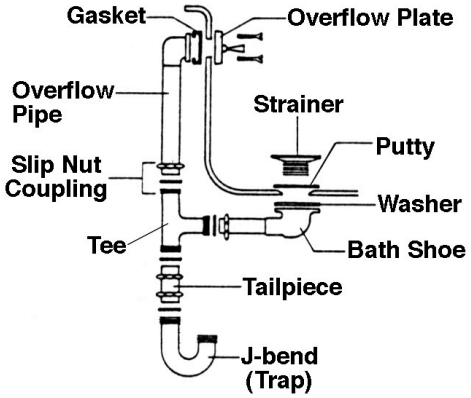
HOMEOWNER REPAIR GUIDE

BATHTUB DRAINS

The drain from your bathtub may have one of a variety of configurations. When problems occur—clogged lines, leaks, etc.—the repair method may depend on the way the drain line is designed.

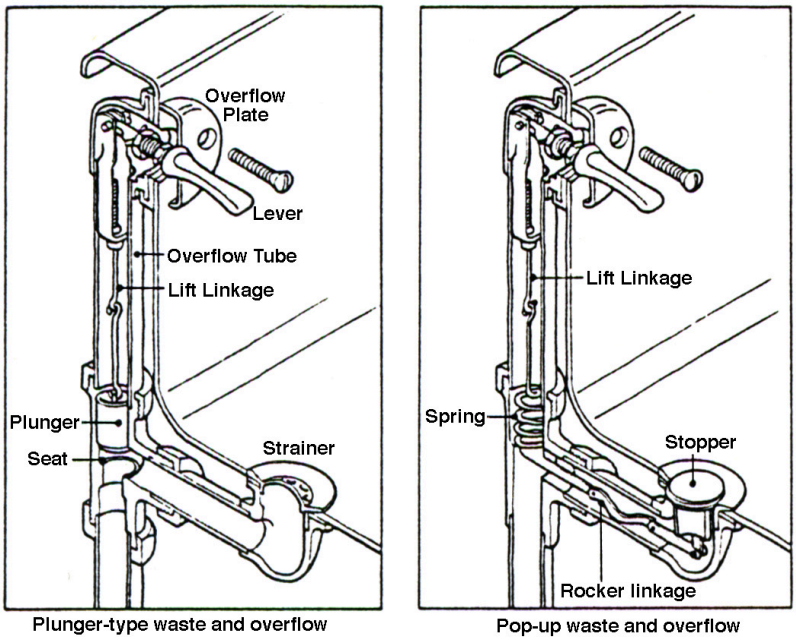
Nearly all tubs will have a waste and overflow drain assembly, comprised of three primary components: the overflow pipe from the upper tub wall, the waste pipe from the main drain opening, and the trip-waste mechanism that opens and shuts the drain opening *(not shown in illustration)*.



Waste and overflow drain assembly

TRIP-WASTE DESIGNS

There are two types of trip-waste designs *(see illustrations)*. The **plunger-type** has a strainer that sits in the drain opening, while the **pop-up** model has a plug that is moved up and down by a trip lever on the tub wall.



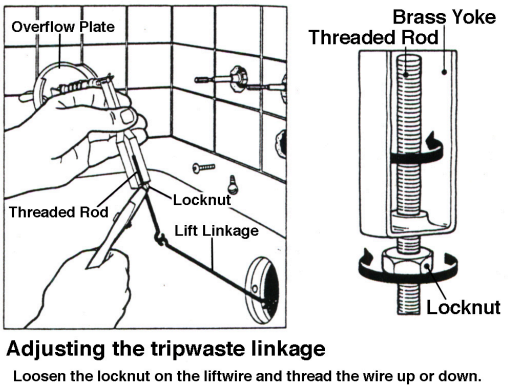
Plunger-type (left) and pop-up (right) waste and overflow

ADJUSTING A PLUNGER-TYPE DRAIN

To adjust a plunger-type drain, you'll need to unscrew the cover plate for the trip lever and pull the cover plate, lift linkage, and plunger out of the overflow drain opening. Clean the linkage and plunger. To adjust the drain flow, use needle-nose pliers to unscrew the locknut on the threaded lift rod; screw the rod down about 1/8" and tighten the locknut again. Then, reassemble the entire mechanism. The plunger cylinder should slide into place and close the drain opening when the trip lever is in the down position.

