http://www.hp.com/support, and select your country. Select **Drivers & Downloads**, and then follow the on-screen instructions	• Support information • Ordering parts and finding additional help • Accessories available for the device
*Limited Warranty** To access this guide, tap the **HP Support Assistant** app on the Start screen, tap **My computer**, and then tap **Warranty and services**. – or – Go to http://www.hp.com/go/orderdocuments.	Warranty information

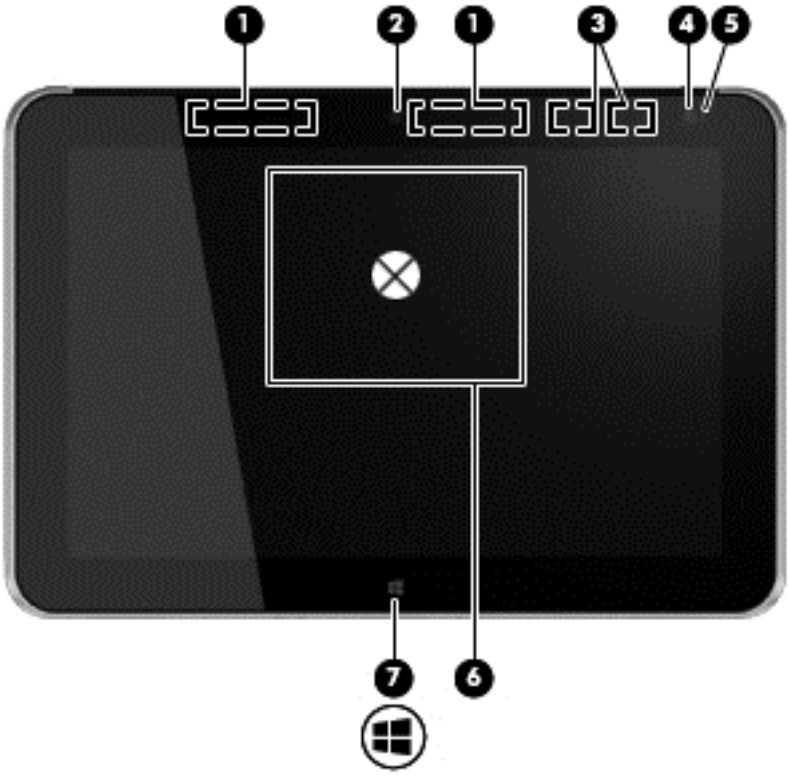
*You can find the expressly provided HP Limited Warranty applicable to your product located with the user guides on your tablet and/or on the CD/DVD provided in the box. In some countries/regions, HP may provide a printed HP Limited Warranty in the box. For some countries/regions where the warranty is not provided in printed format, you may request a printed copy from http://www.hp.com/go/orderdocuments or write to:

- **North America**: Hewlett-Packard, MS POD, 11311 Chinden Blvd., Boise, ID 83714, USA

Resources	For information about
• **Europe, Middle East, Africa**: Hewlett-Packard, POD, Via G. Di Vittorio, 9, 20063, Cernusco s/Naviglio (MI), Italy • **Asia Pacific**: Hewlett-Packard, POD, P.O. Box 200, Alexandra Post Office, Singapore 911507 When you request a printed copy of your warranty, please include your product number, warranty period (found on your service label), name, and postal address. **IMPORTANT:** Do NOT return your HP product to the addresses above. For U.S. support, go to http://www.hp.com/go/contactHP. For worldwide support, go to http://welcome.hp.com/country/us/en/wwcontact_us.html.	

2 Getting to know your tablet

Front

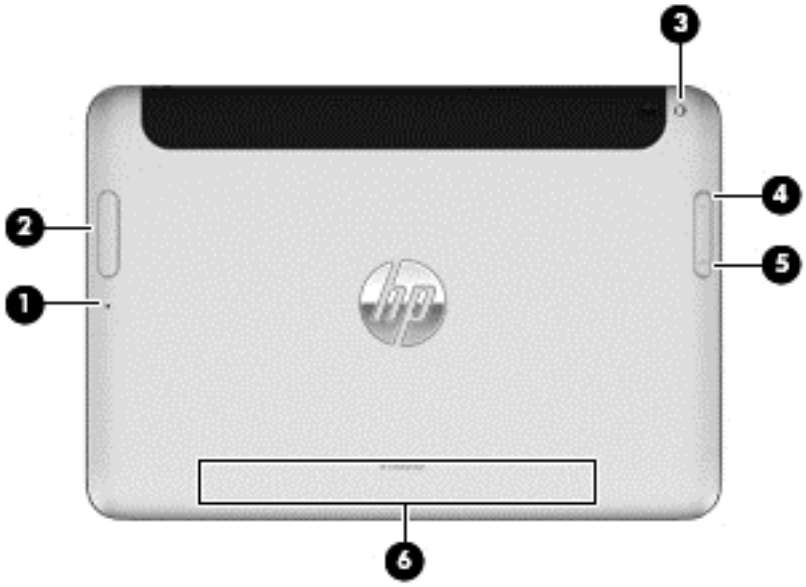


Component		Description
(1)	WWAN antennas (2)* (select models only)	Send and receive wireless signals to communicate with wireless wide area networks (WWAN).
(2)	Front webcam	Records video and captures still photographs. To use the webcam, tap the **YouCam** tile on the Start screen, or swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box. In the search box, type c, and then tap **CyberLink YouCam**.
(3)	WLAN antennas (2)*	Send and receive wireless signals to communicate with wireless local area networks (WLAN).
(4)	Ambient light sensor	The ambient light sensor automatically adjusts the display brightness based on the lighting conditions in your environment.
(5)	Webcam status light (front)	On: The webcam is on.
(6)	Near Field Communications (NFC) tapping area (select models only)	Allows you to touch an NFC-compatible device to this area to wirelessly connect and communicate with the tablet and transfer data back and forth.

Component		Description
(7)	Windows button	Displays the Start screen.

*The antennas are not visible on the outside of the tablet. For optimal transmission, keep the areas immediately around the antennas free from obstructions. To see wireless regulatory notices, see the section of the *Regulatory, Safety, and Environmental Notices* that applies to your country or region. To access the user guides, tap the **HP Support Assistant** app on the Start screen, tap **My computer**, and then tap **User guides**.

Rear

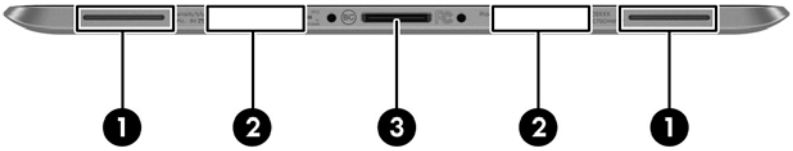


Component			Description
(1)		Micro SD Card Reader/Micro SIM slot access hole	Allows you to insert the end of a paper clip to open the access door to insert or remove a micro SD card or micro SIM module.
(2)	SIM	Memory card reader/Micro SIM slot	Reads optional micro memory cards that store, manage, share, or access information. and supports an optional wireless micro subscriber identity module (SIM) (select models only).
(3)		Rear webcam	Records video, captures still photographs, and allows video conferences and online chat by means of streaming video. To use the webcam, tap the **YouCam** tile on the Start screen, or swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box. In the search box, type c, and then tap **CyberLink YouCam**.
(4)		Volume up button	To increase speaker volume, press the top edge of the button.
(5)		Volume down button	To decrease speaker volume, press the bottom edge of the button.
(6)		Regulatory information	Displays regulatory information (select models only). See Locating system information on page 8.

Top

Component			Description
(1)		Audio-out (headphone) jack/Audio-in (microphone) jack	Produces sound when connected to optional powered stereo speakers, headphones, earbuds, a headset, or television audio. Also connects an optional headset microphone. **WARNING!** To reduce the risk of personal injury, adjust the volume before putting on headphones, earbuds, or a headset. For additional safety information, see the *Regulatory, Safety, and Environmental Notices*. To access the user guides, tap the **HP Support Assistant** app on the Start screen, tap **My computer**, and then tap **User guides**. **NOTE:** When a device is connected to the jack, the tablet speakers are disabled. **NOTE:** Be sure that the device cable has a 4-conductor connector that supports both audio-out (headphone) and audio-in (microphone).
(2)		Autorotate switch	When the tablet is on, slide the autorotate switch to lock the autorotate feature of the display. To unlock the autorotate feature, slide the switch again. – or – Swipe from the right edge of the touch screen to display the charms, tap **Settings**, tap the screen icon, and then tap the autorotate icon. To unlock the autorotate feature, tap the autorotate icon again.
(3)		Integrated microphones (2)	Record sound.
(4)		Power button	• When the tablet is off, press the button to turn on the tablet. • When the tablet is on, press the button briefly to initiate Sleep. • When the tablet is in the Sleep state, press the button briefly to exit Sleep. **CAUTION:** Pressing and holding down the power button will result in the loss of unsaved information. If the tablet has stopped responding and Windows® shutdown procedures are ineffective, press and hold the power button for at least 5 seconds to turn off the tablet. To learn more about your power settings, see your power options. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box. In the search box, type `power`, select **Power and sleep settings**, and then select **Power and sleep** from the list of applications.

