

Limerock, Shell Rock and Coquina Base Materials

Web Interim Report

County:
St. Lucie

Section/Subsection:
94030-000

FIN:
415298-1-52-01

State Road:
70

Last Updated:
November 2014

Project Description

County	St. Lucie
FIN	415298-1-52-01
Section Number	94030-3506
State Road	70

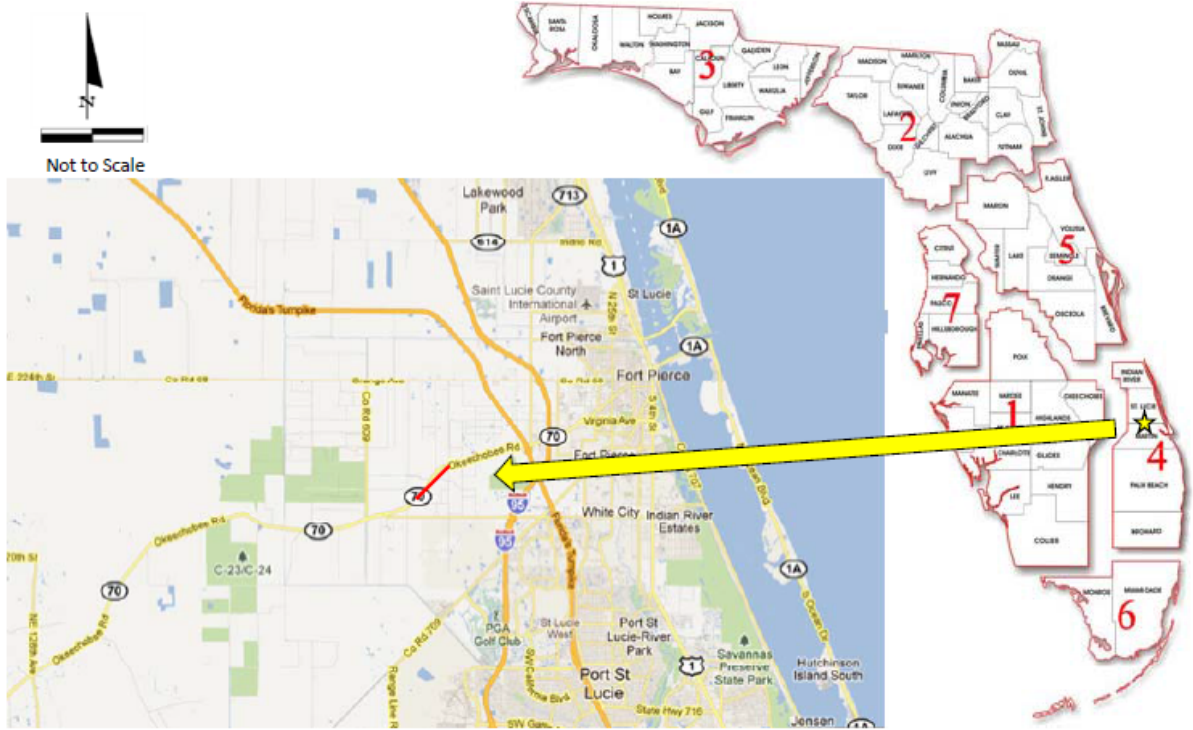
OBJECTIVE:

The objective of this study is to evaluate the long-term field performance of Shell Rock, Cemented Coquina and Limerock as a base material. The project was constructed in 1996 on SR 70 in Saint Lucie County, and consists of three 1,500 ft test sections located in the westbound traffic lane. The project was resurfaced in 2009.

The Limerock section (Section 1) was produced by Rinker Materials (87-090) in Miami-Dade County. The Cemented Coquina section (Section 2) was produced by Florida Rock Industries (94-209) in St Lucie County. The Shell Rock section (Section 3) was produced by Palm Beach Aggregates (93-406) in Palm Beach County.

