

Seattle Bicycle Advisory Board

May 1, 2013



AGENDA

- BMP draft plan outline
- Draft prioritization framework
 - Initial findings
 - Next steps
- Draft programs
- Draft bicycle facility toolkit
 - Visual glossary
 - Educational information sheets
- Maintenance
- Next steps



BMP Draft Plan Outline

Chapter Title	Discussed with SBAB?
Executive Summary	Yes, portions
Introduction <ul style="list-style-type: none">- Making the case for bicycling- Plan purpose- Planning process- Public engagement	Not directly, but will be familiar
State of the Seattle Bicycling Environment <ul style="list-style-type: none">-High level snapshot (full report will be an appendix)	Yes, SBAB has the original report
Policy Framework <ul style="list-style-type: none">- Vision- Goals- Objectives- Performance measures	Yes

BMP Draft Plan Outline cont.

Chapter Title	Discussed with SBAB?
Bicycle Facilities Network (when I bike) <ul style="list-style-type: none">- Network development methodology- Bicycle facilities toolkit- Intersection treatments- Bicycle network plan map- Prioritization framework- Maintenance	Yes, SBAB has seen much of this, but not all subelements
End-of-trip facilities (when I stop biking)	No, draft in progress
Changing behavior <ul style="list-style-type: none">- Policy- Building knowledge- Individual behavior change	Yes—discussed at February meeting and May 1

BMP Draft Plan Outline cont.

Chapter Title	Discussed with SBAB?
Governance (how we do business) - Enhancements to structure/processes	No—draft in progress
Funding sources and strategies	No—draft in progress
Appendices	Yes, portions (such as public involvement report, white papers)

Prioritization Process

- Process
 - Developed a multi-variate framework based on plan goals
 - Tested on sample data from Ballard area
- Results
 - Neighborhood Greenways perform very well
 - “City-wide” greenways scored higher than “local connector” greenways
 - Cycle Tracks also score well but slightly lower than some “city-wide” greenways
 - In street, minor separation streets scored much lower than both greenways and cycle tracks



Prioritization Process

- Next Steps

- Increase size, variety of sample areas

- Consider the desired results, look at scoring and weighting



Programming



- Relate to the overall policy framework goals
 - Ridership
 - Safety
 - Connectivity
 - Equity
 - Livability
- External facing rather than about City and SDOT internal operations



Programming Identification Process



- Assessed programs identified in the 2007 BMP



- Asked the public



- Looked to best practices across the country



Programming Process Since February



- What's worked in other places?



- What research exists on why people do or do not bike?



- How does behavior change actually happen?



- What should SDOT lead? How we support partner groups? What is best led by others?



What's Worked?

- Safe Routes to School

- Bike trains
- In classroom education
- Parent outreach

- Individualized marketing

- Metro In Motion
- Smart Trips/ Smart Trips Welcome

- Targeted enforcement partnered with outreach/education

- Bike share

- Montreal
- D.C.



What Does the Research Say?



- There's opportunity when people move or change jobs
- Millennials (18-34) are generally willing to try carlite living/lifestyles
- Behaviors of friends and family make a difference
- Strategies that depict the behavior as the norm can be effective
- Start with people who have expressed a willingness to try a new behavior
- Weather plays an important role in mode choice



Why Do People Change Behavior?



- Quite a bit of research from social science and marketing sectors:
 - Transtheoretical Model
 - Community Based Social Marketing
 - Segmentation
 - Heath Brothers' "Switch" approach
- Share a broad approach that includes:
 - Policy-level work
 - Building knowledge - broad education and information sharing
 - Changing individual behaviors

