Homebrew Package manager

START HERE

`brew` **update**
Refresh Homebrew itself

`brew` **uninstall** *<name>*
Remove a package

`brew` **search** *<text>*
Find a formula or cask

`brew` **cleanup**
Free old versions and cache

`brew` **info** *<name>*
Read details first

`brew` **install** *<name>*
Install a package

`brew` **list**
See what is installed

`brew` **upgrade**
Upgrade everything outdated

Taps homebrew-core, cask → `brew update` → **Formula or cask** recipe → `brew install` → **Cellar** versioned files → `link` → **Prefix bin** on your PATH

CONCEPTS

A formula is a command-line package built or poured from a bottle; a cask is a prebuilt GUI app or binary (macOS mostly).

install and upgrade usually run update first, so a fresh brew update is rarely needed before them.

Prefix differs: /opt/homebrew on Apple Silicon, /usr/local on Intel Macs, /home/linuxbrew/.linuxbrew on Linux. Never use sudo for brew.

INSTALL AND REMOVE

`brew` **install** *<formula>*
Install a command-line package

`brew` **install --cask** *<cask>*
Install a GUI app

`brew` **uninstall** *<name>*
Remove a package

`brew` **reinstall** *<name>*
Remove and install again

`brew` **install -n** *<name>*
Dry run, change nothing

INSTALL AND REMOVE (cont.)

`brew` **install --build-from-source** *<formula>*
Compile instead of using a bottle
Dependencies still come as bottles when available.

`brew` **install --HEAD** *<formula>*
Build the upstream development version

`brew` **uninstall --zap --cask** *<cask>*
Also remove app support files

UPDATE AND UPGRADE

`brew` **update**
Fetch latest formulae and casks

`brew` **outdated**
List packages with newer versions

`brew` **upgrade**
Upgrade all outdated packages

`brew` **upgrade** *<name>*
Upgrade one package

`brew` **upgrade -n**
Preview what would upgrade

`brew` **upgrade --cask --greedy**
Include casks that self-update
Casks marked auto-updates or version latest are skipped without --greedy.

UPDATE AND UPGRADE (cont.)

`brew` **pin** *<formula>*
Hold at the current version

`brew` **unpin** *<formula>*
Allow upgrades again

SEARCH AND INSPECT

`brew` **search** *<text>*
Search formulae and casks

`brew` **search --desc** *<text>*
Search descriptions too

`brew` **info** *<name>*
Version, deps, caveats, install state

`brew` **list**
List installed formulae and casks

`brew` **list --versions**
Show installed versions

`brew` **list --cask**
List installed casks only

`brew` **leaves**
Packages you installed directly

`brew` **deps --tree** *<name>*
Dependency tree

`brew` **uses --installed** *<name>*
Installed packages needing this

`brew` **info --json=v2 --installed**
Installed state as JSON

SERVICES

`brew` **services list**
Services and their status

`brew` **services start** *<formula>*
Run now and at login/boot

`brew` **services stop** *<formula>*
Stop and unregister

`brew` **services restart** *<formula>*
Stop and start again

`brew` **services run** *<formula>*
Run now, not at login/boot

sudo brew services start *<formula>*
System-wide service as root

`brew` **services cleanup**
Remove unused service files

Without sudo a service is per-user (launchd or systemd user unit); with sudo it is system-wide.

TAPS

`brew` **tap**
List added taps

`brew` **tap** *<user>/<repo>*
Add a third-party repository

`brew` **untap** *<user>/<repo>*
Remove a tap

`brew` **install** *<user>/<repo>/<formula>*
Install from a tap in one step

CLEANUP AND DOCTOR

`brew` **cleanup**
Delete old versions and stale downloads

`brew` **cleanup -n**
Show what cleanup would delete

`brew` **autoremove**
Remove unneeded dependencies

`brew` **doctor**
Diagnose common problems

`brew` **config**
Print setup info for bug reports

`brew` **--prefix**
Show the install prefix

`brew` **link** *<formula>*
Link a formula into the prefix

`brew` **unlink** *<formula>*
Unlink but keep installed

Install and upgrade run a cleanup afterwards; export HOMEBREW_NO_INSTALL_CLEANUP to skip it.

BREWFILE (BUNDLE)

`brew` **bundle dump**
Write installed state to Brewfile

`brew` **bundle**
Install everything in the Brewfile

`brew` **bundle check**
Are all entries satisfied?

BREWFILE (BUNDLE) (cont.)

`brew` **bundle list**
List what the Brewfile declares

`brew` **bundle cleanup**
Show extras not in the Brewfile
Only previews; add --force to actually uninstall them.

`brew` **bundle cleanup --force**
Uninstall everything not listed

`brew` **bundle --file=***<path>*
Use a specific Brewfile

Brewfile

```
tap "<user>/<repo>"
brew "<formula>"
cask "<cask>"
```

RECIPES

Weekly maintenance

```
brew update
brew outdated
brew upgrade
brew autoremove
brew cleanup
```

Capture and restore a setup

```
brew bundle dump --file=~/
Brewfile
# on the new machine
brew bundle --file=~/Brewfile
```

Why is this installed?

```
brew leaves | grep <name>
brew uses --installed <name>
brew deps --tree <name>
```

Hold one package back

```
brew pin <formula>
brew upgrade   # skips it
brew unpin <formula>
```