

Arch Linux Handbook

For beginners

Don't fear the terminal. Start with a few commands. This section is for people new to Arch: how Arch works, what to do after installing, pacman and the AUR, basic terminal commands, GNOME and KDE shortcuts and where each setting lives.

```
[user@archlinux ~]$ sudo pacman -Syu
```

user your username · **archlinux** the computer name · **~** the folder you are in (your home folder) · **\$** means a normal user, **#** means root (administrator). Nothing appears on screen while you type a password; that is normal.

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Yellow italic text (like *<package>*) marks the parts you fill in. In the terminal, paste is Ctrl+Shift+V and copy is Ctrl+Shift+C. Commands that start with **sudo** change the system; read what they do before running them.

Understanding Arch

Arch comes with very little on its own; you choose the desktop, services and apps. In return the system stays current and lean.

Rolling release	Arch has no versions like "Arch 13". With <code>pacman -Syu</code> you move to the newest packages every day; you never need to reinstall.
Arch Wiki	wiki.archlinux.org . One of the best bodies of documentation in the Linux world; search the Wiki before asking on a forum.
<code>archinstall</code>	The menu-driven install script you get by typing <code>archinstall</code> on the install medium. It asks about disks, desktop, audio and drivers.
Arch News	archlinux.org/news . Updates that need manual intervention are announced here; glance at it before a big update.
AUR	Arch User Repository. Community recipes (PKGBUILDs) for thousands of packages not in the official repositories.

WARNING Partial upgrades are not supported on Arch: don't type `sudo pacman -Sy <package>`. Always use `sudo pacman -Syu <package>`; otherwise library versions mismatch and programs won't start.

TIP Services you install usually don't start on their own. Enable services like Bluetooth, printing and SSH with `sudo systemctl enable --now <service>`.

After installing

After installing a desktop with `archinstall`, going through these in order is a good start. `archinstall` may have done some already; running the commands again does no harm.

1 Update the system

The first job after installing: get all pending updates.

```
$ sudo pacman -Syu
```

2 Edit pacman.conf, enable multilib

Remove the # in front of #Color (colored output). For Steam and Wine, remove the # in front of the [multilib] line and the Include line under it at the end of the file. Then refresh the package list.

```
$ sudo nano /etc/pacman.conf
```

```
$ sudo pacman -Syu
```

3 Pick the fastest mirrors

Noticeably speeds up package downloads. Replace the countries with your own and your neighbors'.

```
$ sudo pacman -S reflector
```

```
$ sudo reflector --country Germany,France --protocol https --latest 10 --sort rate  
--save /etc/pacman.d/mirrorlist
```

4 Install the yay AUR helper

To install AUR packages with one command. The first install is manual.

```
$ sudo pacman -S --needed git base-devel
```

```
$ git clone https://aur.archlinux.org/yay-bin.git && cd yay-bin && makepkg -si
```

5 Check the sound system

PipeWire is the modern sound server; archinstall usually installs it.

```
$ sudo pacman -S --needed pipewire pipewire-pulse pipewire-alsa wireplumber
```

6 Enable Bluetooth and printing

Even when installed, their services may not be enabled.

```
$ sudo pacman -S --needed bluez bluez-utils cups
```

```
$ sudo systemctl enable --now bluetooth cups
```

7 Install codecs and fonts

For video playback and wide character coverage (emoji, Asian scripts).

```
$ sudo pacman -S ffmpeg gst-plugins-good gst-plugins-bad gst-plugins-ugly gst-libav  
noto-fonts noto-fonts-emoji noto-fonts-cjk ttf-dejavu
```

8 Install CPU microcode

Pick the one for your CPU. Then rebuild the initramfs; if you use GRUB, regenerate its configuration too.

```
$ sudo pacman -S intel-ucode
```

```
$ sudo pacman -S amd-ucode
```

```
$ sudo mkinitcpio -P
```