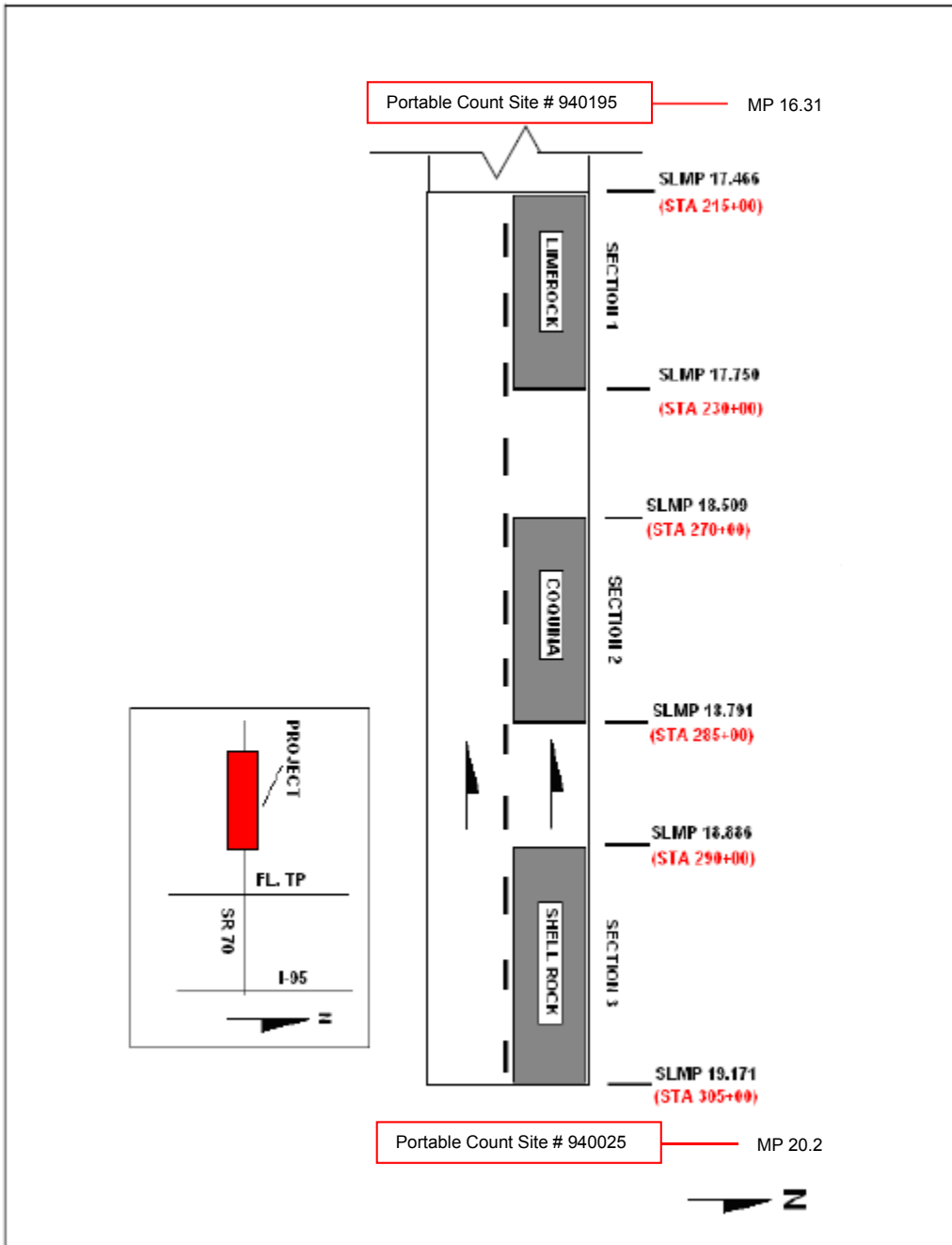
Performance is evaluated annually in terms of deflection, ride, rutting and cracking.

