

Pike/Pine Protected Bike Lanes Outreach Summary and Recommendations

Seattle's Pike/Pine corridor is lively all day and into the night. It's home to funky shops, trendy eateries, community gathering places, and Seattle Central College. The corridor is a center of activity for the Capitol Hill neighborhood and a destination for people from around the region, as well as tourists from all over the world.

The corridor is also an important connection between Capitol Hill and downtown for people walking, rolling, riding on buses, driving cars, and biking. But it's not currently safe for people who bike.



People bike on Pike and Pine, but it's not currently safe.

Central Seattle Greenways has been advocating for protected bike lanes in the Pike/Pine corridor for several years; it's a critical component of the <u>Basic Bike Network</u>. Since 2015, the City of Seattle has recognized the importance of protected bike infrastructure in the corridor. In 2018, the <u>Community Package Coalition</u> secured ten million dollars in funding for permanent protected bike lanes as part of the Washington State Convention Center Addition street vacation compensation. Later that year, Seattle City Council passed a resolution (developed with the Seattle Department of Transportation) requiring temporary infrastructure be installed in 2019. Permanent bike lanes will be installed after the Convention Center Addition is completed.

Everyone has a stake in the way the streets function. It's vital to preserve the character of the corridor and help local businesses thrive. With that in mind, Central Seattle Greenways partnered with the Capitol Hill EcoDistrict and other community organizations as we engaged in substantial outreach to better understand the community's needs for the street so that we could advocate for the most successful design.

We conducted preliminary business outreach in 2017, and then, in 2018, communicated with businesses in the corridor more specifically about the coming bike lanes. We created a pop-up protected bike lane on Pike for PARK(ing) Day in September 2018 to demonstrate what a lane might look like. We reached out to disability communities to ensure their needs and safety were considered from the beginning.





A pop-up protected bike lane on Pike Street showed what protected lanes might look like (left). At the workshop, participants shared different perspectives and discussed ways to make the street work for everyone (right).

In October 2018, we convened a community workshop where 150 people with different perspectives listened to each other, identified shared values, and explored ideas for meeting the needs of all users in the design of the street. Finally, we solicited more information through an online survey; 436 people shared their thoughts and priorities with us. While all the information is valuable, it's clear that the workshop provided opportunities for deeper community understanding, connections, and creativity that an online survey simply couldn't.

We are grateful to everyone who engaged with us at the pop-up protected bike lane, during our business outreach, at the workshop, and in the survey. The only way we can help the City design a street that works well is to understand the community's needs.

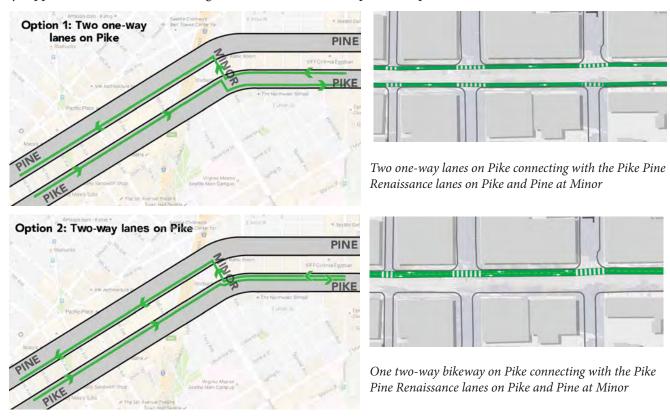
In this document, we share information about what we did, what we heard, and what we're recommending as City planners move forward with the design.

Parameters

To ensure the community feedback was useful, we sought guidance from the Seattle Department of Transportation (SDOT) about the potential configuration and timing for the temporary and permanent lanes. We learned that certain bike lane configurations offer substantial cost savings for the City and that current street improvement and construction projects in the area affect what's possible in the near and long term. We shared these opportunities and constraints with workshop participants and survey respondents. As such, the input and priorities that emerged from our outreach reflect these realities.

The design of the *Pike Pine Renaissance: Act One* plan, a joint project of the City of Seattle Office of the Waterfront and the Downtown Seattle Association, is well underway and likely to be implemented in a few years. That plan will convert Pike and Pine to one-way streets from First Avenue to Melrose (or, more likely, Bellevue); the design includes a protected bike lane on the left side of each one-way street (the south side of Pine and the north side of Pike). Meanwhile, during the construction of the Washington State Convention Center Addition, temporary protected bike lanes may need to be adjusted due to construction. Therefore, we focused our outreach efforts on the permanent bike lane design for the segment east of the Pike Pine Renaissance plan area, between Broadway and Minor/Melrose.

We were told that the City was unlikely to extend the one-way lanes from Bellevue to Broadway, given the expense of moving bus trolley wires and reconfiguring traffic signals, and that with buses traveling both directions on Pine, it would be incredibly challenging to fit a protected bike lane on that street. Thus, the two options SDOT was considering for a permanent design were both configurations on Pike—either a two-way bikeway on the north side of Pike or separate one-way lanes moving with traffic on either side of the street. Because we didn't want to waste community members' time on options we were told were off the table, those were the two options we presented in our design workshop and online survey. Appendix A describes the background information and options we presented.



Community Priorities

Several strong priorities emerged from our community outreach. We believe each of these priorities is important, and that we can have a street design that meets all of these goals:

Pedestrian safety, comfort, and convenience

The Pike/Pine corridor is a popular and important walking route between downtown and Capitol Hill. Many of the businesses in the corridor rely on consistent foot traffic. The community—including businesses, residents, and visitors—wants the Pike/Pine corridor to offer an even safer, more comfortable pedestrian environment than it currently does. While the lack of east-west signals at several intersections enables pedestrians to travel east or west more efficiently because they do not need to wait for a light, many people have described feeling unsafe crossing Pike and Pine at those unsignalized intersections because drivers do not always stop.

A continuous, safe, intuitive bike route

Currently, people who bike on Pike and Pine have little protection from vehicle traffic. While most people who bike strongly support the installation of protected bike lanes, those lanes will only be useful if they are continuous and provide a route that makes sense and is convenient to riders.

Ample loading zones for businesses and passengers

The primary concern we heard from businesses was the need for sufficient, available, and safe loading zones for deliveries. The loading zones that exist now are rarely enforced and sometimes impractical for large trucks. Many delivery trucks park in the center lane of Pike while they unload—an illegal but routine practice—and we heard concerns that without a center lane, there would be no practical way for those deliveries to occur.

We also heard significant need for loading zones for passengers, and for consistent pickup/dropoff spots for ride-hailing service providers, including Uber and Lyft. While three-minute loading zones are currently located in front of residential buildings, typically mid-block, people expressed the desire for three-minute loading zones at the end of the block to create easier access for drivers.

Clear, predictable traffic flow for all users

Drivers of private vehicles, cyclists, pedestrians of all abilities, customers of ride-hailing services, delivery vehicle drivers, transit users . . . everyone needs to know where they should be on the street and where to expect others. We particularly heard this from the blind community; people with limited vision need to know what types of traffic to listen for and which direction it is coming from. Confusion about traffic flow is the top complaint we've heard about the implementation of protected bike lanes on Broadway.

Alignment recommendations

Keeping these priorities in mind, and after analyzing what we've heard, we have some recommendations for the short-term and long-term lane alignments.

Long-term

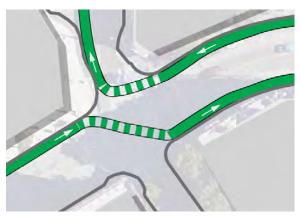
Because we had been told that extending one-way street configuration to Broadway was highly unlikely, we presented two protected bike lane options to the community, both aligning east-west bike lanes on Pike. But even without our mentioning it, we frequently heard the desire for the westbound bike lane to be entirely on Pine and the eastbound bike lane entirely on Pike; this was usually paired with the desire to extend the one-way lanes of the Pike Pine Renaissance Act One plan all the way to Broadway. Keeping a westbound lane entirely on Pine and an eastbound lane entirely on Pike provides clarity for people walking, biking, and driving; delivers a more intuitive route that cyclists are more likely to use; and shares the perceived burden and benefits of a bike lane for business owners on both Pike and Pine.



Potential Pike/Pine bikeway couplet

We believe this option deserves careful study and consideration by the City. Because we didn't specifically discuss it with the community, we also believe it requires more outreach to ensure that potential concerns with a one-way street are surfaced and can be addressed. Our strong recommendation is that SDOT construct the temporary bike lanes between Broadway and Minor/Melrose in a way that does not preclude extending the Pike Pine Renaissance street design all the way to Broadway in a few years. That is, we urge SDOT to use planters and other movable barriers rather than poured concrete to separate the interim lanes from other traffic. This approach is in line with best practices for piloting bikeways and other street-use interventions before committing to permanent infrastructure investments.

Between the two options on Pike, there was no consensus about whether to separate the directional lanes (one on each side of the street) or to create a two-way bikeway, like the ones on Broadway and 2nd Ave. Notably, most people who preferred putting both lanes on the north side of the street said it was because they were concerned about transitioning eastbound cyclists between the Pike Pine Renaissance left-hand lane and a separate right-hand lane, if the lanes are on each side of the street. The general opinion is that separated lanes, especially given the grade and resulting speed differential, are preferred if that transition could be handled well (so that it's clear to all users what's happening, doesn't require people biking to wait through multiple light phases to move over, and is safe).





Transition at Minor/Melrose between the Pike Pine Renaissance bike lanes and each alignment option on Pike.

There was no strong consensus about which street the bike lane should use to cross from Pike to Pine, but workshop groups and survey respondents both requested that the crossover street be calmed and that signals and signage be clear.

Short-term

In the next couple of years, protected bike lanes in both directions are almost certain to be on Pike between Broadway and Minor/Melrose, and probably further west. If the transition from the existing left-hand eastbound lanes on Pike to right-hand eastbound lanes can be managed so that it is safe, intuitive, and sensible to people biking, we recommend separating the directional lanes on either side of Pike.

We have seen an early-stage proposal from SDOT to install temporary lanes on either side of Pike all the way down to Hubbell, using the light at Hubbell to move eastbound cyclists to the right side of the street via a diagonal cross-bike (similar to Westlake and 9th), with a two-way bikeway between Hubbell and 8th Avenue. We believe this is an elegant interim solution that avoids the challenges of a transition at Minor/Melrose, and we fully support it.



Possible temporary route with transition at Hubbell and two-way bikeway between Hubbell and 8th Ave.

Areas that require particular care

Workshop participants, survey respondents, and other community members expressed concern about the street design in some specific areas. We urge City planners to consider the following in all stages of street design.

Transitions

If one-way bike lanes are installed on either side of Pike—whether in a permanent design or temporary—great care must be given to the design of the transition from one side of the street to the other for eastbound cyclists.

If a two-way bikeway is installed between Broadway and Minor/Melrose in a permanent configuration, or between Hubbell and 8th in a temporary configuration, great care needs to be given to the point where a single-lane eastbound bike lane meets the two-way lane so that people biking westbound downhill (faster) do not have head-on collisions with people biking eastbound uphill (slower). Signage, road markings, and clear design are important here.