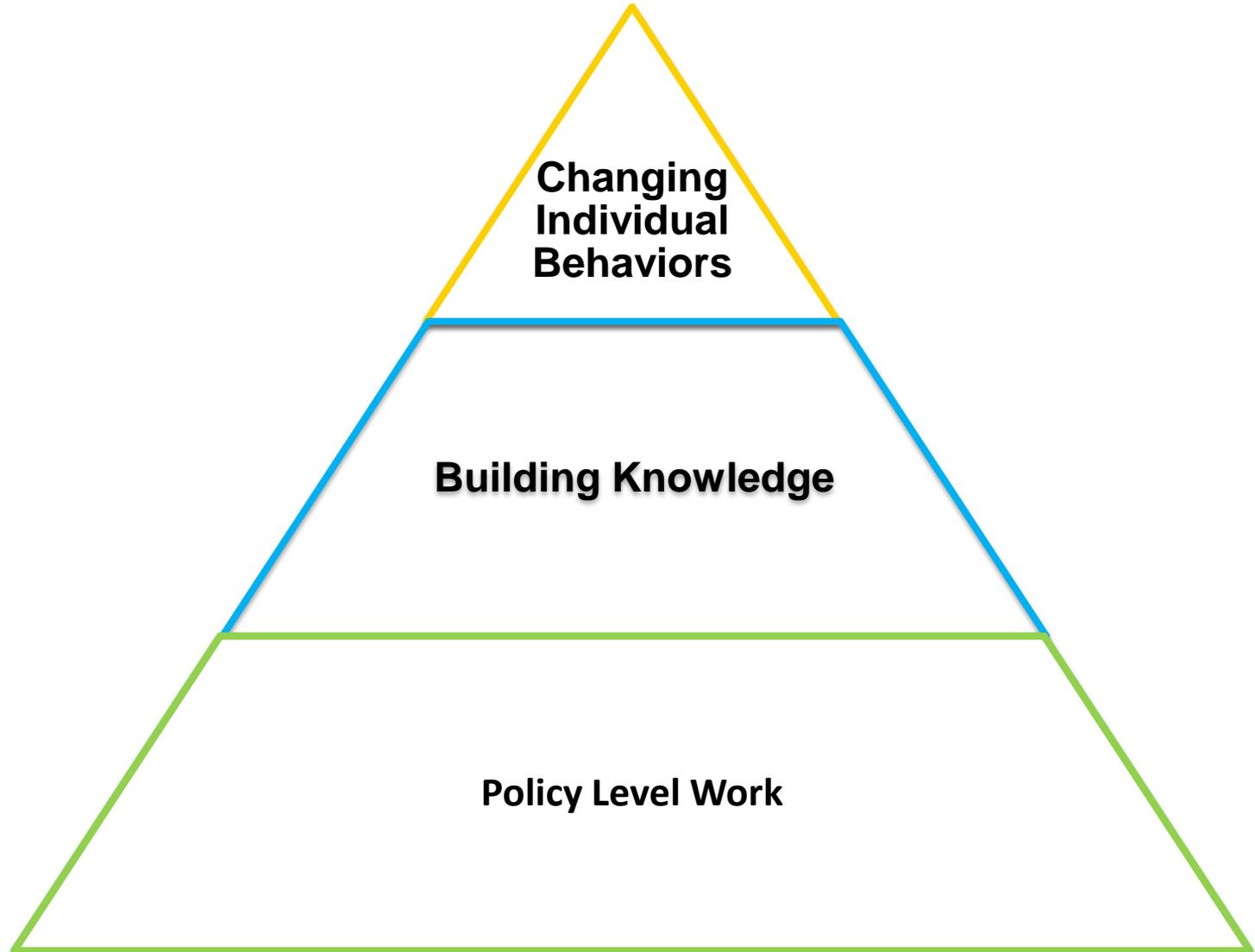


Does the City Lead or Support?

- Partners already have strong programs related to many of the identified strategies
 - No need to re-create what's already working
 - City can support work through information sharing, funding, staffing, and policy efforts
- What if the City doesn't have a role in supporting or leading an important programming effort? Should we include it in the BMP update?



