

Regional Bicycle and Pedestrian Counts

BPAG

January 19, 2022





Agenda

- Overview
- Pilot Project
- Regional Bicycle and Pedestrian Count Program (Proposal in Development)
- Cost Estimate
- Next Steps





Overview

Traffic Count Contract

- Three year contract with AMT Consulting
- BMC has historically conducted traffic counts
- Contract includes ability to conduct bicycle and pedestrian counts

Pilot Project

- Fall 2021
- One count site in each jurisdiction (total eight)

Proposed Full Count Program

- Estimated to start spring 2022
- Present to Technical Committee in early 2022
- Informed by pilot project
- Developed in coordination with BPAG members, member jurisdictions, and planning partners





Why Count?

- Quantitative data for bicycle and pedestrian planning is increasingly important to support performance-based approaches
- Assist in understanding the role bicyclists and pedestrians play in transportation network
- Support regional, local, and state planning activities:
 - Inform the public and decision makers about actual usage and travel patterns
 - Track and analyze travel trends
 - Plan for new or improved facilities
 - Measure impacts of specific projects (before and after)
 - Support funding applications
 - Increase understanding of safety concerns and exposure rates





Timeline

October 2021	Consultant collect Pilot Project counts (8 locations)	
January 14	Bicycle and Pedestrian Count Work Group meeting	
January 19	BPAG meeting	
February	Bicycle and Pedestrian Count Work Group meeting	
March 16	BPAG meeting	
April 5	Technical Committee meeting	
May	Consultant conduct first round of regional counts	

Regional Count Program Goals

Inform prioritization of bike/ped improvements

Begin process to determine baseline bike/ped volumes

Track before/after volumes in locations with improvements

Determine user type (commuter, recreational, mix)

Assist in the selection of continuous count locations

Contribute to statewide bike/ped count database

Document increase/ decrease of users on a facility over time

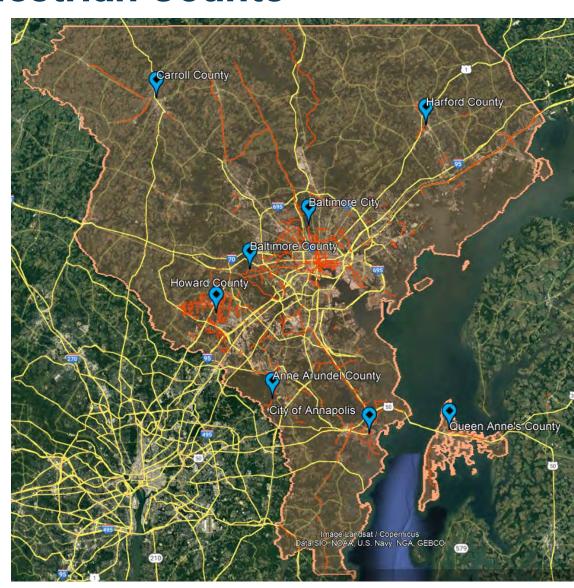
Leverage the use of emerging technologies





Pilot Project: Bicycle and Pedestrian Counts

- Weeklong counts conducted in October 2021
- One count site in each jurisdiction (eight total)
- Located on a variety of facilities
- Selected through input by BPAG members



Pilot Project: Bicycle and Pedestrian Counts

Outcomes

- Screenline Counts
 - Directional volumes
- Intersection Counts
 - Turning movement counts
- Count data submitted to MDOT by consultant
- RAW video files (potential use in safety assessments)
- Exploration of any challenges with implementation, technology, data
- Coordination with jurisdictions on data analysis and documentation of needed resources
- Lessons learned to guide recommendations for regional program





Pilot Project: Lessons Learned

General

- Reemphasize screenline vs turning movement count requirements to consultant
- Ensure screenline count locations are at pinch points
- Clearly defined goals set for each count location

Equipment Deployment

- Notify BMC in advance of deployment date for a count location
- Place equipment on ROW on non-residential property as first choice
- Notify BMC if count location needs to be moved

Deliverables

- Consistent ID numbers for directional/turning movement approaches
- 15-min internal volume summary spreadsheet for screenline counts





Screenline count

October 26 –November 1

Lessons learned

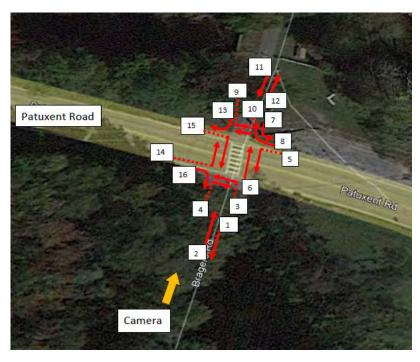
- Additional data
 - Two screenline counts
 - Turning movement count