Clarity of design

Throughout the corridor, both the temporary and permanent designs need to be well-signed and designed in a way that makes the intended use very clear and intuitive to people driving, biking, and walking. Remember, also, that blind people can't read printed signs; the design must be apparent without them. An iterative design process involving direct observation of the behavior of all street users will be critical to a successful design.

Intersections

All intersections require care, especially considering how people walking may come into conflict with people driving or biking.

In particular, the intersection at Pike and Minor/Melrose is challenging. We heard from nearby business owners as well as many other community members that the pedestrian signal at Melrose is confusing; most would prefer a standard traffic signal at that intersection. Until then, the push button for the pedestrian signal should be moved nearer to the intersection on the south side of the street, as many people walking don't see it and don't know they need to push it to get a walk signal.

Community Workshop

In order to create an environment for community members and street users to dive deeply into the above issues, exchange perspectives, and raise awareness for the coming changes, we convened a community workshop. Approximately 150 community members came together on the evening of October 25, 2018 to discuss their priorities and concerns about potential street designs. Twelve small groups—most reflecting multiple perspectives—worked together to find compromises, identify challenges, and hear each other's concerns.

At the end of the evening, one of the participants expressed gratitude for "the perspective of the business owners to come forward and say, hey, this is really important to us, as somebody who's

Capitol Hill Housing, Central Seattle Greenways, and Seattle Neighborhood Greenways present:

Pike/Pine
Protected Bike Lane

Community
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put their livelihood on the line. . . . and to say, we need this to keep our business going."

Each group chose an alignment (two-way bikeway on the north side of Pike or separate one-way bike lanes on either side of Pike), and then configured the remaining right of way to accommodate loading zones, pocket turn lanes, parking, pedestrian safety, and other needs. Each group shared its final map, with colored strips of paper cut to scale indicating different uses of the right of way, as well as a worksheet with the group's chosen alignment and reasoning, priorities, concerns, and ideas. (See all the final maps and worksheets in Appendix B.)

Who came?

A diversity of perspectives were represented among the 150 participants. At check-in, attendees placed stickers on their name tags representing how they use the Pike/Pine corridor. Sticker options included images of people walking, biking, using transit, driving/riding, using a wheelchair, working, shopping, dining, playing, and walking a dog. They also included images to indicate that they identified as a senior, parent, student, business owner, deaf, blind, or someone that lives in the corridor. The exercise helped people understand that everyone uses the corridor in more ways than one. The stickers on the nametags also served as a visual reminder about the perspectives represented and not represented in each table discussion.

What perspectives do you represent, and how do you interact with the Pike/Pine corridor?



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Workshop participants chose stickers to show which perspectives they represented (top).

150 people came together to discuss the design of the street (right).



While we did not collect demographic data, generally, it appeared that most people arrived on foot or bicycle. Because our outreach to communities of color fell short, the crowd was overwhelmingly white. Thanks in part to a focus on gender equity in our outreach, more women participated than is typical for a cycling-focused event. A handful of individuals with disabilities were present. Due to the length of the event and timing on a weeknight, many affected businesses in the corridor were unable to send a representative. However, there were business owners or employees seated at almost all of the tables. Finally, two other underrepresented perspectives were elders and students, despite there being two academic institutions in the corridor—Seattle Central College and the Northwest School.

What we heard

No two groups produced the same results, but all groups, led by trained facilitators and map experts, had productive, constructive conversations. We heard from many participants that they learned a lot from each other and valued the opportunity to hear and be heard by others. We also heard many people say that they wanted the City to use workshops like this to bring people together to discuss other major changes, especially street design, throughout the city.

Groups were roughly **split on alignment** preferences: Seven groups chose one-way lanes on either side of the street and five groups chose two-way lanes on the north side of Pike. Those who chose two-way lanes on the north side all said they wanted to avoid an awkward transition for eastbound cyclists at the end of the Pike Pine Renaissance lanes. Other reasons mentioned were safety for cyclists, usability, efficient use of space, less stress for tourists, and wayfinding.

Those who chose one-way lanes gave a variety of reasons, most having to do with comfort and safety for people biking and walking (especially related to the speed differential between uphill and downhill cyclists), and clearer road use for people driving. Other reasons were that it was workable and efficient.

Every group prioritized safety, often identifying the need to ensure safety for specific groups, including pedestrians; cyclists; commercial loaders; rideshare customers; blind, deaf, and mobility-impaired people; and children getting to school.

Other common priorities were that the design be continuous, intuitive and legible for people biking as well as people walking and driving, and that there be a good, predictable traffic flow for all modes. Several groups emphasized the need for the new bike lanes to be usable and comfortable for people biking or using wheelchairs of all ages, physical abilities, and skill levels. Groups recognized business needs and especially called out the need for adequate and dependable loading zones, and for good customer access.

We asked groups to consider **how to use the street space** to meet everyone's needs. Several groups recommended locating loading zones on side streets rather than on Pike Street itself; some wanted three-minute loading zones on each block to accommodate rideshare users and private pick-up/drop-off/unload. In addition, several groups recommended

- bike signals and clear signage;
- clearly marked (and, possibly, raised) crosswalks, with pedestrian-activated flashing lights or in-street LEDs at unsignalized intersections;
- parking spaces or loading zones buffering the uphill (south) bike lane (in a separated-lane scenario) because bikes travel more slowly uphill; and
- weaving travel lanes to accommodate center turn lanes and loading/parking in different places.

In order to avoid turning conflicts or confusion, groups recommended various solutions, including

- diverters across single lanes of side streets to restrict vehicle entry,
- alternating restricted left/no-right and right/no-left turn lanes,
- placement of a clear barrier (with parklets or trees) at bike lane transitions to make the intended route clear,
- prohibiting left vehicular turns at unsignalized intersections (in a two-way bikeway scenario), and
- left-turn pockets in both directions at signalized intersections and bike boxes.

One group proposed a center turn lane throughout the corridor that could be used for turns, loading and unloading commercial vehicles, and passing vehicles stopped in the travel lanes for passenger load/unload.

Areas where groups identified **unresolved issues** were largely related to pedestrian safety; conflicts and confusion when turning (for people biking, walking, and driving); access to parking for disabled people; speed differentials; and potential confusion about the configuration. Some groups expressed concern that they didn't know how much street parking was actually necessary or where it might best be located.

We asked what key messages participants would offer decision makers. Several groups wanted the Pike Pine Renaissance configuration to continue all the way to Broadway, with an eastbound bike lane on Pike and westbound on Pine. If that proves impossible, they wanted at least to keep the existing painted lanes on Pine in addition to protected lanes on Pike.



Small groups, led by trained volunteer facilitators, had engaged, constructive discussions about the challenges of ensuring safety for people biking and walking, providing loading zones for businesses and residents, and incorporating center turn lanes.

Groups asked City planners and leaders to think big, act boldly, follow international best practices, and communicate the benefits and reasoning of their plans to the business community and the broader community. One group noted that if bike lanes are not intuitive, people will behave more unpredictably. In planning for the future, groups had climate change and growth in mind, asking the City to help reduce dependence and prioritization of private automobiles and provide more options—including during the "Period of Maximum Constraint," or "Seattle Squeeze." They also emphasized that all phases—temporary and permanent—need to provide a safe, continuous bike route.

A participant who gained an appreciation at the workshop for what goes into designing a street said, "I think we learned tonight that the city's got a tough job. And once they make decisions, maybe we'll all be a little more accepting of what they come up with."

Maps and worksheets for each table are in Appendix B.

Community Survey

To broaden our community outreach and engage with a more diverse pool of stakeholders, we created an online survey, replicating the questions workshop participants were asked and the information they were provided. 436 people completed the survey, with 22.1 percent opting just to provide their top priorities and overall thoughts, and 77.9 percent choosing to dive more deeply into design considerations.

A wide range of perspectives were represented in the survey, and it clearly reached more people than a workshop could include. However, much of the value of the workshop came from the face-to-face conversations people had with each other. While most survey respondents were constructive and appropriate, the online approach led to a few rants, insults, and generally unproductive comments. As we noted earlier, the workshop provided much more opportunity for meaningful dialogue and mutual understanding among stakeholders. However, the survey made it possible for more people to share their concerns.

Who responded?

We asked survey respondents how they interact with the corridor: approximately 90% walk in or through the corridor, 73% bike, nearly 70% use transit, nearly 50% drive or ride in private vehicles, and 0.7% use wheelchairs. Just over 5% of respondents are business owners, 36% reside in the corridor, nearly 22% work in the corridor, and 4.5% are students. 62% of respondents shop on Pike and Pine; 71% eat in restaurants and cafes on the corridor. Two respondents said they are blind; one is deaf.

Though we heard from people across age groups, races, incomes, and genders, survey respondents were overwhelmingly white, male, and high income earners. More than 75% of respondents were white, 60% of respondents were male, and 55% have household incomes in excess of \$75,000 a year. (Detailed demographic breakdowns are included in Appendix C.)

Top priorities

We asked each respondent to identify their top priority for the corridor. Three priorities were overwhelmingly chosen by respondents: 49.5% prioritized an intuitive, continuous bike route; 20.6% chose pedestrian safety and comfort, and 20.2% opted for a clear and predictable traffic flow for all users. 6.4% prioritized preservation of street parking, and 0.9% chose either ample and convenient loading zones for businesses or safe and convenient passenger pickup/drop off areas.

Alignment preferences

As with workshop participants, survey respondents were divided about preferred alignments, though many volunteered that they would like to see the Pike Pine Renaissance treatment extended all the way to Broadway, with a continuous east-bound bike lane on Pike and a continuous westbound lane on Pine.

Given the two Pike Street configurations, 51% preferred a two-way bikeway on the north side of Pike. Notably, 66% of them said they preferred that alignment because they were concerned about a transition for eastbound riders at Pike and Minor in the other configuration.

No consensus emerged about the optimal transition street between Pike and Pine for westbound riders. There were many different opinions about which street to use, and even more reasons for the selection. Over all, though, the theme was that it should be a logical transition point for people biking, have little vehicle traffic if possible, and not impede business loading needs.

Street uses

Only 21% of survey respondents use loading zones, but they use them in many ways. They reported dropping people off, loading goods in and out of cars, picking up takeout, entering and exiting rideshare vehicles, and receiving business deliveries. Opinions differed about where loading zones were needed, but generally it was clear they need to provide access to residential buildings, retail shops, restaurants, and other businesses.

We asked where center turn lanes are needed. The most common responses were "None," "Bellevue," and "Broadway." At Bellevue, many people highlighted the need for buses to turn left from eastbound Pike to northbound Bellevue and for school buses and drivers to access Northwest School by turning left from westbound Pike to southbound Bellevue.

When asked how to balance the needs of the street, the most common responses were less parking, pedestrian safety, bicyclist safety, and loading zones. Safety for people walking, rolling, and biking was a clear theme among the responses, with specific suggestions for safe bike lanes, wider sidewalks, more crosswalks, and signals and stop signs.