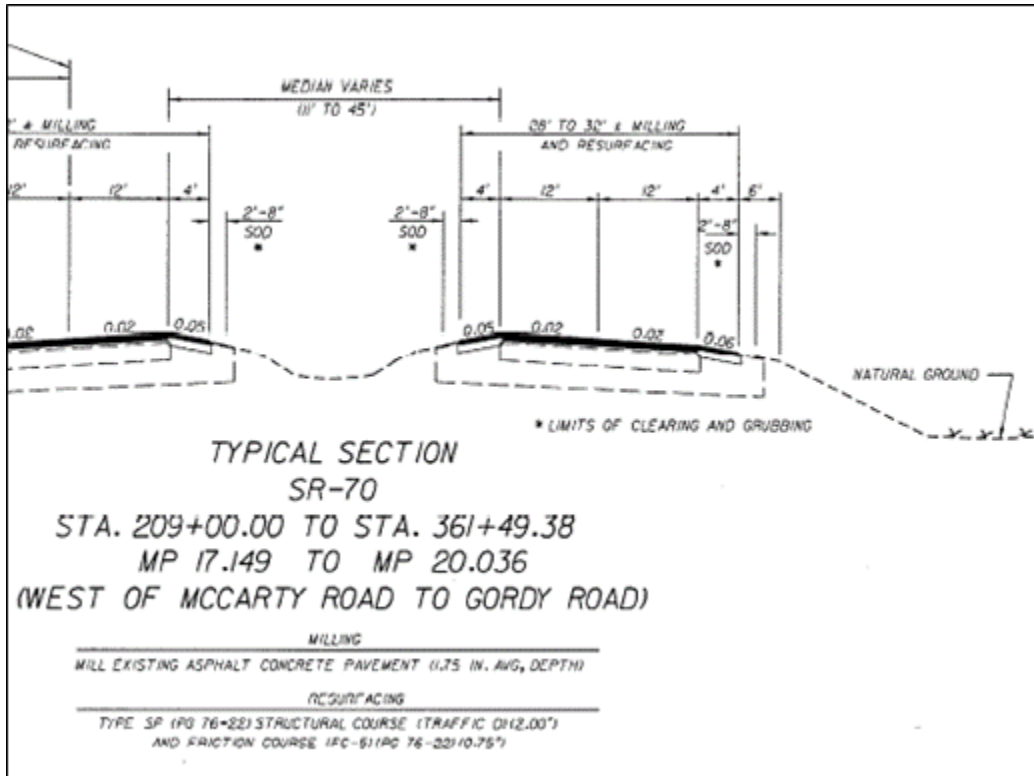
Project Location



St. Lucie County
SR 70
BMP 19.171
EMP 17.466

Project Site Layout





Section 1

0.80"FC -5
4.4"-SP 12.5
