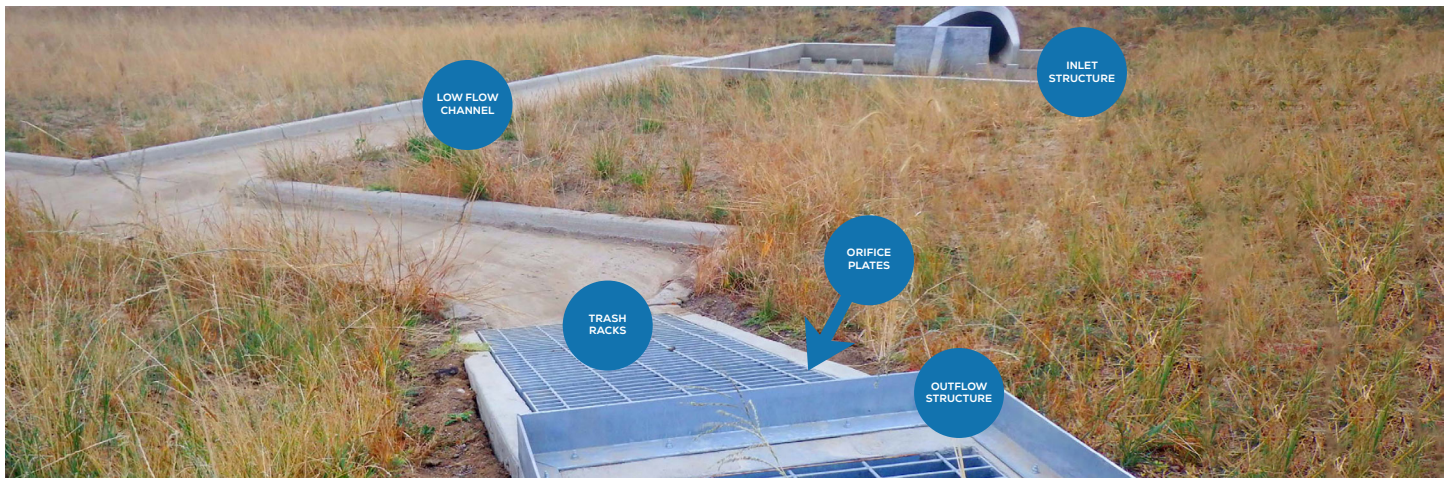


PRIVATE STORMWATER PONDS

Stormwater ponds are located throughout the city, and if you have one on your property, it's your job to ensure it operates properly. There are local, state and federal regulations concerning detention ponds, but we are here to help you learn how to keep your detention pond functioning as it should.



WHAT IS A STORMWATER POND?

Stormwater ponds are designed to capture water during storms and to hold it temporarily before releasing it. Some stormwater ponds are lined with clay or plastic and are designed to always hold water. Other stormwater ponds are designed to simply slow the flow of stormwater by capturing it for a short time and then releasing it.

STORMWATER PONDS DO TWO IMPORTANT THINGS:

1. Stormwater tends to move very fast. Stormwater ponds slow that flow to help prevent flooding.
2. Stormwater eventually flows directly into rivers and streams, and as it moves, it picks up trash, sediment and other pollutants. Stormwater ponds help trap that trash, sediment and debris so it stays out of the rivers and streams.

Neglected ponds can become very pricey to rehabilitate, so it's best to regularly inspect and maintain them. It's not complicated, but it does require some planning.

PREVENTING POLLUTION

City ordinances require those responsible for ponds to do all they can to prevent pollutants from entering the pond.

To get started, it's helpful to know the various components of a stormwater pond:



Inlet structure: This is where water enters the pond.



Low flow channel: These are at the bottom of the pond and are usually made of concrete. They help to channel smaller amounts of water through the pond and help prevent erosion.



Outflow structure: This is where the water leaves the pond.



Orifice plates: These are located on the pond side of the outlet structure. They help control the flow of water through the outlet structure.



Trash racks: These are designed to trap trash and prevent pollutants from entering the stormwater system.

MAINTAINING A STORMWATER POND

You are responsible for the maintenance of the pond on your property. Here are a few helpful tips that will help you to do that:

CHECK FOR ALGAE

Algae can affect water quality but can also be difficult to control if there is standing water in the area. Make sure the trash rack isn't blocked, and check for ruts at the bottom of the pond that allow water to pool.

DEBRIS/TRASH REMOVAL

Check for trash routinely, especially after big storms. Trash tends to get stuck in the inlet and outlet structures, and on the trash rack.

EROSION REPAIR

Over time, and as storm water flows, it tends to create ruts and gullies in the pond that affects flow. If you notice this, simply fill the ruts with new, clean soil and replant anything that washed away.

MONITOR FLOW

Check occasionally to ensure water is flowing from the pond properly. If you are having flow issues, do not remove the orifice or trash rack. They are designed to regulate water flows and need to remain in place.

MOSQUITO TREATMENT

Mosquitoes are primarily an issue in the summer, but they do love standing water, so keep a close eye on it. You can minimize the issue by making sure trash and sediment are not impeding flows.

REVEGETATION

When your pond was designed, certain plantings around it were required that help to regulate the stormwater flow rate. Ensure the plants designed for your pond are healthy, and if they aren't, replace them. In many cases, this just requires putting down new sod or sprinkling grass seed.

SEDIMENT REMOVAL

Sediment can block water flow. Most sediment buildup occurs when dirt is washed into the pond. If you stay on top of it, sediment can be easily removed with a shovel. If you wait too long, and buildup occurs, it can require expensive equipment to remove. Sediment needs to be disposed of at a landfill because it often has pollutants that you do not want near the pond.

STRUCTURAL REPAIR

Over time, the orifice plates and trash racks can crack or break, or the concrete structures can start to crack. Industrial supply companies or metal fabricators typically can repair or replace them.

VEGETATION REMOVAL

Some vegetation is good for ponds, but too much will stop the water from flowing. Remove any trees, shrubs or other vegetation that is blocking the flow. If you notice reeds growing, it could be an indication that your pond is not flowing properly. The more often you check your pond for new growth, the easier it is to remove.

WEED CONTROL

You can keep an eye on this when you mow. If weeds are getting out of hand, you can either hand pull them or use a shovel and dig them out.

For more information, visit AuroraGov.org/StormwaterPonds or email Environmental Services at envservices@auroragov.org.