Intersection safety

Generally, respondents saw the need for safety improvements throughout the corridor, with 54 people saying they had concerns about safety at every intersection. Boren, a high-traffic arterial with freeway on-ramps, was also a major concern for respondents, specifically at its intersections with Pike and Pine. Intersections with Melrose were also areas of concern. Generally, respondents were less concerned about intersections further east from I-5, except for the intersection of Pike and Broadway.

The most popular overall safety intervention suggested was to install turn signals for both bikes and general purpose traffic, especially at intersections at Melrose and Broadway. People asked for protected bike lanes, curb bulbs, banned right-turns on red, protected intersections, and loading zones. Notably, suggestions for Melrose & Pike as well as unsignalized intersections included signalization, signal timing, or rectangular rapid flash beacons (RRFB) to help pedestrians cross the street.

See Appendix C for more detailed survey results and analysis, including key messages for decision-makers.

Business Outreach

The Pike/Pine corridor is such a walkable route and beloved corridor in large part because of its thriving retail district. Business owners have unique concerns, and are often understandably wary about any changes to the ways customers might access their businesses, especially if they operate with a narrow profit margin. We know that in many cities, protected bike lanes have increased business profits because they can make the street safer and more pleasant for people biking, people walking, and even people driving. Even so, the street design must accommodate the delivery needs of businesses in order to perform well. Additionally, in a retail district like the Pike/Pine corridor, a large percentage of business is foot traffic, so business owners want to ensure that any changes to the street enhance, rather than compromise, the experience for people walking in the area.

We talked with business workers, managers, and owners through preliminary outreach in 2017. In the fall of 2018, community volunteers spoke with people at 76 businesses in the corridor asking more specific questions to learn more about their needs so we could advocate for a design that serves them and their customers well. We invited business owners and employees to our workshop, and we left invitations at businesses where we weren't able to talk with anyone. Volunteers continued to reach out to businesses over the next few weeks, though due to time constraints, those efforts were primarily to encourage owners to attend the workshop.

Though our primary outreach was on a weekend day, at 30 businesses, we had the opportunity to talk with owners and managers who had the authority to speak for the store. Generally, business owners, managers, and employees were supportive of improvements to street safety. Many workers walk, bike, and use transit to get to work.

Based on what he heard from businesses, we recommend the City:

Improve loading zone distribution and access.

In many cases, we heard that it's currently challenging for delivery trucks to load and unload because loading zones are not enforced, not convenient, or are in great demand.

Identify available public parking and advertise it.

A few businesses require customer parking due to the regional nature of their business or their clientele (such as seniors), but most weren't very concerned about losing parking. We encourage the Office of Economic Development to work with the local business district to identify and publicize hourly off-street parking options open to the general public, and the City should consider the availability of these options when designing the street.

Create designated ride-hailing pick-up and drop-off locations.

We heard from several businesses that the streets are chaotic and unsafe due to unpredictable ride-hailing service (Uber and Lyft) drivers. We encourage the City to work with ride-hailing companies to use three-minute loading zones or other designated drop-off and pick-up locations.

Install a full traffic signal at Pike and Melrose.

We heard numerous concerns about confusion and hazards related to the pedestrian half-signal at Pike and Melrose. Several people, especially in the Melrose Market area, strongly desired that signal be changed to a full traffic signal.

Outreach to the Disability Community

In recognition of the fact that blind people, deaf people, and people with mobility challenges have specific needs and concerns related to the street, we solicited input directly from those communities. We were most successful with our outreach to the blind community, and we also heard from some wheelchair users, but we lack good input from the deaf community thus far.

At a National Federation for the Blind, Seattle Chapter, meeting, members of the blind community told us it's most important that a street design be legible—and that it not change unexpectedly halfway up the street. For that reason, they prefer bike lanes on different sides of the street, moving with the direction of general traffic; they don't know to listen for people coming from the opposite direction when they're crossing the street.

The blind community also voiced strong frustration about people biking on sidewalks, and about bike share bikes cluttering up the walkway and curb ramps, providing real hazards. Their hope is that people will feel safer with protected bike lanes, using them instead of the sidewalk.

From wheelchair users, we heard excitement that wheelchairs can use the protected bike lanes, because those lanes are often much smoother than Seattle's cracked, uplifted, and crumbling sidewalks. Concerns we heard were about safety at intersections, appropriately located curb ramps, and sufficient convenient loading zones for people with disabilities to access businesses and residences.

A strong community effort

Central Seattle Greenways, Seattle Neighborhood Greenways, the Capitol Hill EcoDistrict, and Capitol Hill Housing partnered in much of this outreach, supported by the Capitol Hill Community Council, the Greater Seattle Business Association (GSBA), Feet First, Pike Pine Urban Neighborhood Council (P/PUNC), Cascade Bicycle Club, and many, many fabulous volunteers.

In developing the workshop and spreading the word, we were assisted by Advisory Group members Chip Ragen (local commercial property and business owner), Vicky Clarke (Cascade Bicycle Club), Meg Wade (350 Seattle), Liz Dunn (local commercial property owner and developer), Jeff Keever (Seattle Central College), Jenny Schmitz (advocate for the disabled community), Matt Landers (GSBA), Peggy Martinez (advocate for the disabled community), and Jesse Simpson (Capitol Hill Renter Initiative).

Pike/Pine Protected Bike Lanes Outreach Summary and Recommendations Appendices

Appendix A Background and options presented at workshop and in survey

Appendix B Community workshop maps and worksheets

Appendix C Survey results

Pike/Pine Protected Bike Lanes Outreach Summary and Recommendations Appendix A: Background and options presented at workshop and in survey.

Background

The City of Seattle will install temporary protected bike lanes in the Pike/Pine corridor between First Ave and Broadway E by the end of 2019.

- There are already protected bike lanes between 2nd and 6th Avenues.
- Between 6th Ave and Melrose Ave, the City will install temporary lanes, likely to change due to construction impacts on the streets while the Convention Center Addition is built.
- Between Melrose Ave and Broadway E, we expect the design to be permanent, though the lanes will originally be separated by paint and posts. They'll receive an aesthetic upgrade a little later. [Note: After hearing from the community, we now urge the City to study converting the streets to one-way streets.]
- Permanent lanes will be installed along with the rest of the Pike Pine Renaissance plan within a few years.

The Pike Pine Renaissance: Act One plan redesigns the Pike/Pine corridor between First Ave and Melrose Ave (or Bellevue Ave) with an emphasis on pedestrian comfort and placemaking. The one-way streets extend up to Melrose Ave (or Bellevue Ave), and include one-way protected bike lanes on the left side of the street. (That is, the westbound lane on Pine is on the south side of the street, and the eastbound lane on Pike is on the north side of the street.) To learn more about the Pike Pine Renaissance plan, visit https://waterfrontseattle.org/pike-pine.

Alignment options

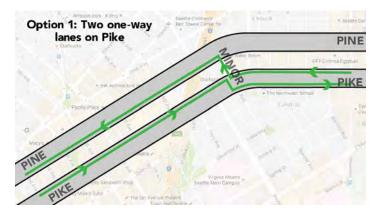
The Pike Pine Renaissance bike lanes end where our focus area begins. This challenge is how to connect the lanes between Melrose Ave and Broadway E.

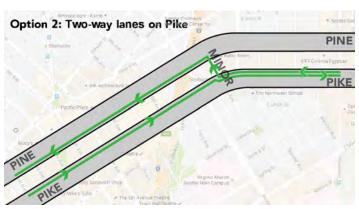
The City has considered making Pike and Pine one-way all the way to Broadway. But currently, eastbound buses move from Pike to Pine at Bellevue Ave. Making Pike and Pine one-way all the way to Broadway would require buses to travel eastbound on Pike past Bellevue, which would require moving or adding trolley wires to Pike, and we were told that was unlikely to happen. As a two-way street, Pine has many bus stops on both sides of the street, making it challenging to fit a protected bike lane.

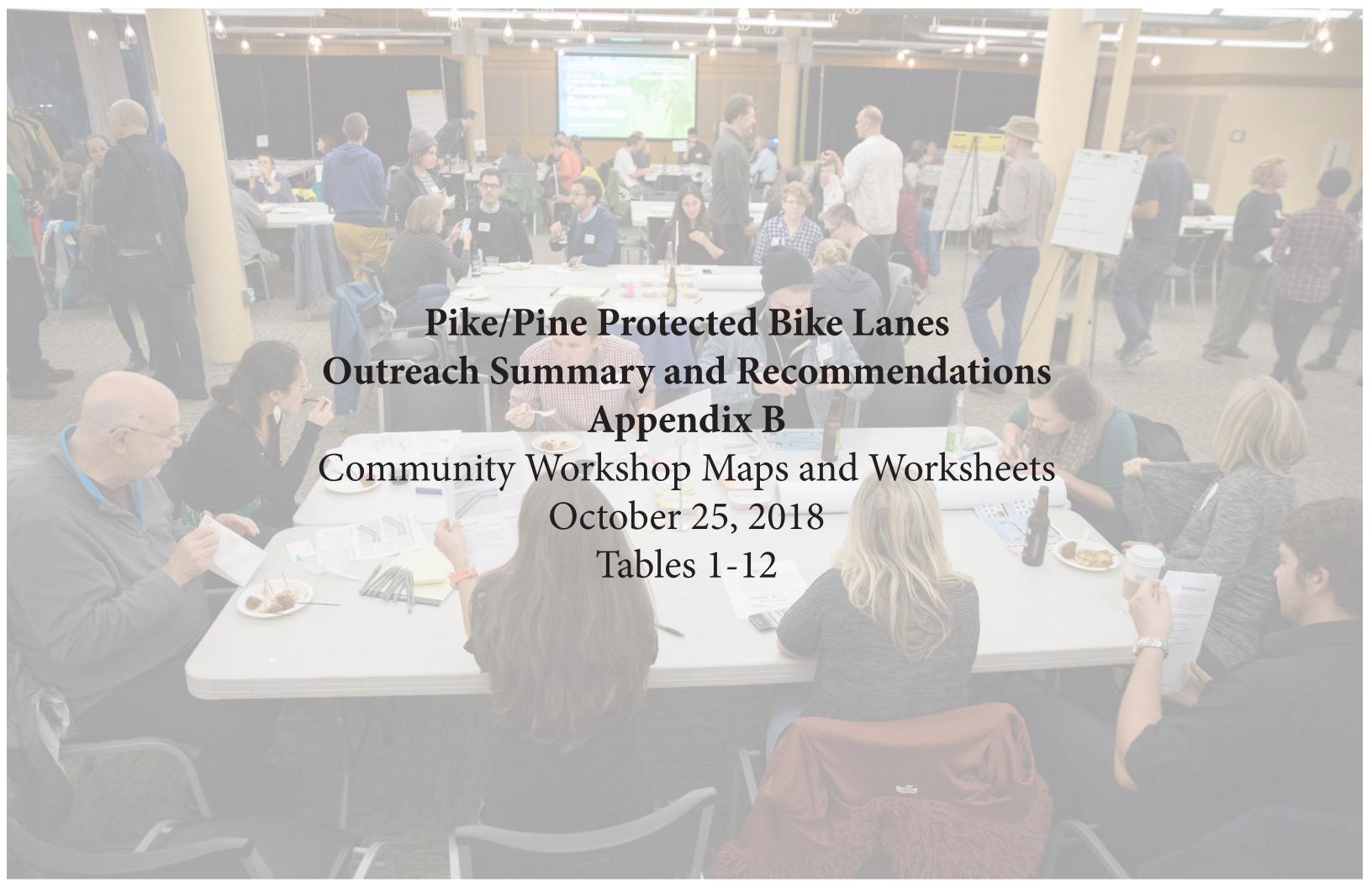
Therefore, we've been informed that the City is most likely to install protected bike lanes on Pike between Melrose and Broadway. Those might be one-way lanes traveling in the direction of traffic on either side of the street (Option 1 below) or a two-way protected bike lane on the north side of the street (Option 2), similar to the protected bike lanes on Broadway.

