

Your plumbing repair toolkit

Most household plumbing repairs come down to a handful of tools, a few cheap spare parts, and knowing which jobs to hand to a pro. Keep this checklist where you keep your tools.

The 12 tools that handle 90%

- Adjustable wrench** -- the workhorse for nuts and fittings
- Tongue-and-groove pliers**
Channellock-style, for slip nuts
- Basin wrench** -- the only tool that reaches faucet nuts
- Pipe wrench** -- for threaded steel/iron pipe
- Flange plunger** -- for toilets (cup plunger for sinks)
- Toilet (closet) auger** -- clears toilet clogs without mess
- Hand drain snake** -- 25 ft, for sink and tub clogs
- Screwdrivers** -- Phillips + flat, several sizes
- Hex / Allen key set** -- most modern faucet handles
- PTFE (plumber's) tape** -- seals threaded connections
- Cartridge puller** -- pulls a stuck Moen-style cartridge
- Headlamp + bucket + rags** -- light, drips, and cleanup

7 spare parts to keep on hand

- Toilet flapper** -- get 2-inch and 3-inch; the #1 fix
- Universal fill valve** -- Fluidmaster 400-style, fits most
- Washer + O-ring assortment**
for drips on older faucets
- Faucet aerator** -- cheap fix for low/spraying flow
- PTFE tape + pipe-thread sealant**
you always need more
- Braided supply lines** -- 1-2 spares; they fail with age
- Toilet wax ring** -- for a toilet that leaks at the base

Before you buy a part

The single most common reason a repair fails is the wrong part -- brands and models are not interchangeable. Identify yours first (page 3) or use our free part finder.

Fix it yourself, or call a pro? A quick decision tree

Usually DIY-friendly (cheap parts, low risk):

- Running toilet -- flapper or fill valve (\$10-30 part)
- Dripping faucet -- washers, O-rings, or a cartridge
- Clogged sink/tub/toilet -- plunger then a hand auger
- Low flow -- clean or replace the aerator
- Toilet leaking at the base -- a new wax ring

Call a pro (gas, code, or flood risk):

- Water heater replacement, or any gas-line work
- A burst pipe or a pipe leaking inside a wall, ceiling, or slab
- A main sewer line clog (needs a camera + power jetter)
- Anything you cannot shut the water off to first

The 4 mistakes that turn a \$5 fix into a \$1,500 repair

1. Skipping the shutoff.

Always close the fixture stop (or the main) and open the tap to bleed pressure before you start. A surprise spray becomes water damage fast.

2. Buying the wrong part.

Cartridges and flappers are not universal. Confirm the brand/model or measure the old part before you buy -- this is the #1 reason a repair fails.

3. Overtightening.

Porcelain cracks and plastic threads strip. Snug plus a small turn is enough; do not crank plastic fittings with a wrench.

4. Forcing a stuck cartridge or valve.

If it will not budge with a proper puller, stop. Wrenching on it can damage the valve body inside the wall -- a far bigger bill.

Identify it first: where the model number hides

- Faucet:** a tag on the cold supply line under the sink (Delta), or a number stamped on the body, base, or under the handle cap.
- Toilet:** stamped or ink-printed inside the tank, on the back wall near the waterline; also check under the tank lid.
- Shower/tub:** on the trim or the cartridge itself; match by brand + series (e.g. Delta 17 Series takes cartridge RP46463).

What common repairs cost (DIY parts vs. a pro)

Repair	DIY parts	Hire a pro
Running toilet (flapper / fill valve)	\$10-50	\$75-350
Dripping faucet (cartridge/washers)	\$10-40	\$100-350
Shower/tub cartridge	\$10-80	\$100-400
Clogged drain (sink/tub)	\$10-50	\$110-350
Toilet wax ring (leak at base)	\$5-20	\$100-350
Burst pipe / main line / water heater	pro only	\$350-2,500

National averages; your cost varies by region, severity, and access.

Your free tools (no signup):

- Cartridge & Valve Finder -- plumbingbythebook.com/faucet-cartridge-finder/
- Repair Cost Estimator -- plumbingbythebook.com/plumbing-repair-cost-calculator/
- Toilet Water-Waste Calculator -- plumbingbythebook.com/toilet-water-waste-calculator/