10.4"-Limerock
12"-Stabilized Subgrade

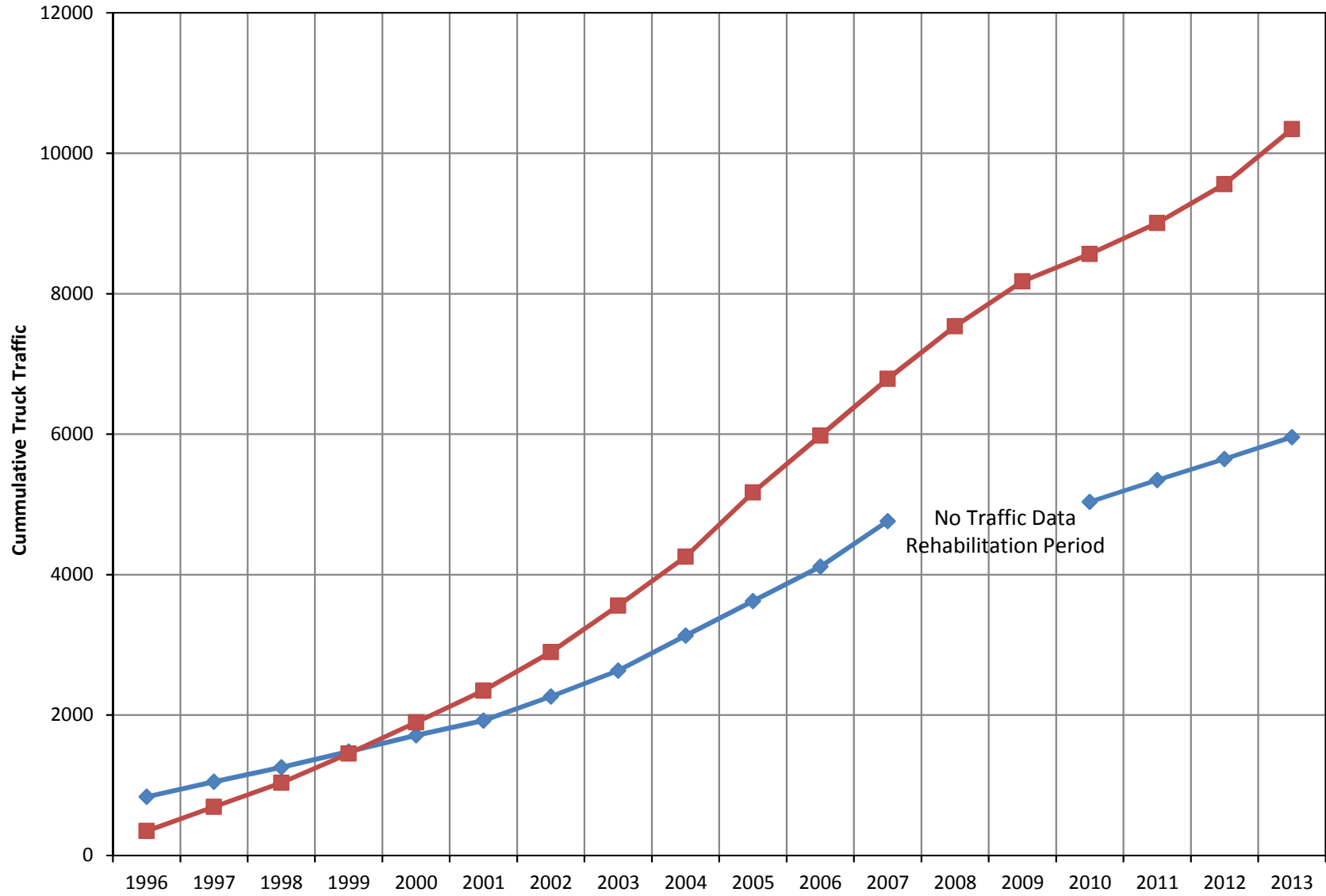
Section 2

0.80"FC -5
4.4"-SP 12.5
10.4"-Coquina Base
12"-Stabilized Subgrade

Section 3