Generally, single-direction protected bike lanes traveling in the direction of traffic are easier for people biking, people driving, and people walking to understand, especially at intersections. However, in this case, moving eastbound bikes from the north side of Pike to the south side when the street changes from a one-way street to a two-way street will be challenging. While a two-way protected bike lane can be more confusing — and there is a slight incline between Belmont and Melrose so there would also be people moving faster downhill next to people biking more slowly uphill — it would be much easier to move bikes from the north side of Pike at Melrose to the two-way protected bike lanes on the north side of Pike east of Melrose.

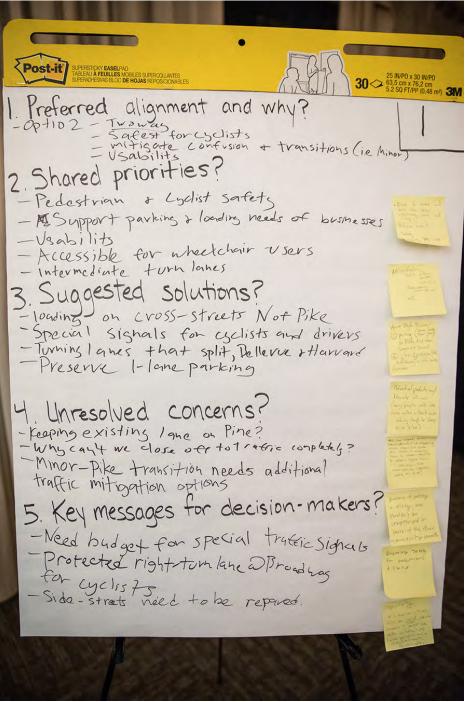
The westbound protected bike lane would need to move from Pike to Pine to continue downtown, most likely on Bellevue Ave, Minor Ave, or Melrose Ave.











1. Preferred alignment and why?

Option 2 –Two-way
Safest for cyclists
Mitigate confusion and transitions (i.e., Minor)
Usability

2. Shared priorities?

Pedestrian and cyclist safety
Support parking and loading needs of businesses
Usability
Accessible for wheelchair users
Intermediate turn lanes

3. Suggested solutions?

Loading on cross streets, not Pike Special signals for cyclists and drivers Turning lanes that split, Bellevue and Harvard Preserve one lane parking

4. Unresolved concerns?

Keeping existing lane on Pine?
Why can't we close off to traffic completely?
Minor–Pike transition needs additional traffic mitigation options

5. Key messages for decisionmakers?

Need budget for special traffic signals

Protected right-turn lane at Broadway for cyclists

Side streets need to be repaved.

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

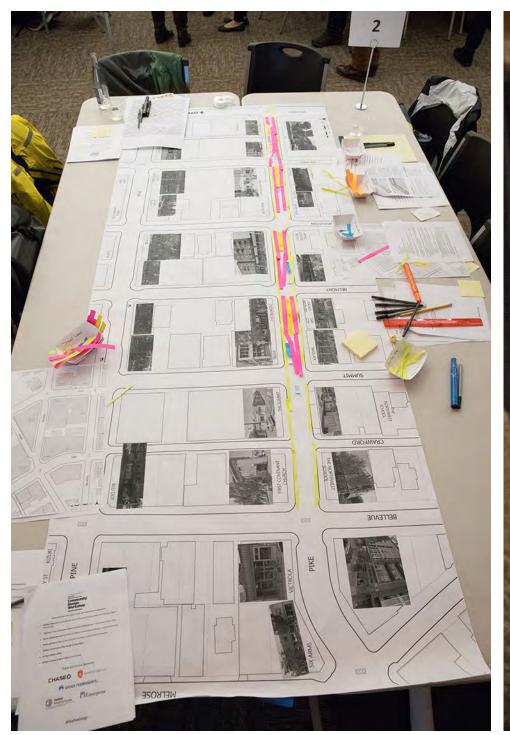
Hot pink: Travel lanes

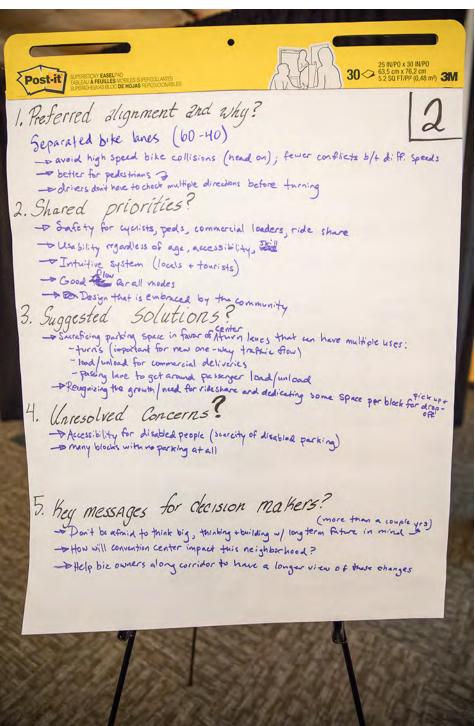
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

Separated bike lanes (60–40)

Avoid high-speed bike collisions (head-on), fewer conflicts between different speeds Better for pedestrians

Drivers don't have to check multiple directions before turning

2. Shared priorities?

Safety for cyclists, peds, commercial loaders, ride share

Usability regardless of age, accessibility, skill

Intuitive system (locals and tourists)

Good flow for all modes

Design that is embraced by the community

3. Suggested solutions?

Sacrificing parking space in favor of center turn lanes that can have multiple uses:

- turns (important for new one-way traffic flow)
- load/unload for commercial deliveries
- passing lane to get around passenger load/unload

Recognizing the growth/need for rideshare and dedicating some space per block for pick-up and drop-off

4. Unresolved concerns?

Accessibility for disabled people (scarcity of disabled parking)

Many blocks with no parking at all

5. Key messages for decisionmakers?

Don't be afraid to think big, thinking and building with longterm future in mind (more than a couple of years)

How will convention center impact this neighborhood?

Help biz owners along corridor to have a larger view of these changes.

Factors during WSCC construction (from second page)

Safe cycle paths through construction zone for entire duration of project. Safety requirements don't pause. We'll still be in the Period of Maximum Constraint and need to prioritize modes that reduce SOV traffic. More options!

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Hot pink: Travel lanes

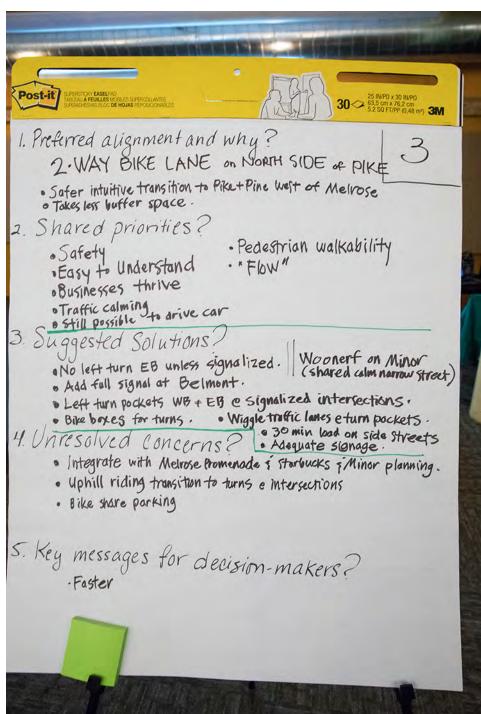
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

2-way bike lane on north side of Pike Safer intuitive transition to Pike and Pine west of Melrose Takes less buffer space

2. Shared priorities?

Safety

Easy to understand

Businesses thrive

Traffic calming

Still possible to drive a car

Pedestrian walkability

"Flow"

3. Suggested solutions?

No left turn eastbound unless signalized

Add full signal at Belmont

Left turn pockets westbound and eastbound at signalized intersections

Bike boxes for turns

Wiggle traffic lanes at turn pockets

30-min load on side streets

Adequate signage

Woonerf on Minor (shared calm narrow street)

4. Unresolved concerns?

Integrate with Melrose Promenade and Starbucks and Minor planning Uphill riding transition to turn at intersections Bike share parking

5. Key messages for decisionmakers?

Faster

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Orange: Parking spaces

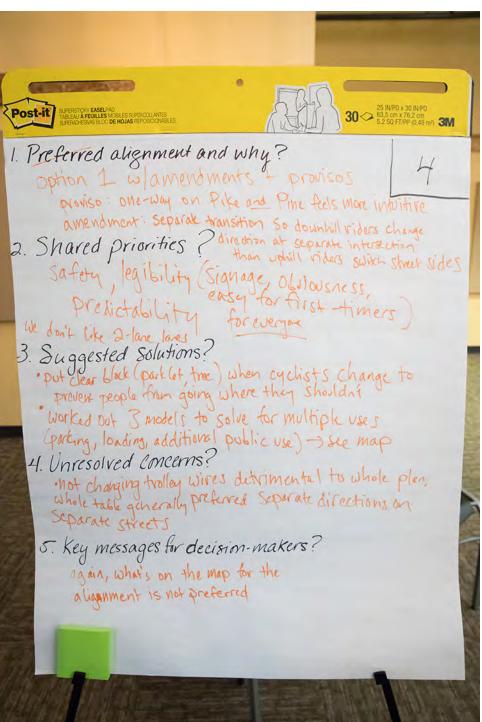
Hot pink: Travel lanes

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

Option 1 (one-way separate lanes) with amendments and provisos

Proviso—one-way on Pike and Pine feels more intuitive

Amendment—separate transition so downhill riders change direction at separate intersection than uphill riders switch street sides

2. Shared priorities?

Safet

Legibility (signage, obviousness, easy for first-timers)

Predictability for everyone

We don't like two-way bike lanes.

3. Suggested solutions?

Put clear block (parklet, tree) when cyclists change to prevent people from going where they shouldn't

Worked out three models to solve for multiple uses (parking, loading, additional public use) -> see map

4. Unresolved concerns?

Not changing trolley wires detrimental to whole plan Whole table generally preferred separate directions on separate streets

5. Key messages for decisionmakers?

Again, what's on the map for the alignment is not preferred.