9 Install Flatpak

Flathub is added automatically.

```
$ sudo pacman -S flatpak
```

10 Install a snapshot tool

archinstall's Btrfs layout (@, @home) works with Timeshift's Btrfs mode. If an update breaks the system you're back in minutes.

```
$ sudo pacman -S timeshift
```

```
$ sudo systemctl enable --now cronie
```

11 Turn on periodic maintenance

SSD TRIM, package cache cleanup and weekly mirror refresh.

```
$ sudo pacman -S pacman-contrib
```

```
$ sudo systemctl enable --now fstrim.timer paccache.timer reflector.timer
```

Meet the terminal

The terminal is the window where you give the computer commands by typing. It depends on the desktop you installed: Console on GNOME, Konsole on KDE. On KDE it opens with

Ctrl + **Alt** + **T**; on GNOME press Super and type "terminal".

TIP Linux is case-sensitive: `Documents` and `documents` are different folders. Put names with spaces in quotes: `cd "New Folder"`.

TIP Type part of a name and press **Tab**: the command or file name completes itself. Press it twice to list the options. This habit saves more time than anything else.

```
$ man <command>
```

Opens the manual page for a command. Quit with **q**, search inside with **/word**.

```
$ <command> --help
```

Shows a short help text and the command's options.

```
$ sudo <command>
```

Runs the command with administrator (root) rights. It asks for your own password; nothing shows while you type.

```
$ clear
```

Clears the screen. Shortcut: **Ctrl** + **L**.

```
$ history
```

Lists the commands you typed before. You can also step back with **↑**.

```
$ which <command>
```

Shows which file a command runs from.

```
$ exit
```

Closes the terminal (or a remote session).

WARNING To stop a running command, press **Ctrl** + **C**. In the terminal, copy is **Ctrl** + **Shift** + **C** and paste is **Ctrl** + **Shift** + **V**.

Files and folders

~ means your home folder (`/home/username`). **.** is the current folder, **..** the one above it.

```
$ pwd
```

Prints the folder you are in.

```
$ ls
```

Lists the files in the current folder.

```
$ ls -la
```

Detailed list including hidden files (size, date, permissions). Names starting with a dot are hidden.

```
$ ls -lh
```

Shows sizes in readable KB/MB/GB.

```
$ cd <folder>
```

Enters a folder. Example: `cd Documents`.

```
$ cd ..
```

Goes up one folder.

```
$ cd
```

On its own, goes back to your home folder.
`cd -` returns to the previous folder.

```
$ mkdir <folder>
```

Creates a folder. For nested folders: `mkdir -p a/b/c`.

```
$ touch <file>
```

Creates an empty file (or updates the date of an existing one).

```
$ cp <source> <target>
```

Copies a file. For folders use `cp -r`.

```
$ mv <source> <target>
```

Moves or renames. Example: `mv old.txt new.txt`.

```
$ rm <file>
```

Deletes a file. It does not go to the trash and cannot be undone.

```
$ rm -r <folder>
```

Deletes a folder and everything in it. Add `-i` to confirm each file.

```
$ gio trash <file>
```

Sends the file to the Trash instead of deleting it, so it can be restored like on the desktop.

```
$ find ~ -name "*.pdf"
```

Finds every file ending in .pdf in your home folder.

```
$ ln -s <target> <link-name>
```

Creates a shortcut (symbolic link) to a file or folder.

WARNING Never run commands from the internet that start with `sudo rm -rf` unless you understand them. They can wipe the system in seconds.

Reading and editing files

A simple editor that runs in the terminal is enough for changing configuration files. nano is the easiest. It may not be installed on Arch: `sudo pacman -S nano`.

```
$ cat <file>
```

Prints a short file to the screen.

```
$ less <file>
```

Reads a long file page by page. Space: next page, / search, q quit.

```
$ head -n 20 <file>
```

Shows the first 20 lines.

```
$ tail -n 50 <file>
```

Shows the last 50 lines. `tail -f` follows new lines live.

```
$ nano <file>
```

Opens the file in nano. For system files add sudo: `sudo nano /etc/hosts`.

Ctrl + O

nano: save (then Enter).

Ctrl + X

nano: quit. Asks if there are unsaved changes.

