OVERVIEW

1460 Signals
113 Systems
The Goal

Improve Safety and Efficiency
THE PROBLEM
THE PLAN

$4 Million in upgrades
CONNECTIVITY

Cellular Modems
CENTRAL SIGNAL SYSTEMS
WHERE ARE WE?

Communications:
53% signals
88% signals in systems

Retiming:
6 year average
CORRIDOR MANAGEMENT
CORRIDOR MANAGEMENT
**Signal Retiming Effort**

- 2 Years
- $1.5 Million
- 307 Signals
2014 Retiming Benefits

- **Benefit Cost Ratio**: 80:1
- **Emissions Savings**: 1/3 ton, $165,000
- **Delay Savings**: 14,000 hours, $30 million
- **Crash Reductions**: 95 crashes, $2.5 million
- **Fuel Savings**: 1 million gallons, $4 million