Bottom



Component		Description
(1)	Speakers (2)	Produce sound.
(2)	Product and regulatory information	Displays product and regulatory information (select models only). See Locating system information on page 8
(3)	Docking connector	Connects an AC adapter or an optional docking device.

Locating system information

Important system information is located on the bottom edge or the rear of the tablet (select models only). You may need the information when travelling internationally or when you contact support:

- Serial number
- Product number
- Regulatory information

Changing your tablet's settings

You can change view and screen brightness.

Changing your tablet's view

Your tablet's orientation, or view, changes automatically from landscape to portrait view, or from portrait to landscape view.

1. To change the view of your tablet from landscape view to portrait view:

   Hold the tablet vertically, and then turn it 90 degrees to the right (in a clockwise direction).

2. To change the view of your tablet from portrait view to landscape view:

   Hold the tablet vertically, and then turn it 90 degrees to the left (in a counter-clockwise direction).

Using the tablet's autorotate lock feature

To turn on your tablet's autorotate lock feature:

- Slide the autorotate switch on the top edge of the tablet.

  – or –

1. Swipe from the right edge of the touch screen to display the charms, and then tap **Settings**.
2. Tap the screen icon to lock your current tablet screen in place and to prevent rotation. The icon displays a lock symbol when the autorotate lock is active.

To turn off your tablet's autorotate lock feature:

- Slide the autorotate switch on the top edge of the tablet again.

  – or –

1. Swipe from the right edge of the touch screen to display the charms, and then tap **Settings**.
2. Tap the **Screen** icon at the bottom right, and then tap the autorotate lock icon again.

Adjusting your tablet's screen brightness

To adjust the screen brightness:

1. Swipe from the right edge of the touch screen to display the charms, and then tap **Settings**.
2. Tap the **Screen** icon at the bottom right. A vertical slider displays that controls the screen brightness.

NOTE: On the Windows desktop, you can also tap the **Power Meter** icon in the notification area at the far right of the taskbar, tap **Adjust screen brightness**, and then move the slider next to **Screen brightness** at the bottom of the screen.

Finding your hardware and software information

Locating hardware

To find out what hardware is installed on your tablet:

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `device manager`, and then tap **Device Manager**.

   A list displays all the devices installed on your tablet.

Locating software

- To find out what software is installed on your tablet, on the Start screen, swipe up from the center of the touch screen to display the Apps screen.

Updating the software installed on the tablet

Most software, including the operating system, is updated frequently by the manufacturer or provider. Important updates to the software included with the tablet may have been released since the tablet left the factory.

Some updates may affect the way the tablet responds to optional software or external devices. Many updates provide security enhancements.

Update the operating system and other software installed on the tablet as soon as the tablet is connected to the Internet. Access the updates on the HP website at http://www.hp.com.

3 Connecting to a network

Your tablet can travel with you wherever you go. But even at home, you can explore the globe and access information from millions of websites using your tablet and a wireless network connection. This chapter will help you get connected to that world.

Connecting to a wireless network

Wireless technology transfers data across radio waves instead of wires. Your tablet may be equipped with one or more of the following wireless devices:

- Wireless local area network (WLAN) device—Connects the tablet to wireless local area networks (commonly referred to as Wi-Fi networks, wireless LANs, or WLANs) in corporate offices, your home, and public places such as airports, restaurants, coffee shops, hotels, and universities. In a WLAN, the mobile wireless device in your tablet communicates with a wireless router or a wireless access point.
- Bluetooth device—Creates a personal area network (PAN) to connect to other Bluetooth-enabled devices such as computers, phones, printers, headsets, speakers, and cameras. In a PAN, each device communicates directly with other devices, and devices must be relatively close together—typically within 10 meters (approximately 33 feet) of each other.

For more information about wireless technology, see the information and website links provided in HP Support Assistant. To access HP Support Assistant, on the Start screen, tap the **HP Support Assistant** app.

Using the wireless controls

The Network and Sharing Center allows you to set up a connection or network, connect to a network, manage wireless networks, and diagnose and repair network problems.

To use operating system controls:

1. Swipe from the right edge of the touch screen to display the charms, tap **Settings**, and then tap **Control Panel**.
2. Select **Network and Internet**, and then tap **Network and Sharing Center**.

For more information, access HP Support Assistant. To access HP Support Assistant, on the Start screen, tap the **HP Support Assistant** app.

Using a WLAN

With a WLAN device, you can access a wireless local area network (WLAN), which is composed of other computers and accessories that are linked by a wireless router or a wireless access point.

NOTE: The terms *wireless router* and *wireless access point* are often used interchangeably.

- A large-scale WLAN, such as a corporate or public WLAN, typically uses wireless access points that can accommodate a large number of computers and accessories and can separate critical network functions.
- A home or small office WLAN typically uses a wireless router, which allows several wireless and wired computers to share an Internet connection, a printer, and files without requiring additional pieces of hardware or software.

To use the WLAN device in your tablet, you must connect to a WLAN infrastructure (provided through a service provider or a public or corporate network).

Using an Internet service provider

When you are setting up Internet access in your home, you must establish an account with an Internet service provider (ISP). To purchase Internet service and a modem, contact a local ISP. The ISP will help set up the modem, install a network cable to connect your wireless tablet to the modem, and test the Internet service.

NOTE: Your ISP will give you a user ID and a password to use for Internet access. Record this information and store it in a safe place.

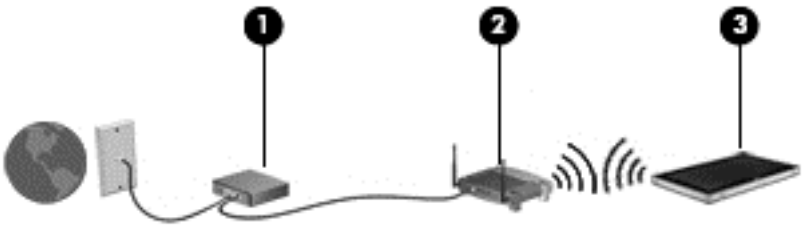
Setting up a WLAN

To set up a WLAN and connect to the Internet, you need the following equipment:

- A broadband modem (either DSL or cable) **(1)** and high-speed Internet service purchased from an Internet service provider
- A wireless router **(2)** (purchased separately)
- A wireless tablet **(3)**

NOTE: Some modems have a built-in wireless router. Check with your ISP to determine what type of modem you have.

The illustration below shows an example of a wireless network installation that is connected to the Internet.



As your network grows, additional wireless and wired computers can be connected to the network to access the Internet.

For help in setting up your WLAN, see the information provided by your router manufacturer or your ISP.

Configuring a wireless router

For help in setting up a WLAN, see the information provided by your router manufacturer or your ISP.

NOTE: It is recommended that you initially connect your new wireless tablet to the router by using the network cable provided with the router. When the tablet successfully connects to the Internet, disconnect the cable, and access the Internet through your wireless network.

Protecting your WLAN

When you set up a WLAN or access an existing WLAN, always enable security features to protect your network from unauthorized access. WLANs in public areas (hotspots) like coffee shops and airports may not provide any security. If you are concerned about the security of your tablet in a hotspot, limit your network activities to email that is not confidential and basic Internet surfing.

Wireless radio signals travel outside the network, so other WLAN devices can pick up unprotected signals. Take the following precautions to protect your WLAN:

- Use a firewall.

  A firewall checks both data and requests for data that are sent to your network, and discards any suspicious items. Firewalls are available in both software and hardware. Some networks use a combination of both types.

- Use wireless encryption.

  Wireless encryption uses security settings to encrypt and decrypt data that is transmitted over the network. For more information, access HP Support Assistant. To access HP Support Assistant, on the Start screen, tap the **HP Support Assistant** app.

Connecting to a WLAN

To connect to the WLAN, follow these steps:

1. Be sure that the WLAN device is on.
2. On the Start screen, swipe from the right edge of the touch screen to display the charms, tap **Settings**, and then tap the network icon.

