

PRESENTATION

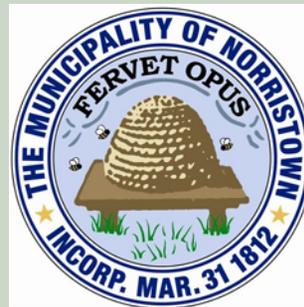
Offered to

The Municipality of Norristown

for the

DeKalb Street Two-Way Study

March 18, 2010



Goal of tonight's meeting

- Discuss study objectives and goals
- Present key issues the study will address
- Present the results of the data collection program
- Discuss scope and schedule
- Listen and learn from you, the community



Study Objectives

- Improve traffic flow
- Reduce congestion
- Enhance pedestrian safety
- Determine feasibility of conversion to two-way flow



Key Issues for the Corridor

- 1.5 mile corridor, 20 intersections
- Create access to downtown Norristown from the north
- Vehicular and pedestrian safety is critical
- Traffic Calming is important
- Characteristics of the corridor change
- Improvements that can be done quickly and cost-effectively

Study Scope and Process

- Consensus-building
- Data collection
- Existing and future traffic analysis
- Alternatives development
- Innovative solutions
- Implementation plan

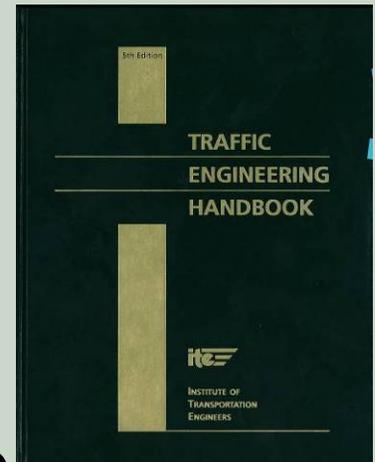
Data collection provides the foundation

- Research all available and accessible data
- Obtain aerial photography and intersection plans
- Physical field inventory of the corridor
- Collected daily traffic and speed data at 9 locations
- Collected peak hour traffic at 20 locations
- Collected pedestrian counts at 20 locations
- Crash analysis



Analysis provides the picture

- Existing conditions analysis
- Future volume projections
- Future conditions analysis
- Utilize Simulation Based Software (SYNCHRO)



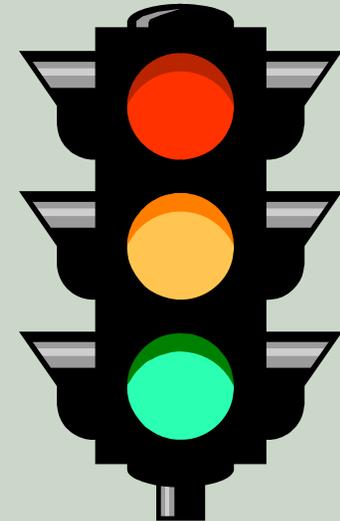
Analysis provides the picture

- Peak hour traffic pattern observations
- Inventory traffic signal controls
- Global evaluation of traffic operations
- Determine feasibility of two-way operations
- Potential signal, striping and traffic calming improvements
- Traffic circulation recommendations



What do the data and analysis tell us?

- Ample capacity along the corridor
- Traffic travels at high speeds through the corridor
- High number of angle crashes
- Majority of the intersections are operating at acceptable levels of service
- High number of pedestrians along the corridor



Develop Alternative Solutions

- Traffic pattern changes
- Pavement restriping and signing
- Traffic signal upgrades
- Parking recommendations
- Traffic calming
- Accommodations for pedestrians and other non-motorized users

