

## A Guide to Steam Frothing Milk

Steaming milk is the traditional way to make froth for cappuccino. A froth can also be obtained by beating, or whipping, heated milk. Both processes induce air to become trapped in milk bubbles, and that's the froth.

The process of getting milk to froth from steaming is a bit tricky at first, however it becomes easy with a little practice. I think it is still the best way to get the milk and froth to its optimal temperature and flavor.

Getting a good froth should generally take one minute or less in commercial and other powerful machines, and up to 2 minutes in home electric and stovetop machines.



**Start with a cold pitcher**, preferably of stainless steel or porcelain. Most ceramic pitchers are also heat resistant, and in a pinch you can use your Pyrex measuring cup. The ideal pitcher is bell shaped with a low belly, where the milk will swirl to a frothing frenzy.

**For initial practice, use skim milk.** Its low fat content allows for longer steaming before the milk scalds (at over 180°F), so it will be more forgiving of your initial mistakes. Skim creates a bluish white foam, while whole milk makes it milky white.

**Only fill the pitcher with a small amount of milk**, and never more than 1/3 full. Because home espresso machines don't have the power of the commercial units, using less milk will help you get a better froth. And with less milk, you have better control and you'll get a creamier froth.

**Before inserting the wand into the milk**, blow a bit of steam through it, to clear any water in the line.

**Insert the steaming wand about 1/4" to 1/2"** into the milk, and slowly turn on the steam. On some machines, the first few seconds of frothing might work best with the nozzle in the middle.

**Slowly move the pitcher up and down** and allow a couple slurps to stretch the volume. Allow more slurps with small home machines or stovetop units.

**The milk should be at about 100°F** at this point, and the volume should have increased, up to 50%.

**After this rumbling**, or initial airing, be sure to keep the wand under the surface of the milk and increase the amount of steam to full force. Move the pitcher slowly up and down, to keep the nozzle in its optimal position.

**Keep the wand** close to the wall of the pitcher and tilt it, so that the introduced steam creates a swirl, like a whirlpool. This whirlpool is important to maintain, as it insures

that air is being evenly distributed for proper formation of the foam's miniature bubbles.

**Listen for the sound differences**, which will help you in keeping the nozzle under the surface of the milk. If it slurps, it's over the surface and you're creating big bubbles; if it hisses, it's under and helps insure small bubbles.

**The hissing noise** will at first be high pitched, then sink lower as more bubbles form. Stop steaming if it gets to a groaning, or the milk will scald.

**The ideal froth** has very small bubbles, like a thick foam.

**When the froth has about trebled** the volume of the milk, and if the milk is not hot enough, plunge the steaming wand deep into the milk, to heat it.

**Keep a couple fingers touching the side of the pitcher**; if you feel it getting too hot, start turning down the steam, to prevent scalding the milk. The resulting milk should be between 150-170°F, depending on your personal temperature preferences.

**Turn off the steam valve first**, then remove the wand. This insures that spattering of the hot steam, milk or froth, will not occur.

**Wipe off** the tip and wand while they're still wet. Let off a bit of steam to clear the nozzle and wand of any milk, and prevent clogging.

**Lightly bang the pitcher** on your counter to collapse the larger bubbles and provide you with a thicker froth. Or let it stand for about half a minute before adding to the coffee.

**You've made a good froth if** the bubbles are minute and the foam pours together with the milk.

Remember, practice makes perfect.

### **What can go wrong?**

If you're not getting steam out of the wand's nozzle, check it for clogging. With the steam valve off, insert a pin into the hole(s) of the tip to clear clogs. Then allow a burst of steam to finish the clearing.

If you steam it for too long, the milk will start to scald then boil, the small bubbles will increase in size, then burst to decrease the volume, and leave you with hot milk without froth.

If the milk is not swirling fast enough, it can't become aerated, and eventually the milk will just scald and boil.

If you're pouring the mixture and milk comes out, leaving the froth in the pitcher, or if the froth plops in clumps, you've over-steamed it.

If you can't get past a slurping sound out of your steaming wand, you're either holding the nozzle over the surface of the milk, or your frothing machine has not built up enough steam pressure.

If you're not getting enough steam from a small espresso and cappuccino maker, especially after you've just made espresso from it, you may need to allow additional heating time for the water to reach the necessary temperature.

If you're not getting enough steam from a small espresso and cappuccino maker, and an air tube is attached to the steaming wand's nozzle, make sure this tube is not clogged, as it helps less powerful machines to achieve better froth by introduce air separately. If the foam bubbles are too large, try steaming without the air tube installed.

If you're not getting enough steam from a stovetop frother, make sure the steaming valve is open while you're heating the water, allow water in the nozzle to go into a cup, close the valve when steam begins to escape, bleed off some watery steam, and repeat the process until you get a rather dry steam, which should take about 1/2 minute. Then begin frothing.

If you have scalded milk, place it back in the refrigerator, and, when it has cooled, use it again after adding a bit of fresh milk to it. Needless to say, fresh milk will froth better and taste better.

If your next cup of espresso tastes burnt right after steaming on an electric espresso maker, next time turn on the coffee button to allow some water go through the head without the basket in place. This will allow steam to blow off and return the water temperature to normal.

If you're using soy or rice milk and you're not getting much froth, slurp it more when you start steaming.

### **Things to remember:**

- Check the nozzle for cleanliness before starting.
- Check for the proper level of water in your steamer.
- Monitor the water level in your steamer to make sure it doesn't run dry.
- Have a cold pitcher or two in the fridge, ready for frothing.
- Wash your pitchers thoroughly after every frothing.
- Clean the nozzle when you're done.