METROMARK COPOLYMER TRAFFIC STRIPING PAINT

REFERENCE:

Work Plan 95-R-10, Update 95-15

HISTORY:

MetroMark is a multi-component copolymer system, catalyzed by a 2% component of methyl ethyl ketone peroxyde (MEKP) and comprised of polyester, epoxy and thermoplastic. Among the manufacturer’s claims for the product are no need for special application equipment or solvent and a fast no-track time. The reported properties of MetroMark suggested that it would be a viable option in our pavement marking maintenance program. An evaluation of the material was started during the 1995 construction season. Installation and initial observation details were documented in Research Update U95-15.

PROJECT LOCATIONS:

On I91 from MM41.7 to 46.7 in both the northbound and southbound lanes, and VT155 in Mount Holly from MM 0.50 to 1.00.

OBSERVATIONS:

The I91 section was inspected for durability on July 11, 1996. Overall, the material had appeared to survive the winter of 1995-96 in good condition. Unfortunately, it was discovered during a subsequent inspection on September 11, 1996, that the white edge line had deteriorated to a point where it was deemed necessary to repaint the entire section from MM 46.7 to 41.7. The white skip and yellow edge lines have remained functional and visible.
Retroreflectivity results indicate that the lines are performing well. In July 1996 the white skip and yellow edge lines on both I91 and VT155 were sampled using a Mirolux 12. The yellow edge lines averaged 160 millicandellas (mcdl) with the white edge line averaging 152 mcdl. In September the white skip lines on I91 were again tested, this time using a mobile laser retroreflectometer. The average of these measurements was 119 mcdl.

METROMARK YELLOW CENTER LINES, VT155

FOLLOWUP:

The material will continue to be evaluated to determine its life cycle costs. In addition to this project another project with MetroMark pavement markings was started on VT14 in Barre, East Montpelier, Calais and Woodbury in September, 1996. This will be evaluated separately from this project.