0.80"FC -5
4.4"-SP 12.5
10.4"-Shell Rock Base
12"-Stabilized Subgrade

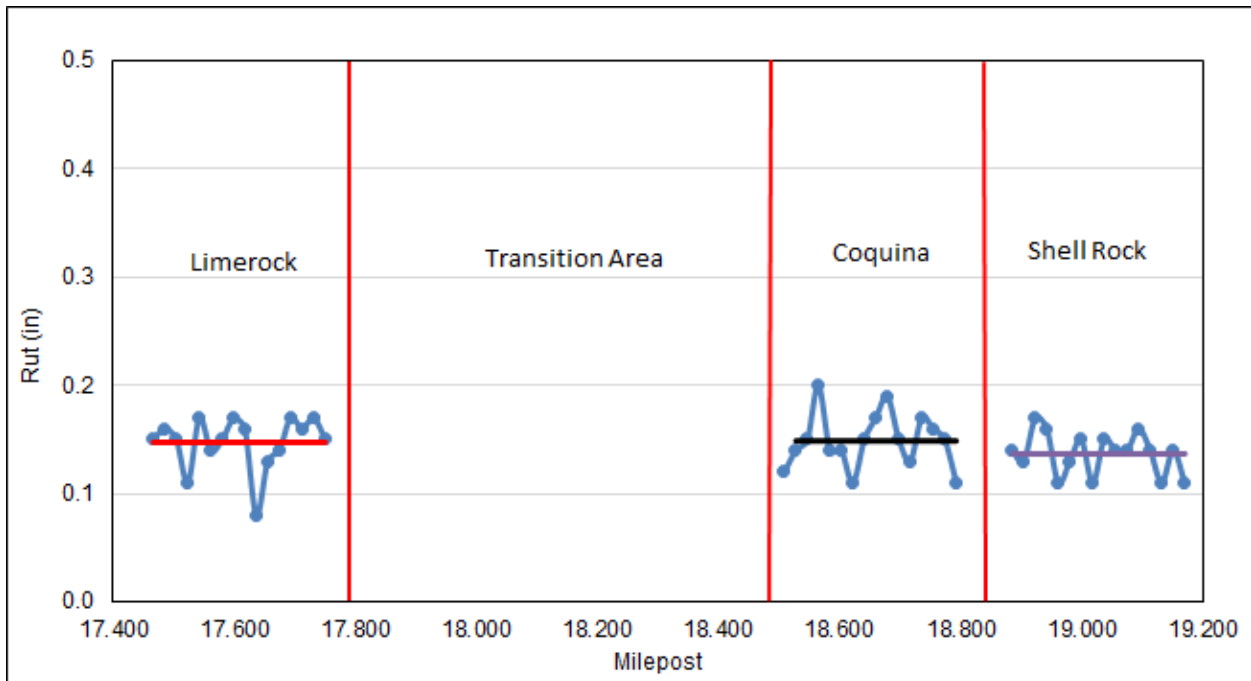
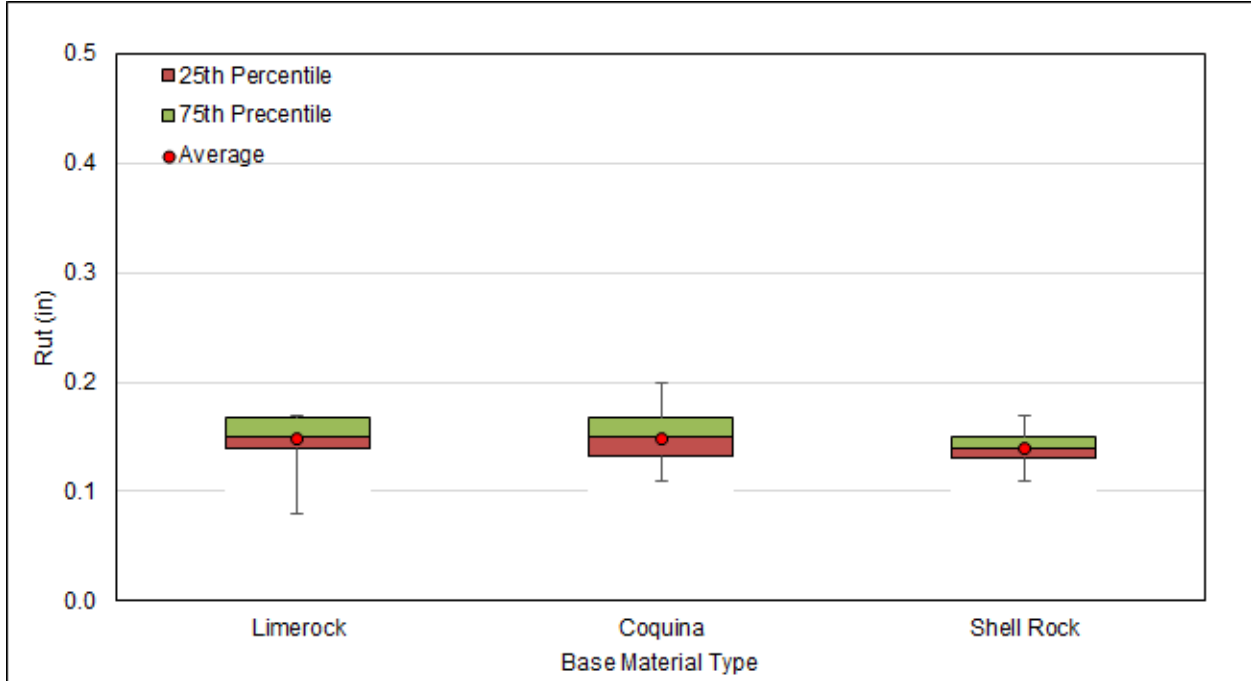
Traffic Count



