NJTPA - Local Concept Development Study
Monmouth County Route 537 Corridor Improvements

PUBLIC INFORMATION CENTER
October 30, 2013
Project Update

- Preliminary Preferred Alternative (PPA) for CR 537 corridor improvements in Freehold Township and Freehold Borough presented to Local Officials on February 22 and to the Public on February 26, 2013
- Resolution of Support for the PPA received from Freehold Township on April 9, 2013
- Freehold Borough will not provide a Resolution of Support
- Eastern Project Limit changed from CR 537 & Business Route 33 (Park Avenue intersection) to just west of the U.S. Route 9 Interchange
- PPA for Freehold Township segment unchanged
Community Involvement

Community Involvement History

• January 20, 2012 - Two Local Officials Briefings (Project Introduction), Freehold Borough & Freehold Township

• March 20, 2012 Community Stakeholders Meeting No.1, Project Introduction & Input for Development of Project Purpose and Need Statement

• April 24, 2012 Two Public Information Centers (No. 1), Freehold Borough and Freehold Township for Project Introduction & Input for Development of Project Purpose and Need Statement

• December 17, 2012 Community Stakeholders Meeting No. 2 (Review and Input of Alternative Concept)
Community Involvement (continued)

Community Involvement History (continued)

• February 22, 2013 – (Joint) Local Officials Briefing No. 2 (Selection of Preliminary Preferred Alternative)

• February 26, 2013 - Two Public Information Centers (No. 2), Freehold Borough and Freehold Township for Selection of Preliminary Preferred Alternative

• September 16, 2013 – Freehold Borough Council Meeting
Project Overview and Background

- MC Route 537 – a major east-west transportation corridor serving regional travel needs between three counties
- Original Project Study area - 2.8 miles (Milepost 48.65 – 51.65) in Freehold Township & Freehold Borough
- Western project limit re-defined as just west of Iron Bridge Road intersection with improvements recently completed at Gravel Hill Road
- Areas of concern within the corridor: substandard design elements, traffic congestion, and traffic movement capacity
- NJTPA/Monmouth County Local Concept Development (LCD) Study undertaken
Route 537 Corridor Existing Conditions

• More than 4,000 vehicles per hour at some intersections during highest peak period
• Multiple intersections along corridor operate at or near capacity during peak travel periods which causes traffic congestion and lengthy delays
• 761 reported crashes within the limits of the corridor study during the three year period 2009-2011
• Numerous conflicting access points including driveways and roads creating traffic operational issues
• Insufficient or lack of outside shoulders for entire length
• Lack of bicycle compatibility
• Gaps in existing sidewalk network
Route 537 Corridor Existing Conditions

- Few auxiliary lanes, deceleration lanes or shoulders for turning movements at intersections as well as into various business/shopping complexes
- Substandard vertical stopping sight distance at two locations
- Substandard acceleration and deceleration lane lengths at Route 33 Freeway interchange
- Numerous substandard design elements at Route 537 and Route 9 Interchange
Route 537 Corridor Existing Conditions

Looking East, approaching Iron Bridge Road; Note Access Management, No Bicycle/Pedestrian compatibility at businesses

Looking East, approaching Redwood Lane/Village Center Road; Note Substandard vertical curve (WB), Sidewalk gaps, No Bicycle Access
Route 537 Corridor Existing Conditions

Route 537 & Village Center Road/Redwood Lane Intersection, Site of 44 crashes in 2009-2011; majority same direction (rear-end)

Looking East, East of Village Road; Note conflicting turning movements, Access Management, No Bicycle/Pedestrian compatibility Eastbound side
Route 537 Corridor Existing Conditions

Rt.537 Eastbound approaching Wemrock Road/Stillwells Corner Road Intersection

Rt.537 & Wemrock Road/Stillwells Corner Road Intersection – Site of lowest level of service of all intersections within the corridor study, 62 crashes from 2009-2011 (majority rear-end)
Route 537 Corridor Existing Conditions

Rt.537 Wemrock/Stillwells Corner Road Intersection; looking South along Stillwells Corner Road

Evidence for sidewalk need along Rt.537 Eastbound, east of Wemrock Road/Stillwells Corner Road Intersection
Route 537 Corridor Existing Conditions

Rt.537 Looking East Approaching Bridge over Route 33 Freeway, substandard acceleration & deceleration lanes, gaps in sidewalk network, no bicycle compatibility, substandard vertical curve

Another example of need for bicycle & pedestrian compatibility
Route 537 Corridor Existing Conditions

Evidence for sidewalk need along Rt.537 Westbound in vicinity of Route 33 Freeway

Another example of no bicycle compatibility – Rt.537 Westbound in vicinity of Route 33 Freeway
Route 537 Corridor Existing Conditions

Eastbound Approaching Trotter's Way Intersection (access to Freehold Raceway Mall), Site of 123 crashes from 2009-2011 (predominantly rear-end and sideswipes)

Route 537 & Trotter’s Way Intersection looking west
Route 537 Corridor Existing Conditions

Evidence for sidewalk need along Route 537 Eastbound between Trotter’s Way and Route 9

Route 537 Eastbound Approaching Route 9 Interchange
Project Purpose & Need Statement

• **Purpose:** Improve traffic safety, reduce traffic congestion, and provide better accommodations for various modes of transportation along the CR 537 Corridor.