Consistent IDs

 Consultant format data to have consist IDs for turning movements to assist in analysis

15-min interval summary

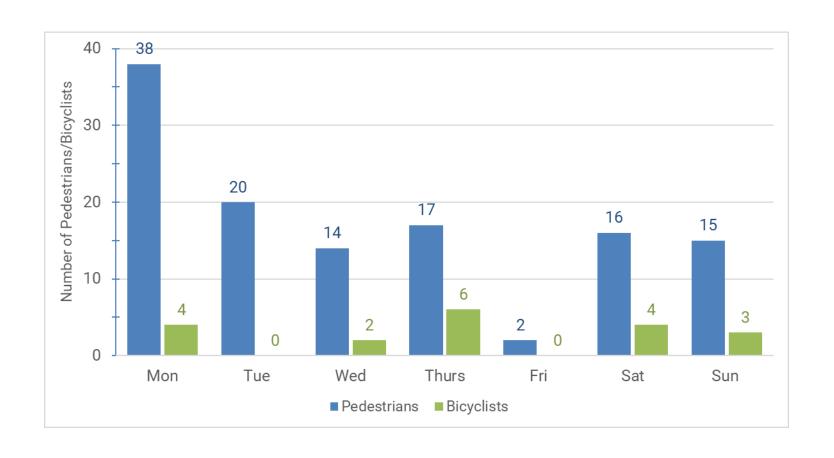
 Count volumes in 15-min intervals (daily only currently)





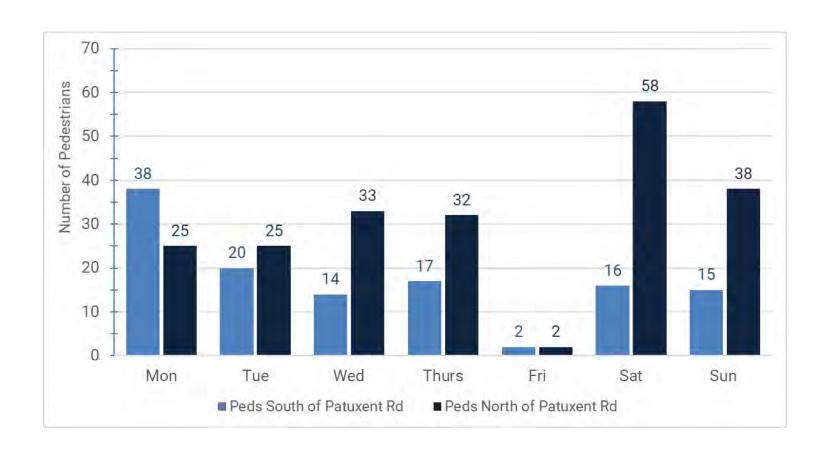










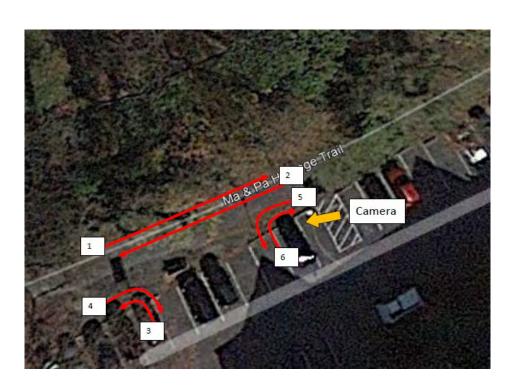






Harford County MA & PA Heritage Trail

- Screenline count
 - October 13 19
- Lessons learned
 - Adjust count location
 - To a pinch point and away from parking lot
 - Screenline count currently excludes pedestrians and bicyclists entering/ exiting parking lot
 - Location moved
 - Count location moved west of chosen location
 - Consultant verify change from chosen lat/long in future