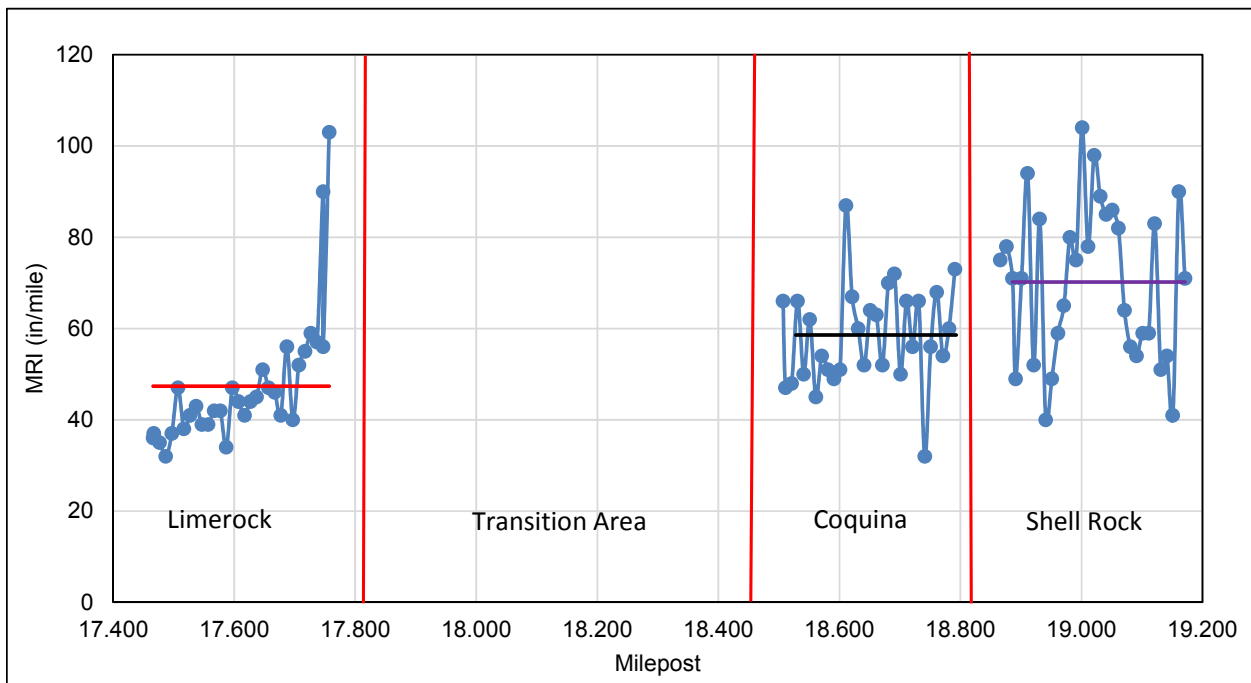
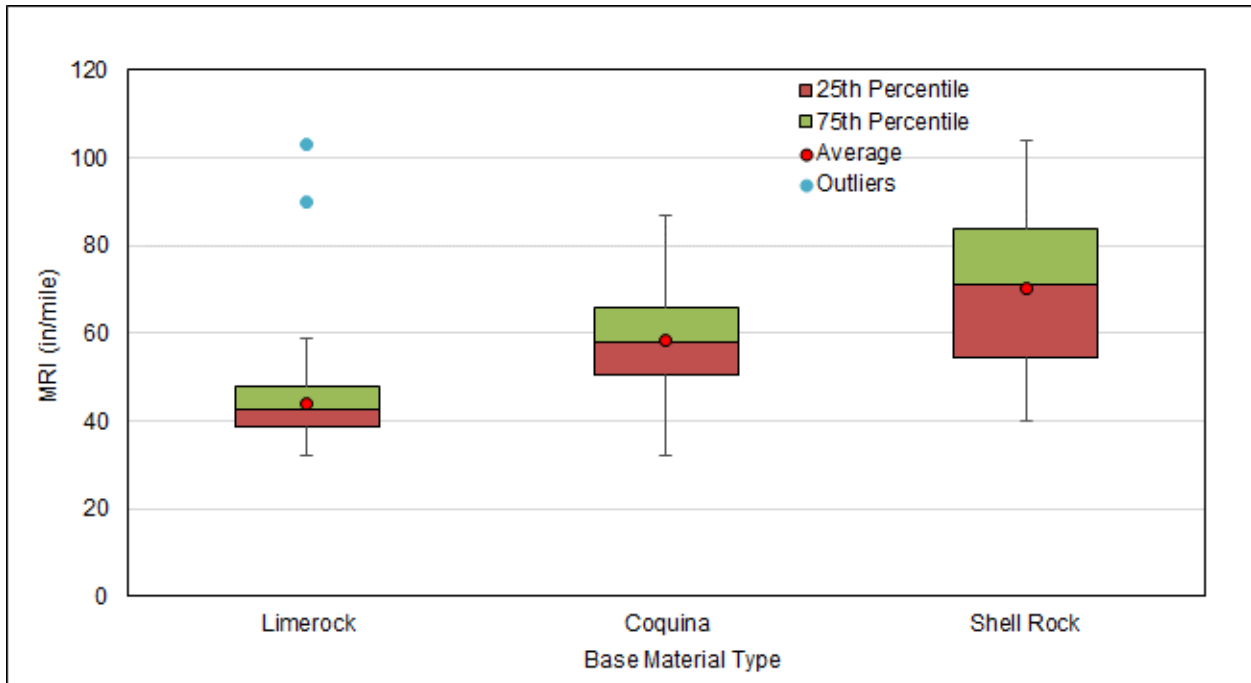
◆ Site # 940195 (MP 16.31) ■ Site #940025 (MP 20.2)