Types of Programming



Policy Level Work

Support the development of neighborhood bicycle programming

Support bicycling to commercial centers through programming

Support the development of bicycle tourism in Seattle

Support strong bicycling elements in CTR Programs

Support strong bicycling elements in Transportation Management Plans

Improve wayfinding and trip planning opportunities for people on bicycles

Ensure strong bicycle education for primary age children (Safe Routes to School)

Pursue any identified legislative changes to facilitate better bicycling conditions in Seattle

Develop a process to routinely review bicycle-related collisions and identify and implement safety strategies

Ensure that Seattle drivers' education programs and licensing centers promote bicycle safety and multi-modal trip knowledge



Building Knowledge

Support bike share and other programs that provide better access to e-bicycles and helmets

Support information sharing and communication between the freight, professional driver, and bicycling communities

Develop and promote “Bike 101” materials

Develop and promote materials that explain how to safely use *new* bicycle facilities



Changing Individual Behaviors



Support events & programs that encourage underrepresented groups to try bicycling (for example women, seniors, immigrant populations)

Develop a marketing campaign to encourage targeted populations to try bicycling



Strategies & BMP Update Goals

Strategy	Ridership	Safety	Connectivity	Equity	Livability
Develop a process to routinely review bicycle-related collisions and identify and implement safety strategies					
Ensure that Seattle drivers' education programs and licensing centers promote bicycle safety and multi-modal trip knowledge					
Ensure strong bicycle education for primary age children (Safe Routes to School)					
Pursue any identified legislative changes to facilitate better bicycling conditions in Seattle					
Improve wayfinding and trip planning opportunities for people on bicycles					
Support bicycling to commercial centers through programming					
Support the development of bicycle tourism in Seattle					
Support the development of neighborhood bicycle culture (neighborhood rides, shared maintenance equipment, bicycle swaps, etc.)					
Support strong bicycling elements in Transportation Management Plans					
Support strong bicycling elements in CTR Programs					
Develop and promote materials that explain how to safely use <i>new</i> bicycle facilities					
Develop "Bike 101" materials					
Support information sharing and communication between the freight, professional driver, and bicycling communities					
Support bike share and other programs that provide better access to e-bicycles and helmets					
Develop a marketing campaign to encourage targeted populations to try bicycling					
Support events & programs that encourage underrepresented groups to try bicycling (for example women, seniors, immigrant populations)					



Programming Prioritization



- Priority is safety



- Public input



- Supported in ongoing work



SDOT Lead	Tier	Strategy	Ridership	Safety	Connectivity	Equity	Livability	Type of Strategy
*	1	Develop a process to routinely review bicycle-related collisions and identify and implement safety strategies						Policy
*	1	Ensure that Seattle drivers' education programs and licensing centers promote bicycle safety and multi-modal trip knowledge						Policy
*	1	Ensure strong bicycle education for primary age children (Safe Routes to School)						Policy
*	1	Develop and promote materials that explain how to safely use <i>new</i> bicycle facilities						Knowledge
*	1	Develop "Bike 101" materials						Knowledge
	2	Support information sharing and communication between the freight, professional driver, and bicycling communities						Knowledge
*	2	Pursue any identified legislative changes to facilitate better bicycling conditions in Seattle						Policy
*	2	Improve wayfinding and trip planning opportunities for people on bicycles						Policy
	2	Support strong bicycling elements in CTR Programs						Policy
	2	Support bike share and other programs that provide better access to e-bicycles and helmets						Knowledge
	2	Support strong bicycling elements in Transportation Management Plans						Policy
	2	Support events & programs that encourage underrepresented groups to try bicycling (for example women, seniors, immigrant populations)						Behavior
*	3	Develop a marketing campaign to encourage targeted populations to bicycle						Behavior
	3	Support bicycling to commercial centers through programming						Policy
	3	Support the development of bicycle tourism in Seattle						Policy
	3	Support the development of neighborhood bicycle culture (neighborhood rides, shared maintenance equipment, bicycle swaps, etc.)						Policy