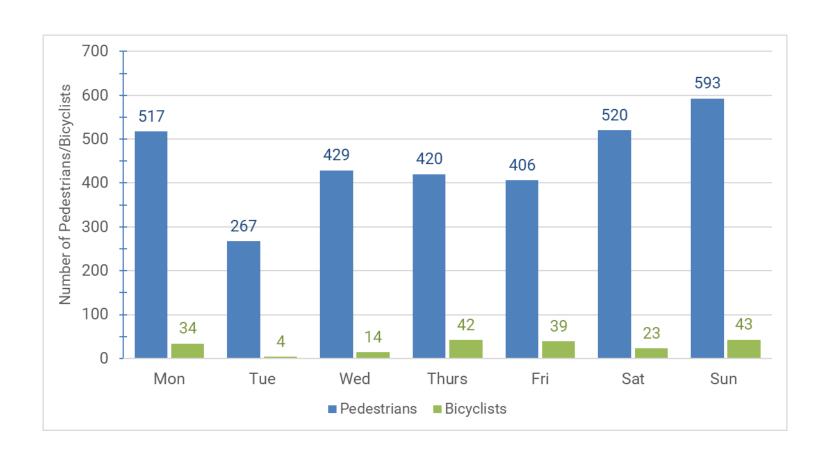


Harford County MA & PA Heritage Trail





Harford County MA & PA Heritage Trail







Queen Anne's County Cross Island Trail

- Screenline count
 - October 26 –November 1
- Lesson learned
 - Location moved
 - Count location moved west of chosen location
 - Consultant verify change from chosen lat/long in future





Queen Anne's County Cross Island Trail

- Screenline count
 - October 26 –November 1
- Lesson learned
 - Location moved
 - Count location west of chosen location
 - Consultant verify change from chosen lat/long in future



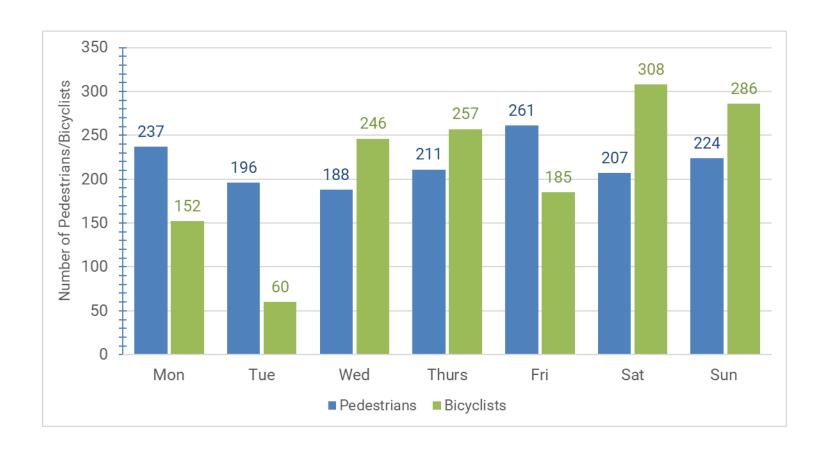


Queen Anne's County Cross Island Trail





Queen Anne's County Cross Island Trail







Howard County Stevens Forest Road

Screenline count

October 26 –November 1

Lessons learned

- Data collected as turning movement count
- Reemphasize screenline vs turning movement count with consultant





Regional Bicycle and Pedestrian Count Program (Proposal in Development)

- Weeklong counts conducted throughout the region on a repeating and project specific basis
 - Repeating counts: measure and track over time bicycle and pedestrian volumes
 - Project specific counts: measure impact (before and after)
- Development of program
 - Propose a 5 10 year plan
 - Refine list of count locations
 - Determine achievable program goals
 - Create data management and sharing plan
 - Explore resources required for data analysis and use





Cost Estimate

Regional Count Program Scenarios

- Cyclical counts repeated every three years
- Targeted counts (before/after) every year

	Avg. Annual Cost	Avg. Count Locations per Year	Total Count Locations (9 Years)
Scenario 1	\$15,000	6 repeating, 2 project specific	18 repeating, 18 project specific
Scenario 2	\$23,000	10 repeating, 3 project specific	28 repeating, 27 project specific
Scenario 3	\$48,500	20 repeating, 6 project specific	62 repeating, 54 project specific





Recommended Goals

Inform prioritization of bike/ped improvements

Begin process to determine baseline bike/ped volumes

Track before/after volumes in locations with improvements

Determine user type (commuter, recreational, mix)

Assist in the selection of continuous count locations

Contribute to statewide bike/ped count database

Document increase/decrease of users on a facility over time

Leverage the use of emerging technologies





Recommended Goals

Inform	prioritization	of bike/ped	improvements
--------	----------------	-------------	--------------

Begin process to determine baseline bike/ped volumes

Track before/after volumes in locations with improvements

Determine user type (commuter, recreational, mix)

Assist in the selection of continuous count locations

Contribute to statewide bike/ped count database

Document increase/decrease of users on a facility over time

Leverage the use of emerging technologies





Next Steps

February	Bicycle and Pedestrian Count Work Group meeting	
March 16	BPAG meeting	
April 5	Technical Committee meeting	
May	Consultant conduct first round of regional counts	
June	Consultant processes data	
July 20	BMC staff present count data to BPAG	
September - October	Potential months for fall counts	26

For More Information

Charlene Mingus | Active Transportation Planner

410.732.0500 x1008 | cmingus@baltometro.org | www.baltometro.org