Pros & Cons of Two-way Traffic Flow

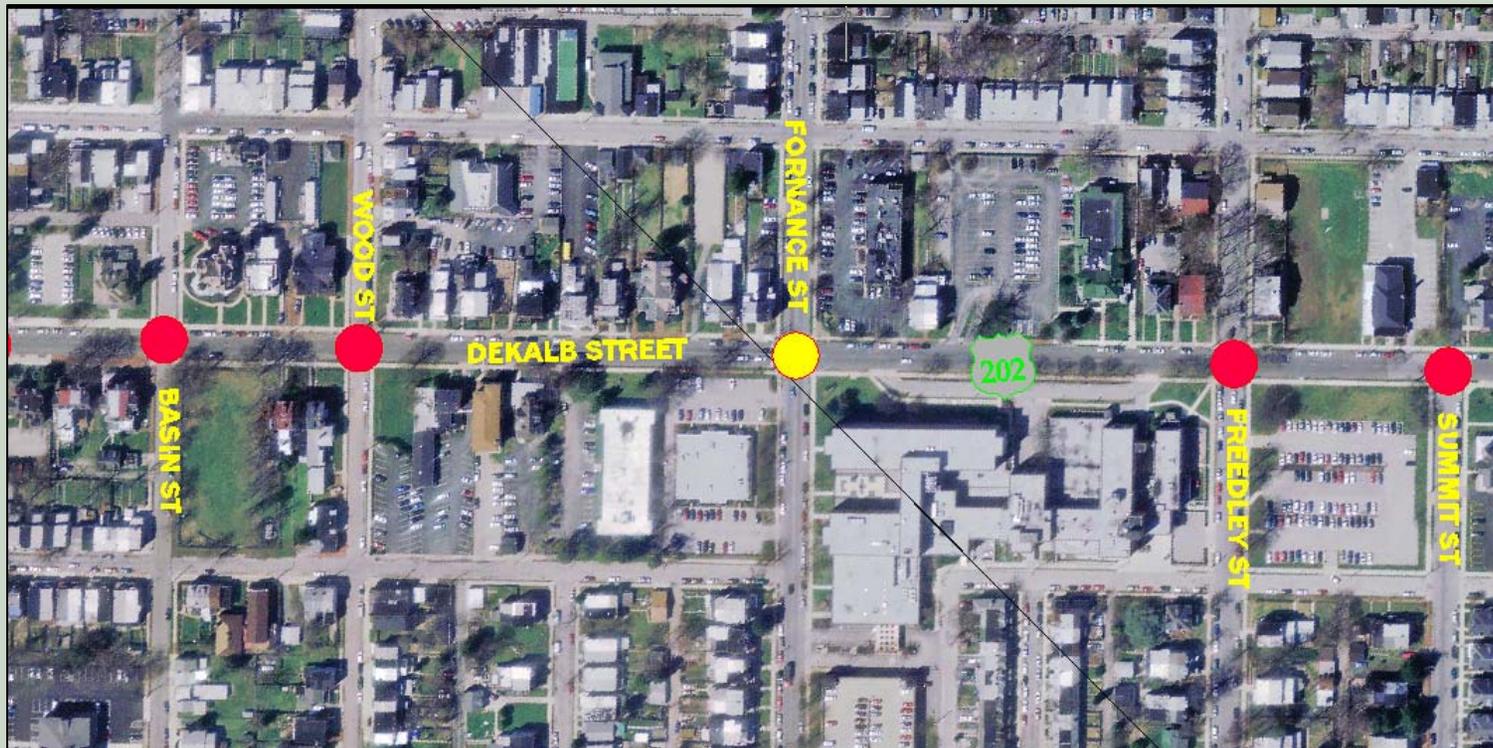
Pros

- Less confusing circulation pattern
- Slower traffic speeds
- Improves pedestrian perception of the street as less of a barrier
- Increased exposure and access to businesses

Cons

- May increase congestion at intersections
- May require left-turn lanes which would reduce on-street parking spaces
- May increase conflict points at intersections
- Reduces opportunity to increase capacity if needed

Board 1 – Aerial of the entire corridor



Board 2 – Field Inventory

Field Inventory

- Photographs
- Detailed Sketches
- Lane Widths
- Shoulder Widths
- Turn Lane Storage Lengths
- On-Street Parking
- Speed Limits
- Approach Grades
- Traffic Control Devices
- Signage
- Pedestrian and Bicycle Crossing Facilities
- Land Uses