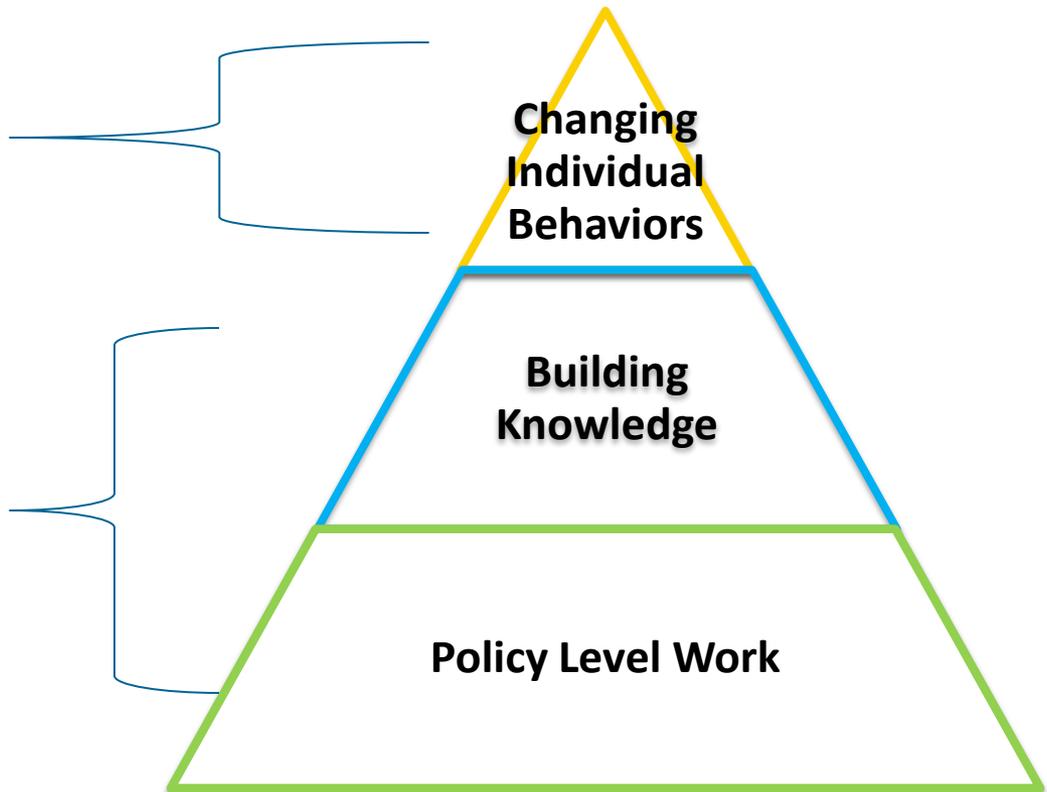
Measuring Effectiveness

Programmatic Evaluations

- Participation
- Program satisfaction
- Self-reported behaviors
- Observed behaviors
- Process evaluations

Performance Measure Progress

Performance Measure Progress



Programming



Questions or Suggestions?



Draft Bicycle Facility Toolkit



- Visual Glossary:
 - simple, clear illustrations
 - brief description and purpose
 - to be used in conjunction with other guidance (intersection treatments)
 - bicycle facilities, intersection treatments, multi-use trail crossings, signage, bicycle parking
- Educational Information Sheets
 - attractive, clear graphics
 - emphasis on education to all potential roadway users
 - to be used for outreach and educational purposes



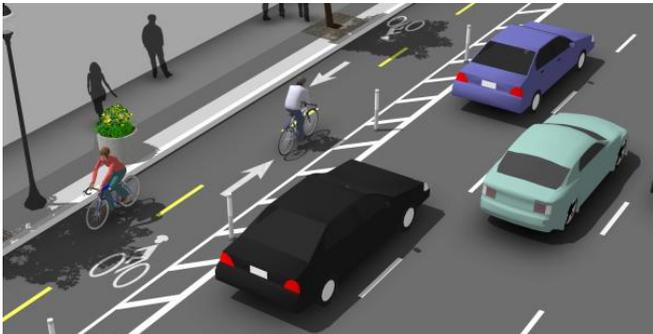
Draft Bicycle Facility Toolkit

Visual glossary examples (bicycle facilities):



Street-Level Cycle Track

Street level cycle tracks are configured at the same level as general travel lanes. They must be protected from traffic with a physical barrier, such as bollards, planters raised medians, or on-street parking.



Two-Way Cycle Track

A two-way cycle track is an in street bicycle facility that allows bicycle movement in both directions on one side of the street. A two-way cycle track may be configured as a *Street Level Cycle Track* with a parking lane or other barrier or as a *Raised Cycle Track* to provide vertical separation from the adjacent motor vehicle lane.