Ctrl + W

nano: search in the file.

Ctrl + K or Ctrl + U

nano: cut / paste a line.

```
$ xdg-open <file>
```

Opens the file with its default app (PDF, image, folder...). `xdg-open .` opens the current folder in the file manager.

Installing software: pacman

pacman is Arch's package manager. Commands combine an uppercase operation with lowercase options: `-S` sync/install, `-R` remove, `-Q` query installed packages.

```
$ sudo pacman -Syu
```

Refreshes the package list and updates the whole system. Do it at least once a week.

```
$ sudo pacman -S <package>
```

Installs software. You can list several: `sudo pacman -S vlc gimp`.

```
$ sudo pacman -Rns <package>
```

Removes a package along with dependencies installed only for it and its config backups.

```
$ pacman -Ss <word>
```

Searches the repositories.

```
$ pacman -Si <package>
```

Info about a package in the repositories.

```
$ pacman -Qs <word>
```

Searches installed packages.

```
$ pacman -Qi <package>
```

Info about an installed package: version, size, install reason.

```
$ pacman -Qe
```

Packages you installed explicitly.

```
$ pacman -Qdtq | sudo pacman -Rns -
```

Removes orphans: packages nothing depends on anymore.

```
$ sudo pacman -U <file>.pkg.tar.zst
```

Installs a local package file.

```
$ sudo pacman -Sc
```

Deletes cached files of packages that aren't installed.

WARNING Don't interrupt an update, and don't install single packages with `pacman -Sy`. If the kernel changed in an update, restart the computer.

The AUR and yay

The AUR holds PKGBUILD recipes describing how to build packages, not the packages themselves. yay downloads the recipes, builds and installs them. Many apps like Google Chrome and Visual Studio Code live here.

```
$ yay
```

Updates the whole system including the AUR (same as `yay -Syu`).

```
$ yay -S <package>
```

Installs a package from the AUR or the official repositories. Example: `yay -S google-chrome`.

```
$ yay <word>
```

Searches and lets you install from a numbered list.

```
$ yay -Rns <package>
```

Removes a package.

```
$ yay -Pw
```

Shows unread Arch News.

```
$ yay -Yc
```

Cleans up build dependencies that are no longer needed.

WARNING AUR packages aren't officially reviewed. Look at the PKGBUILD yay shows before installing; be careful with packages that download from unfamiliar addresses or have few votes.

TIP paru is a similar alternative that shows the PKGBUILD by default: `yay -S paru-bin`.

Installing apps with Flatpak

Flatpak apps run isolated from the system and bring their own libraries. When the distribution's version is old or missing, this is the easiest way to get desktop apps.

```
$ sudo pacman -S flatpak
```

Installs Flatpak; the Flathub repository is added automatically. Log out and back in afterwards.

TIP GNOME Software and KDE Discover also show Flatpak apps.

```
$ flatpak search <name>
```

Searches Flathub and shows the full app ID (e.g. com.spotify.Client).

```
$ flatpak install flathub <app-id>
```

Installs the app. Example: `flatpak install flathub com.discordapp.Discord`.

```
$ flatpak update
```

Updates all Flatpak apps.

```
$ flatpak list --app
```

Lists installed Flatpak apps.

```
$ flatpak uninstall <app-id>
```

Removes the app. Add `--delete-data` to remove its data too.

```
$ flatpak uninstall --unused
```

Frees space by removing runtimes nothing uses anymore.

```
$ flatpak run <app-id>
```

Starts the app from the terminal; handy for seeing error messages.

TIP To edit Flatpak permissions (file access, camera, etc.) visually, install Flatseal: `flatpak install flathub com.github.tchx84.Flatseal`.

TIP If you downloaded an AppImage, make it executable: `chmod +x App.AppImage`, then `./App.AppImage`. If it doesn't start, you need `sudo pacman -S fuse2`.