   – or –

   On the Windows desktop, tap the network status icon in the notification area, at the far right of the taskbar.
3. Be sure that airplane mode is off, select a WLAN from the list, and then tap **Connect**.

   If the WLAN is a security-enabled WLAN, you are prompted to enter a security code. Type the code, and then tap **Sign in**.

   NOTE: If no WLANs are listed, you may be out of range of a wireless router or access point.

   NOTE: If you do not see the WLAN you want to connect to, on the Start screen, swipe from the right edge of the touch screen to display the charms, tap **Search**, tap in the Search box, type `network and sharing`, and then select **Network and Sharing Center**, or on the Windows desktop, tap and hold the network status icon, and then tap **Open Network and Sharing Center**. Tap **Set up a new connection or network**. A list of options is displayed, allowing you to manually search for and connect to a network or to create a new network connection.
4. Follow the on-screen instructions to complete the connection.

After the connection is made, tap the network status icon in the notification area, at the far right of the taskbar, to verify the name and status of the connection.

NOTE: The functional range (how far your wireless signals travel) depends on WLAN implementation, router manufacturer, and interference from other electronic devices or structural barriers such as walls and floors.

Using HP Mobile Broadband (select models only)

HP Mobile Broadband enables your tablet to use WWANs to access the Internet from more places and over larger areas than it can by using WLANs. Using HP Mobile Broadband requires a network service provider (called a *mobile network operator*), which in most cases is a cellular phone network operator. Coverage for HP Mobile Broadband is similar to cellular phone voice coverage.

If your tablet has HP Mobile Broadband, it is also equipped with Global Positioning System (GPS) functionality. GPS satellites deliver location, speed, and direction information to GPS-equipped systems.

When used with mobile network operator service, HP Mobile Broadband gives you the freedom to stay connected to the Internet, send email, or connect to your corporate network whether you are on the road or outside the range of Wi-Fi hotspots.

HP supports the following technologies:

- HSPA (High Speed Packet Access), which provides access to networks based on the Global System for Mobile Communications (GSM) telecommunications standard.
- EV-DO (Evolution Data Optimized), which provides access to networks based on the code division multiple access (CDMA) telecommunications standard.
- LTE (Long Term Evolution), which provides access to networks supporting LTE technology.

You may need the HP Mobile Broadband Module serial number to activate mobile broadband service. The serial number is etched on the rear of your tablet.

Some mobile network operators require the use of a SIM. A SIM contains basic information about you, such as a personal identification number (PIN), as well as network information. Some tablets include a SIM that is preinstalled. If the SIM is not preinstalled, it may be provided in the HP Mobile Broadband information provided with your tablet, or the mobile network operator may provide it separately from the tablet.

For information about inserting and removing the SIM, see Inserting and removing a SIM on page 13 in this chapter.

For information about HP Mobile Broadband and how to activate service with a preferred mobile network operator, see the HP Mobile Broadband information included with your tablet.

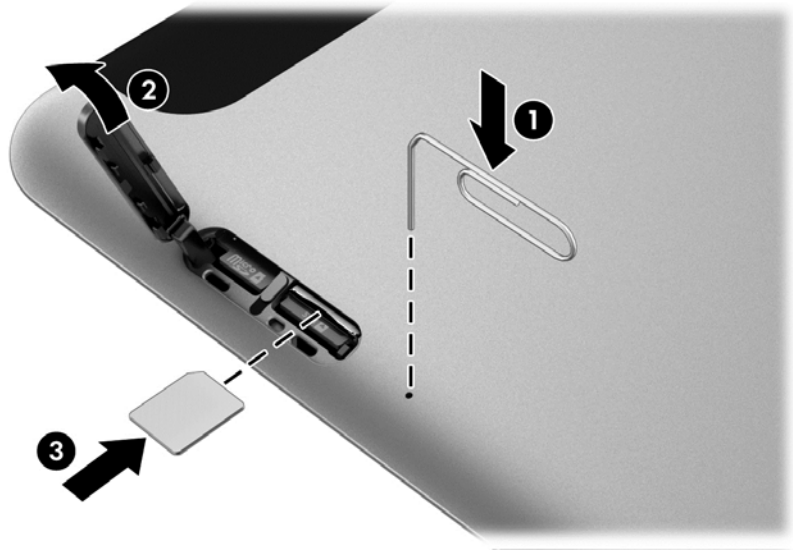
Inserting and removing a SIM

⚠ **CAUTION:** To prevent damage to the connectors, use minimal force when inserting a SIM.

To insert or remove a SIM, follow these steps:

1. Shut down the tablet.
2. Disconnect all external devices connected to the tablet.
3. Unplug the power cord from the AC outlet.

4. Insert the end of a paper clip into the Micro SIM slot access hole **(1)**, and then open the access door **(2)**.



5. Insert the SIM into the SIM slot **(3)**, and then push to lock it.

   – or –

   Push the SIM again to remove it from the SIM slot.

6. Insert the door hinge **(1)**, and then close the access door **(2)**.

7. Reconnect external power.
8. Reconnect external devices.
9. Turn on the tablet.

Using Bluetooth wireless devices

A Bluetooth device provides short-range wireless communications that replace the physical cable connections that traditionally link electronic devices such as the following:

- Computers (desktop, notebook, PDA)
- Phones (cellular, cordless, smart phone)
- Imaging devices (printer, camera)
- Audio devices (headset, speakers)
- Mouse

Bluetooth devices provide peer-to-peer capability that allows you to set up a personal area network (PAN) of Bluetooth devices. For information about configuring and using Bluetooth devices, see the Bluetooth software Help.

4 Navigating using touch gestures

Your tablet allows navigation using touch gestures on the touch screen.

Review the *Windows Basics* guide included with your tablet. The guide provides information on common tasks using the touch screen or an optional keyboard.

Using touch screen gestures

You can control items on the touch screen directly with your fingers.

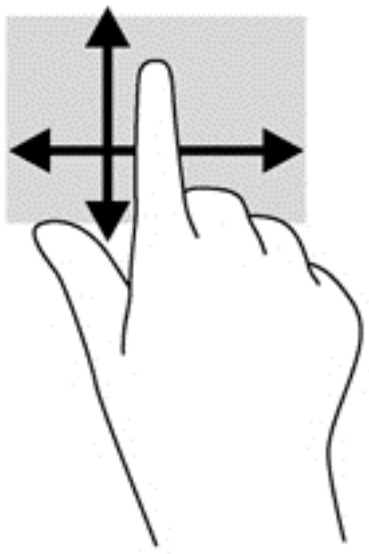
One-finger slide

The one-finger slide is mostly used to pan or scroll through lists and pages, but you can use it for other interactions, too, such as moving an object.

- To scroll across the screen, lightly slide one finger across the screen in the direction you want to move.

NOTE: When many apps are displayed on the Start screen, you can slide your finger to move the screen left or right.

- To drag, press and hold an object, and then drag the object to move it.

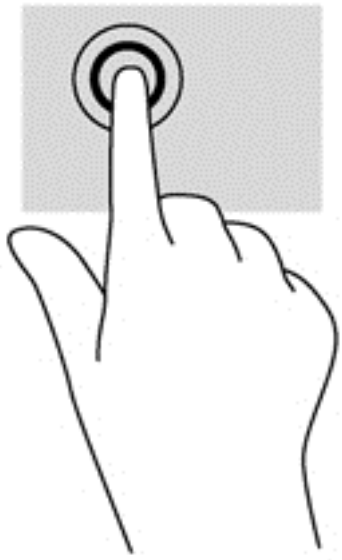


Tapping

To make an on-screen selection, use the tap function.

- Use one finger to tap an object on the screen to make a selection. Double-tap an item to open it.

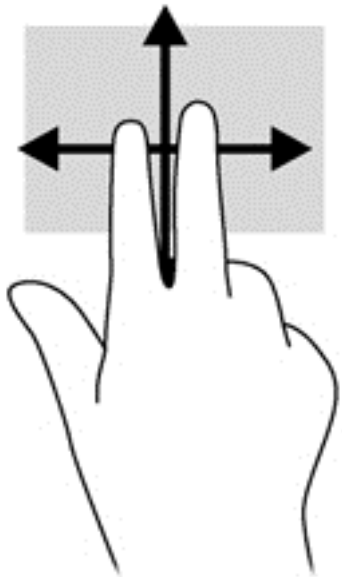
NOTE: Press and hold your finger on an object to open a help screen that provides information about the object.



Scrolling

Scrolling is useful for moving the pointer up, down, left, or right on a page or image.