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

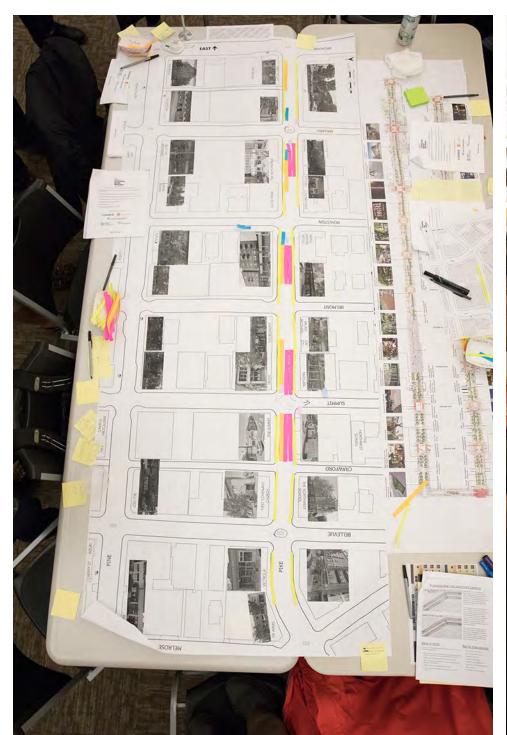
Hot pink: Travel lanes

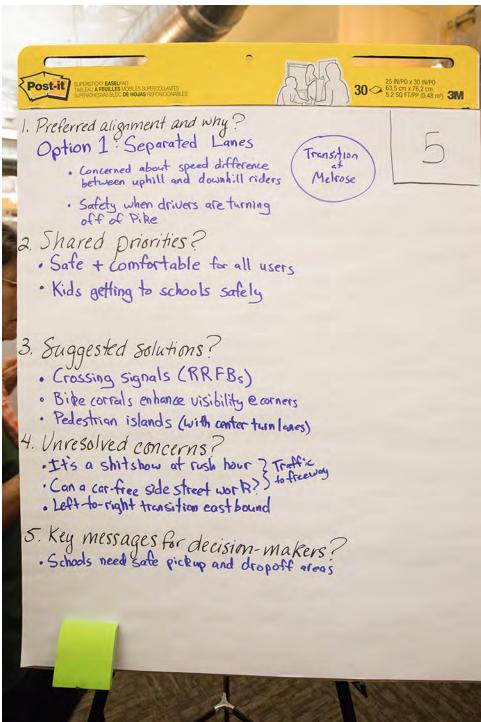
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

Option 1—Separated lanes

Concerned about speed difference between uphill and downhill riders

Safety when drivers are turning off Pike

Transition at Melrose

2. Shared priorities?

Safe and comfortable for all users Kids getting to schools safely

3. Suggested solutions?

Crossing signals (RRFBs)
Bike corrals enhance visibility at corners
Pedestrian islands (with center turn lanes)

4. Unresolved concerns?

It's a shitshow at rush hour—traffic to freeway
Can a car-free side street work?
Left-to-right transition eastbound

5. Key messages for decisionmakers?

Schools need safe pick-up and drop-off areas

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Hot pink: Travel lanes

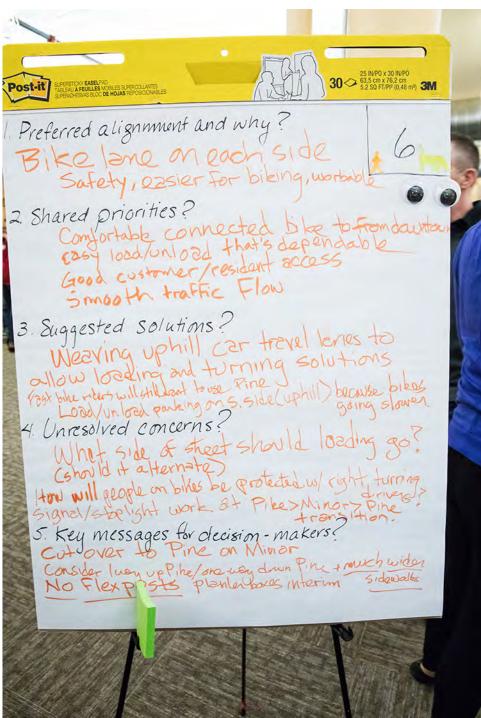
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Hot pink: Travel lanes

Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes

Lilac: Bike corrals or parklets

Table 6

1. Preferred alignment and why?

Bike lane on each side Safety, easier for biking, workable

2. Shared priorities?

Comfortable, connected bike to/from downtown Easy load/unload that's dependable Good customer/resident access Smooth traffic flow

3. Suggested solutions?

Weaving uphill car travel lanes to allow loading and turning solutions
Fast bike riders will still want to use Pine
Load/unload parking on south side (uphill) because bikes going slower

4. Unresolved concerns?

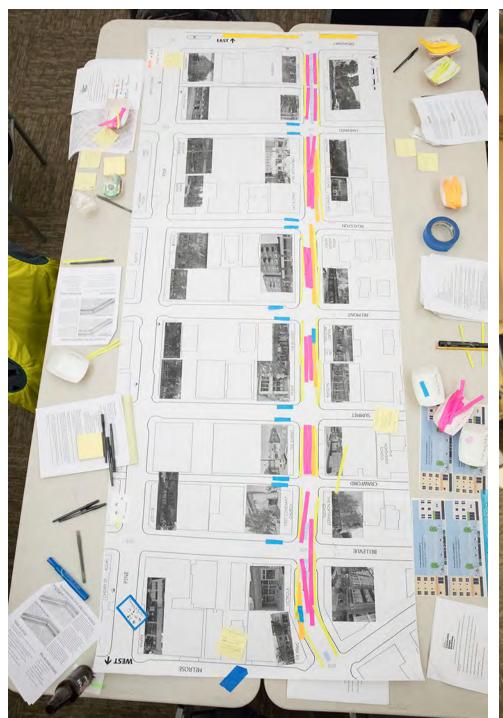
What side of street should loading go? (Should it alternate?)
How will people on bikes be protected by right-turning drivers?
Signal/stoplight work at Pike > Minor > Pine transition

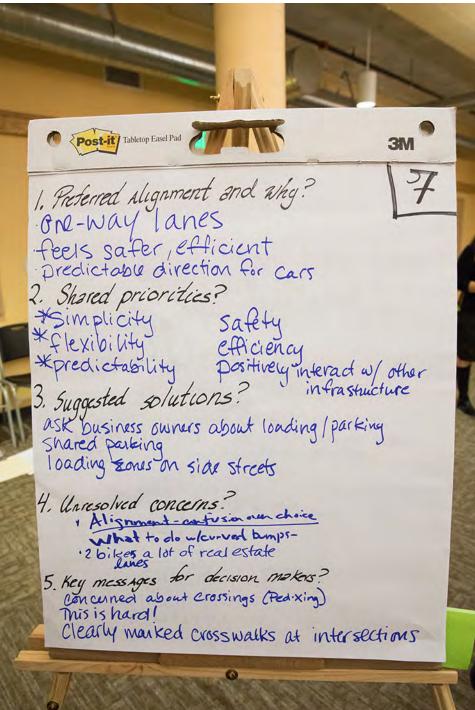
5. Key messages for decisionmakers?

Cut over to Pine on Minor

Consider one-way up Pike, one-way down Pine, and much wider sidewalks No flex posts

Planter boxes interim





1. Preferred alignment and why?

One-way lanes

Feels safer, efficient

Predictable direction for cars

2. Shared priorities?

Simplicity

Flexibility

Predictability

Safety

Efficiency

Positively interact with other infrastructure

3. Suggested solutions?

Ask business owners about loading/parking

Shared parking

Loading zones on side streets

4. Unresolved concerns?

Alignment—confusion over choice

What to do with curved bumps

Two bike lanes a lot of real estate

5. Key messages for decisionmakers?

Concerned about pedestrian crossings

This is hard!

Clearly marked crosswalks at intersections

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

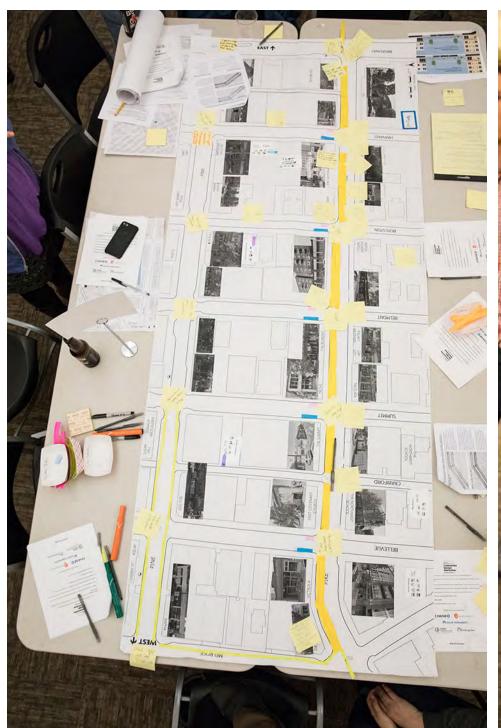
Hot pink: Travel lanes

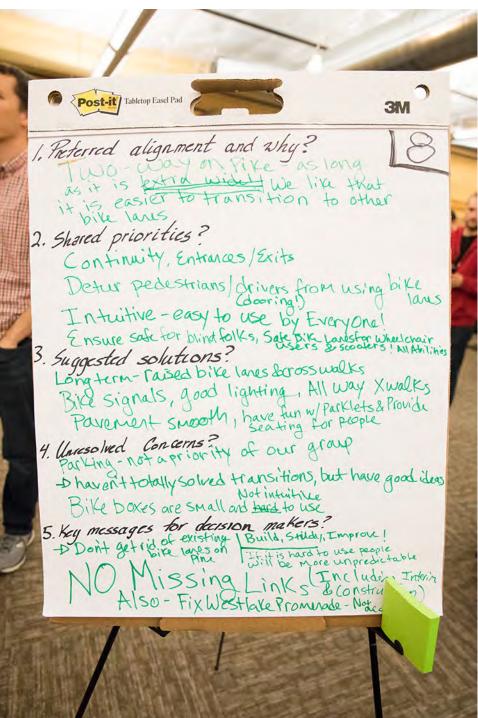
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

Two-way on Pike—as long as it is extra-wide. We like that it is easier to transition to other bike lanes.

2. Shared priorities?

Continuity; Entrances/exits

Deter pedestrians/drivers from using bike lanes (dooring!)

Intuitive—easy to use by everyone!

Ensure safe for blind folks, safe bike lanes for wheelchair users and scooters and all abilities.

3. Suggested solutions?

Longterm—raised bike lanes and crosswalks

Bike signals, good lighting, all-way crosswalks

Pavement smooth

Have fun with parklets and provide seating for people

4. Unresolved concerns?

Parking not a priority of our group

Haven't totally solved transitions but have good ideas

Bike boxes are small, not intuitive to use

5. Key messages for decisionmakers?

Don't get rid of existing bike lanes on Pine.