System information and resources

The equivalent of Windows Task Manager is System Monitor on both GNOME and KDE. The same information is available in the terminal.

```
$ cat /etc/os-release
```

Distribution name and version.

```
$ hostnamectl
```

Computer name, operating system, kernel and hardware summary.

```
$ uname -r
```

Version of the running Linux kernel.

```
$ df -h
```

Shows how much free space is left on each disk.

```
$ du -sh *
```

Space used by each file and folder in the current folder.

```
$ free -h
```

RAM and swap usage.

```
$ top
```

Live process list. Quit with `q`. For a nicer one: `sudo pacman -S htop` or `bttop`.

```
$ sudo pacman -S fastfetch
```

A tool that shows a system summary with a logo; run `fastfetch` after installing.

```
$ lscpu
```

Processor information.

```
$ lspci
```

Lists PCI devices such as the graphics and network cards.

```
$ lsusb
```

Lists connected USB devices.

```
$ pkill <program-name>
```

Closes a frozen program by name. Example: `pkill firefox`.

```
$ kill -9 <PID>
```

Force-kills a process by number (PID). `top` or `pgrep firefox` gives you the PID.

Shut down, restart, sessions

You can also use the desktop's power menu; the terminal equivalents are:

```
$ systemctl poweroff
```

Shuts the computer down.

```
$ systemctl reboot
```

Restarts.

```
$ systemctl suspend
```

Puts it to sleep (suspend).

```
$ loginctl terminate-session $XDG_SESSION_ID
```

Logs out (works regardless of desktop).

Super + **L**

Locks the screen (GNOME and KDE).

Ctrl + **Alt** + **Delete**

Opens the log out / power off dialog.

GNOME desktop shortcuts

Super is the Windows key on your keyboard. GNOME is designed to be used largely from the keyboard.

Super

Activities overview: open windows, workspaces and search. Start typing right away to find apps, files and settings.

Super + **A**

List of all apps.

Super + **1** ... **Super** + **9**

Opens or switches to the 1st ... 9th app in the dash.

Alt + **Tab**

Switch between apps. Super+Tab does the same.

Alt + **`**

Switch between windows of the same app (the key above Tab).

Super + **↑** or **Super** + **↓**

Maximize / restore the window.

Super + **←** or **Super** + **→**

Snap the window to the left / right half of the screen.

Super + **H**

Hide (minimize) the window.

Alt + F4	Close the window. In most apps Ctrl+Q quits the app.
Super + Page Up or Super + Page Down	Go to the previous / next workspace.
Super + Shift + Page Up or Super + Shift + Page Down	Move the window to the previous / next workspace.
Super + Shift + ← or Super + Shift + →	Move the window to the other monitor.
Super + V	Notification list and calendar.
Super + S	Quick settings menu (Wi-Fi, sound, brightness, power mode).
Super + Space	Switch keyboard layouts.
Print Screen	Screenshot tool: area, window or full screen; picture or video.
Shift + Print Screen	Takes a full-screen screenshot immediately. Saved to Pictures > Screenshots.
Alt + Print Screen	Takes a screenshot of the active window.
Ctrl + Alt + Shift + R	Starts / stops screen recording. Saved to Videos > Screencasts.
Alt + F2	Run a command dialog.

TIP Ctrl+Alt+T may not open a terminal on GNOME by default. To add it, see the custom shortcut step in “Where is that setting?”.

KDE Plasma shortcuts

On KDE the Super key is called Meta. You can change every shortcut in System Settings > Keyboard > Shortcuts.

Meta	Application launcher (start menu).
Alt + Space or Alt + F2	KRunner: apps, files, calculator, unit converter.
Meta + W	Overview: windows and desktops.
Meta + G	Grid view of all desktops.
Alt + Tab	Switch between windows.
Meta + ← or Meta + →	Tile the window to the left / right half of the screen.
Meta + Page Up or Meta + Page Down	Maximize / minimize the window.
Meta + T	Tiling editor: define custom window layouts.
Meta + D	Show the desktop.
Ctrl + F1 ... Ctrl + F4	Go to virtual desktop 1 ... 4.
Meta + Ctrl + ← or Meta + Ctrl + →	Previous / next desktop.
Meta + Shift + ← or Meta + Shift + →	Move the window to the other monitor.
Meta + E	Dolphin file manager.
Ctrl + Alt + T	Konsole terminal.
Meta + V	Clipboard history.

