

03. Waste and Ammonia

Told by: George the Cranky Guppy

"This water has opinions. And the opinions it has when somebody does not manage the ammonia are opinions that are entirely unsuitable for a fish of my sensibilities. Ammonia attacks the gills. Ammonia makes breathing difficult. Ammonia, in short, is a personal insult." — George, from the Brackish Bog, gills flaring

Fish live in their water. They also — there is no delicate way to put this — produce waste in their water. Waste from fish bodies, waste from uneaten food, waste from dead plant matter. All of it breaks down into ammonia.

Ammonia is toxic. Even small amounts damage the gills, making it harder for fish to breathe. Higher amounts can cause real harm surprisingly quickly. And the worst part is that you cannot see ammonia. The water can look completely clear and still be full of it.

This is why clear water is not the same as safe water. The only way to know what is really in the water is to test it — or to make sure the biological system that removes ammonia is working properly.

Active carbon is one useful tool. It is a very porous material that sits in the filter and polishes the water — absorbing impurities and making the water clearer and cleaner. Think of it as a very thorough sponge with excellent opinions about water quality.

⚠ Clear water is NOT the same as clean water. When fish seem unwell, the first question is always: what are the water conditions?

Yechiel's Rule: When something seems wrong with the fish, always check the water first.