Wilcox Park Holding Bed

A large property like Wilcox Park needs a work area and the Park staff have been using the space behind the barn. When the large parking lot behind Miceli's was created in the 1960s, the stormwater runoff from the parking lot flowed down the concrete walkway into the pond. Ten years ago, a trench drain was added, diverting water into a pipe discharging above ground into the area behind the barn. Later, a cistern was added by the sidewalk. With increasing spring rainfall, the area was often muddy and unusable.

The Strategic Plan for the Park recognized the changing climate and included a goal to develop a proactive plan to protect the building and other structures. This would be accomplished with a holding area that would protect the barn and greenhouse from flooding, improve stormwater retention to allow the runoff to filter into the aquifer, and create a large year-round work area.

To create the new holding area, first the vines, trees and stumps along the stone wall were taken out, exposing more of the original wall that surrounds the Park. Next, a foot or more of loam was removed, a total of 50 cubic yards. The area was excavated 4 feet down, to a gravelly subsoil, and the whole area refilled with 50 yards of gravel.

The parking lot storm water collected at the trench drain now flows into a catch basin which allows the surface debris to settle out and holds water temporarily to filter pollutants down through gravel. A cobblestone apron was added at the top to direct water that was not directed to the trench drain. Old sections of granite from the original high school foundation were used as a retaining wall and border the area, creating a safe, flat surface. An exit pipe brings water to a system of interconnected dry wells sitting in crushed stone, in effect a reservoir, capable of holding 6000 gallons of water. This system is surrounded by filter fabric and gravel on all sides. The subsoil underneath allows the storm water to quickly drain into the aquifer.

The area above the system was graded away from the barn and a second catch basin installed above the drywells to capture any surface water from the small watershed around the barn. Finishing touches included a crushed stone drive so the Park staff can now more efficiently loop around in one direction to load up plants, drop off leaves, and haul out compost.

Lastly, the concrete retaining wall along the parking lot side was cleaned and painted and the original stone wall on the north side was repointed and cleaned. A new fence, part of a private donation of all new Park fencing, was added in front of and above the stone wall. A "heeling bed" was created against the stone wall where large shrubs and trees can be set into soil for multi-year growth using a "pot in pot" system. Raised beds were built by the staff using pressure treated lumber lined with landscape fabric and filled and mulched with compost and leaves. The raised beds hold divisions of Park plants, extra plants, and Park plants that have been sown from seed.

All the engineering work and labor was done in-house by the multi-talented Park staff. The "heavy lifting" was done using an excavator loaned to the Park, and by a local landscape company that donated trucking services, hauled away all the loam, and delivered all the gravel, with the Association only paying for the gravel.

The new holding area has twice the space of the original. Compost and planting mix is accessible year 'round. There is room for some equipment and raw materials, freeing up some space in the barn. All stormwater runoff is filtered by the system prior to flowing into the aquifer.

Next time you are in the Park, walk up the concrete path along the barn and take a look at this very practical and impressive showpiece that highlights the behind-the-scenes work of our Park staff.

By Sandi Carmichael, Park Committee member and Master Gardener