Meta + L

Lock the screen.

Print Screen

Spectacle screenshot tool.

Meta + Shift + Print Screen

Screenshot of a rectangular region.

Meta + Print Screen

Screenshot of the active window.

Ctrl + Alt + Esc

Turns the cursor into a skull; the frozen window you click is force-closed.

Alt + F3

Window menu (keep above, move to desktop, etc.).

Terminal and Bash shortcuts

The first group belongs to the terminal window (mostly the same in GNOME Terminal, Console, Konsole and Ptyxis), the second to the command line itself (Bash).

Ctrl + Shift + T

New tab.

Ctrl + Shift + N

New window.

Ctrl + Shift + W

Close tab.

Ctrl + Page Up or Ctrl + Page Down

Switch between tabs.

Ctrl + Shift + C or Ctrl + Shift +

V

Copy / paste.

Ctrl + + or Ctrl + -

Bigger / smaller text. Ctrl+0 resets.

Ctrl + Shift + F

Search the output.

F11

Full screen.

Tab	Complete a command or file name. Twice: list the options.
↑ or ↓	Previous / next command.
Ctrl + R	Search history: finds an old command as you type. Ctrl+R again goes further back, Enter runs it.
Ctrl + C	Stop the running command or cancel the line you typed.
Ctrl + D	Log out (same as exit on an empty line).
Ctrl + L	Clear the screen.
Ctrl + A or Ctrl + E	Move to the start / end of the line.
Ctrl + U or Ctrl + K	Delete from the cursor to the start / end of the line.
Ctrl + W	Delete the word before the cursor.
Alt + B or Alt + F	Move back / forward one word.
Ctrl + Z	Pause the running command and send it to the background. fg brings it back.
!!	Repeats the last command. Common use: sudo !! reruns the last command with sudo.

Files (Nautilus) shortcuts

GNOME's file manager is the Files app. Most shortcuts are the same in KDE's Dolphin.

Ctrl + H	Show / hide hidden files.
------------------------	---------------------------

Ctrl + L	Type a path into the address bar (e.g. /etc).
F2	Rename. With several files selected, batch rename opens.
Ctrl + Shift + N	New folder.
Delete or Shift + Delete	Move to Trash / delete permanently.
Ctrl + F	Search in the folder.
Alt + ↑	Go up to the parent folder.
Alt + ← or Alt + →	Back / forward.
Ctrl + T	New tab.
Ctrl + 1 or Ctrl + 2	List / grid view.
Ctrl + I	Properties of the selected item.
Space	Quick preview of the selected file (needs the sushi package: <code>sudo pacman -S sushi</code>).

TIP To add a folder to the sidebar, right-click it > Add to Bookmarks, or press Ctrl+D.

Where is that setting? (GNOME)

On GNOME almost everything is in the Settings app. The quickest way in: press Super and type the setting's name (e.g. "display", "sound", "bluetooth"). Menu names can differ slightly between GNOME versions.

Settings > Wi-Fi	Connect to wireless networks, forget saved ones, share with a QR code.
Settings > Network	Wired connection, adding a VPN, proxy.

Settings > Bluetooth

Pair headphones, mice, phones.

Settings > Displays

Resolution, refresh rate, scaling (125%, 150%...), multi-monitor layout, Night Light.

Settings > Sound

Output/input device, volume levels, per-app volume.

Settings > Power

Power mode (Power Saver / Balanced / Performance), screen blank timeout, automatic suspend, battery percentage.

Settings > Multitasking

Hot corner, number of workspaces, edge tiling.

Settings > Appearance

Light/dark style, accent color, wallpaper.

Settings > Apps

App permissions and notifications; Default Apps (browser, mail, music, video).

Settings > Notifications

Do Not Disturb, lock screen notifications, per-app notifications.

Settings > Online Accounts

Add Google, Microsoft or Nextcloud accounts; Drive/OneDrive appear in Files.