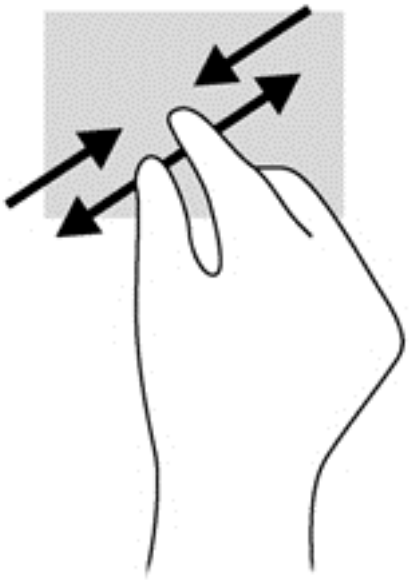
- Place two fingers on the screen and then drag them in an up, down, left, or right motion.



2-finger pinch zoom

2-finger pinch zoom allows you to zoom out or in on images or text.

- Zoom in by placing two fingers together on the display and then moving your fingers apart.
- Zoom out by placing two fingers apart on the display and then moving your fingers together.

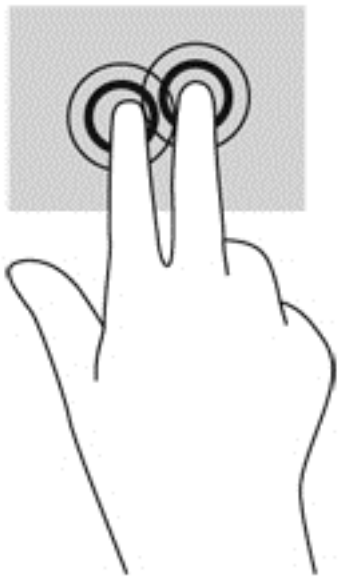


2-finger click

2-finger click allows you to make menu selections for an object on the screen.

NOTE: Using 2-finger click is the same action as using right-click with a mouse.

- Place two fingers on the TouchPad zone and press to open the options menu for the selected object.

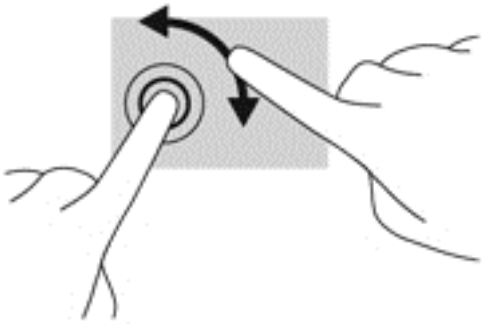


Rotating (select models only)

Rotating allows you to turn items such as photos.

- Anchor the forefinger of your left hand on the object you want to rotate. Using your right hand, slide your forefinger around in a sweeping motion from 12 o’clock to 3 o’clock. To reverse the rotation, move your forefinger from 3 o’clock to 12 o’clock.

NOTE: Rotate is intended for specific apps where you can manipulate an object or image. Rotate may not be functional for all apps.



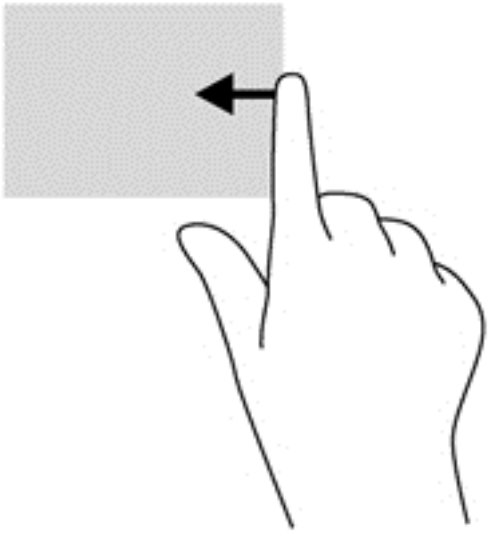
Edge swipes

Edge swipes allow you to access toolbars on your tablet for tasks such as changing settings and finding or using apps.

Right-edge swipe

The right-edge swipe reveals the charms, which let you search, share, start apps, access devices, or change settings.

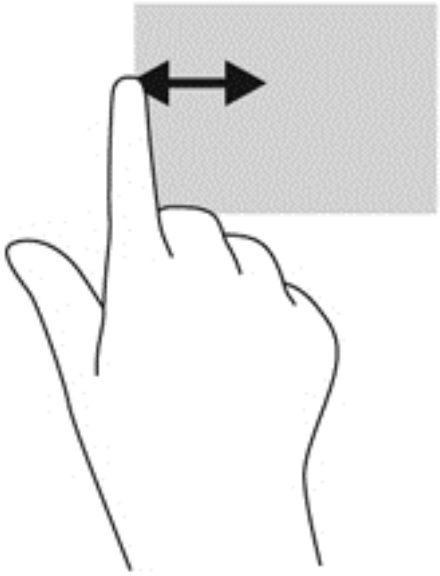
- Swipe your finger gently from the right edge to reveal the charms.



Left-edge swipe

The left-edge swipe reveals your open apps so that you can switch between them quickly.

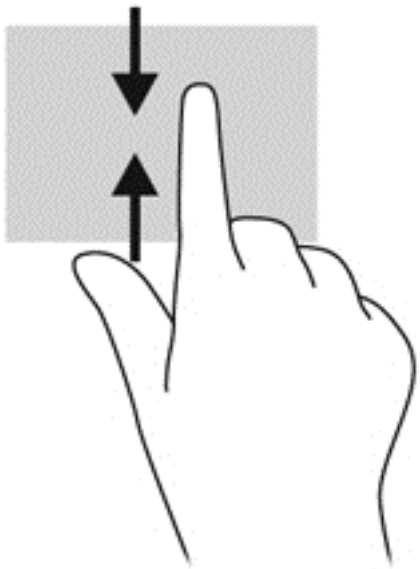
- Swipe your finger gently from the left edge to switch between apps. Without lifting your finger, swipe back toward the left edge to display all open apps.



Top-edge swipe

The top-edge swipe displays app command options that allow you to customize apps.

- Gently swipe finger from the top edge to reveal the app command options.



Using the on-screen keyboard

You may want to enter data into a data field. This may be required when you set up a wireless network configuration or a weather reporting location, or when you access user accounts on Internet sites. The tablet has an on-screen keyboard that is displayed when you need to enter such information into data fields.

1. To display the keyboard on the Start screen, tap in the first data field. The keyboard is displayed.

   – or –

   To display the keyboard on the Windows desktop, tap the keyboard icon in the navigation area, at the far right of the taskbar.

2. Tap each character, continuing until you have spelled out the name or word that you are entering into the data field.

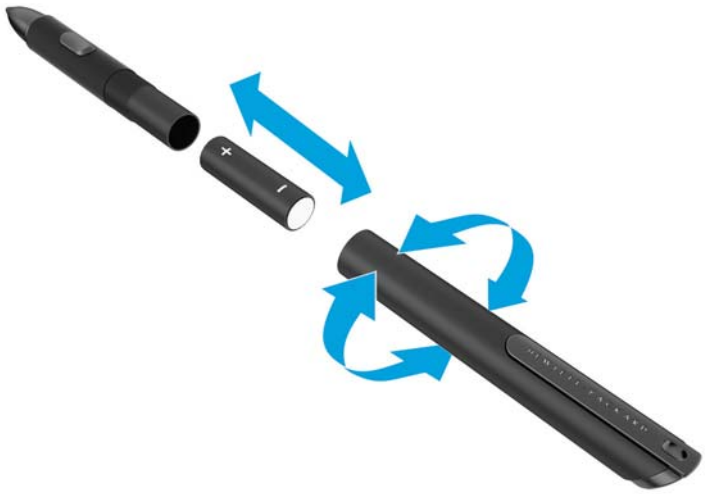
NOTE: Suggested words may be displayed at the top of the keyboard. If an appropriate word is displayed, tap to select it.

3. Tap enter on the keyboard.

To change settings for the on-screen keyboard:

1. Swipe from the right side of the touch screen to display the charms, and then tap **Settings**.
2. Tap **Change PC settings**, tap **PC and devices**, tap **Typing**, and then follow the on-screen instructions.

Using the digital pen (select models only)



To insert the battery in the pen:

1. Unscrew the pen to disassemble it.
2. Remove the old battery and recycle it properly.
3. Install the new battery.

4. Securely reassemble the pen.

5. Wait 2 seconds for the pen to calibrate automatically.

NOTE: Pressing the tip of the pen during the 2-second calibration cycle invalidates the process and requires that you recalibrate the pen.