Build, study, improve!

If it is hard to use, people will be more unpredictable.

No missing links (including interim and constructions)

Also, fix Westlake Promenade—not acceptable

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Hot pink: Travel lanes

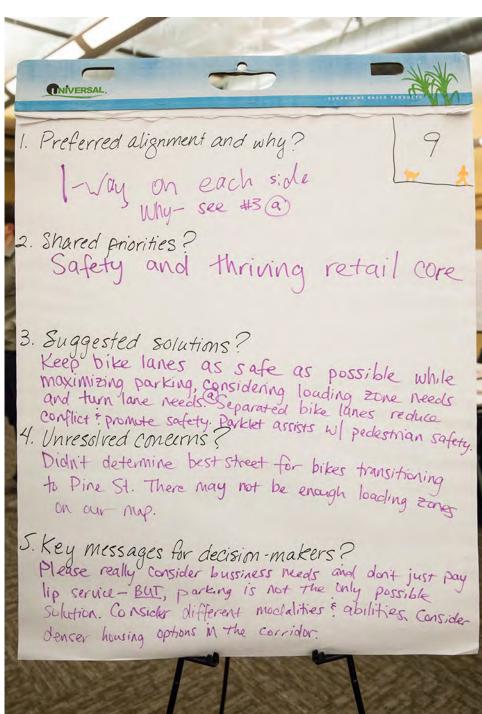
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

One-way on each side; for why, see #3.

2. Shared priorities?

Safety and thriving retail core

3. Suggested solutions?

Keep bike lanes as safe as possible while maximizing parking, considering loading zone needs, and turn lane needs.

Separated bike lanes reduce conflict and promote safety.

Parklet assists with pedestrian safety

4. Unresolved concerns?

Didn't determine best street for bikes transitioning to Pine Street There may not be enough loading zones on our map.

5. Key messages for decisionmakers?

Please really consider business needs and don't just pay lip service—BUT parking is not the only possible solution.

Consider different modalities and abilities.

Consider denser housing options in the corridor.

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

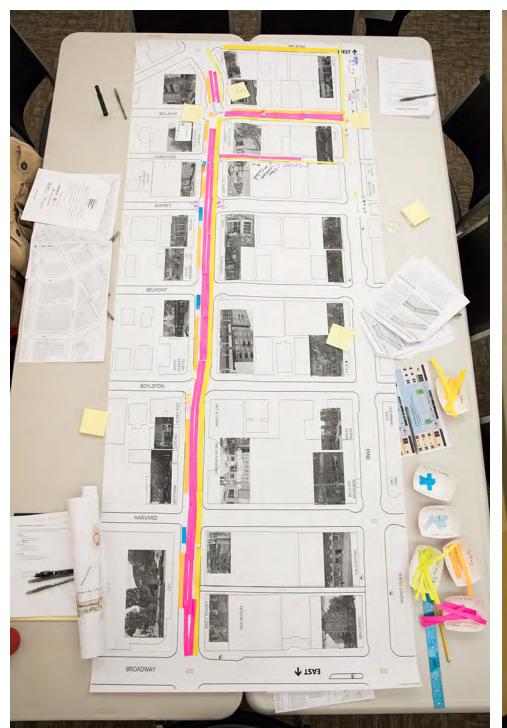
Hot pink: Travel lanes

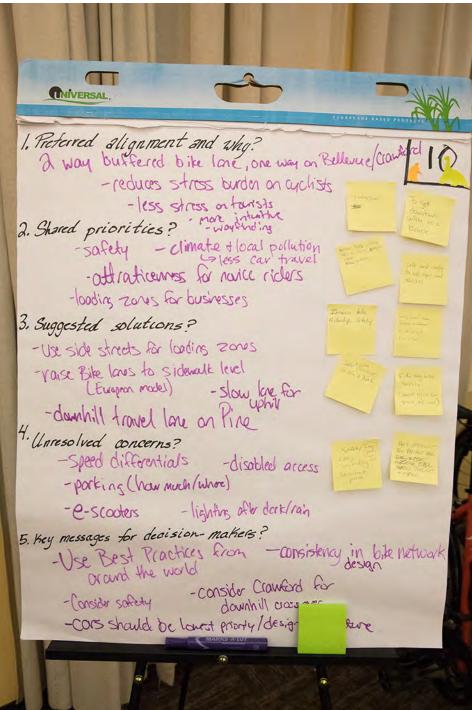
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

2-way buffered bike lane, one way on Bellevue/Crawford
Reduces stress burden on cyclists, less stress on tourists, more intuitive, wayfinding

2. Shared priorities?

Safety

Climate and local pollution -> less car travel
Attractiveness for novice riders

Loading zones for businesses

3. Suggested solutions?

Use side streets for loading zones.

Raise bike lanes to sidewalk level (European model).

Slow lane for uphill

Downhill travel lane on Pine

4. Unresolved concerns?

Speed differentials

Disabled access

Parking (how much/where)

E-scooters

Lighting after dark/rain

5. Key messages for decisionmakers?

Use best practices from around the world.

Consistency in bike network design

Consider safety.

Consider Crawford for downhill crossover

Cars should be lowest priority/design for future

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Hot pink: Travel lanes

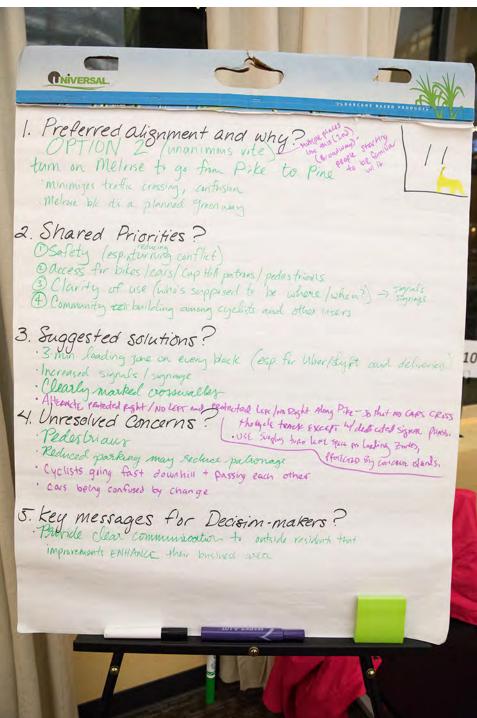
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

Option 2 (2-way on N side)—unanimous vote—multiple places like this (2nd, Broadway), people starting to be familiar with it

Turn on Melrose to go from Pike to Pine

- · minimizes traffic crossing, confusion
- Melrose because it's a planned greenway

2. Shared priorities?

- 1 Safety, especially reducing turning conflicts
- 2 Access for bikes/cars/Capitol Hill patrons/pedestrians
- 3 Clarity of use (who's supposed to be where/when?)—signals, signage
- 4 Community building among cyclists and other users

3. Suggested solutions?

3-minute loading zone on every block (esp for Uber/Lyft and deliveries)

Increased signals/signage

Clearly marked crosswalks

Alternate restricted right/no left and protected left/no right along Pike—so that no cars cross the cycle track except with dedicated signage please.

Use surplus turn lane space for loading zones protected by concrete islands.

4. Unresolved concerns?

Pedestrians

Reduced parking may reduce patronage

Cyclists going fast downhill and passing each other

Cars being confused by changes

5. Key messages for decisionmakers?

Provide clear communication to outside residents that improvements ENHANCE their business area.

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

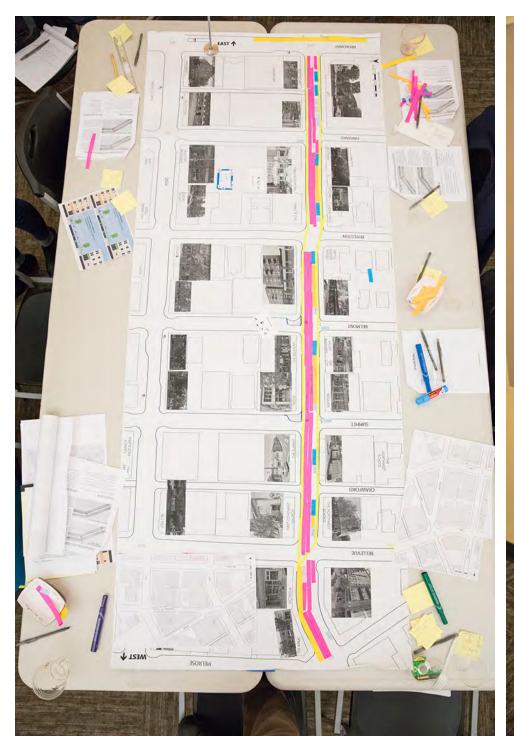
Hot pink: Travel lanes

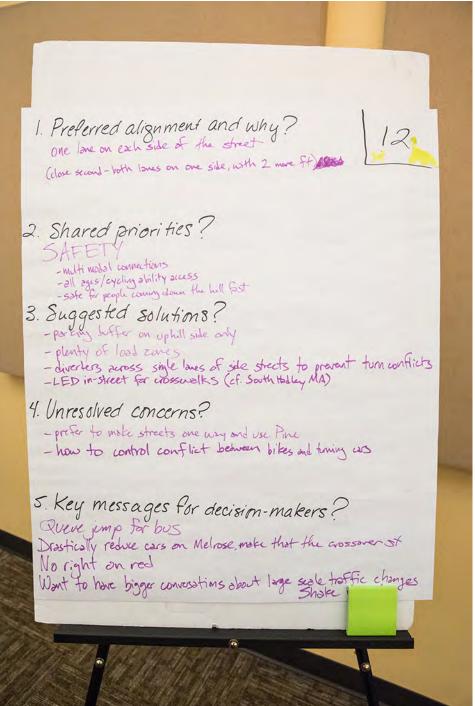
Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes





1. Preferred alignment and why?

One lane on each side of the street (close second - both lanes on one side with two more feet)

2. Shared priorities?

SAFETY

Multimodal connections

All ages/cycling ability access

Safe for people coming down the hill fast

3. Suggested solutions?

Parking buffer on uphill side only

Plenty of load zones

Diverters across single lanes of side streets to prevent turn conflicts

LED in street for crosswalks (cf. South Hadley MA)

4. Unresolved concerns?

Prefer to make streets one-way and use Pine

How to control conflict between bikes and turning cars

5. Key messages for decisionmakers?

Queue jump for bus

Drastically reduce cars on Melrose and make that the crossover street

No right on red

Want to have bigger conversations about large-scale traffic changes. Shake it up.

Key to map pieces

Yellow-green: One-way bike lanes

Yellow: Two-way bike lanes

Hot pink: Travel lanes

Orange: Parking spaces

White: 3-minute loading zones

Turquoise: 30-minute loading zones

Blue: Turn lanes

Pike/Pine Protected Bike Lanes Outreach Summary and Recommendations Appendix C—Survey Results

Between mid-November and December 31, 2018, 436 people completed the public online survey. Following are details of who they were and how they responded. Most of the questions were open-ended and respondents volunteered multiple answers, so in some cases, there are more responses than people who answered a question. Where each respondent had a single response, totals may add up to slightly over or under 100% due to rounding.