Settings > Mouse & Touchpad

Pointer speed, tap to click, natural scrolling.

Settings > Keyboard

Input sources, Compose key, View and Customize Shortcuts.

Settings > Keyboard >
View and Customize Shortcuts >
Custom Shortcuts

Add your own shortcut. Example: Name "Terminal", Command `kgx`, Shortcut Ctrl+Alt+T.

Settings > Printers

Add printers; network printers are usually found automatically.

Settings > Accessibility

Large text, zoom, screen reader, sticky keys, cursor size.

Settings > Privacy & Security

Screen lock delay, location services, file history and automatic trash emptying.

Settings > System > Region & Language

Interface language, date/number/currency formats.

Settings > System > Date & Time

Time zone, automatic time, 24-hour format.

Settings > System > Users

New users, passwords, administrator rights, automatic login.

Settings > System > About

Version, processor, RAM and disk information.

Tweaks > Windows Titlebars

Minimize / maximize buttons.

Tweaks > Fonts

Interface, document and monospace fonts; font scaling.

Tweaks > Startup Applications

Apps that start automatically when you log in.

Disks app

Format disks, create partitions, SMART health data, write disk images.

Where is that setting? (KDE Plasma)

On KDE, settings live in the System Settings app. Typing a setting's name into the launcher also opens the right page. Menu names can differ slightly between Plasma versions.

System Settings > Colors & Themes

Global theme, colors, window decorations, icons, cursors.

System Settings > Text & Fonts

Fonts and scaling.

Right-click the desktop >

Configure Desktop and Wallpaper

Wallpaper and desktop layout.

Right-click the panel > Enter Edit Mode

Move the panel, add or remove widgets.

System Settings > Mouse & Touchpad

Pointer speed, tap to click, natural scrolling.

System Settings > Keyboard

Keyboard layouts, repeat rate.

System Settings > Keyboard > Shortcuts

Change any shortcut or add one for a command.

System Settings > Display & Monitor

Resolution, scaling, refresh rate, multiple monitors, Night Light.

System Settings > Sound

Output/input devices, per-app volume.

System Settings > Power Management

Screen dimming, suspend, what happens when the lid closes.

System Settings > Wi-Fi & Networking

Wireless, wired and VPN connections.

System Settings > Bluetooth

Pair devices.

System Settings > Window Management

Window behavior, task switcher, KWin scripts.

System Settings > General Behavior

Open files with a single or double click, animation speed.

System Settings > Default Applications

Browser, email, file manager, terminal.

System Settings > Autostart

Apps and scripts that start when you log in.

System Settings > Region & Language

Language, number, date and currency formats.

System Settings > Users

Password, avatar, new users.

Look and feel, GNOME extensions

GNOME ships minimal; you add what you miss with extensions. Search and install them with one click in Extension Manager.

```
$ sudo pacman -S gnome-tweaks
```

Tweaks: fonts, title bar buttons, startup applications.

```
$ flatpak install flathub  
com.mattjakeman.ExtensionManager
```

Extension Manager: search, install and configure extensions.

TIP Popular extensions: **Dash to Dock** (always-visible dock), **AppIndicator and KStatusNotifierItem Support** (tray icons for apps like Discord and Steam), **Blur my Shell** (blurred panel), **Clipboard Indicator** (clipboard history), **Caffeine** (keeps the screen on).

```
$ gsettings set  
org.gnome.desktop.wm.preferences button-  
layout 'appmenu:minimize,maximize,close'
```

Adds minimize and maximize buttons without Tweaks.

```
$ gsettings set org.gnome.desktop.interface  
show-battery-percentage true
```

Shows the battery percentage in the top bar.

```
$ gnome-extensions list --enabled
```

Lists enabled extensions.

WARNING After a big GNOME update some extensions may stop working for a while. If the desktop acts strangely, try disabling extensions first.