The digital pen is now ready to use with your tablet. Simply touch the tip of the pen lightly on the screen to write text or select items on the screen.

To perform a right-click action, press the button on the side of the pen when selecting an item on the screen.

The digital pen uses inherent pressure sensitivity, so you can create a bolder stroke by pressing harder on the screen with the digital pen. Pressure sensitivity may not be enabled or supported, depending on the application or program.

To change pen settings, such as pen sensitivity, swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box. In the search box, type c, and then tap **Control Panel**. Tap **Hardware and Sound**, tap **Pen and Touch**, and then follow the on-screen instructions.

NOTE: For regulatory and safety information, refer to the *Regulatory, Safety, and Environmental Notices* on the HP tablet. To access this guide, tap the **HP Support Assistant** app on the Start screen, tap **My Computer**, and then tap **User guides**.

5 Multimedia

Your tablet may include the following:

- Integrated speaker(s)
- Integrated microphone(s)
- Integrated webcam(s)
- Preinstalled multimedia software
- Multimedia buttons or keys

Audio

On your HP tablet, you can download and listen to music, stream audio content from the web (including radio), record audio, or mix audio and video to create multimedia. To enhance your listening enjoyment, attach external audio devices such as speakers or headphones.

Adjusting the volume

You can adjust the volume using the volume buttons.

⚠ **WARNING!** To reduce the risk of personal injury, adjust the volume before putting on headphones, earbuds, or a headset. For additional safety information, see the *Regulatory, Safety and Environmental Notices*. To access the user guides, tap the **HP Support Assistant** app on the Start screen, tap **My computer**, and then tap **User guides**.

NOTE: Volume can also be controlled through the operating system and some programs.

NOTE: Refer to the Getting to know your tablet on page 4 section for information on what type of volume controls your tablet has.

Connecting headphones

You can connect wired headphones to the headphone jack on your tablet. See Top on page 7.

To connect wireless headphones to your tablet, follow the device manufacturer's instructions.

⚠ **WARNING!** To reduce the risk of personal injury, lower the volume setting before putting on headphones, earbuds, or a headset. For additional safety information, see the *Regulatory, Safety and Environmental Notices*.

Checking audio functions on the tablet

NOTE: For best results when recording, speak directly into the microphone and record sound in a setting free of background noise.

To check the audio functions on your tablet, follow these steps:

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `c`, and then tap **Control Panel**.
3. Tap **Hardware and Sound**, and then tap **Sound**.

   When the Sound window opens, tap the **Sounds** tab. Under **Program Events**, tap any sound event, such as a beep or alarm and then tap **Test**. You should hear sound through the speakers or through connected headphones.

To check the recording functions on your tablet, follow these steps:

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box
2. In the search box, type `so`, and then tap **Sound Recorder**.
3. Tap **Start Recording** and speak into the microphone.
4. Save the file to your Windows desktop.
5. Open a multimedia program and play back the recording.

To confirm or change the audio settings on your tablet:

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `c`, and then tap **Control Panel**.
3. Tap **Hardware and Sound**, and then tap **Sound**.

Webcam

Some tablets include two integrated webcams. With the preinstalled software, you can use the webcams to take a photo or record a video. You can preview and save the photo or video recording.

The webcam software enables you to experiment with the following features:

- Capturing and sharing video
- Streaming video with instant message software
- Taking still photos

For details about using the webcam, refer to the help for the app.

6 Power management

NOTE: Your tablet has a power button.

Shutting down the tablet

CAUTION: Unsaved information is lost when the tablet shuts down.

The shutdown command closes all open programs, including the operating system, and then turns off the tablet.

Shut down the tablet when the tablet will be unused and disconnected from external power for an extended period

Although you can turn off the tablet with the power button, the recommended procedure is to use the Windows shutdown command:

NOTE: If the tablet is in the Sleep state, you must first exit Sleep before shutdown is possible by briefly pressing the power button.

1. Save your work and close all open programs.
2. Swipe from the right edge of the touch screen to display the charms, tap **Settings**, tap the **Power** icon, and then tap **Shut down**.

If the tablet is unresponsive and you are unable to use the preceding shutdown procedure, try the following emergency procedures in the sequence provided:

- Press and hold the power button for at least 5 seconds.
- Disconnect the tablet from external power.

Setting power options

Using power-saving states

Sleep is enabled at the factory.

When Sleep is initiated, the screen clears, and your work is saved to memory.

CAUTION: To reduce the risk of possible audio and video degradation, loss of audio or video playback functionality, or loss of information, do not initiate Sleep while reading from or writing to a disc or an external media card.

Initiating and exiting Sleep

With the tablet on, you can initiate Sleep in any of the following ways:

- Briefly press the power button.
- Swipe from the right edge of the touch screen to display the charms, tap **Settings**, tap the **Power** icon, and then tap **Sleep**.

To exit Sleep, briefly press the power button.

When the tablet exits Sleep, the tablet returns to the screen where you stopped working.

NOTE: If you have set a password to be required on wakeup, you must enter your Windows password before the tablet will return to the screen.

Using the power meter and power settings

The power meter is located on the Windows desktop. The power meter allows you to quickly access power settings and view the remaining battery charge.

- To display the percentage of remaining battery charge and the current power plan, on the Windows desktop, tap the power meter icon.
- To use Power Options, or to change the power plan, tap the power meter icon, and then tap an item from the list. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box. In the search box, type `power`, tap **Settings**, and then tap **Power Options**.

Different power meter icons indicate whether the tablet is running on battery or external power. The icon also displays a message if the battery has reached a low or critical battery level.

Setting password protection on wakeup

To set the tablet to prompt for a password when the tablet exits Sleep, follow these steps:

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `power`, tap **Settings**, and then tap **Power Options**.
3. In the left pane, tap **Require a password on wakeup**.
4. Tap **Change Settings that are currently unavailable**.
5. Tap **Require a password (recommended)**.

NOTE: If you need to create a user account password or change your current user account password, tap **Create or change your user account password**, and then follow the on-screen instructions. If you do not need to create or change a user account password, go to step 5.

6. Tap **Save changes**.

Using battery power

The tablet runs on battery power whenever it is not plugged into external AC power. Tablet battery life varies, depending on power management settings, running programs, display brightness, external devices connected to the tablet, and other factors. When the tablet is plugged into AC power, the battery is charged and your work is protected in case of a power outage. If the battery is charged and the tablet is running on external AC power, the tablet automatically switches to battery power if the AC adapter is disconnected on the tablet or an AC power loss occurs.

NOTE: When you disconnect AC power, the display brightness is automatically decreased to save battery life. For more information, see Using external AC power on page 28.

Factory-sealed battery

To monitor the status of your battery, or if the battery is no longer holding a charge, run Battery Check in HP Support Assistant. To access battery information, tap the **HP Support Assistant** app on the Start screen, and then tap **Battery and performance**. If Battery Check indicates that your battery should be replaced, contact support.

The battery(ies) in this product cannot be easily replaced by users themselves. Removing or replacing the battery could affect your warranty coverage. If a battery is no longer holding a charge, contact support.

When a battery has reached the end of its useful life, do not dispose of the battery in general household waste. Follow the local laws and regulations in your area for battery disposal.

Finding additional battery information

HP Support Assistant provides the tools and information about the battery. To access battery information, tap the **HP Support Assistant** app on the Start screen, and then tap **Battery and performance**.

- Battery Check tool to test battery performance
- Information on calibration, power management, and proper care and storage to maximize battery life
- Information on battery types, specifications, life cycles, and capacity

Using Battery Check

HP Support Assistant provides information on the status of the battery installed in the tablet.

To run Battery Check:

1. Connect the AC adapter to the tablet.

NOTE: The tablet must be connected to external power for Battery Check to work properly.

2. To access battery information, tap the **HP Support Assistant** app on the Start screen, and then tap **Battery and performance**.

Battery Check examines the battery and its cells to see if they are functioning properly, and then reports the results of the examination.

Displaying the remaining battery charge

▲ Tap the power meter icon on the Windows desktop in the notification area, at the far right of the taskbar.

Maximizing battery discharge time

Battery discharge time varies depending on features you use while on battery power. Maximum discharge time gradually decreases as the battery storage capacity naturally degrades.

To maximize battery discharge time, lower the brightness on the display.

Managing low battery levels

The information in this section describes the alerts and system responses set at the factory. Some low-battery alerts and system responses can be changed using Power Options. Preferences set using Power Options do not affect lights.

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `power`, and then tap **Power Options**.