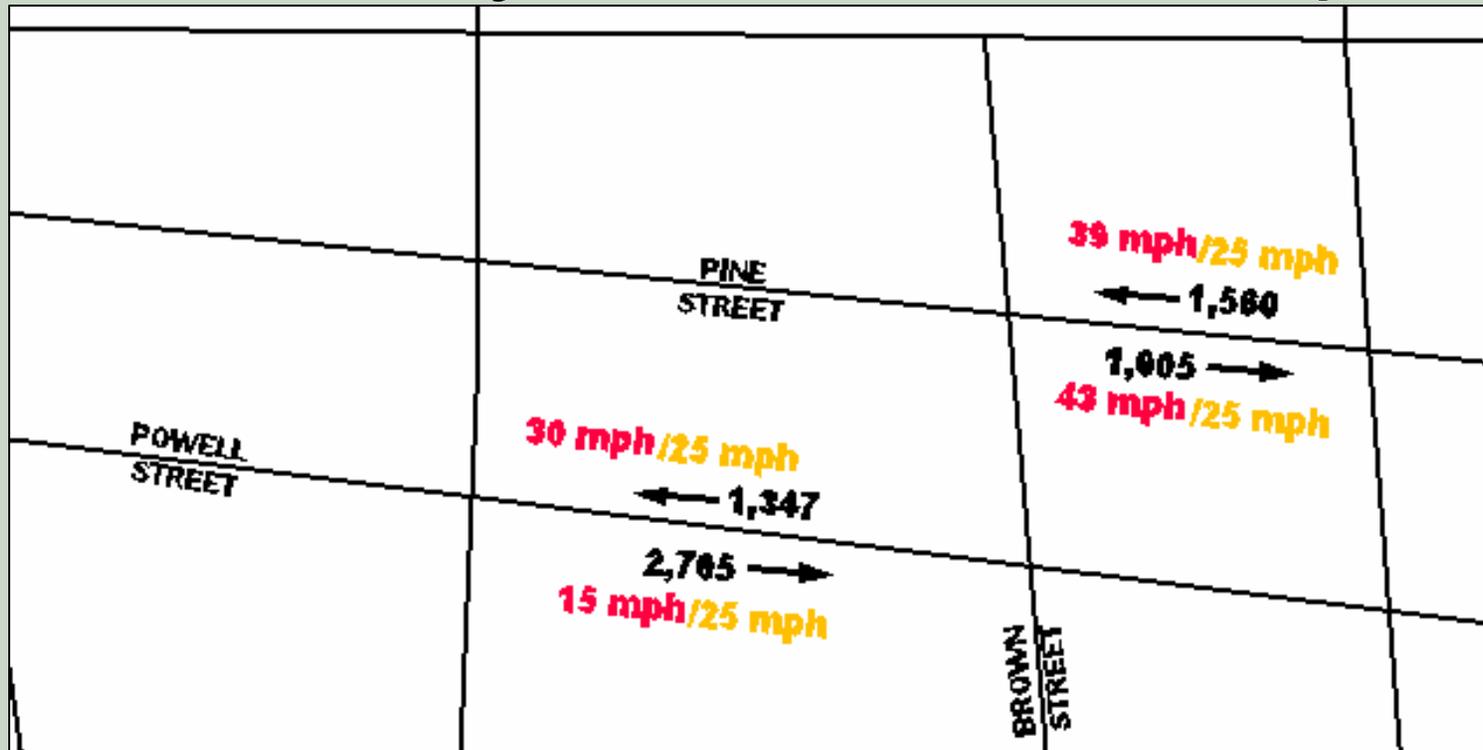


DeKalb Street NB at Marshall Street



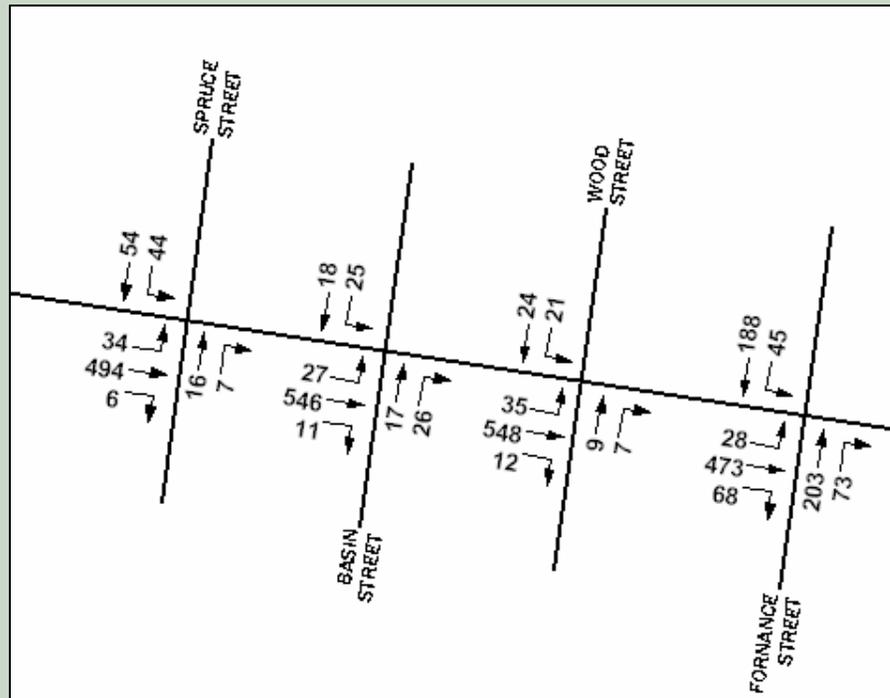
DeKalb Street NB at Jacoby Street