Cracking: No cracking was observed.

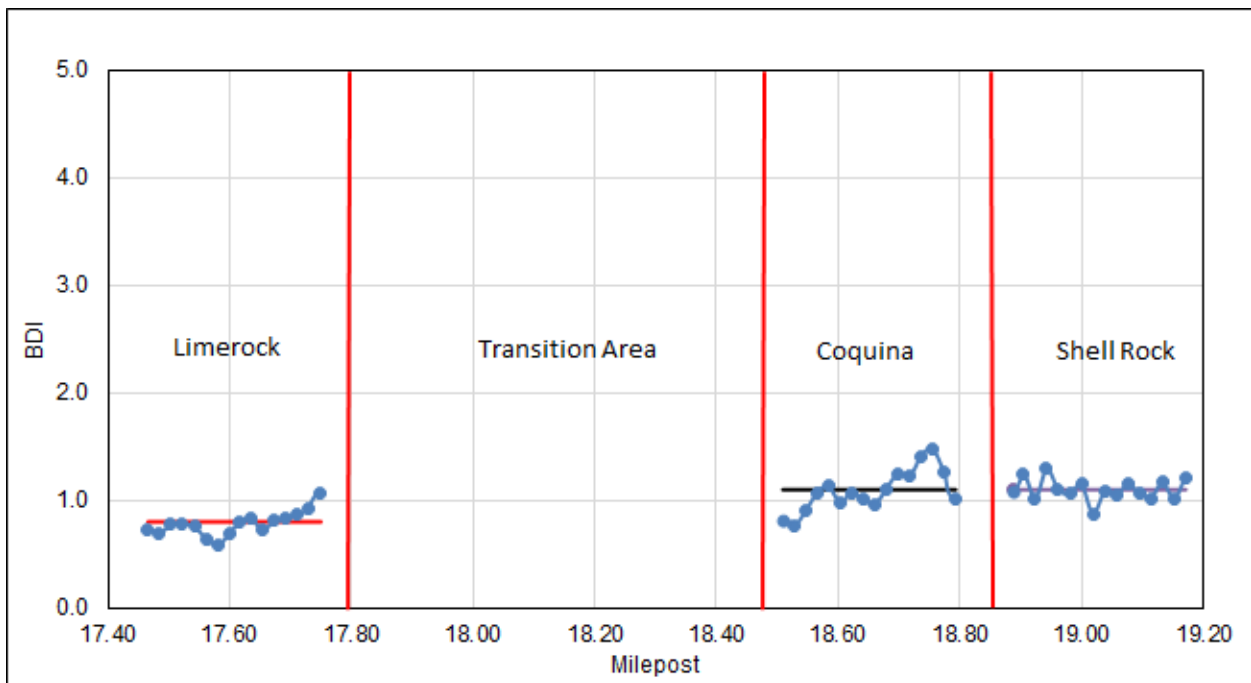
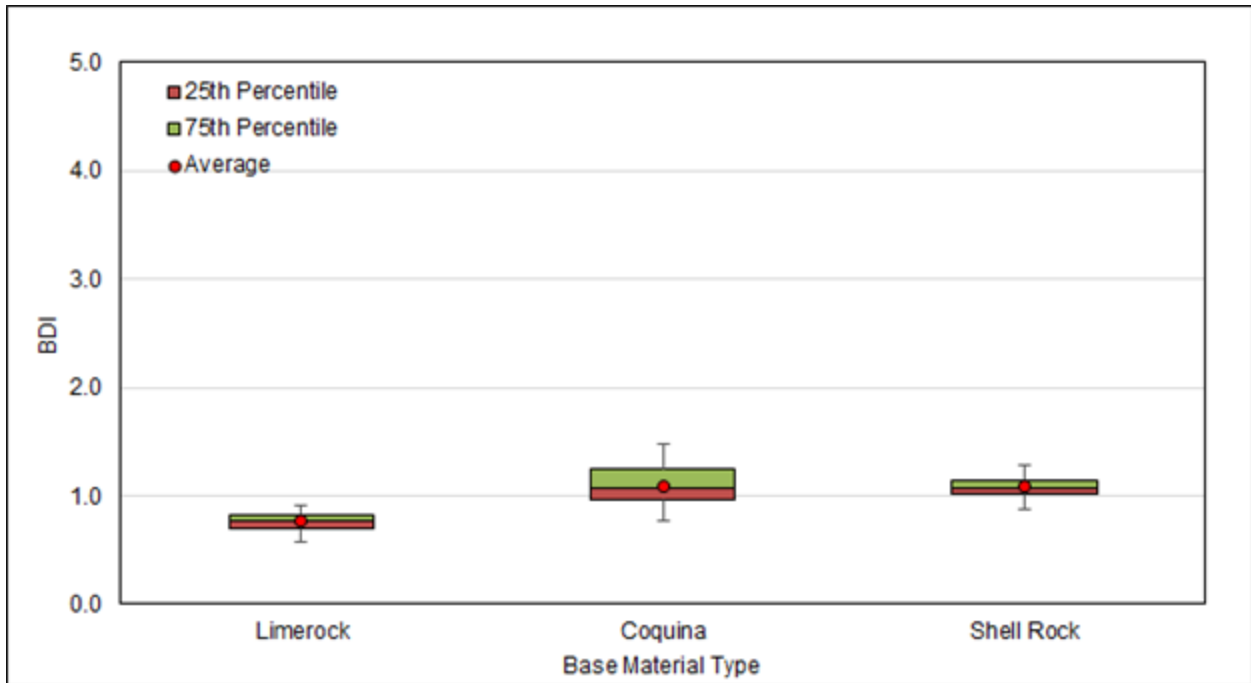
Rut