Identifying low battery levels

When a battery that is the sole power source for the tablet reaches a low or critical battery level, the following behavior occurs:

- On the Windows desktop, the power meter icon in the notification area shows a low or critical battery notification.

NOTE: For additional information about the power meter, see Using the power meter and power settings on page 26.

If the tablet is on or in the Sleep state, the tablet remains briefly in the Sleep state, and then shuts down and loses any unsaved information.

Resolving a low battery level

Resolving a low battery level when external power is available

▲ Connect one of the following devices:

- AC adapter
- Optional docking or expansion device
- Optional power adapter purchased as an accessory from HP

Resolving a low battery level when no power source is available

To resolve a low battery level when no power source is available, save your work and shut down the tablet.

Conserving battery power

- Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box. In the search box, type `power`, tap **Settings**, and then tap **Power Options**.
- Select low power-use settings through Power Options.
- Turn off wireless and LAN connections when you are not using them.
- Disconnect unused external devices that are not plugged into an external power source.
- Stop, disable, or remove any external media cards that you are not using.
- Decrease screen brightness.
- Before you leave your work, initiate Sleep, or shut down the tablet.

Using external AC power

WARNING! Do not charge the tablet battery while you are onboard aircraft.

WARNING! To reduce potential safety issues, use only the AC adapter provided with the tablet, a replacement AC adapter provided by HP, or a compatible AC adapter purchased from HP.

NOTE: For information on connecting to AC power, see the *Setup Instructions* poster provided in the tablet box.

External AC power is supplied through an approved AC adapter or an optional docking or expansion device.

Connect the tablet to external AC power under any of the following conditions:

- When charging a battery
- When installing or modifying system software
- When running Disk Defragmenter
- When performing a backup or recovery

When you connect the tablet to external AC power, the following events occur:

- The battery begins to charge.
- If the tablet is turned on, the power meter icon in the notification area changes appearance.

When you disconnect external AC power, the following events occur:

- The tablet switches to battery power.
- The display brightness is automatically decreased to save battery life.

7 External cards and devices

Using memory card readers

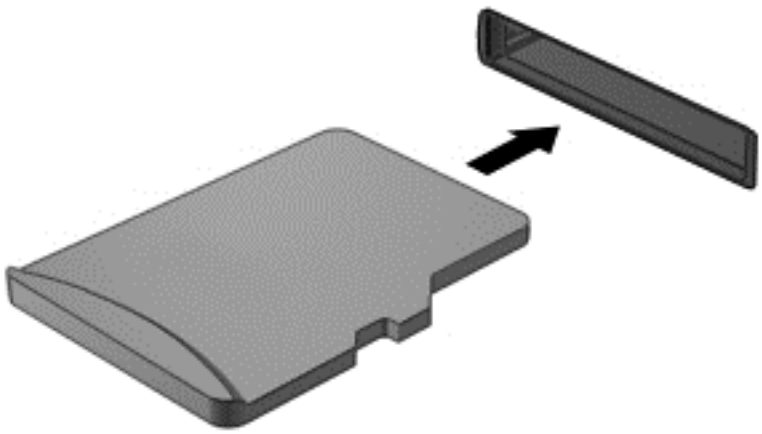
Optional memory cards provide secure data storage and convenient data sharing. These cards are often used with digital media-equipped cameras and PDAs as well as with other computers.

To determine the memory card formats that are supported on your tablet, see the Getting to know your tablet on page 4 section.

Inserting a memory card

⚠ **CAUTION:** To reduce the risk of damage to the memory card connectors, use minimal force to insert a memory card.

1. To open the access door, see Inserting and removing a SIM on page 13.
2. Hold the card label-side up, with the connectors facing the tablet, and insert the card in the slot.



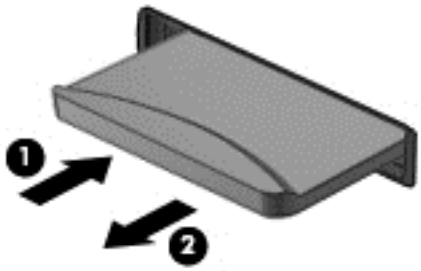
3. Push the card to lock it.
4. Close the access door. See Inserting and removing a SIM on page 13.

Removing a memory card

⚠ **CAUTION:** To reduce the risk of loss of data or an unresponsive system, use the following procedure to safely remove the memory card.

1. Save your information and close all programs associated with the memory card.
2. Tap the remove hardware icon on the Windows desktop in the notification area, at the far right of the taskbar. Then follow the on-screen instructions.
3. To open the access door, see Inserting and removing a SIM on page 13

4. Push in on the card **(1)**, and then remove it from the slot **(2)**.



5. Close the access door.

8 Security

Protecting the tablet

Standard security features provided by the Windows operating system and Computer Setup can protect your personal settings and data from a variety of risks.

NOTE: Security solutions are designed to act as deterrents. These deterrents may not prevent a product from being mishandled or stolen.

NOTE: Before you send your tablet for service, back up and delete confidential files, and remove all password settings.

NOTE: Some features listed in this chapter may not be available on your tablet.

NOTE: Your tablet supports Absolute Data Protect. If your tablet is lost or stolen, it can be located and locked, and personal data can be deleted from a remote location. The tablet must be connected to the Internet.

Tablet risk	Security feature
Unauthorized use of the tablet	HP Client Security, in combination with a password or other authentication credential
Unauthorized access to Computer Setup and other system identification information	BIOS administrator password in Computer Setup
Unauthorized startup from an optional external flash drive	Boot options feature in Computer Setup
Unauthorized access to a Windows user account	Windows user password
Unauthorized access to data	• HP Drive Encryption software • Windows Defender

Using passwords

A password is a group of characters that you choose to secure your tablet information. Several types of passwords can be set, depending on how you want to control access to your information. Passwords can be set in Windows or in Computer Setup that is preinstalled on the tablet.

- Setup passwords are set in Computer Setup and are managed by the system BIOS.
- Windows passwords are set only in the Windows operating system.

Use the following tips for creating and saving passwords:

- When creating passwords, follow requirements set by the program.
- Do not use the same password for multiple applications or websites, and do not reuse your Windows password for any other application or website.

- Use HP Password Manager to store all of your user names and passwords for all of your websites and applications. You can securely read them in the future if they cannot be remembered.
- Do not store passwords in a file on the tablet.

The following tables list commonly used Windows and BIOS administrator passwords and describe their functions.

Setting passwords in Windows

Password	Function
Administrator password*	Protects access to a Windows administrator-level account. **NOTE:** Setting the Windows Administrator password does not set the BIOS Administrator password.
User password*	Protects access to a Windows user account.
*For information about setting a Windows administrator password or a Windows user password, access HP Support Assistant. To access HP Support Assistant, on the Start screen, tap the **HP Support Assistant** app.	

Setting passwords in Computer Setup

Password	Function
BIOS administrator password	Protects access to Computer Setup.

Using antivirus software

When you use the tablet to access email, a network, or the Internet, you potentially expose it to computer viruses. Computer viruses can disable the operating system, programs, or utilities, or cause them to function abnormally.

Antivirus software can detect most viruses, destroy them, and, in most cases, repair any damage they have caused. To provide ongoing protection against newly discovered viruses, antivirus software must be kept up to date.

Windows Defender, which includes antivirus features, is preinstalled on your tablet. It is strongly recommended that you continue to use an antivirus program in order to fully protect your tablet.

For more information about viruses, access HP Support Assistant. To access HP Support Assistant, on the Start screen, tap the **HP Support Assistant** app.

Using firewall software

Firewalls are designed to prevent unauthorized access to a system or network. A firewall can be a software program you install on your tablet and/or network, or it can be a solution made up of both hardware and software.

There are two types of firewalls to consider:

- Host-based firewalls—Software that protects only the computer it is installed on.
- Network-based firewalls—Installed between your DSL or cable modem and your home network to protect all the computers on the network.

When a firewall is installed on a system, all data sent to and from the system is monitored and compared with a set of user-defined security criteria. Any data that does not meet those criteria is blocked.

Windows Defender is installed on your tablet.

NOTE: Under some circumstances a firewall can block access to Internet games, interfere with printer or file sharing on a network, or block authorized email attachments. To permanently resolve the problem, reconfigure the firewall. To temporarily resolve the problem, disable the firewall, perform the task that you want to perform, and then reenable the firewall.

Installing critical security updates

CAUTION: Microsoft® sends out alerts regarding critical updates. To protect the tablet from security breaches and computer viruses, install all critical updates from Microsoft as soon as you receive an alert.