Board 3 – Daily Traffic Volumes/Speeds



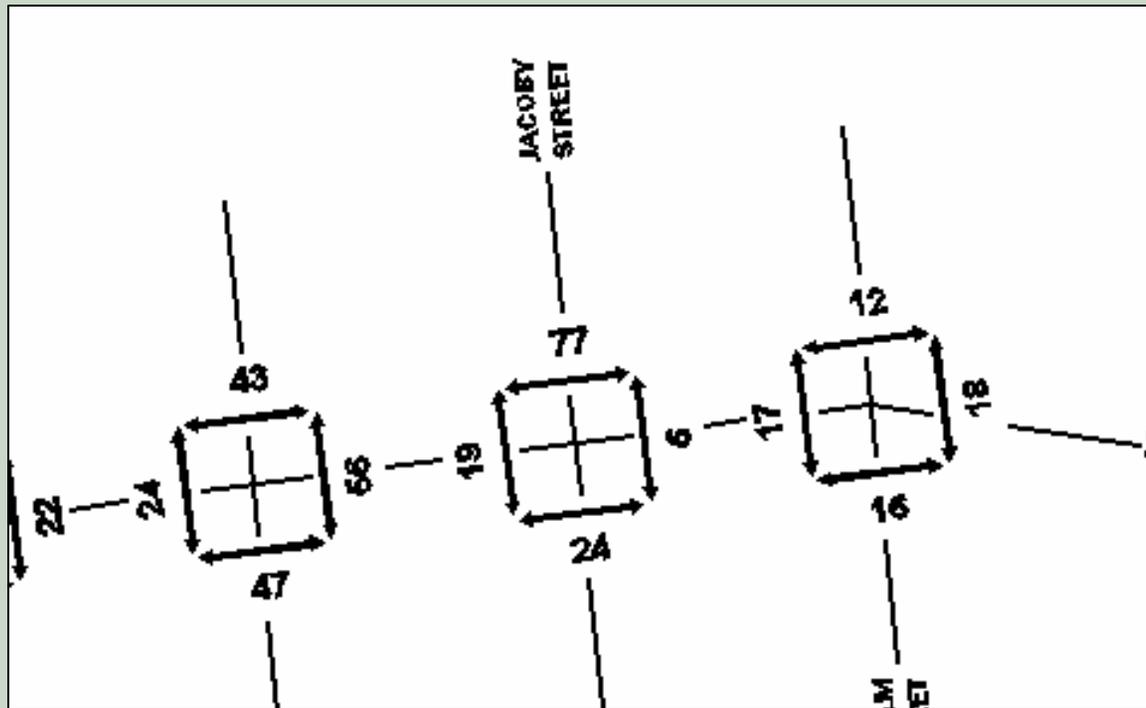
Daily Traffic is the amount of traffic on a segment of road in BOTH directions

