

PROJECT APPROACH

- Where are we now?
- Where do we need to go?
- What are the gaps?
- How do we get there?



EXISTING CONDITIONS

- Only one of 11 Districts has 24/7 capability
 - 83% of ITS field devices inefficiently used overnight and on weekends and holidays
 - 57% of ITS field devices ineffectively used during rush hours
- District based ITS Implementation
 - Large gaps in ITS field devices, especially in rural areas
- Unutilized existing sources of information
 Within PennDOT and from other sources



REQUIRED FUNCTIONS

- Amber Alert
- General Road Closure Information
- Maintenance and Construction Closures
- Weather Information
- Snow Plow Operations
- Traffic and Incident Management Capabilities
- Statewide/Interstate Corridor Management
- Data Gathering, Analysis and Distribution
- Traveler Information System
- Proactive Planning Activities
- Technology Testing, Evaluation and Training



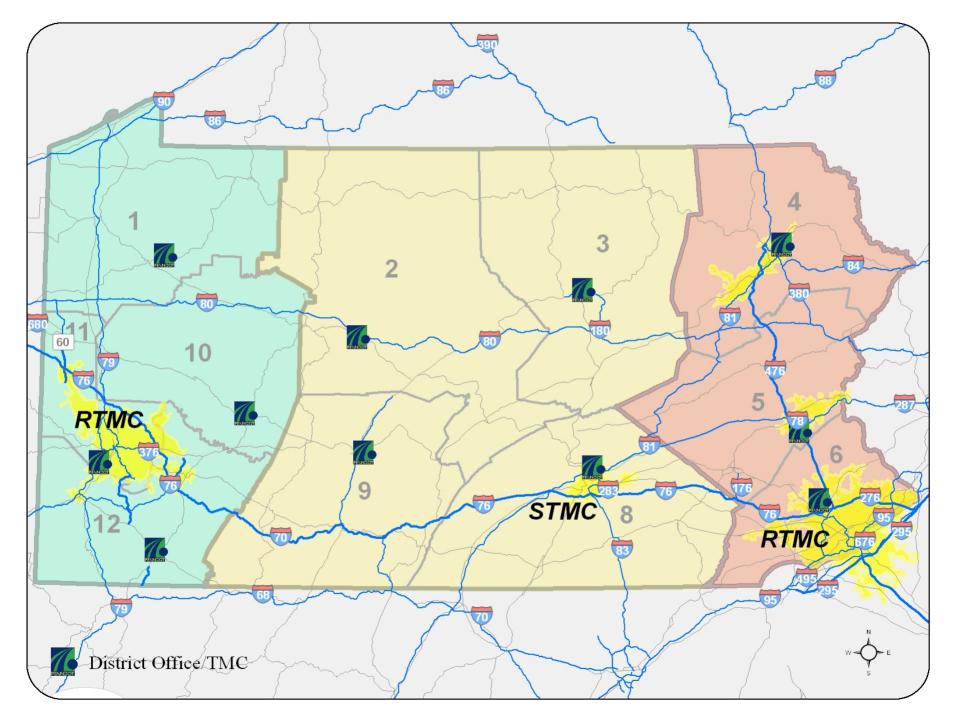
OPERATIONAL ENVIRONMENTS

- Existing
- Formal On-Call
- One STMC
- Two RTMCs
- Three RTMCs
- **....**
- Each District 24/7
- Combinations



FUNCTIONS

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PROPOSED OPERATIONAL ENVIRONMENT

- Two RTMCs and STMC
- Implement ATMS software in each District
- Deploy Information Exchange Portal



ITS DEVICE GAP DEPLOYMENT GOALS

- Rural Applications
 - Cover all Interstate to Interstate interchanges
 - Cover all Interstate to Interstate-like interchanges
 - Install additional weather stations
- Urban Applications
 - Full coverage for urban interstates
 - HAR "envelope"