• **Need:** CR 537 is a major east-west transportation corridor that serves regional travel needs. Significant commercial development along the corridor over the last several years has lead to growing traffic volumes and congestion. The corridor has traffic operational and safety deficiencies and limited pedestrian and bicycle accessibility. There were 761 reported crashes within the project limits from 2009 through 2011. Multiple intersections operate at or near capacity during peak travel periods.
Project Goals & Objectives

• Minimize current traffic signal congestion; especially during peak hours
• Address the high crashes along the corridor
• Address driver confusion and/or expectation with cited turning movements at intersection and interchanges
• Correct the controlling substandard design elements
• Provide opportunities for other modes of transportation where feasible within the project area
• Address gaps in existing sidewalk system along the corridor
• Avoid or minimize social, economic and environmental impacts
• Enhance public transportation services along the corridor
• Develop access management strategies to reduce conflict points and congestion
• Develop Intelligent Transportation System (ITS) improvements to better utilize roadway capacity
• Coordinate improvements with proposed local development plans
• Minimize disruption and delays during construction
Development of Alternatives

• All Concepts include: providing missing sidewalks along both sides of the corridor; 15 foot outside lanes (to provide bicycle compatibility); enhanced public transportation services; ITS improvements; improved substandard vertical curve just west of Redwood Lane & Village Center Drive Intersection

• Alternative Concepts developed, in comparison to a No Build, for intersection improvements that achieve a Level of Service “D” or better at all approaches (using future peak period traffic volumes)
Levels of Service for Signalized Intersections

• Level of Service (LOS) relates expected traffic delay to critical movement at intersections
• Level of Service ranges from “A” (relatively free flow with average delay from 0 to 10 seconds per vehicle; to “F” (failed condition or “gridlock”, average delay over 80 seconds per vehicle; most vehicles require more than one cycle to clear an intersection)
• Monmouth County Engineer’s Office considers Level of Service “D” the minimum acceptable for the design of intersection improvements (a major desirable goal for this project)
• Level of Service “D” - average delays between 35 and 55 seconds; very long queues create lengthy but tolerable delays
Intersection Improvements

- 3 Alternative Concepts developed, in comparison to a No Build, for intersection improvements that achieve a Level of Service (LOS)“D” or better at all approaches (using future peak period traffic volumes)
- Some intersections required only one Concept to achieve LOS “D”; whereas Wemrock and Stillwells Corner Road required three Concepts
- Generally, for Level of Service to improve at an intersection, often further widening is needed that involves additional Right of Way and environmental impacts
The Preliminary Preferred Alternative (PPA) for the Route 537 Corridor Improvements in Freehold Township:

- Add the missing sidewalks on both sides for the entire length
- Provide 15 feet outside lanes for bicycle compatibility on both sides for the entire length
- Provide 4 proposed new bus stops for enhanced public transportation service
- Provide an interconnected traffic signal system to coordinate green time intervals between the various signals (improve ITS)
Preliminary Preferred Alternative (continued)

- Develop Access Management Strategies in coordination with the proposed intersection improvements
- Raise the CR 537 profile approx. one foot just west of the Redwood Lane & Village Drive intersection to eliminate/improve the substandard vertical curve
- Provide the missing sidewalk on the bridge over Route 33 on the CR 537 Westbound side
The Preliminary Preferred Alternative (PPA) for the intersection improvements within Freehold Township:

• Iron Bridge Road/CentraState Medical Center: Add right turn lane on CR 537 EB (Concept 2)
• Village Center Drive/Redwood Lane: Add left and right turn lanes on northbound Redwood Lane (Concept 2)
• Wemrock Road & Stillwells Corner Road: Provide 5 lane approach at all four legs of intersection and additional through lane on CR 537 in both directions to Wal-Mart Drive EB & Gibson Place WB (Concept 3)
Preliminary Preferred Alternative (continued)

• Castronova Way/Wal-Mart Drive: Concept 3 (provide three lanes in each direction for CR 537 to Wemrock/Stillwells Road intersection and add second left turn lane from Castronova Way onto CR 537 EB)

• CR 537 & Trotter’s Way: Concept 1 (widen and lengthen CR 537 EB jug handle and straighten/widen the CR 537 WB alignment between Trotter’s way and Route 33)
CR 537 & NJ Route 33 & 9 Interchanges

- Improvements proposed at these interchanges were not part of this project; interchanges are under the jurisdiction of NJDOT
- The interchanges are currently not recognized by NJDOT as high priorities and are not in their Capital Program
- Problem Statements to be developed and submitted to NJDOT for initiating the interchange improvements being incorporated into their Capital Program
- Interim improvement to the Rt 33 interchange - Sidewalk will be added to the bridge over Rt. 33 on the CR 537 Westbound side as part of the Preliminary Preferred Alternative
NEXT STEPS

• Receive comments from both communities and the general public
• Review/Finalize Preliminary Preferred Alternative
• Obtain Resolution of Support for PPA from Monmouth County Board of Chosen Freeholders
• Complete Concept Development (CD) Report
• Hold Inter-Agency (FHWA, NJTPA, NJDOT) Review Meeting for approval of PPA & CD Report
• Concept Development Phase completed (December 2013)
Project Contact Information

- Daria Jakimowska, Monmouth County Project Manager, (732) 431-7768
- **Monmouth County Web site address:**
  - visitmonmouth.com
  - Click “Departments”
  - Click “Engineering”
  - Click “Bridge & Road Projects”
  Note: This Power Point Presentation will be posted on the Monmouth County website
- **Written comments will be received through Friday, November 29, 2013**
Thank you!
Questions & Comments