

Pothole Patching Solutions in Millersville

When I came to Millersville as the director of public works/parks in the spring of 2001, new challenges awaited me. My crew size was reduced to about one-third of my Jonesborough crew, but we were serving approximately 2000 more people. Millersville was also experiencing rapid development, with one or two miles of sewer line extensions going in every year, and developments popping up all around.

We have a seven-man crew serving a rapidly growing population of approximately 5400. We maintain all roads, sewers, drainage structures, parks, and city buildings. Our 2000-plus sewer customers result in an average of around 30 to 60 sewer calls per month. With such a small sewer line extension crew, everyone counts. Traffic control personnel can almost wipe out the entire crew, leaving only one or two for actually performing the work. With all the development in our city, the roads without potholes look like someone was playing connect the dots, with utility cuts going up and down and back and forth along our roads.

I was looking for a pot hole patching cold mix that would work for a small public works crew with the bare essentials of a dump truck, plate compactor, asphalt rake, and shovels. The cold mix we were using was generally lasting as long as the next rain or sometimes less. My crews were constantly running back month after month to rework the same potholes. Using that cold mix in the winter wasn't even a consideration due to its lack of workability, and the hot mix plants were usually closed. When patching with hot mix, I usually had to purchase four tons at a time, which turned too cold to work after about two tons. If I only bought two tons of hot mix it would turn cold faster than four tons and would usually be too cold to work after the 45-minute trip back from the plant.


The first time I met Eric Hale with Tennessee Asphalt, I thought I could really make him eat his words with his claims that EZ Street® Cold Asphalt would work under water, in the cold, in high traffic areas, and that it would be a permanent fix. I took him to a high traffic intersection next to a major housing development and had him patch a hole that was always under three inches of water due to poor drainage. Surprisingly it worked.

I began using their product throughout the city, and discovered that we did not have to return to the same potholes, so I was only patching them once. I did the math. If it cost 10 dollars to patch a pothole one time, and I had to patch it 12 times a year, then 20 or 30 dollars to patch it once a year would save me both labor time and material costs.

Using this product we are able to do a better utility cut and do it faster. We can cut a road, pack the sub grade, and apply EZ Street and not have to worry about it coming out of the hole. If settlement occurs, I can add a little more cold mix to the utility cut. I also don't have to send someone to the plant and worry about a hot mix freezing. In addition I always get the same quality of mix. Often an asphalt plant will not be running topping the day we need it, or the mix is not the quality we need, but it would be impossible for a large plant to cater to a three-to-six ton need every few weeks.

However, I did discover that EZ Street has to be used in the roadway. I tried patching asphalt curves, and it did not work. The benefit of the product is also the weakness. The product likes traffic, the more the better, but it should not be used on curves where there is not constant vehicle traffic. Edge cracking and potholes have had some success as long as the cold mix is compacted from the outside of the road in. Otherwise it will not compact enough to hold.

Potholes can result in lawsuits, and all municipalities need to respond quickly to potholes. I can buy a six-month supply of EZ Street because it will last even when it is left out in the open. This allows me to patch a pothole within a short time of knowing about it, due to having it on hand and already in my work trucks.

In summary EZ Street® Cold Asphalt allows a small public works department to produce a quality patch and to provide a quality patching and asphalt maintenance system equal to a large public works department with better equipment. It can also provide a larger utility district greater flexibility in performing patches in the field with a small crew. 



Richard Rollins, Millersville Public Works, uses a plate compactor to pack the subgrade before applying cold patch.



Jerry Schrader, Street Foreman, (left), and Richard Rollins apply EZ Street and pack the hole again with the plate compactor.



The EZ Street® Cold Asphalt on McMurtry Road in Millersville was completed over six months ago and has had no additional repairs. Thirty percent of the 1200 vehicles that use this road daily are commercial vehicles.