Draft Bicycle Facility Toolkit

Visual glossary examples (intersections):



Bicycle Forward Stop Bar

A bicycle forward stop bar is a second stop bar placed beyond the crosswalk, closer to the center line of the street. Bicyclists may advance to this crosswalk while waiting at an intersection. This increases the visibility of bicyclists waiting to cross the street and is often paired with *Curb Bulbs*.



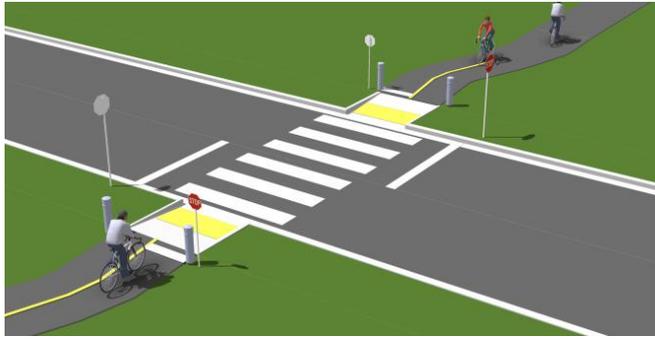
Median Refuge Islands

Median refuge islands are protected spaces placed in the center of the street to facilitate bicycle and pedestrian crossings. Crossings of two-way streets are simplified by allowing bicyclists and pedestrians to navigate only one direction of traffic at a time. This also functions as a *traffic calming* technique as part of a *Neighborhood Greenway*.



Draft Bicycle Facility Toolkit

Visual glossary examples (multi-use trail crossings):



Marked Crossings

A marked crossing typically consists of a marked crossing area, *Warning Signs* and other markings to slow or stop traffic. When space is available, a median refuge island can improve user safety by providing pedestrians and bicyclists space to perform the safe crossing of one half of the street at a time.



Raised Crosswalk

Raised crosswalks are crossings elevated to the same grade as the multi-use trail. Raised crosswalks may be designed as speed tables, and have a slowing effect on crossing traffic.



Draft Bicycle Facility Toolkit

Educational Information Sheets example:



Two-Stage Turn Box



Description: A two-stage turn box formalizes an alternative maneuver to merging into the left turn lane (or right lane), and transforms a potentially stressful turn into a structured maneuver anyone can comfortably do.

User instructions:

BICYCLISTS

- During the green light, cross to the corner of the cross-street where the box is located and wait in the designated area.
- If necessary, adjust the positioning of your bike to orient along the cross street.
- When the light changes, proceed on the street with the rest of the waiting traffic.

MOTORISTS

- Locations with two-stage turn boxes may have No Turn on Red restrictions to reduce dangers to bicyclists. Do not enter the box on a red light.
- Depending on the position of the box, bicyclists may occupy the space in front of the travel lane. When the light turns green, you must wait for bicyclists to clear the box before proceeding ahead.

Draft Maintenance Section

2007 BMP Maintenance actions:

- Improve the quality and quantity of bicycle facility maintenance
 - Maintenance agreements with other agencies
 - Trail and on-street maintenance activity matrices
- Fix spot maintenance problems on existing city streets and bikeways
 - Concrete pavement seams
 - Railroad crossings
- Prioritize bicycle facility development and maintenance to maximize the use and safety benefits of these investments



Draft Maintenance Section

BMP Update – maintenance revisited:

- Importance of maintenance
- Focus on maintenance outcomes
 - Maintain on-street and off-street bicycle facilities to create “bicycle zone”
 - Encourage use of materials that extend life-cycle of bicycle facilities
 - Include maintenance costs and procedures in all projects
 - Encourage bicyclists to report maintenance complaints and requests to the “Bike Spot Safety” program



Draft Maintenance Section

BMP Update – maintenance revisited:

- Maintenance Implementation
 - Establish clear responsibilities and negotiate or renegotiate maintenance agreements with other agencies
 - Prioritize types of bicycle facility to be maintained
 - Safety (collision locations and proactively)
 - Ridership
 - Cost-effectiveness
 - SDOT roles and responsibilities
- Maintenance Cost Estimates – annual costs by facility type



Next Steps

- Draft BMP update released in June
- June 5 SBAB meeting/Open House
- Public engagement phase 3: June - July
- Council review and adoption of BMP update: August - September