RURAL ITS DEPLOYMENTS

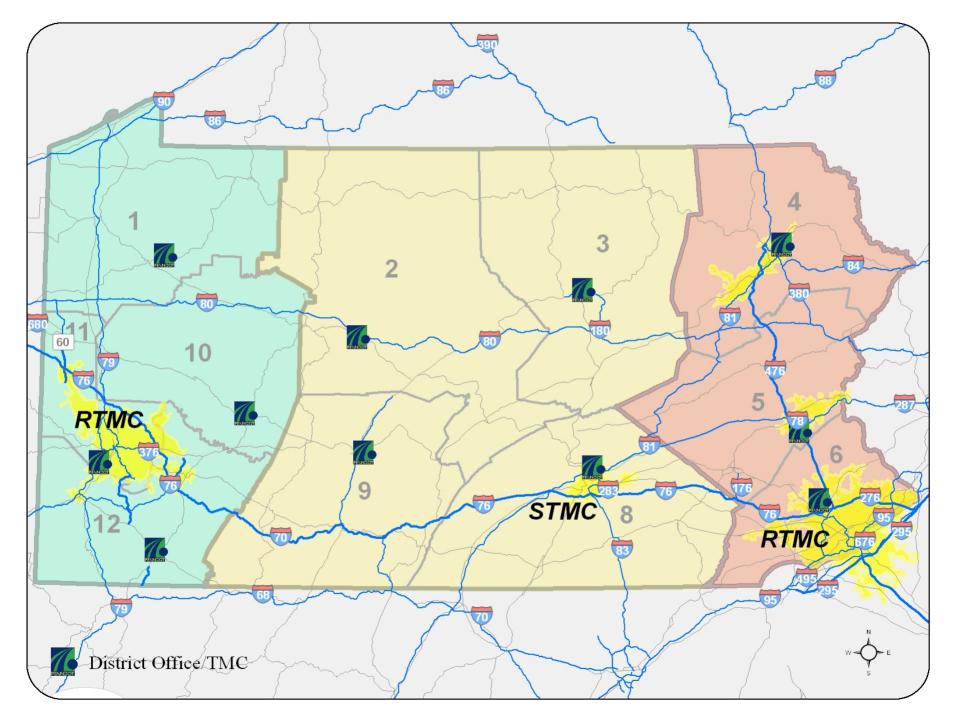
- Interchange elements
 - CCTV and HAR at each interchange
 - Two VMS at each interchange approach
 - One at 5 miles from interchange
 - One at 2 mile from interchange
 - T-1 connection to TMC
- Weather stations
 - Approximately every 20 miles

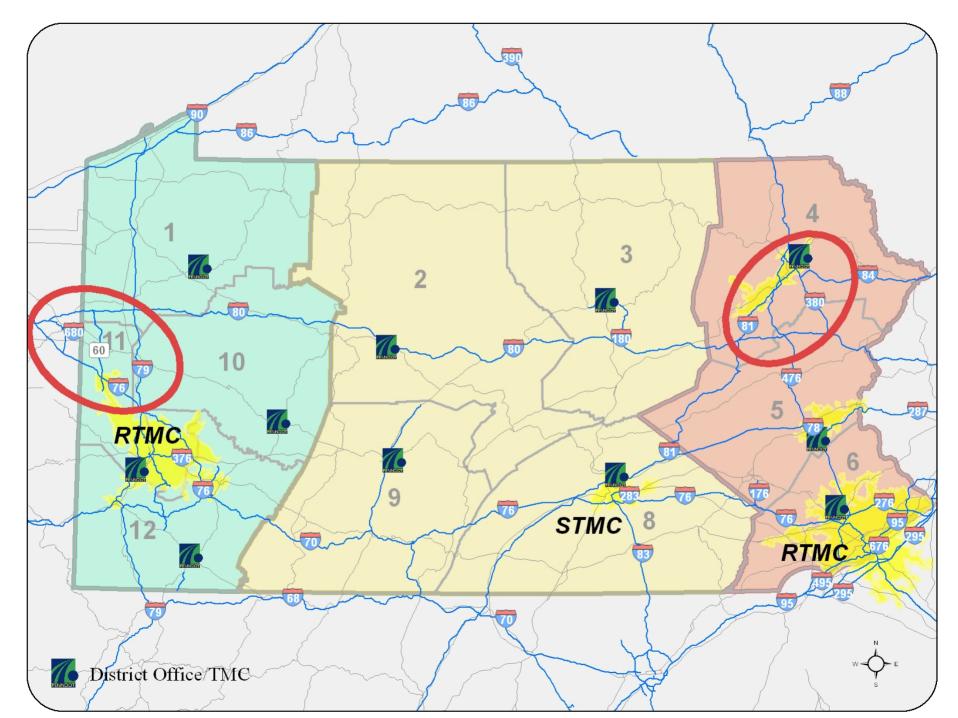


IMPLEMENTATION PLAN

- Execute 18-month implementation plan
 - \$2 million
- Deliver effective operations framework
 - Build STMC and upgrade two RTMCs
 - Implement ATMS in every District
 - Deploy Information Exchange Portal
 - Integrate portal with other stakeholders
 - \$46 million
- Deploy ITS device to fill the gaps
 - About \$500 million









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