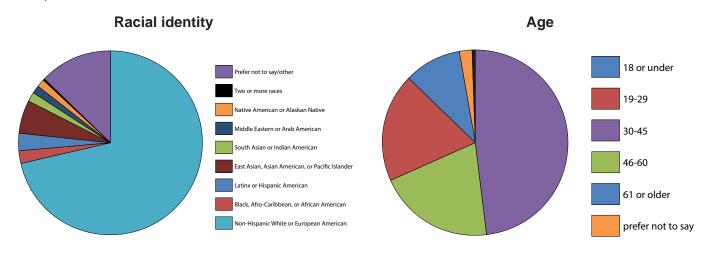
Demographics of respondents

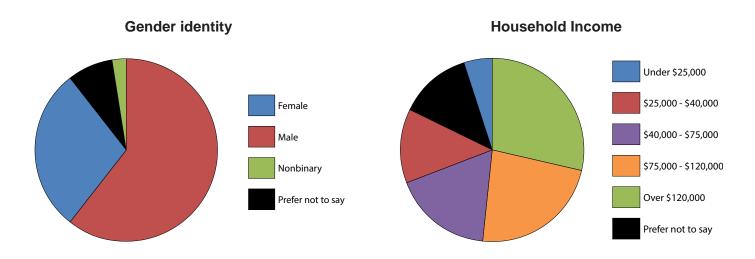
The majority of respondents identified as white (75.6%), but we heard from people who identified as Black (2.5%); Latinx (3.2%); East Asian, Asian American, or Pacific Islander (5.5%); South Asian or Indian American (1.7%); Middle Eastern or Arab American (1.5%); and Native American (1.5%) as well.

A wide variety of ages were represented among respondents, though nearly half were between 30 and 45 years old. The largest age group represented was 30-45 at 48.3%. 20.3% were 46-60, and 9.9% were 61 or older. 18.9% were 19-29, .5% were under 18, and the rest preferred not to say.

60.8% of respondents were male, 28.9% female, 2.5% nonbinary, and the rest preferred not to say.

5.1% of respondents had household incomes of less than \$25,000; 7.5% were between \$25,000 and \$40,000; 18.6% were between \$40,000 and \$75,000; 24.5% were between \$75K and \$120K, and 30.5% were over \$120K. The rest preferred not to say.

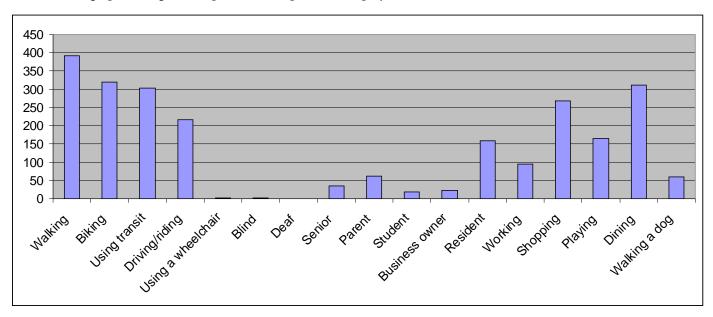




How respondents currently use Pike and Pine

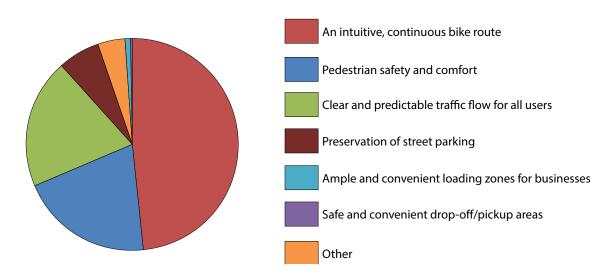
We asked survey respondents all the ways they currently interact with the Pike/Pine corridor. Nearly everyone walks; about 73% of survey respondents bike; nearly 70% use transit, and nearly 50% drive or ride in a private vehicle.

22 respondents (5%) are business owners; 95 respondents (nearly 22%) work in the corridor; 158 people (36.2%) live in the corridor, and high percentages of respondents shop, dine, and play in the Pike/Pine corridor.



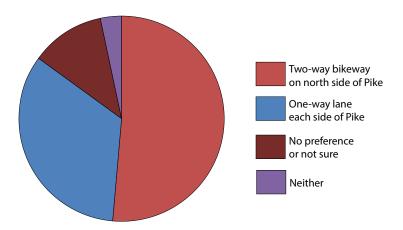
Top priorities

We asked each respondent to identify their top priority for the corridor. Three priorities were overwhelmingly chosen by respondents: 49.5% prioritized an intuitive, continuous bike route; 20.6% chose pedestrian safety and comfort, and 20.2% opted for a clear and predictable traffic flow for all users. 6.4% prioritized preservation of street parking, and 0.9% chose either ample and convenient loading zones for businesses or safe and convenient passenger pickup/drop off areas.



Alignment preferences

As with workshop participants, survey respondents were divided about preferred alignments, with 33.9% preferring one-way lanes on either side of Pike and 51.4% preferring two-way bike lanes on the north side of Pike. 11.6% found neither option acceptable, and 3.2% had no preference. Additionally, many volunteered that they would like to see the Pike Pine Renaissance treatment extended all the way to Broadway, with a continuous eastbound bike lane on Pike and a continuous westbound lane on Pine.

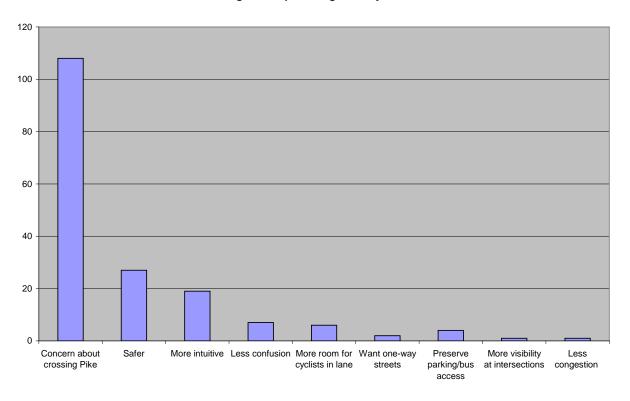


Given the two Pike Street configurations, most who preferred a two-way bikeway on the north side of Pike

did so because they were concerned about a transition for eastbound riders at Pike and Minor in the other configuration. Some respondents didn't want bike lanes on Pike at all, and we heard from some people who bike who find protected bike lanes limiting or less safe than biking in the general purpose lane or who prefer the current painted lanes on Pine. Many respondents offered more than one reason for their preferences.

Of those preferring two-way lanes on the north side of Pike, 66% said they were concerned about eastbound riders crossing Pike at Melrose, as would be necessary with one-way lanes on each side of Pike. 16.5% who chose this option said the two-way lanes are safer, and 12% find them more intuitive.

Reasons given for preferring two-way bike lanes



Of those who preferred one-way lanes on either side of Pike, 51% thought they'd be safer, 42% found them more intuitive, 33.3% believed they'd cause less confusion, and 23% were concerned about the grade and speed differential between uphill and downhill riders in two-way lanes.

50 40 20

Reasons given for preferring one-way lanes

Crossover street preferences

Concern about

grade/speed

differential

10

330 survey respondents responded to the question regarding where a westbound bike lane on Pike should cross over to Pine to continue in the westbound lane constructed as part of the Pike Pine Renaissance plan. Many respondents indicated multiple preferences, resulting in 540 answers for the location of the transition.

Want one-way

More intuitive

Better connection to

Frist Hill

The most popular choice was Minor, with 189 responses compared to 152 for Bellevue and 102 for Melrose. 83 people either had no preference or selected a different street, and eight people expressed a general preference for whichever street is safest or has the least traffic.

Less confusion

More room for

Minor is a small street that runs diagonally from Melrose (near the intersection with Pike) to Pine. It has a relatively steep grade downhill from Pike to Pine and a narrow right of way, but has little traffic and is the most direct, shortest connection.

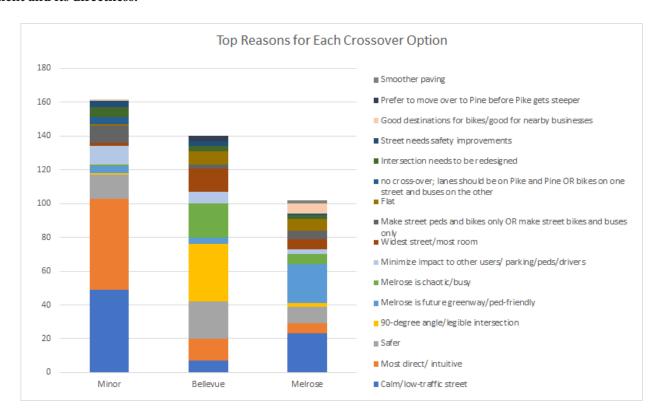
Respondents also provided the reasoning behind their preferences, most commonly saying that their preferred street is a calm, low-traffic street (82 responses). The most direct or most intuitive street was cited 74 times, and safety was explicitly cited 46 times. Other reasons cited included the presence of 90-degree intersections (more legible), Melrose's future status as a greenway, Melrose's chaotic current status, the desire to minimize impacts on deliveries, and a desire for a wide street with the most room.



Safer

Each street offers some advantages, as shown in the specific reasons associated with each. Minor was prized for its directness, and low traffic levels, while those who preferred Bellevue valued its legibility, width, less chaotic nature (in contrast to Melrose), and flatness. Melrose fell somewhere in between these two extremes, but many respondents valued its presumed

future status as a greenway with traffic calming infrastructure improvements and connection to the rest of the Melrose Promenade. For many people, Minor represented the best option for its combination of a low-traffic riding environment and its directness.

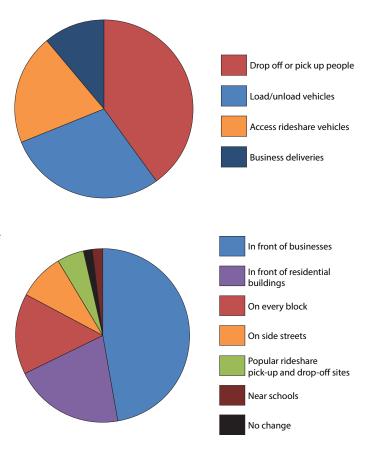


Loading zones

Only 21% of respondents use loading zones in the Pike/Pine corridor. For those who reported using them, loading zones meet a diverse set of needs in the corridor. Survey respondents use loadings zones in many ways, ranging from dropping off people, to loading goods in and out of cars, to entering and exiting rideshare vehicles. From the responses, it's clear that loading zones play an important role in the health and vitality of this corridor for residents, business owners, and those that visit the corridor.

Understandably, most respondents who don't use loading zones didn't have an opinion about where they should be located. With that said, 18 percent of respondents offered up useful suggestions, which reflect mixed opinions about where loading zones would be most useful.