Board 4 – Peak Hour Traffic Volumes



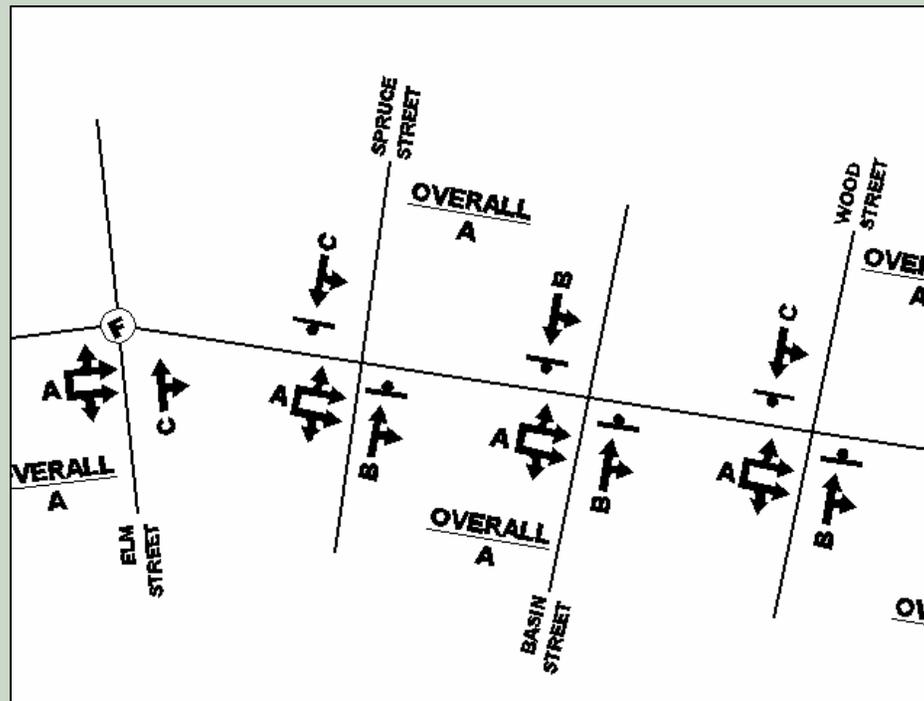
Peak hour traffic is the traffic collected during the ONE highest peak hour in each of the following peak periods: morning, mid-day, and afternoon

Board 5 – Pedestrian Traffic Volumes



Pedestrian counts were also conducted at each intersection during all three peak periods.

Board 6 – Peak hour levels of service



Peak hour levels of service depicts how the intersection is operating during each of the peak hours

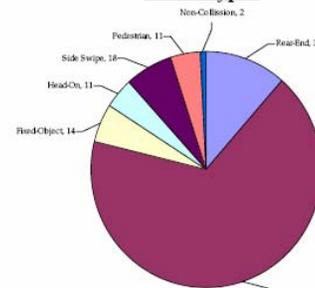
Board 7 – Crash Data

DeKalb Street Crash Summary

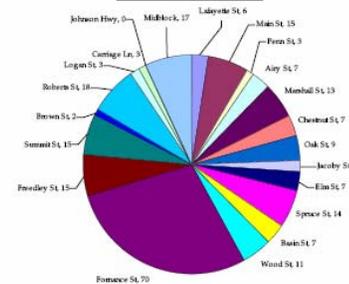
Total Number of Reportable Crashes
January 1, 2004 to December 31, 2008

Intersection	Traffic Control	Total Reportable Crashes	Frequency of Crashes (Number per Year)
DeKalb Street and Lafayette Street	Signal	6	1.2
DeKalb Street and Main Street	Signal	15	3.0
DeKalb Street and Penn Street	Stop	3	0.6
DeKalb Street and Airy Street	Signal	7	1.4
DeKalb Street and Marshall Street	Signal	13 * 1 major injury	2.6
DeKalb Street and Chestnut Street	Signal	7	1.4
DeKalb Street and Oak Street	Stop	9	1.8
DeKalb Street and Jacoby Street	Stop	4	0.8
DeKalb Street and Elm Street	Flasher	7 * 1 major injury	1.4
DeKalb Street and Spruce Street	Stop	14 * 1 major injury	2.8
DeKalb Street and Basin Street	Stop	7	1.4
DeKalb Street and Wood Street	Stop	11	2.2
DeKalb Street and Fomance Street	Signal	70 * 1 major injury * 1 fatality	14
DeKalb Street and Freedley Street	Stop	15	3.0
DeKalb Street and Summit Street	Stop	2	0.4
DeKalb Street and Brown Street	Stop	18 * 1 major injury	3.6
DeKalb Street and Roberts Street	Stop	3	0.6
DeKalb Street and Logan Street	Stop	3	0.6
DeKalb Street and Carriage Lane	Stop	0	0.0
DeKalb Street and Johnson Highway	Signal	17	3.4
Midblock	-	35 * 2 major injuries	7.0
Total	---	266	53.2

Crash Types



Crash Locations



Schedule

- Background research of study area – Month 1
- Traffic data collection – Month 2
- Investigate needed changes – Month 3
- Future ten-year analysis – Month 4-5
- Improvement recommendations – Month 5-6

McMahon is Committed to

- Maintaining open lines of communication
- Delivering an effective tool for implementation and funding
- Meeting the project schedule
- Building stakeholder & public consensus

Thank You for your time!

The Project Team will be available throughout this meeting for questions