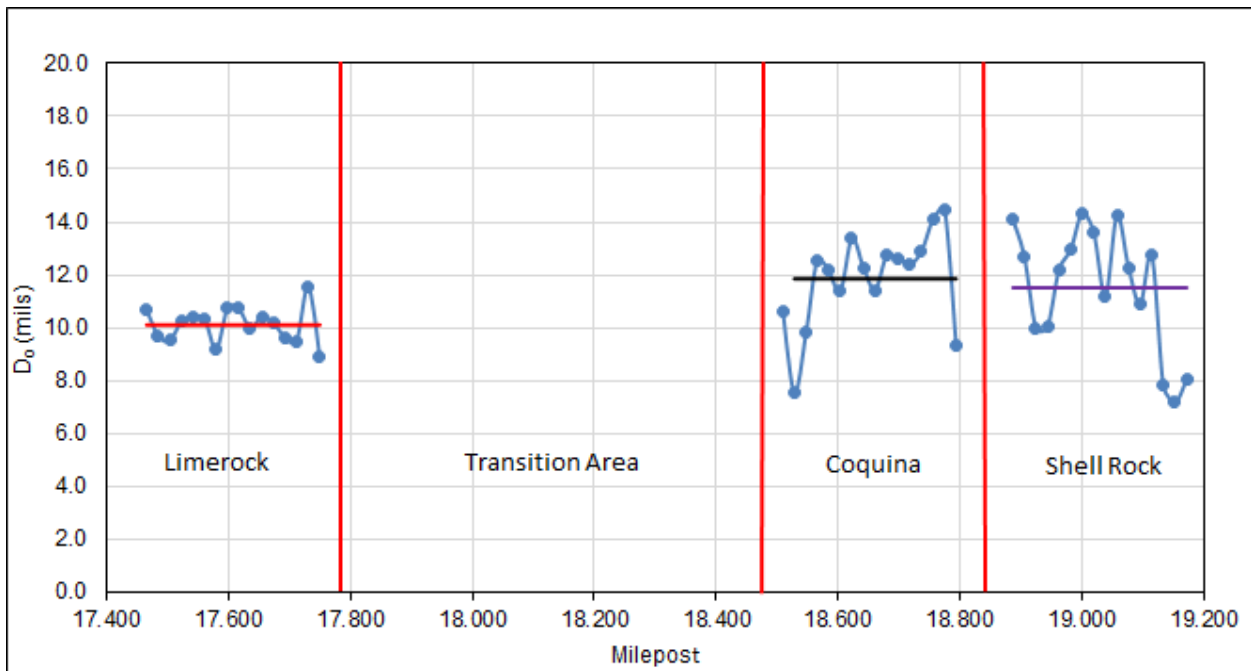
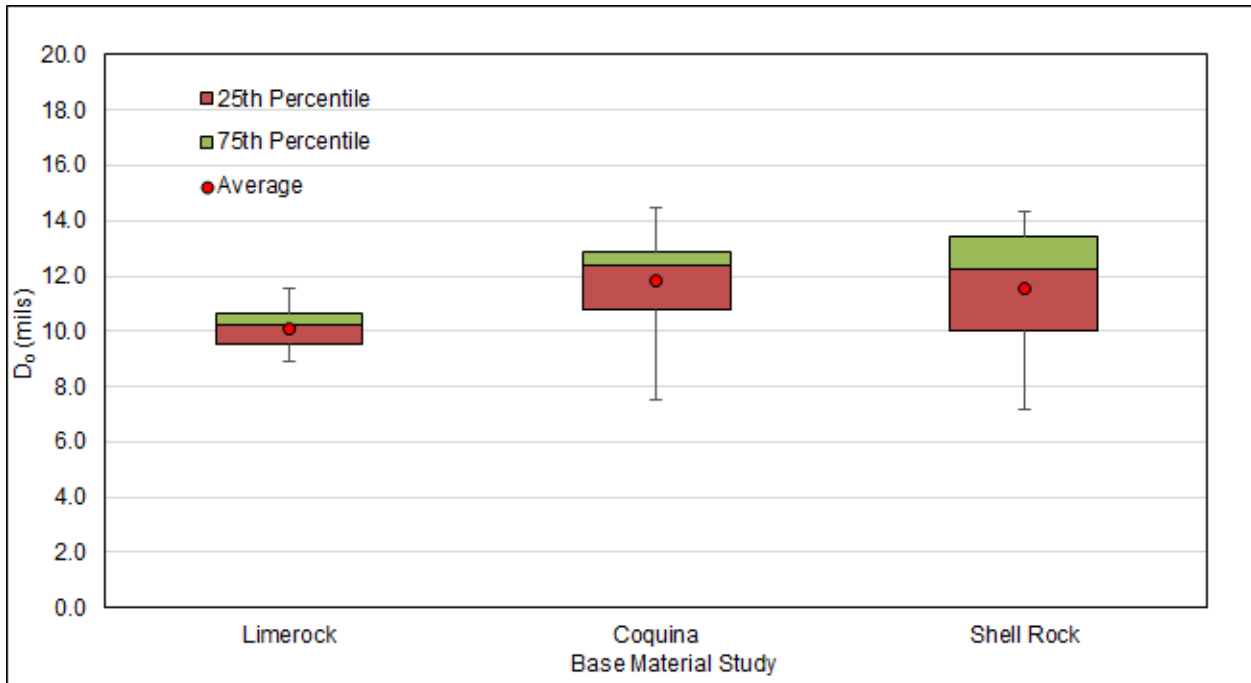
Ride



Base Damage Index - FWD (D₈-D₁₂)



Overall Pavement Response - FWD (D₀)



Embankment Response - FWD (D₆₀)