You can choose whether updates are installed automatically. To change the settings, on the Start screen, swipe from the right side of the screen, tap **Settings**, and then tap **Control Panel**. Tap **System and Security**, tap **Windows Update**, tap **Change settings**, and then follow the on-screen instructions.

Using HP Client Security

HP Client Security software is preinstalled on your tablet. This software can be accessed through the HP Client Security tile on the Start screen, the icon on the Windows desktop in the notification area, at the far right of the taskbar, and Windows Control Panel. It provides security features that help protect against unauthorized access to the computer, networks, and critical data. For more information, see the HP Client Security software Help.

9 Maintenance

Cleaning your tablet

Cleaning products

Use the following products to safely clean and disinfect your tablet:

- Dimethyl benzyl ammonium chloride 0.3 percent maximum concentration (For example: germicidal disposable wipes. These wipes come in a variety of brand names.)
- Alcohol-free glass cleaning fluid
- Water with mild soap solution
- Dry microfiber cleaning cloth or a chamois (static-free cloth without oil)
- Static-free cloth wipes

CAUTION: Avoid the following cleaning products:

Strong solvents, such as alcohol, acetone, ammonium chloride, methylene chloride, and hydrocarbons, which can permanently damage the surface of the tablet.

Fibrous materials, such as paper towels, which can scratch the tablet. Over time, dirt particles and cleaning agents can get trapped in the scratches.

Cleaning procedures

Follow the procedures in this section to safely clean your tablet.

WARNING! To prevent electric shock or damage to components, do not attempt to clean your tablet while it is turned on:

Shut down the tablet.

Disconnect external power.

Disconnect all powered external devices.

CAUTION: Do not spray cleaning agents or liquids directly on any tablet surface. Liquids dripped on the surface can permanently damage internal components.

Cleaning the display

Gently wipe the display using a soft, lint-free cloth moistened with an *alcohol-free* glass cleaner. Be sure that the display is dry before closing the display.

Cleaning the sides and cover

To clean and disinfect the sides and cover, use a soft microfiber cloth or chamois moistened with one of the cleaning solutions listed previously or use an acceptable germicidal disposable wipe.

NOTE: When cleaning the cover of the tablet, use a circular motion to aid in removing dirt and debris.

Updating programs and drivers

HP recommends that you update your programs and drivers on a regular basis with the latest versions. Go to http://www.hp.com/support to download the latest versions. You can also register to receive automatic update notifications when they become available.

Using SoftPaq Download Manager

HP SoftPaq Download Manager (SDM) is a tool that provides quick access to SoftPaq information for HP business computers without requiring the SoftPaq number. Using this tool, you can easily search for SoftPaqs, and then download and unpack them.

SoftPaq Download Manager works by reading and downloading, from the HP FTP site, a published database file containing computer model and SoftPaq information. SoftPaq Download Manager allows you to specify one or more computer models to determine which SoftPaqs are available for download.

SoftPaq Download Manager checks the HP FTP site for updates to the database and software. If updates are found, they are downloaded and applied automatically.

SoftPaq Download Manager is available on the HP website. To use SoftPaq Download Manager to download SoftPaqs, you must first download and install the program. Go to the HP website at http://www.hp.com/go/sdm, and then follow the instructions to download and install SoftPaq Download Manager.

To download SoftPaqs:

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `softpaq`, and then tap HP SoftPaq Download Manager. Follow the instructions to download SoftPaqs.

NOTE: If prompted by User Account Control, tap **Yes**.

10 Backup and recovery

To protect your information, use Windows backup and restore utilities to back up individual files and folders, back up your entire hard drive, create system repair media (select models only) by using an optional external flash drive, or an optional external optical drive, or create system restore points. In case of system failure, you can use the backup files to restore the contents of your tablet.

1. Swipe from the right edge of the touch screen to display the charms, tap **Search**, and then tap the search box.
2. In the search box, type `restore`, and then select from the list of displayed options.

NOTE: For detailed instructions on various backup and restore options, perform a search for these topics in Windows Help and Support.

In case of system instability, HP recommends that you print the recovery procedures and save them for later use.

NOTE: Windows includes the User Account Control feature to improve the security of your tablet. You may be prompted for your permission or password for tasks such as installing software, running utilities, or changing Windows settings. For more information, see Windows Help and Support.

Backing up your information

Recovery after a system failure is as good as your most recent backup. You should create system repair media and your initial backup immediately after initial system setup. As you add new software and data files, you should continue to back up your system on a regular basis to maintain a reasonably current backup.

For more information on the Windows backup features, see Windows Help and Support.

Performing a system recovery

In case of system failure or instability, the computer provides the following tools to recover your files:

- Windows recovery tools: You can use Windows Backup and Restore to recover information you have previously backed up. You can also use Windows Automatic Repair to fix problems that might prevent Windows from starting correctly.
- f11 recovery tools: You can use the f11 recovery tools to recover your original hard drive image. The image includes the Windows operating system and software programs installed at the factory.

NOTE: If you are unable to boot (start up) your tablet and you cannot use the system repair media you previously created (select models only), contact support.

Using the Windows recovery tools

To recover information you previously backed up, see Windows Help and Support for steps on restoring files and folders.

To recover your information using Automatic Repair, follow these steps:

CAUTION: Some Startup Repair options will completely erase and reformat the hard drive. All files you have created and any software installed on the computer are permanently removed. When reformatting is complete, the recovery process restores the operating system, as well as the drivers, software, and utilities from the backup used for recovery.

NOTE: An external keyboard, mouse, and external flash drive may be required to perform this procedure.

1. If possible, back up all personal files.
2. If possible, check for the presence of the Recovery Image partition and the Windows partition. Swipe from the right edge of the touch screen, tap **Search**, and then tap the search box. Type `file`, and then tap **File Explorer**.
3. If the Windows partition and the Recovery Image partition are listed, shut down the tablet.
4. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
5. Select **Troubleshoot**, select **Advanced Options**, and then select **Startup Repair**.
6. Follow the on-screen instructions.

NOTE: For additional information on recovering information using the Windows tools, perform a search for these topics in Windows Help and Support.

Using f11 recovery tools

CAUTION: Using f11 completely erases hard drive contents and reformats the hard drive. All files that you have created and any software that you have installed on the tablet are permanently removed. The f11 recovery tool reinstalls the operating system, drivers, Windows updates, and language packs that were installed at the factory. All other software applications must be downloaded from HP.com or the Windows Store.

NOTE: An external keyboard, mouse, and external flash drive may be required to perform this procedure.

To recover the original hard drive image using f11:

1. If possible, back up all personal files.
2. If possible, check for the presence of the HP Recovery partition: Swipe from the right edge of the touch screen, tap **Search**, and then tap the search box. Type `pc`, and then tap **This PC**.
3. If the HP Recovery partition is listed, shut down the tablet.
4. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
5. Tap **F11 HP Recovery**, and then follow the on-screen instructions.

Changing the boot device order

To change the boot order so that you can boot from an external device:

NOTE: An external flash drive is required to perform this procedure.

1. If possible, back up all personal files.
2. Shut down the tablet.

3. Connect the external flash drive.
4. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
5. Tap **F9 Boot Options**.
6. Select the external flash drive as the boot device.
7. Restart the tablet.

Using Windows Refresh or Windows Reset

When your tablet is not working properly and you need to regain system stability, the Windows Refresh option allows you to start fresh and keep what is important to you.

The Windows Reset option allows you to perform detailed reformatting of your tablet, or remove personal information before you give away or recycle your tablet. For more information on these features, see Windows Help and Support.

11 Computer Setup and HP PC Hardware Diagnostics (UEFI)

Using Computer Setup

Computer Setup, or F10 BIOS Setup (Basic Input/Output System), controls communication between all the input and output devices on the system (such as disk drives, display, keyboard, mouse, and printer). Computer Setup includes settings for the types of devices installed, the startup sequence of the tablet, and the amount of system and extended memory.

NOTE: Use extreme care when making changes in Computer Setup. Errors can prevent the tablet from operating properly.

Starting Computer Setup

To start Computer Setup, follow these steps:

1. Shut down the tablet.
2. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
3. Press f10 to enter Computer Setup.

Navigating and selecting in Computer Setup

To navigate and select in Computer Setup, follow these steps:

1. Shut down the tablet.
2. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
3. Press f10 to enter Computer Setup.
   - Tap a menu or a menu item to select it.
   - To close open dialog boxes and return to the main Computer Setup screen, tap **Escape**, and then follow the on-screen instructions.
4. To exit Computer Setup menus without saving your changes, select **Main**, select **Ignore Changes and Exit**, and then follow the on-screen instructions.
5. To save your changes and exit, select **Main**, select **Save Changes and Exit**, and then follow the on-screen instructions.