ADJUSTING A POP-UP DRAIN

To adjust a pop-up tub drain, raise the trip lever to the full-open position and pull the stopper and rocker arm assembly out of the drain opening. Then, remove the screws from the cover plate and pull the cover plate, trip lever, and linkage out of the overflow drain opening. Clean off any hair and debris, especially from the spring on the end of the lift wire. To adjust the height of the drain plug, use needle-nose pliers to unscrew the locknut on the threaded lift rod; screw the rod up about 1/8" and tighten the locknut again. Then, reinstall the entire assembly. If necessary, turn the lift linkage inside the overflow tube until it catches the rocker arm assembly. When the trip lever is in the up position, the pop-up should seat itself and plug the drain opening; when the trip lever is down, the plug should be pushed up so the tub will drain.

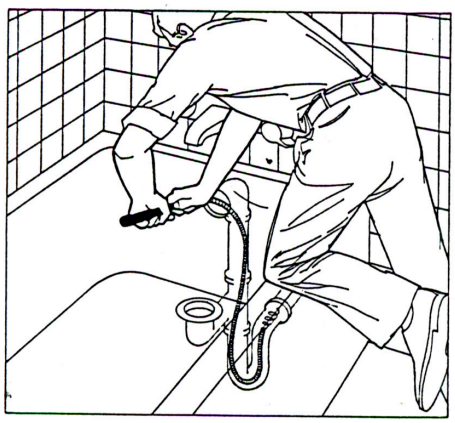


Adjusting the tripwaste linkage

SNAKING A CLOGGED TUB DRAIN

TUBS WITH A P TRAP

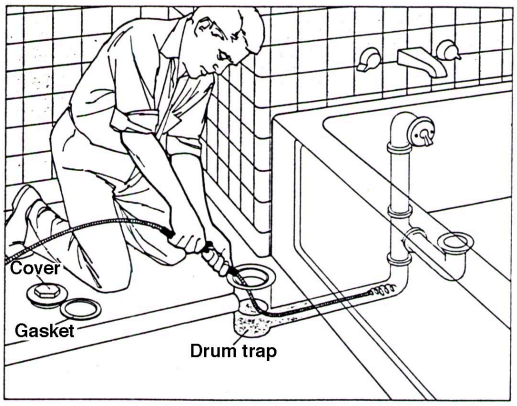
The drain line itself will generally have a trap that prevents the sewer gases from leaking into the bathroom. In modern tubs, a P trap is usually incorporated into the drain line below the tub, but you can seldom access it for snaking when the drain is clogged. Instead, unscrew the overflow plate and lift out the linkage as described above. Then, run a hand or electric snake into the overflow tube and through the drain line beyond it.



To snake a bathtub with a hand-powered auger or electric drain snake, run the cable through the tub overflow opening to reach the P trap.

TUBS WITH A DRUM TRAP

Older tubs may have a drum trap (located in the floor alongside the tub or mounted in a closet or behind an access panel) that will make snaking the drain line in this way difficult, if not impossible. To snake a line with a drum trap, you'll first need to remove the cover of the trap. There are several different designs; if you can't turn the cover, you may need to chisel through it—the covers are usually made from soft brass—and plan to buy a replacement cover from a plumbing supply store. From the drum trap, snake "upstream" toward the tub, and then "downstream" toward the main stack.



Older-style drain systems may have a drum trap. To snake a drain with this configuration, remove the cover of the trap and snake both "upstream" toward the tub and "downstream" toward the main stack.

LEAKS

Leaks in the drain line are rare, but not impossible. In most cases, getting access to the drain line will involve cutting into the ceiling of the room below. Before calling a plumber, however, check to see if the water might instead be coming through hairline cracks between the ceramic tiles in the tub area; re-grouting and sealing the tile may be necessary, instead of drain repair.

Home Repair Resource center

Home Repair Resource Center empowers homeowners to maintain their homes for sustainable and diverse communities.

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