Irrigation System Maintenance

Irrigation systems are designed to automate irrigation and make watering landscapes effortless. However, irrigation systems are a combination of moving and static parts that must be regularly maintained and repaired.

This section is dedicated to how an irrigation system should function and the maintenance required to keep the system viable while avoiding large upgrade costs due to deferred maintenance. Should you have additional questions, feel free to contact Water Conservation Staff at 543-3985.

ANNUAL SPRING IRRIGATION SYSTEM CHECK

1. Flush the irrigation system
2. Inspect irrigation equipment and repair as needed
3. Adjust sprinklers for head-to-head coverage
4. Check for leaks and repair as needed
5. Examine the automatic irrigation timer

1. How do I flush the system?

    - Turn the system off.
    - Remove individual spray nozzles from sprinklers at the end of each line and/or remove the end caps from drip lines.
    - Turn the system on for a few minutes until a clean, solid stream of water flows from each sprinkler head and/or the end of the drip line.
    - Turn the system off.
    - Carefully check the nozzles and thoroughly rinse screens or filters for drip lines.
    - Reassemble the system.
    - Turn the system on and check for proper operation.

2. What do I look for when I inspect my irrigation equipment?

    - Broken sprinkler heads
    - Leaning sprinkler heads
    - Overspray (water hitting pavement or other unintended areas)
    - Rotors not rotating
    - Misting around spray heads (indicates the pressure is too high)
    - Uneven coverage - water thrown from each sprinkler head should reach the adjacent sprinkler head(s)
    - Spray patterns blocked by plant material
    - Clogged nozzles or drip emitters

- Leaking drip lines, separated drip lines, and missing emitters

3. How do I adjust sprinklers for head-to-head coverage?

    - Adjust the sprinklers as much as possible so that water from each sprinkler head reaches the adjacent sprinkler head(s). Adjusting for head-to-head coverage should be done at the start of the irrigation season every spring and as needed throughout the irrigation season.
    - While adjusting sprinklers for head-to-head coverage, check the hardware for compatibility:
        - Sprinkler heads on the same irrigation valve should be the same brand and model.
        - Sprinkler heads patterns should match the areas where they are installed.

4. How do I check for leaks?

    Underground irrigation equipment

    - Observe each irrigation valve in operation.
    - Look for excessively wet areas, unusual mounding in turf areas, or water flowing or seeping from turf/sidewalk edges.
    - Watch your water meter while a station is running and determine if the gallons per minute being used is correct given the amount and type of spray heads or drip emitters for that station.
    - You may need a professional to locate a leak prior to digging and repairing the leak.

    Above ground irrigation equipment

    - On drip or micro-spray systems, remove any mulch or surface debris so you can clearly see piping and emitters.
    - Observe each valve circuit in operation.
    - Look for any unwanted bubbling or spraying, missing or broken drip emitters, separations at pipe fittings for drip lines, or broken sprinklers.
    - Make sure all drip emitters are working.

5. What do I look for when I examine the automatic timer?

    - Turn on the timer manually.
    - Check to see that each valve activates (turns on) and runs for the scheduled amount of time.
    - Review the irrigation schedule to see if it is appropriate for each area.
    - Replace the battery.

MONTHLY SYSTEM INSPECTIONS

- Observe each valve circuit in operation:
    - Is sprinkler coverage even? Check to see if water from each sprinkler head reaches the adjacent sprinkler head(s).
    - Do plants block the spray patterns? Turf grass, tree branches, and shrub limbs can grow in the path of your sprinkler spray patterns.
    - Are the sprinklers leaning or broken? Sprinkler heads need to be straight to irrigate efficiently.
    - Are there any leaks? Don’t forget to check your hoses also.
    - Do drip lines appear to be intact? Drip lines can separate, and it may be worth it to walk the lines periodically.
    - Is water being applied to sidewalks? Over time, water can damage cement and asphalt surfaces.