Restoring factory settings in Computer Setup

NOTE: Restoring defaults will not change the hard drive mode.

To return all settings in Computer Setup to the values that were set at the factory, follow these steps:

1. Shut down the tablet.
2. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
3. Press f10 to enter Computer Setup.
4. Select **Main**, and then tap **Restore Defaults**.
5. Follow the on-screen instructions.
6. To save your changes and exit, select **Save Changes and Exit**, and then follow the on-screen instructions.

   Your changes go into effect when the computer restarts.

NOTE: Your password settings and security settings are not changed when you restore the factory settings.

Updating the BIOS

Updated versions of the BIOS may be available on the HP website.

Most BIOS updates on the HP website are packaged in compressed files called *SoftPaqs*.

Some download packages contain a file named Readme.txt, which contains information regarding installing and troubleshooting the file.

Determining the BIOS version

To determine whether available BIOS updates contain later BIOS versions than those currently installed on the tablet, you need to know the version of the system BIOS currently installed.

To display BIOS version information (also known as *ROM date* and *System BIOS*), see Using Computer Setup on page 40.

1. Shut down the tablet.
2. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.

   The Startup menu is displayed.
3. Press f10 to enter Computer Setup.
4. Select **Main**, and then select **System Information**.
5. Follow the on-screen instructions.
6. To exit Computer Setup menus without saving your changes, select **Main**, select **Ignore Changes and Exit**, and then follow the on-screen instructions.

Downloading a BIOS update

CAUTION: To reduce the risk of damage to the tablet or an unsuccessful installation, download and install a BIOS update only when the tablet is connected to reliable external power using the AC adapter. Do not download or install a BIOS update while the tablet is running on battery power, docked in an optional docking device, or connected to an optional power source. During the download and installation, follow these instructions:

Do not disconnect power on the tablet by unplugging the power cord from the AC outlet.

Do not shut down the tablet or initiate Sleep.

Do not insert, remove, connect, or disconnect any device, cable, or cord.

1. To access HP Support Assistant on the Start screen, tap the **HP Support Assistant** app.
2. Tap **Updates and tune-ups**, and then tap **Check for HP updates now**.
3. Follow the on-screen instructions.
4. At the download area, follow these steps:
   a. Identify the most recent BIOS update and compare it to the BIOS version currently installed on your tablet. Make a note of the date, name, or other identifier. You may need this information to locate the update later, after it has been downloaded to your hard drive.
   b. Follow the on-screen instructions to download your selection to the hard drive.

      If the update is more recent than your BIOS, make a note of the path to the location on your hard drive where the BIOS update is downloaded. You will need to access this path when you are ready to install the update.

      NOTE: If you connect your tablet to a network, consult the network administrator before installing any software updates, especially system BIOS updates.

BIOS installation procedures vary. Follow any instructions that are revealed on the screen after the download is complete. If no instructions are revealed, follow these steps:

1. Swipe from the right edge of the touch screen, tap **Search**, and then tap the search box. Type `file`, and then tap **File Explorer**.
2. Select your hard drive designation. The hard drive designation is typically Local Disk (C:).
3. Using the hard drive path you recorded earlier, open the folder on your hard drive that contains the update.
4. Double-tap the file that has an .exe extension (for example, filename.exe).

   The BIOS installation begins.
5. Complete the installation by following the on-screen instructions.

NOTE: After a message on the screen reports a successful installation, you can delete the downloaded file from your hard drive.

Using HP PC Hardware Diagnostics (UEFI)

HP PC Hardware Diagnostics is a Unified Extensible Firmware Interface (UEFI) that allows you to run diagnostic tests to determine if the computer hardware is functioning properly. The tool runs outside of the operating system to isolate hardware failures from issues that may be caused by the operating system or other software components.

To start HP PC Hardware Diagnostics UEFI:

1. Shut down the tablet if it is not already powered off.
2. To power on the tablet, press the **Power** button and **Volume down** button simultaneously.
3. Select **System Diagnostics**.
4. Select the type of diagnostic test that you want to run, and then follow the on-screen instructions.

NOTE: If you need to stop a diagnostic test while it is running, press anywhere on the screen.

12 Support

Contacting support

If the information provided in this user guide or HP Support Assistant does not address your questions, you can contact support. For U.S. support, go to http://www.hp.com/go/contactHP. For worldwide support, go to http://welcome.hp.com/country/us/en/wwcontact_us.html.

Here you can:

- Chat online with an HP technician.

  NOTE: When support chat is not available in a particular language, it is available in English.

- Email support.
- Find support telephone numbers.
- Locate an HP service center.

13 Specifications

Input power

The power information in this section may be helpful if you plan to travel internationally with the tablet.

The tablet operates on DC power, which can be supplied by an AC or a DC power source. The AC power source must be rated at 100–240 V, 50–60 Hz. Although the tablet can be powered from a standalone DC power source, it should be powered only with an AC adapter or a DC power source supplied and approved by HP for use with this tablet.

The tablet can operate on DC power within the following specifications.

Input Power	Rating
Operating voltage and current	9 V DC @ 1.1A – 10W

NOTE: This product is designed for IT power systems in Norway with phase-to-phase voltage not exceeding 240 V rms.

NOTE: The tablet operating voltage and current can be found on the system regulatory label.

Operating environment

Factor	Metric	U.S.
Temperature		
Operating (writing to optical disc)	**5°C to 35°C**	41°F to 95°F
Nonoperating	**-20°C to 60°C**	-4°F to 140°F
Relative humidity (noncondensing)		
Operating	**10% to 90%**	10% to 90%
Nonoperating	**5% to 95%**	5% to 95%
Maximum altitude (unpressurized)		
Operating	**-15 m to 3,048 m**	-50 ft to 10,000 ft
Nonoperating	**-15 m to 12,192 m**	-50 ft to 40,000 ft

A Traveling with the tablet

For best results, follow these traveling and shipping tips:

- Prepare the tablet for traveling or shipping:
  - Back up your information.
  - Remove all external media cards, such as memory cards.

    ⚠ **CAUTION:** To reduce the risk of damage to the tablet, damage to a drive, or loss of information, remove the media from a drive before shipping, storing, or traveling with a drive.

  - Turn off and then disconnect all external devices.
  - Shut down the tablet.
- Take along a backup of your information. Keep the backup separate from the tablet.
- When traveling by air, carry the tablet as hand luggage; do not check it in with the rest of your bags.

⚠ **CAUTION:** Avoid exposing a drive to magnetic fields. Security devices with magnetic fields include airport walk-through devices and security wands. Airport conveyer belts and similar security devices that check carry-on baggage use X-rays instead of magnetism and do not damage drives.

- In-flight tablet use is at the discretion of the airline. If you plan to use the tablet during a flight, check with the airline in advance.
- If you are shipping the tablet, use suitable protective packaging and label the package “FRAGILE.”
- If the tablet has a wireless device installed, such as an 802.11b/g device, a Global System for Mobile Communications (GSM) device, or a General Packet Radio Service (GPRS) device, the use of these devices may be restricted in some environments. Such restrictions may apply onboard aircraft, in hospitals, near explosives, and in hazardous locations. If you are uncertain of the policy that applies to the use of a particular device, ask for authorization to use it before you turn it on.
- If you are traveling internationally, follow these suggestions:
  - Check the computer-related customs regulations for each country or region on your itinerary.
  - Check the power cord and adapter requirements for each location in which you plan to use the tablet. Voltage, frequency, and plug configurations vary.

    ⚠ **WARNING!** To reduce the risk of electric shock, fire, or damage to the equipment, do not attempt to power the tablet with a voltage converter kit sold for appliances.

B Electrostatic discharge

Electrostatic discharge is the release of static electricity when two objects come into contact—for example, the shock you receive when you walk across the carpet and touch a metal door knob.

A discharge of static electricity from fingers or other electrostatic conductors may damage electronic components. To prevent damage to the tablet, damage to a drive, or loss of information, observe these precautions:

- If removal or installation instructions direct you to unplug the tablet, unplug it after being properly grounded and before removing a cover.
- Keep components in their electrostatic-safe containers until you are ready to install them.
- Avoid touching pins, leads, and circuitry. Handle electronic components as little as possible.
- Use nonmagnetic tools.
- Before handling components, discharge static electricity by touching an unpainted metal surface of the component.
- If you remove a component, place it in an electrostatic-safe container.

If you need more information about static electricity or assistance with component removal or installation, contact HP support.

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