USB drives and disks

USB drives appear in the file manager's sidebar and are mounted under `/media/` or `/run/media/`. Click the  icon next to it before unplugging.

```
$ lsblk
```

Shows all disks and partitions as a tree (sda, nvme0n1, etc.).

```
$ lsblk -f
```

Also shows each partition's file system (ext4, btrfs, ntfs, exfat) and label.

```
$ udisksctl mount -b /dev/<sdb1>
```

Mounts a partition without sudo.

```
$ udisksctl unmount -b /dev/<sdb1>
```

Unmounts it safely.

Disks > select the device > :

Format Disk

Wipes the USB drive. To use it on both Windows and Linux, create an exFAT partition.

```
$ flatpak install flathub  
io.gitlab.adhami3310.Impression
```

Impression: writes an ISO file to a USB drive to make an install drive.

WARNING When writing a disk with `dd` in the terminal, picking the wrong target (`/dev/sdX`) erases that whole disk. Check twice with `lsblk` first.

Common problems

The situations new Arch users most often get stuck on, and the first thing to try.

TIP "invalid or corrupted package (PGP signature)". The keyring is out of date. Update the keyring first, then the system: `sudo pacman -Sy archlinux-keyring && sudo pacman -Su` .

TIP "unable to lock database". Another pacman is running or a previous run was interrupted. If you're sure no pacman is running: `sudo rm /var/lib/pacman/db.lck` .

TIP "exists in filesystem" (file conflict). Check Arch News first; if manual intervention is needed, it's announced there. Find the file's owner with `pacman -Qo <file>` . Use `--overwrite` only if the news says so.

TIP ".pacnew file created" warning. A new version of a config file arrived but yours was kept. Review and merge the differences with `sudo pacdiff` (pacman-contrib package).

TIP "command not found". `sudo pacman -S pkgfile && sudo pkgfile -u` , then `pkgfile <command>` tells you which package you need.

TIP No internet after installing. NetworkManager isn't enabled: `sudo systemctl enable --now NetworkManager` , then connect with `nmtui` .

TIP Bluetooth or the printer doesn't show up. The service isn't on: `sudo systemctl enable --now bluetooth or cups`.

TIP No sound. Confirm it's installed with `pacman -Q pipewire-pulse wireplumber`, then `systemctl --user restart pipewire wireplumber`.

TIP Keyboard layout in the console or desktop. `sudo localectl set-keymap <layout>` (console) and `sudo localectl set-x11-keymap <layout>` (desktop).

TIP The clock is off when dual-booting with Windows. Linux keeps the hardware clock in UTC. The cleanest fix is enabling the `RealTimeIsUniversal` registry setting on Windows; `timedatectl set-local-rtc 1` on Linux also works but isn't recommended.

TIP USB, sound or Wi-Fi stopped working after an update. The kernel was updated but you didn't restart; the loaded modules belong to the new kernel. Restart.

Glossary

Words you'll often see in Arch forums and on the Wiki.

pacman Arch's package manager.

Repositories: core / extra / multilib Base system / other official packages / 32-bit compatibility packages (Steam, Wine).

AUR / PKGBUILD / makepkg Community package recipes / the recipe file itself / the tool that builds a package from a recipe.

yay / paru AUR helpers: combine downloading, building and installing a recipe in one command.

Mirror A server packages are downloaded from; the list is `/etc/pacman.d/mirrorlist`.

Keyring	The keys that verify package signatures (archlinux-keyring).
Partial upgrade	Upgrading one package without updating the whole system; unsupported on Arch.
.pacnew / .pacsave	A new config file shipped by an update / a kept config file from a removed package.
base-devel	The group of tools needed to build packages (gcc, make, fakeroot...).
mkinitcpio	The tool that builds the initramfs image used at boot.
Terminal / shell	The terminal is the window you type in; the shell is the program that interprets the commands. The default is Bash.
/etc, /usr, /var, /home	System settings / programs / changing data and logs / user folders.

Commands are written for current Arch Linux (pacman 7, a GNOME or KDE Plasma desktop installed with archinstall). Package names can change over time on a rolling release; when in doubt, the Arch Wiki wins. Commands that start with `sudo` change the system; read what they do before running them.