

## **Leak Detection**

**By Scott Finke, Circuit Rider**

Do you need a leak detection survey done? Most villages or cities that have had them done have most likely learned a lot about their system and the amount of water that is being wasted. If your system is losing 30%, 40%, 50% or more gallons of water you probably should have a leak detection survey done. This is possible if you have water meters. Let's say if your water loss is 15 gallons per minute, you could have 15 curb stops that are leaking 1 gallon per minute. Someone from NeRWA would come out, listen to all of your curb stops, try and find your leaks and figure out how to help you.

Over the past year and a half, I have been going to villages and doing leak detections while listening to fire hydrants and water main valves. I have found some fire hydrants that leak a lot of water. If you have ever wondered how much water a fire hydrant can lose, just take this next analogy into consideration. Fire hydrants leak 24/7 for 365 days a year, so if a fire hydrant leaks 1 gallon per minute that comes out to 1,440 gallons per day. Over the course of a year that is 525,600 gallons and if your system has 5 hydrants that are leaking, your system will be losing around 2,628,000 gallons of water. Hydrant flushing is a good way to get rid of the rust particles that can stick to the rubber gasket at the bottom of your fire hydrant. If flushing doesn't solve the problem then you will have to tear the fire hydrant apart and have the gasket replaced at the bottom of the hydrant. That is why in the winter time you will see icicles hanging down from the outlets. It is because the drain holes are plugged and your hydrant is leaking. Most of the time, you will not know your fire hydrants are leaking because they will leak out of the drain holes.

Water loss is a big deal. Water is what makes up 70% of the earth's surface, yet only 0.3% of that 70% is consumable by humans. Keeping that water from being wasted is a very important task to stay updated on. Over years the gallons add up very quickly. Even if you don't have water meters, you could still be losing water that you don't know about, so it is still a good idea to have a leak detection survey done.

If you would like to have a leak detection survey done, let NeRWA know and we will get you on the list.