



Full Depth Reclamation with Injected Asphalt Stabilization

Summer 2013

Customer / Road:

Town of Hollis, NH - Farley Road

Road History & Condition:

Farley Road is a secondary town road approximately 6,000 linear feet in length. The road was constructed 70 years ago, remained a gravel road until 1970, and since was treated with several surface treatments and HMA overlays. As developments were constructed off the road, traffic increased and severe pavement failures resulted. AADT is currently approximately 1500 with 5% being heavy trucks.

Scope of Work:

The existing pavement & underlying gravel was sampled and tested to determine the best stabilization option and mix design recommendations. Reclamation of the existing pavement plus some underlying gravel (8-10" total) was followed by a second pass of reclamation (4") with injection of SS-1 emulsion at a rate of 1 gal/sy. The surface was graded and compacted after each pass and left to cure for 5 days before the final HMA structure was placed.

Treatment Selection & Benefits:

The road was one of 6 remaining roads in town to be refurbished per the master road plan. Another HMA overlay was not an alternative due to the poor base. Based on the analysis of existing pavement and gravel, emulsion stabilization was recommended to best bind the existing materials. FDR with injected asphalt stabilization significantly strengthened the base and provided additional wet weather moisture resistance. This process provided a cost-effective alternative to full box reconstruction or building up the base with new gravel, and adjusting 35 resident driveways.

