Troubleshooting

Cloudy Water

1. **Poor water circulation** – Make sure filter is clean and in good repair. Make sure filter is run 24 hrs/day until water clears.
2. **Swimmer wastes** – Swimmer wastes can build up and cause water to become cloudy and lose its sparkle. Pool water should be superchlorinated to burn out wastes.
3. **High pH** – Adjust your pH to between 7.4 - 7.6 and maintain it in this range.
4. **Alkalinity may be too high** – Alkalinity of your pool water should be maintained between 80-200 ppm.
5. **Total dissolved solids (TDS) may be too high** – Have a pool dealer test your water for total dissolved solids. Dilution or reverse osmosis treatment will lower the TDS.
6. **Algae** – There are several kinds of algae. Multiplying algae called "blooms" can cause water to become cloudy

Colored Water

Healthy pool water is a clear, crisp blue.

1. **Green water** – Can be caused by algae, poor filtration, improper pH, copper or small amounts of iron. Test for pH and make necessary adjustments, or use algaecides (including chlorine) to control algae.
2. **Reddish-brown, purple or gray water** – Manganese and larger amounts of iron will tint water reddish-brown, purple and gray. For all metal deposits in water use a sequestering agent and check your water balance.

Algae

By the time you can see algae in your pool you already have about 30 million organisms per ounce of pool water. The first line of defense is maintaining consistent free chlorine residual (.8 to 5.0 ppm) to prevent algae growth.

1. **Green Algae** – Use an algaecide especially formulated for killing green algae.
2. **Mustard Algae** – This algae is resistant to chlorine. Use a specially formulated algaecide for treating mustard algae.
3. **Black Algae** – Black algae clings to walls and sends its roots into the cracks in the plaster finish, and is extremely difficult to remove. Use an algaecide formulated for black algae.

Environmental Health Services

Multnomah County Health Department

Public Health
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Stains

Stains can be caused naturally by minerals or metals in the water supply, or by leaves and metal objects in contact with the pool sides or bottom.

Brown, blue or black stains – can be caused by metals such as iron, copper, or manganese. Stain-causing metals can enter the pool from the erosion of metal components in the recirculation system due to low pH or total alkalinity, from the improper use of algaecides that contain copper, or from metals that are naturally in the water.

Metals present in water – Adding a chemical (such as chlorine) can cause the metal to fall out of solution and onto the sides and bottom of the pool, causing a stain. If the stain is recent, a commercial stain-removing agent added to the water may remove it. In areas of water with high metal content it may be necessary to routinely add a sequestering agent. Stubborn stains may need to be treated by draining the pool and acid washing the stain. In areas of high water tables consult your pool company before attempting this procedure to prevent pool from "popping" out of the ground.

Scale

Off white, gray or brown scale – This is normally caused by high calcium hardness, usually combined with high pH and high total alkalinity. Lower pH and total alkalinity by adding acid to the pool water.

Don't forget; if you see scale on the pool walls, you probably have scale in your heater and pipes.

Eye/Skin Irritation, Chlorine Odor

1. **pH too low or high** – Test your water and adjust.
2. **Irritation or odor persists** – Swimmer wastes may have accumulated to a very high level. Superchlorinate to burn out accumulated wastes.

No Chlorine Reading

1. **Chlorinator not operating properly** – Check chlorinator.
2. **Initial chlorine demand** – This needs to be satisfied. Add more chlorine and re-test.
3. **High chlorine content** – Chlorine is so high that it bleaches out your DPD test kit reagents. Dilute pool water with tap water and try again. (Note: if bleaching occurs, you will see a red color for a moment after adding the DPD liquid or poweder, and around the tablets).
4. **Test kit reagents may be old** – Replace test kit reagents at the start of every year.

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