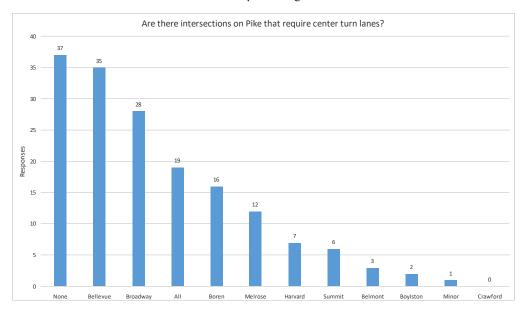
Respondents generally felt that the loading zones should be located near existing amenities in the area, whether that be in front of businesses, residential buildings, or schools in the corridor. Others felt strongly that loading zones should be located on side streets, rather than Pike or Pine. Business owners who responded rely heavily on the loading zones—customers use them to pick up goods such as takeout, and suppliers use them to drop off goods and services for the businesses in the corridor.



People who frequent local businesses, including one respondent who visits a local yoga studio, use the loading zones when they get dropped off. Even respondents who felt that "cars have no place in this busy, urban environment" acknowledged the role loading zones play in a thriving business district, suggesting that loading zones "be limited to business delivery" and that "if there weren't loading zones, I would not use or patronize those stores." In responding to these questions, some respondents reflected the increasing demand that rideshare vehicles and package deliveries are placing on the limited right-of-way space and urged designers to consider these needs in properly locating loading zones such that delivery trucks and rideshare vehicles don't park on sidewalks or block future bike lanes.

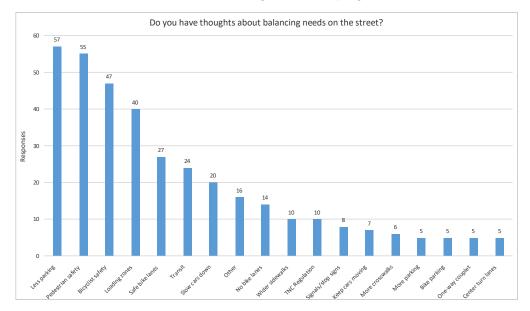
Center turn lanes

We asked whether there are intersections on Pike that require center turn lanes. Most survey respondents (73%) chose not to answer the question or didn't have an opinion. The most common responses were "None," "Bellevue," and "Broadway." At Bellevue, many people highlighted the need for buses to turn left from eastbound Pike to northbound Bellevue and for school buses and drivers to access Northwest School by turning left from westbound Pike to southbound Bellevue.

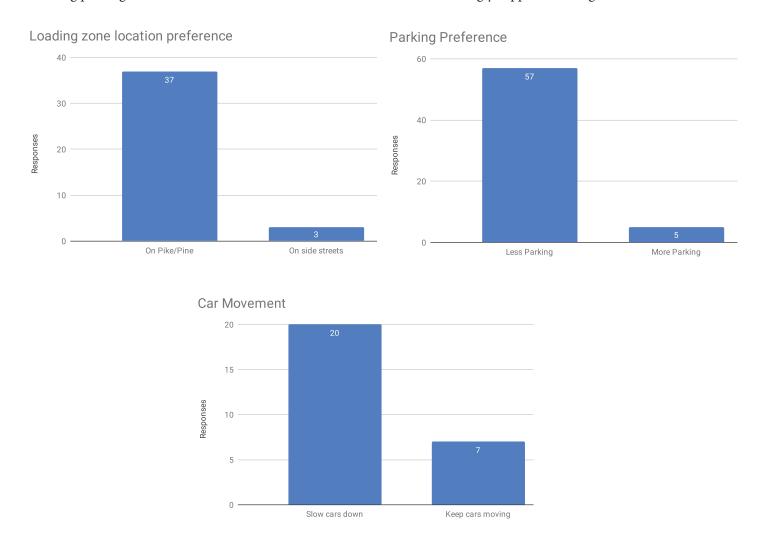


Balancing needs

We asked about thoughts on balancing the needs on the street more generally. Most survey respondents (60%) chose not to answer this question. The most common responses were for less parking, pedestrian safety, bicyclist safety, and loading zones. Safety for people walking, rolling, and biking was a clear theme among the responses, with specific suggestions for safe bike lanes, wider sidewalks, more crosswalks, and signals and stop signs.



Respondents clearly preferred to place loading zones directly on Pike and Pine rather than on side streets. Many responses conflicted with each other, but showed clear preferences overall. For example, respondents overwhelming supported removing parking from Pike and Pine to accommodate other needs, and strongly supported changes to slow cars down.

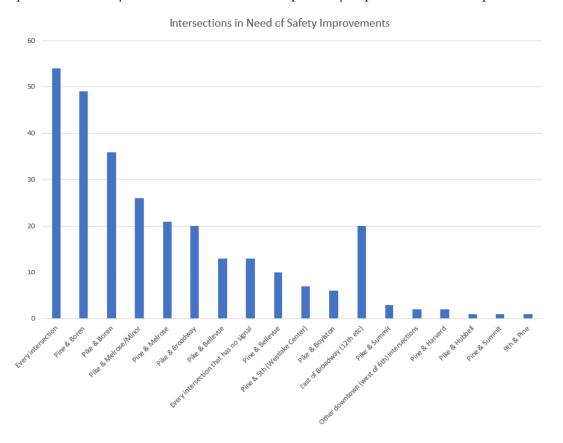


Several people offered thoughtful responses about balancing needs in the right of way, including these representative quotes:

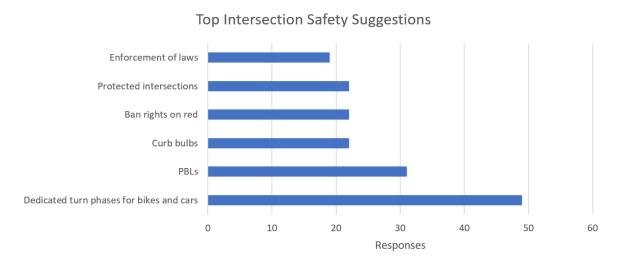
- "Balancing needs is about more than throughput. It's also about understanding how Pike/Pine contributes to the overall health (safety, transportation options, environmental sustainability, and social cohesion) of the surrounding community, from Capitol Hill to its connected neighborhoods."
- "Center turns lanes are informally used as loading zones. Can we formalize this and free up more space along the curb for other uses?"
- "I would love to commute by bike to and from my job downtown, but I've been dissuaded from attempting to bike up Capitol Hill yet because of 1) the slope and 2) the lack of separation from car traffic. I'm hoping some of the new electric bike share bikes will give me enough power to climb the slope; I'm also hoping the new street design will better separate cyclists from car traffic. (I occasionally bike down this way but the lack of separation from car traffic also usually dissuades me, and I never bike to work because the 4th Ave protected bike lane does not exist yet.) The bike lanes should provide enough tolerance (either through wide marked lanes or at least by not using delineator posts between marked bike lanes as done on 2nd Ave) to allow wider cycles (tricycles, cargo bikes, side-by-side tandems) to travel comfortably."

Intersection Safety

Survey respondents expressed interest in a wide variety of safety improvements throughout the corridor. 190 respondents addressed this question, but many indicated the need for multiple safety improvements at multiple locations.

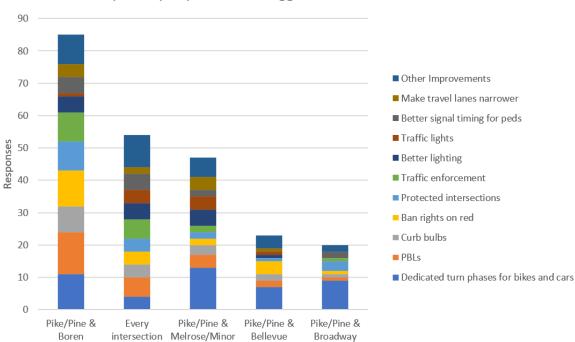


Generally, respondents saw the need for safety improvements throughout the corridor, with 54 people saying every intersection needed improvements. Boren, a high-traffic arterial with freeway on-ramps, was also a major concern; its intersections with Pine and Pike were mentioned 49 and 36 times respectively. Intersections with Melrose were also areas of concern. Generally, respondents had fewer concerns about intersections farther from I-5, except for the intersection of Pike and Broadway, which was the sixth most popular response.



The most popular overall safety intervention suggested was the installation of turn signals for both bikes and general purpose traffic. These were especially popular suggestions for intersections with Melrose and Broadway. Protected bike lanes (PBLs) were the second most popular intervention, followed by adding curb bulbs, banning right turns on red, creating protected intersections, and providing loading zones. Generally, the suggested improvements were fairly evenly spread among different locations, with a few exceptions. Suggestions for Melrose & Pike and every unsignalized intersec-

tion emphasized signalization, signal timing, or rectangular rapid flash beacons (RRFB) to help pedestrians cross the street. Meanwhile, several people requested dedicated turn signals at Pike & Broadway, and there were a number of requests for a protected intersection there, indicating concern about conflicts between turning movements of cars and bikes.



Top Safety Improvement Suggestions at Selected Intersections

Messages to decision-makers

Finally, we asked survey respondents if there were key messages they wanted to deliver to City planners and others who will make the final decision about the design. We provided all the original messages (and other survey results) to the Seattle Department of Transportation. The following quotes from the survey illustrate common themes and priorities:

- Think about what this corridor will be in 20-50 years, rather than being tied to what it has been for the past 100 years.
- The connections are as important as the routes themselves. Think about the beginnings and endings of bike and pedestrian routes especially.
- These streets serve many different users and purposes. Functionally, we should aim to create healthy interactions between the various users, keeping in mind that bicyclists tend to gain speed coming downhill.
- Please include some landscaping to soften the street.
- Keep bikes going in the same direction as cars. I'm an avid cyclist and do not like the Broadway bike lanes as they are confusing for cyclists and cars turning.
- Every city that has ever proposed removing parking spaces has been met with some pushback, but the benefits of ped/bike mobility and safety are continually borne out. Please don't let resistance slow down or compromise this project.
- Designing bike infrastructure for the comfort of drivers, business owners, and other disinterested parties only results in a bad biking environment with low usage.
- Safety for bikes and pedestrians. Speed control for cars. Bike lanes without "door zones."
- Pike and Pine should both be made one-way so that they can both become more multimodal.
- Design of pedestrian and bike facilities needs to be for ALEGRA (all Ages, Languages, Ethnicities, Gender, Race, and Abilities).
- I walk, bike, and use a wheelchair on Pike/Pine, and slowing traffic and making the street use clear for DRIVERS is by far the thing that I think makes a difference. I'm sure all drivers want to move safely and share the street, but if it's not clear how to do that, it's dangerous and incredibly stressful. Visibility while you're making a turn, for example.
- Prioritizing people and movement, rather than cars, is essential, and makes life better for everyone. If we want to be a sustainable and world-class city, we have to acknowledge that cars have little place in the dense areas of a city.
- Conflicts with ride-share drivers parking in bike lanes are a major problem. Ride-share drivers are unlikely to drive even a short distance to find a loading zone, so protected bike lanes need to physically prevent intrusions by cars.